Annual Long-Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee
TN4210020570

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Acronyms and Abbreviations

ºC	degrees Centigrade
AS	air sparging
AS/SVE	air sparging with soil vapor extraction
bgs	below ground surface
BRAC	Base Realignment and Closure
cDCE	cis-1,2-dichloroethene
CF	chloroform
COC	contaminant of concern
CT	carbon tetrachloride
CVOC	chlorinated volatile organic compound
DCE	1,1-dichloroethene
DDMT	Defense Depot Memphis, Tennessee
DQE	data quality evaluation
DQO	data quality objective
DR	design related
EBT	enhanced bioremediation treatment
FFS	Focused Feasibility Study
ft	foot/feet
FSVE	fluvial soil vapor extraction
IAQ	Intermediate Aquifer
IDW	investigation-derived waste
IRA	Interim Remedial Action
IRACR	Interim Remedial Action Completion Report
IW	injection well
LCS	laboratory control sample
LTM	long-term monitoring
MACTEC	MACTEC Engineering and Consulting, Inc.
MAQ	Memphis Aquifer
MCL	maximum contaminant level
µg/L	micrograms per liter
MI	Main Installation
mL	milliliter
MLGW	Memphis Light, Gas & Water
MS	matrix spike
MSD	matrix spike duplicate
MW	monitoring well
NAVD	North American Vertical Datum of 1988
NPL	National Priorities List
PCE	tetrachloroethene
PDB	passive diffusion bag
PMW	performance monitoring well
PZ	piezometer
QAPP	Quality Assurance Project Plan
QC	quality control

RA	remedial action
RAO	remedial action objective
RD	remedial design
ROD	Record of Decision
RL	reporting limit
RW	recovery well
SRI	Supplemental Remedial Investigation
SVE	soil vapor extraction
TC	target concentration
TCA	1,1,1-trichloroethane
TCE	trichloroethene
TDEC	Tennessee Department of Environment and Conservation
TeCA	1,1,2,2-tetrachloroethane
TOC	top of casing
TTA	target treatment area
UC	Upper Claiborne
US	United States
USACE	United States Army Corps of Engineers
USEPA	United States Environmental Protection Agency
VC	vinyl chloride
VOC	volatile organic compound
ZVI	zero valent iron

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1 Introduction

HDR has prepared this 2017 Annual Long-term Monitoring (LTM) Report for the Main Installation (MI) and Dunn Field at the former Defense Depot Memphis, Tennessee (DDMT) under Contract W90FYQ-09-D-0005, Task Order CK04 to the United States Army Corps of Engineers (USACE), Mobile District. The environmental restoration program at DDMT is directed by the Department of the Army, Office of the Assistant Chief of Staff for Installation Management, Base Realignment and Closure (BRAC) Division.

LTM at the MI and Dunn Field is performed to document changes in plume concentrations, to detect potential plume migration to off-site areas or into deeper aquifers, and to track progress toward remediation goals. LTM activities at DDMT are performed in accordance with the MI LTM Plan in Appendix B of the *Main Installation Final Remedial Design, Revision 1* (MI RD) (CH2M HILL 2004a) and the Dunn Field LTM Plan in Appendix C of *Off Depot Groundwater Final Remedial Design, Revision 1* (Off Depot RD) (CH2M HILL 2008). DDMT's United States Environmental Protection Agency (USEPA) Identification Number is TN4210020570.

Responses to comments from USEPA and Tennessee Department of Environment and Conservation (TDEC) and approval letters from USEPA and TDEC are included in Appendix A.

1.1 Site Location and Description

DDMT is located in southeastern Memphis, Shelby County, Tennessee approximately 5 miles east of the Mississippi River and 2 miles north of Memphis International Airport (Figure 1). DDMT originated as a military facility in the early 1940s; it received, warehoused, and distributed supplies common to all United States (US) military services and some civil agencies located primarily in the southeastern US, Puerto Rico, and Panama. Stocked items included food; clothing; petroleum products; construction materials; and industrial, medical, and general supplies. In 1995, DDMT was placed on the list of the Department of Defense facilities to be closed under BRAC. Storage and distribution of material continued until the facility closed in September 1997.

The property consists of approximately 632 acres and includes the MI and Dunn Field. The MI covers approximately 567 acres and had open storage areas, warehouses, military family housing, and outdoor recreational areas. Dunn Field, which is located across Dunn Avenue from the north-northwest portion of the MI, covers approximately 65 acres and had mineral storage and waste disposal areas.

In 1992, DDMT was added to the National Priorities List (NPL) (57 Federal Register 47180 No. 199). Responsibility for environmental restoration at DDMT transferred from the Defense Logistics Agency to the Department of the Army in December 2010. The regulatory oversight agencies are USEPA Region 4 and TDEC.

1.2 Geology and Hydrogeology

The geologic units of interest at DDMT are (from youngest to oldest): loess, including surface soil; fluvial deposits; Jackson Formation/Upper Claiborne Group (Jackson/Upper Claiborne); and Memphis Sand.

The loess consists of wind blown and deposited brown to reddish-brown, low-plasticity clayey silt to silty clay. The loess deposits are about 20 to 30 feet (ft) thick and are continuous throughout DDMT.

The fluvial (terrace) deposits at DDMT consist of two general layers. The upper layer is silty, sandy clay to clayey sand and ranges from about 0 to 30 ft thick. The lower layer is composed of interlayered sand, sandy gravel, and gravelly sand, and ranges from 30 to 100 ft thick. The uppermost aquifer is the unconfined Fluvial Aquifer, consisting of saturated sands and gravelly sands in the lower portion of the deposits. The base of the Fluvial Aquifer is controlled by the surface of the uppermost clay in the Upper Claiborne; the saturated thickness ranges from 0 ft (dry) to approximately 70 ft. The groundwater in the Fluvial Aquifer is not a drinking water source for area residents; however, the current Tennessee groundwater classification at DDMT is General Use (TDEC Chapter 1200-04-03).

The Jackson/Upper Claiborne forms the upper confining unit for the Memphis Aquifer (MAQ) on a regional basis and separates the Fluvial Aquifer from the MAQ at DDMT. The Jackson Formation is reported to be absent in the area of DDMT. The Upper Claiborne Group includes the Cockfield and Cook Formations. The Cockfield Formation consists of inter-fingering fine sand, silt, clay, and local lenses of lignite. The Cook Mountain Formation consists primarily of clay with varying amounts of fine sand and is reported to be the most persistent clay layer in the Jackson/Upper Claiborne confining unit (Parks 1990). The Intermediate Aquifer (IAQ) is locally developed in the Upper Claiborne sands. Where the clay is thin or absent, a hydraulic connection or ‘window’ is created between the Fluvial Aquifer and the IAQ, and potentially, the MAQ.

The Memphis Sand primarily consists of thick-bedded, white to brown or gray, very fine grained to gravelly, partly argillaceous and micaceous sand. The Memphis Sand ranges from 500 to 890 ft in thickness, and begins at a depth below ground surface (bgs) of approximately 120 to 300 ft. The MAQ is a regional deep, confined aquifer and is the primary source of water for the City of Memphis. The Allen Well Field, which is operated by Memphis Light, Gas & Water (MLGW), is located approximately 2 miles west of Dunn Field.

1.3 Remedial Action

The selected remedies in the decision documents for DDMT have been implemented. The *Preliminary Close Out Report* (USEPA 2010) was approved in May 2010 and the DDMT NPL site status was revised to Construction Complete in May 2010.

1.3.1 Main Installation

Remedial action objectives (RAOs) for the MI were established in the *Main Installation Record of Decision* (MI ROD) (CH2M HILL 2001). The groundwater RAOs are:

- to prevent ingestion of water contaminated with volatile organic compounds (VOCs) in excess of maximum contaminant levels (MCLs) from potential future on-site wells;
- to restore groundwater to concentrations at or less than MCLs; and
- to prevent migration horizontally and vertically offsite of groundwater contaminants in excess of MCLs.

The groundwater remedy selected in the MI ROD was enhanced bioremediation treatment (EBT) with LTM and land use controls. The MI ROD stated EBT would target the most contaminated areas and untreated parts of the groundwater plume would degrade under natural attenuation; the MI RD used groundwater concentrations of 100 micrograms per liter (µg/L) for tetrachloroethene (PCE) and trichloroethene (TCE) to delineate the treatment areas. The first round of EBT (EBT-1) was implemented from September 2006 to February 2009 in the southwest and southeast areas of the MI, which were designated target treatment area (TTA)-1 and TTA-2, respectively. Performance monitoring was conducted quarterly from October 2006 through March 2009. Chlorinated volatile organic compound (CVOC) concentrations were reduced over 90 percent in injection wells (IWs) and over 80 percent in performance monitoring wells (PMWs) at locations with baseline concentrations above 100 µg/L. The *Main Installation Interim Remedial Action Completion Report, Revision 1* (MI IRACR) (HDR|e^{2}M 2010) was approved by USEPA in March 2010.

Additional EBT (EBT-2) was implemented from November 2012 to November 2014 due to rebound in CVOC concentrations in LTM samples. Quarterly injections and monitoring were conducted in five areas where individual CVOC concentrations of parent compounds (PCE, TCE and carbon tetrachloride [CT]) exceeded 100 µg/L: TTA-1N, TTA-1S, TTA-2, the West-Central plume and the Building 835 plume. Quarterly injections were made from November 2012 to August 2014 and performance monitoring was conducted from February 2013 to November 2014. The final report for EBT-2, *Main Installation Year Four Enhanced Bioremediation Treatment Report, Revision 0* (HDR 2015), was approved by USEPA and TDEC in May 2015. The CVOC concentrations in the final samples (November 2014) decreased from the baseline samples (December 2011) by an average of 80 percent for IWs and 28 percent for PMWs; the total number of EBT wells exceeding MCLs decreased from 55 wells to 17 wells over the same period. While EBT-2 reduced CVOC concentrations, it was not sufficient to meet the groundwater RAOs for the MI.

A Supplemental Remedial Investigation (SRI) is currently being performed for the MI to address data gaps identified through EBT performance monitoring and LTM. A Focused Feasibility Study (FFS) will be conducted upon completion of the SRI to update the remedial strategy. An Explanation of Significant Differences or a ROD Amendment will be prepared as necessary to document changes to the selected remedy. Further RA will be conducted after the FFS is completed and the selected remedy has been confirmed or revised.

The *Supplemental Remedial Investigation Phases 1 and 2 Report, Revision 0* (HDR 2017d) was submitted to USEPA and TDEC for review in November 2017. Conclusions from document review addressed hydraulic connections between the Fluvial Aquifer and the MAQ in the Memphis area and at DDMT; limits to natural attenuation of CVOCs in groundwater at DDMT due to low natural carbon and high dissolved oxygen in groundwater; and findings from the 2009 groundwater model (HDR|e^{2}M 2010). Conclusions from the field investigation addressed site hydrogeology and plume delineation.

Additional work is planned to complete the SRI, with concurrence from USEPA and TDEC, in order to provide sufficient information for evaluation of remedial alternatives in the FFS and to develop a successful strategy for RA. The *Supplemental Remedial Investigation Phase 3 QAPP* (HDR 2017e) was submitted to USEPA and TDEC on 7 November 2017.

1.3.2 Dunn Field

The *Record of Decision for Interim Remedial Action of the Groundwater at Dunn Field (OU-1)* (CH2M HILL 1996) was signed in April 1996 with the objective of hydraulic containment to prevent further contaminant plume migration and reduce contaminant mass in groundwater. The interim remedial action (IRA) groundwater recovery system included 11 recovery wells (RWs) screened in the Fluvial Aquifer along the western boundary of Dunn Field. Based on reduction of CVOC concentrations in groundwater following implementation of the Dunn Field Source Areas RA, five RWs were shutdown in June 2008 and the remaining RWs were shutdown in January 2009. The IRA system was removed and the RWs abandoned in July 2010.

The groundwater RAOs established in the *Memphis Depot Dunn Field Record of Decision* (Dunn Field ROD) (CH2M HILL 2004b) are:

- to prevent human exposure to contaminated groundwater (i.e., exceeding protective target concentrations [TC])
- to prevent further off-site migration of VOCs in excess of protective target levels
- to remediate Fluvial Aquifer groundwater to drinking water quality to be protective of the deeper MAQ.

The remedies were implemented in three phases: Disposal Sites, Source Areas and Off Depot. The selected remedies for the Source Areas and Off Depot were modified through the *Dunn Field Record of Decision Amendment* (ROD Amendment) (e^{2}M 2009) approved in January 2009.

The Disposal Sites RA included excavation and off-site disposal of soil and waste material from five sites and was completed in 2006. The *Dunn Field Disposal Site Remedial Action Completion Report* (MACTEC 2006) was approved by USEPA in August 2006.

The Source Areas RA was to include soil vapor extraction (SVE) in the vadose zone and injection of zero valent iron (ZVI) in groundwater. The Fluvial SVE (FSVE) in fluvial soils (30 to 70 ft bgs) was operated from July 2007 to July 2012 and removed approximately 4,000 pounds of VOCs. Thermal SVE, or in situ thermal desorption, was implemented in the loess (0 to 30 ft

bgs) from May to December 2008 and removed approximately 12,500 pounds of VOCs. ZVI injection was not required due to the success of SVE in reducing groundwater impacts. Excavation and off-site disposal of soil and waste material were also conducted in two additional areas; the work was performed in two phases, October 2007 to January 2008 and February to June 2009, so as not to interfere with thermal SVE implementation. The *Dunn Field Source Areas Interim Remedial Action Completion Report, Revision 1* (Source Areas IRACR) (HDR|e^{2}M 2009) was approved by USEPA and TDEC in November 2009.

The FSVE system was shut down in July 2012 after meeting soil remediation goals; LTM results at nearby wells are evaluated for potential rebound in CVOC concentrations. The FSVE system and nearby LTM wells are shown on Figure 2.

The Off Depot RA included installation of an air sparging with SVE (AS/SVE) system with 90 AS points and 12 SVE wells; operations began in December 2009. AS/SVE in combination with natural attenuation processes is expected to reduce groundwater concentrations to MCLs in accordance with the RAOs in the Dunn Field ROD. The AS/SVE system with nearby LTM wells is shown on Figure 3. The *Dunn Field Off Depot Groundwater Interim Remedial Action Completion Report, Revision 1* (Off Depot IRACR) (HDR 2011a) was approved by USEPA in August 2011 and by TDEC in November 2011.

Overall performance of the AS/SVE system is evaluated based on results of LTM analyses. The AS/SVE system was installed to intercept the majority of the Off Depot CVOC plume and to reduce individual CVOC concentrations below 50 µg/L. Operations are to continue until the upgradient concentrations from the Dunn Field plume do not exceed 50 µg/L for individual CVOCs in upgradient wells. Since April 2012, only TCE in one LTM well near the AS/SVE system, MW-159, has exceeded the 50 µg/L objective.

The latest annual report, *Off Depot Air Sparge-Soil Vapor Extraction System Annual Operations Report, Year Six, Revision 0* (HDR 2017b), was submitted to USEPA and TDEC in August 2017. The AS/SVE system has removed approximately 86 pounds of VOCs through April 2017. In order to address the continued high concentration of TCE at MW-159, additional AS wells will be installed south of MW-159 to increase removal of CVOCs from groundwater. The new AS wells will be installed upon completion of an updated access agreement with MLGW and will be incorporated into system operations following installation. Since the active remediation goal of CVOC concentrations at 50 µg/L (or less) has not been met, operations are planned to continue through May 2019.

1.4 Previous Groundwater Monitoring

The *Annual Long-Term Monitoring Report-2016, Revision 1* (HDR 2017c) was approved by TDEC in June and by USEPA in October 2017. During preparation of the report, the well classifications in the LTM plan were reviewed in response to suggestions from USEPA and the BRAC Environmental Coordinator. The LTM plans for the MI and Dunn Field were prepared in 2004 and 2008, respectively. Information on site hydrogeology and contaminant extent at DDMT has increased significantly since that time, especially for the MI where approximately 100 LTM wells have been installed since the LTM plan was completed. Based on the review, well

classifications were revised from the initial purpose-based criteria (background, boundary, sentinel and performance) to classification by aquifer and plume/area.

LTM wells were assigned to the Fluvial, Intermediate or Memphis Aquifers. The upper clay layer in the Upper Claiborne, which usually forms the base of the Fluvial Aquifer, is absent in the central part of the MI, and the Fluvial sand and the Upper Claiborne sand form a single water table aquifer. Several deeper wells in this area are designated Upper Claiborne and are grouped with the IAQ wells.

In addition to classification by aquifer, the wells are grouped by area or plume. The areas for MI LTM wells are: TTA-1 North, TTA-1 South, TTA-2, West-Central, Building 835, North-Central, South-Central, Southeast MI and Background. The areas for Dunn Field LTM wells are: DF North, DF West, Off Depot and Background. The Background wells at the MI and Dunn Field were selected based on criteria in the LTM Plans (wells upgradient of or at a distance from groundwater plumes and with no, or low, previous detections of site contaminants).

The 2016 LTM report also included review and revision of the sample frequencies for LTM wells. The following criteria were established:

- New wells will be sampled semiannually over 2 years prior to a frequency being determined.
- Wells with stable concentrations below the MCL in the eight most recent samples will be sampled biennially.
- Wells with stable concentrations approximately two times the MCL or less will be sampled annually.
- All other wells will be sampled semiannually.
- The following exceptions to the criteria will be made:
    - The MI wells screened in the Memphis Sand (MW-254 and MW-255) have not exceeded MCLs in samples collected since installation in 2010 but will continue to be sampled annually due to increased concentrations in upgradient wells.
    - The DF North wells, which commonly exceed an MCL (MW-07, MW-08, MW-31, MW-79, MW-129, MW-130, MW-220 and MW-230), will continue to be sampled annually until the need for remedial action is determined.
    - Off Depot wells installed adjacent to the AS/SVE system for performance monitoring (MW-241 to MW-247) will be sampled more frequently than required by the new criteria in order to monitor AS/SVE performance.

2 Long-Term Monitoring Activities

LTM activities during 2017 consisted of monitoring designated LTM wells at the MI and Dunn Field during sampling events in April and October. Field activities and laboratory analyses were performed in accordance with the *2017 Uniform Federal Policy-Quality Assurance Project Plan, Revision 0* (2017 QAPP) (HDR 2017a).

The MI LTM wells are listed on Table 1; the well locations are shown on Figure 4.The 148 MI LTM wells consist of 115 wells in the Fluvial Aquifer, 30 wells in the IAQ/Upper Claiborne (IAQ/UC) and 3 wells in the MAQ. Sample frequencies for wells by aquifer are:

- 115 Fluvial Aquifer - semiannual (74), annual (23) and biennial (18);
- 30 IAQ/UC - semiannual (14), annual (12) and biennial (4); and
- 3 MAQ - semiannual (1) and annual (2).

The classification, sample frequency, and 2017 sample events for MI LTM wells are shown on Table 3.

The Dunn Field LTM wells are listed on Table 2; the locations are shown on Figure 5. The 85 Dunn Field LTM wells consist of 80 wells in the Fluvial Aquifer, 4 wells in the IAQ/UC and 1 well in the MAQ. Sample frequencies for wells in each aquifer are:

- 80 Fluvial Aquifer - semiannual (13), annual (31) and biennial (36);
- 4 IAQ/UC - annual (2) and biennial (2); and
- 1 MAQ - biennial.

The classification, sample frequency, and 2016 sample events for Dunn Field LTM wells are shown on Table 4.

2.1 Groundwater Monitoring

Groundwater levels are measured in all LTM wells on the MI and Dunn Field prior to sampling for LTM events. Measurements are made using water level meters with electronic sensors and tapes graduated in 0.01-ft increments.

Groundwater samples are generally collected from monitoring wells using passive diffusion bags (PDBs) where the saturated screened interval is 5 ft or greater and field water quality measurements are not required. Samples are collected with bladder pumps or with bailers where PDBs are not installed.

When samples are collected using a PDB, a sample of water from the PDB removed from the well is transferred to 40-milliliter (mL) vials preserved with hydrochloric acid. Following sample collection, a new PDB is filled with de-ionized water and placed in the middle of the saturated section of well screen. Water quality parameters are not measured prior to sampling wells with PDBs.

When samples are collected using bladder pumps and low-flow purging methods, dedicated Teflon® bladders and Teflon®-lined polyethylene tubing are used. The water level and pumping rate at each well are monitored in order to limit water level decline to 4 inches (0.1 meter) or less. Following sampling, the bladder and tubing for each well are placed in separate, sealed plastic bags and stored for future sampling events. Water quality parameters are measured at approximately 5 to 10 minute intervals during purging using a flow-through cell with a water quality meter. The meter is calibrated each morning prior to sampling, and if abnormal readings are observed during the day, the instrument is recalibrated in the field. Purging continues at each well for up to 2 hours in order to meet the stabilization criteria: three successive readings within 0.1 for pH, 10 millivolts for oxygen reduction potential, 3 percent for specific conductance, 10 percent for dissolved oxygen and less than 20 nephelometric turbidity units for turbidity. Temperature is also recorded, but not used as a stabilization parameter.

Wells sampled with a disposable Teflon® bailer are purged of three well volumes or until the well is purged dry. Stabilization parameters are collected using the same instrumentation as the wells sampled with a bladder pump; a sampling cup is filled from the bailer and a set of stabilization parameters are collected at minimum for every well volume.

All measurements are noted on the field sampling forms. Samples are collected in 40-mL vials preserved with hydrochloric acid when stabilization criteria are met or the field team leader approves a variance from the criteria.

MI LTM well PZ-03 was installed in October 1998 as a piezometer with 1-inch diameter PVC casing and screen. The piezometer has been sampled with a small diameter disposable Teflon® bailer. Sampling has become increasingly difficult in recent years due to difficulty in lowering a bailer or small-diameter bladder pump to the well screen; samples could not be collected from PZ-03 in 2017.

Samples were sent to Microbac Laboratories in Marietta, Ohio for VOC analysis by Method SW8260B. The activities during the two sampling events are summarized in the following sections.

2.1.1 April 2017

Groundwater levels were measured in all LTM wells at the MI and Dunn Field on 17 and 18 April. The water level measurements are shown on Table 5 for the MI and Table 6 for Dunn Field.

2.1.1.1 Main Installation

Semiannual groundwater sampling was conducted on 19 to 24 April 2017 with samples collected from 104 wells. There were 89 MI LTM wells identified for semiannual sampling in 2017 (see Section 2); a sample could not be collected from PZ-03, as noted above. Samples were collected from 16 wells identified for annual sampling (see Table 3), because the updated sample frequencies presented in the 2016 LTM report had not been reviewed by USEPA and TDEC before the April 2017 sample event. There were 106 groundwater samples collected; samples were collected from two screened intervals at MW-101 and MW-107.

Groundwater samples were collected from 92 wells using PDBs. The sample from well PMW101-02A was not usable due to excessive headspace when received at the laboratory. The PDB sample depths are shown on Table 7.

Eleven wells (DR2-5 and SRI Phase 2 wells MW-274 to MW-283) were sampled using a bladder pump. PMW101-02A was re-sampled on 24 April using a bladder pump; the vials were received at the laboratory with no problems observed. One well, MW-213, was sampled with a bailer after three well volumes were removed. The final stabilization measurements are shown on Table 8.

Turbidity measurements were out of range at two former EBT wells (DR2-5 and PMW101-02A) due to organic content and very dark purge water. PMW101-02A was sampled after the other parameters stabilized; DR2-5 was purged dry on 21 April and sampled on 22 April after the water level had recovered sufficiently. The SRI Phase 2 wells were sampled after stabilization criteria were met, except for MW-283 which was sampled with turbidity at 58 NTUs after purging for two hours.

2.1.1.2 Dunn Field

Biennial groundwater sampling was conducted with samples collected from all 85 LTM wells on 22 and 23 April 2017. Groundwater samples were collected from 82 wells using PDBs. The sample depths are shown on Table 9.

Three wells (MW-08, MW-58 and MW-126) were sampled using a bladder pump due to limited saturated thickness or variable water level. The samples were collected when stabilization criteria were met. The final stabilization measurements are shown on Table 8.

2.1.2 October 2017

Groundwater levels were measured in all LTM wells at the MI and Dunn Field on 3 to 6 October. The water level measurements are shown on Table 5 for the MI and Table 6 for Dunn Field.

A total of 18 samples were received at the laboratory with head space in one or more of the sample vials. While this had been observed during previous sample events, it had involved only a few samples and was limited to wells previously used as EBT IWs where ongoing biological activity was considered the cause. Following discussions with Microbac Laboratories after the sample event, it was determined that the problem was due to the sample vials supplied by the laboratory. Field samples usually consisted of three vials from each well, but often consisted of two vials when duplicate samples or matrix spike/matrix spike duplicates (MS/MSD) were collected at the well.

Twelve of the 18 samples had one or two vials without head space, and the analyses were completed without issue. The remaining six samples with head space in all vials consisted of four field samples, one duplicate and one trip blank. Analyses for two of the field samples were completed using sample vials collected for a duplicate or MS/MSD at the same well. The other two field samples were re-collected (MW-203A and DR1-6A) with an associated duplicate

(DUP-8-LA-26) at one of the wells. The trip blank could not be recollected and the analysis was performed with an affected vial.

The height of the PVC well casing in MI LTM well MW-210B did not allow the manhole cover to fit properly, and the cover appeared to have been damaged during recent mowing; the PDB in the well did not appear to be damaged and was used during sampling. The well casing was cut down by less than one inch and a new well cover was installed on 11 October, and the top of casing (TOC) was re-surveyed by Allen & Hoshall, a registered land surveyor, on 12 October. A discrepancy was noted during HDR's review of the new elevation data; the new TOC elevation was higher than the previous elevation even though the TOC had been lowered. Allen & Hoshall determined that a transposed number in the control point elevation had been used during their initial elevation survey in 2007 following installation of the wells; the horizontal coordinates were not affected. Allen & Hoshall recalculated the elevations for the affected wells; their report is included in Appendix B. The corrected elevations differ from the initial 2007 elevations by less than 0.5 ft. Some of the wells had their top of casing modified and elevations re-surveyed in 2013; the 2013 survey data did not require revision. Groundwater elevations based on the corrected TOC elevations were more consistent with adjacent wells than those based on the original 2007 TOC elevations. Groundwater elevations and contour maps for the MI are discussed in Section 3.1.1.2.

2.1.2.1 Main Installation

Annual groundwater sampling was conducted on 7 to 12 October 2017 with samples collected from 125 of 126 designated wells; a sample could not be collected from PZ-03, as noted above. There were 127 groundwater samples collected; samples were collected from two screened intervals at MW-101 and MW-107.

Groundwater samples were collected from 121 wells using PDBs, but samples from two wells (DR1-6A and MW-203A) were not usable as noted above. The PDB sample depths are shown on Table 7.

Three wells with PDBs previously installed (MW-203B, MW-274 and MW-283) were sampled using a portable bladder pump with dedicated tubing and bladder. The PDB in MW-203B appeared to be damaged and was not used; the PDB tethers for MW-274 and MW-283 were switched during installation and the PDBs were not at appropriate depths for sampling. Two wells were purged and sampled with a bailer: DR2-5 and MW-213. DR2-5 was bailed dry and sampled after the water level recovered on the same day, 10 October. MW-213 was sampled with a bailer due to limited saturated thickness. DR1-6A and MW-203A were re-sampled on 11 and 12 October, respectively; new bailers were used because dedicated bladders and tubing were not available and could not be obtained before the sample event ended. DR1-6A, MW-203A and MW-213 were sampled after at least three well volumes were purged. The final stabilization measurements are shown on Table 8.

2.1.2.2 Dunn Field

Semiannual groundwater sampling was conducted on 5 and 6 October 2017 with samples collected from 16 wells. There are 13 Dunn Field LTM wells identified for semiannual sampling

in 2017 (see Section 2). Samples were collected from 3 wells (MW-06, MW-57 and MW-70) identified for annual or biennial sampling (see Table 4), because of increased concentrations in the April 2017 samples.

Groundwater samples were collected from all 16 wells using PDBs. The sample depths are shown on Table 9.

2.2 Waste Disposal

The waste generated during LTM activities in 2017 was classified as either non-investigative waste or investigation-derived waste (IDW). Non-investigative waste, such as packaging materials, personal protective equipment, disposable sampling supplies, and other inert refuse, was collected, containerized, and placed in the collection bin at the HDR field office for disposal at a municipal landfill. The IDW consisted of waste water from equipment decontamination and groundwater from purging prior to sampling and from excess water in PDBs.

The waste water was collected in 5-gallon buckets with lids and added to the condensate storage tank on Dunn Field. When the storage tank nears capacity, grab samples of wastewater will be collected for analysis of VOCs and selected metals prior to discharge per agreement with TDEC.

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3 Summary of Monitoring Results

3.1 Hydrogeology

Water level measurements for the 2017 LTM events at the MI are shown on Table 5 for the MI and on Table 6 for Dunn Field. Site-wide groundwater elevations are shown on Figures 7 and 8 for the Fluvial Aquifer, on Figures 9 and 10 for the IAQ/UC and on Figures 11 and 12 for the MAQ.

3.1.1 Main Installation

3.1.1.1 Top of Clay and Cross-Section

Additional lithological data for DDMT was obtained since the October 2016 LTM event through installation of the SRI Phase 2 wells (MW-274 through MW-284) in November 2016 and April 2017. The elevation of the top of the uppermost clay in the Upper Claiborne is shown on Figure 13. The most noticeable features are the gap in the upper clay in the northwestern MI and the increasing depth of clay in the central MI. The lowest observed elevation of the clay is 93.4 ft NAVD at MW-209A. All elevations cited in this report are based on the North American Vertical Datum of 1988 (NAVD).

Cross-section A, which runs south from MAQ well MW-254 in the northwest corner of the MI to Fluvial Aquifer well MW-24 on the central southern boundary, is shown on Figure 6. The section includes several IAQ wells within the ‘window’ and the West-Central area and shows the variability in the Upper Claiborne on the MI. Where the upper clay is present, it forms the base of the Fluvial Aquifer and where it is absent, the fluvial sands and the Upper Claiborne sand form a combined water table aquifer. Further to the north on the cross-section (near MW-140), the lower clay is deeper or absent allowing vertical groundwater movement and potential contaminant migration to the MAQ. MW-140 is included as an MAQ well although it is screened within the Upper Claiborne; the screened depth and the groundwater elevation are consistent with the MAQ wells.

3.1.1.2 Groundwater Elevations

The Fluvial Aquifer groundwater elevation contours are shown on Figures 7 and 8. Groundwater flow in the Fluvial Aquifer appears to be onto the MI from all sides with flow off the MI through vertical leakage at the window in the northwest MI and the sink in the south-central MI.

Groundwater elevations are highest in the northeast corner of the MI (MW-16: approximately 244 ft NAVD) and lowest at the suggested sink in the south-central MI (MW-259: approximately 202 ft NAVD). Groundwater flow near TTA-1 is to the east and northeast with a hydraulic gradient of approximately 0.003 in April and October (MW-219 to MW-210B). The groundwater flow near TTA-2 is to the west-southwest with a hydraulic gradient of approximately 0.014 in April and 0.013 in October (DR2-1 to MW-26).

The IAQ groundwater elevation contours shown on Figures 9 and 10 indicate groundwater flow into and through the window in the northwest MI. The water levels for the IAQ wells in the 'window' indicate flow is generally to the northwest with groundwater elevations decreasing from MW-107 (approximately 207.0 ft NAVD in April and 206.4 ft NAVD in October) to MW-34 (approximately 181.8 ft NAVD in April and 178.4 ft NAVD in October). The hydraulic gradient in the 'window' is to the northwest at approximately 0.017 in April and 0.019 in October (MW-107 to MW-34). The IAQ well locations at the downgradient end of the window (MW-256, MW-262 and MW-273) indicate the groundwater flow is to the north.

The MAQ groundwater elevation contours are shown on Figures 11 and 12. The groundwater elevations in the three wells on the MI (MW-140, MW-254 and MW-255) ranged from approximately 173.6 to 175.0 ft NAVD in April and 167.8 to 168.8 ft NAVD in October. The elevation contours, including Dunn Field MAQ well MW-67, indicate the groundwater flow direction is to the southwest. The number of wells in the MAQ is not sufficient to clearly define the flow direction. The central section of the Allen Well Field is located to the west-northwest of the MI, which suggests the hydraulic gradient should be to the west.

3.1.2 Dunn Field

The Fluvial Aquifer groundwater elevation contours on Figures 7 and 8 show groundwater flows to the west across Dunn Field toward a trough in groundwater elevations approximately 1,200 ft west of Dunn Field, where flow diverges to the north and south. As noted in Section 1.2, the base of the Fluvial Aquifer is controlled by the surface of the uppermost clay in the Upper Claiborne; a trough in the surface of the underlying clay (Figure 13) has resulted in the trough in the potentiometric surface west of Dunn Field. The AS/SVE system is located on the eastern side of the trough. The approximate hydraulic gradient across Dunn Field is 0.010 (MW-28 to MW-242). Groundwater elevations are highest northeast of Dunn Field (MW-130: approximately 239.8 ft NAVD) and decrease toward the trough west of Dunn Field (MW-165: approximately 220.6 ft NAVD).

The IAQ groundwater elevation contours are shown on Figures 9 and 10. The groundwater elevations in the IAQ wells MW-237, MW-250 and MW-251 averaged 176.0 ft NAVD in April and 170.4 ft NAVD in October. The groundwater elevation in MW-169, which is screened in an Upper Claiborne sand within an area of possible leakage from the Fluvial Aquifer about 1,000 ft north of the other IAQ wells, was 201.55 ft NAVD in April and 199.40 ft NAVD in October.

The MAQ groundwater elevation contours are shown on Figures 11 and 12. The groundwater elevation in MW-67 was 175.58 ft NAVD in April and 169.84 ft NAVD in October.

3.1.3 Precipitation and Water Levels

Historical precipitation data and groundwater elevations at DDMT are reviewed to evaluate whether there was seasonal variation in water levels, which could affect CVOC concentrations through dilution or increased groundwater flow. The review, begun in 2015, has indicated that the Fluvial Aquifer wells do not have significant seasonal variability and that IAQ and MAQ wells

have consistent annual variation with higher water levels in the spring and lower levels in the fall. The current schedule of sampling events in April and October is considered appropriate.

Precipitation data for the Memphis area and groundwater elevations at selected monitoring wells were updated for the current report. The updated tables and figures are provided in Appendix C.

The precipitation data, which was recorded at Memphis International Airport, includes monthly rainfall for May 2010 through December 2017 and monthly averages for the near-term (post 2011) and the long-term (1981-2010). The actual monthly rainfall and the monthly averages are listed on Table C-1 and plotted on Figure C-1. The total annual rainfall for 2011 through 2017, and for the long-term and short-term monthly averages, is also listed on Table C-1.

The monthly maximum and minimum precipitation totals (in inches) for each year are listed in the table below.

Year	Monthly Maximum (inches)		Monthly Minimum (inches)	
2010	May	9.3	September	0.1
2011	April	11.8	October	1.3
2012	September	7.0	April	1.0
2013	May	10.8	August	2.2
2014	June	13.4	August	1.8
2015	November	10.2	January	1.3
2016	March	16.2	September	0.7
2017	August	9.3	February	1.4

Fourteen monitoring wells were selected for comparison of groundwater elevations with monthly precipitation data. The selected wells, located throughout DDMT, are shown on Figure C-2. The wells are listed on Table C-2 with location, aquifer and groundwater elevations measured from March 2010 through December 2017. The actual monthly precipitation totals and groundwater elevations are shown on Figure C-3 for Fluvial Aquifer wells and on Figure C-4 for IAQ and MAQ wells.

The groundwater elevations at most wells have risen since 2010. The increase is likely due to the total annual rainfall exceeding the average annual rainfall in 2011, 2013, 2014 and 2016 (Table C-1). While the Fluvial Aquifer wells show a relatively smooth trend, the IAQ and MAQ wells also have a semiannual variation with elevations higher in the spring and lower in the fall. The semiannual variation in the deeper wells is likely due to higher groundwater extraction from the MAQ in the summer and fall.

3.2 Data Quality Evaluation

Data collected during the 2017 LTM events were reviewed based on guidelines in the QAPP. Data review was performed by an independent data validation contractor, Diane Short and Associates, Inc. The complete analytical results for field and quality control (QC) samples, including data quality evaluation (DQE) flags, are presented in Appendix D, Tables D-1 through D-6.

Overall, the VOC data from the LTM events met project data quality objectives (DQOs) and were determined to be sufficient to evaluate progress toward remediation goals. The laboratory analytical reports are included in Appendix E (electronic copies only). The complete DQE for 2017 LTM is provided in Appendix F. The main findings from the DQE for the MI and Dunn Field are summarized separately below.

3.2.1 Main Installation

Based on the review and the project DQOs, the MI data are acceptable and usable. No data were rejected. The primary causes of the qualified data are described below.

- A number of results for bromomethane, chloromethane, acetone, 2-chlorotoluene and/or 1,2,3-trichlorobenzene were non-detect and qualified “UJ” due to high percent difference with low response in continuing calibration standards in the April and October events. The qualified analytes are not contaminants of concern (COCs) at the MI.
- One result for acetone was detected and qualified “J-” due to a high percent difference with low response in a continuing calibration standard in the April and October events. Acetone is not a COC at the MI.
- cis-1,2-dichloroethene (cDCE) in PMW92-03-LS-25 and TCE in sample MW-259-LS-25 were qualified as estimated “J” due to low MS/MSD recoveries in the April event. Both analytes are COCs at the MI; the cis-1,2-DCE concentration in the parent sample was well below the MCL, and the TCE concentration in the parent sample was well above the MCL.
- A number of samples were qualified due to acetone in trip blanks in the April and October events. The final qualifier was 10.0 U for samples with results less than the reporting limit (RL) and qualified as non-detect at the RL. The final qualifier was “no qualification” for sample results greater than two times the blank concentration. Acetone is not a COC at the MI.
- The final qualifier for PCE in seven samples was 1.00 U due to PCE in the trip blank in the April event. The sample results were less than the RL and qualified as non-detect at the RL. PCE is a COC at the MI, with an MCL of 5 µg/L, and the qualified sample results were below this level.
- The final qualifier for all analytes in the initial sampling and analysis of PMW101-02A-LS-25 was qualified “J-“ or “UJ” due to headspace in the containers in the April event.

- The final qualifier for all analytes in sample LTM-TB3-LA-26 was UJ due to headspace in the containers in the October event.
- MTBE and PCE in sample PMW101-06A-LS-25 and its field duplicate DUP-11 were qualified “J” for field duplicate relative percent differences outside the control limit in the April event. MTBE is not a COC at the MI. PCE is a COC at the MI; the results were above the MCL.
- Any result reported below the RL but above the method detection limit was flagged “J” and considered an estimated result (unless overridden by other QC flags).

3.2.2 Dunn Field

Based on the review and the project DQOs, the Dunn Field data are acceptable and usable. No data were rejected. The primary causes of the qualified data are described below.

- A number of results for bromomethane, chloromethane and/or acetone were qualified UJ due to high percent differences with low response in continuing calibration standards in the April and October events. These analytes are not COCs at Dunn Field.
- Eleven results for acetone were detected and qualified “J-” due to a high percent difference with low response in a continuing calibration standard in the April event. Acetone is not a COC at Dunn Field.
- The final qualifiers in sample MW-08-ODLB-14 were 10.0 U for acetone and 0.300 U for chloroform due to acetone and chloroform in the equipment blank in the April event. The sample results were less than the RL and qualified as non-detect at the RL. Acetone is not a COC but chloroform is a COC at Dunn Field.
- 2,2-Dichloropropane in one sample (MW-247-ODLB-14) was qualified as non-detect estimated “UJ” and TCE in one sample (MW-130-ODLB-14) was qualified as estimated “J” due to low MS/MSD recoveries in the April event. 2,2-Dichloropropane is not a COC at Dunn Field. TCE is a COC at Dunn Field; the TCE concentration in the parent sample was well above the MCL.
- Any result reported below the RL but above the method detection limit was flagged “J” and considered an estimated result (unless overridden by other QC flags).

3.3 Main Installation Analytical Results

The complete analytical results for MI LTM groundwater samples collected in 2017 are provided in Appendix D. Summary tables for each sampling event, Tables 10 and 11, show the analytical results for the primary CVOCs and for other VOCs detected above the RL in one or more samples. The primary CVOCs for the MI are PCE, TCE, cDCE, CT, chloroform (CF) and vinyl chloride (VC). The MCLs are also listed on the summary tables.

The RL was raised for a few samples collected from MI LTM wells previously used for EBT injections; the increased RLs were due to organic content remaining in the groundwater. The RL was raised by a factor of 5 at two wells in April (MW-213 and PMW101-02A) and at one well in

October (MW-213), and by a factor of 50 at one well (DR2-5) in April and October. The number of affected wells decreased from nine in April 2016, due to decreasing organic content.

A total of 106 groundwater samples were collected for the semiannual event in April 2017. Table 10 lists the analytical results for the primary CVOCs and other VOCs detected above the RL in one or more samples.

A total of 127 groundwater samples were collected for the annual event in October 2017. Table 11 lists the analytical results for the primary CVOCs and other VOCs detected above the RL in one or more samples.

Concentration maps for the primary CVOCs exceeding MCLs are shown for the Fluvial Aquifer on Figures 14 to 20 and for the IAQ/UC on Figures 21 to 24. CVOC concentrations detected above the RL in the October 2017 samples for the MAQ wells are shown on Figure 25. PCE and TCE concentrations in Fluvial, IAQ and MAQ wells along Cross-section A from the southern MI boundary through the window to the northern MI boundary are shown on Figure 26 for October 2017.

Historical analytical results for the primary CVOCs in all MI LTM wells are provided in Appendix G. Time trend plots for MI LTM wells, where primary CVOCs were detected above MCLs in one or more samples, are provided in Appendix H.

The most recent analytical results for primary CVOCs in MI LTM wells are shown on Table 12 for Fluvial Aquifer wells and on Table 13 for IAQ/UC and MAQ wells. Results are from October 2017 for wells sampled semiannually or annually and from October 2016 for wells sampled biennially; non-detect results are not listed.

The following sections, 3.3.1 to 3.3.3, discuss the MI analytical results by aquifer, with sub-sections for each area with wells screened in that aquifer. The subsection for each area is organized in the same manner: summary information for the plume/area; comparison of isopleths and concentrations shown on the CVOC figures for April and October; the number of MCL exceedances and the maximum concentrations for the most recent sample results; and a review of historical results/trend plots.

3.3.1 Fluvial Aquifer

3.3.1.1 TTA-1 North

The TTA-1 North plume is located in the southwestern area of the MI near the central section of Building 1089 and north of former Buildings 1084 and 1085. The depth to water averages 82.1 ft bgs and the saturated thickness averages 29 ft. The groundwater flow direction is to the east-northeast. The primary contaminant prior to EBT was PCE; TCE, cDCE and VC concentrations have increased due to reductive dechlorination. EBT was implemented in the Fluvial Aquifer TTA-1 North area during EBT-1 in 2006 to 2009 and during EBT-2 in 2012 to 2014. The following LTM wells were used for injections during EBT-2: MW-21 and PMW21-01.

PCE concentrations and isopleths for April and October on Figures 14 and 15 are similar, except for increased concentrations at MW-269 and MW-278 in October. MW-278, installed in October 2016 and initially classified as a background well, was re-classified as a TTA-1N well because the PCE concentration in October 2017 (7.26 µg/L) exceeded the MCL. TCE isopleths for April and October on Figures 16 and 17 are also similar and show a smaller plume within the area of the highest PCE concentrations.

cDCE and VC concentrations for October are shown on Figures 18 and 19. High cDCE concentrations remain at the former EBT-2 IWs with lower concentrations in nearby downgradient wells. VC concentrations are limited to downgradient well MW-100B.

Fourteen fluvial LTM wells are associated with the TTA-1 North plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Seven wells exceeded the MCL for PCE with a maximum concentration of 270 µg/L (PMW21-04); five of these wells also exceeded the MCL for TCE with a maximum concentration of 146 µg/L (PMW21-04).
- Two wells exceeded the MCL for cDCE with a maximum concentration of 136 µg/L (MW-21), and one well exceeded the MCL for VC with a concentration of 166 µg/L (MW-100B).
- The PCE concentration in upgradient off-site well MW-269 was 70.1 µg/L in October 2017.
- Four wells located around the perimeter of the plume (MW-66A, DR1-2, DR1-7 and DR1-8) did not have CVOC concentrations above MCLs.

The following observations are based on review of the historical results and trend plots for the TTA-1 North wells:

- Three wells on the perimeter of the plume (MW-66A, DR1-2 and DR1-8) have never exceeded an MCL.
- One well, DR1-7, in the downgradient portion of the plume exceeded the MCL for PCE initially but concentrations decreased during EBT-1 and have been below MCLs since 2008.
- Three wells located upgradient of the EBT area have exceeded the MCL for PCE (MW-219, MW-269 and MW-278); the PCE concentrations are considered to represent contaminant migration from an off-site source.
    - MW-219 is located near the western MI boundary. The PCE concentration has ranged from 4.55 to 113 µg/L, with the highest concentration detected in October 2017.
    - MW-269 was installed off-site and upgradient from MW-219 in 2015; the PCE concentration has ranged from 33.6 to 70.1 µg/L, also with the highest concentration detected in October 2017.

  - MW-278 was installed off-site and upgradient from MW-269 in 2016; the PCE concentration increased to 7.26 µg/L in October 2017.

- Three wells demonstrate reductive dechlorination from one or both rounds of EBT and currently exceed MCLs for only cDCE or VC (MW-21, MW-100B and PMW21-01).
  - MW-100B had decreased PCE and TCE and increased cDCE concentrations during the EBT field trial in 2002; cDCE was then reduced to VC during EBT-1 and has remained above 100 µg/L since 2009.
  - In MW-21 and PMW21-01, concentrations of PCE and TCE decreased below the MCLs during EBT-2; cDCE concentrations increased and have remained above the MCL.
- Three wells in the central portion of the plume have shown limited effect from EBT (PMW21-02, -03 and -04).
  - PCE and TCE concentrations decreased at PMW21-02 and PMW21-03 during EBT-1 but remained above MCLs; concentrations showed no change during EBT-2 and remain at high levels.
  - PMW21-04 showed greater reductions in PCE and TCE during the two periods of EBT but concentrations rebounded after injections ended.
- PMW21-05 is located downgradient of the EBT area. The TCE concentration decreased below the MCL in 2010, after EBT-1, and remains below the MCL; the PCE concentration decreased but remains above the MCL.

3.3.1.2 TTA-1 South

The TTA-1 South plume is located a few hundred feet southeast of TTA-1 North, on the west side of Building 1088 and the southern portions of Buildings 970 and 972. Based on the distribution of PCE and TCE in the area before EBT was implemented, there appear to be two source areas. Wells in the southern area have had higher TCE concentrations and moderate PCE concentrations while those in the northern area have had higher PCE concentrations and low TCE concentrations. The depth to water averages 84.5 ft bgs and the saturated thickness averages 51.0 ft. The groundwater flow direction is to the northeast. EBT was implemented in the Fluvial Aquifer TTA-1 South area during EBT-1 in 2006 to 2009 and during EBT-2 in 2012 to 2014. The following LTM wells were used for injections during EBT-2: DR1-5/5A, DR1-6/6A and PMW101-02A/B.

PCE concentrations and isopleths for April and October on Figures 14 and 15 are similar except for a higher concentration in October at DR1-4 (8.53 µg/L) on the east side of Building 970. TCE concentrations and isopleths for April and October on Figures 16 and 17 show a larger plume in October due to an increased concentration at DR1-6A (10.5 µg/L).

cDCE and VC concentrations for October are shown on Figures 18 and 19. Elevated cDCE concentrations are shown at former EBT-2 IWs and upgradient well MW-279. VC concentrations above the RL, and MCL, are limited to PMW101-02B, PMW101-03A and PMW101-04A.

Twenty-one fluvial LTM wells are associated with the TTA-1 South plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Fourteen wells exceeded the MCL for PCE with a maximum concentration of 58.8 µg/L at upgradient well MW-279.
- Three wells exceeded the MCL for TCE with a maximum concentration of 22.8 µg/L at PMW101-07B.
- Two wells exceeded the MCL for VC with a maximum concentration of 4.65 µg/L at PMW101-03A.

The following observations are based on review of the historical results and trend plots for the TTA-1 South wells:

- Three wells, two on the perimeter of the plume (DR1-1 and MW-22) and one deeper well within the plume (PMW101-07A) have not exceeded an MCL; MW-22 and PMW101-07A have not had CVOCs above the RL.
- Thirteen wells had CVOC concentrations reduced during the two rounds of EBT. Generally concentrations of PCE and TCE decreased and cDCE concentrations increased during EBT and then PCE and TCE rebounded after injections ended.
    - CVOC concentrations in DR1-1A decreased during EBT-1 and have remained below MCLs since 2007.
    - PCE and TCE concentrations at PMW101-02A have been below the MCLs since 2013 except for PCE in April 2016.
    - The TCE concentration in DR1-3 increased above the MCL in 2016 and PCE concentrations in DR1-3 and DR1-4 increased above the MCL in 2017.
    - PCE concentrations rebounded above the MCL in two wells after EBT-2 ended in 2014. The October 2017 concentrations were approximately 26 µg/L in both screened intervals of MW-101 and 43.5 µg/L in PMW101-03B.
    - Three wells have had products of reductive dechlorination above MCLs. In October 2017, VC was above the MCL at PMW101-02B (4.58 µg/L) and PMW101-03A (4.65 µg/L), but decreased below the MCL at PMW101-04A (1.74 µg/L); PCE was also above the MCL in PMW101-03A (24.8 µg/L) and PMW101-04A (18.4 µg/L).
    - CVOC concentrations in three wells decreased during EBT-1 but then rebounded and had little response to EBT-2. PCE concentrations were near pre-treatment levels in the wells in October 2017: 50.7 µg/L in PMW101-04B, 11.4 µg/L in PMW101-06A and 28.5 µg/L in PMW101-06B.
    - CVOC concentrations in PMW101-07B also had little response to EBT-2. During EBT-1, concentrations decreased from 187 µg/L to 24.5 µg/L for TCE and from 53.6 µg/L to 13.3 µg/L for PCE but have decreased slowly since; October 2017 concentrations were 22.8 µg/L for TCE and 9.08 µg/L for PCE. The deeper well in this pair (PMW101-07A) has not had CVOCs above RLs.

- Four wells in the upgradient area of TTA-1 South (DR1-5/5A and DR1-6/6A) had no response to EBT-1, but PCE and TCE concentrations were reduced and cDCE concentrations increased when these wells were used for injections during EBT-2.
    - PCE concentrations in DR1-5 were reduced below the MCL in February 2014, but have been above and below the MCL since April 2016. The concentration in October 2017 was 5.12 µg/L.
    - PCE and TCE concentrations in DR1-5A rebounded above the MCL in April 2016 but have been non-detect in three samples since then.
    - PCE concentrations in DR1-6 decreased from a pre-treatment level near 250 µg/L but have remained above the MCL (8.58 µg/L in October 2017).
    - PCE and TCE concentrations in DR1-6A decreased below the MCL in November 2013, but the TCE concentration rebounded above the MCL to 10.5 µg/L in October 2017.
- MW-279 was installed upgradient of DR1-5/5A in 2016 and has been sampled only three times. The PCE concentration has been above the MCL in all three samples and was 58.8 µg/L in October 2017.

3.3.1.3 TTA-2

The TTA-2 plume is located in the southeastern area of the MI with elevated concentrations of PCE, TCE, and CT. The distribution of pre-treatment concentrations suggested two or more source areas: the highest PCE concentrations (200-250 µg/L) were observed at DR2-1 and MW-92 in the eastern area between Buildings 261 and 265; the highest CT concentrations (250 µg/L) were observed at DR2-5 and PMW85-01 in the western area, between Buildings 260 and 360; and the highest TCE concentrations (40 µg/L) were observed at MW-218 and MW-64 in the northwestern area, north of Building 360. The depth to water averages 86.8 ft bgs and the saturated thickness averages 17.4 ft. The groundwater flow direction is to the west-southwest. EBT was implemented in the Fluvial Aquifer TTA-2 area during EBT-1 in 2006 to 2009 and during EBT-2 in 2012 to 2014. The following LTM wells were used for injections during EBT-2: DR2-2, DR2-5 and PMW92-03.

Concentrations and isopleths are similar for April and October for PCE on Figures 14 and 15 and for TCE on Figures 16 and 17, except for lower concentrations in October at PMW85-05. cDCE and VC concentrations for October are shown on Figures 18 and 19; elevated cDCE concentrations remain at most TTA-2 wells in the EBT-2 area and high VC concentrations remain at several wells in the central part of the EBT-2 area, from PMW92-02 to downgradient well DR2-6.

CT concentrations for October are shown on Figure 20. Elevated CT concentrations are present at two wells (DR2-1 and MW-85) in the central TTA-2 area where EBT was implemented, but do not extend downgradient from there. However, elevated concentrations extend from MW-267 in the northwestern area of TTA-2 to MW-259 within the suspected sink; this may represent a separate contaminant source near or upgradient of MW-267.

Twenty-five fluvial LTM wells are associated with the TTA-2 plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Fifteen wells exceeded the MCL for PCE with a maximum concentration of 150 µg/L (DR2-1); eight of these wells also exceeded the MCL for TCE with a maximum concentration of 32.3 µg/L (MW-218).
- Five of the eight wells exceeding the MCL for PCE and TCE also exceeded the MCL for CT with a maximum concentration of 73.1 µg/L (MW-217).
- One well exceeded the MCL for cDCE with a concentration of 123 µg/L (PMW85-05), and six wells exceeded the MCL for VC with a maximum concentration of 72.2 µg/L (PMW92-02).

The following observations are based on review of the historical results and trend plots for the TTA-2 wells:

- Two wells on the perimeter of the plume (MW-50 and MW-266) have never exceeded an MCL.
- Five wells upgradient or cross-gradient (west) of the TTA-2 EBT area had no response to EBT-1 or EBT-2: MW-64, MW-88, MW-217, MW-218 and MW-267. All five wells have concentrations of PCE, TCE and/or CT above the respective MCLs.
- MW-280 was installed north of TTA-2 and upgradient of MW-267 in 2016 and has been sampled three times. The PCE concentration exceeded the MCL in April and October 2017.
- Eleven wells responded to one or both of the EBT events: DR2-1, DR2-2, DR2-5, DR2-6, MW-85, MW-92, MW-113, PMW85-01, PMW85-05, PMW92-02 and PMW92-03.
    - DR2-1 had decreased CVOC concentrations after EBT-1 but did not respond to EBT-2; concentrations are at pre-treatment levels. The other ten wells had greater responses to EBT.
    - DR2-2, which was used as an IW during EBT-2, currently has no CVOCs above MCLs.
    - DR2-5, which was also used as an IW during EBT-2, still has an elevated cDCE concentration. Elevated RLs (50 µg/L) for the 2017 samples (due to organic content and very dark purge water) are well above the MCLs for PCE, TCE, VC and CT.
    - Four wells (MW-113, PMW85-01, PMW92-02 and PMW92-03) currently exceed MCLs only for cDCE or VC, products of reductive dechlorination.
    - Three wells (DR2-6, MW-92, and PMW85-05) have cDCE or VC concentrations above the MCL but PCE, TCE and/or CT have also rebounded above the MCL.
    - MW-85 has PCE, TCE and CT concentrations above the MCLs; the VC concentration decreased below the MCL in April 2017.
- Six wells, located downgradient of the EBT area, have shown limited response to EBT: DR2-3, DR2-4, MW-25A, MW-26, MW-96 and MW-259.

- Decreasing PCE concentrations were observed at DR2-3, DR2-4, MW-25A and MW-96, but there has been no increase in cDCE concentrations. CVOC concentrations are below MCLs at MW-25A and MW-96.
- MW-259 is approximately 1,500 ft downgradient of TTA-2 and CVOC concentrations have been stable with TCE near 20 µg/L, PCE near 15 µg/L and CT near 5 µg/L.
- MW-26 near the EBT area has no clear trend with the PCE concentration ranging from 8 to 53 µg/L since 1997; the concentration was 8.25 µg/L in October 2017.

3.3.1.4 West-Central

The West-Central plume is a broad area of elevated PCE concentrations approximately 1,500 ft northeast of TTA-1. Based on pre-treatment CVOC concentrations, the plume is considered to result from contaminant migration from TTA-1 and from separate source areas in the west-central MI. The upgradient western end of the plume is east of Buildings 970 and the central area is near Building 770; the downgradient eastern end merges with the North-Central plume near Building 650 at the southern end of the window. The depth to water averages 91.2 ft bgs. The groundwater flow direction is to the east-northeast. The West-Central wells are downgradient of TTA-1 and CVOC concentrations in several wells responded to EBT-1. In addition, EBT was implemented in the West-Central area during EBT-2 in 2012 to 2014; well MW-203B was used for injections.

PCE isopleths for April and October on Figures 14 and 15 are similar; October concentrations are lower at MW-98, MW-203B and MW-207B and higher at MW-197B. TCE concentrations and isopleths on Figures 16 and 17 are similar for April and October, except for a decrease at MW-207B for October.

cDCE and VC concentrations for October are shown on Figures 18 and 19. cDCE concentrations were detected above the RL at the former EBT-2 IW, MW-203B, and several downgradient wells. VC was detected above the RL, and MCL, at MW-203B.

Fourteen fluvial LTM wells are associated with the West-Central plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Twelve wells exceeded the MCL for PCE and/or TCE, with maximum concentrations of 30.1 µg/L (MW-204A) for PCE and 22.2 µg/L (MW-210B) for TCE.
- One well exceeded the MCL for VC with a concentration of 5.91 µg/L (MW-203B).

The following observations are based on review of the historical results and trend plots for the West-Central wells:

- Ten wells responded to one or both EBT events: MW-39, MW-197B, MW-200, MW-203B, MW-204A/B, MW-205B, MW-206A/B and MW-210B.
  - Seven of these wells had significant reductions in PCE concentrations with concurrent increases in cDCE concentrations (MW-39, MW-197B, MW-200, MW-203B, MW-205B and MW-206A/B). MW-203B was used for injections during EBT-2.

- Decreased PCE concentrations and increased cDCE concentrations at MW-204A/B were noticeable but less than in the wells listed above. The TCE concentration in MW-204B has increased slightly over time. The limited response may be due to the well's location on the south side of the West-Central plume with less impact from EBT in TTA-1 and from injections in MW-203B.
- PCE concentrations in MW-210B decreased below the MCL, but TCE concentrations increased slightly and there was little change in cDCE concentrations.

- Four wells, located in the downgradient portion of the West-Central plume, had limited response to EBT: MW-94A, MW-98, MW-207B and MW-208B.
  - MW-94A, located on the south edge of the plume, has had a relatively stable PCE concentration at 20 to 30 µg/L.
  - MW-98, also located on the south edge of the plume, had a relatively stable PCE concentration at 30 to 40 µg/L until 2017; the PCE concentration decreased from 32.2 µg/L in October 2016 to 7.71 µg/L in October 2017; the cDCE concentration increased from 1.25 µg/L to 5.65 µg/L over the same period.
  - MW-207B and MW-208B have had varying PCE and TCE concentrations over time. During the last 3 years (2015 through 2017), PCE concentrations have been approximately 25 to 93 µg/L at MW-207B and 7 to 10 µg/L at MW-208B, and TCE concentrations have been approximately 9 to 24 µg/L at MW-207B and 2 to 12 µg/L at MW-208B.

3.3.1.5 Building 835

The Building 835 plume is an elongated area of elevated TCE concentrations near Building 835 in the western portion of the MI. The plume is oriented along the southern edge of the clay forming the window in the northwest corner of the MI; the southern end merges with the West-Central plume near Building 650. The depth to water averages 88.3 ft bgs and the saturated thickness ranges from 5 ft to 19 ft. The groundwater flow direction is to the southeast. EBT was implemented in the Fluvial Aquifer Building 835 area during EBT-2 in 2012 to 2014, with injections at MW-62 and MW-213.

TCE concentrations and isopleths for April and October on Figures 16 and 17 show an increase above the MCL at MW-213 (13.1 µg/L) and a slight decrease below the MCL at MW-142 in October.

cDCE and VC concentrations for October are shown on Figures 18 and 19. cDCE concentrations above the RL remain at the former EBT-2 IWs, MW-62 and MW-213; VC concentrations above the RL are limited to MW-62.

Eight fluvial LTM wells are associated with the Building 835 plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Five wells exceeded the MCL for TCE with a maximum concentration of 51 µg/L (MW-199B).

- One well exceeded the MCL for VC with a concentration of 15.3 µg/L (MW-62).

The following observations are based on review of the historical results and trend plots for the Building 835 wells:

- Three wells showed a response to EBT-2: MW-62, MW-212 and MW-213.
  - MW-62 and MW-213 were used for injections and TCE concentrations were reduced below the MCL. cDCE and VC concentrations increased in MW-62; VC currently exceeds the MCL. In MW-213, the TCE concentration rebounded in 2017 and exceeded the MCL in October.
  - The TCE concentration at MW-212, located downgradient from MW-62, decreased from 48 µg/L in 2007 to 12 µg/L in 2012, prior to EBT-2, and then decreased to 6 µg/L in 2014 with a slight increase in the cDCE concentration. The TCE concentration has risen since then to 40.1 µg/L in October 2017.
- Five wells had no apparent impact from EBT-2: MW-142, MW-143, MW-198, MW-199B and MW-209B.
  - Beginning in 2008, TCE concentrations in MW-142 and MW-143 increased from non-detect to 5 to 10 µg/L.
  - The TCE concentration at MW-198 decreased from 26 µg/L in 2007 to below the MCL in 2010.
  - The TCE concentration in MW-199B has remained stable at 50 to 100 µg/L since 2009.
  - The TCE concentration in MW-209B increased from 6 µg/L in 2007 to 34 µg/L in 2013, decreased to 3 µg/L in 2016 and increased to 8 µg/L in 2017.

3.3.1.6 North-Central

The North-Central plume is an elongated plume, which extends from the property boundary north of Building 319 to the southeast toward Building 650 where it appears to merge with the West-Central and Building 835 plumes. Elevated TCE concentrations are present throughout the plume, while PCE concentrations are limited to wells in the downgradient section beginning near MW-265. The depth to water increases from 55 ft bgs at the northern site boundary (MW-263) to 100 ft bgs in the central MI (MW-215B). The groundwater flow direction is to the southwest toward the ‘window’ or the sink in the south-central MI. EBT was not implemented in the North-Central area.

PCE isopleths for April and October on Figures 14 and 15 and TCE isopleths on Figures 16 and 17 are generally similar, with some changes in concentration; PCE concentrations in October are lower for MW-265 and higher for MW-215B and MW-281, while TCE concentrations are lower for MW-265 and higher for MW-103, MW-104 and MW-281. Consistent with the absence of EBT in this area, concentrations of cDCE (Figure 18) were very low and VC (Figure 19) was not detected.

Ten fluvial LTM wells are associated with the North-Central plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Four wells exceeded the MCL for PCE with a maximum concentration of 24.4 µg/L (MW-258).
- Five wells exceeded the MCL for TCE with a maximum concentration of 66.2 µg/L (MW-281). The TCE concentration in the upgradient well on the property boundary (MW-263) was 32.8 µg/L.

The following observations are based on review of the historical results and trend plots for the North-Central wells

- Two wells on the downgradient edge of the plume, MW-63A/B, have low CVOC concentrations. MW-63A has never exceeded an MCL; MW-63B has had PCE and TCE concentrations near the MCL, but usually below.
- Seven wells have had stable concentrations, generally above the MCL.
    - Three wells have TCE at elevated concentrations with PCE concentrations generally below the MCL; the TCE concentration ranges are MW-103 (5 to 10 µg/L), MW-104 (10 to 20 µg/L), and MW-263 (30 to 45 µg/L).
    - Two wells have PCE and TCE at concentrations above the MCL with PCE at higher concentrations; the concentration ranges are MW-258 (PCE at 60 to 90 µg/L and TCE at 20 to 30 µg/L) and MW-265 (PCE at 8 to 15 µg/L and TCE 5 to 8 µg/L).
    - MW-260 has had TCE concentrations from 3 to 6 µg/L.
    - MW-215B has had PCE concentrations from 4 to 7 µg/L.
- MW-281 was installed west and cross-gradient from MW-258 in 2016 and has been sampled three times. PCE and TCE concentrations exceeded the MCL in all three samples at concentrations of 8 to 15 µg/L for PCE and 50 to 66 µg/L for TCE.

3.3.1.7 South-Central

The South-Central plume is an elongated area of elevated TCE concentrations in the south-central MI. The depth to water averages 90.7 ft bgs, and the saturated thickness increases from 28 ft at MW-97 to 54 ft at MW-271. The groundwater flow direction is easterly toward the sink near MW-259. EBT was not implemented in the South-Central area.

TCE concentrations and isopleths for April and October on Figures 16 and 17 are very similar.

Five fluvial LTM wells are associated with the North-Central plume. The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- Two wells exceeded the MCL for TCE with a maximum concentration of 71.7 µg/L (MW-97).

The following observations are based on review of the historical results and trend plots for the South-Central wells:

- Two wells on the perimeter of the plume have not exceeded an MCL: MW-216 and MW-261.
    - Two CVOCs were detected above the RL in MW-216 in October 2008 (PCE at 34.2 µg/L and TCE at 1.5 µg/L). These results are not considered reliable because CVOCs have not been detected above RLs in the other 13 samples from MW-216 and TCE is the primary contaminant in the other South-Central wells with PCE at low concentrations below the MCL or not detected.
- Three wells have exceeded the MCL for TCE: MW-97, MW-271 and PZ-03.
    - The TCE concentration at MW-97 increased from 2 µg/L in 2004 to 71 µg/L in 2013 and have remained at 60 to 70 µg/L except for a decrease to 28 µg/L in April 2016.
    - The TCE concentration at MW-271 slightly exceeded the MCL in the initial 2015 sample and has remained slightly below 5 µg/L in later samples.
    - PZ-03 has had PCE and TCE concentrations above the MCL. The PCE concentration slightly exceeded the MCL in the initial 2002 sample and decreased over time to 1 µg/L in 2016. The TCE increased from 1 µg/L in 2010 to 15 µg/L in 2015 and has remained at that level. If the increased TCE concentration was related to the increase in MW-97, the migration time would be 6 to 7 years for the distance of 860 ft. PZ-03 could not be sampled in 2017 due to difficulty in sampling (Section 2.1); the well is planned to be abandoned with a replacement installed in 2018.

3.3.1.8 Southeast MI

Two fluvial LTM wells in the Southeast MI have elevated CVOC concentrations and are not apparently associated with designated plumes. Based on the CVOCs reported in these two wells, they do not represent a common contaminant source. The depth to water is approximately 72 ft bgs at MW-52 and 77 ft bgs at MW-270; the saturated thickness is approximately 32 ft at MW-52 and 12 ft at MW-270. The groundwater flow direction is westerly toward the sink near MW-259. EBT was not implemented in the Southeast MI area.

PCE concentrations and isopleths for April and October on Figures 14 and 15 are similar and show an isolated well (MW-52) with a concentration slightly above the MCL. TCE concentrations and isopleths for on Figures 16 and 17 are also similar and show an isolated well (MW-270) with a concentration near 25 µg/L. cDCE was also reported at MW-270 (Figure 18); based on the well location, it is not considered to be related to EBT at TTA-2.

The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- MW-52 exceeded the MCL for PCE with a concentration of 9.54 µg/L.
- MW-270 exceeded the MCL for TCE with a concentration of 25.5 µg/L.

The following observations are based on review of the historical results and trend plots for the Southeast MI wells:

- The PCE concentration at MW-52 has been 5 to 10 µg/L since 2002.

- The TCE concentration at MW-270 has decreased from 285 µg/L in July 2015 to 25 µg/L in 2017. cDCE is also present in the groundwater at MW-270 and exceeded the MCL in July 2015; the concentration has decreased from 122 µg/L in July 2015 to 6 µg/L in 2017.

3.3.1.9 Background

Seventeen fluvial LTM wells are located near the MI boundary with low or non-detect CVOC concentrations and are not used to define the extent of a designated plume. The wells are used to identify background concentrations. Seven wells installed for SRI Phases 1 and 2 were classified as background wells based on a limited number of samples. As noted in Section 3.3.1.1, MW-278 was initially classified a Background well, but was re-classified as a TTA-1N well based on PCE reported above the MCL in October 2017.

The most recent analytical results for the primary CVOCs (Table 12) are summarized as follows:

- No primary CVOCs were detected above MCLs.

The following observations are based on review of the historical results for the MI Background wells:

- None of the wells have had CVOCs reported above an MCL, and six wells have not had CVOCs above an RL.

3.3.2 Intermediate Aquifer/Upper Claiborne

3.3.2.1 TTA-2

One IAQ/UC well (MW-268) is installed in the area of the fluvial TTA-2 plume. The well was installed in 2015 for delineation of TTA-2 and was screened in Upper Claiborne fine sand below a clay layer.

The most recent analytical results for the primary CVOCs (Table 13) are summarized as follows:

- MW-268 did not contain CVOCs above the RLs.

The following observations are based on review of the historical results and trend plots for the IAQ/UC TTA-2 well:

- No CVOCs have been detected in the six samples from MW-268.

3.3.2.2 West-Central

Eight IAQ/UC LTM wells are installed in the area of the West-Central plume. All but MW-108 are installed in a well pair with an adjacent well screened in the Fluvial Aquifer and five of the wells (MW-39A, MW-108, MW-197A, MW-203A and MW-205A) do not have a clay layer separating the Upper Claiborne and fluvial sands. PCE and TCE from the West-Central, North-Central and Building 835 plumes intermix at the southwest end of the window. EBT was implemented in the West-Central area during EBT-2 in 2012 to 2014; well MW-203A was used for injections during EBT-2.

PCE concentrations and isopleths for April and October on Figures 21 and 22 are similar, except for slightly lower concentrations at MW-205A and MW-39A in October. TCE concentrations and isopleths on Figures 23 and 24 are also similar with slightly lower concentrations in October.

The most recent analytical results for the primary CVOCs (Table 13) are summarized as follows:

- Six wells exceeded the MCLs for PCE and/or TCE with maximum concentrations of 17.9 µg/L for PCE (MW-197A) and 19.5 µg/L for TCE (MW-207A).
- One well exceeded the MCL for VC with a concentration of 2.01 µg/L (MW-39A).
- The well used for EBT-2 injections (MW-203A) did not have CVOC concentrations above MCLs.

The following observations are based on review of the historical results and trend plots for the IAQ/UC West-Central wells:

- Five wells had significant decreases in PCE concentrations following the start of EBT-1 with some additional decrease during EBT-2: MW-39A, MW-197A, MW-205A, MW-208A and MW-210A.
    - The decrease in PCE concentrations occurred from 2008 to 2010 with initial concentrations of 230 µg/L (MW-39A) to 28 µg/L (MW-210A) reduced to 40 µg/L or lower; there were corresponding increases in cDCE and VC at some wells. During EBT-2, the PCE concentrations were reduced to 20 µg/L at most locations and below the MCL at MW-210A. TCE concentrations generally remained stable below 10 µg/L throughout the period; the TCE concentration was higher at MW-208A (10 to 20 µg/L).
    - The PCE concentration at MW-39A decreased from 23 µg/L in April 2015 to 3.93 µg/L in October 2017; TCE also decreased over this period but remained just above the MCL; and VC increased above the MCL to 2.01 µg/L in April and October 2017.
- MW-203A did not have a significant response during EBT-1, but was used as an IW for EBT-2. The PCE concentration decreased from approximately 120 µg/L in 2012 to below the MCL in 2013; no CVOCs have exceeded an MCL since 2014.
- Two wells, located in the downgradient portion of the West-Central plume, had no apparent response to EBT: MW-108 and MW-207A.
    - MW-108 has had TCE concentrations of approximately 20 to 30 µg/L since 2005, but concentrations decreased to 10 µg/L in 2017. PCE concentrations have remained near 5 µg/L since 2005.
    - MW-207A has had TCE concentrations of 20 to 50 µg/L and PCE concentrations of 10 to 20 µg/L since 2007.
- The higher TCE concentrations at MW-108, MW-207A and MW-208A are probably due to these wells being located downgradient of the Building 835 plume.

3.3.2.3 Building 835

Two IAQ/UC LTM wells (MW-199A and MW-209A) are installed in the area of the Building 835 plume. Both wells are installed adjacent to a paired well screened in the Fluvial Aquifer with a clay layer separating the Upper Claiborne and fluvial sands. TCE from the West-Central and Building 835 plumes intermix at the southwest end of the window.

TCE concentrations and isopleths for April and October on Figures 23 and 24 are similar.

The most recent analytical results for the primary CVOCs (Table 13) are summarized as follows:

- Both wells exceeded the MCL for TCE with a maximum concentration of 7.18 µg/L (MW-209A).

The following observations are based on review of the historical results and trend plots for the IAQ/UC Building 835 wells:

- Both wells had TCE concentrations below the RL or non-detect initially and then gradually increasing above the MCL.
  - The TCE concentration in MW-199A initially exceeded the MCL in October 2016.
  - The TCE concentration in MW-209A initially exceeded the MCL in October 2014; the concentration has remained below 10 µg/L.

3.3.2.4 North-Central

Four IAQ/UC LTM wells are installed in the area of the North-Central plume. MW-215A is screened in the Upper Claiborne with a sandy clay separating it from the paired well screened in the Fluvial Aquifer. MW-214A/B are a well pair with both screened in the Upper Claiborne sand and a clay separating the Upper Claiborne and fluvial sands. MW-264 was installed in 2015 for delineation of the fluvial North-Central plume; the well was screened in Upper Claiborne fine sand below a clay layer.

PCE and TCE from the West-Central and North-Central plumes intermix at the southwest end of the window. PCE concentrations and isopleths for April and October on Figures 21 and 22 are similar. TCE concentrations on Figures 23 and 24 are similar with concentrations below the MCL. The four wells were sampled in October only; the figures for April present sample results from October 2016.

The most recent analytical results for the primary CVOCs (Table 13) are summarized as follows:

- Three wells exceeded the MCL for PCE with a maximum concentration of 5.25 µg/L (MW-214A).
- MW-264 did not contain CVOCs above the RLs.

The following observations are based on review of the historical results and trend plots for the IAQ/UC North-Central wells:

- TCE and PCE concentrations in MW-214A/B have been stable since 2007, with PCE at 4 to 11 µg/L and TCE at 2 to 8 µg/L.

- The PCE concentration in MW-215A has been stable at 4 to 7 µg/L since 2007, while the TCE concentration has decreased from 6 to 2 µg/L.
- No CVOCs have been detected in the six samples from MW-264.

3.3.2.5 Window

Groundwater flow from the West-Central, Building 835 and/or North-Central plumes into the 'window' results in vertical migration of CVOCs to the IAQ and potentially the MAQ. Fifteen IAQ/UC LTM wells are adjacent to or within the 'window'.

PCE concentrations and isopleths for April and October on Figures 21 and 22 are similar, except for much lower concentrations at MW-107T/B in October; concentrations decreased from 43.1 to 8.8 µg/L at MW-107T and 50.2 to 5.43 µg/L at MW-107B. TCE concentrations on Figures 23 and 24 are similar, with concentrations below the MCL except at MW-256.

The most recent analytical results for the primary CVOCs (Table 13) are summarized as follows:

- Five wells exceeded the MCL for PCE with a maximum concentration of 27.1 µg/L at MW-141; one of these wells also exceeded the MCL for TCE with a concentration of 8.58 µg/L at MW-256.
    - MW-256 is located near the northern property boundary. No CVOCs were detected in the two IAQ wells (MW-262 and MW-273) installed west of MW-256.
- The remaining ten wells did not have CVOC concentrations above MCLs.

The following observations are based on review of the historical results and trend plots for the IAQ/UC Window wells:

- Six wells have not had CVOC concentrations above MCLs: MW-34, MW-38, MW-211, MW-229, MW-262 and MW-273.
    - Three of these wells have not had CVOCs detected above RLs: MW-229, MW-262 and MW-273.
- One well in the upgradient area of the window, MW-107, has had significant variation in PCE concentrations in samples from two screened intervals. PCE concentrations have ranged from 5 to 80 µg/L from 2011 to 2017; TCE concentrations have not exceeded the MCL during that period.
- Two wells screened in the lower section of the Upper Claiborne sand have had PCE concentrations recently increase above the MCL: MW-89 and MW-202A. PCE concentrations in both wells increased from <1 µg/L in 2009 to about 7 µg/L in October 2016; concentrations in both wells decreased below the MCL in 2017 (see Figure 26).
- Two wells have had PCE concentrations increase to relatively high concentrations over time. PCE concentrations in MW-141 increased from 6 µg/L in 2004 to 41 µg/L in October 2015 and decreased to 27 µg/L in October 2017. PCE concentrations in MW-202B increased from 6 µg/L in 2005 to 37 µg/L in October 2017. TCE concentrations in both wells have ranged from 1 to 5 µg/L. MW-141 is screened in the

lower section of the Upper Claiborne sand near the entrance to the window while MW-202B is screened in the upper section of the Upper Claiborne sand further into the window (see Figure 26).

- MW-90 has had decreasing concentrations possibly related to upgradient EBT. The PCE concentration varied from 20 to 80 µg/L from 2002 to 2011. From 2011 through 2017, the PCE concentration decreased from 30 to 14 µg/L and the TCE concentration decreased from 8 to 4 µg/L. MW-90 is screened in the upper section of the Upper Claiborne sand adjacent to MW-89 (see Figure 26).
- Two wells have had CVOC concentrations decrease below MCLs: MW-252 and MW-253.
    - The PCE concentration in MW-252 exceeded the MCL in a 2011 sample; all CVOCs have been below RLs since October 2012.
    - TCE concentrations at MW-253 increased from < 1 µg/L in 2010 to 10 µg/L in 2011; CVOCs have not been detected since 2012. The well is screened in clayey sand-clay within the Upper Claiborne. The higher TCE concentrations may have been the result of leakage from the fluvial sands during purging prior to sampling. No CVOCs have been detected in the well since MI LTM sampling transitioned to PDBs in April 2012; an adjacent well (MW-143) screened in the Fluvial Aquifer has had TCE at 7 to 13 µg/L since 2010; and the other IAQ wells in the window generally have higher concentrations of PCE.
- MW-256 is screened in the upper section of the Upper Claiborne sand in the downgradient area of the window near the northwest corner boundary of the MI. PCE and TCE concentrations increased continuously following installation in 2010 until April 2013; PCE increased from 9 to 42 µg/L and TCE increased from 2 to 16 µg/L. Concentrations have since decreased slightly to 25 µg/L for PCE and 9 µg/L for TCE.

3.3.3 Memphis Aquifer

CVOC concentrations detected above the RLs in the October 2017 samples are shown on Figure 25. Three LTM wells are identified with the MAQ for the MI; two wells (MW-254 and MW-255) are installed near the top of the Memphis Sand and one well (MW-140) is installed nearby in the lower Upper Claiborne sand (Figure 6).

The October 2017 analytical results for the primary CVOCs in the MAQ well samples are shown on Table 13; non-detect results are not listed. The results are summarized as follows:

- One well (MW-140) exceeded the MCL for PCE with a maximum concentration of 11.8 µg/L.
- Two wells did not have CVOC concentrations above MCLs.

The following observations are based on review of the historical results and trend plots for the MAQ Window wells:

- MW-254 and MW-255 have not had CVOCs above MCLs since installation in 2010.

  - MW-254 has had stable concentrations of TCE at 2 to 3 µg/L; PCE concentrations were below 1 µg/L until October 2015, but increased to 2.83 µg/L in October 2017.
  - MW-255 has had PCE and TCE concentrations below 1 µg/L, except for TCE at 1.63 µg/L in October 2016.
- The PCE concentration in MW-140 increased above the MCL in 2015, as in upgradient wells MW-89 and MW-202A which are also screened in the lower section of the Upper Claiborne sand within the window. The PCE concentration increased from <1 µg/L in 2009 to 11.8 µg/L in October 2017.

3.3.4 MCL Exceedances

The number of wells with primary CVOCs exceeding an MCL in the most recent samples is summarized by aquifer on Table 14; the maximum concentration for CVOCs exceeding MCLs in each area is also shown. The table was prepared using the results shown on Tables 12 and 13.

Concentrations exceeding the MCL for one or more of the primary CVOCs were observed in 91 of 148 MI LTM wells: 73 of 115 Fluvial Aquifer wells; 17 of 30 IAQ/UC wells and 1 of 3 MAQ wells. The most frequent exceedances were for PCE and TCE.

There were 137 MI LTM wells sampled in both October 2016 and October 2017. The number of those wells with CVOC concentrations above the MCLs in each year were similar, 84 wells in 2016 and 85 wells in 2017.

3.4 Dunn Field Analytical Results

The complete analytical results for Dunn Field LTM groundwater samples collected in 2017 are provided in Appendix D. Summary tables for each sampling event, Tables 15 and 16, show the analytical results for the primary CVOCs and for other VOCs detected above the RL in one or more samples. The primary CVOCs for Dunn Field are CT, CF, 1,1-dichloroethene (DCE), trans-1,2-dichloroethene, cDCE, 1,1,2,2-tetrachloroethane (TeCA), PCE, 1,1,1-trichloroethane (TCA), TCE, and VC. The MCLs, and TCs from the Dunn Field ROD, are also listed on the summary tables.

A total of 85 groundwater samples were collected for the biennial event in April 2017. Table 15 lists the analytical results for the primary CVOCs and other VOCs detected above the RL in one or more samples.

A total of 16 groundwater samples were collected for the semiannual event in October 2017. Table 16 lists the analytical results for the primary CVOCs and other VOCs detected above the RL in one or more samples.

Concentration maps for total CVOCs, TeCA and TCE are shown for the Fluvial Aquifer wells on Figures 27 to 32; Figures 28, 30 and 32 for October 2017 include analytical results for samples collected from monitoring wells installed by TDEC upgradient of Dunn Field. The total CVOC figures indicate extent of groundwater contamination for all primary CVOCs, some of which are detected in only a few wells. TeCA and TCE are the CVOCs historically detected at the highest

concentrations in the Dunn Field area. The concentration contours on the figures are based on the most recent analytical results for each well; only concentrations from the listed sample event are shown. The figures include 50 µg/L isopleths, where warranted, to show where the active treatment objective has not been met per the ROD Amendment, and isopleths at both the TC and MCL to show where the RAO has not been met.

CVOC concentrations detected above the RL in the April 2017 samples for the IAQ/UC wells are shown on Figure 33. The Dunn Field MAQ well (MW-67) was sampled in April 2017; CVOCs were not detected above the RLs.

Historical analytical results for the primary CVOCs in all Dunn Field LTM wells are provided in Appendix I. Time trend plots for Dunn Field LTM wells, where primary CVOCs were detected above MCLs in one or more samples, are provided in Appendix J.

The most recent analytical results for primary CVOCs in Dunn Field LTM wells are shown on Table 17 for Fluvial Aquifer wells and on Table 18 for IAQ/UC and MAQ wells. Results are from October 2017 for wells sampled semiannually and from April 2017 for wells sampled annually or biennially; non-detect results are not listed.

The following sections, 3.4.1 to 3.4.3, discuss the Dunn Field analytical results by aquifer, with sub-sections for each area with wells screened in that aquifer. The subsection for each area is organized in the same manner: summary information for the plume/area; comparison of isopleths and concentrations shown on the CVOC figures for April and October; the number of MCL exceedances and the maximum concentrations for the most recent sample results; and a review of historical results/trend plots.

3.4.1 Fluvial Aquifer

The total CVOC and TCE concentration maps on Figures 27 to 30 show the DF North plume extending across the northern section of Dunn Field to MW-79 located west of Dunn Field. These figures also show a few smaller, isolated areas of elevated concentrations in the DF West and Off Depot areas. The TeCA concentration maps on Figures 32 to 33 only show a few isolated areas exceeding the TC in the Off Depot area.

3.4.1.1 DF North

The DF North plume is located on the north end of Dunn Field and extends approximately 1,200 ft west of Dunn Field; the plume is considered to result from a suspected, off-site source(s) upgradient of Dunn Field. An on-site CVOC source area was evident in the northwest corner of Dunn Field prior to RA. The depth to water in LTM wells ranges from 45 to 66 ft bgs. The groundwater flow direction is to the west. The primary contaminants are PCE, TCE and DCE.

Findings from historical review and groundwater sampling at the TDEC wells, which are screened in the Fluvial Aquifer, were presented in a technical memorandum, *Data Collection at TDEC Wells, Dunn Field, Defense Depot Memphis, Tennessee* (HDR 2017f). The memorandum concluded that the TDEC wells were usable and provided a good network for off-site delineation of the CVOC plume migrating on to Dunn Field. The groundwater analytical results were

consistent with previous results for the TDEC wells and indicated the upgradient limits of the off-site plumes for TCE and DCE are located on the Cintas site, north of Dunn Field. Groundwater elevations and analytical results from the TDEC wells were used to prepare figures showing groundwater elevation contours and CVOC isopleth maps, but the individual TDEC wells are not discussed in this report. Additional investigation of the suspected off-site source for the DF North plume is planned.

Total CVOC and TCE concentrations and isopleths for April and October on Figures 27 to 30 are similar, except for additional data provided by the TDEC wells north of Dunn Field in October.

Fifteen fluvial LTM wells are associated with the DF North plume. The wells were identified based on location and presence of DCE in historical samples; DCE has not typically been detected in soil or groundwater samples on Dunn Field. The most recent analytical results for the primary CVOCs (Table 17) are summarized as follows:

- Eight wells exceeded the MCLs for TCE and PCE with maximum concentrations of 39.8 µg/L for TCE (MW-07) and 49.1 µg/L for PCE (MW-130); six of these wells also exceeded the MCL for DCE with a maximum concentration of 16.2 µg/L (MW-31).
- Seven wells, which are located around the perimeter of the plume, did not have CVOC concentrations above MCLs.

The following observations are based on review of the historical results and trend plots for the DF North LTM wells:

- Three wells, northwest of the plume (MW-78, MW-153 and MW-171) have had mainly non-detect concentrations since at least 2011. MW-78 and MW-153 each exceeded an MCL or TC only once in 2004. MW-171 has not exceeded an MCL or TC; CVOCs were detected above the RL for the first time in April 2017 with cDCE at 8.28 µg/L and TCE at 2.92 µg/L.
- Six wells in the northwestern corner of Dunn Field or downgradient (MW-03, MW-31, MW-68, MW-147, MW-180 and MW-220) had decreased concentrations after the FSVE system began operation in 2007 and concentrations have been relatively stable afterward. Three of the wells (MW-68, MW-147 and MW-180) have not exceeded an MCL or TC since 2008. The other three wells (MW-03, MW-31 and MW-220) have varied above and below the MCLs and TCs; MW-31 and MW-220 exceeded the MCLs for DCE, PCE and TCE in 2017.
- Six wells in the central portion of the plume (MW-07, MW-08, MW-79, MW-129, MW-130 and MW-230) have different trends but concentrations generally remain above the MCLs for DCE, PCE and TCE.
    - MW-07 has had PCE concentrations ranging from 18 to 71 µg/L since 2004.
    - Since 2012, MW-08 and MW-79 have had concentrations range from below the MCLs for DCE, PCE and TCE to 15 µg/L.

- MW-129, MW-130 and MW-230 have had decreasing concentration trends for DCE, PCE and TCE since 2009; all three CVOCs remain above the MCLs.

3.4.1.2 DF West

The DF West area incorporates the identified Source Areas on Dunn Field and was the location of the on-site RAs (IRA, Disposal Sites and Source Areas) described in Section 1.3.2. Prior to the RAs, multiple groundwater CVOC plumes originated in this area and migrated to the west. The depth to water ranges from 58 to 78 ft bgs. The groundwater flow direction is to the west. Prior to RA, the primary contaminants were TeCA, TCE and PCE.

- Total CVOC concentrations and isopleths for April and October on Figures 27 and 28 are very similar. The main area of elevated concentrations (>10 µg/L) is centered at MW-87.
- TCE concentrations and isopleths on Figures 29 and 30 are similar with concentrations slightly above the MCL at MW-57, MW-70 and MW-87 in April and at MW-57 and MW-87 in October.
- TeCA was detected above the RL in one well, MW-87, in April and October, but the concentration was below the TC.
- Only the CF concentration at MW-87 exceeded the active treatment objective of 50 µg/L for individual CVOCs.

Nineteen fluvial LTM wells are located in the DF West area. The most recent analytical results for the primary CVOCs (Table 17) are summarized as follows:

- Two wells, MW-57 and MW-87, exceeded the MCL for TCE with a maximum concentration of 8.0 µg/L (MW-87). CVOC concentrations at MW-87 also exceeded the MCL for CF with a concentration of 110 µg/L, and the TC for TCA with a concentration of 2.4 µg/L.
- CVOC concentrations in the remaining 17 wells did not exceed an MCL or TC, and concentrations in 11 wells did not exceed the RLs.

The following observations are based on review of the historical results and trend plots for the DF West LTM wells:

- All wells in the DF West area, except MW-176, had one or more CVOCs at concentrations above an MCL or TC prior to the start of FSVE operations in 2007 and the trend plots show decreased concentrations in all the wells following the start-up.
- Concentrations in all DF West wells were reduced below MCLs or TCs for all CVOCs between April 2007 and April 2012 and have remained below those limits since then, except at MW-57, MW-70 and MW-87.
    - Concentrations in MW-87 were reduced below MCLs and TCs for all CVOCs in April 2011, but began to rebound in 2013.The CF concentration increased above the TC in April 2013 and above the MCL in April 2017. The TCE concentration increased above the MCL in April 2016, and the TCA concentration increased

above the TC in October 2016. The concentrations remained above MCLs and TCs in October 2017.

- Concentrations in MW-57 were reduced below MCLs and TCs for all CVOCs in April 2012, but began to rebound in 2016. The TCE concentration exceeded the MCL in 2017; the concentration in October was 6.04 µg/L.
- Concentrations in MW-70 were reduced below MCLs and TCs for all CVOCs in October 2008, but rebounded slightly in 2017. The TCE concentration increased to 5.69 µg/L in April 2017 but decreased to 3.71 µg/L in October 2017.

3.4.1.3 Off Depot

The Off Depot area incorporates the area of groundwater contaminant plumes resulting from previous CVOC migration from DF West. The depth to water ranges from 48 to 78 ft bgs. The groundwater flow direction is to the west from the Dunn Field boundary towards a trough in groundwater elevations approximately 1,200 ft west of Dunn Field; at the trough, flow diverges to the north and south. The Off Depot area includes fluvial LTM wells on both sides of the trough. Prior to RA, the primary contaminants were TeCA, TCE and PCE.

The CVOC concentration maps show isolated areas of elevated concentrations in the Off Depot areas near MW-159, MW-144 and MW-150 (October only).

- Total CVOC concentrations and isopleths for April and October on Figures 27 and 28 are generally similar with a decreased concentration at MW-144 and increased concentrations at MW-150, MW-166/166A and MW-249 in October.
- TCE and TeCA concentrations and isopleths for April and October on Figures 29 to 32 are generally similar with decreased concentrations at MW-144 and increased concentrations at MW-150 in October.
- Only the TCE concentration at MW-159 exceeded the active treatment objective of 50 µg/L for individual CVOCs.

Thirty-four fluvial LTM wells are located in the Off Depot area. The most recent analytical results for the primary CVOCs (Table 17) are summarized as follows:

- Five wells exceeded the TC for TeCA, four of these wells exceeded the MCL for TCE, and one of these wells exceeded the TC for TCA and the MCL for VC. The highest concentration for each of the CVOCs was reported at MW-159 with TCE at 146 µg/L, TeCA at 8.36 µg/L, TCA at 3.25 µg/L and VC at 5.96 µg/L.
- One well, MW-149, exceeded the TC for CF with a concentration of 14.4 µg/L.
- CVOC concentrations in the remaining 28 wells did not exceed an MCL or TC, and concentrations in 11 wells did not exceed the RLs.

The following observations are based on review of the historical results and trend plots for the Off Depot LTM wells:

- Two fluvial Off Depot wells, MW-145 and MW-248, have never exceeded an MCL or TC. The remaining 32 wells had one or more CVOCs at concentrations above an MCL or TC

prior to the start of FSVE operations on Dunn Field in 2007. The trend plots at many Off Depot wells began to decrease after the FSVE start-up, with the timing depending on the distance from the Dunn Field boundary.

- Six fluvial Off Depot Wells had CVOC concentrations above MCLs or TCs in October 2017: MW-144, MW-149, MW-150, MW-159, MW-190 and MW-246.
    - MW-159 is located immediately upgradient of the AS/SVE system and has been the only Off Depot well to have individual CVOCs exceed the active remediation standard of 50 µg/L since April 2012. CVOC concentrations have decreased significantly due to the Dunn Field and Off Depot RAs but several CVOCs remain above MCLs or TCs, with TCE the primary contaminant at 146 µg/L in October 2017. The low concentrations reported in the April 2016 sample are not considered representative as discussed in the 2016 LTM report (HDR 2017c).
    - MW-246 is located immediately downgradient of the AS/SVE system. All CVOCs except TeCA have been below MCLs or TCs since AS/SVE operations resumed in March 2015.
    - MW-144 and MW-190 are located approximately 600 ft upgradient of the AS/SVE system. CVOC concentrations have decreased in both wells since the Dunn Field RAs were implemented but concentrations have been stable since October 2015 with TeCA above the TC and TCE above the MCL.
    - MW-150 is located near the eastern end of the AS/SVE system and downgradient of MW-144 and MW-190. Concentrations of TCE and TeCA concentrations were initially reduced below the MCL and the TC, respectively, in October 2014 and have ranged above and below since. The concentrations will likely continue that pattern as long as upgradient wells remain above MCLs or TCs.
    - MW-149 is located approximately 100 ft south of the western end of the AS/SVE system. CF, TCE and TeCA had the highest concentrations prior to remedial action. All CVOC concentrations at MW-149 were reduced below MCLs and TCs in October 2013 and remained below until October 2017 when CF was reported at 14.4 µg/L. CF concentrations have increased since October 2015, while the TCE and TeCA concentrations have been stable. Elevated CF concentrations are reported in wells from the southwest end of the Source Areas on Dunn Field (MW-87) to the south end of the AS/SVE system (MW-166/A and MW-149) and further south (MW-44, MW-249 and MW-145). The increased concentration at MW-149 is likely due to the increased concentration at MW-87 and groundwater migration to the west-northwest.

3.4.1.4 Background

The fluvial Dunn Field LTM wells located upgradient or at a distance from existing or previous contaminant plumes with no or low previous detections of primary CVOCs are considered background wells. Twelve fluvial LTM wells are identified as background wells for Dunn Field. The most recent analytical results for the primary CVOCs (Table 17) are summarized as follows:

- CVOC concentrations did not exceed an MCL or TC in any well, and concentrations in eight wells did not exceed the RLs.
- CF was detected above the RL in three wells, cDCE was detected above the RL in one well, and TCE was detected above the RL in two wells.

The following observations are based on review of the historical results for the Dunn Field Background LTM wells:

- None of the wells have had CVOCs at concentrations above an MCL or TC since 2009.
- Four wells have not had concentrations above RLs: MW-126, MW-154, MW-182 and MW-235.

3.4.2 Intermediate Aquifer/Upper Claiborne

Four LTM wells are screened in the IAQ/UC at Dunn Field. Three wells are sampled annually and one well is sampled biennially. CVOC concentrations detected above the RLs in the April 2017 samples are shown on Figure 33.

The most recent analytical results for the primary CVOCs in the IAQ/UC well samples are shown on Table 18; non-detect results are not listed. The results are listed by plume or area.

3.4.2.1 Off Depot

Three IAQ/UC wells (MW-237, MW-250 and MW-251) are installed in the Off Depot area. The most recent analytical results for the primary CVOCs (Table 18) are summarized as follows:

- No wells contained CVOC concentrations above MCLs or TCs. DCE was detected above the RL in two wells and CF was detected above the RL in one well.

The following observations are based on review of the historical results for the IAQ/UC Off Depot LTM wells:

- None of the wells have had CVOCs at concentrations above an MCL or TC. MW-250 has not had concentrations above RLs.

3.4.2.2 Background

One IAQ/UC LTM well (MW-169) is located at a background location. The most recent analytical results for the primary CVOCs (Table 18) are summarized as follows:

- MW-169 was sampled in April with no CVOC concentrations above MCLs or TCs; only cDCE was detected above the RL.

The following observations are based on review of the historical results for the IAQ/UC Off Depot LTM wells:

- MW-169 has had only cDCE detected above the RL in one sample, April 2017.

3.4.3 Memphis Aquifer

One Dunn Field LTM well (MW-67) is screened near the top of the Memphis Sand at a background location. The most recent analytical results for the primary CVOCs (Table 18) are summarized as follows:

- MW-67 was sampled in April with no CVOCs detected above RLs.

The following observations are based on review of the historical results for the IAQ/UC Off Depot LTM wells:

- MW-67 has not had CVOC concentrations above RLs.

3.4.4 MCL or TC Exceedances

The number of wells with primary CVOCs exceeding an MCL or TC in October 2017 are summarized by aquifer on Table 19; the maximum concentration for CVOCs exceeding MCLs in each area is also shown. The table was prepared using the results shown on Tables 17 and 18.

Concentrations exceeding the MCL or TC for one or more of the primary CVOCs were observed in 16 of 85 Dunn Field LTM wells. The wells with exceedances were all screened in the Fluvial Aquifer: 8 of 15 DF North wells, 2 of 19 DF West wells and 6 of 34 Off Depot wells. In 2016, there were 13 of 85 Dunn Field LTM wells with exceedances, all in the Fluvial Aquifer: 8 of 15 DF North wells, 1 of 19 DF West wells and 4 of 34 Off Depot wells.

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4 Conclusions and Recommendations

4.1 Hydrogeology

- Groundwater elevations have risen throughout DDMT since 2010; the increase may be due to above average annual rainfall in 2011, 2013, 2014 and 2016 (Table C-1). While the Fluvial Aquifer wells show a relatively smooth trend (Figure C-3), the IAQ and MAQ wells also have a semiannual variation with elevations higher in the spring and lower in the fall (Figure C-4). The semiannual variation in the deeper wells is likely due to higher groundwater extraction from the MAQ in the summer and fall.
- Groundwater flow in the Fluvial Aquifer is controlled by the surface of the uppermost clay in the Upper Claiborne (Figure 13), which forms the base of the Fluvial Aquifer.
    - Fluvial Aquifer groundwater elevation contours on the MI show a window in the northwest MI and a sink in the south-central MI (Figure 8). Groundwater flow is shown as generally onto the MI from all sides with flow off the MI through vertical leakage to the IAQ, and eventually to the MAQ, at the window and the sink.
    - Fluvial Aquifer groundwater elevation contours on Dunn Field show groundwater flow is to the west toward a trough approximately 1,200 ft west of Dunn Field, where flow diverges to the north or south (Figure 8).
- Groundwater flow in the upper IAQ at the northwestern MI is to the north (Figure 10), although that is based on a few wells.
- Groundwater flow in the MAQ is to the southwest based on a few wells on the MI and Dunn Field (Figure 12). The central section of the Allen Well Field is located to the west-northwest of the MI, which suggests the hydraulic gradient should be to the west.

4.2 Analytical Results

4.2.1 Main Installation

- Analytical results were similar to results from 2016; CVOC concentrations have increased or decreased at individual wells on the MI but the number of wells exceeding an MCL are about the same. Primary CVOC concentrations exceeded the MCL in 91 of 148 MI LTM wells in 2017. At wells sampled in both 2016 and 2017, MCLs were exceeded at 84 wells in 2016 and 85 wells in 2017. Although CVOC concentrations exceed the MCLs at a large number of MI LTM wells, the concentrations are relatively low. Only 15 wells, all screened in the Fluvial aquifer, have concentrations above 50 µg/L for one or more of the original contaminants (PCE, TCE and CT); the maximum concentrations in October 2017 were 270 µg/L for PCE, 146 µg/L for TCE and 73.1 µg/L for CT.
- cDCE and VC concentrations and reduced PCE and TCE concentrations indicate reductive dechlorination is still active at several wells in areas where EBT-1 or EBT-2

was conducted (e.g. MW-62, MW-100B, MW-203B, PMW85-01, PMW92-02 and PMW101-02B)). Other wells within the EBT areas have rebounded to pre-treatment concentrations for PCE and/or TCE (e.g., DR2-1, PMW21-02, PMW21-04 and MW-92).

- CVOC concentrations in four Phase 2 SRI wells exceeded the MCLs in 2017: MW-278, MW-279, MW-280 and MW-281.
    - MW-278 was installed off-site upgradient of TTA-1N in October 2016 and classified as a background well due to low CVOC concentrations in the initial sample. The increased PCE concentration in October 2017 (7.26 µg/L) provided further support, with MW-269, for the presence of an off-site source.
    - MW-279 was installed upgradient of DR1-5/5A near the southwest boundary of the MI in 2016. The PCE concentration has been above the MCL in all three samples and was 58.8 µg/L in October 2017; the well location indicates potential impact from an off-site source.
    - MW-280 was installed north of TTA-2 and upgradient of MW-267 in 2016; the PCE concentration was 8.15 µg/L in October 2017.
    - MW-281 was installed in the North-Central area cross-gradient from MW-258 in 2016 and exceeded the MCL for PCE and TCE in all three samples. The October 2017 concentrations were 15.3 µg/L for PCE and 66.2 µg/L for TCE.
- Off-site impacts have been confirmed at TTA-1 North by off-site wells MW-269 and MW-278. Additional off-site impacts are likely based on CVOC concentrations in wells located near the property boundary: MW-279 at TTA-1S and MW-263 at the North-Central area. Planned SRI Phase 3 wells at off-site locations upgradient of the TTA-1 North, TTA-1 South and North-Central areas will be installed once access agreements are completed with the property owners.
- TCE and cDCE concentrations detected at fluvial LTM well MW-270 on the southern MI boundary continued to decrease in 2017. Only TCE exceeded the MCL in October 2017 and the concentration of 25.5 µg/L was approximately 10% of the high concentration reported in July 2015. Additional investigation in this area is planned in SRI Phase 3.
- IAQ well MW-107, which is located at the upgradient section of the ‘window’, continued to show variable PCE concentrations; the concentrations in the two screened intervals decreased from approximately 79 µg/L in October 2016 to 7 µg/L in October 2017. MW-107 was installed in 2001 to evaluate potential contamination from Building 720, a Former Fuel and Cleaners Dispensing location; additional investigation in this area is planned during SRI Phase 3.
- CVOCs in the Fluvial Aquifer have migrated vertically into the IAQ through the window in the northwestern area of the MI. PCE and TCE concentrations at IAQ well MW-256 near the northwest MI boundary continue to decrease but remain above the MCLs at 24.5 µg/L for PCE and 8.58 µg/L for TCE in October 2017 (Figure 26). Additional investigation in this area and the area of the sink in the South-Central MI is planned in SRI Phase 3.
- CVOC concentrations remain below the MCL in the two wells screened in the Memphis Sand (MW-254 and MW-255). PCE concentrations in three upgradient wells screened in lower Upper Claiborne sands (MW-89, MW-140 and MW-202A) have increased since

2009 and exceeded the MCL in 2016; PCE concentrations decreased below the MCL in October 2017 at MW-89 and MW-202A but increased to 12 µg/L at MW-140. MW-140 is grouped with the MAQ window area wells based on location and screen depth (Figure 26).

4.2.2 Dunn Field

- The DF North plume remains the most obvious feature on Dunn Field CVOC concentration maps (Figures 27 to 30); eight wells in the plume exceeded MCLs for PCE, TCE and/or DCE in 2017. The plume is considered to result from a suspected, off-site source(s) upgradient of Dunn Field. Additional investigation was conducted in 2017.
    - A membrane interface probe survey was conducted in the northeast corner of Dunn Field in March 2017. The report (Trinity 2017) concluded there was no indication of on-site source materials contributing to elevated CVOC concentrations in groundwater.
    - Groundwater samples were collected in October 2017 from ten monitoring wells installed by TDEC during previous off-site investigations. The report (HDR, 2017f) stated CVOCs were detected above the RL in four wells, but only DCE was detected above the MCL in one well (CS-02); the upgradient limits of the off-site plumes for TCE and DCE, based on concentrations above the RL, were located on the Cintas site a few hundred feet north of Dunn Field. Analytical results for the TDEC wells were used for the October 2017 CVOC concentration maps (Figures 28, 30 and 32). The scope for additional off-site investigation is being developed by Army.
- Smaller isolated plumes with CVOC concentrations above MCLs or TCs are shown on the CVOC concentration maps (Figures 27 to 32). The plumes are located around a few wells in the DF West area (MW-87/MW-06, MW-57 and MW-70) and the Off Depot area (MW-144/MW-190, MW-150 and MW-159/MW-246).
- CVOC concentrations in the DF West wells were reduced below MCLs or TCs for all CVOCs between April 2007 and April 2012, and have remained below the limits in most wells since. The exceptions are three DF West wells which exceeded an MCL or TC in 2017: MW-57, MW-70 (April only) and MW-87. Only MW-87 exceeded an MCL or TC in 2016. The increased CVOC concentrations at these wells are considered to result from residual contamination in the vadose zone. Vadose zone modeling, conducted for the Year Four FSVE report (HDR 2011b), predicted that the maximum TCE concentrations from residual TCE in the loess would be observed 4 to 5 years after system operations ceased; the FSVE was shutdown in July 2012.
- CVOC concentrations above TCs or MCLs at Off Depot wells MW-144, MW-149, MW-150, MW-159, MW-190 and MW-246 are considered to represent residual groundwater contamination resulting from migration from the Dunn Field Source Areas. The concentrations are generally decreasing over time as uncontaminated groundwater flows through the area and residual contaminated groundwater passes through the AS/SVE

treatment area. Concentrations exceeded an MCL or TC at six Off Depot wells in 2017 as compared to four wells in 2016.

- Only two wells in the DF West and Off Depot areas have CVOCs at concentrations above the active treatment objective of 50 µg/L: CF at MW-87 and TCE at MW-159.
  - Additional RA is not currently planned at MW-87 since concentrations above a TC or MCL have not been consistently observed at adjacent wells.
  - Additional AS wells are to be installed upon completion of an access agreement with MLGW. The objective is to improve remediation of CVOCs in groundwater through installation of five new AS wells targeting MW-159 (Figure 3).

4.3 Changes to LTM for 2017

Sample frequencies were reviewed based on the following criteria:

- New wells will be sampled semiannually over 2 years prior to a frequency being determined.
- Wells with stable concentrations below the MCL in the eight most recent samples will be sampled biennially.
- Wells with stable concentrations approximately two times the MCL or less will be sampled annually.
- All other wells will be sampled semiannually.
- Exceptions to the criteria will be made as appropriate:
  - The MI wells screened in the Memphis Sand (MW-254 and MW-255) have not exceeded MCLs in samples collected since installation in 2010 but will continue to be sampled annually due to increased concentrations in upgradient wells.
  - The DF North wells, which commonly exceed an MCL (MW-07, MW-08, MW-31, MW-79, MW-129, MW-130, MW-220 and MW-230), will continue to be sampled annually until the need for remedial action is determined.
  - Off Depot wells installed adjacent to the AS/SVE system for performance monitoring (MW-241 to MW-247) will be sampled more frequently than required by the new criteria in order to monitor AS/SVE performance.

The recommended 2018 LTM sample schedules are shown on Table 20 for the MI and Table 21 for Dunn Field. Changes from the 2017 sample frequencies are noted on the tables.

The sample frequencies in 2017 for MI and Dunn Field LTM wells were semiannual (102), annual (70) and biennial (61); the recommended frequencies for 2018 are semiannual (105), annual (69) and biennial (58).

Recommended 2018 sample frequencies by aquifer are:

- Main Installation
  - 114 Fluvial Aquifer - semiannual (75), annual (22) and biennial (17);
  - 30 IAQ/UC - semiannual (14), annual (11) and biennial (5); and
  - 3 MAQ - semiannual (1) and annual (2).
- Dunn Field
  - 80 Fluvial Aquifer - semiannual (15), annual (32) and biennial (33);
  - 4 IAQ/UC - annual (2) and biennial (2); and
  - 1 MAQ - biennial.

Actions to be taken in 2018:

- Abandonment of Dunn Field well MW-33 was recommended in 2015 due to difficult access; it was abandoned by Trinity ADC in October 2018.
- Abandonment of MI well MW-257 was recommended in 2016 due to damage that could not be repaired; it was abandoned by HDR in July 2018 during SRI Phase 3.
- MI well PZ-03 was recommended for replacement due to its small diameter and difficulty in sampling; no samples could be collected in 2017. PZ-03 was replaced by installation of SRI Phase 3 well MW-297 in July 2018 and will be abandoned at a later date.

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Tables

TABLE 1
MAIN INSTALLATION LTM WELLS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Northing (ft)	Easting (ft)	Top of Casing Elevation (ft, NAVD)	Ground Elevation (ft, NAVD)	Riser Length (ft)	Screen Length (ft)	Total Well Depth (ft, btoc)
DR1-1	Fluvial	TTA-1S	276300	800856	293.14	293.42	121.7	20	141.7
DR1-1A	Fluvial	TTA-1S	276307	800863	293.00	293.37	89.2	20	109.2
DR1-2	Fluvial	TTA-1N	276537	801153	290.00	291.39	97.7	20	117.7
DR1-3	Fluvial	TTA-1S	276527	801416	290.93	291.11	109.7	20	129.7
DR1-4	Fluvial	TTA-1S	276231	801400	292.78	293.00	106.3	20	126.3
DR1-5	Fluvial	TTA-1S	276080	800828	294.46	294.86	124.7	20	144.7
DR1-5A	Fluvial	TTA-1S	276087	800835	294.51	294.87	90.0	20	110.0
DR1-6	Fluvial	TTA-1S	276044	801103	293.17	293.50	114.4	20	134.4
DR1-6A	Fluvial	TTA-1S	276035	801104	293.28	293.58	90.9	20	110.9
DR1-7	Fluvial	TTA-1N	276791	801441	289.15	289.46	108.3	20	128.3
DR1-8	Fluvial	TTA-1N	276752	800875	290.09	290.47	92.7	20	112.7
DR2-1	Fluvial	TTA-2	276772	806498	304.90	305.08	73.9	20	93.9
DR2-2	Fluvial	TTA-2	276771	806659	304.30	304.67	78.4	15	93.4
DR2-3	Fluvial	TTA-2	276539	806203	303.44	303.66	93.0	20	113.0
DR2-4	Fluvial	TTA-2	276456	806633	303.55	303.96	88.1	20	108.1
DR2-5	Fluvial	TTA-2	276831	806180	305.41	305.72	84.5	15	99.5
DR2-6	Fluvial	TTA-2	276644	805861	304.70	304.92	94.6	20	114.6
MW-16	Fluvial	Background	278838	807100	299.86	300.19	57.6	15	72.6
MW-19	Fluvial	Background	278946	800782	290.57	290.86	83.1	10	93.1
MW-21	Fluvial	TTA-1N	276473	800602	295.00	295.30	92.1	15	107.1
MW-22	Fluvial	TTA-1S	275912	800702	298.04	298.49	95.4	10	105.4
MW-23	Fluvial	Background	275791	801817	298.99	299.24	101.2	10	111.2
MW-24	Fluvial	Background	275616	803539	299.51	299.81	97.3	15	112.3
MW-25A	Fluvial	TTA-2	275975	805521	269.88	270.13	73.0	10	83.0
MW-26	Fluvial	TTA-2	276508	805962	303.69	303.89	97.6	10	107.6
MW-34	Intermediate	Window	279411	801918	299.97	300.80	136.6	20	156.6
MW-38	Intermediate	Window	279141	802450	307.45	308.45	139.9	15	154.9
MW-39	Fluvial	W-C	277281	802598	296.28	296.58	95.5	20	115.5
MW-39A	Upper Claiborne	W-C	277278	802608	298.61	298.70	148.1	20	168.1
MW-50	Fluvial	TTA-2	276456	807065	298.82	299.32	115.0	10	125.0
MW-52	Fluvial	SE	275372	805897	279.26	279.71	94.0	10	104.0
MW-53	Fluvial	Background	279177	805136	306.38	305.58	72.5	10	82.5
MW-55	Fluvial	Background	279301	801205	292.08	292.48	64.0	10	74.0
MW-62	Fluvial	B-835	278290	801858	293.71	293.90	86.1	10	96.1
MW-63A	Fluvial	N-C	278200	803573	305.96	306.33	130.0	10	140.0
MW-63B	Fluvial	N-C	278201	803558	305.78	306.22	115.0	10	125.0
MW-64	Fluvial	TTA-2	276952	805006	304.21	304.46	102.0	10	112.0
MW-66A	Fluvial	TTA-1N	276626	799793	284.22	284.34	74.6	20	94.6
MW-85	Fluvial	TTA-2	276704	806065	304.13	304.50	95.9	15	110.9
MW-88	Fluvial	TTA-2	276879	806513	305.15	305.47	82.0	15	97.0
MW-89	Intermediate	Window	278287	802555	303.98	304.38	147.0	30	177.0
MW-90	Intermediate	Window	278284	802540	304.19	304.64	115.0	30	145.0
MW-92	Fluvial	TTA-2	276614	806490	304.41	304.78	93.0	15	108.0
MW-93	Fluvial	Background	275542	804440	294.08	294.31	92.0	15	107.0
MW-94A	Fluvial	W-C	276806	803086	303.00	303.23	109.6	10	119.6
MW-96	Fluvial	TTA-2	276310	806320	289.02	289.67	75.5	20	95.5
MW-97	Fluvial	S-C	276074	802139	297.44	297.70	97.5	20	117.5
MW-98	Fluvial	W-C	276891	802573	294.43	294.93	137.0	10	147.0
MW-99	Fluvial	Background	277443	801115	285.33	285.69	91.5	20	111.5
MW-100B	Fluvial	TTA-1N	276601	800854	290.92	291.47	107.4	20	127.4
MW-101[1]	Fluvial	TTA-1S	276204	801110	291.74	291.98	89.0	15	104.0
MW-102B	Fluvial	Background	275761	800708	311.40	312.07	120.5	20	140.5
MW-103	Fluvial	N-C	278691	805160	301.37	301.89	70.0	20	90.0
MW-104	Fluvial	N-C	278676	805417	291.98	292.18	70.5	20	90.5

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Well	Aquifer	Area	Northing (ft)	Easting (ft)	Top of Casing Elevation (ft, NAVD)	Ground Elevation (ft, NAVD)	Riser Length (ft)	Screen Length (ft)	Total Well Depth (ft, btoc)
MW-107[1]	Upper Claiborne	Window	278419	803010	304.92	305.18	128.0	15	143.0
MW-108	Upper Claiborne	W-C	277658	802986	303.07	303.25	160.0	10	170.0
MW-113	Fluvial	TTA-2	276685	806279	304.81	304.92	96.0	10	106.0
MW-140	Memphis	Window	279061	801716	298.12	298.16	224.6	20	244.6
MW-141	Intermediate	Window	278019	802571	303.71	303.70	148.7	20	168.7
MW-142	Fluvial	B-835	278056	801629	291.18	291.49	85.0	20	105.0
MW-143	Fluvial	B-835	278301	801201	290.66	290.90	78.6	20	98.6
MW-197A	Upper Claiborne	W-C	276975	802042	291.64	291.54	161.7	15	176.7
MW-197B	Fluvial	W-C	276973	802037	291.43	291.43	93.8	15	108.8
MW-198	Fluvial	B-835	277776	802142	291.78	292.20	90.3	15	105.3
MW-199A	Intermediate	B835	277756	802574	301.90	301.84	146.1	15	161.1
MW-199B	Fluvial	B-835	277752	802576	302.06	302.07	104.6	15	119.6
MW-200	Fluvial	W-C	277006	802859	300.18	300.51	103.2	15	118.4
MW-202A	Intermediate	Window	278686	802111	299.67	299.69	176.2	15	191.2
MW-202B	Intermediate	Window	278693	802112	299.92	299.74	118.8	15	133.8
MW-203A	Upper Claiborne	W-C	276842	801740	290.70	290.80	142.9	20	162.9
MW-203B	Fluvial	W-C	276821	801742	290.87	291.10	93.0	20	113.0
MW-204A	Fluvial	W-C	276725	802168	292.59	292.49	133.3	15	148.3
MW-204B	Fluvial	W-C	276708	802167	292.71	293.00	94.9	15	109.9
MW-205A	Upper Claiborne	W-C	277157	802277	292.30	292.40	141.3	15	156.3
MW-205B	Fluvial	W-C	277173	802278	292.16	292.30	97.3	15	112.3
MW-206A	Fluvial	W-C	277219	802792	300.32	300.35	127.3	15	142.4
MW-206B	Fluvial	W-C	277201	802795	300.30	300.12	96.7	15	111.7
MW-207A	Upper Claiborne	W-C	277653	803192	304.05	304.45	149.9	15	164.9
MW-207B	Fluvial	W-C	277665	803193	304.06	304.42	108.5	15	123.5
MW-208A	Upper Claiborne	W-C	277382	802799	302.21	302.40	183.4	15	198.5
MW-208B	Fluvial	W-C	277397	802815	302.13	302.08	106.7	15	121.7
MW-209A	Intermediate	B-835	277574	802507	298.45	298.36	189.0	15	204.0
MW-209B	Fluvial	B-835	277582	802520	298.89	298.72	102.3	15	117.3
MW-210A	Intermediate	W-C	277239	801958	289.61	289.70	177.0	15	192.0
MW-210B	Fluvial	W-C	277228	801952	289.54	289.83	97.0	15	112.0
MW-211	Intermediate	Window	278001	802974	304.14	304.09	166.3	15	181.3
MW-212	Fluvial	B-835	278028	802225	295.74	295.68	85.3	15	100.3
MW-213	Fluvial	B-835	278427	801669	294.22	294.20	77.3	15	92.3
MW-214A	Upper Claiborne	N-C	277878	803907	304.01	303.96	119.1	15	134.1
MW-214B	Upper Claiborne	N-C	277876	803922	304.10	303.96	101.6	15	116.6
MW-215A	Upper Claiborne	N-C	277298	804164	304.97	304.86	128.8	15	143.8
MW-215B	Fluvial	N-C	277298	804177	305.03	304.98	105.4	15	120.4
MW-216	Fluvial	S-C	276025	801996	297.72	297.63	99.9	15	115.0
MW-217	Fluvial	TTA-2	276671	805214	304.65	304.51	101.8	15	116.8
MW-218	Fluvial	TTA-2	276937	805628	306.07	306.00	98.9	15	114.0
MW-219	Fluvial	TTA-1N	276429	800461	295.13	295.00	98.0	15	113.0
MW-229	Intermediate	Window	279294	802837	311.78	312.09	188.4	20	208.4
MW-252	Intermediate	Window	278789	801365	294.16	294.40	126.1	20	146.1
MW-253	Intermediate	Window	278287	801191	290.47	290.80	118.3	20	138.3
MW-254	Memphis	Window	279334	800858	292.84	293.28	285.8	20	305.8
MW-255	Memphis	Window	279305	801227	291.84	292.38	284.7	20	304.7
MW-256	Intermediate	Window	279302	801244	292.68	293.40	127.1	20	147.1
MW-258	Fluvial	N-C	278126	804427	304.37	304.83	79.3	20	99.3
MW-259	Fluvial	TTA-2	276279	804451	290.77	291.44	98.6	20	118.6
MW-260	Fluvial	N-C	278398	804376	304.16	304.45	68.0	20	88.3
MW-261	Fluvial	S-C	276391	802592	293.52	293.79	90.0	20	110.3
MW-262	Intermediate	Window	279334	800833	293.22	293.50	154.4	10	164.6
MW-263	Fluvial	N-C	278945	805817	291.40	291.78	69.1	10	79.3

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Well	Aquifer	Area	Northing (ft)	Easting (ft)	Top of Casing Elevation (ft, NAVD)	Ground Elevation (ft, NAVD)	Riser Length (ft)	Screen Length (ft)	Total Well Depth (ft, btoc)
MW-264	Upper Claiborne	N-C	278411	804590	303.72	304.00	104.8	10	115.0
MW-265	Fluvial	N-C	278112	804710	305.15	305.61	85.8	10	96.0
MW-266	Fluvial	TTA-2	277092	806686	304.68	305.10	77.1	10	87.3
MW-267	Fluvial	TTA-2	277161	806001	303.84	304.30	71.9	10	82.1
MW-268	Upper Claiborne	TTA-2	277204	805284	304.59	304.92	109.5	10	119.7
MW-269	Fluvial	TTA-1N	276369	800127	290.05	290.50	92.2	10	102.4
MW-270	Fluvial	SE	275483	805042	281.74	282.20	78.4	10	88.6
MW-271	Fluvial	S-C	276315	803774	294.91	295.50	134.7	10	144.9
MW-272	Fluvial	Background	275880	804037	293.27	293.70	112.8	10	123.0
MW-273	Intermediate	Window	279713	800122	284.73	285.00	128.1	10	138.3
MW-274	Fluvial	Background	275726	806543	294.30	294.60	89.3	10	99.5
MW-275	Fluvial	Background	275232	805306	272.31	272.59	80.5	10	90.7
MW-276	Fluvial	Background	275564	804697	288.68	288.91	87.5	10	97.7
MW-277	Fluvial	Background	275532	803998	301.67	301.96	102.3	10	112.5
MW-278	Fluvial	TTA-1N	276294	799814	292.18	292.46	91.0	10	101.2
MW-279	Fluvial	TTA-1S	275982	800579	299.89	300.17	112.0	10	122.2
MW-280	Fluvial	TTA-2	277390	806313	306.36	306.57	76.0	10	86.2
MW-281	Fluvial	N-C	278155	804123	304.56	305.03	81.7	10	91.9
MW-282	Fluvial	Background	278710	804033	307.81	308.14	76.0	10	86.2
MW-283	Fluvial	Background	278176	806074	304.34	304.87	77.0	10	87.2
PMW21-01	Fluvial	TTA-1N	276533	800600	294.76	295.00	88.4	20	108.4
PMW21-02	Fluvial	TTA-1N	276575	800701	292.98	293.19	91.3	20	111.3
PMW21-03	Fluvial	TTA-1N	276573	800743	292.11	292.72	90.3	20	110.3
PMW21-04	Fluvial	TTA-1N	276602	800772	291.87	292.20	89.0	20	109.0
PMW21-05	Fluvial	TTA-1N	276628	801130	288.53	288.92	94.3	20	114.3
PMW85-01	Fluvial	TTA-2	276802	806146	305.08	305.39	93.2	10	103.2
PMW85-05	Fluvial	TTA-2	276752	806222	305.12	305.32	93.2	10	103.2
PMW92-02	Fluvial	TTA-2	276667	806476	304.17	304.35	94.8	10	104.8
PMW92-03	Fluvial	TTA-2	276679	806439	303.91	304.17	92.5	10	102.5
PMW101-02A	Fluvial	TTA-1S	276282	801145	292.00	292.29	117.7	20	137.7
PMW101-02B	Fluvial	TTA-1S	276286	801145	291.98	292.24	97.8	20	117.8
PMW101-03A	Fluvial	TTA-1S	276348	801198	291.61	291.99	119.2	20	139.2
PMW101-03B	Fluvial	TTA-1S	276353	801194	291.55	291.82	99.3	20	119.3
PMW101-04A	Fluvial	TTA-1S	276299	801182	291.07	291.43	117.9	20	137.9
PMW101-04B	Fluvial	TTA-1S	276296	801187	291.47	291.75	98.6	20	118.6
PMW101-06A	Fluvial	TTA-1S	276192	801187	292.13	292.72	120.0	20	140.0
PMW101-06B	Fluvial	TTA-1S	276195	801184	292.17	292.40	99.3	20	119.3
PMW101-07A	Fluvial	TTA-1S	276143	801172	292.20	292.52	117.9	20	137.9
PMW101-07B	Fluvial	TTA-1S	276142	801177	292.36	292.70	98.0	20	118.0
PZ-03	Fluvial	S-C	276379	802941	298.51	298.98	108.9	10	118.9

Notes:
1: MW-101 has three screened sections at the following depths (ft, btoc): 89-104, 109-119 and 124-134.
2: MW-107 has two screened sections at the following depths (ft, btoc): 128-143 and 148-158.
ft: feet
btoc: below top of casing
NAVD: North American Vertical Datum of 1988

TABLE 2
DUNN FIELD LTM WELLS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Northing (ft)	Easting (ft)	Top of Casing Elevation (ft, NAVD)	Ground Elevation (ft, NAVD)	Riser Length (ft)	Screen Length (ft)	Total Well Depth (ft, btoc)
MW-03	Fluvial	DF North	281596	802101	292.35	290.40	65.5	10	75.5
MW-04	Fluvial	Background	281279	802369	301.61	300.00	60.0	20	80.0
MW-06	Fluvial	DF West	280604	802069	289.11	288.10	51.0	20	71.0
MW-07	Fluvial	DF North	281840	802482	295.10	293.10	67.0	10	77.0
MW-08	Fluvial	DF North	282001	802728	292.59	292.74	56.5	10	66.5
MW-13	Fluvial	Background	281034	802369	300.01	300.10	66.0	15	81.0
MW-15	Fluvial	DF West	280349	801985	295.12	295.23	63.4	15	78.4
MW-28	Fluvial	Background	281569	803154	294.79	294.89	54.3	15	69.3
MW-31	Fluvial	DF North	281652	801784	290.37	287.50	64.1	15	79.1
MW-44	Fluvial	Off Depot	281074	800601	269.07	269.40	64.0	10	74.0
MW-54	Fluvial	Off Depot	281159	801184	295.39	295.57	84.5	10	94.5
MW-57	Fluvial	DF West	280184	802006	290.77	291.10	60.0	10	70.0
MW-58	Fluvial	Background	279845	802066	290.51	290.70	57.0	10	67.0
MW-67	Memphis	Background	280473	800934	278.21	275.53	260.0	15	275.0
MW-68	Fluvial	DF North	281501	802040	291.69	291.60	72.5	10	82.5
MW-69	Fluvial	DF West	281203	802011	307.02	304.90	82.1	10	92.1
MW-70	Fluvial	DF West	281030	801988	304.99	302.80	80.8	10	90.8
MW-71	Fluvial	DF West	280585	801805	294.40	291.90	65.5	10	75.5
MW-76	Fluvial	Off Depot	281312	801643	302.71	303.30	73.0	20	93.0
MW-77	Fluvial	Off Depot	281143	801815	304.42	304.70	68.0	20	88.0
MW-78	Fluvial	DF North	282052	802065	275.00	275.40	44.5	20	64.5
MW-79	Fluvial	DF North	281794	800899	285.03	285.40	82.5	20	102.5
MW-80	Fluvial	Background	281418	800199	273.81	274.00	53.0	20	73.0
MW-87	Fluvial	DF West	280696	802039	294.93	292.80	63.0	15	78.0
MW-91	Fluvial	DF West	280475	802014	291.99	289.30	55.0	15	70.0
MW-126	Fluvial	Background	282390	800492	252.22	252.49	16.0	10	26.0
MW-129	Fluvial	DF North	282271	803129	293.01	293.33	65.0	15	80.0
MW-130	Fluvial	DF North	282117	803241	293.17	293.77	59.5	20	79.5
MW-134	Fluvial	DF West	281013	802103	300.81	301.05	75.0	15	90.0
MW-144	Fluvial	Off Depot	281139	801529	291.60	291.89	55.9	20	76.3
MW-145	Fluvial	Off Depot	280968	800823	284.72	284.86	76.6	20	97.0
MW-147	Fluvial	DF North	281502	801674	289.76	289.93	57.8	20	78.1
MW-148	Fluvial	Off Depot	281378	801462	294.71	294.87	67.8	20	88.1
MW-149	Fluvial	Off Depot	281130	800983	287.18	287.44	81.6	20	101.9
MW-150	Fluvial	Off Depot	281240	801284	296.86	297.00	71.2	20	91.4
MW-151	Fluvial	Off Depot	281290	800875	284.27	284.42	76.5	20	96.8
MW-152	Fluvial	Off Depot	281516	800893	289.59	289.82	90.9	20	111.1
MW-153	Fluvial	DF North	282119	800952	279.17	279.26	76.1	20	96.3
MW-154	Fluvial	Background	280502	800919	273.81	274.07	52.5	15	67.7
MW-155	Fluvial	Off Depot	281325	801169	291.54	291.83	76.6	20	96.8
MW-157	Fluvial	Off Depot	281051	801348	286.47	286.55	57.0	20	77.3
MW-158	Fluvial	Off Depot	281434	801005	294.07	294.38	91.1	15	106.6
MW-158A	Fluvial	Off Depot	281444	801006	293.95	294.22	78.4	15	93.6
MW-159	Fluvial	Off Depot	281304	801007	286.36	286.68	79.3	20	99.5
MW-160	Fluvial	Off Depot	281367	801304	293.84	294.13	65.8	20	86.0
MW-163	Fluvial	Off Depot	281153	801487	290.63	290.81	56.5	20	76.7
MW-164	Fluvial	Off Depot	280998	801497	287.48	287.71	55.3	20	75.5
MW-165	Fluvial	Off Depot	281385	800855	287.06	287.35	88.1	15	103.3
MW-165A	Fluvial	Off Depot	281384	800866	287.26	287.53	71.3	15	86.5
MW-166	Fluvial	Off Depot	281225	800928	282.72	283.29	84.2	15	99.4
MW-166A	Fluvial	Off Depot	281213	800927	282.90	283.36	67.6	15	82.8
MW-167	Fluvial	Background	281394	800619	284.82	285.21	67.7	15	82.9
MW-169	Upper Claiborne	Background	282491	800957	261.90	262.17	68.0	20	88.2
MW-170	Fluvial	Background	282443	801260	273.75	273.98	59.7	20	79.9
MW-171	Fluvial	DF North	282315	801058	270.69	271.02	53.2	15	68.4
MW-174	Fluvial	DF West	280352	802092	296.56	296.83	67.0	10	77.0
MW-176	Fluvial	DF West	280824	802032	299.68	299.92	76.0	10	86.0

TABLE 2
DUNN FIELD LTM WELLS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Northing (ft)	Easting (ft)	Top of Casing Elevation (ft, NAVD)	Ground Elevation (ft, NAVD)	Riser Length (ft)	Screen Length (ft)	Total Well Depth (ft, btoc)
MW-180	Fluvial	DF North	281476	802132	296.14	296.39	72.0	10	82.0
MW-182	Fluvial	Background	280524	800623	272.63	272.90	59.2	10	69.2
MW-184	Fluvial	Off Depot	280903	801442	283.12	283.34	58.0	10	68.0
MW-187	Fluvial	Background	280563	802348	302.74	303.21	76.0	10	86.0
MW-190	Fluvial	Off Depot	281139	801596	297.32	297.58	78.0	10	88.0
MW-220	Fluvial	DF North	281617	802167	293.29	290.31	64.9	15	79.9
MW-221	Fluvial	DF West	281400	802100	301.52	298.37	73.1	15	88.1
MW-222	Fluvial	DF West	280986	802146	303.82	301.06	74.2	15	89.2
MW-223	Fluvial	DF West	280914	802104	303.00	300.41	73.9	15	88.9
MW-224	Fluvial	DF West	281018	802182	304.13	301.18	73.7	15	88.7
MW-225	Fluvial	DF West	280947	802071	304.52	301.30	75.0	15	90.0
MW-226	Fluvial	DF West	280932	802147	303.19	300.56	74.2	15	89.2
MW-227	Fluvial	DF West	280258	802081	299.70	296.64	63.6	15	78.6
MW-228	Fluvial	DF West	280252	802157	301.65	298.59	64.1	15	79.1
MW-230	Fluvial	DF North	281843	802800	286.57	286.66	59.2	15	74.2
MW-235	Fluvial	Background	280728	800448	264.00	264.21	50.6	10	60.8
MW-237	Intermediate	Off Depot	281356	800964	289.18	289.53	166.5	10	176.7
MW-241	Fluvial	Off Depot	281390	801397	292.97	293.16	73.4	15	88.4
MW-242	Fluvial	Off Depot	281297	801229	295.40	295.94	73.2	16	88.7
MW-243	Fluvial	Off Depot	281371	801116	292.26	292.53	80.7	20	100.7
MW-244	Fluvial	Off Depot	281333	801101	288.72	289.45	76.3	20	96.3
MW-245	Fluvial	Off Depot	281379	801035	290.48	290.62	85.1	20	105.1
MW-246	Fluvial	Off Depot	281387	800952	288.17	288.49	85.2	20	105.2
MW-247	Fluvial	Off Depot	281319	800900	286.17	286.63	80.5	20	100.5
MW-248	Fluvial	Off Depot	281254	800720	275.45	275.93	67.5	20	87.5
MW-249	Fluvial	Off Depot	281030	800790	285.53	285.89	78.0	20	98.0
MW-250	Intermediate	Off Depot	281046	800900	289.66	290.19	168.7	15	183.7
MW-251	Intermediate	Off Depot	281212	801022	285.83	286.16	160.2	15	175.2

Notes:
ft: feet
btoc: below top of casing
NAVD: North American Vertical Datum of 1988

TABLE 3
2017 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	Semiannual Apr-2017	Annual Oct-2017
DR1-1	Fluvial	TTA-1S	Biennial	-	-
DR1-1A	Fluvial	TTA-1S	Biennial	-	-
DR1-2	Fluvial	TTA-1N	Biennial	-	-
DR1-3	Fluvial	TTA-1S	Semiannual	S	S
DR1-4	Fluvial	TTA-1S	Annual	-	S
DR1-5	Fluvial	TTA-1S	Semiannual	S	S
DR1-5A	Fluvial	TTA-1S	Semiannual	S	S
DR1-6	Fluvial	TTA-1S	Semiannual	S	S
DR1-6A	Fluvial	TTA-1S	Annual	S	B
DR1-7	Fluvial	TTA-1N	Biennial	-	-
DR1-8	Fluvial	TTA-1N	Biennial	-	-
DR2-1	Fluvial	TTA-2	Semiannual	S	S
DR2-2	Fluvial	TTA-2	Annual	S	S
DR2-3	Fluvial	TTA-2	Annual	S	S
DR2-4	Fluvial	TTA-2	Annual	-	S
DR2-5	Fluvial	TTA-2	Annual	LF	B
DR2-6	Fluvial	TTA-2	Semiannual	S	S
MW-16	Fluvial	Background	Biennial	-	-
MW-19	Fluvial	Background	Biennial	-	-
MW-21	Fluvial	TTA-1N	Semiannual	S	S
MW-22	Fluvial	TTA-1S	Biennial	-	-
MW-23	Fluvial	Background	Biennial	-	-
MW-24	Fluvial	Background	Biennial	-	-
MW-25A	Fluvial	TTA-2	Annual	-	S
MW-26	Fluvial	TTA-2	Semiannual	S	S
MW-34	Intermediate	Window	Annual	-	S
MW-38	Intermediate	Window	Biennial	-	-
MW-39	Fluvial	W-C	Semiannual	S	S
MW-39A	Upper Claiborne	W-C	Semiannual	S	S
MW-50	Fluvial	TTA-2	Annual	-	S
MW-52	Fluvial	SE	Annual	-	S
MW-53	Fluvial	Background	Biennial	-	-
MW-55	Fluvial	Background	Biennial	-	-
MW-62	Fluvial	B-835	Semiannual	S	S
MW-63A	Fluvial	N-C	Biennial	-	-
MW-63B	Fluvial	N-C	Annual	-	S
MW-64	Fluvial	TTA-2	Semiannual	S	S
MW-66A	Fluvial	TTA-1N	Biennial	-	-
MW-85	Fluvial	TTA-2	Semiannual	S	S
MW-88	Fluvial	TTA-2	Semiannual	S	S
MW-89	Intermediate	Window	Semiannual	S	S
MW-90	Intermediate	Window	Semiannual	S	S
MW-92	Fluvial	TTA-2	Semiannual	S	S
MW-93	Fluvial	Background	Biennial	-	-
MW-94A	Fluvial	W-C	Semiannual	S	S
MW-96	Fluvial	TTA-2	Annual	-	S
MW-97	Fluvial	S-C	Semiannual	S	S
MW-98	Fluvial	W-C	Semiannual	S	S
MW-99	Fluvial	Background	Biennial	-	-
MW-100B	Fluvial	TTA-1N	Semiannual	S	S
MW-101[1]	Fluvial	TTA-1S	Semiannual	S	S
MW-102B	Fluvial	Background	Biennial	-	-
MW-103	Fluvial	N-C	Annual	-	S
MW-104	Fluvial	N-C	Semiannual	S	S
MW-107[1]	Upper Claiborne	Window	Semiannual	S	S
MW-108	Upper Claiborne	W-C	Semiannual	S	S

TABLE 3
2017 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	Semiannual Apr-2017	Annual Oct-2017
MW-113	Fluvial	TTA-2	Semiannual	S	S
MW-140	Memphis	Window	Semiannual	S	S
MW-141	Intermediate	Window	Semiannual	S	S
MW-142	Fluvial	B-835	Annual	-	S
MW-143	Fluvial	B-835	Annual	S	S
MW-197A	Upper Claiborne	W-C	Semiannual	S	S
MW-197B	Fluvial	W-C	Semiannual	S	S
MW-198	Fluvial	B-835	Annual	-	S
MW-199A	Intermediate	B-835	Annual	-	S
MW-199B	Fluvial	B-835	Semiannual	S	S
MW-200	Fluvial	W-C	Annual	S	S
MW-202A	Intermediate	Window	Semiannual	S	S
MW-202B	Intermediate	Window	Semiannual	S	S
MW-203A	Upper Claiborne	W-C	Annual	S	B
MW-203B	Fluvial	W-C	Semiannual	S	LF
MW-204A	Fluvial	W-C	Semiannual	S	S
MW-204B	Fluvial	W-C	Semiannual	S	S
MW-205A	Upper Claiborne	W-C	Semiannual	S	S
MW-205B	Fluvial	W-C	Semiannual	S	S
MW-206A	Fluvial	W-C	Semiannual	S	S
MW-206B	Fluvial	W-C	Semiannual	S	S
MW-207A	Upper Claiborne	W-C	Semiannual	S	S
MW-207B	Fluvial	W-C	Semiannual	S	S
MW-208A	Upper Claiborne	W-C	Semiannual	S	S
MW-208B	Fluvial	W-C	Semiannual	S	S
MW-209A	Intermediate	B-835	Semiannual	S	S
MW-209B	Fluvial	B-835	Semiannual	S	S
MW-210A	Intermediate	W-C	Annual	S	S
MW-210B	Fluvial	W-C	Semiannual	S	S
MW-211	Intermediate	Window	Biennial	-	-
MW-212	Fluvial	B-835	Semiannual	S	S
MW-213	Fluvial	B-835	Semiannual	B	B
MW-214A	Upper Claiborne	N-C	Annual	-	S
MW-214B	Upper Claiborne	N-C	Annual	-	S
MW-215A	Upper Claiborne	N-C	Annual	-	S
MW-215B	Fluvial	N-C	Annual	-	S
MW-216	Fluvial	S-C	Biennial	-	-
MW-217	Fluvial	TTA-2	Semiannual	S	S
MW-218	Fluvial	TTA-2	Semiannual	S	S
MW-219	Fluvial	TTA-1N	Semiannual	S	S
MW-229	Intermediate	Window	Biennial	-	-
MW-252	Intermediate	Window	Biennial	-	-
MW-253	Intermediate	Window	Annual	-	S
MW-254	Memphis	Window	Annual	-	S
MW-255	Memphis	Window	Annual	-	S
MW-256	Intermediate	Window	Semiannual	S	S
MW-258	Fluvial	N-C	Semiannual	S	S
MW-259	Fluvial	TTA-2	Semiannual	S	S
MW-260	Fluvial	N-C	Annual	-	S
MW-261	Fluvial	S-C	Annual	-	S
MW-262	Intermediate	Window	Annual	S	S
MW-263	Fluvial	N-C	Semiannual	S	S
MW-264	Upper Claiborne	N-C	Annual	S	S
MW-265	Fluvial	N-C	Semiannual	S	S
MW-266	Fluvial	TTA-2	Semiannual	S	S
MW-267	Fluvial	TTA-2	Semiannual	S	S

TABLE 3
2017 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	Semiannual Apr-2017	Annual Oct-2017
MW-268	Upper Claiborne	TTA-2	Annual	S	S
MW-269	Fluvial	TTA-1N	Semiannual	S	S
MW-270	Fluvial	SE	Semiannual	S	S
MW-271	Fluvial	S-C	Annual	S	S
MW-272	Fluvial	Background	Annual	S	S
MW-273	Intermediate	Window	Annual	S	S
MW-274	Fluvial	Background	Semiannual	LF	LF
MW-275	Fluvial	Background	Semiannual	LF	S
MW-276	Fluvial	Background	Semiannual	LF	S
MW-277	Fluvial	Background	Semiannual	LF	S
MW-278	Fluvial	TTA-1N	Semiannual	LF	S
MW-279	Fluvial	TTA-1S	Semiannual	LF	S
MW-280	Fluvial	TTA-2	Semiannual	LF	S
MW-281	Fluvial	N-C	Semiannual	LF	S
MW-282	Fluvial	Background	Semiannual	LF	S
MW-283	Fluvial	Background	Semiannual	LF	LF
PMW21-01	Fluvial	TTA-1N	Semiannual	S	S
PMW21-02	Fluvial	TTA-1N	Semiannual	S	S
PMW21-03	Fluvial	TTA-1N	Semiannual	S	S
PMW21-04	Fluvial	TTA-1N	Semiannual	S	S
PMW21-05	Fluvial	TTA-1N	Semiannual	S	S
PMW-85-01	Fluvial	TTA-2	Semiannual	S	S
PMW-85-05	Fluvial	TTA-2	Semiannual	S	S
PMW92-02	Fluvial	TTA-2	Semiannual	S	S
PMW92-03	Fluvial	TTA-2	Semiannual	S	S
PMW101-02A	Fluvial	TTA-1S	Semiannual	LF	S
PMW101-02B	Fluvial	TTA-1S	Semiannual	S	S
PMW101-03A	Fluvial	TTA-1S	Semiannual	S	S
PMW101-03B	Fluvial	TTA-1S	Semiannual	S	S
PMW101-04A	Fluvial	TTA-1S	Semiannual	S	S
PMW101-04B	Fluvial	TTA-1S	Semiannual	S	S
PMW101-06A	Fluvial	TTA-1S	Annual	S	S
PMW101-06B	Fluvial	TTA-1S	Semiannual	S	S
PMW101-07A	Fluvial	TTA-1S	Annual	S	S
PMW101-07B	Fluvial	TTA-1S	Semiannual	S	S
PZ-03	Fluvial	S-C	Semiannual	NS	NS

Notes:

1) Samples to be collected from two screened intervals in MW-101 and MW-107

PDB: Passive diffusion bag

P: Sample planned

S: Sample collected with PDB

LF: Sample collected with bladder pump by low-flow method

B: Sample collected with disposable bailer

NS: Sample not collected

-: Sample not planned or collected

TABLE 4
2017 DUNN FIELD SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	Biennial Apr-2017	Semiannual Oct-2017
MW-03	Fluvial	North	Annual	S	-
MW-04	Fluvial	Background	Biennial	S	-
MW-06	Fluvial	DF West	Annual	S	S
MW-07	Fluvial	North	Annual	S	-
MW-08	Fluvial	North	Annual	LF	-
MW-13	Fluvial	Background	Biennial	S	-
MW-15	Fluvial	DF West	Biennial	S	-
MW-28	Fluvial	Background	Biennial	S	-
MW-31	Fluvial	North	Annual	S	-
MW-44	Fluvial	Off Depot	Annual	S	-
MW-54	Fluvial	Off Depot	Annual	S	-
MW-57	Fluvial	DF West	Biennial	S	S
MW-58	Fluvial	Background	Biennial	LF	-
MW-67	Memphis	Background	Biennial	S	-
MW-68	Fluvial	North	Biennial	S	-
MW-69	Fluvial	DF West	Biennial	S	-
MW-70	Fluvial	DF West	Biennial	S	S
MW-71	Fluvial	DF West	Annual	S	-
MW-76	Fluvial	Off Depot	Biennial	S	-
MW-77	Fluvial	Off Depot	Semiannual	S	S
MW-78	Fluvial	North	Biennial	S	-
MW-79	Fluvial	North	Annual	S	-
MW-80	Fluvial	Background	Biennial	S	-
MW-87	Fluvial	DF West	Semiannual	S	S
MW-91	Fluvial	DF West	Biennial	S	-
MW-126	Fluvial	Background	Biennial	LF	-
MW-129	Fluvial	North	Annual	S	-
MW-130	Fluvial	North	Annual	S	-
MW-134	Fluvial	DF West	Biennial	S	-
MW-144	Fluvial	Off Depot	Semiannual	S	S
MW-145	Fluvial	Off Depot	Annual	S	-
MW-147	Fluvial	North	Biennial	S	-
MW-148	Fluvial	Off Depot	Biennial	S	-
MW-149	Fluvial	Off Depot	Semiannual	S	S
MW-150	Fluvial	Off Depot	Semiannual	S	S
MW-151	Fluvial	Off Depot	Annual	S	-
MW-152	Fluvial	Off Depot	Annual	S	-
MW-153	Fluvial	North	Biennial	S	-
MW-154	Fluvial	Background	Biennial	S	-
MW-155	Fluvial	Off Depot	Annual	S	-
MW-157	Fluvial	Off Depot	Annual	S	-
MW-158	Fluvial	Off Depot	Annual	S	-
MW-158A	Fluvial	Off Depot	Annual	S	-
MW-159	Fluvial	Off Depot	Semiannual	S	S
MW-160	Fluvial	Off Depot	Annual	S	-
MW-163	Fluvial	Off Depot	Semiannual	S	S
MW-164	Fluvial	Off Depot	Annual	S	-
MW-165	Fluvial	Off Depot	Semiannual	S	S
MW-165A	Fluvial	Off Depot	Annual	S	-
MW-166	Fluvial	Off Depot	Semiannual	S	S
MW-166A	Fluvial	Off Depot	Semiannual	S	S
MW-167	Fluvial	Background	Biennial	S	-
MW-169	Upper Claiborne	Background	Biennial	S	-
MW-170	Fluvial	Background	Biennial	S	-
MW-171	Fluvial	North	Biennial	S	-
MW-174	Fluvial	DF West	Annual	S	-

TABLE 4
2017 DUNN FIELD SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	Biennial Apr-2017	Semiannual Oct-2017
MW-176	Fluvial	DF West	Biennial	S	-
MW-180	Fluvial	North	Biennial	S	-
MW-182	Fluvial	Background	Biennial	S	-
MW-184	Fluvial	Off Depot	Annual	S	-
MW-187	Fluvial	Background	Biennial	S	-
MW-190	Fluvial	Off Depot	Semiannual	S	S
MW-220	Fluvial	North	Annual	S	-
MW-221	Fluvial	DF West	Biennial	S	-
MW-222	Fluvial	DF West	Biennial	S	-
MW-223	Fluvial	DF West	Biennial	S	-
MW-224	Fluvial	DF West	Biennial	S	-
MW-225	Fluvial	DF West	Biennial	S	-
MW-226	Fluvial	DF West	Biennial	S	-
MW-227	Fluvial	DF West	Biennial	S	-
MW-228	Fluvial	DF West	Biennial	S	-
MW-230	Fluvial	North	Annual	S	-
MW-235	Fluvial	Background	Biennial	S	-
MW-237	Intermediate	Off Depot	Annual	S	-
MW-241	Fluvial	Off Depot	Annual	S	-
MW-242	Fluvial	Off Depot	Annual	S	-
MW-243	Fluvial	Off Depot	Annual	S	-
MW-244	Fluvial	Off Depot	Annual	S	-
MW-245	Fluvial	Off Depot	Annual	S	-
MW-246	Fluvial	Off Depot	Semiannual	S	S
MW-247	Fluvial	Off Depot	Annual	S	-
MW-248	Fluvial	Off Depot	Biennial	S	-
MW-249	Fluvial	Off Depot	Semiannual	S	S
MW-250	Intermediate	Off Depot	Biennial	S	-
MW-251	Intermediate	Off Depot	Annual	S	-

Notes:
PDB: Passive diffusion bag
P: Sample planned
S: Sample collected with PDB
LF: Sample collected with bladder pump by low-flow method
-: Sample not planned or collected

TABLE 5
MAIN INSTALLATION WATER LEVEL MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Top of Casing Elevation (ft, NAVD)	Top of Screen Elevation (ft, NAVD)	Depth to Water 18-Apr-17 (ft, btoc)	Groundwater Elevation 18-Apr-17 (ft, NAVD)	Depth to Water 5-Oct-17 (ft, btoc)	Groundwater Elevation 5-Oct-17 (ft, NAVD)
DR1-1	Fluvial	293.14	171.4	84.40	208.74	84.32	208.82
DR1-1A	Fluvial	293.00	203.8	84.15	208.85	84.05	208.95
DR1-2	Fluvial	290.00	192.3	81.97	208.03	81.88	208.12
DR1-3	Fluvial	290.93	181.3	83.80	207.13	83.65	207.28
DR1-4	Fluvial	292.78	186.5	84.50	208.28	84.37	208.41
DR1-5	Fluvial	294.46	169.8	85.59	208.87	85.25	209.21
DR1-5A	Fluvial	294.51	204.5	85.88	208.63	85.87	208.64
DR1-6	Fluvial	293.17	178.7	84.36	208.81	84.24	208.93
DR1-6A	Fluvial	293.28	202.4	84.67	208.61	84.37	208.91
DR1-7	Fluvial	289.15	180.9	82.25	206.90	82.18	206.97
DR1-8	Fluvial	290.09	197.4	81.53	208.56	81.39	208.70
DR2-1	Fluvial	304.90	231.0	86.25	218.65	86.20	218.70
DR2-2	Fluvial	304.30	225.9	78.68	225.62	77.19	227.11
DR2-3	Fluvial	303.44	210.4	91.87	211.57	91.55	211.89
DR2-4	Fluvial	303.55	215.5	89.58	213.97	89.37	214.18
DR2-5	Fluvial	305.41	221.0	92.79	212.62	92.62	212.79
DR2-6	Fluvial	304.70	210.1	94.70	210.00	94.41	210.29
MW-16	Fluvial	299.86	242.3	56.35	243.51	55.93	243.93
MW-19	Fluvial	290.57	207.5	79.52	211.05	79.53	211.04
MW-21	Fluvial	295.00	202.9	85.50	209.50	85.34	209.66
MW-22	Fluvial	298.04	202.6	88.45	209.59	88.20	209.84
MW-23	Fluvial	298.99	197.8	90.43	208.56	90.24	208.75
MW-24	Fluvial	299.51	202.2	95.10	204.41	95.07	204.44
MW-25A	Fluvial	269.88	196.9	63.16	206.72	62.99	206.89
MW-26	Fluvial	303.69	206.1	93.15	210.54	92.91	210.78
MW-34	Intermediate	299.97	163.4	118.22	181.75	121.60	178.37
MW-38	Intermediate	307.45	167.5	115.50	191.95	117.21	190.24
MW-39	Fluvial	296.28	200.8	93.17	203.11	93.30	202.98
MW-39A	Upper Claiborne	298.61	150.5	93.48	205.13	93.61	205.00
MW-50	Fluvial	298.82	183.8	81.27	217.55	81.64	217.18
MW-52	Fluvial	279.26	185.3	71.77	207.49	71.53	207.73
MW-53	Fluvial	306.38	233.9	72.88	233.50	72.71	233.67
MW-55	Fluvial	292.08	228.1	69.78	222.30	69.61	222.47
MW-62	Fluvial	293.71	207.7	86.74	206.97	86.44	207.27
MW-63A	Fluvial	305.96	176.0	95.05	210.91	95.33	210.63
MW-63B	Fluvial	305.78	190.8	94.73	211.05	95.00	210.78
MW-64	Fluvial	304.21	202.2	98.75	205.46	98.65	205.56
MW-66A	Fluvial	284.22	209.6	72.57	211.65	72.41	211.81
MW-85	Fluvial	304.13	208.2	93.02	211.11	92.83	211.30
MW-88	Fluvial	305.15	223.2	76.97	228.18	76.94	228.21
MW-89	Intermediate	303.98	157.0	103.21	200.77	104.27	199.71
MW-90	Intermediate	304.19	189.2	103.77	200.42	104.90	199.29
MW-92	Fluvial	304.41	211.4	91.29	213.12	91.01	213.40
MW-93	Fluvial	294.08	202.1	90.41	203.67	90.41	203.67
MW-94A	Fluvial	303.00	193.4	98.38	204.62	98.45	204.55
MW-96	Fluvial	289.02	213.5	76.72	212.30	76.31	212.71
MW-97	Fluvial	297.44	199.9	90.05	207.39	89.87	207.57
MW-98	Fluvial	294.43	157.4	89.28	205.15	89.02	205.41
MW-99	Fluvial	285.33	193.8	78.20	207.13	78.63	206.70
MW-100B	Fluvial	290.92	183.6	82.38	208.54	83.32	207.60
MW-101	Fluvial	291.74	202.7	83.02	208.72	82.82	208.92
MW-102B	Fluvial	311.40	190.9	101.40	210.00	101.32	210.08

TABLE 5
MAIN INSTALLATION WATER LEVEL MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Top of Casing Elevation (ft, NAVD)	Top of Screen Elevation (ft, NAVD)	Depth to Water 18-Apr-17 (ft, btoc)	Groundwater Elevation 18-Apr-17 (ft, NAVD)	Depth to Water 5-Oct-17 (ft, btoc)	Groundwater Elevation 5-Oct-17 (ft, NAVD)
MW-103	Fluvial	301.37	231.4	68.45	232.92	68.55	232.82
MW-104	Fluvial	291.98	221.5	58.10	233.88	58.10	233.88
MW-107	Upper Claiborne	304.92	176.9	97.96	206.96	98.49	206.43
MW-108	Upper Claiborne	303.07	143.1	98.32	204.75	98.67	204.40
MW-113	Fluvial	304.81	208.8	92.69	212.12	92.61	212.20
MW-140	Memphis	298.12	73.5	123.09	175.03	129.35	168.77
MW-141	Intermediate	303.71	155.0	101.66	202.05	103.08	200.63
MW-142	Fluvial	291.18	206.2	84.44	206.74	84.76	206.42
MW-143	Fluvial	290.66	212.1	81.91	208.75	81.70	208.96
MW-197A	Upper Claiborne	291.64	129.95	85.73	205.91	85.83	205.81
MW-197B	Fluvial	291.43	197.68	85.64	205.79	85.69	205.74
MW-198	Fluvial	291.78	201.5	86.02	205.76	85.92	205.86
MW-199A	Intermediate	301.90	155.8	98.91	202.99	99.52	202.38
MW-199B	Fluvial	302.06	197.5	96.86	205.20	97.41	204.65
MW-200	Fluvial	300.18	197.0	95.63	204.55	95.70	204.48
MW-202A	Intermediate	299.67	123.5	109.14	190.53	111.76	187.91
MW-202B	Intermediate	299.92	181.1	109.67	190.25	111.18	188.74
MW-203A	Upper Claiborne	290.70	147.8	88.05	202.65	84.59	206.11
MW-203B	Fluvial	290.87	197.9	84.43	206.44	84.39	206.48
MW-204A	Fluvial	292.59	159.3	86.80	205.79	86.80	205.79
MW-204B	Fluvial	292.71	197.8	86.82	205.89	86.85	205.86
MW-205A	Upper Claiborne	292.30	151.0	86.84	205.46	87.02	205.28
MW-205B	Fluvial	292.16	194.8	86.59	205.57	86.70	205.46
MW-206A	Fluvial	300.32	173.0	95.42	204.90	95.55	204.77
MW-206B	Fluvial	300.30	203.6	95.40	204.90	95.51	204.79
MW-207A	Upper Claiborne	304.05	154.1	99.00	205.05	99.35	204.70
MW-207B	Fluvial	304.06	195.6	98.88	205.18	99.08	204.98
MW-208A	Upper Claiborne	302.21	118.8	99.44	202.77	97.65	204.56
MW-208B	Fluvial	302.13	195.5	97.27	204.86	97.41	204.72
MW-209A	Intermediate	298.45	109.5	95.21	203.24	95.61	202.84
MW-209B	Fluvial	298.89	196.6	93.67	205.22	93.74	205.15
MW-210A	Intermediate	289.61	112.6	89.10	200.51	90.20	199.41
MW-210B	Fluvial	289.54	192.6	83.92	205.62	84.01	205.53
MW-211	Intermediate	304.14	137.9	99.40	204.74	100.02	204.12
MW-212	Fluvial	295.74	210.4	90.02	205.72	89.76	205.98
MW-213	Fluvial	294.22	216.9	86.61	207.61	86.36	207.86
MW-214A	Upper Claiborne	304.01	184.9	95.01	209.00	95.20	208.81
MW-214B	Upper Claiborne	304.10	202.5	94.81	209.29	94.65	209.45
MW-215A	Upper Claiborne	304.97	176.2	99.83	205.14	99.94	205.03
MW-215B	Fluvial	305.03	199.6	99.85	205.18	99.96	205.07
MW-216	Fluvial	297.72	197.8	89.87	207.85	89.72	208.00
MW-217	Fluvial	304.65	202.9	98.96	205.69	98.89	205.76
MW-218	Fluvial	306.07	207.2	96.45	209.62	96.11	209.96
MW-219	Fluvial	295.13	197.2	85.10	210.03	84.95	210.18
MW-229	Intermediate	311.78	123.3	136.10	175.68	142.19	169.59
MW-252	Intermediate	294.16	168.1	117.19	176.97	122.25	171.91
MW-253	Intermediate	290.47	172.2	97.10	193.37	100.25	190.22
MW-254	Memphis	292.84	7.0	119.28	173.56	125.85	166.99
MW-255	Memphis	291.84	7.1	117.60	174.24	124.07	167.77
MW-256	Intermediate	292.68	165.6	115.71	176.97	121.20	171.48
MW-258	Fluvial	304.37	225.1	76.60	227.77	76.64	227.73
MW-259	Fluvial	290.77	192.2	88.33	202.44	88.62	202.15
MW-260	Fluvial	304.16	236.2	73.80	230.36	73.90	230.26

TABLE 5
MAIN INSTALLATION WATER LEVEL MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Top of Casing Elevation (ft, NAVD)	Top of Screen Elevation (ft, NAVD)	Depth to Water 18-Apr-17 (ft, btoc)	Groundwater Elevation 18-Apr-17 (ft, NAVD)	Depth to Water 5-Oct-17 (ft, btoc)	Groundwater Elevation 5-Oct-17 (ft, NAVD)
MW-261	Fluvial	293.52	203.5	88.51	205.01	88.42	205.10
MW-262	Intermediate	293.22	138.8	117.92	175.30	123.18	170.04
MW-263	Fluvial	291.40	222.3	55.31	236.09	55.25	236.15
MW-264	Upper Claiborne	303.72	198.9	84.66	219.06	84.34	219.38
MW-265	Fluvial	305.15	219.4	75.46	229.69	75.51	229.64
MW-266	Fluvial	304.68	227.6	73.28	231.40	72.23	232.45
MW-267	Fluvial	303.84	231.9	72.14	231.70	72.23	231.61
MW-268	Upper Claiborne	304.59	195.1	93.35	211.24	93.61	210.98
MW-269	Fluvial	290.05	197.8	79.16	210.89	78.80	211.25
MW-270	Fluvial	281.74	203.3	76.58	205.16	76.50	205.24
MW-271	Fluvial	294.91	160.3	91.41	203.50	91.50	203.41
MW-272	Fluvial	293.27	180.5	90.07	203.20	90.22	203.05
MW-273	Intermediate	284.73	156.7	107.95	176.78	112.75	171.98
MW-274	Fluvial	294.30	205.0	82.85	211.45	82.18	212.12
MW-275	Fluvial	272.31	191.8	66.12	206.19	65.81	206.50
MW-276	Fluvial	288.68	201.2	85.01	203.67	84.82	203.86
MW-277	Fluvial	301.67	199.4	97.57	204.10	97.59	204.08
MW-278	Fluvial	292.18	201.2	80.54	211.64	80.22	211.96
MW-279	Fluvial	299.89	187.9	89.96	209.93	89.81	210.08
MW-280	Fluvial	306.36	230.3	72.43	233.93	72.26	234.10
MW-281	Fluvial	304.56	222.9	78.91	225.65	78.97	225.59
MW-282	Fluvial	307.81	231.8	79.90	227.91	79.96	227.85
MW-283	Fluvial	304.34	227.3	69.53	234.81	69.52	234.82
PMW21-01	Fluvial	294.76	206.3	85.19	209.57	85.02	209.74
PMW21-02	Fluvial	292.98	201.7	84.17	208.81	83.90	209.08
PMW21-03	Fluvial	292.11	201.8	83.44	208.67	83.30	208.81
PMW21-04	Fluvial	291.87	202.9	83.29	208.58	83.14	208.73
PMW21-05	Fluvial	288.53	194.3	81.10	207.43	81.00	207.53
PMW85-01	Fluvial	305.08	211.9	93.58	211.50	93.31	211.77
PMW85-05	Fluvial	305.12	212.0	92.86	212.26	92.67	212.45
PMW92-02	Fluvial	304.17	209.4	90.96	213.21	90.78	213.39
PMW92-03	Fluvial	303.91	211.4	91.38	212.53	92.47	211.44
PMW101-02A	Fluvial	292.00	174.4	83.48	208.52	83.92	208.08
PMW101-02B	Fluvial	291.98	194.2	83.48	208.50	83.29	208.69
PMW101-03A	Fluvial	291.61	172.4	83.59	208.02	83.50	208.11
PMW101-03B	Fluvial	291.55	192.2	83.57	207.98	83.47	208.08
PMW101-04A	Fluvial	291.07	173.1	82.99	208.08	82.89	208.18
PMW101-04B	Fluvial	291.47	192.9	83.50	207.97	83.41	208.06
PMW101-06A	Fluvial	292.13	172.1	83.95	208.18	83.82	208.31
PMW101-06B	Fluvial	292.17	192.9	83.97	208.20	83.87	208.30
PMW101-07A	Fluvial	292.20	174.3	83.95	208.25	83.87	208.33
PMW101-07B	Fluvial	292.36	194.4	84.15	208.21	84.02	208.34
PZ-03	Fluvial	298.51	189.6	93.65	204.86	93.54	204.97

Notes:
ft, btoc: feet below top of casing
ft, NAVD: feet above North American Vertical Datum of 1988
NM: Not measured

TABLE 6
DUNN FIELD WATER LEVEL MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Top of Casing Elevation (ft, NAVD)	Top of Screen Elevation (ft, NAVD)	Depth to Water 18-Apr-17 (ft, btoc)	Groundwater Elevation 18-Apr-17 (ft, NAVD)	Depth to Water 4-Oct-17 (ft, btoc)	Groundwater Elevation 4-Oct-17 (ft, NAVD)
MW-03	Fluvial	292.35	226.85	62.65	229.70	62.95	229.40
MW-04	Fluvial	301.61	241.61	70.31	231.30	70.62	230.99
MW-06	Fluvial	289.11	238.11	58.35	230.76	58.70	230.41
MW-07	Fluvial	295.10	228.10	62.75	232.35	62.97	232.13
MW-08	Fluvial	292.59	236.09	58.81	233.78	59.00	233.59
MW-13	Fluvial	300.01	234.01	68.66	231.35	69.01	231.00
MW-15	Fluvial	295.12	231.72	64.33	230.79	64.68	230.44
MW-28	Fluvial	294.79	240.49	53.94	240.85	54.10	240.69
MW-31	Fluvial	290.37	226.27	64.11	226.26	64.54	225.83
MW-44	Fluvial	269.07	205.07	48.36	220.71	48.98	220.09
MW-54	Fluvial	295.39	210.85	73.51	221.88	73.82	221.57
MW-57	Fluvial	290.77	230.77	60.39	230.38	60.63	230.14
MW-58	Fluvial	290.51	233.51	61.16	229.35	61.45	229.06
MW-67	Memphis	278.21	18.21	102.63	175.58	108.37	169.84
MW-68	Fluvial	291.69	219.19	62.44	229.25	62.69	229.00
MW-69	Fluvial	307.02	224.94	77.61	229.41	77.95	229.07
MW-70	Fluvial	304.99	224.18	75.35	229.64	75.60	229.39
MW-71	Fluvial	294.40	228.90	64.73	229.67	65.16	229.24
MW-76	Fluvial	302.71	229.71	77.68	225.03	78.11	224.60
MW-77	Fluvial	304.42	236.42	76.74	227.68	77.12	227.30
MW-78	Fluvial	275.00	230.50	44.55	230.45	45.10	229.90
MW-79	Fluvial	285.03	202.53	64.81	220.22	65.30	219.73
MW-80	Fluvial	273.81	220.81	53.88	219.93	54.45	219.36
MW-87	Fluvial	294.93	231.93	64.41	230.52	64.75	230.18
MW-91	Fluvial	291.99	236.99	61.40	230.59	61.77	230.22
MW-126	Fluvial	252.22	236.22	17.66	234.56	17.23	234.99
MW-129	Fluvial	293.01	228.01	53.95	239.06	53.98	239.03
MW-130	Fluvial	293.17	233.70	53.37	239.80	53.47	239.70
MW-134	Fluvial	300.81	225.81	70.45	230.36	70.75	230.06
MW-144	Fluvial	291.60	235.70	67.31	224.29	67.55	224.05
MW-145	Fluvial	284.72	208.12	63.57	221.15	63.85	220.87
MW-147	Fluvial	289.76	231.96	64.51	225.25	64.88	224.88
MW-148	Fluvial	294.71	226.91	71.40	223.31	71.86	222.85
MW-149	Fluvial	287.18	205.58	65.90	221.28	66.20	220.98
MW-150	Fluvial	296.86	225.66	74.54	222.32	74.91	221.95
MW-151	Fluvial	284.27	207.77	63.58	220.69	63.51	220.76
MW-152	Fluvial	289.59	198.69	68.85	220.74	69.81	219.78
MW-153	Fluvial	279.17	203.07	59.35	219.82	60.00	219.17
MW-154	Fluvial	273.81	221.31	53.08	220.73	53.39	220.42
MW-155	Fluvial	291.54	214.94	69.85	221.69	70.35	221.19
MW-157	Fluvial	286.47	229.47	63.26	223.21	63.64	222.83
MW-158	Fluvial	294.07	202.97	73.35	220.72	73.28	220.79
MW-158A	Fluvial	293.95	215.55	73.24	220.71	73.23	220.72
MW-159	Fluvial	286.36	207.06	65.39	220.97	65.34	221.02
MW-160	Fluvial	293.84	228.04	71.77	222.07	71.90	221.94
MW-163	Fluvial	290.63	234.13	66.65	223.98	67.01	223.62
MW-164	Fluvial	287.48	232.18	63.15	224.33	63.55	223.93
MW-165	Fluvial	287.06	198.96	66.49	220.57	66.50	220.56
MW-165A	Fluvial	287.26	215.96	66.75	220.51	66.85	220.41
MW-166	Fluvial	282.72	198.52	62.04	220.68	61.94	220.78
MW-166A	Fluvial	282.90	215.30	62.00	220.90	62.13	220.77
MW-167	Fluvial	284.82	217.12	64.49	220.33	65.00	219.82

TABLE 6
DUNN FIELD WATER LEVEL MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Top of Casing Elevation (ft, NAVD)	Top of Screen Elevation (ft, NAVD)	Depth to Water 18-Apr-17 (ft, btoc)	Groundwater Elevation 18-Apr-17 (ft, NAVD)	Depth to Water 4-Oct-17 (ft, btoc)	Groundwater Elevation 4-Oct-17 (ft, NAVD)
MW-169	Upper Claiborne	261.90	193.90	60.35	201.55	62.50	199.40
MW-170	Fluvial	273.75	214.05	52.24	221.51	52.71	221.04
MW-171	Fluvial	270.69	217.49	50.21	220.48	50.51	220.18
MW-174	Fluvial	296.56	229.56	65.63	230.93	65.90	230.66
MW-176	Fluvial	299.68	223.68	69.20	230.48	69.55	230.13
MW-180	Fluvial	296.14	224.14	66.12	230.02	66.45	229.69
MW-182	Fluvial	272.63	213.43	56.05	216.58	56.20	216.43
MW-184	Fluvial	283.12	225.12	58.89	224.23	59.32	223.80
MW-187	Fluvial	302.74	226.74	71.14	231.60	71.50	231.24
MW-190	Fluvial	297.32	219.32	72.52	224.80	73.02	224.30
MW-220	Fluvial	293.29	228.35	62.88	230.41	63.20	230.09
MW-221	Fluvial	301.52	228.40	71.65	229.87	72.00	229.52
MW-222	Fluvial	303.82	229.64	73.18	230.64	73.55	230.27
MW-223	Fluvial	303.00	229.13	72.40	230.60	72.75	230.25
MW-224	Fluvial	304.13	230.42	73.42	230.71	73.80	230.33
MW-225	Fluvial	304.52	229.54	74.10	230.42	74.45	230.07
MW-226	Fluvial	303.19	228.97	72.46	230.73	72.74	230.45
MW-227	Fluvial	299.70	236.06	68.70	231.00	69.03	230.67
MW-228	Fluvial	301.65	237.56	70.59	231.06	70.90	230.75
MW-230	Fluvial	286.57	227.32	52.05	234.52	52.26	234.31
MW-235	Fluvial	264.00	213.41	51.82	212.18	51.93	212.07
MW-237	Intermediate	289.18	122.73	112.63	176.55	117.98	171.20
MW-241	Fluvial	292.97	219.57	70.10	222.87	70.54	222.43
MW-242	Fluvial	295.40	222.20	73.55	221.85	73.69	221.71
MW-243	Fluvial	292.26	211.56	70.93	221.33	71.20	221.06
MW-244	Fluvial	288.72	212.39	68.49	220.23	67.60	221.12
MW-245	Fluvial	290.48	205.40	69.66	220.82	69.47	221.01
MW-246	Fluvial	288.17	202.97	67.94	220.23	67.51	220.66
MW-247	Fluvial	286.17	205.70	65.55	220.62	65.49	220.68
MW-248	Fluvial	275.45	207.94	54.67	220.78	55.21	220.24
MW-249	Fluvial	285.53	207.49	64.40	221.13	64.80	220.73
MW-250	Intermediate	289.66	120.96	114.08	175.58	119.72	169.94
MW-251	Intermediate	285.83	125.63	110.01	175.82	115.76	170.07
CS-01	Fluvial	279.76	221.96	-	-	34.70	245.06
CS-02	Fluvial	280.18	220.18	-	-	38.73	241.45
CS-03	Fluvial	275.93	218.93	-	-	31.09	244.84
CS-04	Fluvial	271.30	219.30	-	-	27.75	243.55
CS-05	Fluvial	296.27	225.27	-	-	52.92	243.35
CS-06	Fluvial	301.25	225.95	-	-	59.35	241.90
CS-07	Fluvial	297.51	223.51	-	-	56.92	240.59
WB-01	Fluvial	275.97	240.97	-	-	28.55	247.42
WB-02	Fluvial	272.21	237.21	-	-	25.11	247.10
WB-03	Fluvial	265.33	245.33	-	-	13.56	251.77

Notes:
ft, btoc: feet below top of casing
ft, NAVD: feet above North American Vertical Datum of 1988

TABLE 7
MAIN INSTALLATION PDB SAMPLE INTERVALS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Top of Screen Depth (ft, btoc)	Screen Length (ft)	Apr-17 Date Collected	Apr-17 Depth to Water (ft, btoc)	Apr-17 Sample Depth[1] (ft, btoc)	Oct-17 Date Collected	Oct-17 Depth to Water (ft, btoc)	Oct-17 Sample Depth[1] (ft, btoc)
DR1-1	121.7	20	-	-	-	-	-	-
DR1-1A	89.2	20	-	-	-	-	-	-
DR1-2	97.7	20	-	-	-	-	-	-
DR1-3	109.7	20	4/21/2017	83.8	119.7	10/6/2017	83.7	119.7
DR1-4	106.3	20	-	-	-	10/6/2017	84.4	116.3
DR1-5	124.7	20	4/20/2017	85.6	135.9	10/6/2017	85.3	135.9
DR1-5A	90.0	20	4/20/2017	85.9	101.0	10/6/2017	85.9	101.0
DR1-6	114.4	20	4/20/2017	84.4	125.6	10/6/2017	84.2	125.6
DR1-6A	90.9	20	4/20/2017	84.7	101.9	-	-	-
DR1-7	108.3	20	-	-	-	-	-	-
DR1-8	92.7	20	-	-	-	-	-	-
DR2-1	73.9	20	4/19/2017	86.3	90.5	10/6/2017	86.2	90.5
DR2-2	78.4	15	4/19/2017	78.7	86.5	10/7/2017	77.2	86.5
DR2-3	93.0	20	4/19/2017	91.9	104.1	10/10/2017	91.6	104.1
DR2-4	88.1	20	-	-	-	10/7/2017	89.4	100.3
DR2-6	94.6	20	4/19/2017	94.7	106.7	10/8/2017	94.4	106.7
MW-16	57.6	15	-	-	-	-	-	-
MW-19	83.1	10	-	-	-	-	-	-
MW-21	92.1	15	4/20/2017	85.5	100.6	10/6/2017	85.3	100.6
MW-22	95.4	10	-	-	-	-	-	-
MW-23	101.2	10	-	-	-	-	-	-
MW-24	97.3	15	-	-	-	-	-	-
MW-25A	73.0	10	-	-	-	10/10/2017	63.0	78.0
MW-26	97.6	10	4/19/2017	93.2	102.6	10/8/2017	92.9	102.6
MW-34	136.6	20	-	-	-	10/8/2017	121.6	146.6
MW-38	139.9	15	-	-	-	-	-	-
MW-39	95.5	20	4/20/2017	93.2	107.3	10/7/2017	93.3	107.3
MW-39A	148.1	20	4/20/2017	93.5	157.9	10/10/2017	93.6	157.9
MW-50	115.0	10	-	-	-	10/8/2017	81.6	120.0
MW-52	94.0	10	-	-	-	10/10/2017	71.5	99.0
MW-53	72.5	10	-	-	-	-	-	-
MW-62	86.1	10	4/21/2017	86.7	93.3	10/8/2017	86.4	93.3
MW-63A	130.0	10	-	-	-	-	-	-
MW-63B	115.0	10	-	-	-	10/8/2017	95.0	120.0
MW-64	102.0	10	4/19/2017	98.8	108.0	10/8/2017	98.7	108.0
MW-66A	74.6	20	-	-	-	-	-	-
MW-85	95.9	15	4/19/2017	93.0	101.2	10/7/2017	92.8	101.2
MW-88	82.0	15	4/19/2017	77.0	89.5	10/7/2017	76.9	89.5
MW-89	147.0	30	4/21/2017	103.2	162.0	10/8/2017	104.3	162.0
MW-90	115.0	30	4/21/2017	103.8	130.0	10/8/2017	104.9	130.0
MW-92	93.0	15	4/19/2017	91.3	101.0	10/7/2017	91.0	101.0
MW-93	92.0	15	-	-	-	-	-	-
MW-94A	109.6	10	4/20/2017	98.4	114.6	10/7/2017	98.5	114.6
MW-96	75.5	20	-	-	-	10/10/2017	76.3	87.7
MW-97	97.5	20	4/19/2017	90.1	107.5	10/10/2017	89.9	107.5
MW-98	137.0	10	4/20/2017	89.3	142.0	10/7/2017	89.0	142.0
MW-99	91.5	20	-	-	-	-	-	-
MW-100B	107.4	20	4/20/2017	82.4	117.5	10/6/2017	83.3	117.5
MW-101T	89.0	15	4/21/2017	83.0	96.5	10/6/2017	82.8	96.5
MW-101B	119.0	10	4/21/2017	83.0	124.0	10/6/2017	82.8	124.0
MW-102B	120.5	20	-	-	-	-	-	-
MW-103	70.0	20	-	-	-	10/8/2017	68.6	80.0
MW-104	70.5	20	4/20/2017	58.1	78.5	10/8/2017	58.1	78.5

TABLE 7
MAIN INSTALLATION PDB SAMPLE INTERVALS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Top of Screen Depth (ft, btoc)	Screen Length (ft)	Apr-17 Date Collected	Apr-17 Depth to Water (ft, btoc)	Apr-17 Sample Depth[1] (ft, btoc)	Oct-17 Date Collected	Oct-17 Depth to Water (ft, btoc)	Oct-17 Sample Depth[1] (ft, btoc)
MW-107T	128.0	15	4/20/2017	98.0	135.5	10/8/2017	98.5	135.5
MW-107B	148.0	10	4/20/2017	98.0	153.0	10/8/2017	98.5	153.0
MW-108	160.0	10	4/20/2017	98.3	165.0	10/7/2017	98.7	165.0
MW-113	96.0	10	4/19/2017	92.7	101.2	10/7/2017	92.6	101.2
MW-140	224.6	20	4/21/2017	123.1	234.6	10/8/2017	129.4	234.6
MW-141	148.7	20	4/21/2017	101.7	158.7	10/8/2017	103.1	158.7
MW-142	85.0	20	-	-	-	10/8/2017	84.8	97.4
MW-143	78.6	20	4/21/2017	81.9	92.8	10/10/2017	81.7	92.8
MW-197A	161.7	15	4/19/2017	85.7	170.3	10/7/2017	85.8	170.3
MW-197B	93.8	15	4/19/2017	85.6	102.3	10/7/2017	85.7	102.3
MW-198	90.3	15	-	-	-	10/8/2017	85.9	98.4
MW-199A	146.1	15	-	-	-	10/8/2017	99.5	153.6
MW-199B	104.6	15	4/21/2017	96.9	112.1	10/8/2017	97.4	112.1
MW-200	103.2	15	4/20/2017	95.6	110.4	10/7/2017	95.7	110.4
MW-202A	176.2	15	4/21/2017	109.1	183.7	10/8/2017	111.8	183.7
MW-202B	118.8	15	4/21/2017	109.7	126.3	10/8/2017	111.2	126.3
MW-203A	142.9	20	4/19/2017	88.1	153.9	-	-	-
MW-203B	93.0	20	4/19/2017	84.4	104.0	-	-	-
MW-204A	133.3	15	4/19/2017	86.8	140.8	10/7/2017	86.8	140.8
MW-204B	94.9	15	4/19/2017	86.8	102.0	10/7/2017	86.9	102.0
MW-205A	141.3	15	4/20/2017	86.8	148.5	10/7/2017	87.0	148.5
MW-205B	97.3	15	4/20/2017	86.6	104.5	10/7/2017	86.7	104.5
MW-206A	127.3	15	4/20/2017	95.4	134.8	10/7/2017	95.6	134.8
MW-206B	96.7	15	4/20/2017	95.4	106.5	10/7/2017	95.5	106.5
MW-207A	149.9	15	4/20/2017	99.0	157.2	10/7/2017	99.4	157.2
MW-207B	108.5	15	4/20/2017	98.9	115.8	10/7/2017	99.1	115.8
MW-208A	183.5	15	4/20/2017	99.4	191.0	10/7/2017	97.7	191.0
MW-208B	106.7	15	4/20/2017	97.3	114.2	10/7/2017	97.4	114.2
MW-209A	189.0	15	4/22/2017	95.2	196.5	10/7/2017	95.6	196.5
MW-209B	102.3	15	4/22/2017	93.7	109.8	10/7/2017	93.7	109.8
MW-210A	177.0	15	4/19/2017	89.1	184.5	10/7/2017	90.2	184.5
MW-210B	97.0	15	4/19/2017	83.9	104.5	10/7/2017	84.0	104.5
MW-211	166.3	15	-	-	-	-	-	-
MW-212	85.3	15	4/21/2017	90.0	97.2	10/8/2017	89.8	97.2
MW-214A	119.1	15	-	-	-	10/8/2017	95.2	126.6
MW-214B	101.6	15	-	-	-	10/8/2017	94.7	109.1
MW-215A	128.8	15	-	-	-	10/8/2017	99.9	136.3
MW-215B	105.4	15	-	-	-	10/8/2017	100.0	113.2
MW-216	99.9	15	-	-	-	-	-	-
MW-217	101.8	15	4/19/2017	99.0	110.5	10/8/2017	98.9	110.5
MW-218	98.9	15	4/19/2017	96.5	107.4	10/8/2017	96.1	107.4
MW-219	98.0	15	4/22/2017	85.1	105.3	10/7/2017	85.0	105.3
MW-229	188.4	20	-	-	-	-	-	-
MW-252	126.1	20	-	-	-	-	-	-
MW-253	118.3	20	-	-	-	10/10/2017	100.3	128.8
MW-254	285.8	20	-	-	-	10/8/2017	125.9	295.8
MW-255	284.7	20	-	-	-	10/8/2017	124.1	294.7
MW-256	127.1	20	4/21/2017	115.7	139.1	10/8/2017	121.2	139.1
MW-258	79.3	20	4/20/2017	76.6	88.9	10/8/2017	76.6	88.9
MW-259	98.6	20	4/19/2017	88.3	108.5	10/10/2017	88.6	108.5
MW-260	68.0	20	-	-	-	10/8/2017	73.9	82.2
MW-261	90.0	20	-	-	-	10/10/2017	88.4	102.8
MW-262	154.4	10	4/21/2017	117.9	160.0	10/8/2017	123.2	160.0

TABLE 7
MAIN INSTALLATION PDB SAMPLE INTERVALS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			Apr-17			Oct-17		
Well	Top of Screen Depth (ft, btoc)	Screen Length (ft)	Date Collected	Depth to Water (ft, btoc)	Sample Depth[1] (ft, btoc)	Date Collected	Depth to Water (ft, btoc)	Sample Depth[1] (ft, btoc)
MW-263	69.1	10	4/20/2017	55.3	74.5	10/8/2017	55.3	74.5
MW-264	104.8	10	4/20/2017	84.7	110.5	10/8/2017	84.3	110.5
MW-265	85.8	10	4/20/2017	75.5	90.5	10/8/2017	75.5	90.5
MW-266	77.1	10	4/19/2017	73.3	82.5	10/7/2017	72.2	82.5
MW-267	71.9	10	4/19/2017	72.1	78.0	10/8/2017	72.2	78.0
MW-268	109.5	10	4/19/2017	93.4	115.5	10/8/2017	93.6	115.5
MW-269	92.2	10	4/22/2017	79.2	97.4	10/8/2017	78.8	97.4
MW-270	78.4	10	4/19/2017	76.6	84.5	10/9/2017	76.5	84.5
MW-271	134.7	10	4/19/2017	91.4	140.5	10/9/2017	91.5	140.5
MW-272	112.8	10	4/19/2017	90.1	117.5	10/9/2017	90.2	117.5
MW-273	128.1	10	4/22/2017	108.0	131.9	10/8/2017	112.8	131.9
MW-274	89.3	10	-	-	-	-	-	-
MW-275	80.5	10	-	-	-	10/8/2017	65.8	85.5
MW-276	87.5	10	-	-	-	10/8/2017	84.8	92.5
MW-277	102.3	10	-	-	-	10/10/2017	97.6	107.3
MW-278	91.0	10	-	-	-	10/8/2017	80.2	96.0
MW-279	113.0	10	-	-	-	10/6/2017	89.8	118.0
MW-280	76.0	10	-	-	-	10/8/2017	72.3	81.0
MW-281	81.7	10	-	-	-	10/8/2017	79.0	86.7
MW-282	76.0	10	-	-	-	10/8/2017	80.0	83.0
MW-283	77.0	10	-	-	-	-	-	-
PMW21-01	88.4	20	4/20/2017	85.2	99.6	10/6/2017	85.0	99.6
PMW21-02	91.3	20	4/20/2017	84.2	102.4	10/6/2017	83.9	102.4
PMW21-03	90.3	20	4/20/2017	83.4	100.3	10/6/2017	83.3	100.3
PMW21-04	89.0	20	4/20/2017	83.3	100.2	10/6/2017	83.1	100.2
PMW21-05	94.3	20	4/20/2017	81.1	104.3	10/7/2017	81.0	104.3
PMW-85-01	93.2	10	4/19/2017	93.6	99.4	10/7/2017	93.3	99.4
PMW-85-05	93.2	10	4/19/2017	92.9	98.9	10/7/2017	92.7	98.9
PMW-92-02	94.8	10	4/19/2017	91.0	100.3	10/7/2017	90.8	100.3
PMW92-03	92.5	10	4/19/2017	91.4	98.6	10/7/2017	92.5	98.6
PMW101-02A	117.7	20	-	-	-	10/6/2017	83.9	128.6
PMW101-02B	97.8	20	4/21/2017	83.5	108.7	10/6/2017	83.3	108.7
PMW101-03A	119.2	20	4/21/2017	83.6	129.7	10/6/2017	83.5	129.7
PMW101-03B	99.3	20	4/21/2017	83.6	109.8	10/6/2017	83.5	109.8
PMW101-04A	117.9	20	4/21/2017	83.0	128.6	10/6/2017	82.9	128.6
PMW101-04B	98.6	20	4/21/2017	83.5	108.7	10/6/2017	83.4	108.7
PMW101-06A	120.0	20	4/20/2017	84.0	130.5	10/6/2017	83.8	130.5
PMW101-06B	99.3	20	4/20/2017	84.0	109.8	10/6/2017	83.9	109.8
PMW101-07A	117.9	20	4/20/2017	84.0	129.1	10/6/2017	83.9	129.1
PMW101-07B	98.0	20	4/20/2017	84.2	109.2	10/6/2017	84.0	109.2

Notes:
1) Sample Depth is to PDB mid-point
ft, btoc: feet below top of casing
PDB: passive diffusion bag

TABLE 8
FINAL WELL STABILIZATION MEASUREMENTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Area	Sample Date	Method	Time Sampled	Sample Depth (ft, btoc)	Water Depth (ft, btoc)	Purge Rate (mL/min)	Volume Purged (Liters)	pH	Temp (˚C)	Specific Conductivity (mS/cm)	Dissolved Oxygen (mg/L)	Oxidation Reduction Potential (mV)	Turbidity (NTUs)
DR2-5	MI	4/22/2017	Low Flow	7:45	98.0	92.8	100	3.5	7.7	23.5	13.290	2.9	-42.6	OR
MW-213	MI	4/21/2017	Bailer	16:02	NA	86.6	510	24.0	7.3	23.3	1.577	4.9	9.5	9.1
MW-274	MI	4/22/2017	Low Flow	9:40	94.0	82.75	160	4.8	5.9	18.2	0.990	0.8	78	2.0
MW-275	MI	4/20/2017	Low Flow	16:30	85.0	65.1	160	14.8	5.7	19.1	0.286	4.1	102	15.5
MW-276	MI	4/20/2017	Low Flow	9:00	92.0	84.9	120	4.8	5.8	20.4	0.410	2.5	26.1	7.6
MW-277	MI	4/19/2017	Low Flow	15:21	107.5	97.7	100	10.0	5.4	23.5	0.235	4.2	198	19.5
MW-278	MI	4/20/2017	Low Flow	13:53	96.0	80.5	100	3.5	5.7	22.9	0.367	2.6	187	11.3
MW-279	MI	4/20/2017	Low Flow	11:23	118.0	89.9	120	7.8	5.7	20.0	0.470	5.1	117	2.1
MW-280	MI	4/19/2017	Low Flow	11:16	83.2	72.5	100	12.0	5.5	20.6	0.325	3.6	175	10.5
MW-281	MI	4/21/2017	Low Flow	8:27	87.0	78.9	160	3.2	5.4	20.6	0.557	2.5	213	4.0
MW-282	MI	4/21/2017	Low Flow	11:01	81.0	78.9	100	5.0	5.6	19.8	0.210	6.8	226	2.5
MW-283	MI	4/22/2017	Low Flow	12:30	82.0	69.5	140	16.8	6.2	18.5	0.375	2.9	105	58.0
PMW101-02A	MI	4/24/2017	Low Flow	12:15	135.0	83.7	120	6.0	6.5	21.9	1.272	5.9	23.5	OR
MW-08	DF	4/22/2017	Low Flow	15:57	65.0	58.9	140	7.7	5.9	16.2	0.277	7.4	177	19.5
MW-58	DF	4/23/2017	Low Flow	9:36	66.0	61.2	150	6.0	5.6	16.4	0.416	7.1	234	6.3
MW-126	DF	4/23/2017	Low Flow	14:42	22.0	17.6	160	4.0	6.0	19.2	0.182	6.4	206	2.4
DR1-6A	MI	10/11/2017	Bailer	15:55	NA	84.4	NA	58.0	7.11	19.1	1.506	2.60	-43	-48
DR2-5	MI	10/10/2017	Bailer	19:10	NA	97.3	NA	5.7	7.81	22.1	10.840	1.32	-24	187
MW-203A	MI	10/12/2017	Bailer	11:30	NA	84.3	NA	178	6.48	20.1	1.344	NM	-65	NM
MW-203B	MI	10/10/2017	Low Flow	15:45	98.0	84.4	125	3.7	4.03	22.3	0.315	NM	173	6.8
MW-213	MI	10/9/2017	Bailer	16:30	NA	86.4	NA	257	7.73	20.6	0.902	NM	115	11.8
MW-274	MI	10/10/2017	Low Flow	16:05	94.0	82.3	150	23.5	5.43	24.6	0.853	2.50	76	9.4
MW-283	MI	10/10/2017	Low Flow	19:40	79.0	69.5	223	26.7	5.52	21.6	0.327	4.86	129	31.4

Notes:
1) DO meter not functioning during sampling at MW-203B, MW-213, & MW-203A.
2) Turbidity meter did not keep calibration during sampling at MW-203A, although the water was very dark and visiually appeared to be out of range.

MI: Main Installation
DF: Dunn Field
ft, btoc: feet below top of casing
mL/min: milliliters per minute
L : liters
˚C : degrees Celsius
mg/L : milligrams per liter
mS/cm : milliSiemens per centimeter
mV :millivolts
NA : not applicable
NM : not measured
NTUs: nephelometric turbidity units
OR: out of range

TABLE 9
DUNN FIELD PDB SAMPLE INTERVALS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Top of Screen Depth (ft, btoc)	Screen Length (feet)	Apr-17 Date Collected	Apr-17 Depth to Water (ft, btoc)	Apr-17 Sample Depth[1] (ft, btoc)	Oct-17 Date Collected	Oct-17 Depth to Water (ft, btoc)	Oct-17 Sample Depth[1] (ft, btoc)
MW-03	65.5	10	4/22/2017	62.7	70.5	-	-	-
MW-04	60.0	20	4/22/2017	70.3	76.2	-	-	-
MW-06	51.0	20	4/22/2017	58.4	65.9	10/6/2017	58.7	65.9
MW-07	67.0	10	4/22/2017	62.8	68.4	-	-	-
MW-13	66.0	15	4/22/2017	68.7	75.9	-	-	-
MW-15	63.4	15	4/22/2017	64.3	72.5	-	-	-
MW-28	54.3	15	4/23/2017	53.9	62.3	-	-	-
MW-31	64.1	15	4/22/2017	64.1	73.2	-	-	-
MW-44	64.0	10	4/23/2017	48.4	69.0	-	-	-
MW-54	84.5	10	4/22/2017	73.5	89.5	-	-	-
MW-57	60.0	10	4/22/2017	60.4	66.1	10/6/2017	60.6	66.1
MW-67	260.0	15	4/23/2017	102.6	268.0	-	-	-
MW-68	72.5	10	4/23/2017	62.4	78.0	-	-	-
MW-69	82.1	10	4/23/2017	77.6	87.1	-	-	-
MW-70	80.8	10	4/23/2017	75.4	84.1	10/6/2017	75.6	84.1
MW-71	65.5	10	4/23/2017	64.7	71.4	-	-	-
MW-76	73.0	20	4/23/2017	77.7	87.3	-	-	-
MW-77	68.0	20	4/23/2017	76.7	83.6	10/6/2017	77.1	83.6
MW-78	44.5	20	4/23/2017	44.6	55.0	-	-	-
MW-79	82.5	20	4/23/2017	64.8	92.5	-	-	-
MW-80	53.0	20	4/23/2017	53.9	64.7	-	-	-
MW-87	63.0	15	4/22/2017	64.4	72.4	10/6/2017	64.8	72.4
MW-91	55.0	15	4/22/2017	61.4	66.6	-	-	-
MW-129	65.0	15	4/23/2017	54.0	73.0	-	-	-
MW-130	59.5	20	4/23/2017	53.4	70.0	-	-	-
MW-134	75.0	15	4/22/2017	70.5	83.0	-	-	-
MW-144	55.9	20	4/23/2017	67.3	74.3	10/6/2017	67.6	74.3
MW-145	76.6	20	4/23/2017	63.6	90.1	-	-	-
MW-147	57.8	20	4/22/2017	64.5	74.3	-	-	-
MW-148	67.8	20	4/22/2017	71.4	81.7	-	-	-
MW-149	81.6	20	4/22/2017	65.9	91.7	10/5/2017	66.2	91.7
MW-150	71.2	20	4/22/2017	74.5	85.3	10/5/2017	74.9	85.3
MW-151	76.5	20	4/23/2017	63.6	87.2	-	-	-
MW-152	90.9	20	4/23/2017	68.9	101.2	-	-	-
MW-153	76.1	20	4/23/2017	59.4	86.1	-	-	-
MW-154	52.5	15	4/23/2017	53.1	60.1	-	-	-
MW-155	76.6	20	4/22/2017	69.9	87.2	-	-	-
MW-157	57.0	20	4/23/2017	63.3	72.9	-	-	-
MW-158	91.1	15	4/23/2017	73.4	98.8	-	-	-
MW-158A	78.4	15	4/23/2017	73.2	85.8	-	-	-
MW-159	79.3	20	4/22/2017	65.4	90.7	10/5/2017	65.3	90.7
MW-160	65.8	20	4/22/2017	71.8	81.4	-	-	-
MW-163	56.5	20	4/23/2017	66.7	73.0	10/5/2017	67.0	73.0
MW-164	55.3	20	4/23/2017	63.2	70.4	-	-	-
MW-165	88.1	15	4/23/2017	66.5	96.4	10/6/2017	66.5	96.4
MW-165A	71.3	15	4/23/2017	66.8	79.2	-	-	-
MW-166	84.2	15	4/23/2017	62.0	90.7	10/5/2017	61.9	90.7
MW-166A	67.6	15	4/23/2017	62.0	75.2	10/5/2017	62.1	75.2
MW-167	67.7	15	4/23/2017	64.5	78.5	-	-	-
MW-169	68.0	20	4/23/2017	60.4	80.2	-	-	-
MW-170	59.7	20	4/23/2017	52.2	72.9	-	-	-
MW-171	53.2	15	4/23/2017	50.2	61.3	-	-	-
MW-174	67.0	10	4/22/2017	65.6	73.0	-	-	-

TABLE 9
DUNN FIELD PDB SAMPLE INTERVALS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			Apr-17			Oct-17		
Well	Top of Screen Depth (ft, btoc)	Screen Length (feet)	Date Collected	Depth to Water (ft, btoc)	Sample Depth[1] (ft, btoc)	Date Collected	Depth to Water (ft, btoc)	Sample Depth[1] (ft, btoc)
MW-176	76.0	10	4/22/2017	69.2	81.0	-	-	-
MW-180	72.0	10	4/22/2017	66.1	77.0	-	-	-
MW-182	59.2	10	4/23/2017	56.1	65.5	-	-	-
MW-184	58.0	10	4/23/2017	58.9	64.8	-	-	-
MW-187	76.0	10	4/22/2017	71.1	81.0	-	-	-
MW-190	78.0	10	4/23/2017	72.5	83.0	10/6/2017	73.0	83.0
MW-220	64.9	15	4/22/2017	62.9	72.9	-	-	-
MW-221	73.1	15	4/22/2017	71.7	81.0	-	-	-
MW-222	74.2	15	4/22/2017	73.2	82.4	-	-	-
MW-223	73.9	15	4/22/2017	72.4	81.4	-	-	-
MW-224	73.7	15	4/22/2017	73.4	82.2	-	-	-
MW-225	75.0	15	4/22/2017	74.1	83.2	-	-	-
MW-226	74.2	15	4/22/2017	72.5	82.0	-	-	-
MW-227	63.6	15	4/22/2017	68.7	74.7	-	-	-
MW-228	64.1	15	4/22/2017	70.6	75.7	-	-	-
MW-230	59.2	15	4/22/2017	52.1	67.3	-	-	-
MW-235	50.6	10	4/23/2017	51.8	57.2	-	-	-
MW-237	166.5	10	4/23/2017	112.6	171.6	-	-	-
MW-241	73.4	15	4/22/2017	70.1	81.6	-	-	-
MW-242	73.2	15	4/22/2017	73.6	83.8	-	-	-
MW-243	80.7	20	4/22/2017	70.9	90.7	-	-	-
MW-244	76.3	20	4/23/2017	68.5	86.3	-	-	-
MW-245	85.1	20	4/22/2017	69.7	95.0	-	-	-
MW-246	85.2	20	4/23/2017	67.9	95.2	10/5/2017	67.5	95.2
MW-247	80.5	20	4/23/2017	65.6	90.0	-	-	-
MW-248	67.5	20	4/23/2017	54.7	77.5	-	-	-
MW-249	78.0	20	4/23/2017	64.4	88.3	10/5/2017	64.8	88.3
MW-250	168.7	15	4/23/2017	114.1	176.2	-	-	-
MW-251	160.2	15	4/23/2017	110.0	167.7	-	-	-

Notes:
1) Sample Depth is to PDB mid-point
ft, btoc: feet below top of casing
PDB: passive diffusion bag

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		DR1-3	DR1-5	DR1-5A	DR1-6	DR1-6A	DR2-1	DR2-2
	Lab ID		L17041110-07	L17041075-18	L17041075-17	L17041075-31	L17041075-28	L17041069-13	L17041069-15
	Date		4/21/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/19/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**25.9**	1.00 U
Chloroform	µg/L	80	0.300 U	0.300 U	0.300 U	0.147 J	0.300 U	3.59	0.242 J
cis-1,2-Dichloroethene	µg/L	70	6.46	11.8	53.6	1.00 U	28.0	8.76	4.08
Tetrachloroethene	µg/L	5	**7.12**	4.06	1.00 U	**10.3**	1.00 U	**155**	4.55
Trichloroethene	µg/L	5	**9.91**	0.589 J	1.00 U	1.00 U	0.496 J	**5.32**	0.663 J
Vinyl chloride	µg/L	2	1.00 U	1.00 U	0.253 J	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.9	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	18.4	33.3	0.750 J	5.00 U	5.00 U	5.00 U	5.00 U
Toluene	µg/L	1000	1.00 U	8.00	8.59	1.00 U	4.38	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		DR2-3	DR2-5	DR2-6	MW-21	MW-26	MW-39	MW-39A
	Lab ID		L17041069-05	L17041209-06	L17041069-19	L17041075-19	L17041069-18	L17041069-48	L17041069-47
	Date		4/19/2017	4/22/2017	4/19/2017	4/20/2017	4/19/2017	4/20/2017	4/20/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	2.22	50.0 U	1.00 U	1.00 U	2.59	1.00 U	1.00 U
Chloroform	µg/L	80	0.405	15.0 U	0.300 U	0.300 U	0.376	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	1.00 U	21.8 J	31.2	**111**	1.00 U	9.23	14.5
Tetrachloroethene	µg/L	5	**9.00**	50.0 U	**8.38**	1.00 U	**10.6**	2.31	**5.42**
Trichloroethene	µg/L	5	1.01	50.0 U	3.55	1.00 U	0.734 J	4.63	**6.47**
Vinyl chloride	µg/L	2	1.00 U	50.0 U	**16.5**	1.00 U	1.00 U	1.00 U	**2.01**
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	50.0 U	8.96	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	20.0 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	500 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	2170	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	5600	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	250 U	5.00 U	6.07	5.00 U	2.16 J	5.05
Toluene	µg/L	1000	1.00 U	50.0 U	0.313 J	6.53	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
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- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
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TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-62	MW-64	MW-85	MW-88	MW-89	MW-90	MW-92
	Lab ID		L17041110-17	L17041069-21	L17041069-01	L17041069-14	L17041110-11	L17041110-12	L17041069-12
	Date		4/21/2017	4/19/2017	4/19/2017	4/19/2017	4/21/2017	4/21/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.85	**14.1**	2.96	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.300 U	1.26	2.57	0.263 J	0.140 J	1.05	0.300 U
cis-1,2-Dichloroethene	µg/L	70	12.1	0.443 J	28.5	0.345 J	1.00 U	0.341 J	8.81
Tetrachloroethene	µg/L	5	1.00 U	**15.8**	**71.4**	**20.6**	3.64	**13.5**	**103**
Trichloroethene	µg/L	5	0.475 J	**26.7**	**21.6**	1.58	0.871 J	4.32	4.96
Vinyl chloride	µg/L	2	**9.47**	1.00 U	1.48	1.00 U	1.00 U	1.00 U	**4.48**
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.442 J	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.931 J	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.09	1.00 U	1.00 U	1.00 U	0.892 J	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	7.28	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	5.98 J	10.0 U	10.0 U	10.0 U	3.41 J	2.73 J	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Toluene	µg/L	1000	3.05	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
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- : Not Listed
DQE Flags:
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Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-94A	MW-97	MW-98	MW-100B	MW-101T	MW-101B	MW-104
	Lab ID		L17041075-02	L17041069-30	L17041069-43	L17041075-25	L17041110-14	L17041110-13	L17041075-15
	Date		4/20/2017	4/19/2017	4/20/2017	4/20/2017	4/21/2017	4/21/2017	4/20/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.300 U	0.221 J	0.300 U	0.300 U	0.129 J	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	2.38	1.00 U	5.56	15.8	1.00 U	1.00 U	0.521 J
Tetrachloroethene	µg/L	5	**19.2**	1.00 U	**15.3**	**5.53**	**37.1**	**38.0**	1.00 U
Trichloroethene	µg/L	5	**6.67**	**62.1**	2.32	1.62	1.00 U	1.00 U	**8.07**
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	**174**	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.792 J
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	0.504 J	1.00 U	1.00 U	1.92
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	11.8	10.0 U	3.57 J	3.61 J	12.0
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	0.933 J	5.00 U	5.00 U	32.8	2.81 J	2.53 J	5.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	1.69	1.49	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	0.735 J	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
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3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
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- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
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TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-107T	MW-107B	MW-108	MW-113	MW-140	MW-141	MW-143
	Lab ID		L17041075-10	L17041075-09	L17041075-07	L17041069-06	L17041110-24	L17041110-10	L17041110-21
	Date		4/20/2017	4/20/2017	4/20/2017	4/19/2017	4/21/2017	4/21/2017	4/21/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	0.260 J	0.251 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.195 J	0.202 J	3.68	0.300 U	0.162 J	2.11	0.300 U
cis-1,2-Dichloroethene	µg/L	70	1.00 U	1.00 U	0.474 J	54.8	1.00 U	0.253 J	1.00 U
Tetrachloroethene	µg/L	5	**43.1**	**50.2**	4.01	1.00 U	**10.9**	**31.7**	0.417 J
Trichloroethene	µg/L	5	1.11	1.25	**10.8**	1.00 U	1.26	**5.65**	**6.43**
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	**36.9**	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.35	1.00 U	1.00 U	0.607 J	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.65	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	0.694 J	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	3.43 J	6.56 J	4.18 J
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	17.6	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	0.747 J	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-197A	MW-197B	MW-199B	MW-200	MW-202A	MW-202B	MW-203A
	Lab ID		L17041069-35	L17041069-36	L17041110-09	L17041075-01	L17041110-20	L17041110-18	L17041069-37
	Date		4/19/2017	4/19/2017	4/21/2017	4/20/2017	4/21/2017	4/21/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.534 J	1.00 U
Chloroform	µg/L	80	0.300 U	0.300 U	0.225 J	0.300 U	0.167 J	0.427	0.300 U
cis-1,2-Dichloroethene	µg/L	70	0.659 J	3.32	0.396 J	0.737 J	1.00 U	1.00 U	27.6
Tetrachloroethene	µg/L	5	**18.9**	**6.25**	0.264 J	**5.15**	**5.16**	**35.9**	1.00 U
Trichloroethene	µg/L	5	1.08	**11.2**	**50.3**	3.91	1.05	3.37	1.00 U
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.373 J
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	10.1	10.0 U	10.0 U	3.34 J	20.6
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	2.62 J	5.00 U	1.26 J	5.00 U	5.00 U	5.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	7.79
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-203B	MW-204A	MW-204B	MW-205A	MW-205B	MW-206A	MW-206B
	Lab ID		L17041069-38	L17041069-31	L17041069-32	L17041069-45	L17041069-46	L17041069-50	L17041069-49
	Date		4/19/2017	4/19/2017	4/19/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.300 U	0.300 U	0.125 J	0.300 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	47.7	1.06	0.278 J	4.53	9.83	10.6	5.93
Tetrachloroethene	µg/L	5	**9.00**	**27.4**	**12.3**	**10.3**	4.00	**7.35**	**9.88**
Trichloroethene	µg/L	5	**22.7**	1.11	**8.99**	**7.13**	**6.50**	**9.02**	**5.42**
Vinyl chloride	µg/L	2	0.836 J	1.00 U	1.00 U	1.00 U	0.810 J	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.647	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	15.0	10.0 U	10.0 U	10.1	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	4.26 J	5.00 U	5.00 U	2.34 J	4.71 J	4.39 J	3.16 J
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-207A	MW-207B	MW-208A	MW-208B	MW-209A	MW-209B	MW-210A
	Lab ID		L17041075-06	L17041075-05	L17041075-04	L17041075-03	L17041209-02	L17041209-01	L17041069-39
	Date		4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/22/2017	4/22/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	2.09	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	4.17	3.86	0.300 U	1.00	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	0.654 J	0.816 J	10.9	1.00 U	1.00 U	1.00 U	3.14
Tetrachloroethene	µg/L	5	**11.4**	**68.6**	**10.7**	**8.05**	0.418 J	1.30	2.88
Trichloroethene	µg/L	5	**19.6**	**24.0**	**10.0**	3.97	**7.53**	**8.69**	4.76
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.09	0.387 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.56	0.973 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	2.94 J	5.00 U	1.68 J	5.00 U	0.767 J
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-210B	MW-212	MW-213	MW-217	MW-218	MW-219	MW-256
	Lab ID		L17041069-40	L17041110-15	L17041110-25	L17041069-20	L17041069-22	L17041209-04	L17041110-23
	Date		4/19/2017	4/21/2017	4/21/2017	4/19/2017	4/19/2017	4/22/2017	4/21/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	5.00 U	**61.0**	**7.25**	1.00 U	0.633 J
Chloroform	µg/L	80	0.300 U	0.300 U	1.50 U	4.16	2.02	0.300 U	1.48
cis-1,2-Dichloroethene	µg/L	70	0.769 J	1.00 U	15.8	0.950 J	1.00 U	4.57	0.294 J
Tetrachloroethene	µg/L	5	1.70	1.39	5.00 U	**26.8**	**17.7**	**88.2**	**27.9**
Trichloroethene	µg/L	5	**17.5**	**30.5**	3.22 J	**28.4**	**31.3**	**5.11**	**9.77**
Vinyl chloride	µg/L	2	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	2.50 U	0.500 U	1.46	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	0.562 J
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	5.00 U	1.00 U	1.36	1.00 U	0.643 J
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	2.50 U	0.500 U	0.501	0.904	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	2.00 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	50.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	6.83 J	42.8 J	10.0 U	10.0 U	10.0 U	6.42 J
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	70.8	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	25.0 U	5.00 U	5.00 U	5.00 U	5.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	5.00 U	1.11	2.08	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-258	MW-259	MW-262	MW-263	MW-264	MW-265	MW-266
	Lab ID		L17041075-11	L17041069-26	L17041110-22	L17041075-16	L17041075-14	L17041075-12	L17041069-16
	Date		4/20/2017	4/19/2017	4/21/2017	4/20/2017	4/20/2017	4/20/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	4.79	1.00 U	1.00 U	1.00 U	1.00 U	0.278 J
Chloroform	µg/L	80	1.69	2.93	0.300 U	1.82	0.300 U	4.68	0.300 U
cis-1,2-Dichloroethene	µg/L	70	1.89	1.00 U	1.00 U	2.40	1.00 U	0.563 J	1.00 U
Tetrachloroethene	µg/L	5	**25.0**	**14.2**	1.00 U	2.74	1.00 U	**14.2**	1.00 U
Trichloroethene	µg/L	5	**56.3**	**20.1 J**	1.00 U	**32.3**	1.00 U	**8.71**	0.405 J
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.239 J	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	0.312 J	1.00 U	1.00 U	1.99	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	2.21	0.558 J	1.00 U	**11.7**	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	2.29	0.500 U	0.305 J	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	11.7	10.0 U	16.0	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	7.84	5.00 U	5.00 U	7.56	5.00 U	3.26 J	5.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-267	MW-268	MW-269	MW-270	MW-271	MW-272	MW-273
	Lab ID		L17041069-17	L17041069-23	L17041209-05	L17041069-24	L17041069-29	L17041069-25	L17041209-03
	Date		4/19/2017	4/19/2017	4/22/2017	4/19/2017	4/19/2017	4/19/2017	4/22/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	**16.3**	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.388	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	0.431 J	1.00 U	4.66	5.83	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	**35.2**	1.00 U	**64.9**	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	**15.7**	1.00 U	**5.61**	**23.3**	4.82	1.00 U	1.00 U
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
RL: Reporting Limit									
- : Not Listed									
DQE Flags:			0.801	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
J: Concentration estimated			1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
			1.13	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Method:			1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
			0.500 U	0.500 U	1.49	0.500 U	0.500 U	0.500 U	0.500 U
			0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
			10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
			10.0 U	10.0 U	13.1	10.0 U	10.0 U	10.0 U	10.5
			1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.34	1.00 U
			10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
			5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
			1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
			1.00 U	1.00 U	1.00 U	0.866 J	1.00 U	1.00 U	1.00 U
			1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level

U: Not detected above RL

8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-274	MW-275	MW-276	MW-277	MW-278	MW-279	MW-280
	Lab ID		L17041208-01	L17041075-42	L17041075-38	L17041069-41	L17041075-41	L17041075-40	L17041069-42
	Date		4/22/2017	4/20/2017	4/20/2017	4/19/2017	4/20/2017	4/20/2017	4/19/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	3.24
Chloroform	µg/L	80	0.288 J	0.300 U	0.300 U	0.300 U	0.300 U	0.770	0.203 J
cis-1,2-Dichloroethene	µg/L	70	1.00 U	1.00 U	1.00 U	1.00 U	0.348 J	1.60	1.00 U
Tetrachloroethene	µg/L	5	**1.53**	1.00 U	1.00 U	1.00 U	2.54	**67.1**	**5.87**
Trichloroethene	µg/L	5	0.337 J	1.00 U	1.00 U	1.00 U	0.886 J	0.368 J	3.95
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.737	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	36.0	5.00 U
Toluene	µg/L	1000	0.446 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		MW-281	MW-282	MW-283	PMW21-01	PMW21-02	PMW21-03	PMW21-04
	Lab ID		L17041110-29	L17041110-26	L17041208-02	L17041075-21	L17041075-22	L17041075-23	L17041075-24
	Date		4/21/2017	4/21/2017	4/22/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	4.57	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	2.31	1.00 U	1.00 U	**102**	14.4	9.01	17.9
Tetrachloroethene	µg/L	5	**8.21**	1.00 U	1.00 U	1.00 U	**150**	**103**	**142**
Trichloroethene	µg/L	5	**49.9**	1.00 U	1.00 U	1.00 U	**61.0**	**35.3**	**53.1**
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	0.274 J	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	0.687 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	4.24	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	4.34 J	10.0 U	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	3.53 J	5.00 U	5.00 U	12.0	43.9	26.4	27.3
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	6.28	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	0.868 J	2.22	1.15	1.21
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		PMW21-05	PMW85-01	PMW85-05	PMW92-02	PMW92-03	PMW101-02A	PMW101-02B
	Lab ID		L17041075-37	L17041069-02	L17041069-04	L17041069-10	L17041069-07	L17041209-07	L17041110-02
	Date		4/20/2017	4/19/2017	4/19/2017	4/19/2017	4/19/2017	4/24/2017	4/21/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.10	1.00 U	1.00 U	5.00 U	1.00 U
Chloroform	µg/L	80	0.300 U	0.300 U	1.66	0.300 U	0.300 U	1.50 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	0.469 J	30.5	51.8	11.3	27.7 J	3.89 J	18.3
Tetrachloroethene	µg/L	5	**16.2**	1.00 U	**54.2**	1.00 U	1.00 U	3.63 J	0.257 J
Trichloroethene	µg/L	5	2.16	1.00 U	**17.5**	1.00 U	0.547 J	5.00 U	1.00 U
Vinyl chloride	µg/L	2	1.00 U	**57.1**	**8.70**	**95.7**	**4.79**	5.00 U	**4.53**
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	2.50 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	15.9	1.00 U	1.00 U	5.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	2.50 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.517	0.400 U	0.400 U	0.400 U	2.00 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	13.6	50.0 U	10.0 U
Acetone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	13.0	50.0 U	8.14 J
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	8.49 J	50.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	25.0 U	6.71
Toluene	µg/L	1000	1.00 U	4.43	0.286 J	1.00 U	3.50	5.00 U	3.30
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	5.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		PMW101-03A	PMW101-03B	PMW101-04A	PMW101-04B	PMW101-06A	PMW101-06B	PMW101-07A
	Lab ID		L17041110-06	L17041110-05	L17041110-04	L17041110-03	L17041075-32	L17041075-34	L17041075-35
	Date		4/21/2017	4/21/2017	4/21/2017	4/21/2017	4/20/2017	4/20/2017	4/20/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	0.300 U	0.186 J	0.300 U	0.197 J	0.244 J	0.189 J	0.300 U
cis-1,2-Dichloroethene	µg/L	70	1.63	0.284 J	4.27	0.260 J	0.645 J	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	**18.8**	**51.7**	**16.9**	**53.2**	**29.3 J**	**8.06**	1.00 U
Trichloroethene	µg/L	5	2.05	0.747 J	3.61	0.795 J	1.65	1.00 U	0.285 J
Vinyl chloride	µg/L	2	**7.08**	1.00 U	2.03	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
2-Hexanone	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Acetone	µg/L	-	6.39 J	9.10 J	7.41 J	9.38 J	10.0 U	10.0 U	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	14.1	10.1	6.14	19.5	19.0 J	13.3	3.01 J
Toluene	µg/L	1000	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	0.268 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 10
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY
APRIL 2017 LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID		PMW101-07B
	Lab ID		L17041075-36
	Date		4/20/2017
Primary CVOCs	Units	MCL	
Carbon tetrachloride	µg/L	5	1.00 U
Chloroform	µg/L	80	0.300 U
cis-1,2-Dichloroethene	µg/L	70	1.44
Tetrachloroethene	µg/L	5	**8.61**
Trichloroethene	µg/L	5	**19.2**
Vinyl chloride	µg/L	2	1.00 U
Other VOCs			
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U
1,3-Dichloropropane	µg/L	-	0.400 U
2-Hexanone	µg/L	-	10.0 U
Acetone	µg/L	-	10.0 U
Dichlorodifluoromethane	µg/L	-	1.00 U
MEK (2-Butanone)	µg/L	-	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	0.732 J
Toluene	µg/L	1000	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U
Trichlorofluoromethane	µg/L	-	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-1. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Concentration estimated
U: Not detected above RL
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID		DR1-3	DR1-4	DR1-5	DR1-5A	DR1-6	DR1-6A	DR2-1
	Lab ID		L17100514-19	L17100514-25	L17100514-27	L17100514-22	L17100514-14	L17100839-01	L17100514-01
	Date		10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/11/2017	10/6/2017
Primary CVOCs	Units	MCL							
Carbon tetrachloride	µg/L	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**24.5**
Chloroform	µg/L	80	0.300 U	0.256 J	0.300 U	0.300 U	0.158 J	0.300 U	3.51
cis-1,2-Dichloroethene	µg/L	70	4.70	1.00 U	13.5	48.7	1.00 U	33.8	6.84
Tetrachloroethene	µg/L	5	**8.06**	**8.53**	**5.12**	1.00 U	**8.58**	2.45	**150**
Trichloroethene	µg/L	5	**9.81**	1.00 U	0.784 J	1.00 U	1.00 U	**10.5**	**5.46**
Vinyl chloride	µg/L	2	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs									
1,1,2,2-Tetrachloroethane	µg/L	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	-	8.69 J	6.77 J	9.73 J	9.02 J	9.79 J	26.7	9.08 J
Carbon disulfide	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.927 J	1.00 U
Dichlorodifluoromethane	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	-	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	-	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	6.71 J	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	-	19.1	15.5	28.9	0.905 J	5.00 U	5.00 U	5.00 U
o-Xylene	µg/L	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.452 J	1.00 U
Toluene	µg/L	1000	1.00 U	1.00 U	5.21	6.04	1.00 U	0.291 J	1.00 U
trans-1,2-Dichloroethene	µg/L	100	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L		1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on Table D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and for other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	DR2-2	DR2-3	DR2-4	DR2-5	DR2-6	MW-21	MW-25A
	Lab ID	L17100636-22	L17100710-01	L17100636-16	L17100710-22	L17100637-08	L17100514-11	L17100710-05
	Date	10/7/2017	10/10/2017	10/7/2017	10/10/2017	10/8/2017	10/6/2017	10/10/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.95	1.91	50.0 U	1.00 U	1.00 U	0.863 J
Chloroform	µg/L	0.242 J	0.410	0.296 J	15.0 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	3.51	1.00 U	1.00 U	28.0 J	48.9	**136**	1.00 U
Tetrachloroethene	µg/L	4.26	**7.77**	**5.72**	50.0 U	**19.6**	0.413 J	1.37
Trichloroethene	µg/L	0.771 J	0.922 J	0.517 J	50.0 U	**6.59**	2.43	0.470 J
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	**21.9**	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	15.8	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	10.7	4.11 J	10.0 U	2450	12.2	9.94 J	2.59 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	100 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	5080	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	250 U	5.00 U	4.49 J	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	0.586 J	5.45	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	0.265 J	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	0.653 J

Notes:
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3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-26	MW-34	MW-39	MW-39A	MW-50	MW-52	MW-62
	Lab ID	L17100636-31	L17100637-28	L17100637-01	L17100710-06	L17100637-31	L17100710-07	L17100637-57
	Date	10/8/2017	10/8/2017	10/7/2017	10/10/2017	10/8/2017	10/10/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	2.26	0.525 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.442	1.33	0.300 U	0.300 U	2.87	0.731	0.300 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	10.6	15.4	0.854 J	0.701 J	11.8
Tetrachloroethene	µg/L	**8.25**	2.16	1.62	3.93	1.27	**9.54**	1.00 U
Trichloroethene	µg/L	0.739 J	3.95	4.56	**5.64**	3.12	1.58	0.278 J
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	**2.01**	1.00 U	1.00 U	**15.3**
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	3.74 J	2.62 J	8.83 J	11.9	10.0 U	10.0 U	12.9
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	2.58 J	6.40	5.00 U	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.303 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	10.6
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
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3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
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- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
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Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-63B	MW-64	MW-85	MW-88	MW-89	MW-90	MW-92
	Lab ID	L17100637-30	L17100636-29	L17100636-14	L17100636-21	L17100637-25	L17100637-12	L17100636-23
	Date	10/8/2017	10/8/2017	10/7/2017	10/7/2017	10/8/2017	10/8/2017	10/7/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.87	**11.2**	3.16	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.549	1.41	5.41	0.302	0.181 J	1.04	0.300 U
cis-1,2-Dichloroethene	µg/L	0.358 J	0.440 J	40.5	0.266 J	1.00 U	0.279 J	5.86
Tetrachloroethene	µg/L	2.12	**17.5**	**60.6**	**18.8**	2.11	**13.5**	**78.4**
Trichloroethene	µg/L	2.23	**26.3**	**19.8**	1.32	0.784 J	3.82	4.94
Vinyl chloride	µg/L	1.00 U	1.00 U	0.755 J	1.00 U	1.00 U	1.00 U	**2.19**
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.392 J	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.17	1.00 U	1.00 U	1.00 U	1.00 U	0.861 J	1.00 U
1,1-Dichloroethene	µg/L	0.736 J	1.03	1.00 U	1.00 U	1.00 U	0.788 J	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	9.72	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.271 J	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	10.0 U	15.1	8.48 J	4.63 J	10.0 U	10.0 U	13.1
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
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RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
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Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-94A	MW-96	MW-97	MW-98	MW-100B	MW-101T	MW-101B
	Lab ID	L17100636-35	L17100710-08	L17100710-09	L17100637-05	L17100514-09	L17100514-06	L17100514-08
	Date	10/7/2017	10/10/2017	10/10/2017	10/7/2017	10/6/2017	10/6/2017	10/6/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	0.657 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.189 J	0.215 J	0.300 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	2.63	1.00 U	1.00 U	5.65	21.6	1.00 U	1.00 U
Tetrachloroethene	µg/L	**18.0**	0.367 J	1.00 U	**7.71**	2.26	**26.8**	**25.3**
Trichloroethene	µg/L	**6.08**	1.00 U	**71.7**	1.98	1.58	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	**166**	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.541 J	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	3.64 J	10.0 U	14.7	10.6	8.92 J	10.0 U	10.0 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	3.02	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	1.48 J	5.00 U	5.00 U	5.00 U	46.3	2.39 J	1.95 J
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	0.883 J	1.36	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.696 J	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.28	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

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TABLE 11
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ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-103	MW-104	MW-107T	MW-107B	MW-108	MW-113	MW-140
	Lab ID	L17100637-33	L17100637-34	L17100637-27	L17100637-21	L17100637-03	L17100636-27	L17100637-41
	Date	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/7/2017	10/7/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.302 J
Chloroform	µg/L	5.58	0.495	0.607	0.562	3.89	0.300 U	0.185 J
cis-1,2-Dichloroethene	µg/L	0.418 J	0.881 J	1.00 U	1.00 U	0.369 J	40.3	1.00 U
Tetrachloroethene	µg/L	0.257 J	1.00 U	**8.80**	**5.43**	3.30	0.663 J	**11.8**
Trichloroethene	µg/L	**10.5**	**19.3**	1.00 U	1.00 U	**9.76**	1.00 U	1.12
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**28.3**	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	2.22	1.41	1.00 U	1.00 U	1.42	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	2.60	3.79	1.00 U	1.00 U	1.63	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.591 J	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	5.46 J	11.5	15.5 J-	16.4	5.14 J	11.3	3.98 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	8.60	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.951 J	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

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Defense Depot Memphis, Tennessee

	Well ID	MW-141	MW-142	MW-143	MW-197A	MW-197B	MW-198	MW-199A
	Lab ID	L17100637-16	L17100637-58	L17100710-19	L17100636-15	L17100636-07	L17100637-56	L17100637-29
	Date	10/8/2017	10/8/2017	10/10/2017	10/7/2017	10/7/2017	10/8/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	1.86	0.300 U	0.300 U	0.131 J	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.638 J	1.31	1.00 U	1.00 U
Tetrachloroethene	µg/L	**27.1**	1.00 U	0.399 J	**17.9**	**12.6**	1.00 U	1.00 U
Trichloroethene	µg/L	4.39	4.24	**6.71**	0.845 J	**14.9**	1.65	**6.08**
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	0.518 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	3.49 J	5.15 J	6.85 U	13.1	15.0	3.16 J	3.91 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	0.539 J	5.00 U	5.00 U	1.38 J	5.00 U	4.07 J
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-199B	MW-200	MW-202A	MW-202B	MW-203A	MW-203B	MW-204A
	Lab ID	L17100637-18	L17100636-34	L17100637-54	L17100637-50	L17100839-03	L17100710-10	L17100636-20
	Date	10/8/2017	10/7/2017	10/8/2017	10/8/2017	10/12/2017	10/10/2017	10/7/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	0.458 J	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.242 J	0.300 U	0.187 J	0.392	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	0.737 J	1.42	1.00 U	1.00 U	24.7	18.7	1.09
Tetrachloroethene	µg/L	0.295 J	4.88	4.00	**36.8**	0.884 J	3.05	**30.1**
Trichloroethene	µg/L	**51.0**	4.50	0.903 J	3.37	1.42	**11.6**	0.819 J
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**5.91**	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	12.2	12.2	10.0 U	5.80 J	8.90 J	12.2	14.2
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	2.33 J	5.00 U	5.00 U	2.25 J	3.54 J	0.571 J
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.776 J	0.742 J	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-204B	MW-205A	MW-205B	MW-206A	MW-206B	MW-207A	MW-207B
	Lab ID	L17100636-02	L17100636-03	L17100636-04	L17100636-39	L17100637-02	L17100637-07	L17100636-37
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	2.11
Chloroform	µg/L	0.165 J	0.300 U	0.300 U	0.300 U	0.300 U	4.58	1.56
cis-1,2-Dichloroethene	µg/L	1.00 U	4.61	9.07	12.5	6.24	0.607 J	0.467 J
Tetrachloroethene	µg/L	**11.7**	**9.32**	4.19	**6.71**	**9.69**	**10.1**	**24.8**
Trichloroethene	µg/L	**9.30**	**6.82**	**6.75**	**9.35**	**5.39**	**19.5**	**9.40**
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.522	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.20	0.290 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.61	0.591 J
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	11.8	14.2	14.0	7.71 J	4.11 J	9.48 J	9.18 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	2.35 J	4.54 J	6.20	4.17 J	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-208A	MW-208B	MW-209A	MW-209B	MW-210A	MW-210B	MW-212
	Lab ID	L17100636-40	L17100636-38	L17100637-04	L17100636-33	L17100636-08	L17100636-06	L17100637-51
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	1.05	0.300 U	0.169 J	0.142 J	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	11.1	1.00 U	1.00 U	1.00 U	4.46	0.973 J	1.00 U
Tetrachloroethene	µg/L	**10.1**	**8.12**	0.507 J	1.65	2.93	1.47	1.64
Trichloroethene	µg/L	**9.42**	2.10	**7.18**	**7.36**	4.53	**22.2**	**40.1**
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	10.3	5.30 J	3.97 J	2.58 J	8.08 J	9.89 J	11.3
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	3.29 J	5.00 U	1.53 J	5.00 U	1.16 J	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-213	MW-214A	MW-214B	MW-215A	MW-215B	MW-217	MW-218
	Lab ID	L17100637-64	L17100637-15	L17100637-26	L17100637-36	L17100637-23	L17100636-30	L17100637-06
	Date	10/9/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	5.00 U	0.613 J	0.765 J	1.06	1.54	**73.1**	**6.47**
Chloroform	µg/L	1.50 U	2.83	2.46	2.87	0.825	4.99	2.07
cis-1,2-Dichloroethene	µg/L	7.46	1.00 U	1.00 U	1.00 U	1.00 U	1.17	1.00 U
Tetrachloroethene	µg/L	5.00 U	**5.25**	**5.10**	**5.23**	**5.45**	**31.0**	**17.6**
Trichloroethene	µg/L	**13.1**	2.23	1.96	2.29	1.42	**28.0**	**32.3**
Vinyl chloride	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	2.50 U	0.500 U	0.264 J	0.500 U	0.500 U	0.236 J	1.36
1,1-Dichloroethane	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	0.510 J	1.00 U	1.34
1,2,3-Trichloropropane	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.552
Acetone	µg/L	32.1 J	2.65 J	5.49 J	10.0 UJ	10.0 U	18.8	13.9
Carbon disulfide	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	10.0 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	33.1 J	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	25.0 U	0.887 J	0.807 J	1.03 J	3.07 J	5.00 U	5.00 U
o-Xylene	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.25	2.23

Notes:
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MCL: Maximum Contaminant Level
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DQE Flags:
J: Estimated
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Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-219	MW-253	MW-254	MW-255	MW-256	MW-258	MW-259
	Lab ID	L17100636-10	L17100710-16	L17100637-45	L17100637-52	L17100637-49	L17100637-42	L17100710-11
	Date	10/7/2017	10/10/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/10/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.26	1.00 U	0.627 J	1.00 U	4.11
Chloroform	µg/L	0.300 U	0.300 U	0.277 J	0.300 U	1.46	1.97	3.33
cis-1,2-Dichloroethene	µg/L	5.78	1.00 U	0.359 J	1.00 U	1.00 U	1.96	1.00 U
Tetrachloroethene	µg/L	**113**	1.00 U	2.83	0.335 J	**24.5**	**24.4**	**13.7**
Trichloroethene	µg/L	**6.40**	1.00 U	2.22	0.665 J	**8.58**	**55.4**	**18.6**
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.262 J
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.628 J	0.419 J	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.611 J	2.92	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	1.06	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	1.74
Acetone	µg/L	5.15 J	9.08 J	3.02 J	8.37 J	13.2	10.7	13.1
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	0.677 J	5.00 U	5.00 U	5.00 U	7.32	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
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Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-260	MW-261	MW-262	MW-263	MW-264	MW-265	MW-266
	Lab ID	L17100637-22	L17100710-12	L17100637-37	L17100637-38	L17100637-24	L17100637-43	L17100636-18
	Date	10/8/2017	10/10/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/7/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.437 J
Chloroform	µg/L	0.737	0.300 U	0.300 U	1.87	0.300 U	7.36	0.183 J
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.29	1.00 U	0.266 J	1.00 U
Tetrachloroethene	µg/L	0.492 J	0.308 J	1.00 U	2.78	1.00 U	**8.42**	1.33
Trichloroethene	µg/L	4.03	2.73	1.00 U	**32.8**	1.00 U	4.46	0.505 J
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.41	1.00 U	1.00 U	2.23	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.71	1.00 U	1.00 U	**12.8**	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.386 J	0.500 U	0.500 U	0.500 U
Acetone	µg/L	10.0 U	10.0 U	11.0 J-	8.74 J	10.4	5.35 J	7.60 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	0.607 J	5.00 U	5.00 U	8.99	5.00 U	1.82 J	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-267	MW-268	MW-269	MW-270	MW-271	MW-272	MW-273
	Lab ID	L17100637-48	L17100637-19	L17100637-11	L17100637-59	L17100637-61	L17100637-60	L17100637-20
	Date	10/8/2017	10/8/2017	10/8/2017	10/9/2017	10/9/2017	10/9/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	**21.3**	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.581	0.300 U	0.300 U	0.186 J	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	0.361 J	1.00 U	5.19	6.63	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	**37.7**	1.00 U	**70.1**	0.254 J	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	**16.2**	1.00 U	**6.25**	**25.5**	4.84	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.854	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.13	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	1.96	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	15.9	13.7	3.88 J	15.7	5.99 J	2.72 J	5.07 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	4.69	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.920 J	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-274	MW-275	MW-276	MW-277	MW-278	MW-279	MW-280
	Lab ID	L17100710-13	L17100637-09	L17100637-17	L17100710-14	L17100637-44	L17100514-28	L17100637-10
	Date	10/10/2017	10/8/2017	10/8/2017	10/10/2017	10/8/2017	10/6/2017	10/8/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.331 J
Chloroform	µg/L	0.889	0.300 U	0.145 J	0.300 U	0.300 U	0.286 J	0.300 U
cis-1,2-Dichloroethene	µg/L	1.01	1.00 U	1.00 U	1.00 U	0.971 J	13.3	1.00 U
Tetrachloroethene	µg/L	3.17	0.487 J	1.00 U	1.00 U	**7.26**	**58.8**	**8.15**
Trichloroethene	µg/L	1.46	1.00 U	1.00 U	1.00 U	1.94	3.16	1.71
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	1.31	0.500 U	0.500 U
Acetone	µg/L	3.17 J	6.92 J	9.80 J	4.18 J	6.27 J	5.85 J	5.76 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	24.9	5.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-281	MW-282	MW-283	PMW21-01	PMW21-02	PMW21-03	PMW21-04
	Lab ID	L17100637-35	L17100637-46	L17100710-17	L17100514-23	L17100514-18	L17100514-20	L17100514-10
	Date	10/8/2017	10/8/2017	10/10/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	4.91	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U	0.151 J
cis-1,2-Dichloroethene	µg/L	2.12	1.00 U	1.00 U	**93.2**	14.5	10.4	39.1
Tetrachloroethene	µg/L	**15.3**	1.00 U	1.00 U	0.359 J	**119**	**92.1**	**270**
Trichloroethene	µg/L	**66.2**	1.00 U	1.00 U	1.00 U	**71.0**	**41.5**	**146**
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	0.584 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	3.78	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	6.00 J	4.66 J	10.0 U	12.5	7.44 J	11.2	8.79 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.28	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	3.14 J	5.00 U	5.00 U	12.4	56.3	36.3	73.7
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	2.38	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.64	2.99	1.88	3.90
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW21-05	PMW85-01	PMW85-05	PMW92-02	PMW92-03	PMW101-02A	PMW101-02B
	Lab ID	L17100636-09	L17100636-17	L17100636-13	L17100636-28	L17100636-24	L17100514-31	L17100514-07
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/6/2017	10/6/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.971	0.300 U	0.300 U	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	0.368 J	13.1	**123**	5.30	24.6	6.18	14.3
Tetrachloroethene	µg/L	**10.2**	1.00 U	**7.90**	0.790 J	0.535 J	1.00 U	1.00 U
Trichloroethene	µg/L	2.35	1.00 U	4.99	1.00 U	0.463 J	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	**36.9**	1.00 U	**72.2**	**7.76**	1.00 U	**4.58**
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	14.0	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	11.9	9.49 J	4.31 J	10.9	13.1	10.4	7.72 J
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.32	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	5.69 J	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	0.501 J	7.88
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	2.34	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.74	0.592 J	0.363 J	2.10	1.00 U	1.60
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW101-03A	PMW101-03B	PMW101-04A	PMW101-04B	PMW101-06A	PMW101-06B	PMW101-07A
	Lab ID	L17100514-13	L17100514-05	L17100514-30	L17100514-29	L17100514-02	L17100514-12	L17100514-26
	Date	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Primary CVOCs	Units							
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.139 J	0.300 U	0.238 J	0.263 J	0.298 J	0.300 U
cis-1,2-Dichloroethene	µg/L	1.17	0.317 J	5.10	1.00 U	1.00 U	0.714 J	1.00 U
Tetrachloroethene	µg/L	**24.8**	**43.5**	**18.4**	**50.7**	**11.4**	**28.5**	0.962 J
Trichloroethene	µg/L	2.35	0.696 J	4.62	0.951 J	1.00 U	3.22	0.378 J
Vinyl chloride	µg/L	**4.65**	1.00 U	1.74	1.00 U	1.00 U	1.00 U	1.00 U
Other VOCs								
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Acetone	µg/L	7.92 J	9.00 J	11.5	12.1	10.0 U	4.42 J	10.0 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	16.9	8.34	7.11	18.9	22.6	20.6	3.92 J
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 11
MAIN INSTALLATION ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW101-07B
	Lab ID	L17100514-04
	Date	10/6/2017
Primary CVOCs	Units	
Carbon tetrachloride	µg/L	1.00 U
Chloroform	µg/L	0.300 U
cis-1,2-Dichloroethene	µg/L	1.33
Tetrachloroethene	µg/L	**9.08**
Trichloroethene	µg/L	**22.8**
Vinyl chloride	µg/L	1.00 U
Other VOCs		
1,1,2,2-Tetrachloroethane	µg/L	0.500 U
1,1-Dichloroethane	µg/L	1.00 U
1,1-Dichloroethene	µg/L	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U
1,2-Dichloroethane	µg/L	0.500 U
Acetone	µg/L	7.51 J
Carbon disulfide	µg/L	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U
m-,p-Xylene	µg/L	2.00 U
MEK (2-Butanone)	µg/L	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	0.853 J
o-Xylene	µg/L	1.00 U
Toluene	µg/L	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U
Trichlorofluoromethane	µg/L	1.00 U

Notes:
1) Results above MCL shown in **bold**
2) Duplicate sample results are shown on D-2. Sample pairs met criteria for relative percent difference.
3) Results shown for primary CVOCs and other VOCs if detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
RL: Reporting Limit
- : Not Listed

DQE Flags:
J: Estimated
J-: Estimated, Biased Low
U: Not Detected
UJ: Not Detected, RL Estimated

Method:
8260B: Volatile Organic Compounds

TABLE 12
MAIN INSTALLATION, FLUVIAL AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Analyte MCL Date	PCE 5 µg/L	TCE 5 µg/L	cDCE 70 µg/L	VC 2 µg/L	CT 5 µg/L	CF 80 µg/L
DR1-2	Fluvial	TTA-1N	10/14/2016	1.05	-	0.275 J	-	-	0.148 J
DR1-7	Fluvial	TTA-1N	10/14/2016	2.08	-	0.484 J	-	-	0.142 J
DR1-8	Fluvial	TTA-1N	10/13/2016	-	-	-	-	-	-
MW-21	Fluvial	TTA-1N	10/6/2017	0.413 J	2.43	**136**	-	-	-
MW-66A	Fluvial	TTA-1N	10/15/2016	3.8	-	-	-	-	-
MW-100B	Fluvial	TTA-1N	10/6/2017	2.26	1.58	21.6	**166**	-	-
MW-219	Fluvial	TTA-1N	10/7/2017	**113**	**6.4**	5.78	-	-	-
MW-269	Fluvial	TTA-1N	10/8/2017	**70.1**	**6.25**	5.19	-	-	-
MW-278	Fluvial	TTA-1N	10/8/2017	**7.26**	1.94	0.971 J	-	-	-
PMW21-01	Fluvial	TTA-1N	10/6/2017	0.359 J	-	**93.2**	-	-	-
PMW21-02	Fluvial	TTA-1N	10/6/2017	**119**	**71**	14.5	-	-	-
PMW21-03	Fluvial	TTA-1N	10/6/2017	**92.1**	**41.5**	10.4	-	-	-
PMW21-04	Fluvial	TTA-1N	10/6/2017	**270**	**146**	39.1	-	-	0.151 J
PMW21-05	Fluvial	TTA-1N	10/7/2017	**10.2**	2.35	0.368 J	-	-	-
DR1-1	Fluvial	TTA-1S	10/13/2016	1.65	0.265 J	0.633 J	-	-	-
DR1-1A	Fluvial	TTA-1S	10/13/2016	0.308 J	0.264 J	-	-	-	0.344
DR1-3	Fluvial	TTA-1S	10/6/2017	**8.06**	**9.81**	4.7	-	-	-
DR1-4	Fluvial	TTA-1S	10/6/2017	**8.53**	-	-	-	-	0.256 J
DR1-5	Fluvial	TTA-1S	10/6/2017	**5.12**	0.784 J	13.5	-	-	-
DR1-5A	Fluvial	TTA-1S	10/6/2017	-	-	48.7	-	-	-
DR1-6	Fluvial	TTA-1S	10/6/2017	**8.58**	-	-	-	-	0.158 J
DR1-6A	Fluvial	TTA-1S	10/11/2017	2.45	**10.5**	33.8	-	-	-
MW-22	Fluvial	TTA-1S	10/16/2016	-	-	-	-	-	-
MW-101B	Fluvial	TTA-1S	10/6/2017	**25.3**	-	-	-	-	-
MW-101T	Fluvial	TTA-1S	10/6/2017	**26.8**	-	-	-	-	-
MW-279	Fluvial	TTA-1S	10/6/2017	**58.8**	3.16	13.3	-	-	0.286 J
PMW101-02A	Fluvial	TTA-1S	10/6/2017	-	-	6.18	-	-	-
PMW101-02B	Fluvial	TTA-1S	10/6/2017	-	-	14.3	**4.58**	-	-
PMW101-03A	Fluvial	TTA-1S	10/6/2017	**24.8**	2.35	1.17	**4.65**	-	-
PMW101-03B	Fluvial	TTA-1S	10/6/2017	**43.5**	0.696 J	0.317 J	-	-	0.139 J
PMW101-04A	Fluvial	TTA-1S	10/6/2017	**18.4**	4.62	5.1	1.74	-	-
PMW101-04B	Fluvial	TTA-1S	10/6/2017	**50.7**	0.951 J	-	-	-	0.238 J
PMW101-06A	Fluvial	TTA-1S	10/6/2017	**11.4**	-	-	-	-	0.263 J
PMW101-06B	Fluvial	TTA-1S	10/6/2017	**28.5**	3.22	0.714 J	-	-	0.298 J
PMW101-07A	Fluvial	TTA-1S	10/6/2017	0.962 J	0.378 J	-	-	-	-
PMW101-07B	Fluvial	TTA-1S	10/6/2017	**9.08**	**22.8**	1.33	-	-	-

TABLE 12
MAIN INSTALLATION, FLUVIAL AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Analyte MCL Date	PCE 5 µg/L	TCE 5 µg/L	cDCE 70 µg/L	VC 2 µg/L	CT 5 µg/L	CF 80 µg/L
DR2-1	Fluvial	TTA-2	10/6/2017	**150**	**5.46**	6.84	-	**24.5**	3.51
DR2-2	Fluvial	TTA-2	10/7/2017	4.26	0.771 J	3.51	-	-	0.242 J
DR2-3	Fluvial	TTA-2	10/10/2017	**7.77**	0.922 J	-	-	1.95	0.41
DR2-4	Fluvial	TTA-2	10/7/2017	**5.72**	0.517 J	-	-	1.91	0.296 J
DR2-5	Fluvial	TTA-2	10/10/2017	-	-	28.0 J	-	-	-
DR2-6	Fluvial	TTA-2	10/8/2017	**19.6**	**6.59**	48.9	**21.9**	-	-
MW-25A	Fluvial	TTA-2	10/10/2017	1.37	0.470 J	-	-	0.863 J	-
MW-26	Fluvial	TTA-2	10/8/2017	**8.25**	0.739 J	-	-	2.26	0.442
MW-50	Fluvial	TTA-2	10/8/2017	1.27	3.12	0.854 J	-	-	2.87
MW-64	Fluvial	TTA-2	10/8/2017	**17.5**	**26.3**	0.440 J	-	1.87	1.41
MW-85	Fluvial	TTA-2	10/7/2017	**60.6**	**19.8**	40.5	0.755 J	**11.2**	5.41
MW-88	Fluvial	TTA-2	10/7/2017	**18.8**	1.32	0.266 J	-	3.16	0.302
MW-92	Fluvial	TTA-2	10/7/2017	**78.4**	4.94	5.86	**2.19**	-	-
MW-96	Fluvial	TTA-2	10/10/2017	0.367 J	-	-	-	0.657 J	0.189 J
MW-113	Fluvial	TTA-2	10/7/2017	0.663 J	-	40.3	**28.3**	-	-
MW-217	Fluvial	TTA-2	10/8/2017	**31**	**28**	1.17	-	**73.1**	4.99
MW-218	Fluvial	TTA-2	10/8/2017	**17.6**	**32.3**	-	-	**6.47**	2.07
MW-259	Fluvial	TTA-2	10/10/2017	**13.7**	**18.6**	-	-	4.11	3.33
MW-266	Fluvial	TTA-2	10/7/2017	1.33	0.505 J	-	-	0.437 J	0.183 J
MW-267	Fluvial	TTA-2	10/8/2017	**37.7**	**16.2**	0.361 J	-	**21.3**	0.581
MW-280	Fluvial	TTA-2	10/8/2017	**8.15**	1.71	-	-	0.331 J	-
PMW85-01	Fluvial	TTA-2	10/7/2017	-	-	13.1	**36.9**	-	-
PMW85-05	Fluvial	TTA-2	10/7/2017	**7.9**	4.99	**123**	-	-	0.971
PMW92-02	Fluvial	TTA-2	10/7/2017	0.790 J	-	5.3	**72.2**	-	-
PMW92-03	Fluvial	TTA-2	10/7/2017	0.535 J	0.463 J	24.6	**7.76**	-	-
MW-39	Fluvial	W-C	10/7/2017	1.62	4.56	10.6	-	-	-
MW-94A	Fluvial	W-C	10/7/2017	**18**	**6.08**	2.63	-	-	-
MW-98	Fluvial	W-C	10/7/2017	**7.71**	1.98	5.65	-	-	-
MW-197B	Fluvial	W-C	10/7/2017	**12.6**	**14.9**	1.31	-	-	-
MW-200	Fluvial	W-C	10/7/2017	4.88	4.5	1.42	-	-	-
MW-203B	Fluvial	W-C	10/10/2017	3.05	**11.6**	18.7	**5.91**	-	-
MW-204A	Fluvial	W-C	10/7/2017	**30.1**	0.819 J	1.09	-	-	-
MW-204B	Fluvial	W-C	10/7/2017	**11.7**	**9.3**	-	-	-	0.165 J
MW-205B	Fluvial	W-C	10/7/2017	4.19	**6.75**	9.07	-	-	-
MW-206A	Fluvial	W-C	10/7/2017	**6.71**	**9.35**	12.5	-	-	-
MW-206B	Fluvial	W-C	10/7/2017	**9.69**	**5.39**	6.24	-	-	-
MW-207B	Fluvial	W-C	10/7/2017	**24.8**	**9.4**	0.467 J	-	2.11	1.56
MW-208B	Fluvial	W-C	10/7/2017	**8.12**	2.1	-	-	-	1.05
MW-210B	Fluvial	W-C	10/7/2017	1.47	**22.2**	0.973 J	-	-	-
MW-62	Fluvial	B-835	10/8/2017	-	0.278 J	11.8	**15.3**	-	-
MW-142	Fluvial	B-835	10/8/2017	-	4.24	-	-	-	-
MW-143	Fluvial	B-835	10/10/2017	0.399 J	**6.71**	-	-	-	-
MW-198	Fluvial	B-835	10/8/2017	-	1.65	-	-	-	-
MW-199B	Fluvial	B-835	10/8/2017	0.295 J	**51**	0.737 J	-	-	0.242 J
MW-209B	Fluvial	B-835	10/7/2017	1.65	**7.36**	-	-	-	0.169 J
MW-212	Fluvial	B-835	10/8/2017	1.64	**40.1**	-	-	-	-
MW-213	Fluvial	B-835	10/9/2017	-	**13.1**	7.46	-	-	-

TABLE 12
MAIN INSTALLATION, FLUVIAL AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Analyte MCL Date	PCE 5 µg/L	TCE 5 µg/L	cDCE 70 µg/L	VC 2 µg/L	CT 5 µg/L	CF 80 µg/L
MW-63A	Fluvial	N-C	10/14/2016	2.96	1.76	-	-	-	-
MW-63B	Fluvial	N-C	10/8/2017	2.12	2.23	0.358 J	-	-	0.549
MW-103	Fluvial	N-C	10/8/2017	0.257 J	**10.5**	0.418 J	-	-	5.58
MW-104	Fluvial	N-C	10/8/2017	-	**19.3**	0.881 J	-	-	0.495
MW-215B	Fluvial	N-C	10/8/2017	**5.45**	1.42	-	-	1.54	0.825
MW-258	Fluvial	N-C	10/8/2017	**24.4**	**55.4**	1.96	-	-	1.97
MW-260	Fluvial	N-C	10/8/2017	0.492 J	4.03	-	-	-	0.737
MW-263	Fluvial	N-C	10/8/2017	2.78	**32.8**	2.29	-	-	1.87
MW-265	Fluvial	N-C	10/8/2017	**8.42**	4.46	0.266 J	-	-	7.36
MW-281	Fluvial	N-C	10/8/2017	**15.3**	**66.2**	2.12	-	-	4.91
MW-97	Fluvial	S-C	10/10/2017	-	**71.7**	-	-	-	0.215 J
MW-216	Fluvial	S-C	10/14/2016	-	-	-	-	-	0.137 J
MW-261	Fluvial	S-C	10/10/2017	0.308 J	2.73	-	-	-	-
MW-271	Fluvial	S-C	10/9/2017	-	4.84	-	-	-	-
PZ-03	Fluvial	S-C	10/18/2016	1.07	**14.5**	-	-	-	0.204 J
MW-52	Fluvial	SE	10/10/2017	**9.54**	1.58	0.701 J	-	-	0.731
MW-270	Fluvial	SE	10/9/2017	0.254 J	**25.5**	6.63	-	-	0.186 J
MW-16	Fluvial	Background	10/15/2016	-	-	-	-	-	-
MW-19	Fluvial	Background	10/13/2016	-	0.705 J	-	-	-	0.429
MW-23	Fluvial	Background	10/14/2016	-	-	-	-	-	0.154 J
MW-24	Fluvial	Background	10/15/2016	-	-	-	-	-	0.238 J
MW-53	Fluvial	Background	10/15/2016	2.59	-	-	-	-	-
MW-55	Fluvial	Background	10/17/2016	-	-	-	-	-	-
MW-93	Fluvial	Background	10/15/2016	-	-	-	-	-	-
MW-99	Fluvial	Background	10/13/2016	-	-	-	-	-	0.312
MW-102B	Fluvial	Background	10/14/2016	0.381 J	-	-	-	-	-
MW-272	Fluvial	Background	10/9/2017	-	-	-	-	-	-
MW-274	Fluvial	Background	10/10/2017	3.17	1.46	1.01	-	-	0.889
MW-275	Fluvial	Background	10/8/2017	0.487 J	-	-	-	-	-
MW-276	Fluvial	Background	10/8/2017	-	-	-	-	-	0.145 J
MW-277	Fluvial	Background	10/10/2017	-	-	-	-	-	-
MW-282	Fluvial	Background	10/8/2017	-	-	-	-	-	-
MW-283	Fluvial	Background	10/10/2017	-	-	-	-	-	-

Notes:
1) Results above MCL shown in **bold**
µg/L: micrograms per liter
-: Analyte not detected above reporting limit

DQE Flags:
J: Estimated

TABLE 13
MAIN INSTALLATION, INTERMEDIATE AND MEMPHIS AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well	Aquifer	Area	Analyte MCL Date	PCE 5 µg/L	TCE 5 µg/L	cDCE 70 µg/L	VC 2 µg/L	CT 5 µg/L	CF 80 µg/L
IAQ/UC									
MW-268	Upper Claiborne	TTA-2	10/8/2017	-	-	-	-	-	-
MW-39A	Upper Claiborne	W-C	10/10/2017	3.93	**5.64**	15.4	**2.01**	-	-
MW-108	Upper Claiborne	W-C	10/7/2017	3.3	**9.76**	0.369 J	-	-	3.89
MW-197A	Upper Claiborne	W-C	10/7/2017	**17.9**	0.845 J	0.638 J	-	-	0.131 J
MW-203A	Upper Claiborne	W-C	10/12/2017	0.884 J	1.42	24.7	-	-	-
MW-205A	Upper Claiborne	W-C	10/7/2017	**9.32**	**6.82**	4.61	-	-	-
MW-207A	Upper Claiborne	W-C	10/7/2017	**10.1**	**19.5**	0.607 J	-	-	4.58
MW-208A	Upper Claiborne	W-C	10/7/2017	**10.1**	**9.42**	11.1	-	-	-
MW-210A	Intermediate	W-C	10/7/2017	2.93	4.53	4.46	-	-	0.142 J
MW-199A	Intermediate	B-835	10/8/2017	-	**6.08**	-	-	-	-
MW-209A	Intermediate	B-835	10/7/2017	0.507 J	**7.18**	-	-	-	-
MW-214A	Upper Claiborne	N-C	10/8/2017	**5.25**	2.23	-	-	0.613 J	2.83
MW-214B	Upper Claiborne	N-C	10/8/2017	**5.1**	1.96	-	-	0.765 J	2.46
MW-215A	Upper Claiborne	N-C	10/8/2017	**5.23**	2.29	-	-	1.06	2.87
MW-264	Upper Claiborne	N-C	10/8/2017	-	-	-	-	-	-
MW-34	Intermediate	Window	10/8/2017	2.16	3.95	-	-	0.525 J	1.33
MW-38	Intermediate	Window	10/14/2016	-	-	-	-	-	-
MW-89	Intermediate	Window	10/8/2017	2.11	0.784 J	-	-	-	0.181 J
MW-90	Intermediate	Window	10/8/2017	**13.5**	3.82	0.279 J	-	-	1.04
MW-107B	Upper Claiborne	Window	10/8/2017	**5.43**	-	-	-	-	0.562
MW-107T	Upper Claiborne	Window	10/8/2017	**8.8**	-	-	-	-	0.607
MW-141	Intermediate	Window	10/8/2017	**27.1**	4.39	-	-	-	1.86
MW-202A	Intermediate	Window	10/8/2017	4	0.903 J	-	-	-	0.187 J
MW-202B	Intermediate	Window	10/8/2017	**36.8**	3.37	-	-	0.458 J	0.392
MW-211	Intermediate	Window	10/14/2016	0.396 J	-	-	-	-	-
MW-229	Intermediate	Window	10/17/2016	-	-	-	-	-	-
MW-252	Intermediate	Window	10/13/2016	-	-	-	-	-	-
MW-253	Intermediate	Window	10/10/2017	-	-	-	-	-	-
MW-256	Intermediate	Window	10/8/2017	**24.5**	**8.58**	-	-	0.627 J	1.46
MW-262	Intermediate	Window	10/8/2017	-	-	-	-	-	-
MW-273	Intermediate	Window	10/8/2017	-	-	-	-	-	-
MAQ									
MW-140	Memphis	Window	10/8/2017	**11.8**	1.12	-	-	0.302 J	0.185 J
MW-254	Memphis	Window	10/8/2017	2.83	2.22	0.359 J	-	1.26	0.277 J
MW-255	Memphis	Window	10/8/2017	0.335 J	0.665 J	-	-	-	-

Notes:
1) Results above MCL shown in **bold**
µg/L: micrograms per liter
-: Analyte not detected above reporting limit

DQE Flags:
J: Estimated

TABLE 14
MAIN INSTALLATION MCL EXCEEDANCE SUMMARY
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			PCE		TCE		cDCE		VC		CT	
Area	No. of Wells	No. of Wells >MCL	No. of Wells >MCL	Maximum Concentration (µg/L)	No. of Wells >MCL	Maximum Concentration (µg/L)	No. of Wells >MCL	Maximum Concentration (µg/L)	No. of Wells >MCL	Maximum Concentration (µg/L)	No. of Wells >MCL	Maximum Concentration (µg/L)
Fluvial												
TTA-1N	13	9	6	*270*	5	*146*	2	*136*	1	*166*	0	-
TTA-1S	21	15	13	*58.8*	3	*22.8*	0	-	2	*4.65*	0	-
TTA-2	25	19	15	*150*	8	*32.3*	1	*123*	6	*72.2*	5	*73.1*
West-Central	14	12	9	*30.1*	9	*22.2*	0	-	1	*5.91*	0	-
Building 835	8	6	0	-	5	*51*	0	-	1	*15.3*	0	-
North-Central	10	7	4	*24.4*	5	*55.4*	0	-	0	-	0	-
South-Central	5	2	0	-	2	*71.7*	0	-	0	-	0	-
Southeastern MI	2	2	1	*9.54*	1	*25.5*	0	-	0	-	0	-
Background	17	1	1	*7.26*	-	-	-	-	-	-	-	-
Fluvial Summary	**115**	**73**	**49**	***270***	**38**	***146***	**3**	***136***	**11**	***166***	**5**	***73.1***
IAQ/UC												
TTA-2	1	0	-	-	-	-	-	-	-	-	-	-
West-Central	8	6	4	*17.9*	5	*19.5*	0	-	1	*2.01*	0	-
Building 835	2	2	0	-	2	*7.18*	0	-	0	-	0	-
North-Central	4	3	3	*5.25*	0	-	0	-	0	-	0	-
Window	15	6	6	*36.8*	1	*8.58*	0	-	0	-	0	-
IAQ/UC Summary	**30**	**17**	**13**	***36.8***	**8**	***19.5***	**0**	**-**	**1**	***2.01***	**0**	**-**
MAQ												
Window	3	1	1	*11.8*	0	-	0	-	0	-	0	-
MI Summary	**148**	**91**	**63**	***270***	**46**	***146***	**3**	***136***	**12**	***166***	**5**	**73.1**

Notes:
µg/L: micrograms per liter
MCL: maximum contaminant level

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-03	MW-04	MW-06	MW-07	MW-08	MW-13
	Lab ID			L17041200-26	L17041200-23	L17041200-08	L17041200-28	L17041203-26	L17041200-22
	Date			4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.205 J	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.05	1.00 U	1.00 U	**12.9**	2.11	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.688	**15.3**	0.252 J	0.300 U	0.177 J
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	3.40	0.320 J	0.256 J	1.00 U
Tetrachloroethene	µg/L	5	2.5	2.38	1.00 U	1.00 U	**32.2**	**4.29**	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	2.66	1.00 U	0.876 J	**32.9**	**7.49**	1.00 U
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			6.09	0.688	19.6	78.6	14.6	0.177
Other VOCs									
Acetone	µg/L			7.92 J	2.52 J	4.76 J	7.81 J	10.0 U	10.0 U

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-15	MW-28	MW-31	MW-44	MW-54	MW-57
	Lab ID			L17041200-05	L17041203-22	L17041200-30	L17041203-15	L17041200-38	L17041200-01
	Date			4/22/2017	4/23/2017	4/22/2017	4/23/2017	4/22/2017	4/22/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.280 J	0.448 J	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	**16.2**	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.272 J
Chloroform	µg/L	80	12	0.311	0.149 J	0.203 J	3.97	0.321	0.324
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	0.350 J	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	0.293 J	1.00 U	**25.1**	1.00 U	0.282 J	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	1.00 U	**32.4**	1.83	1.74	**5.61**
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0.604	0.149	74.3	6.08	2.79	6.21
Other VOCs									
Acetone	µg/L			10.0 U	2.70 J	8.01 J	4.37 J-	3.50 J	9.53 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-58	MW-67	MW-68	MW-69	MW-70	MW-71
	Lab ID			L17041203-27	L17041203-23	L17041203-43	L17041203-45	L17041203-35	L17041203-36
	Date			4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.394 J	0.500 U	0.500 U	0.500 U	1.08	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.894	0.300 U	0.137 J	0.300 U	0.300 U	2.13
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.308 J
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	0.727 J	1.00 U	1.00 U	0.956 J	**5.69**	1.03
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			2.02	0	0.137	0.956	6.77	3.47
Other VOCs									
Acetone	µg/L			10.0 U	9.50 J	10.0 UJ	6.33 J-	7.11 J	12.5

Notes:
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3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-76	MW-77	MW-78	MW-79	MW-80	MW-87
	Lab ID			L17041203-33	L17041203-34	L17041203-32	L17041203-05	L17041203-10	L17041200-09
	Date			4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/22/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.237 J	1.59	0.500 U	0.500 U	0.500 U	1.18
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.55
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	4.72	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.183 J	0.295 J	0.300 U	0.164 J	0.300 U	**100**
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	7.57
Tetrachloroethene	µg/L	5	2.5	1.00 U	0.294 J	1.00 U	**7.64**	1.00 U	0.463 J
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.293 J
Trichloroethene	µg/L	5	5	0.777 J	4.37	1.00 U	**7.53**	1.00 U	**7.32**
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			1.20	6.55	0	20.1	0	117
Other VOCs									
Acetone	µg/L			6.26 J	4.05 J	4.65 J	7.82 J-	10.0 U	6.58 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-91	MW-126	MW-129	MW-130	MW-134	MW-144
	Lab ID			L17041200-06	L17041203-29	L17041203-18	L17041203-19	L17041200-19	L17041203-38
	Date			4/22/2017	4/23/2017	4/23/2017	4/23/2017	4/22/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	**8.04**
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	**10.9**	**9.50**	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.300 U	0.300 U	0.333	0.162 J	0.406
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	0.387 J	1.00 U	0.709 J
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	**13.3**	**22.5**	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	1.00 U	**15.0**	**49.1 J**	1.00 U	**33.2**
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0	0	39.2	81.8	0.162	42.4
Other VOCs									
Acetone	µg/L			3.19 J	10.0 U	6.88 J-	7.26 J-	6.58 J	11.3

Notes:
1) Results above MCL or TC shown in **bold.**
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3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-145	MW-147	MW-148	MW-149	MW-150	MW-151
	Lab ID			L17041203-08	L17041200-31	L17041200-32	L17041200-43	L17041200-36	L17041200-55
	Date			4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.242 J	0.214 J	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	0.534 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	3.09	0.144 J	0.136 J	8.85	0.563	1.78
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	9.25	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	0.260 J	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.82	1.00 U	1.00 U	1.58	0.936 J	0.772 J
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			5.44	0.144	0.136	20.2	1.71	2.55
Other VOCs									
Acetone	µg/L			10.0 U	10.0 U	5.26 J	7.05 J	3.48 J	3.63 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-152	MW-153	MW-154	MW-155	MW-157	MW-158
	Lab ID			L17041203-04	L17041203-06	L17041203-24	L17041200-39	L17041203-42	L17041200-48
	Date			4/23/2017	4/23/2017	4/23/2017	4/22/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	1.02
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.300 U	0.300 U	0.217 J	0.956	0.300 U
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	1.00 U	2.08	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	0.261 J	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	0.378 J	1.00 U	1.00 U	1.00 U	0.375 J	1.35
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0.378	0	0	0.478	3.41	2.37
Other VOCs									
Acetone	µg/L			6.44 J	10.0 U	10.0 U	2.60 J	4.46 J-	11.8

Notes:
1) Results above MCL or TC shown in **bold.**
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3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-158A	MW-159	MW-160	MW-163	MW-164	MW-165
	Lab ID			L17041200-49	L17041200-42	L17041200-34	L17041203-37	L17041203-40	L17041203-01
	Date			4/23/2017	4/22/2017	4/22/2017	4/23/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	**10.1**	0.500 U	0.412 J	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	**3.27**	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	2.58	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.127 J	0.300 U	0.234 J	1.16	0.300 U
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	22.6	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	0.515 J	0.407 J	0.351 J	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	2.76	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	**141**	1.00 U	1.52	1.21	1.20
Vinyl chloride	µg/L	2	-	1.00 U	**6.32**	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0	189	0.407	2.52	2.37	1.20
Other VOCs									
Acetone	µg/L			4.56 J	7.37 J	10.0 U	10.6	3.45 J	4.84 J

Notes:
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3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-165A	MW-166	MW-166A	MW-167	MW-169	MW-170
	Lab ID			L17041200-59	L17041200-53	L17041200-54	L17041203-13	L17041203-30	L17041203-31
	Date			4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	0.297 J	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.251 J	3.73	4.15	2.98	0.300 U	0.300 U
cis-1,2-Dichloroethene	µg/L	70	35	0.339 J	0.853 J	10.1	1.00 U	1.51	3.45
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	1.03	1.30	1.60	0.412 J	1.62
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.268 J
Total Primary CVOCs	µg/L			0.590	5.61	15.6	4.88	1.92	5.34
Other VOCs									
Acetone	µg/L			2.76 J	8.45 J	5.54 J	10.0 UJ	3.62 J	4.45 J

Notes:
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3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-171	MW-174	MW-176	MW-180	MW-182	MW-184
	Lab ID			L17041203-16	L17041200-04	L17041200-10	L17041200-25	L17041203-25	L17041203-41
	Date			4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.542 J
Chloroform	µg/L	80	12	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U	1.40
cis-1,2-Dichloroethene	µg/L	70	35	8.28	1.00 U	1.00 U	1.00 U	1.00 U	0.396 J
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	0.273 J	1.00 U	1.00 U	0.272 J
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	2.92	1.00 U	1.00 U	1.00 U	1.00 U	0.994 J
Vinyl chloride	µg/L	2	-	0.563 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			11.8	0	0.273	0	0	3.60
Other VOCs									
Acetone	µg/L			2.84 J-	10.0 U	10.0 U	10.0 U	3.36 J	7.82 J-

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-187	MW-190	MW-220	MW-221	MW-222	MW-223
	Lab ID			L17041200-20	L17041203-39	L17041200-27	L17041200-24	L17041200-16	L17041200-14
	Date			4/22/2017	4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	**3.54**	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	**7.66**	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.224 J	0.203 J	0.300 U	0.300 U	0.327
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	0.428 J	**14.8**	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	**8.16**	**17.4**	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0	12.4	40.1	0	0	0.327
Other VOCs									
Acetone	µg/L			10.0 U	9.21 J	27.3	9.12 J	8.13 J	5.47 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-224	MW-225	MW-226	MW-227	MW-228	MW-230
	Lab ID			L17041200-18	L17041200-11	L17041200-15	L17041200-02	L17041200-03	L17041200-29
	Date			4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**7.70**
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.462	0.300 U	0.169 J	0.300 U	0.300 U	0.264 J
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.286 J
Tetrachloroethene	µg/L	5	2.5	1.00 U	0.516 J	1.00 U	1.00 U	0.343 J	**22.0**
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	**28.2**
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0.462	0.516	0.169	0	0.343	58.5
Other VOCs									
Acetone	µg/L			7.58 J	8.82 J	10.0 U	2.81 J	10.0 U	7.94 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-235	MW-237	MW-241	MW-242	MW-243	MW-244
	Lab ID			L17041203-09	L17041200-52	L17041200-33	L17041200-35	L17041200-40	L17041200-44
	Date			4/23/2017	4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U	0.500 U	0.500 U	0.500 U	1.68	0.330 J
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	4.03	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.300 U	0.147 J	0.300 U	0.300 U	0.256 J
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	0.349 J	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	1.00 U	1.00 U	0.470 J	1.00 U	3.20	0.738 J
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0	4.38	0.617	0	4.88	1.32
Other VOCs									
Acetone	µg/L			2.57 J-	9.25 J	4.14 J	4.59 J	7.24 J	5.96 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-245	MW-246	MW-247	MW-248	MW-249	MW-250
	Lab ID			L17041200-41	L17041200-50	L17041200-56	L17041203-14	L17041203-07	L17041200-46
	Date			4/22/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Primary CVOCs	Units	MCL	TC						
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.248 J	**4.78**	0.206 J	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	0.385 J	1.00 U
Chloroform	µg/L	80	12	0.300 U	0.300 U	0.308	0.300 U	2.95	0.300 U
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U	1.00 U	0.448 J	1.00 U	0.318 J	1.00 U
Tetrachloroethene	µg/L	5	2.5	1.00 U	1.00 U	1.00 U	1.00 U	0.373 J	1.00 U
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5	5	0.585 J	0.849 J	0.666 J	1.00 U	1.76	1.00 U
Vinyl chloride	µg/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	µg/L			0.833	5.63	1.63	0	5.79	0
Other VOCs									
Acetone	µg/L			6.59 J	8.07 J	9.07 J	10.0 UJ	8.95 J	11.6

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 15
DUNN FIELD ANALYTICAL RESULTS SUMMARY, APRIL 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-251
	Lab ID			L17041200-45
	Date			4/23/2017
Primary CVOCs	Units	MCL	TC	
1,1,2,2-Tetrachloroethane	µg/L	-	2.2	0.500 U
1,1,2-Trichloroethane	µg/L	5	1.9	1.00 U
1,1-Dichloroethene	µg/L	7	7	4.73
1,2-Dichloroethane	µg/L	5	-	0.500 U
Carbon tetrachloride	µg/L	5	3	1.00 U
Chloroform	µg/L	80	12	0.491
cis-1,2-Dichloroethene	µg/L	70	35	1.00 U
Tetrachloroethene	µg/L	5	2.5	0.533 J
trans-1,2-Dichloroethene	µg/L	100	50	1.00 U
Trichloroethene	µg/L	5	5	0.970 J
Vinyl chloride	µg/L	2	-	1.00 U
Total Primary CVOCs	µg/L			6.72
Other VOCs				
Acetone	µg/L			6.65 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-3. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Methods:
8260B: Volatile Organic Compounds

TABLE 16
DUNN FIELD ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-06	MW-57	MW-70	MW-77	MW-87	MW-144
	Lab ID			L17100532-19	L17100532-12	L17100532-11	L17100532-18	L17100532-17	L17100532-14
	Date			10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Analyte	**Units**	MCL	TC						
1,1,2,2-Tetrachloroethane	ug/L	-	2.2	0.500 U	0.500 U	0.477 J	0.705	1.89	**3.57**
1,1,2-Trichloroethane	ug/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U	**2.40**	1.00 U
1,1-Dichloroethene	ug/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	ug/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.272 J	0.500 U
Carbon tetrachloride	ug/L	5	3	1.00 U	0.382 J	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	ug/L	80	12	8.03	0.659	0.215 J	0.307	**110**	0.490
cis-1,2-Dichloroethene	ug/L	70	35	2.08	1.00 U	1.00 U	1.00 U	9.48	0.345 J
Tetrachloroethene	ug/L	5	2.5	1.00 U	1.00 U	1.00 U	0.293 J	0.432 J	1.00 U
trans-1,2-Dichloroethene	ug/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U	0.298 J	1.00 U
Trichloroethene	ug/L	5	5	0.375 J	**6.04**	3.71	2.40	**8.00**	**20.5**
Vinyl chloride	ug/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	ug/L			10.5	7.08	4.40	3.71	133	24.9
Acetone	ug/L			2.80 J	5.17 J	6.12 J	4.59 J	5.93 J	8.46 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-4. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
U: Not Detected
Methods:
8260B: Volatile Organic Compounds

TABLE 16
DUNN FIELD ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-149	MW-150	MW-159	MW-163	MW-165	MW-166
	Lab ID			L17100532-07	L17100532-05	L17100532-06	L17100532-09	L17100532-15	L17100532-01
	Date			10/5/2017	10/5/2017	10/5/2017	10/5/2017	10/6/2017	10/5/2017
Analyte	**Units**	MCL	TC						
1,1,2,2-Tetrachloroethane	ug/L	-	2.2	0.347 J	**2.57**	**8.36**	0.265 J	0.500 U	0.500 U
1,1,2-Trichloroethane	ug/L	5	1.9	1.00 U	1.00 U	**3.25**	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	ug/L	7	7	1.00 U	1.00 U	2.64	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	ug/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	ug/L	5	3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	ug/L	80	12	**14.4**	0.642	0.138 J	0.210 J	0.133 J	8.21
cis-1,2-Dichloroethene	ug/L	70	35	8.36	1.00 U	21.4	1.00 U	1.00 U	3.42
Tetrachloroethene	ug/L	5	2.5	0.274 J	1.00 U	0.631 J	0.317 J	1.00 U	0.266 J
trans-1,2-Dichloroethene	ug/L	100	50	1.00 U	1.00 U	2.41	1.00 U	1.00 U	1.00 U
Trichloroethene	ug/L	5	5	1.68	**7.71**	**146**	1.05	1.01	1.26
Vinyl chloride	ug/L	2	-	1.00 U	1.00 U	**5.96**	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	ug/L			25.1	10.9	191	1.84	1.14	13.2
Acetone	ug/L			2.99 J	3.21 J	3.90 J	5.52 J	3.19 J	10.0 U

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-4. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
U: Not Detected
Methods:
8260B: Volatile Organic Compounds

TABLE 16
DUNN FIELD ANALYTICAL RESULTS SUMMARY, OCTOBER 2017
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID			MW-166A	MW-190	MW-246	MW-249
	Lab ID			L17100532-04	L17100532-16	L17100532-03	L17100532-02
	Date			10/5/2017	10/6/2017	10/5/2017	10/5/2017
Analyte	**Units**	MCL	TC				
1,1,2,2-Tetrachloroethane	ug/L	-	2.2	0.334 J	**3.16**	**3.60**	0.500 U
1,1,2-Trichloroethane	ug/L	5	1.9	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	ug/L	7	7	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	ug/L	5	-	0.500 U	0.500 U	0.500 U	0.500 U
Carbon tetrachloride	ug/L	5	3	1.00 U	1.00 U	1.00 U	0.383 J
Chloroform	ug/L	80	12	10.0	0.253 J	0.300 U	3.07
cis-1,2-Dichloroethene	ug/L	70	35	9.62	1.00 U	1.00 U	0.701 J
Tetrachloroethene	ug/L	5	2.5	1.00 U	0.486 J	1.00 U	0.264 J
trans-1,2-Dichloroethene	ug/L	100	50	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	ug/L	5	5	1.78	**11.0**	0.597 J	1.85
Vinyl chloride	ug/L	2	-	1.00 U	1.00 U	1.00 U	1.00 U
Total Primary CVOCs	ug/L			21.7	14.9	4.20	6.27
Acetone	ug/L			3.00 J	6.25 J	5.76 J	5.00 J

Notes:
1) Results above MCL or TC shown in **bold.**
2) Duplicate sample results are shown on Table D-4. Criteria for relative percent difference were met.
3) Results shown for primary CVOCs and for other VOCs detected above the RL.
µg/L: micrograms per liter
MCL: Maximum Contaminant Level
TC: Target Concentration
RL: Reporting Limit
- : Not Listed
DQE Flags:
J: Estimated
U: Not Detected
Methods:
8260B: Volatile Organic Compounds

TABLE 17
DUNN FIELD, FLUVIAL AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Analyte	TeCA	TCA	PCE	TCE	DCE	cDCE	VC	CF
			MCL	-	5	5	5	7	70	2	80
			TC	2.2	1.9	2.5	5	7	35	-	12
			Date	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-03	Fluvial	DF North	4/22/2017	-	-	2.38	2.66	1.05	-	-	-
MW-07	Fluvial	DF North	4/22/2017	-	-	**32.2**	**32.9**	**12.9**	0.320 J	-	0.252 J
MW-08	Fluvial	DF North	4/22/2017	0.205 J	-	**4.29**	**7.49**	2.11	0.256 J	-	-
MW-31	Fluvial	DF North	4/22/2017	-	-	**25.1**	**32.4**	**16.2**	0.350 J	-	0.203 J
MW-68	Fluvial	DF North	4/23/2017	-	-	-	-	-	-	-	0.137 J
MW-78	Fluvial	DF North	4/23/2017	-	-	-	-	-	-	-	-
MW-79	Fluvial	DF North	4/23/2017	-	-	**7.64**	**7.53**	4.72	-	-	0.164 J
MW-129	Fluvial	DF North	4/23/2017	-	-	**13.3**	**15.0**	**10.9**	-	-	-
MW-130	Fluvial	DF North	4/23/2017	-	-	**22.5**	**49.1 J**	**9.50**	0.387 J	-	0.333
MW-147	Fluvial	DF North	4/22/2017	-	-	-	-	-	-	-	0.144 J
MW-153	Fluvial	DF North	4/23/2017	-	-	-	-	-	-	-	-
MW-171	Fluvial	DF North	4/23/2017	-	-	-	2.92	-	8.28	0.563 J	-
MW-180	Fluvial	DF North	4/22/2017	-	-	-	-	-	-	-	-
MW-220	Fluvial	DF North	4/22/2017	-	-	**14.8**	**17.4**	**7.66**	-	-	0.203 J
MW-230	Fluvial	DF North	4/22/2017	-	-	**22.0**	**28.2**	**7.70**	0.286 J	-	0.264 J
MW-06	Fluvial	DF West	10/6/2017	-	-	-	0.375 J	-	2.08	-	8.03
MW-15	Fluvial	DF West	4/22/2017	-	-	0.293 J	-	-	-	-	0.311
MW-57	Fluvial	DF West	10/6/2017	-	-	-	**6.04**	-	-	-	0.659
MW-69	Fluvial	DF West	4/23/2017	-	-	-	0.956 J	-	-	-	-
MW-70	Fluvial	DF West	10/6/2017	0.477 J	-	-	3.71	-	-	-	0.215 J
MW-71	Fluvial	DF West	4/23/2017	-	-	0.308 J	1.03	-	-	-	2.13
MW-87	Fluvial	DF West	10/6/2017	1.89	**2.40**	0.432 J	**8.00**	-	9.48	-	**110**
MW-91	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	-
MW-134	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	0.162 J
MW-174	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	-
MW-176	Fluvial	DF West	4/22/2017	-	-	0.273 J	-	-	-	-	-
MW-221	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	-
MW-222	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	-
MW-223	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	0.327
MW-224	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	0.462
MW-225	Fluvial	DF West	4/22/2017	-	-	0.516 J	-	-	-	-	-
MW-226	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	0.169 J
MW-227	Fluvial	DF West	4/22/2017	-	-	-	-	-	-	-	-
MW-228	Fluvial	DF West	4/22/2017	-	-	0.343 J	-	-	-	-	-

TABLE 17
DUNN FIELD, FLUVIAL AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Analyte	TeCA	TCA	PCE	TCE	DCE	cDCE	VC	CF
			MCL	-	5	5	5	7	70	2	80
			TC	2.2	1.9	2.5	5	7	35	-	12
			Date	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-44	Fluvial	Off Depot	4/23/2017	0.280 J	-	-	1.83	-	-	-	3.97
MW-54	Fluvial	Off Depot	4/22/2017	0.448 J	-	0.282 J	1.74	-	-	-	0.321
MW-76	Fluvial	Off Depot	4/23/2017	0.237 J	-	-	0.777 J	-	-	-	0.183 J
MW-77	Fluvial	Off Depot	10/6/2017	0.705	-	0.293 J	2.40	-	-	-	0.307
MW-144	Fluvial	Off Depot	10/6/2017	**3.57**	-	-	**20.5**	-	0.345 J	-	0.490
MW-145	Fluvial	Off Depot	4/23/2017	-	-	-	1.82	-	-	-	3.09
MW-148	Fluvial	Off Depot	4/22/2017	-	-	-	-	-	-	-	0.136 J
MW-149	Fluvial	Off Depot	10/5/2017	0.347 J	-	0.274 J	1.68	-	8.36	-	**14.4**
MW-150	Fluvial	Off Depot	10/5/2017	**2.57**	-	-	**7.71**	-	-	-	0.642
MW-151	Fluvial	Off Depot	4/23/2017	-	-	-	0.772 J	-	-	-	1.78
MW-152	Fluvial	Off Depot	4/23/2017	-	-	-	0.378 J	-	-	-	-
MW-155	Fluvial	Off Depot	4/22/2017	-	-	0.261 J	-	-	-	-	0.217 J
MW-157	Fluvial	Off Depot	4/23/2017	-	-	-	0.375 J	-	2.08	-	0.956
MW-158	Fluvial	Off Depot	4/23/2017	1.02	-	-	1.35	-	-	-	-
MW-158A	Fluvial	Off Depot	4/23/2017	-	-	-	-	-	-	-	-
MW-159	Fluvial	Off Depot	10/5/2017	**8.36**	**3.25**	0.631 J	**146**	2.64	21.4	**5.96**	0.138 J
MW-160	Fluvial	Off Depot	4/22/2017	-	-	0.407 J	-	-	-	-	-
MW-163	Fluvial	Off Depot	10/5/2017	0.265 J	-	0.317 J	1.05	-	-	-	0.210 J
MW-164	Fluvial	Off Depot	4/23/2017	-	-	-	1.21	-	-	-	1.16
MW-165	Fluvial	Off Depot	10/6/2017	-	-	-	1.01	-	-	-	0.133 J
MW-165A	Fluvial	Off Depot	4/23/2017	-	-	-	-	-	0.339 J	-	0.251 J
MW-166	Fluvial	Off Depot	10/5/2017	-	-	0.266 J	1.26	-	3.42	-	8.21
MW-166A	Fluvial	Off Depot	10/5/2017	0.334 J	-	-	1.78	-	9.62	-	10.0
MW-184	Fluvial	Off Depot	4/23/2017	-	-	0.272 J	0.994 J	-	0.396 J	-	1.40
MW-190	Fluvial	Off Depot	10/6/2017	**3.16**	-	0.486 J	**11.0**	-	-	-	0.253 J
MW-241	Fluvial	Off Depot	4/22/2017	-	-	-	0.470 J	-	-	-	0.147 J
MW-242	Fluvial	Off Depot	4/22/2017	-	-	-	-	-	-	-	-
MW-243	Fluvial	Off Depot	4/22/2017	1.68	-	-	3.20	-	-	-	-
MW-244	Fluvial	Off Depot	4/23/2017	0.330 J	-	-	0.738 J	-	-	-	0.256 J
MW-245	Fluvial	Off Depot	4/22/2017	0.248 J	-	-	0.585 J	-	-	-	-
MW-246	Fluvial	Off Depot	10/5/2017	**3.60**	-	-	0.597 J	-	-	-	-
MW-247	Fluvial	Off Depot	4/23/2017	0.206 J	-	-	0.666 J	-	0.448 J	-	0.308
MW-248	Fluvial	Off Depot	4/23/2017	-	-	-	-	-	-	-	-
MW-249	Fluvial	Off Depot	10/5/2017	-	-	0.264 J	1.85	-	0.701 J	-	3.07
MW-04	Fluvial	Background	4/22/2017	-	-	-	-	-	-	-	0.688
MW-13	Fluvial	Background	4/22/2017	-	-	-	-	-	-	-	0.177 J
MW-28	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	0.149 J
MW-58	Fluvial	Background	4/23/2017	0.394 J	-	-	0.727 J	-	-	-	0.894
MW-80	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	-
MW-126	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	-
MW-154	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	-
MW-167	Fluvial	Background	4/23/2017	-	-	-	1.60	-	-	-	2.98
MW-170	Fluvial	Background	4/23/2017	-	-	-	1.62	-	3.45	0.268 J	-
MW-182	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	-
MW-187	Fluvial	Background	4/22/2017	-	-	-	-	-	-	-	-
MW-235	Fluvial	Background	4/23/2017	-	-	-	-	-	-	-	-

Notes:
1) Results above MCL or TC shown in **bold**
µg/L: micrograms per liter
-: Analyte not detected above reporting limit
DQE Flags:
J: Estimated

TABLE 18
DUNN FIELD, INTERMEDIATE AND MEMPHIS AQUIFER WELL RESULTS BY AREA
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			Analyte	TeCA	TCA	PCE	TCE	DCE	cDCE	VC	CF
			MCL	-	5	5	5	7	70	2	80
			TC	2.2	1.9	2.5	5	7	35	-	12
Well ID	Aquifer	Area	Date	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
IAQ/UC											
MW-237	Intermediate	Off Depot	4/23/2017	-	-	-	-	4.03	0.349 J	-	-
MW-250	Intermediate	Off Depot	4/23/2017	-	-	-	-	-	-	-	-
MW-251	Intermediate	Off Depot	4/23/2017	-	-	0.533 J	0.970 J	4.73	-	-	0.491
MW-169	Intermediate	Background	4/23/2017	-	-	-	0.412 J	-	1.51	-	-
MAQ											
MW-67	Memphis	Background	4/23/2017	-	-	-	-	-	-	-	-

Notes:
1) Results above MCL or TC shown in **bold**
µg/L: micrograms per liter
-: Analyte not detected above reporting limit

DQE Flags:
J: Estimated

TABLE 19
DUNN FIELD MCL EXCEEDANCE SUMMARY
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			TeCA		TCA		PCE		TCE	
Area	No. of Wells	No. of Wells >TC or MCL	No. of Wells >TC	Maximum Concentration (µg/L)	No. of Wells >TC or MCL	Maximum Concentration (µg/L)	No. of Wells >TC or MCL	Maximum Concentration (µg/L)	No. of Wells >TC or MCL	Maximum Concentration (µg/L)
Fluvial										
DF North	15	8	0	-	0	-	8	*32.2*	8	*49.1*
DF West	19	2	0	-	1	*2.40*	0	-	2	*8.00*
Off Depot	34	6	5	*8.36*	1	*3.25*	0	-	4	*146*
Background	12	0	-	-	-	-	-	-	-	-
Fluvial Summary	**80**	**16**	**5**	***8.36***	**2**	***3.25***	**8**	***32.2***	**14**	***146***
IAQ/UC										
Off Depot	3	0	-	-	-	-	-	-	-	-
Background	1	0	-	-	-	-	-	-	-	-
IAQ/UC Summary	**4**	**0**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
MAQ										
Background	1	0	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
Dunn Field Summary	**85**	**16**	**5**	***8.36***	**2**	***3.25***	**8**	***32.2***	**14**	***146***

Notes:
µg/L: micrograms per liter
MCL: maximum contaminant level

TABLE 19
DUNN FIELD MCL EXCEEDANCE SUMMARY
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

			DCE		VC		CF	
Area	No. of Wells	No. of Wells >TC or MCL	No. of Wells >TC or MCL	Maximum Concentration (µg/L)	No. of Wells >MCL	Maximum Concentration (µg/L)	No. of Wells >TC or MCL	Maximum Concentration (µg/L)
Fluvial								
DF North	15	8	6	*16.2*	0	-	0	-
DF West	19	2	0	-	0	-	1	*110*
Off Depot	34	6	0	-	1	*5.96*	1	*14.4*
Background	12	0	-	-	-	-	-	-
Fluvial Summary	**80**	**16**	**6**	***16.2***	**1**	***5.96***	**2**	***110***
IAQ/UC								
Off Depot	3	0	-	-	-	-	-	-
Background	1	0	-	-	-	-	-	-
IAQ/UC Summary	**4**	**0**	**-**	**-**	**-**	**-**	**-**	**-**
MAQ								
Background	1	0	**-**	**-**	**-**	**-**	**-**	**-**
Dunn Field Summary	**85**	**16**	**6**	***16.2***	**1**	***5.96***	**2**	***110***

Notes:
µg/L: micrograms per liter
MCL: maximum contaminant level

TABLE 20
2018 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	2017 Frequency[1]	Semiannual Apr-2018	Biennial Oct-2018
DR1-1	Fluvial	TTA-1S	Biennial	--	-	P
DR1-1A	Fluvial	TTA-1S	Biennial	--	-	P
DR1-2	Fluvial	TTA-1N	Biennial	--	-	P
DR1-3	Fluvial	TTA-1S	Semiannual	--	P	P
DR1-4	Fluvial	TTA-1S	Semiannual	Annual	P	P
DR1-5	Fluvial	TTA-1S	Semiannual	--	P	P
DR1-5A	Fluvial	TTA-1S	Semiannual	--	P	P
DR1-6	Fluvial	TTA-1S	Semiannual	--	P	P
DR1-6A	Fluvial	TTA-1S	Semiannual	Annual	P	P
DR1-7	Fluvial	TTA-1N	Biennial	--	-	P
DR1-8	Fluvial	TTA-1N	Biennial	--	-	P
DR2-1	Fluvial	TTA-2	Semiannual	--	P	P
DR2-2	Fluvial	TTA-2	Annual	--	-	P
DR2-3	Fluvial	TTA-2	Annual	--	-	P
DR2-4	Fluvial	TTA-2	Annual	--	-	P
DR2-5	Fluvial	TTA-2	Annual	--	-	P
DR2-6	Fluvial	TTA-2	Semiannual	--	P	P
MW-16	Fluvial	Background	Biennial	--	-	P
MW-19	Fluvial	Background	Biennial	--	-	P
MW-21	Fluvial	TTA-1N	Semiannual	--	P	P
MW-22	Fluvial	TTA-1S	Biennial	--	-	P
MW-23	Fluvial	Background	Biennial	--	-	P
MW-24	Fluvial	Background	Biennial	--	-	P
MW-25A	Fluvial	TTA-2	Annual	--	-	P
MW-26	Fluvial	TTA-2	Semiannual	--	P	P
MW-34	Intermediate	Window	Annual	--	-	P
MW-38	Intermediate	Window	Biennial	--	-	P
MW-39	Fluvial	W-C	Semiannual	--	P	P
MW-39A	Upper Claiborne	W-C	Semiannual	--	P	P
MW-50	Fluvial	TTA-2	Annual	--	-	P
MW-52	Fluvial	SE	Annual	--	-	P
MW-53	Fluvial	Background	Biennial	--	-	P
MW-55	Fluvial	Background	Biennial	--	-	P
MW-62	Fluvial	B-835	Semiannual	--	P	P
MW-63A	Fluvial	N-C	Annual	Biennial	-	P
MW-63B	Fluvial	N-C	Annual	--	-	P
MW-64	Fluvial	TTA-2	Semiannual	--	P	P
MW-66A	Fluvial	TTA-1N	Biennial	--	-	P
MW-85	Fluvial	TTA-2	Semiannual	--	P	P
MW-88	Fluvial	TTA-2	Semiannual	--	P	P
MW-89	Intermediate	Window	Semiannual	--	P	P
MW-90	Intermediate	Window	Semiannual	--	P	P
MW-92	Fluvial	TTA-2	Semiannual	--	P	P
MW-93	Fluvial	Background	Biennial	--	-	P
MW-94A	Fluvial	W-C	Semiannual	--	P	P
MW-96	Fluvial	TTA-2	Annual	--	-	P
MW-97	Fluvial	S-C	Semiannual	--	P	P
MW-98	Fluvial	W-C	Semiannual	--	P	P
MW-99	Fluvial	Background	Biennial	--	-	P
MW-100B	Fluvial	TTA-1N	Semiannual	--	P	P
MW-101[2]	Fluvial	TTA-1S	Semiannual	--	P	P
MW-102B	Fluvial	Background	Biennial	--	-	P
MW-103	Fluvial	N-C	Annual	--	-	P
MW-104	Fluvial	N-C	Semiannual	--	P	P
MW-107[2]	Upper Claiborne	Window	Semiannual	--	P	P
MW-108	Upper Claiborne	W-C	Semiannual	--	P	P

TABLE 20
2018 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	2017 Frequency[1]	Semiannual Apr-2018	Biennial Oct-2018
MW-113	Fluvial	TTA-2	Semiannual	--	P	P
MW-140	Memphis	Window	Semiannual	--	P	P
MW-141	Intermediate	Window	Semiannual	--	P	P
MW-142	Fluvial	B-835	Annual	--	-	P
MW-143	Fluvial	B-835	Annual	--	-	P
MW-197A	Upper Claiborne	W-C	Semiannual	--	P	P
MW-197B	Fluvial	W-C	Semiannual	--	P	P
MW-198	Fluvial	B-835	Annual	--	-	P
MW-199A	Intermediate	B-835	Semiannual	Annual	P	P
MW-199B	Fluvial	B-835	Semiannual	--	P	P
MW-200	Fluvial	W-C	Annual	--	-	P
MW-202A	Intermediate	Window	Semiannual	--	P	P
MW-202B	Intermediate	Window	Semiannual	--	P	P
MW-203A	Upper Claiborne	W-C	Annual	--	-	P
MW-203B	Fluvial	W-C	Semiannual	--	P	P
MW-204A	Fluvial	W-C	Semiannual	--	P	P
MW-204B	Fluvial	W-C	Semiannual	--	P	P
MW-205A	Upper Claiborne	W-C	Annual	Semiannual	-	P
MW-205B	Fluvial	W-C	Semiannual	--	P	P
MW-206A	Fluvial	W-C	Semiannual	--	P	P
MW-206B	Fluvial	W-C	Semiannual	--	P	P
MW-207A	Upper Claiborne	W-C	Semiannual	--	P	P
MW-207B	Fluvial	W-C	Semiannual	--	P	P
MW-208A	Upper Claiborne	W-C	Semiannual	--	P	P
MW-208B	Fluvial	W-C	Semiannual	--	P	P
MW-209A	Intermediate	B-835	Semiannual	--	P	P
MW-209B	Fluvial	B-835	Semiannual	--	P	P
MW-210A	Intermediate	W-C	Annual	--	-	P
MW-210B	Fluvial	W-C	Semiannual	--	P	P
MW-211	Intermediate	Window	Biennial	--	-	P
MW-212	Fluvial	B-835	Semiannual	--	P	P
MW-213	Fluvial	B-835	Semiannual	--	P	P
MW-214A	Upper Claiborne	N-C	Annual	--	-	P
MW-214B	Upper Claiborne	N-C	Annual	--	-	P
MW-215A	Upper Claiborne	N-C	Annual	--	-	P
MW-215B	Fluvial	N-C	Annual	--	-	P
MW-216	Fluvial	S-C	Biennial	--	-	P
MW-217	Fluvial	TTA-2	Semiannual	--	P	P
MW-218	Fluvial	TTA-2	Semiannual	--	P	P
MW-219	Fluvial	TTA-1N	Semiannual	--	P	P
MW-229	Intermediate	Window	Biennial	--	-	P
MW-252	Intermediate	Window	Biennial	--	-	P
MW-253	Intermediate	Window	Biennial	Annual	-	P
MW-254	Memphis	Window	Annual	--	-	P
MW-255	Memphis	Window	Annual	--	-	P
MW-256	Intermediate	Window	Semiannual	--	P	P
MW-258	Fluvial	N-C	Semiannual	--	P	P
MW-259	Fluvial	TTA-2	Semiannual	--	P	P
MW-260	Fluvial	N-C	Annual	--	-	P
MW-261	Fluvial	S-C	Annual	--	-	P
MW-262	Intermediate	Window	Annual	--	-	P
MW-263	Fluvial	N-C	Semiannual	--	P	P
MW-264	Upper Claiborne	N-C	Annual	--	-	P
MW-265	Fluvial	N-C	Semiannual	--	P	P
MW-266	Fluvial	TTA-2	Annual	Semiannual	-	P
MW-267	Fluvial	TTA-2	Semiannual	--	P	P

TABLE 20
2018 MAIN INSTALLATION SAMPLE SCHEDULE
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	2017 Frequency[1]	Semiannual Apr-2018	Biennial Oct-2018
MW-268	Upper Claiborne	TTA-2	Annual	--	-	P
MW-269	Fluvial	TTA-1N	Semiannual	--	P	P
MW-270	Fluvial	SE	Semiannual	--	P	P
MW-271	Fluvial	S-C	Annual	--	-	P
MW-272	Fluvial	Background	Annual	--	-	P
MW-273	Intermediate	Window	Annual	--	-	P
MW-274	Fluvial	Background	Semiannual	--	P	P
MW-275	Fluvial	Background	Semiannual	--	P	P
MW-276	Fluvial	Background	Semiannual	--	P	P
MW-277	Fluvial	Background	Semiannual	--	P	P
MW-278	Fluvial	Background	Semiannual	--	P	P
MW-279	Fluvial	TTA-1S	Semiannual	--	P	P
MW-280	Fluvial	TTA-2	Semiannual	--	P	P
MW-281	Fluvial	N-C	Semiannual	--	P	P
MW-282	Fluvial	Background	Semiannual	--	P	P
MW-283	Fluvial	Background	Semiannual	--	P	P
PMW21-01	Fluvial	TTA-1N	Semiannual	--	P	P
PMW21-02	Fluvial	TTA-1N	Semiannual	--	P	P
PMW21-03	Fluvial	TTA-1N	Semiannual	--	P	P
PMW21-04	Fluvial	TTA-1N	Semiannual	--	P	P
PMW21-05	Fluvial	TTA-1N	Semiannual	--	P	P
PMW-85-01	Fluvial	TTA-2	Semiannual	--	P	P
PMW-85-05	Fluvial	TTA-2	Semiannual	--	P	P
PMW92-02	Fluvial	TTA-2	Semiannual	--	P	P
PMW92-03	Fluvial	TTA-2	Semiannual	--	P	P
PMW101-02A	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-02B	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-03A	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-03B	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-04A	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-04B	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-06A	Fluvial	TTA-1S	Semiannual	Annual	P	P
PMW101-06B	Fluvial	TTA-1S	Semiannual	--	P	P
PMW101-07A	Fluvial	TTA-1S	Annual	--	-	P
PMW101-07B	Fluvial	TTA-1S	Semiannual	--	P	P

Notes:

1) Previous sample frequency shown if change recommended for 2018.
2) Samples to be collected from two screened intervals in MW-101 and MW-107.

P: Sample planned
-: Sample not planned
--: No change in sample frequency

TABLE 21
2018 DUNN FIELD SAMPLE SCHEDULE
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	2017 Frequency[1]	Annual Apr-2018	Semiannual Oct-2018
MW-03	Fluvial	North	Annual	--	P	-
MW-04	Fluvial	Background	Biennial	--	-	-
MW-06	Fluvial	DF West	Semiannual	Annual	P	P
MW-07	Fluvial	North	Annual	--	P	-
MW-08	Fluvial	North	Annual	--	P	-
MW-13	Fluvial	Background	Biennial	--	-	-
MW-15	Fluvial	DF West	Biennial	--	-	-
MW-28	Fluvial	Background	Biennial	--	-	-
MW-31	Fluvial	North	Annual	--	P	-
MW-44	Fluvial	Off Depot	Annual	--	P	-
MW-54	Fluvial	Off Depot	Annual	--	P	-
MW-57	Fluvial	DF West	Semiannual	Biennial	P	P
MW-58	Fluvial	Background	Biennial	--	-	-
MW-67	Memphis	Background	Biennial	--	-	-
MW-68	Fluvial	North	Biennial	--	-	-
MW-69	Fluvial	DF West	Biennial	--	-	-
MW-70	Fluvial	DF West	Semiannual	Biennial	P	P
MW-71	Fluvial	DF West	Annual	--	P	-
MW-76	Fluvial	Off Depot	Biennial	--	-	-
MW-77	Fluvial	Off Depot	Semiannual	--	P	P
MW-78	Fluvial	North	Biennial	--	-	-
MW-79	Fluvial	North	Annual	--	P	-
MW-80	Fluvial	Background	Biennial	--	-	-
MW-87	Fluvial	DF West	Semiannual	--	P	P
MW-91	Fluvial	DF West	Biennial	--	-	-
MW-126	Fluvial	Background	Biennial	--	-	-
MW-129	Fluvial	North	Annual	--	P	-
MW-130	Fluvial	North	Annual	--	P	-
MW-134	Fluvial	DF West	Biennial	--	-	-
MW-144	Fluvial	Off Depot	Semiannual	--	P	P
MW-145	Fluvial	Off Depot	Annual	--	P	-
MW-147	Fluvial	North	Biennial	--	-	-
MW-148	Fluvial	Off Depot	Biennial	--	-	-
MW-149	Fluvial	Off Depot	Semiannual	--	P	P
MW-150	Fluvial	Off Depot	Semiannual	--	P	P
MW-151	Fluvial	Off Depot	Annual	--	P	-
MW-152	Fluvial	Off Depot	Annual	--	P	-
MW-153	Fluvial	North	Biennial	--	-	-
MW-154	Fluvial	Background	Biennial	--	-	-
MW-155	Fluvial	Off Depot	Annual	--	P	-
MW-157	Fluvial	Off Depot	Annual	--	P	-
MW-158	Fluvial	Off Depot	Annual	--	P	-
MW-158A	Fluvial	Off Depot	Annual	--	P	-
MW-159	Fluvial	Off Depot	Semiannual	--	P	P
MW-160	Fluvial	Off Depot	Annual	--	P	-
MW-163	Fluvial	Off Depot	Annual	Semiannual	P	-
MW-164	Fluvial	Off Depot	Annual	--	P	-
MW-165	Fluvial	Off Depot	Semiannual	--	P	P
MW-165A	Fluvial	Off Depot	Annual	--	P	-
MW-166	Fluvial	Off Depot	Semiannual	--	P	P
MW-166A	Fluvial	Off Depot	Semiannual	--	P	P
MW-167	Fluvial	Background	Biennial	--	-	-
MW-169	Upper Claiborne	Background	Biennial	--	-	-
MW-170	Fluvial	Background	Biennial	--	-	-
MW-171	Fluvial	North	Annual	Biennial	P	-
MW-174	Fluvial	DF West	Biennial	Annual	-	-

TABLE 21
2018 DUNN FIELD SAMPLE SCHEDULE
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Well ID	Aquifer	Area	Sample Frequency	2017 Frequency[1]	Annual Apr-2018	Semiannual Oct-2018
MW-176	Fluvial	DF West	Biennial	--	-	-
MW-180	Fluvial	North	Biennial	--	-	-
MW-182	Fluvial	Background	Biennial	--	-	-
MW-184	Fluvial	Off Depot	Annual	--	P	-
MW-187	Fluvial	Background	Biennial	--	-	-
MW-190	Fluvial	Off Depot	Semiannual	--	P	P
MW-220	Fluvial	North	Annual	--	P	-
MW-221	Fluvial	DF West	Biennial	--	-	-
MW-222	Fluvial	DF West	Biennial	--	-	-
MW-223	Fluvial	DF West	Biennial	--	-	-
MW-224	Fluvial	DF West	Annual	Biennial	P	-
MW-225	Fluvial	DF West	Biennial	--	-	-
MW-226	Fluvial	DF West	Biennial	--	-	-
MW-227	Fluvial	DF West	Biennial	--	-	-
MW-228	Fluvial	DF West	Biennial	--	-	-
MW-230	Fluvial	North	Annual	--	P	-
MW-235	Fluvial	Background	Biennial	--	-	-
MW-237	Intermediate	Off Depot	Annual	--	P	-
MW-241	Fluvial	Off Depot	Annual	--	P	-
MW-242	Fluvial	Off Depot	Annual	--	P	-
MW-243	Fluvial	Off Depot	Annual	--	P	-
MW-244	Fluvial	Off Depot	Annual	--	P	-
MW-245	Fluvial	Off Depot	Annual	--	P	-
MW-246	Fluvial	Off Depot	Semiannual	--	P	P
MW-247	Fluvial	Off Depot	Annual	--	P	-
MW-248	Fluvial	Off Depot	Biennial	--	-	-
MW-249	Fluvial	Off Depot	Semiannual	--	P	P
MW-250	Intermediate	Off Depot	Biennial	--	-	-
MW-251	Intermediate	Off Depot	Annual	--	P	-

Notes:

1) Previous sample frequency shown if change recommended for 2018.

P: Sample planned

--: No change in sample frequency

-: Sample not planned

Figures

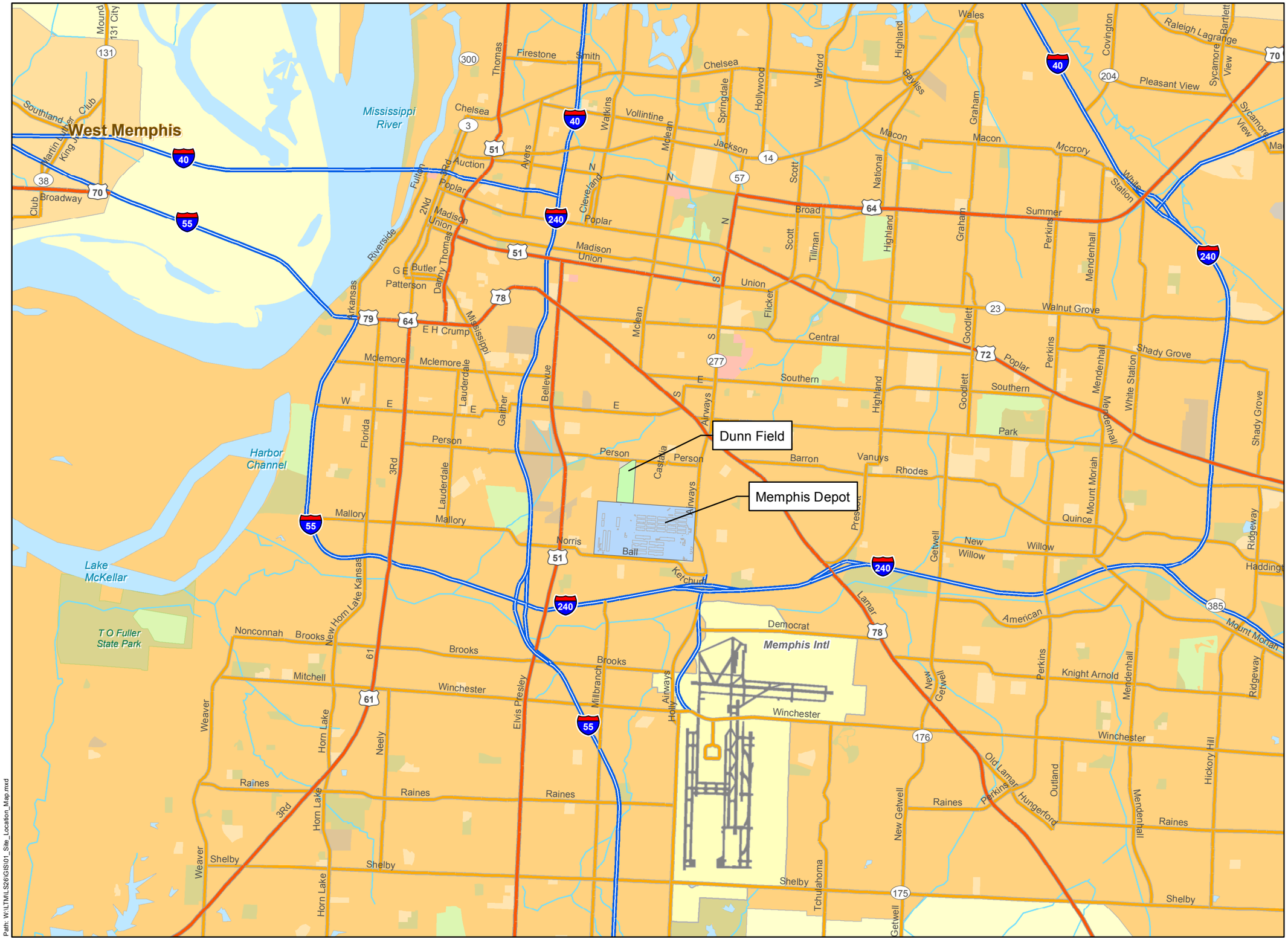


Figure 1

Site Location Map

Annual Long Term Monitoring Report-2017

Defense Depot Memphis, Tennessee

N
W E
S

0 1 2
Miles

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/26/2018
Edition: Rev 0

Figure 2

Fluvial SVE System

Annual Long Term
Monitoring Report-2017

Defense Depot
Memphis, Tennessee

MW-04
MW-13
MW-187
SVE-A
VP-01B
VP-01A
SVE-B-E
SVE-B
VP-02B
MW-220
VP-02A
MW-03
SVE-C-E
MW-180
SVE-C
VP-03B
MW-221
VP-03A
SVE-C-W
VP-04A
VP-04B
MW-224
SVE-D
SVE-D-N
SVE-D-S
VP-05B
VP-05A
VP-06B
MW-226
VP-06A
SVE-E
MW-134
SVE-E-N
MW-223
MW-222
MW-225
VP-08A
VP-08B
SVE-F-E
SVE-F
VP-07B
VP-07A
SVE-F-W
VP-10A
VP-10B
MW-228
SVE-G-S
SVE-G
SVE-G-A
VP-09B
VP-09A
MW-227
MW-174
MW-06
MW-68
MW-69
MW-70
MW-176
MW-87
MW-91
MW-15
MW-57
MW-77
MW-71
MW-31
Kyle
Menager
Rose

Legend

- Current Federal Property Boundary
- SVE Well *(Soil Vapor Extraction)*
- VMP *(Vapor Monitoring Point)*
- Monitoring Well Screened in the Fluvial Aquifer
- Monitor Well Screened in the Intermediate Aquifer
- Conveyance Line
- Control Building
- Concrete Pad
- 60-foot Radius of Influence

N E S W

0 100 200
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/26/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\02_FluvialSVESystem.mxd

Figure 3

AS/SVE System

Annual Long Term
Monitoring Report-2017

Defense Depot
Memphis, Tennessee

Legend

- Monitoring Well Screened in the Fluvial Aquifer
- Monitoring Well Screened in the Intermediate Aquifer
- AS Location (1/2 time)
- AS Location (full time)
- AS Location (closed)
- Closed by leak/damage
- New AS Location
- VMP Location
- SVE Location
- Conveyance Lines
- New Conveyance Line
- SVE Compound
- Roads
- Railroad
- Parcel Boundary

N
W E
S

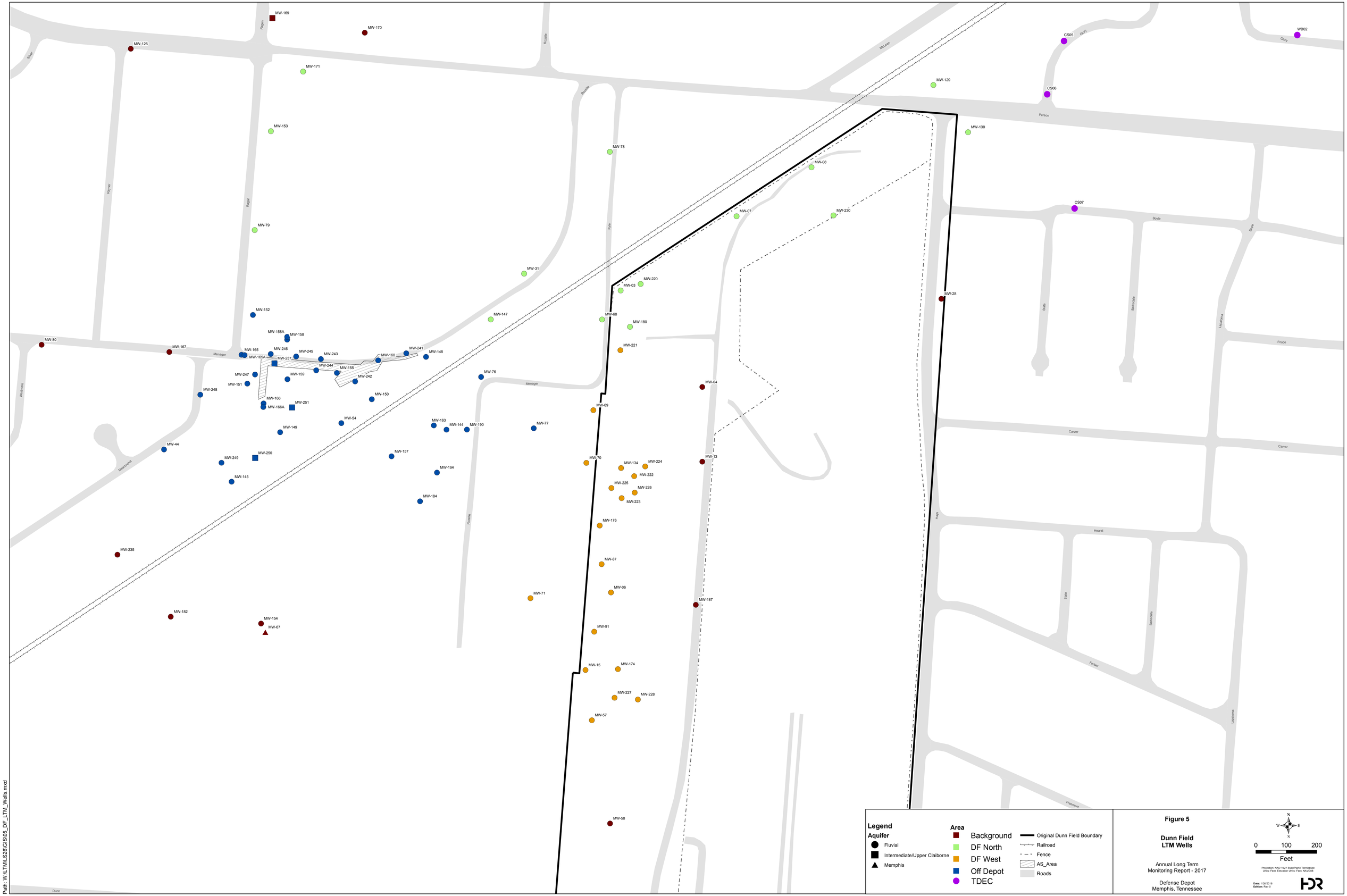
0 25 50
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/26/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\03_ASSVEsystem.mxd

Ledger
Cincinnati
Dunn
Silver
Raven
Sparks
Corry
Warren
Merlin
Cane
Starr
Elliston
Raynor
Eloise
Mallory
Dempster
Norris
Dottie
Gasuco
Whitmore
Achona
Perry
Rozelle
Manchester
Kingsview
Vista
Vertun
Joanna
Thames
Faarmeade
Glenrie
Lapalorna
Carbondale
Gladney
Ball
Amido
Behnke
Danielson
Heyde
Troyer
Alley
Memphis Depot Pkwy
Freemont
Murkey
Ferber
Lethbey
Filmore
Arkwright
Frisco
Cedar
Third
Fifth
Twenty Seventh
Twenty Third
Twenty First
W.E.Freeman
Knock
L Cillatas
Lloyd
Trott
Hyde
Slater
Lapalorna
Berkshire
Hicks
Cordell
MW-273
MW-262
MW-254
MW-255
MW-55
MW-256
MW-34
MW-229
MW-38
MW-140
MW-19
MW-252
MW-202B
MW-202A
MW-213
MW-143
MW-253
MW-62
MW-89
MW-90
MW-142
MW-212
MW-141
MW-211
MW-198
MW-199A
MW-199B
MW-209A
MW-209B
MW-99
MW-208B
MW-208A
MW-39
MW-39A
MW-210A
MW-210B
MW-205B
MW-205A
MW-206A
MW-206B
MW-200
MW-197A
MW-197B
MW-203A
MW-203B
MW-204A
MW-204B
MW-98
MW-53
MW-263
MW-16
MW-282
MW-103
MW-104
MW-107T
MW-107B
MW-264
MW-260
MW-63B
MW-63A
MW-281
MW-258
MW-265
MW-283
MW-214A
MW-214B
MW-108
MW-207B
MW-207A
MW-215A
MW-215B
MW-280
MW-268
MW-267
MW-266
MW-94A
MW-64
MW-218
MW-217
MW-88
DR2-5
PMW85-01
PMW85-05
DR2-1
DR2-2
MW-85
MW-113
PMW92-03
PMW92-02
MW-92
DR2-6
DR2-3
DR2-4
MW-26
MW-50
MW-96
MW-25A
MW-274
MW-261
PZ-03
MW-271
MW-259
MW-216
MW-97
MW-272
MW-24
MW-277
MW-93
MW-276
MW-270
MW-52
MW-275
MW-66A
MW-269
MW-278
MW-219
MW-21
PMW21-01
PMW21-02
PMW21-04
PMW21-03
MW-100B
DR1-8
DR1-7
DR1-2
DR1-3
PMW21-05
DR1-1A
DR1-1
PMW101-03A/B
PMW101-02A/B
PMW101-04A/B
DR1-4
MW-101
PMW101-06A/B
PMW101-07A/B
DR1-5A
DR1-5
DR1-6
DR1-6A
MW-279
MW-22
MW-102B
MW-23
925
949
835
865
737
720
629
529
429
329
229
630
530
430
330
230
649
549
449
349
249
650
550
450
350
250
144
319
210
560
360
468
469
670
470
689
685
489
690
490
770
756
972
970
1089
1086
1088
1087
1090
995
Legend
Aquifer
Fluvial
Intermediate/Upper Claiborne
Memphis/ Upper Claiborne (Deep)
Area
B-835
Background
North Central
South Central
South East
TTA-1 North
TTA-1 South
TTA-2
West Cental
Window
Property Boundary
Buildings 490 - DDMT Assigned Number
Roads
Clay Elevation Exceeds Groundwater Elevation
Figure 4
Main Installation LTM Wells
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
250
500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/26/2018
Edition: Rev 0
HDR
Path: W:\LTM\LS26\GIS\04_MI_LTM_Wells.mxd



Legend

Aquifer
- Fluvial
- Intermediate/Upper Claiborne
- Memphis

Area
- Background
- DF North
- DF West
- Off Depot
- TDEC

- Original Dunn Field Boundary
- Railroad
- Fence
- AS_Area
- Roads

Figure 5

Dunn Field
LTM Wells

Annual Long Term
Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

N
W E
S

0 100 200
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/26/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\05_DF_LTM_Wells.mxd

Figure 6

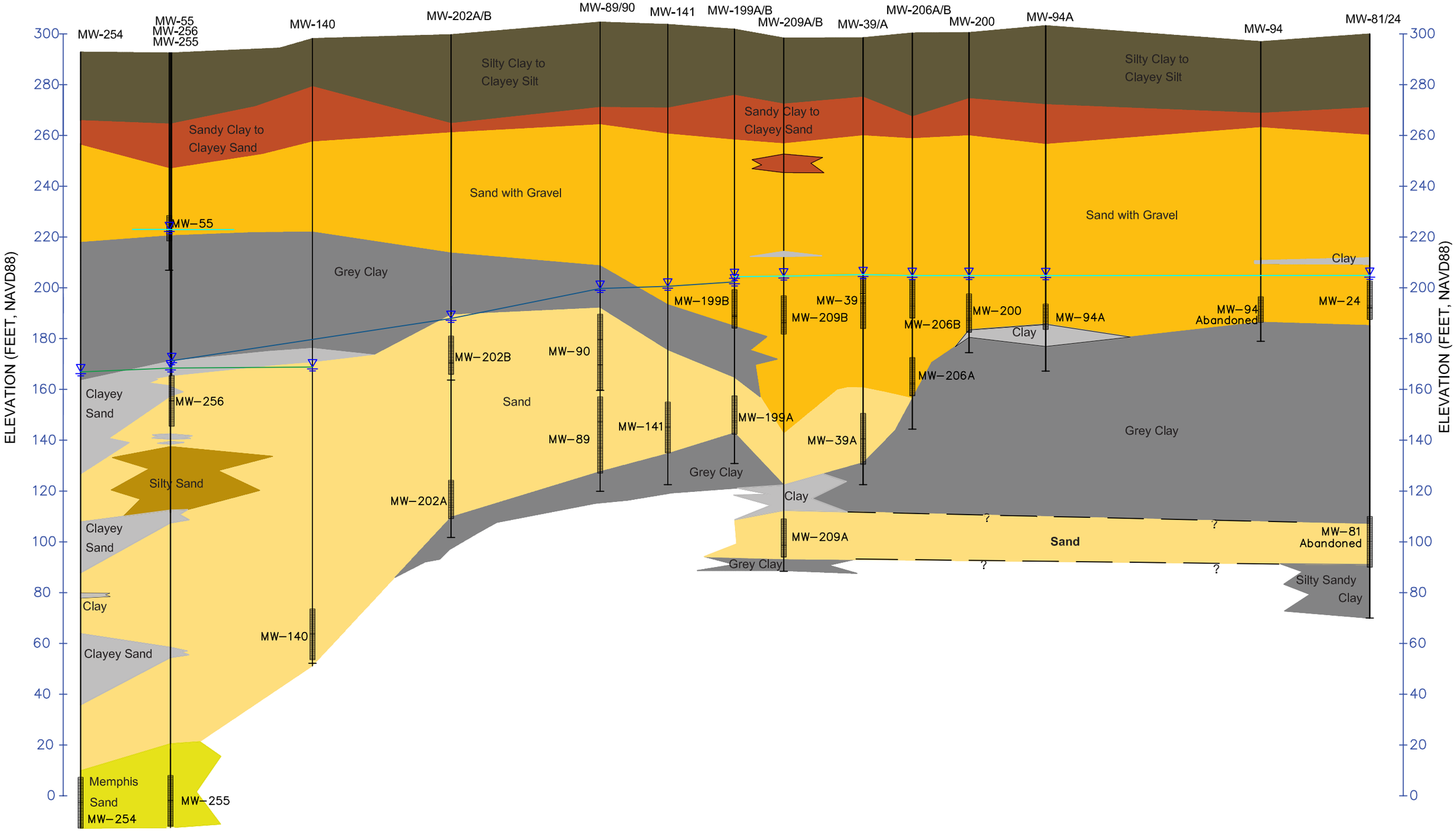
Main Installation
Cross Section A

Annual Long Term
Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

A North

A' South



Silty Clay to Clayey Silt
Sandy Clay to Clayey Sand
Fluvial Sand or Sand with Gravel
Clayey Sand to Silty Clay
Silty Sand-Sandy Silt
Intermediate Sand
Clay
Memphis Sand

Groundwater Elevation

Fluvial Aquifer Groundwater Elevation
Intermediate Aquifer Groundwater Elevation
Memphis Aquifer Groundwater Elevation

Well Screen Interval

Note: Water levels measured at LTM wells on 10/05/17.

20
0
200

Date: January 2018
Edition: Rev 0

MW-126 234.56
MW-170 221.51
MW-171 220.48
MW-153 219.82
MW-129 239.06
MW-130 239.8
MW-78 230.45
MW-08 233.78
MW-07 232.35
MW-230 234.52
MW-28 240.85
MW-79 220.22
MW-152 220.74
MW-158A 220.71
MW-158 220.72
MW-245 220.82
MW-243 221.33
MW-155 221.69
MW-160 222.07
MW-241 222.87
MW-31 226.26
MW-147 225.25
MW-165A 220.51
MW-165 220.57
MW-246 220.23
MW-167 220.33
MW-148 223.31
MW-242 221.85
MW-76 225.03
MW-03 229.7
MW-220 230.41
MW-180 230.02
MW-221 229.87
MW-04 231.3
MW-80 219.93
MW-247 220.62
MW-151 220.69
MW-248 220.78
MW-150 222.32
MW-54 221.88
MW-163 223.98
MW-144 224.29
MW-190 224.8
MW-77 227.68
MW-69 229.41
MW-134 230.36
MW-224 230.71
MW-13 231.35
MW-166 220.68
MW-166A 220.9
MW-44 220.71
MW-249 221.13
MW-145 221.15
MW-158 220.97
MW-157 223.21
MW-164 224.33
MW-184 224.23
MW-70 229.64
MW-225 230.42
MW-222 230.64
MW-226 230.73
MW-178 230.48
MW-223 230.6
MW-87 230.52
MW-06 230.76
MW-187 231.8
MW-71 229.67
MW-91 230.59
MW-15 230.75
MW-174 230.93
MW-227 231
MW-228 231.06
MW-57 230.38
MW-58 229.35
MW-235 212.18
MW-182 216.58
MW-154 220.73
MW-149 221.28
MW-244 220.23
MW-55 222.3
MW-53 233.5
MW-263 236.09
MW-16 243.51
MW-282 227.91
MW-103 232.92
MW-104 233.88
MW-260 230.36
MW-63B 211.05
MW-63A 210.91
MW-281 225.65
MW-258 227.77
MW-265 229.69
MW-283 234.81
MW-19 211.09
MW-213 207.61
MW-143 208.75
MW-62 206.97
MW-142 206.74
MW-212 205.72
MW-198 205.76
MW-199B 205.20
MW-209B 205.22
MW-207B 205.18
MW-215B 205.18
MW-280 233.93
MW-267 231.7
MW-266 231.4
MW-99 207.13
MW-208B 204.86
MW-39 203.12
MW-206A 204.90
MW-206B 204.90
MW-210B 205.65
MW-205B 205.57
MW-197B 205.79
MW-200 204.55
MW-98 205.15
MW-64 205.46
MW-218 209.62
MW-88 228.18
DR2-1 218.65
DR2-2 225.62
DR2-5 212.62
PMW85-05 212.26
PMW85-01 211.5
PMW92-02 213.21
MW-94A 204.62
MW-217 205.69
MW-113 212.12
MW-85 211.11
MW-92 213.12
DR2-6 210
MW-26 210.54
DR2-3 211.57
DR2-4 213.97
MW-50 217.55
PMW92-03 212.53
MW-96 212.3
MW-203B 206.44
MW-204B 205.89
MW-204A 205.79
MW-100B 208.54
PMW21-03 206.67
PMW21-02 208.81
PMW21-01 209.57
MW-66A 211.65
MW-278 211.64
MW-269 210.89
MW-219 210.03
MW-21 209.5
DR1-8 208.56
PMW21-04 208.58
PMW21-05 207.43
DR1-7 206.9
DR1-3 207.13
DR1-2 208.03
PMW101-03B 207.98
PMW101-02B 208.5
PMW101-04B 207.97
DR1-1 208.74
DR1-1A 208.85
DR1-4 208.28
MW-101T 206.72
PMW101-06B 208.2
DR1-5A 208.63
DR1-6A 208.61
PMW101-07B 208.21
MW-279 209.93
MW-22 209.59
MW-102B 210
MW-216 207.85
MW-97 207.39
MW-23 208.56
MW-261 205.01
PZ-03 204.86
MW-271 203.5
MW-259 202.44
MW-272 203.2
MW-24 204.41
MW-277 204.1
MW-93 203.67
MW-276 203.67
MW-270 205.16
MW-25A 206.72
MW-274 211.45
MW-52 207.486
MW-275 206.19
Legend
Fluvial Aquifer Well
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface extrapolation
Groundwater Flow Direction
Property Boundary
Roads
Buildings
Clay Elevation Exceeds Groundwater Elevation
MW-03 229.70 Blue: Fluvial Aquifer, used for groundwater contours (4/18/17)
Figure 7
Fluvial Aquifer Groundwater Elevations, April 2017
Annual Long Term Monitoring Report - 2017
Defense Depot Memphis, Tennessee
N
W
E
S
0 250 500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 3/29/2018
Edition: Rev 0
FDR
Path: W:\LTM\LS26\GIS\07_FAQ_GWele\Apr17.mxd

Note
1. Groundwater elevations for IAQ wells MW-107 and MW-169 are shown and included to aid interpretation of elevation contours at the entrance to the window and northwest of Dunn Field. Both wells are screened in Upper Claiborne sand where a clay layer is not present below the Fluvial sand.

Legend

- Fluvial Aquifer Well
- Intermediate/Upper Claiborne Well
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface extrapolation
- Groundwater Flow Direction
- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation
- MW-03 229.40 — Blue: Fluvial Aquifer, used for groundwater contours (10/4-5/17)
- MW-169 190.40 — Orange: Intermediate/ Upper Claiborne Aquifer, used for groundwater contours (10/4-5/17)

Groundwater elevations are in ft, NAVD

Figure 8
Fluvial Aquifer Groundwater Elevations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/23/2018
Edition: Rev 0

HDR

Path: W:\LTM\LS26\GIS\IS08_FAQ_GWeleOct17.mxd

Note:
1. MW-208A not used for contouring.

Legend

- Intermediate/Upper Claiborne Well
- Intermediate Aquifer Contours
- Groundwater Flow Direction (Intermediate)
- MW-237 176.56 Intermediate Aquifer, used for groundwater contours (4/18/17)
  Groundwater elevations are in ft, NAVD.
- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation

Figure 9

Intermediate Aquifer Groundwater Elevations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

N
W E
S

0 250 500
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/23/2018
Edition: Rev 0

HDR

Path: W:\LTM\LS26\GIS\09_ILIC_GWele\Apr17.mxd

MW-169
190.40

MW-237
171.20

MW-251
170.07

MW-250
169.94

MW-273
171.98

MW-262
170.04

MW-256
171.48

MW-34
178.37

MW-229
169.59

MW-38
190.24

MW-252
171.91

MW-203A
187.91

MW-202B
188.74

MW-253
190.22

MW-90
199.28

MW-89
199.71

MW-107
206.43

MW-264
219.38

MW-141
200.63

MW-221
204.12

MW-214A
208.81

MW-214B
209.45

MW-199A
202.38

MW-108
204.40

MW-207A
204.70

MW-209A
202.84

MW-208A
204.56

MW-215A
205.03

MW-266
210.98

MW-39A
205.00

MW-210A
199.41

MW-205A
205.28

MW-197A
205.81

MW-203A
206.11

720
737
865
756
770

925
949
835
1089
1086
1088
1087
1090
995
972
970
629
630
649
650
560
670
689
685
690
529
530
549
550
468
469
470
489
490
429
430
449
450
360
319
329
330
349
350
210
229
230
249
250
144
263
261
260
265
274
270
271

Path: W:\LTM\S26\GIS\10_IUC_GWeleOct17.mxd

Legend

- Intermediate/Upper Claiborne Well
- Intermediate Aquifer Contours
- Groundwater Flow Direction (Intermediate)
- MW-237 176.56 Intermediate Aquifer, used for groundwater contours (10/4-5/17)
- Groundwater elevations are in ft, NAVD.
- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation

Figure 10

Intermediate Aquifer Groundwater Elevations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

N
W E
S

0 250 500
Feet

Projection: NAD 1927 StatePlane Tennessee Units: Feet, Elevation Units: Feet, NAVD88

Date: 12/3/2018
Edition: Rev 0

HDR

Legend

- Memphis Aquifer Well
- Potentiometric surface of the Memphis Aquifer 1-ft. contour
- MW-254 173.56 Memphis Aquifer Groundwater Elevation (4/18/17) Groundwater elevations are in ft, NAVD.
- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation

Figure 11

Memphis Aquifer Groundwater Elevations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500

Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/22/2018
Edition: Rev 0

Legend

- Memphis Aquifer Well
- Potentiometric surface of the Memphis Aquifer 1-ft. contour
- MW-254 173.56 Memphis Aquifer Groundwater Elevation (10/4-5/17) Groundwater elevations are in ft, NAVD.
- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation

Figure 12

Memphis Aquifer Groundwater Elevations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

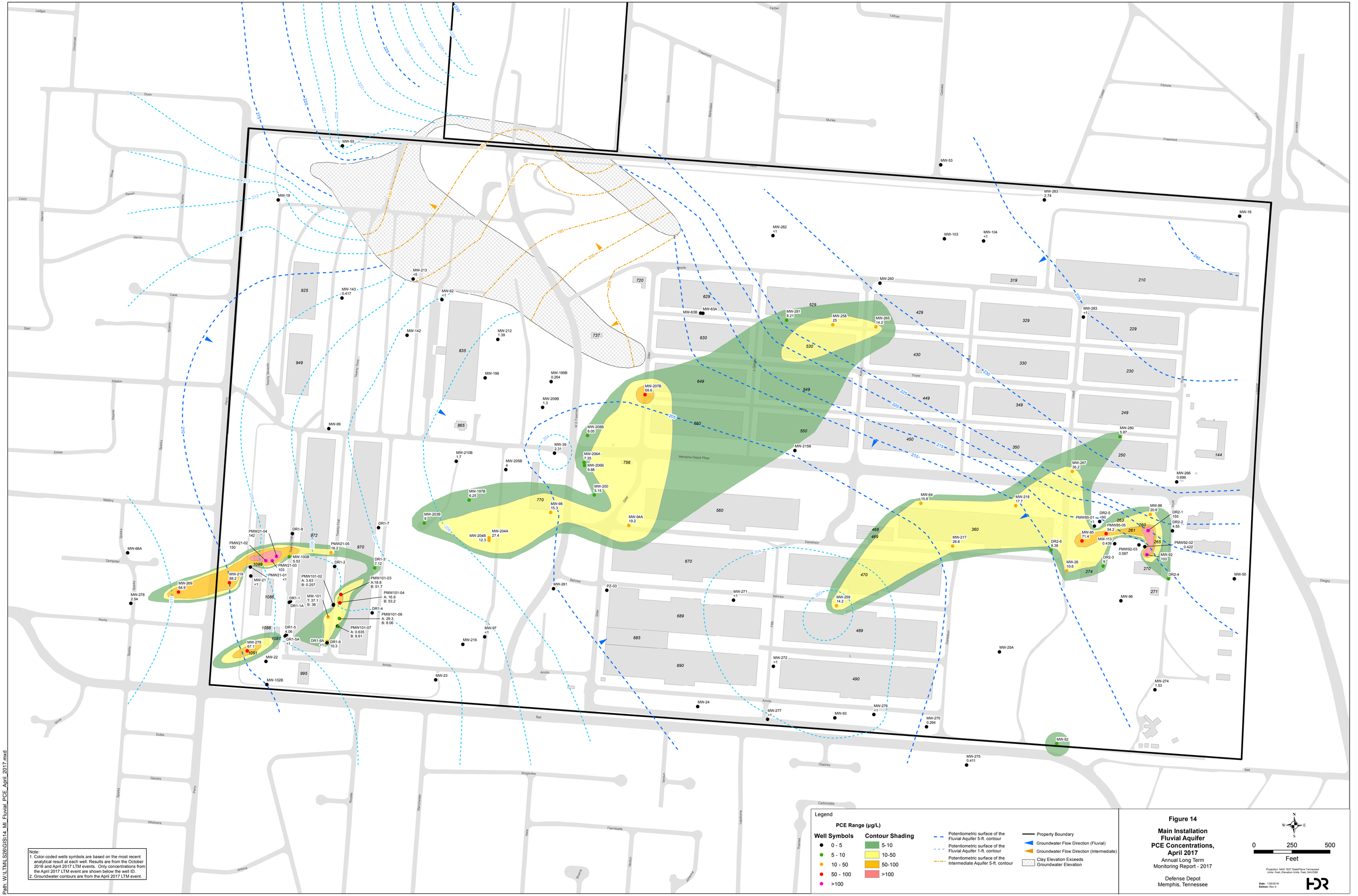
0 250 500

Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/22/2018
Edition: Rev 0

Legend
Abandoned
Monitoring Well Screened in the Fluvial Aquifer
Monitoring Well Screened in the Intermediate Aquifer
Monitoring Well Screened in the Memphis Aquifer
MW-52 Well ID
175.71 Top of Clay Elevation NAVD88
Top of Clay Contour (5-foot interval)
Extent of Upper Clay Layer
Property Boundary
Clay Elevation Exceeds Groundwater Elevation
Figure 13
Top of Clay Elevations
Annual Long Term Monitoring Report - 2017
Defense Depot Memphis, Tennessee
0 250 500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/23/2018
Edition: Rev 0
Path: W:\LTM\LS26\GIS\13_Top_of_Clay_Layer_Elevations\May2017rev3.mxd



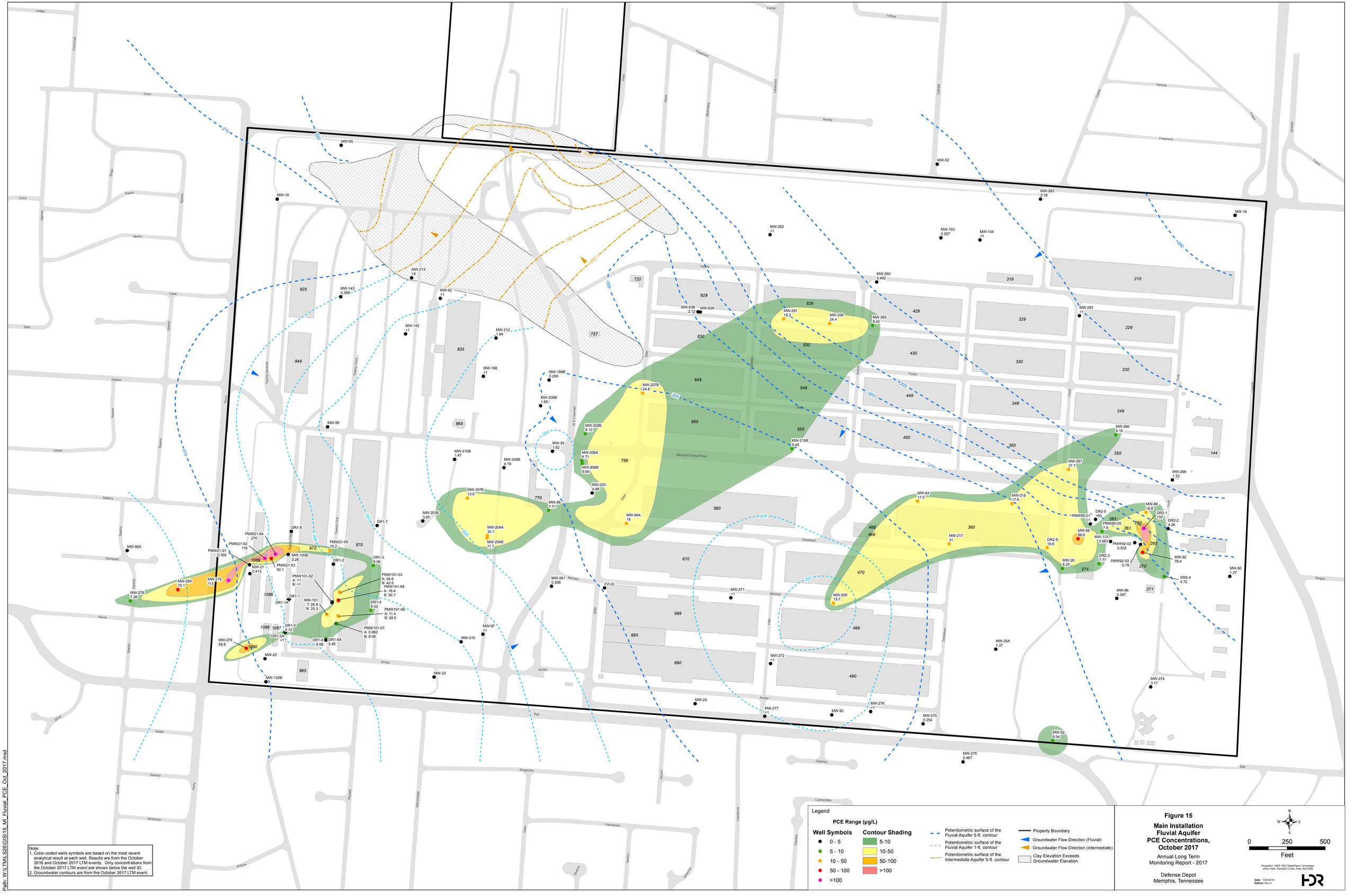
Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and April 2017 LTM events. Only concentrations from the April 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the April 2017 LTM event.

Figure 14

Main Installation
Fluvial Aquifer
PCE Concentrations, April 2017
Annual Long Term Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

Path: W:\LTM\LS26\GIS\14_MI_Fluvial_PCE_April_2017.mxd



Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.

Legend

PCE Range (µg/L)

Well Symbols	Contour Shading
0 - 5	5-10
5 - 10	10-50
10 - 50	50-100
50 - 100	>100
>100	

- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Property Boundary
- Groundwater Flow Direction (Fluvial)
- Groundwater Flow Direction (Intermediate)
- Clay Elevation Exceeds Groundwater Elevation

Figure 15

Main Installation Fluvial Aquifer PCE Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500

Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

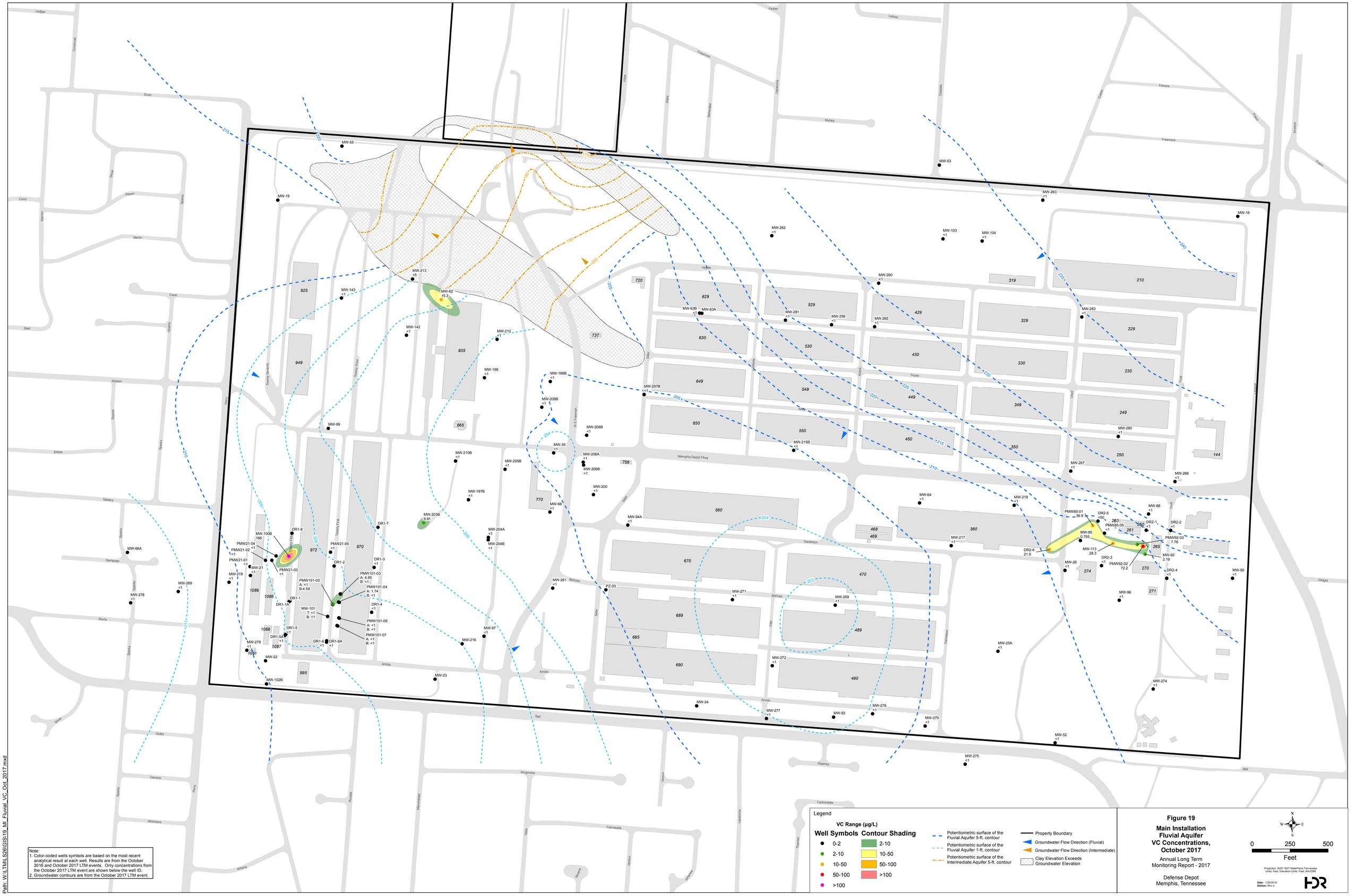
HDR

Path: W:\LTM\LS26\GIS\15_MI_Fluvial_PCE_Oct_2017.mxd

MW-55
MW-19
MW-213
3.22
MW-62
0.475
MW-143
6.43
MW-142
MW-212
30.5
MW-198
MW-199B
50.3
MW-209B
8.69
MW-207B
24
MW-99
MW-208B
3.97
MW-39
4.63
MW-206A
9.02
MW-206B
5.42
MW-205B
6.5
MW-210B
17.5
MW-197B
11.2
MW-203B
22.7
MW-200
3.91
MW-98
2.32
MW-94A
6.67
MW-204A
1.11
MW-204B
8.99
MW-53
MW-282
<1
MW-263
32.3
MW-103
MW-104
8.07
MW-16
MW-260
MW-63B
MW-63A
MW-281
49.9
MW-258
56.3
MW-265
8.71
MW-283
<1
MW-215B
MW-267
15.7
MW-64
26.7
MW-218
31.3
MW-88
1.58
DR2-5
<50
DR2-1
5.32
DR2-2
0.663
PMW85-01
<1
PMW85-05
17.5
MW-85
21.6
MW-217
28.4
DR2-6
3.55
MW-113
<1
PMW92-03
0.547
PMW92-02
<1
MW-92
4.56
DR2-3
1.01
MW-26
0.734
DR2-4
MW-50
MW-96
MW-25A
MW-266
0.405
MW-280
3.95
MW-274
0.337
MW-52
MW-275
<1
MW-270
23.3
MW-276
<1
MW-93
MW-277
<1
MW-24
MW-272
<1
MW-271
4.82
MW-259
20.1
MW-261
PZ-03
MW-97
62.1
MW-216
MW-23
MW-102B
MW-22
MW-279
0.368
MW-269
5.61
MW-278
0.886
MW-66A
MW-219
5.11
MW-21
<1
PMW21-01
<1
PMW21-02
61
PMW21-04
53.1
PMW21-03
35.3
MW-100B
1.62
DR1-8
DR1-7
PMW21-05
2.16
DR1-2
DR1-3
9.91
PMW101-03
A: 2.05
B: 0.747
PMW101-04
A: 3.61
B: 0.795
PMW101-02
A: <5
B: <1
DR1-1
DR1-1A
MW-101
T: <1
B: <1
DR1-4
PMW101-06
A: 1.65
B: <1
PMW101-07
A: 0.285
B: 19.2
DR1-5
0.589
DR1-5A
<1
DR1-6A
0.496
DR1-6
<1
925
949
995
970
972
1089
1086
1088
1087
1091
835
865
737
720
629
630
649
660
756
770
560
550
549
530
529
429
430
449
450
469
468
470
360
350
319
329
330
349
210
229
230
249
250
144
263
261
260
271
270
274
689
685
690
670
489
490
Ledger
Cincinnati
Dunn
Corry
Warren
Silver
Raven
Sparks
Merlin
Cane
Starr
Elliston
Rayner
Perry
Twenty Seventh
Twenty Third
Twenty First
Eloise
Mallory
Dempster
Norris
Dottie
Gausco
Whitmore
Arizona
Rosalie
Manchester
Kingsview
Vermont
Faxmeade
Carbondale
Legalona
Thames
Vista
Sunrise
Jonesboro
Ferber
Lehmer
Freemont
Hays
Stark
Barksdale
Lapsleona
Murkey
Cordelia
Custer
Fillmore
Fisher
Freeman
Arkansas
Fisco
Heyde
Behnke
Danielson
Memphis Depot Pkwy
Troyer
Kerry
Lloyd
Ball
Amido
Delight
Dale
Fifth
Sixth
Seventh
Eighth
Ninth
Tenth
W.E.Freeman
Legend
TCE Range (µg/L)
Well Symbols
0 - 5
5 - 10
10 - 50
>50
Contour Shading
5-10
10-50
>50
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Potentiometric surface of the Intermediate Aquifer 5-ft. contour
Property Boundary
Groundwater Flow Direction (Fluvial)
Groundwater Flow Direction (Intermediate)
Clay Elevation Exceeds Groundwater Elevation
Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and April 2017 LTM events. Only concentrations from the April 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the April 2017 LTM event.
Figure 16
Main Installation
Fluvial Aquifer
TCE Concentrations,
April 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
250
500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
HDR
Path: W:\LTM\LS26\GIS\16_MI_Fluvial_TCE_April_2017.mxd

MW-55
MW-19
MW-53
MW-16
MW-282
<1
MW-213
13.1
MW-143
6.71
MW-62
0.278
MW-142
4.24
MW-212
40.1
MW-198
1.65
MW-199B
51
MW-209B
7.36
MW-207B
9.4
MW-208B
2.1
MW-99
MW-39
4.56
MW-206A
9.35
MW-206B
5.39
MW-205B
6.75
MW-210B
22.2
MW-197B
14.9
MW-203B
11.6
MW-200
4.5
MW-98
1.98
MW-94A
6.05
MW-204A
0.819
MW-204B
9.3
MW-215B
1.42
MW-63B
2.23
MW-63A
MW-281
66.2
MW-258
55.4
MW-260
4.03
MW-265
4.46
MW-263
32.8
MW-103
10.5
MW-104
19.3
MW-283
<1
MW-267
16.2
MW-64
26.3
MW-218
32.3
MW-266
0.505
MW-88
1.32
DR2-1
5.46
DR2-2
0.771
PMW85-01
<1
DR2-5
<50
PMW85-05
4.99
MW-85
19.8
MW-113
<1
PMW92-03
0.463
PMW92-02
<1
MW-92
4.94
DR2-6
6.59
MW-217
28
MW-259
18.6
MW-261
2.73
PZ-03
MW-271
4.84
MW-97
71.7
MW-216
MW-272
<1
MW-277
<1
MW-93
MW-276
<1
MW-270
25.5
MW-24
MW-23
MW-22
MW-102B
MW-279
3.16
MW-269
6.25
MW-219
6.4
MW-278
1.94
MW-66A
MW-21
2.43
PMW21-01
<1
PMW21-02
7.1
PMW21-03
41.5
PMW21-04
146
MW-100B
1.58
PMW21-05
2.35
DR1-2
DR1-3
9.81
DR1-7
DR1-8
PMW101-01
A: 2.35
B: 0.696
PMW101-02
A: <1
B: <1
PMW101-03
A: 4.62
B: 0.951
PMW101-04
A: <1
B: 3.22
PMW101-06
A: 0.378
B: 22.8
PMW101-07
MW-101
T: <1
B: <1
DR1-1
DR1-1A
DR1-4
<1
DR1-5
0.784
DR1-5A
<1
DR1-6
<1
DR1-6A
10.5
MW-52
1.58
MW-275
<1
MW-274
1.46
MW-25A
0.47
MW-96
<1
MW-26
0.739
DR2-3
0.922
DR2-4
0.617
MW-50
3.12
MW-280
1.71
MW-278
1.94
MW-66A
MW-99
MW-19
MW-55
MW-53
MW-16
MW-52
MW-275
MW-274
MW-270
MW-276
MW-93
MW-277
MW-24
MW-23
MW-22
MW-102B
MW-216
MW-97
MW-271
MW-261
MW-219
MW-269
MW-279
MW-278
MW-66A
MW-25A
MW-96
MW-26
MW-50
MW-280
MW-266
MW-267
MW-218
MW-64
MW-217
MW-259
MW-215B
MW-208B
MW-205B
MW-206A
MW-206B
MW-200
MW-98
MW-94A
MW-39
MW-210B
MW-197B
MW-203B
MW-204A
MW-204B
MW-198
MW-199B
MW-209B
MW-207B
MW-213
MW-143
MW-62
MW-142
MW-212
MW-281
MW-258
MW-260
MW-265
MW-263
MW-103
MW-104
MW-283
MW-63B
MW-63A
PMW21-01
PMW21-02
PMW21-03
PMW21-04
MW-100B
PMW21-05
DR1-2
DR1-3
DR1-7
DR1-8
PMW101-01
PMW101-02
PMW101-03
PMW101-04
PMW101-06
PMW101-07
MW-101
DR1-1
DR1-1A
DR1-4
DR1-5
DR1-5A
DR1-6
DR1-6A
MW-88
DR2-1
DR2-2
PMW85-01
DR2-5
PMW85-05
MW-85
MW-113
PMW92-03
PMW92-02
MW-92
DR2-6
MW-217
MW-259
MW-26
DR2-3
DR2-4
MW-50
MW-96
MW-64
MW-218
MW-267
MW-266
MW-280

MW-55
MW-19
MW-53
MW-263
2.29
MW-16
MW-282
<1
MW-103
0.418
MW-104
0.881
MW-213
7.46
MW-62
11.8
MW-143
<1
MW-142
<1
MW-212
<1
MW-198
<1
MW-199B
0.737
MW-209B
<1
MW-207B
0.467
MW-260
<1
MW-63B
0.358
MW-63A
MW-281
2.12
MW-258
1.96
MW-265
0.266
MW-283
<1
MW-208B
<1
MW-39
10.6
MW-206A
12.5
MW-206B
6.24
MW-205B
9.07
MW-98
5.65
MW-200
1.42
MW-210B
0.973
MW-197B
1.31
MW-203B
16.7
MW-204A
1.09
MW-204B
<1
MW-94A
2.63
MW-215B
<1
MW-64
0.44
MW-218
<1
MW-267
0.361
MW-266
<1
MW-280
<1
MW-88
0.266
DR2-5
28
DR2-1
6.84
DR2-2
3.51
PMW85-01
13.1
PMW85-05
123
MW-85
40.5
MW-113
40.3
PMW92-03
24.6
MW-92
5.86
DR2-6
48.9
DR2-3
<1
MW-26
<1
DR2-4
<1
MW-50
0.854
MW-96
<1
MW-217
1.17
MW-25A
<1
MW-274
1.01
MW-52
0.701
MW-270
6.63
MW-276
<1
MW-93
MW-277
<1
MW-24
MW-272
<1
MW-271
<1
MW-259
<1
MW-261
<1
PZ-03
MW-97
<1
MW-216
MW-23
MW-22
MW-102B
MW-99
MW-66A
MW-278
0.971
MW-269
5.19
MW-219
5.78
MW-21
136
PMW21-01
93.2
PMW21-02
14.5
PMW21-04
39.1
PMW21-03
10.4
MW-100B
21.6
PMW21-05
0.368
DR1-8
DR1-7
DR1-2
DR1-3
4.7
DR1-1
DR1-1A
PMW101-02
A: 6.18
B: 14.3
PMW101-03
A: 1.17
B: 0.317
PMW101-04
A: 5.1
B: <1
MW-101
7: <1
B: <1
DR1-4
<1
PMW101-06
A: <1
B: 0.714
PMW101-07
A: <1
B: 1.33
DR1-5
13.5
DR1-5A
48.7
DR1-6
<1
DR1-6A
33.8
MW-279
13.3
925
949
835
737
720
629
529
630
530
649
549
650
550
560
468
469
360
670
470
689
489
685
690
490
319
210
329
229
429
430
330
230
449
349
249
450
350
250
144
756
865
1089
1088
1087
1086
1085
972
970
995
1084
Dunn
Ledger
Cincinnati
Silver
Raven
Corry
Warren
Sparks
Merlin
Cane
Starr
Elliston
Rayner
Perry
Twenty Seventh
Twenty Third
Twenty Fifth
Eloise
Mallory
Dempster
Norris
Shelby
Dottie
Gausco
Whitmore
Johnna
Arido
Hanako
Memphis Depot Pkwy
Danielson
Behnke
Troyer
Kelly
Knock
Lloyd
Third
Fifth
Slater
Lauderdale
W E Freeman
Ball
Gradney
Carbondale
Fairmeade
Kingsview
Vesturn
Manchester
Rourke
Vista
Thames
Freeman
Ferber
Lehrter
Freemont
Hicks
Blake
Barksdale
Murkey
Cordell
Hull
Canada
Custer
Filmore
Arkansas
Frisco
Delight
215
220
210
200
205
195
190
185
180
175
225
230
235
240
215
210
205
204
203
202
201
200
Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.
Legend
cDCE Range (µg/L)
Well Symbols
0-5
5-10
10-70
70-100
>100
Contour Shading
5-10
10-70
70-100
>100
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Potentiometric surface of the Intermediate Aquifer 5-ft. contour
Property Boundary
Groundwater Flow Direction (Fluvial)
Groundwater Flow Direction (Intermediate)
Clay Elevation Exceeds Groundwater Elevation
Figure 18
Main Installation
Fluvial Aquifer
cDCE Concentrations,
October 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
250
500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
HDR
Path: W:\LTM\LS26\GIS\18_MI_Fluvial_cDCE_Oct_2017.mxd


MW-55
MW-19
MW-53
MW-263 <1
MW-16
MW-282 <1
MW-103 <1
MW-104 <1
MW-213 <5
MW-62 15.3
MW-143 <1
MW-142 <1
MW-212 <1
MW-198 <1
MW-199B <1
MW-207B <1
MW-209B <1
MW-99
MW-208B <1
MW-39 <1
MW-210B <1
MW-205B <1
MW-206A <1
MW-206B <1
MW-200 <1
MW-197B <1
MW-203B 5.91
MW-204A <1
MW-204B <1
MW-98 <1
MW-94A <1
MW-260 <1
MW-63B <1
MW-63A <1
MW-281 <1
MW-258 <1
MW-265 <1
MW-283 <1
MW-215B <1
MW-267 <1
MW-266 <1
MW-280 <1
MW-64 <1
MW-218 <1
MW-217 <1
MW-88 <1
DR2-5 <50
DR2-1 <1
DR2-2 <1
PMW85-01 36.9
PMW85-05 <1
MW-85 1755
PMW92-03 7.76
MW-113 28.3
DR2-6 21.9
DR2-3 <1
PMW92-02 72.2
MW-92 2.19
DR2-4 <1
MW-26 <1
MW-50 <1
MW-96 <1
MW-274 <1
MW-25A <1
MW-52 <1
MW-275 <1
MW-270 <1
MW-276 <1
MW-93
MW-277 <1
MW-24
MW-272 <1
MW-271 <1
MW-259
MW-261 <1
PZ-03
MW-97 <1
MW-216
MW-23
MW-22
MW-102B
MW-279 <1
MW-219 <1
MW-21 <1
MW-100B 166
DR1-8
PMW21-04 <1
PMW21-02 <1
PMW21-01 <1
PMW21-03 <1
PMW21-05 <1
DR1-2
DR1-7
DR1-3 <1
PMW101-03 A: 4.65 B: <1
PMW101-02 A: <1 B:4.58
PMW101-04 A: 1.74 B: <1
DR1-4 <1
DR1-1
DR1-1A
MW-101 T: <1 B: <1
PMW101-06 A: <1 B: <1
PMW101-07 A: <1 B: <1
DR1-5 <1
DR1-5A <1
DR1-6 <1
DR1-6A <1
MW-66A
MW-278 <1
MW-269 <1
925
949
835
737
720
629
630
649
650
865
756
770
560
468
469
360
670
689
685
690
470
489
490
319
210
329
229
429
530
549
550
330
230
430
449
450
349
249
350
250
144
1089
1086
1088
1087
1091
995
972
970
Twenty Seventh
Twenty Third
Twenty First
Hollywood
Oak
Knox
Troyer
Lloyd
Third
Danielson
Fifth
Behnke
Memphis Depot Pkwy
W.E. Freeman
Amido
Rail
Gladney
Kingsview
Carbondale
Fairmeade
Dempster
Norris
Mallory
Gause
Dottie
Gausco
Whitmore
Arizona
Elliston
Eloise
Starr
Cane
Merlin
Raven
Silver
Corry
Warren
Dunn
Cincinnati
Ledger
Ferber
Lehrer
Freemont
Murkey
Hicks
Slate
Barksdale
Lapalorca
Cerabla
Custer
Filmore
Arcenya
Frisco
Delight
Sparks
Perry
Rayner
Rozelle
Manchester
Vista
Verdun
Thames
Alcantra
Rutledge
215
220
225
230
235
240
210
205
200
195
190
185
180
175
207
208
204
203
215
210
225
220
230
235
240
Legend
VC Range (µg/L)
Well Symbols
0-2
2-10
10-50
50-100
>100
Contour Shading
2-10
10-50
50-100
>100
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Potentiometric surface of the Intermediate Aquifer 5-ft. contour
Property Boundary
Groundwater Flow Direction (Fluvial)
Groundwater Flow Direction (Intermediate)
Clay Elevation Exceeds Groundwater Elevation
Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.
Figure 19
Main Installation
Fluvial Aquifer
VC Concentrations,
October 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
250
500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
HDR
Path: W:\LTM\LS26\GIS\19_MI_Fluvial_VC_Oct_2017.mxd

Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.

Legend

CT Range (µg/L)

Well symbols
- 0-5
- 5-10
- 10-50
- >50

Contour Shading
- 5-10
- 10-50
- >50

- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Property Boundary
- Groundwater Flow Direction (Fluvial)
- Groundwater Flow Direction (Intermediate)
- Clay Elevation Exceeds Groundwater Elevation

Figure 20

Main Installation Fluvial Aquifer CT Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

0 250 500 Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\20_MI_Fluvial_CT_Oct_2017.mxd

MW-273
<1
MW-262
<1
MW-250
27.9
MW-34
MW-229
MW-38
MW-252
MW-202A
5.16
MW-202B
35.9
MW-253
MW-107T
43.1
MW-107B
50.2
MW-90
13.5
MW-89
3.64
MW-141
31.7
MW-211
MW-199A
MW-108
4.01
MW-207A
11.4
MW-209A
0.418
MW-208A
10.7
MW-39A
5.42
MW-210A
2.88
MW-205A
10.3
MW-197A
18.9
MW-203A
<1
MW-264
<1
MW-214A
MW-214B
MW-215A
MW-268
<1
925
949
835
865
756
770
720
737
629
630
649
650
529
530
549
550
319
429
430
449
450
329
330
349
350
210
229
230
249
250
144
560
360
468
469
670
470
689
685
690
489
490
263
260
261
265
270
271
274
1089
1086
1088
1087
1090
995
972
970
Dunn
Ledger
Cincinnati
Raven
Silver
Corry
Warren
Sparks
Merlin
Cane
Starr
Elliston
Raynor
Perry
Eloise
Mallory
Dempster
Norris
Dottie
Gavisco
Whitmore
Arizona
Twenty Seventh
Twenty Third
Twenty Fifth
Twenty First
Heyde
Troyer
Alley
Danielson
Behnke
Amido
Ball
Gladney
Carbondale
Kingsview
Fairmeade
Memphis Depot Pkwy
Murkey
Freemont
Filmore
Ferber
Lehrter
Hicks
Blake
Belvedere
Lapsley
Cleveland
Custer
Arkansas
Fisher
Third
Knock
Lloyd
Trott
Dwight
Sloan
Thames
Lauderdale
Verdun
Manchester
Rosalie
Vista
Skyline
Jefferson
W E Freeman
L Gillette
Sloan
Fifth
L

Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and April 2017 LTM events. Only concentrations from the April 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the April 2017 LTM event.

Legend

PCE Range (µg/L)

Well Symbols	Contour Shading
0 - 5	5-10
5 - 10	10-50
10 - 50	>50
>50	

- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Groundwater Flow Direction (Intermediate)
- Property Boundary
- Clay Elevation Exceeds Groundwater Elevation

Figure 21

Main Installation Intermediate Aquifer PCE Concentrations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500

Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

HDR

Path: W:\LTM\LS26\GIS\21_MI_IUC_PCE_April_2017.mxd

MW-273
<1

MW-262
<1

MW-250
24.5

MW-34
2.16

MW-229

MW-38

MW-252

MW-202A
4

MW-202B
36.8

MW-253
<1

MW-89
2.11

MW-90
13.5

MW-107B
5.43

MW-107T
8.8

MW-264
<1

MW-141
27.1

MW-211

MW-214A
5.25

MW-214B
5.1

MW-199A
<1

MW-108
3.3

MW-207A
10.1

MW-209A
0.507

MW-208A
10.7

MW-215A
5.23

MW-39A
3.93

MW-210A
2.93

MW-205A
9.32

MW-197A
17.9

MW-203A
0.884

MW-268
<1

925
949
835
865
756
770
720
737
629
630
649
650
529
530
549
550
429
430
449
450
329
330
349
350
229
230
249
250
319
210
144
560
360
468
469
670
470
689
685
690
489
490
263
260
261
265
270
271
274
1089
1086
1088
1087
1090
995
972
970

Ledger
Cincinnati
Dunn
Silver
Raven
Sparks
Corry
Warren
Merlin
Cane
Starr
Elliston
Raynor
Perry
Eloise
Mallory
Dempster
Norris
Gravel
Dottie
Gausco
Whitmore
Arizona
Ferber
Lehrter
Freemont
Hays
Slate
Belvedere
Lapalorca
Murkey
Canada
Custer
Filmore
Fillmore
Freeport
Arkansas
Frisco
Heyde
Troyer
Alley
Knock
L Cobbs
Third
Lloyd
Todd
Memphis Depot Pkwy
Danielson
Behnke
Fifth
Twenty Seventh
Twenty Third
Twenty Fifth
Twenty First
W.E.Freeman
Ball
Amido
Gladney
Carbondale
Kingsview
Manchester
Rozelle
Vista
Verdun
Fairmeade
Thames
Delight

100
110
120
130
140
150
160
170
180
190
200
210
220

Legend

PCE Range (µg/L)

Well Symbols
- 0 - 5
- 5 - 10
- 10 - 50
- >50

Contour Shading
- 5-10
- 10-50
- >50

- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Groundwater Flow Direction (Intermediate)
- Property Boundary
- Clay Elevation Exceeds Groundwater Elevation

Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.

Figure 22
Main Installation Intermediate Aquifer PCE Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

FDR

Path: W:\LTM\LS26\GIS\22_MI_IUC_PCE_Oct_2017.mxd

Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and April 2017 LTM events. Only concentrations from the April 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the April 2017 LTM event.

Legend

TCE Range (µg/L)

Well Symbols	Contour Shading
0 - 5	5-10
5 - 10	>10
>10	

- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Groundwater Flow Direction (Intermediate)
- Property Boundary
- Clay Elevation Exceeds Groundwater Elevation

Figure 23

Main Installation Intermediate Aquifer TCE Concentrations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 250 500

Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet; Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

FDR

Path: W:\LTM\LS26\GIS\23_MI_IUC_TCE_April_2017.mxd

MW-273
<1
MW-262
<1
MW-250
8.58
MW-34
3.95
MW-229
MW-38
MW-252
MW-202A
0.903
MW-202B
3.37
MW-253
<1
MW-90
3.82
MW-89
0.784
MW-107B
<1
MW-107T
<1
MW-264
<1
MW-141
4.39
MW-211
MW-214A
2.23
MW-214B
1.96
MW-199A
6.08
MW-108
9.76
MW-207A
19.5
MW-209A
7.18
MW-208A
9.42
MW-39A
5.64
MW-210A
4.53
MW-205A
6.82
MW-197A
0.845
MW-203A
1.42
MW-215A
2.29
MW-268
<1
925
949
835
865
737
720
756
770
629
630
649
650
529
530
549
550
429
430
449
450
319
329
330
349
350
210
229
230
249
250
144
560
360
468
469
670
470
689
685
690
489
490
263
260
261
265
270
271
274
1089
1086
1088
1087
1090
995
972
970
Dunn
Ledger
Cincinnati
Raven
Silver
Corry
Warren
Sparks
Merlin
Cane
Starr
Elliston
Eloise
Mallory
Dempster
Norris
Gaisel
Dottie
Gausco
Whitmore
Arizona
Kingsview
Rozelle
Manchester
Vista
Verbus
Blanche
Alabama
Fairmeade
Carbondale
Thames
Lauderdale
Gladney
Ball
Danielson
Behnke
Amido
Memphis Depot Pkwy
Murkey
Freemont
Filmore
Ferber
Lehmer
Hicks
Slate
Barksdale
Leadsdale
Cerealia
Custer
Arkansas
Troyer
Knock
Third
Lloyd
Trout
Alley
L Collins
Twenty Seventh
Twenty Third
Twenty Fifth
Twenty First
Perry
Rayner
W E Freeman
Slater
Fifth
Delight
Heyde
L
Note:
1. Color-coded wells symbols are based on the most recent analytical result at each well. Results are from the October 2016 and October 2017 LTM events. Only concentrations from the October 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the October 2017 LTM event.
Legend
TCE Range (µg/L)
Well Symbols
0 - 5
5 - 10
>10
Contour Shading
5-10
>10
Potentiometric surface of the Intermediate Aquifer 5-ft. contour
Groundwater Flow Direction (Intermediate)
Property Boundary
Clay Elevation Exceeds Groundwater Elevation
Figure 24
Main Installation
Intermediate Aquifer
TCE Concentrations,
October 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
250
500
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet; Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
FDR
Path: W:\LTM\LS26\GIS\24_MI_IUC_TCE_Oct_2017.mxd

MW-67 (4/23/17)
PCE: ND
TCE: ND

MW-254 (10/8/17)
CT: 1.26
PCE: 2.83
TCE: 2.22

MW-255 (10/8/17)
PCE: 0.335
TCE: 0.665

MW-140 (10/8/17)
PCE: 11.8
TCE: 1.12

160
168
167

Legend

- Memphis Aquifer Well
- Potentiometric surface of the Memphis Aquifer 1-ft. contour

CVOC Results (ug/L)
MW-254
CT: Carbon tetrachloride
PCE: Tetrachloroethene
TCE: Trichloroethene

ND: Not Detected

- Property Boundary
- Roads
- Buildings
- Clay Elevation Exceeds Groundwater Elevation

Figure 25

Main Installation
Memphis Aquifer
CVOC Concentrations,
October 2017

Annual Long Term
Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

N
W E
S

0 250 500
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\25_MAQ_CVOCs\Oct17.mxd

A North

A' South

ELEVATION (FEET, NAVD88)

MW-254 MW-55 MW-256 MW-255 MW-140 MW-202A/B MW-89/90 MW-141 MW-199A/B MW-209A/B MW-39/A MW-206A/B MW-200 MW-94A MW-94 MW-81/24

Silty Clay to Clayey Silt

Sandy Clay to Clayey Sand

Sand with Gravel

Grey Clay

Clayey Sand

Silty Sand

Clay

Memphis Sand

MW-55 ND ND

MW-256 24.5 8.58

MW-254 2.83 2.22

MW-255 0.335 0.665

MW-202B 36.8 3.37

MW-202A 4.00 0.903

MW-90 13.5 3.82

MW-89 2.11 0.784

MW-140 11.8 1.12

MW-141 27.1 4.39

MW-199B 0.295 51.0

MW-199A ND 6.08

MW-209B 1.65 7.36

MW-209A 0.507 7.18

MW-39 1.62 4.56

MW-39A 3.93 5.64

MW-206B 9.69 5.39

MW-206A 6.71 9.35

MW-200 4.88 4.50 Clay

MW-94A 18.0 6.08

MW-94 Abandoned

MW-24 ND ND

MW-81 Abandoned

Sand

Silty Sandy Clay

?

Figure 26

Main Installation Cross Section A with PCE and TCE Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

Silty Clay to Clayey Silt

Sandy Clay to Clayey Sand

Fluvial Sand or Sand with Gravel

Clayey Sand to Silty Clay

Silty Sand-Sandy Silt

Intermediate Sand

Clay

Memphis Sand

Groundwater Elevation

Fluvial Aquifer Groundwater Elevation

Intermediate Aquifer Groundwater Elevation

Memphis Aquifer Groundwater Elevation

Well Screen Interval

PCE 5 ug/L

PCE 10 ug/L

TCE 5 ug/L

TCE 10 ug/L

TCE 50 ug/L

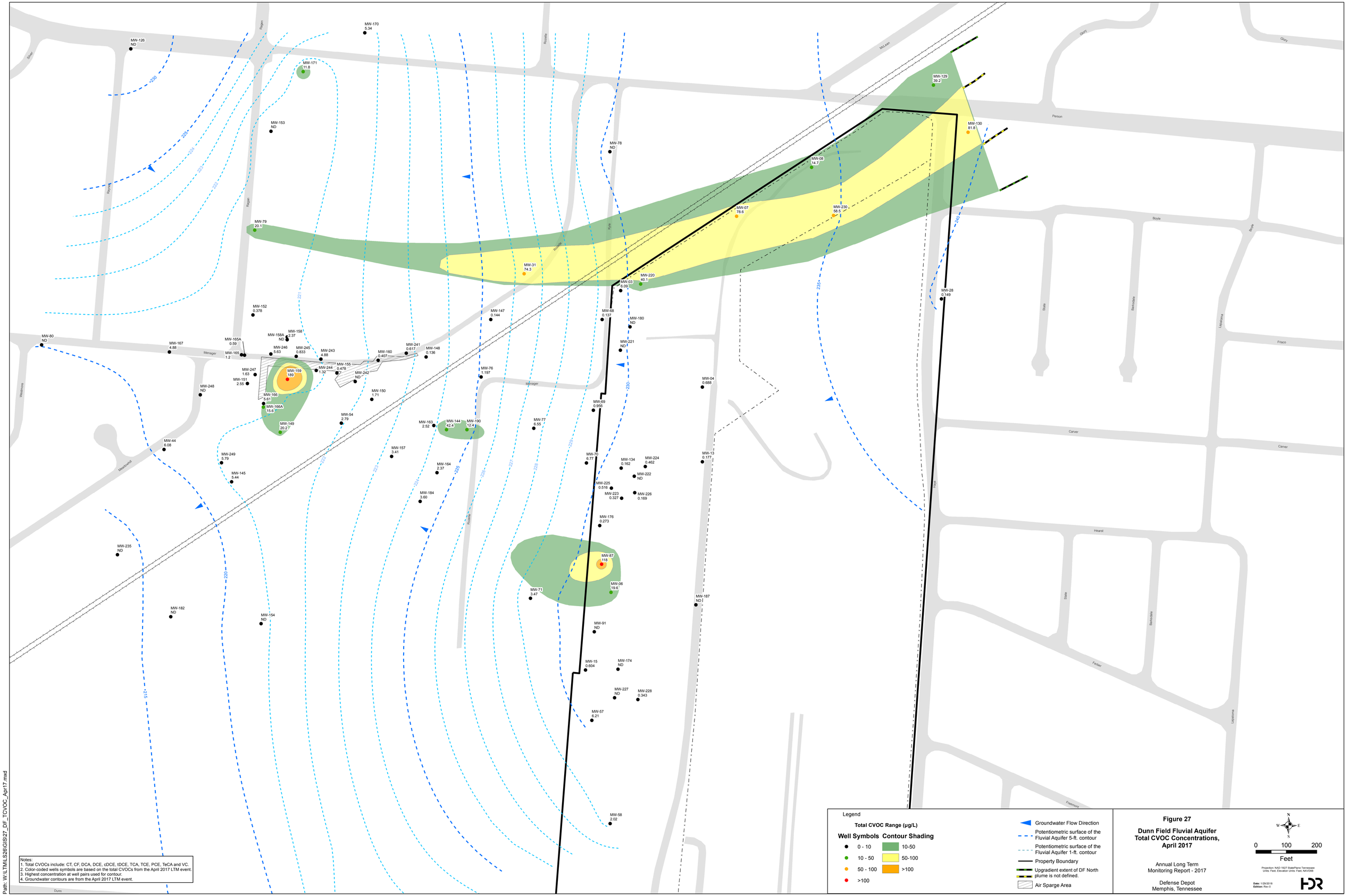
Well ID
PCE Result ug/L
TCE Result ug/L

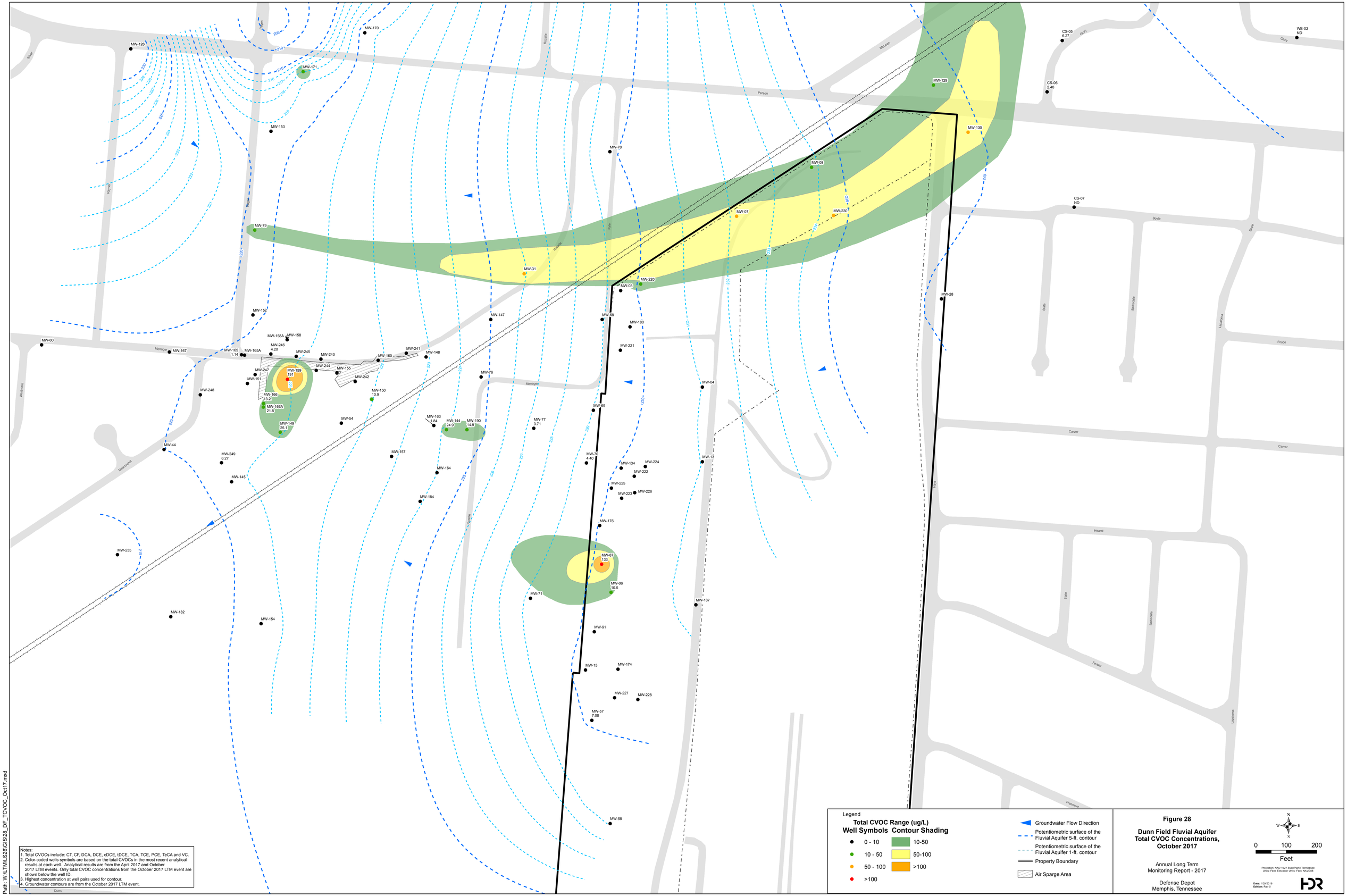
Note: Water levels measured at LTM wells on 10/5/17.

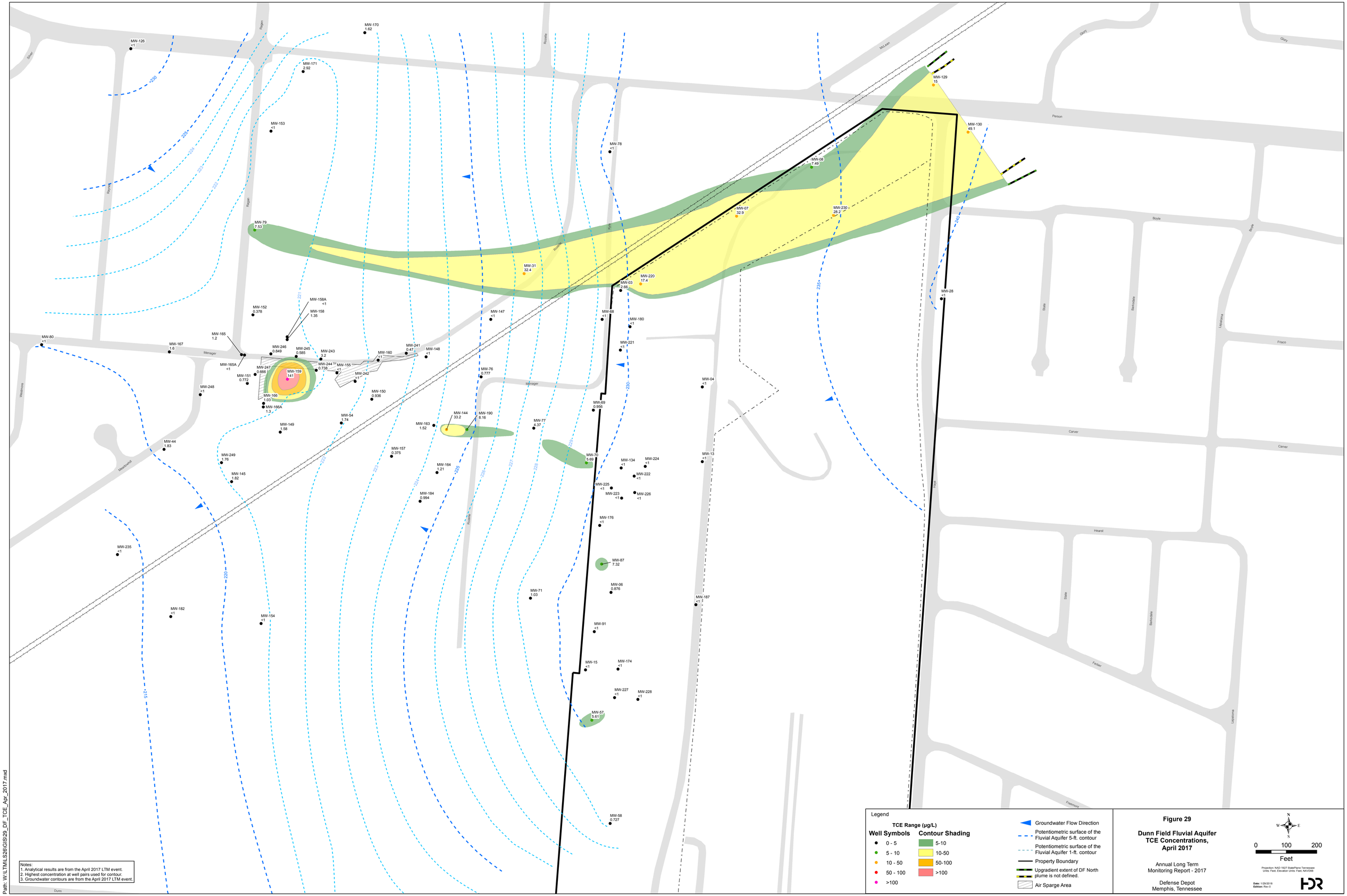
20
0
200

Date: January 2018
Edition: Rev 0

HDR


MW-126 ND
MW-170 5.34
MW-171 11.8
MW-153 ND
MW-78 ND
MW-129 39.2
MW-130 81.8
MW-08 14.7
MW-07 78.6
MW-230 58.5
MW-79 20.1
MW-31 74.3
MW-03 6.09
MW-220 40.1
MW-28 0.149
MW-68 0.137
MW-180 ND
MW-221 ND
MW-152 0.378
MW-147 0.144
MW-80 ND
MW-167 4.88
MW-165A 0.59
MW-165 1.2
MW-158A ND
MW-158 2.37
MW-246 5.63
MW-245 0.833
MW-243 4.68
MW-160 0.407
MW-241 0.617
MW-148 0.136
MW-247 1.63
MW-159 189
MW-244 1.32
MW-155 0.478
MW-242 ND
MW-151 2.55
MW-76 1.197
MW-248 ND
MW-150 1.71
MW-166 5.61
MW-166A 15.6
MW-69 0.956
MW-04 0.688
MW-54 2.79
MW-149 20.2
MW-163 2.52
MW-144 42.4
MW-190 12.4
MW-77 0.55
MW-44 6.08
MW-249 5.79
MW-145 5.44
MW-157 3.41
MW-164 2.37
MW-184 3.60
MW-70 6.77
MW-134 0.162
MW-224 0.462
MW-222 ND
MW-225 0.516
MW-223 0.327
MW-226 0.169
MW-13 0.177
MW-176 0.273
MW-235 ND
MW-87 118
MW-96 19.6
MW-71 3.47
MW-187 ND
MW-182 ND
MW-154 ND
MW-91 ND
MW-15 0.604
MW-174 ND
MW-227 ND
MW-228 0.343
MW-57 6.21
MW-58 2.02
Rigan
Rozelle
McLean
Glen
Glory
Person
Boyle
Rye
Rye
Rozelle
Boyle
State
Berkshire
Lansdowne
Frisco
Carver
Carver
Menager
Menager
Westmoore
Meadowlawn
Rye
Rozelle
Hearst
State
Berkshire
Fedser
Lansdowne
Fraternity
Dunn
230
225
224
223
222
221
220
215
235
240
229
228
227
226
Notes:
1. Total CVOCs include: CT, CF, DCA, DCE, cDCE, tDCE, TCA, TCE, PCE, TeCA and VC.
2. Color-coded wells symbols are based on the total CVOCs from the April 2017 LTM event.
3. Highest concentration at well pairs used for contour.
4. Groundwater contours are from the April 2017 LTM event.
Legend
Total CVOC Range (µg/L)
Well Symbols
0 - 10
10 - 50
50 - 100
>100
Contour Shading
10-50
50-100
>100
Groundwater Flow Direction
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Property Boundary
Upgradient extent of DF North plume is not defined.
Air Sparge Area
Figure 27
Dunn Field Fluvial Aquifer
Total CVOC Concentrations,
April 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
100
200
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
Path: W:\LTM\LS26\GIS\27_DF_TCVOC_Apr17.mxd


MW-126
MW-170
MW-171
MW-153
MW-78
MW-08
MW-129
MW-130
MW-07
MW-230
MW-79
MW-31
MW-220
MW-03
MW-28
MW-68
MW-180
MW-147
MW-152
MW-80
MW-167
MW-165
1.14
MW-165A
MW-246
4.20
MW-158A
MW-158
MW-245
MW-243
MW-241
MW-148
MW-160
MW-244
MW-155
MW-242
MW-247
MW-159
191
MW-151
MW-166
13.2
MW-166A
21.8
MW-149
25.1
MW-150
10.9
MW-248
MW-54
MW-76
MW-221
MW-04
MW-69
MW-163
1.84
MW-144
24.9
MW-190
14.9
MW-77
3.71
MW-44
MW-249
6.27
MW-145
MW-157
MW-164
MW-184
MW-70
4.40
MW-134
MW-224
MW-222
MW-225
MW-223
MW-226
MW-13
MW-176
MW-235
MW-87
133
MW-06
10.5
MW-71
MW-187
MW-182
MW-154
MW-91
MW-15
MW-174
MW-227
MW-228
MW-57
7.08
MW-58
CS-05
4.27
CS-06
2.40
CS-07
ND
WB-02
ND
Person
McLean
Poplar
Rozelle
Ryle
Boyle
Glen
Glory
Carver
Hearst
Frisco
Slate
Berkshire
Lansdowne
Freeman
Westmore
Meadowdale
Dunn
Menager
Notes:
1. Total CVOCs include: CT, CF, DCA, DCE, cDCE, tDCE, TCA, TCE, PCE, TeCA and VC.
2. Color-coded wells symbols are based on the total CVOCs in the most recent analytical results at each well. Analytical results are from the April 2017 and October 2017 LTM events. Only total CVOC concentrations from the October 2017 LTM event are shown below the well ID.
3. Highest concentration at well pairs used for contour.
4. Groundwater contours are from the October 2017 LTM event.
Legend
Total CVOC Range (ug/L)
Well Symbols
0 - 10
10 - 50
50 - 100
>100
Contour Shading
10-50
50-100
>100
Groundwater Flow Direction
Potentiometric surface of the Fluvial Aquifer 5-ft. contour
Potentiometric surface of the Fluvial Aquifer 1-ft. contour
Property Boundary
Air Sparge Area
Figure 28
Dunn Field Fluvial Aquifer
Total CVOC Concentrations,
October 2017
Annual Long Term
Monitoring Report - 2017
Defense Depot
Memphis, Tennessee
N
W
E
S
0
100
200
Feet
Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88
Date: 1/29/2018
Edition: Rev 0
HDR
Path: W:\LTM\LS26\GIS\S28_DF_TCVOC_Oct17.mxd



Notes:
1. Analytical results are from the April 2017 LTM event.
2. Highest concentration at well pairs used for contour.
3. Groundwater contours are from the April 2017 LTM event.

Legend

TCE Range (µg/L)

Well Symbols	Contour Shading
0 - 5	5-10
5 - 10	10-50
10 - 50	50-100
50 - 100	>100
>100	

- Groundwater Flow Direction
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Property Boundary
- Upgradient extent of DF North plume is not defined.
- Air Sparge Area

Figure 29

Dunn Field Fluvial Aquifer TCE Concentrations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 100 200

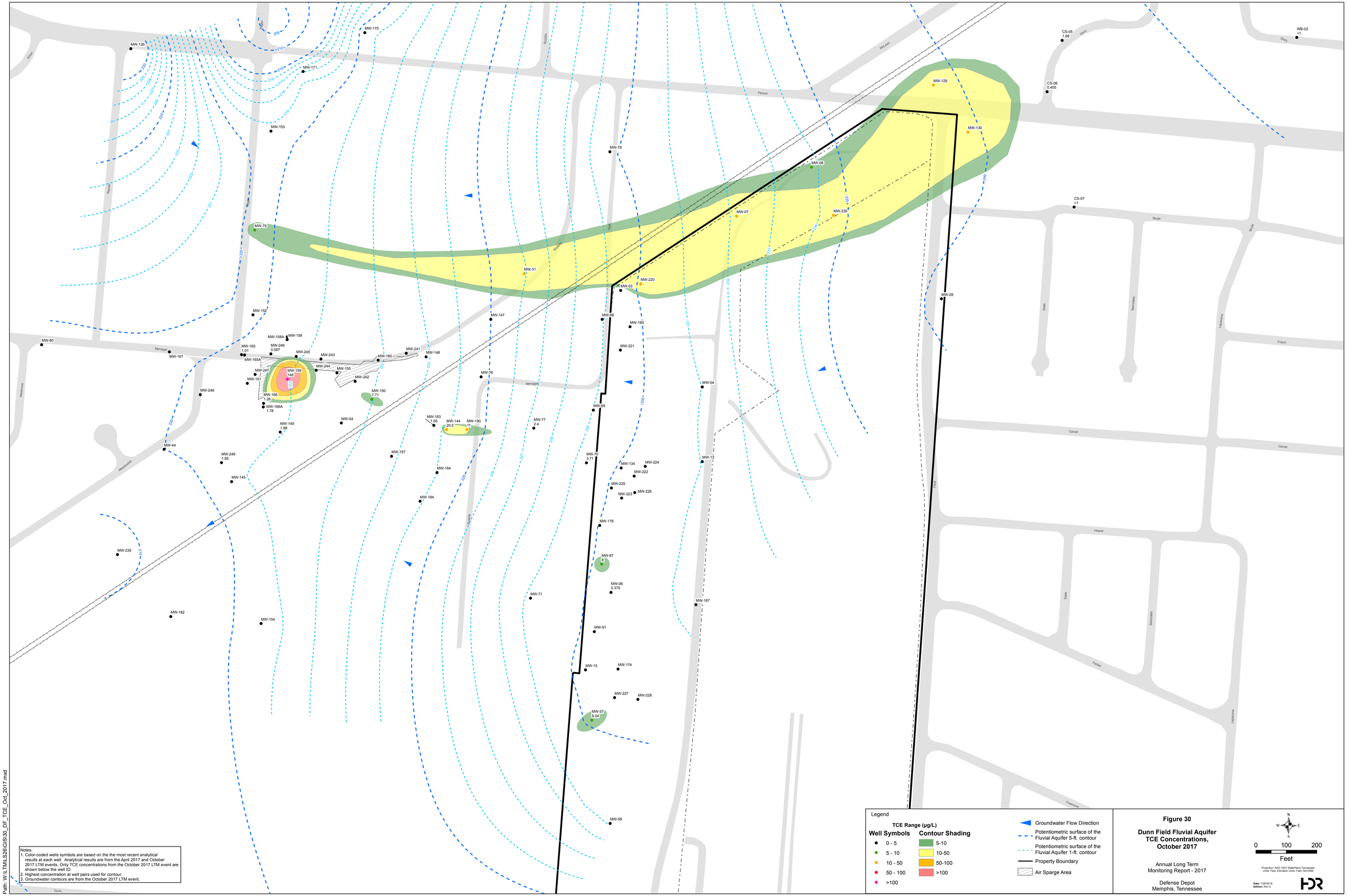
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

FDR

Path: W:\LTM\LS26\GIS\29_DF_TCE_Apr_2017.mxd



Notes:
1. Color-coded wells symbols are based on the the most recent analytical results at each well. Analytical results are from the April 2017 and October 2017 LTM events. Only TCE concentrations from the October 2017 LTM event are shown below the well ID.
2. Highest concentration at well pairs used for contour.
3. Groundwater contours are from the October 2017 LTM event.

Legend

TCE Range (µg/L)

Well Symbols	Contour Shading
0 - 5	5-10
5 - 10	10-50
10 - 50	50-100
50 - 100	>100
>100	

- Groundwater Flow Direction
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Property Boundary
- Air Sparge Area

Figure 30

Dunn Field Fluvial Aquifer TCE Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 100 200

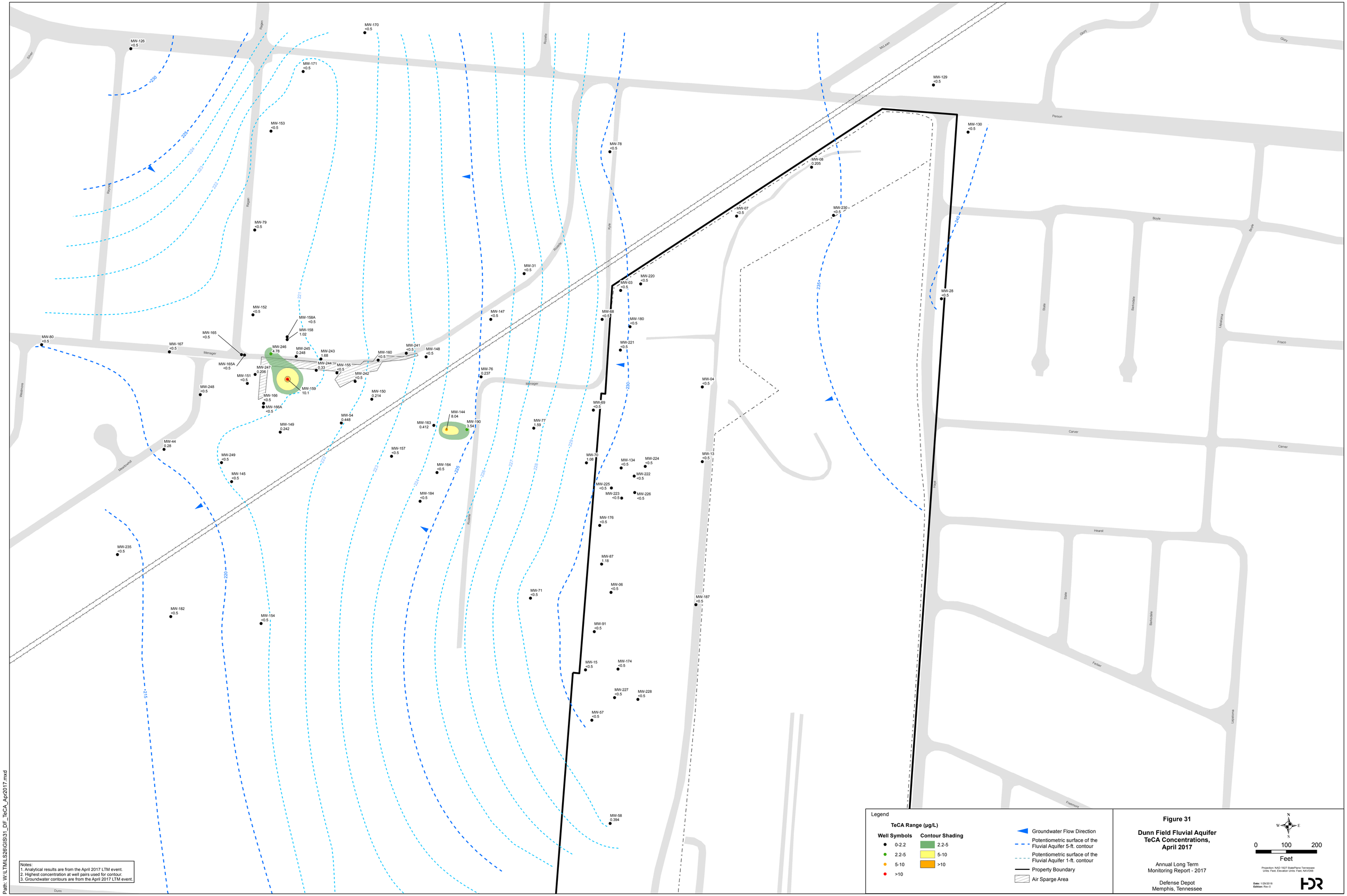
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

HDR

Path: W:\LTM\LS26\GIS\30_DF_TCE_Oct_2017.mxd



Notes:
1. Analytical results are from the April 2017 LTM event.
2. Highest concentration at well pairs used for contour.
3. Groundwater contours are from the April 2017 LTM event.

Legend

TeCA Range (µg/L)

Well Symbols	Contour Shading
0-2.2	2.2-5
2.2-5	5-10
5-10	>10
>10	

- Groundwater Flow Direction
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Property Boundary
- Air Sparge Area

Figure 31

Dunn Field Fluvial Aquifer TeCA Concentrations, April 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

N W E S

0 100 200

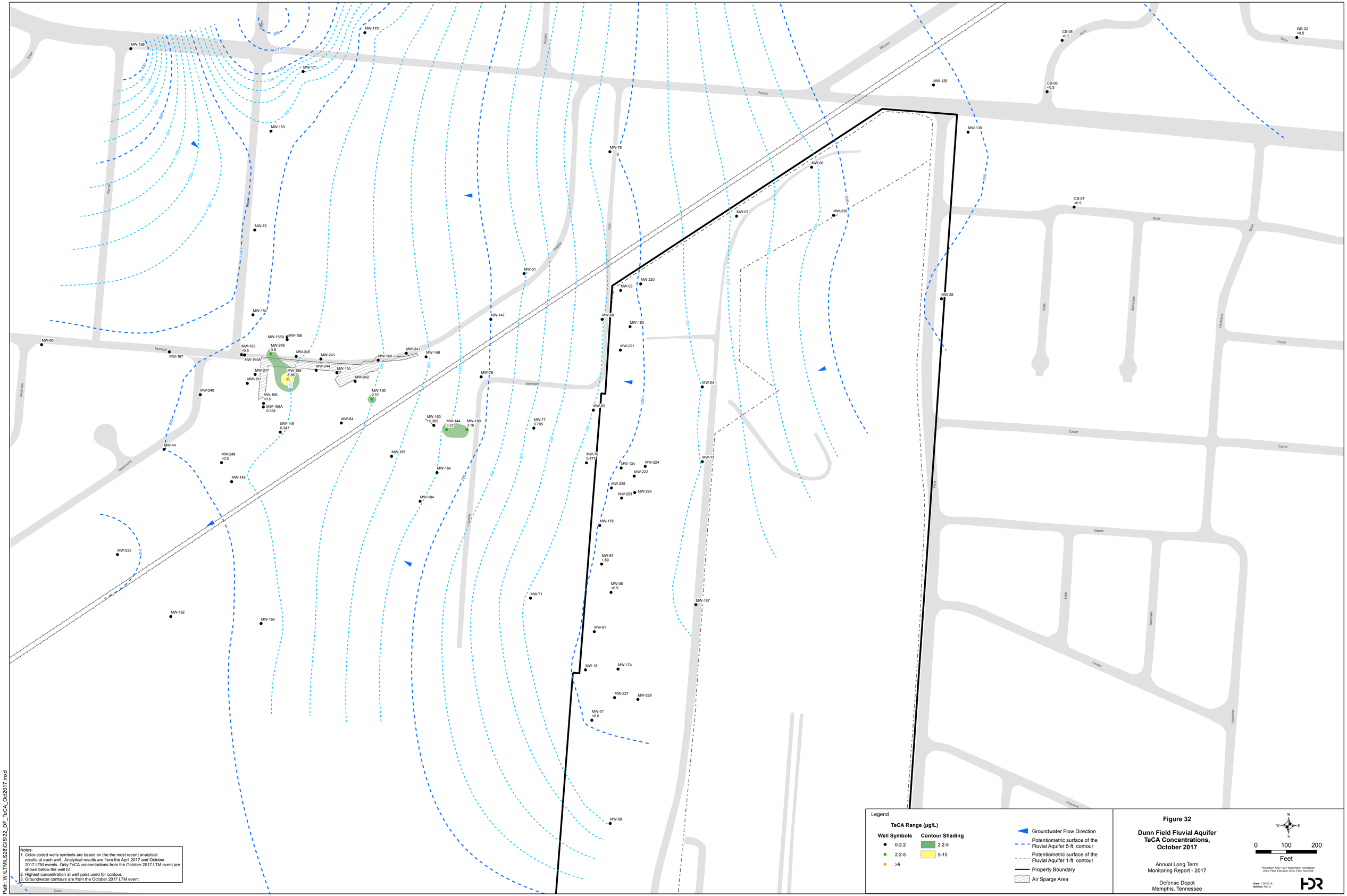
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

HDR

Path: W:\LTM\LS26\GIS\31_DF_TeCA_Apr2017.mxd



Notes:
1. Color-coded wells symbols are based on the the most recent analytical results at each well. Analytical results are from the April 2017 and October 2017 LTM events. Only TeCA concentrations from the October 2017 LTM event are shown below the well ID.
2. Highest concentration at well pairs used for contour.
3. Groundwater contours are from the October 2017 LTM event.

Legend

TeCA Range (µg/L)

Well Symbols	Contour Shading
0-2.2	2.2-5
2.2-5	5-10
>5	

- Groundwater Flow Direction
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Property Boundary
- Air Sparge Area

Figure 32

Dunn Field Fluvial Aquifer TeCA Concentrations, October 2017

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

0 100 200
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\32_DF_TeCA_Oct2017.mxd

MW-169
cDCE: 1.51

MW-237
DCE: 4.03

MW-251
DCE: 4.73
CF: 0.491

MW-250
No Detections

Notes:
1. Only concentrations detected above the reporting limit from the April 2017 LTM event are shown below the well ID.
2. Groundwater contours are from the April 2017 LTM event.

Legend

- Intermediate Aquifer Well
- CVOC Result (ug/L)
  MW-250
  DCE - 1,1-Dichloroethene
  CF - Chloroform
- Property Boundary
- Air Sparge Area

Figure 33

Dunn Field Intermediate Aquifer CVOC Concentrations, April 2017

Annual Long Term
Monitoring Report - 2017

Defense Depot
Memphis, Tennessee

N
W E
S

0 100 200
Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet, Elevation Units: Feet, NAVD88

Date: 1/29/2018
Edition: Rev 0

Path: W:\LTM\LS26\GIS\33_DF_CVOCs_Apr_2017.mxd

A

Appendix A.

Responses to USEPA and TDEC Comments

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 4
ATLANTA FEDERAL CENTER
61 FORSYTH STREET
ATLANTA, GEORGIA 30303-8960

November 29, 2018

Mr. James C. Foster
Assistant Chief of Staff for Installation Management
Base Realignment and Closure Division (ACSIM-ODB)
2530 Crystal Drive (Taylor Building), Room 5000
Arlington, VA 22202-3940

Dear Mr. Foster,

The U.S. Environmental Protection Agency (EPA) has received and reviewed the Department of Army's Responses to EPA comments for the Defense Depot of Memphis, Tennessee Annual Long Term Monitoring Report for 2017, dated April 2018, Revision 0.

EPA provides approval for the above mentioned document with the understanding that EPA requests the FFA team meet sometime at a mutually acceptable time after the SRI data has been collected and SRI activities have been concluded to discuss monitor well sampling frequency, monitor well designation and anticipated path forward for the DDMT facility.

Should you have any questions or concerns, please feel free to call me on my cell number 404-229-9500.

Sincerely,

Diedre Lloyd
Remedial Project Manager
Restoration & Sustainability Branch
Superfund Division

cc: Mr. James Foster, (Signed Original), United Parcel Service, Return Receipt
Mr. Jamie A. Woods, PG, Tennessee, Department of Environment and Conservation, Memphis Environmental Field Office, 8383 Wolf Lake Drive, Bartlett, TN 38133-4119
Ms. Joan Hutton, CALIBRE, 3898 Mountain View Road, Kennesaw, GA 30152
Mr. Thomas Holmes, HDR Environmental, P.O. Box 728, Highlands, NC 28741

Responses to:
U.S. Environmental Protection Agency (EPA) Region 4 Comments on:
Annual Long Term Monitoring Report – 2017, Revision 0
Defense Depot Memphis, Tennessee
Dated April 2018
Comments Received 28 October 2018

EPA Comments:

1. According to Table 4, 2017 Dunn Field Sample Schedule, Well MW-58 is currently classified as a fluvial background well at Dunn Field and is currently on a biennial sampling frequency. In Section 1.4. (Previous Groundwater Monitoring) on Page 1-6 states that monitoring wells classified as background wells are "… wells upgradient of or at a distance from groundwater plumes with no, or only low, previous detections of site contaminants." However, 1,1,2,2-tetrachloroethane and trichloroethene (TCE) were detected at concentrations of 0.394 (J) micrograms per liter (µg/L) and 0.727 (J) µg/L, respectively, during the most recent sample event conducted on April 23, 2017. Although these concentrations are currently below maximum contaminant levels (MCLs) it should be noted that 1,1,2,2-tetrachloroethane was last detected on April 28, 2011 at a concentration of 0.213 (J) µg/L indicating a potential increasing trend based on the data results presented in Appendix I, Historical CVOC Results - Dunn Field. Therefore, it would not be appropriate to classify MW-58 as a background well if increasing 1,1,2,2-tetrachloroethane concentrations are occurring. The biennial sampling frequency will need to be re-evaluated if the concentrations of 1,1,2,2-tetrachloroethane continue to increase.

   Response: MW-58 is located along the southwest boundary of Dunn Field, south of the Source Areas that resulted in CVOC plumes prior to remedial action The historical results for MW-58, included in Appendix I of the subject report, are attached. The well has been sampled 19 times since 1999. None of the primary CVOCs commonly detected at Dunn Field have been detected above an MCL or a Target Concentration (TC) specified in the Dunn Field Record of Decision (CH2MHILL, 2004). The highest reported concentration of TCE was 4.36 µg/L in February 2000; the highest concentration in the last four samples was 1.7 µg/L in April 2013. TeCA has been detected at estimated concentrations below the reporting limit (0.5 µg/L) in two of the last four samples, but an increase of 0.181 µg/L over four years with two non-detect (<0.5 µg/L) samples in between is not sufficient to designate an increasing trend. The well still meets the DDMT criteria for background wells, "… wells upgradient of or at a distance from groundwater plumes with no, or only low, previous detections of site contaminants."

   a. Please revise the LTM Annual Report to address these issues.

      Response: No revision is considered necessary. The well classification and sampling frequency for MW-58 will be reviewed in the 2019 LTM report after it is next sampled in April 2019. Sampling frequency will be based on the criteria listed in Section 4.3 of the subject report.

   b. Additionally, for clarity and consistency, provide the chlorinated volatile organic compound (CVOC) time-trend plot for well MW-58 in Appendix J, CVOC Time-Trend Plots Dunn Field.

      Response: Time trend plots are prepared for LTM wells that have exceeded an MCL, or a TC for Dunn Field. The historical data currently provided are considered sufficient for review of LTM wells with only low concentrations detected. No revision is considered necessary.

2. Section 4.3, Changes to LTM for 2017, states "Sample frequencies were reviewed based on the following criteria: wells with stable concentrations below the MCL in the eight most recent samples will be sampled biennially, wells with stable concentrations approximately two times the MCL or less will be sampled semiannually." Additionally, Section 4.3 states, "The sample frequencies for 2017 for MI and Dunn Field LTM wells were semiannual (102), annual (70) and biennial (61); the recommended frequencies for 2018 are semiannual (105), annual (69) and

biennial (58)." However, the LTM Annual Report does not specifically note which wells will be placed on a different sampling frequency.

Response: As a clarification, the criteria in Section 4.3 states "…wells with stable concentrations approximately two times the MCL or less will be sampled annually", not semiannually.

a. For clarity and consistency and prior to approval of any modifications of sampling frequency, please revise the LTM Annual Report to identify the wells where the frequency has changed and provide the criteria or rationale for the change.

   Response: The revised sample frequencies in the subject report were implemented in 2018 as there were a limited number of changes which resulted in an overall increase in sample frequency.

   Tables 20 and 21 of the subject report will be revised to add a column noting the prior frequency, if changed. The second sentence of the following paragraph will be added: "The recommended 2018 LTM sample schedules are shown on Table 20 for the MI and Table 21 for Dunn Field. Changes from the 2017 sample frequencies are indicated on the tables."

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-58

	Sample Name	MW-58	MW-58-Y2Q1	MW-58	MW-58-Y2Q3	MW-58-Y2Q4	MW-58_010219	MW-58-Y3S2
	Sample Date	3/15/1999	2/16/2000	5/17/2000	8/22/2000	11/7/2000	2/19/2001	10/3/2001
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<10	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<10	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<10	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<10	<1	<1	0.26 J	<1	0.43 J	<1
Chloroform	µg/L	<10	3.68	5.88	2.42	1.91	2.05	1.85
cis-1,2-Dichloroethene	µg/L	--	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<10	<1	<1	0.41 J	<1	0.4 J	<1
trans-1,2-Dichloroethene	µg/L	--	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<10	4.36	4.22	1.44	2.72	2.47	1.78
Vinyl chloride	µg/L	<10	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-58

	Sample Name	MW-58-1_020410	MW-58-1_021001	MW-58-1	MW-58-1_031028	MW58 (64.5-66.5)
	Sample Date	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/28/2004
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	2.75	3.36	1.47	<1	1.1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	0.57	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.46	1.82	1.06	<1	0.41 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-58

	Sample Name	MW58-66	MW58-66.5	MW-58-IS-7	MW-58	MW-58	MW-58	MW-58
	Sample Date	11/21/2005	11/8/2007	10/15/2009	4/28/2011	4/12/2013	4/11/2015	4/23/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<0.5	0.213 J	<0.5	<0.5	0.394 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	0.81 J	0.946 J	0.277 J	0.307 J	<1
Chloroform	µg/L	1.99	8.89	0.149 J	<0.3	0.343	0.606	0.894
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	0.309 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.67 J	0.321	<1	0.26 J	1.7	1.23	0.727 J
Vinyl chloride	µg/L	<1J	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

STATE OF TENNESSEE
DEPARTMENT OF ENVIRONMENT AND CONSERVATION
Division of Remediation
Memphis Environmental Field Office
8383 Wolf Lake Drive
Bartlett, TN 38133-4119

November 30, 2018

James C. Foster
BRAC Program Manager
Headquarters Department of the Army,
Assistant Chief of Staff for
Installation Management (DAIM-ODB)
Army Pentagon,
2530 Crystal Drive,
Arlington, VA 22202-3934

Subject: **2017 Annual Long-Term Monitoring Report – Responses to TDEC Comments**
Defense Depot Memphis, Tennessee
TDoR ID # 79-736
TN4210020570

Mr. Foster,

TDEC-DoR has reviewed Army's responses to TDEC comments regarding the 2017 Annual Long-Term Monitoring Report, and approves of the responses provided. If there are questions or concerns, please contact me at (901) 371-3041 or at jamie.woods@tn.gov .

Regards,

Jamie A. Woods, P.G.
Project Manager
Division of Remediation
Memphis Environmental Field Office

cc: Joan Hutton (CALIBRE)
T. Holmes (HDR Inc)
D. Lloyd (EPA-PM)
TDoR NCO: file 79-736
TDoR MEFO: file 79-736

The *Supplemental Remedial Investigation Phases 1 and 2 Report, Revision 0* (HDR 2017d) was submitted to USEPA and TDEC for review in November 2017. Conclusions from document review addressed hydraulic connections between the Fluvial Aquifer and the MAQ in the Memphis area and at DDMT; limits to natural attenuation of CVOCs in groundwater at DDMT due to low natural carbon and high dissolved oxygen in groundwater; and findings from the 2009 groundwater model (HDR|e^{2}M 2010). Conclusions from the field investigation addressed site hydrogeology and plume delineation.

Additional work is planned to complete the SRI, with concurrence from USEPA and TDEC, in order to provide sufficient information for evaluation of remedial alternatives in the FFS and to develop a successful strategy for RA. The *Supplemental Remedial Investigation Phase 3 QAPP* (HDR 2017e) was submitted to USEPA and TDEC on 7 November 2017.

1.3.2 Dunn Field

The *Record of Decision for Interim Remedial Action of the Groundwater at Dunn Field (OU-1)* (CH2M HILL 1996) was signed in April 1996 with the objective of hydraulic containment to prevent further contaminant plume migration and reduce contaminant mass in groundwater. The interim remedial action (IRA) groundwater recovery system included 11 recovery wells (RWs) screened in the Fluvial Aquifer along the western boundary of Dunn Field. Based on reduction of CVOC concentrations in groundwater following implementation of the Dunn Field Source Areas RA, five RWs were shutdown in June 2008 and the remaining RWs were shutdown in January 2009. The IRA system was removed and the RWs abandoned in July 2010.

The groundwater RAOs established in the *Memphis Depot Dunn Field Record of Decision* (Dunn Field ROD) (CH2M HILL 2004b) are:

- to prevent human exposure to contaminated groundwater (i.e., exceeding protective target concentrations [TC])
- to prevent further off-site migration of VOCs in excess of protective target levels
- to remediate Fluvial Aquifer groundwater to drinking water quality to be protective of the deeper MAQ.

The remedies were implemented in three phases: Disposal Sites, Source Areas and Off Depot. The selected remedies for the Source Areas and Off Depot were modified through the *Dunn Field Record of Decision Amendment* (ROD Amendment) (e^{2}M 2009) approved in January 2009.

The Disposal Sites RA included excavation and off-site disposal of soil and waste material from five sites and was completed in 2006. The *Dunn Field Disposal Site Remedial Action Completion Report* (MACTEC 2006) was approved by USEPA in August 2006.

The Source Areas RA was to include soil vapor extraction (SVE) in the vadose zone and injection of zero valent iron (ZVI) in groundwater. The Fluvial SVE (FSVE) in fluvial soils (30 to 70 ft bgs) was operated from July 2007 to July 2012 and removed approximately 4,000 pounds of VOCs. Thermal SVE, or in situ thermal desorption, was implemented in the loess (0 to 30 ft

Summary of Comments on LTM Annual Report - 2017 Rev0.pdf

Page: 12

Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 12:55:29 PM
Wasn't there an RAO for VI on Dunn Field? (or is that represented by the second bullet)

Response:
These are Groundwater RAOs from the ROD; there was a vapor-related RAO for sub-surface soil:
"Prevent direct inhalation of indoor air vapors from subsurface soils in excess of industrial worker criteria."

The RGs in the ROD (Table 2-21G) include Protective Soil Vapor Concentrations as well as Groundwater Target Concentrations and Site-Specific Soil Screening Levels to be Protective of Groundwater. Shut down of the Fluvial SVE system was based on reduction of CVOCs concentrations in vapor and groundwater samples and final soil samples below the RGs. The final vapor samples (Year 5 report, Tables 6-10) from SVE wells screened in the fluvial sand/gravel deposits exceeded the vapor RGs at most locations. VI sampling prior to development would be warranted.

Since this is an LTM (groundwater) report with no vapor samples collected, limiting discussion to groundwater RAOs and results is appropriate.
No revision necessary.

bgs) from May to December 2008 and removed approximately 12,500 pounds of VOCs. ZVI injection was not required due to the success of SVE in reducing groundwater impacts. Excavation and off-site disposal of soil and waste material were also conducted in two additional areas; the work was performed in two phases, October 2007 to January 2008 and February to June 2009, so as not to interfere with thermal SVE implementation. The *Dunn Field Source Areas Interim Remedial Action Completion Report, Revision 1* (Source Areas IRACR) (HDR|e^{2}M 2009) was approved by USEPA and TDEC in November 2009.

The FSVE system was shut down in July 2012 after meeting soil remediation goals; LTM results at nearby wells are evaluated for potential rebound in CVOC concentrations. The FSVE system and nearby LTM wells are shown on Figure 2.

The Off Depot RA included installation of an air sparging with SVE (AS/SVE) system with 90 AS points and 12 SVE wells; operations began in December 2009. AS/SVE in combination with natural attenuation processes is expected to reduce groundwater concentrations to MCLs in accordance with the RAOs in the Dunn Field ROD. The AS/SVE system with nearby LTM wells is shown on Figure 3. The *Dunn Field Off Depot Groundwater Interim Remedial Action Completion Report, Revision 1* (Off Depot IRACR) (HDR 2011a) was approved by USEPA in August 2011 and by TDEC in November 2011.

Overall performance of the AS/SVE system is evaluated based on results of LTM analyses. The AS/SVE system was installed to intercept the majority of the Off Depot CVOC plume and to reduce individual CVOC concentrations below 50 µg/L. Operations are to continue until the upgradient concentrations from the Dunn Field plume do not exceed 50 µg/L for individual CVOCs in upgradient wells. Since April 2012, only TCE in one LTM well near the AS/SVE system, MW-159, has exceeded the 50 µg/L objective.

The latest annual report, *Off Depot Air Sparge-Soil Vapor Extraction System Annual Operations Report, Year Six, Revision 0* (HDR 2017b), was submitted to USEPA and TDEC in August 2017. The AS/SVE system has removed approximately 86 pounds of VOCs through April 2017. In order to address the continued high concentration of TCE at MW-159, additional AS wells will be installed south of MW-159 to increase removal of CVOCs from groundwater. The new AS wells will be installed upon completion of an updated access agreement with MLGW and will be incorporated into system operations following installation. Since the active remediation goal of CVOC concentrations at 50 µg/L (or less) has not been met, operations are planned to continue through May 2019.

1.4 Previous Groundwater Monitoring

The *Annual Long-Term Monitoring Report-2016, Revision 1* (HDR 2017c) was approved by TDEC in June and by USEPA in October 2017. During preparation of the report, the well classifications in the LTM plan were reviewed in response to suggestions from USEPA and the BRAC Environmental Coordinator. The LTM plans for the MI and Dunn Field were prepared in 2004 and 2008, respectively. Information on site hydrogeology and contaminant extent at DDMT has increased significantly since that time, especially for the MI where approximately 100 LTM wells have been installed since the LTM plan was completed. Based on the review, well

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Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 12:54:00 PM
Maybe a targeted injection at this point (May 2019) should be considered if no considerable up-tick in plume concentrations or SVE recovery amounts are observed. I know the MLGW access agreement is the hold up, but maybe they will be more willing to grant access under the context of AS/SVE system decommissioning and removal (piping, well close-outs, ops building & equipment)..just a thought

Response:
Alternative remedial strategies will be considered, but no action can be performed until MLGW responds to Army requests for access. At present, it is not clear what issues MLGW has with the draft agreement.

No revision necessary.

classifications were revised from the initial purpose-based criteria (background, boundary, sentinel and performance) to classification by aquifer and plume/area.

LTM wells were assigned to the Fluvial, Intermediate or Memphis Aquifers. The upper clay layer in the Upper Claiborne, which usually forms the base of the Fluvial Aquifer, is absent in the central part of the MI, and the Fluvial sand and the Upper Claiborne sand form a single water table aquifer. Several deeper wells in this area are designated Upper Claiborne and are grouped with the IAQ wells.

In addition to classification by aquifer, the wells are grouped by area or plume. The areas for MI LTM wells are: TTA-1 North, TTA-1 South, TTA-2, West-Central, Building 835, North-Central, South-Central, Southeast MI and Background. The areas for Dunn Field LTM wells are: DF North, DF West, Off Depot and Background. The Background wells at the MI and Dunn Field were selected based on criteria in the LTM Plans (wells upgradient of or at a distance from groundwater plumes and with no, or low, previous detections of site contaminants).

The 2016 LTM report also included review and revision of the sample frequencies for LTM wells. The following criteria were established:

- New wells will be sampled semiannually over 2 years prior to a frequency being determined.
- Wells with stable concentrations below the MCL in the eight most recent samples will be sampled biennially.
- Wells with stable concentrations approximately two times the MCL or less will be sampled annually.
- All other wells will be sampled semiannually.
- The following exceptions to the criteria will be made:
  - The MI MAQ wells have not exceeded MCLs in samples collected since installation in 2010 but will continue to be sampled annually due to increased concentrations in upgradient wells.
  - The DF North wells exceeding an MCL will continue to be sampled annually until the need for remedial action is determined.
  - Off Depot wells adjacent to the AS/SVE system will be sampled more frequently than required by the new criteria in order to monitor AS/SVE performance.

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Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 11:57:44 AM
Is there any place which specifies the mw's for these criteria exceptions? (separately from Tables 3 & 4)

Response:
Wells are identified by aquifer and area for the MI on Tables 1, 3, 12/13 and 20, and for Dunn Field on Tables 2, 4, 18/19 and 21. Well are discussed by aquifer and area in Section 3.3 for the MI and 3.4 for Dunn Field.

The text will be revised as follows:
The MI wells installed in the Memphis Sand (MW-254 and MW-255) have not exceeded ....
The DF North wells, which commonly exceed an MCL (MW-07, MW-08, MW-31, MW-79, MW-129, MW-130, MW-220 and MW-230), will continue to be ....
Off Depot wells installed adjacent to the AS/SVE system for performance monitoring (MW-241 to MW-247) will be considered for more frequent sampling than required by the criteria ...

(DUP-8-LA-26) at one of the wells. The trip blank could not be recollected and the analysis was performed with an affected vial.

The height of the PVC well casing in MI LTM well MW-210B did not allow the manhole cover to fit properly, and the cover appeared to have been damaged during recent mowing; the PDB in the well did not appear to be damaged and was used during sampling. The well casing was cut down by less than one inch and a new well cover was installed on 11 October, and the top of casing (TOC) was re-surveyed by Allen & Hoshall, a registered land surveyor, on 12 October. A discrepancy was noted during HDR's review of the new elevation data; the new TOC elevation was higher than the previous elevation even though the TOC had been lowered. Allen & Hoshall determined that a transposed number in the control point elevation had been used during their initial elevation survey in 2007 following installation of the wells; the horizontal coordinates were not affected. Allen & Hoshall recalculated the elevations for the affected wells; their report is included in Appendix B. The corrected elevations differ from the initial 2007 elevations by less than 0.5 ft. Some of the wells had their top of casing modified and elevations re-surveyed in 2013; the 2013 survey data did not require revision. Groundwater elevations based on the corrected TOC elevations were more consistent with adjacent wells than those based on the original 2007 TOC elevations. Groundwater elevations and contour maps for the MI are discussed in Section 3.1.1.2.

2.1.2.1 Main Installation

Annual groundwater sampling was conducted on 7 to 12 October 2017 with samples collected from 125 of 126 designated wells; a sample could not be collected from PZ-03, as noted above. There were 127 groundwater samples collected; samples were collected from two screened intervals at MW-101 and MW-107.

Groundwater samples were collected from 121 wells using PDBs, but samples from two wells (DR1-6A and MW-203A) were not usable as noted above. The PDB sample depths are shown on Table 7.

Three wells with PDBs previously installed (MW-203B, MW-274 and MW-283) were sampled using a portable bladder pump with dedicated tubing and bladder. The PDB in MW-203B appeared to be damaged and was not used; the PDB tethers for MW-274 and MW-283 were switched during installation and the PDBs were not at appropriate depths for sampling. Two wells were purged and sampled with a bailer: DR2-5 and MW-213. DR2-5 was bailed dry and sampled after the water level recovered on the same day, 10 October. MW-213 was sampled with a bailer due to limited saturated thickness. DR1-6A and MW-203A were re-sampled on 11 and 12 October, respectively; new bailers were used because dedicated bladders and tubing were not available and could not be obtained before the sample event ended. DR1-6A, MW-203A and MW-213 were sampled after at least three well volumes were purged. The final stabilization measurements are shown on Table 8.

2.1.2.2 Dunn Field

Semiannual groundwater sampling was conducted on 5 and 6 October 2017 with samples collected from 16 wells. There are 13 Dunn Field LTM wells identified for semiannual sampling

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Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 12:05:43 PM
good to hear

Response:
Comment received. No revision necessary.

was conducted (e.g. MW-62, MW-100B, MW-203B, PMW85-01, PMW92-02 and PMW101-02B)). Other wells within the EBT areas have rebounded to pre-treatment concentrations for PCE and/or TCE (e.g. DR2-1, PMW21-02, PMW21-04 and MW-92).

- CVOC concentrations in four Phase 2 SRI wells exceeded the MCLs in 2017: MW-278, MW-279, MW-280 and MW-281.
    - MW-278 was installed off-site upgradient of TTA-1N in October 2016 and classified as a background well due to low CVOC concentrations in the initial sample. The increased PCE concentration in October 2017 (7.26 µg/L) provided further support, with MW-269, for the presence of an off-site source.
    - MW-279 was installed upgradient of DR1-5/5A near the southwest boundary of the MI in 2016. The PCE concentration has been above the MCL in all three samples and was 58.8 µg/L in October 2017; the well location indicates potential impact from an off-site source.
    - MW-280 was installed north of TTA-2 and upgradient of MW-267 in 2016; the PCE concentration was 8.15 µg/L in October 2017.
    - MW-281 was installed in the North-Central area cross-gradient from MW-258 in 2016 and exceeded the MCL for PCE and TCE in all three samples. The October 2017 concentrations were 15.3 µg/L for PCE and 66.2 µg/L for TCE.
- Off-site impacts have been confirmed at TTA-1 North by off-site wells MW-269 and MW-278. Additional off-site impacts are likely based on CVOC concentrations in wells located near the property boundary: MW-279 at TTA-1S and MW-263 at the North-Central area. Additional investigation in these three areas is planned in SRI Phase 3.
- TCE and cDCE concentrations detected at fluvial LTM well MW-270 on the southern MI boundary continued to decrease in 2017. Only TCE exceeded the MCL in October 2017 and the concentration of 25.5 µg/L was approximately 10% of the high concentration reported in July 2015. Additional investigation in this area is planned in SRI Phase 3.
- IAQ well MW-107, which is located at the upgradient section of the ‘window’, continued to show variable PCE concentrations; the concentrations in the two screened intervals decreased from approximately 79 µg/L in October 2016 to 7 µg/L in October 2017. MW-107 was installed in 2001 to evaluate potential contamination from Building 720, a Former Fuel and Cleaners Dispensing location; additional investigation in this area is planned during SRI Phase 3.
- CVOCs in the Fluvial Aquifer have migrated vertically into the IAQ through the window in the northwestern area of the MI. PCE and TCE concentrations at IAQ well MW-256 near the northwest MI boundary continue to decrease but remain above the MCLs at 24.5 µg/L for PCE and 8.58 µg/L for TCE in October 2017 (Figure 26). Additional investigation in this area and the area of the sink in the South-Central MI is planned in SRI Phase 3.
- CVOC concentrations remain below the MCL in the two wells screened in the Memphis Sand (MW-254 and MW-255). PCE concentrations in three upgradient wells screened in lower Upper Claiborne sands (MW-89, MW-140 and MW-202A)have increased since

Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 12:46:59 PM
Sounds like another potential site for the EPA/State PA/SI program. I will inform the State Program Manager regarding the issue.

Response:
TDEC PA/SI in these areas would be helpful.

The wells were not installed during Phase 3 because access was not granted prior to SRI Phase 3 field work. Access has been granted for 3 of the 4 planned locations; access at the final Fluvial well location is being discussed with the property owner.

Text will be revised to state "Planned SRI Phase 3 wells at off-site locations upgradient of the TTA-1 North, TTA-1 South and North-Central areas will be installed once access agreements are completed with the property owners."

treatment area. Concentrations exceeded an MCL or TC at six Off Depot wells in 2017 as compared to four wells in 2016.

- Only two wells in the DF West and Off Depot areas have CVOCs at concentrations above the active treatment objective of 50 µg/L: CF at MW-87 and TCE at MW-159.
  - Additional RA is not currently planned at MW-87 since concentrations above a TC or MCL have not been consistently observed at adjacent wells.
  - Additional AS wells are to be installed upon completion of an access agreement with MLGW. The objective is to improve remediation of CVOCs in groundwater through installation of five new AS wells targeting MW-159 (Figure 3).

4.3 Changes to LTM for 2017

Sample frequencies were reviewed based on the following criteria:

- New wells will be sampled semiannually over 2 years prior to a frequency being determined.
- Wells with stable concentrations below the MCL in the eight most recent samples will be sampled biennially.
- Wells with stable concentrations approximately two times the MCL or less will be sampled annually.
- All other wells will be sampled semiannually.
- Exceptions to the criteria will be made as appropriate:
  - The MI MAQ wells have not exceeded MCLs in any samples since the wells were installed in 2010; the wells will continue to be sampled annually due to increased concentrations in upgradient wells.
  - The DF North wells exceeding an MCL will continue to be sampled annually until the need for remedial action is determined.
  - Off Depot wells adjacent to the AS/SVE system will be sampled more frequently than required by the new criteria in order to monitor AS/SVE performance.

The recommended 2018 LTM sample schedules are shown on Table 20 for the MI and Table 21 for Dunn Field.

The sample frequencies in 2017 for MI and Dunn Field LTM wells were semiannual (102), annual (70) and biennial (61); the recommended frequencies for 2018 are semiannual (105), annual (69) and biennial (58).

Recommended 2018 sample frequencies by aquifer are:

- Main Installation
  - 114 Fluvial Aquifer - semiannual (75), annual (22) and biennial (17);
  - 30 IAQ/UC - semiannual (14), annual (11) and biennial (5); and

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Number: 1 Author: BG38123 Subject: Highlight Date: 10/19/2018 12:56:24 PM
Is there a separate list of this aside from Tables 3 & 4, for ease of review (see previous comment).

Response:
See Response to same comment on Page 14 of pdf.

B

Appendix B.

Correction to 2007 Well Elevation Survey

Allen&Hoshall

1661 International Drive, Suite 100
Memphis, Tennessee 38120
Office 901.820.0820
Fax 901.683.1001
www.allenhoshall.com

February 9, 2018

Mr. Thomas Holmes, PG
HDR Environmental
5990 Greenwood Plaza Blvd. Ste 250
Greenwood Village, CO 80111

Re: Memphis Depot Monitoring Well corrections.

Dear Mr. Holmes,

Please see the attached tabulated data of a series of monitoring wells located in May, 2007 that were found to have contained errors in the elevations originally reported. The tabulated data shows a list of the affected wells, original data and corrected data.

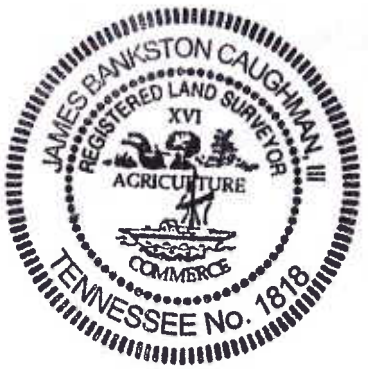
In October of 2017, we were asked to survey in a well that had been recently repaired. This well, MW-210B, was originally surveyed by us in May of 2007. In comparing the new elevation data the original elevation data, we discovered an error in the original 2007 data. This error was discovered to been caused by a transposition of numbers in the original level notes of May, 2007. A thorough review of all the data from the original field book notes showed this error to have been propagated throughout several of the well elevations reported from that level run.

As such, the data from the May, 2007 level run has been corrected and tabulated on the attached spreadsheet.

I apologize for the error and have taken internal steps to ensure the error does not happen again.

Sincerely,
Allen&Hoshall, Inc.

James B. Caughman, RLS
Land Surveyor.



						5-14-07 Wells Located													
						Correction to Level Run													
				Top of							Top of								
		Top Lid		PVC Casing		Ground		Delta Z		Top Lid	PVC Casing		Ground					Date of	
		ERROR		**ERROR**		**ERROR**				**CORRECTED**	**CORRECTED**		**CORRECTED**					Observation	
MW197A		*291.54*		*291.26*		*N/A*		0.28		**291.92**	**291.64**		*N/A*					May, 2007	
MW197B		*291.43*		*291.03*		*N/A*		0.40		**291.83**	**291.43**		*N/A*					May, 2007	
MW199A		*301.84*		*301.53*		*N/A*		0.31		**302.21**	**301.90**		*N/A*					May, 2007	
MW199B		*302.07*		*301.73*		*N/A*		0.34		**302.40**	**302.06**		*N/A*					May, 2007	
MW201		*304.33*		*304.23*		*N/A*		0.10		**304.83**	**304.73**		*N/A*					May, 2007	
MW202A		*299.69*		*299.23*		*N/A*		0.46		**300.13**	**299.67**		*N/A*					May, 2007	
MW202B		*299.74*		*299.51*		*N/A*		0.23		**300.15**	**299.92**		*N/A*					May, 2007	
MW203A		*290.78*		*290.59*		*290.76*	*Concrete*	0.19		**291.06**	**290.70**		**291.01**	**Concrete**		**290.8**	**Ground**	July, 2013	
MW203B		*290.75*		*290.51*		*290.75*	*Concrete*	0.24		**291.22**	**290.87**		**291.25**	**Concrete**		**291.1**	**Gravel**	July, 2013	
MW204A		*292.49*		*292.21*		*292.51*	*Concrete*	0.28		**292.87**	**292.59**		**292.89**					May, 2007	
MW204B		*292.67*		*292.32*		*292.69*	*Concrete*	0.35		**293.18**	**292.71**		**293.15**	**Concrete**		**293.0**	**Gravel**	July, 2013	
MW205A		*292.32*		*291.93*		*292.28*	*Concrete*	0.39		**292.67**	**292.30**		**292.67**	**Concrete**		**292.4**	**Gravel**	July, 2013	
MW205B		*292.04*		*291.82*		*292.04*	*Concrete*	0.22		**292.56**	**292.16**		**292.56**	**Concrete**		**292.3**	**Gravel**	July, 2013	
MW206A		*300.35*		*299.92*		*300.36*	*Concrete*	0.43		**300.75**	**300.32**		**300.76**	**Concrete**				May, 2007	
MW206B		*300.12*		*299.90*		*300.14*	*Concrete*	0.22		**300.52**	**300.30**		**300.54**	**Concrete**				May, 2007	
MW207A		*303.99*		*303.78*		*304.02*	*Concrete*	0.21		**304.44**	**304.05**		**304.45**	**Concrete**		**304.5**	**Asphalt**	July, 2013	
MW207B		*304.03*		*303.83*		*304.01*	*Concrete*	0.20		**304.49**	**304.06**		**304.45**	**Concrete**		**304.4**	**Asphalt**	July, 2013	
MW208A		*301.91*		*301.50*		*301.95*	*Concrete*	0.41		**302.56**	**302.21**		**302.56**	**Concrete**		**302.4**	**Ground**	July, 2013	
MW208B		*302.08*		*301.79*		*302.10*	*Concrete*	0.29		**302.42**	**302.13**		**302.44**					May, 2007	
MW209A		*298.36*		*298.05*		*298.37*	*Concrete*	0.31		**298.76**	**298.45**		**298.77**	**Concrete**				May, 2007	
MW209B		*298.72*		*298.49*		*298.76*	*Concrete*	0.23		**299.12**	**298.89**		**299.16**	**Concrete**				May, 2007	
MW210A		*289.78*		*289.66*		*289.76*	*Concrete*	0.12		**290.07**	**289.61**		**290.08**	**Concrete**		**289.7**	**Ground**	July, 2013	
MW210B		*289.54*		*289.29*		*289.54*	*Concrete*	0.25		**289.82**	**289.54**		**289.78**	**Concrete**		**289.6**	**Ground**	Oct., 2017	
MW211		*304.09*		*303.74*		*304.11*	*Concrete*	0.35		**304.49**	**304.14**		**304.51**	**Concrete**				May, 2007	
MW212		*295.68*		*295.34*		*295.68*	*Concrete*	0.34		**296.08**	**295.74**		**296.08**	**Concrete**				May, 2007	
MW213		*294.12*		*293.83*		*294.15*	*Concrete*	0.29		**294.58**	**294.22**		**294.56**	**Concrete**		**294.2**	**Ground**	July, 2013	
MW214A		*303.96*		*303.61*		*303.96*	*Concrete*	0.35		**304.36**	**304.01**		**304.36**	**Concrete**				May, 2007	
MW214B		*303.96*		*303.70*		*303.98*	*Concrete*	0.26		**304.36**	**304.10**		**304.38**	**Concrete**				May, 2007	
MW215A		*304.86*		*304.50*		*304.85*	*Concrete*	0.36		**305.33**	**304.97**		**305.32**	**Concrete**				May, 2007	
MW215B		*304.98*		*304.56*		*304.99*	*Concrete*	0.42		**305.45**	**305.03**		**305.46**	**Concrete**				May, 2007	
MW216		*297.63*		*297.34*		*297.62*	*Concrete*	0.29		**298.01**	**297.72**		**298.00**	**Concrete**				May, 2007	
MW217		*304.51*		*304.18*		*304.51*	*Concrete*	0.33		**304.98**	**304.65**		**304.98**	**Concrete**				May, 2007	
MW218		*306.00*		*305.60*		*306.02*	*Concrete*	0.40		**306.47**	**306.07**		**306.49**	**Concrete**				May, 2007	
MW219		*295.07*		*294.90*		*295.04*	*Concrete*	0.17		**295.41**	**295.13**		**295.42**	**Concrete**		**295.0**	**Ground**	July, 2013	

C

Appendix C.

Review of Precipitation and Groundwater Elevation

TABLE C-1
PRECIPITATION DATA, MEMPHIS
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	2010	2011	2012	2013	2014	2015	2016	2017	Short-term Monthly Average	Long-term Monthly Average
January	-	1.49	1.73	9.72	3.16	1.30	2.27	4.26	3.4	4.0
February	-	3.36	3.03	3.85	4.96	4.35	5.58	1.40	3.8	4.4
March	-	4.95	4.35	3.38	7.38	5.48	16.2	3.61	6.5	5.2
April	-	11.76	1.04	6.88	6.14	3.07	5.97	5.36	5.7	5.5
May	9.26	7.12	3.17	10.75	4.32	6.02	5.07	4.22	5.8	5.3
June	0.31	3.55	1.38	5.47	13.40	4.47	1.17	4.61	4.9	3.6
July	6.30	2.95	2.26	3.73	2.56	5.17	8.02	3.91	4.1	4.6
August	2.32	3.08	2.64	2.17	1.80	4.11	5.53	9.29	4.1	2.9
September	0.14	2.56	7.01	2.69	4.75	1.32	0.67	1.61	2.9	3.1
October	2.04	1.28	3.66	3.30	4.00	2.44	1.22	4.04	2.8	4.0
November	6.57	7.71	2.90	2.67	2.56	10.16	2.56	1.81	4.3	5.5
December	2.52	8.55	3.73	4.82	2.60	4.77	7.33	7.26	5.6	5.7
Annual Total		58.4	36.9	59.4	57.6	52.7	61.6	51.4	54.0	53.7

Notes
Short-term Monthly Average: 2011 and later
Long-term Monthly Average: 1981-2010
1) Monthly and average precipitation values listed are in inches.
2) Precipitation data from http://w2.weather.gov/climate/index.php?wfo=meg

TABLE C-2
GROUNDWATER ELEVATIONS FOR SELECTED WELLS
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

Location	DR1-5A MI	MW-24 MI	MW-53 MI	MW-70 DF	MW-85 MI	MW-130 DF	MW-159 DF	MW-197A MI	MW-38 MI	MW-90 MI	MW-250 DF	MW-256 MI	MW-67 DF	MW-255 MI
Aquifer	Fluvial	Fluvial	Fluvial	Fluvial	Fluvial	Fluvial	Fluvial	UC	IAQ	IAQ	IAQ	IAQ	MAQ	MAQ
Mar2010	202.75	196.86	234.04	228.04	206.71	241.32	216.49	198.29	180.72	191.43	165.73	-	166.56	-
Jun2010	-	-	-	228.88	-	-	218.21	199.15	181.89	192.61	161.83	-	-	-
Jul2010	-	-	-	-	-	-	-	-	-	192.12	-	161.93	-	-
Aug2010	-	-	-	-	-	-	-	199.44	180.83	192.30	-	161.19	-	156.43
Sep2010	-	-	-	229.52	-	241.20	219.03	-	-	-	157.85	-	157.56	-
Oct2010	203.82	197.74	234.01	-	207.73	-	-	199.73	179.76	192.65	-	162.73	-	161.72
Dec2010	-	-	-	-	-	-	-	-	180.97	-	-	-	-	-
Jan2011	-	-	-	228.94	-	-	219.10	-	-	-	-	-	-	-
Mar2011	204.68	198.82	233.47	228.94	207.91	239.20	218.79	200.35	183.81	194.08	167.68	167.58	168.44	166.69
Sep2011	205.01	198.88	233.31	228.87	208.13	239.25	218.85	200.51	181.45	192.96	160.22	162.03	160.10	158.69
Dec2011	205.15	-	-	-	208.08	-	-	-	-	-	-	-	-	-
Apr2012	205.21	199.96	233.07	227.91	208.24	238.82	218.03	201.12	185.15	194.74	167.41	168.99	166.52	164.97
Oct2012	205.29	198.85	233.14	228.16	208.01	237.91	217.54	200.85	181.63	192.41	161.11	162.40	161.30	159.71
Feb2013	204.85	-	-	-	207.73	-	-	200.72	-	-	-	-	-	-
Apr2013	-	199.28	232.74	227.53	-	237.98	217.77		182.73	193.44	166.55	168.31	166.61	165.05
May2013	204.83	-	-	-	207.73	-	-	200.74	-	-	-	-	-	-
Aug2013	205.22	-	-	-	207.95	-	-	200.90	-	-	-	-	-	-
Oct2013	-	199.15	233.27	228.24	-	239.12	218.66	-	182.16	192.69	163.54	164.30	163.81	161.99
Nov2013	205.16	-	-	-	207.93	-	-	200.66	-	-	-	-	-	-
Feb2014	205.26	-	-	-	208.03	-	-	201.18	-	-	-	-	-	-
Apr2014	205.43	200.16	233.43	228.35	-	239.75	219.15	-	185.22	194.99	170.58	171.55	171.02	169.59
May2014	205.34	-	-	-	208.01	-	-	201.50	-	-	-	-	-	-
Aug2014	205.90	-	-	-	208.28	-	-	201.62	-	-	-	-	-	-
Oct2014	205.88	199.95	233.61	229.17	-	240.44	219.66	-	183.45	193.90	164.55	164.73	164.86	162.18
Nov2014	205.91	-	-	-	208.52	-	-	201.78	-	-	-	-	-	-
Apr2015	206.01	200.83	233.45	228.73	-	239.79	219.23	202.14	185.50	195.54	171.34	170.57	172.69	170.48
Oct2015	206.71	201.40	233.65	229.04	-	240.13	219.36	202.45	186.29	196.13	169.45	169.82	169.87	167.99
Apr2016	207.50	202.91	233.81	229.59	209.44	241.60	221.11	203.98	191.07	199.30	177.45	178.38	177.97	176.65
Oct2016	208.34	203.57	234.05	230.56	210.70	241.17	221.68	204.84	189.69	198.64	168.56	170.88	167.99	166.37
Apr2017	208.63	204.41	233.50	229.64	211.11	239.80	220.97	205.53	191.95	200.42	175.58	176.97	175.58	174.24
Oct2017	208.64	204.44	233.67	229.39	211.30	239.70	221.02	205.43	190.24	199.29	169.94	171.48	169.84	167.77

Notes:

1) Groundwater elevations are listed in feet using the North American Vertical Datum of 1988.

MI: Main Installation

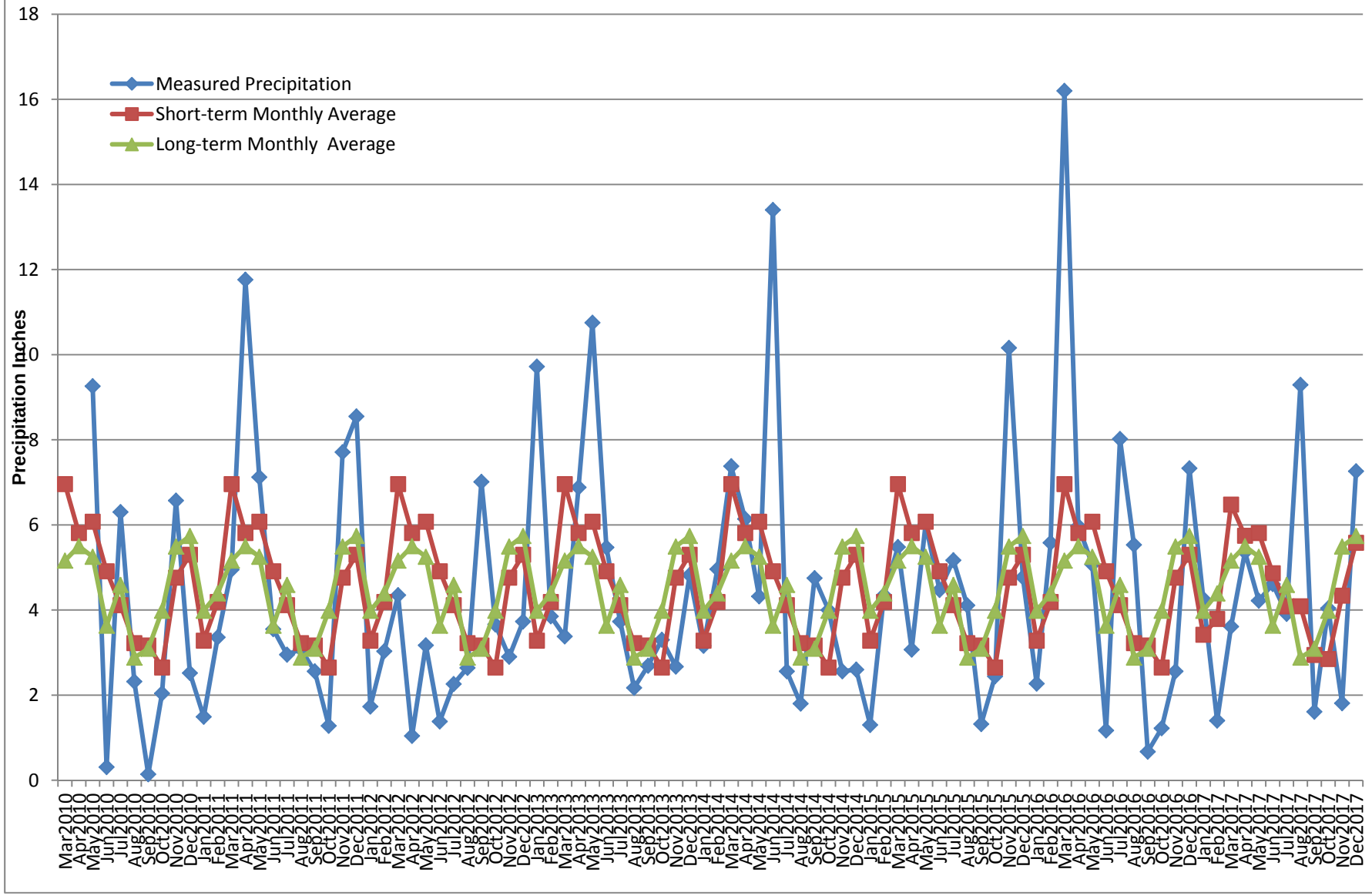
DF: Dunn Field

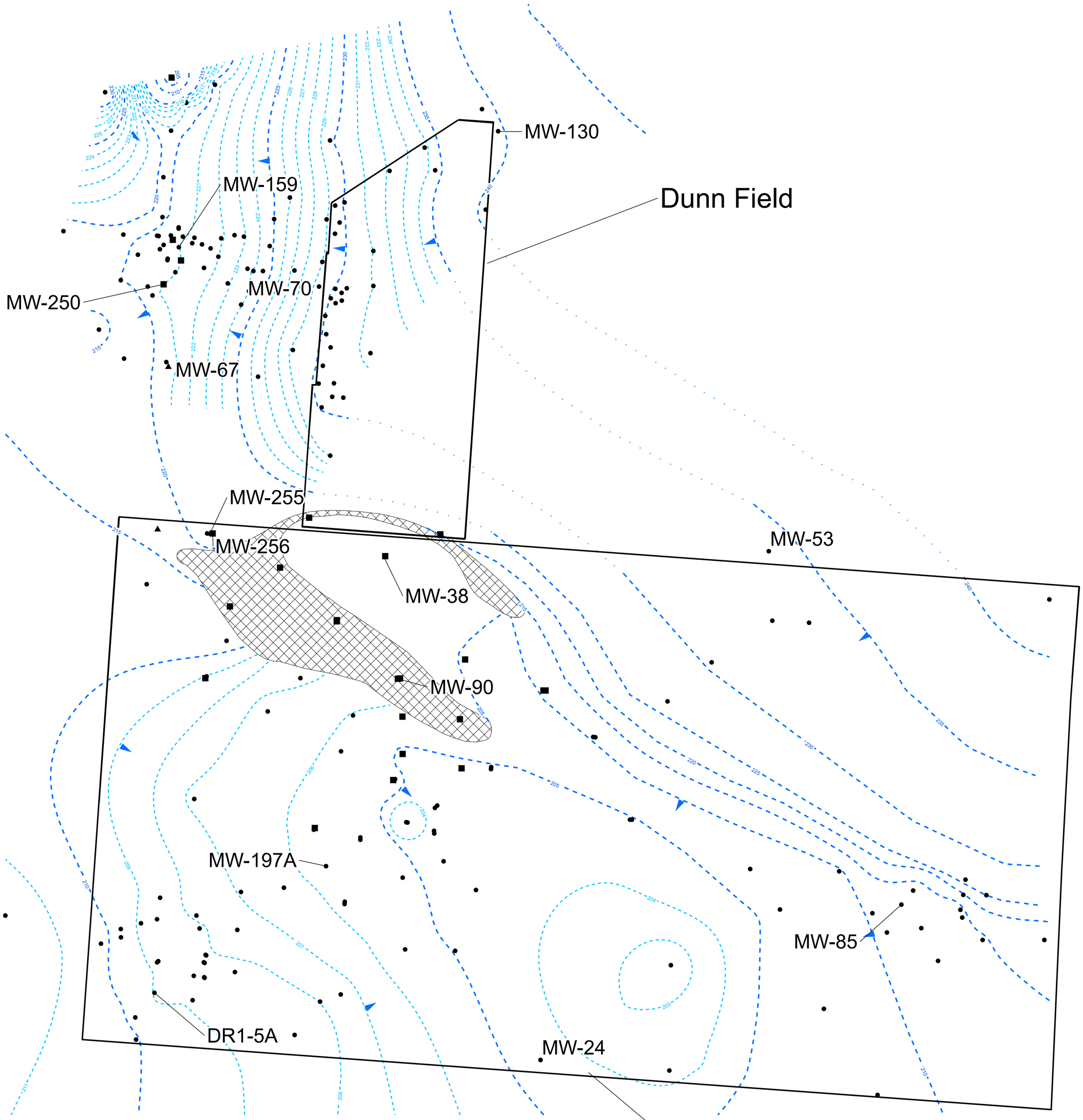
IAQ: Intermediate Aquifer

MAQ: Memphis Aquifer

UC Upper Claiborne

FIGURE C-1
HISTORICAL PRECIPITATION - MEMPHIS INTERNATIONAL AIRPORT
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis Tennessee





Legend

- Monitoring Well Screened in the Fluvial Aquifer
- Monitoring Well Screened in the Intermediate Aquifer
- Monitoring Well Screened in the Memphis Aquifer
- Potentiometric surface of the Fluvial Aquifer 1-ft. contour
- Potentiometric surface of the Fluvial Aquifer 5-ft. contour
- Potentiometric surface of the Intermediate Aquifer 5-ft. contour
- Clay Elevation Exceeds Groundwater Elevation
- Groundwater Flow Direction

Notes:
1. Groundwater elevations are listed in feet using the North American Vertical Datum of 1988.
2. Water level measurements made October 2017.

0 250 500 1,000 1,500 2,000 Feet

Projection: NAD 1927 StatePlane Tennessee
Units: Feet

N W E S

Figure C-2

SITE-WIDE GROUNDWATER ELEVATIONS AND SELECTED WELLS

Annual Long Term Monitoring Report - 2017

Defense Depot Memphis, Tennessee

Date: April 2017
Edition: Rev 0

HDR

Document Path: C:\Users\written\Documents\ArcGIS\Packages\Figure B-2_ADFB8514-296B-4C8D-93C9-9559E5E7A40F\v10\Figure B-2.mxd

FIGURE C-3
FLUVIAL WATER LEVELS AND PRECIPITATION
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis Tennessee

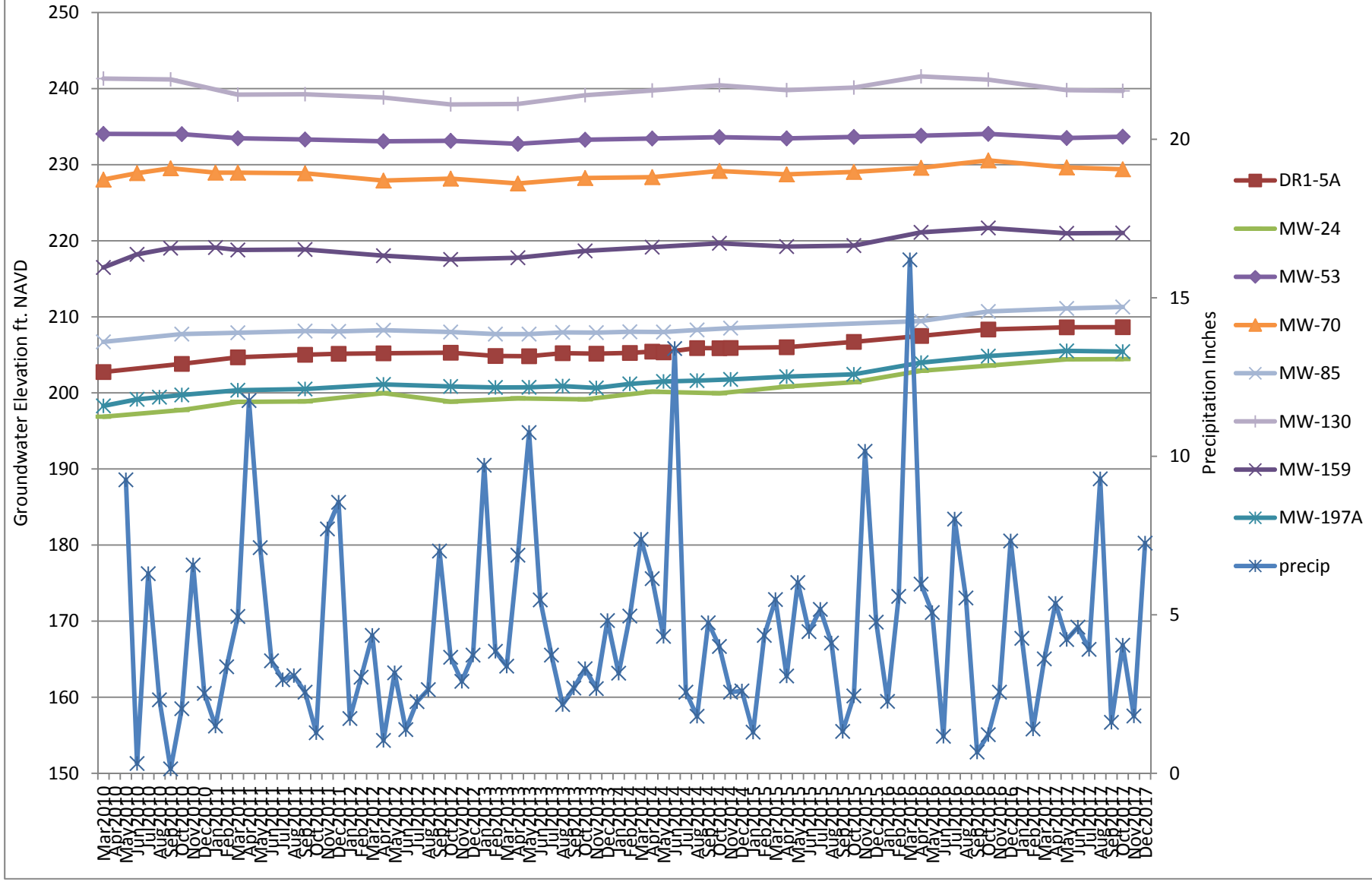
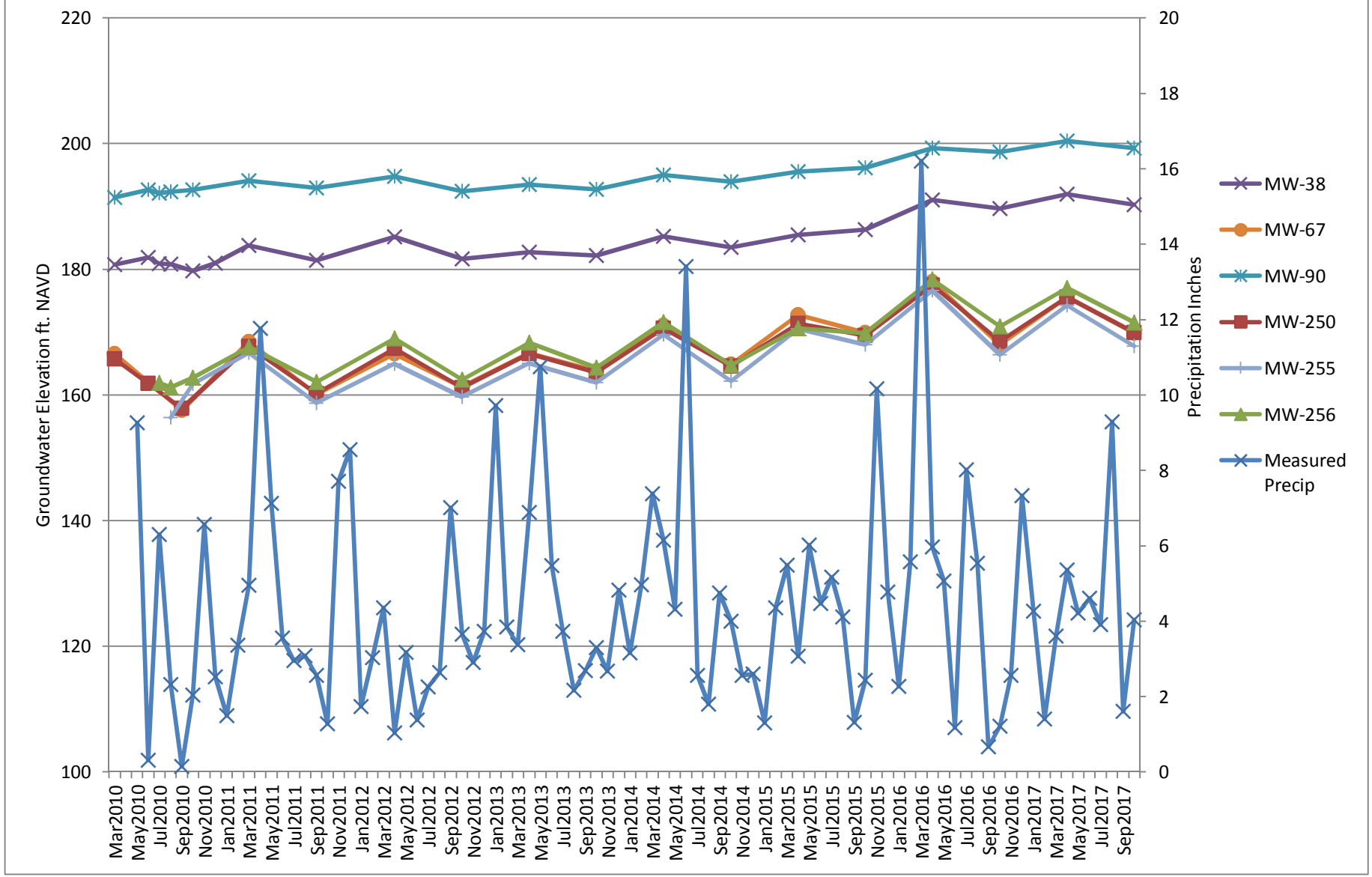


FIGURE C-4
IAQ/MAQ WATER LEVELS AND PRECIPITATION
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis Tennessee



D

Appendix D.
Complete Analytical Results

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	DR1-3	DR1-3	DR1-5	DR1-5A	DR1-6	DR1-6A	DR2-1
	Sample ID	DR1-3-LS-25	DR1-3-DUP-1	DR1-5-LS-25	DR1-5A-LS-25	DR1-6-LS-25	DR1-6A-LS-25	DR2-1-LS-25
	Lab ID	L17041110-07	L17041110-08	L17041075-18	L17041075-17	L17041075-31	L17041075-28	L17041069-13
	Date	4/21/2017	4/21/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/19/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	0.406 J	0.267 J	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.9	7.44 J	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	25.9
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.300 U	0.147 J	0.300 U	3.59
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	6.46	6.39	11.8	53.6	1.00 U	28.0	8.76
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	18.4	17.8	33.3	0.750 J	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	3.34 J	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	7.12	7.02	4.06	1.00 U	10.3	1.00 U	155
Toluene	µg/L	1.00 U	1.00 U	8.00	8.59	1.00 U	4.38	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	9.91	9.62	0.589 J	1.00 U	1.00 U	0.496 J	5.32
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	0.253 J	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	DR2-2	DR2-3	DR2-5	DR2-6	MW-21	MW-21	MW-26
	Sample ID	DR2-2-LS-25	DR2-3-LS-25	DR2-5-LS-25	DR2-6-LS-25	MW-21-LS-25	MW-21-DUP-2	MW-26-LS-25
	Lab ID	L17041069-15	L17041069-05	L17041209-06	L17041069-19	L17041075-19	L17041075-20	L17041069-18
	Date	4/19/2017	4/19/2017	4/22/2017	4/19/2017	4/20/2017	4/20/2017	4/19/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	50.0 U	8.96	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	100 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	50.0 U	0.233 J	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	20.0 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	500 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	2170	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	20.0 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	50.0 UJ	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	2.22	50.0 U	1.00 U	1.00 U	1.00 U	2.59
Chlorobenzene	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.242 J	0.405	15.0 U	0.300 U	0.300 U	0.300 U	0.376
Chloromethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	4.08	1.00 U	21.8 J	31.2	111	111	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	25.0 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	30.0 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	100 U	2.00 U	0.916 J	0.815 J	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	5600	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	250 U	5.00 U	6.07	6.12	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	13.0 J	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	500 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	0.414 J	0.402 J	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	4.55	9.00	50.0 U	8.38	1.00 U	1.00 U	10.6
Toluene	µg/L	1.00 U	1.00 U	50.0 U	0.313 J	6.53	6.40	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.663 J	1.01	50.0 U	3.55	1.00 U	1.00 U	0.734 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	50.0 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	50.0 U	16.5	1.00 U	0.260 J	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-39	MW-39A	MW-62	MW-64	MW-85	MW-88	MW-89
	Sample ID	MW-39-LS-25	MW-39A-LS-25	MW-62-LS-25	MW-64-LS-25	MW-85-LS-25	MW-88-LS-25	MW-89-LS-25
	Lab ID	L17041069-48	L17041069-47	L17041110-17	L17041069-21	L17041069-01	L17041069-14	L17041110-11
	Date	4/20/2017	4/20/2017	4/21/2017	4/19/2017	4/19/2017	4/19/2017	4/21/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.442 J	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.09	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	7.28	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	5.98 J	10.0 U	10.0 U	10.0 U	3.41 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.148 J	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.85	14.1	2.96	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.214 J	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	1.26	2.57	0.263 J	0.140 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	9.23	14.5	12.1	0.443 J	28.5	0.345 J	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	2.16 J	5.05	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	2.31	5.42	1.00 U	15.8	71.4	20.6	3.64
Toluene	µg/L	1.00 U	1.00 U	3.05	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	4.63	6.47	0.475 J	26.7	21.6	1.58	0.871 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	2.01	9.47	1.00 U	1.48	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-90	MW-92	MW-92	MW-94A	MW-97	MW-98	MW-101T
	Sample ID	MW-90-LS-25	MW-92-LS-25	MW-92-DUP-3	MW-94A-LS-25	MW-97-LS-25	MW-98-LS-25	MW-101T-LS-25
	Lab ID	L17041110-12	L17041069-12	L17041069-11	L17041075-02	L17041069-30	L17041069-43	L17041110-14
	Date	4/21/2017	4/19/2017	4/19/2017	4/20/2017	4/19/2017	4/20/2017	4/21/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	0.931 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	0.892 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	2.73 J	10.0 U	10.0 U	10.0 U	10.0 U	11.8	3.57 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	1.05	0.300 U	0.300 U	0.300 U	0.221 J	0.300 U	0.129 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.341 J	8.81	8.94	2.38	1.00 U	5.56	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	0.933 J	5.00 U	5.00 U	2.81 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	13.5	103	103	19.2	1.00 U	15.3	37.1
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.69	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	4.32	4.96	4.84	6.67	62.1	2.32	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	4.48	4.46	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-101B	MW-104	MW-100B	MW-107T	MW-107B	MW-108
	Sample ID	MW-101B-LS-25	MW-104-LS-25	MW-100B-LS-25	MW-107T-LS-25	MW-107B-LS-25	MW-108-LS-25
	Lab ID	L17041110-13	L17041075-15	L17041075-25	L17041075-10	L17041075-09	L17041075-07
	Date	4/21/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	0.792 J	1.00 U	1.00 U	1.00 U	1.35
1,1-Dichloroethene	µg/L	1.00 U	1.92	0.504 J	1.00 U	1.00 U	1.65
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	3.61 J	12.0	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	0.260 J	0.251 J	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.195 J	0.202 J	3.68
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	0.521 J	15.8	1.00 U	1.00 U	0.474 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	2.53 J	5.00 U	32.8	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	38.0	1.00 U	5.53	43.1	50.2	4.01
Toluene	µg/L	1.00 U	1.00 U	1.49	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	0.735 J	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	8.07	1.62	1.11	1.25	10.8
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	174	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-108	MW-113	MW-140	MW-141	MW-143	MW-197A
	Sample ID	MW-108-DUP-4	MW-113-LS-25	MW-140-LS-25	MW-141-LS-25	MW-143-LS-25	MW-197A-LS-25
	Lab ID	L17041075-08	L17041069-06	L17041110-24	L17041110-10	L17041110-21	L17041069-35
	Date	4/20/2017	4/19/2017	4/21/2017	4/21/2017	4/21/2017	4/19/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.38	1.00 U	1.00 U	0.607 J	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.62	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	0.694 J	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	0.330 J	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	3.43 J	6.56 J	4.18 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	3.57	0.300 U	0.162 J	2.11	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ
cis-1,2-Dichloroethene	µg/L	0.438 J	54.8	1.00 U	0.253 J	1.00 U	0.659 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	0.735 J	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	0.403 J	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	3.73	1.00 U	10.9	31.7	0.417 J	18.9
Toluene	µg/L	1.00 U	17.6	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	0.747 J	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	10.5	1.00 U	1.26	5.65	6.43	1.08
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	36.9	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-197B	MW-199B	MW-200	MW-202A	MW-202B	MW-202B
	Sample ID	MW-197B-LS-25	MW-199B-LS-25	MW-200-LS-25	MW-202A-LS-25	MW-202B-LS-25	MW-202B-DUP-5
	Lab ID	L17041069-36	L17041110-09	L17041075-01	L17041110-20	L17041110-18	L17041110-19
	Date	4/19/2017	4/21/2017	4/20/2017	4/21/2017	4/21/2017	4/21/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.1	10.0 U	10.0 U	3.34 J	4.87 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.534 J	0.525 J
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.225 J	0.300 U	0.167 J	0.427	0.421
Chloromethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	3.32	0.396 J	0.737 J	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	2.62 J	5.00 U	1.26 J	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	6.25	0.264 J	5.15	5.16	35.9	36.0
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	11.2	50.3	3.91	1.05	3.37	3.55
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-203A	MW-203B	MW-204A	MW-204B	MW-205A	MW-205A
	Sample ID	MW-203A-LS-25	MW-203B-LS-25	MW-204A-LS-25	MW-204B-LS-25	MW-205A-LS-25	MW-205A-DUP-6
	Lab ID	L17041069-37	L17041069-38	L17041069-31	L17041069-32	L17041069-45	L17041069-44
	Date	4/19/2017	4/19/2017	4/19/2017	4/19/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.647	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	0.496 J	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	20.6	10.0 U	15.0	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.125 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	27.6	47.7	1.06	0.278 J	4.53	4.18
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	4.26 J	5.00 U	5.00 U	2.34 J	2.08 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	9.00	27.4	12.3	10.3	10.2
Toluene	µg/L	7.79	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	22.7	1.11	8.99	7.13	6.85
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	0.373 J	0.836 J	1.00 U	1.00 U	1.00 U	0.253 J

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-205B	MW-206A	MW-206B	MW-207A	MW-207B	MW-208A
	Sample ID	MW-205B-LS-25	MW-206A-LS-25	MW-206B-LS-25	MW-207A-LS-25	MW-207B-LS-25	MW-208A-LS-25
	Lab ID	L17041069-46	L17041069-50	L17041069-49	L17041075-06	L17041075-05	L17041075-04
	Date	4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.09	0.387 J	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.56	0.973 J	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.1	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	2.09	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	4.17	3.86	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	9.83	10.6	5.93	0.654 J	0.816 J	10.9
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	4.71 J	4.39 J	3.16 J	5.00 U	5.00 U	2.94 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	4.00	7.35	9.88	11.4	68.6	10.7
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	6.50	9.02	5.42	19.6	24.0	10.0
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	0.810 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-208B	MW-209A	MW-209B	MW-210A	MW-210B	MW-212
	Sample ID	MW-208B-LS-25	MW-209A-LS-25	MW-209B-LS-25	MW-210A-LS-25	MW-210B-LS-25	MW-212-LS-25
	Lab ID	L17041075-03	L17041209-02	L17041209-01	L17041069-39	L17041069-40	L17041110-15
	Date	4/20/2017	4/22/2017	4/22/2017	4/19/2017	4/19/2017	4/21/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	6.83 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	1.00 UJ	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	1.00	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	3.14	0.769 J	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	1.68 J	5.00 U	0.767 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	8.05	0.418 J	1.30	2.88	1.70	1.39
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	3.97	7.53	8.69	4.76	17.5	30.5
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-212	MW-213	MW-217	MW-218	MW-219	MW-256
	Sample ID	MW-212-DUP-7	MW-213-LS-25	MW-217-LS-25	MW-218-LS-25	MW-219-LS-25	MW-256-LS-25
	Lab ID	L17041110-16	L17041110-25	L17041069-20	L17041069-22	L17041209-04	L17041110-23
	Date	4/21/2017	4/21/2017	4/19/2017	4/19/2017	4/22/2017	4/21/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	2.50 U	0.500 U	1.46	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	0.562 J
1,1-Dichloroethene	µg/L	1.00 U	5.00 U	1.00 U	1.36	1.00 U	0.643 J
1,1-Dichloropropene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	10.0 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	2.50 U	0.500 U	0.501	0.904	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	5.00 U	1.00 U	0.377 J	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	2.00 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	50.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	8.56 J	42.8 J	10.0 U	10.0 U	10.0 U	6.42 J
Benzene	µg/L	0.400 U	2.00 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	5.00 U	61.0	7.25	1.00 U	0.633 J
Chlorobenzene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	1.50 U	4.16	2.02	0.300 U	1.48
Chloromethane	µg/L	1.00 U	5.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	15.8	0.950 J	1.00 U	4.57	0.294 J
cis-1,3-Dichloropropene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	3.00 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	10.0 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	70.8	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	25.0 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	50.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.48	5.00 U	26.8	17.7	88.2	27.9
Toluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	31.9	3.22 J	28.4	31.3	5.11	9.77
Trichlorofluoromethane	µg/L	1.00 U	5.00 U	1.11	2.08	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-258	MW-259	MW-262	MW-263	MW-264	MW-265
	Sample ID	MW-258-LS-25	MW-259-LS-25	MW-262-LS-25	MW-263-LS-25	MW-264-LS-25	MW-265-LS-25
	Lab ID	L17041075-11	L17041069-26	L17041110-22	L17041075-16	L17041075-14	L17041075-12
	Date	4/20/2017	4/19/2017	4/21/2017	4/20/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.239 J	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	0.312 J	1.00 U	1.00 U	1.99	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	2.21	0.558 J	1.00 U	11.7	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	2.29	0.500 U	0.305 J	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	0.510 J	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	11.7	10.0 U	16.0	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	4.79	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	1.69	2.93	0.300 U	1.82	0.300 U	4.68
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.89	1.00 U	1.00 U	2.40	1.00 U	0.563 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	7.84	5.00 U	5.00 U	7.56	5.00 U	3.26 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	25.0	14.2	1.00 U	2.74	1.00 U	14.2
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	56.3	20.1 J	1.00 U	32.3	1.00 U	8.71
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-265	MW-266	MW-267	MW-268	MW-269	MW-270
	Sample ID	MW-265-DUP-8	MW-266-LS-25	MW-267-LS-25	MW-268-LS-25	MW-269-LS-25	MW-270-LS-25
	Lab ID	L17041075-13	L17041069-16	L17041069-17	L17041069-23	L17041209-05	L17041069-24
	Date	4/20/2017	4/19/2017	4/19/2017	4/19/2017	4/22/2017	4/19/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.801	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.13	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	1.49	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.4	10.0 U	10.0 U	10.0 U	13.1	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	0.278 J	16.3	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	4.70	0.300 U	0.388	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.565 J	1.00 U	0.431 J	1.00 U	4.66	5.83
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	3.25 J	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	14.3	1.00 U	35.2	1.00 U	64.9	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.866 J
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	8.84	0.405 J	15.7	1.00 U	5.61	23.3
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-271	MW-272	MW-273	MW-274	MW-275	MW-276
	Sample ID	MW-271-LS-25	MW-272-LS-25	MW-273-LS-25	MW274-LS-25	MW-275-LS-25	MW-276-LS-25
	Lab ID	L17041069-29	L17041069-25	L17041209-03	L17041208-01	L17041075-42	L17041075-38
	Date	4/19/2017	4/19/2017	4/22/2017	4/22/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	10.5	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.288 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	5.34	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.53	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	0.446 J	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	4.82	1.00 U	1.00 U	0.337 J	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-276	MW-277	MW-278	MW-279	MW-280	MW-281
	Sample ID	MW-276-DUP-9	MW-277-LS-25	MW-278-LS-25	MW-279-LS-25	MW-280-LS-25	MW-281-LS-25
	Lab ID	L17041075-39	L17041069-41	L17041075-41	L17041075-40	L17041069-42	L17041110-29
	Date	4/20/2017	4/19/2017	4/20/2017	4/20/2017	4/19/2017	4/21/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.687 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	4.24
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.737	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	0.131 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	3.24	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.770	0.203 J	4.57
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	0.348 J	1.60	1.00 U	2.31
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	36.0	5.00 U	3.53 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	2.54	67.1	5.87	8.21
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	0.886 J	0.368 J	3.95	49.9
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	MW-282	MW-283	PMW21-01	PMW21-02	PMW21-03	PMW21-04
	Sample ID	MW-282-LS-25	MW-283-LS-25	PMW21-01-LS-25	PMW21-02-LS-25	PMW21-03-LS-25	PMW21-04-LS-25
	Lab ID	L17041110-26	L17041208-02	L17041075-21	L17041075-22	L17041075-23	L17041075-24
	Date	4/21/2017	4/22/2017	4/20/2017	4/20/2017	4/20/2017	4/20/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	4.34 J	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	102	14.4	9.01	17.9
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	12.0	43.9	26.4	27.3
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	150	103	142
Toluene	µg/L	1.00 U	1.00 U	6.28	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	0.868 J	2.22	1.15	1.21
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	61.0	35.3	53.1
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	0.274 J	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	PMW21-05	PMW85-01	PMW85-01	PMW85-05	PMW92-02
	Sample ID	PMW21-05-LS-25	PMW85-01-LS-25	PMW85-01-DUP-10	PMW85-05-LS-25	PMW92-02-LS-25
	Lab ID	L17041075-37	L17041069-02	L17041069-03	L17041069-04	L17041069-10
	Date	4/20/2017	4/19/2017	4/19/2017	4/19/2017	4/19/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	15.9	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	0.127 J	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	0.739 J	0.745 J	0.376 J	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.517	0.502	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.10	1.00 U
Chlorobenzene	µg/L	0.500 U	0.294 J	0.291 J	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	1.66	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.469 J	30.5	31.6	51.8	11.3
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	0.991 J
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.818 J
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	16.2	1.00 U	1.00 U	54.2	1.00 U
Toluene	µg/L	1.00 U	4.43	4.63	0.286 J	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.16	1.00 U	1.00 U	17.5	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	57.1	60.8	8.70	95.7

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	PMW92-03	PMW101-02A	PMW101-02A	PMW101-02B	PMW101-03A
	Sample ID	PMW92-03-LS-25	PMW101-02A-LS-25	PMW101-02A-LS-25-RE	PMW101-02B-LS-25	PMW101-03A-LS-25
	Lab ID	L17041069-07	L17041110-01	L17041209-07	L17041110-02	L17041110-06
	Date	4/19/2017	4/21/2017	4/24/2017	4/21/2017	4/21/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	0.458 J	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 UJ	10.0 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 UJ	2.00 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	13.6	4.69 J-	50.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Acetone	µg/L	13.0	9.90 J-	50.0 U	8.14 J	6.39 J
Benzene	µg/L	0.400 U	0.400 UJ	2.00 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 UJ	1.50 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	27.7 J	7.35 J-	3.89 J	18.3	1.63
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 UJ	2.50 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 UJ	3.00 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 UJ	10.0 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	8.49 J	10.0 UJ	50.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	0.978 J-	25.0 U	6.71	14.1
Methylene chloride	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	7.52 J	10.0 UJ	50.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 UJ	3.63 J	0.257 J	18.8
Toluene	µg/L	3.50	0.950 J-	5.00 U	3.30	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	0.268 J
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.547 J	1.00 UJ	5.00 U	1.00 U	2.05
Trichlorofluoromethane	µg/L	1.00 U	1.00 UJ	5.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	4.79	1.00 UJ	5.00 U	4.53	7.08

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	PMW101-03B	PMW101-04A	PMW101-04B	PMW101-06A	PMW101-06A
	Sample ID	PMW101-03B-LS-25	PMW101-04A-LS-25	PMW101-04B-LS-25	PMW101-06A-LS-25	PMW101-06A-DUP-11
	Lab ID	L17041110-05	L17041110-04	L17041110-03	L17041075-32	L17041075-33
	Date	4/21/2017	4/21/2017	4/21/2017	4/20/2017	4/20/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.10 J	7.41 J	9.38 J	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.186 J	0.300 U	0.197 J	0.244 J	0.173 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.284 J	4.27	0.260 J	0.645 J	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	10.1	6.14	19.5	19.0 J	13.4 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	51.7	16.9	53.2	29.3 J	8.09 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.747 J	3.61	0.795 J	1.65	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	2.03	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-1
MAIN INSTALLATION ANALYTICAL RESULTS, APRIL 2017
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Well ID	PMW101-06B	PMW101-07A	PMW101-07B
	Sample ID	PMW101-06B-LS-25	PMW101-07A-LS-25	PMW101-07B-LS-25
	Lab ID	L17041075-34	L17041075-35	L17041075-36
	Date	4/20/2017	4/20/2017	4/20/2017
Analyte	Units			
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.189 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.44
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	13.3	3.01 J	0.732 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	8.06	1.00 U	8.61
Toluene	µg/L	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	0.285 J	19.2
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J-: Estimated, biased low
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	DR1-3	DR1-4	DR1-5	DR1-5	DR1-5A	DR1-6	DR1-6A
	Sample ID	DR1-3-LA-26	DR1-4-LA-26	DR1-5-LA-26	DR1-5-DUP-1	DR1-5A-LA-26	DR1-6-LA-26	DR1-6A-LA-26
	Lab ID	L17100514-19	L17100514-25	L17100514-27	L17100514-24	L17100514-22	L17100514-14	L17100839-01
	Date	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/11/2017
Analyte	Units	L17100514-19	L17100514-25	L17100514-27	L17100514-24	L17100514-22	L17100514-14	L17100839-01
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	0.369 J	0.390 J	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	8.69 J	6.77 J	9.73 J	9.69 J	9.02 J	9.79 J	26.7
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.927 J
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.256 J	0.300 U	0.300 U	0.300 U	0.158 J	0.300 U
Chloromethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
cis-1,2-Dichloroethene	µg/L	4.70	1.00 U	13.5	13.1	48.7	1.00 U	33.8
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	6.71 J
Methyl t-butyl ether (MTBE)	µg/L	19.1	15.5	28.9	28.5	0.905 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	3.58 J	3.76 J	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.998 J
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.452 J
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.920 J
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	8.06	8.53	5.12	5.37	1.00 U	8.58	2.45
Toluene	µg/L	1.00 U	1.00 U	5.21	5.18	6.04	1.00 U	0.291 J
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	9.81	1.00 U	0.784 J	0.827 J	1.00 U	1.00 U	10.5
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	DR2-1	DR2-1	DR2-2	DR2-3	DR2-4	DR2-5	DR2-6
	Sample ID	DR2-1-LA-26	DR2-1-DUP-2	DR2-2-LA-26	DR2-3-LA-26	DR2-4-LA-26	DR2-5-LA-26	DR2-6-LA-26
	Lab ID	L17100514-01	L17100514-21	L17100636-22	L17100710-01	L17100636-16	L17100710-22	L17100637-08
	Date	10/6/2017	10/6/2017	10/7/2017	10/10/2017	10/7/2017	10/10/2017	10/8/2017
Analyte	Units	L17100514-01	L17100514-21	L17100636-22	L17100710-01	L17100636-16	L17100710-22	L17100637-08
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	15.8
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	100 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	0.364 J
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	20.0 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	50.0 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	500 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Acetone	µg/L	9.08 J	10.0	10.7	4.11 J	10.0 U	2450	12.2
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	20.0 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Carbon tetrachloride	µg/L	24.5	24.7	1.00 U	1.95	1.91	50.0 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.178 J
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Chloroform	µg/L	3.51	3.48	0.242 J	0.410	0.296 J	15.0 U	0.300 U
Chloromethane	µg/L	1.00 UJ	1.00 UJ	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
cis-1,2-Dichloroethene	µg/L	6.84	6.91	3.51	1.00 U	1.00 U	28.0 J	48.9
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	25.0 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	30.0 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	100 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	5080	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	250 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	15.1 J	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	500 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Tetrachloroethene	µg/L	150	151	4.26	7.77	5.72	50.0 U	19.6
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	0.586 J
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Trichloroethene	µg/L	5.46	5.45	0.771 J	0.922 J	0.517 J	50.0 U	6.59
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	50.0 U	21.9

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-21	MW-25A	MW-26	MW-34	MW-39	MW-39A	MW-50
	Sample ID	MW-21-LA-26	MW-25A-LA-26	MW-26-LA-26	MW-34-LA-26	MW-39-LA-26	MW-39A-LA-26	MW-50-LA-26
	Lab ID	L17100514-11	L17100710-05	L17100636-31	L17100637-28	L17100637-01	L17100710-06	L17100637-31
	Date	10/6/2017	10/10/2017	10/8/2017	10/8/2017	10/7/2017	10/10/2017	10/8/2017
Analyte	Units	L17100514-11	L17100710-05	L17100636-31	L17100637-28	L17100637-01	L17100710-06	L17100637-31
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.94 J	2.59 J	3.74 J	2.62 J	8.83 J	11.9	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	0.863 J	2.26	0.525 J	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.442	1.33	0.300 U	0.300 U	2.87
Chloromethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	136	1.00 U	1.00 U	1.00 U	10.6	15.4	0.854 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	4.49 J	5.00 U	5.00 U	5.00 U	2.58 J	6.40	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.413 J	1.37	8.25	2.16	1.62	3.93	1.27
Toluene	µg/L	5.45	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	0.265 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.43	0.470 J	0.739 J	3.95	4.56	5.64	3.12
Trichlorofluoromethane	µg/L	1.00 U	0.653 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	2.01	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-52	MW-62	MW-62	MW-63B	MW-64	MW-64	MW-85
	Sample ID	MW-52-LA-26	MW-62-LA-26	MW-62-DUP-3	MW-63B-LA-26	MW-64-LA-26	MW-64-DUP-4	MW-85-LA-26
	Lab ID	L17100710-07	L17100637-57	L17100637-55	L17100637-30	L17100636-29	L17100636-32	L17100636-14
	Date	10/10/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/7/2017
Analyte	Units	L17100710-07	L17100637-57	L17100637-55	L17100637-30	L17100636-29	L17100636-32	L17100636-14
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.392 J	0.379 J	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.17	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.736 J	1.03	0.723 J	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	9.72
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.271 J
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	12.9	11.9	10.0 U	15.1	14.6	8.48 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.241 J
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.87	1.24	11.2
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.276 J
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.731	0.300 U	0.300 U	0.549	1.41	1.22	5.41
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.701 J	11.8	11.5	0.358 J	0.440 J	0.442 J	40.5
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	0.559 J	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	0.303 J	0.290 J	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	9.54	1.00 U	1.00 U	2.12	17.5	14.9	60.6
Toluene	µg/L	1.00 U	10.6	10.2	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.58	0.278 J	0.290 J	2.23	26.3	22.9	19.8
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	15.3	15.8	1.00 U	1.00 U	1.00 U	0.755 J

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-88	MW-89	MW-90	MW-92	MW-94A	MW-94A	MW-96
	Sample ID	MW-88-LA-26	MW-89-LA-26	MW-90-LA-26	MW-92-LA-26	MW-94A-LA-26	MW-94A-DUP-5	MW-96-LA-26
	Lab ID	L17100636-21	L17100637-25	L17100637-12	L17100636-23	L17100636-35	L17100636-36	L17100710-08
	Date	10/7/2017	10/8/2017	10/8/2017	10/7/2017	10/7/2017	10/7/2017	10/10/2017
Analyte	Units	L17100636-21	L17100637-25	L17100637-12	L17100636-23	L17100636-35	L17100636-36	L17100710-08
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	0.861 J	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	0.788 J	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	4.63 J	10.0 U	10.0 U	13.1	3.64 J	4.59 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	3.16	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.657 J
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.302	0.181 J	1.04	0.300 U	0.300 U	0.300 U	0.189 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.266 J	1.00 U	0.279 J	5.86	2.63	2.30	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	1.48 J	1.41 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	18.8	2.11	13.5	78.4	18.0	15.6	0.367 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.32	0.784 J	3.82	4.94	6.08	5.30	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.28
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	2.19	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-96	MW-97	MW-98	MW-100B	MW-100B	MW-101T
	Sample ID	MW-96-DUP-14	MW-97-LA-26	MW-98-LA-26	MW-100B-LA-26	MW-100B-DUP-6	MW101T-LA-26
	Lab ID	L17100710-03	L17100710-09	L17100637-05	L17100514-09	L17100514-17	L17100514-06
	Date	10/10/2017	10/10/2017	10/7/2017	10/6/2017	10/6/2017	10/6/2017
Analyte	Units	L17100710-03	L17100710-09	L17100637-05	L17100514-09	L17100514-17	L17100514-06
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.541 J	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	14.7	10.6	8.92 J	9.44 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	3.02	4.72	1.00 U
Carbon tetrachloride	µg/L	0.741 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.193 J	0.215 J	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	5.65	21.6	20.3	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	46.3	44.8	2.39 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	7.71	2.26	2.14	26.8
Toluene	µg/L	1.00 U	1.00 U	0.883 J	1.36	1.30	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.696 J	0.634 J	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.283 J	71.7	1.98	1.58	1.49	1.00 U
Trichlorofluoromethane	µg/L	1.35	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	166	149	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-101B	MW-103	MW-104	MW-107T	MW-107B	MW-108
	Sample ID	MW101B-LA-26	MW-103-LA-26	MW-104-LA-26	MW-107T-LA-26	MW-107B-LA-26	MW-108-LA-26
	Lab ID	L17100514-08	L17100637-33	L17100637-34	L17100637-27	L17100637-21	L17100637-03
	Date	10/6/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/7/2017
Analyte	Units	L17100514-08	L17100637-33	L17100637-34	L17100637-27	L17100637-21	L17100637-03
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	2.22	1.41	1.00 U	1.00 U	1.42
1,1-Dichloroethene	µg/L	1.00 U	2.60	3.79	1.00 U	1.00 U	1.63
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	5.46 J	11.5	15.5 J-	16.4	5.14 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	5.58	0.495	0.607	0.562	3.89
Chloromethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	0.418 J	0.881 J	1.00 U	1.00 U	0.369 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	1.95 J	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	25.3	0.257 J	1.00 U	8.80	5.43	3.30
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	10.5	19.3	1.00 U	1.00 U	9.76
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-113	MW-140	MW-141	MW-142	MW-143	MW-197A
	Sample ID	MW-113-LA	MW-140-LA-26	MW-141-LA-26	MW-142-LA-26	MW-143-LA-26	MW-197A-LA-26
	Lab ID	L17100636-27	L17100637-41	L17100637-16	L17100637-58	L17100710-19	L17100636-15
	Date	10/7/2017	10/8/2017	10/8/2017	10/8/2017	10/10/2017	10/7/2017
Analyte	Units	L17100636-27	L17100637-41	L17100637-16	L17100637-58	L17100710-19	L17100636-15
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	0.518 J	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	0.591 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	11.3	3.98 J	3.49 J	5.15 J	6.85 U	13.1
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	0.302 J	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.185 J	1.86	0.300 U	0.300 U	0.131 J
Chloromethane	µg/L	0.572 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	40.3	1.00 U	1.00 U	1.00 U	1.00 U	0.638 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	0.517 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	0.539 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.663 J	11.8	27.1	1.00 U	0.399 J	17.9
Toluene	µg/L	8.60	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	0.951 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.12	4.39	4.24	6.71	0.845 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	28.3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-197B	MW-198	MW-199A	MW-199B	MW-200	MW-202A
	Sample ID	MW-197B-LA-26	MW-198-LA-26	MW-199A-LA-26	MW-199B-LA-26	MW-200-LA-26	MW-202A-LA-26
	Lab ID	L17100636-07	L17100637-56	L17100637-29	L17100637-18	L17100636-34	L17100637-54
	Date	10/7/2017	10/8/2017	10/8/2017	10/8/2017	10/7/2017	10/8/2017
Analyte	Units	L17100636-07	L17100637-56	L17100637-29	L17100637-18	L17100636-34	L17100637-54
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	15.0	3.16 J	3.91 J	12.2	12.2	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.242 J	0.300 U	0.187 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.31	1.00 U	1.00 U	0.737 J	1.42	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	1.38 J	5.00 U	4.07 J	5.00 U	2.33 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	12.6	1.00 U	1.00 U	0.295 J	4.88	4.00
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	14.9	1.65	6.08	51.0	4.50	0.903 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-202B	MW-203A	MW-203A	MW-203B	MW-204A	MW-204B
	Sample ID	MW-202B-LA-26	MW-203A-LA-26	MW-203A-DUP-8	MW-203B-LA-26	MW-204A-LA-26	MW-204B-LA-26
	Lab ID	L17100637-50	L17100839-03	L17100839-02	L17100710-10	L17100636-20	L17100636-02
	Date	10/8/2017	10/12/2017	10/12/2017	10/10/2017	10/7/2017	10/7/2017
Analyte	Units	L17100637-50	L17100839-03	L17100839-02	L17100710-10	L17100636-20	L17100636-02
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.522
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	0.332 J	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	5.80 J	8.90 J	11.0	12.2	14.2	11.8
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	0.458 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.392	0.300 U	0.300 U	0.300 U	0.300 U	0.165 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	24.7	24.0	18.7	1.09	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	2.25 J	2.18 J	3.54 J	0.571 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	36.8	0.884 J	0.771 J	3.05	30.1	11.7
Toluene	µg/L	1.00 U	0.776 J	0.737 J	0.742 J	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	3.37	1.42	1.39	11.6	0.819 J	9.30
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	5.91	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-205A	MW-205B	MW-206A	MW-206B	MW-207A	MW-207B
	Sample ID	MW-205A-LA-26	MW-205B-LA-26	MW-206A-LA-26	MW-206B-LA-26	MW-207A-LA-26	MW-207B-LA-26
	Lab ID	L17100636-03	L17100636-04	L17100636-39	L17100637-02	L17100637-07	L17100636-37
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017
Analyte	Units	L17100636-03	L17100636-04	L17100636-39	L17100637-02	L17100637-07	L17100636-37
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.20	0.290 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.61	0.591 J
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	14.2	14.0	7.71 J	4.11 J	9.48 J	9.18 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	2.11
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.300 U	4.58	1.56
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	4.61	9.07	12.5	6.24	0.607 J	0.467 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	2.35 J	4.54 J	6.20	4.17 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	9.32	4.19	6.71	9.69	10.1	24.8
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	6.82	6.75	9.35	5.39	19.5	9.40
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-208A	MW-208B	MW-209A	MW-209B	MW-210A	MW-210B
	Sample ID	MW-208A-LA-26	MW-208B-LA-26	MW-209A-LA-26	MW-209B-LA-26	MW-210A-LA-26	MW-210B-LA-26
	Lab ID	L17100636-40	L17100636-38	L17100637-04	L17100636-33	L17100636-08	L17100636-06
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/7/2017
Analyte	Units	L17100636-40	L17100636-38	L17100637-04	L17100636-33	L17100636-08	L17100636-06
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.3	5.30 J	3.97 J	2.58 J	8.08 J	9.89 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	1.05	0.300 U	0.169 J	0.142 J	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	11.1	1.00 U	1.00 U	1.00 U	4.46	0.973 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	3.29 J	5.00 U	1.53 J	5.00 U	1.16 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	10.1	8.12	0.507 J	1.65	2.93	1.47
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	9.42	2.10	7.18	7.36	4.53	22.2
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-212	MW-213	MW-214A	MW-214A	MW-214B	MW-215A
	Sample ID	MW-212-LA-26	MW-213-LA-26	MW-214A-LA-26	MW-214A-DUP-9	MW-214B-LA-26	MW-215A-LA-26
	Lab ID	L17100637-51	L17100637-64	L17100637-15	L17100637-40	L17100637-26	L17100637-36
	Date	10/8/2017	10/9/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017
Analyte	Units	L17100637-51	L17100637-64	L17100637-15	L17100637-40	L17100637-26	L17100637-36
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	2.50 U	0.500 U	0.222 J	0.264 J	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	10.0 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	2.00 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	50.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	11.3	32.1 J	2.65 J	3.50 J-	5.49 J	10.0 UJ
Benzene	µg/L	0.400 U	2.00 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	5.00 U	0.613 J	0.734 J	0.765 J	1.06
Chlorobenzene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	1.50 U	2.83	3.48	2.46	2.87
Chloromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	7.46	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	2.50 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	3.00 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	10.0 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	33.1 J	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	25.0 U	0.887 J	1.13 J	0.807 J	1.03 J
Methylene chloride	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	50.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.64	5.00 U	5.25	4.90	5.10	5.23
Toluene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	40.1	13.1	2.23	2.43	1.96	2.29
Trichlorofluoromethane	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	5.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-215B	MW-217	MW-218	MW-219	MW-253	MW-253
	Sample ID	MW-215B-LA-26	MW-217-LA-26	MW-218-LA-26	MW-219-LA-26	MW-253-LA-26	MW-253-DUP-7
	Lab ID	L17100637-23	L17100636-30	L17100637-06	L17100636-10	L17100710-16	L17100710-15
	Date	10/8/2017	10/8/2017	10/8/2017	10/7/2017	10/10/2017	10/10/2017
Analyte	Units	L17100637-23	L17100636-30	L17100637-06	L17100636-10	L17100710-16	L17100710-15
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.236 J	1.36	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	0.510 J	1.00 U	1.34	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.552	1.06	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	0.374 J	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	18.8	13.9	5.15 J	9.08 J	8.98 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.54	73.1	6.47	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.825	4.99	2.07	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.17	1.00 U	5.78	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	3.07 J	5.00 U	5.00 U	5.00 U	0.677 J	0.681 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	5.45	31.0	17.6	113	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.42	28.0	32.3	6.40	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.25	2.23	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-254	MW-255	MW-256	MW-258	MW-259	MW-260	MW-261
	Sample ID	MW-254-LA-26	MW-255-LA-26	MW-256-LA-26	MW-258-LA-26	MW-259-LA-26	MW-260-LA-26	MW-261-LA-26
	Lab ID	L17100637-45	L17100637-52	L17100637-49	L17100637-42	L17100710-11	L17100637-22	L17100710-12
	Date	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/10/2017	10/8/2017	10/10/2017
Analyte	Units	L17100637-45	L17100637-52	L17100637-49	L17100637-42	L17100710-11	L17100637-22	L17100710-12
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.262 J	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	0.628 J	0.419 J	1.00 U	1.41	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	0.611 J	2.92	1.00 U	1.71	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	1.74	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.484 J	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	3.02 J	8.37 J	13.2	10.7	13.1	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.26	1.00 U	0.627 J	1.00 U	4.11	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.277 J	0.300 U	1.46	1.97	3.33	0.737	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.359 J	1.00 U	1.00 U	1.96	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	7.32	5.00 U	0.607 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	2.83	0.335 J	24.5	24.4	13.7	0.492 J	0.308 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.22	0.665 J	8.58	55.4	18.6	4.03	2.73
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-261	MW-262	MW-262	MW-263	MW-264	MW-265
	Sample ID	MW-261-DUP-10	MW-262-LA-26	MW-262-DUP-11	MW-263-LA-26	MW-264-LA-26	MW-265-LA-26
	Lab ID	L17100710-02	L17100637-37	L17100637-39	L17100637-38	L17100637-24	L17100637-43
	Date	10/10/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017	10/8/2017
Analyte	Units	L17100710-02	L17100637-37	L17100637-39	L17100637-38	L17100637-24	L17100637-43
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	2.23	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	12.8	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.386 J	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	2.91 J	11.0 J-	11.2 J-	8.74 J	10.4	5.35 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	1.87	0.300 U	7.36
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.29	1.00 U	0.266 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	8.99	5.00 U	1.82 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.78	1.00 U	8.42
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.92	1.00 U	1.00 U	32.8	1.00 U	4.46
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-266	MW-267	MW-268	MW-269	MW-270	MW-271	MW-272
	Sample ID	MW-266-LA-26	MW-267-LA-26	MW-268-LA-26	MW-269-LA-26	MW-270-LA-26	MW-271-LA-26	MW-272-LA-26
	Lab ID	L17100636-18	L17100637-48	L17100637-19	L17100637-11	L17100637-59	L17100637-61	L17100637-60
	Date	10/7/2017	10/8/2017	10/8/2017	10/8/2017	10/9/2017	10/9/2017	10/9/2017
Analyte	Units	L17100636-18	L17100637-48	L17100637-19	L17100637-11	L17100637-59	L17100637-61	L17100637-60
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.854	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.13	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	1.96	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.60 J	15.9	13.7	3.88 J	15.7	5.99 J	2.72 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	0.437 J	21.3	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.183 J	0.581	0.300 U	0.300 U	0.186 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	0.361 J	1.00 U	5.19	6.63	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	4.69
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.33	37.7	1.00 U	70.1	0.254 J	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.920 J	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.505 J	16.2	1.00 U	6.25	25.5	4.84	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-273	MW-274	MW-275	MW-275	MW-276	MW-277
	Sample ID	MW-273-LA-26	MW-274-LA-26	MW-275-LA-26	MW-275-DUP-12	MW-276-LA-26	MW-277-LA-26
	Lab ID	L17100637-20	L17100710-13	L17100637-09	L17100637-32	L17100637-17	L17100710-14
	Date	10/8/2017	10/10/2017	10/8/2017	10/8/2017	10/8/2017	10/10/2017
Analyte	Units	L17100637-20	L17100710-13	L17100637-09	L17100637-32	L17100637-17	L17100710-14
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	5.07 J	3.17 J	6.92 J	6.37 J	9.80 J	4.18 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.889	0.300 U	0.300 U	0.145 J	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.01	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	3.17	0.487 J	0.436 J	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.46	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-278	MW-279	MW-280	MW-281	MW-282	MW-283
	Sample ID	MW-278-LA-26	MW-279-LA-26	MW-280-LA-26	MW-281-LA-26	MW-282-LA-26	MW-283-LA-26
	Lab ID	L17100637-44	L17100514-28	L17100637-10	L17100637-35	L17100637-46	L17100710-17
	Date	10/8/2017	10/6/2017	10/8/2017	10/8/2017	10/8/2017	10/10/2017
Analyte	Units	L17100637-44	L17100514-28	L17100637-10	L17100637-35	L17100637-46	L17100710-17
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	0.584 J	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	3.78	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	1.31	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	6.27 J	5.85 J	5.76 J	6.00 J	4.66 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	0.331 J	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.286 J	0.300 U	4.91	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.971 J	13.3	1.00 U	2.12	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	24.9	5.00 U	3.14 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	7.26	58.8	8.15	15.3	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.94	3.16	1.71	66.2	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-283	PMW21-01	PMW21-02	PMW21-03	PMW21-04	PMW21-05
	Sample ID	MW-283-DUP-13	PMW21-01-LA-26	PMW21-02-LA-26	PMW21-03-LA-26	PMW21-04-LA-26	PMW21-05-LA-26
	Lab ID	L17100710-18	L17100514-23	L17100514-18	L17100514-20	L17100514-10	L17100636-09
	Date	10/10/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/7/2017
Analyte	Units	L17100710-18	L17100514-23	L17100514-18	L17100514-20	L17100514-10	L17100636-09
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	12.5	7.44 J	11.2	8.79 J	11.9
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.28	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.300 U	0.151 J	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	93.2	14.5	10.4	39.1	0.368 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	12.4	56.3	36.3	73.7	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.359 J	119	92.1	270	10.2
Toluene	µg/L	1.00 U	2.38	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.64	2.99	1.88	3.90	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	71.0	41.5	146	2.35
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW85-01	PMW85-05	PMW92-02	PMW92-03	PMW101-02A
	Sample ID	PMW85-01-LA-26	PMW85-05-LA-26	PMW92-02-LA-26	PMW92-03-LA-26	PMW101-02A-LA-26
	Lab ID	L17100636-17	L17100636-13	L17100636-28	L17100636-24	L17100514-31
	Date	10/7/2017	10/7/2017	10/7/2017	10/7/2017	10/6/2017
Analyte	Units	L17100636-17	L17100636-13	L17100636-28	L17100636-24	L17100514-31
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	14.0	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	0.328 J	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	0.488 J	0.313 J	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.263 J	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.154 J	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	7.37 J	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.49 J	4.31 J	10.9	13.1	10.4
Benzene	µg/L	0.167 J	0.142 J	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.320 J	0.198 J	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.971	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	13.1	123	5.30	24.6	6.18
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	0.306 J	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.32	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	5.69 J	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	0.501 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	0.265 J	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	6.89 J	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	2.34	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	7.90	0.790 J	0.535 J	1.00 U
Toluene	µg/L	1.74	0.592 J	0.363 J	2.10	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	4.99	1.00 U	0.463 J	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	36.9	1.00 U	72.2	7.76	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW101-02B	PMW101-03A	PMW101-03B	PMW101-04A	PMW101-04B
	Sample ID	PMW101-02B-LA-26	PMW101-03A-LA-26	PMW101-03B-LA-26	PMW101-04A-LA-26	PMW101-04B-LA-26
	Lab ID	L17100514-07	L17100514-13	L17100514-05	L17100514-30	L17100514-29
	Date	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Analyte	Units	L17100514-07	L17100514-13	L17100514-05	L17100514-30	L17100514-29
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.72 J	7.92 J	9.00 J	11.5	12.1
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.139 J	0.300 U	0.238 J
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	14.3	1.17	0.317 J	5.10	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	7.88	16.9	8.34	7.11	18.9
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	24.8	43.5	18.4	50.7
Toluene	µg/L	1.60	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	2.35	0.696 J	4.62	0.951 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	4.58	4.65	1.00 U	1.74	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-2
MAIN INSTALLATION ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	PMW101-06A	PMW101-06B	PMW101-07A	PMW101-07B
	Sample ID	PMW101-06A-LA-26	PMW101-06B-LA-26	PMW101-07A-LA-26	PMW101-07B-LA-26
	Lab ID	L17100514-02	L17100514-12	L17100514-26	L17100514-04
	Date	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Analyte	Units	L17100514-02	L17100514-12	L17100514-26	L17100514-04
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	4.42 J	10.0 U	7.51 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.263 J	0.298 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	0.714 J	1.00 U	1.33
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	22.6	20.6	3.92 J	0.853 J
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	11.4	28.5	0.962 J	9.08
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	3.22	0.378 J	22.8
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-03	MW-04	MW-06	MW-07	MW-08	MW-08
	Sample ID	MW-03-ODLB-14	MW-04-ODLB-14	MW-06-ODLB-14	MW-07-ODLB-14	MW-08-ODLB-14	MW-08-DUP-1-ODLB-14
	Lab ID	L17041200-26	L17041200-23	L17041200-08	L17041200-28	L17041203-26	L17041203-28
	Date	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.205 J	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	0.760 J	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.05	1.00 U	1.00 U	12.9	2.11	2.12
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.92 J	2.52 J	4.76 J	7.81 J	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.688	15.3	0.252 J	0.300 U	0.234 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	3.40	0.320 J	0.256 J	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	2.38	1.00 U	1.00 U	32.2	4.29	4.21
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.66	1.00 U	0.876 J	32.9	7.49	7.48
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-13	MW-15	MW-28	MW-31	MW-44	MW-54
	Sample ID	MW-13-ODLB-14	MW-15-ODLB-14	MW-28-ODLB-14	MW-31-ODLB-14	MW-44-ODLB-14	MW-54-ODLB-14
	Lab ID	L17041200-22	L17041200-05	L17041203-22	L17041200-30	L17041203-15	L17041200-38
	Date	4/22/2017	4/22/2017	4/23/2017	4/22/2017	4/23/2017	4/22/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.280 J	0.448 J
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	0.888 J	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	16.2	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	2.70 J	8.01 J	4.37 J-	3.50 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.177 J	0.311	0.149 J	0.203 J	3.97	0.321
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.350 J	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.293 J	1.00 U	25.1	1.00 U	0.282 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	32.4	1.83	1.74
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-57	MW-58	MW-67	MW-68	MW-68	MW-69
	Sample ID	MW-57-ODLB-14	MW-58-ODLB-14	MW-67-ODLB-14	MW-68-ODLB-14	MW-68-DUP-2-ODLB-14	MW-69-ODLB-14
	Lab ID	L17041200-01	L17041203-27	L17041203-23	L17041203-43	L17041203-44	L17041203-45
	Date	4/22/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.394 J	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.53 J	10.0 U	9.50 J	10.0 UJ	3.20 J-	6.33 J-
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	0.272 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.324	0.894	0.300 U	0.137 J	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	0.643 J	0.640 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5.61	0.727 J	1.00 U	1.00 U	1.00 U	0.956 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-70	MW-71	MW-76	MW-77	MW-78	MW-79
	Sample ID	MW-70-ODLB-14	MW-71-ODLB-14	MW-76-ODLB-14	MW-77-ODLB-14	MW-78-ODLB-14	MW-79-ODLB-14
	Lab ID	L17041203-35	L17041203-36	L17041203-33	L17041203-34	L17041203-32	L17041203-05
	Date	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	1.08	0.500 U	0.237 J	1.59	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.234 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	4.72
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.11 J	12.5	6.26 J	4.05 J	4.65 J	7.82 J-
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	2.13	0.183 J	0.295 J	0.300 U	0.164 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.308 J	1.00 U	0.294 J	1.00 U	7.64
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	5.69	1.03	0.777 J	4.37	1.00 U	7.53
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-80	MW-87	MW-91	MW-91	MW-126	MW-129
	Sample ID	MW-80-ODLB-14	MW-87-ODLB-14	MW-91-ODLB-14	MW-91-DUP-3-ODLB-14	MW-126-ODLB-14	MW-129-ODLB-14
	Lab ID	L17041203-10	L17041200-09	L17041200-06	L17041200-07	L17041203-29	L17041203-18
	Date	4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.303 J
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	1.18	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.55	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	0.993 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	10.9
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	6.58 J	3.19 J	10.0 U	10.0 U	6.88 J-
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	100	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	7.57	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.463 J	1.00 U	1.00 U	1.00 U	13.3
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	0.293 J	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	7.32	1.00 U	1.00 U	1.00 U	15.0
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-130	MW-134	MW-144	MW-145	MW-147	MW-148
	Sample ID	MW-130-ODLB-14	MW-134-ODLB-14	MW-144-ODLB-14	MW-145-ODLB-14	MW-147-ODLB-14	MW-148-ODLB-14
	Lab ID	L17041203-19	L17041200-19	L17041203-38	L17041203-08	L17041200-31	L17041200-32
	Date	4/23/2017	4/22/2017	4/23/2017	4/23/2017	4/22/2017	4/22/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	0.817 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	8.04	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	0.632 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	9.50	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.26 J-	6.58 J	11.3	10.0 U	10.0 U	5.26 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	0.534 J	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.333	0.162 J	0.406	3.09	0.144 J	0.136 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.387 J	1.00 U	0.709 J	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	22.5	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	49.1 J	1.00 U	33.2	1.82	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-149	MW-150	MW-150	MW-151	MW-152
	Sample ID	MW-149-ODLB-14	MW-150-ODLB-14	MW-150-DUP-4-ODLB-14	MW-151-ODLB-14	MW-152-ODLB-14
	Lab ID	L17041200-43	L17041200-36	L17041200-37	L17041200-55	L17041203-04
	Date	4/22/2017	4/22/2017	4/22/2017	4/23/2017	4/23/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.242 J	0.214 J	0.205 J	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.05 J	3.48 J	10.0 U	3.63 J	6.44 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	8.85	0.563	0.529	1.78	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	9.25	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.260 J	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.58	0.936 J	0.841 J	0.772 J	0.378 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-153	MW-154	MW-155	MW-157	MW-158	MW-158A
	Sample ID	MW-153-ODLB-14	MW-154-ODLB-14	MW-155-ODLB-14	MW-157-ODLB-14	MW-158-ODLB-14	MW-158A-ODLB-14
	Lab ID	L17041203-06	L17041203-24	L17041200-39	L17041203-42	L17041200-48	L17041200-49
	Date	4/23/2017	4/23/2017	4/22/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	1.02	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	10.0 U	2.60 J	4.46 J-	11.8	4.56 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 UJ	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.217 J	0.956	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.08	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	0.261 J	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.375 J	1.35	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-159	MW-160	MW-163	MW-164	MW-165	MW-165A
	Sample ID	MW-159-ODLB-14	MW-160-ODLB-14	MW-163-ODLB-14	MW-164-ODLB-14	MW-165-ODLB-14	MW-165A-ODLB-14
	Lab ID	L17041200-42	L17041200-34	L17041203-37	L17041203-40	L17041203-01	L17041200-59
	Date	4/22/2017	4/22/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	10.1	0.500 U	0.412 J	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	3.27	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	2.58	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.37 J	10.0 U	10.6	3.45 J	4.84 J	2.76 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.127 J	0.300 U	0.234 J	1.16	0.300 U	0.251 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	22.6	1.00 U	1.00 U	1.00 U	1.00 U	0.339 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.515 J	0.407 J	0.351 J	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	2.76	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	141	1.00 U	1.52	1.21	1.20	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	6.32	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-166	MW-166A	MW-167	MW-169	MW-170	MW-171
	Sample ID	MW-166-ODLB-14	MW-166A-ODLB-14	MW-167-ODLB-14	MW-169-ODLB-14	MW-170-ODLB-14	MW-171-ODLB-14
	Lab ID	L17041200-53	L17041200-54	L17041203-13	L17041203-30	L17041203-31	L17041203-16
	Date	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	8.45 J	5.54 J	10.0 UJ	3.62 J	4.45 J	2.84 J-
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	0.297 J	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	3.73	4.15	2.98	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.853 J	10.1	1.00 U	1.51	3.45	8.28
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	1.96 J	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.03	1.30	1.60	0.412 J	1.62	2.92
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.268 J	0.563 J

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-171	MW-174	MW-176	MW-180	MW-182
	Sample ID	MW-171-DUP-5-ODLB-14	MW-174-ODLB-14	MW-176-ODLB-14	MW-180-ODLB-14	MW-182-ODLB-14
	Lab ID	L17041203-17	L17041200-04	L17041200-10	L17041200-25	L17041203-25
	Date	4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 UJ	10.0 U	10.0 U	10.0 U	3.36 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 UJ	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	8.15	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	0.948 J	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	0.273 J	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	2.90	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	0.550 J	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-184	MW-187	MW-187	MW-190	MW-220
	Sample ID	MW-184-ODLB-14	MW-187-ODLB-14	MW-187-DUP-6-ODLB-14	MW-190-ODLB-14	MW-220-ODLB-14
	Lab ID	L17041203-41	L17041200-20	L17041200-21	L17041203-39	L17041200-27
	Date	4/23/2017	4/22/2017	4/22/2017	4/23/2017	4/22/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	3.54	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.399 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	7.66
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.82 J-	10.0 U	2.63 J	9.21 J	27.3
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	0.542 J	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	1.40	0.300 U	0.300 U	0.224 J	0.203 J
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.396 J	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.272 J	1.00 U	1.00 U	0.428 J	14.8
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.994 J	1.00 U	1.00 U	8.16	17.4
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-221	MW-222	MW-222	MW-223	MW-224
	Sample ID	MW-221-ODLB-14	MW-222-ODLB-14	MW-222-DUP-7-ODLB-14	MW-223-ODLB-14	MW-224-ODLB-14
	Lab ID	L17041200-24	L17041200-16	L17041200-17	L17041200-14	L17041200-18
	Date	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.12 J	8.13 J	9.67 J	5.47 J	7.58 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.300 U	0.327	0.462
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-225	MW-226	MW-227	MW-228	MW-230	MW-235
	Sample ID	MW-225-ODLB-14	MW-226-ODLB-14	MW-227-ODLB-14	MW-228-ODLB-14	MW-230-ODLB-14	MW-235-ODLB-14
	Lab ID	L17041200-11	L17041200-15	L17041200-02	L17041200-03	L17041200-29	L17041203-09
	Date	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.528 J	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	7.70	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	8.82 J	10.0 U	2.81 J	10.0 U	7.94 J	2.57 J-
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.169 J	0.300 U	0.300 U	0.264 J	0.300 U
Chloromethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.286 J	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.516 J	1.00 U	1.00 U	0.343 J	22.0	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	28.2	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-237	MW-241	MW-242	MW-243	MW-244	MW-245
	Sample ID	MW-237-ODLB-14	MW-241-ODLB-14	MW-242-ODLB-14	MW-243-ODLB-14	MW-244-ODLB-14	MW-245-ODLB-14
	Lab ID	L17041200-52	L17041200-33	L17041200-35	L17041200-40	L17041200-44	L17041200-41
	Date	4/23/2017	4/22/2017	4/22/2017	4/22/2017	4/23/2017	4/22/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	1.68	0.330 J	0.248 J
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	0.437 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	4.03	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	9.25 J	4.14 J	4.59 J	7.24 J	5.96 J	6.59 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 UJ	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.147 J	0.300 U	0.300 U	0.256 J	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	0.349 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	0.470 J	1.00 U	3.20	0.738 J	0.585 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-246	MW-246	MW-247	MW-248	MW-249
	Sample ID	MW-246-ODLB-14	MW-246-DUP-8-ODLB-14	MW-247-ODLB-14	MW-248-ODLB-14	MW-249-ODLB-14
	Lab ID	L17041200-50	L17041200-51	L17041200-56	L17041203-14	L17041203-07
	Date	4/23/2017	4/23/2017	4/23/2017	4/23/2017	4/23/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	4.78	5.60	0.206 J	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	8.07 J	10.4	9.07 J	10.0 UJ	8.95 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.385 J
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.308	0.300 U	2.95
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	0.448 J	1.00 U	0.318 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.373 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.849 J	0.621 J	0.666 J	1.00 U	1.76
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-3
DUNN FIELD ANALYTICAL RESULTS, APRIL 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-250	MW-250	MW-251
	Sample ID	MW-250-ODLB-14	MW-250-DUP-9-ODLB-14	MW-251-ODLB-14
	Lab ID	L17041200-46	L17041200-47	L17041200-45
	Date	4/23/2017	4/23/2017	4/23/2017
Analyte	Units			
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	0.813 J
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	4.73
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U
Acetone	µg/L	11.6	9.92 J	6.65 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 UJ	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.300 U	0.300 U	0.491
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	0.533 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	0.970 J
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-4
DUNN FIELD ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-06	MW-57	MW-70	MW-77	MW-87	MW-87	MW-144
	Sample ID	MW-06-ODLS-15	MW-57-ODLS-15	MW-70-ODLS-15	MW-77-ODLS-15	MW-87-ODLS-15	MW-87-DUP-1-ODLS-15	MW-144-ODLS-15
	Lab ID	L17100532-19	L17100532-12	L17100532-11	L17100532-18	L17100532-17	L17100532-13	L17100532-14
	Date	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017	10/6/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.477 J	0.705	1.89	1.81	3.57
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	2.40	2.48	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.272 J	0.274 J	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	2.80 J	5.17 J	6.12 J	4.59 J	5.93 J	6.85 J	8.46 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 UJ	1.00 UJ	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	0.382 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	8.03	0.659	0.215 J	0.307	110	108	0.490
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	2.08	1.00 U	1.00 U	1.00 U	9.48	9.69	0.345 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.325 J	0.355 J	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	0.293 J	0.432 J	0.438 J	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	0.298 J	0.301 J	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	0.375 J	6.04	3.71	2.40	8.00	7.95	20.5
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-4
DUNN FIELD ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-149	MW-149	MW-150	MW-159	MW-163	MW-165	MW-166
	Sample ID	MW-149-ODLS-15	MW-149-DUP-2-ODLS-15	MW-150-ODLS-15	MW-159-ODLS-15	MW-163-ODLS-15	MW-165-ODLS-15	MW-166-ODLS-15
	Lab ID	L17100532-07	L17100532-08	L17100532-05	L17100532-06	L17100532-09	L17100532-15	L17100532-01
	Date	10/5/2017	10/5/2017	10/5/2017	10/5/2017	10/5/2017	10/6/2017	10/5/2017
Analyte	Units							
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.347 J	0.320 J	2.57	8.36	0.265 J	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	3.25	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.64	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	2.99 J	3.17 J	3.21 J	3.90 J	5.52 J	3.19 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	14.4	14.7	0.642	0.138 J	0.210 J	0.133 J	8.21
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	8.36	8.63	1.00 U	21.4	1.00 U	1.00 U	3.42
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	0.274 J	0.333 J	1.00 U	0.631 J	0.317 J	1.00 U	0.266 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	2.41	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.68	1.74	7.71	146	1.05	1.01	1.26
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	5.96	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DOE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-4
DUNN FIELD ANALYTICAL RESULTS, OCTOBER 2017
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Well ID	MW-166A	MW-190	MW-246	MW-249
	Sample ID	MW-166A-ODLS-15	MW-190-ODLS-15	MW-246-ODLS-15	MW-249-ODLS-15
	Lab ID	L17100532-04	L17100532-16	L17100532-03	L17100532-02
	Date	10/5/2017	10/6/2017	10/5/2017	10/5/2017
Analyte	Units				
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.334 J	3.16	3.60	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	3.00 J	6.25 J	5.76 J	5.00 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 UJ	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	0.383 J
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	10.0	0.253 J	0.300 U	3.07
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	9.62	1.00 U	1.00 U	0.701 J
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.486 J	1.00 U	0.264 J
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.78	11.0	0.597 J	1.85
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
J-: Estimated, biased low
U: Not Detected
UJ: Not Detected, RL estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-5
MAIN INSTALLATION QUALITY CONTROL SAMPLE ANALYTICAL RESULTS
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Sample ID	EB1-LS-25	LTM-TB1-LS-25	LTM-TB2-LS-25	LTM-TB3-LS-25	LTM-TB4-LS-25	LTM-TB5-LS-25
	Lab ID	L17041209-09	L17041075-43	L17041075-44	L17041075-45	L17041110-30	L17041209-08
	Date	4/22/2017	4/20/2017	4/20/2017	4/20/2017	4/21/2017	4/24/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.201 J	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	10.0 U	5.00 J	3.10 J	10.0 U	10.0 U	4.54 J
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 UJ	1.00 U	1.00 U	1.00 U	1.00 U	1.00 UJ
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.295 J	0.300 U	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	0.487 J	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	0.278 J	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.42	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-5
MAIN INSTALLATION QUALITY CONTROL SAMPLE ANALYTICAL RESULTS
2017 ANNUAL LONG TERM MONITORING REPORT
Defense Depot Memphis, Tennessee

	Sample ID	LTM-RB1-LA-26	LTM-TB1-LA-26	LTM-TB2-LA-26	LTM-TB3-LA-26	LTM-TB4-LA-26	LTM-TB5-LA-26
	Lab ID	L17100636-01	L17100637-65	L17100637-53	L17100637-47	L17100710-04	L17100839-04
	Date	10/9/2017	10/9/2017	10/9/2017	10/9/2017	10/10/2017	10/12/2017
Analyte	Units						
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 UJ	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 UJ	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 UJ	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Acetone	µg/L	15.1	10.0 U	10.0 U	10.0 UJ	2.87 J	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 UJ	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Chloroform	µg/L	0.332	0.300 U	0.300 U	0.300 UJ	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 UJ	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 UJ	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 UJ	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 UJ	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 UJ	5.00 U	5.00 U
Methylene chloride	µg/L	0.256 J	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 UJ	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Toluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 UJ	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
J: Estimated
U: Not Detected
UJ: Not Detected, RL Estimated
Method:
8260B: Volatile Organic Compounds

TABLE D-6
DUNN FIELD QUALITY CONTROL SAMPLE ANALYTICAL RESULTS
ANNUAL LONG TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

	Sample ID	EB1-ODLB-14	TB-1-ODLB-14	TB-2-ODLB-14	TB-3-ODLB-14	TB-1-ODLS-15
	Lab ID	L17041203-47	L17041203-46	L17041203-48	L17041203-49	L17100532-21
	Date	4/23/2017	4/24/2017	4/24/2017	4/24/2017	10/6/2017
Analyte	Units					
1,1,1,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,1-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1,2,2-Tetrachloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,1,2-Trichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,1-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,3-Trichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2,4-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dibromo-3-chloropropane	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
1,2-Dibromoethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,2-Dichloroethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
1,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3,5-Trimethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichlorobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
1,3-Dichloropropane	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
1,4-Dichlorobenzene	µg/L	0.176 J	0.500 U	0.500 U	0.500 U	0.500 U
1-Chlorohexane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2,2-Dichloropropane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
2-Hexanone	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
4-Chlorotoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Acetone	µg/L	7.42 J-	10.0 U	10.0 U	10.0 U	10.0 U
Benzene	µg/L	0.400 U	0.400 U	0.400 U	0.400 U	0.400 U
Bromobenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromochloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromodichloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Bromoform	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Bromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon disulfide	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Carbon tetrachloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chlorobenzene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Chloroethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Chloroform	µg/L	0.492	0.300 U	0.300 U	0.300 U	0.300 U
Chloromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
cis-1,3-Dichloropropene	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromochloromethane	µg/L	0.500 U	0.500 U	0.500 U	0.500 U	0.500 U
Dibromomethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Dichlorodifluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Ethylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Hexachlorobutadiene	µg/L	0.600 U	0.600 U	0.600 U	0.600 U	0.600 U
Isopropylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
m-,p-Xylene	µg/L	2.00 U	2.00 U	2.00 U	2.00 U	2.00 U
MEK (2-Butanone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Methyl t-butyl ether (MTBE)	µg/L	5.00 U	5.00 U	5.00 U	5.00 U	5.00 U
Methylene chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
MIBK (methyl isobutyl ketone)	µg/L	10.0 U	10.0 U	10.0 U	10.0 U	10.0 U
Naphthalene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
n-Propylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
o-Xylene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
p-Isopropyltoluene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
sec-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Styrene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
tert-Butylbenzene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Tetrachloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Toluene	µg/L	1.23	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,2-Dichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
trans-1,3-Dichloropropene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichloroethene	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Trichlorofluoromethane	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U
Vinyl chloride	µg/L	1.00 U	1.00 U	1.00 U	1.00 U	1.00 U

Notes:
µg/L: micrograms per liter
RL: Reporting Limit
DQE Flags:
U: Not Detected
UJ: Not Detected, RL estimated
J: Estimated
J-: Estimated, biased low
Method:
8260B: Volatile Organic Compounds

E

Appendix E.

Laboratory Analytical Reports
(Electronic Copies Only)

Appendix E-1
Main Installation Laboratory
Analytical Reports

Microbac

Laboratory Report Number: L17041069 *(Revised)*

Revised report to include the ICAL/ICV forms.
Revised report to re-scan the COCs forms that did not pull into the original scan.
Revised report to remove 1,4 Dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 25 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041069
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

There were no discrepancies.

Discrepancy	Resolution

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00114306	H	3.0		1001891733010004575000778957073418	X
0019634	H	3.0		1002826033010004575000778957073223	X
00113895	H	2.0		1002826033010004575000778957073245	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	Yes

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-85-LS-25	L17041069-01	04/19/2017 08:26	04/21/2017 10:11
PMW-85-01-LS-25	L17041069-02	04/19/2017 08:50	04/21/2017 10:11
DUP-10	L17041069-03	04/19/2017 08:50	04/21/2017 10:11
PMW-85-05-LS-25	L17041069-04	04/19/2017 09:20	04/21/2017 10:11
DR2-3-LS-25	L17041069-05	04/19/2017 09:53	04/21/2017 10:11
MW-113-LS-25	L17041069-06	04/19/2017 10:07	04/21/2017 10:11
PMW92-03-LS-25	L17041069-07	04/19/2017 10:15	04/21/2017 10:11
PMW92-03-LS-25	L17041069-08	04/19/2017 10:15	04/21/2017 10:11
PMW92-03-LS-25	L17041069-09	04/19/2017 10:15	04/21/2017 10:11
PMW92-02-LS-25	L17041069-10	04/19/2017 10:31	04/21/2017 10:11
DUP-3	L17041069-11	04/19/2017 10:40	04/21/2017 10:11
MW-92-LS-25	L17041069-12	04/19/2017 10:42	04/21/2017 10:11
DR2-1-LS-25	L17041069-13	04/19/2017 11:02	04/21/2017 10:11
MW-88-LS-25	L17041069-14	04/19/2017 11:10	04/21/2017 10:11
DR2-2-LS-25	L17041069-15	04/19/2017 11:25	04/21/2017 10:11
MW-266-LS-25	L17041069-16	04/19/2017 11:35	04/21/2017 10:11
MW-267-LS-25	L17041069-17	04/19/2017 13:08	04/21/2017 10:11
MW-26-LS-25	L17041069-18	04/19/2017 13:22	04/21/2017 10:11
DR2-6-LS-25	L17041069-19	04/19/2017 13:31	04/21/2017 10:11
MW-217-LS-25	L17041069-20	04/19/2017 13:39	04/21/2017 10:11
MW-64-LS-25	L17041069-21	04/19/2017 13:47	04/21/2017 10:11
MW-218-LS-25	L17041069-22	04/19/2017 13:57	04/21/2017 10:11
MW-268-LS-25	L17041069-23	04/19/2017 14:05	04/21/2017 10:11
MW-270-LS-25	L17041069-24	04/19/2017 14:15	04/21/2017 10:11
MW-272-LS-25	L17041069-25	04/19/2017 14:28	04/21/2017 10:11
MW-259-LS-25	L17041069-26	04/19/2017 14:57	04/21/2017 10:11
MW-259-LS-25	L17041069-27	04/19/2017 14:57	04/21/2017 10:11
MW-259-LS-25	L17041069-28	04/19/2017 14:57	04/21/2017 10:11
MW-271-LS-25	L17041069-29	04/19/2017 15:10	04/21/2017 10:11
MW-97-LS-25	L17041069-30	04/19/2017 15:28	04/21/2017 10:11
MW-204A-LS-25	L17041069-31	04/19/2017 15:38	04/21/2017 10:11
MW-204B-LS-25	L17041069-32	04/19/2017 15:43	04/21/2017 10:11
MW-204B-LS-25	L17041069-33	04/19/2017 15:43	04/21/2017 10:11
MW-204B-LS-25	L17041069-34	04/19/2017 15:43	04/21/2017 10:11
MW-197A-LS-25	L17041069-35	04/19/2017 16:00	04/21/2017 10:11
MW-197B-LS-25	L17041069-36	04/19/2017 16:05	04/21/2017 10:11
MW-203A-LS-25	L17041069-37	04/19/2017 16:25	04/21/2017 10:11

MW-203B-LS-25	L17041069-38	04/19/2017 16:30	04/21/2017 10:11
MW-210A-LS-25	L17041069-39	04/19/2017 16:46	04/21/2017 10:11
MW-210B-LS-25	L17041069-40	04/19/2017 16:52	04/21/2017 10:11
MW-277-LS-25	L17041069-41	04/19/2017 15:21	04/21/2017 10:11
MW-280-LS-25	L17041069-42	04/19/2017 11:16	04/21/2017 10:11
MW-98-LS-25	L17041069-43	04/20/2017 07:55	04/21/2017 10:11
DUP-6	L17041069-44	04/20/2017 07:58	04/21/2017 10:11
MW-205A-LS-25	L17041069-45	04/20/2017 08:05	04/21/2017 10:11
MW-205B-LS-25	L17041069-46	04/20/2017 08:10	04/21/2017 10:11
MW-39A-LS-25	L17041069-47	04/20/2017 08:21	04/21/2017 10:11
MW-39-LS-25	L17041069-48	04/20/2017 08:26	04/21/2017 10:11
MW-206B-LS-25	L17041069-49	04/20/2017 08:37	04/21/2017 10:11
MW-206A-LS-25	L17041069-50	04/20/2017 08:42	04/21/2017 10:11

Microbac REPORT L17041069
PREPARED FOR CT Laboratories
WORK ID:

1.0 Summary Data ..... ??
1.1 Narratives ..... ??
1.2 Certificate of Analysis ..... ??
2.0 Full Sample Data Package ..... ??
2.1 Volatiles Data ..... ??
2.1.1 Volatiles GCMS Data (8260) ..... ??
2.1.1.1 Summary Data ..... ??
2.1.1.2 QC Summary Data ..... ??
2.1.1.3 Sample Data ..... ??
2.1.1.4 Standards Data ..... ??
2.1.1.5 Raw QC Data ..... ??
3.0 Attachments ..... ??

1.0 Summary Data

1.1 Narratives

Login Number: L17041069
Department: Volatiles
Analyst: Jared Smith

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: All acceptance criteria were met.

Continuing Calibration and Tune: Bromomethane was below the LCL in CCV WG611068-02 analyzed 04/21/2017 on HPMS6, Chloromethane was below the LCL in CCV WG611143-02 analyzed 04/21/2017 on HPMS11, 1,2,3-Trichlorobenzene was below the LCL in CCV WG611221-02 analyzed 04/22/2017 on HPMS6, Bromomethane exceeded the UCL in CCV WG611300-02 analyzed 04/24/2017 on HPMS8. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: MS/MSD performed on sample 26 has recoveries out of range for 2,2-Dichloropropane and

Trichloroethene, and RPD results outside control limits for 2,2-Dichloropropane. MS/MSD performed on sample 07 has recoveries out of range for cis-1,2-Dichloroethene. All other acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Samples 13, were run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

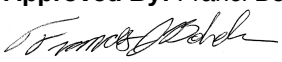
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124732
Approved By: Franci Bolden



1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041069-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-85-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 20:33
Collect Date:	04/19/2017 08:26	**Dilution:**	1	**File ID:**	8M419103
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	7.28		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.35	F	10.0	2.50
Benzene	71-43-2	0.148	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	14.1		1.00	0.250
Chlorobenzene	108-90-7	0.214	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.57		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	28.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	21.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	71.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	1.48		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW-85-01-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 19:33
Collect Date:	04/19/2017 08:50	**Dilution:**	1	**File ID:**	8M419101
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.739	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9	0.517		0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.294	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	30.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	4.43		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	57.1		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-10	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/22/2017 00:03
Collect Date:	04/19/2017 08:50	**Dilution:**	1	**File ID:**	8M419110
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.745	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9	0.502		0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.66	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.291	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	31.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	4.63		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	60.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW-85-05-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 19:03
Collect Date:	04/19/2017 09:20	**Dilution:**	1	**File ID:**	8M419100
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	15.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1	0.127	F	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.376	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.34	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.10		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.66		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	51.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	17.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	54.2		1.00	0.250
Toluene	108-88-3	0.286	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	8.70		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-3-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 17:04
Collect Date:	04/19/2017 09:53	**Dilution:**	1	**File ID:**	8M419096
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.94	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.22		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.405		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.01		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.00		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-113-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 20:03
Collect Date:	04/19/2017 10:07	**Dilution:**	1	**File ID:**	8M419102
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	0.694	F	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.330	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	54.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.735	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.403	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.439	F	1.00	0.250
Toluene	108-88-3	17.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.747	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	36.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW92-03-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 16:33
Collect Date:	04/19/2017 10:15	**Dilution:**	1	**File ID:**	8M419095
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.458	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6	13.6		10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	27.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3	8.49	F	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	7.52	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.547	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.587	F	1.00	0.250
Toluene	108-88-3	3.50		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.79		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW92-03-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 15:04
Collect Date:	04/19/2017 10:15	**Dilution:**	1	**File ID:**	8M419092
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.8		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.0		1.00	0.250
1,1-Dichloroethane	75-34-3	18.8		1.00	0.125
1,1-Dichloroethene	75-35-4	18.5		1.00	0.500
1,1-Dichloropropene	563-58-6	18.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.8		1.00	0.250
1,2-Dichloroethane	107-06-2	19.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.8		2.00	1.00
1,2-Dichloropropane	78-87-5	18.8		1.00	0.200
1,2-Dibromoethane	106-93-4	19.2		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.3		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.6		1.00	0.250
1,3-Dichloropropane	142-28-9	19.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.3		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	34.8		10.0	2.50
2-Chlorotoluene	95-49-8	17.0		1.00	0.125
4-Chlorotoluene	106-43-4	19.5		1.00	0.250
Acetone	67-64-1	30.5		10.0	2.50
Benzene	71-43-2	18.8		0.400	0.125
Bromobenzene	108-86-1	18.9		1.00	0.125
Bromochloromethane	74-97-5	20.1		1.00	0.200
Bromodichloromethane	75-27-4	19.0		0.500	0.250
Bromoform	75-25-2	16.8		1.00	0.500
Bromomethane	74-83-9	24.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.0		1.00	0.500
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	18.1		0.500	0.125
Chloroethane	75-00-3	21.5		1.00	0.500
Chloroform	67-66-3	17.8		0.300	0.125
Chloromethane	74-87-3	20.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	43.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.8		0.500	0.250
Dibromochloromethane	124-48-1	19.3		0.500	0.250
Dibromomethane	74-95-3	19.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.8		1.00	0.250
Ethylbenzene	100-41-4	17.9		1.00	0.250
Hexachlorobutadiene	87-68-3	18.6		0.600	0.250
Isopropylbenzene	98-82-8	19.0		1.00	0.250
Methylene chloride	75-09-2	18.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.9		5.00	0.500
MEK (2-Butanone)	78-93-3	29.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	27.9		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	18.9		1.00	0.125
m-,p-Xylene	179601-23-1	38.2		2.00	0.500
Naphthalene	91-20-3	20.8		1.00	0.200
o-Xylene	95-47-6	18.3		1.00	0.250
p-Isopropyltoluene	99-87-6	19.5		1.00	0.250
sec-Butylbenzene	135-98-8	18.8		1.00	0.250
Styrene	100-42-5	20.0		1.00	0.125
Trichloroethene	79-01-6	19.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.1		1.00	0.250
Tetrachloroethene	127-18-4	20.1		1.00	0.250
Toluene	108-88-3	22.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	18.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.2		1.00	0.250
Vinyl chloride	75-01-4	21.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Sample #:	L17041069-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW92-03-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 15:34
Collect Date:	04/19/2017 10:15	**Dilution:**	1	**File ID:**	8M419093
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.7		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	17.9		1.00	0.250
1,1-Dichloroethane	75-34-3	18.5		1.00	0.125
1,1-Dichloroethene	75-35-4	18.3		1.00	0.500
1,1-Dichloropropene	563-58-6	18.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.4		1.00	0.250
1,2-Dichloroethane	107-06-2	19.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.4		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.6		2.00	1.00
1,2-Dichloropropane	78-87-5	18.4		1.00	0.200
1,2-Dibromoethane	106-93-4	18.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.1		1.00	0.250
1,3-Dichloropropane	142-28-9	19.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	17.8		0.500	0.125
1-Chlorohexane	544-10-5	20.5		1.00	0.125
2,2-Dichloropropane	594-20-7	19.7		1.00	0.250
2-Hexanone	591-78-6	33.3		10.0	2.50
2-Chlorotoluene	95-49-8	17.5		1.00	0.125
4-Chlorotoluene	106-43-4	18.3		1.00	0.250
Acetone	67-64-1	28.6		10.0	2.50
Benzene	71-43-2	18.7		0.400	0.125
Bromobenzene	108-86-1	18.4		1.00	0.125
Bromochloromethane	74-97-5	19.9		1.00	0.200
Bromodichloromethane	75-27-4	18.8		0.500	0.250
Bromoform	75-25-2	16.4		1.00	0.500
Bromomethane	74-83-9	25.2		1.00	0.500
Carbon disulfide	75-15-0	16.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	19.6		1.00	0.250
Chlorobenzene	108-90-7	17.8		0.500	0.125
Chloroethane	75-00-3	20.8		1.00	0.500
Chloroform	67-66-3	17.7		0.300	0.125
Chloromethane	74-87-3	19.8		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	41.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.4		0.500	0.250
Dibromochloromethane	124-48-1	18.8		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.4		1.00	0.250
Ethylbenzene	100-41-4	18.0		1.00	0.250
Hexachlorobutadiene	87-68-3	18.7		0.600	0.250
Isopropylbenzene	98-82-8	19.0		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.3		5.00	0.500
MEK (2-Butanone)	78-93-3	27.6		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	25.9		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	18.6		1.00	0.125
m-,p-Xylene	179601-23-1	37.7		2.00	0.500
Naphthalene	91-20-3	20.4		1.00	0.200
o-Xylene	95-47-6	18.2		1.00	0.250
p-Isopropyltoluene	99-87-6	19.2		1.00	0.250
sec-Butylbenzene	135-98-8	18.5		1.00	0.250
Styrene	100-42-5	19.7		1.00	0.125
Trichloroethene	79-01-6	19.7		1.00	0.250
tert-Butylbenzene	98-06-6	17.8		1.00	0.250
Tetrachloroethene	127-18-4	20.3		1.00	0.250
Toluene	108-88-3	21.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.4		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	18.5		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	20.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Sample #:	L17041069-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW92-02-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 21:03
Collect Date:	04/19/2017 10:31	**Dilution:**	1	**File ID:**	8M419104
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.991	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.818	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.422	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	95.7		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-3	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/22/2017 00:33
Collect Date:	04/19/2017 10:40	**Dilution:**	1	**File ID:**	8M419111
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.38	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.94		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.84		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	103		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.46		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-92-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 21:32
Collect Date:	04/19/2017 10:42	**Dilution:**	1	**File ID:**	8M419105
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.81		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.96		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	103		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.48		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-1-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 22:32
Collect Date:	04/19/2017 11:02	**Dilution:**	1	**File ID:**	8M419107
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	25.9		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.59		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.76		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	204	J	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-1-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 14:14
Collect Date:	04/19/2017 11:02	**Dilution:**	5	**File ID:**	8M419121
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6	0.788	F	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1		U	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		Q	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5	21.2		5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3	3.26		1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	7.78		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3		U	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	4.54	F	5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4	155		5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-88-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 23:02
Collect Date:	04/19/2017 11:10	**Dilution:**	1	**File ID:**	8M419108
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.01	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.96		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.263	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.345	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	20.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-2-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 17:34
Collect Date:	04/19/2017 11:25	**Dilution:**	1	**File ID:**	8M419097
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.57	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.242	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.08		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.663	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.55		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-266-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 18:03
Collect Date:	04/19/2017 11:35	**Dilution:**	1	**File ID:**	8M419098
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.04	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.278	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.405	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.699	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-267-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 23:32
Collect Date:	04/19/2017 13:08	**Dilution:**	1	**File ID:**	8M419109
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.801		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.13		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	16.3		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.388		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.431	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	15.7		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	35.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-26-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 18:34
Collect Date:	04/19/2017 13:22	**Dilution:**	1	**File ID:**	8M419099
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.59		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.376		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.734	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-6-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611120	**Analyst:**	TMB	**Run Date:**	04/21/2017 22:02
Collect Date:	04/19/2017 13:31	**Dilution:**	1	**File ID:**	8M419106
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	8.96		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.233	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	31.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.55		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.38		1.00	0.250
Toluene	108-88-3	0.313	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	16.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-217-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/22/2017 02:22
Collect Date:	04/19/2017 13:39	**Dilution:**	1	**File ID:**	11M17670
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.78	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	61.0		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.16		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.950	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	28.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	26.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.11		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.2	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-64-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 20:03
Collect Date:	04/19/2017 13:47	**Dilution:**	1	**File ID:**	6M146611
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.442	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.09		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.85		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.26		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.443	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	26.7		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-218-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 22:35
Collect Date:	04/19/2017 13:57	**Dilution:**	1	**File ID:**	6M146616
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.46		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.36		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.501		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.377	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	7.25		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.02		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	31.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	2.08		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-268-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 22:05
Collect Date:	04/19/2017 14:05	**Dilution:**	1	**File ID:**	6M146615
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.29	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-270-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 21:35
Collect Date:	04/19/2017 14:15	**Dilution:**	1	**File ID:**	6M146614
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.83		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	23.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.264	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.866	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-272-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 21:04
Collect Date:	04/19/2017 14:28	**Dilution:**	1	**File ID:**	6M146613
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.62	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8	5.34		1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-259-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 20:34
Collect Date:	04/19/2017 14:57	**Dilution:**	1	**File ID:**	6M146612
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.239	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.558	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	2.29		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.510	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	4.79		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.93		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	20.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-259-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 18:31
Collect Date:	04/19/2017 14:57	**Dilution:**	1	**File ID:**	6M146608
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.6		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.9		1.00	0.250
1,1-Dichloroethane	75-34-3	19.7		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.8		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	18.9		1.00	0.250
1,2-Dichloroethane	107-06-2	22.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	17.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.8		2.00	1.00
1,2-Dichloropropane	78-87-5	20.4		1.00	0.200
1,2-Dibromoethane	106-93-4	18.3		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.4		1.00	0.250
1,3-Dichlorobenzene	541-73-1	17.9		1.00	0.250
1,3-Dichloropropane	142-28-9	19.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	17.9		0.500	0.125
1-Chlorohexane	544-10-5	19.3		1.00	0.125
2,2-Dichloropropane	594-20-7	11.5		1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	16.5		1.00	0.125
4-Chlorotoluene	106-43-4	20.5		1.00	0.250
Acetone	67-64-1	29.9		10.0	2.50
Benzene	71-43-2	19.0		0.400	0.125
Bromobenzene	108-86-1	18.0		1.00	0.125
Bromochloromethane	74-97-5	19.8		1.00	0.200
Bromodichloromethane	75-27-4	19.6		0.500	0.250
Bromoform	75-25-2	17.8		1.00	0.500
Bromomethane	74-83-9	12.2	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.5		1.00	0.500
Carbon tetrachloride	56-23-5	24.3		1.00	0.250
Chlorobenzene	108-90-7	17.8		0.500	0.125
Chloroethane	75-00-3	21.5		1.00	0.500
Chloroform	67-66-3	20.7		0.300	0.125
Chloromethane	74-87-3	20.8		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.6		0.500	0.250
Dibromochloromethane	124-48-1	18.3		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.8		1.00	0.250
Ethylbenzene	100-41-4	18.0		1.00	0.250
Hexachlorobutadiene	87-68-3	17.8		0.600	0.250
Isopropylbenzene	98-82-8	17.9		1.00	0.250
Methylene chloride	75-09-2	19.0		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.5		5.00	0.500
MEK (2-Butanone)	78-93-3	21.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.6		10.0	2.50
n-Butylbenzene	104-51-8	19.1		1.00	0.250
n-Propylbenzene	103-65-1	18.3		1.00	0.125
m-,p-Xylene	179601-23-1	35.6		2.00	0.500
Naphthalene	91-20-3	19.2		1.00	0.200
o-Xylene	95-47-6	18.1		1.00	0.250
p-Isopropyltoluene	99-87-6	18.6		1.00	0.250
sec-Butylbenzene	135-98-8	18.3		1.00	0.250
Styrene	100-42-5	18.7		1.00	0.125
Trichloroethene	79-01-6	32.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.4		1.00	0.250
Tetrachloroethene	127-18-4	28.0		1.00	0.250
Toluene	108-88-3	18.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.9		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	18.0		1.00	0.500
Trichlorofluoromethane	75-69-4	19.4		1.00	0.250
Vinyl chloride	75-01-4	20.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041069-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-259-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611071	**Analyst:**	TMB	**Run Date:**	04/21/2017 19:02
Collect Date:	04/19/2017 14:57	**Dilution:**	1	**File ID:**	6M146609
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.3		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.8		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.6		1.00	0.250
1,1-Dichloroethane	75-34-3	20.3		1.00	0.125
1,1-Dichloroethene	75-35-4	19.9		1.00	0.500
1,1-Dichloropropene	563-58-6	19.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.1		1.00	0.250
1,2-Dichloroethane	107-06-2	22.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.2		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.4		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	19.0		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.0		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.2		0.500	0.125
1-Chlorohexane	544-10-5	19.9		1.00	0.125
2,2-Dichloropropane	594-20-7	16.0		1.00	0.250
2-Hexanone	591-78-6	22.1		10.0	2.50
2-Chlorotoluene	95-49-8	17.1		1.00	0.125
4-Chlorotoluene	106-43-4	20.6		1.00	0.250
Acetone	67-64-1	30.8		10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	18.5		1.00	0.125
Bromochloromethane	74-97-5	20.4		1.00	0.200
Bromodichloromethane	75-27-4	20.1		0.500	0.250
Bromoform	75-25-2	18.3		1.00	0.500
Bromomethane	74-83-9	12.4	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.5		1.00	0.500
Carbon tetrachloride	56-23-5	24.5		1.00	0.250
Chlorobenzene	108-90-7	18.1		0.500	0.125
Chloroethane	75-00-3	21.1		1.00	0.500
Chloroform	67-66-3	21.0		0.300	0.125
Chloromethane	74-87-3	20.4		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.4		0.500	0.250
Dibromochloromethane	124-48-1	18.8		0.500	0.250
Dibromomethane	74-95-3	20.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.1		1.00	0.250
Ethylbenzene	100-41-4	18.1		1.00	0.250
Hexachlorobutadiene	87-68-3	18.1		0.600	0.250
Isopropylbenzene	98-82-8	18.5		1.00	0.250
Methylene chloride	75-09-2	19.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.1		5.00	0.500
MEK (2-Butanone)	78-93-3	21.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.7		10.0	2.50
n-Butylbenzene	104-51-8	19.4		1.00	0.250
n-Propylbenzene	103-65-1	18.6		1.00	0.125
m-,p-Xylene	179601-23-1	36.8		2.00	0.500
Naphthalene	91-20-3	19.3		1.00	0.200
o-Xylene	95-47-6	18.8		1.00	0.250
p-Isopropyltoluene	99-87-6	18.8		1.00	0.250
sec-Butylbenzene	135-98-8	18.6		1.00	0.250
Styrene	100-42-5	19.2		1.00	0.125
Trichloroethene	79-01-6	33.1		1.00	0.250
tert-Butylbenzene	98-06-6	18.6		1.00	0.250
Tetrachloroethene	127-18-4	28.8		1.00	0.250
Toluene	108-88-3	18.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.6		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	16.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	105	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041069-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 21:27
Collect Date:	04/19/2017 15:10	**Dilution:**	1	**File ID:**	11M17660
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.35	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.5	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-97-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 21:57
Collect Date:	04/19/2017 15:28	**Dilution:**	1	**File ID:**	11M17661
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.67	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.221	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	62.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.9	85	115	
1,2-Dichloroethane-d4	99.2	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 22:26
Collect Date:	04/19/2017 15:38	**Dilution:**	1	**File ID:**	11M17662
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.06		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.11		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	27.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.8	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 20:58
Collect Date:	04/19/2017 15:43	**Dilution:**	1	**File ID:**	11M17659
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.647		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.125	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.278	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.99		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	12.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 18:31
Collect Date:	04/19/2017 15:43	**Dilution:**	1	**File ID:**	11M17653
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.5		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	22.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	18.8		1.00	0.500
1,1-Dichloropropene	563-58-6	19.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	21.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	19.5		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.2		2.00	1.00
1,2-Dichloropropane	78-87-5	19.6		1.00	0.200
1,2-Dibromoethane	106-93-4	20.0		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.4		1.00	0.250
1,3-Dichloropropane	142-28-9	20.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.4		0.500	0.125
1-Chlorohexane	544-10-5	22.4		1.00	0.125
2,2-Dichloropropane	594-20-7	20.4		1.00	0.250
2-Hexanone	591-78-6	22.9		10.0	2.50
2-Chlorotoluene	95-49-8	18.6		1.00	0.125
4-Chlorotoluene	106-43-4	21.1		1.00	0.250
Acetone	67-64-1	28.4		10.0	2.50
Benzene	71-43-2	19.9		0.400	0.125
Bromobenzene	108-86-1	20.1		1.00	0.125
Bromochloromethane	74-97-5	20.1		1.00	0.200
Bromodichloromethane	75-27-4	19.6		0.500	0.250
Bromoform	75-25-2	17.6		1.00	0.500
Bromomethane	74-83-9	19.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.8		1.00	0.500
Carbon tetrachloride	56-23-5	20.0		1.00	0.250
Chlorobenzene	108-90-7	20.3		0.500	0.125
Chloroethane	75-00-3	21.0		1.00	0.500
Chloroform	67-66-3	18.9		0.300	0.125
Chloromethane	74-87-3	19.1	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.2		0.500	0.250
Dibromochloromethane	124-48-1	20.2		0.500	0.250
Dibromomethane	74-95-3	20.6		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.8		1.00	0.250
Ethylbenzene	100-41-4	20.2		1.00	0.250
Hexachlorobutadiene	87-68-3	20.6		0.600	0.250
Isopropylbenzene	98-82-8	20.4		1.00	0.250
Methylene chloride	75-09-2	18.2		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.3		5.00	0.500
MEK (2-Butanone)	78-93-3	21.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.6		10.0	2.50
n-Butylbenzene	104-51-8	21.7		1.00	0.250
n-Propylbenzene	103-65-1	20.4		1.00	0.125
m-,p-Xylene	179601-23-1	42.7		2.00	0.500
Naphthalene	91-20-3	23.2		1.00	0.200
o-Xylene	95-47-6	20.3		1.00	0.250
p-Isopropyltoluene	99-87-6	20.9		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	22.5		1.00	0.125
Trichloroethene	79-01-6	27.0		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	30.8		1.00	0.250
Toluene	108-88-3	19.4		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	19.6		1.00	0.250
Vinyl chloride	75-01-4	19.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.2	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041069-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 19:01
Collect Date:	04/19/2017 15:43	**Dilution:**	1	**File ID:**	11M17654
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	21.2		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.7		1.00	0.250
1,1-Dichloroethane	75-34-3	20.3		1.00	0.125
1,1-Dichloroethene	75-35-4	19.3		1.00	0.500
1,1-Dichloropropene	563-58-6	19.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	20.9		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	21.3		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.1		2.00	1.00
1,2-Dichloropropane	78-87-5	20.4		1.00	0.200
1,2-Dibromoethane	106-93-4	19.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.8		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.4		1.00	0.250
1,3-Dichloropropane	142-28-9	21.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.4		0.500	0.125
1-Chlorohexane	544-10-5	22.7		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	22.3		10.0	2.50
2-Chlorotoluene	95-49-8	18.2		1.00	0.125
4-Chlorotoluene	106-43-4	20.7		1.00	0.250
Acetone	67-64-1	25.8		10.0	2.50
Benzene	71-43-2	20.5		0.400	0.125
Bromobenzene	108-86-1	20.0		1.00	0.125
Bromochloromethane	74-97-5	20.1		1.00	0.200
Bromodichloromethane	75-27-4	19.7		0.500	0.250
Bromoform	75-25-2	17.8		1.00	0.500
Bromomethane	74-83-9	20.2		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.2		1.00	0.500
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	20.8		0.500	0.125
Chloroethane	75-00-3	21.6		1.00	0.500
Chloroform	67-66-3	19.1		0.300	0.125
Chloromethane	74-87-3	19.5	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.6		0.500	0.250
Dibromochloromethane	124-48-1	20.3		0.500	0.250
Dibromomethane	74-95-3	21.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.7		1.00	0.250
Ethylbenzene	100-41-4	20.7		1.00	0.250
Hexachlorobutadiene	87-68-3	20.8		0.600	0.250
Isopropylbenzene	98-82-8	20.8		1.00	0.250
Methylene chloride	75-09-2	18.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	20.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.4		10.0	2.50
n-Butylbenzene	104-51-8	21.5		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	43.5		2.00	0.500
Naphthalene	91-20-3	22.5		1.00	0.200
o-Xylene	95-47-6	21.1		1.00	0.250
p-Isopropyltoluene	99-87-6	20.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.7		1.00	0.250
Styrene	100-42-5	23.0		1.00	0.125
Trichloroethene	79-01-6	27.1		1.00	0.250
tert-Butylbenzene	98-06-6	19.7		1.00	0.250
Tetrachloroethene	127-18-4	31.5		1.00	0.250
Toluene	108-88-3	19.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.1		1.00	0.250
Vinyl chloride	75-01-4	19.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.2	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	98.4	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041069-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-197A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 22:56
Collect Date:	04/19/2017 16:00	**Dilution:**	1	**File ID:**	11M17663
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.02	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.659	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.08		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.8	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-197B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 23:25
Collect Date:	04/19/2017 16:05	**Dilution:**	1	**File ID:**	11M17664
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.03	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.32		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.62	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	11.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	6.25		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.3	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-203A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/21/2017 23:54
Collect Date:	04/19/2017 16:25	**Dilution:**	1	**File ID:**	11M17665
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	20.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	27.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	7.79		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.373	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-203B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/22/2017 00:24
Collect Date:	04/19/2017 16:30	**Dilution:**	1	**File ID:**	11M17666
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.496	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	47.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.26	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.7		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.00		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.836	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.8	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-210A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/22/2017 00:54
Collect Date:	04/19/2017 16:46	**Dilution:**	1	**File ID:**	11M17667
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.14		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.767	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.76		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.88		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	93.5	85	115	
1,2-Dichloroethane-d4	96.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-210B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/22/2017 01:24
Collect Date:	04/19/2017 16:52	**Dilution:**	1	**File ID:**	11M17668
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.03	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.769	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	17.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.70		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.2	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-277-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/14/2017 18:09
Workgroup #:	WG611145	**Analyst:**	JDS	**Run Date:**	04/22/2017 01:53
Collect Date:	04/19/2017 15:21	**Dilution:**	1	**File ID:**	11M17669
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.31	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.8	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-280-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611561	**Analyst:**	TMB	**Run Date:**	04/26/2017 12:27
Collect Date:	04/19/2017 11:16	**Dilution:**	1	**File ID:**	8M419173
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	3.24		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.203	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.95		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.87		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-98-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611222	**Analyst:**	JDS	**Run Date:**	04/22/2017 23:03
Collect Date:	04/20/2017 07:55	**Dilution:**	1	**File ID:**	6M146655
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		Q	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.56		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.3		1.00	0.250
Toluene	108-88-3	1.69		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-6	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 14:45
Collect Date:	04/20/2017 07:58	**Dilution:**	1	**File ID:**	8M419122
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.18		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.08	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.85		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.253	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611222	**Analyst:**	JDS	**Run Date:**	04/22/2017 23:33
Collect Date:	04/20/2017 08:05	**Dilution:**	1	**File ID:**	6M146656
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		Q	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.32	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.53		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.34	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.13		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611222	**Analyst:**	JDS	**Run Date:**	04/23/2017 00:03
Collect Date:	04/20/2017 08:10	**Dilution:**	1	**File ID:**	6M146657
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		Q	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.83		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.71	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.50		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.00		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.810	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-39A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 15:16
Collect Date:	04/20/2017 08:21	**Dilution:**	1	**File ID:**	8M419123
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	5.05		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.47		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.42		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.01		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-39-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 15:46
Collect Date:	04/20/2017 08:26	**Dilution:**	1	**File ID:**	8M419124
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.86	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.23		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.16	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.63		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.31		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-206B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 16:17
Collect Date:	04/20/2017 08:37	**Dilution:**	1	**File ID:**	8M419125
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.29	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.93		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.16	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.88		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041069-50	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-206A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 16:48
Collect Date:	04/20/2017 08:42	**Dilution:**	1	**File ID:**	8M419126
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.39	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.02		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.35		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Microbac

Lab Report #: L17041069
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041069
Department: Volatiles
Analyst: Jared Smith

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: All acceptance criteria were met.

Continuing Calibration and Tune: Bromomethane was below the LCL in CCV WG611068-02 analyzed 04/21/2017 on HPMS6, Chloromethane was below the LCL in CCV WG611143-02 analyzed 04/21/2017 on HPMS11, 1,2,3-Trichlorobenzene was below the LCL in CCV WG611221-02 analyzed 04/22/2017 on HPMS6, Bromomethane exceeded the UCL in CCV WG611300-02 analyzed 04/24/2017 on HPMS8. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: MS/MSD performed on sample 26 has recoveries out of range for 2,2-Dichloropropane and

Trichloroethene, and RPD results outside control limits for 2,2-Dichloropropane. MS/MSD performed on sample 07 has recoveries out of range for cis-1,2-Dichloroethene. All other acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Samples 13, were run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

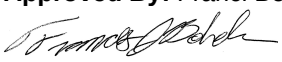
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124732
Approved By: Franci Bolden



Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611145
Blank File ID: 11M17651
Blank Sample ID: WG611145-01
Prep Date: 04/21/17 17:33
Instrument ID: HPMS11
Analyzed Date: 04/21/17 17:33
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611145-02	11M17652	04/21/17 18:02	01
MW-204B-LS-25	L17041069-33	11M17653	04/21/17 18:31	01
MW-204B-LS-25	L17041069-34	11M17654	04/21/17 19:01	01
MW-204B-LS-25	L17041069-32	11M17659	04/21/17 20:58	01
MW-271-LS-25	L17041069-29	11M17660	04/21/17 21:27	01
MW-97-LS-25	L17041069-30	11M17661	04/21/17 21:57	01
MW-204A-LS-25	L17041069-31	11M17662	04/21/17 22:26	01
MW-197A-LS-25	L17041069-35	11M17663	04/21/17 22:56	01
MW-197B-LS-25	L17041069-36	11M17664	04/21/17 23:25	01
MW-203A-LS-25	L17041069-37	11M17665	04/21/17 23:54	01
MW-203B-LS-25	L17041069-38	11M17666	04/22/17 00:24	01
MW-210A-LS-25	L17041069-39	11M17667	04/22/17 00:54	01
MW-210B-LS-25	L17041069-40	11M17668	04/22/17 01:24	01
MW-277-LS-25	L17041069-41	11M17669	04/22/17 01:53	01
MW-217-LS-25	L17041069-20	11M17670	04/22/17 02:22	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611071
Blank File ID: 6M146601
Blank Sample ID: WG611071-01
Prep Date: 04/21/17 14:56
Instrument ID: HPMS6
Analyzed Date: 04/21/17 14:56
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611071-02	6M146607	04/21/17 18:01	01
MW-259-LS-25	L17041069-27	6M146608	04/21/17 18:31	01
MW-259-LS-25	L17041069-28	6M146609	04/21/17 19:02	01
MW-64-LS-25	L17041069-21	6M146611	04/21/17 20:03	01
MW-259-LS-25	L17041069-26	6M146612	04/21/17 20:34	01
MW-272-LS-25	L17041069-25	6M146613	04/21/17 21:04	01
MW-270-LS-25	L17041069-24	6M146614	04/21/17 21:35	01
MW-268-LS-25	L17041069-23	6M146615	04/21/17 22:05	01
MW-218-LS-25	L17041069-22	6M146616	04/21/17 22:35	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Blank File ID: 6M146641
Prep Date: 04/22/17 15:55
Analyzed Date: 04/22/17 15:55
Analyst: JDS

Work Group: WG611222
Blank Sample ID: WG611222-01
Instrument ID: HPMS6
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611222-02	6M146642	04/22/17 16:26	01
LCS	WG611222-06	6M146645	04/22/17 17:57	02
MW-98-LS-25	L17041069-43	6M146655	04/22/17 23:03	01
MW-205A-LS-25	L17041069-45	6M146656	04/22/17 23:33	01
MW-205B-LS-25	L17041069-46	6M146657	04/23/17 00:03	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611120
Blank File ID: 8M419090
Blank Sample ID: WG611120-01
Prep Date: 04/21/17 14:04
Instrument ID: HPMS8
Analyzed Date: 04/21/17 14:04
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611120-02	8M419091	04/21/17 14:34	01
PMW92-03-LS-25	L17041069-08	8M419092	04/21/17 15:04	01
PMW92-03-LS-25	L17041069-09	8M419093	04/21/17 15:34	01
PMW92-03-LS-25	L17041069-07	8M419095	04/21/17 16:33	01
DR2-3-LS-25	L17041069-05	8M419096	04/21/17 17:04	01
DR2-2-LS-25	L17041069-15	8M419097	04/21/17 17:34	01
MW-266-LS-25	L17041069-16	8M419098	04/21/17 18:03	01
MW-26-LS-25	L17041069-18	8M419099	04/21/17 18:34	01
PMW-85-05-LS-25	L17041069-04	8M419100	04/21/17 19:03	01
PMW-85-01-LS-25	L17041069-02	8M419101	04/21/17 19:33	01
MW-113-LS-25	L17041069-06	8M419102	04/21/17 20:03	01
MW-85-LS-25	L17041069-01	8M419103	04/21/17 20:33	01
PMW92-02-LS-25	L17041069-10	8M419104	04/21/17 21:03	01
MW-92-LS-25	L17041069-12	8M419105	04/21/17 21:32	01
DR2-6-LS-25	L17041069-19	8M419106	04/21/17 22:02	01
DR2-1-LS-25	L17041069-13	8M419107	04/21/17 22:32	01
MW-88-LS-25	L17041069-14	8M419108	04/21/17 23:02	01
MW-267-LS-25	L17041069-17	8M419109	04/21/17 23:32	01
DUP-10	L17041069-03	8M419110	04/22/17 00:03	01
DUP-3	L17041069-11	8M419111	04/22/17 00:33	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Blank File ID: 8M419118
Prep Date: 04/24/17 12:42
Analyzed Date: 04/24/17 12:42
Analyst: TMB

Work Group: WG611301
Blank Sample ID: WG611301-01
Instrument ID: HPMS8
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611301-02	8M419119	04/24/17 13:13	01
LCS2	WG611301-03	8M419120	04/24/17 13:44	01
DR2-1-LS-25	L17041069-13	8M419121	04/24/17 14:14	DL01
DUP-6	L17041069-44	8M419122	04/24/17 14:45	01
MW-39A-LS-25	L17041069-47	8M419123	04/24/17 15:16	01
MW-39-LS-25	L17041069-48	8M419124	04/24/17 15:46	01
MW-206B-LS-25	L17041069-49	8M419125	04/24/17 16:17	01
MW-206A-LS-25	L17041069-50	8M419126	04/24/17 16:48	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041069	Work Group:	WG611561
Blank File ID:	8M419167	Blank Sample ID:	WG611561-01
Prep Date:	04/26/17 09:27	Instrument ID:	HPMS8
Analyzed Date:	04/26/17 09:27	Method:	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611561-02	8M419168	04/26/17 09:56	01
LCS2	WG611561-03	8M419169	04/26/17 10:27	01
MW-280-LS-25	L17041069-42	8M419173	04/26/17 12:27	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 17:33 Sample ID:WG611145-01
Instrument ID:HPMS11 Run Date:04/21/17 17:33 Prep Method:5030B/5030C/503
File ID:11M17651 Analyst:JDS Method:8260B
Workgroup (AAB#):WG611145 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-14-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 17:33 Sample ID:WG611145-01
Instrument ID:HPMS11 Run Date:04/21/17 17:33 Prep Method:5030B/5030C/503
File ID:11M17651 Analyst:JDS Method:8260B
Workgroup (AAB#):WG611145 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-14-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	95.8	85 - 115	PASS
1,2-Dichloroethane-d4	98.7	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 14:56 Sample ID:WG611071-01
Instrument ID:HPMS6 Run Date:04/21/17 14:56 Prep Method:5030B/5030C/503
File ID:6M146601 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611071 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/21/17 14:56 Sample ID: WG611071-01
Instrument ID: HPMS6 Run Date: 04/21/17 14:56 Prep Method: 5030B/5030C/503
File ID: 6M146601 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	105	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	107	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/22/17 15:55 Sample ID:WG611222-01
Instrument ID:HPMS6 Run Date:04/22/17 15:55 Prep Method:5030B/5030C/503
File ID:6M146641 Analyst:JDS Method:8260B
Workgroup (AAB#):WG611222 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/22/17 15:55 Sample ID: WG611222-01
Instrument ID: HPMS6 Run Date: 04/22/17 15:55 Prep Method: 5030B/5030C/503
File ID: 6M146641 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	105	85	-	115	PASS
1,2-Dichloroethane-d4	107	72	-	119	PASS
Toluene-d8	103	81	-	120	PASS
4-Bromofluorobenzene	106	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 14:04 Sample ID:WG611120-01
Instrument ID:HPMS8 Run Date:04/21/17 14:04 Prep Method:5030B/5030C/503
File ID:8M419090 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611120 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/21/17 14:04 Sample ID: WG611120-01
Instrument ID: HPMS8 Run Date: 04/21/17 14:04 Prep Method: 5030B/5030C/503
File ID: 8M419090 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	101	85	-	115	PASS
1,2-Dichloroethane-d4	103	72	-	119	PASS
Toluene-d8	106	81	-	120	PASS
4-Bromofluorobenzene	104	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
25-JUL-2017 12:53

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/24/17 12:42 Sample ID:WG611301-01
Instrument ID:HPMS8 Run Date:04/24/17 12:42 Prep Method:5030B/5030C/503
File ID:8M419118 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611301 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/24/17 12:42 Sample ID: WG611301-01
Instrument ID: HPMS8 Run Date: 04/24/17 12:42 Prep Method: 5030B/5030C/503
File ID: 8M419118 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611301 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	102	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
25-JUL-2017 12:53

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/26/17 09:27 Sample ID:WG611561-01
Instrument ID:HPMS8 Run Date:04/26/17 09:27 Prep Method:5030B/5030C/503
File ID:8M419167 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611561 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/26/17 09:27 Sample ID: WG611561-01
Instrument ID: HPMS8 Run Date: 04/26/17 09:27 Prep Method: 5030B/5030C/503
File ID: 8M419167 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611561 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
25-JUL-2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611145-02
Instrument ID: HPMS11 Run Time: 18:02 Prep Method: 5030B/5030C/503
File ID: 11M17652 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611145 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS11-14-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.8	104	81 - 129	
1,1,1-Trichloroethane	20.0	20.7	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.8	104	63 - 128	
1,1,2-Trichloroethane	20.0	20.1	101	75 - 125	
1,1-Dichloroethane	20.0	20.1	100	69 - 133	
1,1-Dichloroethene	20.0	18.8	94.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.4	73 - 132	
1,2,3-Trichlorobenzene	20.0	21.3	106	67 - 137	
1,2,3-Trichloropropane	20.0	20.8	104	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.6	108	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.4	96.8	69 - 132	
1,2-Dichlorobenzene	20.0	20.7	104	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.6	108	50 - 132	
1,2-Dichloropropane	20.0	20.1	101	75 - 125	
1,2-Dibromoethane	20.0	20.1	101	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	102	74 - 131	
1,3-Dichlorobenzene	20.0	20.5	102	75 - 124	
1,3-Dichloropropane	20.0	21.1	105	73 - 126	
1,4-Dichlorobenzene	20.0	20.6	103	74 - 123	
1-Chlorohexane	20.0	22.9	115	70 - 125	
2,2-Dichloropropane	20.0	17.9	89.7	69 - 137	
2-Hexanone	20.0	22.4	112	55 - 130	
2-Chlorotoluene	20.0	18.7	93.4	73 - 126	
4-Chlorotoluene	20.0	21.2	106	74 - 128	
Acetone	20.0	19.7	98.6	40 - 135	
Benzene	20.0	20.3	101	81 - 122	
Bromobenzene	20.0	20.8	104	76 - 124	
Bromochloromethane	20.0	20.2	101	65 - 129	
Bromodichloromethane	20.0	19.4	97.0	76 - 121	
Bromoform	20.0	18.2	91.1	69 - 128	
Bromomethane	20.0	20.3	101	30 - 141	
Carbon disulfide	20.0	17.7	88.4	58 - 128	
Carbon tetrachloride	20.0	20.3	101	66 - 138	
Chlorobenzene	20.0	20.8	104	81 - 122	
Chloroethane	20.0	22.0	110	58 - 133	
Chloroform	20.0	18.7	93.6	69 - 128	
Chloromethane	20.0	19.7	98.6	56 - 131	
cis-1,2-Dichloroethene	20.0	20.0	100	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	109	69 - 131	
Dibromochloromethane	20.0	20.8	104	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611145-02
Instrument ID: HPMS11 Run Time: 18:02 Prep Method: 5030B/5030C/503
File ID: 11M17652 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611145 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS11-14-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.6	103	76 - 125	
Dichlorodifluoromethane	20.0	23.0	115	30 - 153	
Ethylbenzene	20.0	20.7	103	73 - 127	
Hexachlorobutadiene	20.0	20.2	101	67 - 131	
Isopropylbenzene	20.0	20.6	103	75 - 127	
Methylene chloride	20.0	18.3	91.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.1	100	65 - 123	
MEK (2-Butanone)	20.0	21.0	105	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.4	102	58 - 134	
n-Butylbenzene	20.0	21.2	106	69 - 137	
n-Propylbenzene	20.0	20.5	102	72 - 129	
m-,p-Xylene	40.0	43.4	108	76 - 128	
Naphthalene	20.0	22.9	114	54 - 138	
o-Xylene	20.0	20.8	104	80 - 121	
p-Isopropyltoluene	20.0	21.1	106	73 - 130	
sec-Butylbenzene	20.0	20.2	101	72 - 127	
Styrene	20.0	22.7	113	65 - 134	
Trichloroethene	20.0	19.7	98.4	70 - 127	
tert-Butylbenzene	20.0	20.5	103	70 - 129	
Tetrachloroethene	20.0	19.8	99.1	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	19.5	97.4	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	104	59 - 135	
Trichlorofluoromethane	20.0	19.8	99.0	57 - 129	
Vinyl chloride	20.0	19.9	99.4	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611071-02
Instrument ID: HPMS6 Run Time: 18:01 Prep Method: 5030B/5030C/503
File ID: 6M146607 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.7	93.3	81 - 129	
1,1,1-Trichloroethane	20.0	20.9	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.3	91.3	63 - 128	
1,1,2-Trichloroethane	20.0	19.1	95.7	75 - 125	
1,1-Dichloroethane	20.0	21.0	105	69 - 133	
1,1-Dichloroethene	20.0	20.6	103	68 - 130	
1,1-Dichloropropene	20.0	20.4	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.7	88.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.0	94.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.6	93.1	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.1	95.7	74 - 132	
1,2-Dichloroethane	20.0	20.4	102	69 - 132	
1,2-Dichlorobenzene	20.0	18.1	90.3	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	17.7	88.6	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	18.6	92.8	80 - 121	
1,3,5-Trimethylbenzene	20.0	18.9	94.6	74 - 131	
1,3-Dichlorobenzene	20.0	17.9	89.6	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.2	91.1	74 - 123	
1-Chlorohexane	20.0	20.1	100	70 - 125	
2,2-Dichloropropane	20.0	15.0	75.1	69 - 137	
2-Hexanone	20.0	20.3	102	55 - 130	
2-Chlorotoluene	20.0	17.1	85.3	73 - 126	
4-Chlorotoluene	20.0	20.8	104	74 - 128	
Acetone	20.0	21.8	109	40 - 135	
Benzene	20.0	19.6	97.8	81 - 122	
Bromobenzene	20.0	18.4	92.2	76 - 124	
Bromochloromethane	20.0	20.1	101	65 - 129	
Bromodichloromethane	20.0	20.1	100	76 - 121	
Bromoform	20.0	17.6	88.1	69 - 128	
Bromomethane	20.0	11.8	59.2	30 - 141	
Carbon disulfide	20.0	17.5	87.4	58 - 128	
Carbon tetrachloride	20.0	22.3	112	66 - 138	
Chlorobenzene	20.0	18.6	93.2	81 - 122	
Chloroethane	20.0	22.9	115	58 - 133	
Chloroform	20.0	19.1	95.6	69 - 128	
Chloromethane	20.0	22.1	110	56 - 131	
cis-1,2-Dichloroethene	20.0	19.9	99.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.2	106	69 - 131	
Dibromochloromethane	20.0	18.6	93.2	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611071-02
Instrument ID: HPMS6 Run Time: 18:01 Prep Method: 5030B/5030C/503
File ID: 6M146607 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.0	100	76 - 125	
Dichlorodifluoromethane	20.0	24.0	120	30 - 153	
Ethylbenzene	20.0	18.8	94.2	73 - 127	
Hexachlorobutadiene	20.0	18.2	91.0	67 - 131	
Isopropylbenzene	20.0	19.0	94.9	75 - 127	
Methylene chloride	20.0	19.6	98.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.9	105	65 - 123	
MEK (2-Butanone)	20.0	20.5	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.1	100	58 - 134	
n-Butylbenzene	20.0	19.4	97.1	69 - 137	
n-Propylbenzene	20.0	18.9	94.5	72 - 129	
m-,p-Xylene	40.0	37.6	94.0	76 - 128	
Naphthalene	20.0	18.6	92.9	54 - 138	
o-Xylene	20.0	18.9	94.4	80 - 121	
p-Isopropyltoluene	20.0	19.0	94.8	73 - 130	
sec-Butylbenzene	20.0	18.9	94.5	72 - 127	
Styrene	20.0	19.3	96.4	65 - 134	
Trichloroethene	20.0	19.6	98.1	70 - 127	
tert-Butylbenzene	20.0	18.9	94.4	70 - 129	
Tetrachloroethene	20.0	19.4	96.8	66 - 128	
Toluene	20.0	19.1	95.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.6	97.8	63 - 137	
trans-1,3-Dichloropropene	20.0	18.9	94.7	59 - 135	
Trichlorofluoromethane	20.0	20.8	104	57 - 129	
Vinyl chloride	20.0	21.8	109	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	103	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611222-02
Instrument ID: HPMS6 Run Time: 16:26 Prep Method: 5030B/5030C/503
File ID: 6M146642 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.0	89.9	81 - 129	
1,1,1-Trichloroethane	20.0	20.2	101	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.7	93.3	63 - 128	
1,1,2-Trichloroethane	20.0	18.9	94.5	75 - 125	
1,1-Dichloroethane	20.0	20.6	103	69 - 133	
1,1-Dichloroethene	20.0	20.5	102	68 - 130	
1,1-Dichloropropene	20.0	20.0	99.9	73 - 132	
1,2,3-Trichlorobenzene	20.0	15.8	79.1	67 - 137	
1,2,3-Trichloropropane	20.0	18.8	93.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	17.1	85.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	18.5	92.7	74 - 132	
1,2-Dichloroethane	20.0	20.4	102	69 - 132	
1,2-Dichlorobenzene	20.0	17.6	88.0	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	17.6	87.8	50 - 132	
1,2-Dichloropropane	20.0	20.2	101	75 - 125	
1,2-Dibromoethane	20.0	18.6	93.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	18.1	90.7	74 - 131	
1,3-Dichlorobenzene	20.0	17.4	87.0	75 - 124	
1,3-Dichloropropane	20.0	20.1	101	73 - 126	
1,4-Dichlorobenzene	20.0	17.6	87.9	74 - 123	
1-Chlorohexane	20.0	19.5	97.4	70 - 125	
2,2-Dichloropropane	20.0	16.2	81.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	16.5	82.5	73 - 126	
4-Chlorotoluene	20.0	19.8	99.2	74 - 128	
Acetone	20.0	23.3	116	40 - 135	
Benzene	20.0	19.4	97.1	81 - 122	
Bromobenzene	20.0	17.5	87.7	76 - 124	
Bromochloromethane	20.0	20.7	104	65 - 129	
Bromodichloromethane	20.0	19.6	98.2	76 - 121	
Bromoform	20.0	17.7	88.6	69 - 128	
Bromomethane	20.0	13.8	69.1	30 - 141	
Carbon disulfide	20.0	17.3	86.3	58 - 128	
Carbon tetrachloride	20.0	21.1	105	66 - 138	
Chlorobenzene	20.0	18.1	90.4	81 - 122	
Chloroethane	20.0	23.0	115	58 - 133	
Chloroform	20.0	19.0	94.8	69 - 128	
Chloromethane	20.0	23.2	116	56 - 131	
cis-1,2-Dichloroethene	20.0	19.4	97.2	72 - 126	
cis-1,3-Dichloropropene	20.0	21.1	106	69 - 131	
Dibromochloromethane	20.0	18.3	91.6	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611222-02
Instrument ID: HPMS6 Run Time: 16:26 Prep Method: 5030B/5030C/503
File ID: 6M146642 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	24.1	120	30 - 153	
Ethylbenzene	20.0	18.0	89.8	73 - 127	
Hexachlorobutadiene	20.0	16.8	84.1	67 - 131	
Isopropylbenzene	20.0	18.5	92.4	75 - 127	
Methylene chloride	20.0	20.0	99.9	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.5	102	65 - 123	
MEK (2-Butanone)	20.0	21.1	105	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.2	106	58 - 134	
n-Butylbenzene	20.0	18.8	94.0	69 - 137	
n-Propylbenzene	20.0	17.8	89.1	72 - 129	
m-,p-Xylene	40.0	37.1	92.7	76 - 128	
Naphthalene	20.0	16.9	84.5	54 - 138	
o-Xylene	20.0	18.6	92.9	80 - 121	
p-Isopropyltoluene	20.0	18.1	90.7	73 - 130	
sec-Butylbenzene	20.0	17.7	88.4	72 - 127	
Styrene	20.0	19.1	95.7	65 - 134	
Trichloroethene	20.0	18.0	90.0	70 - 127	
tert-Butylbenzene	20.0	17.8	89.2	70 - 129	
Tetrachloroethene	20.0	18.5	92.3	66 - 128	
Toluene	20.0	18.8	93.8	77 - 122	
trans-1,2-Dichloroethene	20.0	19.3	96.3	63 - 137	
trans-1,3-Dichloropropene	20.0	19.3	96.4	59 - 135	
Trichlorofluoromethane	20.0	20.6	103	57 - 129	
Vinyl chloride	20.0	22.7	114	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	106	85 - 115	PASS
1,2-Dichloroethane-d4	108	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611120-02
Instrument ID: HPMS8 Run Time: 14:34 Prep Method: 5030B/5030C/503
File ID: 8M419091 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.0	95.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.1	90.5	63 - 128	
1,1,2-Trichloroethane	20.0	18.3	91.5	75 - 125	
1,1-Dichloroethane	20.0	19.1	95.5	69 - 133	
1,1-Dichloroethene	20.0	18.8	94.1	68 - 130	
1,1-Dichloropropene	20.0	19.0	95.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	67 - 137	
1,2,3-Trichloropropane	20.0	18.4	92.2	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	93.8	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.4	74 - 132	
1,2-Dichloroethane	20.0	18.9	94.5	69 - 132	
1,2-Dichlorobenzene	20.0	18.8	93.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	16.7	83.7	50 - 132	
1,2-Dichloropropane	20.0	18.4	91.9	75 - 125	
1,2-Dibromoethane	20.0	18.8	93.8	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.4	97.0	74 - 131	
1,3-Dichlorobenzene	20.0	18.6	93.2	75 - 124	
1,3-Dichloropropane	20.0	18.9	94.3	73 - 126	
1,4-Dichlorobenzene	20.0	18.4	91.9	74 - 123	
1-Chlorohexane	20.0	21.0	105	70 - 125	
2,2-Dichloropropane	20.0	19.7	98.4	69 - 137	
2-Hexanone	20.0	17.8	88.9	55 - 130	
2-Chlorotoluene	20.0	17.7	88.5	73 - 126	
4-Chlorotoluene	20.0	19.7	98.3	74 - 128	
Acetone	20.0	17.3	86.7	40 - 135	
Benzene	20.0	19.3	96.4	81 - 122	
Bromobenzene	20.0	18.9	94.7	76 - 124	
Bromochloromethane	20.0	19.9	99.4	65 - 129	
Bromodichloromethane	20.0	19.0	94.9	76 - 121	
Bromoform	20.0	16.4	82.1	69 - 128	
Bromomethane	20.0	23.8	119	30 - 141	
Carbon disulfide	20.0	17.0	84.9	58 - 128	
Carbon tetrachloride	20.0	20.7	104	66 - 138	
Chlorobenzene	20.0	18.4	91.9	81 - 122	
Chloroethane	20.0	21.7	109	58 - 133	
Chloroform	20.0	18.0	90.0	69 - 128	
Chloromethane	20.0	20.9	104	56 - 131	
cis-1,2-Dichloroethene	20.0	19.1	95.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.2	101	69 - 131	
Dibromochloromethane	20.0	18.8	93.8	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611120-02
Instrument ID: HPMS8 Run Time: 14:34 Prep Method: 5030B/5030C/503
File ID: 8M419091 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.2	96.0	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	18.8	93.8	73 - 127	
Hexachlorobutadiene	20.0	18.6	93.2	67 - 131	
Isopropylbenzene	20.0	19.8	99.0	75 - 127	
Methylene chloride	20.0	18.8	94.0	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	18.1	90.7	65 - 123	
MEK (2-Butanone)	20.0	17.7	88.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	17.6	88.2	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	19.2	95.8	72 - 129	
m-,p-Xylene	40.0	39.7	99.3	76 - 128	
Naphthalene	20.0	18.5	92.6	54 - 138	
o-Xylene	20.0	18.9	94.7	80 - 121	
p-Isopropyltoluene	20.0	19.8	99.1	73 - 130	
sec-Butylbenzene	20.0	19.4	97.2	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	19.2	96.2	70 - 127	
tert-Butylbenzene	20.0	19.0	95.0	70 - 129	
Tetrachloroethene	20.0	20.3	101	66 - 128	
Toluene	20.0	19.7	98.5	77 - 122	
trans-1,2-Dichloroethene	20.0	18.8	93.9	63 - 137	
trans-1,3-Dichloropropene	20.0	18.4	91.8	59 - 135	
Trichlorofluoromethane	20.0	20.7	103	57 - 129	
Vinyl chloride	20.0	19.2	95.8	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	99.0	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.5	92.6	20.0	18.9	94.4	1.96	81 - 129	20	
1,1,1-Trichloroethane	20.0	19.8	98.8	20.0	20.2	101	2.41	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.0	89.8	20.0	18.5	92.3	2.82	63 - 128	20	
1,1,2-Trichloroethane	20.0	17.8	88.8	20.0	18.2	90.8	2.25	75 - 125	20	
1,1-Dichloroethane	20.0	18.9	94.5	20.0	19.1	95.7	1.27	69 - 133	20	
1,1-Dichloroethene	20.0	18.3	91.4	20.0	18.8	94.1	2.98	68 - 130	20	
1,1-Dichloropropene	20.0	18.8	93.8	20.0	19.2	95.9	2.19	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.4	92.1	20.0	18.9	94.5	2.58	67 - 137	20	
1,2,3-Trichloropropane	20.0	17.9	89.7	20.0	18.9	94.4	5.13	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	18.7	93.6	20.0	18.9	94.7	1.18	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.9	99.5	20.0	19.8	99.2	0.357	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	16.4	81.9	20.0	17.1	85.3	4.07	50 - 132	20	
1,2-Dibromoethane	20.0	18.1	90.4	20.0	18.8	93.8	3.71	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.5	92.5	20.0	18.9	94.3	1.98	71 - 122	20	
1,2-Dichloroethane	20.0	18.6	93.0	20.0	19.5	97.3	4.55	69 - 132	20	
1,2-Dichloropropane	20.0	18.6	93.2	20.0	18.8	94.1	0.974	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	20.0	19.5	97.5	0.252	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.6	92.8	20.0	18.8	93.8	1.08	75 - 124	20	
1,3-Dichloropropane	20.0	18.5	92.5	20.0	19.1	95.7	3.36	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.2	90.9	20.0	18.4	92.2	1.48	74 - 123	20	
1-Chlorohexane	20.0	21.0	105	20.0	20.8	104	1.02	70 - 125	20	
2,2-Dichloropropane	20.0	19.0	94.9	20.0	19.9	99.4	4.54	69 - 137	20	
MEK (2-Butanone)	20.0	16.6	83.1	20.0	17.8	89.2	7.06	49 - 136	20	
2-Chlorotoluene	20.0	17.4	87.1	20.0	17.1	85.6	1.79	73 - 126	20	
2-Hexanone	20.0	17.8	89.0	20.0	18.5	92.3	3.68	55 - 130	20	
4-Chlorotoluene	20.0	19.9	99.7	20.0	20.4	102	2.11	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	17.3	86.4	20.0	19.1	95.7	10.3	58 - 134	20	
Acetone	20.0	17.4	86.9	20.0	18.4	91.8	5.46	40 - 135	20	
Benzene	20.0	19.3	96.6	20.0	19.5	97.5	0.954	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.6	0.924	76 - 124	20	
Bromochloromethane	20.0	19.6	97.8	20.0	19.9	99.7	2.00	65 - 129	20	
Bromodichloromethane	20.0	18.5	92.7	20.0	19.3	96.4	3.89	76 - 121	20	
Bromoform	20.0	15.6	77.8	20.0	16.2	81.1	4.14	69 - 128	20	
Bromomethane	20.0	20.8	104	20.0	22.6	113	8.15	30 - 141	20	
Carbon disulfide	20.0	16.8	84.2	20.0	17.3	86.3	2.56	58 - 128	20	
Carbon tetrachloride	20.0	19.8	98.8	20.0	20.5	102	3.39	66 - 138	20	
Chlorobenzene	20.0	18.4	92.0	20.0	18.3	91.5	0.590	81 - 122	20	
Chloroethane	20.0	21.1	106	20.0	21.7	108	2.61	58 - 133	20	
Chloroform	20.0	17.9	89.4	20.0	17.9	89.7	0.264	69 - 128	20	
Chloromethane	20.0	20.9	104	20.0	21.3	106	1.96	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5261267
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.0	95.2	20.0	19.4	97.2	2.02	72 - 126	20	
cis-1,3-Dichloropropene	20.0	19.9	99.7	20.0	20.3	101	1.63	69 - 131	20	
Dibromochloromethane	20.0	18.4	92.1	20.0	18.3	91.6	0.462	66 - 133	20	
Dibromomethane	20.0	18.8	94.1	20.0	19.3	96.3	2.30	76 - 125	20	
Dichlorodifluoromethane	20.0	20.7	104	20.0	21.9	109	5.33	30 - 153	20	
Ethylbenzene	20.0	18.4	91.9	20.0	18.6	93.1	1.29	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.7	93.4	2.69	67 - 131	20	
Isopropylbenzene	20.0	19.4	97.2	20.0	19.7	98.3	1.18	75 - 127	20	
m-,p-Xylene	40.0	38.9	97.3	40.0	39.4	98.6	1.27	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	17.9	89.5	20.0	19.0	94.9	5.83	65 - 123	20	
Methylene chloride	20.0	18.1	90.4	20.0	18.7	93.4	3.20	63 - 137	20	
n-Butylbenzene	20.0	20.2	101	20.0	20.2	101	0.0393	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.1	20.0	19.4	97.0	1.02	72 - 129	20	
Naphthalene	20.0	18.6	92.9	20.0	19.0	95.2	2.52	54 - 138	20	
o-Xylene	20.0	18.5	92.6	20.0	18.8	93.8	1.28	80 - 121	20	
p-Isopropyltoluene	20.0	19.9	99.3	20.0	20.1	101	1.42	73 - 130	20	
sec-Butylbenzene	20.0	19.4	96.8	20.0	19.6	97.8	1.01	72 - 127	20	
Styrene	20.0	20.0	100	20.0	20.2	101	0.654	65 - 134	20	
tert-Butylbenzene	20.0	18.5	92.3	20.0	18.7	93.7	1.48	70 - 129	20	
Tetrachloroethene	20.0	19.6	98.1	20.0	19.7	98.6	0.502	66 - 128	20	
Toluene	20.0	19.6	97.8	20.0	19.6	97.8	0.0167	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.4	92.1	20.0	19.1	95.4	3.52	63 - 137	20	
trans-1,3-Dichloropropene	20.0	17.8	89.1	20.0	18.3	91.5	2.62	59 - 135	20	
Trichloroethene	20.0	18.5	92.3	20.0	19.1	95.7	3.62	70 - 127	20	
Trichlorofluoromethane	20.0	19.7	98.3	20.0	20.1	101	2.41	57 - 129	20	
Vinyl chloride	20.0	19.6	98.1	20.0	19.4	97.2	0.875	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	98.2	99.9	72 - 119	PASS
Dibromofluoromethane	101	101	85 - 115	PASS
4-Bromofluorobenzene	101	101	76 - 119	PASS
Toluene-d8	107	105	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5261267
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	20.0	18.9	94.3	0.0705	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.0	99.8	20.0	20.1	100	0.625	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.8	98.9	20.0	19.0	95.1	3.91	63 - 128	20	
1,1,2-Trichloroethane	20.0	18.9	94.7	20.0	18.4	92.2	2.66	75 - 125	20	
1,1-Dichloroethane	20.0	19.1	95.5	20.0	19.2	96.1	0.605	69 - 133	20	
1,1-Dichloroethene	20.0	18.6	92.8	20.0	18.6	93.2	0.473	68 - 130	20	
1,1-Dichloropropene	20.0	19.1	95.6	20.0	19.5	97.4	1.85	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.3	96.5	20.0	18.9	94.3	2.24	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.9	99.6	20.0	19.2	95.9	3.79	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	94.9	20.0	18.9	94.7	0.183	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	20.0	19.8	98.9	0.263	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.8	89.0	20.0	16.3	81.5	8.79	50 - 132	20	
1,2-Dibromoethane	20.0	19.3	96.7	20.0	18.8	93.9	2.94	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.9	94.4	20.0	18.5	92.7	1.82	71 - 122	20	
1,2-Dichloroethane	20.0	19.9	99.3	20.0	19.1	95.5	3.91	69 - 132	20	
1,2-Dichloropropane	20.0	19.3	96.6	20.0	19.2	96.0	0.658	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.0	95.1	20.0	19.3	96.5	1.41	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.5	92.3	20.0	18.5	92.4	0.160	75 - 124	20	
1,3-Dichloropropane	20.0	19.9	99.6	20.0	19.5	97.6	2.07	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.4	91.9	20.0	18.2	91.1	0.810	74 - 123	20	
1-Chlorohexane	20.0	21.9	109	20.0	21.9	109	0.188	70 - 125	20	
2,2-Dichloropropane	20.0	19.1	95.5	20.0	20.0	100	4.77	69 - 137	20	
MEK (2-Butanone)	20.0	20.5	103	20.0	19.8	98.8	3.66	49 - 136	20	
2-Chlorotoluene	20.0	17.8	88.9	20.0	17.9	89.3	0.412	73 - 126	20	
2-Hexanone	20.0	20.7	103	20.0	19.5	97.5	5.81	55 - 130	20	
4-Chlorotoluene	20.0	19.4	97.2	20.0	19.7	98.6	1.49	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	21.0	105	20.0	19.2	96.2	8.91	58 - 134	20	
Acetone	20.0	20.5	103	20.0	18.7	93.3	9.55	40 - 135	20	
Benzene	20.0	19.5	97.7	20.0	19.5	97.7	0.0311	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.3	0.515	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	19.8	99.0	1.20	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.1	20.0	19.3	96.5	0.385	76 - 121	20	
Bromoform	20.0	16.8	84.0	20.0	15.8	78.8	6.28	69 - 128	20	
Bromomethane	20.0	23.8	119	20.0	25.9	130	8.66	30 - 141	20	
Carbon disulfide	20.0	16.2	80.9	20.0	16.1	80.5	0.442	58 - 128	20	
Carbon tetrachloride	20.0	20.3	102	20.0	20.4	102	0.314	66 - 138	20	
Chlorobenzene	20.0	18.3	91.3	20.0	18.4	91.8	0.577	81 - 122	20	
Chloroethane	20.0	23.1	115	20.0	23.1	116	0.144	58 - 133	20	
Chloroform	20.0	18.2	90.8	20.0	18.2	90.8	0.0142	69 - 128	20	
Chloromethane	20.0	22.6	113	20.0	22.2	111	1.73	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.1	95.6	20.0	19.3	96.7	1.20	72 - 126	20	
cis-1,3-Dichloropropene	20.0	20.6	103	20.0	20.5	102	0.709	69 - 131	20	
Dibromochloromethane	20.0	19.1	95.6	20.0	18.5	92.5	3.27	66 - 133	20	
Dibromomethane	20.0	20.2	101	20.0	19.7	98.5	2.42	76 - 125	20	
Dichlorodifluoromethane	20.0	25.4	127	20.0	25.7	128	1.01	30 - 153	20	
Ethylbenzene	20.0	18.5	92.4	20.0	18.7	93.7	1.41	73 - 127	20	
Hexachlorobutadiene	20.0	17.3	86.3	20.0	17.5	87.3	1.18	67 - 131	20	
Isopropylbenzene	20.0	19.8	98.8	20.0	19.9	99.3	0.496	75 - 127	20	
m-,p-Xylene	40.0	38.8	97.1	40.0	39.6	99.1	1.98	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.0	100	20.0	19.2	96.1	4.03	65 - 123	20	
Methylene chloride	20.0	18.5	92.7	20.0	18.8	94.0	1.32	63 - 137	20	
n-Butylbenzene	20.0	20.0	99.8	20.0	20.2	101	1.36	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.2	20.0	19.5	97.3	1.21	72 - 129	20	
Naphthalene	20.0	20.5	103	20.0	19.7	98.4	4.23	54 - 138	20	
o-Xylene	20.0	18.7	93.3	20.0	18.9	94.7	1.50	80 - 121	20	
p-Isopropyltoluene	20.0	19.6	98.0	20.0	19.8	99.0	1.05	73 - 130	20	
sec-Butylbenzene	20.0	19.1	95.3	20.0	19.3	96.3	1.01	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.3	102	0.590	65 - 134	20	
tert-Butylbenzene	20.0	18.0	90.2	20.0	18.2	91.1	0.961	70 - 129	20	
Tetrachloroethene	20.0	19.7	98.4	20.0	19.5	97.6	0.728	66 - 128	20	
Toluene	20.0	19.7	98.6	20.0	19.8	98.8	0.142	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.9	94.5	20.0	18.8	94.2	0.345	63 - 137	20	
trans-1,3-Dichloropropene	20.0	18.9	94.6	20.0	18.7	93.3	1.31	59 - 135	20	
Trichloroethene	20.0	18.6	92.8	20.0	18.7	93.3	0.577	70 - 127	20	
Trichlorofluoromethane	20.0	21.6	108	20.0	21.3	107	1.42	57 - 129	20	
Vinyl chloride	20.0	22.5	112	20.0	21.8	109	3.10	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	101	72 - 119	PASS
Dibromofluoromethane	102	101	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	105	106	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS6- 05-APR-17 Worknum: WG611071

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-26 File ID: 6M146612 Dil: 1 Method: 5035A

Sample ID: L17041069-27 MS File ID: 6M146608 Dil: 1 Matrix: 8260B

Sample ID: L17041069-28 MSD File ID: 6M146609 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.0	90	20.0	18.3	91.6	1.68	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.6	98	20.0	19.8	99	0.976	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.239	20.0	19.5	96.3	20.0	20.6	102	5.30	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.9	94.5	20.0	19.6	97.8	3.41	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.7	98.7	20.0	20.3	101	2.63	69 - 133	20	
1,1-Dichloroethene	0.558	20.0	19.8	96	20.0	19.9	96.6	0.566	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.4	96.8	20.0	19.5	97.6	0.850	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	17.8	88.8	20.0	18.1	90.6	1.99	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	96	20.0	20.1	101	4.73	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.4	92	20.0	18.6	93	1.09	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	18.9	94.5	20.0	19.1	95.4	0.952	74 - 132	20	
1,2-Dichloroethane	2.29	20.0	22.1	99.2	20.0	22.2	99.8	0.503	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	17.9	89.4	20.0	18.2	91.2	1.96	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	17.8	88.9	20.0	19.4	96.8	8.56	50 - 132	20	
1,2-Dichloropropane	0.510	20.0	20.4	99.5	20.0	20.7	101	1.24	75 - 125	20	
1,2-Dibromoethane	U	20.0	18.3	91.7	20.0	19.0	95.2	3.72	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	18.4	92.1	20.0	18.7	93.4	1.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	17.9	89.4	20.0	18.0	90.2	0.793	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.8	99	20.0	20.5	102	3.33	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	17.9	89.7	20.0	18.2	91	1.42	74 - 123	20	
1-Chlorohexane	U	20.0	19.3	96.4	20.0	19.9	99.5	3.18	70 - 125	20	
2,2-Dichloropropane	U	20.0	11.5	57.7	20.0	16.0	80.2	32.6	69 - 137	20	*#
2-Hexanone	U	20.0	21.3	107	20.0	22.1	111	3.67	55 - 130	20	
2-Chlorotoluene	U	20.0	16.5	82.6	20.0	17.1	85.6	3.57	73 - 126	20	
4-Chlorotoluene	U	20.0	20.5	103	20.0	20.6	103	0.547	74 - 128	20	
Acetone	6.74	20.0	29.9	116	20.0	30.8	120	3.01	40 - 135	20	
Benzene	U	20.0	19.0	95	20.0	19.2	96	1.04	81 - 122	20	
Bromobenzene	U	20.0	18.0	90	20.0	18.5	92.6	2.90	76 - 124	20	
Bromochloromethane	U	20.0	19.8	98.8	20.0	20.4	102	3.32	65 - 129	20	
Bromodichloromethane	U	20.0	19.6	98.1	20.0	20.1	100	2.37	76 - 121	20	
Bromoform	U	20.0	17.8	89.1	20.0	18.3	91.4	2.55	69 - 128	20	
Bromomethane	U	20.0	12.2	60.8	20.0	12.4	61.9	1.83	30 - 141	20	
Carbon disulfide	U	20.0	16.5	82.6	20.0	16.5	82.6	0.0062	58 - 128	20	
Carbon tetrachloride	4.79	20.0	24.3	97.6	20.0	24.5	98.6	0.837	66 - 138	20	
Chlorobenzene	U	20.0	17.8	89.2	20.0	18.1	90.5	1.49	81 - 122	20	
Chloroethane	U	20.0	21.5	108	20.0	21.1	105	1.93	58 - 133	20	
Chloroform	2.93	20.0	20.7	88.7	20.0	21.0	90.5	1.75	69 - 128	20	
Chloromethane	U	20.0	20.8	104	20.0	20.4	102	2.18	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	19.1	95.4	20.0	19.8	98.8	3.43	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	20.6	103	20.0	21.4	107	3.83	69 - 131	20	
Dibromochloromethane	U	20.0	18.3	91.6	20.0	18.8	94	2.64	66 - 133	20	

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS6 05-APR-17 Worknum: WG611071

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-26 File ID: 6M146612 Dil: 1 Method: 5035A

Sample ID: L17041069-27 MS File ID: 6M146608 Dil: 1 Matrix: 8260B

Sample ID: L17041069-28 MSD File ID: 6M146609 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.0	100	20.0	20.4	102	1.86	76 - 125	20	
Dichlorodifluoromethane	U	20.0	21.8	109	20.0	21.1	105	3.35	30 - 153	20	
Ethylbenzene	U	20.0	18.0	89.8	20.0	18.1	90.5	0.829	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.8	88.8	20.0	18.1	90.5	1.96	67 - 131	20	
Isopropylbenzene	U	20.0	17.9	89.6	20.0	18.5	92.5	3.24	75 - 127	20	
Methylene chloride	U	20.0	19.0	95.2	20.0	19.3	96.5	1.31	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.5	102	20.0	21.1	106	3.03	65 - 123	20	
MEK (2-Butanone)	U	20.0	21.4	107	20.0	21.9	110	2.35	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	20.6	103	20.0	20.7	104	0.865	58 - 134	20	
n-Butylbenzene	U	20.0	19.1	95.7	20.0	19.4	96.9	1.25	69 - 137	20	
n-Propylbenzene	U	20.0	18.3	91.4	20.0	18.6	93	1.77	72 - 129	20	
m-,p-Xylene	U	40.0	35.6	89	40.0	36.8	91.9	3.21	76 - 128	20	
Naphthalene	U	20.0	19.2	96	20.0	19.3	96.7	0.678	54 - 138	20	
o-Xylene	U	20.0	18.1	90.4	20.0	18.8	93.8	3.68	80 - 121	20	
p-Isopropyltoluene	U	20.0	18.6	92.9	20.0	18.8	93.8	0.932	73 - 130	20	
sec-Butylbenzene	U	20.0	18.3	91.3	20.0	18.6	93	1.78	72 - 127	20	
Styrene	U	20.0	18.7	93.5	20.0	19.2	95.8	2.41	65 - 134	20	
Trichloroethene	20.1	20.0	32.9	64	20.0	33.1	65	0.654	70 - 127	20	*
tert-Butylbenzene	U	20.0	18.4	92	20.0	18.6	92.8	0.890	70 - 129	20	
Tetrachloroethene	14.2	20.0	28.0	68.9	20.0	28.8	72.9	2.83	66 - 128	20	
Toluene	U	20.0	18.2	91.2	20.0	18.7	93.7	2.75	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.9	94.5	20.0	19.0	95	0.496	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	18.0	90.2	20.0	19.6	98.2	8.56	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.4	97.2	20.0	19.7	98.3	1.14	57 - 129	20	
Vinyl chloride	U	20.0	20.4	102	20.0	16.8	83.9	19.4	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS8- 17-APR-17 Worknum: WG611120

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-07 File ID: 8M419095 Dil: 1 Method: 5035A

Sample ID: L17041069-08 MS File ID: 8M419092 Dil: 1 Matrix: 8260B

Sample ID: L17041069-09 MSD File ID: 8M419093 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.1	95.5	20.0	18.7	93.5	2.14	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.8	99.1	20.0	19.7	98.4	0.682	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	19.2	96	20.0	18.6	92.9	3.29	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.0	94.8	20.0	17.9	89.7	5.53	75 - 125	20	
1,1-Dichloroethane	U	20.0	18.8	93.9	20.0	18.5	92.6	1.43	69 - 133	20	
1,1-Dichloroethene	U	20.0	18.5	92.6	20.0	18.3	91.4	1.31	68 - 130	20	
1,1-Dichloropropene	U	20.0	18.8	93.8	20.0	18.2	91.2	2.79	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.5	97.6	20.0	19.1	95.7	1.93	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.9	99.7	20.0	19.2	96	3.81	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	19.7	98.7	20.0	19.2	96.1	2.66	66 - 134	20	
1,2,4-Trimethylbenzene	0.458	20.0	19.8	96.7	20.0	19.4	94.5	2.20	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.4	96.8	20.0	19.1	95.5	1.40	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.8	94	20.0	18.4	92.2	1.88	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	18.8	93.8	20.0	17.6	88.1	6.24	50 - 132	20	
1,2-Dichloropropane	U	20.0	18.8	93.8	20.0	18.4	91.8	2.24	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.2	96.2	20.0	18.7	93.4	2.91	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.3	96.4	20.0	19.0	94.8	1.65	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.6	92.8	20.0	18.1	90.5	2.51	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.3	96.6	20.0	19.0	95.2	1.43	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.3	91.6	20.0	17.8	88.9	3.04	74 - 123	20	
1-Chlorohexane	U	20.0	20.9	104	20.0	20.5	102	2.08	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.2	101	20.0	19.7	98.4	2.37	69 - 137	20	
2-Hexanone	13.6	20.0	34.8	106	20.0	33.3	98.3	4.46	55 - 130	20	
2-Chlorotoluene	U	20.0	17.0	85.1	20.0	17.5	87.6	2.85	73 - 126	20	
4-Chlorotoluene	U	20.0	19.5	97.7	20.0	18.3	91.5	6.59	74 - 128	20	
Acetone	13.0	20.0	30.5	87.2	20.0	28.6	78	6.29	40 - 135	20	
Benzene	U	20.0	18.8	94.2	20.0	18.7	93.5	0.837	81 - 122	20	
Bromobenzene	U	20.0	18.9	94.6	20.0	18.4	92	2.76	76 - 124	20	
Bromochloromethane	U	20.0	20.1	101	20.0	19.9	99.3	1.37	65 - 129	20	
Bromodichloromethane	U	20.0	19.0	95.2	20.0	18.8	94	1.28	76 - 121	20	
Bromoform	U	20.0	16.8	84.2	20.0	16.4	82.1	2.63	69 - 128	20	
Bromomethane	U	20.0	24.5	122	20.0	25.2	126	2.83	30 - 141	20	
Carbon disulfide	U	20.0	17.0	84.8	20.0	16.7	83.5	1.55	58 - 128	20	
Carbon tetrachloride	U	20.0	20.1	100	20.0	19.6	97.8	2.59	66 - 138	20	
Chlorobenzene	U	20.0	18.1	90.5	20.0	17.8	89.2	1.40	81 - 122	20	
Chloroethane	U	20.0	21.5	108	20.0	20.8	104	3.42	58 - 133	20	
Chloroform	U	20.0	17.8	89.1	20.0	17.7	88.3	0.870	69 - 128	20	
Chloromethane	U	20.0	20.5	103	20.0	19.8	98.9	3.68	56 - 131	20	
cis-1,2-Dichloroethene	27.7	20.0	43.0	76.4	20.0	41.5	69	3.54	72 - 126	20	*
cis-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.4	102	1.98	69 - 131	20	
Dibromochloromethane	U	20.0	19.3	96.5	20.0	18.8	94.2	2.42	66 - 133	20	

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Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS8 17-APR-17 Worknum: WG611120

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-07 File ID: 8M419095 Dil: 1 Method: 5035A

Sample ID: L17041069-08 MS File ID: 8M419092 Dil: 1 Matrix: 8260B

Sample ID: L17041069-09 MSD File ID: 8M419093 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	19.9	99.4	20.0	19.4	97.1	2.30	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.8	114	20.0	22.4	112	1.83	30 - 153	20	
Ethylbenzene	U	20.0	17.9	89.3	20.0	18.0	90.2	1.03	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.6	93	20.0	18.7	93.5	0.454	67 - 131	20	
Isopropylbenzene	U	20.0	19.0	94.9	20.0	19.0	95.1	0.222	75 - 127	20	
Methylene chloride	U	20.0	18.8	94.1	20.0	18.7	93.4	0.837	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.9	99.3	20.0	19.3	96.4	2.91	65 - 123	20	
MEK (2-Butanone)	8.49	20.0	29.0	103	20.0	27.6	95.6	5.01	49 - 136	20	
MIBK (methyl isobutyl ketone)	7.52	20.0	27.9	102	20.0	25.9	91.9	7.57	58 - 134	20	
n-Butylbenzene	U	20.0	19.7	98.7	20.0	19.5	97.5	1.23	69 - 137	20	
n-Propylbenzene	U	20.0	18.9	94.6	20.0	18.6	93.2	1.56	72 - 129	20	
m-,p-Xylene	U	40.0	38.2	95.5	40.0	37.7	94.4	1.19	76 - 128	20	
Naphthalene	U	20.0	20.8	104	20.0	20.4	102	2.01	54 - 138	20	
o-Xylene	U	20.0	18.3	91.5	20.0	18.2	91	0.483	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.5	97.7	20.0	19.2	96.1	1.62	73 - 130	20	
sec-Butylbenzene	U	20.0	18.8	93.8	20.0	18.5	92.5	1.36	72 - 127	20	
Styrene	U	20.0	20.0	99.8	20.0	19.7	98.6	1.23	65 - 134	20	
Trichloroethene	0.547	20.0	19.9	96.9	20.0	19.7	95.9	1.08	70 - 127	20	
tert-Butylbenzene	U	20.0	18.1	90.5	20.0	17.8	89	1.64	70 - 129	20	
Tetrachloroethene	0.587	20.0	20.1	97.8	20.0	20.3	98.5	0.754	66 - 128	20	
Toluene	3.50	20.0	22.1	92.8	20.0	21.7	91.1	1.56	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.6	93.1	20.0	18.4	92	1.18	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	18.8	93.9	20.0	18.5	92.3	1.66	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.2	101	20.0	19.7	98.5	2.73	57 - 129	20	
Vinyl chloride	4.79	20.0	21.5	83.4	20.0	20.6	79.2	3.99	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS11- 14-APR-17 Worknum: WG611145

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-32 File ID: 11M17659 Dil: 1 Method: 5035A

Sample ID: L17041069-33 MS File ID: 11M17653 Dil: 1 Matrix: 8260B

Sample ID: L17041069-34 MSD File ID: 11M17654 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.5	103	20.0	20.4	102	0.433	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.3	101	20.0	21.2	106	4.39	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.647	20.0	22.2	108	20.0	21.3	103	4.28	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.7	98.7	20.0	19.7	98.4	0.339	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.9	99.5	20.0	20.3	101	1.83	69 - 133	20	
1,1-Dichloroethene	U	20.0	18.8	93.8	20.0	19.3	96.6	2.89	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.8	99	20.0	19.7	98.3	0.702	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.3	107	20.0	20.9	104	2.22	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.9	104	20.0	20.0	99.9	4.36	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	21.7	109	20.0	21.3	106	1.91	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	101	20.0	20.1	100	1.15	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.5	97.3	20.0	19.7	98.3	1.03	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.7	104	20.0	20.3	102	1.91	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.2	111	20.0	21.1	106	5.04	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.6	98	20.0	20.4	102	3.98	75 - 125	20	
1,2-Dibromoethane	U	20.0	20.0	99.9	20.0	19.7	98.6	1.30	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.0	100	20.0	19.8	98.8	1.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.4	102	20.0	20.4	102	0.0098	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.8	104	20.0	21.0	105	0.915	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.4	102	20.0	20.4	102	0.181	74 - 123	20	
1-Chlorohexane	U	20.0	22.4	112	20.0	22.7	114	1.45	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.4	102	20.0	20.2	101	0.798	69 - 137	20	
2-Hexanone	U	20.0	22.9	115	20.0	22.3	111	2.77	55 - 130	20	
2-Chlorotoluene	U	20.0	18.6	92.8	20.0	18.2	91.2	1.84	73 - 126	20	
4-Chlorotoluene	U	20.0	21.1	105	20.0	20.7	103	1.86	74 - 128	20	
Acetone	5.49	20.0	28.4	115	20.0	25.8	101	9.80	40 - 135	20	
Benzene	U	20.0	19.9	99.7	20.0	20.5	102	2.56	81 - 122	20	
Bromobenzene	U	20.0	20.1	100	20.0	20.0	100	0.190	76 - 124	20	
Bromochloromethane	U	20.0	20.1	100	20.0	20.1	100	0.143	65 - 129	20	
Bromodichloromethane	U	20.0	19.6	97.9	20.0	19.7	98.5	0.593	76 - 121	20	
Bromoform	U	20.0	17.6	88.2	20.0	17.8	88.9	0.701	69 - 128	20	
Bromomethane	U	20.0	19.8	99.1	20.0	20.2	101	2.07	30 - 141	20	
Carbon disulfide	U	20.0	17.8	88.8	20.0	18.2	90.9	2.41	58 - 128	20	
Carbon tetrachloride	U	20.0	20.0	99.9	20.0	20.1	101	0.753	66 - 138	20	
Chlorobenzene	U	20.0	20.3	102	20.0	20.8	104	2.43	81 - 122	20	
Chloroethane	U	20.0	21.0	105	20.0	21.6	108	2.89	58 - 133	20	
Chloroform	0.125	20.0	18.9	93.7	20.0	19.1	94.6	1.01	69 - 128	20	
Chloromethane	U	20.0	19.1	95.3	20.0	19.5	97.4	2.26	56 - 131	20	
cis-1,2-Dichloroethene	0.278	20.0	20.1	98.9	20.0	20.1	99.4	0.458	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.2	111	20.0	22.6	113	1.71	69 - 131	20	
Dibromochloromethane	U	20.0	20.2	101	20.0	20.3	102	0.669	66 - 133	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS11 14-APR-17 Worknum: WG611145

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-32 File ID: 11M17659 Dil: 1 Method: 5035A

Sample ID: L17041069-33 MS File ID: 11M17653 Dil: 1 Matrix: 8260B

Sample ID: L17041069-34 MSD File ID: 11M17654 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.6	103	20.0	21.2	106	2.61	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.8	114	20.0	22.7	114	0.172	30 - 153	20	
Ethylbenzene	U	20.0	20.2	101	20.0	20.7	104	2.35	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.6	103	20.0	20.8	104	0.808	67 - 131	20	
Isopropylbenzene	U	20.0	20.4	102	20.0	20.8	104	1.87	75 - 127	20	
Methylene chloride	U	20.0	18.2	91	20.0	18.4	92.2	1.39	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.3	102	20.0	20.1	100	1.35	65 - 123	20	
MEK (2-Butanone)	U	20.0	21.4	107	20.0	20.5	102	4.10	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.6	97.9	20.0	19.4	97	0.992	58 - 134	20	
n-Butylbenzene	U	20.0	21.7	108	20.0	21.5	107	0.897	69 - 137	20	
n-Propylbenzene	U	20.0	20.4	102	20.0	20.2	101	1.14	72 - 129	20	
m-,p-Xylene	U	40.0	42.7	107	40.0	43.5	109	1.78	76 - 128	20	
Naphthalene	U	20.0	23.2	116	20.0	22.5	113	2.87	54 - 138	20	
o-Xylene	U	20.0	20.3	102	20.0	21.1	105	3.73	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.9	105	20.0	20.8	104	0.664	73 - 130	20	
sec-Butylbenzene	U	20.0	19.9	99.6	20.0	19.7	98.7	0.895	72 - 127	20	
Styrene	U	20.0	22.5	112	20.0	23.0	115	2.21	65 - 134	20	
Trichloroethene	8.99	20.0	27.0	90.2	20.0	27.1	90.6	0.341	70 - 127	20	
tert-Butylbenzene	U	20.0	20.3	101	20.0	19.7	98.5	2.73	70 - 129	20	
Tetrachloroethene	12.3	20.0	30.8	92.1	20.0	31.5	95.8	2.37	66 - 128	20	
Toluene	U	20.0	19.4	97.1	20.0	19.8	99.2	2.14	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.1	95.5	20.0	19.8	98.8	3.42	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.8	104	0.187	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.6	97.8	20.0	20.1	100	2.57	57 - 129	20	
Vinyl chloride	U	20.0	19.9	99.4	20.0	19.6	98	1.40	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

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2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): BUB
Date: 4-20-17
Filter Lot #: 9803210

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BUB 4-20-17		BUB 4-21-17	
Time On	Temp On °C	Time Off	Temp Off °C
1511	23.4	752	21.4

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A	04-0932-02	✓	10	10	1311	F1-228	S	100		✓	25.01	500
B												
C												
D												
E												
F												
G												
H												
I												
J												
K												
L												
M												
N												
O												
P												
Q												
R												
S	04-0932-01	✓	10	10	1311	F1-228	S	100		✓	25.02	500
NA	04-0936-01	NA	NA	NA	〃	FIL	W	40.5	NA	NA	40	40
NA	FB1K-1	NA	〃	〃	1311	F1-228	NA	NA	〃	〃	〃	〃

BUB 4-20-17

BUB 4-21-17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NA

Peer Review By:

Analyst(s): BNB
Date: 4-24-17
Filter Lot #: 98032.10

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☑1025 ☐ 1023

Analyst / Date		Analyst / Date	
BNB 4-21-17		BNB 4-22-17	
Time On	Temp On °C	Time Off	Temp Off °C
15:16	22.0	800	21.7

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A				BNB 4-22-17								
B	04-1079-01	✓	10	10	1311	F-228	S	100		✓	25.00	500
C	04-1084-01	✓	↓	↓	↓	↓	↓	↓		✓	25.00	500
D	04-1100-01	✓	10	10	1311	F-228	S	100		✓	25.00	500
E	04-1120-01	✓	10	10	↓	↓	↓	↓		✓	25.00	500
F	04-1120-02	✓	↓	↓	↓	↓	↓	↓		✓	25.03	500
G	04-1120-03	✓	↓	↓	↓	↓	↓	↓		✓	25.00	500
H												
I												
J												
K												
L												
M												
N												
O												
P												
Q												
R												
S												
DP	FBLK	NA	NA	NA	1311	F-228	NA	NA	NA	NA	40	40

BNB 4-24-17

BNB 4-22-17

BNB 4-22-17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NA

Peer Review By: [signature]

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144707	WG598323-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 08:36
6M144708	WG598323-02 5ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:02
6M144709	WG598323-03 20ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:37
6M144710	WG598323-04 50ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:10
6M144711	WG598323-05 100ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:42
6M144712	WG598323-06 200ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:14
6M144713	WG598323-07 300ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:47
6M144714	WG598323-08 400ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:19
6M144715	WG598323-09 500ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:52
6M144716	rinse	NA	1	1		01/12/17 13:25
6M144717	WG598323-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD79496	01/12/17 13:56
6M144718	WG598430-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 14:27
6M144719	WG598430-02 50ug/L CCV STD 8260	NA	1	1	STD79829	01/12/17 14:52
6M144720	WG598452-01 100ug/L A9 CCV STD 8260	NA	1	1	STD79571	01/12/17 15:27
6M144721	WG598431-01 VBLK0112 BLANK STD 826	NA	1	1		01/12/17 15:59
6M144722	WG598431-02 20ug/L LCS STD 8260	NA	1	1	STD79908	01/12/17 16:32
6M144723	L16120615-05 B MS 826-A9-SPE	7	1	1	STD79909	01/12/17 17:04
6M144724	L16120615-06 B MSD 826-A9-SPE	7	1	1	STD79909	01/12/17 17:37
6M144725	WG598431-03 100ug/L A9/FOO LCS	NA	1	1	STD79496	01/12/17 18:09
6M144726	L16120718-01 B TB 826-AP-SPE	<2	1	1		01/12/17 18:42
6M144727	L16120973-01 B TB 826-AP-SPE	<2	1	1		01/12/17 19:14
6M144728	L16120615-01 B 826-AP-SPE	7	1	1		01/12/17 19:46
6M144729	L16120615-02 B 826-AP-SPE	7	1	1		01/12/17 20:19
6M144730	L16120615-03 B EB 826-AP-SPE	4	1	1		01/12/17 20:51
6M144731	L16120615-04 B RS 826-AP-SPE	7	1	1		01/12/17 21:23
6M144732	L16120615-07 B 826-AP-SPE	4	1	1		01/12/17 21:55
6M144733	L16120615-08 B 826-AP-SPE	7	1	1		01/12/17 22:27
6M144734	L16120615-09 B 826-AP-SPE	7	1	1		01/12/17 22:59
6M144735	L16120718-02 B 826-AP-SPE	7	1	1		01/12/17 23:31
6M144736	L16120718-03 B 826-AP-SPE	7	1	1		01/13/17 00:03
6M144737	L16120718-04 B 826-AP-SPE	4	1	1		01/13/17 00:36
6M144738	L16120718-05 B 826-AP-SPE	4	1	1		01/13/17 01:08
6M144739	L16120718-06 B 826-AP-SPE	7	1	1		01/13/17 01:40
6M144740	L16120718-07 B 826-AP-SPE	7	1	1		01/13/17 02:12

Approved: January 13, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144741	RINSE	NA	1	1		01/13/17 02:44
6M144742	WG598431-07 VBLK0112 BLANK STD 624	NA	2	1		01/13/17 03:16
6M144743	L17010300-04 A 624	7	2	1		01/13/17 03:47
6M144744	L17010466-03 A 624-SPE	7	2	1		01/13/17 04:20
6M144745	L17010446-02 A 624-SPE1	7	2	1		01/13/17 04:52
6M144746	CCV	NA	1	1		01/13/17 05:24
6M144747	RINSE	NA	1	1		01/13/17 05:56
6M144748	RINSE	NA	1	1		01/13/17 06:28

Approved: January 13, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040517
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54116

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194 LCS: STD81257 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608938

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146219	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:24
6M146220	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:38
6M146221	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 16:29
6M146222	RINSE	NA	1	1	STD80989	04/05/17 16:54
6M146223	WG608938-02 0.3ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:25
6M146224	WG608938-03 0.4ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:57
6M146225	WG608938-04 1ug/L STD 8260	NA	1	1	STD81194	04/05/17 18:28
6M146226	WG608938-05 2ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:00
6M146227	WG608938-06 5ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:31
6M146228	WG608938-07 20ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:02
6M146229	WG608938-08 50ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:34
6M146230	WG608938-09 100ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:06
6M146231	WG608938-10 200ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:37
6M146232	WG608938-11 300ug/L STD 8260	NA	1	1	STD81194	04/05/17 22:09
6M146233	RINSE	NA	1	1		04/05/17 22:40

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 6M146219				
	Tune failed, DNR.			
2	X			
File ID: 6M146220				
	Tune failed, DNR. Clipped the column and repalced the ferrule on the column.			

Approved: April 07, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146234	RINSE	NA	1	1		04/06/17 12:16
6M146235	RINSE	NA	1	1		04/06/17 13:19
6M146236	WG609128-01 50ng BFB STD 8260	NA	1	1	STD80989	04/06/17 13:59
6M146237	WG609128-02 50ug/L CCV STD 8260	NA	1	1	STD81194	04/06/17 14:24
6M146238	WG608979-01 100ug/L A9 CCV STD 8260	NA	1	1	STD80642	04/06/17 14:54
6M146239	WG608987-01 VBLK0406 BLANK STD 826	NA	1	1		04/06/17 15:26
6M146240	WG608938-12 20ug/L ALT SRC STD 8260	NA	1	1	STD81257	04/06/17 15:57
6M146241	WG608987-02 20ug/L LCS STD 8260	NA	1	1	STD81257	04/06/17 16:28
6M146242	L17040128-01 B 1000X 826-SPE D1	<2	1	1000		04/06/17 16:59
6M146243	L17031533-15 A 826-SPE	<2	1	1		04/06/17 17:30
6M146244	L17031574-17 A RS 826-SPE	NA	1	1		04/06/17 18:01
6M146245	L17031574-18 A MS 826-SPE	NA	1	1	STD81257	04/06/17 18:32
6M146246	L17031574-19 A MSD 826-SPE	NA	1	1	STD81257	04/06/17 19:02
6M146247	L17040128-02 B 200X 826-SPE D1	10	1	200		04/06/17 19:32
6M146248	L17031574-28 TB A 826-SPE	<2	1	1		04/06/17 20:03
6M146249	L17031690-02 TB A 826-SPE	<2	1	1		04/06/17 20:33
6M146250	L17040002-01 LOQ 826-SPE	NA	1	1	STD81310	04/06/17 21:03
6M146251	L17040004-01 LOD 826-SPE	NA	1	1	STD81310	04/06/17 21:33
6M146252	L17031690-01 A 826-SPE	<2	1	1		04/06/17 22:04
6M146253	L17031574-25 A 826-SPE	<2	1	1		04/06/17 22:34
6M146254	L17031574-24 A 826-SPE	<2	1	1		04/06/17 23:04
6M146255	L17031574-27 A 2.5X 826-SPE	<2	1	2.5		04/06/17 23:35
6M146256	L17031574-26 A 826-SPE	<2	1	1		04/07/17 00:05
6M146257	L17031574-23 A 826-SPE	<2	1	1		04/07/17 00:35
6M146258	L17040173-01 A 10X 826-TC	5	17	10		04/07/17 01:06
6M146259	ccv	NA	1	1		04/07/17 01:36
6M146260	rinse	NA	1	1		04/07/17 02:06
6M146261	rinse	NA	1	1		04/07/17 02:36
6M146262	WG608867-01 A FBLK 10X 826-TC	NA	17	10		04/07/17 03:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes
14	X	1000	Over Calibration Range	D.ETHER

Approved: April 07, 2017

Sarah Vandenberg

Microbac

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M146247				
20	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146253				
21	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146254				

Approved: April 07, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041117
Analyst1: FJB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD80956 Surrogate Standard: STD80957
CCV: NA LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609769

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17453	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:40
11M17454	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:59
11M17455	RINSE	NA	1	1		04/11/17 18:23
11M17456	WG609769-02 5ug/L STD A9	NA	1	1	STD81397	04/11/17 18:52
11M17457	WG609769-03 20ug/L STD A9	NA	1	1	STD81397	04/11/17 19:20
11M17458	WG609769-04 50ug/L STD A9	NA	1	1	STD81397	04/11/17 19:50
11M17459	WG609769-05 100ug/L STD A9	NA	1	1	STD81397	04/11/17 20:20
11M17460	WG609769-06 200ug/L STD A9	NA	1	1	STD81397	04/11/17 20:49
11M17461	WG609769-07 300ug/L STD A9	NA	1	1	STD81397	04/11/17 21:18
11M17462	WG609769-08 400ug/L STD A9	NA	1	1	STD81397	04/11/17 21:47
11M17463	WG609769-09 500ug/L STD A9	NA	1	1	STD81397	04/11/17 22:17
11M17464	RINSE	NA	1	1		04/11/17 22:47
11M17465	RINSE	NA	1	1		04/11/17 23:17
11M17466	WG609769-10 100ug/L ICV A9	NA	1	1	STD81404	04/11/17 23:46

Approved: April 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54128

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81397 LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609829

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418914	WG609829-01 50ng BFB STD 8260	NA	1	1	STD80989	04/12/17 10:17
8M418915	RINSE	NA	1	1	STD80989	04/12/17 10:42
8M418916	WG609829-02 5ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:11
8M418917	WG609829-03 20ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:40
8M418918	WG609829-04 50ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:10
8M418919	WG609829-05 100ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:41
8M418920	WG609829-06 200ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:10
8M418921	WG609829-07 300ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:40
8M418922	WG609829-08 400ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:10
8M418923	WG609829-09 500ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:39
8M418924	RINSE	NA	1	1		04/12/17 15:09
8M418925	RINSE	NA	1	1		04/12/17 15:39
8M418926	WG609829-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD81404	04/12/17 16:10
8M418927	WG609948-01 50ug/L CCV STD 8260	NA	1	1	STD81377	04/12/17 16:39
8M418928	RINSE	NA	1	1		04/12/17 17:09

Approved: April 18, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041417
Analyst1: FJB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54125

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81447 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610045

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17505	WG610045-01 BFB 50ng 8260	NA	1	1	STD80989	04/14/17 12:21
11M17507	WG610045-01 BFB 50ng 8260	NA	1	1	STD80989	04/14/17 12:41
11M17508	RINSE	NA	1	1		04/14/17 13:16
11M17509	WG610045-02 0.3ug/L STD 8260	NA	1	1	STD81447	04/14/17 13:44
11M17510	WG610045-03 0.4ug/L STD 8260	NA	1	1	STD81447	04/14/17 14:13
11M17511	WG610045-04 1ug/L STD 8260	NA	1	1	STD81447	04/14/17 14:43
11M17512	WG610045-05 2ug/L STD 8260	NA	1	1	STD81447	04/14/17 15:12
11M17513	WG610045-06 5ug/L STD 8260	NA	1	1	STD81447	04/14/17 15:42
11M17514	WG610045-07 20ug/L STD 8260	NA	1	1	STD81447	04/14/17 16:11
11M17515	WG610045-08 50ug/L STD 8260	NA	1	1	STD81447	04/14/17 16:41
11M17516	WG610045-09 100ug/L STD 8260	NA	1	1	STD81447	04/14/17 17:10
11M17517	WG610045-10 200ug/L STD 8260	NA	1	1	STD81447	04/14/17 17:40
11M17518	WG610045-11 300ug/L STD 8260	NA	1	1	STD81447	04/14/17 18:09
11M17519	RINSE	NA	1	1		04/14/17 18:38

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 11M17505				
Tune failed, DNR.				

Approved: April 24, 2017

Tiffany Bailey

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18/1
Maintenance Log ID: 54132

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610410

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418996	WG610373-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 09:44
8M418997	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:10
8M418998	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:42
8M418999	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/17/17 11:13
8M419000	WG610410-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 12:58
8M419001	RINSE	NA	1	1		04/17/17 13:21
8M419002	WG610410-02 0.3ug/L STD 8260	NA	1	1	STD81447	04/17/17 13:51
8M419003	WG610410-03 0.4ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:25
8M419004	WG610410-04 1ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:55
8M419005	WG610410-05 2ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:25
8M419006	WG610410-06 5ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:54
8M419007	WG610410-07 20ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:24
8M419008	WG610410-08 50ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:54
8M419009	WG610410-09 100ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:23
8M419010	WG610410-10 200ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:54
8M419011	WG610410-11 300ug/L STD 8260	NA	1	1	STD81447	04/17/17 18:24
8M419012	RINSE	NA	1	1		04/17/17 18:53
8M419013	RINSE	NA	1	1		04/17/17 19:23
8M419014	WG610410-12 50ug/L ALT SRC STD 8260	NA	1	1	STD81461	04/17/17 19:53
8M419015	RINSE	NA	1	1		04/17/17 20:23

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 8M418997				
			Bromomethane was low, DNR.	
3	X			
File ID: 8M418998				
			Bromomethane and iodomethane were low, DNR.	
4				
File ID: 8M418999				
			Not needed, DNR.	

Approved: April 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041717
Analyst1: JDS Analyst2: FJB
Method: 8260B SOP: MSV01/OVPA MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81375 LCS: STD81409 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610384

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17521	WG610382-02 50ug/L CCV 8260	NA	1	1	STD81447	04/17/17 11:41
11M17522	WG610382-02 50ug/L CCV 8260	NA	1	1	STD81447	04/17/17 12:19
11M17523	WG610382-01 BFB 50ng 8260	NA	1	1	STD80989	04/17/17 12:58
11M17524	WG610382-02 50ug/L CCV 8260	NA	1	1	STD81447	04/17/17 13:22
11M17525	WG610045-12 50ug/L ICV 8260	NA	1	1	STD81461	04/17/17 13:52
11M17526	WG610XXX-01 100ug/L CCV A9	NA	1	1	STD81397	04/17/17 14:21
11M17527	WG610384-01 BLANK 8260	NA	1	1		04/17/17 14:50
11M17528	WG610045-12 20ug/L ICV 8260	NA	1	1	STD81461	04/17/17 15:19
11M17529	WG610384-02 20ug/L LCS 8260	NA	1	1	STD81461	04/17/17 15:49
11M17530	WG610384-03 20ug/L LCS2 8260	NA	1	1	STD81461	04/17/17 16:18
11M17531	L17040633-01 10X AF 826-TC 00	NA	17	10		04/17/17 16:47
11M17532	L17040629-01 10X AF 826-TC	NA	17	10		04/17/17 17:17
11M17533	L17040582-01 B D1 500X 8260	<2	1	500		04/17/17 17:45
11M17534	L17040582-02 B D1 1000X 8260	<2	1	1000		04/17/17 18:15
11M17535	L17040748-01 A 826-LOW	<2	1	1		04/17/17 18:45
11M17536	L17040748-02 A 826-LOW	<2	1	1		04/17/17 19:13
11M17537	L17040748-03 A 826-LOW	<2	1	1		04/17/17 19:42
11M17538	L17040748-04 A 826-LOW	<2	1	1		04/17/17 20:12
11M17539	L17040748-05 A 826-LOW	<2	1	1		04/17/17 20:41
11M17540	L17040748-06 A 826-LOW	<2	1	1		04/17/17 21:10
11M17541	L17040748-07 A 826-LOW	<2	1	1		04/17/17 21:39
11M17542	L17040748-08 A 826-LOW	<2	1	1		04/17/17 22:09
11M17543	L17040748-10 A 826-LOW	<2	1	1		04/17/17 22:38
11M17544	L17040748-09 A 826-LOW	<2	1	1		04/17/17 23:08
11M17545	L17040748-11 A 826-LOW	<2	1	1		04/17/17 23:38
11M17546	L17040748-12 A 826-LOW	<2	1	1		04/18/17 00:06
11M17547	L17040748-13 A 826-LOW	<2	1	1		04/18/17 00:36
11M17548	CCV	NA	1	1		04/18/17 01:06
11M17549	RINSE	NA	1	1		04/18/17 01:36
11M17550	RINSE	NA	1	1		04/18/17 02:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: April 20, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041717
Analyst1: JDS Analyst2: FJB
Method: 8260B SOP: MSV01/OVPA MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81375 LCS: STD81409 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610384

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X		Check Standard Failure	
File ID: 11M17521				
	WG610382-02			
2	X			
File ID: 11M17522				
	WG610382-02 Low compounds Internals sitting higher than where the ICAL ran on Friday. Decrease the voltage and try again.			
5				
File ID: 11M17525				
	WG610045-12 rerun ICV for low failing compounds.			

Approved: April 20, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: STD81461

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611120

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419087	WG611118-01 50ng BFB STD 8260	NA	1	1	STD81491	04/21/17 12:41
8M419088	WG611118-02 50ug/L CCV STD 8260	NA	1	1	STD81447	04/21/17 13:04
8M419089	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/21/17 13:34
8M419090	WG611120-01 VBLK0421 BLANK STD 826	NA	1	1		04/21/17 14:04
8M419091	WG611120-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/21/17 14:34
8M419092	L17041069-08 A MS 826-SPE	<2	1	1	STD81461	04/21/17 15:04
8M419093	L17041069-09 A MSD 826-SPE	<2	1	1	STD81461	04/21/17 15:34
8M419094	L17040964-01 B 10X 826-SPE D1	<2	1	10		04/21/17 16:04
8M419095	L17041069-07 A RS 826-SPE	<2	1	1		04/21/17 16:33
8M419096	L17041069-05 A 826-SPE	<2	1	1		04/21/17 17:04
8M419097	L17041069-15 A 826-SPE	<2	1	1		04/21/17 17:34
8M419098	L17041069-16 A 826-SPE	<2	1	1		04/21/17 18:03
8M419099	L17041069-18 A 826-SPE	<2	1	1		04/21/17 18:34
8M419100	L17041069-04 A 826-SPE	<2	1	1		04/21/17 19:03
8M419101	L17041069-02 A 826-SPE	<2	1	1		04/21/17 19:33
8M419102	L17041069-06 A 826-SPE	<2	1	1		04/21/17 20:03
8M419103	L17041069-01 A 826-SPE	<2	1	1		04/21/17 20:33
8M419104	L17041069-10 A 826-SPE	<2	1	1		04/21/17 21:03
8M419105	L17041069-12 A 826-SPE	<2	1	1		04/21/17 21:32
8M419106	L17041069-19 A 826-SPE	<2	1	1		04/21/17 22:02
8M419107	L17041069-13 A 826-SPE	<2	1	1		04/21/17 22:32
8M419108	L17041069-14 A 826-SPE	<2	1	1		04/21/17 23:02
8M419109	L17041069-17 A 826-SPE	<2	1	1		04/21/17 23:32
8M419110	L17041069-03 A 826-SPE	<2	1	1		04/22/17 00:03
8M419111	L17041069-11 A 826-SPE	<2	1	1		04/22/17 00:33
8M419112	CCV	NA	1	1		04/22/17 01:03
8M419113	RINSE	NA	1	1		04/22/17 01:32
8M419114	RINSE	NA	1	1		04/22/17 02:02

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419089				

Approved: April 24, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: STD81461

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611120

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			Not needed, DNR.	
21	X	5	Over Calibration Range	PCE
File ID: 8M419107				

Approved: April 24, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54136

Internal Standard: STD81412 Surrogate Standard: STD51412
CCV: STD81447 LCS: STD81461 MS/MSD: STD81461

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611071; WG611196

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146595	WG611068-01 50ng BFB STD 8260	NA	1	1	STD81491	04/21/17 10:24
6M146596	WG611068-02 50ug/L CCV STD 8260	NA	1	1	STD81447	04/21/17 10:49
6M146597	WG611068-02 50ug/L CCV STD 8260	NA	1	1	STD81447	04/21/17 11:22
6M146598	WG611068-01 50ng BFB STD 8260	NA	1	1	STD81491	04/21/17 13:29
6M146599	WG611068-02 50ug/L CCV STD 8260	NA	1	1	STD81447	04/21/17 13:54
6M146600	WG611069-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/21/17 14:25
6M146601	WG611071-01 VBLK0421 BLANK STD 826	NA	1	1		04/21/17 14:56
6M146602	L17040279-01 A 826-REF-BLK	<2	1	1		04/21/17 15:26
6M146603	L17040279-02 A 826-REF-BLK	<2	1	1		04/21/17 15:57
6M146604	L17040279-03 A 826-REF-BLK	<2	1	1		04/21/17 16:28
6M146605	L17040279-04 A 826-REF-BLK	<2	1	1		04/21/17 16:58
6M146606	L17040279-05 A 826-REF-BLK	<2	1	1		04/21/17 17:30
6M146607	WG611071-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/21/17 18:01
6M146608	L17041069-27 A MS 826-SPE	<2	1	1	STD81461	04/21/17 18:31
6M146609	L17041069-28 A MSD 826-SPE	<2	1	1	STD81461	04/21/17 19:02
6M146610	L17040936-01 A 10X 826-TC	NA	17	10		04/21/17 19:33
6M146611	L17041069-21 A 826-SPE	<2	1	1		04/21/17 20:03
6M146612	L17041069-26 A RS 826-SPE	<2	1	1		04/21/17 20:34
6M146613	L17041069-25 A 826-SPE	<2	1	1		04/21/17 21:04
6M146614	L17041069-24 A 826-SPE	<2	1	1		04/21/17 21:35
6M146615	L17041069-23 A 826-SPE	<2	1	1		04/21/17 22:05
6M146616	L17041069-22 A 826-SPE	<2	1	1		04/21/17 22:35
6M146617	L17041064-02 A 826-SPE4	7	1	1		04/21/17 23:06
6M146618	L17041064-01 A 826-SPE4	7	1	1		04/21/17 23:37
6M146619	L17041067-01 A 826-SPE	<2	1	1		04/22/17 00:08
6M146620	L17040932-01 A 826-TC-SPE	NA	17	10		04/22/17 00:39
6M146621	L17040932-02 A 826-TC-SPE	NA	17	10		04/22/17 01:09
6M146622	WG611196-02 20ug/L LCS STD 624	NA	2	1	STD81461	04/22/17 01:40
6M146623	WG611196-03 20ug/L LCS2 STD 624	NA	2	1	STD81461	04/22/17 02:10
6M146624	RINSE	NA	2	1		04/22/17 02:41
6M146625	WG611196-01 VBLK0421 BLANK STD 624	NA	2	1		04/22/17 03:12
6M146626	L17041010-05 A TB 624-SPE	5	2	1		04/22/17 03:42
6M146627	L17041010-04 A 624-SPE	<2	2	1		04/22/17 04:12
6M146628	L17041010-03 A 624-SPE	6	2	1		04/22/17 04:43

Approved: April 24, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54136

Internal Standard: STD81412 Surrogate Standard: STD51412
CCV: STD81447 LCS: STD81461 MS/MSD: STD81461

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611071; WG611196

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146629	L17041010-02 A 624-SPE	7	2	1		04/22/17 05:13
6M146630	L17041010-01 A 624-SPE	5	2	1		04/22/17 05:44
6M146631	L17041072-02 A TB 624-SPE	5	2	1		04/22/17 06:14
6M146632	L17041072-01 A 624-SPE	6	2	1		04/22/17 06:44
6M146633	L17041009-01 A 624-SPE	<2	2	1		04/22/17 07:14
6M146634	CCV	NA	1	1		04/22/17 07:44
6M146635	RINSE	NA	1	1		04/22/17 08:14
6M146636	WG610898-01 A FBLK 10X 826-TC-SPE	NA	17	10		04/22/17 08:44
6M146637	RINSE	NA	1	1		04/22/17 09:14

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 6M146596				
	DNR.			
3	X			
File ID: 6M146597				
	DNR. Changed the sparge tube and needle.			

Approved: April 24, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042117
Analyst1: JDS Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD80956 Surrogate Standard: STD80957
CCV: STD81447 LCS: STD81404 MS/MSD: STD81404

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611145

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17645	WG611143-02 50ug/L CCV 8260	NA	1	1	STD81447	04/21/17 14:45
11M17646	WG611143-02 50ug/L CCV 8260	NA	1	1	STD81447	04/21/17 15:14
11M17648	WG611143-01 BFB 50ng 8260	NA	1	1	STD81491	04/21/17 16:07
11M17649	WG611143-02 50ug/L CCV 8260	NA	1	1	STD81447	04/21/17 16:31
11M17650	WG611146-01 50ug/L CCV 826-A9	NA	1	1	STD81397	04/21/17 17:04
11M17651	WG611145-01 BLANK 8260	NA	1	1		04/21/17 17:33
11M17652	WG611145-02 20ug/L LCS 8260	NA	1	1	STD81461	04/21/17 18:02
11M17653	L17041069-33 A MS 826-SPE	NA	1	1	STD81461	04/21/17 18:31
11M17654	L17041069-34 A MSD 826-SPE	NA	1	1	STD81461	04/21/17 19:01
11M17655	L17040784-02 DIL 5,000,000X 8260	<2	12	5000000		04/21/17 19:30
11M17657	L17040748-14 B 00 826-LOW	<2	1	1		04/21/17 20:00
11M17658	L17041087-03 A TB 826-SPE	<2	1	1		04/21/17 20:29
11M17659	L17041069-32 A REF 826	NA	1	1		04/21/17 20:58
11M17660	L17041069-29 A 826-SPE	<2	1	1		04/21/17 21:27
11M17661	L17041069-30 A 826-SPE	<2	1	1		04/21/17 21:57
11M17662	L17041069-31 A 826-SPE	<2	1	1		04/21/17 22:26
11M17663	L17041069-35 A 826-SPE	<2	1	1		04/21/17 22:56
11M17664	L17041069-36 A 826-SPE	<2	1	1		04/21/17 23:25
11M17665	L17041069-37 A 826-SPE	<2	1	1		04/21/17 23:54
11M17666	L17041069-38 A 826-SPE	<2	1	1		04/22/17 00:24
11M17667	L17041069-39 A 826-SPE	<2	1	1		04/22/17 00:54
11M17668	L17041069-40 A 826-SPE	<2	1	1		04/22/17 01:24
11M17669	L17041069-41 A 826-SPE	<2	1	1		04/22/17 01:53
11M17670	L17041069-20 A 826-SPE	<2	1	1		04/22/17 02:22
11M17671	L17041087-02 A 20X 826-SPE	<2	1	20		04/22/17 02:52
11M17672	L17041087-01 A 50X 826-SPE	<2	1	50		04/22/17 03:22
11M17673	RINSE	NA	1	1		04/22/17 03:51
11M17674	RINSE	NA	1	1		04/22/17 04:20

Comments

Seq.	Rerun	Dil.	Reason	Analytes
26	X	500	Over Calibration Range	EB

File ID: 11M17672

Approved: April 26, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS11	Dataset:	042117		
Analyst1:	JDS	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	24/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:					

Internal Standard: STD80956 Surrogate Standard: STD80957

CCV: STD81447 LCS: STD81404 MS/MSD: STD81404

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG611145

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
L17041087-01				

Approved: April 26, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042217
Analyst1: JDS Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81412 Surrogate Standard: STD81412
CCV: STD81447; STD81397 LCS: STD81461; STD81404 MS/MSD: STD81574

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611222

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146638	WG611221-01 50ng BFB STD 8260	NA	1	1	STD81491	04/22/17 14:25
6M146639	WG611221-02 50ug/L CCV STD 8260	NA	1	1	STD81447	04/22/17 14:50
6M146640	WG611223-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/22/17 15:25
6M146641	WG611222-01 BLANK STD 8260	NA	1	1		04/22/17 15:55
6M146642	WG611222-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/22/17 16:26
6M146643	L17041066-07 A MS 826-A9-SPE	7	1	1	STD81574	04/22/17 16:56
6M146644	L17041066-08 A MSD 826-A9-SPE	8	1	1	STD81574	04/22/17 17:27
6M146645	WG611222-06 100ug/L LCS 826-A9	NA	1	1	STD81404	04/22/17 17:57
6M146646	L17041066-01 A TB 826-A9-SPE	5	1	1		04/22/17 18:28
6M146647	L17041066-06 A REF 826-A9-SPE	8	1	1		04/22/17 18:59
6M146648	L17041066-05 A 826-A9-SPE	5	1	1		04/22/17 19:30
6M146649	L17041066-10 A 826-A9-SPE	7	1	1		04/22/17 20:00
6M146650	L17041066-03 A 826-A9-SPE	7	1	1		04/22/17 20:31
6M146651	L17041066-04 A 826-A9-SPE	7	1	1		04/22/17 21:01
6M146652	L17041066-11 A 826-A9-SPE	7	1	1		04/22/17 21:32
6M146653	L17041066-02 A 826-A9-SPE	7	1	1		04/22/17 22:02
6M146654	L17041066-09 A 826-A9-SPE	7	1	1		04/22/17 22:33
6M146655	L17041069-43 A 826-SPE	<2	1	1		04/22/17 23:03
6M146656	L17041069-45 A 826-SPE	<2	1	1		04/22/17 23:33
6M146657	L17041069-46 A 826-SPE	<2	1	1		04/23/17 00:03

Approved: April 24, 2017
Sarah Vandenberg

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042417
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54138

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611301

Comments: Archon had a stuck vial error and did not finish the sequence.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419115	WG611300-01 50ng BFB STD 8260	NA	1	1	STD81491	04/24/17 11:16
8M419116	WG611300-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/24/17 11:42
8M419117	WG00000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/24/17 12:11
8M419118	WG611301-01 VBLK0424 BLANK STD 826	NA	1	1		04/24/17 12:42
8M419119	WG611301-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/24/17 13:13
8M419120	WG611301-03 20ug/L LCS2 STD 8260	NA	1	1	STD81461	04/24/17 13:44
8M419121	L17041069-13 B 5X 826-SPE D1	<2	1	5		04/24/17 14:14
8M419122	L17041069-44 A 826-SPE	<2	1	1		04/24/17 14:45
8M419123	L17041069-47 A 826-SPE	<2	1	1		04/24/17 15:16
8M419124	L17041069-48 A 826-SPE	<2	1	1		04/24/17 15:46
8M419125	L17041069-49 A 826-SPE	<2	1	1		04/24/17 16:17
8M419126	L17041069-50 A 826-SPE	<2	1	1		04/24/17 16:48
8M419127	L17041075-01 A 826-SPE	<2	1	1		04/24/17 17:18
8M419128	L17041075-02 A 826-SPE	<2	1	1		04/24/17 17:49
8M419129	L17041075-03 A 826-SPE	<2	1	1		04/24/17 18:19
8M419130	L17041075-04 A 826-SPE	<2	1	1		04/24/17 18:50
8M419131	L17041075-05 A 826-SPE	<2	1	1		04/24/17 19:21

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419117				
	Not needed, DNR.			

Approved: April 25, 2017

Sarah Vandenberg

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54141

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611561

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419164	WG611560-01 50ng BFB STD 8260	NA	1	1	STD81491	04/26/17 07:53
8M419165	WG611560-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/26/17 08:22
8M419166	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/26/17 08:56
8M419167	WG611561-01 VBLK0426 BLANK STD 826	NA	1	1		04/26/17 09:27
8M419168	WG611561-02 20ug/L LCS STD 8260	NA	1	1	STD81583	04/26/17 09:56
8M419169	WG611561-03 20ug/L LCS2 STD 8260	NA	1	1	STD81583	04/26/17 10:27
8M419170	L17040829-02 B 10000X 826-SPE D2	<2	1	10000		04/26/17 10:57
8M419171	L17041081-23 AB A 826-SPE	<2	1	1		04/26/17 11:27
8M419172	L17041081-24 AB A 826-SPE	<2	1	1		04/26/17 11:57
8M419173	L17041069-42 B 826-SPE	<2	1	1		04/26/17 12:27
8M419174	L17041081-03 A 826-SPE	<2	1	1		04/26/17 12:57
8M419175	L17041081-04 A 826-SPE	<2	1	1		04/26/17 13:26
8M419176	L17041081-09 A 826-SPE	<2	1	1		04/26/17 13:57
8M419177	L17041081-11 A 826-SPE	<2	1	1		04/26/17 14:28
8M419178	L17041081-13 A 826-SPE	<2	1	1		04/26/17 14:58
8M419179	L17041081-17 A 826-SPE	<2	1	1		04/26/17 15:27
8M419180	L17041067-02 A TB 826-SPE	<2	1	1		04/26/17 15:57
8M419181	L17041081-01 A 826-SPE	<2	1	1		04/26/17 16:27
8M419182	L17041075-21 A 826-SPE	<2	1	1		04/26/17 16:58
8M419183	L17041075-22 A 826-SPE	<2	1	1		04/26/17 17:27
8M419184	L17041079-01 A 10X 826-TC-SPE	NA	17	10		04/26/17 17:57
8M419185	L17041084-01 A 10X 826-TC-SPE	NA	17	10		04/26/17 18:28
8M419186	L17041100-01 A 10X 826-TC	NA	17	10		04/26/17 18:58
8M419187	L17041081-02 A 2X 826-SPE	<2	1	2		04/26/17 19:27
8M419188	L17041086-01 A 20X 826-SPE	<2	1	20		04/26/17 19:57
8M419189	WG611737-02 20ug/L LCS STD 624	NA	2	1	STD81583	04/26/17 20:28
8M419190	WG611737-03 20ug/L LCS2 STD 624	NA	2	1	STD81583	04/26/17 20:58
8M419191	RINSE	NA	2	1		04/26/17 21:28
8M419192	WG611737-01 VBLK0426 BLANK STD 624	NA	2	1		04/26/17 21:58
8M419193	L17041262-02 C 624-SPE	7	2	1		04/26/17 22:29
8M419194	L17041218-01 A 624-SPE	7	2	1		04/26/17 22:58
8M419195	L17041226-02 A 624-SPE2	7	2	1		04/26/17 23:28
8M419196	CCV	NA	1	1		04/26/17 23:58
8M419197	RINSE	NA	1	1		04/27/17 00:29

Approved: April 27, 2017

Sarah Vandenberg

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54141

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611561

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419198	WG611237-01 A FBLK 10X 826-TC	NA	17	10		04/27/17 00:59
8M419199	RINSE	NA	1	1		04/27/17 01:29

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419166				
Not needed, DNR.				
18	X	5	Over Calibration Range	CIS12-DCE
File ID: 8M419181				
25	X	10	Analyzed too dilute	
File ID: 8M419188				
Also missed tune. DNR.				
32	X	1	Carry-over contamination	
File ID: 8M419195				
Possible acetone carry over.				

Approved: April 27, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Data Checklist

Date: 12-JAN-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 79799
Analytical Workgroups: WG598323; WG598431

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-JAN-2017
Tiffany Bailey

Secondary Reviewer:
13-JAN-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: JAN-13-2017 13:54:15

Microbac Laboratories Inc.

Data Checklist

Date: 05-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81399
Analytical Workgroups: WG608938

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
06-APR-2017

Tiffany Bailey

Secondary Reviewer:
07-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:59:30

Microbac Laboratories Inc.

Data Checklist

Date: 06-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81412
Analytical Workgroups: WG608987

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
07-APR-2017
Tiffany Bailey

Secondary Reviewer:
07-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:09:55

Microbac Laboratories Inc.

Data Checklist

Date: 11-APR-2017
Analyst: FJB
Analyst: NA
Method: 8260B/C/OVAP/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81698
Analytical Workgroups: WG609769

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	NA
Surrogates	NA
LCS (Laboratory Control Sample)	NA
Recoveries	NA
Surrogates	NA
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	NA
Internal Standards Criteria	NA
Library Searches	NA
Calculations & Correct Factors	NA
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	FJB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017

Secondary Reviewer:
24-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:52:25

Microbac Laboratories Inc.

Data Checklist

Date: 12-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81580
Analytical Workgroups: WG609829

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
17-APR-2017

Tiffany Bailey

Secondary Reviewer:
18-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-18-2017 13:13:22

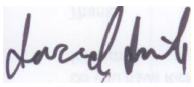
Microbac Laboratories Inc.

Data Checklist

Date: 14-APR-2017
Analyst: FJB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81636
Analytical Workgroups: WG610045

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	NA
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	NA
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	NA
Surrogates	NA
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	X
Spectra of TCL Hits	FJB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	X
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	TMB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
20-APR-2017



Secondary Reviewer:
24-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:48:35

Microbac Laboratories Inc.

Data Checklist

Date: 17-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81593
Analytical Workgroups: WG610410

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	TMB
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-APR-2017

Tiffany Bailey

Secondary Reviewer:
20-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-20-2017 13:10:53

Microbac Laboratories Inc.

Data Checklist

Date: 17-APR-2017
Analyst: JDS
Analyst: FJB
Method: 8260B/8260C
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81645
Analytical Workgroups: WG610384

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	FJB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	FJB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
20-APR-2017

Secondary Reviewer:
20-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-20-2017 15:26:40

Microbac Laboratories Inc.

Data Checklist

Date: 21-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81690
Analytical Workgroups: WG611120

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017
Tiffany Bailey

Secondary Reviewer:
24-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:06:06

Microbac Laboratories Inc.

Data Checklist

Date: 21-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81685
Analytical Workgroups: WG611071; WG611196

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017
Tiffany Bailey

Secondary Reviewer:
24-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 14:22:20

Microbac Laboratories Inc.

Data Checklist

Date: 21-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81749
Analytical Workgroups: WG611145

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	WTD
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
26-APR-2017

Secondary Reviewer:
26-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-26-2017 13:00:42

Microbac Laboratories Inc.

Data Checklist

Date: 22-APR-2017
Analyst: JDS
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81695
Analytical Workgroups: WG611222

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017
Tiffany Bailey

Secondary Reviewer:
24-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 16:30:32

Microbac Laboratories Inc.

Data Checklist

Date: 24-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81717
Analytical Workgroups: WG611301

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
25-APR-2017
Tiffany Bailey

Secondary Reviewer:
25-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-25-2017 14:37:26

Microbac Laboratories Inc.

Data Checklist

Date: 26-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81770
Analytical Workgroups: WG611561

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017
Tiffany Bailey

Secondary Reviewer:
27-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-27-2017 13:25:23

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611071

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-64-LS-25	21	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-218-LS-25	22	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
MW-268-LS-25	23	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-270-LS-25	24	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-272-LS-25	25	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-259-LS-25	26	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	
MW-259-LS-25	27	04/19/17					04/21/2017	2.1	14		04/21/17	2.1	14	
MW-259-LS-25	28	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5259044
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611120

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-85-LS-25	01	04/19/17					04/21/2017	2.5	14		04/21/17	2.5	14	
PMW-85-01-LS-25	02	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
DUP-10	03	04/19/17					04/22/2017	2.6	14		04/22/17	2.6	14	
PMW-85-05-LS-25	04	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
DR2-3-LS-25	05	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-113-LS-25	06	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
PMW92-03-LS-25	07	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
PMW92-03-LS-25	08	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	
PMW92-03-LS-25	09	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	
PMW92-02-LS-25	10	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
DUP-3	11	04/19/17					04/22/2017	2.6	14		04/22/17	2.6	14	
MW-92-LS-25	12	04/19/17					04/21/2017	2.5	14		04/21/17	2.5	14	
DR2-1-LS-25	13	04/19/17					04/21/2017	2.5	14		04/21/17	2.5	14	
MW-88-LS-25	14	04/19/17					04/21/2017	2.5	14		04/21/17	2.5	14	
DR2-2-LS-25	15	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-266-LS-25	16	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-267-LS-25	17	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	
MW-26-LS-25	18	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	
DR2-6-LS-25	19	04/19/17					04/21/2017	2.4	14		04/21/17	2.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5259044
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611145

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-217-LS-25	20	04/19/17					04/22/2017	2.5	14		04/22/17	2.5	14	
MW-271-LS-25	29	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-97-LS-25	30	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-204A-LS-25	31	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-204B-LS-25	32	04/19/17					04/21/2017	2.2	14		04/21/17	2.2	14	
MW-204B-LS-25	33	04/19/17					04/21/2017	2.1	14		04/21/17	2.1	14	
MW-204B-LS-25	34	04/19/17					04/21/2017	2.1	14		04/21/17	2.1	14	
MW-197A-LS-25	35	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-197B-LS-25	36	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-203A-LS-25	37	04/19/17					04/21/2017	2.3	14		04/21/17	2.3	14	
MW-203B-LS-25	38	04/19/17					04/22/2017	2.3	14		04/22/17	2.3	14	
MW-210A-LS-25	39	04/19/17					04/22/2017	2.3	14		04/22/17	2.3	14	
MW-210B-LS-25	40	04/19/17					04/22/2017	2.4	14		04/22/17	2.4	14	
MW-277-LS-25	41	04/19/17					04/22/2017	2.4	14		04/22/17	2.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

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PDF File ID: 5259044
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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611222

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-98-LS-25	43	04/20/17					04/22/2017	2.6	14		04/22/17	2.6	14	
MW-205A-LS-25	45	04/20/17					04/22/2017	2.6	14		04/22/17	2.6	14	
MW-205B-LS-25	46	04/20/17					04/23/2017	2.7	14		04/23/17	2.7	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5259044
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611301

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR2-1-LS-25	13	04/19/17					04/24/2017	5.1	14		04/24/17	5.1	14	
DUP-6	44	04/20/17					04/24/2017	4.3	14		04/24/17	4.3	14	
MW-39A-LS-25	47	04/20/17					04/24/2017	4.3	14		04/24/17	4.3	14	
MW-39-LS-25	48	04/20/17					04/24/2017	4.3	14		04/24/17	4.3	14	
MW-206B-LS-25	49	04/20/17					04/24/2017	4.3	14		04/24/17	4.3	14	
MW-206A-LS-25	50	04/20/17					04/24/2017	4.3	14		04/24/17	4.3	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5259044
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611561

Login Number: L17041069

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-280-LS-25	42	04/19/17					04/26/2017	7	14		04/26/17	7	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5259044
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041069
Instrument Id: HPMS8
Workgroup (AAB#): WG611561

Method: 8260
CAL ID: HPMS8-17-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-42	1.00	01	104	98.9	104	106
WG611561-01	1.00	01	105	103	104	108
WG611561-02	1.00	01	104	102	101	105
WG611561-03	1.00	01	101	101	100	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041069 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-05-APR-17
Workgroup (AAB#): WG611222 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-43	1.00	01	109	106	106	102
L17041069-45	1.00	01	107	106	108	103
L17041069-46	1.00	01	107	104	109	103
WG611222-01	1.00	01	107	105	106	103
WG611222-02	1.00	01	108	106	102	104
WG611222-06	1.00	02	109	106	106	103

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Login Number: L17041069
Instrument Id: HPMS11
Workgroup (AAB#): WG611145

Method: 8260
CAL ID: HPMS11-14-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-20	1.00	01	105	98.2	109	106
L17041069-29	1.00	01	101	95.5	109	103
L17041069-30	1.00	01	99.2	96.9	109	104
L17041069-31	1.00	01	100	95.8	104	103
L17041069-32	1.00	01	101	97.0	107	104
L17041069-33	1.00	01	101	97.2	102	102
L17041069-34	1.00	01	101	98.2	98.4	104
L17041069-35	1.00	01	101	97.8	103	102
L17041069-36	1.00	01	100	97.3	105	103
L17041069-37	1.00	01	102	98.8	109	104
L17041069-38	1.00	01	100	96.8	101	103
L17041069-39	1.00	01	96.8	93.5	100	101
L17041069-40	1.00	01	101	96.2	106	104
L17041069-41	1.00	01	100	96.8	103	103
WG611145-01	1.00	01	98.7	95.8	106	102
WG611145-02	1.00	01	100	98.4	106	107

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041069 **Method:** 8260
Instrument Id: HPMS8 **CAL ID:** HPMS8-17-APR-17
Workgroup (AAB#): WG611301 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-13	5.00	DL01	102	101	104	107
L17041069-44	1.00	01	103	101	105	107
L17041069-47	1.00	01	102	101	105	107
L17041069-48	1.00	01	105	101	105	106
L17041069-49	1.00	01	102	102	105	107
L17041069-50	1.00	01	101	101	105	106
WG611301-01	1.00	01	102	102	104	106
WG611301-02	1.00	01	98.2	101	101	107
WG611301-03	1.00	01	99.9	101	101	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041069 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-05-APR-17
Workgroup (AAB#): WG611071 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-21	1.00	01	107	105	107	103
L17041069-22	1.00	01	108	106	107	104
L17041069-23	1.00	01	109	105	105	103
L17041069-24	1.00	01	108	105	107	103
L17041069-25	1.00	01	106	105	106	103
L17041069-26	1.00	01	108	105	106	103
L17041069-27	1.00	01	107	105	104	102
L17041069-28	1.00	01	107	105	105	103
WG611071-01	1.00	01	106	105	107	103
WG611071-02	1.00	01	106	104	103	103

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Login Number: L17041069
Instrument Id: HPMS8
Workgroup (AAB#): WG611120

Method: 8260
CAL ID: HPMS8-17-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041069-01	1.00	01	101	101	104	106
L17041069-02	1.00	01	103	101	102	106
L17041069-03	1.00	01	101	101	104	107
L17041069-04	1.00	01	102	102	102	106
L17041069-05	1.00	01	102	102	105	105
L17041069-06	1.00	01	102	101	104	106
L17041069-07	1.00	01	102	101	104	106
L17041069-08	1.00	01	104	103	102	105
L17041069-09	1.00	01	103	103	101	106
L17041069-10	1.00	01	102	101	105	106
L17041069-11	1.00	01	101	101	105	107
L17041069-12	1.00	01	104	101	103	105
L17041069-13	1.00	01	103	99.7	104	106
L17041069-14	1.00	01	102	101	104	107
L17041069-15	1.00	01	102	100	106	105
L17041069-16	1.00	01	102	102	102	106
L17041069-17	1.00	01	101	101	105	107
L17041069-18	1.00	01	98.9	100	105	106
L17041069-19	1.00	01	101	99.7	103	106
WG611120-01	1.00	01	103	101	104	106
WG611120-02	1.00	01	99.0	101	101	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5259051
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611145
Blank File ID: 11M17651
Blank Sample ID: WG611145-01
Prep Date: 04/21/17 17:33
Instrument ID: HPMS11
Analyzed Date: 04/21/17 17:33
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611145-02	11M17652	04/21/17 18:02	01
MW-204B-LS-25	L17041069-33	11M17653	04/21/17 18:31	01
MW-204B-LS-25	L17041069-34	11M17654	04/21/17 19:01	01
MW-204B-LS-25	L17041069-32	11M17659	04/21/17 20:58	01
MW-271-LS-25	L17041069-29	11M17660	04/21/17 21:27	01
MW-97-LS-25	L17041069-30	11M17661	04/21/17 21:57	01
MW-204A-LS-25	L17041069-31	11M17662	04/21/17 22:26	01
MW-197A-LS-25	L17041069-35	11M17663	04/21/17 22:56	01
MW-197B-LS-25	L17041069-36	11M17664	04/21/17 23:25	01
MW-203A-LS-25	L17041069-37	11M17665	04/21/17 23:54	01
MW-203B-LS-25	L17041069-38	11M17666	04/22/17 00:24	01
MW-210A-LS-25	L17041069-39	11M17667	04/22/17 00:54	01
MW-210B-LS-25	L17041069-40	11M17668	04/22/17 01:24	01
MW-277-LS-25	L17041069-41	11M17669	04/22/17 01:53	01
MW-217-LS-25	L17041069-20	11M17670	04/22/17 02:22	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611071
Blank File ID: 6M146601
Blank Sample ID: WG611071-01
Prep Date: 04/21/17 14:56
Instrument ID: HPMS6
Analyzed Date: 04/21/17 14:56
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611071-02	6M146607	04/21/17 18:01	01
MW-259-LS-25	L17041069-27	6M146608	04/21/17 18:31	01
MW-259-LS-25	L17041069-28	6M146609	04/21/17 19:02	01
MW-64-LS-25	L17041069-21	6M146611	04/21/17 20:03	01
MW-259-LS-25	L17041069-26	6M146612	04/21/17 20:34	01
MW-272-LS-25	L17041069-25	6M146613	04/21/17 21:04	01
MW-270-LS-25	L17041069-24	6M146614	04/21/17 21:35	01
MW-268-LS-25	L17041069-23	6M146615	04/21/17 22:05	01
MW-218-LS-25	L17041069-22	6M146616	04/21/17 22:35	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611222
Blank File ID: 6M146641
Blank Sample ID: WG611222-01
Prep Date: 04/22/17 15:55
Instrument ID: HPMS6
Analyzed Date: 04/22/17 15:55
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611222-02	6M146642	04/22/17 16:26	01
LCS	WG611222-06	6M146645	04/22/17 17:57	02
MW-98-LS-25	L17041069-43	6M146655	04/22/17 23:03	01
MW-205A-LS-25	L17041069-45	6M146656	04/22/17 23:33	01
MW-205B-LS-25	L17041069-46	6M146657	04/23/17 00:03	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Work Group: WG611120
Blank File ID: 8M419090
Blank Sample ID: WG611120-01
Prep Date: 04/21/17 14:04
Instrument ID: HPMS8
Analyzed Date: 04/21/17 14:04
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611120-02	8M419091	04/21/17 14:34	01
PMW92-03-LS-25	L17041069-08	8M419092	04/21/17 15:04	01
PMW92-03-LS-25	L17041069-09	8M419093	04/21/17 15:34	01
PMW92-03-LS-25	L17041069-07	8M419095	04/21/17 16:33	01
DR2-3-LS-25	L17041069-05	8M419096	04/21/17 17:04	01
DR2-2-LS-25	L17041069-15	8M419097	04/21/17 17:34	01
MW-266-LS-25	L17041069-16	8M419098	04/21/17 18:03	01
MW-26-LS-25	L17041069-18	8M419099	04/21/17 18:34	01
PMW-85-05-LS-25	L17041069-04	8M419100	04/21/17 19:03	01
PMW-85-01-LS-25	L17041069-02	8M419101	04/21/17 19:33	01
MW-113-LS-25	L17041069-06	8M419102	04/21/17 20:03	01
MW-85-LS-25	L17041069-01	8M419103	04/21/17 20:33	01
PMW92-02-LS-25	L17041069-10	8M419104	04/21/17 21:03	01
MW-92-LS-25	L17041069-12	8M419105	04/21/17 21:32	01
DR2-6-LS-25	L17041069-19	8M419106	04/21/17 22:02	01
DR2-1-LS-25	L17041069-13	8M419107	04/21/17 22:32	01
MW-88-LS-25	L17041069-14	8M419108	04/21/17 23:02	01
MW-267-LS-25	L17041069-17	8M419109	04/21/17 23:32	01
DUP-10	L17041069-03	8M419110	04/22/17 00:03	01
DUP-3	L17041069-11	8M419111	04/22/17 00:33	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041069
Blank File ID: 8M419118
Prep Date: 04/24/17 12:42
Analyzed Date: 04/24/17 12:42
Analyst: TMB

Work Group: WG611301
Blank Sample ID: WG611301-01
Instrument ID: HPMS8
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611301-02	8M419119	04/24/17 13:13	01
LCS2	WG611301-03	8M419120	04/24/17 13:44	01
DR2-1-LS-25	L17041069-13	8M419121	04/24/17 14:14	DL01
DUP-6	L17041069-44	8M419122	04/24/17 14:45	01
MW-39A-LS-25	L17041069-47	8M419123	04/24/17 15:16	01
MW-39-LS-25	L17041069-48	8M419124	04/24/17 15:46	01
MW-206B-LS-25	L17041069-49	8M419125	04/24/17 16:17	01
MW-206A-LS-25	L17041069-50	8M419126	04/24/17 16:48	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041069	Work Group:	WG611561
Blank File ID:	8M419167	Blank Sample ID:	WG611561-01
Prep Date:	04/26/17 09:27	Instrument ID:	HPMS8
Analyzed Date:	04/26/17 09:27	Method:	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611561-02	8M419168	04/26/17 09:56	01
LCS2	WG611561-03	8M419169	04/26/17 10:27	01
MW-280-LS-25	L17041069-42	8M419173	04/26/17 12:27	01

Report Name: BLANK_SUMMARY
PDF File ID: 5259855
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 17:33 Sample ID:WG611145-01
Instrument ID:HPMS11 Run Date:04/21/17 17:33 Prep Method:5030B/5030C/503
File ID:11M17651 Analyst:JDS Method:8260B
Workgroup (AAB#):WG611145 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-14-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 17:33 Sample ID:WG611145-01
Instrument ID:HPMS11 Run Date:04/21/17 17:33 Prep Method:5030B/5030C/503
File ID:11M17651 Analyst:JDS Method:8260B
Workgroup (AAB#):WG611145 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-14-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	95.8	85 - 115	PASS
1,2-Dichloroethane-d4	98.7	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
25-JUL-2017 12:53

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/21/17 14:56 Sample ID:WG611071-01
Instrument ID:HPMS6 Run Date:04/21/17 14:56 Prep Method:5030B/5030C/503
File ID:6M146601 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611071 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/21/17 14:56 Sample ID: WG611071-01
Instrument ID: HPMS6 Run Date: 04/21/17 14:56 Prep Method: 5030B/5030C/503
File ID: 6M146601 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	105	85	-	115	PASS
1,2-Dichloroethane-d4	106	72	-	119	PASS
Toluene-d8	103	81	-	120	PASS
4-Bromofluorobenzene	107	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
25-JUL-2017 12:53

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/22/17 15:55 Sample ID: WG611222-01
Instrument ID: HPMS6 Run Date: 04/22/17 15:55 Prep Method: 5030B/5030C/503
File ID: 6M146641 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5259045
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/22/17 15:55 Sample ID: WG611222-01
Instrument ID: HPMS6 Run Date: 04/22/17 15:55 Prep Method: 5030B/5030C/503
File ID: 6M146641 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	105	85	-	115	PASS
1,2-Dichloroethane-d4	107	72	-	119	PASS
Toluene-d8	103	81	-	120	PASS
4-Bromofluorobenzene	106	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

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METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/21/17 14:04 Sample ID: WG611120-01
Instrument ID: HPMS8 Run Date: 04/21/17 14:04 Prep Method: 5030B/5030C/503
File ID: 8M419090 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/21/17 14:04 Sample ID: WG611120-01
Instrument ID: HPMS8 Run Date: 04/21/17 14:04 Prep Method: 5030B/5030C/503
File ID: 8M419090 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

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METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/24/17 12:42 Sample ID:WG611301-01
Instrument ID:HPMS8 Run Date:04/24/17 12:42 Prep Method:5030B/5030C/503
File ID:8M419118 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611301 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/24/17 12:42 Sample ID:WG611301-01
Instrument ID:HPMS8 Run Date:04/24/17 12:42 Prep Method:5030B/5030C/503
File ID:8M419118 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611301 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	102	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041069 Prep Date:04/26/17 09:27 Sample ID:WG611561-01
Instrument ID:HPMS8 Run Date:04/26/17 09:27 Prep Method:5030B/5030C/503
File ID:8M419167 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611561 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041069 Prep Date: 04/26/17 09:27 Sample ID: WG611561-01
Instrument ID: HPMS8 Run Date: 04/26/17 09:27 Prep Method: 5030B/5030C/503
File ID: 8M419167 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611561 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5259045
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611145-02
Instrument ID: HPMS11 Run Time: 18:02 Prep Method: 5030B/5030C/503
File ID: 11M17652 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611145 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS11-14-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.8	104	81 - 129	
1,1,1-Trichloroethane	20.0	20.7	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.8	104	63 - 128	
1,1,2-Trichloroethane	20.0	20.1	101	75 - 125	
1,1-Dichloroethane	20.0	20.1	100	69 - 133	
1,1-Dichloroethene	20.0	18.8	94.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.4	73 - 132	
1,2,3-Trichlorobenzene	20.0	21.3	106	67 - 137	
1,2,3-Trichloropropane	20.0	20.8	104	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.6	108	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.4	96.8	69 - 132	
1,2-Dichlorobenzene	20.0	20.7	104	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.6	108	50 - 132	
1,2-Dichloropropane	20.0	20.1	101	75 - 125	
1,2-Dibromoethane	20.0	20.1	101	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	102	74 - 131	
1,3-Dichlorobenzene	20.0	20.5	102	75 - 124	
1,3-Dichloropropane	20.0	21.1	105	73 - 126	
1,4-Dichlorobenzene	20.0	20.6	103	74 - 123	
1-Chlorohexane	20.0	22.9	115	70 - 125	
2,2-Dichloropropane	20.0	17.9	89.7	69 - 137	
2-Hexanone	20.0	22.4	112	55 - 130	
2-Chlorotoluene	20.0	18.7	93.4	73 - 126	
4-Chlorotoluene	20.0	21.2	106	74 - 128	
Acetone	20.0	19.7	98.6	40 - 135	
Benzene	20.0	20.3	101	81 - 122	
Bromobenzene	20.0	20.8	104	76 - 124	
Bromochloromethane	20.0	20.2	101	65 - 129	
Bromodichloromethane	20.0	19.4	97.0	76 - 121	
Bromoform	20.0	18.2	91.1	69 - 128	
Bromomethane	20.0	20.3	101	30 - 141	
Carbon disulfide	20.0	17.7	88.4	58 - 128	
Carbon tetrachloride	20.0	20.3	101	66 - 138	
Chlorobenzene	20.0	20.8	104	81 - 122	
Chloroethane	20.0	22.0	110	58 - 133	
Chloroform	20.0	18.7	93.6	69 - 128	
Chloromethane	20.0	19.7	98.6	56 - 131	
cis-1,2-Dichloroethene	20.0	20.0	100	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	109	69 - 131	
Dibromochloromethane	20.0	20.8	104	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611145-02
Instrument ID: HPMS11 Run Time: 18:02 Prep Method: 5030B/5030C/503
File ID: 11M17652 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611145 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS11-14-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.6	103	76 - 125	
Dichlorodifluoromethane	20.0	23.0	115	30 - 153	
Ethylbenzene	20.0	20.7	103	73 - 127	
Hexachlorobutadiene	20.0	20.2	101	67 - 131	
Isopropylbenzene	20.0	20.6	103	75 - 127	
Methylene chloride	20.0	18.3	91.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.1	100	65 - 123	
MEK (2-Butanone)	20.0	21.0	105	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.4	102	58 - 134	
n-Butylbenzene	20.0	21.2	106	69 - 137	
n-Propylbenzene	20.0	20.5	102	72 - 129	
m-,p-Xylene	40.0	43.4	108	76 - 128	
Naphthalene	20.0	22.9	114	54 - 138	
o-Xylene	20.0	20.8	104	80 - 121	
p-Isopropyltoluene	20.0	21.1	106	73 - 130	
sec-Butylbenzene	20.0	20.2	101	72 - 127	
Styrene	20.0	22.7	113	65 - 134	
Trichloroethene	20.0	19.7	98.4	70 - 127	
tert-Butylbenzene	20.0	20.5	103	70 - 129	
Tetrachloroethene	20.0	19.8	99.1	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	19.5	97.4	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	104	59 - 135	
Trichlorofluoromethane	20.0	19.8	99.0	57 - 129	
Vinyl chloride	20.0	19.9	99.4	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611071-02
Instrument ID: HPMS6 Run Time: 18:01 Prep Method: 5030B/5030C/503
File ID: 6M146607 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.7	93.3	81 - 129	
1,1,1-Trichloroethane	20.0	20.9	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.3	91.3	63 - 128	
1,1,2-Trichloroethane	20.0	19.1	95.7	75 - 125	
1,1-Dichloroethane	20.0	21.0	105	69 - 133	
1,1-Dichloroethene	20.0	20.6	103	68 - 130	
1,1-Dichloropropene	20.0	20.4	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.7	88.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.0	94.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.6	93.1	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.1	95.7	74 - 132	
1,2-Dichloroethane	20.0	20.4	102	69 - 132	
1,2-Dichlorobenzene	20.0	18.1	90.3	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	17.7	88.6	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	18.6	92.8	80 - 121	
1,3,5-Trimethylbenzene	20.0	18.9	94.6	74 - 131	
1,3-Dichlorobenzene	20.0	17.9	89.6	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.2	91.1	74 - 123	
1-Chlorohexane	20.0	20.1	100	70 - 125	
2,2-Dichloropropane	20.0	15.0	75.1	69 - 137	
2-Hexanone	20.0	20.3	102	55 - 130	
2-Chlorotoluene	20.0	17.1	85.3	73 - 126	
4-Chlorotoluene	20.0	20.8	104	74 - 128	
Acetone	20.0	21.8	109	40 - 135	
Benzene	20.0	19.6	97.8	81 - 122	
Bromobenzene	20.0	18.4	92.2	76 - 124	
Bromochloromethane	20.0	20.1	101	65 - 129	
Bromodichloromethane	20.0	20.1	100	76 - 121	
Bromoform	20.0	17.6	88.1	69 - 128	
Bromomethane	20.0	11.8	59.2	30 - 141	
Carbon disulfide	20.0	17.5	87.4	58 - 128	
Carbon tetrachloride	20.0	22.3	112	66 - 138	
Chlorobenzene	20.0	18.6	93.2	81 - 122	
Chloroethane	20.0	22.9	115	58 - 133	
Chloroform	20.0	19.1	95.6	69 - 128	
Chloromethane	20.0	22.1	110	56 - 131	
cis-1,2-Dichloroethene	20.0	19.9	99.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.2	106	69 - 131	
Dibromochloromethane	20.0	18.6	93.2	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611071-02
Instrument ID: HPMS6 Run Time: 18:01 Prep Method: 5030B/5030C/503
File ID: 6M146607 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611071 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.0	100	76 - 125	
Dichlorodifluoromethane	20.0	24.0	120	30 - 153	
Ethylbenzene	20.0	18.8	94.2	73 - 127	
Hexachlorobutadiene	20.0	18.2	91.0	67 - 131	
Isopropylbenzene	20.0	19.0	94.9	75 - 127	
Methylene chloride	20.0	19.6	98.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.9	105	65 - 123	
MEK (2-Butanone)	20.0	20.5	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.1	100	58 - 134	
n-Butylbenzene	20.0	19.4	97.1	69 - 137	
n-Propylbenzene	20.0	18.9	94.5	72 - 129	
m-,p-Xylene	40.0	37.6	94.0	76 - 128	
Naphthalene	20.0	18.6	92.9	54 - 138	
o-Xylene	20.0	18.9	94.4	80 - 121	
p-Isopropyltoluene	20.0	19.0	94.8	73 - 130	
sec-Butylbenzene	20.0	18.9	94.5	72 - 127	
Styrene	20.0	19.3	96.4	65 - 134	
Trichloroethene	20.0	19.6	98.1	70 - 127	
tert-Butylbenzene	20.0	18.9	94.4	70 - 129	
Tetrachloroethene	20.0	19.4	96.8	66 - 128	
Toluene	20.0	19.1	95.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.6	97.8	63 - 137	
trans-1,3-Dichloropropene	20.0	18.9	94.7	59 - 135	
Trichlorofluoromethane	20.0	20.8	104	57 - 129	
Vinyl chloride	20.0	21.8	109	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	103	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611222-02
Instrument ID: HPMS6 Run Time: 16:26 Prep Method: 5030B/5030C/503
File ID: 6M146642 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.0	89.9	81 - 129	
1,1,1-Trichloroethane	20.0	20.2	101	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.7	93.3	63 - 128	
1,1,2-Trichloroethane	20.0	18.9	94.5	75 - 125	
1,1-Dichloroethane	20.0	20.6	103	69 - 133	
1,1-Dichloroethene	20.0	20.5	102	68 - 130	
1,1-Dichloropropene	20.0	20.0	99.9	73 - 132	
1,2,3-Trichlorobenzene	20.0	15.8	79.1	67 - 137	
1,2,3-Trichloropropane	20.0	18.8	93.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	17.1	85.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	18.5	92.7	74 - 132	
1,2-Dichloroethane	20.0	20.4	102	69 - 132	
1,2-Dichlorobenzene	20.0	17.6	88.0	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	17.6	87.8	50 - 132	
1,2-Dichloropropane	20.0	20.2	101	75 - 125	
1,2-Dibromoethane	20.0	18.6	93.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	18.1	90.7	74 - 131	
1,3-Dichlorobenzene	20.0	17.4	87.0	75 - 124	
1,3-Dichloropropane	20.0	20.1	101	73 - 126	
1,4-Dichlorobenzene	20.0	17.6	87.9	74 - 123	
1-Chlorohexane	20.0	19.5	97.4	70 - 125	
2,2-Dichloropropane	20.0	16.2	81.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	16.5	82.5	73 - 126	
4-Chlorotoluene	20.0	19.8	99.2	74 - 128	
Acetone	20.0	23.3	116	40 - 135	
Benzene	20.0	19.4	97.1	81 - 122	
Bromobenzene	20.0	17.5	87.7	76 - 124	
Bromochloromethane	20.0	20.7	104	65 - 129	
Bromodichloromethane	20.0	19.6	98.2	76 - 121	
Bromoform	20.0	17.7	88.6	69 - 128	
Bromomethane	20.0	13.8	69.1	30 - 141	
Carbon disulfide	20.0	17.3	86.3	58 - 128	
Carbon tetrachloride	20.0	21.1	105	66 - 138	
Chlorobenzene	20.0	18.1	90.4	81 - 122	
Chloroethane	20.0	23.0	115	58 - 133	
Chloroform	20.0	19.0	94.8	69 - 128	
Chloromethane	20.0	23.2	116	56 - 131	
cis-1,2-Dichloroethene	20.0	19.4	97.2	72 - 126	
cis-1,3-Dichloropropene	20.0	21.1	106	69 - 131	
Dibromochloromethane	20.0	18.3	91.6	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611222-02
Instrument ID: HPMS6 Run Time: 16:26 Prep Method: 5030B/5030C/503
File ID: 6M146642 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG611222 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	24.1	120	30 - 153	
Ethylbenzene	20.0	18.0	89.8	73 - 127	
Hexachlorobutadiene	20.0	16.8	84.1	67 - 131	
Isopropylbenzene	20.0	18.5	92.4	75 - 127	
Methylene chloride	20.0	20.0	99.9	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.5	102	65 - 123	
MEK (2-Butanone)	20.0	21.1	105	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.2	106	58 - 134	
n-Butylbenzene	20.0	18.8	94.0	69 - 137	
n-Propylbenzene	20.0	17.8	89.1	72 - 129	
m-,p-Xylene	40.0	37.1	92.7	76 - 128	
Naphthalene	20.0	16.9	84.5	54 - 138	
o-Xylene	20.0	18.6	92.9	80 - 121	
p-Isopropyltoluene	20.0	18.1	90.7	73 - 130	
sec-Butylbenzene	20.0	17.7	88.4	72 - 127	
Styrene	20.0	19.1	95.7	65 - 134	
Trichloroethene	20.0	18.0	90.0	70 - 127	
tert-Butylbenzene	20.0	17.8	89.2	70 - 129	
Tetrachloroethene	20.0	18.5	92.3	66 - 128	
Toluene	20.0	18.8	93.8	77 - 122	
trans-1,2-Dichloroethene	20.0	19.3	96.3	63 - 137	
trans-1,3-Dichloropropene	20.0	19.3	96.4	59 - 135	
Trichlorofluoromethane	20.0	20.6	103	57 - 129	
Vinyl chloride	20.0	22.7	114	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	106	85 - 115	PASS
1,2-Dichloroethane-d4	108	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611120-02
Instrument ID: HPMS8 Run Time: 14:34 Prep Method: 5030B/5030C/503
File ID: 8M419091 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.0	95.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.1	90.5	63 - 128	
1,1,2-Trichloroethane	20.0	18.3	91.5	75 - 125	
1,1-Dichloroethane	20.0	19.1	95.5	69 - 133	
1,1-Dichloroethene	20.0	18.8	94.1	68 - 130	
1,1-Dichloropropene	20.0	19.0	95.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	67 - 137	
1,2,3-Trichloropropane	20.0	18.4	92.2	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	93.8	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.4	74 - 132	
1,2-Dichloroethane	20.0	18.9	94.5	69 - 132	
1,2-Dichlorobenzene	20.0	18.8	93.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	16.7	83.7	50 - 132	
1,2-Dichloropropane	20.0	18.4	91.9	75 - 125	
1,2-Dibromoethane	20.0	18.8	93.8	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.4	97.0	74 - 131	
1,3-Dichlorobenzene	20.0	18.6	93.2	75 - 124	
1,3-Dichloropropane	20.0	18.9	94.3	73 - 126	
1,4-Dichlorobenzene	20.0	18.4	91.9	74 - 123	
1-Chlorohexane	20.0	21.0	105	70 - 125	
2,2-Dichloropropane	20.0	19.7	98.4	69 - 137	
2-Hexanone	20.0	17.8	88.9	55 - 130	
2-Chlorotoluene	20.0	17.7	88.5	73 - 126	
4-Chlorotoluene	20.0	19.7	98.3	74 - 128	
Acetone	20.0	17.3	86.7	40 - 135	
Benzene	20.0	19.3	96.4	81 - 122	
Bromobenzene	20.0	18.9	94.7	76 - 124	
Bromochloromethane	20.0	19.9	99.4	65 - 129	
Bromodichloromethane	20.0	19.0	94.9	76 - 121	
Bromoform	20.0	16.4	82.1	69 - 128	
Bromomethane	20.0	23.8	119	30 - 141	
Carbon disulfide	20.0	17.0	84.9	58 - 128	
Carbon tetrachloride	20.0	20.7	104	66 - 138	
Chlorobenzene	20.0	18.4	91.9	81 - 122	
Chloroethane	20.0	21.7	109	58 - 133	
Chloroform	20.0	18.0	90.0	69 - 128	
Chloromethane	20.0	20.9	104	56 - 131	
cis-1,2-Dichloroethene	20.0	19.1	95.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.2	101	69 - 131	
Dibromochloromethane	20.0	18.8	93.8	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611120-02
Instrument ID: HPMS8 Run Time: 14:34 Prep Method: 5030B/5030C/503
File ID: 8M419091 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611120 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.2	96.0	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	18.8	93.8	73 - 127	
Hexachlorobutadiene	20.0	18.6	93.2	67 - 131	
Isopropylbenzene	20.0	19.8	99.0	75 - 127	
Methylene chloride	20.0	18.8	94.0	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	18.1	90.7	65 - 123	
MEK (2-Butanone)	20.0	17.7	88.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	17.6	88.2	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	19.2	95.8	72 - 129	
m-,p-Xylene	40.0	39.7	99.3	76 - 128	
Naphthalene	20.0	18.5	92.6	54 - 138	
o-Xylene	20.0	18.9	94.7	80 - 121	
p-Isopropyltoluene	20.0	19.8	99.1	73 - 130	
sec-Butylbenzene	20.0	19.4	97.2	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	19.2	96.2	70 - 127	
tert-Butylbenzene	20.0	19.0	95.0	70 - 129	
Tetrachloroethene	20.0	20.3	101	66 - 128	
Toluene	20.0	19.7	98.5	77 - 122	
trans-1,2-Dichloroethene	20.0	18.8	93.9	63 - 137	
trans-1,3-Dichloropropene	20.0	18.4	91.8	59 - 135	
Trichlorofluoromethane	20.0	20.7	103	57 - 129	
Vinyl chloride	20.0	19.2	95.8	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	99.0	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5259046
Report generated: 07/25/2017 12:53

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.5	92.6	20.0	18.9	94.4	1.96	81 - 129	20	
1,1,1-Trichloroethane	20.0	19.8	98.8	20.0	20.2	101	2.41	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.0	89.8	20.0	18.5	92.3	2.82	63 - 128	20	
1,1,2-Trichloroethane	20.0	17.8	88.8	20.0	18.2	90.8	2.25	75 - 125	20	
1,1-Dichloroethane	20.0	18.9	94.5	20.0	19.1	95.7	1.27	69 - 133	20	
1,1-Dichloroethene	20.0	18.3	91.4	20.0	18.8	94.1	2.98	68 - 130	20	
1,1-Dichloropropene	20.0	18.8	93.8	20.0	19.2	95.9	2.19	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.4	92.1	20.0	18.9	94.5	2.58	67 - 137	20	
1,2,3-Trichloropropane	20.0	17.9	89.7	20.0	18.9	94.4	5.13	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	18.7	93.6	20.0	18.9	94.7	1.18	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.9	99.5	20.0	19.8	99.2	0.357	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	16.4	81.9	20.0	17.1	85.3	4.07	50 - 132	20	
1,2-Dibromoethane	20.0	18.1	90.4	20.0	18.8	93.8	3.71	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.5	92.5	20.0	18.9	94.3	1.98	71 - 122	20	
1,2-Dichloroethane	20.0	18.6	93.0	20.0	19.5	97.3	4.55	69 - 132	20	
1,2-Dichloropropane	20.0	18.6	93.2	20.0	18.8	94.1	0.974	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	20.0	19.5	97.5	0.252	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.6	92.8	20.0	18.8	93.8	1.08	75 - 124	20	
1,3-Dichloropropane	20.0	18.5	92.5	20.0	19.1	95.7	3.36	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.2	90.9	20.0	18.4	92.2	1.48	74 - 123	20	
1-Chlorohexane	20.0	21.0	105	20.0	20.8	104	1.02	70 - 125	20	
2,2-Dichloropropane	20.0	19.0	94.9	20.0	19.9	99.4	4.54	69 - 137	20	
MEK (2-Butanone)	20.0	16.6	83.1	20.0	17.8	89.2	7.06	49 - 136	20	
2-Chlorotoluene	20.0	17.4	87.1	20.0	17.1	85.6	1.79	73 - 126	20	
2-Hexanone	20.0	17.8	89.0	20.0	18.5	92.3	3.68	55 - 130	20	
4-Chlorotoluene	20.0	19.9	99.7	20.0	20.4	102	2.11	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	17.3	86.4	20.0	19.1	95.7	10.3	58 - 134	20	
Acetone	20.0	17.4	86.9	20.0	18.4	91.8	5.46	40 - 135	20	
Benzene	20.0	19.3	96.6	20.0	19.5	97.5	0.954	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.6	0.924	76 - 124	20	
Bromochloromethane	20.0	19.6	97.8	20.0	19.9	99.7	2.00	65 - 129	20	
Bromodichloromethane	20.0	18.5	92.7	20.0	19.3	96.4	3.89	76 - 121	20	
Bromoform	20.0	15.6	77.8	20.0	16.2	81.1	4.14	69 - 128	20	
Bromomethane	20.0	20.8	104	20.0	22.6	113	8.15	30 - 141	20	
Carbon disulfide	20.0	16.8	84.2	20.0	17.3	86.3	2.56	58 - 128	20	
Carbon tetrachloride	20.0	19.8	98.8	20.0	20.5	102	3.39	66 - 138	20	
Chlorobenzene	20.0	18.4	92.0	20.0	18.3	91.5	0.590	81 - 122	20	
Chloroethane	20.0	21.1	106	20.0	21.7	108	2.61	58 - 133	20	
Chloroform	20.0	17.9	89.4	20.0	17.9	89.7	0.264	69 - 128	20	
Chloromethane	20.0	20.9	104	20.0	21.3	106	1.96	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.0	95.2	20.0	19.4	97.2	2.02	72 - 126	20	
cis-1,3-Dichloropropene	20.0	19.9	99.7	20.0	20.3	101	1.63	69 - 131	20	
Dibromochloromethane	20.0	18.4	92.1	20.0	18.3	91.6	0.462	66 - 133	20	
Dibromomethane	20.0	18.8	94.1	20.0	19.3	96.3	2.30	76 - 125	20	
Dichlorodifluoromethane	20.0	20.7	104	20.0	21.9	109	5.33	30 - 153	20	
Ethylbenzene	20.0	18.4	91.9	20.0	18.6	93.1	1.29	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.7	93.4	2.69	67 - 131	20	
Isopropylbenzene	20.0	19.4	97.2	20.0	19.7	98.3	1.18	75 - 127	20	
m-,p-Xylene	40.0	38.9	97.3	40.0	39.4	98.6	1.27	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	17.9	89.5	20.0	19.0	94.9	5.83	65 - 123	20	
Methylene chloride	20.0	18.1	90.4	20.0	18.7	93.4	3.20	63 - 137	20	
n-Butylbenzene	20.0	20.2	101	20.0	20.2	101	0.0393	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.1	20.0	19.4	97.0	1.02	72 - 129	20	
Naphthalene	20.0	18.6	92.9	20.0	19.0	95.2	2.52	54 - 138	20	
o-Xylene	20.0	18.5	92.6	20.0	18.8	93.8	1.28	80 - 121	20	
p-Isopropyltoluene	20.0	19.9	99.3	20.0	20.1	101	1.42	73 - 130	20	
sec-Butylbenzene	20.0	19.4	96.8	20.0	19.6	97.8	1.01	72 - 127	20	
Styrene	20.0	20.0	100	20.0	20.2	101	0.654	65 - 134	20	
tert-Butylbenzene	20.0	18.5	92.3	20.0	18.7	93.7	1.48	70 - 129	20	
Tetrachloroethene	20.0	19.6	98.1	20.0	19.7	98.6	0.502	66 - 128	20	
Toluene	20.0	19.6	97.8	20.0	19.6	97.8	0.0167	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.4	92.1	20.0	19.1	95.4	3.52	63 - 137	20	
trans-1,3-Dichloropropene	20.0	17.8	89.1	20.0	18.3	91.5	2.62	59 - 135	20	
Trichloroethene	20.0	18.5	92.3	20.0	19.1	95.7	3.62	70 - 127	20	
Trichlorofluoromethane	20.0	19.7	98.3	20.0	20.1	101	2.41	57 - 129	20	
Vinyl chloride	20.0	19.6	98.1	20.0	19.4	97.2	0.875	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	98.2	99.9	72 - 119	PASS
Dibromofluoromethane	101	101	85 - 115	PASS
4-Bromofluorobenzene	101	101	76 - 119	PASS
Toluene-d8	107	105	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	20.0	18.9	94.3	0.0705	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.0	99.8	20.0	20.1	100	0.625	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.8	98.9	20.0	19.0	95.1	3.91	63 - 128	20	
1,1,2-Trichloroethane	20.0	18.9	94.7	20.0	18.4	92.2	2.66	75 - 125	20	
1,1-Dichloroethane	20.0	19.1	95.5	20.0	19.2	96.1	0.605	69 - 133	20	
1,1-Dichloroethene	20.0	18.6	92.8	20.0	18.6	93.2	0.473	68 - 130	20	
1,1-Dichloropropene	20.0	19.1	95.6	20.0	19.5	97.4	1.85	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.3	96.5	20.0	18.9	94.3	2.24	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.9	99.6	20.0	19.2	95.9	3.79	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	94.9	20.0	18.9	94.7	0.183	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	20.0	19.8	98.9	0.263	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.8	89.0	20.0	16.3	81.5	8.79	50 - 132	20	
1,2-Dibromoethane	20.0	19.3	96.7	20.0	18.8	93.9	2.94	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.9	94.4	20.0	18.5	92.7	1.82	71 - 122	20	
1,2-Dichloroethane	20.0	19.9	99.3	20.0	19.1	95.5	3.91	69 - 132	20	
1,2-Dichloropropane	20.0	19.3	96.6	20.0	19.2	96.0	0.658	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.0	95.1	20.0	19.3	96.5	1.41	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.5	92.3	20.0	18.5	92.4	0.160	75 - 124	20	
1,3-Dichloropropane	20.0	19.9	99.6	20.0	19.5	97.6	2.07	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.4	91.9	20.0	18.2	91.1	0.810	74 - 123	20	
1-Chlorohexane	20.0	21.9	109	20.0	21.9	109	0.188	70 - 125	20	
2,2-Dichloropropane	20.0	19.1	95.5	20.0	20.0	100	4.77	69 - 137	20	
MEK (2-Butanone)	20.0	20.5	103	20.0	19.8	98.8	3.66	49 - 136	20	
2-Chlorotoluene	20.0	17.8	88.9	20.0	17.9	89.3	0.412	73 - 126	20	
2-Hexanone	20.0	20.7	103	20.0	19.5	97.5	5.81	55 - 130	20	
4-Chlorotoluene	20.0	19.4	97.2	20.0	19.7	98.6	1.49	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	21.0	105	20.0	19.2	96.2	8.91	58 - 134	20	
Acetone	20.0	20.5	103	20.0	18.7	93.3	9.55	40 - 135	20	
Benzene	20.0	19.5	97.7	20.0	19.5	97.7	0.0311	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.3	0.515	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	19.8	99.0	1.20	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.1	20.0	19.3	96.5	0.385	76 - 121	20	
Bromoform	20.0	16.8	84.0	20.0	15.8	78.8	6.28	69 - 128	20	
Bromomethane	20.0	23.8	119	20.0	25.9	130	8.66	30 - 141	20	
Carbon disulfide	20.0	16.2	80.9	20.0	16.1	80.5	0.442	58 - 128	20	
Carbon tetrachloride	20.0	20.3	102	20.0	20.4	102	0.314	66 - 138	20	
Chlorobenzene	20.0	18.3	91.3	20.0	18.4	91.8	0.577	81 - 122	20	
Chloroethane	20.0	23.1	115	20.0	23.1	116	0.144	58 - 133	20	
Chloroform	20.0	18.2	90.8	20.0	18.2	90.8	0.0142	69 - 128	20	
Chloromethane	20.0	22.6	113	20.0	22.2	111	1.73	56 - 131	20	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041069 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.1	95.6	20.0	19.3	96.7	1.20	72 - 126	20	
cis-1,3-Dichloropropene	20.0	20.6	103	20.0	20.5	102	0.709	69 - 131	20	
Dibromochloromethane	20.0	19.1	95.6	20.0	18.5	92.5	3.27	66 - 133	20	
Dibromomethane	20.0	20.2	101	20.0	19.7	98.5	2.42	76 - 125	20	
Dichlorodifluoromethane	20.0	25.4	127	20.0	25.7	128	1.01	30 - 153	20	
Ethylbenzene	20.0	18.5	92.4	20.0	18.7	93.7	1.41	73 - 127	20	
Hexachlorobutadiene	20.0	17.3	86.3	20.0	17.5	87.3	1.18	67 - 131	20	
Isopropylbenzene	20.0	19.8	98.8	20.0	19.9	99.3	0.496	75 - 127	20	
m-,p-Xylene	40.0	38.8	97.1	40.0	39.6	99.1	1.98	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.0	100	20.0	19.2	96.1	4.03	65 - 123	20	
Methylene chloride	20.0	18.5	92.7	20.0	18.8	94.0	1.32	63 - 137	20	
n-Butylbenzene	20.0	20.0	99.8	20.0	20.2	101	1.36	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.2	20.0	19.5	97.3	1.21	72 - 129	20	
Naphthalene	20.0	20.5	103	20.0	19.7	98.4	4.23	54 - 138	20	
o-Xylene	20.0	18.7	93.3	20.0	18.9	94.7	1.50	80 - 121	20	
p-Isopropyltoluene	20.0	19.6	98.0	20.0	19.8	99.0	1.05	73 - 130	20	
sec-Butylbenzene	20.0	19.1	95.3	20.0	19.3	96.3	1.01	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.3	102	0.590	65 - 134	20	
tert-Butylbenzene	20.0	18.0	90.2	20.0	18.2	91.1	0.961	70 - 129	20	
Tetrachloroethene	20.0	19.7	98.4	20.0	19.5	97.6	0.728	66 - 128	20	
Toluene	20.0	19.7	98.6	20.0	19.8	98.8	0.142	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.9	94.5	20.0	18.8	94.2	0.345	63 - 137	20	
trans-1,3-Dichloropropene	20.0	18.9	94.6	20.0	18.7	93.3	1.31	59 - 135	20	
Trichloroethene	20.0	18.6	92.8	20.0	18.7	93.3	0.577	70 - 127	20	
Trichlorofluoromethane	20.0	21.6	108	20.0	21.3	107	1.42	57 - 129	20	
Vinyl chloride	20.0	22.5	112	20.0	21.8	109	3.10	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	101	72 - 119	PASS
Dibromofluoromethane	102	101	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	105	106	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS6- 05-APR-17 Worknum: WG611071

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-26 File ID: 6M146612 Dil: 1 Method: 5035A

Sample ID: L17041069-27 MS File ID: 6M146608 Dil: 1 Matrix: 8260B

Sample ID: L17041069-28 MSD File ID: 6M146609 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.0	90	20.0	18.3	91.6	1.68	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.6	98	20.0	19.8	99	0.976	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.239	20.0	19.5	96.3	20.0	20.6	102	5.30	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.9	94.5	20.0	19.6	97.8	3.41	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.7	98.7	20.0	20.3	101	2.63	69 - 133	20	
1,1-Dichloroethene	0.558	20.0	19.8	96	20.0	19.9	96.6	0.566	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.4	96.8	20.0	19.5	97.6	0.850	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	17.8	88.8	20.0	18.1	90.6	1.99	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	96	20.0	20.1	101	4.73	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.4	92	20.0	18.6	93	1.09	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	18.9	94.5	20.0	19.1	95.4	0.952	74 - 132	20	
1,2-Dichloroethane	2.29	20.0	22.1	99.2	20.0	22.2	99.8	0.503	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	17.9	89.4	20.0	18.2	91.2	1.96	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	17.8	88.9	20.0	19.4	96.8	8.56	50 - 132	20	
1,2-Dichloropropane	0.510	20.0	20.4	99.5	20.0	20.7	101	1.24	75 - 125	20	
1,2-Dibromoethane	U	20.0	18.3	91.7	20.0	19.0	95.2	3.72	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	18.4	92.1	20.0	18.7	93.4	1.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	17.9	89.4	20.0	18.0	90.2	0.793	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.8	99	20.0	20.5	102	3.33	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	17.9	89.7	20.0	18.2	91	1.42	74 - 123	20	
1-Chlorohexane	U	20.0	19.3	96.4	20.0	19.9	99.5	3.18	70 - 125	20	
2,2-Dichloropropane	U	20.0	11.5	57.7	20.0	16.0	80.2	32.6	69 - 137	20	*#
2-Hexanone	U	20.0	21.3	107	20.0	22.1	111	3.67	55 - 130	20	
2-Chlorotoluene	U	20.0	16.5	82.6	20.0	17.1	85.6	3.57	73 - 126	20	
4-Chlorotoluene	U	20.0	20.5	103	20.0	20.6	103	0.547	74 - 128	20	
Acetone	6.74	20.0	29.9	116	20.0	30.8	120	3.01	40 - 135	20	
Benzene	U	20.0	19.0	95	20.0	19.2	96	1.04	81 - 122	20	
Bromobenzene	U	20.0	18.0	90	20.0	18.5	92.6	2.90	76 - 124	20	
Bromochloromethane	U	20.0	19.8	98.8	20.0	20.4	102	3.32	65 - 129	20	
Bromodichloromethane	U	20.0	19.6	98.1	20.0	20.1	100	2.37	76 - 121	20	
Bromoform	U	20.0	17.8	89.1	20.0	18.3	91.4	2.55	69 - 128	20	
Bromomethane	U	20.0	12.2	60.8	20.0	12.4	61.9	1.83	30 - 141	20	
Carbon disulfide	U	20.0	16.5	82.6	20.0	16.5	82.6	0.0062	58 - 128	20	
Carbon tetrachloride	4.79	20.0	24.3	97.6	20.0	24.5	98.6	0.837	66 - 138	20	
Chlorobenzene	U	20.0	17.8	89.2	20.0	18.1	90.5	1.49	81 - 122	20	
Chloroethane	U	20.0	21.5	108	20.0	21.1	105	1.93	58 - 133	20	
Chloroform	2.93	20.0	20.7	88.7	20.0	21.0	90.5	1.75	69 - 128	20	
Chloromethane	U	20.0	20.8	104	20.0	20.4	102	2.18	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	19.1	95.4	20.0	19.8	98.8	3.43	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	20.6	103	20.0	21.4	107	3.83	69 - 131	20	
Dibromochloromethane	U	20.0	18.3	91.6	20.0	18.8	94	2.64	66 - 133	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS6 05-APR-17 Worknum: WG611071

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-26 File ID: 6M146612 Dil: 1 Method: 5035A

Sample ID: L17041069-27 MS File ID: 6M146608 Dil: 1 Matrix: 8260B

Sample ID: L17041069-28 MSD File ID: 6M146609 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.0	100	20.0	20.4	102	1.86	76 - 125	20	
Dichlorodifluoromethane	U	20.0	21.8	109	20.0	21.1	105	3.35	30 - 153	20	
Ethylbenzene	U	20.0	18.0	89.8	20.0	18.1	90.5	0.829	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.8	88.8	20.0	18.1	90.5	1.96	67 - 131	20	
Isopropylbenzene	U	20.0	17.9	89.6	20.0	18.5	92.5	3.24	75 - 127	20	
Methylene chloride	U	20.0	19.0	95.2	20.0	19.3	96.5	1.31	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.5	102	20.0	21.1	106	3.03	65 - 123	20	
MEK (2-Butanone)	U	20.0	21.4	107	20.0	21.9	110	2.35	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	20.6	103	20.0	20.7	104	0.865	58 - 134	20	
n-Butylbenzene	U	20.0	19.1	95.7	20.0	19.4	96.9	1.25	69 - 137	20	
n-Propylbenzene	U	20.0	18.3	91.4	20.0	18.6	93	1.77	72 - 129	20	
m-,p-Xylene	U	40.0	35.6	89	40.0	36.8	91.9	3.21	76 - 128	20	
Naphthalene	U	20.0	19.2	96	20.0	19.3	96.7	0.678	54 - 138	20	
o-Xylene	U	20.0	18.1	90.4	20.0	18.8	93.8	3.68	80 - 121	20	
p-Isopropyltoluene	U	20.0	18.6	92.9	20.0	18.8	93.8	0.932	73 - 130	20	
sec-Butylbenzene	U	20.0	18.3	91.3	20.0	18.6	93	1.78	72 - 127	20	
Styrene	U	20.0	18.7	93.5	20.0	19.2	95.8	2.41	65 - 134	20	
Trichloroethene	20.1	20.0	32.9	64	20.0	33.1	65	0.654	70 - 127	20	*
tert-Butylbenzene	U	20.0	18.4	92	20.0	18.6	92.8	0.890	70 - 129	20	
Tetrachloroethene	14.2	20.0	28.0	68.9	20.0	28.8	72.9	2.83	66 - 128	20	
Toluene	U	20.0	18.2	91.2	20.0	18.7	93.7	2.75	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.9	94.5	20.0	19.0	95	0.496	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	18.0	90.2	20.0	19.6	98.2	8.56	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.4	97.2	20.0	19.7	98.3	1.14	57 - 129	20	
Vinyl chloride	U	20.0	20.4	102	20.0	16.8	83.9	19.4	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS8- 17-APR-17 Worknum: WG611120

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-07 File ID: 8M419095 Dil: 1 Method: 5035A

Sample ID: L17041069-08 MS File ID: 8M419092 Dil: 1 Matrix: 8260B

Sample ID: L17041069-09 MSD File ID: 8M419093 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.1	95.5	20.0	18.7	93.5	2.14	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.8	99.1	20.0	19.7	98.4	0.682	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	19.2	96	20.0	18.6	92.9	3.29	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.0	94.8	20.0	17.9	89.7	5.53	75 - 125	20	
1,1-Dichloroethane	U	20.0	18.8	93.9	20.0	18.5	92.6	1.43	69 - 133	20	
1,1-Dichloroethene	U	20.0	18.5	92.6	20.0	18.3	91.4	1.31	68 - 130	20	
1,1-Dichloropropene	U	20.0	18.8	93.8	20.0	18.2	91.2	2.79	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.5	97.6	20.0	19.1	95.7	1.93	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.9	99.7	20.0	19.2	96	3.81	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	19.7	98.7	20.0	19.2	96.1	2.66	66 - 134	20	
1,2,4-Trimethylbenzene	0.458	20.0	19.8	96.7	20.0	19.4	94.5	2.20	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.4	96.8	20.0	19.1	95.5	1.40	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.8	94	20.0	18.4	92.2	1.88	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	18.8	93.8	20.0	17.6	88.1	6.24	50 - 132	20	
1,2-Dichloropropane	U	20.0	18.8	93.8	20.0	18.4	91.8	2.24	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.2	96.2	20.0	18.7	93.4	2.91	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.3	96.4	20.0	19.0	94.8	1.65	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.6	92.8	20.0	18.1	90.5	2.51	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.3	96.6	20.0	19.0	95.2	1.43	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.3	91.6	20.0	17.8	88.9	3.04	74 - 123	20	
1-Chlorohexane	U	20.0	20.9	104	20.0	20.5	102	2.08	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.2	101	20.0	19.7	98.4	2.37	69 - 137	20	
2-Hexanone	13.6	20.0	34.8	106	20.0	33.3	98.3	4.46	55 - 130	20	
2-Chlorotoluene	U	20.0	17.0	85.1	20.0	17.5	87.6	2.85	73 - 126	20	
4-Chlorotoluene	U	20.0	19.5	97.7	20.0	18.3	91.5	6.59	74 - 128	20	
Acetone	13.0	20.0	30.5	87.2	20.0	28.6	78	6.29	40 - 135	20	
Benzene	U	20.0	18.8	94.2	20.0	18.7	93.5	0.837	81 - 122	20	
Bromobenzene	U	20.0	18.9	94.6	20.0	18.4	92	2.76	76 - 124	20	
Bromochloromethane	U	20.0	20.1	101	20.0	19.9	99.3	1.37	65 - 129	20	
Bromodichloromethane	U	20.0	19.0	95.2	20.0	18.8	94	1.28	76 - 121	20	
Bromoform	U	20.0	16.8	84.2	20.0	16.4	82.1	2.63	69 - 128	20	
Bromomethane	U	20.0	24.5	122	20.0	25.2	126	2.83	30 - 141	20	
Carbon disulfide	U	20.0	17.0	84.8	20.0	16.7	83.5	1.55	58 - 128	20	
Carbon tetrachloride	U	20.0	20.1	100	20.0	19.6	97.8	2.59	66 - 138	20	
Chlorobenzene	U	20.0	18.1	90.5	20.0	17.8	89.2	1.40	81 - 122	20	
Chloroethane	U	20.0	21.5	108	20.0	20.8	104	3.42	58 - 133	20	
Chloroform	U	20.0	17.8	89.1	20.0	17.7	88.3	0.870	69 - 128	20	
Chloromethane	U	20.0	20.5	103	20.0	19.8	98.9	3.68	56 - 131	20	
cis-1,2-Dichloroethene	27.7	20.0	43.0	76.4	20.0	41.5	69	3.54	72 - 126	20	*
cis-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.4	102	1.98	69 - 131	20	
Dibromochloromethane	U	20.0	19.3	96.5	20.0	18.8	94.2	2.42	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS8 17-APR-17 Worknum: WG611120

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-07 File ID: 8M419095 Dil: 1 Method: 5035A

Sample ID: L17041069-08 MS File ID: 8M419092 Dil: 1 Matrix: 8260B

Sample ID: L17041069-09 MSD File ID: 8M419093 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	19.9	99.4	20.0	19.4	97.1	2.30	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.8	114	20.0	22.4	112	1.83	30 - 153	20	
Ethylbenzene	U	20.0	17.9	89.3	20.0	18.0	90.2	1.03	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.6	93	20.0	18.7	93.5	0.454	67 - 131	20	
Isopropylbenzene	U	20.0	19.0	94.9	20.0	19.0	95.1	0.222	75 - 127	20	
Methylene chloride	U	20.0	18.8	94.1	20.0	18.7	93.4	0.837	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.9	99.3	20.0	19.3	96.4	2.91	65 - 123	20	
MEK (2-Butanone)	8.49	20.0	29.0	103	20.0	27.6	95.6	5.01	49 - 136	20	
MIBK (methyl isobutyl ketone)	7.52	20.0	27.9	102	20.0	25.9	91.9	7.57	58 - 134	20	
n-Butylbenzene	U	20.0	19.7	98.7	20.0	19.5	97.5	1.23	69 - 137	20	
n-Propylbenzene	U	20.0	18.9	94.6	20.0	18.6	93.2	1.56	72 - 129	20	
m-,p-Xylene	U	40.0	38.2	95.5	40.0	37.7	94.4	1.19	76 - 128	20	
Naphthalene	U	20.0	20.8	104	20.0	20.4	102	2.01	54 - 138	20	
o-Xylene	U	20.0	18.3	91.5	20.0	18.2	91	0.483	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.5	97.7	20.0	19.2	96.1	1.62	73 - 130	20	
sec-Butylbenzene	U	20.0	18.8	93.8	20.0	18.5	92.5	1.36	72 - 127	20	
Styrene	U	20.0	20.0	99.8	20.0	19.7	98.6	1.23	65 - 134	20	
Trichloroethene	0.547	20.0	19.9	96.9	20.0	19.7	95.9	1.08	70 - 127	20	
tert-Butylbenzene	U	20.0	18.1	90.5	20.0	17.8	89	1.64	70 - 129	20	
Tetrachloroethene	0.587	20.0	20.1	97.8	20.0	20.3	98.5	0.754	66 - 128	20	
Toluene	3.50	20.0	22.1	92.8	20.0	21.7	91.1	1.56	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.6	93.1	20.0	18.4	92	1.18	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	18.8	93.9	20.0	18.5	92.3	1.66	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.2	101	20.0	19.7	98.5	2.73	57 - 129	20	
Vinyl chloride	4.79	20.0	21.5	83.4	20.0	20.6	79.2	3.99	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS11- 14-APR-17 Worknum: WG611145

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-32 File ID: 11M17659 Dil: 1 Method: 5035A

Sample ID: L17041069-33 MS File ID: 11M17653 Dil: 1 Matrix: 8260B

Sample ID: L17041069-34 MSD File ID: 11M17654 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.5	103	20.0	20.4	102	0.433	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.3	101	20.0	21.2	106	4.39	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.647	20.0	22.2	108	20.0	21.3	103	4.28	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.7	98.7	20.0	19.7	98.4	0.339	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.9	99.5	20.0	20.3	101	1.83	69 - 133	20	
1,1-Dichloroethene	U	20.0	18.8	93.8	20.0	19.3	96.6	2.89	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.8	99	20.0	19.7	98.3	0.702	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.3	107	20.0	20.9	104	2.22	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.9	104	20.0	20.0	99.9	4.36	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	21.7	109	20.0	21.3	106	1.91	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	101	20.0	20.1	100	1.15	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.5	97.3	20.0	19.7	98.3	1.03	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.7	104	20.0	20.3	102	1.91	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.2	111	20.0	21.1	106	5.04	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.6	98	20.0	20.4	102	3.98	75 - 125	20	
1,2-Dibromoethane	U	20.0	20.0	99.9	20.0	19.7	98.6	1.30	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.0	100	20.0	19.8	98.8	1.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.4	102	20.0	20.4	102	0.0098	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.8	104	20.0	21.0	105	0.915	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.4	102	20.0	20.4	102	0.181	74 - 123	20	
1-Chlorohexane	U	20.0	22.4	112	20.0	22.7	114	1.45	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.4	102	20.0	20.2	101	0.798	69 - 137	20	
2-Hexanone	U	20.0	22.9	115	20.0	22.3	111	2.77	55 - 130	20	
2-Chlorotoluene	U	20.0	18.6	92.8	20.0	18.2	91.2	1.84	73 - 126	20	
4-Chlorotoluene	U	20.0	21.1	105	20.0	20.7	103	1.86	74 - 128	20	
Acetone	5.49	20.0	28.4	115	20.0	25.8	101	9.80	40 - 135	20	
Benzene	U	20.0	19.9	99.7	20.0	20.5	102	2.56	81 - 122	20	
Bromobenzene	U	20.0	20.1	100	20.0	20.0	100	0.190	76 - 124	20	
Bromochloromethane	U	20.0	20.1	100	20.0	20.1	100	0.143	65 - 129	20	
Bromodichloromethane	U	20.0	19.6	97.9	20.0	19.7	98.5	0.593	76 - 121	20	
Bromoform	U	20.0	17.6	88.2	20.0	17.8	88.9	0.701	69 - 128	20	
Bromomethane	U	20.0	19.8	99.1	20.0	20.2	101	2.07	30 - 141	20	
Carbon disulfide	U	20.0	17.8	88.8	20.0	18.2	90.9	2.41	58 - 128	20	
Carbon tetrachloride	U	20.0	20.0	99.9	20.0	20.1	101	0.753	66 - 138	20	
Chlorobenzene	U	20.0	20.3	102	20.0	20.8	104	2.43	81 - 122	20	
Chloroethane	U	20.0	21.0	105	20.0	21.6	108	2.89	58 - 133	20	
Chloroform	0.125	20.0	18.9	93.7	20.0	19.1	94.6	1.01	69 - 128	20	
Chloromethane	U	20.0	19.1	95.3	20.0	19.5	97.4	2.26	56 - 131	20	
cis-1,2-Dichloroethene	0.278	20.0	20.1	98.9	20.0	20.1	99.4	0.458	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.2	111	20.0	22.6	113	1.71	69 - 131	20	
Dibromochloromethane	U	20.0	20.2	101	20.0	20.3	102	0.669	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041069 Cal ID: HPMS11 14-APR-17 Worknum: WG611145

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041069-32 File ID: 11M17659 Dil: 1 Method: 5035A

Sample ID: L17041069-33 MS File ID: 11M17653 Dil: 1 Matrix: 8260B

Sample ID: L17041069-34 MSD File ID: 11M17654 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.6	103	20.0	21.2	106	2.61	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.8	114	20.0	22.7	114	0.172	30 - 153	20	
Ethylbenzene	U	20.0	20.2	101	20.0	20.7	104	2.35	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.6	103	20.0	20.8	104	0.808	67 - 131	20	
Isopropylbenzene	U	20.0	20.4	102	20.0	20.8	104	1.87	75 - 127	20	
Methylene chloride	U	20.0	18.2	91	20.0	18.4	92.2	1.39	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.3	102	20.0	20.1	100	1.35	65 - 123	20	
MEK (2-Butanone)	U	20.0	21.4	107	20.0	20.5	102	4.10	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.6	97.9	20.0	19.4	97	0.992	58 - 134	20	
n-Butylbenzene	U	20.0	21.7	108	20.0	21.5	107	0.897	69 - 137	20	
n-Propylbenzene	U	20.0	20.4	102	20.0	20.2	101	1.14	72 - 129	20	
m-,p-Xylene	U	40.0	42.7	107	40.0	43.5	109	1.78	76 - 128	20	
Naphthalene	U	20.0	23.2	116	20.0	22.5	113	2.87	54 - 138	20	
o-Xylene	U	20.0	20.3	102	20.0	21.1	105	3.73	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.9	105	20.0	20.8	104	0.664	73 - 130	20	
sec-Butylbenzene	U	20.0	19.9	99.6	20.0	19.7	98.7	0.895	72 - 127	20	
Styrene	U	20.0	22.5	112	20.0	23.0	115	2.21	65 - 134	20	
Trichloroethene	8.99	20.0	27.0	90.2	20.0	27.1	90.6	0.341	70 - 127	20	
tert-Butylbenzene	U	20.0	20.3	101	20.0	19.7	98.5	2.73	70 - 129	20	
Tetrachloroethene	12.3	20.0	30.8	92.1	20.0	31.5	95.8	2.37	66 - 128	20	
Toluene	U	20.0	19.4	97.1	20.0	19.8	99.2	2.14	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.1	95.5	20.0	19.8	98.8	3.42	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.8	104	0.187	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.6	97.8	20.0	20.1	100	2.57	57 - 129	20	
Vinyl chloride	U	20.0	19.9	99.4	20.0	19.6	98	1.40	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5259047

Report generated 07/25/2017 12:54

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS11
Analyst: FJB
Workgroup: WG609769

Tune ID: WG609769-01
Run Date: 04/11/2017
Run Time: 17:59
File ID: 11M17454
Cal ID: HPMS11 - 11-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.4	6289	PASS
75.0	95.0	30.0	60.0	45.9	14147	PASS
95.0	95.0	100	100	100	30826	PASS
96.0	95.0	5.00	9.00	7.42	2288	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	86.3	26595	PASS
175	174	5.00	9.00	7.08	1884	PASS
176	174	95.0	101	98.2	26124	PASS
177	176	5.00	9.00	6.96	1818	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609769-02	STD	01	04/11/2017 18:52	
WG609769-03	STD	01	04/11/2017 19:20	
WG609769-04	STD	01	04/11/2017 19:50	
WG609769-05	STD-CCV	01	04/11/2017 20:20	
WG609769-06	STD	01	04/11/2017 20:49	
WG609769-07	STD	01	04/11/2017 21:18	
WG609769-08	STD	01	04/11/2017 21:47	
WG609769-09	STD	01	04/11/2017 22:17	
WG609769-10	SSCV	01	04/11/2017 23:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS11
Analyst: FJB
Workgroup: WG610045

Tune ID: WG610045-01
Run Date: 04/14/2017
Run Time: 12:41
File ID: 11M17507
Cal ID: HPMS11 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.7	7448	PASS
75.0	95.0	30.0	60.0	47.3	17024	PASS
95.0	95.0	100	100	100	36010	PASS
96.0	95.0	5.00	9.00	6.51	2344	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	85.0	30592	PASS
175	174	5.00	9.00	7.74	2369	PASS
176	174	95.0	101	101	30827	PASS
177	176	5.00	9.00	6.52	2009	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610045-02	STD	01	04/14/2017 13:44	
WG610045-03	STD	01	04/14/2017 14:13	
WG610045-04	STD	01	04/14/2017 14:43	
WG610045-05	STD	01	04/14/2017 15:12	
WG610045-06	STD	01	04/14/2017 15:42	
WG610045-07	STD	01	04/14/2017 16:11	
WG610045-08	STD-CCV	01	04/14/2017 16:41	
WG610045-09	STD	01	04/14/2017 17:10	
WG610045-10	STD	01	04/14/2017 17:40	
WG610045-11	STD	01	04/14/2017 18:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS11
Analyst: JDS /FJB
Workgroup: WG610382

Tune ID: WG610382-01
Run Date: 04/17/2017
Run Time: 12:58
File ID: 11M17523
Cal ID: HPMS11 - 14-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.2	8376	PASS
75.0	95.0	30.0	60.0	46.7	19313	PASS
95.0	95.0	100	100	100	41368	PASS
96.0	95.0	5.00	9.00	6.74	2788	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	84.8	35061	PASS
175	174	5.00	9.00	8.06	2827	PASS
176	174	95.0	101	98.5	34552	PASS
177	176	5.00	9.00	6.57	2269	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610045-12	SSCV	01	04/17/2017 15:19	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS11
Analyst: JDS
Workgroup: WG611143

Tune ID: WG611143-01
Run Date: 04/21/2017
Run Time: 16:07
File ID: 11M17648
Cal ID: HPMS11-14-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.1	8087	PASS
75.0	95.0	30.0	60.0	46.1	17649	PASS
95.0	95.0	100	100	100	38258	PASS
96.0	95.0	5.00	9.00	7.12	2723	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	85.7	32776	PASS
175	174	5.00	9.00	7.42	2433	PASS
176	174	95.0	101	95.9	31422	PASS
177	176	5.00	9.00	6.62	2079	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611143-02	CCV	01	04/21/2017 16:31	
WG611145-01	BLANK	01	04/21/2017 17:33	
WG611145-02	LCS	01	04/21/2017 18:02	
L17041069-33	MW-204B-LS-25	01	04/21/2017 18:31	
L17041069-34	MW-204B-LS-25	01	04/21/2017 19:01	
L17041069-32	MW-204B-LS-25	01	04/21/2017 20:58	
L17041069-29	MW-271-LS-25	01	04/21/2017 21:27	
L17041069-30	MW-97-LS-25	01	04/21/2017 21:57	
L17041069-31	MW-204A-LS-25	01	04/21/2017 22:26	
L17041069-35	MW-197A-LS-25	01	04/21/2017 22:56	
L17041069-36	MW-197B-LS-25	01	04/21/2017 23:25	
L17041069-37	MW-203A-LS-25	01	04/21/2017 23:54	
L17041069-38	MW-203B-LS-25	01	04/22/2017 00:24	
L17041069-39	MW-210A-LS-25	01	04/22/2017 00:54	
L17041069-40	MW-210B-LS-25	01	04/22/2017 01:24	
L17041069-41	MW-277-LS-25	01	04/22/2017 01:53	
L17041069-20	MW-217-LS-25	01	04/22/2017 02:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS6
Analyst: TMB
Workgroup: WG598323

Tune ID: WG598323-01
Run Date: 01/12/2017
Run Time: 08:36
File ID: 6M144707
Cal ID: HPMS6-12-JAN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.2	7923	PASS
75.0	95.0	30.0	60.0	54.8	22651	PASS
95.0	95.0	100	100	100	41304	PASS
96.0	95.0	5.00	9.00	7.28	3007	PASS
173	174	0	2.00	0.352	116	PASS
174	95.0	50.0	100	79.8	32963	PASS
175	174	5.00	9.00	8.22	2709	PASS
176	174	95.0	101	97.3	32071	PASS
177	176	5.00	9.00	6.69	2147	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG598323-02	STD	01	01/12/2017 09:02	
WG598323-03	STD	01	01/12/2017 09:37	
WG598323-04	STD	01	01/12/2017 10:10	
WG598323-05	STD-CCV	01	01/12/2017 10:42	
WG598323-06	STD	01	01/12/2017 11:14	
WG598323-07	STD	01	01/12/2017 11:47	
WG598323-08	STD	01	01/12/2017 12:19	
WG598323-09	STD	01	01/12/2017 12:52	
WG598323-10	SSCV	01	01/12/2017 13:56	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS6
Analyst: TMB
Workgroup: WG608938

Tune ID: WG608938-01
Run Date: 04/05/2017
Run Time: 16:29
File ID: 6M146221
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.3	4043	PASS
75.0	95.0	30.0	60.0	46.5	10875	PASS
95.0	95.0	100	100	100	23389	PASS
96.0	95.0	5.00	9.00	7.16	1674	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.5	17883	PASS
175	174	5.00	9.00	7.58	1356	PASS
176	174	95.0	101	96.1	17186	PASS
177	176	5.00	9.00	7.35	1263	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-02	STD	01	04/05/2017 17:25	
WG608938-03	STD	01	04/05/2017 17:57	
WG608938-04	STD	01	04/05/2017 18:28	
WG608938-05	STD	01	04/05/2017 19:00	
WG608938-06	STD	01	04/05/2017 19:31	
WG608938-07	STD	01	04/05/2017 20:02	
WG608938-08	STD-CCV	01	04/05/2017 20:34	
WG608938-09	STD	01	04/05/2017 21:06	
WG608938-10	STD	01	04/05/2017 21:37	
WG608938-11	STD	01	04/05/2017 22:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS6
Analyst: TMB
Workgroup: WG609128

Tune ID: WG609128-01
Run Date: 04/06/2017
Run Time: 13:59
File ID: 6M146236
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	6056	PASS
75.0	95.0	30.0	60.0	47.8	16465	PASS
95.0	95.0	100	100	100	34464	PASS
96.0	95.0	5.00	9.00	7.14	2460	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	26498	PASS
175	174	5.00	9.00	7.37	1953	PASS
176	174	95.0	101	98.9	26205	PASS
177	176	5.00	9.00	6.88	1804	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-12	SSCV	01	04/06/2017 15:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS6
Analyst: TMB
Workgroup: WG611068

Tune ID: WG611068-01
Run Date: 04/21/2017
Run Time: 13:29
File ID: 6M146598
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	5369	PASS
75.0	95.0	30.0	60.0	48.4	14761	PASS
95.0	95.0	100	100	100	30504	PASS
96.0	95.0	5.00	9.00	6.67	2035	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.1	24130	PASS
175	174	5.00	9.00	7.28	1756	PASS
176	174	95.0	101	98.4	23752	PASS
177	176	5.00	9.00	6.77	1607	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611068-02	CCV	01	04/21/2017 13:54	
WG611071-01	BLANK	01	04/21/2017 14:56	
WG611071-02	LCS	01	04/21/2017 18:01	
L17041069-27	MW-259-LS-25	01	04/21/2017 18:31	
L17041069-28	MW-259-LS-25	01	04/21/2017 19:02	
L17041069-21	MW-64-LS-25	01	04/21/2017 20:03	
L17041069-26	MW-259-LS-25	01	04/21/2017 20:34	
L17041069-25	MW-272-LS-25	01	04/21/2017 21:04	
L17041069-24	MW-270-LS-25	01	04/21/2017 21:35	
L17041069-23	MW-268-LS-25	01	04/21/2017 22:05	
L17041069-22	MW-218-LS-25	01	04/21/2017 22:35	
WG610898-01	FBLK1	DL01	04/22/2017 08:44	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS6
Analyst: JDS
Workgroup: WG611221

Tune ID: WG611221-01
Run Date: 04/22/2017
Run Time: 14:25
File ID: 6M146638
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.4	6249	PASS
75.0	95.0	30.0	60.0	48.8	17489	PASS
95.0	95.0	100	100	100	35840	PASS
96.0	95.0	5.00	9.00	6.93	2482	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.4	28445	PASS
175	174	5.00	9.00	7.82	2225	PASS
176	174	95.0	101	97.2	27637	PASS
177	176	5.00	9.00	7.11	1964	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611221-02	CCV	01	04/22/2017 14:50	
WG611223-01	CCV	01	04/22/2017 15:25	
WG611222-01	BLANK	01	04/22/2017 15:55	
WG611222-02	LCS	01	04/22/2017 16:26	
L17041069-43	MW-98-LS-25	01	04/22/2017 23:03	
L17041069-45	MW-205A-LS-25	01	04/22/2017 23:33	
L17041069-46	MW-205B-LS-25	01	04/23/2017 00:03	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS8
Analyst: TMB
Workgroup: WG609829

Tune ID: WG609829-01
Run Date: 04/12/2017
Run Time: 10:17
File ID: 8M418914
Cal ID: HPMS8-12-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.0	6807	PASS
75.0	95.0	30.0	60.0	45.8	20724	PASS
95.0	95.0	100	100	100	45280	PASS
96.0	95.0	5.00	9.00	6.80	3077	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	94.7	42898	PASS
175	174	5.00	9.00	8.05	3453	PASS
176	174	95.0	101	100	42994	PASS
177	176	5.00	9.00	6.69	2876	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609829-02	STD	01	04/12/2017 11:11	
WG609829-03	STD	01	04/12/2017 11:40	
WG609829-04	STD	01	04/12/2017 12:10	
WG609829-05	STD-CCV	01	04/12/2017 12:41	
WG609829-06	STD	01	04/12/2017 13:10	
WG609829-07	STD	01	04/12/2017 13:40	
WG609829-08	STD	01	04/12/2017 14:10	
WG609829-09	STD	01	04/12/2017 14:39	
WG609829-10	SSCV	01	04/12/2017 16:10	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS8
Analyst: TMB
Workgroup: WG610410

Tune ID: WG610410-01
Run Date: 04/17/2017
Run Time: 12:58
File ID: 8M419000
Cal ID: HPMS8 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.1	8216	PASS
75.0	95.0	30.0	60.0	47.8	21655	PASS
95.0	95.0	100	100	100	45349	PASS
96.0	95.0	5.00	9.00	6.40	2901	PASS
173	174	0	2.00	0.273	110	PASS
174	95.0	50.0	100	89.0	40349	PASS
175	174	5.00	9.00	7.54	3042	PASS
176	174	95.0	101	99.8	40256	PASS
177	176	5.00	9.00	6.96	2800	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610410-02	STD	01	04/17/2017 13:51	
WG610410-03	STD	01	04/17/2017 14:25	
WG610410-04	STD	01	04/17/2017 14:55	
WG610410-05	STD	01	04/17/2017 15:25	
WG610410-06	STD	01	04/17/2017 15:54	
WG610410-07	STD	01	04/17/2017 16:24	
WG610410-08	STD-CCV	01	04/17/2017 16:54	
WG610410-09	STD	01	04/17/2017 17:23	
WG610410-10	STD	01	04/17/2017 17:54	
WG610410-11	STD	01	04/17/2017 18:24	
WG610410-12	SSCV	01	04/17/2017 19:53	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611118

Tune ID: WG611118-01
Run Date: 04/21/2017
Run Time: 12:41
File ID: 8M419087
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	7972	PASS
75.0	95.0	30.0	60.0	48.8	22114	PASS
95.0	95.0	100	100	100	45330	PASS
96.0	95.0	5.00	9.00	6.63	3004	PASS
173	174	0	2.00	1.10	451	PASS
174	95.0	50.0	100	90.7	41101	PASS
175	174	5.00	9.00	7.76	3190	PASS
176	174	95.0	101	98.0	40272	PASS
177	176	5.00	9.00	6.60	2658	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611118-02	CCV	01	04/21/2017 13:04	
WG611120-01	BLANK	01	04/21/2017 14:04	
WG611120-02	LCS	01	04/21/2017 14:34	
L17041069-08	PMW92-03-LS-25	01	04/21/2017 15:04	
L17041069-09	PMW92-03-LS-25	01	04/21/2017 15:34	
L17041069-07	PMW92-03-LS-25	01	04/21/2017 16:33	
L17041069-05	DR2-3-LS-25	01	04/21/2017 17:04	
L17041069-15	DR2-2-LS-25	01	04/21/2017 17:34	
L17041069-16	MW-266-LS-25	01	04/21/2017 18:03	
L17041069-18	MW-26-LS-25	01	04/21/2017 18:34	
L17041069-04	PMW-85-05-LS-25	01	04/21/2017 19:03	
L17041069-02	PMW-85-01-LS-25	01	04/21/2017 19:33	
L17041069-06	MW-113-LS-25	01	04/21/2017 20:03	
L17041069-01	MW-85-LS-25	01	04/21/2017 20:33	
L17041069-10	PMW92-02-LS-25	01	04/21/2017 21:03	
L17041069-12	MW-92-LS-25	01	04/21/2017 21:32	
L17041069-19	DR2-6-LS-25	01	04/21/2017 22:02	
L17041069-13	DR2-1-LS-25	01	04/21/2017 22:32	
L17041069-14	MW-88-LS-25	01	04/21/2017 23:02	
L17041069-17	MW-267-LS-25	01	04/21/2017 23:32	
L17041069-03	DUP-10	01	04/22/2017 00:03	
L17041069-11	DUP-3	01	04/22/2017 00:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611300

Tune ID: WG611300-01
Run Date: 04/24/2017
Run Time: 11:16
File ID: 8M419115
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.1	5480	PASS
75.0	95.0	30.0	60.0	49.3	14142	PASS
95.0	95.0	100	100	100	28672	PASS
96.0	95.0	5.00	9.00	6.62	1898	PASS
173	174	0	2.00	0.506	126	PASS
174	95.0	50.0	100	86.8	24885	PASS
175	174	5.00	9.00	7.19	1790	PASS
176	174	95.0	101	99.3	24712	PASS
177	176	5.00	9.00	7.00	1730	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611300-02	CCV	01	04/24/2017 11:42	
WG611301-01	BLANK	01	04/24/2017 12:42	
WG611301-02	LCS	01	04/24/2017 13:13	
WG611301-03	LCS2	01	04/24/2017 13:44	
L17041069-13	DR2-1-LS-25	DL01	04/24/2017 14:14	
L17041069-44	DUP-6	01	04/24/2017 14:45	
L17041069-47	MW-39A-LS-25	01	04/24/2017 15:16	
L17041069-48	MW-39-LS-25	01	04/24/2017 15:46	
L17041069-49	MW-206B-LS-25	01	04/24/2017 16:17	
L17041069-50	MW-206A-LS-25	01	04/24/2017 16:48	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041069
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611560

Tune ID: WG611560-01
Run Date: 04/26/2017
Run Time: 07:53
File ID: 8M419164
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.9	7090	PASS
75.0	95.0	30.0	60.0	47.8	17949	PASS
95.0	95.0	100	100	100	37554	PASS
96.0	95.0	5.00	9.00	6.41	2408	PASS
173	174	0	2.00	0.550	182	PASS
174	95.0	50.0	100	88.1	33098	PASS
175	174	5.00	9.00	7.25	2399	PASS
176	174	95.0	101	97.7	32344	PASS
177	176	5.00	9.00	6.46	2088	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611560-02	CCV	01	04/26/2017 08:22	
WG611561-01	BLANK	01	04/26/2017 09:27	
WG611561-02	LCS	01	04/26/2017 09:56	
WG611561-03	LCS2	01	04/26/2017 10:27	
L17041069-42	MW-280-LS-25	01	04/26/2017 12:27	
WG611237-01	FBLK1	DL01	04/27/2017 00:59	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5259049
Report generated 07/25/2017 12:55

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Calibration: Fri Apr 21 13:34:21 2017
Curve: WG609769
Calibration Files

	Compound	5 11M17456.D	20 11M17457.D	50 11M17458.D	100 11M17459.D	200 11M17460.D	300 11M17461.D	400 11M17462.D	500 11M17463.D	Avg	%RSD	R^2 Linear	R^2 Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile		0.040	0.041	0.040	0.043	0.044	0.044	0.043	0.042	4.036		
T	3-Chloro-1-propene	0.535	0.558	0.577	0.545	0.518	0.476	0.416	0.391	0.502	13.493		
T	2-Chloro-1,3-butadiene	0.424	0.462	0.493	0.468	0.458	0.429	0.381	0.363	0.435	10.276		
T	Methacrylonitrile	0.182	0.207	0.216	0.208	0.213	0.208	0.193	0.186	0.202	6.342		
T	Isobutyl Alcohol		0.013	0.014	0.013	0.015	0.016	0.016	0.016	0.014	9.665		
T	1-Butanol				0.005	0.007	0.008	0.008	0.008	0.007	17.196	0.999	
T	Cyclohexanone			0.008	0.008	0.010	0.012	0.012	0.012	0.010	17.429	0.995	
T	2-Nitropropane			0.069	0.071	0.078	0.081	0.078	0.078	0.076	5.966		
T	Ethyl Acetate	0.255	0.278	0.298	0.283	0.286	0.277	0.253	0.241	0.271	7.209		
T	Methyl methacrylate	0.217	0.250	0.274	0.268	0.272	0.260	0.235	0.224	0.250	8.833		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Apr 21 13:35:57 2017

Calibration Table Report
Method: 8260WTR.M
Title: 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Calibration: Wed Apr 19 15:51:22 2017
Curve: WG610045
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
		11M17509.D	11M17510.D	11M17511.D	11M17512.D	11M17513.D	11M17514.D	11M17515.D	11M17516.D	11M17517.D	11M17518.D				
	Compound											Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.313	0.311	0.307	0.391	0.399	0.359	0.331		0.344	11.279		
P	Chloromethane			0.516	0.454	0.390	0.410	0.366	0.348			0.414	14.952		
C	Vinyl Chloride		0.313	0.320	0.325	0.324	0.350	0.332	0.299	0.261		0.316	8.330		
T	1,3-Butadiene				0.232	0.156	0.200	0.126	0.122	0.108		0.157	31.191		0.999
T	Bromomethane			0.278	0.250	0.236	0.226	0.222	0.218	0.219		0.236	9.216		
T	Chloroethane			0.245	0.233	0.243	0.257	0.264	0.251	0.240		0.248	4.329		
T	Trichlorofluoromethane		0.408	0.423	0.408	0.409	0.467	0.465	0.438	0.418		0.430	5.722		
T	Diethyl ether			0.302	0.311	0.307	0.308	0.314	0.289		0.277	0.301	4.397		
T	Isoprene		0.354	0.384	0.387	0.414	0.452	0.460	0.440	0.418		0.414	8.870		
T	Acrolein			0.050	0.054	0.057	0.059	0.061	0.059		0.062	0.057	7.533		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.231	0.252	0.241	0.272	0.275	0.264	0.259		0.256	6.243		
T	Acetone				0.095	0.089	0.083	0.085	0.081	0.084	0.079	0.085	6.348		
C	1,1-Dichloroethene		0.469	0.495	0.470	0.481	0.525	0.528	0.494	0.459		0.490	5.233		
T	Tert-Butyl Alcohol			0.024	0.030	0.030	0.029	0.031	0.033		0.037	0.031	12.573		
T	Dimethyl Sulfide		0.279	0.364	0.339	0.339	0.383	0.379	0.358	0.343		0.348	9.375		
T	Iodomethane				0.096	0.169	0.287	0.341	0.335	0.315		0.257	39.246	0.998	
T	Methyl acetate				0.252	0.247	0.246	0.250	0.241	0.232		0.245	2.901		
T	Methylene Chloride		0.349	0.374	0.328	0.315	0.333	0.335	0.313	0.301		0.331	6.916		
T	Carbon Disulfide			0.808	0.789	0.767	0.834	0.832	0.754	0.651		0.776	8.139		
T	Acrylonitrile			0.116	0.119	0.122	0.128	0.138	0.135		0.128	0.127	6.348		
T	Methyl Tert Butyl Ether		0.819	0.796	0.820	0.810	0.856	0.862	0.804	0.742		0.814	4.581		
T	trans-1,2-Dichloroethene		0.261	0.280	0.278	0.286	0.312	0.316	0.299	0.285		0.290	6.262		
T	n-Hexane				0.399	0.407	0.487	0.507	0.482	0.449		0.455	9.794		
T	Diisopropyl ether			1.242	1.258	1.203	1.188	1.167	0.952		0.851	1.123	13.998		
T	Vinyl Acetate				0.510	0.563	0.630	0.667	0.595	0.552	0.504	0.574	10.510		
P	1,1-Dichloroethane		0.597	0.593	0.637	0.618	0.657	0.646	0.596	0.537		0.610	6.263		
T	Ethyl-Tert-Butyl ether			1.096	1.106	1.073	1.071	1.057	0.882		0.802	1.012	11.851		
T	2-Butanone				0.125	0.129	0.142	0.144	0.144	0.144	0.140	0.138	5.625		
T	Propionitrile			0.042	0.045	0.045	0.048	0.049	0.048		0.051	0.047	6.494		
T	2,2-Dichloropropane			0.385	0.400	0.407	0.452	0.460	0.429	0.402		0.419	6.715		
T	cis-1,2-Dichloroethene		0.292	0.330	0.334	0.331	0.356	0.360	0.342	0.322		0.333	6.390		
C	Chloroform	0.629	0.636	0.567	0.538	0.515	0.547	0.542	0.500	0.459		0.548	10.418		
T	1-Bromopropane				0.054	0.051	0.063	0.066	0.067	0.066	0.066	0.062	10.481		
T	Bromochloromethane		0.166	0.199	0.204	0.200	0.213	0.221	0.211	0.204		0.202	8.189		
T	Tetrahydrofuran			0.109	0.099	0.099	0.104	0.106	0.101		0.100	0.103	3.571		
S	Dibromofluoromethane					0.281	0.249	0.272	0.254	0.241		0.259	6.392		
T	1,1,1-Trichloroethane		0.363	0.436	0.444	0.437	0.476	0.485	0.461	0.434		0.442	8.465		
T	Cyclohexane		0.549	0.615	0.614	0.610	0.640	0.650	0.606	0.555		0.605	5.939		
T	1,1-Dichloropropene		0.357	0.375	0.407	0.384	0.425	0.427	0.407	0.374		0.395	6.512		
T	Carbon Tetrachloride		0.365	0.343	0.370	0.363	0.425	0.431	0.411	0.387		0.387	8.298		
T	Tert-Amyl-Methyl ether			0.872	0.898	0.872	0.881	0.864	0.739		0.672	0.828	10.459		
S	1,2-Dichloroethane-d4					0.321	0.283	0.309	0.288	0.267		0.294	7.254		
T	1,2-Dichloroethane		0.394	0.444	0.444	0.431	0.450	0.448	0.413	0.379		0.426	6.318		
T	Benzene		1.280	1.304	1.238	1.251	1.276	1.214	1.043	0.851		1.182	13.235		
T	Trichloroethene		0.272	0.303	0.309	0.314	0.343	0.340	0.323	0.300		0.313	7.336		
T	Methylcyclohexane		0.441	0.472	0.466	0.474	0.517	0.526	0.498	0.464		0.482	5.980		
C	1,2-Dichloropropane		0.327	0.376	0.350	0.367	0.389	0.391	0.366	0.344		0.364	6.089		
T	1,4-Dioxane					0.003	0.003	0.003	0.003		0.004	0.003	11.019		
T	Bromodichloromethane		0.372	0.374	0.350	0.366	0.403	0.415	0.398	0.375		0.382	5.698		
T	Dibromomethane		0.125	0.161	0.170	0.177	0.186	0.190	0.184	0.180		0.172	12.252		
T	2-Chloroethyl Vinyl Ether			0.158	0.175	0.188	0.202	0.216	0.212	0.212	0.195	0.195	10.506		
T	4-Methyl-2-Pentanone					0.110	0.124	0.133	0.133	0.138	0.129	0.128	7.765		
T	cis-1,3-Dichloropropene		0.364	0.430	0.411	0.444	0.493	0.509	0.470	0.429		0.444	10.442		
T	Dimethyl Disulfide					0.194	0.258	0.287	0.283	0.281		0.261	14.933		

I	Chlorobenzene-d5	ISTD												
S	Toluene-d8					1.556	1.427	1.442	1.279	1.101		1.361	12.894	
C	Toluene		1.850	1.888	1.844	1.861	1.885	1.723	1.418			1.781	9.519	
T	Ethyl Methacrylate			0.357	0.393	0.434	0.527	0.522	0.498	0.477		0.458	14.306	
T	trans-1,3-Dichloropropene			0.485	0.517	0.540	0.607	0.617	0.568	0.517		0.550	8.973	
T	1,1,2-Trichloroethane		0.318	0.402	0.362	0.382	0.407	0.401	0.371	0.355		0.375	8.024	
T	2-Hexanone					0.264	0.291	0.294	0.291	0.291	0.277	0.285	4.053	
T	1,3-Dichloropropane		0.622	0.628	0.657	0.621	0.664	0.646	0.590	0.533		0.620	6.802	
T	Tetrachloroethene		0.383	0.405	0.353	0.381	0.393	0.398	0.371	0.352		0.379	5.202	
T	Dibromochloromethane		0.323	0.369	0.378	0.403	0.449	0.462	0.441	0.424		0.406	11.558	
T	1,2-Dibromoethane		0.292	0.340	0.351	0.315	0.335	0.342	0.334	0.331		0.330	5.541	
T	1-Chlorohexane		0.364	0.470	0.494	0.474	0.541	0.541	0.523	0.494		0.488	11.705	
P	Chlorobenzene		1.257	1.174	1.196	1.132	1.190	1.132	0.984	0.819		1.111	12.777	
T	1,1,1,2-Tetrachloroethane		0.323	0.381	0.386	0.403	0.454	0.451	0.426	0.407		0.404	10.513	
C	Ethylbenzene			0.605	0.629	0.619	0.647	0.654	0.608	0.557		0.617	5.222	
T	m-,p-Xylene		0.706	0.715	0.778	0.750	0.786	0.729	0.620	0.499		0.698	13.687	
T	o-Xylene		0.676	0.736	0.741	0.734	0.809	0.783	0.711	0.643		0.729	7.310	
T	Styrene		0.903	1.007	1.075	1.117	1.269	1.234	1.087	0.921		1.077	12.292	
P	Bromoform			0.208	0.215	0.247	0.292	0.314	0.317	0.327		0.274	18.263	0.999
T	Isopropylbenzene		1.734	1.853	1.814	1.904	1.981	1.820	1.505			1.802	8.431	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.857	0.849	0.877	0.848	0.908	0.928	0.863	0.785		0.864	4.986	
S	p-Bromofluorobenzene					0.968	0.946	0.981	0.919	0.832		0.929	6.350	
T	1,2,3-Trichloropropane			0.229	0.240	0.256	0.265	0.264	0.259	0.247		0.251	5.347	
T	trans-1,4-Dichloro-2-Butene			0.158	0.188	0.223	0.254	0.234	0.247	0.255	0.227	0.223	15.348	0.997
T	n-Propylbenzene		3.633	3.986	4.280	4.254	4.435	3.974	3.102			3.952	11.588	
T	Bromobenzene	1.031	0.805	1.036	1.001	1.016	1.051	1.042	0.946	0.852		0.976	9.197	
T	1,3,5-Trimethylbenzene		2.786	2.842	3.023	3.039	3.279	3.026	2.463			2.923	8.809	
T	2-Chlorotoluene		2.946	2.873	2.973	2.816	2.877	2.657	2.154			2.757	10.344	
T	4-Chlorotoluene		2.502	2.381	2.381	2.516	2.614	2.461	2.025			2.412	7.822	
T	a-Methylstyrene					1.390	1.743	1.659	1.490	1.243		1.505	13.399	
T	tert-Butylbenzene		0.524	0.650	0.664	0.688	0.737	0.738	0.674	0.613		0.661	10.544	
T	1,2,4-Trimethylbenzene			2.897	3.052	3.167	3.305	3.083	2.494			3.000	9.398	
T	sec-Butylbenzene			3.586	3.922	3.897	4.114	3.759	2.962			3.707	10.931	
T	p-Isopropyltoluene			2.897	3.127	3.221	3.501	3.252	2.609			3.101	10.003	
T	1,3-Dichlorobenzene		1.772	1.837	1.822	1.886	1.930	1.898	1.645	1.343		1.767	10.916	
T	1,4-Dichlorobenzene		1.954	1.781	1.994	1.899	1.901	1.875	1.639	1.319		1.795	12.361	
T	n-Butylbenzene		2.305	2.428	2.718	2.750	3.085	2.989	2.450			2.675	11.040	
T	1,2-Dichlorobenzene	2.024	1.799	1.815	1.823	1.881	1.914	1.866	1.632	1.324		1.786	11.325	
T	1,2-Dibromo-3-Chloropropane			0.141	0.137	0.143	0.148	0.157	0.158	0.159		0.149	5.995	
T	1,2,4-Trichlorobenzene		1.116	1.302	1.319	1.309	1.435	1.477	1.312	1.139		1.301	9.637	
T	Hexachlorobutadiene		0.535	0.557	0.616	0.664	0.742	0.771	0.726	0.672		0.660	13.005	
T	Naphthalene		2.603	2.660	2.909	2.965	3.180	3.044	2.420			2.826	9.594	
T	1,2,3-Trichlorobenzene	1.286	1.139	1.293	1.392	1.343	1.440	1.454	1.281	1.137		1.307	8.804	

Thu Apr 20 09:39:28 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water - IC: 011217 - HPMS6
Last Calibration: Thu Jan 12 13:53:06 2017
Curve: WG598323
Calibration Files

	Compound	5 6M144708.D	20 6M144709.D	50 6M144710.D	100 6M144711.D	200 6M144712.D	300 6M144713.D	400 6M144714.D	500 6M144715.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile	0.021	0.019	0.018	0.017	0.018	0.016	0.017	0.017	0.018	8.729
T	3-Chloro-1-propene	0.301	0.305	0.307	0.308	0.306	0.295	0.287	0.289	0.300	2.763
T	2-Chloro-1,3-butadiene	0.348	0.368	0.380	0.385	0.382	0.371	0.361	0.364	0.370	3.335
T	Ethyl Acetate	0.144	0.163	0.169	0.166	0.171	0.152	0.159	0.159	0.160	5.700
T	Methacrylonitrile	0.076	0.087	0.089	0.088	0.089	0.080	0.083	0.083	0.084	5.535
T	Isobutyl Alcohol	0.004	0.006	0.006	0.005	0.005	0.004	0.005	0.006	0.005	13.176
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.146	0.173	0.185	0.185	0.188	0.171	0.177	0.178	0.175	7.640
T	2-Nitropropane		0.063	0.071	0.071	0.076	0.070	0.075	0.074	0.071	6.228
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.008	0.009	0.008	0.010	0.009	0.011	0.012	0.009	14.808

Fri Jan 13 10:37:15 2017

Calibration Table Report
Method: 8260BWT.M
Title: 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Calibration: Thu Apr 06 09:55:03 2017
Curve: WG608938
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
	Compound	6M146223.D	6M146224.D	6M146225.D	6M146226.D	6M146227.D	6M146228.D	6M146229.D	6M146230.D	6M146231.D	6M146232.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.381	0.345	0.365	0.434	0.430	0.411	0.412		0.397	8.516		
P	Chloromethane			0.725	0.639	0.561	0.528	0.467	0.463	0.448		0.547	18.885	0.999	
C	Vinyl Chloride		0.564	0.506	0.438	0.420	0.464	0.451	0.364	0.420		0.454	13.323		
T	1,3-Butadiene					0.220	0.212	0.176	0.135	0.148	0.118	0.168	24.710		0.990
T	Bromomethane			0.176	0.159	0.179	0.196	0.221	0.211	0.228		0.196	13.055		
T	Chloroethane			0.192	0.183	0.199	0.207	0.203	0.189	0.193		0.195	4.273		
T	Trichlorofluoromethane		0.432	0.460	0.431	0.458	0.479	0.482	0.482	0.492		0.465	5.013		
T	Diethyl ether			0.191	0.192	0.193	0.189	0.192	0.197		0.202	0.194	2.274		
T	Isoprene					0.366	0.355	0.386	0.387	0.385	0.414	0.382	5.221		
T	Acrolein				0.021	0.021	0.020	0.021	0.023		0.021	0.021	4.175		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.269	0.247	0.261	0.264	0.264	0.265	0.271		0.263	2.932		
T	Acetone					0.057	0.058	0.055	0.053	0.056	0.045	0.054	8.929		
C	1,1-Dichloroethene		0.380	0.369	0.368	0.387	0.390	0.386	0.377	0.392		0.381	2.398		
T	Tert-Butyl Alcohol				0.017	0.018	0.016	0.014	0.018		0.017	0.017	8.130		
T	Dimethyl Sulfide					0.267	0.261	0.276	0.270	0.280	0.281	0.272	2.955		
T	Iodomethane			0.108	0.126	0.150	0.197	0.214	0.251	0.224	0.221	0.186	27.720	0.997	
T	Methyl acetate					0.129	0.125	0.134	0.140	0.141	0.143	0.135	5.216		
T	Methylene Chloride			0.311	0.287	0.287	0.286	0.285	0.274	0.287		0.288	3.813		
T	Carbon Disulfide			0.835	0.817	0.814	0.779	0.841	0.818	0.842	0.816	0.820	2.481		
T	Acrylonitrile			0.058	0.059	0.063	0.063	0.066	0.067		0.060	0.063	5.597		
T	Methyl Tert Butyl Ether			0.650	0.621	0.661	0.659	0.631	0.620	0.582		0.632	4.438		
T	trans-1,2-Dichloroethene		0.269	0.274	0.273	0.272	0.276	0.276	0.271	0.283		0.274	1.519		
T	n-Hexane					0.313	0.290	0.312	0.311	0.316	0.319	0.310	3.309		
T	Diisopropyl ether			0.719	0.724	0.709	0.699	0.694	0.699		0.699	0.706	1.627		
T	Vinyl Acetate					0.192	0.169	0.166	0.232	0.223	0.194	0.196	13.694		
P	1,1-Dichloroethane		0.460	0.450	0.445	0.457	0.465	0.452	0.444	0.462		0.454	1.740		
T	Ethyl-Tert-Butyl ether			0.716	0.722	0.718	0.705	0.702	0.724		0.720	0.715	1.185		
T	2-Butanone					0.068	0.068	0.066	0.071	0.069	0.067	0.068	2.393		
T	Propionitrile			0.020	0.022	0.023	0.022	0.023	0.023		0.023	0.022	5.579		
T	2,2-Dichloropropane		0.387	0.403	0.350	0.359	0.297	0.277	0.350	0.342		0.346	12.129		
T	cis-1,2-Dichloroethene		0.303	0.299	0.296	0.301	0.302	0.301	0.298	0.312		0.302	1.628		
C	Chloroform	0.658	0.590	0.542	0.485	0.482	0.482	0.476	0.463	0.481		0.518	12.803		
T	1-Bromopropane			0.041	0.052	0.052	0.056	0.057	0.058	0.053	0.060	0.053	11.075		
T	Bromochloromethane		0.132	0.144	0.150	0.165	0.170	0.168	0.171	0.170		0.159	9.183		
T	Tetrahydrofuran			0.050	0.044	0.045	0.043	0.043	0.045		0.043	0.045	5.367		
S	Dibromofluoromethane			0.245	0.236	0.256	0.262	0.259	0.257	0.262	0.265	0.255	3.868		
T	1,1,1-Trichloroethane		0.405	0.424	0.407	0.410	0.424	0.424	0.425	0.447		0.421	3.239		
T	Cyclohexane			0.387	0.368	0.384	0.366	0.397	0.394	0.411	0.406	0.389	4.204		
T	1,1-Dichloropropene			0.357	0.349	0.355	0.358	0.357	0.352	0.362		0.356	1.233		
T	Tert-Amyl-Methyl ether			0.684	0.674	0.681	0.663	0.669	0.698		0.685	0.679	1.728		
T	Carbon Tetrachloride			0.282	0.274	0.323	0.351	0.366	0.377	0.35		0.33183	12.2386		
S	1,2-Dichloroethane-d4				0.244	0.246	0.257	0.253	0.252	0.254	0.254	0.25153	1.86029		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.327	0.326	0.306	0.328	0.323	0.321	0.32	0.325		0.32202	2.174		
T	Benzene		1.21	1.101	1.077	1.063	1.054	1.025	1.007	1.019		1.06965	6.04095		
T	Trichloroethene		0.288	0.284	0.274	0.29	0.299	0.302	0.292	0.3		0.29115	3.19828		
T	Methylcyclohexane					0.413	0.393	0.422	0.423	0.432	0.44	0.42065	3.83804		
C	1,2-Dichloropropane		0.232	0.251	0.254	0.257	0.263	0.256	0.249	0.258		0.25244	3.71187		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.00184	6.16966		
T	Bromodichloromethane		0.334	0.34	0.341	0.358	0.37	0.369	0.364	0.376		0.35636	4.47459		
T	Dibromomethane		0.122	0.155	0.145	0.155	0.154	0.153	0.153	0.153		0.14868	7.44253		
T	2-Chloroethyl Vinyl Ether				0.076	0.1	0.106	0.106	0.109	0.088	0.107	0.09902	12.5245		
T	4-Methyl-2-Pentanone					0.063	0.064	0.064	0.068	0.065	0.065	0.06495	2.52742		
T	cis-1,3-Dichloropropene		0.346	0.382	0.37	0.401	0.412	0.407	0.409	0.413		0.39243	6.25845		
T	Dimethyl Disulfide					0.227	0.225	0.247	0.252	0.264	0.27	0.24758	7.53484		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.282	1.288	1.306	1.276	1.265	1.243	1.262	1.283	1.27569	1.48449		
C	Toluene		1.652	1.626	1.556	1.57	1.551	1.537	1.51	1.503		1.56301	3.34424		
T	Ethyl Methacrylate			0.354	0.349	0.379	0.362	0.386	0.4	0.394	0.402	0.37824	5.56152		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.466	0.427	0.489	0.494	0.497	0.503	0.498		0.48194	5.63896		
T	1,1,2-Trichloroethane		0.273	0.296	0.289	0.303	0.3	0.298	0.298	0.3		0.29455	3.27325		
T	2-Hexanone					0.142	0.14	0.14	0.146	0.139	0.141	0.14144	1.87214		
T	1,3-Dichloropropane		0.484	0.508	0.475	0.504	0.5	0.497	0.495	0.494		0.49443	2.17868		
T	Tetrachloroethene		0.355	0.38	0.375	0.383	0.381	0.385	0.382	0.389		0.37875	2.7685		
T	Dibromochloromethane		0.322	0.345	0.344	0.362	0.378	0.381	0.388	0.394		0.36412	6.97018		
T	1,2-Dibromoethane		0.284	0.282	0.277	0.28	0.281	0.286	0.29	0.283		0.28283	1.39806		
T	1-Chlorohexane		0.501	0.501	0.486	0.499	0.469	0.513	0.509	0.521	0.544	0.50473	4.18396		
P	Chlorobenzene		1.095	1.077	1.019	1.044	1.045	1.064	1.071	1.141		1.06977	3.47515		
T	1,1,1,2-Tetrachloroethane		0.348	0.357	0.345	0.371	0.385	0.4	0.413	0.446		0.3831	9.19348		
C	Ethylbenzene		0.6	0.536	0.538	0.559	0.564	0.581	0.595	0.659		0.57912	6.92495		
T	m-,p-Xylene		0.711	0.677	0.667	0.681	0.673	0.697	0.701	0.731		0.69221	3.13862		
T	o-Xylene			0.671	0.642	0.655	0.669	0.678	0.657	0.704		0.66797	2.95161		
T	Styrene		1.073	1.059	1.076	1.12	1.133	1.168	1.147	1.193		1.12136	4.31921		
P	Bromoform			0.2	0.2	0.214	0.226	0.238	0.239	0.237		0.22189	7.90635		
T	Isopropylbenzene		1.776	1.697	1.623	1.674	1.668	1.699	1.625	1.612		1.67159	3.22323		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.698	0.661	0.65	0.674	0.635	0.606	0.637	0.648		0.65111	4.24655		
S	p-Bromofluorobenzene			0.963	0.993	0.912	0.973	0.934	0.902	0.947	0.972	0.94951	3.31848		

T	1,2,3-Trichloropropane			0.195	0.177	0.197	0.197	0.19	0.193	0.197		0.19228	3.72212
T	trans-1,4-Dichloro-2-Butene			0.124	0.117	0.135	0.132	0.142	0.151	0.15	0.155	0.13826	10.0162
T	n-Propylbenzene		4.071	3.929	3.827	3.847	3.789	3.738	3.585	3.496		3.78518	4.83282
T	Bromobenzene	0.861	0.852	0.867	0.84	0.843	0.856	0.84	0.822	0.872		0.85035	1.84632
T	1,3,5-Trimethylbenzene		2.773	2.744	2.708	2.654	2.661	2.647	2.591	2.682		2.68251	2.16658
T	2-Chlorotoluene		2.733	2.689	2.575	2.498	2.579	2.388	2.346	2.355		2.52034	5.92259
T	4-Chlorotoluene		2.395	2.337	2.248	2.223	2.051	2.189	2.093	2.284		2.22752	5.21159
T	a-Methylstyrene					1.445	1.366	1.463	1.473	1.542	1.611	1.48341	5.66686
T	tert-Butylbenzene			0.551	0.564	0.544	0.568	0.565	0.555	0.589		0.56208	2.558
T	1,2,4-Trimethylbenzene			2.798	2.729	2.745	2.76	2.745	2.714	2.793		2.75494	1.13121
T	sec-Butylbenzene			3.56	3.327	3.322	3.297	3.276	3.197	3.178		3.30805	3.79322
T	p-Isopropyltoluene			2.879	2.746	2.749	2.779	2.779	2.76	2.787		2.78269	1.6223
T	1,3-Dichlorobenzene		1.745	1.595	1.607	1.558	1.601	1.574	1.559	1.608		1.60589	3.7263
T	1,4-Dichlorobenzene	1.858	1.642	1.613	1.574	1.578	1.594	1.578	1.564	1.615		1.62397	5.60487
T	n-Butylbenzene			2.643	2.479	2.524	2.512	2.536	2.56	2.533		2.54099	2.02916
T	1,2-Dichlorobenzene	1.566	1.589	1.537	1.453	1.471	1.497	1.472	1.477	1.484		1.50524	3.15458
T	1,2-Dibromo-3-Chloropropane				0.103	0.12	0.121	0.119	0.128	0.117		0.11794	7.07341
T	1,2,4-Trichlorobenzene		1.219	1.11	1.06	1.059	1.082	1.083	1.092	1.105		1.10135	4.63701
T	Hexachlorobutadiene		0.476	0.446	0.394	0.418	0.403	0.409	0.409	0.41		0.42065	6.42356
T	Naphthalene		2.283	2.179	2.049	2.212	2.236	2.219	2.289	2.175		2.20527	3.4468
T	1,2,3-Trichlorobenzene	1.267	1.197	1.116	1.005	0.999	0.994	0.992	1.004	0.995		1.06323	9.83782

Thu Apr 06 14:39:00 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Calibration: Thu Apr 13 16:40:13 2017
Curve: WG609829
Calibration Files

	Compound	5 8M418916.D	20 8M418917.D	50 8M418918.D	100 8M418919.D	200 8M418920.D	300 8M418921.D	400 8M418922.D	500 8M418923.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile		0.013	0.012	0.013	0.013	0.012	0.013	0.013	0.013	3.572
T	3-Chloro-1-propene	0.312	0.315	0.327	0.337	0.346	0.341	0.344	0.341	0.333	3.984
T	2-Chloro-1,3-butadiene	0.285	0.299	0.317	0.330	0.340	0.336	0.337	0.336	0.322	6.267
T	Ethyl Acetate	0.099	0.101	0.098	0.101	0.108	0.103	0.106	0.109	0.103	4.045
T	Methacrylonitrile	0.052	0.059	0.057	0.059	0.064	0.061	0.063	0.065	0.060	7.025
T	Isobutyl Alcohol			0.003	0.004	0.004	0.004	0.005	0.005	0.004	12.096
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.096	0.101	0.103	0.107	0.116	0.112	0.116	0.121	0.109	7.922
T	2-Nitropropane		0.027	0.028	0.031	0.034	0.034	0.035	0.037	0.032	11.358
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.006	0.006	0.007	0.008	0.007	0.008	0.009	0.007	13.841

Mon Apr 17 15:45:45 2017

Calibration Table Report
Method: 8260WT.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Calibration: Tue Apr 18 08:45:38 2017
Curve: WG610410
Calibration Files

	Compound	0.3 8M419002.D	0.4 8M419003.D	1 8M419004.D	2 8M419005.D	5 8M419006.D	20 8M419007.D	50 8M419008.D	100 8M419009.D	200 8M419010.D	300 8M419011.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.313	0.289	0.277	0.384	0.370	0.362	0.373		0.338	13.019		
P	Chloromethane			0.456	0.440	0.417	0.437	0.403	0.401	0.407		0.423	5.087		
C	Vinyl Chloride		0.426	0.430	0.414	0.394	0.429	0.389	0.367	0.347		0.399	7.750		
T	1,3-Butadiene					0.273	0.246	0.164	0.130	0.118	0.112	0.174	39.828		1.000
T	Bromomethane			0.064	0.068	0.074	0.124	0.149	0.181			0.110	44.154		1.001
T	Chloroethane		0.162	0.163	0.173	0.171	0.183	0.177	0.180	0.186		0.174	5.074		
T	Trichlorofluoromethane		0.393	0.462	0.411	0.420	0.452	0.436	0.437	0.459		0.434	5.614		
T	Diethyl ether			0.159	0.160	0.163	0.158	0.160	0.167		0.176	0.163	3.861		
T	Isoprene					0.316	0.325	0.346	0.353	0.353	0.366	0.343	5.533		
T	Acrolein				0.022	0.023	0.021	0.022	0.024		0.024	0.023	4.706		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.251	0.228	0.237	0.253	0.250	0.252	0.261		0.247	4.440		
T	Acetone					0.036	0.033	0.036	0.037	0.034	0.035	0.035	4.082		
C	1,1-Dichloroethene		0.331	0.366	0.344	0.349	0.377	0.371	0.376	0.383		0.362	5.154		
T	Tert-Butyl Alcohol				0.010	0.012	0.011	0.011	0.011		0.013	0.011	10.980		
T	Dimethyl Sulfide					0.232	0.226	0.240	0.246	0.249	0.255	0.241	4.476		
T	Iodomethane					0.026	0.067	0.121	0.154	0.164	0.116	0.108	48.714	NO CAL	
T	Methyl acetate					0.099	0.091	0.097	0.098	0.093	0.100	0.096	3.655		
T	Methylene Chloride			0.271	0.245	0.249	0.263	0.258	0.264	0.272		0.260	3.943		
T	Carbon Disulfide			0.794	0.744	0.746	0.729	0.763	0.767	0.766	0.713	0.753	3.339		
T	Acrylonitrile			0.043	0.045	0.049	0.049	0.053	0.054		0.049	0.049	8.214		
T	Methyl Tert Butyl Ether			0.495	0.474	0.502	0.530	0.528	0.543	0.517		0.513	4.642		
T	trans-1,2-Dichloroethene		0.342	0.345	0.349	0.334	0.360	0.353	0.363	0.373		0.352	3.537		
T	n-Hexane					0.301	0.278	0.290	0.295	0.300	0.301	0.294	2.997		
T	Diisopropyl ether			0.776	0.794	0.805	0.792	0.783	0.801		0.768	0.788	1.708		
T	Vinyl Acetate					0.353	0.350	0.359	0.366	0.348	0.345	0.354	2.233		
P	1,1-Dichloroethane		0.405	0.460	0.437	0.441	0.474	0.462	0.473	0.476		0.453	5.418		
T	Ethyl-Tert-Butyl ether			0.651	0.652	0.684	0.667	0.669	0.693		0.679	0.671	2.398		
T	2-Butanone					0.053	0.052	0.056	0.058	0.053	0.059	0.055	5.073		
T	Propionitrile			0.015	0.016	0.018	0.017	0.017	0.018		0.019	0.017	7.523		
T	2,2-Dichloropropane		0.336	0.387	0.384	0.373	0.399	0.387	0.396	0.399		0.383	5.430		
T	cis-1,2-Dichloroethene		0.263	0.287	0.282	0.286	0.300	0.296	0.305	0.311		0.291	5.182		
C	Chloroform	0.619	0.539	0.514	0.499	0.459	0.479	0.467	0.473	0.471		0.502	10.092		
T	1-Bromopropane			0.057	0.053	0.055	0.056	0.057	0.059	0.061	0.061	0.057	5.096		
T	Bromochloromethane		0.118	0.150	0.156	0.160	0.167	0.167	0.170	0.168		0.157	11.011		
T	Tetrahydrofuran			0.039	0.035	0.038	0.036	0.038	0.040		0.039	0.038	4.497		
S	Dibromofluoromethane				0.251	0.244	0.261	0.272	0.265	0.269	0.273	0.262	4.105		
T	1,1,1-Trichloroethane		0.337	0.406	0.380	0.394	0.426	0.420	0.431	0.450		0.405	8.684		
T	Cyclohexane			0.371	0.358	0.372	0.358	0.379	0.389	0.403	0.391	0.377	4.255		
T	1,1-Dichloropropene			0.354	0.340	0.337	0.363	0.353	0.359	0.371		0.354	3.449		
T	Tert-Amyl-Methyl ether			0.568	0.579	0.618	0.598	0.602	0.629		0.609	0.600	3.552		
T	Carbon Tetrachloride		0.288	0.38	0.359	0.363	0.404	0.394	0.41	0.411		0.3759	10.8547		
S	1,2-Dichloroethane-d4				0.215	0.219	0.227	0.237	0.23	0.224	0.235	0.2267	3.56551		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.247	0.28	0.273	0.279	0.298	0.293	0.305	0.299		0.284	6.56007		
T	Benzene		1.013	1.058	1.034	1.013	1.082	1.044	1.045	0.975		1.0328	3.16185		
T	Trichloroethene		0.28	0.291	0.275	0.274	0.294	0.29	0.302	0.315		0.2901	4.79714		
T	Methylcyclohexane					0.371	0.369	0.386	0.392	0.4	0.402	0.3867	3.65443		
C	1,2-Dichloropropane		0.235	0.244	0.249	0.243	0.257	0.256	0.264	0.269		0.2522	4.51345		
T	Bromodichloromethane		0.273	0.313	0.319	0.319	0.35	0.347	0.359	0.361		0.3301	9.09766		
T	1,4-Dioxane					0.001	0.001	0.002	0.002		0.002	0.0014	8.93532		
T	Dibromomethane		0.101	0.125	0.129	0.129	0.138	0.136	0.14	0.14		0.1298	9.96462		
T	2-Chloroethyl Vinyl Ether				0.091	0.101	0.106	0.114	0.116	0.114	0.122	0.1091	9.65313		
T	4-Methyl-2-Pentanone					0.042	0.045	0.05	0.051	0.049	0.055	0.0489	9.48763		
T	cis-1,3-Dichloropropene		0.303	0.354	0.349	0.364	0.401	0.404	0.417	0.416		0.3759	10.7244		

T	Dimethyl Disulfide					0.133	0.169	0.201	0.215	0.226	0.237	0.1968	19.8258	0.998
I	Chlorobenzene-d5	ISTD												
S	Toluene-d8				1.126	1.107	1.183	1.185	1.136	1.123	1.136	1.1423	2.63592	
C	Toluene		1.276	1.435	1.421	1.416	1.507	1.432	1.412	1.234		1.3916	6.46773	
T	Ethyl Methacrylate			0.208	0.222	0.252	0.262	0.287	0.29	0.277	0.303	0.2625	12.7656	
T	Paraldehyde											0	0	
T	trans-1,3-Dichloropropene			0.367	0.363	0.389	0.421	0.422	0.44	0.423		0.4036	7.59969	
T	1,1,2-Trichloroethane		0.21	0.235	0.224	0.228	0.239	0.229	0.237	0.23		0.2289	4.06629	
T	2-Hexanone					0.048	0.053	0.058	0.06	0.054	0.063	0.0562	9.63322	
T	1,3-Dichloropropane		0.353	0.405	0.372	0.373	0.41	0.397	0.403	0.383		0.387	5.15702	
T	Tetrachloroethene		0.245	0.284	0.279	0.285	0.31	0.295	0.312	0.328		0.2923	8.65757	
T	Dibromochloromethane		0.232	0.267	0.271	0.289	0.315	0.318	0.333	0.328		0.2942	12.052	
T	1,2-Dibromoethane		0.188	0.209	0.218	0.222	0.242	0.236	0.241	0.233		0.2236	8.21869	
T	1-Chlorohexane		0.385	0.44	0.423	0.428	0.44	0.451	0.457	0.466	0.472	0.4403	5.99946	
P	Chlorobenzene		1.008	0.965	0.972	0.936	1.008	0.988	1.042	1.006		0.9906	3.29062	
T	1,1,1,2-Tetrachloroethane		0.303	0.316	0.32	0.335	0.379	0.385	0.423			0.3515	12.6454	
C	Ethylbenzene		0.467	0.5	0.532	0.513	0.574	0.568	0.62	0.665		0.5548	11.7603	
T	m-,p-Xylene		0.572	0.637	0.62	0.627	0.689	0.677	0.694	0.623		0.6425	6.46237	
T	o-Xylene			0.611	0.592	0.623	0.665	0.648	0.68	0.703		0.6459	6.13337	
T	Styrene		0.814	0.93	0.929	0.995	1.114	1.111	1.142	1.067		1.0127	11.3997	
P	Bromoform			0.125	0.142	0.163	0.191	0.196	0.207	0.207		0.176	18.66	0.999
T	Isopropylbenzene		1.463	1.551	1.54	1.592	1.678	1.613	1.576	1.361		1.5466	6.28276	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.385	0.493	0.455	0.465	0.508	0.494	0.502	0.472		0.4717	8.42371	
S	p-Bromofluorobenzene				0.897	0.839	0.876	0.891	0.86	0.878	0.935	0.8823	3.42248	
T	1,2,3-Trichloropropane			0.117	0.127	0.131	0.143	0.144	0.146	0.138		0.1352	7.82469	
T	trans-1,4-Dichloro-2-Butene			0.058	0.065	0.085	0.109	0.122	0.115	0.114	0.116	0.0978	25.7933	1.000
T	n-Propylbenzene		3.478	3.723	3.692	3.608	3.807	3.577	3.383	2.726		3.4991	9.72861	
T	Bromobenzene	0.752	0.696	0.839	0.81	0.813	0.857	0.845	0.872	0.896		0.8199	7.58093	
T	1,3,5-Trimethylbenzene		2.467	2.514	2.525	2.506	2.737	2.623	2.589	2.306		2.5336	4.94471	
T	2-Chlorotoluene		2.674	2.623	2.305	2.553	2.347	2.198	2.2	2.21		2.3888	8.30021	
T	4-Chlorotoluene		1.995	2.135	2.439	1.867	2.369	2.326	2.308	1.784		2.1528	11.4607	
T	a-Methylstyrene					1.296	1.355	1.455	1.517	1.498	1.401	1.4204	6.02416	
T	tert-Butylbenzene			0.52	0.555	0.528	0.588	0.571	0.601	0.653		0.5736	7.96677	
T	1,2,4-Trimethylbenzene		2.284	2.607	2.62	2.578	2.817	2.742	2.701	2.343		2.5866	7.19751	
T	sec-Butylbenzene			3.278	3.292	3.183	3.429	3.252	3.145	2.633		3.1733	8.03336	
T	p-Isopropyltoluene			2.64	2.605	2.626	2.913	2.796	2.737	2.387		2.6721	6.23483	
T	1,3-Dichlorobenzene		1.502	1.596	1.568	1.535	1.665	1.625	1.642	1.581		1.5891	3.4371	
T	1,4-Dichlorobenzene	1.772	1.622	1.643	1.594	1.517	1.637	1.592	1.618	1.545		1.6156	4.45875	
T	n-Butylbenzene			2.426	2.337	2.245	2.632	2.542	2.483	2.184		2.407	6.69686	
T	1,2-Dichlorobenzene	1.368	1.185	1.488	1.397	1.379	1.46	1.438	1.454	1.396		1.396	6.36818	
T	1,2-Dibromo-3-Chloropropane				0.073	0.072	0.076	0.079	0.083	0.077		0.0768	5.09915	
T	1,2,4-Trichlorobenzene		0.864	0.92	0.882	0.852	0.952	0.983	1.022	1.044		0.9399	7.72424	
T	Hexachlorobutadiene		0.405	0.427	0.426	0.402	0.449	0.44	0.456	0.493		0.4374	6.74711	
T	Naphthalene		1.353	1.273	1.232	1.251	1.396	1.436	1.465	1.339		1.3431	6.41915	
T	1,2,3-Trichlorobenzene	0.796	0.766	0.75	0.705	0.691	0.802	0.821	0.847	0.847		0.7805	7.29917	

Tue Apr 18 12:15:24 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number:L17041069 Run Date:04/17/2017 Sample ID:WG610045-12
Instrument ID:HPMS11 Run Time:15:19 Method:8260B
File ID:11M17528 Analyst:JDS /FJB QC Key:AF40
ICal Workgroup:WG610045 Cal ID:HPMS11 - 14-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	20.0	18.6	ug/L	0.457	6.80	25	
1,2-Dichloropropane	CCC	20.0	18.9	ug/L	0.344	5.40	25	
Chloroform	CCC	20.0	18.1	ug/L	0.497	9.30	25	
Ethylbenzene	CCC	20.0	19.6	ug/L	0.604	2.20	25	
Toluene	CCC	20.0	18.8	ug/L	1.68	5.90	25	
Vinyl Chloride	CCC	20.0	19.4	ug/L	0.306	3.00	25	
1,1,2,2-Tetrachloroethane	SPCC	20.0	18.5	ug/L	0.801	7.40	25	
1,1-Dichloroethane	SPCC	20.0	19.0	ug/L	0.581	4.80	25	
Bromoform	SPCC	20.0	16.2	ug/L	0.252	18.8	25	
Chlorobenzene	SPCC	20.0	19.3	ug/L	1.07	3.40	25	
Chloromethane	SPCC	20.0	18.2	ug/L	0.376	9.20	25	
1,1,1,2-Tetrachloroethane		20.0	19.4	ug/L	0.392	3.00	25	
1,1,1-Trichloroethane		20.0	20.0	ug/L	0.443	0.100	25	
1,1,2-Trichloroethane		20.0	19.0	ug/L	0.357	4.80	25	
1,1-Dichloropropene		20.0	19.3	ug/L	0.380	3.70	25	
1,2,3-Trichlorobenzene		20.0	19.0	ug/L	1.24	5.00	25	
1,2,3-Trichloropropane		20.0	17.7	ug/L	0.222	11.6	25	
1,2,4-Trichlorobenzene		20.0	19.4	ug/L	1.26	3.00	25	
1,2,4-Trimethylbenzene		20.0	18.5	ug/L	2.77	7.70	25	
1,2-Dichloroethane		20.0	18.5	ug/L	0.394	7.50	25	
1,2-Dichlorobenzene		20.0	18.6	ug/L	1.66	7.20	25	
1,2-Dibromo-3-Chloropropane		20.0	17.6	ug/L	0.131	12.1	25	
1,2-Dibromoethane		20.0	18.6	ug/L	0.306	7.20	25	
1,3,5-Trimethylbenzene		20.0	18.4	ug/L	2.68	8.20	25	
1,3-Dichlorobenzene		20.0	18.6	ug/L	1.64	7.20	25	
1,3-Dichloropropane		20.0	19.6	ug/L	0.607	2.10	25	
1,4-Dichlorobenzene		20.0	18.6	ug/L	1.67	7.00	25	
1-Chlorohexane		20.0	21.6	ug/L	0.527	8.10	25	
2,2-Dichloropropane		20.0	19.7	ug/L	0.413	1.60	25	
2-Hexanone		20.0	19.5	ug/L	0.278	2.40	25	
2-Chlorotoluene		20.0	16.7	ug/L	2.29	16.8	25	
4-Chlorotoluene		20.0	18.9	ug/L	2.28	5.40	25	
Acetone		20.0	17.9	ug/L	0.0762	10.7	25	
Benzene		20.0	19.5	ug/L	1.15	2.70	25	
Bromobenzene		20.0	18.1	ug/L	0.884	9.40	25	
Bromochloromethane		20.0	19.0	ug/L	0.193	4.80	25	
Bromodichloromethane		20.0	18.6	ug/L	0.354	7.10	25	
Bromomethane		20.0	20.4	ug/L	0.241	2.20	25	
Carbon Disulfide		20.0	17.4	ug/L	0.675	13.1	25	
Carbon Tetrachloride		20.0	19.7	ug/L	0.381	1.50	25	
Chloroethane		20.0	20.4	ug/L	0.252	1.80	25	
cis-1,2-Dichloroethene		20.0	19.4	ug/L	0.323	3.00	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5259048
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041069 Run Date: 04/17/2017 Sample ID: WG610045-12
Instrument ID: HPMS11 Run Time: 15:19 Method: 8260B
File ID: 11M17528 Analyst: JDS /FJB QC Key: AF40
ICal Workgroup: WG610045 Cal ID: HPMS11 - 14-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		20.0	20.9	ug/L	0.463	4.40	25	
Dibromochloromethane		20.0	18.7	ug/L	0.381	6.30	25	
Dibromomethane		20.0	19.6	ug/L	0.169	1.80	25	
Dichlorodifluoromethane		20.0	23.4	ug/L	0.402	16.8	25	
Hexachlorobutadiene		20.0	18.7	ug/L	0.617	6.60	25	
Isopropylbenzene		20.0	19.5	ug/L	1.75	2.70	25	
Methylene Chloride		20.0	17.9	ug/L	0.296	10.6	25	
Methyl Tert Butyl Ether		20.0	19.1	ug/L	0.778	4.40	25	
2-Butanone		20.0	18.9	ug/L	0.131	5.50	25	
4-Methyl-2-Pentanone		20.0	18.4	ug/L	0.118	8.00	25	
n-Butylbenzene		20.0	19.8	ug/L	2.64	1.20	25	
n-Propylbenzene		20.0	18.5	ug/L	3.66	7.40	25	
m-,p-Xylene		40.0	41.2	ug/L	0.718	2.90	25	
Naphthalene		20.0	20.1	ug/L	2.84	0.500	25	
o-Xylene		20.0	19.9	ug/L	0.725	0.600	25	
p-Isopropyltoluene		20.0	19.1	ug/L	2.96	4.50	25	
sec-Butylbenzene		20.0	18.3	ug/L	3.38	8.70	25	
Styrene		20.0	21.5	ug/L	1.16	7.70	25	
Trichloroethene		20.0	19.3	ug/L	0.302	3.60	25	
tert-Butylbenzene		20.0	18.8	ug/L	0.623	5.80	25	
Tetrachloroethene		20.0	18.9	ug/L	0.358	5.70	25	
trans-1,2-Dichloroethene		20.0	19.0	ug/L	0.276	4.80	25	
trans-1,3-Dichloropropene		20.0	19.2	ug/L	0.528	4.00	25	
Trichlorofluoromethane		20.0	19.3	ug/L	0.415	3.40	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5259048
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041069 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	20.0	20.0	ug/L	0.381	0.100	25	
1,2-Dichloropropane	CCC	20.0	19.6	ug/L	0.248	1.90	25	
Chloroform	CCC	20.0	18.5	ug/L	0.479	7.50	25	
Ethylbenzene	CCC	20.0	18.6	ug/L	0.538	7.10	25	
Toluene	CCC	20.0	18.5	ug/L	1.45	7.30	25	
Vinyl Chloride	CCC	20.0	22.0	ug/L	0.499	10.0	25	
1,1,2,2-Tetrachloroethane	SPCC	20.0	19.6	ug/L	0.638	2.00	25	
1,1-Dichloroethane	SPCC	20.0	19.7	ug/L	0.448	1.50	25	
Bromoform	SPCC	20.0	18.7	ug/L	0.208	6.30	25	
Chlorobenzene	SPCC	20.0	18.3	ug/L	0.981	8.30	25	
Chloromethane	SPCC	20.0	22.5	ug/L	0.529	12.3	25	
1,1,1,2-Tetrachloroethane		20.0	18.6	ug/L	0.356	7.10	25	
1,1,1-Trichloroethane		20.0	20.1	ug/L	0.423	0.600	25	
1,1,2-Trichloroethane		20.0	18.9	ug/L	0.278	5.50	25	
1,1-Dichloropropene		20.0	19.6	ug/L	0.349	1.90	25	
1,2,3-Trichlorobenzene		20.0	18.2	ug/L	0.968	9.00	25	
1,2,3-Trichloropropane		20.0	19.5	ug/L	0.188	2.40	25	
1,2,4-Trichlorobenzene		20.0	18.7	ug/L	1.03	6.40	25	
1,2,4-Trimethylbenzene		20.0	18.7	ug/L	2.58	6.50	25	
1,2-Dichloroethane		20.0	19.5	ug/L	0.314	2.60	25	
1,2-Dichlorobenzene		20.0	18.5	ug/L	1.39	7.30	25	
1,2-Dibromo-3-Chloropropane		20.0	19.4	ug/L	0.114	3.00	25	
1,2-Dibromoethane		20.0	19.5	ug/L	0.276	2.50	25	
1,3,5-Trimethylbenzene		20.0	18.5	ug/L	2.49	7.30	25	
1,3-Dichlorobenzene		20.0	18.4	ug/L	1.48	7.90	25	
1,3-Dichloropropane		20.0	20.1	ug/L	0.498	0.700	25	
1,4-Dichlorobenzene		20.0	18.4	ug/L	1.50	7.80	25	
1-Chlorohexane		20.0	20.5	ug/L	0.517	2.40	25	
2,2-Dichloropropane		20.0	22.0	ug/L	0.381	10.1	25	
2-Hexanone		20.0	21.4	ug/L	0.151	7.00	25	
2-Chlorotoluene		20.0	17.4	ug/L	2.19	13.2	25	
4-Chlorotoluene		20.0	18.9	ug/L	2.10	5.70	25	
Acetone		20.0	19.0	ug/L	0.0513	4.90	25	
Benzene		20.0	18.8	ug/L	1.01	5.90	25	
Bromobenzene		20.0	18.5	ug/L	0.788	7.30	25	
Bromochloromethane		20.0	21.4	ug/L	0.170	7.00	25	
Bromodichloromethane		20.0	19.4	ug/L	0.346	2.80	25	
Bromomethane		20.0	17.7	ug/L	0.173	11.5	25	
Carbon Disulfide		20.0	16.1	ug/L	0.662	19.3	25	
Carbon Tetrachloride		20.0	20.6	ug/L	0.342	3.10	25	
Chloroethane		20.0	22.9	ug/L	0.223	14.3	25	
cis-1,2-Dichloroethene		20.0	19.5	ug/L	0.294	2.60	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041069 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		20.0	21.6	ug/L	0.424	8.00	25	
Dibromochloromethane		20.0	19.4	ug/L	0.352	3.20	25	
Dibromomethane		20.0	20.5	ug/L	0.152	2.50	25	
Dichlorodifluoromethane		20.0	24.5	ug/L	0.487	22.7	25	
Hexachlorobutadiene		20.0	18.6	ug/L	0.391	7.00	25	
Isopropylbenzene		20.0	18.7	ug/L	1.56	6.40	25	
Methylene Chloride		20.0	19.4	ug/L	0.280	3.00	25	
Methyl Tert Butyl Ether		20.0	20.8	ug/L	0.658	4.10	25	
2-Butanone		20.0	20.3	ug/L	0.0689	1.30	25	
4-Methyl-2-Pentanone		20.0	20.8	ug/L	0.0677	4.20	25	
n-Butylbenzene		20.0	18.9	ug/L	2.40	5.50	25	
n-Propylbenzene		20.0	18.3	ug/L	3.47	8.30	25	
m-,p-Xylene		40.0	37.4	ug/L	0.646	6.60	25	
Naphthalene		20.0	18.7	ug/L	2.07	6.30	25	
o-Xylene		20.0	18.9	ug/L	0.631	5.50	25	
p-Isopropyltoluene		20.0	19.0	ug/L	2.64	5.20	25	
sec-Butylbenzene		20.0	18.3	ug/L	3.02	8.60	25	
Styrene		20.0	19.3	ug/L	1.08	3.50	25	
Trichloroethene		20.0	18.6	ug/L	0.271	6.80	25	
tert-Butylbenzene		20.0	19.0	ug/L	0.535	4.80	25	
Tetrachloroethene		20.0	19.4	ug/L	0.367	3.00	25	
trans-1,2-Dichloroethene		20.0	19.6	ug/L	0.268	2.20	25	
trans-1,3-Dichloropropene		20.0	19.9	ug/L	0.479	0.700	25	
Trichlorofluoromethane		20.0	21.0	ug/L	0.489	5.20	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5259048
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041069 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.0	ug/L	0.340	6.00	25	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.239	5.40	25	
Chloroform	CCC	50.0	44.7	ug/L	0.449	10.6	25	
Ethylbenzene	CCC	50.0	48.9	ug/L	0.543	2.20	25	
Toluene	CCC	50.0	48.5	ug/L	1.35	2.90	25	
Vinyl Chloride	CCC	50.0	45.4	ug/L	0.363	9.20	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.7	ug/L	0.431	8.60	25	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.432	4.80	25	
Bromoform	SPCC	50.0	42.9	ug/L	0.175	14.2	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.934	5.70	25	
Chloromethane	SPCC	50.0	48.6	ug/L	0.411	2.80	25	
1,1,1,2-Tetrachloroethane		50.0	50.3	ug/L	0.354	0.600	25	
1,1,1-Trichloroethane		50.0	50.8	ug/L	0.412	1.60	25	
1,1,2-Trichloroethane		50.0	45.3	ug/L	0.208	9.40	25	
1,1-Dichloropropene		50.0	47.3	ug/L	0.335	5.50	25	
1,2,3-Trichlorobenzene		50.0	48.7	ug/L	0.761	2.50	25	
1,2,3-Trichloropropane		50.0	47.0	ug/L	0.127	6.10	25	
1,2,4-Trichlorobenzene		50.0	49.0	ug/L	0.922	1.90	25	
1,2,4-Trimethylbenzene		50.0	49.9	ug/L	2.58	0.100	25	
1,2-Dichloroethane		50.0	47.2	ug/L	0.268	5.50	25	
1,2-Dichlorobenzene		50.0	47.2	ug/L	1.32	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	44.0	ug/L	0.0676	12.0	25	
1,2-Dibromoethane		50.0	47.1	ug/L	0.211	5.80	25	
1,3,5-Trimethylbenzene		50.0	48.9	ug/L	2.48	2.10	25	
1,3-Dichlorobenzene		50.0	47.4	ug/L	1.51	5.30	25	
1,3-Dichloropropane		50.0	47.2	ug/L	0.365	5.60	25	
1,4-Dichlorobenzene		50.0	46.2	ug/L	1.49	7.70	25	
1-Chlorohexane		50.0	52.1	ug/L	0.459	4.20	25	
2,2-Dichloropropane		50.0	46.7	ug/L	0.357	6.60	25	
2-Hexanone		50.0	48.3	ug/L	0.0543	3.40	25	
2-Chlorotoluene		50.0	44.1	ug/L	2.11	11.7	25	
4-Chlorotoluene		50.0	49.6	ug/L	2.14	0.800	25	
Acetone		50.0	43.2	ug/L	0.0304	13.6	25	
Benzene		50.0	47.6	ug/L	0.983	4.90	25	
Bromobenzene		50.0	48.1	ug/L	0.789	3.70	25	
Bromochloromethane		50.0	49.4	ug/L	0.155	1.20	25	
Bromodichloromethane		50.0	48.0	ug/L	0.317	4.00	25	
Bromomethane		50.0	43.6	ug/L	0.123	12.7	25	
Carbon Disulfide		50.0	43.4	ug/L	0.653	13.2	25	
Carbon Tetrachloride		50.0	50.2	ug/L	0.377	0.300	25	
Chloroethane		50.0	53.1	ug/L	0.185	6.10	25	
cis-1,2-Dichloroethene		50.0	48.0	ug/L	0.279	4.00	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041069 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	50.6	ug/L	0.380	1.10	25	
Dibromochloromethane		50.0	48.3	ug/L	0.284	3.40	25	
Dibromomethane		50.0	47.4	ug/L	0.123	5.20	25	
Dichlorodifluoromethane		50.0	56.3	ug/L	0.381	12.6	25	
Hexachlorobutadiene		50.0	48.6	ug/L	0.425	2.90	25	
Isopropylbenzene		50.0	49.5	ug/L	1.53	1.10	25	
Methylene Chloride		50.0	46.7	ug/L	0.243	6.60	25	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.472	7.90	25	
2-Butanone		50.0	43.5	ug/L	0.0479	13.1	25	
4-Methyl-2-Pentanone		50.0	45.4	ug/L	0.0444	9.20	25	
n-Butylbenzene		50.0	49.9	ug/L	2.40	0.200	25	
n-Propylbenzene		50.0	47.3	ug/L	3.31	5.40	25	
m-,p-Xylene		100	102	ug/L	0.654	1.70	25	
Naphthalene		50.0	48.1	ug/L	1.29	3.90	25	
o-Xylene		50.0	48.1	ug/L	0.622	3.70	25	
p-Isopropyltoluene		50.0	50.0	ug/L	2.67	0	25	
sec-Butylbenzene		50.0	47.9	ug/L	3.04	4.30	25	
Styrene		50.0	52.7	ug/L	1.07	5.40	25	
Trichloroethene		50.0	47.5	ug/L	0.276	5.00	25	
tert-Butylbenzene		50.0	48.1	ug/L	0.552	3.80	25	
Tetrachloroethene		50.0	50.6	ug/L	0.296	1.20	25	
trans-1,2-Dichloroethene		50.0	47.3	ug/L	0.333	5.40	25	
trans-1,3-Dichloropropene		50.0	46.6	ug/L	0.376	6.90	25	
Trichlorofluoromethane		50.0	48.6	ug/L	0.421	2.90	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5259048
Report generated 07/25/2017 12:54

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611068-02

Instrument ID: HPMS6 Run Time: 13:54 Method: 8260B

File ID: 6M146599 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611071 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.1	ug/L	0.397	4.20	20	
1,2-Dichloropropane	CCC	50.0	51.5	ug/L	0.260	3.08	20	
Chloroform	CCC	50.0	46.7	ug/L	0.484	6.51	20	
Ethylbenzene	CCC	50.0	48.7	ug/L	0.564	2.56	20	
Toluene	CCC	50.0	48.4	ug/L	1.51	3.19	20	
Vinyl Chloride	CCC	50.0	47.1	ug/L	0.428	5.71	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	51.2	ug/L	0.667	2.42	20	
1,1-Dichloroethane	SPCC	50.0	52.8	ug/L	0.480	5.65	20	
Bromoform	SPCC	50.0	50.3	ug/L	0.223	0.557	20	
Chlorobenzene	SPCC	50.0	48.4	ug/L	1.03	3.29	20	
Chloromethane	SPCC	50.0	44.9	ug/L	0.416	10.1	20	
Xylenes		150	148	ug/L	0.673	1.07	20	
1,1,1,2-Tetrachloroethane		50.0	50.7	ug/L	0.389	1.50	20	
1,1,1-Trichloroethane		50.0	50.6	ug/L	0.426	1.27	20	
1,1,2-Trichloroethane		50.0	48.5	ug/L	0.286	2.91	20	
1,1-Dichloropropene		50.0	51.0	ug/L	0.363	2.06	20	
1,2,3-Trichlorobenzene		50.0	45.3	ug/L	0.964	9.38	20	
1,2,3-Trichloropropane		50.0	48.7	ug/L	0.187	2.67	20	
1,2,4-Trichlorobenzene		50.0	48.4	ug/L	1.07	3.20	20	
1,2,4-Trimethylbenzene		50.0	52.2	ug/L	2.88	4.46	20	
1,2-Dichloroethane		50.0	51.3	ug/L	0.331	2.67	20	
1,2-Dichlorobenzene		50.0	48.5	ug/L	1.46	2.97	20	
1,2-Dibromo-3-Chloropropane		50.0	51.0	ug/L	0.120	1.91	20	
1,2-Dibromoethane		50.0	47.9	ug/L	0.271	4.14	20	
1,3,5-Trimethylbenzene		50.0	50.5	ug/L	2.71	0.993	20	
1,3-Dichlorobenzene		50.0	48.9	ug/L	1.57	2.16	20	
1,3-Dichloropropane		50.0	49.4	ug/L	0.488	1.22	20	
1,4-Dichlorobenzene		50.0	48.4	ug/L	1.57	3.17	20	
1-Chlorohexane		50.0	47.0	ug/L	0.474	6.05	20	
2,2-Dichloropropane		50.0	50.0	ug/L	0.345	0.0746	20	
2-Hexanone		50.0	49.8	ug/L	0.141	0.339	20	
2-Chlorotoluene		50.0	45.9	ug/L	2.31	8.29	20	
4-Chlorotoluene		50.0	54.6	ug/L	2.43	9.24	20	
Acetone		50.0	59.8	ug/L	0.0645	19.5	20	
Benzene		50.0	48.9	ug/L	1.05	2.25	20	
Bromobenzene		50.0	47.9	ug/L	0.815	4.21	20	
Bromochloromethane		50.0	52.1	ug/L	0.165	4.19	20	
Bromodichloromethane		50.0	51.8	ug/L	0.369	3.50	20	
Bromomethane		50.0	34.0	ug/L	0.133	31.9	20	*
Carbon Disulfide		50.0	47.4	ug/L	0.777	5.30	20	
Carbon Tetrachloride		50.0	57.0	ug/L	0.378	13.9	20	
Chloroethane		50.0	54.4	ug/L	0.212	8.76	20	

CCV - Modified 03/05/2008

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611068-02

Instrument ID: HPMS6 Run Time: 13:54 Method: 8260B

File ID: 6M146599 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611071 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.7	ug/L	0.300	0.529	20	
cis-1,3-Dichloropropene		50.0	54.5	ug/L	0.427	8.91	20	
Dibromochloromethane		50.0	50.1	ug/L	0.365	0.237	20	
Dibromomethane		50.0	50.7	ug/L	0.151	1.47	20	
Dichlorodifluoromethane		50.0	51.3	ug/L	0.407	2.57	20	
Hexachlorobutadiene		50.0	49.2	ug/L	0.414	1.70	20	
Isopropylbenzene		50.0	50.2	ug/L	1.68	0.472	20	
Methylene Chloride		50.0	49.6	ug/L	0.286	0.791	20	
Methyl Tert Butyl Ether		50.0	51.0	ug/L	0.644	1.95	20	
2-Butanone		50.0	52.3	ug/L	0.0711	4.51	20	
4-Methyl-2-Pentanone		50.0	49.7	ug/L	0.0646	0.566	20	
n-Butylbenzene		50.0	52.6	ug/L	2.67	5.14	20	
n-Propylbenzene		50.0	50.0	ug/L	3.78	0.0586	20	
m-,p-Xylene		100	98.7	ug/L	0.683	1.27	20	
Naphthalene		50.0	48.7	ug/L	2.15	2.54	20	
o-Xylene		50.0	49.7	ug/L	0.664	0.665	20	
p-Isopropyltoluene		50.0	51.0	ug/L	2.84	2.05	20	
sec-Butylbenzene		50.0	50.6	ug/L	3.35	1.21	20	
Styrene		50.0	51.9	ug/L	1.16	3.78	20	
Trichloroethene		50.0	46.6	ug/L	0.271	6.80	20	
tert-Butylbenzene		50.0	49.7	ug/L	0.559	0.629	20	
Tetrachloroethene		50.0	47.2	ug/L	0.357	5.66	20	
trans-1,2-Dichloroethene		50.0	50.3	ug/L	0.276	0.608	20	
trans-1,3-Dichloropropene		50.0	53.1	ug/L	0.511	6.10	20	
Trichlorofluoromethane		50.0	53.1	ug/L	0.494	6.28	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5259050
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611118-02

Instrument ID: HPMS8 Run Time: 13:04 Method: 8260B

File ID: 8M419088 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611120 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.6	ug/L	0.374	3.23	20	
1,2-Dichloropropane	CCC	50.0	48.3	ug/L	0.244	3.32	20	
Chloroform	CCC	50.0	45.6	ug/L	0.458	8.81	20	
Ethylbenzene	CCC	50.0	50.3	ug/L	0.559	0.681	20	
Toluene	CCC	50.0	50.6	ug/L	1.41	1.28	20	
Vinyl Chloride	CCC	50.0	47.6	ug/L	0.381	4.71	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.6	ug/L	0.430	8.85	20	
1,1-Dichloroethane	SPCC	50.0	50.5	ug/L	0.458	0.972	20	
Bromoform	SPCC	50.0	43.7	ug/L	0.178	12.5	20	
Chlorobenzene	SPCC	50.0	48.8	ug/L	0.967	2.37	20	
Chloromethane	SPCC	50.0	50.1	ug/L	0.424	0.300	20	
Xylenes		150	153	ug/L	0.652	2.15	20	
1,1,1,2-Tetrachloroethane		50.0	52.7	ug/L	0.371	5.43	20	
1,1,1-Trichloroethane		50.0	52.5	ug/L	0.425	4.94	20	
1,1,2-Trichloroethane		50.0	45.7	ug/L	0.209	8.59	20	
1,1-Dichloropropene		50.0	50.3	ug/L	0.356	0.531	20	
1,2,3-Trichlorobenzene		50.0	48.3	ug/L	0.754	3.36	20	
1,2,3-Trichloropropane		50.0	47.0	ug/L	0.127	6.09	20	
1,2,4-Trichlorobenzene		50.0	50.2	ug/L	0.944	0.477	20	
1,2,4-Trimethylbenzene		50.0	52.7	ug/L	2.73	5.39	20	
1,2-Dichloroethane		50.0	48.8	ug/L	0.277	2.42	20	
1,2-Dichlorobenzene		50.0	48.7	ug/L	1.36	2.66	20	
1,2-Dibromo-3-Chloropropane		50.0	43.1	ug/L	0.0662	13.8	20	
1,2-Dibromoethane		50.0	47.8	ug/L	0.214	4.33	20	
1,3,5-Trimethylbenzene		50.0	52.1	ug/L	2.64	4.16	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.58	0.304	20	
1,3-Dichloropropane		50.0	46.1	ug/L	0.357	7.74	20	
1,4-Dichlorobenzene		50.0	48.2	ug/L	1.56	3.64	20	
1-Chlorohexane		50.0	49.0	ug/L	0.432	1.96	20	
2,2-Dichloropropane		50.0	54.6	ug/L	0.418	9.15	20	
2-Hexanone		50.0	42.5	ug/L	0.0478	14.9	20	
2-Chlorotoluene		50.0	48.4	ug/L	2.31	3.16	20	
4-Chlorotoluene		50.0	50.3	ug/L	2.17	0.691	20	
Acetone		50.0	44.2	ug/L	0.0311	11.6	20	
Benzene		50.0	49.9	ug/L	1.03	0.282	20	
Bromobenzene		50.0	50.0	ug/L	0.819	0.0972	20	
Bromochloromethane		50.0	51.1	ug/L	0.160	2.10	20	
Bromodichloromethane		50.0	50.5	ug/L	0.333	1.00	20	
Bromomethane		50.0	51.6	ug/L	0.152	3.30	20	
Carbon Disulfide		50.0	47.1	ug/L	0.709	5.86	20	
Carbon Tetrachloride		50.0	53.9	ug/L	0.405	7.84	20	
Chloroethane		50.0	51.2	ug/L	0.179	2.49	20	

CCV - Modified 03/05/2008

PDF File ID: 5259050

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611118-02

Instrument ID: HPMS8 Run Time: 13:04 Method: 8260B

File ID: 8M419088 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611120 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	50.6	ug/L	0.295	1.17	20	
cis-1,3-Dichloropropene		50.0	51.5	ug/L	0.387	2.94	20	
Dibromochloromethane		50.0	50.4	ug/L	0.296	0.730	20	
Dibromomethane		50.0	48.1	ug/L	0.125	3.85	20	
Dichlorodifluoromethane		50.0	56.3	ug/L	0.381	12.7	20	
Hexachlorobutadiene		50.0	52.3	ug/L	0.458	4.61	20	
Isopropylbenzene		50.0	51.4	ug/L	1.59	2.76	20	
Methylene Chloride		50.0	48.0	ug/L	0.250	3.99	20	
Methyl Tert Butyl Ether		50.0	46.3	ug/L	0.475	7.45	20	
2-Butanone		50.0	44.4	ug/L	0.0490	11.2	20	
4-Methyl-2-Pentanone		50.0	43.1	ug/L	0.0421	13.9	20	
n-Butylbenzene		50.0	53.7	ug/L	2.59	7.45	20	
n-Propylbenzene		50.0	51.6	ug/L	3.61	3.17	20	
m-,p-Xylene		100	104	ug/L	0.668	3.99	20	
Naphthalene		50.0	46.7	ug/L	1.26	6.51	20	
o-Xylene		50.0	49.2	ug/L	0.636	1.54	20	
p-Isopropyltoluene		50.0	52.8	ug/L	2.82	5.61	20	
sec-Butylbenzene		50.0	51.6	ug/L	3.28	3.28	20	
Styrene		50.0	52.6	ug/L	1.07	5.24	20	
Trichloroethene		50.0	50.2	ug/L	0.291	0.436	20	
tert-Butylbenzene		50.0	50.8	ug/L	0.583	1.55	20	
Tetrachloroethene		50.0	52.9	ug/L	0.309	5.85	20	
trans-1,2-Dichloroethene		50.0	50.1	ug/L	0.353	0.199	20	
trans-1,3-Dichloropropene		50.0	49.0	ug/L	0.396	1.92	20	
Trichlorofluoromethane		50.0	52.2	ug/L	0.453	4.35	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611143-02

Instrument ID: HPMS11 Run Time: 16:31 Method: 8260B

File ID: 11M17649 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611145 Cal ID: HPMS11 - 14-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.2	ug/L	0.423	13.7	20	
1,2-Dichloropropane	CCC	50.0	45.1	ug/L	0.328	9.88	20	
Chloroform	CCC	50.0	41.1	ug/L	0.451	17.8	20	
Ethylbenzene	CCC	50.0	45.2	ug/L	0.558	9.65	20	
Toluene	CCC	50.0	48.4	ug/L	1.72	3.20	20	
Vinyl Chloride	CCC	50.0	45.3	ug/L	0.286	9.48	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.9	ug/L	0.776	10.2	20	
1,1-Dichloroethane	SPCC	50.0	45.0	ug/L	0.549	9.95	20	
Bromoform	SPCC	50.0	42.7	ug/L	0.271	14.6	20	
Chlorobenzene	SPCC	50.0	44.5	ug/L	0.988	11.0	20	
Chloromethane	SPCC	50.0	37.8	ug/L	0.314	24.3	20	*
Xylenes		150	138	ug/L	0.655	8.13	20	
1,1,1,2-Tetrachloroethane		50.0	47.3	ug/L	0.382	5.34	20	
1,1,1-Trichloroethane		50.0	43.5	ug/L	0.384	13.0	20	
1,1,2-Trichloroethane		50.0	44.4	ug/L	0.332	11.3	20	
1,1-Dichloropropene		50.0	43.4	ug/L	0.342	13.3	20	
1,2,3-Trichlorobenzene		50.0	46.6	ug/L	1.22	6.77	20	
1,2,3-Trichloropropane		50.0	43.4	ug/L	0.219	13.1	20	
1,2,4-Trichlorobenzene		50.0	48.9	ug/L	1.27	2.16	20	
1,2,4-Trimethylbenzene		50.0	44.0	ug/L	2.64	12.0	20	
1,2-Dichloroethane		50.0	44.3	ug/L	0.377	11.4	20	
1,2-Dichlorobenzene		50.0	44.9	ug/L	1.60	10.2	20	
1,2-Dibromo-3-Chloropropane		50.0	46.6	ug/L	0.139	6.75	20	
1,2-Dibromoethane		50.0	45.5	ug/L	0.300	8.98	20	
1,3,5-Trimethylbenzene		50.0	43.5	ug/L	2.54	13.1	20	
1,3-Dichlorobenzene		50.0	46.5	ug/L	1.64	6.95	20	
1,3-Dichloropropane		50.0	45.1	ug/L	0.559	9.86	20	
1,4-Dichlorobenzene		50.0	45.7	ug/L	1.64	8.64	20	
1-Chlorohexane		50.0	48.7	ug/L	0.475	2.62	20	
2,2-Dichloropropane		50.0	47.1	ug/L	0.395	5.76	20	
2-Hexanone		50.0	44.0	ug/L	0.250	12.1	20	
2-Chlorotoluene		50.0	40.2	ug/L	2.22	19.6	20	
4-Chlorotoluene		50.0	45.8	ug/L	2.21	8.35	20	
Acetone		50.0	40.9	ug/L	0.0699	18.1	20	
Benzene		50.0	43.2	ug/L	1.02	13.6	20	
Bromobenzene		50.0	45.8	ug/L	0.893	8.45	20	
Bromochloromethane		50.0	45.4	ug/L	0.183	9.30	20	
Bromodichloromethane		50.0	46.2	ug/L	0.353	7.50	20	
Bromomethane		50.0	41.7	ug/L	0.197	16.6	20	
Carbon Disulfide		50.0	42.2	ug/L	0.656	15.6	20	
Carbon Tetrachloride		50.0	44.2	ug/L	0.342	11.5	20	
Chloroethane		50.0	44.1	ug/L	0.218	11.9	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/21/2017 Sample ID: WG611143-02

Instrument ID: HPMS11 Run Time: 16:31 Method: 8260B

File ID: 11M17649 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611145 Cal ID: HPMS11 - 14-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	45.1	ug/L	0.301	9.72	20	
cis-1,3-Dichloropropene		50.0	49.9	ug/L	0.443	0.106	20	
Dibromochloromethane		50.0	48.1	ug/L	0.391	3.79	20	
Dibromomethane		50.0	45.9	ug/L	0.158	8.20	20	
Dichlorodifluoromethane		50.0	45.7	ug/L	0.315	8.55	20	
Hexachlorobutadiene		50.0	48.5	ug/L	0.641	2.96	20	
Isopropylbenzene		50.0	43.6	ug/L	1.57	12.8	20	
Methylene Chloride		50.0	42.3	ug/L	0.280	15.4	20	
Methyl Tert Butyl Ether		50.0	44.4	ug/L	0.723	11.2	20	
2-Butanone		50.0	43.2	ug/L	0.120	13.5	20	
4-Methyl-2-Pentanone		50.0	40.8	ug/L	0.104	18.4	20	
n-Butylbenzene		50.0	47.9	ug/L	2.56	4.14	20	
n-Propylbenzene		50.0	44.0	ug/L	3.48	12.0	20	
m-,p-Xylene		100	92.1	ug/L	0.643	7.90	20	
Naphthalene		50.0	45.8	ug/L	2.59	8.46	20	
o-Xylene		50.0	45.7	ug/L	0.666	8.59	20	
p-Isopropyltoluene		50.0	44.8	ug/L	2.78	10.3	20	
sec-Butylbenzene		50.0	42.8	ug/L	3.18	14.3	20	
Styrene		50.0	50.8	ug/L	1.09	1.56	20	
Trichloroethene		50.0	43.7	ug/L	0.274	12.6	20	
tert-Butylbenzene		50.0	44.8	ug/L	0.592	10.4	20	
Tetrachloroethene		50.0	42.5	ug/L	0.323	14.9	20	
trans-1,2-Dichloroethene		50.0	43.3	ug/L	0.251	13.3	20	
trans-1,3-Dichloropropene		50.0	49.7	ug/L	0.547	0.671	20	
Trichlorofluoromethane		50.0	42.1	ug/L	0.361	15.9	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611221-02

Instrument ID: HPMS6 Run Time: 14:50 Method: 8260B

File ID: 6M146639 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611222 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	55.0	ug/L	0.420	10.1	20	
1,2-Dichloropropane	CCC	50.0	54.2	ug/L	0.274	8.36	20	
Chloroform	CCC	50.0	48.6	ug/L	0.503	2.79	20	
Ethylbenzene	CCC	50.0	48.5	ug/L	0.561	3.08	20	
Toluene	CCC	50.0	48.9	ug/L	1.53	2.21	20	
Vinyl Chloride	CCC	50.0	52.0	ug/L	0.471	3.95	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.9	ug/L	0.624	4.10	20	
1,1-Dichloroethane	SPCC	50.0	55.7	ug/L	0.506	11.3	20	
Bromoform	SPCC	50.0	47.7	ug/L	0.212	4.56	20	
Chlorobenzene	SPCC	50.0	48.2	ug/L	1.03	3.62	20	
Chloromethane	SPCC	50.0	48.0	ug/L	0.445	3.94	20	
Xylenes		150	148	ug/L	0.669	1.49	20	
1,1,1,2-Tetrachloroethane		50.0	50.3	ug/L	0.385	0.594	20	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.441	4.82	20	
1,1,2-Trichloroethane		50.0	47.4	ug/L	0.280	5.10	20	
1,1-Dichloropropene		50.0	52.7	ug/L	0.375	5.47	20	
1,2,3-Trichlorobenzene		50.0	38.2	ug/L	0.813	23.6	20	*
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.174	9.31	20	
1,2,4-Trichlorobenzene		50.0	43.3	ug/L	0.953	13.5	20	
1,2,4-Trimethylbenzene		50.0	52.2	ug/L	2.88	4.37	20	
1,2-Dichloroethane		50.0	53.0	ug/L	0.342	6.05	20	
1,2-Dichlorobenzene		50.0	47.0	ug/L	1.42	5.99	20	
1,2-Dibromo-3-Chloropropane		50.0	43.5	ug/L	0.103	12.9	20	
1,2-Dibromoethane		50.0	46.5	ug/L	0.263	7.07	20	
1,3,5-Trimethylbenzene		50.0	50.3	ug/L	2.70	0.642	20	
1,3-Dichlorobenzene		50.0	48.4	ug/L	1.55	3.18	20	
1,3-Dichloropropane		50.0	48.8	ug/L	0.483	2.39	20	
1,4-Dichlorobenzene		50.0	47.6	ug/L	1.55	4.81	20	
1-Chlorohexane		50.0	46.4	ug/L	0.468	7.21	20	
2,2-Dichloropropane		50.0	53.2	ug/L	0.368	6.31	20	
2-Hexanone		50.0	46.9	ug/L	0.133	6.11	20	
2-Chlorotoluene		50.0	48.5	ug/L	2.44	2.99	20	
4-Chlorotoluene		50.0	52.8	ug/L	2.35	5.67	20	
Acetone		50.0	51.2	ug/L	0.0553	2.46	20	
Benzene		50.0	50.9	ug/L	1.09	1.79	20	
Bromobenzene		50.0	47.5	ug/L	0.808	4.96	20	
Bromochloromethane		50.0	54.0	ug/L	0.171	7.99	20	
Bromodichloromethane		50.0	53.7	ug/L	0.382	7.30	20	
Bromomethane		50.0	42.7	ug/L	0.167	14.5	20	
Carbon Disulfide		50.0	49.4	ug/L	0.811	1.16	20	
Carbon Tetrachloride		50.0	58.9	ug/L	0.391	17.7	20	
Chloroethane		50.0	56.8	ug/L	0.222	13.6	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/22/2017 Sample ID: WG611221-02

Instrument ID: HPMS6 Run Time: 14:50 Method: 8260B

File ID: 6M146639 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611222 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	52.2	ug/L	0.315	4.36	20	
cis-1,3-Dichloropropene		50.0	56.2	ug/L	0.441	12.4	20	
Dibromochloromethane		50.0	48.5	ug/L	0.353	2.93	20	
Dibromomethane		50.0	51.2	ug/L	0.152	2.44	20	
Dichlorodifluoromethane		50.0	52.8	ug/L	0.419	5.59	20	
Hexachlorobutadiene		50.0	43.4	ug/L	0.366	13.1	20	
Isopropylbenzene		50.0	49.6	ug/L	1.66	0.762	20	
Methylene Chloride		50.0	52.1	ug/L	0.300	4.17	20	
Methyl Tert Butyl Ether		50.0	51.1	ug/L	0.646	2.27	20	
2-Butanone		50.0	48.9	ug/L	0.0665	2.13	20	
4-Methyl-2-Pentanone		50.0	47.6	ug/L	0.0618	4.85	20	
n-Butylbenzene		50.0	52.1	ug/L	2.65	4.21	20	
n-Propylbenzene		50.0	50.4	ug/L	3.82	0.803	20	
m-,p-Xylene		100	98.8	ug/L	0.684	1.24	20	
Naphthalene		50.0	40.3	ug/L	1.78	19.3	20	
o-Xylene		50.0	49.0	ug/L	0.655	2.01	20	
p-Isopropyltoluene		50.0	50.6	ug/L	2.81	1.16	20	
sec-Butylbenzene		50.0	50.1	ug/L	3.32	0.282	20	
Styrene		50.0	51.7	ug/L	1.16	3.35	20	
Trichloroethene		50.0	47.8	ug/L	0.278	4.45	20	
tert-Butylbenzene		50.0	48.7	ug/L	0.547	2.61	20	
Tetrachloroethene		50.0	46.9	ug/L	0.356	6.11	20	
trans-1,2-Dichloroethene		50.0	52.2	ug/L	0.286	4.35	20	
trans-1,3-Dichloropropene		50.0	53.3	ug/L	0.513	6.53	20	
Trichlorofluoromethane		50.0	55.2	ug/L	0.513	10.4	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/24/2017 Sample ID: WG611300-02

Instrument ID: HPMS8 Run Time: 11:42 Method: 8260B

File ID: 8M419116 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611301 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.5	ug/L	0.373	3.06	20	
1,2-Dichloropropane	CCC	50.0	49.6	ug/L	0.251	0.702	20	
Chloroform	CCC	50.0	46.4	ug/L	0.467	7.13	20	
Ethylbenzene	CCC	50.0	50.1	ug/L	0.556	0.208	20	
Toluene	CCC	50.0	51.2	ug/L	1.42	2.37	20	
Vinyl Chloride	CCC	50.0	51.0	ug/L	0.408	2.03	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.4	ug/L	0.448	5.11	20	
1,1-Dichloroethane	SPCC	50.0	50.9	ug/L	0.462	1.85	20	
Bromoform	SPCC	50.0	45.8	ug/L	0.186	8.48	20	
Chlorobenzene	SPCC	50.0	48.9	ug/L	0.969	2.14	20	
Chloromethane	SPCC	50.0	51.2	ug/L	0.433	2.32	20	
Xylenes		150	154	ug/L	0.658	2.98	20	
1,1,1,2-Tetrachloroethane		50.0	52.9	ug/L	0.372	5.73	20	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.425	4.75	20	
1,1,2-Trichloroethane		50.0	47.7	ug/L	0.219	4.52	20	
1,1-Dichloropropene		50.0	50.7	ug/L	0.359	1.34	20	
1,2,3-Trichlorobenzene		50.0	48.1	ug/L	0.750	3.87	20	
1,2,3-Trichloropropane		50.0	47.1	ug/L	0.127	5.79	20	
1,2,4-Trichlorobenzene		50.0	48.6	ug/L	0.914	2.76	20	
1,2,4-Trimethylbenzene		50.0	51.7	ug/L	2.67	3.38	20	
1,2-Dichloroethane		50.0	50.2	ug/L	0.285	0.313	20	
1,2-Dichlorobenzene		50.0	48.5	ug/L	1.35	3.00	20	
1,2-Dibromo-3-Chloropropane		50.0	45.2	ug/L	0.0694	9.66	20	
1,2-Dibromoethane		50.0	49.3	ug/L	0.221	1.36	20	
1,3,5-Trimethylbenzene		50.0	50.6	ug/L	2.56	1.10	20	
1,3-Dichlorobenzene		50.0	48.8	ug/L	1.55	2.39	20	
1,3-Dichloropropane		50.0	48.0	ug/L	0.372	3.92	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.53	5.36	20	
1-Chlorohexane		50.0	55.0	ug/L	0.484	9.99	20	
2,2-Dichloropropane		50.0	54.1	ug/L	0.414	8.28	20	
2-Hexanone		50.0	45.3	ug/L	0.0509	9.47	20	
2-Chlorotoluene		50.0	45.3	ug/L	2.17	9.35	20	
4-Chlorotoluene		50.0	51.5	ug/L	2.22	3.04	20	
Acetone		50.0	48.7	ug/L	0.0343	2.58	20	
Benzene		50.0	50.6	ug/L	1.04	1.11	20	
Bromobenzene		50.0	48.8	ug/L	0.800	2.47	20	
Bromochloromethane		50.0	51.6	ug/L	0.162	3.14	20	
Bromodichloromethane		50.0	51.7	ug/L	0.342	3.48	20	
Bromomethane		50.0	60.2	ug/L	0.184	20.4	20	*
Carbon Disulfide		50.0	58.3	ug/L	0.877	16.5	20	
Carbon Tetrachloride		50.0	53.2	ug/L	0.400	6.33	20	
Chloroethane		50.0	51.4	ug/L	0.179	2.73	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/24/2017 Sample ID: WG611300-02

Instrument ID: HPMS8 Run Time: 11:42 Method: 8260B

File ID: 8M419116 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611301 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	51.1	ug/L	0.297	2.12	20	
cis-1,3-Dichloropropene		50.0	52.9	ug/L	0.398	5.84	20	
Dibromochloromethane		50.0	52.0	ug/L	0.306	4.07	20	
Dibromomethane		50.0	51.0	ug/L	0.132	1.91	20	
Dichlorodifluoromethane		50.0	55.4	ug/L	0.375	10.7	20	
Hexachlorobutadiene		50.0	49.8	ug/L	0.436	0.368	20	
Isopropylbenzene		50.0	51.7	ug/L	1.60	3.49	20	
Methylene Chloride		50.0	48.7	ug/L	0.254	2.56	20	
Methyl Tert Butyl Ether		50.0	49.2	ug/L	0.505	1.59	20	
2-Butanone		50.0	46.4	ug/L	0.0511	7.28	20	
4-Methyl-2-Pentanone		50.0	46.3	ug/L	0.0453	7.42	20	
n-Butylbenzene		50.0	52.4	ug/L	2.52	4.89	20	
n-Propylbenzene		50.0	50.5	ug/L	3.54	1.08	20	
m-,p-Xylene		100	105	ug/L	0.673	4.70	20	
Naphthalene		50.0	45.3	ug/L	1.22	9.32	20	
o-Xylene		50.0	49.8	ug/L	0.643	0.484	20	
p-Isopropyltoluene		50.0	51.8	ug/L	2.77	3.64	20	
sec-Butylbenzene		50.0	50.3	ug/L	3.19	0.677	20	
Styrene		50.0	53.8	ug/L	1.09	7.61	20	
Trichloroethene		50.0	49.9	ug/L	0.290	0.122	20	
tert-Butylbenzene		50.0	48.8	ug/L	0.560	2.41	20	
Tetrachloroethene		50.0	51.7	ug/L	0.302	3.40	20	
trans-1,2-Dichloroethene		50.0	50.3	ug/L	0.355	0.664	20	
trans-1,3-Dichloropropene		50.0	50.5	ug/L	0.408	1.07	20	
Trichlorofluoromethane		50.0	51.4	ug/L	0.446	2.72	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5259050
Report generated 07/25/2017 12:55

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/26/2017 Sample ID: WG611560-02

Instrument ID: HPMS8 Run Time: 08:22 Method: 8260B

File ID: 8M419165 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611561 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.1	ug/L	0.385	6.19	20	
1,2-Dichloropropane	CCC	50.0	51.2	ug/L	0.259	2.48	20	
Chloroform	CCC	50.0	47.4	ug/L	0.476	5.23	20	
Ethylbenzene	CCC	50.0	53.7	ug/L	0.596	7.46	20	
Toluene	CCC	50.0	53.2	ug/L	1.48	6.35	20	
Vinyl Chloride	CCC	50.0	54.8	ug/L	0.438	9.54	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.4	ug/L	0.475	0.769	20	
1,1-Dichloroethane	SPCC	50.0	52.5	ug/L	0.476	5.04	20	
Bromoform	SPCC	50.0	45.1	ug/L	0.184	9.77	20	
Chlorobenzene	SPCC	50.0	51.0	ug/L	1.01	2.01	20	
Chloromethane	SPCC	50.0	51.7	ug/L	0.437	3.36	20	
Xylenes		150	162	ug/L	0.689	8.05	20	
1,1,1,2-Tetrachloroethane		50.0	55.0	ug/L	0.387	10.1	20	
1,1,1-Trichloroethane		50.0	53.4	ug/L	0.433	6.71	20	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.220	3.77	20	
1,1-Dichloropropene		50.0	52.5	ug/L	0.372	4.97	20	
1,2,3-Trichlorobenzene		50.0	50.6	ug/L	0.790	1.16	20	
1,2,3-Trichloropropane		50.0	49.6	ug/L	0.134	0.791	20	
1,2,4-Trichlorobenzene		50.0	51.7	ug/L	0.972	3.38	20	
1,2,4-Trimethylbenzene		50.0	55.9	ug/L	2.89	11.8	20	
1,2-Dichloroethane		50.0	50.0	ug/L	0.284	0.00260	20	
1,2-Dichlorobenzene		50.0	51.7	ug/L	1.44	3.40	20	
1,2-Dibromo-3-Chloropropane		50.0	48.0	ug/L	0.0736	4.09	20	
1,2-Dibromoethane		50.0	49.3	ug/L	0.221	1.40	20	
1,3,5-Trimethylbenzene		50.0	54.3	ug/L	2.75	8.68	20	
1,3-Dichlorobenzene		50.0	52.7	ug/L	1.68	5.48	20	
1,3-Dichloropropane		50.0	49.3	ug/L	0.381	1.45	20	
1,4-Dichlorobenzene		50.0	50.9	ug/L	1.64	1.72	20	
1-Chlorohexane		50.0	57.0	ug/L	0.502	13.9	20	
2,2-Dichloropropane		50.0	55.4	ug/L	0.424	10.8	20	
2-Hexanone		50.0	44.3	ug/L	0.0497	11.5	20	
2-Chlorotoluene		50.0	55.2	ug/L	2.63	10.3	20	
4-Chlorotoluene		50.0	48.4	ug/L	2.08	3.23	20	
Acetone		50.0	44.5	ug/L	0.0313	10.9	20	
Benzene		50.0	52.0	ug/L	1.08	4.09	20	
Bromobenzene		50.0	51.4	ug/L	0.843	2.80	20	
Bromochloromethane		50.0	50.5	ug/L	0.159	0.982	20	
Bromodichloromethane		50.0	52.7	ug/L	0.348	5.36	20	
Bromomethane		50.0	46.0	ug/L	0.131	7.90	20	
Carbon Disulfide		50.0	58.3	ug/L	0.878	16.6	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.410	9.02	20	
Chloroethane		50.0	53.2	ug/L	0.186	6.37	20	

CCV - Modified 03/05/2008

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041069 Run Date: 04/26/2017 Sample ID: WG611560-02

Instrument ID: HPMS8 Run Time: 08:22 Method: 8260B

File ID: 8M419165 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611561 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	52.1	ug/L	0.303	4.20	20	
cis-1,3-Dichloropropene		50.0	53.4	ug/L	0.401	6.76	20	
Dibromochloromethane		50.0	51.8	ug/L	0.305	3.55	20	
Dibromomethane		50.0	50.2	ug/L	0.130	0.416	20	
Dichlorodifluoromethane		50.0	55.8	ug/L	0.377	11.5	20	
Hexachlorobutadiene		50.0	51.3	ug/L	0.449	2.70	20	
Isopropylbenzene		50.0	54.8	ug/L	1.70	9.67	20	
Methylene Chloride		50.0	49.9	ug/L	0.259	0.287	20	
Methyl Tert Butyl Ether		50.0	46.8	ug/L	0.480	6.33	20	
2-Butanone		50.0	45.3	ug/L	0.0500	9.40	20	
4-Methyl-2-Pentanone		50.0	44.0	ug/L	0.0430	12.0	20	
n-Butylbenzene		50.0	56.0	ug/L	2.70	12.0	20	
n-Propylbenzene		50.0	54.3	ug/L	3.80	8.67	20	
m-,p-Xylene		100	110	ug/L	0.707	10.1	20	
Naphthalene		50.0	48.3	ug/L	1.30	3.38	20	
o-Xylene		50.0	52.0	ug/L	0.672	3.96	20	
p-Isopropyltoluene		50.0	55.1	ug/L	2.95	10.2	20	
sec-Butylbenzene		50.0	54.0	ug/L	3.43	8.07	20	
Styrene		50.0	55.7	ug/L	1.13	11.4	20	
Trichloroethene		50.0	50.9	ug/L	0.296	1.85	20	
tert-Butylbenzene		50.0	51.8	ug/L	0.594	3.60	20	
Tetrachloroethene		50.0	52.8	ug/L	0.309	5.63	20	
trans-1,2-Dichloroethene		50.0	51.7	ug/L	0.364	3.37	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.407	0.772	20	
Trichlorofluoromethane		50.0	52.2	ug/L	0.453	4.37	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS6
Workgroup (AAB#): WG611071

ICAL CCV Number: WG608938-08
CAL ID: HPMS6 - 05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041069-21	1.00	01	198126	383077	533407
L17041069-22	1.00	01	178627	348489	484583
L17041069-23	1.00	01	185085	357763	493936
L17041069-24	1.00	01	186770	361498	503360
L17041069-25	1.00	01	186183	361717	503470
L17041069-26	1.00	01	191196	370054	515638
L17041069-27	1.00	01	205938	393686	540545
L17041069-28	1.00	01	209360	400527	559844
WG611071-01	1.00	01	200113	392124	543898
WG611071-02	1.00	01	200345	377674	528037

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17041069
Instrument ID:HPMS8
Workgroup (AAB#):WG611120

ICAL CCV Number:WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041069-01	1.00	01	310962	607137	768206
L17041069-02	1.00	01	311101	601055	756679
L17041069-03	1.00	01	282924	557134	708513
L17041069-04	1.00	01	315180	606179	763183
L17041069-05	1.00	01	338121	657015	825979
L17041069-06	1.00	01	311509	606155	761763
L17041069-07	1.00	01	349968	685144	855993
L17041069-08	1.00	01	376335	707056	869243
L17041069-09	1.00	01	383625	716968	887551
L17041069-10	1.00	01	297989	588709	746294
L17041069-11	1.00	01	277315	552706	705591
L17041069-12	1.00	01	299347	593348	743798
L17041069-13	1.00	01	295402	582425	734074
L17041069-14	1.00	01	289941	574272	721444
L17041069-15	1.00	01	330156	658030	824060
L17041069-16	1.00	01	328926	635184	804216
L17041069-17	1.00	01	283612	560810	712753
L17041069-18	1.00	01	317712	624403	790520
L17041069-19	1.00	01	297709	584775	736270
WG611120-01	1.00	01	338413	662691	839588
WG611120-02	1.00	01	366953	682202	853288

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17041069
Instrument ID:HPMS11
Workgroup (AAB#):WG611145

ICAL CCV Number:WG610045-08
CAL ID: HPMS11-14-APR-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610045-08	NA	NA	169640	321859	446534
Upper Limit	NA	NA	339280	643718	893068
Lower Limit	NA	NA	84820	160930	223267
L17041069-20	1.00	01	119497	236180	335856
L17041069-29	1.00	01	115608	232529	330140
L17041069-30	1.00	01	119198	232773	334045
L17041069-31	1.00	01	119764	232199	331431
L17041069-32	1.00	01	119852	235514	335646
L17041069-33	1.00	01	127441	236711	331878
L17041069-34	1.00	01	131061	235141	330264
L17041069-35	1.00	01	117005	228397	324152
L17041069-36	1.00	01	121277	236089	334965
L17041069-37	1.00	01	115796	230018	326613
L17041069-38	1.00	01	122974	234176	331044
L17041069-39	1.00	01	126694	244709	349286
L17041069-40	1.00	01	119256	231711	329624
L17041069-41	1.00	01	121048	233457	329225
WG611145-01	1.00	01	121999	242248	348108
WG611145-02	1.00	01	125527	232338	330342

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS6
Workgroup (AAB#): WG611222

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041069-43	1.00	01	179059	344641	475009
L17041069-45	1.00	01	176902	347206	474144
L17041069-46	1.00	01	183751	363759	502339
WG611222-01	1.00	01	180996	354201	489868
WG611222-02	1.00	01	197099	358904	494654
WG611222-06	1.00	02	198732	380769	523995

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS8
Workgroup (AAB#): WG611301

ICAL CCV Number: WG610410-08
CAL ID: HPMS8 - 17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041069-13	5.00	DL01	305255	594080	743728
L17041069-44	1.00	01	291689	565422	711158
L17041069-47	1.00	01	291087	559908	701328
L17041069-48	1.00	01	286849	562261	701512
L17041069-49	1.00	01	278802	541166	676018
L17041069-50	1.00	01	274749	544792	684208
WG611301-01	1.00	01	298713	583306	733239
WG611301-02	1.00	01	323407	609137	759307
WG611301-03	1.00	01	334340	627617	776037

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS8
Workgroup (AAB#): WG611561

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041069-42	1.00	01	291230	561116	700773
WG611561-01	1.00	01	300614	577927	727213
WG611561-02	1.00	01	337676	623663	767268
WG611561-03	1.00	01	344756	636816	788127

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS6
Workgroup (AAB#): WG611071

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041069-21	1.00	01	18.16	15.13	11.25
L17041069-22	1.00	01	18.16	15.13	11.25
L17041069-23	1.00	01	18.16	15.13	11.25
L17041069-24	1.00	01	18.16	15.13	11.25
L17041069-25	1.00	01	18.16	15.13	11.25
L17041069-26	1.00	01	18.16	15.13	11.25
L17041069-27	1.00	01	18.16	15.13	11.25
L17041069-28	1.00	01	18.16	15.13	11.25
WG611071-01	1.00	01	18.16	15.13	11.25
WG611071-02	1.00	01	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS6
Workgroup (AAB#): WG611222

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041069-43	1.00	01	18.16	15.13	11.25
L17041069-45	1.00	01	18.16	15.13	11.25
L17041069-46	1.00	01	18.16	15.13	11.25
WG611222-01	1.00	01	18.16	15.13	11.25
WG611222-02	1.00	01	18.16	15.13	11.25
WG611222-06	1.00	02	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5259857
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069

Instrument ID: HPMS11

Workgroup (AAB#): WG611145

ICAL CCV Number: WG610045-08

CAL ID: HPMS11-14-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610045-08	NA	NA	16.96	14.14	10.52
Upper Limit	NA	NA	17.46	14.64	11.02
Lower Limit	NA	NA	16.46	13.64	10.02
L17041069-20	1.00	01	16.96	14.14	10.52
L17041069-29	1.00	01	16.96	14.14	10.53
L17041069-30	1.00	01	16.96	14.14	10.52
L17041069-31	1.00	01	16.96	14.14	10.52
L17041069-32	1.00	01	16.96	14.14	10.52
L17041069-33	1.00	01	16.96	14.14	10.53
L17041069-34	1.00	01	16.96	14.14	10.52
L17041069-35	1.00	01	16.96	14.14	10.53
L17041069-36	1.00	01	16.96	14.14	10.52
L17041069-37	1.00	01	16.96	14.14	10.52
L17041069-38	1.00	01	16.96	14.14	10.53
L17041069-39	1.00	01	16.96	14.14	10.53
L17041069-40	1.00	01	16.96	14.14	10.53
L17041069-41	1.00	01	16.96	14.14	10.53
WG611145-01	1.00	01	16.96	14.14	10.52
WG611145-02	1.00	01	16.96	14.14	10.53

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5259857

Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS8
Workgroup (AAB#): WG611120

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041069-01	1.00	01	17.82	14.79	10.93
L17041069-02	1.00	01	17.81	14.79	10.93
L17041069-03	1.00	01	17.81	14.79	10.92
L17041069-04	1.00	01	17.81	14.79	10.92
L17041069-05	1.00	01	17.81	14.79	10.92
L17041069-06	1.00	01	17.82	14.79	10.91
L17041069-07	1.00	01	17.81	14.79	10.93
L17041069-08	1.00	01	17.82	14.79	10.92
L17041069-09	1.00	01	17.81	14.79	10.92
L17041069-10	1.00	01	17.82	14.79	10.92
L17041069-11	1.00	01	17.81	14.79	10.93
L17041069-12	1.00	01	17.82	14.79	10.92
L17041069-13	1.00	01	17.82	14.79	10.92
L17041069-14	1.00	01	17.82	14.79	10.92
L17041069-15	1.00	01	17.82	14.79	10.93
L17041069-16	1.00	01	17.82	14.79	10.92
L17041069-17	1.00	01	17.82	14.79	10.92
L17041069-18	1.00	01	17.82	14.79	10.93
L17041069-19	1.00	01	17.82	14.79	10.92
WG611120-01	1.00	01	17.81	14.79	10.92
WG611120-02	1.00	01	17.81	14.79	10.93

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5259857
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS8
Workgroup (AAB#): WG611301

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041069-13	5.00	DL01	17.82	14.79	10.92
L17041069-44	1.00	01	17.82	14.79	10.93
L17041069-47	1.00	01	17.81	14.79	10.92
L17041069-48	1.00	01	17.81	14.79	10.92
L17041069-49	1.00	01	17.81	14.79	10.93
L17041069-50	1.00	01	17.82	14.79	10.92
WG611301-01	1.00	01	17.82	14.79	10.93
WG611301-02	1.00	01	17.82	14.79	10.93
WG611301-03	1.00	01	17.82	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5259857
Report generated: 07/25/2017 12:56

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041069
Instrument ID: HPMS8
Workgroup (AAB#): WG611561

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041069-42	1.00	01	17.82	14.79	10.92
WG611561-01	1.00	01	17.82	14.79	10.92
WG611561-02	1.00	01	17.81	14.79	10.92
WG611561-03	1.00	01	17.81	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5259857
Report generated: 07/25/2017 12:56

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419103.D Vial: 17
Acq On : 21 Apr 2017 20:33 Operator: TMB
Sample : L17041069-01 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 20:55:13 2017 Quant Results File: 8260WT.RES

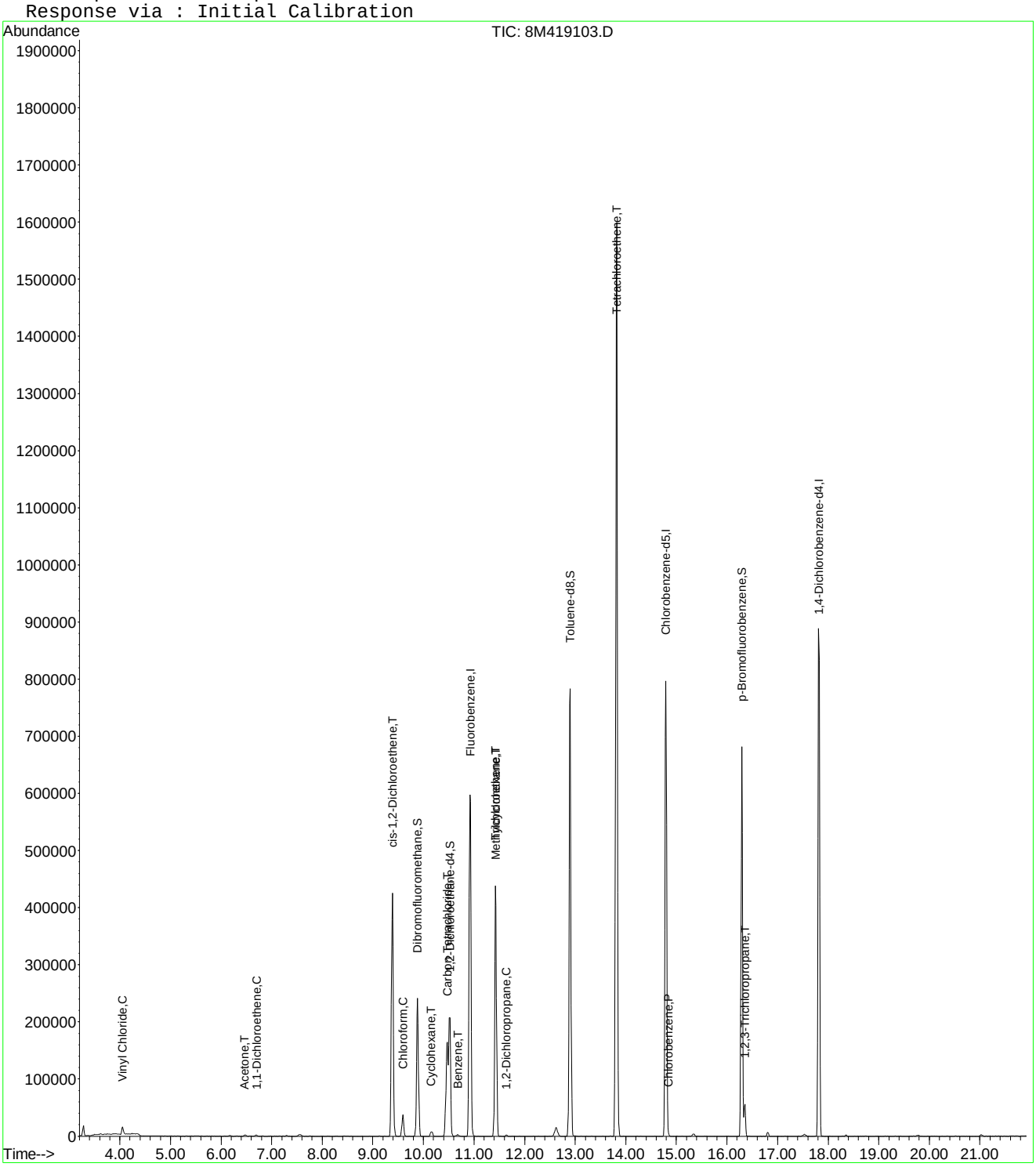
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

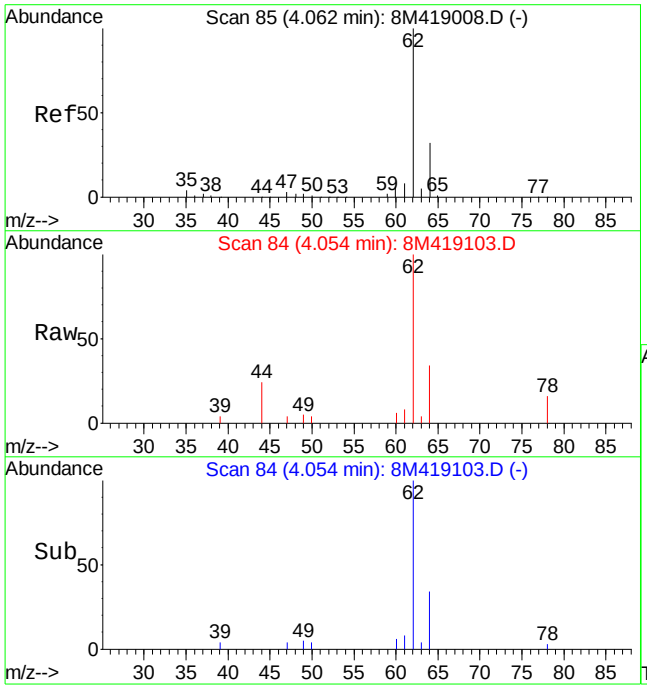
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	768206	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	607137	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	310962	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	202507	25.1325 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.52%		
43) 1,2-Dichloroethane-d4	10.52	65	176388	25.3219 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.28%		
58) Toluene-d8	12.90	98	731741	26.3774 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%		
80) p-Bromofluorobenzene	16.29	95	286540	26.1089 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.44%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	18172	1.4805 ug/L	99
13) Acetone	6.46	43	4697	4.3473 ug/L	86
14) 1,1-Dichloroethene	6.70	61	1958	0.1760 ug/L	87
32) cis-1,2-Dichloroethene	9.39	96	254693	28.4679 ug/L	90
33) Chloroform	9.59	83	39705	2.5723 ug/L	97
39) Cyclohexane	10.15	56	6668	0.5749 ug/L	88
42) Carbon Tetrachloride	10.47	117	162685	14.0850 ug/L	99
46) Benzene	10.68	78	4698	0.1480 ug/L #	76
47) Trichloroethene	11.42	130	192308	21.5710 ug/L	96
48) Methylcyclohexane	11.43	83	2070	0.1742 ug/L #	1
49) 1,2-Dichloropropane	11.64	63	1450	0.1871 ug/L #	71
66) Tetrachloroethene	13.82	164	506776	71.3887 ug/L	98
70) Chlorobenzene	14.84	112	5153	0.2142 ug/L #	42
81) 1,2,3-Trichloropropane	16.35	110	12251	7.2830 ug/L #	32

(#) = qualifier out of range (m) = manual integration
8M419103.D 8260WT.M Mon Apr 24 08:48:20 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419103.D Vial: 17
Acq On : 21 Apr 2017 20:33 Operator: TMB
Sample : L17041069-01 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 20:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

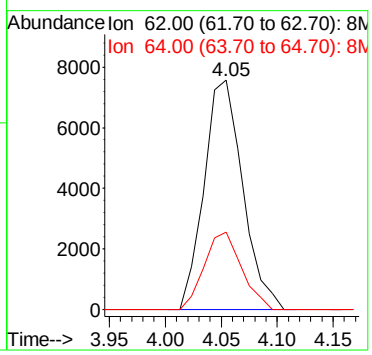


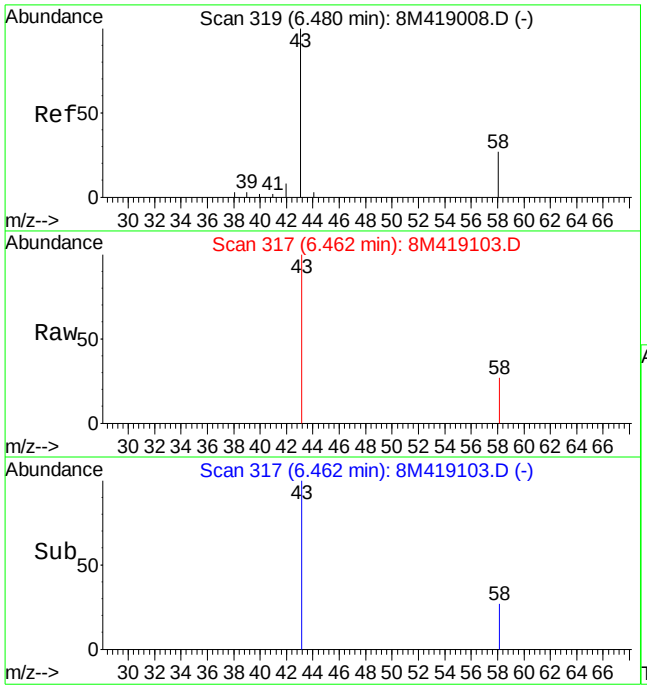


#4
Vinyl Chloride
Concen: 1.48 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 62 Resp: 18172

Ion	Ratio	Lower	Upper
62	100		
64	32.5	19.9	46.3

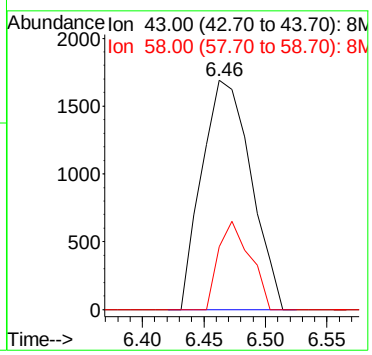


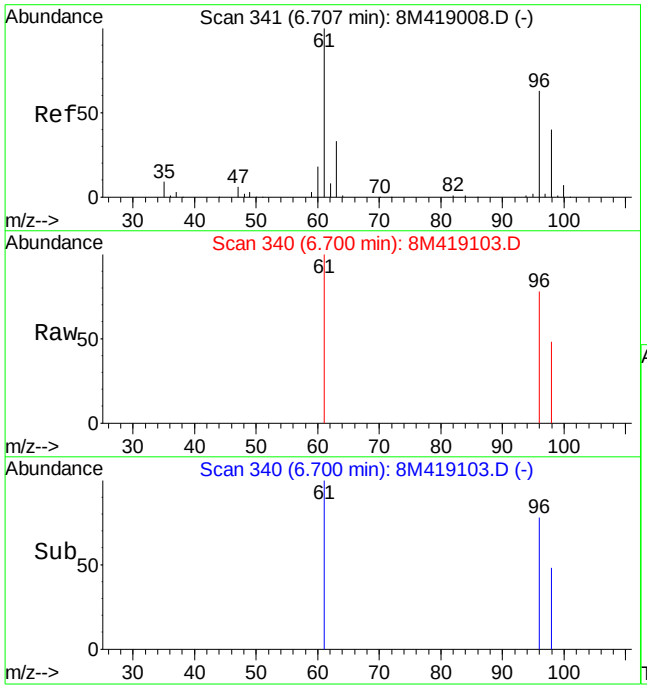


#13
Acetone
Concen: 4.35 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 43 Resp: 4697

Ion	Ratio	Lower	Upper
43	100		
58	24.7	19.4	45.4

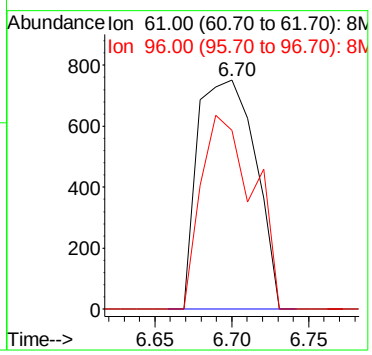


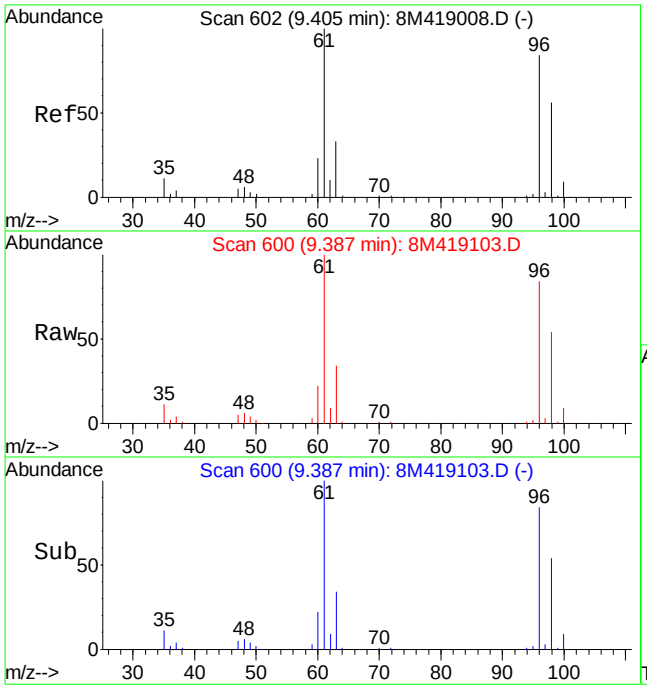


#14
1,1-Dichloroethene
Concen: 0.18 ug/L
RT: 6.70 min Scan# 340
Delta R.T. 0.00 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 61 Resp: 1958

Ion	Ratio	Lower	Upper
61	100		
96	77.2	40.0	93.4

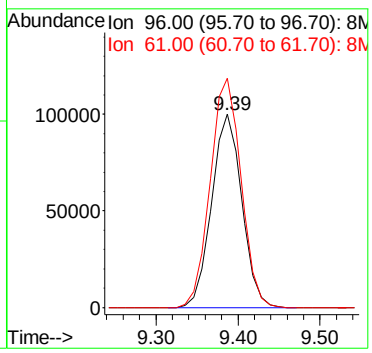


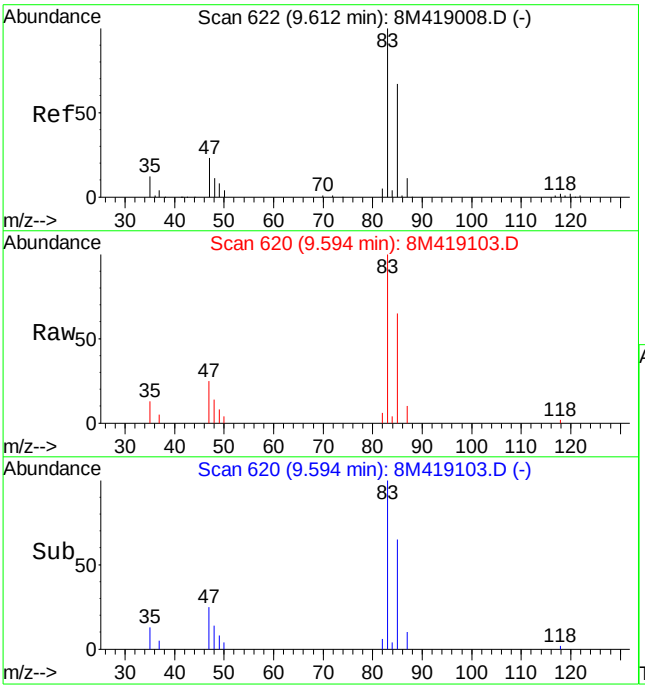


#32
cis-1,2-Dichloroethene
Concen: 28.47 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 96 Resp: 254693

Ion	Ratio	Lower	Upper
96	100		
61	121.4	80.3	187.3

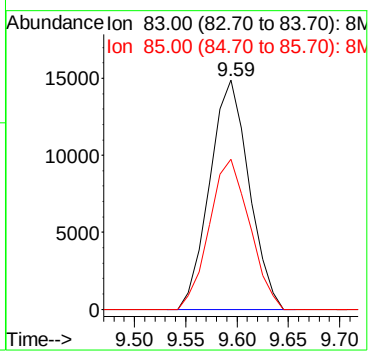


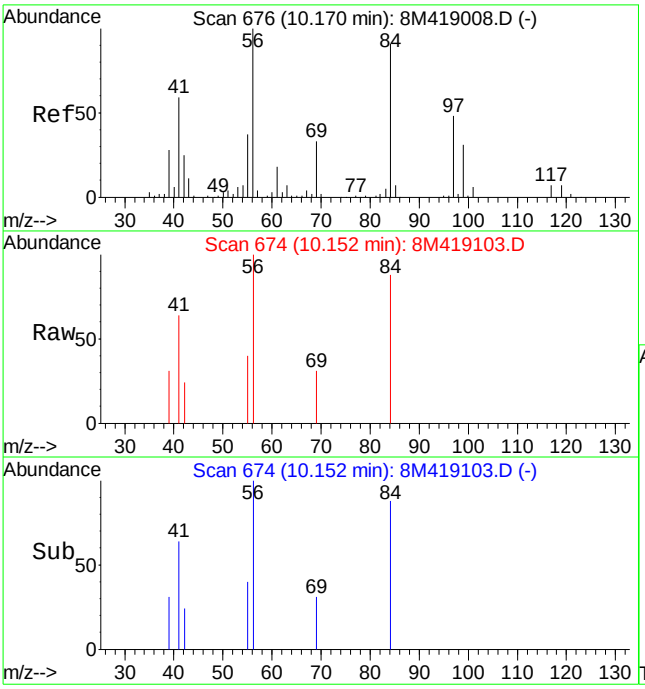


#33
Chloroform
Concen: 2.57 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 83 Resp: 39705

Ion	Ratio	Lower	Upper
83	100		
85	67.2	39.1	91.3

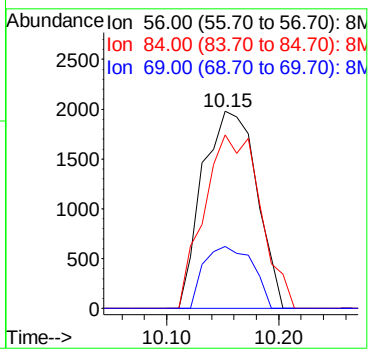


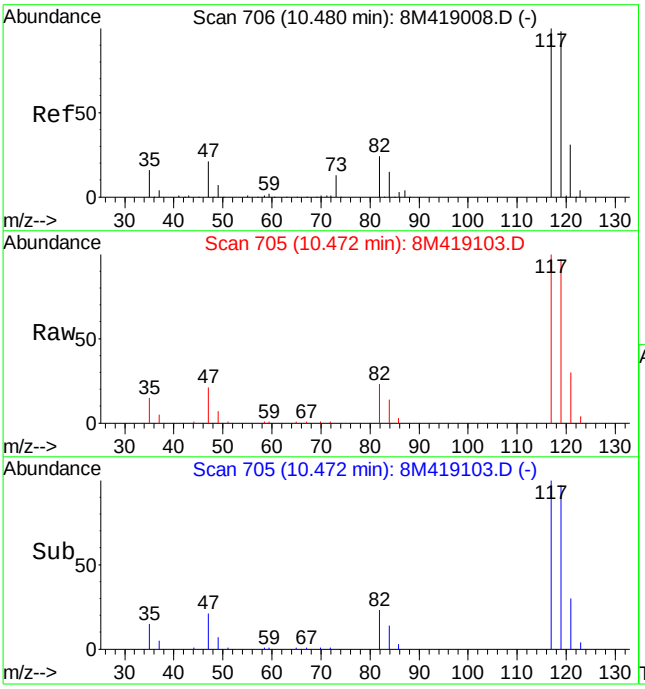


#39
Cyclohexane
Concen: 0.57 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 56 Resp: 6668

Ion	Ratio	Lower	Upper
56	100		
84	90.9	61.6	143.8
69	28.4	21.4	50.0

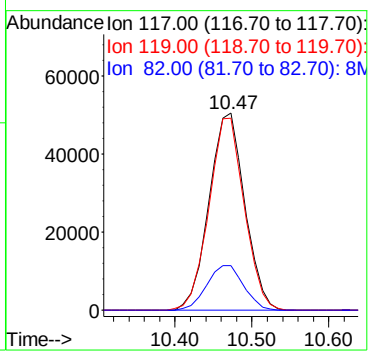


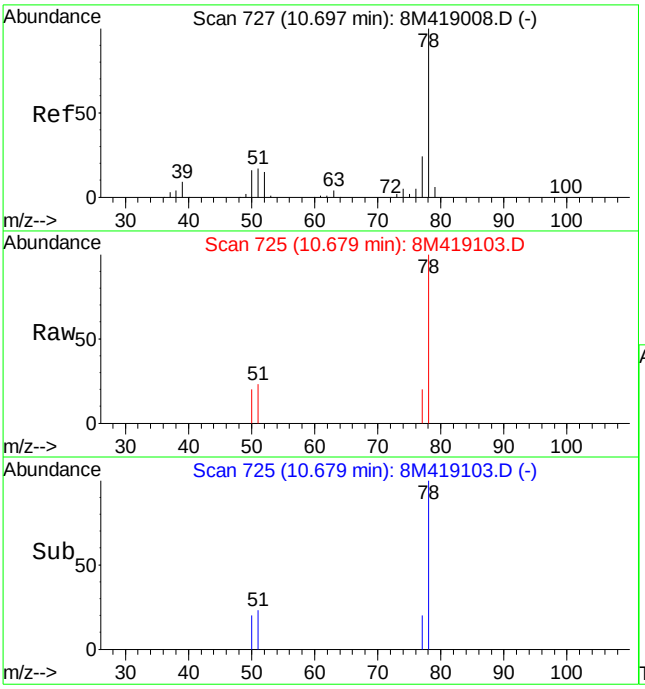


#42
Carbon Tetrachloride
Concen: 14.09 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion:117 Resp: 162685

Ion	Ratio	Lower	Upper
117	100		
119	96.5	58.5	136.5
82	23.6	14.9	34.9

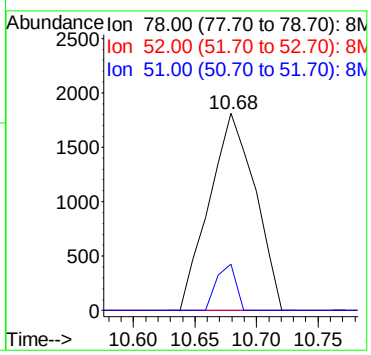


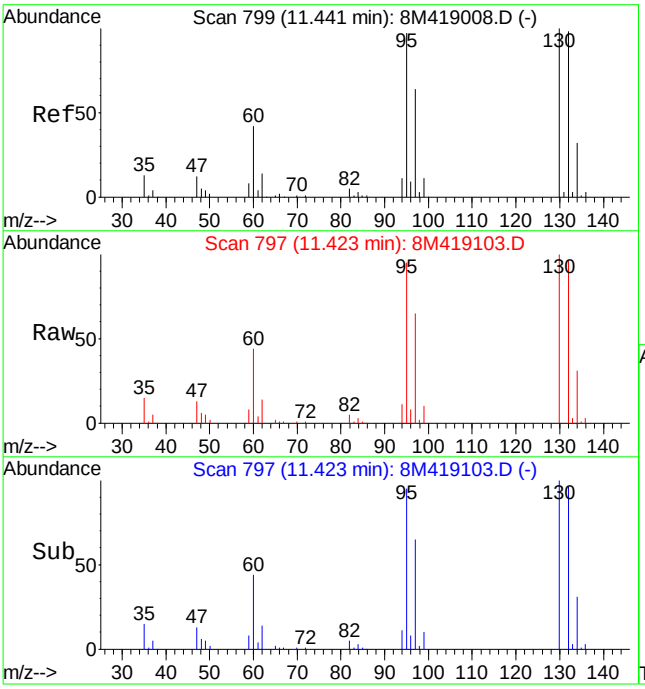


#46
Benzene
Concen: 0.15 ug/L
RT: 10.68 min Scan# 725
Delta R.T. -0.02 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 78 Resp: 4698

Ion	Ratio	Lower	Upper
78	100		
52	0.0	8.1	18.9#
51	9.9	10.1	23.7#

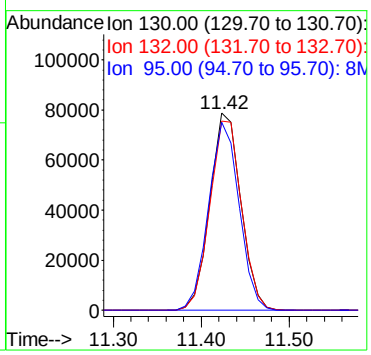


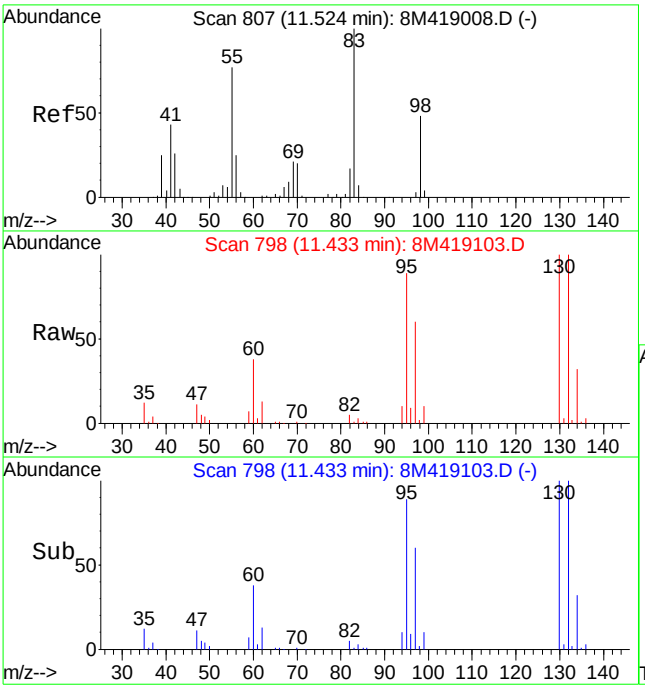


#47
Trichloroethene
Concen: 21.57 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion:130 Resp: 192308

Ion	Ratio	Lower	Upper
130	100		
132	98.2	59.4	138.6
95	93.9	60.1	140.3

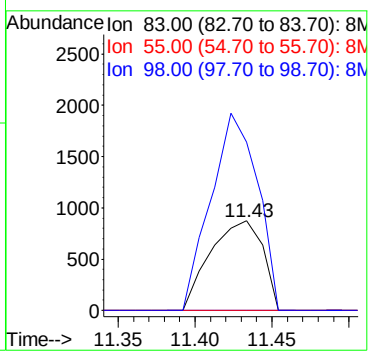


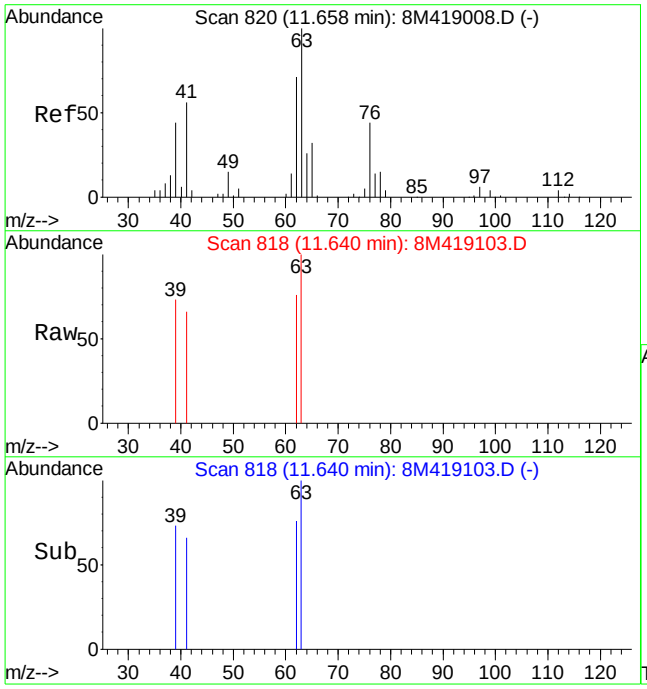


#48
Methylcyclohexane
Concen: 0.17 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.09 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 83 Resp: 2070

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	196.4	28.4	66.2#

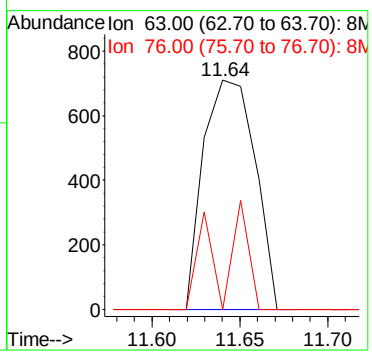


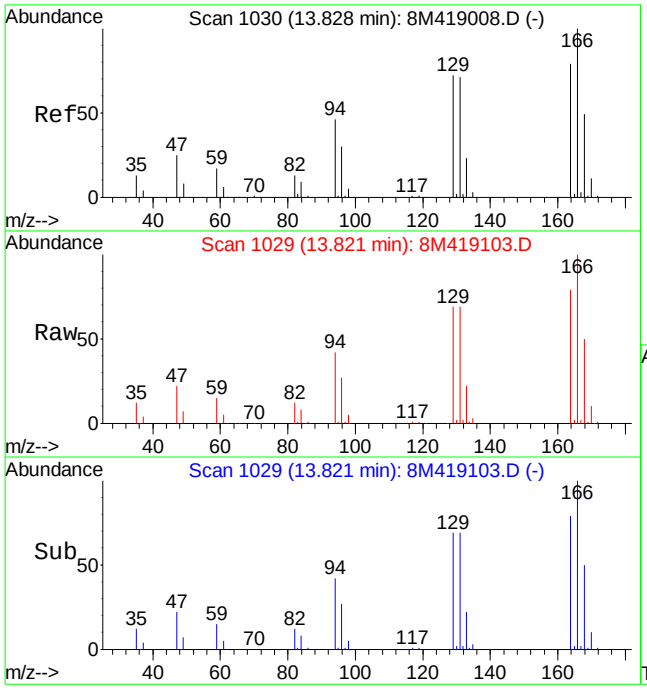


#49
1,2-Dichloropropane
Concen: 0.19 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion: 63 Resp: 1450

Ion	Ratio	Lower	Upper
63	100		
76	27.4	28.2	65.8#

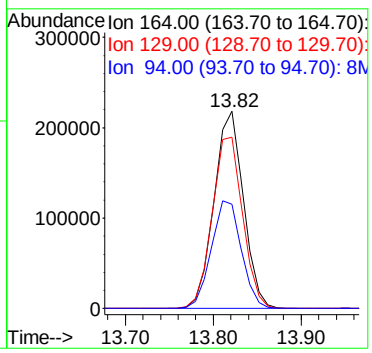


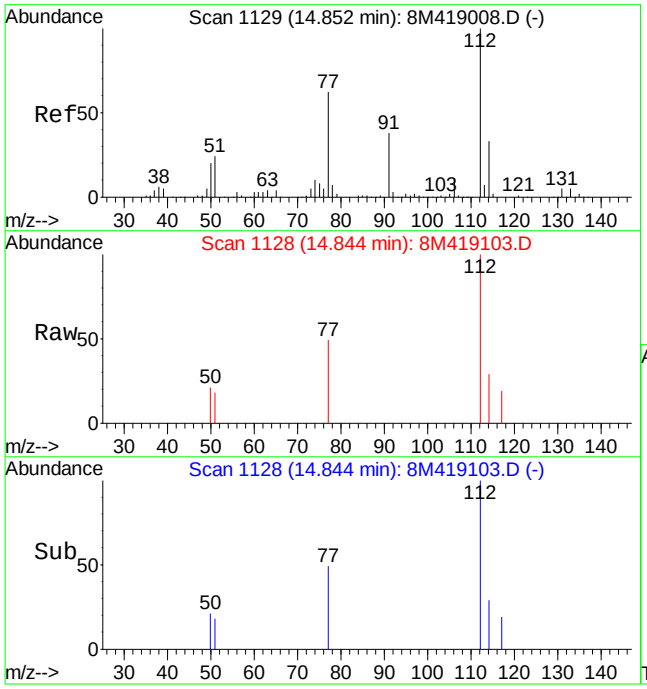


#66
Tetrachloroethene
Concen: 71.39 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion:164 Resp: 506776

Ion	Ratio	Lower	Upper
164	100		
129	89.8	53.4	124.6
94	55.7	34.7	81.1

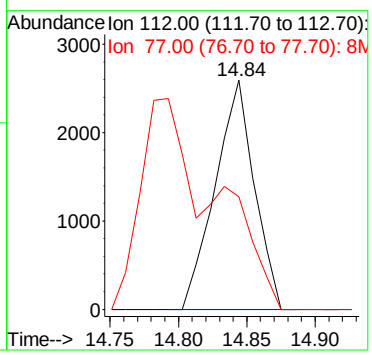


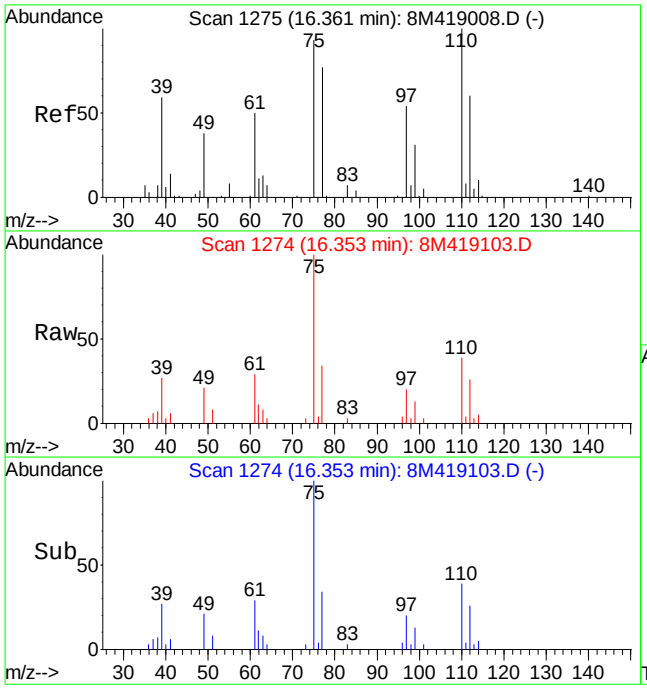


#70
Chlorobenzene
Concen: 0.21 ug/L
RT: 14.84 min Scan# 1128
Delta R.T. -0.01 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion:112 Resp: 5153

Ion	Ratio	Lower	Upper
112	100		
77	125.8	45.5	106.1#

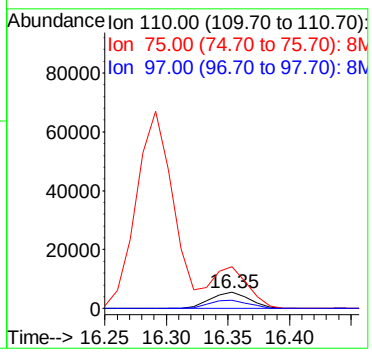




#81
1,2,3-Trichloropropane
Concen: 7.28 ug/L
RT: 16.35 min Scan# 1274
Delta R.T. 0.05 min
Lab File: 8M419103.D
Acq: 21 Apr 2017 20:33

Tgt Ion:110 Resp: 12251

Ion	Ratio	Lower	Upper
110	100		
75	207.5	230.7	538.3#
97	49.9	34.1	79.7



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419101.D Vial: 15
Acq On : 21 Apr 2017 19:33 Operator: TMB
Sample : L17041069-02 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 19:55:57 2017 Quant Results File: 8260WT.RES

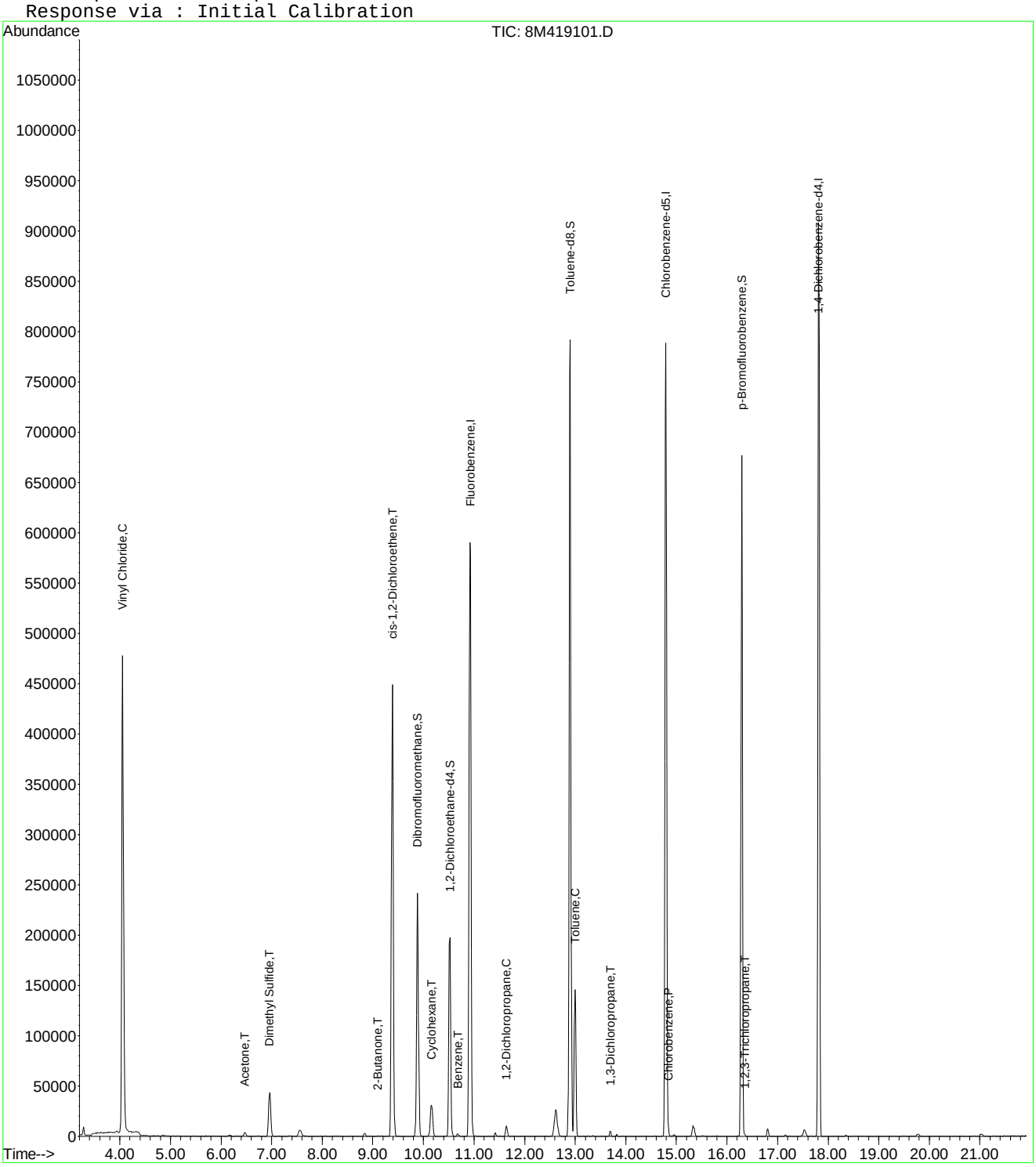
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

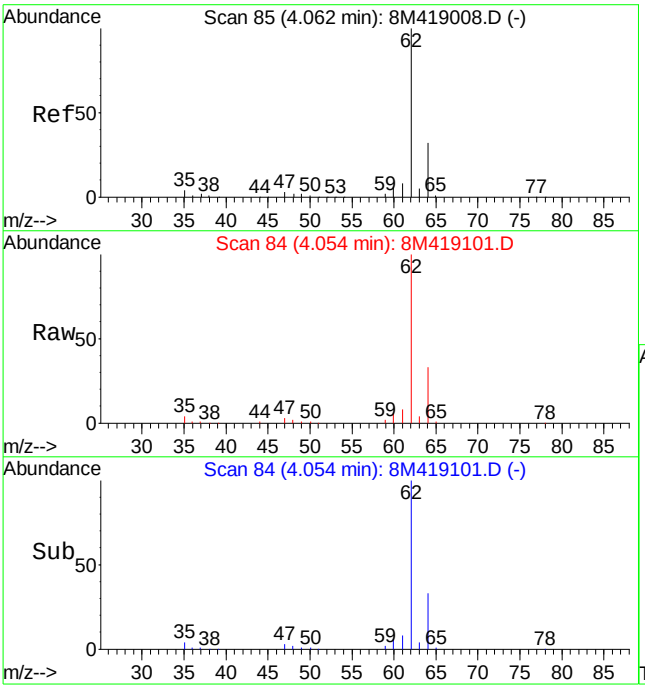
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	756679	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	601055	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	311101	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	199680	25.1592 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.64%		
43) 1,2-Dichloroethane-d4	10.52	65	175932	25.6412 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.56%		
58) Toluene-d8	12.90	98	731004	26.6175 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%		
80) p-Bromofluorobenzene	16.29	95	281242	25.6147 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.44%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	690274	57.0945 ug/L	98
13) Acetone	6.47	43	7612	7.1527 ug/L	85
16) Dimethyl Sulfide	6.96	62	34525	4.7299 ug/L	89
29) 2-Butanone	9.10	43	416	0.2493 ug/L #	44
32) cis-1,2-Dichloroethene	9.39	96	268459	30.4637 ug/L	90
39) Cyclohexane	10.16	56	25238	2.2093 ug/L	90
46) Benzene	10.68	78	4358	0.1394 ug/L #	63
49) 1,2-Dichloropropane	11.64	63	5643	0.7391 ug/L	94
59) Toluene	12.99	91	148353	4.4342 ug/L	99
65) 1,3-Dichloropropane	13.70	76	4809	0.5168 ug/L	93
70) Chlorobenzene	14.84	112	6995	0.2937 ug/L	70
81) 1,2,3-Trichloropropane	16.35	110	439	0.2609 ug/L #	1

(#) = qualifier out of range (m) = manual integration
8M419101.D 8260WT.M Mon Apr 24 08:48:10 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419101.D Vial: 15
Acq On : 21 Apr 2017 19:33 Operator: TMB
Sample : L17041069-02 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 19:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

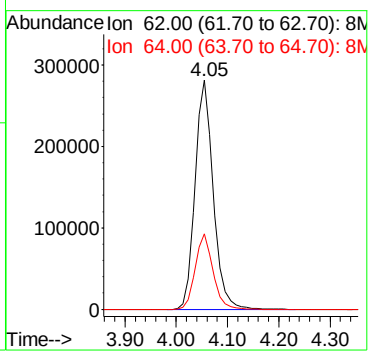


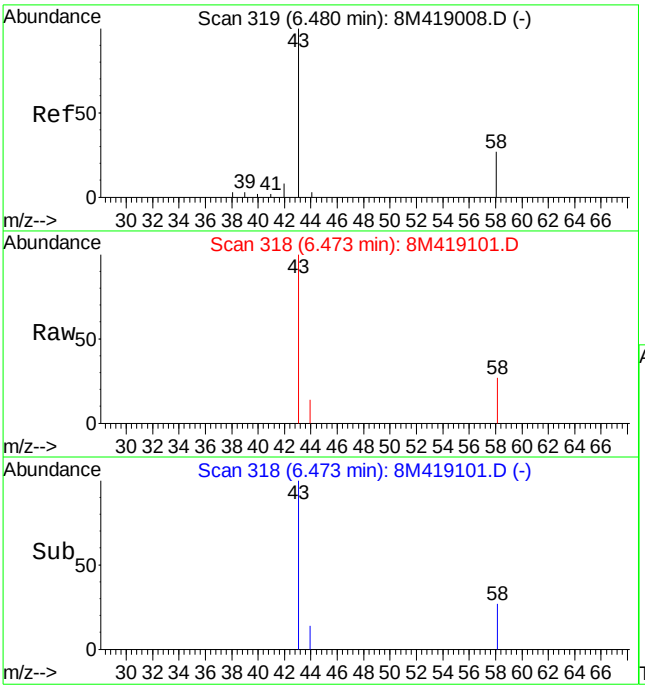


#4
Vinyl Chloride
Concen: 57.09 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 62 Resp: 690274

Ion	Ratio	Lower	Upper
62	100		
64	32.0	19.9	46.3

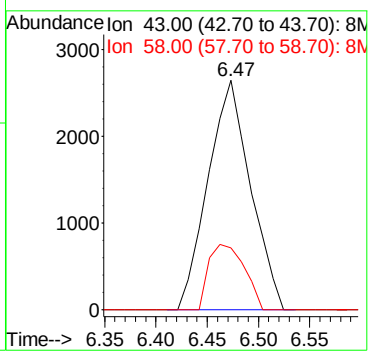


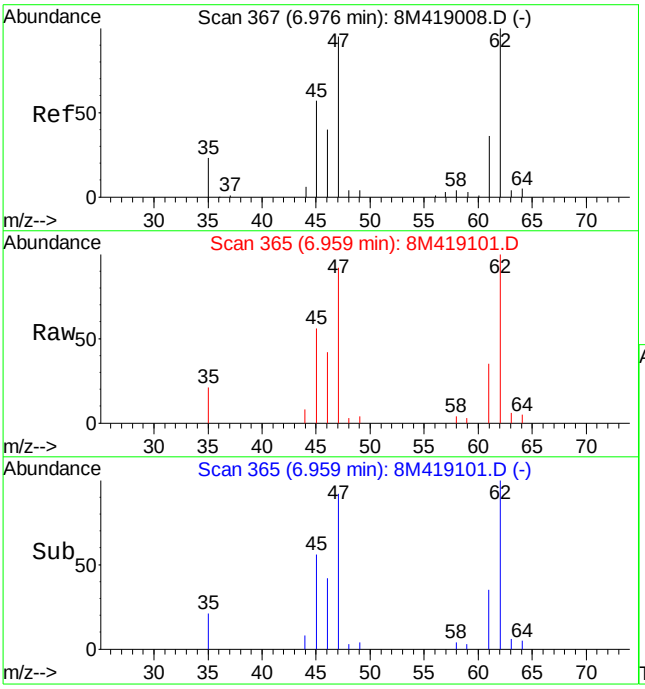


#13
Acetone
Concen: 7.15 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 43 Resp: 7612

Ion	Ratio	Lower	Upper
43	100		
58	24.0	19.4	45.4

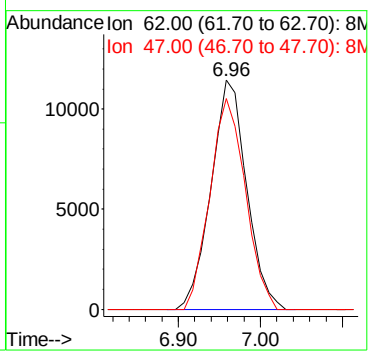


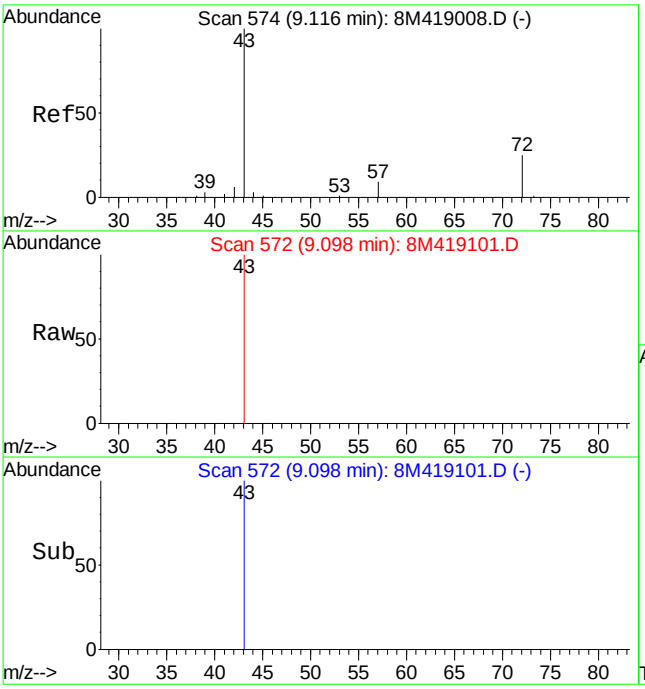


#16
Dimethyl Sulfide
Concen: 4.73 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 62 Resp: 34525

Ion	Ratio	Lower	Upper
62	100		
47	91.6	49.0	114.4

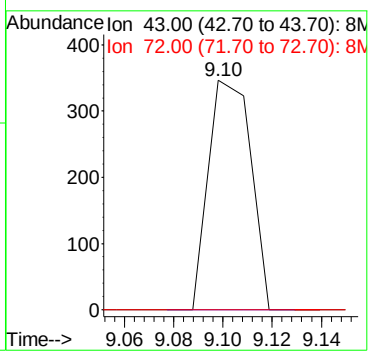


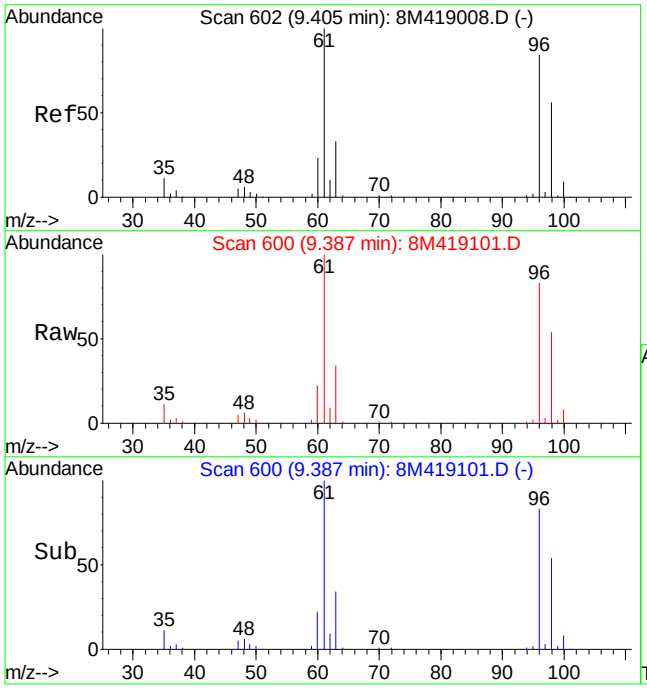


#29
2-Butanone
Concen: 0.25 ug/L
RT: 9.10 min Scan# 572
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 43 Resp: 416

Ion	Ratio	Lower	Upper
43	100		
72	0.0	18.4	42.8#

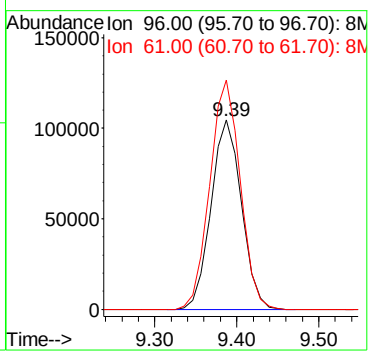


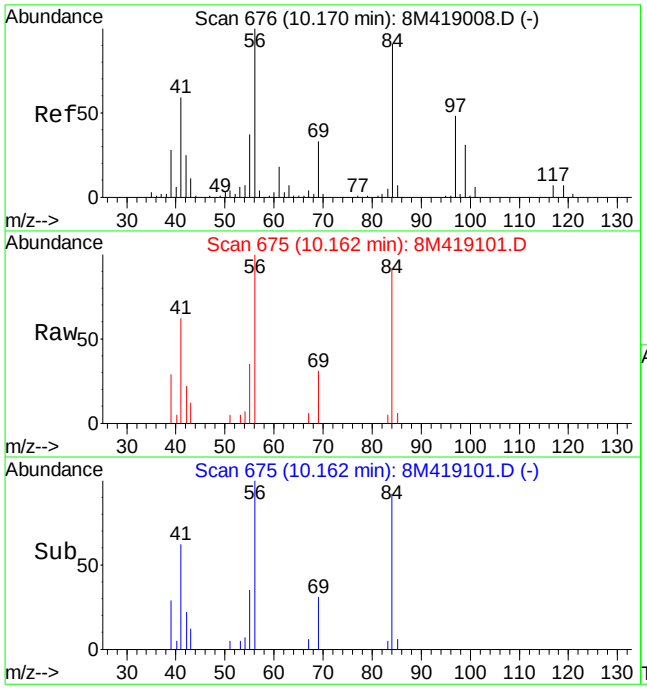


#32
cis-1,2-Dichloroethene
Concen: 30.46 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 96 Resp: 268459

Ion	Ratio	Lower	Upper
96	100		
61	121.4	80.3	187.3

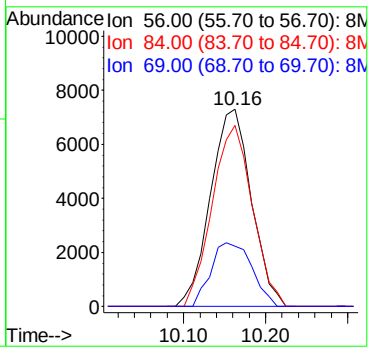


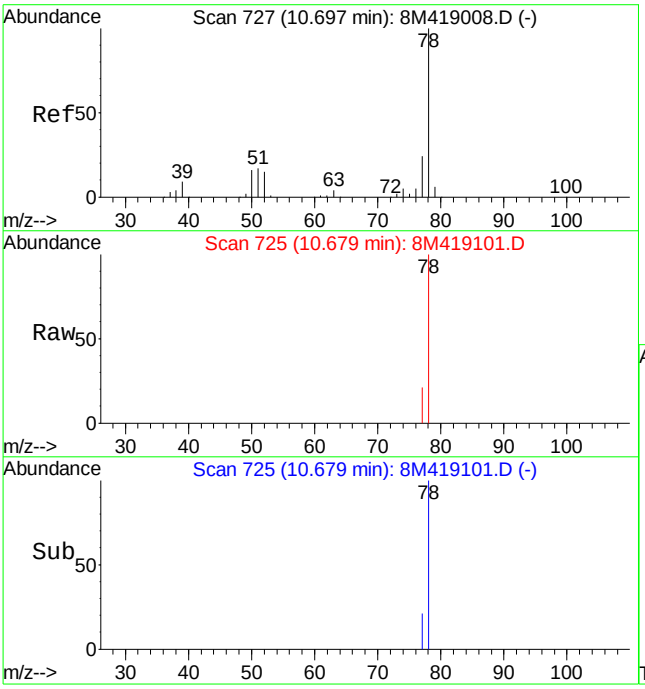


#39
Cyclohexane
Concen: 2.21 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 56 Resp: 25238

Ion	Ratio	Lower	Upper
56	100		
84	90.3	61.6	143.8
69	32.5	21.4	50.0

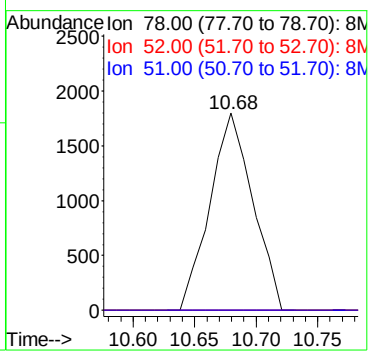


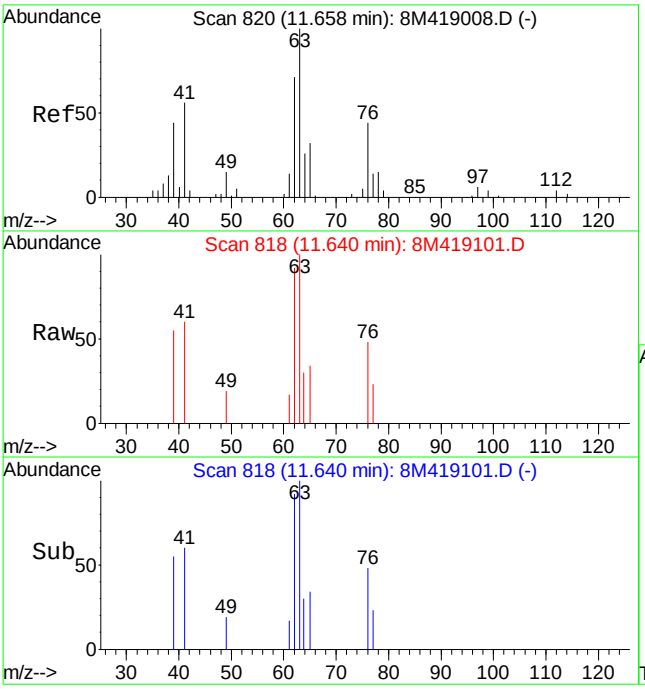


#46
Benzene
Concen: 0.14 ug/L
RT: 10.68 min Scan# 725
Delta R.T. -0.02 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 78 Resp: 4358

Ion	Ratio	Lower	Upper
78	100		
52	0.0	8.1	18.9#
51	0.0	10.1	23.7#

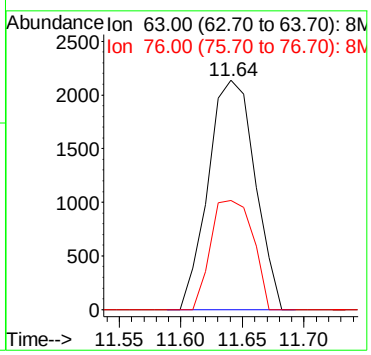


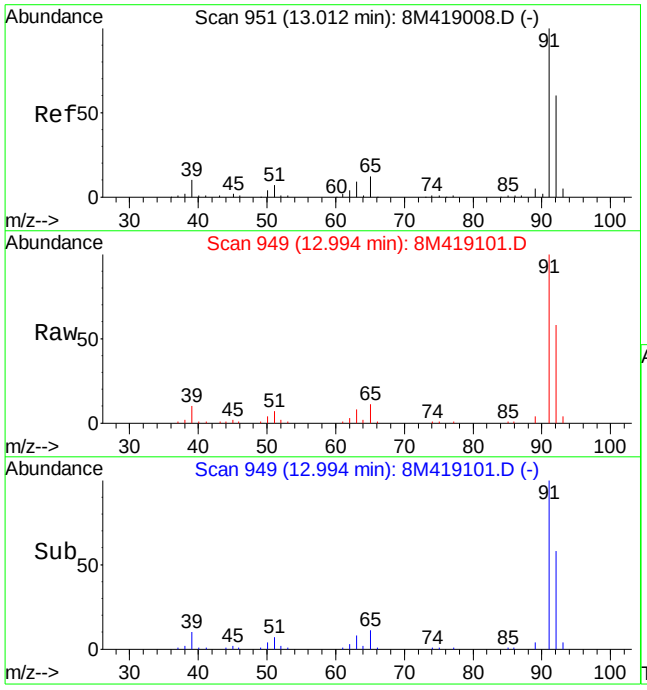


#49
1,2-Dichloropropane
Concen: 0.74 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 63 Resp: 5643

Ion	Ratio	Lower	Upper
63	100		
76	43.0	28.2	65.8

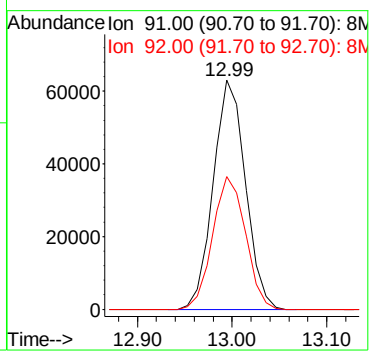


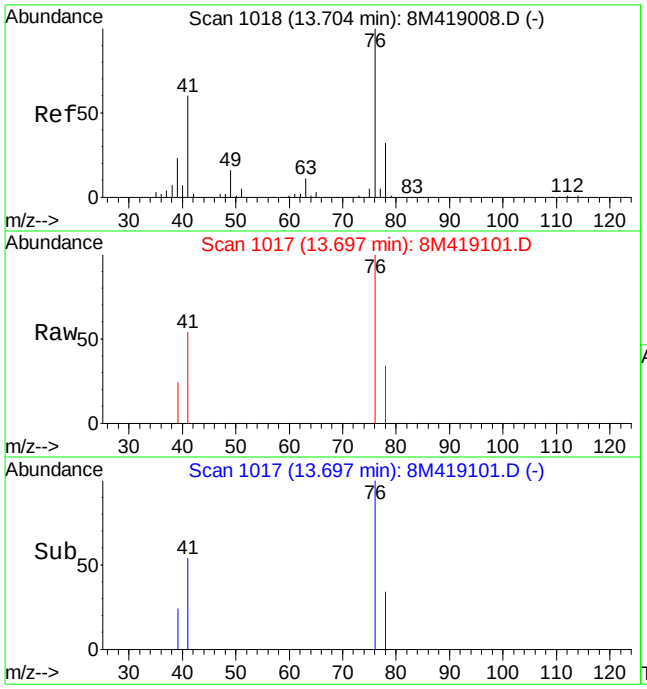


#59
Toluene
Concen: 4.43 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 91 Resp: 148353

Ion	Ratio	Lower	Upper
91	100		
92	59.1	35.9	83.7

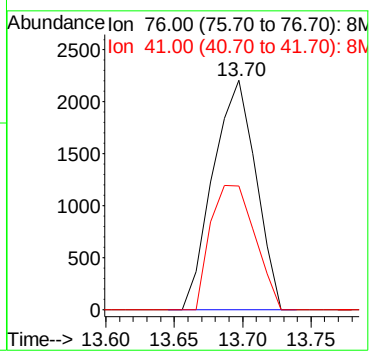


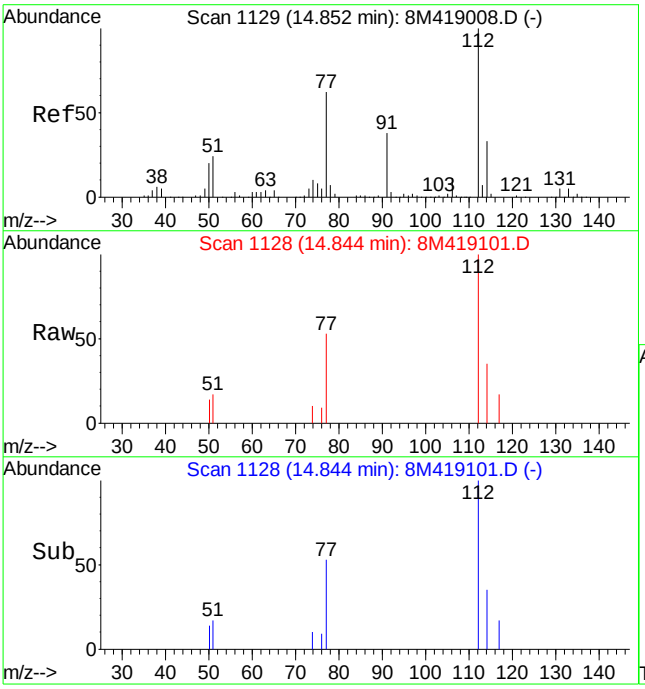


#65
1,3-Dichloropropane
Concen: 0.52 ug/L
RT: 13.70 min Scan# 1017
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion: 76 Resp: 4809

Ion	Ratio	Lower	Upper
76	100		
41	56.1	30.7	71.7

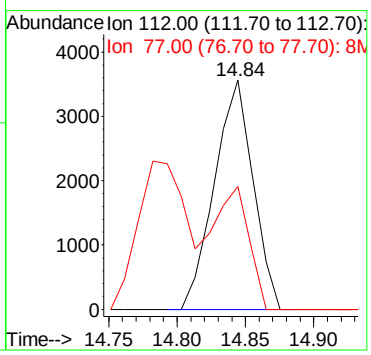


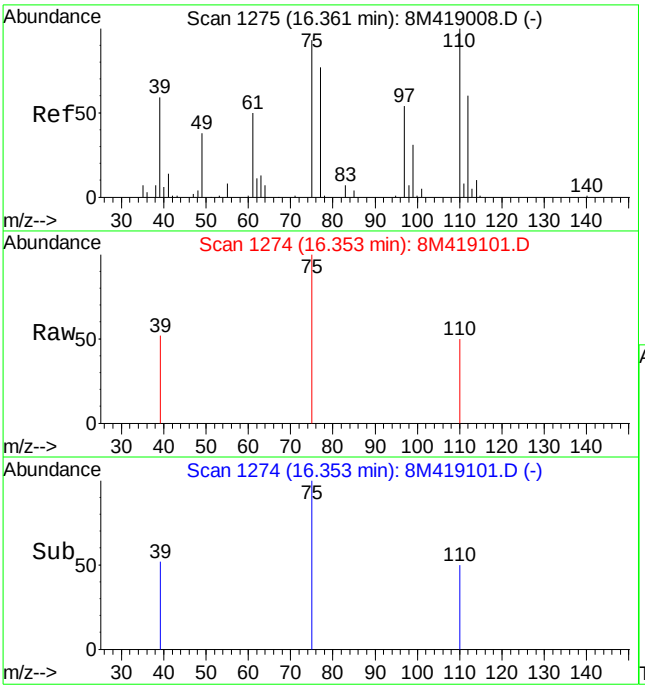


#70
Chlorobenzene
Concen: 0.29 ug/L
RT: 14.84 min Scan# 1128
Delta R.T. -0.01 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion:112 Resp: 6995

Ion	Ratio	Lower	Upper
112	100		
77	49.9	45.5	106.1

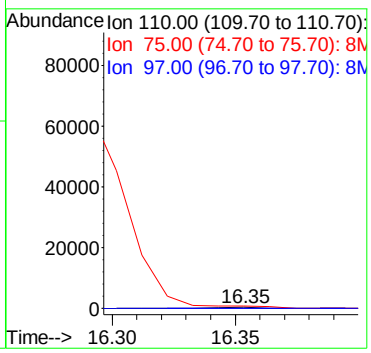




#81
1,2,3-Trichloropropane
Concen: 0.26 ug/L
RT: 16.35 min Scan# 1274
Delta R.T. 0.05 min
Lab File: 8M419101.D
Acq: 21 Apr 2017 19:33

Tgt Ion:110 Resp: 439

Ion	Ratio	Lower	Upper
110	100		
75	31478.8	230.7	538.3#
97	0.0	34.1	79.7#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419110.D Vial: 24
Acq On : 22 Apr 2017 00:03 Operator: TMB
Sample : L17041069-03 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 08:37:06 2017 Quant Results File: 8260WT.RES

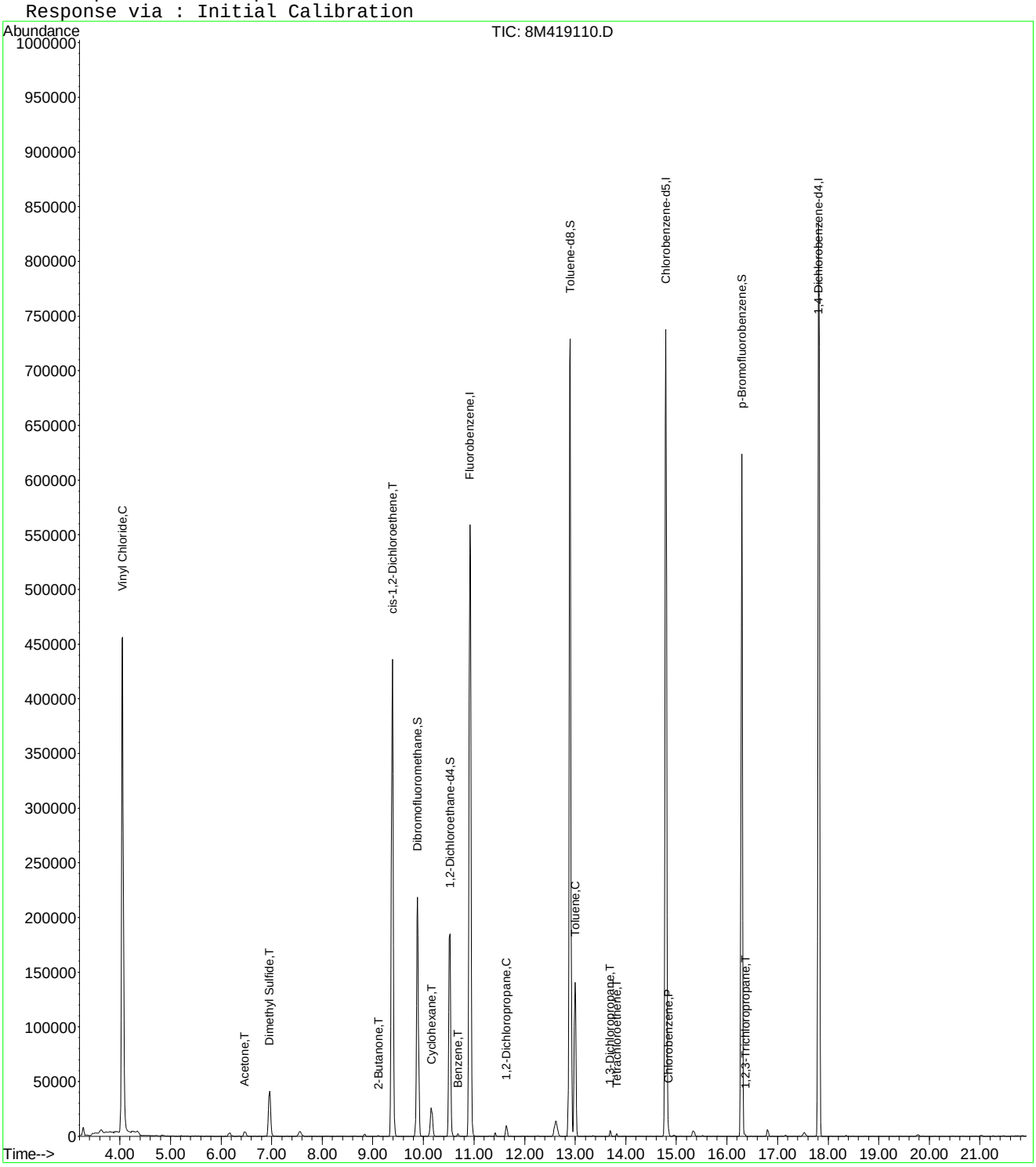
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

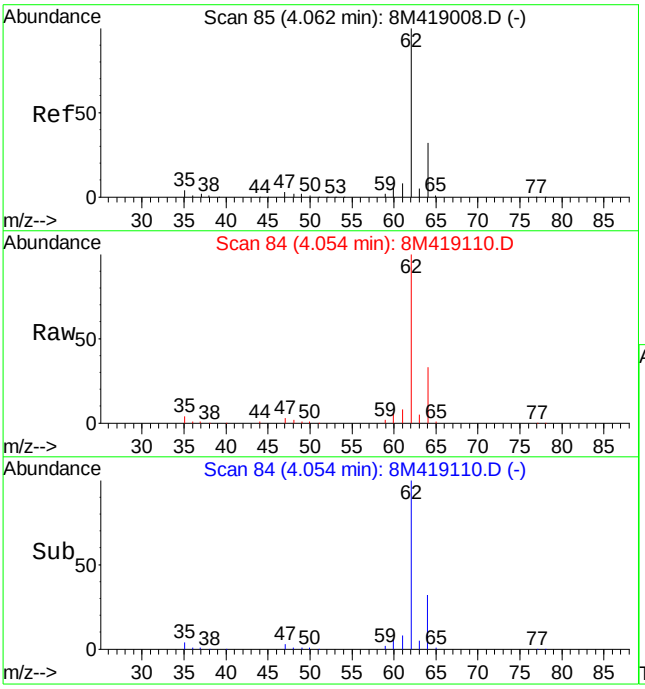
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	708513	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	557134	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	282924	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	187988	25.2962 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.20%		
43) 1,2-Dichloroethane-d4	10.52	65	162956	25.3646 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.44%		
58) Toluene-d8	12.90	98	682435	26.8079 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%		
80) p-Bromofluorobenzene	16.29	95	259015	25.9398 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.76%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	688300	60.8015 ug/L	98
13) Acetone	6.46	43	9626	9.6600 ug/L	88
16) Dimethyl Sulfide	6.96	62	33247	4.8645 ug/L	91
29) 2-Butanone	9.11	43	407	0.2605 ug/L #	44
32) cis-1,2-Dichloroethene	9.39	96	260418	31.5602 ug/L	89
39) Cyclohexane	10.16	56	20068	1.8761 ug/L	88
46) Benzene	10.68	78	3585	0.1225 ug/L #	79
49) 1,2-Dichloropropane	11.64	63	5329	0.7454 ug/L	91
59) Toluene	12.99	91	143694	4.6335 ug/L	99
65) 1,3-Dichloropropane	13.69	76	4328	0.5018 ug/L	94
66) Tetrachloroethene	13.82	164	987	0.1515 ug/L #	55
70) Chlorobenzene	14.84	112	6428	0.2912 ug/L	81
81) 1,2,3-Trichloropropane	16.36	110	380	0.2483 ug/L #	1

(#) = qualifier out of range (m) = manual integration
8M419110.D 8260WT.M Mon Apr 24 08:48:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419110.D Vial: 24
Acq On : 22 Apr 2017 00:03 Operator: TMB
Sample : L17041069-03 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 8:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

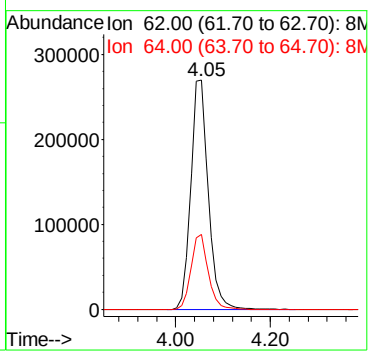


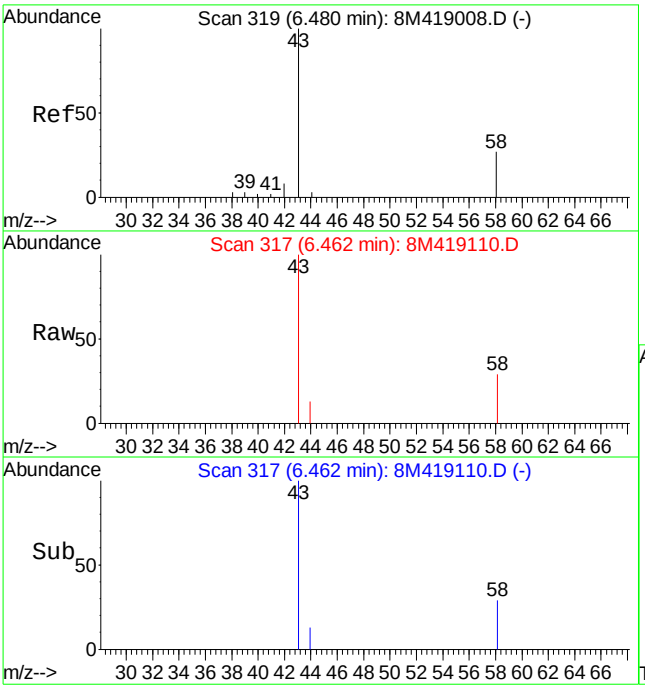


#4
Vinyl Chloride
Concen: 60.80 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 62 Resp: 688300

Ion	Ratio	Lower	Upper
62	100		
64	32.0	19.9	46.3

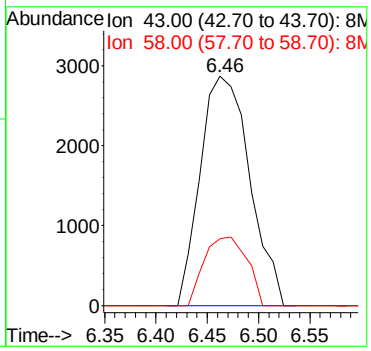


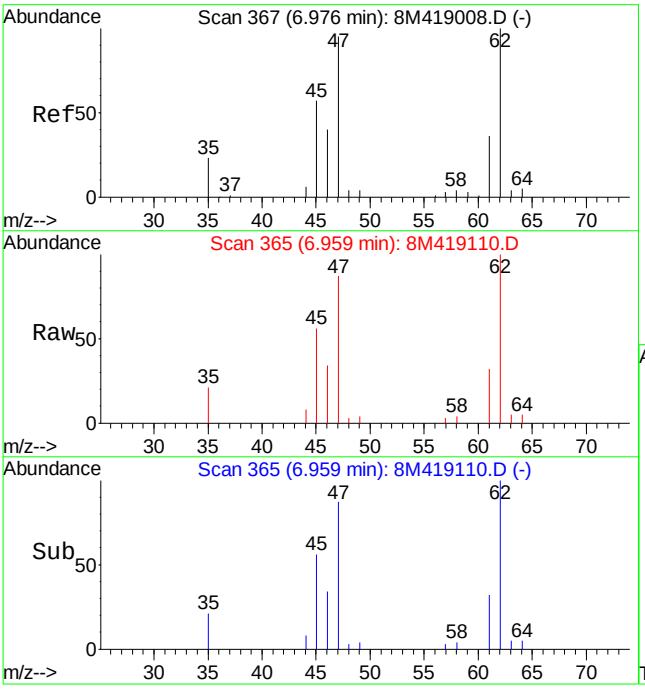


#13
Acetone
Concen: 9.66 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 43 Resp: 9626

Ion	Ratio	Lower	Upper
43	100		
58	25.9	19.4	45.4

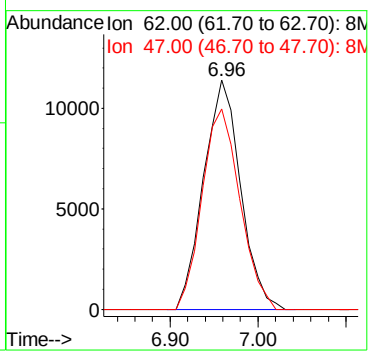


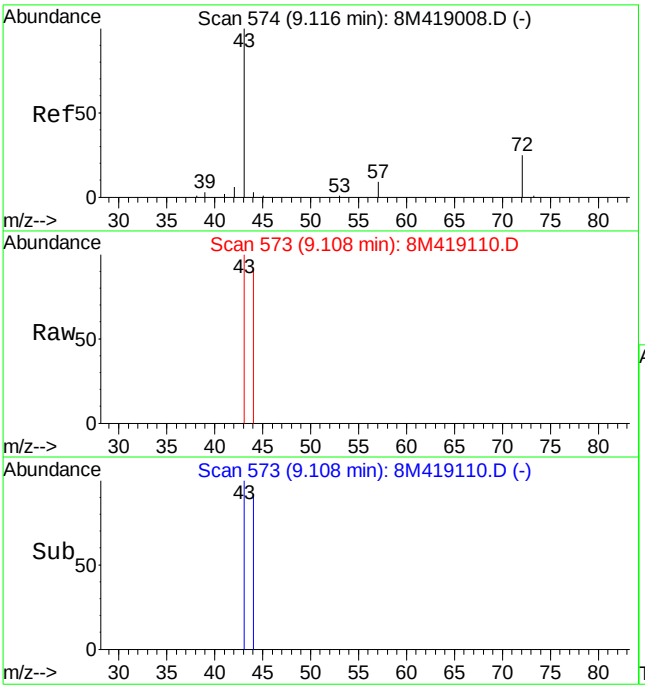


#16
Dimethyl Sulfide
Concen: 4.86 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 62 Resp: 33247

Ion	Ratio	Lower	Upper
62	100		
47	89.6	49.0	114.4

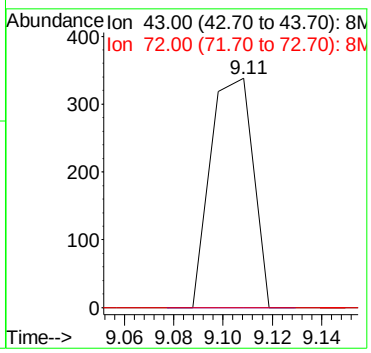


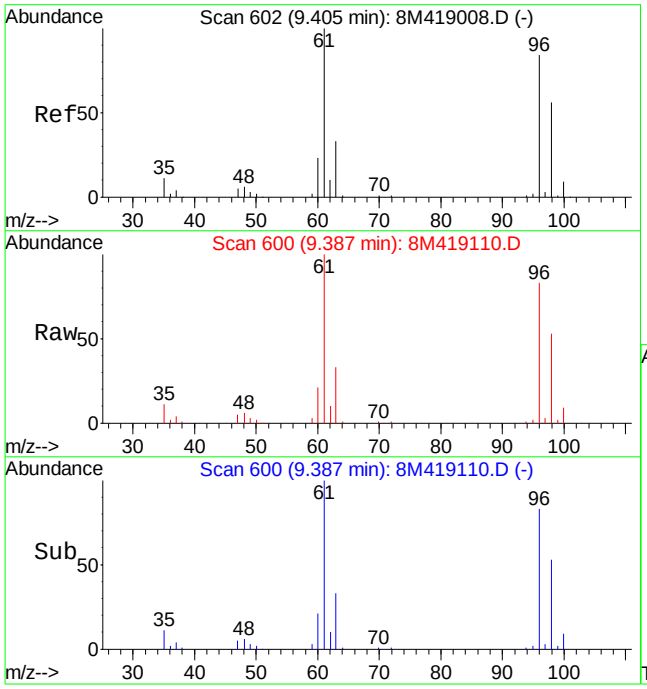


#29
2-Butanone
Concen: 0.26 ug/L
RT: 9.11 min Scan# 573
Delta R.T. 0.00 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 43 Resp: 407

Ion	Ratio	Lower	Upper
43	100		
72	0.0	18.4	42.8#

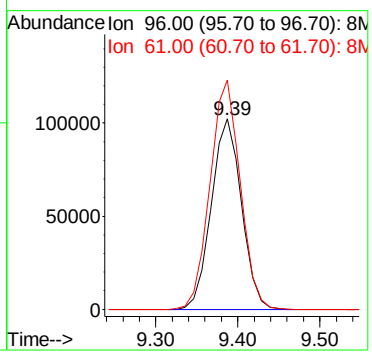


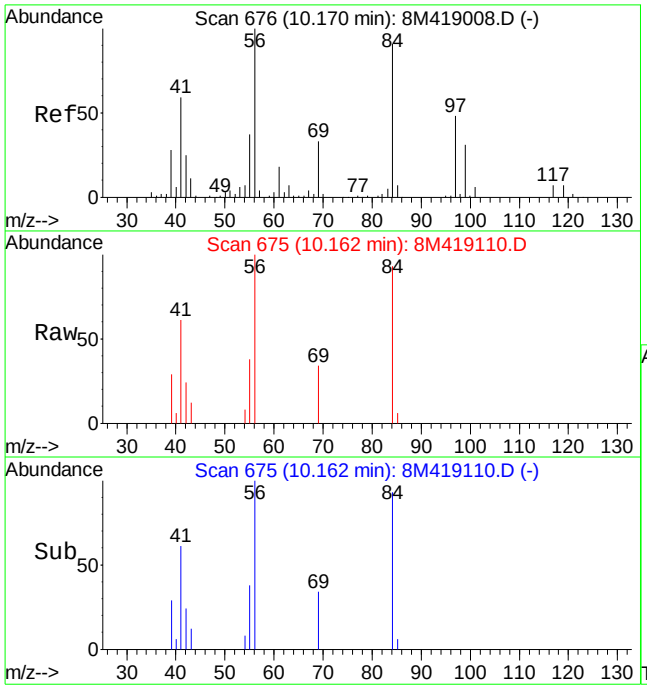


#32
cis-1,2-Dichloroethene
Concen: 31.56 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 96 Resp: 260418

Ion	Ratio	Lower	Upper
96	100		
61	120.7	80.3	187.3

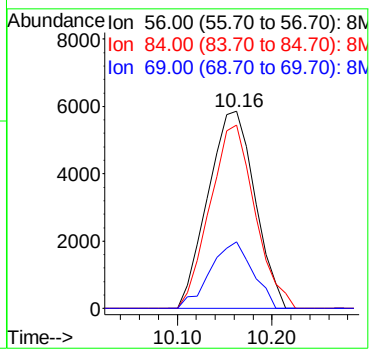


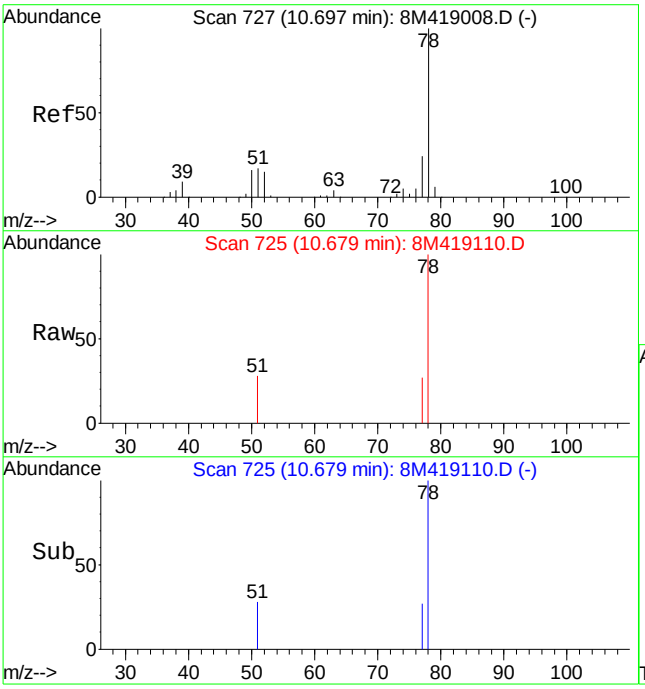


#39
Cyclohexane
Concen: 1.88 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 56 Resp: 20068

Ion	Ratio	Lower	Upper
56	100		
84	89.1	61.6	143.8
69	30.6	21.4	50.0

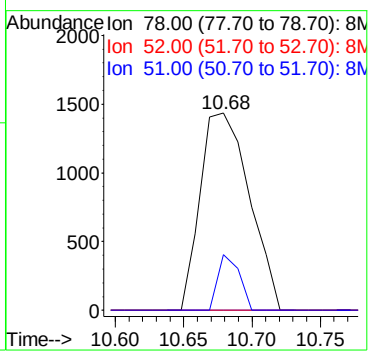


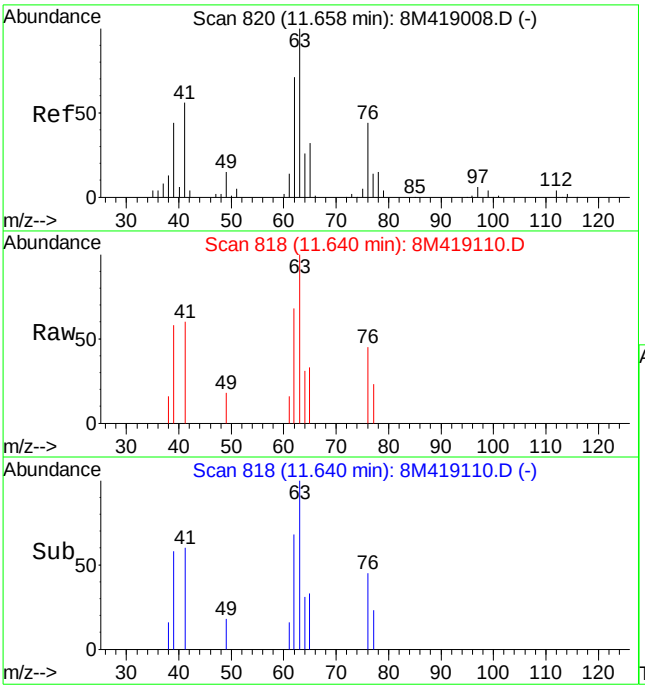


#46
Benzene
Concen: 0.12 ug/L
RT: 10.68 min Scan# 725
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 78 Resp: 3585

Ion	Ratio	Lower	Upper
78	100		
52	0.0	8.1	18.9#
51	12.2	10.1	23.7

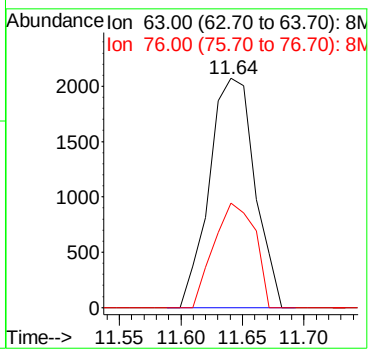


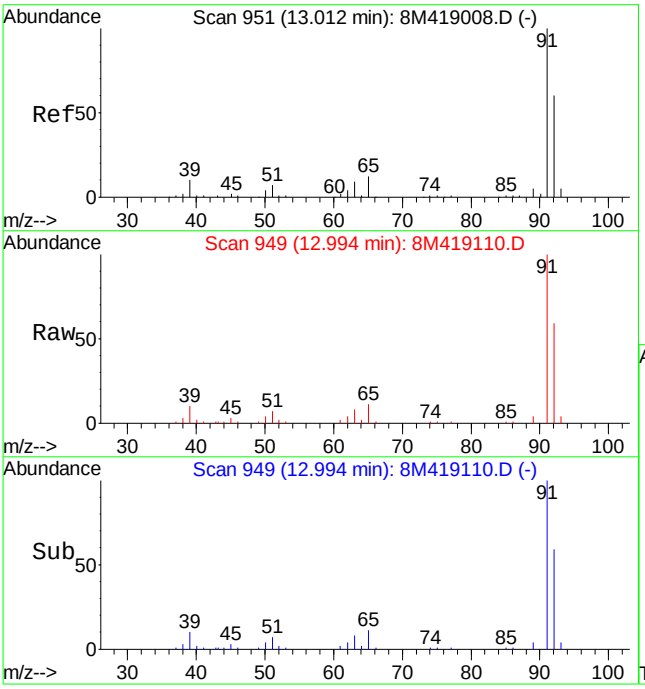


#49
1,2-Dichloropropane
Concen: 0.75 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 63 Resp: 5329

Ion	Ratio	Lower	Upper
63	100		
76	41.1	28.2	65.8

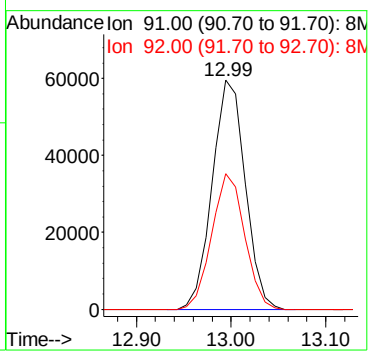


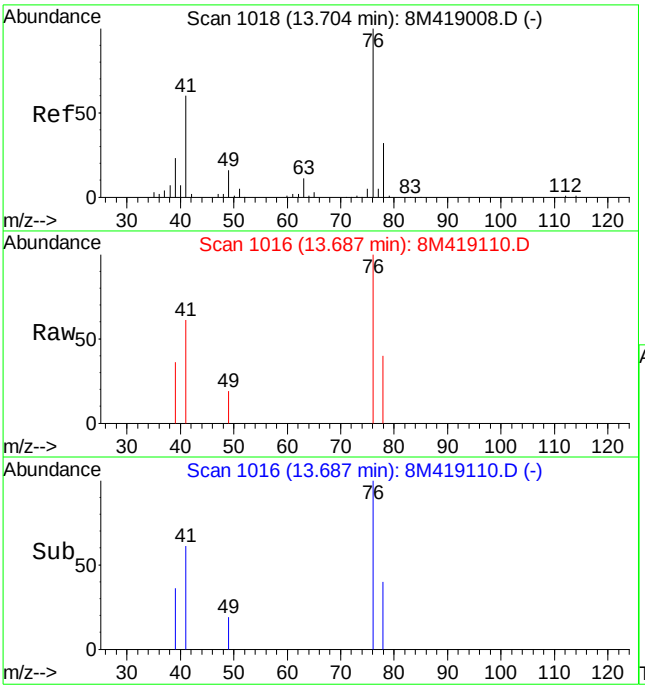


#59
Toluene
Concen: 4.63 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 91 Resp: 143694

Ion	Ratio	Lower	Upper
91	100		
92	58.9	35.9	83.7

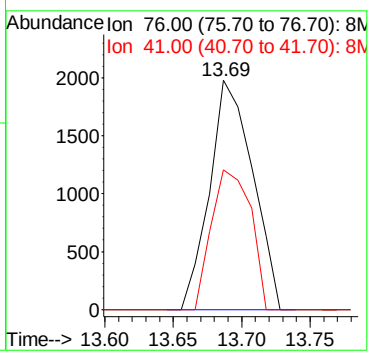


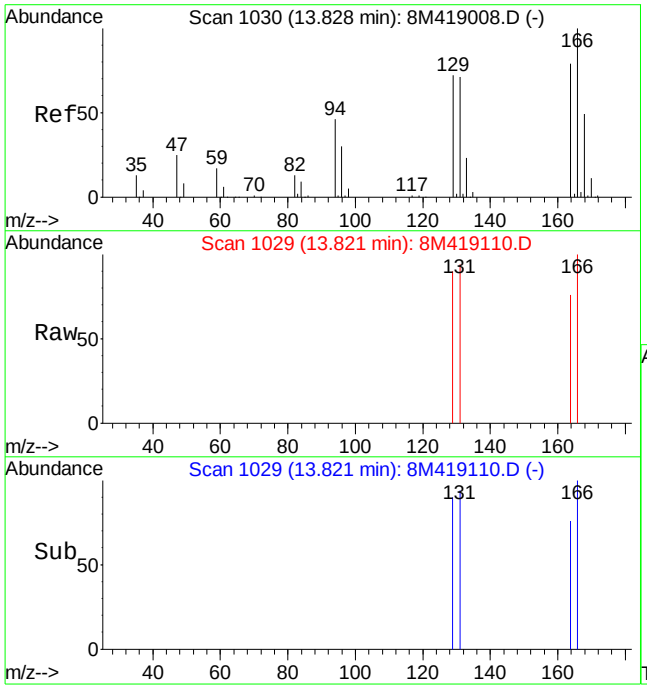


#65
1,3-Dichloropropane
Concen: 0.50 ug/L
RT: 13.69 min Scan# 1016
Delta R.T. -0.02 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion: 76 Resp: 4328

Ion	Ratio	Lower	Upper
76	100		
41	55.4	30.7	71.7

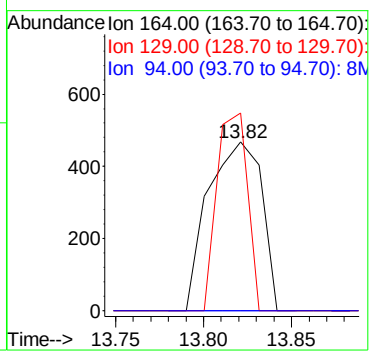


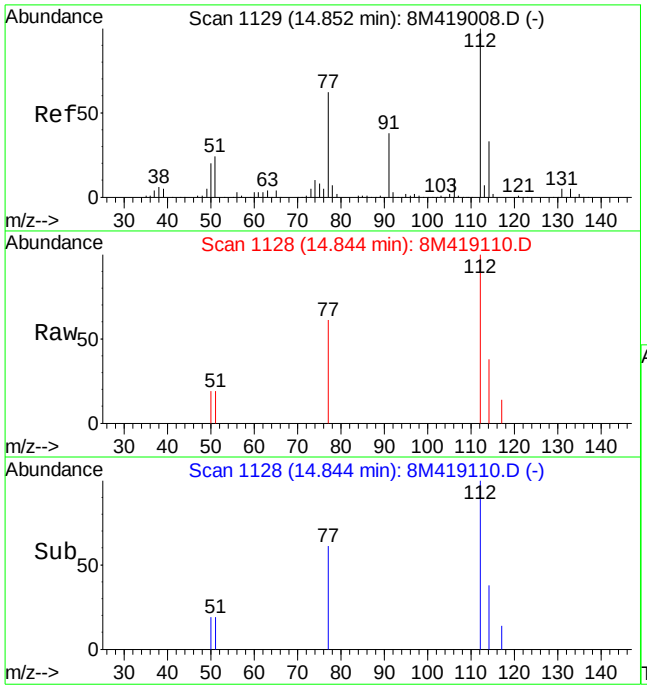


#66
Tetrachloroethene
Concen: 0.15 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion:164 Resp: 987

Ion	Ratio	Lower	Upper
164	100		
129	66.9	53.4	124.6
94	0.0	34.7	81.1#

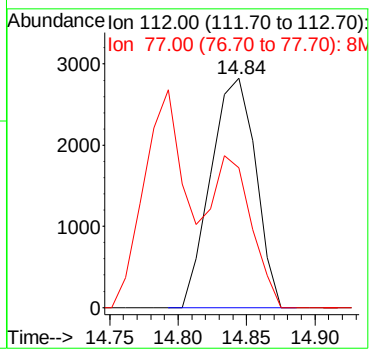


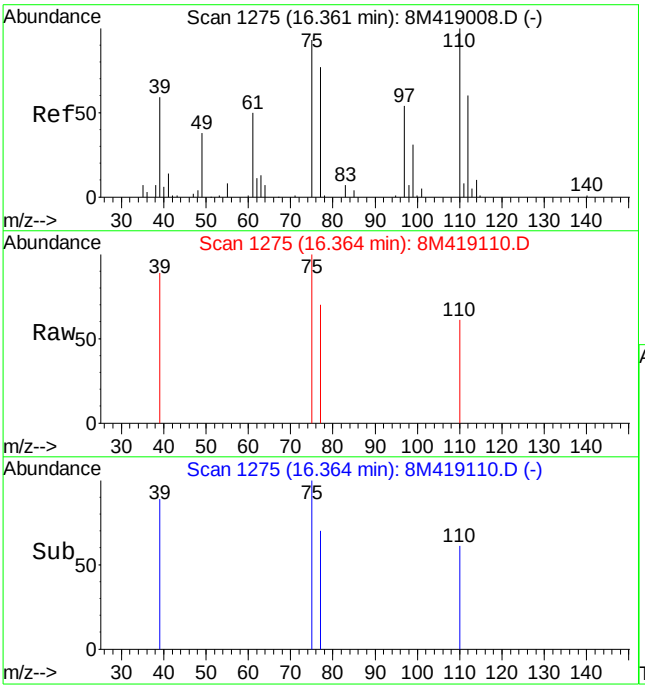


#70
Chlorobenzene
Concen: 0.29 ug/L
RT: 14.84 min Scan# 1128
Delta R.T. -0.01 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion:112 Resp: 6428

Ion	Ratio	Lower	Upper
112	100		
77	59.3	45.5	106.1

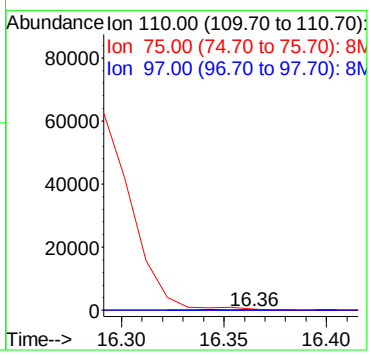




#81
1,2,3-Trichloropropane
Concen: 0.25 ug/L
RT: 16.36 min Scan# 1275
Delta R.T. 0.06 min
Lab File: 8M419110.D
Acq: 22 Apr 2017 00:03

Tgt Ion:110 Resp: 380

Ion	Ratio	Lower	Upper
110	100		
75	33418.7	230.7	538.3#
97	0.0	34.1	79.7#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419100.D Vial: 14
Acq On : 21 Apr 2017 19:03 Operator: TMB
Sample : L17041069-04 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 19:25:05 2017 Quant Results File: 8260WT.RES

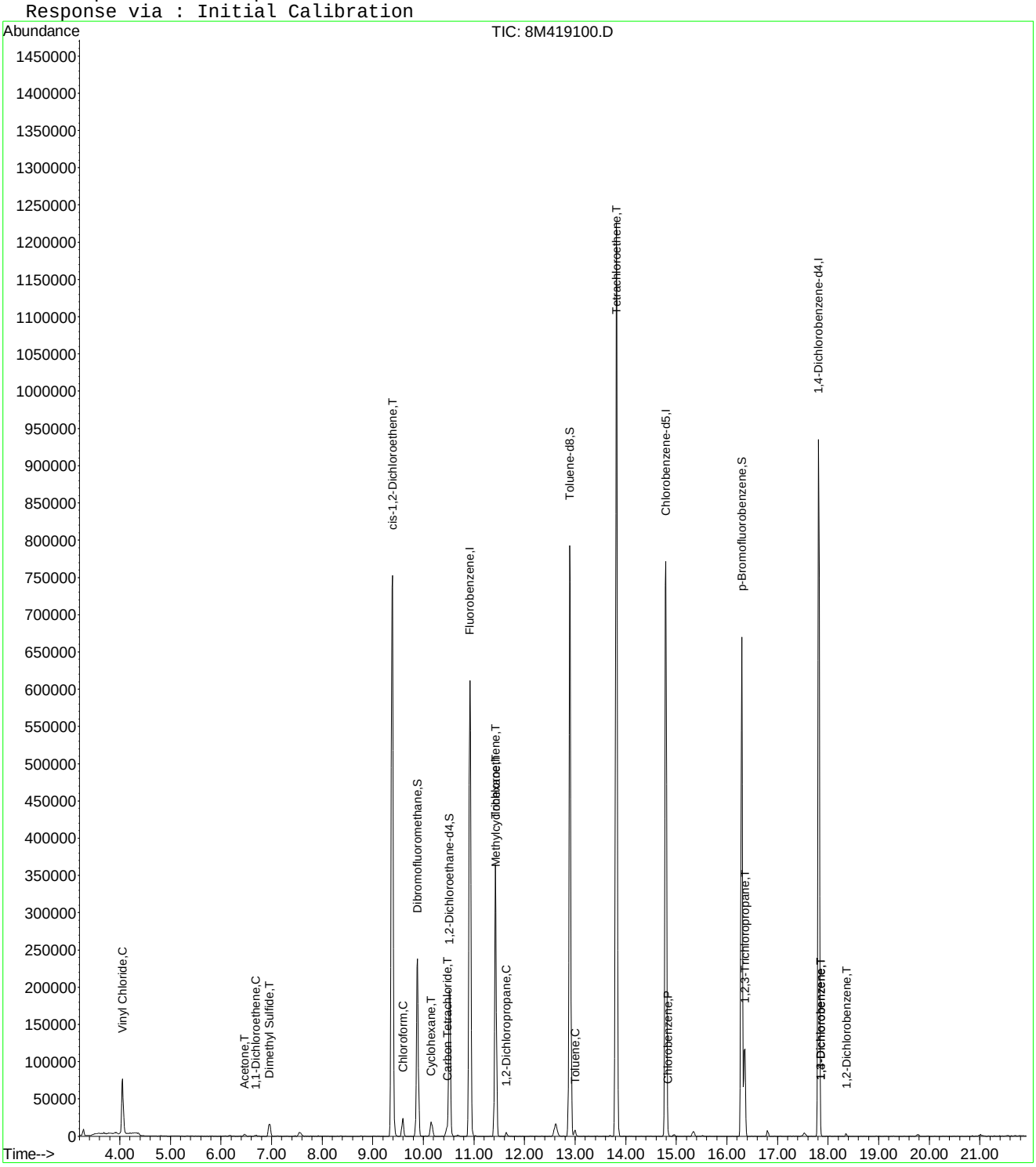
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

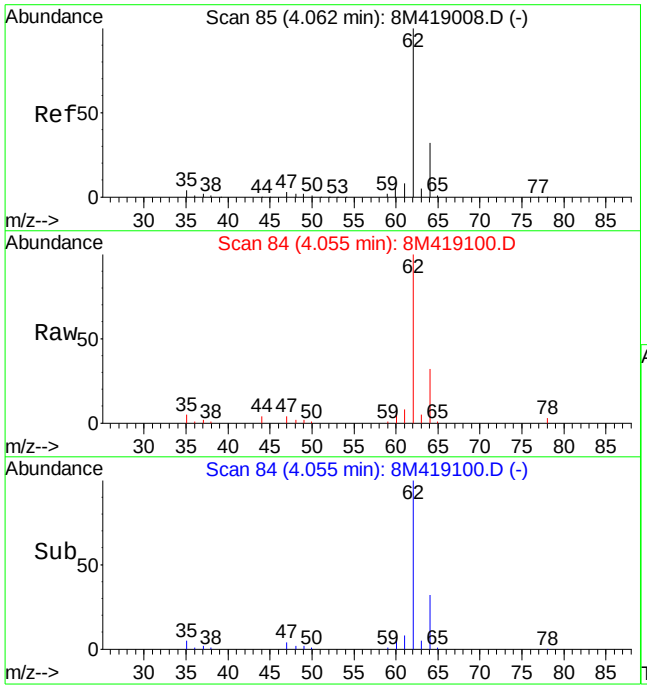
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	763183	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	606179	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	315180	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	203524	25.4250	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%			
43) 1,2-Dichloroethane-d4	10.51	65	176084	25.4447	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.76%			
58) Toluene-d8	12.89	98	730700	26.3815	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%			
80) p-Bromofluorobenzene	16.29	95	283603	25.4955	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.00%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.06	62	106140	8.7043	ug/L	98
13) Acetone	6.46	43	5735	5.3430	ug/L	78
14) 1,1-Dichloroethene	6.69	61	1677	0.1517	ug/L	69
16) Dimethyl Sulfide	6.96	62	13492	1.8326	ug/L	88
32) cis-1,2-Dichloroethene	9.39	96	459982	51.7521	ug/L	90
33) Chloroform	9.60	83	25458	1.6602	ug/L	96
39) Cyclohexane	10.15	56	15118	1.3121	ug/L	91
42) Carbon Tetrachloride	10.47	117	12636	1.1012	ug/L	94
47) Trichloroethene	11.42	130	155308	17.5354	ug/L	97
48) Methylcyclohexane	11.43	83	1569	0.1329	ug/L #	1
49) 1,2-Dichloropropane	11.64	63	2893	0.3757	ug/L	73
59) Toluene	13.00	91	9635	0.2855	ug/L	98
66) Tetrachloroethene	13.81	164	384210	54.2086	ug/L	98
70) Chlorobenzene	14.84	112	2987	0.1244	ug/L #	1
81) 1,2,3-Trichloropropane	16.35	110	27079	15.8825	ug/L	42
93) 1,3-Dichlorobenzene	17.85	146	2517	0.1256	ug/L #	1
94) 1,4-Dichlorobenzene	17.85	146	2517	0.1236	ug/L #	1
96) 1,2-Dichlorobenzene	18.36	146	2234	0.1269	ug/L	87

(#) = qualifier out of range (m) = manual integration
8M419100.D 8260WT.M Mon Apr 24 08:48:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419100.D Vial: 14
Acq On : 21 Apr 2017 19:03 Operator: TMB
Sample : L17041069-04 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 19:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

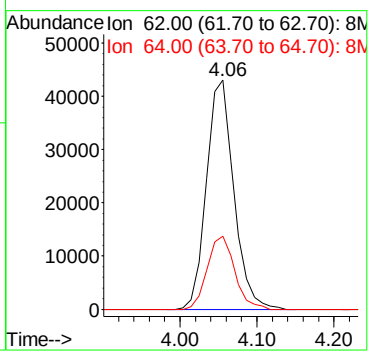


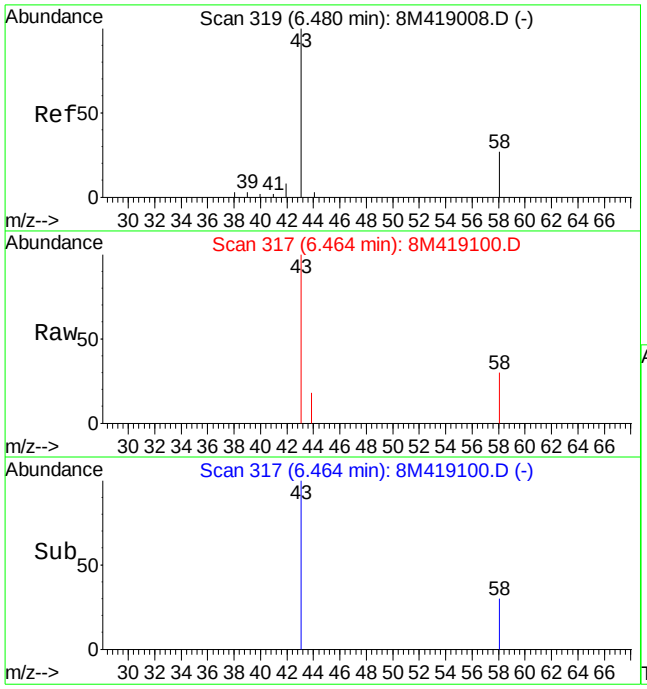


#4
Vinyl Chloride
Concen: 8.70 ug/L
RT: 4.06 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 62 Resp: 106140

Ion	Ratio	Lower	Upper
62	100		
64	32.0	19.9	46.3

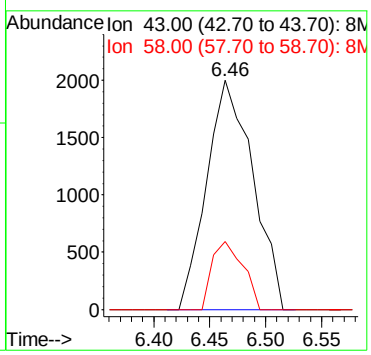


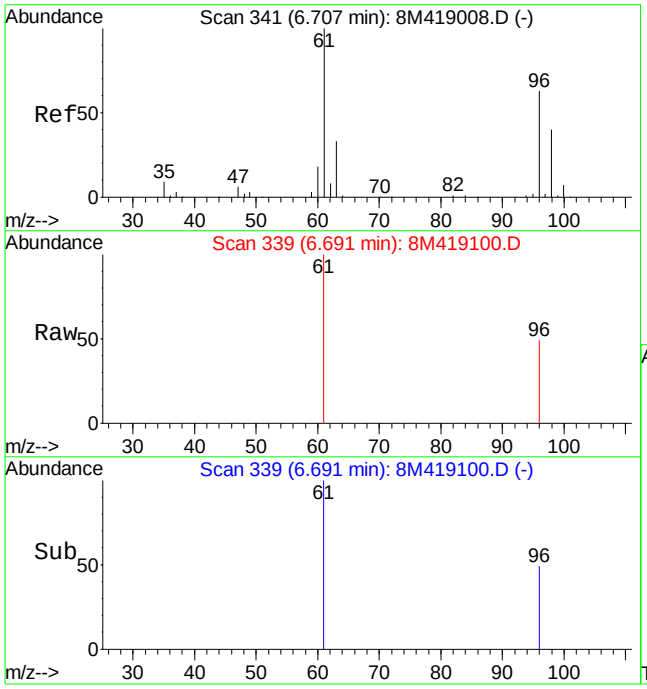


#13
Acetone
Concen: 5.34 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 43 Resp: 5735

Ion	Ratio	Lower	Upper
43	100		
58	19.9	19.4	45.4

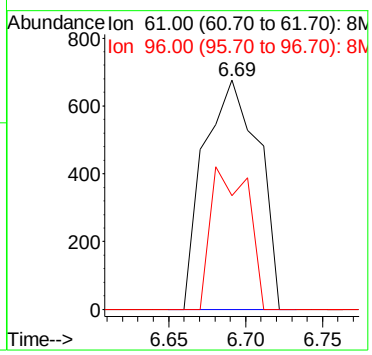


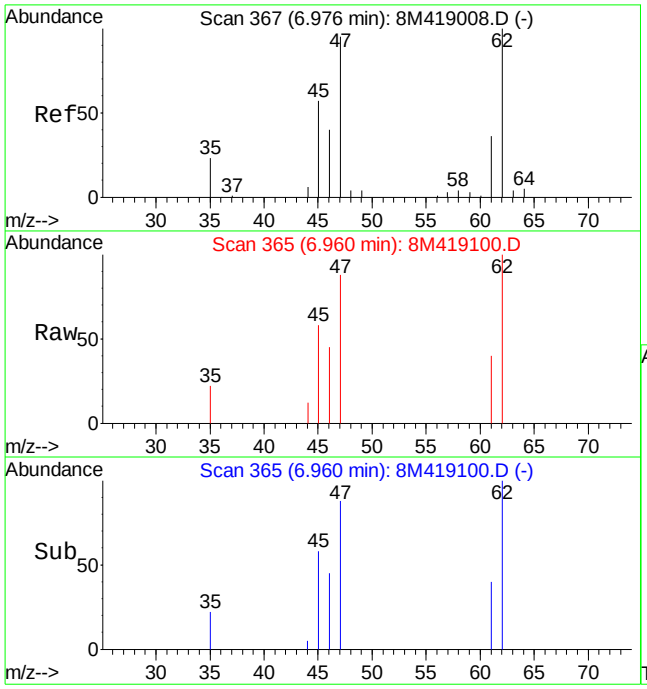


#14
1,1-Dichloroethene
Concen: 0.15 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 61 Resp: 1677

Ion	Ratio	Lower	Upper
61	100		
96	42.3	40.0	93.4

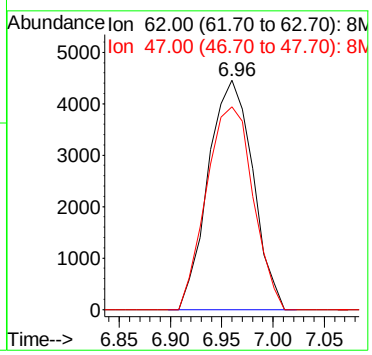


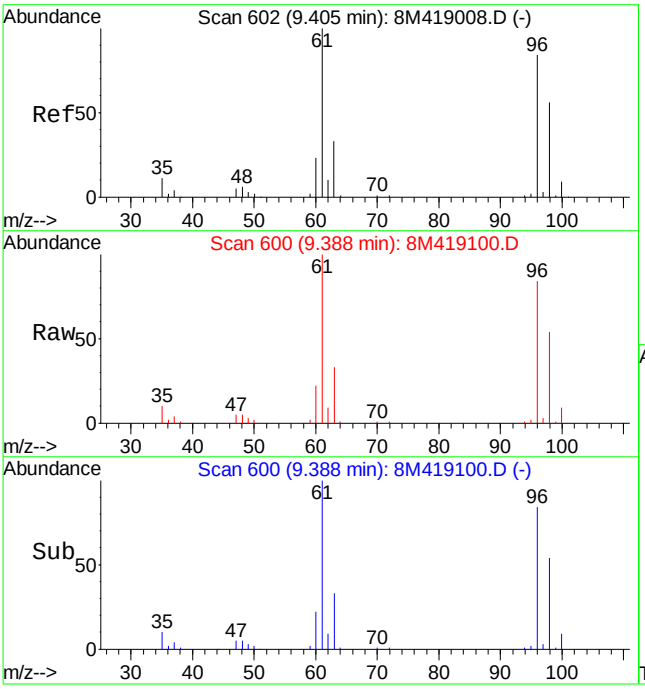


#16
Dimethyl Sulfide
Concen: 1.83 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 62 Resp: 13492

Ion	Ratio	Lower	Upper
62	100		
47	92.4	49.0	114.4

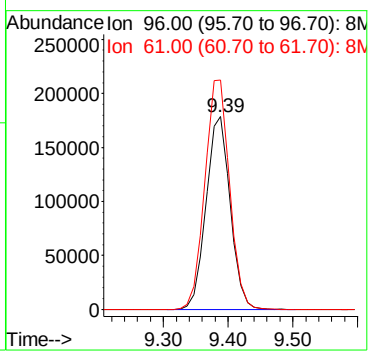


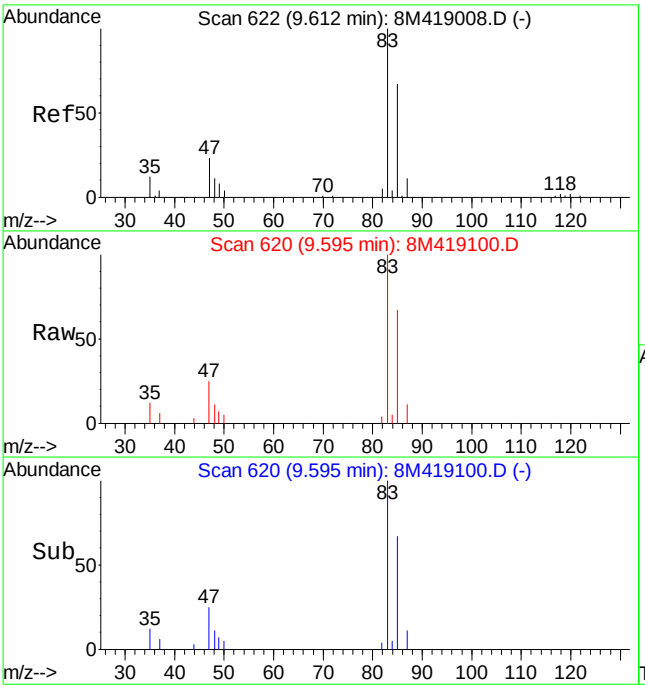


#32
cis-1,2-Dichloroethene
Concen: 51.75 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 96 Resp: 459982

Ion	Ratio	Lower	Upper
96	100		
61	122.1	80.3	187.3

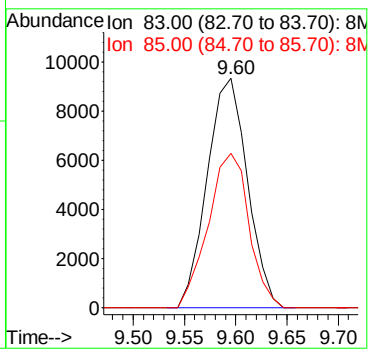


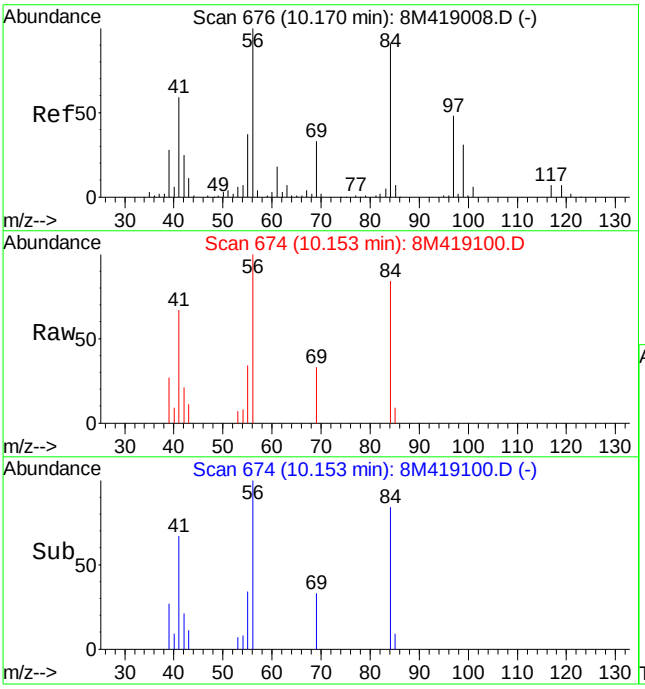


#33
Chloroform
Concen: 1.66 ug/L
RT: 9.60 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 83 Resp: 25458

Ion	Ratio	Lower	Upper
83	100		
85	68.1	39.1	91.3

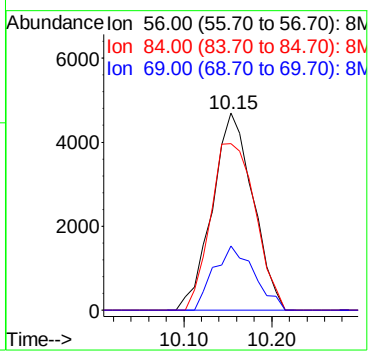


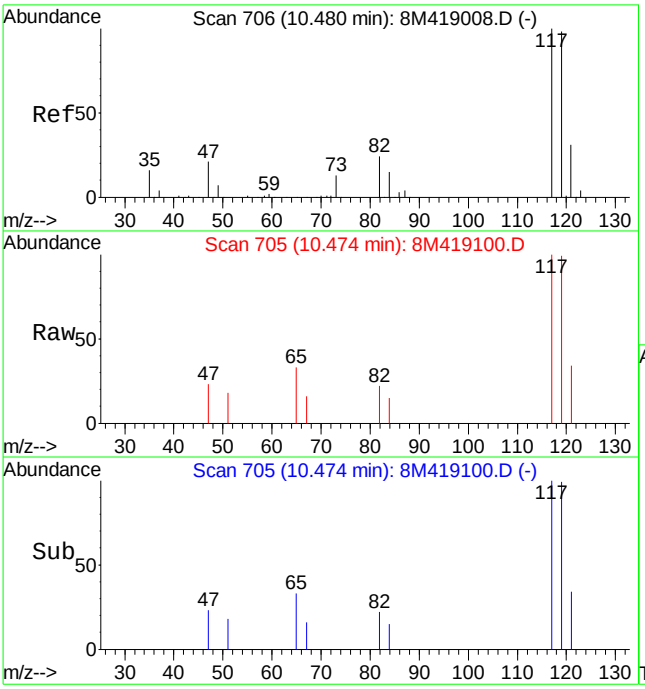


#39
Cyclohexane
Concen: 1.31 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 56 Resp: 15118

Ion	Ratio	Lower	Upper
56	100		
84	93.0	61.6	143.8
69	32.3	21.4	50.0

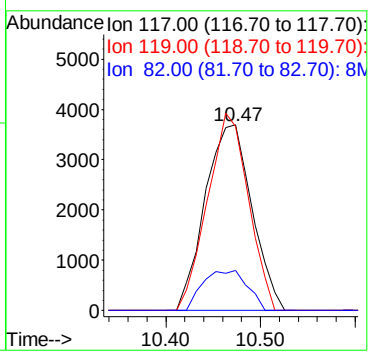


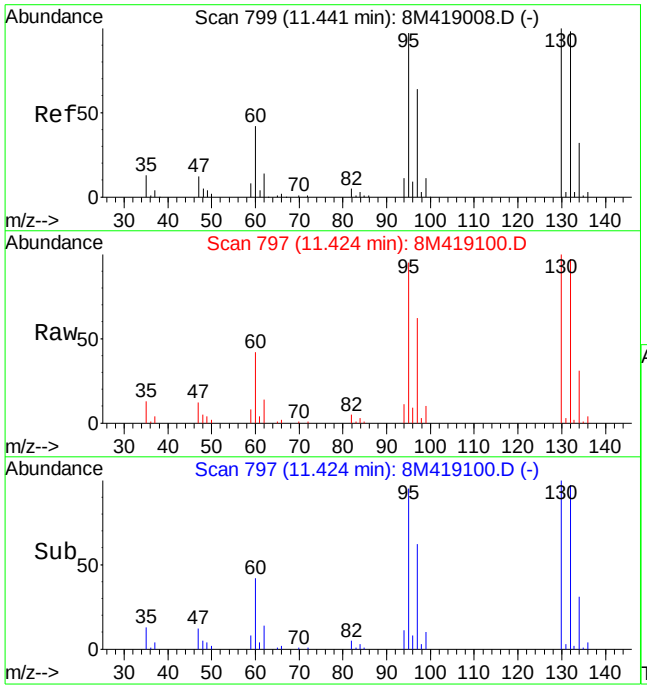


#42
Carbon Tetrachloride
Concen: 1.10 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:117 Resp: 12636

Ion	Ratio	Lower	Upper
117	100		
119	92.6	58.5	136.5
82	20.4	14.9	34.9

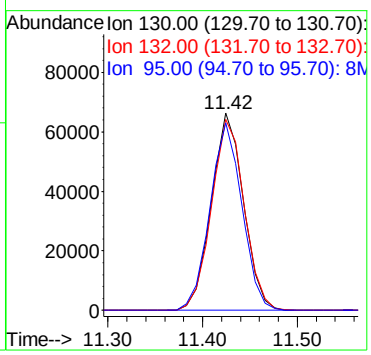


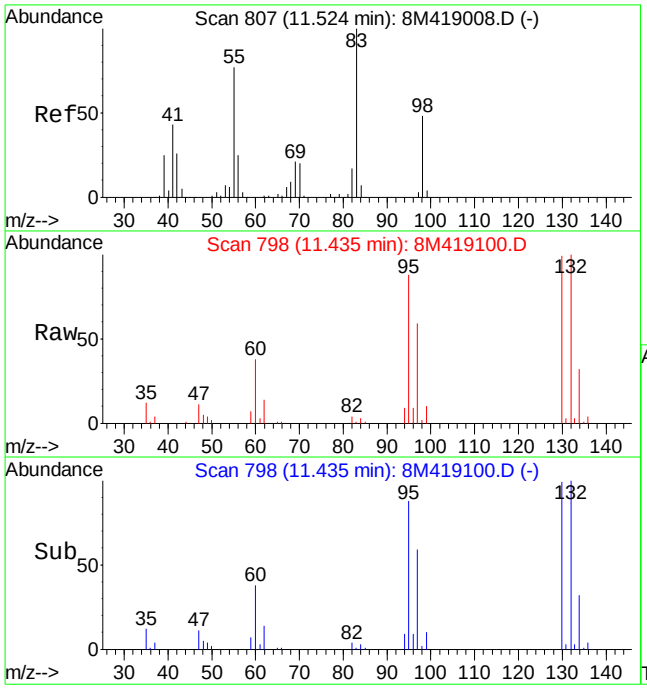


#47
Trichloroethene
Concen: 17.54 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:130 Resp: 155308

Ion	Ratio	Lower	Upper
130	100		
132	98.8	59.4	138.6
95	94.8	60.1	140.3

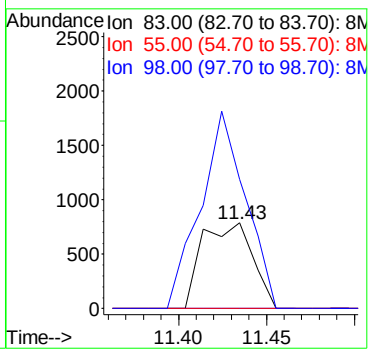


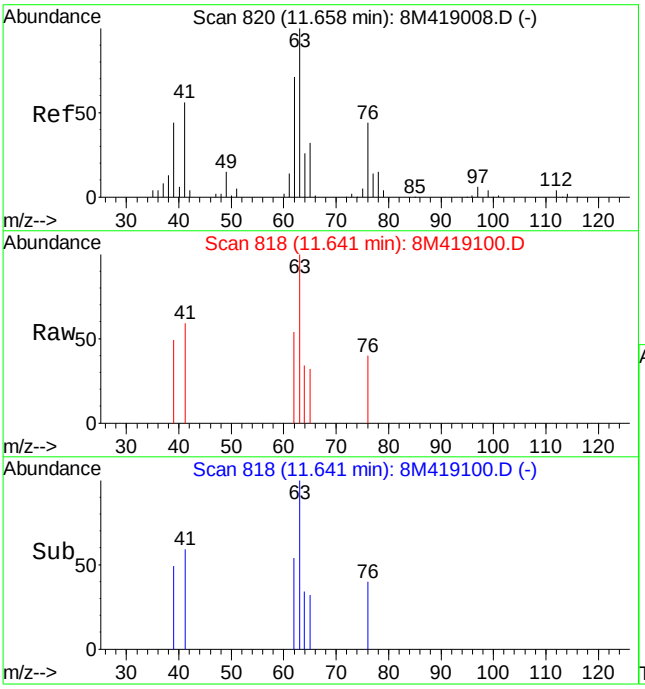


#48
Methylcyclohexane
Concen: 0.13 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.09 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 83 Resp: 1569

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	206.2	28.4	66.2#

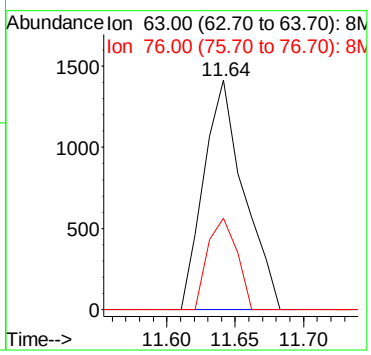


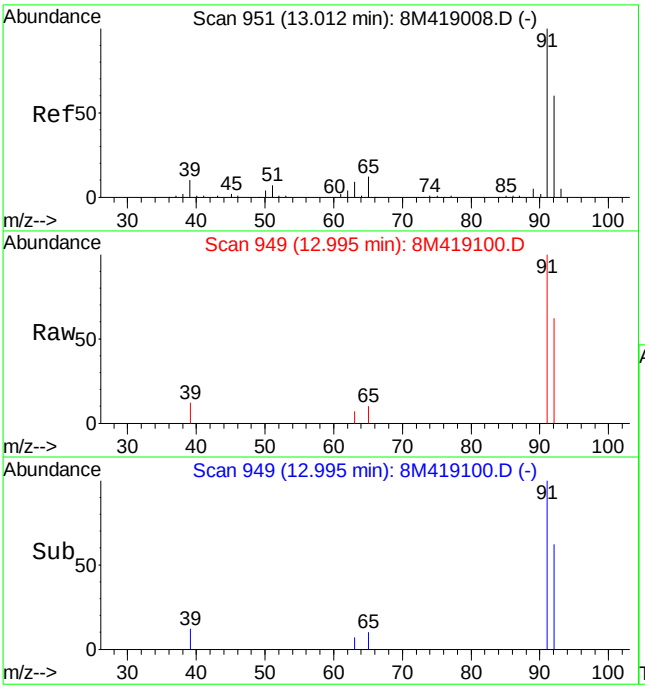


#49
1,2-Dichloropropane
Concen: 0.38 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 63 Resp: 2893

Ion	Ratio	Lower	Upper
63	100		
76	28.8	28.2	65.8

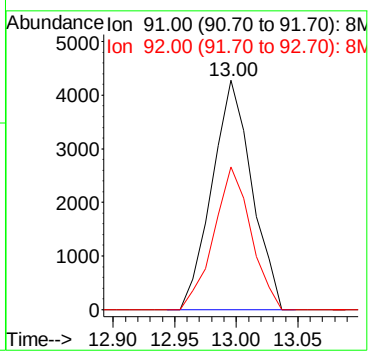


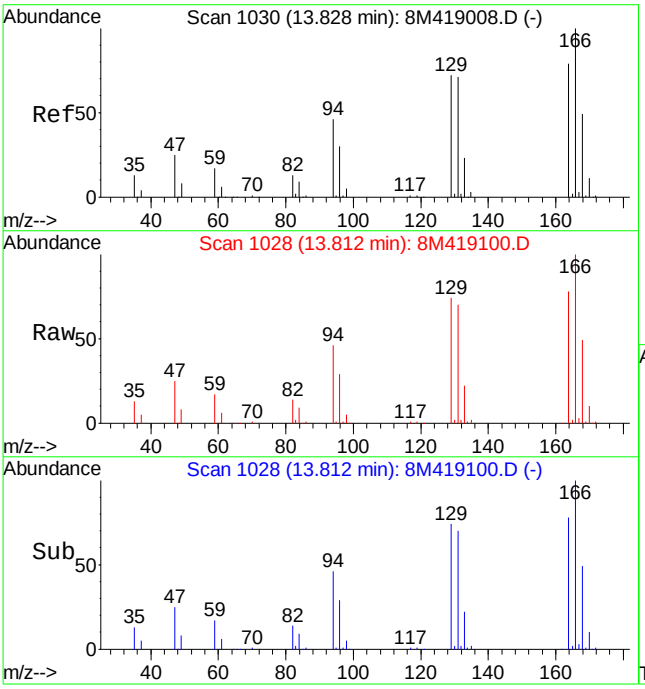


#59
Toluene
Concen: 0.29 ug/L
RT: 13.00 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion: 91 Resp: 9635

Ion	Ratio	Lower	Upper
91	100		
92	58.0	35.9	83.7

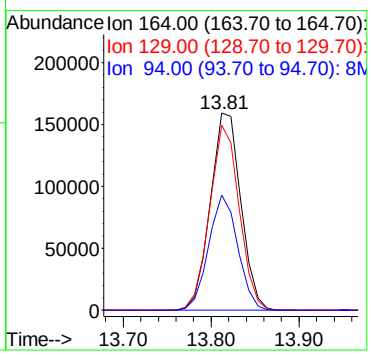


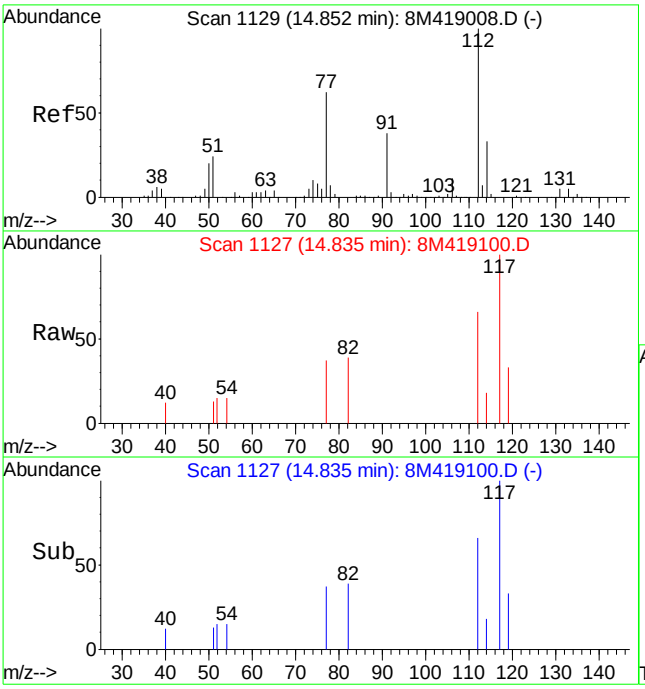


#66
Tetrachloroethene
Concen: 54.21 ug/L
RT: 13.81 min Scan# 1028
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:164 Resp: 384210

Ion	Ratio	Lower	Upper
164	100		
129	90.6	53.4	124.6
94	55.6	34.7	81.1

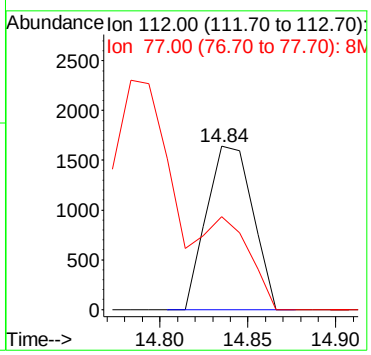


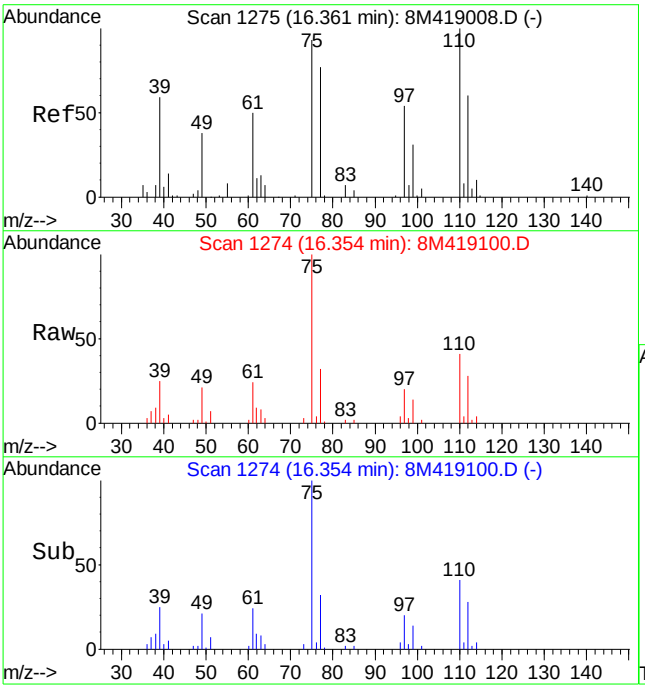


#70
Chlorobenzene
Concen: 0.12 ug/L
RT: 14.84 min Scan# 1127
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:112 Resp: 2987

Ion	Ratio	Lower	Upper
112	100		
77	193.6	45.5	106.1#

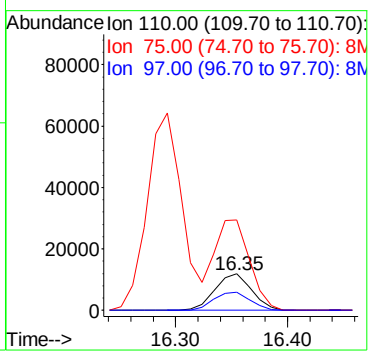


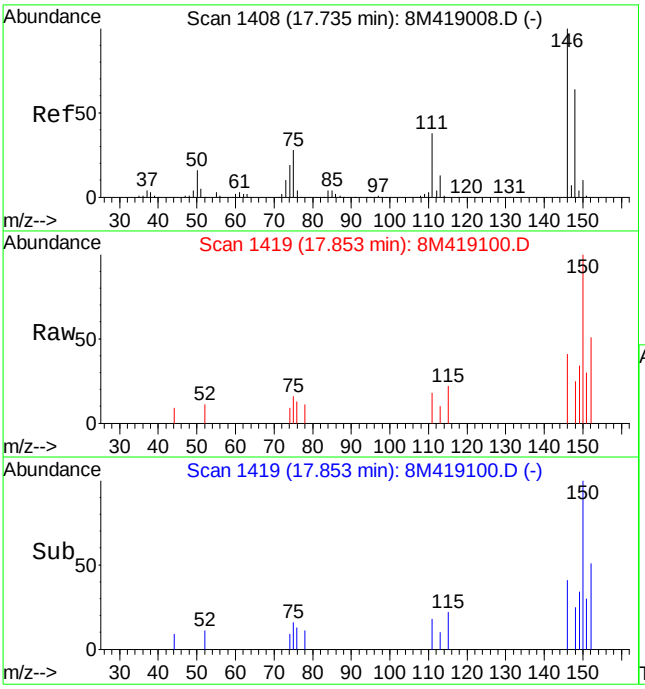


#81
1,2,3-Trichloropropane
Concen: 15.88 ug/L
RT: 16.35 min Scan# 1274
Delta R.T. 0.05 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:110 Resp: 27079

Ion	Ratio	Lower	Upper
110	100		
75	235.5	230.7	538.3
97	49.2	34.1	79.7

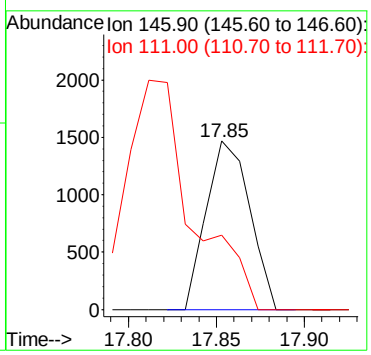


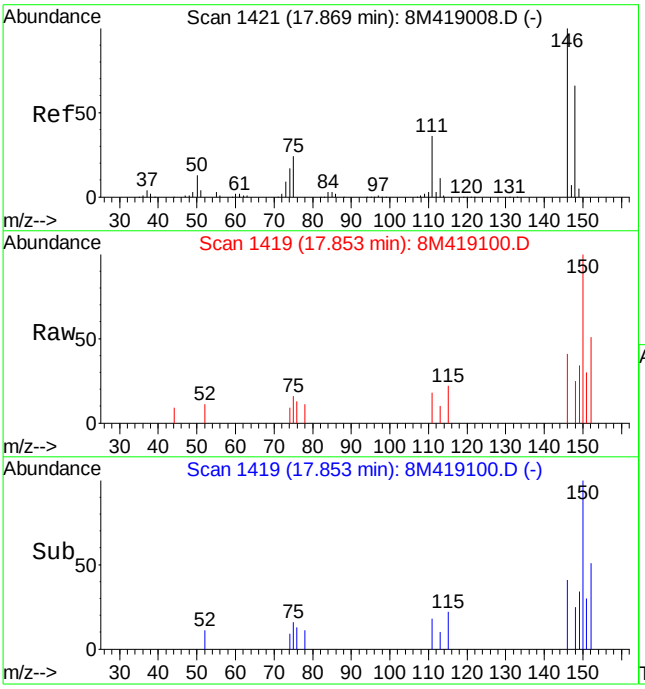


#93
1,3-Dichlorobenzene
Concen: 0.13 ug/L
RT: 17.85 min Scan# 1419
Delta R.T. 0.12 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:146 Resp: 2517

Ion	Ratio	Lower	Upper
146	100		
111	204.6	23.8	55.4#

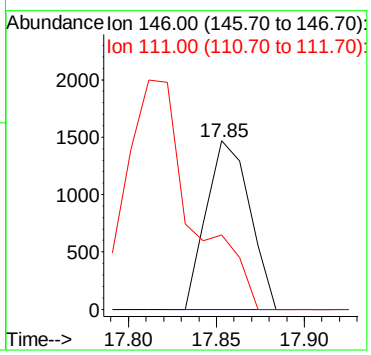


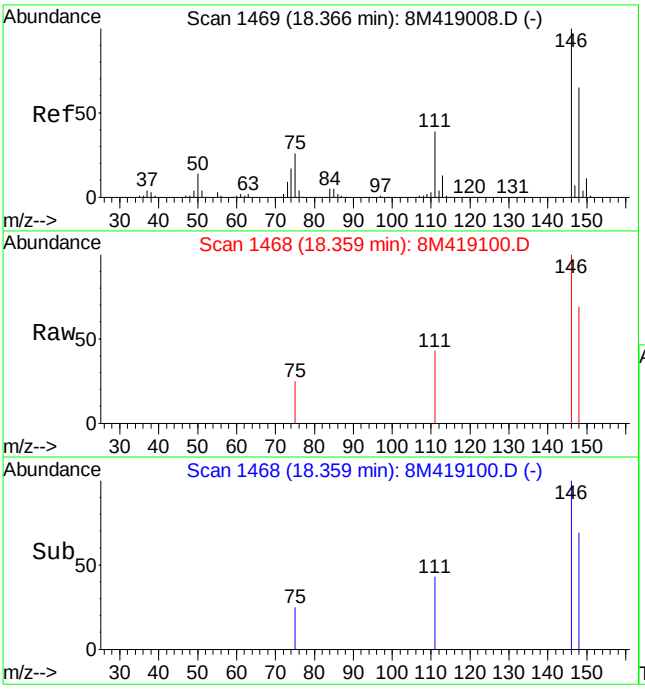


#94
1,4-Dichlorobenzene
Concen: 0.12 ug/L
RT: 17.85 min Scan# 1419
Delta R.T. -0.02 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:146 Resp: 2517

Ion	Ratio	Lower	Upper
146	100		
111	204.6	22.9	53.5#

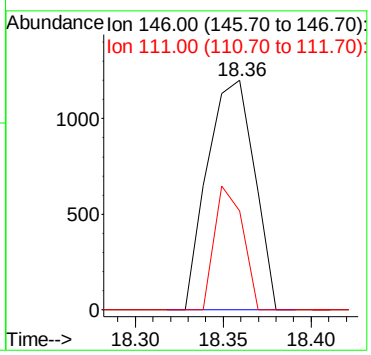




#96
1,2-Dichlorobenzene
Concen: 0.13 ug/L
RT: 18.36 min Scan# 1468
Delta R.T. -0.01 min
Lab File: 8M419100.D
Acq: 21 Apr 2017 19:03

Tgt Ion:146 Resp: 2234

Ion	Ratio	Lower	Upper
146	100		
111	32.3	24.4	57.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419096.D Vial: 10
Acq On : 21 Apr 2017 17:04 Operator: TMB
Sample : L17041069-05 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 17:25:58 2017 Quant Results File: 8260WT.RES

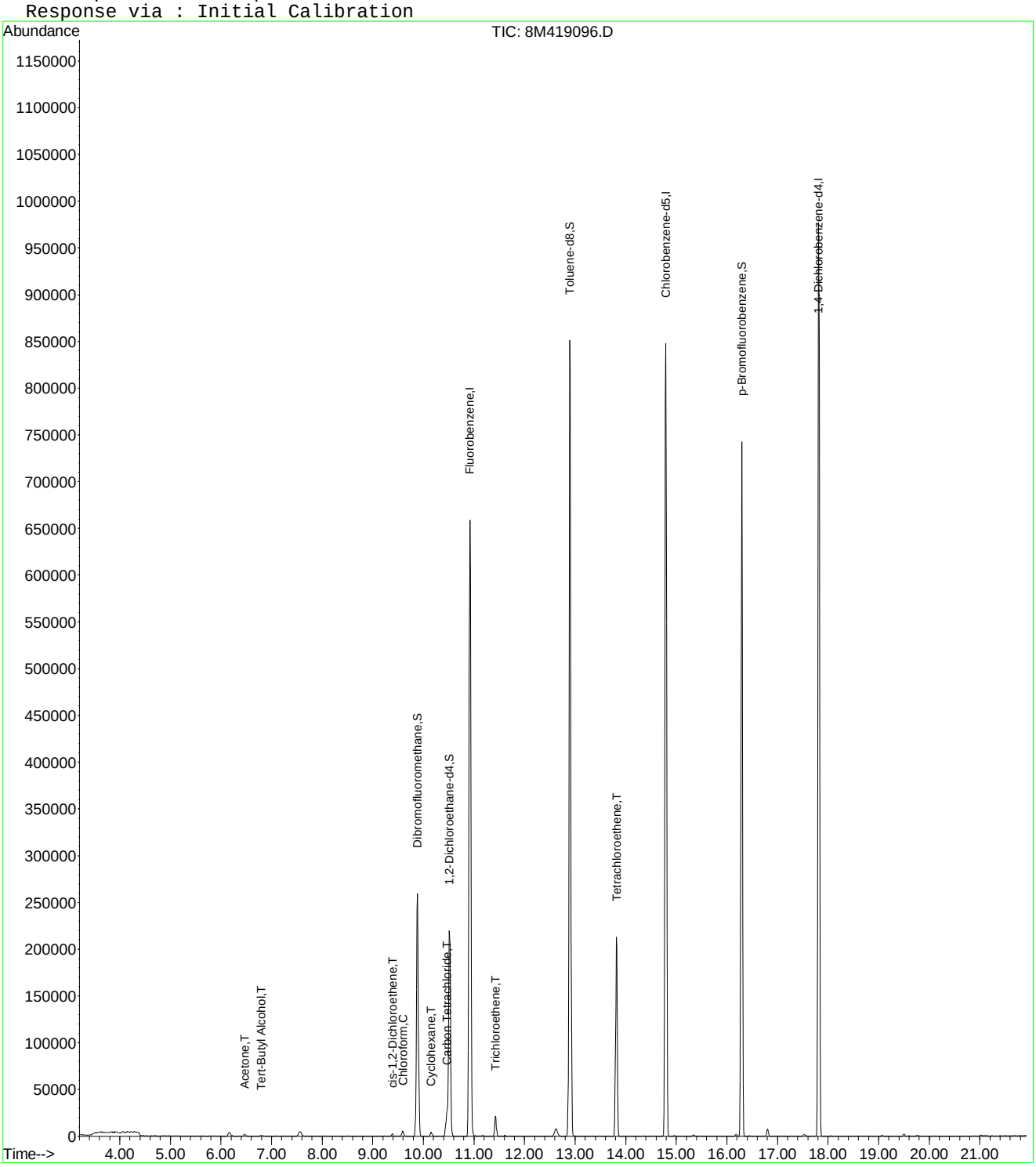
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

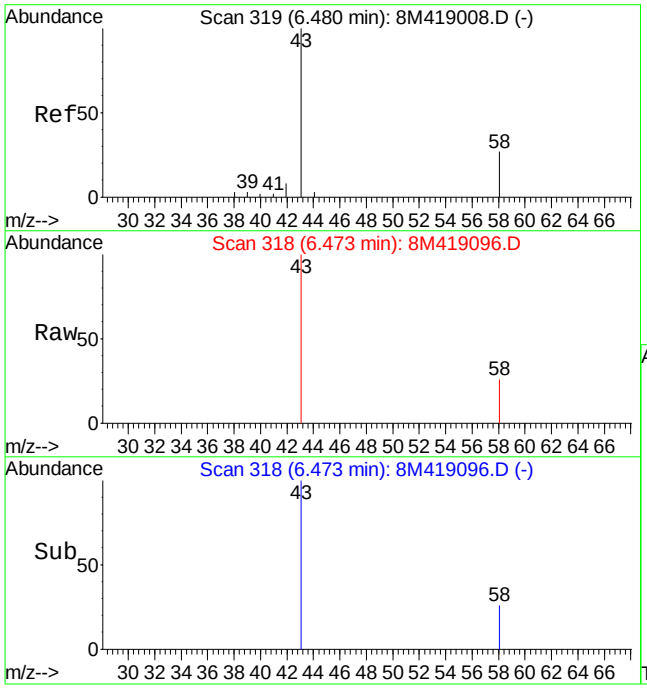
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	825979	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	657015	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	338121	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	220216	25.4187	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%			
43) 1,2-Dichloroethane-d4	10.51	65	190483	25.4327	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.72%			
58) Toluene-d8	12.89	98	791283	26.3584	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.44%			
80) p-Bromofluorobenzene	16.29	95	314034	26.3157	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.28%			
Target Compounds						Qvalue
13) Acetone	6.47	43	4581	3.9434	ug/L #	68
15) Tert-Butyl Alcohol	6.79	59	1782	4.7322	ug/L #	59
32) cis-1,2-Dichloroethene	9.39	96	1655	0.1720	ug/L	70
33) Chloroform	9.59	83	6726	0.4053	ug/L	94
39) Cyclohexane	10.15	56	2978	0.2388	ug/L #	88
42) Carbon Tetrachloride	10.46	117	27621	2.2241	ug/L	97
47) Trichloroethene	11.42	130	9724	1.0144	ug/L	99
66) Tetrachloroethene	13.82	164	69153	9.0019	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419096.D 8260WT.M Mon Apr 24 08:47:47 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419096.D Vial: 10
Acq On : 21 Apr 2017 17:04 Operator: TMB
Sample : L17041069-05 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 17:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

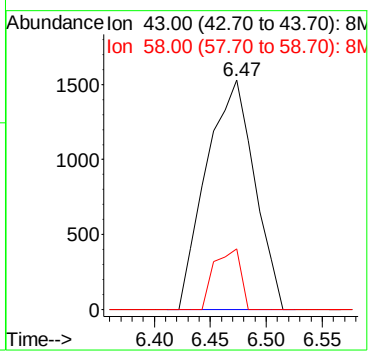


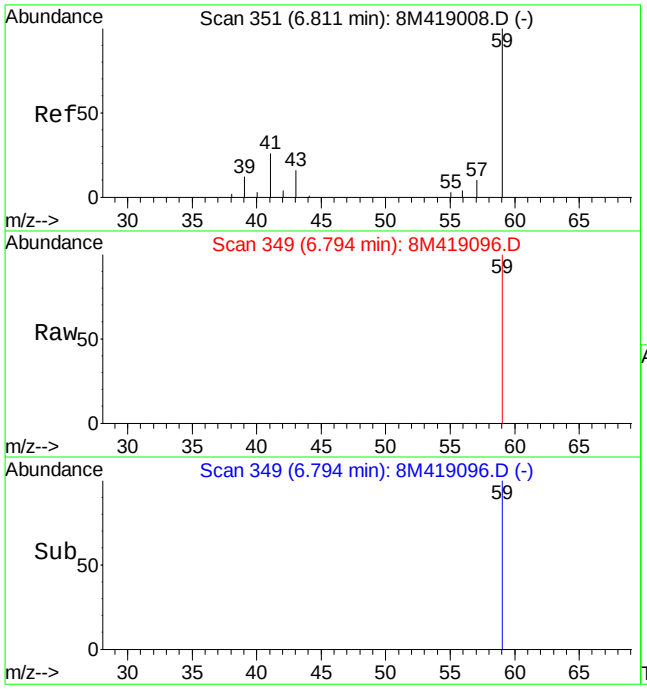


#13
Acetone
Concen: 3.94 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion: 43 Resp: 4581

Ion	Ratio	Lower	Upper
43	100		
58	14.5	19.4	45.4#

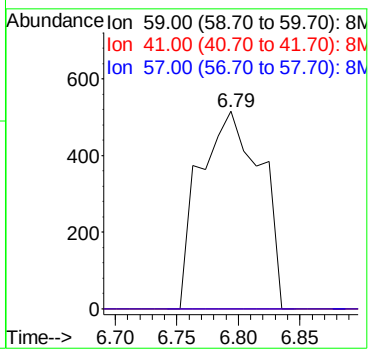


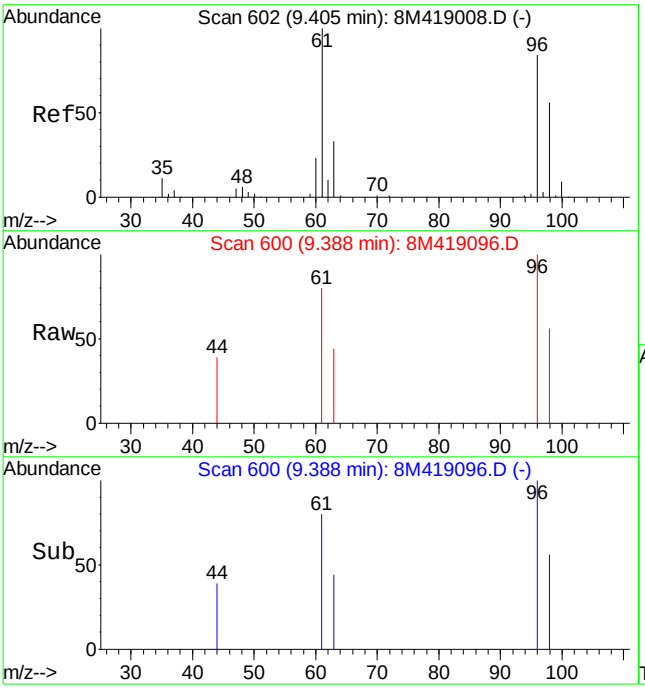


#15
Tert-Butyl Alcohol
Concen: 4.73 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion: 59 Resp: 1782

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

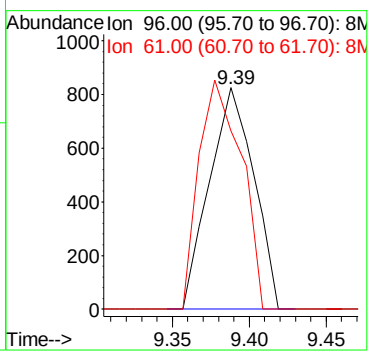


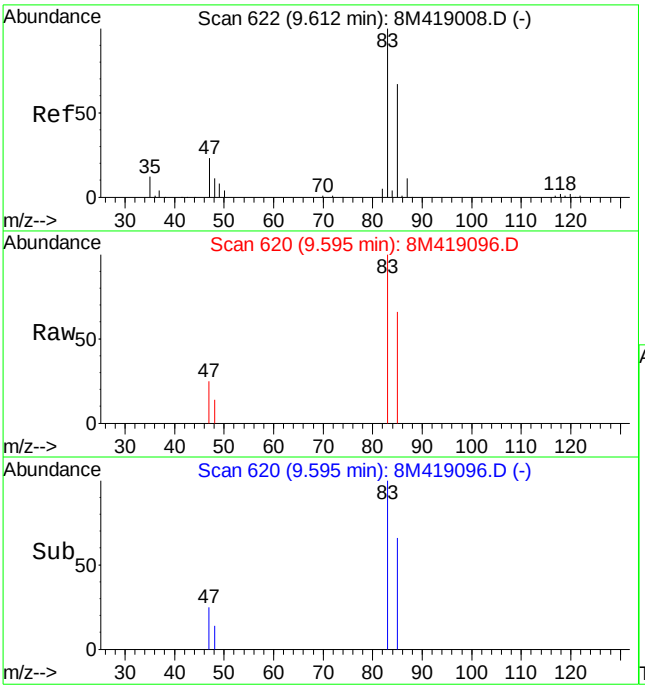


#32
cis-1,2-Dichloroethene
Concen: 0.17 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion: 96 Resp: 1655

Ion	Ratio	Lower	Upper
96	100		
61	98.6	80.3	187.3

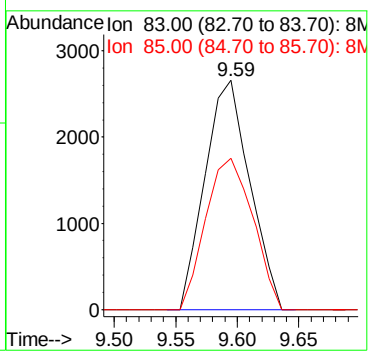


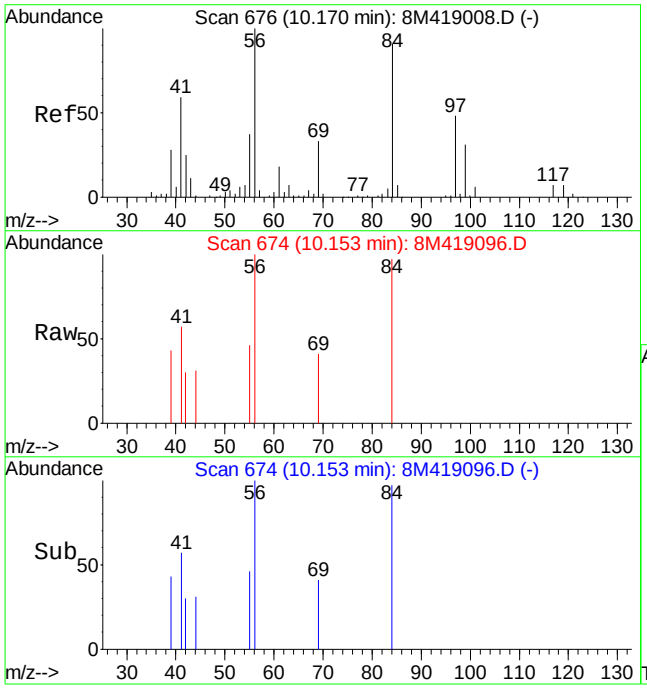


#33
Chloroform
Concen: 0.41 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion: 83 Resp: 6726

Ion	Ratio	Lower	Upper
83	100		
85	69.7	39.1	91.3

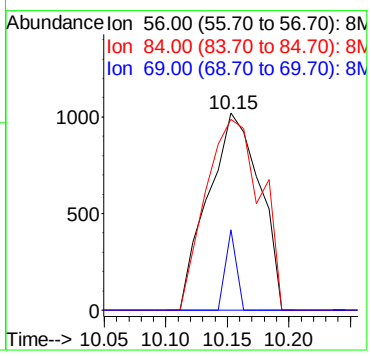


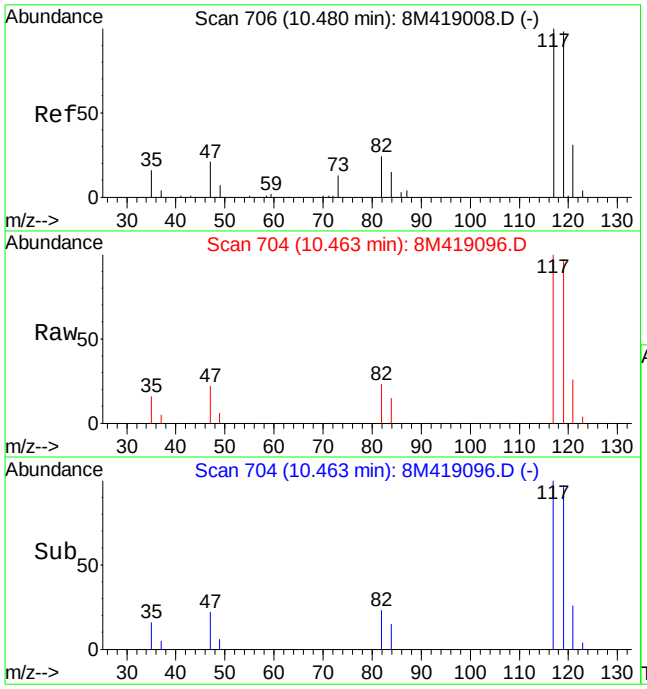


#39
Cyclohexane
Concen: 0.24 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion: 56 Resp: 2978

Ion	Ratio	Lower	Upper
56	100		
84	102.8	61.6	143.8
69	8.7	21.4	50.0#

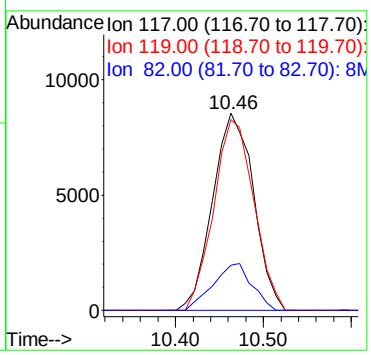


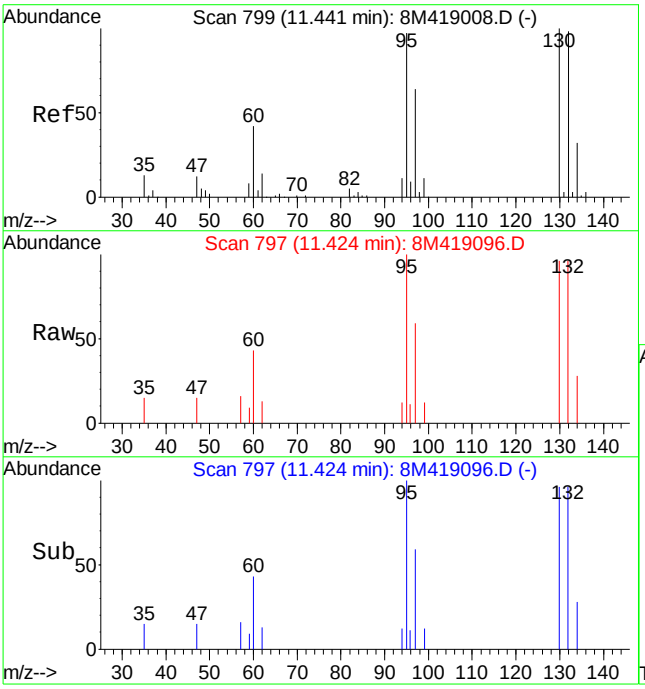


#42
Carbon Tetrachloride
Concen: 2.22 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion:117 Resp: 27621

Ion	Ratio	Lower	Upper
117	100		
119	95.0	58.5	136.5
82	22.6	14.9	34.9

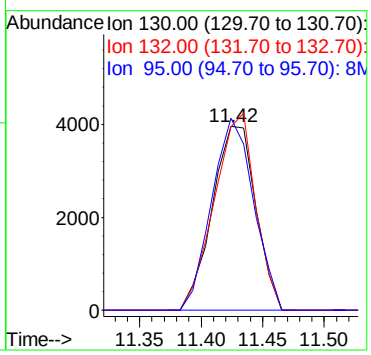


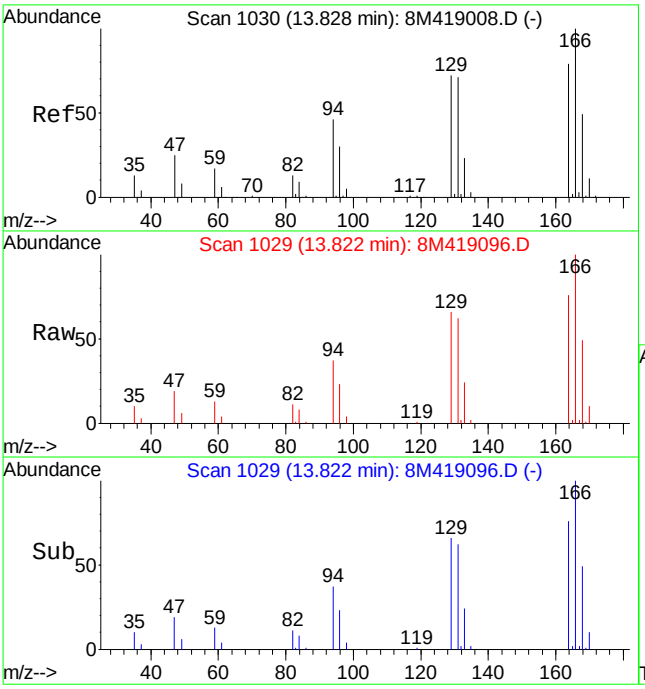


#47
Trichloroethene
Concen: 1.01 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion:130 Resp: 9724

Ion	Ratio	Lower	Upper
130	100		
132	101.0	59.4	138.6
95	100.6	60.1	140.3

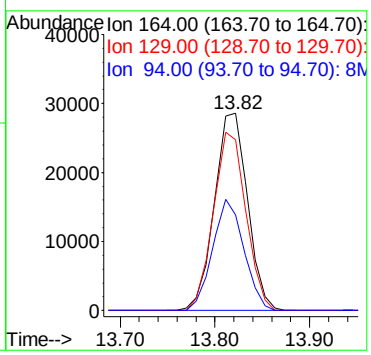




#66
Tetrachloroethene
Concen: 9.00 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419096.D
Acq: 21 Apr 2017 17:04

Tgt Ion:164 Resp: 69153

Ion	Ratio	Lower	Upper
164	100		
129	88.7	53.4	124.6
94	53.2	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419102.D Vial: 16
Acq On : 21 Apr 2017 20:03 Operator: TMB
Sample : L17041069-06 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 20:25:27 2017 Quant Results File: 8260WT.RES

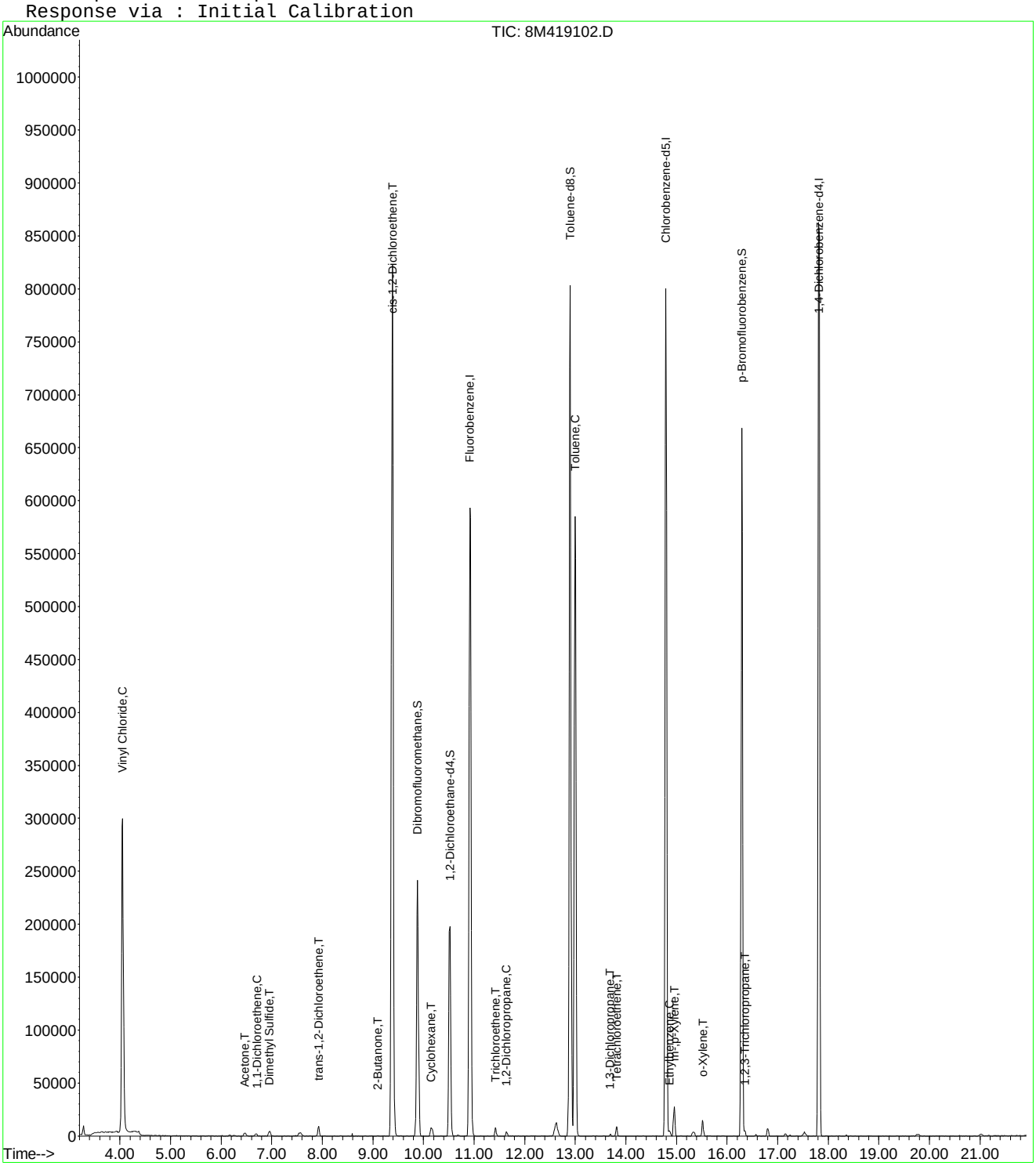
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

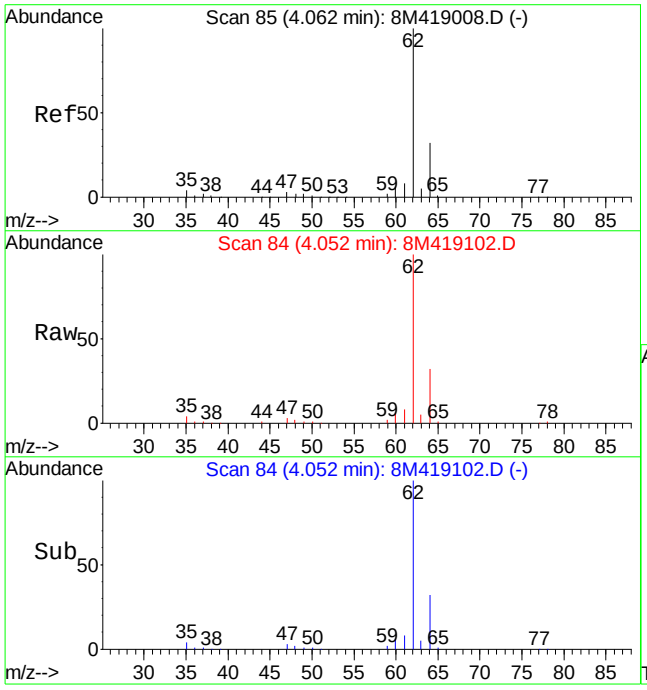
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.91	96	761763	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	606155	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	311509	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	201209	25.1826	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.72%			
43) 1,2-Dichloroethane-d4	10.52	65	176839	25.6014	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.40%			
58) Toluene-d8	12.90	98	735855	26.5687	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.28%			
80) p-Bromofluorobenzene	16.29	95	285067	25.9291	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.72%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	448594	36.8568	ug/L	98
13) Acetone	6.47	43	5509	5.1420	ug/L	96
14) 1,1-Dichloroethene	6.71	61	2482	0.2250	ug/L	89
16) Dimethyl Sulfide	6.96	62	3392	0.4616	ug/L	82
23) trans-1,2-Dichloroethene	7.93	61	8016	0.7468	ug/L	92
29) 2-Butanone	9.10	43	205	0.1220	ug/L #	44
32) cis-1,2-Dichloroethene	9.38	96	486467	54.8340	ug/L	90
39) Cyclohexane	10.15	56	6387	0.5554	ug/L	87
47) Trichloroethene	11.42	130	1985	0.2245	ug/L #	47
49) 1,2-Dichloropropane	11.64	63	2535	0.3298	ug/L #	60
59) Toluene	12.99	91	593852	17.6004	ug/L	98
65) 1,3-Dichloropropane	13.68	76	1542	0.1643	ug/L	93
66) Tetrachloroethene	13.82	164	3109	0.4387	ug/L	84
72) Ethylbenzene	14.86	106	1815	0.1349	ug/L	62
73) m-,p-Xylene	14.96	106	11457	0.7355	ug/L	91
74) o-Xylene	15.52	106	6307	0.4027	ug/L	93
81) 1,2,3-Trichloropropane	16.35	110	1170	0.6943	ug/L #	1

(#) = qualifier out of range (m) = manual integration
8M419102.D 8260WT.M Mon Apr 24 08:48:14 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419102.D Vial: 16
Acq On : 21 Apr 2017 20:03 Operator: TMB
Sample : L17041069-06 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 20:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

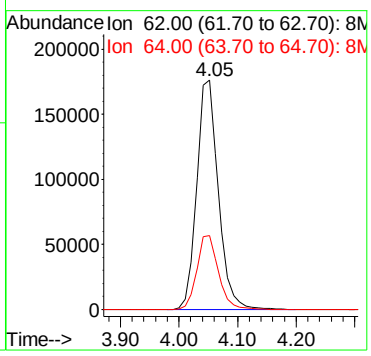


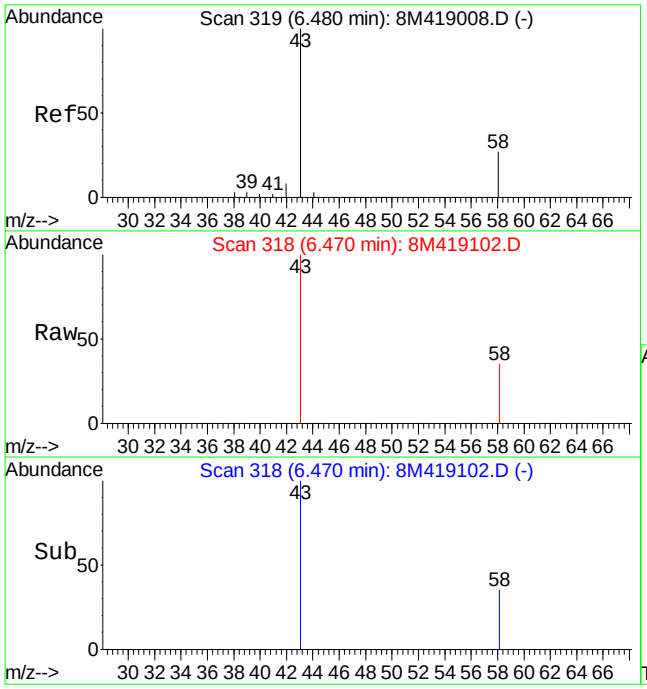


#4
Vinyl Chloride
Concen: 36.86 ug/L
RT: 4.05 min Scan# 84
Delta R.T. -0.00 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 62 Resp: 448594

Ion	Ratio	Lower	Upper
62	100		
64	32.1	19.9	46.3

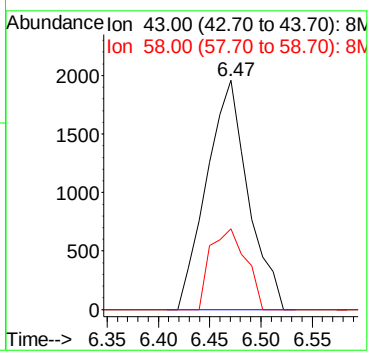


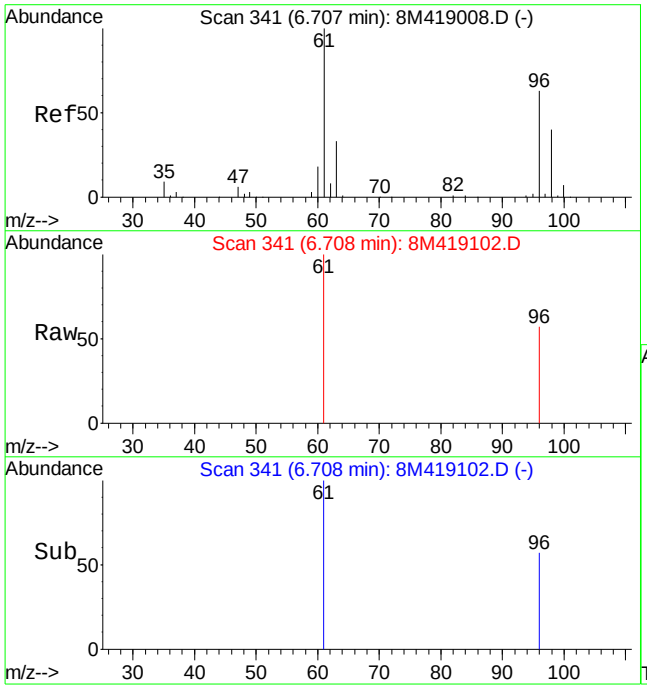


#13
Acetone
Concen: 5.14 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 43 Resp: 5509

Ion	Ratio	Lower	Upper
43	100		
58	30.2	19.4	45.4

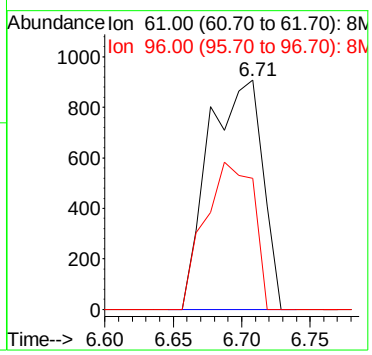


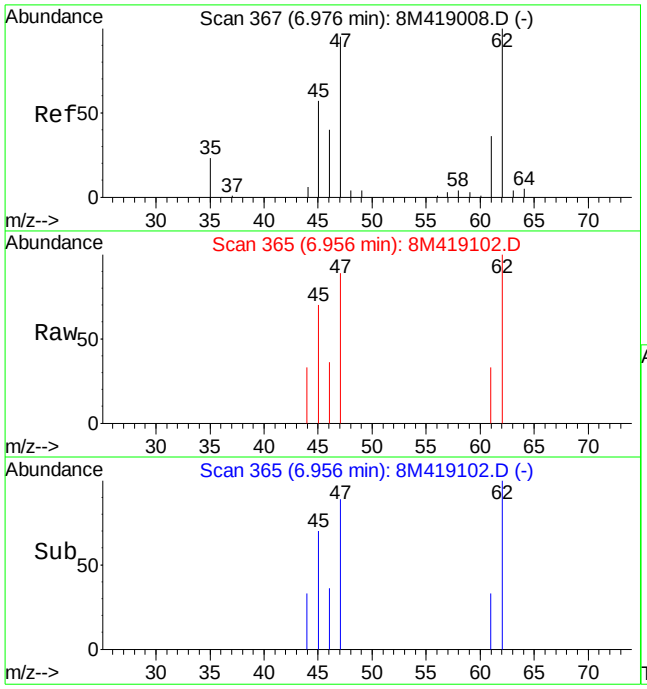


#14
1,1-Dichloroethene
Concen: 0.22 ug/L
RT: 6.71 min Scan# 341
Delta R.T. 0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 61 Resp: 2482

Ion	Ratio	Lower	Upper
61	100		
96	58.0	40.0	93.4

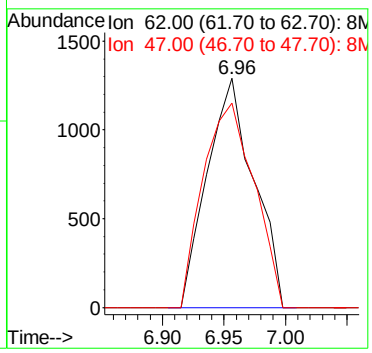


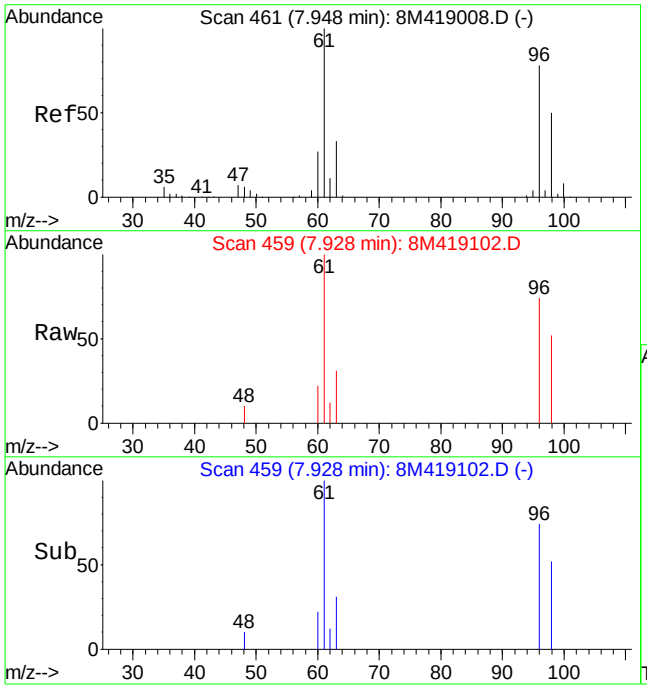


#16
Dimethyl Sulfide
Concen: 0.46 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 62 Resp: 3392

Ion	Ratio	Lower	Upper
62	100		
47	98.1	49.0	114.4

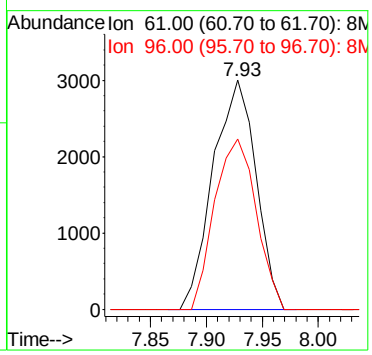


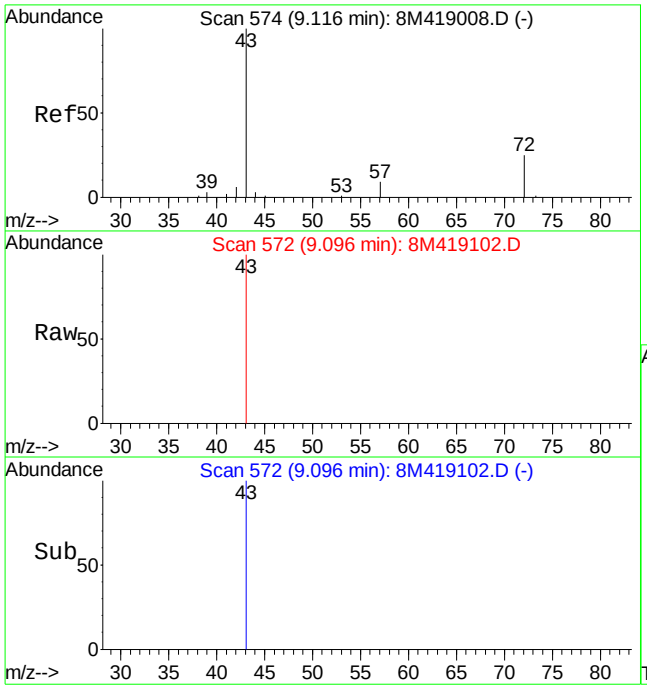


#23
trans-1,2-Dichloroethene
Concen: 0.75 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 61 Resp: 8016

Ion	Ratio	Lower	Upper
61	100		
96	72.0	47.2	110.0

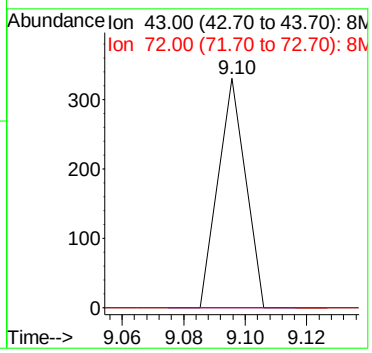


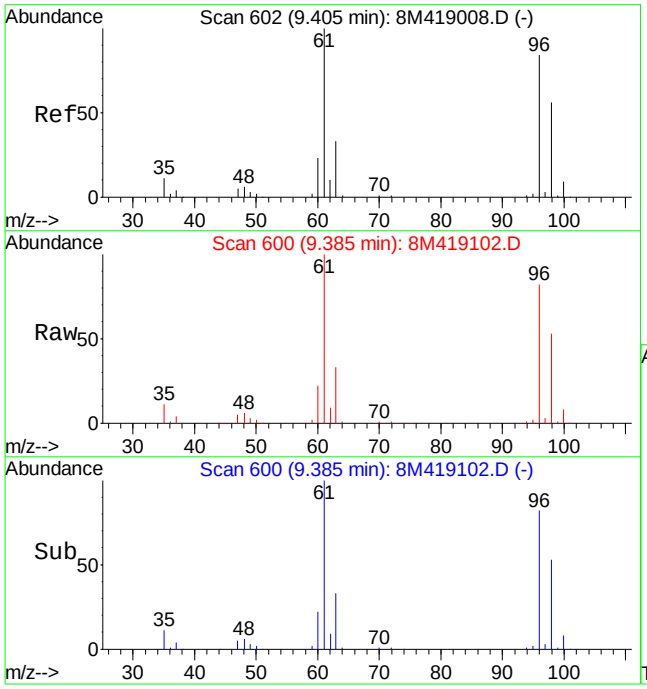


#29
2-Butanone
Concen: 0.12 ug/L
RT: 9.10 min Scan# 572
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 43 Resp: 205

Ion	Ratio	Lower	Upper
43	100		
72	0.0	18.4	42.8#

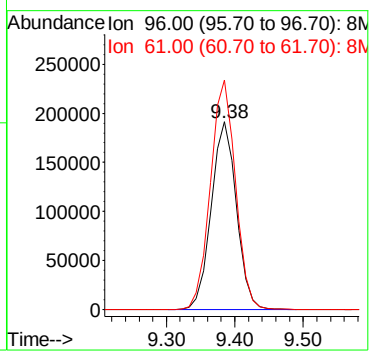


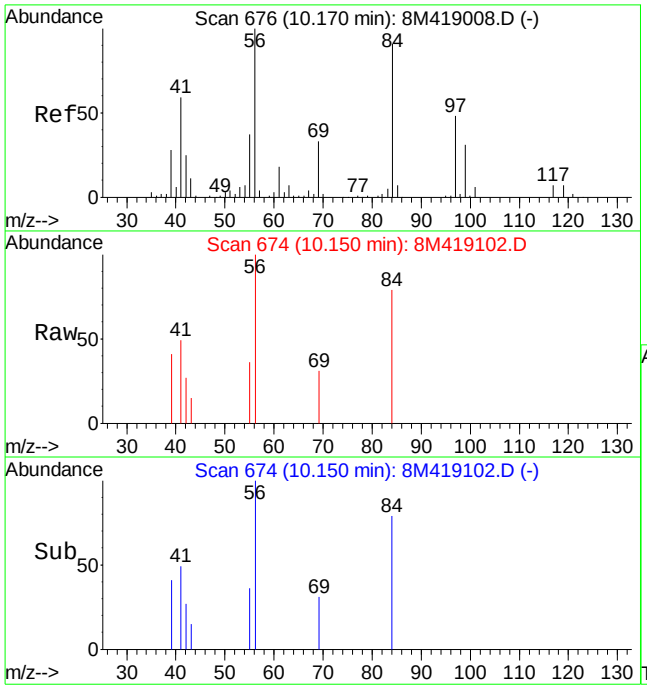


#32
cis-1,2-Dichloroethene
Concen: 54.83 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 96 Resp: 486467

Ion	Ratio	Lower	Upper
96	100		
61	122.0	80.3	187.3

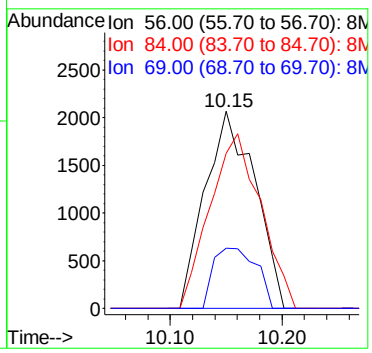


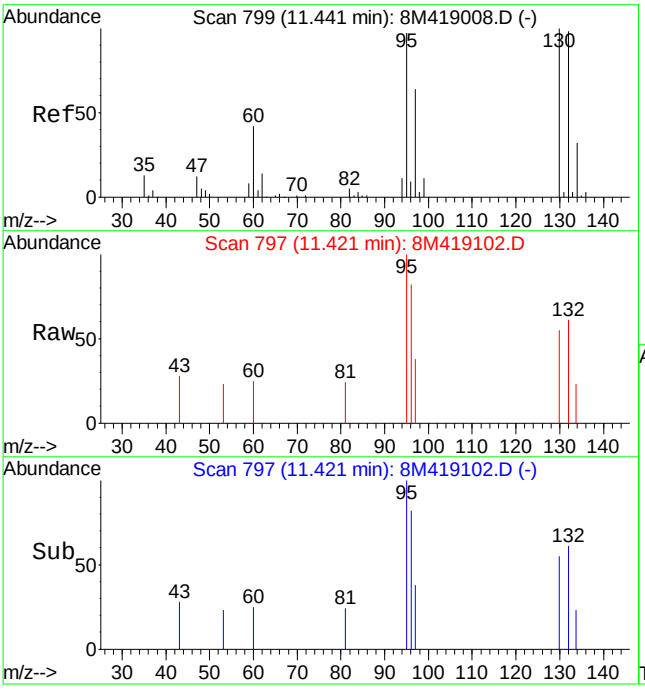


#39
Cyclohexane
Concen: 0.56 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 56 Resp: 6387

Ion	Ratio	Lower	Upper
56	100		
84	90.6	61.6	143.8
69	26.5	21.4	50.0

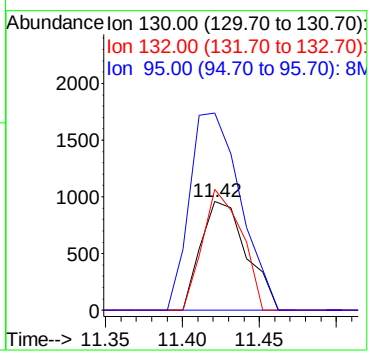


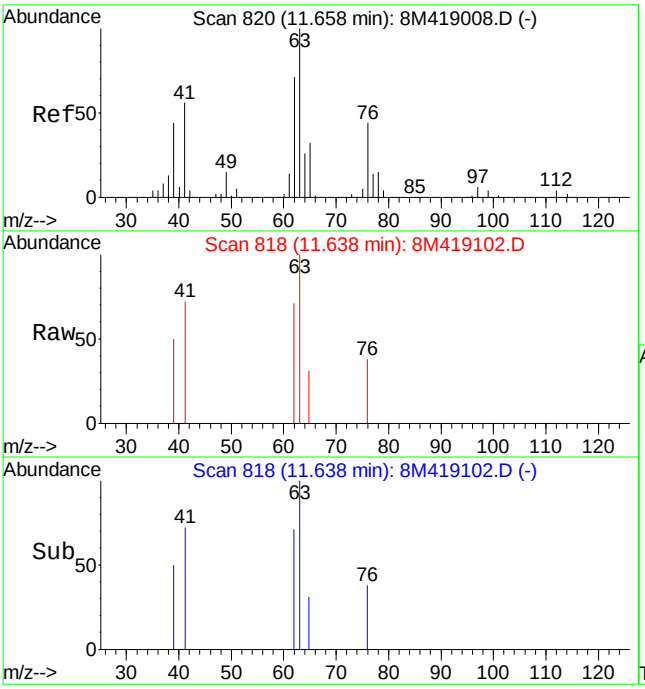


#47
Trichloroethene
Concen: 0.22 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:130 Resp: 1985

Ion	Ratio	Lower	Upper
130	100		
132	94.6	59.4	138.6
95	201.8	60.1	140.3#

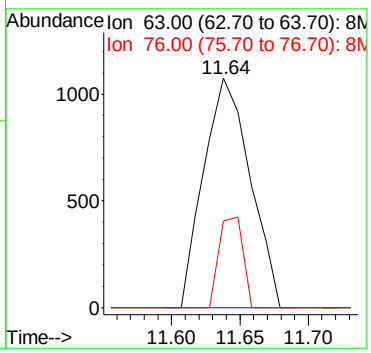


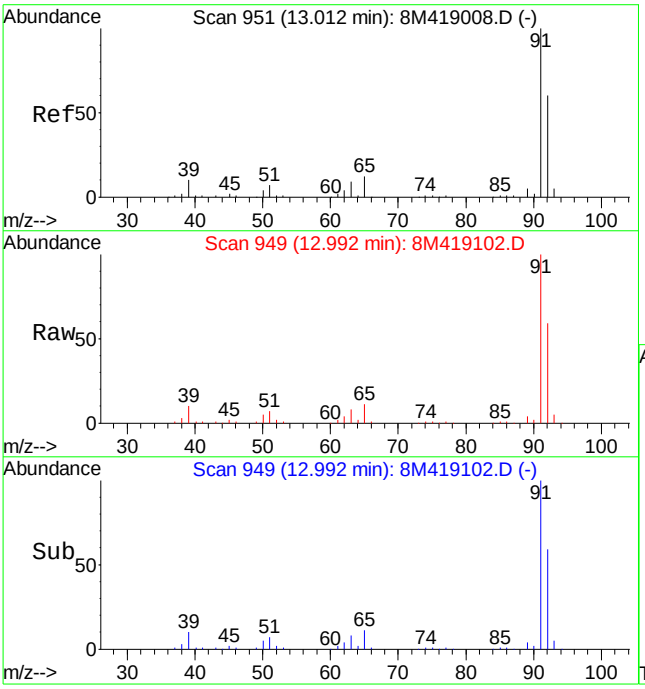


#49
1,2-Dichloropropane
Concen: 0.33 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 63 Resp: 2535

Ion	Ratio	Lower	Upper
63	100		
76	20.3	28.2	65.8#

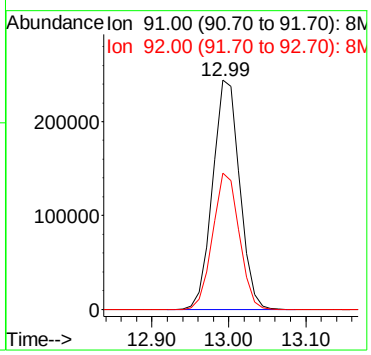


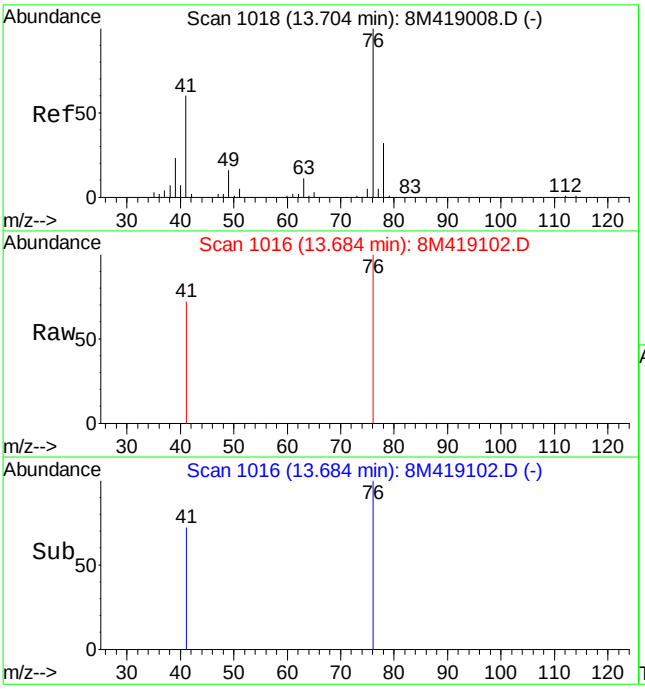


#59
Toluene
Concen: 17.60 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 91 Resp: 593852

Ion	Ratio	Lower	Upper
91	100		
92	58.4	35.9	83.7

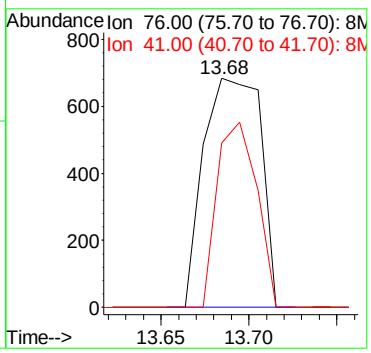


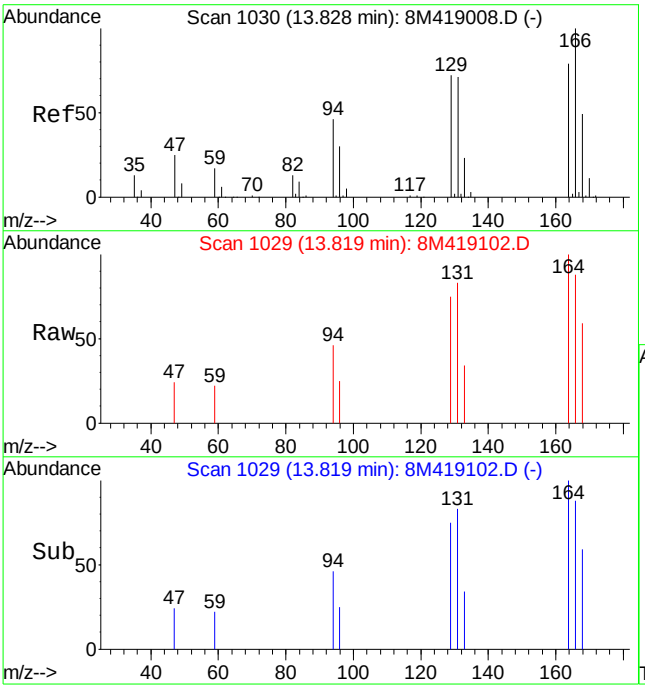


#65
1,3-Dichloropropane
Concen: 0.16 ug/L
RT: 13.68 min Scan# 1016
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 76 Resp: 1542

Ion	Ratio	Lower	Upper
76	100		
41	56.0	30.7	71.7

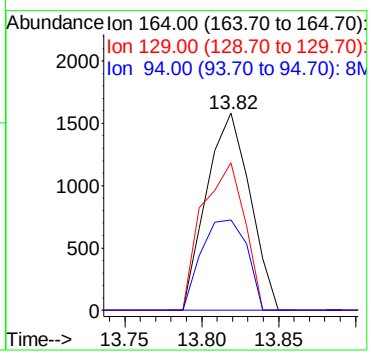


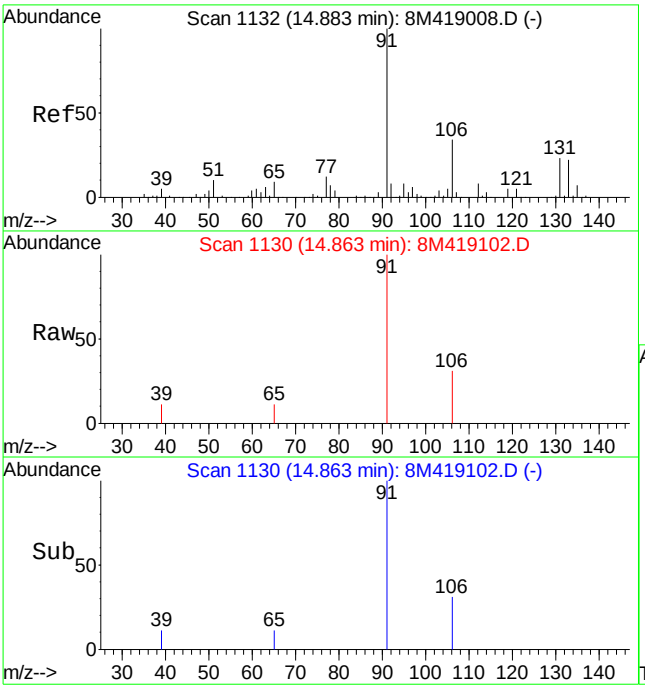


#66
Tetrachloroethene
Concen: 0.44 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:164 Resp: 3109

Ion	Ratio	Lower	Upper
164	100		
129	72.8	53.4	124.6
94	48.1	34.7	81.1

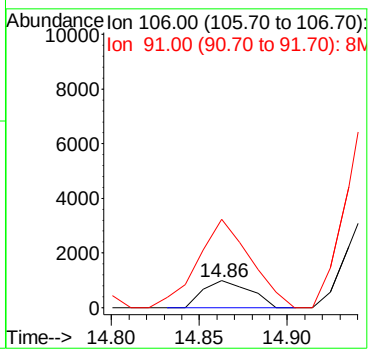


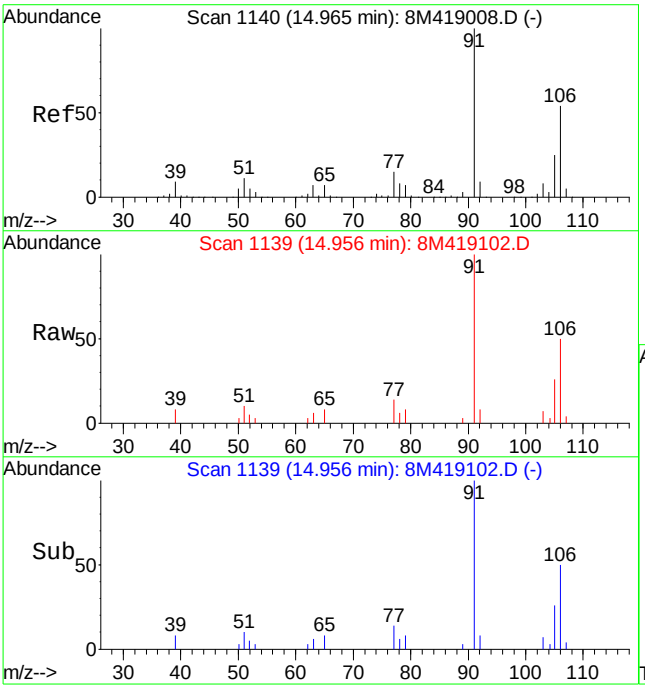


#72
Ethylbenzene
Concen: 0.13 ug/L
RT: 14.86 min Scan# 1130
Delta R.T. -0.02 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:106 Resp: 1815

Ion	Ratio	Lower	Upper
106	100		
91	372.4	179.2	418.2

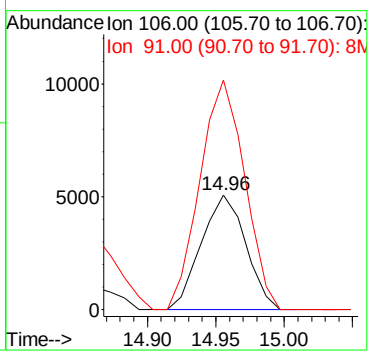


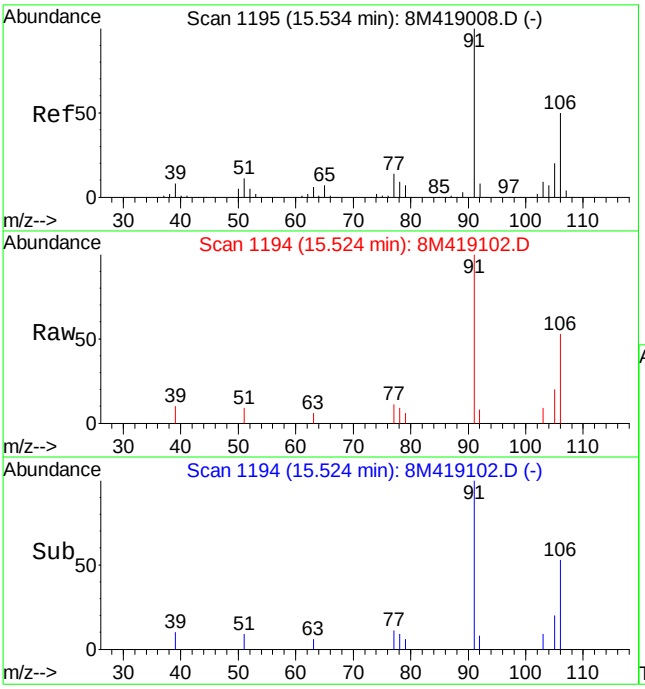


#73
m-,p-Xylene
Concen: 0.74 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:106 Resp: 11457

Ion	Ratio	Lower	Upper
106	100		
91	201.6	113.4	264.6

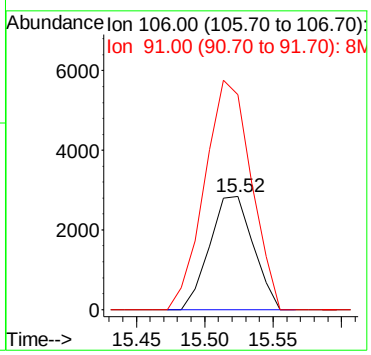


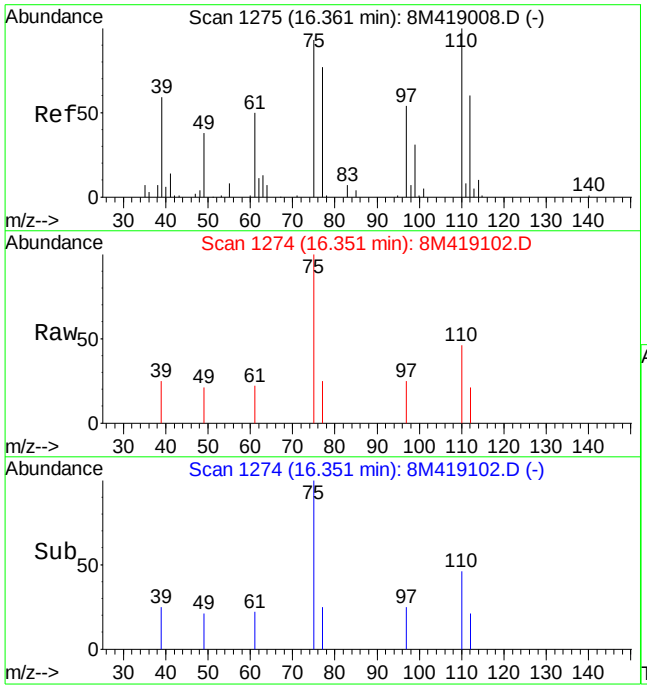


#74
o-Xylene
Concen: 0.40 ug/L
RT: 15.52 min Scan# 1194
Delta R.T. -0.00 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:106 Resp: 6307

Ion	Ratio	Lower	Upper
106	100		
91	215.8	123.4	287.8

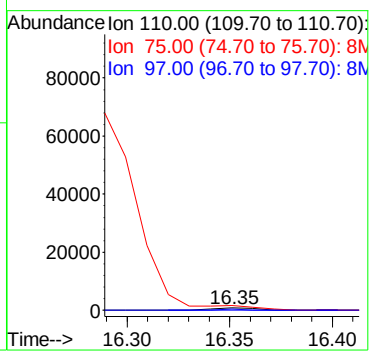




#81
1,2,3-Trichloropropane
Concen: 0.69 ug/L
RT: 16.35 min Scan# 1274
Delta R.T. 0.05 min
Lab File: 8M419102.D
Acq: 21 Apr 2017 20:03

Tgt Ion:110 Resp: 1170

Ion	Ratio	Lower	Upper
110	100		
75	11935.0	230.7	538.3#
97	22.6	34.1	79.7#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419095.D Vial: 9
Acq On : 21 Apr 2017 16:33 Operator: TMB
Sample : L17041069-07 A RS 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 16:55:43 2017 Quant Results File: 8260WT.RES

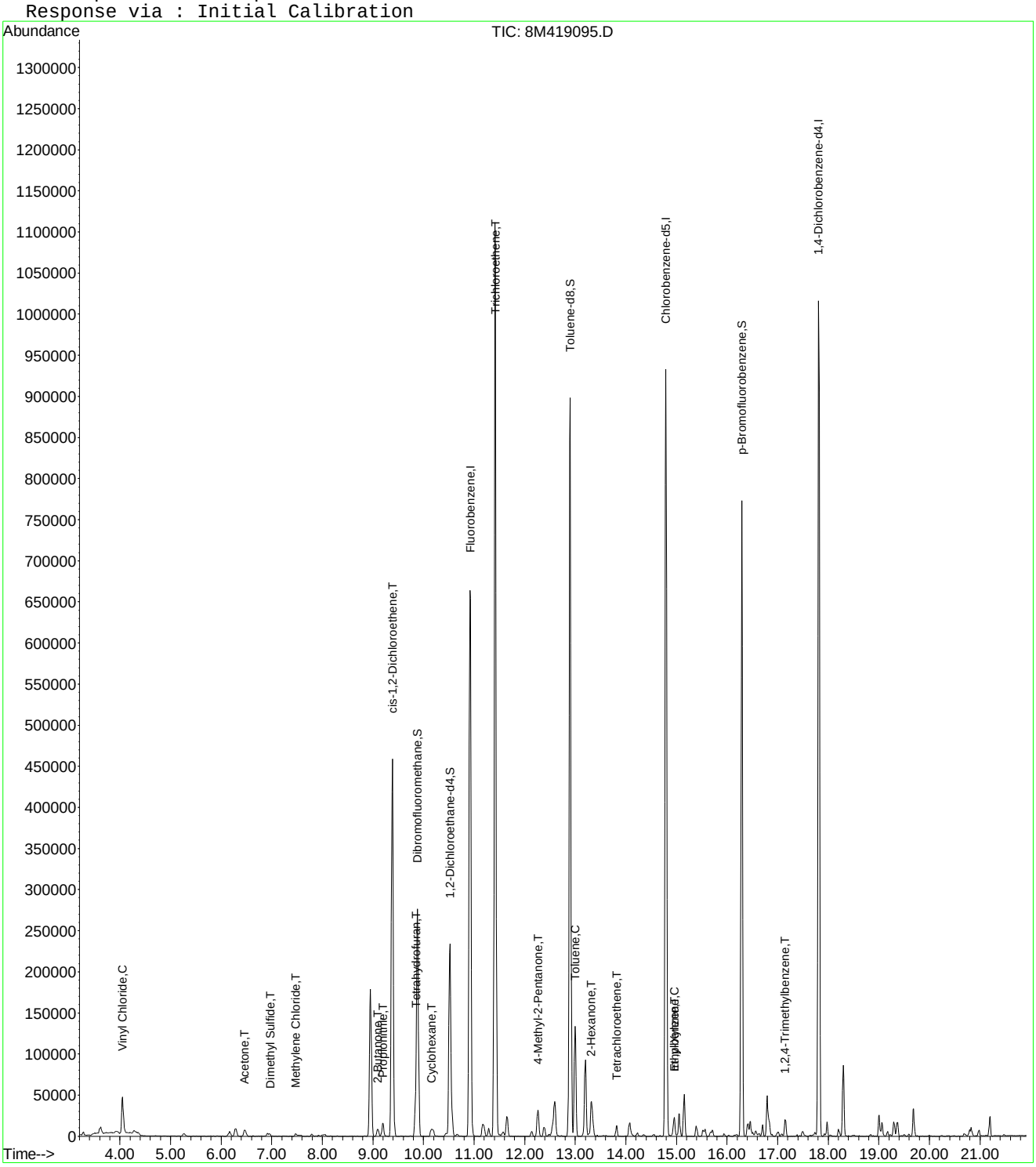
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

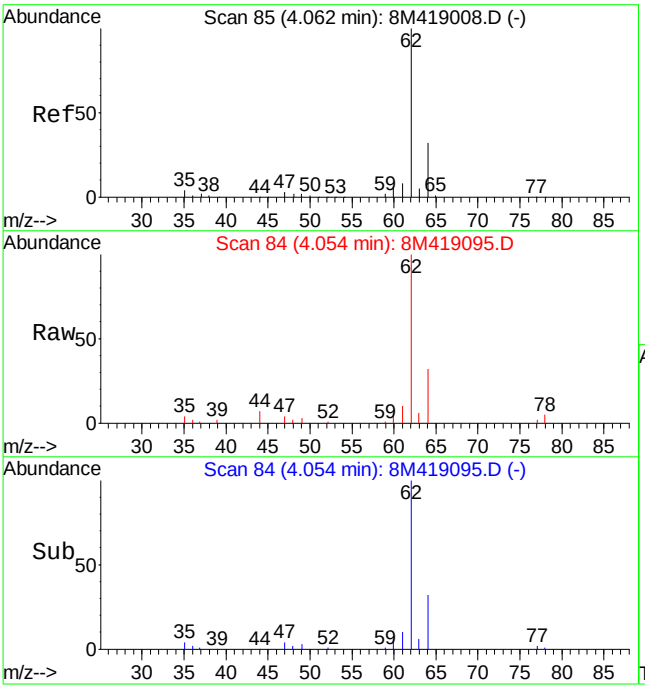
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	855993	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	685144	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	349968	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	227243	25.3101	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.52	65	197490	25.4437	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.76%			
58) Toluene-d8	12.90	98	825801	26.3788	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%			
80) p-Bromofluorobenzene	16.29	95	321377	26.0194	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.08%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	65539	4.7920	ug/L	98
13) Acetone	6.46	43	15672	13.0177	ug/L	92
16) Dimethyl Sulfide	6.97	62	2467	0.2988	ug/L	91
19) Methylene Chloride	7.47	84	2205	0.2475	ug/L	83
29) 2-Butanone	9.10	43	16027	8.4891	ug/L	89
30) Propionitrile	9.20	54	2124	3.6298	ug/L #	41
32) cis-1,2-Dichloroethene	9.39	96	276130	27.6987	ug/L	90
36) Tetrahydrofuran	9.85	42	31633	24.3402	ug/L	91
39) Cyclohexane	10.16	56	6551	0.5069	ug/L	89
47) Trichloroethene	11.42	130	5434	0.5470	ug/L #	1
54) 4-Methyl-2-Pentanone	12.26	58	12585	7.5183	ug/L	96
59) Toluene	12.99	91	133559	3.5020	ug/L	99
64) 2-Hexanone	13.31	58	20955	13.6085	ug/L	74
66) Tetrachloroethene	13.82	164	4700	0.5867	ug/L	91
72) Ethylbenzene	14.96	106	2378	0.1564	ug/L	62
73) m-,p-Xylene	14.96	106	2378	0.1351	ug/L	76
90) 1,2,4-Trimethylbenzene	17.15	105	16600	0.4585	ug/L	89

(#) = qualifier out of range (m) = manual integration
8M419095.D 8260WT.M Mon Apr 24 08:47:42 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419095.D Vial: 9
Acq On : 21 Apr 2017 16:33 Operator: TMB
Sample : L17041069-07 A RS 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 16:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

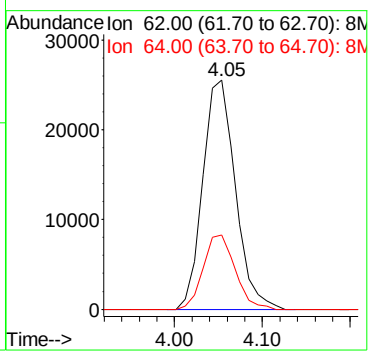


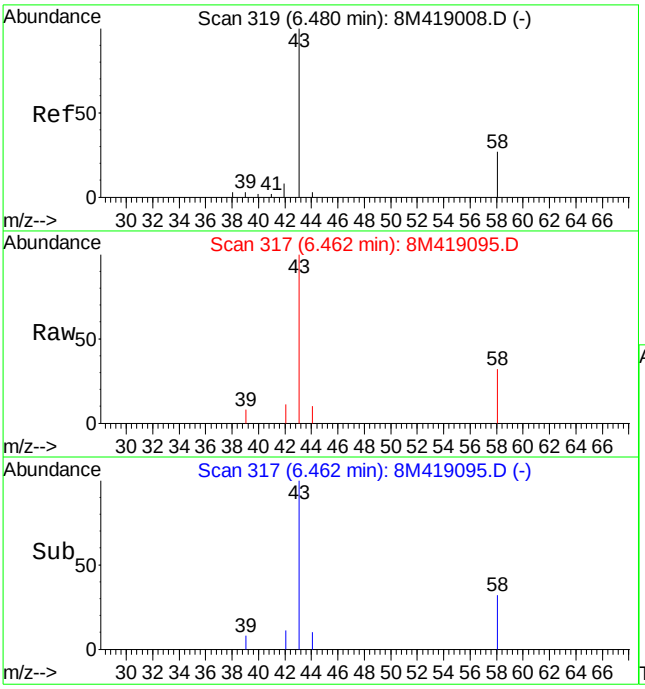


#4
Vinyl Chloride
Concen: 4.79 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 62 Resp: 65539

Ion	Ratio	Lower	Upper
62	100		
64	31.8	19.9	46.3

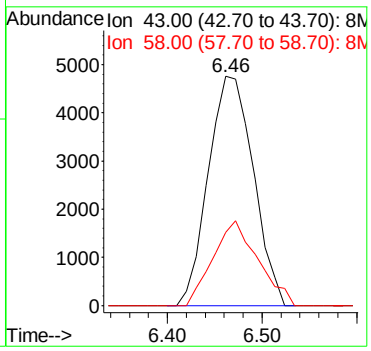


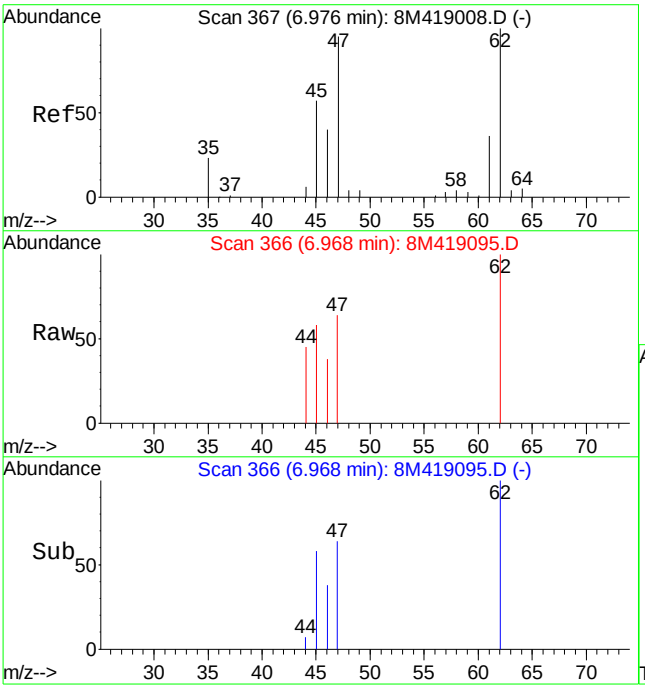


#13
Acetone
Concen: 13.02 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 43 Resp: 15672

Ion	Ratio	Lower	Upper
43	100		
58	36.8	19.4	45.4

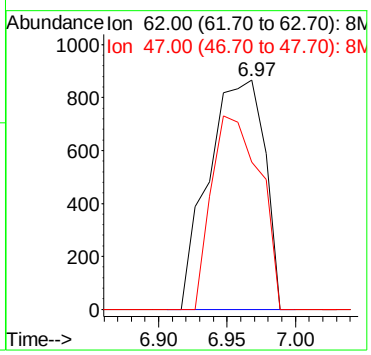


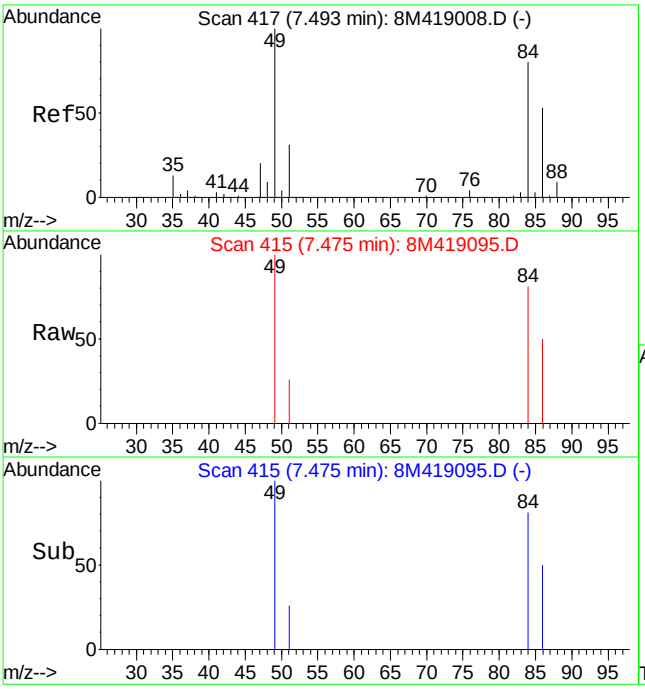


#16
Dimethyl Sulfide
Concen: 0.30 ug/L
RT: 6.97 min Scan# 366
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 62 Resp: 2467

Ion	Ratio	Lower	Upper
62	100		
47	73.3	49.0	114.4

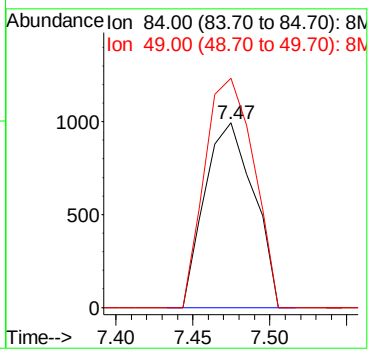


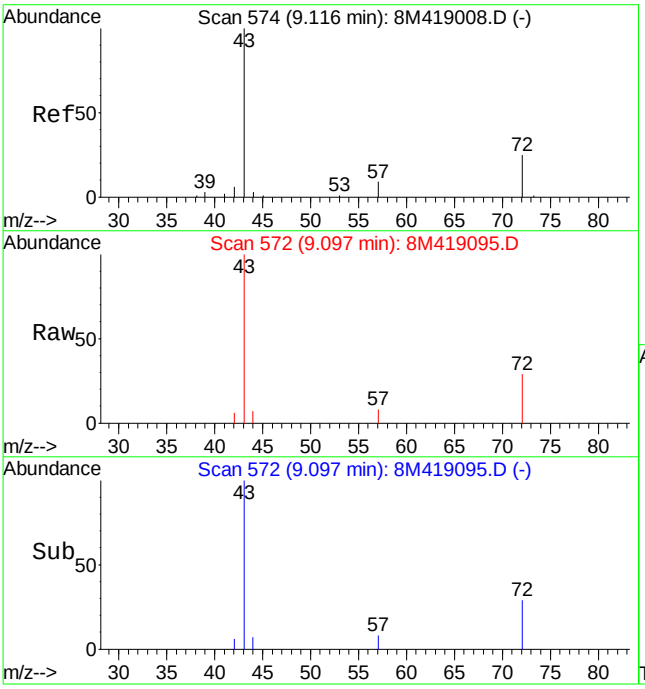


#19
Methylene Chloride
Concen: 0.25 ug/L
RT: 7.47 min Scan# 415
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 84 Resp: 2205

Ion	Ratio	Lower	Upper
84	100		
49	124.4	63.9	149.1

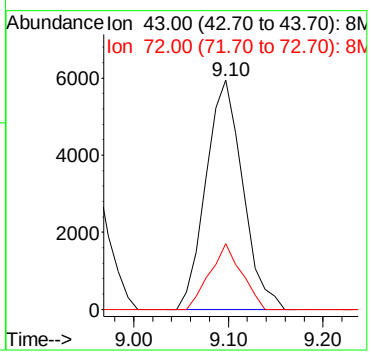


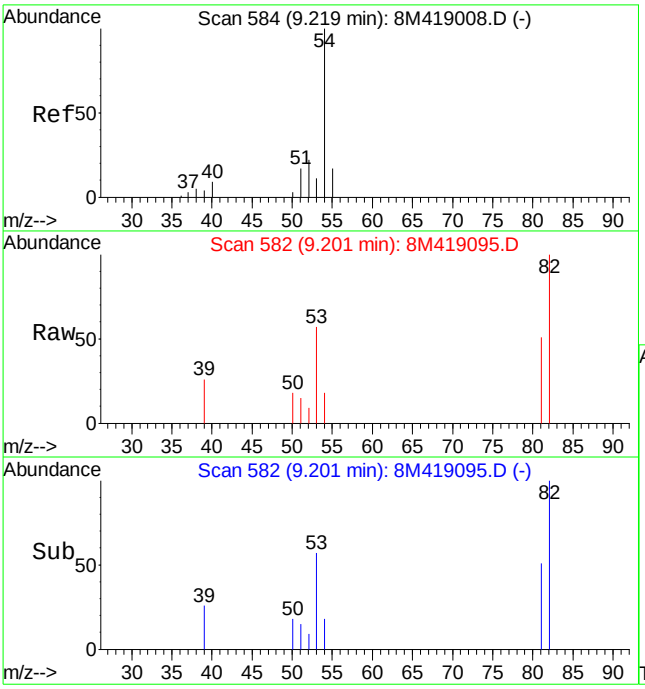


#29
2-Butanone
Concen: 8.49 ug/L
RT: 9.10 min Scan# 572
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 43 Resp: 16027

Ion	Ratio	Lower	Upper
43	100		
72	24.6	18.4	42.8

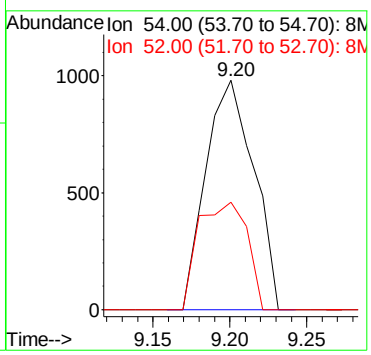


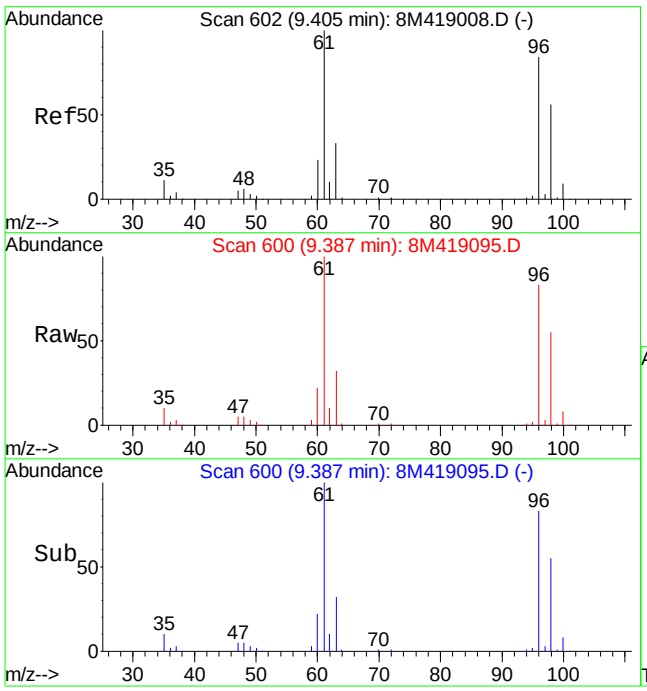


#30
Propionitrile
Concen: 3.63 ug/L
RT: 9.20 min Scan# 582
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 54 Resp: 2124

Ion	Ratio	Lower	Upper
54	100		
52	47.4	12.1	28.3#

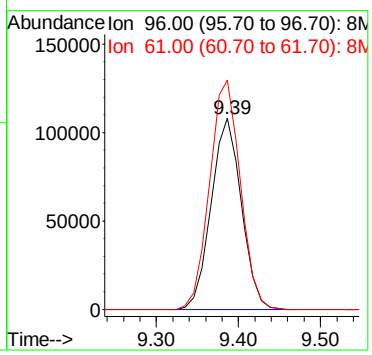


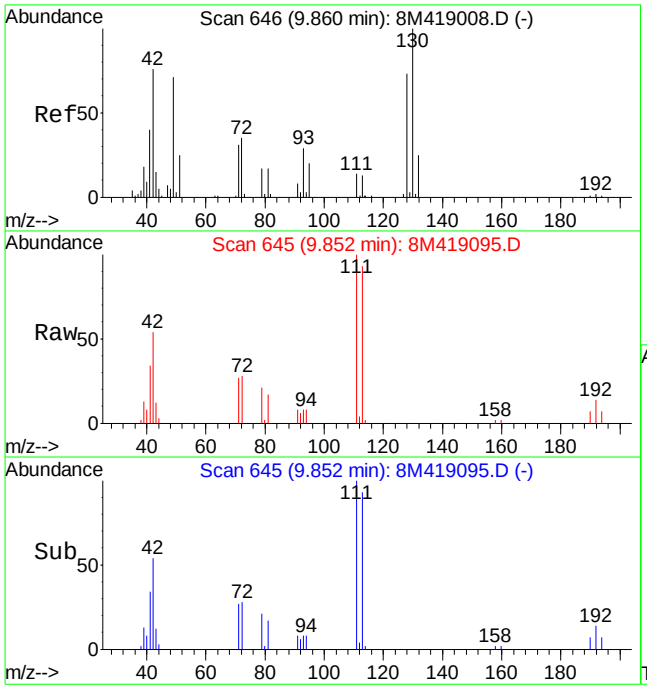


#32
cis-1,2-Dichloroethene
Concen: 27.70 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 96 Resp: 276130

Ion	Ratio	Lower	Upper
96	100		
61	121.9	80.3	187.3

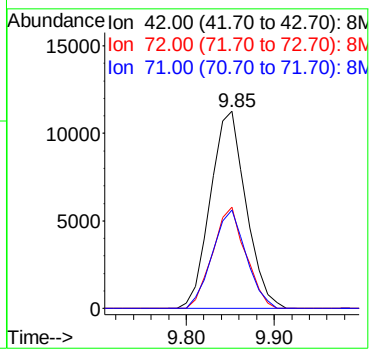


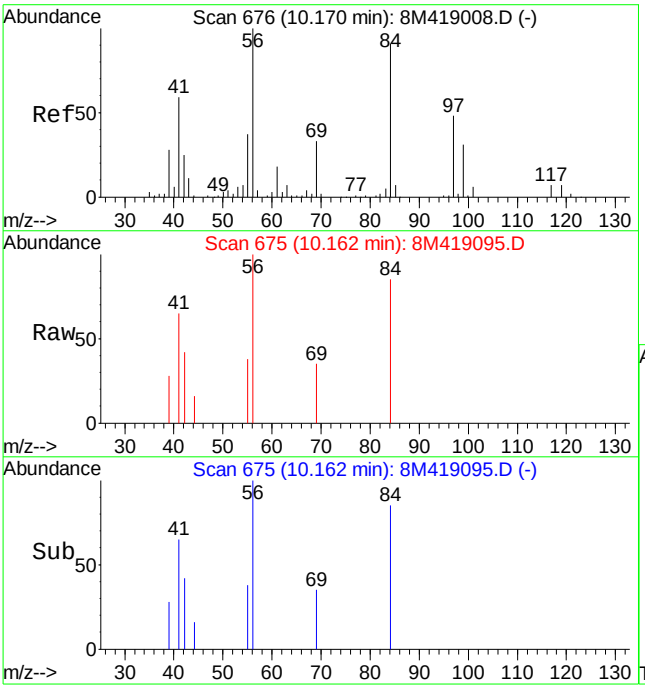


#36
Tetrahydrofuran
Concen: 24.34 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 42 Resp: 31633

Ion	Ratio	Lower	Upper
42	100		
72	47.6	32.9	76.9
71	47.3	32.1	74.9

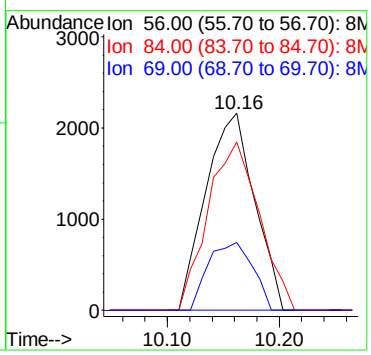


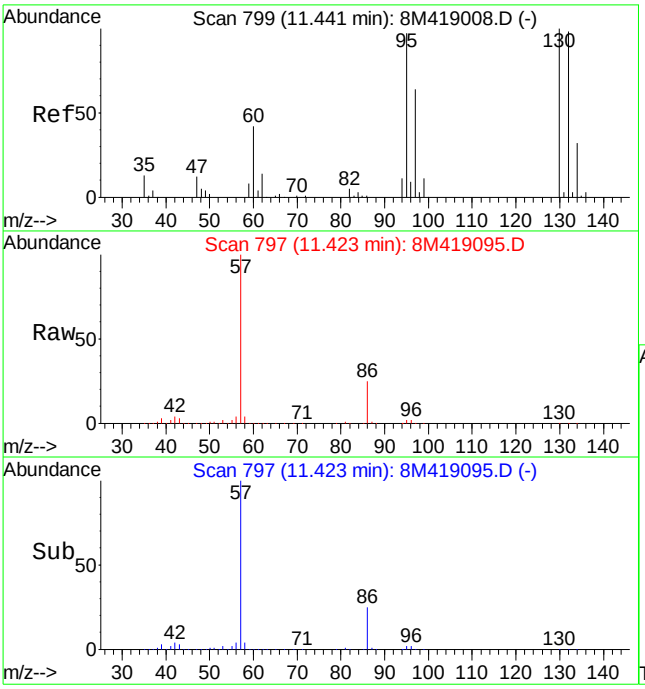


#39
Cyclohexane
Concen: 0.51 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 56 Resp: 6551

Ion	Ratio	Lower	Upper
56	100		
84	89.8	61.6	143.8
69	31.4	21.4	50.0

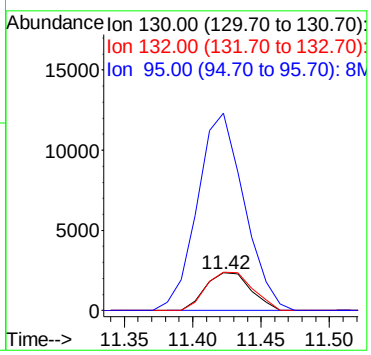


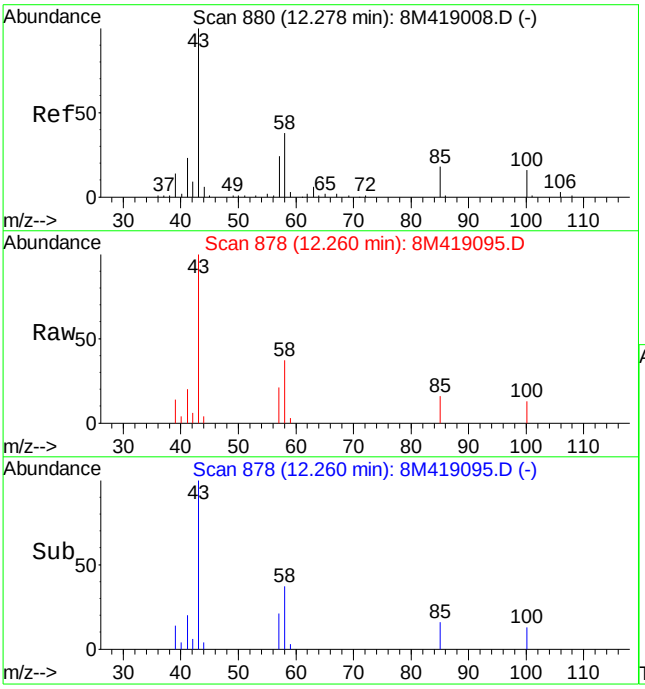


#47
Trichloroethene
Concen: 0.55 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion:130 Resp: 5434

Ion	Ratio	Lower	Upper
130	100		
132	103.7	59.4	138.6
95	539.7	60.1	140.3#

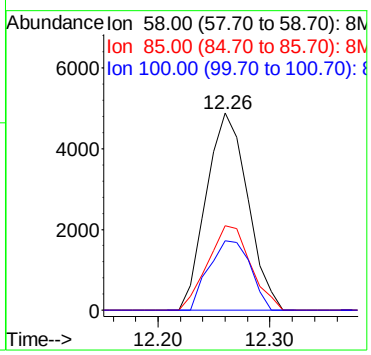


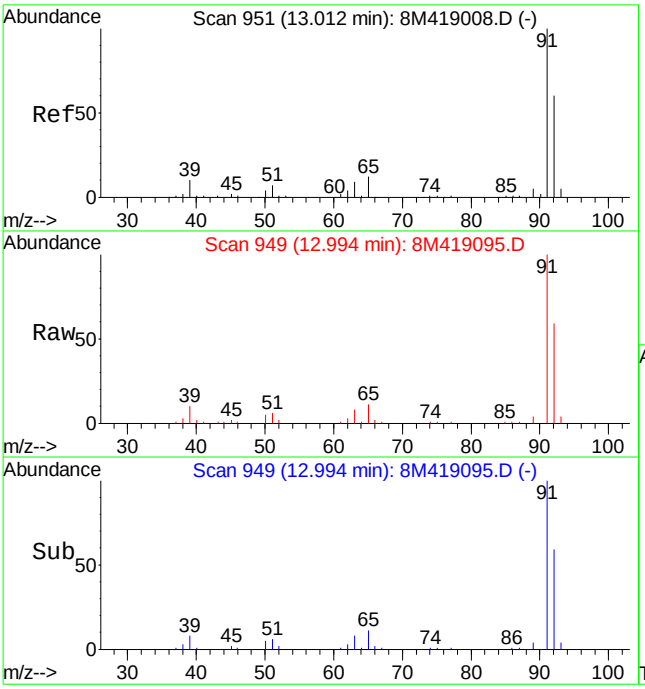


#54
4-Methyl-2-Pentanone
Concen: 7.52 ug/L
RT: 12.26 min Scan# 878
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 58 Resp: 12585

Ion	Ratio	Lower	Upper
58	100		
85	44.4	27.7	64.7
100	35.3	22.8	53.2

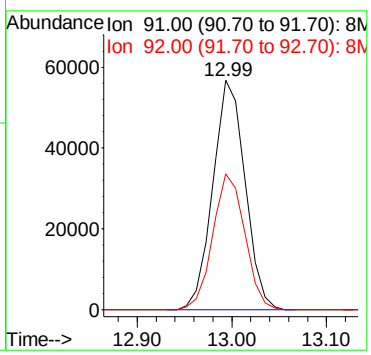


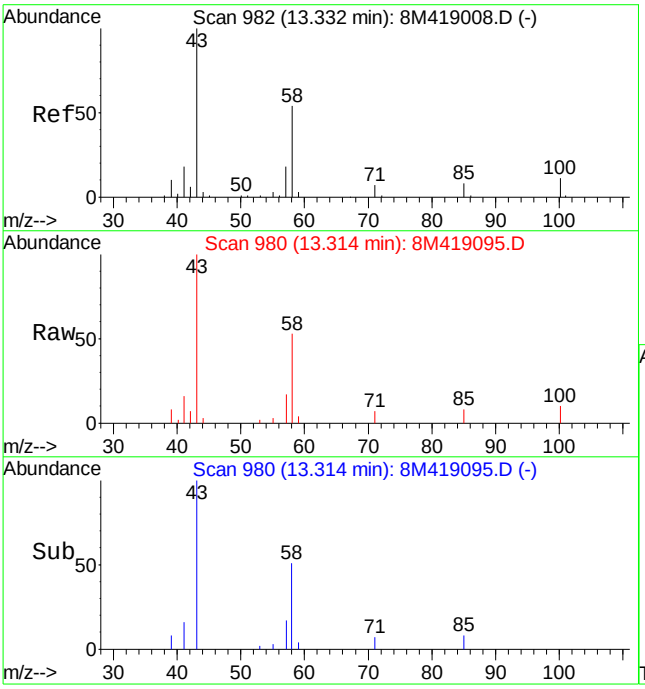


#59
Toluene
Concen: 3.50 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 91 Resp: 133559

Ion	Ratio	Lower	Upper
91	100		
92	58.7	35.9	83.7

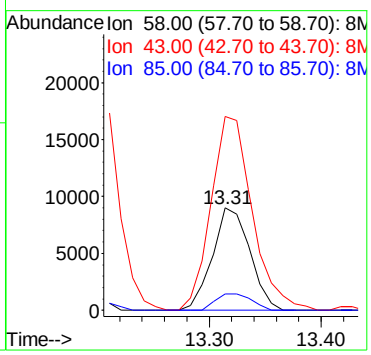


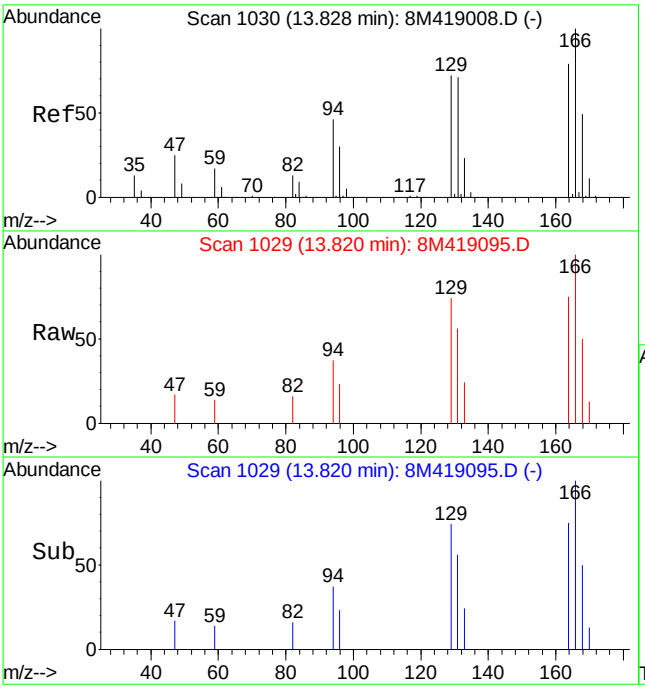


#64
2-Hexanone
Concen: 13.61 ug/L
RT: 13.31 min Scan# 980
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion: 58 Resp: 20955

Ion	Ratio	Lower	Upper
58	100		
43	207.8	101.8	237.4
85	15.4	10.2	23.8

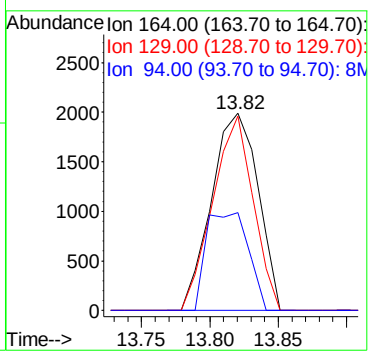


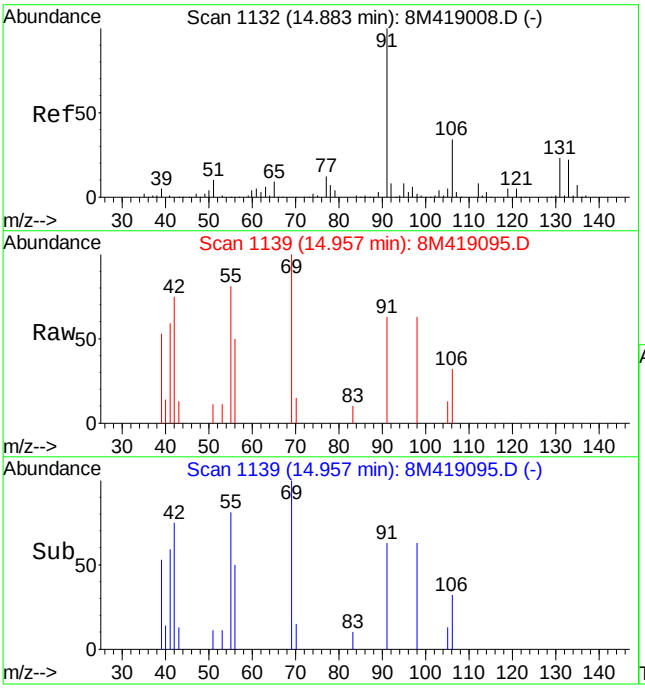


#66
Tetrachloroethene
Concen: 0.59 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion:164 Resp: 4700

Ion	Ratio	Lower	Upper
164	100		
129	85.6	53.4	124.6
94	45.0	34.7	81.1

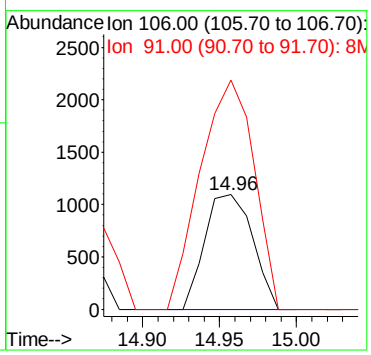


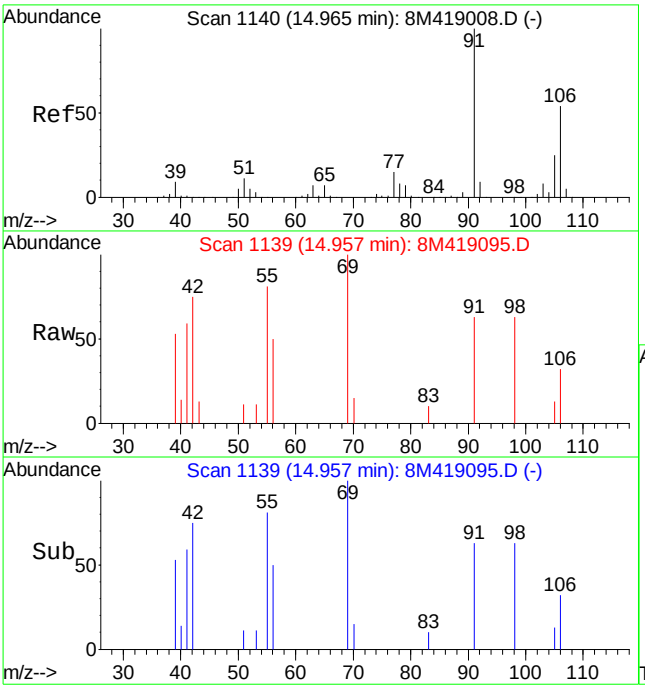


#72
Ethylbenzene
Concen: 0.16 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. 0.07 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion:106 Resp: 2378

Ion	Ratio	Lower	Upper
106	100		
91	223.7	179.2	418.2

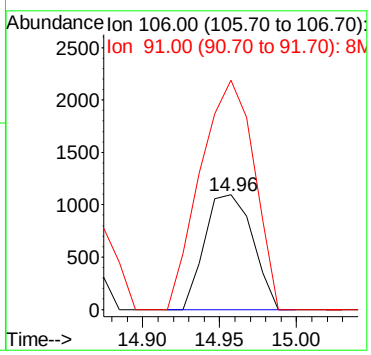


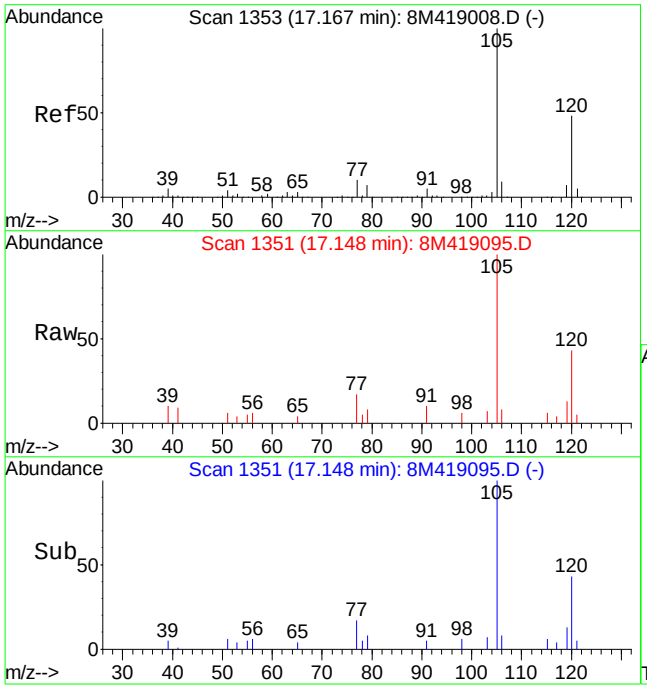


#73
m-,p-Xylene
Concen: 0.14 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion:106 Resp: 2378

Ion	Ratio	Lower	Upper
106	100		
91	223.7	113.4	264.6

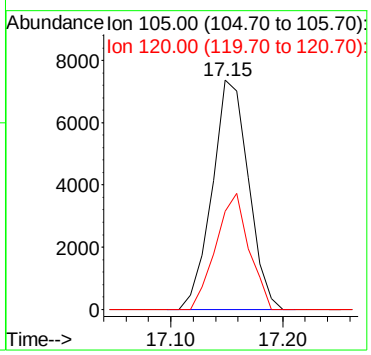




#90
1,2,4-Trimethylbenzene
Concen: 0.46 ug/L
RT: 17.15 min Scan# 1351
Delta R.T. -0.02 min
Lab File: 8M419095.D
Acq: 21 Apr 2017 16:33

Tgt Ion:105 Resp: 16600

Ion	Ratio	Lower	Upper
105	100		
120	46.1	32.2	75.2



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419092.D Vial: 6
Acq On : 21 Apr 2017 15:04 Operator: TMB
Sample : L17041069-08 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:36:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	869243	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	707056	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	376335	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	233816	25.6452 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.60%		
43) 1,2-Dichloroethane-d4	10.52	65	204124	25.8975 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.60%		
58) Toluene-d8	12.90	98	849931	26.3082 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.24%		
80) p-Bromofluorobenzene	16.29	95	337500	25.4103 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.64%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	267917	22.7753 ug/L	99
3) Chloromethane	3.80	50	301707	20.5153 ug/L	97
4) Vinyl Chloride	4.04	62	298335	21.4807 ug/L	98
5) 1,3-Butadiene	4.08	54	140384	21.9830 ug/L	96
6) Bromomethane	4.95	94	107455	24.4997 ug/L	99
7) Chloroethane	5.12	64	130698	21.5440 ug/L	96
8) Trichlorofluoromethane	5.60	101	305338	20.2416 ug/L	100
9) Diethyl ether	6.13	59	519203	91.3888 ug/L	91
10) Isoprene	6.17	67	244321	20.4850 ug/L	90
11) Acrolein	6.37	56	77382	98.3498 ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	184359	21.4326 ug/L	98
13) Acetone	6.46	43	37244	30.4646 ug/L	97
14) 1,1-Dichloroethene	6.69	61	233232	18.5269 ug/L	97
15) Tert-Butyl Alcohol	6.80	59	78465	197.9990 ug/L	98
16) Dimethyl Sulfide	6.96	62	182016	21.7070 ug/L	91
17) Iodomethane	7.21	142	85550	22.7475 ug/L	88
18) Methyl acetate	7.21	43	65158	19.4634 ug/L #	90
19) Methylene Chloride	7.47	84	170351	18.8299 ug/L	86
20) Carbon Disulfide	7.52	76	444067	16.9652 ug/L	100
21) Acrylonitrile	7.66	53	33439	19.7185 ug/L	99
22) Methyl Tert Butyl Ether	7.68	73	353985	19.8587 ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	228141	18.6272 ug/L	97
24) n-Hexane	8.00	57	206603	20.2088 ug/L	89
25) Diisopropyl ether	8.34	45	2678923	97.7192 ug/L	96
26) Vinyl Acetate	8.51	43	257043	20.9054 ug/L	95
27) 1,1-Dichloroethane	8.55	63	296126	18.7861 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2201517	94.4275 ug/L	98
29) 2-Butanone	9.10	43	55651	29.0275 ug/L	93
30) Propionitrile	9.20	54	62359	104.9445 ug/L	99
31) 2,2-Dichloropropane	9.32	77	268275	20.1608 ug/L	99
32) cis-1,2-Dichloroethene	9.38	96	435165	42.9862 ug/L	97
33) Chloroform	9.59	83	311298	17.8235 ug/L	99
34) 1-Bromopropane	9.73	122	48607	24.3394 ug/L	99
35) Bromochloromethane	9.83	130	110014	20.1392 ug/L	95
36) Tetrahydrofuran	9.85	42	162596	123.2034 ug/L	87
38) 1,1,1-Trichloroethane	10.12	97	279269	19.8132 ug/L	100
39) Cyclohexane	10.16	56	236175	17.9970 ug/L	92
40) 1,1-Dichloropropene	10.31	75	230931	18.7645 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	2083692	99.8088 ug/L	98
42) Carbon Tetrachloride	10.47	117	262246	20.0657 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419092.D 8260WT.M Mon Apr 24 08:46:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419092.D Vial: 6
Acq On : 21 Apr 2017 15:04 Operator: TMB
Sample : L17041069-08 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:36:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

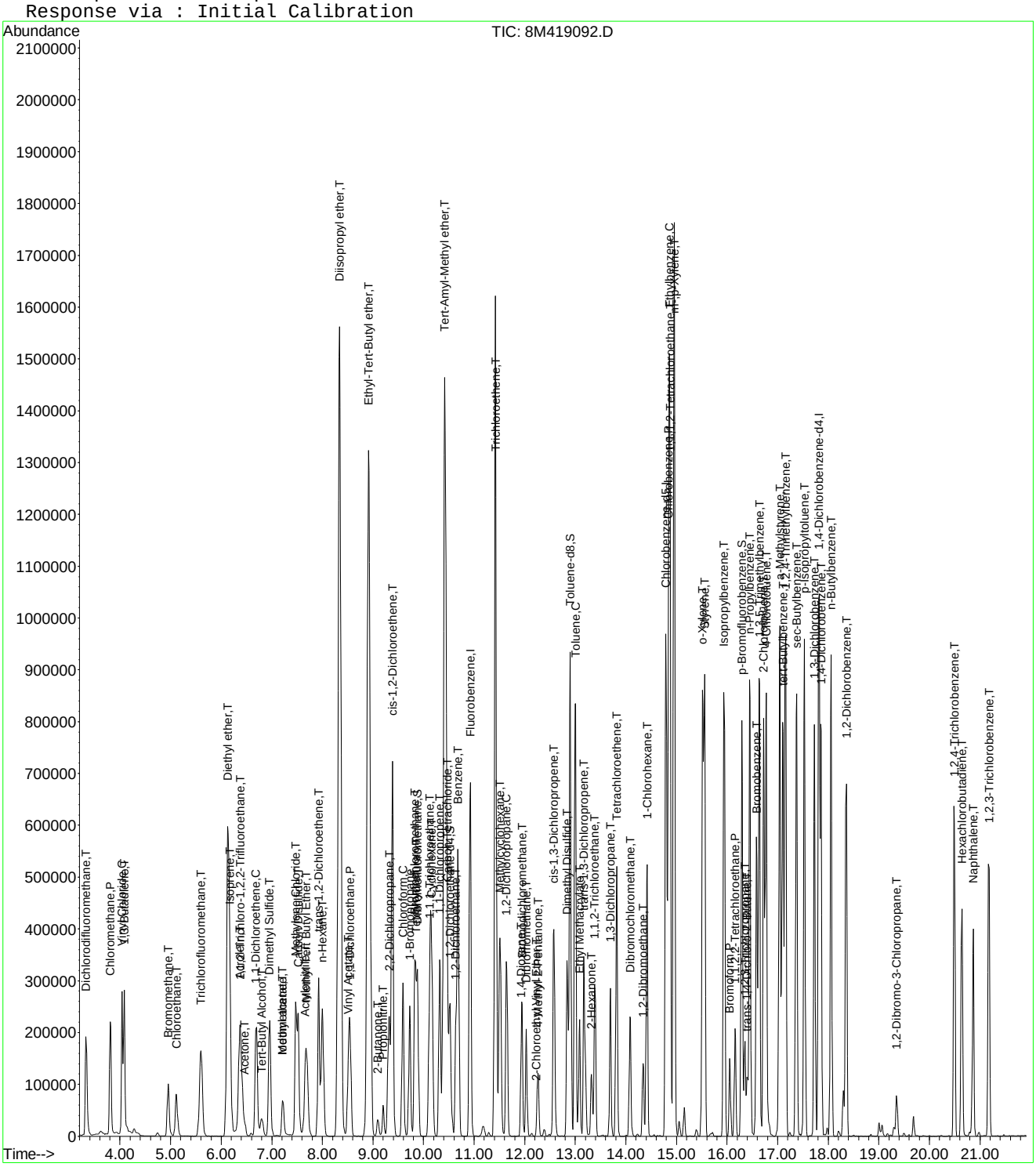
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	191222	19.3618	ug/L		97
46)	Benzene	10.68	78	676861	18.8489	ug/L		96
47)	Trichloroethene	11.43	130	201102	19.9355	ug/L		97
48)	Methylcyclohexane	11.51	83	259047	19.2642	ug/L		94
49)	1,2-Dichloropropane	11.64	63	164595	18.7667	ug/L		95
50)	Bromodichloromethane	11.95	83	218581	19.0438	ug/L		98
51)	1,4-Dioxane	11.93	88	10591	211.7972	ug/L		87
52)	Dibromomethane	12.03	93	89687	19.8705	ug/L		95
53)	2-Chloroethyl Vinyl Ether	12.23	63	2466	0.6498	ug/L	#	45
54)	4-Methyl-2-Pentanone	12.26	58	47480	27.9323	ug/L		99
55)	cis-1,3-Dichloropropene	12.58	75	271626	20.7801	ug/L		98
56)	Dimethyl Disulfide	12.84	79	134765	19.8650	ug/L		89
59)	Toluene	13.00	91	868352	22.0633	ug/L		99
60)	Ethyl Methacrylate	13.08	69	167999	22.6253	ug/L		89
62)	trans-1,3-Dichloropropene	13.17	75	214328	18.7778	ug/L		99
63)	1,1,2-Trichloroethane	13.38	97	122783	18.9621	ug/L		94
64)	2-Hexanone	13.32	58	55287	34.7915	ug/L		80
65)	1,3-Dichloropropane	13.69	76	211454	19.3173	ug/L		87
66)	Tetrachloroethene	13.82	164	166526	20.1432	ug/L		97
67)	Dibromochloromethane	14.09	129	160670	19.3096	ug/L		99
68)	1,2-Dibromoethane	14.34	107	121686	19.2390	ug/L		100
69)	1-Chlorohexane	14.42	91	260092	20.8877	ug/L		95
70)	Chlorobenzene	14.84	112	506982	18.0965	ug/L		96
71)	1,1,1,2-Tetrachloroethane	14.87	131	189893	19.0999	ug/L		100
72)	Ethylbenzene	14.86	106	280113	17.8520	ug/L		92
73)	m-,p-Xylene	14.96	106	694167	38.2017	ug/L		95
74)	o-Xylene	15.51	106	334248	18.2961	ug/L		98
75)	Styrene	15.55	104	571661	19.9594	ug/L		95
76)	Bromoform	16.05	173	94835	16.8481	ug/L		99
77)	Isopropylbenzene	15.94	105	829819	18.9705	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.15	83	136408	19.2097	ug/L		97
81)	1,2,3-Trichloropropane	16.35	110	40590	19.9383	ug/L		66
82)	trans-1,4-Dichloro-2-Buten	16.39	53	28120	16.7535	ug/L		92
83)	n-Propylbenzene	16.44	91	996914	18.9264	ug/L		99
84)	Bromobenzene	16.59	156	233427	18.9138	ug/L		96
85)	1,3,5-Trimethylbenzene	16.64	105	735142	19.2752	ug/L		98
86)	2-Chlorotoluene	16.72	91	612239	17.0257	ug/L		93
87)	4-Chlorotoluene	16.77	91	633359	19.5442	ug/L		98
88)	a-Methylstyrene	17.04	118	438163	20.4920	ug/L		99
89)	tert-Butylbenzene	17.11	134	156239	18.0934	ug/L		93
90)	1,2,4-Trimethylbenzene	17.16	105	770804	19.7964	ug/L		98
91)	sec-Butylbenzene	17.37	105	896109	18.7591	ug/L		100
92)	p-Isopropyltoluene	17.53	119	785951	19.5394	ug/L		98
93)	1,3-Dichlorobenzene	17.73	146	444128	18.5658	ug/L		97
94)	1,4-Dichlorobenzene	17.86	146	445648	18.3240	ug/L		99
95)	n-Butylbenzene	18.06	91	715242	19.7396	ug/L		98
96)	1,2-Dichlorobenzene	18.36	146	395071	18.7997	ug/L		97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	21670	18.7509	ug/L		92
98)	1,2,4-Trichlorobenzene	20.50	180	279328	19.7428	ug/L		100
99)	Hexachlorobutadiene	20.64	225	122515	18.6088	ug/L		100
100)	Naphthalene	20.87	128	420002	20.7731	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	229373	19.5224	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419092.D 8260WT.M Mon Apr 24 08:46:10 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419092.D Vial: 6
Acq On : 21 Apr 2017 15:04 Operator: TMB
Sample : L17041069-08 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:36 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419093.D Vial: 7
Acq On : 21 Apr 2017 15:34 Operator: TMB
Sample : L17041069-09 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:56:08 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	887551	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	716968	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	383625	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	239352	25.7109	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.84%			
43) 1,2-Dichloroethane-d4	10.51	65	207912	25.8340	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.32%			
58) Toluene-d8	12.89	98	864268	26.3822	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%			
80) p-Bromofluorobenzene	16.29	95	341373	25.2135	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.84%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	268594	22.3619	ug/L	99
3) Chloromethane	3.81	50	296933	19.7742	ug/L	97
4) Vinyl Chloride	4.04	62	292691	20.6396	ug/L	99
5) 1,3-Butadiene	4.09	54	138785	21.0680	ug/L	96
6) Bromomethane	4.95	94	113381	25.2018	ug/L	100
7) Chloroethane	5.11	64	128966	20.8200	ug/L	97
8) Trichlorofluoromethane	5.60	101	303373	19.6965	ug/L	100
9) Diethyl ether	6.12	59	522880	90.1375	ug/L	91
10) Isoprene	6.16	67	243924	20.0299	ug/L	90
11) Acrolein	6.36	56	76719	95.4958	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	182038	20.7262	ug/L	95
13) Acetone	6.46	43	35711	28.6081	ug/L	98
14) 1,1-Dichloroethene	6.69	61	235048	18.2860	ug/L	96
15) Tert-Butyl Alcohol	6.79	59	74343	183.7279	ug/L	100
16) Dimethyl Sulfide	6.96	62	181118	21.1544	ug/L	89
17) Iodomethane	7.22	142	70091	18.2525	ug/L	96
18) Methyl acetate	7.22	43	64657	18.9153	ug/L #	82
19) Methylene Chloride	7.48	84	172489	18.6730	ug/L	86
20) Carbon Disulfide	7.52	76	446462	16.7048	ug/L	100
21) Acrylonitrile	7.65	53	32773	18.9271	ug/L	100
22) Methyl Tert Butyl Ether	7.68	73	351062	19.2885	ug/L	95
23) trans-1,2-Dichloroethene	7.92	61	230204	18.4079	ug/L	96
24) n-Hexane	8.00	57	208007	19.9264	ug/L	90
25) Diisopropyl ether	8.33	45	2715193	96.9993	ug/L	96
26) Vinyl Acetate	8.51	43	256950	20.4668	ug/L	94
27) 1,1-Dichloroethane	8.54	63	298075	18.5197	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2203771	92.5743	ug/L	98
29) 2-Butanone	9.09	43	54048	27.6099	ug/L	92
30) Propionitrile	9.20	54	60551	99.7999	ug/L	100
31) 2,2-Dichloropropane	9.32	77	267510	19.6886	ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	428862	41.4897	ug/L	98
33) Chloroform	9.59	83	315101	17.6690	ug/L	98
34) 1-Bromopropane	9.73	122	49671	24.3592	ug/L	99
35) Bromochloromethane	9.82	130	110803	19.8652	ug/L	96
36) Tetrahydrofuran	9.84	42	159122	118.0839	ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	283212	19.6785	ug/L	99
39) Cyclohexane	10.15	56	239795	17.8959	ug/L	90
40) 1,1-Dichloropropene	10.32	75	229308	18.2483	ug/L	97
41) Tert-Amyl-Methyl ether	10.42	73	2089742	98.0338	ug/L	98
42) Carbon Tetrachloride	10.46	117	260932	19.5534	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419093.D 8260WT.M Mon Apr 24 08:46:13 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419093.D Vial: 7
Acq On : 21 Apr 2017 15:34 Operator: TMB
Sample : L17041069-09 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:56:08 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

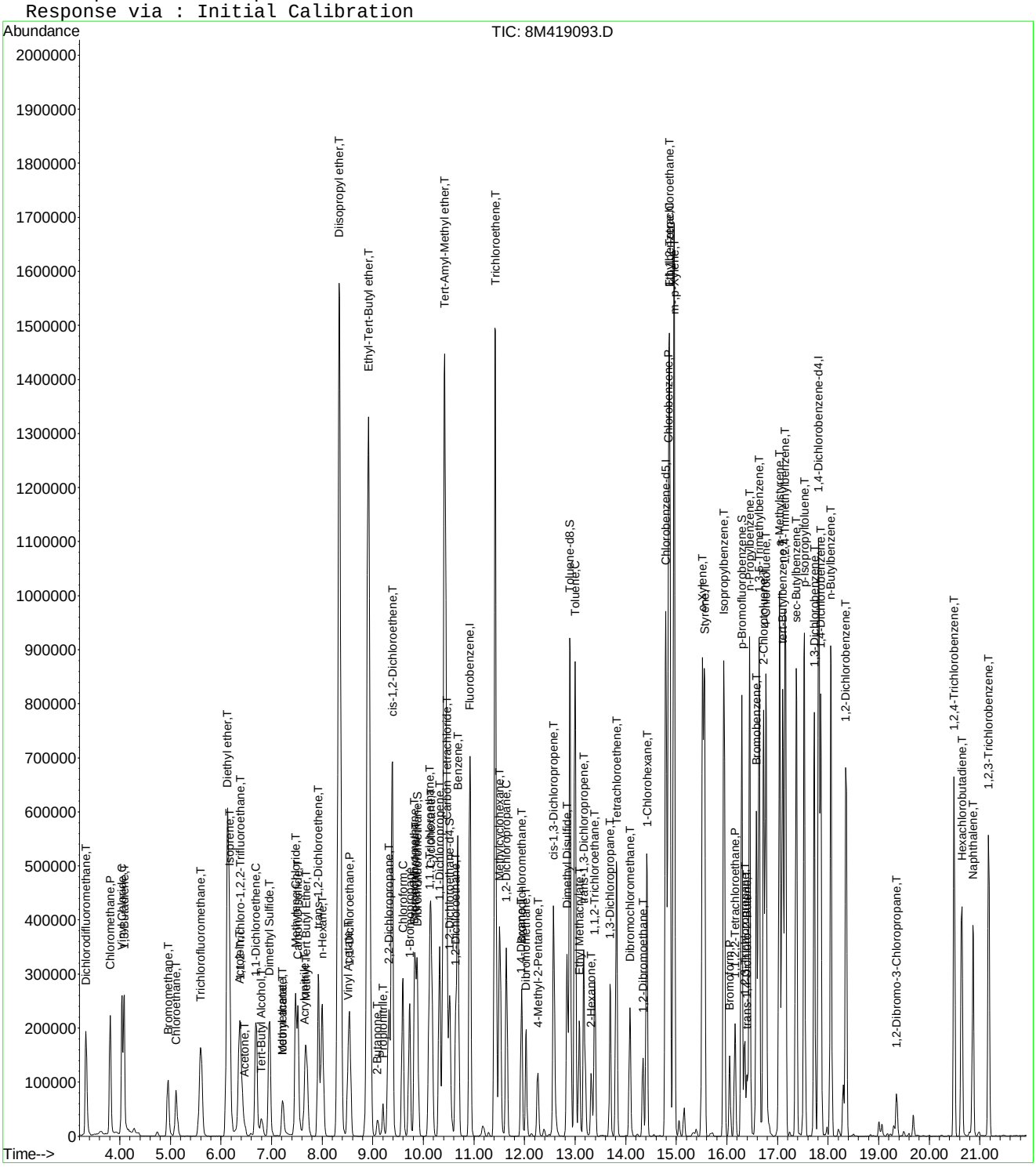
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	192532	19.0924	ug/L	97
46)	Benzene	10.68	78	685357	18.6918	ug/L	96
47)	Trichloroethene	11.42	130	203138	19.7219	ug/L	98
48)	Methylcyclohexane	11.51	83	262800	19.1402	ug/L	96
49)	1,2-Dichloropropane	11.64	63	164333	18.3503	ug/L	95
50)	Bromodichloromethane	11.94	83	220349	18.8019	ug/L	98
51)	1,4-Dioxane	11.93	88	9843	192.7785	ug/L	85
52)	Dibromomethane	12.02	93	89496	19.4191	ug/L	96
54)	4-Methyl-2-Pentanone	12.26	58	44946	25.8962	ug/L	96
55)	cis-1,3-Dichloropropene	12.57	75	271920	20.3735	ug/L	99
56)	Dimethyl Disulfide	12.84	79	131300	19.0973	ug/L	86
59)	Toluene	13.00	91	866860	21.7209	ug/L	99
60)	Ethyl Methacrylate	13.08	69	161628	21.4664	ug/L	87
62)	trans-1,3-Dichloropropene	13.17	75	213751	18.4683	ug/L	100
63)	1,1,2-Trichloroethane	13.39	97	117804	17.9417	ug/L	97
64)	2-Hexanone	13.32	58	53617	33.2741	ug/L	84
65)	1,3-Dichloropropane	13.69	76	211369	19.0426	ug/L	88
66)	Tetrachloroethene	13.82	164	170139	20.2957	ug/L	97
67)	Dibromochloromethane	14.08	129	159022	18.8473	ug/L	98
68)	1,2-Dibromoethane	14.34	107	119847	18.6863	ug/L	100
69)	1-Chlorohexane	14.42	91	258309	20.4577	ug/L	95
70)	Chlorobenzene	14.85	112	506927	17.8444	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.87	131	188477	18.6954	ug/L	100
72)	Ethylbenzene	14.87	106	286968	18.0361	ug/L	95
73)	m-,p-Xylene	14.96	106	695550	37.7486	ug/L	95
74)	o-Xylene	15.52	106	337299	18.2079	ug/L	100
75)	Styrene	15.56	104	572606	19.7160	ug/L	96
76)	Bromoform	16.05	173	93579	16.4105	ug/L	99
77)	Isopropylbenzene	15.94	105	843325	19.0127	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.16	83	134555	18.5887	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	39831	19.1937	ug/L	78
82)	trans-1,4-Dichloro-2-Buten	16.40	53	30791	17.9496	ug/L	90
83)	n-Propylbenzene	16.45	91	1000506	18.6337	ug/L	99
84)	Bromobenzene	16.58	156	231479	18.3995	ug/L	98
85)	1,3,5-Trimethylbenzene	16.63	105	737086	18.9589	ug/L	98
86)	2-Chlorotoluene	16.73	91	642166	17.5186	ug/L	93
87)	4-Chlorotoluene	16.77	91	604430	18.2971	ug/L	99
88)	a-Methylstyrene	17.04	118	430639	19.7574	ug/L	98
89)	tert-Butylbenzene	17.10	134	156670	17.7986	ug/L	95
90)	1,2,4-Trimethylbenzene	17.15	105	768660	19.3662	ug/L	98
91)	sec-Butylbenzene	17.37	105	901102	18.5051	ug/L	100
92)	p-Isopropyltoluene	17.53	119	788291	19.2251	ug/L	98
93)	1,3-Dichlorobenzene	17.73	146	441523	18.1062	ug/L	97
94)	1,4-Dichlorobenzene	17.85	146	440672	17.7750	ug/L	100
95)	n-Butylbenzene	18.05	91	720184	19.4982	ug/L	99
96)	1,2-Dichlorobenzene	18.35	146	395207	18.4488	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	20754	17.6170	ug/L	88
98)	1,2,4-Trichlorobenzene	20.49	180	277255	19.2239	ug/L	100
99)	Hexachlorobutadiene	20.64	225	125456	18.6933	ug/L	99
100)	Naphthalene	20.86	128	419636	20.3606	ug/L	100
101)	1,2,3-Trichlorobenzene	21.17	180	229355	19.1499	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419093.D 8260WT.M Mon Apr 24 08:46:13 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419093.D Vial: 7
Acq On : 21 Apr 2017 15:34 Operator: TMB
Sample : L17041069-09 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 15:56 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419093.D 8260WT.M Mon Apr 24 08:46:14 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419104.D Vial: 18
Acq On : 21 Apr 2017 21:03 Operator: TMB
Sample : L17041069-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 21:25:47 2017 Quant Results File: 8260WT.RES

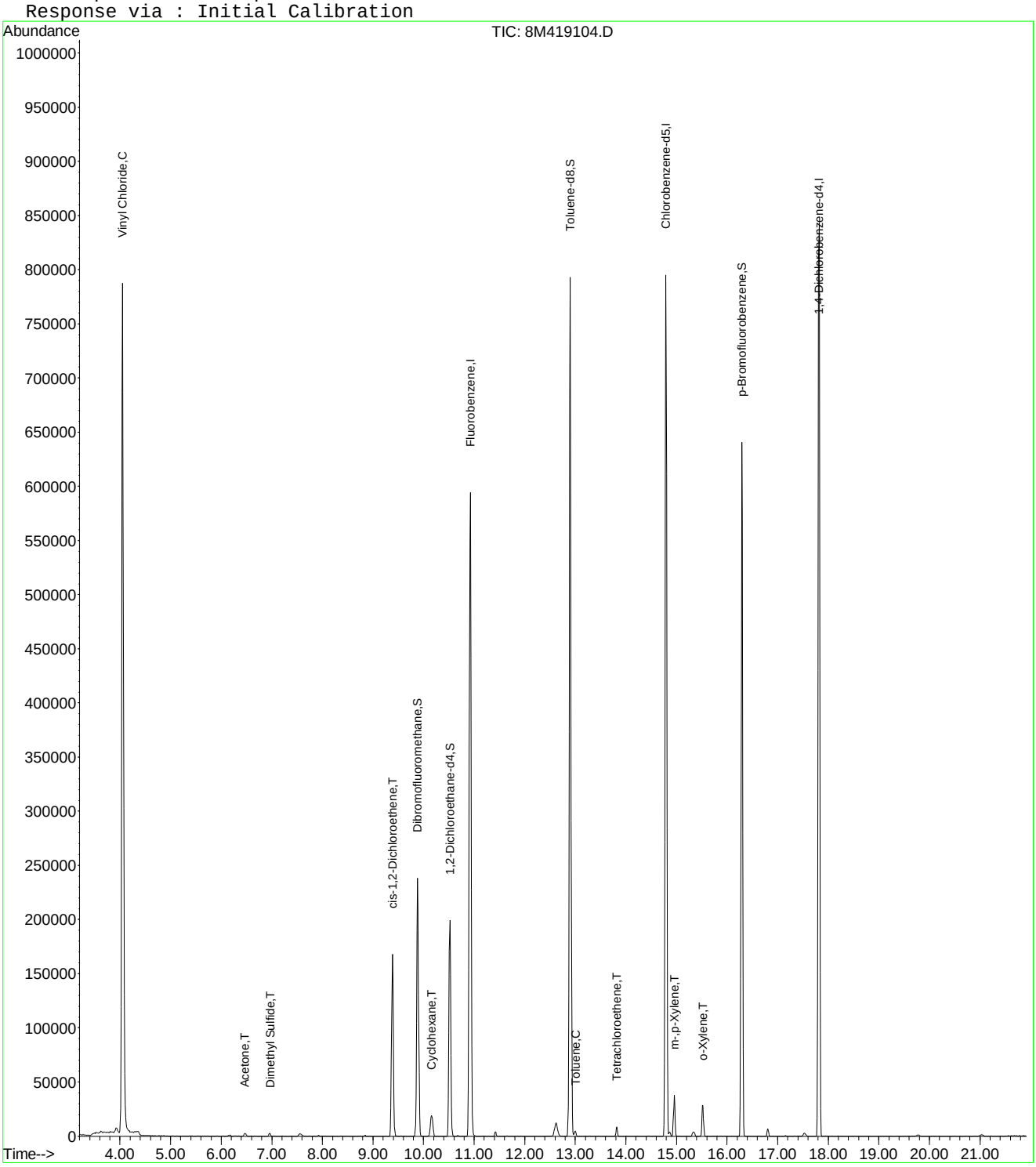
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

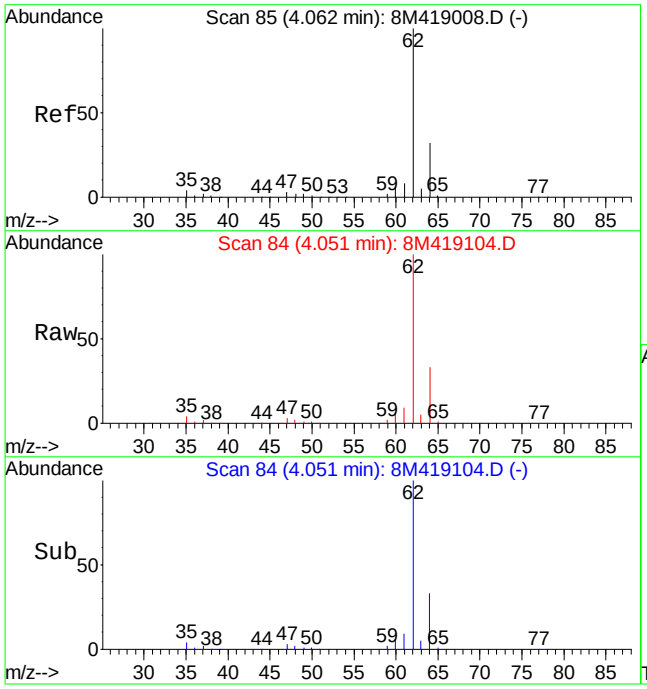
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	746294	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	588709	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	297989	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	198390	25.3445 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.36%		
43) 1,2-Dichloroethane-d4	10.52	65	171911	25.4038 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.60%		
58) Toluene-d8	12.90	98	713343	26.5191 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%		
80) p-Bromofluorobenzene	16.29	95	276323	26.2741 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.08%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	1140923	95.6821 ug/L	99
13) Acetone	6.47	43	5046	4.8075 ug/L #	77
16) Dimethyl Sulfide	6.97	62	1924	0.2673 ug/L	98
32) cis-1,2-Dichloroethene	9.38	96	97910	11.2651 ug/L	90
39) Cyclohexane	10.16	56	15217	1.3506 ug/L	89
59) Toluene	13.00	91	6442	0.1966 ug/L	90
66) Tetrachloroethene	13.82	164	2903	0.4217 ug/L	92
73) m-,p-Xylene	14.96	106	14988	0.9906 ug/L	97
74) o-Xylene	15.52	106	12446	0.8182 ug/L	95

(#) = qualifier out of range (m) = manual integration
8M419104.D 8260WT.M Mon Apr 24 08:48:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419104.D Vial: 18
Acq On : 21 Apr 2017 21:03 Operator: TMB
Sample : L17041069-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 21:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

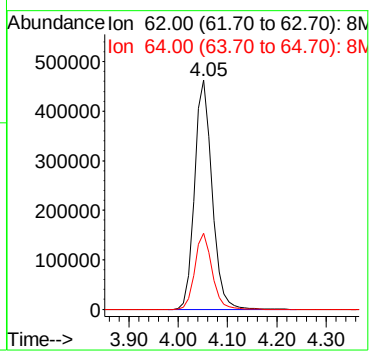


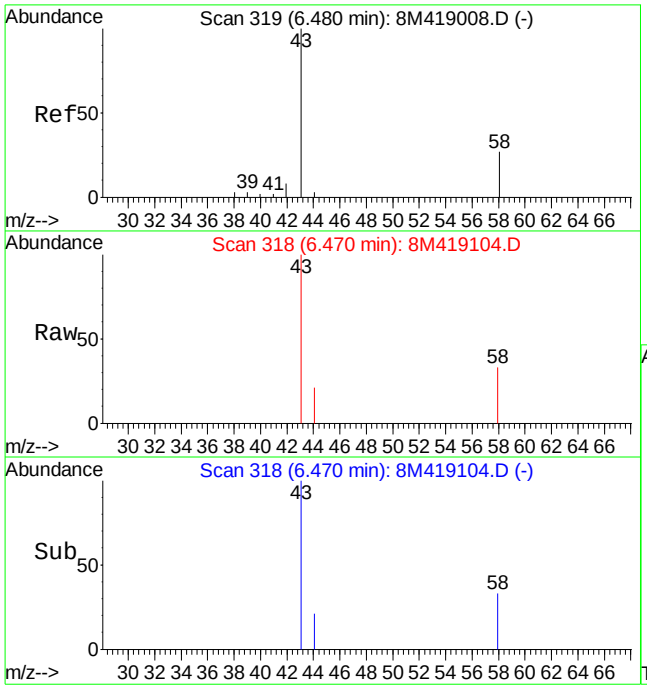


#4
Vinyl Chloride
Concen: 95.68 ug/L
RT: 4.05 min Scan# 84
Delta R.T. -0.00 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 62 Resp: 1140923

Ion	Ratio	Lower	Upper
62	100		
64	32.6	19.9	46.3

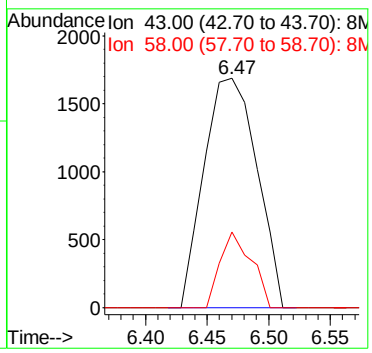


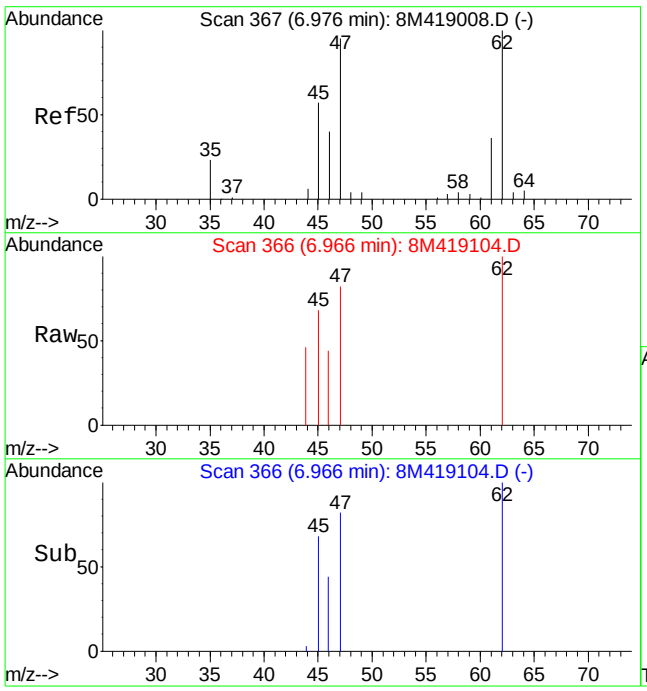


#13
Acetone
Concen: 4.81 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 43 Resp: 5046

Ion	Ratio	Lower	Upper
43	100		
58	19.4	19.4	45.4#

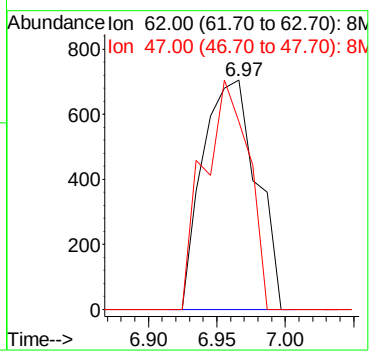


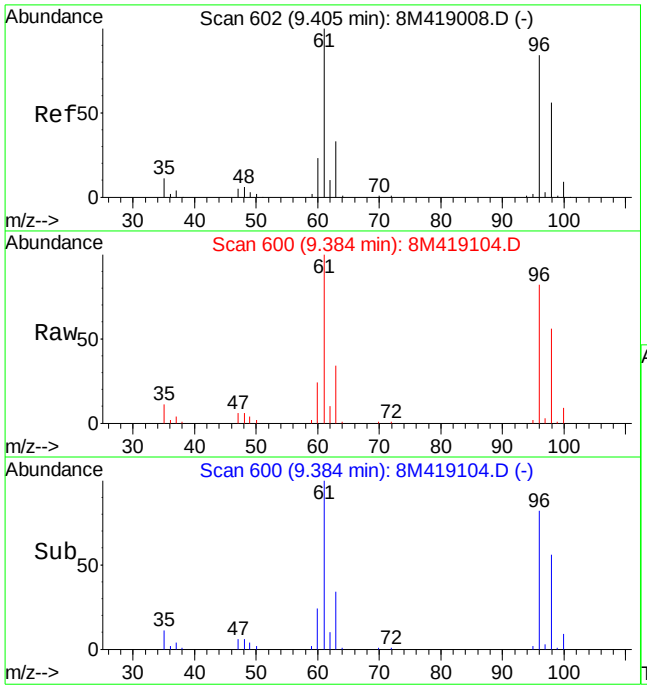


#16
Dimethyl Sulfide
Concen: 0.27 ug/L
RT: 6.97 min Scan# 366
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 62 Resp: 1924

Ion	Ratio	Lower	Upper
62	100		
47	83.7	49.0	114.4

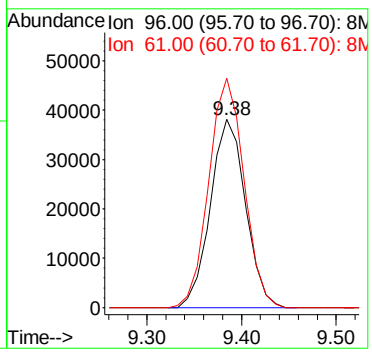


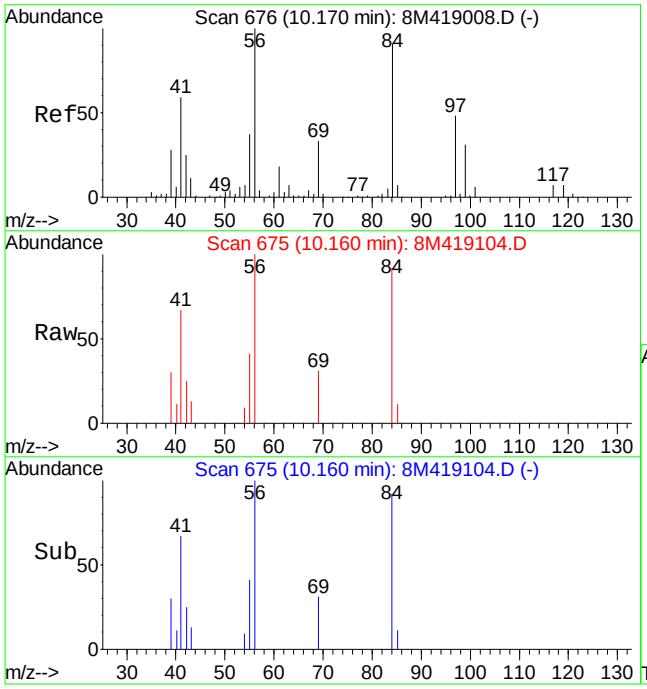


#32
cis-1,2-Dichloroethene
Concen: 11.27 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 96 Resp: 97910

Ion	Ratio	Lower	Upper
96	100		
61	122.0	80.3	187.3

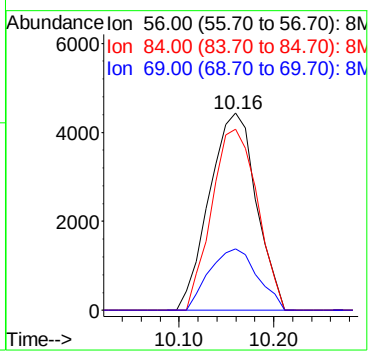


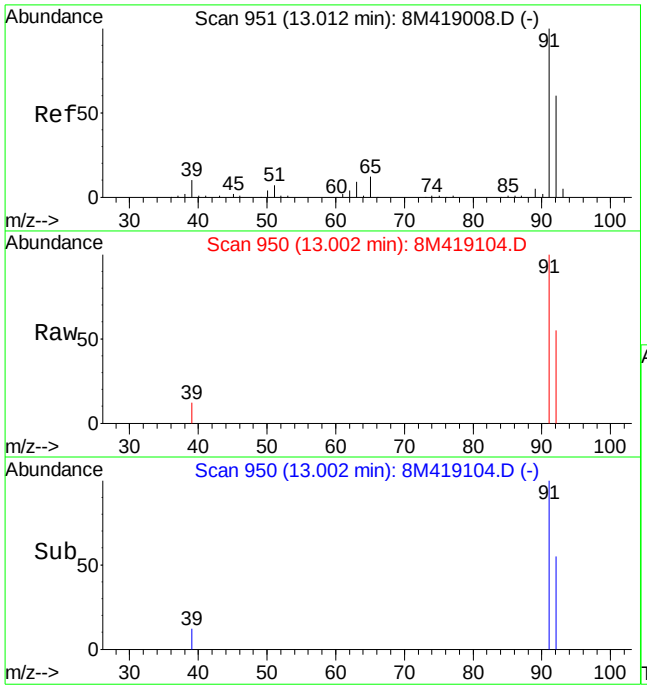


#39
Cyclohexane
Concen: 1.35 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 56 Resp: 15217

Ion	Ratio	Lower	Upper
56	100		
84	89.3	61.6	143.8
69	32.1	21.4	50.0

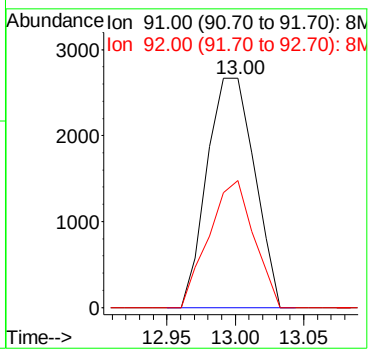


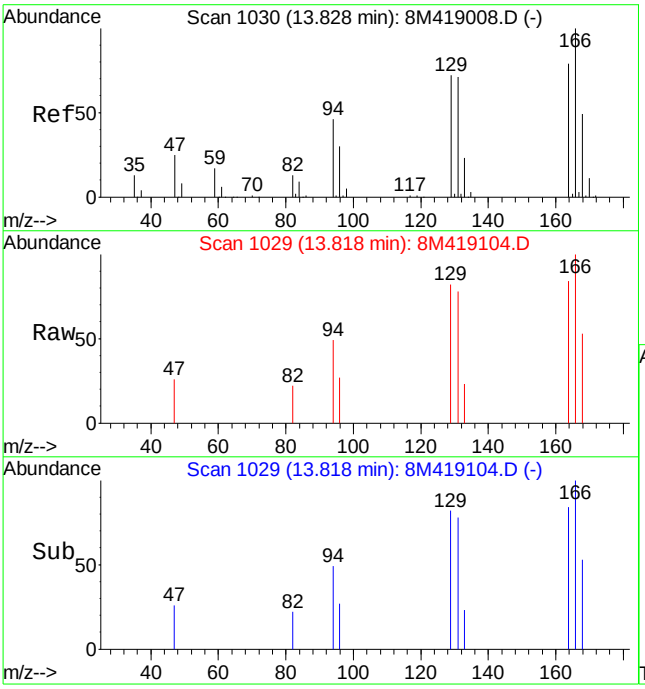


#59
Toluene
Concen: 0.20 ug/L
RT: 13.00 min Scan# 950
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion: 91 Resp: 6442

Ion	Ratio	Lower	Upper
91	100		
92	52.3	35.9	83.7

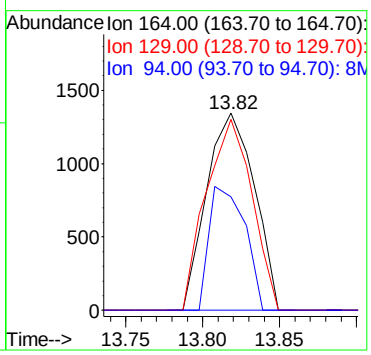


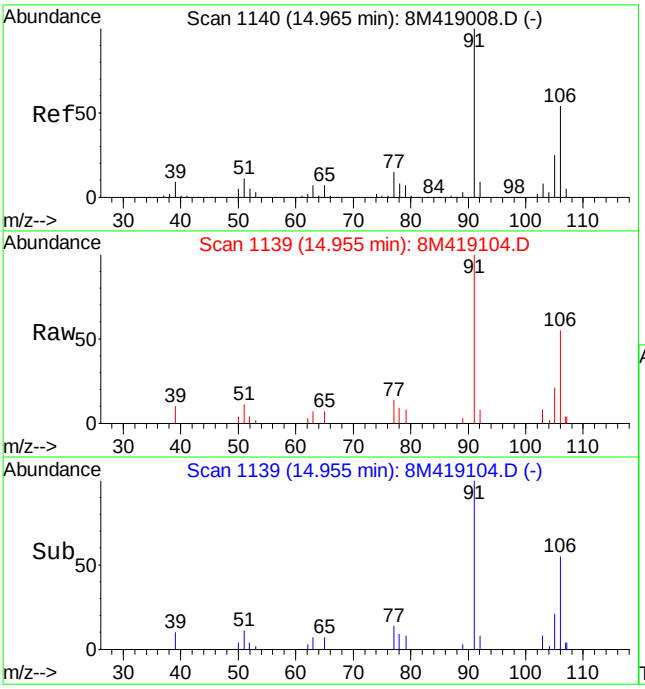


#66
Tetrachloroethene
Concen: 0.42 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion:164 Resp: 2903

Ion	Ratio	Lower	Upper
164	100		
129	92.9	53.4	124.6
94	46.9	34.7	81.1

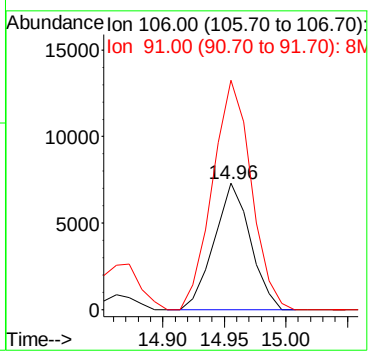


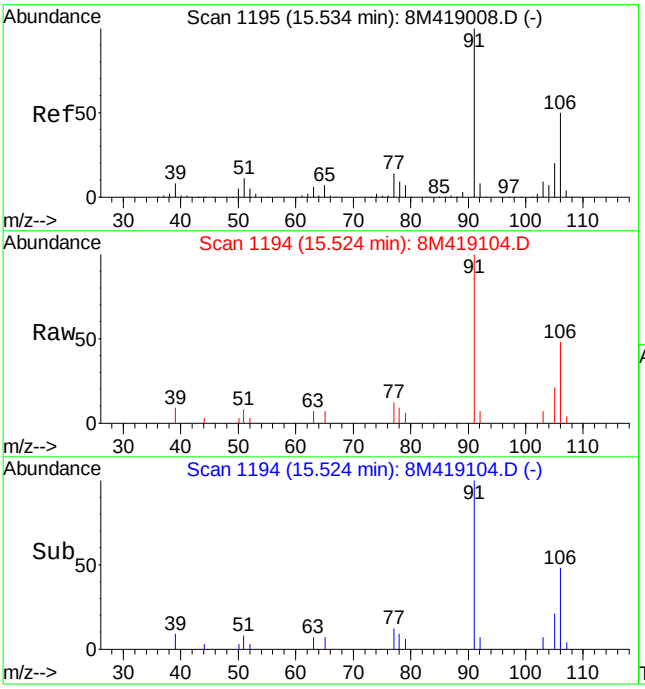


#73
m-,p-Xylene
Concen: 0.99 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion:106 Resp: 14988

Ion	Ratio	Lower	Upper
106	100		
91	193.6	113.4	264.6

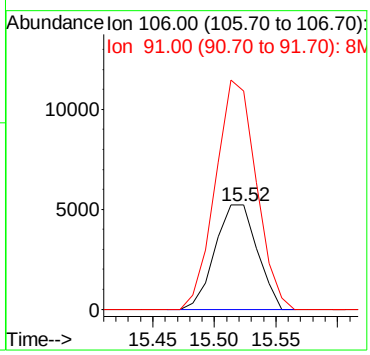




#74
o-Xylene
Concen: 0.82 ug/L
RT: 15.52 min Scan# 1194
Delta R.T. -0.00 min
Lab File: 8M419104.D
Acq: 21 Apr 2017 21:03

Tgt Ion:106 Resp: 12446

Ion	Ratio	Lower	Upper
106	100		
91	212.6	123.4	287.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419111.D Vial: 25
Acq On : 22 Apr 2017 00:33 Operator: TMB
Sample : L17041069-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 00:55:21 2017 Quant Results File: 8260WT.RES

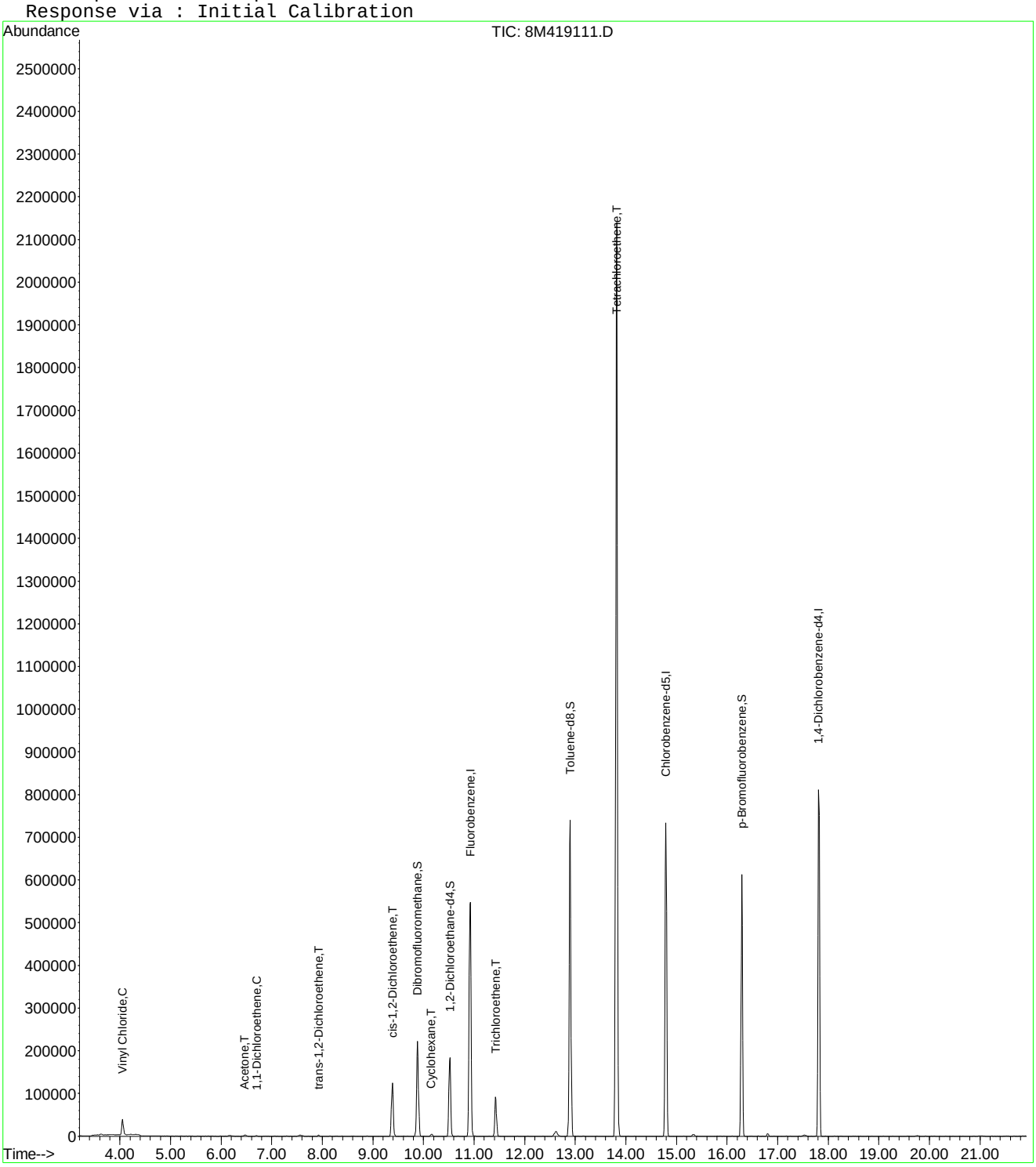
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

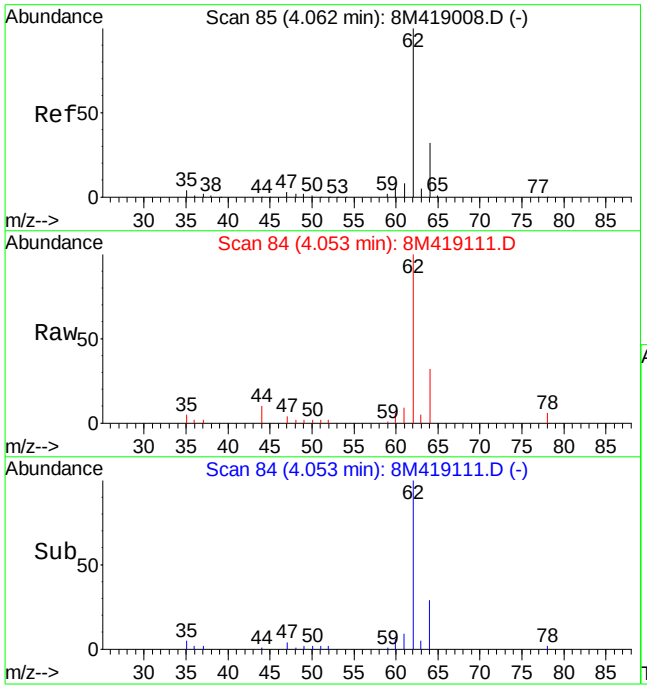
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	705591	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	552706	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	277315	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	187305	25.3087	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.52	65	160915	25.1506	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.60%			
58) Toluene-d8	12.90	98	673986	26.6882	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.76%			
80) p-Bromofluorobenzene	16.29	95	256684	26.2263	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.92%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	50292	4.4610	ug/L	96
13) Acetone	6.46	43	6328	6.3767	ug/L	88
14) 1,1-Dichloroethene	6.70	61	1912	0.1871	ug/L	71
23) trans-1,2-Dichloroethene	7.93	61	2174	0.2187	ug/L	78
32) cis-1,2-Dichloroethene	9.39	96	73498	8.9441	ug/L	91
39) Cyclohexane	10.15	56	3394	0.3186	ug/L	86
47) Trichloroethene	11.43	130	39666	4.8441	ug/L	98
66) Tetrachloroethene	13.82	164	665436	102.9704	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419111.D 8260WT.M Mon Apr 24 08:48:56 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419111.D Vial: 25
Acq On : 22 Apr 2017 00:33 Operator: TMB
Sample : L17041069-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 0:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

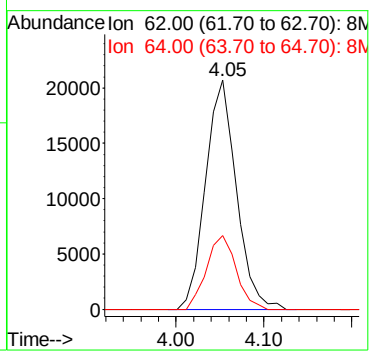


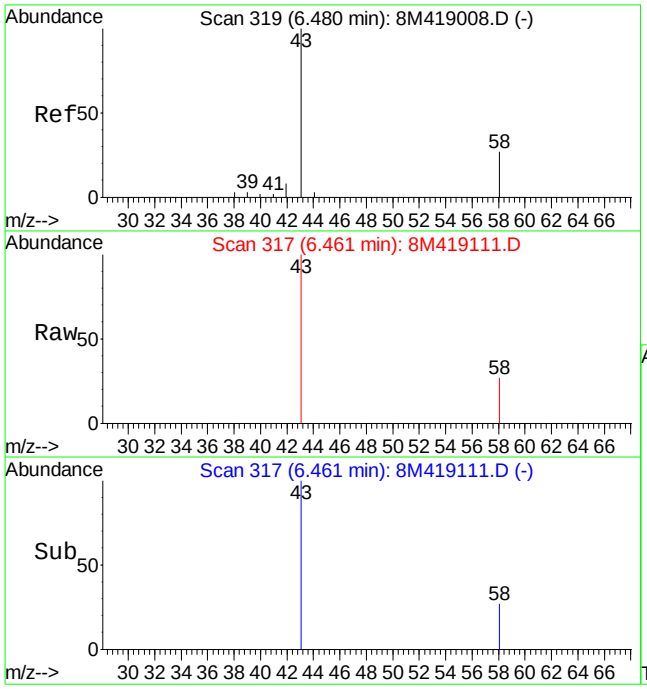


#4
Vinyl Chloride
Concen: 4.46 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 62 Resp: 50292

Ion	Ratio	Lower	Upper
62	100		
64	30.9	19.9	46.3

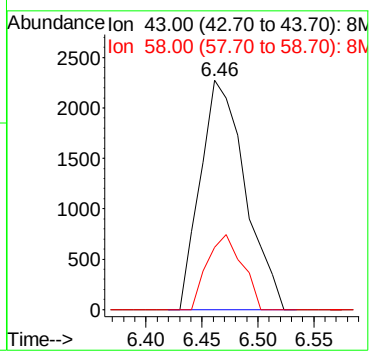


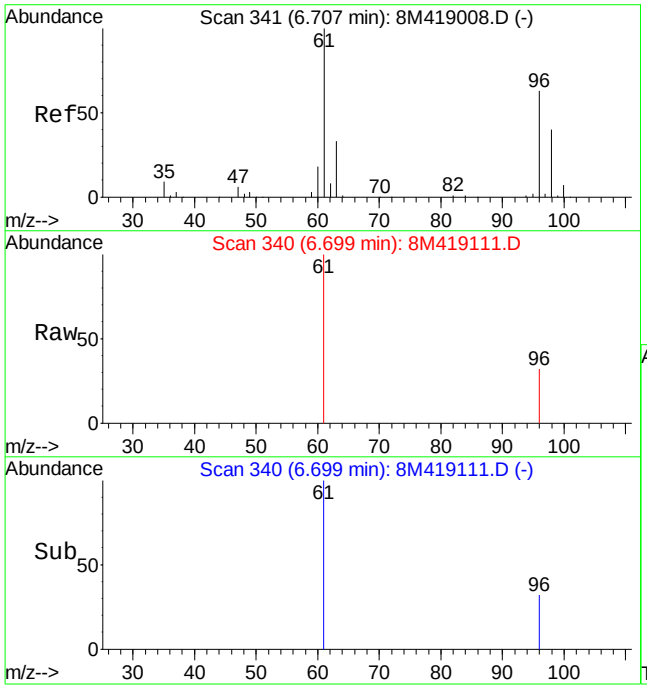


#13
Acetone
Concen: 6.38 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 43 Resp: 6328

Ion	Ratio	Lower	Upper
43	100		
58	25.6	19.4	45.4

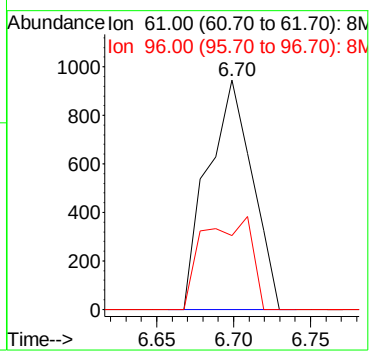


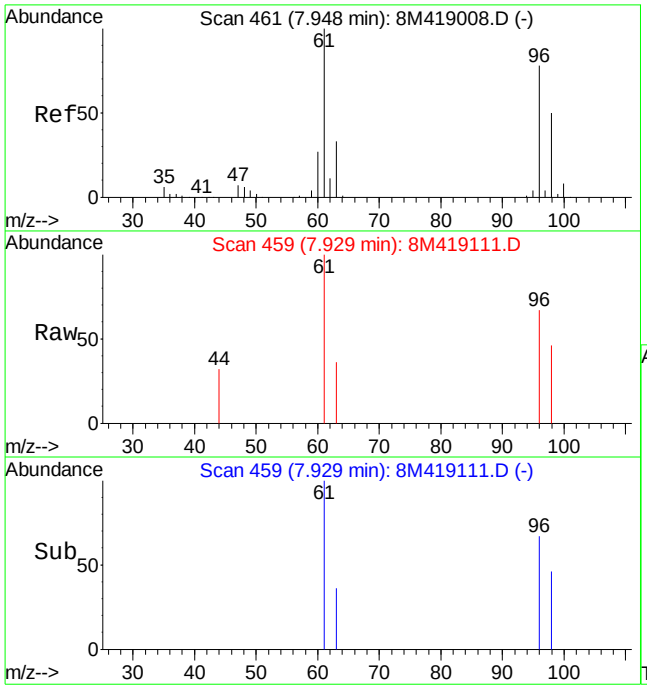


#14
1,1-Dichloroethene
Concen: 0.19 ug/L
RT: 6.70 min Scan# 340
Delta R.T. 0.00 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 61 Resp: 1912

Ion	Ratio	Lower	Upper
61	100		
96	43.6	40.0	93.4

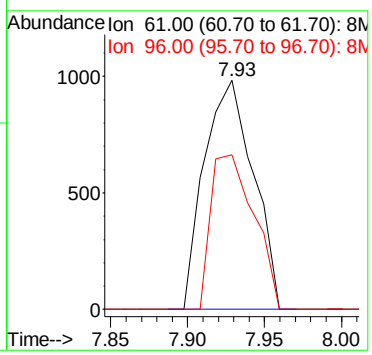


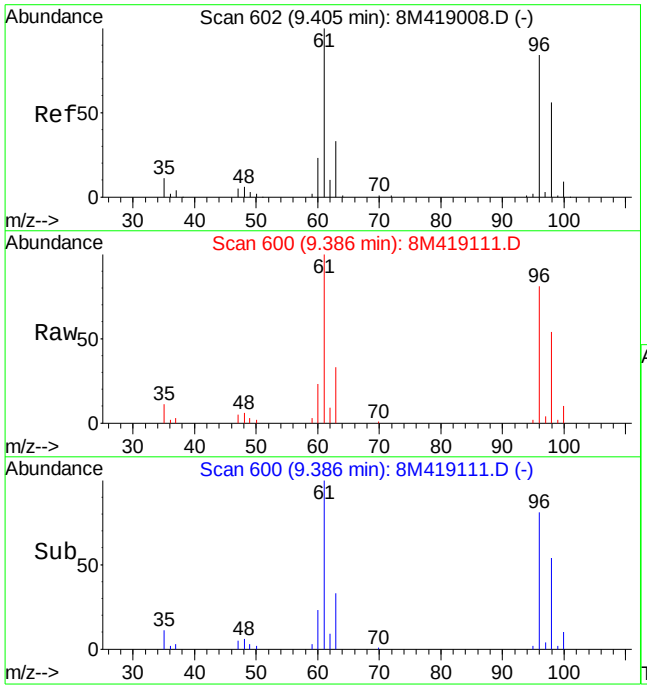


#23
trans-1,2-Dichloroethene
Concen: 0.22 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 61 Resp: 2174

Ion	Ratio	Lower	Upper
61	100		
96	59.8	47.2	110.0

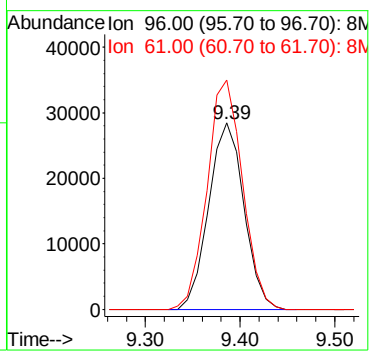


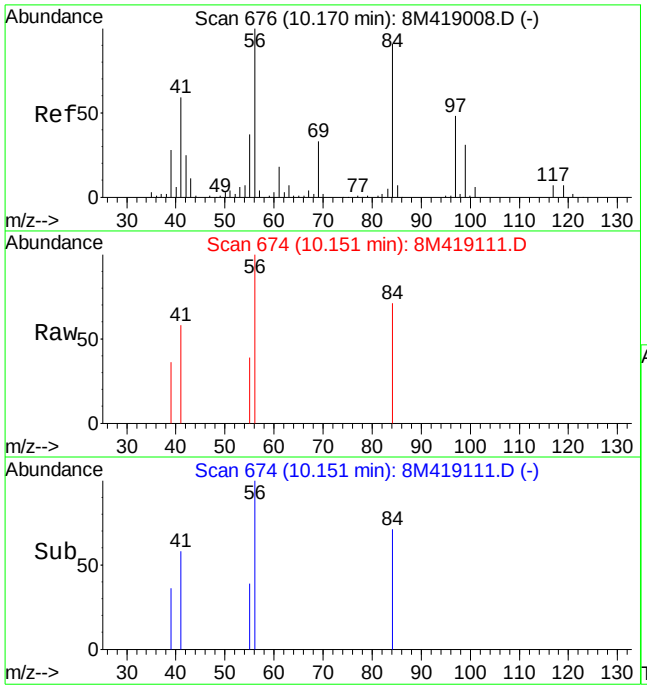


#32
cis-1,2-Dichloroethene
Concen: 8.94 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 96 Resp: 73498

Ion	Ratio	Lower	Upper
96	100		
61	123.4	80.3	187.3

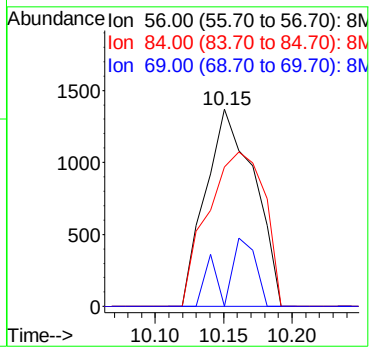


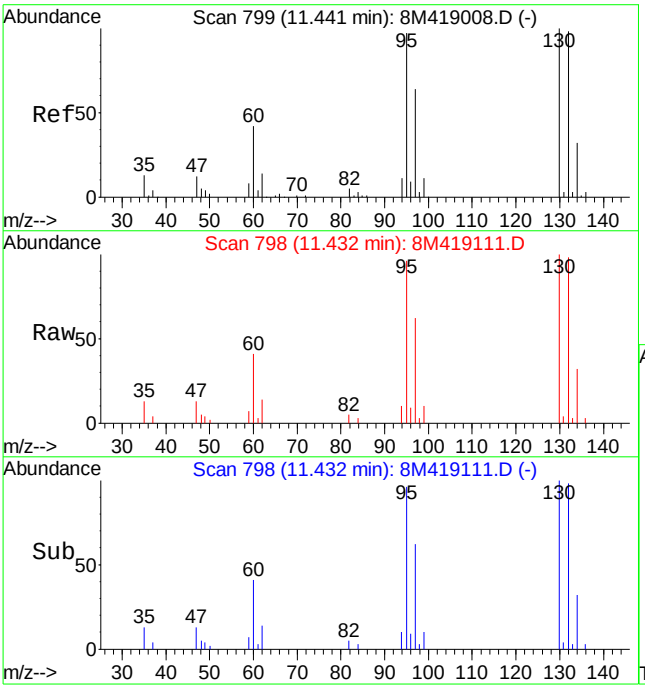


#39
Cyclohexane
Concen: 0.32 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion: 56 Resp: 3394

Ion	Ratio	Lower	Upper
56	100		
84	90.9	61.6	143.8
69	22.5	21.4	50.0

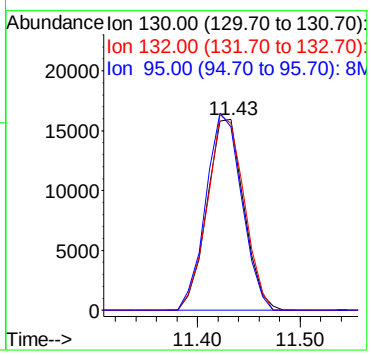


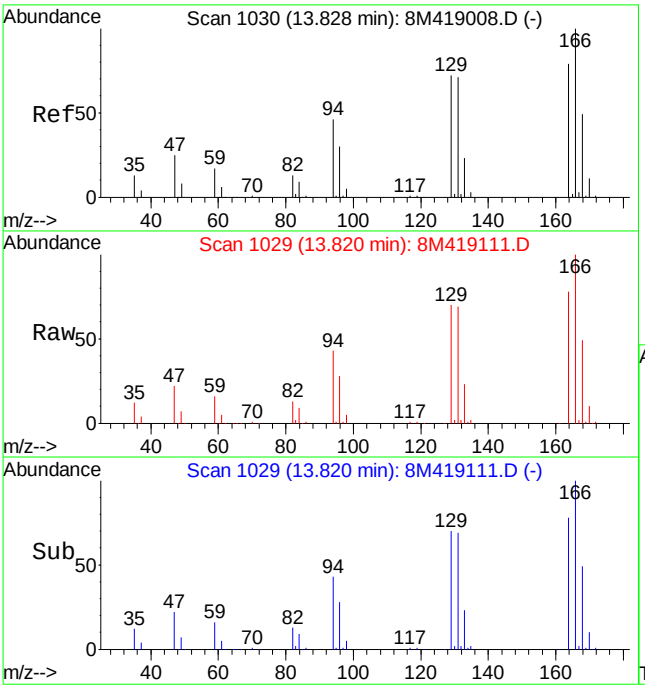


#47
Trichloroethene
Concen: 4.84 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion:130 Resp: 39666

Ion	Ratio	Lower	Upper
130	100		
132	102.0	59.4	138.6
95	101.1	60.1	140.3

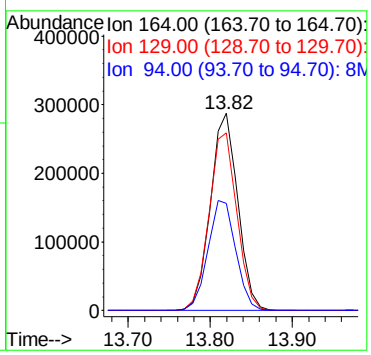




#66
Tetrachloroethene
Concen: 102.97 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419111.D
Acq: 22 Apr 2017 00:33

Tgt Ion:164 Resp: 665436

Ion	Ratio	Lower	Upper
164	100		
129	91.5	53.4	124.6
94	56.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419105.D Vial: 19
Acq On : 21 Apr 2017 21:32 Operator: TMB
Sample : L17041069-12 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 21:54:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

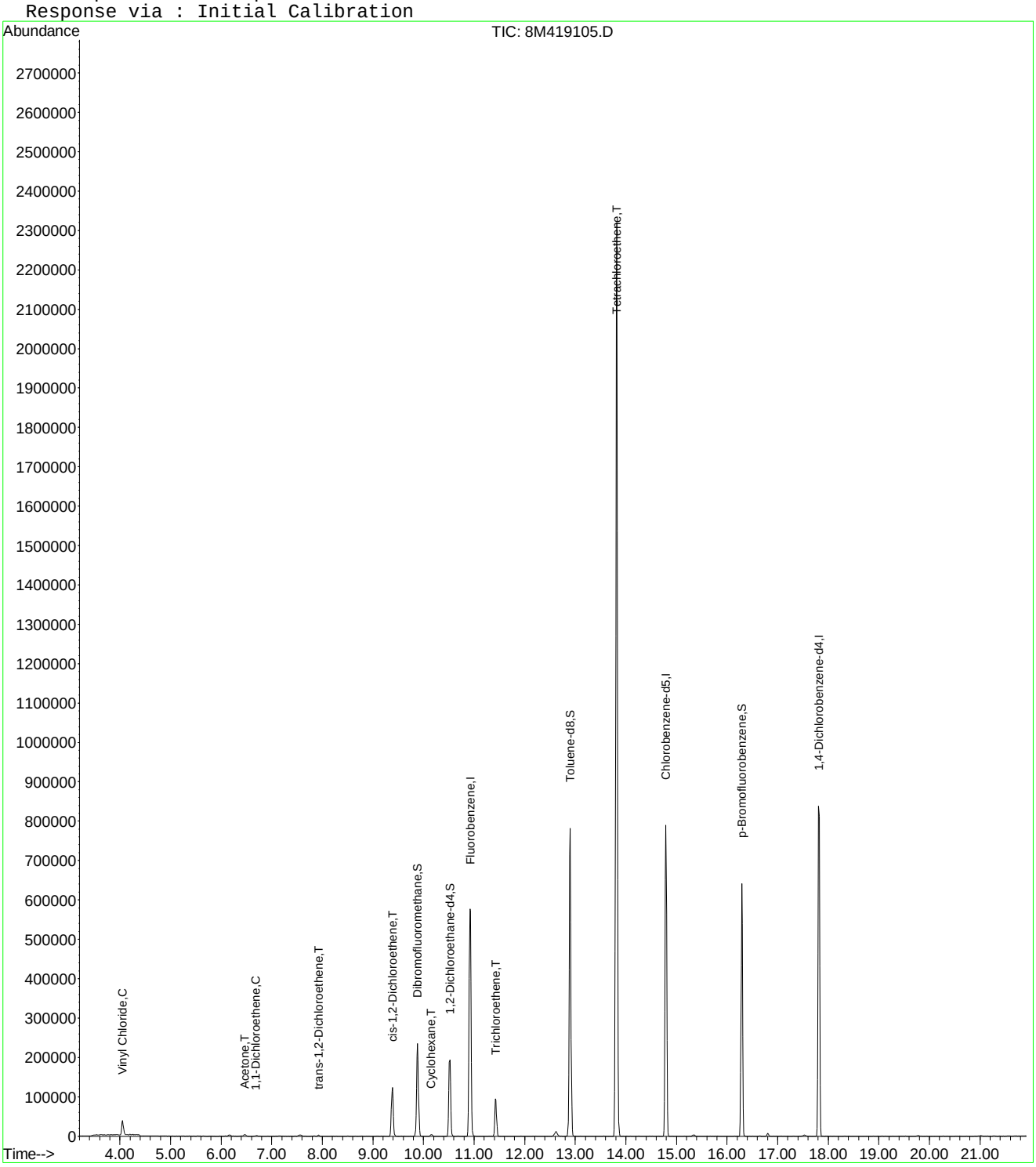
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	743798	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	593348	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	299347	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	196332	25.1658	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.68%			
43) 1,2-Dichloroethane-d4	10.52	65	174967	25.9422	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.76%			
58) Toluene-d8	12.90	98	713780	26.3279	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.32%			
80) p-Bromofluorobenzene	16.29	95	272094	25.7546	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.00%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	53224	4.4785	ug/L	96
13) Acetone	6.47	43	8756	8.3701	ug/L	94
14) 1,1-Dichloroethene	6.69	61	1708	0.1586	ug/L	98
23) trans-1,2-Dichloroethene	7.93	61	2416	0.2305	ug/L	92
32) cis-1,2-Dichloroethene	9.38	96	76279	8.8057	ug/L	90
39) Cyclohexane	10.15	56	3730	0.3322	ug/L #	74
47) Trichloroethene	11.43	130	42803	4.9587	ug/L	97
66) Tetrachloroethene	13.82	164	713826	102.8924	ug/L	98

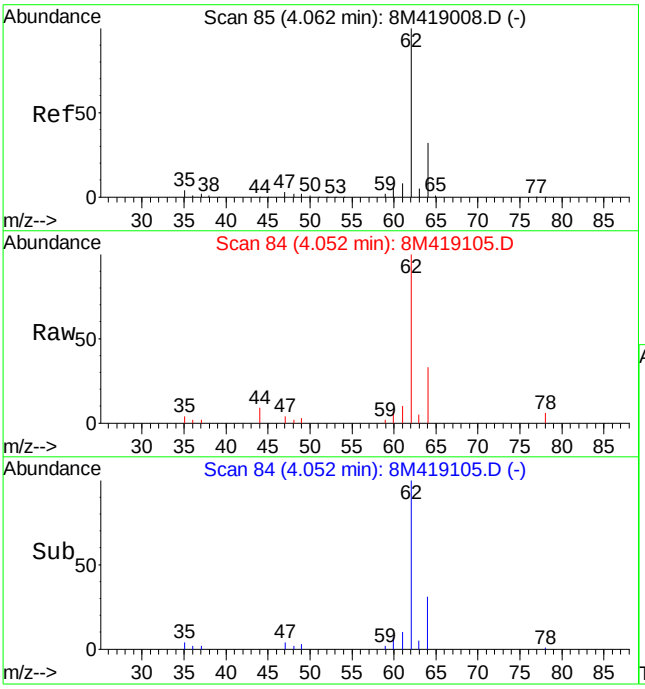
(#) = qualifier out of range (m) = manual integration
8M419105.D 8260WT.M Mon Apr 24 08:48:30 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419105.D Vial: 19
Acq On : 21 Apr 2017 21:32 Operator: TMB
Sample : L17041069-12 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 21:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

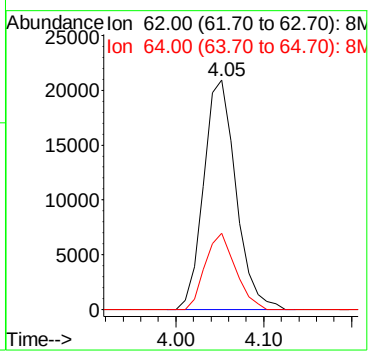


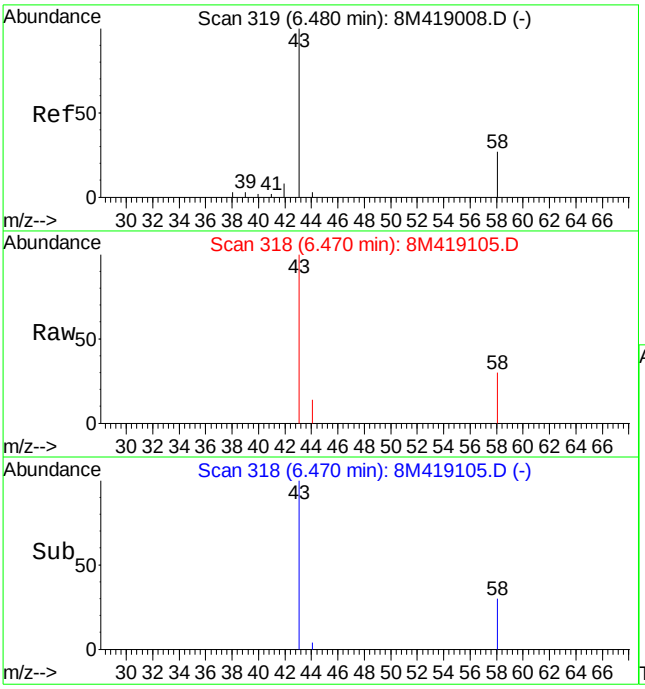


#4
Vinyl Chloride
Concen: 4.48 ug/L
RT: 4.05 min Scan# 84
Delta R.T. -0.00 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 62 Resp: 53224

Ion	Ratio	Lower	Upper
62	100		
64	31.1	19.9	46.3

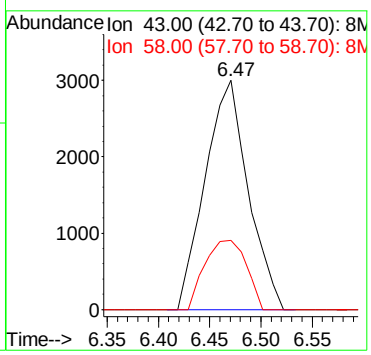


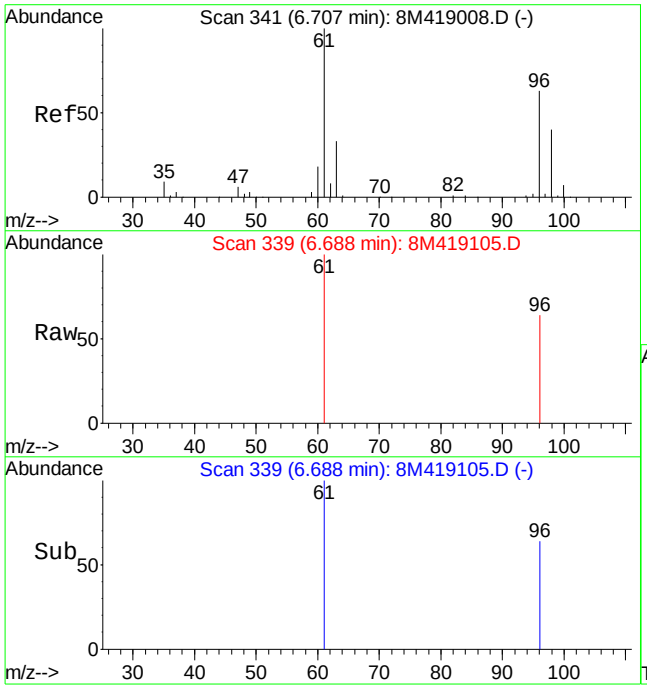


#13
Acetone
Concen: 8.37 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 43 Resp: 8756

Ion	Ratio	Lower	Upper
43	100		
58	29.1	19.4	45.4

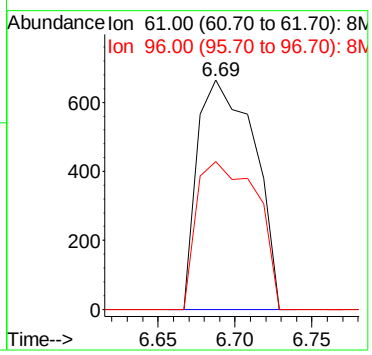


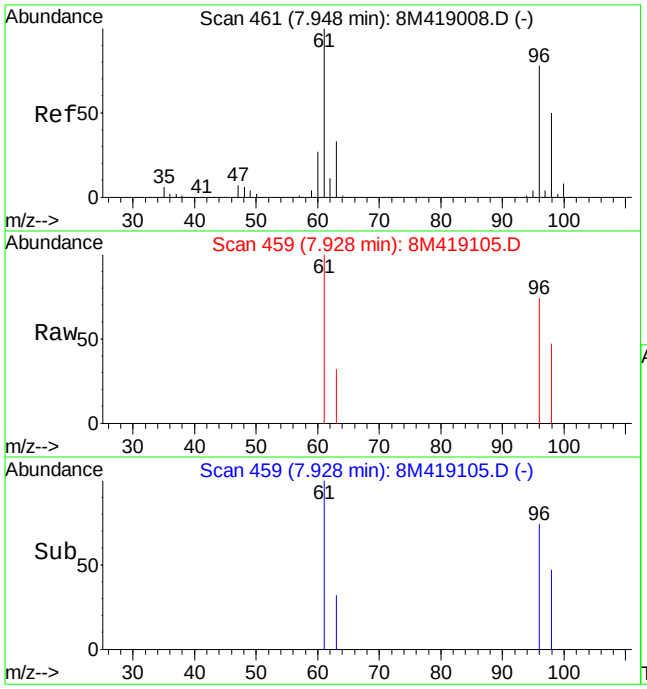


#14
1,1-Dichloroethene
Concen: 0.16 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 61 Resp: 1708

Ion	Ratio	Lower	Upper
61	100		
96	68.1	40.0	93.4

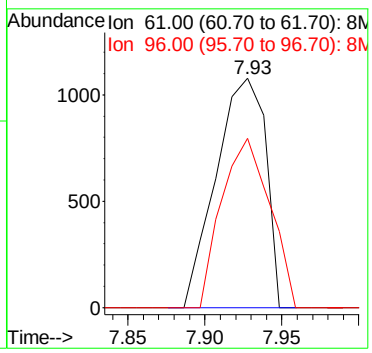


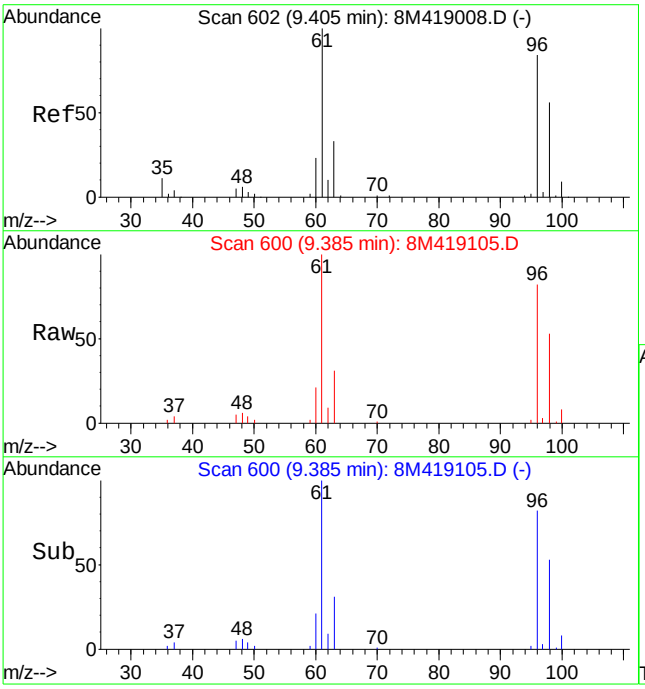


#23
trans-1,2-Dichloroethene
Concen: 0.23 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 61 Resp: 2416

Ion	Ratio	Lower	Upper
61	100		
96	71.9	47.2	110.0

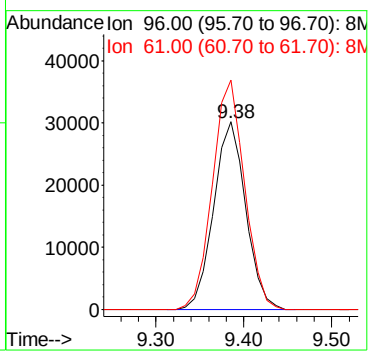


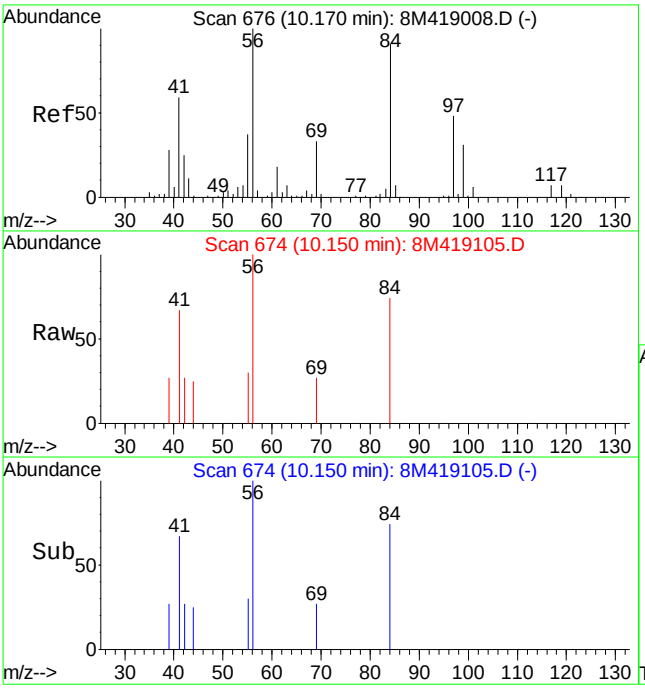


#32
cis-1,2-Dichloroethene
Concen: 8.81 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 96 Resp: 76279

Ion	Ratio	Lower	Upper
96	100		
61	122.5	80.3	187.3

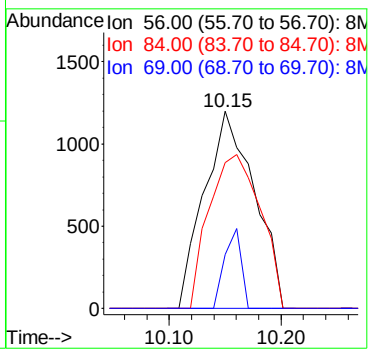


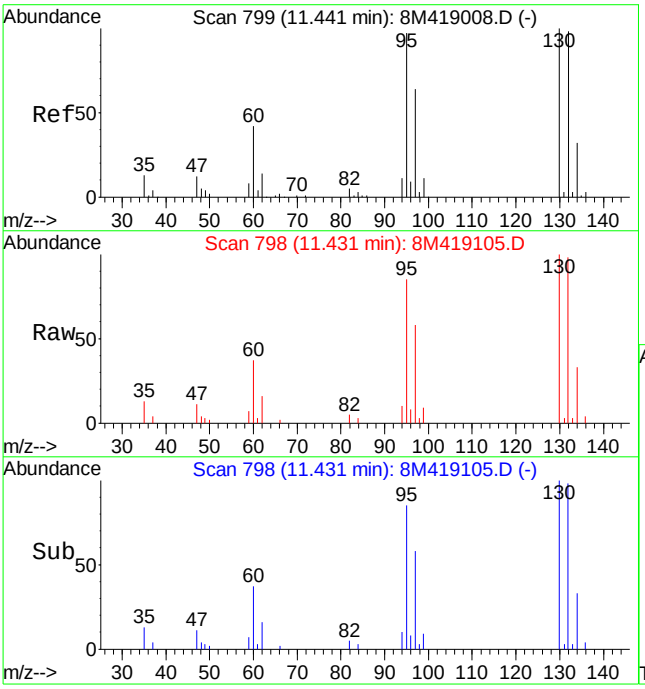


#39
Cyclohexane
Concen: 0.33 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion: 56 Resp: 3730

Ion	Ratio	Lower	Upper
56	100		
84	80.2	61.6	143.8
69	13.5	21.4	50.0#

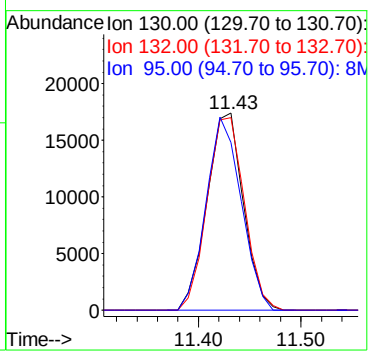


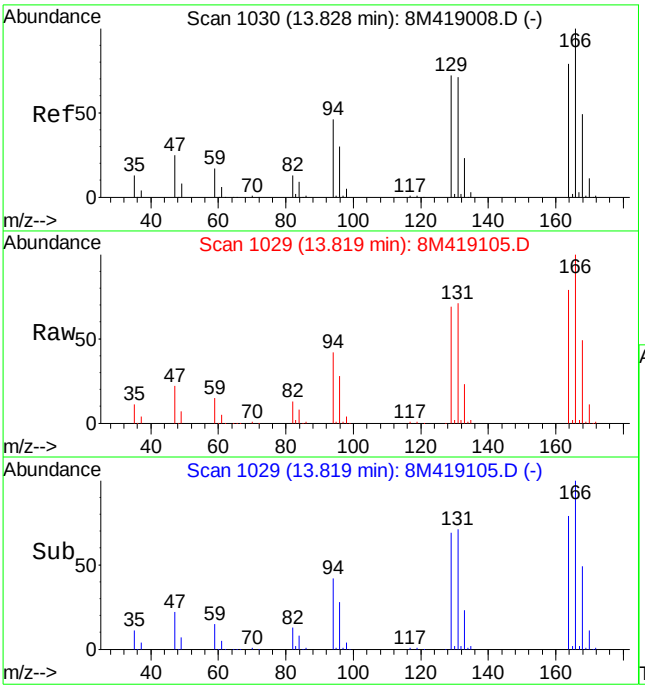


#47
Trichloroethene
Concen: 4.96 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion:130 Resp: 42803

Ion	Ratio	Lower	Upper
130	100		
132	100.3	59.4	138.6
95	95.1	60.1	140.3

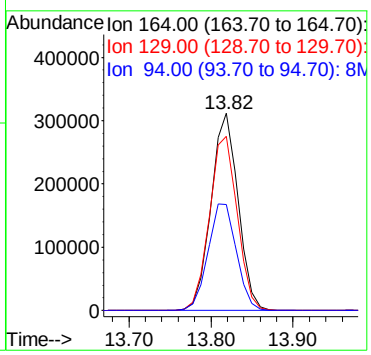




#66
Tetrachloroethene
Concen: 102.89 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419105.D
Acq: 21 Apr 2017 21:32

Tgt Ion:164 Resp: 713826

Ion	Ratio	Lower	Upper
164	100		
129	90.8	53.4	124.6
94	56.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419107.D Vial: 21
Acq On : 21 Apr 2017 22:32 Operator: TMB
Sample : L17041069-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 22:54:30 2017 Quant Results File: 8260WT.RES

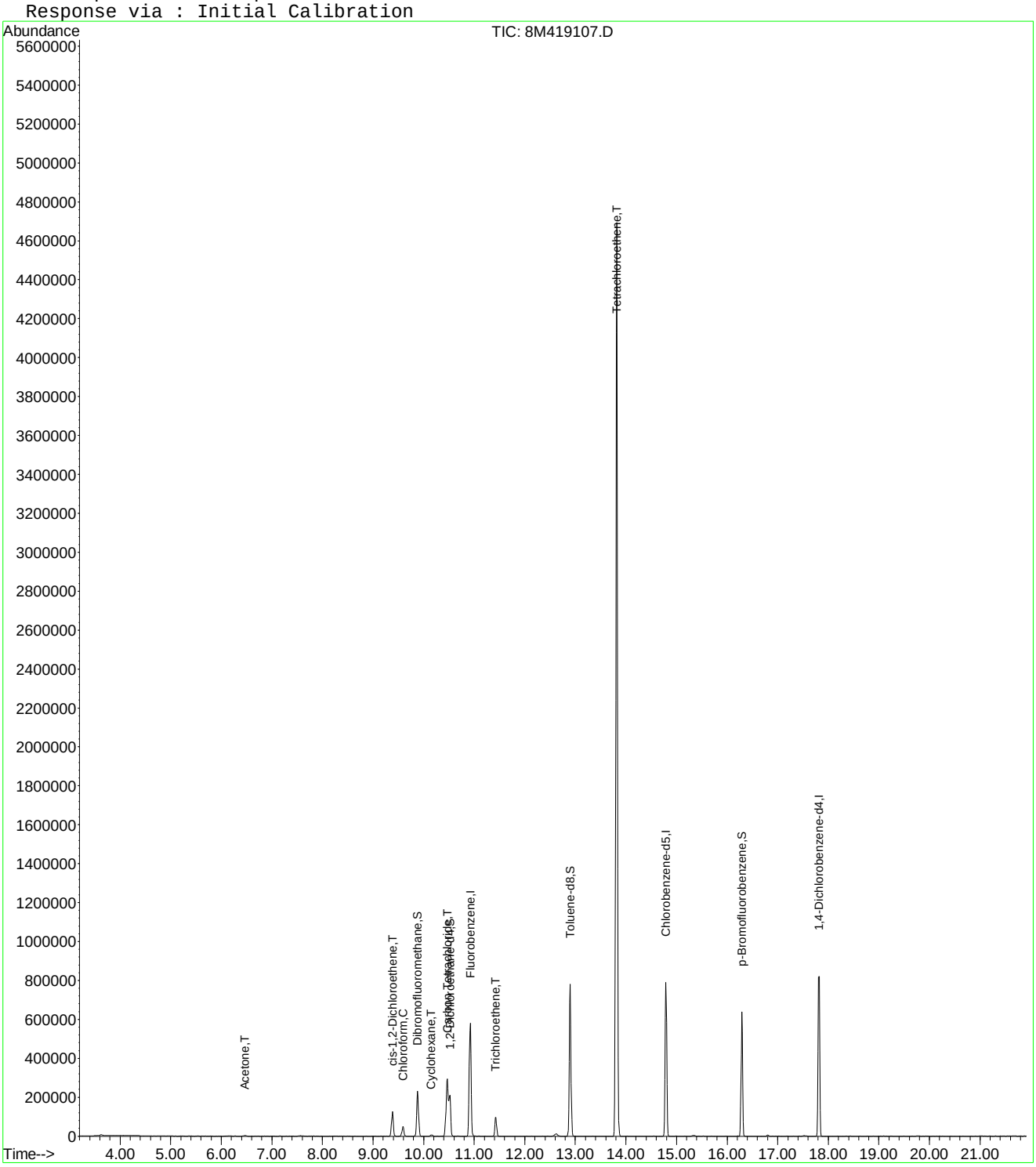
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

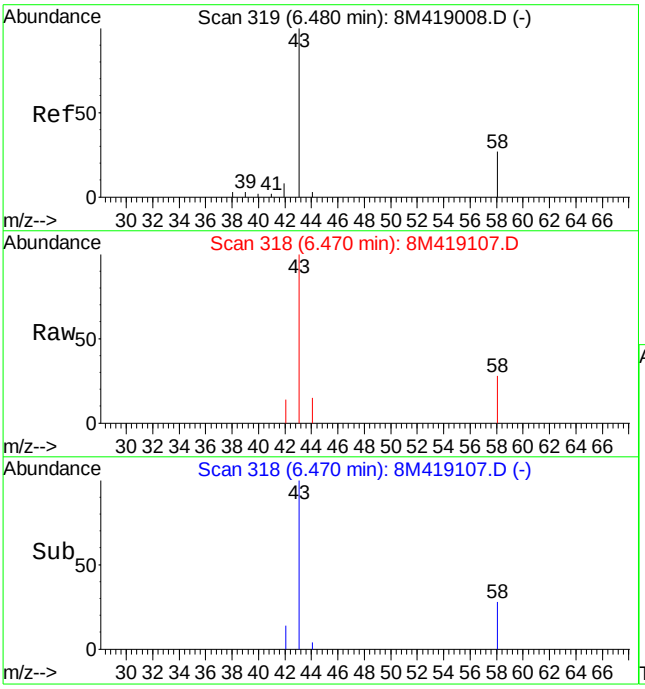
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	734074	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	582425	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	295402	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	191994	24.9357	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.76%			
43) 1,2-Dichloroethane-d4	10.52	65	171418	25.7527	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.00%			
58) Toluene-d8	12.90	98	704323	26.4663	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%			
80) p-Bromofluorobenzene	16.29	95	270380	25.9342	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.72%			
Target Compounds						Qvalue
13) Acetone	6.47	43	8064	7.8107	ug/L	89
32) cis-1,2-Dichloroethene	9.38	96	74877	8.7584	ug/L	89
33) Chloroform	9.59	83	52923	3.5881	ug/L	98
39) Cyclohexane	10.15	56	5025	0.4534	ug/L	88
42) Carbon Tetrachloride	10.47	117	285328	25.8519	ug/L	99
47) Trichloroethene	11.42	130	45316	5.3194	ug/L	95
66) Tetrachloroethene	13.82	164	1388394	203.8792	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419107.D 8260WT.M Mon Apr 24 08:48:39 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419107.D Vial: 21
Acq On : 21 Apr 2017 22:32 Operator: TMB
Sample : L17041069-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 22:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

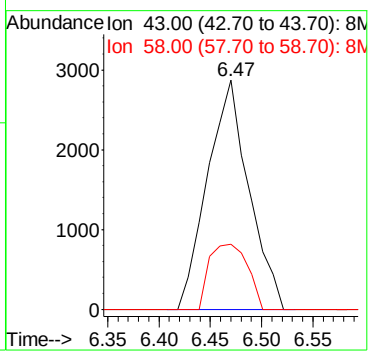


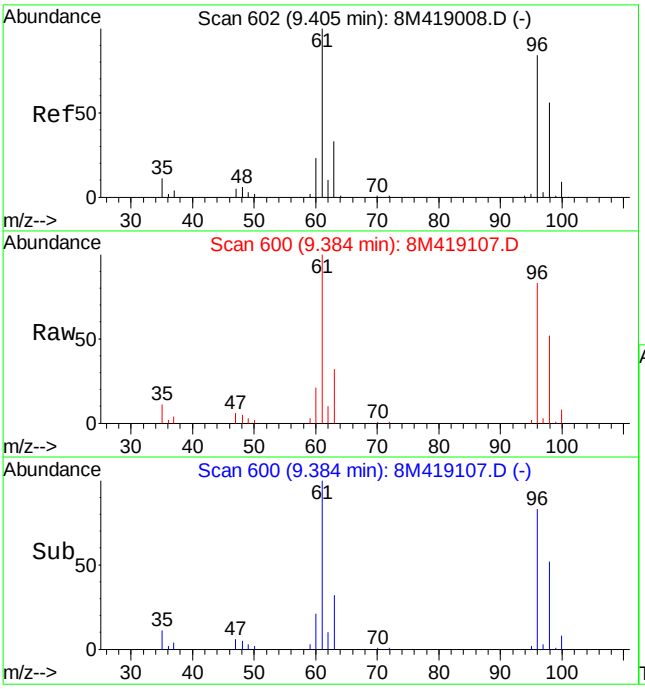


#13
Acetone
Concen: 7.81 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion: 43 Resp: 8064

Ion	Ratio	Lower	Upper
43	100		
58	26.4	19.4	45.4

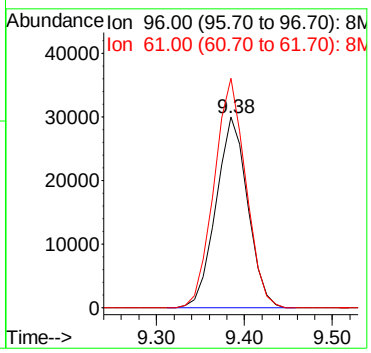


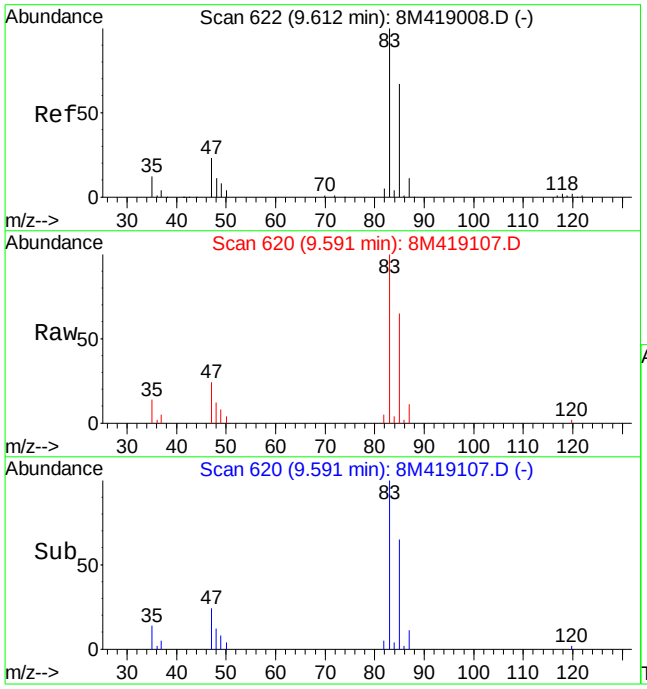


#32
cis-1,2-Dichloroethene
Concen: 8.76 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion: 96 Resp: 74877

Ion	Ratio	Lower	Upper
96	100		
61	120.3	80.3	187.3

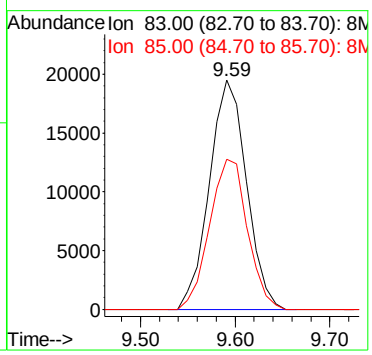


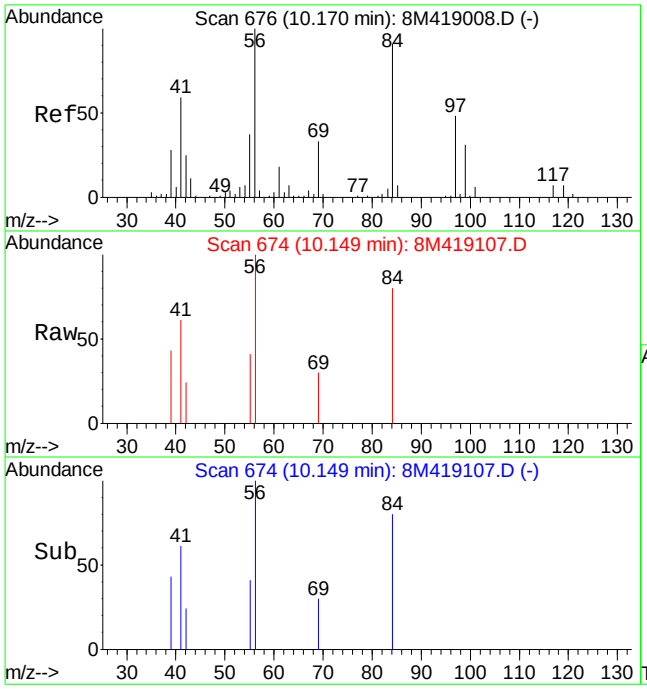


#33
Chloroform
Concen: 3.59 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion: 83 Resp: 52923

Ion	Ratio	Lower	Upper
83	100		
85	66.6	39.1	91.3

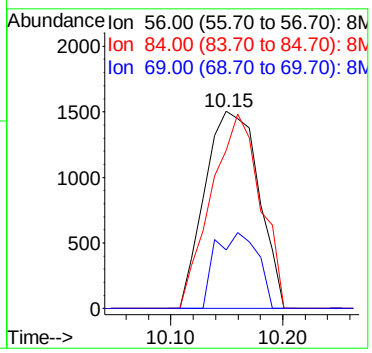


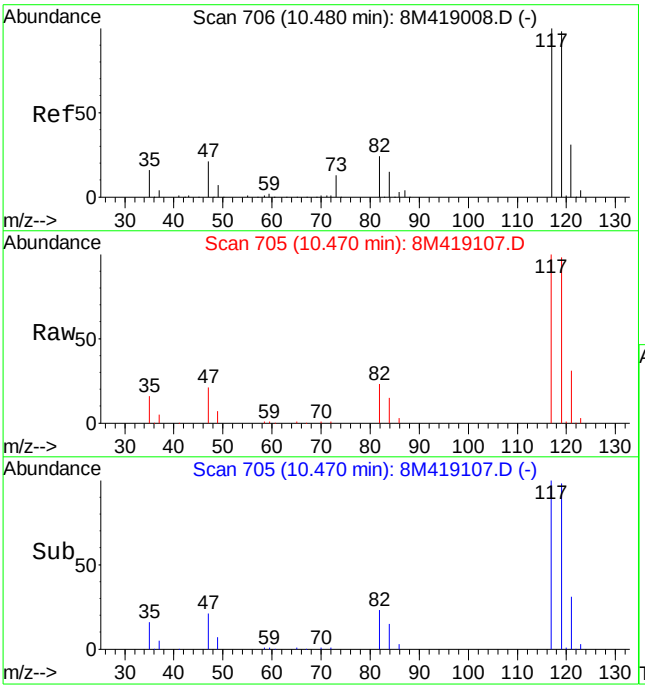


#39
Cyclohexane
Concen: 0.45 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion: 56 Resp: 5025

Ion	Ratio	Lower	Upper
56	100		
84	90.0	61.6	143.8
69	30.2	21.4	50.0

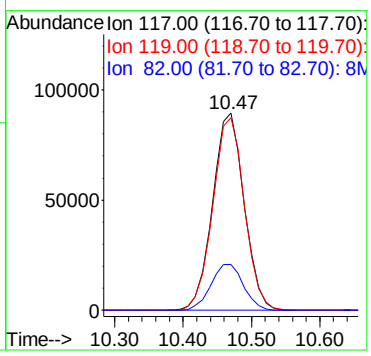


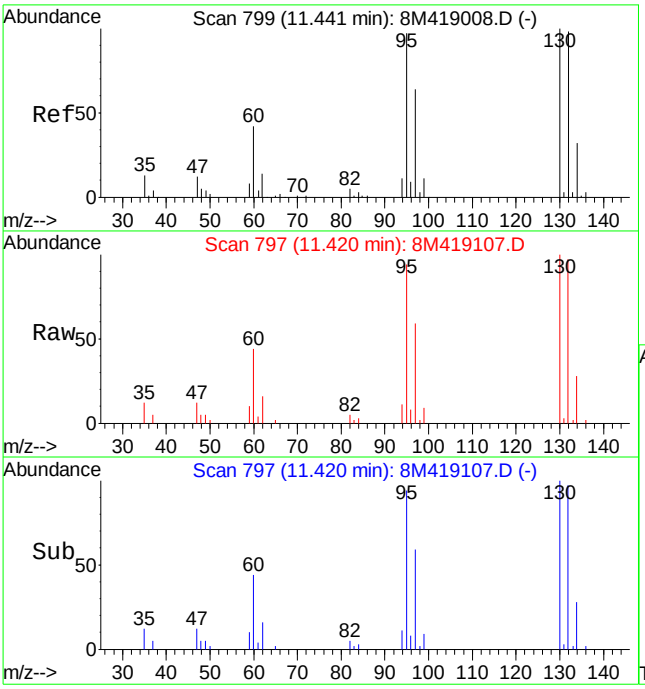


#42
Carbon Tetrachloride
Concen: 25.85 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion:117 Resp: 285328

Ion	Ratio	Lower	Upper
117	100		
119	97.9	58.5	136.5
82	24.0	14.9	34.9

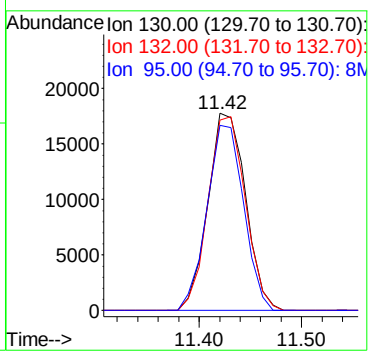


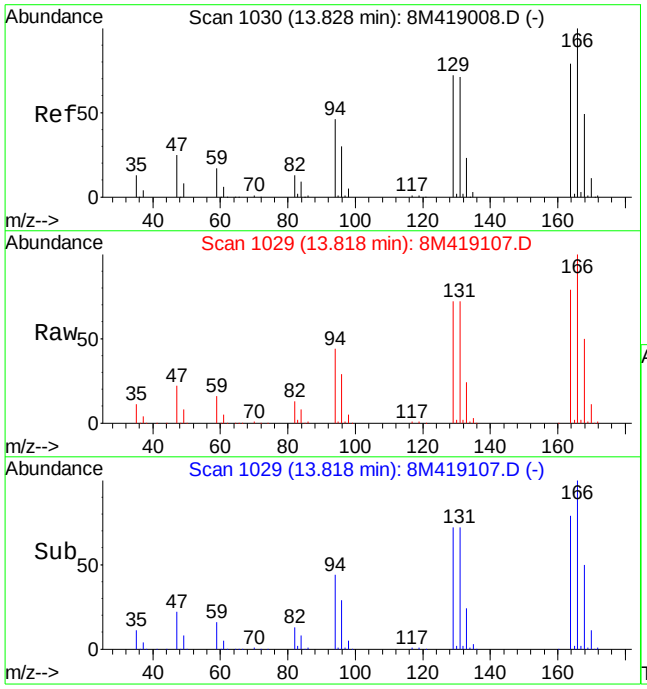


#47
Trichloroethene
Concen: 5.32 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion:130 Resp: 45316

Ion	Ratio	Lower	Upper
130	100		
132	97.3	59.4	138.6
95	91.6	60.1	140.3

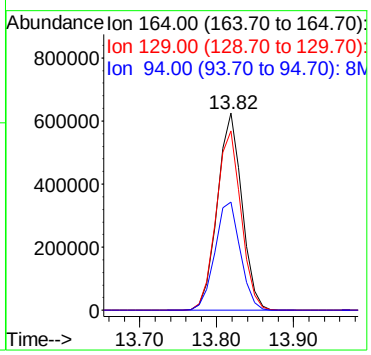




#66
Tetrachloroethene
Concen: 203.88 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419107.D
Acq: 21 Apr 2017 22:32

Tgt Ion:164 Resp: 1388394

Ion	Ratio	Lower	Upper
164	100		
129	92.0	53.4	124.6
94	56.8	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419121.D Vial: 7
Acq On : 24 Apr 2017 14:14 Operator: TMB
Sample : L17041069-13 B 5X 826-SPE D1 Inst : HPMS8
Misc : 1,5 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:36:46 2017 Quant Results File: 8260WT.RES

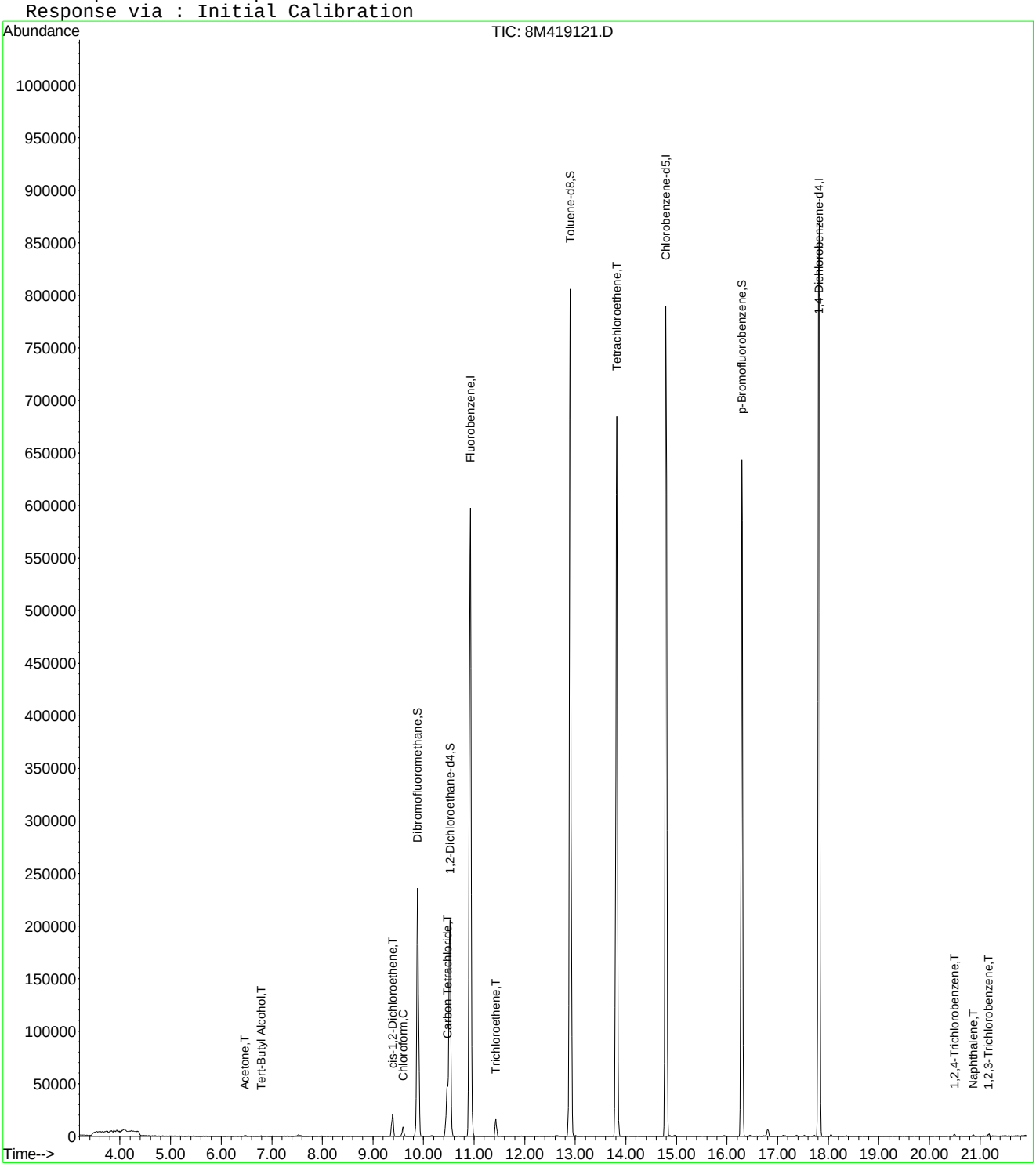
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

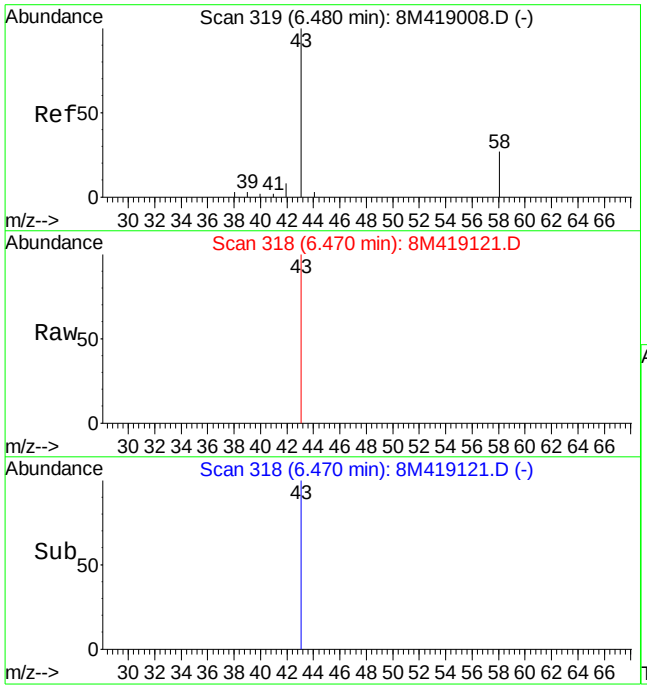
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	743728	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	594080	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	305255	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	197440	25.3102	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.52	65	172240	25.5403	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.16%			
58) Toluene-d8	12.90	98	722782	26.6271	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
80) p-Bromofluorobenzene	16.29	95	279125	25.9088	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.64%			
Target Compounds						Qvalue
13) Acetone	6.47	43	1774	1.6960	ug/L	# 64
15) Tert-Butyl Alcohol	6.79	59	278	0.8199	ug/L	# 59
32) cis-1,2-Dichloroethene	9.38	96	13473	1.5555	ug/L	86
33) Chloroform	9.59	83	9732	0.6512	ug/L	96
42) Carbon Tetrachloride	10.47	117	47426	4.2412	ug/L	99
47) Trichloroethene	11.43	130	7838	0.9081	ug/L	94
66) Tetrachloroethene	13.82	164	214905	30.9387	ug/L	98
98) 1,2,4-Trichlorobenzene	20.49	180	1727	0.1505	ug/L	# 68
100) Naphthalene	20.87	128	2735	0.1668	ug/L	# 67
101) 1,2,3-Trichlorobenzene	21.17	180	1501	0.1575	ug/L	# 74

(#) = qualifier out of range (m) = manual integration
8M419121.D 8260WT.M Tue Apr 25 08:35:57 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419121.D Vial: 7
Acq On : 24 Apr 2017 14:14 Operator: TMB
Sample : L17041069-13 B 5X 826-SPE D1 Inst : HPMS8
Misc : 1,5 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:36 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

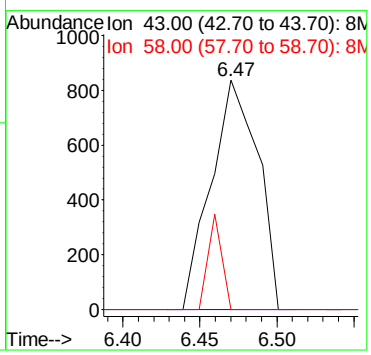


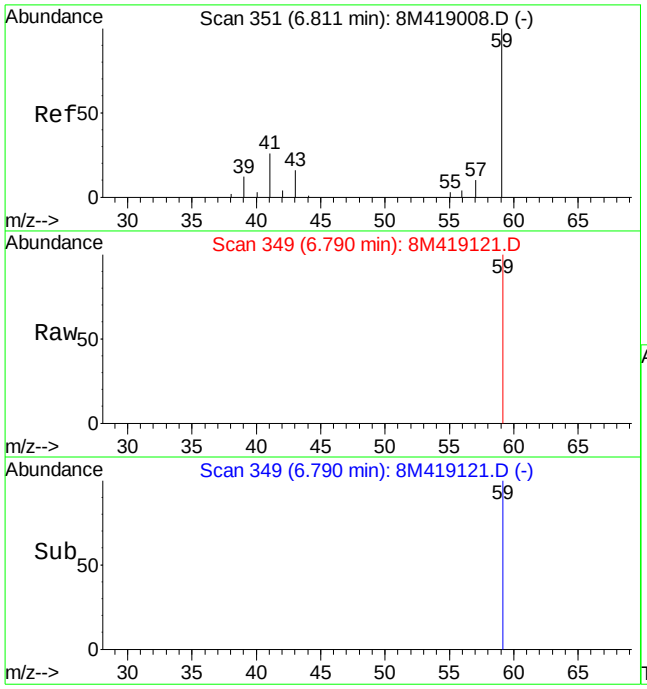


#13
Acetone
Concen: 1.70 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion: 43 Resp: 1774

Ion	Ratio	Lower	Upper
43	100		
58	12.1	19.4	45.4#

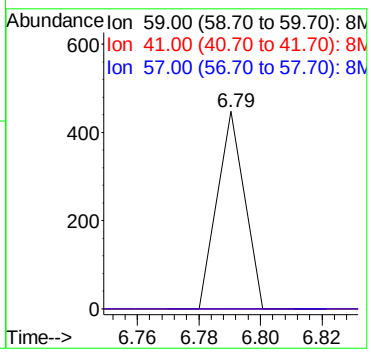


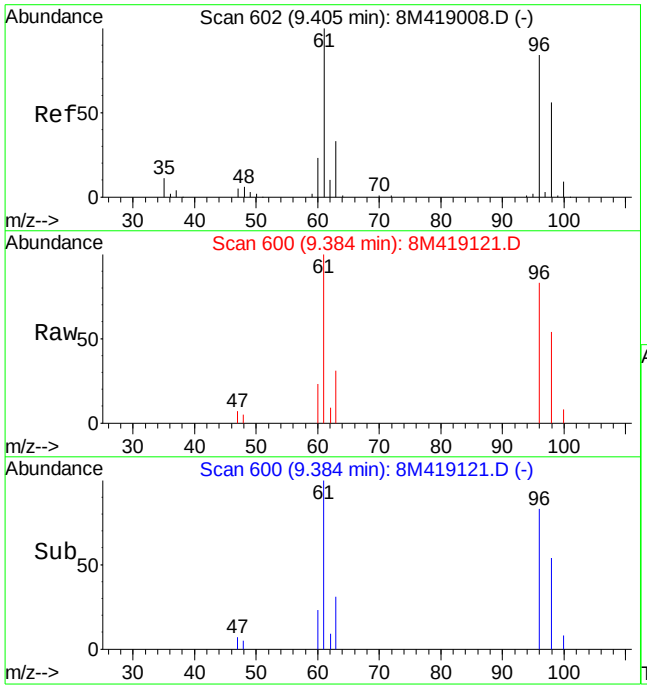


#15
Tert-Butyl Alcohol
Concen: 0.82 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion: 59 Resp: 278

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

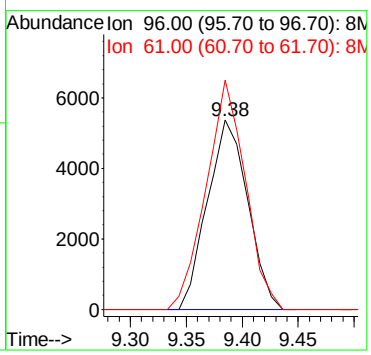


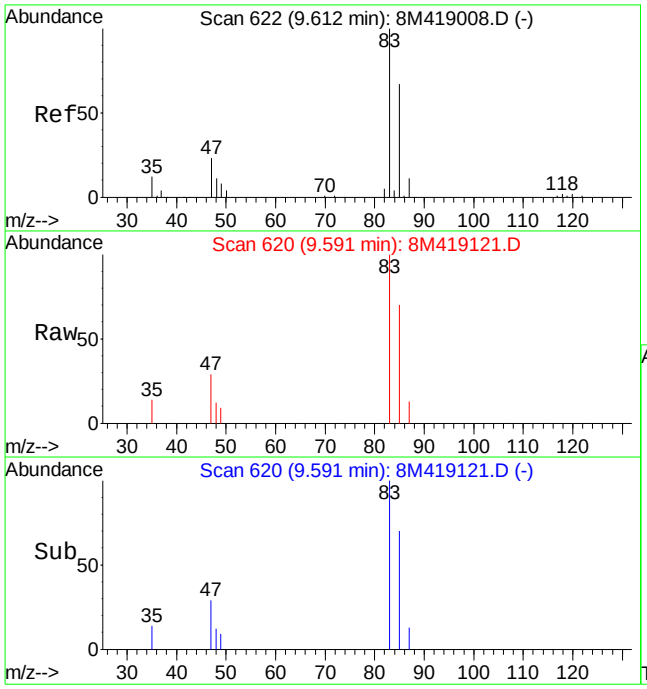


#32
cis-1,2-Dichloroethene
Concen: 1.56 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion: 96 Resp: 13473

Ion	Ratio	Lower	Upper
96	100		
61	117.8	80.3	187.3

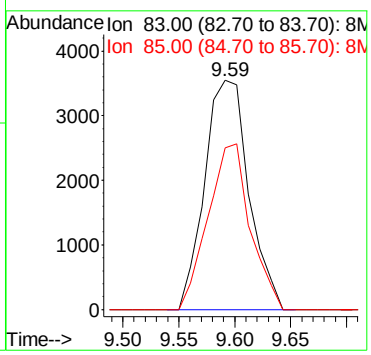


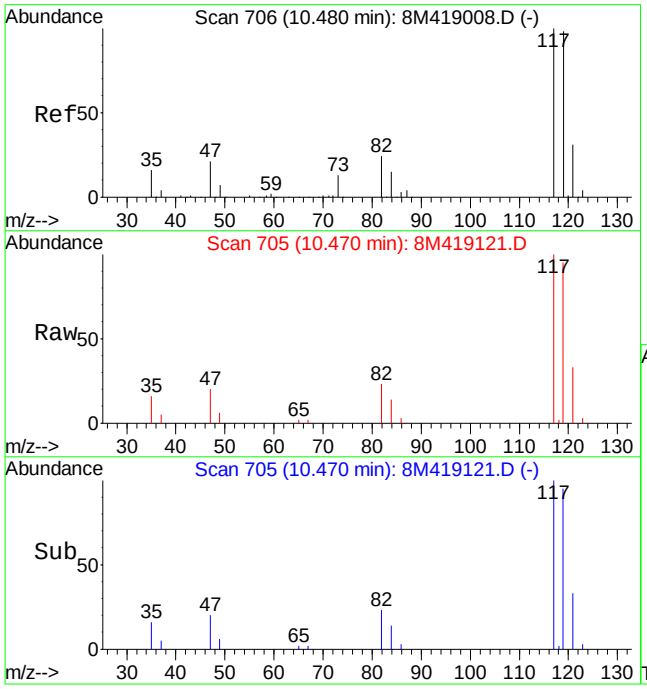


#33
Chloroform
Concen: 0.65 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion: 83 Resp: 9732

Ion	Ratio	Lower	Upper
83	100		
85	68.7	39.1	91.3

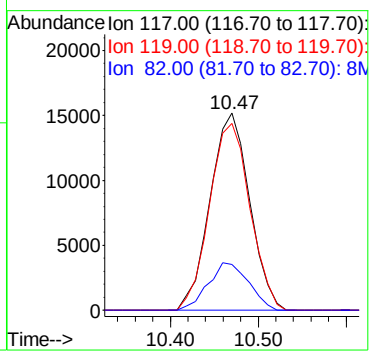


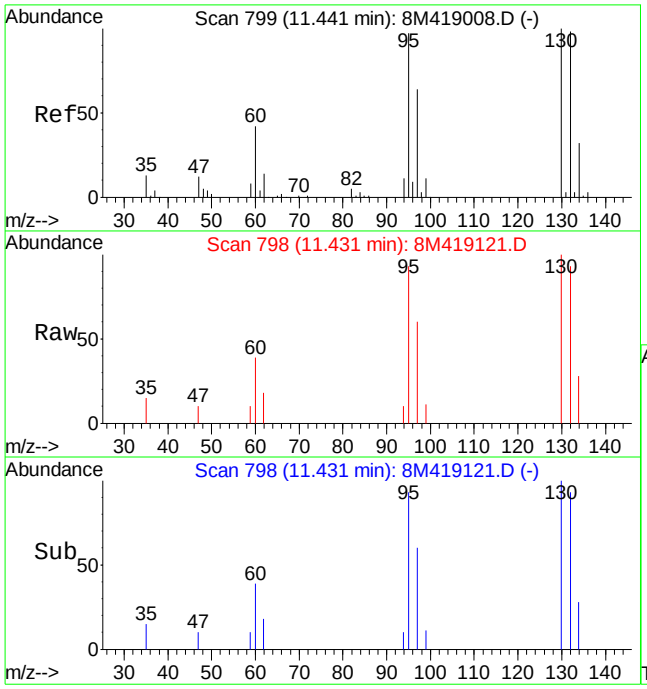


#42
Carbon Tetrachloride
Concen: 4.24 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:117 Resp: 47426

Ion	Ratio	Lower	Upper
117	100		
119	97.0	58.5	136.5
82	24.6	14.9	34.9

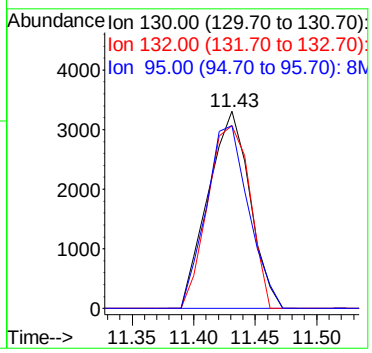


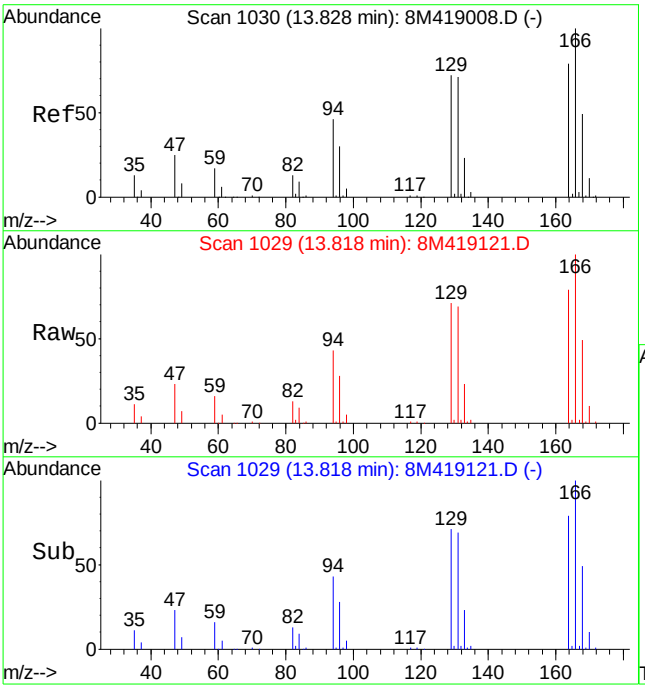


#47
Trichloroethene
Concen: 0.91 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:130 Resp: 7838

Ion	Ratio	Lower	Upper
130	100		
132	93.5	59.4	138.6
95	93.8	60.1	140.3

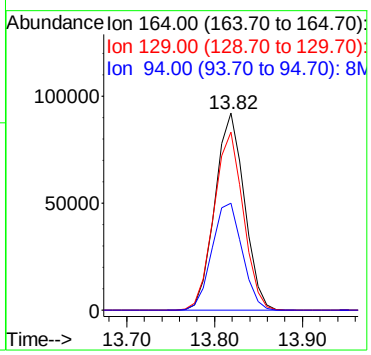


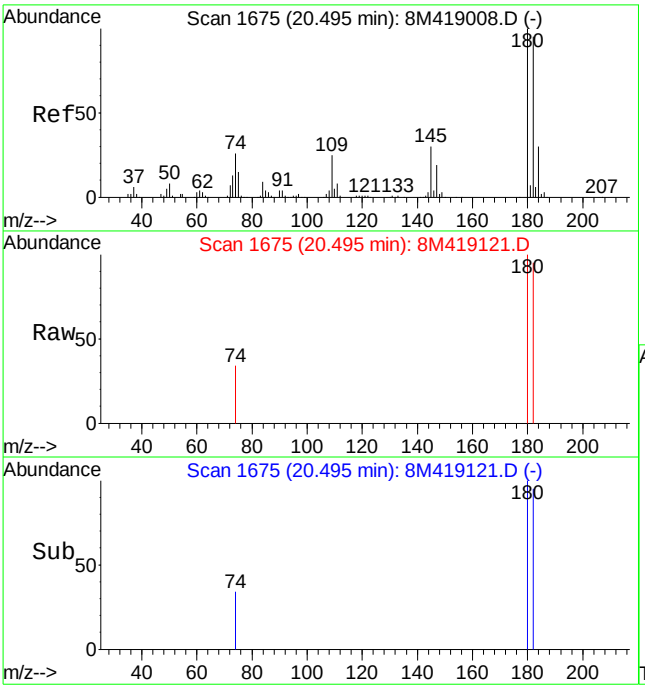


#66
Tetrachloroethene
Concen: 30.94 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:164 Resp: 214905

Ion	Ratio	Lower	Upper
164	100		
129	89.9	53.4	124.6
94	55.7	34.7	81.1

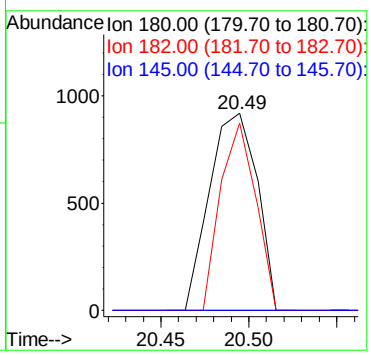


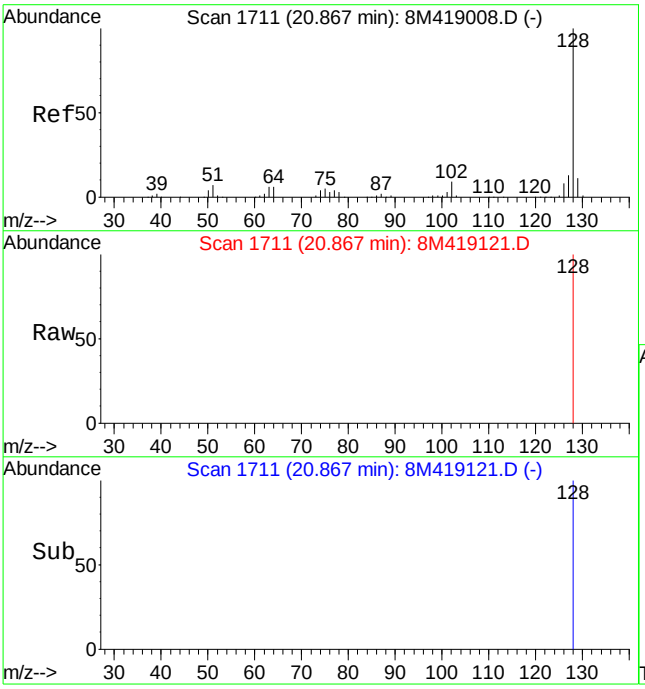


#98
1,2,4-Trichlorobenzene
Concen: 0.15 ug/L
RT: 20.49 min Scan# 1675
Delta R.T. -0.00 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:180 Resp: 1727

Ion	Ratio	Lower	Upper
180	100		
182	70.5	57.3	133.7
145	0.0	17.3	40.5#

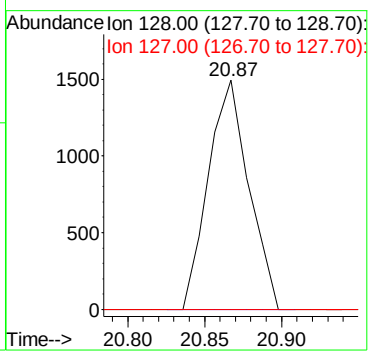


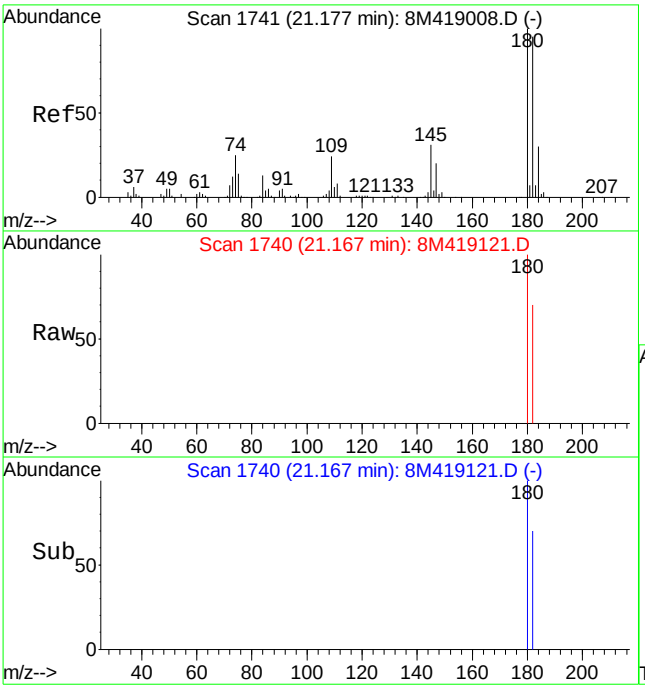


#100
Naphthalene
Concen: 0.17 ug/L
RT: 20.87 min Scan# 1711
Delta R.T. -0.00 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:128 Resp: 2735

Ion	Ratio	Lower	Upper
128	100		
127	0.0	7.7	18.1#

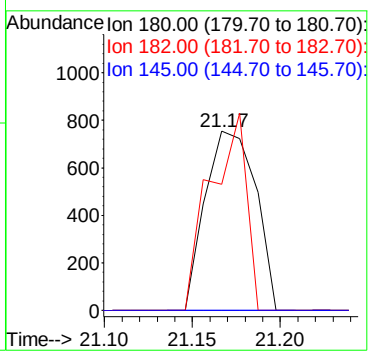




#101
1,2,3-Trichlorobenzene
Concen: 0.16 ug/L
RT: 21.17 min Scan# 1740
Delta R.T. -0.01 min
Lab File: 8M419121.D
Acq: 24 Apr 2017 14:14

Tgt Ion:180 Resp: 1501

Ion	Ratio	Lower	Upper
180	100		
182	78.9	57.1	133.3
145	0.0	18.3	42.7#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419108.D Vial: 22
Acq On : 21 Apr 2017 23:02 Operator: TMB
Sample : L17041069-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 23:24:43 2017 Quant Results File: 8260WT.RES

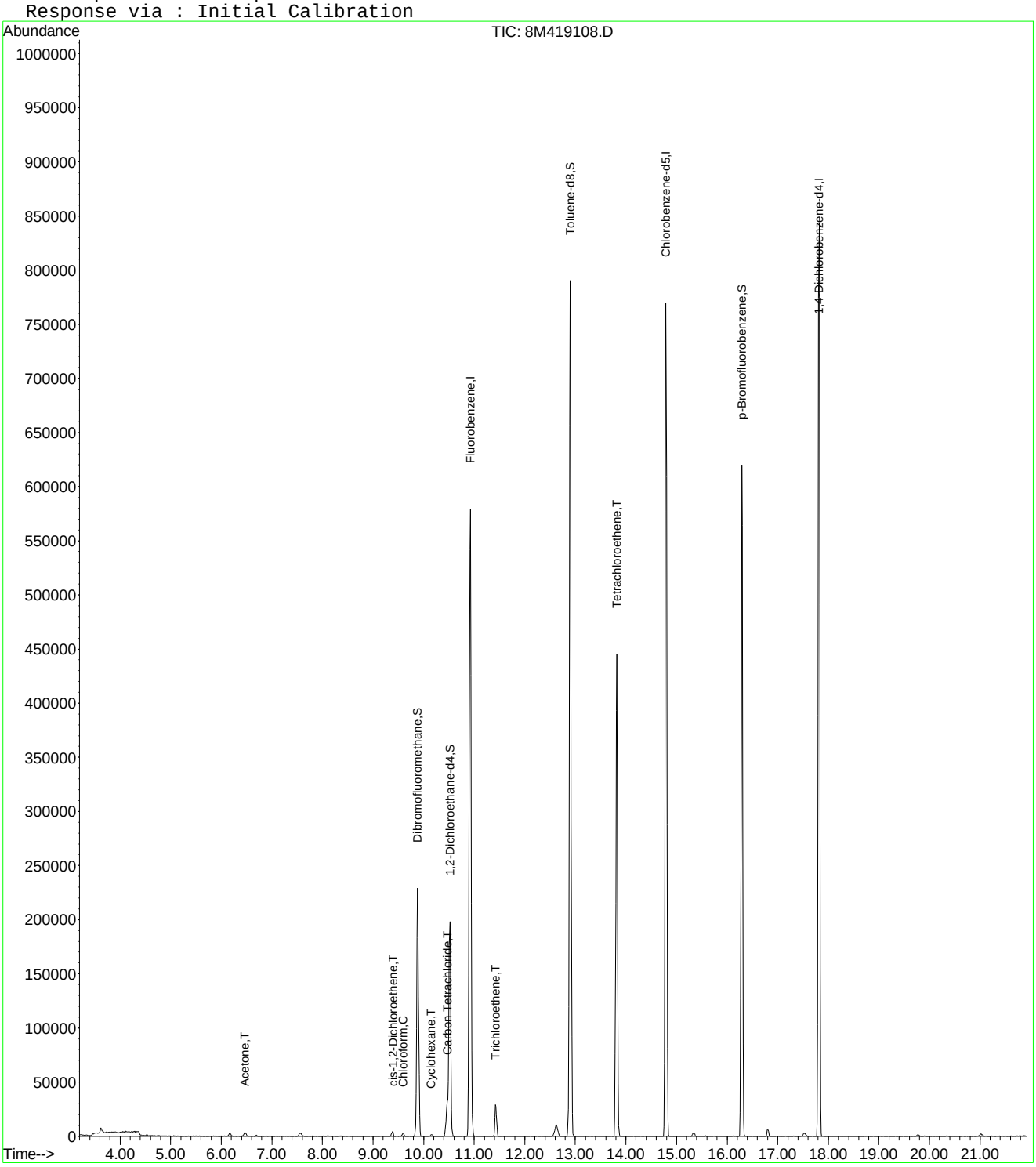
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

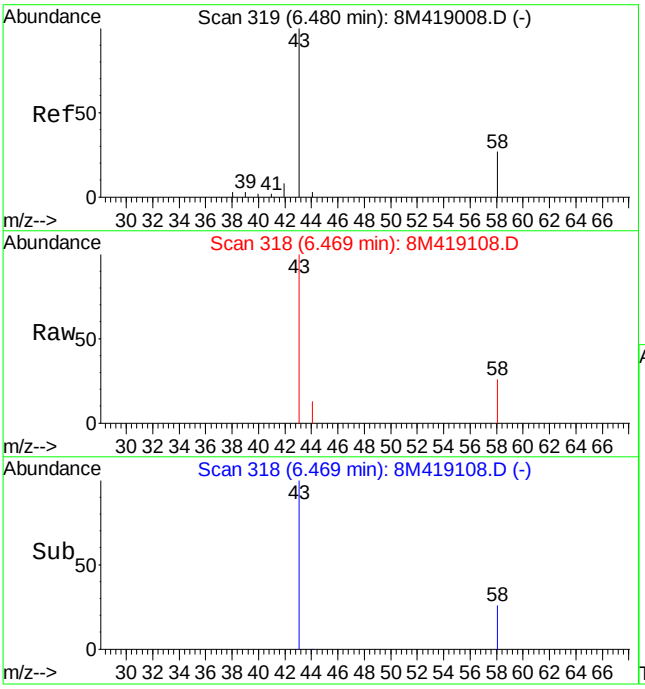
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	721444	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	574272	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	289941	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	191439	25.2989	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.20%			
43) 1,2-Dichloroethane-d4	10.52	65	166842	25.5040	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.00%			
58) Toluene-d8	12.90	98	699994	26.6771	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.72%			
80) p-Bromofluorobenzene	16.29	95	267160	26.1080	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.44%			
Target Compounds						Qvalue
13) Acetone	6.47	43	7109	7.0063	ug/L	85
32) cis-1,2-Dichloroethene	9.39	96	2898	0.3449	ug/L	91
33) Chloroform	9.59	83	3814	0.2631	ug/L	92
39) Cyclohexane	10.15	56	1846	0.1695	ug/L #	66
42) Carbon Tetrachloride	10.47	117	32074	2.9569	ug/L	99
47) Trichloroethene	11.42	130	13222	1.5792	ug/L	96
66) Tetrachloroethene	13.82	164	138308	20.5982	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419108.D 8260WT.M Mon Apr 24 08:48:43 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419108.D Vial: 22
Acq On : 21 Apr 2017 23:02 Operator: TMB
Sample : L17041069-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 23:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

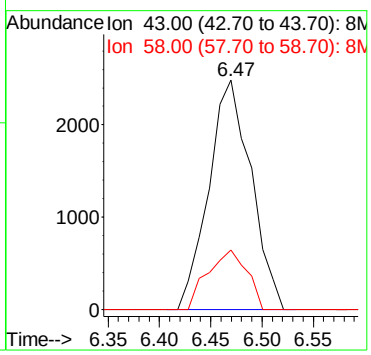


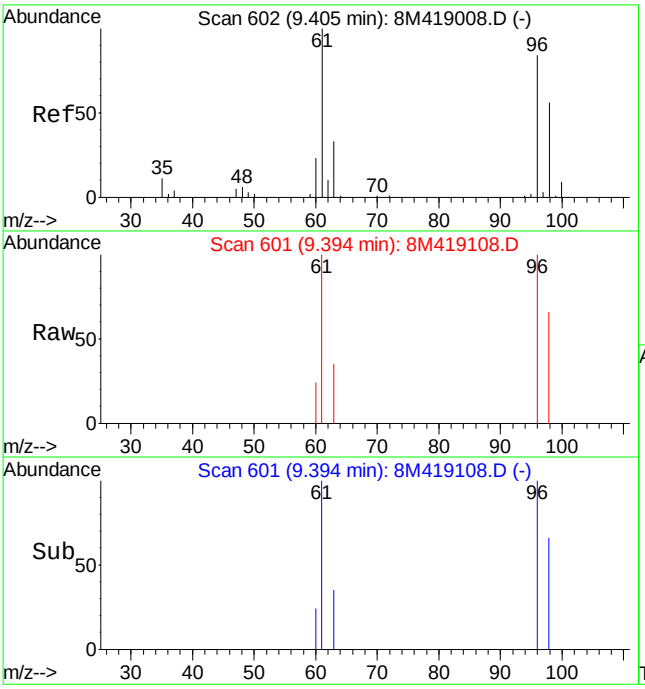


#13
Acetone
Concen: 7.01 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion: 43 Resp: 7109

Ion	Ratio	Lower	Upper
43	100		
58	24.0	19.4	45.4

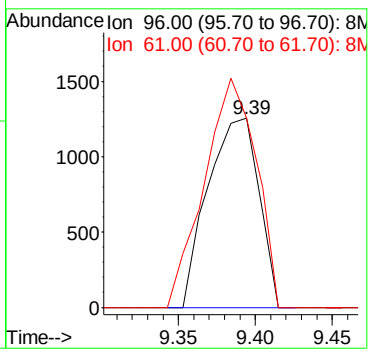


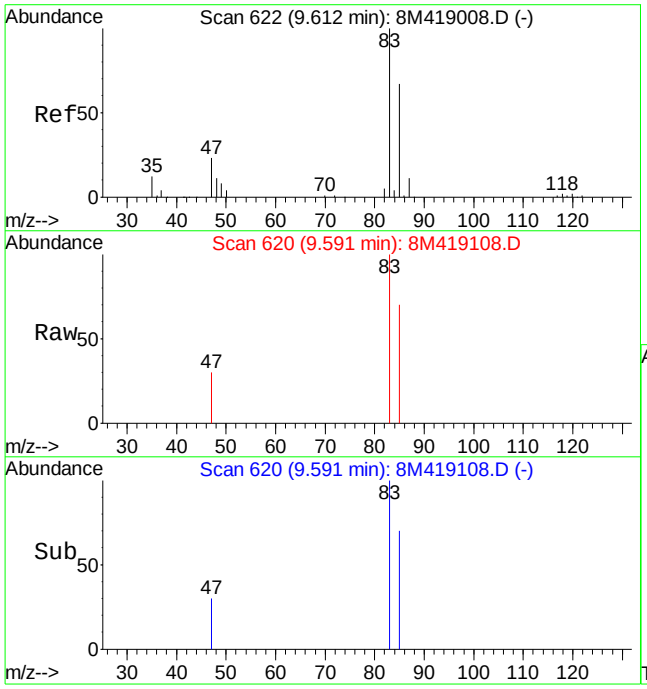


#32
cis-1,2-Dichloroethene
Concen: 0.34 ug/L
RT: 9.39 min Scan# 601
Delta R.T. -0.01 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion: 96 Resp: 2898

Ion	Ratio	Lower	Upper
96	100		
61	123.1	80.3	187.3

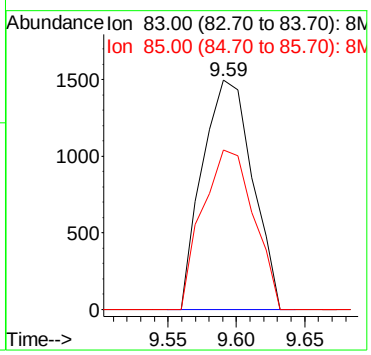


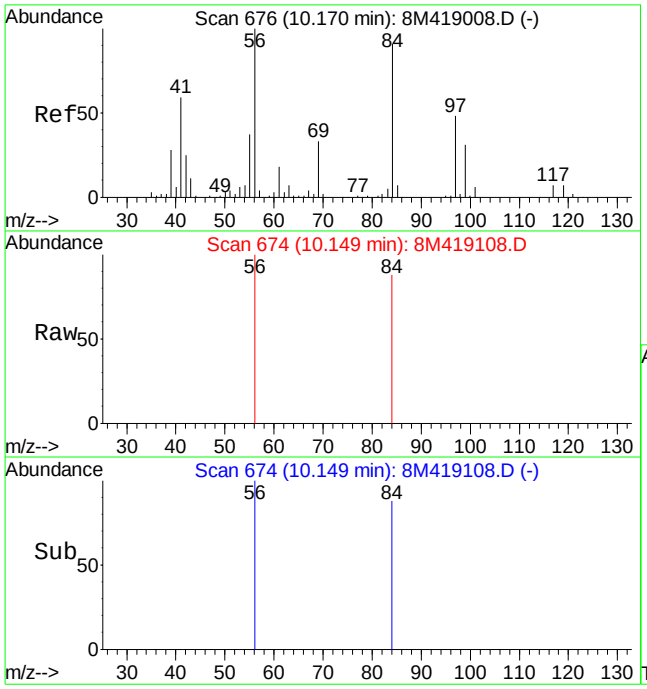


#33
Chloroform
Concen: 0.26 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion: 83 Resp: 3814

Ion	Ratio	Lower	Upper
83	100		
85	71.2	39.1	91.3

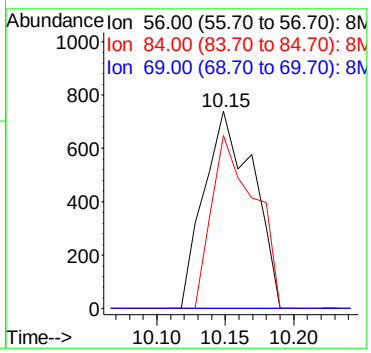


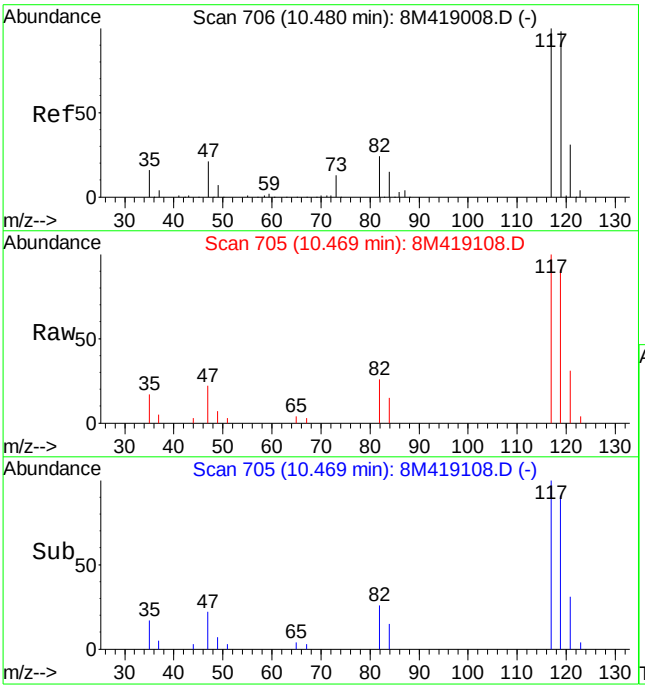


#39
Cyclohexane
Concen: 0.17 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion: 56 Resp: 1846

Ion	Ratio	Lower	Upper
56	100		
84	77.1	61.6	143.8
69	0.0	21.4	50.0#

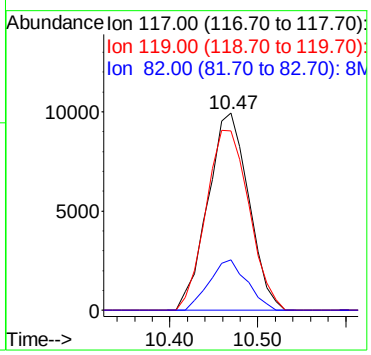


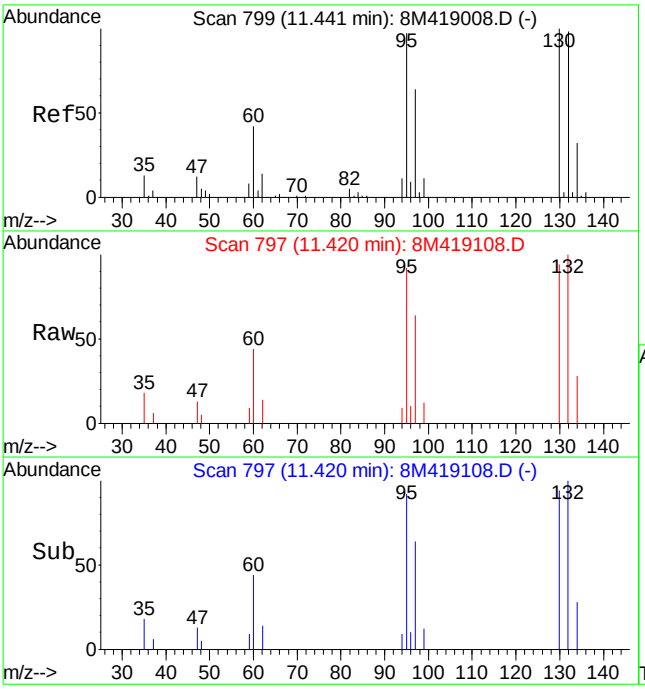


#42
Carbon Tetrachloride
Concen: 2.96 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion:117 Resp: 32074

Ion	Ratio	Lower	Upper
117	100		
119	96.3	58.5	136.5
82	23.7	14.9	34.9

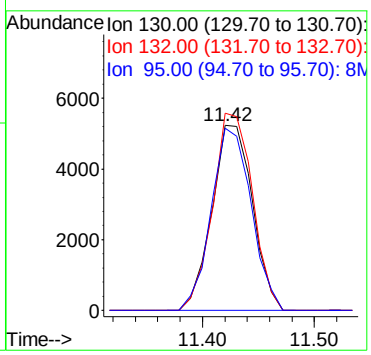


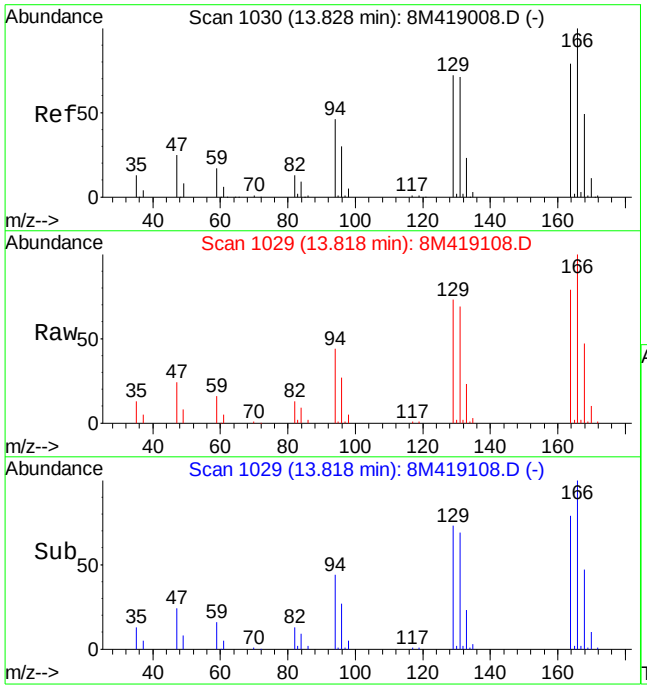


#47
Trichloroethene
Concen: 1.58 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion:130 Resp: 13222

Ion	Ratio	Lower	Upper
130	100		
132	104.2	59.4	138.6
95	96.7	60.1	140.3

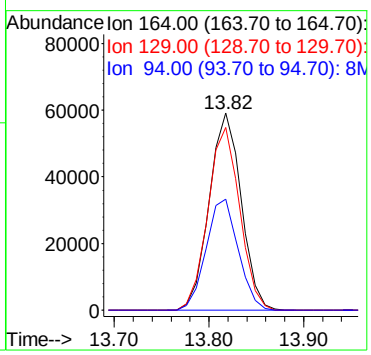




#66
Tetrachloroethene
Concen: 20.60 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419108.D
Acq: 21 Apr 2017 23:02

Tgt Ion:164 Resp: 138308

Ion	Ratio	Lower	Upper
164	100		
129	92.1	53.4	124.6
94	56.6	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419097.D Vial: 11
Acq On : 21 Apr 2017 17:34 Operator: TMB
Sample : L17041069-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 17:56:06 2017 Quant Results File: 8260WT.RES

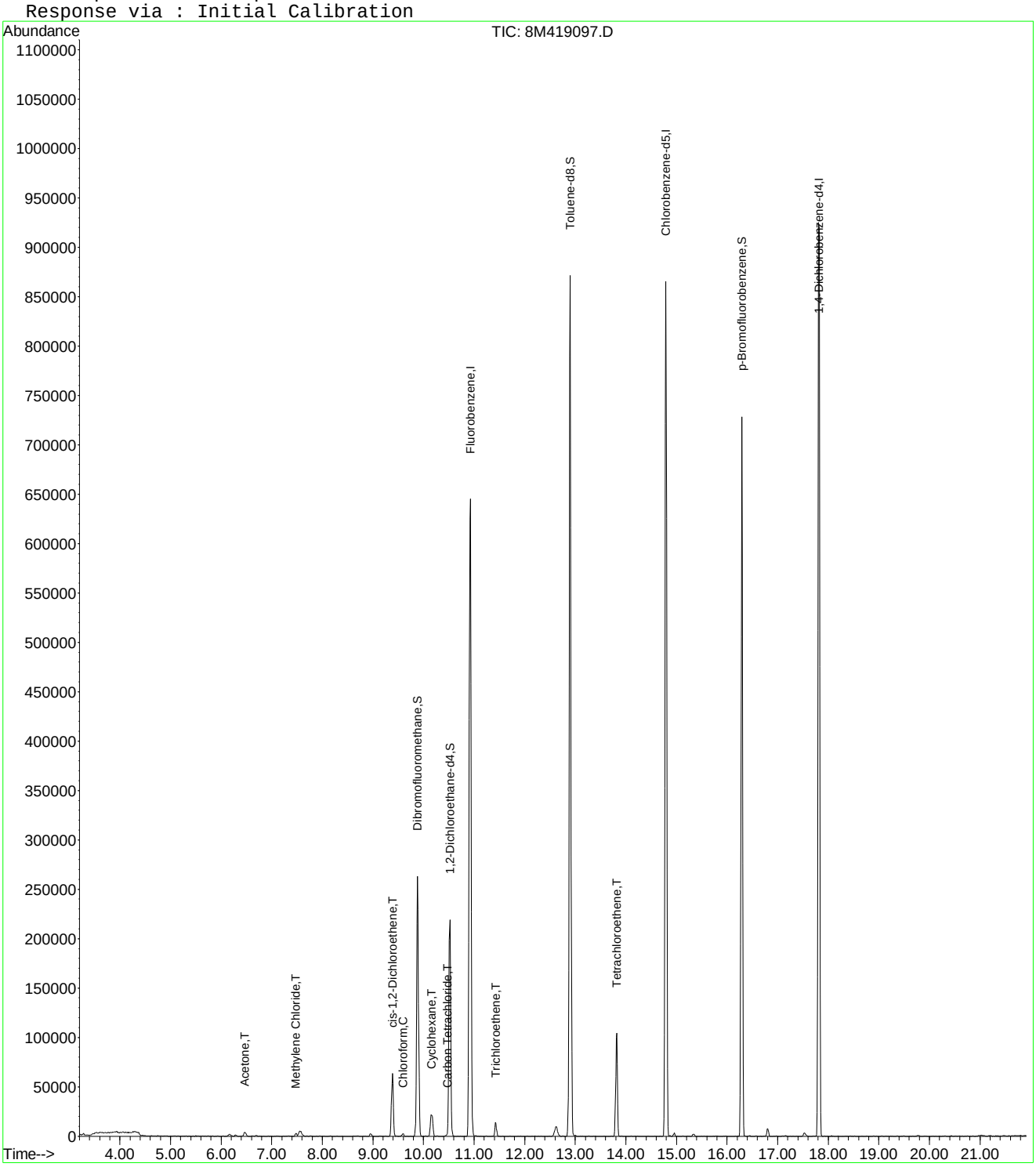
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

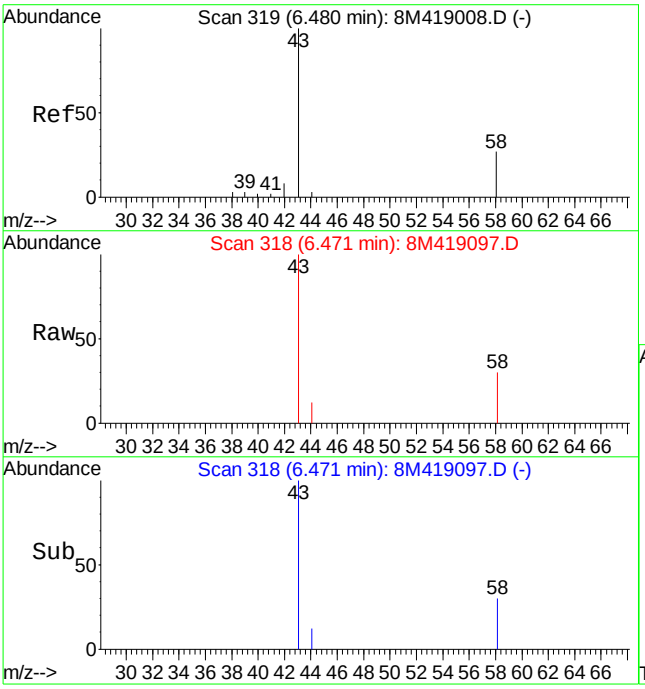
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	824060	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	658030	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	330156	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	216989	25.1046	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.40%			
43) 1,2-Dichloroethane-d4	10.52	65	190044	25.4332	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.72%			
58) Toluene-d8	12.90	98	791890	26.3379	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.36%			
80) p-Bromofluorobenzene	16.29	95	308454	26.4717	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
13) Acetone	6.47	43	8776	7.5721	ug/L	92
19) Methylene Chloride	7.47	84	1746	0.2036	ug/L	76
32) cis-1,2-Dichloroethene	9.39	96	39145	4.0788	ug/L	89
33) Chloroform	9.59	83	4004	0.2418	ug/L	87
39) Cyclohexane	10.16	56	18135	1.4577	ug/L	92
42) Carbon Tetrachloride	10.47	117	2356	0.1902	ug/L #	86
47) Trichloroethene	11.43	130	6340	0.6630	ug/L	84
66) Tetrachloroethene	13.82	164	35039	4.5541	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419097.D 8260WT.M Mon Apr 24 08:47:52 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419097.D Vial: 11
Acq On : 21 Apr 2017 17:34 Operator: TMB
Sample : L17041069-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 17:56 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

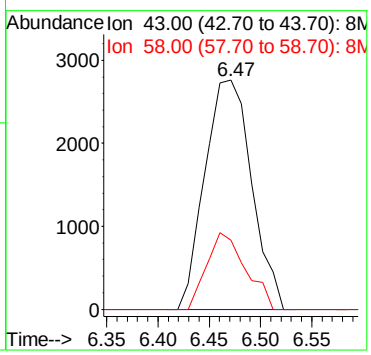


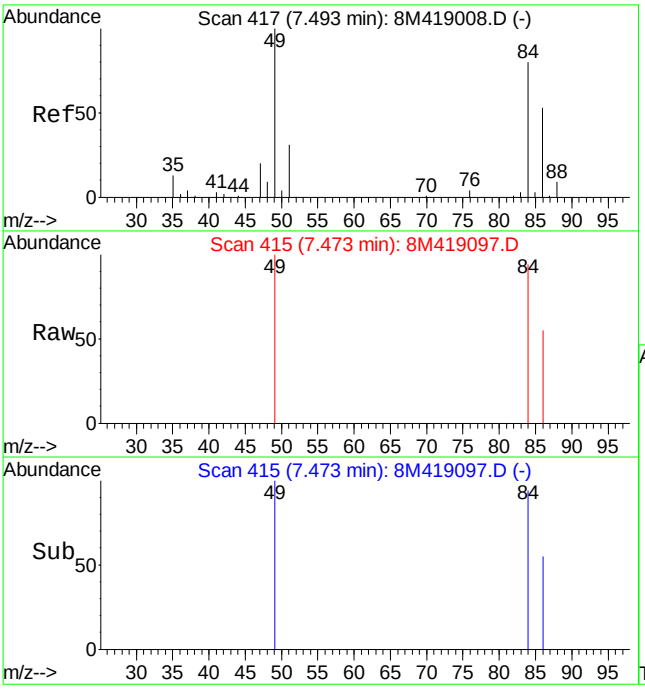


#13
Acetone
Concen: 7.57 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion: 43 Resp: 8776

Ion	Ratio	Lower	Upper
43	100		
58	27.7	19.4	45.4

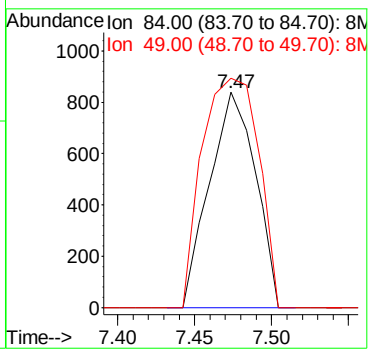


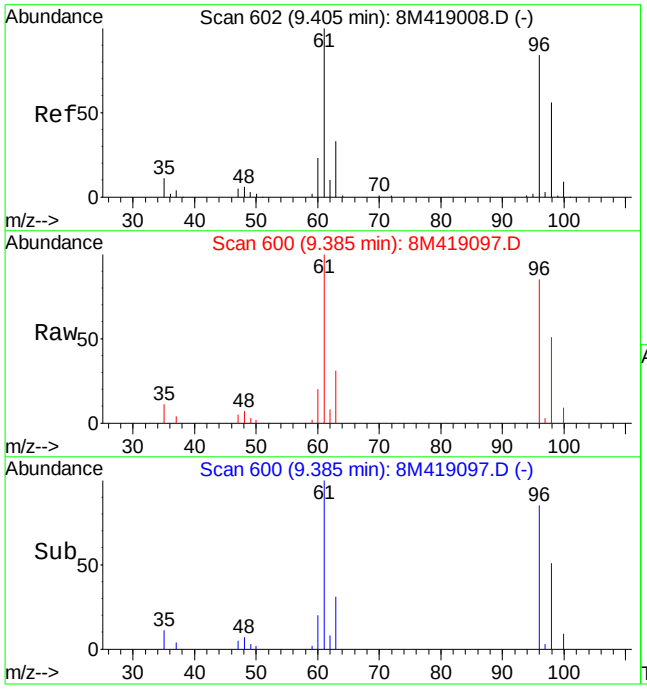


#19
Methylene Chloride
Concen: 0.20 ug/L
RT: 7.47 min Scan# 415
Delta R.T. -0.02 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion: 84 Resp: 1746

Ion	Ratio	Lower	Upper
84	100		
49	131.3	63.9	149.1

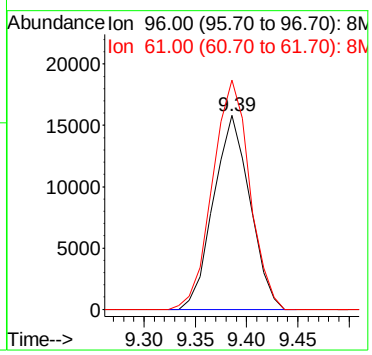


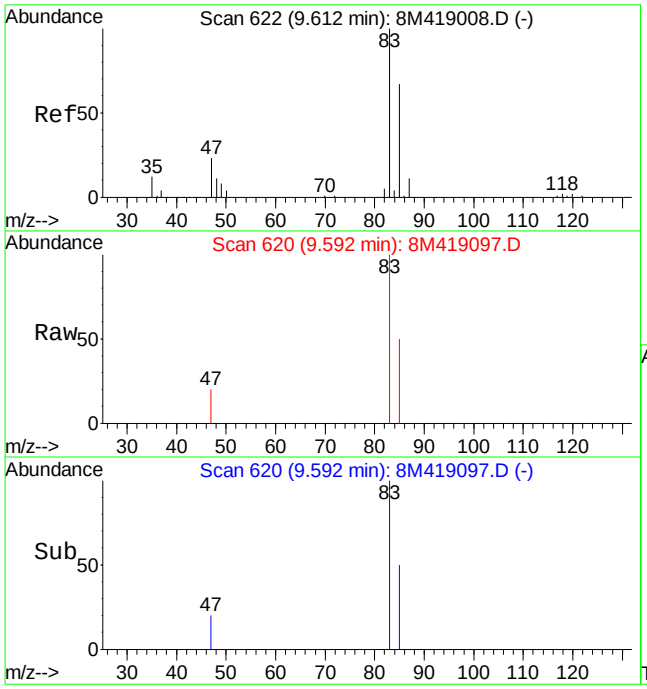


#32
cis-1,2-Dichloroethene
Concen: 4.08 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion: 96 Resp: 39145

Ion	Ratio	Lower	Upper
96	100		
61	120.3	80.3	187.3

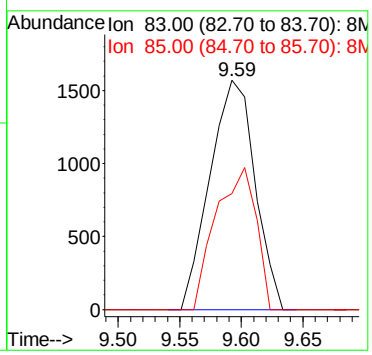


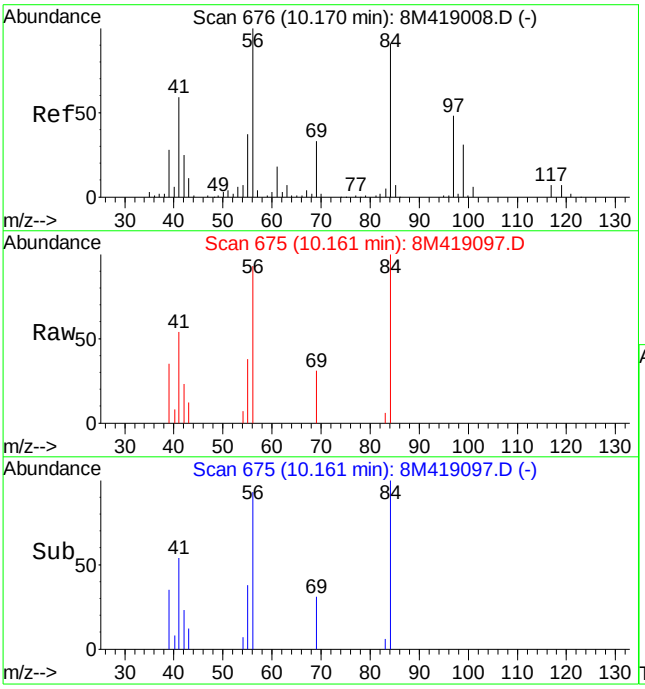


#33
Chloroform
Concen: 0.24 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion: 83 Resp: 4004

Ion	Ratio	Lower	Upper
83	100		
85	55.1	39.1	91.3

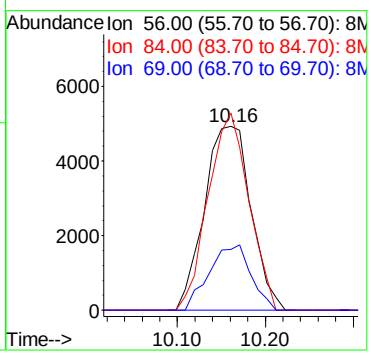


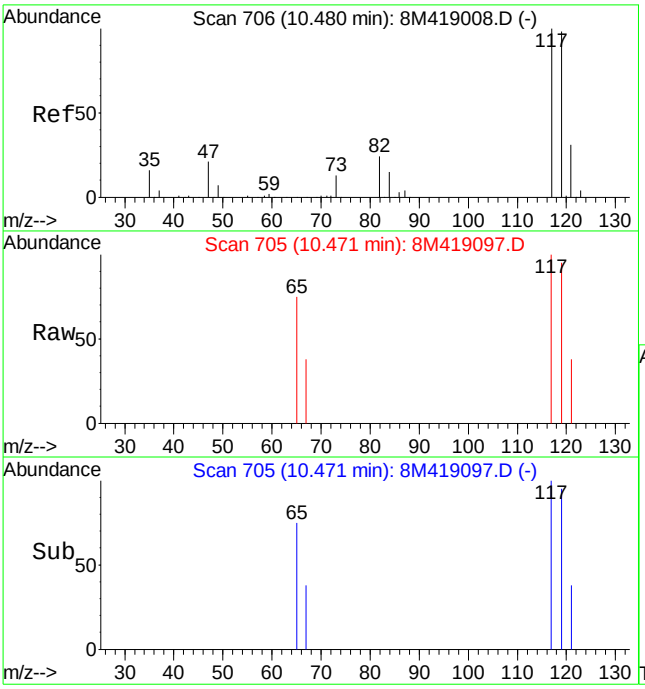


#39
Cyclohexane
Concen: 1.46 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion: 56 Resp: 18135

Ion	Ratio	Lower	Upper
56	100		
84	93.7	61.6	143.8
69	31.8	21.4	50.0

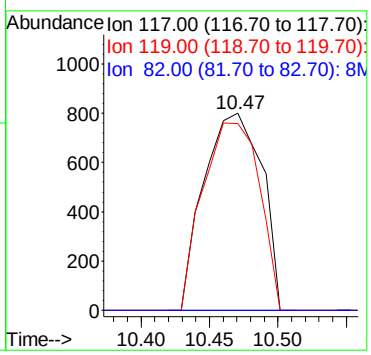


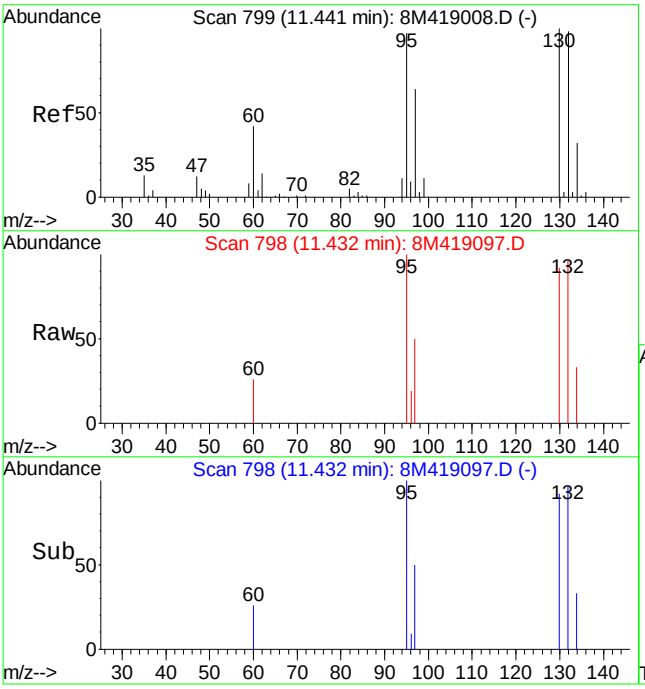


#42
Carbon Tetrachloride
Concen: 0.19 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion:117 Resp: 2356

Ion	Ratio	Lower	Upper
117	100		
119	93.0	58.5	136.5
82	0.0	14.9	34.9#

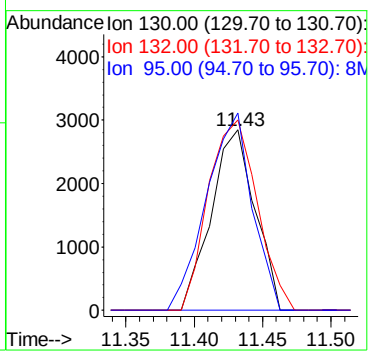


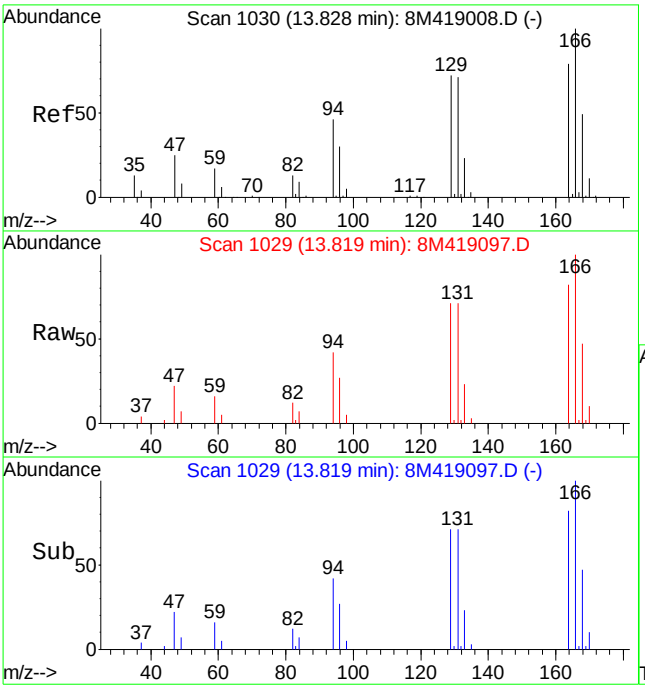


#47
Trichloroethene
Concen: 0.66 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion:130 Resp: 6340

Ion	Ratio	Lower	Upper
130	100		
132	117.3	59.4	138.6
95	113.8	60.1	140.3

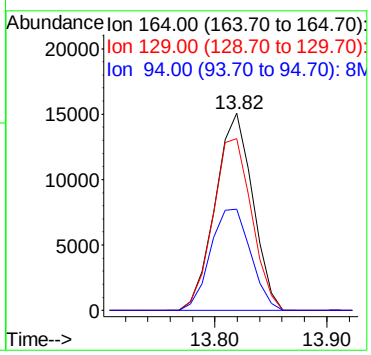




#66
Tetrachloroethene
Concen: 4.55 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419097.D
Acq: 21 Apr 2017 17:34

Tgt Ion:164 Resp: 35039

Ion	Ratio	Lower	Upper
164	100		
129	89.8	53.4	124.6
94	55.2	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419098.D Vial: 12
Acq On : 21 Apr 2017 18:03 Operator: TMB
Sample : L17041069-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 18:25:17 2017 Quant Results File: 8260WT.RES

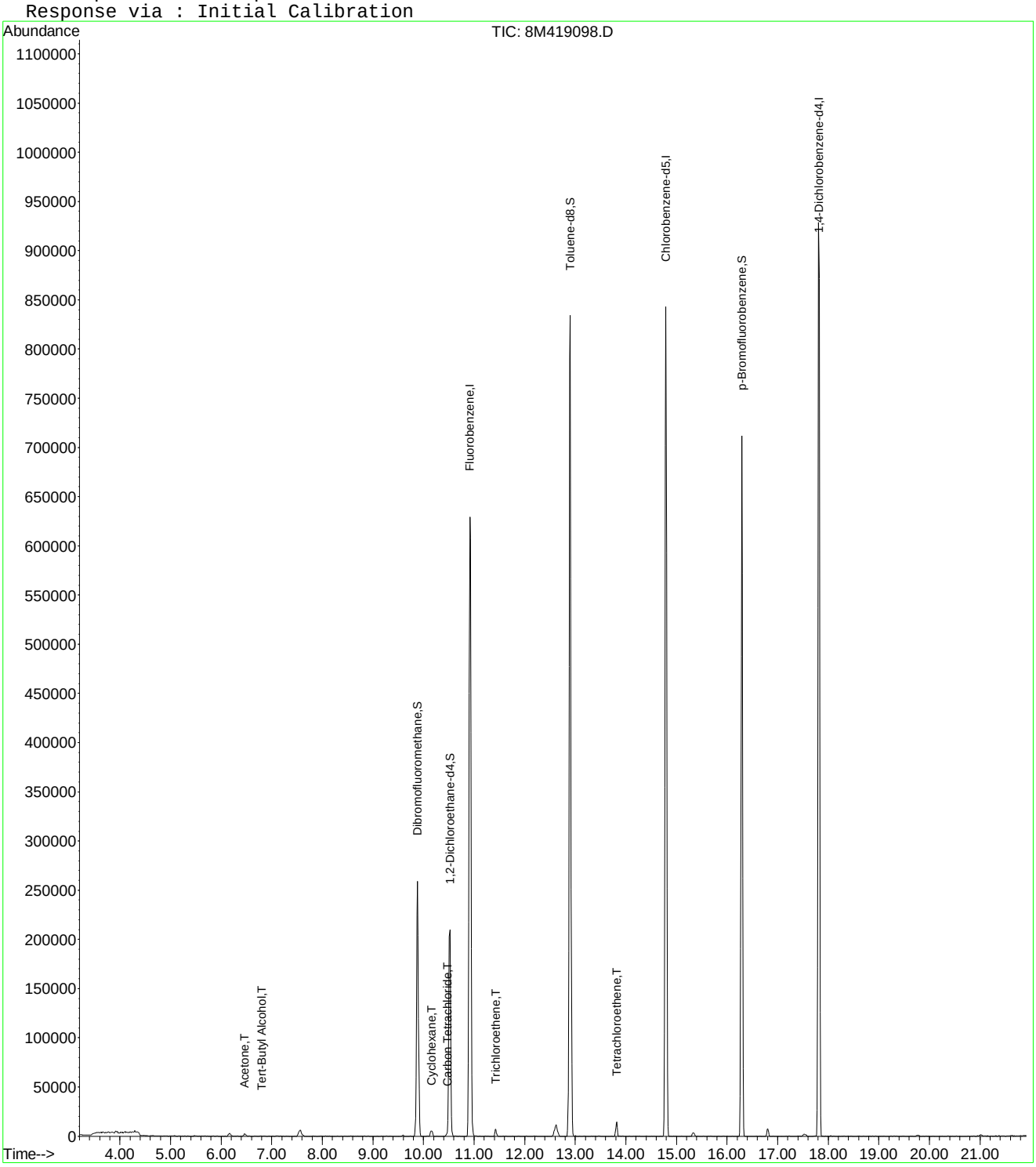
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

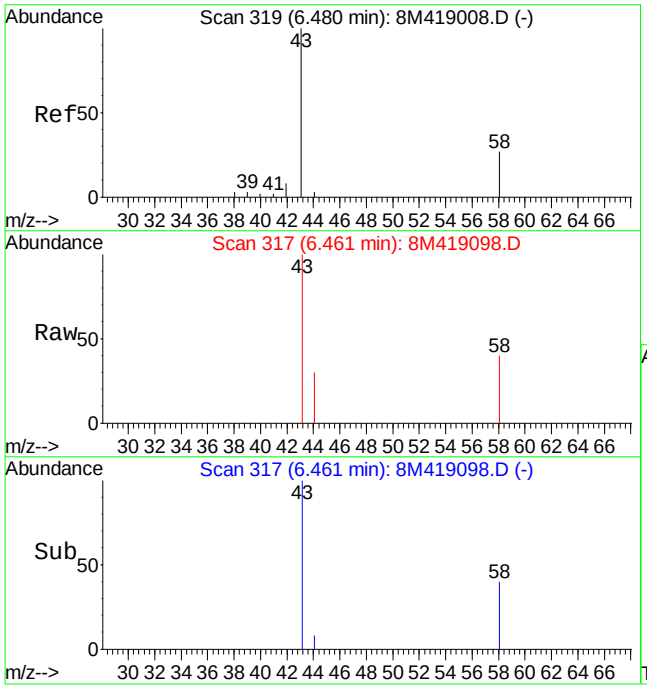
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	804216	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	635184	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	328926	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	214918	25.4785	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.92%			
43) 1,2-Dichloroethane-d4	10.52	65	185989	25.5047	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.00%			
58) Toluene-d8	12.90	98	769671	26.5196	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%			
80) p-Bromofluorobenzene	16.29	95	296820	25.5685	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.28%			
Target Compounds						Qvalue
13) Acetone	6.46	43	4570	4.0404	ug/L #	75
15) Tert-Butyl Alcohol	6.80	59	388	1.0582	ug/L #	59
39) Cyclohexane	10.16	56	4871	0.4012	ug/L #	81
42) Carbon Tetrachloride	10.47	117	3363	0.2781	ug/L #	85
47) Trichloroethene	11.43	130	3778	0.4048	ug/L	96
66) Tetrachloroethene	13.82	164	5190	0.6988	ug/L	94

(#) = qualifier out of range (m) = manual integration
8M419098.D 8260WT.M Mon Apr 24 08:47:56 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419098.D Vial: 12
Acq On : 21 Apr 2017 18:03 Operator: TMB
Sample : L17041069-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 18:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

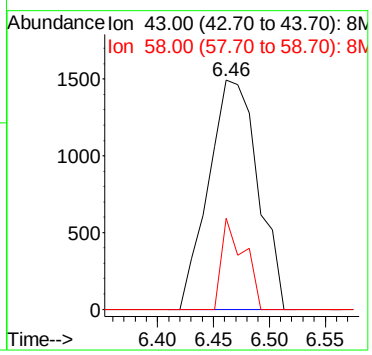


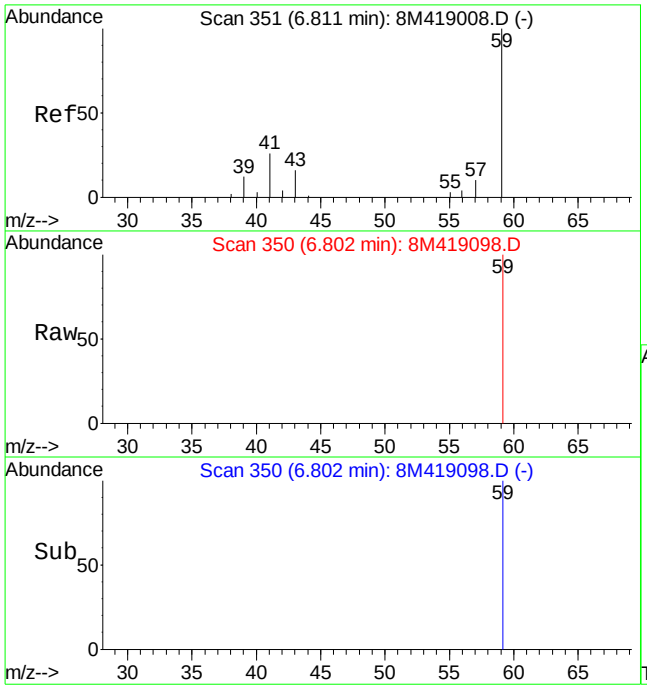


#13
Acetone
Concen: 4.04 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion: 43 Resp: 4570

Ion	Ratio	Lower	Upper
43	100		
58	18.3	19.4	45.4#

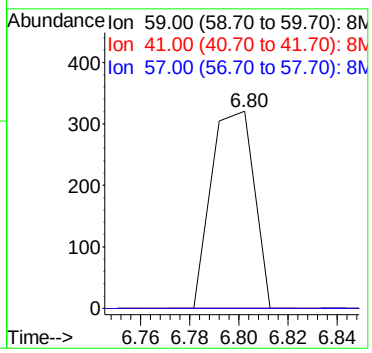


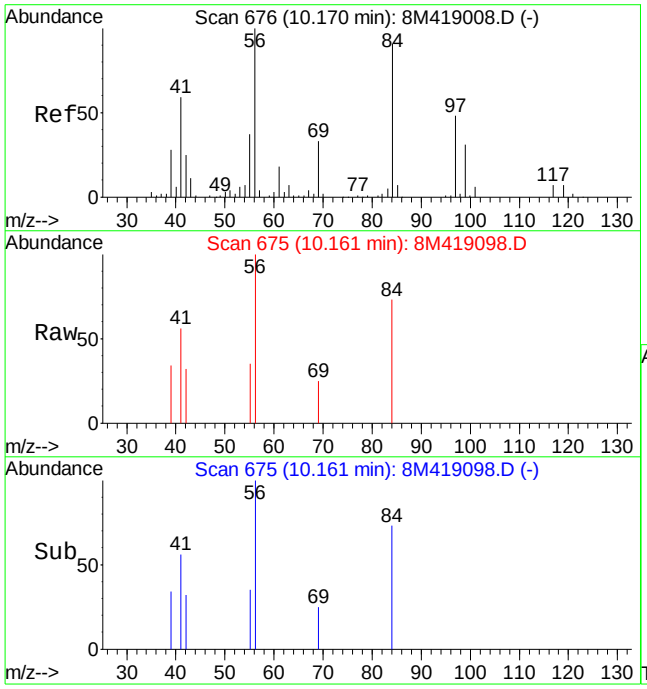


#15
Tert-Butyl Alcohol
Concen: 1.06 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion: 59 Resp: 388

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

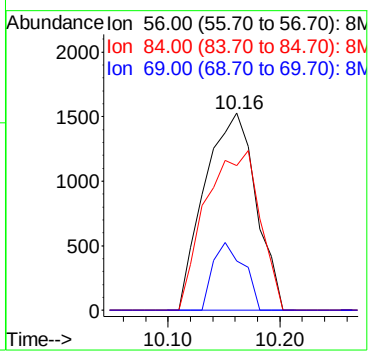


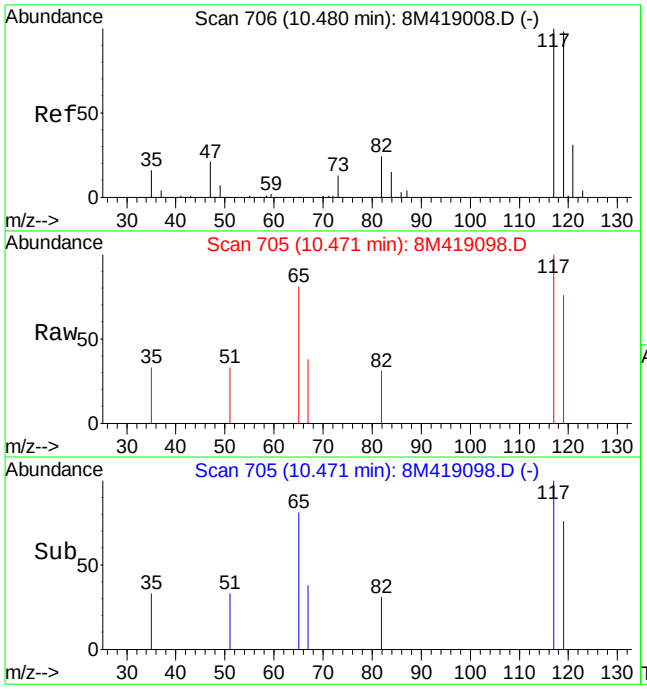


#39
Cyclohexane
Concen: 0.40 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion: 56 Resp: 4871

Ion	Ratio	Lower	Upper
56	100		
84	85.4	61.6	143.8
69	20.7	21.4	50.0#

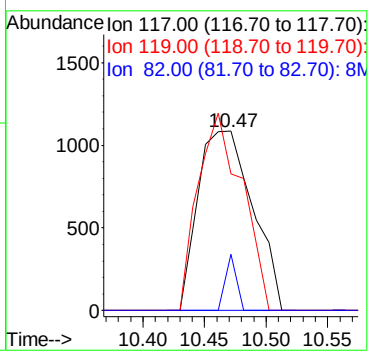


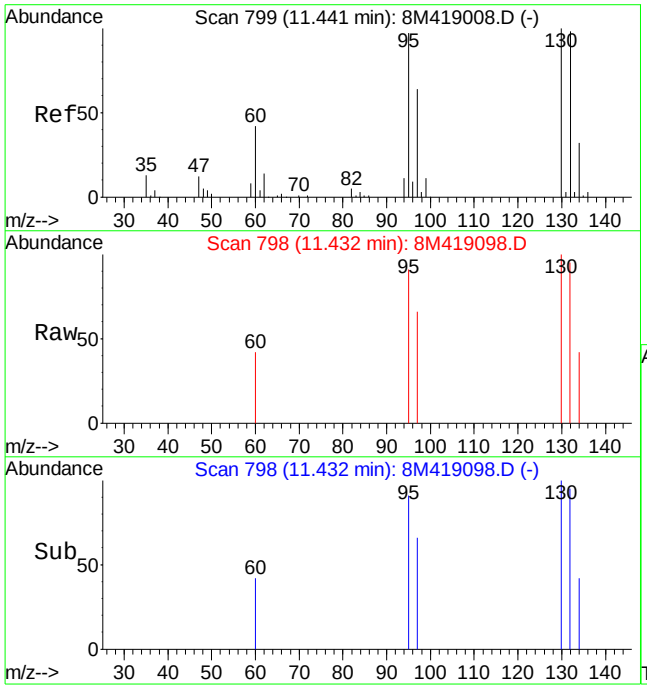


#42
Carbon Tetrachloride
Concen: 0.28 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion:117 Resp: 3363

Ion	Ratio	Lower	Upper
117	100		
119	88.6	58.5	136.5
82	6.3	14.9	34.9#

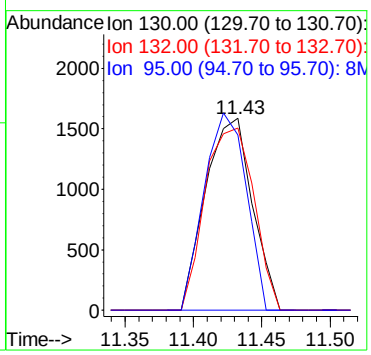


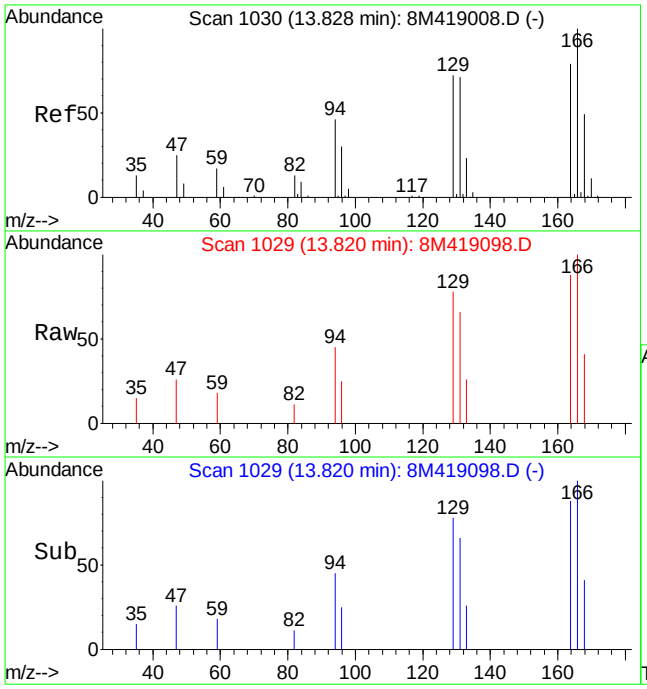


#47
Trichloroethene
Concen: 0.40 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion:130 Resp: 3778

Ion	Ratio	Lower	Upper
130	100		
132	99.1	59.4	138.6
95	92.4	60.1	140.3

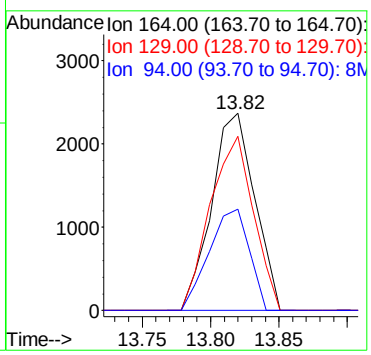




#66
Tetrachloroethene
Concen: 0.70 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419098.D
Acq: 21 Apr 2017 18:03

Tgt Ion:164 Resp: 5190

Ion	Ratio	Lower	Upper
164	100		
129	88.3	53.4	124.6
94	47.9	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419109.D Vial: 23
Acq On : 21 Apr 2017 23:32 Operator: TMB
Sample : L17041069-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 23:54:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

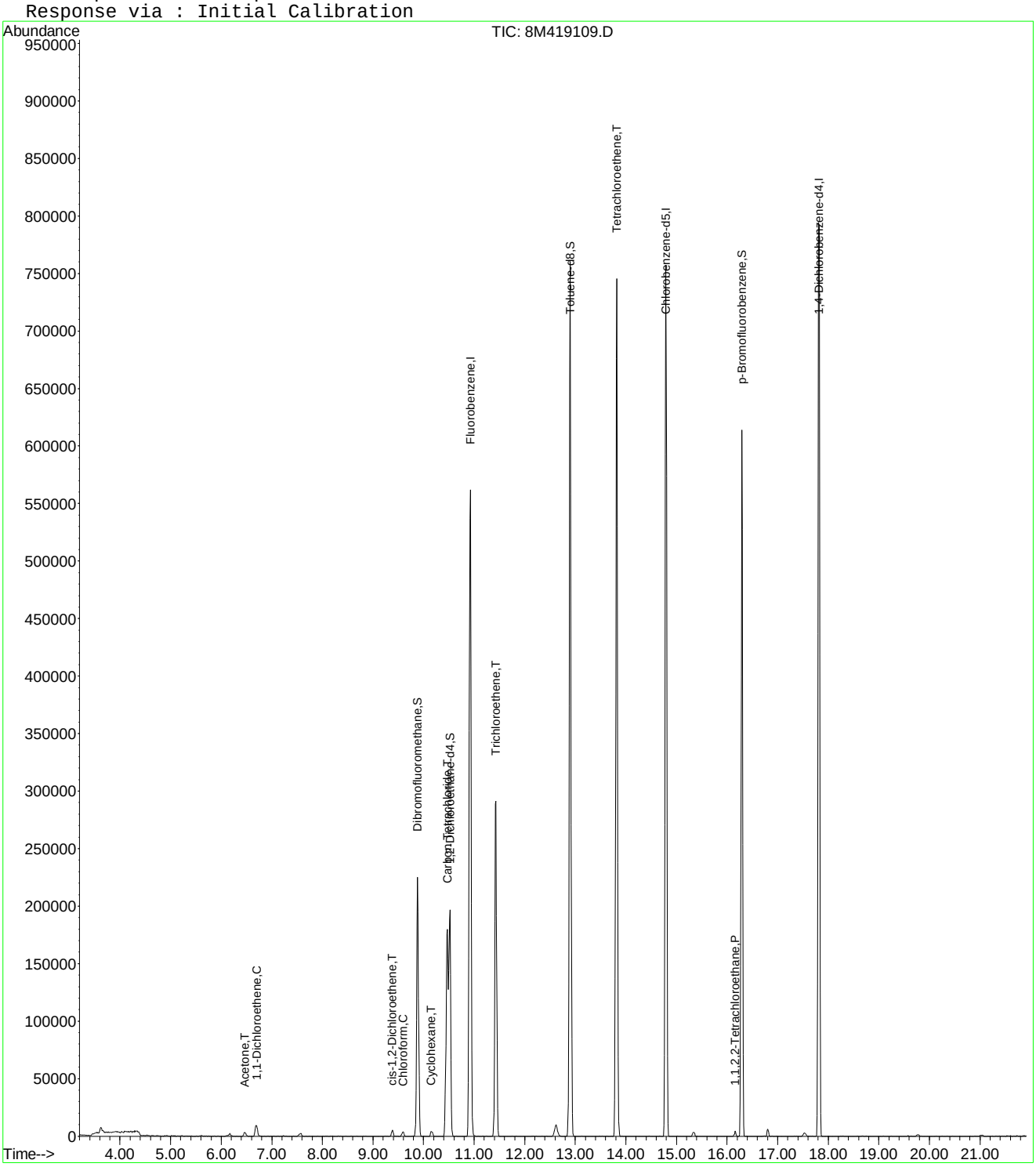
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	712753	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	560810	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	283612	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	189412	25.3362 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.36%		
43) 1,2-Dichloroethane-d4	10.52	65	163268	25.2620 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.04%		
58) Toluene-d8	12.90	98	688260	26.8595 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.44%		
80) p-Bromofluorobenzene	16.29	95	262031	26.1782 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.72%		
Target Compounds					Qvalue
13) Acetone	6.47	43	7084	7.0668 ug/L	79
14) 1,1-Dichloroethene	6.70	61	11685	1.1320 ug/L	93
32) cis-1,2-Dichloroethene	9.37	96	3575	0.4307 ug/L	100
33) Chloroform	9.59	83	5562	0.3884 ug/L	93
39) Cyclohexane	10.15	56	3535	0.3285 ug/L	85
42) Carbon Tetrachloride	10.47	117	174864	16.3173 ug/L	99
47) Trichloroethene	11.43	130	129730	15.6838 ug/L	98
66) Tetrachloroethene	13.82	164	230750	35.1906 ug/L	99
79) 1,1,2,2-Tetrachloroethane	16.15	83	4287	0.8011 ug/L #	91

(#) = qualifier out of range (m) = manual integration
8M419109.D 8260WT.M Mon Apr 24 08:48:47 2017 Page 1

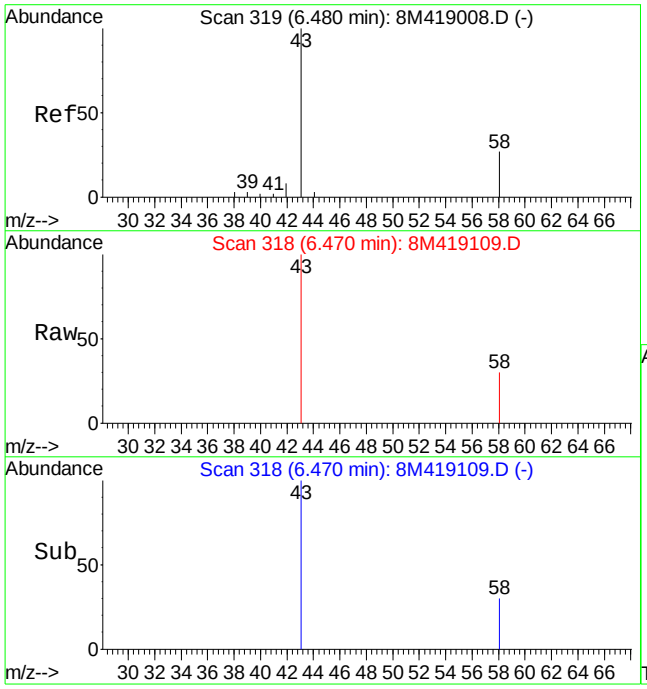
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419109.D Vial: 23
Acq On : 21 Apr 2017 23:32 Operator: TMB
Sample : L17041069-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 23:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



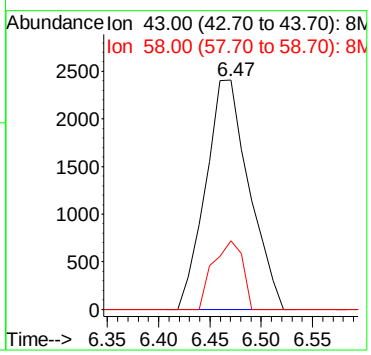
8M419109.D 8260WT.M Mon Apr 24 08:48:47 2017 Page 2

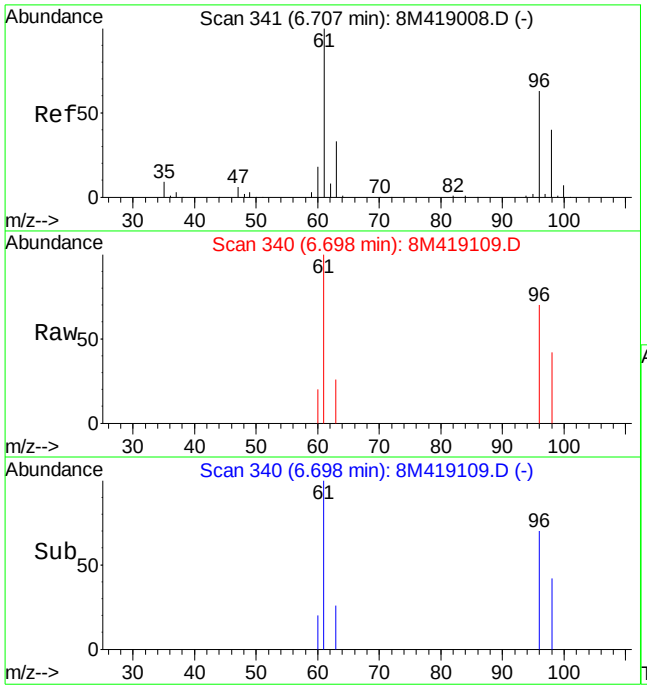


#13
Acetone
Concen: 7.07 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 43 Resp: 7084

Ion	Ratio	Lower	Upper
43	100		
58	20.4	19.4	45.4

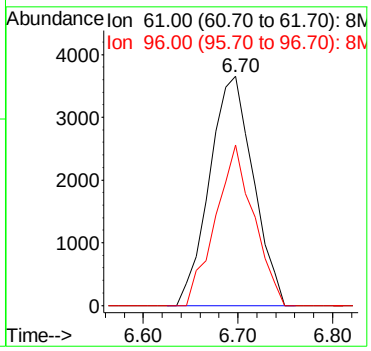


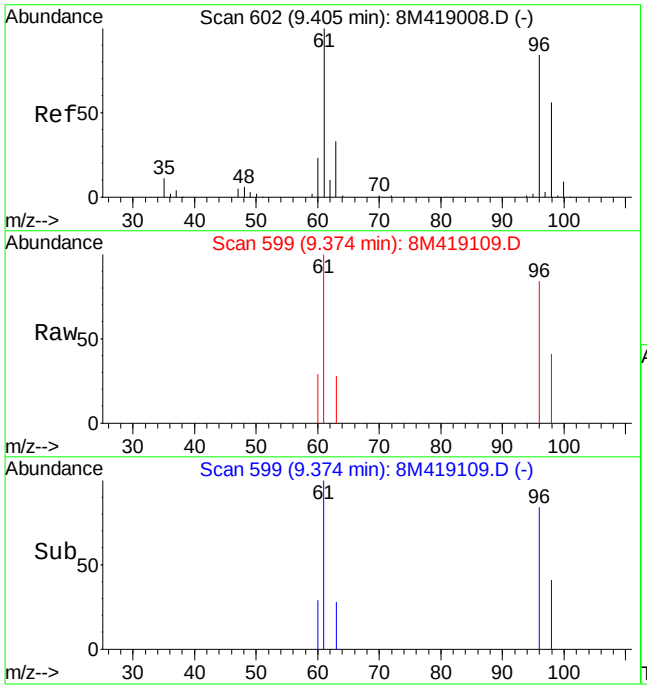


#14
1,1-Dichloroethene
Concen: 1.13 ug/L
RT: 6.70 min Scan# 340
Delta R.T. -0.00 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 61 Resp: 11685

Ion	Ratio	Lower	Upper
61	100		
96	61.2	40.0	93.4

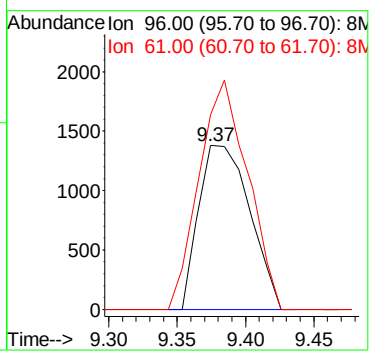


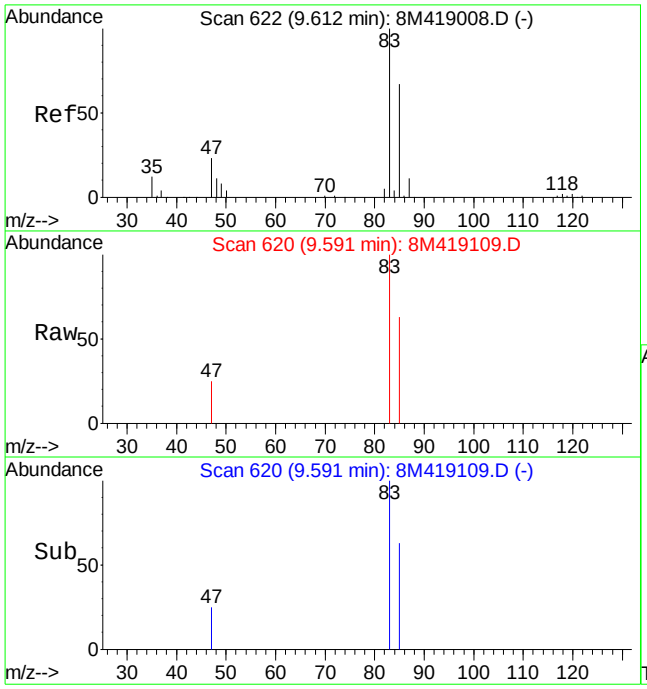


#32
cis-1,2-Dichloroethene
Concen: 0.43 ug/L
RT: 9.37 min Scan# 599
Delta R.T. -0.03 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 96 Resp: 3575

Ion	Ratio	Lower	Upper
96	100		
61	133.5	80.3	187.3

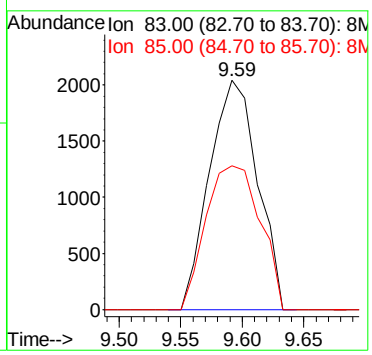


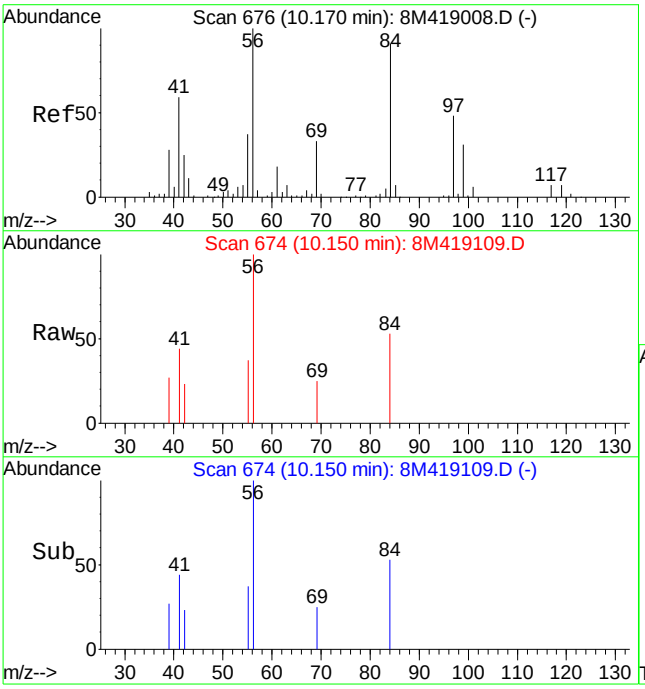


#33
Chloroform
Concen: 0.39 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 83 Resp: 5562

Ion	Ratio	Lower	Upper
83	100		
85	70.9	39.1	91.3

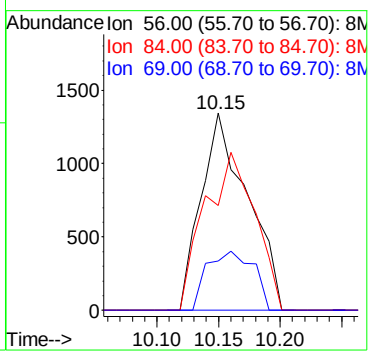


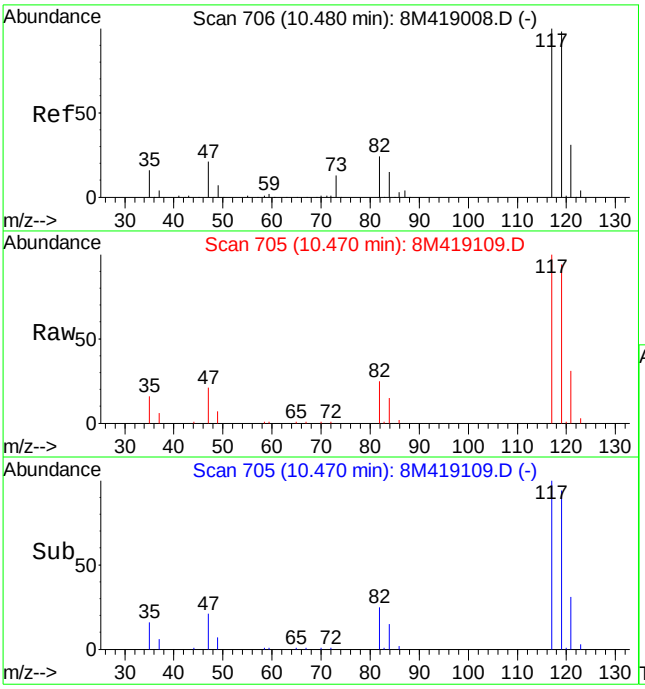


#39
Cyclohexane
Concen: 0.33 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 56 Resp: 3535

Ion	Ratio	Lower	Upper
56	100		
84	86.0	61.6	143.8
69	29.9	21.4	50.0

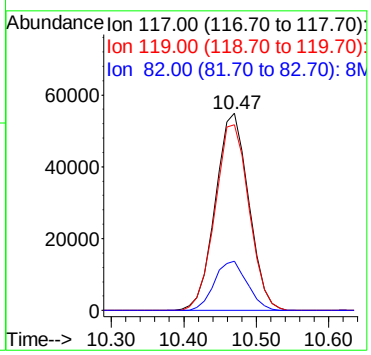


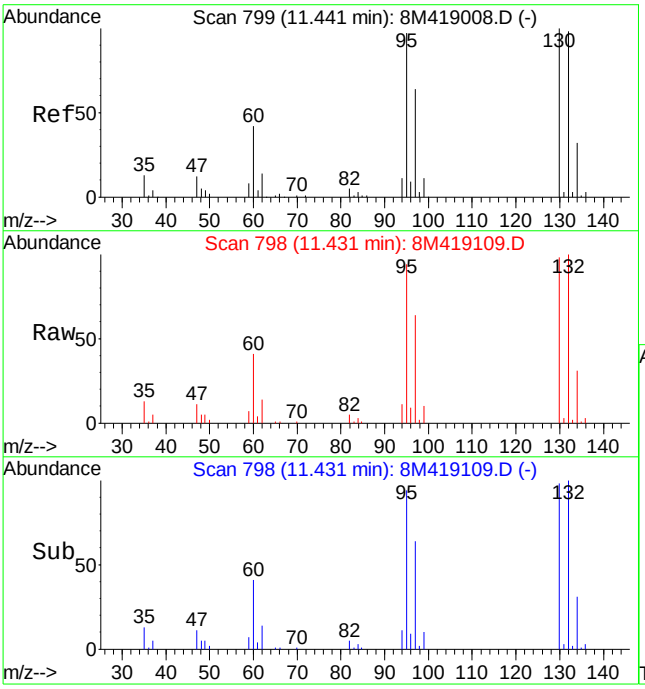


#42
Carbon Tetrachloride
Concen: 16.32 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion:117 Resp: 174864

Ion	Ratio	Lower	Upper
117	100		
119	95.8	58.5	136.5
82	24.5	14.9	34.9

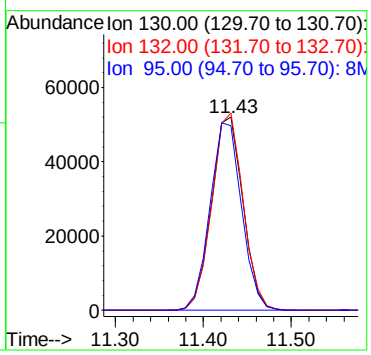


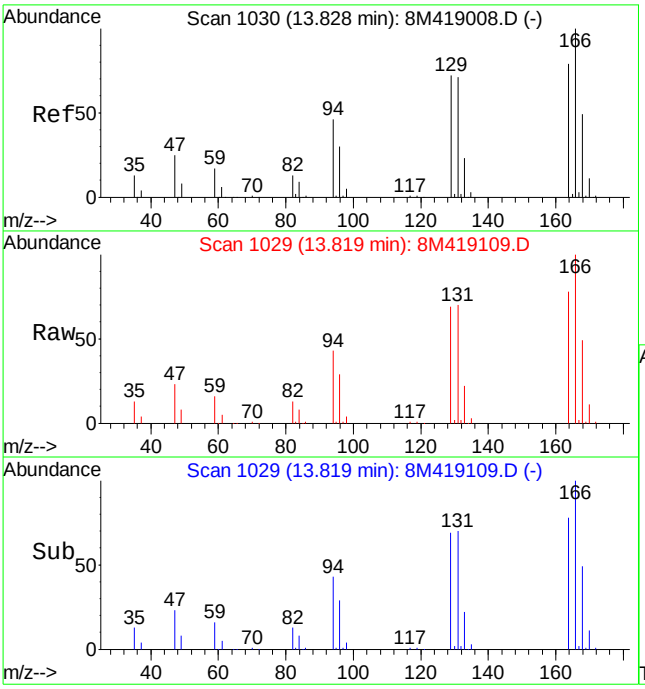


#47
Trichloroethene
Concen: 15.68 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion:130 Resp: 129730

Ion	Ratio	Lower	Upper
130	100		
132	100.7	59.4	138.6
95	97.0	60.1	140.3

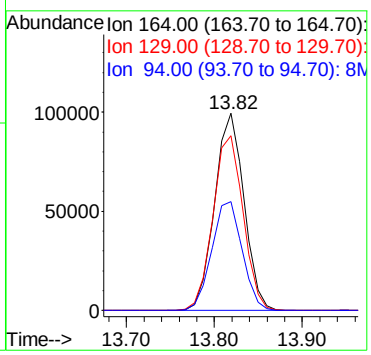


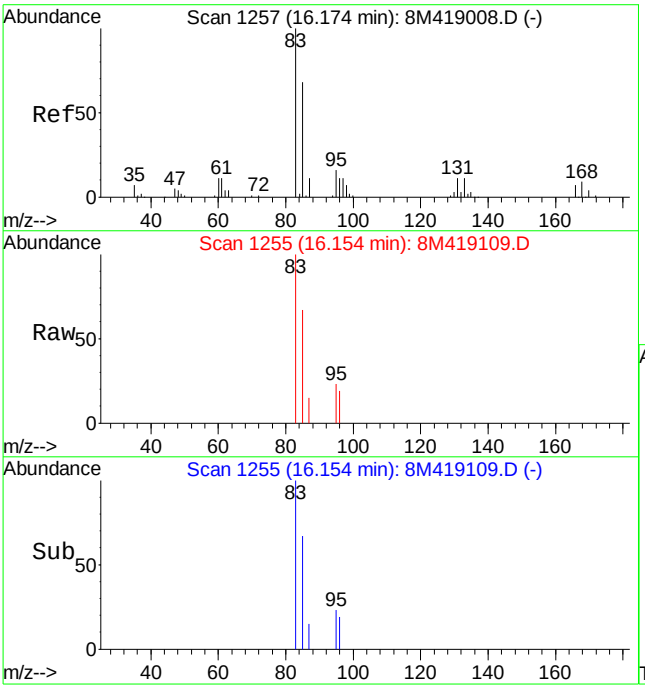


#66
Tetrachloroethene
Concen: 35.19 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion:164 Resp: 230750

Ion	Ratio	Lower	Upper
164	100		
129	90.7	53.4	124.6
94	57.3	34.7	81.1

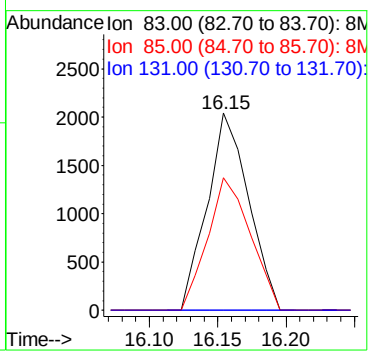




#79
1,1,2,2-Tetrachloroethane
Concen: 0.80 ug/L
RT: 16.15 min Scan# 1255
Delta R.T. -0.02 min
Lab File: 8M419109.D
Acq: 21 Apr 2017 23:32

Tgt Ion: 83 Resp: 4287

Ion	Ratio	Lower	Upper
83	100		
85	69.4	38.7	90.3
131	0.0	5.9	13.7#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419099.D Vial: 13
Acq On : 21 Apr 2017 18:34 Operator: TMB
Sample : L17041069-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 18:56:00 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

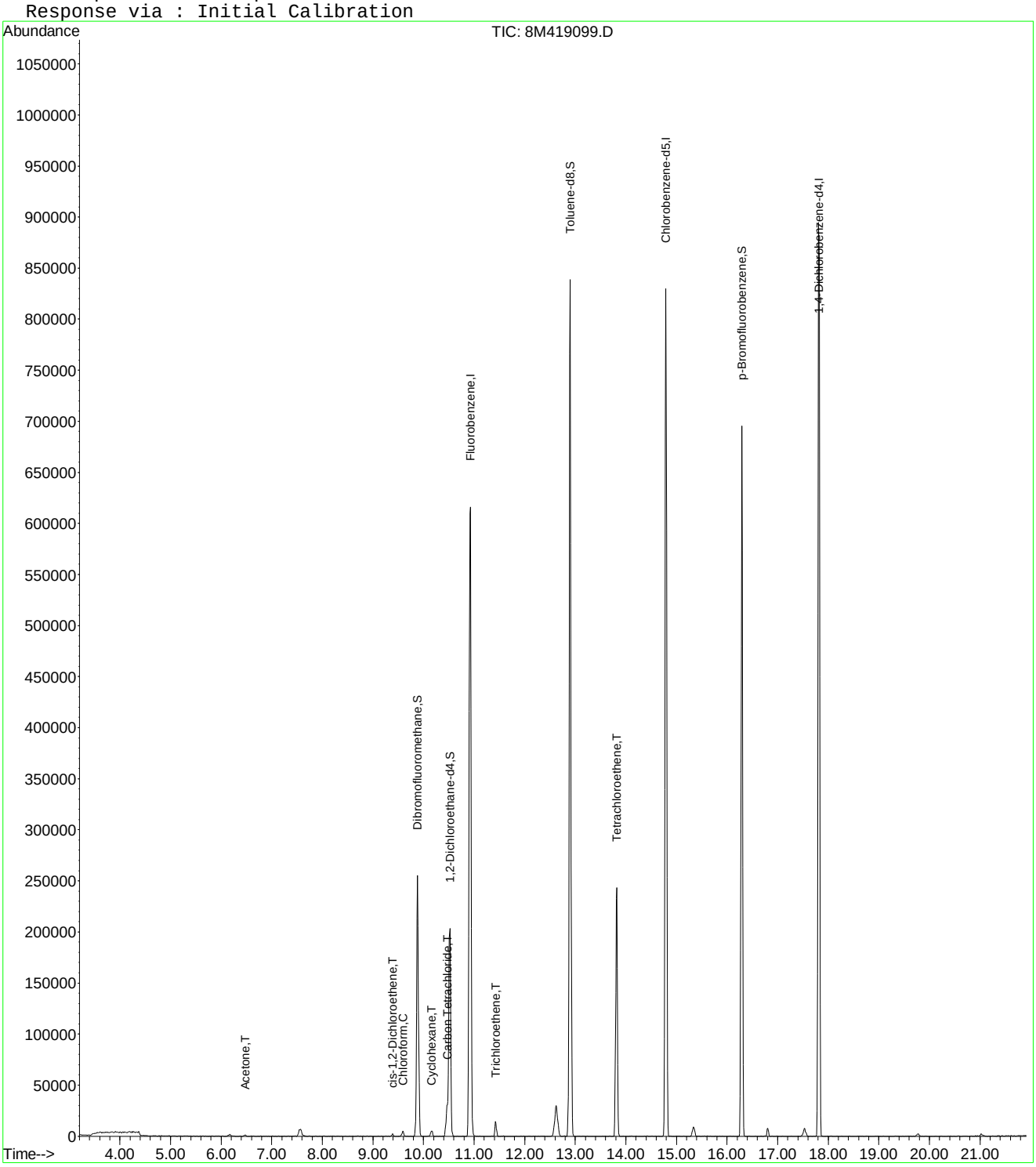
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	790520	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	624403	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	317712	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	207951	25.0797 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.32%		
43) 1,2-Dichloroethane-d4	10.52	65	177206	24.7213 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.88%		
58) Toluene-d8	12.90	98	759552	26.6228 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%		
80) p-Bromofluorobenzene	16.29	95	293660	26.1892 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.76%		
Target Compounds					Qvalue
13) Acetone	6.48	43	1738	1.5632 ug/L #	42
32) cis-1,2-Dichloroethene	9.39	96	1366	0.1484 ug/L	80
33) Chloroform	9.59	83	5980	0.3765 ug/L	96
39) Cyclohexane	10.16	56	4288	0.3593 ug/L #	82
42) Carbon Tetrachloride	10.47	117	30727	2.5852 ug/L	98
47) Trichloroethene	11.43	130	6730	0.7336 ug/L	98
66) Tetrachloroethene	13.82	164	77174	10.5708 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419099.D 8260WT.M Mon Apr 24 08:48:00 2017 Page 1

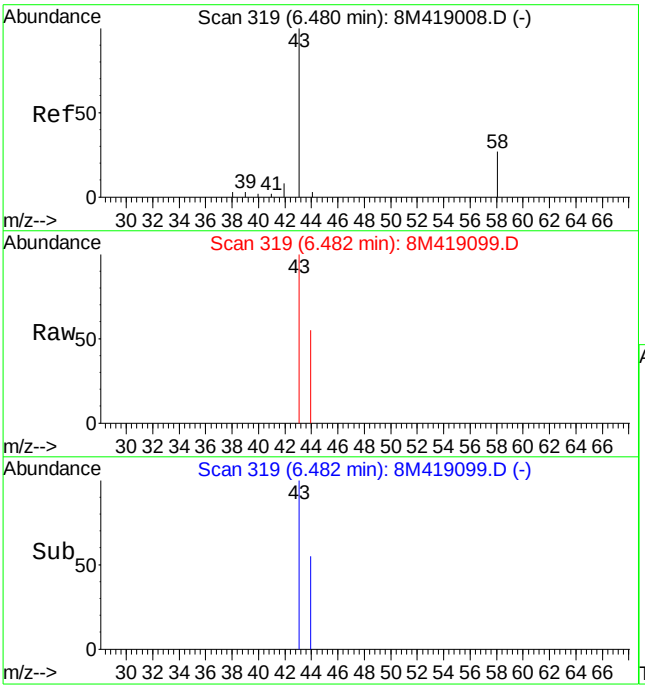
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419099.D Vial: 13
Acq On : 21 Apr 2017 18:34 Operator: TMB
Sample : L17041069-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 18:56 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



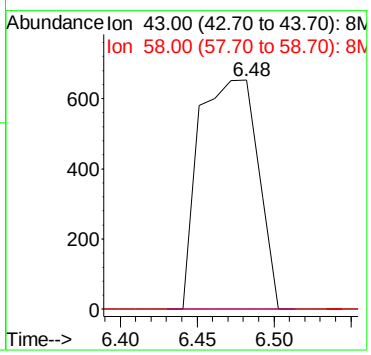
8M419099.D 8260WT.M Mon Apr 24 08:48:00 2017 Page 2

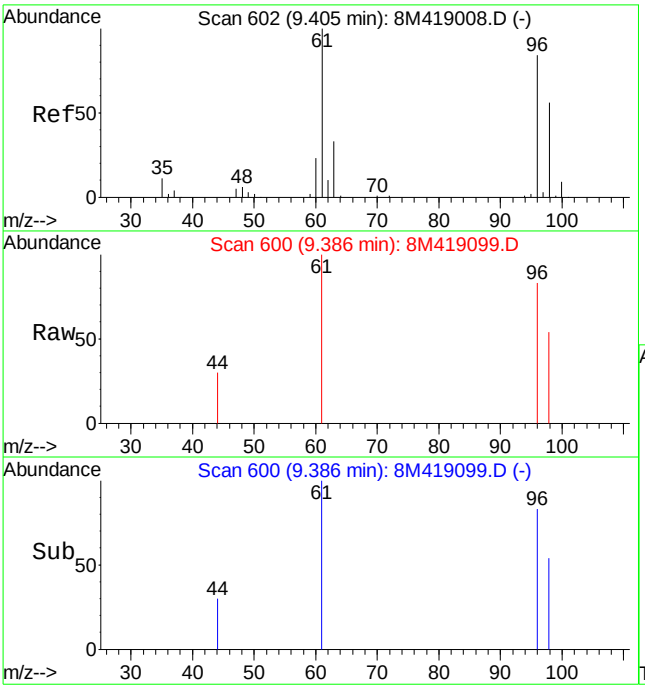


#13
Acetone
Concen: 1.56 ug/L
RT: 6.48 min Scan# 319
Delta R.T. 0.00 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion: 43 Resp: 1738

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

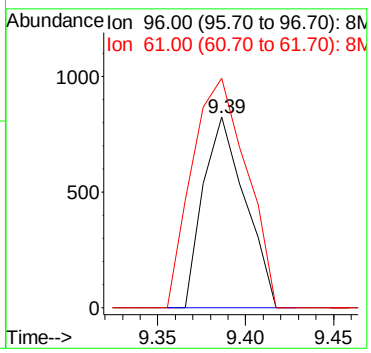


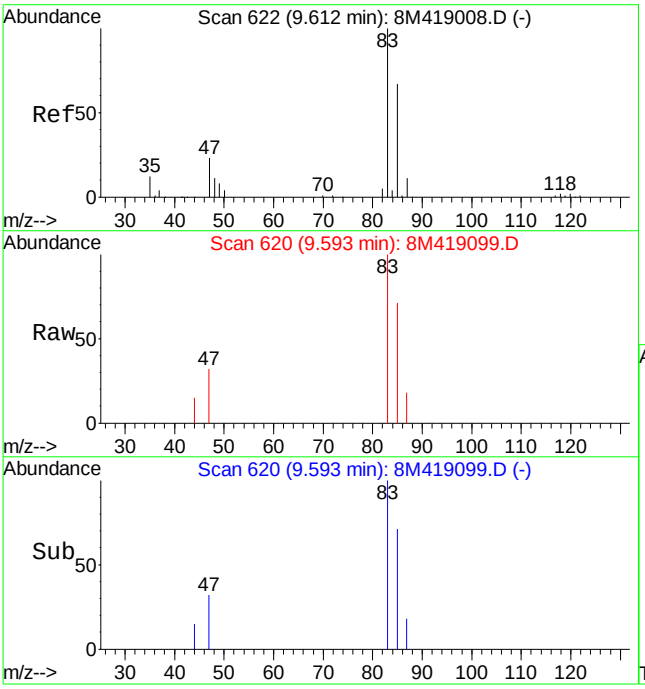


#32
cis-1,2-Dichloroethene
Concen: 0.15 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion: 96 Resp: 1366

Ion	Ratio	Lower	Upper
96	100		
61	157.4	80.3	187.3

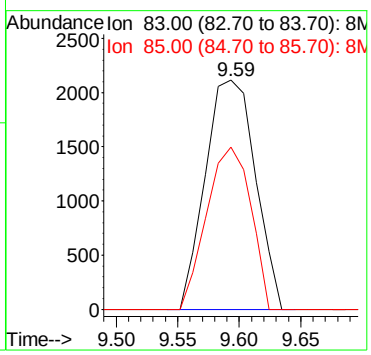


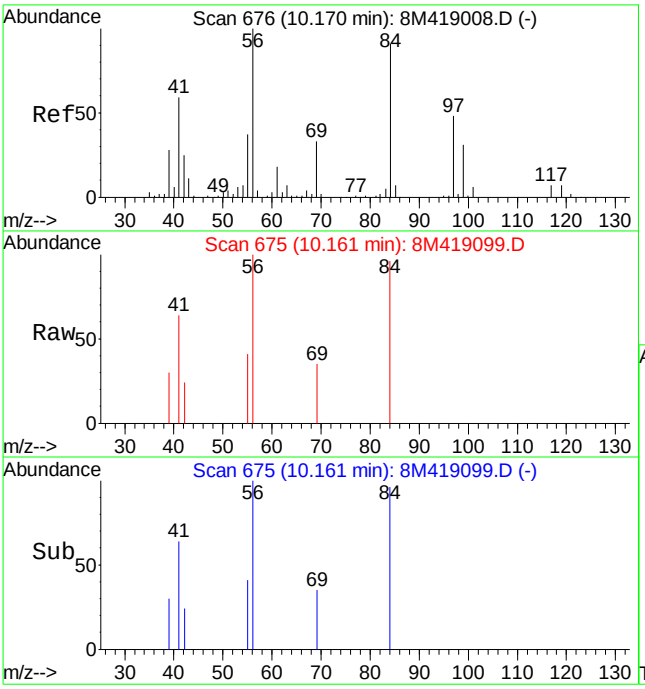


#33
Chloroform
Concen: 0.38 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion: 83 Resp: 5980

Ion	Ratio	Lower	Upper
83	100		
85	62.3	39.1	91.3

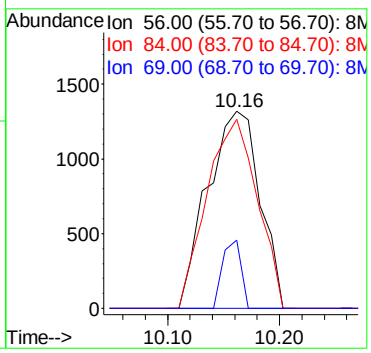


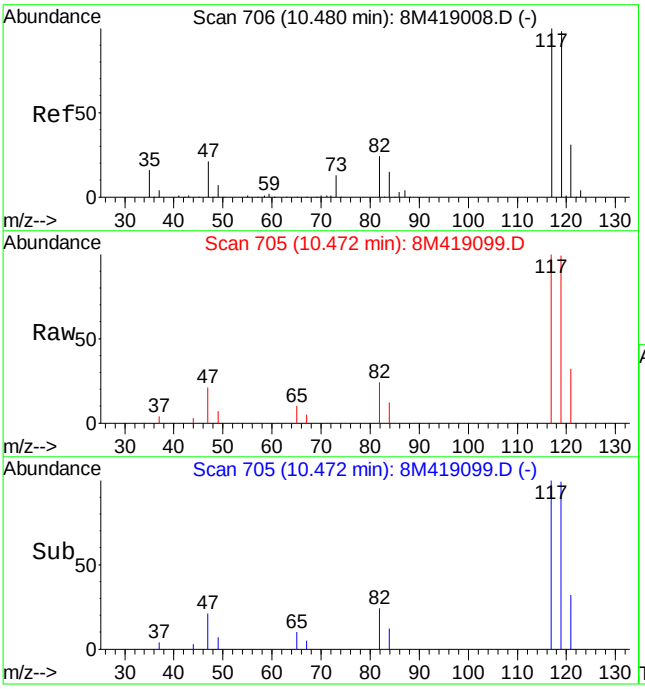


#39
Cyclohexane
Concen: 0.36 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion: 56 Resp: 4288

Ion	Ratio	Lower	Upper
56	100		
84	92.3	61.6	143.8
69	12.3	21.4	50.0#

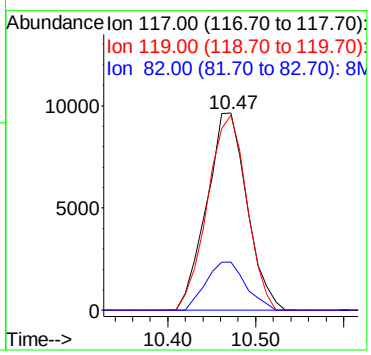


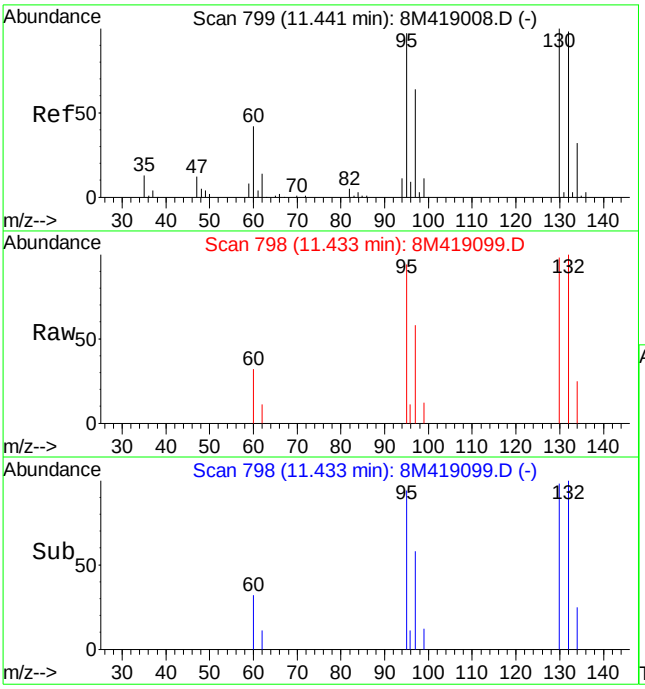


#42
Carbon Tetrachloride
Concen: 2.59 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion:117 Resp: 30727

Ion	Ratio	Lower	Upper
117	100		
119	96.0	58.5	136.5
82	24.1	14.9	34.9

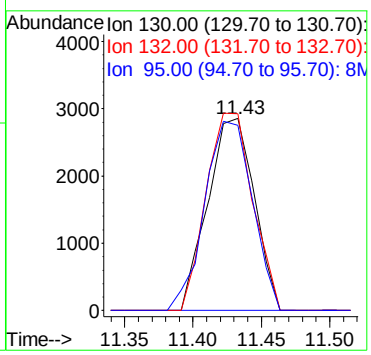


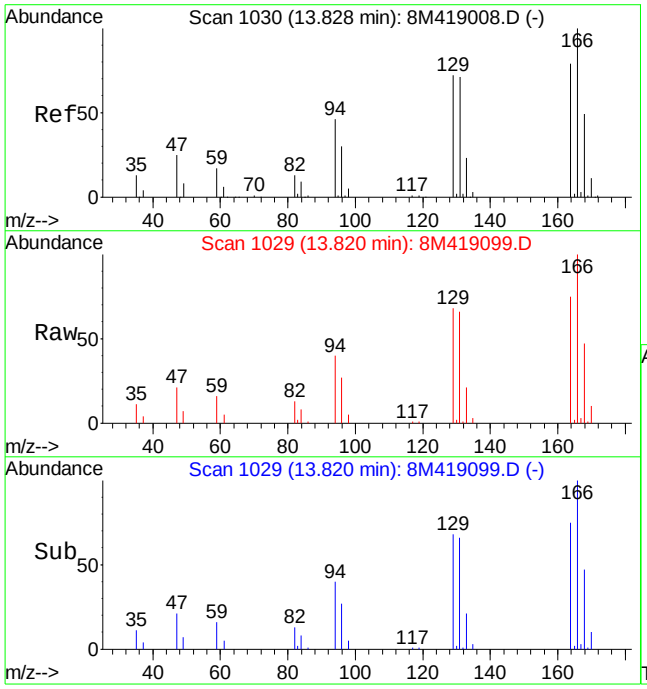


#47
Trichloroethene
Concen: 0.73 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion:130 Resp: 6730

Ion	Ratio	Lower	Upper
130	100		
132	102.8	59.4	138.6
95	101.1	60.1	140.3

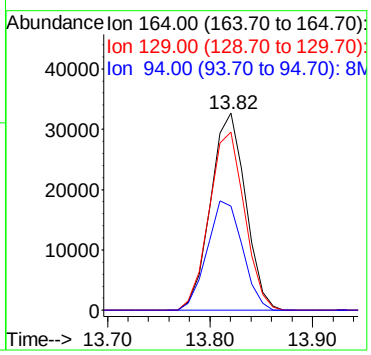




#66
Tetrachloroethene
Concen: 10.57 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419099.D
Acq: 21 Apr 2017 18:34

Tgt Ion:164 Resp: 77174

Ion	Ratio	Lower	Upper
164	100		
129	91.5	53.4	124.6
94	56.1	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419106.D Vial: 20
Acq On : 21 Apr 2017 22:02 Operator: TMB
Sample : L17041069-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 22:24:23 2017 Quant Results File: 8260WT.RES

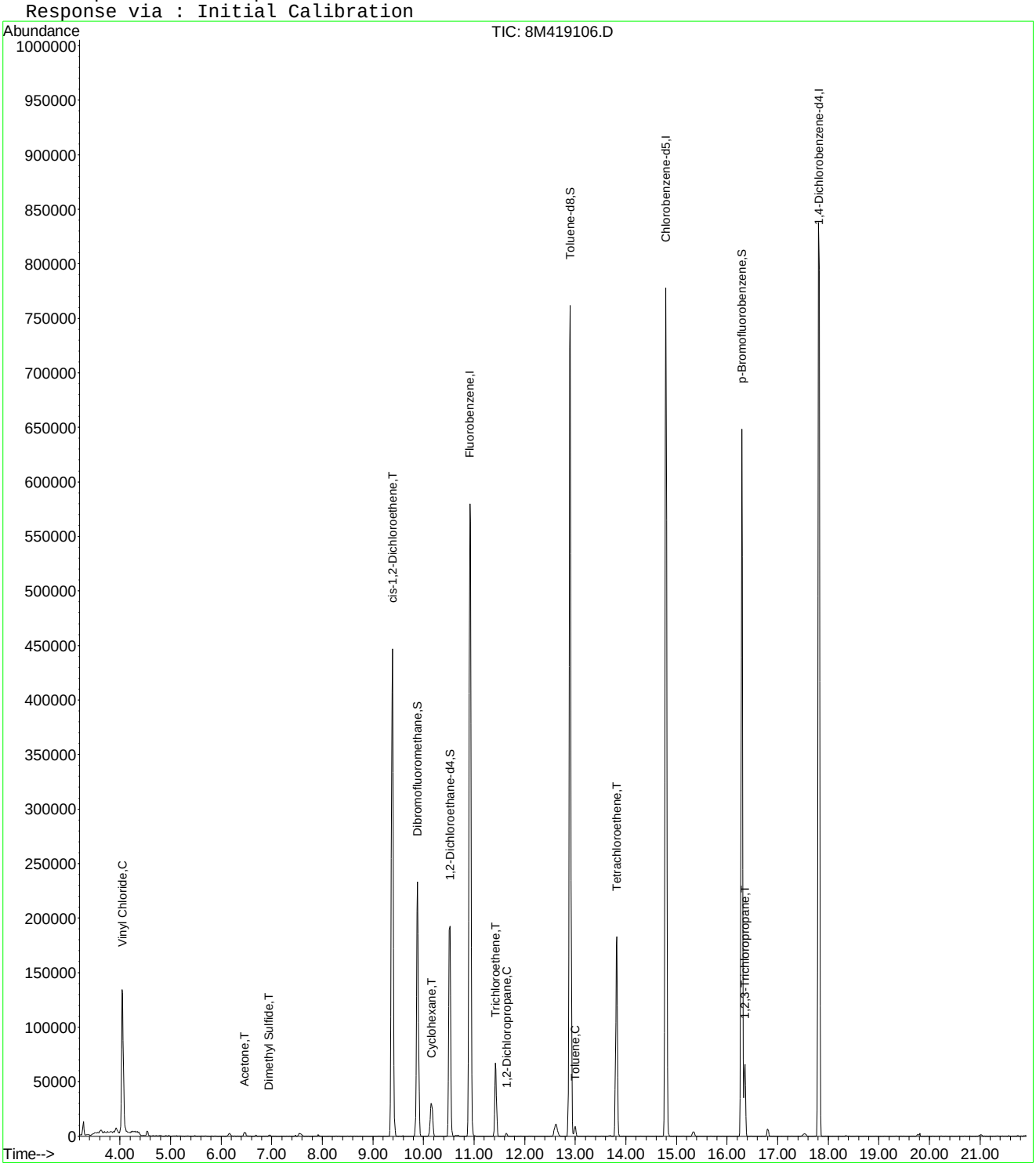
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

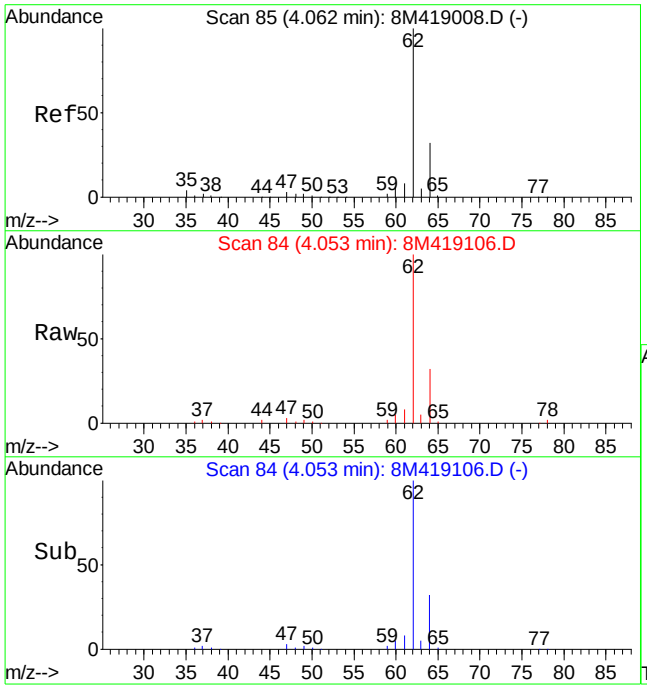
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	736270	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	584775	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	297709	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	192455	24.9210 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.68%		
43) 1,2-Dichloroethane-d4	10.52	65	169346	25.3655 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.48%		
58) Toluene-d8	12.90	98	708705	26.5240 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%		
80) p-Bromofluorobenzene	16.29	95	271250	25.8160 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.28%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	193968	16.4884 ug/L	98
13) Acetone	6.46	43	7422	7.1674 ug/L	86
16) Dimethyl Sulfide	6.95	62	1260	0.1774 ug/L #	53
32) cis-1,2-Dichloroethene	9.39	96	267716	31.2215 ug/L	89
39) Cyclohexane	10.16	56	24211	2.1781 ug/L	90
47) Trichloroethene	11.42	130	30313	3.5477 ug/L	93
49) 1,2-Dichloropropane	11.65	63	1729	0.2327 ug/L #	65
59) Toluene	12.99	91	10199	0.3133 ug/L	96
66) Tetrachloroethene	13.82	164	57319	8.3832 ug/L	96
81) 1,2,3-Trichloropropane	16.35	110	14435	8.9633 ug/L #	33

(#) = qualifier out of range (m) = manual integration
8M419106.D 8260WT.M Mon Apr 24 08:48:34 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419106.D Vial: 20
Acq On : 21 Apr 2017 22:02 Operator: TMB
Sample : L17041069-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 22:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

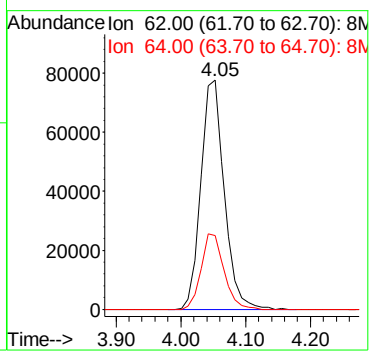


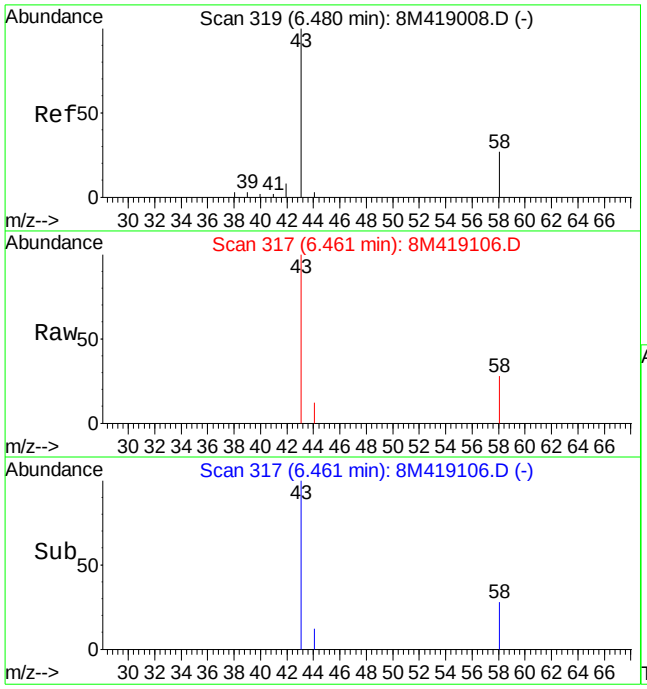


#4
Vinyl Chloride
Concen: 16.49 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 62 Resp: 193968

Ion	Ratio	Lower	Upper
62	100		
64	32.0	19.9	46.3

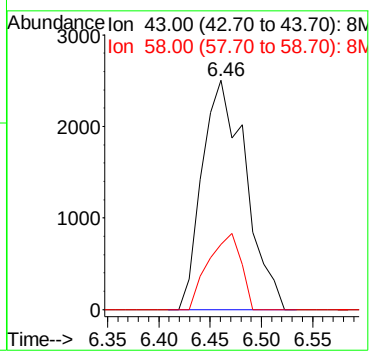


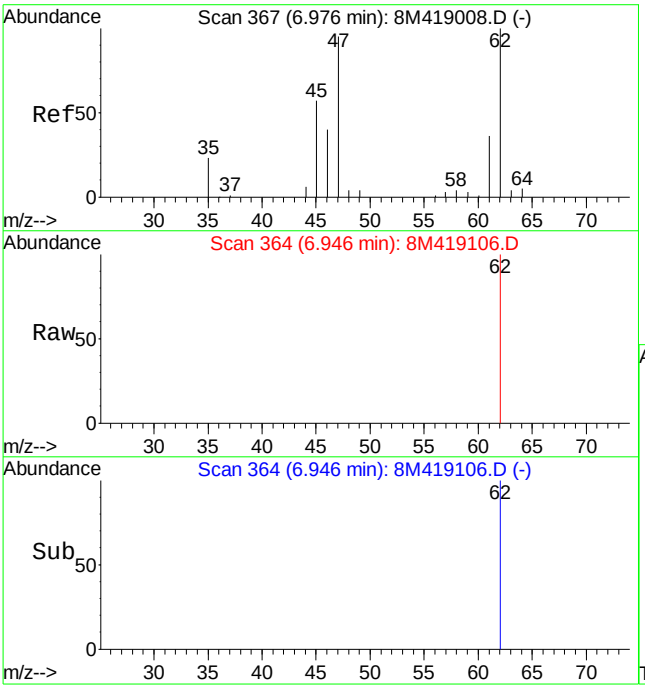


#13
Acetone
Concen: 7.17 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 43 Resp: 7422

Ion	Ratio	Lower	Upper
43	100		
58	24.8	19.4	45.4

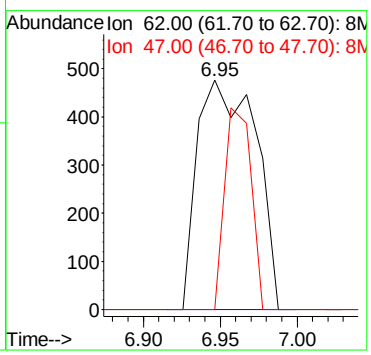


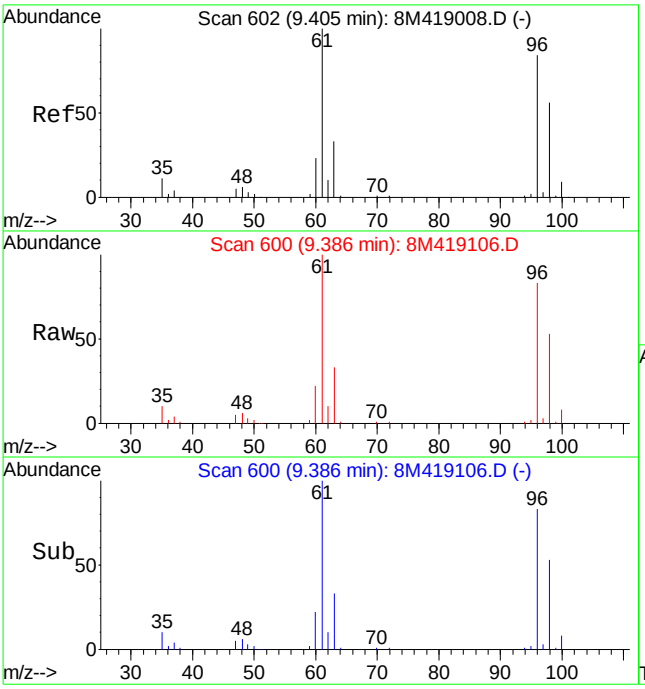


#16
Dimethyl Sulfide
Concen: 0.18 ug/L
RT: 6.95 min Scan# 364
Delta R.T. -0.03 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 62 Resp: 1260

Ion	Ratio	Lower	Upper
62	100		
47	39.7	49.0	114.4#

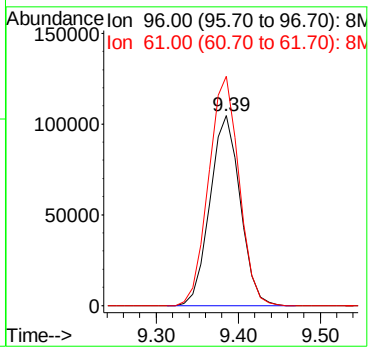


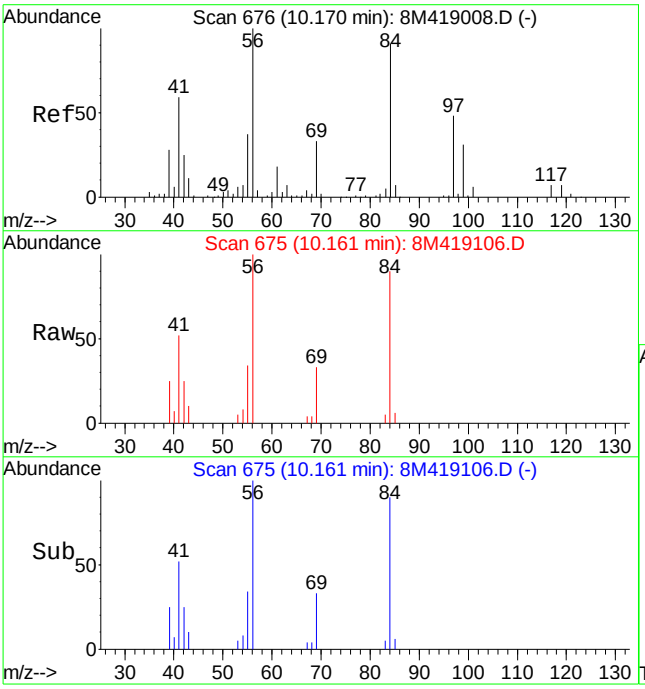


#32
cis-1,2-Dichloroethene
Concen: 31.22 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 96 Resp: 267716

Ion	Ratio	Lower	Upper
96	100		
61	121.2	80.3	187.3

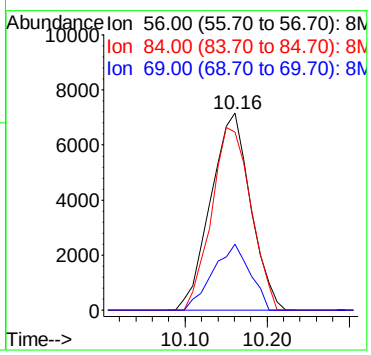


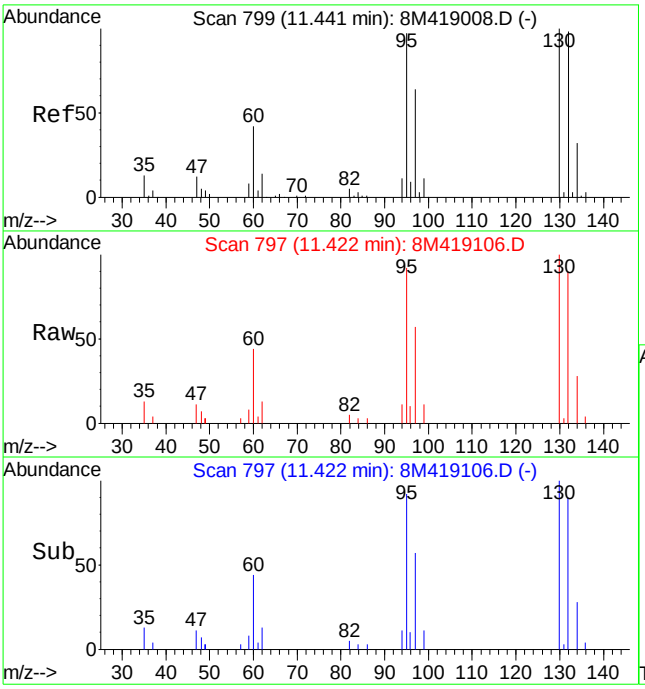


#39
Cyclohexane
Concen: 2.18 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 56 Resp: 24211

Ion	Ratio	Lower	Upper
56	100		
84	91.3	61.6	143.8
69	31.2	21.4	50.0

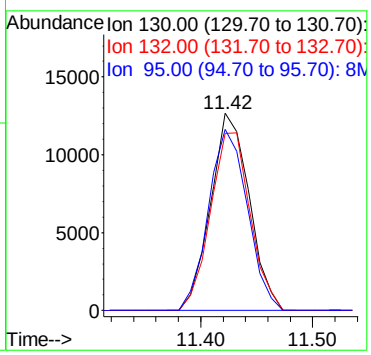


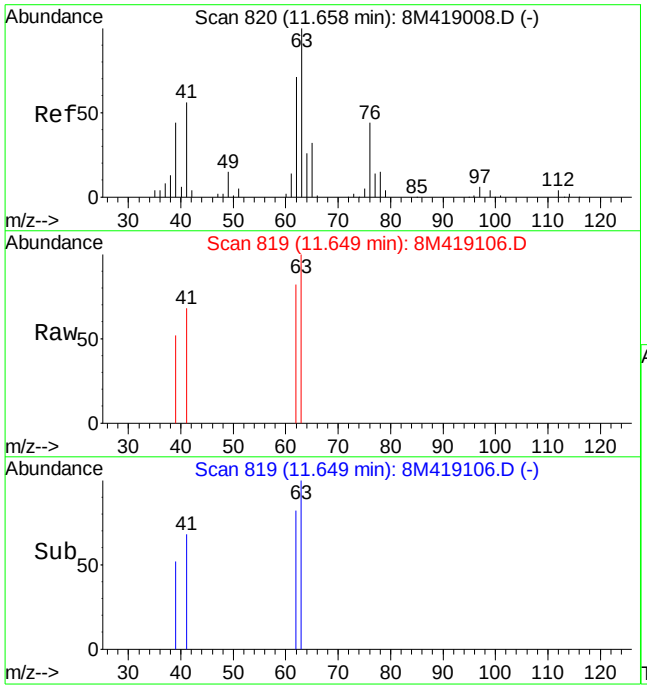


#47
Trichloroethene
Concen: 3.55 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion:130 Resp: 30313

Ion	Ratio	Lower	Upper
130	100		
132	93.0	59.4	138.6
95	92.6	60.1	140.3

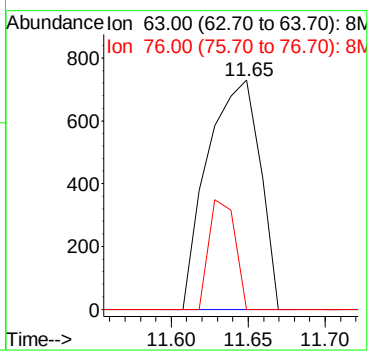


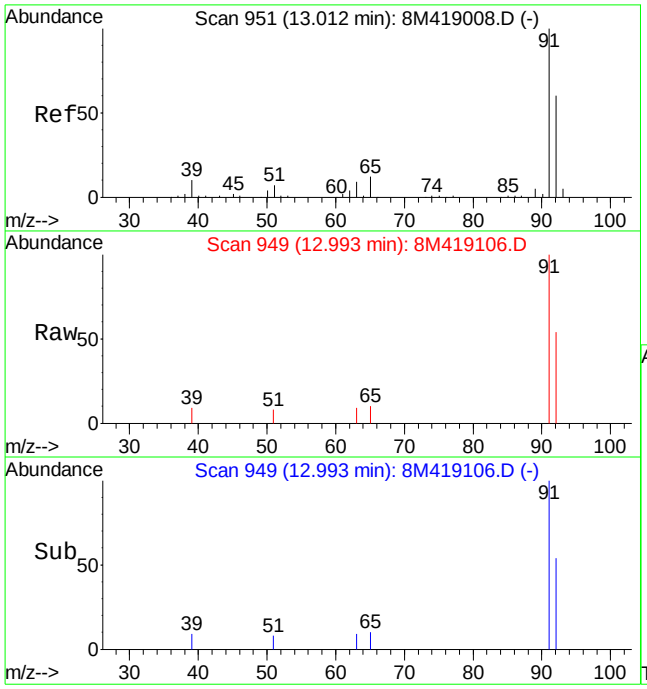


#49
1,2-Dichloropropane
Concen: 0.23 ug/L
RT: 11.65 min Scan# 819
Delta R.T. 0.00 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 63 Resp: 1729

Ion	Ratio	Lower	Upper
63	100		
76	23.8	28.2	65.8#

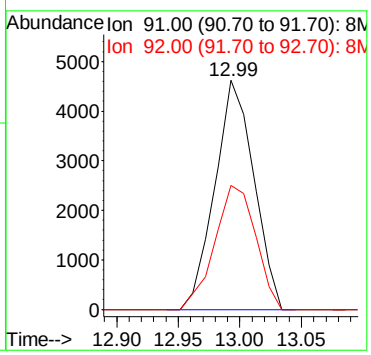


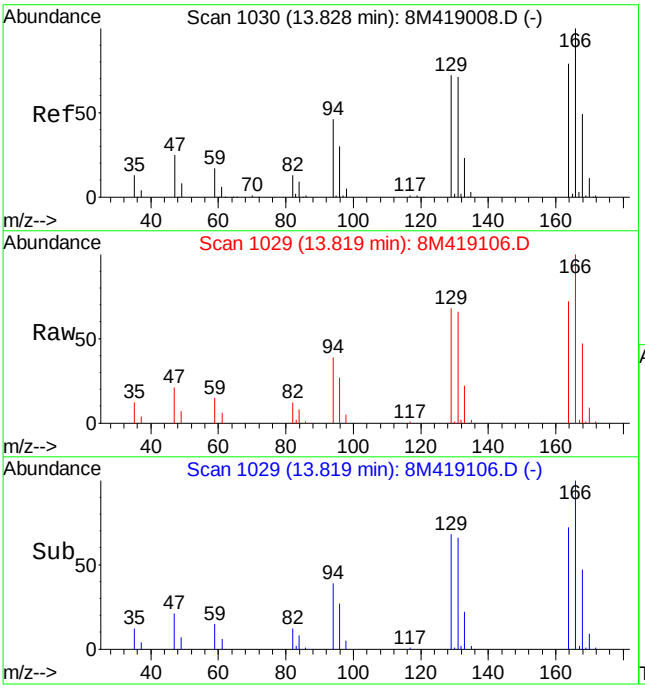


#59
Toluene
Concen: 0.31 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion: 91 Resp: 10199

Ion	Ratio	Lower	Upper
91	100		
92	56.8	35.9	83.7

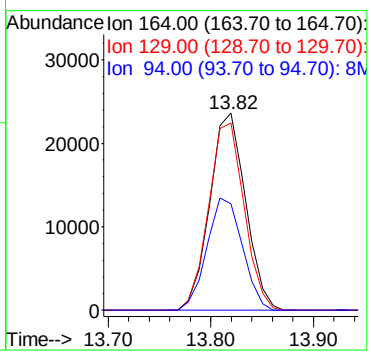


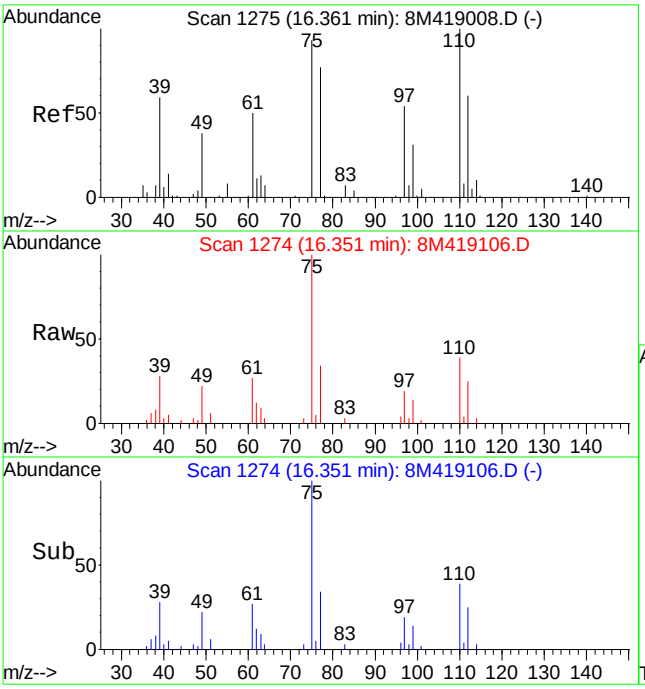


#66
Tetrachloroethene
Concen: 8.38 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion:164 Resp: 57319

Ion	Ratio	Lower	Upper
164	100		
129	94.4	53.4	124.6
94	56.5	34.7	81.1

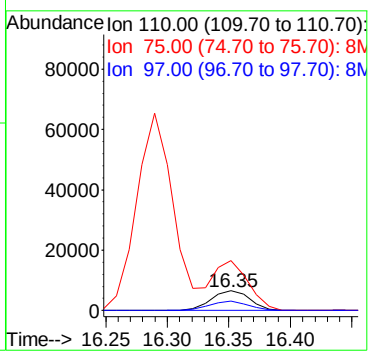




#81
1,2,3-Trichloropropane
Concen: 8.96 ug/L
RT: 16.35 min Scan# 1274
Delta R.T. 0.05 min
Lab File: 8M419106.D
Acq: 21 Apr 2017 22:02

Tgt Ion:110 Resp: 14435

Ion	Ratio	Lower	Upper
110	100		
75	211.5	230.7	538.3#
97	48.6	34.1	79.7



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17670.D Vial: 22
Acq On : 22 Apr 2017 2:22 Operator: JDS
Sample : L17041069-20 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:25 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

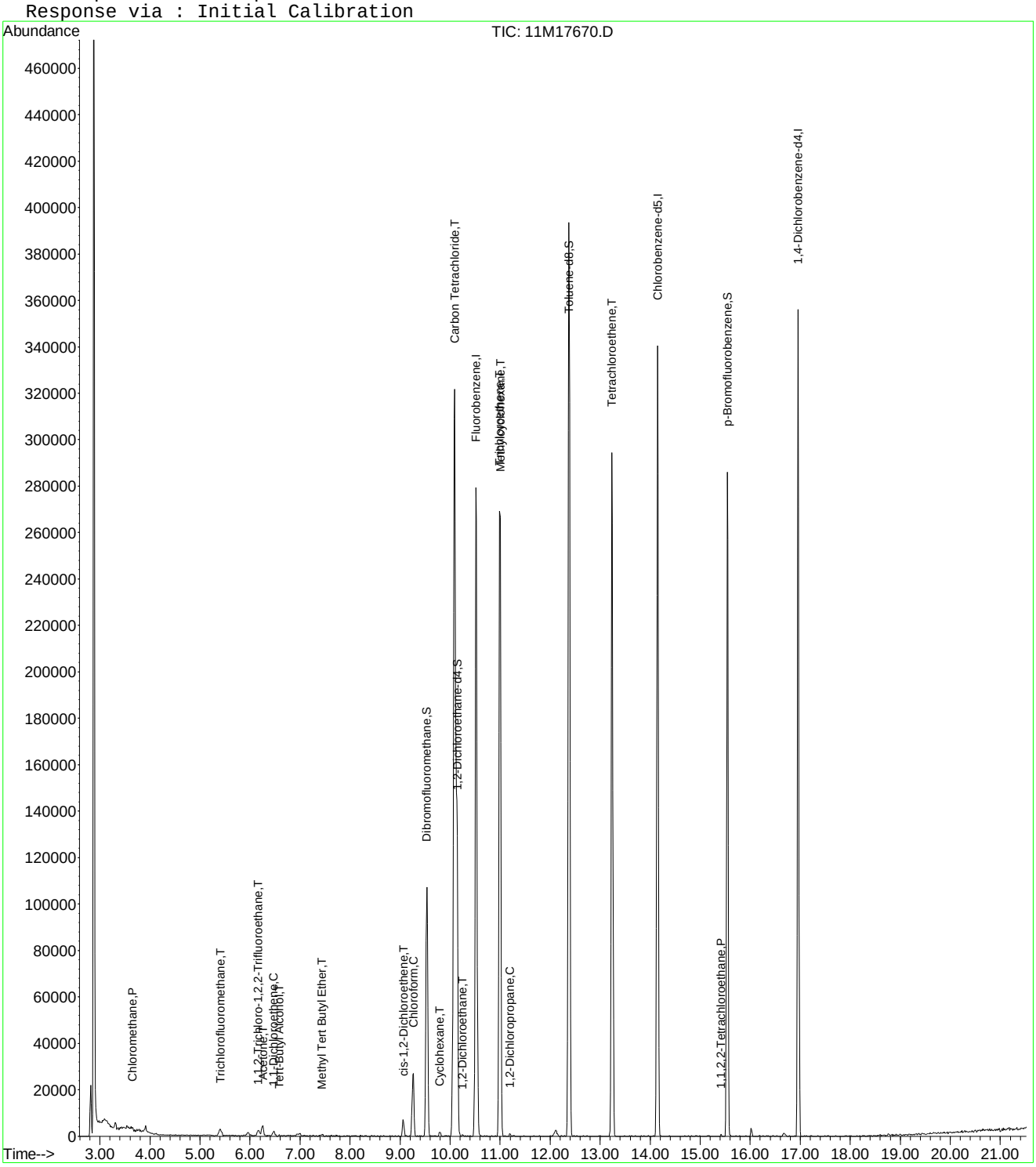
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	335856	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	236180	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119497	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	85516	24.5393	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.16%			
43) 1,2-Dichloroethane-d4	10.14	65	103127	26.1255	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.52%			
57) Toluene-d8	12.38	98	341214	26.5384	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.16%			
78) p-Bromofluorobenzene	15.54	95	120852	27.2113	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.84%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	1625	0.2921	ug/L #	70
8) Trichlorofluoromethane	5.41	101	6411	1.1110	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	2561	0.7440	ug/L	92
13) Acetone	6.26	43	8919	7.7815	ug/L	95
14) 1,1-Dichloroethene	6.46	61	2216	0.3366	ug/L	93
15) Tert-Butyl Alcohol	6.59	59	400	0.9752	ug/L #	62
22) Methyl Tert Butyl Ether	7.43	73	1845	0.1688	ug/L #	47
32) cis-1,2-Dichloroethene	9.07	96	4256	0.9502	ug/L	86
33) Chloroform	9.26	83	30613	4.1574	ug/L	97
39) Cyclohexane	9.79	56	1728	0.2126	ug/L #	84
41) Carbon Tetrachloride	10.09	117	316929	60.9924	ug/L	99
44) 1,2-Dichloroethane	10.25	62	1179	0.2062	ug/L #	54
46) Trichloroethene	10.99	130	119479	28.4156	ug/L	96
47) Methylcyclohexane	11.00	83	1031	0.1591	ug/L #	1
48) 1,2-Dichloropropane	11.20	63	756	0.1546	ug/L #	38
64) Tetrachloroethene	13.23	164	96072	26.7998	ug/L	93
77) 1,1,2,2-Tetrachloroethane	15.42	83	782	0.1893	ug/L #	60

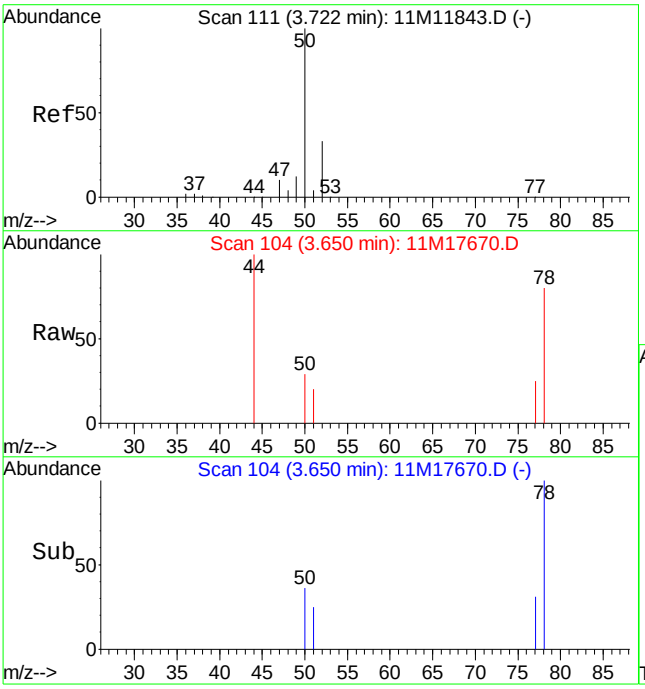
(#) = qualifier out of range (m) = manual integration
11M17670.D 8260WTR.M Tue Apr 25 13:52:26 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17670.D Vial: 22
Acq On : 22 Apr 2017 2:22 Operator: JDS
Sample : L17041069-20 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

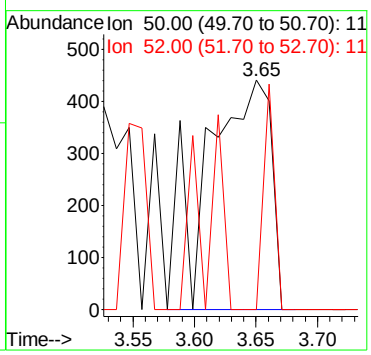


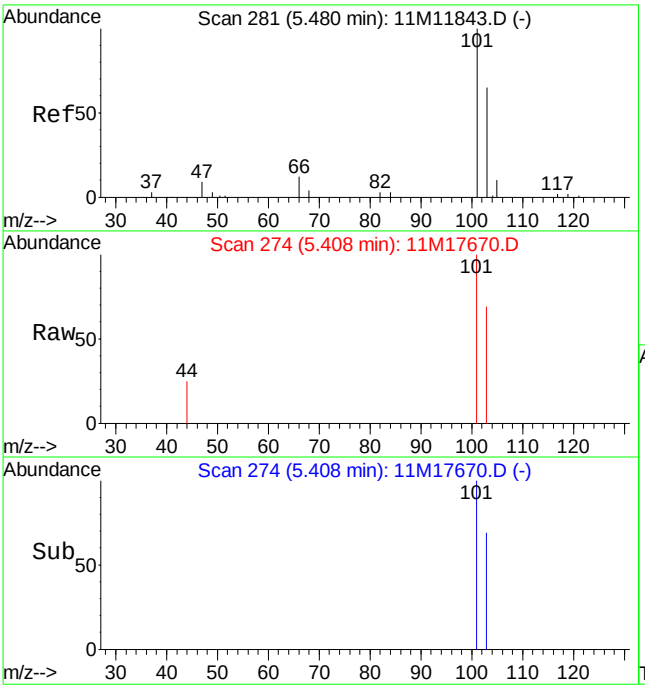


#3
Chloromethane
Concen: 0.29 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 50 Resp: 1625

Ion	Ratio	Lower	Upper
50	100		
52	16.6	20.3	47.3#

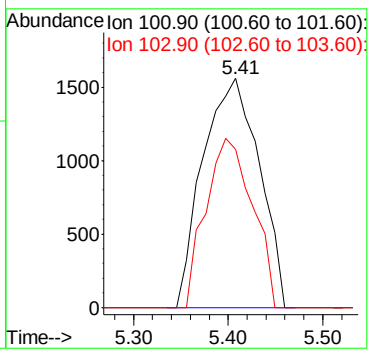


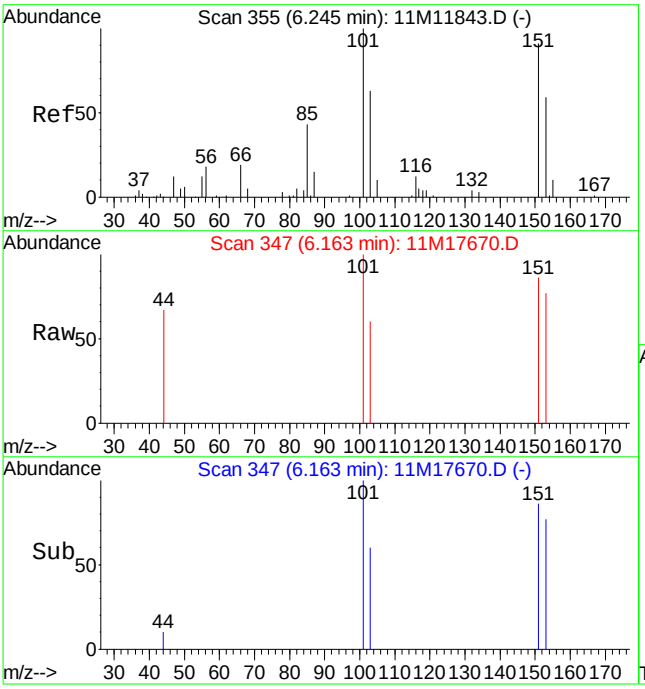


#8
Trichlorofluoromethane
Concen: 1.11 ug/L
RT: 5.41 min Scan# 274
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion:101 Resp: 6411

Ion	Ratio	Lower	Upper
101	100		
103	61.4	39.3	91.7

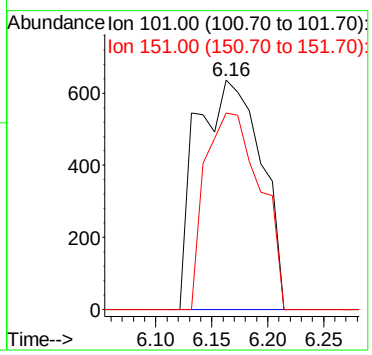


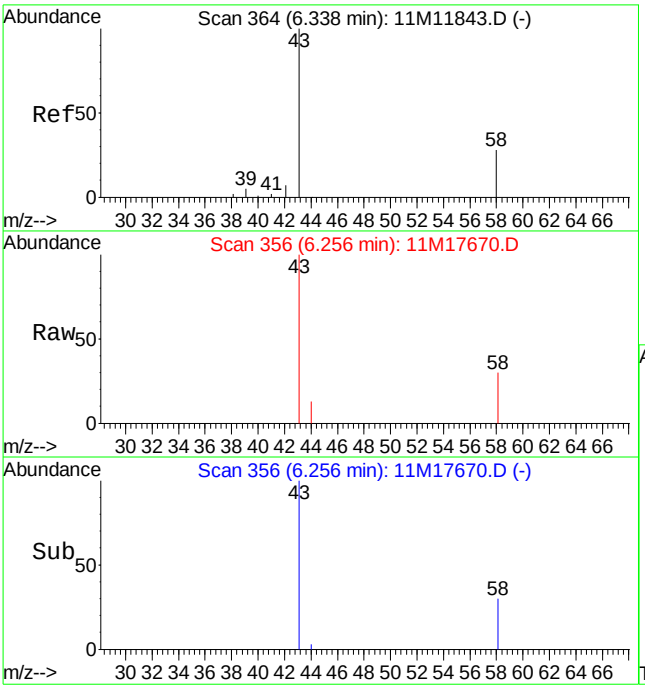


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.74 ug/L
RT: 6.16 min Scan# 347
Delta R.T. -0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion:101 Resp: 2561

Ion	Ratio	Lower	Upper
101	100		
151	73.0	39.9	119.9

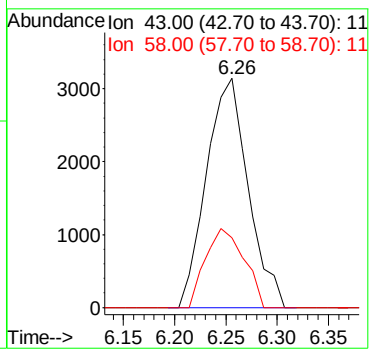


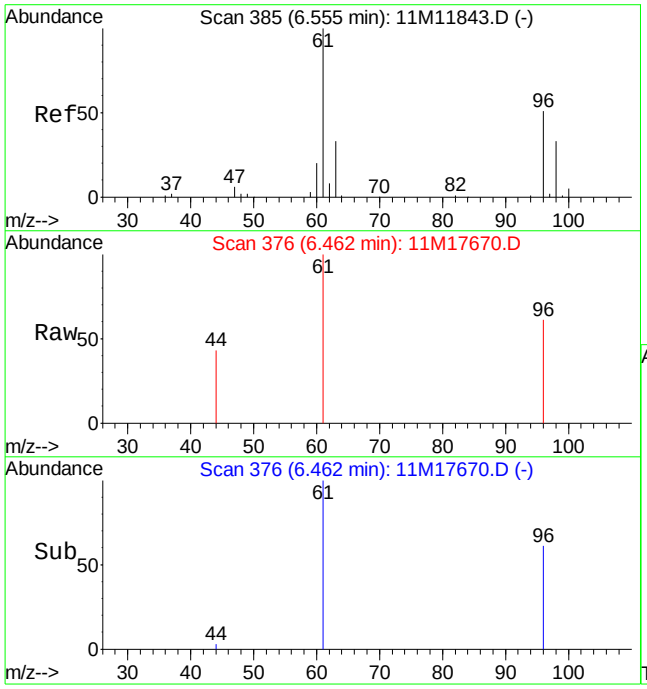


#13
Acetone
Concen: 7.78 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 43 Resp: 8919

Ion	Ratio	Lower	Upper
43	100		
58	31.8	17.5	40.7

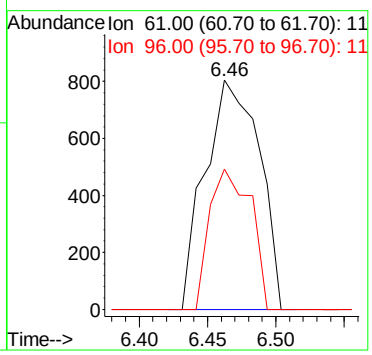


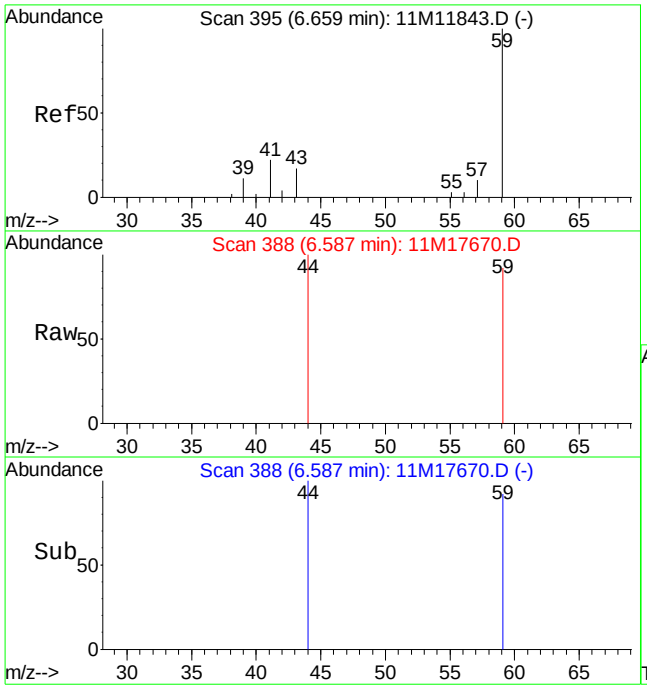


#14
1,1-Dichloroethene
Concen: 0.34 ug/L
RT: 6.46 min Scan# 376
Delta R.T. -0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 61 Resp: 2216

Ion	Ratio	Lower	Upper
61	100		
96	46.5	31.0	72.2

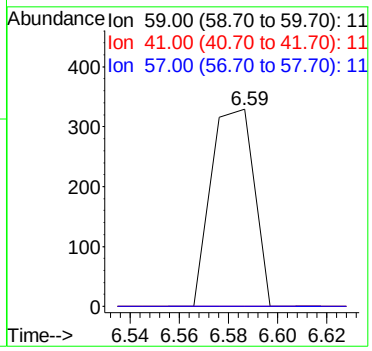


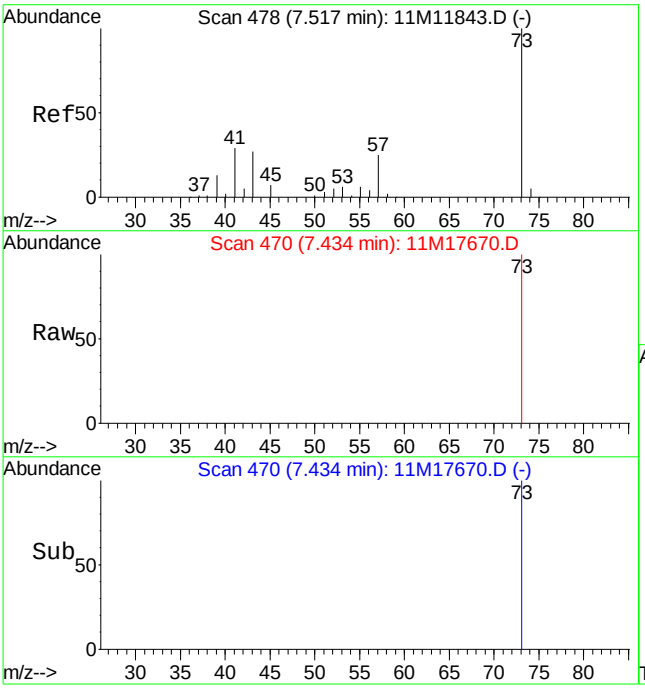


#15
Tert-Butyl Alcohol
Concen: 0.98 ug/L
RT: 6.59 min Scan# 388
Delta R.T. 0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 59 Resp: 400

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

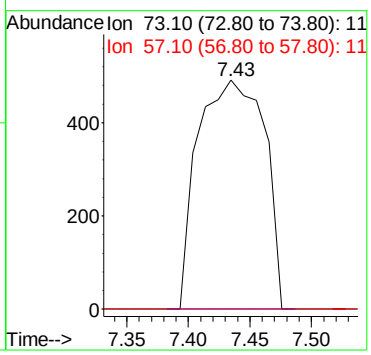


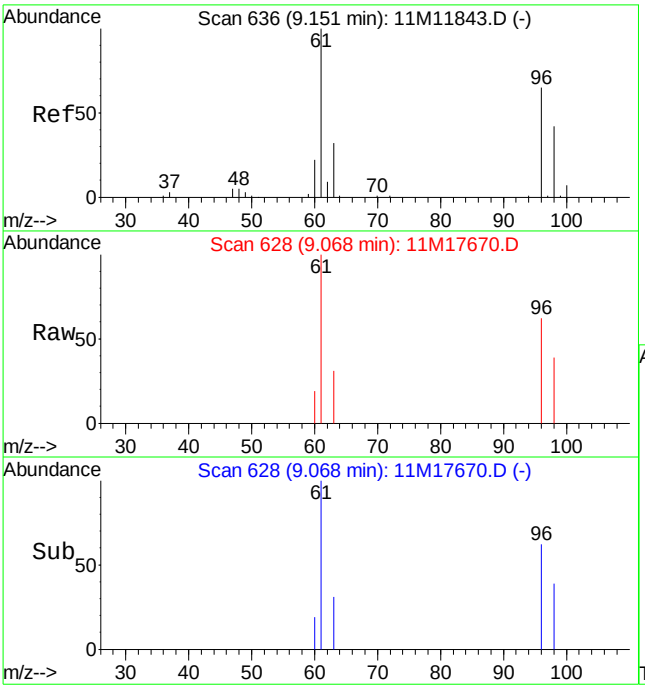


#22
Methyl Tert Butyl Ether
Concen: 0.17 ug/L
RT: 7.43 min Scan# 470
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 73 Resp: 1845

Ion	Ratio	Lower	Upper
73	100		
57	0.0	16.9	39.3#

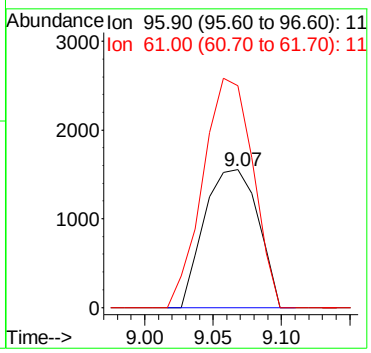


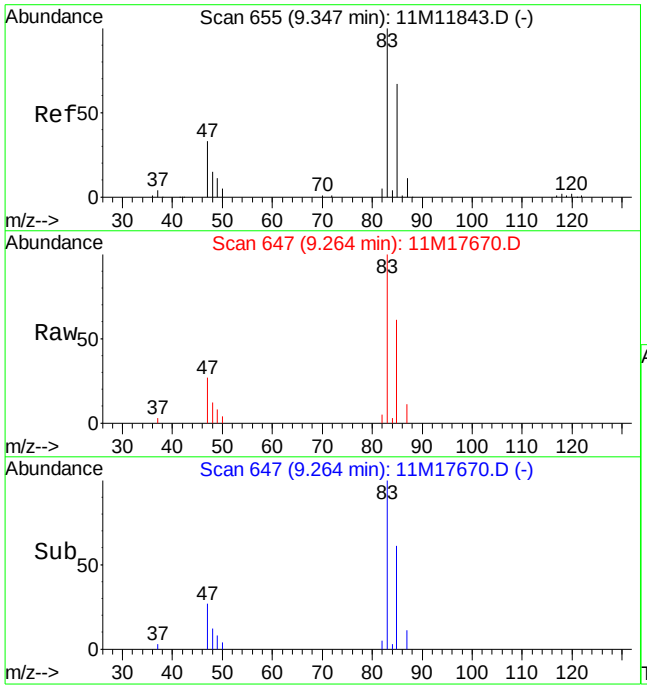


#32
cis-1,2-Dichloroethene
Concen: 0.95 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 96 Resp: 4256

Ion	Ratio	Lower	Upper
96	100		
61	154.6	104.6	244.2

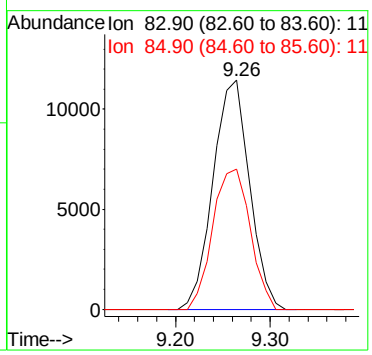


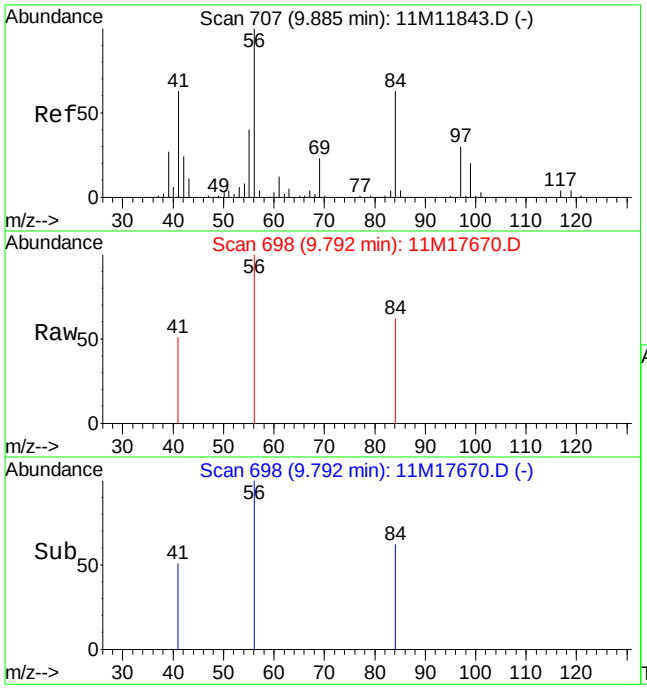


#33
Chloroform
Concen: 4.16 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 83 Resp: 30613

Ion	Ratio	Lower	Upper
83	100		
85	62.7	39.2	91.6

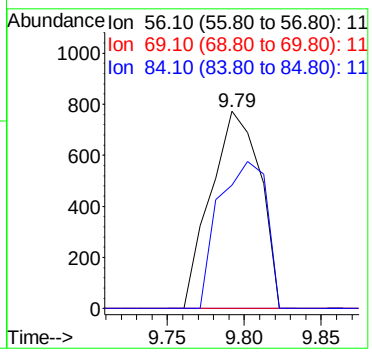


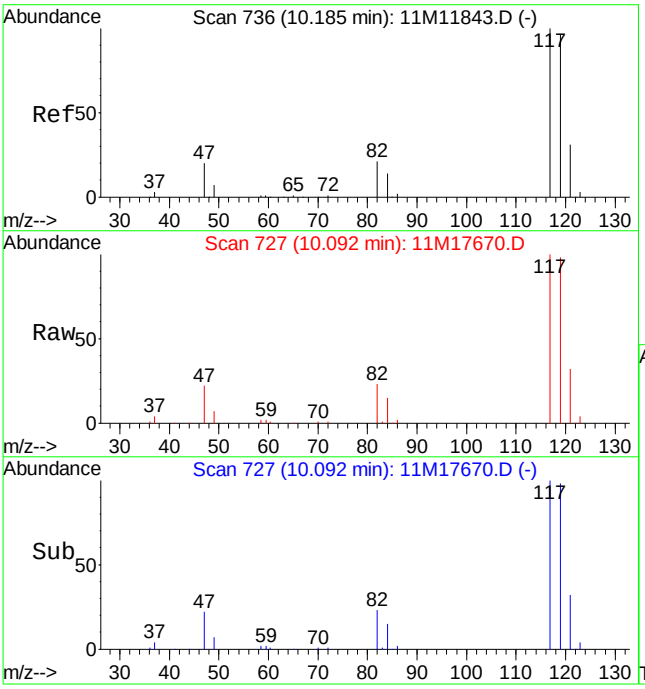


#39
Cyclohexane
Concen: 0.21 ug/L
RT: 9.79 min Scan# 698
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 56 Resp: 1728

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.5	36.1#
84	72.2	41.7	97.3

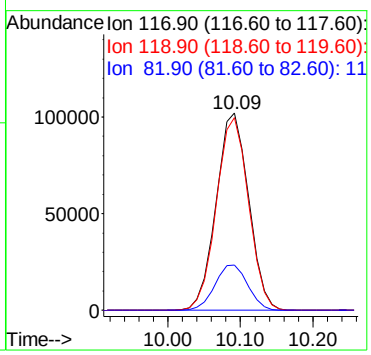


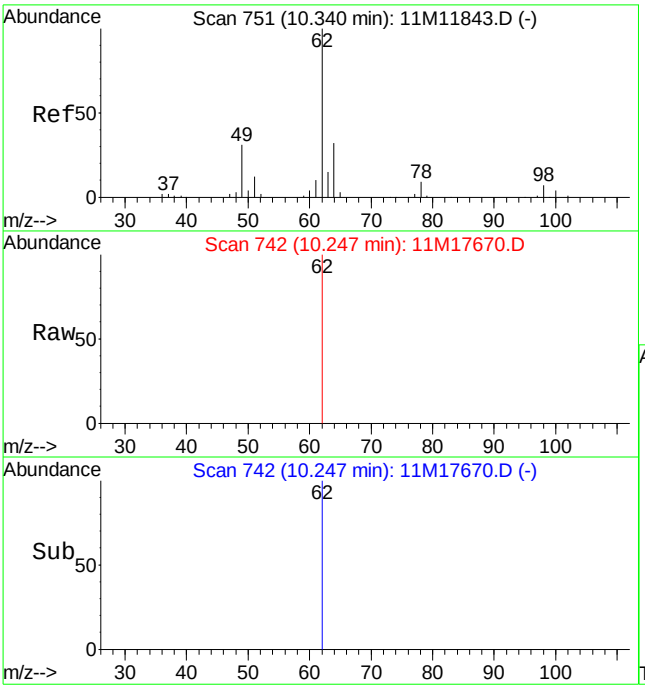


#41
Carbon Tetrachloride
Concen: 60.99 ug/L
RT: 10.09 min Scan# 727
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion:117 Resp: 316929

Ion	Ratio	Lower	Upper
117	100		
119	96.7	57.5	134.3
82	23.2	14.7	34.3

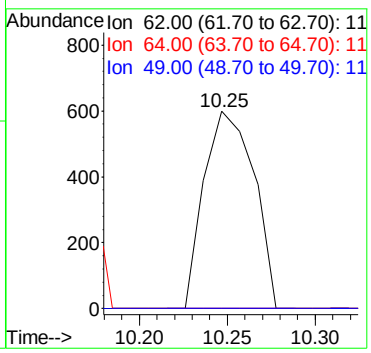


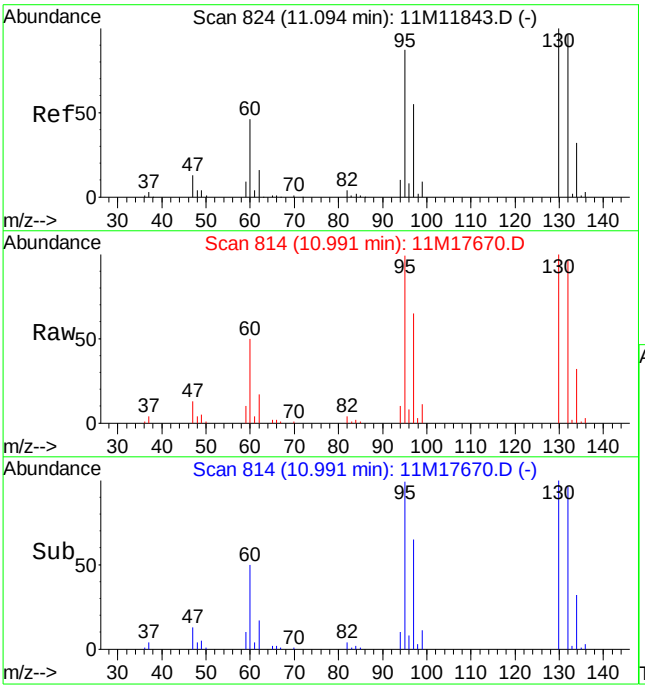


#44
1,2-Dichloroethane
Concen: 0.21 ug/L
RT: 10.25 min Scan# 742
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 62 Resp: 1179

Ion	Ratio	Lower	Upper
62	100		
64	20.0	19.6	45.8
49	0.0	24.2	56.6#

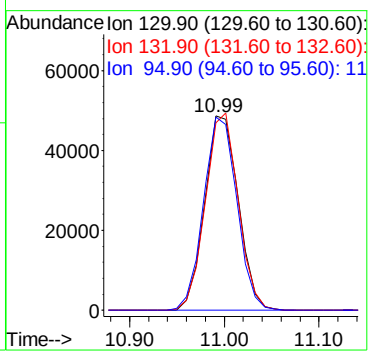


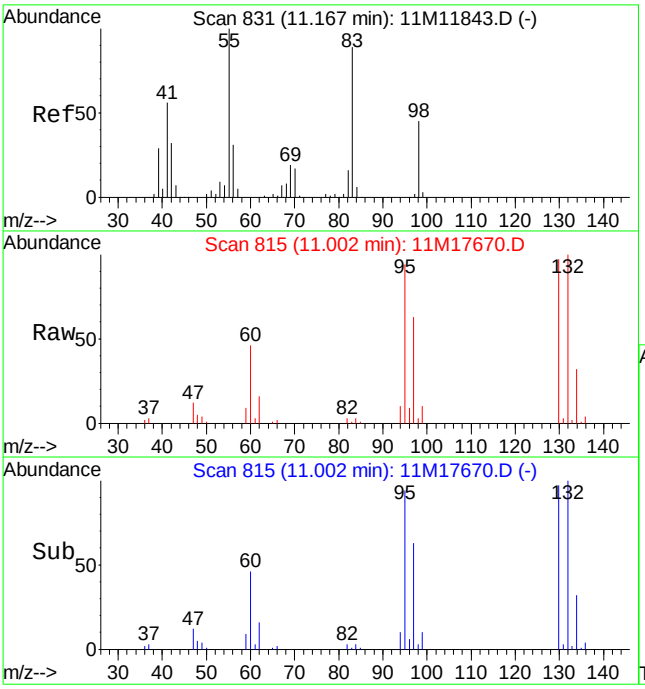


#46
Trichloroethene
Concen: 28.42 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.01 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion:130 Resp: 119479

Ion	Ratio	Lower	Upper
130	100		
132	98.9	57.8	134.8
95	98.5	62.3	145.5

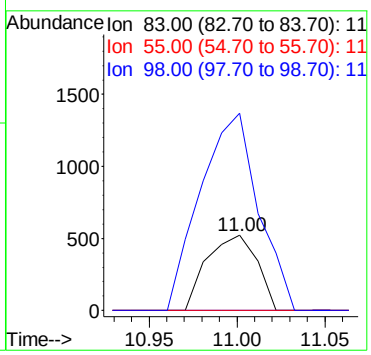


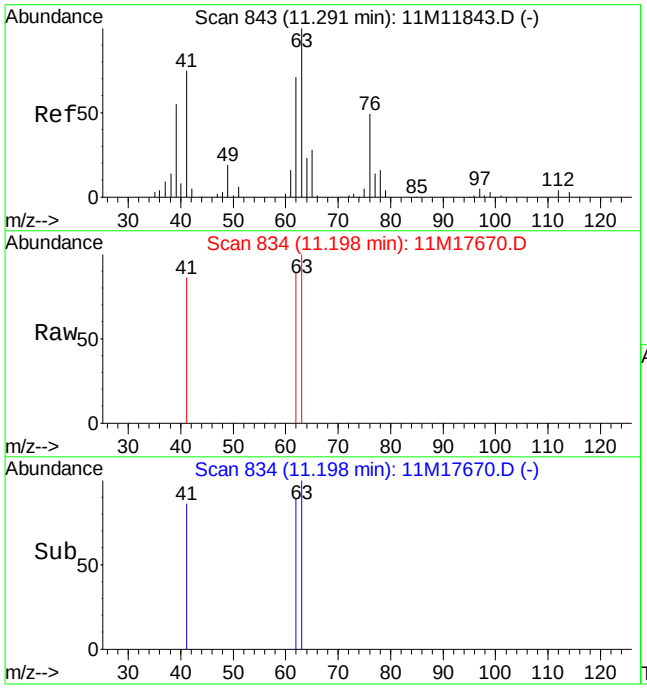


#47
Methylcyclohexane
Concen: 0.16 ug/L
RT: 11.00 min Scan# 815
Delta R.T. -0.07 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 83 Resp: 1031

Ion	Ratio	Lower	Upper
83	100		
55	0.0	58.6	136.6#
98	305.1	27.6	64.4#

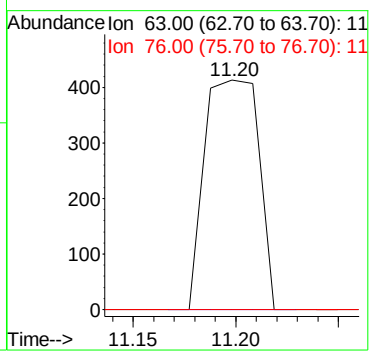


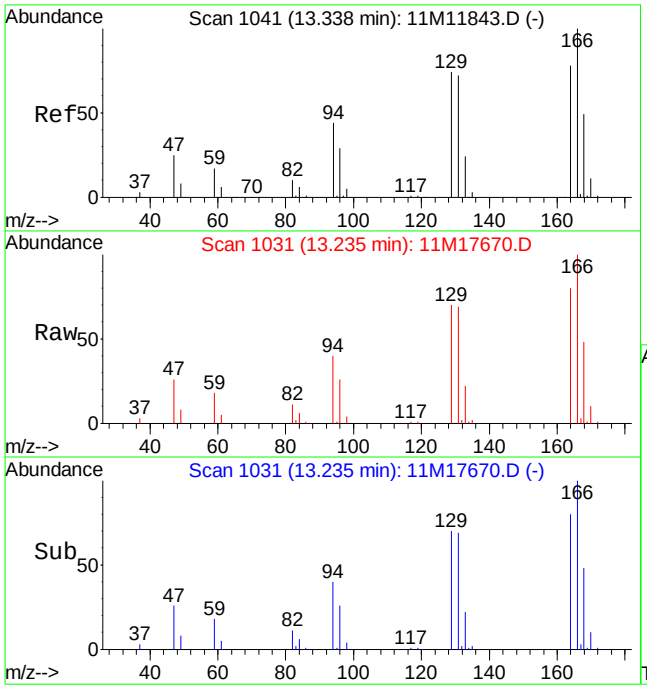


#48
1,2-Dichloropropane
Concen: 0.15 ug/L
RT: 11.20 min Scan# 834
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 63 Resp: 756

Ion	Ratio	Lower	Upper
63	100		
76	0.0	22.4	52.2#

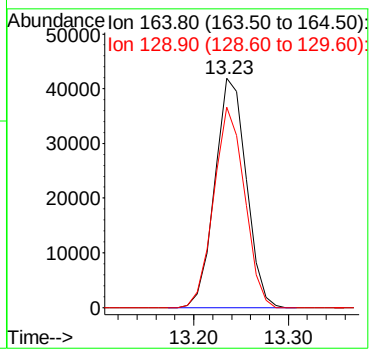


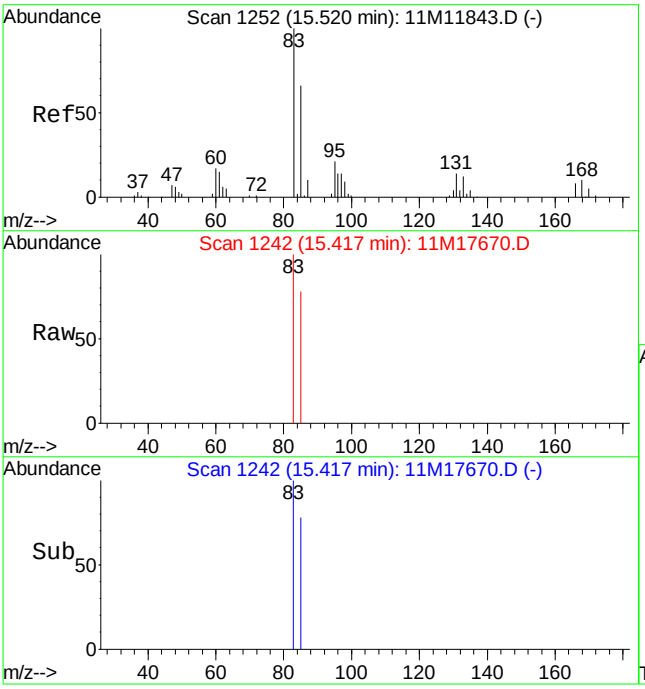


#64
Tetrachloroethene
Concen: 26.80 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion:164 Resp: 96072

Ion	Ratio	Lower	Upper
164	100		
129	86.0	55.4	129.4

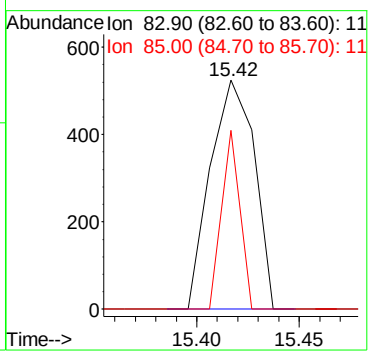




#77
1,1,2,2-Tetrachloroethane
Concen: 0.19 ug/L
RT: 15.42 min Scan# 1242
Delta R.T. 0.00 min
Lab File: 11M17670.D
Acq: 22 Apr 2017 2:22

Tgt Ion: 83 Resp: 782

Ion	Ratio	Lower	Upper
83	100		
85	32.5	38.5	89.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146611.D Vial: 14
Acq On : 21 Apr 2017 20:03 Operator: TMB
Sample : L17041069-21 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:57 2017 Quant Results File: 8260BWT.RES

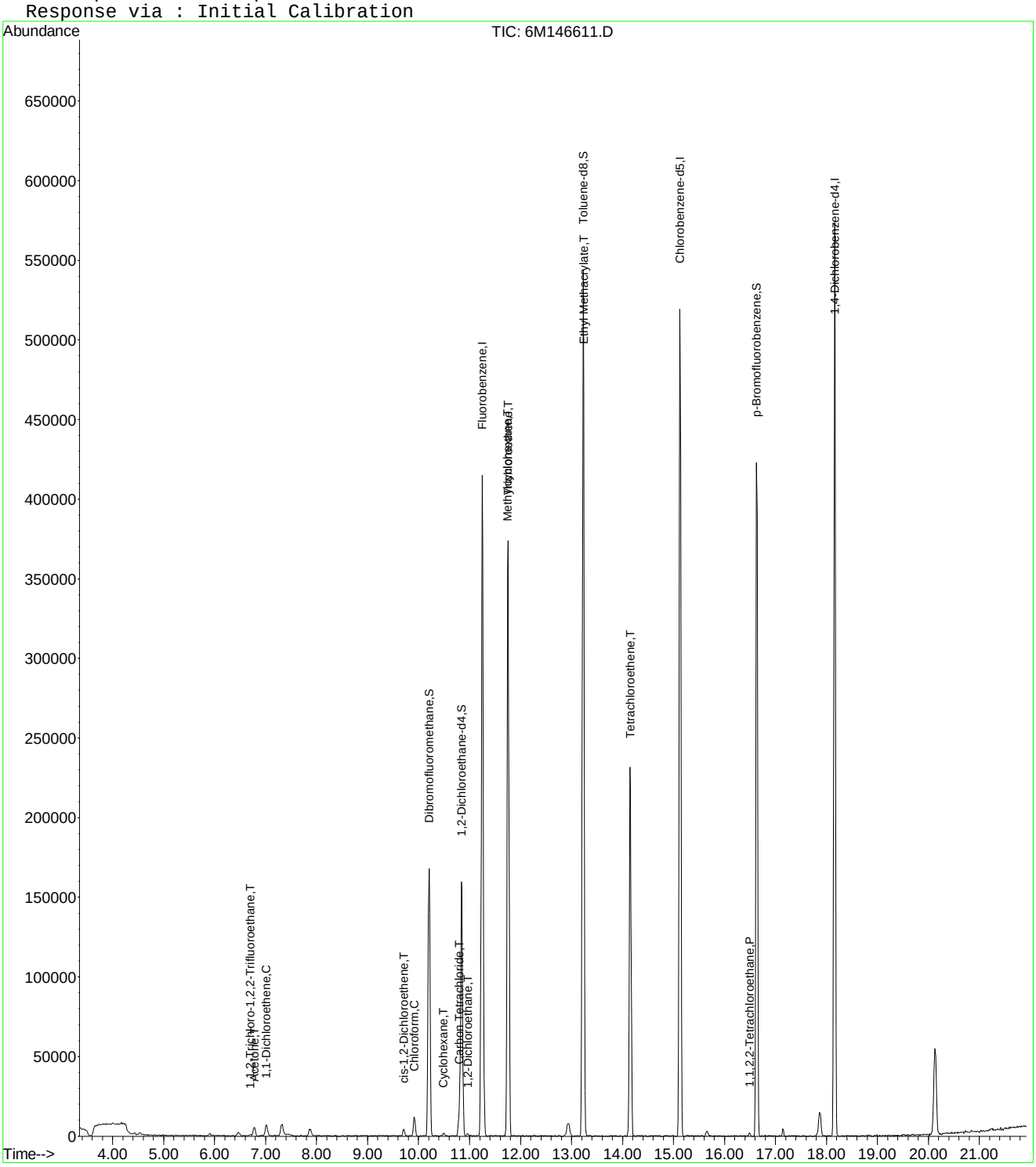
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

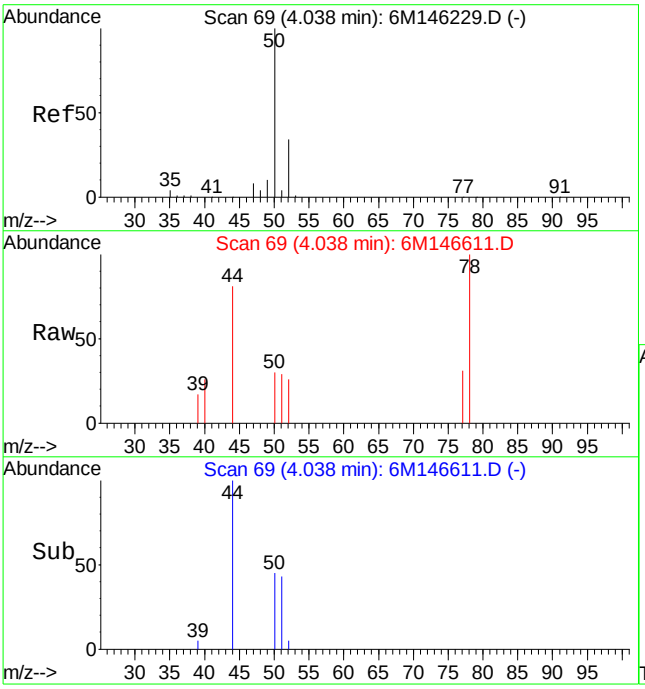
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	533407	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	383077	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	198126	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	142632	26.1942 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.76%		
43) 1,2-Dichloroethane-d4	10.84	65	144049	26.8414 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.36%		
58) Toluene-d8	13.23	98	504605	25.8143 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.24%		
80) p-Bromofluorobenzene	16.63	95	200760	26.6794 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.72%		
Target Compounds					Qvalue
3) Chloromethane	4.04	50	673	Below Cal	81
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	875	0.1559 ug/L #	51
13) Acetone	6.77	43	11335	9.8476 ug/L	93
14) 1,1-Dichloroethene	7.01	61	8898	1.0942 ug/L	91
32) cis-1,2-Dichloroethene	9.72	96	2853	0.4434 ug/L	84
33) Chloroform	9.92	83	13946	1.2627 ug/L	93
39) Cyclohexane	10.48	56	1888	0.2274 ug/L #	75
42) Carbon Tetrachloride	10.80	117	13100	1.8503 ug/L	99
45) 1,2-Dichloroethane	10.96	62	2158	0.3141 ug/L #	41
47) Trichloroethene	11.76	130	166132	26.7432 ug/L	91
48) Methylcyclohexane	11.75	83	1954	0.2177 ug/L #	1
60) Ethyl Methacrylate	13.24	69	1042	0.1798 ug/L	86
66) Tetrachloroethene	14.16	166	91689	15.7985 ug/L	95
79) 1,1,2,2-Tetrachloroethane	16.50	83	2283	0.4424 ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146611.D 8260BWT.M Mon Apr 24 09:00:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146611.D Vial: 14
Acq On : 21 Apr 2017 20:03 Operator: TMB
Sample : L17041069-21 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

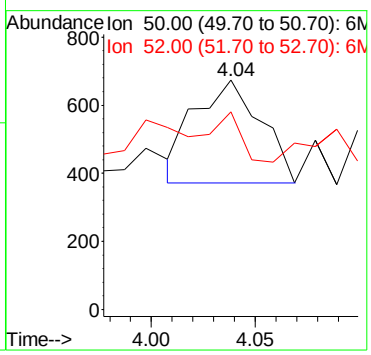


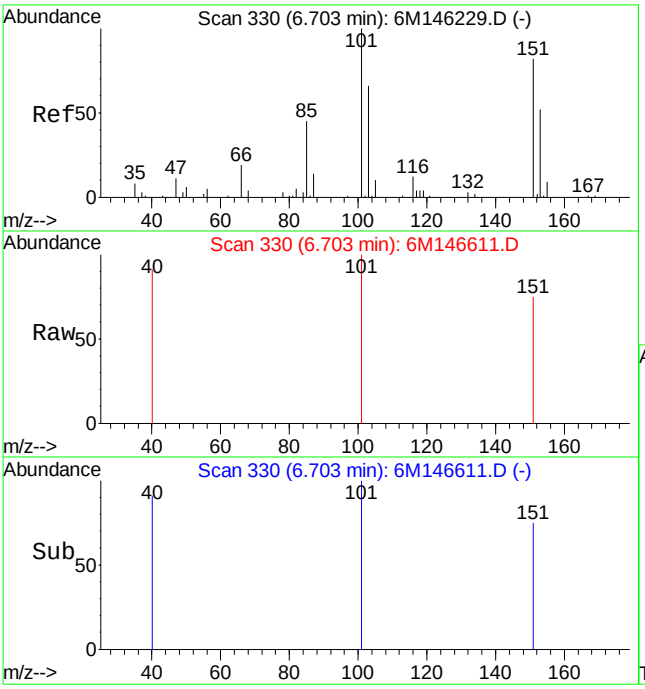


#3
Chloromethane
Concen: Below Cal
RT: 4.04 min Scan# 69
Delta R.T. 0.02 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 50 Resp: 673

Ion	Ratio	Lower	Upper
50	100		
52	22.3	19.8	46.2

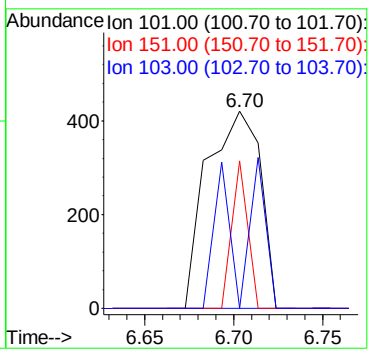


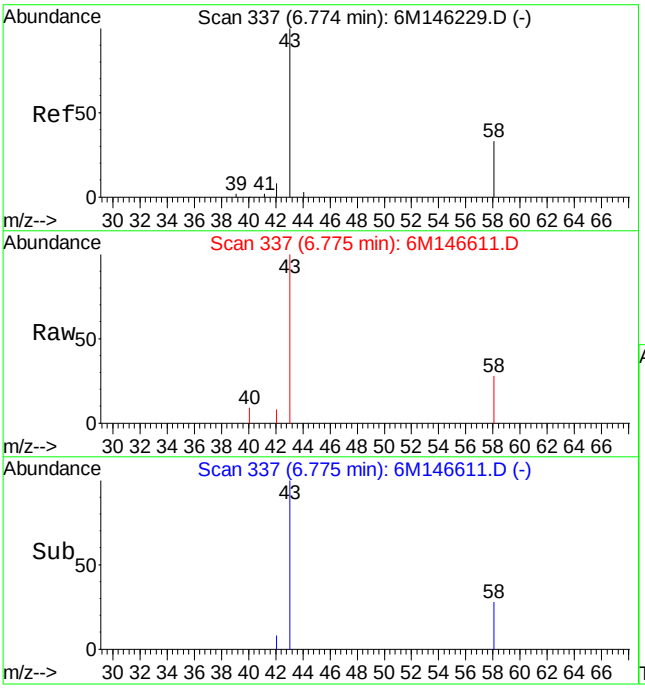


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.16 ug/L
RT: 6.70 min Scan# 330
Delta R.T. 0.02 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion:101 Resp: 875

Ion	Ratio	Lower	Upper
101	100		
151	21.9	49.4	115.2#
103	44.3	38.8	90.4

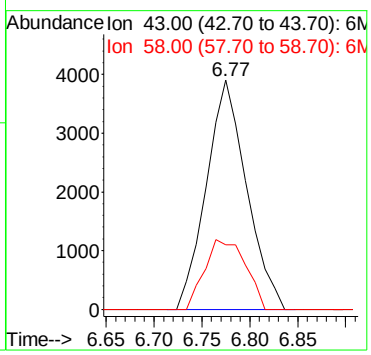


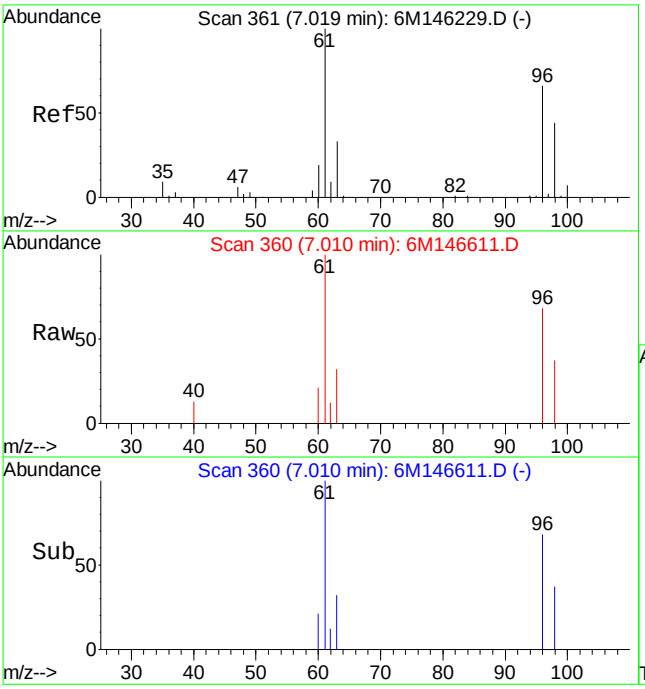


#13
Acetone
Concen: 9.85 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 43 Resp: 11335

Ion	Ratio	Lower	Upper
43	100		
58	30.8	16.4	38.2

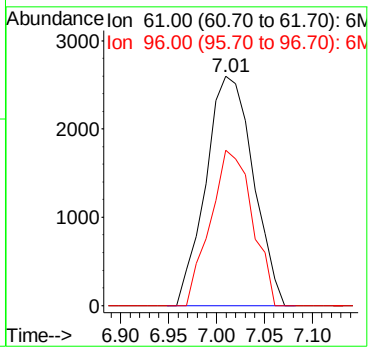


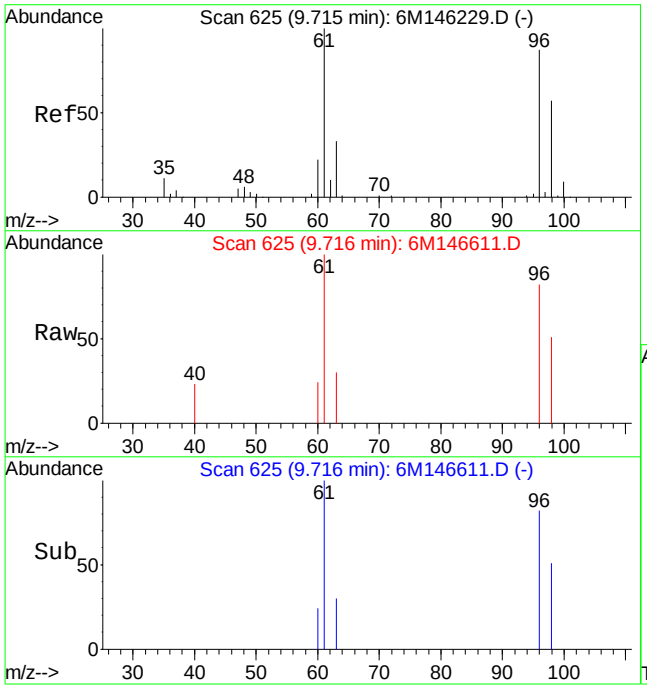


#14
1,1-Dichloroethene
Concen: 1.09 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.00 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 61 Resp: 8898

Ion	Ratio	Lower	Upper
61	100		
96	59.8	32.0	74.6

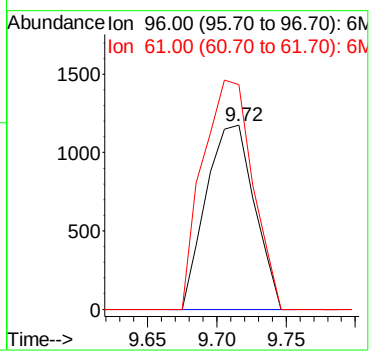


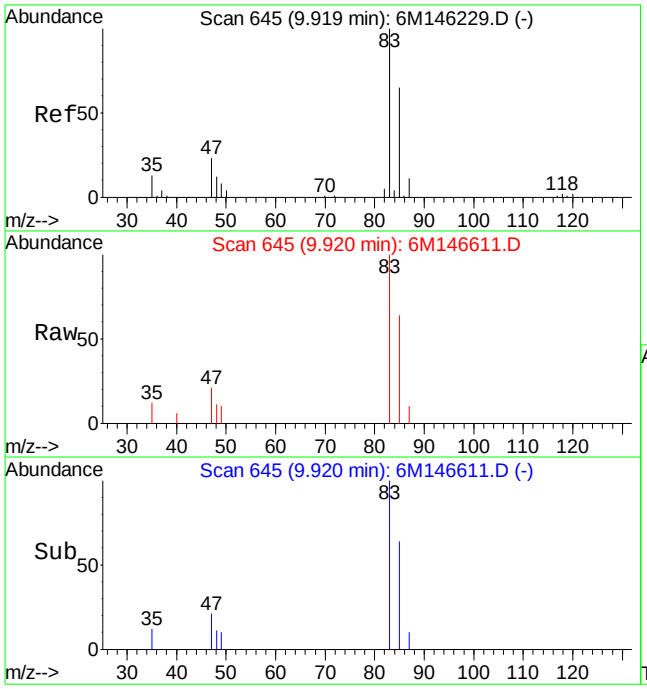


#32
cis-1,2-Dichloroethene
Concen: 0.44 ug/L
RT: 9.72 min Scan# 625
Delta R.T. 0.01 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 96 Resp: 2853

Ion	Ratio	Lower	Upper
96	100		
61	128.9	89.2	208.2

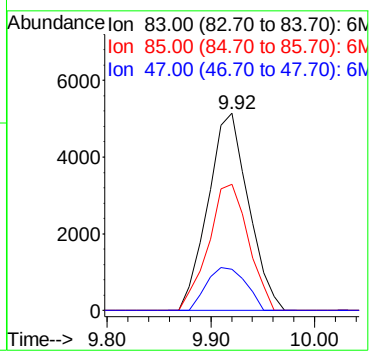


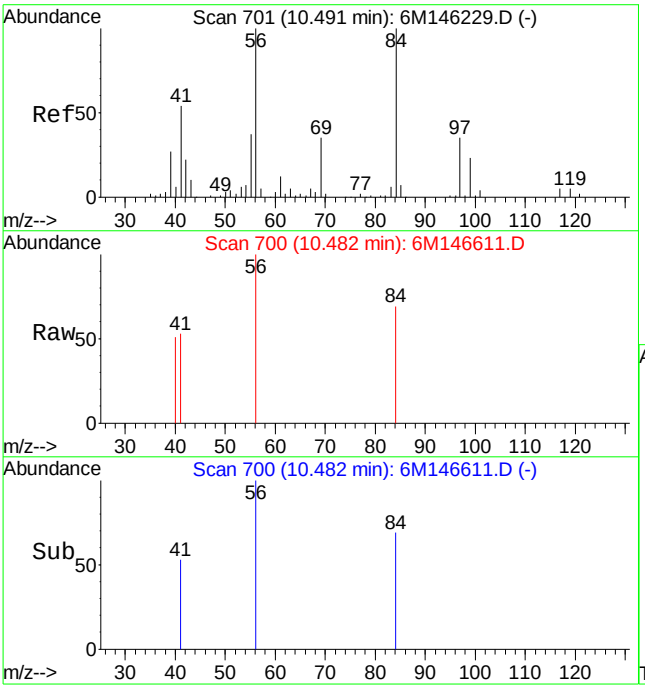


#33
Chloroform
Concen: 1.26 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 83 Resp: 13946

Ion	Ratio	Lower	Upper
83	100		
85	63.1	39.0	91.0
47	21.2	18.5	43.1

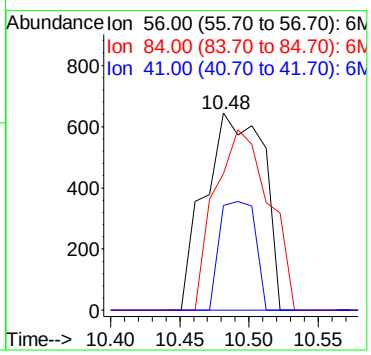


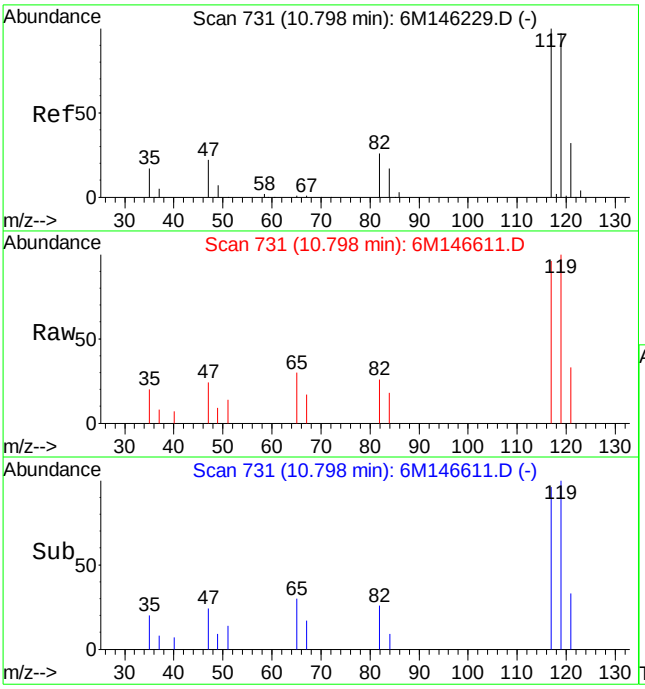


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.48 min Scan# 700
Delta R.T. -0.01 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 56 Resp: 1888

Ion	Ratio	Lower	Upper
56	100		
84	84.7	43.6	101.6
41	33.7	37.1	86.5#

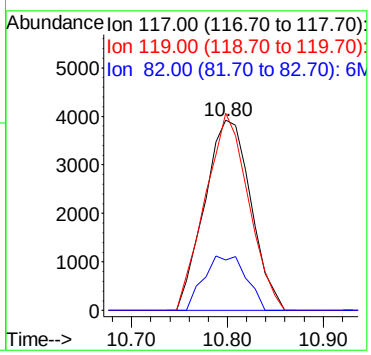


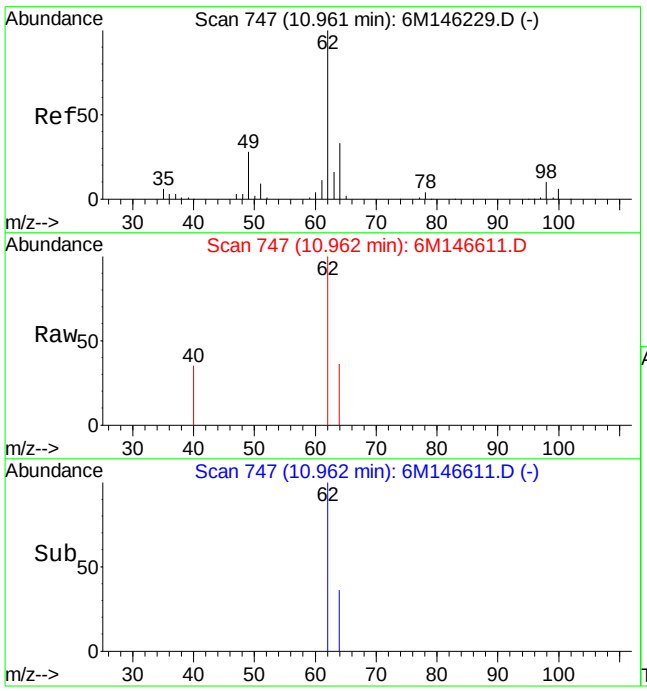


#42
Carbon Tetrachloride
Concen: 1.85 ug/L
RT: 10.80 min Scan# 731
Delta R.T. -0.01 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion:117 Resp: 13100

Ion	Ratio	Lower	Upper
117	100		
119	97.1	57.8	134.8
82	26.1	15.1	35.3

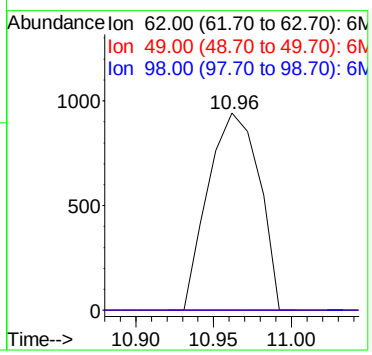


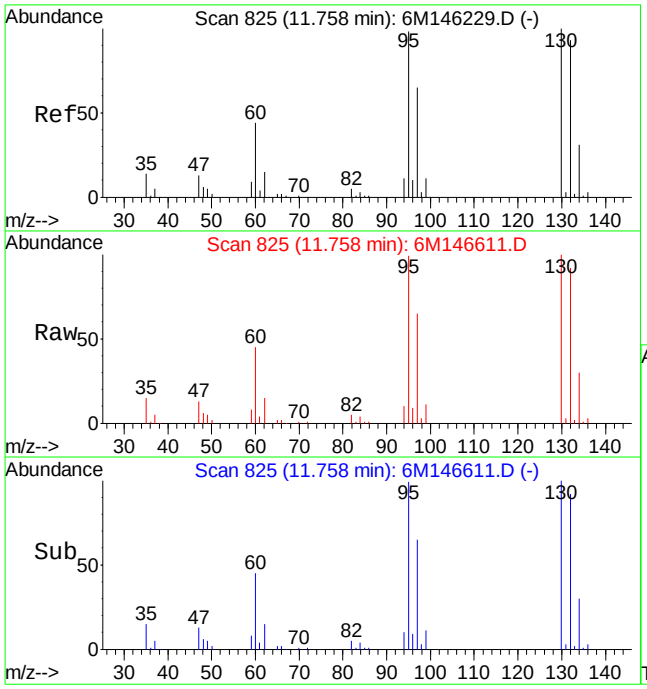


#45
1,2-Dichloroethane
Concen: 0.31 ug/L
RT: 10.96 min Scan# 747
Delta R.T. -0.00 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 62 Resp: 2158

Ion	Ratio	Lower	Upper
62	100		
49	0.0	25.1	58.5#
98	0.0	5.2	12.0#

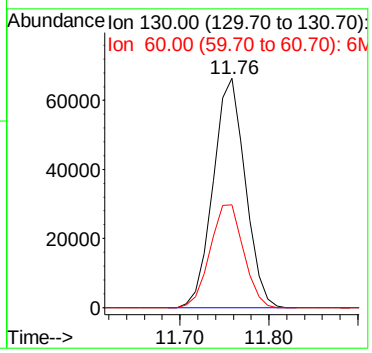


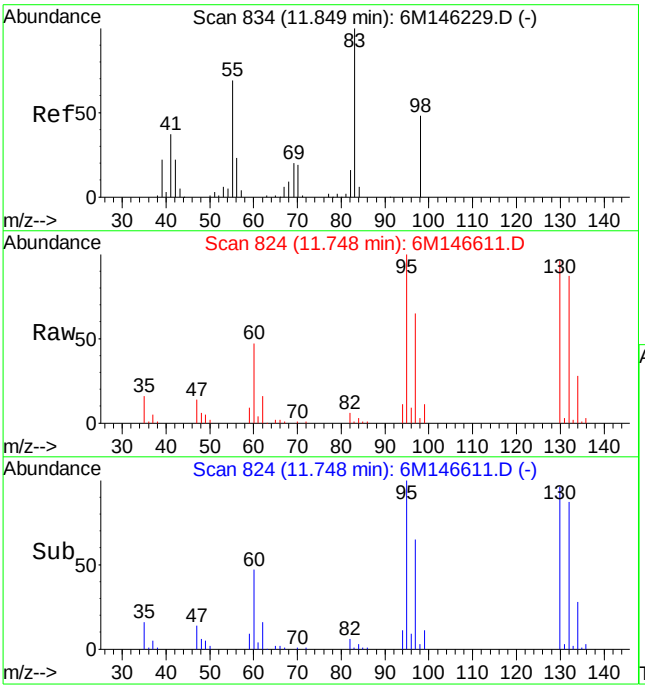


#47
Trichloroethene
Concen: 26.74 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion:130 Resp: 166132

Ion	Ratio	Lower	Upper
130	100		
60	46.7	32.0	74.6

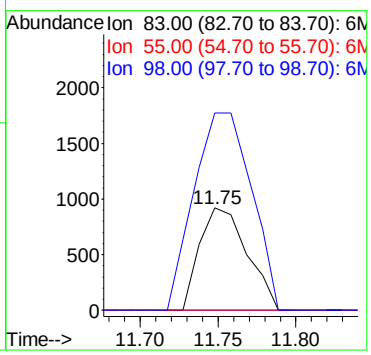


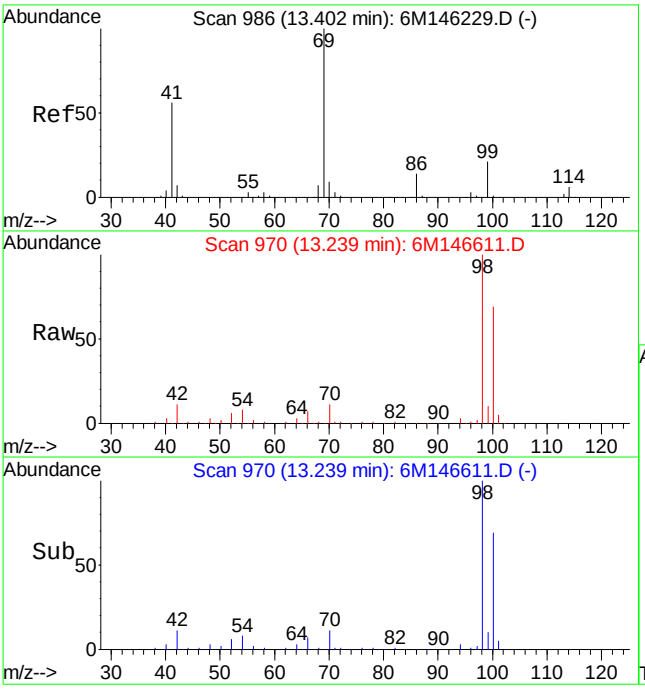


#48
Methylcyclohexane
Concen: 0.22 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.10 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 83 Resp: 1954

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	233.6	28.4	66.4#

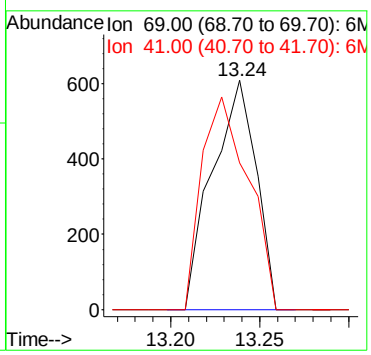


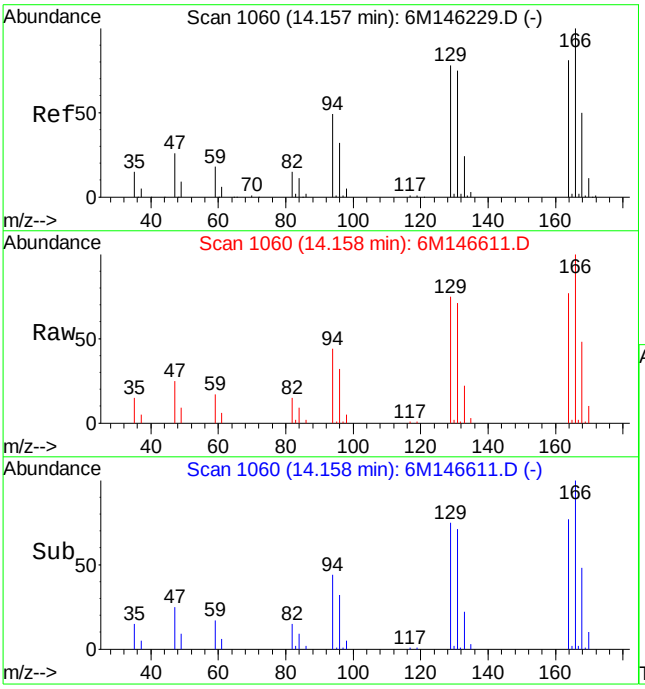


#60
Ethyl Methacrylate
Concen: 0.18 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 69 Resp: 1042

Ion	Ratio	Lower	Upper
69	100		
41	98.6	51.4	120.0

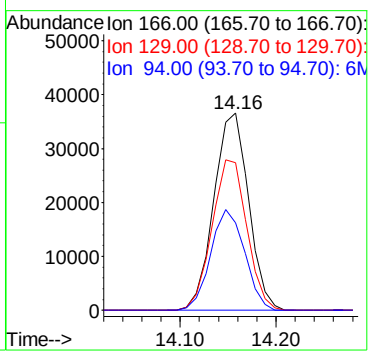


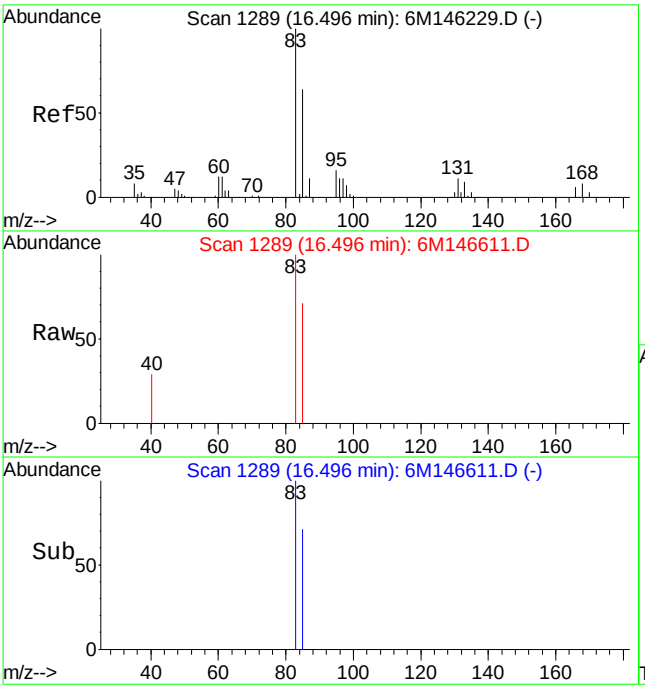


#66
Tetrachloroethene
Concen: 15.80 ug/L
RT: 14.16 min Scan# 1060
Delta R.T. -0.00 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion:166 Resp: 91689

Ion	Ratio	Lower	Upper
166	100		
129	76.5	43.5	101.5
94	49.9	27.8	64.8

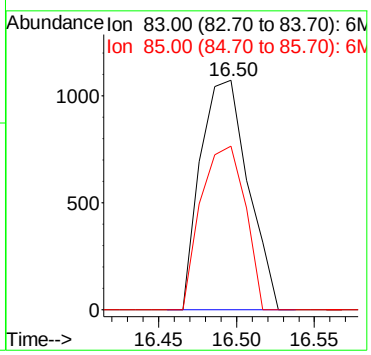




#79
1,1,2,2-Tetrachloroethane
Concen: 0.44 ug/L
RT: 16.50 min Scan# 1289
Delta R.T. -0.00 min
Lab File: 6M146611.D
Acq: 21 Apr 2017 20:03

Tgt Ion: 83 Resp: 2283

Ion	Ratio	Lower	Upper
83	100		
85	66.0	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146616.D Vial: 19
Acq On : 21 Apr 2017 22:35 Operator: TMB
Sample : L17041069-22 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34:19 2017 Quant Results File: 8260BWT.RES

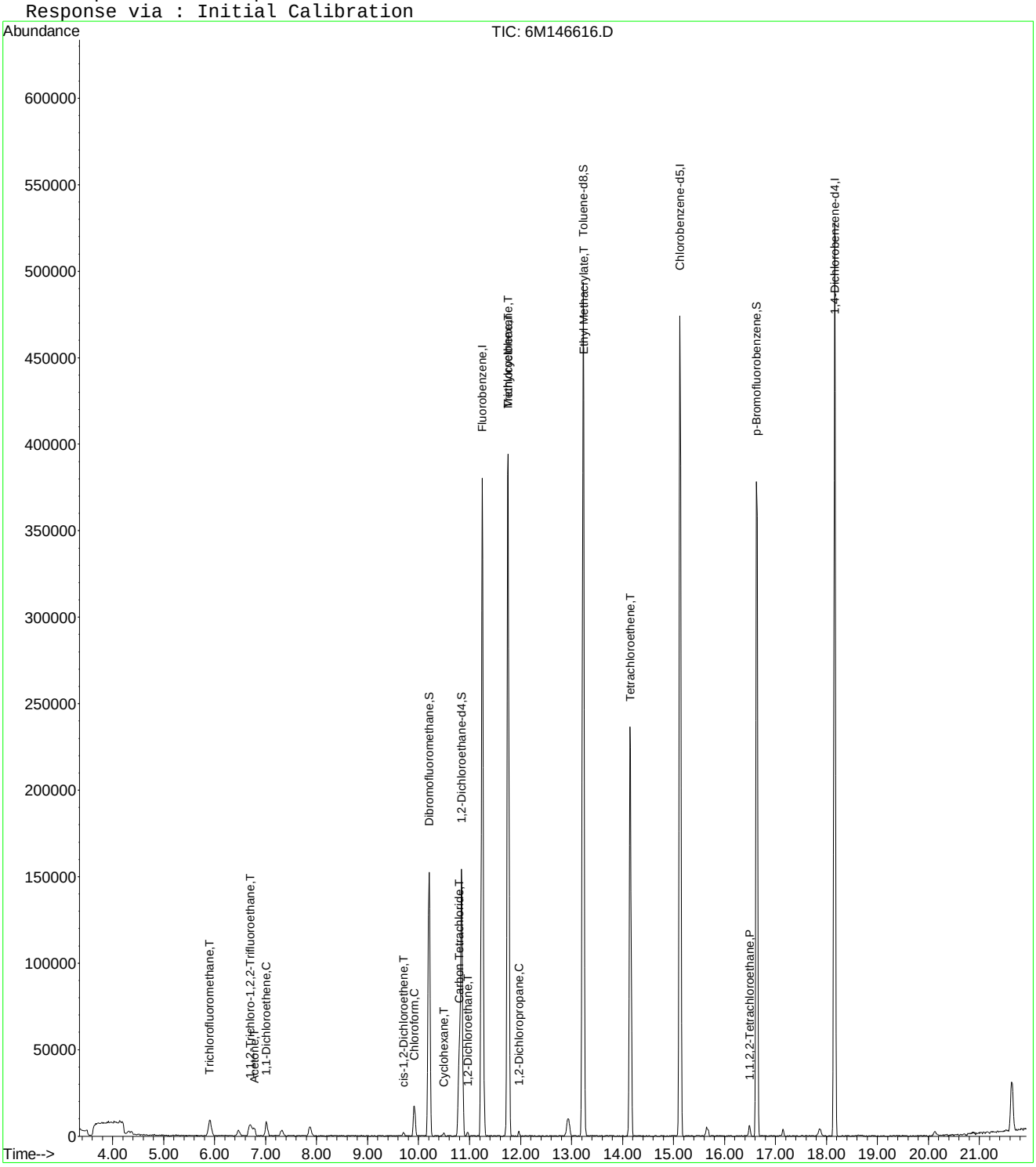
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

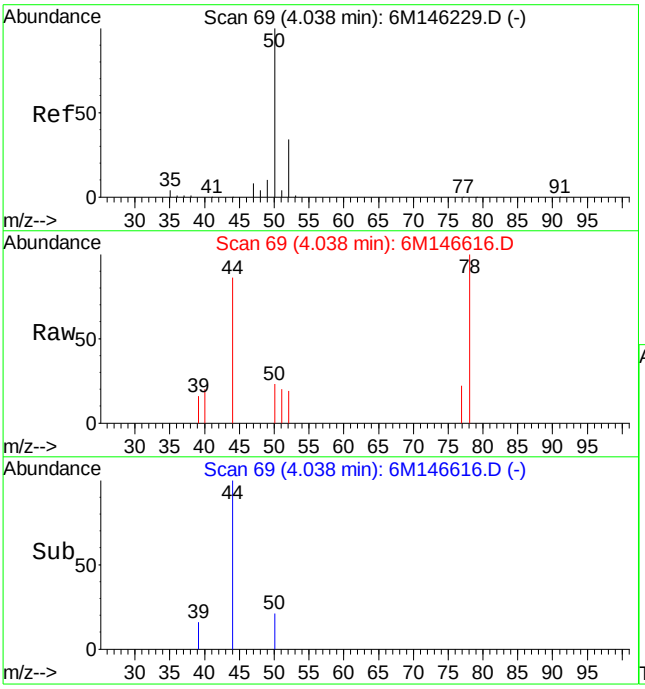
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	484583	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	348489	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	178627	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	130996	26.4811 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.92%		
43) 1,2-Dichloroethane-d4	10.84	65	131805	27.0345 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.12%		
58) Toluene-d8	13.23	98	461646	25.9606 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.84%		
80) p-Bromofluorobenzene	16.63	95	181035	26.6843 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.72%		
Target Compounds					Qvalue
3) Chloromethane	4.04	50	433	Below Cal #	42
8) Trichlorofluoromethane	5.90	101	18721	2.0778 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	8911	1.7471 ug/L	95
13) Acetone	6.77	43	9317	8.9099 ug/L	90
14) 1,1-Dichloroethene	7.01	61	10023	1.3567 ug/L	87
32) cis-1,2-Dichloroethene	9.71	96	1358	0.2323 ug/L	86
33) Chloroform	9.92	83	20241	2.0173 ug/L	92
39) Cyclohexane	10.49	56	1732	0.2296 ug/L #	59
42) Carbon Tetrachloride	10.80	117	46606	7.2459 ug/L	99
45) 1,2-Dichloroethane	10.96	62	3127	0.5010 ug/L #	69
47) Trichloroethene	11.76	130	176675	31.3059 ug/L	93
48) Methylcyclohexane	11.76	83	2037	0.2498 ug/L #	1
49) 1,2-Dichloropropane	11.97	63	1843	0.3767 ug/L	94
60) Ethyl Methacrylate	13.24	69	694	0.1316 ug/L	87
66) Tetrachloroethene	14.16	166	93366	17.6842 ug/L	94
79) 1,1,2,2-Tetrachloroethane	16.50	83	6789	1.4593 ug/L	93

(#) = qualifier out of range (m) = manual integration
6M146616.D 8260BWT.M Mon Apr 24 09:00:52 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146616.D Vial: 19
Acq On : 21 Apr 2017 22:35 Operator: TMB
Sample : L17041069-22 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

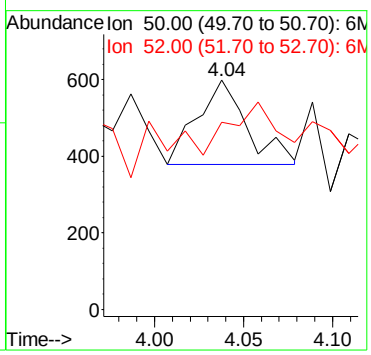


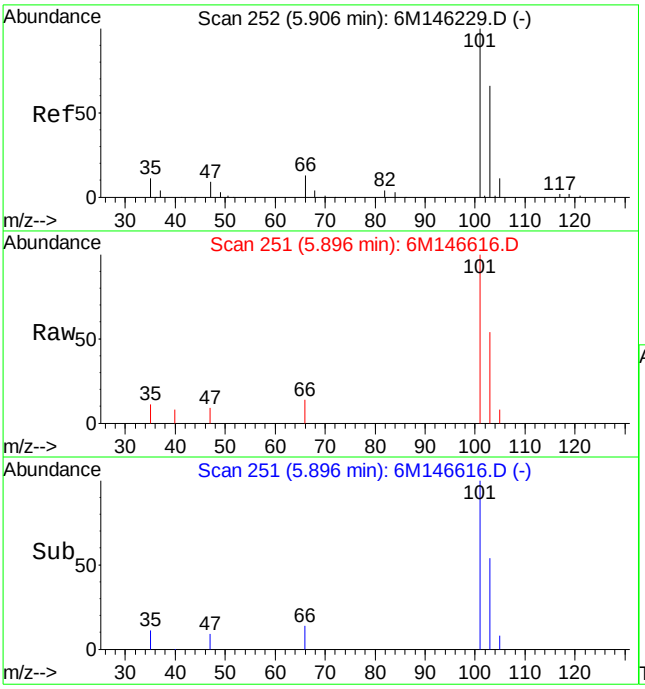


#3
Chloromethane
Concen: Below Cal
RT: 4.04 min Scan# 69
Delta R.T. 0.02 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 50 Resp: 433

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

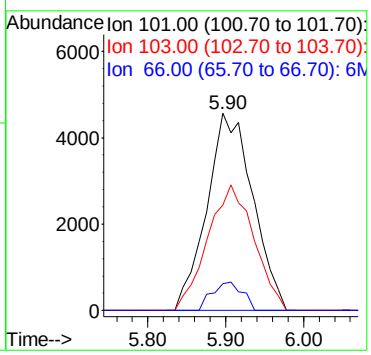


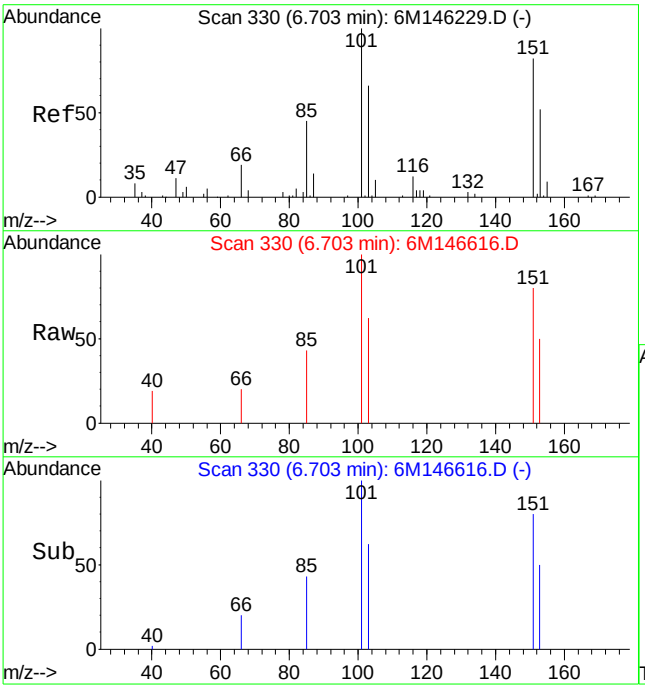


#8
Trichlorofluoromethane
Concen: 2.08 ug/L
RT: 5.90 min Scan# 251
Delta R.T. 0.01 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion:101 Resp: 18721

Ion	Ratio	Lower	Upper
101	100		
103	64.1	39.1	91.1
66	9.5	8.3	19.5

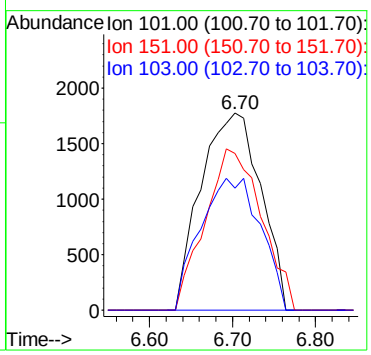


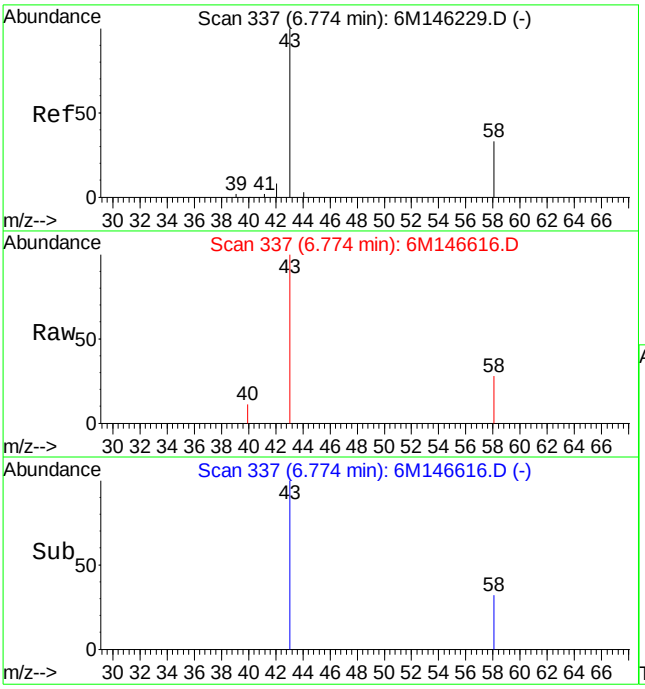


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.75 ug/L
RT: 6.70 min Scan# 330
Delta R.T. 0.02 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion:101 Resp: 8911

Ion	Ratio	Lower	Upper
101	100		
151	76.8	49.4	115.2
103	67.4	38.8	90.4

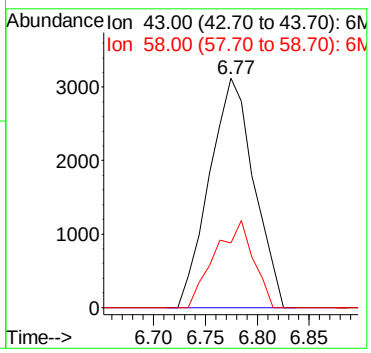


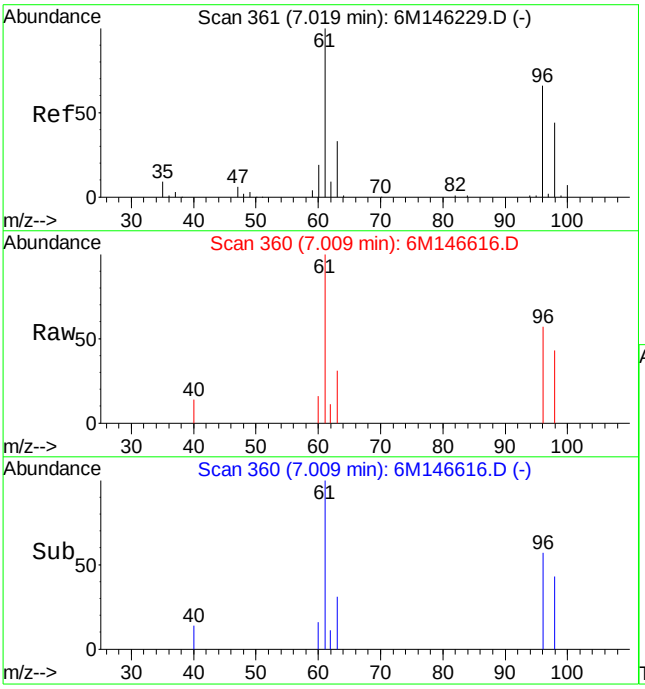


#13
Acetone
Concen: 8.91 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 43 Resp: 9317

Ion	Ratio	Lower	Upper
43	100		
58	32.8	16.4	38.2

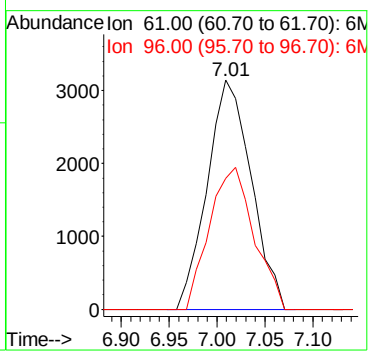


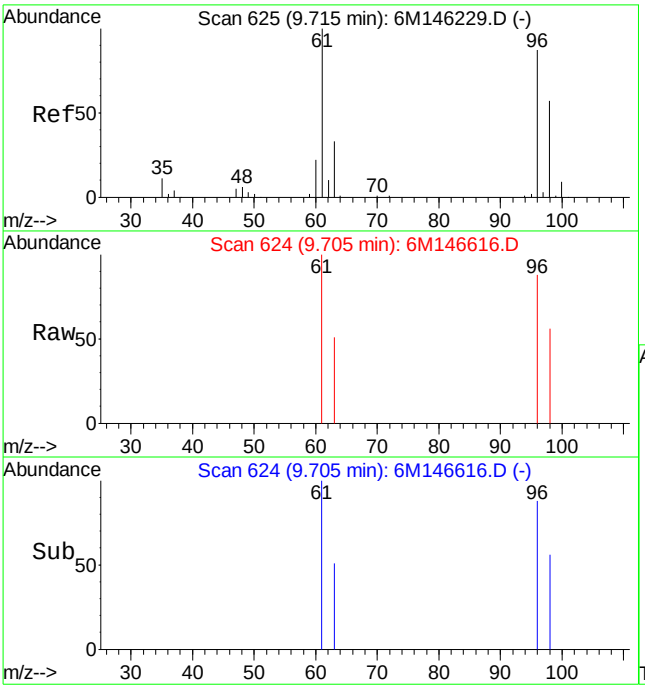


#14
1,1-Dichloroethene
Concen: 1.36 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 61 Resp: 10023

Ion	Ratio	Lower	Upper
61	100		
96	62.4	32.0	74.6

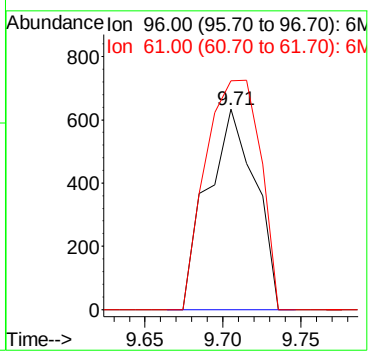


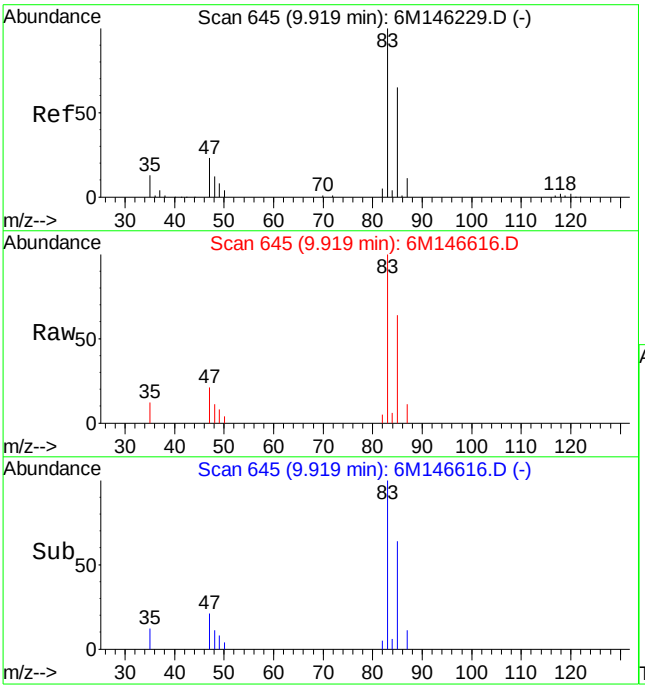


#32
cis-1,2-Dichloroethene
Concen: 0.23 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 96 Resp: 1358

Ion	Ratio	Lower	Upper
96	100		
61	130.8	89.2	208.2

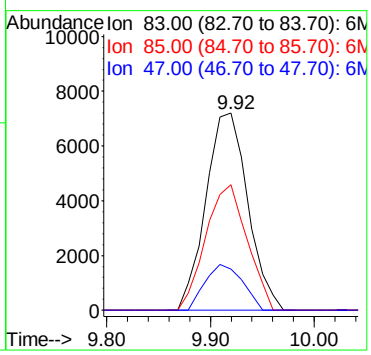


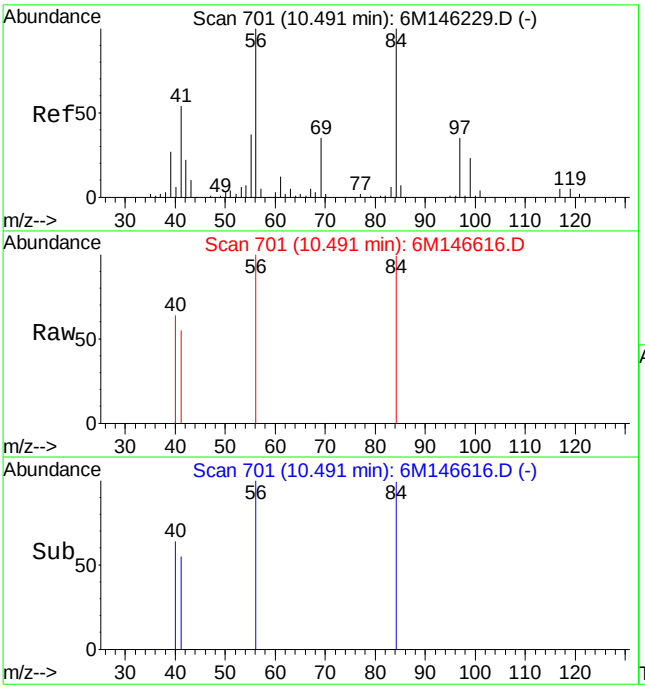


#33
Chloroform
Concen: 2.02 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 83 Resp: 20241

Ion	Ratio	Lower	Upper
83	100		
85	62.6	39.0	91.0
47	20.8	18.5	43.1

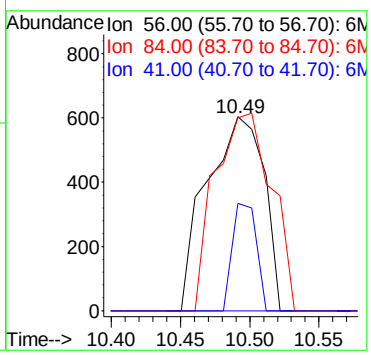


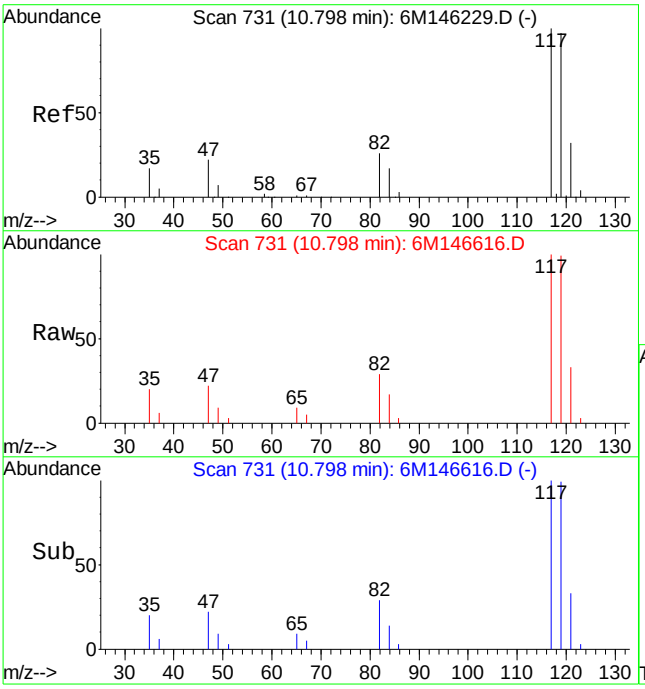


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 56 Resp: 1732

Ion	Ratio	Lower	Upper
56	100		
84	100.6	43.6	101.6
41	23.2	37.1	86.5#

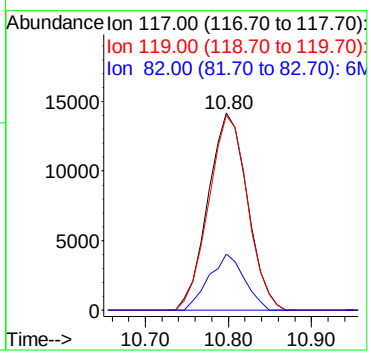


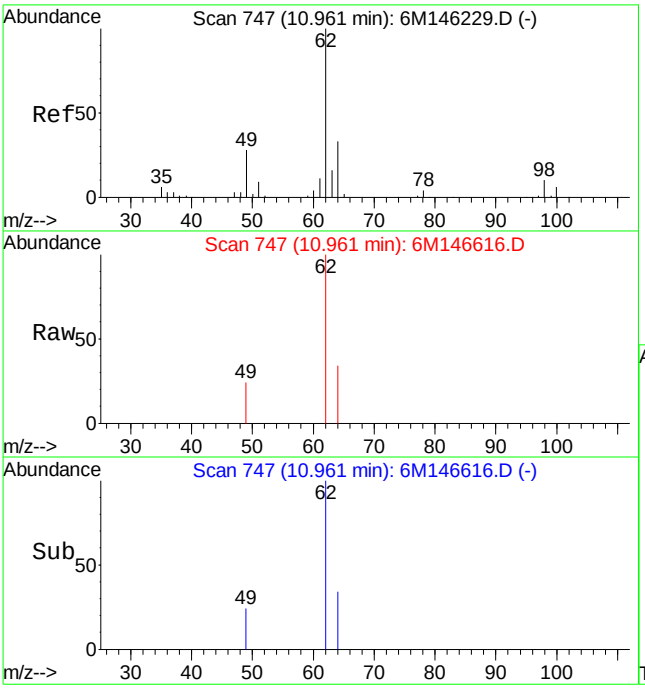


#42
Carbon Tetrachloride
Concen: 7.25 ug/L
RT: 10.80 min Scan# 731
Delta R.T. -0.01 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion:117 Resp: 46606

Ion	Ratio	Lower	Upper
117	100		
119	97.6	57.8	134.8
82	25.7	15.1	35.3

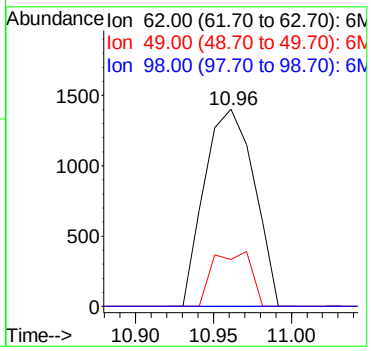


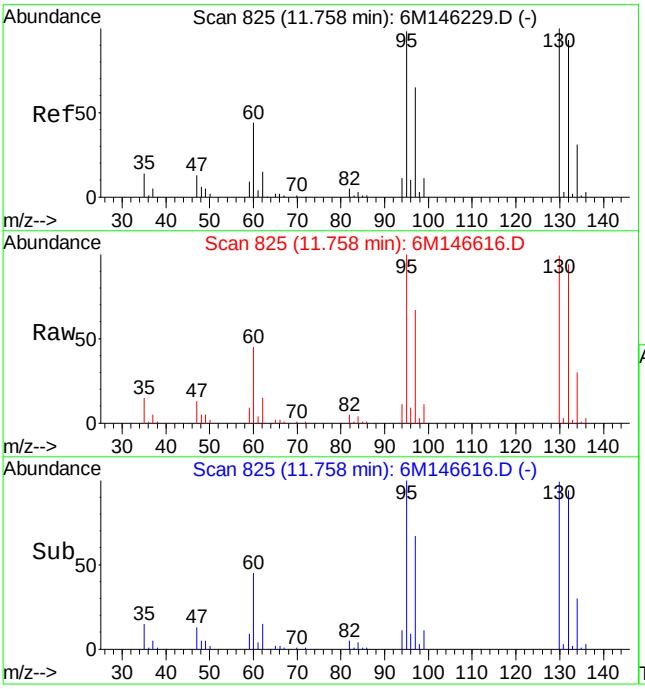


#45
1,2-Dichloroethane
Concen: 0.50 ug/L
RT: 10.96 min Scan# 747
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 62 Resp: 3127

Ion	Ratio	Lower	Upper
62	100		
49	21.4	25.1	58.5#
98	0.0	5.2	12.0#

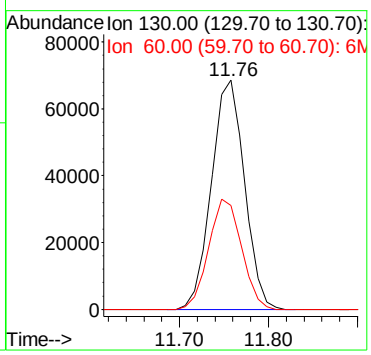


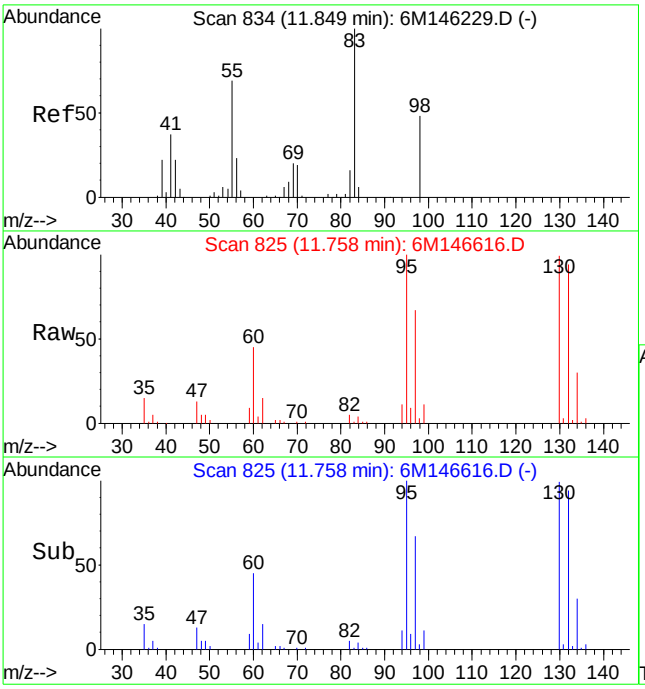


#47
Trichloroethene
Concen: 31.31 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion:130 Resp: 176675

Ion	Ratio	Lower	Upper
130	100		
60	48.0	32.0	74.6

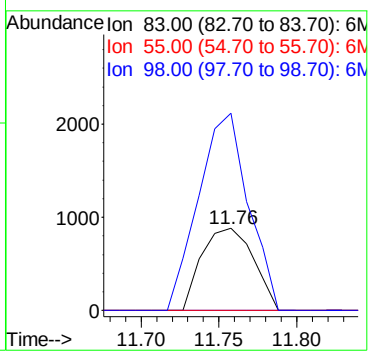


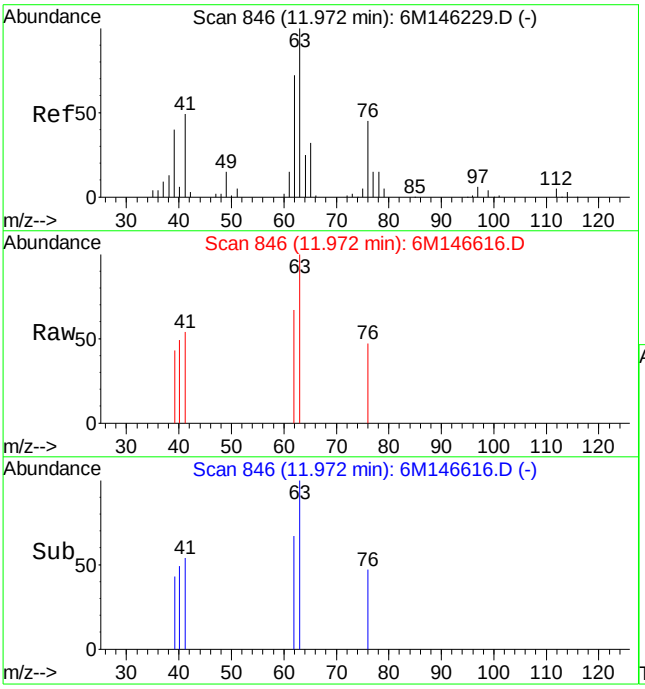


#48
Methylcyclohexane
Concen: 0.25 ug/L
RT: 11.76 min Scan# 825
Delta R.T. -0.09 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 83 Resp: 2037

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	232.0	28.4	66.4#

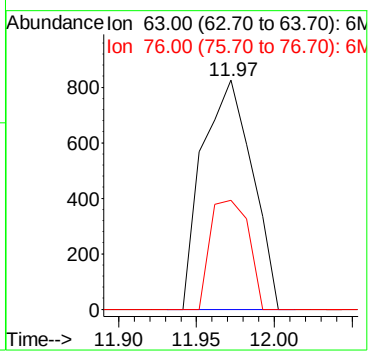


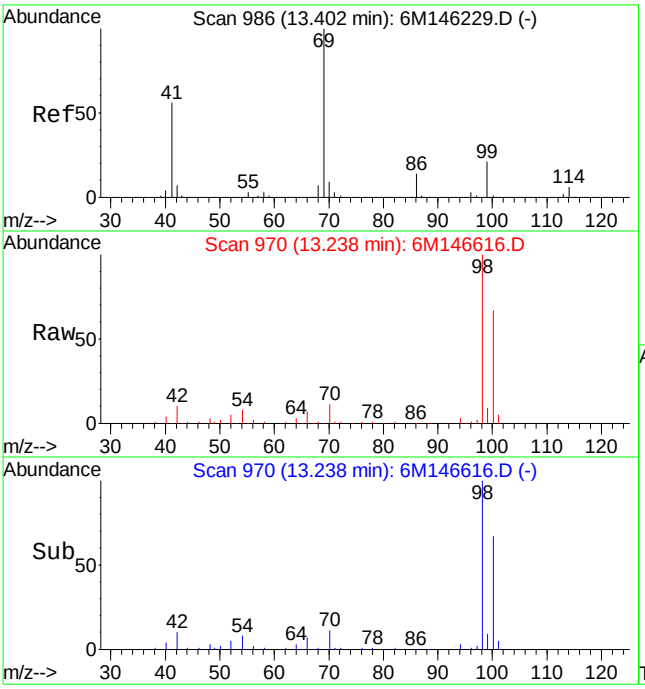


#49
1,2-Dichloropropane
Concen: 0.38 ug/L
RT: 11.97 min Scan# 846
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 63 Resp: 1843

Ion	Ratio	Lower	Upper
63	100		
76	36.5	24.2	56.4

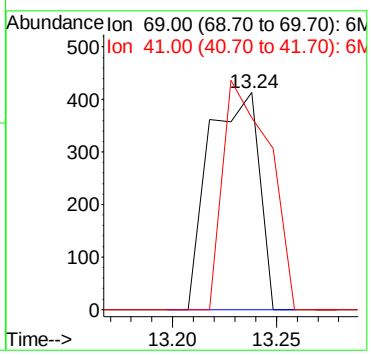


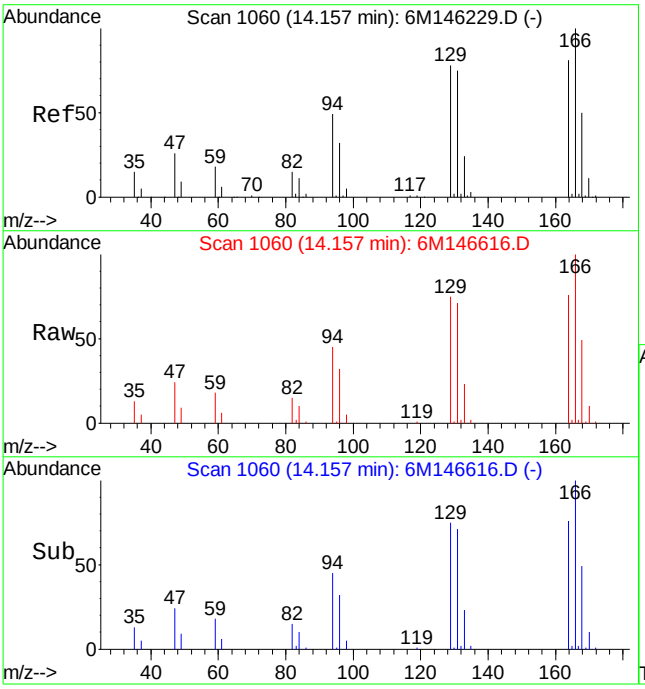


#60
Ethyl Methacrylate
Concen: 0.13 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 69 Resp: 694

Ion	Ratio	Lower	Upper
69	100		
41	97.8	51.4	120.0

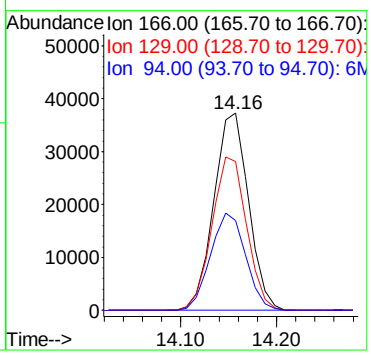


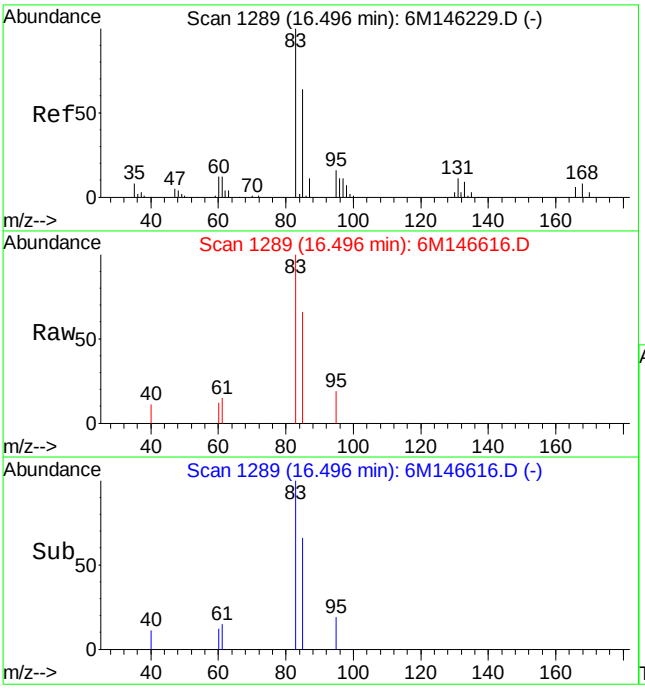


#66
Tetrachloroethene
Concen: 17.68 ug/L
RT: 14.16 min Scan# 1060
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion:166 Resp: 93366

Ion	Ratio	Lower	Upper
166	100		
129	77.6	43.5	101.5
94	49.8	27.8	64.8

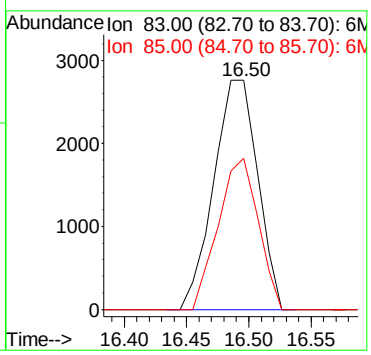




#79
1,1,2,2-Tetrachloroethane
Concen: 1.46 ug/L
RT: 16.50 min Scan# 1289
Delta R.T. -0.00 min
Lab File: 6M146616.D
Acq: 21 Apr 2017 22:35

Tgt Ion: 83 Resp: 6789

Ion	Ratio	Lower	Upper
83	100		
85	59.9	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146615.D Vial: 18
Acq On : 21 Apr 2017 22:05 Operator: TMB
Sample : L17041069-23 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34:15 2017 Quant Results File: 8260BWT.RES

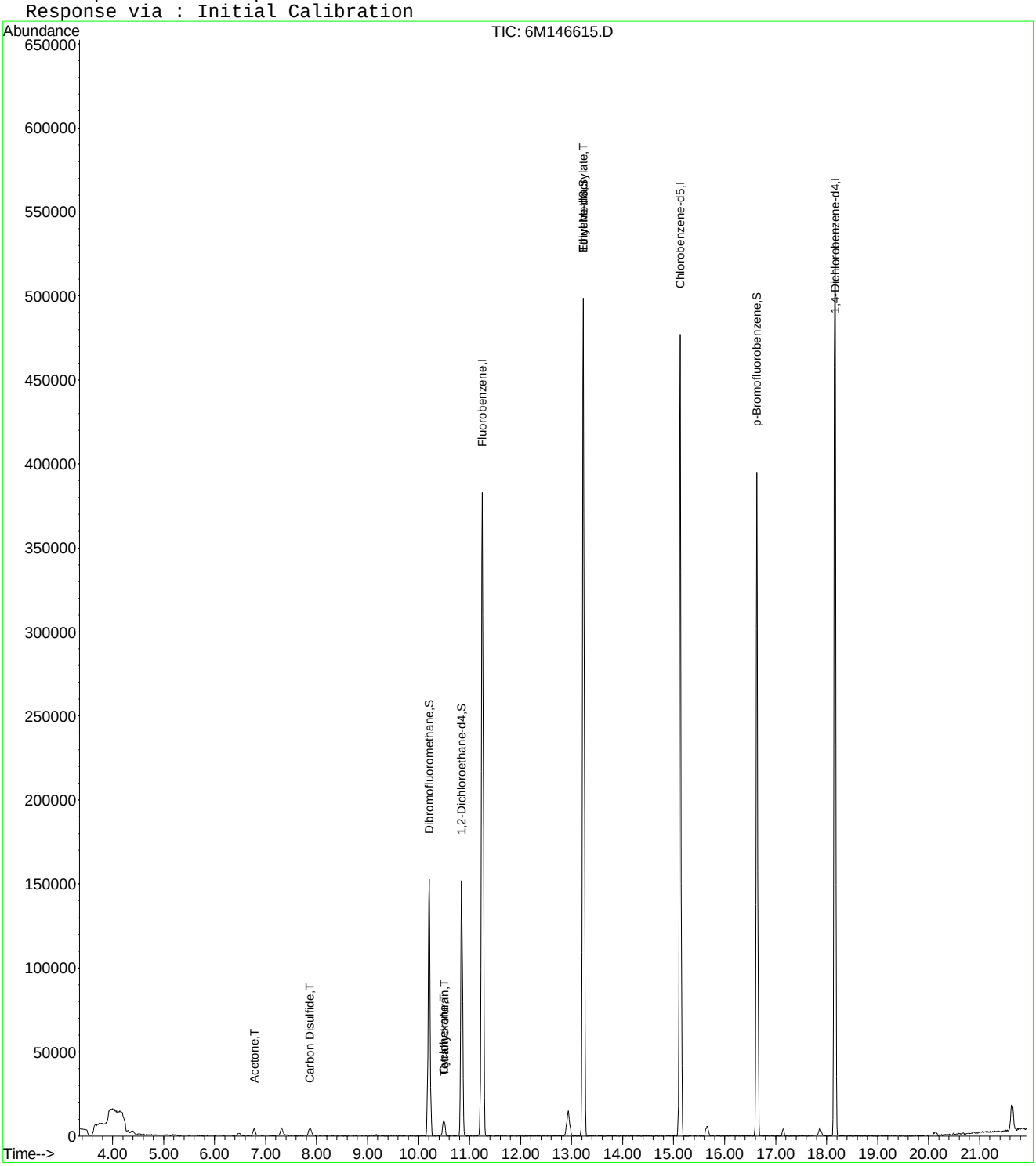
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

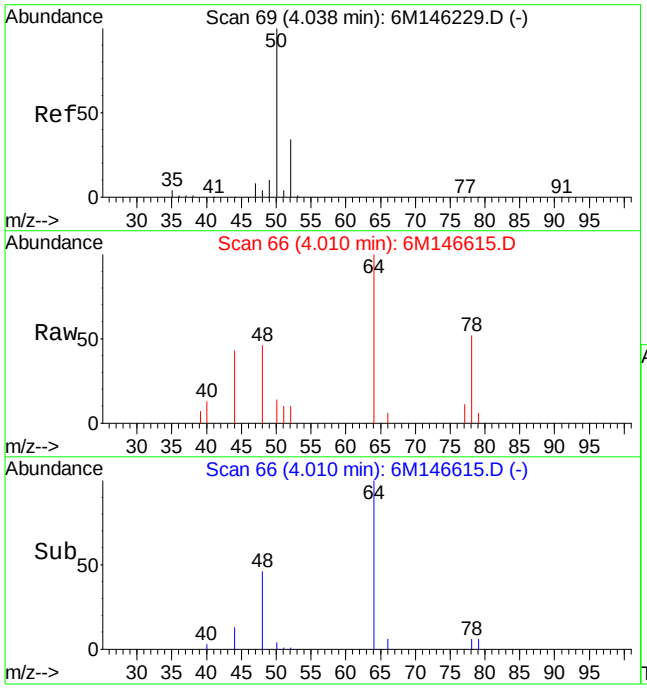
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	493936	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	357763	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	185085	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	131952	26.1693 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.68%		
43) 1,2-Dichloroethane-d4	10.84	65	134830	27.1312 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.52%		
58) Toluene-d8	13.23	98	468994	25.6901 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.76%		
80) p-Bromofluorobenzene	16.63	95	184558	26.2544 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.00%		
Target Compounds					Qvalue
3) Chloromethane	4.01	50	707	Below Cal	99
13) Acetone	6.78	43	8838	8.2918 ug/L	94
20) Carbon Disulfide	7.86	76	2423	0.1495 ug/L #	74
36) Tetrahydrofuran	10.50	42	1502	1.6979 ug/L #	41
39) Cyclohexane	10.49	56	8495	1.1049 ug/L	82
60) Ethyl Methacrylate	13.23	69	777	0.1435 ug/L	78

(#) = qualifier out of range (m) = manual integration
6M146615.D 8260BWT.M Mon Apr 24 09:00:48 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146615.D Vial: 18
Acq On : 21 Apr 2017 22:05 Operator: TMB
Sample : L17041069-23 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

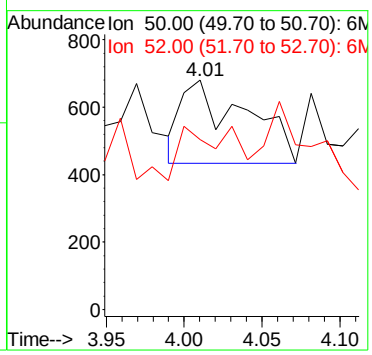


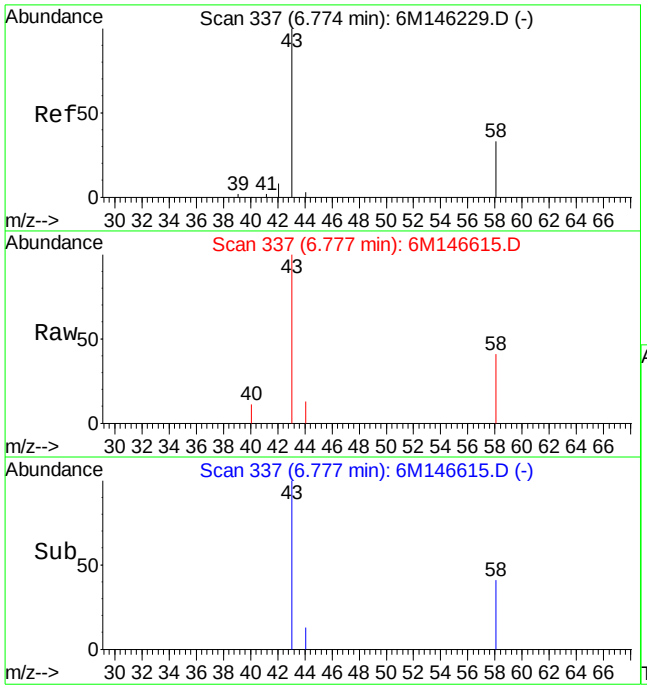


#3
Chloromethane
Concen: Below Cal
RT: 4.01 min Scan# 66
Delta R.T. -0.01 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 50 Resp: 707

Ion	Ratio	Lower	Upper
50	100		
52	32.5	19.8	46.2

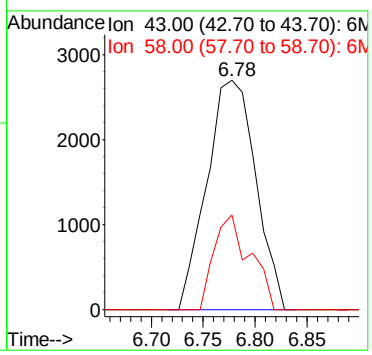


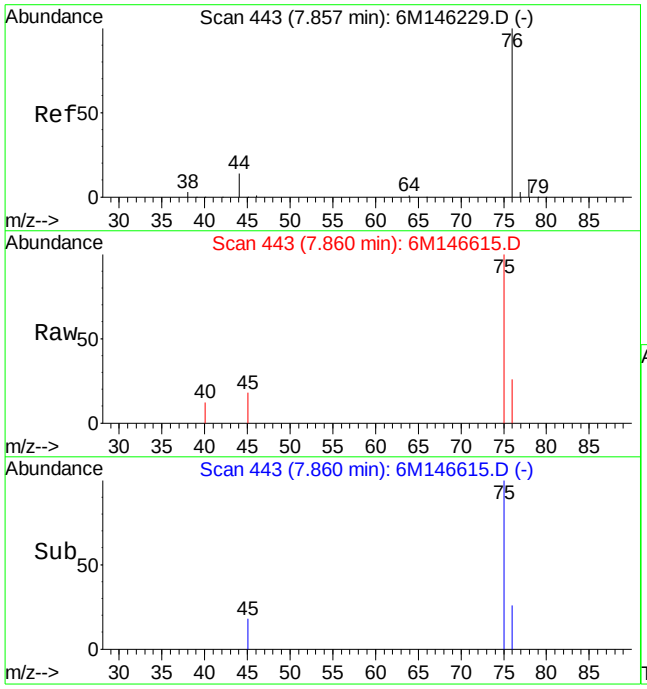


#13
Acetone
Concen: 8.29 ug/L
RT: 6.78 min Scan# 337
Delta R.T. 0.00 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 43 Resp: 8838

Ion	Ratio	Lower	Upper
43	100		
58	30.3	16.4	38.2

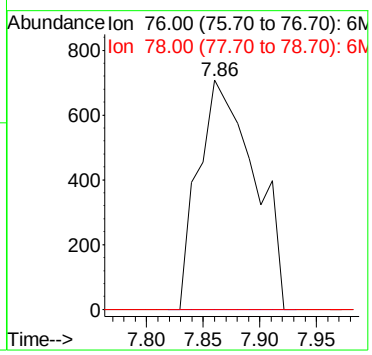


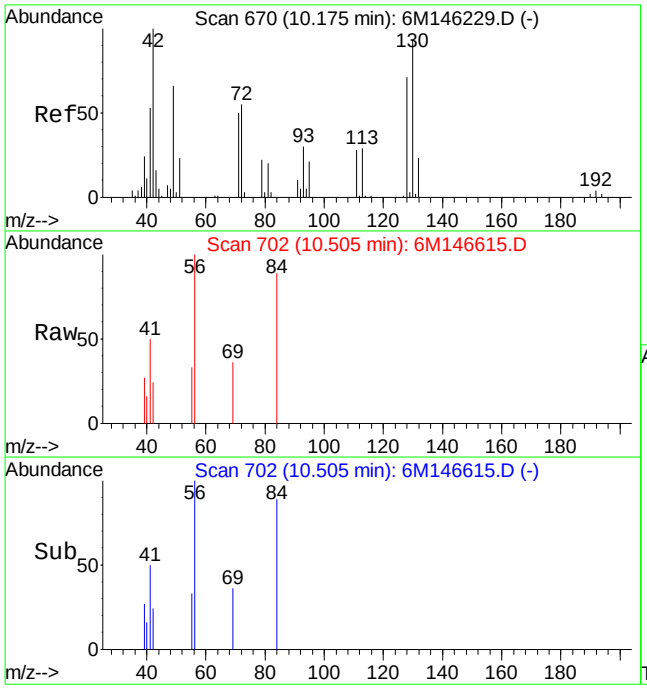


#20
Carbon Disulfide
Concen: 0.15 ug/L
RT: 7.86 min Scan# 443
Delta R.T. 0.01 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 76 Resp: 2423

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.7	13.3#

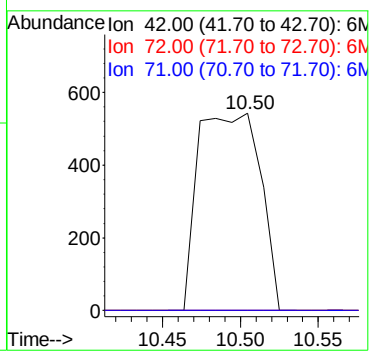


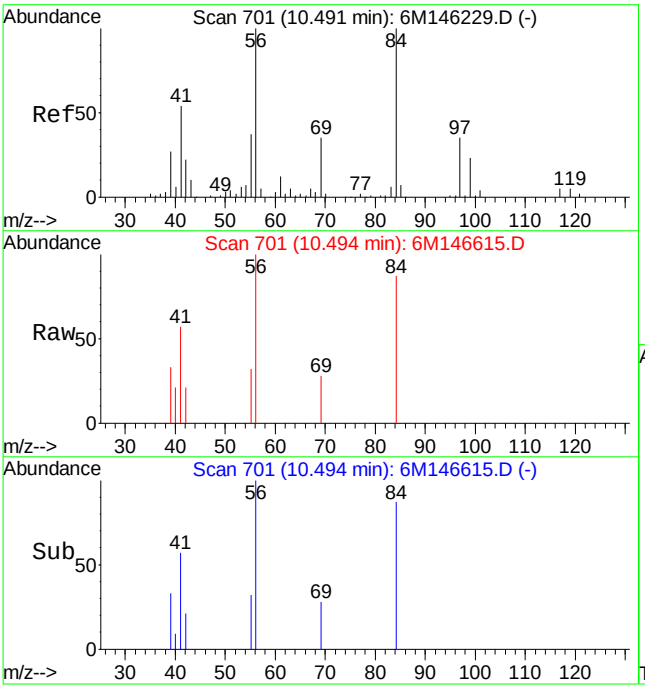


#36
Tetrahydrofuran
Concen: 1.70 ug/L
RT: 10.50 min Scan# 702
Delta R.T. 0.33 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 42 Resp: 1502

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

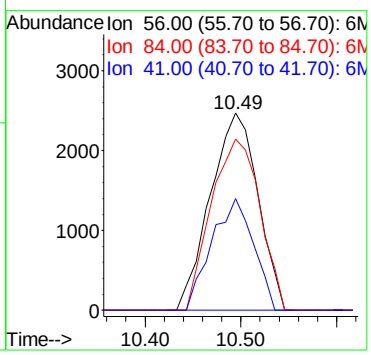


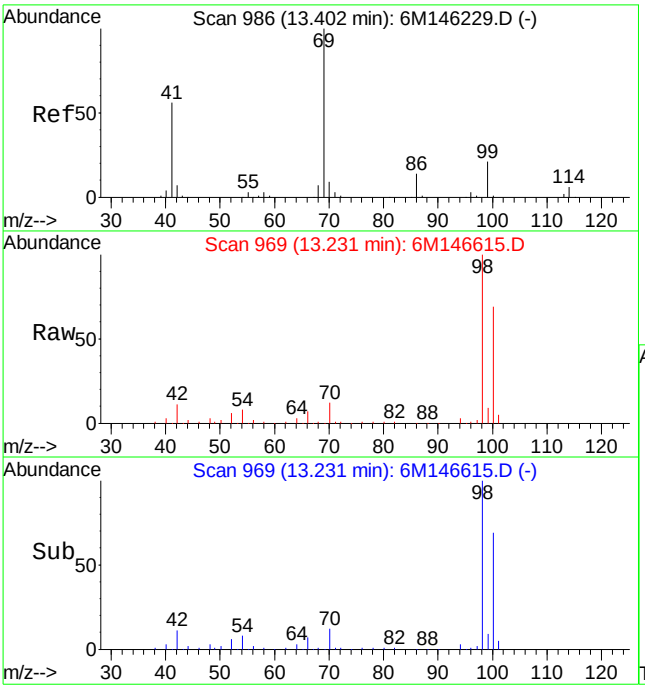


#39
Cyclohexane
Concen: 1.10 ug/L
RT: 10.49 min Scan# 701
Delta R.T. 0.00 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 56 Resp: 8495

Ion	Ratio	Lower	Upper
56	100		
84	88.5	43.6	101.6
41	49.7	37.1	86.5

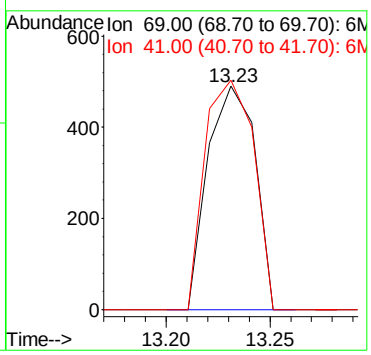




#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146615.D
Acq: 21 Apr 2017 22:05

Tgt Ion: 69 Resp: 777

Ion	Ratio	Lower	Upper
69	100		
41	106.0	51.4	120.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146614.D Vial: 17
Acq On : 21 Apr 2017 21:35 Operator: TMB
Sample : L17041069-24 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34:10 2017 Quant Results File: 8260BWT.RES

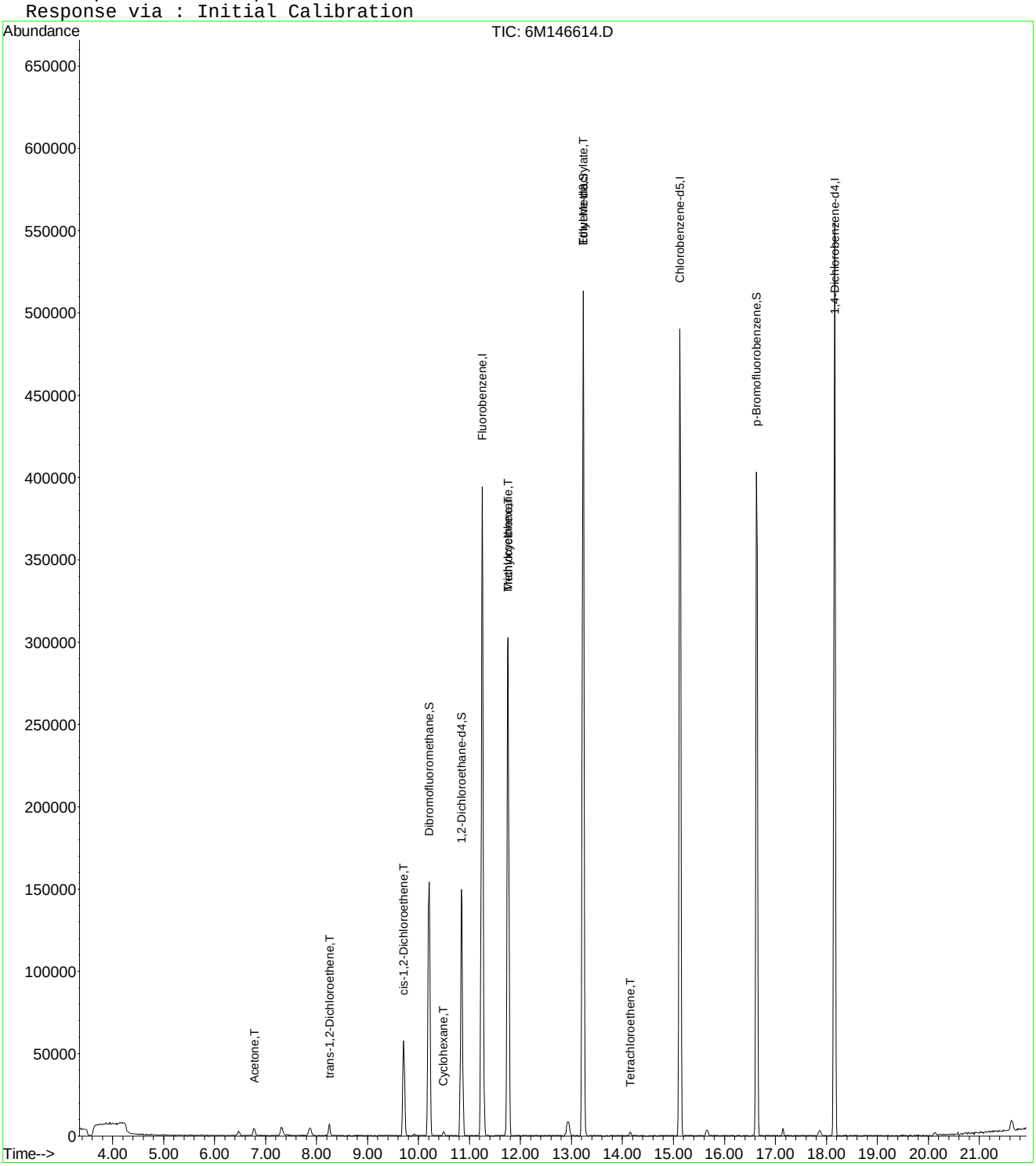
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

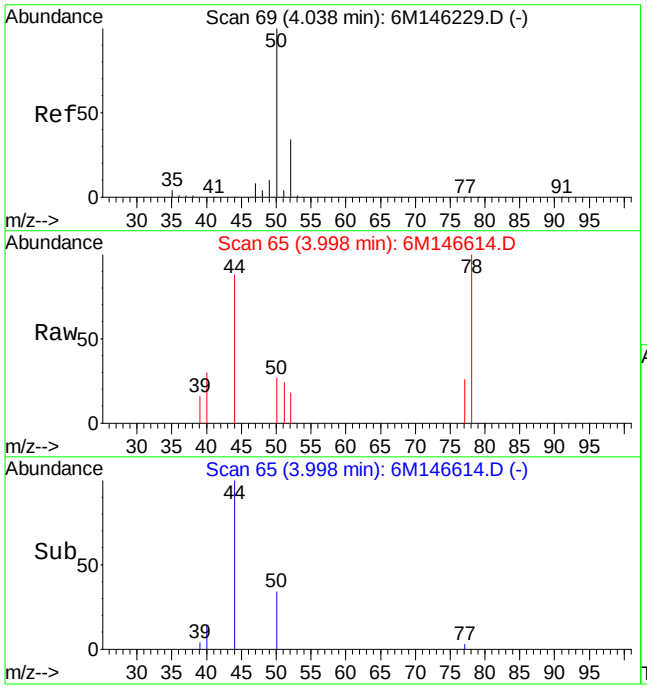
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	503360	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	361498	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	186770	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	135392	26.3488	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.40%			
43) 1,2-Dichloroethane-d4	10.84	65	136974	27.0466	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.20%			
58) Toluene-d8	13.23	98	476974	25.8573	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.44%			
80) p-Bromofluorobenzene	16.63	95	189347	26.6926	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.76%			
Target Compounds						Qvalue
3) Chloromethane	4.00	50	1092	Below Cal		88
13) Acetone	6.78	43	8525	7.8484	ug/L	96
23) trans-1,2-Dichloroethene	8.26	96	4783	0.8660	ug/L	73
32) cis-1,2-Dichloroethene	9.71	96	35385	5.8277	ug/L	80
39) Cyclohexane	10.48	56	1817	0.2319	ug/L #	70
47) Trichloroethene	11.76	130	136644	23.3094	ug/L	92
48) Methylcyclohexane	11.76	83	1612	0.1903	ug/L #	1
60) Ethyl Methacrylate	13.23	69	935	0.1710	ug/L	94
66) Tetrachloroethene	14.16	166	1447	0.2642	ug/L	88

(#) = qualifier out of range (m) = manual integration
6M146614.D 8260BWT.M Mon Apr 24 09:00:43 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146614.D Vial: 17
Acq On : 21 Apr 2017 21:35 Operator: TMB
Sample : L17041069-24 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

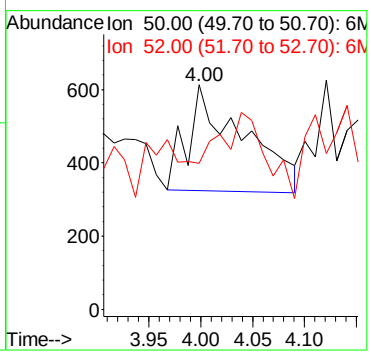


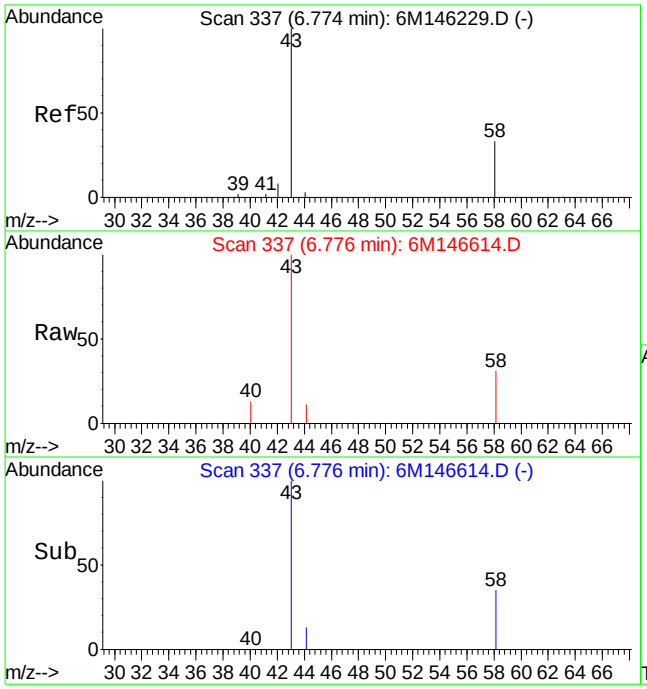


#3
Chloromethane
Concen: Below Cal
RT: 4.00 min Scan# 65
Delta R.T. -0.02 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 50 Resp: 1092

Ion	Ratio	Lower	Upper
50	100		
52	39.8	19.8	46.2

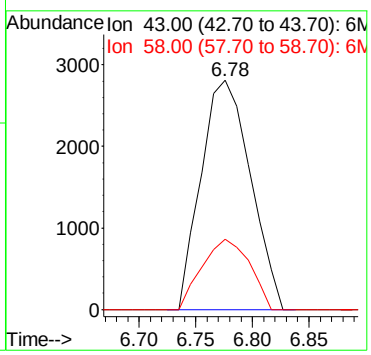


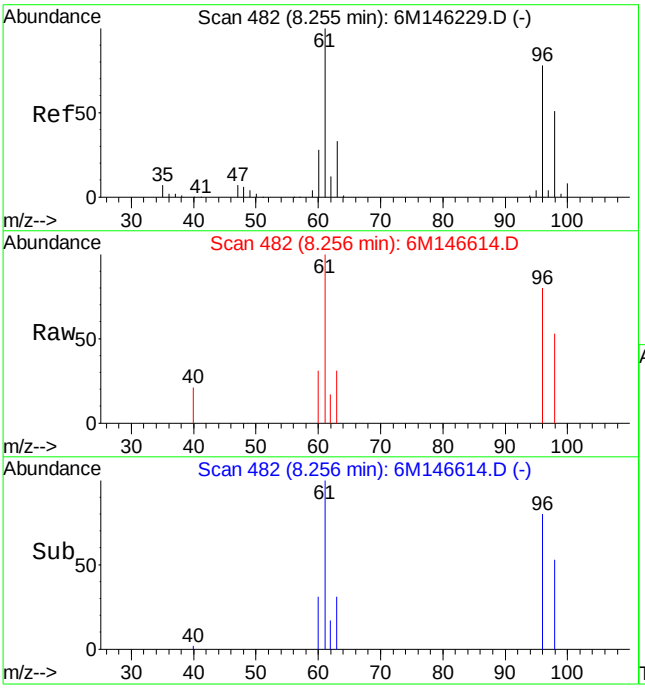


#13
Acetone
Concen: 7.85 ug/L
RT: 6.78 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 43 Resp: 8525

Ion	Ratio	Lower	Upper
43	100		
58	29.5	16.4	38.2

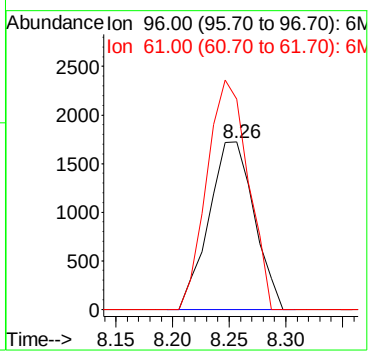


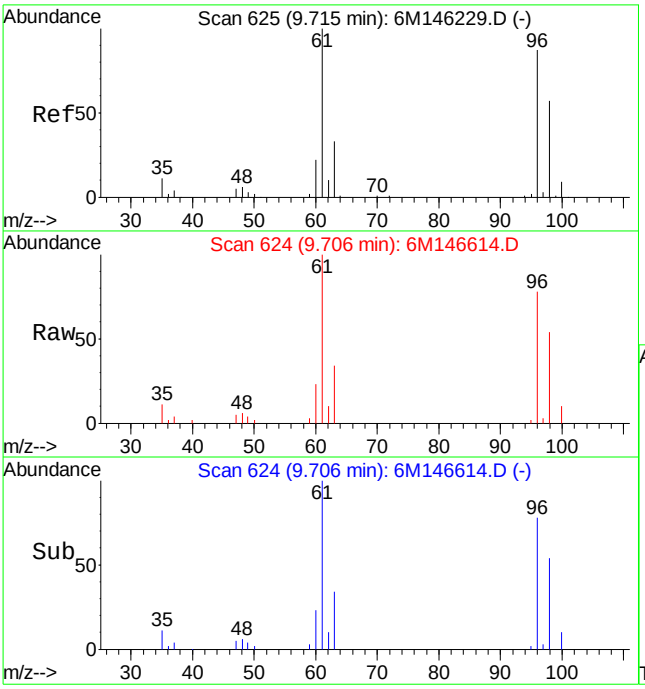


#23
trans-1,2-Dichloroethene
Concen: 0.87 ug/L
RT: 8.26 min Scan# 482
Delta R.T. 0.01 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 96 Resp: 4783

Ion	Ratio	Lower	Upper
96	100		
61	125.3	96.3	224.7

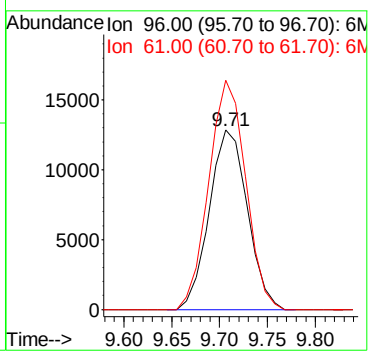


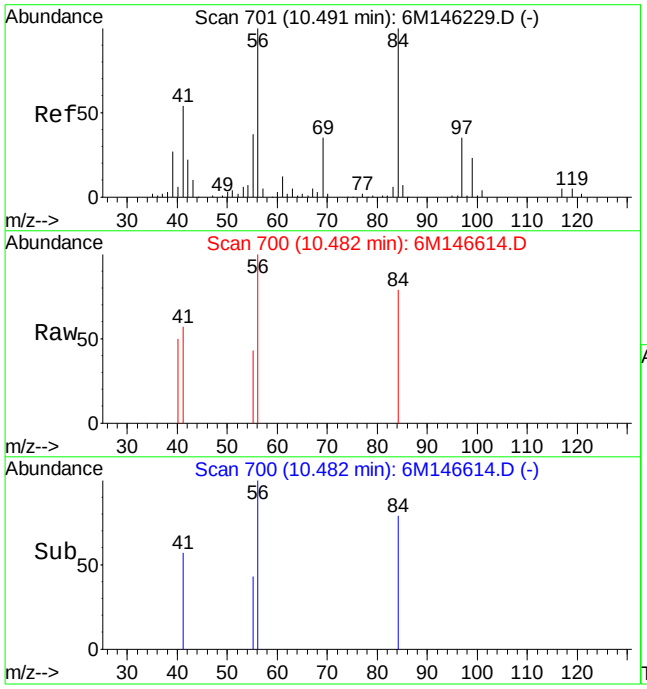


#32
cis-1,2-Dichloroethene
Concen: 5.83 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 96 Resp: 35385

Ion	Ratio	Lower	Upper
96	100		
61	123.6	89.2	208.2

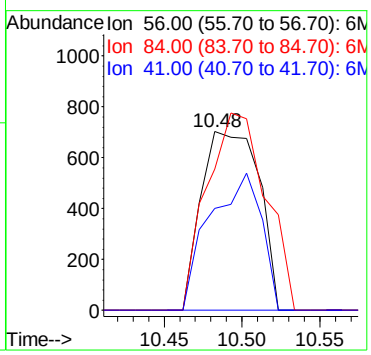


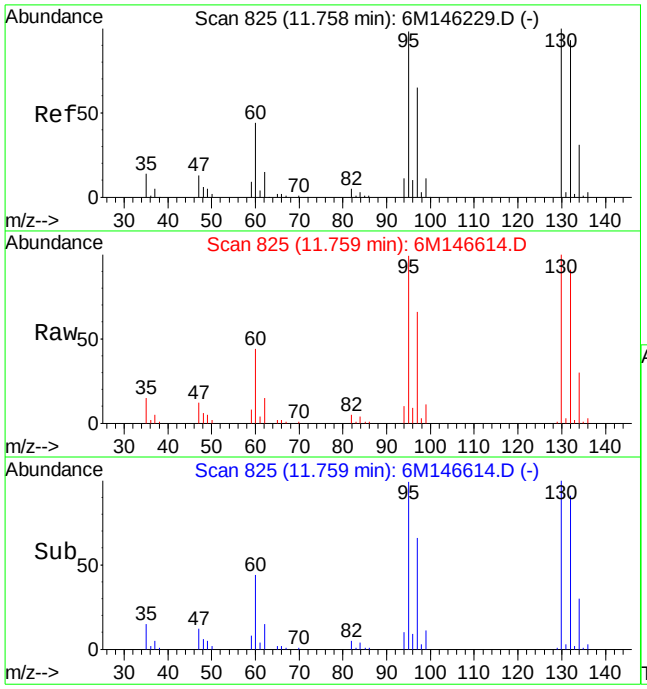


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.48 min Scan# 700
Delta R.T. -0.01 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 56 Resp: 1817

Ion	Ratio	Lower	Upper
56	100		
84	112.3	43.6	101.6#
41	68.5	37.1	86.5

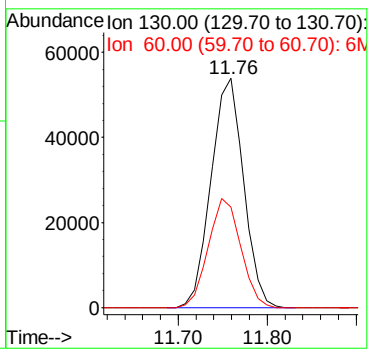


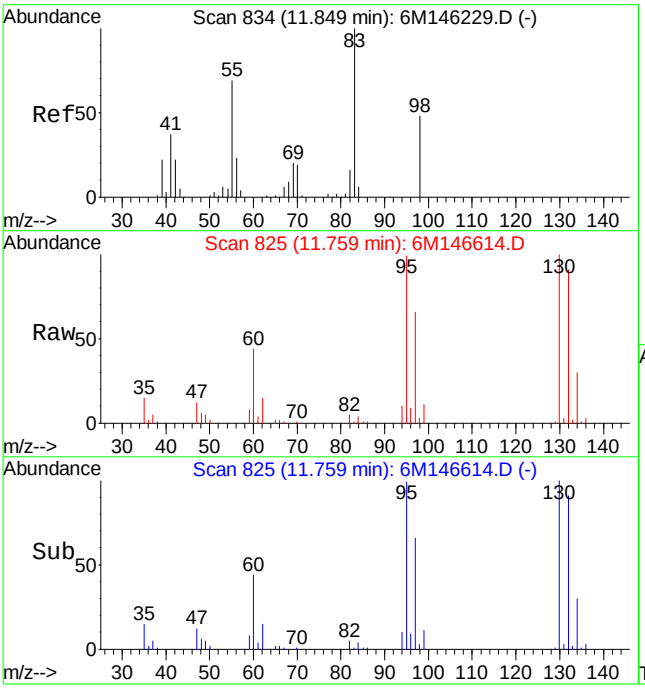


#47
Trichloroethene
Concen: 23.31 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion:130 Resp: 136644

Ion	Ratio	Lower	Upper
130	100		
60	47.5	32.0	74.6

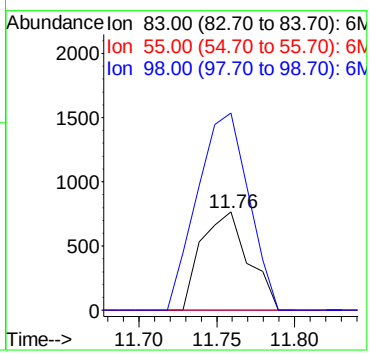


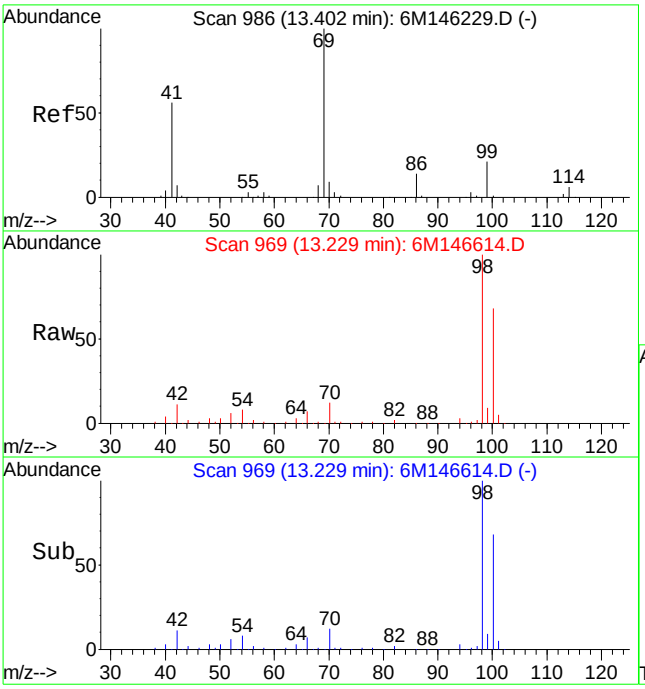


#48
Methylcyclohexane
Concen: 0.19 ug/L
RT: 11.76 min Scan# 825
Delta R.T. -0.09 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 83 Resp: 1612

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	219.0	28.4	66.4#

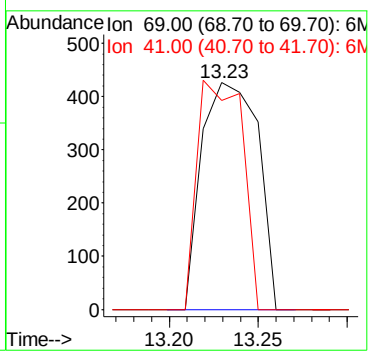


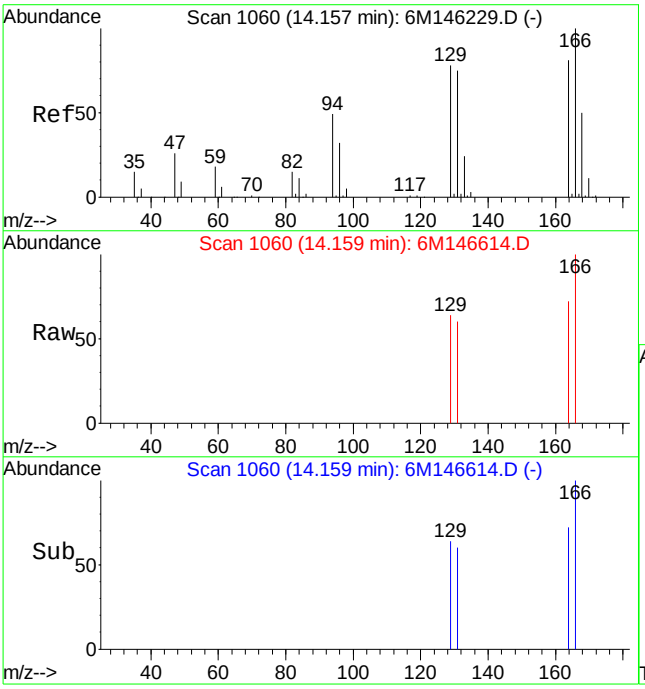


#60
Ethyl Methacrylate
Concen: 0.17 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion: 69 Resp: 935

Ion	Ratio	Lower	Upper
69	100		
41	80.6	51.4	120.0

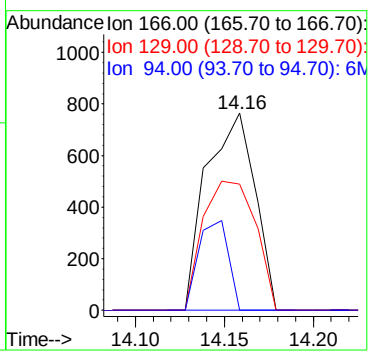




#66
Tetrachloroethene
Concen: 0.26 ug/L
RT: 14.16 min Scan# 1060
Delta R.T. -0.00 min
Lab File: 6M146614.D
Acq: 21 Apr 2017 21:35

Tgt Ion:166 Resp: 1447

Ion	Ratio	Lower	Upper
166	100		
129	70.7	43.5	101.5
94	27.9	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146613.D Vial: 16
Acq On : 21 Apr 2017 21:04 Operator: TMB
Sample : L17041069-25 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34:05 2017 Quant Results File: 8260BWT.RES

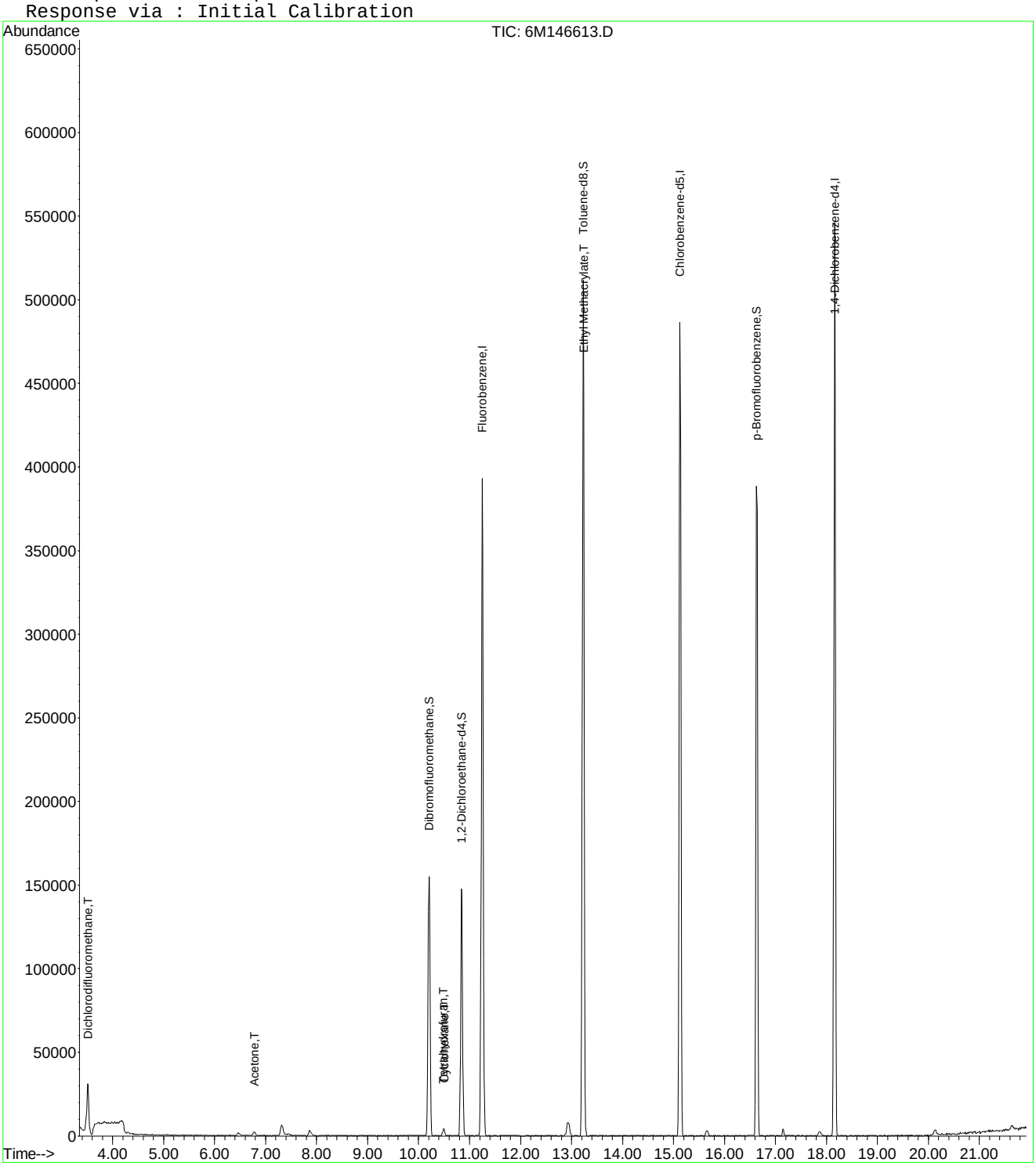
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

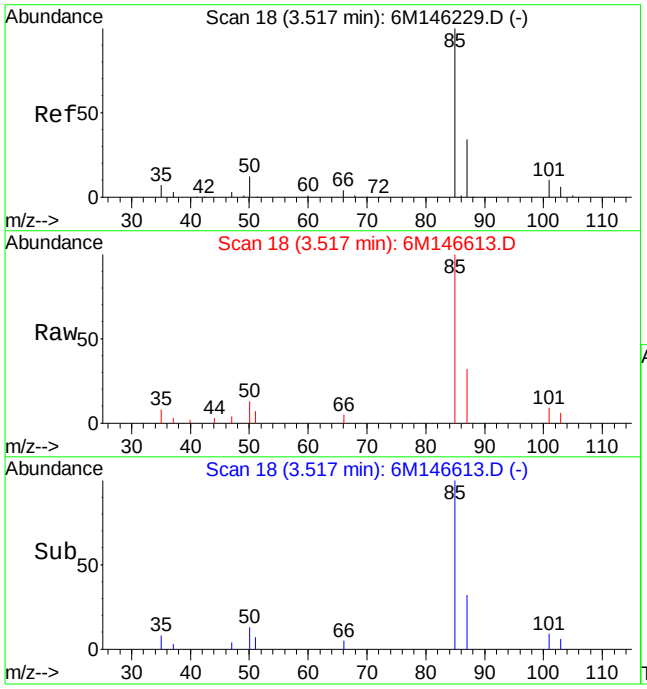
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	503470	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	361717	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	186183	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	134324	26.1352 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.56%		
43) 1,2-Dichloroethane-d4	10.84	65	133729	26.4001 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.60%		
58) Toluene-d8	13.23	98	477405	25.8650 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.44%		
80) p-Bromofluorobenzene	16.63	95	187361	26.4959 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.00%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	42653	5.3358 ug/L	96
3) Chloromethane	3.98	50	113	Below Cal #	42
13) Acetone	6.77	43	5019	4.6197 ug/L	91
36) Tetrahydrofuran	10.48	42	184	0.2041 ug/L #	41
39) Cyclohexane	10.50	56	3950	0.5040 ug/L	84
60) Ethyl Methacrylate	13.24	69	1015	0.1855 ug/L	96

(#) = qualifier out of range (m) = manual integration
6M146613.D 8260BWT.M Mon Apr 24 09:00:39 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146613.D Vial: 16
Acq On : 21 Apr 2017 21:04 Operator: TMB
Sample : L17041069-25 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

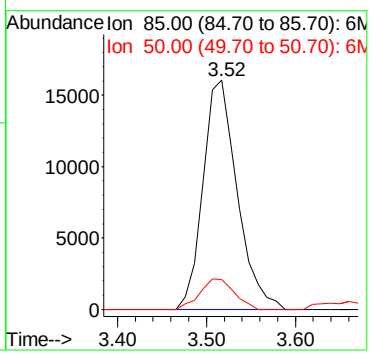


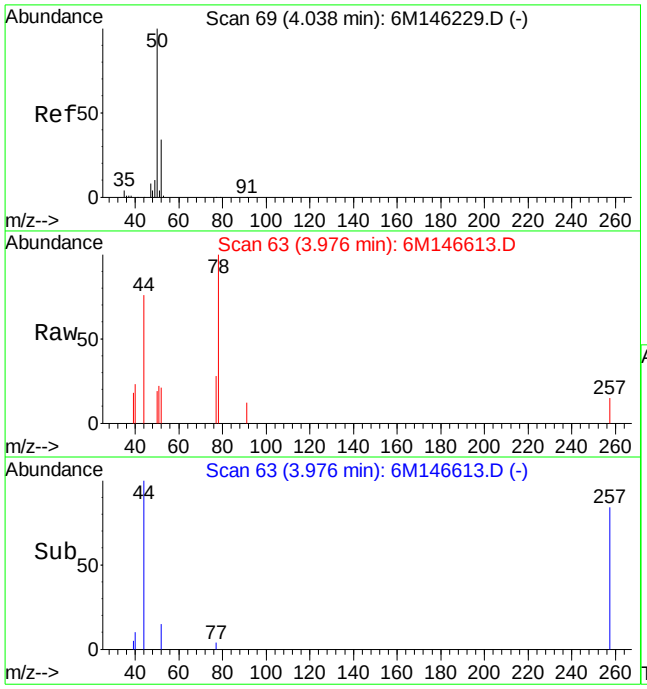


#2
Dichlorodifluoromethane
Concen: 5.34 ug/L
RT: 3.52 min Scan# 18
Delta R.T. -0.00 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 85 Resp: 42653

Ion	Ratio	Lower	Upper
85	100		
50	13.4	9.1	21.1

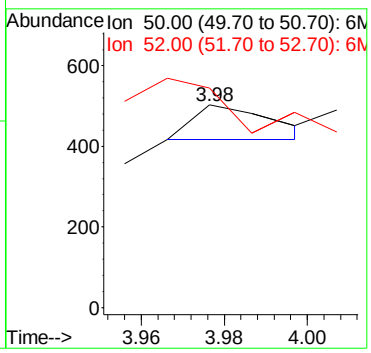


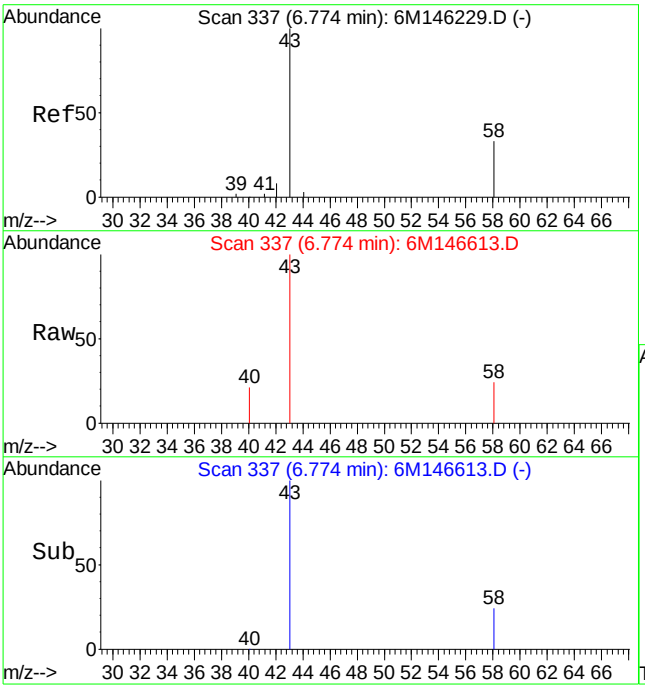


#3
Chloromethane
Concen: Below Cal
RT: 3.98 min Scan# 63
Delta R.T. -0.04 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 50 Resp: 113

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

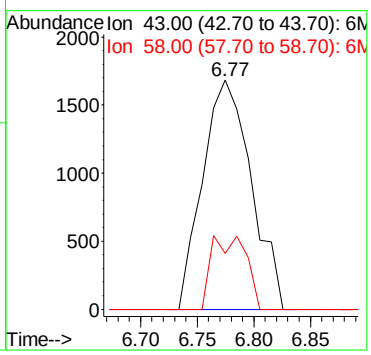


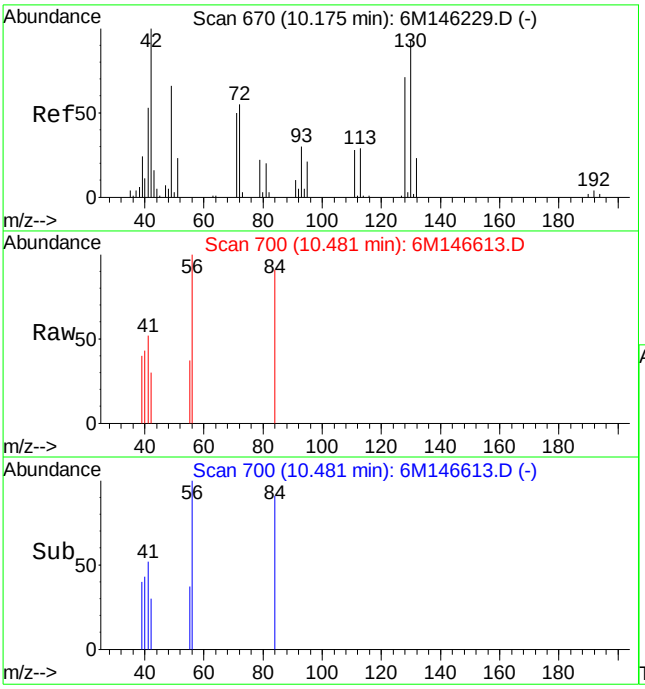


#13
Acetone
Concen: 4.62 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 43 Resp: 5019

Ion	Ratio	Lower	Upper
43	100		
58	22.8	16.4	38.2

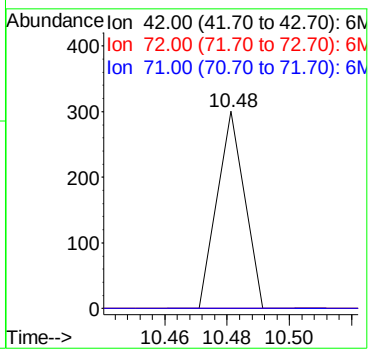


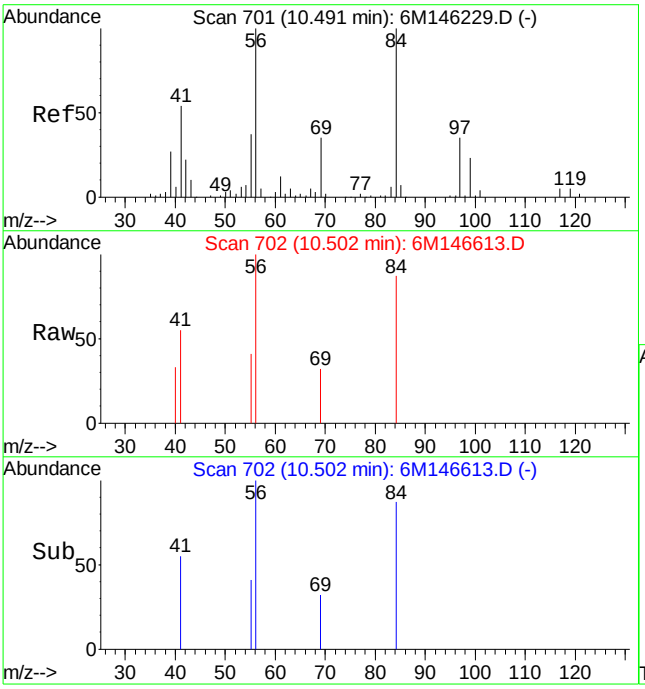


#36
Tetrahydrofuran
Concen: 0.20 ug/L
RT: 10.48 min Scan# 700
Delta R.T. 0.31 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 42 Resp: 184

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

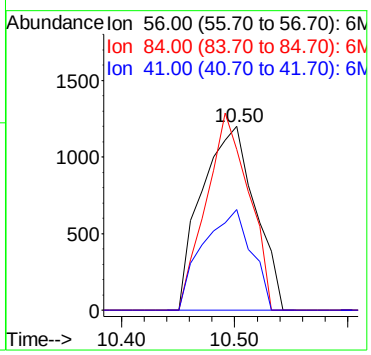


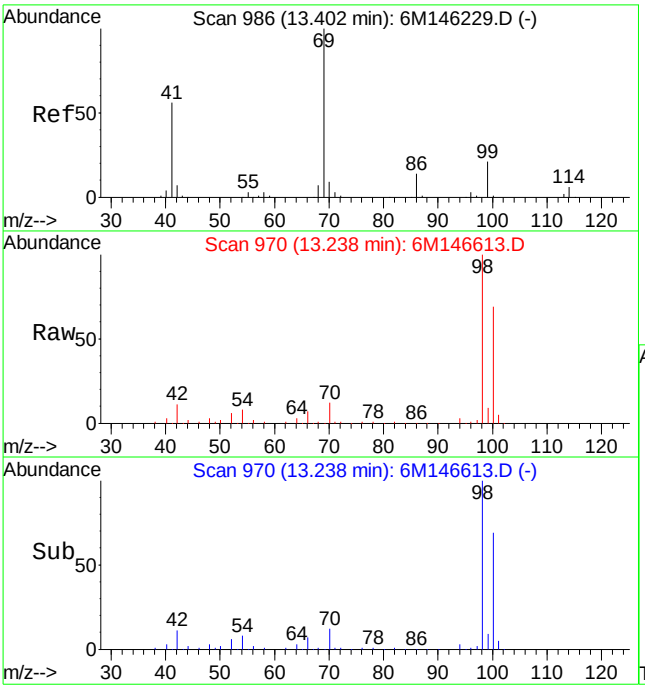


#39
Cyclohexane
Concen: 0.50 ug/L
RT: 10.50 min Scan# 702
Delta R.T. 0.01 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 56 Resp: 3950

Ion	Ratio	Lower	Upper
56	100		
84	85.2	43.6	101.6
41	49.4	37.1	86.5

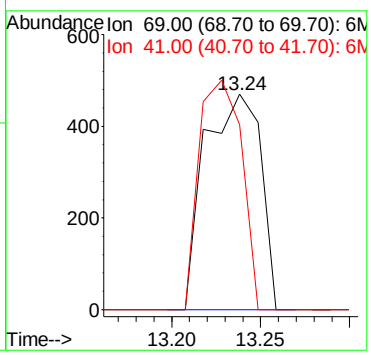




#60
Ethyl Methacrylate
Concen: 0.19 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146613.D
Acq: 21 Apr 2017 21:04

Tgt Ion: 69 Resp: 1015

Ion	Ratio	Lower	Upper
69	100		
41	82.1	51.4	120.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146612.D Vial: 15
Acq On : 21 Apr 2017 20:34 Operator: TMB
Sample : L17041069-26 A RS 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:34:01 2017 Quant Results File: 8260BWT.RES

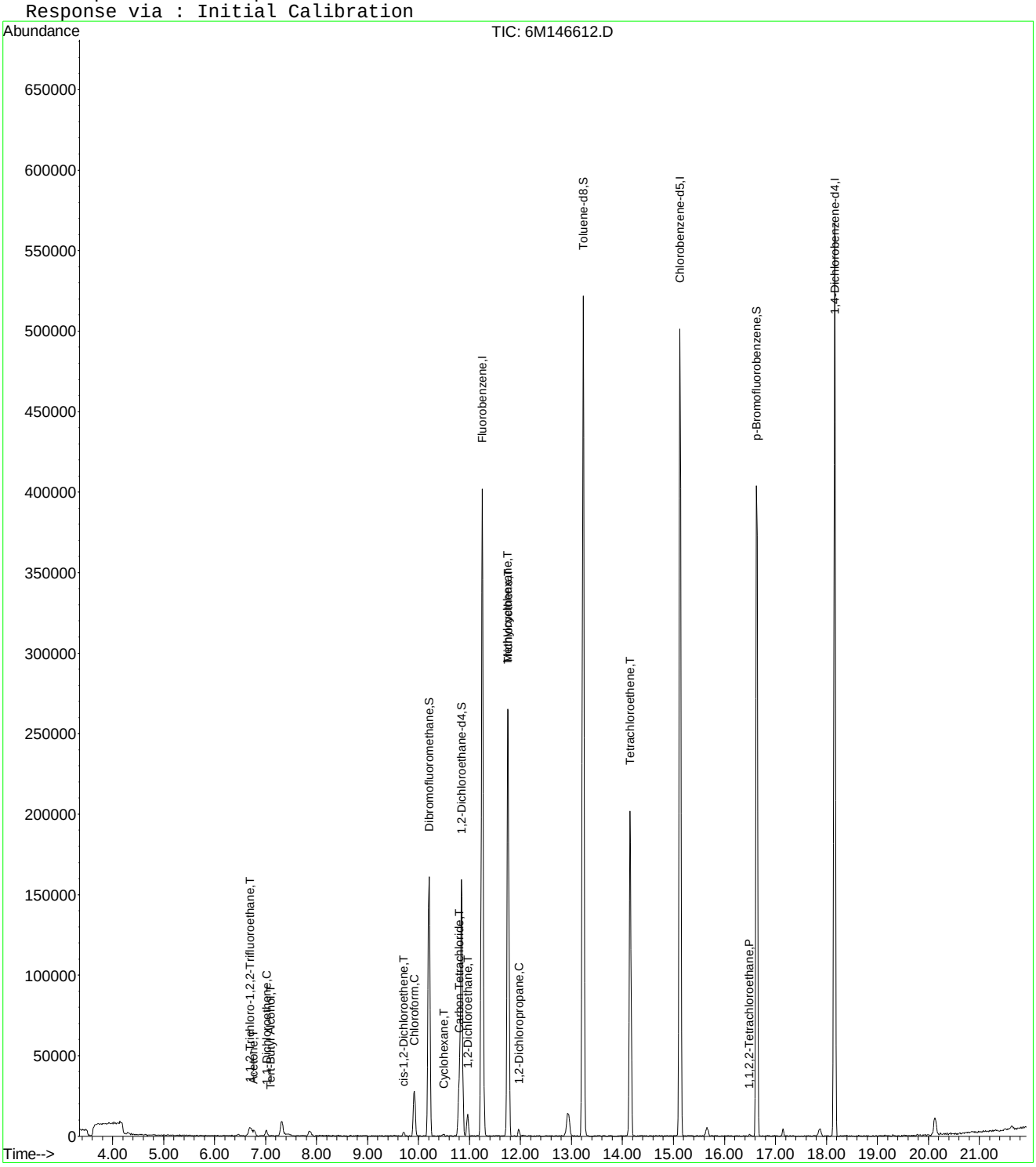
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

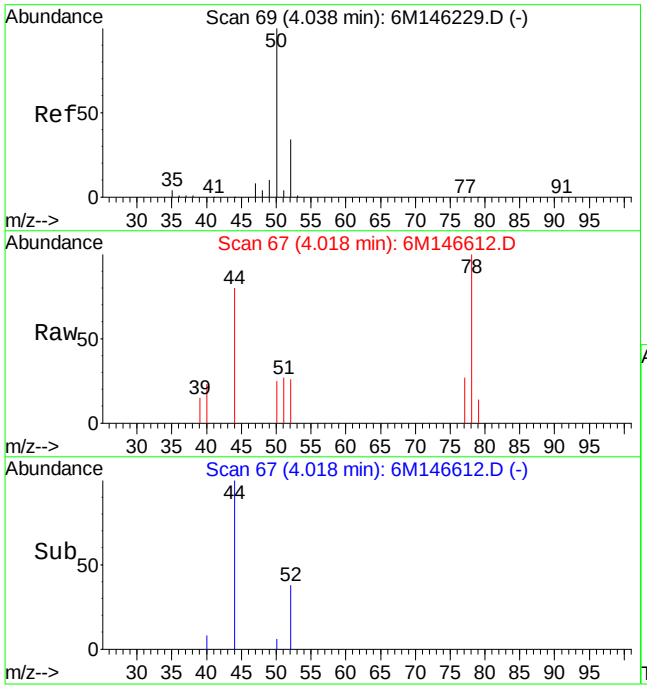
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	515638	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	370054	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	191196	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	137943	26.2060	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.84%			
43) 1,2-Dichloroethane-d4	10.84	65	140555	27.0929	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.36%			
58) Toluene-d8	13.23	98	487138	25.7977	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.20%			
80) p-Bromofluorobenzene	16.63	95	192543	26.5148	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.04%			
Target Compounds						Qvalue
3) Chloromethane	4.02	50	309	Below Cal	#	42
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	7222	1.3307	ug/L	95
13) Acetone	6.76	43	7500	6.7404	ug/L	92
14) 1,1-Dichloroethene	7.02	61	4390	0.5584	ug/L	89
15) Tert-Butyl Alcohol	7.10	59	225	0.6519	ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	1482	0.2383	ug/L	96
33) Chloroform	9.92	83	31279	2.9297	ug/L	94
39) Cyclohexane	10.49	56	983	0.1225	ug/L #	37
42) Carbon Tetrachloride	10.80	117	32762	4.7868	ug/L	99
45) 1,2-Dichloroethane	10.96	62	15193	2.2874	ug/L	82
47) Trichloroethene	11.76	130	120684	20.0966	ug/L	93
48) Methylcyclohexane	11.75	83	1304	0.1503	ug/L #	1
49) 1,2-Dichloropropane	11.97	63	2657	0.5103	ug/L	94
66) Tetrachloroethene	14.15	166	79468	14.1747	ug/L	96
79) 1,1,2,2-Tetrachloroethane	16.49	83	1189	0.2388	ug/L	74

(#) = qualifier out of range (m) = manual integration
6M146612.D 8260BWT.M Mon Apr 24 09:00:34 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146612.D Vial: 15
Acq On : 21 Apr 2017 20:34 Operator: TMB
Sample : L17041069-26 A RS 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

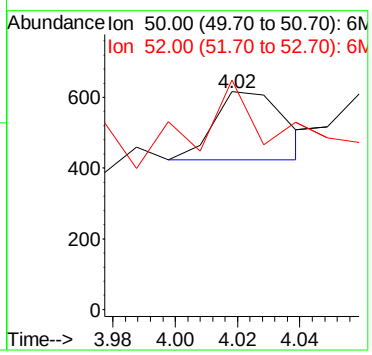


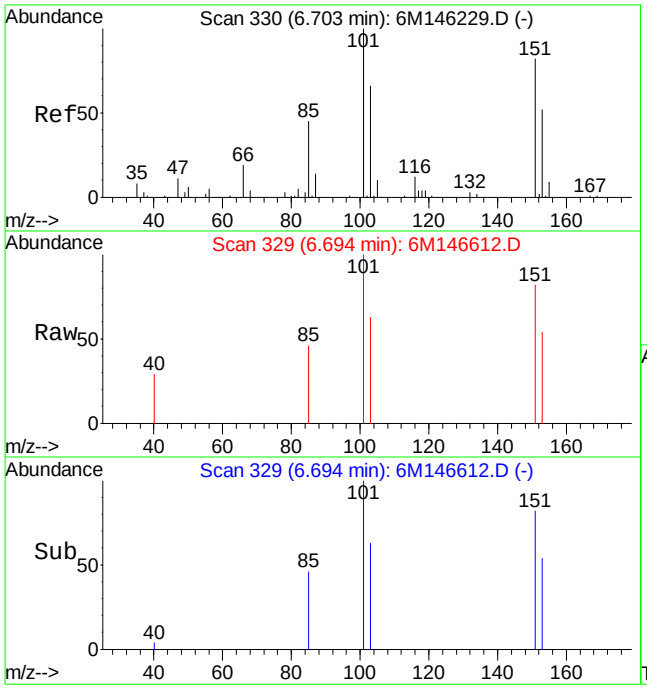


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. 0.00 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 50 Resp: 309

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

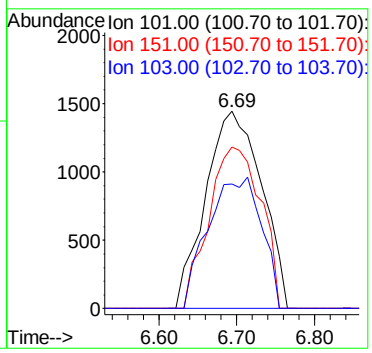


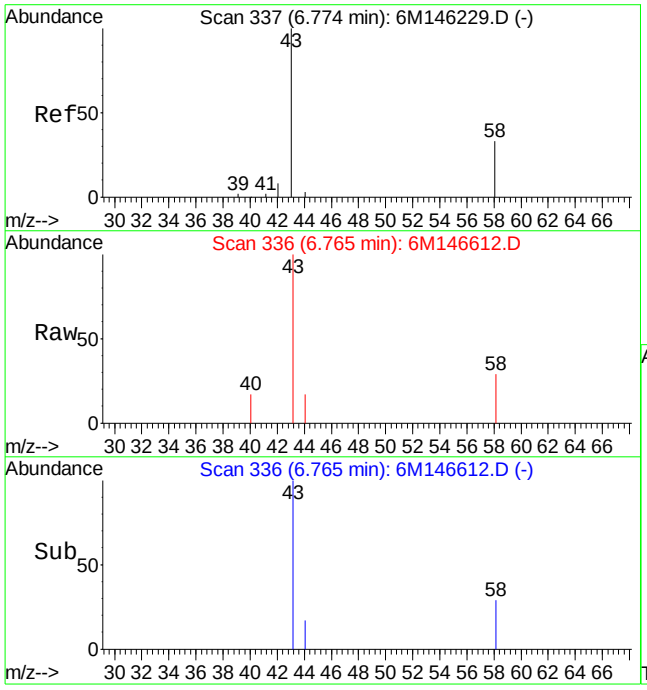


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.33 ug/L
RT: 6.69 min Scan# 329
Delta R.T. 0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion:101 Resp: 7222

Ion	Ratio	Lower	Upper
101	100		
151	75.9	49.4	115.2
103	63.5	38.8	90.4

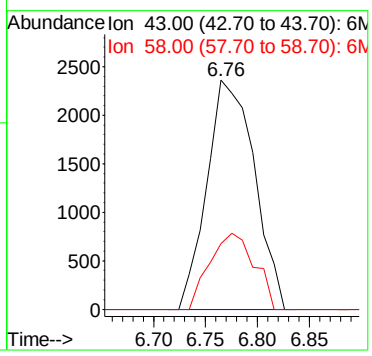


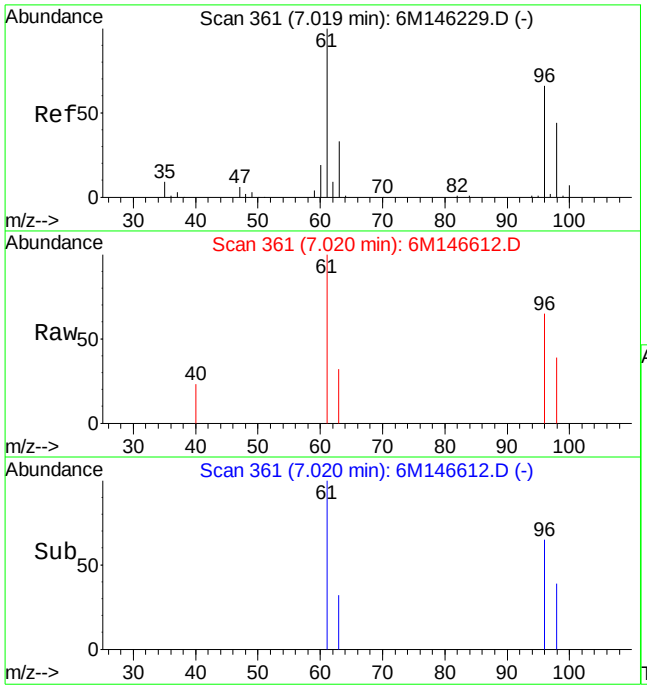


#13
Acetone
Concen: 6.74 ug/L
RT: 6.76 min Scan# 336
Delta R.T. -0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 43 Resp: 7500

Ion	Ratio	Lower	Upper
43	100		
58	31.3	16.4	38.2

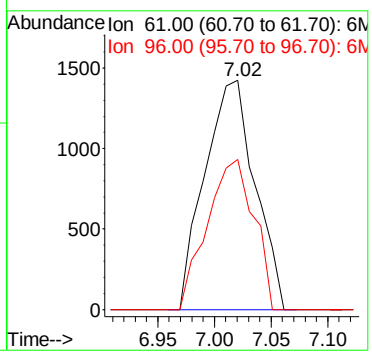


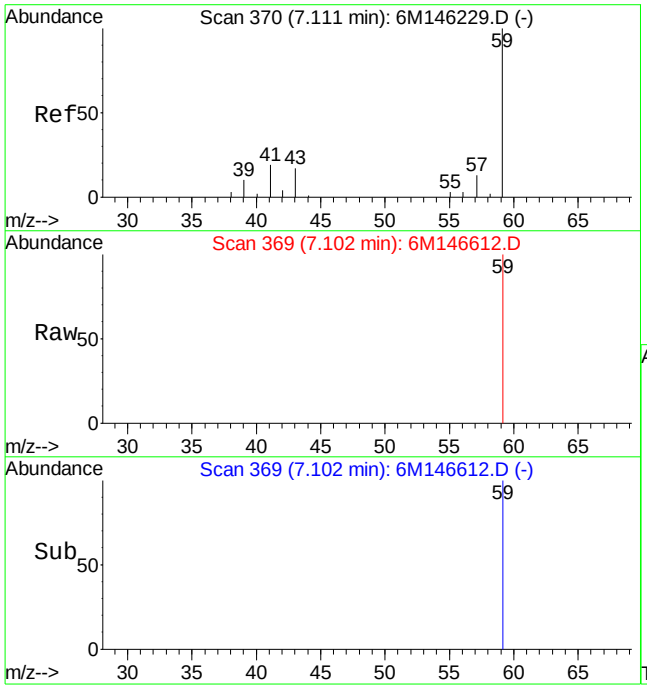


#14
1,1-Dichloroethene
Concen: 0.56 ug/L
RT: 7.02 min Scan# 361
Delta R.T. 0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 61 Resp: 4390

Ion	Ratio	Lower	Upper
61	100		
96	60.9	32.0	74.6

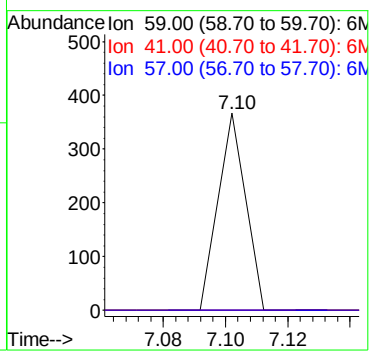


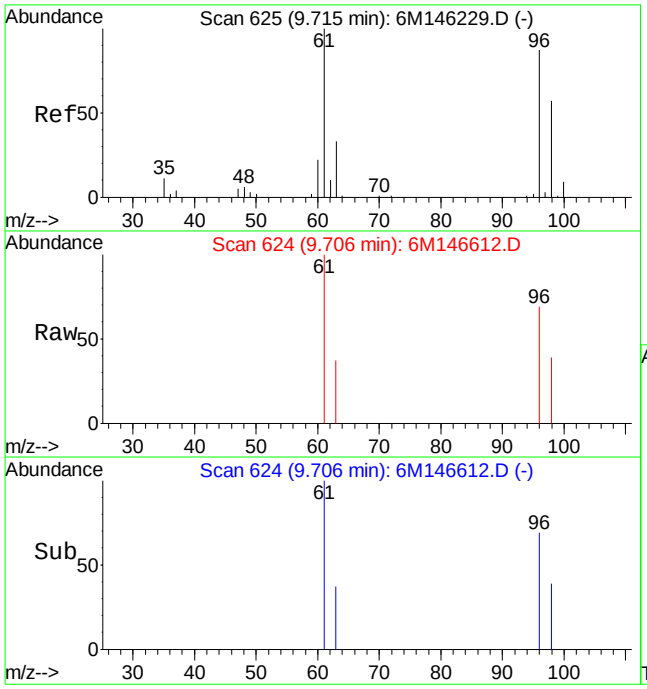


#15
Tert-Butyl Alcohol
Concen: 0.65 ug/L
RT: 7.10 min Scan# 369
Delta R.T. -0.02 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 59 Resp: 225

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

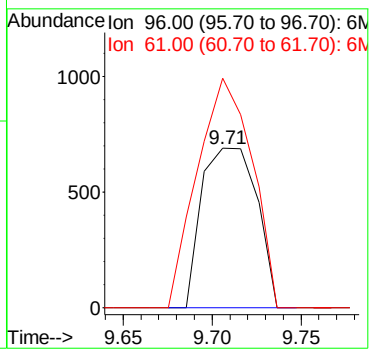


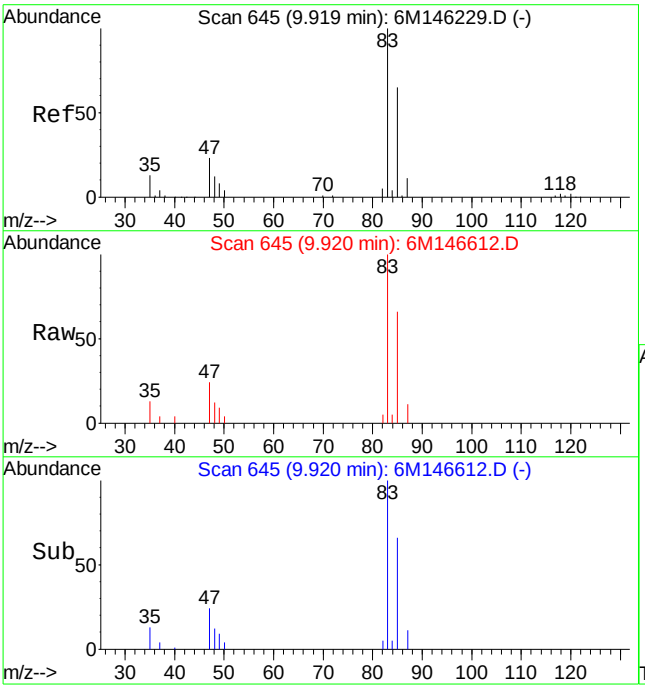


#32
cis-1,2-Dichloroethene
Concen: 0.24 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 96 Resp: 1482

Ion	Ratio	Lower	Upper
96	100		
61	143.2	89.2	208.2

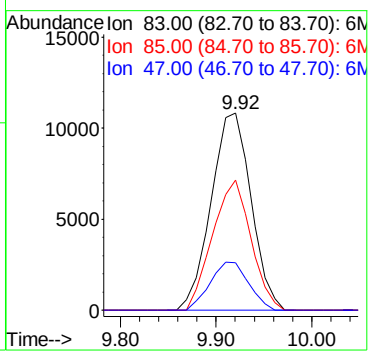


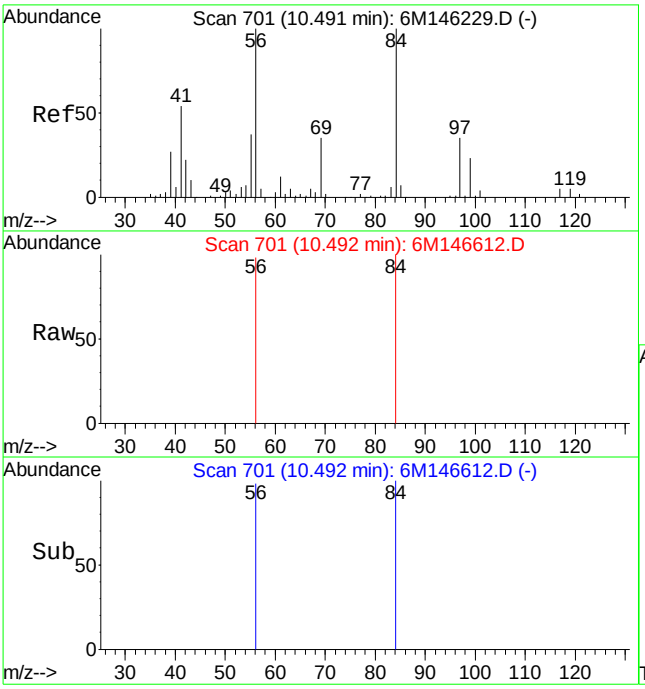


#33
Chloroform
Concen: 2.93 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 83 Resp: 31279

Ion	Ratio	Lower	Upper
83	100		
85	63.3	39.0	91.0
47	23.5	18.5	43.1

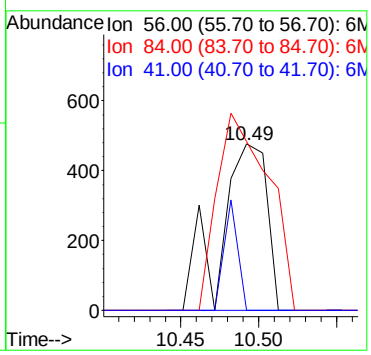


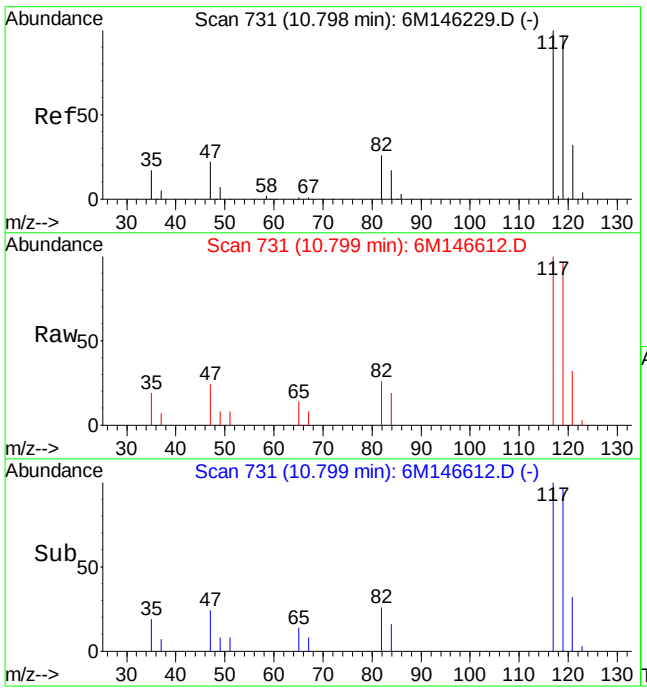


#39
Cyclohexane
Concen: 0.12 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 56 Resp: 983

Ion	Ratio	Lower	Upper
56	100		
84	131.9	43.6	101.6#
41	19.7	37.1	86.5#

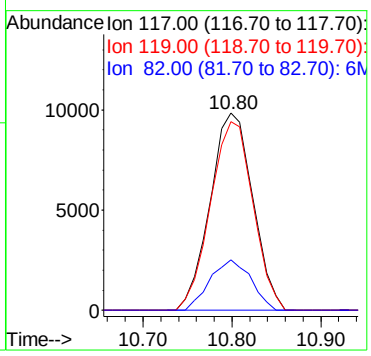


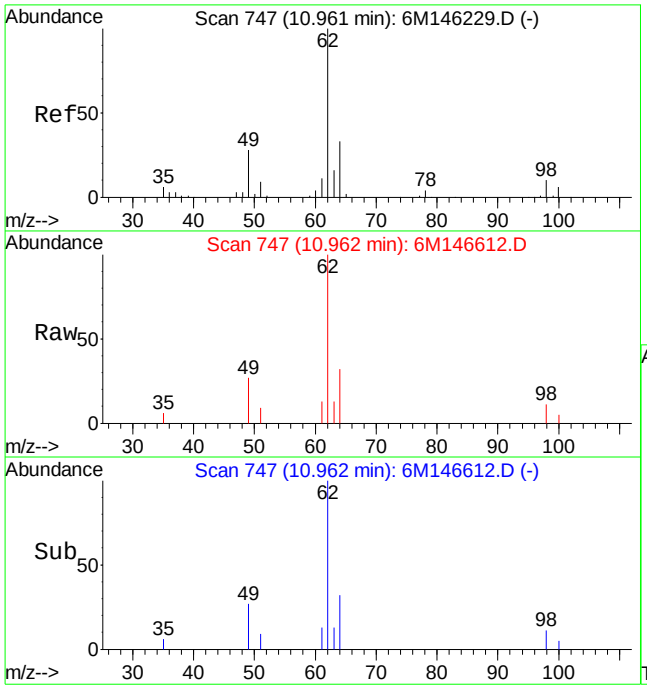


#42
Carbon Tetrachloride
Concen: 4.79 ug/L
RT: 10.80 min Scan# 731
Delta R.T. -0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion:117 Resp: 32762

Ion	Ratio	Lower	Upper
117	100		
119	95.4	57.8	134.8
82	24.6	15.1	35.3

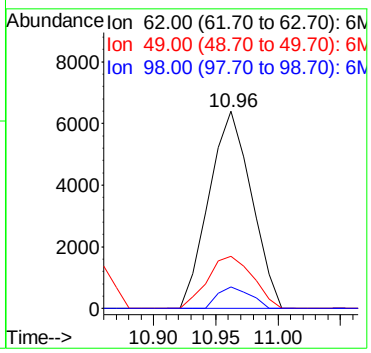


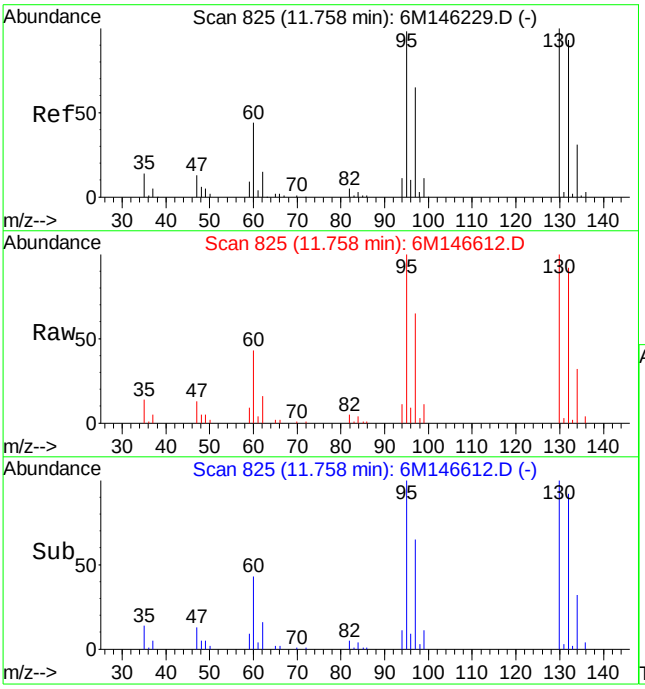


#45
1,2-Dichloroethane
Concen: 2.29 ug/L
RT: 10.96 min Scan# 747
Delta R.T. -0.00 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 62 Resp: 15193

Ion	Ratio	Lower	Upper
62	100		
49	28.3	25.1	58.5
98	8.3	5.2	12.0

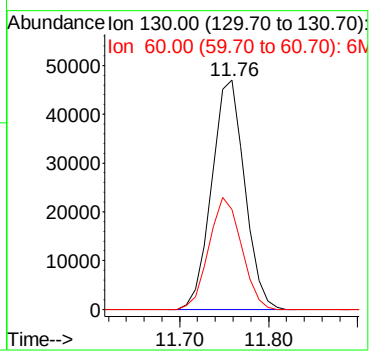


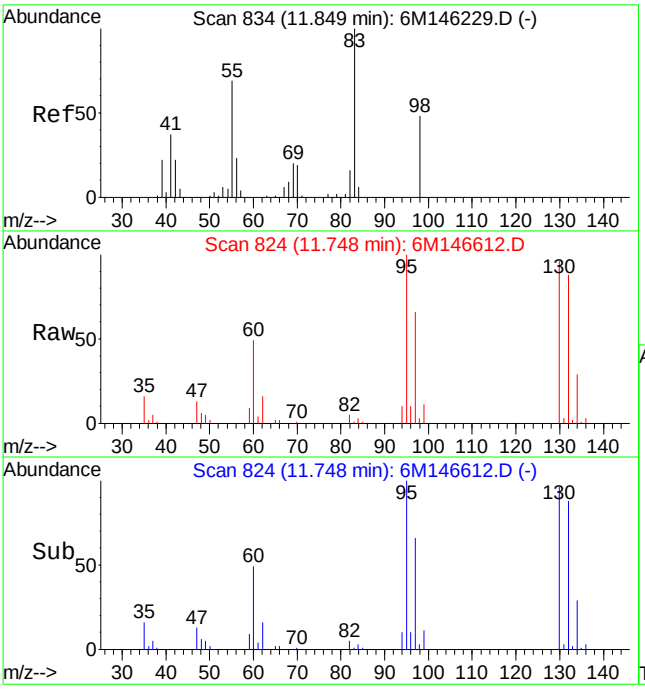


#47
Trichloroethene
Concen: 20.10 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion:130 Resp: 120684

Ion	Ratio	Lower	Upper
130	100		
60	48.1	32.0	74.6

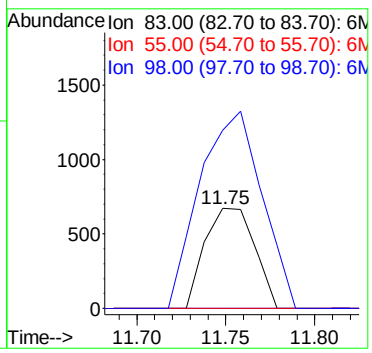


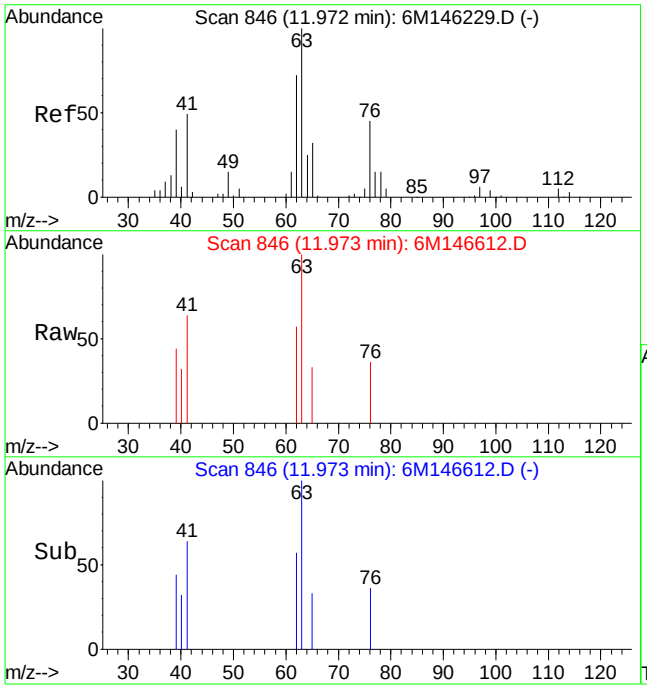


#48
Methylcyclohexane
Concen: 0.15 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.10 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 83 Resp: 1304

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	246.2	28.4	66.4#

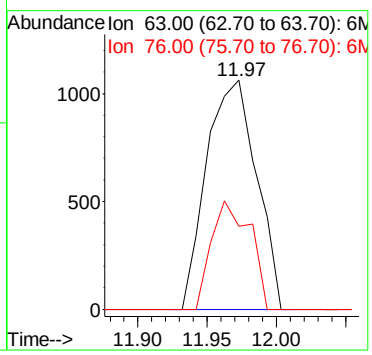


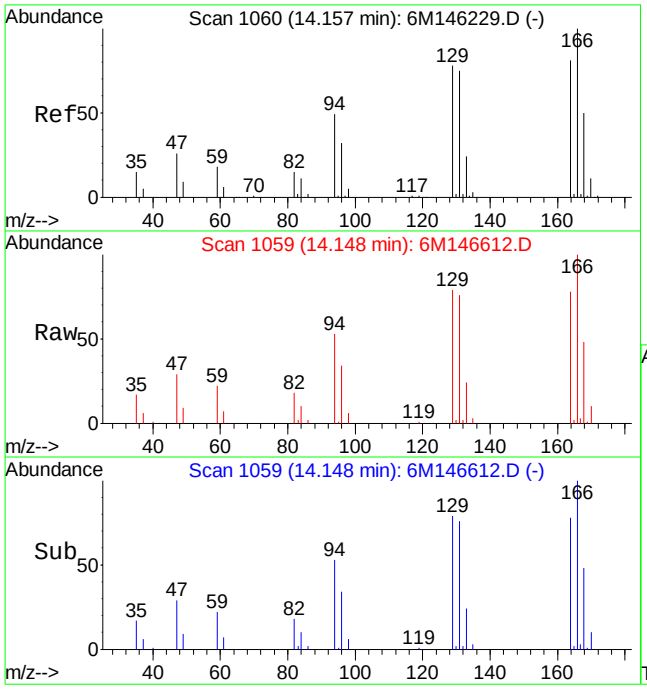


#49
1,2-Dichloropropane
Concen: 0.51 ug/L
RT: 11.97 min Scan# 846
Delta R.T. -0.00 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 63 Resp: 2657

Ion	Ratio	Lower	Upper
63	100		
76	36.7	24.2	56.4

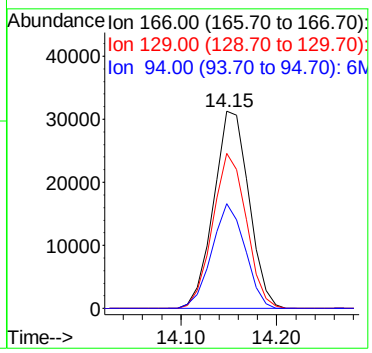


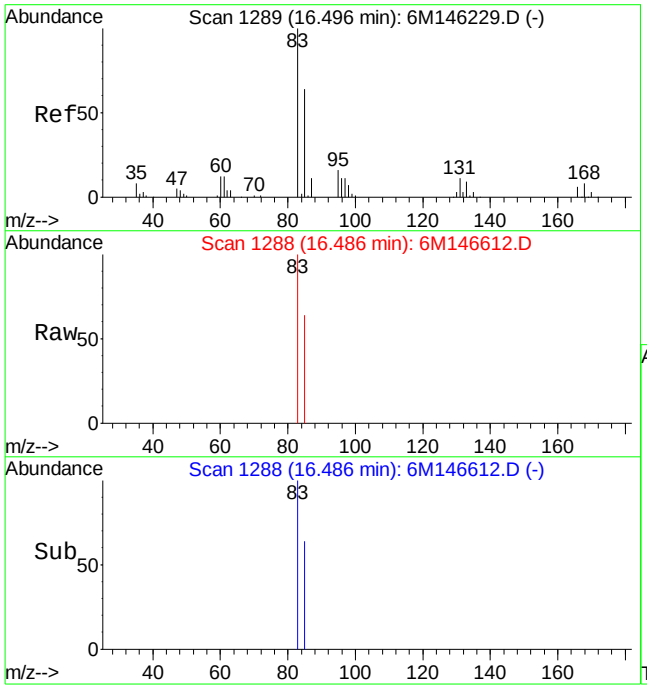


#66
Tetrachloroethene
Concen: 14.17 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion:166 Resp: 79468

Ion	Ratio	Lower	Upper
166	100		
129	75.2	43.5	101.5
94	50.1	27.8	64.8

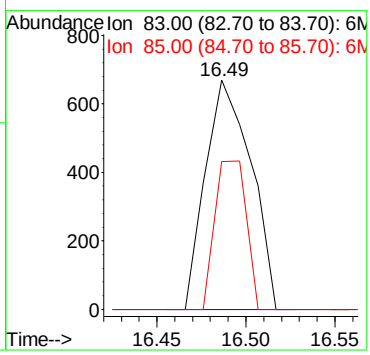




#79
1,1,2,2-Tetrachloroethane
Concen: 0.24 ug/L
RT: 16.49 min Scan# 1288
Delta R.T. -0.01 min
Lab File: 6M146612.D
Acq: 21 Apr 2017 20:34

Tgt Ion: 83 Resp: 1189

Ion	Ratio	Lower	Upper
83	100		
85	44.7	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146608.D Vial: 11
Acq On : 21 Apr 2017 18:31 Operator: TMB
Sample : L17041069-27 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	540545	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	393686	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	205938	25.00	ug/L		-0.01
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	144376	26.1643	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.64%				
43) 1,2-Dichloroethane-d4	10.84	65	145569	26.7665	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.08%				
58) Toluene-d8	13.23	98	511022	25.4380	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.76%				
80) p-Bromofluorobenzene	16.63	95	203033	25.9579	ug/L		-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.84%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	187226	21.8153	ug/L		94
3) Chloromethane	4.04	50	212648	20.8110	ug/L		99
4) Vinyl Chloride	4.27	62	199880	20.3830	ug/L		99
5) 1,3-Butadiene	4.31	54	120279	31.8695	ug/L		89
6) Bromomethane	5.23	94	51471	12.1567	ug/L		100
7) Chloroethane	5.40	64	90745	21.5076	ug/L		87
8) Trichlorofluoromethane	5.90	101	195387	19.4403	ug/L		99
9) Diethyl ether	6.44	59	431108	102.9264	ug/L		85
10) Isoprene	6.48	67	165047	19.9649	ug/L		83
11) Acrolein	6.67	56	72310	157.5792	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	123076	21.6327	ug/L		97
13) Acetone	6.77	43	34889	29.9105	ug/L		92
14) 1,1-Dichloroethene	7.01	61	162867	19.7634	ug/L		87
15) Tert-Butyl Alcohol	7.11	59	46204	127.7016	ug/L		92
16) Dimethyl Sulfide	7.27	62	127265	21.6121	ug/L		81
17) Iodomethane	7.54	142	104736	22.2267	ug/L		99
18) Methyl acetate	7.53	43	49262	16.8392	ug/L	#	83
19) Methylene Chloride	7.80	84	118636	19.0418	ug/L		64
20) Carbon Disulfide	7.86	76	293141	16.5284	ug/L		99
21) Acrylonitrile	7.97	53	30357	22.4591	ug/L		100
22) Methyl Tert Butyl Ether	8.01	73	280051	20.4980	ug/L		92
23) trans-1,2-Dichloroethene	8.24	96	112097	18.9003	ug/L		82
24) n-Hexane	8.33	57	145203	21.6499	ug/L		85
25) Diisopropyl ether	8.66	45	1704528	111.6386	ug/L	#	92
26) Vinyl Acetate	8.83	43	119868	28.2827	ug/L	#	90
27) 1,1-Dichloroethane	8.87	63	193920	19.7383	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1556103	100.5871	ug/L		92
29) 2-Butanone	9.41	43	31475	21.4097	ug/L	#	81
30) Propionitrile	9.52	54	53494	111.5742	ug/L		99
31) 2,2-Dichloropropane	9.64	77	86209	11.5339	ug/L		80
32) cis-1,2-Dichloroethene	9.70	96	124463	19.0881	ug/L		89
33) Chloroform	9.92	83	231232	20.6601	ug/L		95
34) 1-Bromopropane	10.05	122	28493	24.6414	ug/L		99
35) Bromochloromethane	10.15	130	67856	19.7693	ug/L		99
36) Tetrahydrofuran	10.17	42	105590	109.0665	ug/L	#	75
38) 1,1,1-Trichloroethane	10.45	97	178346	19.5999	ug/L		92
39) Cyclohexane	10.49	56	154291	18.3368	ug/L		80
40) 1,1-Dichloropropene	10.64	75	148864	19.3535	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	1511541	102.9065	ug/L		94
42) Carbon Tetrachloride	10.80	117	174355	24.3010	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146608.D 8260BWT.M Sat Apr 22 13:33:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146608.D Vial: 11
Acq On : 21 Apr 2017 18:31 Operator: TMB
Sample : L17041069-27 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

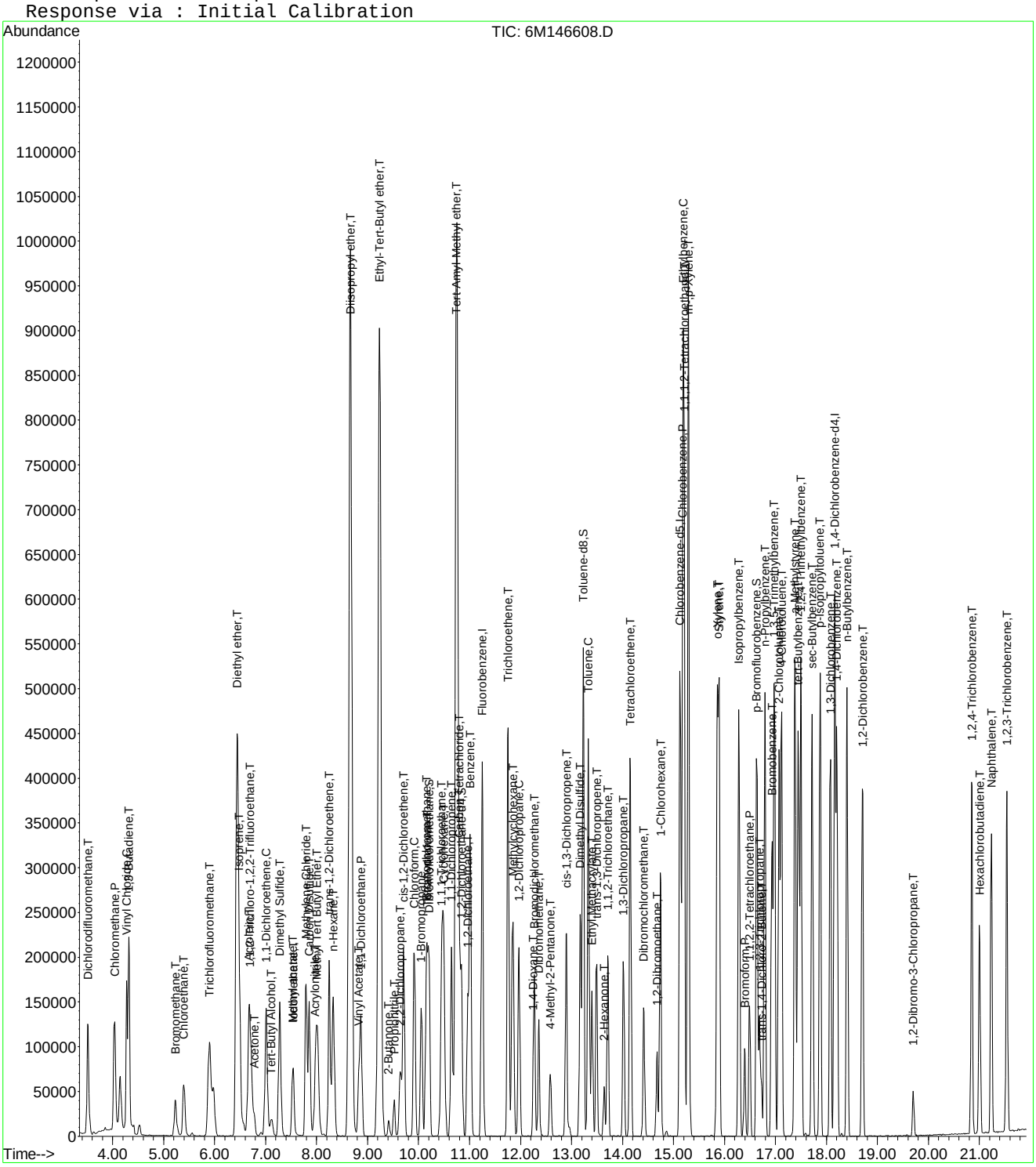
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	154061	22.1266	ug/L		89
46)	Benzene	11.01	78	439212	18.9907	ug/L		88
47)	Trichloroethene	11.76	130	207040	32.8883	ug/L		90
48)	Methylcyclohexane	11.85	83	170301	18.7241	ug/L		83
49)	1,2-Dichloropropane	11.97	63	111404	20.4104	ug/L		92
50)	1,4-Dioxane	12.25	88	9250	233.0716	ug/L		89
51)	Bromodichloromethane	12.27	83	151111	19.6118	ug/L		99
52)	Dibromomethane	12.36	93	64351	20.0180	ug/L		97
54)	4-Methyl-2-Pentanone	12.58	58	28878	20.5623	ug/L		85
55)	cis-1,3-Dichloropropene	12.90	75	174889	20.6114	ug/L		95
56)	Dimethyl Disulfide	13.17	79	104829	19.5832	ug/L		91
59)	Toluene	13.33	91	448832	18.2353	ug/L		100
60)	Ethyl Methacrylate	13.40	69	124656	20.9286	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	136893	18.0376	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	87662	18.8992	ug/L		99
64)	2-Hexanone	13.64	43	47465	21.3102	ug/L		87
65)	1,3-Dichloropropane	14.01	76	154229	19.8086	ug/L		72
66)	Tetrachloroethene	14.16	166	166764	27.9601	ug/L		94
67)	Dibromochloromethane	14.41	129	105039	18.3190	ug/L		100
68)	1,2-Dibromoethane	14.68	107	81708	18.3455	ug/L		99
69)	1-Chlorohexane	14.75	91	153221	19.2774	ug/L		81
70)	Chlorobenzene	15.18	112	300505	17.8383	ug/L		97
71)	1,1,1,2-Tetrachloroethane	15.21	131	108633	18.0069	ug/L		94
72)	Ethylbenzene	15.20	106	163726	17.9531	ug/L		98
73)	m-,p-Xylene	15.29	106	387959	35.5910	ug/L		96
74)	o-Xylene	15.86	106	190171	18.0790	ug/L		97
75)	Styrene	15.89	104	330209	18.6996	ug/L		97
76)	Bromoform	16.40	173	62238	17.8118	ug/L		99
77)	Isopropylbenzene	16.28	105	471534	17.9132	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	104607	19.5034	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	30400	19.1933	ug/L		75
82)	trans-1,4-Dichloro-2-Buten	16.73	53	14647	12.8604	ug/L	#	1
83)	n-Propylbenzene	16.79	91	569737	18.2722	ug/L		99
84)	Bromobenzene	16.93	156	126018	17.9904	ug/L		78
85)	1,3,5-Trimethylbenzene	16.98	105	406977	18.4175	ug/L		99
86)	2-Chlorotoluene	17.07	91	343162	16.5289	ug/L		92
87)	4-Chlorotoluene	17.12	91	376724	20.5307	ug/L		92
88)	a-Methylstyrene	17.38	118	226344	18.5230	ug/L		99
89)	tert-Butylbenzene	17.45	134	85184	18.3976	ug/L		76
90)	1,2,4-Trimethylbenzene	17.50	105	428808	18.8954	ug/L		88
91)	sec-Butylbenzene	17.72	105	497756	18.2662	ug/L		97
92)	p-Isopropyltoluene	17.87	119	426091	18.5884	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	236649	17.8893	ug/L		98
94)	1,4-Dichlorobenzene	18.20	146	240065	17.9454	ug/L		96
95)	n-Butylbenzene	18.41	91	400654	19.1412	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	221683	17.8785	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	17270	17.7765	ug/L		98
98)	1,2,4-Trichlorobenzene	20.86	180	166933	18.4001	ug/L		100
99)	Hexachlorobutadiene	21.01	225	61520	17.7539	ug/L		99
100)	Naphthalene	21.23	128	348838	19.2028	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	155514	17.7561	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146608.D 8260BWT.M Sat Apr 22 13:33:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146608.D Vial: 11
Acq On : 21 Apr 2017 18:31 Operator: TMB
Sample : L17041069-27 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



6M146608.D 8260BWT.M Sat Apr 22 13:33:47 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146609.D Vial: 12
Acq On : 21 Apr 2017 19:02 Operator: TMB
Sample : L17041069-28 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:48 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	559844	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	400527	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	209360	25.00	ug/L		-0.01
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	150234	26.2874	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.16%				
43) 1,2-Dichloroethane-d4	10.84	65	150512	26.7213	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.88%				
58) Toluene-d8	13.23	98	528442	25.8559	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.44%				
80) p-Bromofluorobenzene	16.63	95	209057	26.2912	ug/L		-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.16%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	187516	21.0959	ug/L		94
3) Chloromethane	4.04	50	215672	20.3629	ug/L		99
4) Vinyl Chloride	4.27	62	170471	16.7847	ug/L		99
5) 1,3-Butadiene	4.32	54	108064	27.3341	ug/L		92
6) Bromomethane	5.22	94	54295	12.3816	ug/L		96
7) Chloroethane	5.40	64	92184	21.0955	ug/L		86
8) Trichlorofluoromethane	5.90	101	204676	19.6625	ug/L		99
9) Diethyl ether	6.44	59	444279	102.4145	ug/L		85
10) Isoprene	6.48	67	169821	19.8343	ug/L		82
11) Acrolein	6.67	56	73528	154.7099	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	127591	21.6532	ug/L		98
13) Acetone	6.77	43	37239	30.8246	ug/L		91
14) 1,1-Dichloroethene	7.01	61	169639	19.8755	ug/L		88
15) Tert-Butyl Alcohol	7.11	59	69906	186.5503	ug/L		93
16) Dimethyl Sulfide	7.28	62	134621	22.0732	ug/L		79
17) Iodomethane	7.54	142	105801	21.6981	ug/L		100
18) Methyl acetate	7.53	43	55324	18.2595	ug/L	#	84
19) Methylene Chloride	7.80	84	124489	19.2925	ug/L		62
20) Carbon Disulfide	7.86	76	303626	16.5294	ug/L		99
21) Acrylonitrile	7.97	53	30629	21.8792	ug/L		98
22) Methyl Tert Butyl Ether	8.01	73	298962	21.1279	ug/L		92
23) trans-1,2-Dichloroethene	8.25	96	116676	18.9942	ug/L		81
24) n-Hexane	8.33	57	149307	21.4944	ug/L		86
25) Diisopropyl ether	8.66	45	1749157	110.6124	ug/L	#	92
26) Vinyl Acetate	8.83	43	151698	34.5590	ug/L	#	90
27) 1,1-Dichloroethane	8.87	63	206192	20.2639	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1645275	102.6851	ug/L		92
29) 2-Butanone	9.42	43	33375	21.9195	ug/L	#	82
30) Propionitrile	9.52	54	55462	111.6912	ug/L		99
31) 2,2-Dichloropropane	9.64	77	124097	16.0306	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	133412	19.7553	ug/L		89
33) Chloroform	9.92	83	243710	21.0243	ug/L		95
34) 1-Bromopropane	10.05	122	30546	25.5063	ug/L		100
35) Bromochloromethane	10.15	130	72650	20.4364	ug/L		100
36) Tetrahydrofuran	10.18	42	108291	108.0005	ug/L	#	76
38) 1,1,1-Trichloroethane	10.45	97	186525	19.7922	ug/L		91
39) Cyclohexane	10.49	56	161566	18.5395	ug/L		81
40) 1,1-Dichloropropene	10.64	75	155495	19.5187	ug/L		83
41) Tert-Amyl-Methyl ether	10.75	73	1607080	105.6392	ug/L		94
42) Carbon Tetrachloride	10.80	117	182098	24.5053	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146609.D 8260BWT.M Sat Apr 22 13:33:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146609.D Vial: 12
Acq On : 21 Apr 2017 19:02 Operator: TMB
Sample : L17041069-28 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:48 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

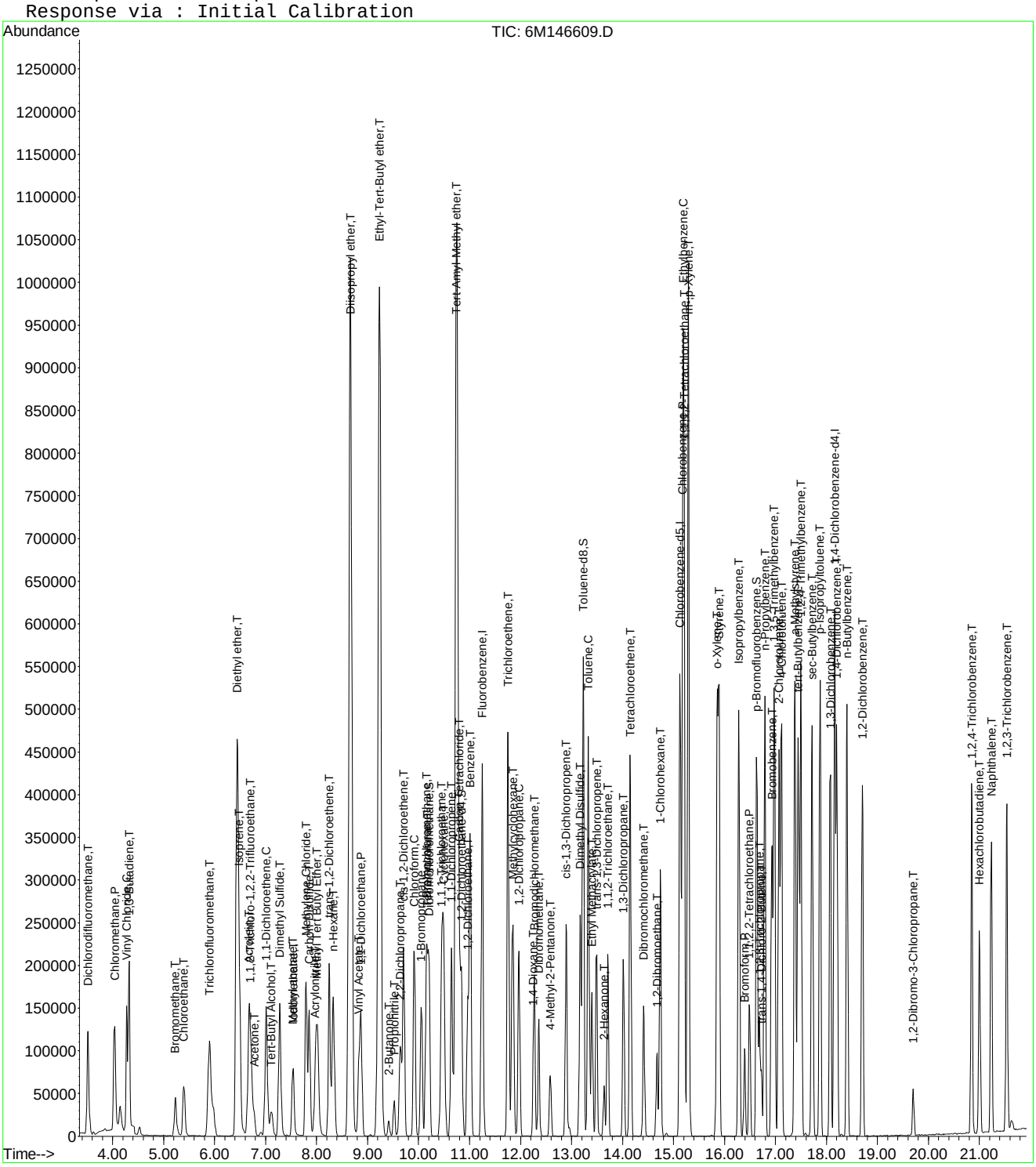
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	160366	22.2381	ug/L		89
46)	Benzene	11.01	78	459668	19.1900	ug/L		88
47)	Trichloroethene	11.76	130	215839	33.1041	ug/L		91
48)	Methylcyclohexane	11.85	83	175793	18.6617	ug/L		84
49)	1,2-Dichloropropane	11.97	63	116824	20.6656	ug/L		94
50)	1,4-Dioxane	12.25	88	10050	244.4998	ug/L		84
51)	Bromodichloromethane	12.27	83	160256	20.0817	ug/L		99
52)	Dibromomethane	12.36	93	67898	20.3933	ug/L		100
54)	4-Methyl-2-Pentanone	12.59	58	30169	20.7410	ug/L		82
55)	cis-1,3-Dichloropropene	12.89	75	188212	21.4170	ug/L		95
56)	Dimethyl Disulfide	13.17	79	109064	19.6720	ug/L		91
59)	Toluene	13.33	91	469350	18.7432	ug/L		99
60)	Ethyl Methacrylate	13.40	69	131197	21.6506	ug/L		72
62)	trans-1,3-Dichloropropene	13.49	75	151720	19.6498	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	92275	19.5539	ug/L		100
64)	2-Hexanone	13.64	43	50094	22.1064	ug/L		86
65)	1,3-Dichloropropane	14.01	76	162220	20.4790	ug/L		73
66)	Tetrachloroethene	14.16	166	174525	28.7615	ug/L		94
67)	Dibromochloromethane	14.41	129	109721	18.8087	ug/L		100
68)	1,2-Dibromoethane	14.68	107	86280	19.0412	ug/L		100
69)	1-Chlorohexane	14.74	91	160927	19.9011	ug/L		79
70)	Chlorobenzene	15.18	112	310307	18.1055	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.21	131	112398	18.3128	ug/L		98
72)	Ethylbenzene	15.20	106	167957	18.1025	ug/L		100
73)	m-,p-Xylene	15.29	106	407597	36.7539	ug/L		96
74)	o-Xylene	15.85	106	200730	18.7569	ug/L		96
75)	Styrene	15.89	104	344158	19.1567	ug/L		97
76)	Bromoform	16.39	173	64957	18.2725	ug/L		99
77)	Isopropylbenzene	16.28	105	495533	18.5034	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	112138	20.5658	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	32403	20.1235	ug/L		72
82)	trans-1,4-Dichloro-2-Buten	16.72	53	18762	16.2042	ug/L	#	1
83)	n-Propylbenzene	16.79	91	589531	18.5980	ug/L		99
84)	Bromobenzene	16.94	156	131877	18.5191	ug/L		79
85)	1,3,5-Trimethylbenzene	16.98	105	419430	18.6709	ug/L		99
86)	2-Chlorotoluene	17.07	91	361531	17.1290	ug/L		99
87)	4-Chlorotoluene	17.12	91	385084	20.6433	ug/L		98
88)	a-Methylstyrene	17.38	118	231236	18.6140	ug/L		100
89)	tert-Butylbenzene	17.45	134	87374	18.5622	ug/L		76
90)	1,2,4-Trimethylbenzene	17.50	105	440104	19.0761	ug/L		88
91)	sec-Butylbenzene	17.72	105	515123	18.5945	ug/L		97
92)	p-Isopropyltoluene	17.87	119	437226	18.7624	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	242496	18.0316	ug/L		97
94)	1,4-Dichlorobenzene	18.20	146	247547	18.2023	ug/L		96
95)	n-Butylbenzene	18.41	91	412451	19.3828	ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	229829	18.2325	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	19128	19.3672	ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	171567	18.6018	ug/L		99
99)	Hexachlorobutadiene	21.00	225	63781	18.1056	ug/L		100
100)	Naphthalene	21.23	128	357046	19.3334	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	161276	18.1130	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146609.D 8260BWT.M Sat Apr 22 13:33:50 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146609.D Vial: 12
Acq On : 21 Apr 2017 19:02 Operator: TMB
Sample : L17041069-28 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17660.D Vial: 12
Acq On : 21 Apr 2017 21:27 Operator: JDS
Sample : L17041069-29 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:00 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

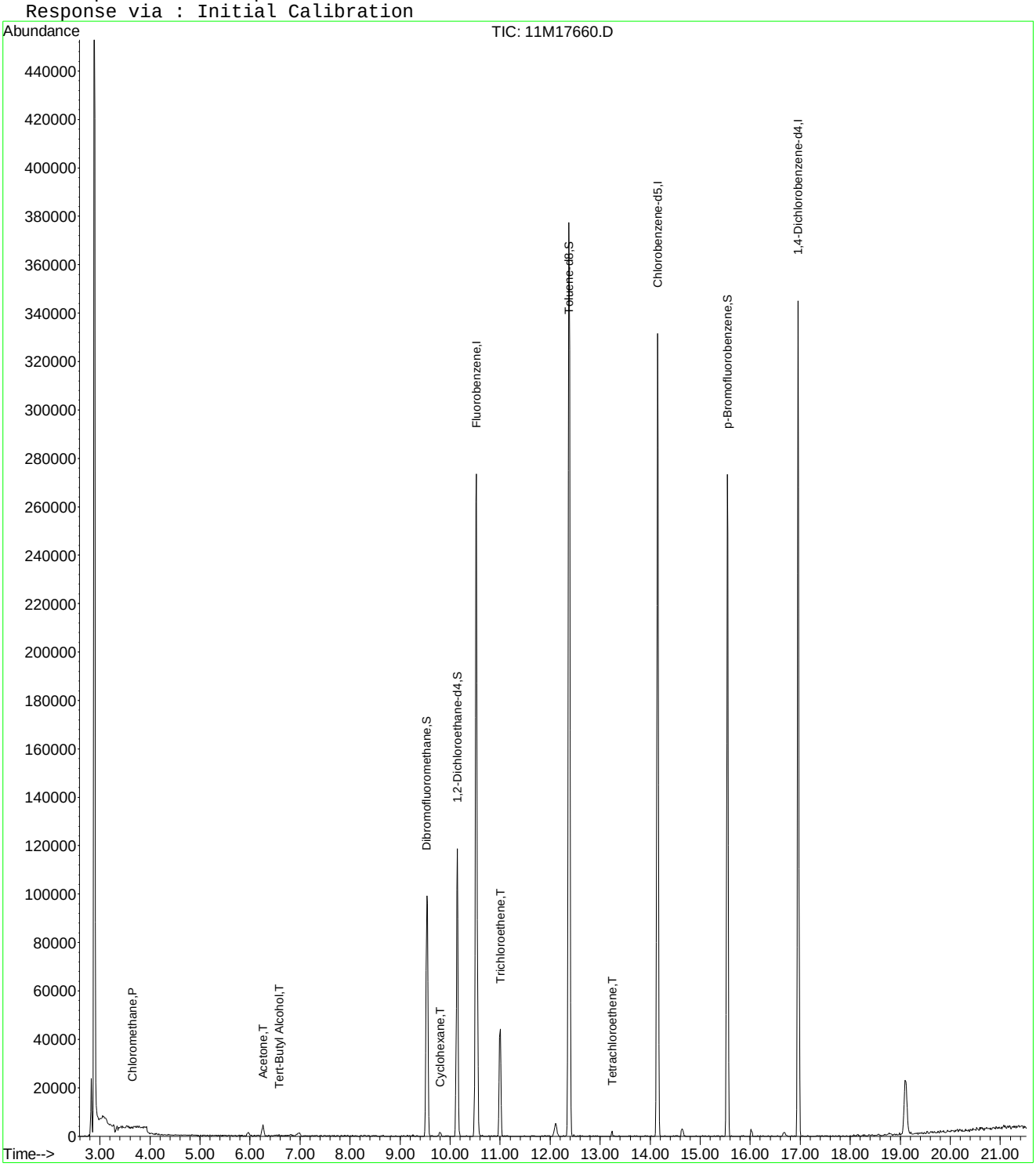
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	330140	25.00 ug/L	0.01
56) Chlorobenzene-d5	14.14	117	232529	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	115608	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	81805	23.8808 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.52%		
43) 1,2-Dichloroethane-d4	10.14	65	97574	25.1467 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.60%		
57) Toluene-d8	12.38	98	325457	25.7103 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.84%		
78) p-Bromofluorobenzene	15.54	95	116705	27.1616 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.64%		
Target Compounds					Qvalue
3) Chloromethane	3.65	50	1047	0.1915 ug/L #	53
13) Acetone	6.26	43	8286	7.3544 ug/L	99
15) Tert-Butyl Alcohol	6.59	59	438	1.0863 ug/L #	62
39) Cyclohexane	9.80	56	2521	0.3156 ug/L #	66
46) Trichloroethene	11.00	130	19907	4.8164 ug/L	97
64) Tetrachloroethene	13.25	164	830	0.2352 ug/L	71

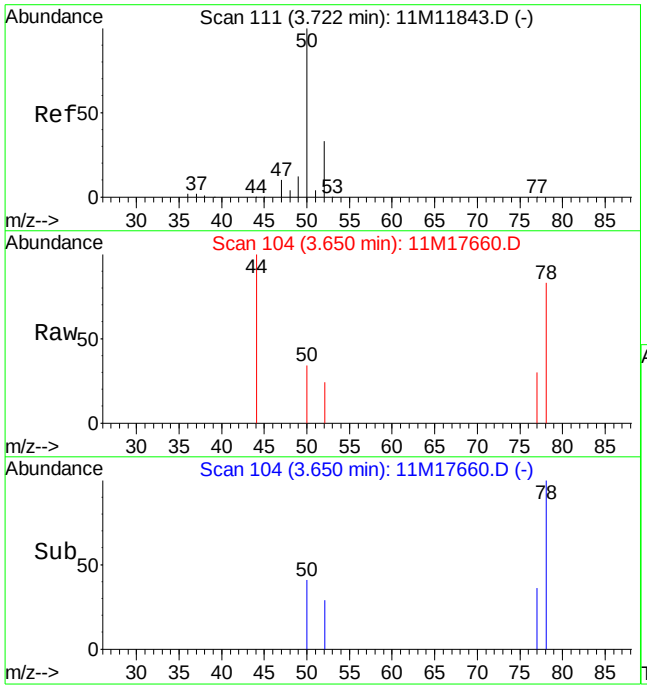
(#) = qualifier out of range (m) = manual integration
11M17660.D 8260WTR.M Tue Apr 25 13:52:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17660.D Vial: 12
Acq On : 21 Apr 2017 21:27 Operator: JDS
Sample : L17041069-29 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

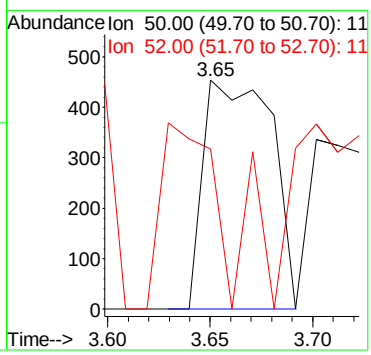


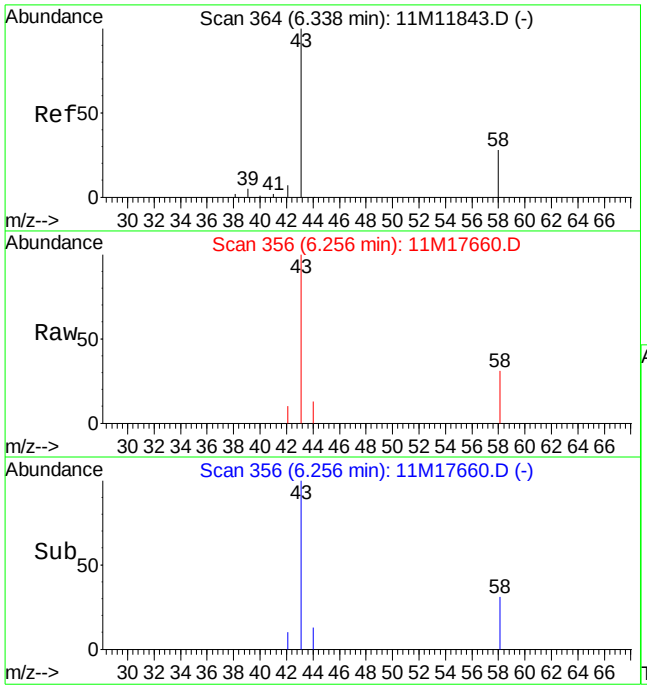


#3
Chloromethane
Concen: 0.19 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion: 50 Resp: 1047

Ion	Ratio	Lower	Upper
50	100		
52	60.6	20.3	47.3#

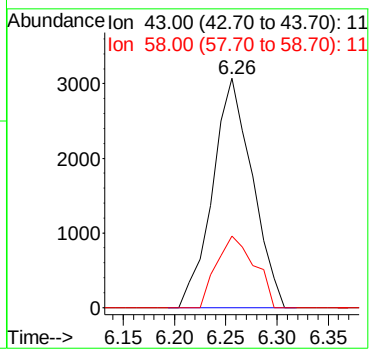


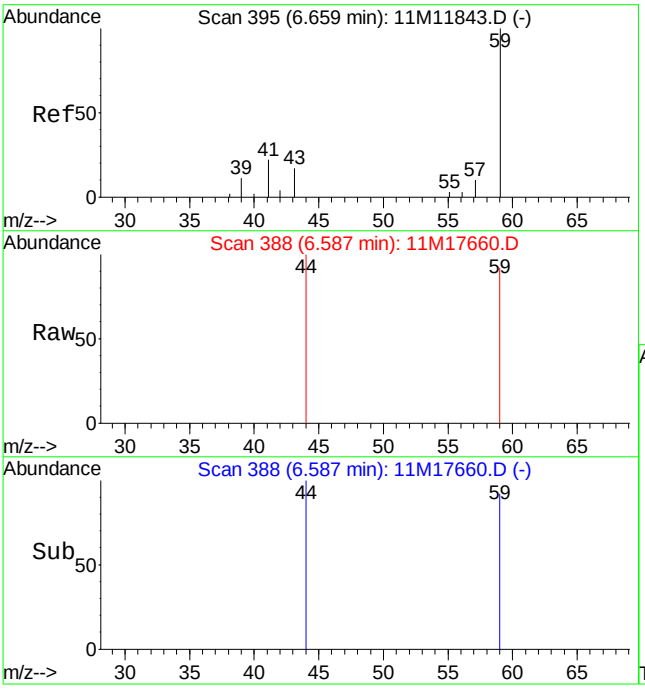


#13
Acetone
Concen: 7.35 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion: 43 Resp: 8286

Ion	Ratio	Lower	Upper
43	100		
58	29.7	17.5	40.7

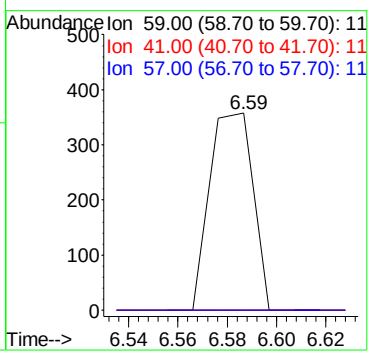


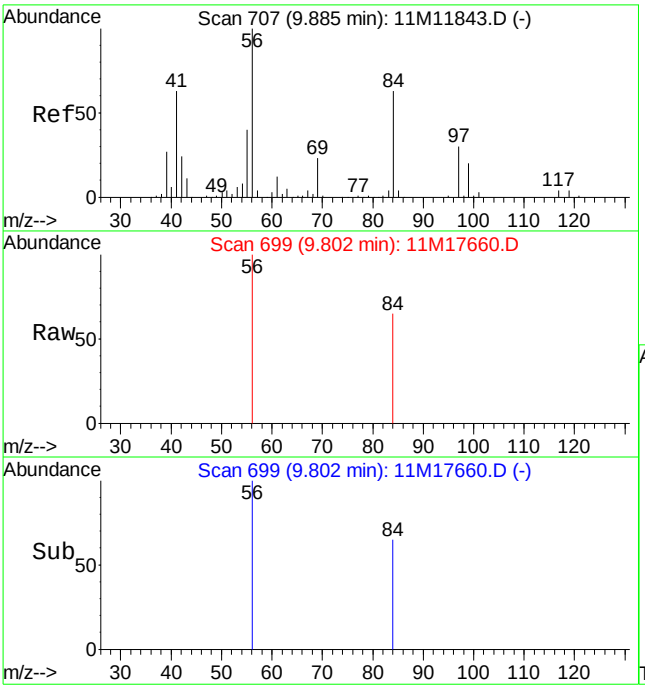


#15
Tert-Butyl Alcohol
Concen: 1.09 ug/L
RT: 6.59 min Scan# 388
Delta R.T. 0.01 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion: 59 Resp: 438

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

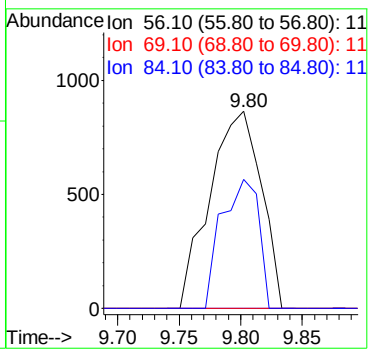


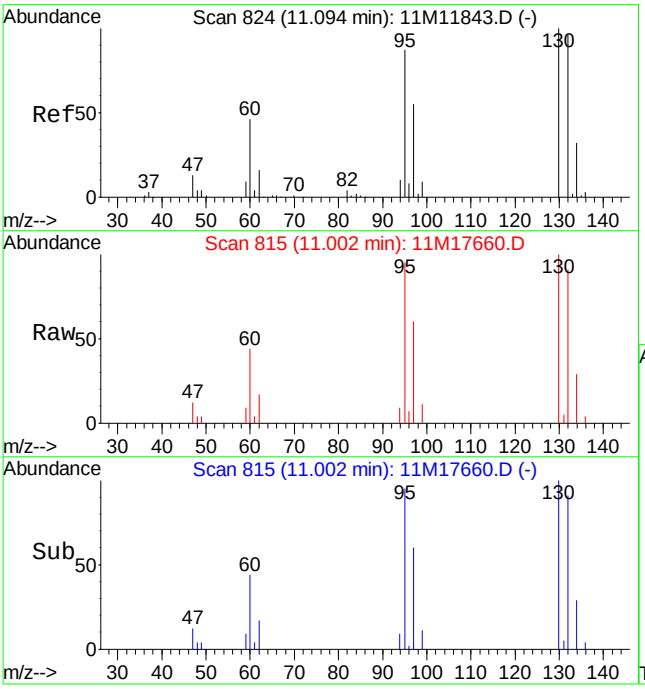


#39
Cyclohexane
Concen: 0.32 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion: 56 Resp: 2521

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.5	36.1#
84	47.0	41.7	97.3

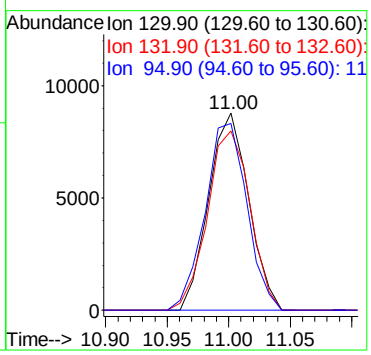


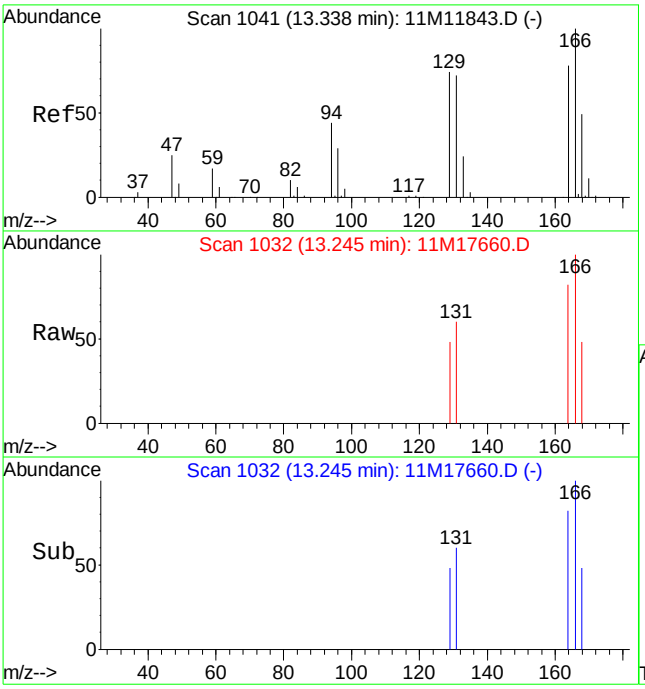


#46
Trichloroethene
Concen: 4.82 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion:130 Resp: 19907

Ion	Ratio	Lower	Upper
130	100		
132	96.5	57.8	134.8
95	99.0	62.3	145.5

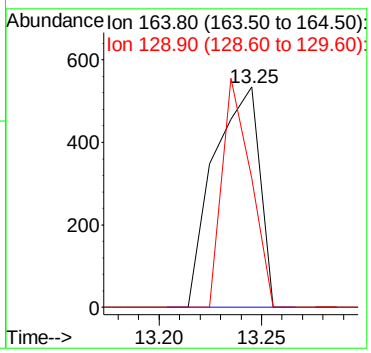




#64
Tetrachloroethene
Concen: 0.24 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17660.D
Acq: 21 Apr 2017 21:27

Tgt Ion:164 Resp: 830

Ion	Ratio	Lower	Upper
164	100		
129	64.9	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17661.D Vial: 13
Acq On : 21 Apr 2017 21:57 Operator: JDS
Sample : L17041069-30 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:02 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

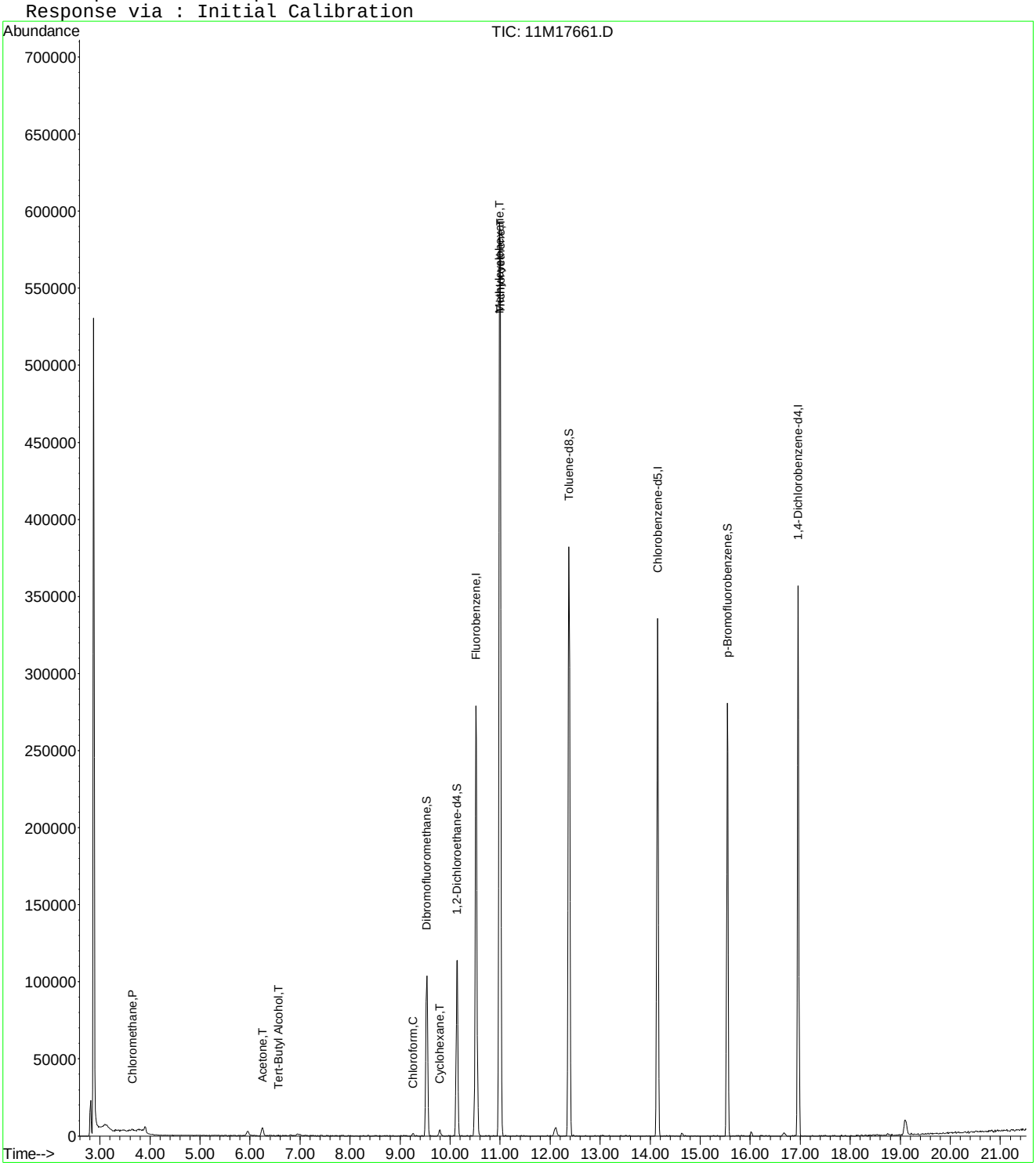
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	334045	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	232773	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119198	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83976	24.2280	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.92%			
43) 1,2-Dichloroethane-d4	10.13	65	97338	24.7926	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.16%			
57) Toluene-d8	12.38	98	329727	26.0203	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.08%			
78) p-Bromofluorobenzene	15.54	95	120491	27.1981	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.80%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	1401	0.2532	ug/L #	27
13) Acetone	6.25	43	9885	8.6711	ug/L	92
15) Tert-Butyl Alcohol	6.57	59	192	0.4706	ug/L #	62
33) Chloroform	9.25	83	1620	0.2212	ug/L	79
39) Cyclohexane	9.79	56	3918	0.4847	ug/L #	92
46) Trichloroethene	11.00	130	259497	62.0506	ug/L	97
47) Methylcyclohexane	10.99	83	2628	0.4078	ug/L #	1

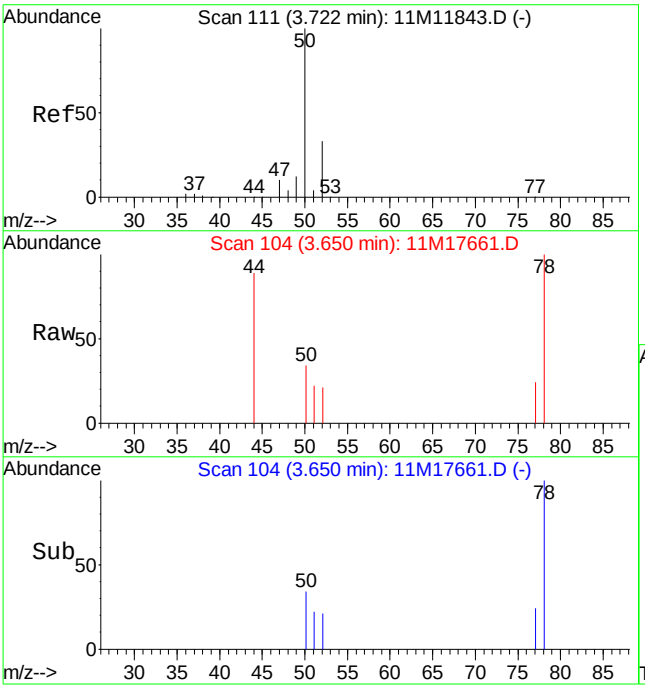
(#) = qualifier out of range (m) = manual integration
11M17661.D 8260WTR.M Tue Apr 25 13:52:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17661.D Vial: 13
Acq On : 21 Apr 2017 21:57 Operator: JDS
Sample : L17041069-30 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

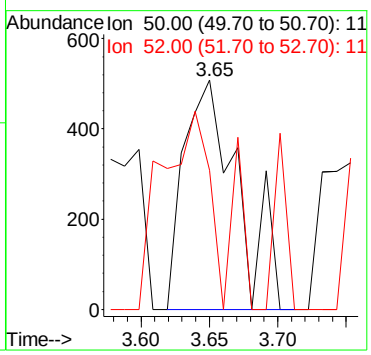


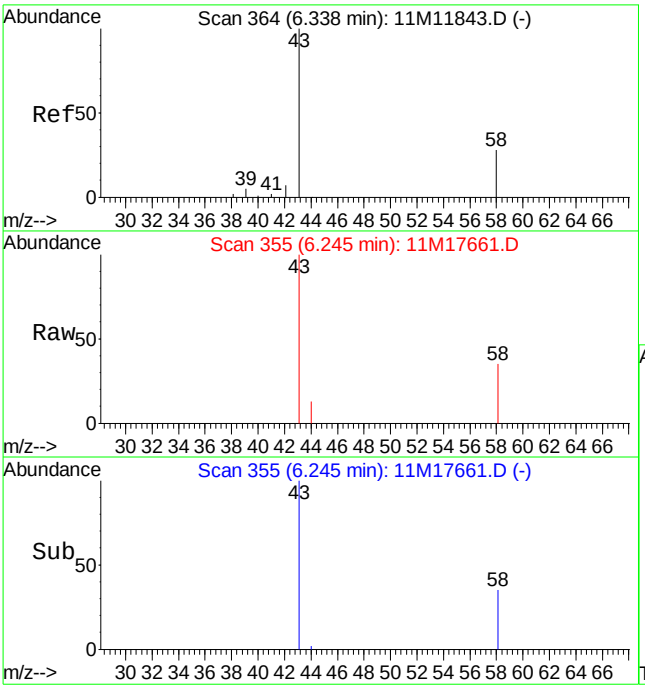


#3
Chloromethane
Concen: 0.25 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 50 Resp: 1401

Ion	Ratio	Lower	Upper
50	100		
52	75.7	20.3	47.3#

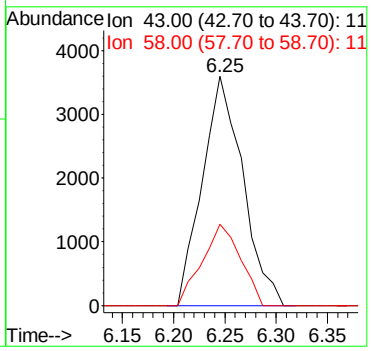


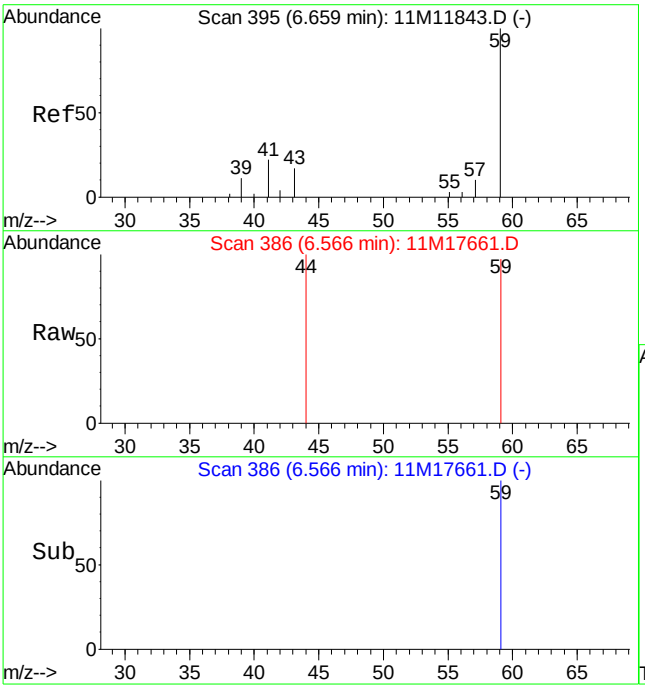


#13
Acetone
Concen: 8.67 ug/L
RT: 6.25 min Scan# 355
Delta R.T. 0.00 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 43 Resp: 9885

Ion	Ratio	Lower	Upper
43	100		
58	33.4	17.5	40.7

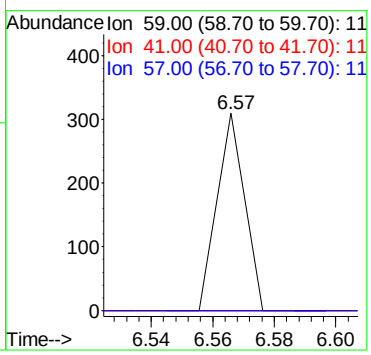


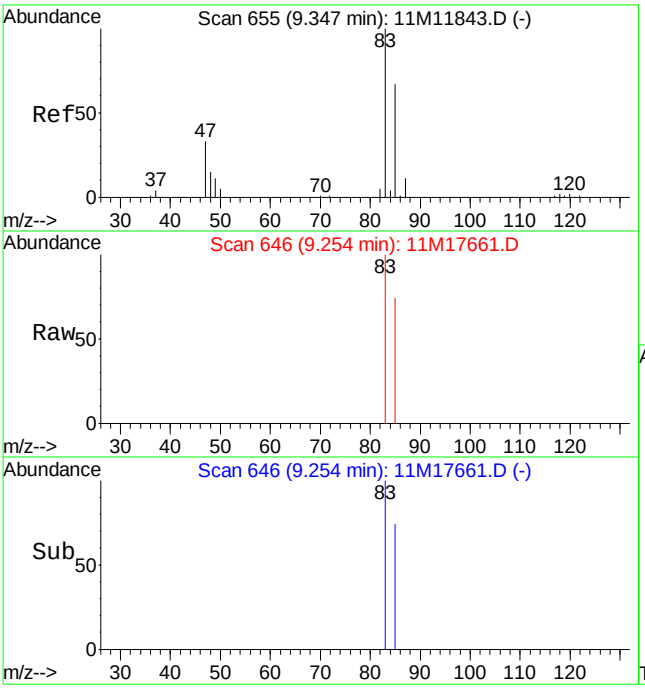


#15
Tert-Butyl Alcohol
Concen: 0.47 ug/L
RT: 6.57 min Scan# 386
Delta R.T. -0.01 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 59 Resp: 192

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

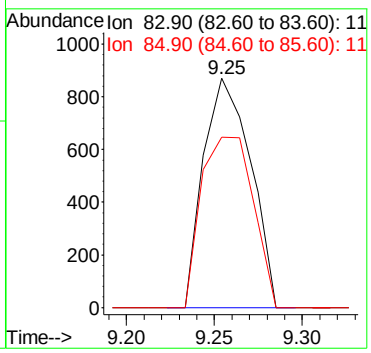


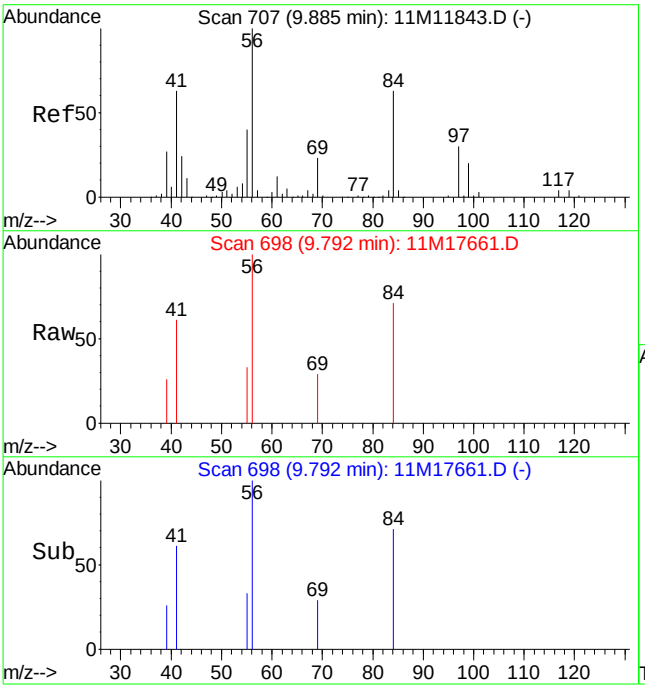


#33
Chloroform
Concen: 0.22 ug/L
RT: 9.25 min Scan# 646
Delta R.T. 0.00 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 83 Resp: 1620

Ion	Ratio	Lower	Upper
83	100		
85	81.9	39.2	91.6

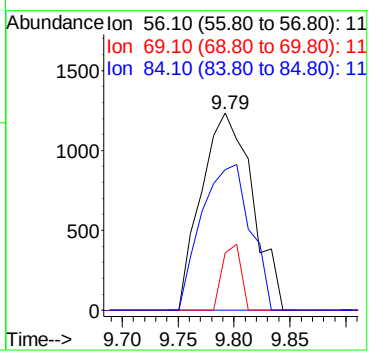


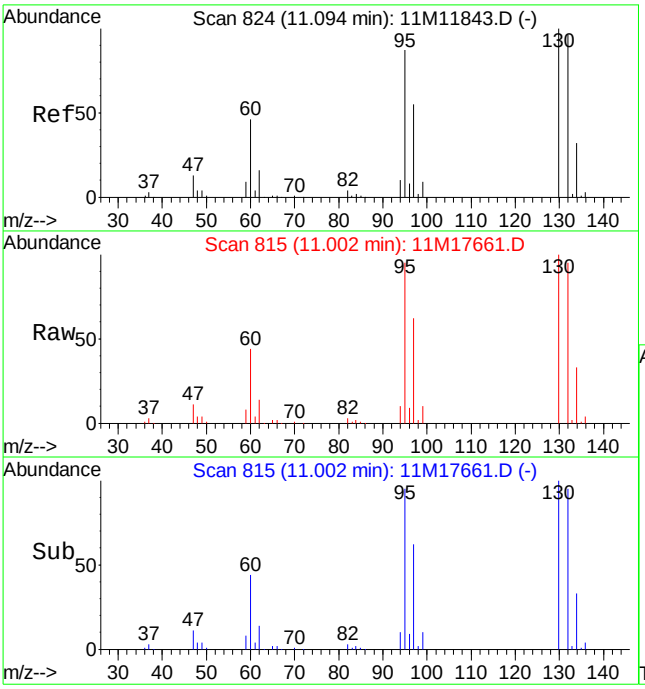


#39
Cyclohexane
Concen: 0.48 ug/L
RT: 9.79 min Scan# 698
Delta R.T. 0.00 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 56 Resp: 3918

Ion	Ratio	Lower	Upper
56	100		
69	12.2	15.5	36.1#
84	70.8	41.7	97.3

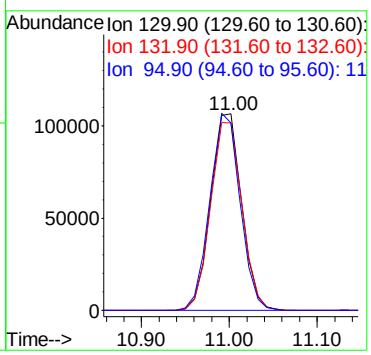


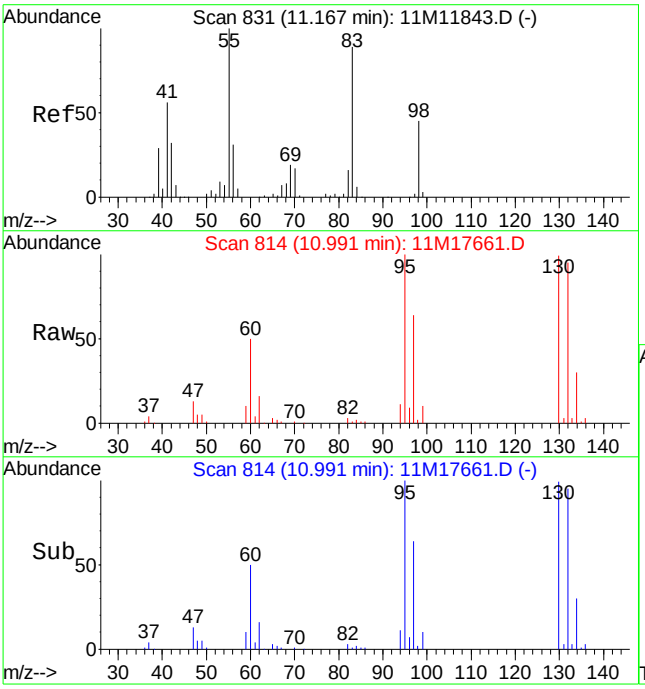


#46
Trichloroethene
Concen: 62.05 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion:130 Resp: 259497

Ion	Ratio	Lower	Upper
130	100		
132	97.0	57.8	134.8
95	98.3	62.3	145.5

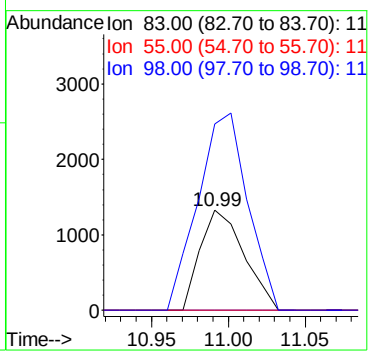




#47
Methylcyclohexane
Concen: 0.41 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.08 min
Lab File: 11M17661.D
Acq: 21 Apr 2017 21:57

Tgt Ion: 83 Resp: 2628

Ion	Ratio	Lower	Upper
83	100		
55	0.0	58.6	136.6#
98	223.8	27.6	64.4#



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17662.D Vial: 14
Acq On : 21 Apr 2017 22:26 Operator: JDS
Sample : L17041069-31 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:04 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

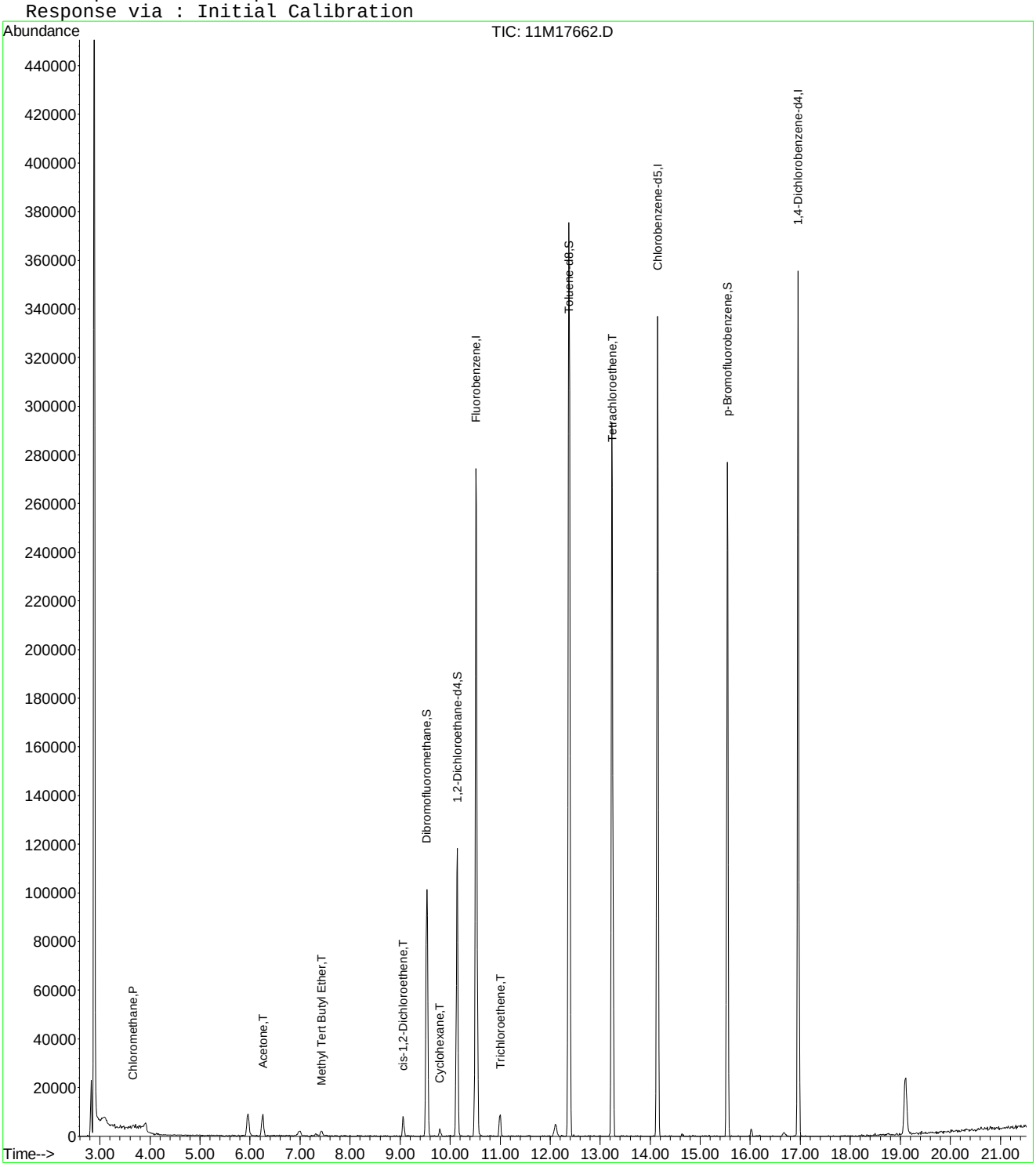
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	331431	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	232199	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119764	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	82385	23.9565 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.84%		
43) 1,2-Dichloroethane-d4	10.14	65	97553	25.0433 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.16%		
57) Toluene-d8	12.38	98	327071	25.8745 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.48%		
78) p-Bromofluorobenzene	15.54	95	115269	25.8964 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.60%		
Target Compounds					Qvalue
3) Chloromethane	3.66	50	1408	0.2565 ug/L #	1
13) Acetone	6.26	43	16965	14.9990 ug/L	96
22) Methyl Tert Butyl Ether	7.42	73	5249	0.4866 ug/L #	62
32) cis-1,2-Dichloroethene	9.06	96	4676	1.0580 ug/L	84
39) Cyclohexane	9.79	56	2646	0.3299 ug/L #	90
46) Trichloroethene	11.00	130	4594	1.1072 ug/L	93
64) Tetrachloroethene	13.25	164	96474	27.3734 ug/L	92

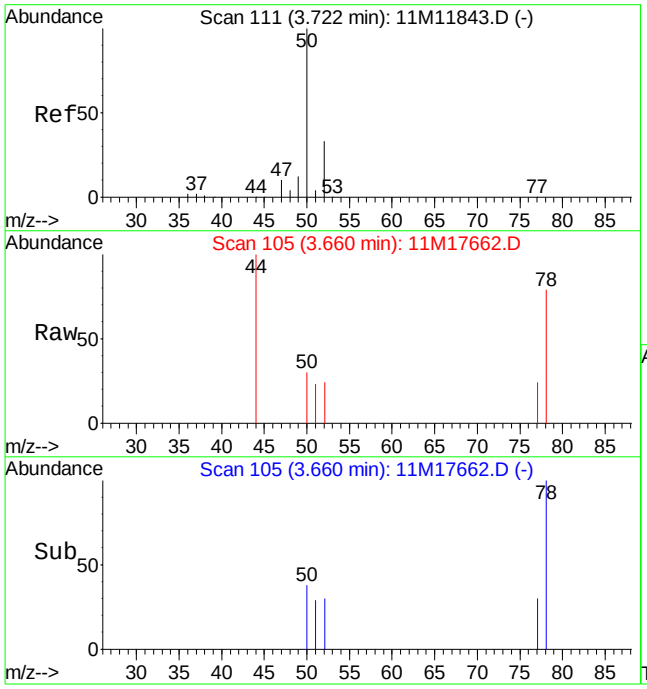
(#) = qualifier out of range (m) = manual integration
11M17662.D 8260WTR.M Tue Apr 25 13:52:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17662.D Vial: 14
Acq On : 21 Apr 2017 22:26 Operator: JDS
Sample : L17041069-31 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

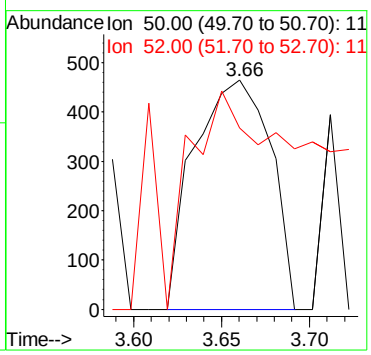


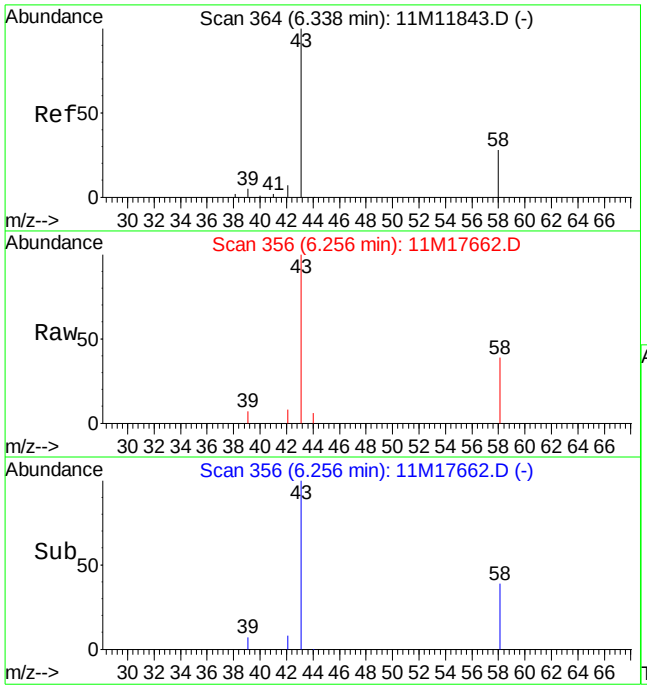


#3
Chloromethane
Concen: 0.26 ug/L
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion: 50 Resp: 1408

Ion	Ratio	Lower	Upper
50	100		
52	153.2	20.3	47.3#

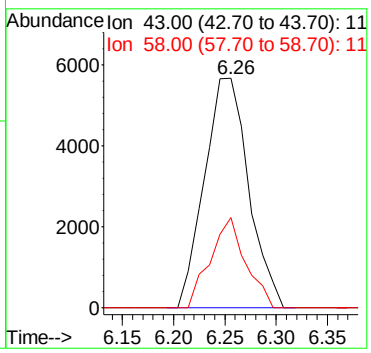


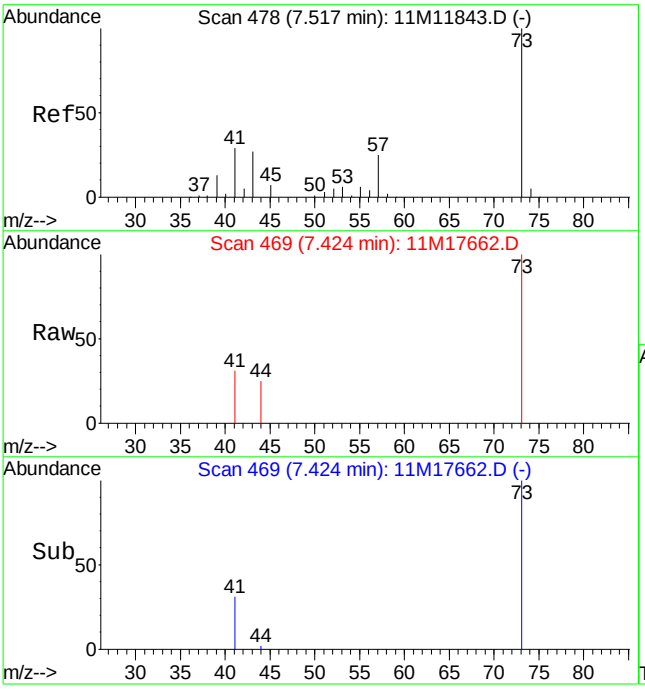


#13
Acetone
Concen: 15.00 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion: 43 Resp: 16965

Ion	Ratio	Lower	Upper
43	100		
58	31.3	17.5	40.7

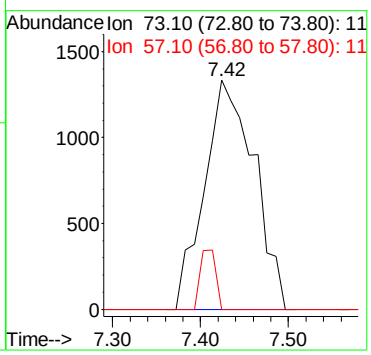


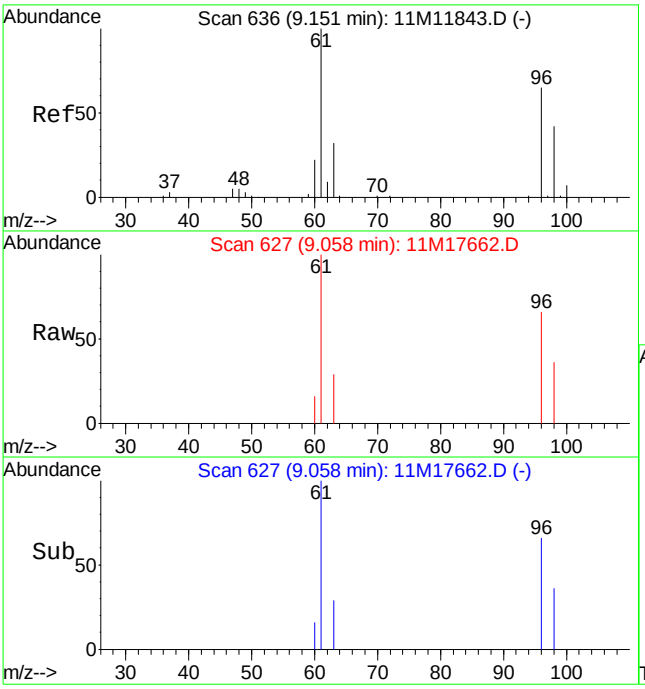


#22
Methyl Tert Butyl Ether
Concen: 0.49 ug/L
RT: 7.42 min Scan# 469
Delta R.T. -0.01 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion: 73 Resp: 5249

Ion	Ratio	Lower	Upper
73	100		
57	8.1	16.9	39.3#

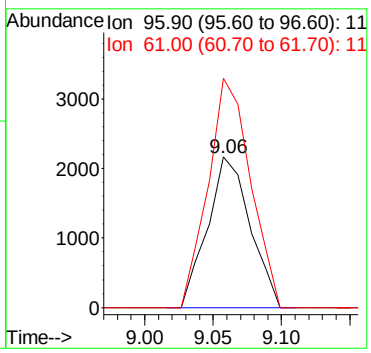


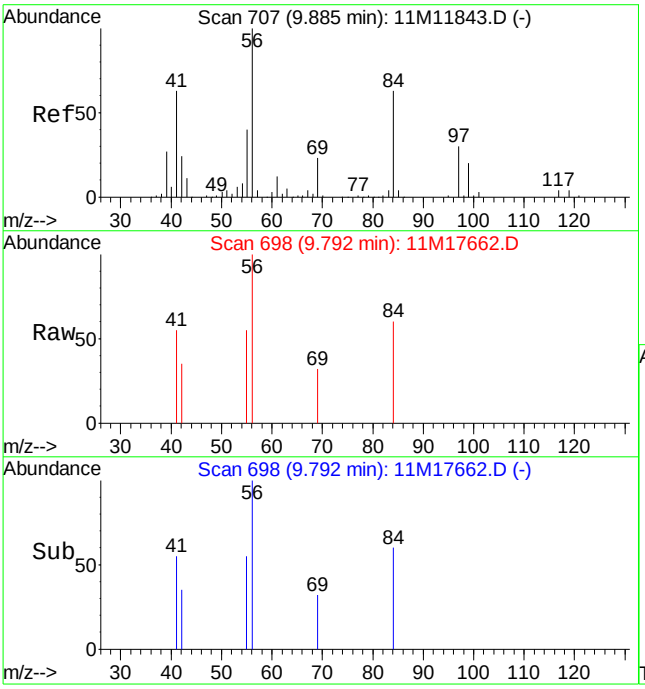


#32
cis-1,2-Dichloroethene
Concen: 1.06 ug/L
RT: 9.06 min Scan# 627
Delta R.T. 0.00 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion: 96 Resp: 4676

Ion	Ratio	Lower	Upper
96	100		
61	151.6	104.6	244.2

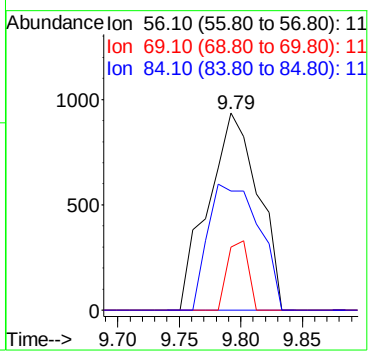


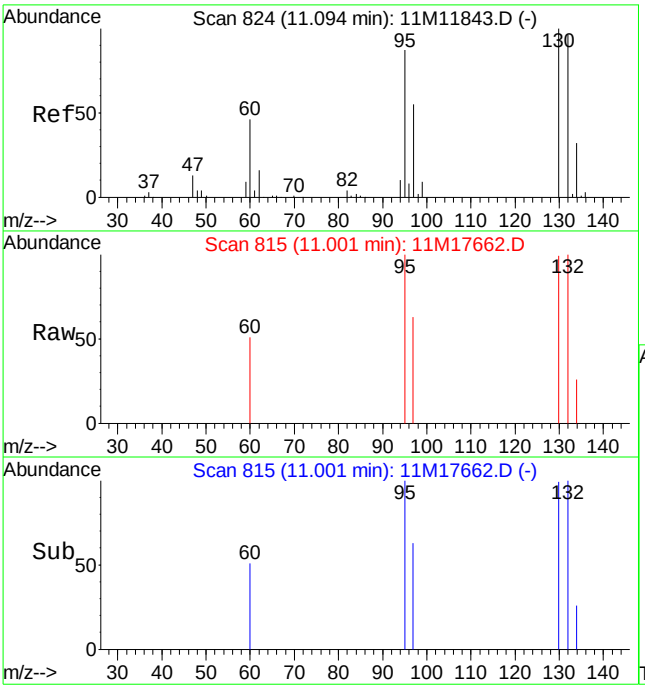


#39
Cyclohexane
Concen: 0.33 ug/L
RT: 9.79 min Scan# 698
Delta R.T. 0.00 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion: 56 Resp: 2646

Ion	Ratio	Lower	Upper
56	100		
69	14.8	15.5	36.1#
84	65.3	41.7	97.3

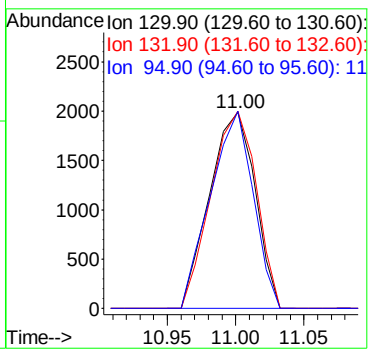


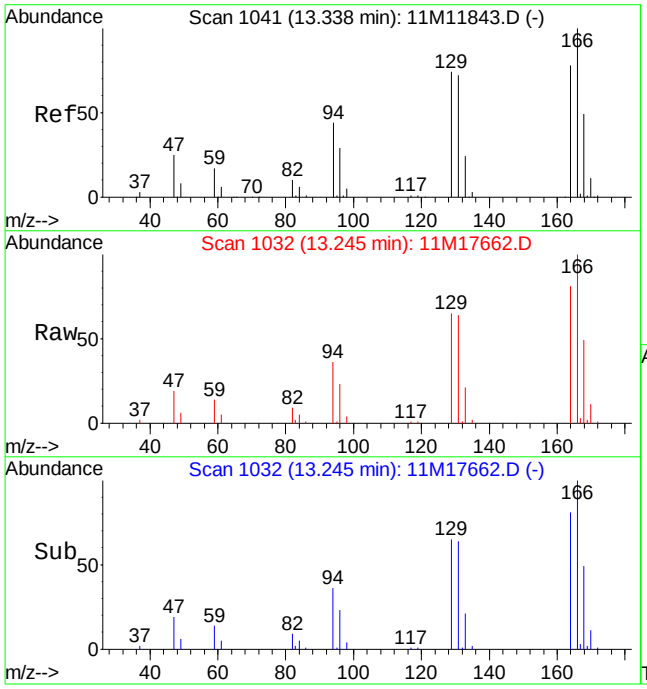


#46
Trichloroethene
Concen: 1.11 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion:130 Resp: 4594

Ion	Ratio	Lower	Upper
130	100		
132	100.0	57.8	134.8
95	94.3	62.3	145.5

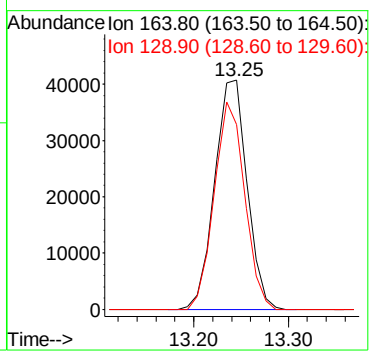




#64
Tetrachloroethene
Concen: 27.37 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17662.D
Acq: 21 Apr 2017 22:26

Tgt Ion:164 Resp: 96474

Ion	Ratio	Lower	Upper
164	100		
129	85.0	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17659.D Vial: 11
Acq On : 21 Apr 2017 20:58 Operator: JDS
Sample : L17041069-32 A REF 826 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:51:57 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

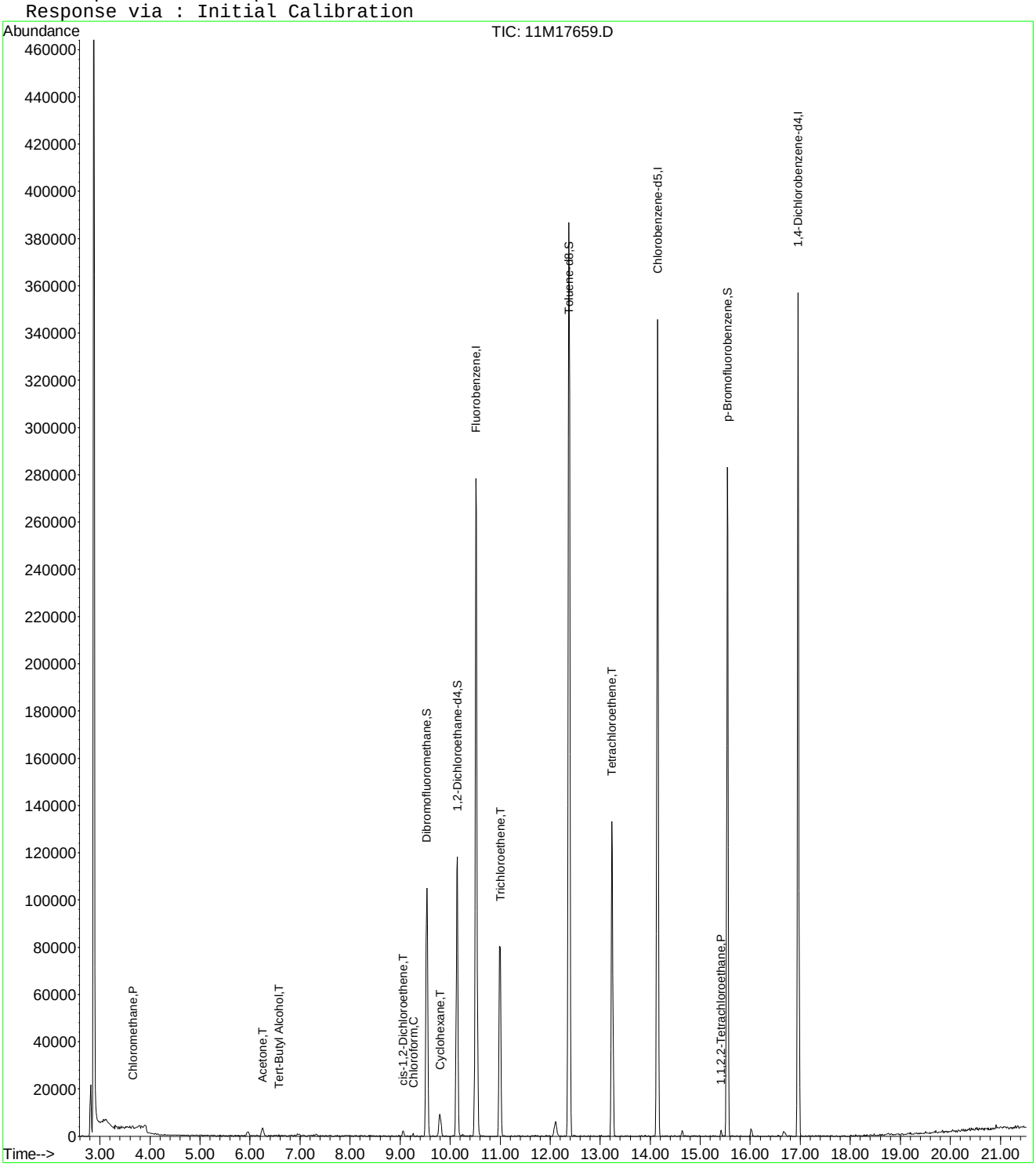
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	335646	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	235514	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119852	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84421	24.2402	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.96%			
43) 1,2-Dichloroethane-d4	10.14	65	99537	25.2318	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.92%			
57) Toluene-d8	12.38	98	332309	25.9189	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.68%			
78) p-Bromofluorobenzene	15.54	95	119132	26.7446	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.96%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1673	0.3009	ug/L #	38
13) Acetone	6.25	43	6283	5.4851	ug/L	96
15) Tert-Butyl Alcohol	6.58	59	199	0.4855	ug/L #	62
32) cis-1,2-Dichloroethene	9.06	96	1246	0.2784	ug/L	94
33) Chloroform	9.26	83	922	0.1253	ug/L #	46
39) Cyclohexane	9.80	56	8976	1.1052	ug/L	94
46) Trichloroethene	11.00	130	37780	8.9908	ug/L	94
64) Tetrachloroethene	13.23	164	44055	12.3241	ug/L	93
77) 1,1,2,2-Tetrachloroethane	15.42	83	2682	0.6472	ug/L	91

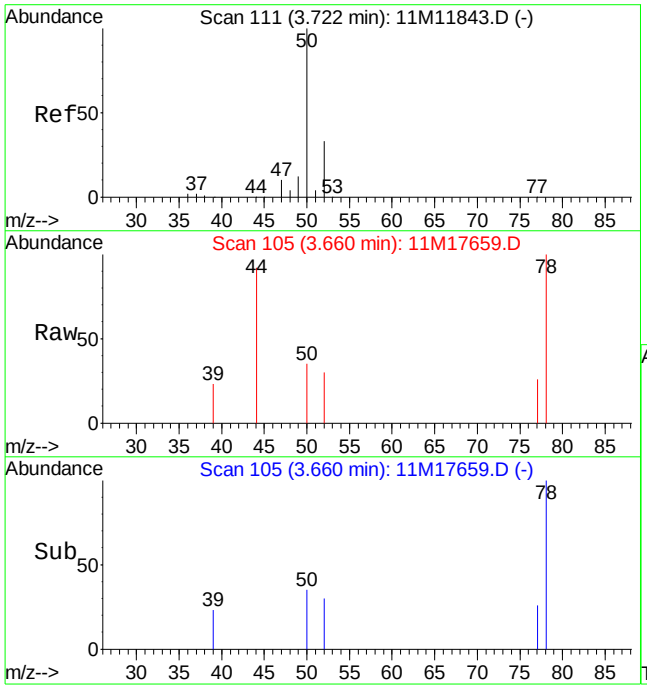
(#) = qualifier out of range (m) = manual integration
11M17659.D 8260WTR.M Tue Apr 25 13:51:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17659.D Vial: 11
Acq On : 21 Apr 2017 20:58 Operator: JDS
Sample : L17041069-32 A REF 826 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:51 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

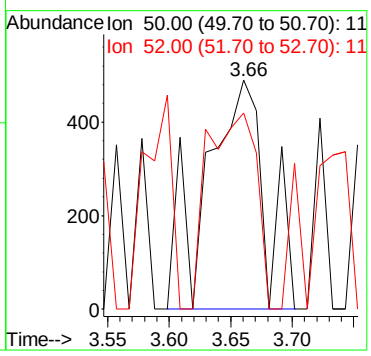


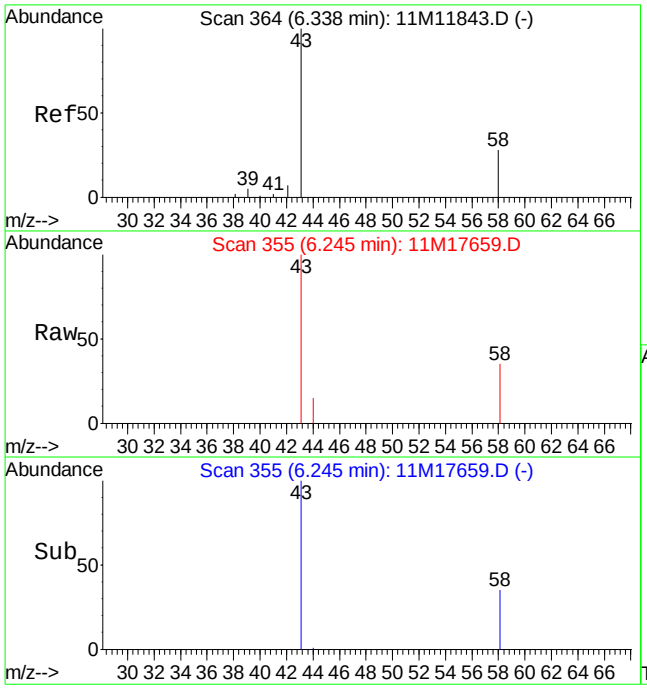


#3
Chloromethane
Concen: 0.30 ug/L
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 50 Resp: 1673

Ion	Ratio	Lower	Upper
50	100		
52	69.2	20.3	47.3#

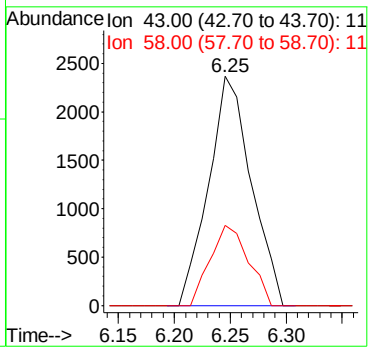


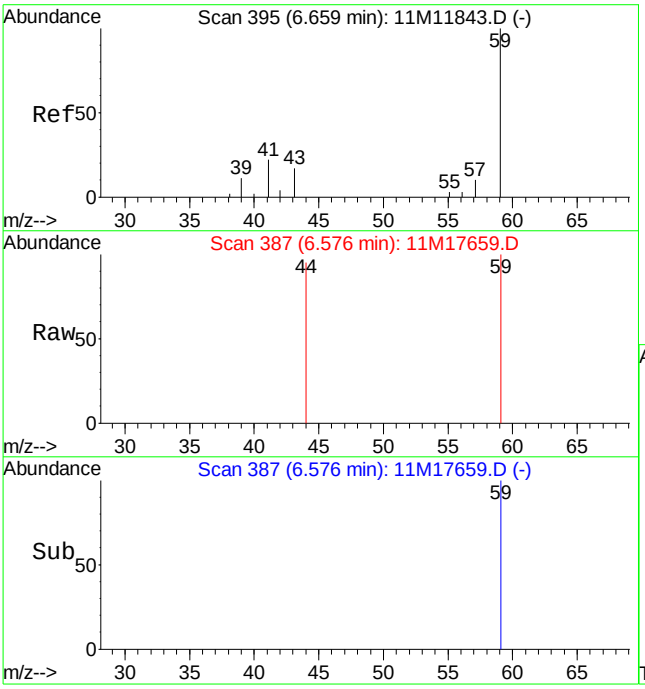


#13
Acetone
Concen: 5.49 ug/L
RT: 6.25 min Scan# 355
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 43 Resp: 6283

Ion	Ratio	Lower	Upper
43	100		
58	31.4	17.5	40.7

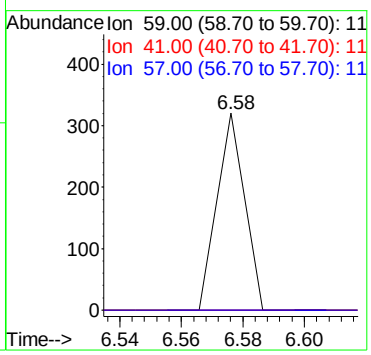


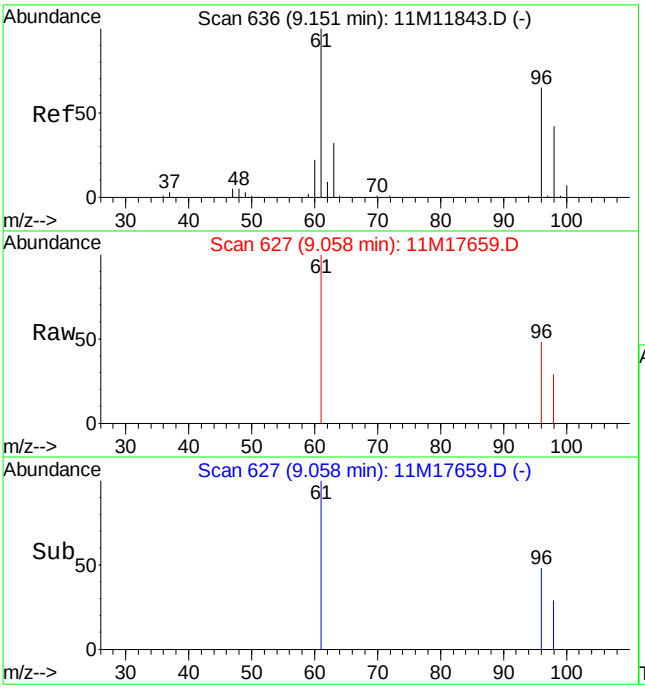


#15
Tert-Butyl Alcohol
Concen: 0.49 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 59 Resp: 199

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

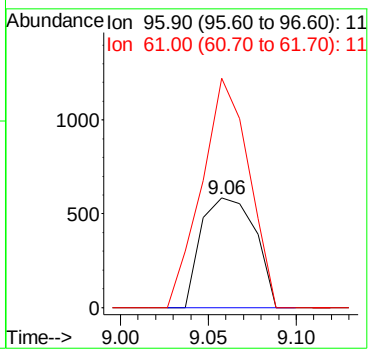


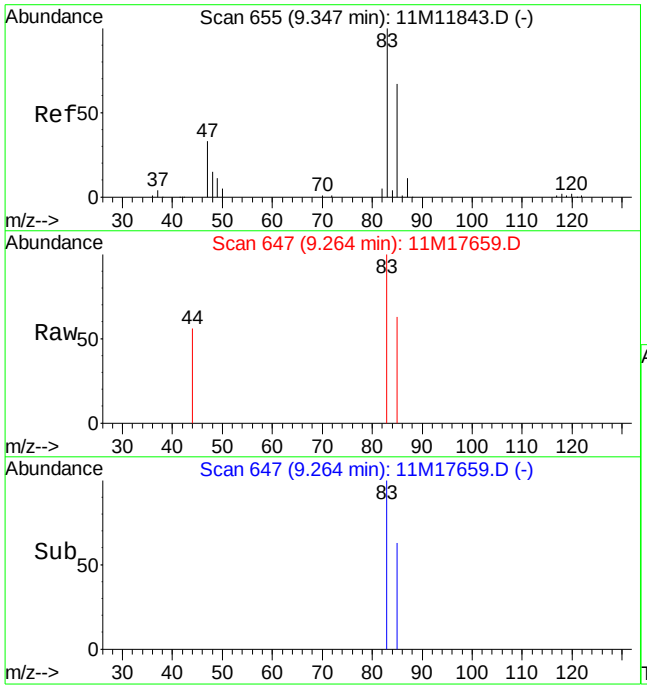


#32
cis-1,2-Dichloroethene
Concen: 0.28 ug/L
RT: 9.06 min Scan# 627
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 96 Resp: 1246

Ion	Ratio	Lower	Upper
96	100		
61	183.4	104.6	244.2

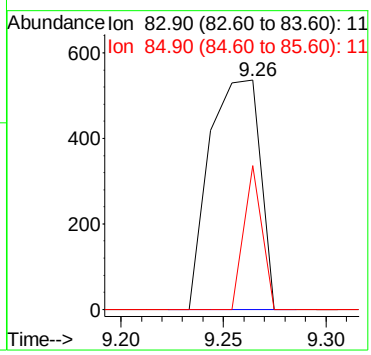


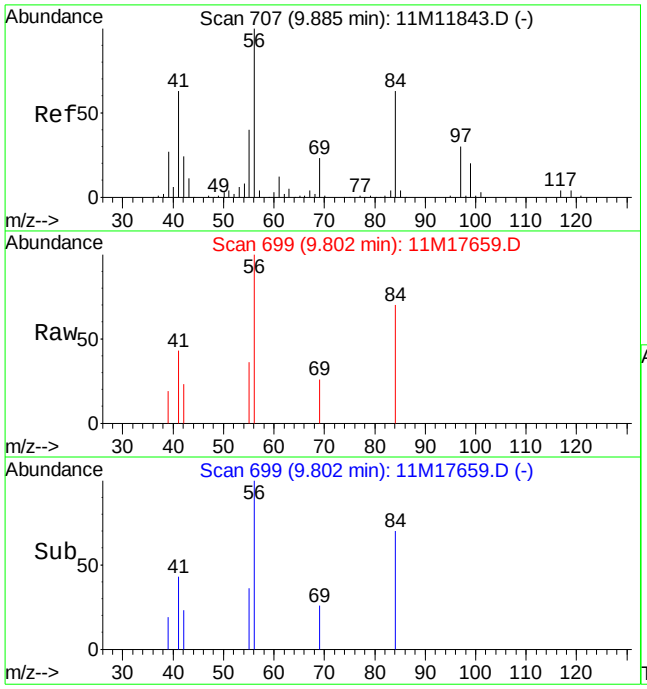


#33
Chloroform
Concen: 0.13 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.01 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 83 Resp: 922

Ion	Ratio	Lower	Upper
83	100		
85	22.7	39.2	91.6#

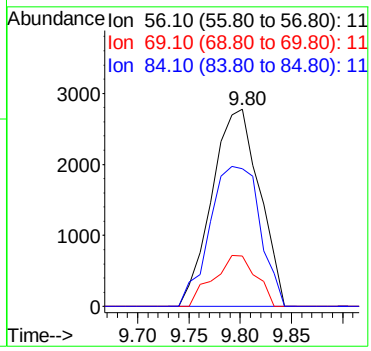


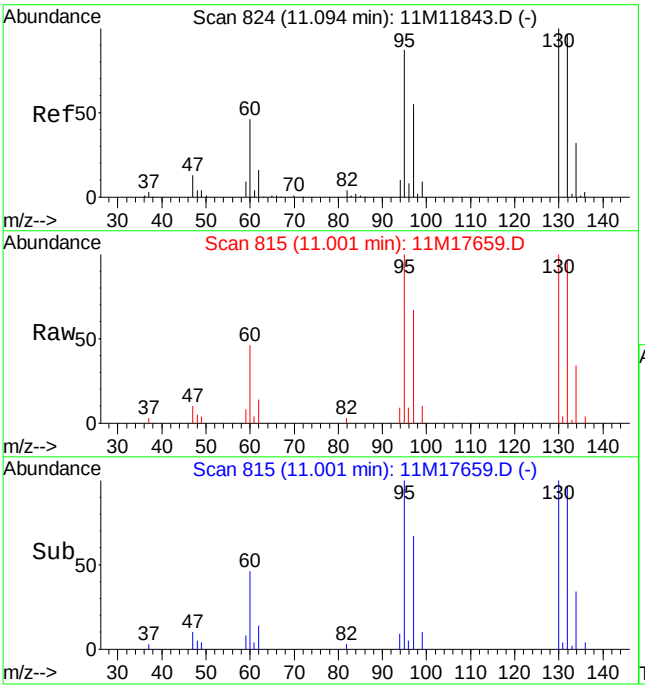


#39
Cyclohexane
Concen: 1.11 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 56 Resp: 8976

Ion	Ratio	Lower	Upper
56	100		
69	23.2	15.5	36.1
84	74.8	41.7	97.3

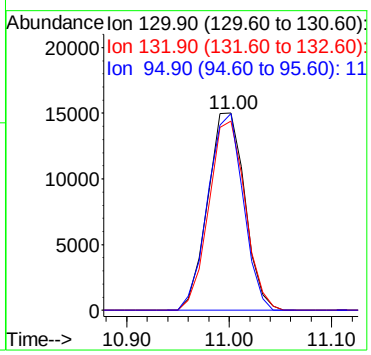


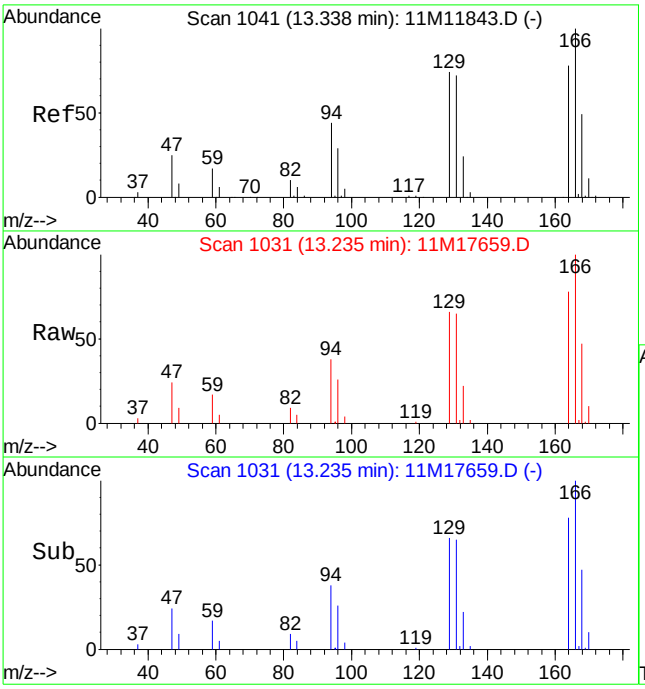


#46
Trichloroethene
Concen: 8.99 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion:130 Resp: 37780

Ion	Ratio	Lower	Upper
130	100		
132	93.7	57.8	134.8
95	94.6	62.3	145.5

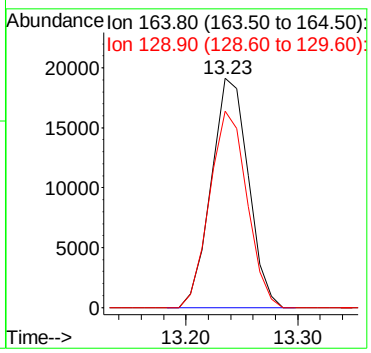


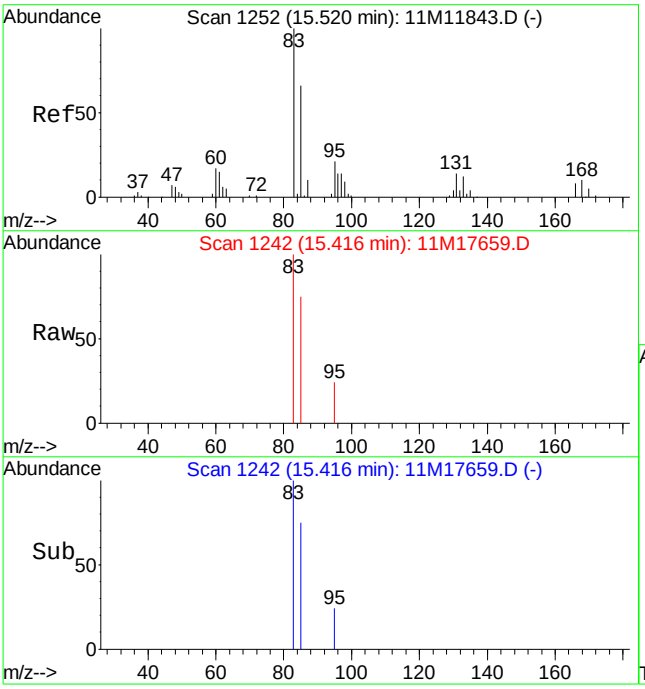


#64
Tetrachloroethene
Concen: 12.32 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion:164 Resp: 44055

Ion	Ratio	Lower	Upper
164	100		
129	86.2	55.4	129.4

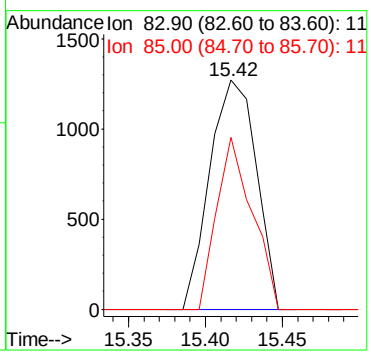




#77
1,1,2,2-Tetrachloroethane
Concen: 0.65 ug/L
RT: 15.42 min Scan# 1242
Delta R.T. 0.00 min
Lab File: 11M17659.D
Acq: 21 Apr 2017 20:58

Tgt Ion: 83 Resp: 2682

Ion	Ratio	Lower	Upper
83	100		
85	57.1	38.5	89.9



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17653.D Vial: 5
Acq On : 21 Apr 2017 18:31 Operator: JDS
Sample : L17041069-33 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:53:27 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	331878	25.00 ug/L	0.01
56) Chlorobenzene-d5	14.14	117	236711	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	127441	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	83656	24.2933 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.16%		
43) 1,2-Dichloroethane-d4	10.14	65	98500	25.2524 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.00%		
57) Toluene-d8	12.38	98	329744	25.5888 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.36%		
78) p-Bromofluorobenzene	15.54	95	121323	25.6146 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.44%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	104129	22.7816 ug/L	97
3) Chloromethane	3.66	50	104729	19.0501 ug/L	97
4) Vinyl Chloride	3.89	62	83322	19.8860 ug/L	98
5) 1,3-Butadiene	3.93	54	50406	25.7623 ug/L	100
6) Bromomethane	4.78	94	61995	19.8206 ug/L	95
7) Chloroethane	4.93	64	69085	21.0028 ug/L	99
8) Trichlorofluoromethane	5.41	101	111576	19.5672 ug/L	100
9) Diethyl ether	5.92	59	378107	94.6353 ug/L	94
10) Isoprene	5.96	67	115999	21.1215 ug/L	99
11) Acrolein	6.15	56	74713	97.9465 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	70707	20.7880 ug/L	95
13) Acetone	6.26	43	32209	28.4380 ug/L	94
14) 1,1-Dichloroethene	6.47	61	122046	18.7597 ug/L	97
15) Tert-Butyl Alcohol	6.58	59	97753	241.1784 ug/L	98
16) Dimethyl Sulfide	6.73	62	106396	23.0239 ug/L	97
17) Iodomethane	6.97	142	92418	22.9017 ug/L	92
18) Methyl acetate	6.99	43	65665	20.2233 ug/L #	88
19) Methylene Chloride	7.23	84	79929	18.1911 ug/L	99
20) Carbon Disulfide	7.27	76	183030	17.7571 ug/L	98
21) Acrylonitrile	7.40	53	35254	20.9827 ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	219653	20.3340 ug/L	98
23) trans-1,2-Dichloroethene	7.66	96	73459	19.0936 ug/L	97
24) n-Hexane	7.73	57	127336	21.0740 ug/L	98
25) Diisopropyl ether	8.07	45	1558000	104.5072 ug/L	96
26) Vinyl Acetate	8.23	43	195986	25.7037 ug/L	99
27) 1,1-Dichloroethane	8.26	63	161190	19.9060 ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1325538	98.6301 ug/L	100
29) 2-Butanone	8.79	43	39209	21.3538 ug/L	96
30) Propionitrile	8.89	54	66234	106.5179 ug/L	97
31) 2,2-Dichloropropane	9.00	77	113489	20.3867 ug/L	99
32) cis-1,2-Dichloroethene	9.07	96	88772	20.0578 ug/L	96
33) Chloroform	9.26	83	137234	18.8604 ug/L	100
34) 1-Bromopropane	9.39	122	20402	24.8128 ug/L	98
35) Bromochloromethane	9.48	130	53898	20.0812 ug/L	93
36) Tetrahydrofuran	9.50	42	138563	101.7261 ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	118843	20.2607 ug/L	98
39) Cyclohexane	9.79	56	152596	19.0014 ug/L	99
40) 1,1-Dichloropropene	9.95	75	103750	19.8059 ug/L	100
41) Carbon Tetrachloride	10.09	117	102615	19.9848 ug/L	98
42) Tert-Amyl-Methyl ether	10.05	73	1148120	104.4227 ug/L	98

(#) = qualifier out of range (m) = manual integration
11M17653.D 8260WTR.M Fri Apr 21 18:53:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17653.D Vial: 5
Acq On : 21 Apr 2017 18:31 Operator: JDS
Sample : L17041069-33 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:53:27 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

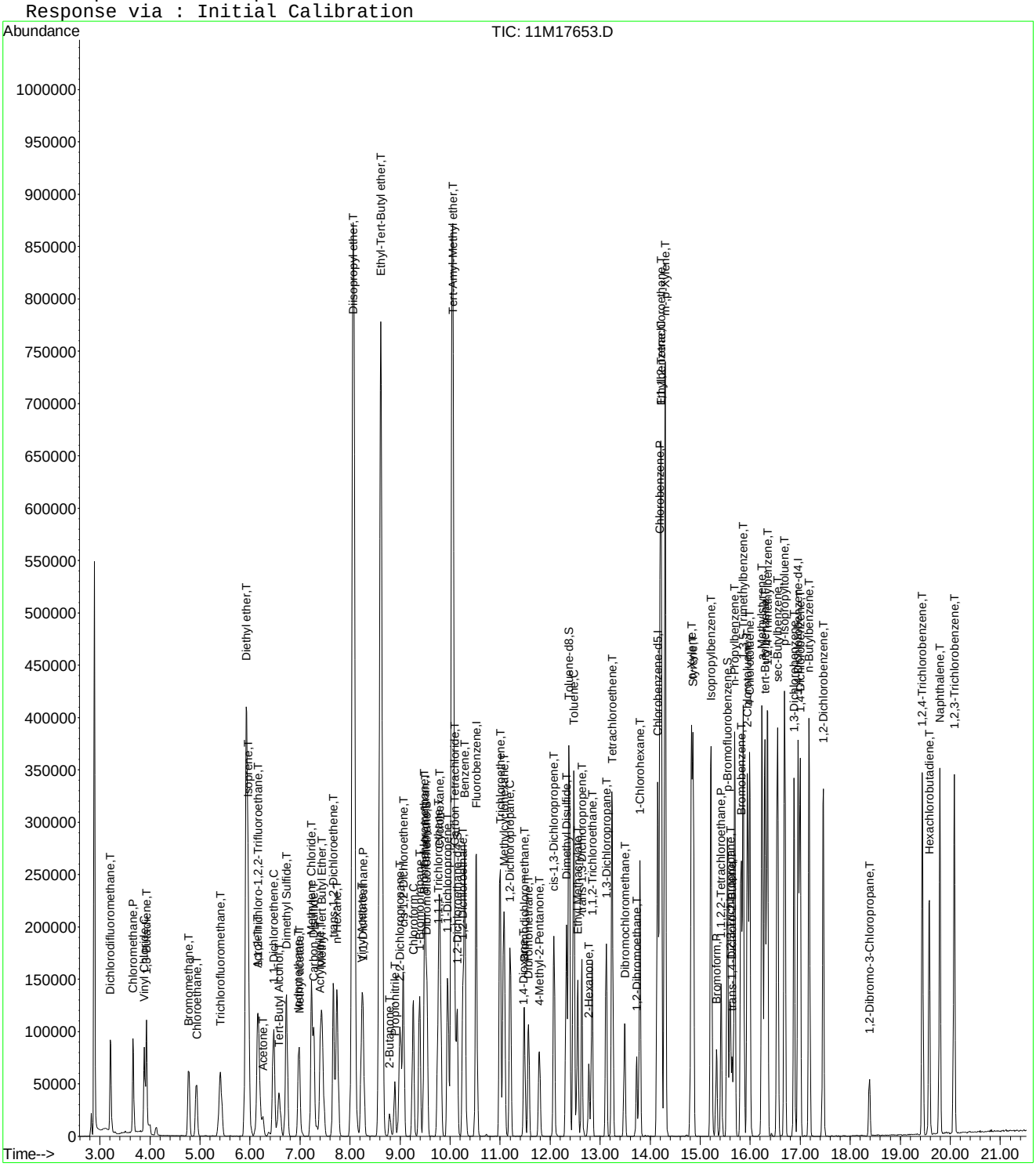
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	109981	19.4694 ug/L	99
45)	Benzene	10.29	78	313064	19.9497 ug/L	96
46)	Trichloroethene	11.00	130	112282	27.0240 ug/L	96
47)	Methylcyclohexane	11.07	83	128439	20.0593 ug/L	97
48)	1,2-Dichloropropane	11.20	63	94715	19.6062 ug/L	96
49)	1,4-Dioxane	11.47	88	10161	229.6435 ug/L	89
50)	Bromodichloromethane	11.49	83	99209	19.5892 ug/L	98
51)	Dibromomethane	11.57	93	46947	20.6088 ug/L	91
53)	4-Methyl-2-Pentanone	11.79	58	33220	19.5887 ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	131048	22.2421 ug/L	100
55)	Dimethyl Disulfide	12.33	79	71946	20.7955 ug/L	87
58)	Toluene	12.47	91	327598	19.4247 ug/L	96
59)	Ethyl Methacrylate	12.55	69	101410	23.3645 ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	108398	20.8093 ug/L	98
61)	1,1,2-Trichloroethane	12.84	97	70059	19.7462 ug/L	98
62)	2-Hexanone	12.77	43	61806	22.9254 ug/L	99
63)	1,3-Dichloropropane	13.12	76	121885	20.7613 ug/L	93
64)	Tetrachloroethene	13.25	164	110481	30.7502 ug/L	93
65)	Dibromochloromethane	13.49	129	77683	20.1994 ug/L	98
66)	1,2-Dibromoethane	13.73	107	62391	19.9756 ug/L	98
67)	1-Chlorohexane	13.79	91	103475	22.4092 ug/L	97
68)	Chlorobenzene	14.20	112	213808	20.3321 ug/L	97
69)	1,1,1,2-Tetrachloroethane	14.22	131	78479	20.5236 ug/L	97
70)	Ethylbenzene	14.22	106	118277	20.2441 ug/L	90
71)	m-,p-Xylene	14.30	106	282394	42.7299 ug/L	89
72)	o-Xylene	14.83	106	140248	20.3163 ug/L	97
73)	Styrene	14.86	104	229083	22.4729 ug/L	94
74)	Bromoform	15.32	173	52043	17.6472 ug/L	99
75)	Isopropylbenzene	15.22	105	347523	20.3723 ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	97974	22.2360 ug/L	98
79)	1,2,3-Trichloropropane	15.60	110	26754	20.8708 ug/L	85
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22337	18.5554 ug/L	67
81)	n-Propylbenzene	15.69	91	410798	20.3919 ug/L	96
82)	Bromobenzene	15.82	156	99827	20.0737 ug/L	84
83)	1,3,5-Trimethylbenzene	15.86	105	298536	20.0386 ug/L	99
84)	2-Chlorotoluene	15.94	91	260925	18.5685 ug/L	98
85)	4-Chlorotoluene	15.99	91	259103	21.0767 ug/L	98
86)	a-Methylstyrene	16.23	118	166565	21.7121 ug/L	93
87)	tert-Butylbenzene	16.30	134	68252	20.2525 ug/L	94
88)	1,2,4-Trimethylbenzene	16.35	105	310214	20.2863 ug/L	98
89)	sec-Butylbenzene	16.54	105	376287	19.9147 ug/L	98
90)	p-Isopropyltoluene	16.69	119	331080	20.9415 ug/L	96
91)	1,3-Dichlorobenzene	16.87	146	183640	20.3916 ug/L	93
92)	1,4-Dichlorobenzene	17.00	146	186914	20.4249 ug/L	95
93)	n-Butylbenzene	17.17	91	295472	21.6676 ug/L	98
94)	1,2-Dichlorobenzene	17.46	146	188612	20.7118 ug/L	94
95)	1,2-Dibromo-3-Chloropropan	18.38	75	16899	22.2134 ug/L	85
96)	1,2,4-Trichlorobenzene	19.44	180	143957	21.7045 ug/L	95
97)	Hexachlorobutadiene	19.58	225	69318	20.5925 ug/L	94
98)	Naphthalene	19.79	128	333681	23.1655 ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	142205	21.3399 ug/L	96

(#) = qualifier out of range (m) = manual integration
11M17653.D 8260WTR.M Fri Apr 21 18:53:28 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17653.D Vial: 5
Acq On : 21 Apr 2017 18:31 Operator: JDS
Sample : L17041069-33 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:53 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17654.D Vial: 6
Acq On : 21 Apr 2017 19:01 Operator: JDS
Sample : L17041069-34 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 19:23:01 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	330264	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	235141	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	131061	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	84151	24.5564 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.24%		
43) 1,2-Dichloroethane-d4	10.13	65	97835	25.2045 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.80%		
57) Toluene-d8	12.38	98	333316	26.0387 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.16%		
78) p-Bromofluorobenzene	15.54	95	119843	24.6032 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.40%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.20	85	103445	22.7425 ug/L	95
3) Chloromethane	3.65	50	106597	19.4846 ug/L	99
4) Vinyl Chloride	3.88	62	81763	19.6093 ug/L	98
5) 1,3-Butadiene	3.92	54	51627	26.5855 ug/L	97
6) Bromomethane	4.76	94	62981	20.2343 ug/L	97
7) Chloroethane	4.92	64	70767	21.6193 ug/L	98
8) Trichlorofluoromethane	5.40	101	113921	20.0761 ug/L	100
9) Diethyl ether	5.91	59	377965	95.0621 ug/L	96
10) Isoprene	5.96	67	115268	21.0909 ug/L	99
11) Acrolein	6.14	56	75613	99.6108 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	70912	20.9502 ug/L	93
13) Acetone	6.25	43	29057	25.7804 ug/L	95
14) 1,1-Dichloroethene	6.46	61	125015	19.3100 ug/L	97
15) Tert-Butyl Alcohol	6.58	59	95823	237.5720 ug/L	99
16) Dimethyl Sulfide	6.72	62	105008	22.8346 ug/L	99
17) Iodomethane	6.97	142	97640	24.2125 ug/L	93
18) Methyl acetate	6.98	43	64651	20.0083 ug/L #	90
19) Methylene Chloride	7.22	84	80653	18.4456 ug/L	98
20) Carbon Disulfide	7.27	76	186577	18.1897 ug/L	98
21) Acrylonitrile	7.40	53	34352	20.5458 ug/L	100
22) Methyl Tert Butyl Ether	7.42	73	215653	20.0612 ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	75645	19.7578 ug/L	95
24) n-Hexane	7.73	57	124208	20.6568 ug/L	99
25) Diisopropyl ether	8.05	45	1575584	106.2031 ug/L	96
26) Vinyl Acetate	8.22	43	198092	26.1069 ug/L	99
27) 1,1-Dichloroethane	8.25	63	163376	20.2746 ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1337507	100.0070 ug/L	100
29) 2-Butanone	8.79	43	37449	20.4949 ug/L	99
30) Propionitrile	8.89	54	65812	106.3565 ug/L	99
31) 2,2-Dichloropropane	9.00	77	112039	20.2246 ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	88746	20.1499 ug/L	96
33) Chloroform	9.25	83	137953	19.0519 ug/L	100
34) 1-Bromopropane	9.39	122	20807	25.4290 ug/L	98
35) Bromochloromethane	9.48	130	53559	20.0524 ug/L	94
36) Tetrahydrofuran	9.50	42	139094	102.6149 ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	123572	21.1699 ug/L	96
39) Cyclohexane	9.79	56	156320	19.5602 ug/L	98
40) 1,1-Dichloropropene	9.95	75	102523	19.6673 ug/L	98
41) Carbon Tetrachloride	10.08	117	102888	20.1359 ug/L	97
42) Tert-Amyl-Methyl ether	10.04	73	1155308	105.5900 ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17654.D 8260WTR.M Fri Apr 21 19:23:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17654.D Vial: 6
Acq On : 21 Apr 2017 19:01 Operator: JDS
Sample : L17041069-34 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 19:23:01 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

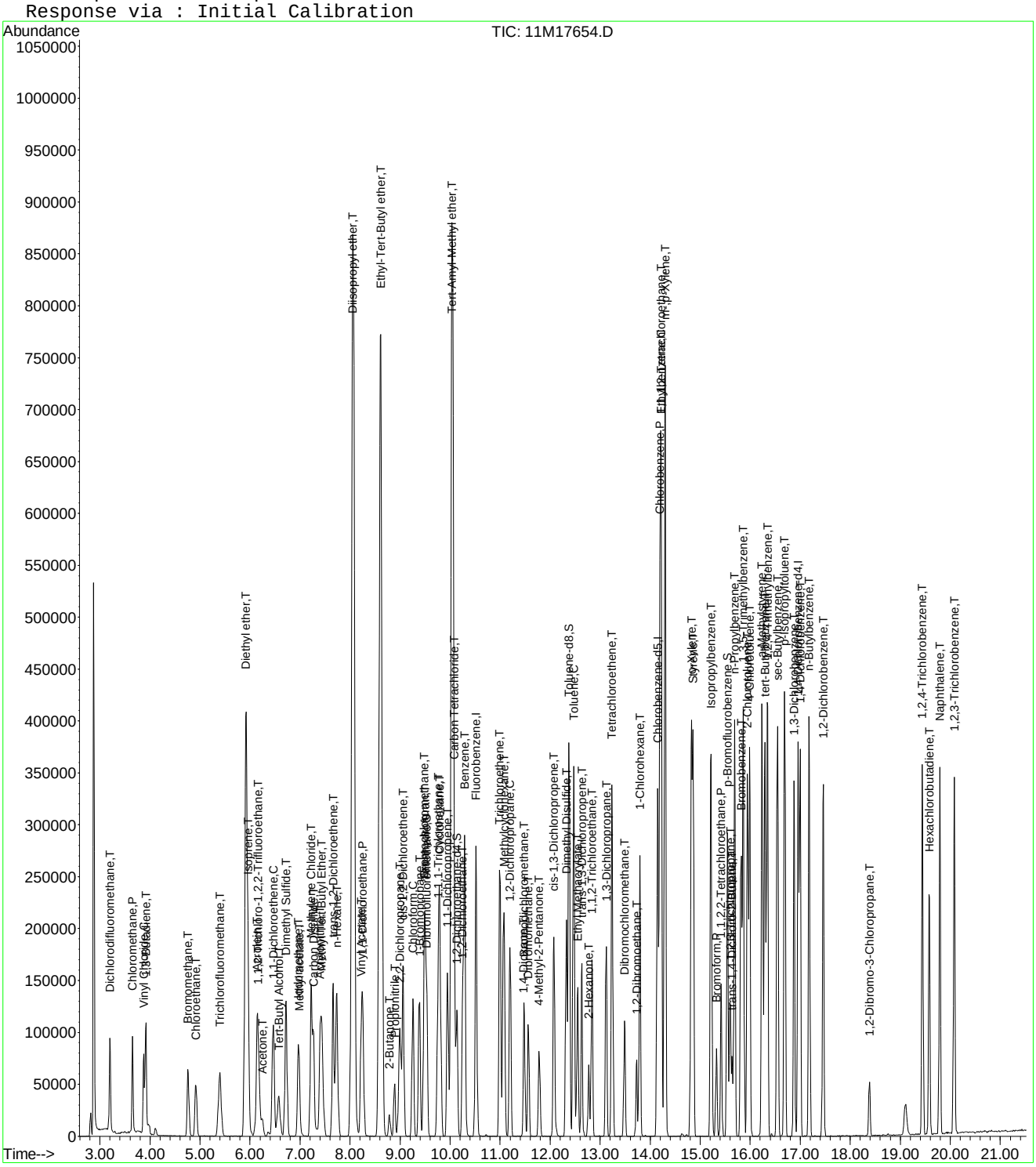
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	110574	19.6700	ug/L	99
45)	Benzene	10.29	78	319621	20.4671	ug/L	96
46)	Trichloroethene	10.99	130	112118	27.1165	ug/L	96
47)	Methylcyclohexane	11.07	83	130150	20.4259	ug/L	96
48)	1,2-Dichloropropane	11.20	63	98086	20.4033	ug/L	96
49)	1,4-Dioxane	11.47	88	9694	220.1598	ug/L	87
50)	Bromodichloromethane	11.48	83	99314	19.7057	ug/L	99
51)	Dibromomethane	11.56	93	47954	21.1537	ug/L	93
53)	4-Methyl-2-Pentanone	11.78	58	32732	19.3953	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	132659	22.6255	ug/L	100
55)	Dimethyl Disulfide	12.32	79	72720	21.1219	ug/L	87
58)	Toluene	12.47	91	332470	19.8452	ug/L	97
59)	Ethyl Methacrylate	12.55	69	99726	23.1299	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	107881	20.8484	ug/L	98
61)	1,1,2-Trichloroethane	12.83	97	69359	19.6794	ug/L	98
62)	2-Hexanone	12.77	43	59719	22.2991	ug/L	100
63)	1,3-Dichloropropane	13.12	76	122190	20.9522	ug/L	93
64)	Tetrachloroethene	13.23	164	112376	31.4864	ug/L	94
65)	Dibromochloromethane	13.48	129	77686	20.3351	ug/L	98
66)	1,2-Dibromoethane	13.73	107	61177	19.7177	ug/L	98
67)	1-Chlorohexane	13.79	91	104292	22.7370	ug/L	95
68)	Chlorobenzene	14.20	112	217604	20.8312	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	77622	20.4350	ug/L	100
70)	Ethylbenzene	14.22	106	120287	20.7256	ug/L	92
71)	m-,p-Xylene	14.30	106	285545	43.4952	ug/L	89
72)	o-Xylene	14.83	106	144620	21.0895	ug/L	97
73)	Styrene	14.86	104	232655	22.9757	ug/L	92
74)	Bromoform	15.32	173	52074	17.7713	ug/L	100
75)	Isopropylbenzene	15.22	105	351752	20.7579	ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	96537	21.3047	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	26341	19.9811	ug/L	86
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22472	18.1588	ug/L	71
81)	n-Propylbenzene	15.69	91	417686	20.1612	ug/L	96
82)	Bromobenzene	15.82	156	102468	20.0357	ug/L	83
83)	1,3,5-Trimethylbenzene	15.86	105	302840	19.7660	ug/L	99
84)	2-Chlorotoluene	15.94	91	263456	18.2307	ug/L	100
85)	4-Chlorotoluene	15.99	91	261543	20.6875	ug/L	98
86)	a-Methylstyrene	16.23	118	169030	21.4249	ug/L	94
87)	tert-Butylbenzene	16.30	134	68302	19.7075	ug/L	94
88)	1,2,4-Trimethylbenzene	16.35	105	315373	20.0541	ug/L	99
89)	sec-Butylbenzene	16.54	105	383529	19.7373	ug/L	97
90)	p-Isopropyltoluene	16.69	119	338232	20.8029	ug/L	96
91)	1,3-Dichlorobenzene	16.87	146	188875	20.3937	ug/L	93
92)	1,4-Dichlorobenzene	17.00	146	191875	20.3878	ug/L	93
93)	n-Butylbenzene	17.17	91	301150	21.4740	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	190305	20.3205	ug/L	94
95)	1,2-Dibromo-3-Chloropropan	18.38	75	16524	21.1205	ug/L	85
96)	1,2,4-Trichlorobenzene	19.44	180	145247	21.2942	ug/L	95
97)	Hexachlorobutadiene	19.58	225	71865	20.7595	ug/L	96
98)	Naphthalene	19.79	128	333454	22.5103	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	143038	20.8720	ug/L	95

(#) = qualifier out of range (m) = manual integration
11M17654.D 8260WTR.M Fri Apr 21 19:23:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17654.D Vial: 6
Acq On : 21 Apr 2017 19:01 Operator: JDS
Sample : L17041069-34 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 19:23 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17663.D Vial: 15
Acq On : 21 Apr 2017 22:56 Operator: JDS
Sample : L17041069-35 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:07 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

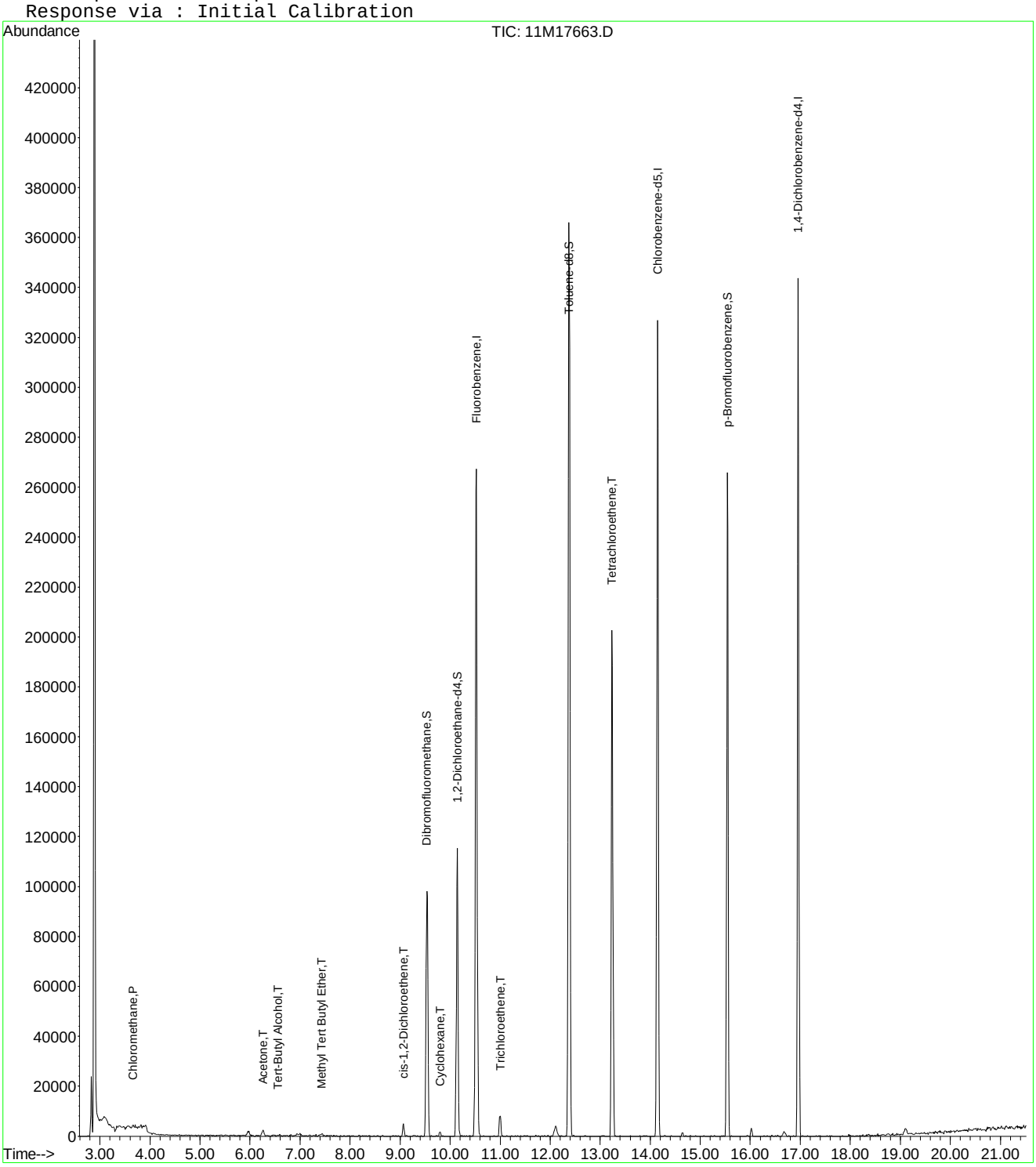
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	324152	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	228397	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	117005	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82206	24.4412	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.76%			
43) 1,2-Dichloroethane-d4	10.14	65	96434	25.3120	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.24%			
57) Toluene-d8	12.38	98	317867	25.5650	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.28%			
78) p-Bromofluorobenzene	15.54	95	111443	25.6272	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.52%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	995	0.1853	ug/L #	1
13) Acetone	6.26	43	4450	4.0226	ug/L	91
15) Tert-Butyl Alcohol	6.56	59	234	0.5911	ug/L #	62
22) Methyl Tert Butyl Ether	7.42	73	1975	0.1872	ug/L #	47
32) cis-1,2-Dichloroethene	9.07	96	2849	0.6591	ug/L	76
39) Cyclohexane	9.80	56	1447	0.1845	ug/L #	84
46) Trichloroethene	11.00	130	4373	1.0776	ug/L	91
64) Tetrachloroethene	13.23	164	65427	18.8732	ug/L	97

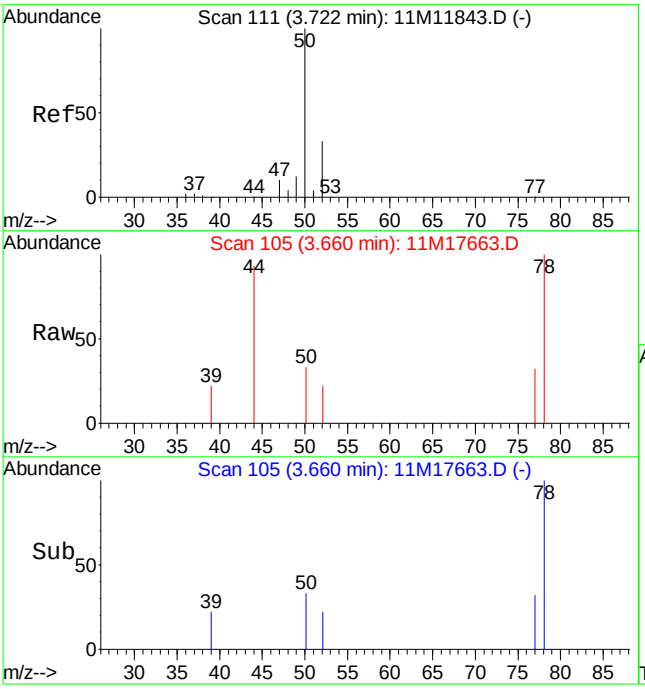
(#) = qualifier out of range (m) = manual integration
11M17663.D 8260WTR.M Tue Apr 25 13:52:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17663.D Vial: 15
Acq On : 21 Apr 2017 22:56 Operator: JDS
Sample : L17041069-35 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

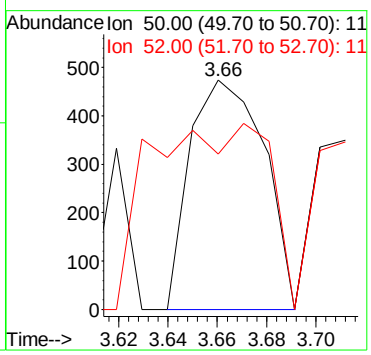


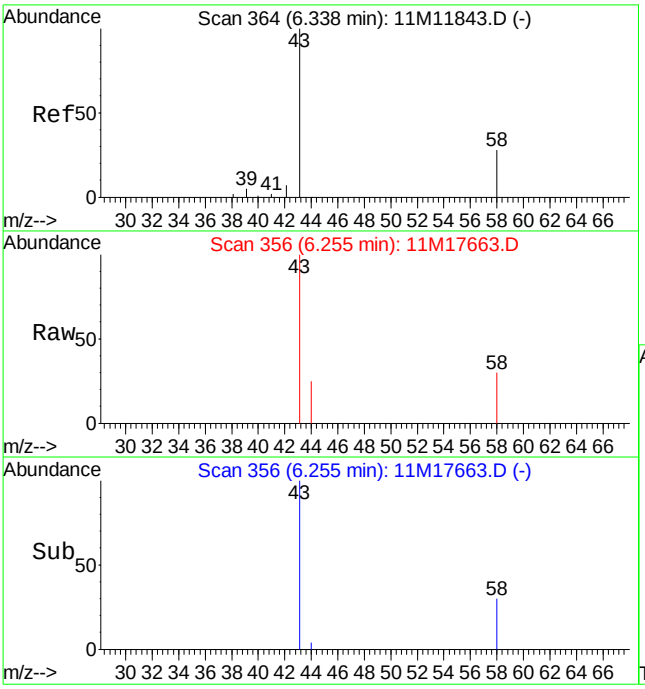


#3
Chloromethane
Concen: 0.19 ug/L
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 50 Resp: 995

Ion	Ratio	Lower	Upper
50	100		
52	130.4	20.3	47.3#

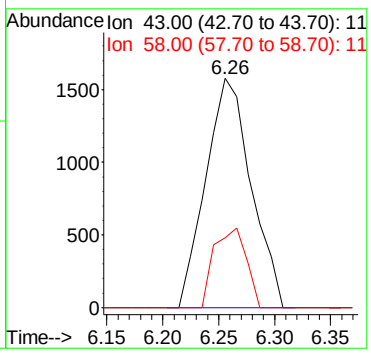


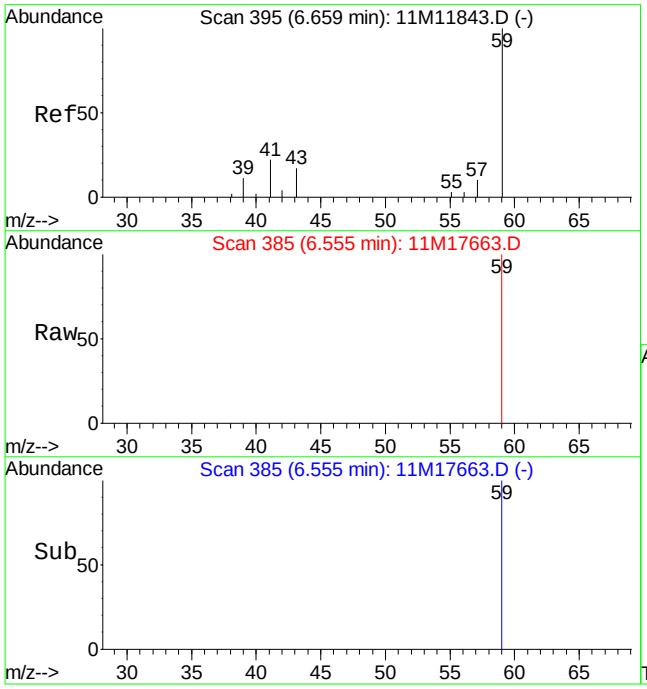


#13
Acetone
Concen: 4.02 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 43 Resp: 4450

Ion	Ratio	Lower	Upper
43	100		
58	24.5	17.5	40.7

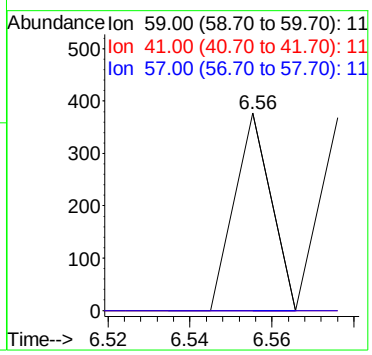


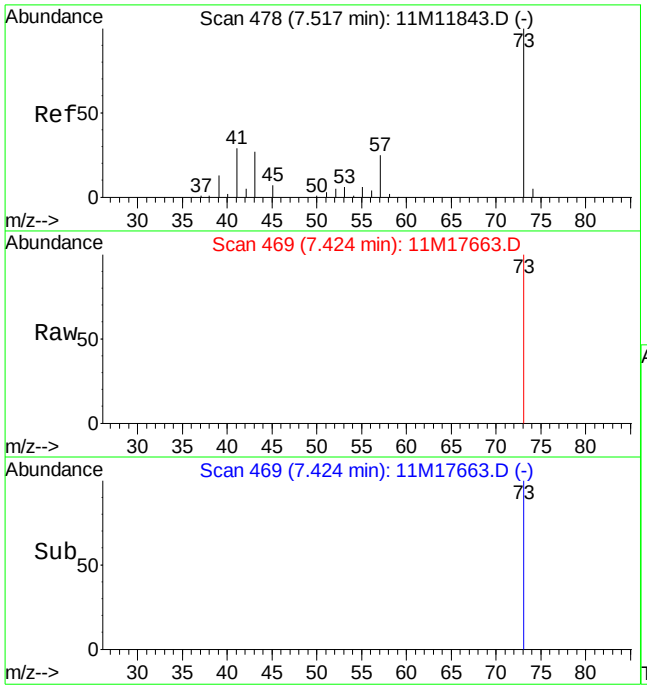


#15
Tert-Butyl Alcohol
Concen: 0.59 ug/L
RT: 6.56 min Scan# 385
Delta R.T. -0.02 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 59 Resp: 234

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

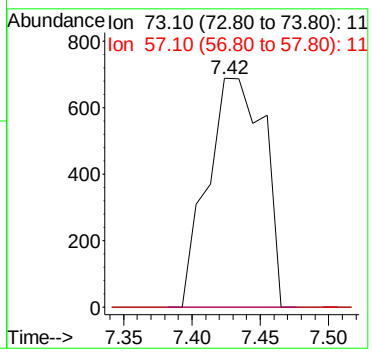


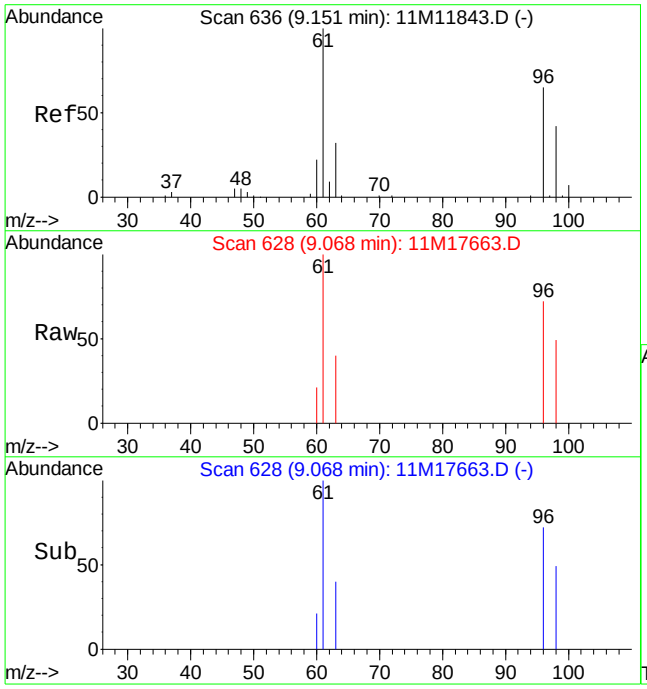


#22
Methyl Tert Butyl Ether
Concen: 0.19 ug/L
RT: 7.42 min Scan# 469
Delta R.T. -0.01 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 73 Resp: 1975

Ion	Ratio	Lower	Upper
73	100		
57	0.0	16.9	39.3#

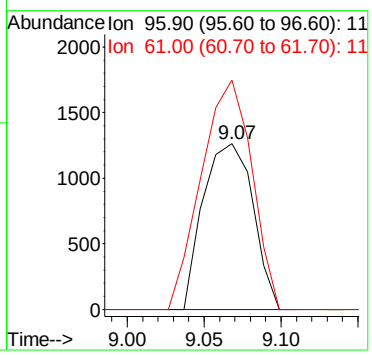


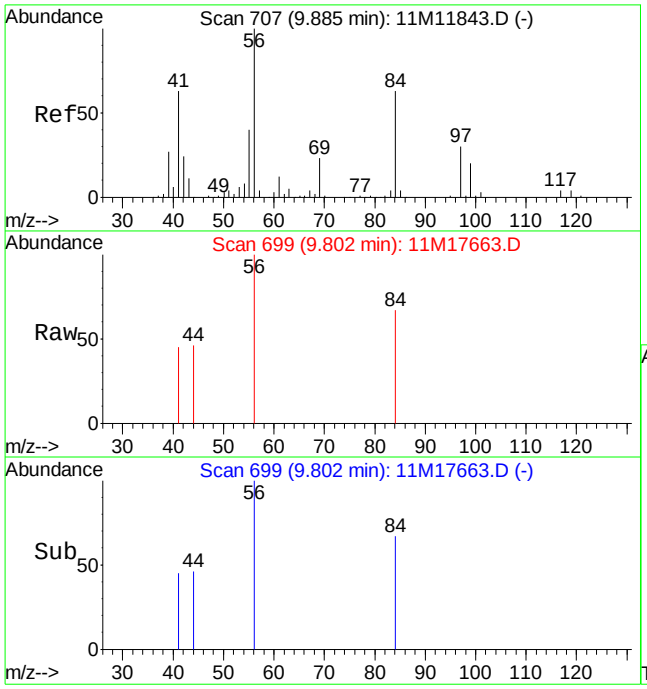


#32
cis-1,2-Dichloroethene
Concen: 0.66 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.01 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 96 Resp: 2849

Ion	Ratio	Lower	Upper
96	100		
61	140.5	104.6	244.2

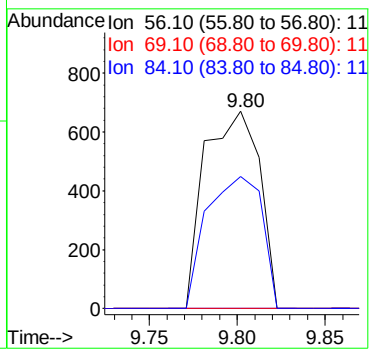


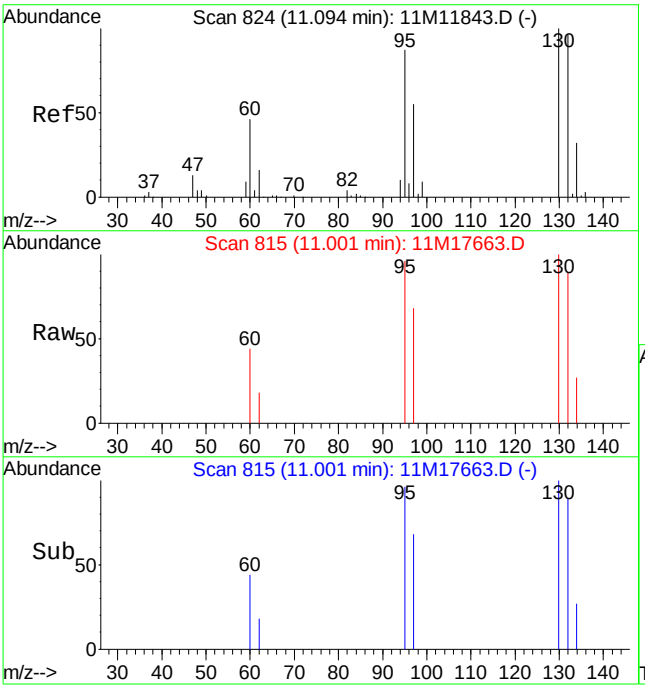


#39
Cyclohexane
Concen: 0.18 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion: 56 Resp: 1447

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.5	36.1#
84	67.5	41.7	97.3

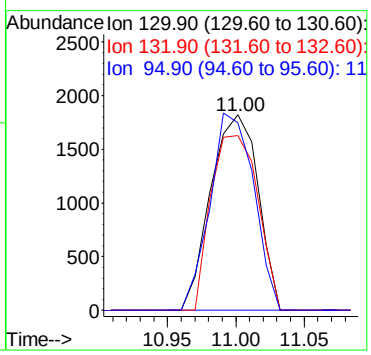


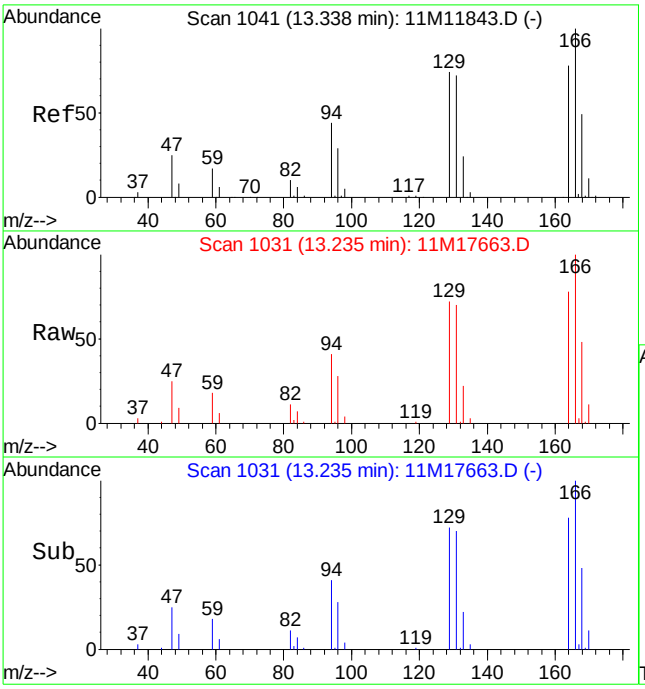


#46
Trichloroethene
Concen: 1.08 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion:130 Resp: 4373

Ion	Ratio	Lower	Upper
130	100		
132	88.8	57.8	134.8
95	93.4	62.3	145.5

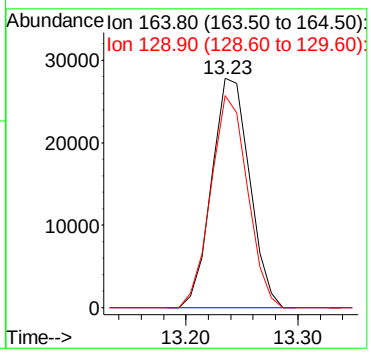




#64
Tetrachloroethene
Concen: 18.87 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17663.D
Acq: 21 Apr 2017 22:56

Tgt Ion:164 Resp: 65427

Ion	Ratio	Lower	Upper
164	100		
129	89.5	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17664.D Vial: 16
Acq On : 21 Apr 2017 23:25 Operator: JDS
Sample : L17041069-36 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:10 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

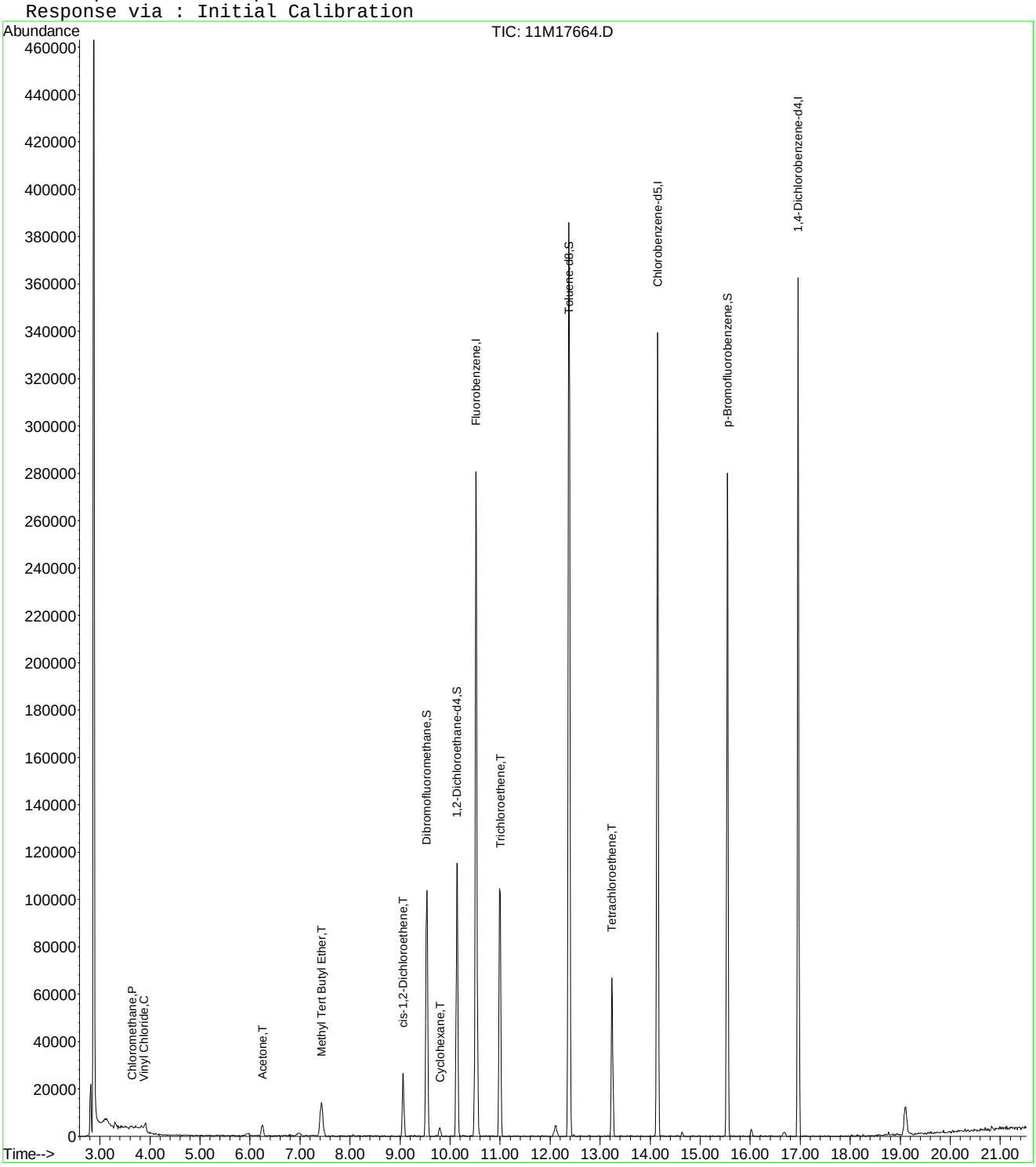
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	334965	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	236089	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	121277	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84555	24.3281	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.32%			
43) 1,2-Dichloroethane-d4	10.13	65	98646	25.0568	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.24%			
57) Toluene-d8	12.38	98	332367	25.8603	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.44%			
78) p-Bromofluorobenzene	15.54	95	118207	26.2252	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.92%			
Target Compounds						Qvalue
3) Chloromethane	3.64	50	1789	0.3224	ug/L #	50
4) Vinyl Chloride	3.88	62	549	0.1298	ug/L #	42
13) Acetone	6.25	43	9181	8.0314	ug/L	94
22) Methyl Tert Butyl Ether	7.42	73	28559	2.6194	ug/L	96
32) cis-1,2-Dichloroethene	9.06	96	14825	3.3188	ug/L	80
39) Cyclohexane	9.80	56	3623	0.4470	ug/L #	88
46) Trichloroethene	11.00	130	47148	11.2430	ug/L	95
64) Tetrachloroethene	13.23	164	22390	6.2482	ug/L	93

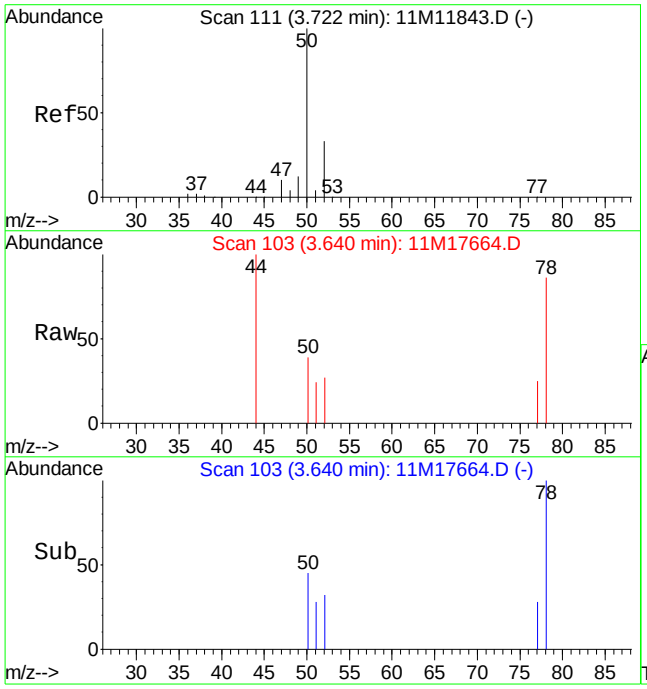
(#) = qualifier out of range (m) = manual integration
11M17664.D 8260WTR.M Tue Apr 25 13:52:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17664.D Vial: 16
Acq On : 21 Apr 2017 23:25 Operator: JDS
Sample : L17041069-36 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

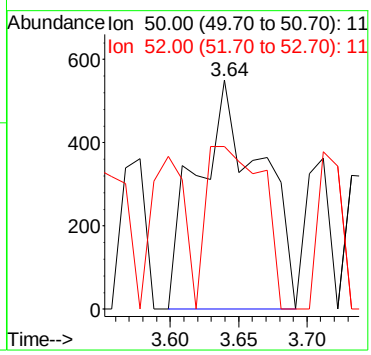


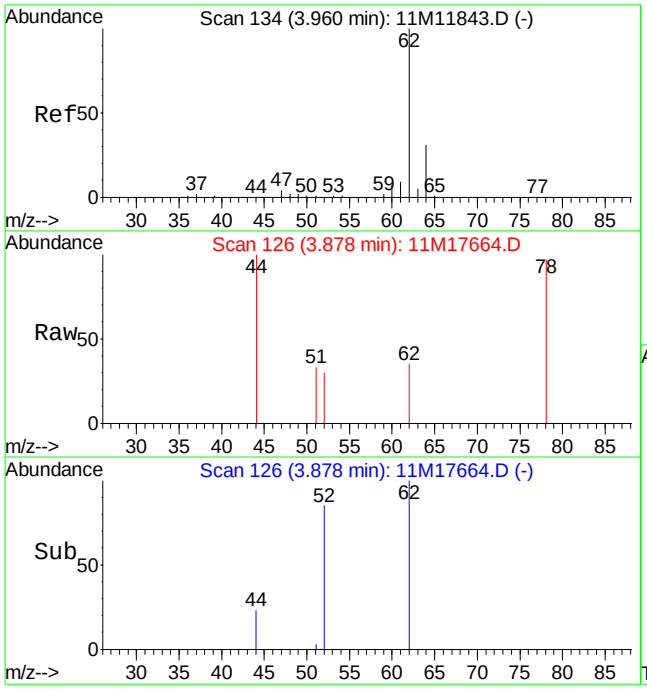


#3
Chloromethane
Concen: 0.32 ug/L
RT: 3.64 min Scan# 103
Delta R.T. -0.02 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 50 Resp: 1789

Ion	Ratio	Lower	Upper
50	100		
52	62.3	20.3	47.3#

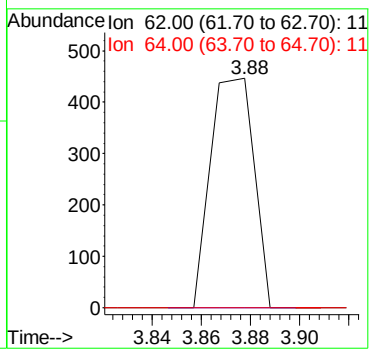


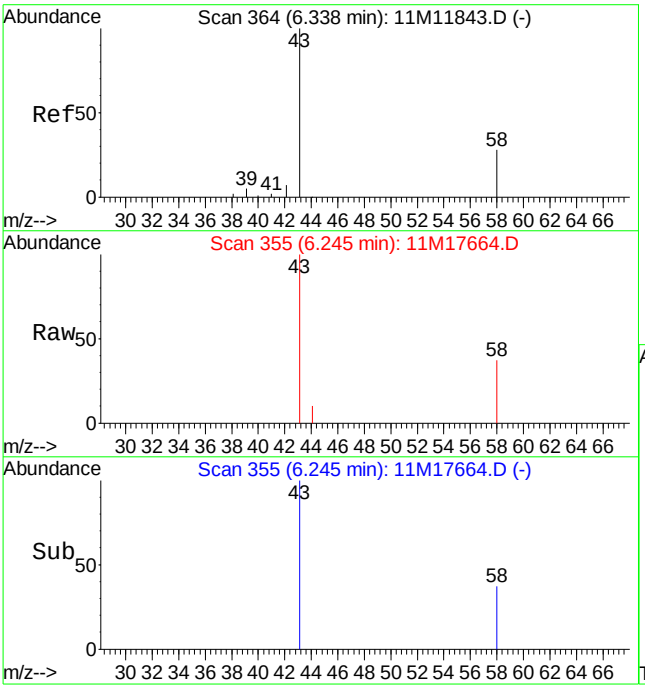


#4
Vinyl Chloride
Concen: 0.13 ug/L
RT: 3.88 min Scan# 126
Delta R.T. 0.00 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 62 Resp: 549

Ion	Ratio	Lower	Upper
62	100		
64	0.0	19.3	45.1#

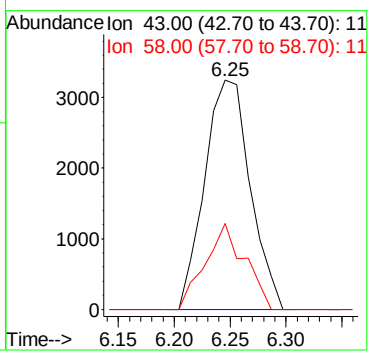


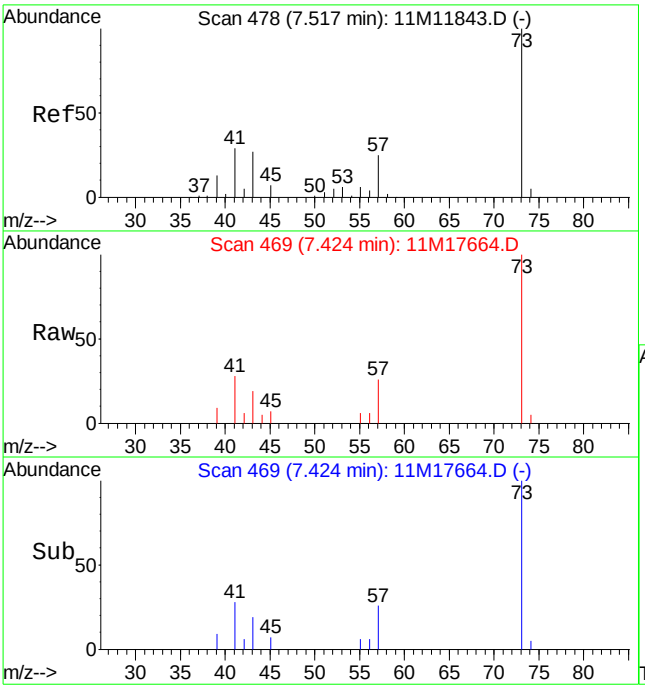


#13
Acetone
Concen: 8.03 ug/L
RT: 6.25 min Scan# 355
Delta R.T. 0.00 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 43 Resp: 9181

Ion	Ratio	Lower	Upper
43	100		
58	32.4	17.5	40.7

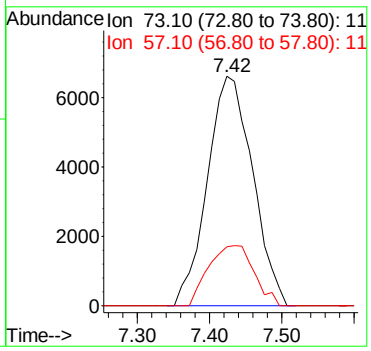


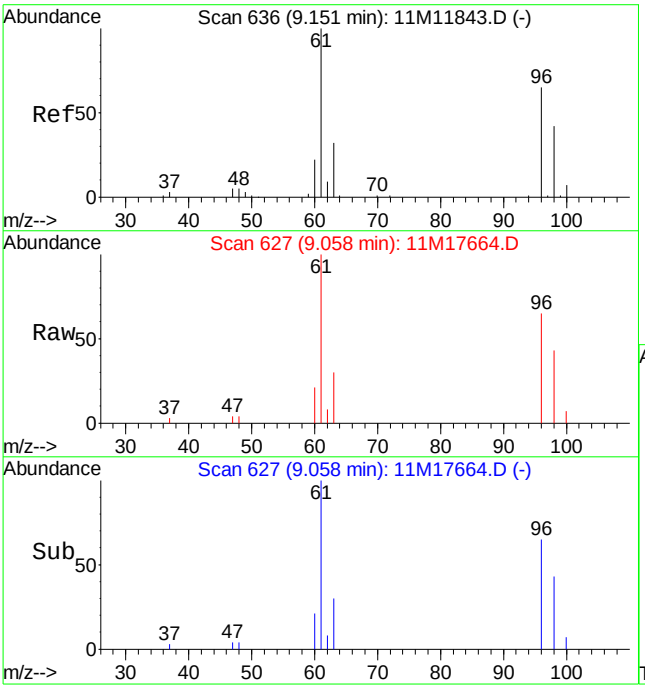


#22
Methyl Tert Butyl Ether
Concen: 2.62 ug/L
RT: 7.42 min Scan# 469
Delta R.T. -0.01 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 73 Resp: 28559

Ion	Ratio	Lower	Upper
73	100		
57	26.2	16.9	39.3

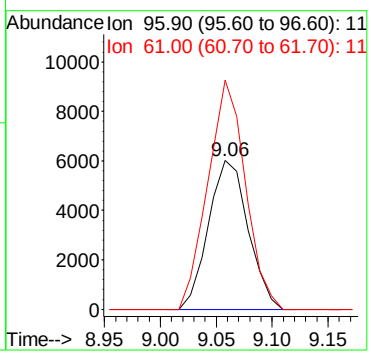


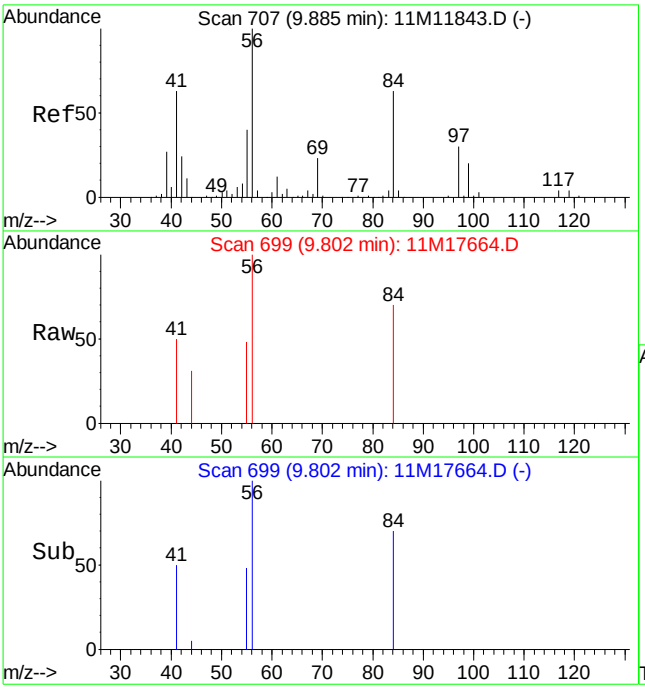


#32
cis-1,2-Dichloroethene
Concen: 3.32 ug/L
RT: 9.06 min Scan# 627
Delta R.T. 0.00 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 96 Resp: 14825

Ion	Ratio	Lower	Upper
96	100		
61	146.2	104.6	244.2

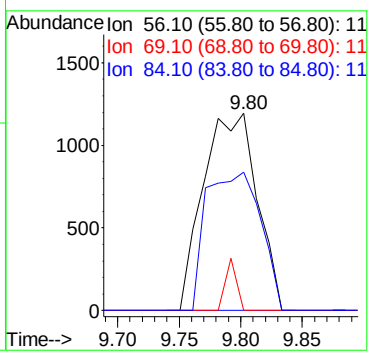


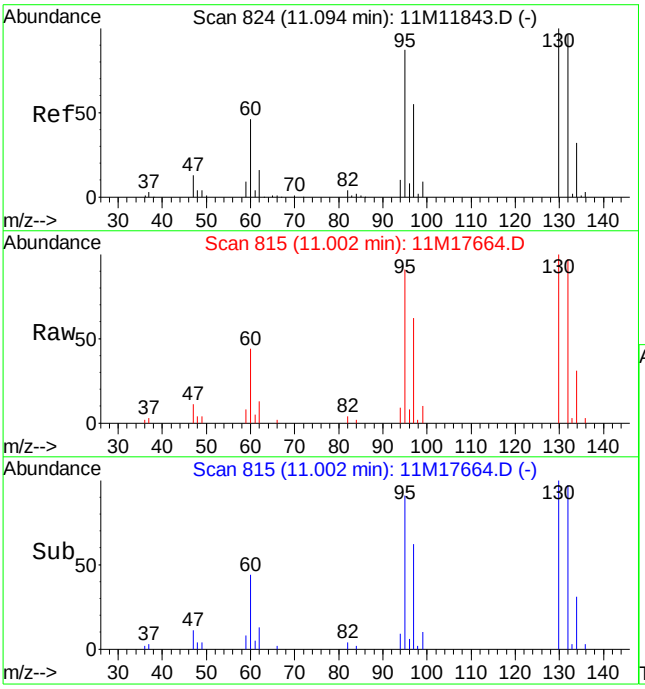


#39
Cyclohexane
Concen: 0.45 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion: 56 Resp: 3623

Ion	Ratio	Lower	Upper
56	100		
69	5.4	15.5	36.1#
84	71.1	41.7	97.3

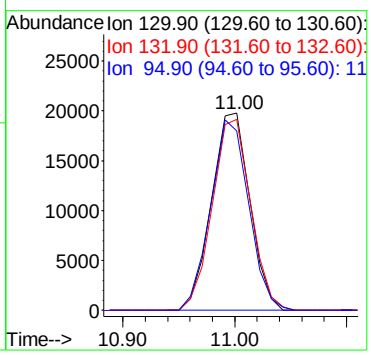


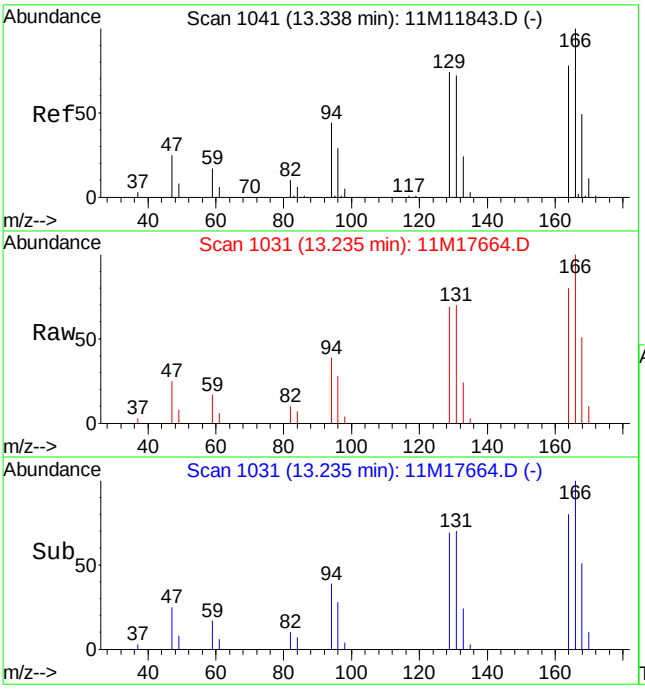


#46
Trichloroethene
Concen: 11.24 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion:130 Resp: 47148

Ion	Ratio	Lower	Upper
130	100		
132	97.0	57.8	134.8
95	95.5	62.3	145.5

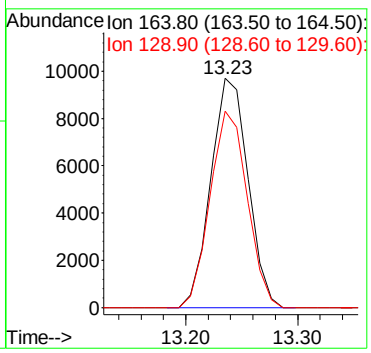




#64
Tetrachloroethene
Concen: 6.25 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17664.D
Acq: 21 Apr 2017 23:25

Tgt Ion:164 Resp: 22390

Ion	Ratio	Lower	Upper
164	100		
129	85.7	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17665.D Vial: 17
Acq On : 21 Apr 2017 23:54 Operator: JDS
Sample : L17041069-37 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:12 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

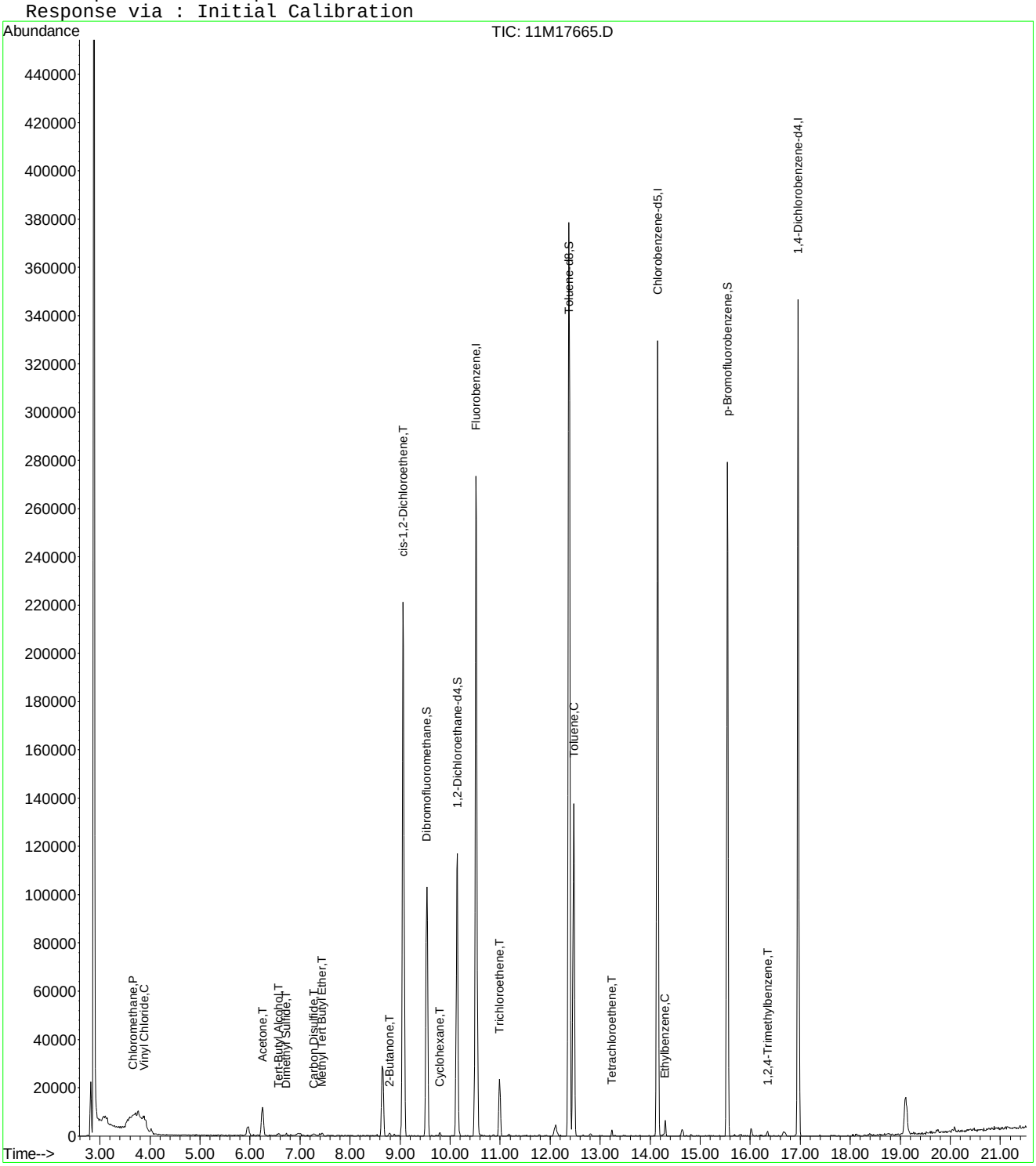
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	326613	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	230018	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	115796	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83722	24.7044	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.80%			
43) 1,2-Dichloroethane-d4	10.14	65	98354	25.6214	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.48%			
57) Toluene-d8	12.38	98	326541	26.0776	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.32%			
78) p-Bromofluorobenzene	15.54	95	117339	27.2648	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.04%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	2002	0.3700	ug/L	79
4) Vinyl Chloride	3.89	62	1537	0.3727	ug/L #	42
13) Acetone	6.25	43	22909	20.5529	ug/L	90
15) Tert-Butyl Alcohol	6.57	59	2324	5.8263	ug/L #	62
16) Dimethyl Sulfide	6.72	62	690	0.1517	ug/L #	34
20) Carbon Disulfide	7.27	76	1218	0.1201	ug/L #	73
22) Methyl Tert Butyl Ether	7.43	73	3303	0.3107	ug/L #	58
29) 2-Butanone	8.79	43	2120	1.1732	ug/L #	55
32) cis-1,2-Dichloroethene	9.06	96	120404	27.6435	ug/L	82
39) Cyclohexane	9.79	56	1673	0.2117	ug/L #	65
46) Trichloroethene	10.99	130	1019	0.2492	ug/L #	1
58) Toluene	12.47	91	127679	7.7909	ug/L	95
64) Tetrachloroethene	13.23	164	784	0.2246	ug/L	91
70) Ethylbenzene	14.29	106	721	0.1270	ug/L	94
88) 1,2,4-Trimethylbenzene	16.35	105	2060	0.1483	ug/L	99

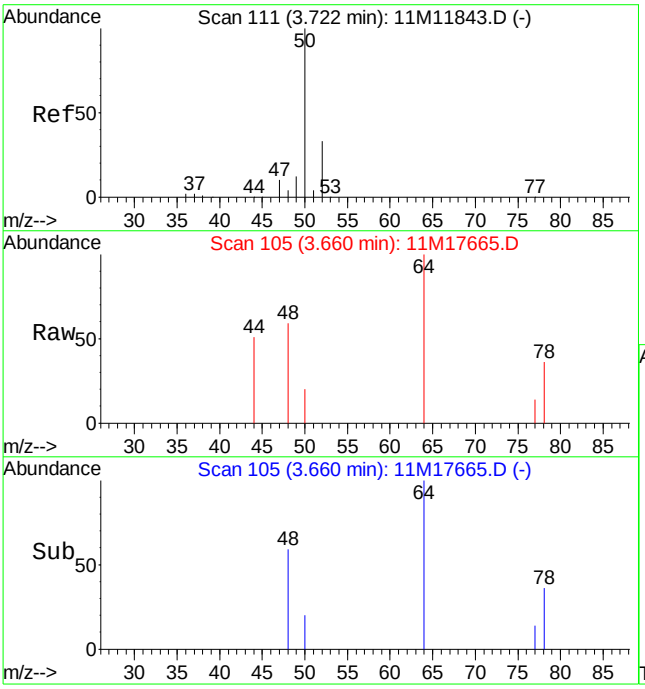
(#) = qualifier out of range (m) = manual integration
11M17665.D 8260WTR.M Tue Apr 25 13:52:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17665.D Vial: 17
Acq On : 21 Apr 2017 23:54 Operator: JDS
Sample : L17041069-37 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

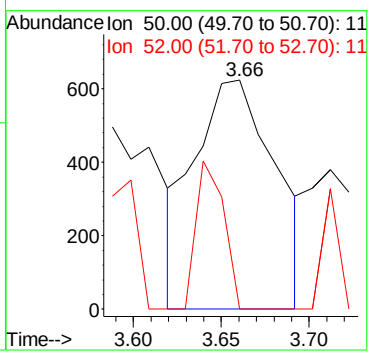


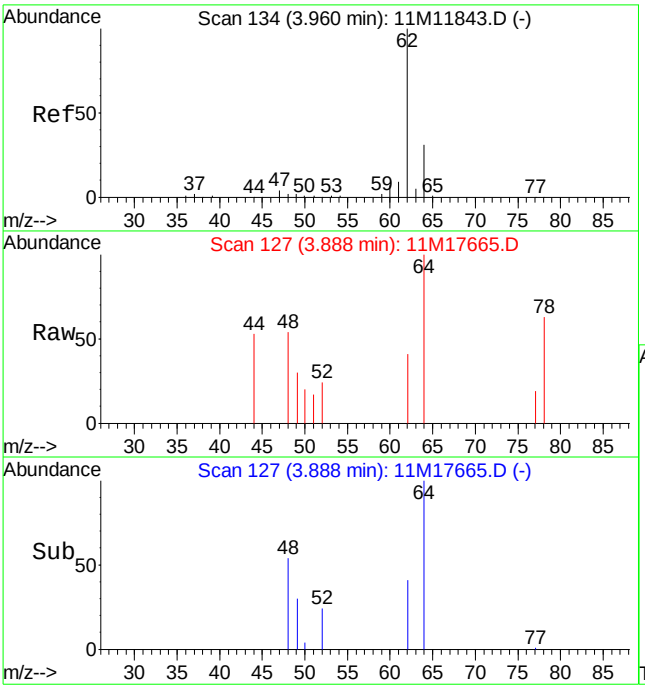


#3
Chloromethane
Concen: 0.37 ug/L
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 50 Resp: 2002

Ion	Ratio	Lower	Upper
50	100		
52	22.0	20.3	47.3

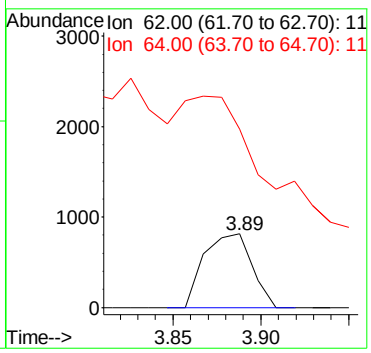


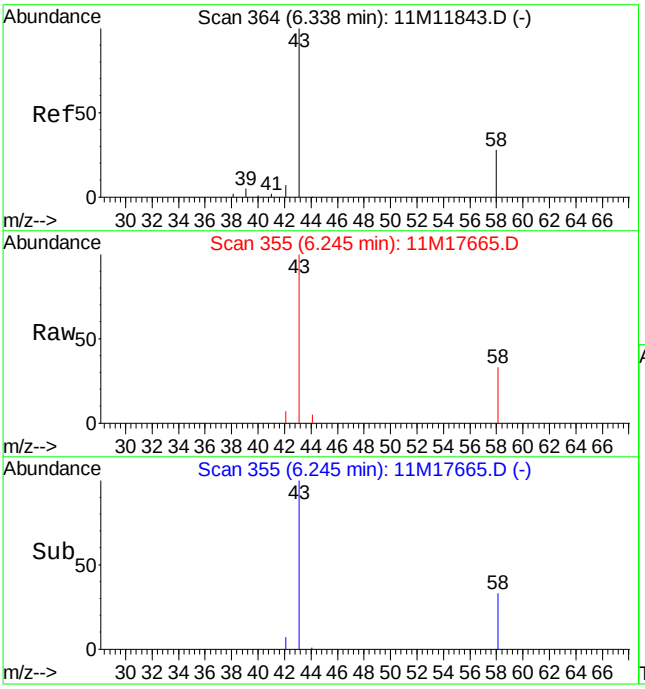


#4
Vinyl Chloride
Concen: 0.37 ug/L
RT: 3.89 min Scan# 127
Delta R.T. 0.01 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 62 Resp: 1537

Ion	Ratio	Lower	Upper
62	100		
64	0.0	19.3	45.1#

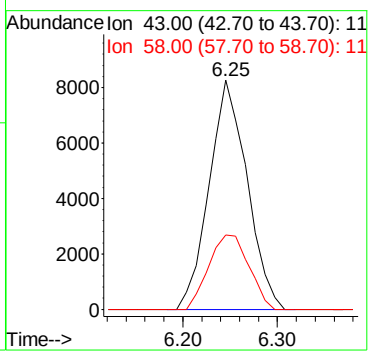


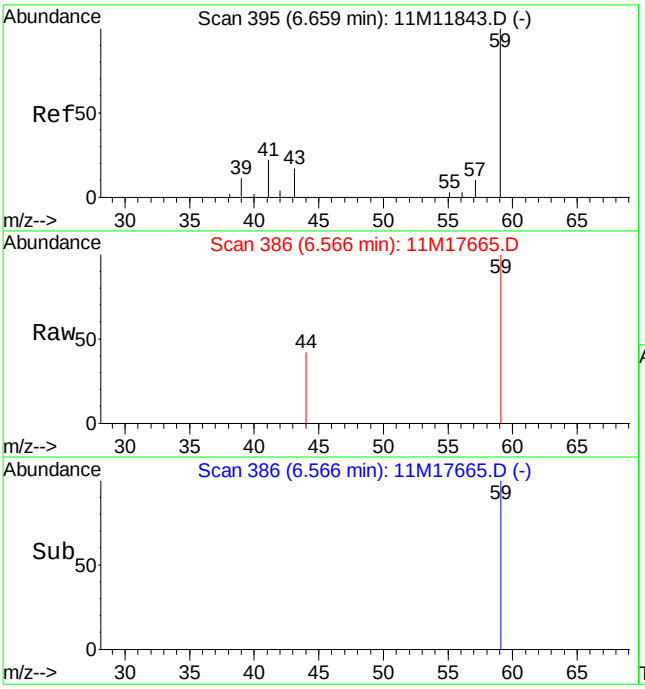


#13
Acetone
Concen: 20.55 ug/L
RT: 6.25 min Scan# 355
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 43 Resp: 22909

Ion	Ratio	Lower	Upper
43	100		
58	34.3	17.5	40.7

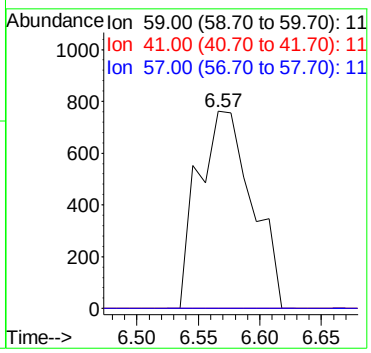


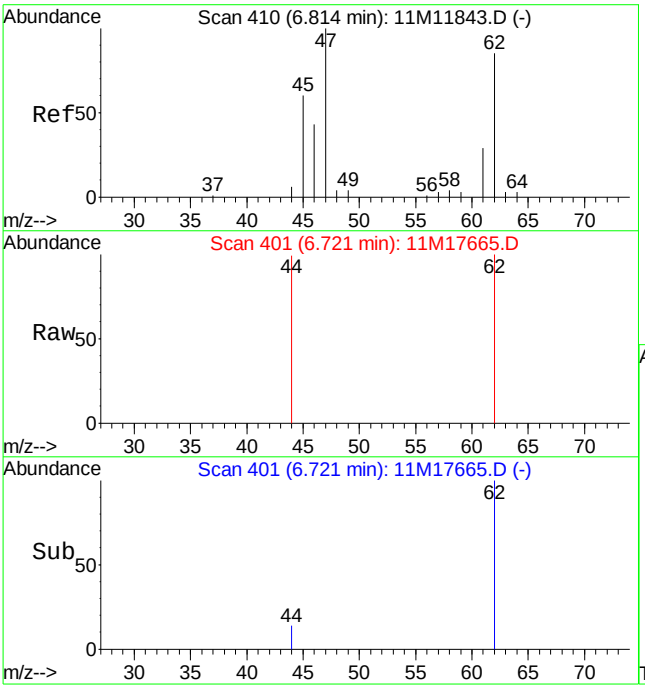


#15
Tert-Butyl Alcohol
Concen: 5.83 ug/L
RT: 6.57 min Scan# 386
Delta R.T. -0.01 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 59 Resp: 2324

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

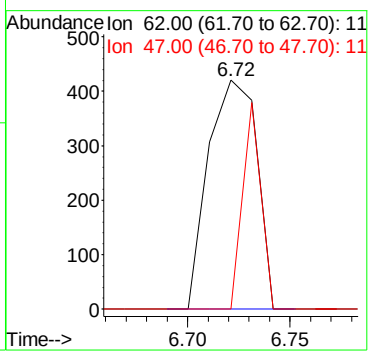


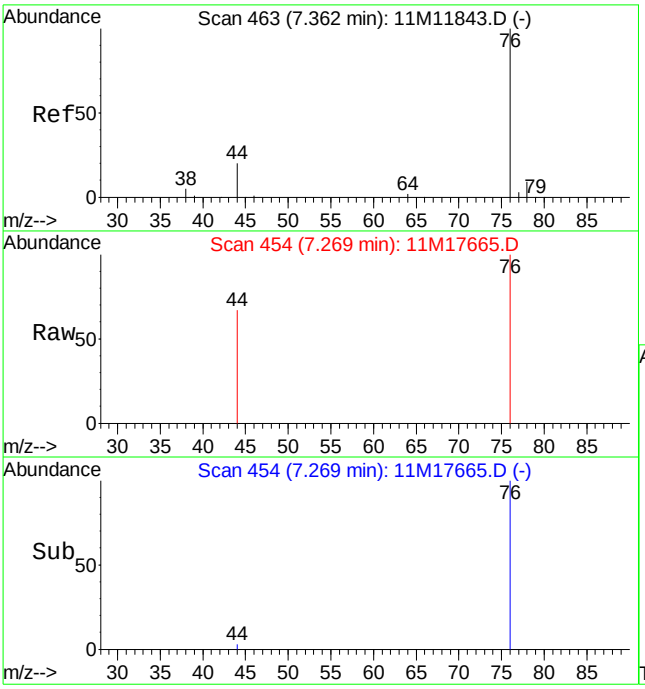


#16
Dimethyl Sulfide
Concen: 0.15 ug/L
RT: 6.72 min Scan# 401
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 62 Resp: 690

Ion	Ratio	Lower	Upper
62	100		
47	34.1	60.3	140.7#

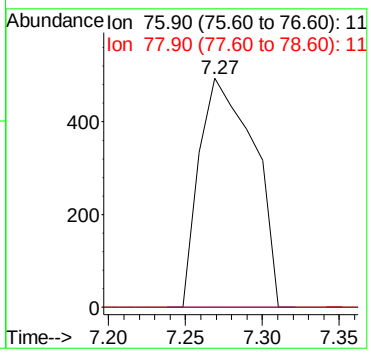


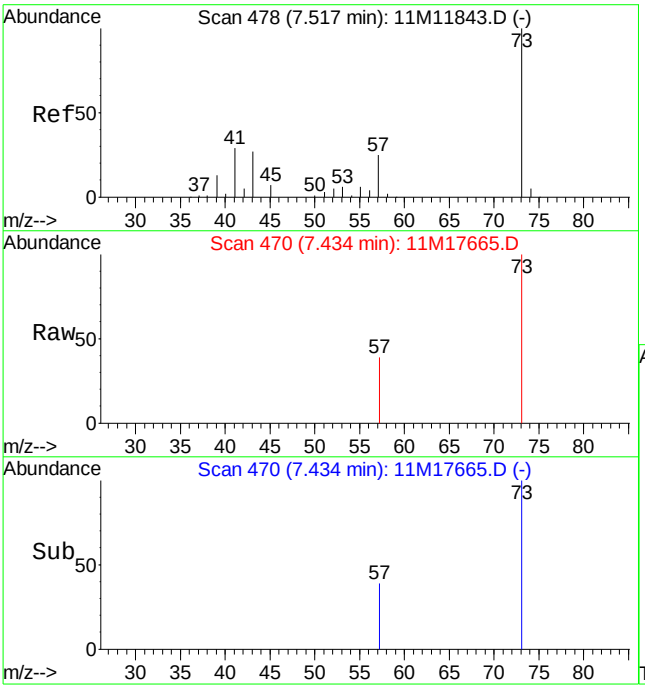


#20
Carbon Disulfide
Concen: 0.12 ug/L
RT: 7.27 min Scan# 454
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 76 Resp: 1218

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.9#

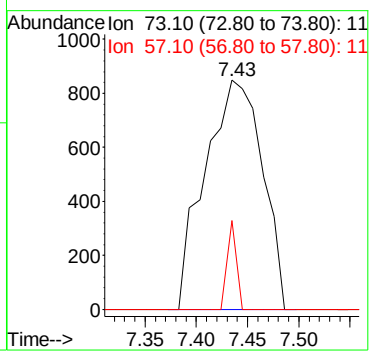


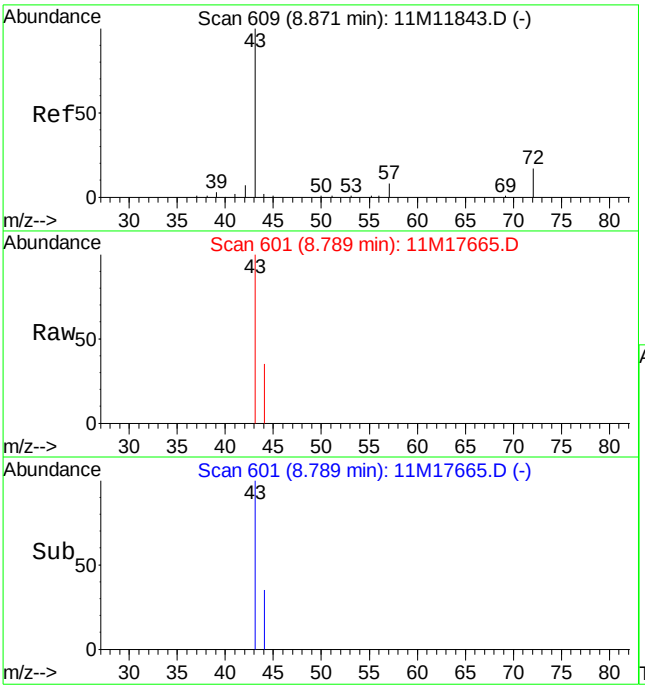


#22
Methyl Tert Butyl Ether
Concen: 0.31 ug/L
RT: 7.43 min Scan# 470
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 73 Resp: 3303

Ion	Ratio	Lower	Upper
73	100		
57	6.2	16.9	39.3#

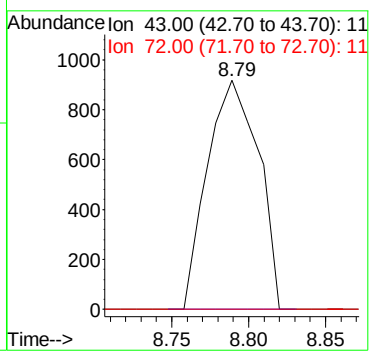


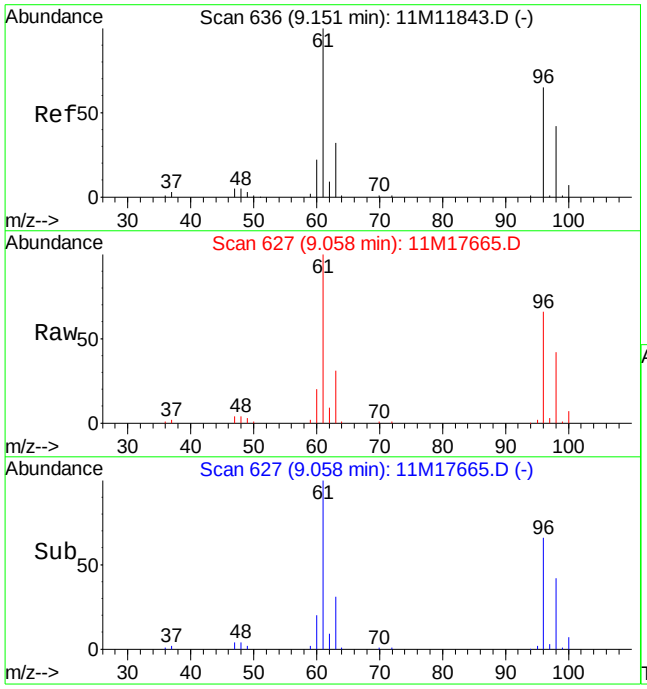


#29
2-Butanone
Concen: 1.17 ug/L
RT: 8.79 min Scan# 601
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 43 Resp: 2120

Ion	Ratio	Lower	Upper
43	100		
72	0.0	12.5	29.3#

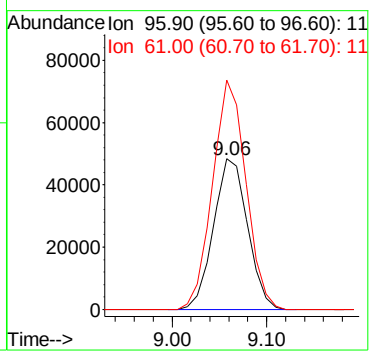


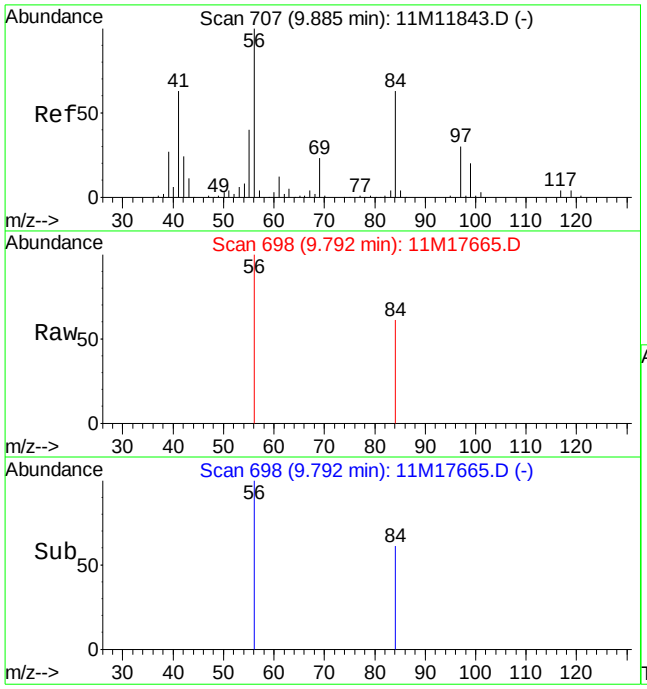


#32
cis-1,2-Dichloroethene
Concen: 27.64 ug/L
RT: 9.06 min Scan# 627
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 96 Resp: 120404

Ion	Ratio	Lower	Upper
96	100		
61	149.2	104.6	244.2

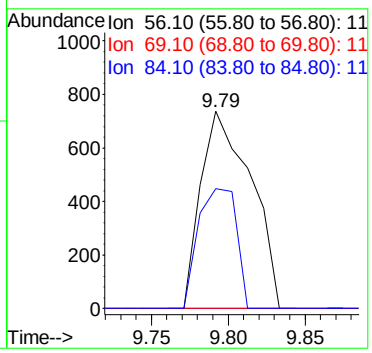


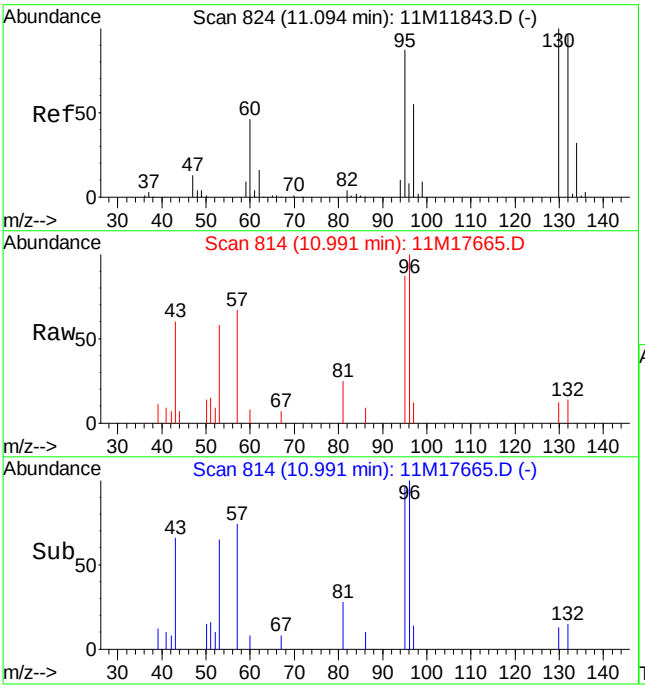


#39
Cyclohexane
Concen: 0.21 ug/L
RT: 9.79 min Scan# 698
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 56 Resp: 1673

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.5	36.1#
84	46.0	41.7	97.3

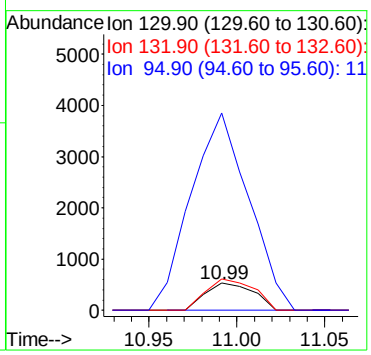


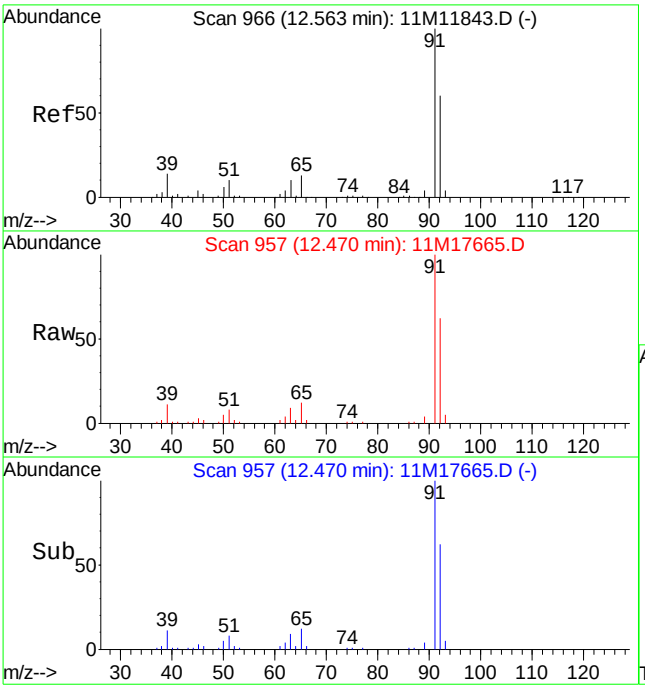


#46
Trichloroethene
Concen: 0.25 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.01 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion:130 Resp: 1019

Ion	Ratio	Lower	Upper
130	100		
132	114.1	57.8	134.8
95	867.9	62.3	145.5#

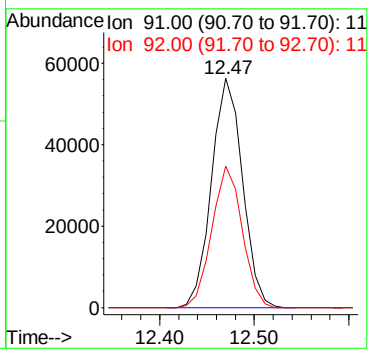


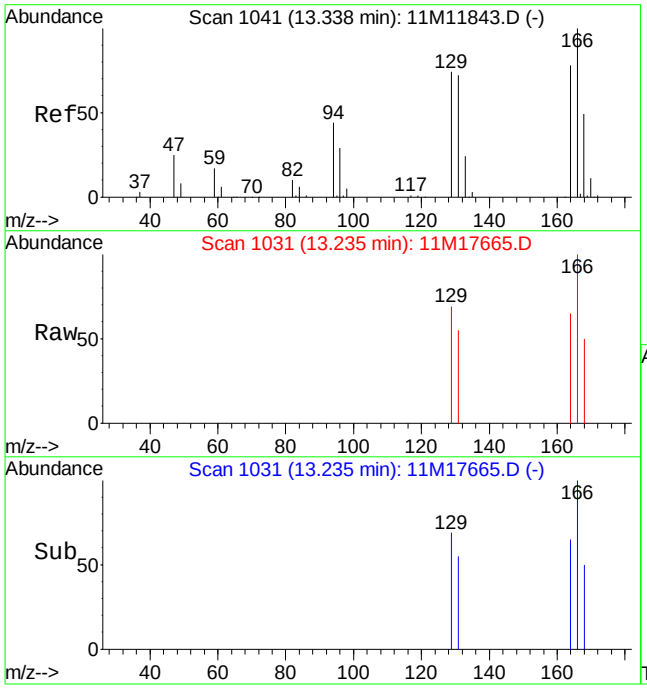


#58
Toluene
Concen: 7.79 ug/L
RT: 12.47 min Scan# 957
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion: 91 Resp: 127679

Ion	Ratio	Lower	Upper
91	100		
92	60.3	38.4	89.6

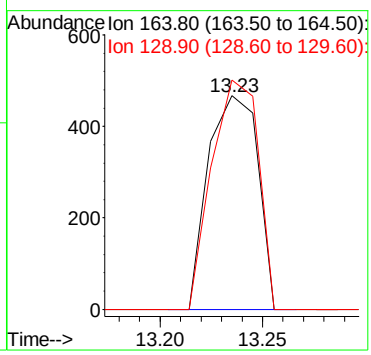


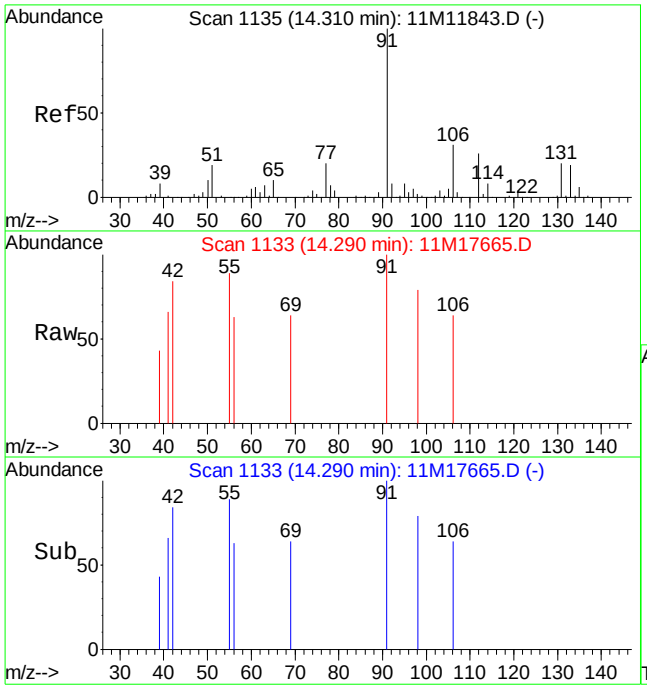


#64
Tetrachloroethene
Concen: 0.22 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion:164 Resp: 784

Ion	Ratio	Lower	Upper
164	100		
129	101.0	55.4	129.4

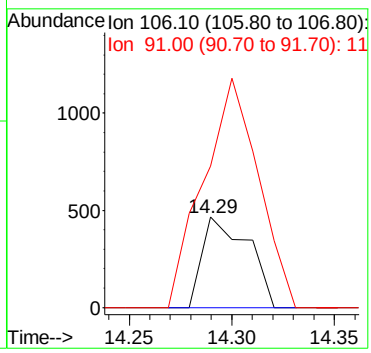


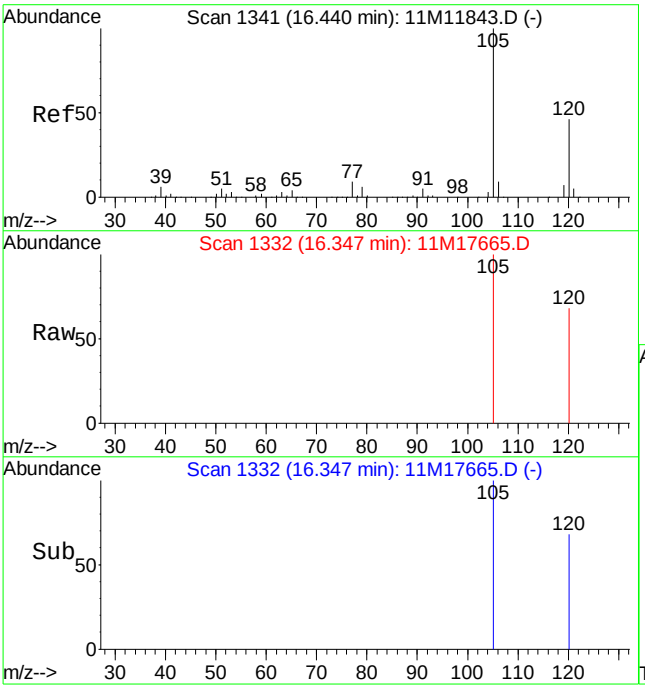


#70
Ethylbenzene
Concen: 0.13 ug/L
RT: 14.29 min Scan# 1133
Delta R.T. 0.07 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion:106 Resp: 721

Ion	Ratio	Lower	Upper
106	100		
91	304.7	175.4	409.4

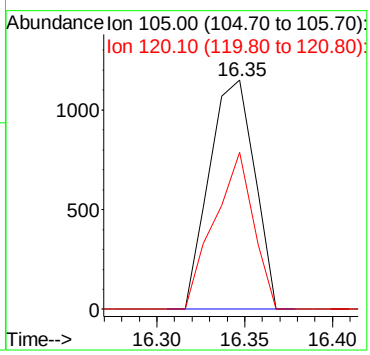




#88
1,2,4-Trimethylbenzene
Concen: 0.15 ug/L
RT: 16.35 min Scan# 1332
Delta R.T. 0.01 min
Lab File: 11M17665.D
Acq: 21 Apr 2017 23:54

Tgt Ion:105 Resp: 2060

Ion	Ratio	Lower	Upper
105	100		
120	59.2	35.3	82.3



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17666.D Vial: 18
Acq On : 22 Apr 2017 00:24 Operator: JDS
Sample : L17041069-38 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:15 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

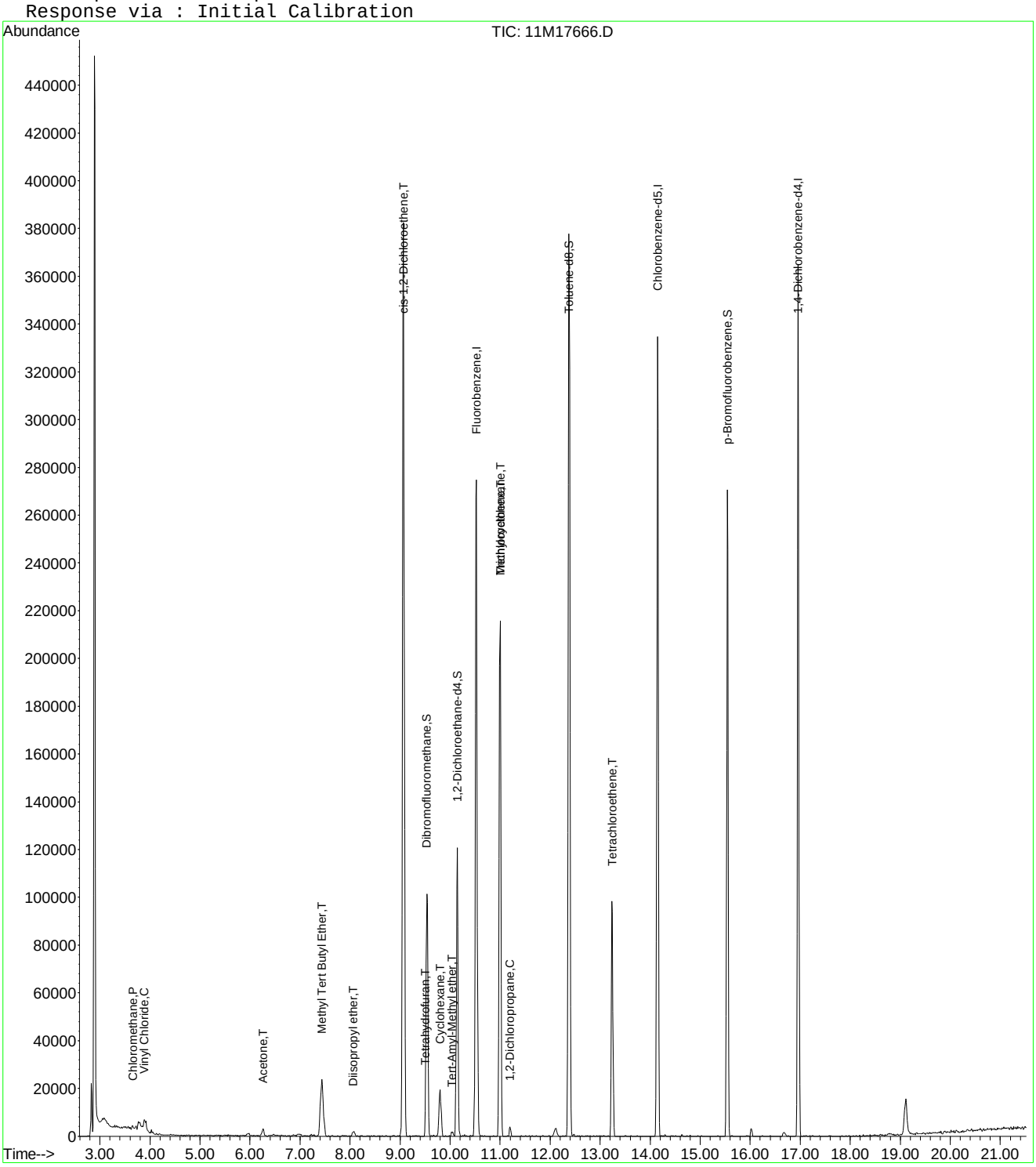
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	331044	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	234176	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	122974	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83095	24.1912	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.76%			
43) 1,2-Dichloroethane-d4	10.14	65	97737	25.1199	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.48%			
57) Toluene-d8	12.38	98	326716	25.6283	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.52%			
78) p-Bromofluorobenzene	15.54	95	114932	25.1467	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.60%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	793	0.1446	ug/L #	1
4) Vinyl Chloride	3.89	62	3493	0.8358	ug/L #	17
13) Acetone	6.26	43	6193	5.4817	ug/L	89
22) Methyl Tert Butyl Ether	7.43	73	45889	4.2588	ug/L	98
25) Diisopropyl ether	8.07	45	3905	0.2626	ug/L #	75
32) cis-1,2-Dichloroethene	9.07	96	210649	47.7155	ug/L	81
36) Tetrahydrofuran	9.50	42	691	0.5086	ug/L #	41
39) Cyclohexane	9.80	56	17178	2.1444	ug/L	96
42) Tert-Amyl-Methyl ether	10.04	73	2359	0.2151	ug/L #	61
46) Trichloroethene	11.00	130	94177	22.7236	ug/L	96
47) Methylcyclohexane	11.00	83	1043	0.1633	ug/L #	1
48) 1,2-Dichloropropane	11.20	63	2388	0.4956	ug/L #	71
64) Tetrachloroethene	13.25	164	32006	9.0047	ug/L	98

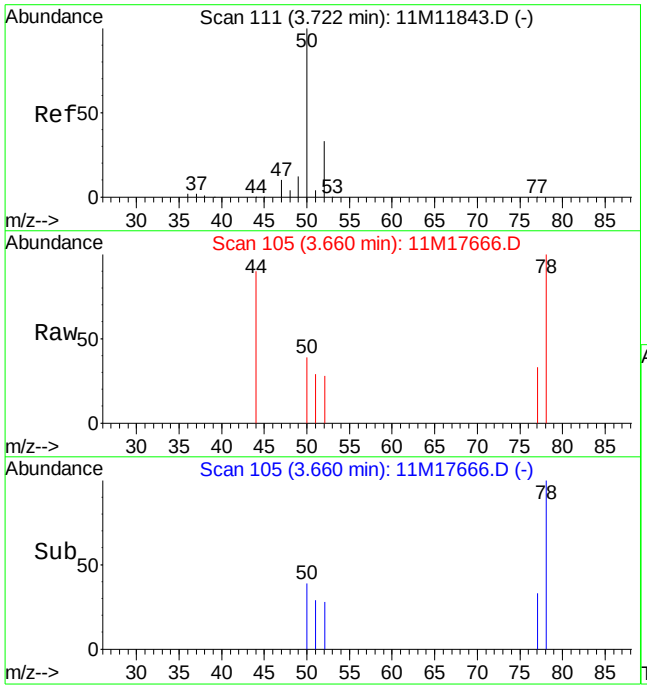
(#) = qualifier out of range (m) = manual integration
11M17666.D 8260WTR.M Tue Apr 25 13:52:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17666.D Vial: 18
Acq On : 22 Apr 2017 00:24 Operator: JDS
Sample : L17041069-38 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

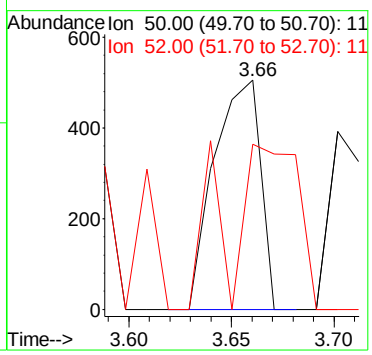


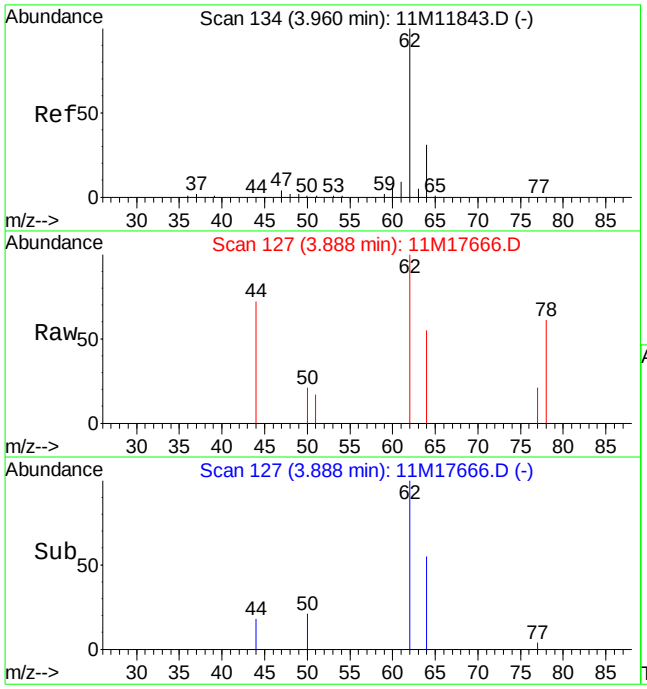


#3
Chloromethane
Concen: 0.14 ug/L
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 50 Resp: 793

Ion	Ratio	Lower	Upper
50	100		
52	111.0	20.3	47.3#

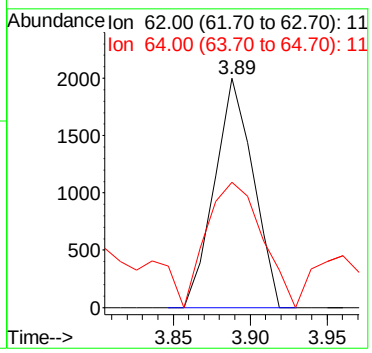


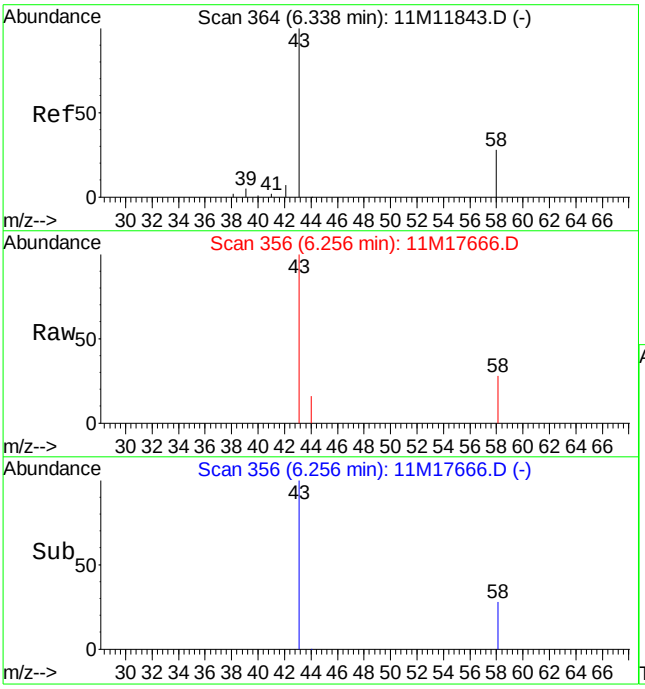


#4
Vinyl Chloride
Concen: 0.84 ug/L
RT: 3.89 min Scan# 127
Delta R.T. 0.01 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 62 Resp: 3493

Ion	Ratio	Lower	Upper
62	100		
64	78.3	19.3	45.1#

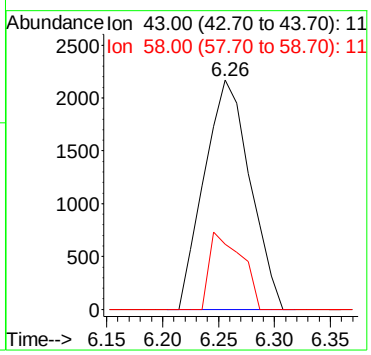


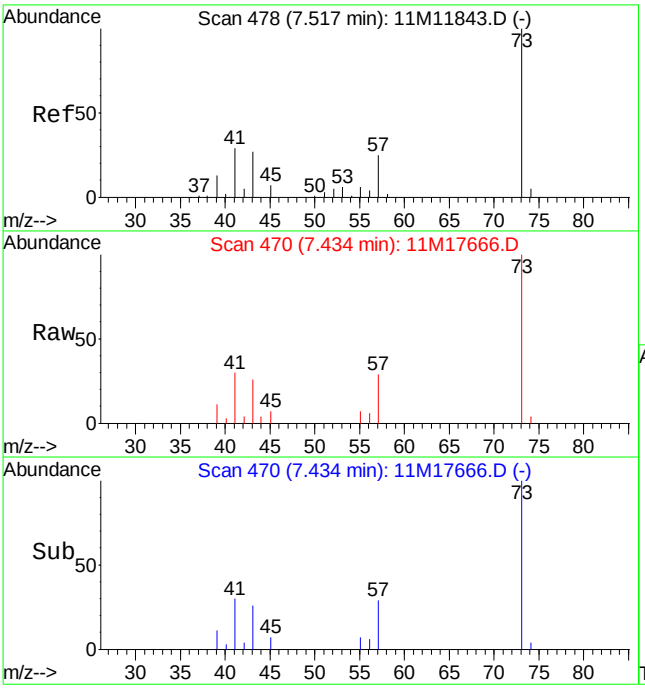


#13
Acetone
Concen: 5.48 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 43 Resp: 6193

Ion	Ratio	Lower	Upper
43	100		
58	23.4	17.5	40.7

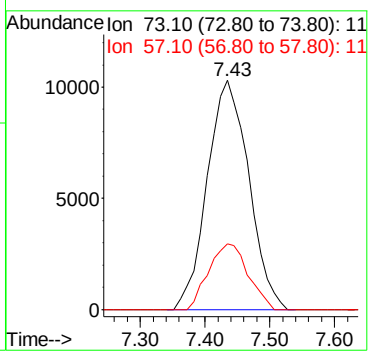


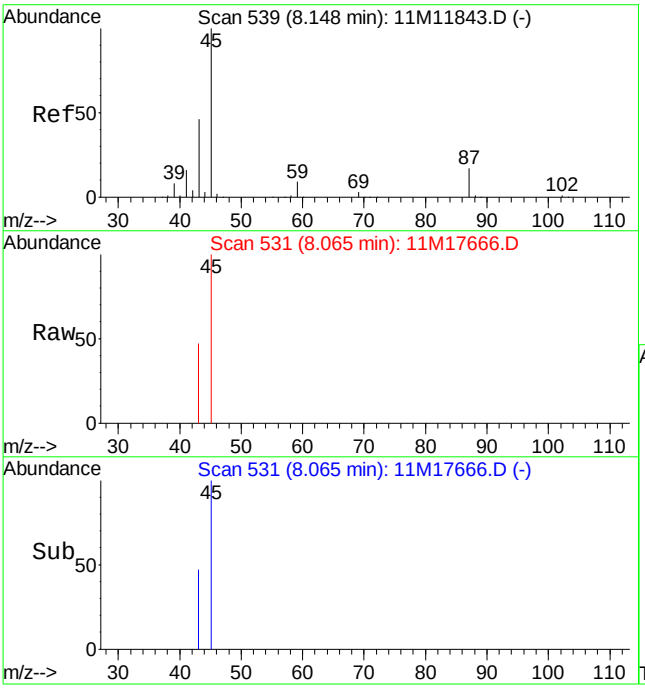


#22
Methyl Tert Butyl Ether
Concen: 4.26 ug/L
RT: 7.43 min Scan# 470
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 73 Resp: 45889

Ion	Ratio	Lower	Upper
73	100		
57	27.2	16.9	39.3

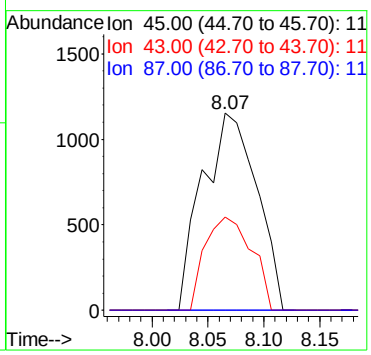


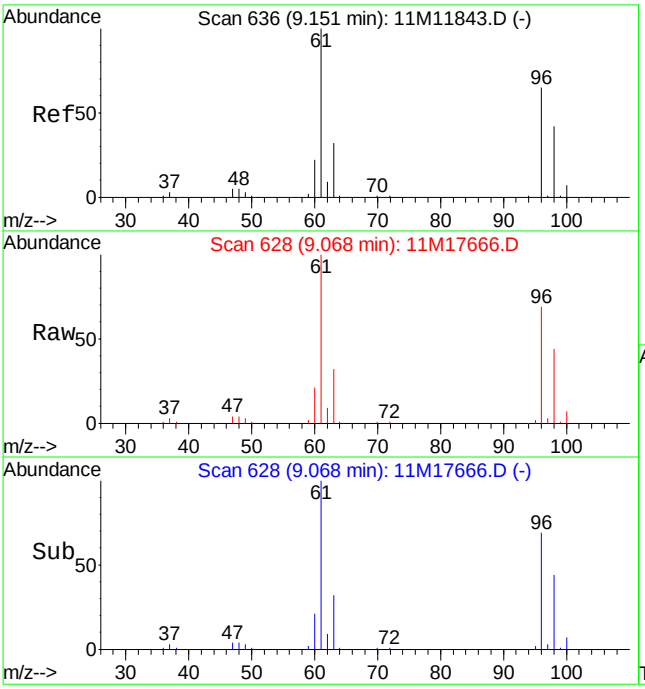


#25
Diisopropyl ether
Concen: 0.26 ug/L
RT: 8.07 min Scan# 531
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 45 Resp: 3905

Ion	Ratio	Lower	Upper
45	100		
43	40.5	30.3	70.7
87	0.0	14.3	33.5#

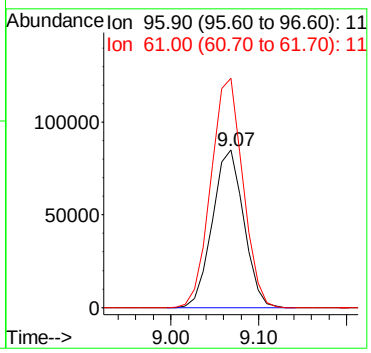


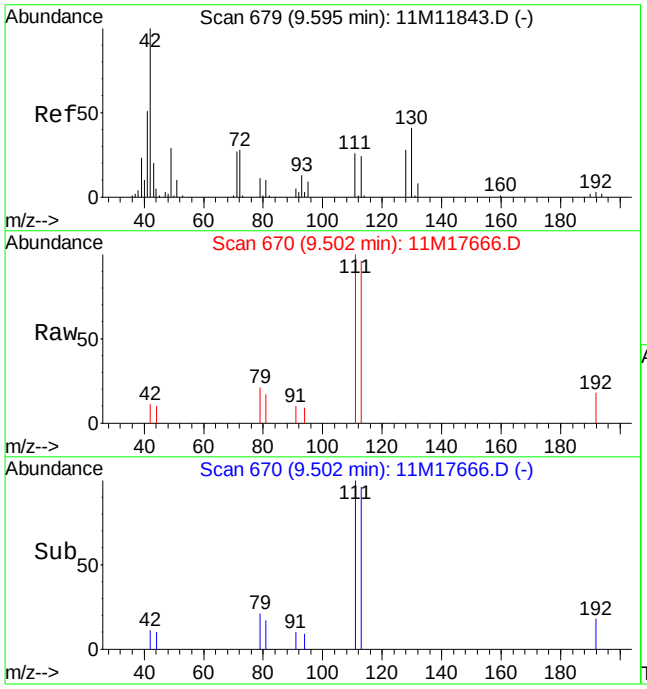


#32
cis-1,2-Dichloroethene
Concen: 47.72 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.01 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 96 Resp: 210649

Ion	Ratio	Lower	Upper
96	100		
61	148.5	104.6	244.2

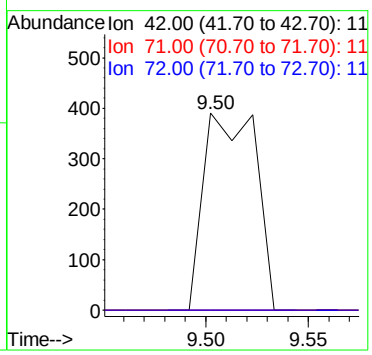


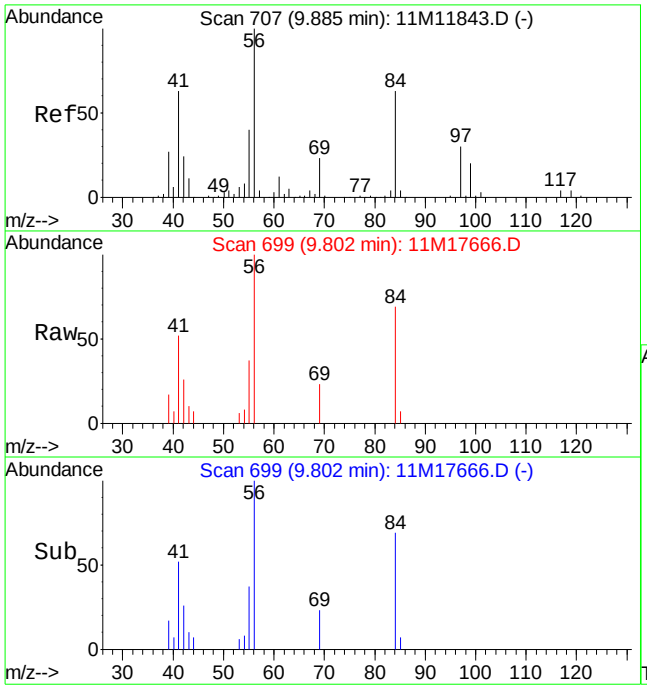


#36
Tetrahydrofuran
Concen: 0.51 ug/L
RT: 9.50 min Scan# 670
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 42 Resp: 691

Ion	Ratio	Lower	Upper
42	100		
71	0.0	19.9	46.3#
72	0.0	21.0	49.0#

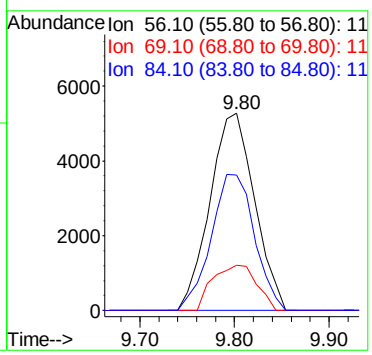


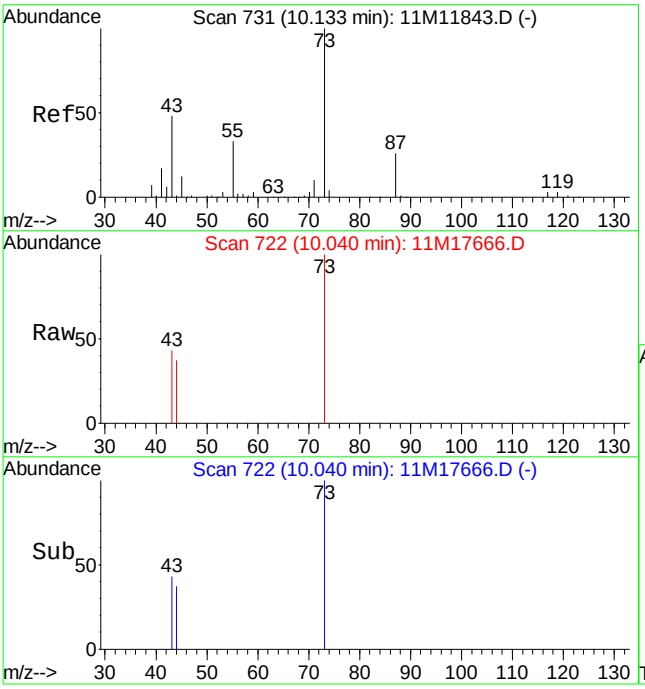


#39
Cyclohexane
Concen: 2.14 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 56 Resp: 17178

Ion	Ratio	Lower	Upper
56	100		
69	22.7	15.5	36.1
84	67.0	41.7	97.3

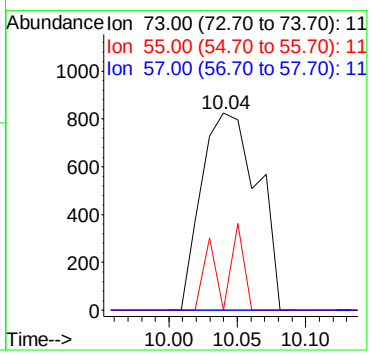


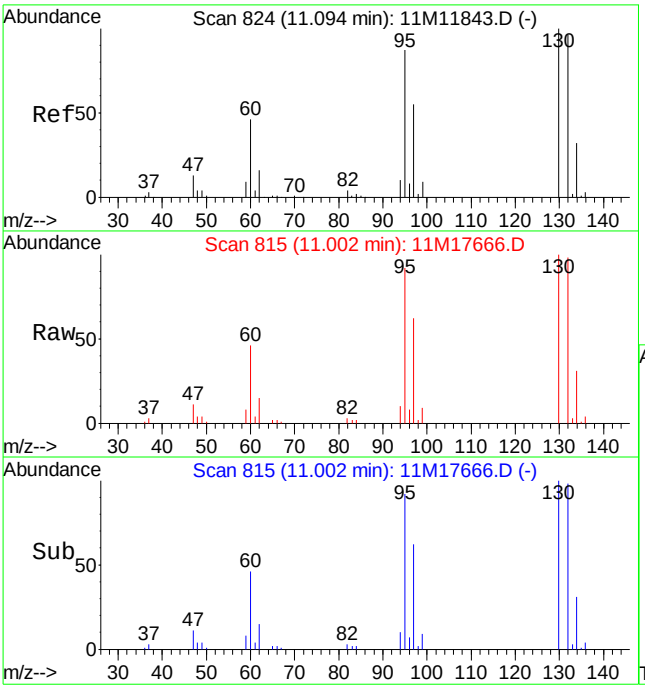


#42
Tert-Amyl-Methyl ether
Concen: 0.22 ug/L
RT: 10.04 min Scan# 722
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 73 Resp: 2359

Ion	Ratio	Lower	Upper
73	100		
55	8.0	18.2	42.4#
57	0.0	1.4	3.4#

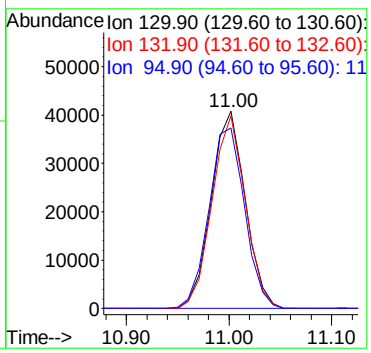


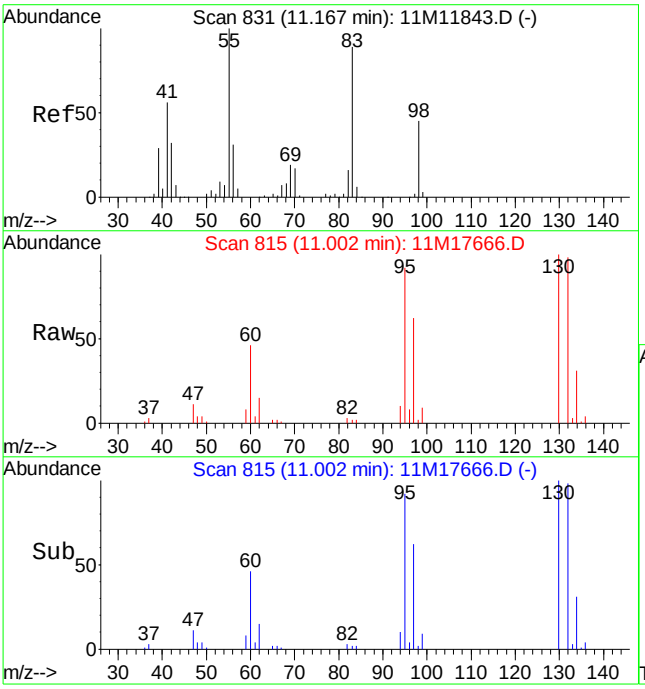


#46
Trichloroethene
Concen: 22.72 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion:130 Resp: 94177

Ion	Ratio	Lower	Upper
130	100		
132	95.5	57.8	134.8
95	96.0	62.3	145.5

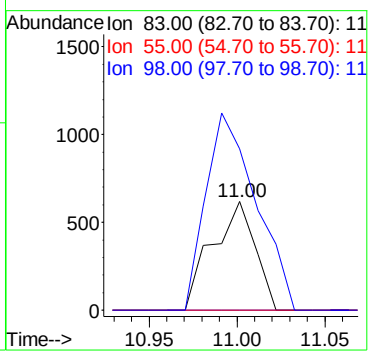


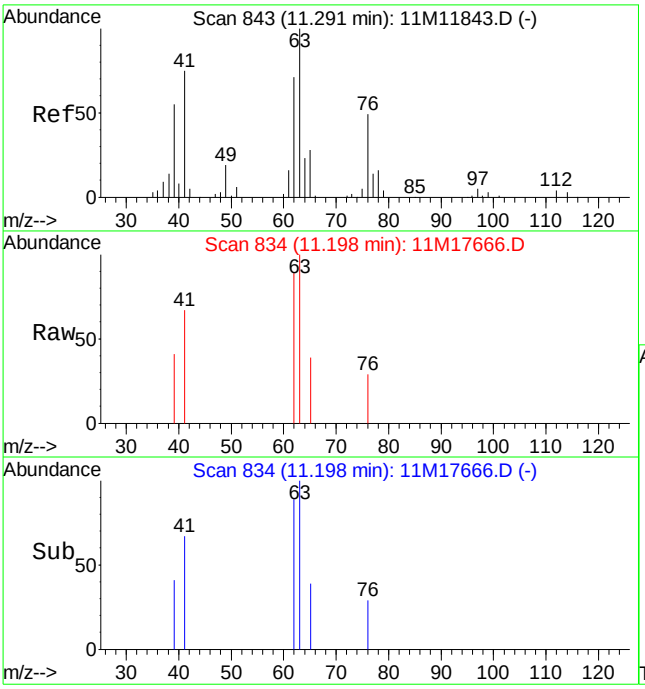


#47
Methylcyclohexane
Concen: 0.16 ug/L
RT: 11.00 min Scan# 815
Delta R.T. -0.07 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 83 Resp: 1043

Ion	Ratio	Lower	Upper
83	100		
55	0.0	58.6	136.6#
98	212.9	27.6	64.4#

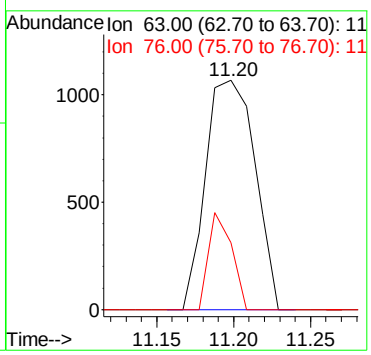


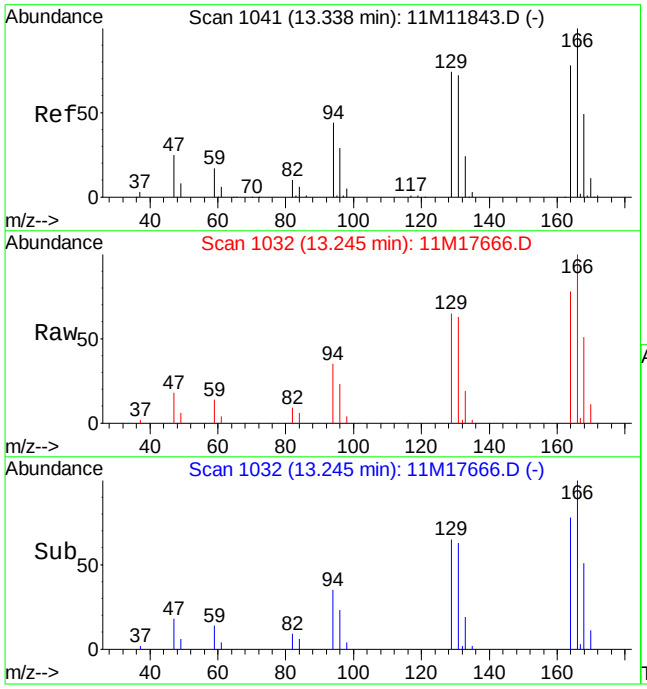


#48
1,2-Dichloropropane
Concen: 0.50 ug/L
RT: 11.20 min Scan# 834
Delta R.T. 0.00 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion: 63 Resp: 2388

Ion	Ratio	Lower	Upper
63	100		
76	19.8	22.4	52.2#

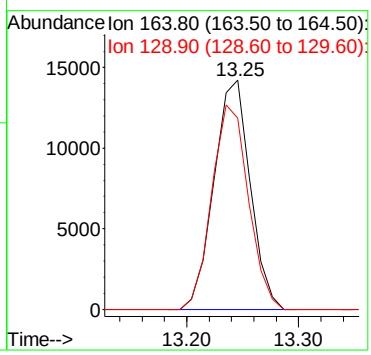




#64
Tetrachloroethene
Concen: 9.00 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17666.D
Acq: 22 Apr 2017 00:24

Tgt Ion:164 Resp: 32006

Ion	Ratio	Lower	Upper
164	100		
129	90.0	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17667.D Vial: 19
Acq On : 22 Apr 2017 00:54 Operator: JDS
Sample : L17041069-39 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:18 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

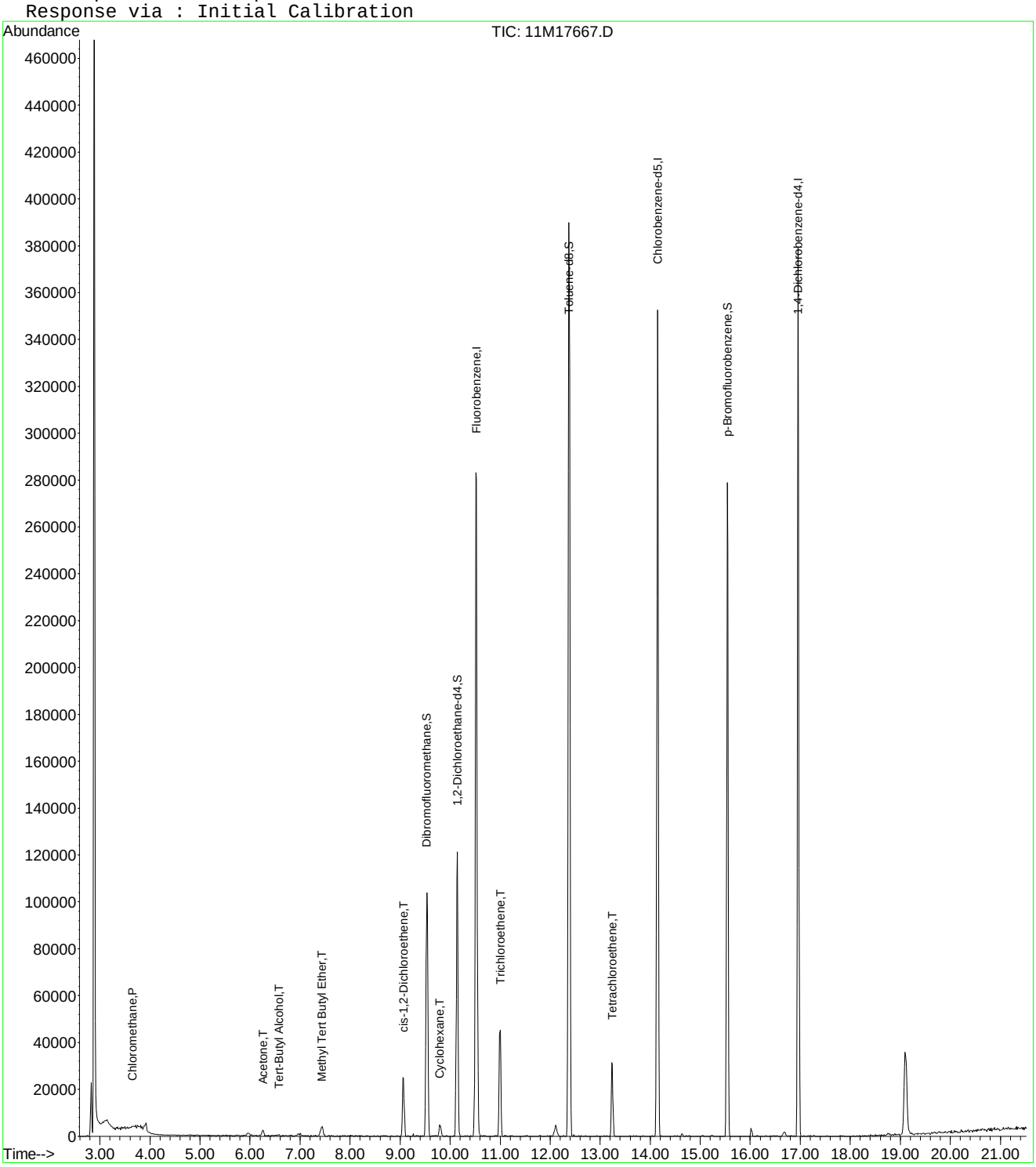
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	349286	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	244709	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126694	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84714	23.3745	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 93.48%			
43) 1,2-Dichloroethane-d4	10.14	65	99394	24.2116	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.84%			
57) Toluene-d8	12.38	98	337538	25.3375	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.36%			
78) p-Bromofluorobenzene	15.54	95	118056	25.0718	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.28%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	1003	0.1734	ug/L #	1
13) Acetone	6.26	43	4649	3.9001	ug/L	88
15) Tert-Butyl Alcohol	6.58	59	380	0.8908	ug/L #	62
22) Methyl Tert Butyl Ether	7.43	73	8718	0.7668	ug/L	92
32) cis-1,2-Dichloroethene	9.07	96	14611	3.1368	ug/L	81
39) Cyclohexane	9.79	56	4652	0.5504	ug/L #	86
46) Trichloroethene	11.00	130	20810	4.7589	ug/L	97
64) Tetrachloroethene	13.25	164	10708	2.8829	ug/L	90

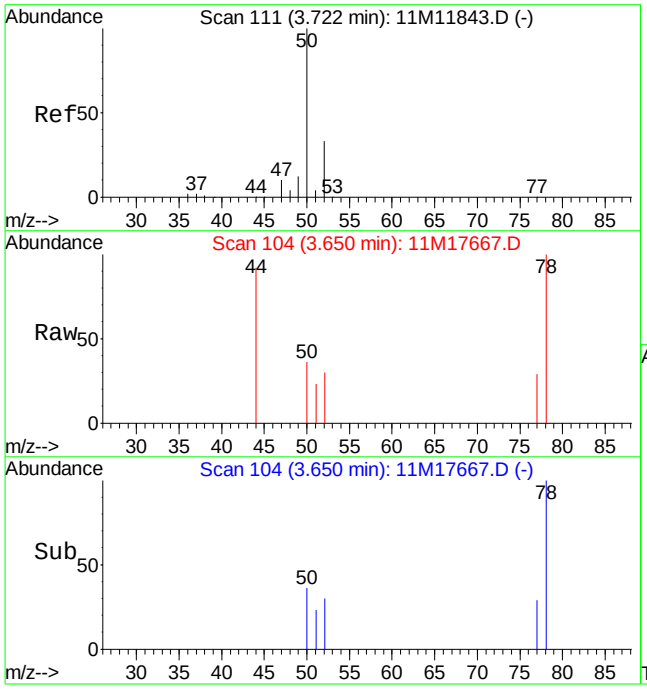
(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17667.D Vial: 19
Acq On : 22 Apr 2017 00:54 Operator: JDS
Sample : L17041069-39 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

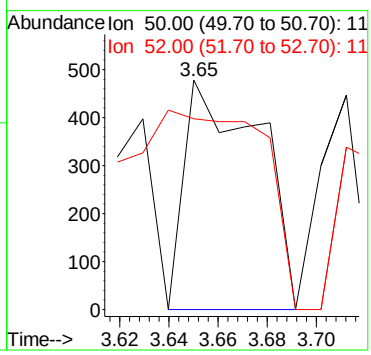


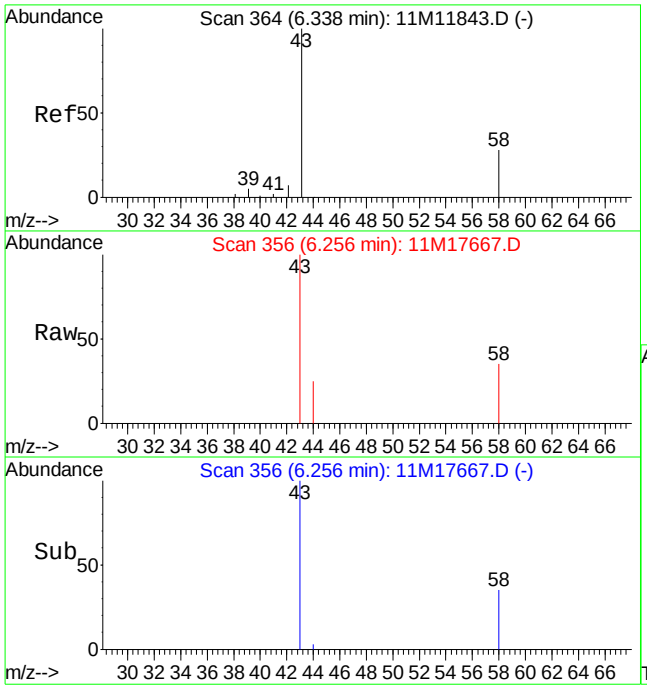


#3
Chloromethane
Concen: 0.17 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 50 Resp: 1003

Ion	Ratio	Lower	Upper
50	100		
52	201.0	20.3	47.3#

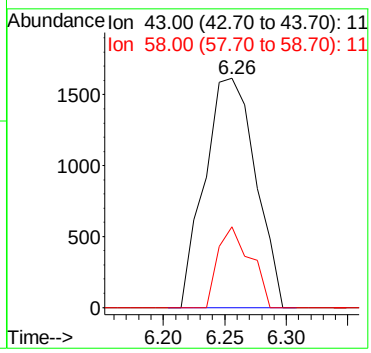


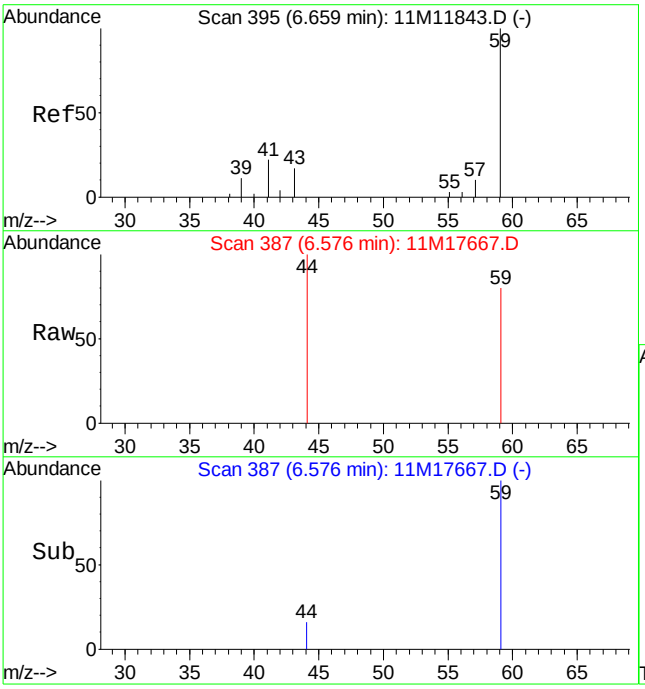


#13
Acetone
Concen: 3.90 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 43 Resp: 4649

Ion	Ratio	Lower	Upper
43	100		
58	22.7	17.5	40.7

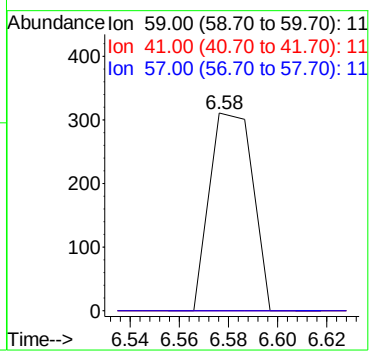


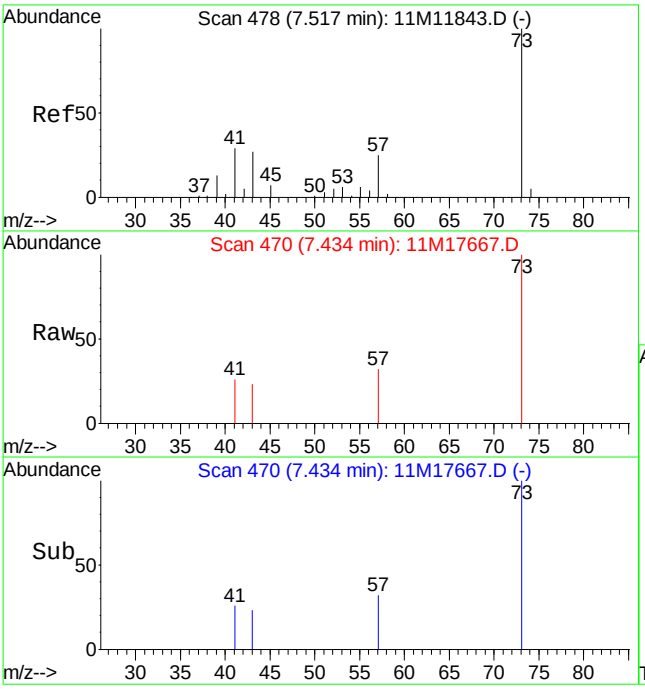


#15
Tert-Butyl Alcohol
Concen: 0.89 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.00 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 59 Resp: 380

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

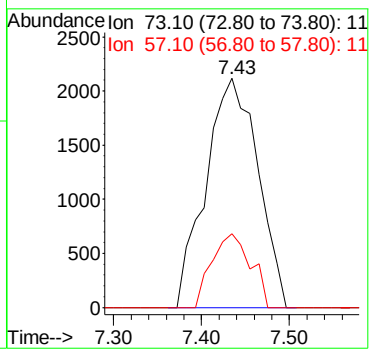


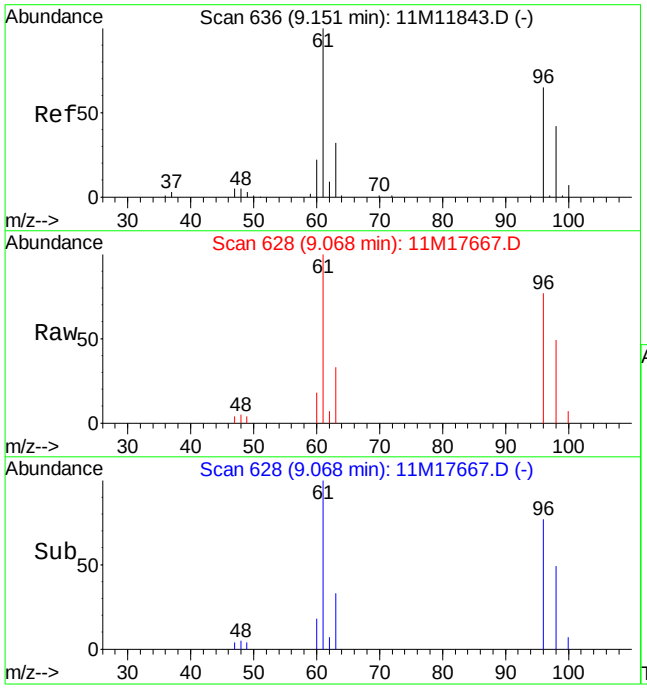


#22
Methyl Tert Butyl Ether
Concen: 0.77 ug/L
RT: 7.43 min Scan# 470
Delta R.T. 0.00 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 73 Resp: 8718

Ion	Ratio	Lower	Upper
73	100		
57	24.0	16.9	39.3

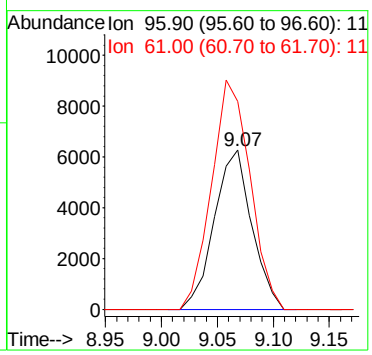


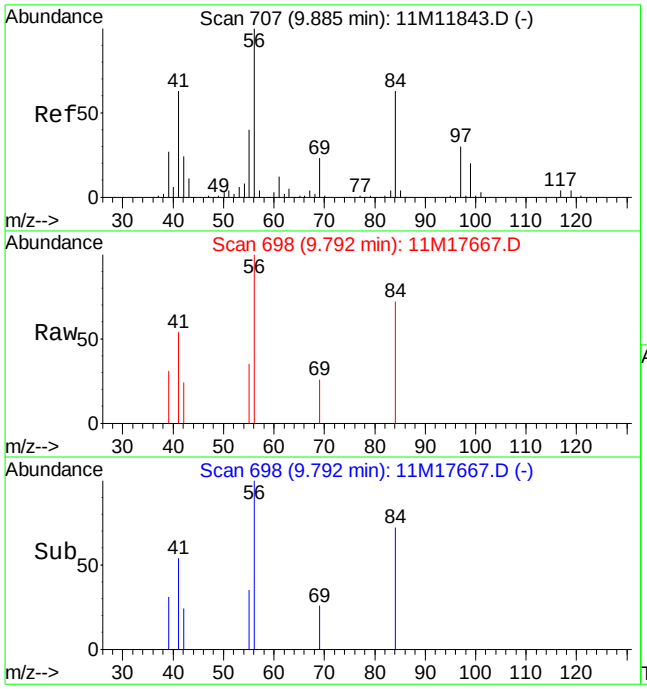


#32
cis-1,2-Dichloroethene
Concen: 3.14 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.01 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 96 Resp: 14611

Ion	Ratio	Lower	Upper
96	100		
61	148.3	104.6	244.2

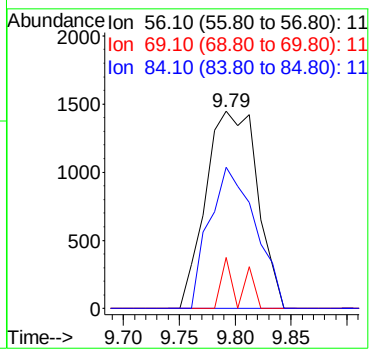


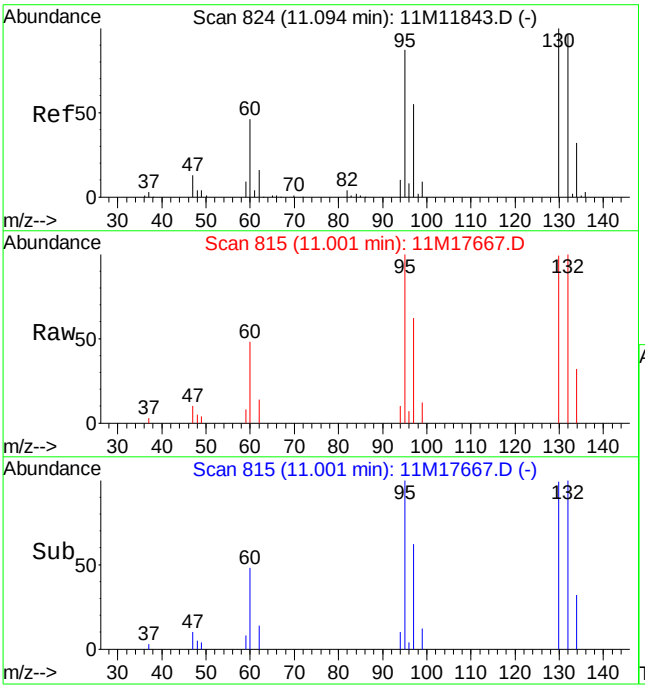


#39
Cyclohexane
Concen: 0.55 ug/L
RT: 9.79 min Scan# 698
Delta R.T. 0.00 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion: 56 Resp: 4652

Ion	Ratio	Lower	Upper
56	100		
69	9.1	15.5	36.1#
84	63.9	41.7	97.3

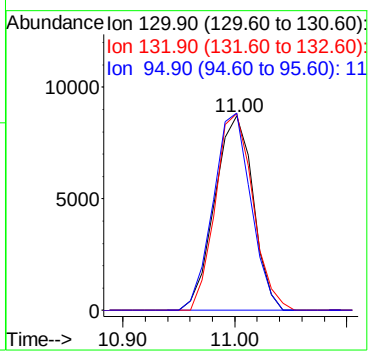


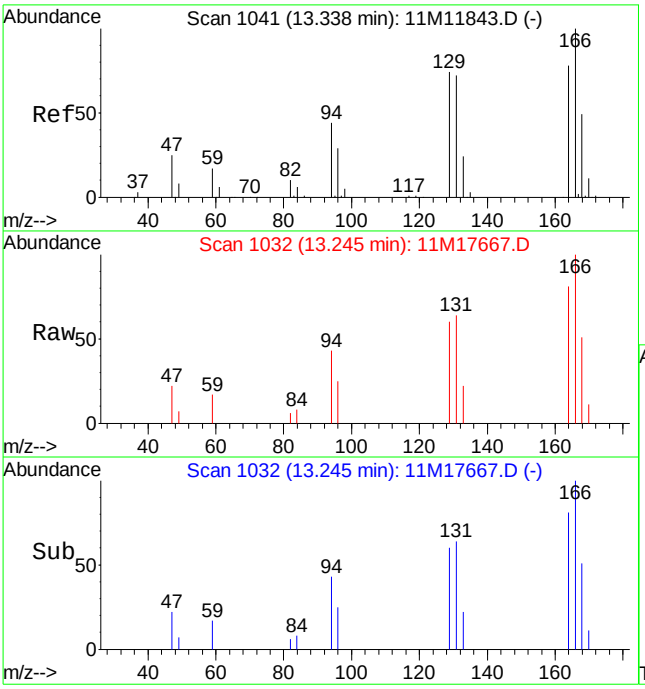


#46
Trichloroethene
Concen: 4.76 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion:130 Resp: 20810

Ion	Ratio	Lower	Upper
130	100		
132	98.8	57.8	134.8
95	99.4	62.3	145.5

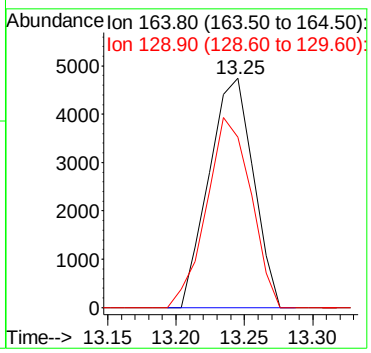




#64
Tetrachloroethene
Concen: 2.88 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17667.D
Acq: 22 Apr 2017 00:54

Tgt Ion:164 Resp: 10708

Ion	Ratio	Lower	Upper
164	100		
129	82.5	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17668.D Vial: 20
Acq On : 22 Apr 2017 1:24 Operator: JDS
Sample : L17041069-40 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:21 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

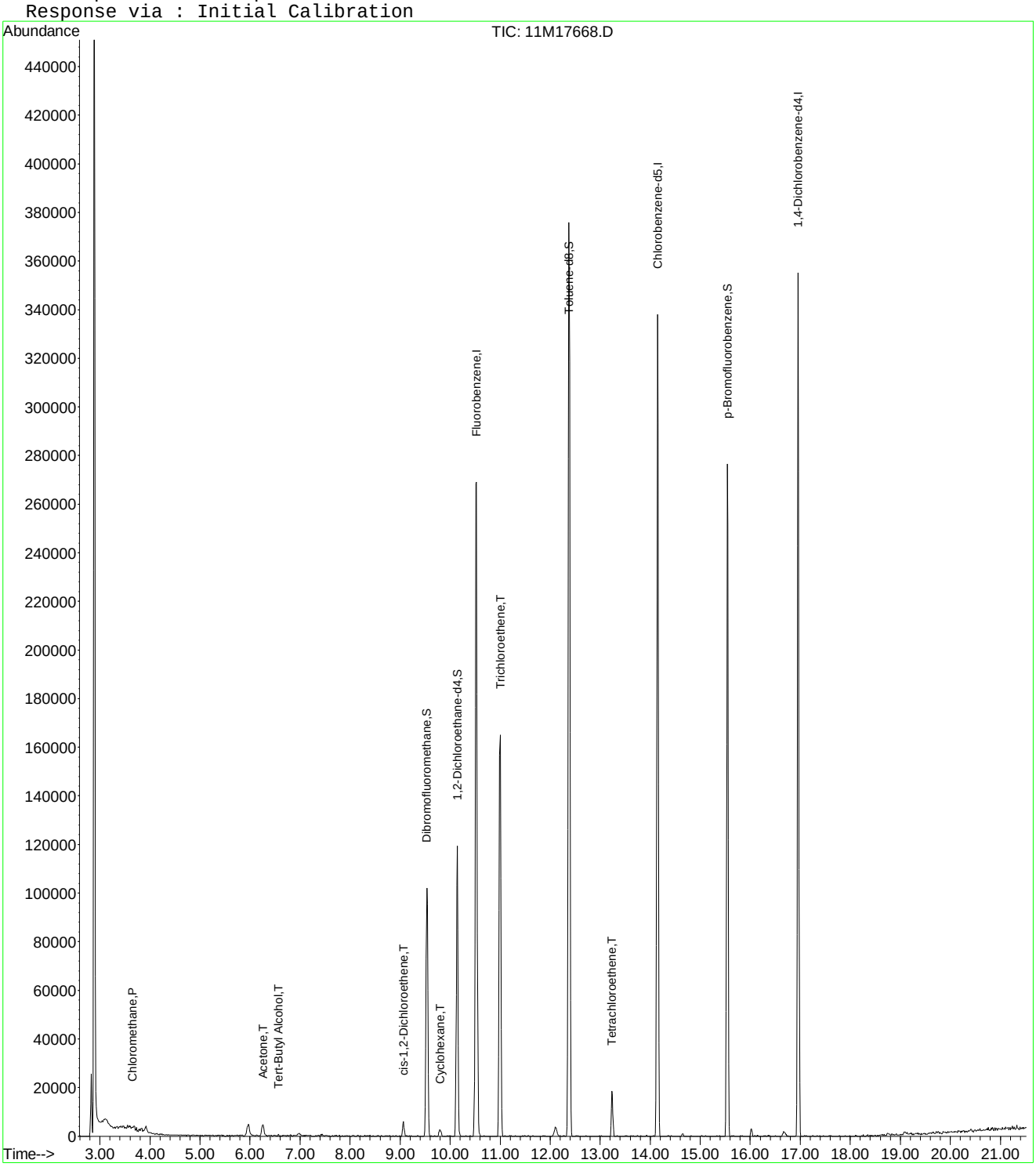
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	329624	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	231711	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119256	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82232	24.0430	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.16%			
43) 1,2-Dichloroethane-d4	10.14	65	97825	25.2508	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.00%			
57) Toluene-d8	12.38	98	326562	25.8887	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.56%			
78) p-Bromofluorobenzene	15.54	95	116936	26.3828	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.52%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	1112	0.2037	ug/L #	25
13) Acetone	6.26	43	10159	9.0309	ug/L	99
15) Tert-Butyl Alcohol	6.57	59	252	0.6260	ug/L #	62
32) cis-1,2-Dichloroethene	9.07	96	3380	0.7689	ug/L	89
39) Cyclohexane	9.80	56	3123	0.3915	ug/L #	84
46) Trichloroethene	11.00	130	72373	17.5379	ug/L	96
64) Tetrachloroethene	13.23	164	5981	1.7006	ug/L	99

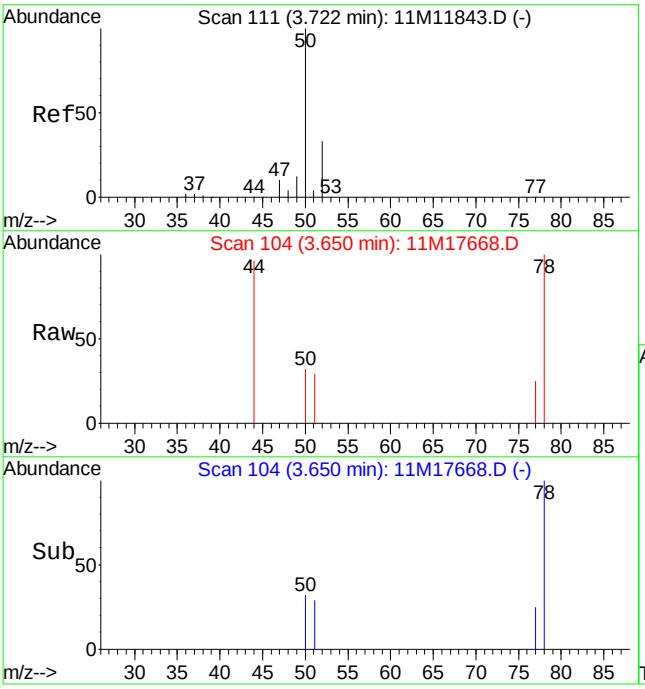
(#) = qualifier out of range (m) = manual integration
11M17668.D 8260WTR.M Tue Apr 25 13:52:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17668.D Vial: 20
Acq On : 22 Apr 2017 1:24 Operator: JDS
Sample : L17041069-40 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

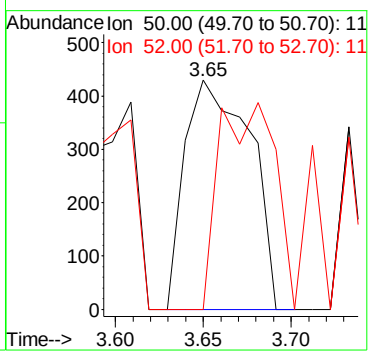


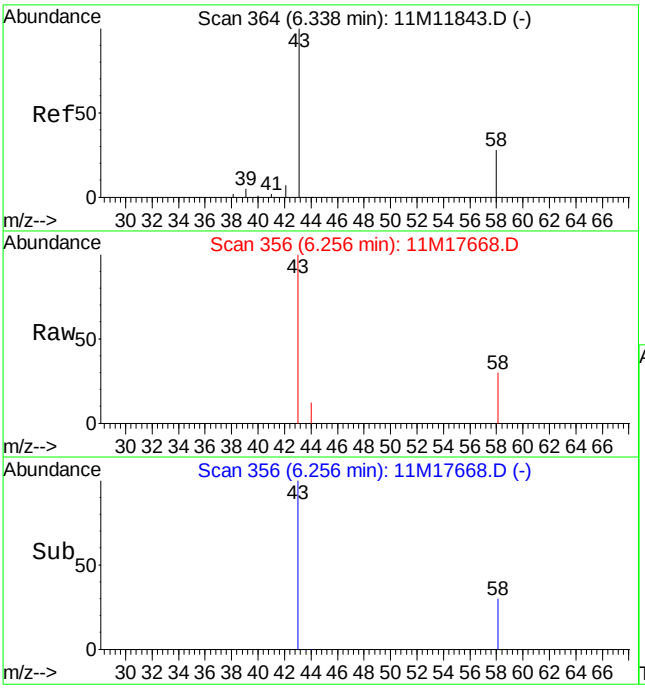


#3
Chloromethane
Concen: 0.20 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion: 50 Resp: 1112

Ion	Ratio	Lower	Upper
50	100		
52	76.8	20.3	47.3#

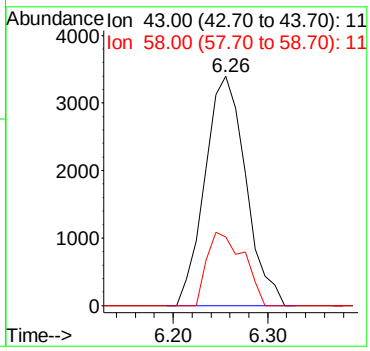


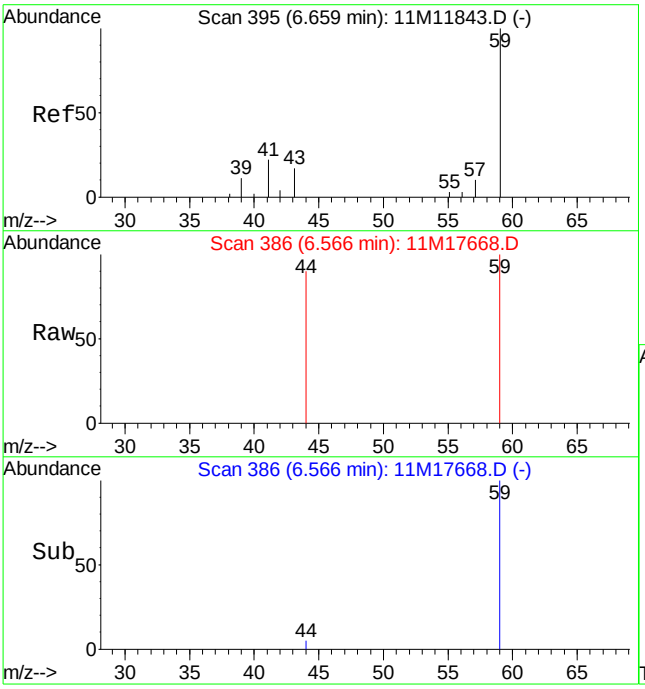


#13
Acetone
Concen: 9.03 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion: 43 Resp: 10159

Ion	Ratio	Lower	Upper
43	100		
58	28.6	17.5	40.7

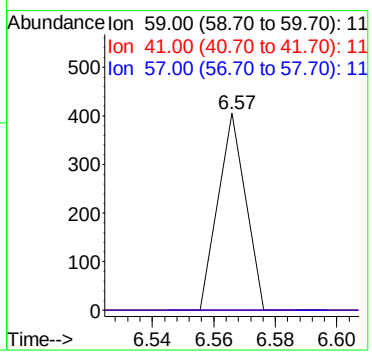


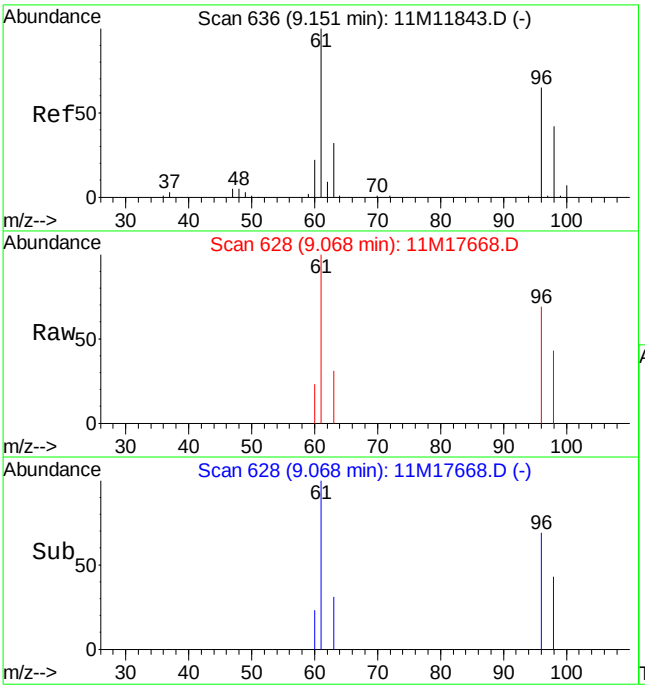


#15
Tert-Butyl Alcohol
Concen: 0.63 ug/L
RT: 6.57 min Scan# 386
Delta R.T. -0.01 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion: 59 Resp: 252

Ion	Ratio	Lower	Upper
59	100		
41	0.0	12.1	28.3#
57	0.0	5.9	13.7#

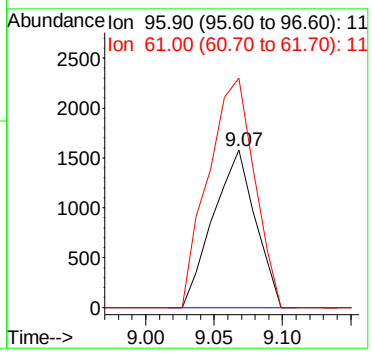


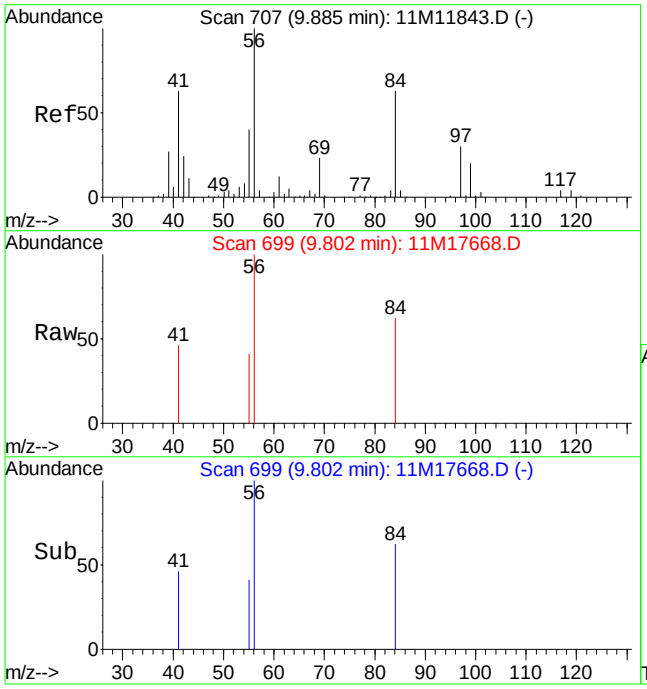


#32
cis-1,2-Dichloroethene
Concen: 0.77 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.01 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion: 96 Resp: 3380

Ion	Ratio	Lower	Upper
96	100		
61	159.6	104.6	244.2

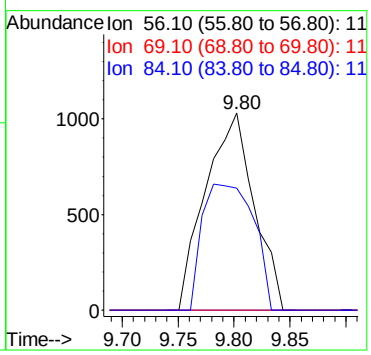


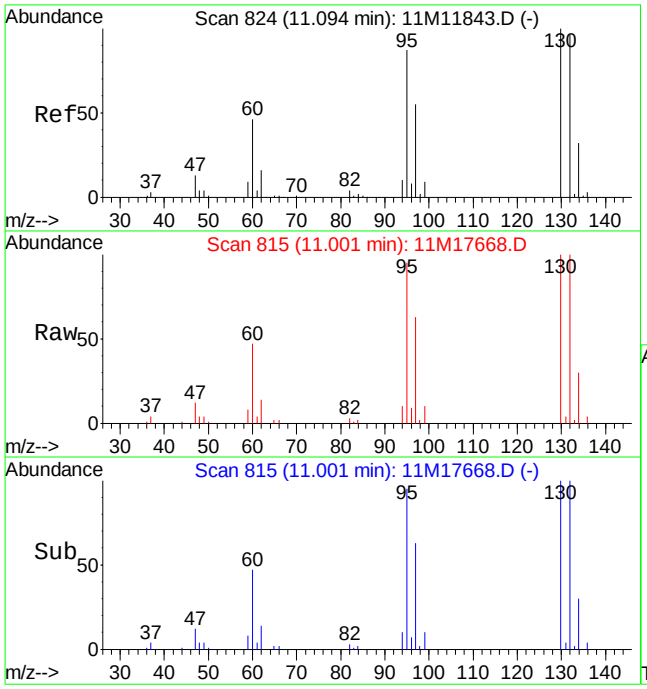


#39
Cyclohexane
Concen: 0.39 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.01 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion: 56 Resp: 3123

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.5	36.1#
84	67.4	41.7	97.3

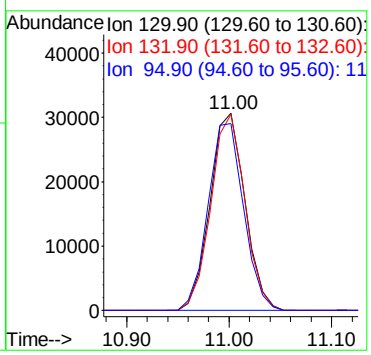


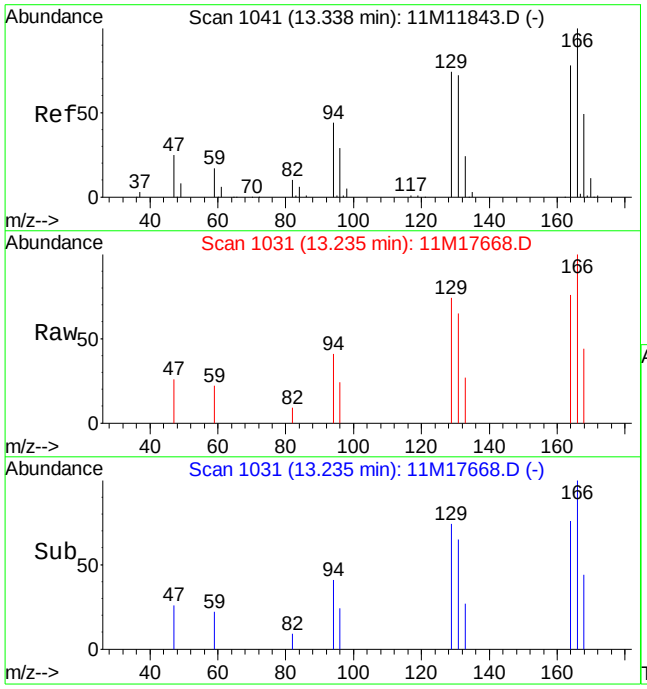


#46
Trichloroethene
Concen: 17.54 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion:130 Resp: 72373

Ion	Ratio	Lower	Upper
130	100		
132	96.8	57.8	134.8
95	96.8	62.3	145.5

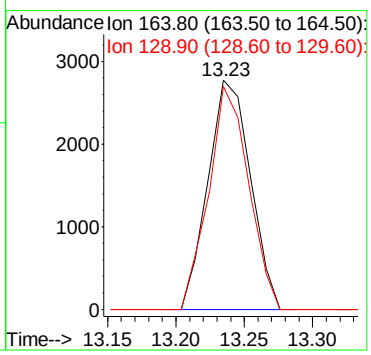




#64
Tetrachloroethene
Concen: 1.70 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17668.D
Acq: 22 Apr 2017 1:24

Tgt Ion:164 Resp: 5981

Ion	Ratio	Lower	Upper
164	100		
129	91.6	55.4	129.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17669.D Vial: 21
Acq On : 22 Apr 2017 1:53 Operator: JDS
Sample : L17041069-41 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52:23 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

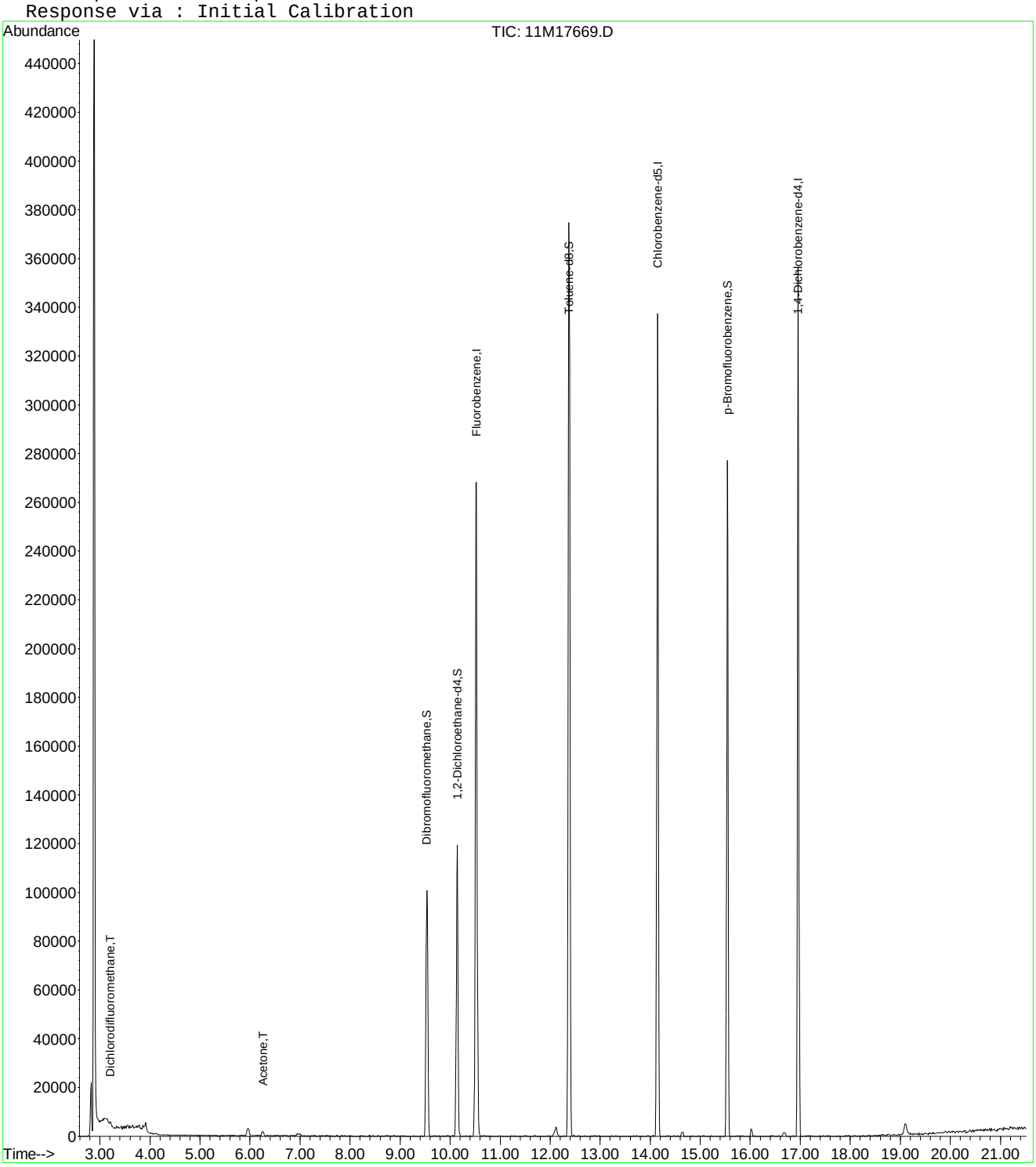
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	329225	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	233457	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	121048	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82694	24.2074	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.84%			
43) 1,2-Dichloroethane-d4	10.14	65	97085	25.0902	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.36%			
57) Toluene-d8	12.38	98	326279	25.6728	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.68%			
78) p-Bromofluorobenzene	15.54	95	115584	25.6917	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1911	0.4215	ug/L #	65
13) Acetone	6.26	43	3714	3.3056	ug/L	81

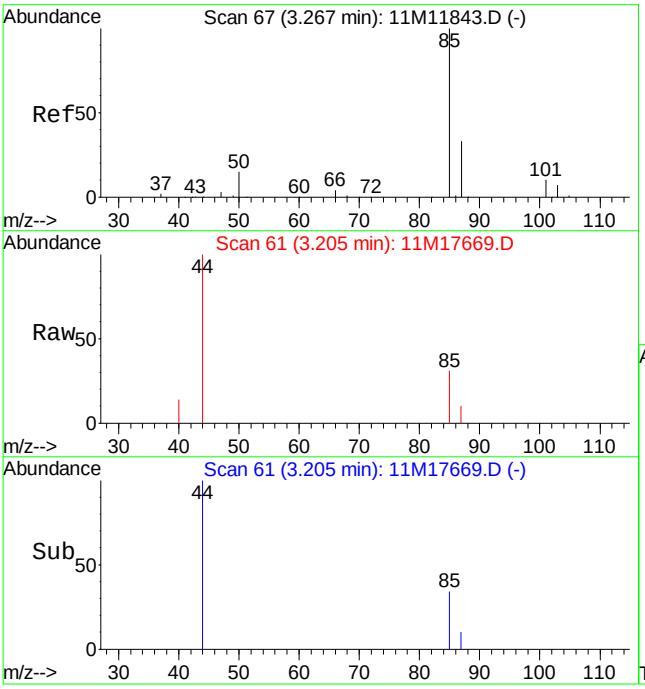
(#) = qualifier out of range (m) = manual integration
11M17669.D 8260WTR.M Tue Apr 25 13:52:24 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17669.D Vial: 21
Acq On : 22 Apr 2017 1:53 Operator: JDS
Sample : L17041069-41 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:52 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

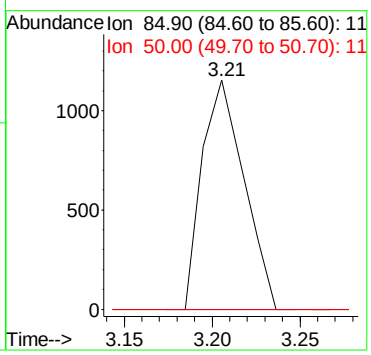


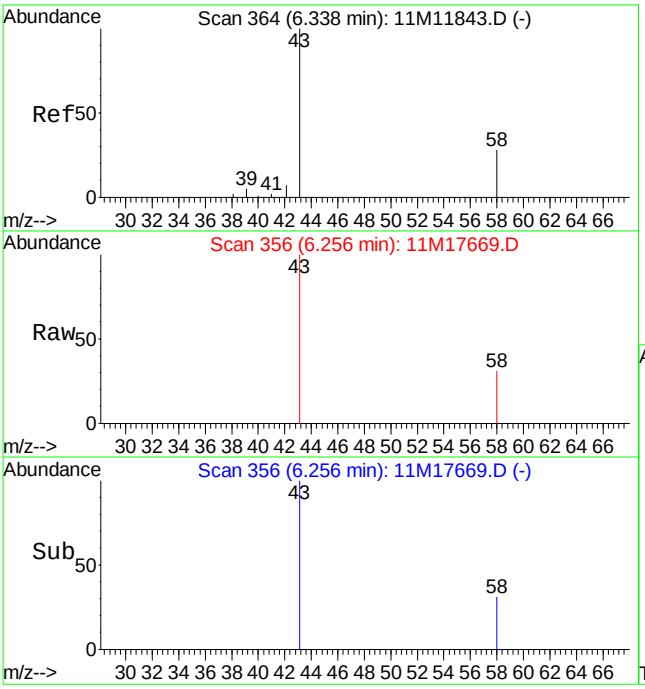


#2
Dichlorodifluoromethane
Concen: 0.42 ug/L
RT: 3.21 min Scan# 61
Delta R.T. 0.00 min
Lab File: 11M17669.D
Acq: 22 Apr 2017 1:53

Tgt Ion: 85 Resp: 1911

Ion	Ratio	Lower	Upper
85	100		
50	0.0	8.5	19.9#

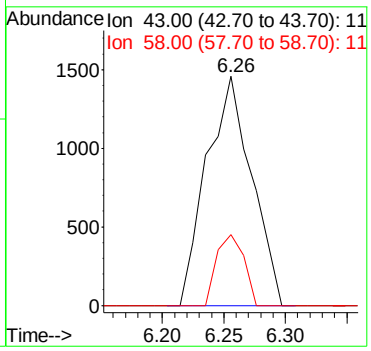




#13
Acetone
Concen: 3.31 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.01 min
Lab File: 11M17669.D
Acq: 22 Apr 2017 1:53

Tgt Ion: 43 Resp: 3714

Ion	Ratio	Lower	Upper
43	100		
58	18.8	17.5	40.7



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419173.D Vial: 10
Acq On : 26 Apr 2017 12:27 Operator: TMB
Sample : L17041069-42 B 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 12:50:12 2017 Quant Results File: 8260WT.RES

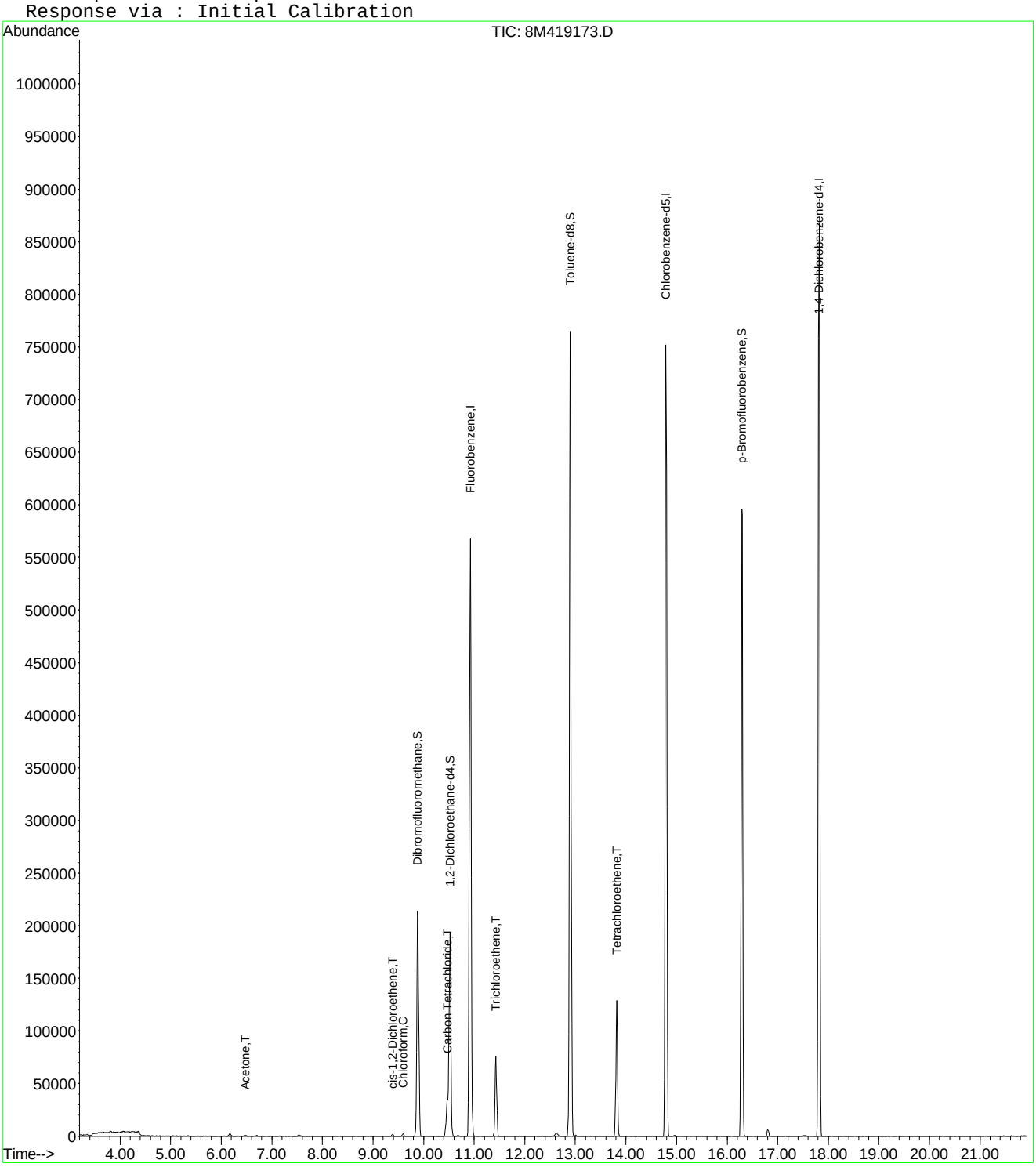
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

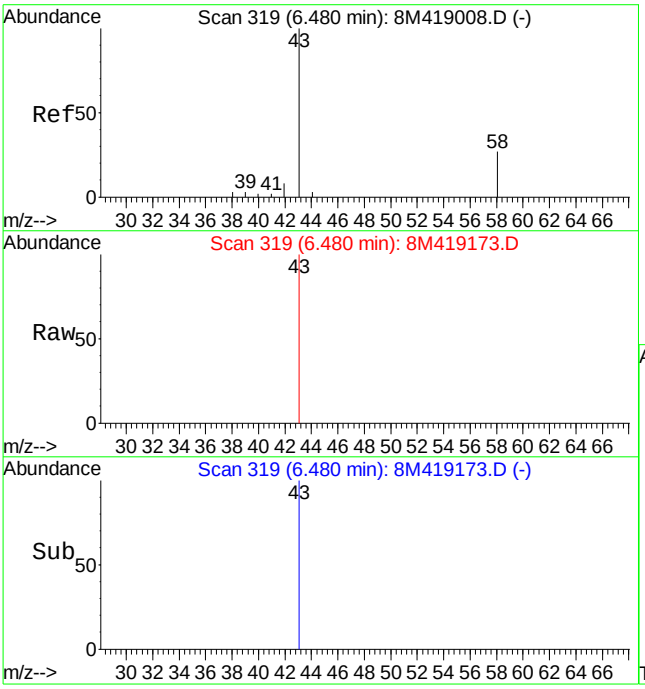
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	700773	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	561116	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	291230	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	181817	24.7361	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.96%			
43) 1,2-Dichloroethane-d4	10.52	65	164442	25.8786	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.52%			
58) Toluene-d8	12.90	98	677162	26.4120	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.64%			
80) p-Bromofluorobenzene	16.29	95	268236	26.0971	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.40%			
Target Compounds						Qvalue
13) Acetone	6.48	43	2323	2.3570	ug/L #	62
32) cis-1,2-Dichloroethene	9.38	96	1231	0.1508	ug/L	94
33) Chloroform	9.59	83	2862	0.2033	ug/L	88
42) Carbon Tetrachloride	10.47	117	34118	3.2381	ug/L	99
47) Trichloroethene	11.43	130	32161	3.9546	ug/L	98
66) Tetrachloroethene	13.82	164	38507	5.8693	ug/L	95

(#) = qualifier out of range (m) = manual integration
8M419173.D 8260WT.M Thu Apr 27 08:32:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419173.D Vial: 10
Acq On : 26 Apr 2017 12:27 Operator: TMB
Sample : L17041069-42 B 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 12:50 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

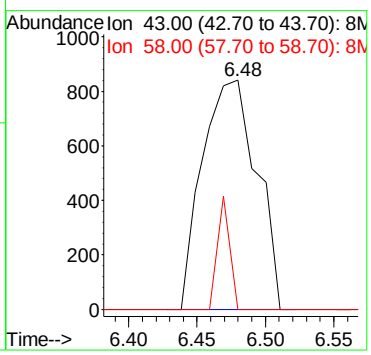


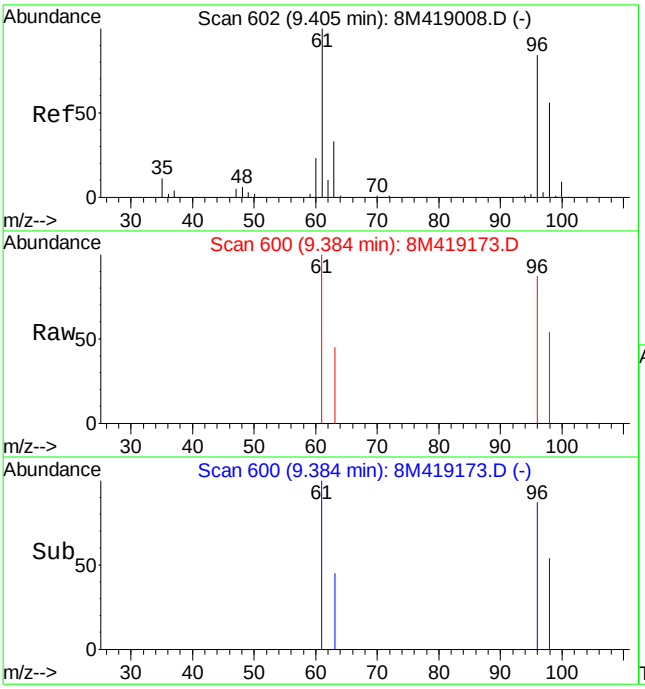


#13
Acetone
Concen: 2.36 ug/L
RT: 6.48 min Scan# 319
Delta R.T. -0.00 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion: 43 Resp: 2323

Ion	Ratio	Lower	Upper
43	100		
58	11.1	19.4	45.4#

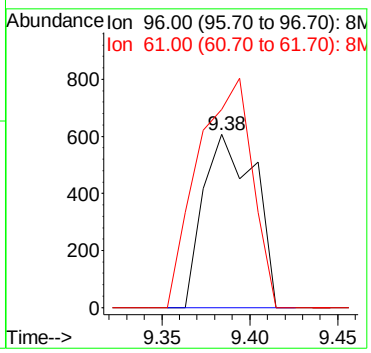


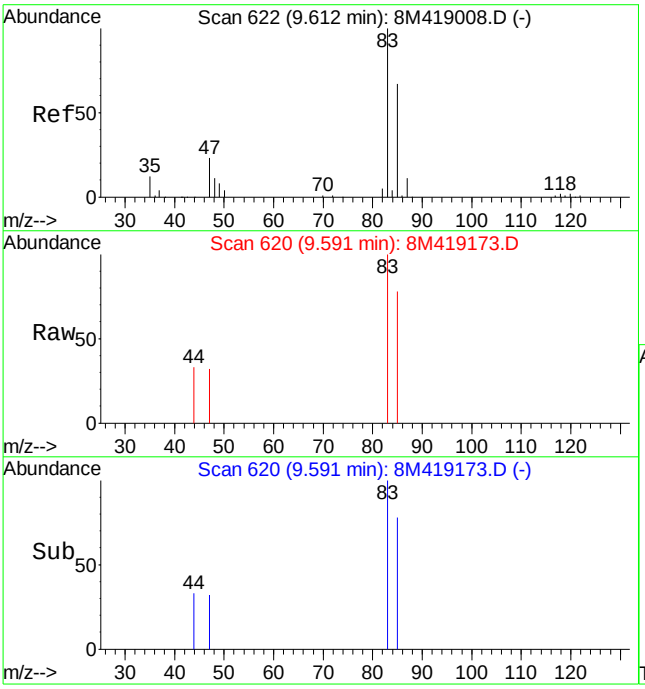


#32
cis-1,2-Dichloroethene
Concen: 0.15 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion: 96 Resp: 1231

Ion	Ratio	Lower	Upper
96	100		
61	140.4	80.3	187.3

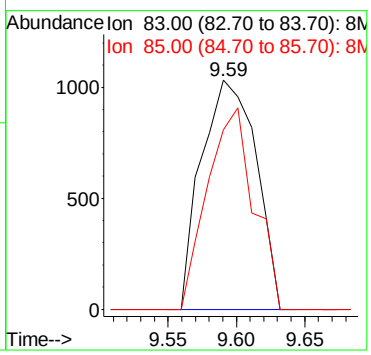


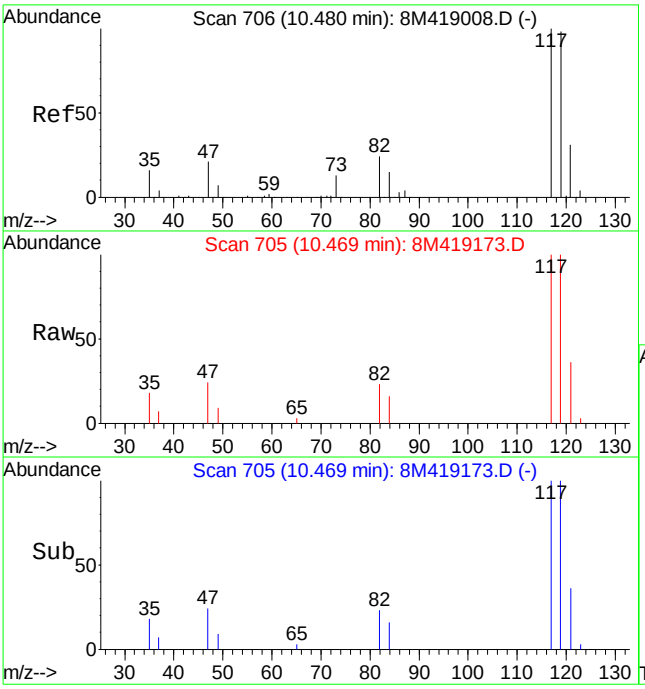


#33
Chloroform
Concen: 0.20 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion: 83 Resp: 2862

Ion	Ratio	Lower	Upper
83	100		
85	75.0	39.1	91.3

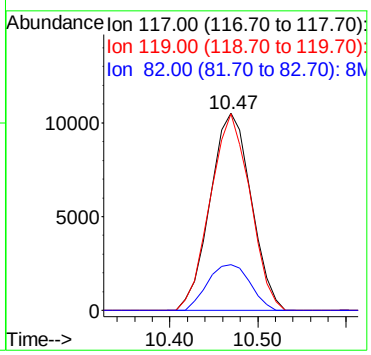


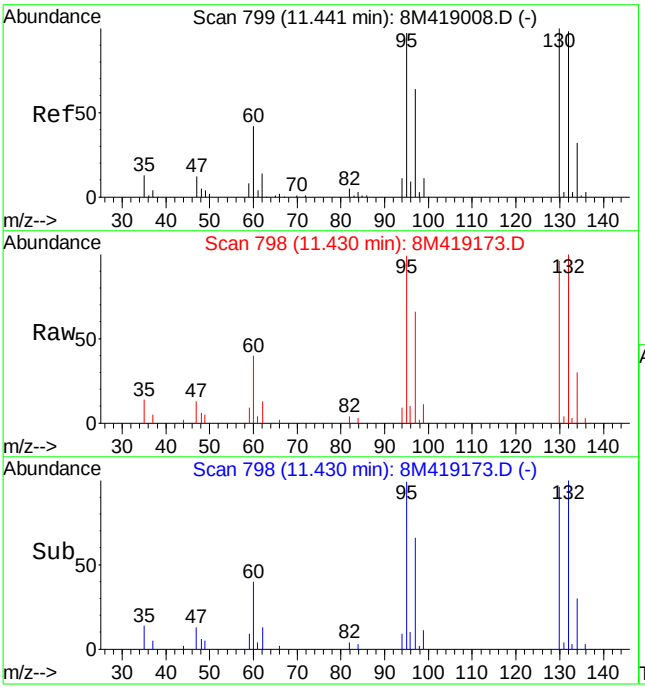


#42
Carbon Tetrachloride
Concen: 3.24 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion:117 Resp: 34118

Ion	Ratio	Lower	Upper
117	100		
119	96.7	58.5	136.5
82	24.1	14.9	34.9

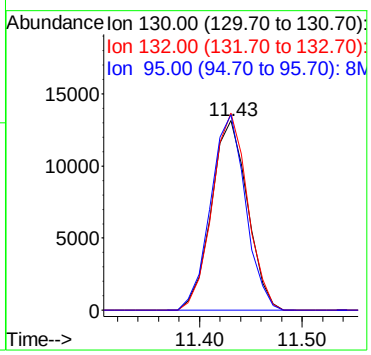


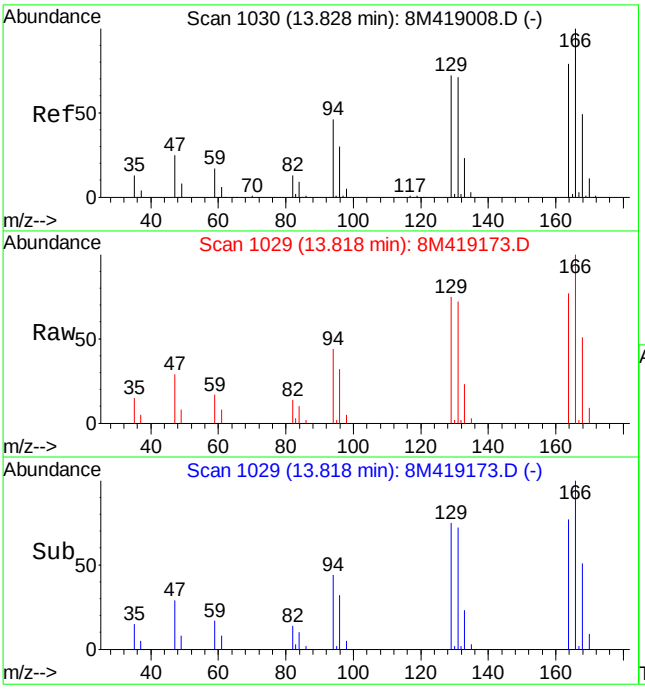


#47
Trichloroethene
Concen: 3.95 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion:130 Resp: 32161

Ion	Ratio	Lower	Upper
130	100		
132	101.8	59.4	138.6
95	99.7	60.1	140.3

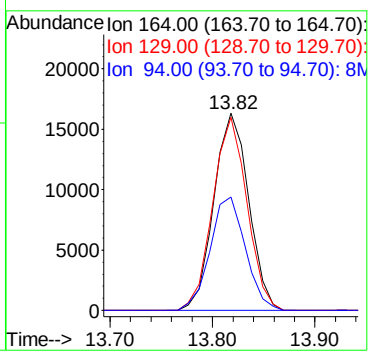




#66
Tetrachloroethene
Concen: 5.87 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419173.D
Acq: 26 Apr 2017 12:27

Tgt Ion:164 Resp: 38507

Ion	Ratio	Lower	Upper
164	100		
129	96.1	53.4	124.6
94	58.4	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146655.D Vial: 17
Acq On : 22 Apr 2017 23:03 Operator: JDS
Sample : L17041069-43 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 23:25:20 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

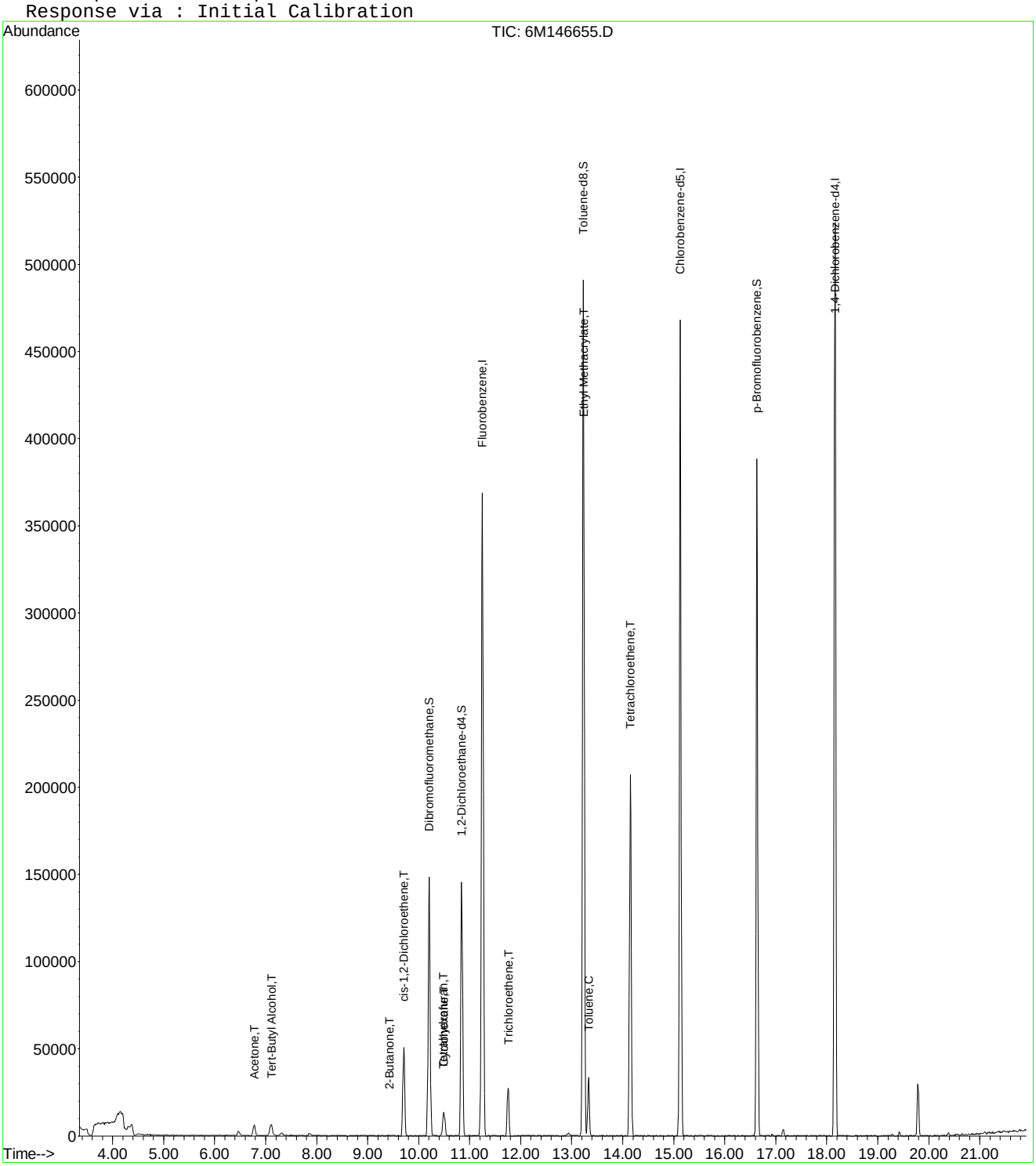
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	475009	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	344641	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	179059	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	128699	26.5411 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 106.16%		
43) 1,2-Dichloroethane-d4	10.84	65	129657	27.1299 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.52%		
58) Toluene-d8	13.23	98	450374	25.6095 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.44%		
80) p-Bromofluorobenzene	16.63	95	180217	26.4996 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.00%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	323	Below Cal #	42
13) Acetone	6.78	43	12100	11.8046 ug/L	90
15) Tert-Butyl Alcohol	7.11	59	15958	50.1909 ug/L #	87
29) 2-Butanone	9.42	43	771	0.5968 ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	31859	5.5601 ug/L	82
36) Tetrahydrofuran	10.48	42	2286	2.6870 ug/L #	41
39) Cyclohexane	10.49	56	11873	1.6057 ug/L	83
47) Trichloroethene	11.76	130	12860	2.3247 ug/L	94
59) Toluene	13.33	91	36505	1.6942 ug/L	99
60) Ethyl Methacrylate	13.24	69	971	0.1862 ug/L #	61
66) Tetrachloroethene	14.15	166	80112	15.3432 ug/L	93

(#) = qualifier out of range (m) = manual integration
6M146655.D 8260BWT.M Mon Apr 24 08:43:31 2017 Page 1

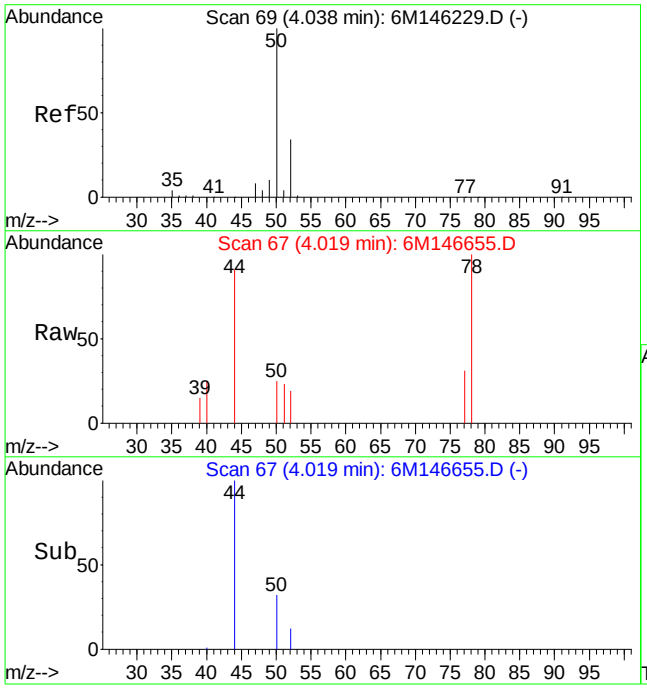
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146655.D Vial: 17
Acq On : 22 Apr 2017 23:03 Operator: JDS
Sample : L17041069-43 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 23:25 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



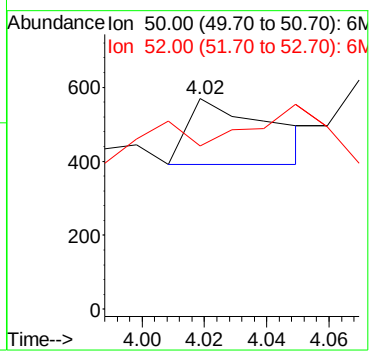
6M146655.D 8260BWT.M Mon Apr 24 08:43:31 2017 Page 2

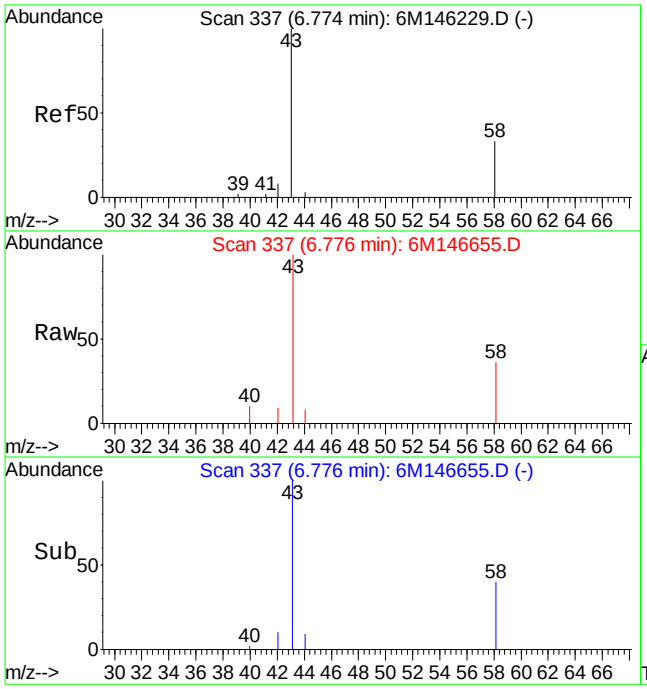


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. 0.00 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 50 Resp: 323

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

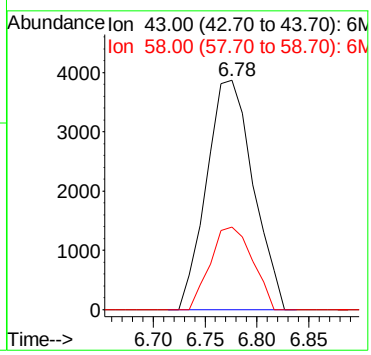


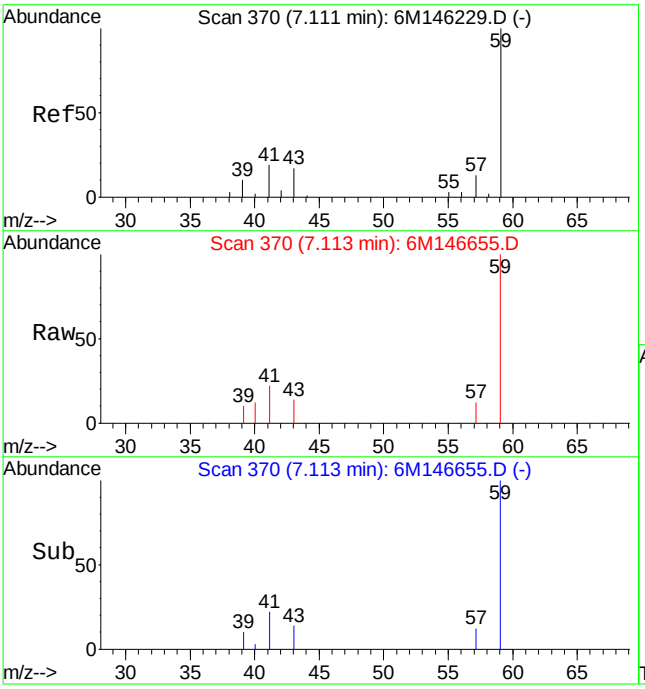


#13
Acetone
Concen: 11.80 ug/L
RT: 6.78 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 43 Resp: 12100

Ion	Ratio	Lower	Upper
43	100		
58	32.5	16.4	38.2

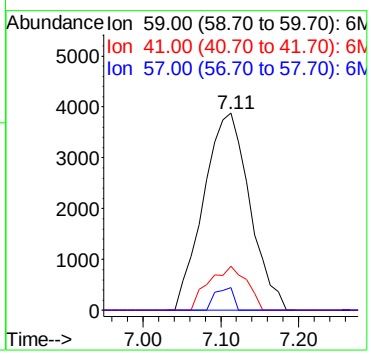


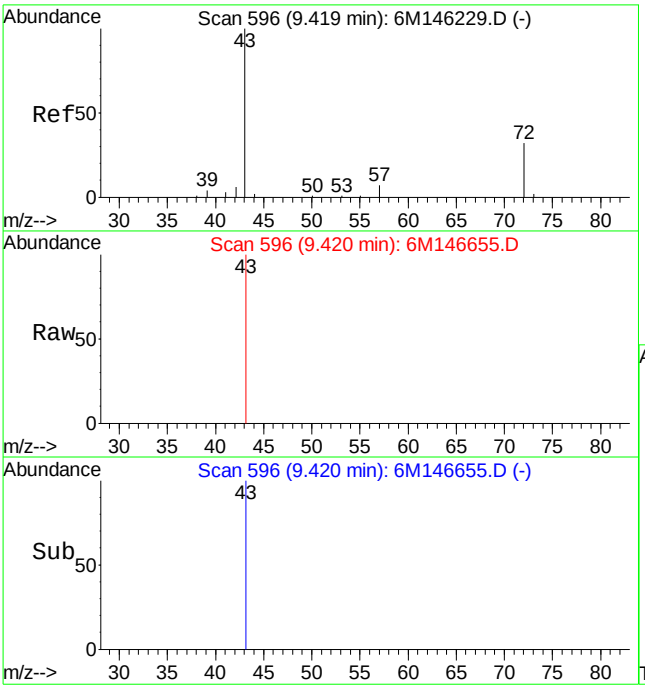


#15
Tert-Butyl Alcohol
Concen: 50.19 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 59 Resp: 15958

Ion	Ratio	Lower	Upper
59	100		
41	18.5	14.6	34.0
57	4.6	6.4	14.8#

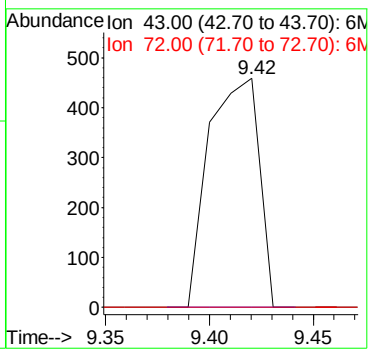


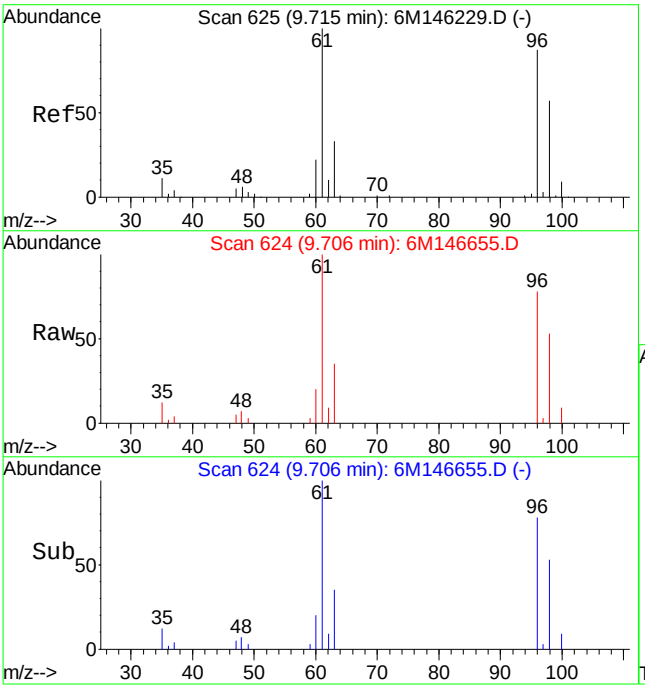


#29
2-Butanone
Concen: 0.60 ug/L
RT: 9.42 min Scan# 596
Delta R.T. 0.01 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 43 Resp: 771

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

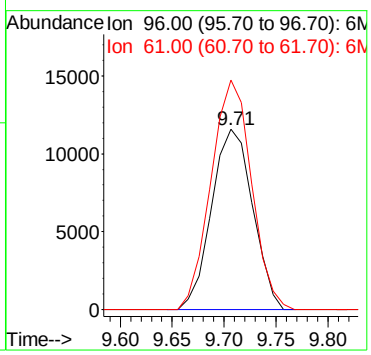


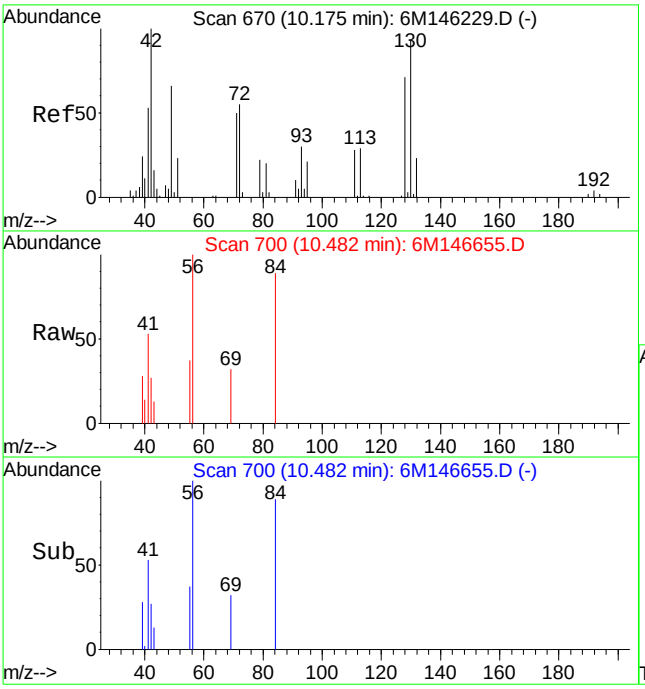


#32
cis-1,2-Dichloroethene
Concen: 5.56 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 96 Resp: 31859

Ion	Ratio	Lower	Upper
96	100		
61	125.4	89.2	208.2

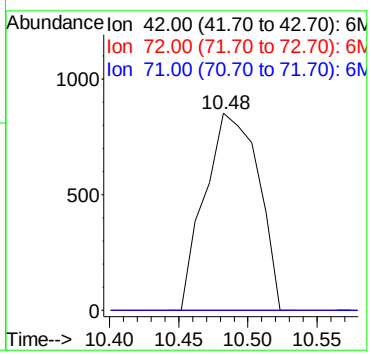


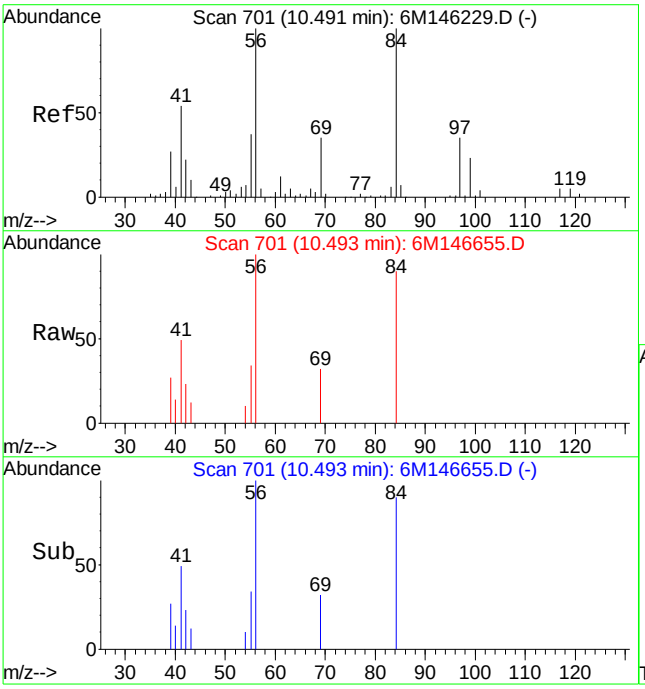


#36
Tetrahydrofuran
Concen: 2.69 ug/L
RT: 10.48 min Scan# 700
Delta R.T. 0.31 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 42 Resp: 2286

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

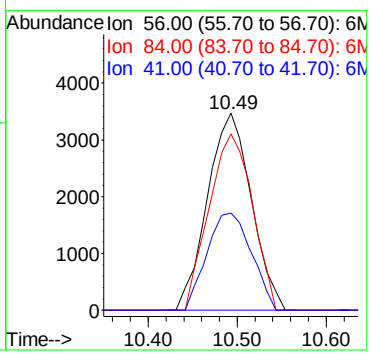


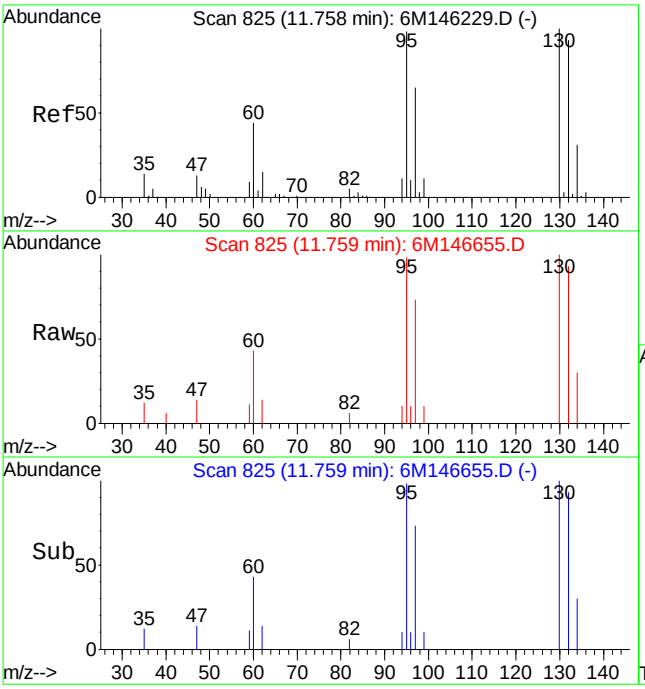


#39
Cyclohexane
Concen: 1.61 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 56 Resp: 11873

Ion	Ratio	Lower	Upper
56	100		
84	88.4	43.6	101.6
41	49.9	37.1	86.5

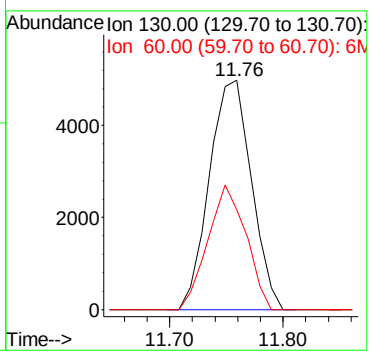


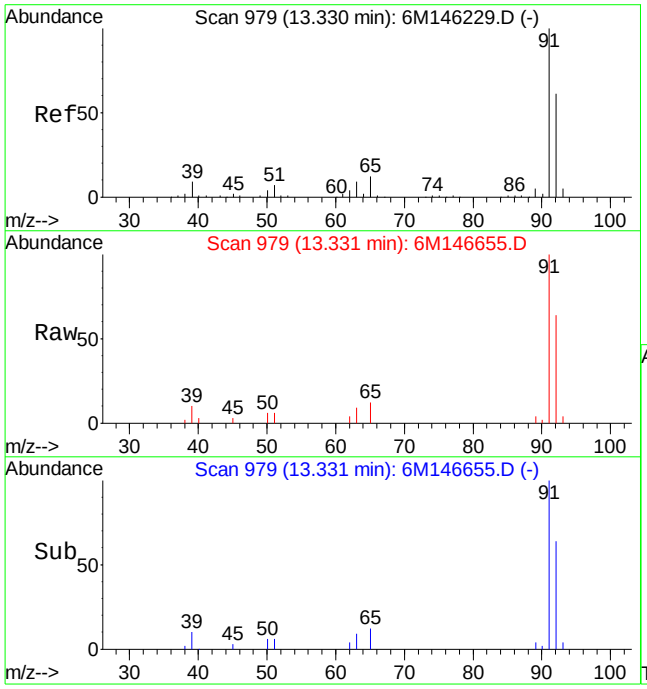


#47
Trichloroethene
Concen: 2.32 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion:130 Resp: 12860

Ion	Ratio	Lower	Upper
130	100		
60	49.0	32.0	74.6

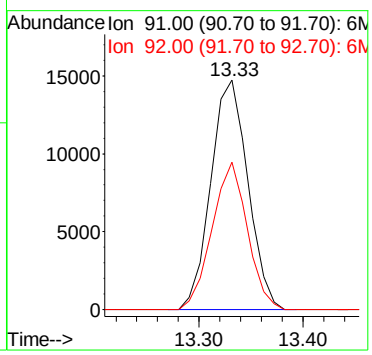


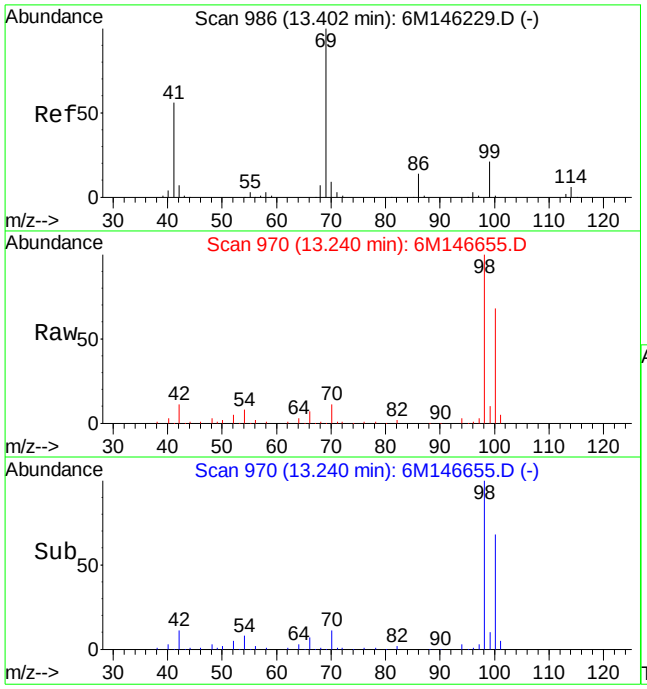


#59
Toluene
Concen: 1.69 ug/L
RT: 13.33 min Scan# 979
Delta R.T. -0.00 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 91 Resp: 36505

Ion	Ratio	Lower	Upper
91	100		
92	60.9	36.2	84.4

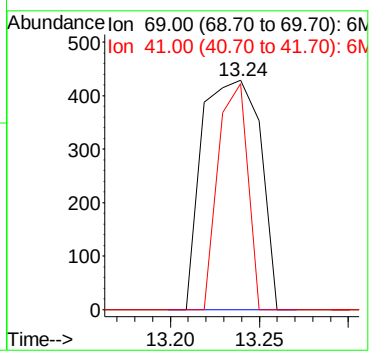


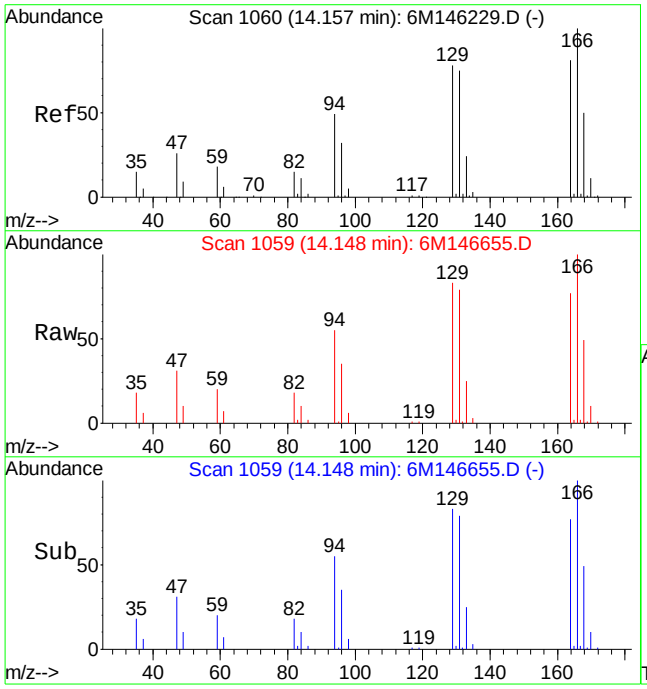


#60
Ethyl Methacrylate
Concen: 0.19 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion: 69 Resp: 971

Ion	Ratio	Lower	Upper
69	100		
41	49.9	51.4	120.0#

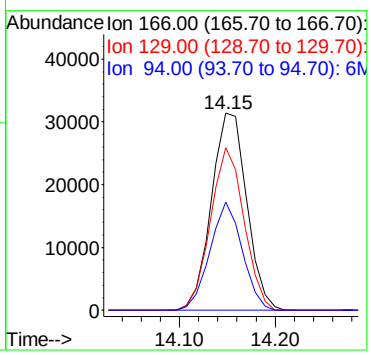




#66
Tetrachloroethene
Concen: 15.34 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146655.D
Acq: 22 Apr 2017 23:03

Tgt Ion:166 Resp: 80112

Ion	Ratio	Lower	Upper
166	100		
129	78.4	43.5	101.5
94	50.1	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419122.D Vial: 8
Acq On : 24 Apr 2017 14:45 Operator: TMB
Sample : L17041069-44 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 15:07:40 2017 Quant Results File: 8260WT.RES

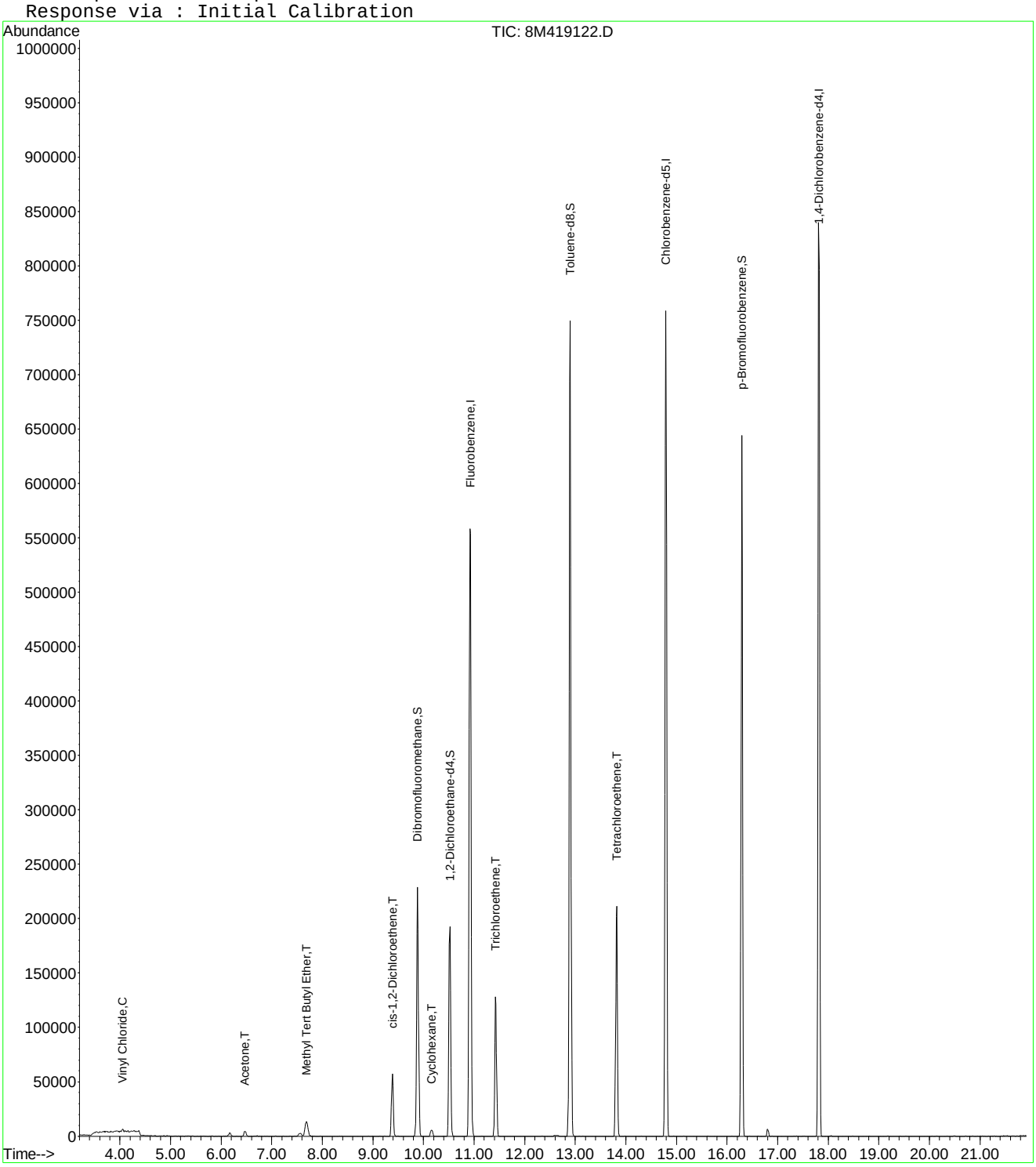
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

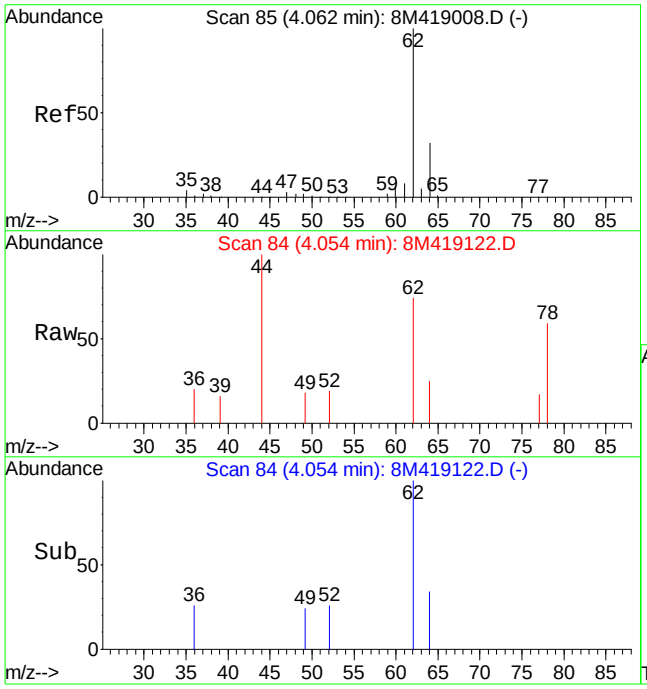
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	711158	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	565422	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	291689	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	187841	25.1825	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.72%			
43) 1,2-Dichloroethane-d4	10.52	65	165824	25.7150	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.88%			
58) Toluene-d8	12.90	98	689824	26.7010	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%			
80) p-Bromofluorobenzene	16.29	95	269013	26.1315	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.52%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	2872	0.2528	ug/L #	59
13) Acetone	6.47	43	9493	9.4911	ug/L	89
22) Methyl Tert Butyl Ether	7.69	73	30369	2.0824	ug/L	97
32) cis-1,2-Dichloroethene	9.39	96	34632	4.1815	ug/L	91
39) Cyclohexane	10.16	56	4927	0.4589	ug/L #	79
47) Trichloroethene	11.42	130	56508	6.8469	ug/L	99
66) Tetrachloroethene	13.82	164	67344	10.1865	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419122.D 8260WT.M Tue Apr 25 08:36:02 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419122.D Vial: 8
Acq On : 24 Apr 2017 14:45 Operator: TMB
Sample : L17041069-44 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 15:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

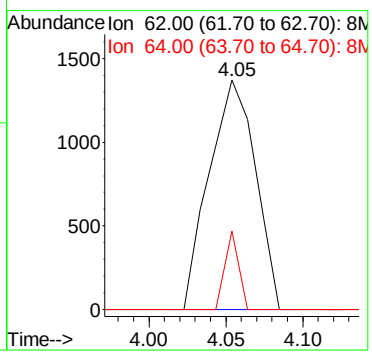


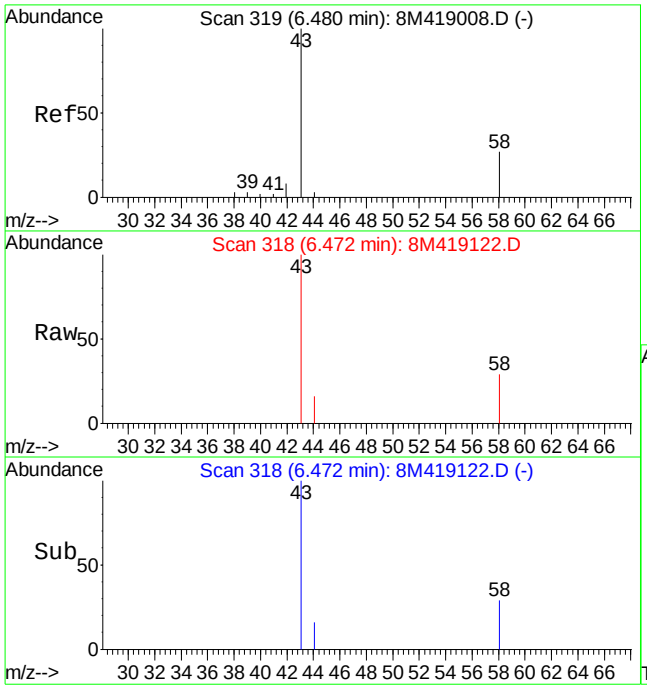


#4
Vinyl Chloride
Concen: 0.25 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion: 62 Resp: 2872

Ion	Ratio	Lower	Upper
62	100		
64	10.2	19.9	46.3#

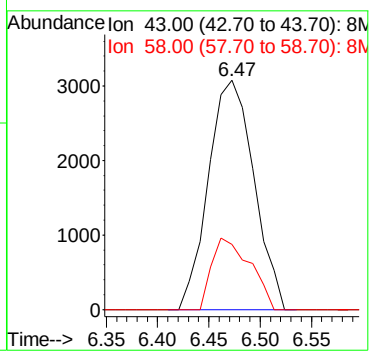


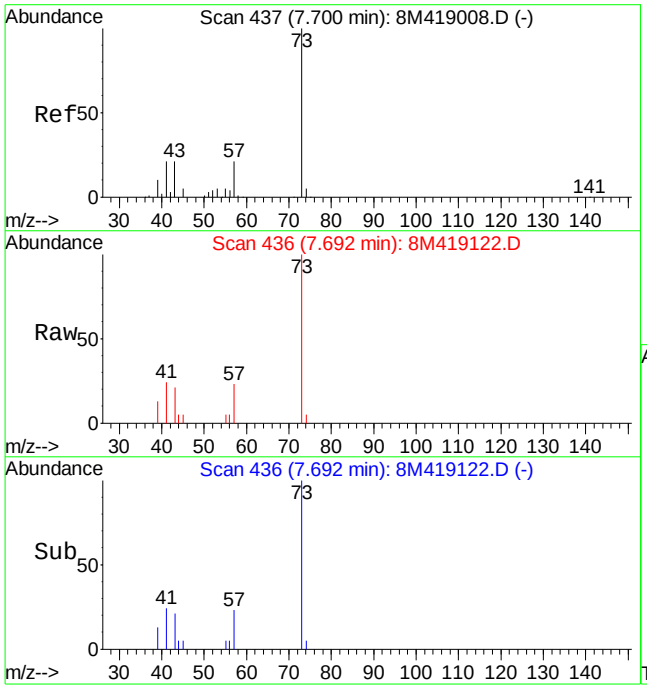


#13
Acetone
Concen: 9.49 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion: 43 Resp: 9493

Ion	Ratio	Lower	Upper
43	100		
58	26.3	19.4	45.4

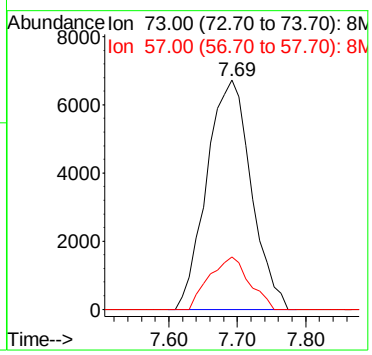


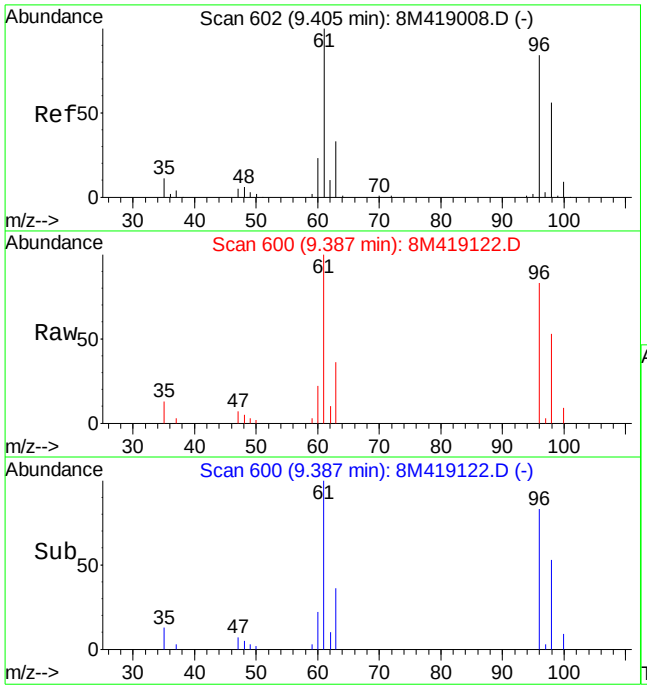


#22
Methyl Tert Butyl Ether
Concen: 2.08 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion: 73 Resp: 30369

Ion	Ratio	Lower	Upper
73	100		
57	20.4	11.4	26.6

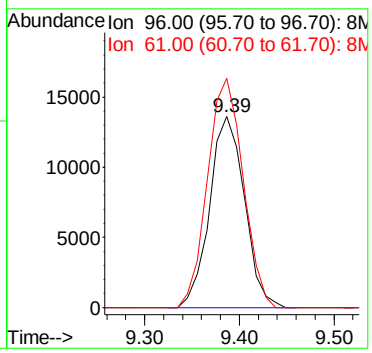


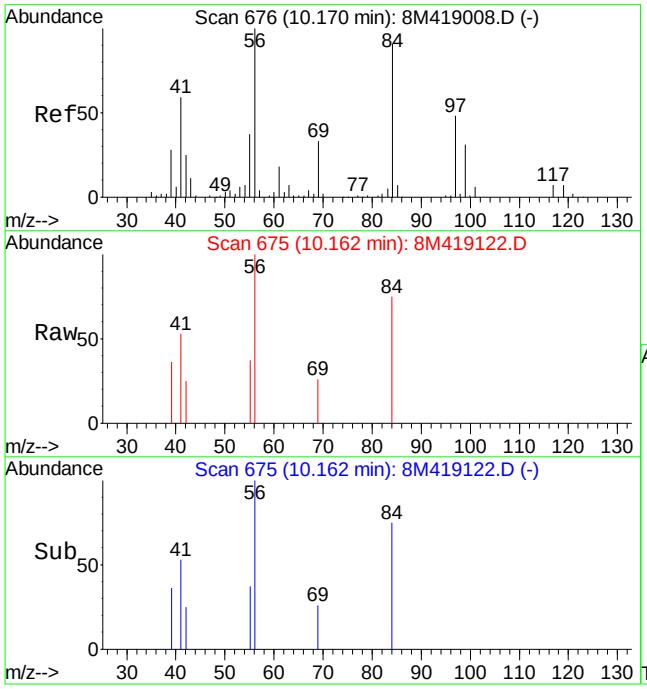


#32
cis-1,2-Dichloroethene
Concen: 4.18 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion: 96 Resp: 34632

Ion	Ratio	Lower	Upper
96	100		
61	122.7	80.3	187.3

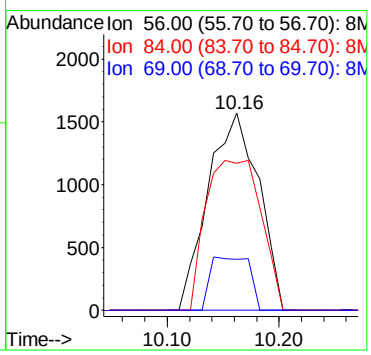


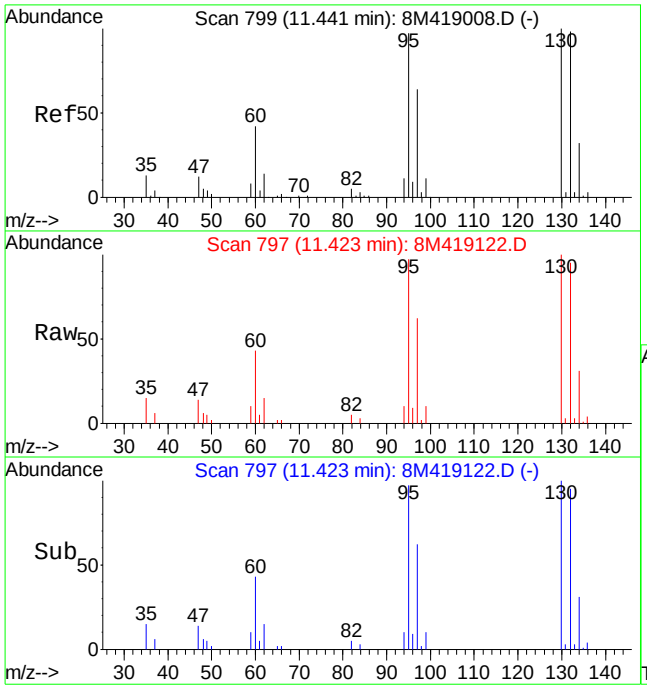


#39
Cyclohexane
Concen: 0.46 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion: 56 Resp: 4927

Ion	Ratio	Lower	Upper
56	100		
84	83.3	61.6	143.8
69	20.8	21.4	50.0#

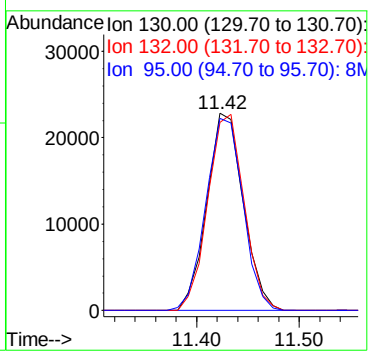


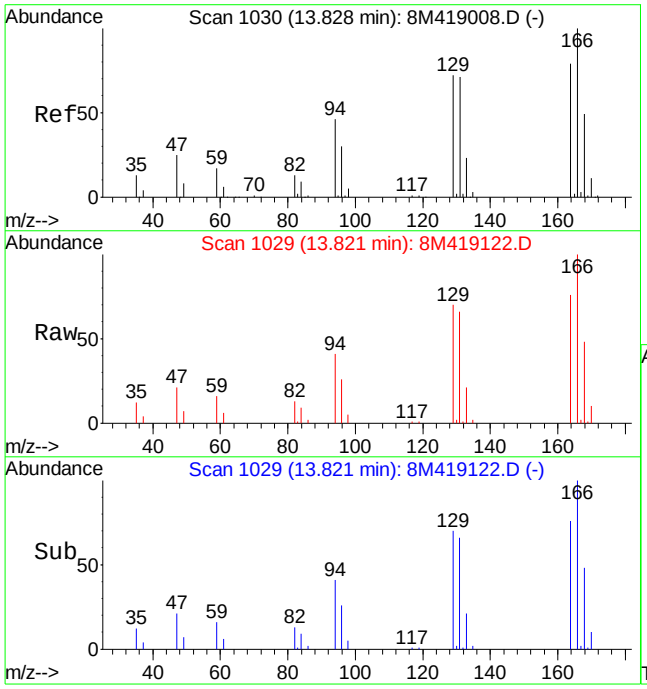


#47
Trichloroethene
Concen: 6.85 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion:130 Resp: 56508

Ion	Ratio	Lower	Upper
130	100		
132	98.3	59.4	138.6
95	98.9	60.1	140.3

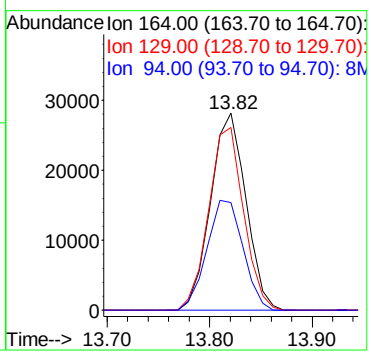




#66
Tetrachloroethene
Concen: 10.19 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419122.D
Acq: 24 Apr 2017 14:45

Tgt Ion:164 Resp: 67344

Ion	Ratio	Lower	Upper
164	100		
129	91.7	53.4	124.6
94	57.2	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146656.D Vial: 18
Acq On : 22 Apr 2017 23:33 Operator: JDS
Sample : L17041069-45 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 23:55:36 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

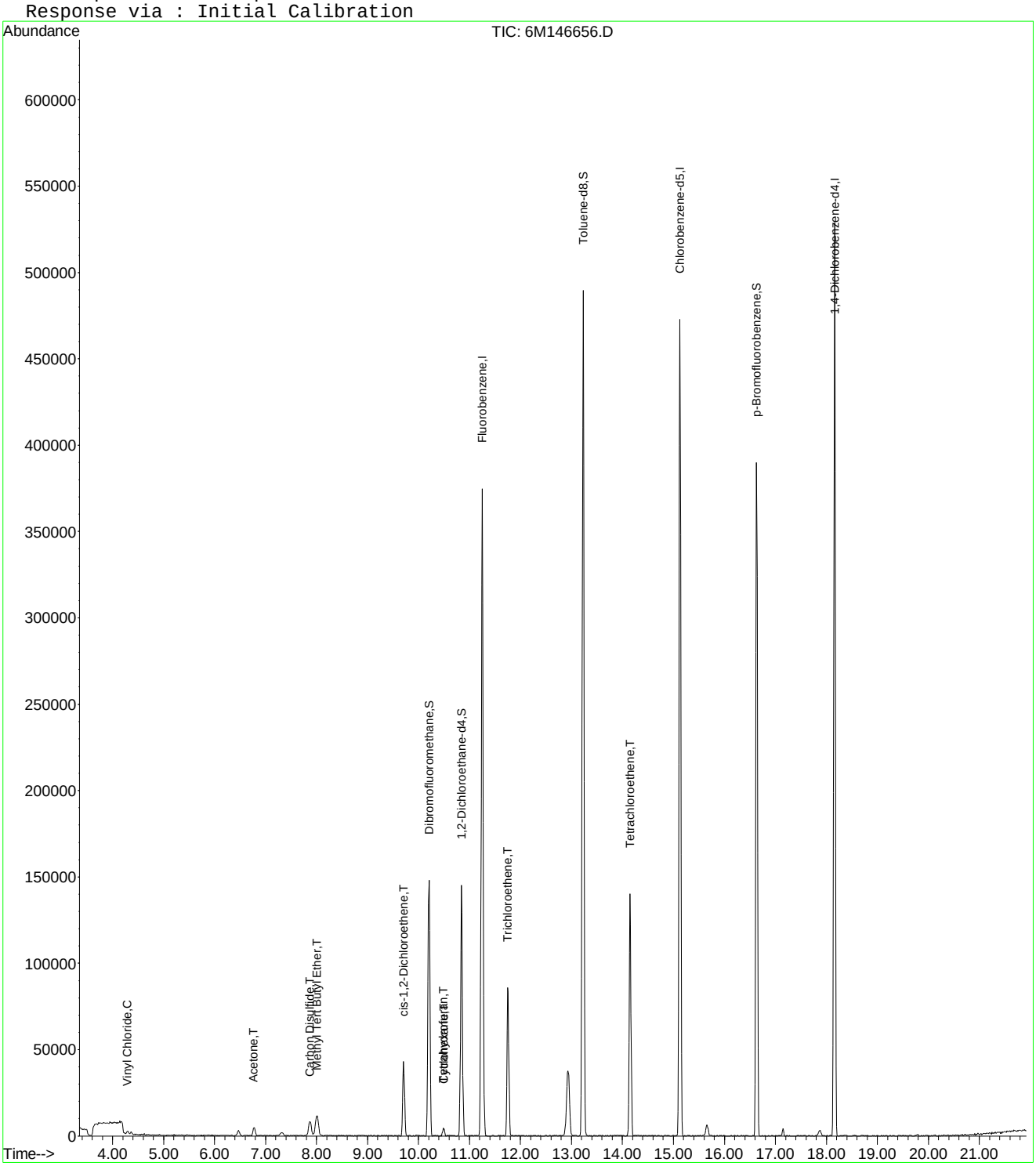
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	474144	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	347206	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	176902	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	128232	26.4931 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.96%		
43) 1,2-Dichloroethane-d4	10.84	65	127823	26.7949 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.16%		
58) Toluene-d8	13.23	98	454438	25.6497 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.60%		
80) p-Bromofluorobenzene	16.63	95	181003	26.9397 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.76%		
Target Compounds					Qvalue
3) Chloromethane	4.07	50	624	Below Cal #	55
4) Vinyl Chloride	4.28	62	1496	0.1739 ug/L #	69
13) Acetone	6.77	43	9535	9.3192 ug/L	92
20) Carbon Disulfide	7.87	76	2078	0.1336 ug/L #	74
22) Methyl Tert Butyl Ether	8.01	73	28055	2.3410 ug/L	89
32) cis-1,2-Dichloroethene	9.71	96	25883	4.5254 ug/L	84
36) Tetrahydrofuran	10.48	42	208	0.2449 ug/L #	41
39) Cyclohexane	10.49	56	3598	0.4875 ug/L	81
47) Trichloroethene	11.75	130	39378	7.1312 ug/L	92
66) Tetrachloroethene	14.15	166	54324	10.3274 ug/L	95

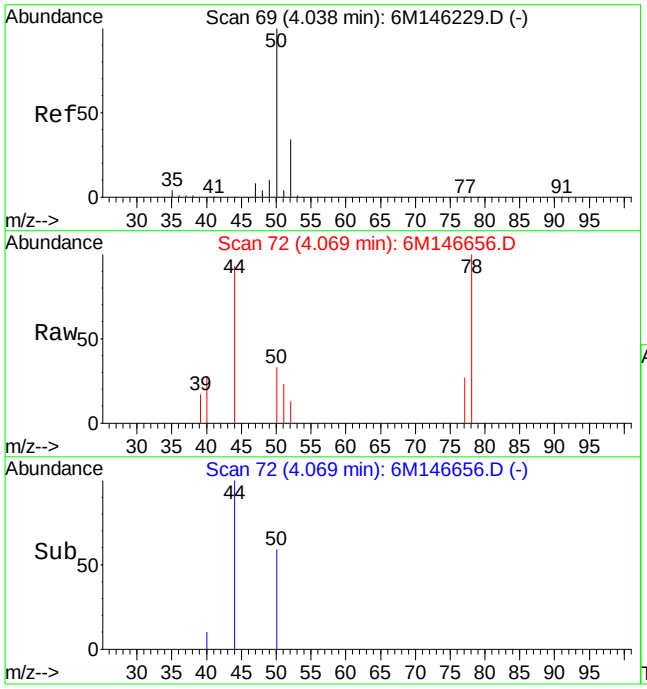
(#) = qualifier out of range (m) = manual integration
6M146656.D 8260BWT.M Mon Apr 24 08:43:35 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146656.D Vial: 18
Acq On : 22 Apr 2017 23:33 Operator: JDS
Sample : L17041069-45 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 23:55 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

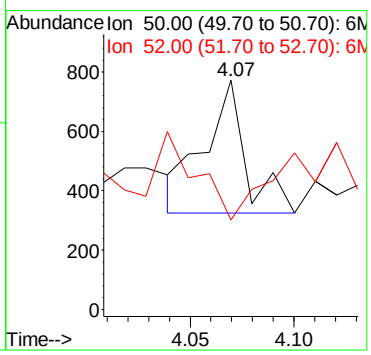


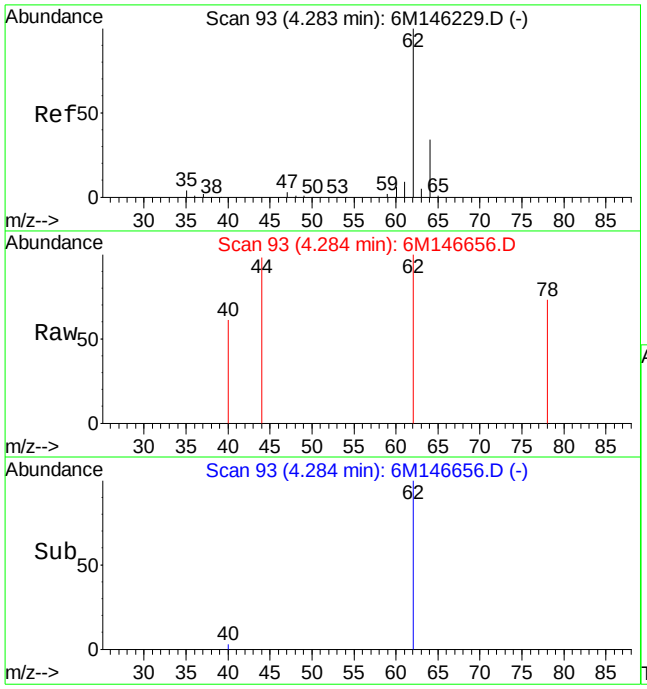


#3
Chloromethane
Concen: Below Cal
RT: 4.07 min Scan# 72
Delta R.T. 0.05 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 50 Resp: 624

Ion	Ratio	Lower	Upper
50	100		
52	58.3	19.8	46.2#

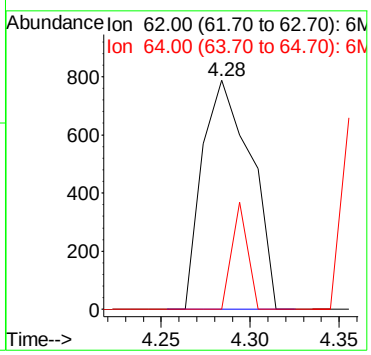


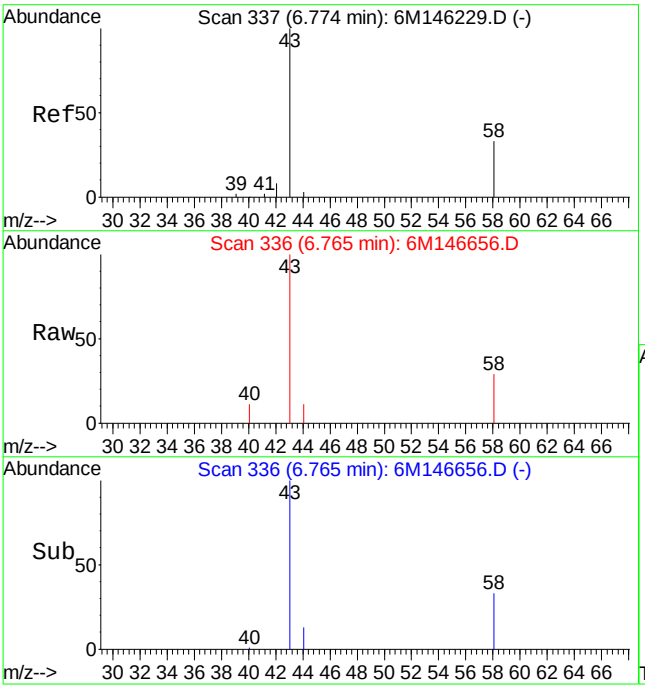


#4
Vinyl Chloride
Concen: 0.17 ug/L
RT: 4.28 min Scan# 93
Delta R.T. 0.01 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 62 Resp: 1496

Ion	Ratio	Lower	Upper
62	100		
64	15.0	19.3	45.1#

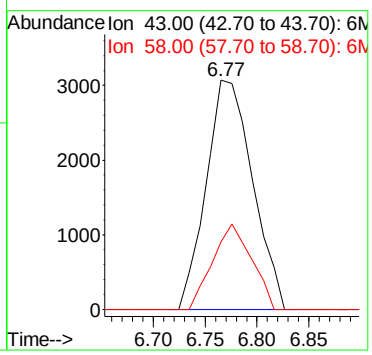


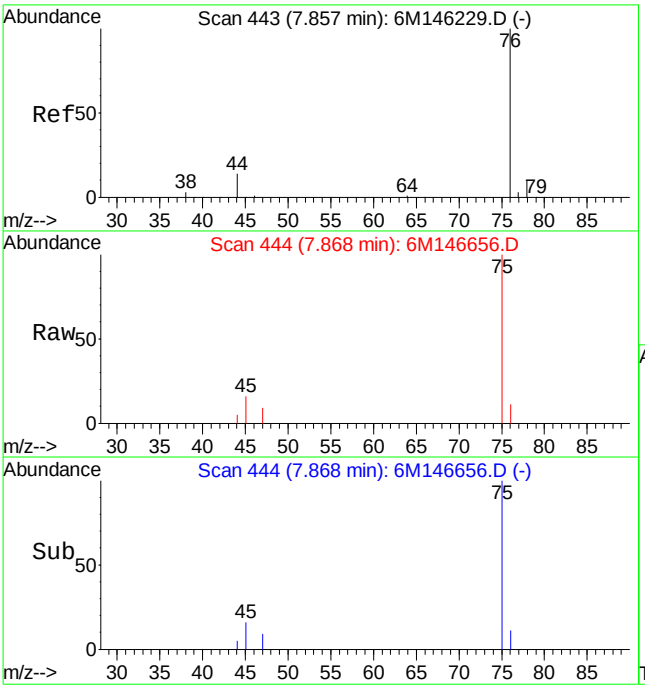


#13
Acetone
Concen: 9.32 ug/L
RT: 6.77 min Scan# 336
Delta R.T. -0.01 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 43 Resp: 9535

Ion	Ratio	Lower	Upper
43	100		
58	31.2	16.4	38.2

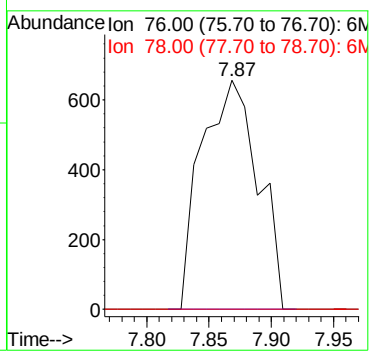


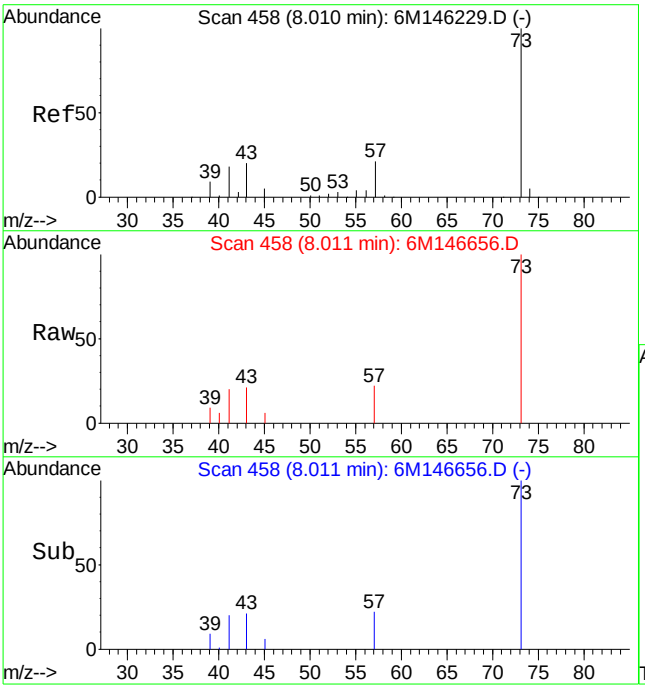


#20
Carbon Disulfide
Concen: 0.13 ug/L
RT: 7.87 min Scan# 444
Delta R.T. 0.02 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 76 Resp: 2078

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.7	13.3#

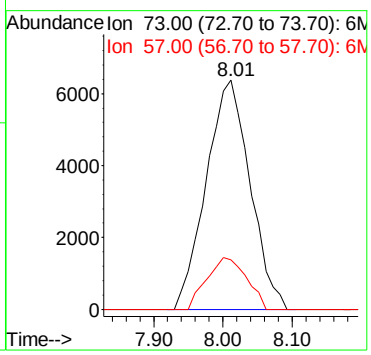


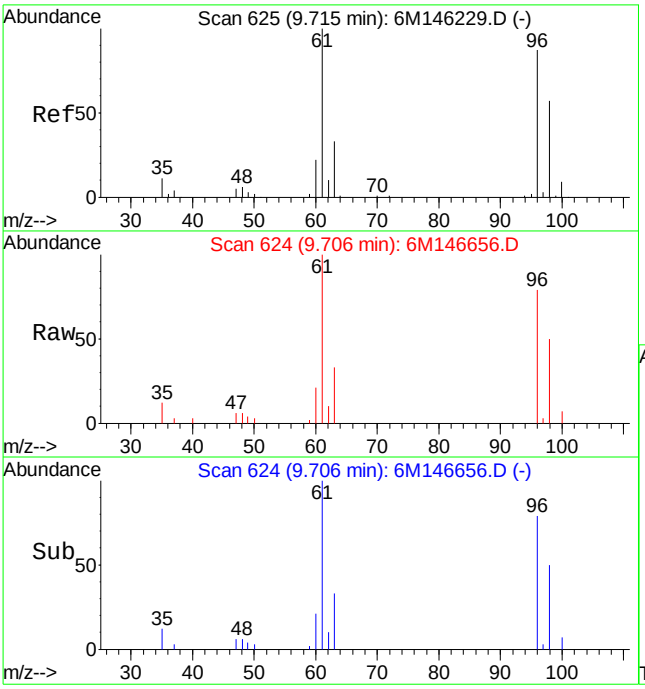


#22
Methyl Tert Butyl Ether
Concen: 2.34 ug/L
RT: 8.01 min Scan# 458
Delta R.T. -0.01 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 73 Resp: 28055

Ion	Ratio	Lower	Upper
73	100		
57	20.5	15.7	36.5

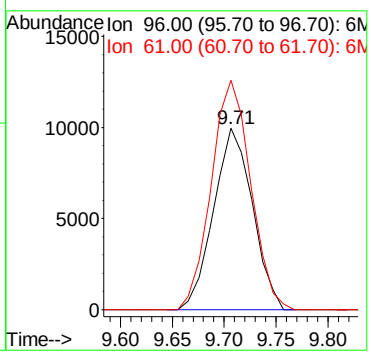


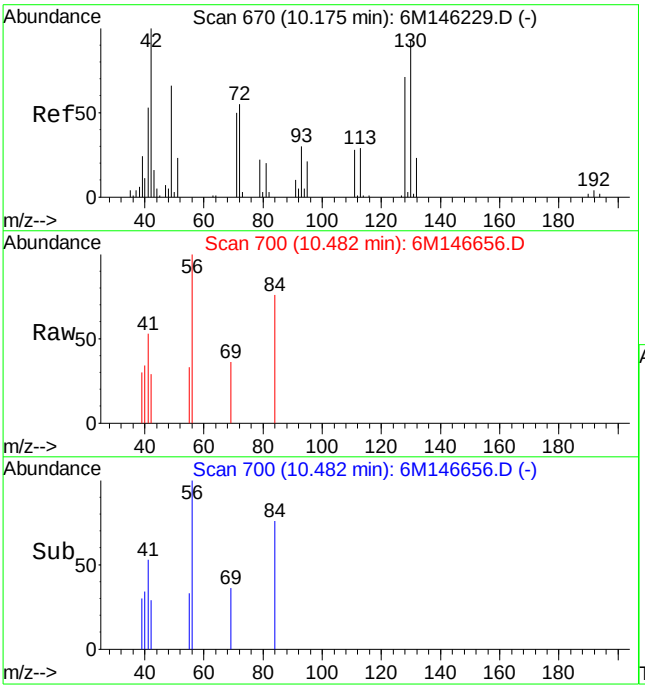


#32
cis-1,2-Dichloroethene
Concen: 4.53 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 96 Resp: 25883

Ion	Ratio	Lower	Upper
96	100		
61	128.4	89.2	208.2

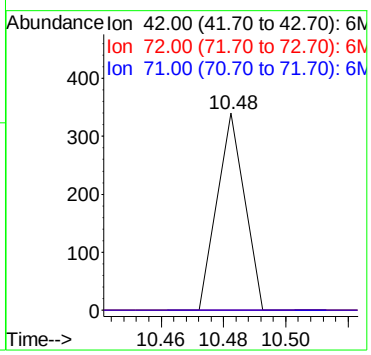


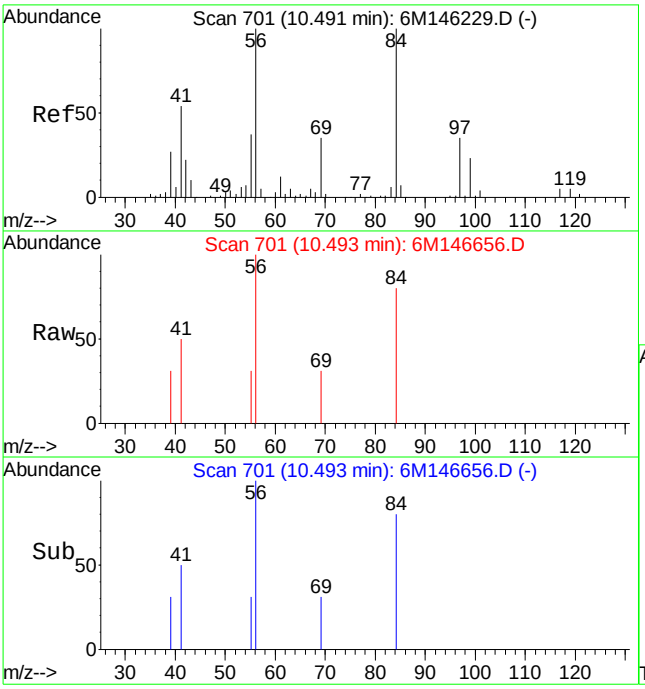


#36
Tetrahydrofuran
Concen: 0.24 ug/L
RT: 10.48 min Scan# 700
Delta R.T. 0.31 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 42 Resp: 208

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

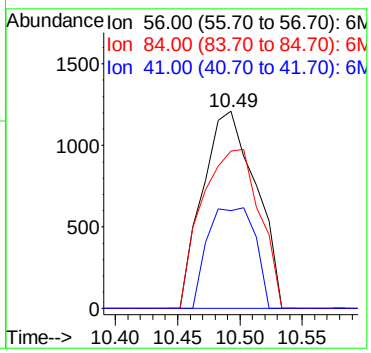


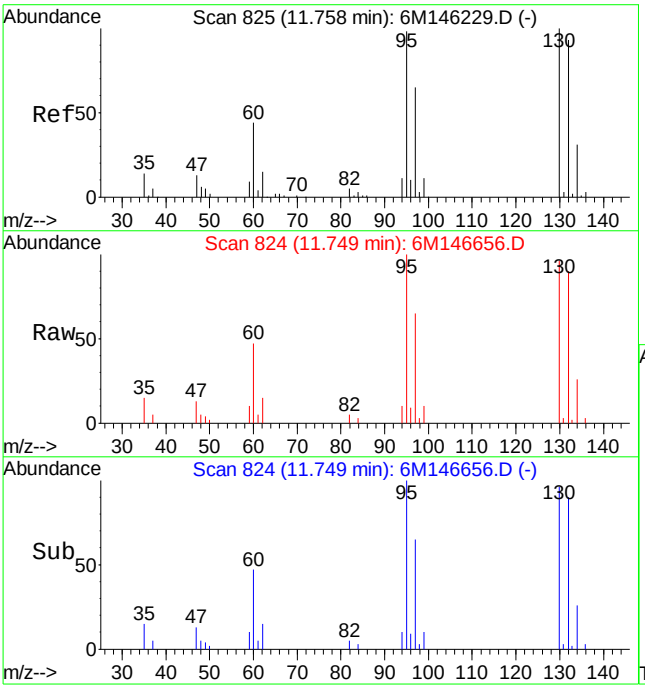


#39
Cyclohexane
Concen: 0.49 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion: 56 Resp: 3598

Ion	Ratio	Lower	Upper
56	100		
84	87.0	43.6	101.6
41	45.5	37.1	86.5

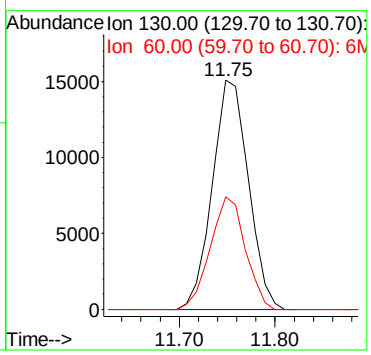


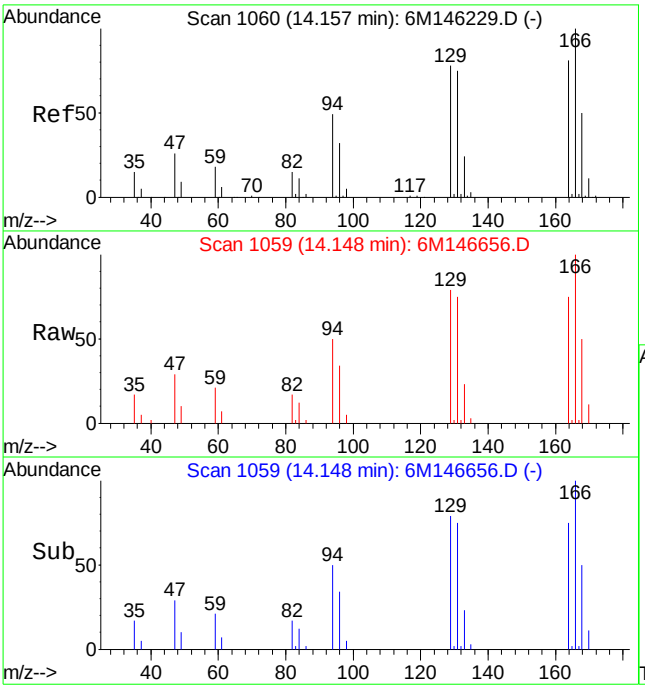


#47
Trichloroethene
Concen: 7.13 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion:130 Resp: 39378

Ion	Ratio	Lower	Upper
130	100		
60	47.5	32.0	74.6

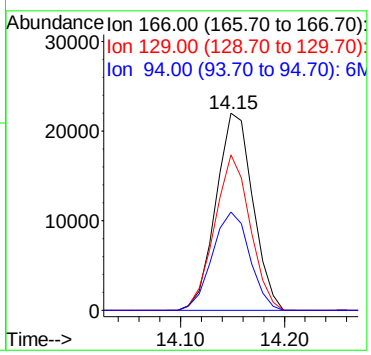




#66
Tetrachloroethene
Concen: 10.33 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146656.D
Acq: 22 Apr 2017 23:33

Tgt Ion:166 Resp: 54324

Ion	Ratio	Lower	Upper
166	100		
129	75.9	43.5	101.5
94	50.6	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146657.D Vial: 19
Acq On : 23 Apr 2017 00:03 Operator: JDS
Sample : L17041069-46 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 23 00:25:42 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

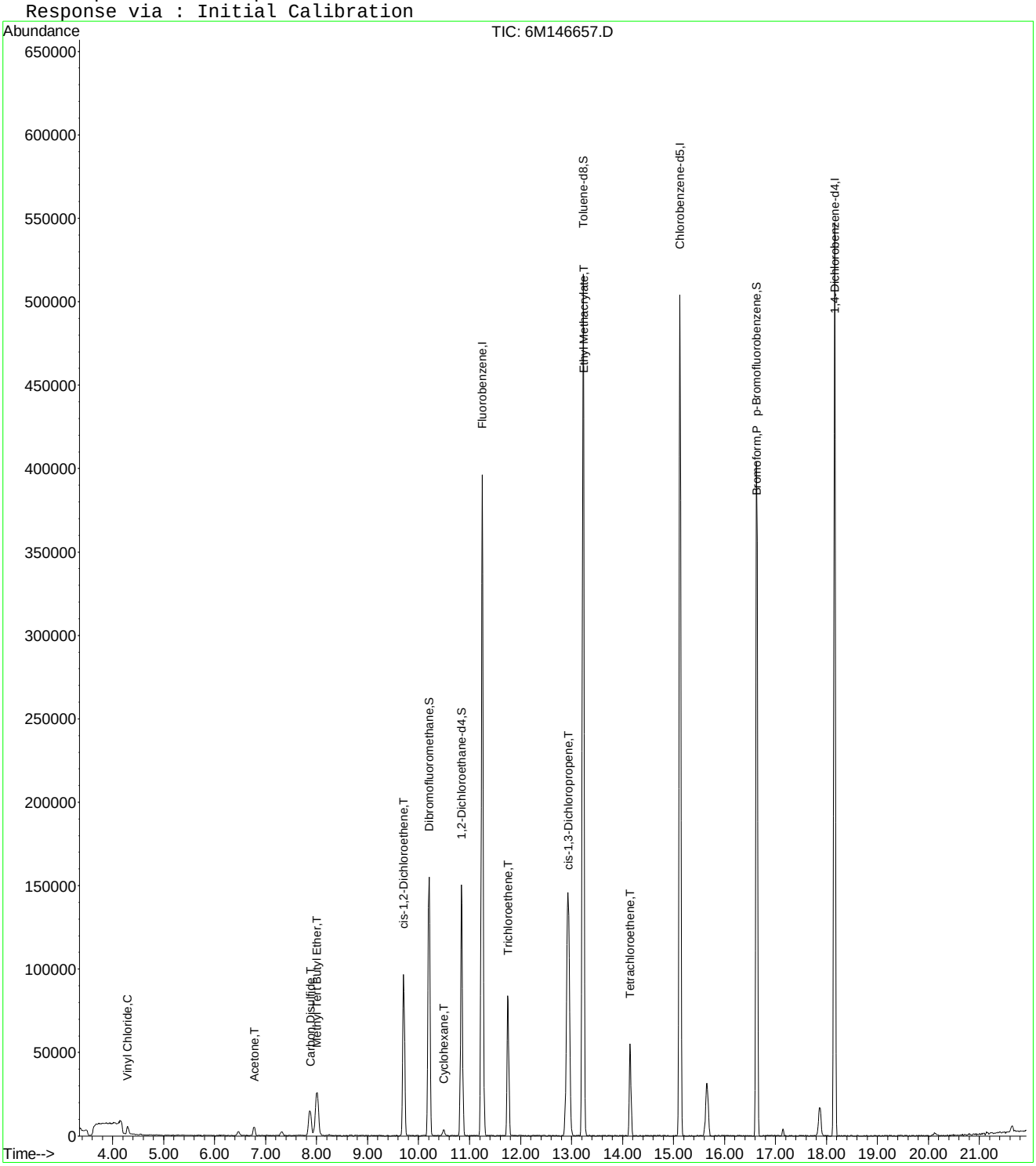
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	502339	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	363759	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	183751	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	133115	25.9583 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.84%		
43) 1,2-Dichloroethane-d4	10.84	65	135673	26.8442 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.36%		
58) Toluene-d8	13.23	98	479557	25.8357 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.36%		
80) p-Bromofluorobenzene	16.63	95	190068	27.2345 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.92%		
Target Compounds					Qvalue
3) Chloromethane	3.84	50	290	Below Cal #	42
4) Vinyl Chloride	4.29	62	7384	0.8103 ug/L	94
13) Acetone	6.77	43	10913	10.0673 ug/L	95
20) Carbon Disulfide	7.88	76	3262	0.1979 ug/L #	74
22) Methyl Tert Butyl Ether	8.01	73	59741	4.7053 ug/L	89
32) cis-1,2-Dichloroethene	9.71	96	59548	9.8271 ug/L	82
39) Cyclohexane	10.49	56	3294	0.4213 ug/L	72
47) Trichloroethene	11.76	130	38019	6.4986 ug/L	91
55) cis-1,3-Dichloropropene	12.94	75	4620	0.5859 ug/L #	46
60) Ethyl Methacrylate	13.24	69	851	0.1546 ug/L	81
66) Tetrachloroethene	14.15	166	22065	4.0038 ug/L	96
76) Bromoform	16.64	173	588	0.1821 ug/L #	1

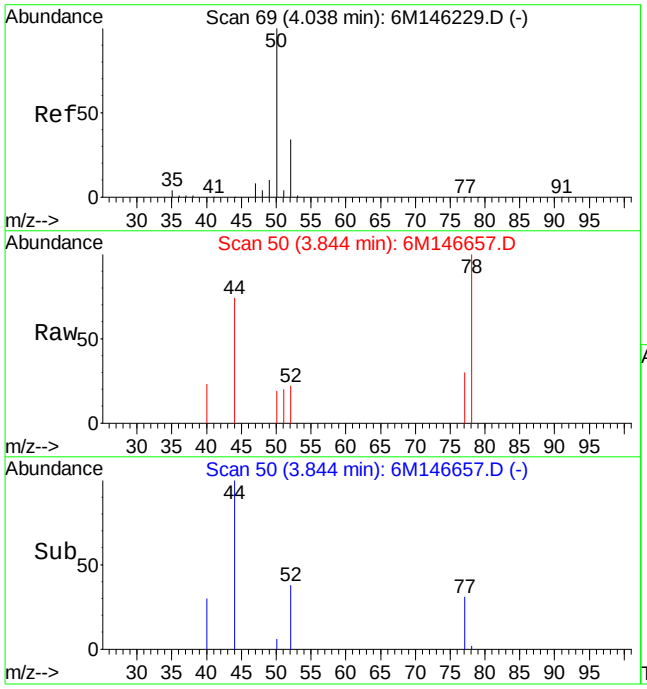
(#) = qualifier out of range (m) = manual integration
6M146657.D 8260BWT.M Mon Apr 24 08:43:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146657.D Vial: 19
Acq On : 23 Apr 2017 00:03 Operator: JDS
Sample : L17041069-46 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 23 0:25 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

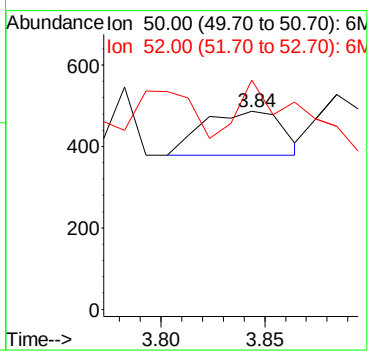


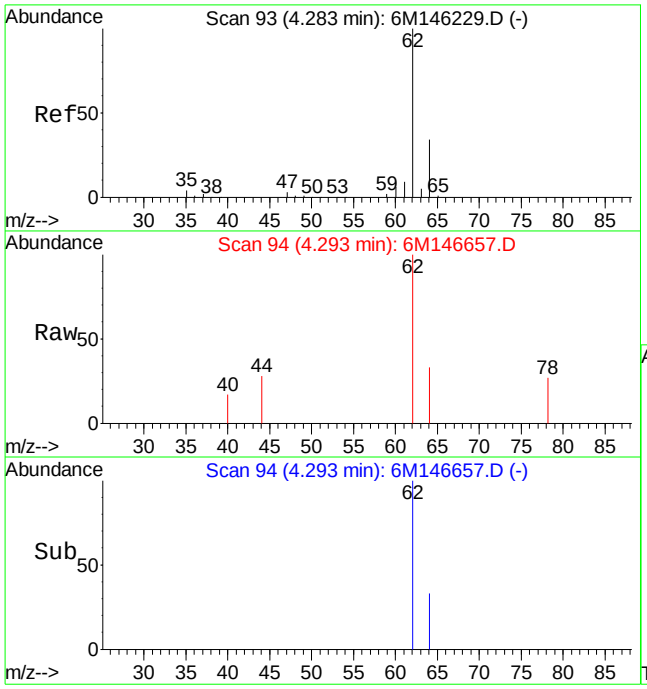


#3
Chloromethane
Concen: Below Cal
RT: 3.84 min Scan# 50
Delta R.T. -0.17 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 50 Resp: 290

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

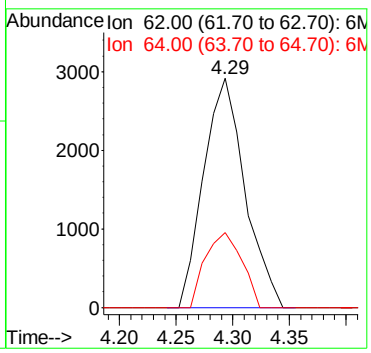


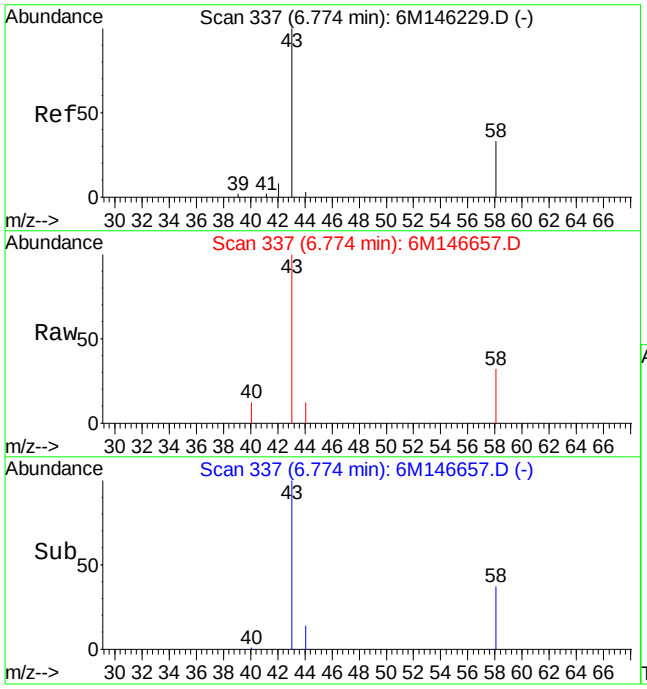


#4
Vinyl Chloride
Concen: 0.81 ug/L
RT: 4.29 min Scan# 94
Delta R.T. 0.02 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 62 Resp: 7384

Ion	Ratio	Lower	Upper
62	100		
64	28.9	19.3	45.1

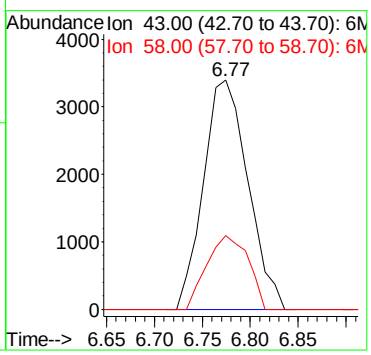


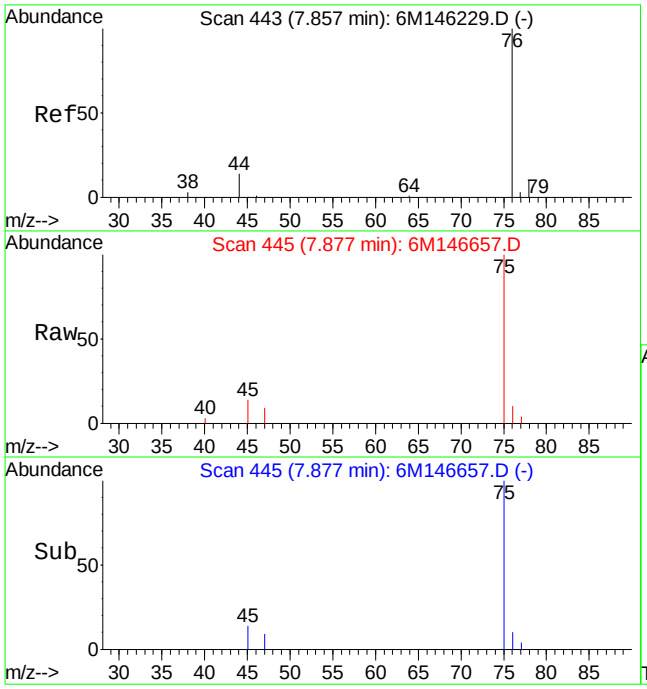


#13
Acetone
Concen: 10.07 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 43 Resp: 10913

Ion	Ratio	Lower	Upper
43	100		
58	29.9	16.4	38.2

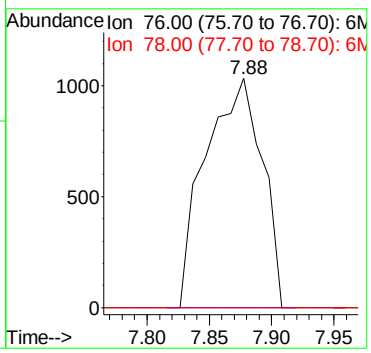


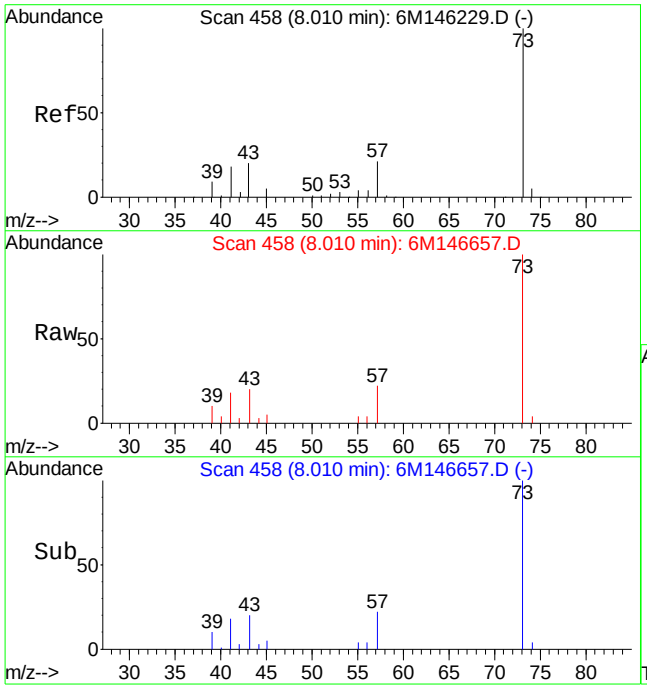


#20
Carbon Disulfide
Concen: 0.20 ug/L
RT: 7.88 min Scan# 445
Delta R.T. 0.03 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 76 Resp: 3262

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.7	13.3#

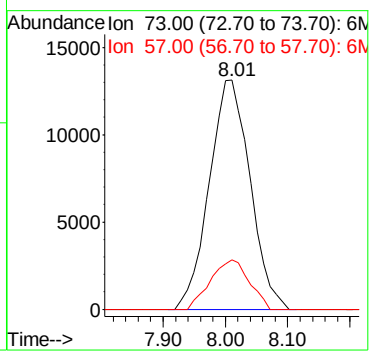


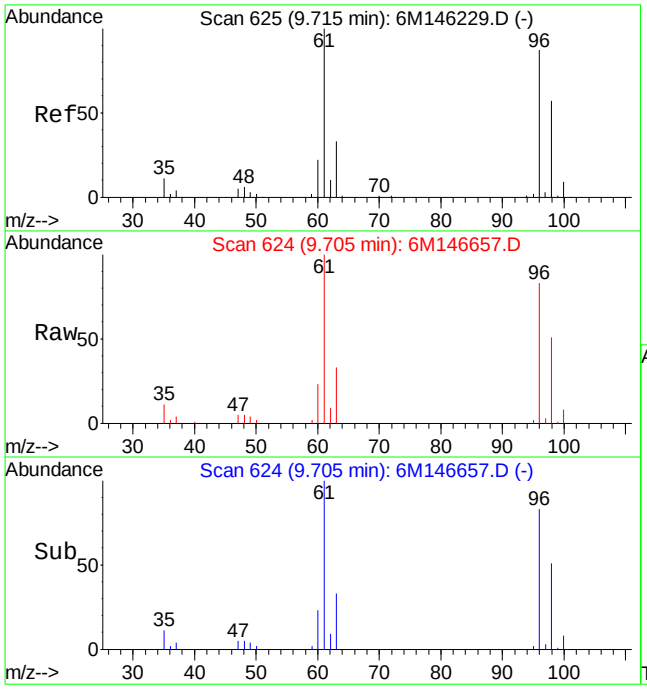


#22
Methyl Tert Butyl Ether
Concen: 4.71 ug/L
RT: 8.01 min Scan# 458
Delta R.T. -0.01 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 73 Resp: 59741

Ion	Ratio	Lower	Upper
73	100		
57	20.4	15.7	36.5

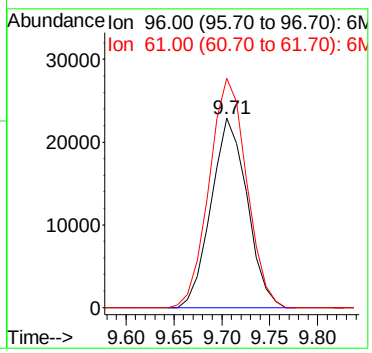


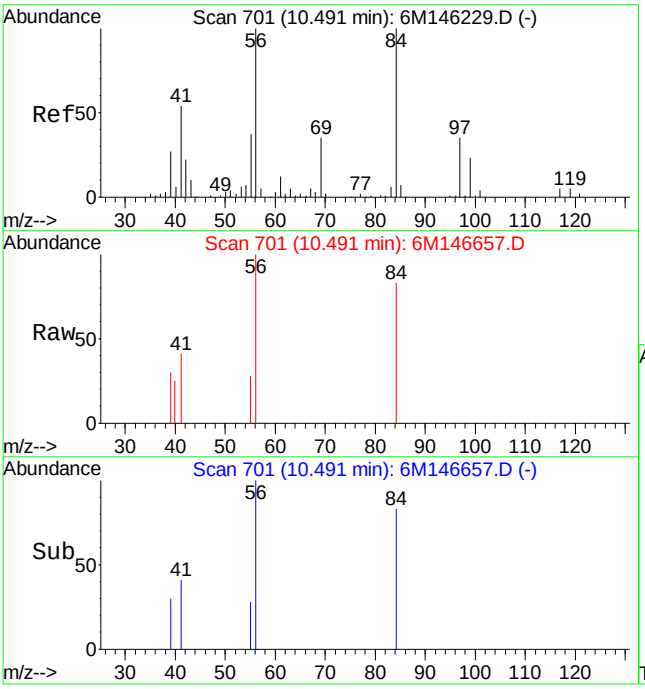


#32
cis-1,2-Dichloroethene
Concen: 9.83 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 96 Resp: 59548

Ion	Ratio	Lower	Upper
96	100		
61	125.9	89.2	208.2

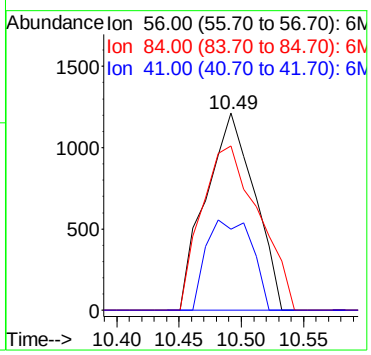


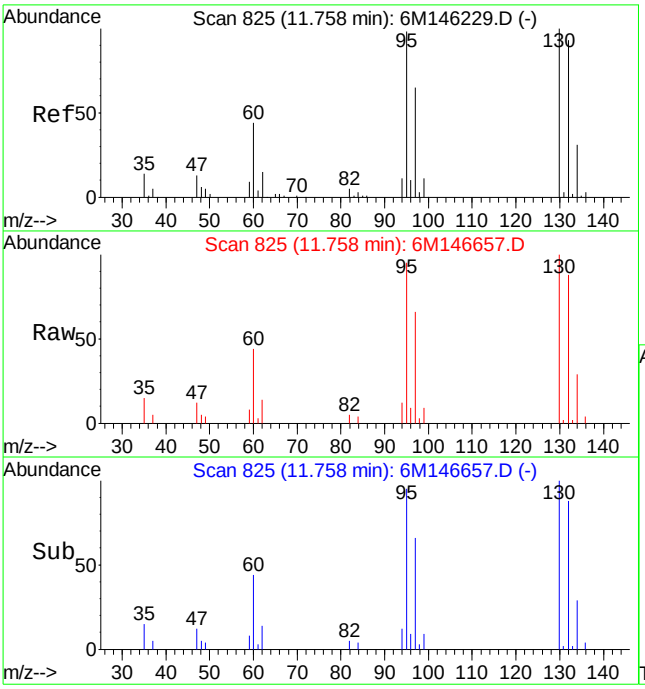


#39
Cyclohexane
Concen: 0.42 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 56 Resp: 3294

Ion	Ratio	Lower	Upper
56	100		
84	97.9	43.6	101.6
41	43.1	37.1	86.5

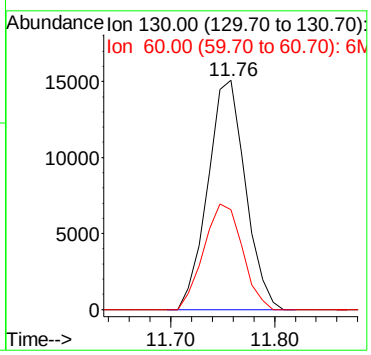


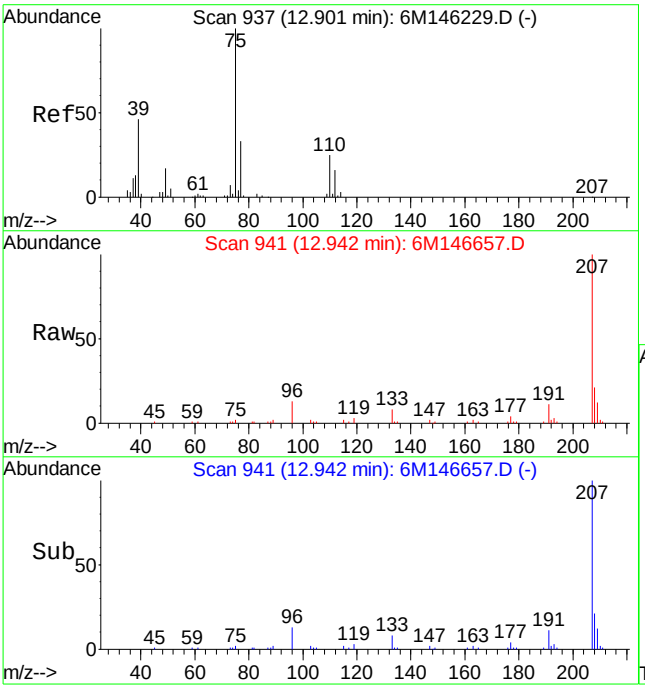


#47
Trichloroethene
Concen: 6.50 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion:130 Resp: 38019

Ion	Ratio	Lower	Upper
130	100		
60	47.2	32.0	74.6

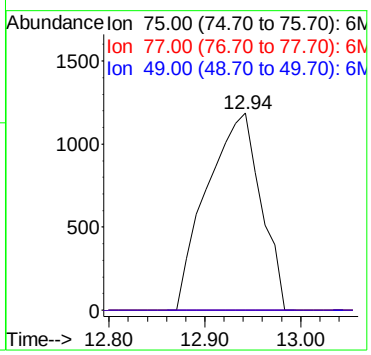


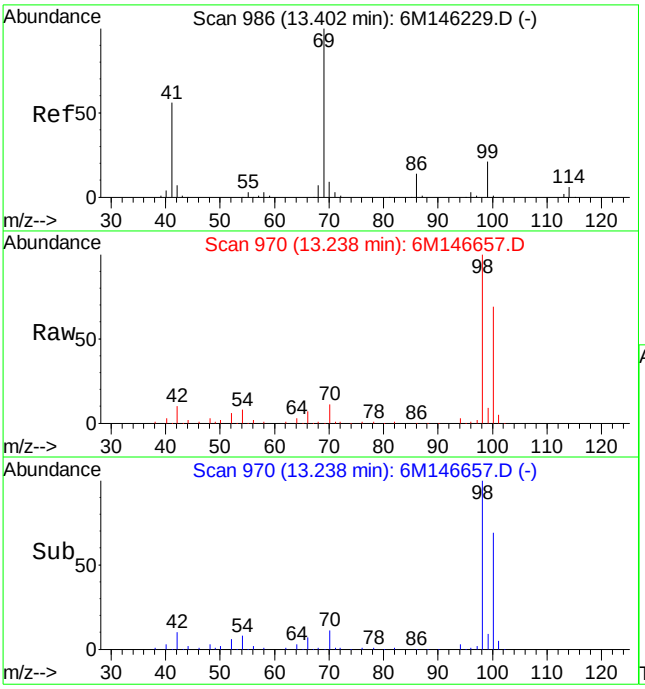


#55
cis-1,3-Dichloropropene
Concen: 0.59 ug/L
RT: 12.94 min Scan# 941
Delta R.T. 0.04 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 75 Resp: 4620

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#
49	0.0	14.1	32.9#

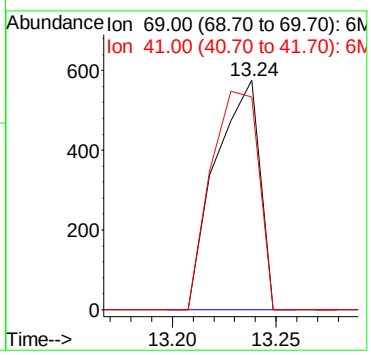


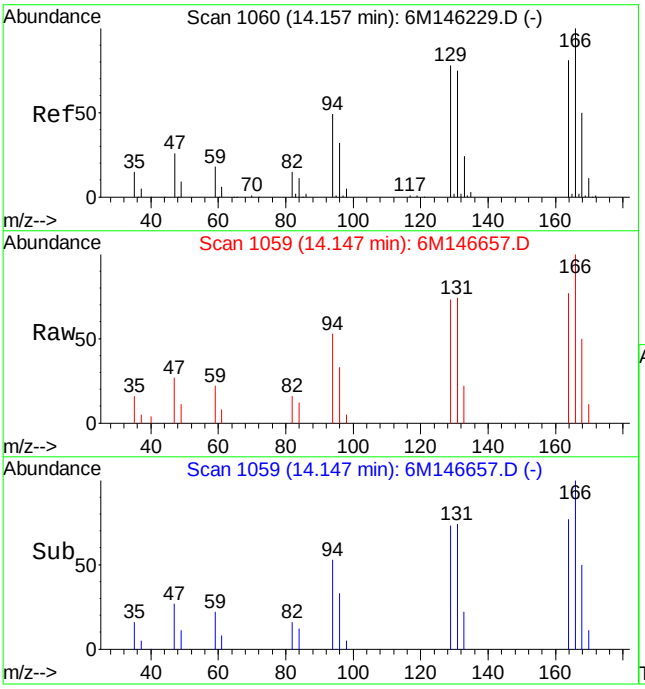


#60
Ethyl Methacrylate
Concen: 0.15 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion: 69 Resp: 851

Ion	Ratio	Lower	Upper
69	100		
41	102.9	51.4	120.0

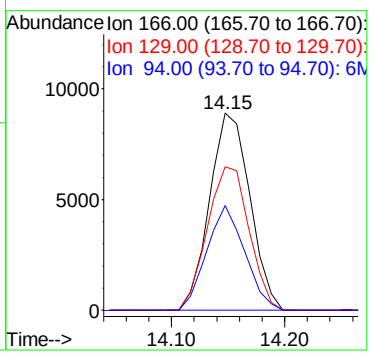


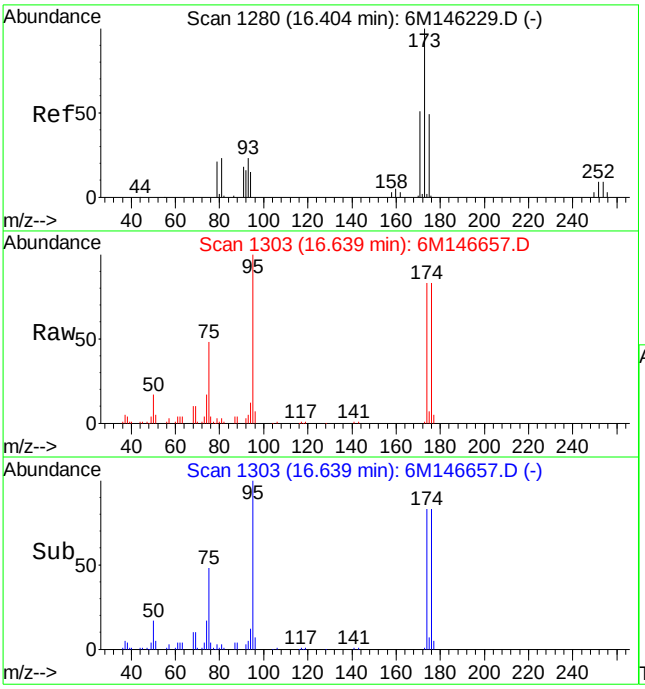


#66
Tetrachloroethene
Concen: 4.00 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion:166 Resp: 22065

Ion	Ratio	Lower	Upper
166	100		
129	75.3	43.5	101.5
94	50.1	27.8	64.8

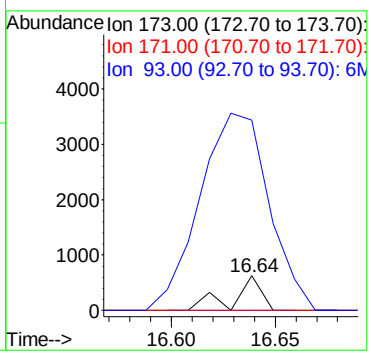




#76
Bromoform
Concen: 0.18 ug/L
RT: 16.64 min Scan# 1303
Delta R.T. 0.23 min
Lab File: 6M146657.D
Acq: 23 Apr 2017 00:03

Tgt Ion:173 Resp: 588

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1405.1	13.7	31.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419123.D Vial: 9
Acq On : 24 Apr 2017 15:16 Operator: TMB
Sample : L17041069-47 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 15:38:03 2017 Quant Results File: 8260WT.RES

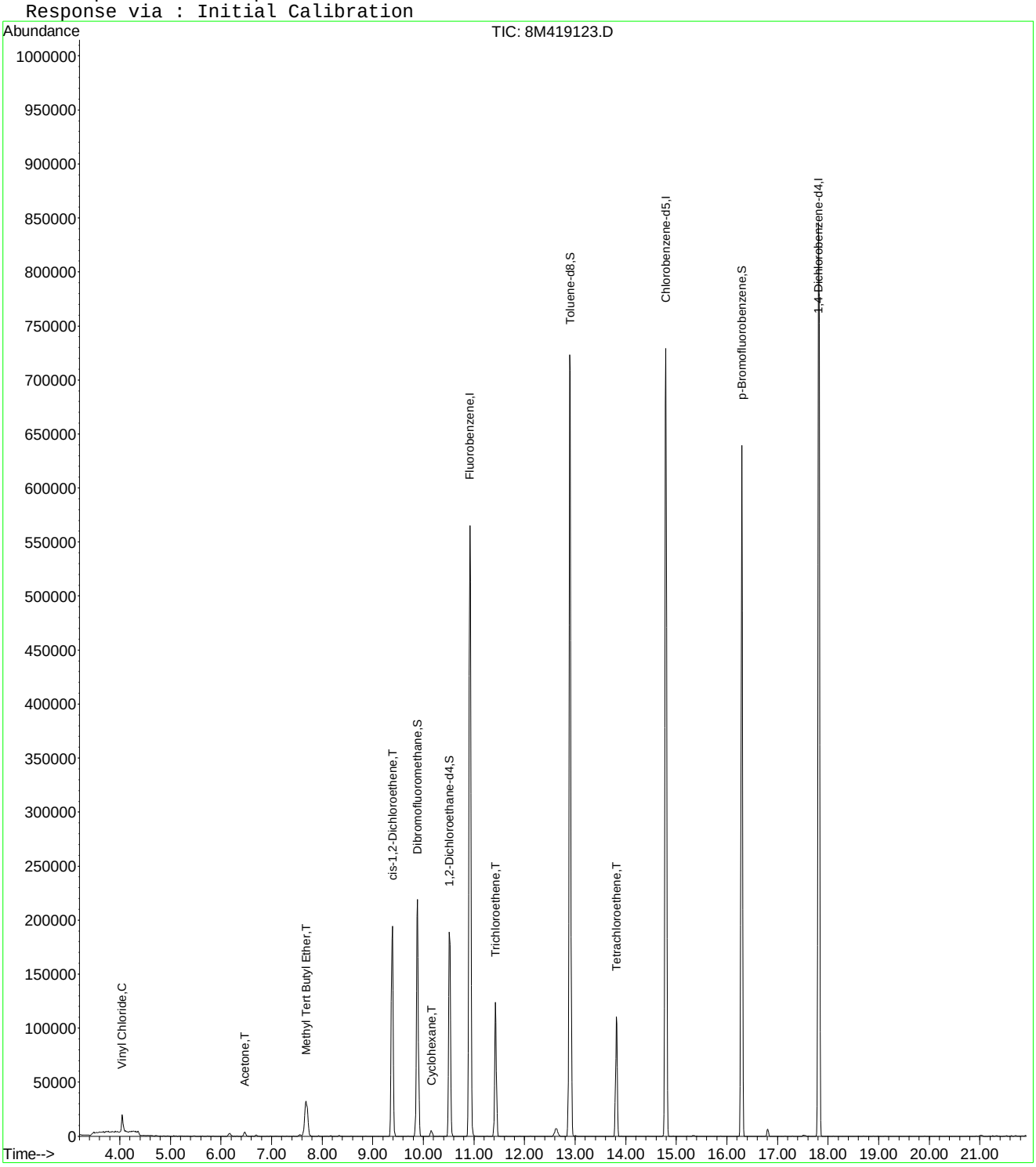
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

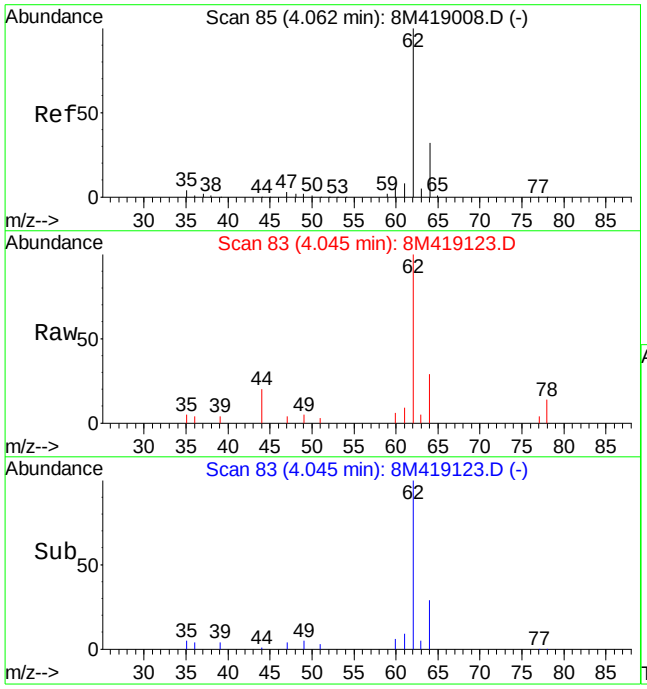
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	701328	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	559908	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	291087	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	185146	25.1691	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.68%			
43) 1,2-Dichloroethane-d4	10.51	65	162191	25.5042	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.00%			
58) Toluene-d8	12.90	98	683156	26.7033	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%			
80) p-Bromofluorobenzene	16.29	95	268577	26.1431	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.56%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.04	62	22558	2.0131	ug/L	94
13) Acetone	6.47	43	7018	7.1150	ug/L	92
22) Methyl Tert Butyl Ether	7.68	73	72634	5.0504	ug/L	97
32) cis-1,2-Dichloroethene	9.39	96	118267	14.4797	ug/L	91
39) Cyclohexane	10.16	56	3976	0.3755	ug/L	89
47) Trichloroethene	11.42	130	52628	6.4662	ug/L	97
66) Tetrachloroethene	13.81	164	35501	5.4228	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419123.D 8260WT.M Tue Apr 25 08:36:07 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419123.D Vial: 9
Acq On : 24 Apr 2017 15:16 Operator: TMB
Sample : L17041069-47 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 15:38 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

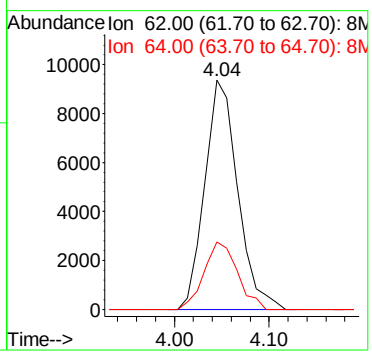


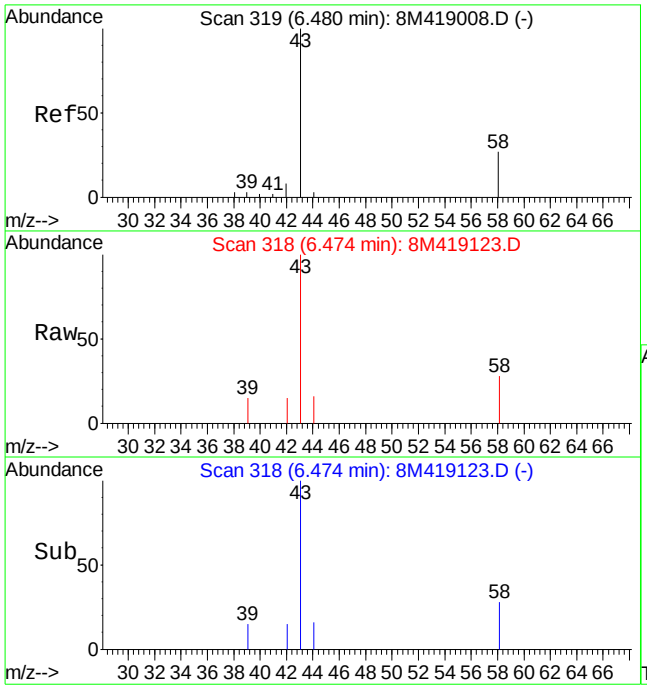


#4
Vinyl Chloride
Concen: 2.01 ug/L
RT: 4.04 min Scan# 83
Delta R.T. -0.01 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion: 62 Resp: 22558

Ion	Ratio	Lower	Upper
62	100		
64	29.8	19.9	46.3

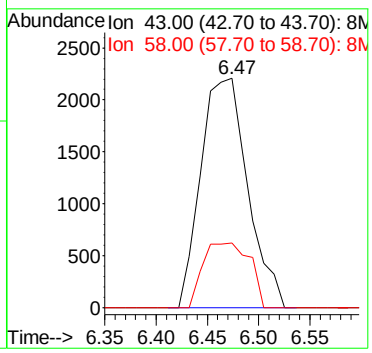


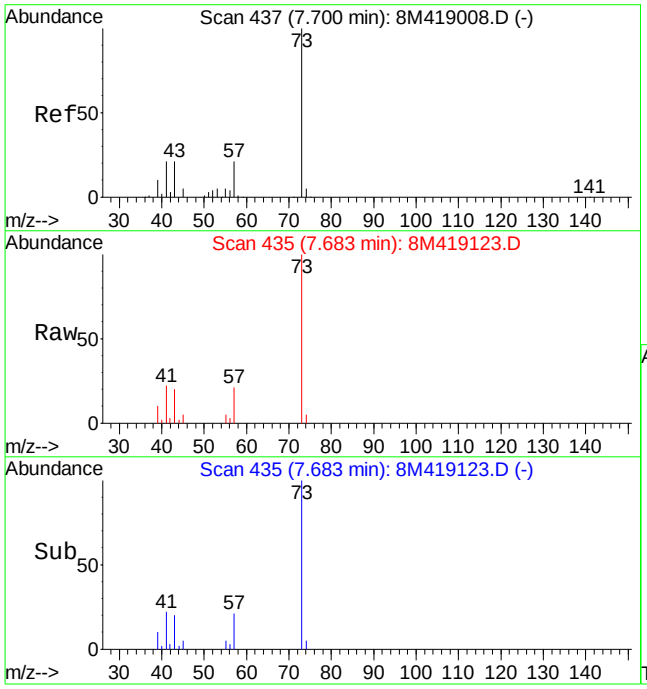


#13
Acetone
Concen: 7.11 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion: 43 Resp: 7018

Ion	Ratio	Lower	Upper
43	100		
58	28.1	19.4	45.4

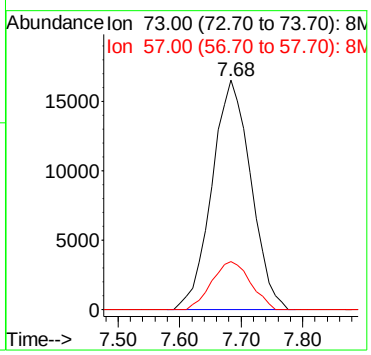


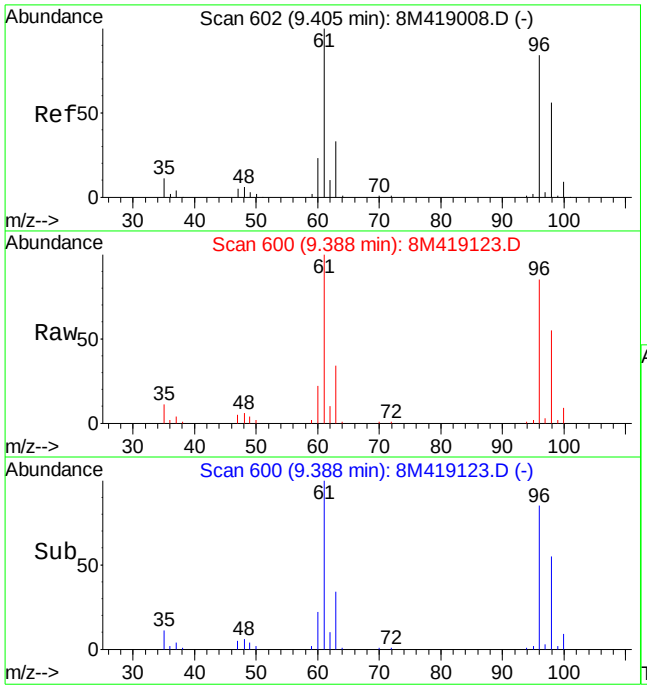


#22
Methyl Tert Butyl Ether
Concen: 5.05 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion: 73 Resp: 72634

Ion	Ratio	Lower	Upper
73	100		
57	20.6	11.4	26.6

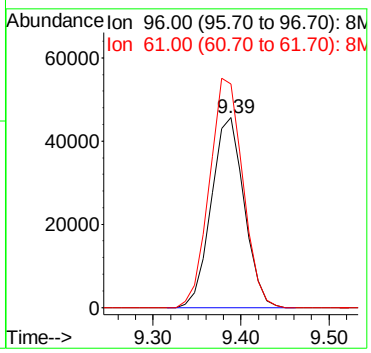


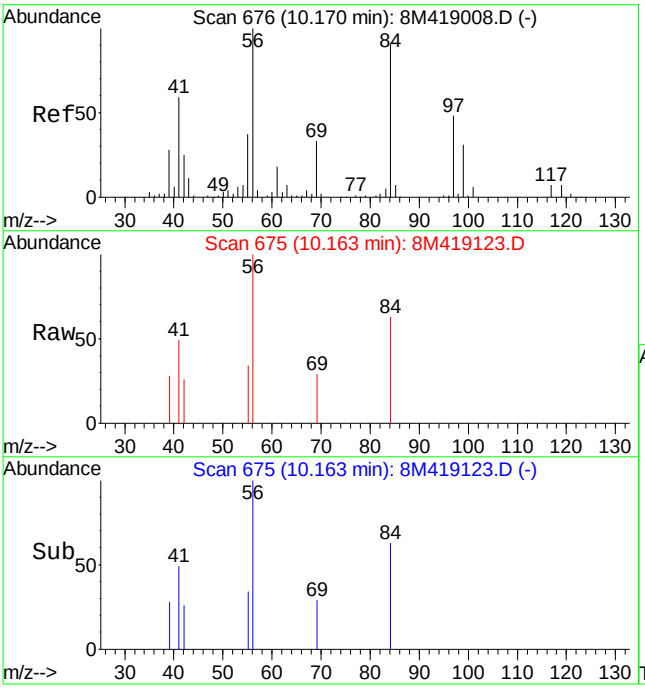


#32
cis-1,2-Dichloroethene
Concen: 14.48 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion: 96 Resp: 118267

Ion	Ratio	Lower	Upper
96	100		
61	122.7	80.3	187.3

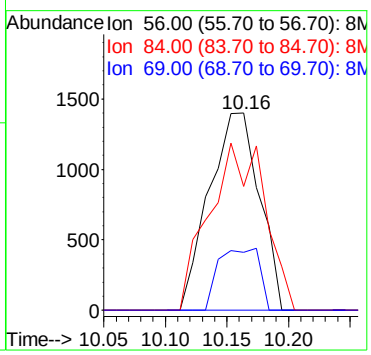


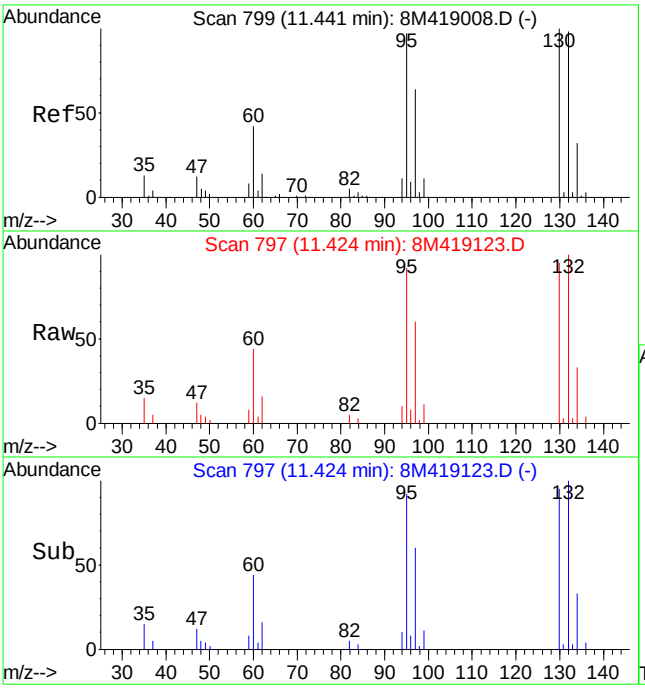


#39
Cyclohexane
Concen: 0.38 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion: 56 Resp: 3976

Ion	Ratio	Lower	Upper
56	100		
84	93.9	61.6	143.8
69	25.6	21.4	50.0

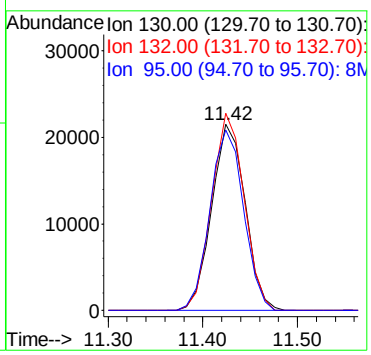


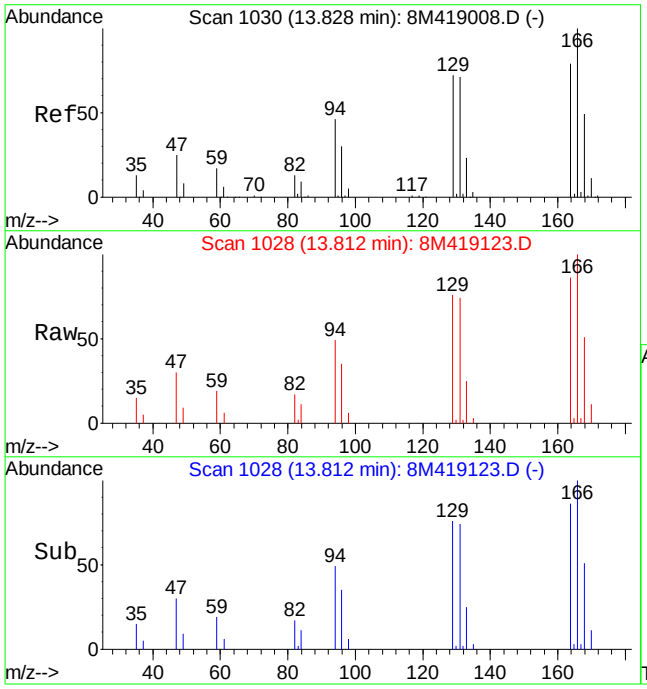


#47
Trichloroethene
Concen: 6.47 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion:130 Resp: 52628

Ion	Ratio	Lower	Upper
130	100		
132	103.1	59.4	138.6
95	97.5	60.1	140.3

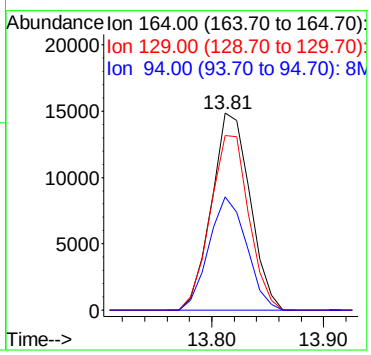




#66
Tetrachloroethene
Concen: 5.42 ug/L
RT: 13.81 min Scan# 1028
Delta R.T. -0.02 min
Lab File: 8M419123.D
Acq: 24 Apr 2017 15:16

Tgt Ion:164 Resp: 35501

Ion	Ratio	Lower	Upper
164	100		
129	88.6	53.4	124.6
94	56.3	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419124.D Vial: 10
Acq On : 24 Apr 2017 15:46 Operator: TMB
Sample : L17041069-48 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 16:08:38 2017 Quant Results File: 8260WT.RES

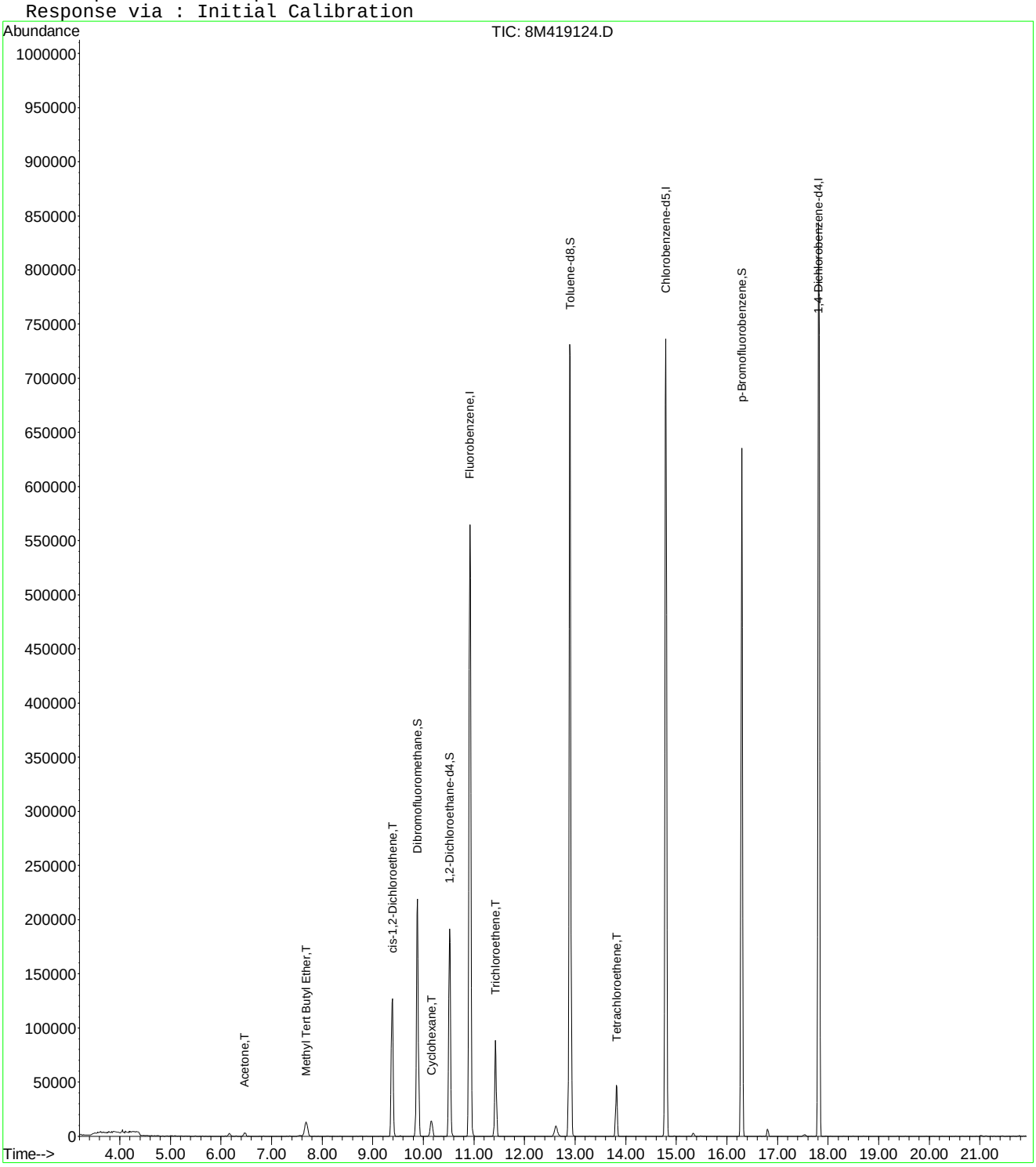
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

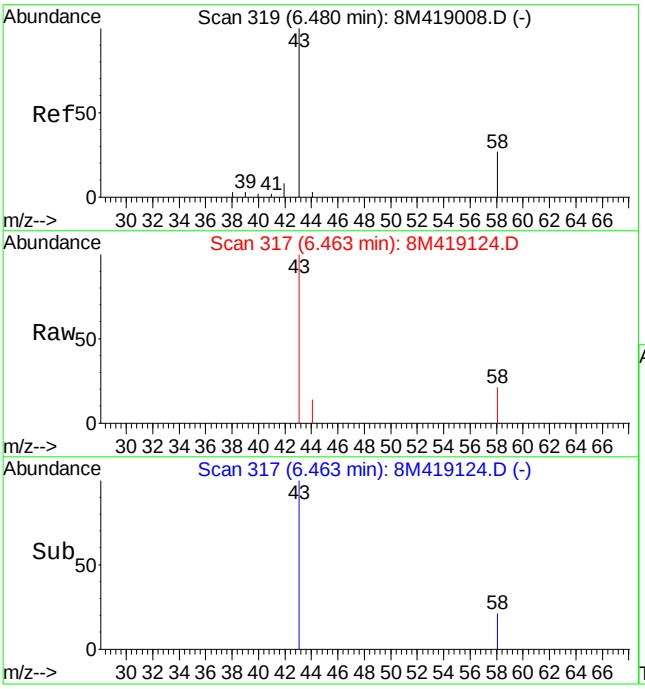
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	701512	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	562261	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	286849	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	186621	25.3629	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.44%			
43) 1,2-Dichloroethane-d4	10.51	65	166376	26.1554	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.64%			
58) Toluene-d8	12.90	98	682635	26.5713	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.28%			
80) p-Bromofluorobenzene	16.29	95	265942	26.2691	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.08%			
Target Compounds						Qvalue
13) Acetone	6.46	43	6768	6.8597	ug/L	88
22) Methyl Tert Butyl Ether	7.68	73	31056	2.1588	ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	75432	9.2329	ug/L	93
39) Cyclohexane	10.16	56	12552	1.1852	ug/L	89
47) Trichloroethene	11.42	130	37658	4.6257	ug/L	98
66) Tetrachloroethene	13.82	164	15199	2.3119	ug/L	93

(#) = qualifier out of range (m) = manual integration
8M419124.D 8260WT.M Tue Apr 25 08:36:11 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419124.D Vial: 10
Acq On : 24 Apr 2017 15:46 Operator: TMB
Sample : L17041069-48 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 16:08 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

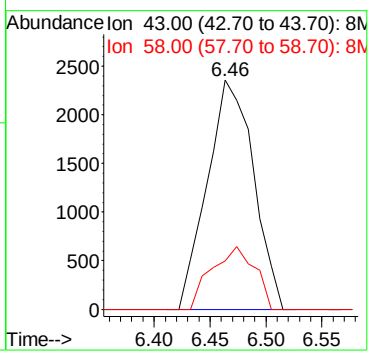


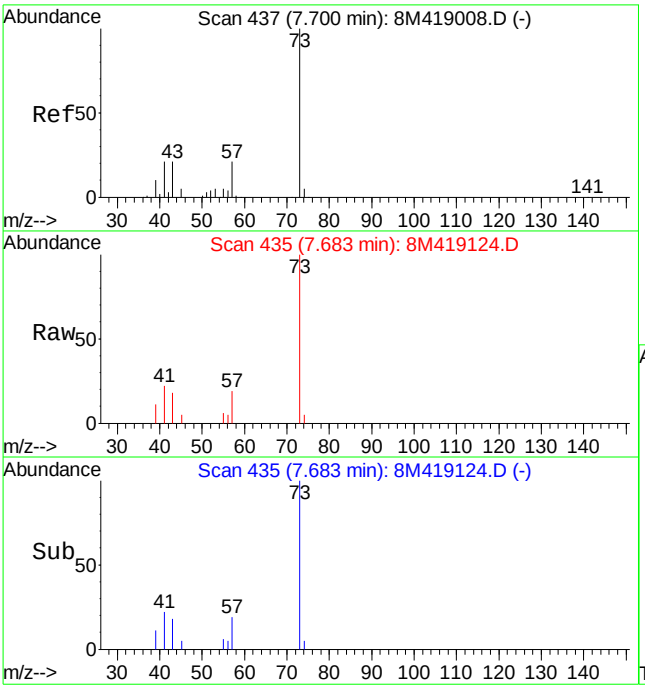


#13
Acetone
Concen: 6.86 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion: 43 Resp: 6768

Ion	Ratio	Lower	Upper
43	100		
58	25.5	19.4	45.4

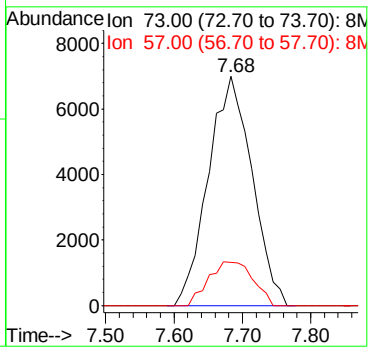


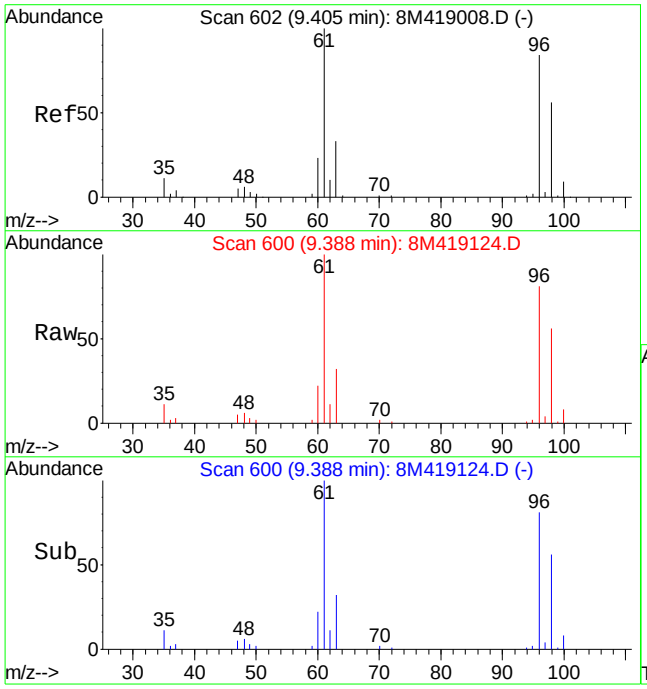


#22
Methyl Tert Butyl Ether
Concen: 2.16 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion: 73 Resp: 31056

Ion	Ratio	Lower	Upper
73	100		
57	19.3	11.4	26.6

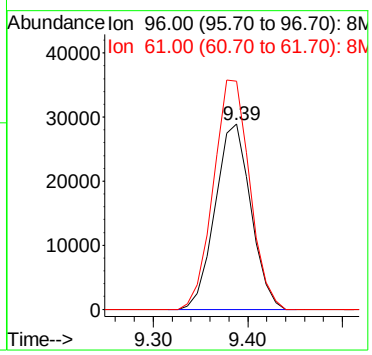


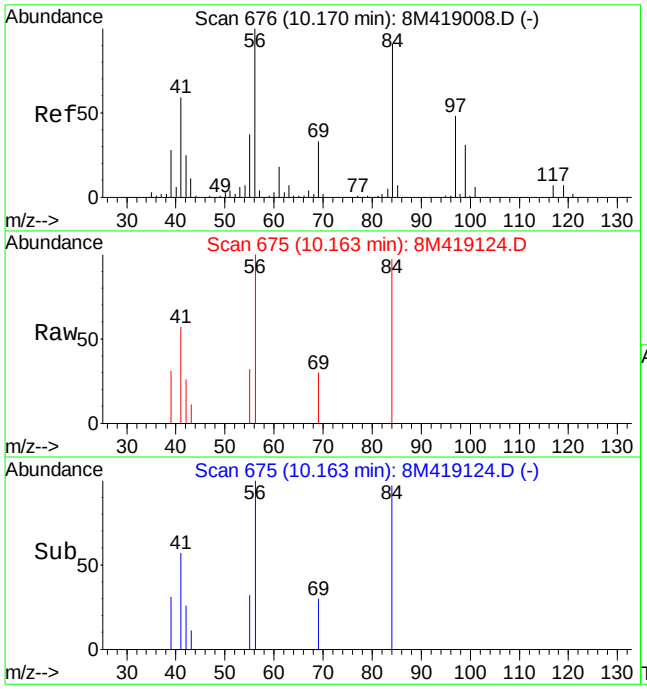


#32
cis-1,2-Dichloroethene
Concen: 9.23 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion: 96 Resp: 75432

Ion	Ratio	Lower	Upper
96	100		
61	125.7	80.3	187.3

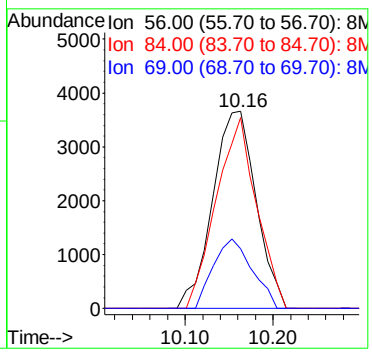


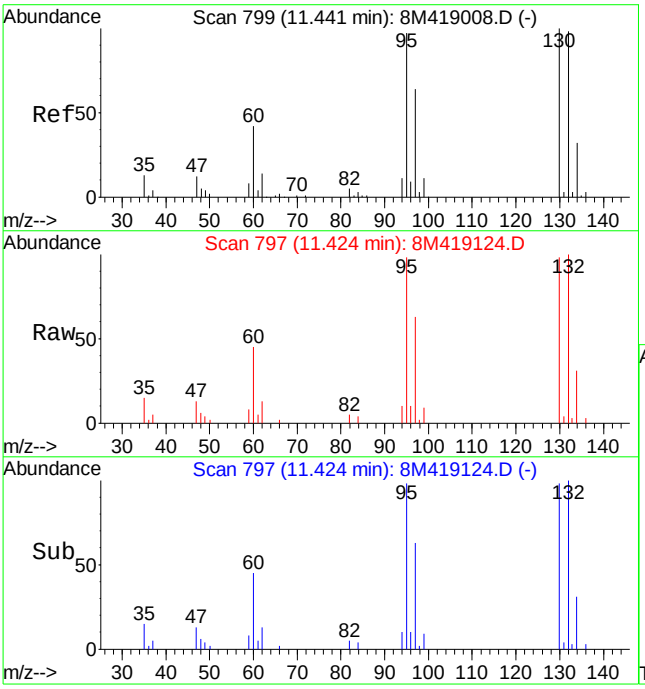


#39
Cyclohexane
Concen: 1.19 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion: 56 Resp: 12552

Ion	Ratio	Lower	Upper
56	100		
84	90.0	61.6	143.8
69	31.6	21.4	50.0

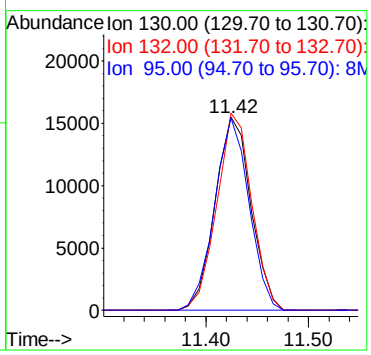


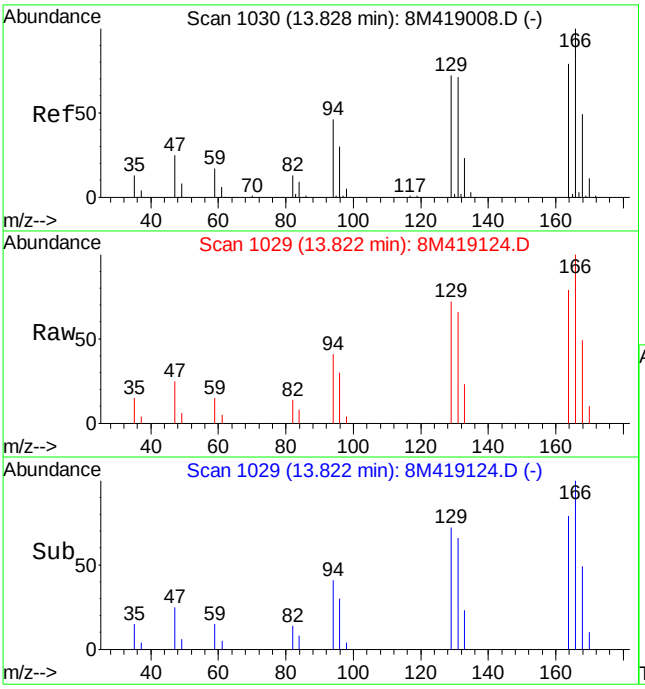


#47
Trichloroethene
Concen: 4.63 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion:130 Resp: 37658

Ion	Ratio	Lower	Upper
130	100		
132	99.4	59.4	138.6
95	95.7	60.1	140.3

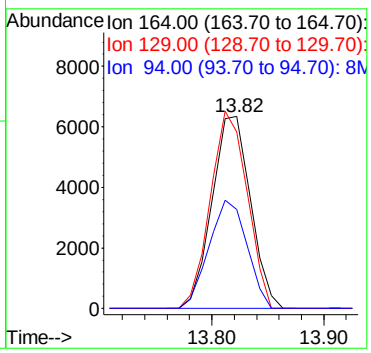




#66
Tetrachloroethene
Concen: 2.31 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419124.D
Acq: 24 Apr 2017 15:46

Tgt Ion:164 Resp: 15199

Ion	Ratio	Lower	Upper
164	100		
129	97.7	53.4	124.6
94	55.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419125.D Vial: 11
Acq On : 24 Apr 2017 16:17 Operator: TMB
Sample : L17041069-49 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 16:39:34 2017 Quant Results File: 8260WT.RES

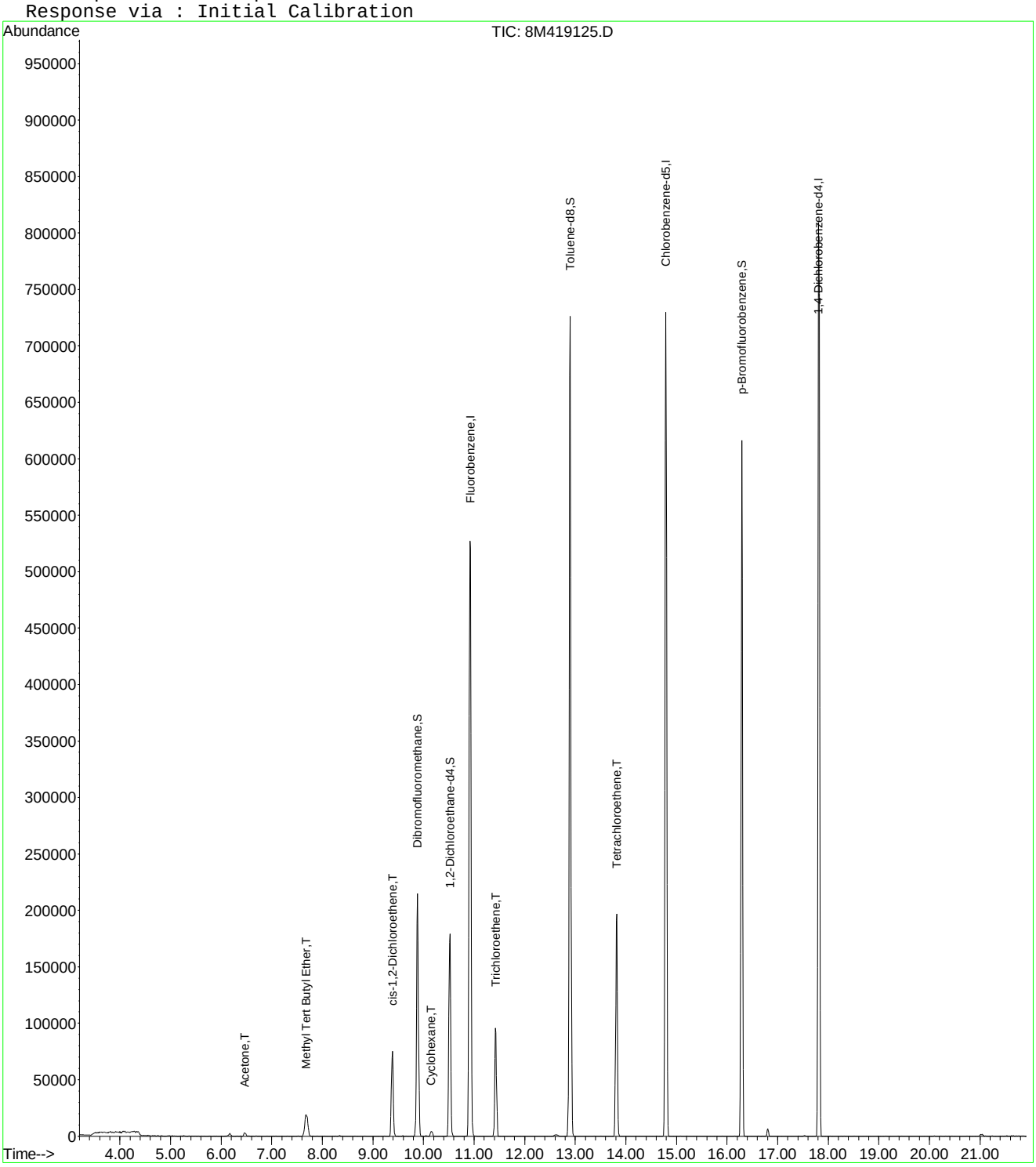
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

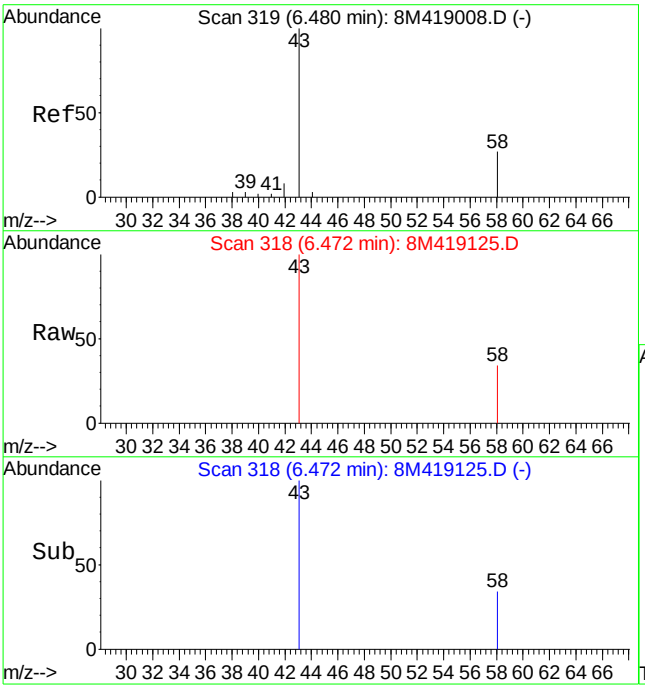
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	676018	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	541166	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	278802	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	181156	25.5487	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.20%			
43) 1,2-Dichloroethane-d4	10.52	65	156820	25.5828	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.32%			
58) Toluene-d8	12.90	98	658356	26.6252	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
80) p-Bromofluorobenzene	16.29	95	257184	26.1372	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.56%			
Target Compounds						Qvalue
13) Acetone	6.47	43	5978	6.2875	ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	43808	3.1601	ug/L	98
32) cis-1,2-Dichloroethene	9.39	96	46663	5.9269	ug/L	90
39) Cyclohexane	10.15	56	3925	0.3846	ug/L #	72
47) Trichloroethene	11.43	130	42504	5.4178	ug/L	97
66) Tetrachloroethene	13.82	164	62534	9.8829	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419125.D 8260WT.M Tue Apr 25 08:36:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419125.D Vial: 11
Acq On : 24 Apr 2017 16:17 Operator: TMB
Sample : L17041069-49 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 16:39 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

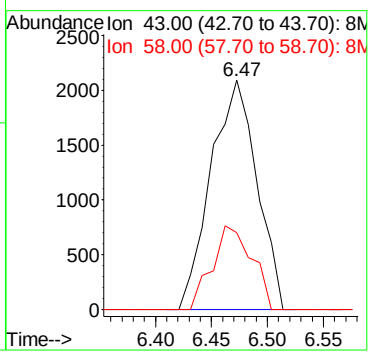


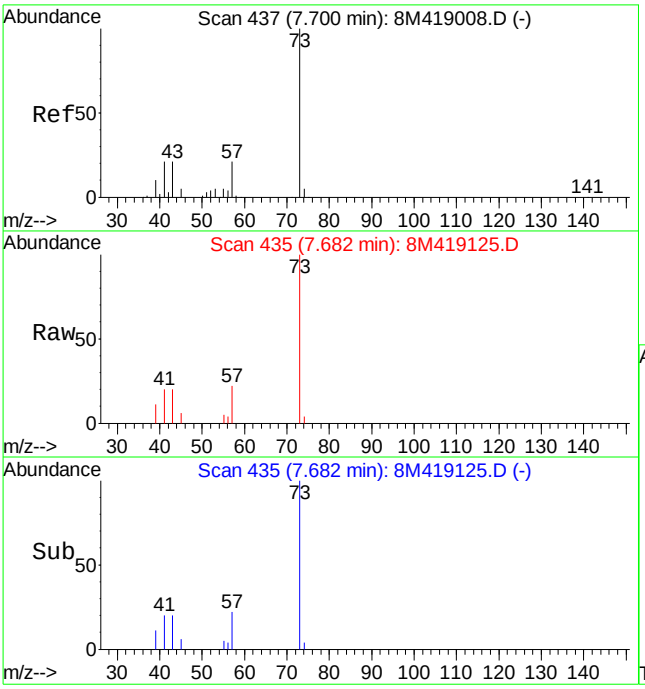


#13
Acetone
Concen: 6.29 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion: 43 Resp: 5978

Ion	Ratio	Lower	Upper
43	100		
58	31.4	19.4	45.4

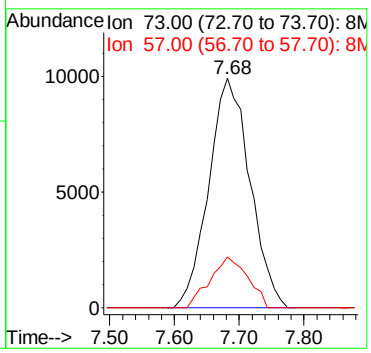


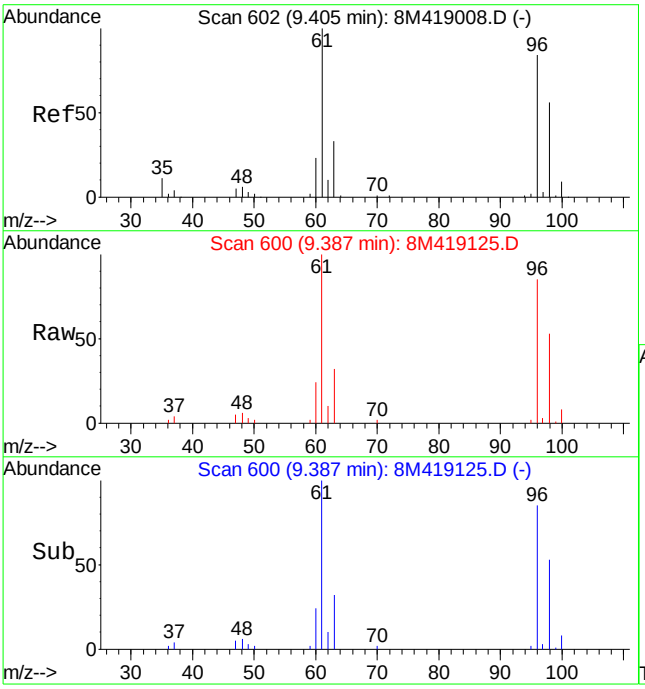


#22
Methyl Tert Butyl Ether
Concen: 3.16 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion: 73 Resp: 43808

Ion	Ratio	Lower	Upper
73	100		
57	20.1	11.4	26.6

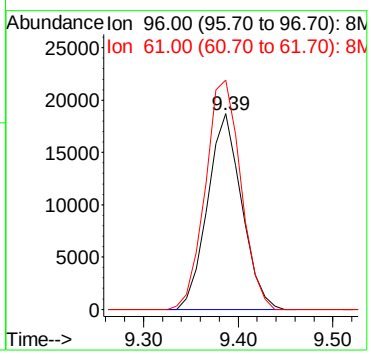


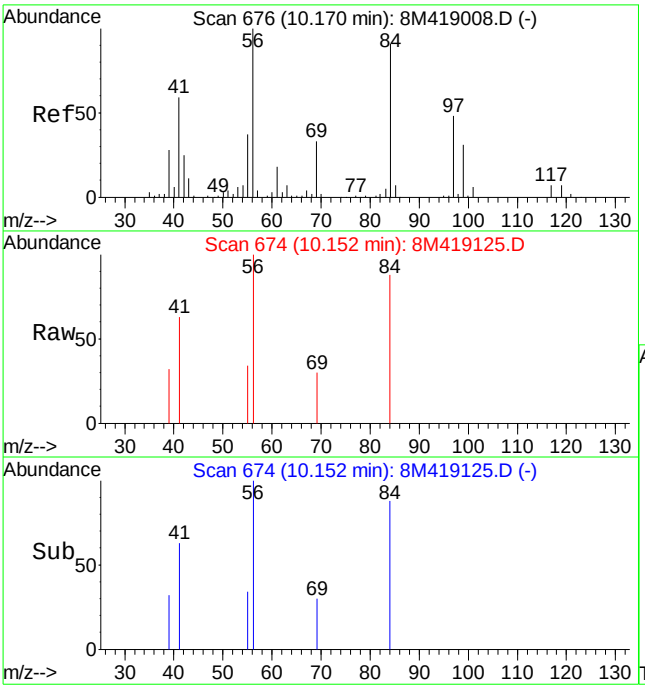


#32
cis-1,2-Dichloroethene
Concen: 5.93 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion: 96 Resp: 46663

Ion	Ratio	Lower	Upper
96	100		
61	121.8	80.3	187.3

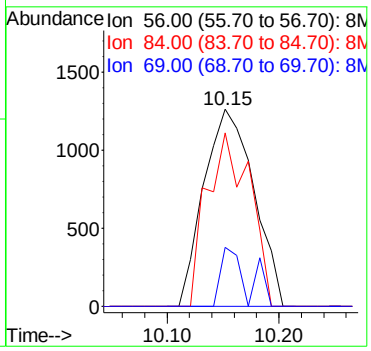


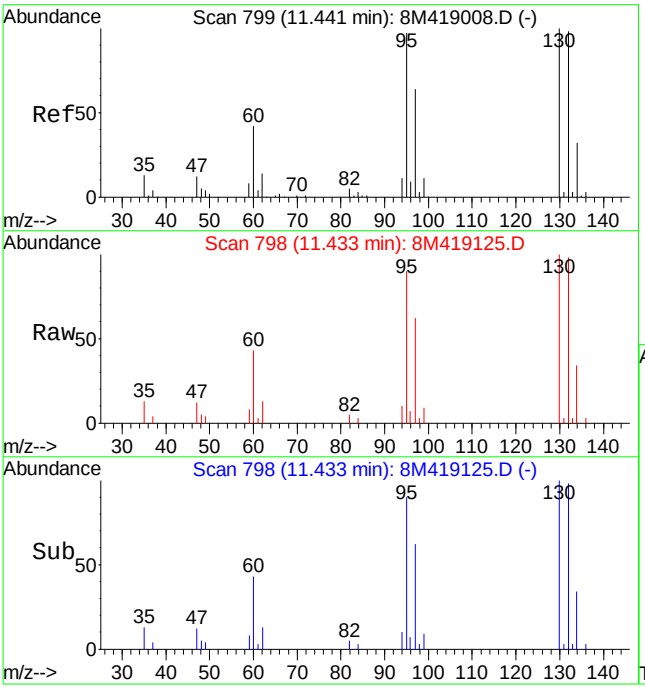


#39
Cyclohexane
Concen: 0.38 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion: 56 Resp: 3925

Ion	Ratio	Lower	Upper
56	100		
84	75.6	61.6	143.8
69	16.1	21.4	50.0#

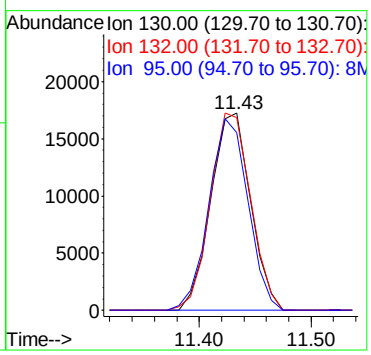


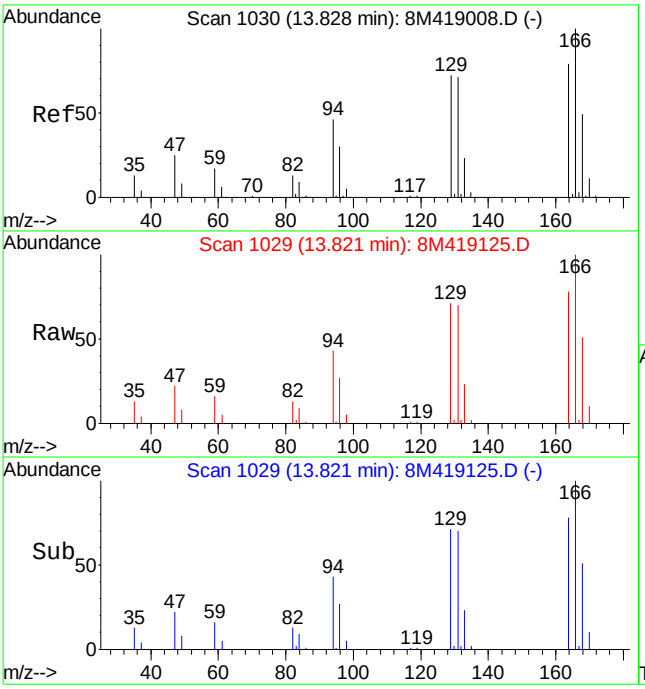


#47
Trichloroethene
Concen: 5.42 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion:130 Resp: 42504

Ion	Ratio	Lower	Upper
130	100		
132	101.2	59.4	138.6
95	95.9	60.1	140.3

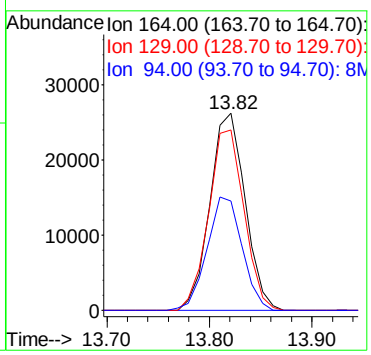




#66
Tetrachloroethene
Concen: 9.88 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419125.D
Acq: 24 Apr 2017 16:17

Tgt Ion:164 Resp: 62534

Ion	Ratio	Lower	Upper
164	100		
129	92.1	53.4	124.6
94	57.5	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419126.D Vial: 12
Acq On : 24 Apr 2017 16:48 Operator: TMB
Sample : L17041069-50 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 17:10:06 2017 Quant Results File: 8260WT.RES

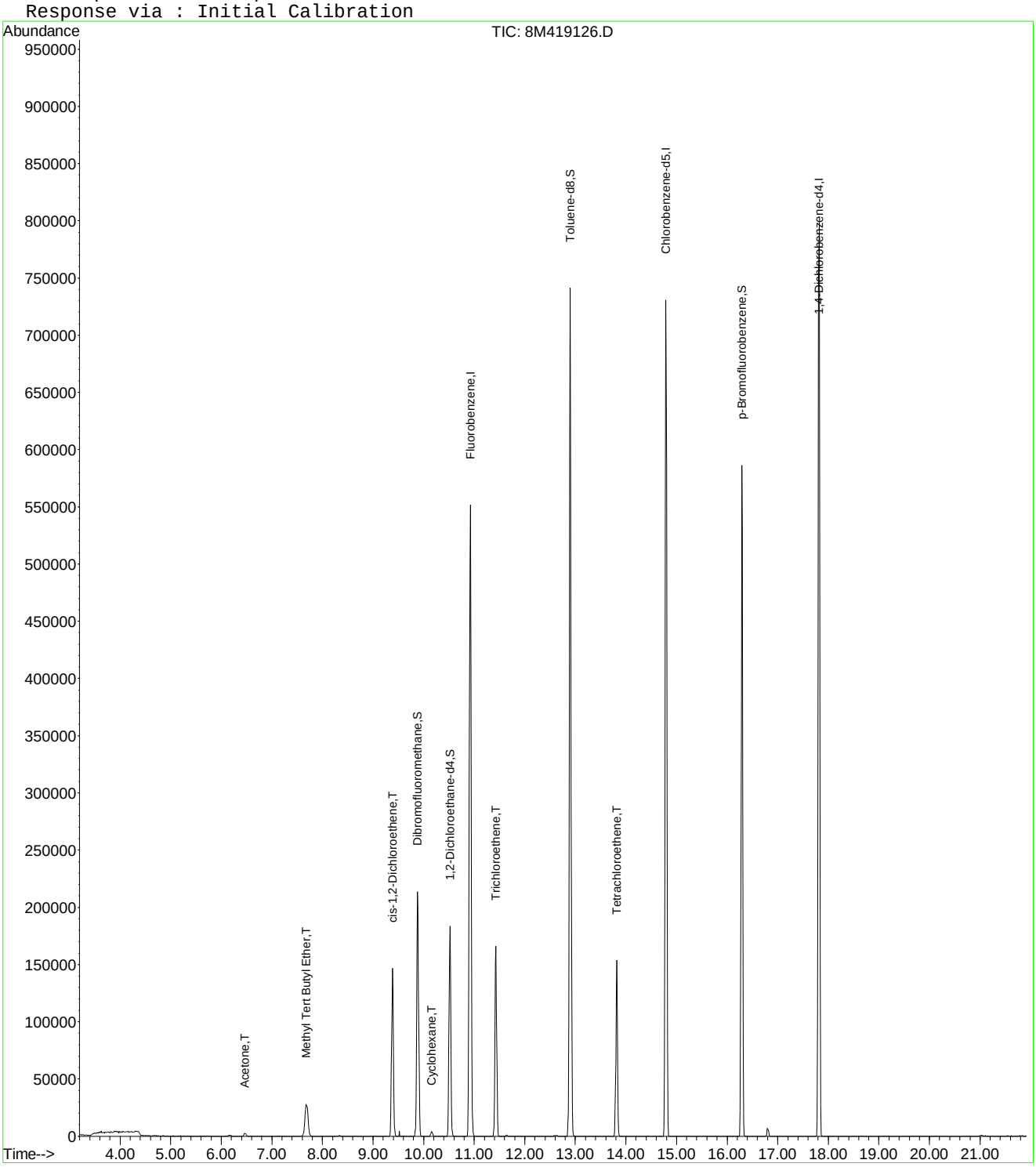
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

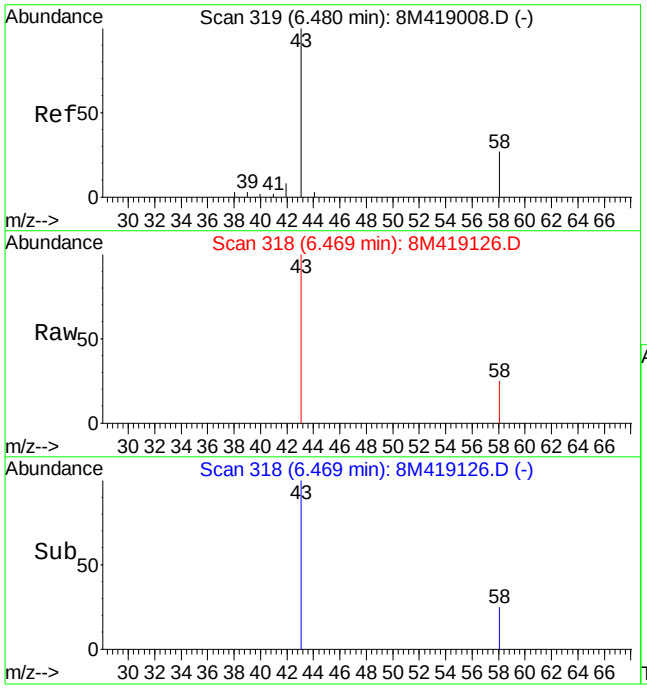
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	684208	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	544792	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	274749	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	181503	25.2912	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%			
43) 1,2-Dichloroethane-d4	10.52	65	157180	25.3346	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.32%			
58) Toluene-d8	12.90	98	662138	26.5999	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.40%			
80) p-Bromofluorobenzene	16.29	95	255003	26.2978	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.20%			
Target Compounds						Qvalue
13) Acetone	6.47	43	4955	5.1492	ug/L	91
22) Methyl Tert Butyl Ether	7.68	73	61549	4.3867	ug/L	96
32) cis-1,2-Dichloroethene	9.38	96	84509	10.6055	ug/L	91
39) Cyclohexane	10.16	56	3049	0.2952	ug/L #	79
47) Trichloroethene	11.43	130	71622	9.0201	ug/L	98
66) Tetrachloroethene	13.82	164	46849	7.3548	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419126.D 8260WT.M Tue Apr 25 08:36:19 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419126.D Vial: 12
Acq On : 24 Apr 2017 16:48 Operator: TMB
Sample : L17041069-50 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 17:10 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

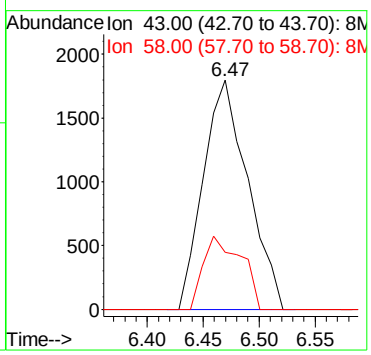


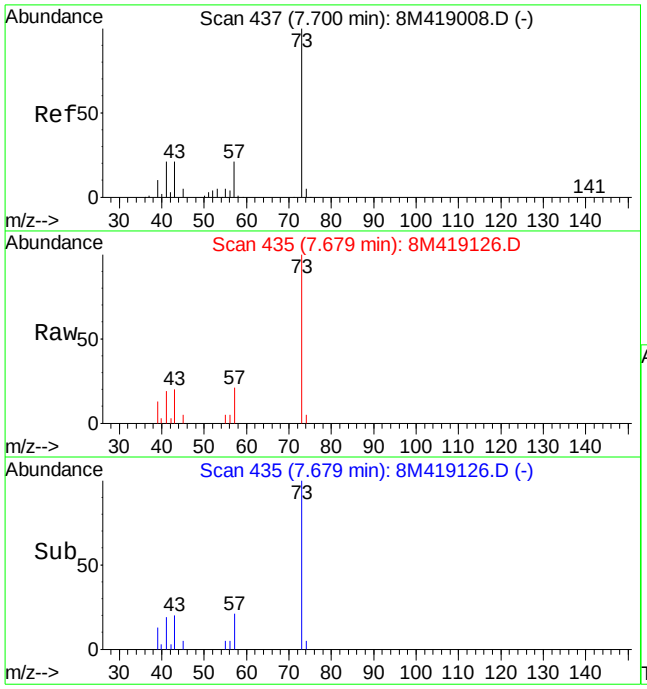


#13
Acetone
Concen: 5.15 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion: 43 Resp: 4955

Ion	Ratio	Lower	Upper
43	100		
58	27.2	19.4	45.4

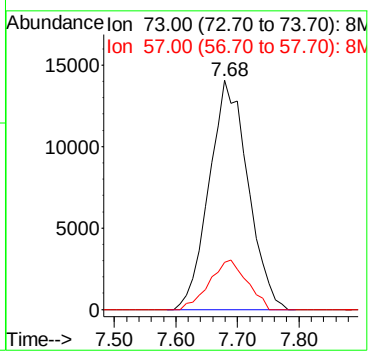


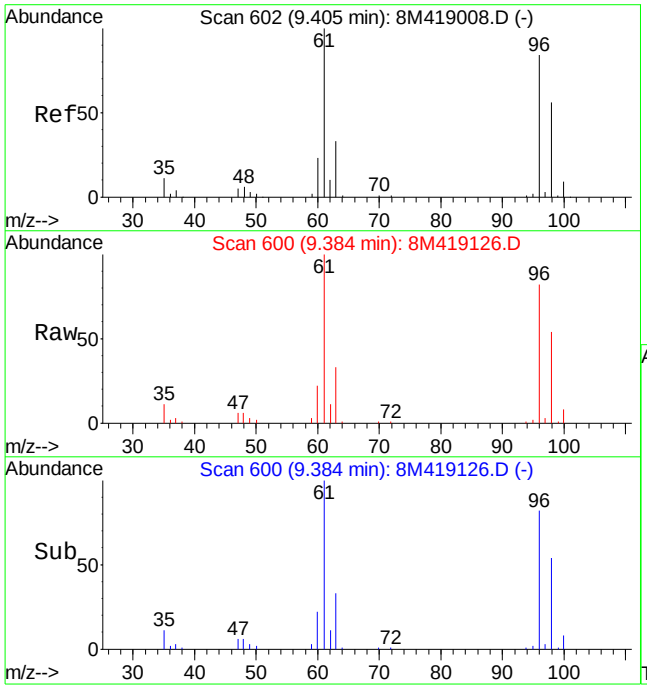


#22
Methyl Tert Butyl Ether
Concen: 4.39 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion: 73 Resp: 61549

Ion	Ratio	Lower	Upper
73	100		
57	20.9	11.4	26.6

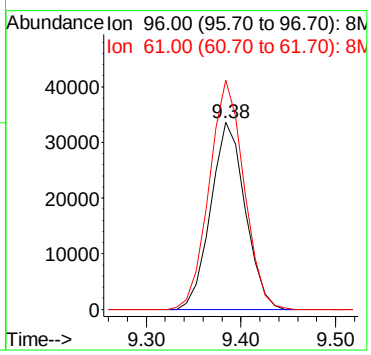


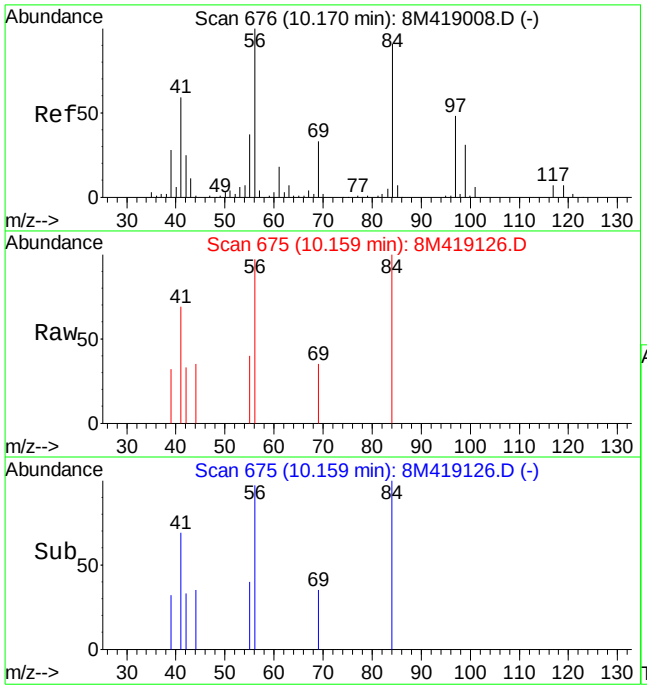


#32
cis-1,2-Dichloroethene
Concen: 10.61 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion: 96 Resp: 84509

Ion	Ratio	Lower	Upper
96	100		
61	123.7	80.3	187.3

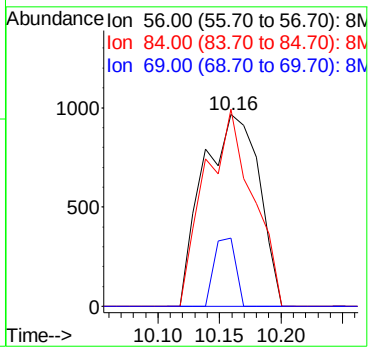


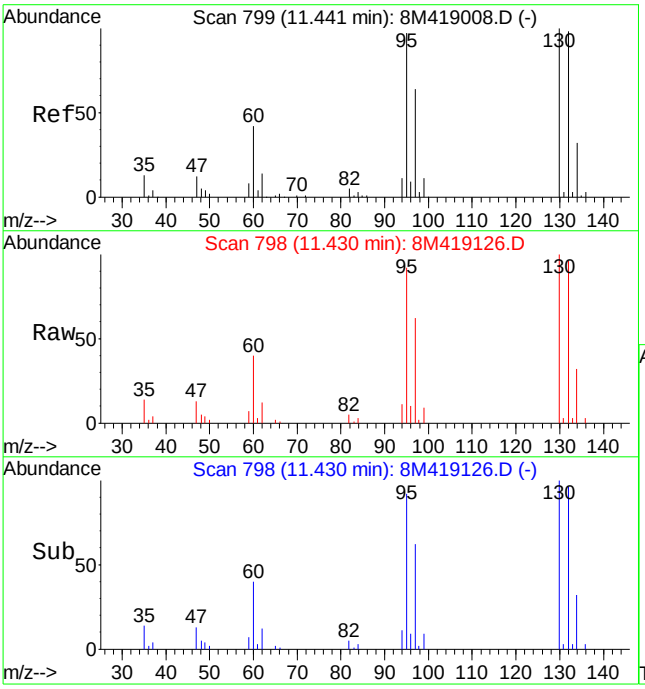


#39
Cyclohexane
Concen: 0.30 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion: 56 Resp: 3049

Ion	Ratio	Lower	Upper
56	100		
84	87.9	61.6	143.8
69	13.7	21.4	50.0#

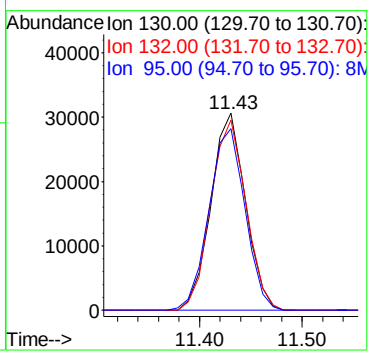


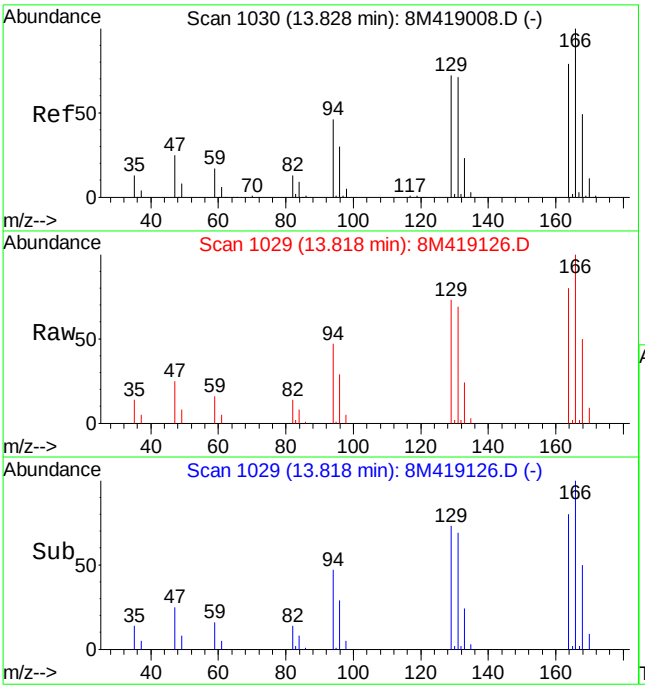


#47
Trichloroethene
Concen: 9.02 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion:130 Resp: 71622

Ion	Ratio	Lower	Upper
130	100		
132	98.8	59.4	138.6
95	96.2	60.1	140.3

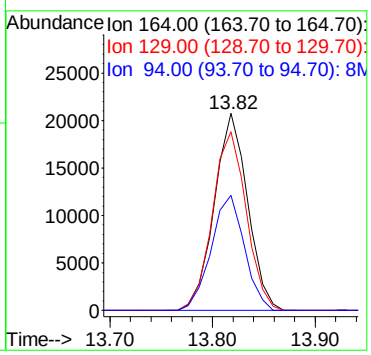




#66
Tetrachloroethene
Concen: 7.35 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419126.D
Acq: 24 Apr 2017 16:48

Tgt Ion:164 Resp: 46849

Ion	Ratio	Lower	Upper
164	100		
129	92.1	53.4	124.6
94	58.1	34.7	81.1



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

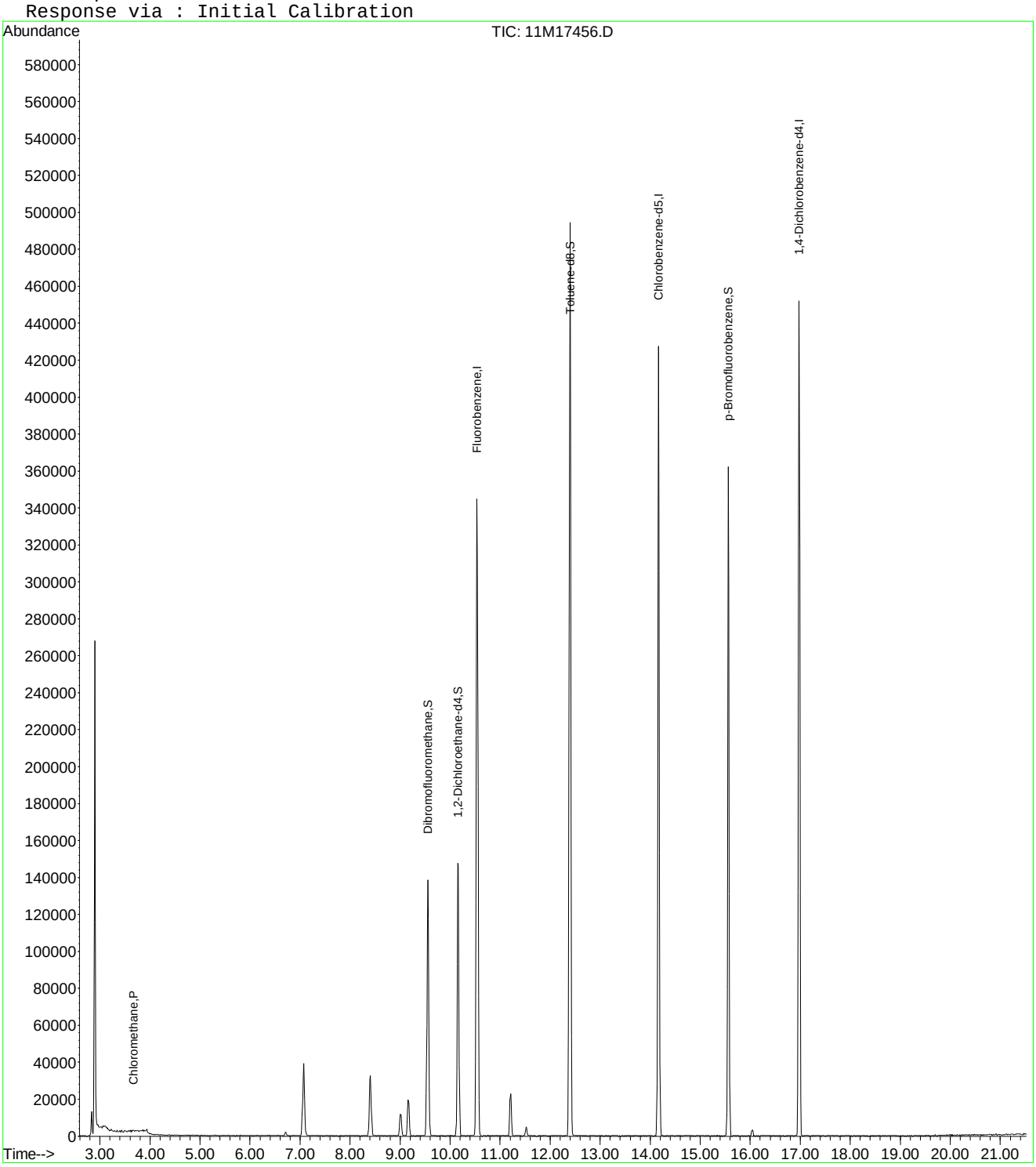
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	109363	26.4089	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.15	65	126342	23.9108	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.64%			
57) Toluene-d8	12.40	98	415624	26.0292	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.12%			
78) p-Bromofluorobenzene	15.56	95	145423	23.2743	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.08%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1126	0.1407	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17456.D 8260WT.M Tue Apr 11 19:13:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:48 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

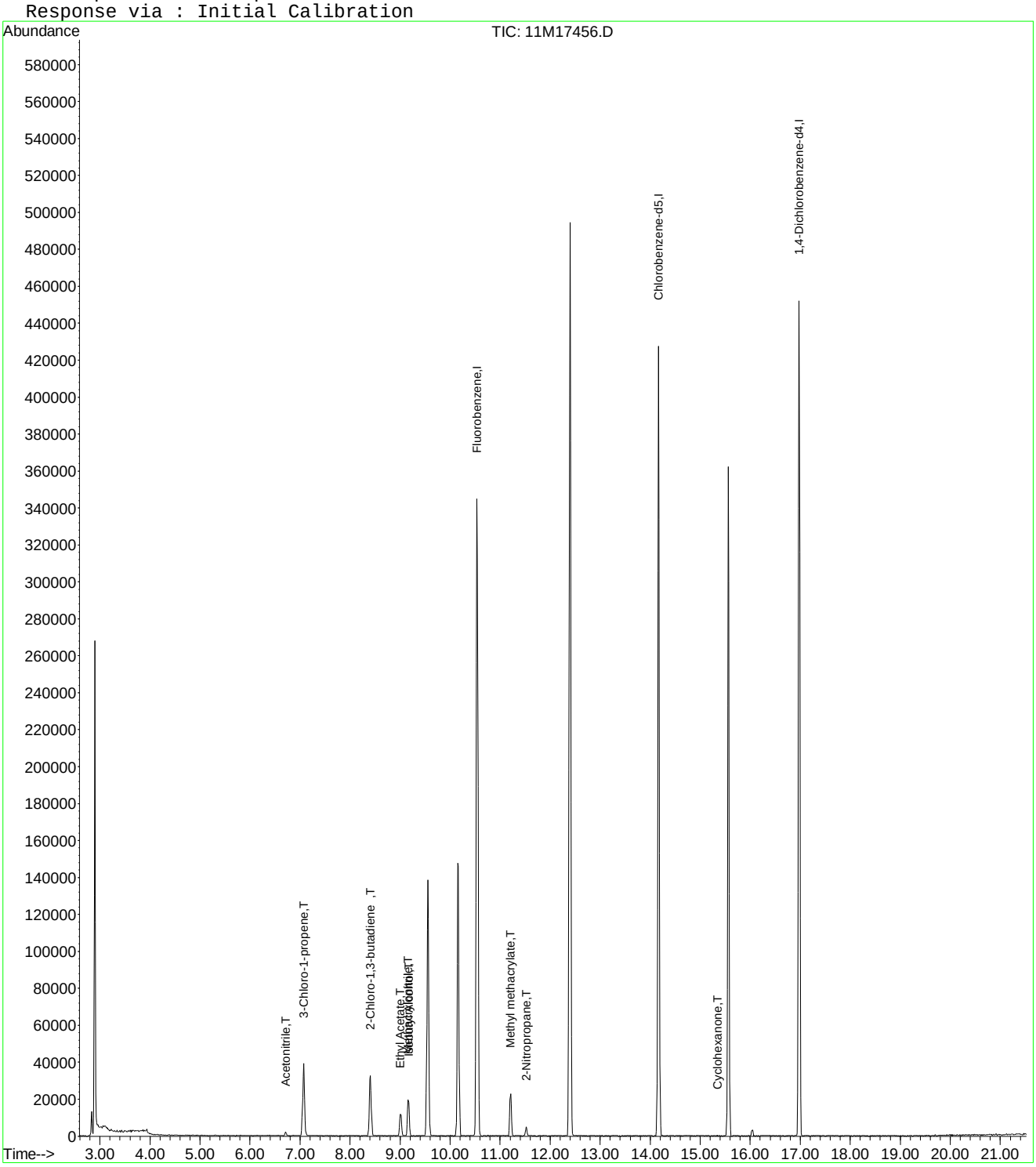
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	2655	3.9469	ug/L	#	57
3) 3-Chloro-1-propene	7.07	41	42597	5.3245	ug/L		83
4) 2-Chloro-1,3-butadiene	8.41	53	33819	4.8784	ug/L		86
5) Methacrylonitrile	9.16	41	14534	4.5257	ug/L		73
6) Isobutyl Alcohol	9.17	43	1353	5.8827	ug/L		86
8) Cyclohexanone	15.34	55	188	24.3163	ug/L	#	19
9) 2-Nitropropane	11.52	43	4060	3.3583	ug/L		100
10) Ethyl Acetate	9.01	43	20309	4.6970	ug/L	#	94
11) Methyl methacrylate	11.21	41	17318	4.3466	ug/L		80

(#) = qualifier out of range (m) = manual integration
11M17456.D A9FOOWT.M Fri Apr 21 13:34:48 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	3.9469	21.1	0	0.00
3	T	3-Chloro-1-propene	5.0000	5.3245	-6.5	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.8784	2.4	100	0.00
5	T	Methacrylonitrile	5.0000	4.5257	9.5	100	0.00
6	T	Isobutyl Alcohol	-1.0000	5.8827	0.0	100	0.00
7	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.04#
8	T	Cyclohexanone	-1.0000	24.3163	0.0	0	0.00
9	T	2-Nitropropane	-1.0000	3.3583	0.0	100	0.00
10	T	Ethyl Acetate	5.0000	4.6970	6.1	100	0.00
11	T	Methyl methacrylate	5.0000	4.3466	13.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17456.D A9FOOWT.M Fri Apr 21 13:37:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42:41 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

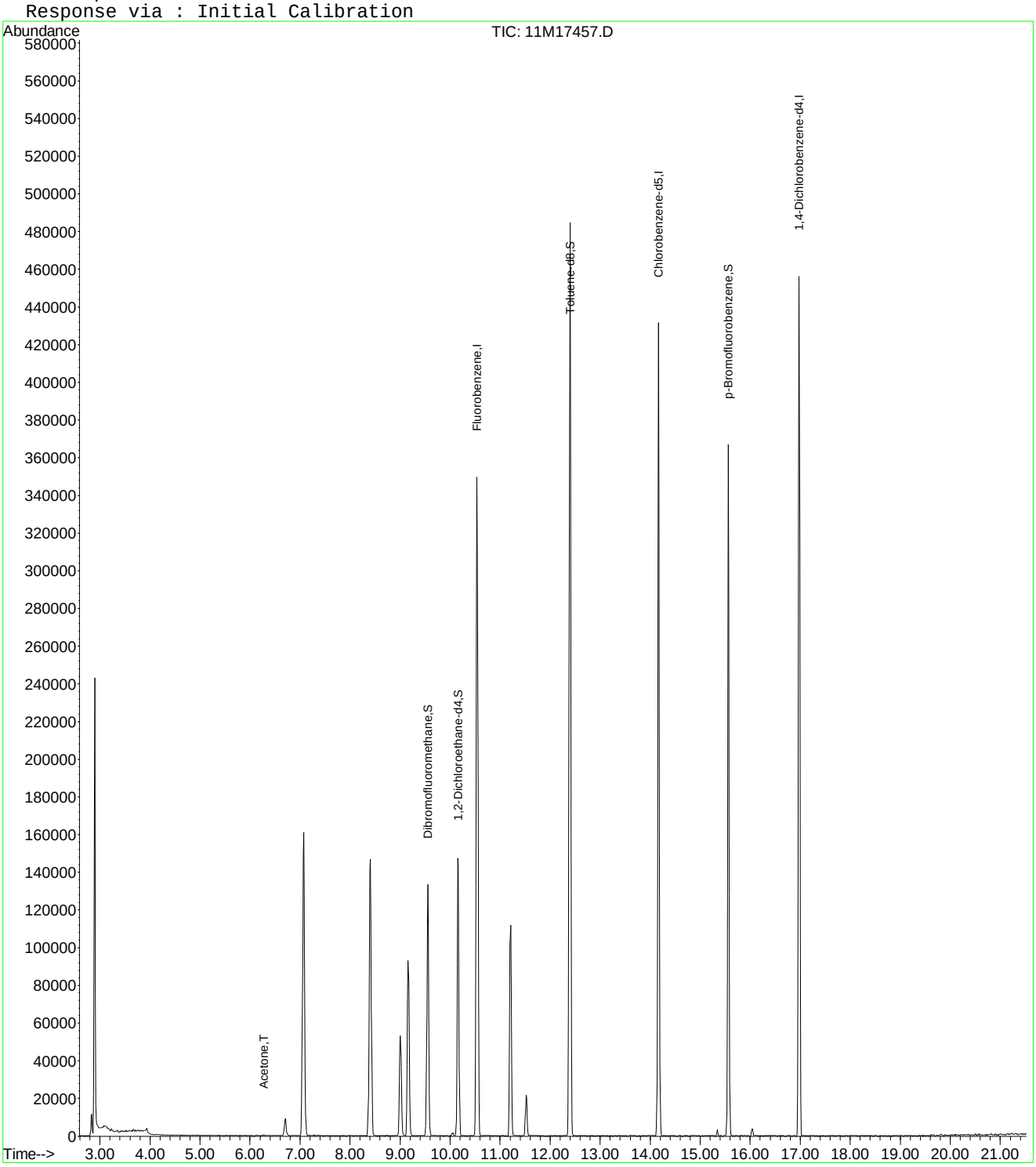
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108479	25.9785	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.92%			
43) 1,2-Dichloroethane-d4	10.16	65	125288	23.5150	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.04%			
57) Toluene-d8	12.40	98	409577	25.2978	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.20%			
78) p-Bromofluorobenzene	15.56	95	144896	23.3830	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.52%			
Target Compounds						Qvalue
13) Acetone	6.28	43	637	0.3936	ug/L #	46

(#) = qualifier out of range (m) = manual integration
11M17457.D 8260WT.M Tue Apr 11 19:42:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:49 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

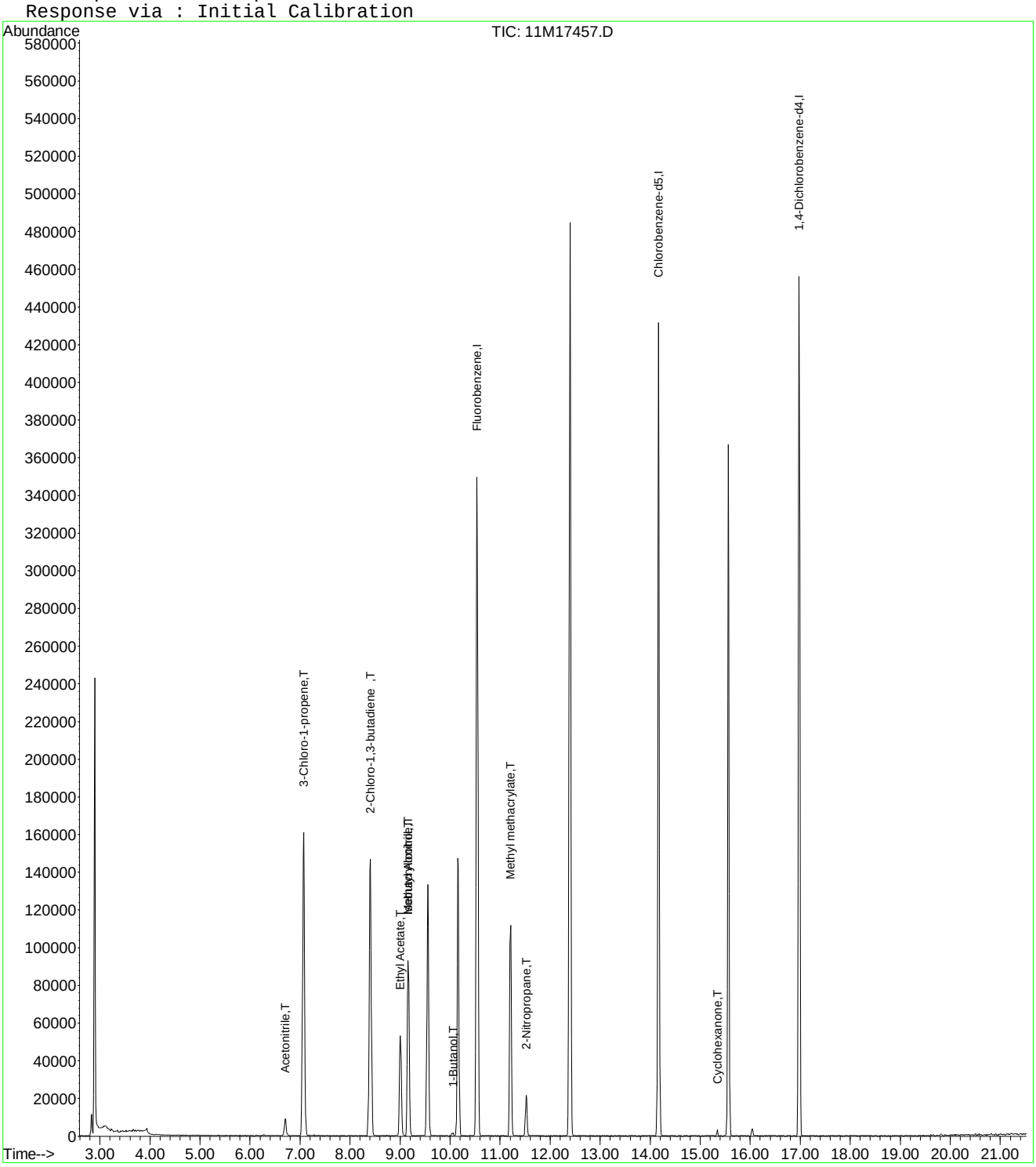
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	12921	19.0493	ug/L		93
3) 3-Chloro-1-propene	7.07	41	179217	22.2162	ug/L		84
4) 2-Chloro-1,3-butadiene	8.41	53	148576	21.2547	ug/L		81
5) Methacrylonitrile	9.16	41	66481	20.5299	ug/L		79
6) Isobutyl Alcohol	9.16	43	8047	34.6980	ug/L		84
7) 1-Butanol	10.06	56	1259	51.3220	ug/L	#	15
8) Cyclohexanone	15.34	55	2341	34.9999	ug/L	#	77
9) 2-Nitropropane	11.52	43	19277	15.8135	ug/L		98
10) Ethyl Acetate	9.01	43	89326	20.4881	ug/L	#	92
11) Methyl methacrylate	11.21	41	80466	20.0289	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17457.D A9FOOWT.M Fri Apr 21 13:34:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.0493	4.8	100	-0.01
3	T	3-Chloro-1-propene	20.0000	22.2162	-11.1	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	21.2547	-6.3	100	0.00
5	T	Methacrylonitrile	20.0000	20.5299	-2.6	100	0.00
6	T	Isobutyl Alcohol	40.0000	34.6980	13.3	100	-0.01
7	T	1-Butanol	-1.0000	51.3220	0.0	100	0.02
8	T	Cyclohexanone	-1.0000	34.9999	0.0	100	0.00
9	T	2-Nitropropane	-1.0000	15.8135	0.0	100	0.00
10	T	Ethyl Acetate	20.0000	20.4881	-2.4	100	0.00
11	T	Methyl methacrylate	20.0000	20.0289	-0.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17457.D A9FOOWT.M Fri Apr 21 13:37:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

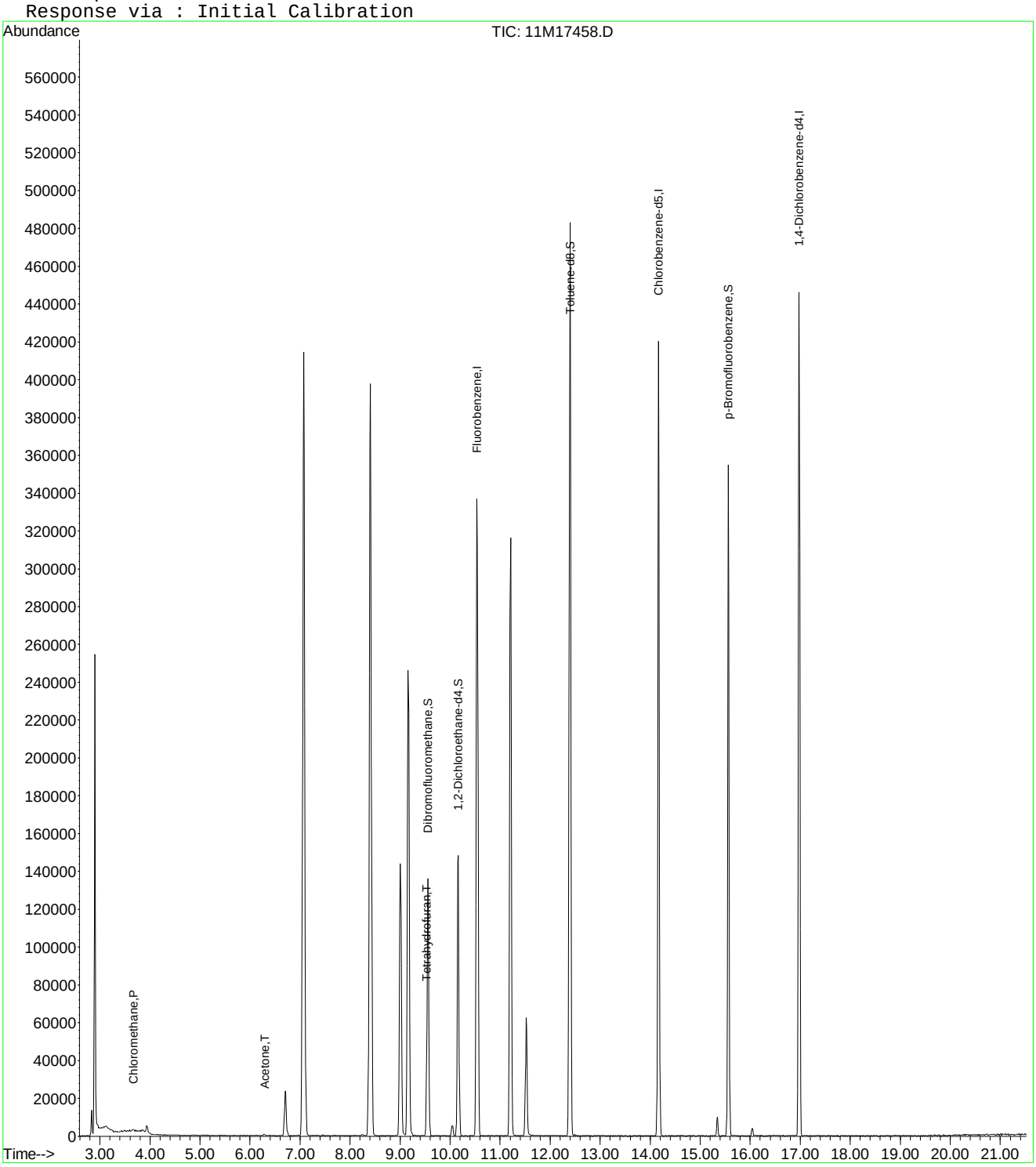
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108362	26.2787	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.12%			
43) 1,2-Dichloroethane-d4	10.16	65	125236	23.8026	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.20%			
57) Toluene-d8	12.40	98	407400	25.6066	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.44%			
78) p-Bromofluorobenzene	15.56	95	144829	23.2872	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.16%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	985	0.1236	ug/L	78
13) Acetone	6.30	43	1193	0.7465	ug/L #	46
36) Tetrahydrofuran	9.53	42	402	0.2227	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17458.D 8260WT.M Tue Apr 11 20:12:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:50 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

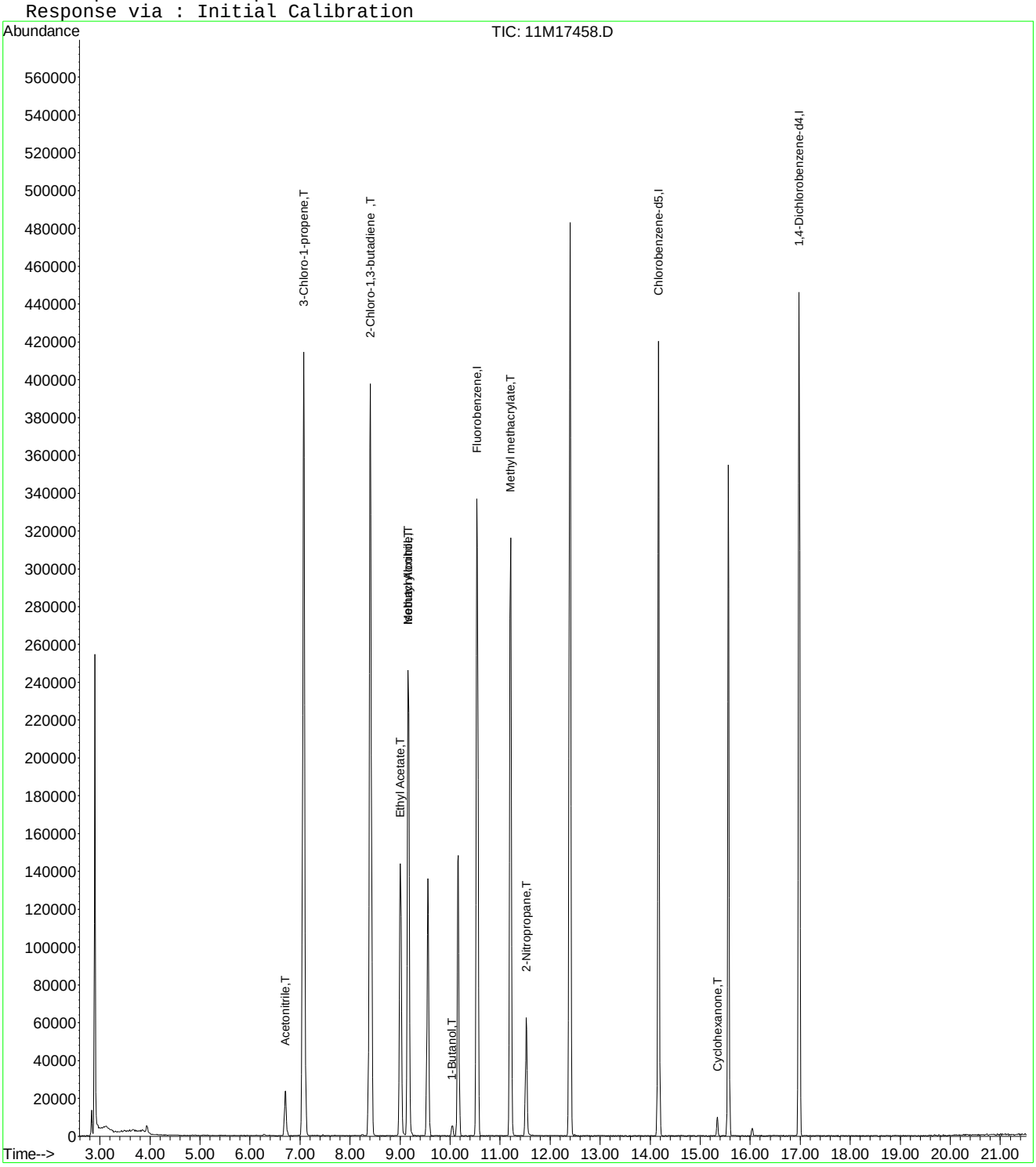
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	32285	48.1995	ug/L		99
3) 3-Chloro-1-propene	7.07	41	457447	57.4238	ug/L		82
4) 2-Chloro-1,3-butadiene	8.41	53	391135	56.6621	ug/L		81
5) Methacrylonitrile	9.16	41	171426	53.6075	ug/L		77
6) Isobutyl Alcohol	9.16	43	21874	95.5120	ug/L		82
7) 1-Butanol	10.04	56	3950	70.2746	ug/L	#	84
8) Cyclohexanone	15.34	55	6611	56.6194	ug/L	#	80
9) 2-Nitropropane	11.52	43	54987	45.6781	ug/L		95
10) Ethyl Acetate	9.01	43	236322	54.8894	ug/L	#	93
11) Methyl methacrylate	11.21	41	217399	54.7977	ug/L		78

(#) = qualifier out of range (m) = manual integration
11M17458.D A9FOOWT.M Fri Apr 21 13:34:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	48.1995	3.6	100	-0.01
3	T	3-Chloro-1-propene	50.0000	57.4238	-14.8	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	56.6621	-13.3	100	0.00
5	T	Methacrylonitrile	50.0000	53.6075	-7.2	100	0.00
6	T	Isobutyl Alcohol	100.0000	95.5120	4.5	100	-0.01
7	T	1-Butanol	-1.0000	70.2746	0.0	100	0.00
8	T	Cyclohexanone	50.0000	56.6194	-13.2	100	0.00
9	T	2-Nitropropane	50.0000	45.6781	8.6	100	0.00
10	T	Ethyl Acetate	50.0000	54.8894	-9.8	100	0.00
11	T	Methyl methacrylate	50.0000	54.7977	-9.6	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17458.D A9FOOWT.M Fri Apr 21 13:37:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

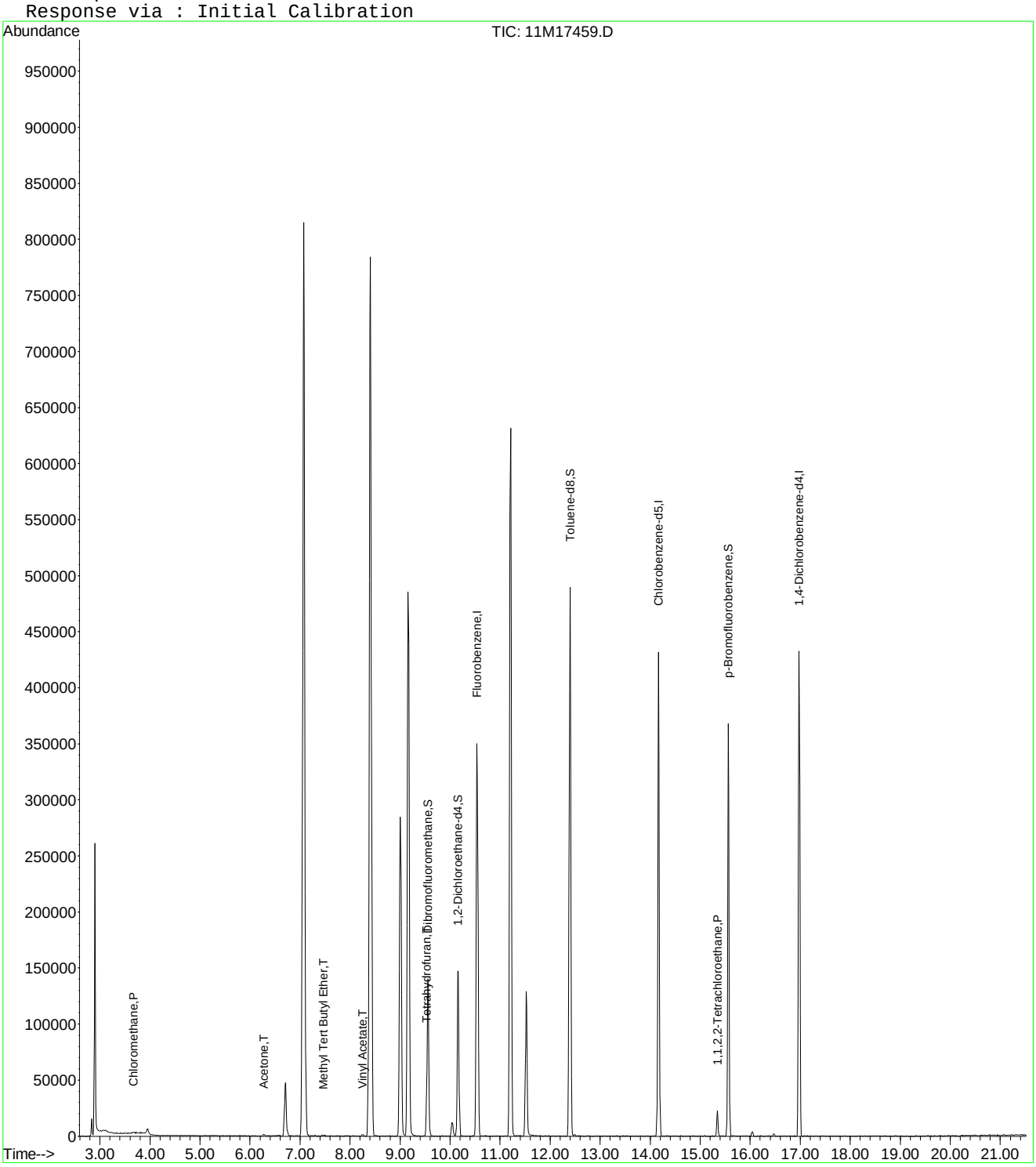
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	111534	26.4487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.80%			
43) 1,2-Dichloroethane-d4	10.15	65	126001	23.4174	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.68%			
57) Toluene-d8	12.40	98	411886	25.4379	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.76%			
78) p-Bromofluorobenzene	15.56	95	149293	25.2500	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1132	0.1389	ug/L	# 55
13) Acetone	6.28	43	2268	1.3877	ug/L	80
22) Methyl Tert Butyl Ether	7.47	73	2104	0.1479	ug/L	# 47
26) Vinyl Acetate	8.25	43	2683	0.2564	ug/L	# 77
36) Tetrahydrofuran	9.53	42	240	0.1300	ug/L	# 41
77) 1,1,2,2-Tetrachloroethane	15.34	83	872	0.1644	ug/L	# 18

(#) = qualifier out of range (m) = manual integration
11M17459.D 8260WT.M Tue Apr 11 20:42:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:51 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

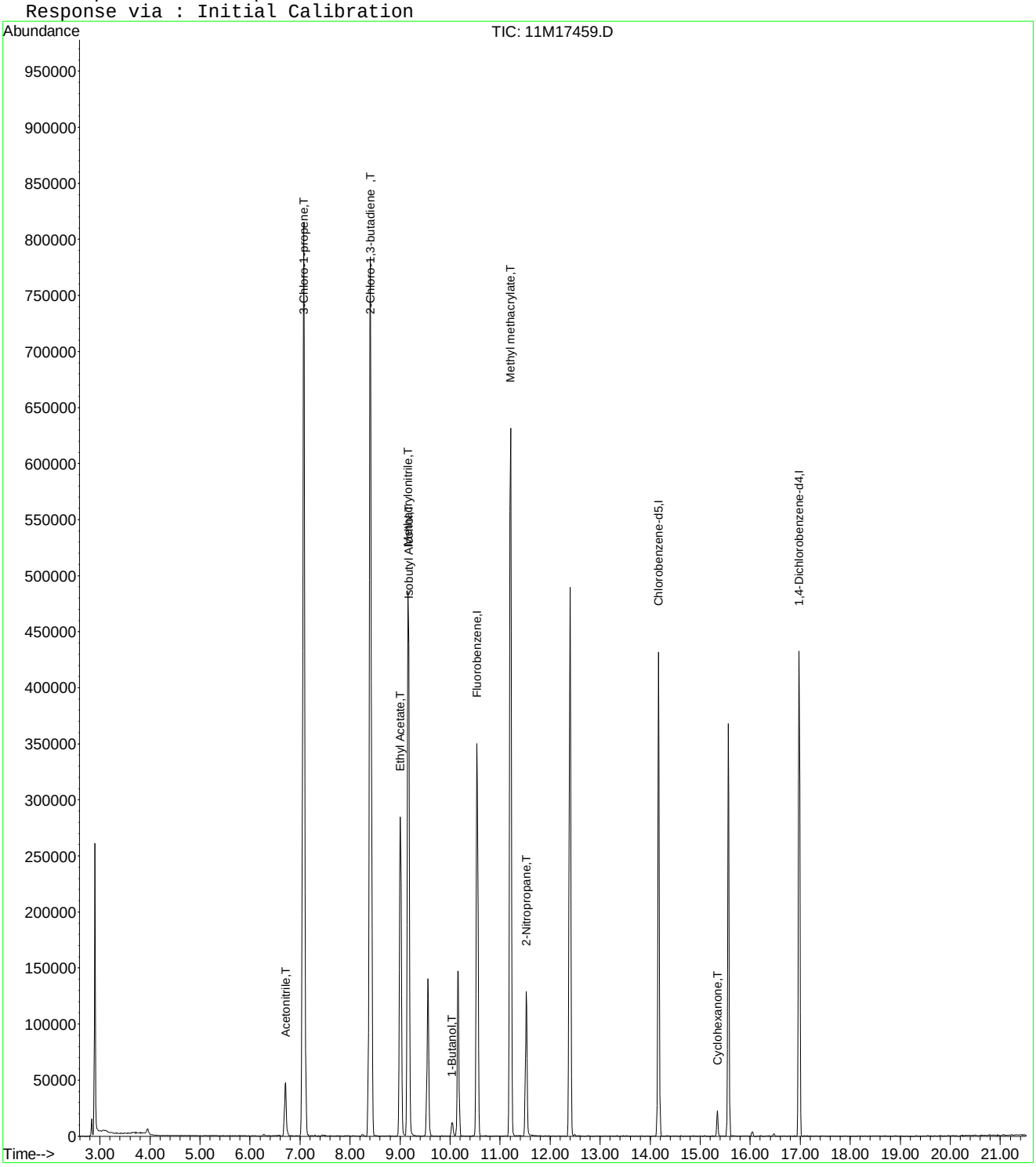
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	65494	95.6122	ug/L		99
3) 3-Chloro-1-propene	7.07	41	885129	108.6494	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	760026	107.6624	ug/L		78
5) Methacrylonitrile	9.16	41	338034	103.3663	ug/L		76
6) Isobutyl Alcohol	9.17	43	41794	178.4487	ug/L		89
7) 1-Butanol	10.04	56	8518	100.9385	ug/L	#	84
8) Cyclohexanone	15.34	55	13236	88.4596	ug/L	#	84
9) 2-Nitropropane	11.52	43	115457	93.7860	ug/L		94
10) Ethyl Acetate	9.01	43	459743	104.4165	ug/L	#	90
11) Methyl methacrylate	11.21	41	434329	107.0516	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17459.D A9FOOWT.M Fri Apr 21 13:34:51 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17459.D A9FOOWT.M Fri Apr 21 13:34:51 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	95.6122	4.4	100	0.00
3	T	3-Chloro-1-propene	100.0000	108.6494	-8.6	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.6624	-7.7	100	0.00
5	T	Methacrylonitrile	100.0000	103.3663	-3.4	100	0.00
6	T	Isobutyl Alcohol	200.0000	178.4487	10.8	100	0.00
7	T	1-Butanol	100.0000	100.9385	-0.9	100	0.00
8	T	Cyclohexanone	100.0000	88.4596	11.5	100	0.00
9	T	2-Nitropropane	100.0000	93.7860	6.2	100	0.00
10	T	Ethyl Acetate	100.0000	104.4165	-4.4	100	0.00
11	T	Methyl methacrylate	100.0000	107.0516	-7.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17459.D A9FOOWT.M Fri Apr 21 13:39:02 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11:03 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

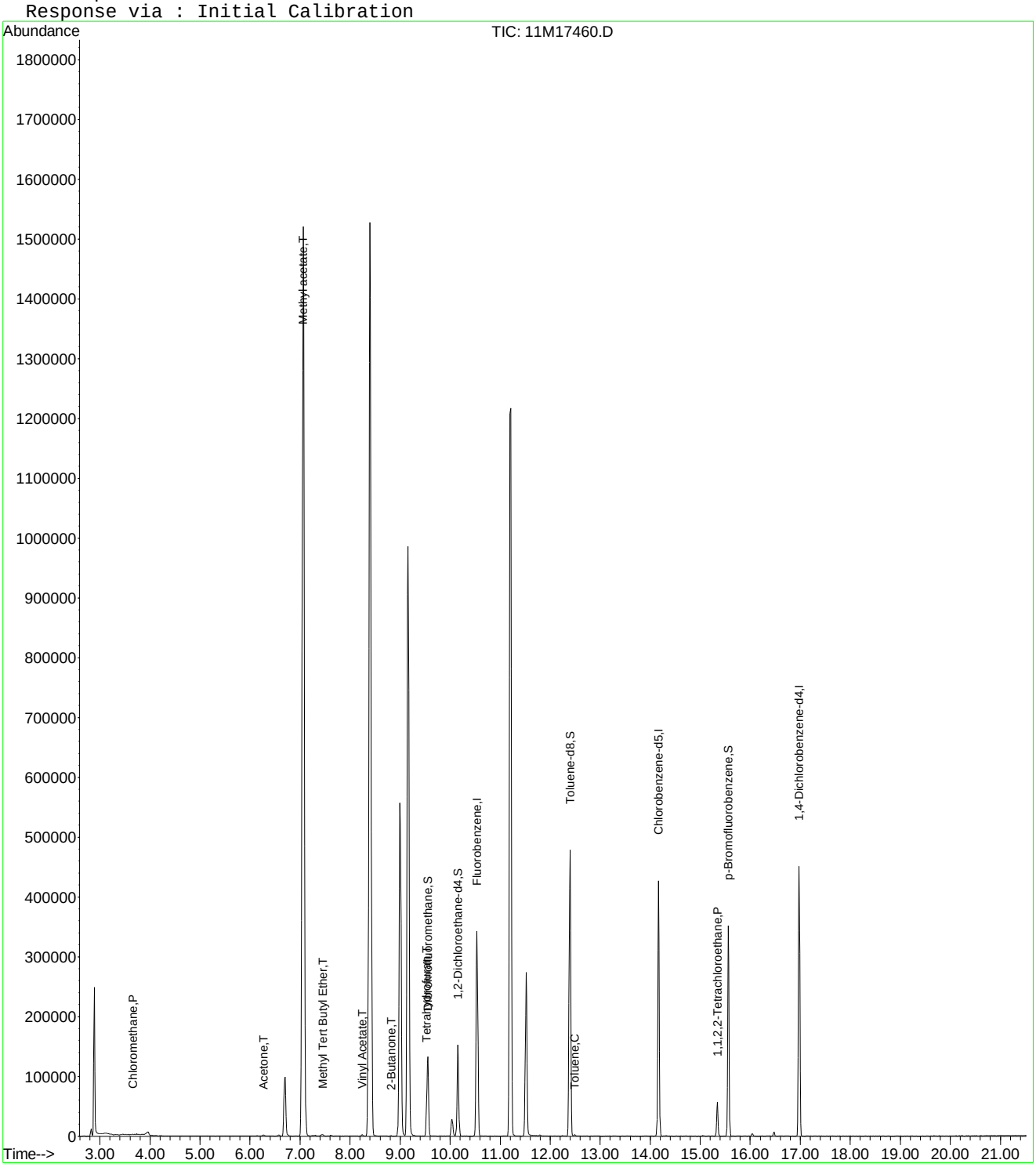
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106964	26.0007	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%			
43) 1,2-Dichloroethane-d4	10.15	65	122550	23.3468	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.40%			
57) Toluene-d8	12.40	98	406174	25.3933	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.56%			
78) p-Bromofluorobenzene	15.56	95	144524	23.5455	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 94.20%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1338	0.1683	ug/L #	67
13) Acetone	6.27	43	4034	2.5301	ug/L	78
18) Methyl acetate	7.05	43	612	0.1369	ug/L #	1
22) Methyl Tert Butyl Ether	7.45	73	4894	0.3527	ug/L	93
26) Vinyl Acetate	8.24	43	5337	0.5228	ug/L #	77
29) 2-Butanone	8.82	43	474	0.1854	ug/L #	55
36) Tetrahydrofuran	9.53	42	385	0.2138	ug/L #	41
58) Toluene	12.49	91	2879	0.1437	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	2354	0.4276	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17460.D 8260WT.M Tue Apr 11 21:11:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:52 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

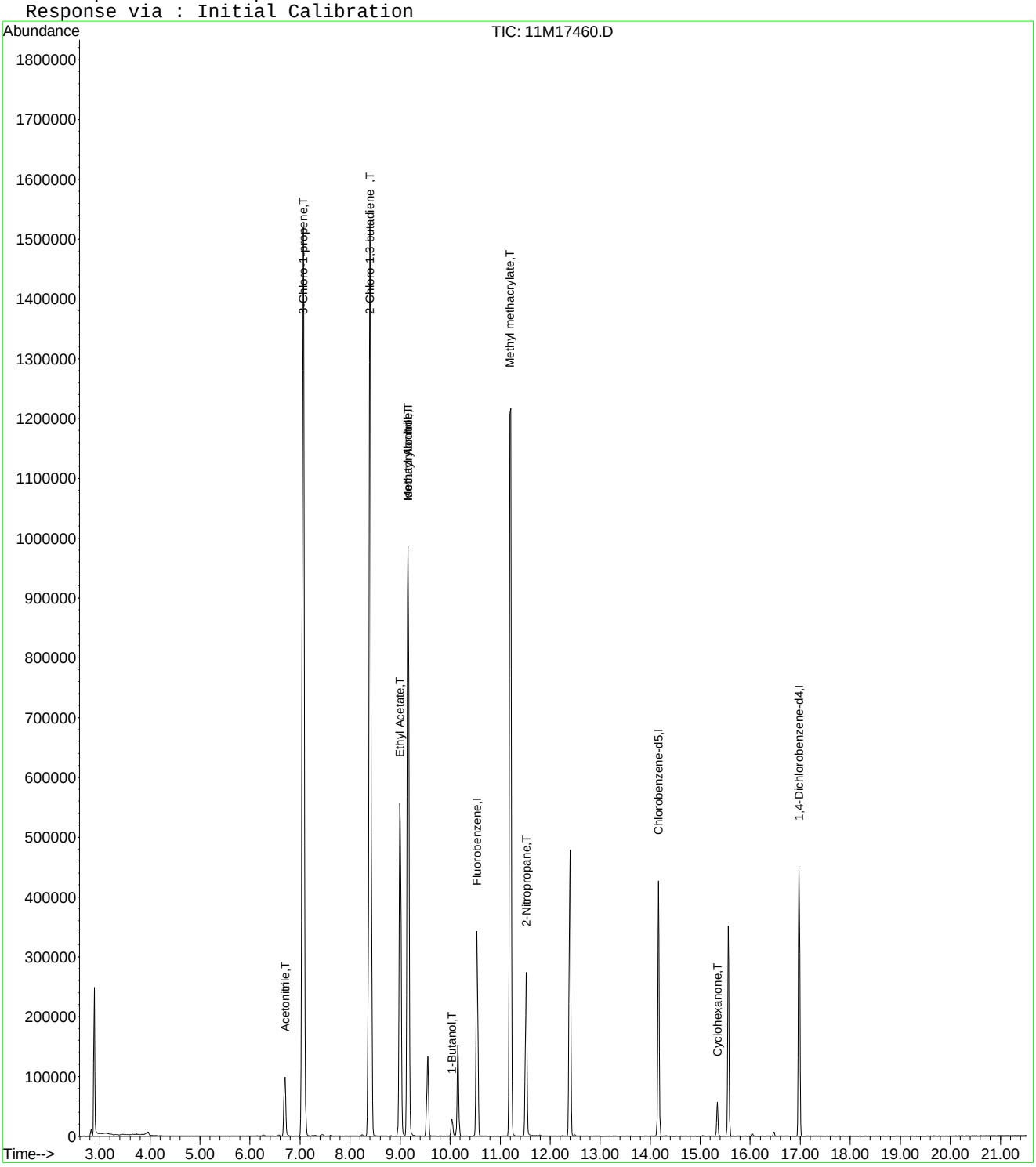
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	136902	204.8671	ug/L		98
3) 3-Chloro-1-propene	7.06	41	1641249	206.5122	ug/L		74
4) 2-Chloro-1,3-butadiene	8.40	53	1451521	210.7703	ug/L		74
5) Methacrylonitrile	9.16	41	673287	211.0422	ug/L		74
6) Isobutyl Alcohol	9.16	43	92763	405.9989	ug/L		87
7) 1-Butanol	10.04	56	21553	193.8864	ug/L	#	82
8) Cyclohexanone	15.34	55	32781	188.6073	ug/L	#	83
9) 2-Nitropropane	11.52	43	245915	204.7638	ug/L		95
10) Ethyl Acetate	9.00	43	905759	210.8712	ug/L	#	89
11) Methyl methacrylate	11.20	41	859855	217.2452	ug/L		74

(#) = qualifier out of range (m) = manual integration
11M17460.D A9FOOWT.M Fri Apr 21 13:34:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

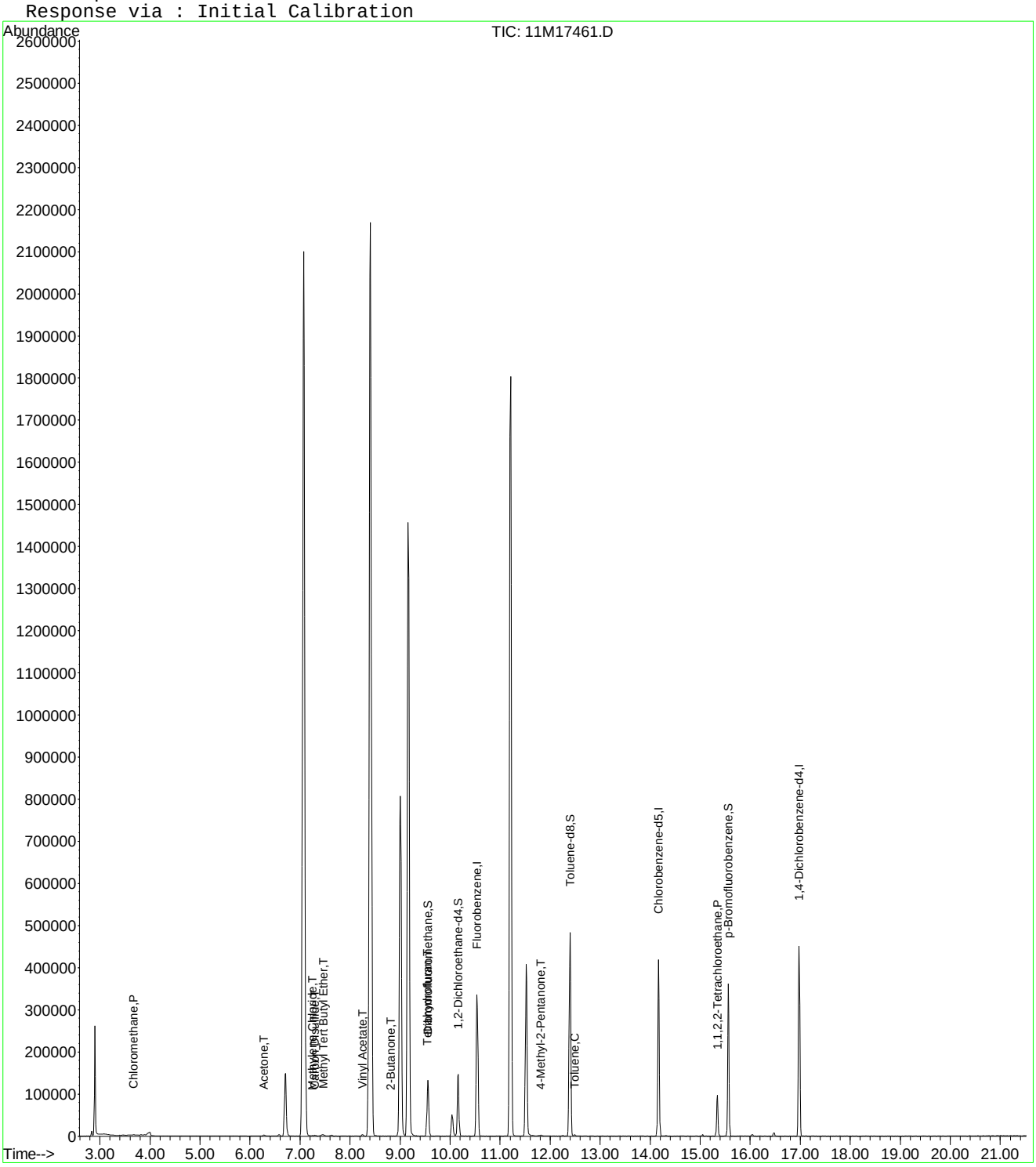
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	107197	26.4141	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.16	65	123580	23.8654	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.48%			
57) Toluene-d8	12.40	98	410662	25.6678	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.68%			
78) p-Bromofluorobenzene	15.56	95	147403	23.4277	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.72%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1060	0.1352	ug/L #	75
13) Acetone	6.28	43	5404	3.4357	ug/L	98
19) Methylene Chloride	7.25	84	697	0.1329	ug/L	66
20) Carbon Disulfide	7.29	76	1636	0.1208	ug/L #	73
22) Methyl Tert Butyl Ether	7.47	73	7202	0.5261	ug/L	85
26) Vinyl Acetate	8.25	43	8317	0.8259	ug/L #	80
29) 2-Butanone	8.81	43	763	0.3025	ug/L #	55
36) Tetrahydrofuran	9.54	42	395	0.2224	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	258	0.1206	ug/L #	40
58) Toluene	12.49	91	4122	0.2057	ug/L	97
77) 1,1,2,2-Tetrachloroethane	15.34	83	4198	0.7439	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17461.D 8260WT.M Tue Apr 11 21:40:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:53 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

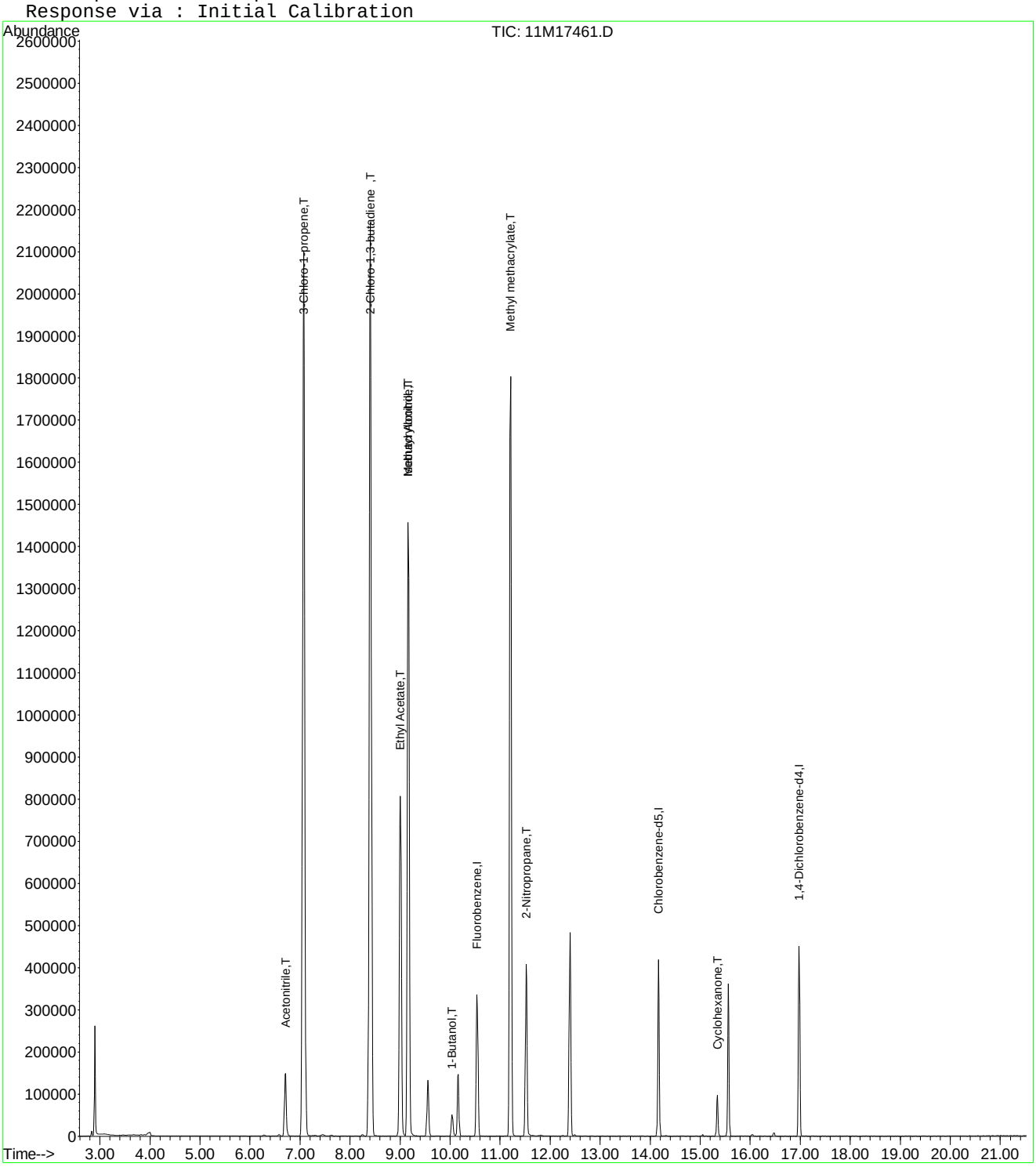
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	206451	313.1737	ug/L		99
3) 3-Chloro-1-propene	7.07	41	2228814	284.2830	ug/L		69
4) 2-Chloro-1,3-butadiene	8.41	53	2012298	296.1995	ug/L		70
5) Methacrylonitrile	9.16	41	972780	309.0933	ug/L		72
6) Isobutyl Alcohol	9.16	43	149280	662.3042	ug/L		87
7) 1-Butanol	10.04	56	37487	309.3216	ug/L	#	79
8) Cyclohexanone	15.34	55	55514	307.0239	ug/L	#	85
9) 2-Nitropropane	11.52	43	377920	318.9877	ug/L		94
10) Ethyl Acetate	9.01	43	1297135	306.1227	ug/L	#	86
11) Methyl methacrylate	11.21	41	1217565	311.8337	ug/L		71

(#) = qualifier out of range (m) = manual integration
11M17461.D A9FOOWT.M Fri Apr 21 13:34:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

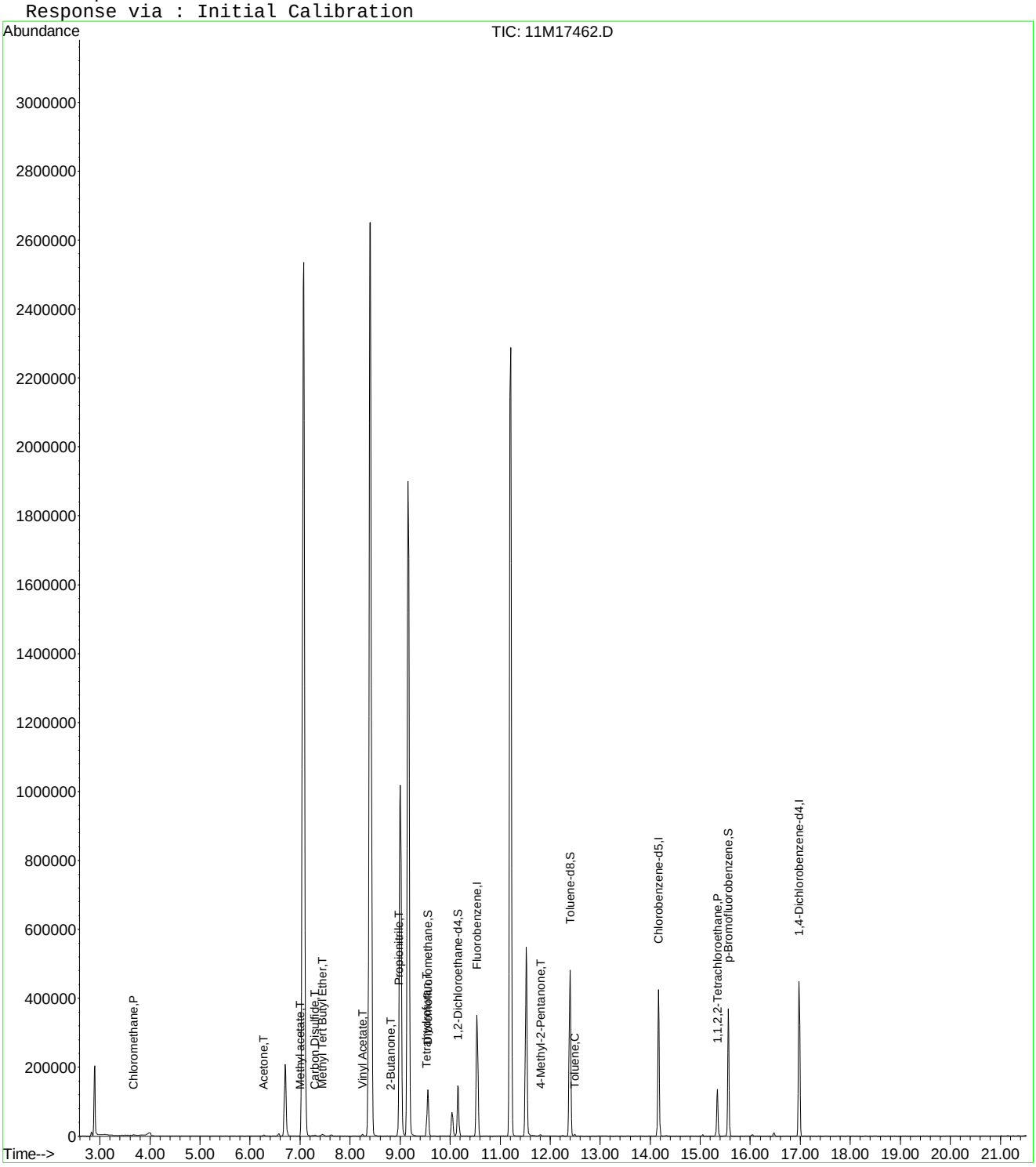
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106259	25.3144	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.15	65	123943	23.1414	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 92.56%			
57) Toluene-d8	12.40	98	411573	25.6539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.60%			
78) p-Bromofluorobenzene	15.56	95	151173	24.3188	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 97.28%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1293	0.1594	ug/L	99
13) Acetone	6.27	43	6921	4.2542	ug/L	90
18) Methyl acetate	7.00	43	726	0.1591	ug/L #	65
20) Carbon Disulfide	7.29	76	2261	0.1614	ug/L #	73
22) Methyl Tert Butyl Ether	7.44	73	9257	0.6538	ug/L	98
26) Vinyl Acetate	8.25	43	10807	1.0376	ug/L #	86
29) 2-Butanone	8.81	43	1338	0.5129	ug/L #	55
30) Propionitrile	8.97	54	189	0.2276	ug/L #	1
36) Tetrahydrofuran	9.53	42	1093	0.5949	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	707	0.3194	ug/L #	40
58) Toluene	12.49	91	6136	0.3054	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	5881	1.0548	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17462.D 8260WT.M Tue Apr 11 22:09:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:54 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

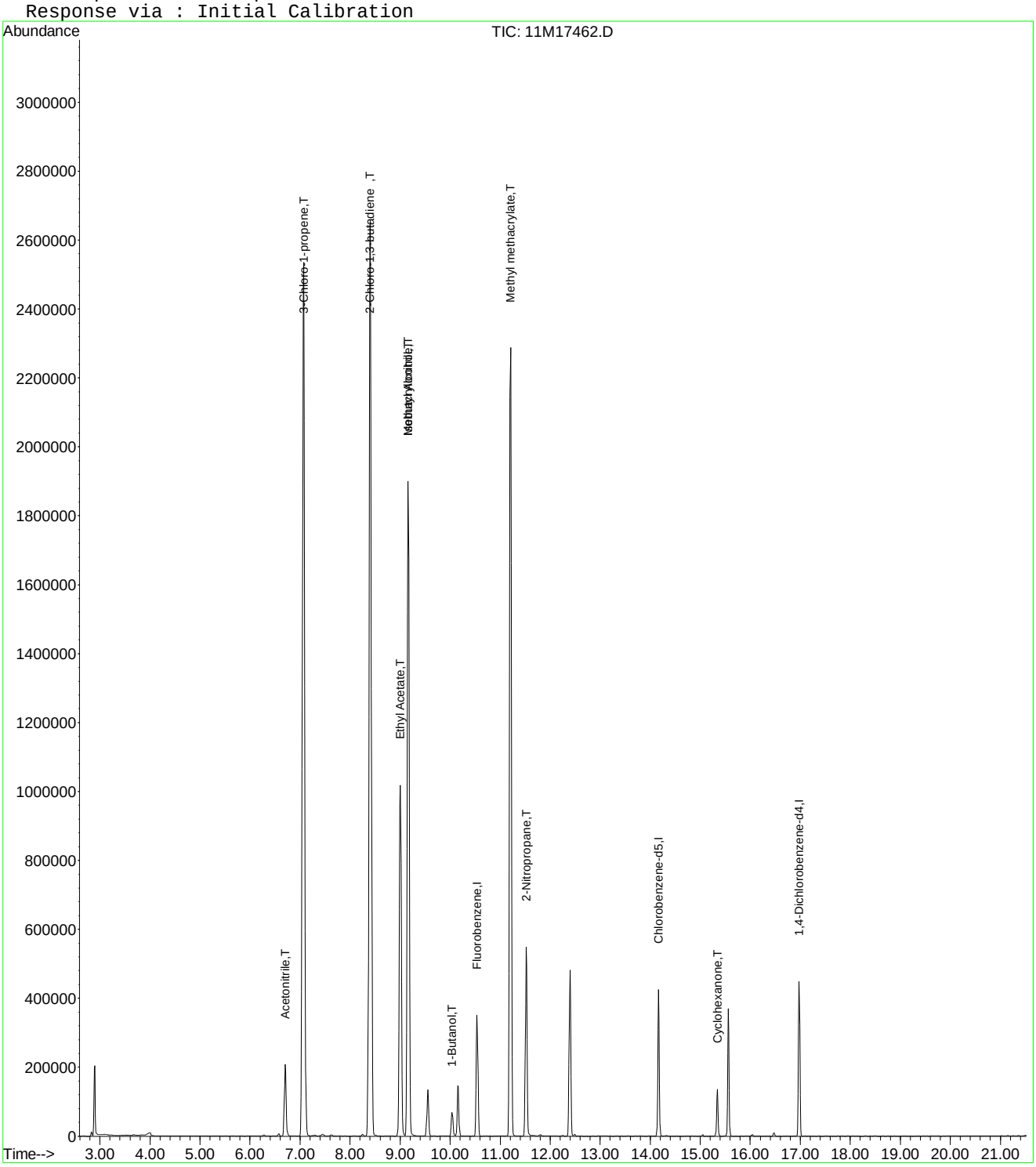
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	281651	413.0735	ug/L		98
3) 3-Chloro-1-propene	7.07	41	2690047	331.7300	ug/L		64
4) 2-Chloro-1,3-butadiene	8.40	53	2460691	350.1845	ug/L		67
5) Methacrylonitrile	9.16	41	1244299	382.2500	ug/L		70
6) Isobutyl Alcohol	9.16	43	201547	864.5299	ug/L		87
7) 1-Butanol	10.04	56	51492	396.8081	ug/L	#	80
8) Cyclohexanone	15.34	55	75425	395.9741	ug/L	#	85
9) 2-Nitropropane	11.52	43	505423	412.4553	ug/L		93
10) Ethyl Acetate	9.01	43	1632644	372.5201	ug/L	#	84
11) Methyl methacrylate	11.21	41	1521562	376.7630	ug/L		68

(#) = qualifier out of range (m) = manual integration
11M17462.D A9FOOWT.M Fri Apr 21 13:34:54 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39:11 2017 Quant Results File: 8260WT.RES

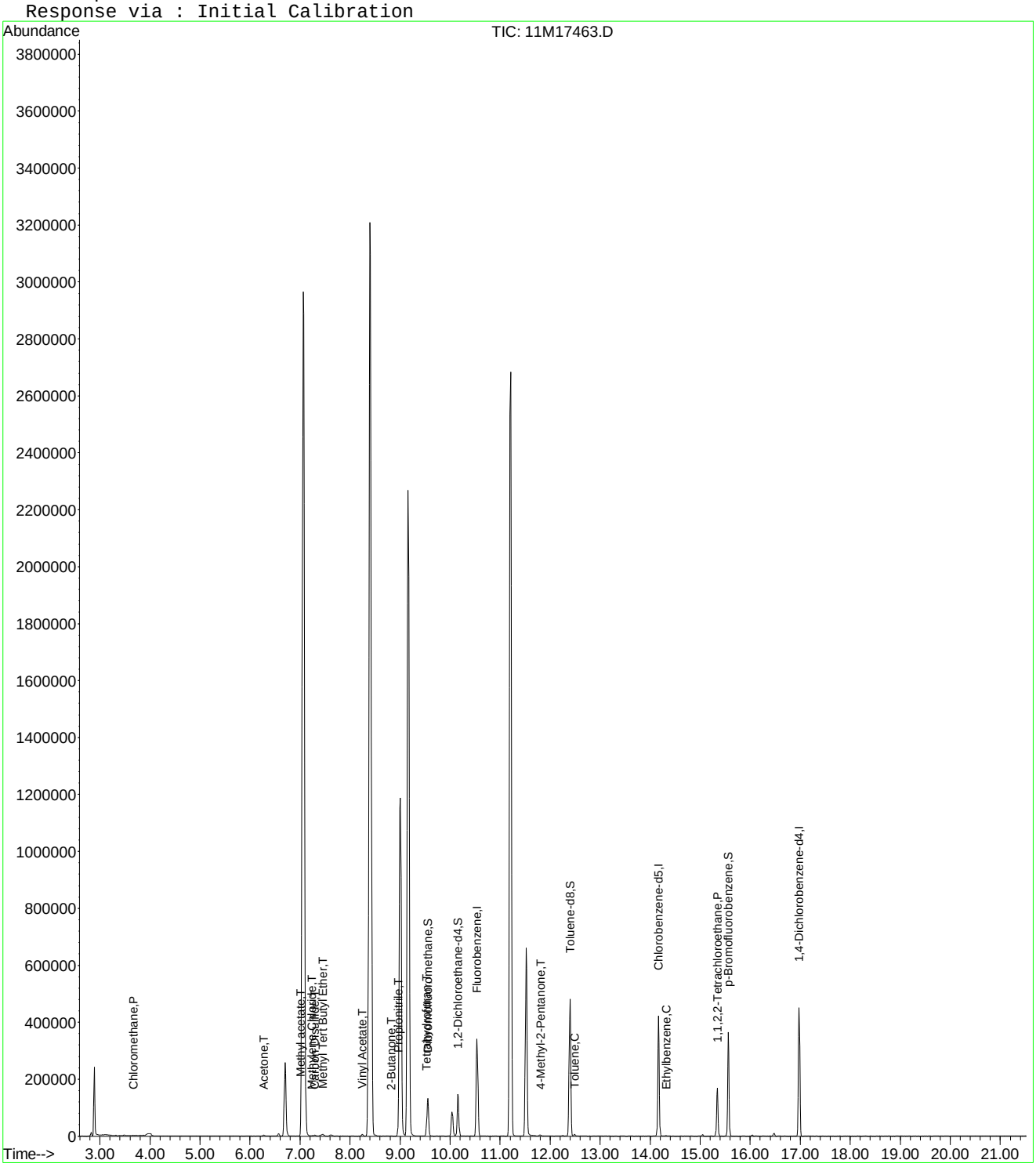
Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106074	25.8808	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.52%			
43) 1,2-Dichloroethane-d4	10.15	65	123547	23.6248	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.48%			
57) Toluene-d8	12.40	98	409774	25.8060	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.24%			
78) p-Bromofluorobenzene	15.56	95	148708	23.3407	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.36%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1661	0.2097	ug/L #	74
13) Acetone	6.28	43	7987	5.0280	ug/L	98
18) Methyl acetate	7.01	43	1700	0.3816	ug/L #	65
19) Methylene Chloride	7.24	84	1079	0.2037	ug/L	78
20) Carbon Disulfide	7.29	76	2617	0.1913	ug/L #	73
22) Methyl Tert Butyl Ether	7.46	73	11856	0.8576	ug/L	94
26) Vinyl Acetate	8.24	43	14104	1.3868	ug/L #	91
29) 2-Butanone	8.82	43	1665	0.6537	ug/L #	55
30) Propionitrile	8.96	54	198	0.2442	ug/L #	1
36) Tetrahydrofuran	9.53	42	768	0.4281	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	1108	0.5127	ug/L #	40
58) Toluene	12.49	91	7820	0.3932	ug/L	90
70) Ethylbenzene	14.32	106	907	0.1268	ug/L	92
77) 1,1,2,2-Tetrachloroethane	15.34	83	7437	1.3015	ug/L #	18

(#) = qualifier out of range (m) = manual integration

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

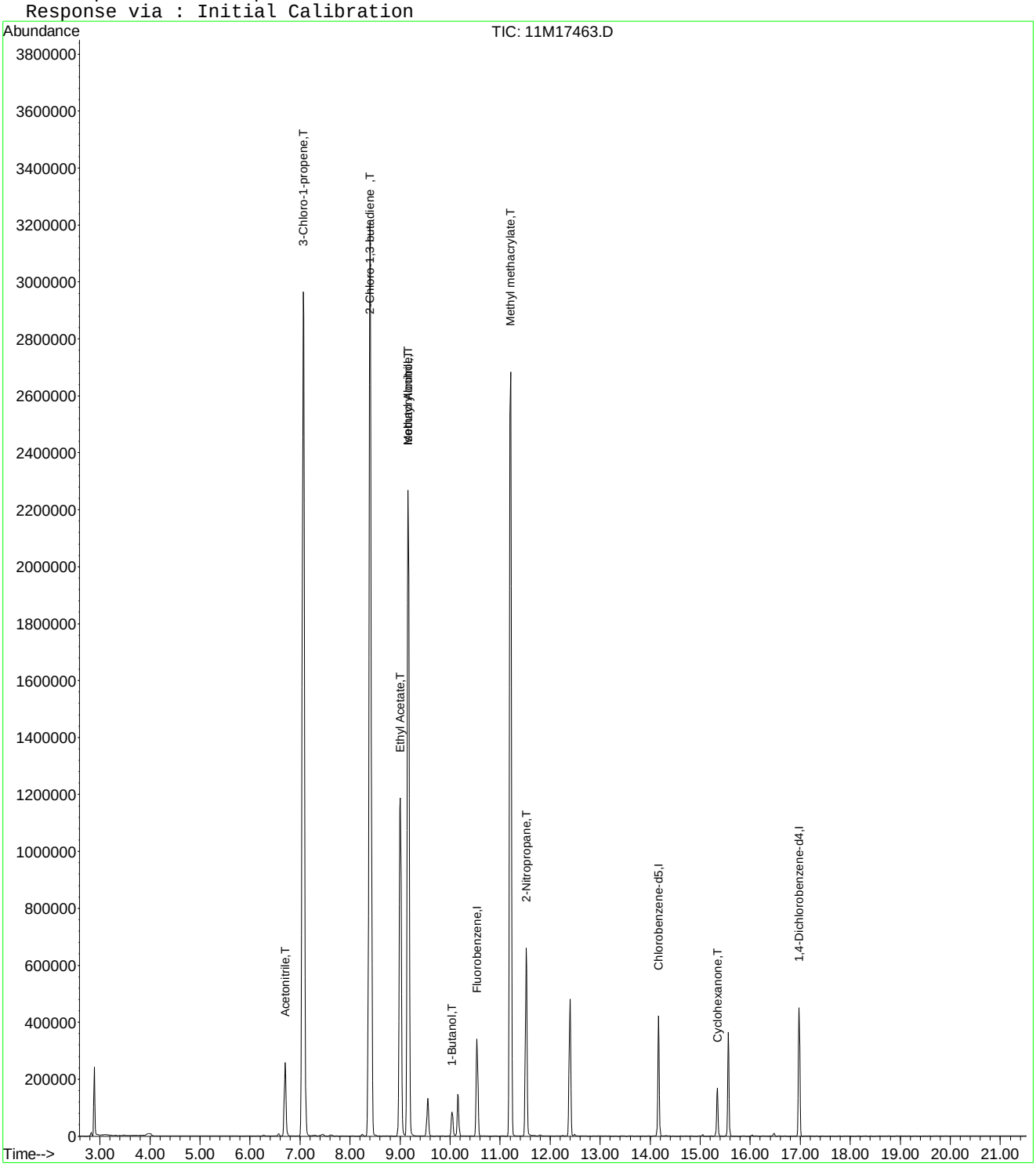
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	341698	513.2456	ug/L		99
3) 3-Chloro-1-propene	7.06	41	3087243	389.9082	ug/L		59
4) 2-Chloro-1,3-butadiene	8.40	53	2864759	417.5367	ug/L		64
5) Methacrylonitrile	9.16	41	1464306	460.7032	ug/L		68
6) Isobutyl Alcohol	9.16	43	247135	1085.6871	ug/L		87
7) 1-Butanol	10.04	56	64790	499.0454	ug/L	#	78
8) Cyclohexanone	15.34	55	96839	513.3157	ug/L	#	84
9) 2-Nitropropane	11.52	43	616392	515.1641	ug/L		94
10) Ethyl Acetate	9.01	43	1900376	444.0833	ug/L	#	82
11) Methyl methacrylate	11.21	41	1764954	447.5883	ug/L		66

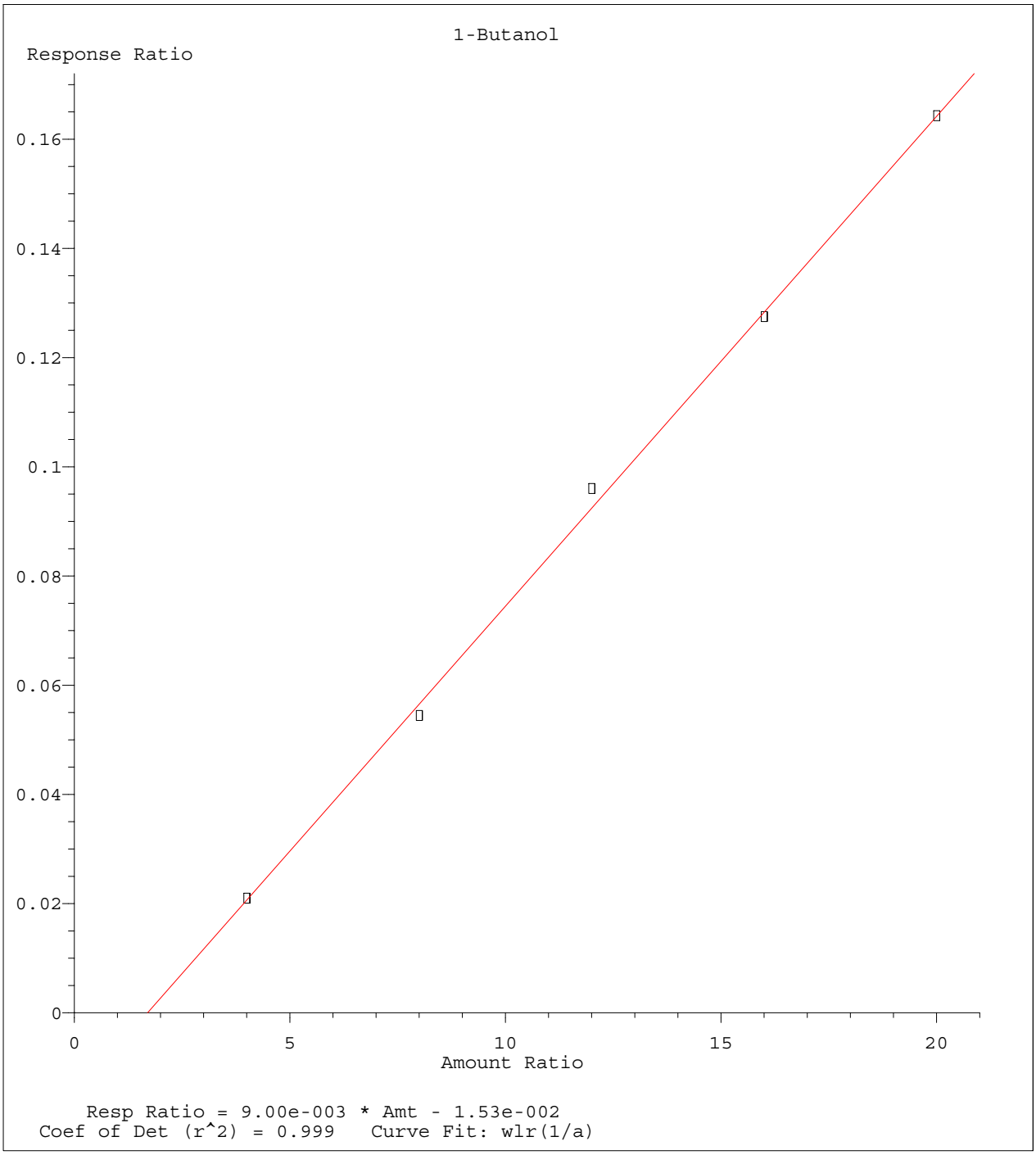
(#) = qualifier out of range (m) = manual integration
11M17463.D A9FOOWT.M Fri Apr 21 13:34:55 2017 Page 1

Quantitation Report (Not Reviewed)

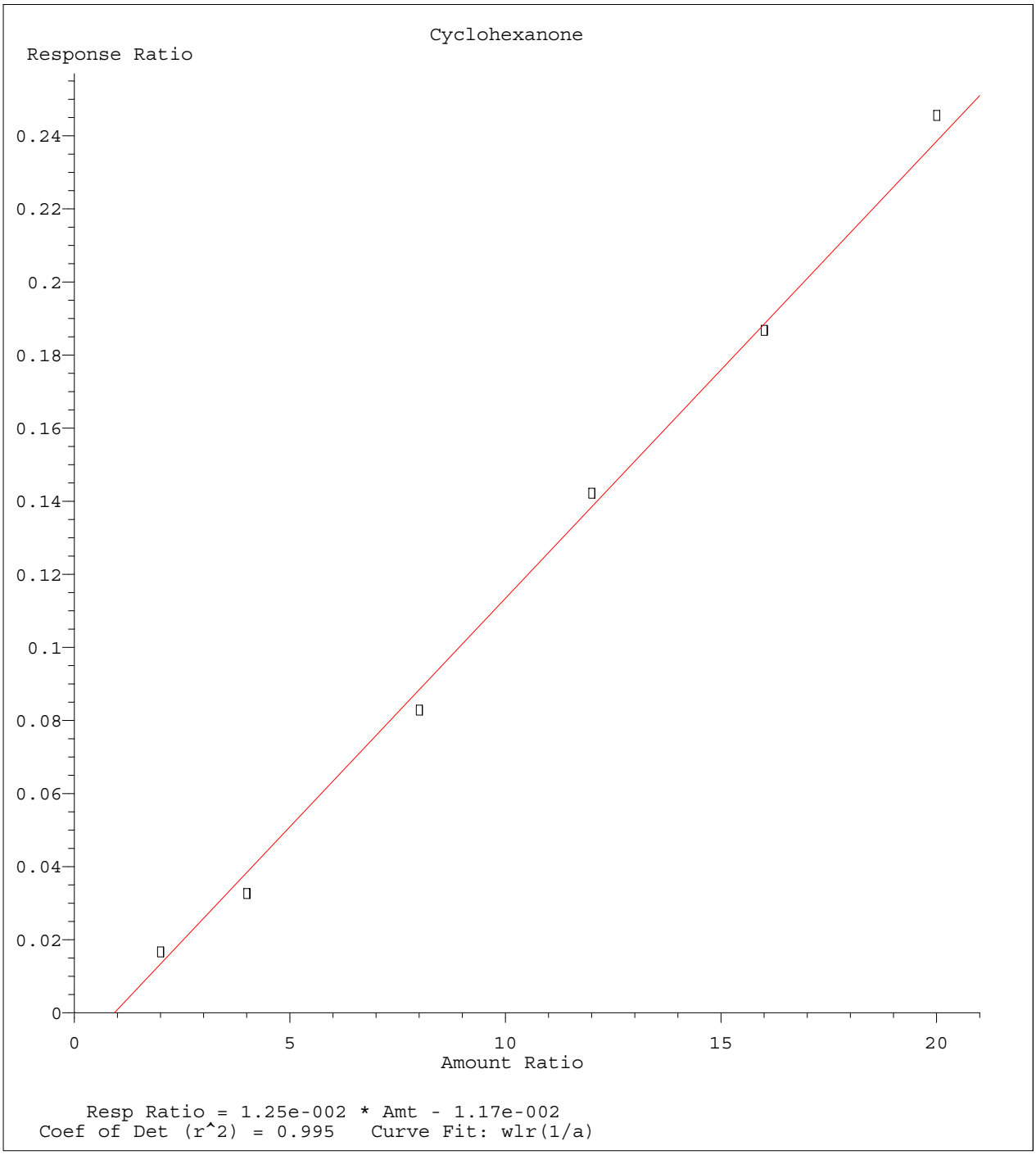
Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration





Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017



Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 00:08:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

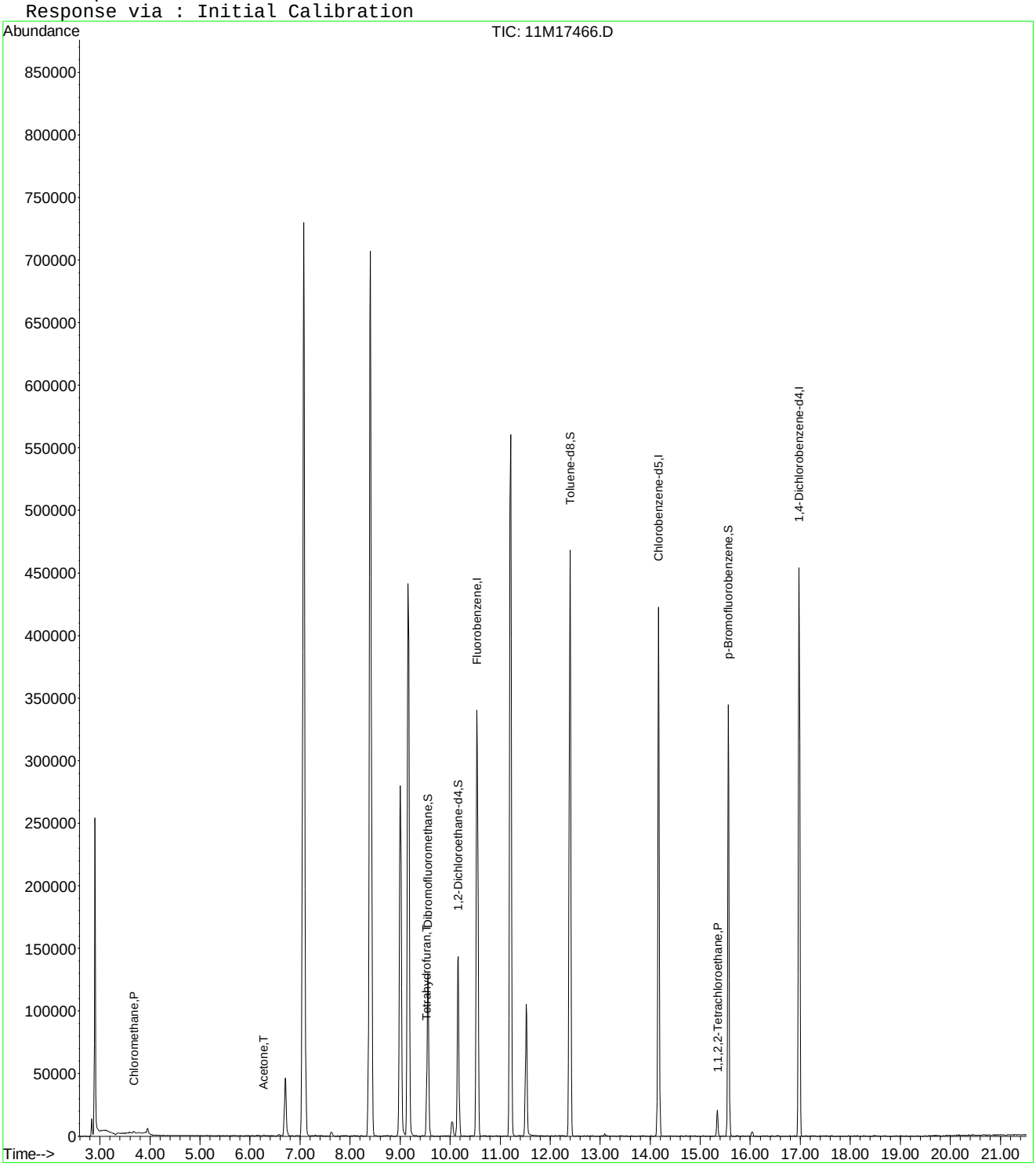
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	104183	25.3905	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.16	65	122221	23.3447	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.36%			
57) Toluene-d8	12.40	98	399954	25.0423	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.16%			
78) p-Bromofluorobenzene	15.56	95	141009	22.5068	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 90.04%			
Target Compounds						Qvalue
3) Chloromethane	3.68	50	1043	0.1316	ug/L	92
13) Acetone	6.27	43	1337	0.8407	ug/L #	46
36) Tetrahydrofuran	9.53	42	231	0.1286	ug/L #	41
77) 1,1,2,2-Tetrachloroethane	15.35	83	776	0.1381	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17466.D 8260WT.M Wed Apr 12 00:08:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 0:08 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:57 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

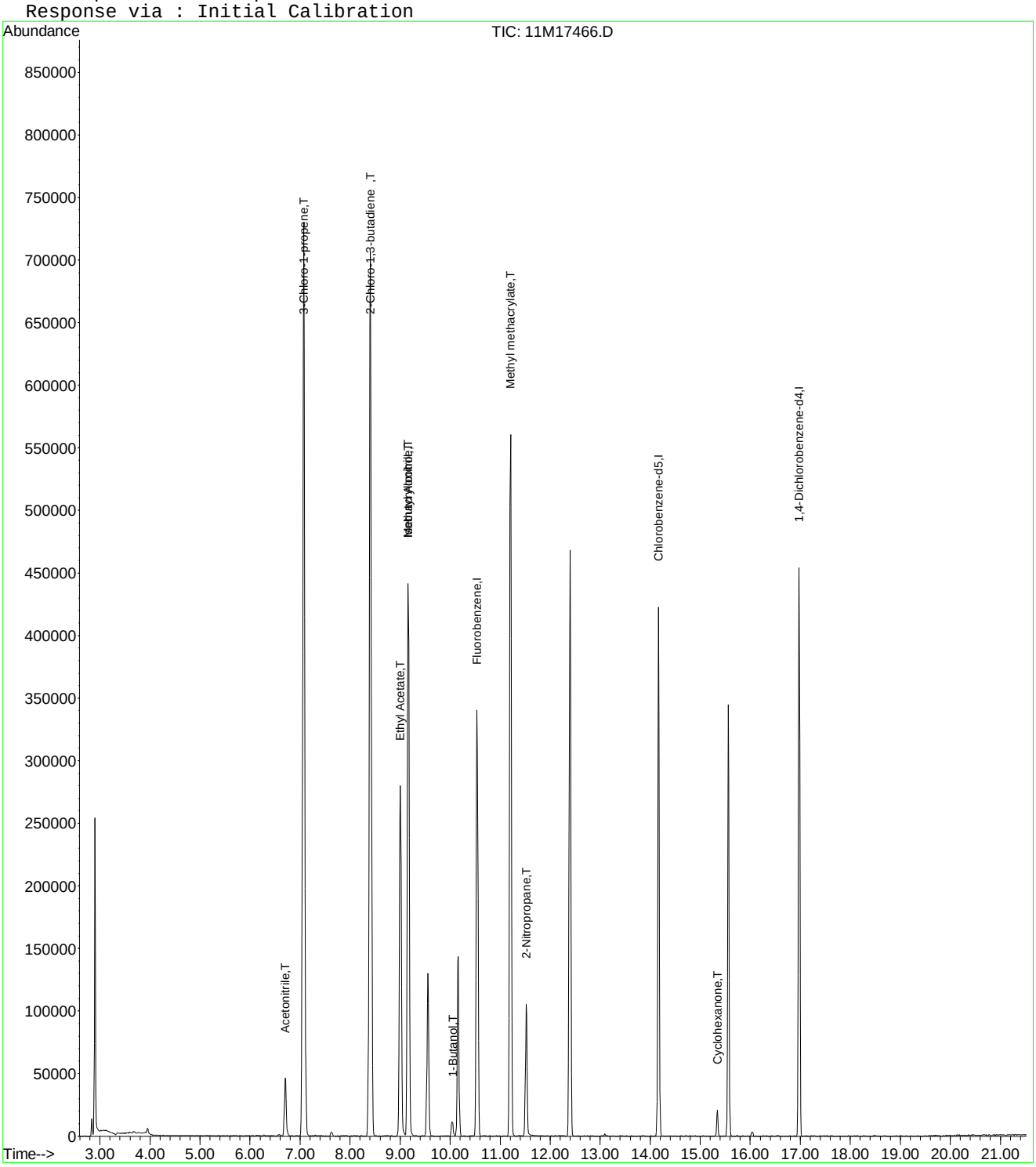
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	63420	95.1516	ug/L		98
3) 3-Chloro-1-propene	7.07	41	795836	100.3973	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	687438	100.0799	ug/L		79
5) Methacrylonitrile	9.16	41	302024	94.9156	ug/L		77
6) Isobutyl Alcohol	9.16	43	44330	194.5248	ug/L		86
7) 1-Butanol	10.05	56	8714	103.9348	ug/L	#	83
8) Cyclohexanone	15.34	55	12464	86.3629	ug/L	#	89
9) 2-Nitropropane	11.52	43	94805	79.1456	ug/L		94
10) Ethyl Acetate	9.01	43	448775	104.7515	ug/L	#	90
11) Methyl methacrylate	11.21	41	388983	98.5333	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	97	0.00
2	T	Acetonitrile	100.0000	95.1516	4.8	97	-0.01
3	T	3-Chloro-1-propene	100.0000	100.3973	-0.4	90	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	100.0799	-0.1	90	0.00
5	T	Methacrylonitrile	100.0000	94.9156	5.1	89	0.00
6	T	Isobutyl Alcohol	200.0000	194.5248	2.7	106	-0.01
7	T	1-Butanol	100.0000	103.9348	-3.9	102	0.01
8	T	Cyclohexanone	100.0000	86.3629	13.6	94	0.00
9	T	2-Nitropropane	100.0000	79.1456	20.9	82	0.00
10	T	Ethyl Acetate	100.0000	104.7515	-4.8	98	0.00
11	T	Methyl methacrylate	100.0000	98.5332	1.5	90	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17466.D A9FOOWT.M Fri Apr 21 13:35:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17509.D Vial: 2
Acq On : 14 Apr 2017 13:44 Operator: FJB
Sample : WG610045-02 0.3ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42:04 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	454444	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	314231	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158886	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.52	111	532	0.1128	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.44%#		
43) 1,2-Dichloroethane-d4	10.13	65	970	0.1816	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.72%#		
57) Toluene-d8	12.38	98	5515	0.3224	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	1.28%#		
78) p-Bromofluorobenzene	15.54	95	2536	0.4295	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.72%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1738	0.2777	ug/L	# 65
3) Chloromethane	3.65	50	4155	0.5519	ug/L	81
4) Vinyl Chloride	3.88	62	1958	0.3413	ug/L	94
5) 1,3-Butadiene	3.93	54	1163	Below Cal	#	45
6) Bromomethane	4.77	94	1406	0.3283	ug/L	90
7) Chloroethane	4.93	64	1179	0.2618	ug/L	# 43
8) Trichlorofluoromethane	5.40	101	1879	0.2406	ug/L	93
10) Isoprene	5.97	67	1827	0.2429	ug/L	78
13) Acetone	6.25	43	496	0.3198	ug/L	# 46
14) 1,1-Dichloroethene	6.46	61	2514	0.2822	ug/L	90
16) Dimethyl Sulfide	6.73	62	1787	0.2824	ug/L	97
18) Methyl acetate	6.99	43	1121	0.2521	ug/L	# 65
19) Methylene Chloride	7.22	84	1994	0.3314	ug/L	80
20) Carbon Disulfide	7.27	76	4858	0.3442	ug/L	96
22) Methyl Tert Butyl Ether	7.44	73	4031	0.2725	ug/L	# 66
23) trans-1,2-Dichloroethene	7.67	96	1357	0.2576	ug/L	72
24) n-Hexane	7.74	57	2046	0.2473	ug/L	# 71
26) Vinyl Acetate	8.22	43	1866	0.1787	ug/L	# 77
27) 1,1-Dichloroethane	8.25	63	3090	0.2787	ug/L	# 83
31) 2,2-Dichloropropane	9.01	77	1975	0.2591	ug/L	# 61
32) cis-1,2-Dichloroethene	9.07	96	1847	0.3048	ug/L	80
33) Chloroform	9.25	83	3432	0.3445	ug/L	92
35) Bromochloromethane	9.47	130	945	0.2571	ug/L	84
36) Tetrahydrofuran	9.51	42	380	0.2037	ug/L	# 41
38) 1,1,1-Trichloroethane	9.76	97	2036	0.2535	ug/L	# 79
39) Cyclohexane	9.80	56	3119	0.2836	ug/L	# 87
40) 1,1-Dichloropropene	9.95	75	2321	0.3236	ug/L	76
41) Carbon Tetrachloride	10.08	117	1800	0.2560	ug/L	# 79
44) 1,2-Dichloroethane	10.25	62	2060	0.2663	ug/L	# 78
45) Benzene	10.30	78	7522	0.3501	ug/L	88
46) Trichloroethene	11.00	130	1653	0.2905	ug/L	85
47) Methylcyclohexane	11.07	83	2426	0.2767	ug/L	83
48) 1,2-Dichloropropane	11.20	63	1963	0.2968	ug/L	91
50) Bromodichloromethane	11.49	83	1965	0.2834	ug/L	# 93
51) Dibromomethane	11.56	93	774	0.2481	ug/L	# 70
52) 2-Chloroethyl Vinyl Ether	11.76	63	426	0.1205	ug/L	# 53
54) cis-1,3-Dichloropropene	12.08	75	2427	0.3008	ug/L	# 77
58) Toluene	12.47	91	8560	0.3823	ug/L	99
59) Ethyl Methacrylate	12.54	69	1196	0.2076	ug/L	69
60) trans-1,3-Dichloropropene	12.64	75	1980	0.2863	ug/L	# 51

(#) = qualifier out of range (m) = manual integration
11M17509.D 8260WTR.M Thu Apr 20 14:51:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17509.D Vial: 2
Acq On : 14 Apr 2017 13:44 Operator: FJB
Sample : WG610045-02 0.3ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42:04 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

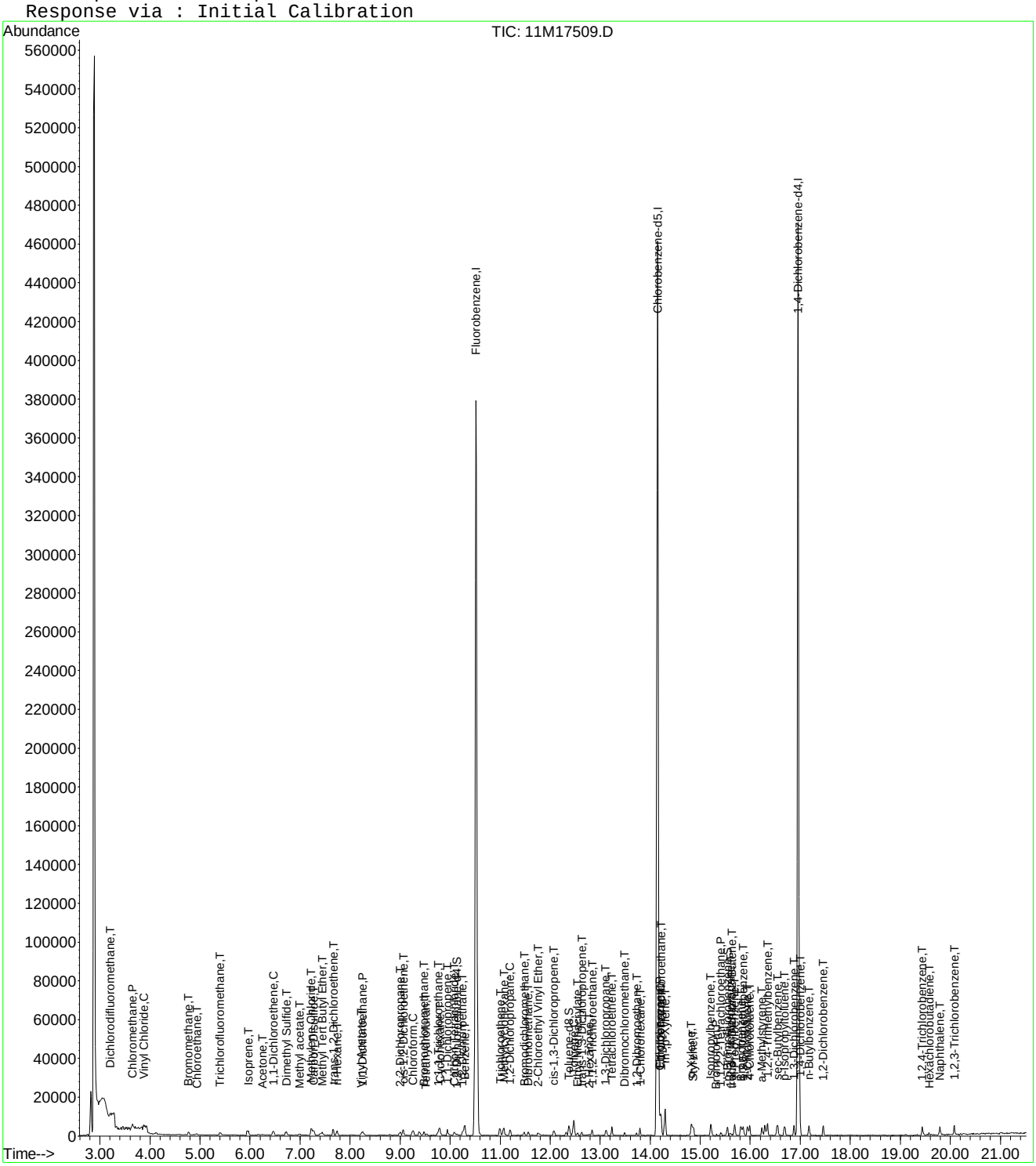
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
61)	1,1,2-Trichloroethane	12.84	97	1497	0.3178 ug/L		78
62)	2-Hexanone	12.78	43	1039	0.2903 ug/L	#	21
63)	1,3-Dichloropropane	13.11	76	2319	0.2976 ug/L		89
64)	Tetrachloroethene	13.23	164	1158	0.2428 ug/L		72
65)	Dibromochloromethane	13.48	129	1308	0.2562 ug/L		90
66)	1,2-Dibromoethane	13.73	107	898	0.2166 ug/L		62
67)	1-Chlorohexane	13.80	91	1486	0.2424 ug/L		92
68)	Chlorobenzene	14.20	112	4650	0.3331 ug/L		98
69)	1,1,1,2-Tetrachloroethane	14.22	131	1295	0.2551 ug/L		92
70)	Ethylbenzene	14.21	106	2124	0.2739 ug/L		48
71)	m-,p-Xylene	14.30	106	5830	0.6645 ug/L		81
72)	o-Xylene	14.82	106	2582	0.2818 ug/L		83
73)	Styrene	14.86	104	3567	0.2636 ug/L		88
74)	Bromoform	15.31	173	412	0.6845 ug/L		98
75)	Isopropylbenzene	15.21	105	7178	0.3170 ug/L		89
77)	1,1,2,2-Tetrachloroethane	15.41	83	1643	0.2991 ug/L		90
79)	1,2,3-Trichloropropane	15.60	110	247	0.1546 ug/L	#	1
80)	trans-1,4-Dichloro-2-Buten	15.63	53	200	0.4486 ug/L	#	1
81)	n-Propylbenzene	15.69	91	8012	0.3190 ug/L		93
82)	Bromobenzene	15.82	156	1965	0.3169 ug/L		96
83)	1,3,5-Trimethylbenzene	15.86	105	5455	0.2937 ug/L		100
84)	2-Chlorotoluene	15.94	91	5337	0.3046 ug/L		95
85)	4-Chlorotoluene	15.99	91	5040	0.3288 ug/L		99
86)	a-Methylstyrene	16.23	118	2368	0.2476 ug/L		78
88)	1,2,4-Trimethylbenzene	16.35	105	5828	0.3057 ug/L		94
89)	sec-Butylbenzene	16.54	105	7229	0.3069 ug/L		96
90)	p-Isopropyltoluene	16.69	119	5390	0.2735 ug/L		90
91)	1,3-Dichlorobenzene	16.87	146	3606	0.3212 ug/L		86
92)	1,4-Dichlorobenzene	17.00	146	3972	0.3481 ug/L	#	46
93)	n-Butylbenzene	17.17	91	4801	0.2824 ug/L	#	88
94)	1,2-Dichlorobenzene	17.45	146	3859	0.3399 ug/L		78
96)	1,2,4-Trichlorobenzene	19.44	180	2777	0.3358 ug/L		84
97)	Hexachlorobutadiene	19.58	225	929	0.2214 ug/L	#	44
98)	Naphthalene	19.79	128	5924	0.3299 ug/L	#	86
99)	1,2,3-Trichlorobenzene	20.08	180	2452	0.2951 ug/L	#	76

(#) = qualifier out of range (m) = manual integration
11M17509.D 8260WTR.M Thu Apr 20 14:51:10 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17509.D Vial: 2
Acq On : 14 Apr 2017 13:44 Operator: FJB
Sample : WG610045-02 0.3ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17509.D Vial: 2
Acq On : 14 Apr 2017 13:44 Operator: FJB
Sample : WG610045-02 0.3ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2777	0.0	0	0.00
3	P	Chloromethane	-1.0000	0.5519	0.0	0	-0.01
4	C	Vinyl Chloride	-1.0000	0.3413	0.0	0	0.00
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.00
6	T	Bromomethane	-1.0000	0.3283	0.0	0	0.00
7	T	Chloroethane	-1.0000	0.2618	0.0	0	0.01
8	T	Trichlorofluoromethane	-1.0000	0.2406	0.0	0	-0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-5.91#
10	T	Isoprene	-1.0000	0.2429	0.0	0	0.01
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.15#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.0408	0.0	0	-0.02
13	T	Acetone	-1.0000	0.3198	0.0	0	0.00
14	C	1,1-Dichloroethene	-1.0000	0.2822	0.0	0	-0.01
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.58#
16	T	Dimethyl Sulfide	-1.0000	0.2824	0.0	0	0.01
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-6.97#
18	T	Methyl acetate	-1.0000	0.2521	0.0	0	0.01
19	T	Methylene Chloride	-1.0000	0.3314	0.0	0	-0.01
20	T	Carbon Disulfide	-1.0000	0.3442	0.0	0	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.40#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2725	0.0	0	0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.2576	0.0	0	0.01
24	T	n-Hexane	-1.0000	0.2473	0.0	0	0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.06#
26	T	Vinyl Acetate	-1.0000	0.1787	0.0	0	-0.01
27	P	1,1-Dichloroethane	-1.0000	0.2787	0.0	0	-0.01
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.61#
29	T	2-Butanone	-1.0000	0.0843	0.0	0	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-8.89#
31	T	2,2-Dichloropropane	-1.0000	0.2591	0.0	0	0.01
32	T	cis-1,2-Dichloroethene	-1.0000	0.3048	0.0	0	0.01
33	C	Chloroform	0.3000	0.3445	-14.8	100	0.00
34	T	1-Bromopropane	-1.0000	0.0000	0.0	0	-9.39#
35	T	Bromochloromethane	-1.0000	0.2571	0.0	0	-0.01
36	T	Tetrahydrofuran	-1.0000	0.2037	0.0	0	0.01
37	S	Dibromofluoromethane	-1.0000	0.1128	0.0	0	-0.01
38	T	1,1,1-Trichloroethane	-1.0000	0.2535	0.0	0	0.00
39	T	Cyclohexane	-1.0000	0.2836	0.0	0	0.01
40	T	1,1-Dichloropropene	-1.0000	0.3236	0.0	0	0.00
41	T	Carbon Tetrachloride	-1.0000	0.2560	0.0	0	-0.01
42	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.04#
43	S	1,2-Dichloroethane-d4	-1.0000	0.1816	0.0	0	-0.01
44	T	1,2-Dichloroethane	-1.0000	0.2663	0.0	0	0.00
45	T	Benzene	-1.0000	0.3501	0.0	0	0.01
46	T	Trichloroethene	-1.0000	0.2905	0.0	0	0.00
47	T	Methylcyclohexane	-1.0000	0.2767	0.0	0	0.00
48	C	1,2-Dichloropropane	-1.0000	0.2968	0.0	0	0.00
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	-1.0000	0.2834	0.0	0	0.01
51	T	Dibromomethane	-1.0000	0.2481	0.0	0	0.00
52	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1205	0.0	0	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-11.78#
54	T	cis-1,3-Dichloropropene	-1.0000	0.3008	0.0	0	0.00

(#) = Out of Range
11M17509.D 8260WTR.M Wed Apr 19 15:42:17 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17509.D Vial: 2
Acq On : 14 Apr 2017 13:44 Operator: FJB
Sample : WG610045-02 0.3ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	-1.0000	0.0992	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.3224	0.0	0	0.00
58	C	Toluene	-1.0000	0.3823	0.0	0	0.00
59	T	Ethyl Methacrylate	-1.0000	0.2076	0.0	0	-0.01
60	T	trans-1,3-Dichloropropene	-1.0000	0.2863	0.0	0	0.00
61	T	1,1,2-Trichloroethane	-1.0000	0.3178	0.0	0	0.01
62	T	2-Hexanone	-1.0000	0.2903	0.0	0	0.01
63	T	1,3-Dichloropropane	-1.0000	0.2976	0.0	0	-0.01
64	T	Tetrachloroethene	-1.0000	0.2428	0.0	0	0.00
65	T	Dibromochloromethane	-1.0000	0.2562	0.0	0	0.00
66	T	1,2-Dibromoethane	-1.0000	0.2166	0.0	0	0.00
67	T	1-Chlorohexane	-1.0000	0.2424	0.0	0	0.01
68	P	Chlorobenzene	-1.0000	0.3331	0.0	0	0.00
69	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2551	0.0	0	0.00
70	C	Ethylbenzene	-1.0000	0.2739	0.0	0	-0.01
71	T	m-,p-Xylene	-1.0000	0.6645	0.0	0	0.00
72	T	o-Xylene	-1.0000	0.2818	0.0	0	-0.01
73	T	Styrene	-1.0000	0.2636	0.0	0	0.00
74	P	Bromoform	-1.0000	0.6845	0.0	0	0.00
75	T	Isopropylbenzene	-1.0000	0.3170	0.0	0	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
77	P	1,1,2,2-Tetrachloroethane	-1.0000	0.2991	0.0	0	-0.01
78	S	p-Bromofluorobenzene	-1.0000	0.4295	0.0	0	0.00
79	T	1,2,3-Trichloropropane	-1.0000	0.1546	0.0	0	0.00
80	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.4486	0.0	0	0.00
81	T	n-Propylbenzene	-1.0000	0.3190	0.0	0	0.00
82	T	Bromobenzene	0.3000	0.3169	-5.6	100	0.00
83	T	1,3,5-Trimethylbenzene	-1.0000	0.2937	0.0	0	0.00
84	T	2-Chlorotoluene	-1.0000	0.3046	0.0	0	0.00
85	T	4-Chlorotoluene	-1.0000	0.3288	0.0	0	0.00
86	T	a-Methylstyrene	-1.0000	0.2476	0.0	0	0.00
87	T	tert-Butylbenzene	-1.0000	0.1090	0.0	0	0.00
88	T	1,2,4-Trimethylbenzene	-1.0000	0.3057	0.0	0	0.01
89	T	sec-Butylbenzene	-1.0000	0.3069	0.0	0	0.00
90	T	p-Isopropyltoluene	-1.0000	0.2735	0.0	0	0.00
91	T	1,3-Dichlorobenzene	-1.0000	0.3212	0.0	0	0.00
92	T	1,4-Dichlorobenzene	-1.0000	0.3481	0.0	100	0.00
93	T	n-Butylbenzene	-1.0000	0.2824	0.0	0	0.00
94	T	1,2-Dichlorobenzene	0.3000	0.3399	-13.3	100	-0.01
95	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-18.38#
96	T	1,2,4-Trichlorobenzene	-1.0000	0.3358	0.0	0	0.00
97	T	Hexachlorobutadiene	-1.0000	0.2214	0.0	0	0.00
98	T	Naphthalene	-1.0000	0.3299	0.0	0	0.00
99	T	1,2,3-Trichlorobenzene	0.3000	0.2951	1.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17510.D Vial: 3
Acq On : 14 Apr 2017 14:13 Operator: FJB
Sample : WG610045-03 0.4ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42:24 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	454223	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	318250	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	163374	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	12.39	98	881	0.0509	ug/L	0.01
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.20%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	2625	0.4196	ug/L #	65
3) Chloromethane	3.66	50	4549	0.6046	ug/L	88
4) Vinyl Chloride	3.89	62	2275	0.3967	ug/L	97
5) 1,3-Butadiene	3.93	54	1629	Below Cal	#	63
6) Bromomethane	4.78	94	2052	0.4793	ug/L	100
7) Chloroethane	4.92	64	1461	0.3245	ug/L #	43
8) Trichlorofluoromethane	5.41	101	2966	0.3800	ug/L	90
10) Isoprene	5.96	67	2573	0.3423	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.18	101	1348	0.2896	ug/L #	44
13) Acetone	6.25	43	293	0.1890	ug/L #	46
14) 1,1-Dichloroethene	6.46	61	3405	0.3824	ug/L	100
16) Dimethyl Sulfide	6.72	62	2029	0.3208	ug/L	98
18) Methyl acetate	6.98	43	1367	0.3076	ug/L #	65
19) Methylene Chloride	7.22	84	2539	0.4222	ug/L	93
20) Carbon Disulfide	7.27	76	6372	0.4517	ug/L #	81
22) Methyl Tert Butyl Ether	7.42	73	5952	0.4026	ug/L #	67
23) trans-1,2-Dichloroethene	7.65	96	1900	0.3608	ug/L	89
24) n-Hexane	7.73	57	2743	0.3317	ug/L #	71
26) Vinyl Acetate	8.23	43	2461	0.2358	ug/L #	77
27) 1,1-Dichloroethane	8.25	63	4337	0.3913	ug/L #	82
29) 2-Butanone	8.79	43	480	0.1910	ug/L #	55
31) 2,2-Dichloropropane	8.99	77	2806	0.3683	ug/L #	42
32) cis-1,2-Dichloroethene	9.07	96	2119	0.3498	ug/L	99
33) Chloroform	9.25	83	4620	0.4639	ug/L	94
35) Bromochloromethane	9.48	130	1203	0.3275	ug/L	97
36) Tetrahydrofuran	9.51	42	249	0.1336	ug/L #	41
38) 1,1,1-Trichloroethane	9.76	97	2636	0.3283	ug/L #	90
39) Cyclohexane	9.78	56	3990	0.3630	ug/L #	89
40) 1,1-Dichloropropene	9.95	75	2593	0.3617	ug/L #	70
41) Carbon Tetrachloride	10.09	117	2653	0.3775	ug/L #	87
44) 1,2-Dichloroethane	10.25	62	2867	0.3708	ug/L #	74
45) Benzene	10.29	78	9304	0.4332	ug/L	88
46) Trichloroethene	10.99	130	1979	0.3480	ug/L	97
47) Methylcyclohexane	11.06	83	3203	0.3655	ug/L	96
48) 1,2-Dichloropropane	11.19	63	2379	0.3598	ug/L #	66
50) Bromodichloromethane	11.49	83	2700	0.3895	ug/L #	80
51) Dibromomethane	11.57	93	908	0.2912	ug/L #	63
52) 2-Chloroethyl Vinyl Ether	11.77	63	739	0.2091	ug/L #	53
54) cis-1,3-Dichloropropene	12.07	75	2649	0.3285	ug/L #	88
55) Dimethyl Disulfide	12.32	79	915	0.1932	ug/L	69

(#) = qualifier out of range (m) = manual integration
11M17510.D 8260WTR.M Thu Apr 20 14:51:11 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17510.D Vial: 3
Acq On : 14 Apr 2017 14:13 Operator: FJB
Sample : WG610045-03 0.4ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42:24 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

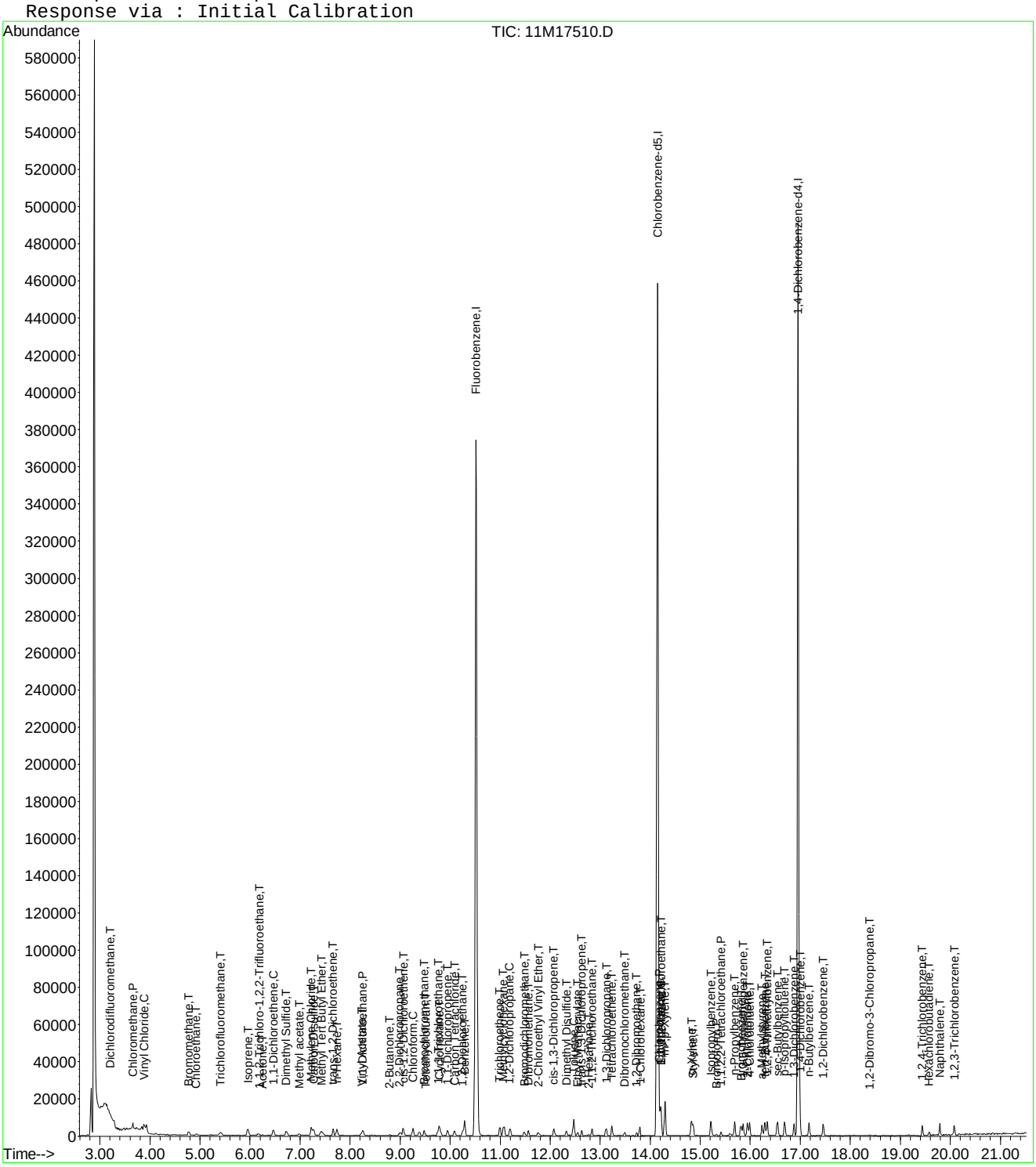
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
58)	Toluene	12.47	91	9418	0.4154 ug/L		94
59)	Ethyl Methacrylate	12.54	69	1392	0.2385 ug/L		93
60)	trans-1,3-Dichloropropene	12.62	75	2093	0.2989 ug/L	#	51
61)	1,1,2-Trichloroethane	12.83	97	1619	0.3394 ug/L		83
62)	2-Hexanone	12.77	43	797	0.2199 ug/L	#	9
63)	1,3-Dichloropropane	13.12	76	3165	0.4010 ug/L		91
64)	Tetrachloroethene	13.23	164	1948	0.4033 ug/L		93
65)	Dibromochloromethane	13.48	129	1647	0.3185 ug/L		93
66)	1,2-Dibromoethane	13.72	107	1488	0.3543 ug/L		84
67)	1-Chlorohexane	13.80	91	1853	0.2985 ug/L		92
68)	Chlorobenzene	14.19	112	6399	0.4526 ug/L		89
69)	1,1,1,2-Tetrachloroethane	14.22	131	1645	0.3200 ug/L		91
70)	Ethylbenzene	14.22	106	3072	0.3911 ug/L		82
71)	m-,p-Xylene	14.29	106	7193	0.8095 ug/L		70
72)	o-Xylene	14.83	106	3444	0.3711 ug/L		96
73)	Styrene	14.86	104	4599	0.3356 ug/L		99
74)	Bromoform	15.32	173	944	0.8129 ug/L	#	28
75)	Isopropylbenzene	15.22	105	8829	0.3850 ug/L		98
77)	1,1,2,2-Tetrachloroethane	15.42	83	2240	0.3966 ug/L		68
81)	n-Propylbenzene	15.69	91	9496	0.3677 ug/L		99
82)	Bromobenzene	15.82	156	2104	0.3300 ug/L		98
83)	1,3,5-Trimethylbenzene	15.86	105	7283	0.3813 ug/L		91
84)	2-Chlorotoluene	15.94	91	7700	0.4274 ug/L		85
85)	4-Chlorotoluene	15.99	91	6540	0.4150 ug/L		90
86)	a-Methylstyrene	16.23	118	2588	0.2632 ug/L		97
87)	tert-Butylbenzene	16.30	134	1369	0.3169 ug/L		70
88)	1,2,4-Trimethylbenzene	16.34	105	6930	0.3535 ug/L		98
89)	sec-Butylbenzene	16.54	105	9249	0.3818 ug/L		82
90)	p-Isopropyltoluene	16.69	119	7471	0.3686 ug/L		91
91)	1,3-Dichlorobenzene	16.87	146	4631	0.4011 ug/L		87
92)	1,4-Dichlorobenzene	17.00	146	5107	0.4353 ug/L		83
93)	n-Butylbenzene	17.17	91	6024	0.3446 ug/L	#	87
94)	1,2-Dichlorobenzene	17.45	146	4702	0.4028 ug/L		91
95)	1,2-Dibromo-3-Chloropropan	18.38	75	421	0.4317 ug/L	#	1
96)	1,2,4-Trichlorobenzene	19.44	180	2917	0.3431 ug/L	#	74
97)	Hexachlorobutadiene	19.57	225	1398	0.3240 ug/L	#	56
98)	Naphthalene	19.79	128	6804	0.3685 ug/L	#	89
99)	1,2,3-Trichlorobenzene	20.08	180	2978	0.3486 ug/L	#	70

(#) = qualifier out of range (m) = manual integration
11M17510.D 8260WTR.M Thu Apr 20 14:51:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17510.D Vial: 3
Acq On : 14 Apr 2017 14:13 Operator: FJB
Sample : WG610045-03 0.4ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:42 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17510.D Vial: 3
Acq On : 14 Apr 2017 14:13 Operator: FJB
Sample : WG610045-03 0.4ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.4196	0.0	0	0.00
3	P	Chloromethane	-1.0000	0.6046	0.0	100	0.00
4	C	Vinyl Chloride	0.4000	0.3967	0.8	100	0.01
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	100	0.00
6	T	Bromomethane	-1.0000	0.4793	0.0	100	0.01
7	T	Chloroethane	-1.0000	0.3245	0.0	0	0.00
8	T	Trichlorofluoromethane	0.4000	0.3801	5.0	100	0.00
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-5.91#
10	T	Isoprene	0.4000	0.3423	14.4	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.15#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.2896	0.0	100	0.01
13	T	Acetone	-1.0000	0.1890	0.0	0	0.00
14	C	1,1-Dichloroethene	0.4000	0.3824	4.4	100	-0.01
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.58#
16	T	Dimethyl Sulfide	0.4000	0.3208	19.8	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-6.97#
18	T	Methyl acetate	-1.0000	0.3076	0.0	0	0.00
19	T	Methylene Chloride	0.4000	0.4222	-5.6	100	-0.01
20	T	Carbon Disulfide	-1.0000	0.4517	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.40#
22	T	Methyl Tert Butyl Ether	0.4000	0.4026	-0.6	100	-0.01
23	T	trans-1,2-Dichloroethene	0.4000	0.3608	9.8	100	-0.01
24	T	n-Hexane	-1.0000	0.3317	0.0	0	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.06#
26	T	Vinyl Acetate	-1.0000	0.2358	0.0	0	0.00
27	P	1,1-Dichloroethane	0.4000	0.3913	2.2	100	-0.01
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.61#
29	T	2-Butanone	-1.0000	0.1910	0.0	0	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-8.89#
31	T	2,2-Dichloropropane	0.4000	0.3683	7.9	0	-0.01
32	T	cis-1,2-Dichloroethene	0.4000	0.3498	12.5	100	0.01
33	C	Chloroform	0.4000	0.4639	-16.0	100	0.00
34	T	1-Bromopropane	-1.0000	0.0000	0.0	0	-9.39#
35	T	Bromochloromethane	0.4000	0.3275	18.1	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.1336	0.0	0	0.01
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	0.4000	0.3283	17.9	100	0.00
39	T	Cyclohexane	0.4000	0.3630	9.2	100	-0.01
40	T	1,1-Dichloropropene	0.4000	0.3617	9.6	100	0.00
41	T	Carbon Tetrachloride	0.4000	0.3775	5.6	100	0.00
42	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.04#
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	0.4000	0.3708	7.3	100	0.00
45	T	Benzene	0.4000	0.4332	-8.3	100	0.00
46	T	Trichloroethene	0.4000	0.3480	13.0	100	-0.01
47	T	Methylcyclohexane	0.4000	0.3655	8.6	100	-0.01
48	C	1,2-Dichloropropane	0.4000	0.3598	10.0	100	-0.01
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	0.4000	0.3895	2.6	100	0.01
51	T	Dibromomethane	0.4000	0.2912	27.2#	100	0.01
52	T	2-Chloroethyl Vinyl Ether	-1.0000	0.2091	0.0	0	0.01
53	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-11.78#
54	T	cis-1,3-Dichloropropene	0.4000	0.3285	17.9	100	-0.01

(#) = Out of Range
11M17510.D 8260WTR.M Wed Apr 19 15:42:40 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17510.D Vial: 3
Acq On : 14 Apr 2017 14:13 Operator: FJB
Sample : WG610045-03 0.4ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	-1.0000	0.1932	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0509	0.0	100	0.01
58	C	Toluene	0.4000	0.4154	-3.8	100	0.00
59	T	Ethyl Methacrylate	-1.0000	0.2385	0.0	100	-0.01
60	T	trans-1,3-Dichloropropene	-1.0000	0.2989	0.0	0	-0.01
61	T	1,1,2-Trichloroethane	0.4000	0.3394	15.2	100	0.00
62	T	2-Hexanone	-1.0000	0.2199	0.0	0	0.00
63	T	1,3-Dichloropropane	0.4000	0.4010	-0.2	100	0.00
64	T	Tetrachloroethene	0.4000	0.4033	-0.8	100	0.00
65	T	Dibromochloromethane	0.4000	0.3185	20.4	100	0.00
66	T	1,2-Dibromoethane	0.4000	0.3544	11.4	100	-0.01
67	T	1-Chlorohexane	0.4000	0.2985	25.4#	100	0.01
68	P	Chlorobenzene	0.4000	0.4526	-13.2	100	-0.01
69	T	1,1,1,2-Tetrachloroethane	0.4000	0.3200	20.0	100	0.00
70	C	Ethylbenzene	-1.0000	0.3911	0.0	100	0.00
71	T	m-,p-Xylene	0.8000	0.8095	-1.2	100	-0.01
72	T	o-Xylene	0.4000	0.3711	7.2	100	0.00
73	T	Styrene	0.4000	0.3356	16.1	100	0.00
74	P	Bromoform	-1.0000	0.8129	0.0	0	0.00
75	T	Isopropylbenzene	0.4000	0.3850	3.8	100	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
77	P	1,1,2,2-Tetrachloroethane	0.4000	0.3966	0.9	100	0.00
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#
79	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-15.60#
80	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-15.63#
81	T	n-Propylbenzene	0.4000	0.3677	8.1	100	0.00
82	T	Bromobenzene	0.4000	0.3300	17.5	100	0.00
83	T	1,3,5-Trimethylbenzene	0.4000	0.3813	4.7	100	0.00
84	T	2-Chlorotoluene	0.4000	0.4274	-6.9	100	0.00
85	T	4-Chlorotoluene	0.4000	0.4150	-3.7	100	0.00
86	T	a-Methylstyrene	-1.0000	0.2632	0.0	100	0.00
87	T	tert-Butylbenzene	0.4000	0.3169	20.8	100	0.00
88	T	1,2,4-Trimethylbenzene	-1.0000	0.3535	0.0	0	0.00
89	T	sec-Butylbenzene	-1.0000	0.3818	0.0	0	0.00
90	T	p-Isopropyltoluene	-1.0000	0.3686	0.0	0	0.00
91	T	1,3-Dichlorobenzene	0.4000	0.4011	-0.3	100	0.00
92	T	1,4-Dichlorobenzene	0.4000	0.4353	-8.8	100	0.00
93	T	n-Butylbenzene	0.4000	0.3446	13.9	100	0.00
94	T	1,2-Dichlorobenzene	0.4000	0.4028	-0.7	100	-0.01
95	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.4317	0.0	0	0.00
96	T	1,2,4-Trichlorobenzene	0.4000	0.3431	14.2	100	0.00
97	T	Hexachlorobutadiene	0.4000	0.3240	19.0	100	-0.01
98	T	Naphthalene	0.4000	0.3685	7.9	100	0.00
99	T	1,2,3-Trichlorobenzene	0.4000	0.3486	12.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:43:49 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	445074	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	309770	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	160149	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	12.38	98	546	0.0324	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.12%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.22	85	5564	0.9077	ug/L #	84
3) Chloromethane	3.66	50	9189	1.2464	ug/L	91
4) Vinyl Chloride	3.89	62	5694	1.0133	ug/L	98
5) 1,3-Butadiene	3.94	54	4405	0.4070	ug/L	92
6) Bromomethane	4.78	94	4946	1.1791	ug/L	99
7) Chloroethane	4.92	64	4368	0.9902	ug/L	92
8) Trichlorofluoromethane	5.42	101	7534	0.9852	ug/L	97
9) Diethyl ether	5.91	59	26841	5.0094	ug/L	97
10) Isoprene	5.97	67	6845	0.9294	ug/L	95
11) Acrolein	6.16	56	2210	2.1604	ug/L	94
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	4111	0.9012	ug/L	94
13) Acetone	6.27	43	1624	1.0692	ug/L #	75
14) 1,1-Dichloroethene	6.46	61	8819	1.0108	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	4284	7.8814	ug/L #	69
16) Dimethyl Sulfide	6.73	62	6472	1.0443	ug/L	93
17) Iodomethane	6.97	142	560	1.7417	ug/L #	32
18) Methyl acetate	6.98	43	4118	0.9457	ug/L #	80
19) Methylene Chloride	7.23	84	6653	1.1291	ug/L	91
20) Carbon Disulfide	7.27	76	14386	1.0407	ug/L	95
21) Acrylonitrile	7.40	53	5167	2.2932	ug/L	99
22) Methyl Tert Butyl Ether	7.43	73	14174	0.9784	ug/L	96
23) trans-1,2-Dichloroethene	7.66	96	4992	0.9675	ug/L	98
24) n-Hexane	7.73	57	7379	0.9106	ug/L #	71
25) Diisopropyl ether	8.07	45	110574	5.5307	ug/L	94
26) Vinyl Acetate	8.23	43	8219	0.8038	ug/L #	80
27) 1,1-Dichloroethane	8.25	63	10552	0.9717	ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	97594	5.4149	ug/L	97
29) 2-Butanone	8.80	43	2458	0.9982	ug/L #	55
30) Propionitrile	8.89	54	3760	4.5090	ug/L #	58
31) 2,2-Dichloropropane	9.00	77	6861	0.9190	ug/L	99
32) cis-1,2-Dichloroethene	9.07	96	5874	0.9897	ug/L	87
33) Chloroform	9.25	83	10099	1.0349	ug/L	94
34) 1-Bromopropane	9.40	122	751	0.6811	ug/L	85
35) Bromochloromethane	9.48	130	3548	0.9857	ug/L	96
36) Tetrahydrofuran	9.51	42	9660	5.2882	ug/L	92
38) 1,1,1-Trichloroethane	9.77	97	7755	0.9858	ug/L #	93
39) Cyclohexane	9.79	56	10956	1.0173	ug/L	95
40) 1,1-Dichloropropene	9.95	75	6679	0.9507	ug/L	97
41) Carbon Tetrachloride	10.09	117	6098	0.8856	ug/L	87
42) Tert-Amyl-Methyl ether	10.05	73	77647	5.2660	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17511.D 8260WTR.M Thu Apr 20 14:51:12 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:43:49 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

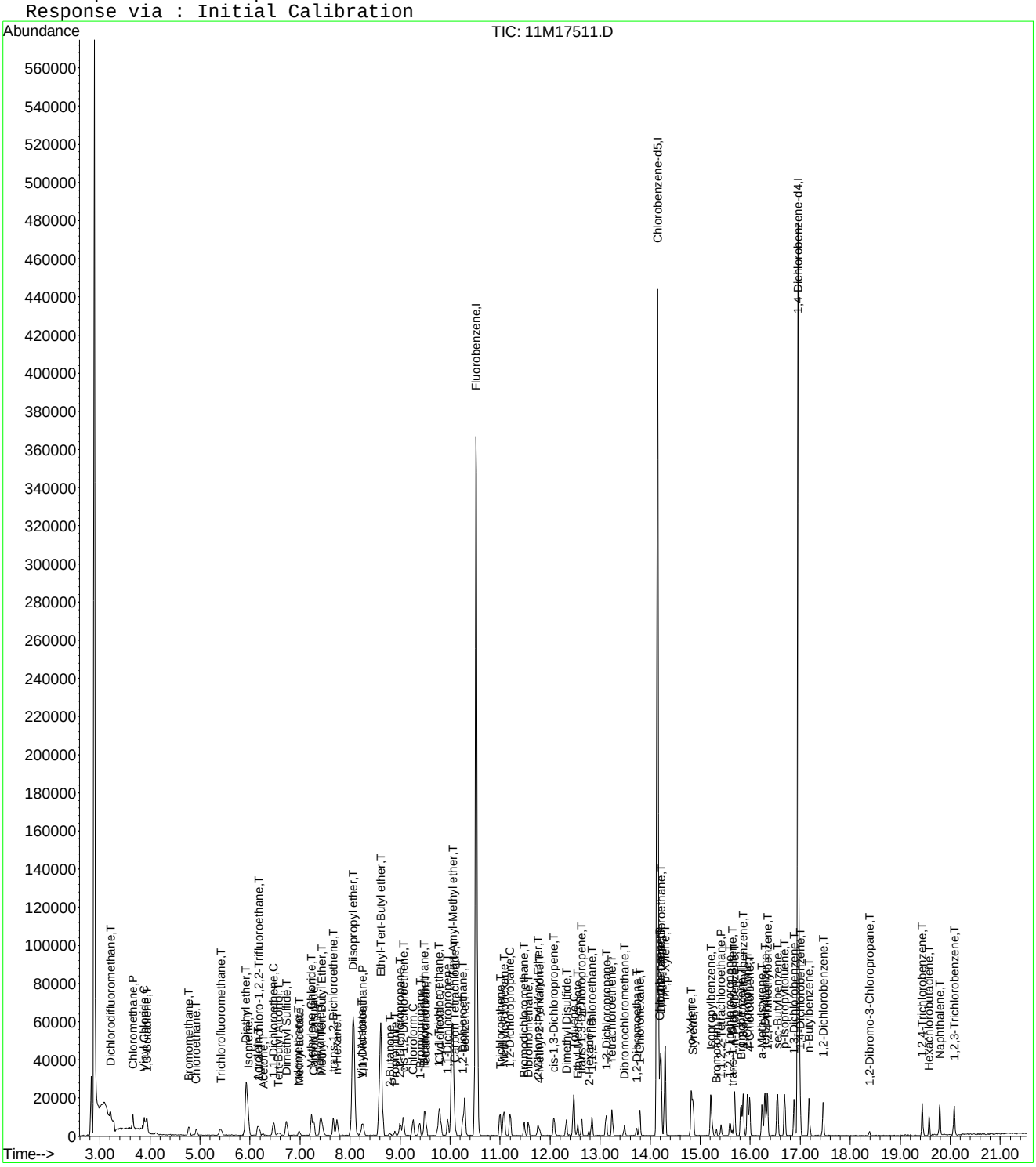
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	7901	1.0429	ug/L		91
45)	Benzene	10.29	78	23208	1.1028	ug/L		94
46)	Trichloroethene	11.00	130	5399	0.9689	ug/L		94
47)	Methylcyclohexane	11.07	83	8407	0.9791	ug/L		96
48)	1,2-Dichloropropane	11.20	63	6697	1.0337	ug/L		87
50)	Bromodichloromethane	11.48	83	6651	0.9793	ug/L	#	93
51)	Dibromomethane	11.57	93	2866	0.9381	ug/L		86
52)	2-Chloroethyl Vinyl Ether	11.76	63	2804	0.8097	ug/L		89
53)	4-Methyl-2-Pentanone	11.79	58	1642	0.7220	ug/L	#	40
54)	cis-1,3-Dichloropropene	12.08	75	7657	0.9691	ug/L		91
55)	Dimethyl Disulfide	12.33	79	2960	0.6380	ug/L		96
58)	Toluene	12.47	91	23395	1.0600	ug/L		93
59)	Ethyl Methacrylate	12.55	69	4428	0.7796	ug/L		94
60)	trans-1,3-Dichloropropene	12.62	75	6007	0.8812	ug/L		93
61)	1,1,2-Trichloroethane	12.83	97	4981	1.0728	ug/L		93
62)	2-Hexanone	12.78	43	2567	0.7276	ug/L	#	64
63)	1,3-Dichloropropane	13.12	76	7783	1.0130	ug/L		99
64)	Tetrachloroethene	13.23	164	5020	1.0677	ug/L		89
65)	Dibromochloromethane	13.48	129	4577	0.9094	ug/L		98
66)	1,2-Dibromoethane	13.73	107	4208	1.0295	ug/L		83
67)	1-Chlorohexane	13.79	91	5829	0.9646	ug/L		96
68)	Chlorobenzene	14.20	112	14548	1.0572	ug/L		95
69)	1,1,1,2-Tetrachloroethane	14.22	131	4719	0.9430	ug/L		98
70)	Ethylbenzene	14.22	106	7499	0.9808	ug/L		79
71)	m-,p-Xylene	14.30	106	17726	2.0496	ug/L		76
72)	o-Xylene	14.82	106	9119	1.0094	ug/L		92
73)	Styrene	14.86	104	12479	0.9355	ug/L		95
74)	Bromoform	15.32	173	2580	1.2291	ug/L		81
75)	Isopropylbenzene	15.22	105	22966	1.0288	ug/L		90
77)	1,1,2,2-Tetrachloroethane	15.42	83	5438	0.9821	ug/L		100
79)	1,2,3-Trichloropropane	15.59	110	1466	0.9101	ug/L		93
80)	trans-1,4-Dichloro-2-Buten	15.64	53	1011	0.9744	ug/L	#	13
81)	n-Propylbenzene	15.69	91	25537	1.0088	ug/L		97
82)	Bromobenzene	15.82	156	6637	1.0620	ug/L		79
83)	1,3,5-Trimethylbenzene	15.86	105	18203	0.9723	ug/L		92
84)	2-Chlorotoluene	15.94	91	18405	1.0423	ug/L		99
85)	4-Chlorotoluene	15.99	91	15255m	0.9875	ug/L		
86)	a-Methylstyrene	16.23	118	6623	0.6870	ug/L		96
87)	tert-Butylbenzene	16.30	134	4163	0.9830	ug/L		90
88)	1,2,4-Trimethylbenzene	16.35	105	18559	0.9658	ug/L		94
89)	sec-Butylbenzene	16.54	105	22971	0.9674	ug/L		94
90)	p-Isopropyltoluene	16.69	119	18560	0.9342	ug/L		91
91)	1,3-Dichlorobenzene	16.87	146	11768	1.0399	ug/L		87
92)	1,4-Dichlorobenzene	17.00	146	11409	0.9921	ug/L		81
93)	n-Butylbenzene	17.17	91	15556	0.9078	ug/L		99
94)	1,2-Dichlorobenzene	17.46	146	11628	1.0161	ug/L		90
95)	1,2-Dibromo-3-Chloropropan	18.38	75	905	0.9466	ug/L		88
96)	1,2,4-Trichlorobenzene	19.44	180	8338	1.0004	ug/L		90
97)	Hexachlorobutadiene	19.57	225	3570	0.8439	ug/L		97
98)	Naphthalene	19.79	128	17041	0.9414	ug/L	#	95
99)	1,2,3-Trichlorobenzene	20.08	180	8282	0.9890	ug/L		93

(#) = qualifier out of range (m) = manual integration
11M17511.D 8260WTR.M Thu Apr 20 14:51:13 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:44 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9077	9.2	100	0.01
3	P	Chloromethane	1.0000	1.2464	-24.6	100	0.00
4	C	Vinyl Chloride	1.0000	1.0133	-1.3	100	0.01
5	T	1,3-Butadiene	-1.0000	0.4070	0.0	100	0.01
6	T	Bromomethane	1.0000	1.1791	-17.9	100	0.01
7	T	Chloroethane	1.0000	0.9902	1.0	100	0.00
8	T	Trichlorofluoromethane	1.0000	0.9852	1.5	100	0.01
9	T	Diethyl ether	5.0000	5.0094	-0.2	100	0.00
10	T	Isoprene	1.0000	0.9294	7.1	100	0.01
11	T	Acrolein	2.5000	2.1604	13.6	100	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	0.9013	9.9	100	0.00
13	T	Acetone	-1.0000	1.0692	0.0	100	0.02
14	C	1,1-Dichloroethene	1.0000	1.0108	-1.1	100	0.00
15	T	Tert-Butyl Alcohol	10.0000	7.8814	21.2	100	0.00
16	T	Dimethyl Sulfide	1.0000	1.0443	-4.4	100	0.01
17	T	Iodomethane	-1.0000	1.7417	0.0	0	0.00
18	T	Methyl acetate	-1.0000	0.9457	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.1291	-12.9	100	0.00
20	T	Carbon Disulfide	1.0000	1.0407	-4.1	100	0.00
21	T	Acrylonitrile	2.5000	2.2932	8.3	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	0.9784	2.2	100	0.00
23	T	trans-1,2-Dichloroethene	1.0000	0.9675	3.2	100	0.00
24	T	n-Hexane	-1.0000	0.9106	0.0	0	0.00
25	T	Diisopropyl ether	5.0000	5.5307	-10.6	100	0.00
26	T	Vinyl Acetate	-1.0000	0.8038	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9717	2.8	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	5.4149	-8.3	100	0.00
29	T	2-Butanone	-1.0000	0.9982	0.0	0	0.01
30	T	Propionitrile	5.0000	4.5089	9.8	100	0.00
31	T	2,2-Dichloropropane	1.0000	0.9190	8.1	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9897	1.0	100	0.01
33	C	Chloroform	1.0000	1.0349	-3.5	100	0.00
34	T	1-Bromopropane	1.0000	0.6811	31.9#	0	0.01
35	T	Bromochloromethane	1.0000	0.9857	1.4	100	0.00
36	T	Tetrahydrofuran	5.0000	5.2882	-5.8	100	0.01
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	1.0000	0.9859	1.4	100	0.01
39	T	Cyclohexane	1.0000	1.0173	-1.7	100	0.00
40	T	1,1-Dichloropropene	1.0000	0.9507	4.9	100	0.00
41	T	Carbon Tetrachloride	1.0000	0.8856	11.4	100	0.00
42	T	Tert-Amyl-Methyl ether	5.0000	5.2660	-5.3	100	0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	1.0000	1.0430	-4.3	100	0.01
45	T	Benzene	1.0000	1.1028	-10.3	100	0.00
46	T	Trichloroethene	1.0000	0.9689	3.1	100	0.00
47	T	Methylcyclohexane	1.0000	0.9790	2.1	100	0.00
48	C	1,2-Dichloropropane	1.0000	1.0337	-3.4	100	0.00
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	1.0000	0.9793	2.1	100	0.00
51	T	Dibromomethane	1.0000	0.9381	6.2	100	0.01
52	T	2-Chloroethyl Vinyl Ether	1.0000	0.8097	19.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.7220	0.0	0	0.01
54	T	cis-1,3-Dichloropropene	1.0000	0.9691	3.1	100	0.00

(#) = Out of Range
11M17511.D 8260WTR.M Wed Apr 19 15:52:52 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

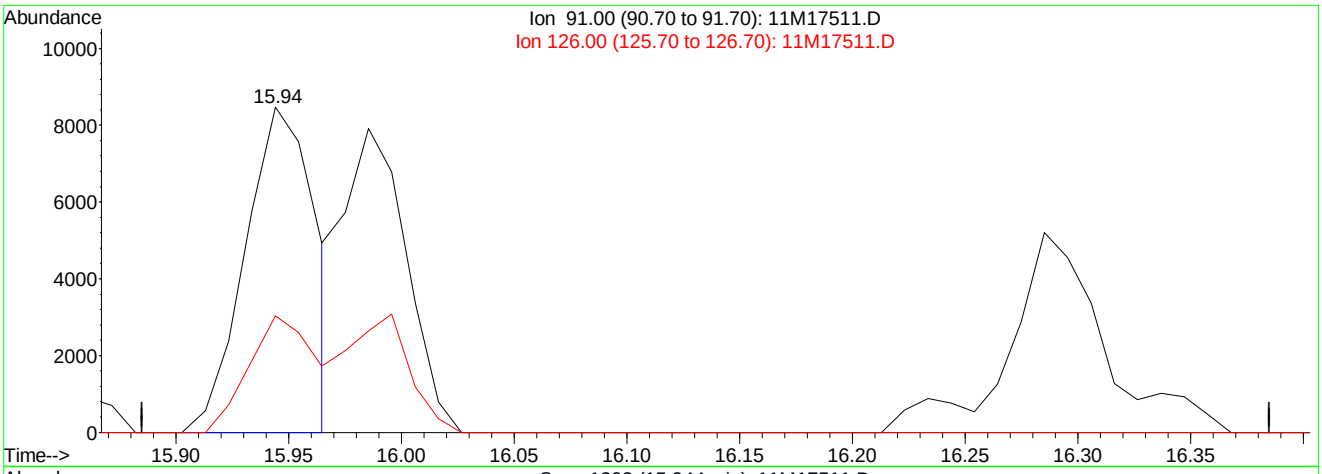
		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	-1.0000	0.6380	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0324	0.0	100	0.00
58	C	Toluene	1.0000	1.0600	-6.0	100	0.00
59	T	Ethyl Methacrylate	1.0000	0.7796	22.0	100	0.00
60	T	trans-1,3-Dichloropropene	1.0000	0.8812	11.9	100	0.00
61	T	1,1,2-Trichloroethane	1.0000	1.0728	-7.3	100	0.00
62	T	2-Hexanone	-1.0000	0.7276	0.0	100	0.01
63	T	1,3-Dichloropropane	1.0000	1.0131	-1.3	100	0.00
64	T	Tetrachloroethene	1.0000	1.0677	-6.8	100	0.00
65	T	Dibromochloromethane	1.0000	0.9094	9.1	100	0.00
66	T	1,2-Dibromoethane	1.0000	1.0295	-3.0	100	0.00
67	T	1-Chlorohexane	1.0000	0.9646	3.5	100	0.00
68	P	Chlorobenzene	1.0000	1.0572	-5.7	100	0.00
69	T	1,1,1,2-Tetrachloroethane	1.0000	0.9430	5.7	100	0.00
70	C	Ethylbenzene	1.0000	0.9808	1.9	100	0.00
71	T	m-,p-Xylene	2.0000	2.0496	-2.5	100	0.00
72	T	o-Xylene	1.0000	1.0094	-0.9	100	0.00
73	T	Styrene	1.0000	0.9355	6.5	100	0.00
74	P	Bromoform	1.0000	1.2291	-22.9	100	0.00
75	T	Isopropylbenzene	1.0000	1.0288	-2.9	100	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
77	P	1,1,2,2-Tetrachloroethane	1.0000	0.9821	1.8	100	0.00
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#
79	T	1,2,3-Trichloropropane	1.0000	0.9101	9.0	100	0.00
80	T	trans-1,4-Dichloro-2-Butene	1.0000	0.9745	2.6	100	0.01
81	T	n-Propylbenzene	1.0000	1.0088	-0.9	100	0.00
82	T	Bromobenzene	1.0000	1.0620	-6.2	100	0.00
83	T	1,3,5-Trimethylbenzene	1.0000	0.9723	2.8	100	0.00
84	T	2-Chlorotoluene	1.0000	1.0423	-4.2	100	0.00
85	T	4-Chlorotoluene	1.0000	0.9875	1.3	100	0.00
86	T	a-Methylstyrene	-1.0000	0.6870	0.0	100	0.00
87	T	tert-Butylbenzene	1.0000	0.9830	1.7	100	0.00
88	T	1,2,4-Trimethylbenzene	1.0000	0.9658	3.4	100	0.01
89	T	sec-Butylbenzene	1.0000	0.9674	3.3	100	0.00
90	T	p-Isopropyltoluene	1.0000	0.9342	6.6	100	0.00
91	T	1,3-Dichlorobenzene	1.0000	1.0398	-4.0	100	0.00
92	T	1,4-Dichlorobenzene	1.0000	0.9921	0.8	100	0.00
93	T	n-Butylbenzene	1.0000	0.9078	9.2	100	0.00
94	T	1,2-Dichlorobenzene	1.0000	1.0161	-1.6	100	0.00
95	T	1,2-Dibromo-3-Chloropropane	1.0000	0.9466	5.3	100	0.00
96	T	1,2,4-Trichlorobenzene	1.0000	1.0004	-0.0	100	0.00
97	T	Hexachlorobutadiene	1.0000	0.8439	15.6	100	0.00
98	T	Naphthalene	1.0000	0.9414	5.9	100	0.00
99	T	1,2,3-Trichlorobenzene	1.0000	0.9890	1.1	100	0.00

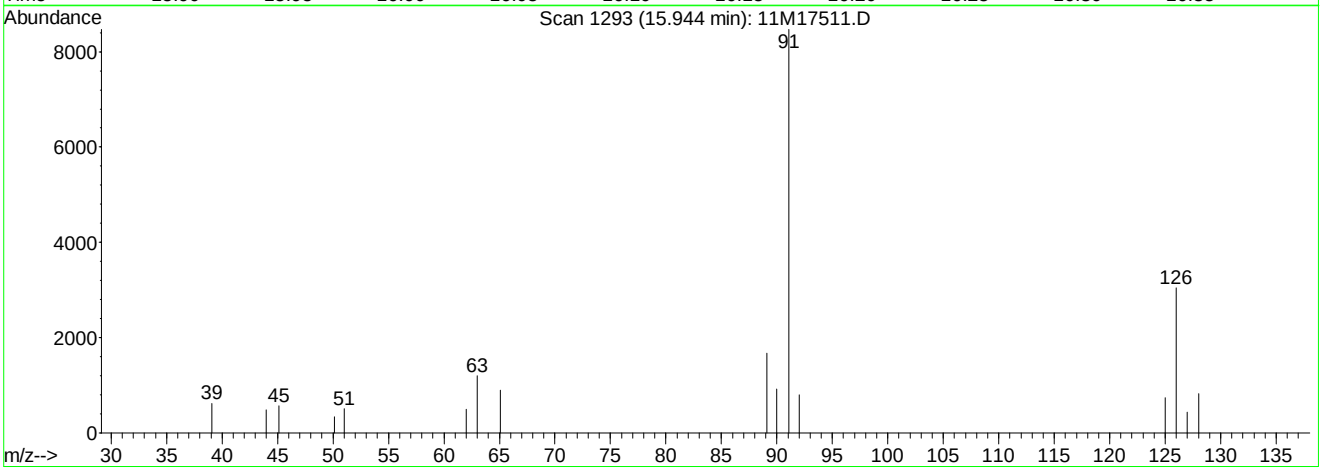
(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:43 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17511.D

(85) 4-Chlorotoluene (T)

15.94min 1.19ug/L

response 18405

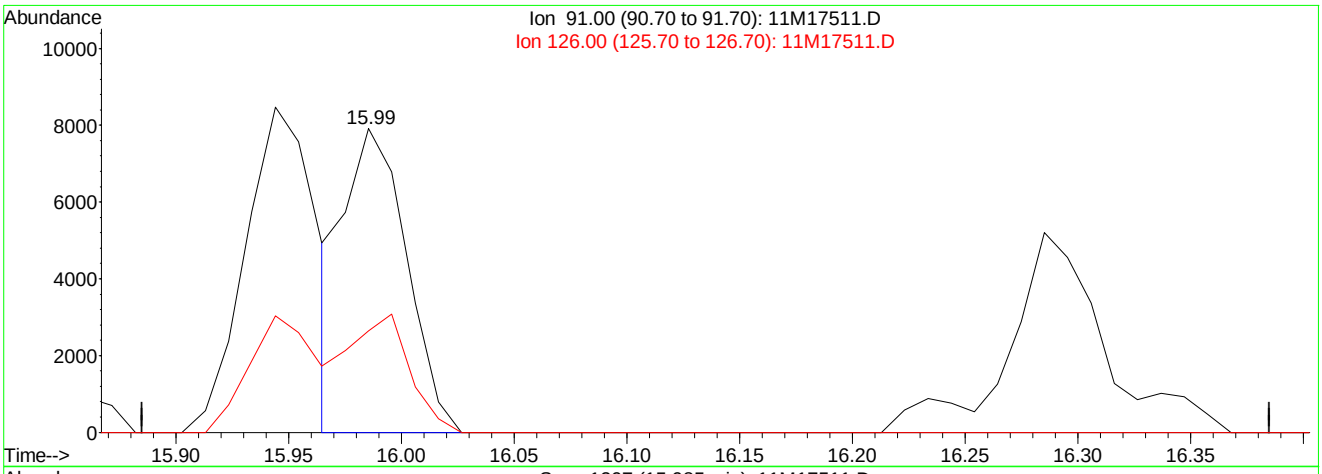
Ion	Exp%	Act%
91.00	100	100
126.00	36.10	33.50
0.00	0.00	0.00
0.00	0.00	0.00

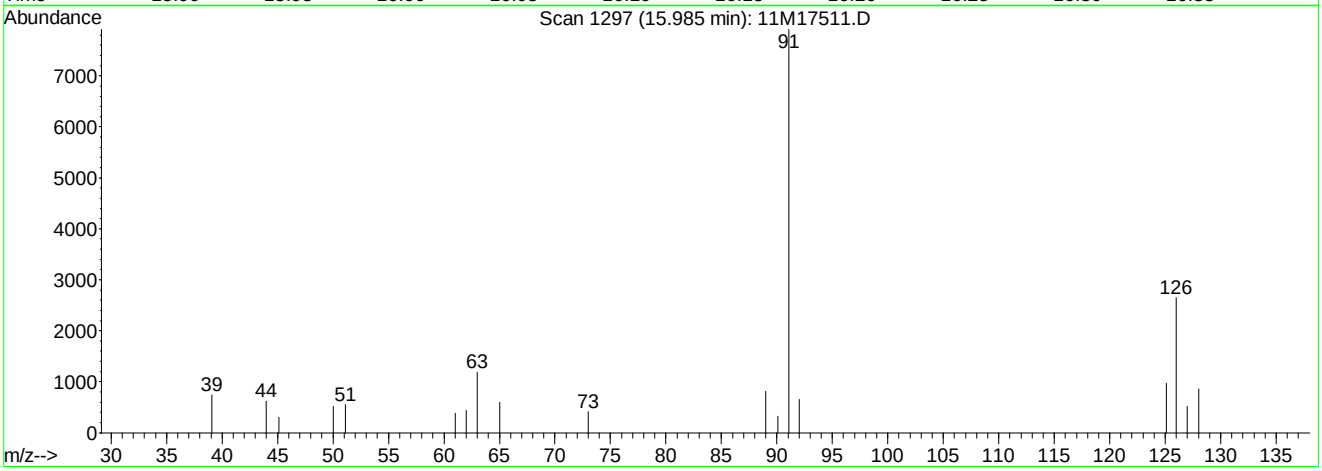
11M17511.D 8260WTR.M Wed Apr 19 15:44:06 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17511.D Vial: 4
Acq On : 14 Apr 2017 14:43 Operator: FJB
Sample : WG610045-04 1ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:44 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17511.D

(85) 4-Chlorotoluene (T)

15.99min 0.99ug/L mint

response 15255

Ion	Exp%	Act%
91.00	100	100
126.00	36.10	40.42
0.00	0.00	0.00
0.00	0.00	0.00

11M17511.D 8260WTR.M Wed Apr 19 2017

Analyst: 04/21/2017 11:42 Tiffany Bailey Supervisor: 04/24/2017 14:10

#3 - Improperly integrated isomers and/or coeluting compounds

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:44:42 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.52	96	449786	25.00	ug/L		0.00
56) Chlorobenzene-d5	14.14	117	308033	25.00	ug/L		0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	156985	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#			
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L		
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#			
57) Toluene-d8	12.38	98	665	0.0397	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.16%#			
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.20	85	11179	1.8046	ug/L		96
3) Chloromethane	3.65	50	16319	2.1903	ug/L		91
4) Vinyl Chloride	3.88	62	11710	2.0621	ug/L		96
5) 1,3-Butadiene	3.93	54	8340	1.9004	ug/L		98
6) Bromomethane	4.77	94	9001	2.1234	ug/L		91
7) Chloroethane	4.92	64	8373	1.8782	ug/L		95
8) Trichlorofluoromethane	5.41	101	14676	1.8991	ug/L		96
9) Diethyl ether	5.91	59	139816	25.8207	ug/L		99
10) Isoprene	5.95	67	13926	1.8710	ug/L		99
11) Acrolein	6.14	56	12196	11.7973	ug/L		95
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	9059	1.9652	ug/L		94
13) Acetone	6.25	43	3433	2.2365	ug/L		81
14) 1,1-Dichloroethene	6.46	61	16912	1.9181	ug/L		96
15) Tert-Butyl Alcohol	6.57	59	26671	48.5534	ug/L		96
16) Dimethyl Sulfide	6.72	62	12213	1.9501	ug/L		98
17) Iodomethane	6.97	142	3469	2.2344	ug/L		86
18) Methyl acetate	6.98	43	9061	2.0590	ug/L	#	84
19) Methylene Chloride	7.23	84	11796	1.9809	ug/L		97
20) Carbon Disulfide	7.27	76	28406	2.0334	ug/L		99
21) Acrylonitrile	7.39	53	26726	11.7371	ug/L		90
22) Methyl Tert Butyl Ether	7.42	73	29507	2.0155	ug/L		97
23) trans-1,2-Dichloroethene	7.65	96	10017	1.9211	ug/L		99
24) n-Hexane	7.73	57	14364	1.7541	ug/L	#	87
25) Diisopropyl ether	8.05	45	565626	27.9950	ug/L		94
26) Vinyl Acetate	8.23	43	18347	1.7754	ug/L		93
27) 1,1-Dichloroethane	8.25	63	22914	2.0879	ug/L		96
28) Ethyl-Tert-Butyl ether	8.60	59	497626	27.3208	ug/L		98
29) 2-Butanone	8.79	43	4511	1.8127	ug/L	#	76
30) Propionitrile	8.89	54	20052	23.7942	ug/L		92
31) 2,2-Dichloropropane	9.01	77	14405	1.9093	ug/L		97
32) cis-1,2-Dichloroethene	9.06	96	12029	2.0054	ug/L		95
33) Chloroform	9.25	83	19374	1.9646	ug/L		97
34) 1-Bromopropane	9.39	122	1944	1.7445	ug/L		93
35) Bromochloromethane	9.48	130	7323	2.0132	ug/L		92
36) Tetrahydrofuran	9.50	42	44614	24.1673	ug/L		99
38) 1,1,1-Trichloroethane	9.76	97	15959	2.0075	ug/L		95
39) Cyclohexane	9.79	56	22079	2.0286	ug/L		99
40) 1,1-Dichloropropene	9.95	75	14644	2.0627	ug/L		96
41) Carbon Tetrachloride	10.09	117	13302	1.9115	ug/L		97
42) Tert-Amyl-Methyl ether	10.04	73	403921	27.1067	ug/L		99

(#) = qualifier out of range (m) = manual integration
11M17512.D 8260WTR.M Thu Apr 20 14:51:14 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:44:42 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

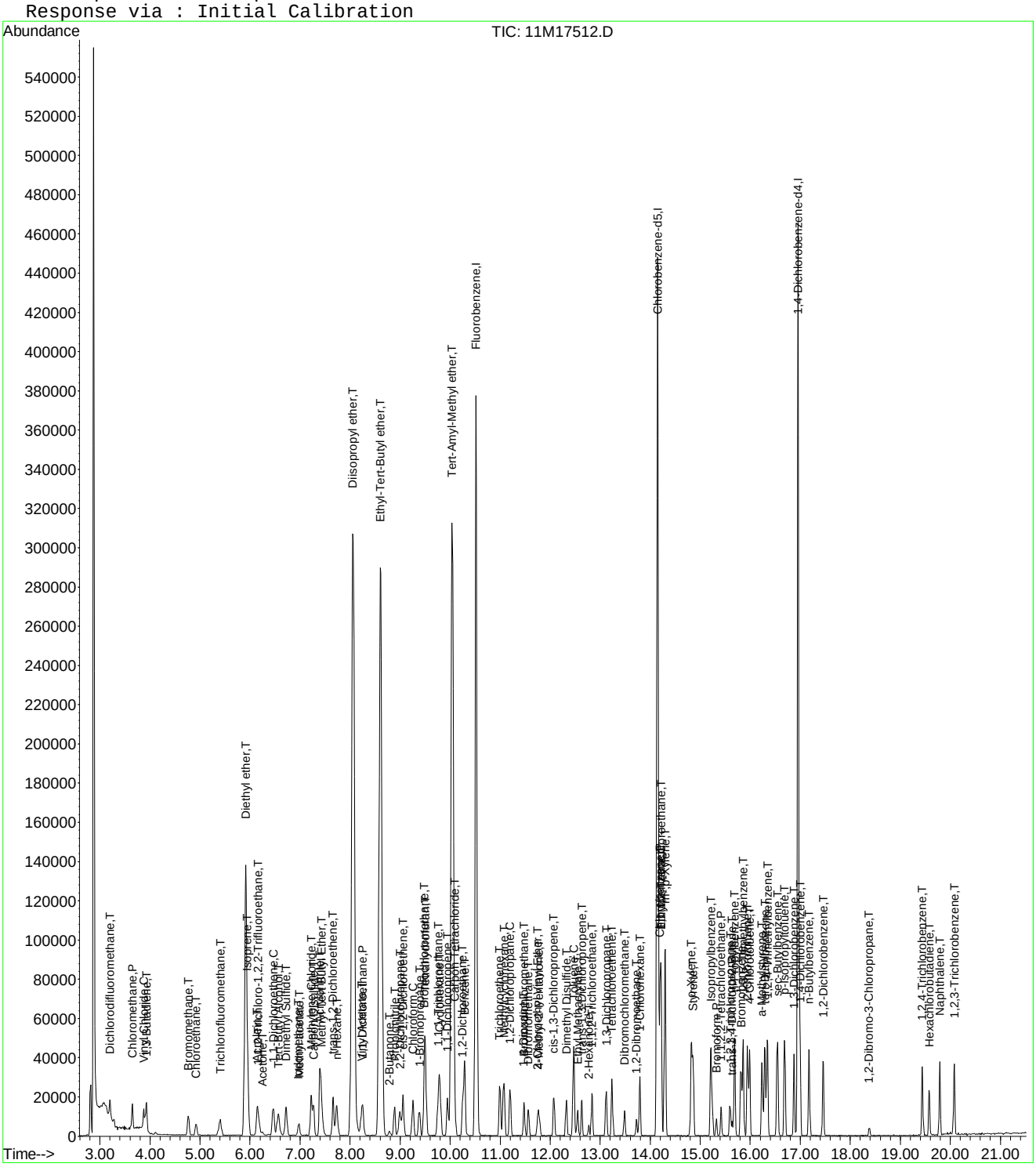
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.25	62	15992	2.0889 ug/L		95
45)	Benzene	10.29	78	44543	2.0944 ug/L		96
46)	Trichloroethene	10.99	130	11102	1.9716 ug/L		95
47)	Methylcyclohexane	11.07	83	16778	1.9334 ug/L		97
48)	1,2-Dichloropropane	11.20	63	12608	1.9257 ug/L		97
49)	1,4-Dioxane	11.47	88	2267	37.8044 ug/L		83
50)	Bromodichloromethane	11.48	83	12593	1.8347 ug/L		96
51)	Dibromomethane	11.56	93	6123	1.9833 ug/L		93
52)	2-Chloroethyl Vinyl Ether	11.75	63	6281	1.7947 ug/L		100
53)	4-Methyl-2-Pentanone	11.78	58	3806	1.6559 ug/L		94
54)	cis-1,3-Dichloropropene	12.07	75	14797	1.8531 ug/L		99
55)	Dimethyl Disulfide	12.32	79	5797	1.2363 ug/L		78
58)	Toluene	12.47	91	45431	2.0701 ug/L		95
59)	Ethyl Methacrylate	12.55	69	9677	1.7133 ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	12735	1.8787 ug/L		100
61)	1,1,2-Trichloroethane	12.83	97	8916	1.9311 ug/L		98
62)	2-Hexanone	12.77	43	5143	1.4660 ug/L	#	67
63)	1,3-Dichloropropane	13.12	76	16186	2.1187 ug/L		93
64)	Tetrachloroethene	13.23	164	8702	1.8612 ug/L		95
65)	Dibromochloromethane	13.48	129	9323	1.8629 ug/L		99
66)	1,2-Dibromoethane	13.72	107	8638	2.1253 ug/L		91
67)	1-Chlorohexane	13.79	91	12175	2.0262 ug/L		95
68)	Chlorobenzene	14.20	112	29477	2.1541 ug/L		98
69)	1,1,1,2-Tetrachloroethane	14.22	131	9506	1.9104 ug/L		97
70)	Ethylbenzene	14.22	106	15508	2.0397 ug/L		82
71)	m-,p-Xylene	14.30	106	38358	4.4602 ug/L		86
72)	o-Xylene	14.82	106	18249	2.0315 ug/L		95
73)	Styrene	14.86	104	26483	1.9964 ug/L		92
74)	Bromoform	15.32	173	5309	1.9204 ug/L		97
75)	Isopropylbenzene	15.22	105	44697	2.0135 ug/L		98
77)	1,1,2,2-Tetrachloroethane	15.42	83	11015	2.0295 ug/L		96
79)	1,2,3-Trichloropropane	15.60	110	3018	1.9113 ug/L		87
80)	trans-1,4-Dichloro-2-Buten	15.63	53	2356	1.8792 ug/L		50
81)	n-Propylbenzene	15.69	91	53750	2.1660 ug/L		93
82)	Bromobenzene	15.82	156	12573	2.0524 ug/L		91
83)	1,3,5-Trimethylbenzene	15.86	105	37959	2.0684 ug/L		95
84)	2-Chlorotoluene	15.94	91	37342	2.1573 ug/L		94
85)	4-Chlorotoluene	15.99	91	29906m	1.9749 ug/L		
86)	a-Methylstyrene	16.23	118	16325	1.7275 ug/L		92
87)	tert-Butylbenzene	16.30	134	8333	2.0073 ug/L		93
88)	1,2,4-Trimethylbenzene	16.35	105	38334	2.0351 ug/L		100
89)	sec-Butylbenzene	16.54	105	49259	2.1164 ug/L		94
90)	p-Isopropyltoluene	16.69	119	39274	2.0166 ug/L		96
91)	1,3-Dichlorobenzene	16.87	146	22885	2.0629 ug/L		89
92)	1,4-Dichlorobenzene	17.00	146	25042	2.2215 ug/L		99
93)	n-Butylbenzene	17.17	91	34138	2.0323 ug/L		96
94)	1,2-Dichlorobenzene	17.46	146	22893	2.0408 ug/L		95
95)	1,2-Dibromo-3-Chloropropan	18.37	75	1725	1.8407 ug/L		95
96)	1,2,4-Trichlorobenzene	19.44	180	16567	2.0277 ug/L		90
97)	Hexachlorobutadiene	19.58	225	7739	1.8664 ug/L		95
98)	Naphthalene	19.79	128	36532	2.0589 ug/L	#	95
99)	1,2,3-Trichlorobenzene	20.08	180	17477	2.1291 ug/L		89

(#) = qualifier out of range (m) = manual integration
11M17512.D 8260WTR.M Thu Apr 20 14:51:14 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:45 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.8046	9.8	100	-0.01
3	P	Chloromethane	2.0000	2.1903	-9.5	100	-0.01
4	C	Vinyl Chloride	2.0000	2.0621	-3.1	100	0.00
5	T	1,3-Butadiene	2.0000	1.9004	5.0	100	0.00
6	T	Bromomethane	2.0000	2.1234	-6.2	100	0.00
7	T	Chloroethane	2.0000	1.8782	6.1	100	0.00
8	T	Trichlorofluoromethane	2.0000	1.8991	5.0	100	0.00
9	T	Diethyl ether	25.0000	25.8207	-3.3	100	0.00
10	T	Isoprene	2.0000	1.8710	6.5	100	-0.01
11	T	Acrolein	12.5000	11.7973	5.6	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.9652	1.7	100	-0.01
13	T	Acetone	2.0000	2.2365	-11.8	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9181	4.1	100	-0.01
15	T	Tert-Butyl Alcohol	50.0000	48.5534	2.9	100	-0.01
16	T	Dimethyl Sulfide	2.0000	1.9501	2.5	100	0.00
17	T	Iodomethane	2.0000	2.2344	-11.7	100	0.00
18	T	Methyl acetate	2.0000	2.0590	-3.0	100	0.00
19	T	Methylene Chloride	2.0000	1.9809	1.0	100	0.00
20	T	Carbon Disulfide	2.0000	2.0335	-1.7	100	0.00
21	T	Acrylonitrile	12.5000	11.7371	6.1	100	-0.01
22	T	Methyl Tert Butyl Ether	2.0000	2.0155	-0.8	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9211	3.9	100	-0.01
24	T	n-Hexane	2.0000	1.7541	12.3	100	0.00
25	T	Diisopropyl ether	25.0000	27.9950	-12.0	100	-0.01
26	T	Vinyl Acetate	2.0000	1.7755	11.2	100	0.00
27	P	1,1-Dichloroethane	2.0000	2.0880	-4.4	100	-0.01
28	T	Ethyl-Tert-Butyl ether	25.0000	27.3208	-9.3	100	-0.01
29	T	2-Butanone	2.0000	1.8127	9.4	100	0.00
30	T	Propionitrile	25.0000	23.7942	4.8	100	0.00
31	T	2,2-Dichloropropane	2.0000	1.9093	4.5	100	0.01
32	T	cis-1,2-Dichloroethene	2.0000	2.0054	-0.3	100	0.00
33	C	Chloroform	2.0000	1.9646	1.8	100	0.00
34	T	1-Bromopropane	2.0000	1.7445	12.8	100	0.00
35	T	Bromochloromethane	2.0000	2.0132	-0.7	100	0.00
36	T	Tetrahydrofuran	25.0000	24.1673	3.3	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	2.0000	2.0075	-0.4	100	0.00
39	T	Cyclohexane	2.0000	2.0286	-1.4	100	0.00
40	T	1,1-Dichloropropene	2.0000	2.0627	-3.1	100	0.00
41	T	Carbon Tetrachloride	2.0000	1.9115	4.4	100	0.00
42	T	Tert-Amyl-Methyl ether	25.0000	27.1067	-8.4	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	2.0000	2.0889	-4.4	100	0.00
45	T	Benzene	2.0000	2.0944	-4.7	100	0.00
46	T	Trichloroethene	2.0000	1.9716	1.4	100	-0.01
47	T	Methylcyclohexane	2.0000	1.9334	3.3	100	0.00
48	C	1,2-Dichloropropane	2.0000	1.9257	3.7	100	0.00
49	T	1,4-Dioxane	-1.0000	37.8044	0.0	100	0.00
50	T	Bromodichloromethane	2.0000	1.8347	8.3	100	0.00
51	T	Dibromomethane	2.0000	1.9833	0.8	100	0.00
52	T	2-Chloroethyl Vinyl Ether	2.0000	1.7947	10.3	100	-0.01
53	T	4-Methyl-2-Pentanone	-1.0000	1.6559	0.0	100	0.00
54	T	cis-1,3-Dichloropropene	2.0000	1.8531	7.3	100	-0.01

(#) = Out of Range
11M17512.D 8260WTR.M Wed Apr 19 15:53:01 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

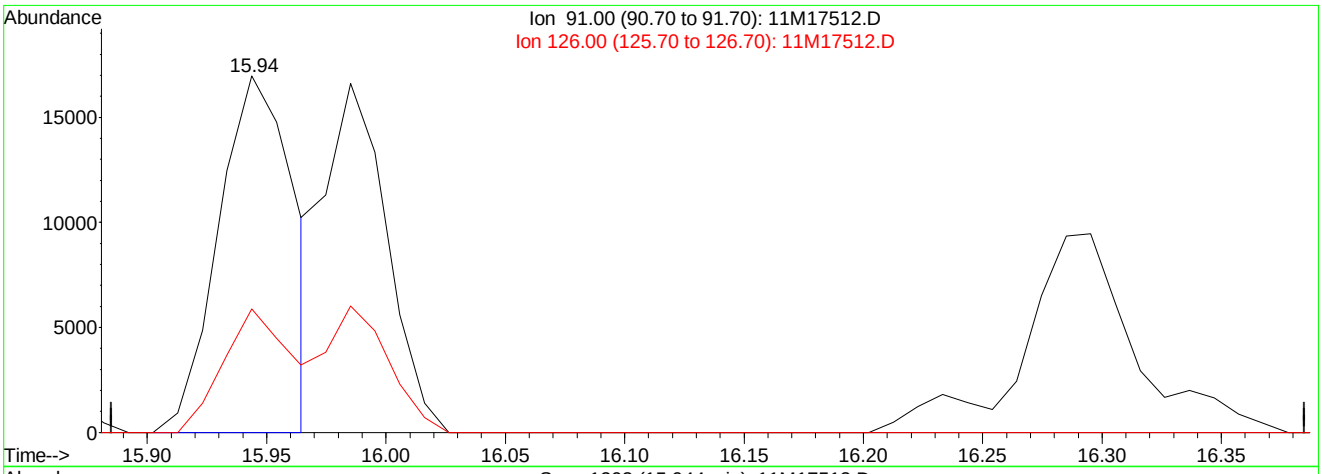
		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	-1.0000	1.2363	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0397	0.0	100	0.00
58	C	Toluene	2.0000	2.0701	-3.5	100	0.00
59	T	Ethyl Methacrylate	2.0000	1.7133	14.3	100	0.00
60	T	trans-1,3-Dichloropropene	2.0000	1.8787	6.1	100	0.00
61	T	1,1,2-Trichloroethane	2.0000	1.9311	3.4	100	0.00
62	T	2-Hexanone	-1.0000	1.4660	0.0	100	0.00
63	T	1,3-Dichloropropane	2.0000	2.1187	-5.9	100	0.00
64	T	Tetrachloroethene	2.0000	1.8612	6.9	100	0.00
65	T	Dibromochloromethane	2.0000	1.8629	6.9	100	0.00
66	T	1,2-Dibromoethane	2.0000	2.1253	-6.3	100	-0.01
67	T	1-Chlorohexane	2.0000	2.0262	-1.3	100	0.00
68	P	Chlorobenzene	2.0000	2.1541	-7.7	100	0.00
69	T	1,1,1,2-Tetrachloroethane	2.0000	1.9104	4.5	100	0.00
70	C	Ethylbenzene	2.0000	2.0397	-2.0	100	0.00
71	T	m-,p-Xylene	4.0000	4.4602	-11.5	100	0.00
72	T	o-Xylene	2.0000	2.0315	-1.6	100	-0.01
73	T	Styrene	2.0000	1.9964	0.2	100	0.00
74	P	Bromoform	2.0000	1.9204	4.0	100	0.00
75	T	Isopropylbenzene	2.0000	2.0135	-0.7	100	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
77	P	1,1,2,2-Tetrachloroethane	2.0000	2.0295	-1.5	100	0.00
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#
79	T	1,2,3-Trichloropropane	2.0000	1.9113	4.4	100	0.00
80	T	trans-1,4-Dichloro-2-Butene	2.0000	1.8792	6.0	100	0.00
81	T	n-Propylbenzene	2.0000	2.1660	-8.3	100	0.00
82	T	Bromobenzene	2.0000	2.0524	-2.6	100	0.00
83	T	1,3,5-Trimethylbenzene	2.0000	2.0684	-3.4	100	0.00
84	T	2-Chlorotoluene	2.0000	2.1573	-7.9	100	0.00
85	T	4-Chlorotoluene	2.0000	1.9749	1.3	100	0.00
86	T	a-Methylstyrene	-1.0000	1.7275	0.0	100	0.00
87	T	tert-Butylbenzene	2.0000	2.0073	-0.4	100	0.00
88	T	1,2,4-Trimethylbenzene	2.0000	2.0351	-1.8	100	0.01
89	T	sec-Butylbenzene	2.0000	2.1164	-5.8	100	0.00
90	T	p-Isopropyltoluene	2.0000	2.0166	-0.8	100	0.00
91	T	1,3-Dichlorobenzene	2.0000	2.0629	-3.1	100	0.00
92	T	1,4-Dichlorobenzene	2.0000	2.2214	-11.1	100	0.00
93	T	n-Butylbenzene	2.0000	2.0323	-1.6	100	0.00
94	T	1,2-Dichlorobenzene	2.0000	2.0408	-2.0	100	0.00
95	T	1,2-Dibromo-3-Chloropropane	2.0000	1.8407	8.0	100	-0.01
96	T	1,2,4-Trichlorobenzene	2.0000	2.0277	-1.4	100	0.00
97	T	Hexachlorobutadiene	2.0000	1.8664	6.7	100	0.00
98	T	Naphthalene	2.0000	2.0589	-2.9	100	0.00
99	T	1,2,3-Trichlorobenzene	2.0000	2.1291	-6.5	100	0.00

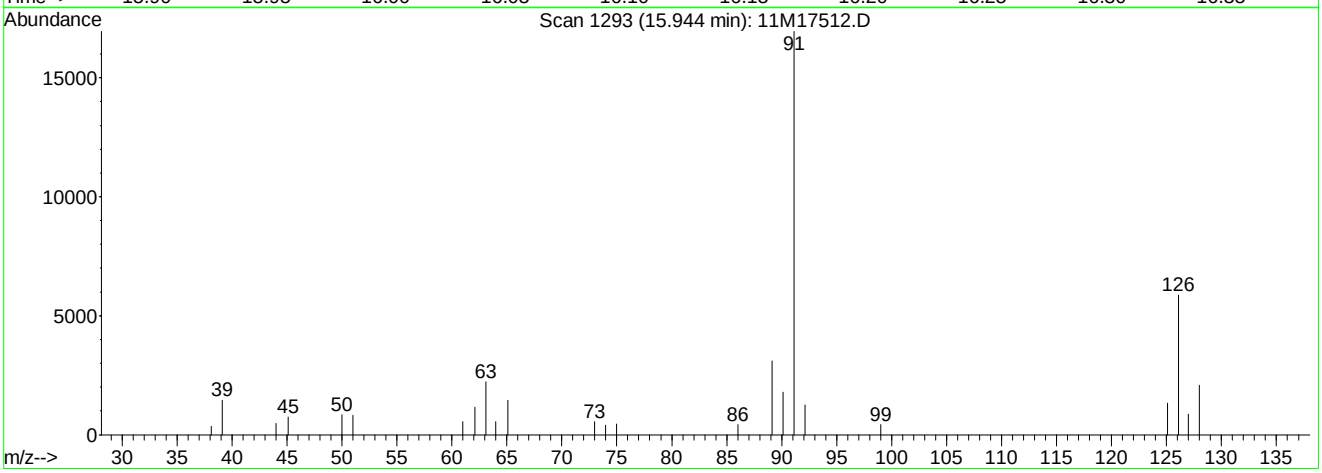
(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17512.D 8260WTR.M Wed Apr 19 15:53:02 2017 Page 2

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:44 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17512.D

(85) 4-Chlorotoluene (T)

15.94min 2.47ug/L

response 37342

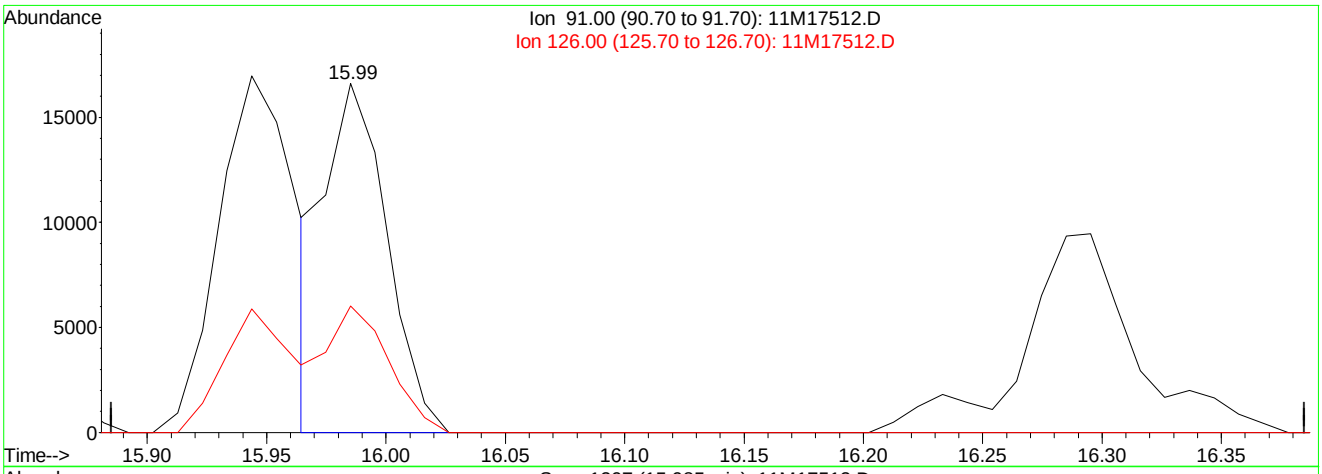
Ion	Exp%	Act%
91.00	100	100
126.00	36.10	30.90
0.00	0.00	0.00
0.00	0.00	0.00

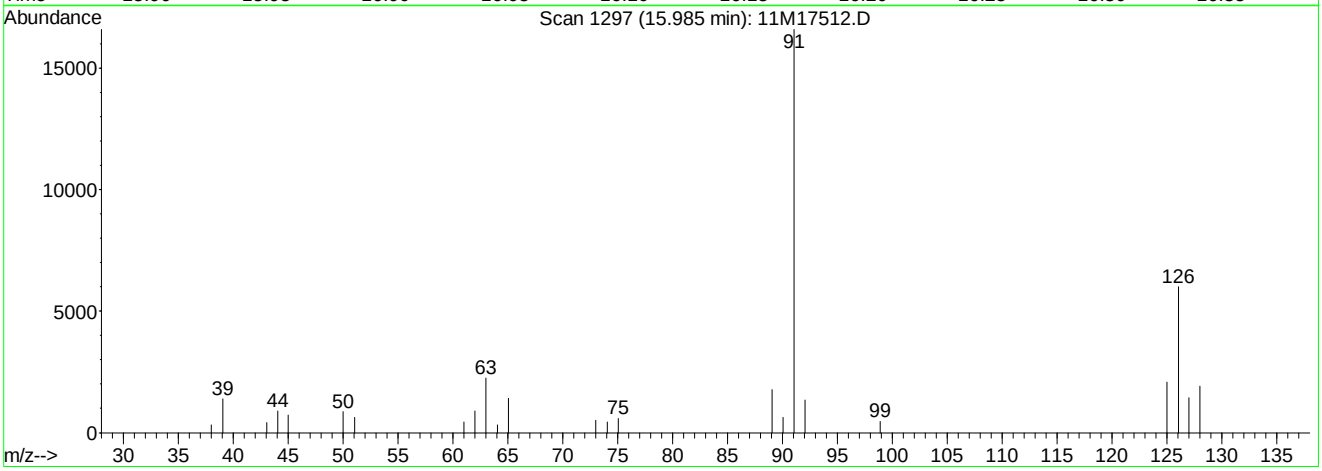
11M17512.D 8260WTR.M Wed Apr 19 15:45:08 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17512.D Vial: 5
Acq On : 14 Apr 2017 15:12 Operator: FJB
Sample : WG610045-05 2ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:45 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17512.D

(85) 4-Chlorotoluene (T)

15.99min 1.97ug/L mint

response 29906

Ion	Exp%	Act%
91.00	100	100
126.00	36.10	38.58
0.00	0.00	0.00
0.00	0.00	0.00

11M17512.D 8260WTR.M Wed Apr 19 2017

Analyst: 04/21/2017 11:42 Tiffany Bailey
Supervisor: 04/24/2017 14:10
#3 - Improperly integrated isomers and/or coeluting compounds

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17513.D Vial: 6
Acq On : 14 Apr 2017 15:42 Operator: FJB
Sample : WG610045-06 5ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:46:43 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	455638	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	314774	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	164516	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	25601	5.4151	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 21.68%#			
43) 1,2-Dichloroethane-d4	10.14	65	29248	5.4616	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.84%#			
57) Toluene-d8	12.38	98	97960	5.7166	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 22.88%#			
78) p-Bromofluorobenzene	15.54	95	31856	5.2100	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 20.84%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	28014	4.4642	ug/L	94
3) Chloromethane	3.66	50	35572	4.7130	ug/L	98
4) Vinyl Chloride	3.89	62	29540	5.1352	ug/L	96
5) 1,3-Butadiene	3.93	54	14209	4.0955	ug/L	93
6) Bromomethane	4.78	94	21461	4.9977	ug/L	100
7) Chloroethane	4.93	64	22167	4.9086	ug/L	99
8) Trichlorofluoromethane	5.41	101	37311	4.7660	ug/L	95
9) Diethyl ether	5.92	59	279718	50.9938	ug/L	100
10) Isoprene	5.97	67	37772	5.0095	ug/L	95
11) Acrolein	6.15	56	25801	24.6370	ug/L	94
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	22003	4.7118	ug/L	91
13) Acetone	6.25	43	8099	5.2085	ug/L	100
14) 1,1-Dichloroethene	6.47	61	43807	4.9046	ug/L	96
15) Tert-Butyl Alcohol	6.57	59	55148	99.1052	ug/L	95
16) Dimethyl Sulfide	6.73	62	30895	4.8697	ug/L	100
17) Iodomethane	6.97	142	15361	4.2191	ug/L	92
18) Methyl acetate	6.98	43	22507	5.0489	ug/L	95
19) Methylene Chloride	7.23	84	28731	4.7628	ug/L	99
20) Carbon Disulfide	7.27	76	69866	4.9371	ug/L	99
21) Acrylonitrile	7.40	53	55814	24.1967	ug/L	93
22) Methyl Tert Butyl Ether	7.43	73	73842	4.9791	ug/L	98
23) trans-1,2-Dichloroethene	7.66	96	26068	4.9352	ug/L	93
24) n-Hexane	7.73	57	37088	4.4708	ug/L	98
25) Diisopropyl ether	8.07	45	1096574	53.5766	ug/L	95
26) Vinyl Acetate	8.22	43	51309	4.9014	ug/L	98
27) 1,1-Dichloroethane	8.26	63	56273	5.0618	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	977602	52.9832	ug/L	99
29) 2-Butanone	8.79	43	11766	4.6674	ug/L	99
30) Propionitrile	8.89	54	40836	47.8347	ug/L	97
31) 2,2-Dichloropropane	9.00	77	37128	4.8580	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	30196	4.9695	ug/L	97
33) Chloroform	9.25	83	46899	4.6947	ug/L	98
34) 1-Bromopropane	9.39	122	4679	4.1449	ug/L	89
35) Bromochloromethane	9.48	130	18195	4.9377	ug/L	96
36) Tetrahydrofuran	9.50	42	90399	48.3401	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	39856	4.9492	ug/L	98
39) Cyclohexane	9.79	56	55577	5.0408	ug/L	100
40) 1,1-Dichloropropene	9.95	75	35022	4.8697	ug/L	99
41) Carbon Tetrachloride	10.09	117	33122	4.6985	ug/L	94
42) Tert-Amyl-Methyl ether	10.04	73	794642	52.6427	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17513.D 8260WTR.M Thu Apr 20 14:51:15 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041417\11M17513.D Vial: 6
Acq On : 14 Apr 2017 15:42 Operator: FJB
Sample : WG610045-06 5ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:46:43 2017 Quant Results File: 8260WTR.RES

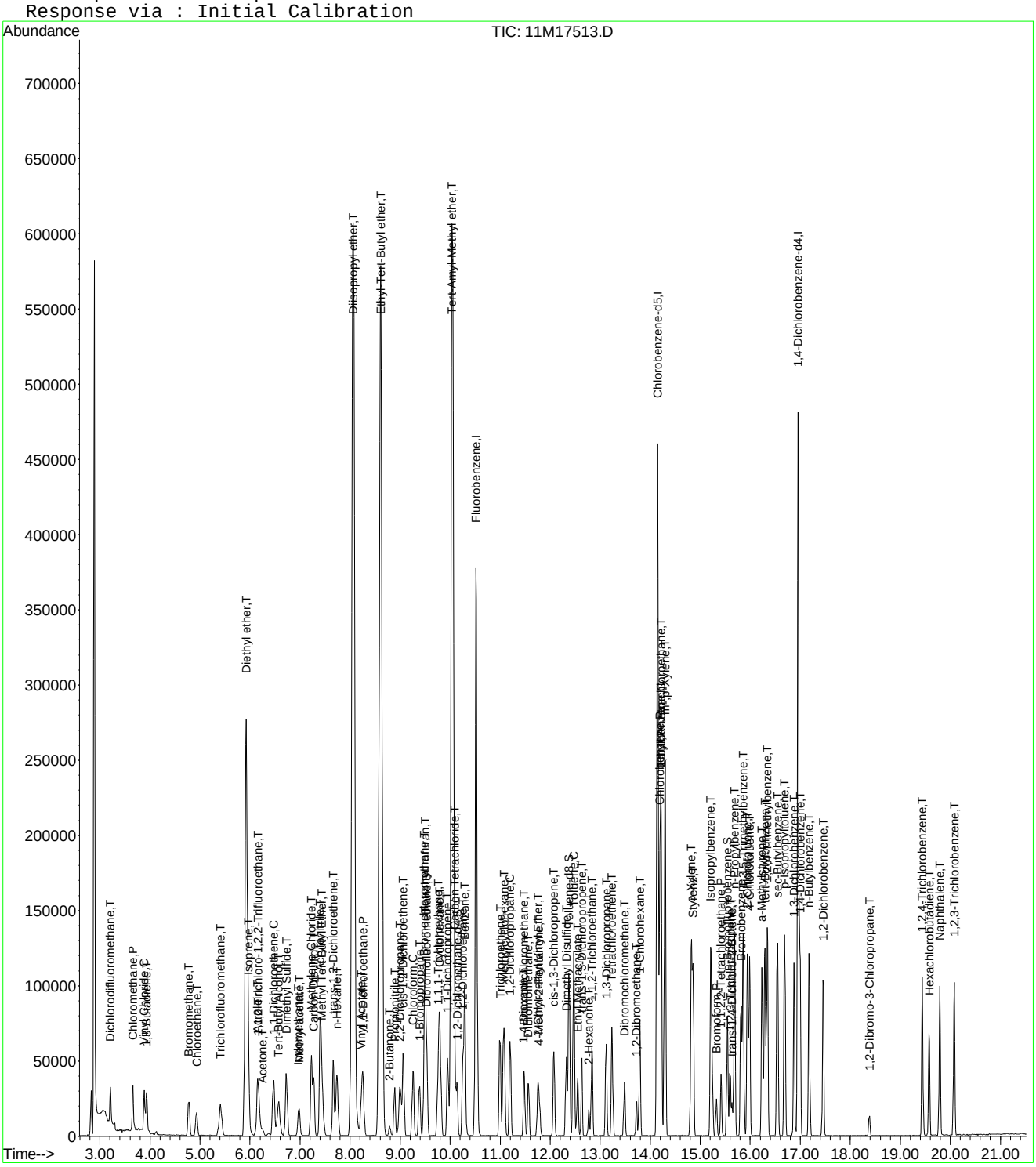
Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	39267	5.0631	ug/L		98
45)	Benzene	10.29	78	114012	5.2919	ug/L		95
46)	Trichloroethene	11.00	130	28583	5.0108	ug/L		95
47)	Methylcyclohexane	11.07	83	43227	4.9174	ug/L		97
48)	1,2-Dichloropropane	11.20	63	33442	5.0423	ug/L		94
49)	1,4-Dioxane	11.47	88	5359	88.2186	ug/L		92
50)	Bromodichloromethane	11.48	83	33331	4.7937	ug/L		98
51)	Dibromomethane	11.56	93	16099	5.1476	ug/L		92
52)	2-Chloroethyl Vinyl Ether	11.76	63	17139	4.8342	ug/L		100
53)	4-Methyl-2-Pentanone	11.78	58	9998	4.2942	ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	40482	5.0045	ug/L		96
55)	Dimethyl Disulfide	12.32	79	17680	3.7222	ug/L		79
58)	Toluene	12.47	91	117129	5.2227	ug/L		93
59)	Ethyl Methacrylate	12.55	69	27351	4.7388	ug/L		96
60)	trans-1,3-Dichloropropene	12.64	75	33976	4.9049	ug/L		97
61)	1,1,2-Trichloroethane	12.83	97	24037	5.0947	ug/L		100
62)	2-Hexanone	12.77	43	16651	4.6446	ug/L		94
63)	1,3-Dichloropropane	13.12	76	39082	5.0061	ug/L		95
64)	Tetrachloroethene	13.23	164	24013	5.0260	ug/L		93
65)	Dibromochloromethane	13.48	129	25362	4.9592	ug/L		98
66)	1,2-Dibromoethane	13.72	107	19843	4.7776	ug/L		95
67)	1-Chlorohexane	13.79	91	29852	4.8617	ug/L		98
68)	Chlorobenzene	14.20	112	71266	5.0964	ug/L		100
69)	1,1,1,2-Tetrachloroethane	14.22	131	25372	4.9897	ug/L		97
70)	Ethylbenzene	14.22	106	38945	5.0127	ug/L		82
71)	m-,p-Xylene	14.30	106	94422	10.7441	ug/L		82
72)	o-Xylene	14.82	106	46185	5.0312	ug/L		88
73)	Styrene	14.86	104	70319	5.1875	ug/L		91
74)	Bromoform	15.32	173	15524	4.4105	ug/L		96
75)	Isopropylbenzene	15.21	105	119867	5.2842	ug/L		95
77)	1,1,2,2-Tetrachloroethane	15.42	83	27903	4.9057	ug/L		98
79)	1,2,3-Trichloropropane	15.60	110	8427	5.0924	ug/L		89
80)	trans-1,4-Dichloro-2-Buten	15.63	53	7324	4.9499	ug/L		83
81)	n-Propylbenzene	15.69	91	139966	5.3821	ug/L		97
82)	Bromobenzene	15.82	156	33433	5.2078	ug/L		86
83)	1,3,5-Trimethylbenzene	15.86	105	100007	5.2000	ug/L		99
84)	2-Chlorotoluene	15.94	91	92664	5.1083	ug/L		99
85)	4-Chlorotoluene	15.99	91	82783	5.2165	ug/L		98
86)	a-Methylstyrene	16.23	118	45737	4.6184	ug/L		94
87)	tert-Butylbenzene	16.30	134	22650	5.2063	ug/L		95
88)	1,2,4-Trimethylbenzene	16.34	105	104202	5.2786	ug/L		97
89)	sec-Butylbenzene	16.54	105	128226	5.2569	ug/L		95
90)	p-Isopropyltoluene	16.69	119	105981	5.1928	ug/L		96
91)	1,3-Dichlorobenzene	16.87	146	62054	5.3377	ug/L		93
92)	1,4-Dichlorobenzene	17.00	146	62491	5.2898	ug/L		95
93)	n-Butylbenzene	17.17	91	90494	5.1406	ug/L		98
94)	1,2-Dichlorobenzene	17.46	146	61876	5.2635	ug/L		91
95)	1,2-Dibromo-3-Chloropropan	18.38	75	4720	4.8061	ug/L		99
96)	1,2,4-Trichlorobenzene	19.44	180	43081	5.0316	ug/L		92
97)	Hexachlorobutadiene	19.58	225	21852	5.0287	ug/L		96
98)	Naphthalene	19.79	128	97553	5.2463	ug/L	#	96
99)	1,2,3-Trichlorobenzene	20.08	180	44175	5.1352	ug/L		95

(#) = qualifier out of range (m) = manual integration

Data File : C:\MSDCHEM\1\DATA\041417\11M17513.D Vial: 6
Acq On : 14 Apr 2017 15:42 Operator: FJB
Sample : WG610045-06 5ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:46 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17513.D Vial: 6
Acq On : 14 Apr 2017 15:42 Operator: FJB
Sample : WG610045-06 5ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.4642	10.7	100	0.00
3	P	Chloromethane	5.0000	4.7130	5.7	100	0.00
4	C	Vinyl Chloride	5.0000	5.1352	-2.7	100	0.01
5	T	1,3-Butadiene	5.0000	4.0955	18.1	100	0.00
6	T	Bromomethane	5.0000	4.9977	0.0	100	0.01
7	T	Chloroethane	5.0000	4.9086	1.8	100	0.01
8	T	Trichlorofluoromethane	5.0000	4.7660	4.7	100	0.00
9	T	Diethyl ether	50.0000	50.9938	-2.0	100	0.01
10	T	Isoprene	5.0000	5.0095	-0.2	100	0.01
11	T	Acrolein	25.0000	24.6370	1.5	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.7119	5.8	100	-0.01
13	T	Acetone	5.0000	5.2085	-4.2	100	0.00
14	C	1,1-Dichloroethene	5.0000	4.9046	1.9	100	0.00
15	T	Tert-Butyl Alcohol	100.0000	99.1052	0.9	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8697	2.6	100	0.01
17	T	Iodomethane	5.0000	4.2191	15.6	100	0.00
18	T	Methyl acetate	5.0000	5.0489	-1.0	100	0.00
19	T	Methylene Chloride	5.0000	4.7628	4.7	100	0.00
20	T	Carbon Disulfide	5.0000	4.9371	1.3	100	0.00
21	T	Acrylonitrile	25.0000	24.1967	3.2	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	4.9791	0.4	100	0.00
23	T	trans-1,2-Dichloroethene	5.0000	4.9352	1.3	100	0.00
24	T	n-Hexane	5.0000	4.4708	10.6	100	0.00
25	T	Diisopropyl ether	50.0000	53.5766	-7.2	100	0.00
26	T	Vinyl Acetate	5.0000	4.9014	2.0	100	-0.01
27	P	1,1-Dichloroethane	5.0000	5.0618	-1.2	100	0.00
28	T	Ethyl-Tert-Butyl ether	50.0000	52.9832	-6.0	100	0.00
29	T	2-Butanone	5.0000	4.6674	6.7	100	0.00
30	T	Propionitrile	50.0000	47.8347	4.3	100	0.00
31	T	2,2-Dichloropropane	5.0000	4.8579	2.8	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9695	0.6	100	0.00
33	C	Chloroform	5.0000	4.6947	6.1	100	0.00
34	T	1-Bromopropane	5.0000	4.1449	17.1	100	0.00
35	T	Bromochloromethane	5.0000	4.9377	1.2	100	0.00
36	T	Tetrahydrofuran	50.0000	48.3401	3.3	100	0.00
37	S	Dibromofluoromethane	5.0000	5.4151	-8.3	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.9492	1.0	100	0.00
39	T	Cyclohexane	5.0000	5.0408	-0.8	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.8697	2.6	100	0.00
41	T	Carbon Tetrachloride	5.0000	4.6985	6.0	100	0.00
42	T	Tert-Amyl-Methyl ether	50.0000	52.6427	-5.3	100	0.00
43	S	1,2-Dichloroethane-d4	5.0000	5.4616	-9.2	100	0.00
44	T	1,2-Dichloroethane	5.0000	5.0631	-1.3	100	0.01
45	T	Benzene	5.0000	5.2919	-5.8	100	0.00
46	T	Trichloroethene	5.0000	5.0108	-0.2	100	0.00
47	T	Methylcyclohexane	5.0000	4.9174	1.7	100	0.00
48	C	1,2-Dichloropropane	5.0000	5.0423	-0.8	100	0.00
49	T	1,4-Dioxane	100.0000	88.2186	11.8	100	0.00
50	T	Bromodichloromethane	5.0000	4.7937	4.1	100	0.00
51	T	Dibromomethane	5.0000	5.1476	-3.0	100	0.00
52	T	2-Chloroethyl Vinyl Ether	5.0000	4.8342	3.3	100	0.00
53	T	4-Methyl-2-Pentanone	5.0000	4.2942	14.1	100	0.00
54	T	cis-1,3-Dichloropropene	5.0000	5.0046	-0.1	100	0.00

(#) = Out of Range
11M17513.D 8260WTR.M Wed Apr 19 15:46:57 2017 Page 1

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041417\11M17513.D Vial: 6
Acq On : 14 Apr 2017 15:42 Operator: FJB
Sample : WG610045-06 5ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	5.0000	3.7222	25.6#	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	5.0000	5.7166	-14.3	100	0.00
58	C	Toluene	5.0000	5.2227	-4.5	100	0.00
59	T	Ethyl Methacrylate	5.0000	4.7388	5.2	100	0.00
60	T	trans-1,3-Dichloropropene	5.0000	4.9049	1.9	100	0.00
61	T	1,1,2-Trichloroethane	5.0000	5.0947	-1.9	100	0.00
62	T	2-Hexanone	5.0000	4.6446	7.1	100	0.00
63	T	1,3-Dichloropropane	5.0000	5.0061	-0.1	100	0.00
64	T	Tetrachloroethene	5.0000	5.0260	-0.5	100	0.00
65	T	Dibromochloromethane	5.0000	4.9592	0.8	100	0.00
66	T	1,2-Dibromoethane	5.0000	4.7775	4.4	100	-0.01
67	T	1-Chlorohexane	5.0000	4.8617	2.8	100	0.00
68	P	Chlorobenzene	5.0000	5.0964	-1.9	100	0.00
69	T	1,1,1,2-Tetrachloroethane	5.0000	4.9897	0.2	100	0.00
70	C	Ethylbenzene	5.0000	5.0127	-0.3	100	0.00
71	T	m-,p-Xylene	10.0000	10.7441	-7.4	100	0.00
72	T	o-Xylene	5.0000	5.0312	-0.6	100	-0.01
73	T	Styrene	5.0000	5.1875	-3.7	100	0.00
74	P	Bromoform	5.0000	4.4105	11.8	100	0.00
75	T	Isopropylbenzene	5.0000	5.2842	-5.7	100	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
77	P	1,1,2,2-Tetrachloroethane	5.0000	4.9057	1.9	100	0.00
78	S	p-Bromofluorobenzene	5.0000	5.2100	-4.2	100	0.00
79	T	1,2,3-Trichloropropane	5.0000	5.0924	-1.8	100	0.00
80	T	trans-1,4-Dichloro-2-Butene	5.0000	4.9499	1.0	100	0.00
81	T	n-Propylbenzene	5.0000	5.3821	-7.6	100	0.00
82	T	Bromobenzene	5.0000	5.2078	-4.2	100	0.00
83	T	1,3,5-Trimethylbenzene	5.0000	5.2000	-4.0	100	0.00
84	T	2-Chlorotoluene	5.0000	5.1083	-2.2	100	0.00
85	T	4-Chlorotoluene	5.0000	5.2165	-4.3	100	0.00
86	T	a-Methylstyrene	5.0000	4.6184	7.6	100	0.00
87	T	tert-Butylbenzene	5.0000	5.2063	-4.1	100	0.00
88	T	1,2,4-Trimethylbenzene	5.0000	5.2786	-5.6	100	0.00
89	T	sec-Butylbenzene	5.0000	5.2569	-5.1	100	0.00
90	T	p-Isopropyltoluene	5.0000	5.1928	-3.9	100	0.00
91	T	1,3-Dichlorobenzene	5.0000	5.3377	-6.8	100	0.00
92	T	1,4-Dichlorobenzene	5.0000	5.2898	-5.8	100	0.00
93	T	n-Butylbenzene	5.0000	5.1406	-2.8	100	0.00
94	T	1,2-Dichlorobenzene	5.0000	5.2635	-5.3	100	0.00
95	T	1,2-Dibromo-3-Chloropropane	5.0000	4.8061	3.9	100	0.00
96	T	1,2,4-Trichlorobenzene	5.0000	5.0316	-0.6	100	0.00
97	T	Hexachlorobutadiene	5.0000	5.0287	-0.6	100	0.00
98	T	Naphthalene	5.0000	5.2463	-4.9	100	0.00
99	T	1,2,3-Trichlorobenzene	5.0000	5.1352	-2.7	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17513.D 8260WTR.M Wed Apr 19 15:46:57 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17514.D Vial: 7
Acq On : 14 Apr 2017 16:11 Operator: FJB
Sample : WG610045-07 20ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 16:33:27 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	457673	25.00 ug/L	-0.02
56) Chlorobenzene-d5	14.14	117	318982	25.00 ug/L	-0.02
76) 1,4-Dichlorobenzene-d4	16.96	152	167478	25.00 ug/L	-0.02
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	45531	9.5715 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 38.28%#		
43) 1,2-Dichloroethane-d4	10.14	65	51849	8.5424 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 34.16%#		
57) Toluene-d8	12.38	98	182015	10.1921 ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 40.76%#		
78) p-Bromofluorobenzene	15.54	95	63341	9.1245 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 115		Recovery = 36.48%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.22	85	143063	20.3792 ug/L	95
3) Chloromethane	3.66	50	150165	16.3379 ug/L	100
4) Vinyl Chloride	3.89	62	128121	16.9182 ug/L	98
5) 1,3-Butadiene	3.93	54	73388	17.9994 ug/L	96
6) Bromomethane	4.78	94	82674	20.9211 ug/L	99
7) Chloroethane	4.93	64	94279	19.5995 ug/L	99
8) Trichlorofluoromethane	5.41	101	170982	20.7833 ug/L	97
9) Diethyl ether	5.92	59	450402	75.1520 ug/L	98
10) Isoprene	5.97	67	165385	19.8478 ug/L	96
11) Acrolein	6.15	56	43376	42.4277 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	99549	22.0458 ug/L	95
13) Acetone	6.26	43	30260	16.4130 ug/L	94
14) 1,1-Dichloroethene	6.47	61	192136	20.2054 ug/L	96
15) Tert-Butyl Alcohol	6.58	59	85203	134.8537 ug/L	95
16) Dimethyl Sulfide	6.73	62	140318	18.7301 ug/L	94
17) Iodomethane	6.97	142	105075	18.6338 ug/L	95
18) Methyl acetate	6.98	43	90028	17.4114 ug/L	99
19) Methylene Chloride	7.23	84	121847	19.8177 ug/L	97
20) Carbon Disulfide	7.28	76	305352	19.2316 ug/L	98
21) Acrylonitrile	7.40	53	93571	37.5842 ug/L	95
22) Methyl Tert Butyl Ether	7.43	73	313491	19.5376 ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	114085	21.3833 ug/L	93
24) n-Hexane	7.73	57	178259	19.6985 ug/L	99
25) Diisopropyl ether	8.06	45	1740326	75.8339 ug/L	97
26) Vinyl Acetate	8.23	43	230779	19.5519 ug/L	99
27) 1,1-Dichloroethane	8.26	63	240380	19.9990 ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1568479	75.2344 ug/L	100
29) 2-Butanone	8.79	43	51837	17.5347 ug/L	95
30) Propionitrile	8.89	54	70409	74.8330 ug/L	99
31) 2,2-Dichloropropane	9.00	77	165325	20.1986 ug/L	98
32) cis-1,2-Dichloroethene	9.07	96	130190	20.6542 ug/L	96
33) Chloroform	9.26	83	200120	18.4904 ug/L	99
35) Bromochloromethane	9.48	130	77994	22.7768 ug/L	92
36) Tetrahydrofuran	9.50	42	151904	72.9578 ug/L	99
38) 1,1,1-Trichloroethane	9.77	97	174418	20.1969 ug/L	98
39) Cyclohexane	9.79	56	234465	19.5747 ug/L	99
40) 1,1-Dichloropropene	9.95	75	155468	20.8560 ug/L	98
41) Carbon Tetrachloride	10.09	117	155428	22.1165 ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	1289662	79.2985 ug/L	99
44) 1,2-Dichloroethane	10.26	62	164667	19.0083 ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17514.D Vial: 7
Acq On : 14 Apr 2017 16:11 Operator: FJB
Sample : WG610045-07 20ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 16:33:27 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

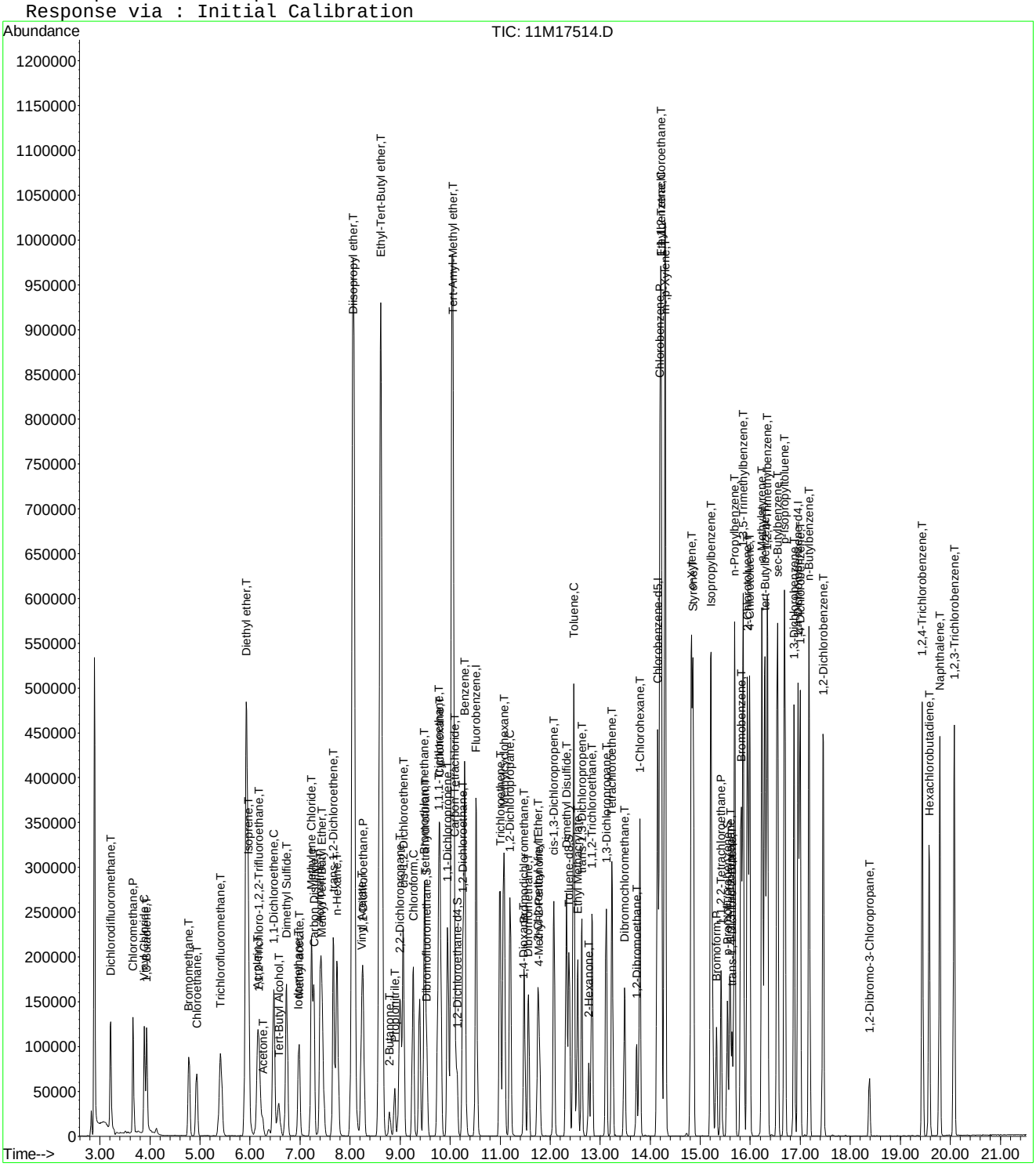
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
45)	Benzene	10.29	78	467269	20.9137 ug/L	97
46)	Trichloroethene	11.00	130	125676	23.0520 ug/L	94
47)	Methylcyclohexane	11.07	83	189167	20.6577 ug/L	97
48)	1,2-Dichloropropane	11.20	63	142383	20.0356 ug/L	94
49)	1,4-Dioxane	11.47	88	9050	165.5671 ug/L	91
50)	Bromodichloromethane	11.48	83	147670	19.5982 ug/L	99
51)	Dibromomethane	11.56	93	67970	19.7201 ug/L	91
52)	2-Chloroethyl Vinyl Ether	11.76	63	73812	19.2601 ug/L	96
53)	4-Methyl-2-Pentanone	11.78	58	45380	18.0917 ug/L	100
54)	cis-1,3-Dichloropropene	12.08	75	180412	20.6279 ug/L	99
55)	Dimethyl Disulfide	12.32	79	94458	17.2357 ug/L	95
58)	Toluene	12.47	91	481139	21.5126 ug/L	97
59)	Ethyl Methacrylate	12.55	69	134564	20.1004 ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	155010	20.0475 ug/L	97
61)	1,1,2-Trichloroethane	12.83	97	103874	21.3038 ug/L	97
62)	2-Hexanone	12.77	43	74172	17.4526 ug/L	99
63)	1,3-Dichloropropane	13.12	76	169484	19.8206 ug/L	92
64)	Tetrachloroethene	13.23	164	100329	23.5038 ug/L	96
65)	Dibromochloromethane	13.48	129	114513	21.9163 ug/L	99
66)	1,2-Dibromoethane	13.73	107	85485	20.0214 ug/L	98
67)	1-Chlorohexane	13.79	91	137940	20.6561 ug/L	96
68)	Chlorobenzene	14.20	112	303782	21.3680 ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	115862	22.5741 ug/L	99
70)	Ethylbenzene	14.22	106	165185	20.5361 ug/L	88
71)	m-,p-Xylene	14.30	106	401174	44.0159 ug/L	92
72)	o-Xylene	14.83	106	206340	21.7359 ug/L	99
73)	Styrene	14.86	104	323835	22.6392 ug/L	92
74)	Bromoform	15.32	173	74422	21.9541 ug/L	100
75)	Isopropylbenzene	15.22	105	505504	22.4569 ug/L	98
77)	1,1,2,2-Tetrachloroethane	15.42	83	121626	19.5353 ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	35533	20.1385 ug/L	85
80)	trans-1,4-Dichloro-2-Buten	15.63	53	34062	17.7821 ug/L	80
81)	n-Propylbenzene	15.69	91	594158	20.5202 ug/L	98
82)	Bromobenzene	15.82	156	140785	21.3037 ug/L	84
83)	1,3,5-Trimethylbenzene	15.86	105	439336	22.7686 ug/L	98
84)	2-Chlorotoluene	15.94	91	385501	20.0125 ug/L	100
85)	4-Chlorotoluene	15.99	91	350231	19.4197 ug/L	99
86)	a-Methylstyrene	16.23	118	233580	21.1249 ug/L	95
87)	tert-Butylbenzene	16.30	134	98782	21.8955 ug/L	94
88)	1,2,4-Trimethylbenzene	16.34	105	442860	20.5122 ug/L	99
89)	sec-Butylbenzene	16.54	105	551140	21.4988 ug/L	97
90)	p-Isopropyltoluene	16.69	119	469101	22.0012 ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	258631	21.4904 ug/L	95
92)	1,4-Dichlorobenzene	17.00	146	254659	21.1616 ug/L	94
93)	n-Butylbenzene	17.17	91	413389	21.3983 ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	256446	21.4433 ug/L	94
95)	1,2-Dibromo-3-Chloropropan	18.38	75	19835	17.2049 ug/L	89
96)	1,2,4-Trichlorobenzene	19.44	180	192207	23.7368 ug/L	96
97)	Hexachlorobutadiene	19.58	225	99398	25.6476 ug/L	94
98)	Naphthalene	19.79	128	426019	23.3718 ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	192979	23.9967 ug/L	95

(#) = qualifier out of range (m) = manual integration
11M17514.D 8260WTR.M Thu Apr 20 14:51:16 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17514.D Vial: 7
Acq On : 14 Apr 2017 16:11 Operator: FJB
Sample : WG610045-07 20ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 16:33 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17515.D Vial: 8
Acq On : 14 Apr 2017 16:41 Operator: FJB
Sample : WG610045-08 50ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:02:48 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	446534	25.00 ug/L	-0.02
56) Chlorobenzene-d5	14.14	117	321859	25.00 ug/L	-0.02
76) 1,4-Dichlorobenzene-d4	16.96	152	169640	25.00 ug/L	-0.02
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	121459	26.1700 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.68%		
43) 1,2-Dichloroethane-d4	10.14	65	138142	23.3274 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.32%		
57) Toluene-d8	12.38	98	464228	25.7624 ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.04%		
78) p-Bromofluorobenzene	15.54	95	166347	23.6575 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 115		Recovery = 94.64%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	356481	52.0470 ug/L	96
3) Chloromethane	3.66	50	327295	36.4979 ug/L	98
4) Vinyl Chloride	3.88	62	296348	40.1085 ug/L	99
5) 1,3-Butadiene	3.93	54	112599	28.3054 ug/L	99
6) Bromomethane	4.77	94	198646	51.5225 ug/L	99
7) Chloroethane	4.92	64	236042	50.2944 ug/L	99
8) Trichlorofluoromethane	5.41	101	415102	51.7155 ug/L	100
9) Diethyl ether	5.91	59	560476	95.8513 ug/L	98
10) Isoprene	5.96	67	411058	50.5615 ug/L	97
11) Acrolein	6.15	56	54685	54.8238 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	245408	55.7031 ug/L	92
13) Acetone	6.25	43	76300	42.4175 ug/L	90
14) 1,1-Dichloroethene	6.47	61	471620	50.8338 ug/L	95
15) Tert-Butyl Alcohol	6.58	59	111713	181.2226 ug/L	96
16) Dimethyl Sulfide	6.72	62	338345	46.2901 ug/L	98
17) Iodomethane	6.97	142	304193	55.2908 ug/L	94
18) Methyl acetate	6.98	43	223185	44.2407 ug/L	100
19) Methylene Chloride	7.23	84	299176	49.8731 ug/L	95
20) Carbon Disulfide	7.27	76	742960	47.9603 ug/L	99
21) Acrylonitrile	7.40	53	123267	50.7471 ug/L	98
22) Methyl Tert Butyl Ether	7.43	73	769949	49.1822 ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	282113	54.1963 ug/L	92
24) n-Hexane	7.73	57	452841	51.2894 ug/L	100
25) Diisopropyl ether	8.06	45	2084083	93.0784 ug/L	98
26) Vinyl Acetate	8.23	43	595517	51.7114 ug/L	99
27) 1,1-Dichloroethane	8.26	63	577296	49.2278 ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1887280	92.7844 ug/L	98
29) 2-Butanone	8.79	43	128314	44.4870 ug/L	99
30) Propionitrile	8.89	54	87889	95.7415 ug/L	98
31) 2,2-Dichloropropane	9.00	77	410848	51.4477 ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	321505	52.2781 ug/L	94
33) Chloroform	9.25	83	483789	45.8156 ug/L	99
35) Bromochloromethane	9.48	130	197471	59.1065 ug/L	90
36) Tetrahydrofuran	9.50	42	189675	93.3713 ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	432959	51.3854 ug/L	97
39) Cyclohexane	9.79	56	580085	49.6376 ug/L	99
40) 1,1-Dichloropropene	9.95	75	381635	52.4734 ug/L	96
41) Carbon Tetrachloride	10.09	117	384799	56.1204 ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1542440	97.2072 ug/L	98
44) 1,2-Dichloroethane	10.25	62	400272	47.3580 ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17515.D 8260WTR.M Thu Apr 20 14:51:17 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17515.D Vial: 8
Acq On : 14 Apr 2017 16:41 Operator: FJB
Sample : WG610045-08 50ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:02:48 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

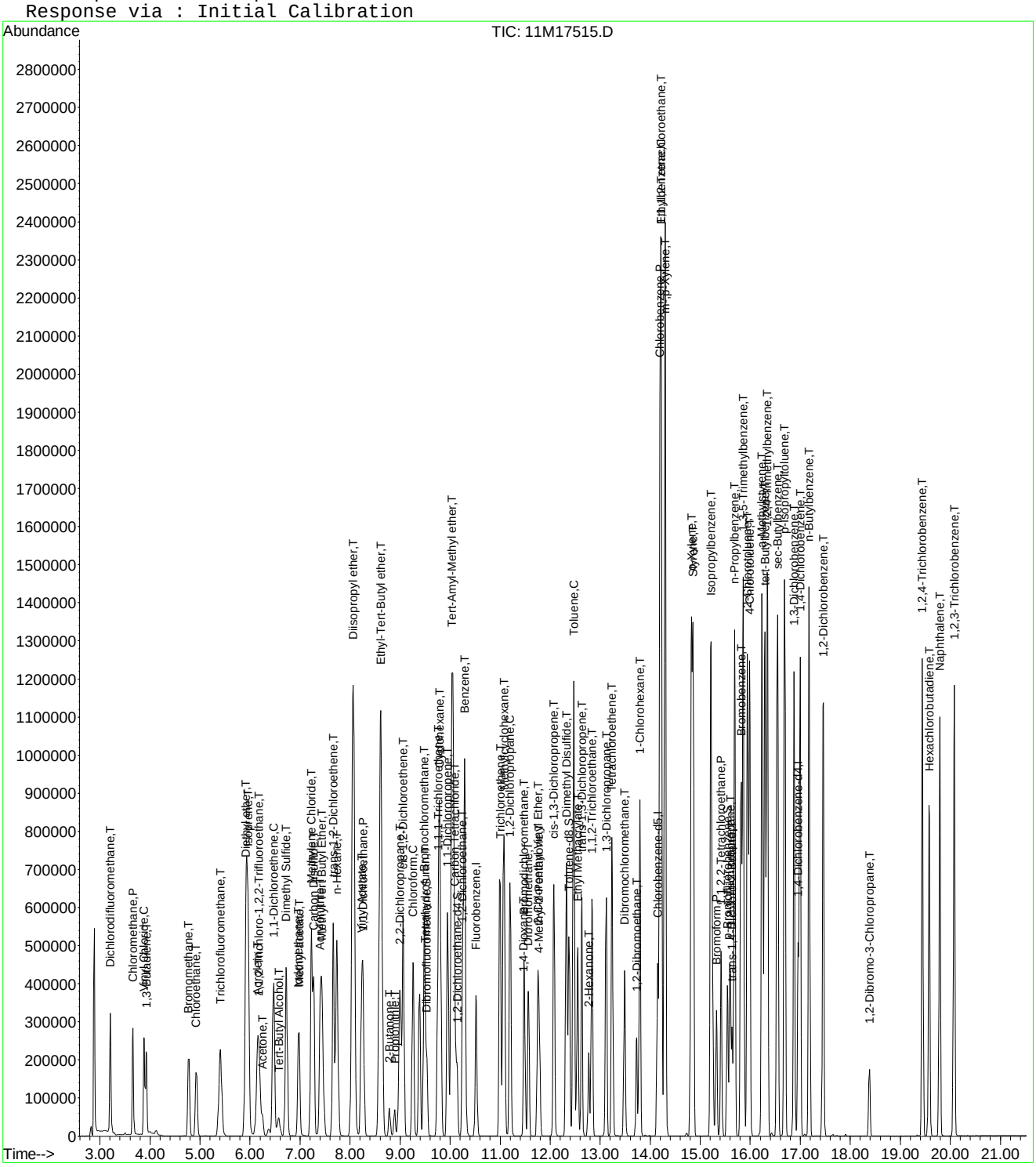
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	Benzene	10.29	78	1084416	49.7463	ug/L	100
46)	Trichloroethene	11.00	130	303916	57.1360	ug/L	96
47)	Methylcyclohexane	11.07	83	469716	52.5741	ug/L	97
48)	1,2-Dichloropropane	11.20	63	349367	50.3881	ug/L	97
49)	1,4-Dioxane	11.47	88	12129	227.4318	ug/L	88
50)	Bromodichloromethane	11.48	83	370458	50.3923	ug/L	100
51)	Dibromomethane	11.56	93	170019	50.5580	ug/L	91
52)	2-Chloroethyl Vinyl Ether	11.76	63	192737	51.5463	ug/L	96
53)	4-Methyl-2-Pentanone	11.78	58	118525	48.4313	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	454189	53.2263	ug/L	99
55)	Dimethyl Disulfide	12.32	79	256228	47.9200	ug/L	97
58)	Toluene	12.47	91	1109195	49.1509	ug/L	100
59)	Ethyl Methacrylate	12.55	69	335861	49.7205	ug/L	94
60)	trans-1,3-Dichloropropene	12.63	75	397016	50.8873	ug/L	97
61)	1,1,2-Trichloroethane	12.83	97	258140	52.4693	ug/L	96
62)	2-Hexanone	12.77	43	189165	44.1125	ug/L	98
63)	1,3-Dichloropropane	13.12	76	415654	48.1749	ug/L	93
64)	Tetrachloroethene	13.23	164	255948	59.4242	ug/L	94
65)	Dibromochloromethane	13.48	129	297422	56.4140	ug/L	99
66)	1,2-Dibromoethane	13.73	107	219933	51.0501	ug/L	98
67)	1-Chlorohexane	13.79	91	348329	51.6949	ug/L	96
68)	Chlorobenzene	14.20	112	728876	50.8108	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	290132	56.0228	ug/L	99
70)	Ethylbenzene	14.22	106	420790	51.8459	ug/L	97
71)	m-,p-Xylene	14.30	106	938602	102.0607	ug/L	99
72)	o-Xylene	14.83	106	503996	52.6164	ug/L	96
73)	Styrene	14.86	104	794332	55.0351	ug/L	95
74)	Bromoform	15.32	173	202114	59.0897	ug/L	99
75)	Isopropylbenzene	15.22	105	1171761	51.5898	ug/L	98
77)	1,1,2,2-Tetrachloroethane	15.42	83	314851	49.9262	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	89556	50.1095	ug/L	86
80)	trans-1,4-Dichloro-2-Buten	15.63	53	79463	40.9550	ug/L	66
81)	n-Propylbenzene	15.69	91	1348211	45.9693	ug/L	98
82)	Bromobenzene	15.82	156	353643	52.8316	ug/L	83
83)	1,3,5-Trimethylbenzene	15.86	105	1026651	52.5281	ug/L	97
84)	2-Chlorotoluene	15.94	91	901327	46.1942	ug/L	97
85)	4-Chlorotoluene	15.98	91	835023	45.7104	ug/L	97
86)	a-Methylstyrene	16.23	118	562798	50.2507	ug/L	97
87)	tert-Butylbenzene	16.30	134	250547	54.8272	ug/L	91
88)	1,2,4-Trimethylbenzene	16.34	105	1045970	47.8295	ug/L	97
89)	sec-Butylbenzene	16.54	105	1275449	49.1184	ug/L	98
90)	p-Isopropyltoluene	16.69	119	1103387	51.0902	ug/L	98
91)	1,3-Dichlorobenzene	16.87	146	643814	52.8145	ug/L	96
92)	1,4-Dichlorobenzene	17.00	146	636271	52.1989	ug/L	96
93)	n-Butylbenzene	17.17	91	1014066	51.8222	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	633010	52.2560	ug/L	97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	53427	45.7521	ug/L	83
96)	1,2,4-Trichlorobenzene	19.44	180	501259	61.1146	ug/L	97
97)	Hexachlorobutadiene	19.58	225	261601	66.6405	ug/L	96
98)	Naphthalene	19.79	128	1032612	55.9280	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	493244	60.5527	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17515.D 8260WTR.M Thu Apr 20 14:51:17 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17515.D Vial: 8
Acq On : 14 Apr 2017 16:41 Operator: FJB
Sample : WG610045-08 50ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:02 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17516.D Vial: 9
Acq On : 14 Apr 2017 17:10 Operator: FJB
Sample : WG610045-09 100ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:32:24 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	468082	25.00	ug/L	-0.02
56) Chlorobenzene-d5	14.14	117	345202	25.00	ug/L	-0.02
76) 1,4-Dichlorobenzene-d4	16.96	152	189238	25.00	ug/L	-0.02
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	238079	48.9358	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 195.76%#			
43) 1,2-Dichloroethane-d4	10.13	65	269749	43.4543	ug/L	-0.03
Spiked Amount 25.000	Range 80 - 120		Recovery = 173.80%#			
57) Toluene-d8	12.38	98	882804	45.6785	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 182.72%#			
78) p-Bromofluorobenzene	15.54	95	347906	44.3542	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 115		Recovery = 177.40%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	671494	93.5264	ug/L	97
3) Chloromethane	3.65	50	651784	69.3370	ug/L	96
4) Vinyl Chloride	3.88	62	560597	72.3799	ug/L	98
5) 1,3-Butadiene	3.92	54	228188	54.7217	ug/L	97
6) Bromomethane	4.77	94	408677	101.1182	ug/L	99
7) Chloroethane	4.92	64	470266	95.5887	ug/L	100
8) Trichlorofluoromethane	5.40	101	820211	97.4818	ug/L	99
9) Diethyl ether	5.91	59	1081853	176.4989	ug/L	98
10) Isoprene	5.96	67	822955	96.5662	ug/L	98
11) Acrolein	6.14	56	111223	106.3721	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	494283	107.0284	ug/L	92
13) Acetone	6.24	43	152411	80.8295	ug/L	91
14) 1,1-Dichloroethene	6.46	61	924882	95.0997	ug/L	93
15) Tert-Butyl Alcohol	6.57	59	244487	378.3529	ug/L	98
16) Dimethyl Sulfide	6.72	62	671020	87.5782	ug/L	97
17) Iodomethane	6.97	142	626340	108.6041	ug/L	96
18) Methyl acetate	6.98	43	450327	85.1565	ug/L	98
19) Methylene Chloride	7.23	84	586195	93.2212	ug/L	93
20) Carbon Disulfide	7.27	76	1412476	86.9821	ug/L	98
21) Acrylonitrile	7.40	53	252250	99.0668	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	1504489	91.6785	ug/L	97
23) trans-1,2-Dichloroethene	7.66	96	560610	102.7401	ug/L	90
24) n-Hexane	7.73	57	903119	97.5797	ug/L	99
25) Diisopropyl ether	8.05	45	3565427	151.9070	ug/L	95
26) Vinyl Acetate	8.22	43	1113627	92.2497	ug/L	98
27) 1,1-Dichloroethane	8.25	63	1115355	90.7314	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	3302563	154.8896	ug/L	91
29) 2-Butanone	8.79	43	269194	89.0342	ug/L	98
30) Propionitrile	8.89	54	179974	187.0287	ug/L	97
31) 2,2-Dichloropropane	9.00	77	803307	95.9618	ug/L	98
32) cis-1,2-Dichloroethene	9.06	96	641077	99.4431	ug/L	91
33) Chloroform	9.25	83	936282	84.5856	ug/L	98
35) Bromochloromethane	9.48	130	395195	112.8433	ug/L	90
36) Tetrahydrofuran	9.50	42	379802	178.3582	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	862947	97.7035	ug/L	97
39) Cyclohexane	9.79	56	1135333	92.6776	ug/L	97
40) 1,1-Dichloropropene	9.95	75	762879	100.0642	ug/L	95
41) Carbon Tetrachloride	10.09	117	769129	107.0086	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	2767021	166.3547	ug/L	95
44) 1,2-Dichloroethane	10.25	62	773688	87.3245	ug/L	96

(#) = qualifier out of range (m) = manual integration
11M17516.D 8260WTR.M Thu Apr 20 14:51:18 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17516.D Vial: 9
Acq On : 14 Apr 2017 17:10 Operator: FJB
Sample : WG610045-09 100ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:32:24 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

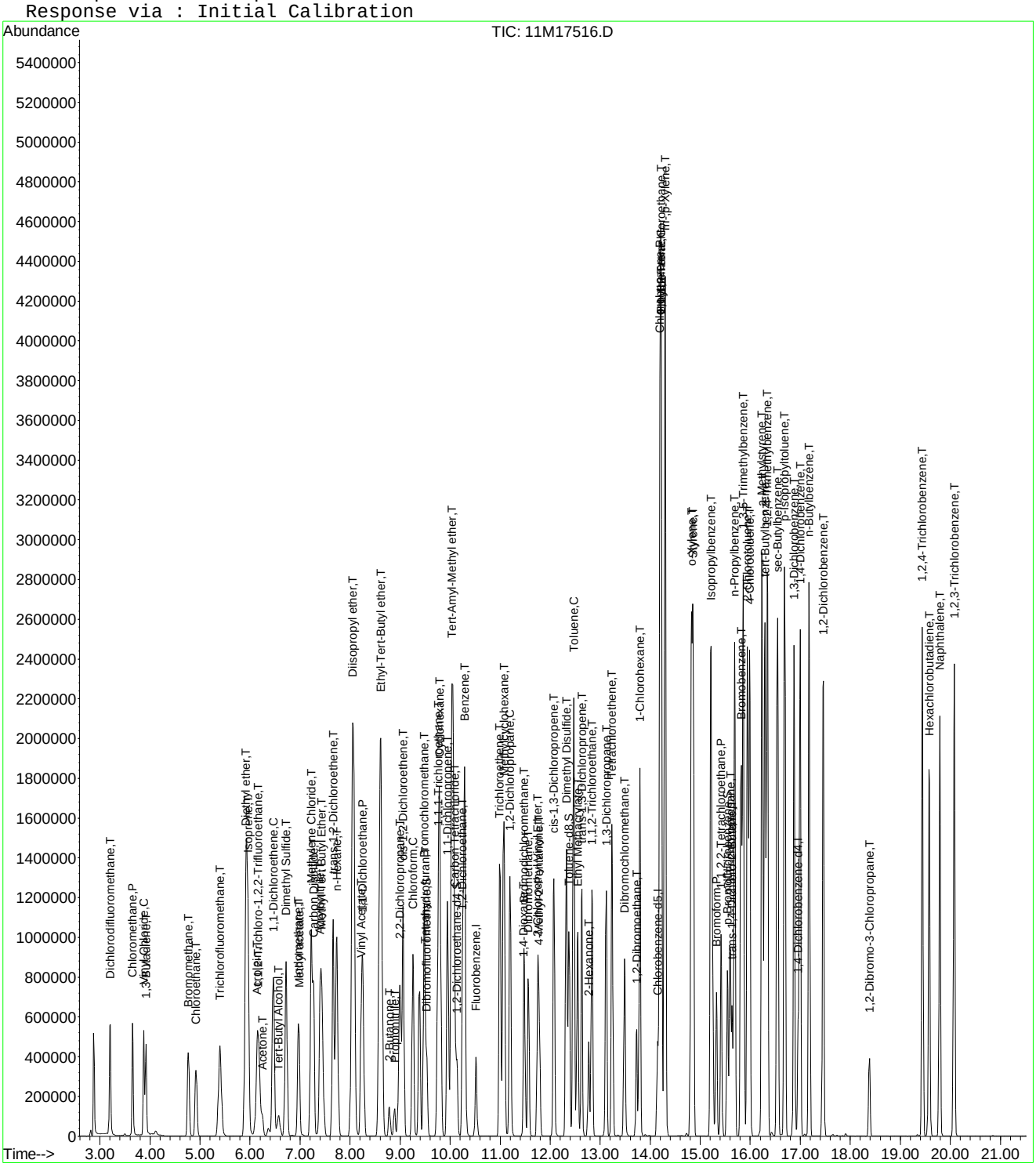
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	Benzene	10.29	78	1952407	85.4413	ug/L		95
46)	Trichloroethene	10.99	130	603833	108.2943	ug/L		96
47)	Methylcyclohexane	11.07	83	932998	99.6208	ug/L		97
48)	1,2-Dichloropropane	11.20	63	685236	94.2798	ug/L		98
49)	1,4-Dioxane	11.47	88	25009	447.3580	ug/L		90
50)	Bromodichloromethane	11.48	83	745353	96.7207	ug/L		98
51)	Dibromomethane	11.56	93	344992	97.8665	ug/L		91
52)	2-Chloroethyl Vinyl Ether	11.75	63	396704	101.2119	ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	249257	97.1620	ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	880157	98.3971	ug/L		96
55)	Dimethyl Disulfide	12.32	79	530217	94.5968	ug/L		99
58)	Toluene	12.47	91	1957886	80.8916	ug/L		95
59)	Ethyl Methacrylate	12.55	69	688218	94.9936	ug/L		95
60)	trans-1,3-Dichloropropene	12.63	75	784738	93.7818	ug/L		94
61)	1,1,2-Trichloroethane	12.83	97	512661	97.1567	ug/L		97
62)	2-Hexanone	12.77	43	401508	87.2986	ug/L		96
63)	1,3-Dichloropropane	13.12	76	814275	87.9939	ug/L		94
64)	Tetrachloroethene	13.23	164	512177	110.8726	ug/L		95
65)	Dibromochloromethane	13.48	129	608753	107.6582	ug/L		100
66)	1,2-Dibromoethane	13.73	107	461381	99.8523	ug/L		99
67)	1-Chlorohexane	13.79	91	722774	100.0123	ug/L		95
68)	Chlorobenzene	14.20	112	1358832	88.3203	ug/L		95
69)	1,1,1,2-Tetrachloroethane	14.22	131	588787	106.0034	ug/L		99
70)	Ethylbenzene	14.22	106	839798	96.4752	ug/L		79
71)	m-,p-Xylene	14.30	106	1711838	173.5530	ug/L		86
72)	o-Xylene	14.83	106	982293	95.6154	ug/L		87
73)	Styrene	14.86	104	1500588	96.9375	ug/L		100
74)	Bromoform	15.32	173	438079	119.4153	ug/L		98
75)	Isopropylbenzene	15.22	105	2078058	85.3051	ug/L		91
77)	1,1,2,2-Tetrachloroethane	15.42	83	653494	92.8933	ug/L		97
79)	1,2,3-Trichloropropane	15.60	110	196169	98.3956	ug/L		88
80)	trans-1,4-Dichloro-2-Buten	15.63	53	187078	86.4339	ug/L		80
81)	n-Propylbenzene	15.68	91	2347809	71.7617	ug/L		89
82)	Bromobenzene	15.82	156	716228	95.9179	ug/L		81
83)	1,3,5-Trimethylbenzene	15.86	105	1864437	85.5139	ug/L		92
84)	2-Chlorotoluene	15.94	91	1630300	74.9019	ug/L		89
85)	4-Chlorotoluene	15.98	91	1533081	75.2318	ug/L		90
86)	a-Methylstyrene	16.23	118	1127491	90.2448	ug/L		100
87)	tert-Butylbenzene	16.29	134	510490	100.1415	ug/L		82
88)	1,2,4-Trimethylbenzene	16.34	105	1887793	77.3839	ug/L		89
89)	sec-Butylbenzene	16.54	105	2241782	77.3917	ug/L		90
90)	p-Isopropyltoluene	16.69	119	1975255	81.9886	ug/L		90
91)	1,3-Dichlorobenzene	16.87	146	1245261	91.5741	ug/L		100
92)	1,4-Dichlorobenzene	17.00	146	1240622	91.2386	ug/L		99
93)	n-Butylbenzene	17.17	91	1854409	84.9522	ug/L		91
94)	1,2-Dichlorobenzene	17.46	146	1235485	91.4287	ug/L		99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	119813	91.9759	ug/L		85
96)	1,2,4-Trichlorobenzene	19.44	180	993199	108.5523	ug/L		99
97)	Hexachlorobutadiene	19.58	225	549233	125.4225	ug/L		96
98)	Naphthalene	19.79	128	1831553	88.9266	ug/L	#	93
99)	1,2,3-Trichlorobenzene	20.08	180	969864	106.7339	ug/L		99

(#) = qualifier out of range (m) = manual integration
11M17516.D 8260WTR.M Thu Apr 20 14:51:19 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17516.D Vial: 9
Acq On : 14 Apr 2017 17:10 Operator: FJB
Sample : WG610045-09 100ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 17:32 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17517.D Vial: 10
Acq On : 14 Apr 2017 17:40 Operator: FJB
Sample : WG610045-10 200ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:45:58 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	448735	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	335372	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	195593	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	432662	92.9237 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 371.68%#		
43) 1,2-Dichloroethane-d4	10.13	65	480078	91.0262 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 364.12%#		
57) Toluene-d8	12.38	98	1477351	80.9185 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 323.68%#		
78) p-Bromofluorobenzene	15.54	95	651135	89.5717 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 358.28%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	1188266	192.2713 ug/L	100
3) Chloromethane	3.66	50	1154087	155.2588 ug/L	91
4) Vinyl Chloride	3.88	62	938315	165.6250 ug/L	93
5) 1,3-Butadiene	3.92	54	388466	205.1618 ug/L	98
6) Bromomethane	4.77	94	787343	186.1716 ug/L	99
7) Chloroethane	4.92	64	862304	193.8839 ug/L	97
8) Trichlorofluoromethane	5.40	101	1500077	194.5626 ug/L	98
9) Diethyl ether	5.92	59	1358	0.2514 ug/L #	1
10) Isoprene	5.96	67	1500908	202.1216 ug/L	98
11) Acrolein	6.14	56	928	0.8998 ug/L #	13
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	928802	201.9586 ug/L	92
13) Acetone	6.25	43	299025	195.2621 ug/L	88
14) 1,1-Dichloroethene	6.46	61	1648210	187.3717 ug/L	89
16) Dimethyl Sulfide	6.72	62	1231977	197.1718 ug/L	97
17) Iodomethane	6.97	142	1130488	193.9462 ug/L	97
18) Methyl acetate	6.98	43	834473	190.0719 ug/L	96
19) Methylene Chloride	7.23	84	1079937	181.7784 ug/L	87
20) Carbon Disulfide	7.27	76	2335742	167.5960 ug/L	93
21) Acrylonitrile	7.42	53	31660	13.9365 ug/L #	31
22) Methyl Tert Butyl Ether	7.42	73	2665164	182.4726 ug/L	93
23) trans-1,2-Dichloroethene	7.66	96	1024303	196.9061 ug/L	85
24) n-Hexane	7.73	57	1610130	197.0810 ug/L	96
25) Diisopropyl ether	8.06	45	4821	0.2392 ug/L #	74
26) Vinyl Acetate	8.22	43	1981451	192.1951 ug/L	96
27) 1,1-Dichloroethane	8.25	63	1929159	176.1989 ug/L	92
28) Ethyl-Tert-Butyl ether	8.61	59	3111	0.1712 ug/L #	60
29) 2-Butanone	8.79	43	518696	208.9251 ug/L	97
31) 2,2-Dichloropropane	9.00	77	1441811	191.5534 ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	1155885	193.1571 ug/L	88
33) Chloroform	9.25	83	1648876	167.5968 ug/L	95
34) 1-Bromopropane	9.39	122	238556	214.5763 ug/L	98
35) Bromochloromethane	9.48	130	733266	202.0537 ug/L	87
36) Tetrahydrofuran	9.51	42	1019	0.5533 ug/L #	41
38) 1,1,1-Trichloroethane	9.76	97	1556538	196.2588 ug/L	98
39) Cyclohexane	9.79	56	1993880	183.6240 ug/L	93
40) 1,1-Dichloropropene	9.95	75	1343150	189.6354 ug/L	90
41) Carbon Tetrachloride	10.09	117	1390799	200.3277 ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	2121	0.1427 ug/L #	48
44) 1,2-Dichloroethane	10.25	62	1362108	178.3339 ug/L	92
45) Benzene	10.29	78	3054270	143.9462 ug/L	85

(#) = qualifier out of range (m) = manual integration

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17517.D Vial: 10
Acq On : 14 Apr 2017 17:40 Operator: FJB
Sample : WG610045-10 200ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:45:58 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

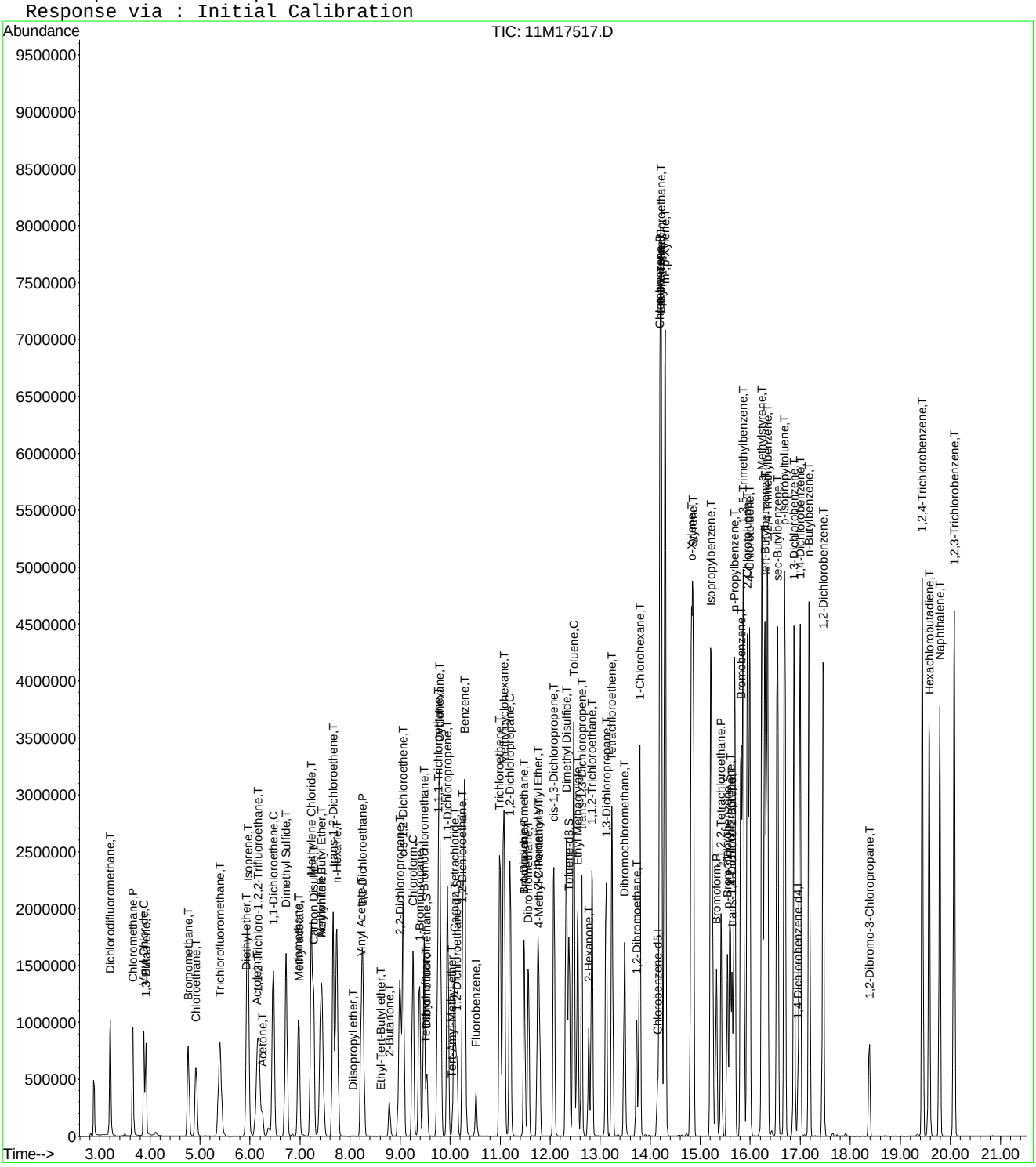
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
46)	Trichloroethene	10.99	130	1077128	191.7327	ug/L		97
47)	Methylcyclohexane	11.07	83	1666124	192.4488	ug/L		96
48)	1,2-Dichloropropane	11.20	63	1235938	189.2172	ug/L		99
49)	1,4-Dioxane	11.48	88	1650	27.5797	ug/L	#	16
50)	Bromodichloromethane	11.48	83	1346047	196.5684	ug/L		95
51)	Dibromomethane	11.56	93	645369	209.5273	ug/L		91
52)	2-Chloroethyl Vinyl Ether	11.76	63	761361	218.0537	ug/L		93
53)	4-Methyl-2-Pentanone	11.78	58	493742	215.3250	ug/L		98
54)	cis-1,3-Dichloropropene	12.08	75	1540746	193.4034	ug/L		90
55)	Dimethyl Disulfide	12.32	79	1008694	215.6306	ug/L		91
58)	Toluene	12.47	91	2995760	125.3754	ug/L		88
59)	Ethyl Methacrylate	12.55	69	1279269	208.0318	ug/L		95
60)	trans-1,3-Dichloropropene	12.64	75	1387895	188.0552	ug/L		88
61)	1,1,2-Trichloroethane	12.83	97	951970	189.3800	ug/L		99
62)	2-Hexanone	12.77	43	781802	204.6793	ug/L		93
63)	1,3-Dichloropropane	13.12	76	1431125	172.0572	ug/L		97
64)	Tetrachloroethene	13.23	164	943587	185.3674	ug/L		95
65)	Dibromochloromethane	13.48	129	1136767	208.6294	ug/L		98
66)	1,2-Dibromoethane	13.73	107	887036	200.4524	ug/L		99
67)	1-Chlorohexane	13.79	91	1324605	202.4741	ug/L		96
68)	Chlorobenzene	14.20	112	2197752	147.5122	ug/L		85
69)	1,1,1,2-Tetrachloroethane	14.22	131	1091939	201.5531	ug/L		100
70)	Ethylbenzene	14.22	106	1494550	180.5510	ug/L		60
71)	m-,p-Xylene	14.30	106	2678225	286.0322	ug/L		74
72)	o-Xylene	14.83	106	1725789	176.4519	ug/L		74
73)	Styrene	14.86	104	2471393	171.1193	ug/L		90
74)	Bromoform	15.32	173	876127	203.3458	ug/L		95
75)	Isopropylbenzene	15.22	105	3184583	131.7654	ug/L		79
77)	1,1,2,2-Tetrachloroethane	15.42	83	1227867	181.5734	ug/L		95
79)	1,2,3-Trichloropropane	15.60	110	385977	196.1858	ug/L		91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	398719	212.4321	ug/L		93
81)	n-Propylbenzene	15.69	91	3504545	113.3490	ug/L	#	75
82)	Bromobenzene	15.82	156	1332931	174.6400	ug/L		78
83)	1,3,5-Trimethylbenzene	15.86	105	2913272	127.4111	ug/L		83
84)	2-Chlorotoluene	15.94	91	2543203	117.9227	ug/L		76
85)	4-Chlorotoluene	15.99	91	2378173m	126.0483	ug/L		
86)	a-Methylstyrene	16.23	118	1944751	165.1727	ug/L		93
87)	tert-Butylbenzene	16.30	134	959461	185.5010	ug/L		67
88)	1,2,4-Trimethylbenzene	16.35	105	2918467	124.3521	ug/L		77
89)	sec-Butylbenzene	16.54	105	3378101	116.4886	ug/L	#	77
90)	p-Isopropyltoluene	16.69	119	3008618	123.9930	ug/L	#	77
91)	1,3-Dichlorobenzene	16.87	146	2101725	152.0606	ug/L		92
92)	1,4-Dichlorobenzene	17.00	146	2063388	146.9108	ug/L		91
93)	n-Butylbenzene	17.17	91	2847032	136.0323	ug/L	#	78
94)	1,2-Dichlorobenzene	17.46	146	2072302	148.2717	ug/L		92
95)	1,2-Dibromo-3-Chloropropan	18.38	75	248457	212.7946	ug/L		83
96)	1,2,4-Trichlorobenzene	19.44	180	1781878	175.0457	ug/L		92
97)	Hexachlorobutadiene	19.58	225	1051127	203.4577	ug/L		95
98)	Naphthalene	19.79	128	2893890	130.9024	ug/L	#	81
99)	1,2,3-Trichlorobenzene	20.08	180	1779703	174.0125	ug/L		92

(#) = qualifier out of range (m) = manual integration
11M17517.D 8260WTR.M Thu Apr 20 14:51:20 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17517.D Vial: 10
Acq On : 14 Apr 2017 17:40 Operator: FJB
Sample : WG610045-10 200ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:46 2017 Quant Results File: 8260WTR.RES

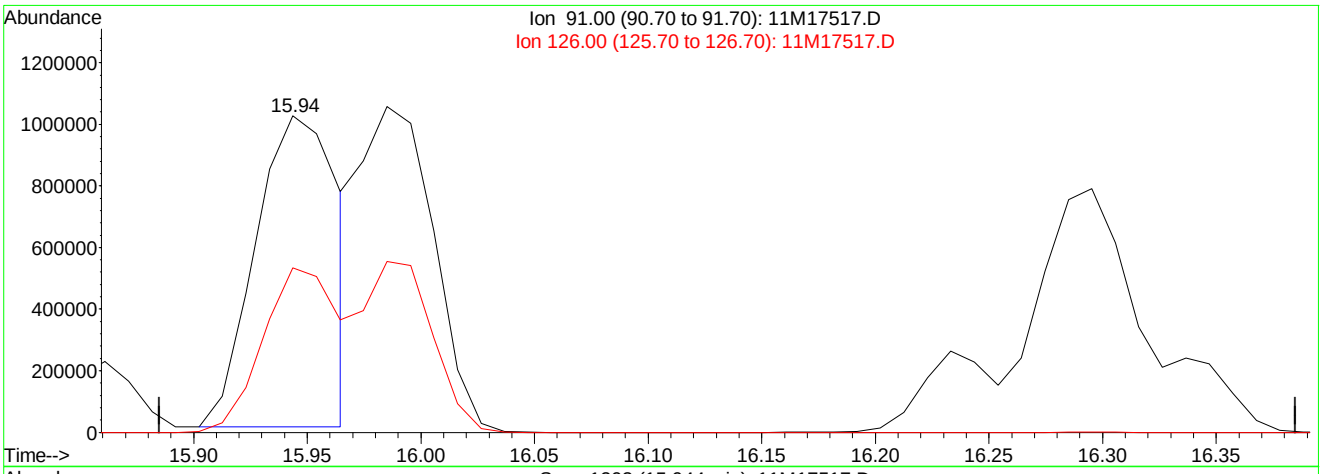
Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

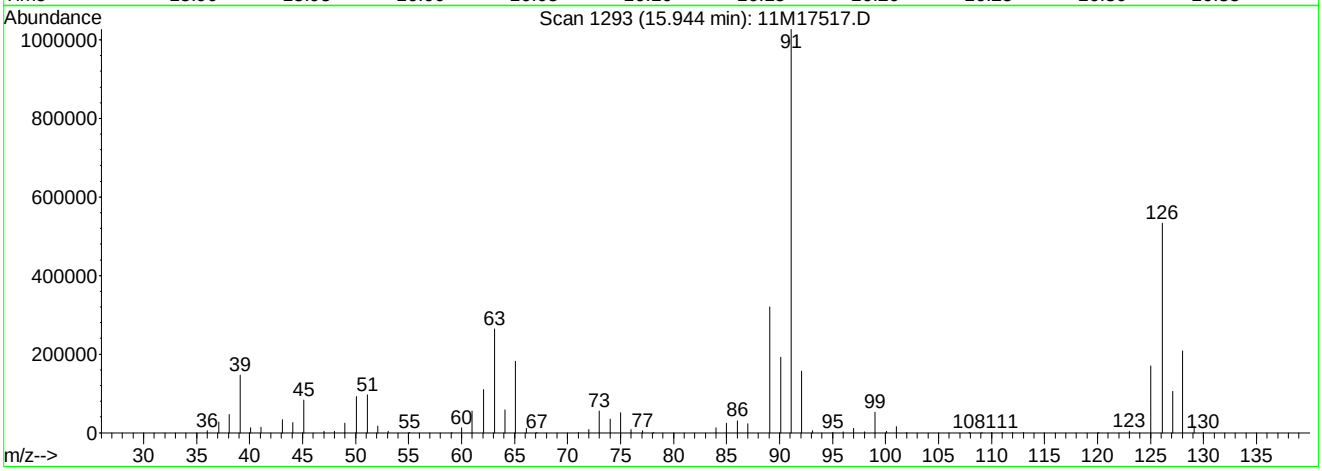


Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17517.D Vial: 10
Acq On : 14 Apr 2017 17:40 Operator: FJB
Sample : WG610045-10 200ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:45 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17517.D

(85) 4-Chlorotoluene (T)

15.94min 134.80ug/L

response 2543203

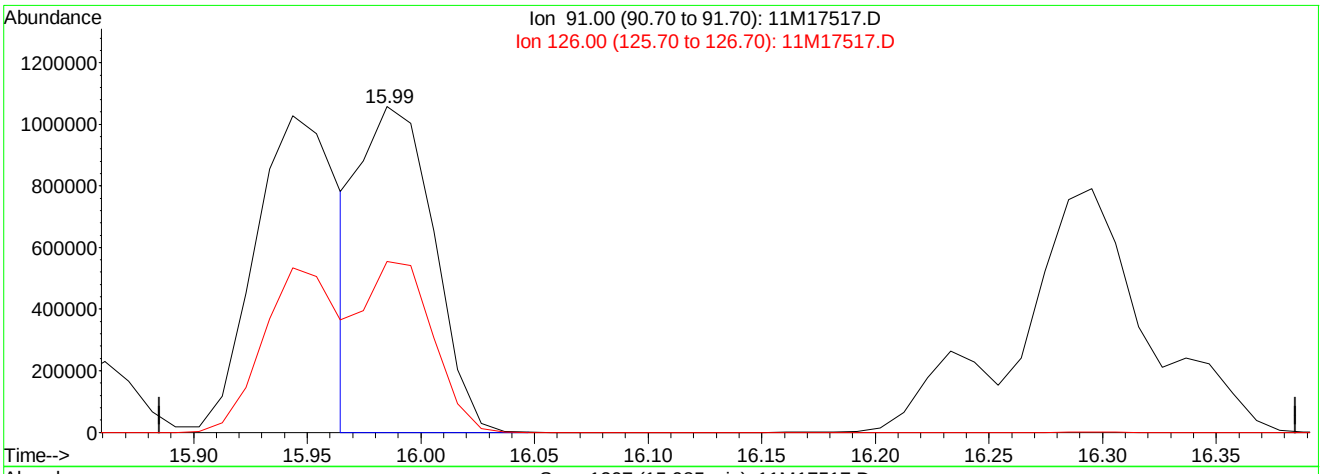
Ion	Exp%	Act%
91.00	100	100
126.00	36.10	47.17
0.00	0.00	0.00
0.00	0.00	0.00

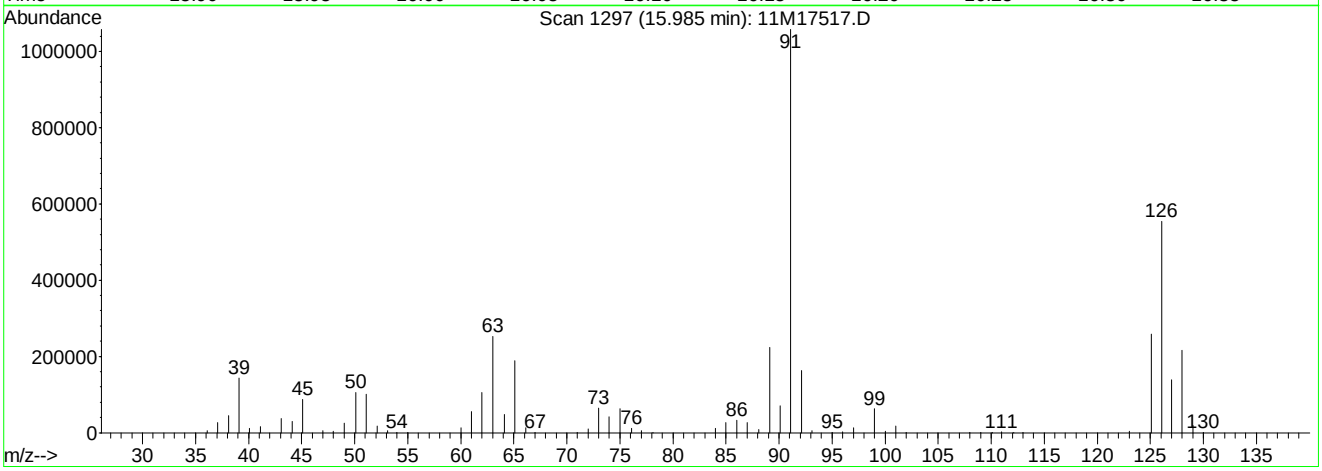
11M17517.D 8260WTR.M Wed Apr 19 15:46:09 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\041417\11M17517.D Vial: 10
Acq On : 14 Apr 2017 17:40 Operator: FJB
Sample : WG610045-10 200ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 19 15:46 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 13:14:32 2017
Response via : Multiple Level Calibration





TIC: 11M17517.D

(85) 4-Chlorotoluene (T)

15.99min 126.05ug/L mint

response 2378173

Ion	Exp%	Act%
91.00	100	100
126.00	36.10	50.44
0.00	0.00	0.00
0.00	0.00	0.00

11M17517.D 8260WTR.M Wed Apr 19 2017

Analyst: 04/21/2017 11:42 Tiffany Bailey
Supervisor: 04/24/2017 14:10
#3 - Improperly integrated isomers and/or coeluting compounds

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17518.D Vial: 11
Acq On : 14 Apr 2017 18:09 Operator: FJB
Sample : WG610045-11 300ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 18:31:13 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	429821	25.00	ug/L	-0.02
56) Chlorobenzene-d5	14.14	117	304985	25.00	ug/L	-0.02
76) 1,4-Dichlorobenzene-d4	16.96	152	174608	25.00	ug/L	-0.02
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	3363	0.7528	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.00%#		
43) 1,2-Dichloroethane-d4	10.13	65	3866	0.6782	ug/L	-0.03
Spiked Amount 25.000	Range 80 - 120		Recovery =	2.72%#		
57) Toluene-d8	12.38	98	12370	0.7245	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery =	2.88%#		
78) p-Bromofluorobenzene	15.54	95	5373	0.7424	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.96%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.19	85	4942	0.7496	ug/L #	76
3) Chloromethane	3.65	50	55444	6.4232	ug/L	94
4) Vinyl Chloride	3.87	62	1007	0.1416	ug/L	78
5) 1,3-Butadiene	3.91	54	534869	139.6847	ug/L	97
6) Bromomethane	4.76	94	145138	39.1079	ug/L	99
8) Trichlorofluoromethane	5.38	101	2457	0.3180	ug/L	97
9) Diethyl ether	5.91	59	1429855	254.0388	ug/L	96
10) Isoprene	5.95	67	2053957	262.4671	ug/L	99
11) Acrolein	6.14	56	159484	166.1057	ug/L	93
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	1788	0.4216	ug/L	82
13) Acetone	6.25	43	408236	235.7758	ug/L	89
14) 1,1-Dichloroethene	6.45	61	2124	0.2378	ug/L	99
15) Tert-Butyl Alcohol	6.58	59	379071	638.8460	ug/L	100
16) Dimethyl Sulfide	6.71	62	1654246	235.1230	ug/L	96
17) Iodomethane	6.96	142	1234265	233.0660	ug/L	96
18) Methyl acetate	6.98	43	1137592	234.2668	ug/L	94
19) Methylene Chloride	7.22	84	1932	0.3346	ug/L	83
20) Carbon Disulfide	7.26	76	2964595	198.8147	ug/L #	89
21) Acrylonitrile	7.39	53	330056	141.1624	ug/L	94
23) trans-1,2-Dichloroethene	7.65	96	3116	0.6219	ug/L	94
24) n-Hexane	7.72	57	2214955	260.6235	ug/L	94
25) Diisopropyl ether	8.05	45	4387940	203.5923	ug/L	90
26) Vinyl Acetate	8.22	43	2598488	234.4121	ug/L #	93
28) Ethyl-Tert-Butyl ether	8.60	59	4134634	211.1750	ug/L	86
29) 2-Butanone	8.78	43	723193	260.4835	ug/L	95
30) Propionitrile	8.89	54	262565	297.1458	ug/L	99
32) cis-1,2-Dichloroethene	9.05	96	1129	0.1907	ug/L	71
33) Chloroform	9.25	83	1555	0.1530	ug/L	96
35) Bromochloromethane	9.46	130	436	0.1356	ug/L #	23
36) Tetrahydrofuran	9.50	42	515779	263.7750	ug/L	96
39) Cyclohexane	9.79	56	2632591	234.0287	ug/L	91
40) 1,1-Dichloropropene	9.95	75	4048	0.5782	ug/L #	72
41) Carbon Tetrachloride	10.08	117	1238	0.1876	ug/L #	75
42) Tert-Amyl-Methyl ether	10.04	73	3467331	227.0137	ug/L	91
44) 1,2-Dichloroethane	10.25	62	1447	0.1779	ug/L #	49
45) Benzene	10.30	78	4508	0.2148	ug/L #	71
46) Trichloroethene	10.99	130	2689	0.5252	ug/L	94
47) Methylcyclohexane	11.07	83	2216061	257.6828	ug/L	95
49) 1,4-Dioxane	11.47	88	40238	783.8438	ug/L	90
51) Dibromomethane	11.57	93	836	0.2583	ug/L #	68

(#) = qualifier out of range (m) = manual integration
11M17518.D 8260WTR.M Thu Apr 20 14:51:21 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041417\11M17518.D Vial: 11
Acq On : 14 Apr 2017 18:09 Operator: FJB
Sample : WG610045-11 300ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 18:31:13 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Fri Apr 14 11:21:07 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

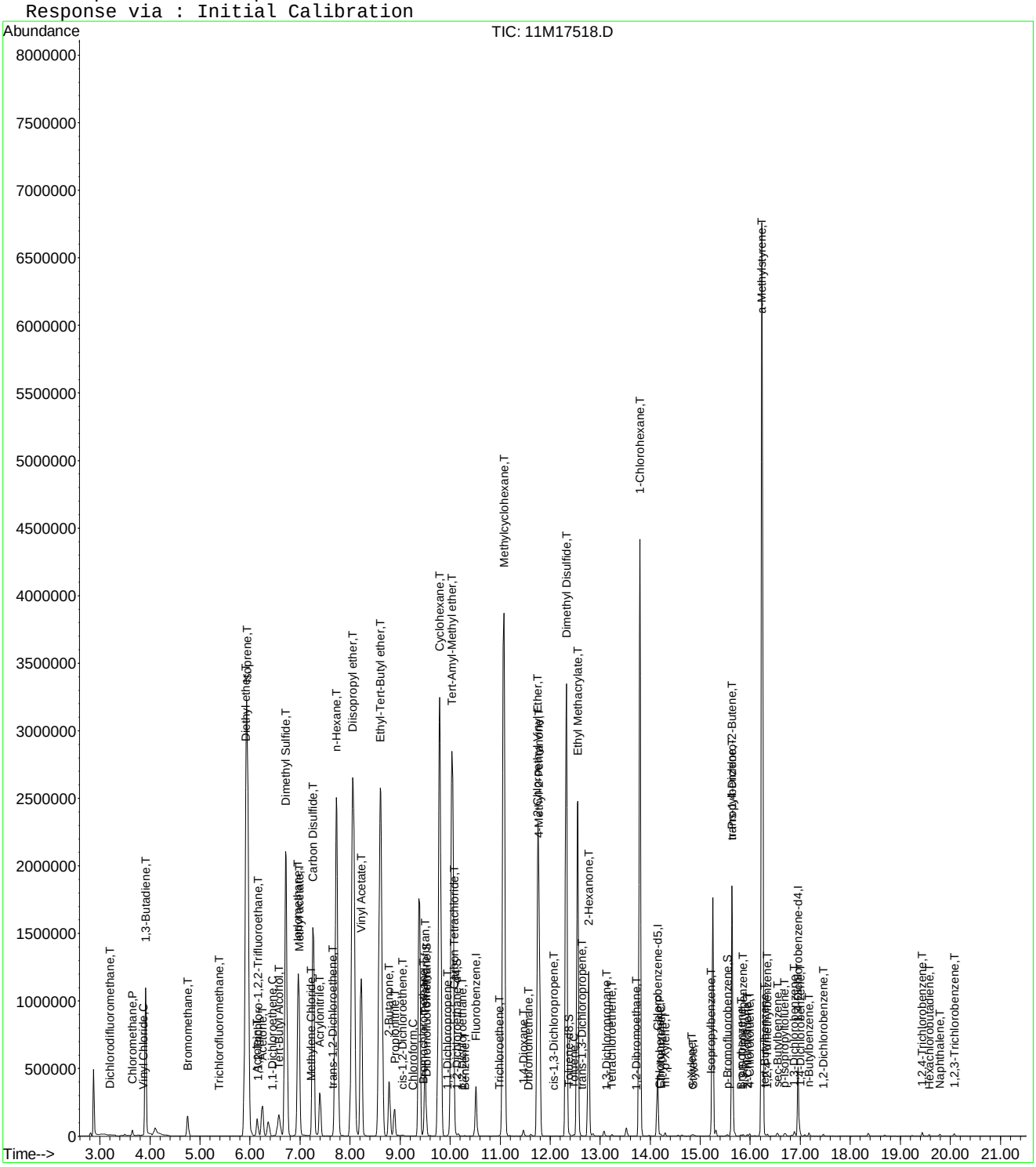
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
52)	2-Chloroethyl Vinyl Ether	11.75	63	1004230	279.0181 ug/L		92
53)	4-Methyl-2-Pentanone	11.78	58	667703	283.4437 ug/L		96
54)	cis-1,3-Dichloropropene	12.08	75	1910	0.2325 ug/L	#	84
55)	Dimethyl Disulfide	12.32	79	1332226	258.8421 ug/L		82
58)	Toluene	12.47	91	8658	0.4049 ug/L		91
59)	Ethyl Methacrylate	12.55	69	1637212	255.7808 ug/L		96
60)	trans-1,3-Dichloropropene	12.63	75	2353	0.3183 ug/L	#	72
62)	2-Hexanone	12.77	43	1014527	249.6731 ug/L		92
63)	1,3-Dichloropropane	13.12	76	1041	0.1273 ug/L	#	11
64)	Tetrachloroethene	13.23	164	3133	0.7676 ug/L		95
66)	1,2-Dibromoethane	13.72	107	972	0.2381 ug/L		91
67)	1-Chlorohexane	13.79	91	1697187	265.8125 ug/L		98
68)	Chlorobenzene	14.20	112	6531	0.4805 ug/L		93
70)	Ethylbenzene	14.22	106	3340	0.4343 ug/L		71
71)	m-,p-Xylene	14.30	106	9920	1.1384 ug/L		87
72)	o-Xylene	14.83	106	2832	0.3120 ug/L		90
73)	Styrene	14.86	104	8178	0.5980 ug/L		89
75)	Isopropylbenzene	15.22	105	20628	0.9584 ug/L		95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	476107	238.4021 ug/L	#	11
81)	n-Propylbenzene	15.63	91	114669	3.7986 ug/L	#	61
82)	Bromobenzene	15.82	156	3782	0.5489 ug/L		84
83)	1,3,5-Trimethylbenzene	15.85	105	10464	0.5202 ug/L		94
84)	2-Chlorotoluene	15.94	91	10779	0.5367 ug/L	#	40
85)	4-Chlorotoluene	15.98	91	14921	0.7936 ug/L	#	70
86)	a-Methylstyrene	16.23	118	2336941	202.7221 ug/L		92
87)	tert-Butylbenzene	16.28	134	2627	0.5585 ug/L	#	1
88)	1,2,4-Trimethylbenzene	16.34	105	11281	0.5012 ug/L		97
89)	sec-Butylbenzene	16.54	105	24416	0.9135 ug/L		94
90)	p-Isopropyltoluene	16.69	119	15242	0.6857 ug/L		94
91)	1,3-Dichlorobenzene	16.87	146	13236	1.0549 ug/L		86
92)	1,4-Dichlorobenzene	17.00	146	14199	1.1317 ug/L		82
93)	n-Butylbenzene	17.17	91	20235	1.0047 ug/L		98
94)	1,2-Dichlorobenzene	17.46	146	8513	0.6828 ug/L		91
96)	1,2,4-Trichlorobenzene	19.44	180	13482	1.5970 ug/L		96
97)	Hexachlorobutadiene	19.58	225	4183	1.0353 ug/L		83
98)	Naphthalene	19.79	128	16704	0.8790 ug/L	#	90
99)	1,2,3-Trichlorobenzene	20.08	180	8917	1.0635 ug/L		88

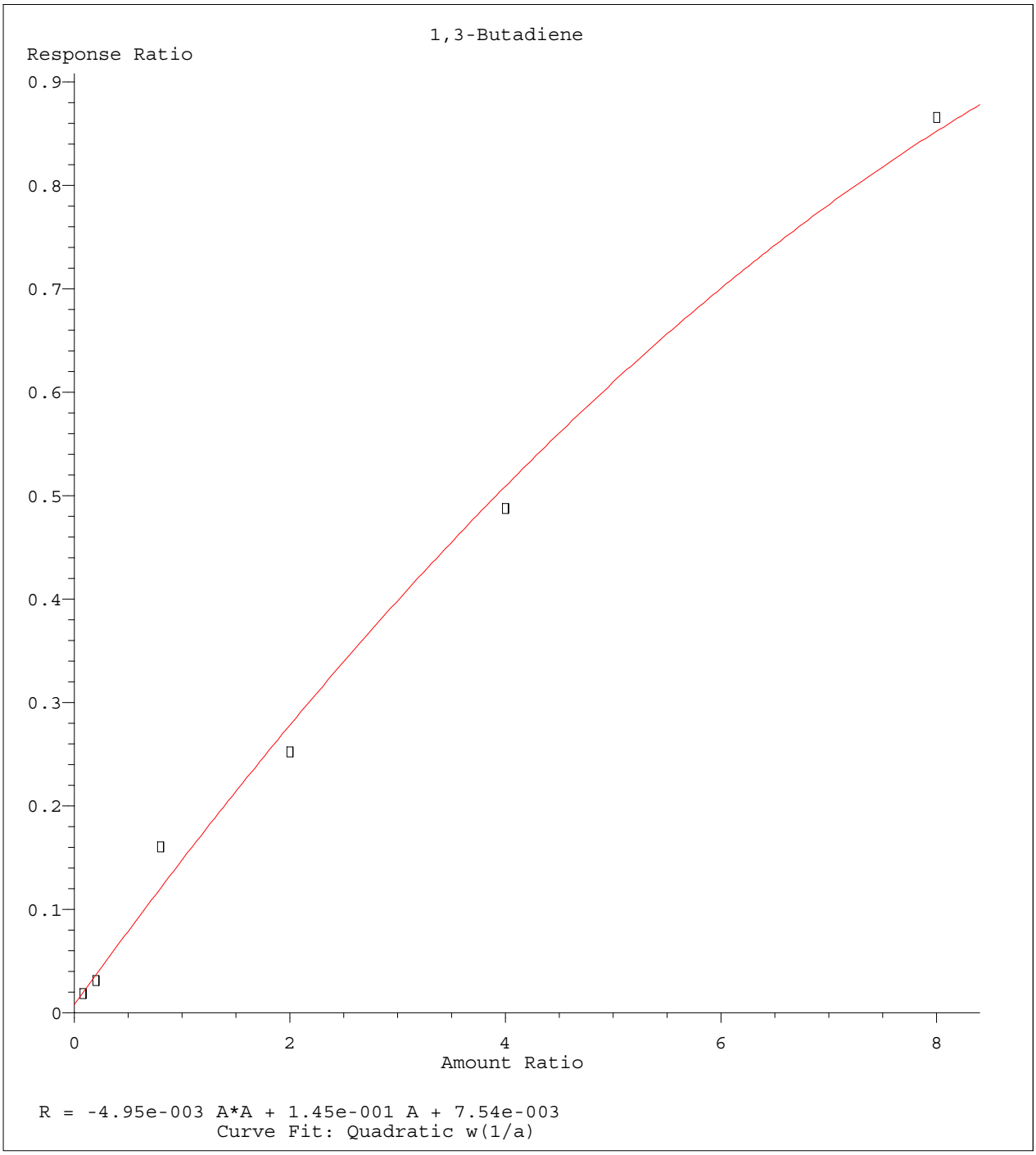
(#) = qualifier out of range (m) = manual integration
11M17518.D 8260WTR.M Thu Apr 20 14:51:21 2017 Page 2

Quantitation Report (Not Reviewed)

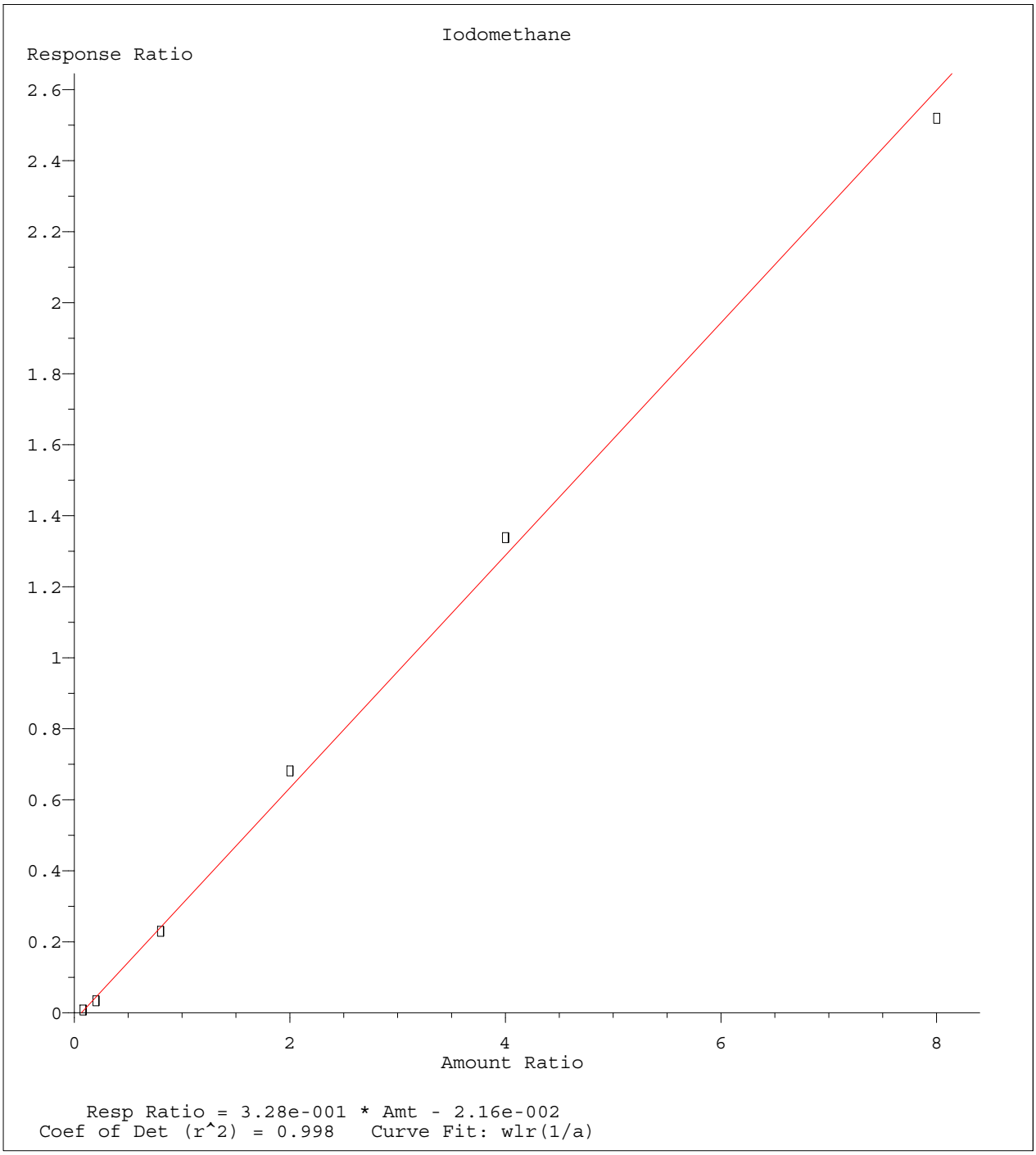
Data File : C:\MSDCHEM\1\DATA\041417\11M17518.D Vial: 11
Acq On : 14 Apr 2017 18:09 Operator: FJB
Sample : WG610045-11 300ug/L STD 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 18:31 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

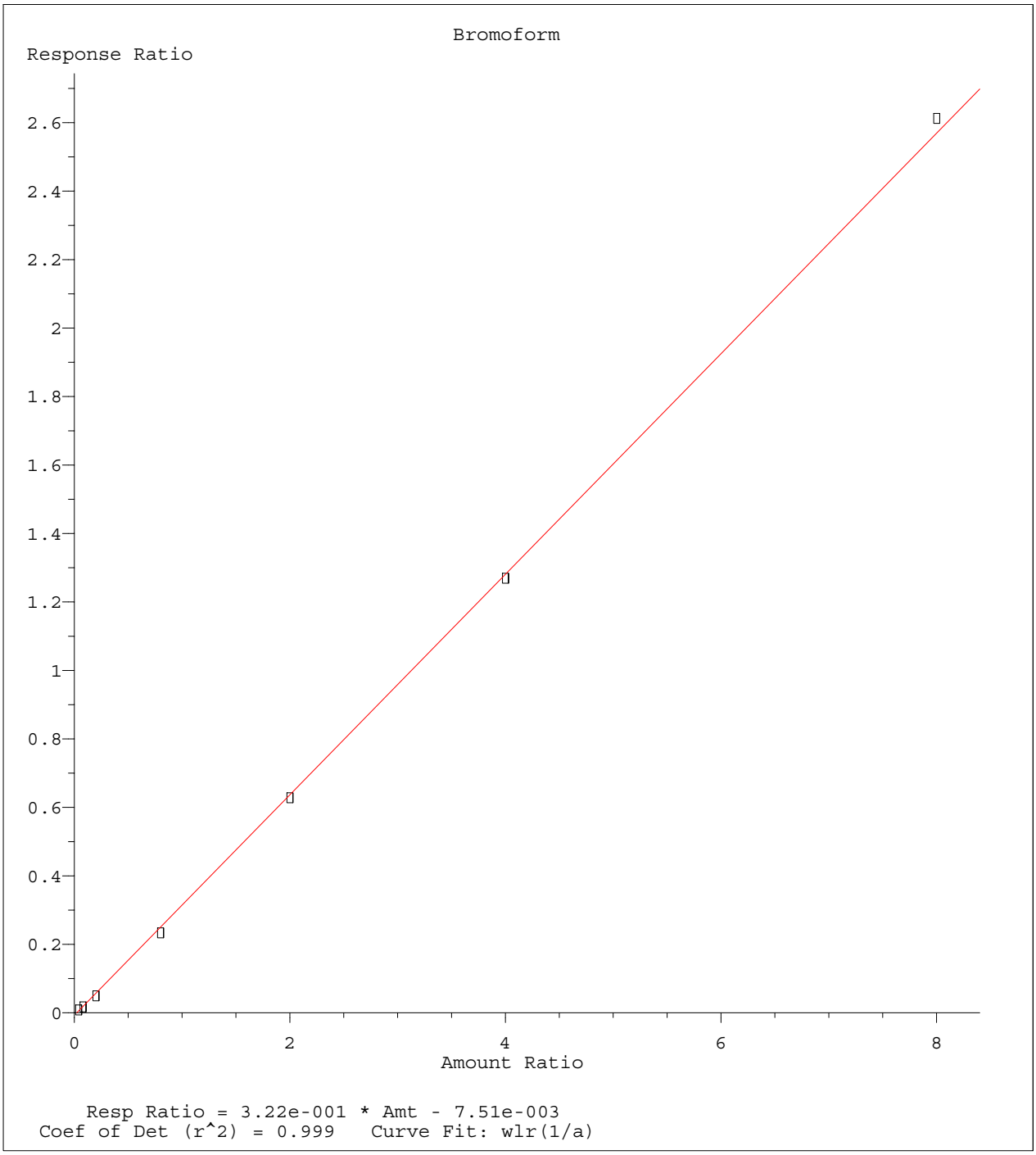




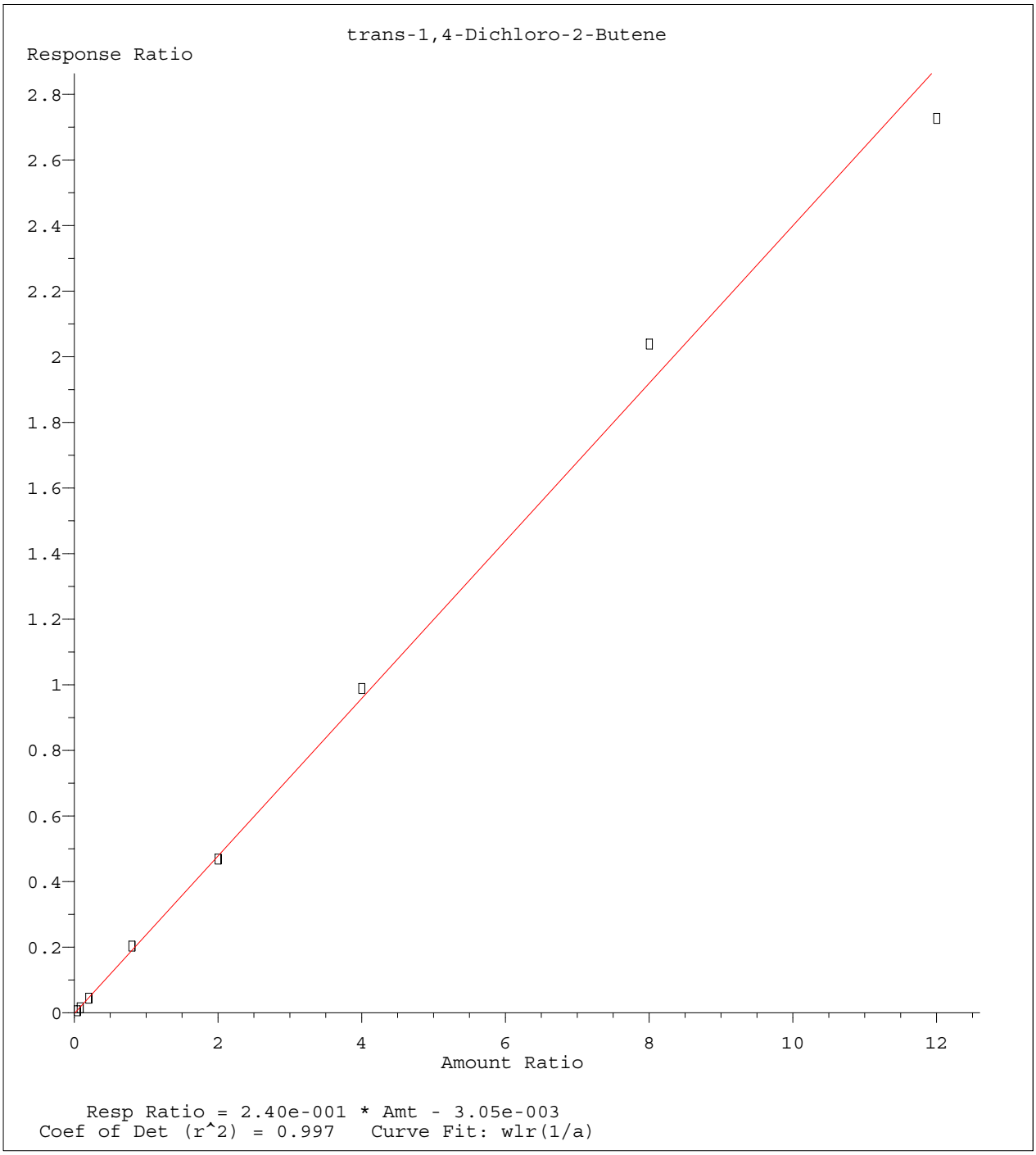
Method Name: C:\MSDCHEM\1\METHODS\8260WTR.M
Calibration Table Last Updated: Wed Apr 19 15:51:22 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WTR.M
Calibration Table Last Updated: Wed Apr 19 15:51:22 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WTR.M
Calibration Table Last Updated: Wed Apr 19 15:51:22 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WTR.M
Calibration Table Last Updated: Wed Apr 19 15:51:22 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 20 13:46:45 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	421850	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	301759	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	170569	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	108187	24.7164	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.88%			
43) 1,2-Dichloroethane-d4	10.14	65	122943	24.7965	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.20%			
57) Toluene-d8	12.38	98	419307	25.5248	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.08%			
78) p-Bromofluorobenzene	15.54	95	151755	23.9385	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	135776	23.3698	ug/L	96
3) Chloromethane	3.66	50	126947	18.1665	ug/L	100
4) Vinyl Chloride	3.88	62	103350	19.4053	ug/L	99
5) 1,3-Butadiene	3.92	54	61989	24.8494	ug/L	99
6) Bromomethane	4.77	94	81297	20.4482	ug/L	100
7) Chloroethane	4.92	64	85087	20.3506	ug/L	99
8) Trichlorofluoromethane	5.40	101	139999	19.3154	ug/L	100
9) Diethyl ether	5.92	59	368645	72.5884	ug/L	99
10) Isoprene	5.96	67	147695	21.1571	ug/L	97
11) Acrolein	6.15	56	81798	84.3637	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	87219	20.1735	ug/L	91
13) Acetone	6.26	43	25725	17.8689	ug/L	93
14) 1,1-Dichloroethene	6.46	61	154130	18.6385	ug/L	96
15) Tert-Butyl Alcohol	6.58	59	81910	158.9885	ug/L	97
16) Dimethyl Sulfide	6.72	62	127602	21.7236	ug/L	96
17) Iodomethane	6.97	142	102665	20.2224	ug/L	94
18) Methyl acetate	6.98	43	77934	18.8827	ug/L	99
19) Methylene Chloride	7.23	84	99848	17.8778	ug/L	97
20) Carbon Disulfide	7.27	76	227815	17.3881	ug/L	99
21) Acrylonitrile	7.40	53	40299	18.8699	ug/L	99
22) Methyl Tert Butyl Ether	7.43	73	262404	19.1107	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	93133	19.0443	ug/L	95
24) n-Hexane	7.73	57	154132	20.0682	ug/L	99
25) Diisopropyl ether	8.06	45	1494584	78.8714	ug/L	97
26) Vinyl Acetate	8.23	43	215844	22.2705	ug/L	99
27) 1,1-Dichloroethane	8.26	63	195911	19.0338	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1293337	75.7093	ug/L	100
29) 2-Butanone	8.79	43	44102	18.8959	ug/L	100
30) Propionitrile	8.89	54	61854	78.2582	ug/L	97
31) 2,2-Dichloropropane	9.01	77	139233	19.6769	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	109113	19.3957	ug/L	94
33) Chloroform	9.26	83	167713	18.1333	ug/L	99
34) 1-Bromopropane	9.39	122	26162	25.0319	ug/L	100
35) Bromochloromethane	9.48	130	64974	19.0448	ug/L	92
36) Tetrahydrofuran	9.50	42	129701	74.9115	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	149321	20.0273	ug/L	97
39) Cyclohexane	9.79	56	183594	17.9854	ug/L	97
40) 1,1-Dichloropropene	9.95	75	128235	19.2590	ug/L	96
41) Carbon Tetrachloride	10.09	117	128538	19.6943	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1104540	79.0332	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17528.D 8260WTR.M Thu Apr 20 13:46:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 20 13:46:45 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

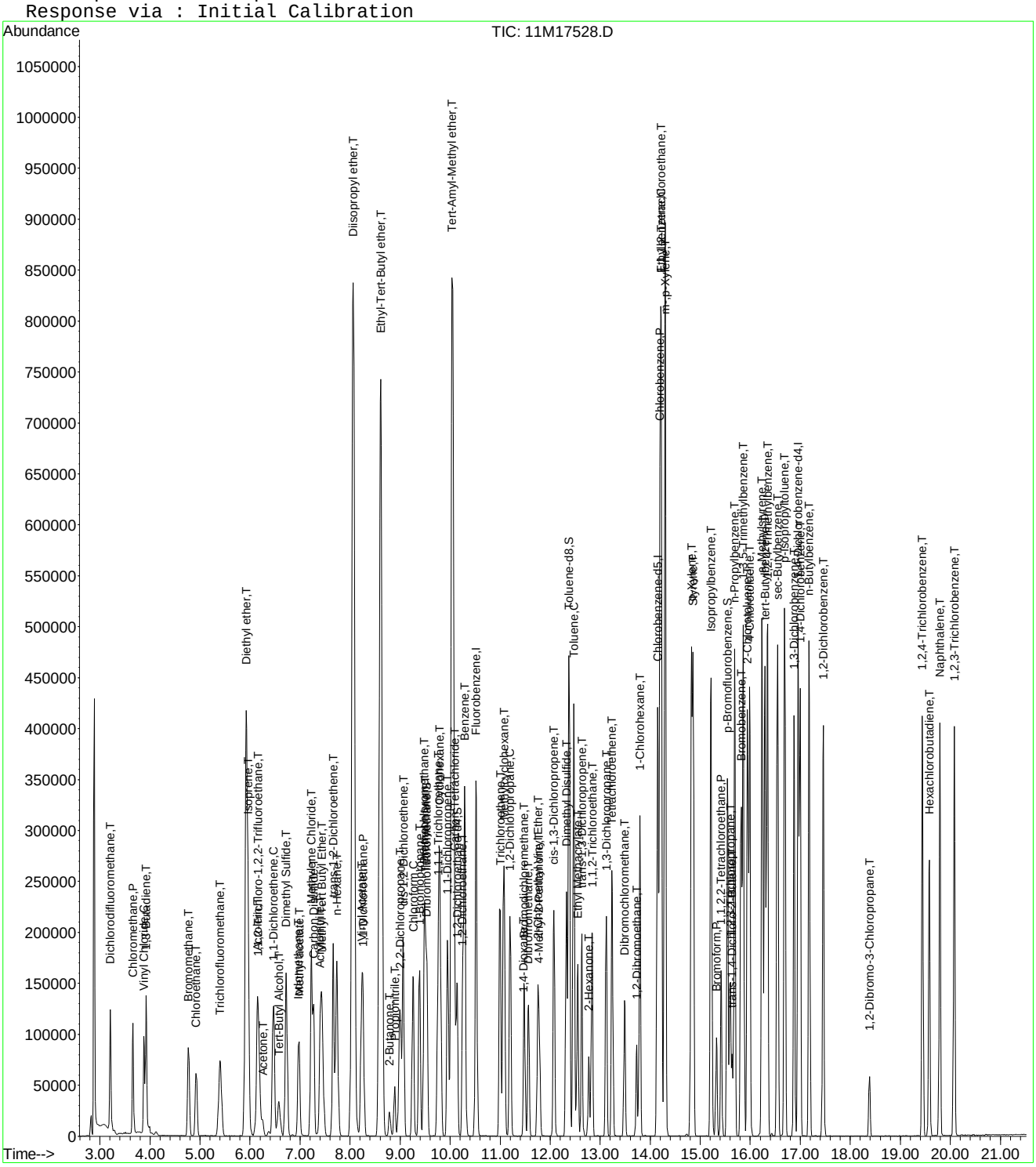
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	132819	18.4976	ug/L	99
45)	Benzene	10.29	78	388045	19.4539	ug/L	97
46)	Trichloroethene	11.00	130	101812	19.2779	ug/L	96
47)	Methylcyclohexane	11.07	83	160419	19.7104	ug/L	96
48)	1,2-Dichloropropane	11.20	63	116208	18.9248	ug/L	96
49)	1,4-Dioxane	11.47	88	7497	133.2986	ug/L	91
50)	Bromodichloromethane	11.48	83	119590	18.5772	ug/L	99
51)	Dibromomethane	11.56	93	56883	19.6448	ug/L	91
52)	2-Chloroethyl Vinyl Ether	11.76	63	68889	20.9872	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	39666	18.4011	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	156386	20.8816	ug/L	99
55)	Dimethyl Disulfide	12.32	79	84995	19.3275	ug/L	88
58)	Toluene	12.47	91	404500	18.8144	ug/L	95
59)	Ethyl Methacrylate	12.55	69	117964	21.3198	ug/L	92
60)	trans-1,3-Dichloropropene	12.64	75	127495	19.1994	ug/L	98
61)	1,1,2-Trichloroethane	12.84	97	86073	19.0302	ug/L	95
62)	2-Hexanone	12.77	43	67064	19.5134	ug/L	98
63)	1,3-Dichloropropane	13.12	76	146573	19.5846	ug/L	90
64)	Tetrachloroethene	13.23	164	86386	18.8609	ug/L	93
65)	Dibromochloromethane	13.48	129	91914	18.7479	ug/L	99
66)	1,2-Dibromoethane	13.73	107	73929	18.5674	ug/L	99
67)	1-Chlorohexane	13.79	91	127206	21.6101	ug/L	95
68)	Chlorobenzene	14.20	112	259085	19.3267	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	94552	19.3967	ug/L	100
70)	Ethylbenzene	14.22	106	145684	19.5600	ug/L	92
71)	m-,p-Xylene	14.30	106	346813	41.1652	ug/L	91
72)	o-Xylene	14.83	106	174964	19.8817	ug/L	99
73)	Styrene	14.86	104	280035	21.5494	ug/L	91
74)	Bromoform	15.32	173	60893	16.2450	ug/L	98
75)	Isopropylbenzene	15.22	105	423208	19.4612	ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	109249	18.5256	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	30320	17.6721	ug/L	85
80)	trans-1,4-Dichloro-2-Buten	15.63	53	23956	14.9316	ug/L	58
81)	n-Propylbenzene	15.69	91	499107	18.5111	ug/L	97
82)	Bromobenzene	15.82	156	120664	18.1287	ug/L	84
83)	1,3,5-Trimethylbenzene	15.86	105	365915	18.3510	ug/L	99
84)	2-Chlorotoluene	15.94	91	313144	16.6500	ug/L	100
85)	4-Chlorotoluene	15.99	91	311458	18.9295	ug/L	99
86)	a-Methylstyrene	16.23	118	208595	20.3157	ug/L	93
87)	tert-Butylbenzene	16.30	134	84970	18.8381	ug/L	93
88)	1,2,4-Trimethylbenzene	16.35	105	377727	18.4557	ug/L	98
89)	sec-Butylbenzene	16.54	105	461629	18.2540	ug/L	98
90)	p-Isopropyltoluene	16.69	119	404240	19.1039	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	223729	18.5616	ug/L	94
92)	1,4-Dichlorobenzene	17.00	146	227915	18.6080	ug/L	94
93)	n-Butylbenzene	17.17	91	360626	19.7588	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	226290	18.5662	ug/L	93
95)	1,2-Dibromo-3-Chloropropan	18.38	75	17906	17.5858	ug/L	82
96)	1,2,4-Trichlorobenzene	19.44	180	172148	19.3923	ug/L	95
97)	Hexachlorobutadiene	19.58	225	84134	18.6743	ug/L	95
98)	Naphthalene	19.79	128	387685	20.1093	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	169421	18.9956	ug/L	95

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 20 13:46 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Mon Apr 17 09:39:41 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	92	0.00
2	T	Dichlorodifluoromethane	0.3443	0.4023	-16.8	95	0.00
3	P	Chloromethane	0.4141	0.3762	9.2	85	0.00
4	C	Vinyl Chloride	0.3156	0.3062	3.0	81	0.00
5	T	1,3-Butadiene	0.1574	0.1837	-16.7	84	-0.01
6	T	Bromomethane	0.2356	0.2409	-2.2	98	0.00
7	T	Chloroethane	0.2478	0.2521	-1.8	90	0.00
8	T	Trichlorofluoromethane	0.4295	0.4148	3.4	82	-0.01
9	T	Diethyl ether	0.3010	0.2731	9.3	82	0.01
10	T	Isoprene	0.4137	0.4376	-5.8	89	0.00
11	T	Acrolein	0.0575	0.1212	-110.9#	189#	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2562	0.2584	-0.9	88	-0.01
13	T	Acetone	0.0853	0.0762	10.7	85	0.01
14	C	1,1-Dichloroethene	0.4901	0.4567	6.8	80	-0.01
15	T	Tert-Butyl Alcohol	0.0305	0.0303	0.6	96	0.00
16	T	Dimethyl Sulfide	0.3481	0.3781	-8.6	91	0.00
17	T	Iodomethane	0.2570	0.3042	-18.4	98	0.00
18	T	Methyl acetate	0.2446	0.2309	5.6	87	0.00
19	T	Methylene Chloride	0.3310	0.2959	10.6	82	0.00
20	T	Carbon Disulfide	0.7764	0.6751	13.1	75	0.00
21	T	Acrylonitrile	0.1266	0.0597	52.8#	43#	0.00
22	T	Methyl Tert Butyl Ether	0.8137	0.7775	4.4	84	0.00
23	T	trans-1,2-Dichloroethene	0.2898	0.2760	4.8	82	0.00
24	T	n-Hexane	0.4552	0.4567	-0.3	86	0.00
25	T	Diisopropyl ether	1.1230	1.1072	1.4	86	0.00
26	T	Vinyl Acetate	0.5744	0.6396	-11.4	94	0.00
27	P	1,1-Dichloroethane	0.6100	0.5805	4.8	82	0.00
28	T	Ethyl-Tert-Butyl ether	1.0124	0.9581	5.4	82	0.00
29	T	2-Butanone	0.1383	0.1307	5.5	85	0.00
30	T	Propionitrile	0.0468	0.0458	2.2	88	0.00
31	T	2,2-Dichloropropane	0.4152	0.4126	0.6	84	0.01
32	T	cis-1,2-Dichloroethene	0.3334	0.3233	3.0	84	0.01
33	C	Chloroform	0.5481	0.4970	9.3	84	0.01
34	T	1-Bromopropane	0.0595	0.0775	-30.4#	114	0.00
35	T	Bromochloromethane	0.2022	0.1925	4.8	83	0.00
36	T	Tetrahydrofuran	0.1026	0.0961	6.4	85	0.00
37	S	Dibromofluoromethane	0.2594	0.6412	-147.2#	238#	0.00
38	T	1,1,1-Trichloroethane	0.4419	0.4425	-0.1	86	0.00
39	T	Cyclohexane	0.6049	0.5440	10.1	78	0.00
40	T	1,1-Dichloropropene	0.3946	0.3800	3.7	82	0.00
41	T	Carbon Tetrachloride	0.3868	0.3809	1.5	83	0.00
42	T	Tert-Amyl-Methyl ether	0.8282	0.8182	1.2	86	0.00
43	S	1,2-Dichloroethane-d4	0.2938	0.7286	-148.0#	237#	0.00
44	T	1,2-Dichloroethane	0.4255	0.3936	7.5	81	0.00
45	T	Benzene	1.1821	1.1498	2.7	83	0.00
46	T	Trichloroethene	0.3130	0.3017	3.6	81	0.00
47	T	Methylcyclohexane	0.4823	0.4753	1.4	85	0.00
48	C	1,2-Dichloropropane	0.3639	0.3443	5.4	82	0.00
49	T	1,4-Dioxane	0.0033	0.0028	16.5	83	0.00
50	T	Bromodichloromethane	0.3815	0.3544	7.1	81	0.00
51	T	Dibromomethane	0.1716	0.1686	1.8	84	0.00
52	T	2-Chloroethyl Vinyl Ether	0.1945	0.2041	-4.9	93	0.00
53	T	4-Methyl-2-Pentanone	0.1278	0.1175	8.0	87	0.00
54	T	cis-1,3-Dichloropropene	0.4438	0.4634	-4.4	87	0.00

(#) = Out of Range
11M17528.D 8260WTR.M Mon Apr 17 15:42:10 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Mon Apr 17 09:39:41 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2606	0.2519	3.4	90	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	95	0.00
57	S	Toluene-d8	1.3610	3.4739	-155.2#	230#	0.00
58	C	Toluene	1.7812	1.6756	5.9	84	0.00
59	T	Ethyl Methacrylate	0.4584	0.4886	-6.6	88	0.00
60	T	trans-1,3-Dichloropropene	0.5502	0.5281	4.0	82	0.00
61	T	1,1,2-Trichloroethane	0.3747	0.3565	4.8	83	0.01
62	T	2-Hexanone	0.2847	0.2778	2.4	90	0.00
63	T	1,3-Dichloropropane	0.6200	0.6072	2.1	86	0.00
64	T	Tetrachloroethene	0.3795	0.3578	5.7	86	0.00
65	T	Dibromochloromethane	0.4062	0.3807	6.3	80	0.00
66	T	1,2-Dibromoethane	0.3299	0.3062	7.2	86	0.00
67	T	1-Chlorohexane	0.4877	0.5269	-8.1	92	0.00
68	P	Chlorobenzene	1.1106	1.0732	3.4	85	0.00
69	T	1,1,1,2-Tetrachloroethane	0.4038	0.3917	3.0	82	0.00
70	C	Ethylbenzene	0.6170	0.6035	2.2	88	0.00
71	T	m-,p-Xylene	0.6980	0.7183	-2.9	86	0.00
72	T	o-Xylene	0.7291	0.7248	0.6	85	0.00
73	T	Styrene	1.0766	1.1600	-7.7	86	0.00
74	P	Bromoform	0.2742	0.2522	8.0	82	0.00
75	T	Isopropylbenzene	1.7248	1.7531	-1.6	84	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	102	0.00
77	P	1,1,2,2-Tetrachloroethane	0.8643	0.8006	7.4	90	0.00
78	S	p-Bromofluorobenzene	0.9292	2.2243	-139.4#	240#	0.00
79	T	1,2,3-Trichloropropane	0.2515	0.2222	11.6	85	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2226	0.1756	21.1	70	0.00
81	T	n-Propylbenzene	3.9518	3.6577	7.4	84	0.00
82	T	Bromobenzene	0.9756	0.8843	9.4	86	0.00
83	T	1,3,5-Trimethylbenzene	2.7900	2.6816	3.9	83	0.00
84	T	2-Chlorotoluene	2.7566	2.2948	16.8	81	0.00
85	T	4-Chlorotoluene	2.2164	2.2825	-3.0	89	0.00
86	T	a-Methylstyrene	1.5049	1.5287	-1.6	89	0.00
87	T	tert-Butylbenzene	0.6611	0.6227	5.8	86	0.00
88	T	1,2,4-Trimethylbenzene	2.9998	2.7681	7.7	85	0.01
89	T	sec-Butylbenzene	3.7066	3.3830	8.7	84	0.00
90	T	p-Isopropyltoluene	3.1014	2.9624	4.5	86	0.00
91	T	1,3-Dichlorobenzene	1.7666	1.6396	7.2	87	0.00
92	T	1,4-Dichlorobenzene	1.7952	1.6703	7.0	89	0.00
93	T	n-Butylbenzene	2.6751	2.6428	1.2	87	0.00
94	T	1,2-Dichlorobenzene	1.7864	1.6584	7.2	88	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1492	0.1312	12.1	90	0.00
96	T	1,2,4-Trichlorobenzene	1.3011	1.2616	3.0	90	0.00
97	T	Hexachlorobutadiene	0.6603	0.6166	6.6	85	0.00
98	T	Naphthalene	2.7036	2.8411	-5.1	91	0.00
99	T	1,2,3-Trichlorobenzene	1.3072	1.2416	5.0	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17528.D 8260WTR.M Mon Apr 17 15:42:11 2017 Page 2

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	92	0.00
2	T	Dichlorodifluoromethane	20.0000	23.3698	-16.8	95	0.00
3	P	Chloromethane	20.0000	18.1665	9.2	85	0.00
4	C	Vinyl Chloride	20.0000	19.4053	3.0	81	0.00
5	T	1,3-Butadiene	20.0000	24.8494	-24.2	84	0.00
6	T	Bromomethane	20.0000	20.4482	-2.2	98	0.00
7	T	Chloroethane	20.0000	20.3506	-1.8	90	0.00
8	T	Trichlorofluoromethane	20.0000	19.3153	3.4	82	-0.01
9	T	Diethyl ether	80.0000	72.5884	9.3	82	0.01
10	T	Isoprene	20.0000	21.1571	-5.8	89	0.00
11	T	Acrolein	40.0000	84.3637	-110.9#	189	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	20.0000	20.1735	-0.9	88	-0.01
13	T	Acetone	20.0000	17.8689	10.7	85	0.01
14	C	1,1-Dichloroethene	20.0000	18.6385	6.8	80	-0.01
15	T	Tert-Butyl Alcohol	160.0000	158.9885	0.6	96	0.00
16	T	Dimethyl Sulfide	20.0000	21.7236	-8.6	91	0.00
17	T	Iodomethane	20.0000	20.2224	-1.1	98	0.00
18	T	Methyl acetate	20.0000	18.8827	5.6	87	0.00
19	T	Methylene Chloride	20.0000	17.8778	10.6	82	0.00
20	T	Carbon Disulfide	20.0000	17.3881	13.1	75	0.00
21	T	Acrylonitrile	40.0000	18.8699	52.8#	43	0.00
22	T	Methyl Tert Butyl Ether	20.0000	19.1107	4.4	84	0.00
23	T	trans-1,2-Dichloroethene	20.0000	19.0444	4.8	82	0.00
24	T	n-Hexane	20.0000	20.0682	-0.3	86	0.00
25	T	Diisopropyl ether	80.0000	78.8714	1.4	86	0.00
26	T	Vinyl Acetate	20.0000	22.2706	-11.4	94	0.00
27	P	1,1-Dichloroethane	20.0000	19.0338	4.8	82	0.00
28	T	Ethyl-Tert-Butyl ether	80.0000	75.7093	5.4	82	0.00
29	T	2-Butanone	20.0000	18.8959	5.5	85	0.00
30	T	Propionitrile	80.0000	78.2582	2.2	88	0.00
31	T	2,2-Dichloropropane	20.0000	19.6769	1.6	84	0.01
32	T	cis-1,2-Dichloroethene	20.0000	19.3957	3.0	84	0.01
33	C	Chloroform	20.0000	18.1333	9.3	84	0.01
34	T	1-Bromopropane	20.0000	25.0319	-25.2#	114	0.00
35	T	Bromochloromethane	20.0000	19.0448	4.8	83	0.00
36	T	Tetrahydrofuran	80.0000	74.9115	6.4	85	0.00
37	S	Dibromofluoromethane	10.0000	24.7164	-147.2#	238	0.00
38	T	1,1,1-Trichloroethane	20.0000	20.0273	-0.1	86	0.00
39	T	Cyclohexane	20.0000	17.9854	10.1	78	0.00
40	T	1,1-Dichloropropene	20.0000	19.2590	3.7	82	0.00
41	T	Carbon Tetrachloride	20.0000	19.6943	1.5	83	0.00
42	T	Tert-Amyl-Methyl ether	80.0000	79.0332	1.2	86	0.00
43	S	1,2-Dichloroethane-d4	10.0000	24.7965	-148.0#	237	0.00
44	T	1,2-Dichloroethane	20.0000	18.4976	7.5	81	0.00
45	T	Benzene	20.0000	19.4539	2.7	83	0.00
46	T	Trichloroethene	20.0000	19.2779	3.6	81	0.00
47	T	Methylcyclohexane	20.0000	19.7104	1.4	85	0.00
48	C	1,2-Dichloropropane	20.0000	18.9248	5.4	82	0.00
49	T	1,4-Dioxane	160.0000	133.2986	16.7	83	0.00
50	T	Bromodichloromethane	20.0000	18.5772	7.1	81	0.00
51	T	Dibromomethane	20.0000	19.6448	1.8	84	0.00
52	T	2-Chloroethyl Vinyl Ether	20.0000	20.9872	-4.9	93	0.00
53	T	4-Methyl-2-Pentanone	20.0000	18.4011	8.0	87	0.00
54	T	cis-1,3-Dichloropropene	20.0000	20.8816	-4.4	87	0.00

(#) = Out of Range

Data File : C:\MSDCHEM\1\DATA\041717\11M17528.D Vial: 5
Acq On : 17 Apr 2017 15:19 Operator: JDS /FJB
Sample : WG610045-12 20ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	20.0000	19.3275	3.4	90	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	95	0.00
57	S	Toluene-d8	10.0000	25.5248	-155.2#	230	0.00
58	C	Toluene	20.0000	18.8144	5.9	84	0.00
59	T	Ethyl Methacrylate	20.0000	21.3198	-6.6	88	0.00
60	T	trans-1,3-Dichloropropene	20.0000	19.1994	4.0	82	0.00
61	T	1,1,2-Trichloroethane	20.0000	19.0302	4.8	83	0.01
62	T	2-Hexanone	20.0000	19.5134	2.4	90	0.00
63	T	1,3-Dichloropropane	20.0000	19.5847	2.1	86	0.00
64	T	Tetrachloroethene	20.0000	18.8609	5.7	86	0.00
65	T	Dibromochloromethane	20.0000	18.7479	6.3	80	0.00
66	T	1,2-Dibromoethane	20.0000	18.5674	7.2	86	0.00
67	T	1-Chlorohexane	20.0000	21.6101	-8.1	92	0.00
68	P	Chlorobenzene	20.0000	19.3267	3.4	85	0.00
69	T	1,1,1,2-Tetrachloroethane	20.0000	19.3967	3.0	82	0.00
70	C	Ethylbenzene	20.0000	19.5600	2.2	88	0.00
71	T	m-,p-Xylene	40.0000	41.1652	-2.9	86	0.00
72	T	o-Xylene	20.0000	19.8817	0.6	85	0.00
73	T	Styrene	20.0000	21.5494	-7.7	86	0.00
74	P	Bromoform	20.0000	16.2450	18.8	82	0.00
75	T	Isopropylbenzene	20.0000	19.4612	2.7	84	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	102	0.00
77	P	1,1,2,2-Tetrachloroethane	20.0000	18.5256	7.4	90	0.00
78	S	p-Bromofluorobenzene	10.0000	23.9385	-139.4#	240	0.00
79	T	1,2,3-Trichloropropane	20.0000	17.6721	11.6	85	0.00
80	T	trans-1,4-Dichloro-2-Butene	20.0000	14.9316	25.3#	70	0.00
81	T	n-Propylbenzene	20.0000	18.5111	7.4	84	0.00
82	T	Bromobenzene	20.0000	18.1287	9.4	86	0.00
83	T	1,3,5-Trimethylbenzene	20.0000	18.3510	8.2	83	0.00
84	T	2-Chlorotoluene	20.0000	16.6500	16.8	81	0.00
85	T	4-Chlorotoluene	20.0000	18.9295	5.4	89	0.00
86	T	a-Methylstyrene	20.0000	20.3157	-1.6	89	0.00
87	T	tert-Butylbenzene	20.0000	18.8381	5.8	86	0.00
88	T	1,2,4-Trimethylbenzene	20.0000	18.4556	7.7	85	0.01
89	T	sec-Butylbenzene	20.0000	18.2540	8.7	84	0.00
90	T	p-Isopropyltoluene	20.0000	19.1039	4.5	86	0.00
91	T	1,3-Dichlorobenzene	20.0000	18.5616	7.2	87	0.00
92	T	1,4-Dichlorobenzene	20.0000	18.6080	7.0	89	0.00
93	T	n-Butylbenzene	20.0000	19.7588	1.2	87	0.00
94	T	1,2-Dichlorobenzene	20.0000	18.5662	7.2	88	0.00
95	T	1,2-Dibromo-3-Chloropropane	20.0000	17.5858	12.1	90	0.00
96	T	1,2,4-Trichlorobenzene	20.0000	19.3923	3.0	90	0.00
97	T	Hexachlorobutadiene	20.0000	18.6743	6.6	85	0.00
98	T	Naphthalene	20.0000	20.1093	-0.5	91	0.00
99	T	1,2,3-Trichlorobenzene	20.0000	18.9956	5.0	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17528.D 8260WTR.M Thu Apr 20 13:59:13 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:31:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

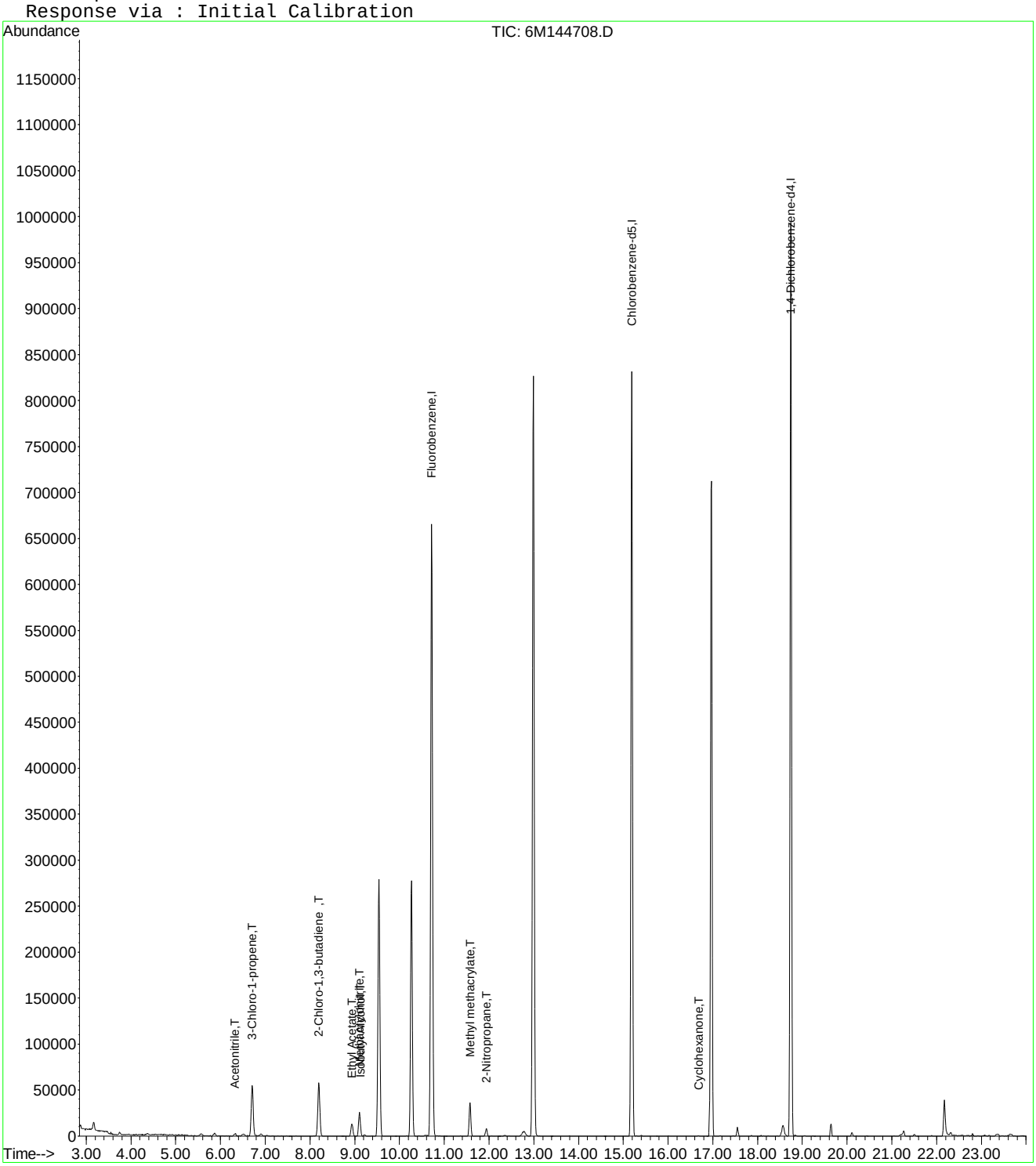
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	865370	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	638669	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	353919	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	3679	5.9467	ug/L		88
3) 3-Chloro-1-propene	6.70	41	52014	5.0135	ug/L		95
4) 2-Chloro-1,3-butadiene	8.19	53	60212	4.7023	ug/L		97
5) Ethyl Acetate	8.93	43	24851	4.4777	ug/L		98
6) Methacrylonitrile	9.10	67	13164	4.5054	ug/L		95
7) Isobutyl Alcohol	9.12	43	1340	7.4492	ug/L	#	85
9) Methyl methacrylate	11.57	41	25255	4.1589	ug/L		95
10) 2-Nitropropane	11.94	43	9310	3.7703	ug/L		96
13) Cyclohexanone	16.69	55	637	4.7569	ug/L	#	25

(#) = qualifier out of range (m) = manual integration
6M144708.D A9FOOWT.M Fri Jan 13 08:34:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:31 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	5.9467	-18.9	100	0.00
3	T	3-Chloro-1-propene	5.0000	5.0135	-0.3	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.7023	6.0	100	0.00
5	T	Ethyl Acetate	5.0000	4.4778	10.4	100	0.00
6	T	Methacrylonitrile	5.0000	4.5054	9.9	100	0.00
7	T	Isobutyl Alcohol	10.0000	7.4492	25.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	5.0000	4.1589	16.8	100	0.00
10	T	2-Nitropropane	-1.0000	3.7703	0.0	0	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	4.7569	0.0	0	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144708.D A9FOOWT.M Fri Jan 13 08:34:56 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

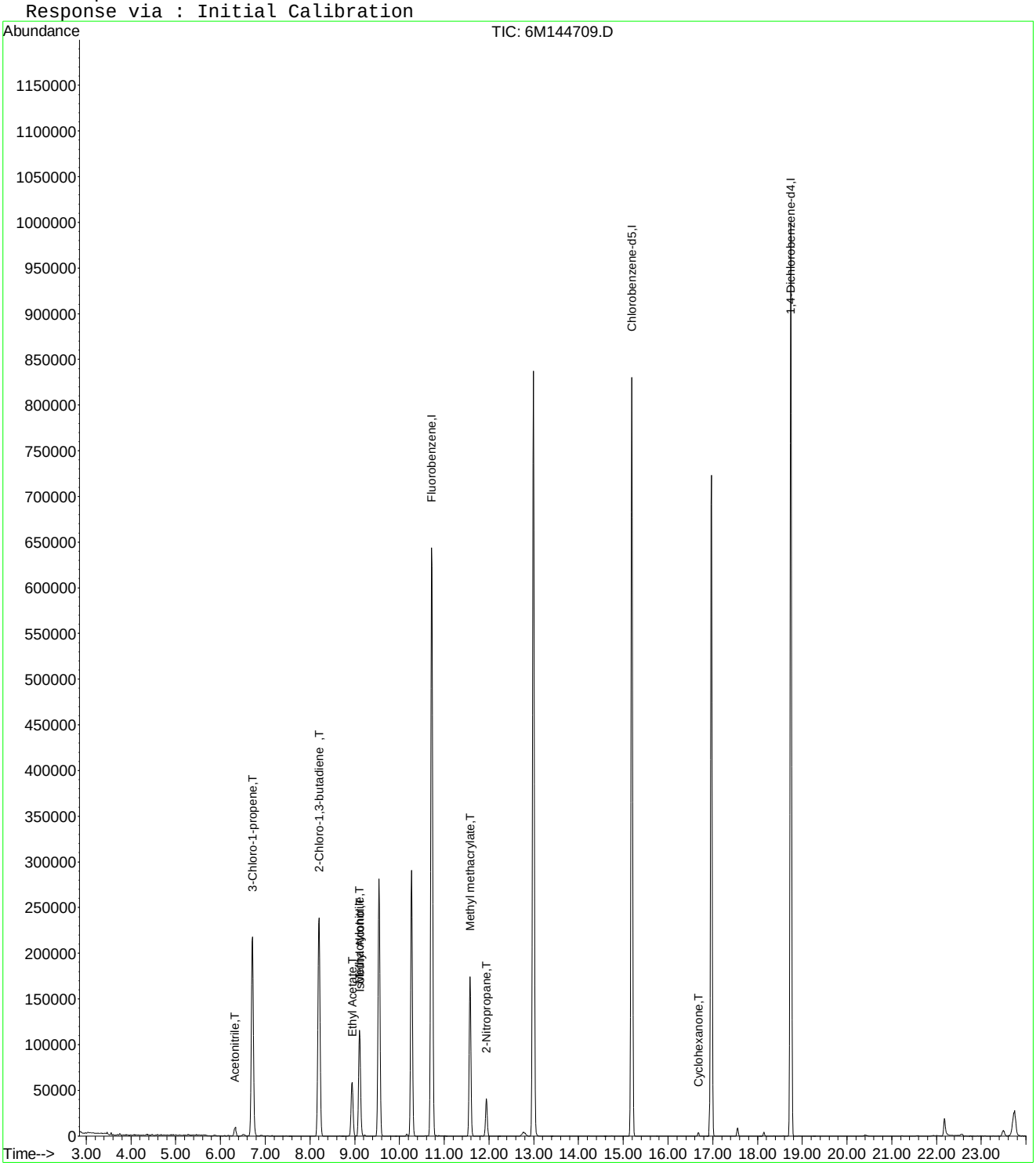
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	858255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	632728	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	350367	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	12918	21.0537	ug/L		97
3) 3-Chloro-1-propene	6.71	41	209633	20.3736	ug/L		94
4) 2-Chloro-1,3-butadiene	8.21	53	252913	19.9152	ug/L		96
5) Ethyl Acetate	8.94	43	112226	20.3889	ug/L		97
6) Methacrylonitrile	9.10	67	59955	20.6898	ug/L		93
7) Isobutyl Alcohol	9.11	43	8059	45.1723	ug/L	#	85
9) Methyl methacrylate	11.58	41	119041	19.7660	ug/L		97
10) 2-Nitropropane	11.94	43	43188	17.6351	ug/L		96
13) Cyclohexanone	16.68	55	2248	16.9576	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M144709.D A9FOOWT.M Fri Jan 13 08:34:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	21.0537	-5.3	100	0.00
3	T	3-Chloro-1-propene	20.0000	20.3736	-1.9	100	0.01
4	T	2-Chloro-1,3-butadiene	20.0000	19.9152	0.4	100	0.01
5	T	Ethyl Acetate	20.0000	20.3890	-1.9	100	0.01
6	T	Methacrylonitrile	20.0000	20.6898	-3.4	100	0.00
7	T	Isobutyl Alcohol	40.0000	45.1723	-12.9	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	20.0000	19.7660	1.2	100	0.00
10	T	2-Nitropropane	20.0000	17.6351	11.8	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	16.9576	15.2	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144709.D A9FOOWT.M Fri Jan 13 08:35:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:24 2017 Quant Results File: A9FOOWT.RES

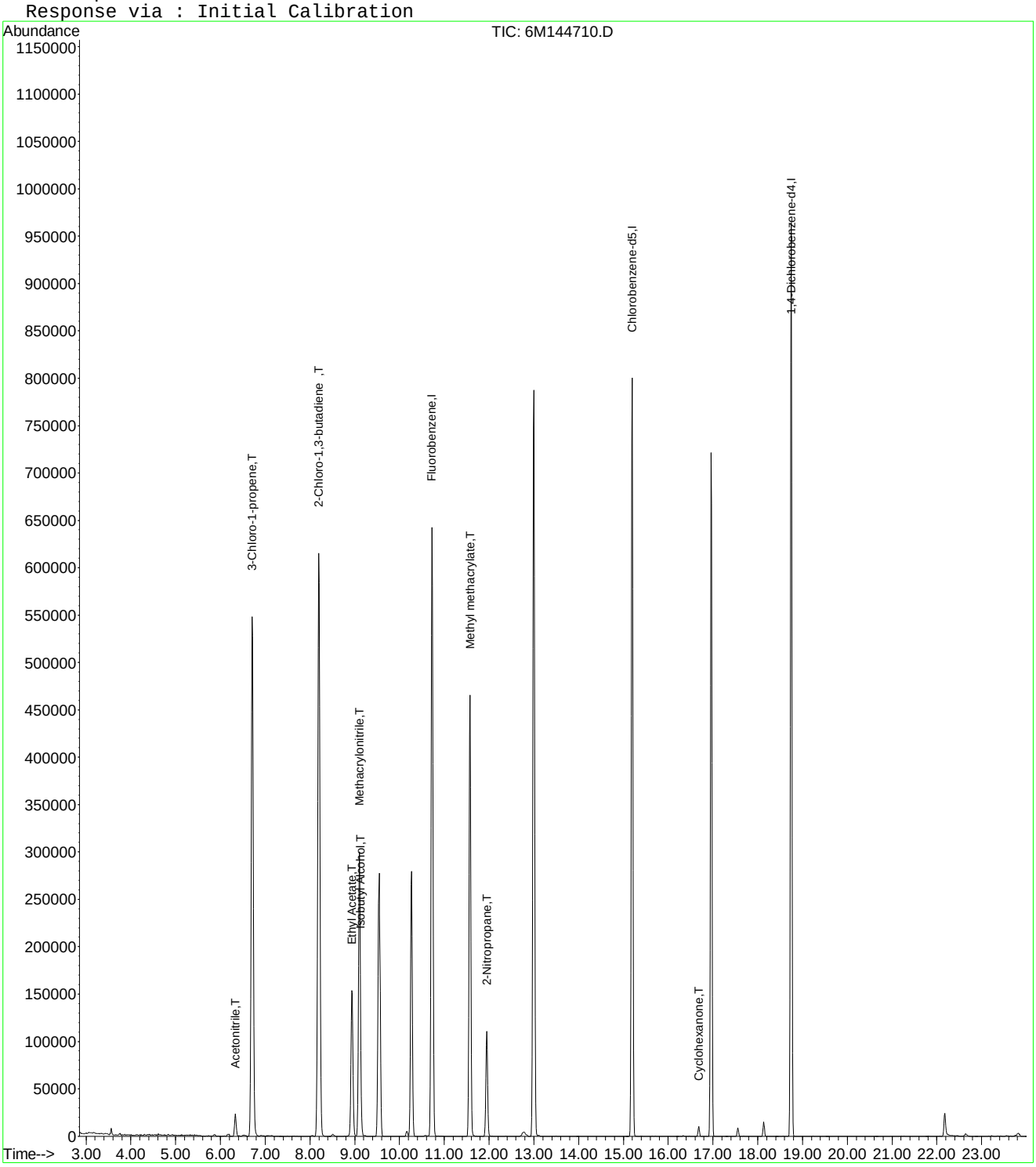
Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	838990	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	618534	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	341738	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	29692	49.5030	ug/L		97
3) 3-Chloro-1-propene	6.71	41	515211	51.2215	ug/L		94
4) 2-Chloro-1,3-butadiene	8.20	53	637594	51.3592	ug/L		97
5) Ethyl Acetate	8.93	43	283978	52.7771	ug/L		97
6) Methacrylonitrile	9.11	67	149634	52.8227	ug/L		95
7) Isobutyl Alcohol	9.13	43	18800	107.7975	ug/L	#	86
9) Methyl methacrylate	11.58	41	310762	52.7848	ug/L		96
10) 2-Nitropropane	11.94	43	119051	49.7288	ug/L		97
13) Cyclohexanone	16.68	55	5849	45.2354	ug/L		91

(#) = qualifier out of range (m) = manual integration
6M144710.D A9FOOWT.M Fri Jan 13 08:34:17 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	49.5030	1.0	100	0.00
3	T	3-Chloro-1-propene	50.0000	51.2215	-2.4	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	51.3592	-2.7	100	0.00
5	T	Ethyl Acetate	50.0000	52.7771	-5.6	100	0.00
6	T	Methacrylonitrile	50.0000	52.8227	-5.6	100	0.00
7	T	Isobutyl Alcohol	100.0000	107.7975	-7.8	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	50.0000	52.7848	-5.6	100	0.00
10	T	2-Nitropropane	50.0000	49.7289	0.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	45.2354	9.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144710.D A9FOOWT.M Fri Jan 13 08:35:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

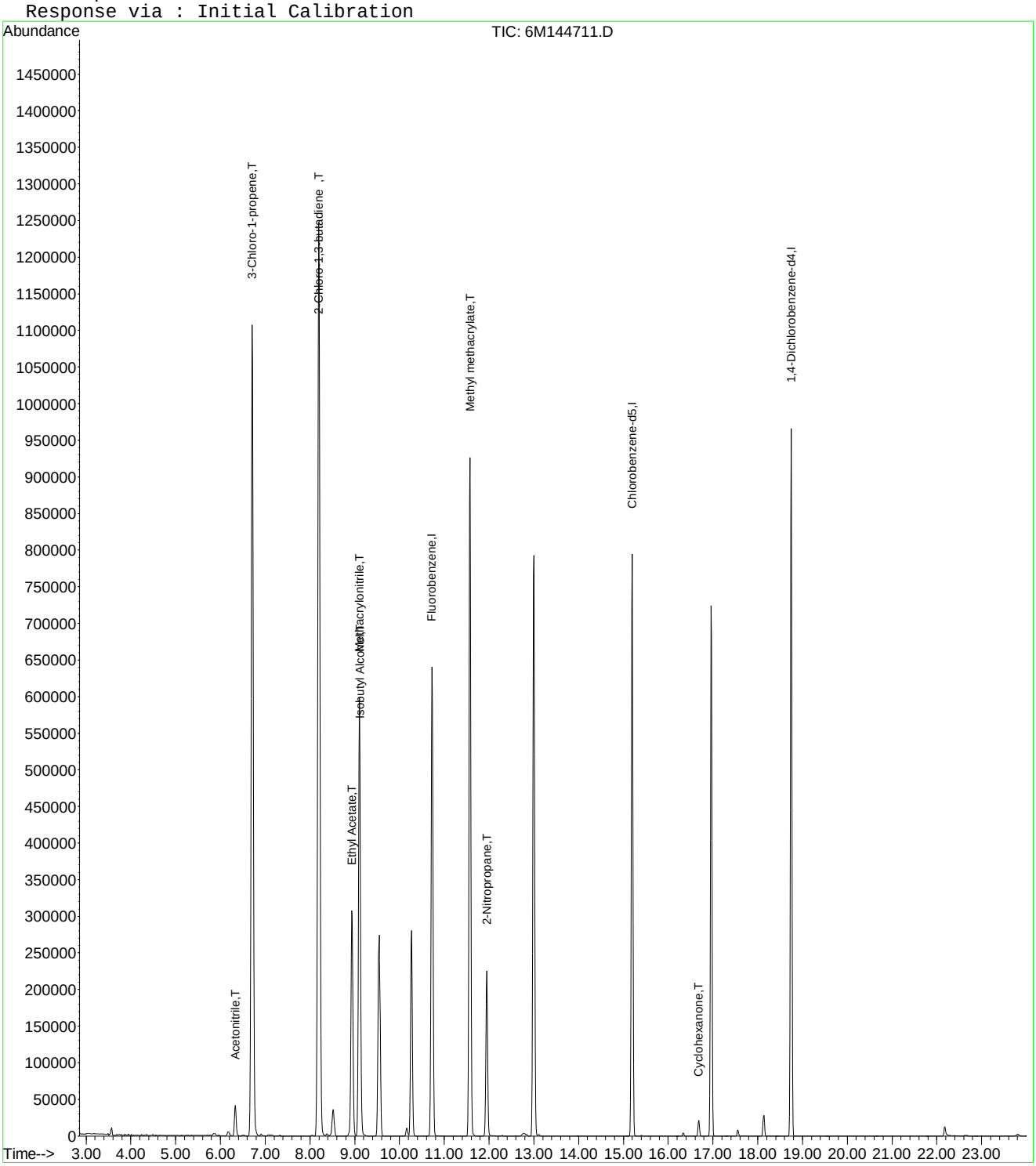
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 08:34:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 09:36:00 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

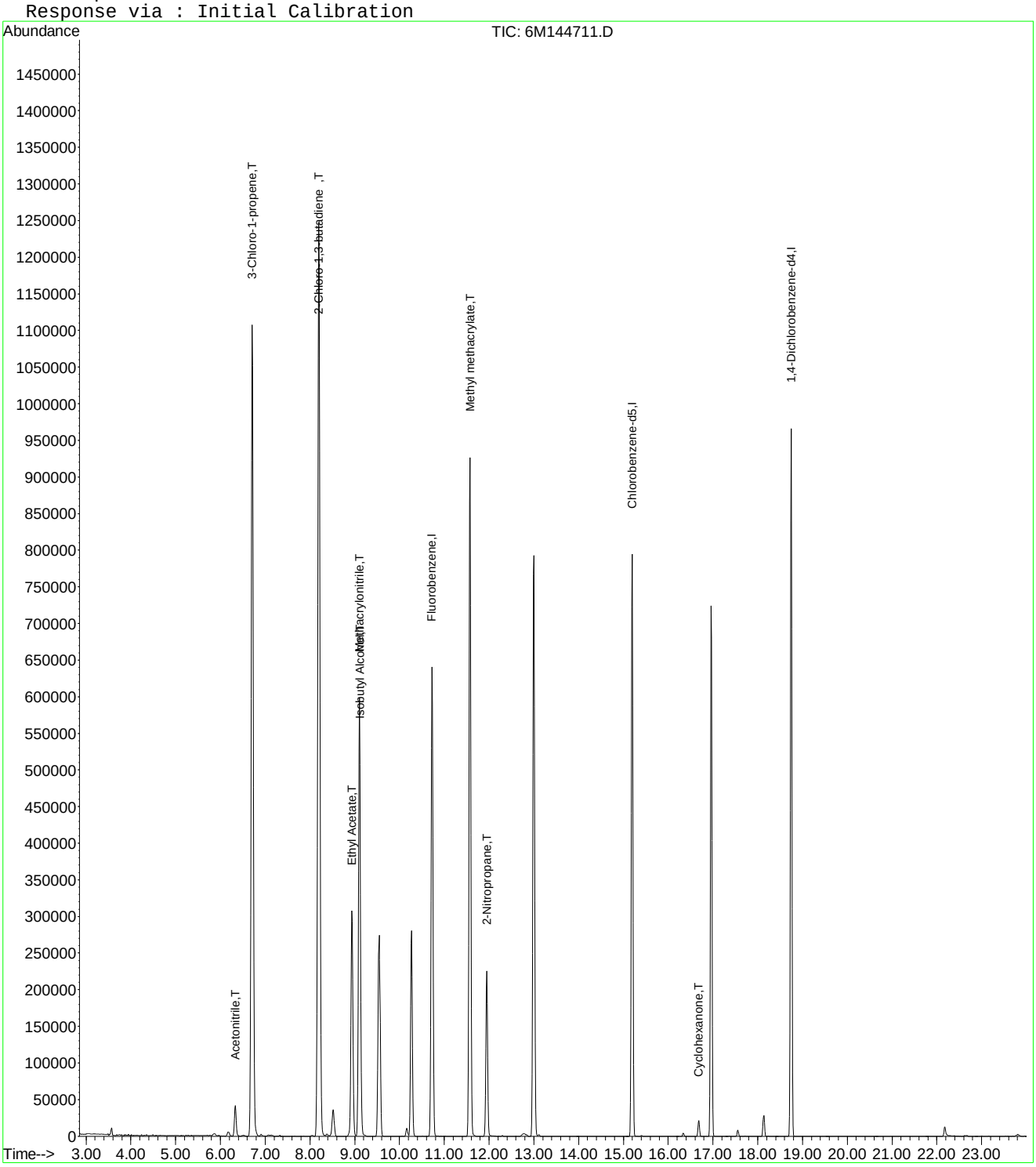
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 09:36:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 9:35 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	97.5407	2.5	100	0.00
3	T	3-Chloro-1-propene	100.0000	102.6783	-2.7	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	104.0084	-4.0	100	0.00
5	T	Ethyl Acetate	100.0000	103.6261	-3.6	100	0.00
6	T	Methacrylonitrile	100.0000	104.3479	-4.3	100	0.00
7	T	Isobutyl Alcohol	200.0000	210.2692	-5.1	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	100.0000	105.4552	-5.5	100	0.00
10	T	2-Nitropropane	100.0000	99.3433	0.7	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	86.0143	14.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144711.D A9FOOWT.M Fri Jan 13 09:36:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

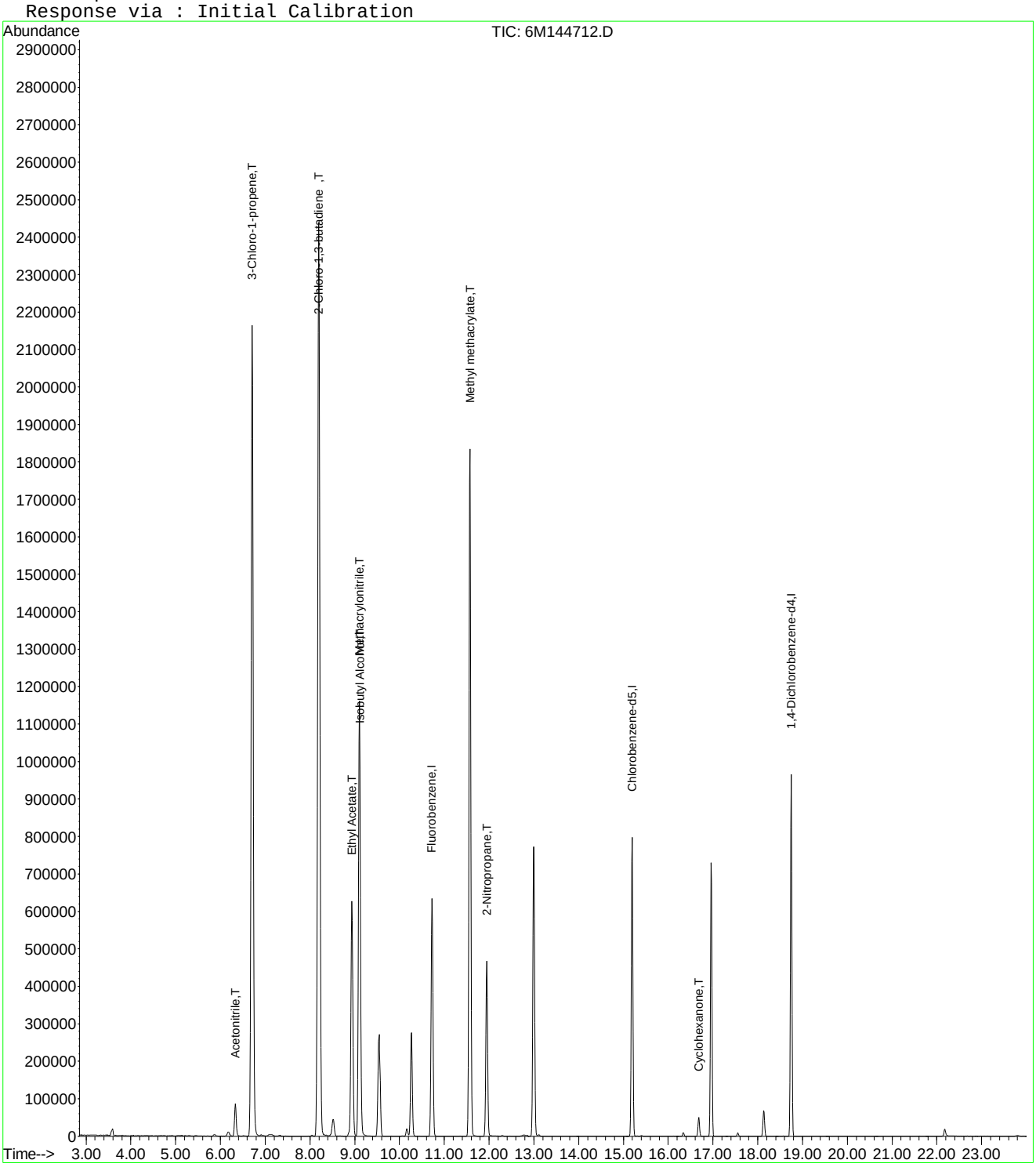
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	831063	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	617643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346241	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	117408	197.6116	ug/L		95
3) 3-Chloro-1-propene	6.71	41	2031969	203.9423	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	2539389	206.5027	ug/L		96
5) Ethyl Acetate	8.93	43	1134089	212.7800	ug/L		97
6) Methacrylonitrile	9.11	67	588766	209.8242	ug/L		92
7) Isobutyl Alcohol	9.12	43	69700	403.4656	ug/L	#	77
9) Methyl methacrylate	11.58	41	1251118	214.5369	ug/L		96
10) 2-Nitropropane	11.94	43	508471	214.4196	ug/L		98
13) Cyclohexanone	16.68	55	26625	203.2365	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144712.D A9FOOWT.M Fri Jan 13 08:34:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

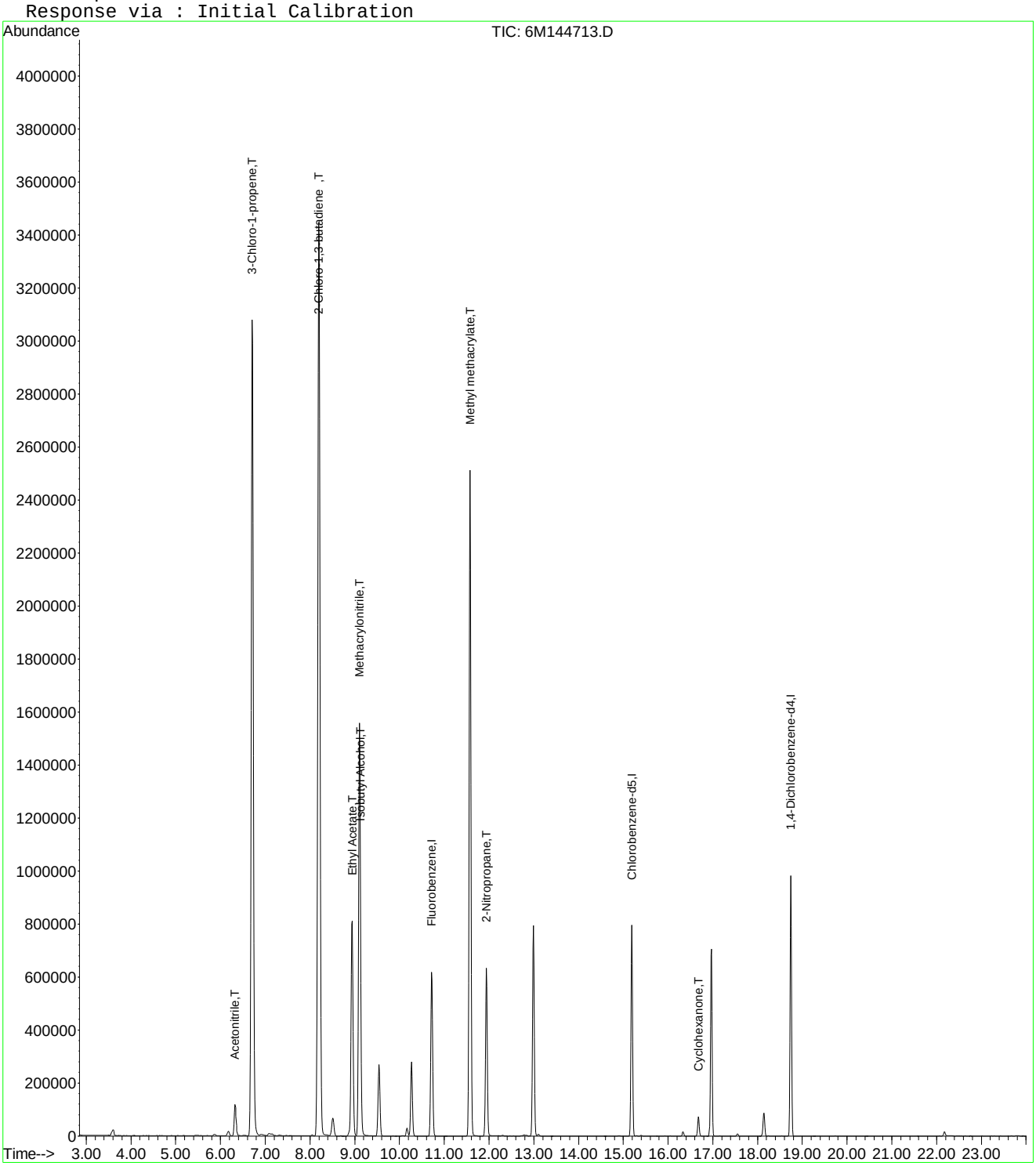
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	820441	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	609250	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	347545	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	159684	272.2468	ug/L		94
3) 3-Chloro-1-propene	6.70	41	2909215	295.7689	ug/L		93
4) 2-Chloro-1,3-butadiene	8.19	53	3653381	300.9387	ug/L		97
5) Ethyl Acetate	8.94	43	1494846	284.0971	ug/L		98
6) Methacrylonitrile	9.10	67	791160	285.6036	ug/L		92
7) Isobutyl Alcohol	9.12	43	88161	516.9360	ug/L	#	85
9) Methyl methacrylate	11.57	41	1679549	291.7313	ug/L		97
10) 2-Nitropropane	11.94	43	685276	292.7186	ug/L		98
13) Cyclohexanone	16.68	55	38739	294.5967	ug/L		82

(#) = qualifier out of range (m) = manual integration
6M144713.D A9FOOWT.M Fri Jan 13 08:34:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:16 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

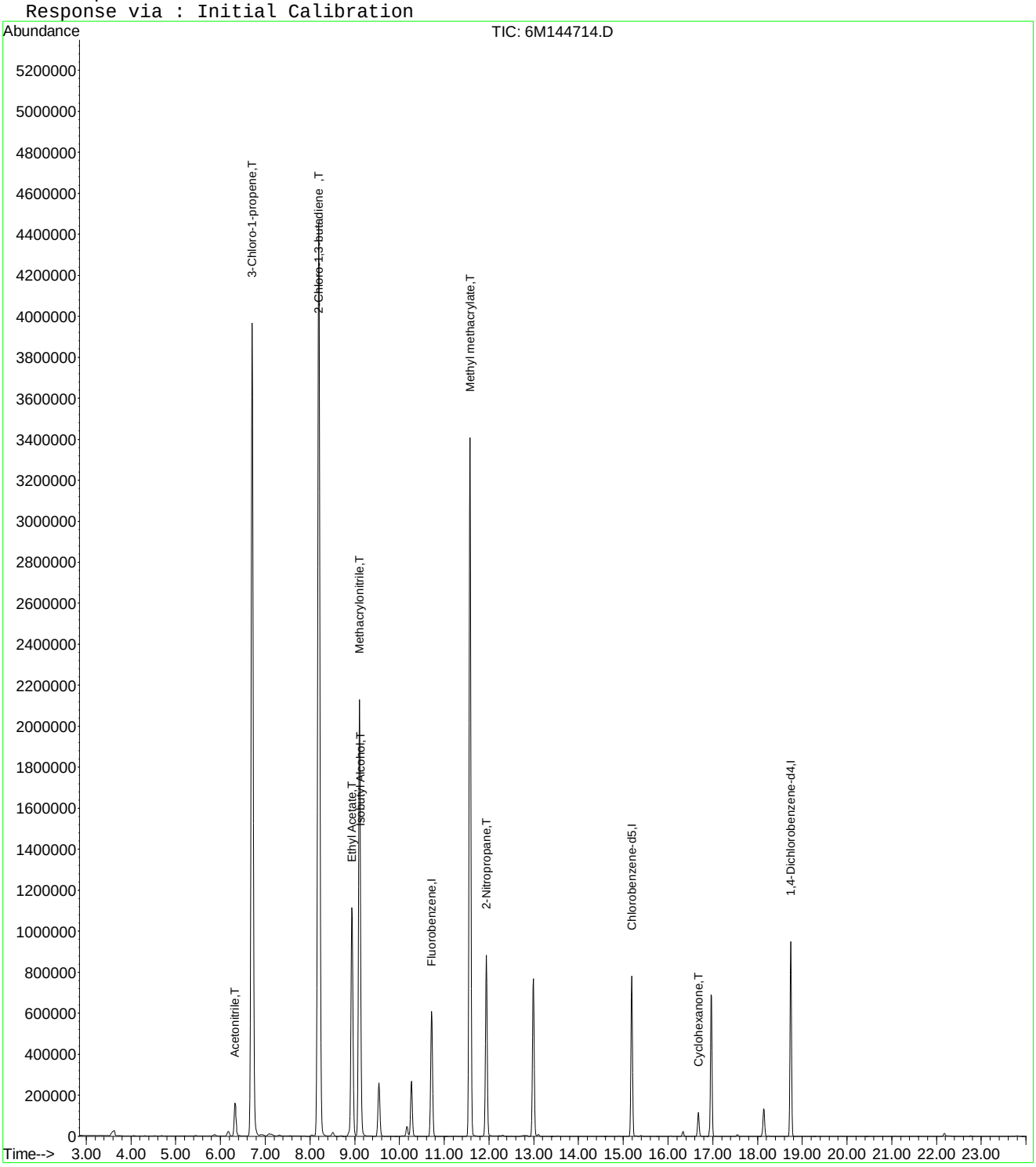
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	806744	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	606622	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	341512	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	218566	378.9620	ug/L		95
3) 3-Chloro-1-propene	6.70	41	3703442	382.9075	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	4659517	390.3333	ug/L		97
5) Ethyl Acetate	8.93	43	2048087	395.8497	ug/L		97
6) Methacrylonitrile	9.10	67	1071225	393.2708	ug/L		92
7) Isobutyl Alcohol	9.12	43	136765	815.5430	ug/L	#	75
9) Methyl methacrylate	11.58	41	2287798	404.1286	ug/L		96
10) 2-Nitropropane	11.94	43	962802	418.2475	ug/L		98
13) Cyclohexanone	16.68	55	59579	461.0815	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M144714.D A9FOOWT.M Fri Jan 13 08:34:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



6M144714.D A9FOOWT.M Fri Jan 13 08:34:31 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

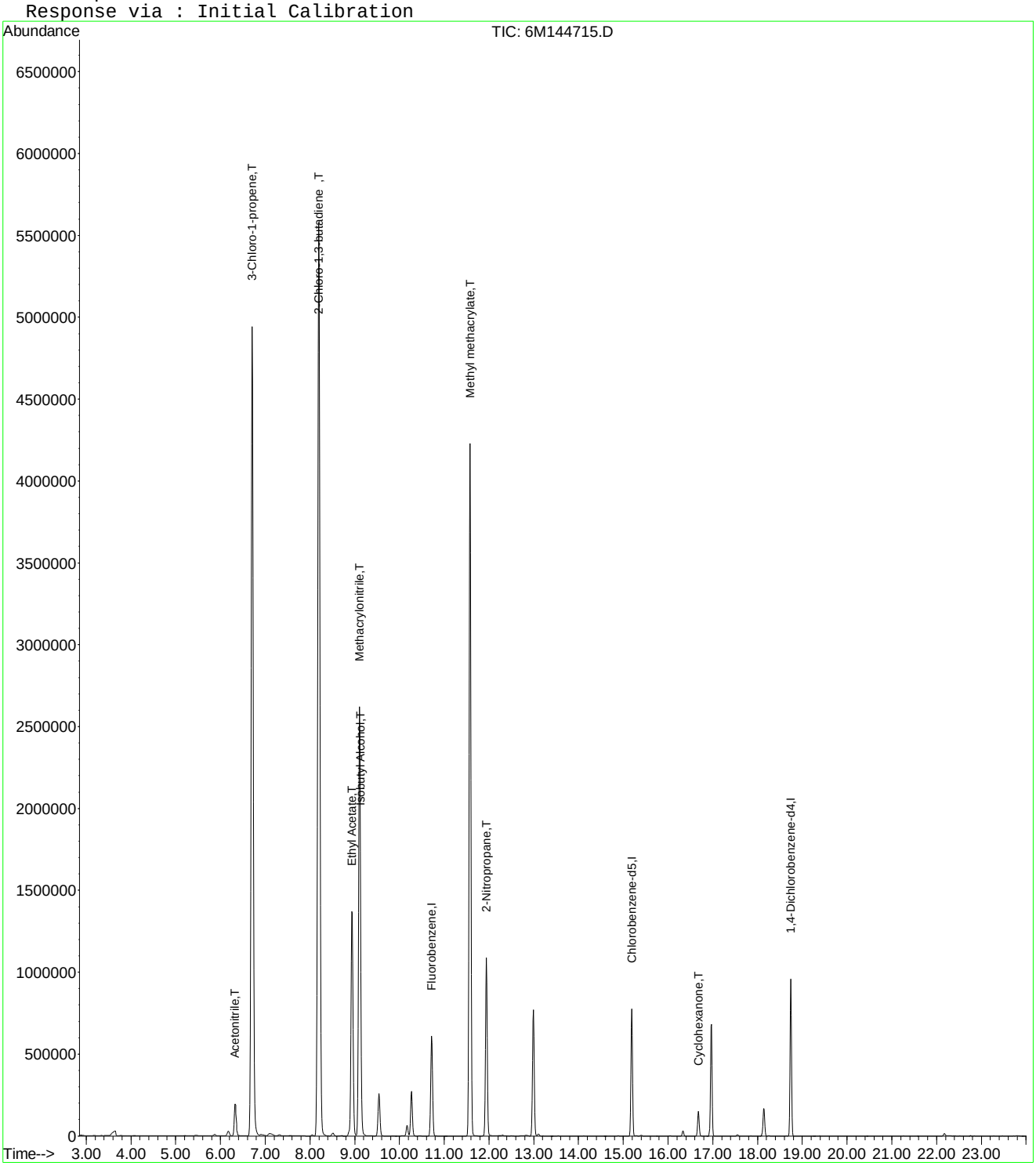
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	800443	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596335	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	335040	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	271689	474.7778	ug/L		94
3) 3-Chloro-1-propene	6.70	41	4627976	482.2639	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	5833383	492.5163	ug/L		97
5) Ethyl Acetate	8.93	43	2547971	496.3428	ug/L		97
6) Methacrylonitrile	9.10	67	1324536	490.0948	ug/L		92
7) Isobutyl Alcohol	9.12	43	184158	1106.7966	ug/L	#	75
9) Methyl methacrylate	11.58	41	2848365	507.1108	ug/L		97
10) 2-Nitropropane	11.94	43	1184018	518.3941	ug/L		98
13) Cyclohexanone	16.68	55	78367	618.1972	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144715.D A9FOOWT.M Fri Jan 13 08:34:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:45 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

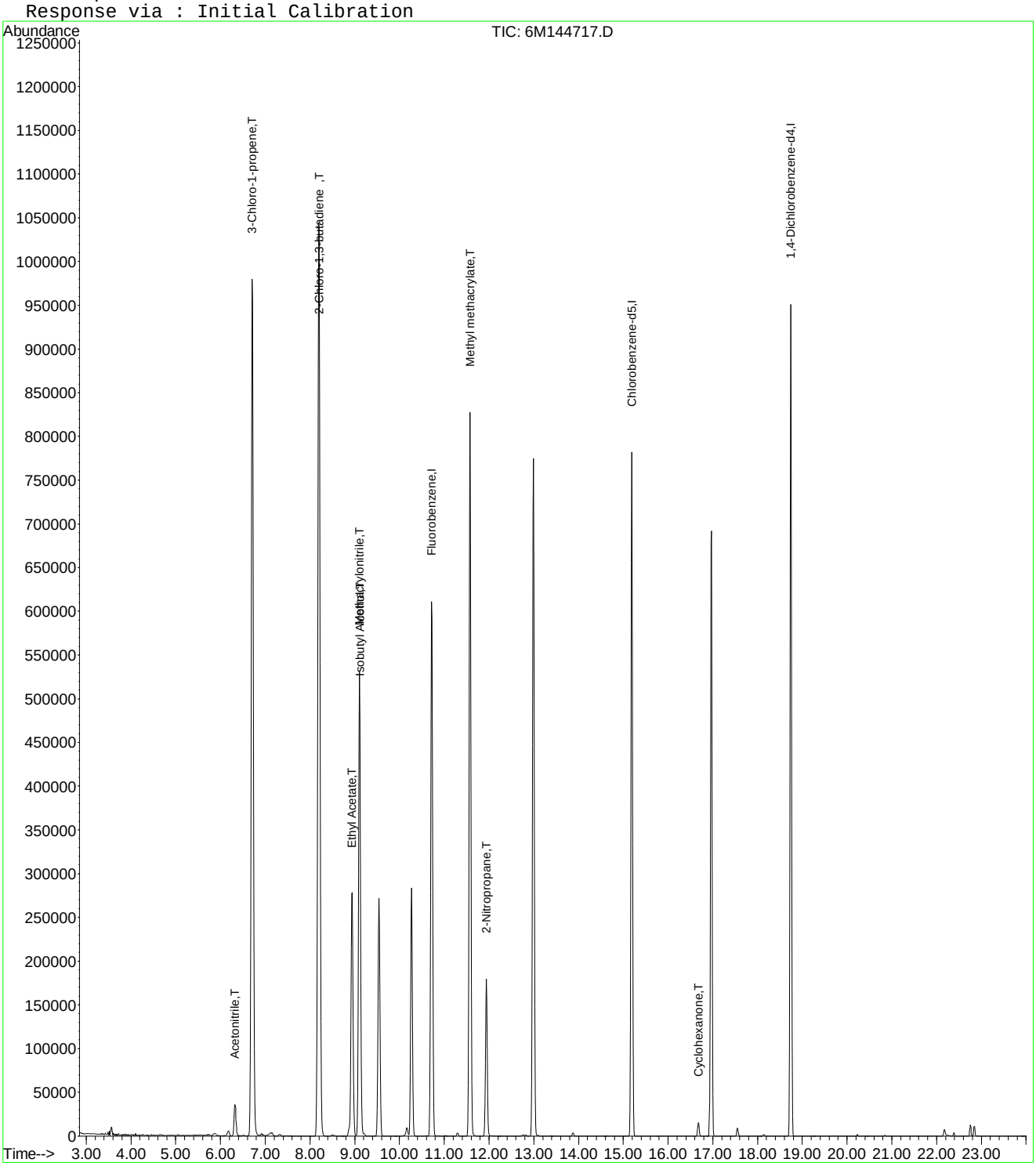
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	814360	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596096	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	332903	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	50370	86.5176	ug/L		93
3) 3-Chloro-1-propene	6.70	41	925364	94.7808	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1105734	91.7624	ug/L		97
5) Ethyl Acetate	8.93	43	511531	97.9429	ug/L		98
6) Methacrylonitrile	9.10	67	268526	97.6600	ug/L		92
7) Isobutyl Alcohol	9.11	43	30815	182.0344	ug/L	#	85
9) Methyl methacrylate	11.57	41	547496	95.8081	ug/L		96
10) 2-Nitropropane	11.94	43	194232	83.5866	ug/L		98
13) Cyclohexanone	16.68	55	8825	70.0628	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144717.D A9FOOWT.M Fri Jan 13 08:34:35 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	96	0.00
2	T	Acetonitrile	100.0000	86.5176	13.5	85	0.00
3	T	3-Chloro-1-propene	100.0000	94.7808	5.2	89	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	91.7624	8.2	85	0.00
5	T	Ethyl Acetate	100.0000	97.9429	2.1	91	0.00
6	T	Methacrylonitrile	100.0000	97.6600	2.3	90	0.00
7	T	Isobutyl Alcohol	200.0000	182.0344	9.0	83	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	100.0000	95.8081	4.2	88	0.00
10	T	2-Nitropropane	100.0000	83.5866	16.4	81	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	97	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	96	0.00
13	T	Cyclohexanone	100.0000	70.0628	29.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144717.D A9FOOWT.M Fri Jan 13 08:36:19 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	640408	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	444925	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226775	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	13.23	98	192	0.0085	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	2815	0.2769	ug/L #	64
3) Chloromethane	4.03	50	6905	Below Cal		88
4) Vinyl Chloride	4.28	62	3256	0.2803	ug/L	87
5) 1,3-Butadiene	4.33	54	2170	Below Cal		73
6) Bromomethane	5.23	94	1315	0.2622	ug/L	87
7) Chloroethane	5.40	64	1308	0.2617	ug/L #	43
8) Trichlorofluoromethane	5.90	101	3191	0.2680	ug/L #	92
10) Isoprene	6.49	67	2782	0.2840	ug/L #	60
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1282	0.1902	ug/L #	63
13) Acetone	6.76	43	1442	1.0435	ug/L #	48
14) 1,1-Dichloroethene	7.02	61	2988	0.3060	ug/L	96
16) Dimethyl Sulfide	7.28	62	1851	0.2653	ug/L	61
17) Iodomethane	7.54	142	460	0.8640	ug/L #	32
19) Methylene Chloride	7.79	84	2606	0.3531	ug/L	59
20) Carbon Disulfide	7.86	76	6466	0.3077	ug/L	98
22) Methyl Tert Butyl Ether	8.01	73	5425	0.3352	ug/L #	49
23) trans-1,2-Dichloroethene	8.26	96	1807	0.2572	ug/L	86
24) n-Hexane	8.33	57	2597	0.3268	ug/L	76
27) 1,1-Dichloroethane	8.87	63	3092	0.2656	ug/L	88
31) 2,2-Dichloropropane	9.64	77	1800	0.2033	ug/L #	31
32) cis-1,2-Dichloroethene	9.72	96	2213	0.2865	ug/L	84
33) Chloroform	9.92	83	5055	0.3812	ug/L #	83
35) Bromochloromethane	10.14	130	638	0.1569	ug/L	91
38) 1,1,1-Trichloroethane	10.45	97	3279	0.3042	ug/L #	50
39) Cyclohexane	10.48	56	2906	0.2915	ug/L #	75
40) 1,1-Dichloropropene	10.65	75	2741	0.3008	ug/L	77
45) 1,2-Dichloroethane	10.96	62	2340	0.2837	ug/L #	52
46) Benzene	11.01	78	9356	0.3415	ug/L #	79
47) Trichloroethene	11.75	130	2089	0.2801	ug/L #	65
48) Methylcyclohexane	11.85	83	3351	0.3110	ug/L	80
49) 1,2-Dichloropropane	11.97	63	2128	0.3291	ug/L #	53
51) Bromodichloromethane	12.27	83	2341	0.2564	ug/L	98
52) Dibromomethane	12.35	93	743	0.1951	ug/L	91
55) cis-1,3-Dichloropropene	12.90	75	2460	0.2447	ug/L #	77
56) Dimethyl Disulfide	13.17	79	1308	0.2062	ug/L #	47
59) Toluene	13.33	91	9335	0.3356	ug/L	99
60) Ethyl Methacrylate	13.40	69	1912	0.2840	ug/L	78
62) trans-1,3-Dichloropropene	13.48	75	2047	0.2387	ug/L #	51
63) 1,1,2-Trichloroethane	13.72	97	1325	0.2528	ug/L	83
64) 2-Hexanone	13.64	43	717	0.2848	ug/L #	28

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

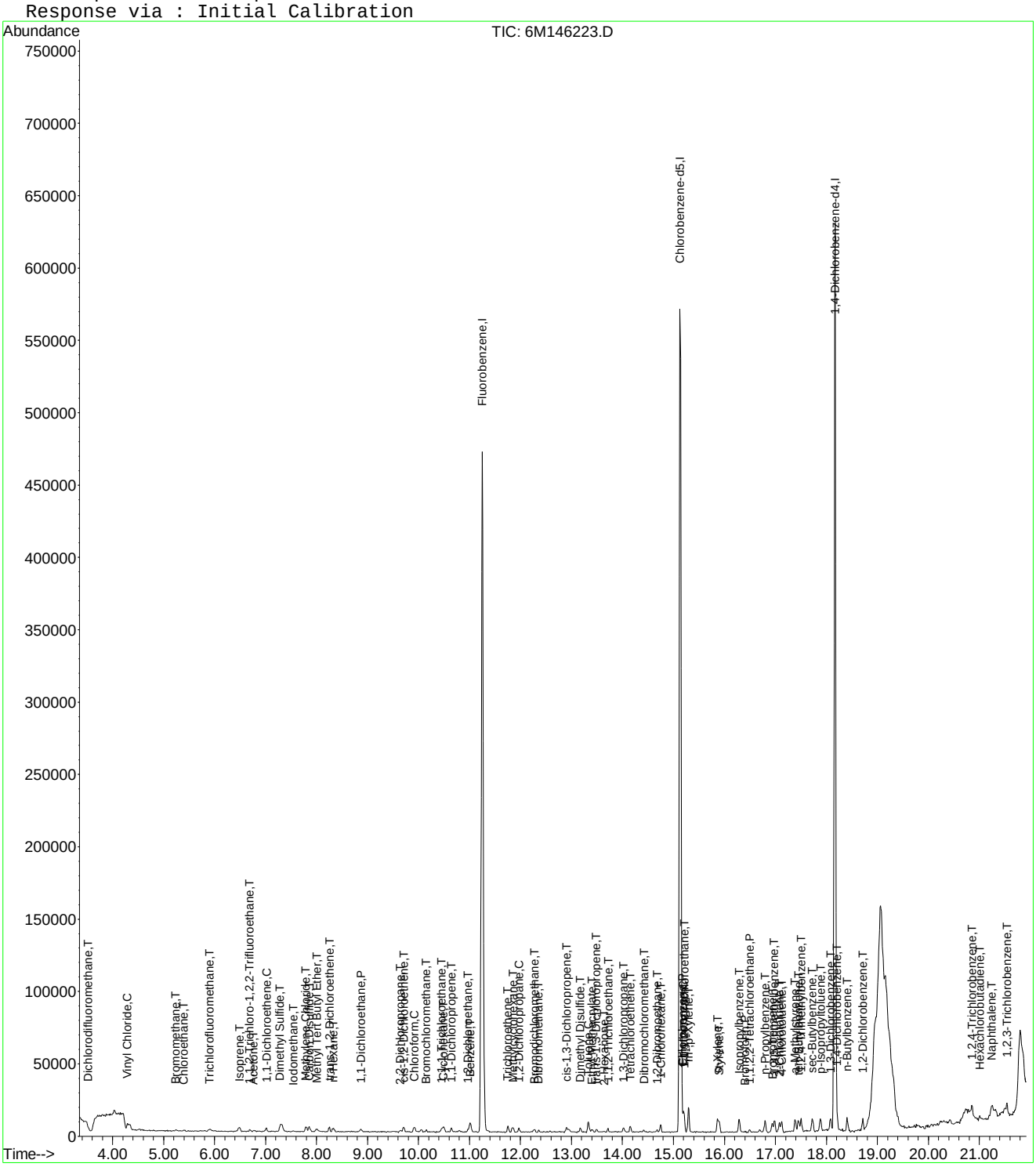
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
65)	1,3-Dichloropropane	14.03	76	2632	0.2991	ug/L		73
66)	Tetrachloroethene	14.16	166	2146	0.3184	ug/L		92
67)	Dibromochloromethane	14.42	129	1611	0.2486	ug/L		96
68)	1,2-Dibromoethane	14.68	107	1255	0.2493	ug/L		83
69)	1-Chlorohexane	14.75	91	2852	0.3175	ug/L		77
70)	Chlorobenzene	15.18	112	5819	0.3056	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	1834	0.2690	ug/L	#	36
72)	Ethylbenzene	15.20	106	3131	0.3038	ug/L		92
73)	m-,p-Xylene	15.29	106	7511	0.6097	ug/L		97
74)	o-Xylene	15.86	106	3485	0.2932	ug/L		89
75)	Styrene	15.89	104	6272	0.3143	ug/L		93
76)	Bromoform	16.40	173	562	0.1423	ug/L	#	35
77)	Isopropylbenzene	16.29	105	10184	0.3423	ug/L		93
79)	1,1,2,2-Tetrachloroethane	16.50	83	1871	0.3168	ug/L		77
83)	n-Propylbenzene	16.79	91	11774	0.3429	ug/L	#	93
84)	Bromobenzene	16.95	156	2344	0.3039	ug/L	#	63
85)	1,3,5-Trimethylbenzene	16.98	105	7944	0.3265	ug/L		95
86)	2-Chlorotoluene	17.08	91	7914	0.3462	ug/L		93
87)	4-Chlorotoluene	17.12	91	6658	0.3295	ug/L	#	94
88)	a-Methylstyrene	17.38	118	3803	0.2826	ug/L		94
89)	tert-Butylbenzene	17.46	134	1349	0.2646	ug/L		32
90)	1,2,4-Trimethylbenzene	17.51	105	8218	0.3289	ug/L		89
91)	sec-Butylbenzene	17.72	105	10323	0.3440	ug/L		91
92)	p-Isopropyltoluene	17.89	119	8482	0.3360	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	4887	0.3355	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5055	0.3432	ug/L	#	53
95)	n-Butylbenzene	18.41	91	8369	0.3631	ug/L		92
96)	1,2-Dichlorobenzene	18.71	146	4262	0.3121	ug/L		90
98)	1,2,4-Trichlorobenzene	20.86	180	3679	0.3683	ug/L		84
99)	Hexachlorobutadiene	21.01	225	1397	0.3661	ug/L		82
100)	Naphthalene	21.23	128	6133	0.3066	ug/L		94
101)	1,2,3-Trichlorobenzene	21.54	180	3447	0.3574	ug/L	#	77

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2769	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.2012	0.0	0	0.01
4	C	Vinyl Chloride	-1.0000	0.2803	0.0	0	0.01
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.2622	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.2617	0.0	100	0.02
8	T	Trichlorofluoromethane	-1.0000	0.2680	0.0	100	0.00
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.2840	0.0	100	0.02
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.1902	0.0	100	0.00
13	T	Acetone	-1.0000	1.0435	0.0	100	-0.01
14	C	1,1-Dichloroethene	-1.0000	0.3060	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.2653	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8640	0.0	0	0.01
18	T	Methyl acetate	-1.0000	0.0537	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3531	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3077	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3352	0.0	100	-0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.2572	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.3268	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.0000	0.0	0	-8.83#
27	P	1,1-Dichloroethane	-1.0000	0.2656	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.41#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	-1.0000	0.2033	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2865	0.0	100	0.00
33	C	Chloroform	0.3000	0.3812	-27.1#	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	-1.0000	0.1569	0.0	0	-0.01
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-10.18#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	-1.0000	0.3042	0.0	100	-0.01
39	T	Cyclohexane	-1.0000	0.2915	0.0	100	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.3008	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.1105	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	-1.0000	0.2837	0.0	100	0.00
46	T	Benzene	-1.0000	0.3415	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2801	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3110	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.3291	0.0	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	-1.0000	0.2564	0.0	100	0.00
52	T	Dibromomethane	-1.0000	0.1951	0.0	100	-0.01
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.0000	0.0	0	-12.56#
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.59#

(#) = Out of Range
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2447	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2062	0.0	100	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0085	0.0	100	0.00
59	C	Toluene	-1.0000	0.3356	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2840	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2387	0.0	100	-0.01
63	T	1,1,2-Trichloroethane	-1.0000	0.2528	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.2848	0.0	100	0.00
65	T	1,3-Dichloropropane	-1.0000	0.2991	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.3184	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2486	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2493	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.3175	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3056	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2690	0.0	100	0.00
72	C	Ethylbenzene	-1.0000	0.3038	0.0	100	0.00
73	T	m-,p-Xylene	-1.0000	0.6097	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2932	0.0	100	0.00
75	T	Styrene	-1.0000	0.3143	0.0	100	-0.01
76	P	Bromoform	-1.0000	0.1423	0.0	100	0.00
77	T	Isopropylbenzene	-1.0000	0.3423	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3168	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-16.69#
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	-1.0000	0.3429	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.3039	-1.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.3265	0.0	100	-0.01
86	T	2-Chlorotoluene	-1.0000	0.3462	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3295	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2826	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2646	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.3289	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.3440	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3360	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3355	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3432	-14.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.3631	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.3121	-4.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.3683	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.3661	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.3066	0.0	100	-0.01
101	T	1,2,3-Trichlorobenzene	0.3000	0.3574	-19.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	626609	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	442971	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226791	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	0.00	111	0	0.0000 ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#	
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000 ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#	
58) Toluene-d8	0.00	98	0	0.0000 ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#	
80) p-Bromofluorobenzene	0.00	95	0	0.0000 ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#	
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	3419	0.3437 ug/L #	64
3) Chloromethane	4.04	50	7947	Below Cal	96
4) Vinyl Chloride	4.29	62	5656	0.4976 ug/L	98
5) 1,3-Butadiene	4.34	54	2862	Below Cal #	60
6) Bromomethane	5.23	94	1597	0.3254 ug/L	99
7) Chloroethane	5.40	64	1845	0.3772 ug/L #	43
8) Trichlorofluoromethane	5.91	101	4335	0.3721 ug/L #	93
10) Isoprene	6.48	67	3687	0.3847 ug/L	68
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	2169	0.3289 ug/L	74
13) Acetone	6.77	43	782	0.5783 ug/L #	48
14) 1,1-Dichloroethene	7.01	61	3813	0.3991 ug/L	83
16) Dimethyl Sulfide	7.28	62	2499	0.3661 ug/L #	56
17) Iodomethane	7.55	142	506	0.8739 ug/L #	32
18) Methyl acetate	7.54	43	953	0.2810 ug/L #	66
19) Methylene Chloride	7.79	84	3151	0.4363 ug/L	69
20) Carbon Disulfide	7.86	76	8568	0.4167 ug/L	96
22) Methyl Tert Butyl Ether	8.00	73	6676	0.4215 ug/L #	68
23) trans-1,2-Dichloroethene	8.25	96	2699	0.3926 ug/L	77
24) n-Hexane	8.32	57	3415	0.4392 ug/L	70
26) Vinyl Acetate	8.83	43	1421	0.2892 ug/L #	78
27) 1,1-Dichloroethane	8.87	63	4613	0.4050 ug/L #	77
29) 2-Butanone	9.41	43	260	0.1526 ug/L #	57
31) 2,2-Dichloropropane	9.64	77	3882	0.4480 ug/L	72
32) cis-1,2-Dichloroethene	9.72	96	3041	0.4023 ug/L	76
33) Chloroform	9.92	83	5917	0.4561 ug/L #	88
35) Bromochloromethane	10.15	130	1328	0.3338 ug/L	91
36) Tetrahydrofuran	10.17	42	200	0.1782 ug/L #	41
38) 1,1,1-Trichloroethane	10.45	97	4059	0.3848 ug/L	83
39) Cyclohexane	10.49	56	3820	0.3916 ug/L	75
40) 1,1-Dichloropropene	10.64	75	3280	0.3679 ug/L	86
42) Carbon Tetrachloride	10.80	117	2236	0.2688 ug/L #	79
45) 1,2-Dichloroethane	10.97	62	3278	0.4061 ug/L #	68
46) Benzene	11.01	78	12127	0.4523 ug/L	84
47) Trichloroethene	11.76	130	2885	0.3953 ug/L	71
48) Methylcyclohexane	11.85	83	4224	0.4006 ug/L	83
49) 1,2-Dichloropropane	11.97	63	2324	0.3673 ug/L	84
51) Bromodichloromethane	12.27	83	3345	0.3745 ug/L	82
52) Dibromomethane	12.36	93	1227	0.3293 ug/L	99
53) 2-Chloroethyl Vinyl Ether	12.55	63	709	0.2857 ug/L #	41
55) cis-1,3-Dichloropropene	12.90	75	3464	0.3522 ug/L #	77

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

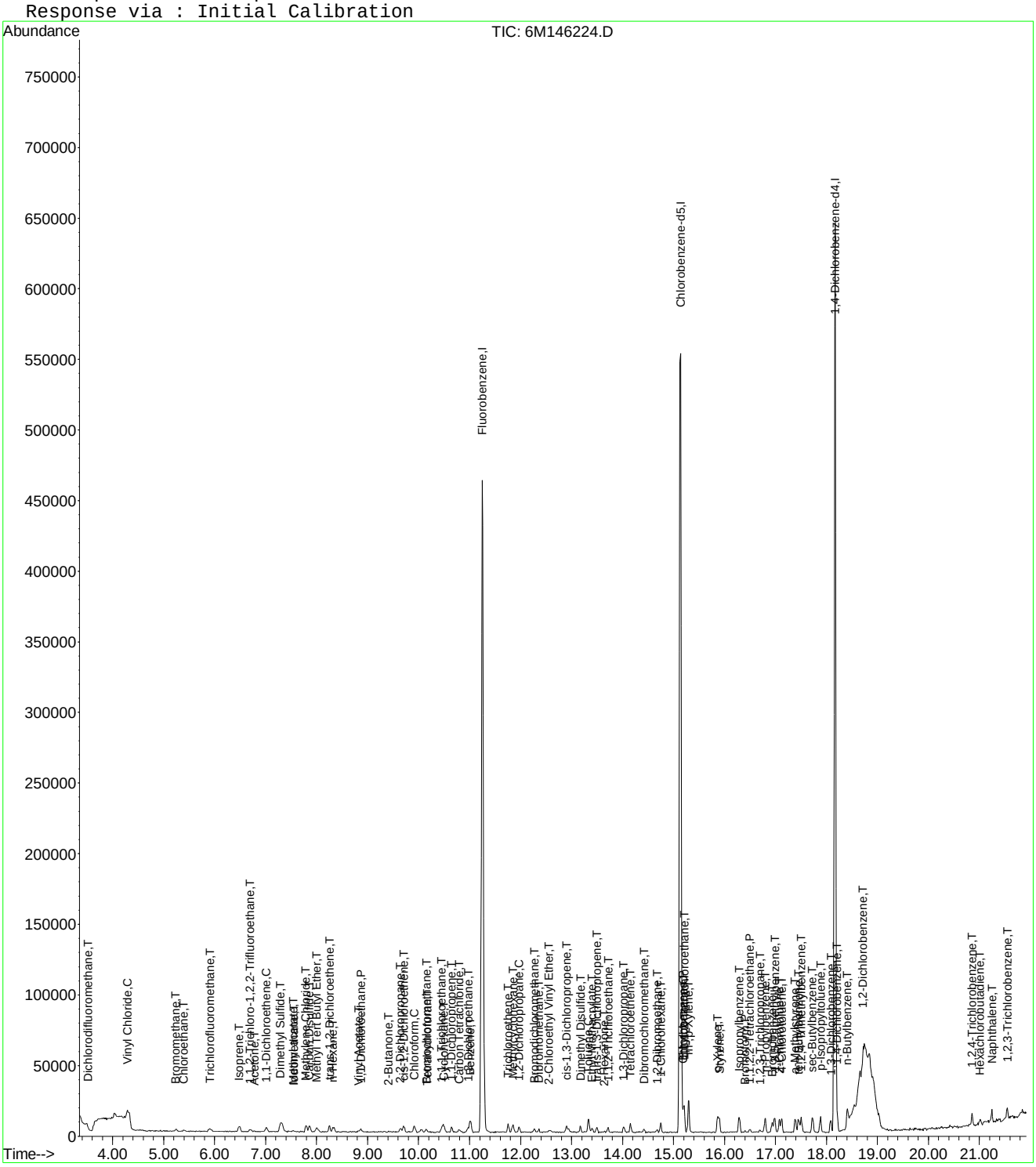
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
56)	Dimethyl Disulfide	13.18	79	1794	0.2891 ug/L	#	47
59)	Toluene	13.33	91	11706	0.4227 ug/L		96
60)	Ethyl Methacrylate	13.40	69	2704	0.4035 ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	3001	0.3514 ug/L		88
63)	1,1,2-Trichloroethane	13.72	97	1935	0.3708 ug/L		97
64)	2-Hexanone	13.64	43	838	0.3344 ug/L	#	28
65)	1,3-Dichloropropane	14.02	76	3430	0.3915 ug/L		80
66)	Tetrachloroethene	14.16	166	2515	0.3748 ug/L		90
67)	Dibromochloromethane	14.42	129	2281	0.3536 ug/L		87
68)	1,2-Dibromoethane	14.68	107	2013	0.4017 ug/L		91
69)	1-Chlorohexane	14.75	91	3553	0.3973 ug/L		75
70)	Chlorobenzene	15.19	112	7763	0.4095 ug/L		93
71)	1,1,1,2-Tetrachloroethane	15.21	131	2463	0.3628 ug/L	#	36
72)	Ethylbenzene	15.20	106	4250	0.4142 ug/L		92
73)	m-,p-Xylene	15.29	106	10084	0.8222 ug/L		94
74)	o-Xylene	15.86	106	4446	0.3756 ug/L		95
75)	Styrene	15.90	104	7608	0.3829 ug/L		91
76)	Bromoform	16.40	173	1201	0.3055 ug/L	#	50
77)	Isopropylbenzene	16.29	105	12585	0.4249 ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	2532	0.4287 ug/L		74
81)	1,2,3-Trichloropropane	16.70	110	576	0.3302 ug/L	#	1
83)	n-Propylbenzene	16.80	91	14774	0.4303 ug/L	#	96
84)	Bromobenzene	16.93	156	3090	0.4006 ug/L		70
85)	1,3,5-Trimethylbenzene	16.99	105	10064	0.4136 ug/L		97
86)	2-Chlorotoluene	17.08	91	9917	0.4337 ug/L		94
87)	4-Chlorotoluene	17.12	91	8689	0.4300 ug/L		97
88)	a-Methylstyrene	17.38	118	4762	0.3539 ug/L		99
89)	tert-Butylbenzene	17.46	134	1902	0.3730 ug/L		48
90)	1,2,4-Trimethylbenzene	17.51	105	10085	0.4035 ug/L		86
91)	sec-Butylbenzene	17.72	105	13346	0.4447 ug/L		93
92)	p-Isopropyltoluene	17.88	119	10657	0.4222 ug/L		97
93)	1,3-Dichlorobenzene	18.09	146	6333	0.4347 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5959	0.4045 ug/L		98
95)	n-Butylbenzene	18.41	91	10090	0.4377 ug/L		88
96)	1,2-Dichlorobenzene	18.71	146	5766	0.4223 ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	4424	0.4428 ug/L		85
99)	Hexachlorobutadiene	21.01	225	1728	0.4528 ug/L		78
100)	Naphthalene	21.24	128	8285	0.4141 ug/L		94
101)	1,2,3-Trichlorobenzene	21.55	180	4343	0.4503 ug/L		83

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3437	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.0968	0.0	0	0.02
4	C	Vinyl Chloride	0.4000	0.4976	-24.4#	100	0.02
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.3254	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.3772	0.0	100	0.02
8	T	Trichlorofluoromethane	0.4000	0.3721	7.0	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.3847	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3289	0.0	100	0.00
13	T	Acetone	-1.0000	0.5783	0.0	100	0.00
14	C	1,1-Dichloroethene	0.4000	0.3991	0.2	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.3661	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8739	0.0	0	0.02
18	T	Methyl acetate	-1.0000	0.2810	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4363	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.4167	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.4215	0.0	100	-0.02
23	T	trans-1,2-Dichloroethene	0.4000	0.3926	1.9	100	0.00
24	T	n-Hexane	-1.0000	0.4392	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.2892	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.4051	-1.3	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.1526	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	0.4000	0.4480	-12.0	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.4023	-0.6	100	0.00
33	C	Chloroform	0.4000	0.4561	-14.0	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	0.4000	0.3338	16.6	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.1782	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	0.4000	0.3848	3.8	100	-0.01
39	T	Cyclohexane	-1.0000	0.3916	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3679	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.2688	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	0.4000	0.4061	-1.5	100	0.00
46	T	Benzene	0.4000	0.4523	-13.1	100	0.00
47	T	Trichloroethene	0.4000	0.3953	1.2	100	0.00
48	T	Methylcyclohexane	-1.0000	0.4006	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3673	8.2	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	0.4000	0.3745	6.4	100	0.00
52	T	Dibromomethane	0.4000	0.3293	17.7	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.2857	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.1142	0.0	100	0.00

(#) = Out of Range
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3522	12.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2891	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0000	0.0	0	-13.23#
59	C	Toluene	0.4000	0.4227	-5.7	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.4035	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3514	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3708	7.3	100	0.00
64	T	2-Hexanone	-1.0000	0.3344	0.0	100	0.00
65	T	1,3-Dichloropropane	0.4000	0.3915	2.1	100	0.00
66	T	Tetrachloroethene	0.4000	0.3748	6.3	100	0.00
67	T	Dibromochloromethane	0.4000	0.3535	11.6	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.4017	-0.4	100	0.00
69	T	1-Chlorohexane	0.4000	0.3973	0.7	100	0.00
70	P	Chlorobenzene	0.4000	0.4096	-2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3628	9.3	100	0.00
72	C	Ethylbenzene	0.4000	0.4142	-3.5	100	0.00
73	T	m-,p-Xylene	0.8000	0.8222	-2.8	100	0.00
74	T	o-Xylene	-1.0000	0.3756	0.0	100	0.00
75	T	Styrene	0.4000	0.3829	4.3	100	0.00
76	P	Bromoform	-1.0000	0.3055	0.0	100	0.00
77	T	Isopropylbenzene	0.4000	0.4249	-6.2	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.4287	-7.2	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.3302	0.0	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	0.4000	0.4303	-7.6	100	0.00
84	T	Bromobenzene	0.4000	0.4006	-0.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.4136	-3.4	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4338	-8.4	100	0.00
87	T	4-Chlorotoluene	0.4000	0.4300	-7.5	100	0.00
88	T	a-Methylstyrene	-1.0000	0.3539	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3730	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.4035	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4447	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.4222	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.4347	-8.7	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4045	-1.1	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4377	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.4223	-5.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	0.4000	0.4428	-10.7	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.4528	-13.2	100	0.00
100	T	Naphthalene	0.4000	0.4141	-3.5	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.4503	-12.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	632181	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	444070	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	224733	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	3097	0.4799	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.92%#		
43) 1,2-Dichloroethane-d4	10.85	65	2998	0.4714	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	13.24	98	11387	0.5025	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	2.00%#		
80) p-Bromofluorobenzene	16.64	95	4328	0.5071	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.04%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	9629	0.9593	ug/L #	85
3) Chloromethane	4.04	50	18344	0.8003	ug/L	93
4) Vinyl Chloride	4.28	62	12799	1.1160	ug/L	96
5) 1,3-Butadiene	4.34	54	8885	0.7170	ug/L	88
6) Bromomethane	5.24	94	4461	0.9009	ug/L	95
7) Chloroethane	5.40	64	4858	0.9845	ug/L	80
8) Trichlorofluoromethane	5.91	101	11643	0.9905	ug/L	95
9) Diethyl ether	6.44	59	24166	4.9333	ug/L	82
10) Isoprene	6.48	67	8997	0.9306	ug/L	79
11) Acrolein	6.68	56	678	1.2633	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	6814	1.0241	ug/L	88
13) Acetone	6.77	43	1642	1.2036	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	9339	0.9690	ug/L	75
15) Tert-Butyl Alcohol	7.10	59	3988	9.4246	ug/L #	57
16) Dimethyl Sulfide	7.27	62	6552	0.9514	ug/L	98
17) Iodomethane	7.55	142	2740	1.2641	ug/L	83
18) Methyl acetate	7.54	43	3105	0.9075	ug/L #	66
19) Methylene Chloride	7.80	84	7857	1.0783	ug/L	64
20) Carbon Disulfide	7.86	76	21108	1.0176	ug/L	95
21) Acrylonitrile	7.97	53	3676	2.3254	ug/L	83
22) Methyl Tert Butyl Ether	8.01	73	16436	1.0286	ug/L	88
23) trans-1,2-Dichloroethene	8.26	96	6924	0.9982	ug/L	75
24) n-Hexane	8.32	57	8671	1.1054	ug/L	80
25) Diisopropyl ether	8.66	45	90855	5.0880	ug/L #	90
26) Vinyl Acetate	8.83	43	4307	0.8689	ug/L #	78
27) 1,1-Dichloroethane	8.87	63	11386	0.9909	ug/L	100
28) Ethyl-Tert-Butyl ether	9.24	59	90588	5.0069	ug/L	90
29) 2-Butanone	9.42	43	1578	0.9178	ug/L #	57
30) Propionitrile	9.52	54	2484	4.4300	ug/L #	56
31) 2,2-Dichloropropane	9.65	77	10191	1.1658	ug/L	75
32) cis-1,2-Dichloroethene	9.72	96	7549	0.9899	ug/L	90
33) Chloroform	9.92	83	13696	1.0463	ug/L	91
34) 1-Bromopropane	10.06	122	1026	0.7587	ug/L	54
35) Bromochloromethane	10.15	130	3643	0.9075	ug/L	100
36) Tetrahydrofuran	10.17	42	6307	5.5703	ug/L	83
38) 1,1,1-Trichloroethane	10.45	97	10730	1.0083	ug/L	83
39) Cyclohexane	10.49	56	9783	0.9941	ug/L	78
40) 1,1-Dichloropropene	10.64	75	9021	1.0028	ug/L	85
41) Tert-Amyl-Methyl ether	10.75	73	86495	5.0351	ug/L	93
42) Carbon Tetrachloride	10.80	117	7124	0.8490	ug/L	95

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

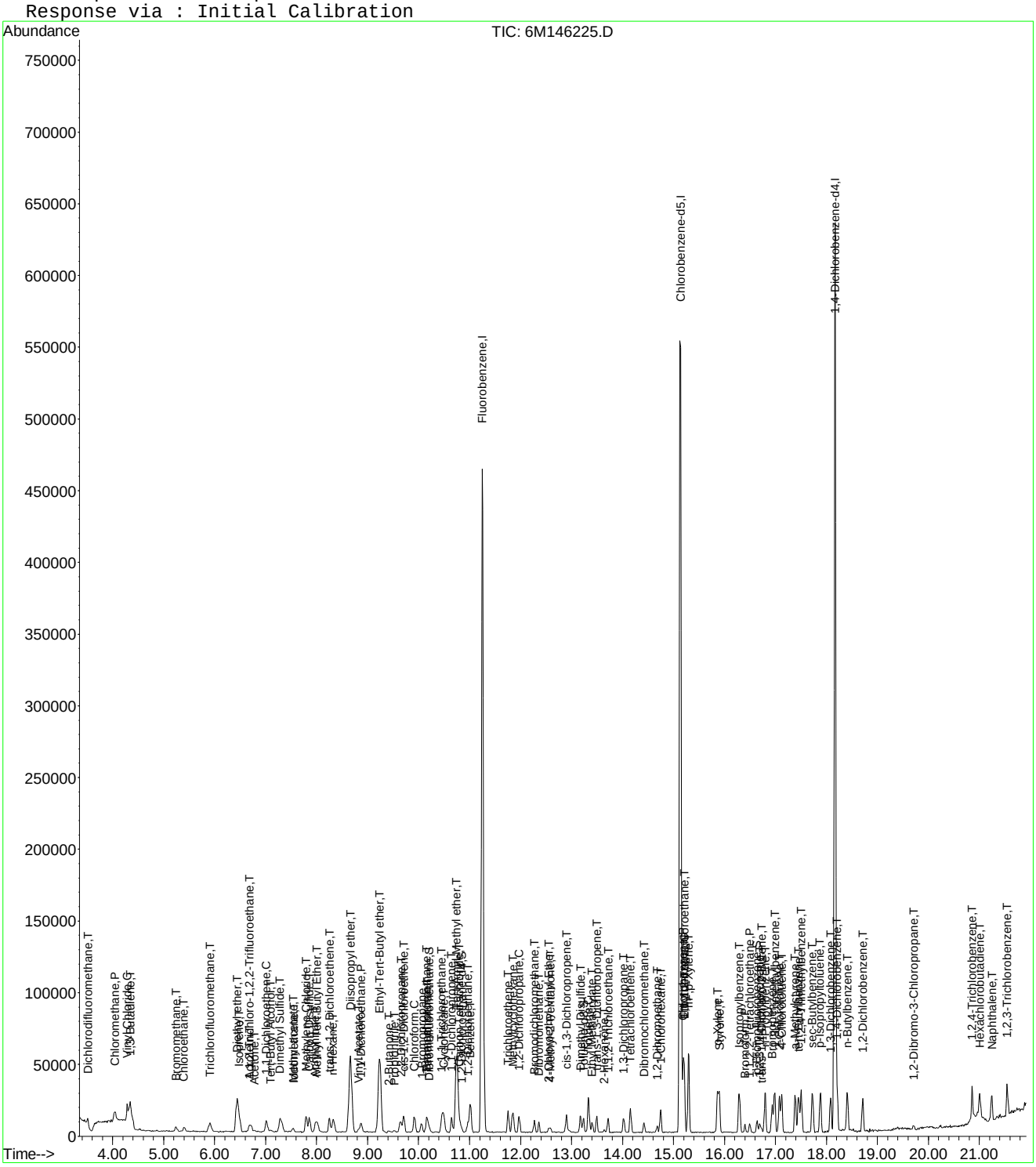
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	8252	1.0134	ug/L	#	79
46)	Benzene	11.01	78	27830	1.0289	ug/L		85
47)	Trichloroethene	11.76	130	7188	0.9763	ug/L		86
48)	Methylcyclohexane	11.85	83	10430	0.9805	ug/L		81
49)	1,2-Dichloropropane	11.97	63	6337	0.9927	ug/L		93
51)	Bromodichloromethane	12.27	83	8602	0.9546	ug/L		100
52)	Dibromomethane	12.36	93	3907	1.0392	ug/L		88
53)	2-Chloroethyl Vinyl Ether	12.55	63	2066	0.8251	ug/L		85
54)	4-Methyl-2-Pentanone	12.58	58	1310	0.7976	ug/L	#	38
55)	cis-1,3-Dichloropropene	12.90	75	9650	0.9724	ug/L	#	91
56)	Dimethyl Disulfide	13.18	79	5152	0.8229	ug/L		84
59)	Toluene	13.33	91	28882	1.0403	ug/L		97
60)	Ethyl Methacrylate	13.40	69	6287	0.9358	ug/L		73
62)	trans-1,3-Dichloropropene	13.49	75	8281	0.9673	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	5263	1.0059	ug/L		98
64)	2-Hexanone	13.64	43	2640	1.0508	ug/L		100
65)	1,3-Dichloropropane	14.02	76	9029	1.0281	ug/L		71
66)	Tetrachloroethene	14.16	166	6743	1.0023	ug/L		96
67)	Dibromochloromethane	14.42	129	6126	0.9472	ug/L		94
68)	1,2-Dibromoethane	14.68	107	5001	0.9955	ug/L		97
69)	1-Chlorohexane	14.75	91	8893	0.9919	ug/L		81
70)	Chlorobenzene	15.19	112	19139	1.0072	ug/L		80
71)	1,1,1,2-Tetrachloroethane	15.21	131	6334	0.9308	ug/L	#	45
72)	Ethylbenzene	15.21	106	9526	0.9260	ug/L		96
73)	m-,p-Xylene	15.29	106	24042	1.9553	ug/L		95
74)	o-Xylene	15.86	106	11918	1.0045	ug/L		97
75)	Styrene	15.90	104	18813	0.9445	ug/L		97
76)	Bromoform	16.40	173	3544	0.8992	ug/L	#	94
77)	Isopropylbenzene	16.29	105	30143	1.0152	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	5946	1.0159	ug/L		93
81)	1,2,3-Trichloropropane	16.69	110	1751	1.0131	ug/L	#	44
82)	trans-1,4-Dichloro-2-Buten	16.73	53	1111	0.8939	ug/L	#	1
83)	n-Propylbenzene	16.80	91	35315	1.0379	ug/L		100
84)	Bromobenzene	16.93	156	7797	1.0200	ug/L		78
85)	1,3,5-Trimethylbenzene	16.99	105	24668	1.0230	ug/L		97
86)	2-Chlorotoluene	17.08	91	24173	1.0670	ug/L		97
87)	4-Chlorotoluene	17.12	91	21009	1.0492	ug/L		97
88)	a-Methylstyrene	17.38	118	11540	0.8654	ug/L		96
89)	tert-Butylbenzene	17.46	134	4954	0.9805	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	25152	1.0156	ug/L		87
91)	sec-Butylbenzene	17.72	105	32001	1.0761	ug/L		95
92)	p-Isopropyltoluene	17.87	119	25877	1.0345	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	14335	0.9930	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	14500	0.9933	ug/L	#	52
95)	n-Butylbenzene	18.42	91	23762	1.0403	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	13818	1.0212	ug/L		94
97)	1,2-Dibromo-3-Chloropropan	19.71	75	1139	1.0744	ug/L		87
98)	1,2,4-Trichlorobenzene	20.86	180	9978	1.0078	ug/L		93
99)	Hexachlorobutadiene	21.01	225	4008	1.0599	ug/L		89
100)	Naphthalene	21.24	128	19584	0.9879	ug/L		98
101)	1,2,3-Trichlorobenzene	21.54	180	10033	1.0497	ug/L		89

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9593	4.1	100	0.00
3	P	Chloromethane	1.0000	0.8003	20.0	100	0.02
4	C	Vinyl Chloride	1.0000	1.1160	-11.6	100	0.00
5	T	1,3-Butadiene	-1.0000	0.7170	0.0	0	0.03
6	T	Bromomethane	1.0000	0.9009	9.9	100	0.03
7	T	Chloroethane	1.0000	0.9845	1.5	100	0.02
8	T	Trichlorofluoromethane	1.0000	0.9905	0.9	100	0.02
9	T	Diethyl ether	5.0000	4.9333	1.3	100	0.00
10	T	Isoprene	-1.0000	0.9306	0.0	100	0.00
11	T	Acrolein	-1.0000	1.2633	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0241	-2.4	100	0.00
13	T	Acetone	-1.0000	1.2036	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.9690	3.1	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	9.4246	0.0	100	-0.02
16	T	Dimethyl Sulfide	-1.0000	0.9514	0.0	100	0.00
17	T	Iodomethane	1.0000	1.2641	-26.4#	100	0.02
18	T	Methyl acetate	-1.0000	0.9075	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0783	-7.8	100	0.00
20	T	Carbon Disulfide	1.0000	1.0176	-1.8	100	0.00
21	T	Acrylonitrile	2.5000	2.3254	7.0	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	1.0286	-2.9	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9982	0.2	100	0.00
24	T	n-Hexane	-1.0000	1.1054	0.0	100	-0.01
25	T	Diisopropyl ether	5.0000	5.0880	-1.8	100	0.00
26	T	Vinyl Acetate	-1.0000	0.8689	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9909	0.9	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0069	-0.1	100	0.00
29	T	2-Butanone	-1.0000	0.9178	0.0	100	0.00
30	T	Propionitrile	5.0000	4.4300	11.4	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.1658	-16.6	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9899	1.0	100	0.00
33	C	Chloroform	1.0000	1.0463	-4.6	100	0.00
34		1-Bromopropane	1.0000	0.7587	24.1#	100	0.00
35	T	Bromochloromethane	1.0000	0.9075	9.2	100	0.00
36	T	Tetrahydrofuran	5.0000	5.5703	-11.4	100	0.00
37	S	Dibromofluoromethane	0.5000	0.4799	4.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0083	-0.8	100	-0.01
39	T	Cyclohexane	1.0000	0.9941	0.6	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0028	-0.3	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	5.0351	-0.7	100	0.00
42	T	Carbon Tetrachloride	1.0000	0.8490	15.1	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.4714	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	1.0000	1.0134	-1.3	100	0.00
46	T	Benzene	1.0000	1.0289	-2.9	100	0.00
47	T	Trichloroethene	1.0000	0.9763	2.4	100	0.00
48	T	Methylcyclohexane	-1.0000	0.9805	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9927	0.7	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	1.0000	0.9546	4.5	100	0.00
52	T	Dibromomethane	1.0000	1.0392	-3.9	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8251	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.7976	0.0	100	0.00

(#) = Out of Range
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9724	2.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.8229	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	0.5000	0.5025	-0.5	100	0.00
59	C	Toluene	1.0000	1.0403	-4.0	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.9358	6.4	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.10
62	T	trans-1,3-Dichloropropene	1.0000	0.9673	3.3	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0059	-0.6	100	0.00
64	T	2-Hexanone	-1.0000	1.0508	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0281	-2.8	100	0.00
66	T	Tetrachloroethene	1.0000	1.0023	-0.2	100	0.00
67	T	Dibromochloromethane	1.0000	0.9472	5.3	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9954	0.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9919	0.8	100	0.00
70	P	Chlorobenzene	1.0000	1.0072	-0.7	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.9308	6.9	100	0.00
72	C	Ethylbenzene	1.0000	0.9260	7.4	100	0.00
73	T	m-,p-Xylene	2.0000	1.9553	2.2	100	0.00
74	T	o-Xylene	1.0000	1.0045	-0.4	100	0.00
75	T	Styrene	1.0000	0.9445	5.5	100	0.00
76	P	Bromoform	1.0000	0.8992	10.1	100	0.00
77	T	Isopropylbenzene	1.0000	1.0152	-1.5	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0159	-1.6	100	0.00
80	S	p-Bromofluorobenzene	0.5000	0.5071	-1.4	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	1.0131	-1.3	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	1.0000	0.8939	10.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0379	-3.8	100	0.00
84	T	Bromobenzene	1.0000	1.0200	-2.0	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	1.0230	-2.3	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0670	-6.7	100	0.00
87	T	4-Chlorotoluene	1.0000	1.0492	-4.9	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8654	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9805	2.0	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0156	-1.6	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0761	-7.6	100	0.00
92	T	p-Isopropyltoluene	1.0000	1.0345	-3.4	100	-0.01
93	T	1,3-Dichlorobenzene	1.0000	0.9930	0.7	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	0.9933	0.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0403	-4.0	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0212	-2.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	1.0744	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	1.0078	-0.8	100	0.00
99	T	Hexachlorobutadiene	1.0000	1.0599	-6.0	100	0.00
100	T	Naphthalene	1.0000	0.9879	1.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	1.0497	-5.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	622575	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	435125	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	222815	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	5872	0.9239	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.68%#			
43) 1,2-Dichloroethane-d4	10.85	65	6086	0.9716	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.88%#			
58) Toluene-d8	13.23	98	22416	1.0096	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	4.04%#			
80) p-Bromofluorobenzene	16.64	95	8846	1.0453	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.20%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	17204	1.7405	ug/L		90
3) Chloromethane	4.04	50	31810	2.0127	ug/L		90
4) Vinyl Chloride	4.28	62	21813	1.9313	ug/L		100
5) 1,3-Butadiene	4.32	54	13563	1.8365	ug/L		98
6) Bromomethane	5.24	94	7916	1.6233	ug/L		98
7) Chloroethane	5.41	64	9130	1.8788	ug/L		79
8) Trichlorofluoromethane	5.91	101	21485	1.8560	ug/L		98
9) Diethyl ether	6.44	59	119329	24.7359	ug/L		81
10) Isoprene	6.48	67	17497	1.8377	ug/L		78
11) Acrolein	6.67	56	6469	12.2399	ug/L		91
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	12320	1.8801	ug/L		96
13) Acetone	6.77	43	2910	2.1660	ug/L		88
14) 1,1-Dichloroethene	7.02	61	18326	1.9308	ug/L		82
15) Tert-Butyl Alcohol	7.11	59	21089	50.6073	ug/L		91
16) Dimethyl Sulfide	7.28	62	13289	1.9594	ug/L		85
17) Iodomethane	7.55	142	6278	1.9004	ug/L		87
18) Methyl acetate	7.54	43	6217	1.8451	ug/L	#	93
19) Methylene Chloride	7.80	84	14280	1.9900	ug/L		58
20) Carbon Disulfide	7.86	76	40699	1.9924	ug/L		98
21) Acrylonitrile	7.97	53	18438	11.8437	ug/L		95
22) Methyl Tert Butyl Ether	8.01	73	30909	1.9643	ug/L		90
23) trans-1,2-Dichloroethene	8.26	96	13599	1.9908	ug/L		73
24) n-Hexane	8.33	57	15204	1.9682	ug/L		83
25) Diisopropyl ether	8.66	45	450794	25.6347	ug/L	#	90
26) Vinyl Acetate	8.82	43	6597	1.3515	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	22151	1.9576	ug/L		100
28) Ethyl-Tert-Butyl ether	9.24	59	449659	25.2364	ug/L		91
29) 2-Butanone	9.42	43	3106	1.8344	ug/L		84
30) Propionitrile	9.52	54	13656	24.7299	ug/L		97
31) 2,2-Dichloropropane	9.64	77	17425	2.0241	ug/L		79
32) cis-1,2-Dichloroethene	9.72	96	14760	1.9654	ug/L		85
33) Chloroform	9.92	83	24171	1.8751	ug/L		93
34) 1-Bromopropane	10.05	122	2578	1.9358	ug/L		99
35) Bromochloromethane	10.15	130	7493	1.8954	ug/L		94
36) Tetrahydrofuran	10.18	42	27217	24.4090	ug/L	#	70
38) 1,1,1-Trichloroethane	10.46	97	20272	1.9343	ug/L		87
39) Cyclohexane	10.49	56	18307	1.8890	ug/L		77
40) 1,1-Dichloropropene	10.65	75	17358	1.9593	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	419848	24.8173	ug/L		93
42) Carbon Tetrachloride	10.80	117	13633	1.6498	ug/L		96

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

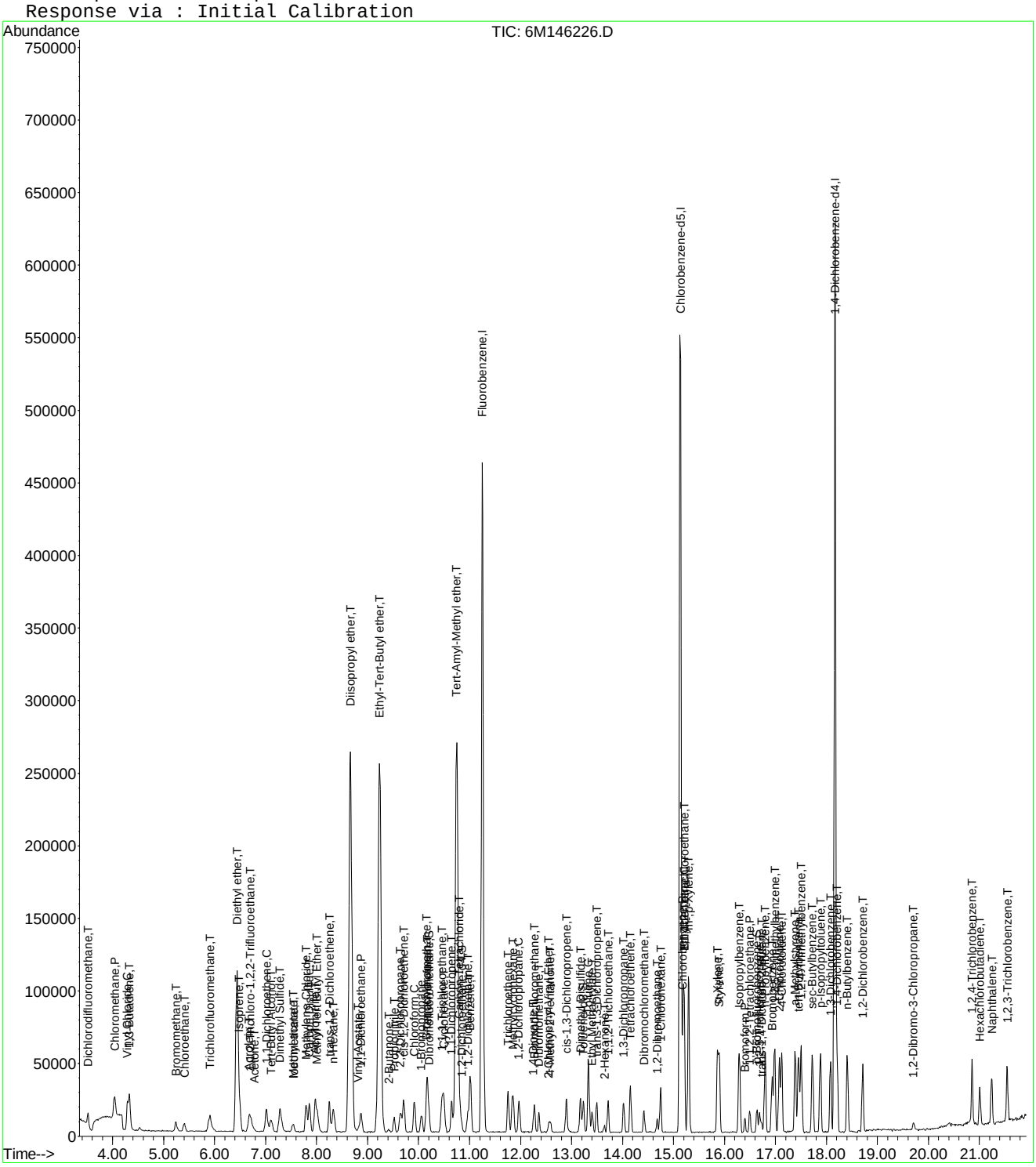
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	15260	1.9029	ug/L		88
46)	Benzene	11.01	78	53642	2.0138	ug/L		84
47)	Trichloroethene	11.76	130	13662	1.8843	ug/L		86
48)	Methylcyclohexane	11.85	83	20180	1.9264	ug/L		83
49)	1,2-Dichloropropane	11.96	63	12672	2.0157	ug/L		96
50)	1,4-Dioxane	12.25	88	2094	45.8104	ug/L		79
51)	Bromodichloromethane	12.27	83	16986	1.9140	ug/L		100
52)	Dibromomethane	12.36	93	7229	1.9525	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.54	63	3804	1.5427	ug/L		93
54)	4-Methyl-2-Pentanone	12.59	58	2633	1.6278	ug/L		97
55)	cis-1,3-Dichloropropene	12.90	75	18417	1.8845	ug/L		93
56)	Dimethyl Disulfide	13.18	79	10342	1.6774	ug/L		85
59)	Toluene	13.33	91	54153	1.9906	ug/L		99
60)	Ethyl Methacrylate	13.40	69	12139	1.8439	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	14848	1.7701	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	10051	1.9605	ug/L		100
64)	2-Hexanone	13.65	43	4642	1.8856	ug/L		83
65)	1,3-Dichloropropane	14.03	76	16522	1.9199	ug/L		72
66)	Tetrachloroethene	14.16	166	13068	1.9824	ug/L		97
67)	Dibromochloromethane	14.42	129	11966	1.8881	ug/L		99
68)	1,2-Dibromoethane	14.68	107	9631	1.9565	ug/L		98
69)	1-Chlorohexane	14.75	91	16906	1.9245	ug/L		76
70)	Chlorobenzene	15.18	112	35469	1.9050	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	12013	1.8016	ug/L		88
72)	Ethylbenzene	15.21	106	18719	1.8571	ug/L		98
73)	m-,p-Xylene	15.29	106	46470	3.8571	ug/L		92
74)	o-Xylene	15.86	106	22349	1.9223	ug/L		97
75)	Styrene	15.89	104	37462	1.9194	ug/L		98
76)	Bromoform	16.40	173	6961	1.8024	ug/L		93
77)	Isopropylbenzene	16.29	105	56507	1.9422	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	11588	1.9969	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	3156	1.8416	ug/L	#	45
82)	trans-1,4-Dichloro-2-Buten	16.73	53	2077	1.6855	ug/L	#	1
83)	n-Propylbenzene	16.79	91	68212	2.0219	ug/L		100
84)	Bromobenzene	16.94	156	14979	1.9764	ug/L		81
85)	1,3,5-Trimethylbenzene	16.99	105	48272	2.0191	ug/L		98
86)	2-Chlorotoluene	17.08	91	45900	2.0434	ug/L		97
87)	4-Chlorotoluene	17.12	91	40071	2.0184	ug/L		97
88)	a-Methylstyrene	17.38	118	23772	1.7980	ug/L		98
89)	tert-Butylbenzene	17.46	134	10046	2.0053	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	48653	1.9815	ug/L		86
91)	sec-Butylbenzene	17.72	105	59307	2.0115	ug/L		96
92)	p-Isopropyltoluene	17.88	119	48956	1.9740	ug/L		96
93)	1,3-Dichlorobenzene	18.08	146	28643	2.0012	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	28060	1.9387	ug/L		82
95)	n-Butylbenzene	18.41	91	44182	1.9509	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	25901	1.9307	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	1831	1.7419	ug/L		85
98)	1,2,4-Trichlorobenzene	20.86	180	18897	1.9251	ug/L		96
99)	Hexachlorobutadiene	21.01	225	7029	1.8748	ug/L		95
100)	Naphthalene	21.24	128	36518	1.8580	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	17908	1.8898	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7405	13.0	100	0.00
3	P	Chloromethane	2.0000	2.0127	-0.6	100	0.02
4	C	Vinyl Chloride	2.0000	1.9313	3.4	100	0.01
5	T	1,3-Butadiene	-1.0000	1.8365	0.0	0	0.01
6	T	Bromomethane	2.0000	1.6233	18.8	100	0.03
7	T	Chloroethane	2.0000	1.8788	6.1	100	0.03
8	T	Trichlorofluoromethane	2.0000	1.8560	7.2	100	0.02
9	T	Diethyl ether	25.0000	24.7359	1.1	100	0.00
10	T	Isoprene	-1.0000	1.8377	0.0	100	0.00
11	T	Acrolein	12.5000	12.2399	2.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8801	6.0	100	0.02
13	T	Acetone	-1.0000	2.1660	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9308	3.5	100	0.00
15	T	Tert-Butyl Alcohol	50.0000	50.6073	-1.2	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.9594	0.0	100	0.00
17	T	Iodomethane	2.0000	1.9004	5.0	100	0.02
18	T	Methyl acetate	-1.0000	1.8451	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.9900	0.5	100	0.00
20	T	Carbon Disulfide	2.0000	1.9924	0.4	100	0.00
21	T	Acrylonitrile	12.5000	11.8437	5.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.9643	1.8	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9908	0.5	100	0.00
24	T	n-Hexane	-1.0000	1.9682	0.0	100	0.00
25	T	Diisopropyl ether	25.0000	25.6347	-2.5	100	0.00
26	T	Vinyl Acetate	-1.0000	1.3515	0.0	100	-0.01
27	P	1,1-Dichloroethane	2.0000	1.9576	2.1	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	25.2364	-0.9	100	0.00
29	T	2-Butanone	-1.0000	1.8344	0.0	100	0.00
30	T	Propionitrile	25.0000	24.7299	1.1	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0241	-1.2	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9654	1.7	100	0.00
33	C	Chloroform	2.0000	1.8751	6.2	100	0.00
34		1-Bromopropane	2.0000	1.9358	3.2	100	0.00
35	T	Bromochloromethane	2.0000	1.8954	5.2	100	0.00
36	T	Tetrahydrofuran	25.0000	24.4090	2.4	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9239	7.6	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.9343	3.3	100	0.00
39	T	Cyclohexane	2.0000	1.8890	5.5	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9593	2.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.8173	0.7	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.6498	17.5	100	-0.01
43	S	1,2-Dichloroethane-d4	1.0000	0.9716	2.8	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	2.0000	1.9029	4.9	100	0.00
46	T	Benzene	2.0000	2.0138	-0.7	100	0.00
47	T	Trichloroethene	2.0000	1.8843	5.8	100	0.00
48	T	Methylcyclohexane	-1.0000	1.9264	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	2.0158	-0.8	100	-0.01
50	T	1,4-Dioxane	-1.0000	45.8104	0.0	100	0.00
51	T	Bromodichloromethane	2.0000	1.9140	4.3	100	0.00
52	T	Dibromomethane	2.0000	1.9525	2.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.5427	22.9#	100	-0.01
54	T	4-Methyl-2-Pentanone	-1.0000	1.6278	0.0	100	0.00

(#) = Out of Range
6M146226.D 8260BWT.M Thu Apr 06 15:02:50 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8845	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	1.6774	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	1.0096	-1.0	100	0.00
59	C	Toluene	2.0000	1.9906	0.5	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.8439	7.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	2.0000	1.7701	11.5	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9605	2.0	100	0.00
64	T	2-Hexanone	-1.0000	1.8856	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9199	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9824	0.9	100	0.00
67	T	Dibromochloromethane	2.0000	1.8882	5.6	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9565	2.2	100	0.00
69	T	1-Chlorohexane	2.0000	1.9245	3.8	100	0.00
70	P	Chlorobenzene	2.0000	1.9050	4.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8016	9.9	100	0.00
72	C	Ethylbenzene	2.0000	1.8571	7.1	100	0.00
73	T	m-,p-Xylene	4.0000	3.8571	3.6	100	0.00
74	T	o-Xylene	2.0000	1.9223	3.9	100	0.00
75	T	Styrene	2.0000	1.9194	4.0	100	-0.01
76	P	Bromoform	2.0000	1.8024	9.9	100	0.00
77	T	Isopropylbenzene	2.0000	1.9422	2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9969	0.2	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0453	-4.5	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8416	7.9	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.6855	15.7	100	0.00
83	T	n-Propylbenzene	2.0000	2.0219	-1.1	100	0.00
84	T	Bromobenzene	2.0000	1.9764	1.2	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	2.0191	-1.0	100	0.00
86	T	2-Chlorotoluene	2.0000	2.0434	-2.2	100	0.00
87	T	4-Chlorotoluene	2.0000	2.0184	-0.9	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7980	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	2.0053	-0.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	1.9815	0.9	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0115	-0.6	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9740	1.3	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	2.0012	-0.1	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9387	3.1	100	0.00
95	T	n-Butylbenzene	2.0000	1.9509	2.5	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	1.9307	3.5	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7419	12.9	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.9251	3.7	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.8748	6.3	100	0.00
100	T	Naphthalene	2.0000	1.8580	7.1	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8898	5.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146226.D 8260BWT.M Thu Apr 06 15:02:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	624930	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	437844	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	229708	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	16009	2.5095	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 10.04%#				
43) 1,2-Dichloroethane-d4	10.85	65	15355	2.4422	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 9.76%#				
58) Toluene-d8	13.24	98	57180	2.5593	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 10.24%#				
80) p-Bromofluorobenzene	16.64	95	20953	2.4017	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 9.60%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	45599	4.5957	ug/L		94
3) Chloromethane	4.04	50	70172	5.3733	ug/L		92
4) Vinyl Chloride	4.28	62	52481	4.6291	ug/L		100
5) 1,3-Butadiene	4.33	54	27485	5.0651	ug/L		93
6) Bromomethane	5.24	94	22408	4.5778	ug/L		98
7) Chloroethane	5.41	64	24876	5.0998	ug/L		86
8) Trichlorofluoromethane	5.91	101	57306	4.9318	ug/L		99
9) Diethyl ether	6.44	59	241182	49.8065	ug/L		81
10) Isoprene	6.48	67	45799	4.7920	ug/L		80
11) Acrolein	6.67	56	13253	24.9813	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	32606	4.9572	ug/L		97
13) Acetone	6.77	43	7120	5.2798	ug/L		90
14) 1,1-Dichloroethene	7.01	61	48384	5.0784	ug/L		84
15) Tert-Butyl Alcohol	7.11	59	45515	108.8107	ug/L		90
16) Dimethyl Sulfide	7.28	62	33336	4.8967	ug/L		83
17) Iodomethane	7.54	142	18689	4.0940	ug/L		98
18) Methyl acetate	7.53	43	16127	4.7683	ug/L		90
19) Methylene Chloride	7.80	84	35921	4.9870	ug/L		61
20) Carbon Disulfide	7.86	76	101736	4.9617	ug/L		99
21) Acrylonitrile	7.97	53	39515	25.2869	ug/L		94
22) Methyl Tert Butyl Ether	8.01	73	82575	5.2279	ug/L		89
23) trans-1,2-Dichloroethene	8.26	96	34052	4.9661	ug/L		78
24) n-Hexane	8.33	57	39086	5.0408	ug/L		81
25) Diisopropyl ether	8.66	45	886670	50.2311	ug/L	#	90
26) Vinyl Acetate	8.83	43	24007	4.8995	ug/L	#	91
27) 1,1-Dichloroethane	8.87	63	57099	5.0271	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	897158	50.1618	ug/L		90
29) 2-Butanone	9.42	43	8484	4.9917	ug/L		88
30) Propionitrile	9.52	54	29088	52.4775	ug/L		99
31) 2,2-Dichloropropane	9.65	77	44879	5.1936	ug/L		78
32) cis-1,2-Dichloroethene	9.71	96	37579	4.9850	ug/L		89
33) Chloroform	9.92	83	60253	4.6565	ug/L		95
34) 1-Bromopropane	10.06	122	6559	4.9064	ug/L		100
35) Bromochloromethane	10.15	130	20571	5.1839	ug/L		98
36) Tetrahydrofuran	10.17	42	56370	50.3637	ug/L	#	72
38) 1,1,1-Trichloroethane	10.46	97	51277	4.8743	ug/L		91
39) Cyclohexane	10.49	56	47949	4.9291	ug/L		78
40) 1,1-Dichloropropene	10.64	75	44354	4.9877	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	851603	50.1488	ug/L		93
42) Carbon Tetrachloride	10.80	117	40401	4.8706	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

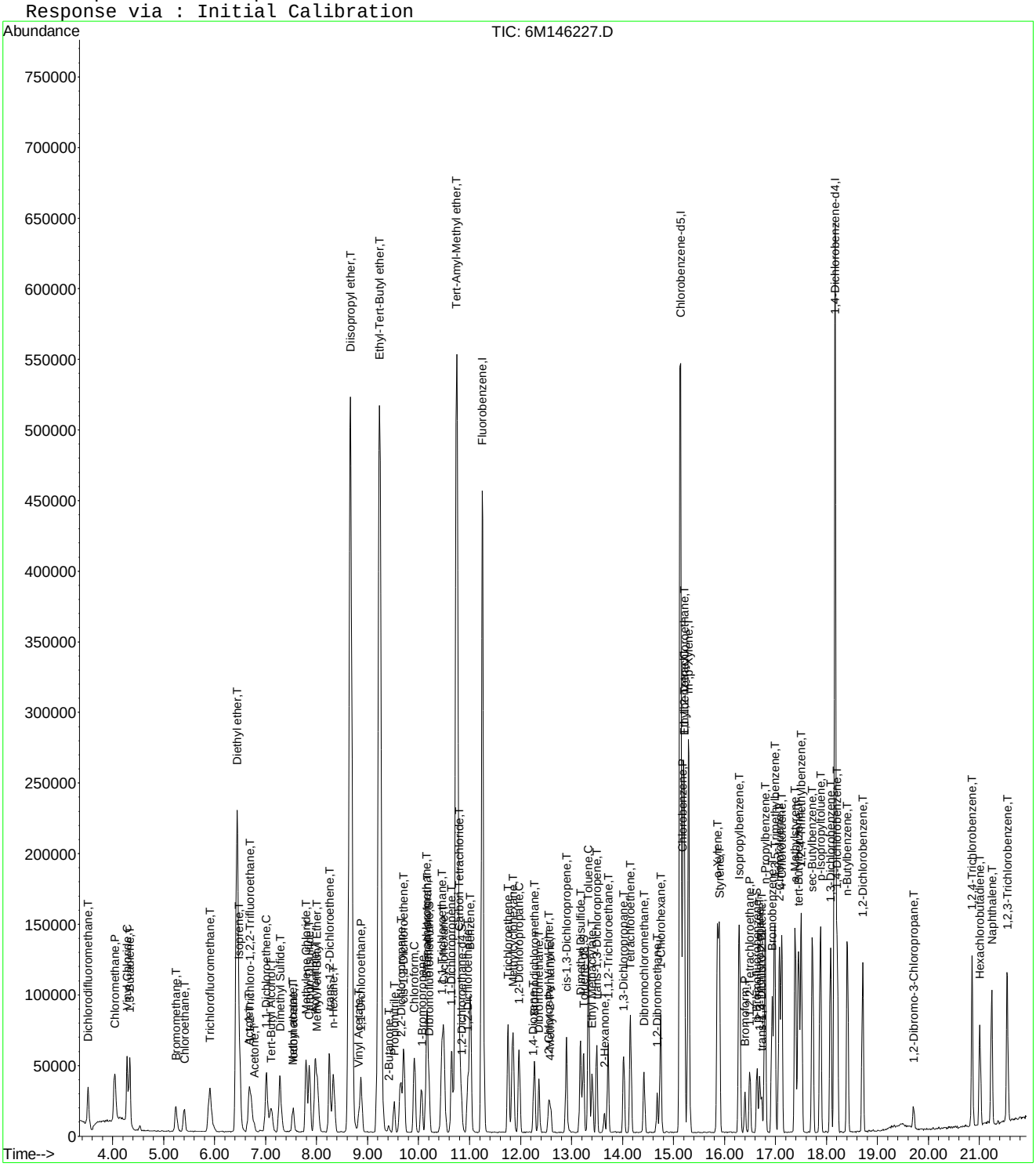
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	40993	5.0925	ug/L		88
46)	Benzene	11.01	78	132914	4.9709	ug/L		86
47)	Trichloroethene	11.76	130	36216	4.9761	ug/L		84
48)	Methylcyclohexane	11.85	83	51654	4.9123	ug/L		82
49)	1,2-Dichloropropane	11.97	63	32123	5.0906	ug/L		96
50)	1,4-Dioxane	12.25	88	4272	93.1064	ug/L		79
51)	Bromodichloromethane	12.27	83	44761	5.0248	ug/L		99
52)	Dibromomethane	12.36	93	19386	5.2162	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	12476	5.0404	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	7903	4.8674	ug/L		86
55)	cis-1,3-Dichloropropene	12.90	75	50089	5.1061	ug/L		95
56)	Dimethyl Disulfide	13.18	79	28390	4.5874	ug/L		89
59)	Toluene	13.33	91	137485	5.0224	ug/L		100
60)	Ethyl Methacrylate	13.40	69	33232	5.0167	ug/L		72
62)	trans-1,3-Dichloropropene	13.49	75	42828	5.0741	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	26530	5.1428	ug/L		99
64)	2-Hexanone	13.65	43	12468	5.0332	ug/L		86
65)	1,3-Dichloropropane	14.02	76	44093	5.0920	ug/L		70
66)	Tetrachloroethene	14.16	166	33551	5.0579	ug/L		98
67)	Dibromochloromethane	14.42	129	31682	4.9681	ug/L		99
68)	1,2-Dibromoethane	14.68	107	24528	4.9517	ug/L		99
69)	1-Chlorohexane	14.75	91	43721	4.9460	ug/L		79
70)	Chlorobenzene	15.18	112	91449	4.8810	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.21	131	32496	4.8433	ug/L		89
72)	Ethylbenzene	15.21	106	48984	4.8296	ug/L		96
73)	m-,p-Xylene	15.29	106	119341	9.8441	ug/L		94
74)	o-Xylene	15.86	106	57354	4.9026	ug/L		97
75)	Styrene	15.90	104	98078	4.9940	ug/L		95
76)	Bromoform	16.40	173	18699	4.8117	ug/L		99
77)	Isopropylbenzene	16.29	105	146585	5.0070	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	30970	5.1767	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	9050	5.1225	ug/L	#	50
82)	trans-1,4-Dichloro-2-Buten	16.73	53	6208	4.8867	ug/L	#	1
83)	n-Propylbenzene	16.80	91	176740	5.0817	ug/L		100
84)	Bromobenzene	16.93	156	38734	4.9575	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	121939	4.9473	ug/L		99
86)	2-Chlorotoluene	17.08	91	114766	4.9559	ug/L		97
87)	4-Chlorotoluene	17.12	91	102125	4.9897	ug/L		97
88)	a-Methylstyrene	17.38	118	66394	4.8711	ug/L		96
89)	tert-Butylbenzene	17.46	134	24993	4.8393	ug/L		71
90)	1,2,4-Trimethylbenzene	17.51	105	126114	4.9821	ug/L		87
91)	sec-Butylbenzene	17.72	105	152633	5.0216	ug/L		97
92)	p-Isopropyltoluene	17.88	119	126283	4.9391	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	71556	4.8495	ug/L		97
94)	1,4-Dichlorobenzene	18.21	146	72485	4.8577	ug/L		94
95)	n-Butylbenzene	18.41	91	115961	4.9668	ug/L		99
96)	1,2-Dichlorobenzene	18.71	146	67580	4.8863	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.71	75	5531	5.1041	ug/L		98
98)	1,2,4-Trichlorobenzene	20.86	180	48642	4.8067	ug/L		98
99)	Hexachlorobutadiene	21.01	225	19187	4.9642	ug/L		98
100)	Naphthalene	21.24	128	101621	5.0152	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	45886	4.6970	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.5957	8.1	100	0.00
3	P	Chloromethane	5.0000	5.3733	-7.5	100	0.02
4	C	Vinyl Chloride	5.0000	4.6291	7.4	100	0.00
5	T	1,3-Butadiene	5.0000	5.0651	-1.3	100	0.02
6	T	Bromomethane	5.0000	4.5778	8.4	100	0.03
7	T	Chloroethane	5.0000	5.0998	-2.0	100	0.03
8	T	Trichlorofluoromethane	5.0000	4.9318	1.4	100	0.02
9	T	Diethyl ether	50.0000	49.8065	0.4	100	0.00
10	T	Isoprene	5.0000	4.7920	4.2	100	0.00
11	T	Acrolein	25.0000	24.9813	0.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.9572	0.9	100	0.00
13	T	Acetone	5.0000	5.2798	-5.6	100	0.00
14	C	1,1-Dichloroethene	5.0000	5.0784	-1.6	100	0.00
15	T	Tert-Butyl Alcohol	100.0000	108.8107	-8.8	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8967	2.1	100	0.00
17	T	Iodomethane	5.0000	4.0940	18.1	100	0.00
18	T	Methyl acetate	5.0000	4.7683	4.6	100	0.00
19	T	Methylene Chloride	5.0000	4.9870	0.3	100	0.00
20	T	Carbon Disulfide	5.0000	4.9617	0.8	100	0.00
21	T	Acrylonitrile	25.0000	25.2869	-1.1	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	5.2279	-4.6	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.9661	0.7	100	0.00
24	T	n-Hexane	5.0000	5.0408	-0.8	100	0.00
25	T	Diisopropyl ether	50.0000	50.2311	-0.5	100	0.00
26	T	Vinyl Acetate	5.0000	4.8995	2.0	100	0.00
27	P	1,1-Dichloroethane	5.0000	5.0271	-0.5	100	0.00
28	T	Ethyl-Tert-Butyl ether	50.0000	50.1618	-0.3	100	0.00
29	T	2-Butanone	5.0000	4.9917	0.2	100	0.00
30	T	Propionitrile	50.0000	52.4775	-5.0	100	0.00
31	T	2,2-Dichloropropane	5.0000	5.1936	-3.9	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9850	0.3	100	0.00
33	C	Chloroform	5.0000	4.6565	6.9	100	0.00
34		1-Bromopropane	5.0000	4.9064	1.9	100	0.00
35	T	Bromochloromethane	5.0000	5.1839	-3.7	100	0.00
36	T	Tetrahydrofuran	50.0000	50.3637	-0.7	100	0.00
37	S	Dibromofluoromethane	2.5000	2.5095	-0.4	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8743	2.5	100	0.00
39	T	Cyclohexane	5.0000	4.9291	1.4	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.9877	0.2	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	50.1488	-0.3	100	0.00
42	T	Carbon Tetrachloride	5.0000	4.8706	2.6	100	-0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4421	2.3	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	0.00
45	T	1,2-Dichloroethane	5.0000	5.0925	-1.9	100	0.00
46	T	Benzene	5.0000	4.9709	0.6	100	0.00
47	T	Trichloroethene	5.0000	4.9761	0.5	100	0.00
48	T	Methylcyclohexane	5.0000	4.9123	1.8	100	0.00
49	C	1,2-Dichloropropane	5.0000	5.0906	-1.8	100	0.00
50	T	1,4-Dioxane	100.0000	93.1064	6.9	100	0.00
51	T	Bromodichloromethane	5.0000	5.0248	-0.5	100	0.00
52	T	Dibromomethane	5.0000	5.2162	-4.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	5.0404	-0.8	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.8674	2.7	100	0.00

(#) = Out of Range
6M146227.D 8260BWT.M Thu Apr 06 15:03:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	5.1061	-2.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	4.5874	8.3	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.5593	-2.4	100	0.00
59	C	Toluene	5.0000	5.0224	-0.4	100	0.00
60	T	Ethyl Methacrylate	5.0000	5.0167	-0.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	5.0000	5.0741	-1.5	100	0.00
63	T	1,1,2-Trichloroethane	5.0000	5.1428	-2.9	100	0.00
64	T	2-Hexanone	5.0000	5.0332	-0.7	100	0.00
65	T	1,3-Dichloropropane	5.0000	5.0920	-1.8	100	0.00
66	T	Tetrachloroethene	5.0000	5.0579	-1.2	100	0.00
67	T	Dibromochloromethane	5.0000	4.9681	0.6	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9517	1.0	100	0.00
69	T	1-Chlorohexane	5.0000	4.9460	1.1	100	0.00
70	P	Chlorobenzene	5.0000	4.8810	2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.8433	3.1	100	0.00
72	C	Ethylbenzene	5.0000	4.8296	3.4	100	0.00
73	T	m-,p-Xylene	10.0000	9.8441	1.6	100	0.00
74	T	o-Xylene	5.0000	4.9026	1.9	100	0.00
75	T	Styrene	5.0000	4.9940	0.1	100	0.00
76	P	Bromoform	5.0000	4.8117	3.8	100	0.00
77	T	Isopropylbenzene	5.0000	5.0070	-0.1	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	5.1767	-3.5	100	0.00
80	S	p-Bromofluorobenzene	2.5000	2.4017	3.9	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	5.1225	-2.5	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.8867	2.3	100	0.00
83	T	n-Propylbenzene	5.0000	5.0817	-1.6	100	0.00
84	T	Bromobenzene	5.0000	4.9575	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9473	1.1	100	0.00
86	T	2-Chlorotoluene	5.0000	4.9558	0.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.9897	0.2	100	0.00
88	T	a-Methylstyrene	5.0000	4.8711	2.6	100	0.00
89	T	tert-Butylbenzene	5.0000	4.8393	3.2	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9821	0.4	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0216	-0.4	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9391	1.2	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8495	3.0	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.8577	2.8	100	0.00
95	T	n-Butylbenzene	5.0000	4.9668	0.7	100	0.00
96	T	1,2-Dichlorobenzene	5.0000	4.8863	2.3	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	5.1041	-2.1	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.8067	3.9	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.9642	0.7	100	0.00
100	T	Naphthalene	5.0000	5.0152	-0.3	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.6970	6.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146227.D 8260BWT.M Thu Apr 06 15:03:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	627241	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	447577	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	235510	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	65613	10.2471	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 41.00%#				
43) 1,2-Dichloroethane-d4	10.84	65	64459	10.2142	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.84%#				
58) Toluene-d8	13.23	98	228384	9.9998	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 40.00%#				
80) p-Bromofluorobenzene	16.63	95	91659	10.2472	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 41.00%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	217664	21.8564	ug/L		93
3) Chloromethane	4.03	50	264881	22.3981	ug/L		99
4) Vinyl Chloride	4.29	62	233054	20.4810	ug/L		99
5) 1,3-Butadiene	4.33	54	106373	23.7613	ug/L		88
6) Bromomethane	5.24	94	98255	19.9988	ug/L		97
7) Chloroethane	5.40	64	103887	21.2191	ug/L		84
8) Trichlorofluoromethane	5.91	101	240343	20.6080	ug/L		99
9) Diethyl ether	6.44	59	380286	78.2436	ug/L		82
10) Isoprene	6.48	67	178379	18.5952	ug/L		80
11) Acrolein	6.68	56	20488	38.4767	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.71	101	132626	20.0893	ug/L		98
13) Acetone	6.78	43	28940	21.3811	ug/L		93
14) 1,1-Dichloroethene	7.01	61	195653	20.4603	ug/L		83
15) Tert-Butyl Alcohol	7.11	59	64817	154.3843	ug/L		90
16) Dimethyl Sulfide	7.28	62	130765	19.1371	ug/L		78
17) Iodomethane	7.54	142	98959	18.2438	ug/L		99
18) Methyl acetate	7.53	43	62843	18.5124	ug/L	#	82
19) Methylene Chloride	7.80	84	143369	19.8310	ug/L		60
20) Carbon Disulfide	7.86	76	390904	18.9942	ug/L		100
21) Acrylonitrile	7.96	53	63296	40.3559	ug/L		97
22) Methyl Tert Butyl Ether	8.01	73	330905	20.8726	ug/L		90
23) trans-1,2-Dichloroethene	8.25	96	138532	20.1290	ug/L		77
24) n-Hexane	8.33	57	145559	18.7032	ug/L		83
25) Diisopropyl ether	8.66	45	1403454	79.2147	ug/L	#	90
26) Vinyl Acetate	8.83	43	85023	17.2882	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	233405	20.4736	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1415029	78.8255	ug/L		91
29) 2-Butanone	9.41	43	34173	20.0320	ug/L	#	81
30) Propionitrile	9.52	54	43958	79.0122	ug/L		100
31) 2,2-Dichloropropane	9.65	77	149189	17.2012	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	151702	20.0499	ug/L		88
33) Chloroform	9.91	83	241705	18.6109	ug/L		94
34) 1-Bromopropane	10.06	122	28065	20.9166	ug/L		97
35) Bromochloromethane	10.15	130	85288	21.4135	ug/L		99
36) Tetrahydrofuran	10.18	42	86703	77.1792	ug/L	#	71
38) 1,1,1-Trichloroethane	10.45	97	212928	20.1661	ug/L		91
39) Cyclohexane	10.49	56	183893	18.8342	ug/L		77
40) 1,1-Dichloropropene	10.65	75	179871	20.1524	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	1330159	78.0412	ug/L		93
42) Carbon Tetrachloride	10.80	117	176032	21.1436	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

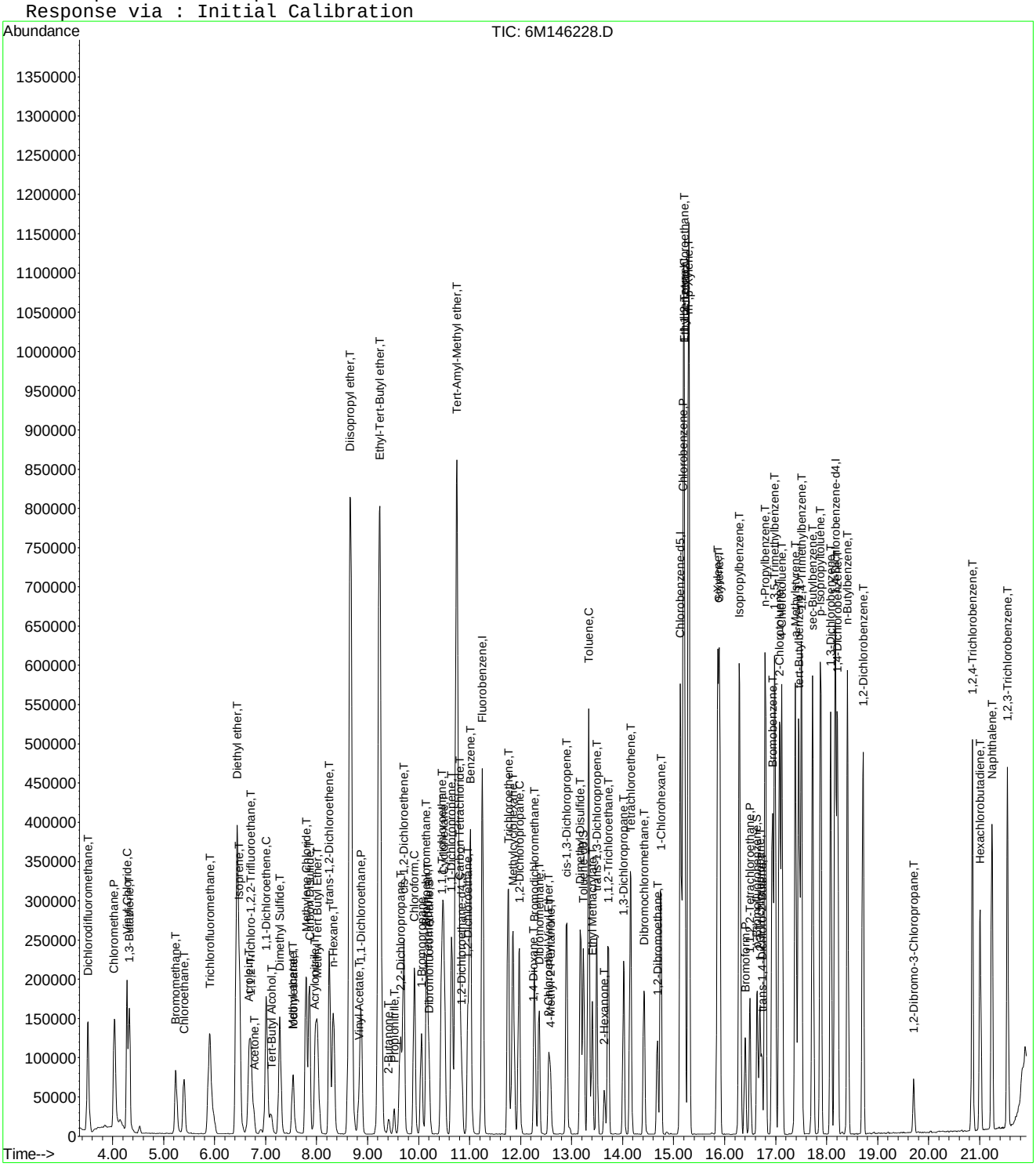
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	162109	20.0644	ug/L		89
46)	Benzene	11.02	78	529115	19.7158	ug/L		86
47)	Trichloroethene	11.76	130	150238	20.5667	ug/L		87
48)	Methylcyclohexane	11.85	83	197423	18.7059	ug/L		81
49)	1,2-Dichloropropane	11.98	63	131909	20.8268	ug/L		95
50)	1,4-Dioxane	12.25	88	7005	152.1084	ug/L		87
51)	Bromodichloromethane	12.27	83	185470	20.7439	ug/L		99
52)	Dibromomethane	12.36	93	77214	20.6995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	53194	21.4116	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	32212	19.7660	ug/L		82
55)	cis-1,3-Dichloropropene	12.90	75	206895	21.0133	ug/L		96
56)	Dimethyl Disulfide	13.17	79	112927	18.1801	ug/L		89
59)	Toluene	13.33	91	555221	19.8416	ug/L		100
60)	Ethyl Methacrylate	13.40	69	129462	19.1184	ug/L		71
62)	trans-1,3-Dichloropropene	13.50	75	176914	20.5042	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107303	20.3482	ug/L		99
64)	2-Hexanone	13.64	43	50259	19.8477	ug/L		85
65)	1,3-Dichloropropane	14.02	76	178966	20.2181	ug/L		71
66)	Tetrachloroethene	14.16	166	136246	20.0929	ug/L		96
67)	Dibromochloromethane	14.42	129	135202	20.7404	ug/L		99
68)	1,2-Dibromoethane	14.68	107	100778	19.9028	ug/L		98
69)	1-Chlorohexane	14.75	91	167924	18.5834	ug/L		76
70)	Chlorobenzene	15.18	112	374272	19.5421	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	138016	20.1228	ug/L		94
72)	Ethylbenzene	15.21	106	202068	19.4896	ug/L		96
73)	m-,p-Xylene	15.29	106	481680	38.8682	ug/L		93
74)	o-Xylene	15.87	106	239598	20.0353	ug/L		93
75)	Styrene	15.90	104	405734	20.2101	ug/L		95
76)	Bromoform	16.41	173	81039	20.4000	ug/L		99
77)	Isopropylbenzene	16.28	105	597096	19.9520	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	119591	19.4973	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	37129	20.4983	ug/L		64
82)	trans-1,4-Dichloro-2-Buten	16.73	53	24964	19.1666	ug/L	#	1
83)	n-Propylbenzene	16.80	91	713905	20.0209	ug/L		99
84)	Bromobenzene	16.94	156	161202	20.1236	ug/L		85
85)	1,3,5-Trimethylbenzene	16.98	105	501322	19.8384	ug/L		100
86)	2-Chlorotoluene	17.07	91	485880	20.4645	ug/L		97
87)	4-Chlorotoluene	17.12	91	386400	18.4139	ug/L		95
88)	a-Methylstyrene	17.39	118	257428	18.4215	ug/L		99
89)	tert-Butylbenzene	17.46	134	106931	20.1945	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	519993	20.0363	ug/L		87
91)	sec-Butylbenzene	17.72	105	621099	19.9306	ug/L		98
92)	p-Isopropyltoluene	17.88	119	523649	19.9759	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	301598	19.9362	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	300266	19.6272	ug/L		97
95)	n-Butylbenzene	18.41	91	473351	19.7747	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	282119	19.8957	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	22784	20.5074	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	203918	19.6545	ug/L		98
99)	Hexachlorobutadiene	21.01	225	76009	19.1810	ug/L		99
100)	Naphthalene	21.24	128	421214	20.2755	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	187267	18.6967	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.26	96	643185	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	452398	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	244954	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	166582	25.3710	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.48%				
43) 1,2-Dichloroethane-d4	10.85	65	162624	25.1306	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.52%				
58) Toluene-d8	13.24	98	572476	24.7988	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.20%				
80) p-Bromofluorobenzene	16.64	95	228722	24.5846	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.32%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	553692	54.2200	ug/L		93
3) Chloromethane	4.04	50	600762	50.5019	ug/L		96
4) Vinyl Chloride	4.28	62	580327	49.7355	ug/L		98
5) 1,3-Butadiene	4.32	54	226006	52.2463	ug/L		89
6) Bromomethane	5.24	94	282558	56.0861	ug/L		99
7) Chloroethane	5.40	64	261262	52.0405	ug/L		86
8) Trichlorofluoromethane	5.91	101	620646	51.8976	ug/L		99
9) Diethyl ether	6.44	59	492985	98.9169	ug/L		81
10) Isoprene	6.48	67	496738	50.4991	ug/L		80
11) Acrolein	6.67	56	27556	50.4676	ug/L		96
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	339922	50.2127	ug/L		99
13) Acetone	6.77	43	71305	51.3749	ug/L		91
14) 1,1-Dichloroethene	7.02	61	496978	50.6828	ug/L		82
15) Tert-Butyl Alcohol	7.11	59	73877	171.6018	ug/L		92
16) Dimethyl Sulfide	7.27	62	354958	50.6595	ug/L		78
17) Iodomethane	7.54	142	275688	48.2182	ug/L		99
18) Methyl acetate	7.53	43	172494	49.5541	ug/L	#	83
19) Methylene Chloride	7.80	84	366519	49.4406	ug/L		58
20) Carbon Disulfide	7.86	76	1082478	51.2943	ug/L		99
21) Acrylonitrile	7.97	53	85120	52.9250	ug/L		99
22) Methyl Tert Butyl Ether	8.01	73	811828	49.9385	ug/L		90
23) trans-1,2-Dichloroethene	8.26	96	354872	50.2856	ug/L		76
24) n-Hexane	8.33	57	401945	50.3665	ug/L		84
25) Diisopropyl ether	8.66	45	1784496	98.2249	ug/L	#	89
26) Vinyl Acetate	8.83	43	213738	42.3833	ug/L	#	86
27) 1,1-Dichloroethane	8.87	63	581534	49.7460	ug/L		98
28) Ethyl-Tert-Butyl ether	9.24	59	1807267	98.1798	ug/L		90
29) 2-Butanone	9.42	43	84730	48.4371	ug/L	#	77
30) Propionitrile	9.52	54	58459	102.4722	ug/L		99
31) 2,2-Dichloropropane	9.65	77	356297	40.0620	ug/L		78
32) cis-1,2-Dichloroethene	9.72	96	387448	49.9382	ug/L		85
33) Chloroform	9.92	83	612607	46.0004	ug/L		95
34) 1-Bromopropane	10.06	122	73633	53.5176	ug/L		100
35) Bromochloromethane	10.15	130	215507	52.7668	ug/L		100
36) Tetrahydrofuran	10.17	42	110912	96.2816	ug/L	#	70
38) 1,1,1-Trichloroethane	10.46	97	545213	50.3562	ug/L		90
39) Cyclohexane	10.49	56	510981	51.0369	ug/L		77
40) 1,1-Dichloropropene	10.65	75	459189	50.1714	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	1722091	98.5314	ug/L		92
42) Carbon Tetrachloride	10.80	117	471043	55.1754	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

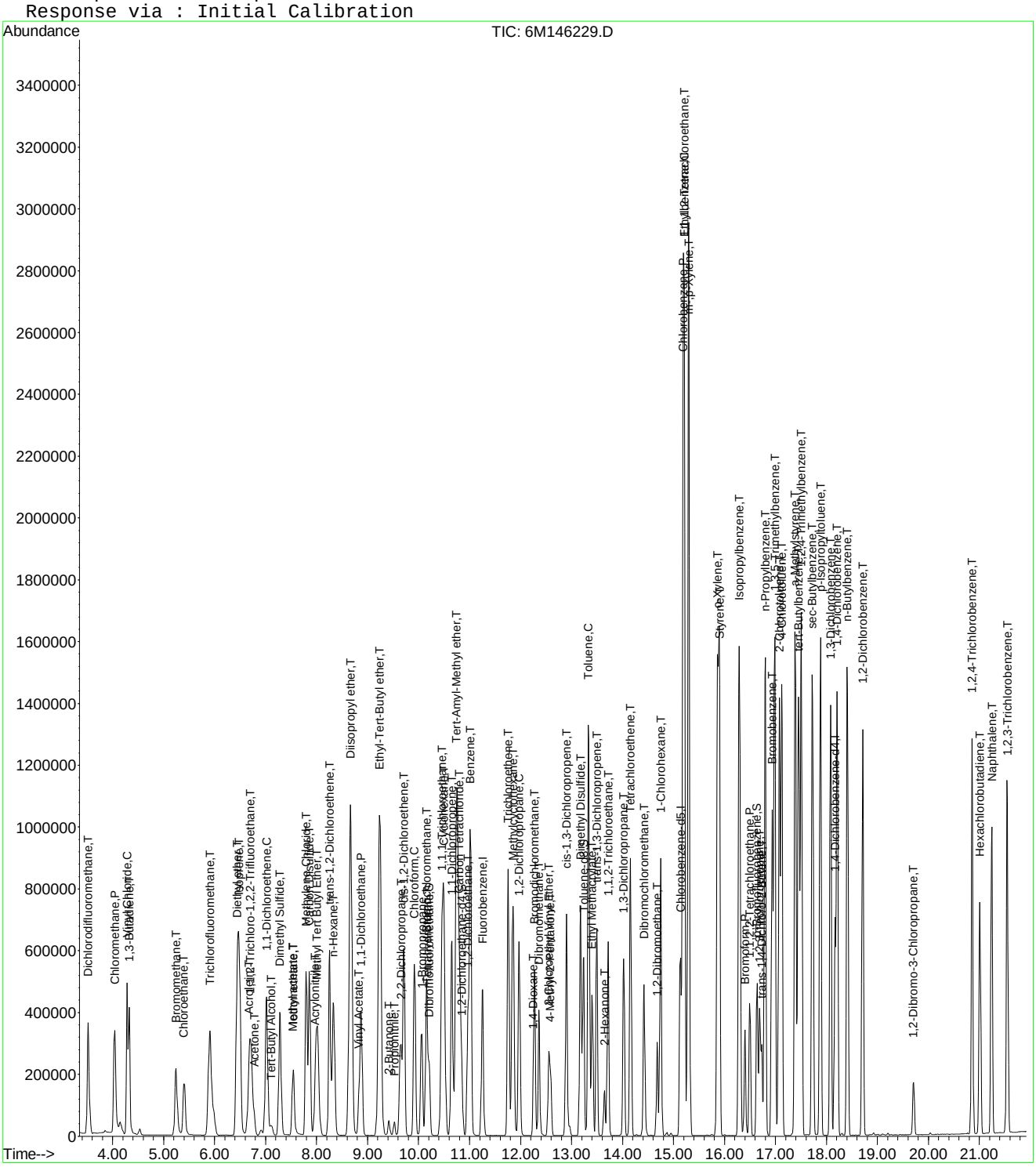
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	412436	49.7821	ug/L		89
46)	Benzene	11.01	78	1319158	47.9357	ug/L		87
47)	Trichloroethene	11.76	130	387869	51.7807	ug/L		87
48)	Methylcyclohexane	11.85	83	542828	50.1582	ug/L		81
49)	1,2-Dichloropropane	11.97	63	328985	50.6551	ug/L		93
50)	1,4-Dioxane	12.25	88	9841	208.3929	ug/L		83
51)	Bromodichloromethane	12.27	83	474501	51.7551	ug/L		99
52)	Dibromomethane	12.36	93	196449	51.3585	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	136743	53.6772	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	82093	49.1253	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	524104	51.9110	ug/L		95
56)	Dimethyl Disulfide	13.18	79	317578	49.8595	ug/L		90
59)	Toluene	13.33	91	1390320	49.1555	ug/L		99
60)	Ethyl Methacrylate	13.40	69	348973	50.9857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	449513	51.5430	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	269281	50.5203	ug/L		99
64)	2-Hexanone	13.65	43	126266	49.3321	ug/L		84
65)	1,3-Dichloropropane	14.02	76	449481	50.2374	ug/L		71
66)	Tetrachloroethene	14.16	166	348547	50.8542	ug/L		96
67)	Dibromochloromethane	14.42	129	344760	52.3235	ug/L		100
68)	1,2-Dibromoethane	14.68	107	258841	50.5741	ug/L		99
69)	1-Chlorohexane	14.75	91	464382	50.8434	ug/L		76
70)	Chlorobenzene	15.19	112	963037	49.7477	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	362017	52.2198	ug/L		100
72)	Ethylbenzene	15.21	106	525624	50.1565	ug/L		94
73)	m-,p-Xylene	15.30	106	1260386	100.6206	ug/L		93
74)	o-Xylene	15.86	106	613404	50.7466	ug/L		93
75)	Styrene	15.90	104	1057078	52.0932	ug/L		95
76)	Bromoform	16.40	173	214895	53.5191	ug/L		100
77)	Isopropylbenzene	16.29	105	1536873	50.8076	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	296759	46.5163	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	93220	49.4809	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	69453	51.2682	ug/L	#	1
83)	n-Propylbenzene	16.80	91	1831263	49.3764	ug/L		99
84)	Bromobenzene	16.93	156	411541	49.3938	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	1296579	49.3302	ug/L		99
86)	2-Chlorotoluene	17.08	91	1170064	47.3812	ug/L		97
87)	4-Chlorotoluene	17.12	91	1072560	49.1422	ug/L		95
88)	a-Methylstyrene	17.38	118	716903	49.3235	ug/L		100
89)	tert-Butylbenzene	17.46	134	276611	50.2256	ug/L		89
90)	1,2,4-Trimethylbenzene	17.51	105	1344827	49.8208	ug/L		86
91)	sec-Butylbenzene	17.72	105	1604756	49.5099	ug/L		98
92)	p-Isopropyltoluene	17.88	119	1361479	49.9346	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	771343	49.0216	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	773205	48.5928	ug/L		98
95)	n-Butylbenzene	18.41	91	1242193	49.8932	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	721223	48.9013	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	58274	50.4290	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	530769	49.1854	ug/L		99
99)	Hexachlorobutadiene	21.01	225	200495	48.6445	ug/L		100
100)	Naphthalene	21.24	128	1087303	50.3204	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	486226	46.6732	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	664065	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	468638	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	250611	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	341745	50.4124 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 201.64%#		
43) 1,2-Dichloroethane-d4	10.85	65	335061	50.1496 ug/L	0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 200.60%#		
58) Toluene-d8	13.23	98	1165336	48.7313 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 194.92%#		
80) p-Bromofluorobenzene	16.64	95	452319	47.5209 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 190.08%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	1092279	103.5976 ug/L	93
3) Chloromethane	4.04	50	1229045	100.8473 ug/L	98
4) Vinyl Chloride	4.27	62	967994	80.3511 ug/L	98
5) 1,3-Butadiene	4.32	54	358708	83.9572 ug/L	89
6) Bromomethane	5.23	94	557041	107.0928 ug/L	99
7) Chloroethane	5.40	64	501046	96.6647 ug/L	86
8) Trichlorofluoromethane	5.90	101	1280944	103.7431 ug/L	99
9) Diethyl ether	6.44	59	1046407	203.3587 ug/L	80
10) Isoprene	6.48	67	1028447	101.2660 ug/L	80
11) Acrolein	6.67	56	60742	107.7484 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	703798	100.6949 ug/L	99
13) Acetone	6.78	43	140983	98.3836 ug/L	90
14) 1,1-Dichloroethene	7.01	61	1000191	98.7943 ug/L	81
15) Tert-Butyl Alcohol	7.11	59	188168	423.3346 ug/L	91
16) Dimethyl Sulfide	7.28	62	716529	99.0473 ug/L	78
17) Iodomethane	7.54	142	665529	111.6922 ug/L	98
18) Methyl acetate	7.53	43	370733	103.1554 ug/L #	80
19) Methylene Chloride	7.80	84	728236	95.1448 ug/L	58
20) Carbon Disulfide	7.86	76	2173570	99.7583 ug/L	99
21) Acrylonitrile	7.97	53	179187	107.9098 ug/L	100
22) Methyl Tert Butyl Ether	8.01	73	1646227	98.0813 ug/L	91
23) trans-1,2-Dichloroethene	8.25	96	720013	98.8182 ug/L	75
24) n-Hexane	8.33	57	825655	100.2073 ug/L	84
25) Diisopropyl ether	8.66	45	3713047	197.9529 ug/L #	89
26) Vinyl Acetate	8.83	43	615132	118.1426 ug/L #	85
27) 1,1-Dichloroethane	8.87	63	1179111	97.6929 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	3847795	202.4591 ug/L	90
29) 2-Butanone	9.41	43	187675	103.9136 ug/L #	77
30) Propionitrile	9.52	54	123101	208.9977 ug/L	100
31) 2,2-Dichloropropane	9.64	77	930942	101.3837 ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	791312	98.7853 ug/L	87
33) Chloroform	9.92	83	1229915	89.4500 ug/L	95
34) 1-Bromopropane	10.06	122	153107	107.7815 ug/L	99
35) Bromochloromethane	10.16	130	453837	107.6278 ug/L	99
36) Tetrahydrofuran	10.18	42	239360	201.2527 ug/L #	68
38) 1,1,1-Trichloroethane	10.45	97	1128754	100.9745 ug/L	90
39) Cyclohexane	10.49	56	1047823	101.3662 ug/L	76
40) 1,1-Dichloropropene	10.65	75	936238	99.0778 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	3710771	205.6403 ug/L	92
42) Carbon Tetrachloride	10.80	117	1002331	113.7160 ug/L	100

(#) = qualifier out of range (m) = manual integration
6M146230.D 8260BWT.M Thu Apr 06 14:58:14 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

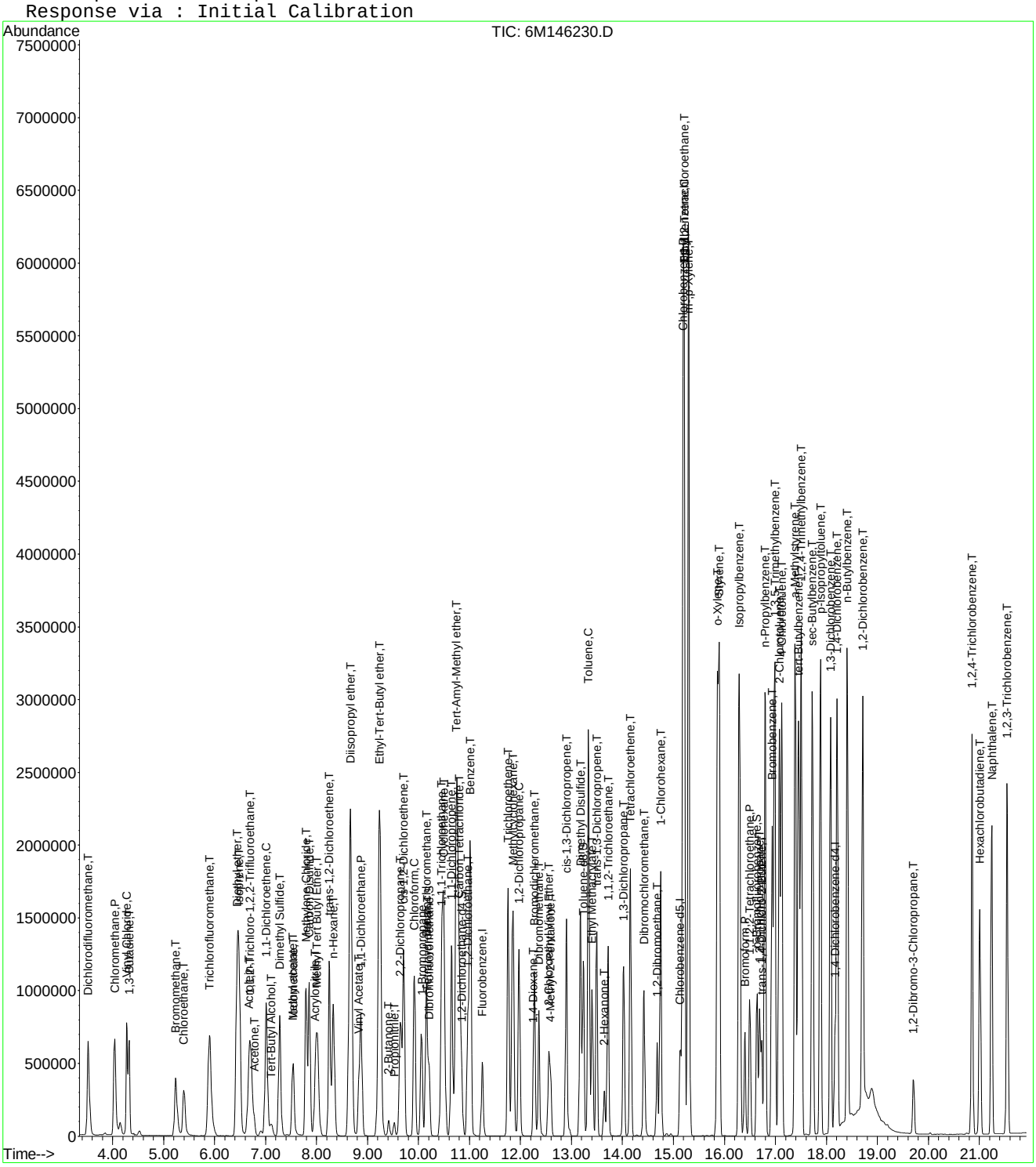
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	848725	99.2223	ug/L		88
46)	Benzene	11.01	78	2675533	94.1668	ug/L		87
47)	Trichloroethene	11.76	130	775075	100.2194	ug/L		86
48)	Methylcyclohexane	11.85	83	1124227	100.6142	ug/L		81
49)	1,2-Dichloropropane	11.97	63	661802	98.6962	ug/L		92
50)	1,4-Dioxane	12.25	88	21047	431.6772	ug/L		82
51)	Bromodichloromethane	12.27	83	965686	102.0182	ug/L		100
52)	Dibromomethane	12.36	93	405664	102.7198	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.56	63	290699	110.5233	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	180197	104.4413	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	1085875	104.1711	ug/L		95
56)	Dimethyl Disulfide	13.18	79	668834	101.7047	ug/L		90
59)	Toluene	13.33	91	2831304	96.6334	ug/L		99
60)	Ethyl Methacrylate	13.40	69	750754	105.8857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	942608	104.3378	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	558224	101.1002	ug/L		99
64)	2-Hexanone	13.64	43	274093	103.3770	ug/L		83
65)	1,3-Dichloropropane	14.03	76	927364	100.0574	ug/L		71
66)	Tetrachloroethene	14.16	166	715953	100.8400	ug/L		95
67)	Dibromochloromethane	14.42	129	727778	106.6258	ug/L		100
68)	1,2-Dibromoethane	14.68	107	543243	102.4642	ug/L		99
69)	1-Chlorohexane	14.75	91	954085	100.8392	ug/L		75
70)	Chlorobenzene	15.19	112	2008196	100.1428	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	774570	107.8575	ug/L		100
72)	Ethylbenzene	15.21	106	1116135	102.8139	ug/L		91
73)	m-,p-Xylene	15.29	106	2626638	202.4261	ug/L		89
74)	o-Xylene	15.86	106	1232018	98.3922	ug/L		94
75)	Styrene	15.89	104	2150597	102.3095	ug/L		96
76)	Bromoform	16.40	173	448000	107.7070	ug/L		99
77)	Isopropylbenzene	16.29	105	3046400	97.2211	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	638495	97.8234	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	193544	100.4136	ug/L	#	54
82)	trans-1,4-Dichloro-2-Buten	16.73	53	151702	109.4542	ug/L	#	1
83)	n-Propylbenzene	16.79	91	3593480	94.7040	ug/L		98
84)	Bromobenzene	16.94	156	823903	96.6540	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	2597441	96.5926	ug/L		99
86)	2-Chlorotoluene	17.08	91	2351484	93.0729	ug/L		97
87)	4-Chlorotoluene	17.12	91	2098144	93.9621	ug/L		95
88)	a-Methylstyrene	17.39	118	1476708	99.3054	ug/L		99
89)	tert-Butylbenzene	17.46	134	556423	98.7517	ug/L		90
90)	1,2,4-Trimethylbenzene	17.51	105	2720771	98.5191	ug/L		86
91)	sec-Butylbenzene	17.72	105	3204852	96.6442	ug/L		99
92)	p-Isopropyltoluene	17.89	119	2766683	99.1824	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	1563276	97.1091	ug/L		98
94)	1,4-Dichlorobenzene	18.21	146	1568190	96.3298	ug/L		98
95)	n-Butylbenzene	18.41	91	2566638	100.7630	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	1480882	98.1422	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	128198	108.4355	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	1094628	99.1474	ug/L		100
99)	Hexachlorobutadiene	21.01	225	409810	97.1846	ug/L		99
100)	Naphthalene	21.25	128	2294953	103.8129	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	1006776	94.4596	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146230.D 8260BWT.M Thu Apr 06 14:58:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	690233	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	498674	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	255138	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	723475	102.6772 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 410.72%#		
43) 1,2-Dichloroethane-d4	10.85	65	702452	101.1521 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 404.60%#		
58) Toluene-d8	13.24	98	2516915	98.9113 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 395.64%#		
80) p-Bromofluorobenzene	16.64	95	966850	99.7755 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 399.12%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	2275311	207.6213 ug/L	93
3) Chloromethane	4.04	50	2474245	196.0665 ug/L	98
4) Vinyl Chloride	4.27	62	2319895	185.2689 ug/L	98
5) 1,3-Butadiene	4.31	54	816680	218.8754 ug/L	89
6) Bromomethane	5.23	94	1250039	231.2125 ug/L	99
7) Chloroethane	5.40	64	1064300	197.5465 ug/L	86
8) Trichlorofluoromethane	5.90	101	2718616	211.8320 ug/L	99
9) Diethyl ether	6.44	59	4640	0.8676 ug/L #	53
10) Isoprene	6.48	67	2127378	201.5306 ug/L	80
11) Acrolein	6.67	56	9706	16.5644 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	1494747	205.7510 ug/L	99
13) Acetone	6.77	43	308579	207.1749 ug/L	90
14) 1,1-Dichloroethene	7.01	61	2162367	205.4912 ug/L	81
15) Tert-Butyl Alcohol	7.12	59	25996	56.2677 ug/L	92
16) Dimethyl Sulfide	7.27	62	1547256	205.7718 ug/L	78
17) Iodomethane	7.54	142	1235435	198.8594 ug/L	98
18) Methyl acetate	7.53	43	780560	208.9546 ug/L #	80
19) Methylene Chloride	7.80	84	1587097	199.4946 ug/L	58
20) Carbon Disulfide	7.86	76	4648119	205.2426 ug/L	98
21) Acrylonitrile	8.01	53	30991	17.9558 ug/L #	37
22) Methyl Tert Butyl Ether	8.01	73	3211564	184.0891 ug/L	91
23) trans-1,2-Dichloroethene	8.24	96	1562245	206.2818 ug/L	75
24) n-Hexane	8.33	57	1747043	203.9948 ug/L	84
25) Diisopropyl ether	8.66	45	2991	0.1534 ug/L #	78
26) Vinyl Acetate	8.83	43	1230567	227.3831 ug/L #	84
27) 1,1-Dichloroethane	8.87	63	2550945	203.3406 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	7221	0.3655 ug/L	93
29) 2-Butanone	9.42	43	378724	201.7454 ug/L #	77
30) Propionitrile	9.52	54	2541	4.1505 ug/L #	56
31) 2,2-Dichloropropane	9.64	77	1886252	197.6333 ug/L	77
32) cis-1,2-Dichloroethene	9.72	96	1724251	207.0903 ug/L	86
33) Chloroform	9.92	83	2655020	185.7753 ug/L	95
34) 1-Bromopropane	10.06	122	290747	196.9152 ug/L	99
35) Bromochloromethane	10.15	130	939086	214.2618 ug/L	100
36) Tetrahydrofuran	10.18	42	5089	4.1166 ug/L	86
38) 1,1,1-Trichloroethane	10.46	97	2469058	212.4998 ug/L	89
39) Cyclohexane	10.49	56	2270992	211.3662 ug/L #	75
40) 1,1-Dichloropropene	10.64	75	2000053	203.6322 ug/L	80
41) Tert-Amyl-Methyl ether	10.75	73	11602	0.6186 ug/L	88
42) Carbon Tetrachloride	10.80	117	1931578	210.8325 ug/L	99

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

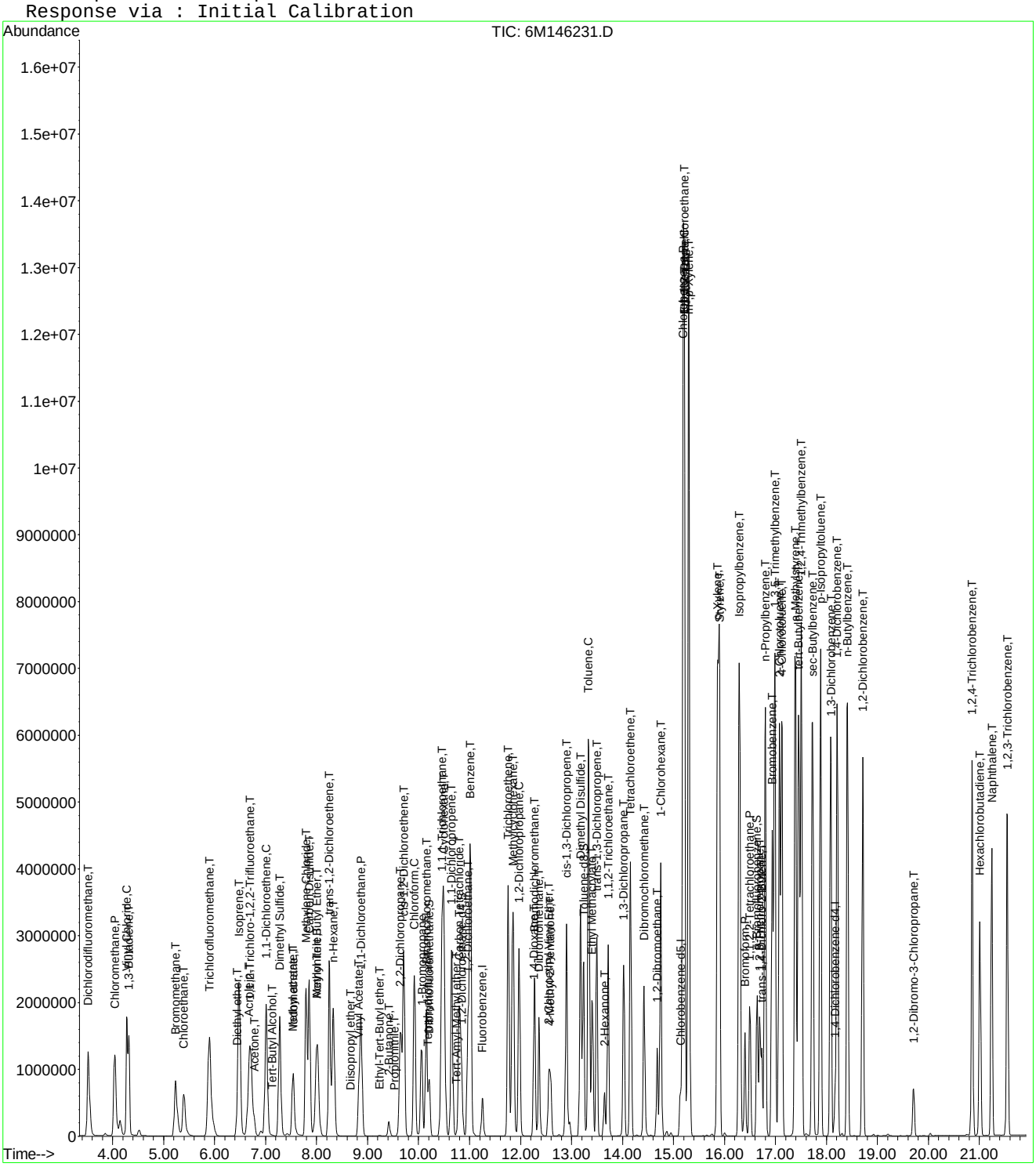
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	1796420	202.0529 ug/L		88
46)	Benzene	11.01	78	5629098	190.6080 ug/L		88
47)	Trichloroethene	11.76	130	1658935	206.3727 ug/L		87
48)	Methylcyclohexane	11.85	83	2386424	205.4792 ug/L		81
49)	1,2-Dichloropropane	11.97	63	1424092	204.3268 ug/L		91
50)	1,4-Dioxane	12.26	88	5637	111.2325 ug/L	#	42
51)	Bromodichloromethane	12.27	83	2075418	210.9415 ug/L		100
52)	Dibromomethane	12.36	93	844625	205.7626 ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	484387	177.1812 ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	361541	201.6031 ug/L		79
55)	cis-1,3-Dichloropropene	12.90	75	2281875	210.6076 ug/L		95
56)	Dimethyl Disulfide	13.18	79	1458790	213.4177 ug/L		90
59)	Toluene	13.33	91	5996618	192.3392 ug/L		96
60)	Ethyl Methacrylate	13.40	69	1573548	208.5646 ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	1986746	206.6682 ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	1198048	203.9100 ug/L		99
64)	2-Hexanone	13.65	43	554015	196.3669 ug/L		83
65)	1,3-Dichloropropane	14.02	76	1969579	199.7070 ug/L		71
66)	Tetrachloroethene	14.16	166	1553218	205.5897 ug/L		94
67)	Dibromochloromethane	14.42	129	1570999	216.3018 ug/L		99
68)	1,2-Dibromoethane	14.68	107	1128869	200.0979 ug/L		100
69)	1-Chlorohexane	14.75	91	2077549	206.3548 ug/L		76
70)	Chlorobenzene	15.19	112	4552595	213.3503 ug/L		97
71)	1,1,1,2-Tetrachloroethane	15.21	131	1778263	232.7054 ug/L		99
72)	Ethylbenzene	15.21	106	2629830	227.6583 ug/L		78
73)	m-,p-Xylene	15.30	106	5831651	422.3560 ug/L		72
74)	o-Xylene	15.86	106	2806681	210.6481 ug/L		89
75)	Styrene	15.90	104	4761074	212.8544 ug/L		99
76)	Bromoform	16.40	173	946995	213.9608 ug/L		98
77)	Isopropylbenzene	16.29	105	6429037	192.8147 ug/L		96
79)	1,1,2,2-Tetrachloroethane	16.50	83	1322669	199.0497 ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	401464	204.5900 ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	305769	216.7003 ug/L	#	1
83)	n-Propylbenzene	16.80	91	7135293	184.7099 ug/L		94
84)	Bromobenzene	16.93	156	1779598	205.0645 ug/L		84
85)	1,3,5-Trimethylbenzene	16.99	105	5473541	199.9363 ug/L		97
86)	2-Chlorotoluene	17.08	91	4805990	186.8483 ug/L		96
87)	4-Chlorotoluene	17.12	91	4663827	205.1564 ug/L		94
88)	a-Methylstyrene	17.39	118	3146362	207.8317 ug/L		99
89)	tert-Butylbenzene	17.46	134	1201485	209.4513 ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	5700578	202.7553 ug/L		82
91)	sec-Butylbenzene	17.73	105	6486144	192.1230 ug/L		99
92)	p-Isopropyltoluene	17.88	119	5687835	200.2844 ug/L		98
93)	1,3-Dichlorobenzene	18.09	146	3282192	200.2687 ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	3295686	198.8532 ug/L		96
95)	n-Butylbenzene	18.42	91	5169144	199.3335 ug/L		98
96)	1,2-Dichlorobenzene	18.71	146	3028833	197.1676 ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.71	75	238291	197.9807 ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	2255491	200.6692 ug/L		99
99)	Hexachlorobutadiene	21.01	225	836245	194.7931 ug/L		99
100)	Naphthalene	21.24	128	4440092	197.2852 ug/L		98
101)	1,2,3-Trichlorobenzene	21.55	180	2031369	187.2092 ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146231.D 8260BWT.M Thu Apr 06 14:58:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



6M146231.D 8260BWT.M Thu Apr 06 14:58:19 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	670280	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	474156	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	251420	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	1065288	155.6886	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 622.76%#				
43) 1,2-Dichloroethane-d4	10.84	65	1022057	151.5559	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 606.24%#				
58) Toluene-d8	13.23	98	3651048	150.9004	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 603.60%#				
80) p-Bromofluorobenzene	16.64	95	1466208	153.5450	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 614.20%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	3198	0.3005	ug/L	#	64
3) Chloromethane	4.02	50	124029	9.3687	ug/L		97
4) Vinyl Chloride	4.27	62	2879	0.2368	ug/L		96
5) 1,3-Butadiene	4.31	54	952750	291.3161	ug/L		90
6) Bromomethane	5.21	94	256997	48.9503	ug/L		98
8) Trichlorofluoromethane	5.89	101	1832	0.1470	ug/L	#	92
9) Diethyl ether	6.44	59	1626336	313.1315	ug/L		80
10) Isoprene	6.47	67	3326056	324.4632	ug/L		81
11) Acrolein	6.67	56	83031	145.9205	ug/L		96
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1896	0.2688	ug/L	#	63
13) Acetone	6.78	43	359192	248.3344	ug/L		88
14) 1,1-Dichloroethene	7.01	61	2982	0.2918	ug/L		94
15) Tert-Butyl Alcohol	7.12	59	274170	611.1000	ug/L		90
16) Dimethyl Sulfide	7.28	62	2259113	309.3863	ug/L		78
17) Iodomethane	7.53	142	1774336	293.7287	ug/L		98
18) Methyl acetate	7.53	43	1146284	315.9929	ug/L	#	79
19) Methylene Chloride	7.79	84	3453	0.4470	ug/L		74
20) Carbon Disulfide	7.85	76	6560949	298.3296	ug/L		98
21) Acrylonitrile	7.97	53	242452	144.6554	ug/L		93
22) Methyl Tert Butyl Ether	8.02	73	17659	1.0424	ug/L	#	49
23) trans-1,2-Dichloroethene	8.25	96	3508	0.4770	ug/L		84
24) n-Hexane	8.33	57	2563085	308.1896	ug/L		84
25) Diisopropyl ether	8.66	45	5624093	297.0560	ug/L	#	88
26) Vinyl Acetate	8.83	43	1560345	296.9020	ug/L	#	86
27) 1,1-Dichloroethane	8.87	63	1658	0.1361	ug/L	#	43
28) Ethyl-Tert-Butyl ether	9.24	59	5792489	301.9568	ug/L		90
29) 2-Butanone	9.41	43	537846	295.0381	ug/L	#	77
30) Propionitrile	9.52	54	181548	305.3695	ug/L		99
32) cis-1,2-Dichloroethene	9.71	96	2592	0.3206	ug/L		71
33) Chloroform	9.91	83	3316	0.2389	ug/L	#	81
34) 1-Bromopropane	10.05	122	479000	334.0712	ug/L		100
35) Bromochloromethane	10.16	130	2635	0.6191	ug/L		93
36) Tetrahydrofuran	10.18	42	348793	290.5441	ug/L	#	69
39) Cyclohexane	10.49	56	3263442	312.7774	ug/L		77
40) 1,1-Dichloropropene	10.65	75	3347	0.3509	ug/L	#	34
41) Tert-Amyl-Methyl ether	10.75	73	5509448	302.4868	ug/L		92
45) 1,2-Dichloroethane	10.96	62	6370	0.7378	ug/L	#	78
46) Benzene	11.01	78	5876	0.2049	ug/L	#	70
47) Trichloroethene	11.75	130	2541	0.3255	ug/L		78
48) Methylcyclohexane	11.85	83	3537517	313.6594	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

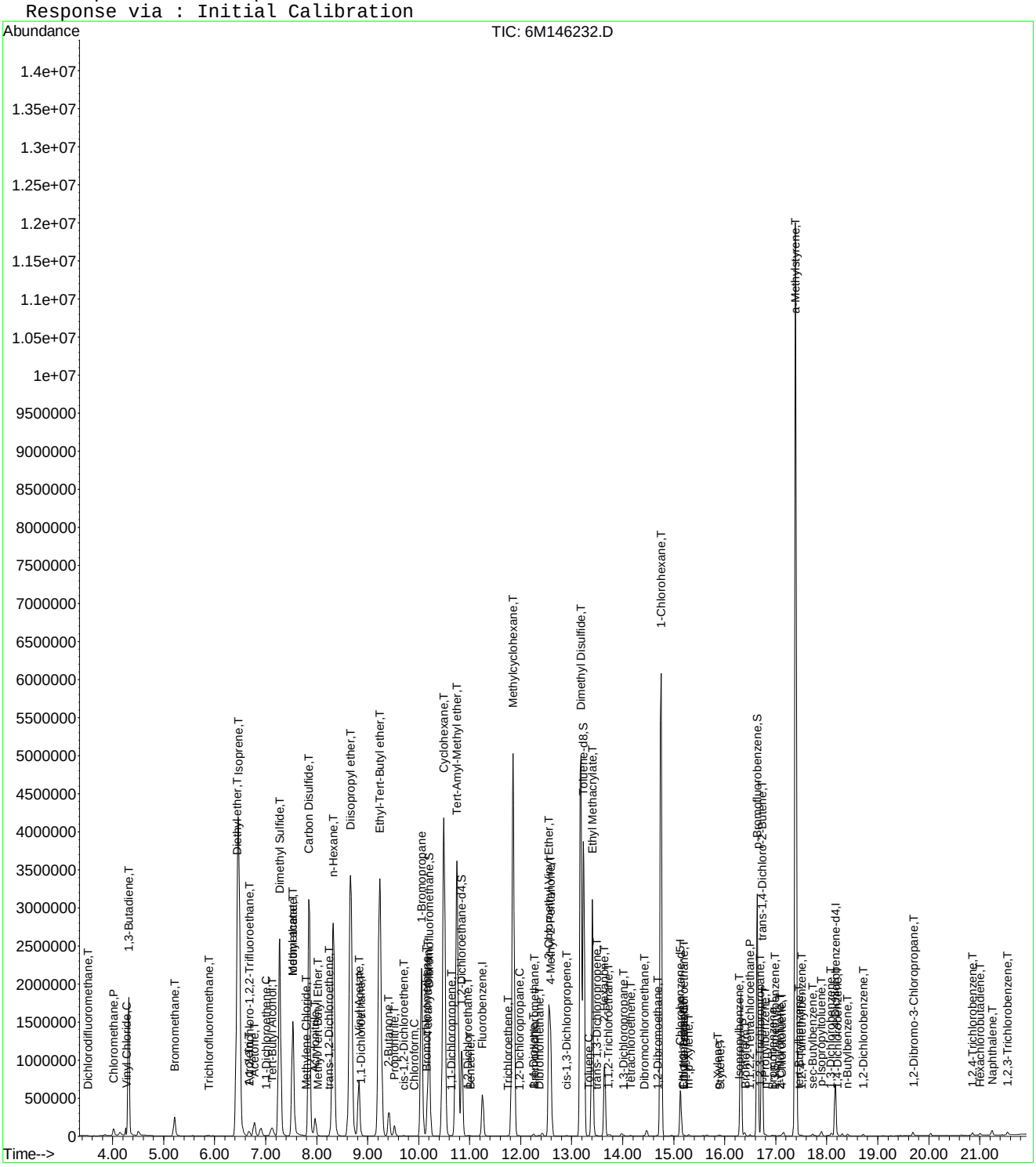
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

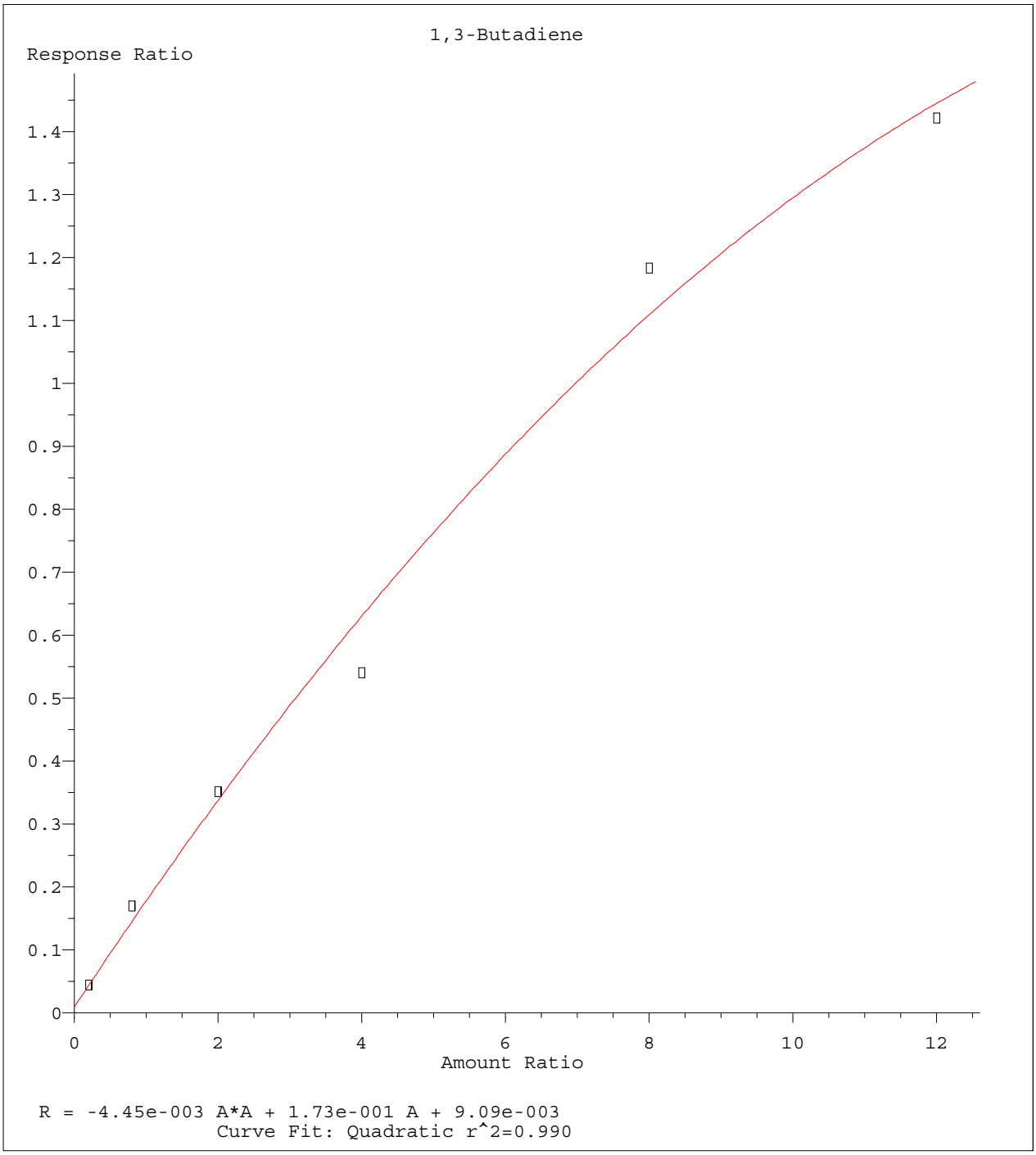
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
49)	1,2-Dichloropropane	11.97	63	846	0.1250	ug/L	#	35
50)	1,4-Dioxane	12.25	88	29442	598.2608	ug/L		83
51)	Bromodichloromethane	12.27	83	2460	0.2575	ug/L		95
52)	Dibromomethane	12.36	93	4528	1.1359	ug/L		94
53)	2-Chloroethyl Vinyl Ether	12.56	63	864405	325.5982	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	524164	300.9860	ug/L		80
55)	cis-1,3-Dichloropropene	12.90	75	4329	0.4114	ug/L		88
56)	Dimethyl Disulfide	13.18	79	2174908	327.6559	ug/L		91
59)	Toluene	13.33	91	8304	0.2801	ug/L		97
60)	Ethyl Methacrylate	13.40	69	2284715	318.4843	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	8074	0.8833	ug/L		92
63)	1,1,2-Trichloroethane	13.72	97	5984	1.0712	ug/L		96
64)	2-Hexanone	13.64	43	803768	299.6215	ug/L		83
65)	1,3-Dichloropropane	14.02	76	10167	1.0842	ug/L		86
66)	Tetrachloroethene	14.16	166	2501	0.3482	ug/L		97
67)	Dibromochloromethane	14.42	129	5257	0.7612	ug/L		98
68)	1,2-Dibromoethane	14.68	107	7804	1.4548	ug/L		95
69)	1-Chlorohexane	14.75	91	3093710	323.1754	ug/L		77
70)	Chlorobenzene	15.18	112	6402	0.3155	ug/L		89
71)	1,1,1,2-Tetrachloroethane	15.20	131	1051	0.1446	ug/L	#	24
72)	Ethylbenzene	15.20	106	2758	0.2511	ug/L		82
73)	m-,p-Xylene	15.29	106	7899	0.6017	ug/L		94
74)	o-Xylene	15.86	106	2490	0.1965	ug/L		71
75)	Styrene	15.90	104	7614	0.3580	ug/L		91
76)	Bromoform	16.41	173	6944	1.6500	ug/L		95
77)	Isopropylbenzene	16.28	105	23768	0.7497	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	12720	1.9426	ug/L		97
81)	1,2,3-Trichloropropane	16.69	110	5207	2.6928	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.73	53	468972	337.2782	ug/L	#	50
83)	n-Propylbenzene	16.79	91	25834	0.6786	ug/L		98
84)	Bromobenzene	16.94	156	4350	0.5087	ug/L		80
85)	1,3,5-Trimethylbenzene	16.99	105	9549	0.3540	ug/L		94
86)	2-Chlorotoluene	17.08	91	10250	0.4044	ug/L		85
87)	4-Chlorotoluene	17.12	91	10678	0.4767	ug/L		93
88)	a-Methylstyrene	17.39	118	4860473	325.8044	ug/L		98
89)	tert-Butylbenzene	17.46	134	3329	0.5889	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.51	105	10602	0.3827	ug/L		84
91)	sec-Butylbenzene	17.72	105	27629	0.8305	ug/L		96
92)	p-Isopropyltoluene	17.89	119	16184	0.5783	ug/L		93
93)	1,3-Dichlorobenzene	18.08	146	10117	0.6264	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	11412	0.6988	ug/L		90
95)	n-Butylbenzene	18.41	91	21424	0.8384	ug/L		95
96)	1,2-Dichlorobenzene	18.71	146	10357	0.6842	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	4375	3.6887	ug/L		97
98)	1,2,4-Trichlorobenzene	20.86	180	14842	1.3400	ug/L		97
99)	Hexachlorobutadiene	21.01	225	8098	1.9142	ug/L		93
100)	Naphthalene	21.25	128	71843	3.2394	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	18787	1.7570	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:23 2017 Page 2

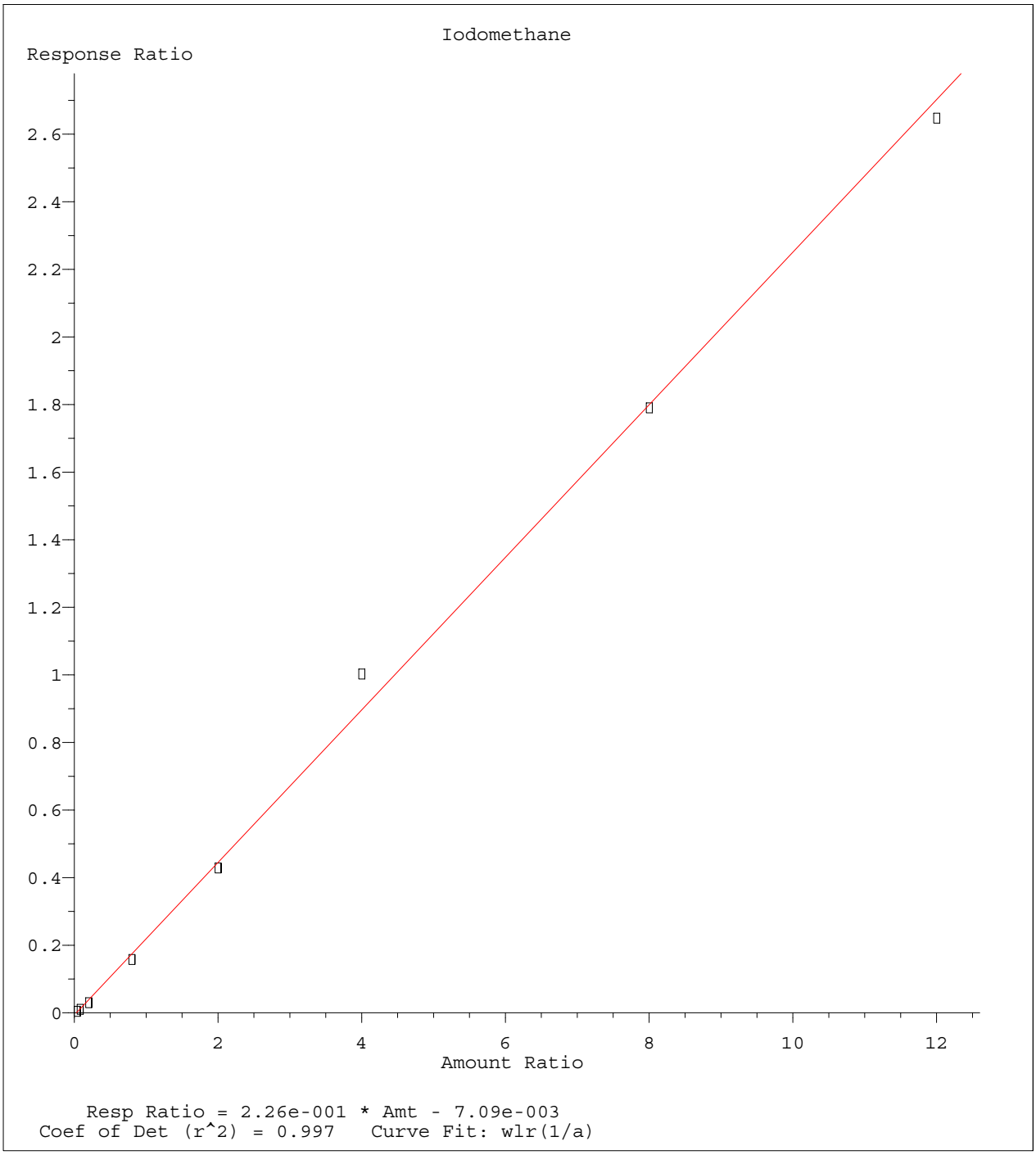
Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

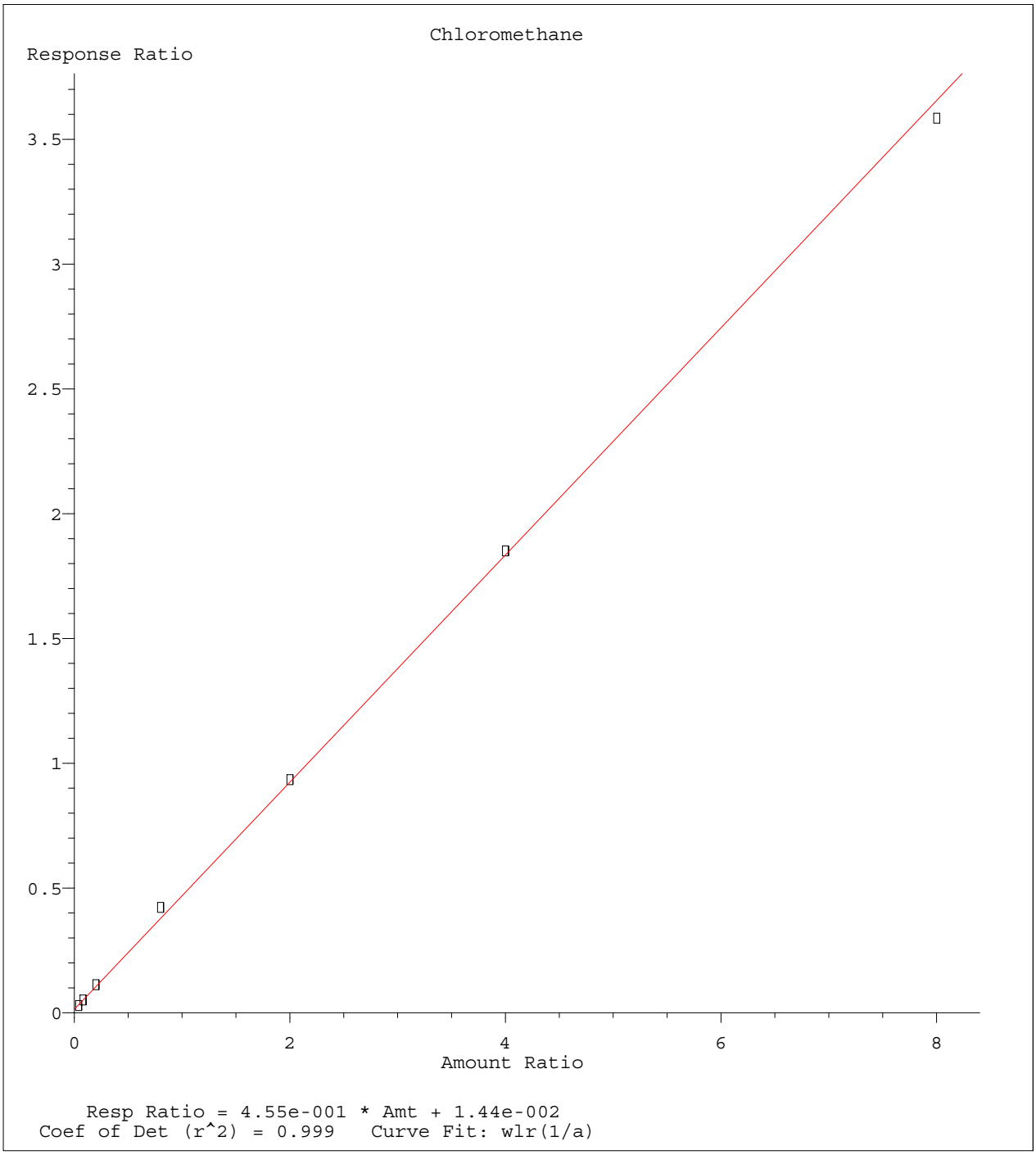




Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.26	96	670831	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	482468	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	257501	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	178273	26.0327	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.12%				
43) 1,2-Dichloroethane-d4	10.85	65	171804	25.4551	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.84%				
58) Toluene-d8	13.24	98	618189	25.1100	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.44%				
80) p-Bromofluorobenzene	16.64	95	243106	24.8575	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.44%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	261278	24.5311	ug/L		94
3) Chloromethane	4.04	50	284057	22.4610	ug/L		99
4) Vinyl Chloride	4.27	62	267730	21.9996	ug/L		98
5) 1,3-Butadiene	4.31	54	117985	24.7175	ug/L		89
6) Bromomethane	5.23	94	93039	17.7066	ug/L		98
7) Chloroethane	5.40	64	119687	22.8578	ug/L		85
8) Trichlorofluoromethane	5.90	101	262422	21.0391	ug/L		99
9) Diethyl ether	6.44	59	528084	101.5927	ug/L		82
10) Isoprene	6.48	67	201796	19.6694	ug/L		81
11) Acrolein	6.67	56	92591	162.5878	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	153538	21.7457	ug/L		98
13) Acetone	6.77	43	27527	19.0157	ug/L		88
14) 1,1-Dichloroethene	7.01	61	204274	19.9737	ug/L		84
15) Tert-Butyl Alcohol	7.12	59	102016	227.1976	ug/L		91
16) Dimethyl Sulfide	7.27	62	152875	20.9191	ug/L		78
17) Iodomethane	7.54	142	153036	26.0301	ug/L		99
18) Methyl acetate	7.53	43	73917	20.3598	ug/L	#	82
19) Methylene Chloride	7.80	84	150043	19.4056	ug/L		61
20) Carbon Disulfide	7.86	76	355422	16.1479	ug/L		99
21) Acrylonitrile	7.97	53	36232	21.5995	ug/L		100
22) Methyl Tert Butyl Ether	8.01	73	352993	20.8190	ug/L		92
23) trans-1,2-Dichloroethene	8.25	96	144008	19.5650	ug/L		78
24) n-Hexane	8.33	57	166297	19.9794	ug/L		85
25) Diisopropyl ether	8.66	45	1988872	104.9629	ug/L	#	90
26) Vinyl Acetate	8.83	43	160945	30.5994	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	240190	19.6997	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1886475	98.2593	ug/L		90
29) 2-Butanone	9.42	43	36957	20.2563	ug/L	#	79
30) Propionitrile	9.52	54	63234	106.2742	ug/L		100
31) 2,2-Dichloropropane	9.65	77	204249	22.0193	ug/L		80
32) cis-1,2-Dichloroethene	9.72	96	157553	19.4701	ug/L		90
33) Chloroform	9.92	83	257055	18.5067	ug/L		94
34) 1-Bromopropane	10.06	122	38246	26.6522	ug/L		98
35) Bromochloromethane	10.15	130	91199	21.4098	ug/L		99
36) Tetrahydrofuran	10.17	42	123208	102.5478	ug/L	#	71
38) 1,1,1-Trichloroethane	10.46	97	227236	20.1227	ug/L		91
39) Cyclohexane	10.49	56	186905	17.8988	ug/L		77
40) 1,1-Dichloropropene	10.65	75	187277	19.6188	ug/L		83
41) Tert-Amyl-Methyl ether	10.75	73	1887460	103.5427	ug/L		92
42) Carbon Tetrachloride	10.80	117	183539	20.6128	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:43 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

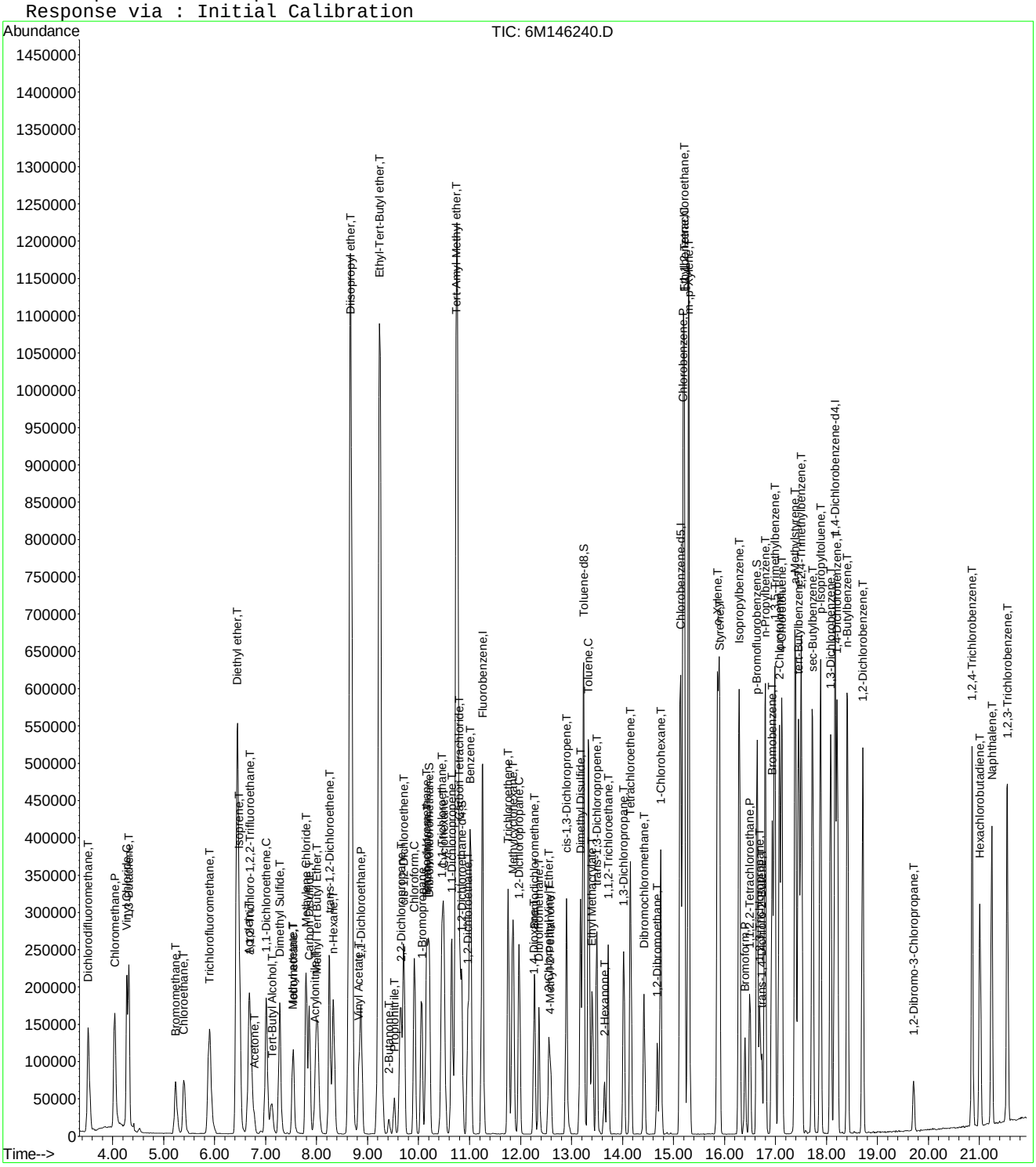
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	168256	19.4720	ug/L		89
46)	Benzene	11.01	78	540364	18.8266	ug/L		86
47)	Trichloroethene	11.76	130	145590	18.6353	ug/L		88
48)	Methylcyclohexane	11.85	83	208804	18.4987	ug/L		82
49)	1,2-Dichloropropane	11.97	63	132922	19.6231	ug/L		94
50)	1,4-Dioxane	12.26	88	10470	212.5754	ug/L		89
51)	Bromodichloromethane	12.27	83	185813	19.4319	ug/L		99
52)	Dibromomethane	12.36	93	81782	20.4995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	67812	25.5220	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	36319	20.8380	ug/L		84
55)	cis-1,3-Dichloropropene	12.90	75	227477	21.6024	ug/L		94
56)	Dimethyl Disulfide	13.18	79	134164	20.1956	ug/L		89
59)	Toluene	13.33	91	559021	18.5327	ug/L		99
60)	Ethyl Methacrylate	13.40	69	152544	20.8980	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	184754	19.8643	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107408	18.8951	ug/L		99
64)	2-Hexanone	13.65	43	58431	21.4061	ug/L		83
65)	1,3-Dichloropropane	14.02	76	192119	20.1344	ug/L		71
66)	Tetrachloroethene	14.16	166	141756	19.3936	ug/L		96
67)	Dibromochloromethane	14.42	129	136028	19.3580	ug/L		98
68)	1,2-Dibromoethane	14.68	107	106469	19.5061	ug/L		100
69)	1-Chlorohexane	14.75	91	199484	20.4795	ug/L		76
70)	Chlorobenzene	15.19	112	378551	18.3361	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	137413	18.5860	ug/L		97
72)	Ethylbenzene	15.21	106	207722	18.5860	ug/L		92
73)	m-,p-Xylene	15.30	106	498999	37.3538	ug/L		92
74)	o-Xylene	15.86	106	243704	18.9049	ug/L		94
75)	Styrene	15.90	104	417768	19.3046	ug/L		96
76)	Bromoform	16.40	173	80208	18.7306	ug/L		98
77)	Isopropylbenzene	16.29	105	603691	18.7136	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	131416	19.5954	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	38665	19.5232	ug/L		71
82)	trans-1,4-Dichloro-2-Buten	16.73	53	25343	17.7959	ug/L	#	1
83)	n-Propylbenzene	16.80	91	714710	18.3318	ug/L		99
84)	Bromobenzene	16.93	156	162348	18.5358	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	512320	18.5422	ug/L		99
86)	2-Chlorotoluene	17.08	91	450684	17.3610	ug/L		97
87)	4-Chlorotoluene	17.12	91	432917	18.8688	ug/L		96
88)	a-Methylstyrene	17.38	118	306134	20.0360	ug/L		98
89)	tert-Butylbenzene	17.46	134	110255	19.0440	ug/L		91
90)	1,2,4-Trimethylbenzene	17.51	105	530643	18.7005	ug/L		86
91)	sec-Butylbenzene	17.73	105	623072	18.2864	ug/L		99
92)	p-Isopropyltoluene	17.88	119	543701	18.9695	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	304800	18.4272	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	308581	18.4481	ug/L		98
95)	n-Butylbenzene	18.41	91	494571	18.8967	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	287359	18.5345	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	23576	19.4080	ug/L		93
98)	1,2,4-Trichlorobenzene	20.86	180	212338	18.7182	ug/L		99
99)	Hexachlorobutadiene	21.01	225	80592	18.6006	ug/L		100
100)	Naphthalene	21.24	128	425467	18.7312	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	199388	18.2068	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 16:54 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	107	0.00
2	T	Dichlorodifluoromethane	20.0000	24.5311	-22.7#	120	0.00
3	P	Chloromethane	20.0000	22.4610	-12.3	107	0.02
4	C	Vinyl Chloride	20.0000	21.9995	-10.0	115	0.00
5	T	1,3-Butadiene	20.0000	24.7175	-23.6#	111	0.00
6	T	Bromomethane	20.0000	17.7066	11.5	95	0.02
7	T	Chloroethane	20.0000	22.8578	-14.3	115	0.02
8	T	Trichlorofluoromethane	20.0000	21.0391	-5.2	109	0.00
9	T	Diethyl ether	80.0000	101.5927	-27.0#	139	0.00
10	T	Isoprene	20.0000	19.6694	1.7	113	0.00
11	T	Acrolein	40.0000	162.5878	-306.5#	452	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	20.0000	21.7457	-8.7	116	0.00
13	T	Acetone	20.0000	19.0157	4.9	95	0.00
14	C	1,1-Dichloroethene	20.0000	19.9737	0.1	104	0.00
15	T	Tert-Butyl Alcohol	160.0000	227.1976	-42.0#	157	0.00
16	T	Dimethyl Sulfide	20.0000	20.9191	-4.6	117	0.00
17	T	Iodomethane	20.0000	26.0301	-30.2#	155	0.00
18	T	Methyl acetate	20.0000	20.3597	-1.8	118	0.00
19	T	Methylene Chloride	20.0000	19.4056	3.0	105	0.00
20	T	Carbon Disulfide	20.0000	16.1479	19.3	91	0.00
21	T	Acrylonitrile	40.0000	21.5995	46.0#	57	0.00
22	T	Methyl Tert Butyl Ether	20.0000	20.8190	-4.1	107	-0.01
23	T	trans-1,2-Dichloroethene	20.0000	19.5650	2.2	104	0.00
24	T	n-Hexane	20.0000	19.9794	0.1	114	0.00
25	T	Diisopropyl ether	80.0000	104.9629	-31.2#	142	0.00
26	T	Vinyl Acetate	20.0000	30.5994	-53.0#	189	0.00
27	P	1,1-Dichloroethane	20.0000	19.6997	1.5	103	0.00
28	T	Ethyl-Tert-Butyl ether	80.0000	98.2593	-22.8#	133	0.00
29	T	2-Butanone	20.0000	20.2563	-1.3	108	0.00
30	T	Propionitrile	80.0000	106.2742	-32.8#	144	0.00
31	T	2,2-Dichloropropane	20.0000	22.0193	-10.1	137	0.00
32	T	cis-1,2-Dichloroethene	20.0000	19.4701	2.6	104	0.00
33	C	Chloroform	20.0000	18.5067	7.5	106	0.00
34		1-Bromopropane	20.0000	26.6522	-33.3#	136	0.00
35	T	Bromochloromethane	20.0000	21.4098	-7.0	107	0.00
36	T	Tetrahydrofuran	80.0000	102.5478	-28.2#	142	0.00
37	S	Dibromofluoromethane	10.0000	26.0327	-160.3#	272	0.00
38	T	1,1,1-Trichloroethane	20.0000	20.1227	-0.6	107	0.00
39	T	Cyclohexane	20.0000	17.8988	10.5	102	0.00
40	T	1,1-Dichloropropene	20.0000	19.6188	1.9	104	0.00
41	T	Tert-Amyl-Methyl ether	80.0000	103.5426	-29.4#	142	0.00
42	T	Carbon Tetrachloride	20.0000	20.6128	-3.1	104	-0.01
43	S	1,2-Dichloroethane-d4	10.0000	25.4551	-154.6#	267	0.00
44		Heptane	-1.0000	0.0000	0.0	142	0.00
45	T	1,2-Dichloroethane	20.0000	19.4720	2.6	104	0.00
46	T	Benzene	20.0000	18.8266	5.9	102	0.00
47	T	Trichloroethene	20.0000	18.6353	6.8	97	0.00
48	T	Methylcyclohexane	20.0000	18.4987	7.5	106	0.00
49	C	1,2-Dichloropropane	20.0000	19.6231	1.9	101	0.00
50	T	1,4-Dioxane	160.0000	212.5754	-32.9#	149	0.00
51	T	Bromodichloromethane	20.0000	19.4319	2.8	100	0.00
52	T	Dibromomethane	20.0000	20.4995	-2.5	106	0.00
53	T	2-Chloroethyl Vinyl Ether	20.0000	25.5220	-27.6#	127	0.00
54	T	4-Methyl-2-Pentanone	20.0000	20.8380	-4.2	113	0.00

(#) = Out of Range
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	20.0000	21.6024	-8.0	110	0.00
56	T	Dimethyl Disulfide	20.0000	20.1956	-1.0	119	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	108	0.00
58	S	Toluene-d8	10.0000	25.1100	-151.1#	271	0.00
59	C	Toluene	20.0000	18.5327	7.3	101	0.00
60	T	Ethyl Methacrylate	20.0000	20.8980	-4.5	118	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	20.0000	19.8643	0.7	104	0.00
63	T	1,1,2-Trichloroethane	20.0000	18.8951	5.5	100	0.00
64	T	2-Hexanone	20.0000	21.4061	-7.0	116	0.00
65	T	1,3-Dichloropropane	20.0000	20.1344	-0.7	107	0.00
66	T	Tetrachloroethene	20.0000	19.3936	3.0	104	0.00
67	T	Dibromochloromethane	20.0000	19.3580	3.2	101	0.00
68	T	1,2-Dibromoethane	20.0000	19.5061	2.5	106	0.00
69	T	1-Chlorohexane	20.0000	20.4795	-2.4	119	0.00
70	P	Chlorobenzene	20.0000	18.3361	8.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	20.0000	18.5860	7.1	100	0.00
72	C	Ethylbenzene	20.0000	18.5860	7.1	103	0.00
73	T	m-,p-Xylene	40.0000	37.3538	6.6	104	0.00
74	T	o-Xylene	20.0000	18.9049	5.5	102	0.00
75	T	Styrene	20.0000	19.3046	3.5	103	0.00
76	P	Bromoform	20.0000	18.7306	6.3	99	0.00
77	T	Isopropylbenzene	20.0000	18.7136	6.4	101	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	109	0.00
79	P	1,1,2,2-Tetrachloroethane	20.0000	19.5954	2.0	110	0.00
80	S	p-Bromofluorobenzene	10.0000	24.8575	-148.6#	265	0.00
81	T	1,2,3-Trichloropropane	20.0000	19.5233	2.4	104	0.00
82	T	trans-1,4-Dichloro-2-Butene	20.0000	17.7959	11.0	102	0.00
83	T	n-Propylbenzene	20.0000	18.3318	8.3	100	0.00
84	T	Bromobenzene	20.0000	18.5358	7.3	101	0.00
85	T	1,3,5-Trimethylbenzene	20.0000	18.5422	7.3	102	0.00
86	T	2-Chlorotoluene	20.0000	17.3610	13.2	93	0.00
87	T	4-Chlorotoluene	20.0000	18.8688	5.7	112	0.00
88	T	a-Methylstyrene	20.0000	20.0360	-0.2	119	0.00
89	T	tert-Butylbenzene	20.0000	19.0440	4.8	103	0.00
90	T	1,2,4-Trimethylbenzene	20.0000	18.7005	6.5	102	0.00
91	T	sec-Butylbenzene	20.0000	18.2864	8.6	100	0.00
92	T	p-Isopropyltoluene	20.0000	18.9695	5.2	104	0.00
93	T	1,3-Dichlorobenzene	20.0000	18.4272	7.9	101	0.00
94	T	1,4-Dichlorobenzene	20.0000	18.4481	7.8	103	0.00
95	T	n-Butylbenzene	20.0000	18.8967	5.5	104	0.00
96	T	1,2-Dichlorobenzene	20.0000	18.5345	7.3	102	0.00
97	T	1,2-Dibromo-3-Chloropropane	20.0000	19.4080	3.0	103	0.00
98	T	1,2,4-Trichlorobenzene	20.0000	18.7182	6.4	104	0.00
99	T	Hexachlorobutadiene	20.0000	18.6007	7.0	106	0.00
100	T	Naphthalene	20.0000	18.7312	6.3	101	0.00
101	T	1,2,3-Trichlorobenzene	20.0000	18.2068	9.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:24 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

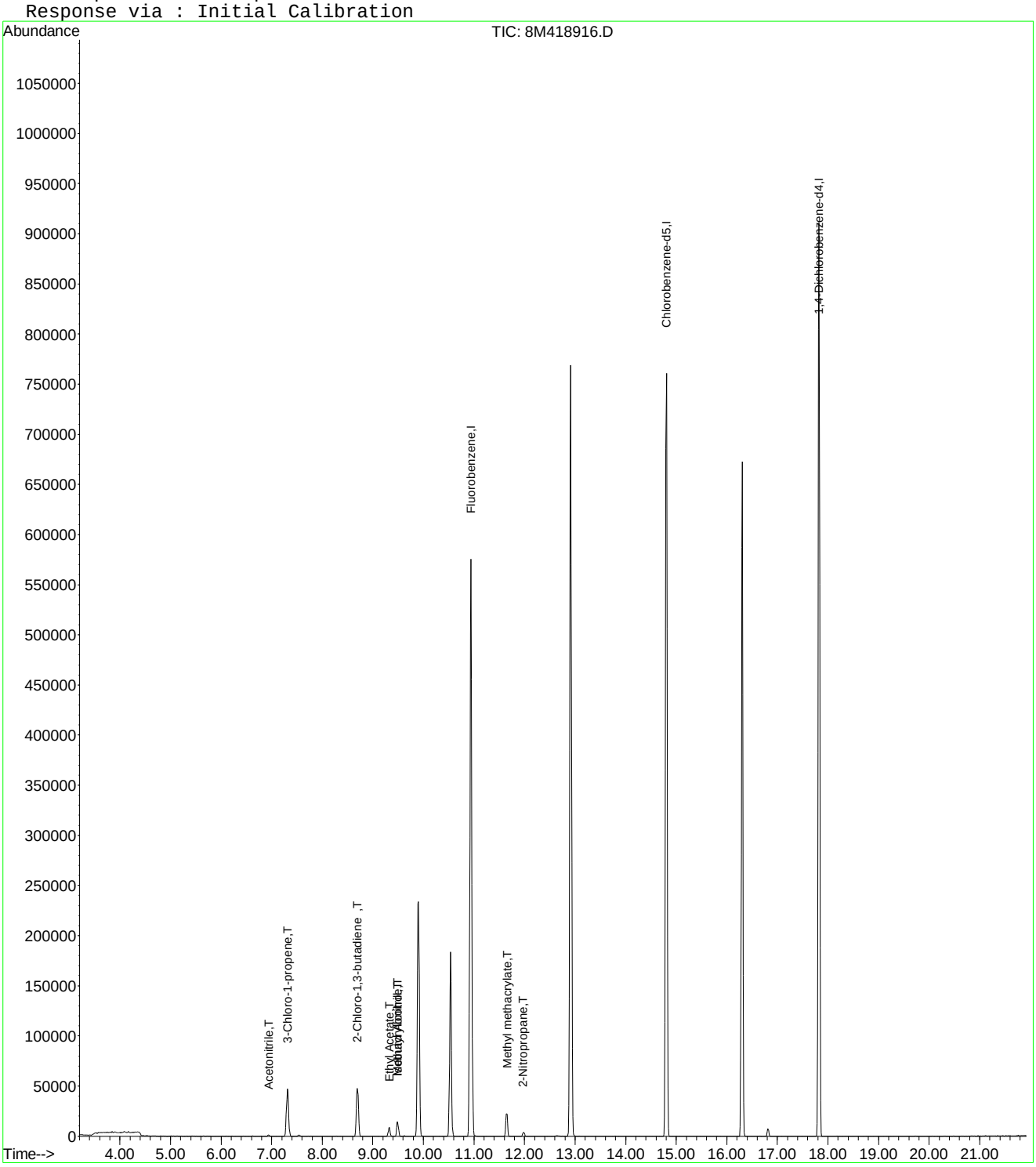
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746277	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	612130	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	333789	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.95	41	1710	4.5291	ug/L		90
3) 3-Chloro-1-propene	7.31	41	46601	4.6885	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	42607	4.4258	ug/L		60
5) Ethyl Acetate	9.33	43	14817	4.8044	ug/L		100
6) Methacrylonitrile	9.49	67	7777	4.3375	ug/L	#	64
7) Isobutyl Alcohol	9.49	43	409	3.2163	ug/L	#	8
9) Methyl methacrylate	11.65	41	14303	4.3932	ug/L	#	57
10) 2-Nitropropane	11.97	43	3479	3.6066	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418916.D A9FOOWT.M Mon Jul 03 11:20:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	-1.0000	4.5291	0.0	100	0.01
3	T	3-Chloro-1-propene	5.0000	4.6885	6.2	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.4258	11.5	100	0.00
5	T	Ethyl Acetate	5.0000	4.8044	3.9	100	0.01
6	T	Methacrylonitrile	5.0000	4.3375	13.2	100	0.00
7	T	Isobutyl Alcohol	-1.0000	3.2163	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.41#
9	T	Methyl methacrylate	5.0000	4.3932	12.1	100	0.01
10	T	2-Nitropropane	-1.0000	3.6066	0.0	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	0.0000	0.0	0	-16.07#

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418916.D A9FOOWT.M Fri Apr 14 14:10:53 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:26 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

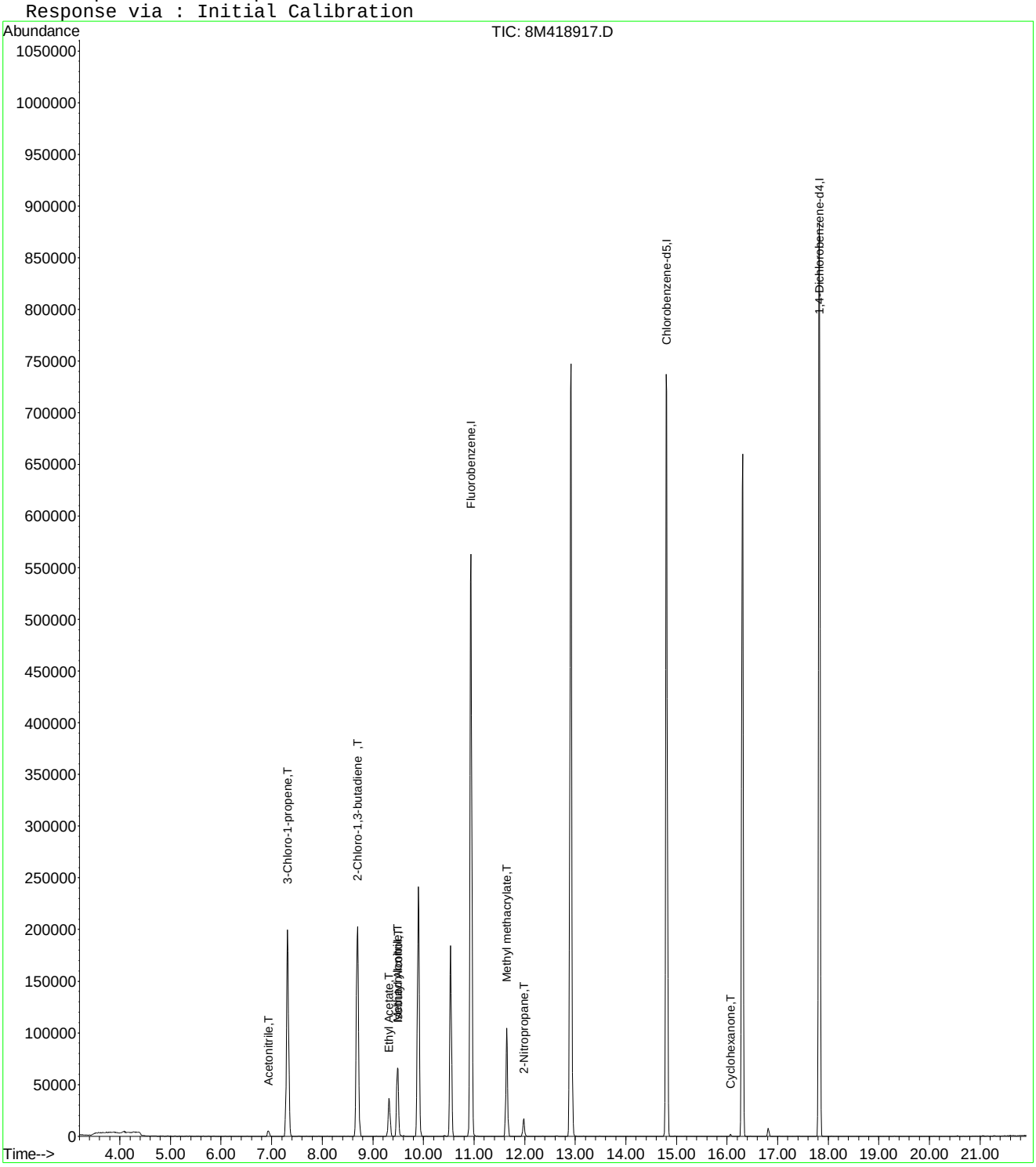
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746151	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	609753	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	336388	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	7512	19.8997	ug/L		98
3) 3-Chloro-1-propene	7.31	41	187894	18.9072	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	178575	18.5528	ug/L		58
5) Ethyl Acetate	9.32	43	60325	19.5637	ug/L		93
6) Methacrylonitrile	9.48	67	35176	19.6222	ug/L	#	56
7) Isobutyl Alcohol	9.49	43	3848	30.2653	ug/L	#	98
9) Methyl methacrylate	11.64	41	60538	18.5974	ug/L		57
10) 2-Nitropropane	11.99	43	15961	16.5493	ug/L		97
13) Cyclohexanone	16.07	55	1572	15.8886	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418917.D A9FOOWT.M Mon Jul 03 11:20:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.8997	0.5	100	0.00
3	T	3-Chloro-1-propene	20.0000	18.9072	5.5	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	18.5528	7.2	100	0.00
5	T	Ethyl Acetate	20.0000	19.5637	2.2	100	0.00
6	T	Methacrylonitrile	20.0000	19.6222	1.9	100	0.00
7	T	Isobutyl Alcohol	-1.0000	30.2653	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	20.0000	18.5974	7.0	100	0.00
10	T	2-Nitropropane	20.0000	16.5493	17.3	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	15.8886	20.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418917.D A9FOOWT.M Fri Apr 14 14:07:45 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

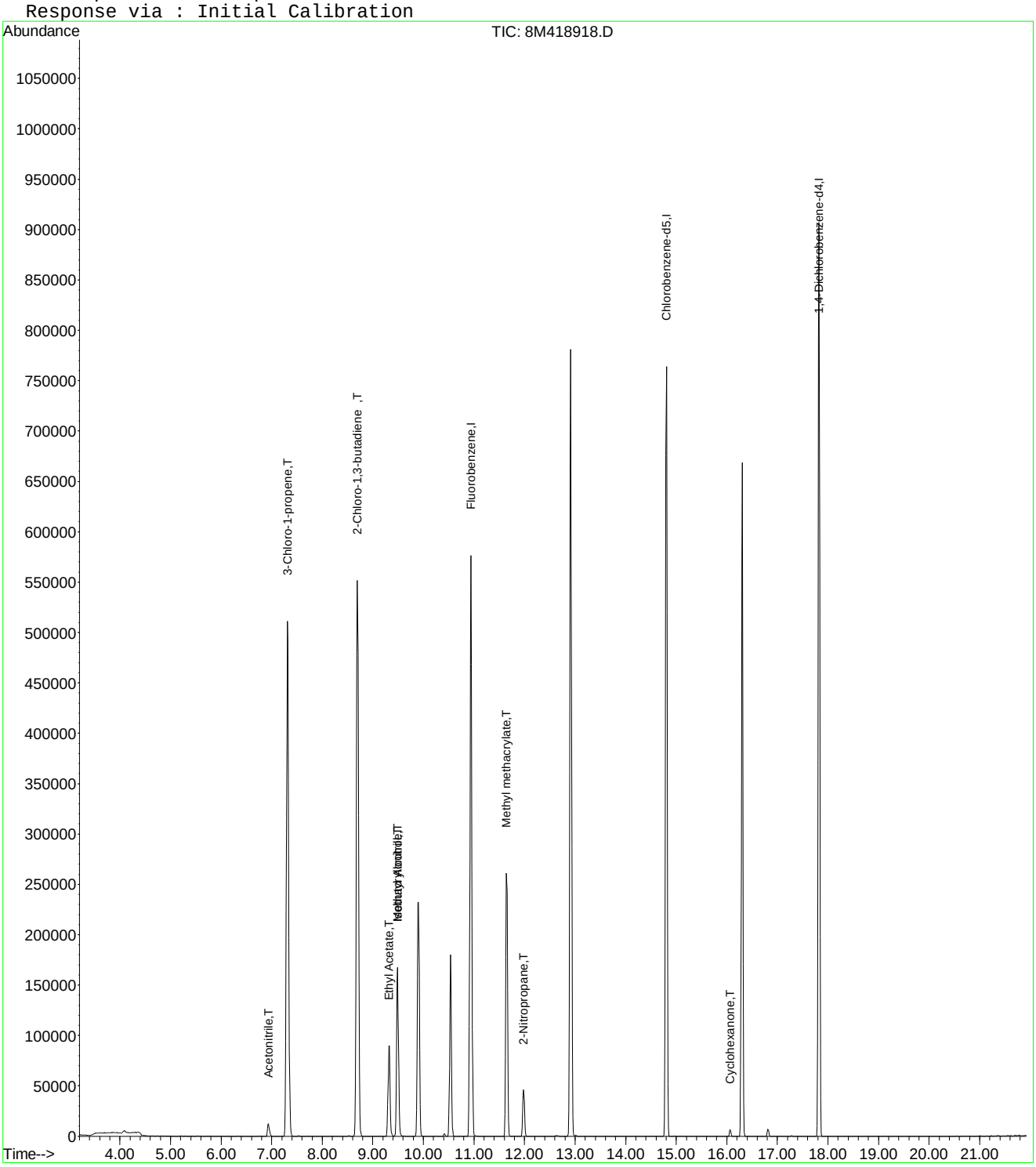
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	742498	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	604990	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	330523	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	17705	47.1322	ug/L		98
3) 3-Chloro-1-propene	7.31	41	486302	49.1759	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	471228	49.1983	ug/L		59
5) Ethyl Acetate	9.32	43	145956	47.5671	ug/L		92
6) Methacrylonitrile	9.49	67	84850	47.5646	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	10376	82.0109	ug/L		100
9) Methyl methacrylate	11.64	41	152652	47.1258	ug/L		59
10) 2-Nitropropane	11.98	43	41969	43.7301	ug/L		97
13) Cyclohexanone	16.07	55	4089	42.0619	ug/L	#	58

(#) = qualifier out of range (m) = manual integration
8M418918.D A9FOOWT.M Mon Jul 03 11:20:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	47.1322	5.7	100	0.00
3	T	3-Chloro-1-propene	50.0000	49.1759	1.6	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	49.1983	1.6	100	0.00
5	T	Ethyl Acetate	50.0000	47.5671	4.9	100	0.00
6	T	Methacrylonitrile	50.0000	47.5646	4.9	100	0.00
7	T	Isobutyl Alcohol	100.0000	82.0109	18.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	50.0000	47.1258	5.7	100	0.00
10	T	2-Nitropropane	50.0000	43.7301	12.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	42.0619	15.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418918.D A9FOOWT.M Fri Apr 14 14:08:07 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:30 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

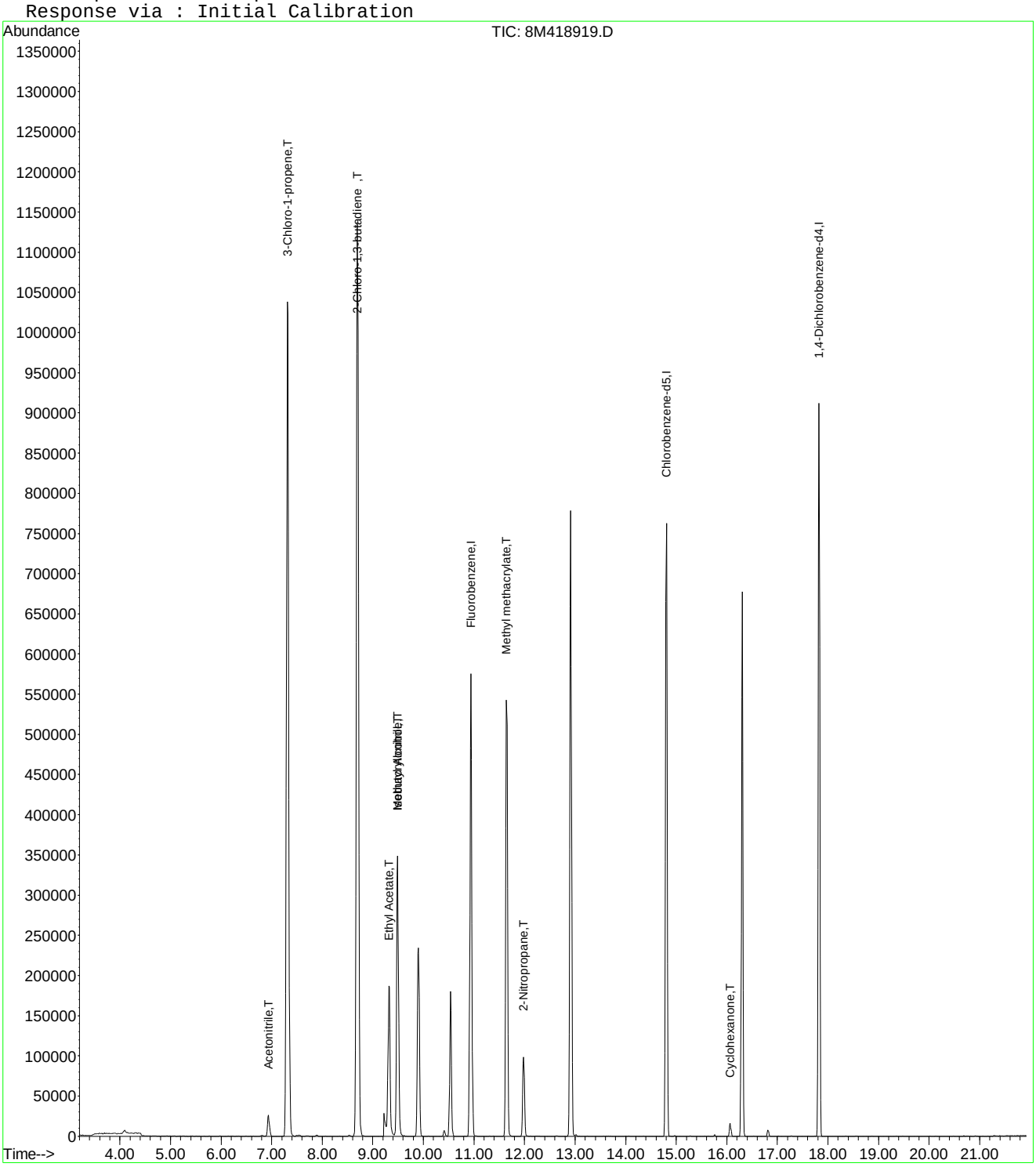
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	739808	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	600111	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	325970	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	37316	99.6994	ug/L		97
3) 3-Chloro-1-propene	7.31	41	997371	101.2231	ug/L		83
4) 2-Chloro-1,3-butadiene	8.69	53	975175	102.1828	ug/L		59
5) Ethyl Acetate	9.32	43	298184	97.5316	ug/L		91
6) Methacrylonitrile	9.49	67	175302	98.6268	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	23313	184.9338	ug/L		94
9) Methyl methacrylate	11.64	41	318110	98.5622	ug/L		58
10) 2-Nitropropane	11.98	43	93106	97.3657	ug/L		99
13) Cyclohexanone	16.07	55	9597	100.0994	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	99.6994	0.3	100	0.00
3	T	3-Chloro-1-propene	100.0000	101.2231	-1.2	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	102.1828	-2.2	100	0.00
5	T	Ethyl Acetate	100.0000	97.5315	2.5	100	0.00
6	T	Methacrylonitrile	100.0000	98.6268	1.4	100	0.00
7	T	Isobutyl Alcohol	200.0000	184.9338	7.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	100.0000	98.5622	1.4	100	0.00
10	T	2-Nitropropane	100.0000	97.3657	2.6	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	100.0994	-0.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:08:27 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:32 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

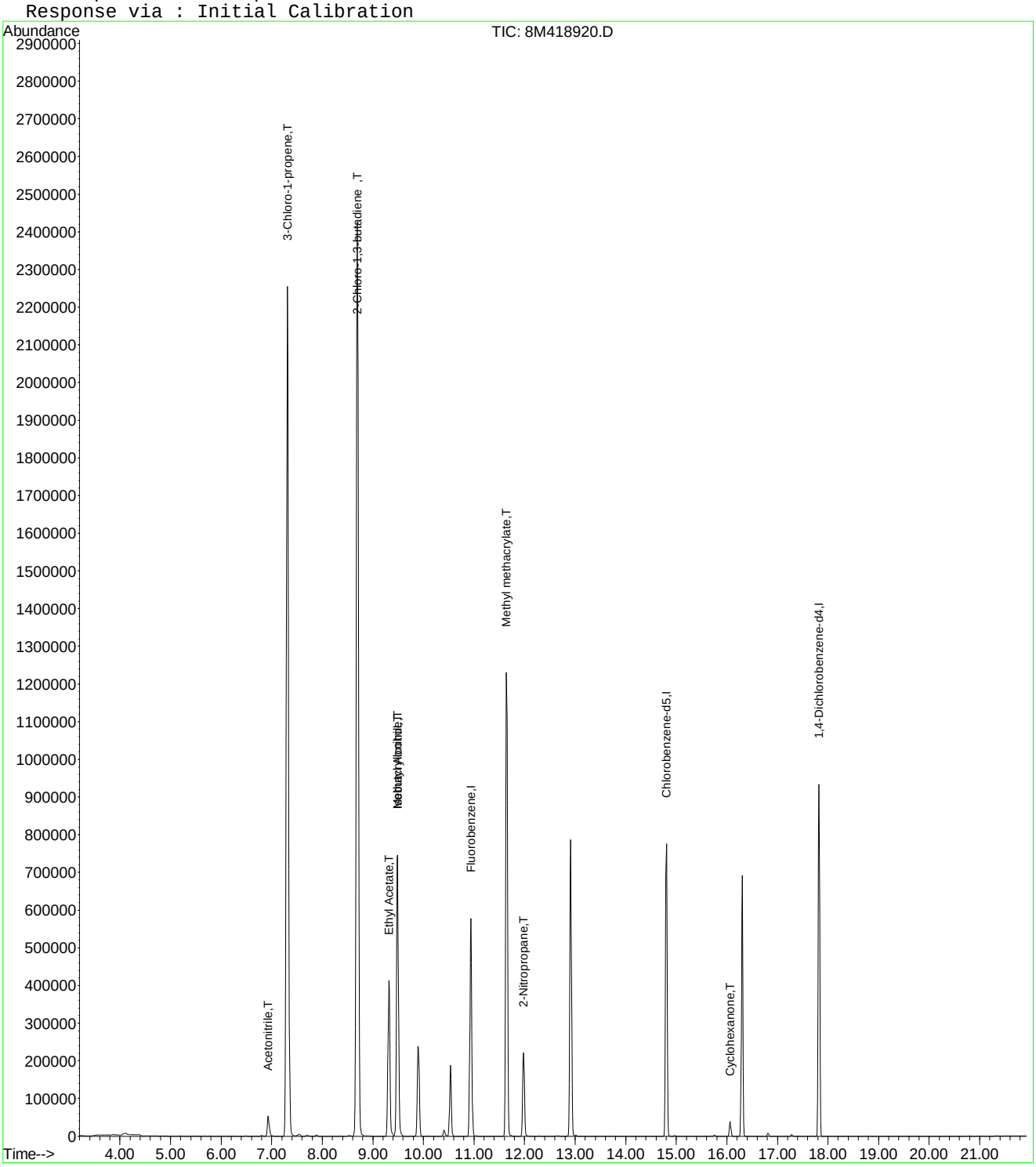
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	757530	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	615643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	339067	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	77830	203.0784	ug/L		95
3) 3-Chloro-1-propene	7.31	41	2094851	207.6324	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	2059315	210.7353	ug/L		59
5) Ethyl Acetate	9.31	43	656953	209.8526	ug/L		92
6) Methacrylonitrile	9.49	67	384959	211.5153	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	53170	411.9115	ug/L		94
9) Methyl methacrylate	11.64	41	704517	213.1786	ug/L		59
10) 2-Nitropropane	11.98	43	205555	209.9305	ug/L		100
13) Cyclohexanone	16.07	55	21273	213.3128	ug/L	#	65

(#) = qualifier out of range (m) = manual integration
8M418920.D A9FOOWT.M Mon Jul 03 11:20:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41:23 2017 Quant Results File: A9FOOWT.RES

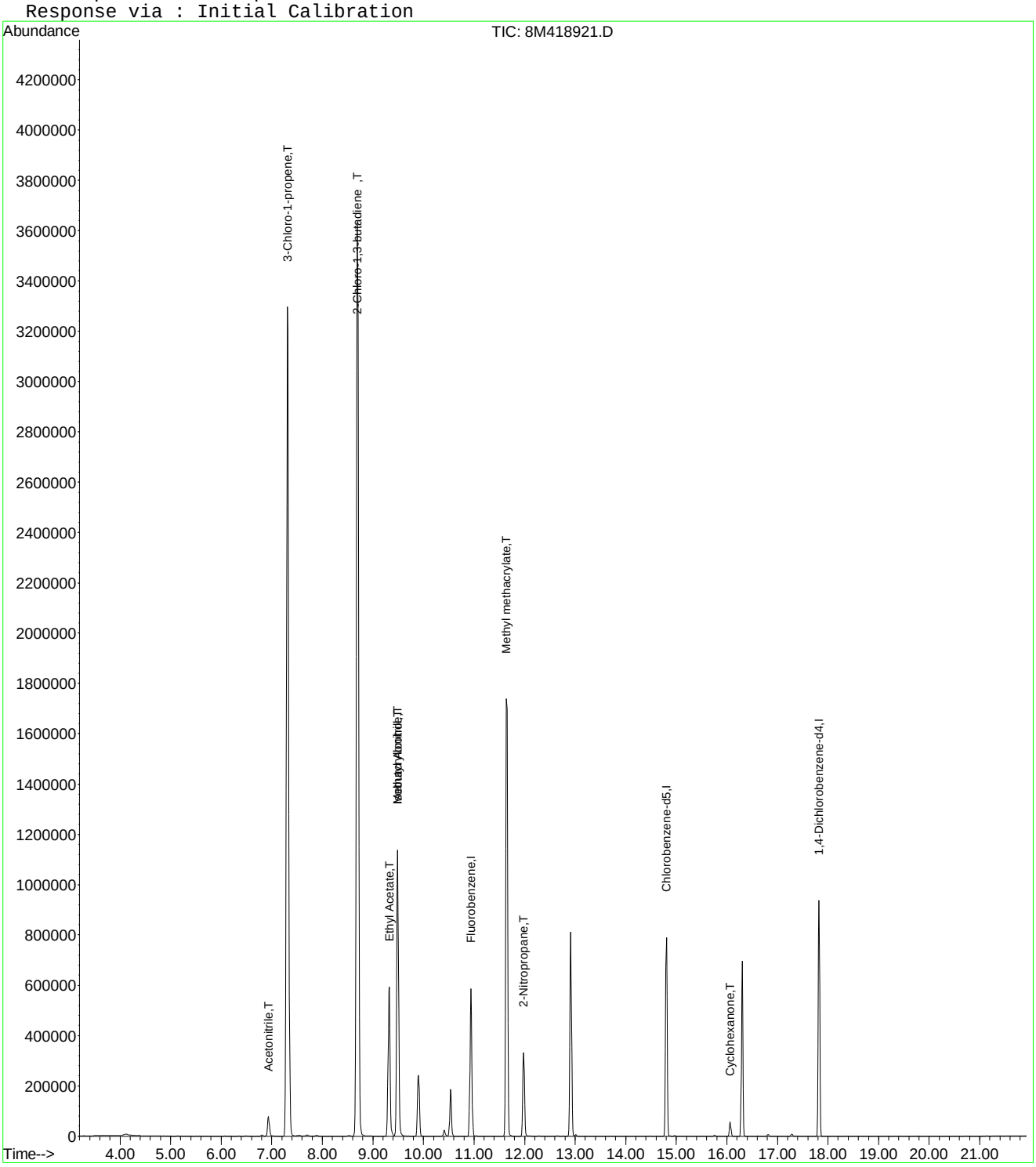
Quant Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	760698	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	622355	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	340966	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	112530	292.3968	ug/L		96
3) 3-Chloro-1-propene	7.31	41	3114799	307.4394	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	3064882	312.3316	ug/L		58
5) Ethyl Acetate	9.32	43	942946	299.9538	ug/L		92
6) Methacrylonitrile	9.49	67	556822	304.6711	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	76292	588.5777	ug/L		95
9) Methyl methacrylate	11.64	41	1020819	307.6014	ug/L		57
10) 2-Nitropropane	11.98	43	308845	314.1056	ug/L		97
13) Cyclohexanone	16.07	55	30268	301.8189	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418921.D 8260BWT.M Fri Apr 14 13:48:31 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:36 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

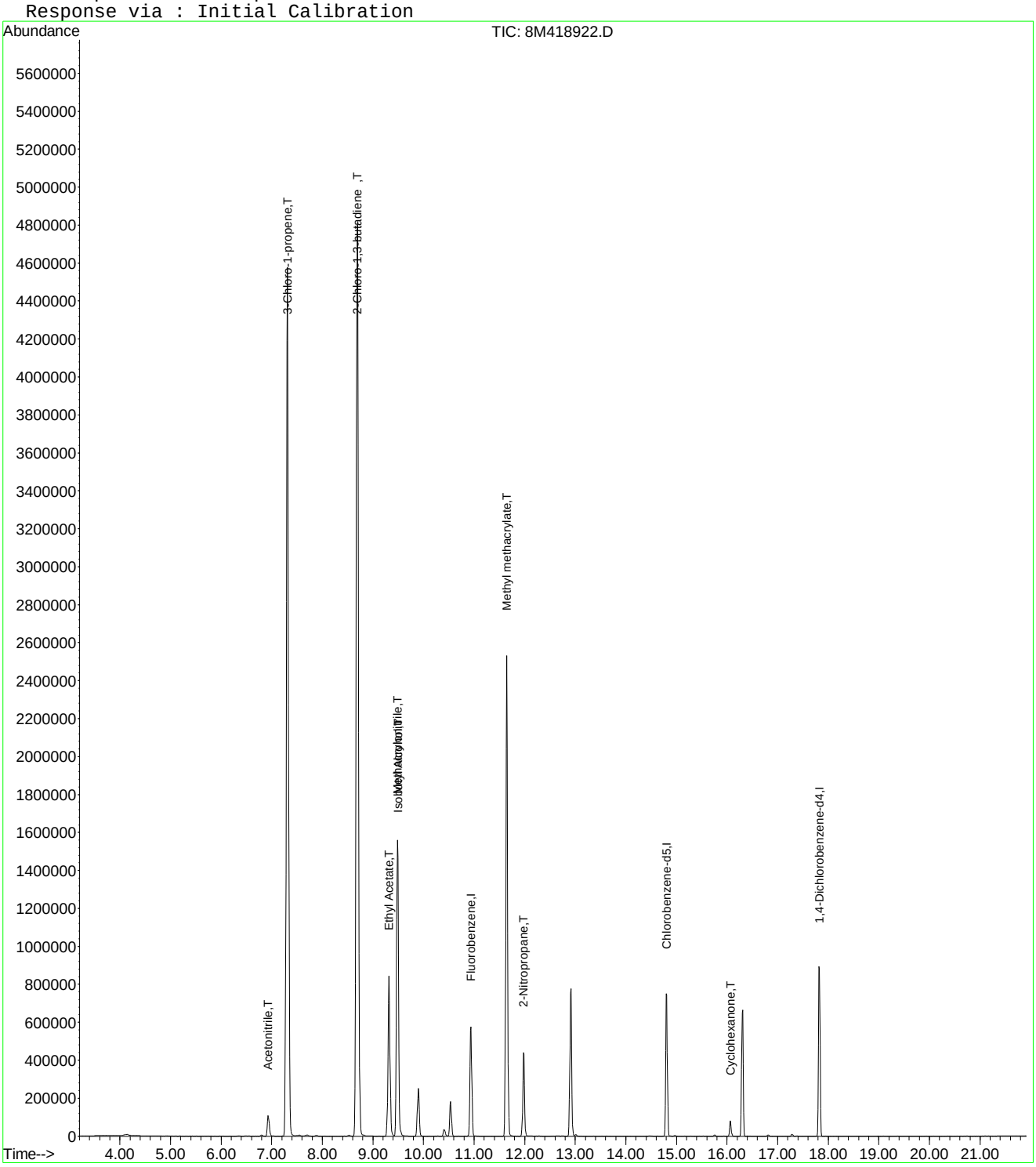
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	765828	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	627777	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	342670	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	158097	408.0459	ug/L		96
3) 3-Chloro-1-propene	7.31	41	4220040	413.7396	ug/L		81
4) 2-Chloro-1,3-butadiene	8.69	53	4133844	418.4439	ug/L		56
5) Ethyl Acetate	9.32	43	1301555	411.2549	ug/L		91
6) Methacrylonitrile	9.48	67	774795	421.0975	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	112499	862.0938	ug/L		94
9) Methyl methacrylate	11.64	41	1421838	425.5698	ug/L		57
10) 2-Nitropropane	11.98	43	433957	438.3922	ug/L		96
13) Cyclohexanone	16.07	55	45392	450.3778	ug/L	#	62

(#) = qualifier out of range (m) = manual integration
8M418922.D A9FOOWT.M Mon Jul 03 11:20:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

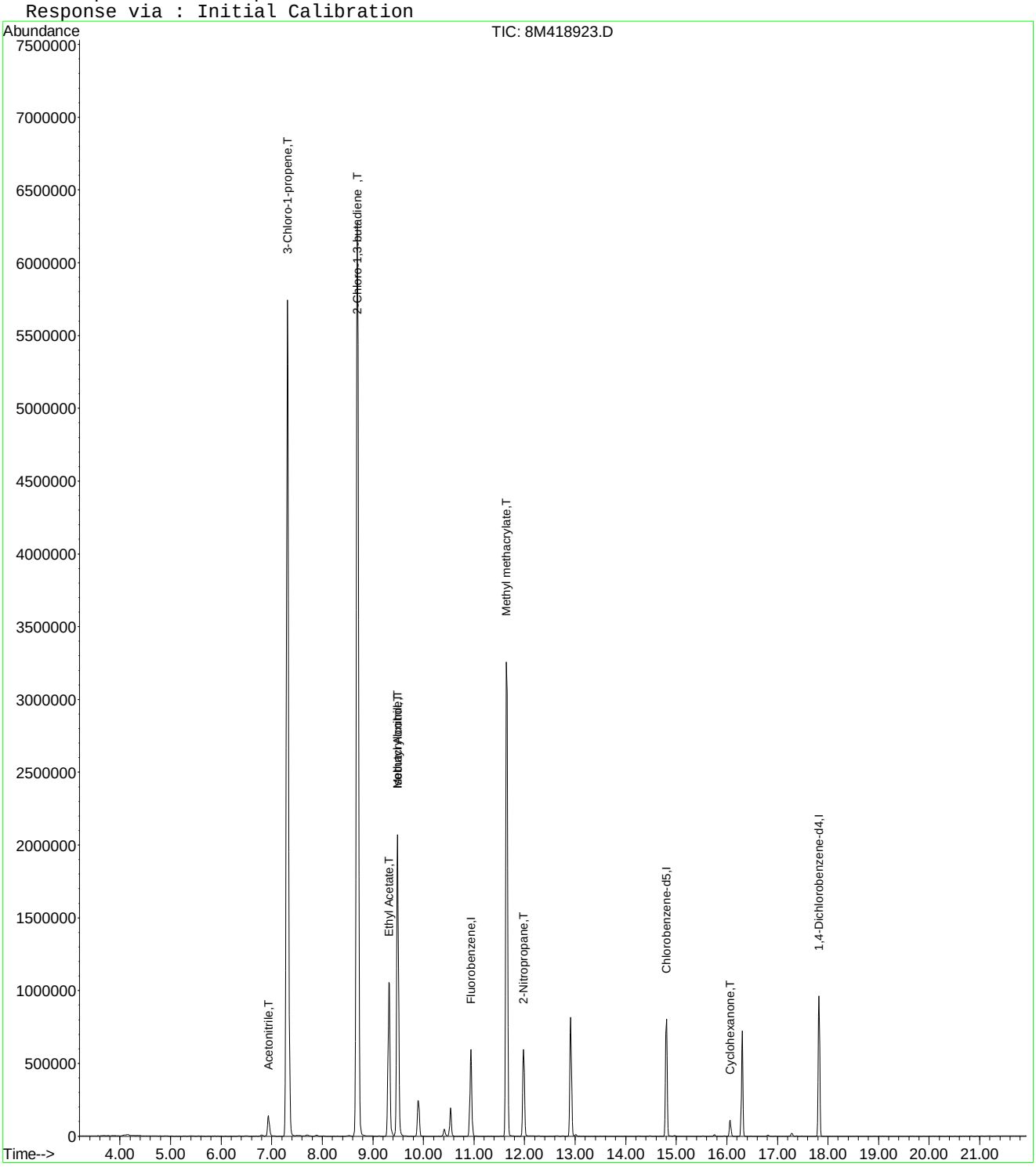
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	771678	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	638069	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	349522	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	205983	527.6086	ug/L		94
3) 3-Chloro-1-propene	7.31	41	5261515	511.9369	ug/L		79
4) 2-Chloro-1,3-butadiene	8.69	53	5178897	520.2542	ug/L		54
5) Ethyl Acetate	9.31	43	1685443	528.5156	ug/L		91
6) Methacrylonitrile	9.49	67	1008521	543.9712	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	153433	1166.8627	ug/L		93
9) Methyl methacrylate	11.64	41	1865399	554.0992	ug/L		57
10) 2-Nitropropane	11.98	43	564365	565.8109	ug/L		96
13) Cyclohexanone	16.07	55	59870	582.3827	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32:00 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 09:07:42 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

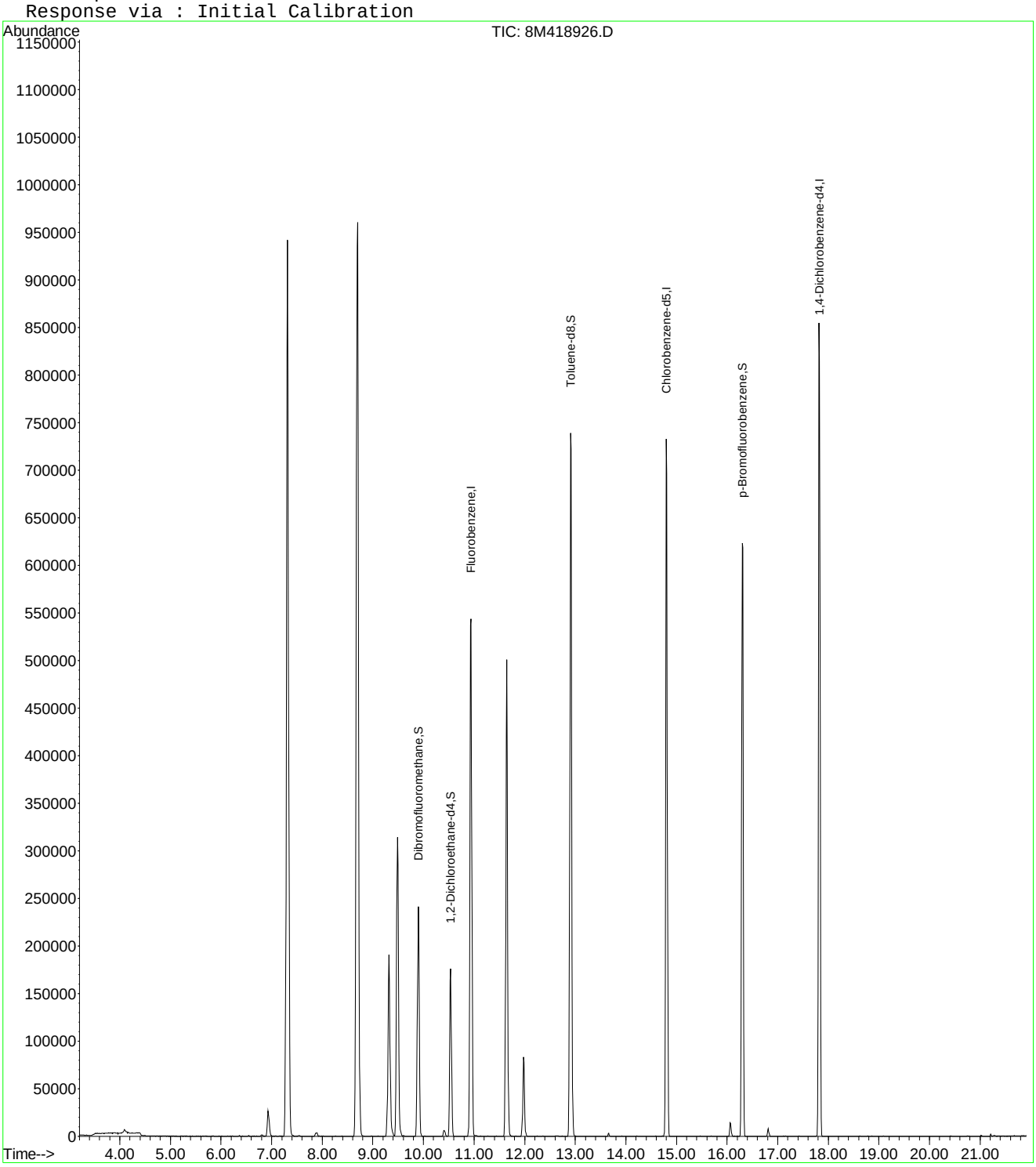
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	198928	23.9627	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.84%			
43) 1,2-Dichloroethane-d4	10.54	65	152795	21.2389	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 84.96%			
58) Toluene-d8	12.91	98	717629	24.0240	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 96.08%			
80) p-Bromofluorobenzene	16.30	95	278441	22.8541	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 91.40%			

Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
8M418926.D 8260WTR.M Fri Apr 14 13:50:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32 2017 Quant Results File: 8260WTR.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 10:18:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

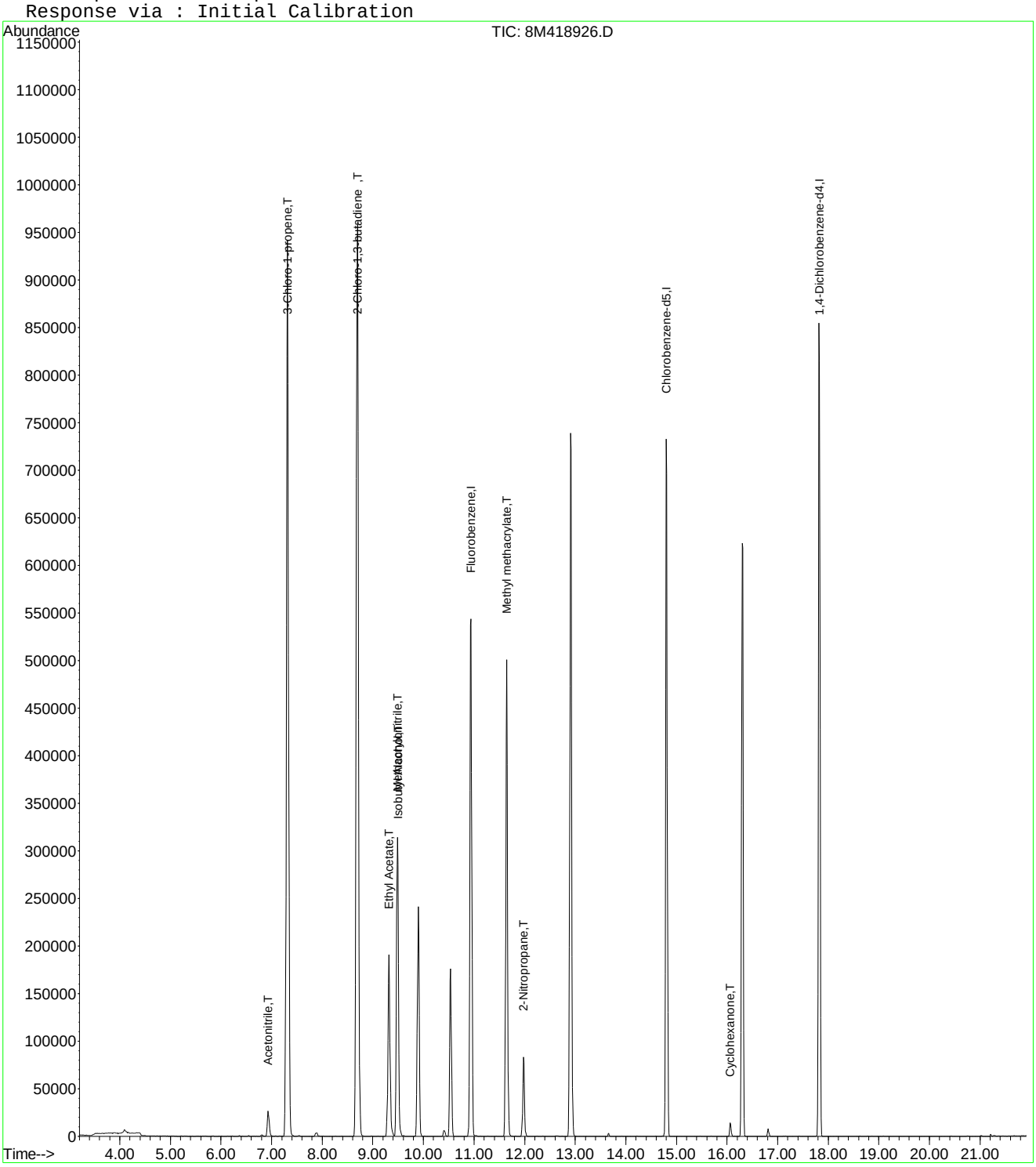
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	36372	98.2177	ug/L		97
3) 3-Chloro-1-propene	7.31	41	875524	89.8082	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	843244	89.3046	ug/L		59
5) Ethyl Acetate	9.32	43	297830	98.4588	ug/L		92
6) Methacrylonitrile	9.48	67	153966	87.5504	ug/L	#	60
7) Isobutyl Alcohol	9.49	43	24214	194.1377	ug/L		91
9) Methyl methacrylate	11.64	41	284340	89.0422	ug/L		58
10) 2-Nitropropane	11.98	43	76371	80.7201	ug/L		99
13) Cyclohexanone	16.06	55	8405	88.7579	ug/L	#	59

(#) = qualifier out of range (m) = manual integration
8M418926.D A9FOOWT.M Mon Jul 03 11:20:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	99	0.00
2	T	Acetonitrile	100.0000	98.2177	1.8	97	0.00
3	T	3-Chloro-1-propene	100.0000	89.8082	10.2	88	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	89.3046	10.7	86	0.00
5	T	Ethyl Acetate	100.0000	98.4588	1.5	100	0.00
6	T	Methacrylonitrile	100.0000	87.5504	12.4	88	0.00
7	T	Isobutyl Alcohol	200.0000	194.1377	2.9	104	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	83	0.00
9	T	Methyl methacrylate	100.0000	89.0422	11.0	89	0.00
10	T	2-Nitropropane	100.0000	80.7202	19.3	82	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
13	T	Cyclohexanone	100.0000	88.7579	11.2	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:11:32 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	803771	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	623661	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	312774	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.91	98	456	0.0160	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.08%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2205	0.2027	ug/L	97
3) Chloromethane	3.83	50	5565	0.4092	ug/L	76
4) Vinyl Chloride	4.07	62	4202	0.3272	ug/L	93
5) 1,3-Butadiene	4.12	54	2857	Below Cal #		1
7) Chloroethane	5.14	64	1232	0.2196	ug/L #	45
8) Trichlorofluoromethane	5.62	101	3405	0.2441	ug/L #	94
10) Isoprene	6.18	67	2827	0.2563	ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1919	0.2413	ug/L #	53
14) 1,1-Dichloroethene	6.72	61	2851	0.2449	ug/L	87
16) Dimethyl Sulfide	6.98	62	1743	0.2248	ug/L	76
19) Methylene Chloride	7.51	84	3288	0.3930	ug/L	95
20) Carbon Disulfide	7.55	76	8902	0.3678	ug/L	96
22) Methyl Tert Butyl Ether	7.71	73	4778	0.2899	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	3284	0.2900	ug/L	96
24) n-Hexane	8.02	57	2298	0.2431	ug/L	89
26) Vinyl Acetate	8.53	43	3061	0.2692	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	3743	0.2568	ug/L #	88
31) 2,2-Dichloropropane	9.34	77	3225	0.2621	ug/L #	77
32) cis-1,2-Dichloroethene	9.40	96	2463	0.2631	ug/L	90
33) Chloroform	9.62	83	5969	0.3696	ug/L	94
35) Bromochloromethane	9.84	130	1452	0.2875	ug/L	93
38) 1,1,1-Trichloroethane	10.14	97	3644	0.2796	ug/L	97
39) Cyclohexane	10.18	56	3332	0.2746	ug/L #	87
40) 1,1-Dichloropropene	10.33	75	3293	0.2894	ug/L	95
42) Carbon Tetrachloride	10.49	117	3061	0.2533	ug/L #	81
45) 1,2-Dichloroethane	10.65	62	2799	0.3065	ug/L #	64
46) Benzene	10.70	78	11003	0.3314	ug/L	94
47) Trichloroethene	11.43	130	2640	0.2830	ug/L	93
48) Methylcyclohexane	11.53	83	3718	0.2990	ug/L	93
49) 1,2-Dichloropropane	11.65	63	2260	0.2787	ug/L	87
50) Bromodichloromethane	11.96	83	2937	0.2767	ug/L #	87
52) Dibromomethane	12.04	93	1092	0.2616	ug/L	85
53) 2-Chloroethyl Vinyl Ether	12.25	63	496	0.1413	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3354	0.2775	ug/L	86
56) Dimethyl Disulfide	12.85	79	410	6.5739	ug/L #	24
59) Toluene	13.02	91	10893	0.3138	ug/L	96
60) Ethyl Methacrylate	13.10	69	1281	0.1956	ug/L	70
62) trans-1,3-Dichloropropene	13.18	75	2847	0.2828	ug/L	78
63) 1,1,2-Trichloroethane	13.41	97	1378	0.2413	ug/L	80
65) 1,3-Dichloropropane	13.71	76	3029	0.3137	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

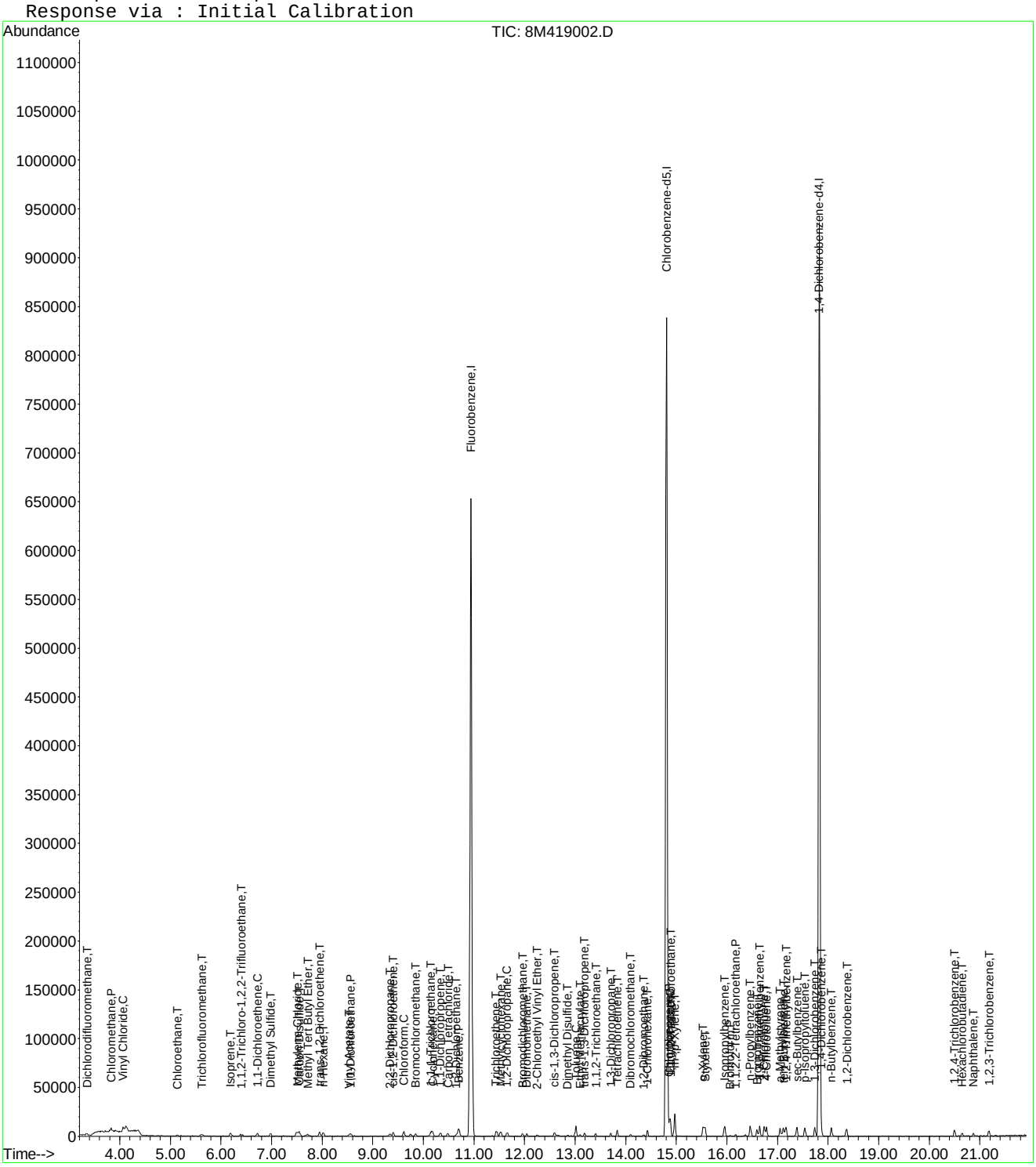
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
66)	Tetrachloroethene	13.83	164	2097	0.2876	ug/L		94
67)	Dibromochloromethane	14.09	129	1754	0.2390	ug/L		96
68)	1,2-Dibromoethane	14.35	107	1560	0.2796	ug/L		80
69)	1-Chlorohexane	14.42	91	2902	0.2642	ug/L		93
70)	Chlorobenzene	14.86	112	7625	0.3086	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.89	131	2025	0.2309	ug/L		92
72)	Ethylbenzene	14.88	106	3702	0.2675	ug/L		78
73)	m-,p-Xylene	14.97	106	9617	0.6000	ug/L		93
74)	o-Xylene	15.53	106	4785	0.2969	ug/L		96
75)	Styrene	15.57	104	6235	0.2468	ug/L		87
76)	Bromoform	16.06	173	794	1.3534	ug/L	#	27
77)	Isopropylbenzene	15.95	105	11105	0.2878	ug/L		97
79)	1,1,2,2-Tetrachloroethane	16.17	83	1461	0.2476	ug/L	#	92
83)	n-Propylbenzene	16.46	91	13614	0.3110	ug/L		97
84)	Bromobenzene	16.60	156	2823	0.2752	ug/L		78
85)	1,3,5-Trimethylbenzene	16.64	105	9120	0.2877	ug/L		91
86)	2-Chlorotoluene	16.74	91	9154	0.3063	ug/L		80
87)	4-Chlorotoluene	16.78	91	8789	0.3263	ug/L		88
88)	a-Methylstyrene	17.05	118	4528	0.2548	ug/L		94
89)	tert-Butylbenzene	17.12	134	1769	0.2465	ug/L		76
90)	1,2,4-Trimethylbenzene	17.17	105	9542	0.2949	ug/L		94
91)	sec-Butylbenzene	17.39	105	11285	0.2842	ug/L		93
92)	p-Isopropyltoluene	17.54	119	9114	0.2726	ug/L		94
93)	1,3-Dichlorobenzene	17.74	146	6334	0.3186	ug/L		92
94)	1,4-Dichlorobenzene	17.86	146	6652	0.3291	ug/L	#	49
95)	n-Butylbenzene	18.06	91	8752	0.2906	ug/L		94
96)	1,2-Dichlorobenzene	18.37	146	5133	0.2939	ug/L		98
98)	1,2,4-Trichlorobenzene	20.50	180	3486	0.2965	ug/L		89
99)	Hexachlorobutadiene	20.64	225	1480	0.2705	ug/L	#	86
100)	Naphthalene	20.87	128	4833	0.2876	ug/L	#	80
101)	1,2,3-Trichlorobenzene	21.18	180	2987	0.3059	ug/L	#	93

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2027	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.4092	0.0	100	0.01
4	C	Vinyl Chloride	-1.0000	0.3272	0.0	100	0.01
5	T	1,3-Butadiene	-1.0000	-20.2217	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	-1.0000	0.2196	0.0	100	0.01
8	T	Trichlorofluoromethane	-1.0000	0.2441	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.2563	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.2413	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	-1.0000	0.2449	0.0	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.2248	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.0662	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3930	0.0	100	0.01
20	T	Carbon Disulfide	-1.0000	0.3678	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2899	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	-1.0000	0.2900	0.0	100	0.01
24	T	n-Hexane	-1.0000	0.2431	0.0	100	0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.2692	0.0	100	0.00
27	P	1,1-Dichloroethane	-1.0000	0.2568	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	-1.0000	0.2621	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2631	0.0	100	0.00
33	C	Chloroform	0.3000	0.3696	-23.2#	100	0.01
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	-1.0000	0.2875	0.0	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-9.86#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	-1.0000	0.2796	0.0	100	0.00
39	T	Cyclohexane	-1.0000	0.2746	0.0	100	0.01
40	T	1,1-Dichloropropene	-1.0000	0.2894	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	-1.0000	0.2533	0.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	-1.0000	0.3065	0.0	100	0.00
46	T	Benzene	-1.0000	0.3314	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2830	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.2990	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.2787	0.0	100	0.00
50	T	Bromodichloromethane	-1.0000	0.2767	0.0	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	-1.0000	0.2616	0.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1413	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2775	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.5739	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0160	0.0	100	0.00
59	C	Toluene	-1.0000	0.3138	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.1956	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2828	0.0	100	0.00
63	T	1,1,2-Trichloroethane	-1.0000	0.2413	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	-1.0000	0.3137	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.2876	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2390	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2796	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.2642	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3086	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2309	0.0	0	0.01
72	C	Ethylbenzene	-1.0000	0.2675	0.0	0	0.00
73	T	m-,p-Xylene	-1.0000	0.6000	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2969	0.0	100	0.00
75	T	Styrene	-1.0000	0.2468	0.0	100	0.00
76	P	Bromoform	-1.0000	1.3534	0.0	100	0.01
77	T	Isopropylbenzene	-1.0000	0.2878	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.2476	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1194	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	-1.0000	0.3110	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.2752	8.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.2877	0.0	100	0.00
86	T	2-Chlorotoluene	-1.0000	0.3063	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3263	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2548	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2465	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.2949	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.2842	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.2726	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3186	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3291	-9.7	100	0.00
95	T	n-Butylbenzene	-1.0000	0.2906	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.2939	2.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.2965	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.2705	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.2876	0.0	100	0.00
101	T	1,2,3-Trichlorobenzene	0.3000	0.3059	-2.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	787150	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	615912	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	306493	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.92	98	201	0.0071	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	3389	0.3181	ug/L	86
3) Chloromethane	3.82	50	7334	0.5507	ug/L	96
4) Vinyl Chloride	4.07	62	5367	0.4267	ug/L	99
5) 1,3-Butadiene	4.12	54	3783	Below Cal #		53
7) Chloroethane	5.13	64	2045	0.3723	ug/L #	45
8) Trichlorofluoromethane	5.62	101	4954	0.3627	ug/L #	93
10) Isoprene	6.18	67	3988	0.3692	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	2378	0.3053	ug/L	89
14) 1,1-Dichloroethene	6.71	61	4170	0.3658	ug/L	97
16) Dimethyl Sulfide	6.98	62	2440	0.3213	ug/L	86
18) Methyl acetate	7.23	43	600	0.1979	ug/L #	53
19) Methylene Chloride	7.48	84	3294	0.4021	ug/L	63
20) Carbon Disulfide	7.54	76	9802	0.4135	ug/L	98
22) Methyl Tert Butyl Ether	7.71	73	5656	0.3504	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	4304	0.3881	ug/L	85
24) n-Hexane	8.02	57	3612	0.3902	ug/L	91
26) Vinyl Acetate	8.53	43	3817	0.3428	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	5095	0.3569	ug/L #	76
31) 2,2-Dichloropropane	9.34	77	4235	0.3515	ug/L	77
32) cis-1,2-Dichloroethene	9.40	96	3310	0.3611	ug/L	95
33) Chloroform	9.61	83	6791	0.4294	ug/L	94
35) Bromochloromethane	9.85	130	1484	0.3000	ug/L	78
36) Tetrahydrofuran	9.86	42	394	0.3297	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	4246	0.3327	ug/L	95
39) Cyclohexane	10.17	56	4729	0.3979	ug/L	82
40) 1,1-Dichloropropene	10.32	75	4225	0.3791	ug/L	84
42) Carbon Tetrachloride	10.48	117	3628	0.3065	ug/L	85
45) 1,2-Dichloroethane	10.66	62	3115	0.3483	ug/L #	68
46) Benzene	10.70	78	12752	0.3921	ug/L	99
47) Trichloroethene	11.44	130	3526	0.3860	ug/L	94
48) Methylcyclohexane	11.53	83	4742	0.3894	ug/L	98
49) 1,2-Dichloropropane	11.66	63	2964	0.3732	ug/L	72
50) Bromodichloromethane	11.96	83	3435	0.3305	ug/L #	95
52) Dibromomethane	12.05	93	1271	0.3110	ug/L	92
53) 2-Chloroethyl Vinyl Ether	12.25	63	562	0.1635	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3811	0.3220	ug/L	88
56) Dimethyl Disulfide	12.86	79	827	6.6305	ug/L	76
59) Toluene	13.01	91	12577	0.3668	ug/L	100
60) Ethyl Methacrylate	13.09	69	1611	0.2491	ug/L #	68
62) trans-1,3-Dichloropropene	13.19	75	3144	0.3162	ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

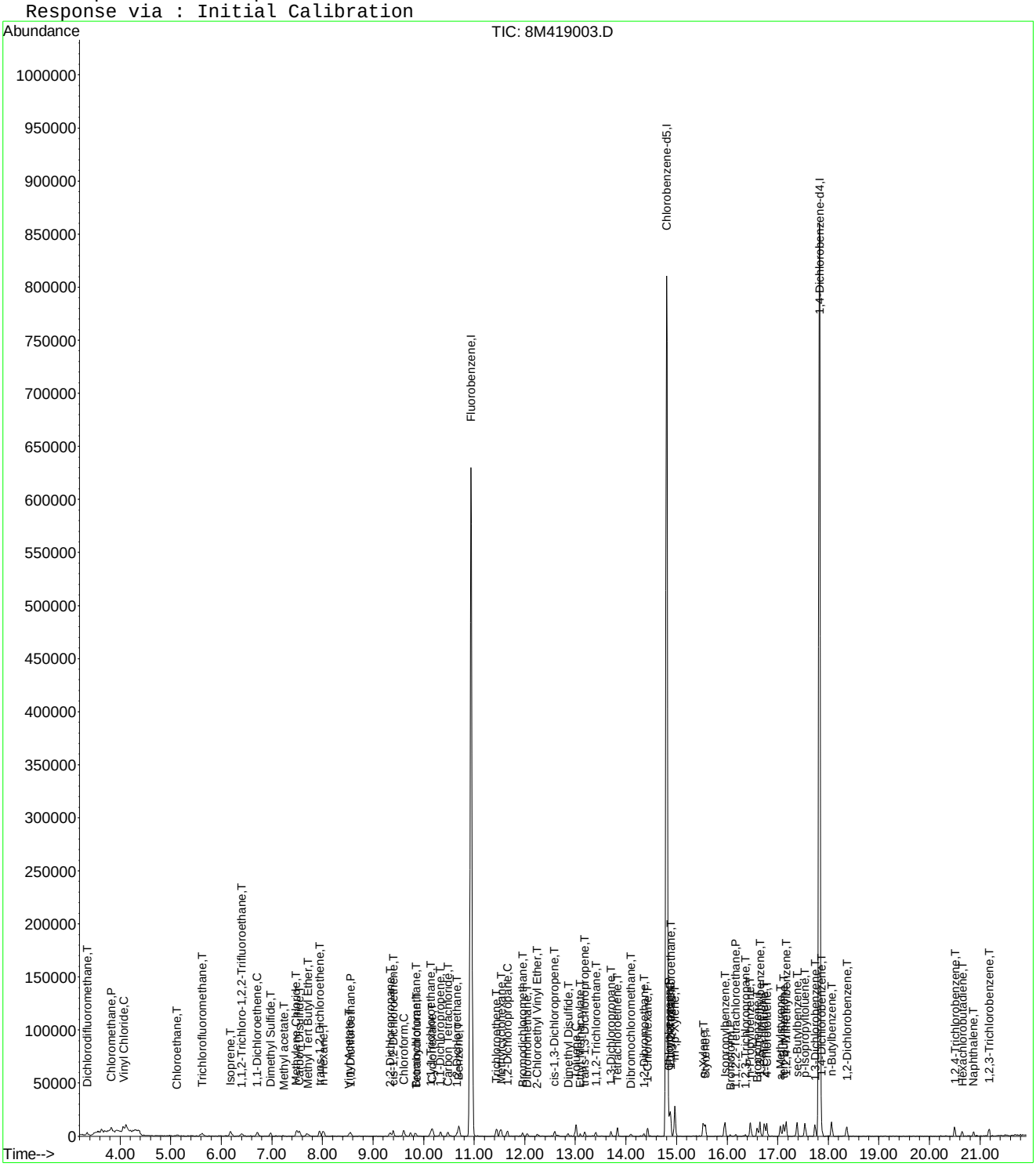
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
63)	1,1,2-Trichloroethane	13.40	97	2066	0.3663 ug/L		83
65)	1,3-Dichloropropane	13.70	76	3481	0.3651 ug/L		81
66)	Tetrachloroethene	13.83	164	2419	0.3359 ug/L		93
67)	Dibromochloromethane	14.10	129	2287	0.3155 ug/L		95
68)	1,2-Dibromoethane	14.36	107	1857	0.3370 ug/L		87
69)	1-Chlorohexane	14.43	91	3796	0.3500 ug/L		88
70)	Chlorobenzene	14.85	112	9935	0.4071 ug/L		80
71)	1,1,1,2-Tetrachloroethane	14.88	131	2985	0.3447 ug/L		94
72)	Ethylbenzene	14.87	106	4602	0.3367 ug/L		81
73)	m-,p-Xylene	14.97	106	11280	0.7126 ug/L		87
74)	o-Xylene	15.53	106	5356	0.3366 ug/L		95
75)	Styrene	15.56	104	8019	0.3214 ug/L		98
76)	Bromoform	16.07	173	792	1.3549 ug/L	#	65
77)	Isopropylbenzene	15.96	105	14417	0.3784 ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.16	83	1888	0.3265 ug/L	#	87
81)	1,2,3-Trichloropropane	16.36	110	210	0.1267 ug/L	#	6
83)	n-Propylbenzene	16.45	91	17056	0.3976 ug/L		93
84)	Bromobenzene	16.60	156	3412	0.3395 ug/L		91
85)	1,3,5-Trimethylbenzene	16.65	105	12100	0.3896 ug/L		98
86)	2-Chlorotoluene	16.73	91	13111	0.4477 ug/L		99
87)	4-Chlorotoluene	16.78	91	9782	0.3706 ug/L		95
88)	a-Methylstyrene	17.05	118	5086	0.2921 ug/L		99
89)	tert-Butylbenzene	17.11	134	2759	0.3923 ug/L		83
90)	1,2,4-Trimethylbenzene	17.17	105	11199	0.3532 ug/L		96
91)	sec-Butylbenzene	17.38	105	16076	0.4132 ug/L		92
92)	p-Isopropyltoluene	17.54	119	11698	0.3571 ug/L		98
93)	1,3-Dichlorobenzene	17.75	146	7364	0.3780 ug/L		96
94)	1,4-Dichlorobenzene	17.87	146	7953	0.4015 ug/L		83
95)	n-Butylbenzene	18.07	91	12640	0.4283 ug/L	#	94
96)	1,2-Dichlorobenzene	18.37	146	5812	0.3396 ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	4235	0.3675 ug/L		99
99)	Hexachlorobutadiene	20.65	225	1988	0.3708 ug/L		96
100)	Naphthalene	20.87	128	6635	0.4029 ug/L	#	86
101)	1,2,3-Trichlorobenzene	21.18	180	3757	0.3926 ug/L		95

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:53 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3181	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.5507	0.0	100	0.00
4	C	Vinyl Chloride	0.4000	0.4267	-6.7	100	0.02
5	T	1,3-Butadiene	-1.0000	-19.9254	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	0.4000	0.3723	6.9	100	0.00
8	T	Trichlorofluoromethane	0.4000	0.3627	9.3	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.3692	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3053	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	0.4000	0.3658	8.6	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.3213	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.1979	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4021	0.0	100	-0.01
20	T	Carbon Disulfide	-1.0000	0.4135	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3504	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	0.4000	0.3881	3.0	100	0.00
24	T	n-Hexane	-1.0000	0.3902	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.3428	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.3569	10.8	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	0.4000	0.3514	12.1	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.3611	9.7	100	0.00
33	C	Chloroform	0.4000	0.4294	-7.3	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	0.4000	0.3000	25.0#	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.3297	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	0.4000	0.3327	16.8	100	0.00
39	T	Cyclohexane	-1.0000	0.3979	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3791	0.0	100	-0.01
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	0.4000	0.3065	23.4	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	0.4000	0.3483	12.9	100	0.00
46	T	Benzene	0.4000	0.3922	2.0	100	0.00
47	T	Trichloroethene	0.4000	0.3860	3.5	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3894	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3732	6.7	100	0.00
50	T	Bromodichloromethane	0.4000	0.3305	17.4	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	0.4000	0.3110	22.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1635	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419003.D 8260WT.M Tue Apr 18 11:59:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3220	19.5	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.6305	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0071	0.0	100	0.00
59	C	Toluene	0.4000	0.3669	8.3	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2491	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3162	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3663	8.4	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	0.4000	0.3651	8.7	100	0.00
66	T	Tetrachloroethene	0.4000	0.3359	16.0	100	0.00
67	T	Dibromochloromethane	0.4000	0.3155	21.1	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.3371	15.7	100	0.00
69	T	1-Chlorohexane	0.4000	0.3500	12.5	100	0.00
70	P	Chlorobenzene	0.4000	0.4071	-1.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3447	13.8	100	0.00
72	C	Ethylbenzene	0.4000	0.3367	15.8	100	-0.01
73	T	m-,p-Xylene	0.8000	0.7126	10.9	100	0.00
74	T	o-Xylene	-1.0000	0.3366	0.0	100	0.00
75	T	Styrene	0.4000	0.3214	19.6	100	0.00
76	P	Bromoform	-1.0000	1.3549	0.0	100	0.02
77	T	Isopropylbenzene	0.4000	0.3784	5.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.3265	18.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1267	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	0.4000	0.3976	0.6	100	0.00
84	T	Bromobenzene	0.4000	0.3395	15.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.3896	2.6	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4477	-11.9	100	0.00
87	T	4-Chlorotoluene	0.4000	0.3706	7.3	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2921	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3923	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	0.4000	0.3532	11.7	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4132	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3571	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.3780	5.5	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4015	-0.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4283	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.3396	15.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	0.4000	0.3675	8.1	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.3708	7.3	100	0.00
100	T	Naphthalene	0.4000	0.4029	-0.7	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.3926	1.8	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419003.D 8260WT.M Tue Apr 18 11:59:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	779914	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	608999	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	308129	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	3656	0.4469	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.80%#		
43) 1,2-Dichloroethane-d4	10.54	65	3358	0.4748	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	12.91	98	13712	0.4928	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	1.96%#		
80) p-Bromofluorobenzene	16.30	95	5409	0.4974	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	9773	0.9259	ug/L	89
3) Chloromethane	3.82	50	14220	1.0777	ug/L	94
4) Vinyl Chloride	4.06	62	13411	1.0762	ug/L	98
5) 1,3-Butadiene	4.12	54	9735	Below Cal	#	74
6) Bromomethane	4.98	94	2003	1.2503	ug/L	89
7) Chloroethane	5.14	64	5085	0.9342	ug/L	98
8) Trichlorofluoromethane	5.63	101	14425	1.0658	ug/L #	94
9) Diethyl ether	6.15	59	24837	4.8725	ug/L	91
10) Isoprene	6.19	67	11081	1.0355	ug/L	99
11) Acrolein	6.39	56	1283	1.8174	ug/L	87
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	7816	1.0127	ug/L	95
13) Acetone	6.50	43	1194	1.0885	ug/L #	42
14) 1,1-Dichloroethene	6.72	61	11427	1.0117	ug/L	93
15) Tert-Butyl Alcohol	6.82	59	3335	9.3795	ug/L #	68
16) Dimethyl Sulfide	6.98	62	7490	0.9956	ug/L	98
18) Methyl acetate	7.24	43	2479	0.8253	ug/L #	53
19) Methylene Chloride	7.49	84	8465	1.0429	ug/L	79
20) Carbon Disulfide	7.54	76	24774	1.0549	ug/L	99
21) Acrylonitrile	7.68	53	3342	2.1964	ug/L	91
22) Methyl Tert Butyl Ether	7.71	73	15457	0.9665	ug/L	97
23) trans-1,2-Dichloroethene	7.95	61	10769	0.9800	ug/L	94
24) n-Hexane	8.02	57	9445	1.0297	ug/L	89
25) Diisopropyl ether	8.36	45	121009	4.9196	ug/L	94
26) Vinyl Acetate	8.53	43	10576	0.9587	ug/L	90
27) 1,1-Dichloroethane	8.57	63	14365	1.0157	ug/L	95
28) Ethyl-Tert-Butyl ether	8.93	59	101471	4.8508	ug/L	97
29) 2-Butanone	9.13	43	992	0.5767	ug/L #	44
30) Propionitrile	9.23	54	2404	4.5091	ug/L #	56
31) 2,2-Dichloropropane	9.34	77	12075	1.0114	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	8962	0.9867	ug/L	89
33) Chloroform	9.61	83	16050	1.0242	ug/L	99
34) 1-Bromopropane	9.75	122	1768	0.9867	ug/L	91
35) Bromochloromethane	9.84	130	4693	0.9575	ug/L	83
36) Tetrahydrofuran	9.87	42	6126	5.1735	ug/L	80
38) 1,1,1-Trichloroethane	10.14	97	12661	1.0011	ug/L	93
39) Cyclohexane	10.18	56	11570	0.9826	ug/L	96
40) 1,1-Dichloropropene	10.34	75	11057	1.0014	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	88613	4.7307	ug/L	96
42) Carbon Tetrachloride	10.49	117	11842	1.0099	ug/L	98
45) 1,2-Dichloroethane	10.66	62	8720	0.9841	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:55 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

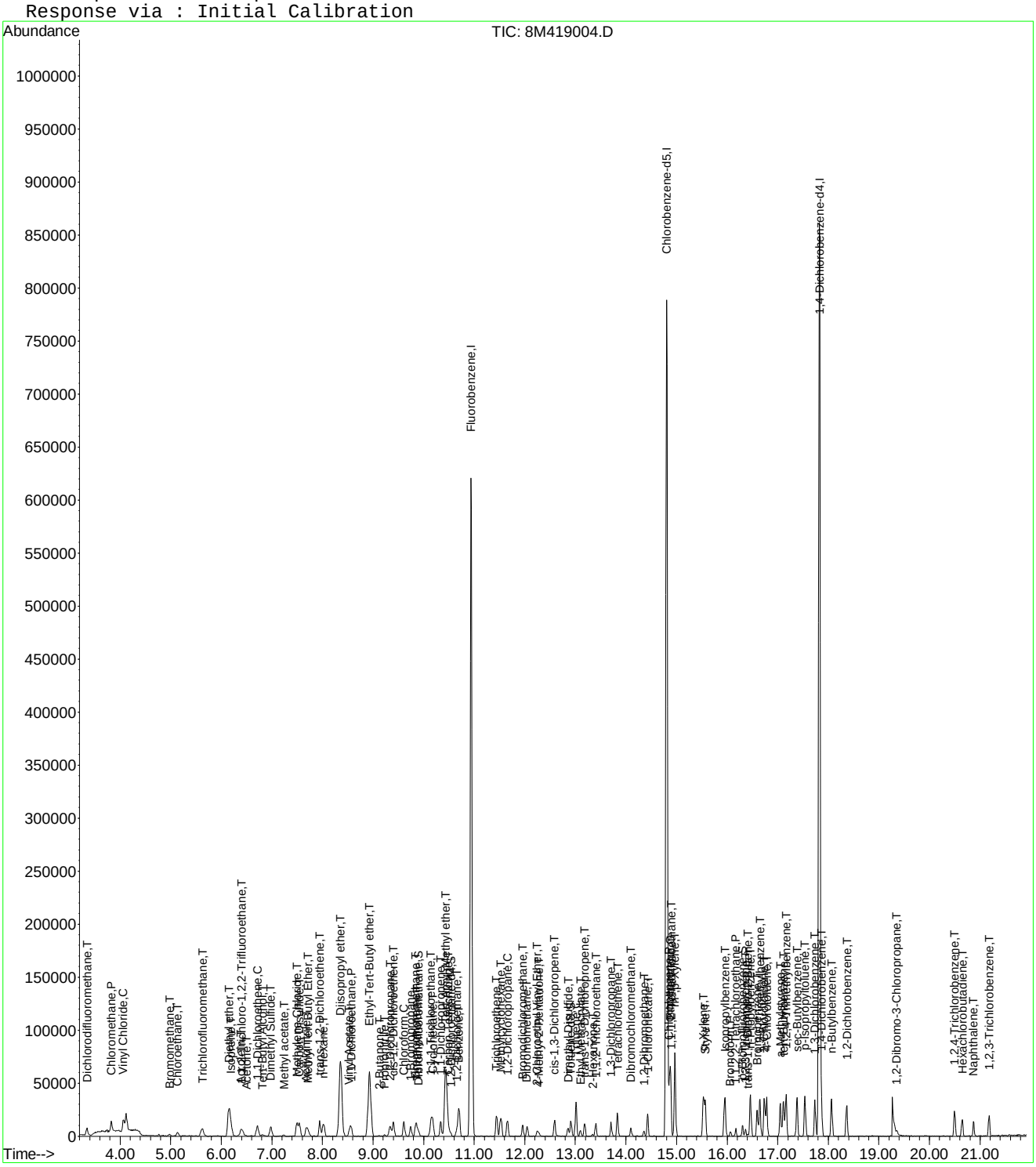
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
46)	Benzene	10.70	78	32995	1.0241 ug/L		98
47)	Trichloroethene	11.44	130	9064	1.0014 ug/L		96
48)	Methylcyclohexane	11.52	83	12257	1.0159 ug/L		96
49)	1,2-Dichloropropane	11.66	63	7625	0.9690 ug/L		89
50)	Bromodichloromethane	11.96	83	9755	0.9472 ug/L		97
52)	Dibromomethane	12.04	93	3914	0.9665 ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	3022	0.8875 ug/L		86
54)	4-Methyl-2-Pentanone	12.28	58	1067	0.6996 ug/L	#	33
55)	cis-1,3-Dichloropropene	12.59	75	11045	0.9418 ug/L		99
56)	Dimethyl Disulfide	12.86	79	3184	6.9480 ug/L		100
59)	Toluene	13.01	91	34963	1.0314 ug/L		98
60)	Ethyl Methacrylate	13.11	69	5063	0.7916 ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	8931	0.9085 ug/L		94
63)	1,1,2-Trichloroethane	13.40	97	5720	1.0256 ug/L		92
64)	2-Hexanone	13.34	58	660	0.4822 ug/L	#	1
65)	1,3-Dichloropropane	13.70	76	9865	1.0463 ug/L		88
66)	Tetrachloroethene	13.84	164	6911	0.9706 ug/L		94
67)	Dibromochloromethane	14.10	129	6507	0.9079 ug/L		93
68)	1,2-Dibromoethane	14.36	107	5094	0.9351 ug/L		96
69)	1-Chlorohexane	14.44	91	10710	0.9986 ug/L		96
70)	Chlorobenzene	14.85	112	23511	0.9743 ug/L		74
71)	1,1,1,2-Tetrachloroethane	14.89	131	7696	0.8987 ug/L		99
72)	Ethylbenzene	14.87	106	12181	0.9013 ug/L		83
73)	m-,p-Xylene	14.97	106	31012	1.9815 ug/L		91
74)	o-Xylene	15.53	106	14876	0.9454 ug/L		96
75)	Styrene	15.56	104	22652	0.9182 ug/L		96
76)	Bromoform	16.06	173	3053	1.1801 ug/L		92
77)	Isopropylbenzene	15.96	105	37771	1.0025 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	6072	1.0444 ug/L	#	97
81)	1,2,3-Trichloropropane	16.36	110	1447	0.8681 ug/L		93
82)	trans-1,4-Dichloro-2-Buten	16.41	53	711	1.1263 ug/L	#	1
83)	n-Propylbenzene	16.46	91	45884	1.0639 ug/L		99
84)	Bromobenzene	16.60	156	10336	1.0229 ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	30984	0.9922 ug/L		98
86)	2-Chlorotoluene	16.73	91	32327	1.0980 ug/L		96
87)	4-Chlorotoluene	16.78	91	26310	0.9916 ug/L		96
88)	a-Methylstyrene	17.05	118	14557	0.8315 ug/L		95
89)	tert-Butylbenzene	17.12	134	6410	0.9066 ug/L		87
90)	1,2,4-Trimethylbenzene	17.17	105	32136	1.0080 ug/L		99
91)	sec-Butylbenzene	17.38	105	40408	1.0331 ug/L		98
92)	p-Isopropyltoluene	17.54	119	32541	0.9881 ug/L		100
93)	1,3-Dichlorobenzene	17.74	146	19666	1.0041 ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	20254	1.0171 ug/L	#	70
95)	n-Butylbenzene	18.07	91	29903	1.0080 ug/L		97
96)	1,2-Dichlorobenzene	18.37	146	18343	1.0661 ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.35	75	619	0.6542 ug/L		90
98)	1,2,4-Trichlorobenzene	20.49	180	11339	0.9788 ug/L		98
99)	Hexachlorobutadiene	20.65	225	5266	0.9769 ug/L		99
100)	Naphthalene	20.87	128	15692	0.9479 ug/L		98
101)	1,2,3-Trichlorobenzene	21.18	180	9244	0.9609 ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:56 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9260	7.4	100	0.00
3	P	Chloromethane	1.0000	1.0777	-7.8	100	0.00
4	C	Vinyl Chloride	1.0000	1.0762	-7.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-18.1082	0.0	0	0.03
6	T	Bromomethane	1.0000	1.2503	-25.0#	100	0.02
7	T	Chloroethane	1.0000	0.9342	6.6	100	0.01
8	T	Trichlorofluoromethane	1.0000	1.0658	-6.6	100	0.03
9	T	Diethyl ether	5.0000	4.8725	2.6	100	0.00
10	T	Isoprene	-1.0000	1.0355	0.0	100	0.00
11	T	Acrolein	-1.0000	1.8174	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0127	-1.3	100	0.00
13	T	Acetone	-1.0000	1.0885	0.0	100	0.02
14	C	1,1-Dichloroethene	1.0000	1.0117	-1.2	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	9.3795	0.0	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	0.9956	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.8253	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0429	-4.3	100	0.00
20	T	Carbon Disulfide	1.0000	1.0549	-5.5	100	0.00
21	T	Acrylonitrile	2.5000	2.1965	12.1	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	0.9665	3.4	100	0.00
23	T	trans-1,2-Dichloroethene	1.0000	0.9800	2.0	100	0.00
24	T	n-Hexane	-1.0000	1.0297	0.0	100	0.00
25	T	Diisopropyl ether	5.0000	4.9196	1.6	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9587	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	1.0157	-1.6	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	4.8508	3.0	100	0.00
29	T	2-Butanone	-1.0000	0.5767	0.0	100	0.02
30	T	Propionitrile	5.0000	4.5091	9.8	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.0114	-1.1	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9867	1.3	100	0.00
33	C	Chloroform	1.0000	1.0242	-2.4	100	0.00
34		1-Bromopropane	1.0000	0.9867	1.3	100	0.00
35	T	Bromochloromethane	1.0000	0.9575	4.2	100	-0.01
36	T	Tetrahydrofuran	5.0000	5.1735	-3.5	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.4469	0.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0011	-0.1	100	0.00
39	T	Cyclohexane	1.0000	0.9826	1.7	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0014	-0.1	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	4.7307	5.4	100	0.00
42	T	Carbon Tetrachloride	1.0000	1.0099	-1.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.4748	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	1.0000	0.9841	1.6	100	0.00
46	T	Benzene	1.0000	1.0241	-2.4	100	0.00
47	T	Trichloroethene	1.0000	1.0014	-0.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.0159	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9690	3.1	100	0.00
50	T	Bromodichloromethane	1.0000	0.9473	5.3	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	1.0000	0.9665	3.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8875	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.6996	0.0	100	0.00

(#) = Out of Range
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9417	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.9480	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.4928	0.0	100	0.00
59	C	Toluene	1.0000	1.0314	-3.1	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.7916	20.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	1.0000	0.9084	9.2	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0256	-2.6	100	0.00
64	T	2-Hexanone	-1.0000	0.4822	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0463	-4.6	100	0.00
66	T	Tetrachloroethene	1.0000	0.9706	2.9	100	0.00
67	T	Dibromochloromethane	1.0000	0.9079	9.2	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9351	6.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9986	0.1	100	0.00
70	P	Chlorobenzene	1.0000	0.9743	2.6	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.8987	10.1	100	0.02
72	C	Ethylbenzene	1.0000	0.9013	9.9	100	-0.01
73	T	m-,p-Xylene	2.0000	1.9815	0.9	100	0.00
74	T	o-Xylene	1.0000	0.9454	5.5	100	0.00
75	T	Styrene	1.0000	0.9182	8.2	100	0.00
76	P	Bromoform	1.0000	1.1801	-18.0	100	0.00
77	T	Isopropylbenzene	1.0000	1.0025	-0.3	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0444	-4.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.4974	0.0	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	0.8681	13.2	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	1.0000	1.1263	-12.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0639	-6.4	100	0.00
84	T	Bromobenzene	1.0000	1.0229	-2.3	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	0.9922	0.8	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0980	-9.8	100	0.00
87	T	4-Chlorotoluene	1.0000	0.9916	0.8	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8315	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9066	9.3	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0080	-0.8	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0331	-3.3	100	0.00
92	T	p-Isopropyltoluene	1.0000	0.9881	1.2	100	0.00
93	T	1,3-Dichlorobenzene	1.0000	1.0041	-0.4	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	1.0171	-1.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0079	-0.8	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0661	-6.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.6542	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	0.9788	2.1	100	0.00
99	T	Hexachlorobutadiene	1.0000	0.9769	2.3	100	0.00
100	T	Naphthalene	1.0000	0.9479	5.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	0.9609	3.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	786816	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.80	117	613120	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	307545	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.90	111	7910	0.9585 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.84%#	
43) 1,2-Dichloroethane-d4	10.53	65	6765	0.9482 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.80%#	
58) Toluene-d8	12.91	98	27609	0.9855 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	3.96%#	
80) p-Bromofluorobenzene	16.30	95	11029	1.0161 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.08%#	
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.35	85	18197	1.7090 ug/L	98
3) Chloromethane	3.82	50	27723	2.0826 ug/L	96
4) Vinyl Chloride	4.06	62	26048	2.0720 ug/L	98
5) 1,3-Butadiene	4.12	54	18463	Below Cal #	71
6) Bromomethane	4.97	94	4285	1.8796 ug/L	92
7) Chloroethane	5.15	64	10874	1.9802 ug/L	96
8) Trichlorofluoromethane	5.62	101	25863	1.8941 ug/L	99
9) Diethyl ether	6.15	59	125724	24.4479 ug/L	91
10) Isoprene	6.19	67	20005	1.8530 ug/L	94
11) Acrolein	6.39	56	8808	12.3674 ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	14374	1.8461 ug/L	99
13) Acetone	6.49	43	2188	1.9772 ug/L #	61
14) 1,1-Dichloroethene	6.72	61	21622	1.8975 ug/L	94
15) Tert-Butyl Alcohol	6.82	59	15100	42.0952 ug/L	95
16) Dimethyl Sulfide	6.99	62	14397	1.8968 ug/L	83
17) Iodomethane	7.24	142	1183	0.3475 ug/L #	31
18) Methyl acetate	7.23	43	6243	2.0602 ug/L #	64
19) Methylene Chloride	7.49	84	15417	1.8827 ug/L	82
20) Carbon Disulfide	7.54	76	46839	1.9769 ug/L	99
21) Acrylonitrile	7.68	53	17600	11.4657 ug/L	93
22) Methyl Tert Butyl Ether	7.70	73	29822	1.8483 ug/L	99
23) trans-1,2-Dichloroethene	7.95	61	21949	1.9798 ug/L	92
24) n-Hexane	8.03	57	18571	2.0068 ug/L	92
25) Diisopropyl ether	8.36	45	624517	25.1670 ug/L	95
26) Vinyl Acetate	8.53	43	20892	1.8772 ug/L	91
27) 1,1-Dichloroethane	8.57	63	27479	1.9259 ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	512681	24.2936 ug/L	97
29) 2-Butanone	9.12	43	2972	1.7126 ug/L #	59
30) Propionitrile	9.23	54	12326	22.9166 ug/L	98
31) 2,2-Dichloropropane	9.34	77	24154	2.0053 ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	17720	1.9338 ug/L	92
33) Chloroform	9.61	83	31381	1.9850 ug/L	97
34) 1-Bromopropane	9.75	122	3352	1.8543 ug/L	99
35) Bromochloromethane	9.84	130	9815	1.9850 ug/L	94
36) Tetrahydrofuran	9.87	42	27490	23.0121 ug/L	86
38) 1,1,1-Trichloroethane	10.15	97	23941	1.8765 ug/L	99
39) Cyclohexane	10.17	56	22528	1.8965 ug/L	89
40) 1,1-Dichloropropene	10.34	75	21378	1.9191 ug/L	100
41) Tert-Amyl-Methyl ether	10.44	73	455514	24.1049 ug/L	97
42) Carbon Tetrachloride	10.49	117	22574	1.9082 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

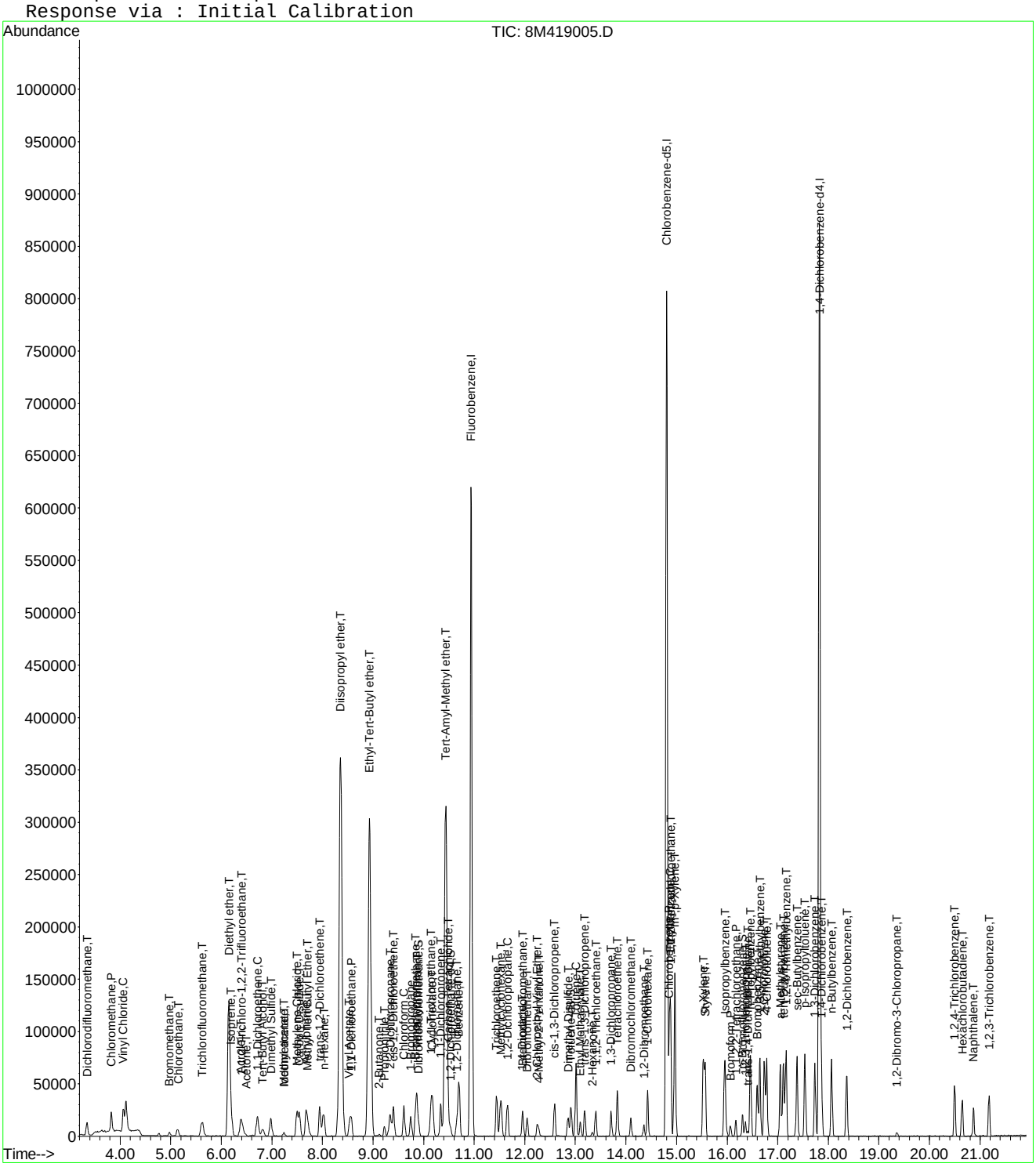
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	17154	1.9189 ug/L		100
46)	Benzene	10.70	78	65094	2.0026 ug/L		98
47)	Trichloroethene	11.44	130	17338	1.8988 ug/L		94
48)	Methylcyclohexane	11.52	83	22736	1.8679 ug/L		91
49)	1,2-Dichloropropane	11.66	63	15665	1.9732 ug/L		97
50)	Bromodichloromethane	11.96	83	20105	1.9351 ug/L		99
51)	1,4-Dioxane	11.95	88	1498	33.0951 ug/L		74
52)	Dibromomethane	12.05	93	8093	1.9809 ug/L		95
53)	2-Chloroethyl Vinyl Ether	12.25	63	5724	1.6664 ug/L		91
54)	4-Methyl-2-Pentanone	12.28	58	2383	1.5488 ug/L	#	73
55)	cis-1,3-Dichloropropene	12.59	75	21986	1.8582 ug/L		99
56)	Dimethyl Disulfide	12.86	79	7091	7.4642 ug/L		90
59)	Toluene	13.01	91	69700	2.0423 ug/L		98
60)	Ethyl Methacrylate	13.09	69	10905	1.6936 ug/L		84
62)	trans-1,3-Dichloropropene	13.19	75	17794	1.7978 ug/L		98
63)	1,1,2-Trichloroethane	13.40	97	10978	1.9551 ug/L		92
64)	2-Hexanone	13.33	58	1923	1.3955 ug/L	#	21
65)	1,3-Dichloropropane	13.70	76	18233	1.9209 ug/L		89
66)	Tetrachloroethene	13.83	164	13703	1.9115 ug/L		98
67)	Dibromochloromethane	14.10	129	13297	1.8429 ug/L		95
68)	1,2-Dibromoethane	14.36	107	10688	1.9487 ug/L		95
69)	1-Chlorohexane	14.43	91	20724	1.9193 ug/L		94
70)	Chlorobenzene	14.85	112	47662	1.9619 ug/L		90
71)	1,1,1,2-Tetrachloroethane	14.88	131	15693	1.8203 ug/L		97
72)	Ethylbenzene	14.87	106	26084	1.9171 ug/L		97
73)	m-,p-Xylene	14.97	106	60868	3.8629 ug/L		91
74)	o-Xylene	15.53	106	29031	1.8326 ug/L		95
75)	Styrene	15.56	104	45562	1.8345 ug/L		96
76)	Bromoform	16.07	173	6974	1.9520 ug/L		96
77)	Isopropylbenzene	15.96	105	75544	1.9916 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	11188	1.9280 ug/L		91
81)	1,2,3-Trichloropropane	16.36	110	3124	1.8778 ug/L		76
82)	trans-1,4-Dichloro-2-Buten	16.41	53	1589	1.7434 ug/L	#	37
83)	n-Propylbenzene	16.46	91	90826	2.1100 ug/L		99
84)	Bromobenzene	16.60	156	19940	1.9771 ug/L		98
85)	1,3,5-Trimethylbenzene	16.65	105	62132	1.9935 ug/L		99
86)	2-Chlorotoluene	16.73	91	56721	1.9302 ug/L		87
87)	4-Chlorotoluene	16.78	91	60016	2.2662 ug/L		88
88)	a-Methylstyrene	17.05	118	30045	1.7194 ug/L		99
89)	tert-Butylbenzene	17.12	134	13646	1.9338 ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	64473	2.0262 ug/L		99
91)	sec-Butylbenzene	17.38	105	80995	2.0748 ug/L		96
92)	p-Isopropyltoluene	17.54	119	64103	1.9501 ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	38573	1.9731 ug/L		98
94)	1,4-Dichlorobenzene	17.87	146	39209	1.9728 ug/L		84
95)	n-Butylbenzene	18.07	91	57496	1.9417 ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	34361	2.0008 ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.36	75	1793	1.8985 ug/L		85
98)	1,2,4-Trichlorobenzene	20.49	180	21702	1.8770 ug/L		93
99)	Hexachlorobutadiene	20.65	225	10481	1.9480 ug/L		99
100)	Naphthalene	20.87	128	30316	1.8348 ug/L		95
101)	1,2,3-Trichlorobenzene	21.18	180	17347	1.8067 ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:59 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7090	14.6	100	0.00
3	P	Chloromethane	2.0000	2.0826	-4.1	100	0.00
4	C	Vinyl Chloride	2.0000	2.0720	-3.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-15.5080	0.0	0	0.03
6	T	Bromomethane	2.0000	1.8796	6.0	100	0.00
7	T	Chloroethane	2.0000	1.9802	1.0	100	0.02
8	T	Trichlorofluoromethane	2.0000	1.8941	5.3	100	0.02
9	T	Diethyl ether	25.0000	24.4479	2.2	100	0.00
10	T	Isoprene	-1.0000	1.8530	0.0	100	0.00
11	T	Acrolein	12.5000	12.3674	1.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8461	7.7	100	0.00
13	T	Acetone	-1.0000	1.9772	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.8975	5.1	100	0.02
15	T	Tert-Butyl Alcohol	50.0000	42.0951	15.8	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.8968	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.3475	0.0	0	0.02
18	T	Methyl acetate	-1.0000	2.0602	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.8827	5.9	100	0.00
20	T	Carbon Disulfide	2.0000	1.9769	1.2	100	0.00
21	T	Acrylonitrile	12.5000	11.4657	8.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.8483	7.6	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9798	1.0	100	0.00
24	T	n-Hexane	-1.0000	2.0068	0.0	100	0.02
25	T	Diisopropyl ether	25.0000	25.1670	-0.7	100	0.00
26	T	Vinyl Acetate	-1.0000	1.8772	0.0	100	0.00
27	P	1,1-Dichloroethane	2.0000	1.9259	3.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	24.2936	2.8	100	0.00
29	T	2-Butanone	-1.0000	1.7126	0.0	100	0.00
30	T	Propionitrile	25.0000	22.9166	8.3	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0053	-0.3	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9338	3.3	100	0.00
33	C	Chloroform	2.0000	1.9850	0.8	100	0.00
34		1-Bromopropane	2.0000	1.8543	7.3	100	0.00
35	T	Bromochloromethane	2.0000	1.9850	0.8	100	-0.01
36	T	Tetrahydrofuran	25.0000	23.0121	8.0	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9585	4.2	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.8765	6.2	100	0.00
39	T	Cyclohexane	2.0000	1.8965	5.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9191	4.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.1049	3.6	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.9082	4.6	100	0.02
43	S	1,2-Dichloroethane-d4	1.0000	0.9482	5.2	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	2.0000	1.9189	4.1	100	0.00
46	T	Benzene	2.0000	2.0026	-0.1	100	0.00
47	T	Trichloroethene	2.0000	1.8988	5.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.8679	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	1.9732	1.3	100	0.00
50	T	Bromodichloromethane	2.0000	1.9351	3.2	100	0.00
51	T	1,4-Dioxane	-1.0000	33.0951	0.0	100	0.00
52	T	Dibromomethane	2.0000	1.9809	1.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.6664	16.7	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	1.5488	0.0	100	0.00

(#) = Out of Range
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8582	7.1	100	0.00
56	T	Dimethyl Disulfide	-1.0000	7.4642	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	0.9855	1.4	100	0.00
59	C	Toluene	2.0000	2.0423	-2.1	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.6936	15.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	2.0000	1.7978	10.1	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9551	2.2	100	0.00
64	T	2-Hexanone	-1.0000	1.3955	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9209	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9115	4.4	100	0.00
67	T	Dibromochloromethane	2.0000	1.8429	7.9	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9487	2.6	100	0.00
69	T	1-Chlorohexane	2.0000	1.9193	4.0	100	0.00
70	P	Chlorobenzene	2.0000	1.9619	1.9	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8203	9.0	100	0.00
72	C	Ethylbenzene	2.0000	1.9171	4.1	100	-0.01
73	T	m-,p-Xylene	4.0000	3.8629	3.4	100	0.00
74	T	o-Xylene	2.0000	1.8326	8.4	100	0.00
75	T	Styrene	2.0000	1.8345	8.3	100	0.00
76	P	Bromoform	2.0000	1.9520	2.4	100	0.02
77	T	Isopropylbenzene	2.0000	1.9916	0.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9280	3.6	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0161	-1.6	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8778	6.1	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7434	12.8	100	0.00
83	T	n-Propylbenzene	2.0000	2.1100	-5.5	100	0.00
84	T	Bromobenzene	2.0000	1.9771	1.1	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	1.9935	0.3	100	0.00
86	T	2-Chlorotoluene	2.0000	1.9302	3.5	100	0.00
87	T	4-Chlorotoluene	2.0000	2.2662	-13.3	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7194	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	1.9338	3.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	2.0262	-1.3	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0748	-3.7	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9501	2.5	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	1.9731	1.3	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9728	1.4	100	0.00
95	T	n-Butylbenzene	2.0000	1.9417	2.9	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	2.0008	-0.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.8985	5.1	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.8770	6.2	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.9480	2.6	100	0.00
100	T	Naphthalene	2.0000	1.8348	8.3	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8067	9.7	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	778912	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	612991	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	325196	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	19042	2.3308	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	9.32%#		
43) 1,2-Dichloroethane-d4	10.53	65	17061	2.4156	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	9.68%#		
58) Toluene-d8	12.91	98	67864	2.4230	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	9.68%#		
80) p-Bromofluorobenzene	16.30	95	27271	2.3761	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	9.52%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	43158	4.0943	ug/L	99
3) Chloromethane	3.83	50	64959	4.9293	ug/L	98
4) Vinyl Chloride	4.06	62	61310	4.9264	ug/L	99
5) 1,3-Butadiene	4.11	54	42524	3.2475	ug/L	80
6) Bromomethane	4.97	94	11598	3.9117	ug/L	96
7) Chloroethane	5.13	64	26632	4.8991	ug/L	96
8) Trichlorofluoromethane	5.62	101	65432	4.8407	ug/L	98
9) Diethyl ether	6.15	59	254455	49.9827	ug/L	91
10) Isoprene	6.19	67	49212	4.6047	ug/L	89
11) Acrolein	6.38	56	18060	25.6156	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	36923	4.7903	ug/L	99
13) Acetone	6.49	43	5612	5.1228	ug/L	83
14) 1,1-Dichloroethene	6.72	61	54337	4.8168	ug/L	92
15) Tert-Butyl Alcohol	6.82	59	38399	108.1334	ug/L	97
16) Dimethyl Sulfide	6.98	62	36188	4.8162	ug/L	88
17) Iodomethane	7.24	142	4078	1.2101	ug/L	89
18) Methyl acetate	7.25	43	15352	5.1176	ug/L #	85
19) Methylene Chloride	7.49	84	38847	4.7920	ug/L	82
20) Carbon Disulfide	7.55	76	116168	4.9528	ug/L	98
21) Acrylonitrile	7.67	53	38351	25.2377	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	78139	4.8920	ug/L	96
23) trans-1,2-Dichloroethene	7.95	61	52084	4.7457	ug/L	95
24) n-Hexane	8.02	57	46838	5.1127	ug/L	96
25) Diisopropyl ether	8.35	45	1253906	51.0432	ug/L	95
26) Vinyl Acetate	8.53	43	55036	4.9952	ug/L	92
27) 1,1-Dichloroethane	8.57	63	68755	4.8676	ug/L	98
28) Ethyl-Tert-Butyl ether	8.93	59	1064807	50.9683	ug/L	97
29) 2-Butanone	9.12	43	8240	4.7964	ug/L	80
30) Propionitrile	9.22	54	27971	52.5317	ug/L	100
31) 2,2-Dichloropropane	9.33	77	58069	4.8700	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	44615	4.9182	ug/L	96
33) Chloroform	9.61	83	71537	4.5709	ug/L	96
34) 1-Bromopropane	9.75	122	8516	4.7588	ug/L	99
35) Bromochloromethane	9.84	130	24918	5.0905	ug/L	91
36) Tetrahydrofuran	9.86	42	59759	50.5323	ug/L	85
38) 1,1,1-Trichloroethane	10.14	97	61305	4.8538	ug/L	98
39) Cyclohexane	10.17	56	57878	4.9219	ug/L	89
40) 1,1-Dichloropropene	10.34	75	52556	4.7657	ug/L	98
41) Tert-Amyl-Methyl ether	10.43	73	963240	51.4900	ug/L	97
42) Carbon Tetrachloride	10.48	117	56505	4.8249	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

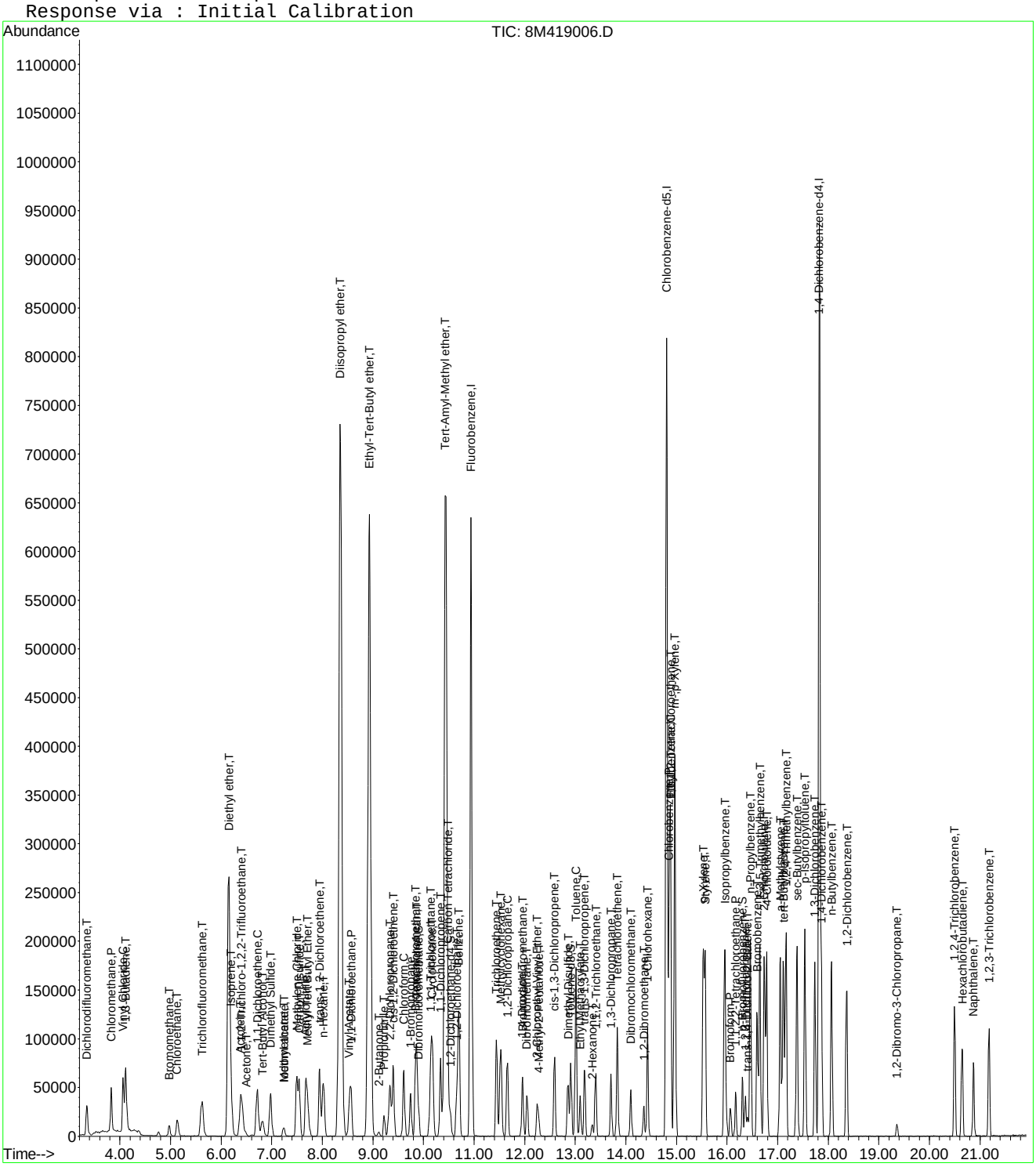
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	43458	4.9106	ug/L		97
46)	Benzene	10.70	78	157813	4.9044	ug/L		96
47)	Trichloroethene	11.44	130	42638	4.7169	ug/L		97
48)	Methylcyclohexane	11.52	83	57749	4.7926	ug/L		95
49)	1,2-Dichloropropane	11.66	63	37898	4.8221	ug/L		94
50)	Bromodichloromethane	11.96	83	49682	4.8305	ug/L		98
51)	1,4-Dioxane	11.95	88	4215	94.0662	ug/L		87
52)	Dibromomethane	12.04	93	20146	4.9810	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	15782	4.6410	ug/L		93
54)	4-Methyl-2-Pentanone	12.28	58	6536	4.2910	ug/L		95
55)	cis-1,3-Dichloropropene	12.59	75	56759	4.8458	ug/L		99
56)	Dimethyl Disulfide	12.86	79	20741	5.9847	ug/L		89
59)	Toluene	13.01	91	173564	5.0867	ug/L		97
60)	Ethyl Methacrylate	13.10	69	30943	4.8067	ug/L		84
62)	trans-1,3-Dichloropropene	13.18	75	47647	4.8150	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	27951	4.9790	ug/L		97
64)	2-Hexanone	13.33	58	5889	4.2746	ug/L	#	80
65)	1,3-Dichloropropane	13.71	76	45722	4.8179	ug/L		84
66)	Tetrachloroethene	13.83	164	34889	4.8678	ug/L		97
67)	Dibromochloromethane	14.10	129	35461	4.9157	ug/L		98
68)	1,2-Dibromoethane	14.36	107	27169	4.9547	ug/L		98
69)	1-Chlorohexane	14.43	91	52484	4.8617	ug/L		91
70)	Chlorobenzene	14.85	112	114782	4.7258	ug/L		100
71)	1,1,1,2-Tetrachloroethane	14.88	131	41080	4.7660	ug/L		99
72)	Ethylbenzene	14.88	106	62867	4.6214	ug/L		90
73)	m-,p-Xylene	14.97	106	153807	9.7633	ug/L		91
74)	o-Xylene	15.53	106	76425	4.8253	ug/L		99
75)	Styrene	15.57	104	122002	4.9133	ug/L		98
76)	Bromoform	16.06	173	19962	4.5235	ug/L		95
77)	Isopropylbenzene	15.96	105	195151	5.1460	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	30245	4.9291	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	8507	4.8359	ug/L		83
82)	trans-1,4-Dichloro-2-Buten	16.40	53	5523	4.2935	ug/L		74
83)	n-Propylbenzene	16.47	91	234652	5.1554	ug/L		99
84)	Bromobenzene	16.60	156	52847	4.9554	ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	163016	4.9464	ug/L		99
86)	2-Chlorotoluene	16.73	91	166031	5.3432	ug/L		95
87)	4-Chlorotoluene	16.79	91	121429	4.3363	ug/L		100
88)	a-Methylstyrene	17.05	118	84298	4.5624	ug/L		95
89)	tert-Butylbenzene	17.12	134	34340	4.6022	ug/L		94
90)	1,2,4-Trimethylbenzene	17.17	105	167693	4.9841	ug/L		100
91)	sec-Butylbenzene	17.38	105	207005	5.0149	ug/L		100
92)	p-Isopropyltoluene	17.54	119	170789	4.9137	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	99857	4.8307	ug/L		97
94)	1,4-Dichlorobenzene	17.87	146	98681	4.6956	ug/L		94
95)	n-Butylbenzene	18.07	91	145988	4.6626	ug/L		98
96)	1,2-Dichlorobenzene	18.37	146	89702	4.9398	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	4713	4.7194	ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	55429	4.5338	ug/L		97
99)	Hexachlorobutadiene	20.65	225	26149	4.5963	ug/L		99
100)	Naphthalene	20.87	128	81337	4.6555	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	44939	4.4263	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.0943	18.1	100	-0.01
3	P	Chloromethane	5.0000	4.9293	1.4	100	0.01
4	C	Vinyl Chloride	5.0000	4.9264	1.5	100	0.01
5	T	1,3-Butadiene	5.0000	3.2475	35.0#	100	0.02
6	T	Bromomethane	5.0000	3.9117	21.8	100	0.01
7	T	Chloroethane	5.0000	4.8991	2.0	100	0.00
8	T	Trichlorofluoromethane	5.0000	4.8407	3.2	100	0.02
9	T	Diethyl ether	50.0000	49.9827	0.0	100	0.01
10	T	Isoprene	5.0000	4.6047	7.9	100	0.01
11	T	Acrolein	25.0000	25.6156	-2.5	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.7903	4.2	100	0.00
13	T	Acetone	5.0000	5.1228	-2.5	100	0.01
14	C	1,1-Dichloroethene	5.0000	4.8168	3.7	100	0.02
15	T	Tert-Butyl Alcohol	100.0000	108.1334	-8.1	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8162	3.7	100	0.00
17	T	Iodomethane	5.0000	1.2101	75.8#	100	0.01
18	T	Methyl acetate	5.0000	5.1176	-2.4	100	0.01
19	T	Methylene Chloride	5.0000	4.7920	4.2	100	0.00
20	T	Carbon Disulfide	5.0000	4.9528	0.9	100	0.00
21	T	Acrylonitrile	25.0000	25.2377	-1.0	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	4.8920	2.2	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.7457	5.1	100	0.01
24	T	n-Hexane	5.0000	5.1127	-2.3	100	0.01
25	T	Diisopropyl ether	50.0000	51.0432	-2.1	100	0.00
26	T	Vinyl Acetate	5.0000	4.9952	0.1	100	0.00
27	P	1,1-Dichloroethane	5.0000	4.8676	2.6	100	0.01
28	T	Ethyl-Tert-Butyl ether	50.0000	50.9683	-1.9	100	0.00
29	T	2-Butanone	5.0000	4.7964	4.1	100	0.01
30	T	Propionitrile	50.0000	52.5317	-5.1	100	0.00
31	T	2,2-Dichloropropane	5.0000	4.8700	2.6	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9182	1.6	100	0.00
33	C	Chloroform	5.0000	4.5709	8.6	100	0.01
34		1-Bromopropane	5.0000	4.7588	4.8	100	0.00
35	T	Bromochloromethane	5.0000	5.0905	-1.8	100	-0.01
36	T	Tetrahydrofuran	50.0000	50.5323	-1.1	100	0.00
37	S	Dibromofluoromethane	2.5000	2.3308	6.8	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8538	2.9	100	0.00
39	T	Cyclohexane	5.0000	4.9219	1.6	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.7657	4.7	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	51.4900	-3.0	100	-0.01
42	T	Carbon Tetrachloride	5.0000	4.8249	3.5	100	0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4156	3.4	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	5.0000	4.9106	1.8	100	0.00
46	T	Benzene	5.0000	4.9044	1.9	100	0.00
47	T	Trichloroethene	5.0000	4.7169	5.7	100	0.00
48	T	Methylcyclohexane	5.0000	4.7926	4.1	100	0.00
49	C	1,2-Dichloropropane	5.0000	4.8221	3.6	100	0.01
50	T	Bromodichloromethane	5.0000	4.8305	3.4	100	0.00
51	T	1,4-Dioxane	100.0000	94.0662	5.9	100	0.00
52	T	Dibromomethane	5.0000	4.9810	0.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	4.6410	7.2	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.2910	14.2	100	0.00

(#) = Out of Range
8M419006.D 8260WT.M Tue Apr 18 12:00:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	4.8458	3.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	5.9847	-19.7	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.4230	3.1	100	0.00
59	C	Toluene	5.0000	5.0867	-1.7	100	0.00
60	T	Ethyl Methacrylate	5.0000	4.8067	3.9	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	5.0000	4.8150	3.7	100	-0.01
63	T	1,1,2-Trichloroethane	5.0000	4.9790	0.4	100	0.00
64	T	2-Hexanone	5.0000	4.2745	14.5	100	0.00
65	T	1,3-Dichloropropane	5.0000	4.8179	3.6	100	0.00
66	T	Tetrachloroethene	5.0000	4.8678	2.6	100	0.00
67	T	Dibromochloromethane	5.0000	4.9157	1.7	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9547	0.9	100	0.00
69	T	1-Chlorohexane	5.0000	4.8617	2.8	100	0.00
70	P	Chlorobenzene	5.0000	4.7258	5.5	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.7660	4.7	100	0.01
72	C	Ethylbenzene	5.0000	4.6214	7.6	100	0.00
73	T	m-,p-Xylene	10.0000	9.7632	2.4	100	0.00
74	T	o-Xylene	5.0000	4.8253	3.5	100	0.01
75	T	Styrene	5.0000	4.9133	1.7	100	0.00
76	P	Bromoform	5.0000	4.5235	9.5	100	0.01
77	T	Isopropylbenzene	5.0000	5.1460	-2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	4.9291	1.4	100	-0.01
80	S	p-Bromofluorobenzene	2.5000	2.3761	5.0	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	4.8359	3.3	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.2935	14.1	100	0.00
83	T	n-Propylbenzene	5.0000	5.1554	-3.1	100	0.01
84	T	Bromobenzene	5.0000	4.9554	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9464	1.1	100	0.01
86	T	2-Chlorotoluene	5.0000	5.3432	-6.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.3363	13.3	100	0.00
88	T	a-Methylstyrene	5.0000	4.5624	8.8	100	0.00
89	T	tert-Butylbenzene	5.0000	4.6022	8.0	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9841	0.3	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0149	-0.3	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9136	1.7	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8308	3.4	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.6956	6.1	100	0.00
95	T	n-Butylbenzene	5.0000	4.6626	6.7	100	0.01
96	T	1,2-Dichlorobenzene	5.0000	4.9398	1.2	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	4.7194	5.6	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.5338	9.3	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.5963	8.1	100	0.00
100	T	Naphthalene	5.0000	4.6555	6.9	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.4263	11.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419006.D 8260WT.M Tue Apr 18 12:00:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	821977	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	642967	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	340149	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	85773	9.9487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 39.80%#			
43) 1,2-Dichloroethane-d4	10.53	65	74599	10.0087	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.04%#			
58) Toluene-d8	12.91	98	304223	10.3554	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 41.44%#			
80) p-Bromofluorobenzene	16.30	95	119256	9.9340	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 39.72%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	252364	22.6868	ug/L	99
3) Chloromethane	3.83	50	287414	20.6672	ug/L	98
4) Vinyl Chloride	4.06	62	282320	21.4964	ug/L	98
5) 1,3-Butadiene	4.11	54	161495	28.2603	ug/L	87
6) Bromomethane	4.97	94	81674	20.2735	ug/L	99
7) Chloroethane	5.13	64	120257	20.9628	ug/L	97
8) Trichlorofluoromethane	5.62	101	297058	20.8251	ug/L	100
9) Diethyl ether	6.15	59	415326	77.3083	ug/L	91
10) Isoprene	6.19	67	213582	18.9375	ug/L	91
11) Acrolein	6.38	56	27406	36.8350	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	166401	20.4573	ug/L	99
13) Acetone	6.48	43	21719	18.7871	ug/L	94
14) 1,1-Dichloroethene	6.72	61	247619	20.8008	ug/L	96
15) Tert-Butyl Alcohol	6.82	59	55617	148.4145	ug/L	99
16) Dimethyl Sulfide	6.98	62	148417	18.7178	ug/L	90
17) Iodomethane	7.24	142	44249	12.4422	ug/L	90
18) Methyl acetate	7.24	43	60034	18.9640	ug/L	90
19) Methylene Chloride	7.49	84	172623	20.1783	ug/L	82
20) Carbon Disulfide	7.55	76	479534	19.3736	ug/L	99
21) Acrylonitrile	7.67	53	64007	39.9143	ug/L	100
22) Methyl Tert Butyl Ether	7.70	73	348421	20.6705	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	236570	20.4261	ug/L	96
24) n-Hexane	8.02	57	182974	18.9267	ug/L	91
25) Diisopropyl ether	8.36	45	2083333	80.3637	ug/L	95
26) Vinyl Acetate	8.53	43	230138	19.7935	ug/L	95
27) 1,1-Dichloroethane	8.57	63	311422	20.8926	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	1753329	79.5282	ug/L	97
29) 2-Butanone	9.12	43	34263	18.8992	ug/L	91
30) Propionitrile	9.22	54	43804	77.9572	ug/L	100
31) 2,2-Dichloropropane	9.34	77	262688	20.8761	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	197079	20.5872	ug/L	94
33) Chloroform	9.61	83	315049	19.0755	ug/L	99
34) 1-Bromopropane	9.75	122	36957	19.5700	ug/L	98
35) Bromochloromethane	9.84	130	109675	21.2316	ug/L	94
36) Tetrahydrofuran	9.86	42	95917	76.8581	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	279934	21.0024	ug/L	99
39) Cyclohexane	10.17	56	235278	18.9596	ug/L	91
40) 1,1-Dichloropropene	10.34	75	238994	20.5364	ug/L	99
41) Tert-Amyl-Methyl ether	10.44	73	1574273	79.7438	ug/L	98
42) Carbon Tetrachloride	10.48	117	265448	21.4787	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

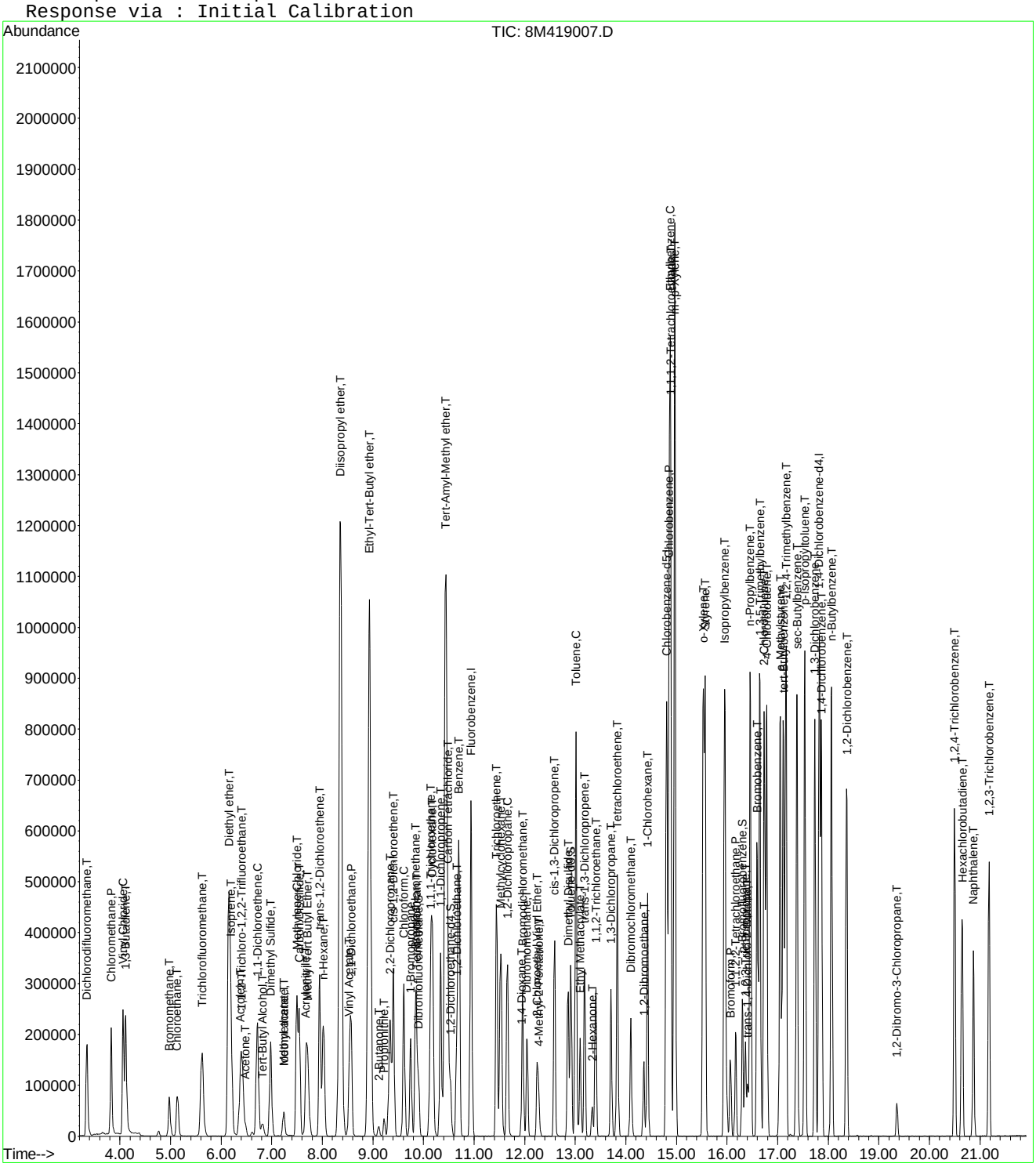
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	195832	20.9688	ug/L	96
46)	Benzene	10.70	78	711384	20.9494	ug/L	96
47)	Trichloroethene	11.44	130	193633	20.2988	ug/L	98
48)	Methylcyclohexane	11.53	83	242870	19.0998	ug/L	96
49)	1,2-Dichloropropane	11.66	63	168889	20.3636	ug/L	95
50)	Bromodichloromethane	11.96	83	229920	21.1836	ug/L	99
51)	1,4-Dioxane	11.94	88	6600	139.5754	ug/L	85
52)	Dibromomethane	12.04	93	90632	21.2345	ug/L	100
53)	2-Chloroethyl Vinyl Ether	12.25	63	69708	19.4252	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	29890	18.5953	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	263367	21.3068	ug/L	99
56)	Dimethyl Disulfide	12.86	79	111248	17.7360	ug/L	95
59)	Toluene	13.01	91	775026	21.6549	ug/L	99
60)	Ethyl Methacrylate	13.10	69	134570	19.9297	ug/L	85
62)	trans-1,3-Dichloropropene	13.19	75	216517	20.8604	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	122992	20.8877	ug/L	97
64)	2-Hexanone	13.33	58	27313	18.9010	ug/L	86
65)	1,3-Dichloropropane	13.71	76	210672	21.1642	ug/L	88
66)	Tetrachloroethene	13.83	164	159386	21.2013	ug/L	98
67)	Dibromochloromethane	14.10	129	162011	21.4115	ug/L	100
68)	1,2-Dibromoethane	14.36	107	124514	21.6484	ug/L	98
69)	1-Chlorohexane	14.43	91	226576	20.0098	ug/L	94
70)	Chlorobenzene	14.85	112	518298	20.3445	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.88	131	195026	21.5715	ug/L	99
72)	Ethylbenzene	14.87	106	295348	20.6992	ug/L	97
73)	m-,p-Xylene	14.97	106	708993	42.9068	ug/L	96
74)	o-Xylene	15.54	106	341856	20.5778	ug/L	100
75)	Styrene	15.57	104	572956	21.9986	ug/L	97
76)	Bromoform	16.07	173	98140	19.0943	ug/L	98
77)	Isopropylbenzene	15.95	105	862970	21.6948	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.17	83	138371	21.5592	ug/L	98
81)	1,2,3-Trichloropropane	16.36	110	38934	21.1594	ug/L	72
82)	trans-1,4-Dichloro-2-Buten	16.40	53	29562	19.3838	ug/L	86
83)	n-Propylbenzene	16.45	91	1035858	21.7579	ug/L	100
84)	Bromobenzene	16.60	156	233146	20.9007	ug/L	97
85)	1,3,5-Trimethylbenzene	16.65	105	744817	21.6064	ug/L	99
86)	2-Chlorotoluene	16.73	91	638655	19.6497	ug/L	93
87)	4-Chlorotoluene	16.79	91	644553	22.0056	ug/L	99
88)	a-Methylstyrene	17.05	118	368766	19.0812	ug/L	97
89)	tert-Butylbenzene	17.12	134	159935	20.4918	ug/L	94
90)	1,2,4-Trimethylbenzene	17.17	105	766585	21.7826	ug/L	98
91)	sec-Butylbenzene	17.39	105	933219	21.6142	ug/L	99
92)	p-Isopropyltoluene	17.54	119	792583	21.8005	ug/L	98
93)	1,3-Dichlorobenzene	17.74	146	452988	20.9507	ug/L	97
94)	1,4-Dichlorobenzene	17.87	146	445404	20.2622	ug/L	99
95)	n-Butylbenzene	18.07	91	716182	21.8682	ug/L	100
96)	1,2-Dichlorobenzene	18.37	146	397181	20.9107	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.36	75	20637	19.7567	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	259021	20.2551	ug/L	99
99)	Hexachlorobutadiene	20.65	225	122095	20.5178	ug/L	100
100)	Naphthalene	20.87	128	379929	20.7902	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	218288	20.5554	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:05 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419007.D 8260WT.M Tue Apr 18 11:59:06 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	830845	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	667165	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	355416	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	225758	25.9058	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.64%			
43) 1,2-Dichloroethane-d4	10.53	65	196828	26.1260	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.52%			
58) Toluene-d8	12.91	98	790662	25.9370	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.76%			
80) p-Bromofluorobenzene	16.30	95	316705	25.2481	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	614921	54.6895	ug/L	100
3) Chloromethane	3.82	50	669133	47.6020	ug/L	99
4) Vinyl Chloride	4.06	62	646175	48.6760	ug/L	98
5) 1,3-Butadiene	4.10	54	271666	52.3987	ug/L	95
6) Bromomethane	4.97	94	247075	50.8432	ug/L	99
7) Chloroethane	5.14	64	294319	50.7572	ug/L	96
8) Trichlorofluoromethane	5.62	101	725121	50.2916	ug/L	99
9) Diethyl ether	6.15	59	532757	98.1084	ug/L	92
10) Isoprene	6.18	67	574160	50.3651	ug/L	91
11) Acrolein	6.39	56	36832	48.9756	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	415693	50.5596	ug/L	99
13) Acetone	6.48	43	59341	50.7827	ug/L	93
14) 1,1-Dichloroethene	6.71	61	615843	51.1806	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	75781	200.0639	ug/L	99
16) Dimethyl Sulfide	6.98	62	398383	49.7064	ug/L	89
17) Iodomethane	7.23	142	201159	55.9595	ug/L	95
18) Methyl acetate	7.23	43	161579	50.4959	ug/L	92
19) Methylene Chloride	7.49	84	428023	49.4986	ug/L	84
20) Carbon Disulfide	7.54	76	1268101	50.6857	ug/L	100
21) Acrylonitrile	7.68	53	87950	54.2596	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	877515	51.5041	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	586042	50.0603	ug/L	95
24) n-Hexane	8.02	57	481804	49.3054	ug/L	92
25) Diisopropyl ether	8.35	45	2603190	99.3452	ug/L	96
26) Vinyl Acetate	8.53	43	596735	50.7757	ug/L	95
27) 1,1-Dichloroethane	8.57	63	767008	50.9075	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2222589	99.7371	ug/L	98
29) 2-Butanone	9.12	43	93741	51.1549	ug/L	90
30) Propionitrile	9.22	54	56850	100.0950	ug/L	99
31) 2,2-Dichloropropane	9.33	77	643624	50.6036	ug/L	100
32) cis-1,2-Dichloroethene	9.40	96	492349	50.8826	ug/L	96
33) Chloroform	9.61	83	775769	46.4696	ug/L	98
34) 1-Bromopropane	9.75	122	94615	49.5670	ug/L	98
35) Bromochloromethane	9.84	130	277955	53.2340	ug/L	94
36) Tetrahydrofuran	9.86	42	125929	99.8297	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	697375	51.7630	ug/L	99
39) Cyclohexane	10.17	56	629161	50.1591	ug/L	91
40) 1,1-Dichloropropene	10.34	75	585776	49.7976	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	2000715	100.2633	ug/L	97
42) Carbon Tetrachloride	10.48	117	654658	52.4061	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:07 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

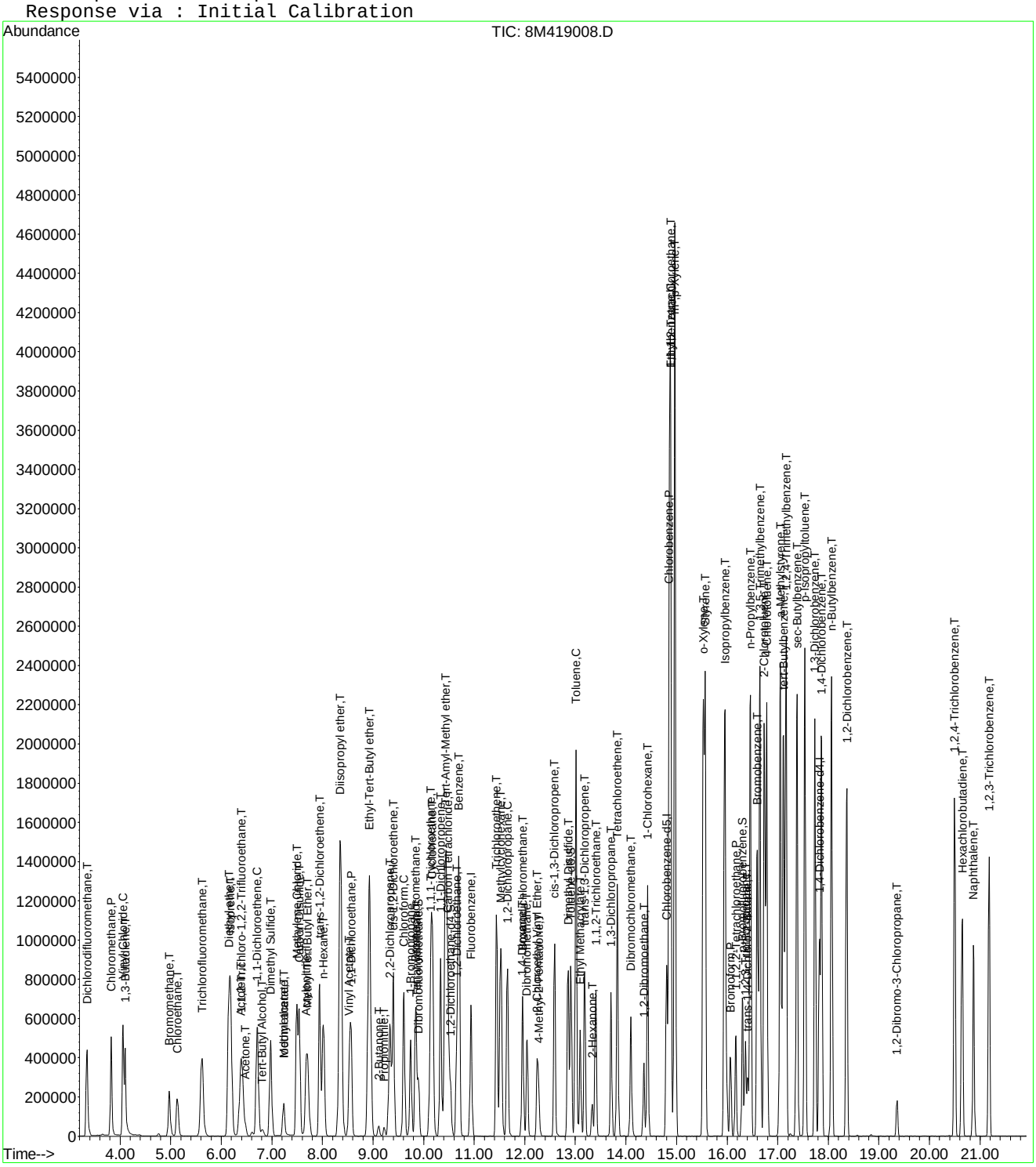
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	486966	51.5856	ug/L	96
46)	Benzene	10.70	78	1734691	50.5393	ug/L	95
47)	Trichloroethene	11.44	130	482430	50.0340	ug/L	98
48)	Methylcyclohexane	11.52	83	641638	49.9211	ug/L	95
49)	1,2-Dichloropropane	11.66	63	424777	50.6703	ug/L	95
50)	Bromodichloromethane	11.96	83	576854	52.5810	ug/L	98
51)	1,4-Dioxane	11.95	88	10143	212.2125	ug/L	95
52)	Dibromomethane	12.04	93	226605	52.5254	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.25	63	188674	52.0156	ug/L	98
54)	4-Methyl-2-Pentanone	12.28	58	83519	51.4047	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	670536	53.6685	ug/L	99
56)	Dimethyl Disulfide	12.86	79	333317	46.4713	ug/L	95
59)	Toluene	13.01	91	1910471	51.4442	ug/L	99
60)	Ethyl Methacrylate	13.09	69	383134	54.6839	ug/L	86
62)	trans-1,3-Dichloropropene	13.19	75	563669	52.3371	ug/L	99
63)	1,1,2-Trichloroethane	13.40	97	305450	49.9930	ug/L	98
64)	2-Hexanone	13.33	58	78016	52.0300	ug/L	88
65)	1,3-Dichloropropane	13.70	76	530141	51.3266	ug/L	88
66)	Tetrachloroethene	13.83	164	393935	50.5000	ug/L	97
67)	Dibromochloromethane	14.10	129	424633	54.0844	ug/L	100
68)	1,2-Dibromoethane	14.36	107	314486	52.6944	ug/L	100
69)	1-Chlorohexane	14.43	91	601634	51.2055	ug/L	95
70)	Chlorobenzene	14.85	112	1317659	49.8455	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	513627	54.7508	ug/L	100
72)	Ethylbenzene	14.88	106	758538	51.2333	ug/L	99
73)	m-,p-Xylene	14.97	106	1805748	105.3165	ug/L	100
74)	o-Xylene	15.53	106	865202	50.1913	ug/L	99
75)	Styrene	15.56	104	1482377	54.8515	ug/L	96
76)	Bromoform	16.07	173	261596	48.1536	ug/L	100
77)	Isopropylbenzene	15.96	105	2152073	52.1403	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	351132	52.3588	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	102223	53.1686	ug/L	89
82)	trans-1,4-Dichloro-2-Buten	16.40	53	86624	53.2257	ug/L	89
83)	n-Propylbenzene	16.46	91	2542578	51.1120	ug/L	98
84)	Bromobenzene	16.60	156	600757	51.5423	ug/L	96
85)	1,3,5-Trimethylbenzene	16.65	105	1864667	51.7685	ug/L	97
86)	2-Chlorotoluene	16.73	91	1562483	46.0085	ug/L	82
87)	4-Chlorotoluene	16.78	91	1653591	54.0299	ug/L	92
88)	a-Methylstyrene	17.05	118	1034318	51.2201	ug/L	100
89)	tert-Butylbenzene	17.12	134	406063	49.7923	ug/L	95
90)	1,2,4-Trimethylbenzene	17.17	105	1948760	52.9955	ug/L	97
91)	sec-Butylbenzene	17.38	105	2311933	51.2464	ug/L	98
92)	p-Isopropyltoluene	17.54	119	1987599	52.3217	ug/L	99
93)	1,3-Dichlorobenzene	17.74	146	1155357	51.1399	ug/L	98
94)	1,4-Dichlorobenzene	17.87	146	1131775	49.2748	ug/L	99
95)	n-Butylbenzene	18.07	91	1806946	52.8040	ug/L	99
96)	1,2-Dichlorobenzene	18.37	146	1022039	51.4969	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	56496	51.7628	ug/L	90
98)	1,2,4-Trichlorobenzene	20.49	180	698538	52.2784	ug/L	99
99)	Hexachlorobutadiene	20.65	225	312987	50.3375	ug/L	98
100)	Naphthalene	20.87	128	1020583	53.4486	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583406	52.5775	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419008.D 8260WT.M Tue Apr 18 11:59:09 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	890949	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	720891	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	383088	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	472717	52.5898	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 210.36%#			
43) 1,2-Dichloroethane-d4	10.53	65	409191	52.1214	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 208.48%#			
58) Toluene-d8	12.91	98	1637669	49.8807	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 199.52%#			
80) p-Bromofluorobenzene	16.30	95	659264	49.4208	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 197.68%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	1290950	114.7073	ug/L	99
3) Chloromethane	3.82	50	1428240	91.5868	ug/L	99
4) Vinyl Chloride	4.06	62	1309074	87.7619	ug/L	99
5) 1,3-Butadiene	4.10	54	464115	48.1221	ug/L	96
6) Bromomethane	4.97	94	643662	218.3047	ug/L	99
7) Chloroethane	5.13	64	642480	105.8029	ug/L	98
8) Trichlorofluoromethane	5.62	101	1556663	102.1329	ug/L	100
9) Diethyl ether	6.15	59	1193850	209.2873	ug/L	91
10) Isoprene	6.18	67	1256334	110.0441	ug/L	89
11) Acrolein	6.39	56	84264	106.8054	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	896546	103.8513	ug/L	98
13) Acetone	6.48	43	131839	107.1463	ug/L	95
14) 1,1-Dichloroethene	6.71	61	1340489	106.4797	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	161800	419.1836	ug/L	100
16) Dimethyl Sulfide	6.98	62	875323	107.2557	ug/L	91
17) Iodomethane	7.24	142	550506	330.5339	ug/L	94
18) Methyl acetate	7.24	43	350126	103.5017	ug/L	91
19) Methylene Chloride	7.49	84	940849	102.7095	ug/L	84
20) Carbon Disulfide	7.55	76	2734573	101.8614	ug/L	99
21) Acrylonitrile	7.68	53	192477	116.4657	ug/L	98
22) Methyl Tert Butyl Ether	7.70	73	1934910	108.5495	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	1292550	104.8396	ug/L	95
24) n-Hexane	8.02	57	1050655	101.8502	ug/L	92
25) Diisopropyl ether	8.36	45	5712696	202.4948	ug/L	97
26) Vinyl Acetate	8.53	43	1305418	104.1714	ug/L	95
27) 1,1-Dichloroethane	8.57	63	1685691	106.7005	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	4942845	209.1646	ug/L	98
29) 2-Butanone	9.12	43	205108	109.6264	ug/L	92
30) Propionitrile	9.22	54	127357	217.6184	ug/L	100
31) 2,2-Dichloropropane	9.33	77	1411824	105.4011	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	1085665	107.4406	ug/L	95
33) Chloroform	9.61	83	1687138	91.3508	ug/L	97
34) 1-Bromopropane	9.75	122	211298	107.4131	ug/L	100
35) Bromochloromethane	9.84	130	607058	113.4193	ug/L	94
36) Tetrahydrofuran	9.86	42	282824	212.9932	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	1536060	110.9408	ug/L	100
39) Cyclohexane	10.17	56	1386309	106.7139	ug/L	90
40) 1,1-Dichloropropene	10.34	75	1279941	102.9919	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	4484638	212.9890	ug/L	97
42) Carbon Tetrachloride	10.48	117	1460831	114.3286	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:10 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

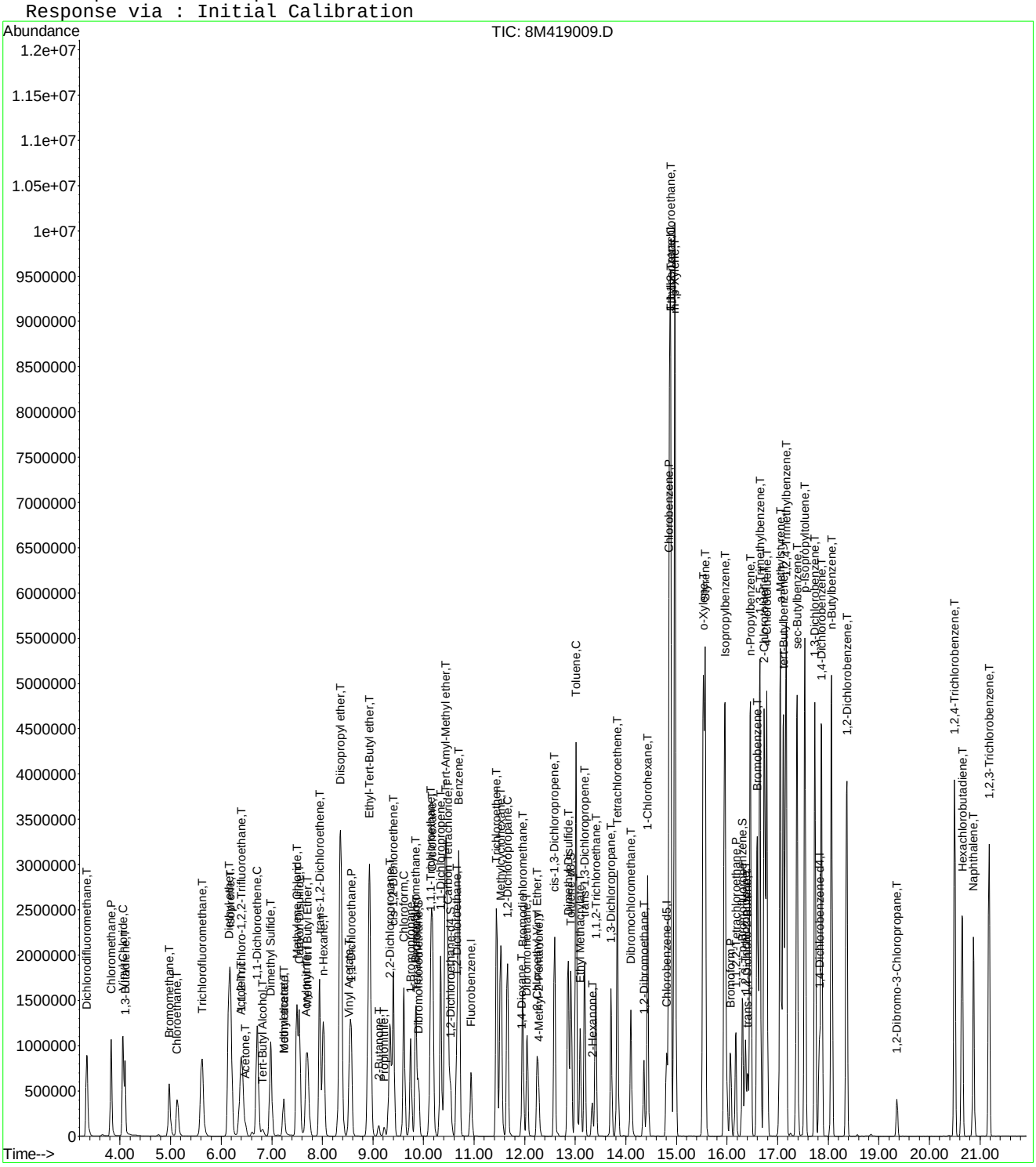
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	1085356	110.6535 ug/L		97
46)	Benzene	10.70	78	3722629	100.4557 ug/L		93
47)	Trichloroethene	11.44	130	1074923	106.6468 ug/L		98
48)	Methylcyclohexane	11.52	83	1398054	106.0194 ug/L		95
49)	1,2-Dichloropropane	11.66	63	942189	107.5812 ug/L		95
50)	Bromodichloromethane	11.96	83	1280673	114.1972 ug/L		98
51)	1,4-Dioxane	11.94	88	22104	475.7434 ug/L		90
52)	Dibromomethane	12.04	93	499793	112.7164 ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	415136	117.1702 ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	182865	117.4045 ug/L		98
55)	cis-1,3-Dichloropropene	12.59	75	1487011	117.8164 ug/L		100
56)	Dimethyl Disulfide	12.86	79	764852	141.9810 ug/L		96
59)	Toluene	13.01	91	4070819	100.0521 ug/L		97
60)	Ethyl Methacrylate	13.10	69	835156	122.6996 ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	1269353	114.4143 ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	683956	104.4552 ug/L		97
64)	2-Hexanone	13.33	58	172797	118.5052 ug/L		88
65)	1,3-Dichloropropane	13.70	76	1162920	105.4392 ug/L		87
66)	Tetrachloroethene	13.83	164	900370	111.2776 ug/L		98
67)	Dibromochloromethane	14.10	129	959992	121.1054 ug/L		100
68)	1,2-Dibromoethane	14.36	107	694704	111.6258 ug/L		100
69)	1-Chlorohexane	14.43	91	1319148	108.1005 ug/L		93
70)	Chlorobenzene	14.85	112	3004153	106.5496 ug/L		99
71)	1,1,1,2-Tetrachloroethane	14.88	131	1219121	127.8831 ug/L		99
72)	Ethylbenzene	14.88	106	1786508	119.7983 ug/L		90
73)	m-,p-Xylene	14.97	106	4003661	220.6823 ug/L		86
74)	o-Xylene	15.53	106	1960306	109.1849 ug/L		94
75)	Styrene	15.57	104	3292073	119.3828 ug/L		99
76)	Bromoform	16.07	173	597737	133.4926 ug/L		99
77)	Isopropylbenzene	15.96	105	4545601	100.7509 ug/L		94
79)	1,1,2,2-Tetrachloroethane	16.17	83	769153	108.8387 ug/L		96
81)	1,2,3-Trichloropropane	16.36	110	224094	112.8735 ug/L	#	29
82)	trans-1,4-Dichloro-2-Buten	16.40	53	175819	145.3184 ug/L	#	32
83)	n-Propylbenzene	16.46	91	5183759	92.3935 ug/L		93
84)	Bromobenzene	16.60	156	1335569	109.7181 ug/L		95
85)	1,3,5-Trimethylbenzene	16.65	105	3967760	101.5410 ug/L		94
86)	2-Chlorotoluene	16.73	91	3371801	88.0052 ug/L		79
87)	4-Chlorotoluene	16.78	91	3536460	106.8023 ug/L		95
88)	a-Methylstyrene	17.05	118	2324630	114.4381 ug/L		99
89)	tert-Butylbenzene	17.12	134	920850	109.7387 ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	4138155	104.6152 ug/L		93
91)	sec-Butylbenzene	17.38	105	4819621	95.4354 ug/L		95
92)	p-Isopropyltoluene	17.54	119	4194755	101.5359 ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	2515568	104.3629 ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	2479841	99.2322 ug/L		99
95)	n-Butylbenzene	18.07	91	3805421	103.0498 ug/L		95
96)	1,2-Dichlorobenzene	18.37	146	2228398	105.4250 ug/L		100
97)	1,2-Dibromo-3-Chloropropan	19.36	75	126624	112.0824 ug/L		88
98)	1,2,4-Trichlorobenzene	20.50	180	1566801	114.3776 ug/L		99
99)	Hexachlorobutadiene	20.65	225	698852	108.1043 ug/L		98
100)	Naphthalene	20.87	128	2244301	112.5737 ug/L		99
101)	1,2,3-Trichlorobenzene	21.18	180	1297908	112.6794 ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	916133	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.81	117	758457	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	404542	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	985298	106.6012	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 426.40%#			
43) 1,2-Dichloroethane-d4	10.54	65	821015	101.7034	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 406.80%#			
58) Toluene-d8	12.91	98	3407259	98.6394	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 394.56%#			
80) p-Bromofluorobenzene	16.30	95	1421252	100.8919	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 403.56%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2732295	236.1042	ug/L	97
3) Chloromethane	3.82	50	2983027	186.0300	ug/L	100
4) Vinyl Chloride	4.05	62	2540371	165.6278	ug/L	99
5) 1,3-Butadiene	4.10	54	866990	87.4234	ug/L	96
6) Bromomethane	4.97	94	1545771	509.8527	ug/L	99
7) Chloroethane	5.13	64	1366615	218.8661	ug/L	97
8) Trichlorofluoromethane	5.62	101	3365549	214.7442	ug/L	99
10) Isoprene	6.19	67	2589463	220.5797	ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1913316	215.5364	ug/L	97
13) Acetone	6.49	43	249206	196.9637	ug/L	95
14) 1,1-Dichloroethene	6.71	61	2810695	217.1259	ug/L	98
16) Dimethyl Sulfide	6.98	62	1824420	217.4058	ug/L	89
17) Iodomethane	7.23	142	1201977	701.8503	ug/L	96
18) Methyl acetate	7.23	43	677953	194.9022	ug/L	93
19) Methylene Chloride	7.49	84	1990660	211.3402	ug/L	86
20) Carbon Disulfide	7.54	76	5610478	203.2424	ug/L	97
21) Acrylonitrile	7.70	53	33650	19.8015	ug/L #	32
22) Methyl Tert Butyl Ether	7.70	73	3788672	206.7038	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	2733215	215.5987	ug/L	96
24) n-Hexane	8.02	57	2197012	207.1230	ug/L	92
26) Vinyl Acetate	8.53	43	2553826	198.1912	ug/L	96
27) 1,1-Dichloroethane	8.57	63	3486757	214.6369	ug/L	98
29) 2-Butanone	9.12	43	389130	202.2654	ug/L	91
31) 2,2-Dichloropropane	9.34	77	2923670	212.2692	ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	2276453	219.0916	ug/L	96
33) Chloroform	9.61	83	3453780	181.8658	ug/L	95
34) 1-Bromopropane	9.75	122	446868	220.9203	ug/L	100
35) Bromochloromethane	9.85	130	1233768	224.1736	ug/L	95
36) Tetrahydrofuran	9.88	42	870	0.6372	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	3296755	231.5603	ug/L	98
39) Cyclohexane	10.17	56	2952221	221.0060	ug/L	91
40) 1,1-Dichloropropene	10.33	75	2719959	212.8482	ug/L	96
42) Carbon Tetrachloride	10.49	117	3008633	228.9911	ug/L	99
45) 1,2-Dichloroethane	10.66	62	2188642	217.0011	ug/L	96
46) Benzene	10.70	78	7143494	187.4691	ug/L	88
47) Trichloroethene	11.44	130	2308292	222.7182	ug/L	98
48) Methylcyclohexane	11.53	83	2934528	216.4182	ug/L	94
49) 1,2-Dichloropropane	11.66	63	1973272	219.1188	ug/L	96
50) Bromodichloromethane	11.96	83	2645509	229.4144	ug/L	96
51) 1,4-Dioxane	11.95	88	4065	85.0857	ug/L #	36

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

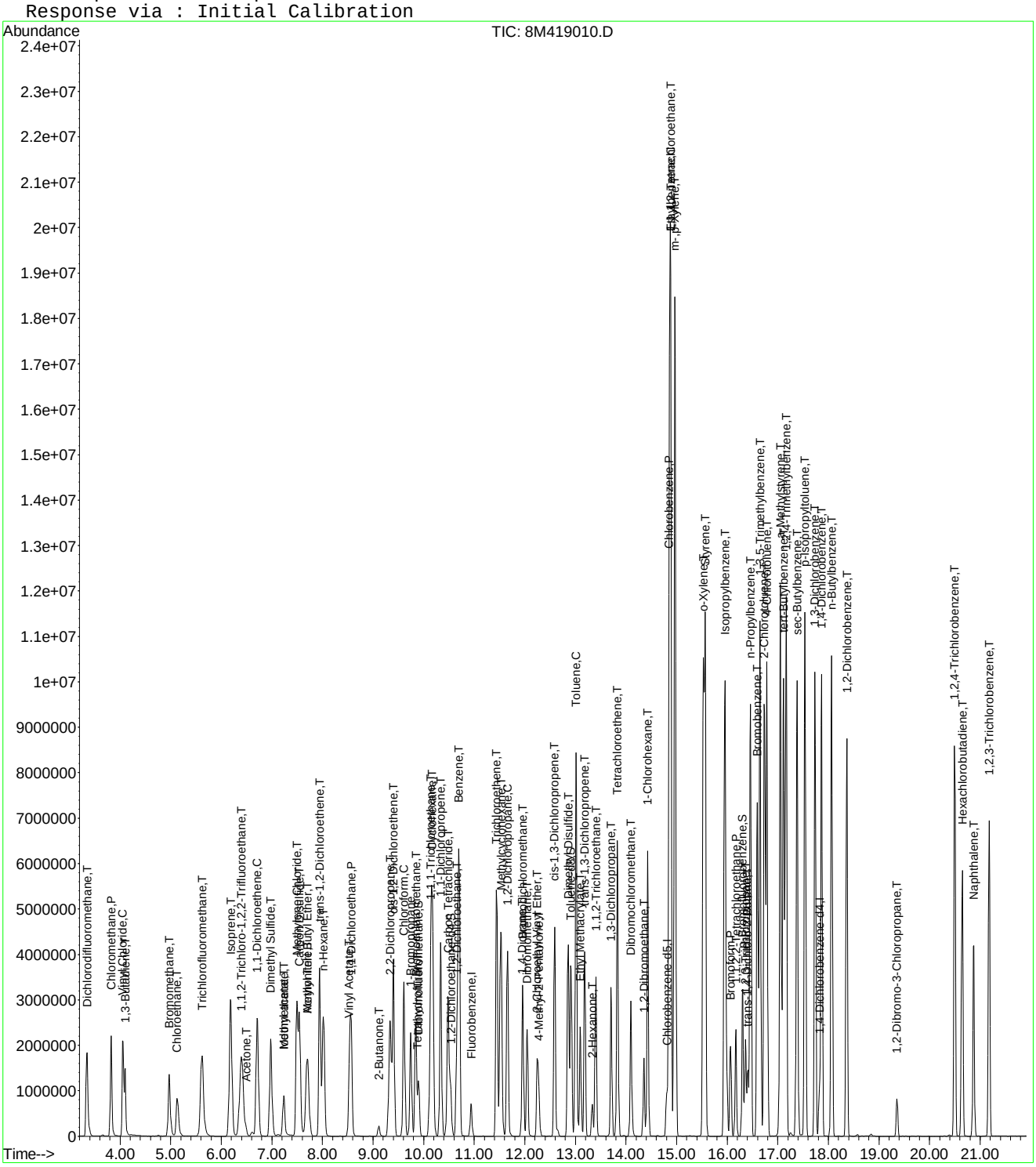
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
52)	Dibromomethane	12.05	93	1024578	224.7172	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	831891	228.3430	ug/L		98
54)	4-Methyl-2-Pentanone	12.28	58	360147	224.8683	ug/L		100
55)	cis-1,3-Dichloropropene	12.59	75	3048770	234.9149	ug/L		98
56)	Dimethyl Disulfide	12.86	79	1659189	299.5317	ug/L		99
59)	Toluene	13.01	91	7488758	174.9415	ug/L		89
60)	Ethyl Methacrylate	13.09	69	1679080	234.4692	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	2568979	220.0883	ug/L		97
63)	1,1,2-Trichloroethane	13.40	97	1396211	202.6709	ug/L		97
64)	2-Hexanone	13.33	58	330423	215.3823	ug/L		88
65)	1,3-Dichloropropane	13.70	76	2325588	200.4119	ug/L		86
66)	Tetrachloroethene	13.83	164	1990187	233.7864	ug/L		97
67)	Dibromochloromethane	14.10	129	1990057	238.6162	ug/L		99
68)	1,2-Dibromoethane	14.36	107	1415902	216.2402	ug/L		99
69)	1-Chlorohexane	14.43	91	2828351	220.2957	ug/L		92
70)	Chlorobenzene	14.85	112	6105996	205.8377	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.88	131	2810140	280.1772	ug/L		99
72)	Ethylbenzene	14.88	106	4032119	256.9908	ug/L		59
73)	m-,p-Xylene	14.96	106	7563563	396.2554	ug/L		66
74)	o-Xylene	15.53	106	4264660	225.7677	ug/L		79
75)	Styrene	15.56	104	6476388	223.2255	ug/L		92
76)	Bromoform	16.07	173	1258352	267.1087	ug/L		99
77)	Isopropylbenzene	15.96	105	8256603	173.9393	ug/L		81
79)	1,1,2,2-Tetrachloroethane	16.17	83	1527344	204.6644	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	447781	213.5809	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.40	53	367713	287.8052	ug/L	#	26
83)	n-Propylbenzene	16.46	91	8822276	148.9059	ug/L	#	76
84)	Bromobenzene	16.60	156	2898738	225.5047	ug/L		92
85)	1,3,5-Trimethylbenzene	16.65	105	7463417	180.8708	ug/L		82
86)	2-Chlorotoluene	16.73	91	7153343	176.8033	ug/L		79
87)	4-Chlorotoluene	16.78	91	5772378	165.0827	ug/L		82
88)	a-Methylstyrene	17.05	118	4847570	225.9830	ug/L		96
89)	tert-Butylbenzene	17.11	134	2112689	238.4192	ug/L		79
90)	1,2,4-Trimethylbenzene	17.17	105	7584285	181.5672	ug/L		77
91)	sec-Butylbenzene	17.38	105	8521003	159.7799	ug/L	#	81
92)	p-Isopropyltoluene	17.54	119	7724336	177.0554	ug/L		84
93)	1,3-Dichlorobenzene	17.73	146	5116611	201.0146	ug/L		93
94)	1,4-Dichlorobenzene	17.87	146	5000020	189.4678	ug/L		93
95)	n-Butylbenzene	18.07	91	7068933	181.2731	ug/L		85
96)	1,2-Dichlorobenzene	18.37	146	4516876	202.3597	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.36	75	250305	209.8099	ug/L		86
98)	1,2,4-Trichlorobenzene	20.49	180	3378961	233.5852	ug/L		99
99)	Hexachlorobutadiene	20.65	225	1595889	233.7735	ug/L		98
100)	Naphthalene	20.88	128	4334998	205.9111	ug/L		96
101)	1,2,3-Trichlorobenzene	21.18	180	2739944	225.2564	ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	930696	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	749881	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	397655	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	1524398	162.3468	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 649.40%#			
43) 1,2-Dichloroethane-d4	10.53	65	1314412	160.2752	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 641.12%#			
58) Toluene-d8	12.91	98	5112365	149.6945	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 598.76%#			
80) p-Bromofluorobenzene	16.30	95	2230349	161.0701	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 644.28%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	5624	0.4784	ug/L	87
3) Chloromethane	3.81	50	108738	6.6751	ug/L	99
4) Vinyl Chloride	4.05	62	3886	0.2494	ug/L	93
5) 1,3-Butadiene	4.09	54	1246692	123.7438	ug/L	96
6) Bromomethane	4.96	94	300170	97.4580	ug/L	98
8) Trichlorofluoromethane	5.60	101	2530	0.1589	ug/L #	94
9) Diethyl ether	6.14	59	1962473	329.3380	ug/L	92
10) Isoprene	6.18	67	4088373	342.8128	ug/L	88
11) Acrolein	6.39	56	131510	159.5714	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	3091	0.3428	ug/L	94
13) Acetone	6.48	43	393174	305.8885	ug/L	96
14) 1,1-Dichloroethene	6.70	61	3035	0.2308	ug/L	80
15) Tert-Butyl Alcohol	6.83	59	293536	728.0013	ug/L	97
16) Dimethyl Sulfide	6.98	62	2844355	333.6421	ug/L	89
17) Iodomethane	7.23	142	1295425	744.5798	ug/L	95
18) Methyl acetate	7.24	43	1115371	315.6365	ug/L	92
19) Methylene Chloride	7.49	84	3692	0.3858	ug/L	89
20) Carbon Disulfide	7.55	76	7967065	284.0949	ug/L	95
21) Acrylonitrile	7.67	53	273516	158.4334	ug/L	95
22) Methyl Tert Butyl Ether	7.71	73	3414	0.1833	ug/L #	1
23) trans-1,2-Dichloroethene	7.94	61	6140	0.4768	ug/L	75
24) n-Hexane	8.01	57	3358910	311.7059	ug/L	91
25) Diisopropyl ether	8.35	45	8576863	291.0356	ug/L	97
26) Vinyl Acetate	8.53	43	3848978	294.0283	ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	7584668	307.2506	ug/L	97
29) 2-Butanone	9.11	43	656445	335.8737	ug/L	92
30) Propionitrile	9.22	54	211846	346.5277	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	2415	0.2288	ug/L	92
33) Chloroform	9.60	83	4216	0.2185	ug/L	95
34) 1-Bromopropane	9.75	122	686822	334.2345	ug/L	99
35) Bromochloromethane	9.85	130	960	0.1717	ug/L #	25
36) Tetrahydrofuran	9.86	42	436518	314.6999	ug/L	87
39) Cyclohexane	10.17	56	4365494	321.6913	ug/L	90
40) 1,1-Dichloropropene	10.34	75	4278	0.3295	ug/L	77
41) Tert-Amyl-Methyl ether	10.44	73	6796184	308.9868	ug/L	95
42) Carbon Tetrachloride	10.47	117	1728	0.1295	ug/L #	76
45) 1,2-Dichloroethane	10.66	62	2027	0.1978	ug/L #	62
46) Benzene	10.70	78	6536	0.1688	ug/L	90
47) Trichloroethene	11.44	130	3270	0.3106	ug/L	87
48) Methylcyclohexane	11.52	83	4485299	325.6100	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

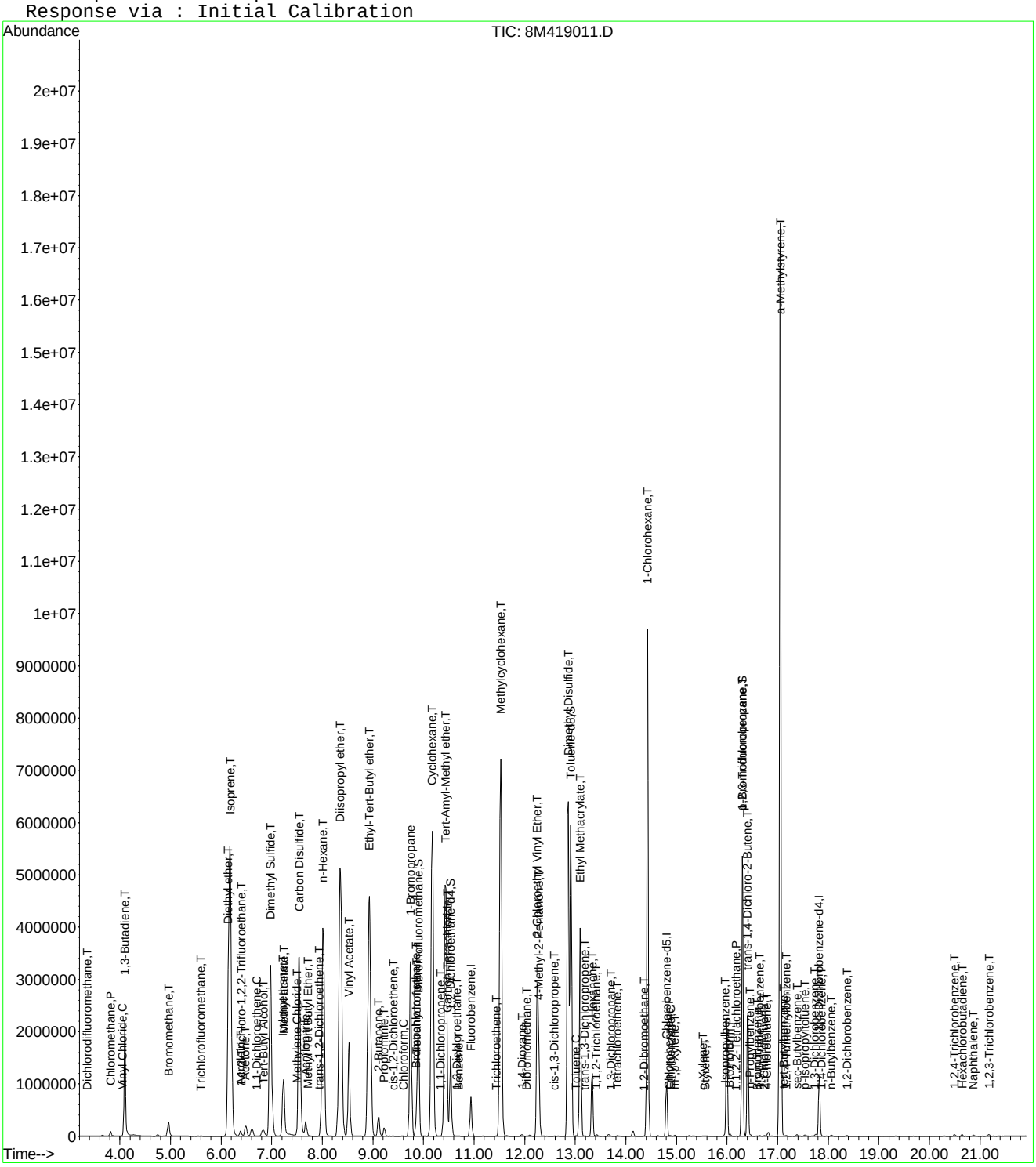
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

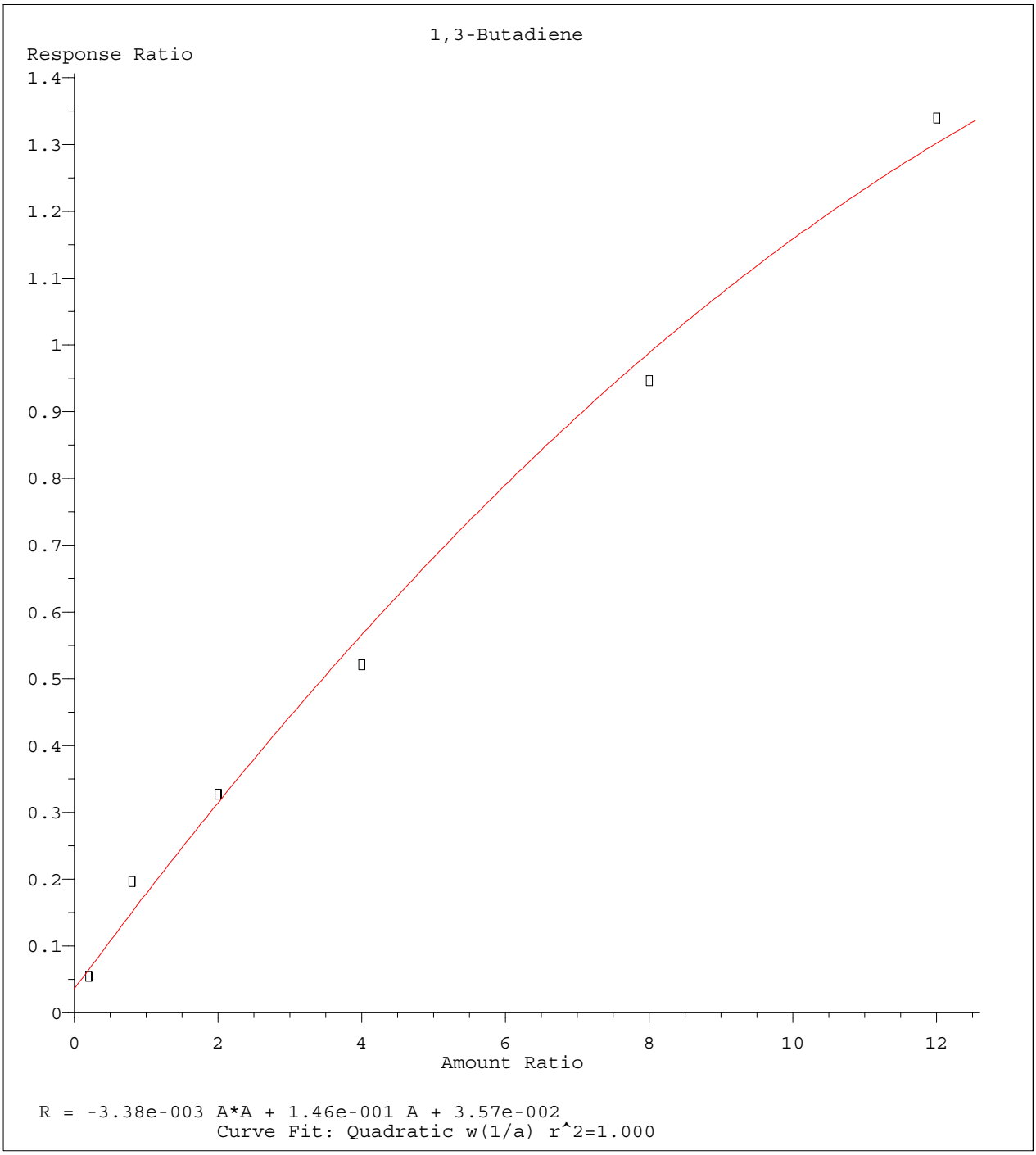
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
51)	1,4-Dioxane	11.95	88	33659	693.5026	ug/L		89
52)	Dibromomethane	12.04	93	1293	0.2792	ug/L		96
53)	2-Chloroethyl Vinyl Ether	12.25	63	1364979	368.8059	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	616547	378.9355	ug/L		99
55)	cis-1,3-Dichloropropene	12.59	75	2930	0.2222	ug/L		90
56)	Dimethyl Disulfide	12.86	79	2642662	469.6121	ug/L		97
59)	Toluene	13.01	91	8813	0.2082	ug/L		96
60)	Ethyl Methacrylate	13.10	69	2723549	384.6698	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	4235	0.3670	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	876	0.1286	ug/L		98
64)	2-Hexanone	13.33	58	568157	374.5818	ug/L		90
65)	1,3-Dichloropropane	13.71	76	2049	0.1786	ug/L	#	1
66)	Tetrachloroethene	13.83	164	2941	0.3494	ug/L		93
68)	1,2-Dibromoethane	14.36	107	1642	0.2536	ug/L		90
69)	1-Chlorohexane	14.43	91	4247410	334.6073	ug/L		90
70)	Chlorobenzene	14.85	112	7000	0.2387	ug/L		82
72)	Ethylbenzene	14.88	106	3495	0.2253	ug/L		86
73)	m-,p-Xylene	14.97	106	8767	0.4646	ug/L		94
74)	o-Xylene	15.52	106	3350	0.1794	ug/L		99
75)	Styrene	15.57	104	6628	0.2311	ug/L		93
76)	Bromoform	16.05	173	997	0.2141	ug/L	#	27
77)	Isopropylbenzene	15.96	105	32558	0.6937	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.18	83	1079	0.1471	ug/L	#	70
81)	1,2,3-Trichloropropane	16.30	110	745	0.3615	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.40	53	554896	441.8333	ug/L	#	1
83)	n-Propylbenzene	16.45	91	27737	0.4763	ug/L		84
84)	Bromobenzene	16.60	156	3516	0.2783	ug/L		92
85)	1,3,5-Trimethylbenzene	16.64	105	13389	0.3301	ug/L		97
86)	2-Chlorotoluene	16.73	91	9839	0.2474	ug/L		98
87)	4-Chlorotoluene	16.79	91	11812	0.3437	ug/L		97
88)	a-Methylstyrene	17.05	118	6686703	317.1180	ug/L		90
89)	tert-Butylbenzene	17.12	134	5062	0.5811	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.17	105	13828	0.3368	ug/L		90
91)	sec-Butylbenzene	17.38	105	38994	0.7439	ug/L		98
92)	p-Isopropyltoluene	17.54	119	20259	0.4724	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	10177	0.4067	ug/L		99
94)	1,4-Dichlorobenzene	17.87	146	11796	0.4547	ug/L		86
95)	n-Butylbenzene	18.06	91	22615	0.5900	ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	7307	0.3330	ug/L		97
98)	1,2,4-Trichlorobenzene	20.50	180	15569	1.0949	ug/L		99
99)	Hexachlorobutadiene	20.65	225	10959	1.6331	ug/L		96
100)	Naphthalene	20.87	128	27819	1.3443	ug/L		97
101)	1,2,3-Trichlorobenzene	21.18	180	15009	1.2553	ug/L		94

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:17 2017 Page 2

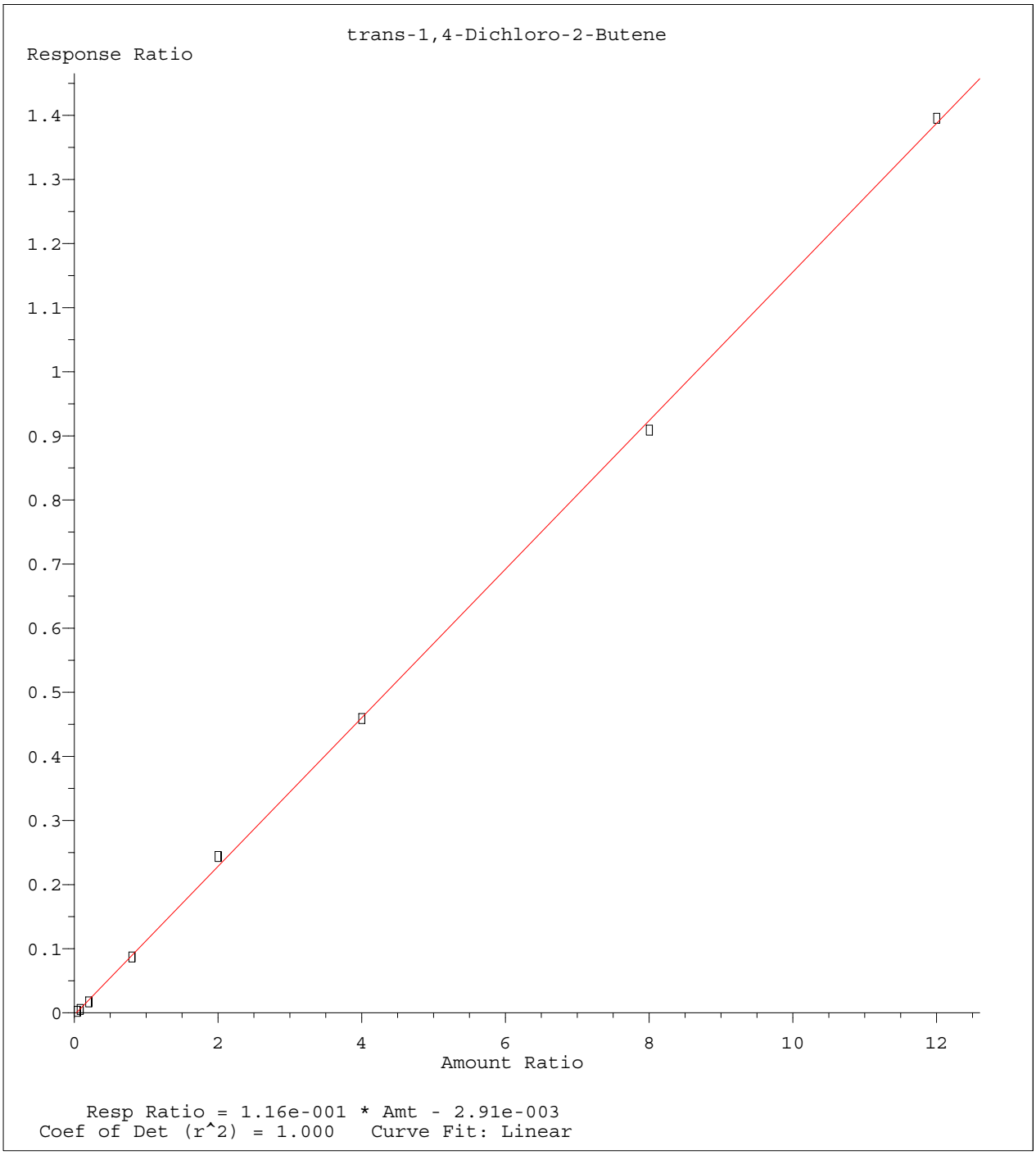
Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

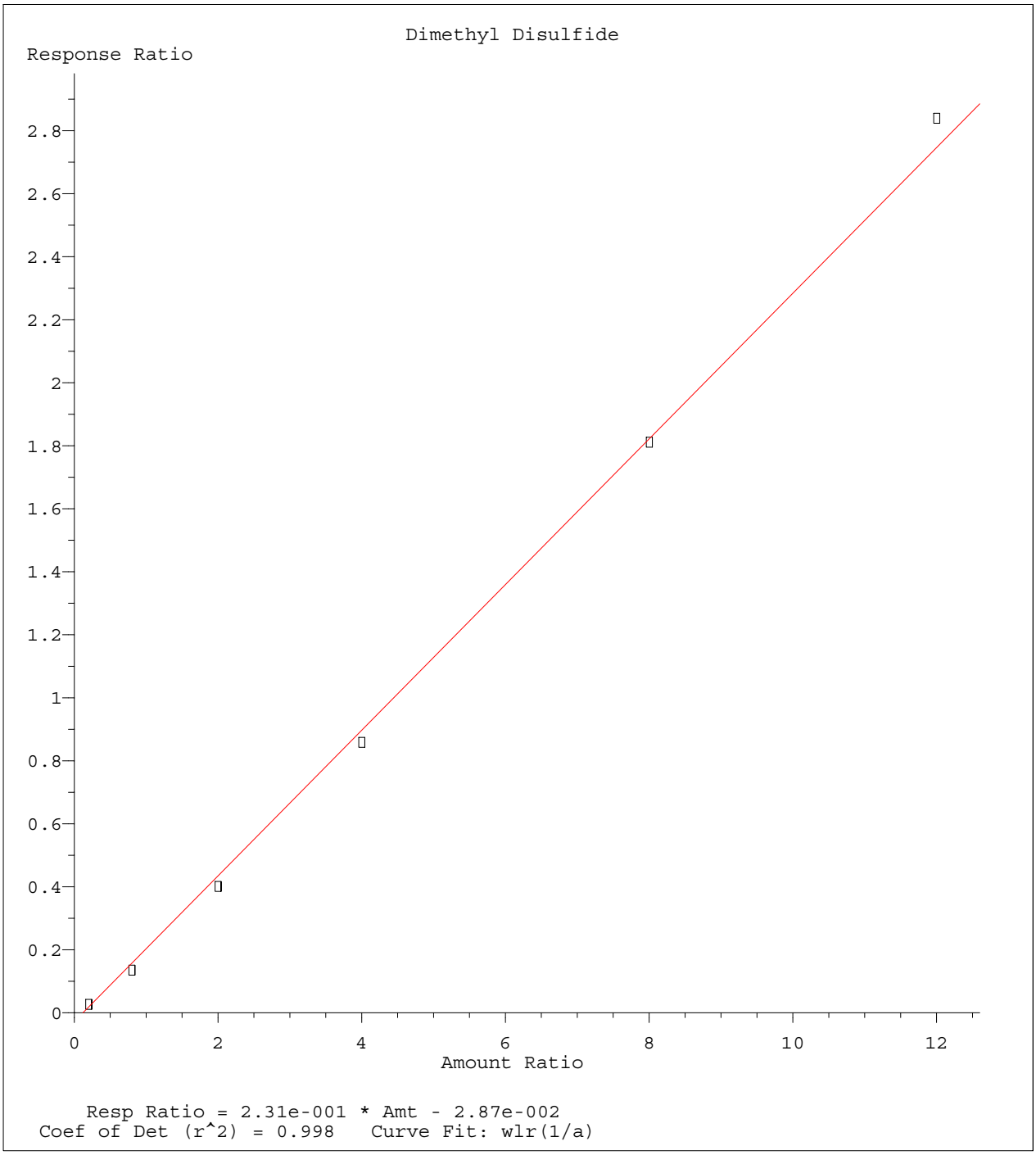




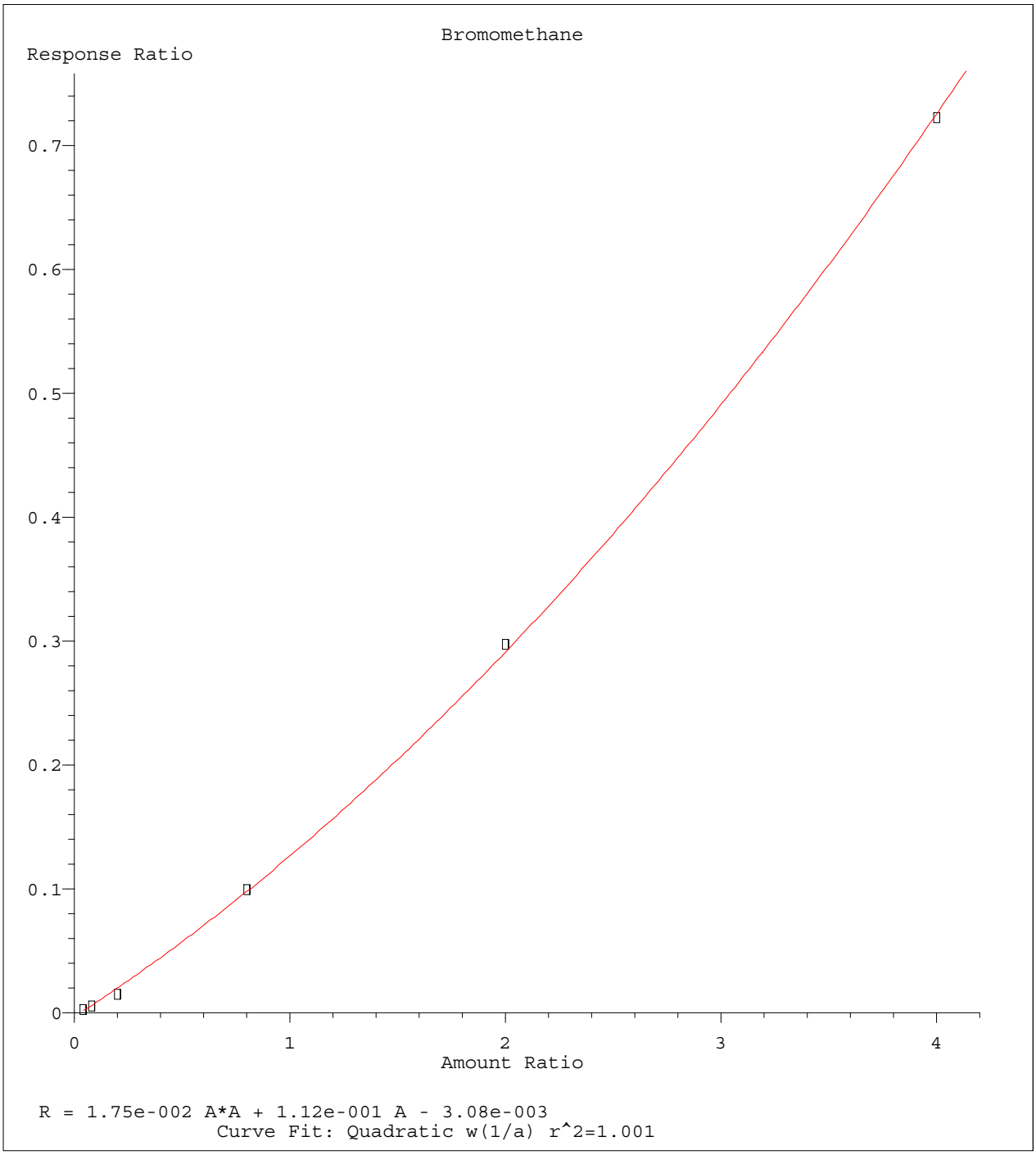
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



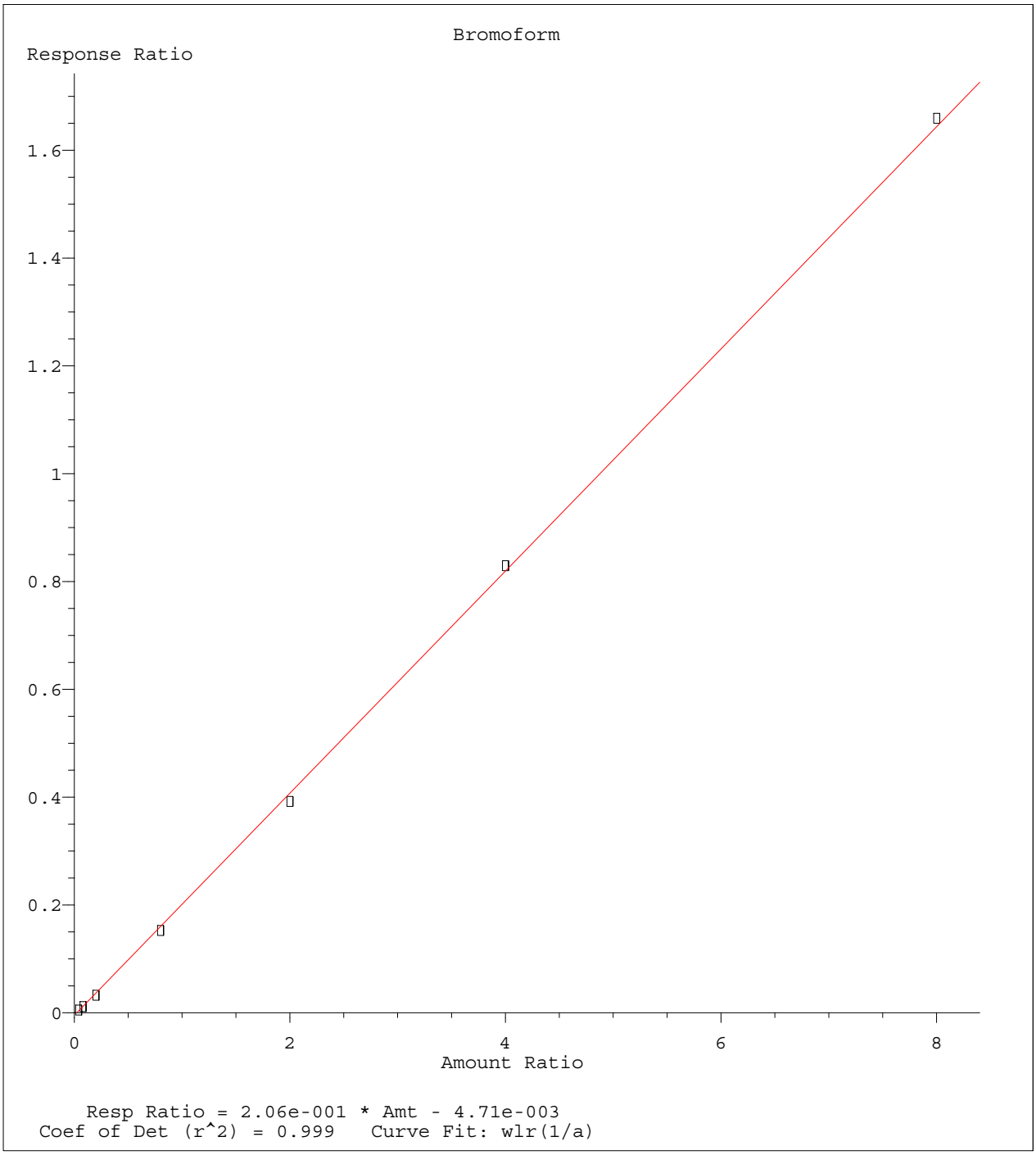
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	876345	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	707189	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	383750	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	227423	24.7419	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.96%			
43) 1,2-Dichloroethane-d4	10.53	65	193344	24.3311	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.32%			
58) Toluene-d8	12.91	98	800923	24.7866	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.16%			
80) p-Bromofluorobenzene	16.30	95	322047	23.7784	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.12%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	667667	56.2976	ug/L	100
3) Chloromethane	3.82	50	720887	48.6211	ug/L	98
4) Vinyl Chloride	4.05	62	635481	45.3850	ug/L	98
5) 1,3-Butadiene	4.10	54	359379	68.4146	ug/L	96
6) Bromomethane	4.96	94	215525	43.6302	ug/L	99
7) Chloroethane	5.13	64	324474	53.0523	ug/L	96
8) Trichlorofluoromethane	5.61	101	738420	48.5549	ug/L	99
9) Diethyl ether	6.14	59	498151	86.9727	ug/L	91
10) Isoprene	6.18	67	610998	50.8138	ug/L	89
11) Acrolein	6.39	56	80484	101.4634	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	445386	51.3586	ug/L	97
13) Acetone	6.49	43	53217	43.1773	ug/L	96
14) 1,1-Dichloroethene	6.71	61	596314	46.9846	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	66729	167.0197	ug/L	97
16) Dimethyl Sulfide	6.98	62	449123	53.1278	ug/L	91
17) Iodomethane	7.24	142	397109	104.7342	ug/L	90
18) Methyl acetate	7.24	43	145496	43.1089	ug/L	93
19) Methylene Chloride	7.50	84	425943	46.7005	ug/L	84
20) Carbon Disulfide	7.55	76	1144667	43.3766	ug/L	100
21) Acrylonitrile	7.67	53	78412	45.8636	ug/L	99
22) Methyl Tert Butyl Ether	7.70	73	827526	46.0483	ug/L	94
23) trans-1,2-Dichloroethene	7.94	61	583968	47.2932	ug/L	96
24) n-Hexane	8.02	57	502871	48.7894	ug/L	93
25) Diisopropyl ether	8.35	45	2651186	95.9237	ug/L	96
26) Vinyl Acetate	8.53	43	616012	49.6945	ug/L	96
27) 1,1-Dichloroethane	8.56	63	756542	47.6058	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2118923	90.1483	ug/L	98
29) 2-Butanone	9.12	43	83993	43.4556	ug/L	91
30) Propionitrile	9.22	54	56456	94.2403	ug/L	99
31) 2,2-Dichloropropane	9.34	77	626218	46.6788	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	489725	47.9836	ug/L	96
33) Chloroform	9.61	83	787042	44.6971	ug/L	97
34) 1-Bromopropane	9.75	122	124602	61.8875	ug/L	100
35) Bromochloromethane	9.84	130	272025	49.3934	ug/L	95
36) Tetrahydrofuran	9.86	42	114805	86.2858	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	721765	50.7918	ug/L	100
39) Cyclohexane	10.17	56	587817	44.4298	ug/L	91
40) 1,1-Dichloropropene	10.34	75	586359	47.2590	ug/L	97
41) Tert-Amyl-Methyl ether	10.44	73	1981831	94.1604	ug/L	98
42) Carbon Tetrachloride	10.48	117	660929	50.1611	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

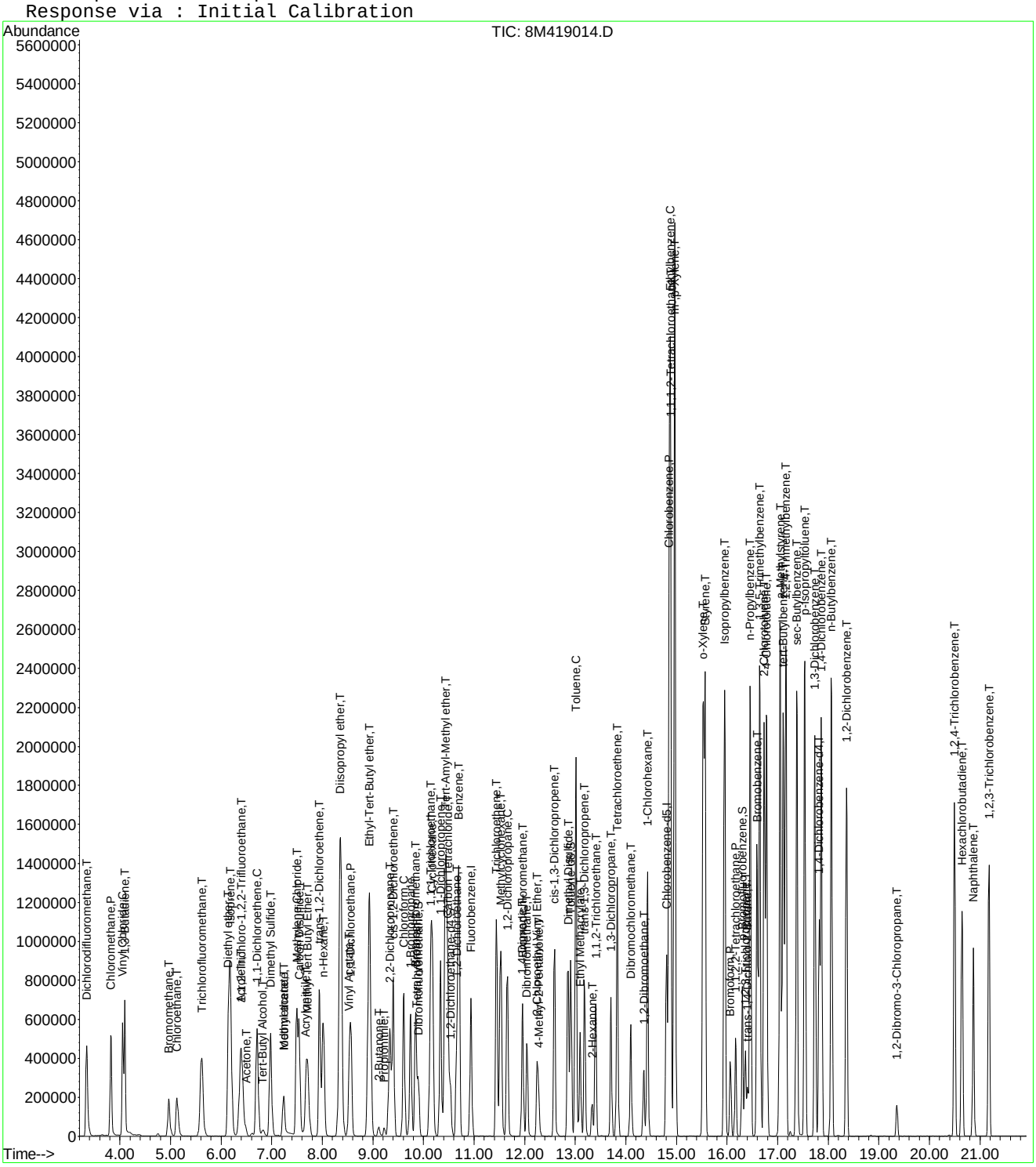
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	470242	47.2276	ug/L	97
46)	Benzene	10.70	78	1721941	47.5631	ug/L	95
47)	Trichloroethene	11.44	130	483157	47.5077	ug/L	97
48)	Methylcyclohexane	11.53	83	636402	46.9430	ug/L	95
49)	1,2-Dichloropropane	11.66	63	418165	47.2917	ug/L	95
50)	Bromodichloromethane	11.96	83	555676	48.0208	ug/L	98
51)	1,4-Dioxane	11.95	88	8508	168.7628	ug/L	89
52)	Dibromomethane	12.04	93	215781	47.4196	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.25	63	183970	48.0854	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	77823	45.4120	ug/L	99
55)	cis-1,3-Dichloropropene	12.59	75	666388	50.5672	ug/L	100
56)	Dimethyl Disulfide	12.86	79	345797	45.7592	ug/L	95
59)	Toluene	13.01	91	1910652	48.5373	ug/L	100
60)	Ethyl Methacrylate	13.10	69	388584	52.3228	ug/L	88
62)	trans-1,3-Dichloropropene	13.18	75	531560	46.5624	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	293466	45.3132	ug/L	96
64)	2-Hexanone	13.34	58	76776	48.3051	ug/L	91
65)	1,3-Dichloropropane	13.71	76	516864	47.2090	ug/L	88
66)	Tetrachloroethene	13.83	164	418500	50.6128	ug/L	97
67)	Dibromochloromethane	14.10	129	402089	48.3146	ug/L	99
68)	1,2-Dibromoethane	14.36	107	298114	47.1242	ug/L	99
69)	1-Chlorohexane	14.43	91	648721	52.0883	ug/L	94
70)	Chlorobenzene	14.85	112	1321464	47.1602	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.89	131	500071	50.2889	ug/L	99
72)	Ethylbenzene	14.87	106	767808	48.9244	ug/L	99
73)	m-,p-Xylene	14.97	106	1848951	101.7331	ug/L	100
74)	o-Xylene	15.53	106	879490	48.1326	ug/L	100
75)	Styrene	15.57	104	1509115	52.6805	ug/L	96
76)	Bromoform	16.06	173	246815	42.9243	ug/L	99
77)	Isopropylbenzene	15.95	105	2164038	49.4628	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	331079	45.7235	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	97508	46.9716	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.40	53	63669	36.4332	ug/L	93
83)	n-Propylbenzene	16.46	91	2539452	47.2799	ug/L	97
84)	Bromobenzene	16.60	156	605699	48.1294	ug/L	96
85)	1,3,5-Trimethylbenzene	16.64	105	1903333	48.9404	ug/L	97
86)	2-Chlorotoluene	16.74	91	1618818	44.1478	ug/L	92
87)	4-Chlorotoluene	16.78	91	1639005	49.5992	ug/L	98
88)	a-Methylstyrene	17.06	118	1156988	53.0644	ug/L	97
89)	tert-Butylbenzene	17.11	134	423431	48.0884	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1982610	49.9352	ug/L	96
91)	sec-Butylbenzene	17.38	105	2331979	47.8741	ug/L	99
92)	p-Isopropyltoluene	17.54	119	2050846	50.0005	ug/L	100
93)	1,3-Dichlorobenzene	17.74	146	1155418	47.3665	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	1144693	46.1575	ug/L	99
95)	n-Butylbenzene	18.06	91	1844076	49.9102	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	1012196	47.2353	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	51865	44.0112	ug/L	90
98)	1,2,4-Trichlorobenzene	20.50	180	707379	49.0312	ug/L	100
99)	Hexachlorobutadiene	20.64	225	326033	48.5641	ug/L	99
100)	Naphthalene	20.87	128	990859	48.0605	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583838	48.7315	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	56.2976	-12.6	109	0.00
3	P	Chloromethane	50.0000	48.6212	2.8	108	0.00
4	C	Vinyl Chloride	50.0000	45.3850	9.2	98	0.00
5	T	1,3-Butadiene	50.0000	68.4146	-36.8#	132	0.00
6	T	Bromomethane	50.0000	43.6302	12.7	87	0.00
7	T	Chloroethane	50.0000	53.0523	-6.1	110	0.00
8	T	Trichlorofluoromethane	50.0000	48.5549	2.9	102	0.01
9	T	Diethyl ether	100.0000	86.9727	13.0	94	0.00
10	T	Isoprene	50.0000	50.8138	-1.6	106	0.00
11	T	Acrolein	50.0000	101.4634	-102.9#	219	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.3586	-2.7	107	0.00
13	T	Acetone	50.0000	43.1773	13.6	90	0.01
14	C	1,1-Dichloroethene	50.0000	46.9845	6.0	97	0.01
15	T	Tert-Butyl Alcohol	200.0000	167.0197	16.5	88	0.00
16	T	Dimethyl Sulfide	50.0000	53.1278	-6.3	113	0.00
17	T	Iodomethane	50.0000	104.7342	-109.5#	197	0.01
18	T	Methyl acetate	50.0000	43.1089	13.8	90	0.00
19	T	Methylene Chloride	50.0000	46.7005	6.6	100	0.00
20	T	Carbon Disulfide	50.0000	43.3766	13.2	90	0.00
21	T	Acrylonitrile	50.0000	45.8636	8.3	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.0483	7.9	94	0.00
23	T	trans-1,2-Dichloroethene	50.0000	47.2932	5.4	100	0.00
24	T	n-Hexane	50.0000	48.7894	2.4	104	0.01
25	T	Diisopropyl ether	100.0000	95.9237	4.1	102	0.00
26	T	Vinyl Acetate	50.0000	49.6946	0.6	103	0.00
27	P	1,1-Dichloroethane	50.0000	47.6058	4.8	99	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	90.1483	9.9	95	0.00
29	T	2-Butanone	50.0000	43.4556	13.1	90	0.01
30	T	Propionitrile	100.0000	94.2404	5.8	99	0.00
31	T	2,2-Dichloropropane	50.0000	46.6788	6.6	97	0.00
32	T	cis-1,2-Dichloroethene	50.0000	47.9836	4.0	99	0.00
33	C	Chloroform	50.0000	44.6971	10.6	101	0.01
34		1-Bromopropane	50.0000	61.8875	-23.8	132	0.00
35	T	Bromochloromethane	50.0000	49.3934	1.2	98	0.00
36	T	Tetrahydrofuran	100.0000	86.2858	13.7	91	0.00
37	S	Dibromofluoromethane	25.0000	24.7419	1.0	101	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.7918	-1.6	103	0.00
39	T	Cyclohexane	50.0000	44.4298	11.1	93	0.00
40	T	1,1-Dichloropropene	50.0000	47.2591	5.5	100	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.1604	5.8	99	0.00
42	T	Carbon Tetrachloride	50.0000	50.1611	-0.3	101	0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.3311	2.7	98	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	47.2276	5.5	97	0.00
46	T	Benzene	50.0000	47.5631	4.9	99	0.00
47	T	Trichloroethene	50.0000	47.5078	5.0	100	0.00
48	T	Methylcyclohexane	50.0000	46.9430	6.1	99	0.00
49	C	1,2-Dichloropropane	50.0000	47.2917	5.4	98	0.01
50	T	Bromodichloromethane	50.0000	48.0208	4.0	96	0.00
51	T	1,4-Dioxane	200.0000	168.7628	15.6	84	0.00
52	T	Dibromomethane	50.0000	47.4196	5.2	95	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.0854	3.8	98	0.00
54	T	4-Methyl-2-Pentanone	50.0000	45.4120	9.2	93	0.00
55	T	cis-1,3-Dichloropropene	50.0000	50.5673	-1.1	99	0.00
56	T	Dimethyl Disulfide	50.0000	45.7592	8.5	104	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	106	0.00

58	S	Toluene-d8	25.0000	24.7866	0.9	101	0.00	
59	C	Toluene	50.0000	48.5373	2.9	100	0.00	
60	T	Ethyl Methacrylate	50.0000	52.3228	-4.6	101	0.00	
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#	
62	T	trans-1,3-Dichloropropene	50.0000	46.5624	6.9	94	0.00	
63	T	1,1,2-Trichloroethane	50.0000	45.3132	9.4	96	0.00	
64	T	2-Hexanone	50.0000	48.3051	3.4	98	0.00	
65	T	1,3-Dichloropropane	50.0000	47.2090	5.6	97	0.00	
66	T	Tetrachloroethene	50.0000	50.6128	-1.2	106	0.00	
67	T	Dibromochloromethane	50.0000	48.3146	3.4	95	0.00	
68	T	1,2-Dibromoethane	50.0000	47.1242	5.8	95	0.00	
69	T	1-Chlorohexane	50.0000	52.0883	-4.2	108	0.00	
70	P	Chlorobenzene	50.0000	47.1602	5.7	100	0.00	
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.2889	-0.6	97	0.01	
72	C	Ethylbenzene	50.0000	48.9244	2.2	101	0.00	
73	T	m-,p-Xylene	100.0000	101.7331	-1.7	102	0.00	
74	T	o-Xylene	50.0000	48.1326	3.7	102	0.00	
75	T	Styrene	50.0000	52.6805	-5.4	102	0.00	
76	P	Bromoform	50.0000	42.9243	14.2	94	0.01	
77	T	Isopropylbenzene	50.0000	49.4628	1.1	101	0.00	
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	108	0.00	
79	P	1,1,2,2-Tetrachloroethane	50.0000	45.7235	8.6	94	0.00	
80	S	p-Bromofluorobenzene	25.0000	23.7784	4.9	102	0.00	
81	T	1,2,3-Trichloropropane	50.0000	46.9716	6.1	95	0.06	
82	T	trans-1,4-Dichloro-2-Butene	50.0000	36.4332	27.1#	74	0.00	
83	T	n-Propylbenzene	50.0000	47.2799	5.4	100	0.00	
84	T	Bromobenzene	50.0000	48.1294	3.7	101	0.00	
85	T	1,3,5-Trimethylbenzene	50.0000	48.9404	2.1	102	0.00	
86	T	2-Chlorotoluene	50.0000	44.1478	11.7	104	0.00	
87	T	4-Chlorotoluene	50.0000	49.5992	0.8	99	0.00	
88	T	a-Methylstyrene	50.0000	53.0644	-6.1	112	0.00	
89	T	tert-Butylbenzene	50.0000	48.0884	3.8	104	0.00	
90	T	1,2,4-Trimethylbenzene	50.0000	49.9352	0.1	102	0.00	
91	T	sec-Butylbenzene	50.0000	47.8741	4.3	101	0.00	
92	T	p-Isopropyltoluene	50.0000	50.0005	-0.0	103	0.00	
93	T	1,3-Dichlorobenzene	50.0000	47.3665	5.3	100	0.00	
94	T	1,4-Dichlorobenzene	50.0000	46.1575	7.7	101	0.00	
95	T	n-Butylbenzene	50.0000	49.9102	0.2	102	0.00	
96	T	1,2-Dichlorobenzene	50.0000	47.2353	5.5	99	0.00	
97	T	1,2-Dibromo-3-Chloropropane	50.0000	44.0112	12.0	92	0.00	
98	T	1,2,4-Trichlorobenzene	50.0000	49.0312	1.9	101	0.00	
99	T	Hexachlorobutadiene	50.0000	48.5641	2.9	104	0.00	
100	T	Naphthalene	50.0000	48.0605	3.9	97	0.00	
101	T	1,2,3-Trichlorobenzene	50.0000	48.7315	2.5	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419008.D 8260WT.M Tue Apr 18 12:35:57 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 16:53:18 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	402399	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	287039	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	155203	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	103120	24.6975	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.80%			
43) 1,2-Dichloroethane-d4	10.14	65	116309	24.5924	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.36%			
57) Toluene-d8	12.38	98	398949	25.5310	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.12%			
78) p-Bromofluorobenzene	15.54	95	149346	25.8909	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.56%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	253421	45.7274	ug/L	97
3) Chloromethane	3.66	50	252292	37.8490	ug/L	99
4) Vinyl Chloride	3.89	62	229933	45.2597	ug/L	98
5) 1,3-Butadiene	3.93	54	97904	43.1375	ug/L	97
6) Bromomethane	4.78	94	158105	41.6896	ug/L	99
7) Chloroethane	4.93	64	175763	44.0699	ug/L	100
8) Trichlorofluoromethane	5.41	101	290843	42.0666	ug/L	100
9) Diethyl ether	5.92	59	417683	86.2198	ug/L	97
10) Isoprene	5.96	67	292994	43.9998	ug/L	98
11) Acrolein	6.15	56	35350	38.2211	ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	176279	42.7438	ug/L	94
13) Acetone	6.26	43	56216	40.9358	ug/L	95
14) 1,1-Dichloroethene	6.47	61	340456	43.1604	ug/L	96
15) Tert-Butyl Alcohol	6.57	59	86205	175.4132	ug/L	98
16) Dimethyl Sulfide	6.72	62	244038	43.5545	ug/L	99
17) Iodomethane	6.97	142	212586	41.9714	ug/L	95
18) Methyl acetate	6.98	43	172001	43.6887	ug/L	100
19) Methylene Chloride	7.23	84	225252	42.2810	ug/L	100
20) Carbon Disulfide	7.27	76	527706	42.2244	ug/L	99
21) Acrylonitrile	7.40	53	93884	46.0858	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	581427	44.3917	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	202192	43.3439	ug/L	96
24) n-Hexane	7.73	57	335442	45.7862	ug/L	100
25) Diisopropyl ether	8.07	45	1671319	92.4612	ug/L	97
26) Vinyl Acetate	8.23	43	448960	48.5624	ug/L	98
27) 1,1-Dichloroethane	8.26	63	442046	45.0231	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1475592	90.5535	ug/L	99
29) 2-Butanone	8.79	43	96244	43.2299	ug/L	99
30) Propionitrile	8.89	54	67157	89.0747	ug/L	97
31) 2,2-Dichloropropane	9.00	77	318055	47.1212	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	242239	45.1412	ug/L	95
33) Chloroform	9.26	83	362675	41.1082	ug/L	99
34) 1-Bromopropane	9.39	122	45334	45.4725	ug/L	99
35) Bromochloromethane	9.48	130	147589	45.3516	ug/L	93
36) Tetrahydrofuran	9.50	42	142613	86.3507	ug/L	99
38) 1,1,1-Trichloroethane	9.77	97	309311	43.4908	ug/L	99
39) Cyclohexane	9.79	56	424988	43.6456	ug/L	99
40) 1,1-Dichloropropene	9.95	75	275400	43.3603	ug/L	98
41) Carbon Tetrachloride	10.09	117	275368	44.2306	ug/L	98
42) Tert-Amyl-Methyl ether	10.05	73	1195486	89.6755	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17649.D 8260WTR.M Fri Apr 21 16:53:19 2017 Page 1

Data File : C:\MSDchem\1\data\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 16:53:18 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

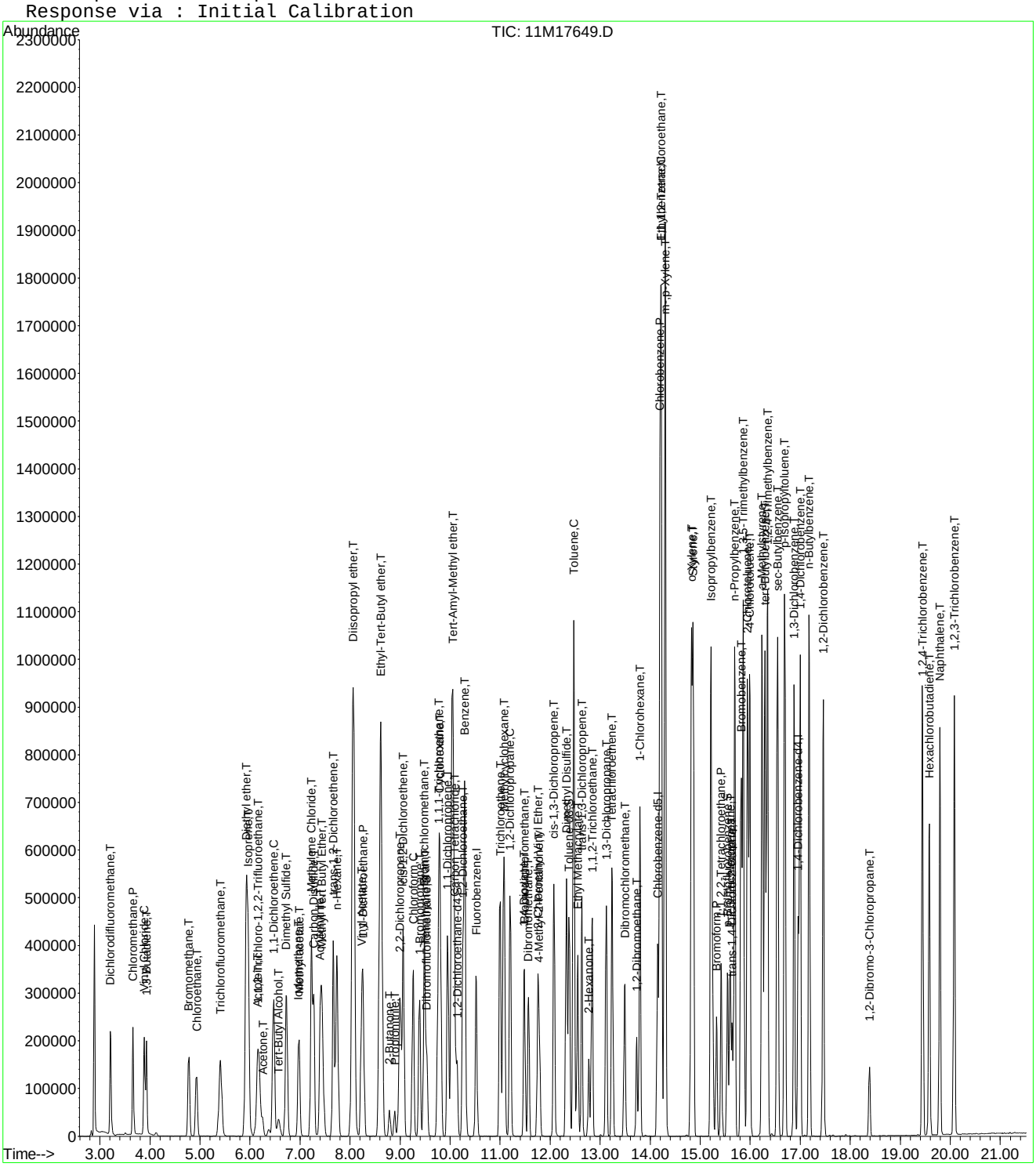
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	303278	44.2788	ug/L	99
45)	Benzene	10.29	78	822167	43.2102	ug/L	99
46)	Trichloroethene	11.00	130	220082	43.6864	ug/L	95
47)	Methylcyclohexane	11.07	83	347889	44.8107	ug/L	97
48)	1,2-Dichloropropane	11.20	63	263943	45.0616	ug/L	97
49)	1,4-Dioxane	11.48	88	9074	169.1368	ug/L	90
50)	Bromodichloromethane	11.49	83	283995	46.2485	ug/L	98
51)	Dibromomethane	11.56	93	126782	45.9011	ug/L	92
52)	2-Chloroethyl Vinyl Ether	11.76	63	152555	48.7228	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	83934	40.8193	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	356816	49.9471	ug/L	99
55)	Dimethyl Disulfide	12.33	79	191335	45.6119	ug/L	94
58)	Toluene	12.47	91	989808	48.3996	ug/L	99
59)	Ethyl Methacrylate	12.55	69	244392	46.4345	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	313711	49.6643	ug/L	97
61)	1,1,2-Trichloroethane	12.84	97	190822	44.3532	ug/L	96
62)	2-Hexanone	12.77	43	143754	43.9727	ug/L	100
63)	1,3-Dichloropropane	13.12	76	320866	45.0718	ug/L	94
64)	Tetrachloroethene	13.23	164	185301	42.5319	ug/L	95
65)	Dibromochloromethane	13.49	129	224332	48.1040	ug/L	100
66)	1,2-Dibromoethane	13.73	107	172358	45.5080	ug/L	100
67)	1-Chlorohexane	13.79	91	272628	48.6900	ug/L	96
68)	Chlorobenzene	14.20	112	567146	44.4764	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	219465	47.3306	ug/L	100
70)	Ethylbenzene	14.22	106	320038	45.1728	ug/L	100
71)	m-,p-Xylene	14.30	106	738096	92.1015	ug/L	98
72)	o-Xylene	14.83	106	382586	45.7039	ug/L	98
73)	Styrene	14.86	104	627685	50.7791	ug/L	94
74)	Bromoform	15.32	173	155818	42.7160	ug/L	100
75)	Isopropylbenzene	15.22	105	901458	43.5793	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	240861	44.8870	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	67829	43.4485	ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	69195	46.7083	ug/L	82
81)	n-Propylbenzene	15.69	91	1079022	43.9815	ug/L	99
82)	Bromobenzene	15.82	156	277236	45.7761	ug/L	84
83)	1,3,5-Trimethylbenzene	15.86	105	788580	43.4635	ug/L	98
84)	2-Chlorotoluene	15.94	91	688369	40.2245	ug/L	97
85)	4-Chlorotoluene	15.99	91	686033	45.8230	ug/L	90
86)	a-Methylstyrene	16.23	118	428481	45.8626	ug/L	95
87)	tert-Butylbenzene	16.30	134	183808	44.7854	ug/L	96
88)	1,2,4-Trimethylbenzene	16.35	105	819030	43.9796	ug/L	100
89)	sec-Butylbenzene	16.54	105	985536	42.8288	ug/L	99
90)	p-Isopropyltoluene	16.69	119	863318	44.8388	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	510257	46.5246	ug/L	94
92)	1,4-Dichlorobenzene	17.00	146	509100	45.6803	ug/L	95
93)	n-Butylbenzene	17.17	91	796012	47.9317	ug/L	98
94)	1,2-Dichlorobenzene	17.46	146	497959	44.9006	ug/L	96
95)	1,2-Dibromo-3-Chloropropan	18.38	75	43198	46.6258	ug/L	82
96)	1,2,4-Trichlorobenzene	19.45	180	395129	48.9177	ug/L	95
97)	Hexachlorobutadiene	19.58	225	198904	48.5194	ug/L	96
98)	Naphthalene	19.79	128	802905	45.7702	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	378302	46.6149	ug/L	96

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 16:53 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	90	0.01
2	T	Dichlorodifluoromethane	0.3443	0.3149	8.5	71	0.00
3	P	Chloromethane	0.4141	0.3135	24.3	77	0.00
4	C	Vinyl Chloride	0.3156	0.2857	9.5	78	0.01
5	T	1,3-Butadiene	0.1574	0.1216	22.7	87	0.00
6	T	Bromomethane	0.2356	0.1965	16.6	80	0.01
7	T	Chloroethane	0.2478	0.2184	11.9	74	0.01
8	T	Trichlorofluoromethane	0.4295	0.3614	15.9	70	0.00
9	T	Diethyl ether	0.3010	0.2595	13.8	75	0.01
10	T	Isoprene	0.4137	0.3641	12.0	71	0.00
11	T	Acrolein	0.0575	0.0439	23.6	65	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2562	0.2190	14.5	72	0.00
13	T	Acetone	0.0853	0.0698	18.1	74	0.01
14	C	1,1-Dichloroethene	0.4901	0.4230	13.7	72	0.00
15	T	Tert-Butyl Alcohol	0.0305	0.0268	12.3	77	0.00
16	T	Dimethyl Sulfide	0.3481	0.3032	12.9	72	0.00
17	T	Iodomethane	0.2570	0.2642	-2.8	70	0.00
18	T	Methyl acetate	0.2446	0.2137	12.6	77	0.00
19	T	Methylene Chloride	0.3310	0.2799	15.4	75	0.00
20	T	Carbon Disulfide	0.7764	0.6557	15.6	71	0.00
21	T	Acrylonitrile	0.1266	0.1167	7.8	76	0.00
22	T	Methyl Tert Butyl Ether	0.8137	0.7225	11.2	76	0.00
23	T	trans-1,2-Dichloroethene	0.2898	0.2512	13.3	72	0.00
24	T	n-Hexane	0.4552	0.4168	8.4	74	0.00
25	T	Diisopropyl ether	1.1230	1.0384	7.5	80	0.00
26	T	Vinyl Acetate	0.5744	0.5578	2.9	75	0.00
27	P	1,1-Dichloroethane	0.6100	0.5493	10.0	77	0.00
28	T	Ethyl-Tert-Butyl ether	1.0124	0.9167	9.4	78	0.00
29	T	2-Butanone	0.1383	0.1196	13.5	75	0.00
30	T	Propionitrile	0.0468	0.0417	10.9	76	0.00
31	T	2,2-Dichloropropane	0.4193	0.3952	5.8	77	0.00
32	T	cis-1,2-Dichloroethene	0.3334	0.3010	9.7	75	0.00
33	C	Chloroform	0.5481	0.4506	17.8	75	0.01
34	T	1-Bromopropane	0.0619	0.0563	9.1	77	0.00
35	T	Bromochloromethane	0.2022	0.1834	9.3	75	0.00
36	T	Tetrahydrofuran	0.1026	0.0886	13.7	75	0.00
37	S	Dibromofluoromethane	0.2594	0.2563	1.2	85	0.00
38	T	1,1,1-Trichloroethane	0.4419	0.3843	13.0	71	0.01
39	T	Cyclohexane	0.6049	0.5281	12.7	73	0.00
40	T	1,1-Dichloropropene	0.3946	0.3422	13.3	72	0.00
41	T	Carbon Tetrachloride	0.3868	0.3422	11.5	72	0.00
42	T	Tert-Amyl-Methyl ether	0.8282	0.7427	10.3	78	0.01
43	S	1,2-Dichloroethane-d4	0.2938	0.2890	1.6	84	0.00
44	T	1,2-Dichloroethane	0.4255	0.3768	11.4	76	0.01
45	T	Benzene	1.1821	1.0216	13.6	76	0.00
46	T	Trichloroethene	0.3130	0.2735	12.6	72	0.00
47	T	Methylcyclohexane	0.4823	0.4323	10.4	74	0.00
48	C	1,2-Dichloropropane	0.3639	0.3280	9.9	76	0.00
49	T	1,4-Dioxane	0.0033	0.0028	15.3	75	0.01
50	T	Bromodichloromethane	0.3815	0.3529	7.5	77	0.01
51	T	Dibromomethane	0.1716	0.1575	8.2	75	0.00
52	T	2-Chloroethyl Vinyl Ether	0.1945	0.1896	2.6	79	0.00
53	T	4-Methyl-2-Pentanone	0.1278	0.1043	18.4	71	0.00
54	T	cis-1,3-Dichloropropene	0.4438	0.4434	0.1	79	0.00

(#) = Out of Range
11M17649.D 8260WTR.M Fri Apr 21 16:54:13 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2606	0.2377	8.8	75	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	89	0.00
57	S	Toluene-d8	1.3610	1.3899	-2.1	86	0.00
58	C	Toluene	1.7812	1.7242	3.2	89	0.00
59	T	Ethyl Methacrylate	0.4584	0.4257	7.1	73	0.00
60	T	trans-1,3-Dichloropropene	0.5502	0.5465	0.7	79	0.00
61	T	1,1,2-Trichloroethane	0.3747	0.3324	11.3	74	0.01
62	T	2-Hexanone	0.2847	0.2504	12.1	76	0.00
63	T	1,3-Dichloropropane	0.6200	0.5589	9.9	77	0.00
64	T	Tetrachloroethene	0.3795	0.3228	14.9	72	0.00
65	T	Dibromochloromethane	0.4062	0.3908	3.8	75	0.01
66	T	1,2-Dibromoethane	0.3299	0.3002	9.0	78	0.00
67	T	1-Chlorohexane	0.4877	0.4749	2.6	78	0.00
68	P	Chlorobenzene	1.1106	0.9879	11.0	78	0.00
69	T	1,1,1,2-Tetrachloroethane	0.4038	0.3823	5.3	76	0.00
70	C	Ethylbenzene	0.6170	0.5575	9.7	76	0.00
71	T	m-,p-Xylene	0.6980	0.6429	7.9	79	0.00
72	T	o-Xylene	0.7291	0.6664	8.6	76	0.00
73	T	Styrene	1.0766	1.0934	-1.6	79	0.00
74	P	Bromoform	0.2742	0.2714	1.0	77	0.00
75	T	Isopropylbenzene	1.8016	1.5703	12.8	77	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	91	0.00
77	P	1,1,2,2-Tetrachloroethane	0.8643	0.7760	10.2	76	0.00
78	S	p-Bromofluorobenzene	0.9292	0.9623	-3.6	90	0.00
79	T	1,2,3-Trichloropropane	0.2515	0.2185	13.1	76	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2232	0.2229	0.1	87	0.00
81	T	n-Propylbenzene	3.9518	3.4762	12.0	80	0.00
82	T	Bromobenzene	0.9756	0.8931	8.4	78	0.00
83	T	1,3,5-Trimethylbenzene	2.9225	2.5405	13.1	77	0.00
84	T	2-Chlorotoluene	2.7566	2.2176	19.6	76	0.00
85	T	4-Chlorotoluene	2.4116	2.2101	8.4	82	0.00
86	T	a-Methylstyrene	1.5049	1.3804	8.3	76	0.00
87	T	tert-Butylbenzene	0.6611	0.5921	10.4	73	0.00
88	T	1,2,4-Trimethylbenzene	2.9998	2.6386	12.0	78	0.01
89	T	sec-Butylbenzene	3.7066	3.1750	14.3	77	0.00
90	T	p-Isopropyltoluene	3.1014	2.7813	10.3	78	0.00
91	T	1,3-Dichlorobenzene	1.7666	1.6438	7.0	79	0.00
92	T	1,4-Dichlorobenzene	1.7952	1.6401	8.6	80	0.00
93	T	n-Butylbenzene	2.6751	2.5644	4.1	78	0.00
94	T	1,2-Dichlorobenzene	1.7864	1.6042	10.2	79	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1492	0.1392	6.7	81	0.00
96	T	1,2,4-Trichlorobenzene	1.3011	1.2729	2.2	79	0.01
97	T	Hexachlorobutadiene	0.6603	0.6408	3.0	76	0.00
98	T	Naphthalene	2.8257	2.5866	8.5	78	0.00
99	T	1,2,3-Trichlorobenzene	1.3072	1.2187	6.8	77	0.00

Data File : C:\MSDCHEM\1\DATA\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	90	0.01
2	T	Dichlorodifluoromethane	50.0000	45.7274	8.5	71	0.00
3	P	Chloromethane	50.0000	37.8490	24.3	77	0.00
4	C	Vinyl Chloride	50.0000	45.2597	9.5	78	0.01
5	T	1,3-Butadiene	50.0000	43.1375	13.7	87	0.00
6	T	Bromomethane	50.0000	41.6896	16.6	80	0.01
7	T	Chloroethane	50.0000	44.0699	11.9	74	0.01
8	T	Trichlorofluoromethane	50.0000	42.0666	15.9	70	0.00
9	T	Diethyl ether	100.0000	86.2198	13.8	75	0.01
10	T	Isoprene	50.0000	43.9998	12.0	71	0.00
11	T	Acrolein	50.0000	38.2211	23.6	65	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	42.7438	14.5	72	0.00
13	T	Acetone	50.0000	40.9358	18.1	74	0.01
14	C	1,1-Dichloroethene	50.0000	43.1604	13.7	72	0.00
15	T	Tert-Butyl Alcohol	200.0000	175.4132	12.3	77	0.00
16	T	Dimethyl Sulfide	50.0000	43.5545	12.9	72	0.00
17	T	Iodomethane	50.0000	41.9714	16.1	70	0.00
18	T	Methyl acetate	50.0000	43.6887	12.6	77	0.00
19	T	Methylene Chloride	50.0000	42.2810	15.4	75	0.00
20	T	Carbon Disulfide	50.0000	42.2244	15.6	71	0.00
21	T	Acrylonitrile	50.0000	46.0858	7.8	76	0.00
22	T	Methyl Tert Butyl Ether	50.0000	44.3917	11.2	76	0.00
23	T	trans-1,2-Dichloroethene	50.0000	43.3439	13.3	72	0.00
24	T	n-Hexane	50.0000	45.7862	8.4	74	0.00
25	T	Diisopropyl ether	100.0000	92.4612	7.5	80	0.00
26	T	Vinyl Acetate	50.0000	48.5624	2.9	75	0.00
27	P	1,1-Dichloroethane	50.0000	45.0231	10.0	77	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	90.5535	9.4	78	0.00
29	T	2-Butanone	50.0000	43.2299	13.5	75	0.00
30	T	Propionitrile	100.0000	89.0747	10.9	76	0.00
31	T	2,2-Dichloropropane	50.0000	47.1213	5.8	77	0.00
32	T	cis-1,2-Dichloroethene	50.0000	45.1412	9.7	75	0.00
33	C	Chloroform	50.0000	41.1082	17.8	75	0.01
34	T	1-Bromopropane	50.0000	45.4725	9.1	77	0.00
35	T	Bromochloromethane	50.0000	45.3516	9.3	75	0.00
36	T	Tetrahydrofuran	100.0000	86.3507	13.6	75	0.00
37	S	Dibromofluoromethane	25.0000	24.6975	1.2	85	0.00
38	T	1,1,1-Trichloroethane	50.0000	43.4908	13.0	71	0.01
39	T	Cyclohexane	50.0000	43.6456	12.7	73	0.00
40	T	1,1-Dichloropropene	50.0000	43.3603	13.3	72	0.00
41	T	Carbon Tetrachloride	50.0000	44.2306	11.5	72	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	89.6755	10.3	78	0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.5924	1.6	84	0.00
44	T	1,2-Dichloroethane	50.0000	44.2788	11.4	76	0.01
45	T	Benzene	50.0000	43.2101	13.6	76	0.00
46	T	Trichloroethene	50.0000	43.6864	12.6	72	0.00
47	T	Methylcyclohexane	50.0000	44.8107	10.4	74	0.00
48	C	1,2-Dichloropropane	50.0000	45.0617	9.9	76	0.00
49	T	1,4-Dioxane	200.0000	169.1368	15.4	75	0.01
50	T	Bromodichloromethane	50.0000	46.2485	7.5	77	0.01
51	T	Dibromomethane	50.0000	45.9011	8.2	75	0.00
52	T	2-Chloroethyl Vinyl Ether	50.0000	48.7228	2.6	79	0.00
53	T	4-Methyl-2-Pentanone	50.0000	40.8193	18.4	71	0.00
54	T	cis-1,3-Dichloropropene	50.0000	49.9471	0.1	79	0.00

(#) = Out of Range
11M17649.D 8260WTR.M Fri Apr 21 16:54:15 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042117\11M17649.D Vial: 1
Acq On : 21 Apr 2017 16:31 Operator: JDS
Sample : WG611143-02 50ug/L CCV 8260 Inst : hpms11
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	45.6119	8.8	75	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	89	0.00
57	S	Toluene-d8	25.0000	25.5310	-2.1	86	0.00
58	C	Toluene	50.0000	48.3996	3.2	89	0.00
59	T	Ethyl Methacrylate	50.0000	46.4345	7.1	73	0.00
60	T	trans-1,3-Dichloropropene	50.0000	49.6643	0.7	79	0.00
61	T	1,1,2-Trichloroethane	50.0000	44.3532	11.3	74	0.01
62	T	2-Hexanone	50.0000	43.9727	12.1	76	0.00
63	T	1,3-Dichloropropane	50.0000	45.0718	9.9	77	0.00
64	T	Tetrachloroethene	50.0000	42.5319	14.9	72	0.00
65	T	Dibromochloromethane	50.0000	48.1040	3.8	75	0.01
66	T	1,2-Dibromoethane	50.0000	45.5080	9.0	78	0.00
67	T	1-Chlorohexane	50.0000	48.6900	2.6	78	0.00
68	P	Chlorobenzene	50.0000	44.4764	11.0	78	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	47.3306	5.3	76	0.00
70	C	Ethylbenzene	50.0000	45.1728	9.7	76	0.00
71	T	m-,p-Xylene	100.0000	92.1015	7.9	79	0.00
72	T	o-Xylene	50.0000	45.7039	8.6	76	0.00
73	T	Styrene	50.0000	50.7791	-1.6	79	0.00
74	P	Bromoform	50.0000	42.7160	14.6	77	0.00
75	T	Isopropylbenzene	50.0000	43.5793	12.8	77	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	91	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	44.8870	10.2	76	0.00
78	S	p-Bromofluorobenzene	25.0000	25.8909	-3.6	90	0.00
79	T	1,2,3-Trichloropropane	50.0000	43.4485	13.1	76	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	46.7083	6.6	87	0.00
81	T	n-Propylbenzene	50.0000	43.9815	12.0	80	0.00
82	T	Bromobenzene	50.0000	45.7761	8.4	78	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	43.4635	13.1	77	0.00
84	T	2-Chlorotoluene	50.0000	40.2245	19.6	76	0.00
85	T	4-Chlorotoluene	50.0000	45.8230	8.4	82	0.00
86	T	a-Methylstyrene	50.0000	45.8627	8.3	76	0.00
87	T	tert-Butylbenzene	50.0000	44.7854	10.4	73	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	43.9796	12.0	78	0.01
89	T	sec-Butylbenzene	50.0000	42.8289	14.3	77	0.00
90	T	p-Isopropyltoluene	50.0000	44.8388	10.3	78	0.00
91	T	1,3-Dichlorobenzene	50.0000	46.5246	7.0	79	0.00
92	T	1,4-Dichlorobenzene	50.0000	45.6803	8.6	80	0.00
93	T	n-Butylbenzene	50.0000	47.9317	4.1	78	0.00
94	T	1,2-Dichlorobenzene	50.0000	44.9006	10.2	79	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	46.6258	6.7	81	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	48.9177	2.2	79	0.01
97	T	Hexachlorobutadiene	50.0000	48.5194	3.0	76	0.00
98	T	Naphthalene	50.0000	45.7702	8.5	78	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	46.6149	6.8	77	0.00

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:37:39 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	575056	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	415536	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	223753	25.00	ug/L		-0.01
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	156258	26.6182	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 106.48%				
43) 1,2-Dichloroethane-d4	10.84	65	152450	26.3494	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.40%				
58) Toluene-d8	13.23	98	545849	25.7429	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.96%				
80) p-Bromofluorobenzene	16.63	95	217901	25.6407	ug/L		-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.56%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	468244	51.2848	ug/L		93
3) Chloromethane	4.03	50	478733	44.9254	ug/L		97
4) Vinyl Chloride	4.28	62	491813	47.1433	ug/L		98
5) 1,3-Butadiene	4.32	54	181612	46.5277	ug/L		90
6) Bromomethane	5.23	94	153315	34.0375	ug/L		98
7) Chloroethane	5.40	64	244094	54.3811	ug/L		87
8) Trichlorofluoromethane	5.90	101	568207	53.1418	ug/L		99
9) Diethyl ether	6.44	59	479443	107.5968	ug/L		83
10) Isoprene	6.48	67	421660	47.9451	ug/L		82
11) Acrolein	6.67	56	35973	73.6884	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	306031	50.5621	ug/L		98
13) Acetone	6.78	43	74168	59.7686	ug/L	#	76
14) 1,1-Dichloroethene	7.01	61	456754	52.0993	ug/L		85
15) Tert-Butyl Alcohol	7.10	59	70568	183.3354	ug/L		92
16) Dimethyl Sulfide	7.28	62	297782	47.5344	ug/L		80
17) Iodomethane	7.54	142	227770	44.6165	ug/L		97
18) Methyl acetate	7.53	43	139025	44.6708	ug/L	#	85
19) Methylene Chloride	7.79	84	328782	49.6045	ug/L		63
20) Carbon Disulfide	7.86	76	893403	47.3504	ug/L		99
21) Acrylonitrile	7.97	53	79247	55.1109	ug/L		98
22) Methyl Tert Butyl Ether	8.00	73	740904	50.9752	ug/L		91
23) trans-1,2-Dichloroethene	8.25	96	317400	50.3042	ug/L		81
24) n-Hexane	8.33	57	369872	51.8385	ug/L		86
25) Diisopropyl ether	8.65	45	1801785	110.9264	ug/L	#	91
26) Vinyl Acetate	8.83	43	394837	87.5702	ug/L	#	88
27) 1,1-Dichloroethane	8.87	63	552093	52.8227	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1768911	107.4810	ug/L		92
29) 2-Butanone	9.41	43	81728	52.2561	ug/L	#	81
30) Propionitrile	9.52	54	55269	108.3582	ug/L		99
31) 2,2-Dichloropropane	9.64	77	397283	49.9627	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	345002	49.7355	ug/L		93
33) Chloroform	9.91	83	556611	46.7474	ug/L		95
34) 1-Bromopropane	10.05	122	62702	50.9719	ug/L		99
35) Bromochloromethane	10.14	130	190232	52.0965	ug/L		99
36) Tetrahydrofuran	10.18	42	105662	102.5910	ug/L	#	73
38) 1,1,1-Trichloroethane	10.45	97	490145	50.6334	ug/L		92
39) Cyclohexane	10.49	56	442080	49.3863	ug/L		80
40) 1,1-Dichloropropene	10.65	75	417570	51.0293	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	1610288	103.0500	ug/L		93
42) Carbon Tetrachloride	10.80	117	434864	56.9724	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146599.D 8260BWT.M Fri Apr 21 14:39:44 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:37:39 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

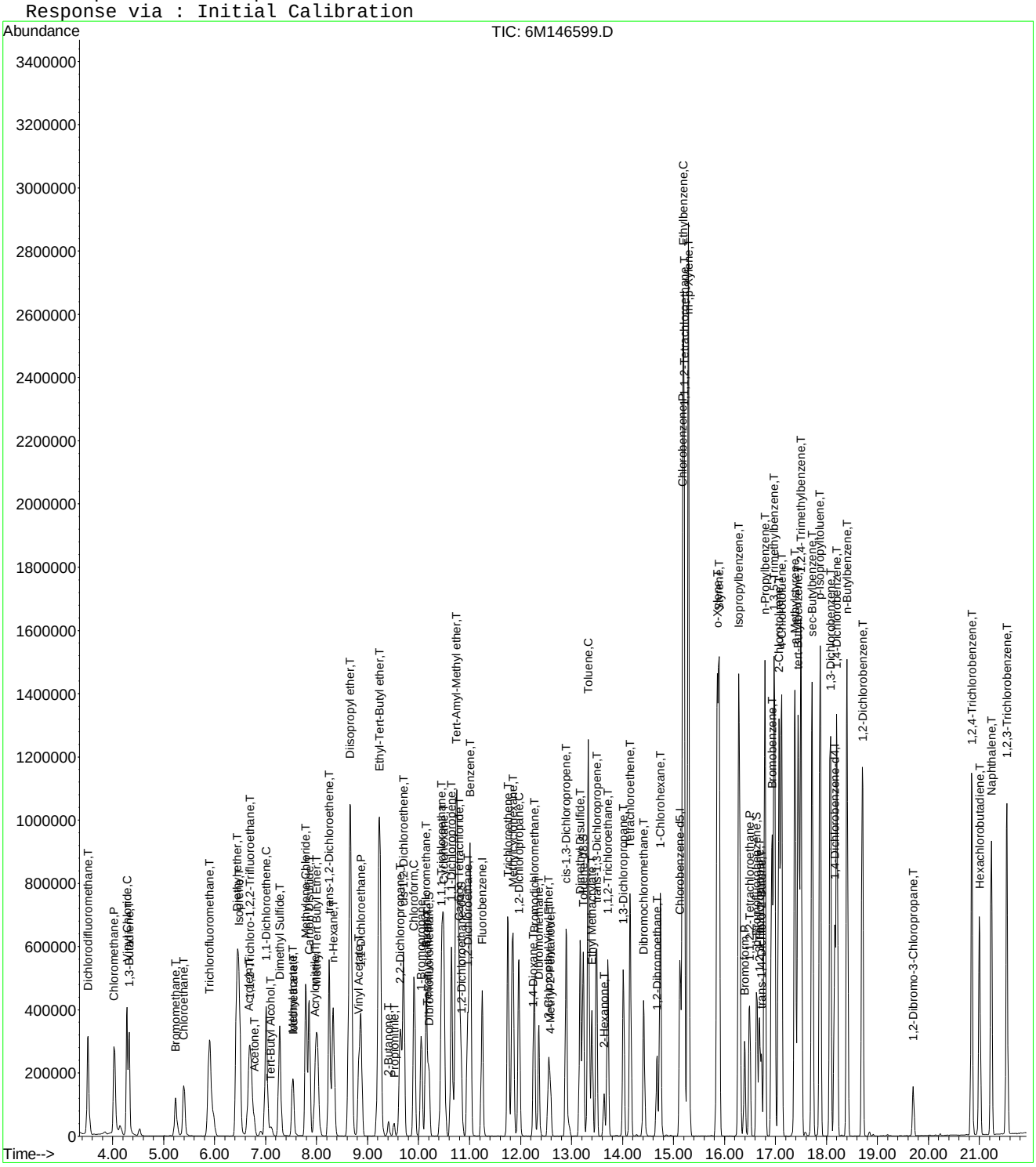
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	380258	51.3359	ug/L		89
46)	Benzene	11.01	78	1202538	48.8750	ug/L		88
47)	Trichloroethene	11.76	130	312104	46.6023	ug/L		91
48)	Methylcyclohexane	11.85	83	455224	47.0469	ug/L		83
49)	1,2-Dichloropropane	11.97	63	299285	51.5416	ug/L		93
50)	1,4-Dioxane	12.25	88	12231	289.6886	ug/L		86
51)	Bromodichloromethane	12.27	83	424198	51.7500	ug/L		100
52)	Dibromomethane	12.36	93	173502	50.7332	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.54	63	123286	54.1283	ug/L		100
54)	4-Methyl-2-Pentanone	12.59	58	74281	49.7168	ug/L		86
55)	cis-1,3-Dichloropropene	12.89	75	491547	54.4544	ug/L		96
56)	Dimethyl Disulfide	13.17	79	260649	45.7698	ug/L		92
59)	Toluene	13.33	91	1257554	48.4057	ug/L		100
60)	Ethyl Methacrylate	13.40	69	296687	47.1919	ug/L		73
62)	trans-1,3-Dichloropropene	13.49	75	424968	53.0512	ug/L		97
63)	1,1,2-Trichloroethane	13.71	97	237674	48.5461	ug/L		99
64)	2-Hexanone	13.64	43	117150	49.8307	ug/L		86
65)	1,3-Dichloropropane	14.01	76	405905	49.3915	ug/L		74
66)	Tetrachloroethene	14.15	166	296961	47.1712	ug/L		94
67)	Dibromochloromethane	14.41	129	303324	50.1186	ug/L		99
68)	1,2-Dibromoethane	14.68	107	225316	47.9291	ug/L		99
69)	1-Chlorohexane	14.74	91	394081	46.9739	ug/L		80
70)	Chlorobenzene	15.18	112	859794	48.3545	ug/L		98
71)	1,1,1,2-Tetrachloroethane	15.21	131	323154	50.7491	ug/L		98
72)	Ethylbenzene	15.20	106	468971	48.7203	ug/L		98
73)	m-,p-Xylene	15.29	106	1135900	98.7269	ug/L		95
74)	o-Xylene	15.86	106	551442	49.6675	ug/L		96
75)	Styrene	15.89	104	967143	51.8891	ug/L		98
76)	Bromoform	16.39	173	185434	50.2787	ug/L		99
77)	Isopropylbenzene	16.28	105	1395769	50.2361	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	298413	51.2076	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	83746	48.6640	ug/L	#	51
82)	trans-1,4-Dichloro-2-Buten	16.72	53	63994	51.7144	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1692898	49.9707	ug/L		100
84)	Bromobenzene	16.94	156	364523	47.8961	ug/L		78
85)	1,3,5-Trimethylbenzene	16.98	105	1212359	50.4964	ug/L		99
86)	2-Chlorotoluene	17.07	91	1034331	45.8535	ug/L		92
87)	4-Chlorotoluene	17.12	91	1088897	54.6180	ug/L		92
88)	a-Methylstyrene	17.38	118	602637	45.3905	ug/L		99
89)	tert-Butylbenzene	17.45	134	249952	49.6853	ug/L		77
90)	1,2,4-Trimethylbenzene	17.50	105	1288507	52.2572	ug/L		88
91)	sec-Butylbenzene	17.72	105	1498350	50.6072	ug/L		97
92)	p-Isopropyltoluene	17.87	119	1270750	51.0231	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	703137	48.9210	ug/L		97
94)	1,4-Dichlorobenzene	18.20	146	703692	48.4145	ug/L		96
95)	n-Butylbenzene	18.41	91	1195600	52.5719	ug/L		98
96)	1,2-Dichlorobenzene	18.71	146	653629	48.5174	ug/L		97
97)	1,2-Dibromo-3-Chloropropan	19.70	75	53783	50.9526	ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	477100	48.4011	ug/L		99
99)	Hexachlorobutadiene	21.01	225	185046	49.1503	ug/L		100
100)	Naphthalene	21.23	128	961806	48.7300	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	431193	45.3123	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146599.D 8260BWT.M Fri Apr 21 14:39:45 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:37 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: Hpms6
Initial cal date: 5 Apr 2017 20:34
CCV date: 21 Apr 2017 13:54
CCV Filename: 6M146599.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	643185	11.26	452398	15.14	244954	18.17
CCV	575056	11.25	415536	15.13	223753	18.16

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	89	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4071	-2.6	85	0.00
3	P	Chloromethane	0.5473	0.4163	23.9#	80	0.01
4	C	Vinyl Chloride	0.4535	0.4276	5.7	85	0.01
5	T	1,3-Butadiene	0.1682	0.1579	6.1	80	0.01
6	T	Bromomethane	0.1958	0.1333	31.9#	54	0.02
7	T	Chloroethane	0.1951	0.2122	-8.8	93	0.02
8	T	Trichlorofluoromethane	0.4648	0.4940	-6.3	92	0.00
9	T	Diethyl ether	0.1937	0.2084	-7.6	97	0.00
10	T	Isoprene	0.3823	0.3666	4.1	85	0.00
11	T	Acrolein	0.0212	0.0313	-47.4#	131	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2661	-1.1	90	0.00
13	T	Acetone	0.0539	0.0645	-19.5	104	0.00
14	C	1,1-Dichloroethene	0.3811	0.3971	-4.2	92	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0153	8.3	96	-0.02
16	T	Dimethyl Sulfide	0.2723	0.2589	4.9	84	0.00
17	T	Iodomethane	0.1863	0.1980	-6.3	83	0.00
18	T	Methyl acetate	0.1353	0.1209	10.7	81	0.00
19	T	Methylene Chloride	0.2882	0.2859	0.8	90	0.00
20	T	Carbon Disulfide	0.8203	0.7768	5.3	83	0.00
21	T	Acrylonitrile	0.0625	0.0689	-10.2	93	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6442	-1.9	91	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2760	-0.6	89	0.00
24	T	n-Hexane	0.3102	0.3216	-3.7	92	0.00
25	T	Diisopropyl ether	0.7062	0.7833	-10.9	101	-0.01
26	T	Vinyl Acetate	0.1960	0.3433	-75.1#	185	0.00
27	P	1,1-Dichloroethane	0.4544	0.4800	-5.6	95	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7690	-7.5	98	0.00
29	T	2-Butanone	0.0680	0.0711	-4.5	96	0.00
30	T	Propionitrile	0.0222	0.0240	-8.4	95	0.00
31	T	2,2-Dichloropropane	0.3457	0.3454	0.1	112	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3000	0.5	89	0.00
33	C	Chloroform	0.5176	0.4840	6.5	91	0.00
34		1-Bromopropane	0.0535	0.0545	-1.9	85	0.00
35	T	Bromochloromethane	0.1588	0.1654	-4.2	88	-0.01
36	T	Tetrahydrofuran	0.0448	0.0459	-2.6	95	0.00
37	S	Dibromofluoromethane	0.2552	0.2717	-6.5	94	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4262	-1.3	90	-0.01
39	T	Cyclohexane	0.3892	0.3844	1.2	87	0.00
40	T	1,1-Dichloropropene	0.3558	0.3631	-2.1	91	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.7001	-3.1	94	0.00
42	T	Carbon Tetrachloride	0.3318	0.3781	-13.9	92	-0.01
43	S	1,2-Dichloroethane-d4	0.2515	0.2651	-5.4	94	0.00
44		Heptane	0.0000	0.0000	0.0	95	0.00
45	T	1,2-Dichloroethane	0.3220	0.3306	-2.7	92	0.00
46	T	Benzene	1.0697	1.0456	2.3	91	0.00
47	T	Trichloroethene	0.2912	0.2714	6.8	80	0.00
48	T	Methylcyclohexane	0.4207	0.3958	5.9	84	0.00
49	C	1,2-Dichloropropane	0.2524	0.2602	-3.1	91	0.00
50	T	1,4-Dioxane	0.0018	0.0027	-44.6#	124	0.00
51	T	Bromodichloromethane	0.3564	0.3688	-3.5	89	0.00
52	T	Dibromomethane	0.1487	0.1509	-1.5	88	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.1072	-8.3	90	-0.01
54	T	4-Methyl-2-Pentanone	0.0649	0.0646	0.6	90	0.00

(#) = Out of Range
6M146599.D 8260BWT.M Fri Apr 21 14:39:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4274	-8.9	94	-0.01
56	T	Dimethyl Disulfide	0.2476	0.2266	8.5	82	-0.01
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	92	0.00
58	S	Toluene-d8	1.2757	1.3136	-3.0	95	0.00
59	C	Toluene	1.5630	1.5132	3.2	90	0.00
60	T	Ethyl Methacrylate	0.3782	0.3570	5.6	85	0.00
61		Paraldehyde	0.0000	0.0000	0.0	89	0.09
62	T	trans-1,3-Dichloropropene	0.4819	0.5113	-6.1	95	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2860	2.9	88	-0.01
64	T	2-Hexanone	0.1414	0.1410	0.3	93	0.00
65	T	1,3-Dichloropropane	0.4944	0.4884	1.2	90	0.00
66	T	Tetrachloroethene	0.3787	0.3573	5.7	85	-0.01
67	T	Dibromochloromethane	0.3641	0.3650	-0.2	88	-0.01
68	T	1,2-Dibromoethane	0.2828	0.2711	4.1	87	0.00
69	T	1-Chlorohexane	0.5047	0.4742	6.1	85	-0.01
70	P	Chlorobenzene	1.0698	1.0346	3.3	89	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3888	-1.5	89	0.00
72	C	Ethylbenzene	0.5791	0.5643	2.6	89	0.00
73	T	m-,p-Xylene	0.6922	0.6834	1.3	90	0.00
74	T	o-Xylene	0.6680	0.6635	0.7	90	0.00
75	T	Styrene	1.1214	1.1637	-3.8	91	-0.01
76	P	Bromoform	0.2219	0.2231	-0.6	86	-0.01
77	T	Isopropylbenzene	1.6716	1.6795	-0.5	91	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	91	-0.01
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6668	-2.4	101	0.00
80	S	p-Bromofluorobenzene	0.9495	0.9738	-2.6	95	-0.01
81	T	1,2,3-Trichloropropane	0.1923	0.1871	2.7	90	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1430	-3.4	92	-0.01
83	T	n-Propylbenzene	3.7852	3.7830	0.1	92	0.00
84	T	Bromobenzene	0.8504	0.8146	4.2	89	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.7092	-1.0	94	-0.01
86	T	2-Chlorotoluene	2.5203	2.3113	8.3	88	-0.01
87	T	4-Chlorotoluene	2.2275	2.4333	-9.2	102	0.00
88	T	a-Methylstyrene	1.4834	1.3467	9.2	84	0.00
89	T	tert-Butylbenzene	0.5621	0.5585	0.6	90	-0.01
90	T	1,2,4-Trimethylbenzene	2.7549	2.8793	-4.5	96	-0.01
91	T	sec-Butylbenzene	3.3081	3.3482	-1.2	93	0.00
92	T	p-Isopropyltoluene	2.7827	2.8396	-2.0	93	-0.01
93	T	1,3-Dichlorobenzene	1.6059	1.5712	2.2	91	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5725	3.2	91	-0.01
95	T	n-Butylbenzene	2.5410	2.6717	-5.1	96	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4606	3.0	91	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1202	-1.9	92	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	1.0661	3.2	90	0.00
99	T	Hexachlorobutadiene	0.4207	0.4135	1.7	92	0.00
100	T	Naphthalene	2.2053	2.1493	2.5	88	-0.01
101	T	1,2,3-Trichlorobenzene	1.0632	0.9636	9.4	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146599.D 8260BWT.M Fri Apr 21 14:39:51 2017 Page 2

Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	89	0.00
2	T	Dichlorodifluoromethane	50.0000	51.2848	-2.6	85	0.00
3	P	Chloromethane	50.0000	44.9254	10.1	80	0.01
4	C	Vinyl Chloride	50.0000	47.1433	5.7	85	0.01
5	T	1,3-Butadiene	50.0000	46.5277	6.9	80	0.01
6	T	Bromomethane	50.0000	34.0375	31.9#	54	0.02
7	T	Chloroethane	50.0000	54.3811	-8.8	93	0.02
8	T	Trichlorofluoromethane	50.0000	53.1418	-6.3	92	0.00
9	T	Diethyl ether	100.0000	107.5969	-7.6	97	0.00
10	T	Isoprene	50.0000	47.9451	4.1	85	0.00
11	T	Acrolein	50.0000	73.6884	-47.4#	131	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	50.5621	-1.1	90	0.00
13	T	Acetone	50.0000	59.7686	-19.5	104	0.00
14	C	1,1-Dichloroethene	50.0000	52.0993	-4.2	92	0.00
15	T	Tert-Butyl Alcohol	200.0000	183.3354	8.3	96	-0.02
16	T	Dimethyl Sulfide	50.0000	47.5344	4.9	84	0.00
17	T	Iodomethane	50.0000	44.6165	10.8	83	0.00
18	T	Methyl acetate	50.0000	44.6708	10.7	81	0.00
19	T	Methylene Chloride	50.0000	49.6045	0.8	90	0.00
20	T	Carbon Disulfide	50.0000	47.3503	5.3	83	0.00
21	T	Acrylonitrile	50.0000	55.1109	-10.2	93	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.9752	-2.0	91	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	50.3042	-0.6	89	0.00
24	T	n-Hexane	50.0000	51.8385	-3.7	92	0.00
25	T	Diisopropyl ether	100.0000	110.9264	-10.9	101	-0.01
26	T	Vinyl Acetate	50.0000	87.5702	-75.1#	185	0.00
27	P	1,1-Dichloroethane	50.0000	52.8227	-5.6	95	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	107.4810	-7.5	98	0.00
29	T	2-Butanone	50.0000	52.2561	-4.5	96	0.00
30	T	Propionitrile	100.0000	108.3582	-8.4	95	0.00
31	T	2,2-Dichloropropane	50.0000	49.9627	0.1	112	0.00
32	T	cis-1,2-Dichloroethene	50.0000	49.7355	0.5	89	0.00
33	C	Chloroform	50.0000	46.7474	6.5	91	0.00
34		1-Bromopropane	50.0000	50.9719	-1.9	85	0.00
35	T	Bromochloromethane	50.0000	52.0965	-4.2	88	-0.01
36	T	Tetrahydrofuran	100.0000	102.5910	-2.6	95	0.00
37	S	Dibromofluoromethane	25.0000	26.6182	-6.5	94	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.6334	-1.3	90	-0.01
39	T	Cyclohexane	50.0000	49.3863	1.2	87	0.00
40	T	1,1-Dichloropropene	50.0000	51.0293	-2.1	91	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	103.0500	-3.1	94	0.00
42	T	Carbon Tetrachloride	50.0000	56.9724	-13.9	92	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.3494	-5.4	94	0.00
44		Heptane	-1.0000	0.0000	0.0	95	0.00
45	T	1,2-Dichloroethane	50.0000	51.3359	-2.7	92	0.00
46	T	Benzene	50.0000	48.8750	2.3	91	0.00
47	T	Trichloroethene	50.0000	46.6024	6.8	80	0.00
48	T	Methylcyclohexane	50.0000	47.0469	5.9	84	0.00
49	C	1,2-Dichloropropane	50.0000	51.5416	-3.1	91	0.00
50	T	1,4-Dioxane	200.0000	289.6886	-44.8#	124	0.00
51	T	Bromodichloromethane	50.0000	51.7500	-3.5	89	0.00
52	T	Dibromomethane	50.0000	50.7332	-1.5	88	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	54.1283	-8.3	90	-0.01
54	T	4-Methyl-2-Pentanone	50.0000	49.7168	0.6	90	0.00

(#) = Out of Range
6M146599.D 8260BWT.M Fri Apr 21 14:39:53 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146599.D Vial: 2
Acq On : 21 Apr 2017 13:54 Operator: TMB
Sample : WG611068-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	54.4544	-8.9	94	-0.01
56	T	Dimethyl Disulfide	50.0000	45.7698	8.5	82	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	92	0.00
58	S	Toluene-d8	25.0000	25.7429	-3.0	95	0.00
59	C	Toluene	50.0000	48.4057	3.2	90	0.00
60	T	Ethyl Methacrylate	50.0000	47.1919	5.6	85	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	89	0.09
62	T	trans-1,3-Dichloropropene	50.0000	53.0512	-6.1	95	0.00
63	T	1,1,2-Trichloroethane	50.0000	48.5461	2.9	88	-0.01
64	T	2-Hexanone	50.0000	49.8307	0.3	93	0.00
65	T	1,3-Dichloropropane	50.0000	49.3915	1.2	90	0.00
66	T	Tetrachloroethene	50.0000	47.1711	5.7	85	-0.01
67	T	Dibromochloromethane	50.0000	50.1186	-0.2	88	-0.01
68	T	1,2-Dibromoethane	50.0000	47.9291	4.1	87	0.00
69	T	1-Chlorohexane	50.0000	46.9739	6.1	85	-0.01
70	P	Chlorobenzene	50.0000	48.3545	3.3	89	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.7491	-1.5	89	0.00
72	C	Ethylbenzene	50.0000	48.7203	2.6	89	0.00
73	T	m-,p-Xylene	100.0000	98.7269	1.3	90	0.00
74	T	o-Xylene	50.0000	49.6675	0.7	90	0.00
75	T	Styrene	50.0000	51.8891	-3.8	91	-0.01
76	P	Bromoform	50.0000	50.2787	-0.6	86	-0.01
77	T	Isopropylbenzene	50.0000	50.2361	-0.5	91	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	91	-0.01
79	P	1,1,2,2-Tetrachloroethane	50.0000	51.2076	-2.4	101	0.00
80	S	p-Bromofluorobenzene	25.0000	25.6407	-2.6	95	-0.01
81	T	1,2,3-Trichloropropane	50.0000	48.6640	2.7	90	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	51.7144	-3.4	92	-0.01
83	T	n-Propylbenzene	50.0000	49.9707	0.1	92	0.00
84	T	Bromobenzene	50.0000	47.8961	4.2	89	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	50.4964	-1.0	94	-0.01
86	T	2-Chlorotoluene	50.0000	45.8535	8.3	88	-0.01
87	T	4-Chlorotoluene	50.0000	54.6180	-9.2	102	0.00
88	T	a-Methylstyrene	50.0000	45.3905	9.2	84	0.00
89	T	tert-Butylbenzene	50.0000	49.6853	0.6	90	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	52.2572	-4.5	96	-0.01
91	T	sec-Butylbenzene	50.0000	50.6072	-1.2	93	0.00
92	T	p-Isopropyltoluene	50.0000	51.0230	-2.0	93	-0.01
93	T	1,3-Dichlorobenzene	50.0000	48.9210	2.2	91	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.4145	3.2	91	-0.01
95	T	n-Butylbenzene	50.0000	52.5719	-5.1	96	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.5174	3.0	91	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	50.9526	-1.9	92	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	48.4011	3.2	90	0.00
99	T	Hexachlorobutadiene	50.0000	49.1503	1.7	92	0.00
100	T	Naphthalene	50.0000	48.7300	2.5	88	-0.01
101	T	1,2,3-Trichlorobenzene	50.0000	45.3123	9.4	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146599.D 8260BWT.M Fri Apr 21 14:39:53 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:12:08 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	543074	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	400625	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	211768	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	147127	26.5387	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 106.16%				
43) 1,2-Dichloroethane-d4	10.84	65	144389	26.4259	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.72%				
58) Toluene-d8	13.23	98	518731	25.3745	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.48%				
80) p-Bromofluorobenzene	16.63	95	208831	25.9642	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.84%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	455214	52.7939	ug/L		94
3) Chloromethane	4.03	50	482829	48.0320	ug/L		98
4) Vinyl Chloride	4.28	62	512059	51.9746	ug/L		95
5) 1,3-Butadiene	4.32	54	194251	53.2674	ug/L		90
6) Bromomethane	5.24	94	181770	42.7314	ug/L		99
7) Chloroethane	5.40	64	240679	56.7780	ug/L		87
8) Trichlorofluoromethane	5.90	101	557340	55.1951	ug/L		99
9) Diethyl ether	6.43	59	467687	111.1396	ug/L		83
10) Isoprene	6.48	67	427596	51.4833	ug/L		82
11) Acrolein	6.67	56	26817	58.1679	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	299335	52.3683	ug/L		98
13) Acetone	6.77	43	60039	51.2320	ug/L		91
14) 1,1-Dichloroethene	7.01	61	455753	55.0465	ug/L		86
15) Tert-Butyl Alcohol	7.09	59	54184	149.0598	ug/L		93
16) Dimethyl Sulfide	7.28	62	291787	49.3204	ug/L		81
17) Iodomethane	7.53	142	253601	52.4615	ug/L		97
18) Methyl acetate	7.53	43	134084	45.6204	ug/L	#	85
19) Methylene Chloride	7.79	84	326026	52.0855	ug/L		64
20) Carbon Disulfide	7.85	76	880590	49.4198	ug/L		99
21) Acrylonitrile	7.96	53	74978	55.2128	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	701924	51.1374	ug/L		91
23) trans-1,2-Dichloroethene	8.25	96	310896	52.1751	ug/L		81
24) n-Hexane	8.32	57	355723	52.7915	ug/L		86
25) Diisopropyl ether	8.66	45	1795606	117.0561	ug/L	#	91
26) Vinyl Acetate	8.82	43	391944	92.0479	ug/L	#	90
27) 1,1-Dichloroethane	8.87	63	549333	55.6539	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	1730662	111.3497	ug/L		92
29) 2-Butanone	9.41	43	72275	48.9334	ug/L	#	82
30) Propionitrile	9.51	54	49963	103.7242	ug/L		100
31) 2,2-Dichloropropane	9.65	77	399158	53.1547	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	341831	52.1804	ug/L		93
33) Chloroform	9.91	83	546521	48.6031	ug/L		95
34) 1-Bromopropane	10.06	122	60138	51.7666	ug/L		99
35) Bromochloromethane	10.15	130	186194	53.9935	ug/L		100
36) Tetrahydrofuran	10.17	42	98936	101.7176	ug/L	#	75
38) 1,1,1-Trichloroethane	10.45	97	479109	52.4081	ug/L		92
39) Cyclohexane	10.49	56	430775	50.9574	ug/L		81
40) 1,1-Dichloropropene	10.65	75	407520	52.7340	ug/L		84
41) Tert-Amyl-Methyl ether	10.74	73	1548725	104.9470	ug/L		94
42) Carbon Tetrachloride	10.80	117	424221	58.8510	ug/L		99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:12:08 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

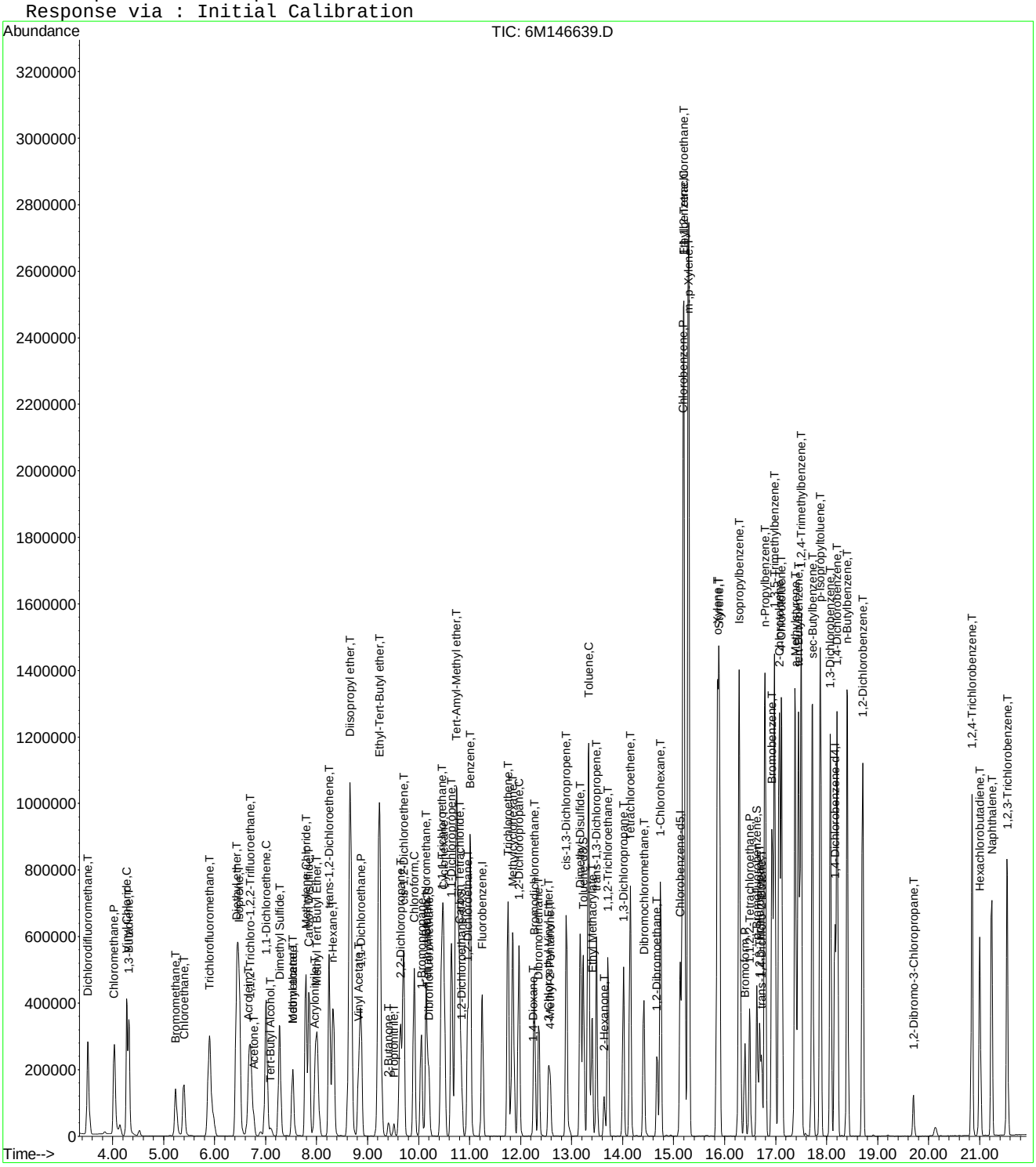
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	370913	53.0232	ug/L		90
46)	Benzene	11.00	78	1182605	50.8954	ug/L		88
47)	Trichloroethene	11.75	130	302175	47.7769	ug/L		92
48)	Methylcyclohexane	11.84	83	435541	47.6635	ug/L		84
49)	1,2-Dichloropropane	11.96	63	297114	54.1810	ug/L		93
50)	1,4-Dioxane	12.24	88	8122	203.6965	ug/L		85
51)	Bromodichloromethane	12.27	83	415322	53.6510	ug/L		99
52)	Dibromomethane	12.35	93	165427	51.2207	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	104756	48.7013	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	67130	47.5766	ug/L		85
55)	cis-1,3-Dichloropropene	12.89	75	479087	56.1996	ug/L		96
56)	Dimethyl Disulfide	13.17	79	251269	46.7211	ug/L		91
59)	Toluene	13.33	91	1224664	48.8942	ug/L		100
60)	Ethyl Methacrylate	13.40	69	275014	45.3726	ug/L		75
62)	trans-1,3-Dichloropropene	13.49	75	411376	53.2659	ug/L		98
63)	1,1,2-Trichloroethane	13.71	97	223961	47.4477	ug/L		99
64)	2-Hexanone	13.64	43	106410	46.9470	ug/L		89
65)	1,3-Dichloropropane	14.02	76	386703	48.8063	ug/L		74
66)	Tetrachloroethene	14.15	166	284943	46.9468	ug/L		94
67)	Dibromochloromethane	14.42	129	283193	48.5339	ug/L		100
68)	1,2-Dibromoethane	14.67	107	210590	46.4639	ug/L		99
69)	1-Chlorohexane	14.74	91	375238	46.3926	ug/L		81
70)	Chlorobenzene	15.18	112	826101	48.1888	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	308784	50.2972	ug/L		97
72)	Ethylbenzene	15.20	106	449716	48.4588	ug/L		99
73)	m-,p-Xylene	15.29	106	1095551	98.7639	ug/L		97
74)	o-Xylene	15.86	106	524468	48.9962	ug/L		98
75)	Styrene	15.90	104	928579	51.6744	ug/L		98
76)	Bromoform	16.40	173	169677	47.7187	ug/L		99
77)	Isopropylbenzene	16.28	105	1329150	49.6189	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	264460	47.9496	ug/L		99
81)	1,2,3-Trichloropropane	16.68	110	73851	45.3429	ug/L	#	50
82)	trans-1,4-Dichloro-2-Buten	16.72	53	59704	50.9782	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1616026	50.4013	ug/L		99
84)	Bromobenzene	16.93	156	342289	47.5200	ug/L		76
85)	1,3,5-Trimethylbenzene	16.98	105	1143434	50.3210	ug/L		99
86)	2-Chlorotoluene	17.07	91	1035496	48.5031	ug/L		99
87)	4-Chlorotoluene	17.11	91	996956	52.8364	ug/L		98
88)	a-Methylstyrene	17.39	118	588448	46.8302	ug/L		98
89)	tert-Butylbenzene	17.45	134	231839	48.6929	ug/L		74
90)	1,2,4-Trimethylbenzene	17.50	105	1217856	52.1872	ug/L		88
91)	sec-Butylbenzene	17.72	105	1405034	50.1412	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1192189	50.5778	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	658503	48.4085	ug/L		97
94)	1,4-Dichlorobenzene	18.20	146	654707	47.5936	ug/L		97
95)	n-Butylbenzene	18.40	91	1121461	52.1027	ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	599320	47.0039	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.71	75	43506	43.5491	ug/L		97
98)	1,2,4-Trichlorobenzene	20.85	180	403588	43.2606	ug/L		100
99)	Hexachlorobutadiene	21.00	225	154786	43.4397	ug/L		100
100)	Naphthalene	21.24	128	753583	40.3412	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	344103	38.2069	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146639.D 8260BWT.M Mon Apr 24 08:41:03 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:36 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	84	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4191	-5.6	82	0.00
3	P	Chloromethane	0.5473	0.4445	18.8	80	0.01
4	C	Vinyl Chloride	0.4535	0.4714	-3.9	88	0.00
5	T	1,3-Butadiene	0.1682	0.1788	-6.4	86	0.00
6	T	Bromomethane	0.1958	0.1674	14.5	64	0.02
7	T	Chloroethane	0.1951	0.2216	-13.6	92	0.02
8	T	Trichlorofluoromethane	0.4648	0.5131	-10.4	90	0.01
9	T	Diethyl ether	0.1937	0.2153	-11.1	95	0.00
10	T	Isoprene	0.3823	0.3937	-3.0	86	0.01
11	T	Acrolein	0.0212	0.0247	-16.4	97	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2756	-4.7	88	0.01
13	T	Acetone	0.0539	0.0553	-2.5	84	0.00
14	C	1,1-Dichloroethene	0.3811	0.4196	-10.1	92	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0125	25.5#	73	-0.03
16	T	Dimethyl Sulfide	0.2723	0.2686	1.4	82	0.00
17	T	Iodomethane	0.1863	0.2335	-25.3#	92	0.00
18	T	Methyl acetate	0.1353	0.1235	8.8	78	0.00
19	T	Methylene Chloride	0.2882	0.3002	-4.2	89	0.00
20	T	Carbon Disulfide	0.8203	0.8107	1.2	81	0.00
21	T	Acrylonitrile	0.0625	0.0690	-10.4	88	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6462	-2.3	86	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2862	-4.4	88	0.00
24	T	n-Hexane	0.3102	0.3275	-5.6	89	0.00
25	T	Diisopropyl ether	0.7062	0.8266	-17.1	101	0.00
26	T	Vinyl Acetate	0.1960	0.3609	-84.1#	183	0.00
27	P	1,1-Dichloroethane	0.4544	0.5058	-11.3	94	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7967	-11.4	96	0.00
29	T	2-Butanone	0.0680	0.0665	2.1	85	0.00
30	T	Propionitrile	0.0222	0.0230	-3.7	85	0.00
31	T	2,2-Dichloropropane	0.3457	0.3675	-6.3	112	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3147	-4.4	88	0.00
33	C	Chloroform	0.5176	0.5032	2.8	89	0.00
34		1-Bromopropane	0.0535	0.0554	-3.5	82	0.00
35	T	Bromochloromethane	0.1588	0.1714	-8.0	86	0.00
36	T	Tetrahydrofuran	0.0448	0.0455	-1.7	89	0.00
37	S	Dibromofluoromethane	0.2552	0.2709	-6.2	88	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4411	-4.8	88	0.00
39	T	Cyclohexane	0.3892	0.3966	-1.9	84	0.00
40	T	1,1-Dichloropropene	0.3558	0.3752	-5.5	89	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.7129	-4.9	90	0.00
42	T	Carbon Tetrachloride	0.3318	0.3906	-17.7	90	0.00
43	S	1,2-Dichloroethane-d4	0.2515	0.2659	-5.7	89	0.00
44		Heptane	0.0000	0.0000	0.0	91	0.00
45	T	1,2-Dichloroethane	0.3220	0.3415	-6.0	90	0.00
46	T	Benzene	1.0697	1.0888	-1.8	90	0.00
47	T	Trichloroethene	0.2912	0.2782	4.4	78	0.00
48	T	Methylcyclohexane	0.4207	0.4010	4.7	80	0.00
49	C	1,2-Dichloropropane	0.2524	0.2736	-8.4	90	0.00
50	T	1,4-Dioxane	0.0018	0.0019	-1.6	83	0.00
51	T	Bromodichloromethane	0.3564	0.3824	-7.3	88	0.00
52	T	Dibromomethane	0.1487	0.1523	-2.4	84	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.0964	2.6	77	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0618	4.8	82	0.00

(#) = Out of Range

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4411	-12.4	91	0.00
56	T	Dimethyl Disulfide	0.2476	0.2313	6.6	79	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	89	0.00
58	S	Toluene-d8	1.2757	1.2948	-1.5	91	0.00
59	C	Toluene	1.5630	1.5284	2.2	88	0.00
60	T	Ethyl Methacrylate	0.3782	0.3432	9.3	79	0.00
61		Paraldehyde	0.0000	0.0000	0.0	87	0.09
62	T	trans-1,3-Dichloropropene	0.4819	0.5134	-6.5	92	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2795	5.1	83	0.00
64	T	2-Hexanone	0.1414	0.1328	6.1	84	0.00
65	T	1,3-Dichloropropane	0.4944	0.4826	2.4	86	0.00
66	T	Tetrachloroethene	0.3787	0.3556	6.1	82	0.00
67	T	Dibromochloromethane	0.3641	0.3534	2.9	82	0.00
68	T	1,2-Dibromoethane	0.2828	0.2628	7.1	81	0.00
69	T	1-Chlorohexane	0.5047	0.4683	7.2	81	0.00
70	P	Chlorobenzene	1.0698	1.0310	3.6	86	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3854	-0.6	85	0.00
72	C	Ethylbenzene	0.5791	0.5613	3.1	86	0.00
73	T	m-,p-Xylene	0.6922	0.6836	1.2	87	0.00
74	T	o-Xylene	0.6680	0.6546	2.0	86	0.00
75	T	Styrene	1.1214	1.1589	-3.3	88	0.00
76	P	Bromoform	0.2219	0.2118	4.6	79	0.00
77	T	Isopropylbenzene	1.6716	1.6588	0.8	86	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	86	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6244	4.1	89	0.00
80	S	p-Bromofluorobenzene	0.9495	0.9861	-3.9	91	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1744	9.3	79	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1410	-2.0	86	0.00
83	T	n-Propylbenzene	3.7852	3.8156	-0.8	88	0.00
84	T	Bromobenzene	0.8504	0.8082	5.0	83	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.6997	-0.6	88	0.00
86	T	2-Chlorotoluene	2.5203	2.4449	3.0	88	0.00
87	T	4-Chlorotoluene	2.2275	2.3539	-5.7	93	0.00
88	T	a-Methylstyrene	1.4834	1.3894	6.3	82	0.00
89	T	tert-Butylbenzene	0.5621	0.5474	2.6	84	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.8754	-4.4	91	0.00
91	T	sec-Butylbenzene	3.3081	3.3174	-0.3	88	0.00
92	T	p-Isopropyltoluene	2.7827	2.8148	-1.2	88	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.5548	3.2	85	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5458	4.8	85	0.00
95	T	n-Butylbenzene	2.5410	2.6479	-4.2	90	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4150	6.0	83	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1027	12.9	75	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	0.9529	13.5	76	0.00
99	T	Hexachlorobutadiene	0.4207	0.3655	13.1	77	0.00
100	T	Naphthalene	2.2053	1.7793	19.3	69	0.00
101	T	1,2,3-Trichlorobenzene	1.0632	0.8125	23.6#	71	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146639.D 8260BWT.M Mon Apr 24 08:42:10 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	84	0.00
2	T	Dichlorodifluoromethane	50.0000	52.7939	-5.6	82	0.00
3	P	Chloromethane	50.0000	48.0320	3.9	80	0.01
4	C	Vinyl Chloride	50.0000	51.9746	-3.9	88	0.00
5	T	1,3-Butadiene	50.0000	53.2674	-6.5	86	0.00
6	T	Bromomethane	50.0000	42.7314	14.5	64	0.02
7	T	Chloroethane	50.0000	56.7780	-13.6	92	0.02
8	T	Trichlorofluoromethane	50.0000	55.1951	-10.4	90	0.01
9	T	Diethyl ether	100.0000	111.1396	-11.1	95	0.00
10	T	Isoprene	50.0000	51.4834	-3.0	86	0.01
11	T	Acrolein	50.0000	58.1679	-16.3	97	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.3683	-4.7	88	0.01
13	T	Acetone	50.0000	51.2320	-2.5	84	0.00
14	C	1,1-Dichloroethene	50.0000	55.0465	-10.1	92	0.00
15	T	Tert-Butyl Alcohol	200.0000	149.0598	25.5#	73	-0.03
16	T	Dimethyl Sulfide	50.0000	49.3204	1.4	82	0.00
17	T	Iodomethane	50.0000	52.4615	-4.9	92	0.00
18	T	Methyl acetate	50.0000	45.6204	8.8	78	0.00
19	T	Methylene Chloride	50.0000	52.0855	-4.2	89	0.00
20	T	Carbon Disulfide	50.0000	49.4198	1.2	81	0.00
21	T	Acrylonitrile	50.0000	55.2128	-10.4	88	0.00
22	T	Methyl Tert Butyl Ether	50.0000	51.1374	-2.3	86	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	52.1751	-4.4	88	0.00
24	T	n-Hexane	50.0000	52.7915	-5.6	89	0.00
25	T	Diisopropyl ether	100.0000	117.0561	-17.1	101	0.00
26	T	Vinyl Acetate	50.0000	92.0479	-84.1#	183	0.00
27	P	1,1-Dichloroethane	50.0000	55.6539	-11.3	94	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	111.3497	-11.3	96	0.00
29	T	2-Butanone	50.0000	48.9334	2.1	85	0.00
30	T	Propionitrile	100.0000	103.7242	-3.7	85	0.00
31	T	2,2-Dichloropropane	50.0000	53.1547	-6.3	112	0.00
32	T	cis-1,2-Dichloroethene	50.0000	52.1804	-4.4	88	0.00
33	C	Chloroform	50.0000	48.6031	2.8	89	0.00
34		1-Bromopropane	50.0000	51.7666	-3.5	82	0.00
35	T	Bromochloromethane	50.0000	53.9935	-8.0	86	0.00
36	T	Tetrahydrofuran	100.0000	101.7176	-1.7	89	0.00
37	S	Dibromofluoromethane	25.0000	26.5387	-6.2	88	0.00
38	T	1,1,1-Trichloroethane	50.0000	52.4081	-4.8	88	0.00
39	T	Cyclohexane	50.0000	50.9574	-1.9	84	0.00
40	T	1,1-Dichloropropene	50.0000	52.7340	-5.5	89	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	104.9470	-4.9	90	0.00
42	T	Carbon Tetrachloride	50.0000	58.8511	-17.7	90	0.00
43	S	1,2-Dichloroethane-d4	25.0000	26.4259	-5.7	89	0.00
44		Heptane	-1.0000	0.0000	0.0	91	0.00
45	T	1,2-Dichloroethane	50.0000	53.0232	-6.0	90	0.00
46	T	Benzene	50.0000	50.8954	-1.8	90	0.00
47	T	Trichloroethene	50.0000	47.7769	4.4	78	0.00
48	T	Methylcyclohexane	50.0000	47.6635	4.7	80	0.00
49	C	1,2-Dichloropropane	50.0000	54.1810	-8.4	90	0.00
50	T	1,4-Dioxane	200.0000	203.6965	-1.8	83	0.00
51	T	Bromodichloromethane	50.0000	53.6510	-7.3	88	0.00
52	T	Dibromomethane	50.0000	51.2207	-2.4	84	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.7013	2.6	77	0.00
54	T	4-Methyl-2-Pentanone	50.0000	47.5766	4.8	82	0.00

(#) = Out of Range
6M146639.D 8260BWT.M Mon Apr 24 08:42:12 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146639.D Vial: 2
Acq On : 22 Apr 2017 14:50 Operator: JDS
Sample : WG611221-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	56.1996	-12.4	91	0.00
56	T	Dimethyl Disulfide	50.0000	46.7211	6.6	79	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	89	0.00
58	S	Toluene-d8	25.0000	25.3745	-1.5	91	0.00
59	C	Toluene	50.0000	48.8942	2.2	88	0.00
60	T	Ethyl Methacrylate	50.0000	45.3726	9.3	79	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	87	0.09
62	T	trans-1,3-Dichloropropene	50.0000	53.2659	-6.5	92	0.00
63	T	1,1,2-Trichloroethane	50.0000	47.4477	5.1	83	0.00
64	T	2-Hexanone	50.0000	46.9470	6.1	84	0.00
65	T	1,3-Dichloropropane	50.0000	48.8063	2.4	86	0.00
66	T	Tetrachloroethene	50.0000	46.9468	6.1	82	0.00
67	T	Dibromochloromethane	50.0000	48.5339	2.9	82	0.00
68	T	1,2-Dibromoethane	50.0000	46.4639	7.1	81	0.00
69	T	1-Chlorohexane	50.0000	46.3926	7.2	81	0.00
70	P	Chlorobenzene	50.0000	48.1888	3.6	86	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.2972	-0.6	85	0.00
72	C	Ethylbenzene	50.0000	48.4588	3.1	86	0.00
73	T	m-,p-Xylene	100.0000	98.7639	1.2	87	0.00
74	T	o-Xylene	50.0000	48.9962	2.0	86	0.00
75	T	Styrene	50.0000	51.6744	-3.3	88	0.00
76	P	Bromoform	50.0000	47.7186	4.6	79	0.00
77	T	Isopropylbenzene	50.0000	49.6189	0.8	86	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	86	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	47.9496	4.1	89	0.00
80	S	p-Bromofluorobenzene	25.0000	25.9642	-3.9	91	0.00
81	T	1,2,3-Trichloropropane	50.0000	45.3429	9.3	79	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	50.9782	-2.0	86	0.00
83	T	n-Propylbenzene	50.0000	50.4013	-0.8	88	0.00
84	T	Bromobenzene	50.0000	47.5200	5.0	83	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	50.3210	-0.6	88	0.00
86	T	2-Chlorotoluene	50.0000	48.5031	3.0	88	0.00
87	T	4-Chlorotoluene	50.0000	52.8364	-5.7	93	0.00
88	T	a-Methylstyrene	50.0000	46.8302	6.3	82	0.00
89	T	tert-Butylbenzene	50.0000	48.6929	2.6	84	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	52.1872	-4.4	91	0.00
91	T	sec-Butylbenzene	50.0000	50.1412	-0.3	88	0.00
92	T	p-Isopropyltoluene	50.0000	50.5778	-1.2	88	0.00
93	T	1,3-Dichlorobenzene	50.0000	48.4085	3.2	85	0.00
94	T	1,4-Dichlorobenzene	50.0000	47.5936	4.8	85	0.00
95	T	n-Butylbenzene	50.0000	52.1027	-4.2	90	0.00
96	T	1,2-Dichlorobenzene	50.0000	47.0039	6.0	83	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	43.5491	12.9	75	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	43.2606	13.5	76	0.00
99	T	Hexachlorobutadiene	50.0000	43.4397	13.1	77	0.00
100	T	Naphthalene	50.0000	40.3412	19.3	69	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	38.2069	23.6#	71	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146639.D 8260BWT.M Mon Apr 24 08:42:12 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:47:02 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	509056	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	366694	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	187107	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	137669	26.4921 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.96%		
43) 1,2-Dichloroethane-d4	10.84	65	137440	26.8350 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.32%		
58) Toluene-d8	13.23	98	484198	25.8770 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.52%		
80) p-Bromofluorobenzene	16.63	95	191429	26.9375 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.76%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	2556	Below Cal	91
5) 1,3-Butadiene	4.32	54	186	Below Cal #	1
6) Bromomethane	5.24	94	1282	0.3215 ug/L	81
13) Acetone	6.77	43	6363	5.7925 ug/L	98
15) Tert-Butyl Alcohol	7.10	59	4889	14.3484 ug/L #	49
17) Iodomethane	7.54	142	195	0.8269 ug/L #	32
18) Methyl acetate	7.53	43	1712	0.6214 ug/L #	66
20) Carbon Disulfide	7.86	76	4503	0.2696 ug/L #	86
21) Acrylonitrile	7.97	53	284	0.2231 ug/L #	12
22) Methyl Tert Butyl Ether	8.01	73	5067	0.3938 ug/L #	64
24) n-Hexane	8.32	57	921	0.1458 ug/L #	14
26) Vinyl Acetate	8.83	43	4103	1.0280 ug/L #	78
27) 1,1-Dichloroethane	9.00	63	14577	1.5755 ug/L #	43
28) Ethyl-Tert-Butyl ether	9.24	59	1787	0.1227 ug/L #	50
29) 2-Butanone	9.41	43	1425	1.0293 ug/L #	57
30) Propionitrile	9.52	54	1116	2.4717 ug/L #	56
34) 1-Bromopropane	9.86	122	2470	2.2683 ug/L #	1
36) Tetrahydrofuran	10.18	42	3726	4.0867 ug/L	87
39) Cyclohexane	10.71	56	5537	0.6988 ug/L #	46
41) Tert-Amyl-Methyl ether	10.75	73	3493	0.2525 ug/L #	49
50) 1,4-Dioxane	12.25	88	1306	34.9428 ug/L #	58
54) 4-Methyl-2-Pentanone	12.58	58	654	0.4945 ug/L #	38
59) Toluene	13.33	91	3342	0.1458 ug/L	96
60) Ethyl Methacrylate	13.40	69	1122	0.2022 ug/L	78
62) trans-1,3-Dichloropropene	13.49	75	850	0.1202 ug/L #	51
64) 2-Hexanone	13.64	43	1639	0.7900 ug/L	86
65) 1,3-Dichloropropane	14.01	76	1102	0.1520 ug/L #	50
68) 1,2-Dibromoethane	14.68	107	555	0.1338 ug/L	89
72) Ethylbenzene	15.29	106	1401	0.1649 ug/L	50
73) m-,p-Xylene	15.29	106	1401	0.1380 ug/L	91
76) Bromoform	16.40	173	478	0.1469 ug/L #	35
79) 1,1,2,2-Tetrachloroethane	16.49	83	1781	0.3655 ug/L	83
81) 1,2,3-Trichloropropane	16.69	110	201	0.1397 ug/L #	1
86) 2-Chlorotoluene	17.12	91	3422	0.1814 ug/L #	56
87) 4-Chlorotoluene	17.12	91	3422	0.2053 ug/L #	56
91) sec-Butylbenzene	17.71	105	3707	0.1497 ug/L #	77
92) p-Isopropyltoluene	17.87	119	2916	0.1400 ug/L #	48
93) 1,3-Dichlorobenzene	18.08	146	1569	0.1305 ug/L	80
94) 1,4-Dichlorobenzene	18.21	146	1767	0.1454 ug/L #	36
95) n-Butylbenzene	18.41	91	3570	0.1877 ug/L #	71

(#) = qualifier out of range (m) = manual integration
6M146640.D 8260BWT.M Mon Apr 24 08:41:06 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:47:02 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

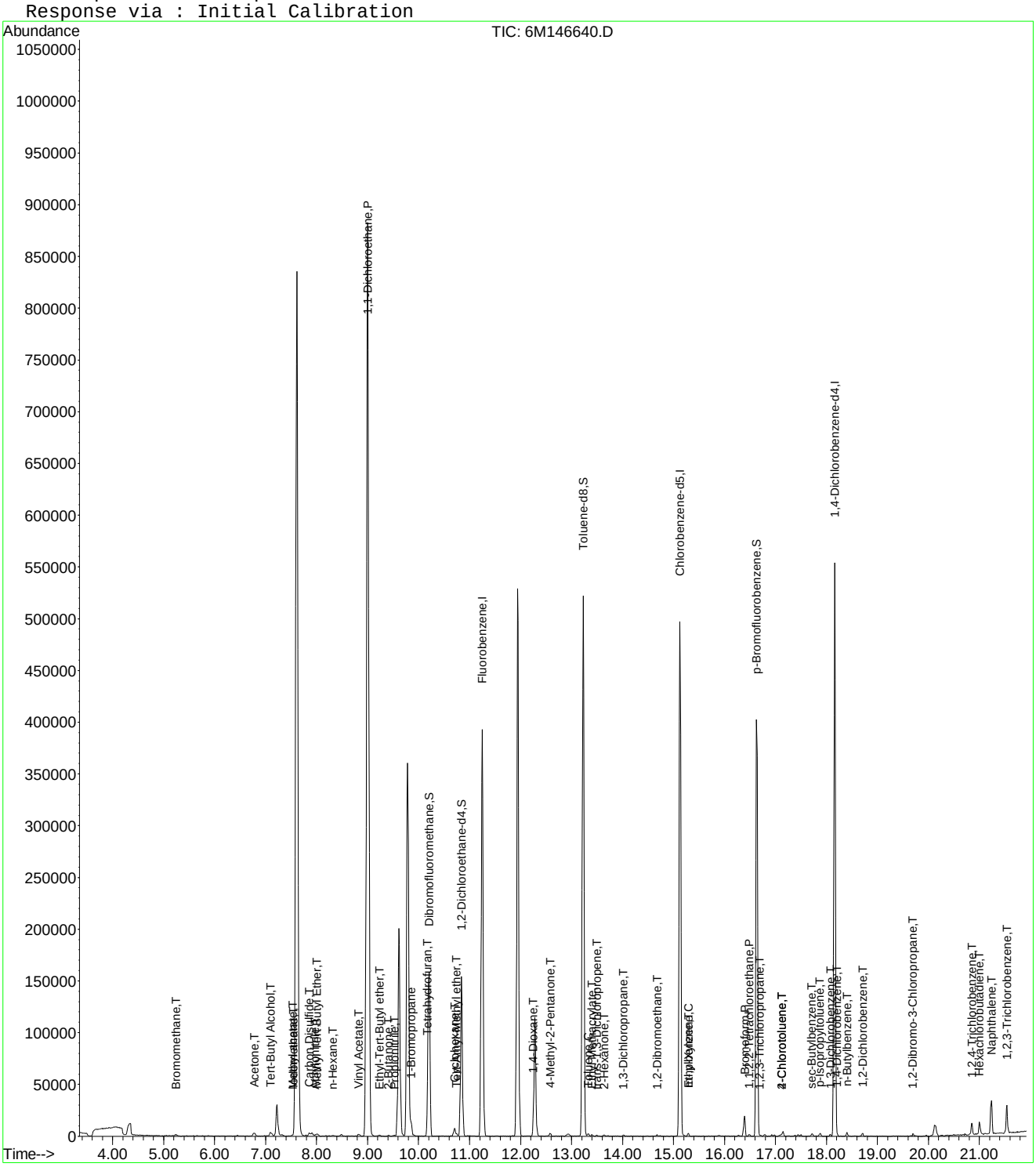
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
96)	1,2-Dichlorobenzene	18.71	146	1964	0.1743 ug/L	91
97)	1,2-Dibromo-3-Chloropropan	19.69	75	919	1.0412 ug/L	89
98)	1,2,4-Trichlorobenzene	20.86	180	6288	0.7628 ug/L	94
99)	Hexachlorobutadiene	21.00	225	4109	1.3052 ug/L	93
100)	Naphthalene	21.23	128	35732	2.1649 ug/L	99
101)	1,2,3-Trichlorobenzene	21.54	180	12339	1.5506 ug/L	98

(#) = qualifier out of range (m) = manual integration
6M146640.D 8260BWT.M Mon Apr 24 08:41:06 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 15:47 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 24 12:52:19 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

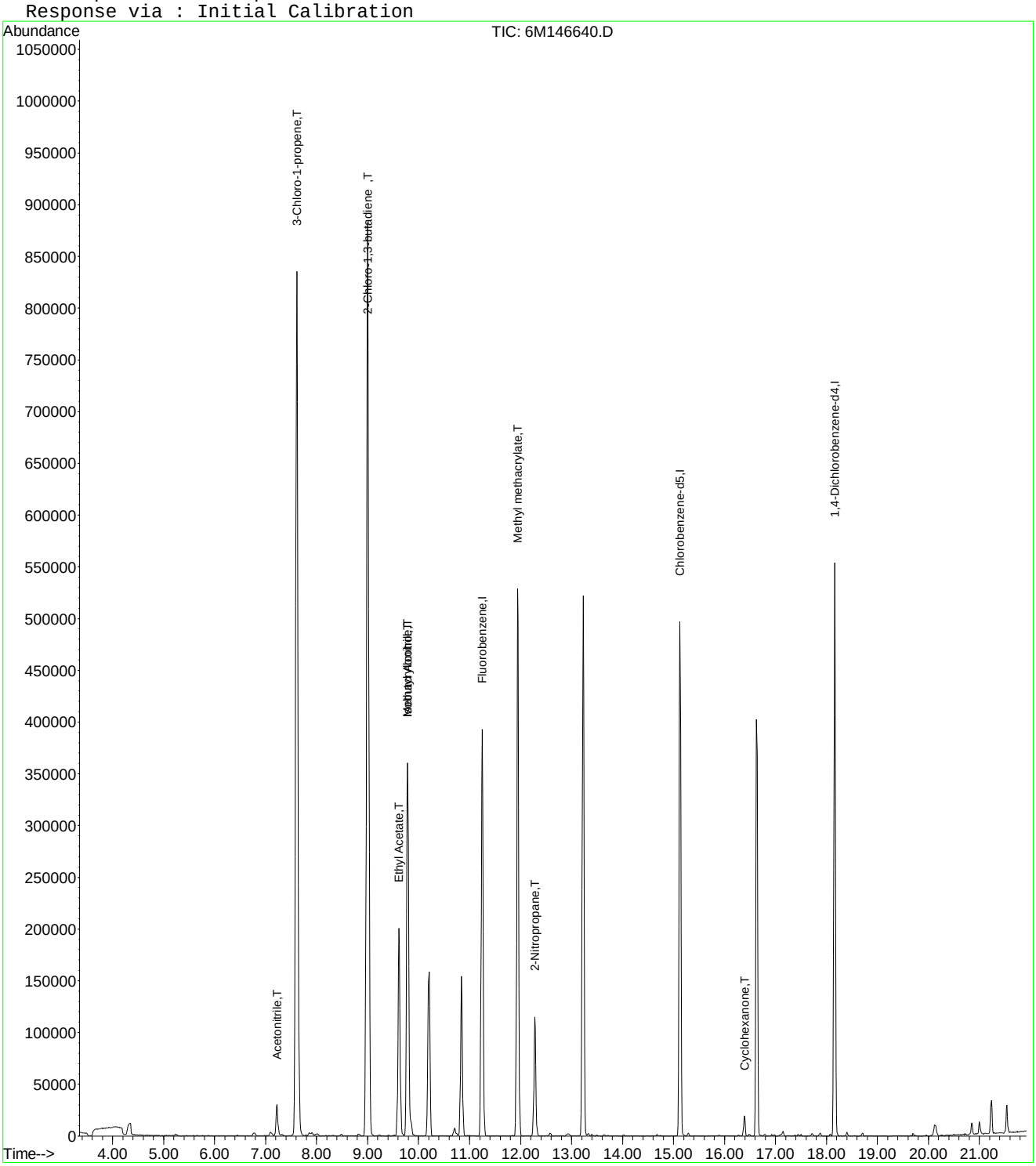
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	509056	25.00	ug/L		-0.02
11) Chlorobenzene-d5	15.13	117	366694	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	187107	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	42707	117.3498	ug/L		98
3) 3-Chloro-1-propene	7.61	41	816326	133.7587	ug/L		94
4) 2-Chloro-1,3-butadiene	9.00	53	818887	108.7149	ug/L		93
5) Ethyl Acetate	9.61	43	331923	101.6692	ug/L		98
6) Methacrylonitrile	9.79	67	174613	101.5916	ug/L		94
7) Isobutyl Alcohol	9.79	43	21516	203.3310	ug/L	#	81
9) Methyl methacrylate	11.94	41	333652	93.4041	ug/L		92
10) 2-Nitropropane	12.28	43	115212	79.3166	ug/L		94
13) Cyclohexanone	16.39	55	11645	164.4902	ug/L		89

(#) = qualifier out of range (m) = manual integration
6M146640.D A9FOOWT.M Mon Apr 24 12:52:20 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 24 12:52 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146640.D Vial: 3
Acq On : 22 Apr 2017 15:25 Operator: JDS
Sample : WG611223-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	60	-0.02
2	T	Acetonitrile	100.0000	117.3498	-17.3	72	0.00
3	T	3-Chloro-1-propene	100.0000	133.7587	-33.8	78	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	108.7149	-8.7	63	0.00
5	T	Ethyl Acetate	100.0000	101.6692	-1.7	59	-0.02
6	T	Methacrylonitrile	100.0000	101.5916	-1.6	59	-0.01
7	T	Isobutyl Alcohol	200.0000	203.3310	-1.7	58	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.15
9	T	Methyl methacrylate	100.0000	93.4041	6.6	53	-0.02
10	T	2-Nitropropane	100.0000	79.3166	20.7	48	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	59	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	54	-0.02
13	T	Cyclohexanone	100.0000	164.4902	-64.5	103	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146640.D A9FOOWT.M Mon Apr 24 12:52:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 13:26:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	894900	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	721248	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	376519	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	240114	25.5810 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.32%		
43) 1,2-Dichloroethane-d4	10.51	65	197349	24.3201 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.28%		
58) Toluene-d8	12.90	98	869007	26.3694 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.48%		
80) p-Bromofluorobenzene	16.29	95	338600	25.4807 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.92%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	682351	56.3428 ug/L	100
3) Chloromethane	3.81	50	759296	50.1499 ug/L	97
4) Vinyl Chloride	4.04	62	681226	47.6432 ug/L	99
5) 1,3-Butadiene	4.09	54	284870	50.7621 ug/L	93
6) Bromomethane	4.95	94	271426	51.6487 ug/L	100
7) Chloroethane	5.11	64	320049	51.2438 ug/L	97
8) Trichlorofluoromethane	5.59	101	810263	52.1742 ug/L	100
9) Diethyl ether	6.12	59	510010	87.1969 ug/L	92
10) Isoprene	6.16	67	586149	47.7365 ug/L	91
11) Acrolein	6.36	56	32796	40.4875 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	460182	51.9645 ug/L	97
13) Acetone	6.46	43	55606	44.1802 ug/L	95
14) 1,1-Dichloroethene	6.69	61	668934	51.6136 ug/L	97
15) Tert-Butyl Alcohol	6.79	59	69991	171.5521 ug/L	99
16) Dimethyl Sulfide	6.96	62	382522	44.3112 ug/L	90
17) Iodomethane	7.22	142	204556	52.8314 ug/L	91
18) Methyl acetate	7.21	43	156309	45.3525 ug/L	91
19) Methylene Chloride	7.48	84	447121	48.0061 ug/L	85
20) Carbon Disulfide	7.52	76	1268431	47.0699 ug/L	100
21) Acrylonitrile	7.65	53	80010	45.8280 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	849194	46.2743 ug/L	95
23) trans-1,2-Dichloroethene	7.92	61	631717	50.0994 ug/L	96
24) n-Hexane	8.00	57	529809	50.3372 ug/L	93
25) Diisopropyl ether	8.33	45	2596958	92.0135 ug/L	96
26) Vinyl Acetate	8.51	43	559328	44.1862 ug/L	96
27) 1,1-Dichloroethane	8.54	63	819303	50.4861 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2173965	90.5723 ug/L	98
29) 2-Butanone	9.09	43	87665	44.4150 ug/L	90
30) Propionitrile	9.20	54	52436	85.7150 ug/L	99
31) 2,2-Dichloropropane	9.32	77	747631	54.5735 ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	527182	50.5827 ug/L	95
33) Chloroform	9.59	83	819852	45.5950 ug/L	97
34) 1-Bromopropane	9.73	122	103676	50.4262 ug/L	99
35) Bromochloromethane	9.82	130	287115	51.0524 ug/L	96
36) Tetrahydrofuran	9.84	42	118030	86.8704 ug/L	88
38) 1,1,1-Trichloroethane	10.12	97	761411	52.4708 ug/L	100
39) Cyclohexane	10.15	56	642354	47.5453 ug/L	92
40) 1,1-Dichloropropene	10.32	75	636866	50.2655 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1923898	89.5126 ug/L	98
42) Carbon Tetrachloride	10.46	117	725532	53.9224 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419088.D 8260WT.M Fri Apr 21 13:52:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 13:26:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

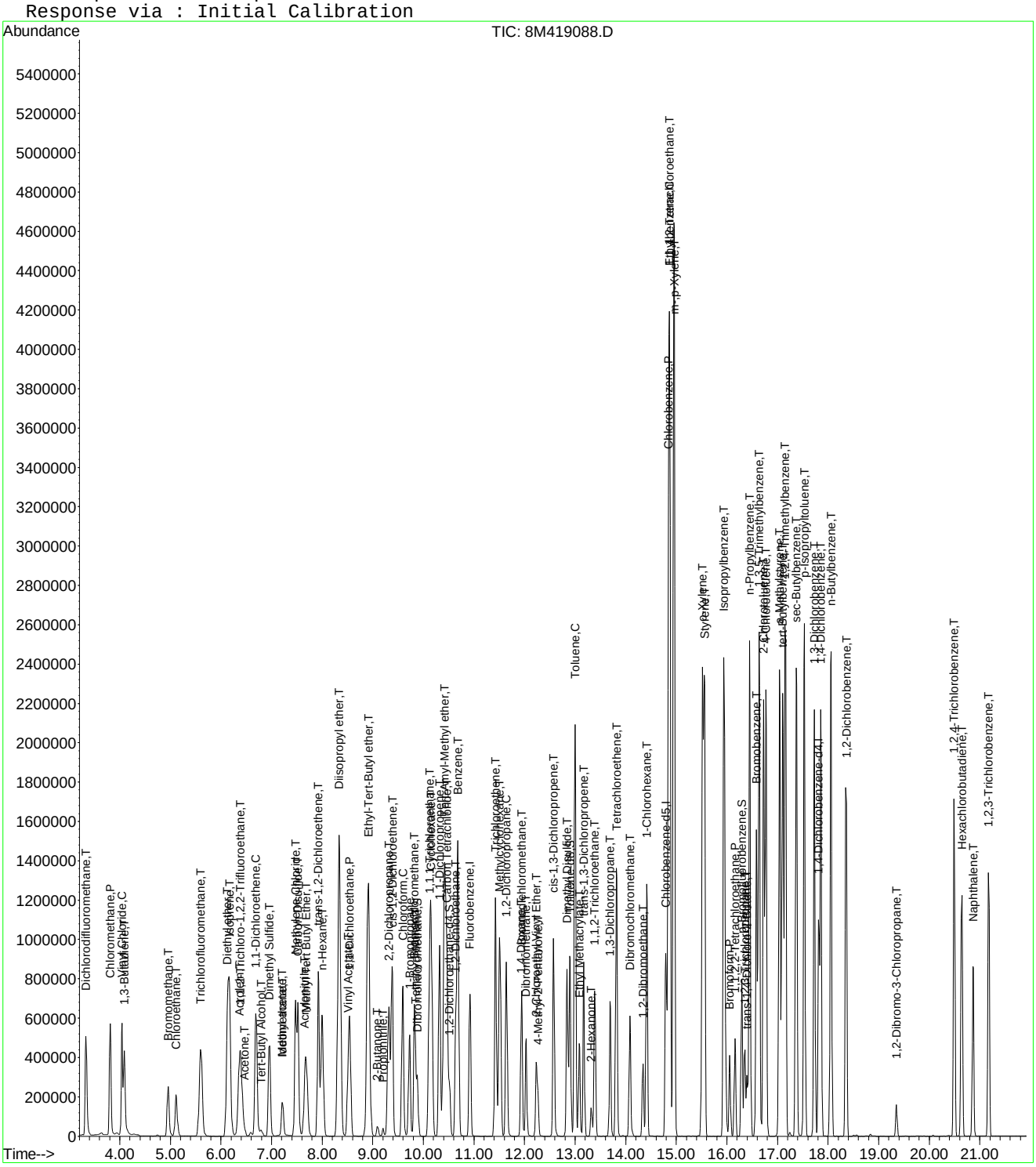
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	496063	48.7879	ug/L	97
46)	Benzene	10.68	78	1843270	49.8588	ug/L	96
47)	Trichloroethene	11.42	130	521534	50.2180	ug/L	97
48)	Methylcyclohexane	11.51	83	674038	48.6883	ug/L	95
49)	1,2-Dichloropropane	11.64	63	436482	48.3397	ug/L	97
50)	Bromodichloromethane	11.94	83	596755	50.5015	ug/L	98
51)	1,4-Dioxane	11.93	88	10333	200.7134	ug/L	88
52)	Dibromomethane	12.02	93	223388	48.0734	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.23	63	178186	45.6080	ug/L	99
54)	4-Methyl-2-Pentanone	12.26	58	75374	43.0710	ug/L	98
55)	cis-1,3-Dichloropropene	12.57	75	692657	51.4708	ug/L	98
56)	Dimethyl Disulfide	12.84	79	331181	43.1093	ug/L	94
59)	Toluene	12.99	91	2033010	50.6389	ug/L	100
60)	Ethyl Methacrylate	13.08	69	345057	45.5563	ug/L	85
62)	trans-1,3-Dichloropropene	13.17	75	570958	49.0386	ug/L	100
63)	1,1,2-Trichloroethane	13.39	97	301877	45.7033	ug/L	96
64)	2-Hexanone	13.32	58	68951	42.5363	ug/L	86
65)	1,3-Dichloropropane	13.69	76	515084	46.1294	ug/L	87
66)	Tetrachloroethene	13.82	164	446322	52.9254	ug/L	97
67)	Dibromochloromethane	14.08	129	427485	50.3649	ug/L	100
68)	1,2-Dibromoethane	14.34	107	308639	47.8369	ug/L	99
69)	1-Chlorohexane	14.41	91	622634	49.0192	ug/L	95
70)	Chlorobenzene	14.84	112	1394993	48.8139	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.87	131	534595	52.7128	ug/L	99
72)	Ethylbenzene	14.87	106	805741	50.3407	ug/L	99
73)	m-,p-Xylene	14.96	106	1927549	103.9904	ug/L	100
74)	o-Xylene	15.52	106	917428	49.2302	ug/L	99
75)	Styrene	15.56	104	1537351	52.6201	ug/L	96
76)	Bromoform	16.05	173	256520	43.7316	ug/L	99
77)	Isopropylbenzene	15.94	105	2292638	51.3807	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.16	83	323782	45.5745	ug/L	96
81)	1,2,3-Trichloropropane	16.35	110	95636	46.9546	ug/L	74
82)	trans-1,4-Dichloro-2-Buten	16.40	53	84531	49.0781	ug/L	68
83)	n-Propylbenzene	16.45	91	2718553	51.5865	ug/L	98
84)	Bromobenzene	16.58	156	616783	49.9514	ug/L	97
85)	1,3,5-Trimethylbenzene	16.63	105	1987182	52.0777	ug/L	97
86)	2-Chlorotoluene	16.73	91	1742066	48.4214	ug/L	92
87)	4-Chlorotoluene	16.77	91	1632323	50.3457	ug/L	98
88)	a-Methylstyrene	17.04	118	1052735	49.2102	ug/L	96
89)	tert-Butylbenzene	17.10	134	438648	50.7733	ug/L	96
90)	1,2,4-Trimethylbenzene	17.15	105	2052790	52.6957	ug/L	96
91)	sec-Butylbenzene	17.37	105	2468105	51.6418	ug/L	98
92)	p-Isopropyltoluene	17.53	119	2125001	52.8034	ug/L	100
93)	1,3-Dichlorobenzene	17.73	146	1193040	49.8481	ug/L	98
94)	1,4-Dichlorobenzene	17.85	146	1172276	48.1776	ug/L	98
95)	n-Butylbenzene	18.06	91	1947605	53.7246	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	1023250	48.6682	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	49831	43.0973	ug/L	86
98)	1,2,4-Trichlorobenzene	20.49	180	711139	50.2385	ug/L	100
99)	Hexachlorobutadiene	20.64	225	344529	52.3048	ug/L	99
100)	Naphthalene	20.87	128	945601	46.7461	ug/L	100
101)	1,2,3-Trichlorobenzene	21.17	180	567998	48.3199	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419088.D 8260WT.M Fri Apr 21 13:52:26 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 13:26 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: HPMS8
Initial cal date: 17 Apr 2017 16:54
CCV date: 21 Apr 2017 13:04
CCV Filename: 8M419088.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	830845	10.93	667165	14.80	355416	17.83
CCV	894900	10.92	721248	14.79	376519	17.81

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	108	-0.02
2	T	Dichlorodifluoromethane	0.3383	0.3812	-12.7	111	-0.02
3	P	Chloromethane	0.4230	0.4242	-0.3	113	0.00
4	C	Vinyl Chloride	0.3994	0.3806	4.7	105	0.00
5	T	1,3-Butadiene	0.1737	0.1592	8.4	105	0.00
6	T	Bromomethane	0.1100	0.1517	-37.8#	110	0.00
7	T	Chloroethane	0.1745	0.1788	-2.5	109	-0.02
8	T	Trichlorofluoromethane	0.4339	0.4527	-4.3	112	0.00
9	T	Diethyl ether	0.1634	0.1425	12.8	96	-0.02
10	T	Isoprene	0.3430	0.3275	4.5	102	-0.02
11	T	Acrolein	0.0226	0.0183	19.0	89	-0.03
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2571	-3.9	111	-0.02
13	T	Acetone	0.0352	0.0311	11.6	94	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3738	-3.2	109	0.00
15	T	Tert-Butyl Alcohol	0.0114	0.0098	14.2	92	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2137	11.4	96	-0.02
17	T	Iodomethane	0.1082	0.1143	-5.7	102	0.00
18	T	Methyl acetate	0.0963	0.0873	9.3	97	-0.03
19	T	Methylene Chloride	0.2602	0.2498	4.0	104	-0.02
20	T	Carbon Disulfide	0.7528	0.7087	5.9	100	-0.03
21	T	Acrylonitrile	0.0488	0.0447	8.3	91	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.4745	7.5	97	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3529	-0.2	108	-0.02
24	T	n-Hexane	0.2940	0.2960	-0.7	110	0.00
25	T	Diisopropyl ether	0.7885	0.7255	8.0	100	-0.02
26	T	Vinyl Acetate	0.3536	0.3125	11.6	94	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4578	-1.0	107	-0.02
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6073	9.4	98	-0.02
29	T	2-Butanone	0.0551	0.0490	11.2	94	-0.02
30	T	Propionitrile	0.0171	0.0147	14.3	92	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4177	-9.1	116	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.2945	-1.2	107	-0.02
33	C	Chloroform	0.5023	0.4581	8.8	106	0.00
34		1-Bromopropane	0.0574	0.0579	-0.9	110	-0.02
35	T	Bromochloromethane	0.1571	0.1604	-2.1	103	-0.03
36	T	Tetrahydrofuran	0.0380	0.0330	13.1	94	-0.02
37	S	Dibromofluoromethane	0.2622	0.2683	-2.3	106	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4254	-4.9	109	-0.02
39	T	Cyclohexane	0.3774	0.3589	4.9	102	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3558	-0.5	109	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5375	10.5	96	-0.02
42	T	Carbon Tetrachloride	0.3759	0.4054	-7.8	111	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2205	2.7	100	-0.02
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2772	2.4	102	-0.02
46	T	Benzene	1.0328	1.0299	0.3	106	-0.02
47	T	Trichloroethene	0.2901	0.2914	-0.4	108	-0.02
48	T	Methylcyclohexane	0.3867	0.3766	2.6	105	-0.02
49	C	1,2-Dichloropropane	0.2522	0.2439	3.3	103	0.00
50	T	Bromodichloromethane	0.3301	0.3334	-1.0	103	-0.02
51	T	1,4-Dioxane	0.0014	0.0014	0.0	102	-0.02
52	T	Dibromomethane	0.1298	0.1248	3.9	99	-0.02
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.0996	8.8	94	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0421	13.9	90	-0.02

(#) = Out of Range
8M419088.D 8260WT.M Fri Apr 21 13:52:32 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.3870	-2.9	103	-0.02
56	T	Dimethyl Disulfide	0.1968	0.1850	6.0	99	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	108	0.00
58	S	Toluene-d8	1.1423	1.2049	-5.5	110	0.00
59	C	Toluene	1.3916	1.4094	-1.3	106	-0.02
60	T	Ethyl Methacrylate	0.2625	0.2392	8.9	90	-0.02
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.3958	1.9	101	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2093	8.6	99	-0.02
64	T	2-Hexanone	0.0562	0.0478	14.9	88	-0.02
65	T	1,3-Dichloropropane	0.3870	0.3571	7.7	97	-0.02
66	T	Tetrachloroethene	0.2923	0.3094	-5.8	113	0.00
67	T	Dibromochloromethane	0.2942	0.2964	-0.7	101	-0.02
68	T	1,2-Dibromoethane	0.2236	0.2140	4.3	98	-0.02
69	T	1-Chlorohexane	0.4403	0.4316	2.0	103	-0.02
70	P	Chlorobenzene	0.9906	0.9671	2.4	106	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3706	-5.4	104	0.00
72	C	Ethylbenzene	0.5548	0.5586	-0.7	106	-0.02
73	T	m-,p-Xylene	0.6425	0.6681	-4.0	107	0.00
74	T	o-Xylene	0.6460	0.6360	1.5	106	0.00
75	T	Styrene	1.0127	1.0658	-5.2	104	0.00
76	P	Bromoform	0.1760	0.1778	-1.1	98	0.00
77	T	Isopropylbenzene	1.5466	1.5894	-2.8	107	-0.02
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	106	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4300	8.9	92	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.8993	-1.9	107	0.00
81	T	1,2,3-Trichloropropane	0.1352	0.1270	6.1	94	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1123	-14.8	98	0.00
83	T	n-Propylbenzene	3.4991	3.6101	-3.2	107	0.00
84	T	Bromobenzene	0.8199	0.8191	0.1	103	-0.02
85	T	1,3,5-Trimethylbenzene	2.5336	2.6389	-4.2	107	0.00
86	T	2-Chlorotoluene	2.3888	2.3134	3.2	111	0.00
87	T	4-Chlorotoluene	2.1528	2.1677	-0.7	99	-0.02
88	T	a-Methylstyrene	1.4204	1.3980	1.6	102	-0.02
89	T	tert-Butylbenzene	0.5736	0.5825	-1.5	108	-0.02
90	T	1,2,4-Trimethylbenzene	2.5866	2.7260	-5.4	105	-0.02
91	T	sec-Butylbenzene	3.1733	3.2775	-3.3	107	-0.02
92	T	p-Isopropyltoluene	2.6721	2.8219	-5.6	107	0.00
93	T	1,3-Dichlorobenzene	1.5891	1.5843	0.3	103	0.00
94	T	1,4-Dichlorobenzene	1.6156	1.5567	3.6	104	-0.02
95	T	n-Butylbenzene	2.4070	2.5863	-7.4	108	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.3588	2.7	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0662	13.8	88	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.9444	-0.5	102	0.00
99	T	Hexachlorobutadiene	0.4374	0.4575	-4.6	110	0.00
100	T	Naphthalene	1.3431	1.2557	6.5	93	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7543	3.4	97	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419088.D 8260WT.M Fri Apr 21 13:52:33 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	108	-0.02
2	T	Dichlorodifluoromethane	50.0000	56.3428	-12.7	111	-0.02
3	P	Chloromethane	50.0000	50.1499	-0.3	113	0.00
4	C	Vinyl Chloride	50.0000	47.6432	4.7	105	0.00
5	T	1,3-Butadiene	50.0000	50.7621	-1.5	105	0.00
6	T	Bromomethane	50.0000	51.6487	-3.3	110	0.00
7	T	Chloroethane	50.0000	51.2438	-2.5	109	-0.02
8	T	Trichlorofluoromethane	50.0000	52.1742	-4.3	112	0.00
9	T	Diethyl ether	100.0000	87.1969	12.8	96	-0.02
10	T	Isoprene	50.0000	47.7365	4.5	102	-0.02
11	T	Acrolein	50.0000	40.4875	19.0	89	-0.03
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.9645	-3.9	111	-0.02
13	T	Acetone	50.0000	44.1802	11.6	94	-0.02
14	C	1,1-Dichloroethene	50.0000	51.6136	-3.2	109	0.00
15	T	Tert-Butyl Alcohol	200.0000	171.5521	14.2	92	-0.04
16	T	Dimethyl Sulfide	50.0000	44.3112	11.4	96	-0.02
17	T	Iodomethane	50.0000	52.8314	-5.7	102	0.00
18	T	Methyl acetate	50.0000	45.3525	9.3	97	-0.03
19	T	Methylene Chloride	50.0000	48.0061	4.0	104	-0.02
20	T	Carbon Disulfide	50.0000	47.0699	5.9	100	-0.03
21	T	Acrylonitrile	50.0000	45.8280	8.3	91	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	46.2743	7.5	97	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	50.0994	-0.2	108	-0.02
24	T	n-Hexane	50.0000	50.3372	-0.7	110	0.00
25	T	Diisopropyl ether	100.0000	92.0135	8.0	100	-0.02
26	T	Vinyl Acetate	50.0000	44.1862	11.6	94	-0.02
27	P	1,1-Dichloroethane	50.0000	50.4861	-1.0	107	-0.02
28	T	Ethyl-Tert-Butyl ether	100.0000	90.5723	9.4	98	-0.02
29	T	2-Butanone	50.0000	44.4150	11.2	94	-0.02
30	T	Propionitrile	100.0000	85.7150	14.3	92	-0.02
31	T	2,2-Dichloropropane	50.0000	54.5735	-9.1	116	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	50.5827	-1.2	107	-0.02
33	C	Chloroform	50.0000	45.5951	8.8	106	0.00
34		1-Bromopropane	50.0000	50.4262	-0.9	110	-0.02
35	T	Bromochloromethane	50.0000	51.0524	-2.1	103	-0.03
36	T	Tetrahydrofuran	100.0000	86.8704	13.1	94	-0.02
37	S	Dibromofluoromethane	25.0000	25.5810	-2.3	106	-0.02
38	T	1,1,1-Trichloroethane	50.0000	52.4708	-4.9	109	-0.02
39	T	Cyclohexane	50.0000	47.5453	4.9	102	-0.02
40	T	1,1-Dichloropropene	50.0000	50.2655	-0.5	109	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	89.5126	10.5	96	-0.02
42	T	Carbon Tetrachloride	50.0000	53.9224	-7.8	111	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.3201	2.7	100	-0.02
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	48.7879	2.4	102	-0.02
46	T	Benzene	50.0000	49.8588	0.3	106	-0.02
47	T	Trichloroethene	50.0000	50.2180	-0.4	108	-0.02
48	T	Methylcyclohexane	50.0000	48.6883	2.6	105	-0.02
49	C	1,2-Dichloropropane	50.0000	48.3397	3.3	103	0.00
50	T	Bromodichloromethane	50.0000	50.5015	-1.0	103	-0.02
51	T	1,4-Dioxane	200.0000	200.7134	-0.4	102	-0.02
52	T	Dibromomethane	50.0000	48.0734	3.9	99	-0.02
53	T	2-Chloroethyl Vinyl Ether	50.0000	45.6080	8.8	94	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	43.0710	13.9	90	-0.02

(#) = Out of Range
8M419088.D 8260WT.M Fri Apr 21 13:52:35 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419088.D Vial: 2
Acq On : 21 Apr 2017 13:04 Operator: TMB
Sample : WG611118-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	51.4708	-2.9	103	-0.02
56	T	Dimethyl Disulfide	50.0000	43.1093	13.8	99	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	108	0.00
58	S	Toluene-d8	25.0000	26.3694	-5.5	110	0.00
59	C	Toluene	50.0000	50.6389	-1.3	106	-0.02
60	T	Ethyl Methacrylate	50.0000	45.5563	8.9	90	-0.02
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	49.0386	1.9	101	-0.02
63	T	1,1,2-Trichloroethane	50.0000	45.7033	8.6	99	-0.02
64	T	2-Hexanone	50.0000	42.5363	14.9	88	-0.02
65	T	1,3-Dichloropropane	50.0000	46.1294	7.7	97	-0.02
66	T	Tetrachloroethene	50.0000	52.9254	-5.9	113	0.00
67	T	Dibromochloromethane	50.0000	50.3648	-0.7	101	-0.02
68	T	1,2-Dibromoethane	50.0000	47.8369	4.3	98	-0.02
69	T	1-Chlorohexane	50.0000	49.0192	2.0	103	-0.02
70	P	Chlorobenzene	50.0000	48.8139	2.4	106	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.7128	-5.4	104	0.00
72	C	Ethylbenzene	50.0000	50.3407	-0.7	106	-0.02
73	T	m-,p-Xylene	100.0000	103.9904	-4.0	107	0.00
74	T	o-Xylene	50.0000	49.2302	1.5	106	0.00
75	T	Styrene	50.0000	52.6201	-5.2	104	0.00
76	P	Bromoform	50.0000	43.7316	12.5	98	0.00
77	T	Isopropylbenzene	50.0000	51.3807	-2.8	107	-0.02
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	106	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	45.5745	8.9	92	-0.02
80	S	p-Bromofluorobenzene	25.0000	25.4807	-1.9	107	0.00
81	T	1,2,3-Trichloropropane	50.0000	46.9546	6.1	94	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	49.0781	1.8	98	0.00
83	T	n-Propylbenzene	50.0000	51.5865	-3.2	107	0.00
84	T	Bromobenzene	50.0000	49.9514	0.1	103	-0.02
85	T	1,3,5-Trimethylbenzene	50.0000	52.0777	-4.2	107	0.00
86	T	2-Chlorotoluene	50.0000	48.4214	3.2	111	0.00
87	T	4-Chlorotoluene	50.0000	50.3457	-0.7	99	-0.02
88	T	a-Methylstyrene	50.0000	49.2102	1.6	102	-0.02
89	T	tert-Butylbenzene	50.0000	50.7733	-1.5	108	-0.02
90	T	1,2,4-Trimethylbenzene	50.0000	52.6957	-5.4	105	-0.02
91	T	sec-Butylbenzene	50.0000	51.6418	-3.3	107	-0.02
92	T	p-Isopropyltoluene	50.0000	52.8034	-5.6	107	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.8481	0.3	103	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.1776	3.6	104	-0.02
95	T	n-Butylbenzene	50.0000	53.7246	-7.4	108	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.6682	2.7	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	43.0973	13.8	88	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	50.2385	-0.5	102	0.00
99	T	Hexachlorobutadiene	50.0000	52.3048	-4.6	110	0.00
100	T	Naphthalene	50.0000	46.7461	6.5	93	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	48.3199	3.4	97	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419088.D 8260WT.M Fri Apr 21 13:52:36 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12:06 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.91	96	792026	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	640690	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	347354	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	213878	25.7455 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.00%		
43) 1,2-Dichloroethane-d4	10.51	65	179452	24.9870 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.96%		
58) Toluene-d8	12.90	98	770492	26.3198 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.28%		
80) p-Bromofluorobenzene	16.29	95	303020	24.7178 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.88%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	593394	55.3616 ug/L	99
3) Chloromethane	3.80	50	685523	51.1583 ug/L	99
4) Vinyl Chloride	4.04	62	645561	51.0132 ug/L	98
5) 1,3-Butadiene	4.08	54	320229	67.2848 ug/L	92
6) Bromomethane	4.95	94	291794	60.1953 ug/L	98
7) Chloroethane	5.11	64	283915	51.3627 ug/L	97
8) Trichlorofluoromethane	5.60	101	705901	51.3581 ug/L	100
9) Diethyl ether	6.12	59	493295	95.2937 ug/L	91
10) Isoprene	6.16	67	613736	56.4753 ug/L	90
11) Acrolein	6.37	56	29985	41.8253 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	409775	52.2826 ug/L	99
13) Acetone	6.46	43	54260	48.7103 ug/L	94
14) 1,1-Dichloroethene	6.69	61	591085	51.5307 ug/L	98
15) Tert-Butyl Alcohol	6.79	59	67272	186.3044 ug/L	99
16) Dimethyl Sulfide	6.96	62	403322	52.7891 ug/L	88
17) Iodomethane	7.21	142	137955	40.2580 ug/L	88
18) Methyl acetate	7.21	43	168136	55.1204 ug/L #	88
19) Methylene Chloride	7.47	84	401608	48.7201 ug/L	84
20) Carbon Disulfide	7.52	76	1389292	58.2513 ug/L	100
21) Acrylonitrile	7.65	53	80347	51.9985 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	799197	49.2064 ug/L	95
23) trans-1,2-Dichloroethene	7.92	61	561694	50.3321 ug/L	96
24) n-Hexane	8.00	57	553480	59.4164 ug/L	93
25) Diisopropyl ether	8.33	45	2499147	100.0492 ug/L	95
26) Vinyl Acetate	8.51	43	513259	45.8133 ug/L	94
27) 1,1-Dichloroethane	8.54	63	731400	50.9234 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2088364	98.3070 ug/L	98
29) 2-Butanone	9.09	43	80987	46.3611 ug/L	90
30) Propionitrile	9.20	54	52982	97.8568 ug/L	99
31) 2,2-Dichloropropane	9.31	77	656456	54.1421 ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	470964	51.0581 ug/L	95
33) Chloroform	9.59	83	738965	46.4345 ug/L	98
34) 1-Bromopropane	9.73	122	91813	50.4565 ug/L	97
35) Bromochloromethane	9.82	130	256679	51.5687 ug/L	93
36) Tetrahydrofuran	9.84	42	227971	189.5807 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	672673	52.3767 ug/L	99
39) Cyclohexane	10.15	56	662474	55.4035 ug/L	91
40) 1,1-Dichloropropene	10.32	75	568165	50.6677 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1865134	98.0499 ug/L	98
42) Carbon Tetrachloride	10.46	117	633083	53.1629 ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419116.D 8260WT.M Mon Apr 24 12:51:05 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12:06 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

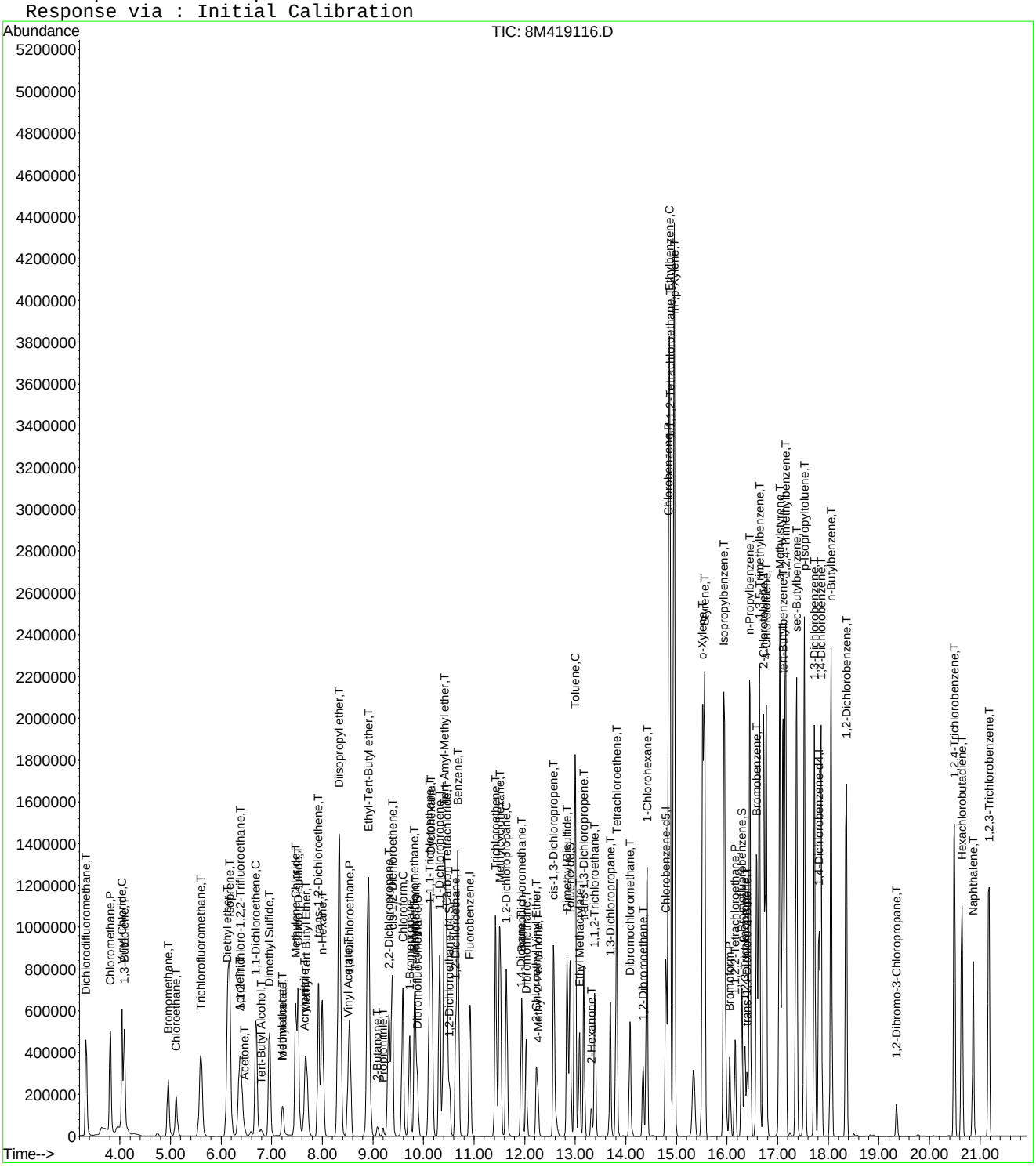
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	451352	50.1563	ug/L		96
46)	Benzene	10.68	78	1654210	50.5567	ug/L		95
47)	Trichloroethene	11.42	130	459014	49.9388	ug/L		98
48)	Methylcyclohexane	11.51	83	677126	55.2643	ug/L		94
49)	1,2-Dichloropropane	11.64	63	396770	49.6492	ug/L		95
50)	Bromodichloromethane	11.94	83	541115	51.7408	ug/L		98
51)	1,4-Dioxane	11.93	88	9546	209.5108	ug/L		84
52)	Dibromomethane	12.03	93	209560	50.9552	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	159865	46.2334	ug/L		97
54)	4-Methyl-2-Pentanone	12.26	58	71697	46.2913	ug/L		99
55)	cis-1,3-Dichloropropene	12.57	75	630314	52.9218	ug/L		98
56)	Dimethyl Disulfide	12.84	79	333001	48.5536	ug/L		95
59)	Toluene	12.99	91	1825378	51.1840	ug/L		99
60)	Ethyl Methacrylate	13.09	69	360325	53.5536	ug/L		85
62)	trans-1,3-Dichloropropene	13.17	75	522638	50.5326	ug/L		99
63)	1,1,2-Trichloroethane	13.38	97	280107	47.7395	ug/L		96
64)	2-Hexanone	13.32	58	65181	45.2665	ug/L		85
65)	1,3-Dichloropropane	13.70	76	476494	48.0390	ug/L		87
66)	Tetrachloroethene	13.82	164	387308	51.7022	ug/L		98
67)	Dibromochloromethane	14.08	129	392314	52.0328	ug/L		100
68)	1,2-Dibromoethane	14.34	107	282655	49.3180	ug/L		100
69)	1-Chlorohexane	14.42	91	620543	54.9973	ug/L		94
70)	Chlorobenzene	14.84	112	1242154	48.9309	ug/L		97
71)	1,1,1,2-Tetrachloroethane	14.87	131	476267	52.8662	ug/L		99
72)	Ethylbenzene	14.86	106	712379	50.1039	ug/L		97
73)	m-,p-Xylene	14.96	106	1724014	104.7045	ug/L		99
74)	o-Xylene	15.51	106	823697	49.7581	ug/L		98
75)	Styrene	15.56	104	1396403	53.8054	ug/L		96
76)	Bromoform	16.05	173	238577	45.7599	ug/L		100
77)	Isopropylbenzene	15.94	105	2050964	51.7439	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.15	83	310957	47.4443	ug/L		97
81)	1,2,3-Trichloropropane	16.35	110	88513	47.1063	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.39	53	76883	48.3945	ug/L	#	22
83)	n-Propylbenzene	16.44	91	2457182	50.5417	ug/L		98
84)	Bromobenzene	16.59	156	555512	48.7667	ug/L		96
85)	1,3,5-Trimethylbenzene	16.64	105	1779503	50.5508	ug/L		97
86)	2-Chlorotoluene	16.72	91	1504359	45.3251	ug/L		82
87)	4-Chlorotoluene	16.77	91	1540974	51.5189	ug/L		93
88)	a-Methylstyrene	17.04	118	1036721	52.5306	ug/L		99
89)	tert-Butylbenzene	17.11	134	388907	48.7955	ug/L		94
90)	1,2,4-Trimethylbenzene	17.16	105	1857606	51.6891	ug/L		97
91)	sec-Butylbenzene	17.37	105	2219465	50.3386	ug/L		99
92)	p-Isopropyltoluene	17.53	119	1923959	51.8219	ug/L		100
93)	1,3-Dichlorobenzene	17.73	146	1077568	48.8038	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	1062274	47.3223	ug/L		98
95)	n-Butylbenzene	18.06	91	1753868	52.4425	ug/L		98
96)	1,2-Dichlorobenzene	18.36	146	940696	48.4984	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	48184	45.1718	ug/L		89
98)	1,2,4-Trichlorobenzene	20.50	180	634951	48.6225	ug/L		100
99)	Hexachlorobutadiene	20.64	225	302718	49.8160	ug/L		99
100)	Naphthalene	20.87	128	846129	45.3408	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	521230	48.0643	ug/L		100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	95	-0.02
2	T	Dichlorodifluoromethane	0.3383	0.3746	-10.7	96	-0.02
3	P	Chloromethane	0.4230	0.4328	-2.3	102	-0.01
4	C	Vinyl Chloride	0.3994	0.4075	-2.0	100	-0.01
5	T	1,3-Butadiene	0.1737	0.2022	-16.4	118	0.00
6	T	Bromomethane	0.1100	0.1842	-67.4#	118	-0.01
7	T	Chloroethane	0.1745	0.1792	-2.7	96	-0.02
8	T	Trichlorofluoromethane	0.4339	0.4456	-2.7	97	0.00
9	T	Diethyl ether	0.1634	0.1557	4.7	93	-0.02
10	T	Isoprene	0.3430	0.3875	-13.0	107	-0.02
11	T	Acrolein	0.0226	0.0189	16.3	81	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2587	-4.6	99	-0.02
13	T	Acetone	0.0352	0.0343	2.6	91	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3731	-3.1	96	-0.01
15	T	Tert-Butyl Alcohol	0.0114	0.0106	6.8	89	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2546	-5.6	101	-0.02
17	T	Iodomethane	0.1082	0.0871	19.5	69	-0.01
18	T	Methyl acetate	0.0963	0.1061	-10.2	104	-0.02
19	T	Methylene Chloride	0.2602	0.2535	2.6	94	-0.02
20	T	Carbon Disulfide	0.7528	0.8771	-16.5	110	-0.02
21	T	Acrylonitrile	0.0488	0.0507	-4.0	91	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.5045	1.6	91	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3546	-0.7	96	-0.02
24	T	n-Hexane	0.2940	0.3494	-18.8	115	-0.01
25	T	Diisopropyl ether	0.7885	0.7889	-0.0	96	-0.02
26	T	Vinyl Acetate	0.3536	0.3240	8.4	86	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4617	-1.8	95	-0.02
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6592	1.7	94	-0.02
29	T	2-Butanone	0.0551	0.0511	7.3	86	-0.02
30	T	Propionitrile	0.0171	0.0167	2.2	93	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4144	-8.3	102	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.2973	-2.1	96	-0.02
33	C	Chloroform	0.5023	0.4665	7.1	95	-0.01
34		1-Bromopropane	0.0574	0.0580	-0.9	97	-0.02
35	T	Bromochloromethane	0.1571	0.1620	-3.1	92	-0.03
36	T	Tetrahydrofuran	0.0380	0.0720	-89.6#	181#	-0.02
37	S	Dibromofluoromethane	0.2622	0.2700	-3.0	95	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4247	-4.8	96	-0.02
39	T	Cyclohexane	0.3774	0.4182	-10.8	105	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3587	-1.3	97	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5887	2.0	93	-0.02
42	T	Carbon Tetrachloride	0.3759	0.3997	-6.3	97	-0.01
43	S	1,2-Dichloroethane-d4	0.2267	0.2266	0.1	91	-0.02
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2849	-0.3	93	-0.02
46	T	Benzene	1.0328	1.0443	-1.1	95	-0.02
47	T	Trichloroethene	0.2901	0.2898	0.1	95	-0.02
48	T	Methylcyclohexane	0.3867	0.4275	-10.5	106	-0.01
49	C	1,2-Dichloropropane	0.2522	0.2505	0.7	93	-0.01
50	T	Bromodichloromethane	0.3301	0.3416	-3.5	94	-0.02
51	T	1,4-Dioxane	0.0014	0.0015	-4.9	94	-0.02
52	T	Dibromomethane	0.1298	0.1323	-1.9	92	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.1009	7.5	85	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0453	7.4	86	-0.02

(#) = Out of Range
8M419116.D 8260WT.M Mon Apr 24 12:51:20 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.3979	-5.8	94	-0.02
56	T	Dimethyl Disulfide	0.1968	0.2102	-6.8	100	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	96	-0.01
58	S	Toluene-d8	1.1423	1.2026	-5.3	97	-0.01
59	C	Toluene	1.3916	1.4245	-2.4	96	-0.02
60	T	Ethyl Methacrylate	0.2625	0.2812	-7.1	94	-0.01
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4079	-1.1	93	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2186	4.5	92	-0.02
64	T	2-Hexanone	0.0562	0.0509	9.5	84	-0.01
65	T	1,3-Dichloropropane	0.3870	0.3719	3.9	90	-0.01
66	T	Tetrachloroethene	0.2923	0.3023	-3.4	98	-0.01
67	T	Dibromochloromethane	0.2942	0.3062	-4.1	92	-0.02
68	T	1,2-Dibromoethane	0.2236	0.2206	1.4	90	-0.02
69	T	1-Chlorohexane	0.4403	0.4843	-10.0	103	-0.01
70	P	Chlorobenzene	0.9906	0.9694	2.1	94	-0.01
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3717	-5.7	93	0.00
72	C	Ethylbenzene	0.5548	0.5560	-0.2	94	-0.02
73	T	m-,p-Xylene	0.6425	0.6727	-4.7	95	-0.01
74	T	o-Xylene	0.6460	0.6428	0.5	95	-0.01
75	T	Styrene	1.0127	1.0898	-7.6	94	-0.01
76	P	Bromoform	0.1760	0.1862	-5.8	91	0.00
77	T	Isopropylbenzene	1.5466	1.6006	-3.5	95	-0.02
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4476	5.1	89	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.8724	1.1	96	-0.01
81	T	1,2,3-Trichloropropane	0.1352	0.1274	5.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1107	-13.2	89	-0.01
83	T	n-Propylbenzene	3.4991	3.5370	-1.1	97	-0.01
84	T	Bromobenzene	0.8199	0.7996	2.5	92	-0.01
85	T	1,3,5-Trimethylbenzene	2.5336	2.5615	-1.1	95	0.00
86	T	2-Chlorotoluene	2.3888	2.1655	9.3	96	-0.01
87	T	4-Chlorotoluene	2.1528	2.2182	-3.0	93	-0.01
88	T	a-Methylstyrene	1.4204	1.4923	-5.1	100	-0.01
89	T	tert-Butylbenzene	0.5736	0.5598	2.4	96	-0.01
90	T	1,2,4-Trimethylbenzene	2.5866	2.6739	-3.4	95	-0.01
91	T	sec-Butylbenzene	3.1733	3.1948	-0.7	96	-0.01
92	T	p-Isopropyltoluene	2.6721	2.7695	-3.6	97	-0.01
93	T	1,3-Dichlorobenzene	1.5891	1.5511	2.4	93	-0.01
94	T	1,4-Dichlorobenzene	1.6156	1.5291	5.4	94	-0.01
95	T	n-Butylbenzene	2.4070	2.5246	-4.9	97	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.3541	3.0	92	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0694	9.7	85	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.9140	2.8	91	0.00
99	T	Hexachlorobutadiene	0.4374	0.4358	0.4	97	-0.01
100	T	Naphthalene	1.3431	1.2180	9.3	83	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7503	3.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419116.D 8260WT.M Mon Apr 24 12:51:20 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	95	-0.02
2	T	Dichlorodifluoromethane	50.0000	55.3616	-10.7	96	-0.02
3	P	Chloromethane	50.0000	51.1583	-2.3	102	-0.01
4	C	Vinyl Chloride	50.0000	51.0132	-2.0	100	-0.01
5	T	1,3-Butadiene	50.0000	67.2848	-34.6#	118	0.00
6	T	Bromomethane	50.0000	60.1953	-20.4	118	-0.01
7	T	Chloroethane	50.0000	51.3627	-2.7	96	-0.02
8	T	Trichlorofluoromethane	50.0000	51.3581	-2.7	97	0.00
9	T	Diethyl ether	100.0000	95.2937	4.7	93	-0.02
10	T	Isoprene	50.0000	56.4753	-13.0	107	-0.02
11	T	Acrolein	50.0000	41.8253	16.3	81	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.2826	-4.6	99	-0.02
13	T	Acetone	50.0000	48.7103	2.6	91	-0.02
14	C	1,1-Dichloroethene	50.0000	51.5307	-3.1	96	-0.01
15	T	Tert-Butyl Alcohol	200.0000	186.3044	6.8	89	-0.04
16	T	Dimethyl Sulfide	50.0000	52.7891	-5.6	101	-0.02
17	T	Iodomethane	50.0000	40.2580	19.5	69	-0.01
18	T	Methyl acetate	50.0000	55.1204	-10.2	104	-0.02
19	T	Methylene Chloride	50.0000	48.7201	2.6	94	-0.02
20	T	Carbon Disulfide	50.0000	58.2513	-16.5	110	-0.02
21	T	Acrylonitrile	50.0000	51.9985	-4.0	91	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	49.2064	1.6	91	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	50.3321	-0.7	96	-0.02
24	T	n-Hexane	50.0000	59.4164	-18.8	115	-0.01
25	T	Diisopropyl ether	100.0000	100.0492	-0.0	96	-0.02
26	T	Vinyl Acetate	50.0000	45.8133	8.4	86	-0.02
27	P	1,1-Dichloroethane	50.0000	50.9234	-1.8	95	-0.02
28	T	Ethyl-Tert-Butyl ether	100.0000	98.3070	1.7	94	-0.02
29	T	2-Butanone	50.0000	46.3611	7.3	86	-0.02
30	T	Propionitrile	100.0000	97.8568	2.1	93	-0.02
31	T	2,2-Dichloropropane	50.0000	54.1421	-8.3	102	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	51.0581	-2.1	96	-0.02
33	C	Chloroform	50.0000	46.4345	7.1	95	-0.01
34		1-Bromopropane	50.0000	50.4565	-0.9	97	-0.02
35	T	Bromochloromethane	50.0000	51.5687	-3.1	92	-0.03
36	T	Tetrahydrofuran	100.0000	189.5807	-89.6#	181	-0.02
37	S	Dibromofluoromethane	25.0000	25.7455	-3.0	95	-0.02
38	T	1,1,1-Trichloroethane	50.0000	52.3766	-4.8	96	-0.02
39	T	Cyclohexane	50.0000	55.4035	-10.8	105	-0.02
40	T	1,1-Dichloropropene	50.0000	50.6677	-1.3	97	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	98.0499	2.0	93	-0.02
42	T	Carbon Tetrachloride	50.0000	53.1629	-6.3	97	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.9870	0.1	91	-0.02
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	50.1563	-0.3	93	-0.02
46	T	Benzene	50.0000	50.5567	-1.1	95	-0.02
47	T	Trichloroethene	50.0000	49.9388	0.1	95	-0.02
48	T	Methylcyclohexane	50.0000	55.2643	-10.5	106	-0.01
49	C	1,2-Dichloropropane	50.0000	49.6491	0.7	93	-0.01
50	T	Bromodichloromethane	50.0000	51.7408	-3.5	94	-0.02
51	T	1,4-Dioxane	200.0000	209.5108	-4.8	94	-0.02
52	T	Dibromomethane	50.0000	50.9552	-1.9	92	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	46.2334	7.5	85	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	46.2913	7.4	86	-0.02

(#) = Out of Range
8M419116.D 8260WT.M Mon Apr 24 12:51:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	52.9218	-5.8	94	-0.02
56	T	Dimethyl Disulfide	50.0000	48.5536	2.9	100	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	96	-0.01
58	S	Toluene-d8	25.0000	26.3198	-5.3	97	-0.01
59	C	Toluene	50.0000	51.1840	-2.4	96	-0.02
60	T	Ethyl Methacrylate	50.0000	53.5536	-7.1	94	-0.01
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	50.5326	-1.1	93	-0.02
63	T	1,1,2-Trichloroethane	50.0000	47.7395	4.5	92	-0.02
64	T	2-Hexanone	50.0000	45.2664	9.5	84	-0.01
65	T	1,3-Dichloropropane	50.0000	48.0390	3.9	90	-0.01
66	T	Tetrachloroethene	50.0000	51.7022	-3.4	98	-0.01
67	T	Dibromochloromethane	50.0000	52.0328	-4.1	92	-0.02
68	T	1,2-Dibromoethane	50.0000	49.3180	1.4	90	-0.02
69	T	1-Chlorohexane	50.0000	54.9973	-10.0	103	-0.01
70	P	Chlorobenzene	50.0000	48.9309	2.1	94	-0.01
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.8662	-5.7	93	0.00
72	C	Ethylbenzene	50.0000	50.1039	-0.2	94	-0.02
73	T	m-,p-Xylene	100.0000	104.7045	-4.7	95	-0.01
74	T	o-Xylene	50.0000	49.7581	0.5	95	-0.01
75	T	Styrene	50.0000	53.8054	-7.6	94	-0.01
76	P	Bromoform	50.0000	45.7599	8.5	91	0.00
77	T	Isopropylbenzene	50.0000	51.7439	-3.5	95	-0.02
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	47.4443	5.1	89	-0.02
80	S	p-Bromofluorobenzene	25.0000	24.7178	1.1	96	-0.01
81	T	1,2,3-Trichloropropane	50.0000	47.1063	5.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	48.3945	3.2	89	-0.01
83	T	n-Propylbenzene	50.0000	50.5418	-1.1	97	-0.01
84	T	Bromobenzene	50.0000	48.7667	2.5	92	-0.01
85	T	1,3,5-Trimethylbenzene	50.0000	50.5508	-1.1	95	0.00
86	T	2-Chlorotoluene	50.0000	45.3251	9.3	96	-0.01
87	T	4-Chlorotoluene	50.0000	51.5189	-3.0	93	-0.01
88	T	a-Methylstyrene	50.0000	52.5306	-5.1	100	-0.01
89	T	tert-Butylbenzene	50.0000	48.7955	2.4	96	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	51.6891	-3.4	95	-0.01
91	T	sec-Butylbenzene	50.0000	50.3386	-0.7	96	-0.01
92	T	p-Isopropyltoluene	50.0000	51.8219	-3.6	97	-0.01
93	T	1,3-Dichlorobenzene	50.0000	48.8038	2.4	93	-0.01
94	T	1,4-Dichlorobenzene	50.0000	47.3223	5.4	94	-0.01
95	T	n-Butylbenzene	50.0000	52.4425	-4.9	97	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.4984	3.0	92	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	45.1718	9.7	85	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	48.6225	2.8	91	0.00
99	T	Hexachlorobutadiene	50.0000	49.8160	0.4	97	-0.01
100	T	Naphthalene	50.0000	45.3408	9.3	83	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	48.0643	3.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419116.D 8260WT.M Mon Apr 24 12:51:23 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 08:44:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	771505	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	622116	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	332171	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	205222	25.3606 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.44%		
43) 1,2-Dichloroethane-d4	10.52	65	173046	24.7359 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.96%		
58) Toluene-d8	12.90	98	759461	26.7175 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.88%		
80) p-Bromofluorobenzene	16.29	95	296395	25.2825 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.12%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	582124	55.7547 ug/L	99
3) Chloromethane	3.81	50	674566	51.6796 ug/L	98
4) Vinyl Chloride	4.04	62	675115	54.7676 ug/L	98
5) 1,3-Butadiene	4.08	54	394330	88.6470 ug/L	90
6) Bromomethane	4.95	94	202799	46.0490 ug/L	99
7) Chloroethane	5.12	64	286367	53.1843 ug/L	97
8) Trichlorofluoromethane	5.60	101	698657	52.1831 ug/L	100
9) Diethyl ether	6.13	59	443425	87.9383 ug/L	90
10) Isoprene	6.17	67	605067	57.1586 ug/L	89
11) Acrolein	6.37	56	25382	36.3464 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	408923	53.5617 ug/L	98
13) Acetone	6.46	43	48320	44.5316 ug/L	94
14) 1,1-Dichloroethene	6.69	61	593238	53.0940 ug/L	96
15) Tert-Butyl Alcohol	6.79	59	57232	162.7153 ug/L	100
16) Dimethyl Sulfide	6.96	62	398066	53.4870 ug/L	89
17) Iodomethane	7.21	142	264751	79.3146 ug/L	96
18) Methyl acetate	7.21	43	156025	52.5106 ug/L	90
19) Methylene Chloride	7.47	84	400328	49.8566 ug/L	82
20) Carbon Disulfide	7.52	76	1354036	58.2831 ug/L	100
21) Acrylonitrile	7.65	53	70436	46.7969 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	740976	46.8352 ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	561857	51.6858 ug/L	95
24) n-Hexane	8.00	57	542766	59.8161 ug/L	92
25) Diisopropyl ether	8.34	45	2329140	95.7234 ug/L	95
26) Vinyl Acetate	8.51	43	459681	42.1223 ug/L	95
27) 1,1-Dichloroethane	8.55	63	734814	52.5219 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1888999	91.2873 ug/L	97
29) 2-Butanone	9.09	43	77085	45.3011 ug/L	89
30) Propionitrile	9.20	54	45658	86.5725 ug/L	98
31) 2,2-Dichloropropane	9.32	77	654492	55.4159 ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	468130	52.1007 ug/L	94
33) Chloroform	9.59	83	734581	47.3868 ug/L	98
34) 1-Bromopropane	9.72	122	90244	50.9134 ug/L	98
35) Bromochloromethane	9.83	130	244804	50.4911 ug/L	92
36) Tetrahydrofuran	9.85	42	102343	87.3722 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	667500	53.3563 ug/L	99
39) Cyclohexane	10.16	56	669818	57.5077 ug/L	91
40) 1,1-Dichloropropene	10.31	75	573309	52.4864 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1679121	90.6191 ug/L	97
42) Carbon Tetrachloride	10.47	117	632314	54.5106 ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419165.D 8260WT.M Wed Apr 26 09:35:19 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 08:44:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

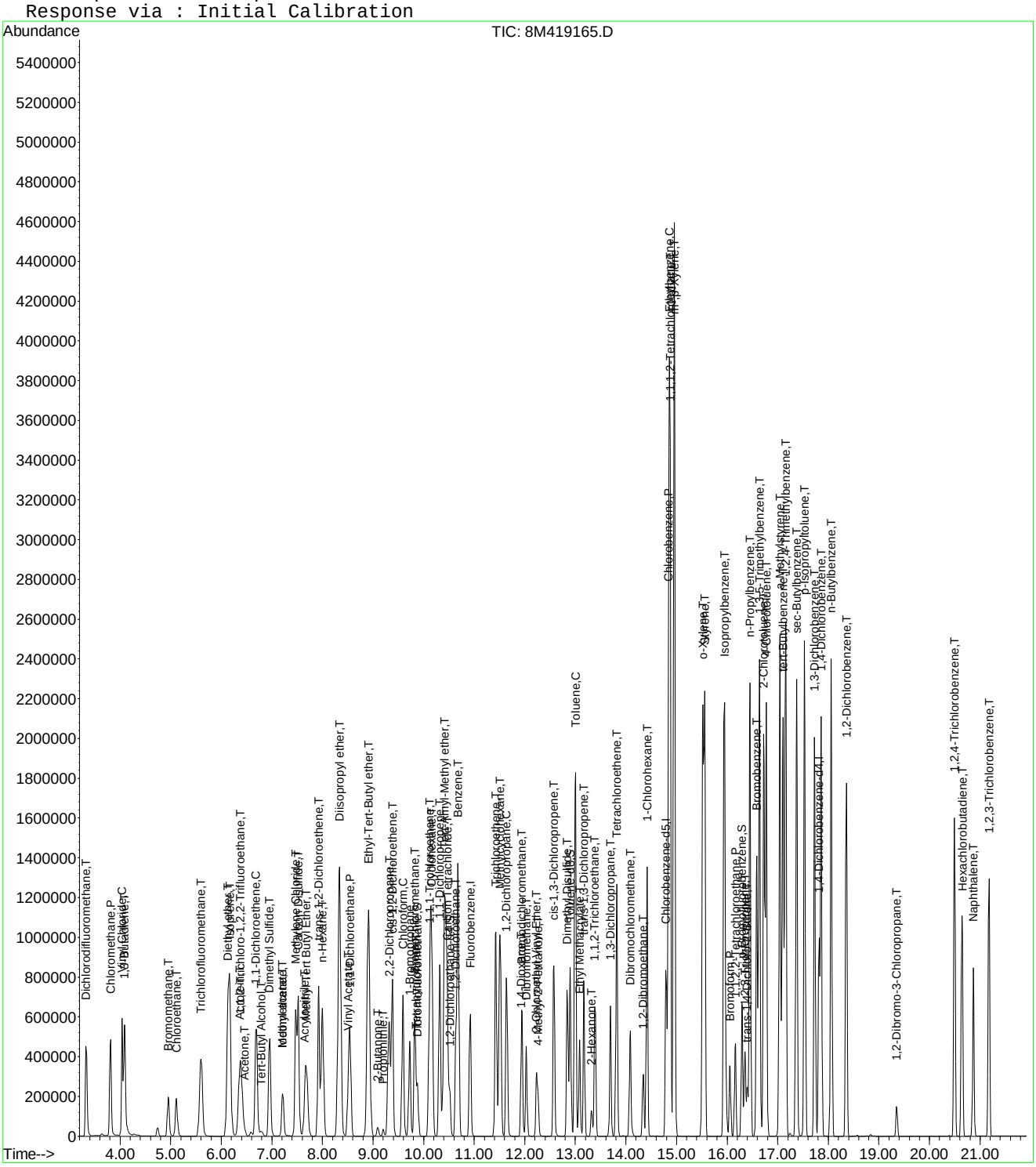
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.63	62	438299	50.0013	ug/L	95
46)	Benzene	10.68	78	1658775	52.0446	ug/L	95
47)	Trichloroethene	11.43	130	455965	50.9265	ug/L	99
48)	Methylcyclohexane	11.51	83	674958	56.5526	ug/L	95
49)	1,2-Dichloropropane	11.64	63	398857	51.2379	ug/L	95
50)	Bromodichloromethane	11.94	83	536680	52.6817	ug/L	99
51)	1,4-Dioxane	11.93	88	8180	184.3058	ug/L	90
52)	Dibromomethane	12.03	93	201137	50.2080	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	153016	45.4297	ug/L	96
54)	4-Methyl-2-Pentanone	12.26	58	66397	44.0096	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	619284	53.3787	ug/L	99
56)	Dimethyl Disulfide	12.84	79	291273	43.9160	ug/L	96
59)	Toluene	13.00	91	1841423	53.1755	ug/L	99
60)	Ethyl Methacrylate	13.08	69	340968	52.1896	ug/L	85
62)	trans-1,3-Dichloropropene	13.17	75	506016	50.3862	ug/L	100
63)	1,1,2-Trichloroethane	13.38	97	274120	48.1140	ug/L	97
64)	2-Hexanone	13.32	58	61883	44.2592	ug/L	87
65)	1,3-Dichloropropane	13.69	76	474588	49.2753	ug/L	87
66)	Tetrachloroethene	13.82	164	384172	52.8147	ug/L	98
67)	Dibromochloromethane	14.09	129	379069	51.7772	ug/L	100
68)	1,2-Dibromoethane	14.33	107	274362	49.3003	ug/L	99
69)	1-Chlorohexane	14.42	91	624162	56.9697	ug/L	92
70)	Chlorobenzene	14.84	112	1257223	51.0031	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	481418	55.0335	ug/L	99
72)	Ethylbenzene	14.86	106	741804	53.7311	ug/L	98
73)	m-,p-Xylene	14.95	106	1760133	110.0897	ug/L	99
74)	o-Xylene	15.52	106	835509	51.9785	ug/L	99
75)	Styrene	15.55	104	1403205	55.6818	ug/L	97
76)	Bromoform	16.06	173	228357	45.1155	ug/L	100
77)	Isopropylbenzene	15.95	105	2110544	54.8369	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.16	83	315793	50.3845	ug/L	98
81)	1,2,3-Trichloropropane	16.35	110	89133	49.6045	ug/L	90
82)	trans-1,4-Dichloro-2-Buten	16.39	53	65814	43.3865	ug/L	87
83)	n-Propylbenzene	16.45	91	2526150	54.3354	ug/L	99
84)	Bromobenzene	16.59	156	559934	51.4017	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	1829333	54.3416	ug/L	97
86)	2-Chlorotoluene	16.72	91	1750450	55.1503	ug/L	93
87)	4-Chlorotoluene	16.77	91	1383957	48.3843	ug/L	98
88)	a-Methylstyrene	17.04	118	1055106	55.9059	ug/L	98
89)	tert-Butylbenzene	17.10	134	394809	51.8002	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1921216	55.9026	ug/L	98
91)	sec-Butylbenzene	17.37	105	2278240	54.0334	ug/L	100
92)	p-Isopropyltoluene	17.53	119	1956758	55.1144	ug/L	99
93)	1,3-Dichlorobenzene	17.72	146	1113552	52.7387	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	1091749	50.8584	ug/L	99
95)	n-Butylbenzene	18.06	91	1790935	55.9986	ug/L	99
96)	1,2-Dichlorobenzene	18.35	146	958978	51.7008	ug/L	99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	48917	47.9551	ug/L	89
98)	1,2,4-Trichlorobenzene	20.49	180	645493	51.6891	ug/L	99
99)	Hexachlorobutadiene	20.65	225	298388	51.3478	ug/L	98
100)	Naphthalene	20.87	128	862136	48.3102	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	524552	50.5816	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419165.D 8260WT.M Wed Apr 26 09:35:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: HPMS8
Initial cal date: 17 Apr 2017 16:54
CCV date: 26 Apr 2017 8:22
CCV Filename: 8M419165.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	830845	10.93	667165	14.80	355416	17.83
CCV	771505	10.92	622116	14.79	332171	17.82

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	93	-0.01
2	T	Dichlorodifluoromethane	0.3383	0.3773	-11.5	95	-0.02
3	P	Chloromethane	0.4230	0.4372	-3.4	101	0.00
4	C	Vinyl Chloride	0.3994	0.4375	-9.5	104	-0.01
5	T	1,3-Butadiene	0.1737	0.2556	-47.1#	145	-0.01
6	T	Bromomethane	0.1100	0.1314	-19.4	82	-0.01
7	T	Chloroethane	0.1745	0.1856	-6.4	97	-0.01
8	T	Trichlorofluoromethane	0.4339	0.4528	-4.4	96	0.00
9	T	Diethyl ether	0.1634	0.1437	12.1	83	-0.01
10	T	Isoprene	0.3430	0.3921	-14.3	105	-0.01
11	T	Acrolein	0.0226	0.0164	27.3#	69	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2650	-7.1	98	-0.02
13	T	Acetone	0.0352	0.0313	10.9	81	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3845	-6.2	96	-0.01
15	T	Tert-Butyl Alcohol	0.0114	0.0093	18.7	76	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2580	-7.0	100	-0.02
17	T	Iodomethane	0.1082	0.1716	-58.6#	132	-0.01
18	T	Methyl acetate	0.0963	0.1011	-5.0	97	-0.02
19	T	Methylene Chloride	0.2602	0.2595	0.3	94	-0.02
20	T	Carbon Disulfide	0.7528	0.8775	-16.6	107	-0.02
21	T	Acrylonitrile	0.0488	0.0457	6.4	80	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.4802	6.3	84	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3641	-3.4	96	-0.01
24	T	n-Hexane	0.2940	0.3518	-19.6	113	-0.01
25	T	Diisopropyl ether	0.7885	0.7547	4.3	89	-0.01
26	T	Vinyl Acetate	0.3536	0.2979	15.8	77	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4762	-5.0	96	-0.01
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6121	8.7	85	-0.02
29	T	2-Butanone	0.0551	0.0500	9.4	82	-0.01
30	T	Propionitrile	0.0171	0.0148	13.4	80	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4242	-10.8	102	-0.01
32	T	cis-1,2-Dichloroethene	0.2912	0.3034	-4.2	95	-0.02
33	C	Chloroform	0.5023	0.4761	5.2	95	-0.01
34		1-Bromopropane	0.0574	0.0585	-1.8	95	-0.02
35	T	Bromochloromethane	0.1571	0.1587	-1.0	88	-0.02
36	T	Tetrahydrofuran	0.0380	0.0332	12.6	81	-0.01
37	S	Dibromofluoromethane	0.2622	0.2660	-1.4	91	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4326	-6.7	96	-0.02
39	T	Cyclohexane	0.3774	0.4341	-15.0	106	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3715	-5.0	98	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5441	9.4	84	-0.02
42	T	Carbon Tetrachloride	0.3759	0.4098	-9.0	97	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2243	1.1	88	-0.01
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2841	0.0	90	-0.02
46	T	Benzene	1.0328	1.0750	-4.1	96	-0.02
47	T	Trichloroethene	0.2901	0.2955	-1.9	95	-0.01
48	T	Methylcyclohexane	0.3867	0.4374	-13.1	105	-0.01
49	C	1,2-Dichloropropane	0.2522	0.2585	-2.5	94	-0.01
50	T	Bromodichloromethane	0.3301	0.3478	-5.4	93	-0.02
51	T	1,4-Dioxane	0.0014	0.0013	7.6	81	-0.02
52	T	Dibromomethane	0.1298	0.1303	-0.4	89	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.0992	9.1	81	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0430	12.0	79	-0.02

(#) = Out of Range
8M419165.D 8260WT.M Wed Apr 26 09:35:35 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.4013	-6.8	92	-0.01
56	T	Dimethyl Disulfide	0.1968	0.1888	4.1	87	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	93	-0.01
58	S	Toluene-d8	1.1423	1.2208	-6.9	96	-0.01
59	C	Toluene	1.3916	1.4800	-6.4	96	-0.01
60	T	Ethyl Methacrylate	0.2625	0.2740	-4.4	89	-0.01
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4067	-0.8	90	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2203	3.8	90	-0.02
64	T	2-Hexanone	0.0562	0.0497	11.5	79	-0.01
65	T	1,3-Dichloropropane	0.3870	0.3814	1.4	90	-0.01
66	T	Tetrachloroethene	0.2923	0.3088	-5.6	98	-0.01
67	T	Dibromochloromethane	0.2942	0.3047	-3.6	89	-0.01
68	T	1,2-Dibromoethane	0.2236	0.2205	1.4	87	-0.02
69	T	1-Chlorohexane	0.4403	0.5016	-13.9	104	-0.01
70	P	Chlorobenzene	0.9906	1.0104	-2.0	95	-0.01
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3869	-10.1	94	0.00
72	C	Ethylbenzene	0.5548	0.5962	-7.5	98	-0.02
73	T	m-,p-Xylene	0.6425	0.7073	-10.1	97	-0.01
74	T	o-Xylene	0.6460	0.6715	-4.0	97	0.00
75	T	Styrene	1.0127	1.1278	-11.4	95	-0.01
76	P	Bromoform	0.1760	0.1835	-4.3	87	0.00
77	T	Isopropylbenzene	1.5466	1.6963	-9.7	98	-0.01
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	93	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4753	-0.8	90	-0.01
80	S	p-Bromofluorobenzene	0.8823	0.8923	-1.1	94	-0.01
81	T	1,2,3-Trichloropropane	0.1352	0.1342	0.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.0991	-1.3	76	-0.01
83	T	n-Propylbenzene	3.4991	3.8025	-8.7	99	0.00
84	T	Bromobenzene	0.8199	0.8428	-2.8	93	-0.01
85	T	1,3,5-Trimethylbenzene	2.5336	2.7536	-8.7	98	0.00
86	T	2-Chlorotoluene	2.3888	2.6349	-10.3	112	-0.01
87	T	4-Chlorotoluene	2.1528	2.0832	3.2	84	-0.01
88	T	a-Methylstyrene	1.4204	1.5882	-11.8	102	-0.01
89	T	tert-Butylbenzene	0.5736	0.5943	-3.6	97	-0.01
90	T	1,2,4-Trimethylbenzene	2.5866	2.8919	-11.8	99	-0.01
91	T	sec-Butylbenzene	3.1733	3.4293	-8.1	99	-0.01
92	T	p-Isopropyltoluene	2.6721	2.9454	-10.2	98	-0.01
93	T	1,3-Dichlorobenzene	1.5891	1.6762	-5.5	96	-0.01
94	T	1,4-Dichlorobenzene	1.6156	1.6434	-1.7	96	-0.01
95	T	n-Butylbenzene	2.4070	2.6958	-12.0	99	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.4435	-3.4	94	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0736	4.1	87	-0.01
98	T	1,2,4-Trichlorobenzene	0.9399	0.9716	-3.4	92	0.00
99	T	Hexachlorobutadiene	0.4374	0.4491	-2.7	95	0.00
100	T	Naphthalene	1.3431	1.2977	3.4	84	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7896	-1.2	90	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419165.D 8260WT.M Wed Apr 26 09:35:36 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	93	-0.01
2	T	Dichlorodifluoromethane	50.0000	55.7547	-11.5	95	-0.02
3	P	Chloromethane	50.0000	51.6796	-3.4	101	0.00
4	C	Vinyl Chloride	50.0000	54.7676	-9.5	104	-0.01
5	T	1,3-Butadiene	50.0000	88.6470	-77.3#	145	-0.01
6	T	Bromomethane	50.0000	46.0490	7.9	82	-0.01
7	T	Chloroethane	50.0000	53.1843	-6.4	97	-0.01
8	T	Trichlorofluoromethane	50.0000	52.1831	-4.4	96	0.00
9	T	Diethyl ether	100.0000	87.9384	12.1	83	-0.01
10	T	Isoprene	50.0000	57.1586	-14.3	105	-0.01
11	T	Acrolein	50.0000	36.3464	27.3#	69	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	53.5617	-7.1	98	-0.02
13	T	Acetone	50.0000	44.5316	10.9	81	-0.02
14	C	1,1-Dichloroethene	50.0000	53.0940	-6.2	96	-0.01
15	T	Tert-Butyl Alcohol	200.0000	162.7153	18.6	76	-0.04
16	T	Dimethyl Sulfide	50.0000	53.4870	-7.0	100	-0.02
17	T	Iodomethane	50.0000	79.3145	-58.6#	132	-0.01
18	T	Methyl acetate	50.0000	52.5106	-5.0	97	-0.02
19	T	Methylene Chloride	50.0000	49.8566	0.3	94	-0.02
20	T	Carbon Disulfide	50.0000	58.2831	-16.6	107	-0.02
21	T	Acrylonitrile	50.0000	46.7969	6.4	80	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	46.8352	6.3	84	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	51.6859	-3.4	96	-0.01
24	T	n-Hexane	50.0000	59.8161	-19.6	113	-0.01
25	T	Diisopropyl ether	100.0000	95.7233	4.3	89	-0.01
26	T	Vinyl Acetate	50.0000	42.1223	15.8	77	-0.02
27	P	1,1-Dichloroethane	50.0000	52.5219	-5.0	96	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	91.2873	8.7	85	-0.02
29	T	2-Butanone	50.0000	45.3011	9.4	82	-0.01
30	T	Propionitrile	100.0000	86.5725	13.4	80	-0.02
31	T	2,2-Dichloropropane	50.0000	55.4159	-10.8	102	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	52.1007	-4.2	95	-0.02
33	C	Chloroform	50.0000	47.3868	5.2	95	-0.01
34		1-Bromopropane	50.0000	50.9134	-1.8	95	-0.02
35	T	Bromochloromethane	50.0000	50.4911	-1.0	88	-0.02
36	T	Tetrahydrofuran	100.0000	87.3722	12.6	81	-0.01
37	S	Dibromofluoromethane	25.0000	25.3606	-1.4	91	-0.02
38	T	1,1,1-Trichloroethane	50.0000	53.3563	-6.7	96	-0.02
39	T	Cyclohexane	50.0000	57.5076	-15.0	106	-0.01
40	T	1,1-Dichloropropene	50.0000	52.4864	-5.0	98	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	90.6191	9.4	84	-0.02
42	T	Carbon Tetrachloride	50.0000	54.5106	-9.0	97	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.7359	1.1	88	-0.01
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	50.0013	-0.0	90	-0.02
46	T	Benzene	50.0000	52.0446	-4.1	96	-0.02
47	T	Trichloroethene	50.0000	50.9265	-1.9	95	-0.01
48	T	Methylcyclohexane	50.0000	56.5526	-13.1	105	-0.01
49	C	1,2-Dichloropropane	50.0000	51.2379	-2.5	94	-0.01
50	T	Bromodichloromethane	50.0000	52.6817	-5.4	93	-0.02
51	T	1,4-Dioxane	200.0000	184.3058	7.8	81	-0.02
52	T	Dibromomethane	50.0000	50.2080	-0.4	89	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	45.4297	9.1	81	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	44.0096	12.0	79	-0.02

(#) = Out of Range
8M419165.D 8260WT.M Wed Apr 26 09:35:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

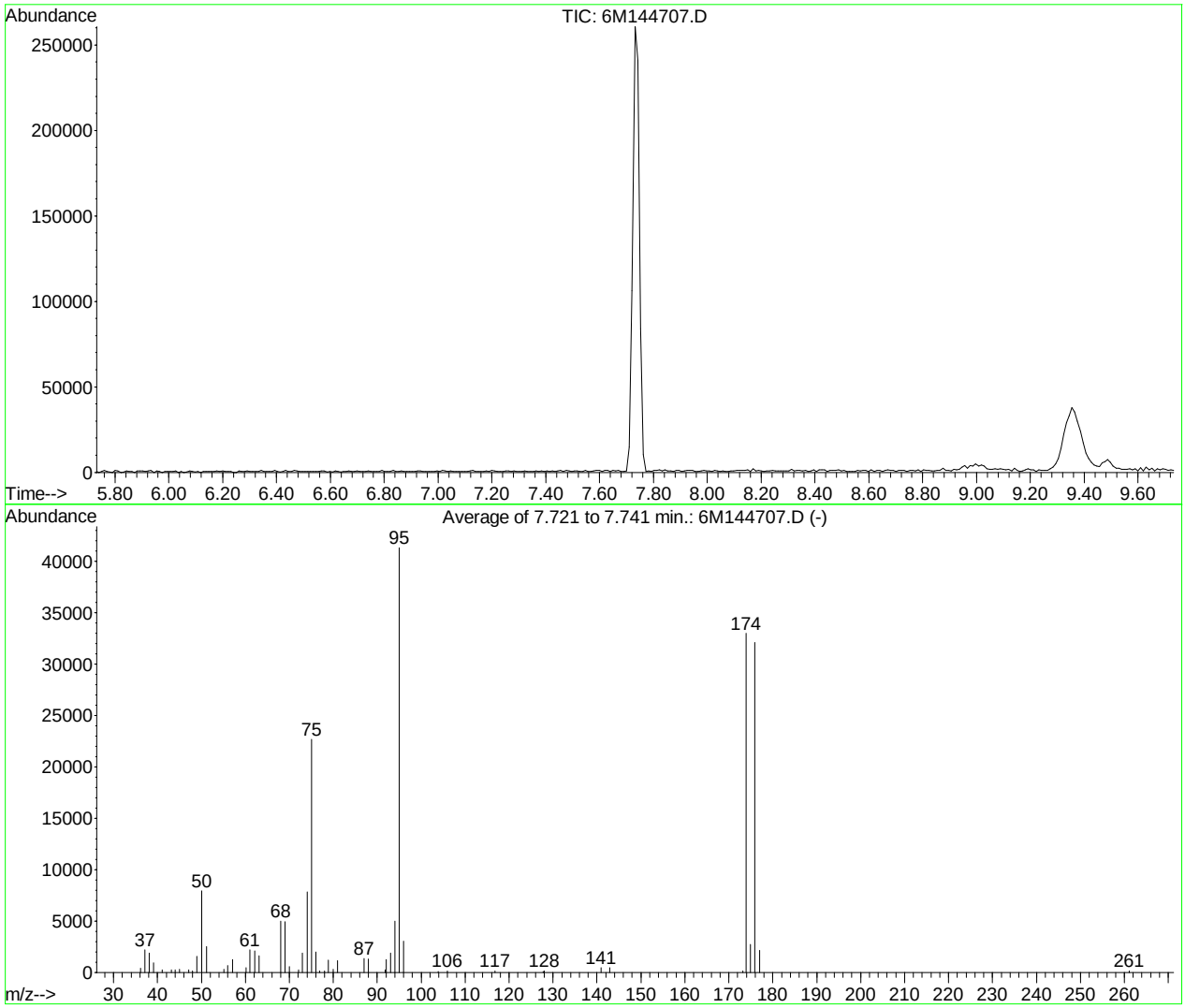
Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	53.3787	-6.8	92	-0.01
56	T	Dimethyl Disulfide	50.0000	43.9160	12.2	87	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	93	-0.01
58	S	Toluene-d8	25.0000	26.7175	-6.9	96	-0.01
59	C	Toluene	50.0000	53.1755	-6.4	96	-0.01
60	T	Ethyl Methacrylate	50.0000	52.1896	-4.4	89	-0.01
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	50.3862	-0.8	90	-0.02
63	T	1,1,2-Trichloroethane	50.0000	48.1140	3.8	90	-0.02
64	T	2-Hexanone	50.0000	44.2592	11.5	79	-0.01
65	T	1,3-Dichloropropane	50.0000	49.2753	1.4	90	-0.01
66	T	Tetrachloroethene	50.0000	52.8147	-5.6	98	-0.01
67	T	Dibromochloromethane	50.0000	51.7772	-3.6	89	-0.01
68	T	1,2-Dibromoethane	50.0000	49.3003	1.4	87	-0.02
69	T	1-Chlorohexane	50.0000	56.9697	-13.9	104	-0.01
70	P	Chlorobenzene	50.0000	51.0031	-2.0	95	-0.01
71	T	1,1,1,2-Tetrachloroethane	50.0000	55.0335	-10.1	94	0.00
72	C	Ethylbenzene	50.0000	53.7311	-7.5	98	-0.02
73	T	m-,p-Xylene	100.0000	110.0897	-10.1	97	-0.01
74	T	o-Xylene	50.0000	51.9785	-4.0	97	0.00
75	T	Styrene	50.0000	55.6818	-11.4	95	-0.01
76	P	Bromoform	50.0000	45.1155	9.8	87	0.00
77	T	Isopropylbenzene	50.0000	54.8368	-9.7	98	-0.01
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	93	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	50.3845	-0.8	90	-0.01
80	S	p-Bromofluorobenzene	25.0000	25.2825	-1.1	94	-0.01
81	T	1,2,3-Trichloropropane	50.0000	49.6045	0.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	43.3865	13.2	76	-0.01
83	T	n-Propylbenzene	50.0000	54.3354	-8.7	99	0.00
84	T	Bromobenzene	50.0000	51.4017	-2.8	93	-0.01
85	T	1,3,5-Trimethylbenzene	50.0000	54.3416	-8.7	98	0.00
86	T	2-Chlorotoluene	50.0000	55.1503	-10.3	112	-0.01
87	T	4-Chlorotoluene	50.0000	48.3843	3.2	84	-0.01
88	T	a-Methylstyrene	50.0000	55.9059	-11.8	102	-0.01
89	T	tert-Butylbenzene	50.0000	51.8002	-3.6	97	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	55.9026	-11.8	99	-0.01
91	T	sec-Butylbenzene	50.0000	54.0334	-8.1	99	-0.01
92	T	p-Isopropyltoluene	50.0000	55.1144	-10.2	98	-0.01
93	T	1,3-Dichlorobenzene	50.0000	52.7387	-5.5	96	-0.01
94	T	1,4-Dichlorobenzene	50.0000	50.8584	-1.7	96	-0.01
95	T	n-Butylbenzene	50.0000	55.9986	-12.0	99	0.00
96	T	1,2-Dichlorobenzene	50.0000	51.7008	-3.4	94	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	47.9551	4.1	87	-0.01
98	T	1,2,4-Trichlorobenzene	50.0000	51.6891	-3.4	92	0.00
99	T	Hexachlorobutadiene	50.0000	51.3478	-2.7	95	0.00
100	T	Naphthalene	50.0000	48.3102	3.4	84	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	50.5816	-1.2	90	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419165.D 8260WT.M Wed Apr 26 09:35:38 2017 Page 2

2.1.1.5 Raw QC Data

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144707.D Vial: 1
Acq On : 12 Jan 2017 8:36 Operator: TMB
Sample : WG598323-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD79474 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01

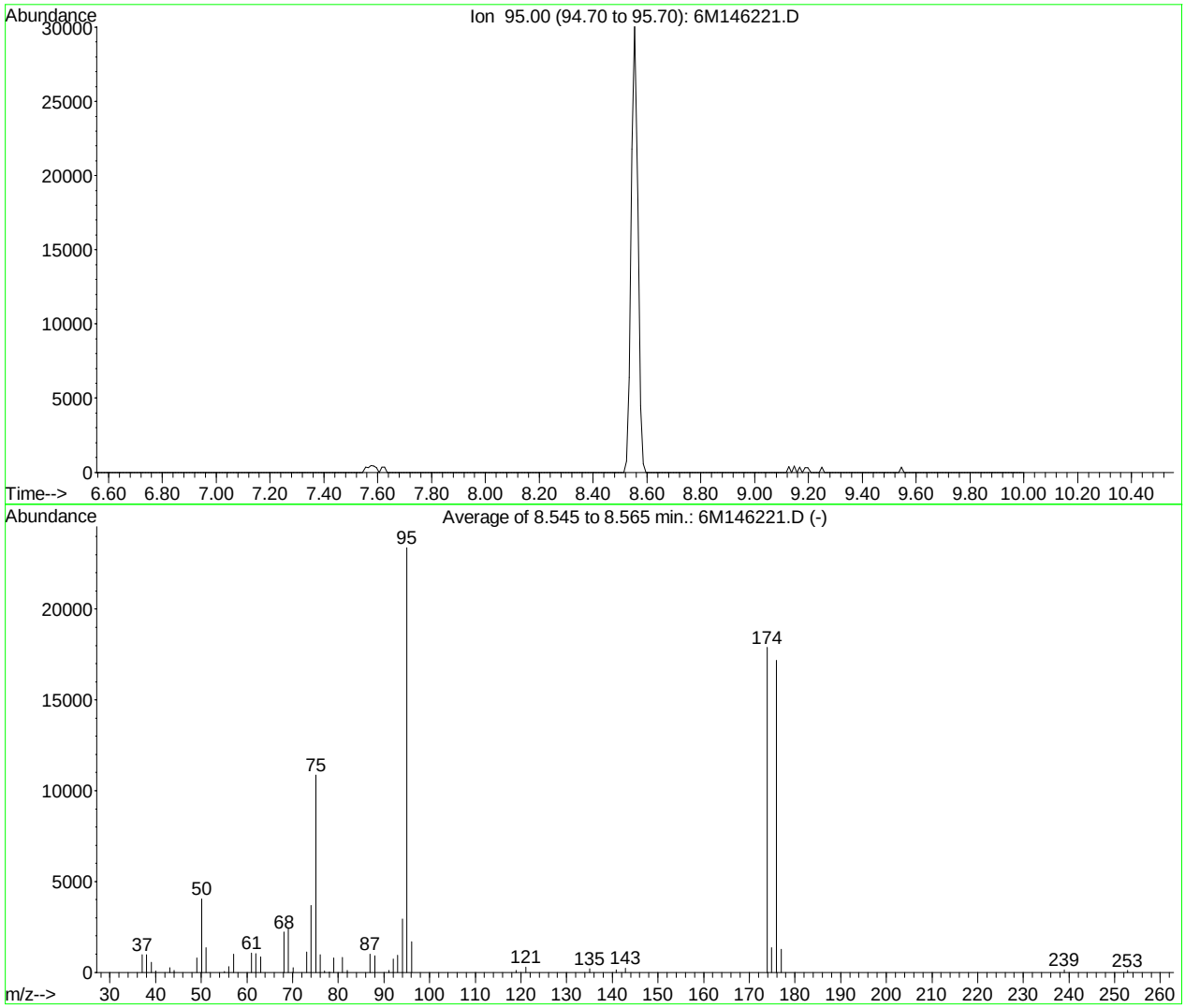


AutoFind: Scans 258, 259, 260; Background Corrected with Scan 253

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	7923	PASS
75	95	30	60	54.8	22651	PASS
95	95	100	100	100.0	41304	PASS
96	95	5	9	7.3	3007	PASS
173	174	0.00	2	0.4	116	PASS
174	95	50	100	79.8	32963	PASS
175	174	5	9	8.2	2709	PASS
176	174	95	101	97.3	32071	PASS
177	176	5	9	6.7	2147	PASS

6M144707.D BFB.M Thu Apr 27 13:11:59 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146221.D Vial: 3
Acq On : 5 Apr 2017 16:29 Operator: TMB
Sample : WG608938-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

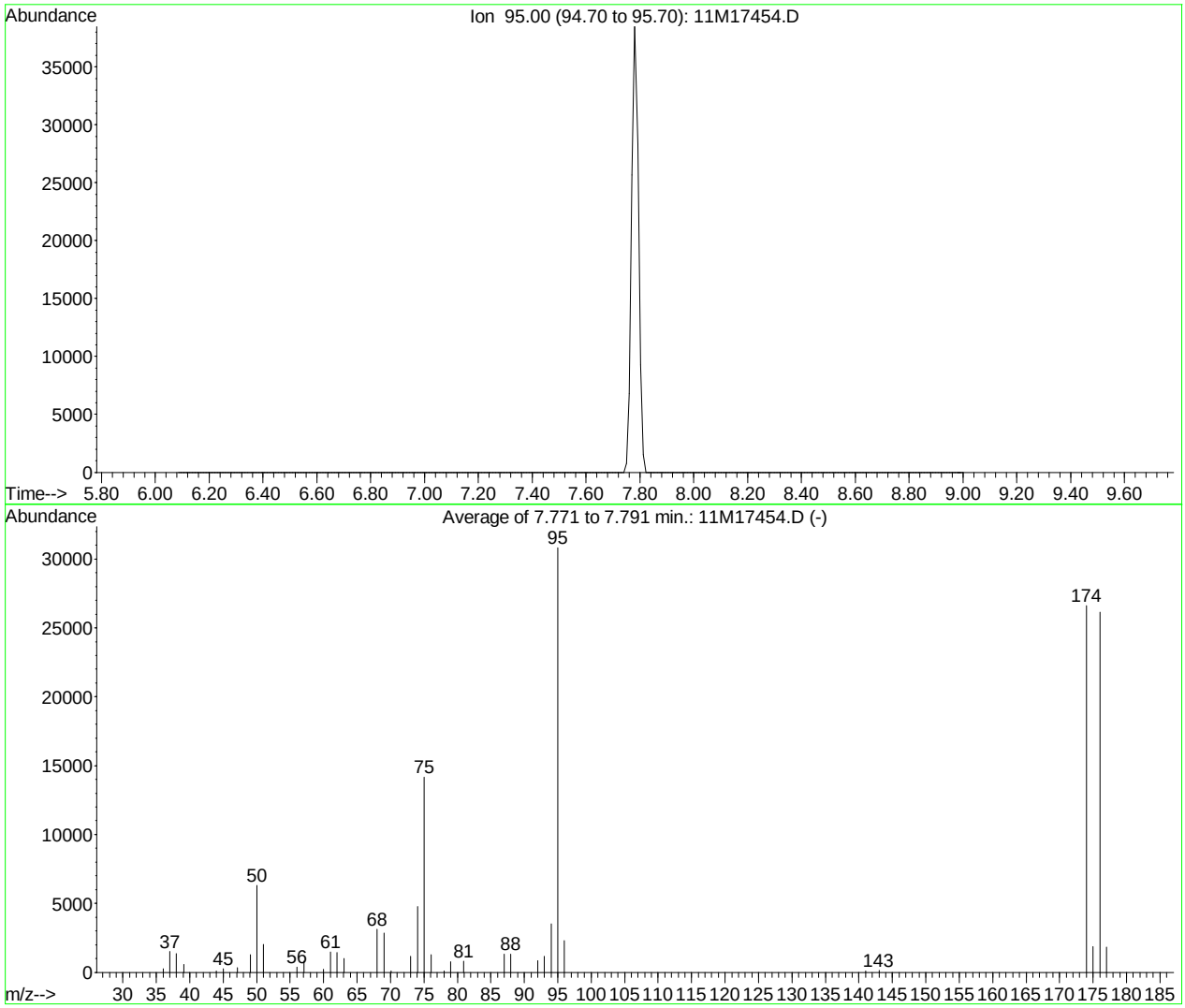


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.3	4043	PASS
75	95	30	60	46.5	10875	PASS
95	95	100	100	100.0	23389	PASS
96	95	5	9	7.2	1674	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	76.5	17883	PASS
175	174	5	9	7.6	1356	PASS
176	174	95	101	96.1	17186	PASS
177	176	5	9	7.3	1263	PASS

6M146221.D 8260BWT.M Thu Apr 06 14:59:20 2017

Data File : C:\MSDCHEM\1\DATA\041117\11M17454.D Vial: 1
Acq On : 11 Apr 2017 17:59 Operator: FJB
Sample : WG609769-01 BFB 50ng A9 Inst : hpms11
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11

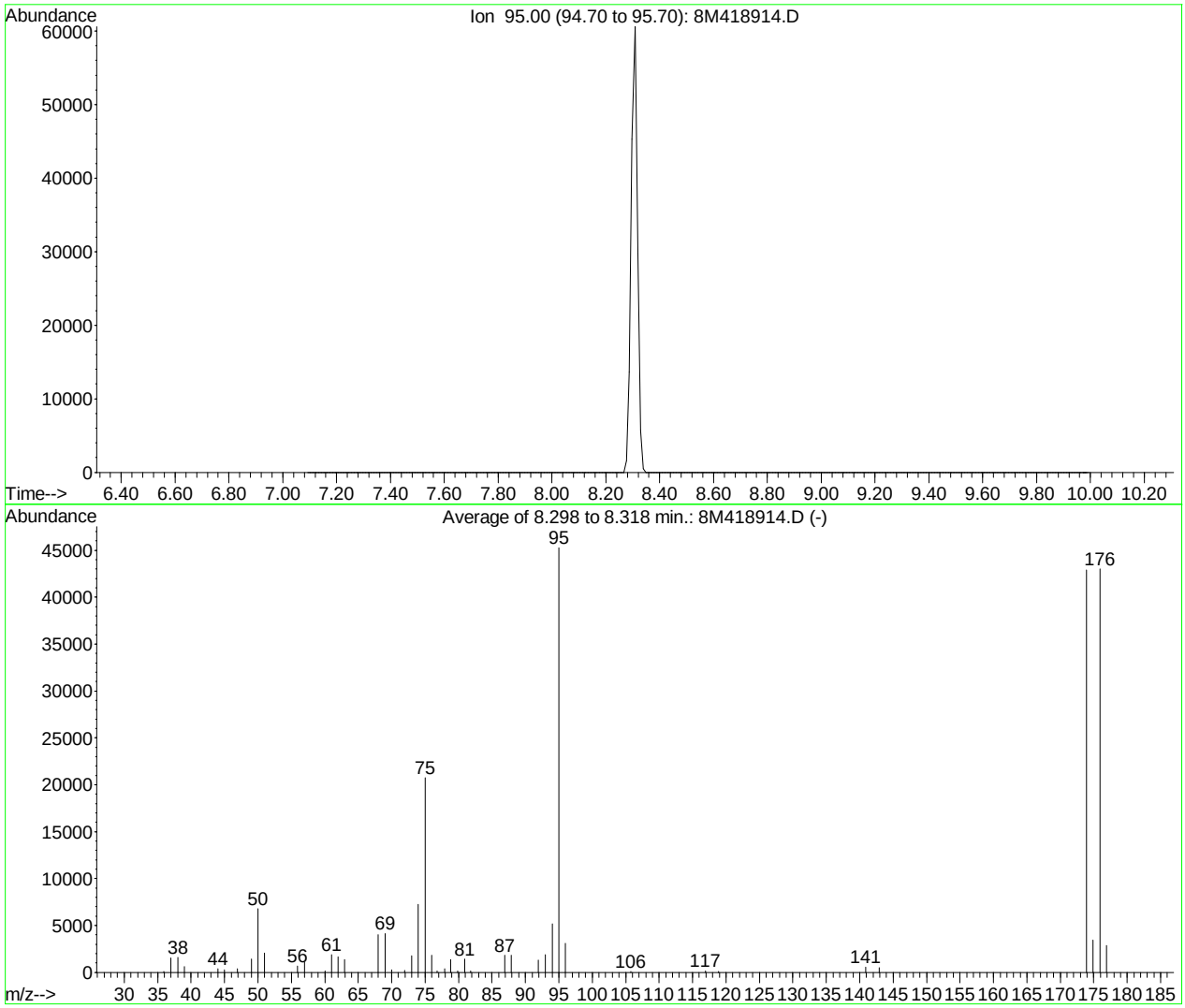


AutoFind: Scans 164, 165, 166; Background Corrected with Scan 159

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	20.4	6289	PASS
75	95	30	60	45.9	14147	PASS
95	95	100	100	100.0	30826	PASS
96	95	5	9	7.4	2288	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	86.3	26595	PASS
175	174	5	9	7.1	1884	PASS
176	174	95	101	98.2	26124	PASS
177	176	5	9	7.0	1818	PASS

11M17454.D A9FOOWT.M Fri Apr 21 13:38:28 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418914.D Vial: 1
Acq On : 12 Apr 2017 10:17 Operator: TMB
Sample : WG609829-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8

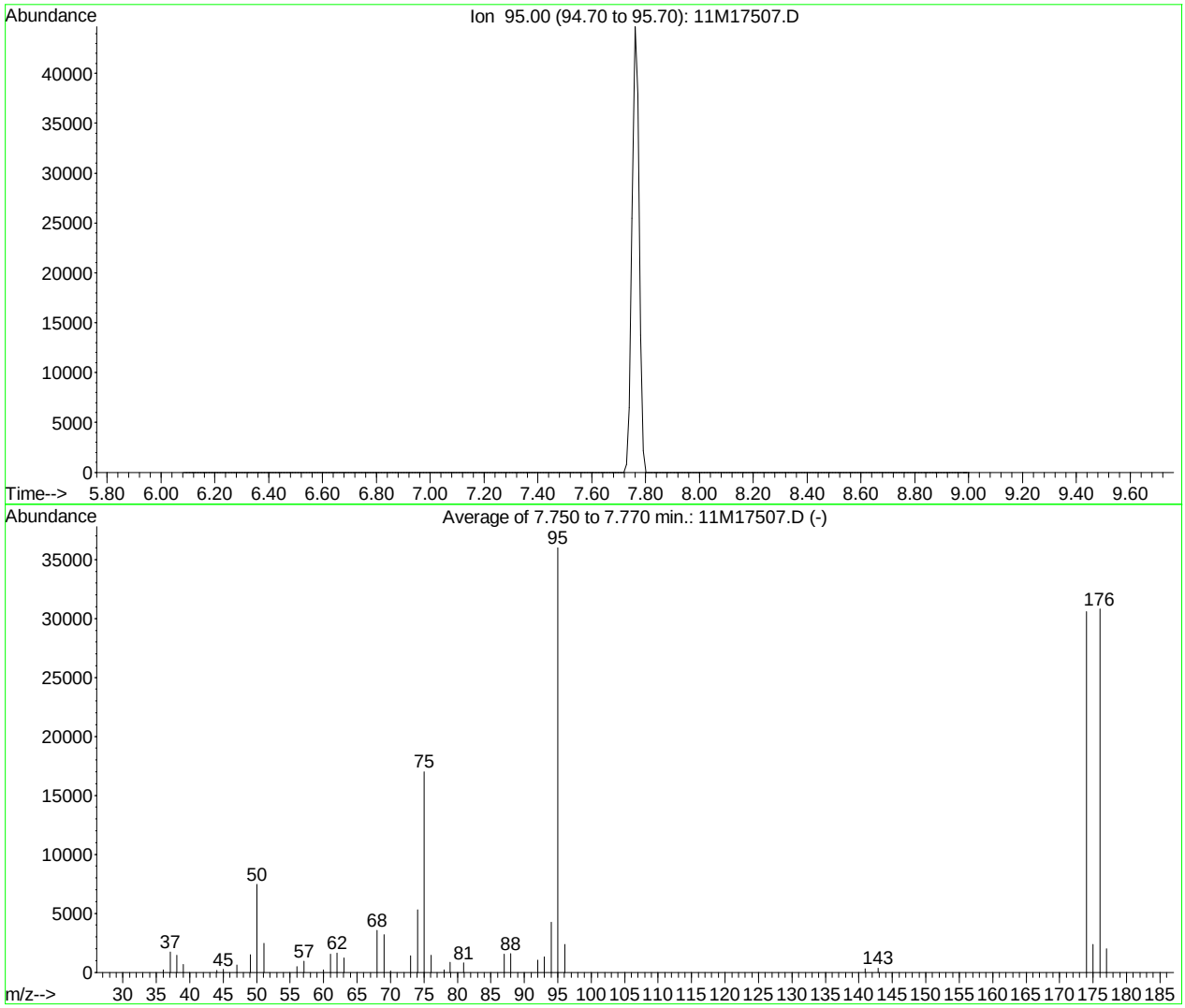


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	15.0	6807	PASS
75	95	30	60	45.8	20724	PASS
95	95	100	100	100.0	45280	PASS
96	95	5	9	6.8	3077	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	94.7	42898	PASS
175	174	5	9	8.0	3453	PASS
176	174	95	101	100.2	42994	PASS
177	176	5	9	6.7	2876	PASS

8M418914.D 8260WTR.M Fri Apr 14 13:50:48 2017

Data File : C:\MSDCHEM\1\DATA\041417\11M17507.D Vial: 1
Acq On : 14 Apr 2017 12:41 Operator: FJB
Sample : WG610045-01 BFB 50ng 8260 Inst : hpms11
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11

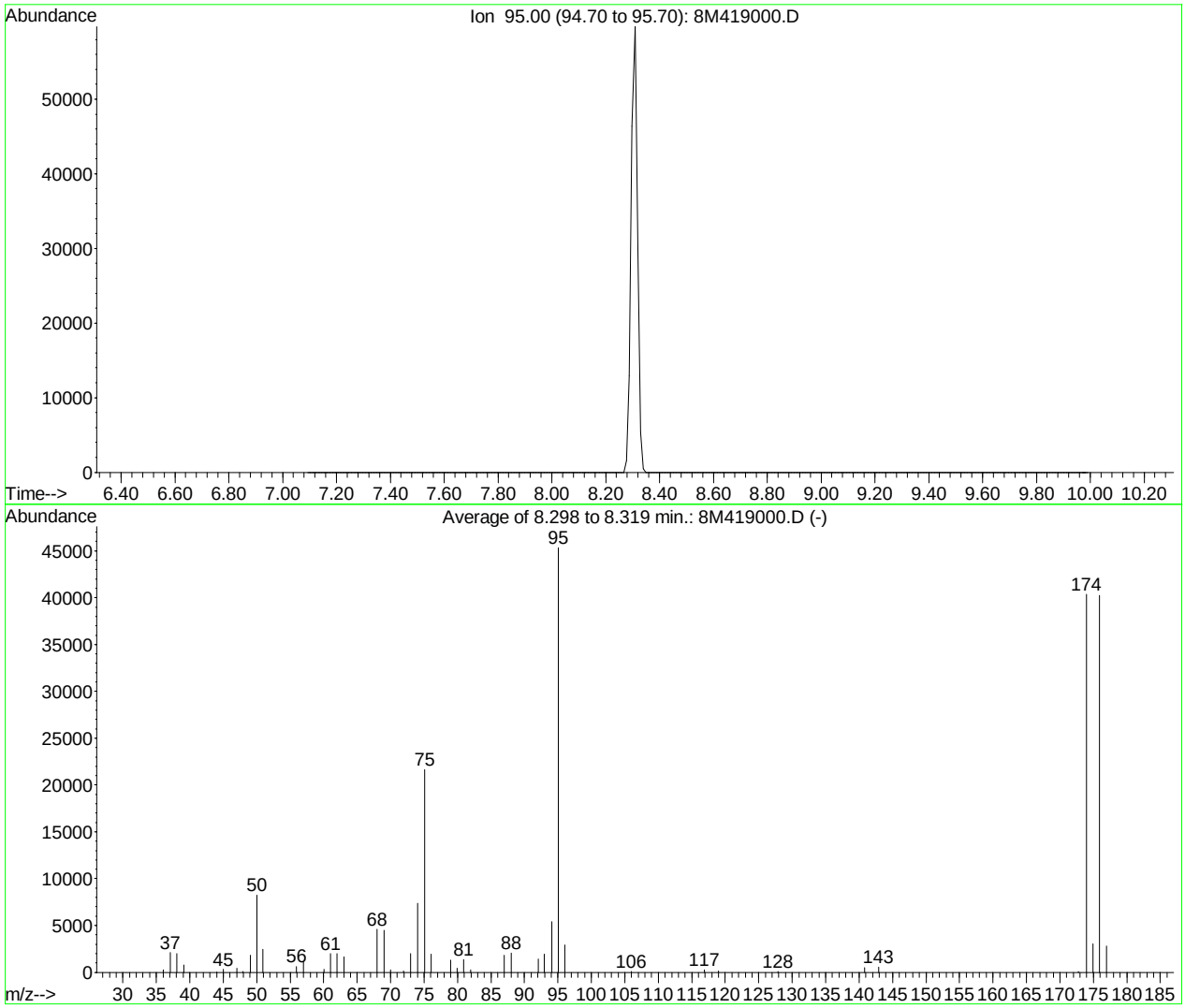


AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	20.7	7448	PASS
75	95	30	60	47.3	17024	PASS
95	95	100	100	100.0	36010	PASS
96	95	5	9	6.5	2344	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	85.0	30592	PASS
175	174	5	9	7.7	2369	PASS
176	174	95	101	100.8	30827	PASS
177	176	5	9	6.5	2009	PASS

11M17507.D 8260WTR.M Wed Apr 19 15:54:26 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419000.D Vial: 1
Acq On : 17 Apr 2017 12:58 Operator: TMB
Sample : WG610410-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8

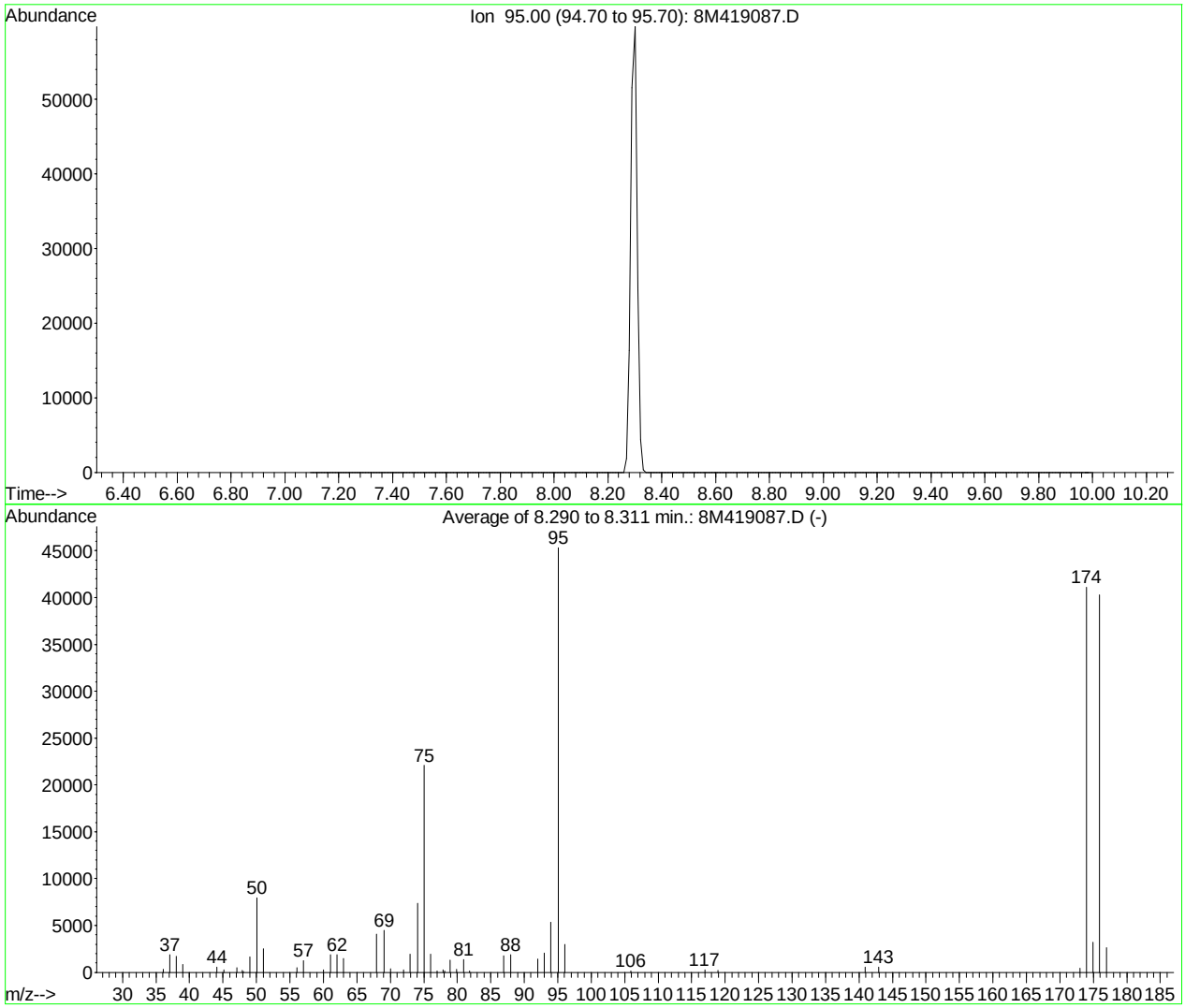


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.1	8216	PASS
75	95	30	60	47.8	21655	PASS
95	95	100	100	100.0	45349	PASS
96	95	5	9	6.4	2901	PASS
173	174	0.00	2	0.3	110	PASS
174	95	50	100	89.0	40349	PASS
175	174	5	9	7.5	3042	PASS
176	174	95	101	99.8	40256	PASS
177	176	5	9	7.0	2800	PASS

8M419000.D 8260WT.M Tue Apr 18 11:58:27 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419087.D Vial: 1
Acq On : 21 Apr 2017 12:41 Operator: TMB
Sample : WG611118-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8

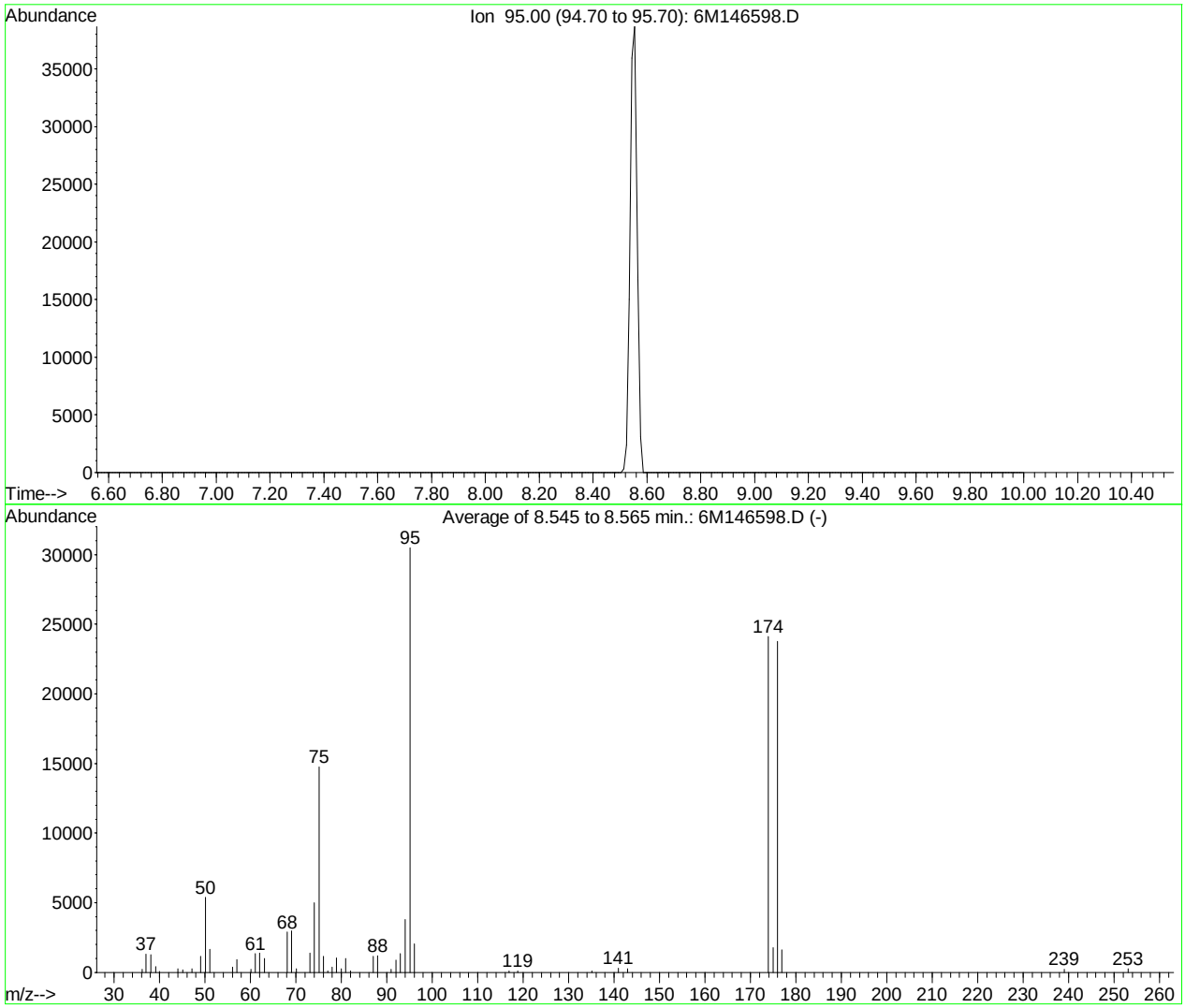


AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.6	7972	PASS
75	95	30	60	48.8	22114	PASS
95	95	100	100	100.0	45330	PASS
96	95	5	9	6.6	3004	PASS
173	174	0.00	2	1.1	451	PASS
174	95	50	100	90.7	41101	PASS
175	174	5	9	7.8	3190	PASS
176	174	95	101	98.0	40272	PASS
177	176	5	9	6.6	2658	PASS

8M419087.D 8260WT.M Fri Apr 21 13:52:08 2017

```
Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146598.D Vial: 1
Acq On    : 21 Apr 2017  13:29                    Operator: TMB
Sample    : WG611068-01 50ng BFB STD 8260         Inst    : Hpms6
Misc      : 1,1 STD81491                          Multiplr: 1.00
MS Integration Params: RTEINT.P
Method    : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title     : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
```

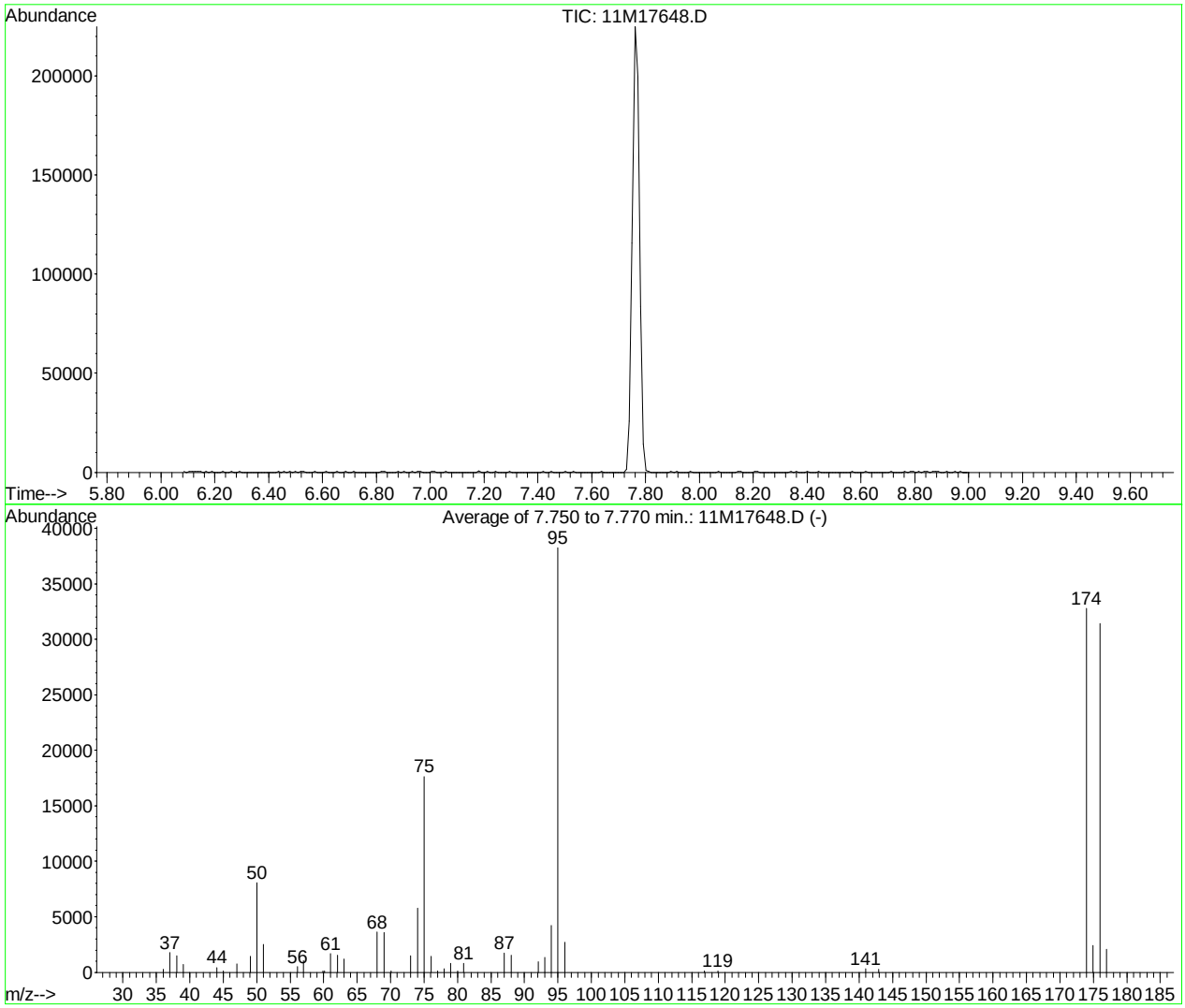


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 333

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.6	5369	PASS
75	95	30	60	48.4	14761	PASS
95	95	100	100	100.0	30504	PASS
96	95	5	9	6.7	2035	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	79.1	24130	PASS
175	174	5	9	7.3	1756	PASS
176	174	95	101	98.4	23752	PASS
177	176	5	9	6.8	1607	PASS

6M146598.D 8260BWT.M Fri Apr 21 13:53:04 2017

Data File : C:\MSDCHEM\1\DATA\042117\11M17648.D Vial: 1
Acq On : 21 Apr 2017 16:07 Operator: JDS
Sample : WG611143-01 BFB 50ng 8260 Inst : hpms11
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11

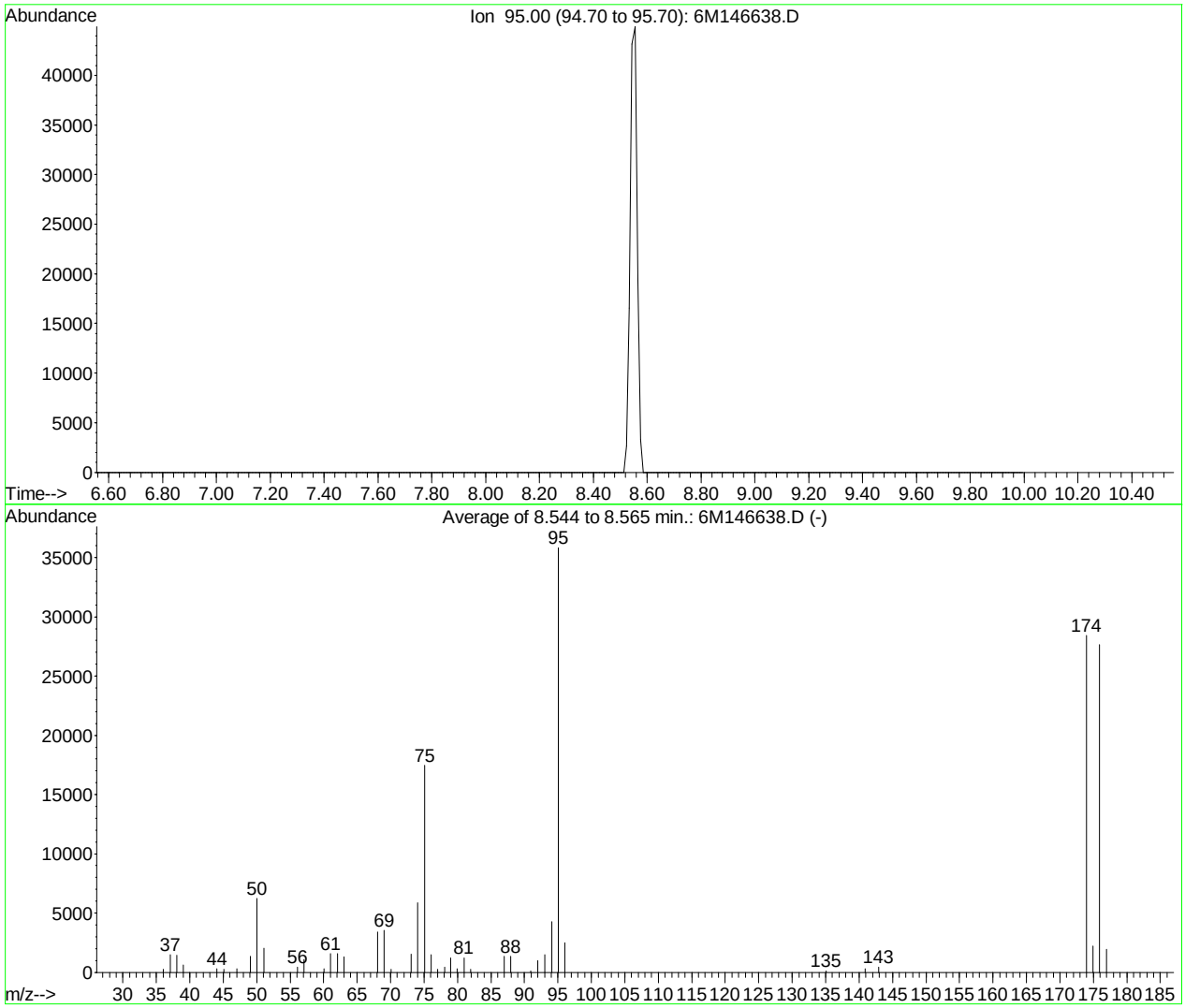


AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	21.1	8087	PASS
75	95	30	60	46.1	17649	PASS
95	95	100	100	100.0	38258	PASS
96	95	5	9	7.1	2723	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	85.7	32776	PASS
175	174	5	9	7.4	2433	PASS
176	174	95	101	95.9	31422	PASS
177	176	5	9	6.6	2079	PASS

11M17648.D 8260WTR.M Fri Apr 21 16:54:28 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146638.D Vial: 1
Acq On : 22 Apr 2017 14:25 Operator: JDS
Sample : WG611221-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

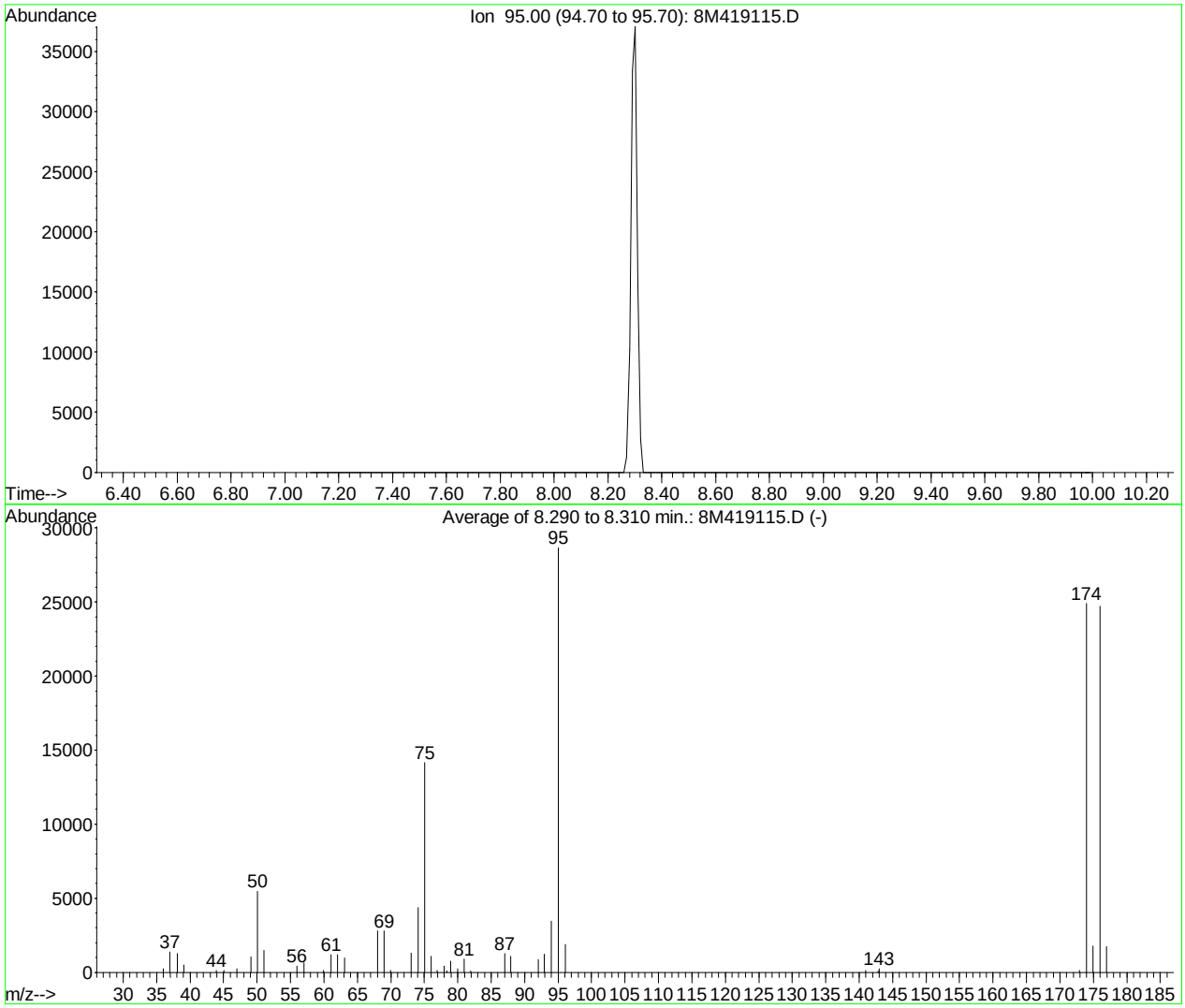


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.4	6249	PASS
75	95	30	60	48.8	17489	PASS
95	95	100	100	100.0	35840	PASS
96	95	5	9	6.9	2482	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	79.4	28445	PASS
175	174	5	9	7.8	2225	PASS
176	174	95	101	97.2	27637	PASS
177	176	5	9	7.1	1964	PASS

6M146638.D 8260BWT.M Mon Apr 24 08:40:45 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419115.D Vial: 1
Acq On : 24 Apr 2017 11:16 Operator: TMB
Sample : WG611300-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8

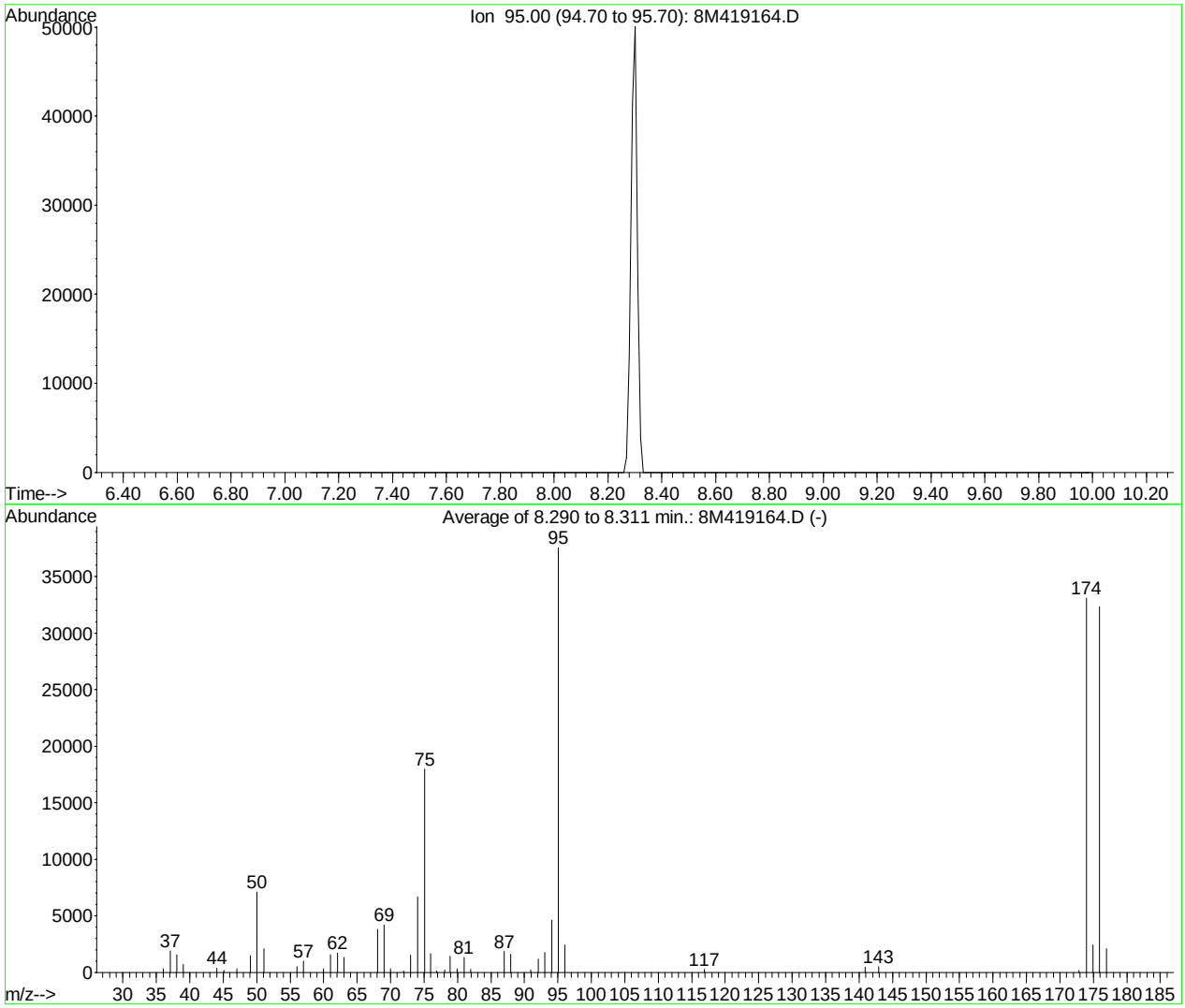


AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.1	5480	PASS
75	95	30	60	49.3	14142	PASS
95	95	100	100	100.0	28672	PASS
96	95	5	9	6.6	1898	PASS
173	174	0.00	2	0.5	126	PASS
174	95	50	100	86.8	24885	PASS
175	174	5	9	7.2	1790	PASS
176	174	95	101	99.3	24712	PASS
177	176	5	9	7.0	1730	PASS

8M419115.D 8260WT.M Mon Apr 24 12:50:49 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419164.D Vial: 1
Acq On : 26 Apr 2017 7:53 Operator: TMB
Sample : WG611560-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.9	7090	PASS
75	95	30	60	47.8	17949	PASS
95	95	100	100	100.0	37554	PASS
96	95	5	9	6.4	2408	PASS
173	174	0.00	2	0.5	182	PASS
174	95	50	100	88.1	33098	PASS
175	174	5	9	7.2	2399	PASS
176	174	95	101	97.7	32344	PASS
177	176	5	9	6.5	2088	PASS

8M419164.D 8260WT.M Wed Apr 26 09:35:03 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17651.D Vial: 3
Acq On : 21 Apr 2017 17:33 Operator: JDS
Sample : WG611145-01 BLANK 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:51:47 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

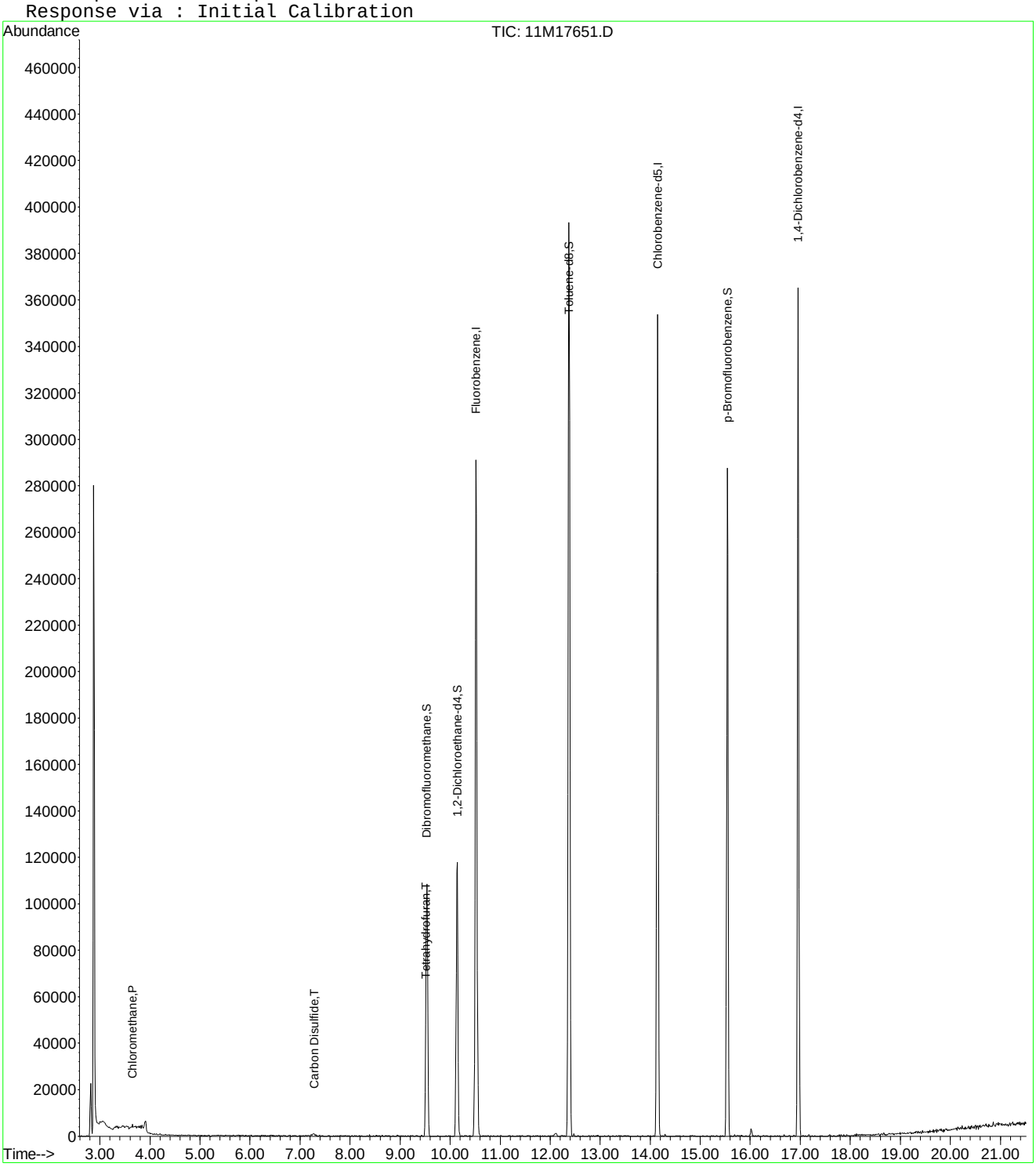
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	348108	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	242248	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	121999	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86493	23.9461	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.80%			
43) 1,2-Dichloroethane-d4	10.14	65	100944	24.6724	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.68%			
57) Toluene-d8	12.38	98	336174	25.4915	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.96%			
78) p-Bromofluorobenzene	15.54	95	120430	26.5602	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.24%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	2121	0.3678	ug/L #	74
20) Carbon Disulfide	7.28	76	1596	0.1476	ug/L #	73
36) Tetrahydrofuran	9.51	42	2541	1.7785	ug/L #	56

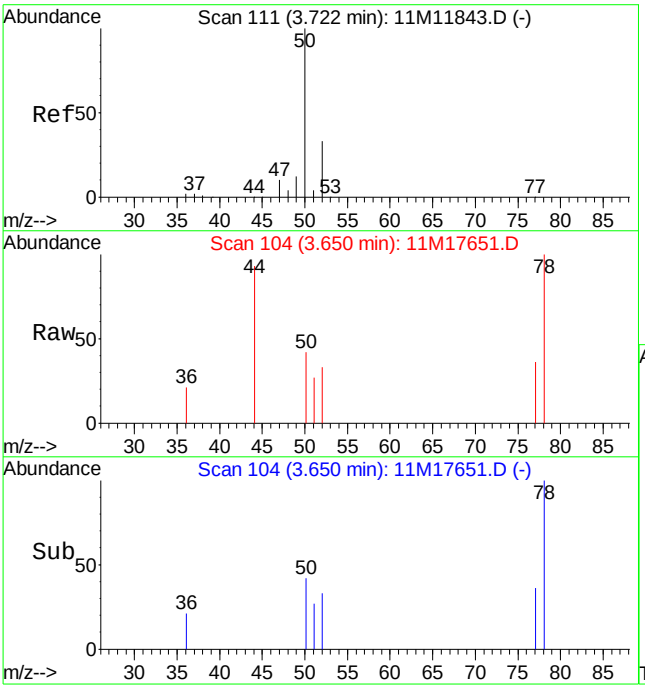
(#) = qualifier out of range (m) = manual integration
11M17651.D 8260WTR.M Tue Apr 25 13:51:48 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042117\11M17651.D Vial: 3
Acq On : 21 Apr 2017 17:33 Operator: JDS
Sample : WG611145-01 BLANK 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 13:51 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration

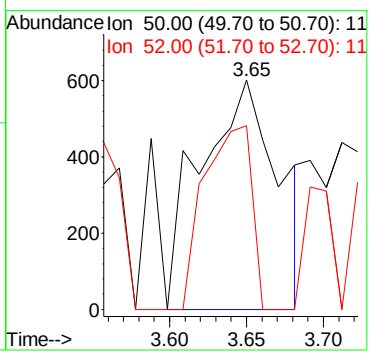


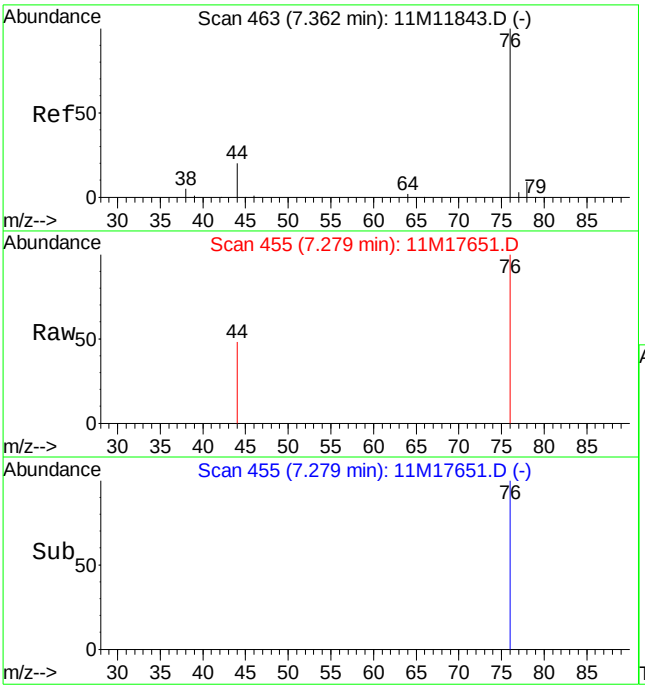


#3
Chloromethane
Concen: 0.37 ug/L
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17651.D
Acq: 21 Apr 2017 17:33

Tgt Ion: 50 Resp: 2121

Ion	Ratio	Lower	Upper
50	100		
52	48.9	20.3	47.3#

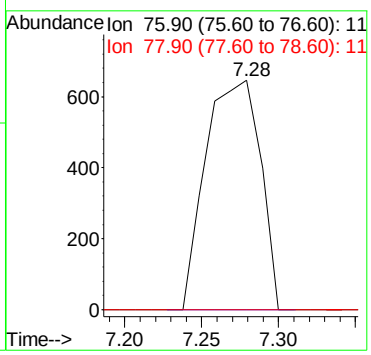


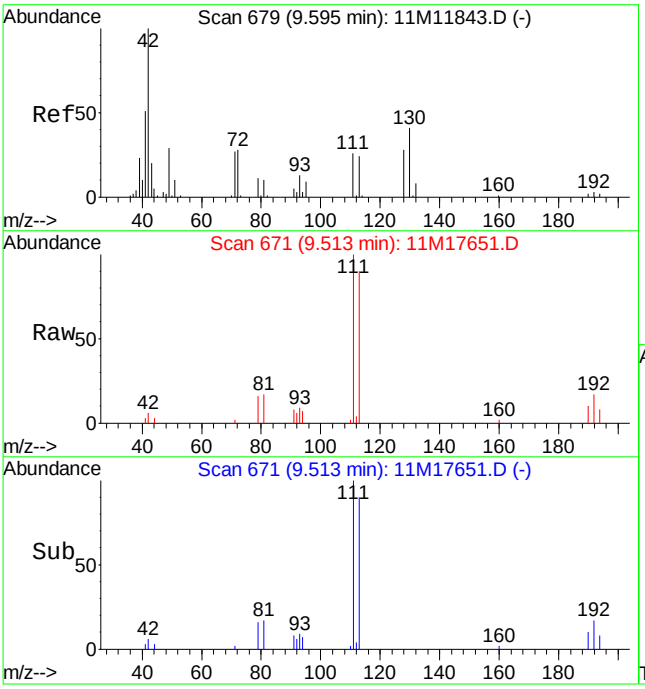


#20
Carbon Disulfide
Concen: 0.15 ug/L
RT: 7.28 min Scan# 455
Delta R.T. 0.01 min
Lab File: 11M17651.D
Acq: 21 Apr 2017 17:33

Tgt Ion: 76 Resp: 1596

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.9#

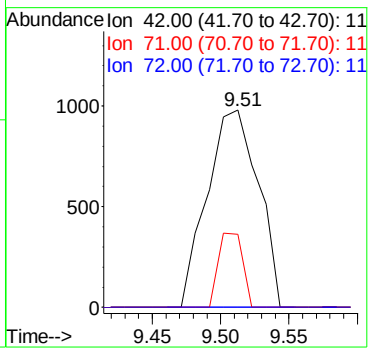




#36
Tetrahydrofuran
Concen: 1.78 ug/L
RT: 9.51 min Scan# 671
Delta R.T. 0.01 min
Lab File: 11M17651.D
Acq: 21 Apr 2017 17:33

Tgt Ion: 42 Resp: 2541

Ion	Ratio	Lower	Upper
42	100		
71	17.9	19.9	46.3#
72	0.0	21.0	49.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146601.D Vial: 4
Acq On : 21 Apr 2017 14:56 Operator: TMB
Sample : WG611071-01 VBLK0421 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:13 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

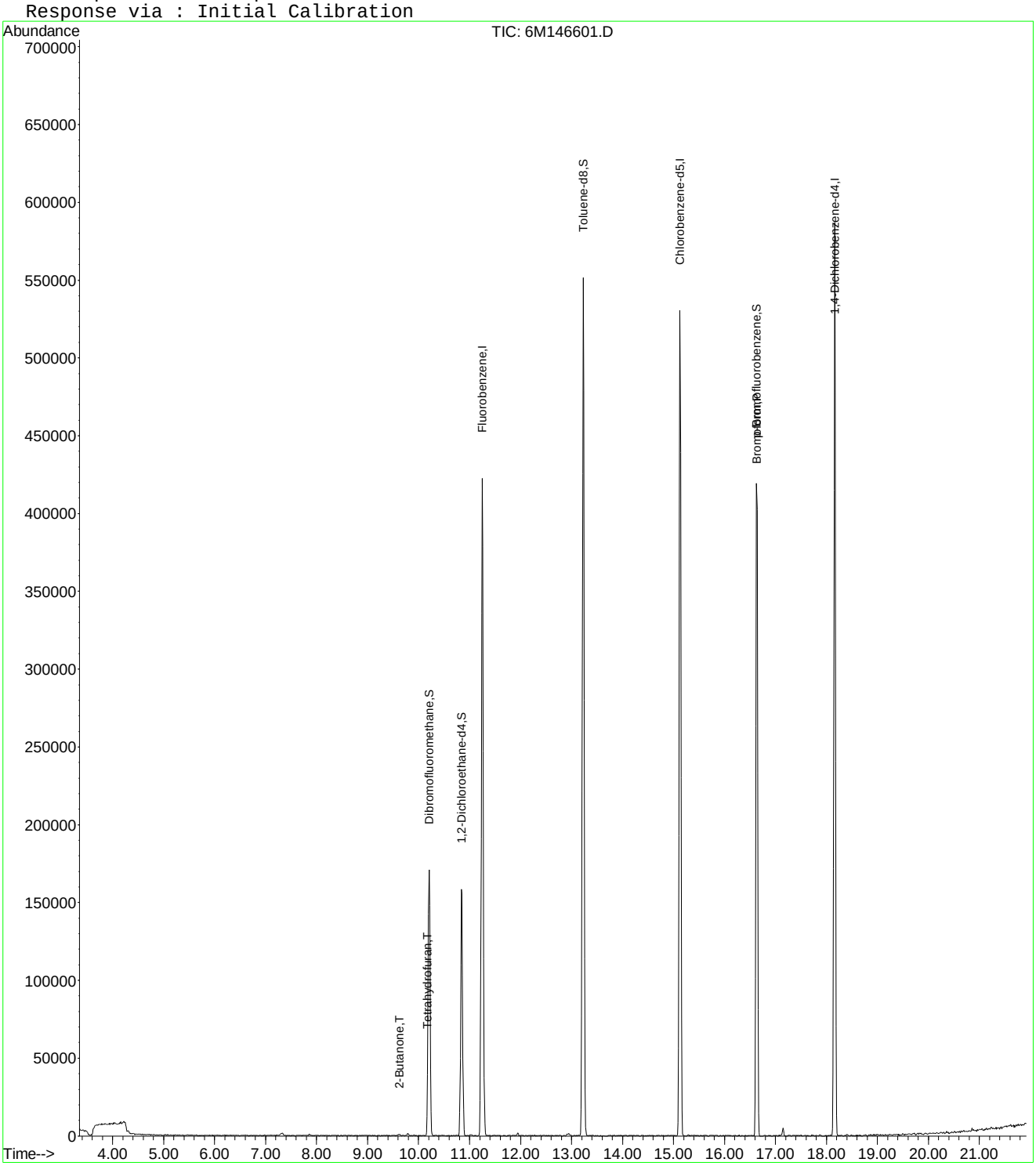
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	543898	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	392124	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	200113	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	145864	26.2710	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.08%			
43) 1,2-Dichloroethane-d4	10.84	65	145652	26.6166	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.48%			
58) Toluene-d8	13.23	98	515942	25.7853	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.16%			
80) p-Bromofluorobenzene	16.63	95	203233	26.7398	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.96%			
Target Compounds						Qvalue
3) Chloromethane	4.04	50	886	Below Cal		80
29) 2-Butanone	9.62	43	1928	1.3034	ug/L #	57
36) Tetrahydrofuran	10.17	42	1330	1.3653	ug/L #	69
76) Bromoform	16.64	173	472	0.1356	ug/L #	1

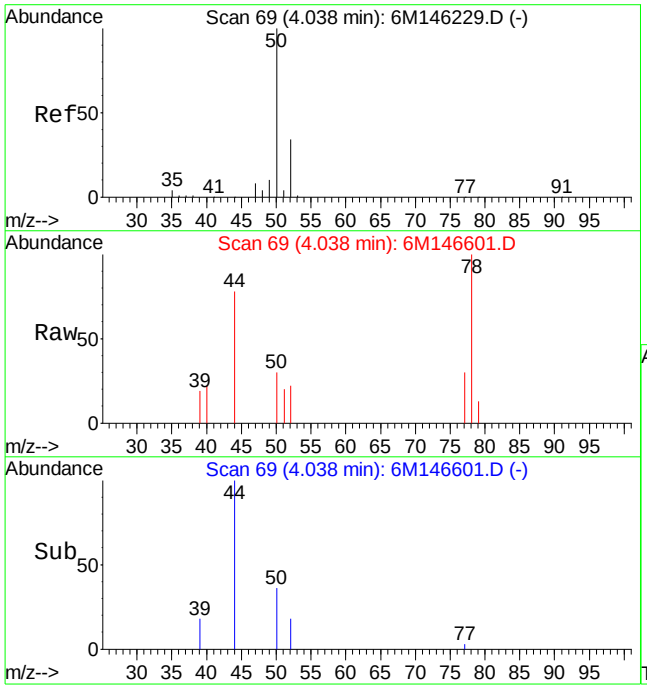
(#) = qualifier out of range (m) = manual integration
6M146601.D 8260BWT.M Mon Apr 24 08:59:39 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146601.D Vial: 4
Acq On : 21 Apr 2017 14:56 Operator: TMB
Sample : WG611071-01 VBLK0421 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

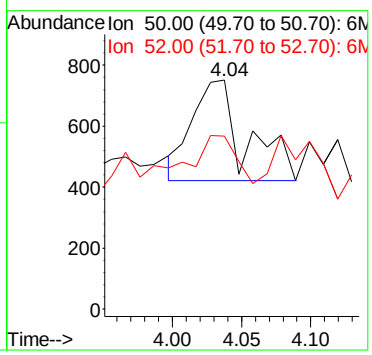


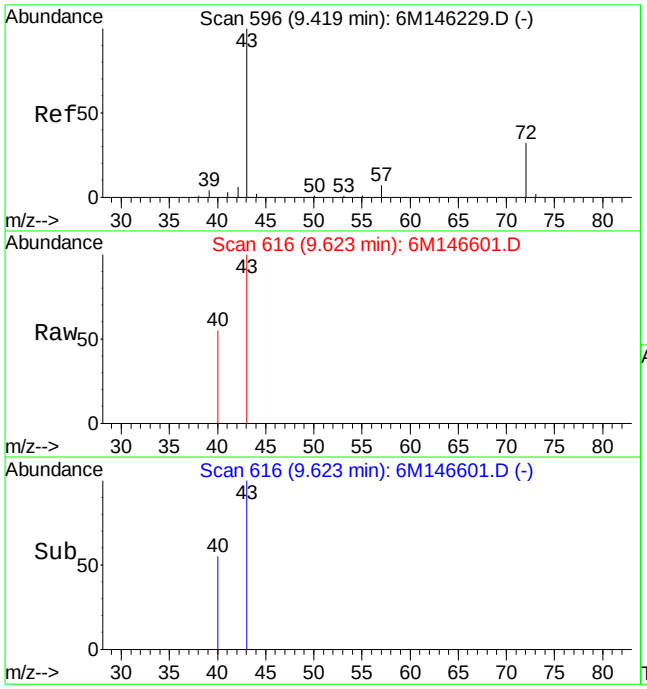


#3
Chloromethane
Concen: Below Cal
RT: 4.04 min Scan# 69
Delta R.T. 0.02 min
Lab File: 6M146601.D
Acq: 21 Apr 2017 14:56

Tgt Ion: 50 Resp: 886

Ion	Ratio	Lower	Upper
50	100		
52	44.6	19.8	46.2

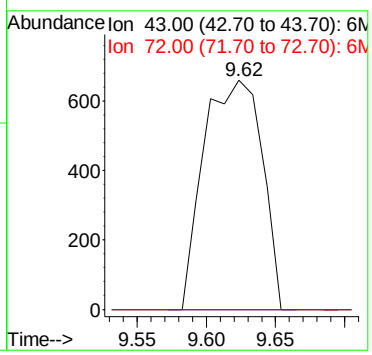


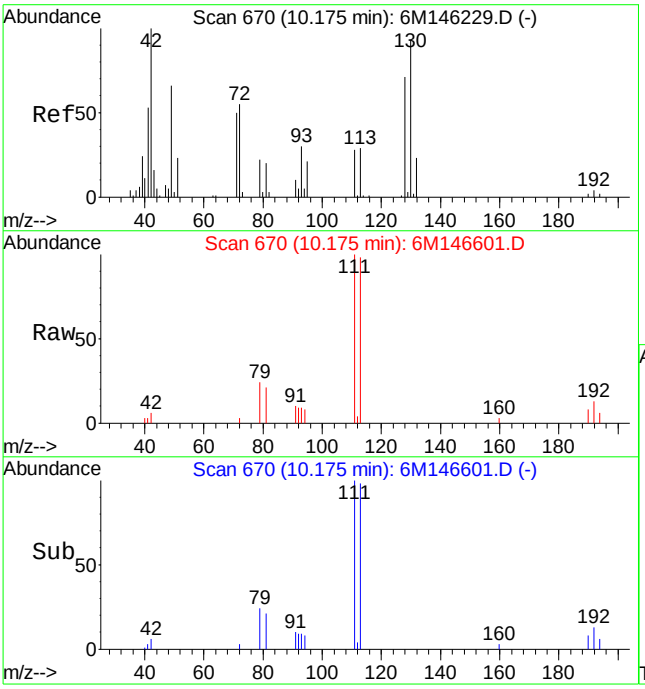


#29
2-Butanone
Concen: 1.30 ug/L
RT: 9.62 min Scan# 616
Delta R.T. 0.21 min
Lab File: 6M146601.D
Acq: 21 Apr 2017 14:56

Tgt Ion: 43 Resp: 1928

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

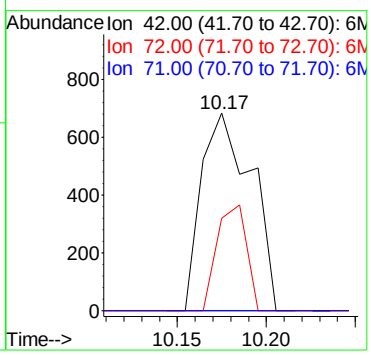


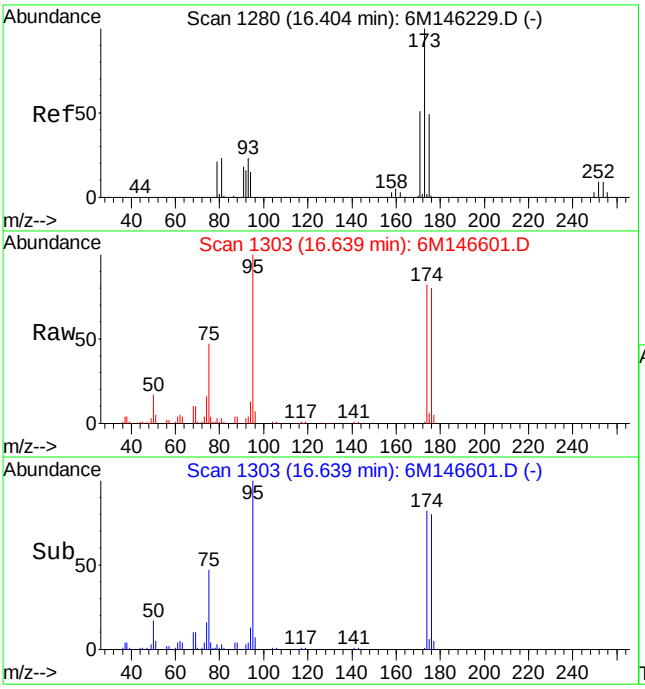


#36
Tetrahydrofuran
Concen: 1.37 ug/L
RT: 10.17 min Scan# 670
Delta R.T. -0.00 min
Lab File: 6M146601.D
Acq: 21 Apr 2017 14:56

Tgt Ion: 42 Resp: 1330

Ion	Ratio	Lower	Upper
42	100		
72	31.6	20.8	48.4
71	0.0	19.9	46.5#

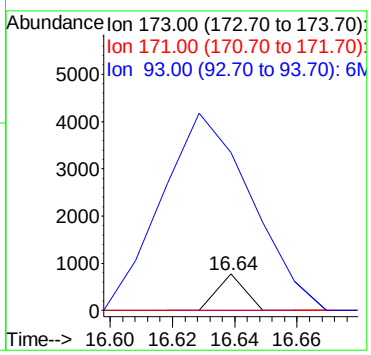




#76
Bromoform
Concen: 0.14 ug/L
RT: 16.64 min Scan# 1303
Delta R.T. 0.23 min
Lab File: 6M146601.D
Acq: 21 Apr 2017 14:56

Tgt Ion:173 Resp: 472

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1784.3	13.7	31.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146641.D Vial: 4
Acq On : 22 Apr 2017 15:55 Operator: JDS
Sample : WG611222-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 16:17:39 2017 Quant Results File: 8260BWT.RES

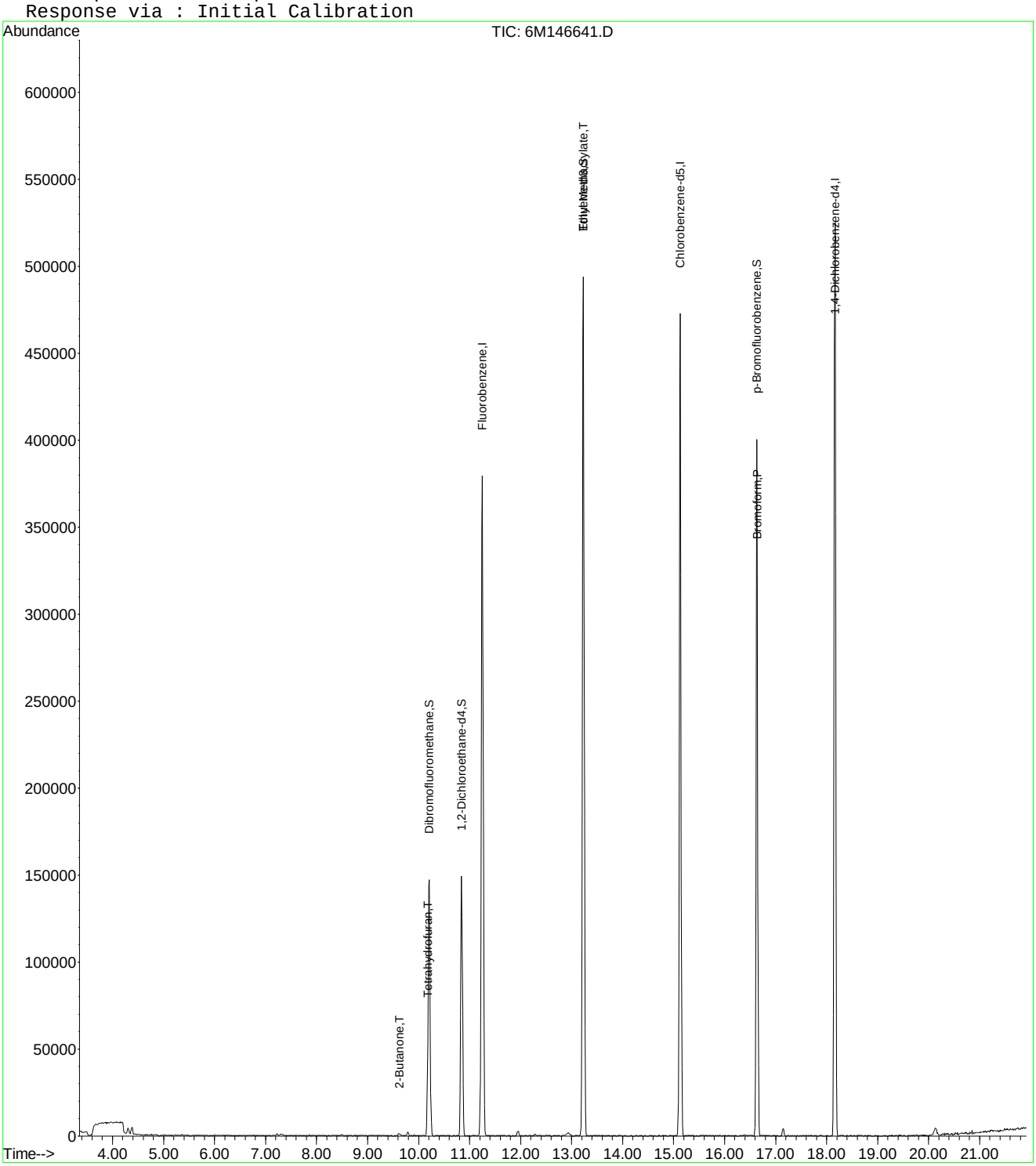
Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

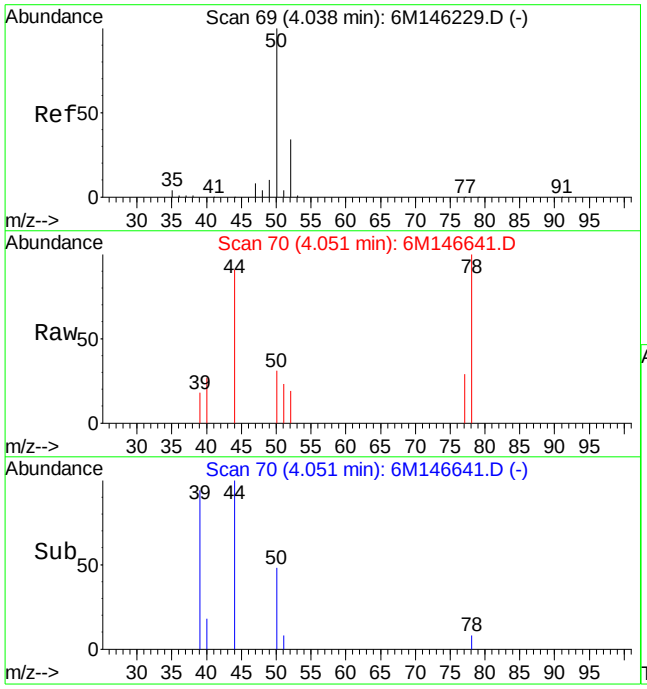
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	489868	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	354201	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	180996	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	131648	26.3258	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.32%			
43) 1,2-Dichloroethane-d4	10.84	65	132317	26.8467	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.40%			
58) Toluene-d8	13.23	98	465194	25.7382	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.96%			
80) p-Bromofluorobenzene	16.63	95	182630	26.5670	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.28%			
Target Compounds						Qvalue
3) Chloromethane	4.05	50	1469	Below Cal	#	42
29) 2-Butanone	9.63	43	2968	2.2277	ug/L #	57
36) Tetrahydrofuran	10.18	42	1563	1.7815	ug/L #	77
60) Ethyl Methacrylate	13.23	69	692	0.1291	ug/L #	59
76) Bromoform	16.64	173	646	0.2055	ug/L #	1

(#) = qualifier out of range (m) = manual integration
6M146641.D 8260BWT.M Mon Apr 24 08:42:40 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146641.D Vial: 4
Acq On : 22 Apr 2017 15:55 Operator: JDS
Sample : WG611222-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 16:17 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

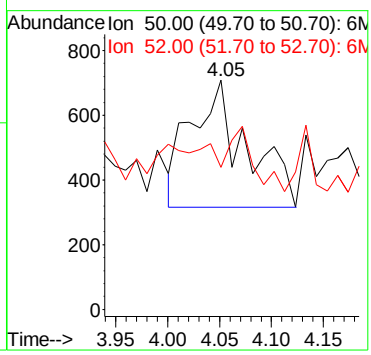


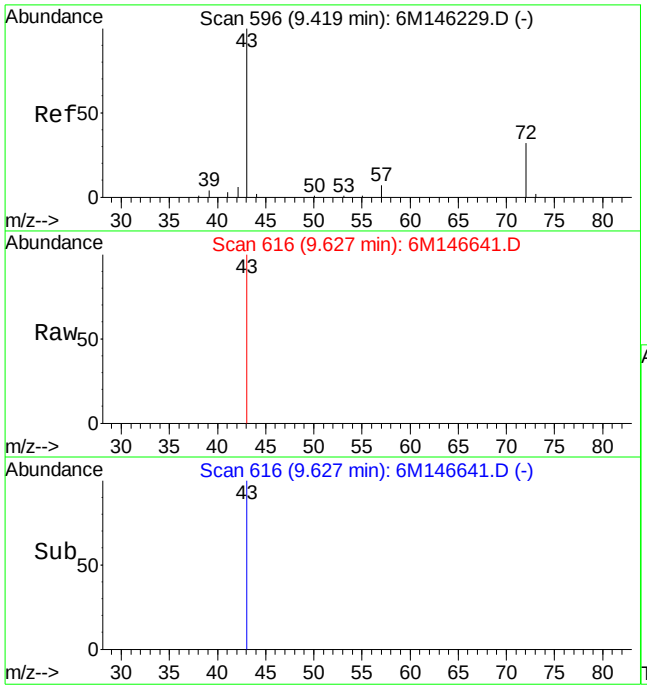


#3
Chloromethane
Concen: Below Cal
RT: 4.05 min Scan# 70
Delta R.T. 0.03 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 50 Resp: 1469

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

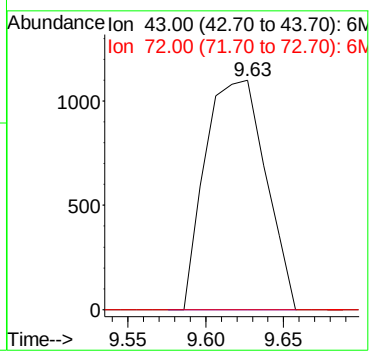


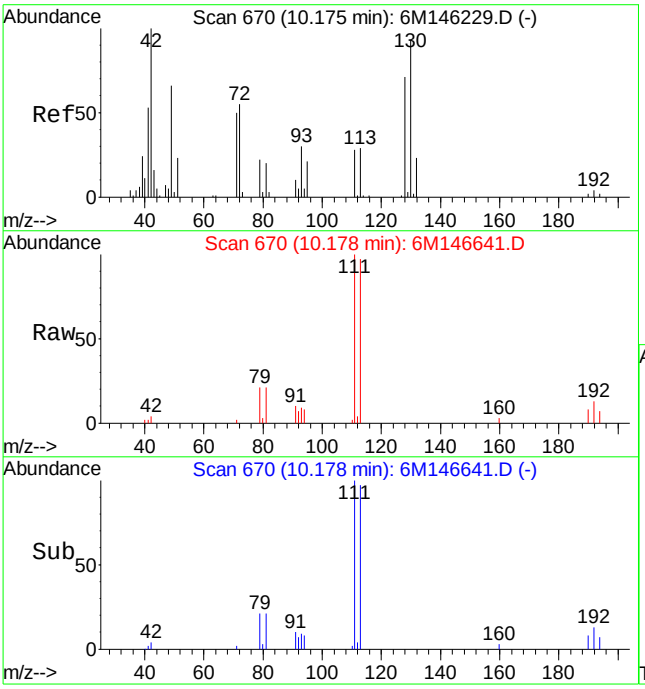


#29
2-Butanone
Concen: 2.23 ug/L
RT: 9.63 min Scan# 616
Delta R.T. 0.22 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 43 Resp: 2968

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

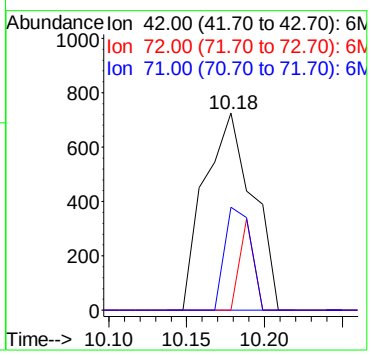


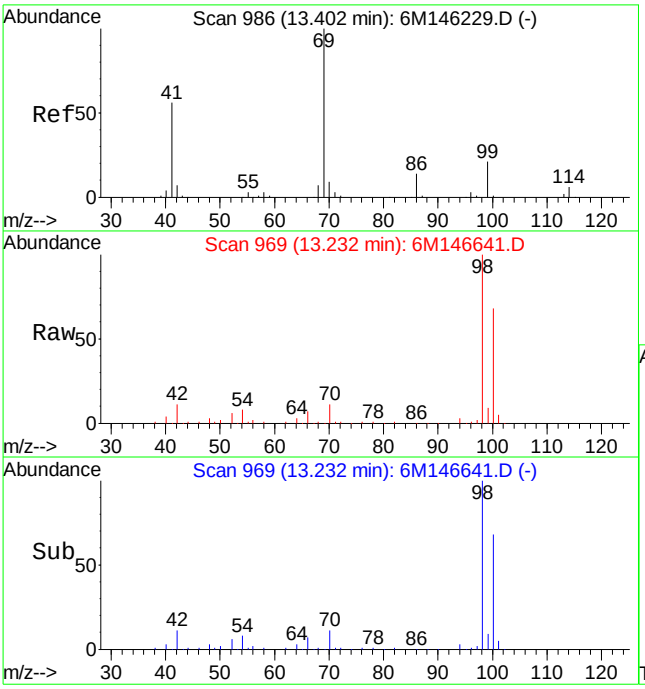


#36
Tetrahydrofuran
Concen: 1.78 ug/L
RT: 10.18 min Scan# 670
Delta R.T. 0.00 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 42 Resp: 1563

Ion	Ratio	Lower	Upper
42	100		
72	13.2	20.8	48.4#
71	28.2	19.9	46.5

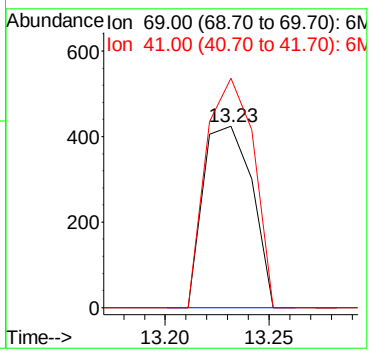


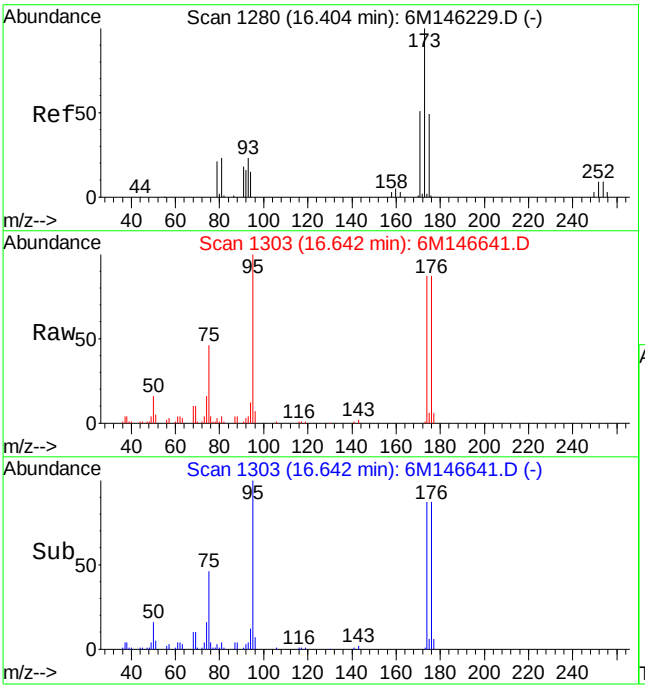


#60
Ethyl Methacrylate
Concen: 0.13 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 69 Resp: 692

Ion	Ratio	Lower	Upper
69	100		
41	122.8	51.4	120.0#

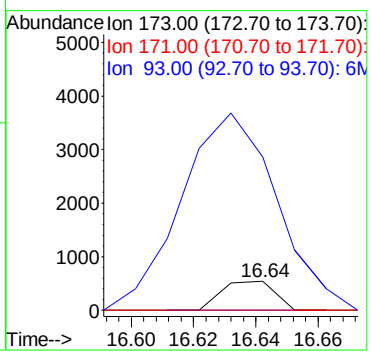




#76
Bromoform
Concen: 0.21 ug/L
RT: 16.64 min Scan# 1303
Delta R.T. 0.24 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion:173 Resp: 646

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1218.9	13.7	31.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146641.D Vial: 4
Acq On : 22 Apr 2017 15:55 Operator: JDS
Sample : WG611222-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 24 09:13:15 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

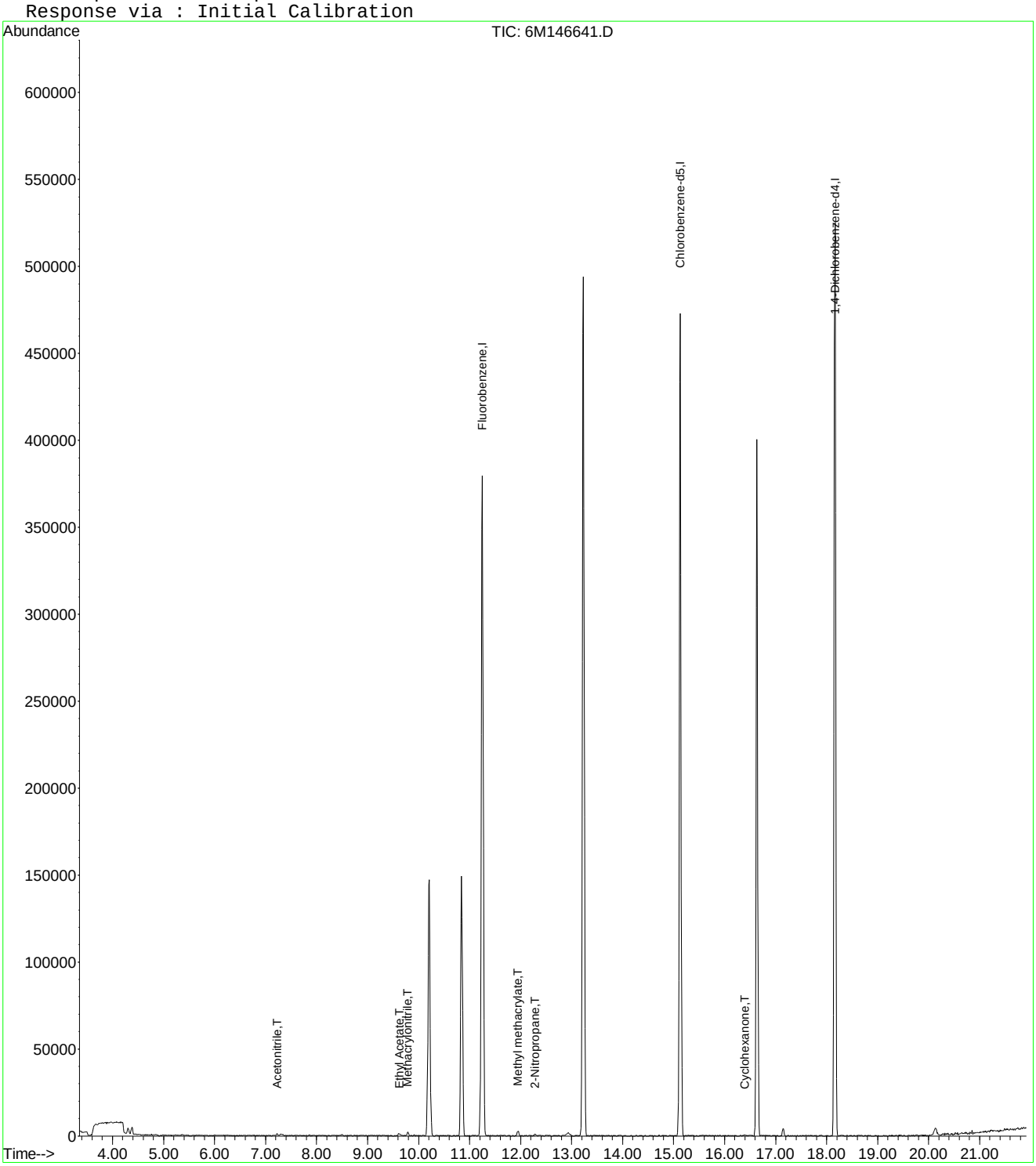
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	489868	25.00	ug/L	-0.02
11) Chlorobenzene-d5	15.13	117	354201	25.00	ug/L	-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	180996	25.00	ug/L	-0.02
Target Compounds						Qvalue
2) Acetonitrile	7.23	41	697	1.9902	ug/L	# 1
5) Ethyl Acetate	9.63	43	2968	0.9447	ug/L	# 68
6) Methacrylonitrile	9.78	67	879	0.5314	ug/L	# 45
9) Methyl methacrylate	11.94	41	1942	0.5649	ug/L	85
10) 2-Nitropropane	12.28	43	481	0.3441	ug/L	# 80
13) Cyclohexanone	16.39	55	608	8.8782	ug/L	# 25

(#) = qualifier out of range (m) = manual integration
6M146641.D A9FOOWT.M Mon Apr 24 12:53:32 2017 Page 1

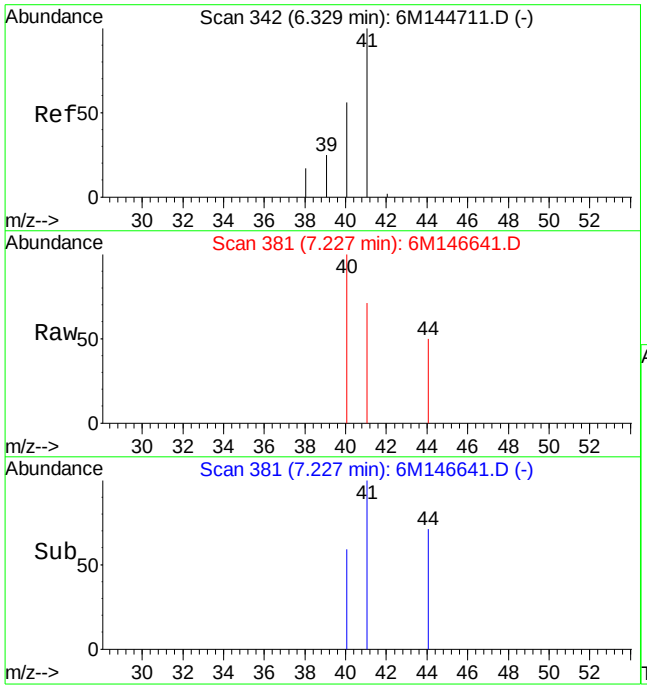
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146641.D Vial: 4
Acq On : 22 Apr 2017 15:55 Operator: JDS
Sample : WG611222-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 24 9:13 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



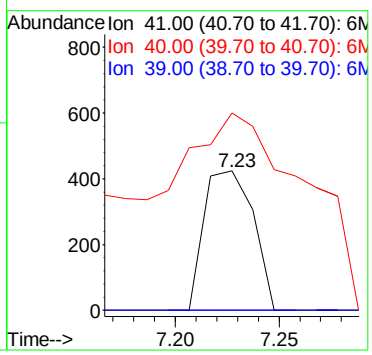
6M146641.D A9FOOWT.M Mon Apr 24 12:53:33 2017 Page 2

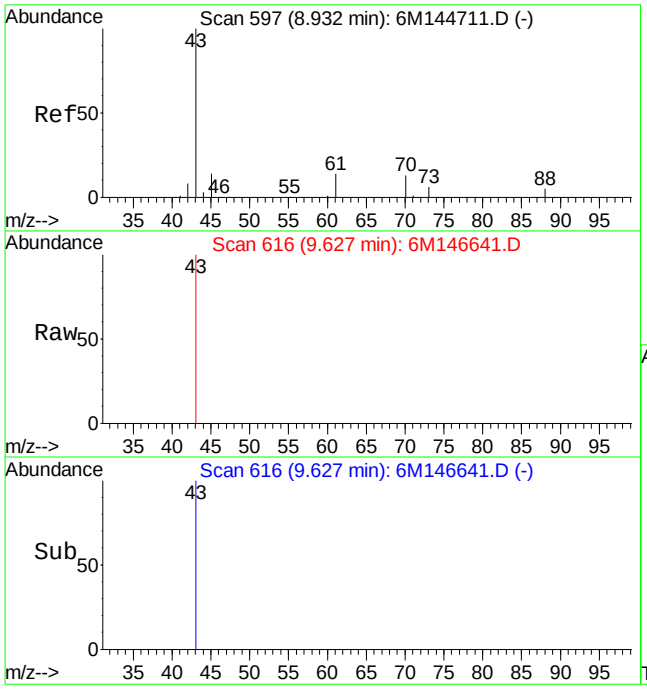


#2
Acetonitrile
Concen: 1.99 ug/L
RT: 7.23 min Scan# 381
Delta R.T. -0.00 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 41 Resp: 697

Ion	Ratio	Lower	Upper
41	100		
40	387.5	19.8	99.8#
39	0.0	0.0	57.7

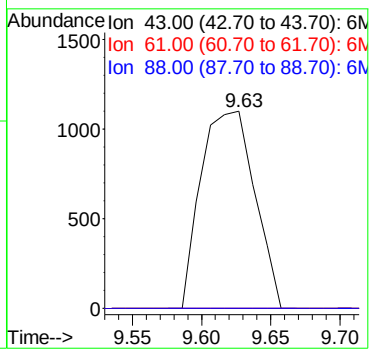


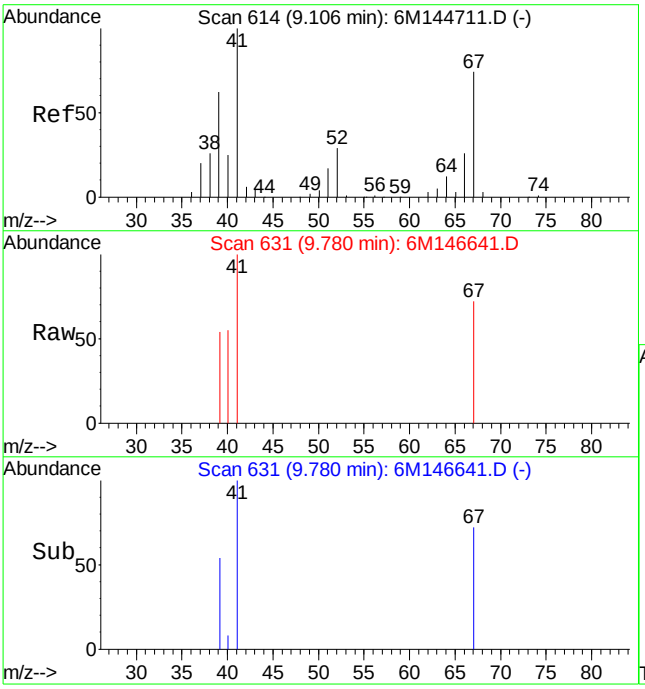


#5
Ethyl Acetate
Concen: 0.94 ug/L
RT: 9.63 min Scan# 616
Delta R.T. -0.00 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 43 Resp: 2968

Ion	Ratio	Lower	Upper
43	100		
61	0.0	9.5	22.1#
88	0.0	2.8	6.4#

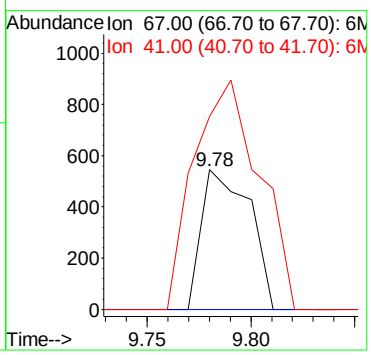


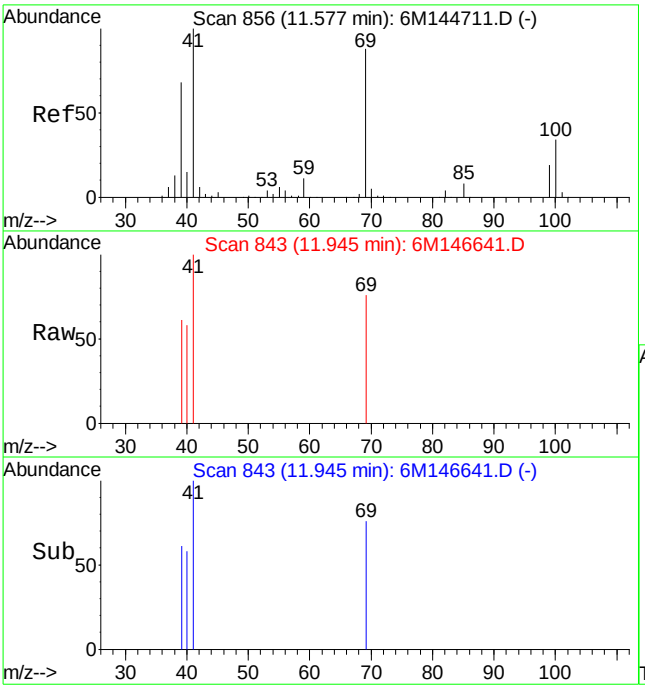


#6
Methacrylonitrile
Concen: 0.53 ug/L
RT: 9.78 min Scan# 631
Delta R.T. -0.02 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 67 Resp: 879

Ion	Ratio	Lower	Upper
67	100		
41	222.9	112.0	192.0#

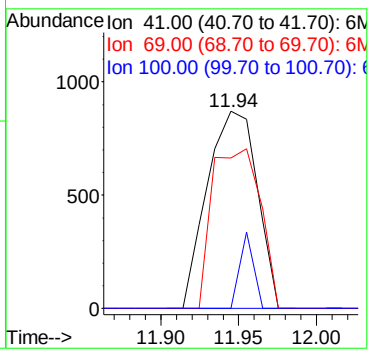


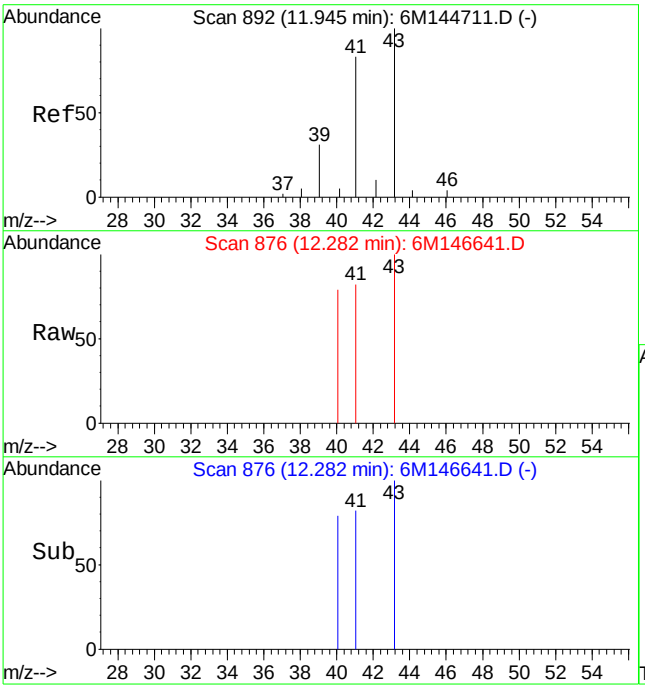


#9
Methyl methacrylate
Concen: 0.56 ug/L
RT: 11.94 min Scan# 843
Delta R.T. -0.02 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 41 Resp: 1942

Ion	Ratio	Lower	Upper
41	100		
69	78.1	42.7	122.7
100	10.7	0.0	73.7

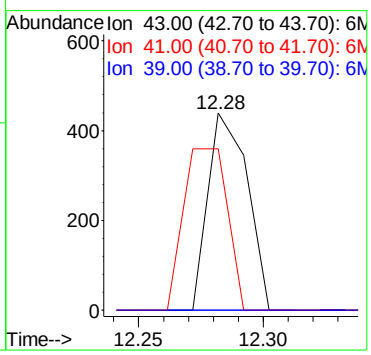


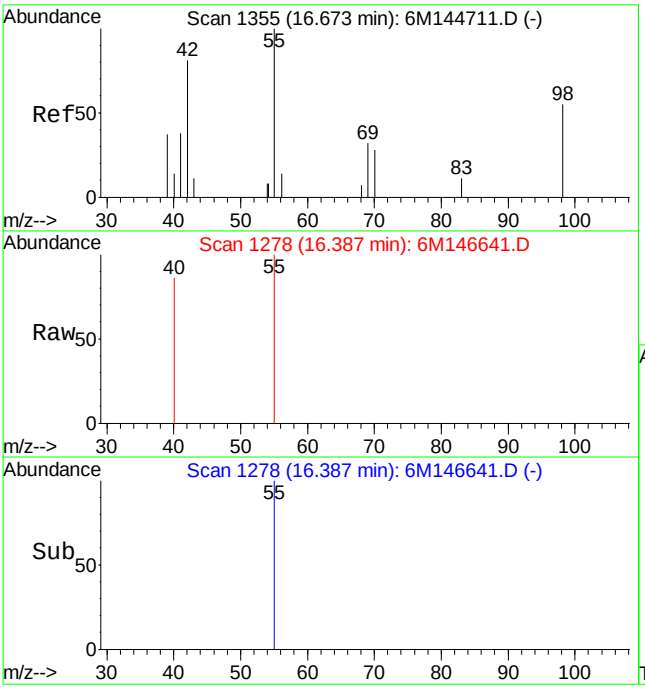


#10
2-Nitropropane
Concen: 0.34 ug/L
RT: 12.28 min Scan# 876
Delta R.T. -0.02 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 43 Resp: 481

Ion	Ratio	Lower	Upper
43	100		
41	91.5	50.0	116.8
39	0.0	16.6	38.8#

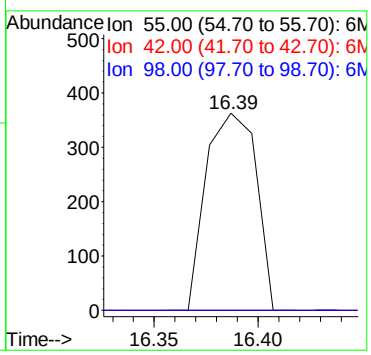




#13
Cyclohexanone
Concen: 8.88 ug/L
RT: 16.39 min Scan# 1278
Delta R.T. -0.02 min
Lab File: 6M146641.D
Acq: 22 Apr 2017 15:55

Tgt Ion: 55 Resp: 608

Ion	Ratio	Lower	Upper
55	100		
42	0.0	37.1	86.7#
98	0.0	25.3	58.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419090.D Vial: 4
Acq On : 21 Apr 2017 14:04 Operator: TMB
Sample : WG611120-01 VBLK0421 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:26:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

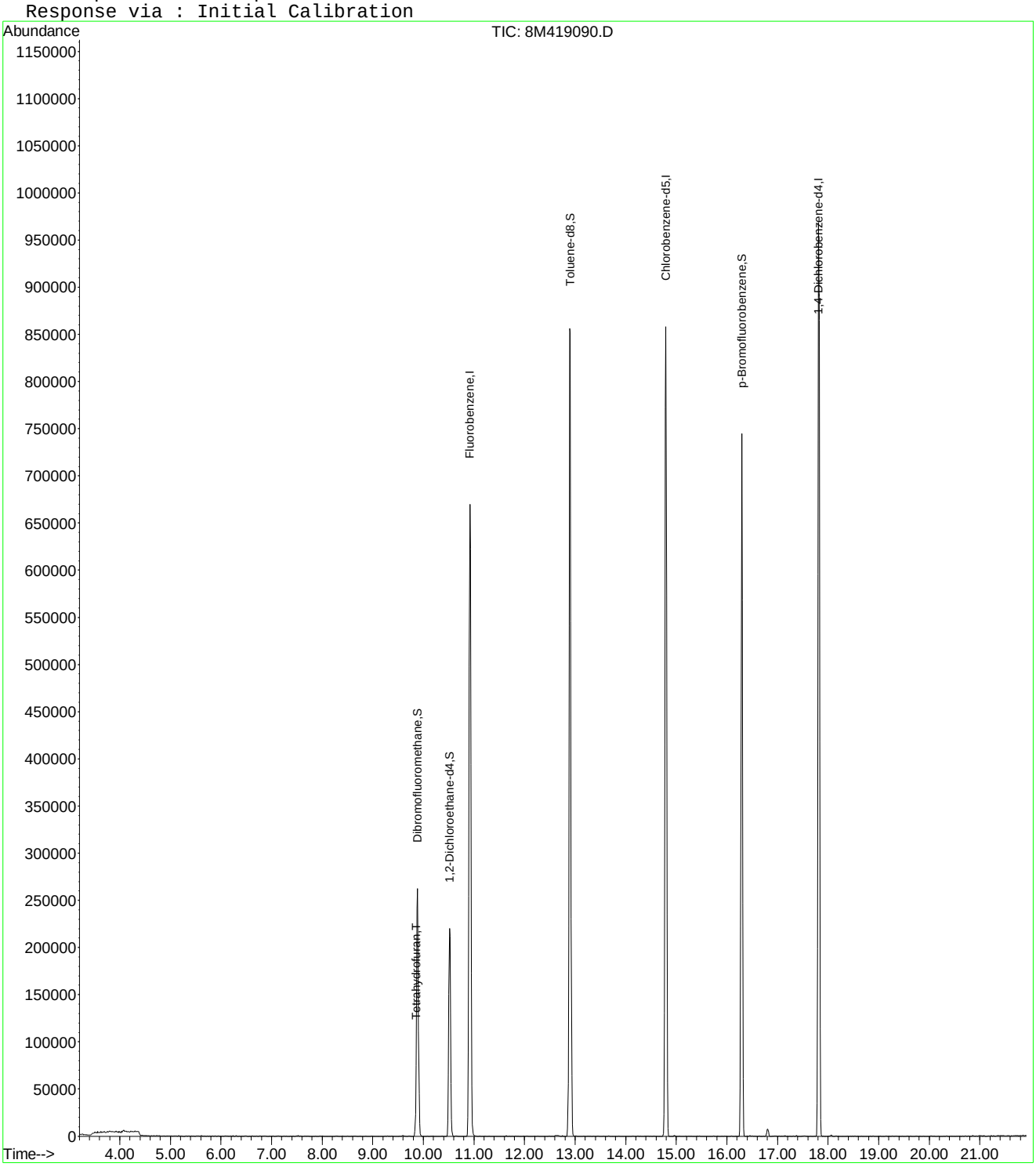
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	839588	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	662691	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	338413	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	223418	25.3703	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.48%			
43) 1,2-Dichloroethane-d4	10.51	65	196039	25.7503	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.00%			
58) Toluene-d8	12.90	98	806134	26.6231	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%			
80) p-Bromofluorobenzene	16.29	95	310570	26.0030	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.00%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.85	42	1861	1.4599	ug/L #	58

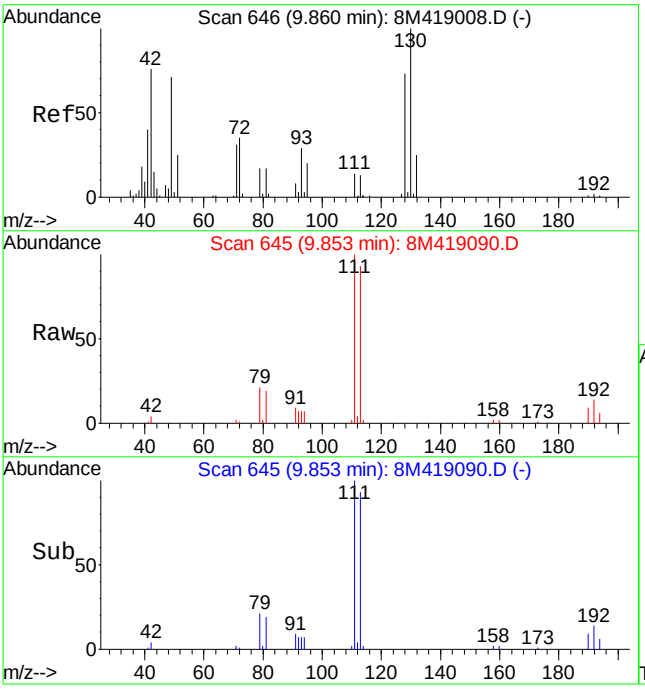
(#) = qualifier out of range (m) = manual integration
8M419090.D 8260WT.M Mon Apr 24 14:31:37 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419090.D Vial: 4
Acq On : 21 Apr 2017 14:04 Operator: TMB
Sample : WG611120-01 VBLK0421 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:26 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

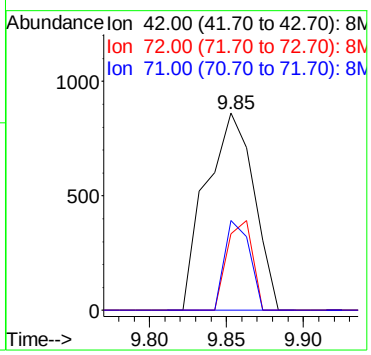




#36
Tetrahydrofuran
Concen: 1.46 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419090.D
Acq: 21 Apr 2017 14:04

Tgt Ion: 42 Resp: 1861

Ion	Ratio	Lower	Upper
42	100		
72	24.2	32.9	76.9#
71	23.8	32.1	74.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419118.D Vial: 4
Acq On : 24 Apr 2017 12:42 Operator: TMB
Sample : WG611301-01 VBLK0424 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:04:44 2017 Quant Results File: 8260WT.RES

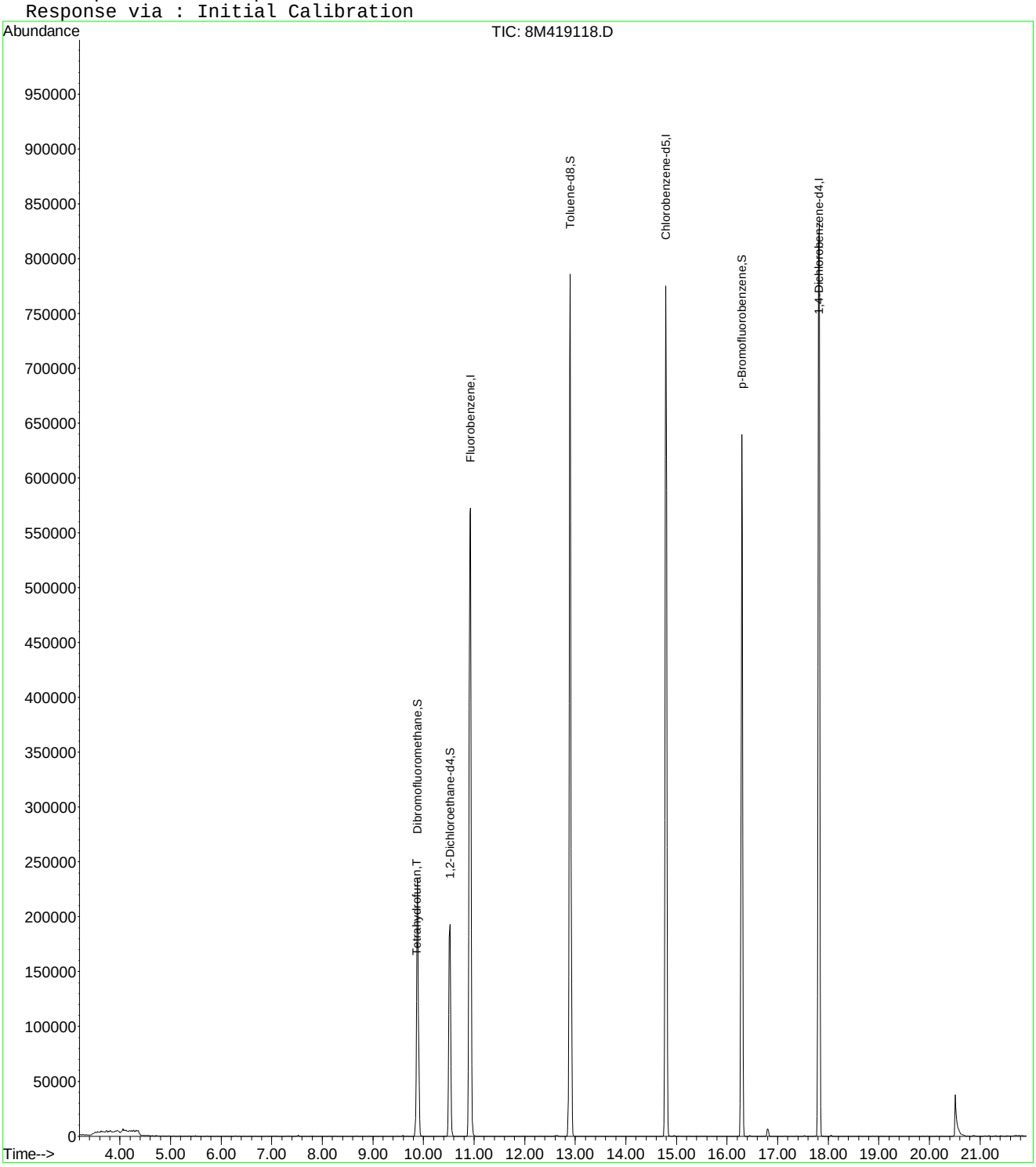
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

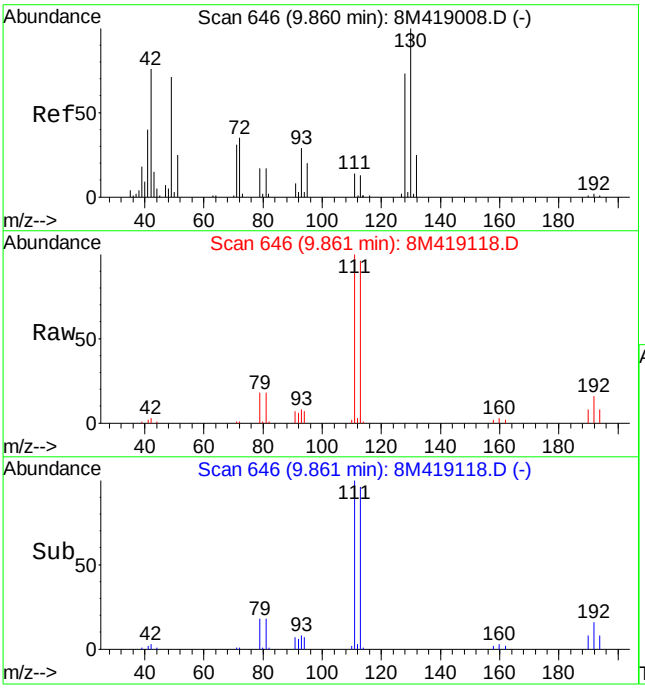
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	733239	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	583306	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	298713	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	197035	25.6196	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.48%			
43) 1,2-Dichloroethane-d4	10.52	65	169008	25.4195	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.68%			
58) Toluene-d8	12.90	98	706884	26.5224	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%			
80) p-Bromofluorobenzene	16.29	95	275055	26.0901	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.36%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.86	42	2846	2.5565	ug/L #	70

(#) = qualifier out of range (m) = manual integration
8M419118.D 8260WT.M Tue Apr 25 08:35:54 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419118.D Vial: 4
Acq On : 24 Apr 2017 12:42 Operator: TMB
Sample : WG611301-01 VBLK0424 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:04 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

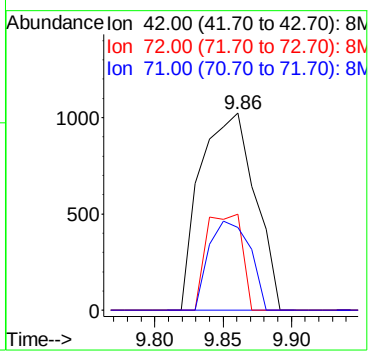




#36
Tetrahydrofuran
Concen: 2.56 ug/L
RT: 9.86 min Scan# 646
Delta R.T. -0.00 min
Lab File: 8M419118.D
Acq: 24 Apr 2017 12:42

Tgt Ion: 42 Resp: 2846

Ion	Ratio	Lower	Upper
42	100		
72	31.7	32.9	76.9#
71	33.8	32.1	74.9



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419167.D Vial: 4
Acq On : 26 Apr 2017 9:27 Operator: TMB
Sample : WG611561-01 VBLK0426 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 09:49:10 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

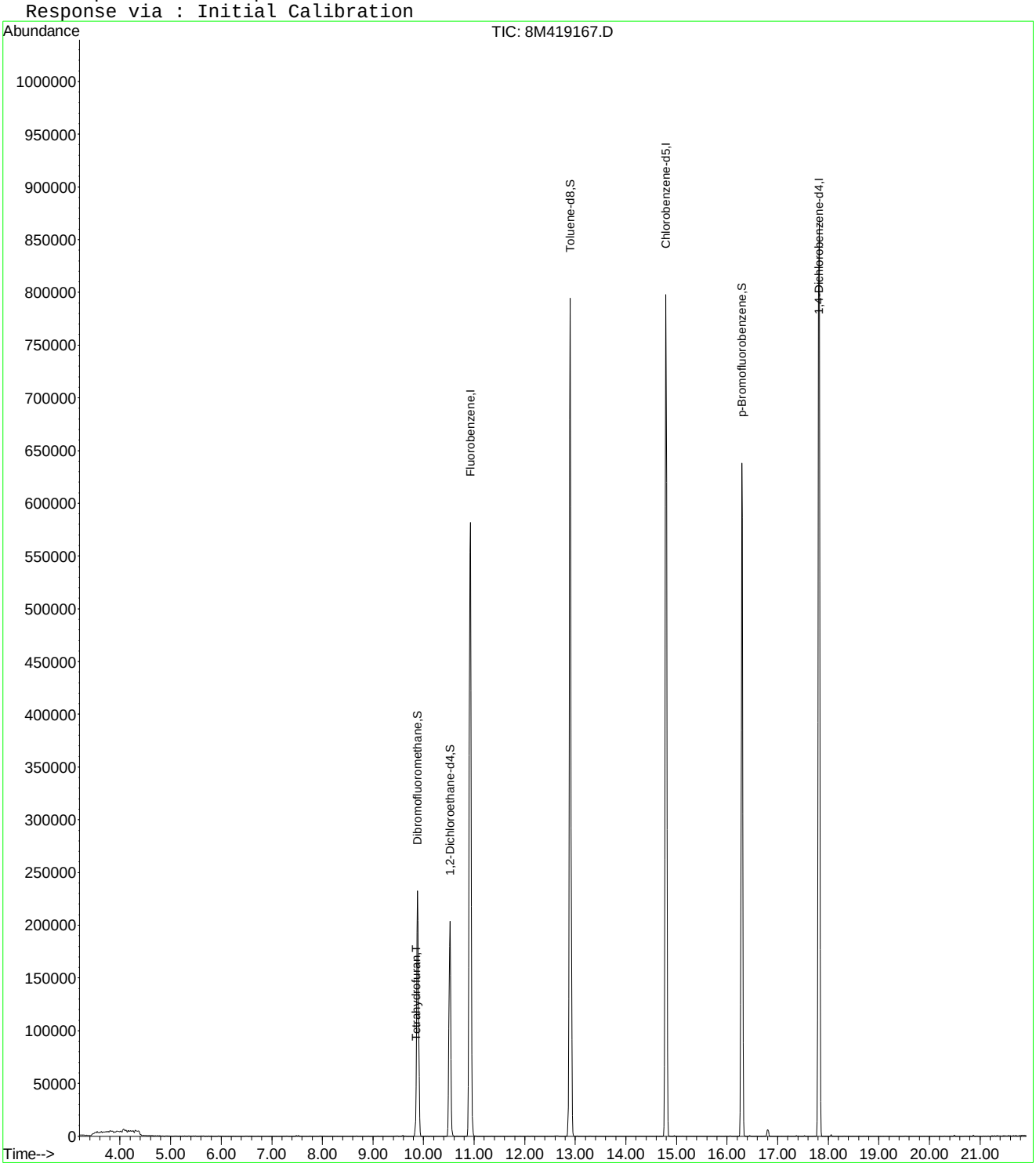
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	727213	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	577927	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	300614	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	196001	25.6963	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.52	65	173880	26.3690	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.48%			
58) Toluene-d8	12.90	98	710754	26.9159	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.68%			
80) p-Bromofluorobenzene	16.29	95	275531	25.9700	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.85	42	4318	3.9109	ug/L #	76

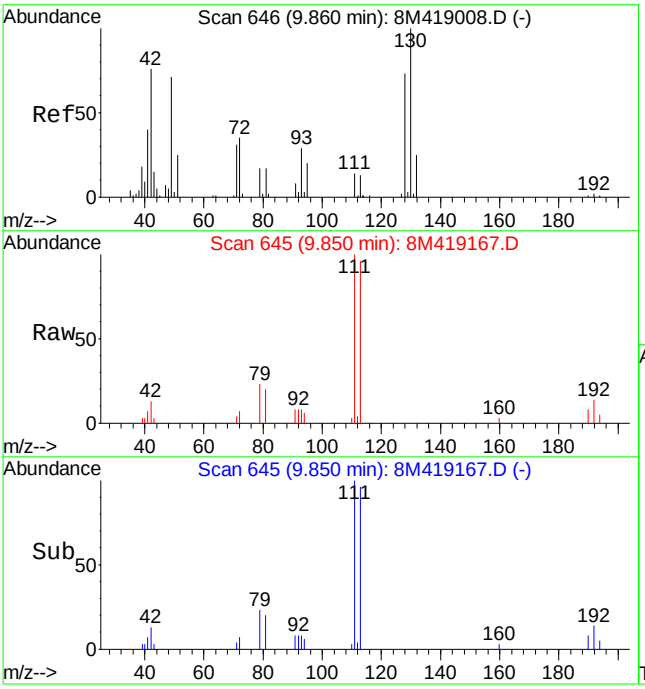
(#) = qualifier out of range (m) = manual integration
8M419167.D 8260WT.M Thu Apr 27 08:31:59 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419167.D Vial: 4
Acq On : 26 Apr 2017 9:27 Operator: TMB
Sample : WG611561-01 VBLK0426 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 9:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

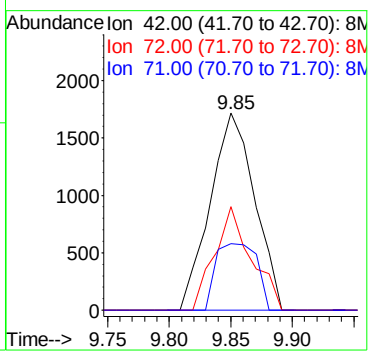




#36
Tetrahydrofuran
Concen: 3.91 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419167.D
Acq: 26 Apr 2017 9:27

Tgt Ion: 42 Resp: 4318

Ion	Ratio	Lower	Upper
42	100		
72	43.2	32.9	76.9
71	31.1	32.1	74.9#



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17652.D Vial: 4
Acq On : 21 Apr 2017 18:02 Operator: JDS
Sample : WG611145-02 20ug/L LCS 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:24:12 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	330342	25.00	ug/L	0.01
56) Chlorobenzene-d5	14.14	117	232338	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	125527	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84346	24.6075	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.44%			
43) 1,2-Dichloroethane-d4	10.14	65	97509	25.1146	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.44%			
57) Toluene-d8	12.38	98	337699	26.6993	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%			
78) p-Bromofluorobenzene	15.54	95	124031	26.5856	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.36%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	104718	23.0170	ug/L	96
3) Chloromethane	3.66	50	107898	19.7177	ug/L	97
4) Vinyl Chloride	3.89	62	82933	19.8852	ug/L	98
5) 1,3-Butadiene	3.93	54	54993	28.4758	ug/L	99
6) Bromomethane	4.77	94	63134	20.2786	ug/L	100
7) Chloroethane	4.92	64	71870	21.9510	ug/L	100
8) Trichlorofluoromethane	5.41	101	112413	19.8056	ug/L	100
9) Diethyl ether	5.92	59	388759	97.7538	ug/L	99
10) Isoprene	5.96	67	118481	21.6737	ug/L	97
11) Acrolein	6.15	56	71485	94.1504	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	69286	20.4650	ug/L	93
13) Acetone	6.26	43	22226	19.7150	ug/L	92
14) 1,1-Dichloroethene	6.47	61	121973	18.8357	ug/L	96
15) Tert-Butyl Alcohol	6.59	59	94129	233.3170	ug/L	98
16) Dimethyl Sulfide	6.72	62	106708	23.1988	ug/L	98
17) Iodomethane	6.97	142	87323	21.8233	ug/L	94
18) Methyl acetate	6.98	43	65881	20.3841	ug/L	99
19) Methylene Chloride	7.23	84	79973	18.2858	ug/L	99
20) Carbon Disulfide	7.27	76	181444	17.6851	ug/L	99
21) Acrylonitrile	7.40	53	34584	20.6797	ug/L	99
22) Methyl Tert Butyl Ether	7.43	73	215968	20.0858	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	74587	19.4769	ug/L	95
24) n-Hexane	7.73	57	116856	19.4295	ug/L	99
25) Diisopropyl ether	8.07	45	1601101	107.8976	ug/L	96
26) Vinyl Acetate	8.23	43	169777	22.3699	ug/L	99
27) 1,1-Dichloroethane	8.26	63	161825	20.0774	ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1364548	102.0048	ug/L	100
29) 2-Butanone	8.79	43	38454	21.0400	ug/L	97
30) Propionitrile	8.89	54	67108	108.4253	ug/L	97
31) 2,2-Dichloropropane	9.00	77	99387	17.9365	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	88138	20.0072	ug/L	94
33) Chloroform	9.26	83	135572	18.7186	ug/L	99
34) 1-Bromopropane	9.39	122	20739	25.3399	ug/L	96
35) Bromochloromethane	9.48	130	53882	20.1686	ug/L	94
36) Tetrahydrofuran	9.50	42	143846	106.0956	ug/L	99
38) 1,1,1-Trichloroethane	9.77	97	120825	20.6944	ug/L	97
39) Cyclohexane	9.79	56	151278	18.9248	ug/L	99
40) 1,1-Dichloropropene	9.95	75	101545	19.4751	ug/L	98
41) Carbon Tetrachloride	10.09	117	103517	20.2542	ug/L	97
42) Tert-Amyl-Methyl ether	10.05	73	1171704	107.0632	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17652.D 8260WTR.M Fri Apr 21 18:24:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17652.D Vial: 4
Acq On : 21 Apr 2017 18:02 Operator: JDS
Sample : WG611145-02 20ug/L LCS 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:24:12 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

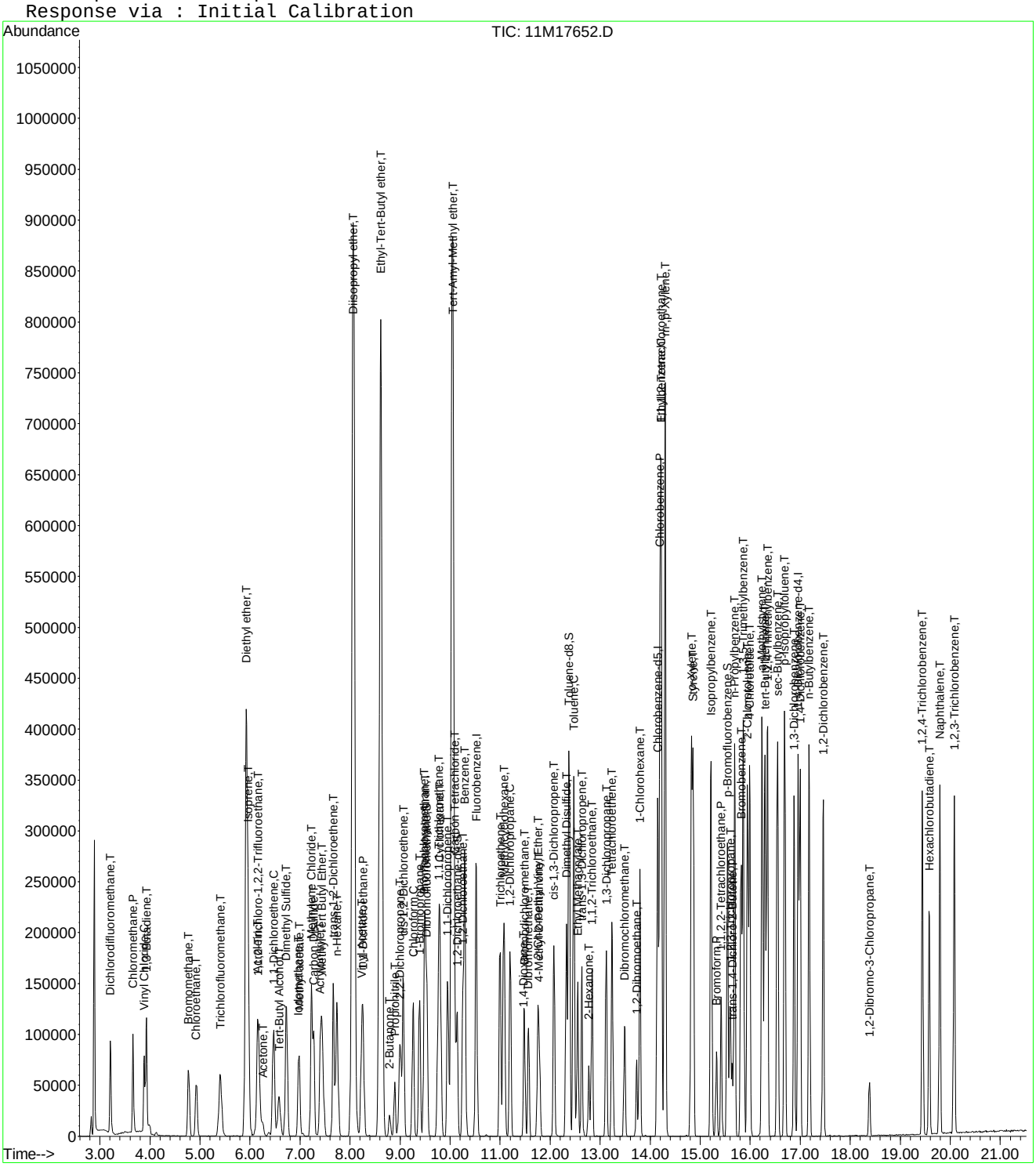
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	108816	19.3527 ug/L	99
45)	Benzene	10.29	78	317021	20.2958 ug/L	96
46)	Trichloroethene	11.00	130	81380	19.6776 ug/L	95
47)	Methylcyclohexane	11.07	83	126147	19.7930 ug/L	98
48)	1,2-Dichloropropane	11.20	63	96860	20.1435 ug/L	94
49)	1,4-Dioxane	11.47	88	9525	216.2706 ug/L	82
50)	Bromodichloromethane	11.49	83	97830	19.4067 ug/L	100
51)	Dibromomethane	11.56	93	46803	20.6411 ug/L	92
52)	2-Chloroethyl Vinyl Ether	11.76	63	58747	22.8552 ug/L	100
53)	4-Methyl-2-Pentanone	11.78	58	34519	20.4493 ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	128426	21.8984 ug/L	100
55)	Dimethyl Disulfide	12.32	79	71941	20.8907 ug/L	84
58)	Toluene	12.47	91	329436	19.9014 ug/L	96
59)	Ethyl Methacrylate	12.55	69	99555	23.3689 ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	105934	20.7191 ug/L	98
61)	1,1,2-Trichloroethane	12.83	97	70069	20.1207 ug/L	98
62)	2-Hexanone	12.77	43	59159	22.3565 ug/L	99
63)	1,3-Dichloropropane	13.12	76	121477	21.0812 ug/L	94
64)	Tetrachloroethene	13.23	164	69860	19.8101 ug/L	94
65)	Dibromochloromethane	13.48	129	78580	20.8172 ug/L	97
66)	1,2-Dibromoethane	13.73	107	61761	20.1461 ug/L	98
67)	1-Chlorohexane	13.79	91	103964	22.9389 ug/L	95
68)	Chlorobenzene	14.20	112	214955	20.8259 ug/L	97
69)	1,1,1,2-Tetrachloroethane	14.22	131	78062	20.7988 ug/L	98
70)	Ethylbenzene	14.22	106	118667	20.6931 ug/L	90
71)	m-,p-Xylene	14.30	106	281296	43.3649 ug/L	89
72)	o-Xylene	14.83	106	141060	20.8185 ug/L	96
73)	Styrene	14.86	104	226689	22.6566 ug/L	92
74)	Bromoform	15.32	173	52788	18.2172 ug/L	99
75)	Isopropylbenzene	15.22	105	344826	20.5947 ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	90254	20.7962 ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	26279	20.8128 ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.64	53	21898	18.4696 ug/L	66
81)	n-Propylbenzene	15.69	91	406383	20.4804 ug/L	96
82)	Bromobenzene	15.82	156	101805	20.7836 ug/L	82
83)	1,3,5-Trimethylbenzene	15.86	105	300580	20.4834 ug/L	98
84)	2-Chlorotoluene	15.94	91	258631	18.6859 ug/L	100
85)	4-Chlorotoluene	15.99	91	257006	21.2249 ug/L	98
86)	a-Methylstyrene	16.23	118	167060	22.1087 ug/L	93
87)	tert-Butylbenzene	16.30	134	68197	20.5447 ug/L	94
88)	1,2,4-Trimethylbenzene	16.35	105	307499	20.4154 ug/L	98
89)	sec-Butylbenzene	16.54	105	375432	20.1724 ug/L	97
90)	p-Isopropyltoluene	16.69	119	328927	21.1225 ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	181507	20.4621 ug/L	94
92)	1,4-Dichlorobenzene	17.00	146	185979	20.6326 ug/L	95
93)	n-Butylbenzene	17.17	91	284307	21.1667 ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	185910	20.7264 ug/L	94
95)	1,2-Dibromo-3-Chloropropan	18.38	75	16161	21.5672 ug/L	85
96)	1,2,4-Trichlorobenzene	19.44	180	141105	21.5989 ug/L	95
97)	Hexachlorobutadiene	19.58	225	67095	20.2360 ug/L	96
98)	Naphthalene	19.79	128	324587	22.8777 ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	139485	21.2509 ug/L	96

(#) = qualifier out of range (m) = manual integration
11M17652.D 8260WTR.M Fri Apr 21 18:24:13 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042117\11M17652.D Vial: 4
Acq On : 21 Apr 2017 18:02 Operator: JDS
Sample : WG611145-02 20ug/L LCS 8260 Inst : hpms11
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 18:24 2017 Quant Results File: 8260WTR.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 041417 HPMS11
Last Update : Wed Apr 19 15:51:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146607.D Vial: 10
Acq On : 21 Apr 2017 18:01 Operator: TMB
Sample : WG611071-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:39 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	528037	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	377674	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	200345	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	140211	26.0114 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.04%		
43) 1,2-Dichloroethane-d4	10.84	65	141059	26.5516 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.20%		
58) Toluene-d8	13.23	98	495615	25.7171 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.88%		
80) p-Bromofluorobenzene	16.63	95	195237	25.6580 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.64%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	201224	24.0017 ug/L	94
3) Chloromethane	4.04	50	219759	22.0623 ug/L	100
4) Vinyl Chloride	4.27	62	209201	21.8388 ug/L	99
5) 1,3-Butadiene	4.31	54	130686	35.7472 ug/L	88
6) Bromomethane	5.23	94	48978	11.8419 ug/L	100
7) Chloroethane	5.40	64	94385	22.9002 ug/L	86
8) Trichlorofluoromethane	5.90	101	204225	20.8010 ug/L	100
9) Diethyl ether	6.44	59	421208	102.9449 ug/L	84
10) Isoprene	6.48	67	177291	21.9540 ug/L	82
11) Acrolein	6.67	56	60848	135.7420 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	123151	22.1587 ug/L	97
13) Acetone	6.77	43	24839	21.7990 ug/L	93
14) 1,1-Dichloroethene	7.01	61	165943	20.6136 ug/L	89
15) Tert-Butyl Alcohol	7.11	59	65724	185.9551 ug/L	91
16) Dimethyl Sulfide	7.28	62	128530	22.3439 ug/L	80
17) Iodomethane	7.54	142	77307	16.9862 ug/L	99
18) Methyl acetate	7.54	43	53315	18.6563 ug/L #	85
19) Methylene Chloride	7.80	84	119481	19.6317 ug/L	64
20) Carbon Disulfide	7.86	76	302861	17.4809 ug/L	100
21) Acrylonitrile	7.97	53	27772	21.0333 ug/L	97
22) Methyl Tert Butyl Ether	8.01	73	279114	20.9134 ug/L	92
23) trans-1,2-Dichloroethene	8.25	96	113291	19.5541 ug/L	83
24) n-Hexane	8.33	57	137631	21.0070 ug/L	85
25) Diisopropyl ether	8.66	45	1701303	114.0668 ug/L #	92
26) Vinyl Acetate	8.83	43	93660	22.6224 ug/L #	90
27) 1,1-Dichloroethane	8.87	63	201526	20.9984 ug/L	100
28) Ethyl-Tert-Butyl ether	9.24	59	1553669	102.8087 ug/L	92
29) 2-Butanone	9.41	43	29369	20.4504 ug/L #	81
30) Propionitrile	9.52	54	49349	105.3670 ug/L	100
31) 2,2-Dichloropropane	9.64	77	109710	15.0258 ug/L	79
32) cis-1,2-Dichloroethene	9.71	96	127070	19.9496 ug/L	88
33) Chloroform	9.92	83	208954	19.1118 ug/L	96
34) 1-Bromopropane	10.05	122	28809	25.5049 ug/L	100
35) Bromochloromethane	10.14	130	67554	20.1475 ug/L	99
36) Tetrahydrofuran	10.18	42	98555	104.2113 ug/L #	74
38) 1,1,1-Trichloroethane	10.45	97	186068	20.9329 ug/L	92
39) Cyclohexane	10.49	56	161109	19.6007 ug/L	80
40) 1,1-Dichloropropene	10.64	75	153151	20.3824 ug/L	83
41) Tert-Amyl-Methyl ether	10.75	73	1490136	103.8523 ug/L	94
42) Carbon Tetrachloride	10.80	117	156375	22.3113 ug/L	97

(#) = qualifier out of range (m) = manual integration
6M146607.D 8260BWT.M Sat Apr 22 13:33:41 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146607.D Vial: 10
Acq On : 21 Apr 2017 18:01 Operator: TMB
Sample : WG611071-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33:39 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

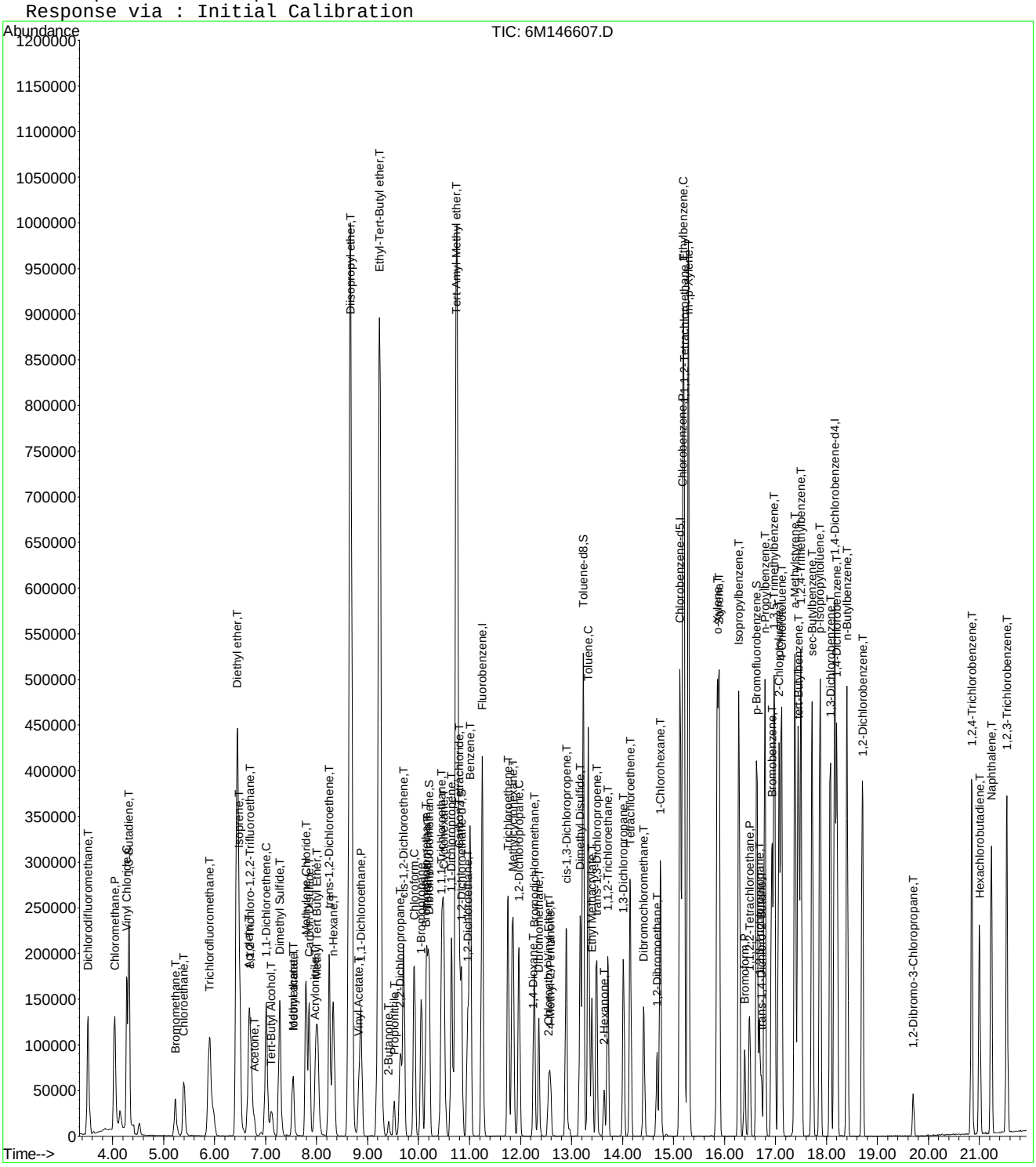
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	138500	20.3628	ug/L		89
46)	Benzene	11.01	78	441928	19.5607	ug/L		88
47)	Trichloroethene	11.76	130	120655	19.6200	ug/L		90
48)	Methylcyclohexane	11.85	83	174219	19.6086	ug/L		84
49)	1,2-Dichloropropane	11.97	63	110774	20.7757	ug/L		95
50)	1,4-Dioxane	12.25	88	8112	209.2392	ug/L		90
51)	Bromodichloromethane	12.27	83	151078	20.0719	ug/L		99
52)	Dibromomethane	12.36	93	62867	20.0197	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.54	63	32612	15.5932	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	27531	20.0675	ug/L		89
55)	cis-1,3-Dichloropropene	12.90	75	175763	21.2051	ug/L		95
56)	Dimethyl Disulfide	13.17	79	102829	19.6646	ug/L		90
59)	Toluene	13.33	91	451450	19.1192	ug/L		99
60)	Ethyl Methacrylate	13.40	69	115445	20.2039	ug/L		78
62)	trans-1,3-Dichloropropene	13.49	75	137885	18.9386	ug/L		98
63)	1,1,2-Trichloroethane	13.71	97	85124	19.1300	ug/L		99
64)	2-Hexanone	13.64	43	43415	20.3182	ug/L		86
65)	1,3-Dichloropropane	14.01	76	150790	20.1879	ug/L		74
66)	Tetrachloroethene	14.16	166	110777	19.3606	ug/L		94
67)	Dibromochloromethane	14.41	129	102567	18.6462	ug/L		99
68)	1,2-Dibromoethane	14.68	107	79321	18.5647	ug/L		99
69)	1-Chlorohexane	14.74	91	153013	20.0674	ug/L		82
70)	Chlorobenzene	15.18	112	301394	18.6496	ug/L		98
71)	1,1,1,2-Tetrachloroethane	15.21	131	108002	18.6613	ug/L		94
72)	Ethylbenzene	15.20	106	164802	18.8373	ug/L		97
73)	m-,p-Xylene	15.29	106	393325	37.6130	ug/L		96
74)	o-Xylene	15.86	106	190582	18.8863	ug/L		97
75)	Styrene	15.89	104	326442	19.2701	ug/L		98
76)	Bromoform	16.39	173	59054	17.6171	ug/L		98
77)	Isopropylbenzene	16.28	105	479351	18.9822	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	95253	18.2552	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	29237	18.9744	ug/L		73
82)	trans-1,4-Dichloro-2-Buten	16.72	53	15999	14.4396	ug/L	#	1
83)	n-Propylbenzene	16.79	91	573605	18.9098	ug/L		99
84)	Bromobenzene	16.94	156	125678	18.4427	ug/L		79
85)	1,3,5-Trimethylbenzene	16.98	105	406669	18.9174	ug/L		99
86)	2-Chlorotoluene	17.07	91	344412	17.0522	ug/L		99
87)	4-Chlorotoluene	17.12	91	371128	20.7904	ug/L		92
88)	a-Methylstyrene	17.38	118	228309	19.2054	ug/L		98
89)	tert-Butylbenzene	17.46	134	85067	18.8852	ug/L		77
90)	1,2,4-Trimethylbenzene	17.50	105	422369	19.1312	ug/L		87
91)	sec-Butylbenzene	17.72	105	501132	18.9035	ug/L		97
92)	p-Isopropyltoluene	17.87	119	422855	18.9622	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	230555	17.9151	ug/L		97
94)	1,4-Dichlorobenzene	18.20	146	237164	18.2235	ug/L		97
95)	n-Butylbenzene	18.41	91	395606	19.4277	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	217971	18.0699	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	16752	17.7247	ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	164277	18.6129	ug/L		98
99)	Hexachlorobutadiene	21.01	225	61356	18.2009	ug/L		100
100)	Naphthalene	21.23	128	328388	18.5817	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	150839	17.7031	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146607.D 8260BWT.M Sat Apr 22 13:33:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042117\6M146607.D Vial: 10
Acq On : 21 Apr 2017 18:01 Operator: TMB
Sample : WG611071-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 13:33 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146642.D Vial: 4
Acq On : 22 Apr 2017 16:26 Operator: JDS
Sample : WG611222-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 16:48:22 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	494654	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	358904	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	197099	25.00	ug/L		-0.01
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	133947	26.5264	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 106.12%				
43) 1,2-Dichloroethane-d4	10.84	65	134213	26.9679	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.88%				
58) Toluene-d8	13.23	98	475180	25.9462	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.80%				
80) p-Bromofluorobenzene	16.63	95	190768	25.4836	ug/L		-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.92%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	188975	24.0619	ug/L		93
3) Chloromethane	4.04	50	215714	23.1557	ug/L		98
4) Vinyl Chloride	4.28	62	203783	22.7089	ug/L		99
5) 1,3-Butadiene	4.32	54	130225	38.2126	ug/L		91
6) Bromomethane	5.23	94	53525	13.8146	ug/L		95
7) Chloroethane	5.40	64	88813	23.0025	ug/L		87
8) Trichlorofluoromethane	5.90	101	189329	20.5852	ug/L		99
9) Diethyl ether	6.44	59	407855	106.4087	ug/L		84
10) Isoprene	6.48	67	157836	20.8640	ug/L		82
11) Acrolein	6.67	56	62819	149.5966	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	110874	21.2960	ug/L		97
13) Acetone	6.77	43	24821	23.2533	ug/L		91
14) 1,1-Dichloroethene	7.01	61	154564	20.4959	ug/L		87
15) Tert-Butyl Alcohol	7.11	59	57185	172.7147	ug/L		91
16) Dimethyl Sulfide	7.28	62	120812	22.4196	ug/L		80
17) Iodomethane	7.54	142	93348	21.6683	ug/L		99
18) Methyl acetate	7.53	43	49471	18.4795	ug/L	#	84
19) Methylene Chloride	7.80	84	113922	19.9816	ug/L		65
20) Carbon Disulfide	7.86	76	280166	17.2623	ug/L		100
21) Acrylonitrile	7.97	53	28830	23.3082	ug/L		97
22) Methyl Tert Butyl Ether	8.01	73	255929	20.4703	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	104576	19.2681	ug/L		84
24) n-Hexane	8.33	57	131215	21.3793	ug/L		84
25) Diisopropyl ether	8.66	45	1597959	114.3684	ug/L	#	91
26) Vinyl Acetate	8.83	43	125271	32.2996	ug/L	#	91
27) 1,1-Dichloroethane	8.87	63	184916	20.5680	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1484459	104.8582	ug/L		92
29) 2-Butanone	9.41	43	28362	21.0820	ug/L		83
30) Propionitrile	9.52	54	51211	116.7219	ug/L		99
31) 2,2-Dichloropropane	9.64	77	110918	16.2165	ug/L		81
32) cis-1,2-Dichloroethene	9.71	96	115979	19.4372	ug/L		91
33) Chloroform	9.92	83	194210	18.9621	ug/L		95
34) 1-Bromopropane	10.05	122	26859	25.3833	ug/L		100
35) Bromochloromethane	10.15	130	65094	20.7240	ug/L		99
36) Tetrahydrofuran	10.18	42	99393	112.1902	ug/L	#	75
38) 1,1,1-Trichloroethane	10.45	97	168341	20.2168	ug/L		92
39) Cyclohexane	10.49	56	143887	18.6868	ug/L		80
40) 1,1-Dichloropropene	10.64	75	140638	19.9803	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	1434632	106.7318	ug/L		94
42) Carbon Tetrachloride	10.80	117	138434	21.0845	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146642.D 8260BWT.M Mon Apr 24 08:41:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146642.D Vial: 4
Acq On : 22 Apr 2017 16:26 Operator: JDS
Sample : WG611222-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 16:48:22 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

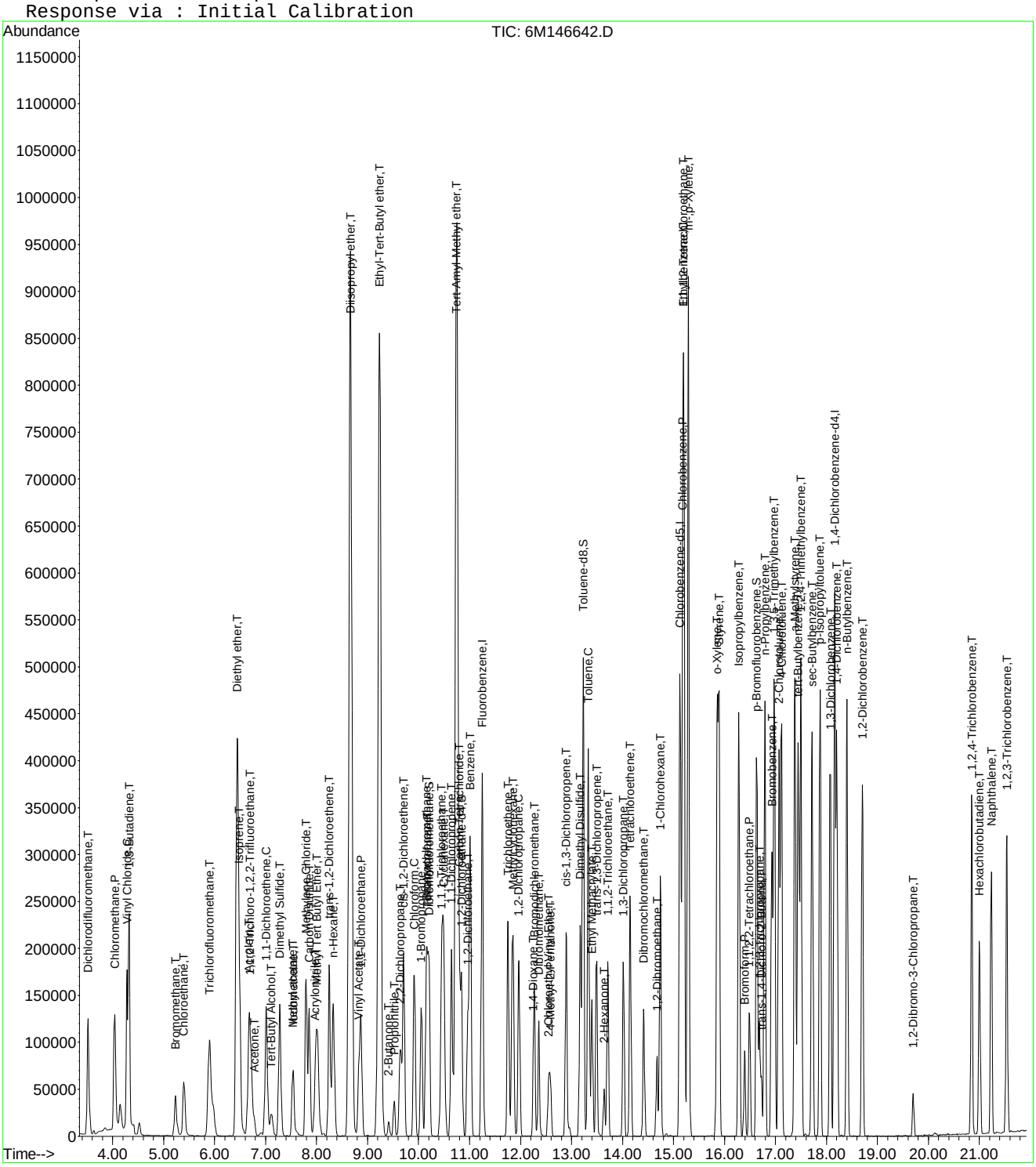
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	129773	20.3674	ug/L		90
46)	Benzene	11.01	78	410847	19.4123	ug/L		88
47)	Trichloroethene	11.76	130	103671	17.9959	ug/L		93
48)	Methylcyclohexane	11.85	83	153409	18.4317	ug/L		84
49)	1,2-Dichloropropane	11.96	63	100714	20.1637	ug/L		94
50)	1,4-Dioxane	12.25	88	7613	209.6205	ug/L		90
51)	Bromodichloromethane	12.27	83	138440	19.6342	ug/L		99
52)	Dibromomethane	12.36	93	60090	20.4267	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.54	63	31337	15.9947	ug/L		98
54)	4-Methyl-2-Pentanone	12.59	58	27279	21.2257	ug/L		85
55)	cis-1,3-Dichloropropene	12.89	75	164185	21.1451	ug/L		97
56)	Dimethyl Disulfide	13.17	79	94491	19.2896	ug/L		91
59)	Toluene	13.33	91	420969	18.7607	ug/L		99
60)	Ethyl Methacrylate	13.40	69	111865	20.6012	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	133458	19.2892	ug/L		98
63)	1,1,2-Trichloroethane	13.71	97	79904	18.8961	ug/L		98
64)	2-Hexanone	13.64	43	43073	21.2124	ug/L		87
65)	1,3-Dichloropropane	14.01	76	142795	20.1174	ug/L		74
66)	Tetrachloroethene	14.15	166	100343	18.4542	ug/L		94
67)	Dibromochloromethane	14.41	129	95804	18.3276	ug/L		100
68)	1,2-Dibromoethane	14.68	107	75548	18.6063	ug/L		99
69)	1-Chlorohexane	14.74	91	141125	19.4763	ug/L		80
70)	Chlorobenzene	15.18	112	277696	18.0818	ug/L		98
71)	1,1,1,2-Tetrachloroethane	15.20	131	98879	17.9785	ug/L		98
72)	Ethylbenzene	15.20	106	149343	17.9630	ug/L		100
73)	m-,p-Xylene	15.29	106	368294	37.0613	ug/L		96
74)	o-Xylene	15.85	106	178223	18.5852	ug/L		96
75)	Styrene	15.89	104	307967	19.1302	ug/L		99
76)	Bromoform	16.39	173	56429	17.7144	ug/L		98
77)	Isopropylbenzene	16.28	105	443489	18.4806	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.49	83	95821	18.6665	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	28467	18.7789	ug/L		73
82)	trans-1,4-Dichloro-2-Buten	16.72	53	15498	14.2178	ug/L	#	1
83)	n-Propylbenzene	16.79	91	531698	17.8170	ug/L		99
84)	Bromobenzene	16.94	156	117558	17.5352	ug/L		78
85)	1,3,5-Trimethylbenzene	16.98	105	383442	18.1307	ug/L		99
86)	2-Chlorotoluene	17.07	91	328010	16.5076	ug/L		92
87)	4-Chlorotoluene	17.12	91	348281	19.8318	ug/L		93
88)	a-Methylstyrene	17.38	118	216135	18.4807	ug/L		99
89)	tert-Butylbenzene	17.45	134	79075	17.8441	ug/L		77
90)	1,2,4-Trimethylbenzene	17.50	105	402520	18.5324	ug/L		88
91)	sec-Butylbenzene	17.72	105	460915	17.6728	ug/L		97
92)	p-Isopropyltoluene	17.87	119	397804	18.1326	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	220270	17.3978	ug/L		98
94)	1,4-Dichlorobenzene	18.20	146	224963	17.5707	ug/L		96
95)	n-Butylbenzene	18.41	91	376597	18.7988	ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	208929	17.6056	ug/L		97
97)	1,2-Dibromo-3-Chloropropan	19.70	75	16320	17.5520	ug/L		96
98)	1,2,4-Trichlorobenzene	20.86	180	148525	17.1053	ug/L		100
99)	Hexachlorobutadiene	21.00	225	55800	16.8254	ug/L		100
100)	Naphthalene	21.23	128	293921	16.9053	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	132639	15.8234	ug/L		100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042217\6M146642.D Vial: 4
Acq On : 22 Apr 2017 16:26 Operator: JDS
Sample : WG611222-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 22 16:48 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419091.D Vial: 5
Acq On : 21 Apr 2017 14:34 Operator: TMB
Sample : WG611120-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:56:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	853288	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	682202	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	366953	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	225160	25.1576 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.64%		
43) 1,2-Dichloroethane-d4	10.52	65	191588	24.7616 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.04%		
58) Toluene-d8	12.90	98	822649	26.3915 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.56%		
80) p-Bromofluorobenzene	16.29	95	326120	25.1813 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.72%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	266181	23.0508 ug/L	100
3) Chloromethane	3.80	50	301400	20.8776 ug/L	98
4) Vinyl Chloride	4.04	62	261243	19.1617 ug/L	99
5) 1,3-Butadiene	4.08	54	154923	25.5743 ug/L	96
6) Bromomethane	4.95	94	102122	23.8252 ug/L	97
7) Chloroethane	5.11	64	129424	21.7329 ug/L	96
8) Trichlorofluoromethane	5.60	101	305993	20.6643 ug/L	98
9) Diethyl ether	6.13	59	478363	85.7746 ug/L	92
10) Isoprene	6.17	67	245893	21.0023 ug/L	91
11) Acrolein	6.37	56	70347	91.0804 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	181482	21.4926 ug/L	97
13) Acetone	6.47	43	20813	17.3428 ug/L	96
14) 1,1-Dichloroethene	6.69	61	232665	18.8274 ug/L	97
15) Tert-Butyl Alcohol	6.80	59	68347	175.6921 ug/L	99
16) Dimethyl Sulfide	6.96	62	168769	20.5035 ug/L	89
17) Iodomethane	7.22	142	60221	16.3120 ug/L	98
18) Methyl acetate	7.22	43	57880	17.6126 ug/L	90
19) Methylene Chloride	7.47	84	166961	18.8003 ug/L	88
20) Carbon Disulfide	7.53	76	436273	16.9791 ug/L	100
21) Acrylonitrile	7.66	53	30331	18.2201 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	317454	18.1423 ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	225858	18.7856 ug/L	96
24) n-Hexane	8.00	57	204896	20.4165 ug/L	93
25) Diisopropyl ether	8.34	45	2556055	94.9808 ug/L	96
26) Vinyl Acetate	8.51	43	233708	19.3630 ug/L	94
27) 1,1-Dichloroethane	8.55	63	295525	19.0986 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2037045	89.0067 ug/L	98
29) 2-Butanone	9.10	43	33369	17.7307 ug/L	88
30) Propionitrile	9.20	54	53776	92.1923 ug/L	99
31) 2,2-Dichloropropane	9.31	77	256969	19.6723 ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	190227	19.1422 ug/L	95
33) Chloroform	9.59	83	308768	18.0092 ug/L	98
34) 1-Bromopropane	9.73	122	49754	25.3796 ug/L	100
35) Bromochloromethane	9.83	130	106562	19.8720 ug/L	97
36) Tetrahydrofuran	9.85	42	111874	86.3550 ug/L	87
38) 1,1,1-Trichloroethane	10.12	97	281691	20.3587 ug/L	100
39) Cyclohexane	10.16	56	231303	17.9553 ug/L	92
40) 1,1-Dichloropropene	10.32	75	229873	19.0278 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1915150	93.4510 ug/L	98
42) Carbon Tetrachloride	10.47	117	265840	20.7211 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419091.D 8260WT.M Mon Apr 24 08:46:07 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419091.D Vial: 5
Acq On : 21 Apr 2017 14:34 Operator: TMB
Sample : WG611120-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:56:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

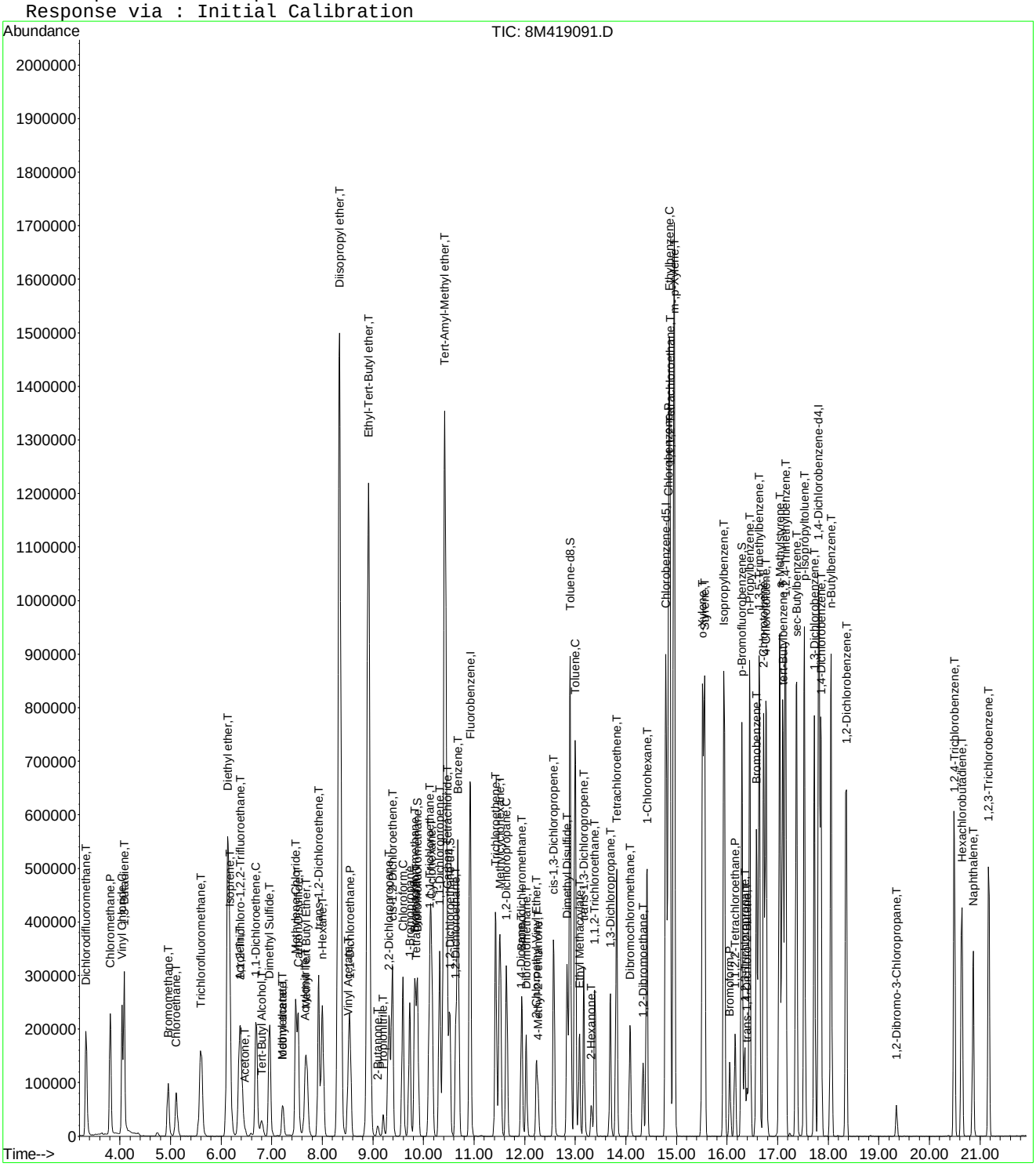
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	183190	18.8954	ug/L	97
46)	Benzene	10.68	78	679579	19.2784	ug/L	96
47)	Trichloroethene	11.42	130	190582	19.2459	ug/L	97
48)	Methylcyclohexane	11.51	83	254290	19.2641	ug/L	94
49)	1,2-Dichloropropane	11.64	63	158232	18.3785	ug/L	97
50)	Bromodichloromethane	11.94	83	213817	18.9771	ug/L	98
51)	1,4-Dioxane	11.93	88	9193	187.2777	ug/L	88
52)	Dibromomethane	12.03	93	85063	19.1984	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.23	63	70736	18.9883	ug/L	97
54)	4-Methyl-2-Pentanone	12.26	58	29431	17.6379	ug/L	98
55)	cis-1,3-Dichloropropene	12.57	75	259242	20.2035	ug/L	99
56)	Dimethyl Disulfide	12.84	79	123939	18.8069	ug/L	86
59)	Toluene	12.99	91	747835	19.6935	ug/L	99
60)	Ethyl Methacrylate	13.09	69	145943	20.3710	ug/L	87
62)	trans-1,3-Dichloropropene	13.17	75	202130	18.3542	ug/L	98
63)	1,1,2-Trichloroethane	13.39	97	114307	18.2962	ug/L	93
64)	2-Hexanone	13.31	58	27260	17.7794	ug/L	85
65)	1,3-Dichloropropane	13.70	76	199240	18.8646	ug/L	88
66)	Tetrachloroethene	13.82	164	161823	20.2875	ug/L	98
67)	Dibromochloromethane	14.08	129	150550	18.7525	ug/L	99
68)	1,2-Dibromoethane	14.34	107	114528	18.7670	ug/L	99
69)	1-Chlorohexane	14.42	91	252668	21.0308	ug/L	94
70)	Chlorobenzene	14.84	112	496631	18.3729	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.87	131	182664	19.0421	ug/L	100
72)	Ethylbenzene	14.86	106	284098	18.7656	ug/L	95
73)	m-,p-Xylene	14.96	106	696660	39.7357	ug/L	97
74)	o-Xylene	15.51	106	333762	18.9351	ug/L	100
75)	Styrene	15.56	104	559312	20.2397	ug/L	96
76)	Bromoform	16.05	173	89125	16.4254	ug/L	98
77)	Isopropylbenzene	15.94	105	835473	19.7956	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.16	83	125294	18.0957	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	36602	18.4390	ug/L	67
82)	trans-1,4-Dichloro-2-Buten	16.39	53	23576	14.4934	ug/L	94
83)	n-Propylbenzene	16.44	91	984489	19.1684	ug/L	99
84)	Bromobenzene	16.58	156	228039	18.9496	ug/L	96
85)	1,3,5-Trimethylbenzene	16.63	105	721548	19.4024	ug/L	99
86)	2-Chlorotoluene	16.72	91	620690	17.7021	ug/L	94
87)	4-Chlorotoluene	16.77	91	621458	19.6673	ug/L	99
88)	a-Methylstyrene	17.04	118	424500	20.3606	ug/L	96
89)	tert-Butylbenzene	17.11	134	159966	18.9987	ug/L	93
90)	1,2,4-Trimethylbenzene	17.16	105	746844	19.6715	ug/L	97
91)	sec-Butylbenzene	17.38	105	905601	19.4425	ug/L	100
92)	p-Isopropyltoluene	17.53	119	777107	19.8135	ug/L	99
93)	1,3-Dichlorobenzene	17.73	146	434807	18.6409	ug/L	96
94)	1,4-Dichlorobenzene	17.86	146	436014	18.3862	ug/L	98
95)	n-Butylbenzene	18.06	91	707930	20.0373	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	384314	18.7554	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18863	16.7393	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	258827	18.7615	ug/L	99
99)	Hexachlorobutadiene	20.64	225	119722	18.6495	ug/L	98
100)	Naphthalene	20.87	128	365088	18.5188	ug/L	99
101)	1,2,3-Trichlorobenzene	21.17	180	211692	18.4782	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419091.D 8260WT.M Mon Apr 24 08:46:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042117\8M419091.D Vial: 5
Acq On : 21 Apr 2017 14:34 Operator: TMB
Sample : WG611120-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 21 14:56 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	759307	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	609137	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	323407	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	201261	25.2706	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.08%			
43) 1,2-Dichloroethane-d4	10.52	65	169095	24.5595	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.24%			
58) Toluene-d8	12.90	98	744185	26.7379	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.96%			
80) p-Bromofluorobenzene	16.29	95	287174	25.1598	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.64%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	213080	20.7362	ug/L	100
3) Chloromethane	3.80	50	268002	20.8619	ug/L	97
4) Vinyl Chloride	4.04	62	237969	19.6150	ug/L	99
5) 1,3-Butadiene	4.08	54	137880	25.5790	ug/L	95
6) Bromomethane	4.95	94	77679	20.7951	ug/L	100
7) Chloroethane	5.12	64	111905	21.1169	ug/L	96
8) Trichlorofluoromethane	5.60	101	259101	19.6633	ug/L	100
9) Diethyl ether	6.13	59	423113	85.2581	ug/L	91
10) Isoprene	6.17	67	213578	20.5001	ug/L	90
11) Acrolein	6.37	56	58183	84.6552	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	156990	20.8932	ug/L	99
13) Acetone	6.47	43	18569	17.3881	ug/L	87
14) 1,1-Dichloroethene	6.69	61	200945	18.2732	ug/L	97
15) Tert-Butyl Alcohol	6.80	59	58962	170.3268	ug/L	99
16) Dimethyl Sulfide	6.96	62	154138	21.0438	ug/L	90
17) Iodomethane	7.21	142	45814	13.9455	ug/L	93
18) Methyl acetate	7.21	43	51360	17.5630	ug/L	91
19) Methylene Chloride	7.47	84	142908	18.0836	ug/L	83
20) Carbon Disulfide	7.52	76	384856	16.8319	ug/L	99
21) Acrylonitrile	7.66	53	27206	18.3657	ug/L	95
22) Methyl Tert Butyl Ether	7.68	73	278685	17.8979	ug/L	96
23) trans-1,2-Dichloroethene	7.93	61	197068	18.4197	ug/L	96
24) n-Hexane	8.00	57	178697	20.0099	ug/L	91
25) Diisopropyl ether	8.34	45	2308181	96.3859	ug/L	95
26) Vinyl Acetate	8.51	43	200226	18.6422	ug/L	94
27) 1,1-Dichloroethane	8.55	63	260276	18.9025	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1792767	88.0286	ug/L	98
29) 2-Butanone	9.10	43	27842	16.6250	ug/L	91
30) Propionitrile	9.21	54	46506	89.5970	ug/L	100
31) 2,2-Dichloropropane	9.32	77	220728	18.9893	ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	168445	19.0483	ug/L	96
33) Chloroform	9.59	83	272854	17.8842	ug/L	97
34) 1-Bromopropane	9.73	122	42347	24.2749	ug/L	100
35) Bromochloromethane	9.83	130	93298	19.5519	ug/L	94
36) Tetrahydrofuran	9.85	42	100352	87.0487	ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	243178	19.7506	ug/L	99
39) Cyclohexane	10.16	56	203320	17.7366	ug/L	91
40) 1,1-Dichloropropene	10.32	75	201733	18.7653	ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1675260	91.8632	ug/L	98
42) Carbon Tetrachloride	10.47	117	225694	19.7692	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419119.D 8260WT.M Mon Apr 24 14:27:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35:46 2017 Quant Results File: 8260WT.RES

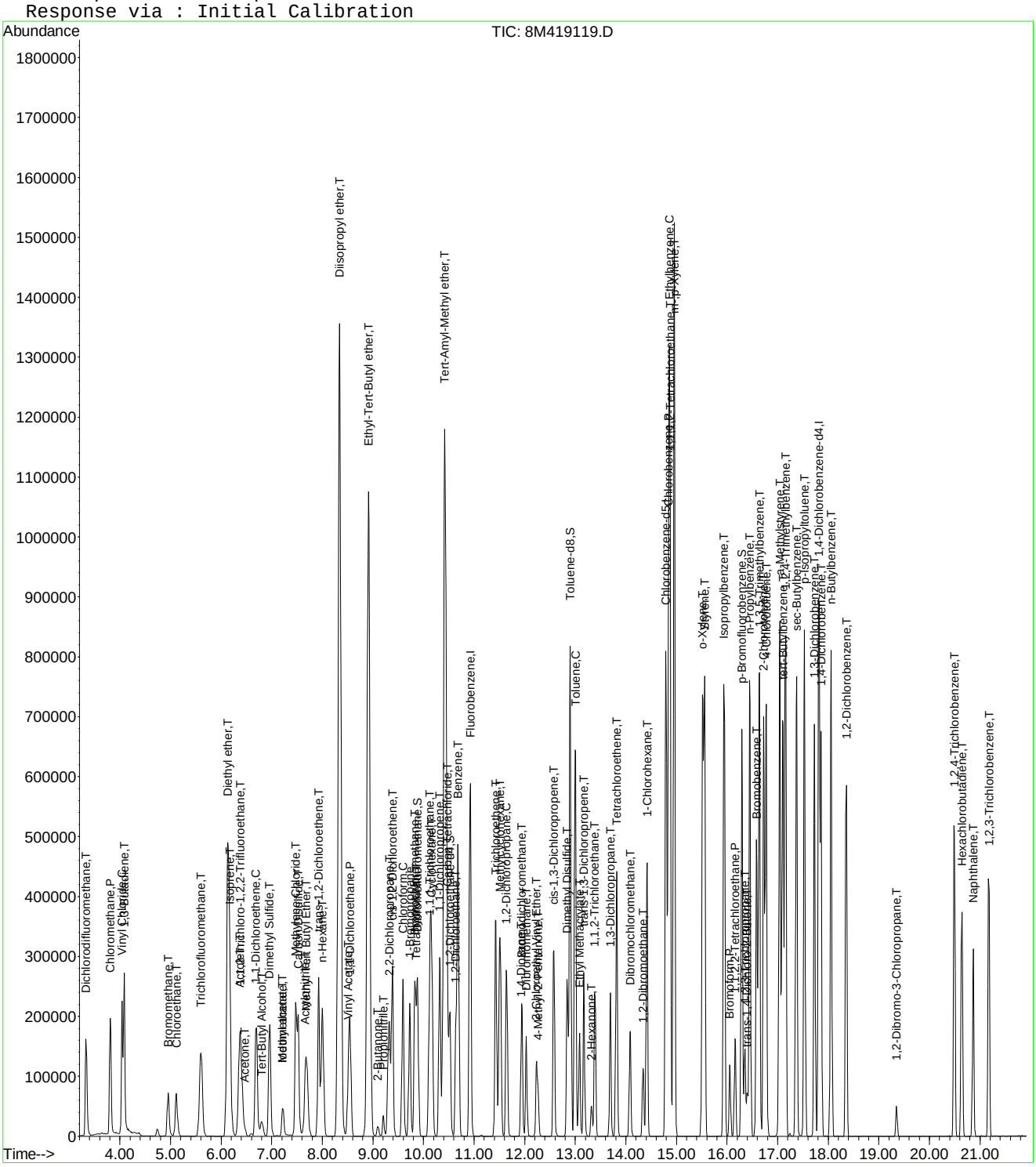
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	160479	18.6016	ug/L	96
46)	Benzene	10.68	78	605936	19.3169	ug/L	96
47)	Trichloroethene	11.43	130	162622	18.4550	ug/L	98
48)	Methylcyclohexane	11.51	83	223175	18.9995	ug/L	95
49)	1,2-Dichloropropane	11.64	63	142777	18.6360	ug/L	96
50)	Bromodichloromethane	11.94	83	185961	18.5476	ug/L	98
51)	1,4-Dioxane	11.93	88	7767	177.8117	ug/L	92
52)	Dibromomethane	12.03	93	74195	18.8182	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	61262	18.4806	ug/L	98
54)	4-Methyl-2-Pentanone	12.26	58	25658	17.2800	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	227725	19.9439	ug/L	100
56)	Dimethyl Disulfide	12.84	79	103956	17.9054	ug/L	86
59)	Toluene	13.00	91	663143	19.5579	ug/L	98
60)	Ethyl Methacrylate	13.09	69	126453	19.7677	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	175285	17.8258	ug/L	100
63)	1,1,2-Trichloroethane	13.38	97	99109	17.7664	ug/L	96
64)	2-Hexanone	13.32	58	24364	17.7966	ug/L	89
65)	1,3-Dichloropropane	13.69	76	174508	18.5048	ug/L	87
66)	Tetrachloroethene	13.82	164	139808	19.6299	ug/L	98
67)	Dibromochloromethane	14.09	129	131999	18.4140	ug/L	99
68)	1,2-Dibromoethane	14.34	107	98542	18.0844	ug/L	99
69)	1-Chlorohexane	14.42	91	225115	20.9849	ug/L	93
70)	Chlorobenzene	14.84	112	444143	18.4020	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.87	131	158578	18.5141	ug/L	99
72)	Ethylbenzene	14.86	106	248444	18.3790	ug/L	93
73)	m-,p-Xylene	14.96	106	609510	38.9348	ug/L	95
74)	o-Xylene	15.51	106	291483	18.5201	ug/L	99
75)	Styrene	15.56	104	494664	20.0474	ug/L	95
76)	Bromoform	16.05	173	75215	15.5559	ug/L	98
77)	Isopropylbenzene	15.94	105	732255	19.4311	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.15	83	109550	17.9523	ug/L	98
81)	1,2,3-Trichloropropane	16.35	110	31375	17.9340	ug/L	70
82)	trans-1,4-Dichloro-2-Buten	16.39	53	19067	13.3515	ug/L	81
83)	n-Propylbenzene	16.44	91	869593	19.2111	ug/L	99
84)	Bromobenzene	16.59	156	196820	18.5576	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	637517	19.4511	ug/L	99
86)	2-Chlorotoluene	16.72	91	538267	17.4184	ug/L	94
87)	4-Chlorotoluene	16.77	91	555475	19.9461	ug/L	100
88)	a-Methylstyrene	17.04	118	381126	20.7416	ug/L	98
89)	tert-Butylbenzene	17.11	134	137003	18.4623	ug/L	93
90)	1,2,4-Trimethylbenzene	17.16	105	666069	19.9062	ug/L	99
91)	sec-Butylbenzene	17.37	105	794994	19.3660	ug/L	100
92)	p-Isopropyltoluene	17.53	119	686446	19.8585	ug/L	99
93)	1,3-Dichlorobenzene	17.73	146	381428	18.5543	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	379918	18.1778	ug/L	100
95)	n-Butylbenzene	18.06	91	628355	20.1797	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	333923	18.4904	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	16276	16.3884	ug/L	94
98)	1,2,4-Trichlorobenzene	20.50	180	227660	18.7243	ug/L	99
99)	Hexachlorobutadiene	20.64	225	102887	18.1850	ug/L	98
100)	Naphthalene	20.87	128	322711	18.5733	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	185889	18.4107	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419119.D 8260WT.M Mon Apr 24 14:27:15 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	767268	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	623663	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	337676	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	204297	25.3857	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.52	65	181120	26.0330	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.12%			
58) Toluene-d8	12.90	98	747586	26.2345	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%			
80) p-Bromofluorobenzene	16.29	95	299616	25.1406	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.56%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	263719	25.3980	ug/L	100
3) Chloromethane	3.81	50	293571	22.6151	ug/L	97
4) Vinyl Chloride	4.04	62	275534	22.4757	ug/L	98
5) 1,3-Butadiene	4.09	54	150161	28.1225	ug/L	96
6) Bromomethane	4.95	94	91669	23.7898	ug/L	99
7) Chloroethane	5.11	64	123581	23.0783	ug/L	96
8) Trichlorofluoromethane	5.59	101	287846	21.6181	ug/L	99
9) Diethyl ether	6.12	59	463584	92.4439	ug/L	90
10) Isoprene	6.16	67	209614	19.9109	ug/L	89
11) Acrolein	6.36	56	62938	90.6235	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	170435	22.4472	ug/L	100
13) Acetone	6.46	43	22162	20.5373	ug/L	93
14) 1,1-Dichloroethene	6.69	61	206204	18.5569	ug/L	94
15) Tert-Butyl Alcohol	6.79	59	68880	196.9130	ug/L	99
16) Dimethyl Sulfide	6.96	62	156462	21.1394	ug/L	89
17) Iodomethane	7.22	142	63202	19.0387	ug/L	97
18) Methyl acetate	7.22	43	61800	20.9138	ug/L	89
19) Methylene Chloride	7.48	84	148087	18.5445	ug/L	82
20) Carbon Disulfide	7.52	76	373830	16.1800	ug/L	100
21) Acrylonitrile	7.65	53	32181	21.4987	ug/L	99
22) Methyl Tert Butyl Ether	7.68	73	314934	20.0161	ug/L	94
23) trans-1,2-Dichloroethene	7.92	61	204407	18.9075	ug/L	95
24) n-Hexane	8.00	57	174584	19.3465	ug/L	89
25) Diisopropyl ether	8.33	45	2456058	101.4969	ug/L	95
26) Vinyl Acetate	8.51	43	222666	20.5164	ug/L	94
27) 1,1-Dichloroethane	8.54	63	265884	19.1094	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1951527	94.8298	ug/L	97
29) 2-Butanone	9.09	43	34704	20.5074	ug/L	91
30) Propionitrile	9.20	54	52702	100.4805	ug/L	99
31) 2,2-Dichloropropane	9.32	77	224273	19.0941	ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	170801	19.1143	ug/L	94
33) Chloroform	9.59	83	280106	18.1690	ug/L	98
34) 1-Bromopropane	9.73	122	41598	23.5982	ug/L	97
35) Bromochloromethane	9.82	130	96613	20.0366	ug/L	92
36) Tetrahydrofuran	9.84	42	120381	103.3391	ug/L	84
38) 1,1,1-Trichloroethane	10.12	97	248355	19.9618	ug/L	100
39) Cyclohexane	10.15	56	215667	18.6185	ug/L	90
40) 1,1-Dichloropropene	10.32	75	207754	19.1249	ug/L	97
41) Tert-Amyl-Methyl ether	10.42	73	1851884	100.4947	ug/L	97
42) Carbon Tetrachloride	10.46	117	234277	20.3081	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419168.D 8260WT.M Wed Apr 26 13:01:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

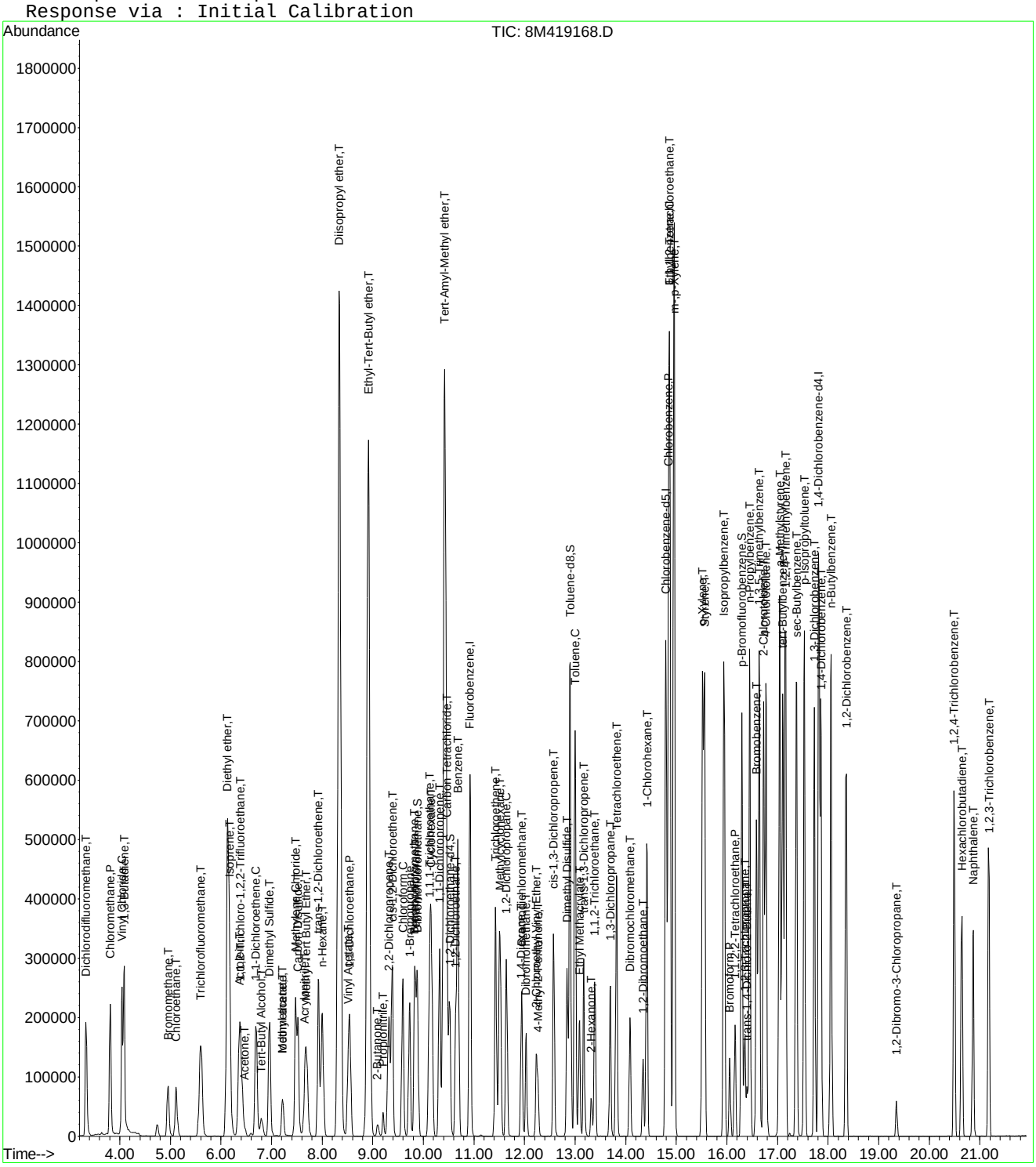
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	173102	19.8566	ug/L		96
46)	Benzene	10.68	78	619325	19.5388	ug/L		96
47)	Trichloroethene	11.42	130	165244	18.5579	ug/L		98
48)	Methylcyclohexane	11.52	83	235087	19.8060	ug/L		95
49)	1,2-Dichloropropane	11.64	63	149605	19.3246	ug/L		92
50)	Bromodichloromethane	11.94	83	194703	19.2180	ug/L		98
51)	1,4-Dioxane	11.93	88	8014	181.5627	ug/L		90
52)	Dibromomethane	12.02	93	80403	20.1811	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	68315	20.3944	ug/L		97
54)	4-Methyl-2-Pentanone	12.26	58	31571	21.0416	ug/L		99
55)	cis-1,3-Dichloropropene	12.57	75	238040	20.6310	ug/L		98
56)	Dimethyl Disulfide	12.84	79	110304	18.6462	ug/L		89
59)	Toluene	12.99	91	684862	19.7280	ug/L		98
60)	Ethyl Methacrylate	13.09	69	147633	22.5411	ug/L		85
62)	trans-1,3-Dichloropropene	13.17	75	190398	18.9117	ug/L		99
63)	1,1,2-Trichloroethane	13.39	97	108167	18.9386	ug/L		97
64)	2-Hexanone	13.32	58	28983	20.6774	ug/L	#	40
65)	1,3-Dichloropropane	13.70	76	192373	19.9241	ug/L		86
66)	Tetrachloroethene	13.82	164	143451	19.6722	ug/L		99
67)	Dibromochloromethane	14.08	129	140341	19.1217	ug/L		100
68)	1,2-Dibromoethane	14.34	107	107858	19.3330	ug/L		99
69)	1-Chlorohexane	14.42	91	240448	21.8922	ug/L		92
70)	Chlorobenzene	14.84	112	451096	18.2547	ug/L		98
71)	1,1,1,2-Tetrachloroethane	14.87	131	165290	18.8483	ug/L		99
72)	Ethylbenzene	14.87	106	255842	18.4855	ug/L		93
73)	m-,p-Xylene	14.96	106	622652	38.8479	ug/L		93
74)	o-Xylene	15.52	106	300743	18.6634	ug/L		99
75)	Styrene	15.56	104	510321	20.2002	ug/L		95
76)	Bromoform	16.05	173	83352	16.7902	ug/L		99
77)	Isopropylbenzene	15.94	105	762244	19.7557	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	126036	19.7811	ug/L		98
81)	1,2,3-Trichloropropane	16.35	110	36404	19.9293	ug/L		65
82)	trans-1,4-Dichloro-2-Buten	16.39	53	21952	14.6577	ug/L		85
83)	n-Propylbenzene	16.45	91	909042	19.2340	ug/L		100
84)	Bromobenzene	16.58	156	205599	18.5662	ug/L		99
85)	1,3,5-Trimethylbenzene	16.63	105	650918	19.0207	ug/L		98
86)	2-Chlorotoluene	16.73	91	573615	17.7779	ug/L		94
87)	4-Chlorotoluene	16.77	91	565154	19.4361	ug/L		99
88)	a-Methylstyrene	17.05	118	402232	20.9652	ug/L		98
89)	tert-Butylbenzene	17.10	134	139843	18.0487	ug/L		92
90)	1,2,4-Trimethylbenzene	17.16	105	689191	19.7268	ug/L		99
91)	sec-Butylbenzene	17.38	105	817361	19.0695	ug/L		99
92)	p-Isopropyltoluene	17.53	119	707309	19.5974	ug/L		98
93)	1,3-Dichlorobenzene	17.73	146	396242	18.4604	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	400910	18.3717	ug/L		99
95)	n-Butylbenzene	18.06	91	648966	19.9609	ug/L		99
96)	1,2-Dichlorobenzene	18.36	146	356124	18.8865	ug/L		97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18465	17.8068	ug/L		92
98)	1,2,4-Trichlorobenzene	20.49	180	240854	18.9724	ug/L		100
99)	Hexachlorobutadiene	20.64	225	101980	17.2630	ug/L		99
100)	Naphthalene	20.87	128	372565	20.5365	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	203385	19.2923	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419168.D 8260WT.M Wed Apr 26 13:01:13 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06:32 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	776037	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	627617	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	334340	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	205643	25.2642 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.04%		
43) 1,2-Dichloroethane-d4	10.52	65	175717	24.9711 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.88%		
58) Toluene-d8	12.90	98	752402	26.2372 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.96%		
80) p-Bromofluorobenzene	16.29	95	297255	25.1914 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.76%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	229689	21.8707 ug/L	99
3) Chloromethane	3.81	50	279327	21.2747 ug/L	97
4) Vinyl Chloride	4.04	62	241094	19.4441 ug/L	98
5) 1,3-Butadiene	4.08	54	142087	25.8498 ug/L	97
6) Bromomethane	4.95	94	87210	22.5629 ug/L	98
7) Chloroethane	5.12	64	117395	21.6754 ug/L	98
8) Trichlorofluoromethane	5.60	101	271258	20.1421 ug/L	99
9) Diethyl ether	6.13	59	455563	89.8179 ug/L	92
10) Isoprene	6.17	67	222672	20.9122 ug/L	91
11) Acrolein	6.37	56	61691	87.8242 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	165319	21.5274 ug/L	99
13) Acetone	6.47	43	20044	18.3646 ug/L	95
14) 1,1-Dichloroethene	6.70	61	211582	18.8257 ug/L	99
15) Tert-Butyl Alcohol	6.80	59	66736	188.6280 ug/L	99
16) Dimethyl Sulfide	6.96	62	161228	21.5372 ug/L	90
17) Iodomethane	7.21	142	52638	15.6773 ug/L	96
18) Methyl acetate	7.22	43	56392	18.8680 ug/L	91
19) Methylene Chloride	7.47	84	150809	18.6720 ug/L	83
20) Carbon Disulfide	7.52	76	403523	17.2678 ug/L	100
21) Acrylonitrile	7.66	53	28661	18.9308 ug/L	99
22) Methyl Tert Butyl Ether	7.69	73	301936	18.9732 ug/L	93
23) trans-1,2-Dichloroethene	7.93	61	208634	19.0804 ug/L	95
24) n-Hexane	8.00	57	189580	20.7708 ug/L	90
25) Diisopropyl ether	8.34	45	2418406	98.8116 ug/L	96
26) Vinyl Acetate	8.51	43	214452	19.5363 ug/L	94
27) 1,1-Dichloroethane	8.55	63	269400	19.1433 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1921533	92.3173 ug/L	98
29) 2-Butanone	9.09	43	30538	17.8417 ug/L	93
30) Propionitrile	9.21	54	51008	96.1519 ug/L	99
31) 2,2-Dichloropropane	9.32	77	236072	19.8715 ug/L	99
32) cis-1,2-Dichloroethene	9.38	96	175662	19.4362 ug/L	96
33) Chloroform	9.59	83	279602	17.9314 ug/L	96
34) 1-Bromopropane	9.74	122	45011	25.2458 ug/L	96
35) Bromochloromethane	9.83	130	97284	19.9478 ug/L	96
36) Tetrahydrofuran	9.85	42	110757	94.0032 ug/L	85
38) 1,1,1-Trichloroethane	10.13	97	254597	20.2322 ug/L	99
39) Cyclohexane	10.16	56	212753	18.1594 ug/L	91
40) 1,1-Dichloropropene	10.31	75	210743	19.1808 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1797634	96.4485 ug/L	98
42) Carbon Tetrachloride	10.47	117	238617	20.4506 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419120.D 8260WT.M Mon Apr 24 14:27:19 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06:32 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

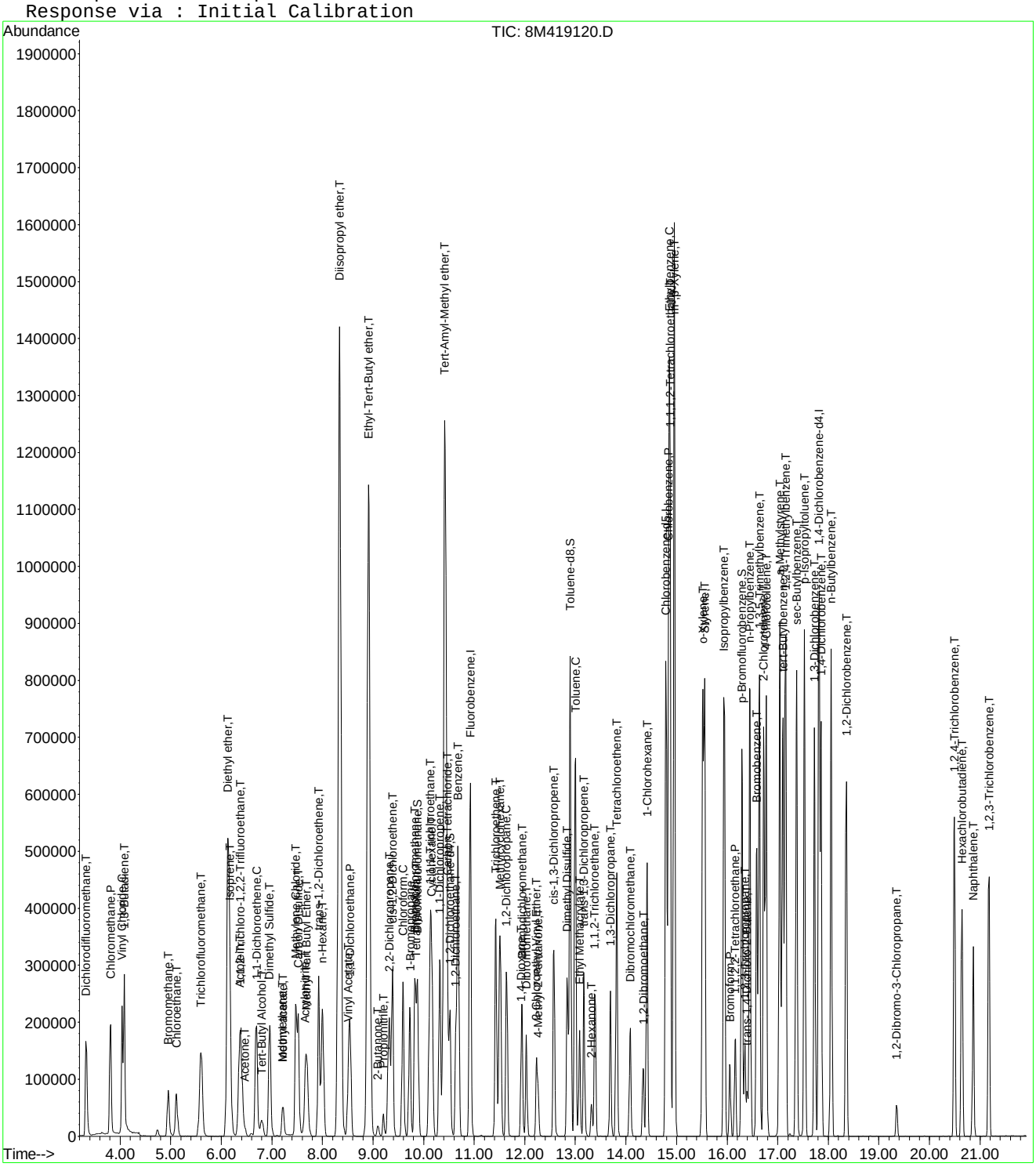
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.63	62	171649	19.4674	ug/L	97
46)	Benzene	10.68	78	625225	19.5021	ug/L	96
47)	Trichloroethene	11.43	130	172329	19.1349	ug/L	97
48)	Methylcyclohexane	11.51	83	231803	19.3086	ug/L	95
49)	1,2-Dichloropropane	11.64	63	147351	18.8184	ug/L	95
50)	Bromodichloromethane	11.95	83	197594	19.2830	ug/L	99
51)	1,4-Dioxane	11.93	88	8967	200.8580	ug/L	87
52)	Dibromomethane	12.03	93	77593	19.2557	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.23	63	64573	19.0594	ug/L	99
54)	4-Methyl-2-Pentanone	12.26	58	29061	19.1499	ug/L	96
55)	cis-1,3-Dichloropropene	12.58	75	236575	20.2723	ug/L	100
56)	Dimethyl Disulfide	12.84	79	111402	18.6235	ug/L	87
59)	Toluene	13.00	91	683147	19.5546	ug/L	99
60)	Ethyl Methacrylate	13.08	69	138496	21.0128	ug/L	90
62)	trans-1,3-Dichloropropene	13.17	75	185392	18.2985	ug/L	99
63)	1,1,2-Trichloroethane	13.38	97	104435	18.1699	ug/L	96
64)	2-Hexanone	13.32	58	26045	18.4643	ug/L	83
65)	1,3-Dichloropropane	13.69	76	185948	19.1373	ug/L	86
66)	Tetrachloroethene	13.82	164	144775	19.7287	ug/L	97
67)	Dibromochloromethane	14.09	129	135377	18.3291	ug/L	99
68)	1,2-Dibromoethane	14.35	107	105371	18.7682	ug/L	100
69)	1-Chlorohexane	14.42	91	229591	20.7720	ug/L	93
70)	Chlorobenzene	14.84	112	454927	18.2938	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.87	131	166631	18.8815	ug/L	98
72)	Ethylbenzene	14.86	106	259307	18.6178	ug/L	95
73)	m-,p-Xylene	14.95	106	636015	39.4317	ug/L	95
74)	o-Xylene	15.52	106	304205	18.7593	ug/L	100
75)	Styrene	15.55	104	513015	20.1789	ug/L	96
76)	Bromoform	16.06	173	80900	16.2139	ug/L	100
77)	Isopropylbenzene	15.94	105	763449	19.6623	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.15	83	116488	18.4650	ug/L	96
81)	1,2,3-Trichloropropane	16.35	110	34144	18.8786	ug/L	69
82)	trans-1,4-Dichloro-2-Buten	16.39	53	20505	13.8637	ug/L	79
83)	n-Propylbenzene	16.44	91	908240	19.4087	ug/L	99
84)	Bromobenzene	16.59	156	205363	18.7299	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	660733	19.5002	ug/L	98
86)	2-Chlorotoluene	16.72	91	546614	17.1101	ug/L	83
87)	4-Chlorotoluene	16.77	91	586496	20.3714	ug/L	91
88)	a-Methylstyrene	17.04	118	392182	20.6454	ug/L	97
89)	tert-Butylbenzene	17.10	134	143753	18.7385	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	686131	19.8352	ug/L	98
91)	sec-Butylbenzene	17.37	105	830182	19.5618	ug/L	100
92)	p-Isopropyltoluene	17.53	119	719810	20.1428	ug/L	98
93)	1,3-Dichlorobenzene	17.72	146	398610	18.7560	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	398620	18.4490	ug/L	98
95)	n-Butylbenzene	18.06	91	649852	20.1876	ug/L	100
96)	1,2-Dichlorobenzene	18.36	146	352130	18.8610	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	17525	17.0689	ug/L	94
98)	1,2,4-Trichlorobenzene	20.49	180	238142	18.9460	ug/L	100
99)	Hexachlorobutadiene	20.64	225	109270	18.6816	ug/L	99
100)	Naphthalene	20.87	128	342143	19.0478	ug/L	99
101)	1,2,3-Trichlorobenzene	21.18	180	197200	18.8923	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419120.D 8260WT.M Mon Apr 24 14:27:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	788127	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	636816	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	344756	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	208755	25.2531	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.00%			
43) 1,2-Dichloroethane-d4	10.52	65	181270	25.3650	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.48%			
58) Toluene-d8	12.90	98	770069	26.4653	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%			
80) p-Bromofluorobenzene	16.29	95	305663	25.1213	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	273651	25.6570	ug/L	100
3) Chloromethane	3.81	50	296380	22.2273	ug/L	99
4) Vinyl Chloride	4.04	62	274389	21.7899	ug/L	97
5) 1,3-Butadiene	4.09	54	142502	25.4397	ug/L	94
6) Bromomethane	4.95	94	104140	25.9437	ug/L	98
7) Chloroethane	5.11	64	127123	23.1114	ug/L	98
8) Trichlorofluoromethane	5.61	101	291514	21.3141	ug/L	99
9) Diethyl ether	6.13	59	467190	90.6973	ug/L	91
10) Isoprene	6.17	67	212297	19.6320	ug/L	90
11) Acrolein	6.37	56	63400	88.8726	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	178665	22.9084	ug/L	99
13) Acetone	6.47	43	20690	18.6657	ug/L	94
14) 1,1-Dichloroethene	6.69	61	212814	18.6449	ug/L	94
15) Tert-Butyl Alcohol	6.80	59	67852	188.8403	ug/L	99
16) Dimethyl Sulfide	6.96	62	159439	20.9715	ug/L	88
17) Iodomethane	7.22	142	76686	22.4892	ug/L	92
18) Methyl acetate	7.22	43	59730	19.6783	ug/L	91
19) Methylene Chloride	7.48	84	154131	18.7905	ug/L	84
20) Carbon Disulfide	7.53	76	382298	16.1086	ug/L	99
21) Acrylonitrile	7.66	53	30245	19.6706	ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	310711	19.2250	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	209241	18.8424	ug/L	94
24) n-Hexane	8.00	57	186290	20.0973	ug/L	91
25) Diisopropyl ether	8.34	45	2519969	101.3818	ug/L	95
26) Vinyl Acetate	8.51	43	227887	20.4417	ug/L	93
27) 1,1-Dichloroethane	8.55	63	274771	19.2255	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1968261	93.1116	ug/L	97
29) 2-Butanone	9.10	43	34365	19.7696	ug/L	91
30) Propionitrile	9.20	54	54033	100.2916	ug/L	99
31) 2,2-Dichloropropane	9.32	77	241625	20.0269	ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	177571	19.3460	ug/L	93
33) Chloroform	9.59	83	287680	18.1665	ug/L	98
34) 1-Bromopropane	9.73	122	43389	23.9627	ug/L	97
35) Bromochloromethane	9.82	130	98060	19.7984	ug/L	93
36) Tetrahydrofuran	9.85	42	116835	97.6406	ug/L	86
38) 1,1,1-Trichloroethane	10.12	97	256707	20.0870	ug/L	99
39) Cyclohexane	10.16	56	219916	18.4828	ug/L	89
40) 1,1-Dichloropropene	10.32	75	217392	19.4825	ug/L	100
41) Tert-Amyl-Methyl ether	10.42	73	1851108	97.7940	ug/L	97
42) Carbon Tetrachloride	10.46	117	241403	20.3720	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419169.D 8260WT.M Wed Apr 26 13:01:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

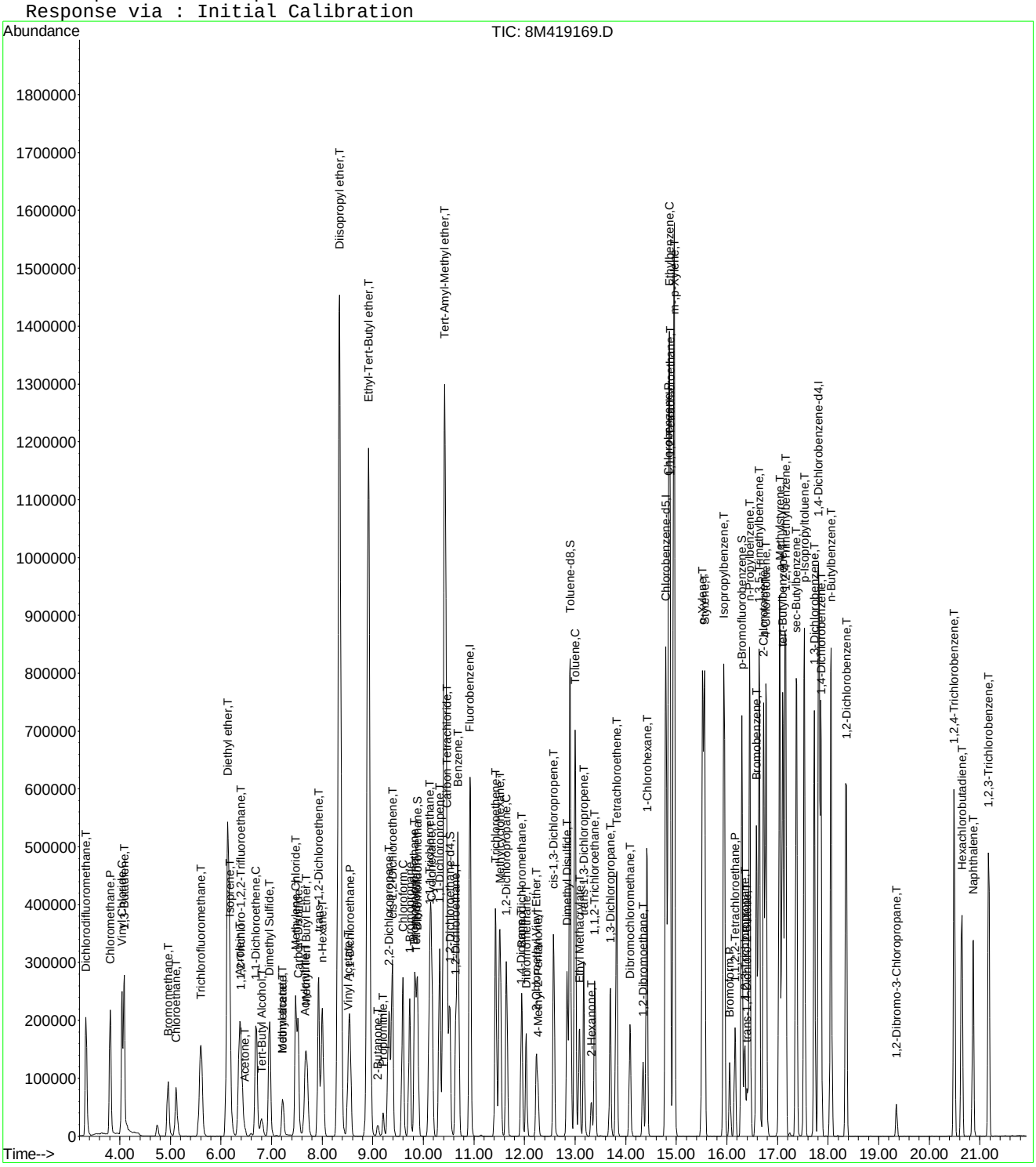
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	170984	19.0945	ug/L	96
46)	Benzene	10.68	78	635964	19.5328	ug/L	95
47)	Trichloroethene	11.42	130	170718	18.6653	ug/L	98
48)	Methylcyclohexane	11.52	83	241169	19.7806	ug/L	95
49)	1,2-Dichloropropane	11.64	63	152664	19.1979	ug/L	95
50)	Bromodichloromethane	11.94	83	200767	19.2921	ug/L	99
51)	1,4-Dioxane	11.93	88	9504	209.6209	ug/L	88
52)	Dibromomethane	12.03	93	80616	19.6990	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	70065	20.3632	ug/L	98
54)	4-Methyl-2-Pentanone	12.26	58	29664	19.2474	ug/L	99
55)	cis-1,3-Dichloropropene	12.57	75	242784	20.4852	ug/L	99
56)	Dimethyl Disulfide	12.84	79	107906	17.9060	ug/L	84
59)	Toluene	12.99	91	700300	19.7560	ug/L	98
60)	Ethyl Methacrylate	13.09	69	144401	21.5923	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	191887	18.6660	ug/L	98
63)	1,1,2-Trichloroethane	13.39	97	107549	18.4414	ug/L	98
64)	2-Hexanone	13.33	58	27922	19.5090	ug/L	84
65)	1,3-Dichloropropane	13.70	76	192397	19.5150	ug/L	86
66)	Tetrachloroethene	13.82	164	145414	19.5296	ug/L	98
67)	Dibromochloromethane	14.08	129	138687	18.5060	ug/L	100
68)	1,2-Dibromoethane	14.34	107	106946	18.7736	ug/L	100
69)	1-Chlorohexane	14.42	91	245059	21.8512	ug/L	92
70)	Chlorobenzene	14.84	112	463274	18.3603	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	168895	18.8616	ug/L	100
72)	Ethylbenzene	14.87	106	264943	18.7476	ug/L	93
73)	m-,p-Xylene	14.96	106	648522	39.6263	ug/L	96
74)	o-Xylene	15.52	106	311731	18.9457	ug/L	100
75)	Styrene	15.56	104	524165	20.3197	ug/L	95
76)	Bromoform	16.05	173	79745	15.7679	ug/L	99
77)	Isopropylbenzene	15.94	105	782193	19.8541	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	123738	19.0216	ug/L	99
81)	1,2,3-Trichloropropane	16.35	110	35785	19.1881	ug/L	63
82)	trans-1,4-Dichloro-2-Buten	16.40	53	21714	14.2206	ug/L	90
83)	n-Propylbenzene	16.45	91	939413	19.4684	ug/L	100
84)	Bromobenzene	16.58	156	210993	18.6620	ug/L	99
85)	1,3,5-Trimethylbenzene	16.63	105	673985	19.2903	ug/L	98
86)	2-Chlorotoluene	16.73	91	588060	17.8513	ug/L	94
87)	4-Chlorotoluene	16.77	91	585680	19.7284	ug/L	100
88)	a-Methylstyrene	17.05	118	410115	20.9371	ug/L	97
89)	tert-Butylbenzene	17.10	134	144154	18.2230	ug/L	92
90)	1,2,4-Trimethylbenzene	17.16	105	705493	19.7787	ug/L	99
91)	sec-Butylbenzene	17.37	105	842978	19.2632	ug/L	100
92)	p-Isopropyltoluene	17.53	119	729766	19.8044	ug/L	97
93)	1,3-Dichlorobenzene	17.73	146	405197	18.4899	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	406013	18.2234	ug/L	100
95)	n-Butylbenzene	18.06	91	671631	20.2338	ug/L	100
96)	1,2-Dichlorobenzene	18.36	146	357021	18.5452	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	17265	16.3077	ug/L	91
98)	1,2,4-Trichlorobenzene	20.49	180	245454	18.9377	ug/L	99
99)	Hexachlorobutadiene	20.64	225	105356	17.4683	ug/L	99
100)	Naphthalene	20.87	128	364632	19.6865	ug/L	99
101)	1,2,3-Trichlorobenzene	21.17	180	203058	18.8657	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419169.D 8260WT.M Wed Apr 26 13:01:16 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 25, 2017

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001 - BIO-CHEM TESTING WVDEP 220	002 - REIC Consultants, Inc. WVDEP 060
003 - Sturm Environmental	004 - MICROBAC PITTSBURGH
005 - ES LABORATORIES	006 - ALCOSAN LABORATORIES
007 - ALS LABORATORIES	008 - BENCHMARK LABORATORIES
010 - MICROBAC CHICAGOLAND	AC - AMBER R. CARMICHAEL
ADC - ANTHONY D. CANTER	ADG - APRIL D. GREENE
ALS - ADRIANE L. STEED	AWE - ANDREW W. ESSIG
AZH - AFTER HOURS	BJO - BRIAN J. OGDEN
BLG - BRENDA L. GREENWALT	BNB - Brandi N. Bentley
BRG - BRENDA R. GREGORY	CAS - Craig A. Smith
CEB - CHAD E. BARNES	CLC - CHRYS L. CRAWFORD
CLS - CARA L. STRICKLER	CPD - CHAD P. DAVIS
CSH - CHRIS S. HILL	CV - Carl Volkman
DAK - DEAN A. KETELSEN	DCM - DAVID C. MERCKLE
DEV - DAVID E. VANDENBERG	DIH - DEANNA I. HESSON
DLB - DAVID L. BUMGARNER	DLP - DOROTHY L. PAYNE
DSM - DAVID S. MOSSOR	DTG - DOMINIC T. GEHRET
ECL - ERIC C. LAWSON	EPT - ETHAN P. TIDD
ERP - ERIN R. PORTER	FJB - FRANCES J. BOLDEN
HRF - HEATHER R. FAIRCHILD	JDH - JUSTIN D. HESSON
JDS - JARED D. SMITH	JKP - JACQUELINE K. PARSONS
JLD - JESSICA L. DELONG	JST - JOSHUA S. TAYLOR
JTP - JOSHUA T. PEMBERTON	JWR - JOHN W. RICHARDS
JWS - JACK W. SHEAVES	JYH - JI Y. HU
KAK - KATHY A. KIRBY	KDD - Katelyn D. Daley
KEB - KATIE E. BARNES	KHR - KIM H. RHODES
KKB - KERRI K. BUCK	KRA - KATHY R. ALBERTSON
KRP - KATHY R. PARSONS	LJH - Lacey J. Hendershot
LLS - LARRY L. STEPHENS	LSB - LESLIE S. BUCINA
LSJ - LAURA S. JONES	MAP - MARLA A. PORTER
MBK - MORGAN B. KNOWLTON	MES - MARY E. SCHILLING
MMB - MAREN M. BEERY	MRT - MICHELLE R. TAYLOR
OJE - OMOYEMWEN J. ENGLISH	PDM - PIERCE D. MORRIS
PIT - MICROBAC WARRENDALE	REK - BOB E. KYER
RLB - BOB BUCHANAN	RNP - RICK N. PETTY
SAV - SARAH A. VANDENBERG	SCA - SUEELLEN C. ADAMS
SCB - SARAH C. BOGOLIN	SCJ - SUE ELLEN C. JOHNSON
SDC - SHALYN D. CONLEY	TB - TODD BOYLE
TMB - TIFFANY M. BAILEY	TMM - TAMMY M. MORRIS
VC - VICKI COLLIER	WTD - WADE T. DELONG
XXX - UNAVAILABLE OR SUBCONTRACT	ZTB - ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 25, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17041069 / Revision: 2 / 1081 total pages

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Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 3
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
Preservation Code:									
MW-85-LS-25	4/19/17	~~845~~ 855	G	W	N		x		
PMW-85-01-LS-25	4/19/17	850	G	W	N		x		
DUP-10	4/19/17	~~850~~ 855	G	W	N		x		
PMW-85-05-LS-25	4/19/17	920	G	W	N		x		
DR2-3-LS-25	4/19/17	953	G	W	N		x		
MW-113-LS-25	4/19/17	1007	G	W	N		x		
PMW92-03-LS-25	4/19/17	1015	G	W	N	x	x		
PMW92-02-LS-25	4/19/17	1031	G	W	N		x		
DUP-3	4/19/17	1040	G	W	N		x		
MW-92-LS-25	4/19/17	1042	G	W	N		x		
DR2-1-LS-25	4/19/17	1102	G	W	N		x		

Microbac OVD
Received: 04/21/2017 10:11
By: BRENDA GREENWALT 221000099807
Brenda Greenwalt

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:			
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company	

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 2 of 3

Company: HDR	Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:	
City: Englewood	TAT Requested (days):	
State, Zip: Colorado 80112		
Phone: 404-295-3279	PO #:	
Email: thomas.holmes@hdrinc.com	WO #:	
Project Name: LTM 2017	Project #:	
Site: DDMT	SSOW#:	

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2O3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - pH 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-88-LS-25	4/19/17	1110	G	W	N		x		
DR2-2-LS-25	4/19/17	1125	G	W	N		x		
MW-266-LS-25	4/19/17	1135	G	W	N		x		
MW-267-LS-25	4/19/17	1308	G	W	N		x		
MW-26-LS-25	4/19/17	1322	G	W	N		x		
DR2-6-LS-25	4/19/17	1331	G	W	N		x		
MW-217-LS-25	4/19/17	1339	G	W	N		x		
MW-64-LS-25	4/19/17	1347	G	W	N		x		
MW-218-LS-25	4/19/17	1357	G	W	N		x		
MW-268-LS-25	4/19/17	1405	G	W	N		x		
MW-270-LS-25	4/19/17	1415	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1600	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 3 of 8
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2O3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - pH 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-272-LS-25	4/19/17	1428	G	W	N		x		
MW-259-LS-25	4/19/17	1457	G	W	N	X	x		
MW-271-LS-25	4/19/17	1510	G	W	N		x		
MW-97-LS-25	4/19/17	1528	G	W	N		x		
MW-204A-LS-25	4/19/17	1538	G	W	N		x		
MW-204B-LS-25	4/19/17	1543	G	W	N	X	x		
MW-197A-LS-25	4/19/17	1600	G	W	N		x		
MW-197B-LS-25	4/19/17	1605	G	W	N		x		
MW-203A-LS-25	4/19/17	1625	G	W	N		x		
MW-203B-LS-25	4/19/17	1630	G	W	N		x		
MW-210A-LS-25	4/19/17	1646	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For _____ Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/20/17 1800	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 4 of 8
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-210B-LS-25	4/19/17	1652	G	W	N		x		
MW-277-LS-25	4/19/17	1521	G	W	N		x		
MW-280-LS-25	4/19/17	1116	G	W	N		x		
MW-98-LS-25	4/20/17	755	G	W	N		x		
DUP-6	4/20/17	758	G	W	N		x		
MW-205A-LS-25	4/20/17	805	G	W	N		x		
MW-205B-LS-25	4/20/17	810	G	W	N		x		
MW-39A-LS-25	4/20/17	821	G	W	N		x		
MW-39-LS-25	4/20/17	826	G	W	N		x		
MW-206B-LS-25	4/20/17	837	G	W	N		x		
MW-206A-LS-25	4/20/17	842	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

L17041069 / Revision: 2 / 1081 total pages

Generated: 07/25/2017 13:40

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 5 of 8
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days):			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112	PO #:			
Phone: 404-295-3279	WO #:			Other:
Email: thomas.holmes@hdrinc.com	Project #:			
Project Name: LTM 2017	SSOW#:			
Site: DDMT				

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-265-LS-25	4/20/17	1023	G	W	N		x		
✓ DUP-8	4/20/17	1028	G	W	N		x		
✓ MW-264-LS-25	4/20/17	1031	G	W	N		x		
✓ MW-104-LS-25	4/20/17	1040	G	W	N		x		
✓ MW-263-LS-25	4/20/17	1048	G	W	N		x		
✓ DR1-5A-LS-25	4/20/17	1302	G	W	N		x		
✓ DR1-5-LS-25	4/20/17	1310	G	W	N		x		
✓ MW-21-LS-25	4/20/17	1338	G	W	N		x		
✓ DUP-2	4/20/17	1344	G	W	N		x		
✓ PMW21-01-LS-25	4/20/17	1350	G	W	N		x		
✓ PMW21-02-LS-25	4/20/17	~~1357~~ 1358	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	4/20/17 1800	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

L17041069 / Revision: 2 / 1081 total pages

Generated: 07/25/2017 13:40

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 6 of 6
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-200-LS-25	4/20/17	849	G	W	N		x		
MW-94A-LS-25	4/20/17	856	G	W	N		x		
MW-208B-LS-25	4/20/17	903	G	W	N		x		
MW-208A-LS-25	4/20/17	908	G	W	N		x		
MW-207B-LS-25	4/20/17	918	G	W	N		x		
MW-207A-LS-25	4/20/17	923	G	W	N		x		
MW-108-LS-25	4/20/17	937	G	W	N		x		
DUP-4	4/20/17	940	G	W	N		x		
MW-107B-LS-25	4/20/17	955	G	W	N		x		
MW-107T-LS-25	4/20/17	955	G	W	N		x		
MW-258-LS-25	4/20/17	1017	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 7 of 8
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
PMW21-03-LS-25	4/20/17	1410	G	W	N		x		
PMW21-04-LS-25	4/20/17	1416	G	W	N		x		
MW-100B-LS-25	4/20/17	1423	G	W	N	X	x		
DR1-6A-LS-25	4/20/17	1441	G	W	N	X	x		
DR1-6-LS-25	4/20/17	1448	G	W	N		x		
PMW101-06A-LS-25	4/20/17	1500	G	W	N		x		
DUP-11	4/20/17	1503	G	W	N		x		
PMW101-06B-LS-25	4/20/17	1510	G	W	N		x		
PMW101-07A-LS-25	4/20/17	1525	G	W	N		x		
PMW101-07B-LS-25	4/20/17	1530	G	W	N		x		
PMW21-05-LS-25	4/20/17	1539	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:			
Relinquished by: JBS	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

MICROBAC

COOLER TEMP >6° C LOG

Cooler ID 9807

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

4/21/17

B29

pH Lot # N/A

pH Exceptions

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

4/21/17

B29

PRESERVATIVE EXCEPTIONS

__NONE

__AS NOTED

B29 4/21/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-01	897360	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Samplenum	Container ID	Products
L17041069-02	897361	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:52	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-03	897362	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Samplenum	Container ID	Products
L17041069-04	897363	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-05	897364	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Samplenum	Container ID	Products
L17041069-06	897365	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-07	897366	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:53	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

Samplenum	Container ID	Products
L17041069-08	897367	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-09	897368	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:11	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	21-APR-2017 13:32	BRG		
2	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

Samplenum	Container ID	Products
L17041069-10	897369	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-11	897370	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Samplenum	Container ID	Products
L17041069-12	897371	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-13	897372	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	

Samplenum	Container ID	Products
L17041069-14	897373	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-15	897374	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:54	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Samplenum	Container ID	Products
L17041069-16	897375	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-17	897376	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Samplenum	Container ID	Products
L17041069-18	897377	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-19	897378	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:12	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Samplenum	Container ID	Products
L17041069-20	897379	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-21	897380	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:55	BJO	BJO	

Samplenum	Container ID	Products
L17041069-22	897381	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-23	897382	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	21-APR-2017 13:32	BRG		
2	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
3	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Samplenum	Container ID	Products
L17041069-24	897383	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-25	897384	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:13	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 11:56	BJO	BJO	

Samplenum	Container ID	Products
L17041069-26	897385	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-27	897386	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

Samplenum	Container ID	Products
L17041069-28	897387	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-29	897388	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	21-APR-2017 13:32	BRG		
2	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
3	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Samplenum	Container ID	Products
L17041069-30	897389	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-31	897390	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Samplenum	Container ID	Products
L17041069-32	897391	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:08	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-33	897392	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

Samplenum	Container ID	Products
L17041069-34	897393	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		21-APR-2017 13:32	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-35	897394	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Samplenum	Container ID	Products
L17041069-36	897395	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-37	897396	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Samplenum	Container ID	Products
L17041069-38	897397	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-39	897398	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Samplenum	Container ID	Products
L17041069-40	897399	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-41	897400	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Samplenum	Container ID	Products
L17041069-42	897401	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:01	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-43	897402	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Samplenum	Container ID	Products
L17041069-44	897403	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:09	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-45	897404	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Samplenum	Container ID	Products
L17041069-46	897405	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-47	897406	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Samplenum	Container ID	Products
L17041069-48	897407	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

A1 - Sample Archive (COLD)
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F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041069
Account: 2694
Project: 2694.011
Samples: 50
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041069-49	897408	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Samplenum	Container ID	Products
L17041069-50	897409	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 13:32	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 14:10	JDS	BRG	
3	STORE	ORG4	A2	04-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:02	CLS	CLS	

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F1 - Volatiles Freezer in Login
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W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17041075 *(Revised)*

Revised report to re-scan the COCs forms that did not pull into the original scan.
Revised report to remove 1,4-dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 26 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041075
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

There were no discrepancies.

Discrepancy	Resolution

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00114306	H	3.0		1001891733010004575000778957073418	X
0019634	H	3.0		1002826033010004575000778957073223	X
00113895	H	2.0		1002826033010004575000778957073245	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	Yes

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-200-LS-25	L17041075-01	04/20/2017 08:49	04/21/2017 10:11
MW-94A-LS-25	L17041075-02	04/20/2017 08:56	04/21/2017 14:12
MW-208B-LS-25	L17041075-03	04/20/2017 09:03	04/21/2017 14:12
MW-208A-LS-25	L17041075-04	04/20/2017 09:08	04/21/2017 14:12
MW-207B-LS-25	L17041075-05	04/20/2017 09:18	04/21/2017 14:12
MW-207A-LS-25	L17041075-06	04/20/2017 09:23	04/21/2017 14:12
MW-108-LS-25	L17041075-07	04/20/2017 09:37	04/21/2017 14:12
DUP-4	L17041075-08	04/20/2017 09:40	04/21/2017 14:12
MW-107B-LS-25	L17041075-09	04/20/2017 09:55	04/21/2017 14:12
MW-107T-LS-25	L17041075-10	04/20/2017 09:55	04/21/2017 14:12
MW-258-LS-25	L17041075-11	04/20/2017 10:17	04/21/2017 14:12
MW-265-LS-25	L17041075-12	04/20/2017 10:23	04/21/2017 14:12
DUP-8	L17041075-13	04/20/2017 10:28	04/21/2017 14:12
MW-264-LS-25	L17041075-14	04/20/2017 10:31	04/21/2017 14:12
MW-104-LS-25	L17041075-15	04/20/2017 10:40	04/21/2017 14:12
MW-263-LS-25	L17041075-16	04/20/2017 10:48	04/21/2017 14:12
DR1-5A-LS-25	L17041075-17	04/20/2017 13:02	04/21/2017 14:12
DR1-5-LS-25	L17041075-18	04/20/2017 13:10	04/21/2017 14:12
MW-21-LS-25	L17041075-19	04/20/2017 13:38	04/21/2017 14:12
DUP-2	L17041075-20	04/20/2017 13:44	04/21/2017 14:12
PMW21-01-LS-25	L17041075-21	04/20/2017 13:50	04/21/2017 14:12
PMW21-02-LS-25	L17041075-22	04/20/2017 13:58	04/21/2017 14:12
PMW21-03-LS-25	L17041075-23	04/20/2017 14:10	04/21/2017 14:12
PMW21-04-LS-25	L17041075-24	04/20/2017 14:16	04/21/2017 14:12
MW-100B-LS-25	L17041075-25	04/20/2017 14:23	04/21/2017 14:12
MW-100B-LS-25	L17041075-26	04/20/2017 14:23	04/21/2017 14:12
MW-100B-LS-25	L17041075-27	04/20/2017 14:23	04/21/2017 14:12
DR1-6A-LS-25	L17041075-28	04/20/2017 14:41	04/21/2017 14:12
DR1-6A-LS-25	L17041075-29	04/20/2017 14:41	04/21/2017 14:12
DR1-6A-LS-25	L17041075-30	04/20/2017 14:41	04/21/2017 14:12
DR1-6-LS-25	L17041075-31	04/20/2017 14:48	04/21/2017 14:12
PMW101-06A-LS-25	L17041075-32	04/20/2017 15:00	04/21/2017 14:12
DUP-11	L17041075-33	04/20/2017 15:03	04/21/2017 14:12
PMW101-06B-LS-25	L17041075-34	04/20/2017 15:10	04/21/2017 14:12
PMW101-07A-LS-25	L17041075-35	04/20/2017 15:25	04/21/2017 14:12
PMW101-07B-LS-25	L17041075-36	04/20/2017 15:30	04/21/2017 14:12
PMW21-05-LS-25	L17041075-37	04/20/2017 15:39	04/21/2017 14:12

MW-276-LS-25	L17041075-38	04/20/2017 09:00	04/21/2017 14:12
DUP-9	L17041075-39	04/20/2017 10:00	04/21/2017 14:12
MW-279-LS-25	L17041075-40	04/20/2017 11:23	04/21/2017 14:12
MW-278-LS-25	L17041075-41	04/20/2017 13:53	04/21/2017 14:12
MW-275-LS-25	L17041075-42	04/20/2017 16:30	04/21/2017 14:12
LTM-TB1-LS-25	L17041075-43	04/20/2017 17:00	04/21/2017 14:12
LTM-TB2-LS-25	L17041075-44	04/20/2017 17:05	04/21/2017 14:12
LTM-TB3-LS-25	L17041075-45	04/20/2017 17:10	04/21/2017 14:12

Microbac REPORT L17041075
PREPARED FOR CT Laboratories
WORK ID:

1.0 Summary Data ..... ??
1.1 Narratives ..... ??
1.2 Certificate of Analysis ..... ??
2.0 Full Sample Data Package ..... ??
2.1 Volatiles Data ..... ??
2.1.1 Volatiles GCMS Data (8260) ..... ??
2.1.1.1 Summary Data ..... ??
2.1.1.2 QC Summary Data ..... ??
2.1.1.3 Sample Data ..... ??
2.1.1.4 Standards Data ..... ??
2.1.1.5 Raw QC Data ..... ??
3.0 Attachments ..... ??

1.0 Summary Data

1.1 Narratives

Login Number: L17041075
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was out of range for the following analytes: Dichlorodifluoromethane, Trichlorofluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries out of range were observed for the following analytes: Bromomethane. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: Recoveries out of range were observed for the following analytes: Vinyl chloride. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124782
Approved By: Franci Bolden

1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041075-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-200-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 17:18
Collect Date:	04/20/2017 08:49	**Dilution:**	1	**File ID:**	8M419127
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.737	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.26	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.91		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.15		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-94A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 17:49
Collect Date:	04/20/2017 08:56	**Dilution:**	1	**File ID:**	8M419128
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.38		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.933	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.67		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-208B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 18:19
Collect Date:	04/20/2017 09:03	**Dilution:**	1	**File ID:**	8M419129
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.53	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.00		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.97		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.05		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-208A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 18:50
Collect Date:	04/20/2017 09:08	**Dilution:**	1	**File ID:**	8M419130
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.93	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.94	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-207B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 19:21
Collect Date:	04/20/2017 09:18	**Dilution:**	1	**File ID:**	8M419131
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.387	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.973	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.61	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.09		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.86		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.816	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	24.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	68.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-207A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 16:16
Collect Date:	04/20/2017 09:23	**Dilution:**	1	**File ID:**	8M419146
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.09		1.00	0.125
1,1-Dichloroethene	75-35-4	1.56		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.17		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.654	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-108-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 16:46
Collect Date:	04/20/2017 09:37	**Dilution:**	1	**File ID:**	8M419147
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.35		1.00	0.125
1,1-Dichloroethene	75-35-4	1.65		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.71	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.68		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.474	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.01		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-4	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 19:15
Collect Date:	04/20/2017 09:40	**Dilution:**	1	**File ID:**	8M419152
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.38		1.00	0.125
1,1-Dichloroethene	75-35-4	1.62		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.57		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.438	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.73		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 17:16
Collect Date:	04/20/2017 09:55	**Dilution:**	1	**File ID:**	8M419148
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.03	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.251	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.202	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.25		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	50.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107T-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 17:45
Collect Date:	04/20/2017 09:55	**Dilution:**	1	**File ID:**	8M419149
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.05	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.260	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.195	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.11		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	43.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-258-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 18:15
Collect Date:	04/20/2017 10:17	**Dilution:**	1	**File ID:**	8M419150
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.312	F	1.00	0.125
1,1-Dichloroethene	75-35-4	2.21		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.69		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.89		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.84		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	56.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-265-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 18:45
Collect Date:	04/20/2017 10:23	**Dilution:**	1	**File ID:**	8M419151
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.97	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.68		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.563	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.26	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-8	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 19:45
Collect Date:	04/20/2017 10:28	**Dilution:**	1	**File ID:**	8M419153
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.70		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.565	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.25	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.84		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-264-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 20:14
Collect Date:	04/20/2017 10:31	**Dilution:**	1	**File ID:**	8M419154
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.33	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-104-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 20:45
Collect Date:	04/20/2017 10:40	**Dilution:**	1	**File ID:**	8M419155
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.792	F	1.00	0.125
1,1-Dichloroethene	75-35-4	1.92		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.521	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.07		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-263-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 21:15
Collect Date:	04/20/2017 10:48	**Dilution:**	1	**File ID:**	8M419156
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.99		1.00	0.125
1,1-Dichloroethene	75-35-4	11.7		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.305	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.43	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.82		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.40		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.56		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.74		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-5A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 21:46
Collect Date:	04/20/2017 13:02	**Dilution:**	1	**File ID:**	8M419157
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.267	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.20	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	53.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.750	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	8.59		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.253	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-5-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 22:16
Collect Date:	04/20/2017 13:10	**Dilution:**	1	**File ID:**	8M419158
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.406	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	33.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.34	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.589	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.06		1.00	0.250
Toluene	108-88-3	8.00		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-21-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 22:45
Collect Date:	04/20/2017 13:38	**Dilution:**	1	**File ID:**	8M419159
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.84	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	111		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.07		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.916	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.414	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.53		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-2	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 23:16
Collect Date:	04/20/2017 13:44	**Dilution:**	1	**File ID:**	8M419160
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	111		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.12		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.815	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.402	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.40		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.260	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-01-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611561	**Analyst:**	TMB	**Run Date:**	04/26/2017 16:58
Collect Date:	04/20/2017 13:50	**Dilution:**	1	**File ID:**	8M419182
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	102		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	12.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.28		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.868	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.274	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-02-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611561	**Analyst:**	TMB	**Run Date:**	04/26/2017 17:27
Collect Date:	04/20/2017 13:58	**Dilution:**	1	**File ID:**	8M419183
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	43.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	61.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	150		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.22		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-03-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 21:36
Collect Date:	04/20/2017 14:10	**Dilution:**	1	**File ID:**	17M0273044
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.01		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	26.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	35.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	103		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.15		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-04-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:08
Collect Date:	04/20/2017 14:16	**Dilution:**	1	**File ID:**	17M0273074
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	17.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	27.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	53.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	142		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.21		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.3	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 22:13
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273045
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.504	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	15.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	32.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.53		1.00	0.250
Toluene	108-88-3	1.49		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.735	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	174		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	99.5	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 20:26
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273041
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.5		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	18.3		1.00	0.500
1,1-Dichloropropene	563-58-6	18.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.1		2.00	1.00
1,2-Dichloropropane	78-87-5	19.7		1.00	0.200
1,2-Dibromoethane	106-93-4	19.3		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	18.7		1.00	0.125
2,2-Dichloropropane	594-20-7	18.1		1.00	0.250
2-Hexanone	591-78-6	21.4		10.0	2.50
2-Chlorotoluene	95-49-8	18.5		1.00	0.125
4-Chlorotoluene	106-43-4	19.3		1.00	0.250
Acetone	67-64-1	26.9		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.5		1.00	0.125
Bromochloromethane	74-97-5	20.2		1.00	0.200
Bromodichloromethane	75-27-4	19.3		0.500	0.250
Bromoform	75-25-2	19.7		1.00	0.500
Bromomethane	74-83-9	19.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.7		1.00	0.500
Carbon tetrachloride	56-23-5	18.6		1.00	0.250
Chlorobenzene	108-90-7	19.2		0.500	0.125
Chloroethane	75-00-3	16.6		1.00	0.500
Chloroform	67-66-3	19.9		0.300	0.125
Chloromethane	74-87-3	22.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	34.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.8		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	20.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.1		1.00	0.250
Ethylbenzene	100-41-4	19.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.0		1.00	0.250
Methylene chloride	75-09-2	19.0		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	53.3		5.00	0.500
MEK (2-Butanone)	78-93-3	20.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.9		10.0	2.50
n-Butylbenzene	104-51-8	19.4		1.00	0.250
n-Propylbenzene	103-65-1	18.7		1.00	0.125
m-,p-Xylene	179601-23-1	39.3		2.00	0.500
Naphthalene	91-20-3	20.7		1.00	0.200
o-Xylene	95-47-6	19.5		1.00	0.250
p-Isopropyltoluene	99-87-6	19.2		1.00	0.250
sec-Butylbenzene	135-98-8	18.5		1.00	0.250
Styrene	100-42-5	20.1		1.00	0.125
Trichloroethene	79-01-6	19.4		1.00	0.250
tert-Butylbenzene	98-06-6	18.3		1.00	0.250
Tetrachloroethene	127-18-4	23.5		1.00	0.250
Toluene	108-88-3	20.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	12.7		1.00	0.250
Vinyl chloride	75-01-4	164		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Sample #:	L17041075-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 20:57
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273042
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.5		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.0		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	18.4		1.00	0.500
1,1-Dichloropropene	563-58-6	18.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.3		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	18.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.5		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.3		1.00	0.200
1,2-Dibromoethane	106-93-4	18.9		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	17.7		1.00	0.250
1,3-Dichloropropane	142-28-9	19.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	17.7		0.500	0.125
1-Chlorohexane	544-10-5	18.0		1.00	0.125
2,2-Dichloropropane	594-20-7	17.4		1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	17.6		1.00	0.125
4-Chlorotoluene	106-43-4	18.3		1.00	0.250
Acetone	67-64-1	28.1		10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	18.1		1.00	0.125
Bromochloromethane	74-97-5	20.0		1.00	0.200
Bromodichloromethane	75-27-4	19.0		0.500	0.250
Bromoform	75-25-2	19.2		1.00	0.500
Bromomethane	74-83-9	19.2		1.00	0.500
Carbon disulfide	75-15-0	16.0		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	18.5		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	16.8		1.00	0.500
Chloroform	67-66-3	19.5		0.300	0.125
Chloromethane	74-87-3	22.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	33.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.3		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	19.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.5		1.00	0.250
Ethylbenzene	100-41-4	18.6		1.00	0.250
Hexachlorobutadiene	87-68-3	16.1		0.600	0.250
Isopropylbenzene	98-82-8	17.9		1.00	0.250
Methylene chloride	75-09-2	18.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	53.1		5.00	0.500
MEK (2-Butanone)	78-93-3	20.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.6		10.0	2.50
n-Butylbenzene	104-51-8	17.6		1.00	0.250
n-Propylbenzene	103-65-1	17.6		1.00	0.125
m-,p-Xylene	179601-23-1	36.9		2.00	0.500
Naphthalene	91-20-3	19.7		1.00	0.200
o-Xylene	95-47-6	18.7		1.00	0.250
p-Isopropyltoluene	99-87-6	17.6		1.00	0.250
sec-Butylbenzene	135-98-8	17.1		1.00	0.250
Styrene	100-42-5	19.3		1.00	0.125
Trichloroethene	79-01-6	19.1		1.00	0.250
tert-Butylbenzene	98-06-6	17.3		1.00	0.250
Tetrachloroethene	127-18-4	22.1		1.00	0.250
Toluene	108-88-3	20.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.2		1.00	0.500
Trichlorofluoromethane	75-69-4	12.1		1.00	0.250
Vinyl chloride	75-01-4	167		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

Certificate of Analysis

Sample #:	L17041075-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 14:53
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273111
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	28.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.496	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	4.38		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.4	85	115	
1,2-Dichloroethane-d4	99.3	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 13:40
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273108
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.8		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.8		1.00	0.125
1,1-Dichloroethene	75-35-4	19.4		1.00	0.500
1,1-Dichloropropene	563-58-6	19.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	18.6		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.7		1.00	0.250
1,2-Dichloroethane	107-06-2	19.3		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.0		2.00	1.00
1,2-Dichloropropane	78-87-5	19.6		1.00	0.200
1,2-Dibromoethane	106-93-4	18.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.0		1.00	0.250
1,3-Dichloropropane	142-28-9	19.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	20.6		1.00	0.125
2,2-Dichloropropane	594-20-7	21.3		1.00	0.250
2-Hexanone	591-78-6	20.7		10.0	2.50
2-Chlorotoluene	95-49-8	18.9		1.00	0.125
4-Chlorotoluene	106-43-4	19.6		1.00	0.250
Acetone	67-64-1	20.6		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.6		1.00	0.125
Bromochloromethane	74-97-5	19.9		1.00	0.200
Bromodichloromethane	75-27-4	19.1		0.500	0.250
Bromoform	75-25-2	18.6		1.00	0.500
Bromomethane	74-83-9	16.6	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.9		1.00	0.500
Carbon tetrachloride	56-23-5	20.0		1.00	0.250
Chlorobenzene	108-90-7	19.0		0.500	0.125
Chloroethane	75-00-3	20.9		1.00	0.500
Chloroform	67-66-3	19.8		0.300	0.125
Chloromethane	74-87-3	20.4		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	45.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.8		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	19.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	25.0		1.00	0.250
Ethylbenzene	100-41-4	19.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.1		0.600	0.250
Isopropylbenzene	98-82-8	18.9		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.2		5.00	0.500
MEK (2-Butanone)	78-93-3	17.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.9		10.0	2.50
n-Butylbenzene	104-51-8	20.2		1.00	0.250
n-Propylbenzene	103-65-1	19.6		1.00	0.125
m-,p-Xylene	179601-23-1	39.1		2.00	0.500
Naphthalene	91-20-3	18.2		1.00	0.200
o-Xylene	95-47-6	19.0		1.00	0.250
p-Isopropyltoluene	99-87-6	19.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.3		1.00	0.250
Styrene	100-42-5	19.9		1.00	0.125
Trichloroethene	79-01-6	18.5		1.00	0.250
tert-Butylbenzene	98-06-6	19.1		1.00	0.250
Tetrachloroethene	127-18-4	19.4		1.00	0.250
Toluene	108-88-3	23.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.4		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.9		1.00	0.250
Vinyl chloride	75-01-4	22.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	103	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041075-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 14:00
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273109
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.4		1.00	0.500
1,1-Dichloropropene	563-58-6	18.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.0		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.5		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.5		2.00	1.00
1,2-Dichloropropane	78-87-5	19.0		1.00	0.200
1,2-Dibromoethane	106-93-4	18.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.9		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.2		0.500	0.125
1-Chlorohexane	544-10-5	19.7		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	22.0		10.0	2.50
2-Chlorotoluene	95-49-8	18.4		1.00	0.125
4-Chlorotoluene	106-43-4	19.1		1.00	0.250
Acetone	67-64-1	23.5		10.0	2.50
Benzene	71-43-2	18.7		0.400	0.125
Bromobenzene	108-86-1	18.3		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	18.6		0.500	0.250
Bromoform	75-25-2	18.8		1.00	0.500
Bromomethane	74-83-9	16.4	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.3		1.00	0.500
Carbon tetrachloride	56-23-5	19.3		1.00	0.250
Chlorobenzene	108-90-7	18.2		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	19.2		0.300	0.125
Chloromethane	74-87-3	20.6		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	44.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.6		0.500	0.250
Dibromochloromethane	124-48-1	18.6		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.1		1.00	0.250
Ethylbenzene	100-41-4	18.5		1.00	0.250
Hexachlorobutadiene	87-68-3	17.7		0.600	0.250
Isopropylbenzene	98-82-8	18.3		1.00	0.250
Methylene chloride	75-09-2	18.1		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.6		5.00	0.500
MEK (2-Butanone)	78-93-3	19.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	21.1		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	18.8		1.00	0.125
m-,p-Xylene	179601-23-1	37.4		2.00	0.500
Naphthalene	91-20-3	18.7		1.00	0.200
o-Xylene	95-47-6	18.5		1.00	0.250
p-Isopropyltoluene	99-87-6	19.1		1.00	0.250
sec-Butylbenzene	135-98-8	18.6		1.00	0.250
Styrene	100-42-5	19.2		1.00	0.125
Trichloroethene	79-01-6	18.0		1.00	0.250
tert-Butylbenzene	98-06-6	18.1		1.00	0.250
Tetrachloroethene	127-18-4	18.5		1.00	0.250
Toluene	108-88-3	22.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.0		1.00	0.250
Vinyl chloride	75-01-4	22.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041075-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 22:33
Collect Date:	04/20/2017 14:48	**Dilution:**	1	**File ID:**	17M0273046
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.70	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.147	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-06A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:01
Collect Date:	04/20/2017 15:00	**Dilution:**	1	**File ID:**	17M0273047
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.244	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.645	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	29.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.4	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-11	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:20
Collect Date:	04/20/2017 15:03	**Dilution:**	1	**File ID:**	17M0273048
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.77	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.173	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	13.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.09		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-06B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:55
Collect Date:	04/20/2017 15:10	**Dilution:**	1	**File ID:**	17M0273049
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.70	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.189	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	13.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.06		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.8	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-07A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 00:14
Collect Date:	04/20/2017 15:25	**Dilution:**	1	**File ID:**	17M0273050
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.01	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.285	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.635	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.3	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-07B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 00:47
Collect Date:	04/20/2017 15:30	**Dilution:**	1	**File ID:**	17M0273051
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.44		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.732	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.61		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.7	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-05-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 01:06
Collect Date:	04/20/2017 15:39	**Dilution:**	1	**File ID:**	17M0273052
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.28	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.469	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.16		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	16.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.8	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-276-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 01:41
Collect Date:	04/20/2017 09:00	**Dilution:**	1	**File ID:**	17M0273053
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.89	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-9	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 02:01
Collect Date:	04/20/2017 10:00	**Dilution:**	1	**File ID:**	17M0273054
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5	0.131	F	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.33	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.5	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-279-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 02:40
Collect Date:	04/20/2017 11:23	**Dilution:**	1	**File ID:**	17M0273055
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.39	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.770		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.60		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	36.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.368	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	67.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.7	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-278-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:47
Collect Date:	04/20/2017 13:53	**Dilution:**	1	**File ID:**	17M0273076
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.737		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.21	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.348	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.886	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.54		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-275-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:47
Collect Date:	04/20/2017 16:30	**Dilution:**	1	**File ID:**	17M0273079
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.411	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.2	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB1-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:28
Collect Date:	04/20/2017 17:00	**Dilution:**	1	**File ID:**	17M0273075
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.278	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.1	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB2-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:07
Collect Date:	04/20/2017 17:05	**Dilution:**	1	**File ID:**	17M0273077
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.10	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB3-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:27
Collect Date:	04/20/2017 17:10	**Dilution:**	1	**File ID:**	17M0273078
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	102	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Microbac

Lab Report #: L17041075
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041075
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was out of range for the following analytes: Dichlorodifluoromethane, Trichlorofluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries out of range were observed for the following analytes: Bromomethane. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: Recoveries out of range were observed for the following analytes: Vinyl chloride. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124782
Approved By: Franci Bolden

Certificate of Analysis

Certificate of Analysis

Sample #:	L17041075-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-200-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 17:18
Collect Date:	04/20/2017 08:49	**Dilution:**	1	**File ID:**	8M419127
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.737	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.26	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.91		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.15		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-94A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 17:49
Collect Date:	04/20/2017 08:56	**Dilution:**	1	**File ID:**	8M419128
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.38		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.933	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.67		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-208B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 18:19
Collect Date:	04/20/2017 09:03	**Dilution:**	1	**File ID:**	8M419129
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.53	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.00		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.97		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.05		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-208A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 18:50
Collect Date:	04/20/2017 09:08	**Dilution:**	1	**File ID:**	8M419130
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.93	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.94	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-207B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611301	**Analyst:**	TMB	**Run Date:**	04/24/2017 19:21
Collect Date:	04/20/2017 09:18	**Dilution:**	1	**File ID:**	8M419131
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.387	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.973	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.61	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.09		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.86		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.816	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	24.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	68.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-207A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 16:16
Collect Date:	04/20/2017 09:23	**Dilution:**	1	**File ID:**	8M419146
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.09		1.00	0.125
1,1-Dichloroethene	75-35-4	1.56		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.17		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.654	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-108-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 16:46
Collect Date:	04/20/2017 09:37	**Dilution:**	1	**File ID:**	8M419147
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.35		1.00	0.125
1,1-Dichloroethene	75-35-4	1.65		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.71	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.68		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.474	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.01		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-4	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 19:15
Collect Date:	04/20/2017 09:40	**Dilution:**	1	**File ID:**	8M419152
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.38		1.00	0.125
1,1-Dichloroethene	75-35-4	1.62		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.57		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.438	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.73		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 17:16
Collect Date:	04/20/2017 09:55	**Dilution:**	1	**File ID:**	8M419148
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.03	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.251	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.202	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.25		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	50.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107T-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 17:45
Collect Date:	04/20/2017 09:55	**Dilution:**	1	**File ID:**	8M419149
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.05	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.260	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.195	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.11		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	43.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-258-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 18:15
Collect Date:	04/20/2017 10:17	**Dilution:**	1	**File ID:**	8M419150
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.312	F	1.00	0.125
1,1-Dichloroethene	75-35-4	2.21		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.69		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.89		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.84		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	56.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-265-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 18:45
Collect Date:	04/20/2017 10:23	**Dilution:**	1	**File ID:**	8M419151
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.97	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.68		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.563	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.26	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-8	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 19:45
Collect Date:	04/20/2017 10:28	**Dilution:**	1	**File ID:**	8M419153
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.70		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.565	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.25	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.84		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-264-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 20:14
Collect Date:	04/20/2017 10:31	**Dilution:**	1	**File ID:**	8M419154
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.33	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-104-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 20:45
Collect Date:	04/20/2017 10:40	**Dilution:**	1	**File ID:**	8M419155
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.792	F	1.00	0.125
1,1-Dichloroethene	75-35-4	1.92		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.521	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.07		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-263-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 21:15
Collect Date:	04/20/2017 10:48	**Dilution:**	1	**File ID:**	8M419156
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.99		1.00	0.125
1,1-Dichloroethene	75-35-4	11.7		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.305	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.43	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.82		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.40		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.56		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.74		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-5A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 21:46
Collect Date:	04/20/2017 13:02	**Dilution:**	1	**File ID:**	8M419157
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.267	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.20	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	53.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.750	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	8.59		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.253	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-5-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 22:16
Collect Date:	04/20/2017 13:10	**Dilution:**	1	**File ID:**	8M419158
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.406	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	33.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.34	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.589	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.06		1.00	0.250
Toluene	108-88-3	8.00		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-21-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 22:45
Collect Date:	04/20/2017 13:38	**Dilution:**	1	**File ID:**	8M419159
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.84	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	111		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.07		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.916	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.414	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.53		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-2	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611408	**Analyst:**	TMB	**Run Date:**	04/25/2017 23:16
Collect Date:	04/20/2017 13:44	**Dilution:**	1	**File ID:**	8M419160
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	111		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.12		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.815	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.402	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.40		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.260	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-01-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611561	**Analyst:**	TMB	**Run Date:**	04/26/2017 16:58
Collect Date:	04/20/2017 13:50	**Dilution:**	1	**File ID:**	8M419182
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	102		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	12.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.28		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.868	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.274	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-02-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611561	**Analyst:**	TMB	**Run Date:**	04/26/2017 17:27
Collect Date:	04/20/2017 13:58	**Dilution:**	1	**File ID:**	8M419183
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	43.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	61.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	150		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.22		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-03-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 21:36
Collect Date:	04/20/2017 14:10	**Dilution:**	1	**File ID:**	17M0273044
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.01		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	26.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	35.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	103		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.15		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-04-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:08
Collect Date:	04/20/2017 14:16	**Dilution:**	1	**File ID:**	17M0273074
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	17.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	27.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	53.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	142		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.21		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.3	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 22:13
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273045
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.504	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	15.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	32.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.53		1.00	0.250
Toluene	108-88-3	1.49		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.735	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	174		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	99.5	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 20:26
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273041
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.5		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	18.3		1.00	0.500
1,1-Dichloropropene	563-58-6	18.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.1		2.00	1.00
1,2-Dichloropropane	78-87-5	19.7		1.00	0.200
1,2-Dibromoethane	106-93-4	19.3		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	18.7		1.00	0.125
2,2-Dichloropropane	594-20-7	18.1		1.00	0.250
2-Hexanone	591-78-6	21.4		10.0	2.50
2-Chlorotoluene	95-49-8	18.5		1.00	0.125
4-Chlorotoluene	106-43-4	19.3		1.00	0.250
Acetone	67-64-1	26.9		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.5		1.00	0.125
Bromochloromethane	74-97-5	20.2		1.00	0.200
Bromodichloromethane	75-27-4	19.3		0.500	0.250
Bromoform	75-25-2	19.7		1.00	0.500
Bromomethane	74-83-9	19.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.7		1.00	0.500
Carbon tetrachloride	56-23-5	18.6		1.00	0.250
Chlorobenzene	108-90-7	19.2		0.500	0.125
Chloroethane	75-00-3	16.6		1.00	0.500
Chloroform	67-66-3	19.9		0.300	0.125
Chloromethane	74-87-3	22.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	34.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.8		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	20.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.1		1.00	0.250
Ethylbenzene	100-41-4	19.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.0		1.00	0.250
Methylene chloride	75-09-2	19.0		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	53.3		5.00	0.500
MEK (2-Butanone)	78-93-3	20.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.9		10.0	2.50
n-Butylbenzene	104-51-8	19.4		1.00	0.250
n-Propylbenzene	103-65-1	18.7		1.00	0.125
m-,p-Xylene	179601-23-1	39.3		2.00	0.500
Naphthalene	91-20-3	20.7		1.00	0.200
o-Xylene	95-47-6	19.5		1.00	0.250
p-Isopropyltoluene	99-87-6	19.2		1.00	0.250
sec-Butylbenzene	135-98-8	18.5		1.00	0.250
Styrene	100-42-5	20.1		1.00	0.125
Trichloroethene	79-01-6	19.4		1.00	0.250
tert-Butylbenzene	98-06-6	18.3		1.00	0.250
Tetrachloroethene	127-18-4	23.5		1.00	0.250
Toluene	108-88-3	20.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	12.7		1.00	0.250
Vinyl chloride	75-01-4	164		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Sample #:	L17041075-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-100B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 20:57
Collect Date:	04/20/2017 14:23	**Dilution:**	1	**File ID:**	17M0273042
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.5		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.0		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	18.4		1.00	0.500
1,1-Dichloropropene	563-58-6	18.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.3		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	18.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.5		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.3		1.00	0.200
1,2-Dibromoethane	106-93-4	18.9		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	17.7		1.00	0.250
1,3-Dichloropropane	142-28-9	19.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	17.7		0.500	0.125
1-Chlorohexane	544-10-5	18.0		1.00	0.125
2,2-Dichloropropane	594-20-7	17.4		1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	17.6		1.00	0.125
4-Chlorotoluene	106-43-4	18.3		1.00	0.250
Acetone	67-64-1	28.1		10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	18.1		1.00	0.125
Bromochloromethane	74-97-5	20.0		1.00	0.200
Bromodichloromethane	75-27-4	19.0		0.500	0.250
Bromoform	75-25-2	19.2		1.00	0.500
Bromomethane	74-83-9	19.2		1.00	0.500
Carbon disulfide	75-15-0	16.0		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	18.5		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	16.8		1.00	0.500
Chloroform	67-66-3	19.5		0.300	0.125
Chloromethane	74-87-3	22.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	33.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.3		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	19.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.5		1.00	0.250
Ethylbenzene	100-41-4	18.6		1.00	0.250
Hexachlorobutadiene	87-68-3	16.1		0.600	0.250
Isopropylbenzene	98-82-8	17.9		1.00	0.250
Methylene chloride	75-09-2	18.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	53.1		5.00	0.500
MEK (2-Butanone)	78-93-3	20.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.6		10.0	2.50
n-Butylbenzene	104-51-8	17.6		1.00	0.250
n-Propylbenzene	103-65-1	17.6		1.00	0.125
m-,p-Xylene	179601-23-1	36.9		2.00	0.500
Naphthalene	91-20-3	19.7		1.00	0.200
o-Xylene	95-47-6	18.7		1.00	0.250
p-Isopropyltoluene	99-87-6	17.6		1.00	0.250
sec-Butylbenzene	135-98-8	17.1		1.00	0.250
Styrene	100-42-5	19.3		1.00	0.125
Trichloroethene	79-01-6	19.1		1.00	0.250
tert-Butylbenzene	98-06-6	17.3		1.00	0.250
Tetrachloroethene	127-18-4	22.1		1.00	0.250
Toluene	108-88-3	20.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.2		1.00	0.500
Trichlorofluoromethane	75-69-4	12.1		1.00	0.250
Vinyl chloride	75-01-4	167		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

Certificate of Analysis

Sample #:	L17041075-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 14:53
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273111
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	28.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.496	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	4.38		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.4	85	115	
1,2-Dichloroethane-d4	99.3	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 13:40
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273108
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.8		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.8		1.00	0.125
1,1-Dichloroethene	75-35-4	19.4		1.00	0.500
1,1-Dichloropropene	563-58-6	19.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	18.6		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.7		1.00	0.250
1,2-Dichloroethane	107-06-2	19.3		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.0		2.00	1.00
1,2-Dichloropropane	78-87-5	19.6		1.00	0.200
1,2-Dibromoethane	106-93-4	18.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.0		1.00	0.250
1,3-Dichloropropane	142-28-9	19.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	20.6		1.00	0.125
2,2-Dichloropropane	594-20-7	21.3		1.00	0.250
2-Hexanone	591-78-6	20.7		10.0	2.50
2-Chlorotoluene	95-49-8	18.9		1.00	0.125
4-Chlorotoluene	106-43-4	19.6		1.00	0.250
Acetone	67-64-1	20.6		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.6		1.00	0.125
Bromochloromethane	74-97-5	19.9		1.00	0.200
Bromodichloromethane	75-27-4	19.1		0.500	0.250
Bromoform	75-25-2	18.6		1.00	0.500
Bromomethane	74-83-9	16.6	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.9		1.00	0.500
Carbon tetrachloride	56-23-5	20.0		1.00	0.250
Chlorobenzene	108-90-7	19.0		0.500	0.125
Chloroethane	75-00-3	20.9		1.00	0.500
Chloroform	67-66-3	19.8		0.300	0.125
Chloromethane	74-87-3	20.4		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	45.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.8		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	19.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	25.0		1.00	0.250
Ethylbenzene	100-41-4	19.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.1		0.600	0.250
Isopropylbenzene	98-82-8	18.9		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.2		5.00	0.500
MEK (2-Butanone)	78-93-3	17.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.9		10.0	2.50
n-Butylbenzene	104-51-8	20.2		1.00	0.250
n-Propylbenzene	103-65-1	19.6		1.00	0.125
m-,p-Xylene	179601-23-1	39.1		2.00	0.500
Naphthalene	91-20-3	18.2		1.00	0.200
o-Xylene	95-47-6	19.0		1.00	0.250
p-Isopropyltoluene	99-87-6	19.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.3		1.00	0.250
Styrene	100-42-5	19.9		1.00	0.125
Trichloroethene	79-01-6	18.5		1.00	0.250
tert-Butylbenzene	98-06-6	19.1		1.00	0.250
Tetrachloroethene	127-18-4	19.4		1.00	0.250
Toluene	108-88-3	23.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.4		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.9		1.00	0.250
Vinyl chloride	75-01-4	22.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	103	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041075-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 14:00
Collect Date:	04/20/2017 14:41	**Dilution:**	1	**File ID:**	17M0273109
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.4		1.00	0.500
1,1-Dichloropropene	563-58-6	18.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.0		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.5		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.5		2.00	1.00
1,2-Dichloropropane	78-87-5	19.0		1.00	0.200
1,2-Dibromoethane	106-93-4	18.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.9		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.2		0.500	0.125
1-Chlorohexane	544-10-5	19.7		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	22.0		10.0	2.50
2-Chlorotoluene	95-49-8	18.4		1.00	0.125
4-Chlorotoluene	106-43-4	19.1		1.00	0.250
Acetone	67-64-1	23.5		10.0	2.50
Benzene	71-43-2	18.7		0.400	0.125
Bromobenzene	108-86-1	18.3		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	18.6		0.500	0.250
Bromoform	75-25-2	18.8		1.00	0.500
Bromomethane	74-83-9	16.4	Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.3		1.00	0.500
Carbon tetrachloride	56-23-5	19.3		1.00	0.250
Chlorobenzene	108-90-7	18.2		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	19.2		0.300	0.125
Chloromethane	74-87-3	20.6		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	44.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.6		0.500	0.250
Dibromochloromethane	124-48-1	18.6		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.1		1.00	0.250
Ethylbenzene	100-41-4	18.5		1.00	0.250
Hexachlorobutadiene	87-68-3	17.7		0.600	0.250
Isopropylbenzene	98-82-8	18.3		1.00	0.250
Methylene chloride	75-09-2	18.1		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.6		5.00	0.500
MEK (2-Butanone)	78-93-3	19.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	21.1		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	18.8		1.00	0.125
m-,p-Xylene	179601-23-1	37.4		2.00	0.500
Naphthalene	91-20-3	18.7		1.00	0.200
o-Xylene	95-47-6	18.5		1.00	0.250
p-Isopropyltoluene	99-87-6	19.1		1.00	0.250
sec-Butylbenzene	135-98-8	18.6		1.00	0.250
Styrene	100-42-5	19.2		1.00	0.125
Trichloroethene	79-01-6	18.0		1.00	0.250
tert-Butylbenzene	98-06-6	18.1		1.00	0.250
Tetrachloroethene	127-18-4	18.5		1.00	0.250
Toluene	108-88-3	22.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.0		1.00	0.250
Vinyl chloride	75-01-4	22.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041075-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-6-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 22:33
Collect Date:	04/20/2017 14:48	**Dilution:**	1	**File ID:**	17M0273046
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.70	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.147	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-06A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:01
Collect Date:	04/20/2017 15:00	**Dilution:**	1	**File ID:**	17M0273047
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.244	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.645	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	29.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.4	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-11	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:20
Collect Date:	04/20/2017 15:03	**Dilution:**	1	**File ID:**	17M0273048
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.77	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.173	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	13.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.09		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-06B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/26/2017 23:55
Collect Date:	04/20/2017 15:10	**Dilution:**	1	**File ID:**	17M0273049
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.70	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.189	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	13.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.06		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.8	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-07A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 00:14
Collect Date:	04/20/2017 15:25	**Dilution:**	1	**File ID:**	17M0273050
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.01	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.285	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.635	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.3	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-07B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 00:47
Collect Date:	04/20/2017 15:30	**Dilution:**	1	**File ID:**	17M0273051
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.44		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.732	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.61		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.7	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW21-05-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 01:06
Collect Date:	04/20/2017 15:39	**Dilution:**	1	**File ID:**	17M0273052
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.28	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.469	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.16		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	16.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.8	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-276-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 01:41
Collect Date:	04/20/2017 09:00	**Dilution:**	1	**File ID:**	17M0273053
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.89	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-9	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 02:01
Collect Date:	04/20/2017 10:00	**Dilution:**	1	**File ID:**	17M0273054
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5	0.131	F	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.33	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.5	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-279-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611721	**Analyst:**	ADC	**Run Date:**	04/27/2017 02:40
Collect Date:	04/20/2017 11:23	**Dilution:**	1	**File ID:**	17M0273055
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.39	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.770		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.60		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	36.0		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.368	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	67.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.7	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-278-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:47
Collect Date:	04/20/2017 13:53	**Dilution:**	1	**File ID:**	17M0273076
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.737		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.21	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.348	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.886	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.54		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-275-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:47
Collect Date:	04/20/2017 16:30	**Dilution:**	1	**File ID:**	17M0273079
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.411	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.2	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB1-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 15:28
Collect Date:	04/20/2017 17:00	**Dilution:**	1	**File ID:**	17M0273075
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.278	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.1	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB2-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:07
Collect Date:	04/20/2017 17:05	**Dilution:**	1	**File ID:**	17M0273077
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.10	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041075-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	LTM-TB3-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 16:27
Collect Date:	04/20/2017 17:10	**Dilution:**	1	**File ID:**	17M0273078
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	102	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): BNB
Date: 4-24-17
Filter Lot #: 98032.10

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☑1025 ☐ 1023

Analyst / Date		Analyst / Date	
BNB 4-21-17		BNB 4-22-17	
Time On	Temp On °C	Time Off	Temp Off °C
15:16	22.0	800	21.7

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A				BNB 4-22-17								
B	04-1079-01	✓	10	10	1311	F-228	S	100		✓	25.00	500
C	04-1084-01	✓	↓	↓	↓	↓	↓	↓		✓	25.00	500
D	04-1100-01	✓	10	10	1311	F-228	S	100		✓	25.00	500
E	04-1120-01	✓	10	10	↓	↓	↓	↓		✓	25.00	500
F	04-1120-02	✓	↓	↓	↓	↓	↓	↓		✓	25.03	500
G	04-1120-03	✓	↓	↓	↓	↓	↓	↓		✓	25.00	500
H												
I												
J												
K												
L												
M												
N												
O												
P												
Q												
R												
S												
DP	FBLK	NA	NA	NA	1311	F-228	NA	NA	NA	NA	40	40

BNB 4-24-17

BNB 4-22-17

BNB 4-22-17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NA

Peer Review By: [signature]

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54128

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81397 LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609829

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418914	WG609829-01 50ng BFB STD 8260	NA	1	1	STD80989	04/12/17 10:17
8M418915	RINSE	NA	1	1	STD80989	04/12/17 10:42
8M418916	WG609829-02 5ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:11
8M418917	WG609829-03 20ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:40
8M418918	WG609829-04 50ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:10
8M418919	WG609829-05 100ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:41
8M418920	WG609829-06 200ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:10
8M418921	WG609829-07 300ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:40
8M418922	WG609829-08 400ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:10
8M418923	WG609829-09 500ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:39
8M418924	RINSE	NA	1	1		04/12/17 15:09
8M418925	RINSE	NA	1	1		04/12/17 15:39
8M418926	WG609829-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD81404	04/12/17 16:10
8M418927	WG609948-01 50ug/L CCV STD 8260	NA	1	1	STD81377	04/12/17 16:39
8M418928	RINSE	NA	1	1		04/12/17 17:09

Approved: April 18, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18/1
Maintenance Log ID: 54132

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610410

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418996	WG610373-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 09:44
8M418997	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:10
8M418998	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:42
8M418999	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/17/17 11:13
8M419000	WG610410-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 12:58
8M419001	RINSE	NA	1	1		04/17/17 13:21
8M419002	WG610410-02 0.3ug/L STD 8260	NA	1	1	STD81447	04/17/17 13:51
8M419003	WG610410-03 0.4ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:25
8M419004	WG610410-04 1ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:55
8M419005	WG610410-05 2ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:25
8M419006	WG610410-06 5ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:54
8M419007	WG610410-07 20ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:24
8M419008	WG610410-08 50ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:54
8M419009	WG610410-09 100ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:23
8M419010	WG610410-10 200ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:54
8M419011	WG610410-11 300ug/L STD 8260	NA	1	1	STD81447	04/17/17 18:24
8M419012	RINSE	NA	1	1		04/17/17 18:53
8M419013	RINSE	NA	1	1		04/17/17 19:23
8M419014	WG610410-12 50ug/L ALT SRC STD 8260	NA	1	1	STD81461	04/17/17 19:53
8M419015	RINSE	NA	1	1		04/17/17 20:23

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 8M418997				
			Bromomethane was low, DNR.	
3	X			
File ID: 8M418998				
			Bromomethane and iodomethane were low, DNR.	
4				
File ID: 8M418999				
			Not needed, DNR.	

Approved: April 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042417
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54138

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611301

Comments: Archon had a stuck vial error and did not finish the sequence.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419115	WG611300-01 50ng BFB STD 8260	NA	1	1	STD81491	04/24/17 11:16
8M419116	WG611300-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/24/17 11:42
8M419117	WG00000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/24/17 12:11
8M419118	WG611301-01 VBLK0424 BLANK STD 826	NA	1	1		04/24/17 12:42
8M419119	WG611301-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/24/17 13:13
8M419120	WG611301-03 20ug/L LCS2 STD 8260	NA	1	1	STD81461	04/24/17 13:44
8M419121	L17041069-13 B 5X 826-SPE D1	<2	1	5		04/24/17 14:14
8M419122	L17041069-44 A 826-SPE	<2	1	1		04/24/17 14:45
8M419123	L17041069-47 A 826-SPE	<2	1	1		04/24/17 15:16
8M419124	L17041069-48 A 826-SPE	<2	1	1		04/24/17 15:46
8M419125	L17041069-49 A 826-SPE	<2	1	1		04/24/17 16:17
8M419126	L17041069-50 A 826-SPE	<2	1	1		04/24/17 16:48
8M419127	L17041075-01 A 826-SPE	<2	1	1		04/24/17 17:18
8M419128	L17041075-02 A 826-SPE	<2	1	1		04/24/17 17:49
8M419129	L17041075-03 A 826-SPE	<2	1	1		04/24/17 18:19
8M419130	L17041075-04 A 826-SPE	<2	1	1		04/24/17 18:50
8M419131	L17041075-05 A 826-SPE	<2	1	1		04/24/17 19:21

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419117				
	Not needed, DNR.			

Approved: April 25, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042517
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT Rev: 18/1
Maintenance Log ID: 54139

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577; STD81397 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611408

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419132	WG611407-01 50ng BFB STD 8260	NA	1	1	STD81491	04/25/17 09:26
8M419133	WG611407-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/25/17 09:50
8M419134	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/25/17 10:20
8M419135	WG611408-01 VBLK0425 BLANK STD 826	NA	1	1		04/25/17 10:50
8M419136	WG611407-01 50ng BFB STD 8260	NA	1	1		04/25/17 11:20
8M419137	WG611407-02 50ug/L CCV STD 8260	NA	1	1		04/25/17 11:44
8M419138	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/25/17 12:14
8M419139	WG611407-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/25/17 12:44
8M419140	RINSE	NA	1	1		04/25/17 13:14
8M419141	WG611408-01 VBLK0425 BLANK STD 826	NA	1	1		04/25/17 13:45
8M419142	WG611408-02 20ug/L LCS STD 8260	NA	1	1	STD81461	04/25/17 14:15
8M419143	WG611408-03 20ug/L LCS2 STD 8260	NA	1	1	STD81461	04/25/17 14:46
8M419144	L17040829-02 B 1000X 826-SPE D1	<2	1	1000		04/25/17 15:16
8M419145	L17041069-42 A 826-SPE	<2	1	1		04/25/17 15:46
8M419146	L17041075-06 A 826-SPE	<2	1	1		04/25/17 16:16
8M419147	L17041075-07 A 826-SPE	<2	1	1		04/25/17 16:46
8M419148	L17041075-09 A 826-SPE	<2	1	1		04/25/17 17:16
8M419149	L17041075-10 A 826-SPE	<2	1	1		04/25/17 17:45
8M419150	L17041075-11 A 826-SPE	<2	1	1		04/25/17 18:15
8M419151	L17041075-12 A 826-SPE	<2	1	1		04/25/17 18:45
8M419152	L17041075-08 A 826-SPE	<2	1	1		04/25/17 19:15
8M419153	L17041075-13 A 826-SPE	<2	1	1		04/25/17 19:45
8M419154	L17041075-14 A 826-SPE	<2	1	1		04/25/17 20:14
8M419155	L17041075-15 A 826-SPE	<2	1	1		04/25/17 20:45
8M419156	L17041075-16 A 826-SPE	<2	1	1		04/25/17 21:15
8M419157	L17041075-17 A 826-SPE	<2	1	1		04/25/17 21:46
8M419158	L17041075-18 A 826-SPE	<2	1	1		04/25/17 22:16
8M419159	L17041075-19 A 826-SPE	<2	1	1		04/25/17 22:45
8M419160	L17041075-20 A 826-SPE	<2	1	1		04/25/17 23:16
8M419161	CCV	NA	1	1		04/25/17 23:46
8M419162	RINSE	NA	1	1		04/26/17 00:16
8M419163	RINSE	NA	1	1		04/26/17 00:47

Approved: April 26, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS8	Dataset:	042517		
Analyst1:	TMB	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	24/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT	Rev:	18/1
Maintenance Log ID:	54139				

Internal Standard: STD81235 Surrogate Standard: STD81235

CCV: STD81577; STD81397 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG611408

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2				
File ID: 8M419133				
	1,4-DIOXANE was low, DNR.			
3				
File ID: 8M419134				
	Not needed. DNR.			
4				
File ID: 8M419135				
	DNR.			
6	X			
File ID: 8M419137				
	Toluene was high, DNR.			
7				
File ID: 8M419138				
	Not needed, DNR.			
13	X	10000	Over Calibration Range	TOL, EB
File ID: 8M419144				
14	X	1	Carry-over contamination	
File ID: 8M419145				
	EB and toluene carry over. DNR.			

Approved: April 26, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042517
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611545, WG611456

Comments: MDLS need RR for DCDF

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273002	WG611454-01 BFB 50ng 8260	NA	1	1	STD81491	04/25/17 20:07
17M0273003	RINSE	NA	1	1		04/25/17 20:25
17M0273004	WG611454-02 0.3ug/L STD 8260	NA	1	1	STD81577	04/25/17 20:45
17M0273005	WG611454-03 0.4ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:05
17M0273006	WG611454-04 1ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:24
17M0273007	WG611454-05 2ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:56
17M0273008	WG611454-06 5ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:15
17M0273009	WG611454-07 20ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:46
17M0273010	WG611454-08 50ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:06
17M0273011	WG611454-09 100ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:38
17M0273012	WG611454-10 200ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:58
17M0273013	WG611454-11 300ug/L STD 8260	NA	1	1	STD81577	04/26/17 00:33
17M0273014	RINSE	NA	1	1		04/26/17 00:53
17M0273015	WG611454-12 50ug/L ICV 8260	NA	1	1	STD81596	04/26/17 01:35
17M0273016	RINSE	NA	1	1		04/26/17 02:19
17M0273017	WG611456-01 BLANK 8260	NA	1	1		04/26/17 02:53
17M0273018	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 03:32
17M0273019	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 04:14
17M0273020	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 04:34
17M0273021	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 05:22
17M0273022	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 05:58
17M0273023	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 06:18
17M0273024	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 07:01
17M0273025	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 07:21
17M0273026	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 08:14

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54141

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611561

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419164	WG611560-01 50ng BFB STD 8260	NA	1	1	STD81491	04/26/17 07:53
8M419165	WG611560-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/26/17 08:22
8M419166	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/26/17 08:56
8M419167	WG611561-01 VBLK0426 BLANK STD 826	NA	1	1		04/26/17 09:27
8M419168	WG611561-02 20ug/L LCS STD 8260	NA	1	1	STD81583	04/26/17 09:56
8M419169	WG611561-03 20ug/L LCS2 STD 8260	NA	1	1	STD81583	04/26/17 10:27
8M419170	L17040829-02 B 10000X 826-SPE D2	<2	1	10000		04/26/17 10:57
8M419171	L17041081-23 AB A 826-SPE	<2	1	1		04/26/17 11:27
8M419172	L17041081-24 AB A 826-SPE	<2	1	1		04/26/17 11:57
8M419173	L17041069-42 B 826-SPE	<2	1	1		04/26/17 12:27
8M419174	L17041081-03 A 826-SPE	<2	1	1		04/26/17 12:57
8M419175	L17041081-04 A 826-SPE	<2	1	1		04/26/17 13:26
8M419176	L17041081-09 A 826-SPE	<2	1	1		04/26/17 13:57
8M419177	L17041081-11 A 826-SPE	<2	1	1		04/26/17 14:28
8M419178	L17041081-13 A 826-SPE	<2	1	1		04/26/17 14:58
8M419179	L17041081-17 A 826-SPE	<2	1	1		04/26/17 15:27
8M419180	L17041067-02 A TB 826-SPE	<2	1	1		04/26/17 15:57
8M419181	L17041081-01 A 826-SPE	<2	1	1		04/26/17 16:27
8M419182	L17041075-21 A 826-SPE	<2	1	1		04/26/17 16:58
8M419183	L17041075-22 A 826-SPE	<2	1	1		04/26/17 17:27
8M419184	L17041079-01 A 10X 826-TC-SPE	NA	17	10		04/26/17 17:57
8M419185	L17041084-01 A 10X 826-TC-SPE	NA	17	10		04/26/17 18:28
8M419186	L17041100-01 A 10X 826-TC	NA	17	10		04/26/17 18:58
8M419187	L17041081-02 A 2X 826-SPE	<2	1	2		04/26/17 19:27
8M419188	L17041086-01 A 20X 826-SPE	<2	1	20		04/26/17 19:57
8M419189	WG611737-02 20ug/L LCS STD 624	NA	2	1	STD81583	04/26/17 20:28
8M419190	WG611737-03 20ug/L LCS2 STD 624	NA	2	1	STD81583	04/26/17 20:58
8M419191	RINSE	NA	2	1		04/26/17 21:28
8M419192	WG611737-01 VBLK0426 BLANK STD 624	NA	2	1		04/26/17 21:58
8M419193	L17041262-02 C 624-SPE	7	2	1		04/26/17 22:29
8M419194	L17041218-01 A 624-SPE	7	2	1		04/26/17 22:58
8M419195	L17041226-02 A 624-SPE2	7	2	1		04/26/17 23:28
8M419196	CCV	NA	1	1		04/26/17 23:58
8M419197	RINSE	NA	1	1		04/27/17 00:29

Approved: April 27, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54141

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611561

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419198	WG611237-01 A FBLK 10X 826-TC	NA	17	10		04/27/17 00:59
8M419199	RINSE	NA	1	1		04/27/17 01:29

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419166				
Not needed, DNR.				
18	X	5	Over Calibration Range	CIS12-DCE
File ID: 8M419181				
25	X	10	Analyzed too dilute	
File ID: 8M419188				
Also missed tune. DNR.				
32	X	1	Carry-over contamination	
File ID: 8M419195				
Possible acetone carry over.				

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042617
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611721

Comments: 1075-41, 24, 1120-01, -02, -03 MT.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273027	WG611720-01 BFB 50ng 8260	NA	1	1	STD81491	04/26/17 14:46
17M0273028	WG611720-02 50ug/L CCV 8260	NA	1	1	STD81577	04/26/17 15:05
17M0273029	RINSE	NA	1	1		04/26/17 15:30
17M0273030	WG611721-01 BLANK 8260	NA	1	1		04/26/17 15:50
17M0273031	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 16:10
17M0273032	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 16:47
17M0273033	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 17:07
17M0273034	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 17:44
17M0273035	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 18:04
17M0273036	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 18:36
17M0273037	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 18:56
17M0273038	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 19:16
17M0273039	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 19:46
17M0273040	WG611721-02 20ug/L LCS 8260	NA	1	1	STD81596	04/26/17 20:06
17M0273041	L17041075-26 A MS 826-SPE	<2	1	1	STD81596	04/26/17 20:26
17M0273042	L17041075-27 A MSD 826-SPE	<2	1	1	STD81596	04/26/17 20:57
17M0273043	L17040829-02 A 2000X 826-SPE	<2	1	2000		04/26/17 21:16
17M0273044	L17041075-23 A 826-SPE	<2	1	1		04/26/17 21:36
17M0273045	L17041075-25 A 826-SPE	<2	1	1		04/26/17 22:13
17M0273046	L17041075-31 A 826-SPE	<2	1	1		04/26/17 22:33
17M0273047	L17041075-32 A 826-SPE	<2	1	1		04/26/17 23:01
17M0273048	L17041075-33 A 826-SPE	<2	1	1		04/26/17 23:20
17M0273049	L17041075-34 A 826-SPE	<2	1	1		04/26/17 23:55
17M0273050	L17041075-35 A 826-SPE	<2	1	1		04/27/17 00:14
17M0273051	L17041075-36 A 826-SPE	<2	1	1		04/27/17 00:47
17M0273052	L17041075-37 A 826-SPE	<2	1	1		04/27/17 01:06
17M0273053	L17041075-38 A 826-SPE	<2	1	1		04/27/17 01:41
17M0273054	L17041075-39 A 826-SPE	<2	1	1		04/27/17 02:01
17M0273055	L17041075-40 A 826-SPE	<2	1	1		04/27/17 02:40
17M0273056	L17041075-41 A 826-SPE	<2	1	1		04/27/17 03:18
17M0273057	L17041075-24 A 826-SPE	<2	1	1		04/27/17 03:47
17M0273058	L17041120-01 A 10X 826-TC	NA	17	10		04/27/17 04:07
17M0273059	L17041120-02 A 10X 826-TC	NA	17	10		04/27/17 04:50
17M0273060	L17041120-03 A 10X 826-TC	NA	17	10		04/27/17 05:10

Approved: April 28, 2017
Sarah Vandenberg

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Instrument Run Log

Instrument: HPMS17 Dataset: 042617
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611721

Comments: 1075-41, 24, 1120-01, -02, -03 MT.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273061	RINSE	NA	17	10		04/27/17 05:59
17M0273062	RINSE	NA	17	10		04/27/17 06:40
17M0273063	RINSE	NA	17	10		04/27/17 07:21

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Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611827, WG611888

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273064	WG611826-01 BFB 50ng 8260	NA	1	1	STD81491	04/27/17 11:37
17M0273065	WG611826-02 50ug/L CCV 8260	NA	1	1	STD81577	04/27/17 11:56
17M0273066	RINSE	NA	1	1		04/27/17 12:23
17M0273067	WG611827-01 BLANK 8260	NA	1	1		04/27/17 12:42
17M0273068	WG611827-02 20ug/L LCS 8260	NA	1	1	STD81596	04/27/17 13:02
17M0273069	L17041075-29 A MS 826-SPE	<2	1	1	STD81596	04/27/17 13:22
17M0273070	L17041075-30 A MSD 826-SPE	<2	1	1	STD81596	04/27/17 13:42
17M0273071	L17041120-01 B 10X 826-TC	NA	17	10		04/27/17 14:02
17M0273072	L17041120-02 B 10X 826-TC	NA	17	10		04/27/17 14:22
17M0273073	L17041120-03 B 10X 826-TC	NA	17	10		04/27/17 14:48
17M0273074	L17041075-24 B 2X 826-SPE	<2	1	1		04/27/17 15:08
17M0273075	L17041075-43 A 826-SPE	<2	1	1		04/27/17 15:28
17M0273076	L17041075-41 B 826-SPE	<2	1	1		04/27/17 15:47
17M0273077	L17041075-44 A 826-SPE	<2	1	1		04/27/17 16:07
17M0273078	L17041075-45 A 826-SPE	<2	1	1		04/27/17 16:27
17M0273079	L17041075-42 A 826-SPE	<2	1	1		04/27/17 16:47
17M0273080	L17041075-28 A 826-SPE	<2	1	1		04/27/17 17:07
17M0273081	L17041110-01 A 826-SPE	<2	1	1		04/27/17 17:27
17M0273082	L17041110-02 A 826-SPE	<2	1	1		04/27/17 17:55
17M0273083	L17041110-03 A 826-SPE	<2	1	1		04/27/17 18:15
17M0273084	L17041110-04 A 826-SPE	<2	1	1		04/27/17 18:35
17M0273085	L17041110-05 A 826-SPE	<2	1	1		04/27/17 18:55
17M0273086	L17041110-06 A 826-SPE	<2	1	1		04/27/17 19:15
17M0273087	L17041110-07 A 826-SPE	<2	1	1		04/27/17 19:34
17M0273088	L17041110-08 A 826-SPE	<2	1	1		04/27/17 20:01
17M0273089	WG611888-01 BLK 8260	NA	1	1		04/27/17 20:21
17M0273090	WG611888-02 20ug/L LCS 8260	NA	1	1	STD81596	04/27/17 20:51
17M0273091	L17041244-04 A MS 826-SPE	<2	1	1	STD81596	04/27/17 21:11
17M0273092	L17041244-05 A MSD 826-SPE	<2	1	1	STD81596	04/27/17 21:31
17M0273093	RINSE	NA	1	1		04/27/17 21:58
17M0273094	L17041244-01 A 826-SPE	<2	1	1		04/27/17 22:18
17M0273095	L17041244-02 A 826-SPE	<2	1	1		04/27/17 22:38
17M0273096	L17041244-03 A 826-SPE	<2	1	1		04/27/17 23:10
17M0273097	L17041244-06 A 826-SPE	5	1	1		04/27/17 23:30

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Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611827, WG611888

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273098	L17041244-08 A 826-SPE	<2	1	1		04/27/17 23:50
17M0273099	L17041244-09 A 826-SPE	3	1	1		04/28/17 00:20
17M0273100	RINSE	NA	1	1		04/28/17 00:40
17M0273101	RINSE	NA	1	1		04/28/17 01:17
17M0273102	RINSE	NA	1	1		04/28/17 01:36

Comments

Seq.	Rerun	Dil.	Reason	Analytes
35	X			
File ID: 17M0273098				
			L17041244-08 DNR MT	
36				
File ID: 17M0273099				
			L17041244-09 DNR MT	

Approved: April 28, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042817
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612030, WG612088

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273103	WG612029-01 BFB 50ng 8260	NA	1	1	STD81491	04/28/17 12:01
17M0273104	WG612029-02 50ug/L CCV 8260	NA	1	1	STD81577	04/28/17 12:19
17M0273105	RINSE	NA	1	1		04/28/17 12:41
17M0273106	WG612030-01 BLANK 8260	NA	1	1		04/28/17 13:01
17M0273107	WG612030-02 20ug/L LCS 8260	NA	1	1	STD81596	04/28/17 13:21
17M0273108	L17041075-29 B MS 826-SPE	<2	1	1	STD81596	04/28/17 13:40
17M0273109	L17041075-30 B MSD 826-SPE	<2	1	1	STD81596	04/28/17 14:00
17M0273110	RINSE	NA	1	1		04/28/17 14:33
17M0273111	L17041075-28 B 826-SPE	<2	1	1		04/28/17 14:53
17M0273112	L17041200-34 A 826-SPE	<2	1	1		04/28/17 15:13
17M0273113	L17041200-35 A 826-SPE	<2	1	1		04/28/17 15:33
17M0273114	L17041200-36 A 826-SPE	<2	1	1		04/28/17 16:03
17M0273115	L17041200-37 A 826-SPE	<2	1	1		04/28/17 16:23
17M0273116	L17041200-38 A 826-SPE	<2	1	1		04/28/17 16:43
17M0273117	L17041200-39 A 826-SPE	<2	1	1		04/28/17 17:10
17M0273118	L17041200-40 A 826-SPE	<2	1	1		04/28/17 17:30
17M0273119	L17041200-41 A 826-SPE	<2	1	1		04/28/17 17:50
17M0273120	L17041200-42 A 826-SPE	<2	1	1		04/28/17 18:09
17M0273121	L17041200-43 A 826-SPE	<2	1	1		04/28/17 18:29
17M0273122	L17041200-44 A 826-SPE	<2	1	1		04/28/17 18:49
17M0273123	L17041200-45 A 826-SPE	<2	1	1		04/28/17 19:17
17M0273124	L17041200-46 A 826-SPE	<2	1	1		04/28/17 19:37
17M0273125	L17041200-47 A 826-SPE	<2	1	1		04/28/17 19:57
17M0273126	L17041200-48 A 826-SPE	<2	1	1		04/28/17 20:17
17M0273127	L17041200-49 A 826-SPE	<2	1	1		04/28/17 20:47
17M0273128	WG612088-01 BLANK 8260	NA	1	1		04/28/17 21:06
17M0273129	WG612088-02 20ug/L LCS 8260	NA	1	1		04/28/17 21:26
17M0273130	WG612088-03 20ug/L LCSDUP 8260	NA	1	1		04/28/17 21:46
17M0273131	RINSE	NA	1	1		04/28/17 22:18
17M0273132	L17041244-08 B 826-SPE	<2	1	1		04/28/17 22:38
17M0273133	L17041244-09 B 826-SPE	3	1	1		04/28/17 22:53
17M0273134	L17041244-10 A 826-SPE	<2	1	1		04/28/17 23:23
17M0273135	L17041244-12 A 826-SPE	<2	1	1		04/28/17 23:43
17M0273136	L17041244-13 A 826-SPE	<2	1	1		04/29/17 00:12

Approved: May 01, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042817
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612030, WG612088

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
31				
File ID: 17M0273133				
	L17041244-09 ERROR? ISTD FAILURE.			
34				
File ID: 17M0273136				
	L17041244-13 MT DNR			

Approved: May 01, 2017

Page: 2

Microbac Laboratories Inc.

Data Checklist

Date: 12-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81580
Analytical Workgroups: WG609829

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
17-APR-2017

Secondary Reviewer:
18-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-18-2017 13:13:22

Microbac Laboratories Inc.

Data Checklist

Date: 17-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81593
Analytical Workgroups: WG610410

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	TMB
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-APR-2017

Tiffany Bailey

Secondary Reviewer:
20-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-20-2017 13:10:53

Microbac Laboratories Inc.

Data Checklist

Date: 24-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81717
Analytical Workgroups: WG611301

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
25-APR-2017
Tiffany Bailey

Secondary Reviewer:
25-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-25-2017 14:37:26

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81747
Analytical Workgroups: WG611408

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
26-APR-2017
Tiffany Bailey

Secondary Reviewer:
26-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-26-2017 13:37:52

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81782
Analytical Workgroups: WG611454, WG611456

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-31-2017 15:17:00

Microbac Laboratories Inc.

Data Checklist

Date: 26-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81770
Analytical Workgroups: WG611561

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017
Tiffany Bailey

Secondary Reviewer:
27-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-27-2017 13:25:23

Microbac Laboratories Inc.

Data Checklist

Date: 26-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81796
Analytical Workgroups: WG611721

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 12:05:31

Microbac Laboratories Inc.

Data Checklist

Date: 27-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81805
Analytical Workgroups: WG611827, WG611888

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 13:11:18

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81825
Analytical Workgroups: WG612030, WG612088

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
29-APR-2017

Secondary Reviewer:
01-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-01-2017 13:34:09

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611301

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-200-LS-25	01	04/20/17					04/24/2017	4.4	14		04/24/17	4.4	14	
MW-94A-LS-25	02	04/20/17					04/24/2017	4.4	14		04/24/17	4.4	14	
MW-208B-LS-25	03	04/20/17					04/24/2017	4.4	14		04/24/17	4.4	14	
MW-208A-LS-25	04	04/20/17					04/24/2017	4.4	14		04/24/17	4.4	14	
MW-207B-LS-25	05	04/20/17					04/24/2017	4.4	14		04/24/17	4.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611408

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-207A-LS-25	06	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
MW-108-LS-25	07	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
DUP-4	08	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
MW-107B-LS-25	09	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
MW-107T-LS-25	10	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
MW-258-LS-25	11	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
MW-265-LS-25	12	04/20/17					04/25/2017	5.3	14		04/25/17	5.3	14	
DUP-8	13	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
MW-264-LS-25	14	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
MW-104-LS-25	15	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
MW-263-LS-25	16	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
DR1-5A-LS-25	17	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
DR1-5-LS-25	18	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
MW-21-LS-25	19	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	
DUP-2	20	04/20/17					04/25/2017	5.4	14		04/25/17	5.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611561

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW21-01-LS-25	21	04/20/17					04/26/2017	6.1	14		04/26/17	6.1	14	
PMW21-02-LS-25	22	04/20/17					04/26/2017	6.1	14		04/26/17	6.1	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611721

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW21-03-LS-25	23	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
MW-100B-LS-25	25	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
MW-100B-LS-25	26	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
MW-100B-LS-25	27	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
DR1-6-LS-25	31	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
PMW101-06A-LS-25	32	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
DUP-11	33	04/20/17					04/26/2017	6.3	14		04/26/17	6.3	14	
PMW101-06B-LS-25	34	04/20/17					04/26/2017	6.4	14		04/26/17	6.4	14	
PMW101-07A-LS-25	35	04/20/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-07B-LS-25	36	04/20/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW21-05-LS-25	37	04/20/17					04/27/2017	6.4	14		04/27/17	6.4	14	
MW-276-LS-25	38	04/20/17					04/27/2017	6.7	14		04/27/17	6.7	14	
DUP-9	39	04/20/17					04/27/2017	6.7	14		04/27/17	6.7	14	
MW-279-LS-25	40	04/20/17					04/27/2017	6.6	14		04/27/17	6.6	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611827

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW21-04-LS-25	24	04/20/17					04/27/2017	7	14		04/27/17	7	14	
MW-278-LS-25	41	04/20/17					04/27/2017	7.1	14		04/27/17	7.1	14	
MW-275-LS-25	42	04/20/17					04/27/2017	7	14		04/27/17	7	14	
LTM-TB1-LS-25	43	04/20/17					04/27/2017	6.9	14		04/27/17	6.9	14	
LTM-TB2-LS-25	44	04/20/17					04/27/2017	7	14		04/27/17	7	14	
LTM-TB3-LS-25	45	04/20/17					04/27/2017	7	14		04/27/17	7	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612030

Login Number: L17041075

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR1-6A-LS-25	28	04/20/17					04/28/2017	8	14		04/28/17	8	14	
DR1-6A-LS-25	29	04/20/17					04/28/2017	8	14		04/28/17	8	14	
DR1-6A-LS-25	30	04/20/17					04/28/2017	8	14		04/28/17	8	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5261415
Report generated 07/25/2017 16:08

Login Number: L17041075
Instrument Id: HPMS17
Workgroup (AAB#): WG611721

Method: 8260
CAL ID: HPMS17-26-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-23	1.00	01	103	101	108	105
L17041075-25	1.00	01	99.5	98.6	110	104
L17041075-26	1.00	01	102	102	105	104
L17041075-27	1.00	01	100	98.9	103	101
L17041075-31	1.00	01	102	98.9	106	102
L17041075-32	1.00	01	99.9	96.4	109	103
L17041075-33	1.00	01	103	99.6	110	105
L17041075-34	1.00	01	101	97.8	111	105
L17041075-35	1.00	01	104	99.3	110	104
L17041075-36	1.00	01	100	95.7	101	101
L17041075-37	1.00	01	99.9	96.8	105	103
L17041075-38	1.00	01	100	98.8	111	103
L17041075-39	1.00	01	100	97.5	105	99.8
L17041075-40	1.00	01	101	98.7	102	101
WG611721-01	1.00	01	102	97.4	109	105
WG611721-02	1.00	01	104	102	108	104

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Login Number: L17041075
Instrument Id: HPMS8
Workgroup (AAB#): WG611408

Method: 8260
CAL ID: HPMS8-17-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-06	1.00	01	104	101	104	105
L17041075-07	1.00	01	101	101	105	107
L17041075-08	1.00	01	104	100	104	106
L17041075-09	1.00	01	103	101	104	105
L17041075-10	1.00	01	103	100	106	105
L17041075-11	1.00	01	104	101	104	106
L17041075-12	1.00	01	102	101	105	107
L17041075-13	1.00	01	101	101	107	107
L17041075-14	1.00	01	103	101	106	106
L17041075-15	1.00	01	102	100	105	107
L17041075-16	1.00	01	104	101	104	107
L17041075-17	1.00	01	104	102	105	107
L17041075-18	1.00	01	104	100	105	106
L17041075-19	1.00	01	103	101	104	106
L17041075-20	1.00	01	105	101	105	106
WG611408-01	1.00	01	101	101	104	105
WG611408-02	1.00	01	102	101	101	106
WG611408-03	1.00	01	103	101	100	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041075 **Method:** 8260
Instrument Id: HPMS8 **CAL ID:** HPMS8-17-APR-17
Workgroup (AAB#): WG611561 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-21	1.00	01	105	101	106	105
L17041075-22	1.00	01	104	102	106	106
WG611561-01	1.00	01	105	103	104	108
WG611561-02	1.00	01	104	102	101	105
WG611561-03	1.00	01	101	101	100	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041075 **Method:** 8260
Instrument Id: HPMS17 **CAL ID:** HPMS17-26-APR-17
Workgroup (AAB#): WG611827 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-24	1.00	01	98.9	96.3	104	101
L17041075-41	1.00	01	104	100	113	105
L17041075-42	1.00	01	102	99.2	106	101
L17041075-43	1.00	01	102	98.1	104	101
L17041075-44	1.00	01	106	102	108	106
L17041075-45	1.00	01	99.4	97.0	102	99.7
WG611827-01	1.00	01	101	97.8	104	102
WG611827-02	1.00	01	103	101	105	103

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041075 **Method:** 8260
Instrument Id: HPMS8 **CAL ID:** HPMS8-17-APR-17
Workgroup (AAB#): WG611301 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-01	1.00	01	100	101	105	108
L17041075-02	1.00	01	104	100	104	107
L17041075-03	1.00	01	102	101	103	107
L17041075-04	1.00	01	103	102	105	106
L17041075-05	1.00	01	99.9	102	102	107
WG611301-01	1.00	01	102	102	104	106
WG611301-02	1.00	01	98.2	101	101	107
WG611301-03	1.00	01	99.9	101	101	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041075 **Method:** 8260
Instrument Id: HPMS17 **CAL ID:** HPMS17-26-APR-17
Workgroup (AAB#): WG612030 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041075-28	1.00	02	99.3	98.4	107	103
L17041075-29	1.00	02	101	102	103	102
L17041075-30	1.00	02	102	101	100	100
WG612030-01	1.00	01	103	101	108	104
WG612030-02	1.00	01	104	102	106	104

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5261423
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041075
Work Group: WG611721
Blank File ID: 17M0273030
Blank Sample ID: WG611721-01
Prep Date: 04/26/17 15:50
Instrument ID: HPMS17
Analyzed Date: 04/26/17 15:50
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611721-02	17M0273040	04/26/17 20:06	01
MW-100B-LS-25	L17041075-26	17M0273041	04/26/17 20:26	01
MW-100B-LS-25	L17041075-27	17M0273042	04/26/17 20:57	01
PMW21-03-LS-25	L17041075-23	17M0273044	04/26/17 21:36	01
MW-100B-LS-25	L17041075-25	17M0273045	04/26/17 22:13	01
DR1-6-LS-25	L17041075-31	17M0273046	04/26/17 22:33	01
PMW101-06A-LS-25	L17041075-32	17M0273047	04/26/17 23:01	01
DUP-11	L17041075-33	17M0273048	04/26/17 23:20	01
PMW101-06B-LS-25	L17041075-34	17M0273049	04/26/17 23:55	01
PMW101-07A-LS-25	L17041075-35	17M0273050	04/27/17 00:14	01
PMW101-07B-LS-25	L17041075-36	17M0273051	04/27/17 00:47	01
PMW21-05-LS-25	L17041075-37	17M0273052	04/27/17 01:06	01
MW-276-LS-25	L17041075-38	17M0273053	04/27/17 01:41	01
DUP-9	L17041075-39	17M0273054	04/27/17 02:01	01
MW-279-LS-25	L17041075-40	17M0273055	04/27/17 02:40	01

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041075	**Work Group:**	WG611827
Blank File ID:	17M0273067	**Blank Sample ID:**	WG611827-01
Prep Date:	04/27/17 12:42	**Instrument ID:**	HPMS17
Analyzed Date:	04/27/17 12:42	**Method:**	8260B
Analyst:	ADC		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611827-02	17M0273068	04/27/17 13:02	01
PMW21-04-LS-25	L17041075-24	17M0273074	04/27/17 15:08	01
LTM-TB1-LS-25	L17041075-43	17M0273075	04/27/17 15:28	01
MW-278-LS-25	L17041075-41	17M0273076	04/27/17 15:47	01
LTM-TB2-LS-25	L17041075-44	17M0273077	04/27/17 16:07	01
LTM-TB3-LS-25	L17041075-45	17M0273078	04/27/17 16:27	01
MW-275-LS-25	L17041075-42	17M0273079	04/27/17 16:47	01

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041075
Work Group: WG612030
Blank File ID: 17M0273106
Blank Sample ID: WG612030-01
Prep Date: 04/28/17 13:01
Instrument ID: HPMS17
Analyzed Date: 04/28/17 13:01
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612030-02	17M0273107	04/28/17 13:21	01
DR1-6A-LS-25	L17041075-29	17M0273108	04/28/17 13:40	02
DR1-6A-LS-25	L17041075-30	17M0273109	04/28/17 14:00	02
DR1-6A-LS-25	L17041075-28	17M0273111	04/28/17 14:53	02

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041075
Work Group: WG611301
Blank File ID: 8M419118
Blank Sample ID: WG611301-01
Prep Date: 04/24/17 12:42
Instrument ID: HPMS8
Analyzed Date: 04/24/17 12:42
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611301-02	8M419119	04/24/17 13:13	01
LCS2	WG611301-03	8M419120	04/24/17 13:44	01
MW-200-LS-25	L17041075-01	8M419127	04/24/17 17:18	01
MW-94A-LS-25	L17041075-02	8M419128	04/24/17 17:49	01
MW-208B-LS-25	L17041075-03	8M419129	04/24/17 18:19	01
MW-208A-LS-25	L17041075-04	8M419130	04/24/17 18:50	01
MW-207B-LS-25	L17041075-05	8M419131	04/24/17 19:21	01

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041075
Work Group: WG611408
Blank File ID: 8M419141
Blank Sample ID: WG611408-01
Prep Date: 04/25/17 13:45
Instrument ID: HPMS8
Analyzed Date: 04/25/17 13:45
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611408-02	8M419142	04/25/17 14:15	01
LCS2	WG611408-03	8M419143	04/25/17 14:46	01
MW-207A-LS-25	L17041075-06	8M419146	04/25/17 16:16	01
MW-108-LS-25	L17041075-07	8M419147	04/25/17 16:46	01
MW-107B-LS-25	L17041075-09	8M419148	04/25/17 17:16	01
MW-107T-LS-25	L17041075-10	8M419149	04/25/17 17:45	01
MW-258-LS-25	L17041075-11	8M419150	04/25/17 18:15	01
MW-265-LS-25	L17041075-12	8M419151	04/25/17 18:45	01
DUP-4	L17041075-08	8M419152	04/25/17 19:15	01
DUP-8	L17041075-13	8M419153	04/25/17 19:45	01
MW-264-LS-25	L17041075-14	8M419154	04/25/17 20:14	01
MW-104-LS-25	L17041075-15	8M419155	04/25/17 20:45	01
MW-263-LS-25	L17041075-16	8M419156	04/25/17 21:15	01
DR1-5A-LS-25	L17041075-17	8M419157	04/25/17 21:46	01
DR1-5-LS-25	L17041075-18	8M419158	04/25/17 22:16	01
MW-21-LS-25	L17041075-19	8M419159	04/25/17 22:45	01
DUP-2	L17041075-20	8M419160	04/25/17 23:16	01

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041075
Work Group: WG611561
Blank File ID: 8M419167
Blank Sample ID: WG611561-01
Prep Date: 04/26/17 09:27
Instrument ID: HPMS8
Analyzed Date: 04/26/17 09:27
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611561-02	8M419168	04/26/17 09:56	01
LCS2	WG611561-03	8M419169	04/26/17 10:27	01
PMW21-01-LS-25	L17041075-21	8M419182	04/26/17 16:58	01
PMW21-02-LS-25	L17041075-22	8M419183	04/26/17 17:27	01

Report Name: BLANK_SUMMARY
PDF File ID: 5264472
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/26/17 15:50 Sample ID:WG611721-01
Instrument ID:HPMS17 Run Date:04/26/17 15:50 Prep Method:5030B/5030C/503
File ID:17M0273030 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611721 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5261416
25-JUL-2017 16:08

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/26/17 15:50 Sample ID:WG611721-01
Instrument ID:HPMS17 Run Date:04/26/17 15:50 Prep Method:5030B/5030C/503
File ID:17M0273030 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611721 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.4	85 - 115	PASS
1,2-Dichloroethane-d4	102	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	109	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/27/17 12:42 Sample ID:WG611827-01
Instrument ID:HPMS17 Run Date:04/27/17 12:42 Prep Method:5030B/5030C/503
File ID:17M0273067 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611827 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/27/17 12:42 Sample ID:WG611827-01
Instrument ID:HPMS17 Run Date:04/27/17 12:42 Prep Method:5030B/5030C/503
File ID:17M0273067 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611827 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.8	85 - 115	PASS
1,2-Dichloroethane-d4	101	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/28/17 13:01 Sample ID:WG612030-01
Instrument ID:HPMS17 Run Date:04/28/17 13:01 Prep Method:5030B/5030C/503
File ID:17M0273106 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612030 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/28/17 13:01 Sample ID:WG612030-01
Instrument ID:HPMS17 Run Date:04/28/17 13:01 Prep Method:5030B/5030C/503
File ID:17M0273106 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612030 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	108	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
25-JUL-2017 16:08

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041075 Prep Date: 04/24/17 12:42 Sample ID: WG611301-01
Instrument ID: HPMS8 Run Date: 04/24/17 12:42 Prep Method: 5030B/5030C/503
File ID: 8M419118 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611301 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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METHOD BLANK REPORT

Login Number: L17041075 Prep Date: 04/24/17 12:42 Sample ID: WG611301-01
Instrument ID: HPMS8 Run Date: 04/24/17 12:42 Prep Method: 5030B/5030C/503
File ID: 8M419118 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611301 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	102	85	-	115	PASS
1,2-Dichloroethane-d4	102	72	-	119	PASS
Toluene-d8	106	81	-	120	PASS
4-Bromofluorobenzene	104	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041075 Prep Date: 04/25/17 13:45 Sample ID: WG611408-01
Instrument ID: HPMS8 Run Date: 04/25/17 13:45 Prep Method: 5030B/5030C/503
File ID: 8M419141 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611408 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5261416
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041075 Prep Date:04/25/17 13:45 Sample ID:WG611408-01
Instrument ID:HPMS8 Run Date:04/25/17 13:45 Prep Method:5030B/5030C/503
File ID:8M419141 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611408 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	101	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
25-JUL-2017 16:08

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041075 Prep Date: 04/26/17 09:27 Sample ID: WG611561-01
Instrument ID: HPMS8 Run Date: 04/26/17 09:27 Prep Method: 5030B/5030C/503
File ID: 8M419167 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611561 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5261416
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041075 Prep Date: 04/26/17 09:27 Sample ID: WG611561-01
Instrument ID: HPMS8 Run Date: 04/26/17 09:27 Prep Method: 5030B/5030C/503
File ID: 8M419167 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611561 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5261416
25-JUL-2017 16:08

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611721-02
Instrument ID: HPMS17 Run Time: 20:06 Prep Method: 5030B/5030C/503
File ID: 17M0273040 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611721 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.6	92.9	81 - 129	
1,1,1-Trichloroethane	20.0	20.0	100	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.1	95.7	63 - 128	
1,1,2-Trichloroethane	20.0	18.8	94.0	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.2	96.0	68 - 130	
1,1-Dichloropropene	20.0	19.6	98.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.7	98.6	67 - 137	
1,2,3-Trichloropropane	20.0	19.1	95.7	73 - 124	
1,2,4-Trichlorobenzene	20.0	20.0	100	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.2	96.2	74 - 132	
1,2-Dichloroethane	20.0	19.4	97.2	69 - 132	
1,2-Dichlorobenzene	20.0	18.7	93.7	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.9	99.3	50 - 132	
1,2-Dichloropropane	20.0	19.4	96.8	75 - 125	
1,2-Dibromoethane	20.0	18.9	94.7	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.1	95.7	74 - 131	
1,3-Dichlorobenzene	20.0	18.7	93.6	75 - 124	
1,3-Dichloropropane	20.0	19.9	99.7	73 - 126	
1,4-Dichlorobenzene	20.0	18.6	92.8	74 - 123	
1-Chlorohexane	20.0	19.8	98.8	70 - 125	
2,2-Dichloropropane	20.0	16.9	84.7	69 - 137	
2-Hexanone	20.0	21.0	105	55 - 130	
2-Chlorotoluene	20.0	18.5	92.5	73 - 126	
4-Chlorotoluene	20.0	19.2	96.1	74 - 128	
Acetone	20.0	22.0	110	40 - 135	
Benzene	20.0	19.2	96.1	81 - 122	
Bromobenzene	20.0	18.4	91.8	76 - 124	
Bromochloromethane	20.0	20.0	100	65 - 129	
Bromodichloromethane	20.0	19.1	95.5	76 - 121	
Bromoform	20.0	19.3	96.7	69 - 128	
Bromomethane	20.0	20.5	102	30 - 141	
Carbon disulfide	20.0	15.9	79.6	58 - 128	
Carbon tetrachloride	20.0	19.7	98.5	66 - 138	
Chlorobenzene	20.0	18.8	94.1	81 - 122	
Chloroethane	20.0	17.8	88.9	58 - 133	
Chloroform	20.0	19.7	98.3	69 - 128	
Chloromethane	20.0	22.2	111	56 - 131	
cis-1,2-Dichloroethene	20.0	19.4	96.8	72 - 126	
cis-1,3-Dichloropropene	20.0	20.1	101	69 - 131	
Dibromochloromethane	20.0	18.8	94.2	66 - 133	

LCS - Modified 03/06/2008
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LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611721-02
Instrument ID: HPMS17 Run Time: 20:06 Prep Method: 5030B/5030C/503
File ID: 17M0273040 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611721 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.8	99.0	76 - 125	
Dichlorodifluoromethane	20.0	26.1	130	30 - 153	
Ethylbenzene	20.0	19.1	95.5	73 - 127	
Hexachlorobutadiene	20.0	18.4	91.9	67 - 131	
Isopropylbenzene	20.0	19.0	95.0	75 - 127	
Methylene chloride	20.0	18.7	93.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.6	98.1	65 - 123	
MEK (2-Butanone)	20.0	19.9	99.5	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.3	101	58 - 134	
n-Butylbenzene	20.0	19.6	98.2	69 - 137	
n-Propylbenzene	20.0	18.9	94.5	72 - 129	
m-,p-Xylene	40.0	38.8	97.0	76 - 128	
Naphthalene	20.0	20.4	102	54 - 138	
o-Xylene	20.0	19.2	96.2	80 - 121	
p-Isopropyltoluene	20.0	19.4	97.0	73 - 130	
sec-Butylbenzene	20.0	18.9	94.7	72 - 127	
Styrene	20.0	19.7	98.7	65 - 134	
Trichloroethene	20.0	19.1	95.5	70 - 127	
tert-Butylbenzene	20.0	18.8	93.8	70 - 129	
Tetrachloroethene	20.0	19.3	96.7	66 - 128	
Toluene	20.0	19.3	96.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.2	96.0	63 - 137	
trans-1,3-Dichloropropene	20.0	19.1	95.7	59 - 135	
Trichlorofluoromethane	20.0	14.2	71.0	57 - 129	
Vinyl chloride	20.0	23.0	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	108	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5269357
Report generated: 07/25/2017 16:11

Login Number: L17041075 Run Date: 04/27/2017 Sample ID: WG611827-02
Instrument ID: HPMS17 Run Time: 13:02 Prep Method: 5030B/5030C/503
File ID: 17M0273068 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611827 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.2	95.9	81 - 129	
1,1,1-Trichloroethane	20.0	20.8	104	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.3	75 - 125	
1,1-Dichloroethane	20.0	20.3	102	69 - 133	
1,1-Dichloroethene	20.0	19.8	98.8	68 - 130	
1,1-Dichloropropene	20.0	20.2	101	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.0	94.8	67 - 137	
1,2,3-Trichloropropane	20.0	20.1	101	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.9	99.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.8	98.8	74 - 132	
1,2-Dichloroethane	20.0	20.2	101	69 - 132	
1,2-Dichlorobenzene	20.0	19.3	96.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.7	104	50 - 132	
1,2-Dichloropropane	20.0	20.2	101	75 - 125	
1,2-Dibromoethane	20.0	19.6	98.1	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.9	99.6	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.6	75 - 124	
1,3-Dichloropropane	20.0	20.7	104	73 - 126	
1,4-Dichlorobenzene	20.0	19.1	95.5	74 - 123	
1-Chlorohexane	20.0	21.4	107	70 - 125	
2,2-Dichloropropane	20.0	21.7	109	69 - 137	
2-Hexanone	20.0	22.1	111	55 - 130	
2-Chlorotoluene	20.0	19.4	97.0	73 - 126	
4-Chlorotoluene	20.0	20.1	100	74 - 128	
Acetone	20.0	20.3	102	40 - 135	
Benzene	20.0	19.9	99.7	81 - 122	
Bromobenzene	20.0	19.0	95.2	76 - 124	
Bromochloromethane	20.0	20.6	103	65 - 129	
Bromodichloromethane	20.0	19.7	98.5	76 - 121	
Bromoform	20.0	19.6	98.1	69 - 128	
Bromomethane	20.0	20.9	105	30 - 141	
Carbon disulfide	20.0	16.6	82.8	58 - 128	
Carbon tetrachloride	20.0	20.5	103	66 - 138	
Chlorobenzene	20.0	19.4	97.2	81 - 122	
Chloroethane	20.0	20.1	101	58 - 133	
Chloroform	20.0	20.3	102	69 - 128	
Chloromethane	20.0	20.8	104	56 - 131	
cis-1,2-Dichloroethene	20.0	20.0	99.8	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	110	69 - 131	
Dibromochloromethane	20.0	19.4	96.8	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041075 Run Date: 04/27/2017 Sample ID: WG611827-02
Instrument ID: HPMS17 Run Time: 13:02 Prep Method: 5030B/5030C/503
File ID: 17M0273068 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611827 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.5	103	76 - 125	
Dichlorodifluoromethane	20.0	27.1	136	30 - 153	
Ethylbenzene	20.0	19.9	99.6	73 - 127	
Hexachlorobutadiene	20.0	19.2	95.8	67 - 131	
Isopropylbenzene	20.0	19.6	98.2	75 - 127	
Methylene chloride	20.0	19.2	96.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.6	103	65 - 123	
MEK (2-Butanone)	20.0	21.2	106	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.3	107	58 - 134	
n-Butylbenzene	20.0	20.7	103	69 - 137	
n-Propylbenzene	20.0	19.9	99.6	72 - 129	
m-,p-Xylene	40.0	40.0	100	76 - 128	
Naphthalene	20.0	19.8	98.8	54 - 138	
o-Xylene	20.0	20.0	100	80 - 121	
p-Isopropyltoluene	20.0	20.3	101	73 - 130	
sec-Butylbenzene	20.0	19.9	99.6	72 - 127	
Styrene	20.0	20.4	102	65 - 134	
Trichloroethene	20.0	18.7	93.4	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.8	99.1	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	20.0	99.9	63 - 137	
trans-1,3-Dichloropropene	20.0	20.8	104	59 - 135	
Trichlorofluoromethane	20.0	21.6	108	57 - 129	
Vinyl chloride	20.0	23.7	118	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	105	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5269357
Report generated: 07/25/2017 16:11

Login Number: L17041075 Run Date: 04/28/2017 Sample ID: WG612030-02
Instrument ID: HPMS17 Run Time: 13:21 Prep Method: 5030B/5030C/503
File ID: 17M0273107 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612030 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.5	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.3	96.5	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	20.0	100	68 - 130	
1,1-Dichloropropene	20.0	19.9	99.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.7	93.4	67 - 137	
1,2,3-Trichloropropane	20.0	19.2	95.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	94.1	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.0	100	74 - 132	
1,2-Dichloroethane	20.0	19.4	97.1	69 - 132	
1,2-Dichlorobenzene	20.0	19.3	96.3	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.6	98.2	50 - 132	
1,2-Dichloropropane	20.0	19.6	97.9	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.6	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.8	99.2	74 - 131	
1,3-Dichlorobenzene	20.0	19.2	95.9	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	19.0	94.8	74 - 123	
1-Chlorohexane	20.0	20.8	104	70 - 125	
2,2-Dichloropropane	20.0	21.2	106	69 - 137	
2-Hexanone	20.0	19.0	95.1	55 - 130	
2-Chlorotoluene	20.0	19.3	96.5	73 - 126	
4-Chlorotoluene	20.0	20.0	100	74 - 128	
Acetone	20.0	15.3	76.7	40 - 135	
Benzene	20.0	19.6	98.2	81 - 122	
Bromobenzene	20.0	18.9	94.6	76 - 124	
Bromochloromethane	20.0	20.1	101	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	19.3	96.3	69 - 128	
Bromomethane	20.0	17.3	86.3	30 - 141	
Carbon disulfide	20.0	16.4	82.2	58 - 128	
Carbon tetrachloride	20.0	20.2	101	66 - 138	
Chlorobenzene	20.0	19.1	95.5	81 - 122	
Chloroethane	20.0	20.9	105	58 - 133	
Chloroform	20.0	20.1	100	69 - 128	
Chloromethane	20.0	20.6	103	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	19.1	95.3	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041075 Run Date: 04/28/2017 Sample ID: WG612030-02
Instrument ID: HPMS17 Run Time: 13:21 Prep Method: 5030B/5030C/503
File ID: 17M0273107 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612030 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.8	99.0	76 - 125	
Dichlorodifluoromethane	20.0	26.0	130	30 - 153	
Ethylbenzene	20.0	19.7	98.4	73 - 127	
Hexachlorobutadiene	20.0	18.9	94.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.4	75 - 127	
Methylene chloride	20.0	19.0	95.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.4	96.9	65 - 123	
MEK (2-Butanone)	20.0	17.0	85.2	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.8	94.1	58 - 134	
n-Butylbenzene	20.0	20.6	103	69 - 137	
n-Propylbenzene	20.0	19.9	99.5	72 - 129	
m-,p-Xylene	40.0	39.5	98.8	76 - 128	
Naphthalene	20.0	18.5	92.3	54 - 138	
o-Xylene	20.0	19.4	96.9	80 - 121	
p-Isopropyltoluene	20.0	20.2	101	73 - 130	
sec-Butylbenzene	20.0	20.0	99.8	72 - 127	
Styrene	20.0	19.9	99.7	65 - 134	
Trichloroethene	20.0	18.3	91.7	70 - 127	
tert-Butylbenzene	20.0	19.6	98.1	70 - 129	
Tetrachloroethene	20.0	19.6	97.8	66 - 128	
Toluene	20.0	19.9	99.3	77 - 122	
trans-1,2-Dichloroethene	20.0	19.3	96.7	63 - 137	
trans-1,3-Dichloropropene	20.0	19.8	99.0	59 - 135	
Trichlorofluoromethane	20.0	21.6	108	57 - 129	
Vinyl chloride	20.0	23.6	118	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5269357
Report generated: 07/25/2017 16:11

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.5	92.6	20.0	18.9	94.4	1.96	81 - 129	20	
1,1,1-Trichloroethane	20.0	19.8	98.8	20.0	20.2	101	2.41	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.0	89.8	20.0	18.5	92.3	2.82	63 - 128	20	
1,1,2-Trichloroethane	20.0	17.8	88.8	20.0	18.2	90.8	2.25	75 - 125	20	
1,1-Dichloroethane	20.0	18.9	94.5	20.0	19.1	95.7	1.27	69 - 133	20	
1,1-Dichloroethene	20.0	18.3	91.4	20.0	18.8	94.1	2.98	68 - 130	20	
1,1-Dichloropropene	20.0	18.8	93.8	20.0	19.2	95.9	2.19	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.4	92.1	20.0	18.9	94.5	2.58	67 - 137	20	
1,2,3-Trichloropropane	20.0	17.9	89.7	20.0	18.9	94.4	5.13	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	18.7	93.6	20.0	18.9	94.7	1.18	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.9	99.5	20.0	19.8	99.2	0.357	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	16.4	81.9	20.0	17.1	85.3	4.07	50 - 132	20	
1,2-Dibromoethane	20.0	18.1	90.4	20.0	18.8	93.8	3.71	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.5	92.5	20.0	18.9	94.3	1.98	71 - 122	20	
1,2-Dichloroethane	20.0	18.6	93.0	20.0	19.5	97.3	4.55	69 - 132	20	
1,2-Dichloropropane	20.0	18.6	93.2	20.0	18.8	94.1	0.974	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	20.0	19.5	97.5	0.252	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.6	92.8	20.0	18.8	93.8	1.08	75 - 124	20	
1,3-Dichloropropane	20.0	18.5	92.5	20.0	19.1	95.7	3.36	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.2	90.9	20.0	18.4	92.2	1.48	74 - 123	20	
1-Chlorohexane	20.0	21.0	105	20.0	20.8	104	1.02	70 - 125	20	
2,2-Dichloropropane	20.0	19.0	94.9	20.0	19.9	99.4	4.54	69 - 137	20	
MEK (2-Butanone)	20.0	16.6	83.1	20.0	17.8	89.2	7.06	49 - 136	20	
2-Chlorotoluene	20.0	17.4	87.1	20.0	17.1	85.6	1.79	73 - 126	20	
2-Hexanone	20.0	17.8	89.0	20.0	18.5	92.3	3.68	55 - 130	20	
4-Chlorotoluene	20.0	19.9	99.7	20.0	20.4	102	2.11	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	17.3	86.4	20.0	19.1	95.7	10.3	58 - 134	20	
Acetone	20.0	17.4	86.9	20.0	18.4	91.8	5.46	40 - 135	20	
Benzene	20.0	19.3	96.6	20.0	19.5	97.5	0.954	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.6	0.924	76 - 124	20	
Bromochloromethane	20.0	19.6	97.8	20.0	19.9	99.7	2.00	65 - 129	20	
Bromodichloromethane	20.0	18.5	92.7	20.0	19.3	96.4	3.89	76 - 121	20	
Bromoform	20.0	15.6	77.8	20.0	16.2	81.1	4.14	69 - 128	20	
Bromomethane	20.0	20.8	104	20.0	22.6	113	8.15	30 - 141	20	
Carbon disulfide	20.0	16.8	84.2	20.0	17.3	86.3	2.56	58 - 128	20	
Carbon tetrachloride	20.0	19.8	98.8	20.0	20.5	102	3.39	66 - 138	20	
Chlorobenzene	20.0	18.4	92.0	20.0	18.3	91.5	0.590	81 - 122	20	
Chloroethane	20.0	21.1	106	20.0	21.7	108	2.61	58 - 133	20	
Chloroform	20.0	17.9	89.4	20.0	17.9	89.7	0.264	69 - 128	20	
Chloromethane	20.0	20.9	104	20.0	21.3	106	1.96	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611301 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611301-02 LCS File ID: 8M419119 Run Date: 04/24/2017 13:13
Sample ID: WG611301-03 LCS2 File ID: 8M419120 Run Date: 04/24/2017 13:44

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.0	95.2	20.0	19.4	97.2	2.02	72 - 126	20	
cis-1,3-Dichloropropene	20.0	19.9	99.7	20.0	20.3	101	1.63	69 - 131	20	
Dibromochloromethane	20.0	18.4	92.1	20.0	18.3	91.6	0.462	66 - 133	20	
Dibromomethane	20.0	18.8	94.1	20.0	19.3	96.3	2.30	76 - 125	20	
Dichlorodifluoromethane	20.0	20.7	104	20.0	21.9	109	5.33	30 - 153	20	
Ethylbenzene	20.0	18.4	91.9	20.0	18.6	93.1	1.29	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.7	93.4	2.69	67 - 131	20	
Isopropylbenzene	20.0	19.4	97.2	20.0	19.7	98.3	1.18	75 - 127	20	
m-,p-Xylene	40.0	38.9	97.3	40.0	39.4	98.6	1.27	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	17.9	89.5	20.0	19.0	94.9	5.83	65 - 123	20	
Methylene chloride	20.0	18.1	90.4	20.0	18.7	93.4	3.20	63 - 137	20	
n-Butylbenzene	20.0	20.2	101	20.0	20.2	101	0.0393	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.1	20.0	19.4	97.0	1.02	72 - 129	20	
Naphthalene	20.0	18.6	92.9	20.0	19.0	95.2	2.52	54 - 138	20	
o-Xylene	20.0	18.5	92.6	20.0	18.8	93.8	1.28	80 - 121	20	
p-Isopropyltoluene	20.0	19.9	99.3	20.0	20.1	101	1.42	73 - 130	20	
sec-Butylbenzene	20.0	19.4	96.8	20.0	19.6	97.8	1.01	72 - 127	20	
Styrene	20.0	20.0	100	20.0	20.2	101	0.654	65 - 134	20	
tert-Butylbenzene	20.0	18.5	92.3	20.0	18.7	93.7	1.48	70 - 129	20	
Tetrachloroethene	20.0	19.6	98.1	20.0	19.7	98.6	0.502	66 - 128	20	
Toluene	20.0	19.6	97.8	20.0	19.6	97.8	0.0167	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.4	92.1	20.0	19.1	95.4	3.52	63 - 137	20	
trans-1,3-Dichloropropene	20.0	17.8	89.1	20.0	18.3	91.5	2.62	59 - 135	20	
Trichloroethene	20.0	18.5	92.3	20.0	19.1	95.7	3.62	70 - 127	20	
Trichlorofluoromethane	20.0	19.7	98.3	20.0	20.1	101	2.41	57 - 129	20	
Vinyl chloride	20.0	19.6	98.1	20.0	19.4	97.2	0.875	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	98.2	99.9	72 - 119	PASS
Dibromofluoromethane	101	101	85 - 115	PASS
4-Bromofluorobenzene	101	101	76 - 119	PASS
Toluene-d8	107	105	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5261417
Report generated: 07/25/2017 16:11

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611408 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611408-02 LCS File ID: 8M419142 Run Date: 04/25/2017 14:15
Sample ID: WG611408-03 LCS2 File ID: 8M419143 Run Date: 04/25/2017 14:46

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	19.0	94.8	20.0	18.8	93.8	1.03	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.4	102	20.0	20.3	101	0.731	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.0	94.9	20.0	18.9	94.6	0.313	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.1	95.3	20.0	18.5	92.4	3.14	75 - 125	20	
1,1-Dichloroethane	20.0	19.3	96.4	20.0	19.5	97.4	1.07	69 - 133	20	
1,1-Dichloroethene	20.0	19.2	95.9	20.0	18.9	94.4	1.60	68 - 130	20	
1,1-Dichloropropene	20.0	19.4	96.9	20.0	19.3	96.4	0.451	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.2	95.9	20.0	19.0	94.9	1.08	67 - 137	20	
1,2,3-Trichloropropane	20.0	20.4	102	20.0	19.4	97.0	4.93	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.1	95.7	20.0	18.8	94.2	1.63	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.9	99.7	20.0	19.6	97.8	1.93	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	18.9	94.4	20.0	16.8	83.9	11.8	50 - 132	20	
1,2-Dibromoethane	20.0	19.5	97.4	20.0	18.8	93.9	3.69	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.1	95.5	20.0	18.8	94.2	1.36	71 - 122	20	
1,2-Dichloroethane	20.0	19.7	98.3	20.0	19.7	98.7	0.429	69 - 132	20	
1,2-Dichloropropane	20.0	19.2	95.9	20.0	18.8	93.8	2.14	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	20.0	19.4	97.0	0.355	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.8	94.2	20.0	18.5	92.4	1.93	75 - 124	20	
1,3-Dichloropropane	20.0	20.0	100	20.0	19.6	98.2	2.03	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.5	92.3	20.0	18.1	90.7	1.73	74 - 123	20	
1-Chlorohexane	20.0	21.1	106	20.0	20.9	105	0.828	70 - 125	20	
2,2-Dichloropropane	20.0	17.9	89.3	20.0	18.2	90.9	1.78	69 - 137	20	
MEK (2-Butanone)	20.0	19.8	98.8	20.0	19.3	96.6	2.22	49 - 136	20	
2-Chlorotoluene	20.0	17.6	88.1	20.0	17.0	85.1	3.43	73 - 126	20	
2-Hexanone	20.0	20.2	101	20.0	19.1	95.4	5.80	55 - 130	20	
4-Chlorotoluene	20.0	19.9	99.7	20.0	20.1	101	0.908	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.8	98.9	20.0	18.9	94.5	4.50	58 - 134	20	
Acetone	20.0	19.6	98.1	20.0	18.7	93.3	5.04	40 - 135	20	
Benzene	20.0	19.5	97.7	20.0	19.5	97.5	0.301	81 - 122	20	
Bromobenzene	20.0	18.9	94.3	20.0	18.5	92.7	1.79	76 - 124	20	
Bromochloromethane	20.0	19.8	99.2	20.0	19.9	99.3	0.103	65 - 129	20	
Bromodichloromethane	20.0	19.3	96.6	20.0	19.1	95.5	1.08	76 - 121	20	
Bromoform	20.0	16.9	84.7	20.0	16.3	81.3	4.17	69 - 128	20	
Bromomethane	20.0	23.4	117	20.0	24.6	123	4.94	30 - 141	20	
Carbon disulfide	20.0	17.0	84.9	20.0	17.2	86.0	1.32	58 - 128	20	
Carbon tetrachloride	20.0	20.4	102	20.0	20.1	101	1.12	66 - 138	20	
Chlorobenzene	20.0	18.7	93.3	20.0	18.2	90.9	2.58	81 - 122	20	
Chloroethane	20.0	21.5	107	20.0	21.8	109	1.44	58 - 133	20	
Chloroform	20.0	18.3	91.3	20.0	18.0	90.0	1.45	69 - 128	20	
Chloromethane	20.0	21.6	108	20.0	21.1	106	2.06	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Report generated: 07/25/2017 16:11

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611408 Units: ug/L
QC Key: AF40 Lot #: STD81461

Sample ID: WG611408-02 LCS File ID: 8M419142 Run Date: 04/25/2017 14:15
Sample ID: WG611408-03 LCS2 File ID: 8M419143 Run Date: 04/25/2017 14:46

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.3	96.4	20.0	19.4	96.8	0.441	72 - 126	20	
cis-1,3-Dichloropropene	20.0	20.6	103	20.0	20.2	101	1.99	69 - 131	20	
Dibromochloromethane	20.0	19.1	95.7	20.0	19.1	95.4	0.305	66 - 133	20	
Dibromomethane	20.0	19.9	99.3	20.0	19.6	97.9	1.37	76 - 125	20	
Dichlorodifluoromethane	20.0	21.4	107	20.0	21.5	107	0.121	30 - 153	20	
Ethylbenzene	20.0	18.7	93.7	20.0	18.4	91.9	1.93	73 - 127	20	
Hexachlorobutadiene	20.0	17.9	89.4	20.0	18.1	90.4	1.16	67 - 131	20	
Isopropylbenzene	20.0	20.0	100	20.0	19.7	98.7	1.49	75 - 127	20	
m-,p-Xylene	40.0	39.9	99.6	40.0	39.0	97.4	2.29	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.5	97.3	20.0	19.3	96.7	0.615	65 - 123	20	
Methylene chloride	20.0	18.9	94.6	20.0	18.9	94.6	0.0017	63 - 137	20	
n-Butylbenzene	20.0	20.0	99.8	20.0	19.8	98.9	0.901	69 - 137	20	
n-Propylbenzene	20.0	19.3	96.5	20.0	19.1	95.5	1.08	72 - 129	20	
Naphthalene	20.0	20.1	100	20.0	19.4	97.2	3.20	54 - 138	20	
o-Xylene	20.0	19.0	94.9	20.0	18.6	92.9	2.22	80 - 121	20	
p-Isopropyltoluene	20.0	19.8	98.8	20.0	19.6	98.1	0.726	73 - 130	20	
sec-Butylbenzene	20.0	19.4	97.2	20.0	19.2	95.9	1.42	72 - 127	20	
Styrene	20.0	20.3	101	20.0	20.1	100	1.05	65 - 134	20	
tert-Butylbenzene	20.0	18.6	93.1	20.0	18.3	91.6	1.58	70 - 129	20	
Tetrachloroethene	20.0	20.1	101	20.0	19.6	97.9	2.85	66 - 128	20	
Toluene	20.0	20.1	100	20.0	19.5	97.5	2.82	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.3	96.5	20.0	19.0	94.8	1.76	63 - 137	20	
trans-1,3-Dichloropropene	20.0	18.7	93.6	20.0	18.5	92.6	1.04	59 - 135	20	
Trichloroethene	20.0	19.2	96.1	20.0	19.0	95.1	1.11	70 - 127	20	
Trichlorofluoromethane	20.0	20.1	100	20.0	20.2	101	0.624	57 - 129	20	
Vinyl chloride	20.0	20.3	101	20.0	19.8	99.2	2.25	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	102	103	72 - 119	PASS
Dibromofluoromethane	101	101	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	106	106	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5261417
Report generated: 07/25/2017 16:11

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	20.0	18.9	94.3	0.0705	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.0	99.8	20.0	20.1	100	0.625	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.8	98.9	20.0	19.0	95.1	3.91	63 - 128	20	
1,1,2-Trichloroethane	20.0	18.9	94.7	20.0	18.4	92.2	2.66	75 - 125	20	
1,1-Dichloroethane	20.0	19.1	95.5	20.0	19.2	96.1	0.605	69 - 133	20	
1,1-Dichloroethene	20.0	18.6	92.8	20.0	18.6	93.2	0.473	68 - 130	20	
1,1-Dichloropropene	20.0	19.1	95.6	20.0	19.5	97.4	1.85	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.3	96.5	20.0	18.9	94.3	2.24	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.9	99.6	20.0	19.2	95.9	3.79	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	94.9	20.0	18.9	94.7	0.183	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	20.0	19.8	98.9	0.263	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.8	89.0	20.0	16.3	81.5	8.79	50 - 132	20	
1,2-Dibromoethane	20.0	19.3	96.7	20.0	18.8	93.9	2.94	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.9	94.4	20.0	18.5	92.7	1.82	71 - 122	20	
1,2-Dichloroethane	20.0	19.9	99.3	20.0	19.1	95.5	3.91	69 - 132	20	
1,2-Dichloropropane	20.0	19.3	96.6	20.0	19.2	96.0	0.658	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.0	95.1	20.0	19.3	96.5	1.41	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.5	92.3	20.0	18.5	92.4	0.160	75 - 124	20	
1,3-Dichloropropane	20.0	19.9	99.6	20.0	19.5	97.6	2.07	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.4	91.9	20.0	18.2	91.1	0.810	74 - 123	20	
1-Chlorohexane	20.0	21.9	109	20.0	21.9	109	0.188	70 - 125	20	
2,2-Dichloropropane	20.0	19.1	95.5	20.0	20.0	100	4.77	69 - 137	20	
MEK (2-Butanone)	20.0	20.5	103	20.0	19.8	98.8	3.66	49 - 136	20	
2-Chlorotoluene	20.0	17.8	88.9	20.0	17.9	89.3	0.412	73 - 126	20	
2-Hexanone	20.0	20.7	103	20.0	19.5	97.5	5.81	55 - 130	20	
4-Chlorotoluene	20.0	19.4	97.2	20.0	19.7	98.6	1.49	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	21.0	105	20.0	19.2	96.2	8.91	58 - 134	20	
Acetone	20.0	20.5	103	20.0	18.7	93.3	9.55	40 - 135	20	
Benzene	20.0	19.5	97.7	20.0	19.5	97.7	0.0311	81 - 122	20	
Bromobenzene	20.0	18.6	92.8	20.0	18.7	93.3	0.515	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	19.8	99.0	1.20	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.1	20.0	19.3	96.5	0.385	76 - 121	20	
Bromoform	20.0	16.8	84.0	20.0	15.8	78.8	6.28	69 - 128	20	
Bromomethane	20.0	23.8	119	20.0	25.9	130	8.66	30 - 141	20	
Carbon disulfide	20.0	16.2	80.9	20.0	16.1	80.5	0.442	58 - 128	20	
Carbon tetrachloride	20.0	20.3	102	20.0	20.4	102	0.314	66 - 138	20	
Chlorobenzene	20.0	18.3	91.3	20.0	18.4	91.8	0.577	81 - 122	20	
Chloroethane	20.0	23.1	115	20.0	23.1	116	0.144	58 - 133	20	
Chloroform	20.0	18.2	90.8	20.0	18.2	90.8	0.0142	69 - 128	20	
Chloromethane	20.0	22.6	113	20.0	22.2	111	1.73	56 - 131	20	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041075 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611561 Units: ug/L
QC Key: AF40 Lot #: STD81583

Sample ID: WG611561-02 LCS File ID: 8M419168 Run Date: 04/26/2017 09:56
Sample ID: WG611561-03 LCS2 File ID: 8M419169 Run Date: 04/26/2017 10:27

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.1	95.6	20.0	19.3	96.7	1.20	72 - 126	20	
cis-1,3-Dichloropropene	20.0	20.6	103	20.0	20.5	102	0.709	69 - 131	20	
Dibromochloromethane	20.0	19.1	95.6	20.0	18.5	92.5	3.27	66 - 133	20	
Dibromomethane	20.0	20.2	101	20.0	19.7	98.5	2.42	76 - 125	20	
Dichlorodifluoromethane	20.0	25.4	127	20.0	25.7	128	1.01	30 - 153	20	
Ethylbenzene	20.0	18.5	92.4	20.0	18.7	93.7	1.41	73 - 127	20	
Hexachlorobutadiene	20.0	17.3	86.3	20.0	17.5	87.3	1.18	67 - 131	20	
Isopropylbenzene	20.0	19.8	98.8	20.0	19.9	99.3	0.496	75 - 127	20	
m-,p-Xylene	40.0	38.8	97.1	40.0	39.6	99.1	1.98	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.0	100	20.0	19.2	96.1	4.03	65 - 123	20	
Methylene chloride	20.0	18.5	92.7	20.0	18.8	94.0	1.32	63 - 137	20	
n-Butylbenzene	20.0	20.0	99.8	20.0	20.2	101	1.36	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.2	20.0	19.5	97.3	1.21	72 - 129	20	
Naphthalene	20.0	20.5	103	20.0	19.7	98.4	4.23	54 - 138	20	
o-Xylene	20.0	18.7	93.3	20.0	18.9	94.7	1.50	80 - 121	20	
p-Isopropyltoluene	20.0	19.6	98.0	20.0	19.8	99.0	1.05	73 - 130	20	
sec-Butylbenzene	20.0	19.1	95.3	20.0	19.3	96.3	1.01	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.3	102	0.590	65 - 134	20	
tert-Butylbenzene	20.0	18.0	90.2	20.0	18.2	91.1	0.961	70 - 129	20	
Tetrachloroethene	20.0	19.7	98.4	20.0	19.5	97.6	0.728	66 - 128	20	
Toluene	20.0	19.7	98.6	20.0	19.8	98.8	0.142	77 - 122	20	
trans-1,2-Dichloroethene	20.0	18.9	94.5	20.0	18.8	94.2	0.345	63 - 137	20	
trans-1,3-Dichloropropene	20.0	18.9	94.6	20.0	18.7	93.3	1.31	59 - 135	20	
Trichloroethene	20.0	18.6	92.8	20.0	18.7	93.3	0.577	70 - 127	20	
Trichlorofluoromethane	20.0	21.6	108	20.0	21.3	107	1.42	57 - 129	20	
Vinyl chloride	20.0	22.5	112	20.0	21.8	109	3.10	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	101	72 - 119	PASS
Dibromofluoromethane	102	101	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	105	106	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041075 Cal ID: HPMS17- 26-APR-17 Worknum: WG611721

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041075-25 File ID: 17M0273045 Dil: 1 Method: 5035A

Sample ID: L17041075-26 MS File ID: 17M0273041 Dil: 1 Matrix: 8260B

Sample ID: L17041075-27 MSD File ID: 17M0273042 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.1	95.6	20.0	18.5	92.4	3.43	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.4	97.2	20.0	19.3	96.3	0.948	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.8	104	20.0	20.6	103	0.688	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.5	97.4	20.0	19.0	95.2	2.29	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.4	97.1	20.0	19.4	97.2	0.0662	69 - 133	20	
1,1-Dichloroethene	0.504	20.0	18.3	88.9	20.0	18.4	89.3	0.364	68 - 130	20	
1,1-Dichloropropene	U	20.0	18.7	93.6	20.0	18.5	92.7	0.968	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.7	98.5	20.0	18.1	90.3	8.65	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.1	95.5	20.0	19.0	94.9	0.627	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	20.0	100	20.0	18.3	91.7	8.76	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.2	96.1	20.0	18.1	90.4	6.13	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.8	99	20.0	19.5	97.7	1.34	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	19.0	95	20.0	18.0	90.1	5.24	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	21.1	105	20.0	20.8	104	1.42	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.7	98.6	20.0	19.3	96.6	1.99	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.3	96.4	20.0	18.9	94.6	1.91	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.0	94.8	20.0	18.0	89.8	5.36	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.7	93.3	20.0	17.7	88.5	5.37	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.4	102	20.0	19.8	99.1	2.72	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.7	93.6	20.0	17.7	88.3	5.77	74 - 123	20	
1-Chlorohexane	U	20.0	18.7	93.7	20.0	18.0	90.1	3.90	70 - 125	20	
2,2-Dichloropropane	U	20.0	18.1	90.3	20.0	17.4	87.1	3.59	69 - 137	20	
2-Hexanone	U	20.0	21.4	107	20.0	21.3	106	0.449	55 - 130	20	
2-Chlorotoluene	U	20.0	18.5	92.4	20.0	17.6	88.2	4.58	73 - 126	20	
4-Chlorotoluene	U	20.0	19.3	96.7	20.0	18.3	91.4	5.55	74 - 128	20	
Acetone	5.46	20.0	26.9	107	20.0	28.1	113	4.02	40 - 135	20	
Benzene	U	20.0	19.4	96.9	20.0	19.2	95.9	1.04	81 - 122	20	
Bromobenzene	U	20.0	18.5	92.7	20.0	18.1	90.6	2.35	76 - 124	20	
Bromochloromethane	U	20.0	20.2	101	20.0	20.0	100	1.07	65 - 129	20	
Bromodichloromethane	U	20.0	19.3	96.6	20.0	19.0	94.8	1.92	76 - 121	20	
Bromoform	U	20.0	19.7	98.7	20.0	19.2	95.9	2.90	69 - 128	20	
Bromomethane	U	20.0	19.5	97.6	20.0	19.2	96	1.66	30 - 141	20	
Carbon disulfide	U	20.0	15.7	78.7	20.0	16.0	79.8	1.30	58 - 128	20	
Carbon tetrachloride	U	20.0	18.6	93.2	20.0	18.5	92.6	0.659	66 - 138	20	
Chlorobenzene	U	20.0	19.2	96.2	20.0	18.6	92.8	3.57	81 - 122	20	
Chloroethane	U	20.0	16.6	83.1	20.0	16.8	84.2	1.33	58 - 133	20	
Chloroform	U	20.0	19.9	99.7	20.0	19.5	97.6	2.16	69 - 128	20	
Chloromethane	U	20.0	22.2	111	20.0	22.2	111	0.305	56 - 131	20	
cis-1,2-Dichloroethene	15.8	20.0	34.0	91	20.0	33.9	90.3	0.382	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.3	102	2.40	69 - 131	20	
Dibromochloromethane	U	20.0	19.4	97.1	20.0	18.7	93.6	3.69	66 - 133	20	

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041075 Cal ID: HPMS17 26-APR-17 Worknum: WG611721

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041075-25 File ID: 17M0273045 Dil: 1 Method: 5035A

Sample ID: L17041075-26 MS File ID: 17M0273041 Dil: 1 Matrix: 8260B

Sample ID: L17041075-27 MSD File ID: 17M0273042 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.3	102	20.0	19.9	99.4	2.33	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.1	111	20.0	21.5	108	2.90	30 - 153	20	
Ethylbenzene	U	20.0	19.3	96.6	20.0	18.6	92.8	4.09	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.0	90.2	20.0	16.1	80.3	11.6	67 - 131	20	
Isopropylbenzene	U	20.0	19.0	94.8	20.0	17.9	89.3	5.99	75 - 127	20	
Methylene chloride	U	20.0	19.0	95.2	20.0	18.6	93.1	2.22	63 - 137	20	
Methyl t-butyl ether (MTBE)	32.8	20.0	53.3	103	20.0	53.1	101	0.517	65 - 123	20	
MEK (2-Butanone)	U	20.0	20.9	104	20.0	20.7	104	0.830	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	20.9	104	20.0	20.6	103	1.58	58 - 134	20	
n-Butylbenzene	U	20.0	19.4	97	20.0	17.6	87.9	9.83	69 - 137	20	
n-Propylbenzene	U	20.0	18.7	93.4	20.0	17.6	88.2	5.75	72 - 129	20	
m-,p-Xylene	U	40.0	39.3	98.3	40.0	36.9	92.4	6.20	76 - 128	20	
Naphthalene	U	20.0	20.7	103	20.0	19.7	98.4	4.98	54 - 138	20	
o-Xylene	U	20.0	19.5	97.7	20.0	18.7	93.6	4.29	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.2	95.9	20.0	17.6	88.2	8.37	73 - 130	20	
sec-Butylbenzene	U	20.0	18.5	92.6	20.0	17.1	85.7	7.72	72 - 127	20	
Styrene	U	20.0	20.1	101	20.0	19.3	96.6	4.07	65 - 134	20	
Trichloroethene	1.62	20.0	19.4	88.7	20.0	19.1	87.2	1.51	70 - 127	20	
tert-Butylbenzene	U	20.0	18.3	91.6	20.0	17.3	86.3	5.91	70 - 129	20	
Tetrachloroethene	5.53	20.0	23.5	89.9	20.0	22.1	83.1	5.97	66 - 128	20	
Toluene	1.49	20.0	20.8	96.8	20.0	20.1	93.3	3.44	77 - 122	20	
trans-1,2-Dichloroethene	0.735	20.0	19.8	95.4	20.0	19.6	94.6	0.810	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.8	99	20.0	19.2	96.1	2.97	59 - 135	20	
Trichlorofluoromethane	U	20.0	12.7	63.4	20.0	12.1	60.3	5.00	57 - 129	20	
Vinyl chloride	174	20.0	164	-50.2	20.0	167	-37.3	1.55	50 - 134	20	*

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041075 Cal ID: HPMS17- 26-APR-17 Worknum: WG612030

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041075-28 File ID: 17M0273111 Dil: 1 Method: 5035A

Sample ID: L17041075-29 MS File ID: 17M0273108 Dil: 1 Matrix: 8260B

Sample ID: L17041075-30 MSD File ID: 17M0273109 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.8	94.1	20.0	18.2	91.2	3.09	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.1	100	20.0	19.4	96.9	3.55	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.5	103	20.0	20.9	105	1.85	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.7	93.3	20.0	18.7	93.7	0.369	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.8	99	20.0	19.2	95.9	3.21	69 - 133	20	
1,1-Dichloroethene	U	20.0	19.4	97	20.0	18.4	92.2	5.06	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.5	97.6	20.0	18.8	93.9	3.88	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	18.5	92.5	20.0	18.5	92.6	0.195	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	18.6	93.2	20.0	19.1	95.4	2.31	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.9	94.5	20.0	18.9	94.6	0.139	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.7	98.6	20.0	19.1	95.7	2.98	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.3	96.7	20.0	19.0	94.9	1.85	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.7	93.4	20.0	18.5	92.3	1.22	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	19.0	95.2	20.0	19.5	97.5	2.35	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.6	98.2	20.0	19.0	95.1	3.17	75 - 125	20	
1,2-Dibromoethane	U	20.0	18.7	93.4	20.0	18.7	93.7	0.274	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.5	97.6	20.0	18.9	94.7	3.01	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.0	95	20.0	18.3	91.6	3.63	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.9	99.4	20.0	19.5	97.3	2.10	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.7	93.7	20.0	18.2	91.2	2.67	74 - 123	20	
1-Chlorohexane	U	20.0	20.6	103	20.0	19.7	98.7	4.36	70 - 125	20	
2,2-Dichloropropane	U	20.0	21.3	107	20.0	20.3	101	4.93	69 - 137	20	
2-Hexanone	U	20.0	20.7	104	20.0	22.0	110	5.69	55 - 130	20	
2-Chlorotoluene	U	20.0	18.9	94.6	20.0	18.4	92	2.71	73 - 126	20	
4-Chlorotoluene	U	20.0	19.6	98.2	20.0	19.1	95.4	2.91	74 - 128	20	
Acetone	5.73	20.0	20.6	74.2	20.0	23.5	89	13.4	40 - 135	20	
Benzene	U	20.0	19.4	96.9	20.0	18.7	93.7	3.33	81 - 122	20	
Bromobenzene	U	20.0	18.6	92.9	20.0	18.3	91.3	1.67	76 - 124	20	
Bromochloromethane	U	20.0	19.9	99.7	20.0	19.7	98.7	1.04	65 - 129	20	
Bromodichloromethane	U	20.0	19.1	95.5	20.0	18.6	93	2.71	76 - 121	20	
Bromoform	U	20.0	18.6	92.9	20.0	18.8	94.1	1.30	69 - 128	20	
Bromomethane	U	20.0	16.6	82.9	20.0	16.4	81.8	1.32	30 - 141	20	
Carbon disulfide	U	20.0	16.9	84.5	20.0	16.3	81.4	3.79	58 - 128	20	
Carbon tetrachloride	U	20.0	20.0	99.9	20.0	19.3	96.3	3.68	66 - 138	20	
Chlorobenzene	U	20.0	19.0	95.2	20.0	18.2	91.2	4.23	81 - 122	20	
Chloroethane	U	20.0	20.9	105	20.0	22.8	114	8.55	58 - 133	20	
Chloroform	U	20.0	19.8	98.9	20.0	19.2	95.8	3.16	69 - 128	20	
Chloromethane	U	20.0	20.4	102	20.0	20.6	103	0.741	56 - 131	20	
cis-1,2-Dichloroethene	28.0	20.0	45.1	85.2	20.0	44.6	83.1	0.924	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.6	103	1.22	69 - 131	20	
Dibromochloromethane	U	20.0	18.7	93.6	20.0	18.6	93	0.570	66 - 133	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5266787

Report generated 07/25/2017 16:08

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041075 Cal ID: HPMS17 26-APR-17 Worknum: WG612030

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041075-28 File ID: 17M0273111 Dil: 1 Method: 5035A

Sample ID: L17041075-29 MS File ID: 17M0273108 Dil: 1 Matrix: 8260B

Sample ID: L17041075-30 MSD File ID: 17M0273109 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	19.2	96.1	20.0	19.4	97.1	1.04	76 - 125	20	
Dichlorodifluoromethane	U	20.0	25.0	125	20.0	24.1	121	3.67	30 - 153	20	
Ethylbenzene	U	20.0	19.3	96.7	20.0	18.5	92.3	4.64	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.1	90.4	20.0	17.7	88.6	2.02	67 - 131	20	
Isopropylbenzene	U	20.0	18.9	94.3	20.0	18.3	91.3	3.16	75 - 127	20	
Methylene chloride	U	20.0	18.7	93.3	20.0	18.1	90.6	2.92	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.2	95.9	20.0	19.6	98	2.18	65 - 123	20	
MEK (2-Butanone)	U	20.0	17.8	89.2	20.0	19.0	95	6.27	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.9	99.6	20.0	21.1	105	5.71	58 - 134	20	
n-Butylbenzene	U	20.0	20.2	101	20.0	19.7	98.3	2.82	69 - 137	20	
n-Propylbenzene	U	20.0	19.6	97.8	20.0	18.8	93.9	4.07	72 - 129	20	
m-,p-Xylene	U	40.0	39.1	97.6	40.0	37.4	93.6	4.24	76 - 128	20	
Naphthalene	U	20.0	18.2	91.2	20.0	18.7	93.7	2.73	54 - 138	20	
o-Xylene	U	20.0	19.0	95.2	20.0	18.5	92.3	3.13	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.8	98.8	20.0	19.1	95.6	3.27	73 - 130	20	
sec-Butylbenzene	U	20.0	19.3	96.4	20.0	18.6	93	3.58	72 - 127	20	
Styrene	U	20.0	19.9	99.4	20.0	19.2	96.1	3.44	65 - 134	20	
Trichloroethene	0.496	20.0	18.5	89.9	20.0	18.0	87.5	2.69	70 - 127	20	
tert-Butylbenzene	U	20.0	19.1	95.6	20.0	18.1	90.6	5.36	70 - 129	20	
Tetrachloroethene	U	20.0	19.4	96.8	20.0	18.5	92.6	4.43	66 - 128	20	
Toluene	4.38	20.0	23.5	95.7	20.0	22.6	91	4.09	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.4	97.2	20.0	18.8	93.8	3.53	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.5	97.3	20.0	19.5	97.4	0.112	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.9	104	20.0	20.0	100	4.20	57 - 129	20	
Vinyl chloride	U	20.0	22.6	113	20.0	22.4	112	1.02	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5266787

Report generated 07/25/2017 16:08

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS17
Analyst: FJB
Workgroup: WG611454

Tune ID: WG611454-01
Run Date: 04/25/2017
Run Time: 20:07
File ID: 17M0273002
Cal ID: HPMS17 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	4824	PASS
75.0	95.0	30.0	60.0	48.1	14022	PASS
95.0	95.0	100	100	100	29152	PASS
96.0	95.0	5.00	9.00	6.70	1953	PASS
173	174	0	2.00	0.808	223	PASS
174	95.0	50.0	100	94.7	27600	PASS
175	174	5.00	9.00	7.26	2004	PASS
176	174	95.0	101	98.5	27192	PASS
177	176	5.00	9.00	6.67	1814	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611454-02	STD	01	04/25/2017 20:45	
WG611454-03	STD	01	04/25/2017 21:05	
WG611454-04	STD	01	04/25/2017 21:24	
WG611454-05	STD	01	04/25/2017 21:56	
WG611454-06	STD	01	04/25/2017 22:15	
WG611454-07	STD	01	04/25/2017 22:46	
WG611454-08	STD-CCV	01	04/25/2017 23:06	
WG611454-09	STD	01	04/25/2017 23:38	
WG611454-10	STD	01	04/25/2017 23:58	
WG611454-11	STD	01	04/26/2017 00:33	
WG611454-12	SSCV	01	04/26/2017 01:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS17
Analyst: ADC
Workgroup: WG611720

Tune ID: WG611720-01
Run Date: 04/26/2017
Run Time: 14:46
File ID: 17M0273027
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.7	6318	PASS
75.0	95.0	30.0	60.0	47.2	17819	PASS
95.0	95.0	100	100	100	37739	PASS
96.0	95.0	5.00	9.00	6.92	2610	PASS
173	174	0	2.00	0.915	327	PASS
174	95.0	50.0	100	94.7	35725	PASS
175	174	5.00	9.00	7.73	2761	PASS
176	174	95.0	101	96.1	34347	PASS
177	176	5.00	9.00	6.74	2314	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611720-02	CCV	01	04/26/2017 15:05	
WG611721-01	BLANK	01	04/26/2017 15:50	
WG611721-02	LCS	01	04/26/2017 20:06	
L17041075-26	MW-100B-LS-25	01	04/26/2017 20:26	
L17041075-27	MW-100B-LS-25	01	04/26/2017 20:57	
L17041075-23	PMW21-03-LS-25	01	04/26/2017 21:36	
L17041075-25	MW-100B-LS-25	01	04/26/2017 22:13	
L17041075-31	DR1-6-LS-25	01	04/26/2017 22:33	
L17041075-32	PMW101-06A-LS-25	01	04/26/2017 23:01	
L17041075-33	DUP-11	01	04/26/2017 23:20	
L17041075-34	PMW101-06B-LS-25	01	04/26/2017 23:55	
L17041075-35	PMW101-07A-LS-25	01	04/27/2017 00:14	
L17041075-36	PMW101-07B-LS-25	01	04/27/2017 00:47	
L17041075-37	PMW21-05-LS-25	01	04/27/2017 01:06	
L17041075-38	MW-276-LS-25	01	04/27/2017 01:41	
L17041075-39	DUP-9	01	04/27/2017 02:01	
L17041075-40	MW-279-LS-25	01	04/27/2017 02:40	

* Sample past 12 hour tune limit

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PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS17
Analyst: ADC
Workgroup: WG611826

Tune ID: WG611826-01
Run Date: 04/27/2017
Run Time: 11:37
File ID: 17M0273064
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.9	8386	PASS
75.0	95.0	30.0	60.0	48.5	22779	PASS
95.0	95.0	100	100	100	46968	PASS
96.0	95.0	5.00	9.00	6.75	3172	PASS
173	174	0	2.00	0.922	407	PASS
174	95.0	50.0	100	94.0	44133	PASS
175	174	5.00	9.00	7.94	3505	PASS
176	174	95.0	101	97.0	42800	PASS
177	176	5.00	9.00	7.01	3001	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611826-02	CCV	01	04/27/2017 11:56	
WG611827-01	BLANK	01	04/27/2017 12:42	
WG611827-02	LCS	01	04/27/2017 13:02	
L17041075-24	PMW21-04-LS-25	01	04/27/2017 15:08	
L17041075-43	LTM-TB1-LS-25	01	04/27/2017 15:28	
L17041075-41	MW-278-LS-25	01	04/27/2017 15:47	
L17041075-44	LTM-TB2-LS-25	01	04/27/2017 16:07	
L17041075-45	LTM-TB3-LS-25	01	04/27/2017 16:27	
L17041075-42	MW-275-LS-25	01	04/27/2017 16:47	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612029

Tune ID: WG612029-01
Run Date: 04/28/2017
Run Time: 12:01
File ID: 17M0273103
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.8	6101	PASS
75.0	95.0	30.0	60.0	47.7	17307	PASS
95.0	95.0	100	100	100	36315	PASS
96.0	95.0	5.00	9.00	6.51	2365	PASS
173	174	0	2.00	0.931	322	PASS
174	95.0	50.0	100	95.2	34571	PASS
175	174	5.00	9.00	7.23	2501	PASS
176	174	95.0	101	95.6	33064	PASS
177	176	5.00	9.00	6.38	2111	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612029-02	CCV	01	04/28/2017 12:19	
WG612030-01	BLANK	01	04/28/2017 13:01	
WG612030-02	LCS	01	04/28/2017 13:21	
L17041075-29	DR1-6A-LS-25	02	04/28/2017 13:40	
L17041075-30	DR1-6A-LS-25	02	04/28/2017 14:00	
L17041075-28	DR1-6A-LS-25	02	04/28/2017 14:53	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS8
Analyst: TMB
Workgroup: WG609829

Tune ID: WG609829-01
Run Date: 04/12/2017
Run Time: 10:17
File ID: 8M418914
Cal ID: HPMS8-12-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.0	6807	PASS
75.0	95.0	30.0	60.0	45.8	20724	PASS
95.0	95.0	100	100	100	45280	PASS
96.0	95.0	5.00	9.00	6.80	3077	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	94.7	42898	PASS
175	174	5.00	9.00	8.05	3453	PASS
176	174	95.0	101	100	42994	PASS
177	176	5.00	9.00	6.69	2876	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609829-02	STD	01	04/12/2017 11:11	
WG609829-03	STD	01	04/12/2017 11:40	
WG609829-04	STD	01	04/12/2017 12:10	
WG609829-05	STD-CCV	01	04/12/2017 12:41	
WG609829-06	STD	01	04/12/2017 13:10	
WG609829-07	STD	01	04/12/2017 13:40	
WG609829-08	STD	01	04/12/2017 14:10	
WG609829-09	STD	01	04/12/2017 14:39	
WG609829-10	SSCV	01	04/12/2017 16:10	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS8
Analyst: TMB
Workgroup: WG610410

Tune ID: WG610410-01
Run Date: 04/17/2017
Run Time: 12:58
File ID: 8M419000
Cal ID: HPMS8 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.1	8216	PASS
75.0	95.0	30.0	60.0	47.8	21655	PASS
95.0	95.0	100	100	100	45349	PASS
96.0	95.0	5.00	9.00	6.40	2901	PASS
173	174	0	2.00	0.273	110	PASS
174	95.0	50.0	100	89.0	40349	PASS
175	174	5.00	9.00	7.54	3042	PASS
176	174	95.0	101	99.8	40256	PASS
177	176	5.00	9.00	6.96	2800	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610410-02	STD	01	04/17/2017 13:51	
WG610410-03	STD	01	04/17/2017 14:25	
WG610410-04	STD	01	04/17/2017 14:55	
WG610410-05	STD	01	04/17/2017 15:25	
WG610410-06	STD	01	04/17/2017 15:54	
WG610410-07	STD	01	04/17/2017 16:24	
WG610410-08	STD-CCV	01	04/17/2017 16:54	
WG610410-09	STD	01	04/17/2017 17:23	
WG610410-10	STD	01	04/17/2017 17:54	
WG610410-11	STD	01	04/17/2017 18:24	
WG610410-12	SSCV	01	04/17/2017 19:53	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611300

Tune ID: WG611300-01
Run Date: 04/24/2017
Run Time: 11:16
File ID: 8M419115
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.1	5480	PASS
75.0	95.0	30.0	60.0	49.3	14142	PASS
95.0	95.0	100	100	100	28672	PASS
96.0	95.0	5.00	9.00	6.62	1898	PASS
173	174	0	2.00	0.506	126	PASS
174	95.0	50.0	100	86.8	24885	PASS
175	174	5.00	9.00	7.19	1790	PASS
176	174	95.0	101	99.3	24712	PASS
177	176	5.00	9.00	7.00	1730	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611300-02	CCV	01	04/24/2017 11:42	
WG611301-01	BLANK	01	04/24/2017 12:42	
WG611301-02	LCS	01	04/24/2017 13:13	
WG611301-03	LCS2	01	04/24/2017 13:44	
L17041075-01	MW-200-LS-25	01	04/24/2017 17:18	
L17041075-02	MW-94A-LS-25	01	04/24/2017 17:49	
L17041075-03	MW-208B-LS-25	01	04/24/2017 18:19	
L17041075-04	MW-208A-LS-25	01	04/24/2017 18:50	
L17041075-05	MW-207B-LS-25	01	04/24/2017 19:21	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075 Tune ID: WG611407-01
Instrument: HPMS8 Run Date: 04/25/2017
Analyst: TMB Run Time: 11:20
Workgroup: WG611407 File ID: 8M419136
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.5	7418	PASS
75.0	95.0	30.0	60.0	47.2	20033	PASS
95.0	95.0	100	100	100	42440	PASS
96.0	95.0	5.00	9.00	6.76	2869	PASS
173	174	0	2.00	0.431	156	PASS
174	95.0	50.0	100	85.2	36162	PASS
175	174	5.00	9.00	7.46	2699	PASS
176	174	95.0	101	97.8	35370	PASS
177	176	5.00	9.00	6.36	2251	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611407-02	CCV	01	04/25/2017 12:44	
WG611408-01	BLANK	01	04/25/2017 13:45	
WG611408-02	LCS	01	04/25/2017 14:15	
WG611408-03	LCS2	01	04/25/2017 14:46	
L17041075-06	MW-207A-LS-25	01	04/25/2017 16:16	
L17041075-07	MW-108-LS-25	01	04/25/2017 16:46	
L17041075-09	MW-107B-LS-25	01	04/25/2017 17:16	
L17041075-10	MW-107T-LS-25	01	04/25/2017 17:45	
L17041075-11	MW-258-LS-25	01	04/25/2017 18:15	
L17041075-12	MW-265-LS-25	01	04/25/2017 18:45	
L17041075-08	DUP-4	01	04/25/2017 19:15	
L17041075-13	DUP-8	01	04/25/2017 19:45	
L17041075-14	MW-264-LS-25	01	04/25/2017 20:14	
L17041075-15	MW-104-LS-25	01	04/25/2017 20:45	
L17041075-16	MW-263-LS-25	01	04/25/2017 21:15	
L17041075-17	DR1-5A-LS-25	01	04/25/2017 21:46	
L17041075-18	DR1-5-LS-25	01	04/25/2017 22:16	
L17041075-19	MW-21-LS-25	01	04/25/2017 22:45	
L17041075-20	DUP-2	01	04/25/2017 23:16	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041075
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611560

Tune ID: WG611560-01
Run Date: 04/26/2017
Run Time: 07:53
File ID: 8M419164
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.9	7090	PASS
75.0	95.0	30.0	60.0	47.8	17949	PASS
95.0	95.0	100	100	100	37554	PASS
96.0	95.0	5.00	9.00	6.41	2408	PASS
173	174	0	2.00	0.550	182	PASS
174	95.0	50.0	100	88.1	33098	PASS
175	174	5.00	9.00	7.25	2399	PASS
176	174	95.0	101	97.7	32344	PASS
177	176	5.00	9.00	6.46	2088	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611560-02	CCV	01	04/26/2017 08:22	
WG611561-01	BLANK	01	04/26/2017 09:27	
WG611561-02	LCS	01	04/26/2017 09:56	
WG611561-03	LCS2	01	04/26/2017 10:27	
L17041075-21	PMW21-01-LS-25	01	04/26/2017 16:58	
L17041075-22	PMW21-02-LS-25	01	04/26/2017 17:27	
WG611237-01	FBLK1	DL01	04/27/2017 00:59	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5261419
Report generated 07/25/2017 16:09

Response Factor Report HPMS17

Method Path : D:\MassHunter\GCMS\1\methods\
Method File : 826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017
Response Via : Initial Calibration
Curve: WG611454
Calibration Files
0.3 =17M0273004.D 0.4 =17M0273005.D 1 =17M0273006.D 2 =17M0273007.D 5 =17M0273008.D 20 =17M0273009.D
50 =17M0273010.D 100 =17M0273011.D 200 =17M0273012.D 300 =17M0273013.D

		Compound	0.3	0.4	1	2	5	20	50	100	200	300	Avg	%RSD	Linear	
1)	I	Fluorobenzene	----------	----------	ISTD	----------	----------	----------	----------	----------	----------	----------				
2)	T	Dichlorodifluo...			0.260	0.246	0.267	0.322	0.327	0.324	0.332		0.297	12.54		
3)	P	Chloromethane			0.289	0.283	0.279	0.292	0.288	0.306	0.297		0.291	3.11		
4)	C	Vinyl Chloride		0.334	0.306	0.292	0.311	0.331	0.329	0.335	0.334		0.322	5.07#		
5)	T	1,3-Butadiene			0.188	0.192	0.198	0.198	0.204	0.199	0.203		0.198	2.87		
6)	T	Bromomethane			0.262	0.263	0.258	0.240	0.222	0.218	0.212		0.239	9.17		
7)	T	Chloroethane			0.168	0.160	0.171	0.175	0.136	0.132	0.126		0.153	13.55		
8)	T	Trichlorofluor...		0.447	0.424	0.402	0.439	0.444	0.443	0.377	0.326		0.413	10.36		
9)	T	Diethyl ether			0.196	0.198	0.197	0.204	0.205	0.200		0.193	0.199	2.16		
10)	C	1,1-Dichloroet...		0.404	0.386	0.364	0.383	0.390	0.388	0.395	0.380		0.386	3.03#		
11)	T	Carbon Disulfide		0.890	0.818	0.756	0.827	0.821	0.852	0.833	0.834		0.829	4.51		
12)	T	1,1,2-Trichlor...		0.257	0.242	0.225	0.254	0.248	0.254	0.246	0.244		0.246	4.10		
13)	T	Iodomethane				0.121	0.187	0.272	0.364	0.380	0.394		0.286	39.36	0.996	
14)	T	Acrolein			0.024	0.023	0.025	0.025	0.026	0.025		0.024	0.025	4.79		
15)	T	Methylene Chlo...		0.339	0.301	0.285	0.291	0.285	0.280	0.286	0.277		0.293	6.85		
16)	T	Acetone					0.061	0.052	0.049	0.049	0.047	0.045	0.050	11.07		
17)	T	trans-1,2-Dich...		0.268	0.253	0.255	0.262	0.264	0.265	0.272	0.266		0.263	2.40		
18)	T	Methyl acetate		0.108	0.123	0.115	0.131	0.144	0.154	0.148			0.132	13.21		
19)	T	Methyl Tert Bu...		0.648	0.647	0.641	0.679	0.672	0.688	0.695	0.668		0.667	3.02		
20)	P	1,1-Dichloroet...		0.467	0.456	0.453	0.480	0.480	0.477	0.489	0.477		0.472	2.64		
21)	T	Acrylonitrile			0.060	0.062	0.064	0.065	0.067	0.066		0.065	0.064	3.92		
22)	T	Vinyl Acetate					0.040	0.040	0.045	0.041	0.045		0.042	5.97		
23)	T	cis-1,2-Dichlo...		0.300	0.282	0.289	0.302	0.297	0.299	0.308	0.303		0.298	2.74		
24)	T	2,2-Dichloropr...		0.198	0.267	0.290	0.328	0.352	0.378	0.381	0.374		0.321	20.34	1.000	
25)	T	Cyclohexane		0.391	0.387	0.372	0.406	0.398	0.421	0.412	0.427		0.402	4.54		
26)	T	Bromochloromet...			0.167	0.179	0.195	0.196	0.200	0.205	0.201		0.192	7.24		
27)	C	Chloroform	0.476	0.514	0.492	0.492	0.499	0.489	0.489	0.499	0.482		0.492	2.21#		
28)	T	Carbon Tetrach...		0.361	0.362	0.363	0.396	0.400	0.407	0.415	0.411		0.389	6.02		
29)	S	Dibromofluorom...					0.275	0.249	0.278	0.278	0.271		0.270	4.54		
30)	T	1,1,1-Trichlor...		0.429	0.422	0.414	0.435	0.440	0.438	0.448	0.437		0.433	2.51		
31)	T	1,1-Dichloropr...		0.347	0.327	0.312	0.336	0.340	0.352	0.352	0.352		0.340	4.22		
32)	T	2-Butanone					0.076	0.070	0.076	0.076	0.075	0.076	0.075	3.44		
33)	T	Benzene		1.142	1.045	1.024	1.062	1.054	1.058	1.085	1.050		1.065	3.34		
34)	S	1,2-Dichloroet...					0.270	0.237	0.260	0.255	0.243		0.253	5.23		
35)	T	1,2-Dichloroet...		0.343	0.317	0.322	0.341	0.332	0.333	0.336	0.328		0.332	2.70		
36)	T	Methylcyclohexane	0.445	0.432	0.414	0.377	0.420	0.401	0.438	0.416	0.444		0.421	5.28		
37)	T	Trichloroethene		0.341	0.312	0.307	0.316	0.316	0.318	0.327	0.321		0.320	3.24		

38)	T	Dibromomethane		0.152	0.152	0.157	0.169	0.164	0.168	0.172	0.170		0.163	5.00
39)	C	1,2-Dichloropr...		0.266	0.267	0.269	0.285	0.281	0.285	0.293	0.287		0.279	3.71#
40)	T	Bromodichlorom...		0.366	0.349	0.359	0.373	0.376	0.381	0.394	0.384		0.373	3.87
41)	T	1,4-Dioxane				0.001	0.001	0.001	0.001	0.002		0.002	0.001	14.84
42)	T	2-Chloroethyl ...					0.105	0.117	0.128	0.134	0.137	0.139	0.127	10.41
43)	T	cis-1,3-Dichlo...		0.377	0.382	0.390	0.424	0.429	0.445	0.456	0.457		0.420	7.82
44)	T	4-Methyl-2-Pen...					0.067	0.065	0.070	0.070	0.073	0.071	0.069	4.03
45)	T	trans-1,3-Dich...			0.304	0.322	0.360	0.366	0.379	0.384	0.385		0.357	8.95
46)	I	Chlorobenzene-d5	----------				ISTD							
47)	S	Toluene-d8					1.299	1.170	1.283	1.272	1.214		1.248	4.33
48)	C	Toluene		1.663	1.512	1.548	1.591	1.582	1.580	1.566	1.498		1.567	3.27#
49)	T	Tetrachloroethene		0.485	0.430	0.434	0.456	0.441	0.450	0.442	0.439		0.447	3.89
50)	T	1,1,2-Trichlor...		0.311	0.288	0.309	0.315	0.305	0.307	0.303	0.291		0.304	3.07
51)	T	Dibromochlorom...		0.416	0.367	0.402	0.421	0.423	0.432	0.434	0.423		0.415	5.22
52)	T	1,3-Dichloropr...		0.483	0.456	0.486	0.499	0.493	0.490	0.487	0.468		0.483	2.88
53)	T	1,2-Dibromoethane		0.321	0.294	0.307	0.317	0.312	0.319	0.314	0.305		0.311	2.90
54)	T	2-Hexanone				0.148	0.167	0.155	0.162	0.160	0.161	0.165	0.160	3.98
55)	P	Chlorobenzene		1.094	1.016	1.032	1.053	1.049	1.059	1.062	1.047		1.052	2.18
56)	T	1-Chlorohexane			0.079	0.083	0.085	0.082	0.090	0.086	0.090		0.085	4.55
57)	C	Ethylbenzene		0.559	0.502	0.540	0.551	0.549	0.559	0.558	0.562		0.547	3.65#
58)	T	1,1,1,2-Tetrac...		0.410	0.381	0.411	0.416	0.413	0.415	0.418	0.411		0.409	2.94
59)	T	m-,p-Xylene		0.674	0.615	0.631	0.668	0.663	0.683	0.683	0.669		0.661	3.73
60)	T	o-Xylene		0.641	0.608	0.642	0.657	0.652	0.667	0.667	0.673		0.651	3.22
61)	T	Styrene		0.997	0.921	0.974	1.039	1.066	1.104	1.114	1.118		1.042	6.95
62)	P	Bromoform		0.266	0.242	0.266	0.297	0.299	0.320	0.317	0.326		0.292	10.42
63)	T	Isopropylbenzene		1.730	1.595	1.609	1.721	1.707	1.728	1.702	1.688		1.685	3.16
64)	I	1,4-Dichlorobenzen...	----------				ISTD							
65)	T	1,3,5-Trimethy...			2.872	2.652	2.732	2.866	2.834	2.818	2.719	2.803	2.787	2.80
66)	S	p-Bromofluorob...					0.760	0.784	0.849	0.859	0.933		0.837	8.16
67)	T	Bromobenzene		1.037	1.017	0.926	0.992	0.982	0.980	0.965	0.942	1.010	0.983	3.63
68)	T	n-Propylbenzene			3.922	3.496	3.615	3.790	3.761	3.731	3.532	3.687	3.692	3.82
69)	P	1,1,2,2-Tetrac...			0.626	0.622	0.654	0.713	0.686	0.713	0.660	0.705	0.672	5.56
70)	T	2-Chlorotoluene			2.386	2.198	2.292	2.324	2.292	2.254	2.170	2.314	2.279	3.06
71)	T	1,2,3-Trichlor...				0.187	0.210	0.205	0.199	0.200	0.191	0.200	0.199	3.97
72)	T	trans-1,4-Dich...					0.117	0.137	0.162	0.163	0.151	0.160	0.148	12.16
73)	T	1,2,4-Trimethy...			2.943	2.640	2.798	2.903	2.859	2.845	2.747	2.748	2.810	3.47
74)	T	4-Chlorotoluene			2.343	2.198	2.273	2.309	2.286	2.278	2.179	2.332	2.275	2.59
75)	T	tert-Butylbenzene			0.586	0.535	0.564	0.572	0.558	0.549	0.530	0.561	0.557	3.32
76)	T	sec-Butylbenzene			3.659	3.288	3.403	3.563	3.490	3.493	3.283	3.287	3.433	4.13
77)	T	p-Isopropyltol...			3.074	2.747	2.850	3.010	3.003	3.034	2.869	2.827	2.927	4.03
78)	T	1,3-Dichlorobe...			1.858	1.620	1.702	1.733	1.715	1.724	1.659	1.703	1.714	4.03
79)	T	1,4-Dichlorobe...		1.966	1.849	1.636	1.697	1.726	1.676	1.707	1.646	1.674	1.731	6.25
80)	T	n-Butylbenzene			2.652	2.263	2.273	2.525	2.497	2.628	2.473	2.450	2.470	5.81
81)	T	1,2-Dichlorobe...		1.682	1.851	1.580	1.672	1.685	1.675	1.679	1.623	1.591	1.671	4.72
82)	T	1,2-Dibromo-3-...				0.106	0.124	0.124	0.125	0.133	0.131	0.121	0.123	6.94
83)	T	Hexachlorobuta...			0.813	0.679	0.669	0.716	0.682	0.733	0.684	0.658	0.704	7.14
84)	T	1,2,4-Trichlor...			1.286	1.140	1.150	1.242	1.250	1.332	1.289	1.240	1.241	5.39
85)	T	Naphthalene			2.524	2.180	2.327	2.511	2.473	2.606	2.480	2.261	2.420	6.08
86)	T	1,2,3-Trichlor...		1.286	1.267	1.117	1.171	1.220	1.198	1.264	1.182	1.145	1.206	4.84

(#) = Out of Range

826VMS.M Thu Apr 27 10:23:42 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Calibration: Thu Apr 13 16:40:13 2017
Curve: WG609829
Calibration Files

	Compound	5 8M418916.D	20 8M418917.D	50 8M418918.D	100 8M418919.D	200 8M418920.D	300 8M418921.D	400 8M418922.D	500 8M418923.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile		0.013	0.012	0.013	0.013	0.012	0.013	0.013	0.013	3.572
T	3-Chloro-1-propene	0.312	0.315	0.327	0.337	0.346	0.341	0.344	0.341	0.333	3.984
T	2-Chloro-1,3-butadiene	0.285	0.299	0.317	0.330	0.340	0.336	0.337	0.336	0.322	6.267
T	Ethyl Acetate	0.099	0.101	0.098	0.101	0.108	0.103	0.106	0.109	0.103	4.045
T	Methacrylonitrile	0.052	0.059	0.057	0.059	0.064	0.061	0.063	0.065	0.060	7.025
T	Isobutyl Alcohol			0.003	0.004	0.004	0.004	0.005	0.005	0.004	12.096
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.096	0.101	0.103	0.107	0.116	0.112	0.116	0.121	0.109	7.922
T	2-Nitropropane		0.027	0.028	0.031	0.034	0.034	0.035	0.037	0.032	11.358
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.006	0.006	0.007	0.008	0.007	0.008	0.009	0.007	13.841

Mon Apr 17 15:45:45 2017

Calibration Table Report
Method: 8260WT.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Calibration: Tue Apr 18 08:45:38 2017
Curve: WG610410
Calibration Files

	Compound	0.3 8M419002.D	0.4 8M419003.D	1 8M419004.D	2 8M419005.D	5 8M419006.D	20 8M419007.D	50 8M419008.D	100 8M419009.D	200 8M419010.D	300 8M419011.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.313	0.289	0.277	0.384	0.370	0.362	0.373		0.338	13.019		
P	Chloromethane			0.456	0.440	0.417	0.437	0.403	0.401	0.407		0.423	5.087		
C	Vinyl Chloride		0.426	0.430	0.414	0.394	0.429	0.389	0.367	0.347		0.399	7.750		
T	1,3-Butadiene					0.273	0.246	0.164	0.130	0.118	0.112	0.174	39.828		1.000
T	Bromomethane			0.064	0.068	0.074	0.124	0.149	0.181			0.110	44.154		1.001
T	Chloroethane		0.162	0.163	0.173	0.171	0.183	0.177	0.180	0.186		0.174	5.074		
T	Trichlorofluoromethane		0.393	0.462	0.411	0.420	0.452	0.436	0.437	0.459		0.434	5.614		
T	Diethyl ether			0.159	0.160	0.163	0.158	0.160	0.167		0.176	0.163	3.861		
T	Isoprene					0.316	0.325	0.346	0.353	0.353	0.366	0.343	5.533		
T	Acrolein				0.022	0.023	0.021	0.022	0.024		0.024	0.023	4.706		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.251	0.228	0.237	0.253	0.250	0.252	0.261		0.247	4.440		
T	Acetone					0.036	0.033	0.036	0.037	0.034	0.035	0.035	4.082		
C	1,1-Dichloroethene		0.331	0.366	0.344	0.349	0.377	0.371	0.376	0.383		0.362	5.154		
T	Tert-Butyl Alcohol				0.010	0.012	0.011	0.011	0.011		0.013	0.011	10.980		
T	Dimethyl Sulfide					0.232	0.226	0.240	0.246	0.249	0.255	0.241	4.476		
T	Iodomethane					0.026	0.067	0.121	0.154	0.164	0.116	0.108	48.714	NO CAL	
T	Methyl acetate					0.099	0.091	0.097	0.098	0.093	0.100	0.096	3.655		
T	Methylene Chloride			0.271	0.245	0.249	0.263	0.258	0.264	0.272		0.260	3.943		
T	Carbon Disulfide			0.794	0.744	0.746	0.729	0.763	0.767	0.766	0.713	0.753	3.339		
T	Acrylonitrile			0.043	0.045	0.049	0.049	0.053	0.054		0.049	0.049	8.214		
T	Methyl Tert Butyl Ether			0.495	0.474	0.502	0.530	0.528	0.543	0.517		0.513	4.642		
T	trans-1,2-Dichloroethene		0.342	0.345	0.349	0.334	0.360	0.353	0.363	0.373		0.352	3.537		
T	n-Hexane					0.301	0.278	0.290	0.295	0.300	0.301	0.294	2.997		
T	Diisopropyl ether			0.776	0.794	0.805	0.792	0.783	0.801		0.768	0.788	1.708		
T	Vinyl Acetate					0.353	0.350	0.359	0.366	0.348	0.345	0.354	2.233		
P	1,1-Dichloroethane		0.405	0.460	0.437	0.441	0.474	0.462	0.473	0.476		0.453	5.418		
T	Ethyl-Tert-Butyl ether			0.651	0.652	0.684	0.667	0.669	0.693		0.679	0.671	2.398		
T	2-Butanone					0.053	0.052	0.056	0.058	0.053	0.059	0.055	5.073		
T	Propionitrile			0.015	0.016	0.018	0.017	0.017	0.018		0.019	0.017	7.523		
T	2,2-Dichloropropane		0.336	0.387	0.384	0.373	0.399	0.387	0.396	0.399		0.383	5.430		
T	cis-1,2-Dichloroethene		0.263	0.287	0.282	0.286	0.300	0.296	0.305	0.311		0.291	5.182		
C	Chloroform	0.619	0.539	0.514	0.499	0.459	0.479	0.467	0.473	0.471		0.502	10.092		
T	1-Bromopropane			0.057	0.053	0.055	0.056	0.057	0.059	0.061	0.061	0.057	5.096		
T	Bromochloromethane		0.118	0.150	0.156	0.160	0.167	0.167	0.170	0.168		0.157	11.011		
T	Tetrahydrofuran			0.039	0.035	0.038	0.036	0.038	0.040		0.039	0.038	4.497		
S	Dibromofluoromethane				0.251	0.244	0.261	0.272	0.265	0.269	0.273	0.262	4.105		
T	1,1,1-Trichloroethane		0.337	0.406	0.380	0.394	0.426	0.420	0.431	0.450		0.405	8.684		
T	Cyclohexane			0.371	0.358	0.372	0.358	0.379	0.389	0.403	0.391	0.377	4.255		
T	1,1-Dichloropropene			0.354	0.340	0.337	0.363	0.353	0.359	0.371		0.354	3.449		
T	Tert-Amyl-Methyl ether			0.568	0.579	0.618	0.598	0.602	0.629		0.609	0.600	3.552		
T	Carbon Tetrachloride		0.288	0.38	0.359	0.363	0.404	0.394	0.41	0.411		0.3759	10.8547		
S	1,2-Dichloroethane-d4				0.215	0.219	0.227	0.237	0.23	0.224	0.235	0.2267	3.56551		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.247	0.28	0.273	0.279	0.298	0.293	0.305	0.299		0.284	6.56007		
T	Benzene		1.013	1.058	1.034	1.013	1.082	1.044	1.045	0.975		1.0328	3.16185		
T	Trichloroethene		0.28	0.291	0.275	0.274	0.294	0.29	0.302	0.315		0.2901	4.79714		
T	Methylcyclohexane					0.371	0.369	0.386	0.392	0.4	0.402	0.3867	3.65443		
C	1,2-Dichloropropane		0.235	0.244	0.249	0.243	0.257	0.256	0.264	0.269		0.2522	4.51345		
T	Bromodichloromethane		0.273	0.313	0.319	0.319	0.35	0.347	0.359	0.361		0.3301	9.09766		
T	1,4-Dioxane					0.001	0.001	0.002	0.002		0.002	0.0014	8.93532		
T	Dibromomethane		0.101	0.125	0.129	0.129	0.138	0.136	0.14	0.14		0.1298	9.96462		
T	2-Chloroethyl Vinyl Ether				0.091	0.101	0.106	0.114	0.116	0.114	0.122	0.1091	9.65313		
T	4-Methyl-2-Pentanone					0.042	0.045	0.05	0.051	0.049	0.055	0.0489	9.48763		
T	cis-1,3-Dichloropropene		0.303	0.354	0.349	0.364	0.401	0.404	0.417	0.416		0.3759	10.7244		

T	Dimethyl Disulfide					0.133	0.169	0.201	0.215	0.226	0.237	0.1968	19.8258	0.998
I	Chlorobenzene-d5	ISTD												
S	Toluene-d8				1.126	1.107	1.183	1.185	1.136	1.123	1.136	1.1423	2.63592	
C	Toluene		1.276	1.435	1.421	1.416	1.507	1.432	1.412	1.234		1.3916	6.46773	
T	Ethyl Methacrylate			0.208	0.222	0.252	0.262	0.287	0.29	0.277	0.303	0.2625	12.7656	
T	Paraldehyde											0	0	
T	trans-1,3-Dichloropropene			0.367	0.363	0.389	0.421	0.422	0.44	0.423		0.4036	7.59969	
T	1,1,2-Trichloroethane		0.21	0.235	0.224	0.228	0.239	0.229	0.237	0.23		0.2289	4.06629	
T	2-Hexanone					0.048	0.053	0.058	0.06	0.054	0.063	0.0562	9.63322	
T	1,3-Dichloropropane		0.353	0.405	0.372	0.373	0.41	0.397	0.403	0.383		0.387	5.15702	
T	Tetrachloroethene		0.245	0.284	0.279	0.285	0.31	0.295	0.312	0.328		0.2923	8.65757	
T	Dibromochloromethane		0.232	0.267	0.271	0.289	0.315	0.318	0.333	0.328		0.2942	12.052	
T	1,2-Dibromoethane		0.188	0.209	0.218	0.222	0.242	0.236	0.241	0.233		0.2236	8.21869	
T	1-Chlorohexane		0.385	0.44	0.423	0.428	0.44	0.451	0.457	0.466	0.472	0.4403	5.99946	
P	Chlorobenzene		1.008	0.965	0.972	0.936	1.008	0.988	1.042	1.006		0.9906	3.29062	
T	1,1,1,2-Tetrachloroethane		0.303	0.316	0.32	0.335	0.379	0.385	0.423			0.3515	12.6454	
C	Ethylbenzene		0.467	0.5	0.532	0.513	0.574	0.568	0.62	0.665		0.5548	11.7603	
T	m-,p-Xylene		0.572	0.637	0.62	0.627	0.689	0.677	0.694	0.623		0.6425	6.46237	
T	o-Xylene			0.611	0.592	0.623	0.665	0.648	0.68	0.703		0.6459	6.13337	
T	Styrene		0.814	0.93	0.929	0.995	1.114	1.111	1.142	1.067		1.0127	11.3997	
P	Bromoform			0.125	0.142	0.163	0.191	0.196	0.207	0.207		0.176	18.66	0.999
T	Isopropylbenzene		1.463	1.551	1.54	1.592	1.678	1.613	1.576	1.361		1.5466	6.28276	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.385	0.493	0.455	0.465	0.508	0.494	0.502	0.472		0.4717	8.42371	
S	p-Bromofluorobenzene				0.897	0.839	0.876	0.891	0.86	0.878	0.935	0.8823	3.42248	
T	1,2,3-Trichloropropane			0.117	0.127	0.131	0.143	0.144	0.146	0.138		0.1352	7.82469	
T	trans-1,4-Dichloro-2-Butene			0.058	0.065	0.085	0.109	0.122	0.115	0.114	0.116	0.0978	25.7933	1.000
T	n-Propylbenzene		3.478	3.723	3.692	3.608	3.807	3.577	3.383	2.726		3.4991	9.72861	
T	Bromobenzene	0.752	0.696	0.839	0.81	0.813	0.857	0.845	0.872	0.896		0.8199	7.58093	
T	1,3,5-Trimethylbenzene		2.467	2.514	2.525	2.506	2.737	2.623	2.589	2.306		2.5336	4.94471	
T	2-Chlorotoluene		2.674	2.623	2.305	2.553	2.347	2.198	2.2	2.21		2.3888	8.30021	
T	4-Chlorotoluene		1.995	2.135	2.439	1.867	2.369	2.326	2.308	1.784		2.1528	11.4607	
T	a-Methylstyrene					1.296	1.355	1.455	1.517	1.498	1.401	1.4204	6.02416	
T	tert-Butylbenzene			0.52	0.555	0.528	0.588	0.571	0.601	0.653		0.5736	7.96677	
T	1,2,4-Trimethylbenzene		2.284	2.607	2.62	2.578	2.817	2.742	2.701	2.343		2.5866	7.19751	
T	sec-Butylbenzene			3.278	3.292	3.183	3.429	3.252	3.145	2.633		3.1733	8.03336	
T	p-Isopropyltoluene			2.64	2.605	2.626	2.913	2.796	2.737	2.387		2.6721	6.23483	
T	1,3-Dichlorobenzene		1.502	1.596	1.568	1.535	1.665	1.625	1.642	1.581		1.5891	3.4371	
T	1,4-Dichlorobenzene	1.772	1.622	1.643	1.594	1.517	1.637	1.592	1.618	1.545		1.6156	4.45875	
T	n-Butylbenzene			2.426	2.337	2.245	2.632	2.542	2.483	2.184		2.407	6.69686	
T	1,2-Dichlorobenzene	1.368	1.185	1.488	1.397	1.379	1.46	1.438	1.454	1.396		1.396	6.36818	
T	1,2-Dibromo-3-Chloropropane				0.073	0.072	0.076	0.079	0.083	0.077		0.0768	5.09915	
T	1,2,4-Trichlorobenzene		0.864	0.92	0.882	0.852	0.952	0.983	1.022	1.044		0.9399	7.72424	
T	Hexachlorobutadiene		0.405	0.427	0.426	0.402	0.449	0.44	0.456	0.493		0.4374	6.74711	
T	Naphthalene		1.353	1.273	1.232	1.251	1.396	1.436	1.465	1.339		1.3431	6.41915	
T	1,2,3-Trichlorobenzene	0.796	0.766	0.75	0.705	0.691	0.802	0.821	0.847	0.847		0.7805	7.29917	

Tue Apr 18 12:15:24 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number:L17041075 Run Date:04/26/2017 Sample ID:WG611454-12
Instrument ID:HPMS17 Run Time:01:35 Method:8260B
File ID:17M0273015 Analyst:FJB QC Key:AF40
ICal Workgroup:WG611454 Cal ID:HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.1	ug/L	0.333	13.7	25	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.272	2.70	25	
Chloroform	CCC	50.0	48.9	ug/L	0.481	2.20	25	
Ethylbenzene	CCC	50.0	47.5	ug/L	0.521	4.90	25	
Toluene	CCC	50.0	47.2	ug/L	1.48	5.60	25	
Vinyl Chloride	CCC	50.0	60.9	ug/L	0.392	21.9	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.2	ug/L	0.608	9.70	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.452	4.20	25	
Bromoform	SPCC	50.0	49.0	ug/L	0.286	2.00	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.992	5.70	25	
Chloromethane	SPCC	50.0	59.6	ug/L	0.347	19.2	25	
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.384	6.30	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.432	0.100	25	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.282	7.20	25	
1,1-Dichloropropene		50.0	47.9	ug/L	0.326	4.20	25	
1,2,3-Trichlorobenzene		50.0	45.4	ug/L	1.09	9.20	25	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.183	7.90	25	
1,2,4-Trichlorobenzene		50.0	47.7	ug/L	1.19	4.50	25	
1,2,4-Trimethylbenzene		50.0	45.9	ug/L	2.58	8.10	25	
1,2-Dichloroethane		50.0	47.3	ug/L	0.314	5.40	25	
1,2-Dichlorobenzene		50.0	46.1	ug/L	1.54	7.80	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.116	6.10	25	
1,2-Dibromoethane		50.0	46.5	ug/L	0.289	7.00	25	
1,3,5-Trimethylbenzene		50.0	45.9	ug/L	2.56	8.30	25	
1,3-Dichlorobenzene		50.0	44.6	ug/L	1.53	10.8	25	
1,3-Dichloropropane		50.0	48.4	ug/L	0.467	3.20	25	
1,4-Dichlorobenzene		50.0	45.0	ug/L	1.56	9.90	25	
1-Chlorohexane		50.0	51.7	ug/L	0.0879	3.50	25	
2,2-Dichloropropane		50.0	43.4	ug/L	0.325	13.2	25	
2-Hexanone		50.0	53.8	ug/L	0.172	7.60	25	
2-Chlorotoluene		50.0	44.5	ug/L	2.03	11.0	25	
4-Chlorotoluene		50.0	45.9	ug/L	2.09	8.20	25	
Acetone		50.0	49.5	ug/L	0.0498	0.900	25	
Benzene		50.0	47.5	ug/L	1.01	5.00	25	
Bromobenzene		50.0	45.0	ug/L	0.886	9.90	25	
Bromochloromethane		50.0	49.2	ug/L	0.189	1.50	25	
Bromodichloromethane		50.0	47.9	ug/L	0.357	4.20	25	
Bromomethane		50.0	43.3	ug/L	0.207	13.3	25	
Carbon Disulfide		50.0	43.8	ug/L	0.727	12.3	25	
Carbon Tetrachloride		50.0	49.0	ug/L	0.382	1.90	25	
Chloroethane		50.0	41.7	ug/L	0.127	16.5	25	
cis-1,2-Dichloroethene		50.0	48.4	ug/L	0.288	3.30	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5261418
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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	51.0	ug/L	0.429	2.10	25	
Dibromochloromethane		50.0	47.4	ug/L	0.393	5.20	25	
Dibromomethane		50.0	48.8	ug/L	0.159	2.40	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.398	34.1	25	*
Hexachlorobutadiene		50.0	43.5	ug/L	0.613	13.0	25	
Isopropylbenzene		50.0	46.8	ug/L	1.58	6.30	25	
Methylene Chloride		50.0	44.4	ug/L	0.260	11.2	25	
Methyl Tert Butyl Ether		50.0	51.4	ug/L	0.687	2.90	25	
2-Butanone		50.0	50.4	ug/L	0.0756	0.800	25	
4-Methyl-2-Pentanone		50.0	51.9	ug/L	0.0721	3.90	25	
n-Butylbenzene		50.0	45.9	ug/L	2.27	8.30	25	
n-Propylbenzene		50.0	44.5	ug/L	3.28	11.1	25	
m-,p-Xylene		100	95.8	ug/L	0.633	4.20	25	
Naphthalene		50.0	47.0	ug/L	2.28	6.00	25	
o-Xylene		50.0	48.1	ug/L	0.627	3.70	25	
p-Isopropyltoluene		50.0	45.9	ug/L	2.69	8.20	25	
sec-Butylbenzene		50.0	44.7	ug/L	3.07	10.5	25	
Styrene		50.0	49.9	ug/L	1.04	0.200	25	
Trichloroethene		50.0	48.3	ug/L	0.309	3.30	25	
tert-Butylbenzene		50.0	44.7	ug/L	0.498	10.6	25	
Tetrachloroethene		50.0	46.6	ug/L	0.417	6.70	25	
trans-1,2-Dichloroethene		50.0	47.0	ug/L	0.247	6.00	25	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.345	3.50	25	
Trichlorofluoromethane		50.0	32.0	ug/L	0.264	36.0	25	*

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5261418
Report generated 07/25/2017 16:08

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041075 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.0	ug/L	0.340	6.00	25	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.239	5.40	25	
Chloroform	CCC	50.0	44.7	ug/L	0.449	10.6	25	
Ethylbenzene	CCC	50.0	48.9	ug/L	0.543	2.20	25	
Toluene	CCC	50.0	48.5	ug/L	1.35	2.90	25	
Vinyl Chloride	CCC	50.0	45.4	ug/L	0.363	9.20	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.7	ug/L	0.431	8.60	25	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.432	4.80	25	
Bromoform	SPCC	50.0	42.9	ug/L	0.175	14.2	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.934	5.70	25	
Chloromethane	SPCC	50.0	48.6	ug/L	0.411	2.80	25	
1,1,1,2-Tetrachloroethane		50.0	50.3	ug/L	0.354	0.600	25	
1,1,1-Trichloroethane		50.0	50.8	ug/L	0.412	1.60	25	
1,1,2-Trichloroethane		50.0	45.3	ug/L	0.208	9.40	25	
1,1-Dichloropropene		50.0	47.3	ug/L	0.335	5.50	25	
1,2,3-Trichlorobenzene		50.0	48.7	ug/L	0.761	2.50	25	
1,2,3-Trichloropropane		50.0	47.0	ug/L	0.127	6.10	25	
1,2,4-Trichlorobenzene		50.0	49.0	ug/L	0.922	1.90	25	
1,2,4-Trimethylbenzene		50.0	49.9	ug/L	2.58	0.100	25	
1,2-Dichloroethane		50.0	47.2	ug/L	0.268	5.50	25	
1,2-Dichlorobenzene		50.0	47.2	ug/L	1.32	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	44.0	ug/L	0.0676	12.0	25	
1,2-Dibromoethane		50.0	47.1	ug/L	0.211	5.80	25	
1,3,5-Trimethylbenzene		50.0	48.9	ug/L	2.48	2.10	25	
1,3-Dichlorobenzene		50.0	47.4	ug/L	1.51	5.30	25	
1,3-Dichloropropane		50.0	47.2	ug/L	0.365	5.60	25	
1,4-Dichlorobenzene		50.0	46.2	ug/L	1.49	7.70	25	
1-Chlorohexane		50.0	52.1	ug/L	0.459	4.20	25	
2,2-Dichloropropane		50.0	46.7	ug/L	0.357	6.60	25	
2-Hexanone		50.0	48.3	ug/L	0.0543	3.40	25	
2-Chlorotoluene		50.0	44.1	ug/L	2.11	11.7	25	
4-Chlorotoluene		50.0	49.6	ug/L	2.14	0.800	25	
Acetone		50.0	43.2	ug/L	0.0304	13.6	25	
Benzene		50.0	47.6	ug/L	0.983	4.90	25	
Bromobenzene		50.0	48.1	ug/L	0.789	3.70	25	
Bromochloromethane		50.0	49.4	ug/L	0.155	1.20	25	
Bromodichloromethane		50.0	48.0	ug/L	0.317	4.00	25	
Bromomethane		50.0	43.6	ug/L	0.123	12.7	25	
Carbon Disulfide		50.0	43.4	ug/L	0.653	13.2	25	
Carbon Tetrachloride		50.0	50.2	ug/L	0.377	0.300	25	
Chloroethane		50.0	53.1	ug/L	0.185	6.10	25	
cis-1,2-Dichloroethene		50.0	48.0	ug/L	0.279	4.00	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041075 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	50.6	ug/L	0.380	1.10	25	
Dibromochloromethane		50.0	48.3	ug/L	0.284	3.40	25	
Dibromomethane		50.0	47.4	ug/L	0.123	5.20	25	
Dichlorodifluoromethane		50.0	56.3	ug/L	0.381	12.6	25	
Hexachlorobutadiene		50.0	48.6	ug/L	0.425	2.90	25	
Isopropylbenzene		50.0	49.5	ug/L	1.53	1.10	25	
Methylene Chloride		50.0	46.7	ug/L	0.243	6.60	25	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.472	7.90	25	
2-Butanone		50.0	43.5	ug/L	0.0479	13.1	25	
4-Methyl-2-Pentanone		50.0	45.4	ug/L	0.0444	9.20	25	
n-Butylbenzene		50.0	49.9	ug/L	2.40	0.200	25	
n-Propylbenzene		50.0	47.3	ug/L	3.31	5.40	25	
m-,p-Xylene		100	102	ug/L	0.654	1.70	25	
Naphthalene		50.0	48.1	ug/L	1.29	3.90	25	
o-Xylene		50.0	48.1	ug/L	0.622	3.70	25	
p-Isopropyltoluene		50.0	50.0	ug/L	2.67	0	25	
sec-Butylbenzene		50.0	47.9	ug/L	3.04	4.30	25	
Styrene		50.0	52.7	ug/L	1.07	5.40	25	
Trichloroethene		50.0	47.5	ug/L	0.276	5.00	25	
tert-Butylbenzene		50.0	48.1	ug/L	0.552	3.80	25	
Tetrachloroethene		50.0	50.6	ug/L	0.296	1.20	25	
trans-1,2-Dichloroethene		50.0	47.3	ug/L	0.333	5.40	25	
trans-1,3-Dichloropropene		50.0	46.6	ug/L	0.376	6.90	25	
Trichlorofluoromethane		50.0	48.6	ug/L	0.421	2.90	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5261418
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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/24/2017 Sample ID: WG611300-02

Instrument ID: HPMS8 Run Time: 11:42 Method: 8260B

File ID: 8M419116 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611301 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.5	ug/L	0.373	3.06	20	
1,2-Dichloropropane	CCC	50.0	49.6	ug/L	0.251	0.702	20	
Chloroform	CCC	50.0	46.4	ug/L	0.467	7.13	20	
Ethylbenzene	CCC	50.0	50.1	ug/L	0.556	0.208	20	
Toluene	CCC	50.0	51.2	ug/L	1.42	2.37	20	
Vinyl Chloride	CCC	50.0	51.0	ug/L	0.408	2.03	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.4	ug/L	0.448	5.11	20	
1,1-Dichloroethane	SPCC	50.0	50.9	ug/L	0.462	1.85	20	
Bromoform	SPCC	50.0	45.8	ug/L	0.186	8.48	20	
Chlorobenzene	SPCC	50.0	48.9	ug/L	0.969	2.14	20	
Chloromethane	SPCC	50.0	51.2	ug/L	0.433	2.32	20	
Xylenes		150	154	ug/L	0.658	2.98	20	
1,1,1,2-Tetrachloroethane		50.0	52.9	ug/L	0.372	5.73	20	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.425	4.75	20	
1,1,2-Trichloroethane		50.0	47.7	ug/L	0.219	4.52	20	
1,1-Dichloropropene		50.0	50.7	ug/L	0.359	1.34	20	
1,2,3-Trichlorobenzene		50.0	48.1	ug/L	0.750	3.87	20	
1,2,3-Trichloropropane		50.0	47.1	ug/L	0.127	5.79	20	
1,2,4-Trichlorobenzene		50.0	48.6	ug/L	0.914	2.76	20	
1,2,4-Trimethylbenzene		50.0	51.7	ug/L	2.67	3.38	20	
1,2-Dichloroethane		50.0	50.2	ug/L	0.285	0.313	20	
1,2-Dichlorobenzene		50.0	48.5	ug/L	1.35	3.00	20	
1,2-Dibromo-3-Chloropropane		50.0	45.2	ug/L	0.0694	9.66	20	
1,2-Dibromoethane		50.0	49.3	ug/L	0.221	1.36	20	
1,3,5-Trimethylbenzene		50.0	50.6	ug/L	2.56	1.10	20	
1,3-Dichlorobenzene		50.0	48.8	ug/L	1.55	2.39	20	
1,3-Dichloropropane		50.0	48.0	ug/L	0.372	3.92	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.53	5.36	20	
1-Chlorohexane		50.0	55.0	ug/L	0.484	9.99	20	
2,2-Dichloropropane		50.0	54.1	ug/L	0.414	8.28	20	
2-Hexanone		50.0	45.3	ug/L	0.0509	9.47	20	
2-Chlorotoluene		50.0	45.3	ug/L	2.17	9.35	20	
4-Chlorotoluene		50.0	51.5	ug/L	2.22	3.04	20	
Acetone		50.0	48.7	ug/L	0.0343	2.58	20	
Benzene		50.0	50.6	ug/L	1.04	1.11	20	
Bromobenzene		50.0	48.8	ug/L	0.800	2.47	20	
Bromochloromethane		50.0	51.6	ug/L	0.162	3.14	20	
Bromodichloromethane		50.0	51.7	ug/L	0.342	3.48	20	
Bromomethane		50.0	60.2	ug/L	0.184	20.4	20	*
Carbon Disulfide		50.0	58.3	ug/L	0.877	16.5	20	
Carbon Tetrachloride		50.0	53.2	ug/L	0.400	6.33	20	
Chloroethane		50.0	51.4	ug/L	0.179	2.73	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/24/2017 Sample ID: WG611300-02

Instrument ID: HPMS8 Run Time: 11:42 Method: 8260B

File ID: 8M419116 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611301 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	51.1	ug/L	0.297	2.12	20	
cis-1,3-Dichloropropene		50.0	52.9	ug/L	0.398	5.84	20	
Dibromochloromethane		50.0	52.0	ug/L	0.306	4.07	20	
Dibromomethane		50.0	51.0	ug/L	0.132	1.91	20	
Dichlorodifluoromethane		50.0	55.4	ug/L	0.375	10.7	20	
Hexachlorobutadiene		50.0	49.8	ug/L	0.436	0.368	20	
Isopropylbenzene		50.0	51.7	ug/L	1.60	3.49	20	
Methylene Chloride		50.0	48.7	ug/L	0.254	2.56	20	
Methyl Tert Butyl Ether		50.0	49.2	ug/L	0.505	1.59	20	
2-Butanone		50.0	46.4	ug/L	0.0511	7.28	20	
4-Methyl-2-Pentanone		50.0	46.3	ug/L	0.0453	7.42	20	
n-Butylbenzene		50.0	52.4	ug/L	2.52	4.89	20	
n-Propylbenzene		50.0	50.5	ug/L	3.54	1.08	20	
m-,p-Xylene		100	105	ug/L	0.673	4.70	20	
Naphthalene		50.0	45.3	ug/L	1.22	9.32	20	
o-Xylene		50.0	49.8	ug/L	0.643	0.484	20	
p-Isopropyltoluene		50.0	51.8	ug/L	2.77	3.64	20	
sec-Butylbenzene		50.0	50.3	ug/L	3.19	0.677	20	
Styrene		50.0	53.8	ug/L	1.09	7.61	20	
Trichloroethene		50.0	49.9	ug/L	0.290	0.122	20	
tert-Butylbenzene		50.0	48.8	ug/L	0.560	2.41	20	
Tetrachloroethene		50.0	51.7	ug/L	0.302	3.40	20	
trans-1,2-Dichloroethene		50.0	50.3	ug/L	0.355	0.664	20	
trans-1,3-Dichloropropene		50.0	50.5	ug/L	0.408	1.07	20	
Trichlorofluoromethane		50.0	51.4	ug/L	0.446	2.72	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/25/2017 Sample ID: WG611407-02

Instrument ID: HPMS8 Run Time: 12:44 Method: 8260B

File ID: 8M419139 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611408 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.0	ug/L	0.376	3.96	20	
1,2-Dichloropropane	CCC	50.0	51.2	ug/L	0.258	2.34	20	
Chloroform	CCC	50.0	46.7	ug/L	0.470	6.54	20	
Ethylbenzene	CCC	50.0	50.5	ug/L	0.560	0.963	20	
Toluene	CCC	50.0	51.2	ug/L	1.42	2.35	20	
Vinyl Chloride	CCC	50.0	51.4	ug/L	0.410	2.76	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	51.7	ug/L	0.488	3.45	20	
1,1-Dichloroethane	SPCC	50.0	51.3	ug/L	0.465	2.54	20	
Bromoform	SPCC	50.0	47.9	ug/L	0.195	4.22	20	
Chlorobenzene	SPCC	50.0	49.4	ug/L	0.979	1.16	20	
Chloromethane	SPCC	50.0	52.8	ug/L	0.446	5.55	20	
Xylenes		150	156	ug/L	0.662	3.72	20	
1,1,1,2-Tetrachloroethane		50.0	53.9	ug/L	0.379	7.74	20	
1,1,1-Trichloroethane		50.0	53.1	ug/L	0.430	6.18	20	
1,1,2-Trichloroethane		50.0	50.7	ug/L	0.232	1.37	20	
1,1-Dichloropropene		50.0	52.3	ug/L	0.370	4.58	20	
1,2,3-Trichlorobenzene		50.0	51.2	ug/L	0.799	2.40	20	
1,2,3-Trichloropropane		50.0	50.8	ug/L	0.137	1.50	20	
1,2,4-Trichlorobenzene		50.0	51.2	ug/L	0.962	2.32	20	
1,2,4-Trimethylbenzene		50.0	51.7	ug/L	2.68	3.44	20	
1,2-Dichloroethane		50.0	52.3	ug/L	0.297	4.54	20	
1,2-Dichlorobenzene		50.0	49.6	ug/L	1.39	0.775	20	
1,2-Dibromo-3-Chloropropane		50.0	50.0	ug/L	0.0767	0.0502	20	
1,2-Dibromoethane		50.0	52.2	ug/L	0.233	4.32	20	
1,3,5-Trimethylbenzene		50.0	50.5	ug/L	2.56	0.993	20	
1,3-Dichlorobenzene		50.0	49.4	ug/L	1.57	1.13	20	
1,3-Dichloropropane		50.0	50.7	ug/L	0.393	1.47	20	
1,4-Dichlorobenzene		50.0	48.0	ug/L	1.55	3.93	20	
1-Chlorohexane		50.0	55.1	ug/L	0.486	10.3	20	
2,2-Dichloropropane		50.0	55.0	ug/L	0.421	9.93	20	
2-Hexanone		50.0	52.0	ug/L	0.0584	3.99	20	
2-Chlorotoluene		50.0	46.2	ug/L	2.21	7.51	20	
4-Chlorotoluene		50.0	51.3	ug/L	2.21	2.66	20	
Acetone		50.0	51.9	ug/L	0.0365	3.84	20	
Benzene		50.0	51.1	ug/L	1.06	2.24	20	
Bromobenzene		50.0	49.5	ug/L	0.811	1.04	20	
Bromochloromethane		50.0	52.7	ug/L	0.166	5.41	20	
Bromodichloromethane		50.0	53.3	ug/L	0.352	6.51	20	
Bromomethane		50.0	57.3	ug/L	0.173	14.6	20	
Carbon Disulfide		50.0	56.9	ug/L	0.856	13.7	20	
Carbon Tetrachloride		50.0	54.3	ug/L	0.408	8.54	20	
Chloroethane		50.0	51.7	ug/L	0.180	3.37	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/25/2017 Sample ID: WG611407-02
Instrument ID: HPMS8 Run Time: 12:44 Method: 8260B
File ID: 8M419139 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG611408 Cal ID: HPMS8 - 17-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	50.9	ug/L	0.297	1.88	20	
cis-1,3-Dichloropropene		50.0	55.3	ug/L	0.416	10.5	20	
Dibromochloromethane		50.0	53.5	ug/L	0.315	7.06	20	
Dibromomethane		50.0	53.3	ug/L	0.138	6.56	20	
Dichlorodifluoromethane		50.0	55.2	ug/L	0.374	10.5	20	
Hexachlorobutadiene		50.0	48.8	ug/L	0.427	2.45	20	
Isopropylbenzene		50.0	52.3	ug/L	1.62	4.51	20	
Methylene Chloride		50.0	50.3	ug/L	0.262	0.507	20	
Methyl Tert Butyl Ether		50.0	52.1	ug/L	0.534	4.16	20	
2-Butanone		50.0	52.4	ug/L	0.0577	4.73	20	
4-Methyl-2-Pentanone		50.0	52.9	ug/L	0.0517	5.71	20	
n-Butylbenzene		50.0	52.3	ug/L	2.52	4.50	20	
n-Propylbenzene		50.0	50.8	ug/L	3.56	1.64	20	
m-,p-Xylene		100	106	ug/L	0.678	5.59	20	
Naphthalene		50.0	53.3	ug/L	1.43	6.59	20	
o-Xylene		50.0	50.0	ug/L	0.646	0.0280	20	
p-Isopropyltoluene		50.0	51.2	ug/L	2.74	2.37	20	
sec-Butylbenzene		50.0	50.4	ug/L	3.20	0.831	20	
Styrene		50.0	54.0	ug/L	1.09	8.00	20	
Trichloroethene		50.0	50.3	ug/L	0.292	0.582	20	
tert-Butylbenzene		50.0	48.7	ug/L	0.559	2.62	20	
Tetrachloroethene		50.0	51.7	ug/L	0.302	3.43	20	
trans-1,2-Dichloroethene		50.0	51.1	ug/L	0.360	2.15	20	
trans-1,3-Dichloropropene		50.0	53.3	ug/L	0.430	6.51	20	
Trichlorofluoromethane		50.0	51.9	ug/L	0.450	3.76	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611560-02

Instrument ID: HPMS8 Run Time: 08:22 Method: 8260B

File ID: 8M419165 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611561 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.1	ug/L	0.385	6.19	20	
1,2-Dichloropropane	CCC	50.0	51.2	ug/L	0.259	2.48	20	
Chloroform	CCC	50.0	47.4	ug/L	0.476	5.23	20	
Ethylbenzene	CCC	50.0	53.7	ug/L	0.596	7.46	20	
Toluene	CCC	50.0	53.2	ug/L	1.48	6.35	20	
Vinyl Chloride	CCC	50.0	54.8	ug/L	0.438	9.54	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.4	ug/L	0.475	0.769	20	
1,1-Dichloroethane	SPCC	50.0	52.5	ug/L	0.476	5.04	20	
Bromoform	SPCC	50.0	45.1	ug/L	0.184	9.77	20	
Chlorobenzene	SPCC	50.0	51.0	ug/L	1.01	2.01	20	
Chloromethane	SPCC	50.0	51.7	ug/L	0.437	3.36	20	
Xylenes		150	162	ug/L	0.689	8.05	20	
1,1,1,2-Tetrachloroethane		50.0	55.0	ug/L	0.387	10.1	20	
1,1,1-Trichloroethane		50.0	53.4	ug/L	0.433	6.71	20	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.220	3.77	20	
1,1-Dichloropropene		50.0	52.5	ug/L	0.372	4.97	20	
1,2,3-Trichlorobenzene		50.0	50.6	ug/L	0.790	1.16	20	
1,2,3-Trichloropropane		50.0	49.6	ug/L	0.134	0.791	20	
1,2,4-Trichlorobenzene		50.0	51.7	ug/L	0.972	3.38	20	
1,2,4-Trimethylbenzene		50.0	55.9	ug/L	2.89	11.8	20	
1,2-Dichloroethane		50.0	50.0	ug/L	0.284	0.00260	20	
1,2-Dichlorobenzene		50.0	51.7	ug/L	1.44	3.40	20	
1,2-Dibromo-3-Chloropropane		50.0	48.0	ug/L	0.0736	4.09	20	
1,2-Dibromoethane		50.0	49.3	ug/L	0.221	1.40	20	
1,3,5-Trimethylbenzene		50.0	54.3	ug/L	2.75	8.68	20	
1,3-Dichlorobenzene		50.0	52.7	ug/L	1.68	5.48	20	
1,3-Dichloropropane		50.0	49.3	ug/L	0.381	1.45	20	
1,4-Dichlorobenzene		50.0	50.9	ug/L	1.64	1.72	20	
1-Chlorohexane		50.0	57.0	ug/L	0.502	13.9	20	
2,2-Dichloropropane		50.0	55.4	ug/L	0.424	10.8	20	
2-Hexanone		50.0	44.3	ug/L	0.0497	11.5	20	
2-Chlorotoluene		50.0	55.2	ug/L	2.63	10.3	20	
4-Chlorotoluene		50.0	48.4	ug/L	2.08	3.23	20	
Acetone		50.0	44.5	ug/L	0.0313	10.9	20	
Benzene		50.0	52.0	ug/L	1.08	4.09	20	
Bromobenzene		50.0	51.4	ug/L	0.843	2.80	20	
Bromochloromethane		50.0	50.5	ug/L	0.159	0.982	20	
Bromodichloromethane		50.0	52.7	ug/L	0.348	5.36	20	
Bromomethane		50.0	46.0	ug/L	0.131	7.90	20	
Carbon Disulfide		50.0	58.3	ug/L	0.878	16.6	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.410	9.02	20	
Chloroethane		50.0	53.2	ug/L	0.186	6.37	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611560-02

Instrument ID: HPMS8 Run Time: 08:22 Method: 8260B

File ID: 8M419165 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611561 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	52.1	ug/L	0.303	4.20	20	
cis-1,3-Dichloropropene		50.0	53.4	ug/L	0.401	6.76	20	
Dibromochloromethane		50.0	51.8	ug/L	0.305	3.55	20	
Dibromomethane		50.0	50.2	ug/L	0.130	0.416	20	
Dichlorodifluoromethane		50.0	55.8	ug/L	0.377	11.5	20	
Hexachlorobutadiene		50.0	51.3	ug/L	0.449	2.70	20	
Isopropylbenzene		50.0	54.8	ug/L	1.70	9.67	20	
Methylene Chloride		50.0	49.9	ug/L	0.259	0.287	20	
Methyl Tert Butyl Ether		50.0	46.8	ug/L	0.480	6.33	20	
2-Butanone		50.0	45.3	ug/L	0.0500	9.40	20	
4-Methyl-2-Pentanone		50.0	44.0	ug/L	0.0430	12.0	20	
n-Butylbenzene		50.0	56.0	ug/L	2.70	12.0	20	
n-Propylbenzene		50.0	54.3	ug/L	3.80	8.67	20	
m-,p-Xylene		100	110	ug/L	0.707	10.1	20	
Naphthalene		50.0	48.3	ug/L	1.30	3.38	20	
o-Xylene		50.0	52.0	ug/L	0.672	3.96	20	
p-Isopropyltoluene		50.0	55.1	ug/L	2.95	10.2	20	
sec-Butylbenzene		50.0	54.0	ug/L	3.43	8.07	20	
Styrene		50.0	55.7	ug/L	1.13	11.4	20	
Trichloroethene		50.0	50.9	ug/L	0.296	1.85	20	
tert-Butylbenzene		50.0	51.8	ug/L	0.594	3.60	20	
Tetrachloroethene		50.0	52.8	ug/L	0.309	5.63	20	
trans-1,2-Dichloroethene		50.0	51.7	ug/L	0.364	3.37	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.407	0.772	20	
Trichlorofluoromethane		50.0	52.2	ug/L	0.453	4.37	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Report generated 07/25/2017 16:09

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611720-02

Instrument ID: HPMS17 Run Time: 15:05 Method: 8260B

File ID: 17M0273028 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG611721 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.3	ug/L	0.396	2.53	20	
1,2-Dichloropropane	CCC	50.0	49.5	ug/L	0.276	1.05	20	
Chloroform	CCC	50.0	49.1	ug/L	0.484	1.80	20	
Ethylbenzene	CCC	50.0	50.2	ug/L	0.550	0.482	20	
Toluene	CCC	50.0	49.5	ug/L	1.55	0.902	20	
Vinyl Chloride	CCC	50.0	52.3	ug/L	0.337	4.65	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.1	ug/L	0.606	9.88	20	
1,1-Dichloroethane	SPCC	50.0	50.3	ug/L	0.475	0.546	20	
Bromoform	SPCC	50.0	46.5	ug/L	0.271	7.07	20	
Chlorobenzene	SPCC	50.0	49.2	ug/L	1.03	1.69	20	
Chloromethane	SPCC	50.0	52.2	ug/L	0.304	4.46	20	
Xylenes		150	152	ug/L	0.662	1.27	20	
1,1,1,2-Tetrachloroethane		50.0	48.2	ug/L	0.395	3.54	20	
1,1,1-Trichloroethane		50.0	50.4	ug/L	0.436	0.738	20	
1,1,2-Trichloroethane		50.0	44.9	ug/L	0.273	10.2	20	
1,1-Dichloropropene		50.0	51.7	ug/L	0.352	3.49	20	
1,2,3-Trichlorobenzene		50.0	49.6	ug/L	1.20	0.877	20	
1,2,3-Trichloropropane		50.0	42.5	ug/L	0.169	15.1	20	
1,2,4-Trichlorobenzene		50.0	53.3	ug/L	1.32	6.59	20	
1,2,4-Trimethylbenzene		50.0	51.2	ug/L	2.88	2.47	20	
1,2-Dichloroethane		50.0	47.1	ug/L	0.312	5.87	20	
1,2-Dichlorobenzene		50.0	48.2	ug/L	1.61	3.68	20	
1,2-Dibromo-3-Chloropropane		50.0	44.0	ug/L	0.109	12.0	20	
1,2-Dibromoethane		50.0	44.4	ug/L	0.277	11.1	20	
1,3,5-Trimethylbenzene		50.0	51.3	ug/L	2.86	2.60	20	
1,3-Dichlorobenzene		50.0	50.2	ug/L	1.72	0.465	20	
1,3-Dichloropropane		50.0	45.6	ug/L	0.440	8.78	20	
1,4-Dichlorobenzene		50.0	49.1	ug/L	1.70	1.85	20	
1-Chlorohexane		50.0	52.8	ug/L	0.0897	5.65	20	
2,2-Dichloropropane		50.0	55.3	ug/L	0.414	10.5	20	
2-Hexanone		50.0	40.3	ug/L	0.129	19.3	20	
2-Chlorotoluene		50.0	50.2	ug/L	2.29	0.385	20	
4-Chlorotoluene		50.0	50.8	ug/L	2.31	1.61	20	
Acetone		50.0	40.4	ug/L	0.0406	19.3	20	
Benzene		50.0	49.3	ug/L	1.05	1.47	20	
Bromobenzene		50.0	47.8	ug/L	0.940	4.44	20	
Bromochloromethane		50.0	48.7	ug/L	0.187	2.62	20	
Bromodichloromethane		50.0	49.1	ug/L	0.366	1.89	20	
Bromomethane		50.0	43.7	ug/L	0.209	12.7	20	
Carbon Disulfide		50.0	52.2	ug/L	0.865	4.33	20	
Carbon Tetrachloride		50.0	52.0	ug/L	0.405	3.94	20	
Chloroethane		50.0	45.5	ug/L	0.139	8.95	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/26/2017 Sample ID: WG611720-02

Instrument ID: HPMS17 Run Time: 15:05 Method: 8260B

File ID: 17M0273028 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG611721 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.5	ug/L	0.295	1.02	20	
cis-1,3-Dichloropropene		50.0	50.6	ug/L	0.425	1.26	20	
Dibromochloromethane		50.0	47.0	ug/L	0.390	5.92	20	
Dibromomethane		50.0	46.8	ug/L	0.153	6.39	20	
Dichlorodifluoromethane		50.0	57.8	ug/L	0.343	15.6	20	
Hexachlorobutadiene		50.0	53.8	ug/L	0.758	7.54	20	
Isopropylbenzene		50.0	50.7	ug/L	1.71	1.37	20	
Methylene Chloride		50.0	47.1	ug/L	0.276	5.87	20	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.608	8.90	20	
2-Butanone		50.0	41.6	ug/L	0.0623	16.8	20	
4-Methyl-2-Pentanone		50.0	40.9	ug/L	0.0567	18.2	20	
n-Butylbenzene		50.0	55.9	ug/L	2.76	11.8	20	
n-Propylbenzene		50.0	51.9	ug/L	3.83	3.70	20	
m-,p-Xylene		100	102	ug/L	0.674	2.06	20	
Naphthalene		50.0	46.7	ug/L	2.26	6.61	20	
o-Xylene		50.0	49.8	ug/L	0.649	0.307	20	
p-Isopropyltoluene		50.0	53.0	ug/L	3.10	5.96	20	
sec-Butylbenzene		50.0	51.6	ug/L	3.54	3.12	20	
Styrene		50.0	51.5	ug/L	1.07	2.94	20	
Trichloroethene		50.0	48.4	ug/L	0.310	3.16	20	
tert-Butylbenzene		50.0	49.2	ug/L	0.548	1.62	20	
Tetrachloroethene		50.0	50.5	ug/L	0.452	1.06	20	
trans-1,2-Dichloroethene		50.0	50.9	ug/L	0.268	1.73	20	
trans-1,3-Dichloropropene		50.0	49.2	ug/L	0.352	1.51	20	
Trichlorofluoromethane		50.0	54.9	ug/L	0.454	9.89	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/27/2017 Sample ID: WG611826-02
Instrument ID: HPMS17 Run Time: 11:56 Method: 8260B
File ID: 17M0273065 Analyst: ADC QC Key: AF40
Workgroup (AAB#): WG611827 Cal ID: HPMS17 - 26-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.4	ug/L	0.366	5.29	20	
1,2-Dichloropropane	CCC	50.0	47.0	ug/L	0.263	5.92	20	
Chloroform	CCC	50.0	45.9	ug/L	0.452	8.30	20	
Ethylbenzene	CCC	50.0	47.1	ug/L	0.516	5.78	20	
Toluene	CCC	50.0	46.9	ug/L	1.47	6.12	20	
Vinyl Chloride	CCC	50.0	47.2	ug/L	0.304	5.55	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	43.5	ug/L	0.585	13.0	20	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.449	4.89	20	
Bromoform	SPCC	50.0	43.6	ug/L	0.254	12.9	20	
Chlorobenzene	SPCC	50.0	45.9	ug/L	0.966	8.18	20	
Chloromethane	SPCC	50.0	42.7	ug/L	0.248	14.7	20	
Xylenes		150	142	ug/L	0.619	5.34	20	
1,1,1,2-Tetrachloroethane		50.0	45.3	ug/L	0.371	9.31	20	
1,1,1-Trichloroethane		50.0	46.4	ug/L	0.402	7.20	20	
1,1,2-Trichloroethane		50.0	43.0	ug/L	0.261	14.0	20	
1,1-Dichloropropene		50.0	47.8	ug/L	0.325	4.33	20	
1,2,3-Trichlorobenzene		50.0	41.5	ug/L	1.00	17.0	20	
1,2,3-Trichloropropane		50.0	40.4	ug/L	0.161	19.2	20	
1,2,4-Trichlorobenzene		50.0	45.6	ug/L	1.13	8.89	20	
1,2,4-Trimethylbenzene		50.0	46.8	ug/L	2.63	6.30	20	
1,2-Dichloroethane		50.0	44.5	ug/L	0.295	10.9	20	
1,2-Dichlorobenzene		50.0	44.2	ug/L	1.48	11.6	20	
1,2-Dibromo-3-Chloropropane		50.0	42.3	ug/L	0.104	15.4	20	
1,2-Dibromoethane		50.0	43.0	ug/L	0.268	14.0	20	
1,3,5-Trimethylbenzene		50.0	46.9	ug/L	2.61	6.28	20	
1,3-Dichlorobenzene		50.0	46.2	ug/L	1.58	7.67	20	
1,3-Dichloropropane		50.0	44.3	ug/L	0.428	11.5	20	
1,4-Dichlorobenzene		50.0	45.1	ug/L	1.56	9.77	20	
1-Chlorohexane		50.0	51.1	ug/L	0.0867	2.10	20	
2,2-Dichloropropane		50.0	52.4	ug/L	0.393	4.87	20	
2-Hexanone		50.0	42.6	ug/L	0.136	14.7	20	
2-Chlorotoluene		50.0	46.6	ug/L	2.12	6.84	20	
4-Chlorotoluene		50.0	47.3	ug/L	2.15	5.42	20	
Acetone		50.0	40.0	ug/L	0.0402	19.9	20	
Benzene		50.0	46.3	ug/L	0.986	7.42	20	
Bromobenzene		50.0	43.8	ug/L	0.862	12.3	20	
Bromochloromethane		50.0	45.3	ug/L	0.174	9.35	20	
Bromodichloromethane		50.0	46.1	ug/L	0.343	7.86	20	
Bromomethane		50.0	41.8	ug/L	0.200	16.4	20	
Carbon Disulfide		50.0	48.9	ug/L	0.811	2.13	20	
Carbon Tetrachloride		50.0	47.5	ug/L	0.370	4.95	20	
Chloroethane		50.0	45.4	ug/L	0.139	9.26	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/27/2017 Sample ID: WG611826-02

Instrument ID: HPMS17 Run Time: 11:56 Method: 8260B

File ID: 17M0273065 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG611827 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.3	ug/L	0.275	7.49	20	
cis-1,3-Dichloropropene		50.0	48.7	ug/L	0.409	2.64	20	
Dibromochloromethane		50.0	44.3	ug/L	0.367	11.5	20	
Dibromomethane		50.0	44.2	ug/L	0.144	11.6	20	
Dichlorodifluoromethane		50.0	52.3	ug/L	0.311	4.60	20	
Hexachlorobutadiene		50.0	43.8	ug/L	0.617	12.5	20	
Isopropylbenzene		50.0	47.2	ug/L	1.59	5.67	20	
Methylene Chloride		50.0	44.7	ug/L	0.262	10.5	20	
Methyl Tert Butyl Ether		50.0	43.2	ug/L	0.577	13.6	20	
2-Butanone		50.0	43.4	ug/L	0.0650	13.2	20	
4-Methyl-2-Pentanone		50.0	41.7	ug/L	0.0579	16.6	20	
n-Butylbenzene		50.0	49.9	ug/L	2.46	0.244	20	
n-Propylbenzene		50.0	47.9	ug/L	3.53	4.30	20	
m-,p-Xylene		100	95.2	ug/L	0.629	4.80	20	
Naphthalene		50.0	40.2	ug/L	1.95	19.6	20	
o-Xylene		50.0	46.8	ug/L	0.609	6.42	20	
p-Isopropyltoluene		50.0	47.4	ug/L	2.77	5.27	20	
sec-Butylbenzene		50.0	46.7	ug/L	3.21	6.63	20	
Styrene		50.0	48.3	ug/L	1.01	3.34	20	
Trichloroethene		50.0	44.2	ug/L	0.283	11.6	20	
tert-Butylbenzene		50.0	44.6	ug/L	0.497	10.8	20	
Tetrachloroethene		50.0	46.4	ug/L	0.415	7.10	20	
trans-1,2-Dichloroethene		50.0	46.9	ug/L	0.247	6.16	20	
trans-1,3-Dichloropropene		50.0	47.7	ug/L	0.340	4.66	20	
Trichlorofluoromethane		50.0	50.6	ug/L	0.418	1.22	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/28/2017 Sample ID: WG612029-02

Instrument ID: HPMS17 Run Time: 12:19 Method: 8260B

File ID: 17M0273104 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612030 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.2	ug/L	0.388	0.463	20	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.271	2.84	20	
Chloroform	CCC	50.0	48.1	ug/L	0.474	3.84	20	
Ethylbenzene	CCC	50.0	49.4	ug/L	0.541	1.21	20	
Toluene	CCC	50.0	49.4	ug/L	1.55	1.17	20	
Vinyl Chloride	CCC	50.0	51.1	ug/L	0.329	2.25	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	48.3	ug/L	0.649	3.48	20	
1,1-Dichloroethane	SPCC	50.0	49.8	ug/L	0.470	0.486	20	
Bromoform	SPCC	50.0	46.4	ug/L	0.271	7.19	20	
Chlorobenzene	SPCC	50.0	48.5	ug/L	1.02	2.98	20	
Chloromethane	SPCC	50.0	46.9	ug/L	0.273	6.17	20	
Xylenes		150	149	ug/L	0.648	0.638	20	
1,1,1,2-Tetrachloroethane		50.0	47.7	ug/L	0.390	4.65	20	
1,1,1-Trichloroethane		50.0	49.2	ug/L	0.426	1.58	20	
1,1,2-Trichloroethane		50.0	45.2	ug/L	0.275	9.63	20	
1,1-Dichloropropene		50.0	49.7	ug/L	0.338	0.618	20	
1,2,3-Trichlorobenzene		50.0	45.3	ug/L	1.09	9.41	20	
1,2,3-Trichloropropane		50.0	44.1	ug/L	0.176	11.7	20	
1,2,4-Trichlorobenzene		50.0	48.9	ug/L	1.21	2.15	20	
1,2,4-Trimethylbenzene		50.0	51.0	ug/L	2.87	1.95	20	
1,2-Dichloroethane		50.0	46.3	ug/L	0.307	7.32	20	
1,2-Dichlorobenzene		50.0	47.8	ug/L	1.60	4.33	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.117	5.44	20	
1,2-Dibromoethane		50.0	44.6	ug/L	0.278	10.8	20	
1,3,5-Trimethylbenzene		50.0	51.1	ug/L	2.85	2.24	20	
1,3-Dichlorobenzene		50.0	49.9	ug/L	1.71	0.132	20	
1,3-Dichloropropane		50.0	46.2	ug/L	0.446	7.62	20	
1,4-Dichlorobenzene		50.0	48.5	ug/L	1.68	3.02	20	
1-Chlorohexane		50.0	52.8	ug/L	0.0897	5.65	20	
2,2-Dichloropropane		50.0	54.7	ug/L	0.410	9.41	20	
2-Hexanone		50.0	41.5	ug/L	0.132	17.1	20	
2-Chlorotoluene		50.0	50.1	ug/L	2.28	0.142	20	
4-Chlorotoluene		50.0	51.0	ug/L	2.32	2.10	20	
Acetone		50.0	41.4	ug/L	0.0417	17.1	20	
Benzene		50.0	48.3	ug/L	1.03	3.35	20	
Bromobenzene		50.0	47.5	ug/L	0.935	4.96	20	
Bromochloromethane		50.0	47.8	ug/L	0.183	4.44	20	
Bromodichloromethane		50.0	48.0	ug/L	0.358	3.94	20	
Bromomethane		50.0	37.3	ug/L	0.178	25.5	20	*
Carbon Disulfide		50.0	50.5	ug/L	0.837	0.928	20	
Carbon Tetrachloride		50.0	50.1	ug/L	0.390	0.217	20	
Chloroethane		50.0	46.5	ug/L	0.142	6.93	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041075 Run Date: 04/28/2017 Sample ID: WG612029-02

Instrument ID: HPMS17 Run Time: 12:19 Method: 8260B

File ID: 17M0273104 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612030 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	48.1	ug/L	0.286	3.86	20	
cis-1,3-Dichloropropene		50.0	50.8	ug/L	0.427	1.63	20	
Dibromochloromethane		50.0	46.7	ug/L	0.387	6.61	20	
Dibromomethane		50.0	45.8	ug/L	0.150	8.32	20	
Dichlorodifluoromethane		50.0	55.5	ug/L	0.330	11.1	20	
Hexachlorobutadiene		50.0	47.3	ug/L	0.667	5.31	20	
Isopropylbenzene		50.0	49.6	ug/L	1.67	0.856	20	
Methylene Chloride		50.0	46.2	ug/L	0.271	7.63	20	
Methyl Tert Butyl Ether		50.0	44.7	ug/L	0.596	10.7	20	
2-Butanone		50.0	42.9	ug/L	0.0643	14.2	20	
4-Methyl-2-Pentanone		50.0	41.3	ug/L	0.0573	17.5	20	
n-Butylbenzene		50.0	54.6	ug/L	2.70	9.15	20	
n-Propylbenzene		50.0	52.1	ug/L	3.85	4.24	20	
m-,p-Xylene		100	101	ug/L	0.664	0.548	20	
Naphthalene		50.0	43.7	ug/L	2.12	12.5	20	
o-Xylene		50.0	48.5	ug/L	0.631	3.01	20	
p-Isopropyltoluene		50.0	52.0	ug/L	3.04	3.96	20	
sec-Butylbenzene		50.0	51.1	ug/L	3.51	2.18	20	
Styrene		50.0	50.8	ug/L	1.06	1.69	20	
Trichloroethene		50.0	46.1	ug/L	0.295	7.78	20	
tert-Butylbenzene		50.0	48.9	ug/L	0.545	2.15	20	
Tetrachloroethene		50.0	48.8	ug/L	0.436	2.45	20	
trans-1,2-Dichloroethene		50.0	49.0	ug/L	0.258	1.95	20	
trans-1,3-Dichloropropene		50.0	49.0	ug/L	0.350	2.00	20	
Trichlorofluoromethane		50.0	54.3	ug/L	0.448	8.58	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS8
Workgroup (AAB#): WG611301

ICAL CCV Number: WG610410-08
CAL ID: HPMS8 - 17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041075-01	1.00	01	272324	538417	679733
L17041075-02	1.00	01	270603	535757	670191
L17041075-03	1.00	01	269992	530623	674511
L17041075-04	1.00	01	268890	532074	662832
L17041075-05	1.00	01	270846	528865	660178
WG611301-01	1.00	01	298713	583306	733239
WG611301-02	1.00	01	323407	609137	759307
WG611301-03	1.00	01	334340	627617	776037

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS8
Workgroup (AAB#): WG611408

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041075-06	1.00	01	315712	612306	762977
L17041075-07	1.00	01	306467	599631	751199
L17041075-08	1.00	01	295158	578396	728996
L17041075-09	1.00	01	306375	600785	747832
L17041075-10	1.00	01	304587	593995	735205
L17041075-11	1.00	01	304733	590066	737329
L17041075-12	1.00	01	296712	580495	724447
L17041075-13	1.00	01	286478	570912	712817
L17041075-14	1.00	01	291138	578475	714358
L17041075-15	1.00	01	282888	567320	708845
L17041075-16	1.00	01	289215	567001	707755
L17041075-17	1.00	01	285990	558666	703433
L17041075-18	1.00	01	293528	569691	702586
L17041075-19	1.00	01	289582	567181	702981
L17041075-20	1.00	01	289783	561558	695348
WG611408-01	1.00	01	318113	625907	778852
WG611408-02	1.00	01	358594	659546	821058
WG611408-03	1.00	01	364334	678834	840315

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS8
Workgroup (AAB#): WG611561

ICAL CCV Number: WG610410-08
CAL ID: HPMS8 - 17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041075-21	1.00	01	274518	533501	654952
L17041075-22	1.00	01	273029	535352	664080
WG611561-01	1.00	01	300614	577927	727213
WG611561-02	1.00	01	337676	623663	767268
WG611561-03	1.00	01	344756	636816	788127

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS17
Workgroup (AAB#): WG611721

ICAL CCV Number: WG611454-08
CAL ID: HPMS17 - 26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041075-23	1.00	01	156237	309260	417684
L17041075-25	1.00	01	154134	308518	417867
L17041075-26	1.00	01	162536	310380	414707
L17041075-27	1.00	01	160690	311702	414329
L17041075-31	1.00	01	153735	310503	414072
L17041075-32	1.00	01	154655	309640	414801
L17041075-33	1.00	01	155378	310025	418568
L17041075-34	1.00	01	146219	297945	406903
L17041075-35	1.00	01	151168	305885	413430
L17041075-36	1.00	01	152320	301245	404812
L17041075-37	1.00	01	153537	307389	415161
L17041075-38	1.00	01	148686	301747	409535
L17041075-39	1.00	01	158085	317165	426416
L17041075-40	1.00	01	151823	302523	408635
WG611721-01	1.00	01	156977	314320	423130
WG611721-02	1.00	01	162924	315151	417610

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS17
Workgroup (AAB#): WG611827

ICAL CCV Number: WG611454-08
CAL ID: HPMS17 - 26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041075-24	1.00	01	144891	288964	395082
L17041075-41	1.00	01	133998	276634	383513
L17041075-42	1.00	01	138511	280211	384154
L17041075-43	1.00	01	143484	288807	389875
L17041075-44	1.00	01	139062	278646	377608
L17041075-45	1.00	01	141161	287230	392286
WG611827-01	1.00	01	145053	295946	402256
WG611827-02	1.00	01	152225	296865	395669

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS17
Workgroup (AAB#): WG612030

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041075-28	1.00	02	136040	278446	385901
L17041075-29	1.00	02	141267	277710	371463
L17041075-30	1.00	02	142732	283157	376473
WG612030-01	1.00	01	129762	271660	372168
WG612030-02	1.00	01	138671	276134	372242

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5264473
Report generated 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075

Instrument ID: HPMS8

Workgroup (AAB#): WG611301

ICAL CCV Number: WG610410-08

CAL ID: HPMS8-17-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041075-01	1.00	01	17.82	14.79	10.93
L17041075-02	1.00	01	17.81	14.79	10.92
L17041075-03	1.00	01	17.81	14.79	10.93
L17041075-04	1.00	01	17.82	14.79	10.93
L17041075-05	1.00	01	17.82	14.79	10.92
WG611301-01	1.00	01	17.82	14.79	10.93
WG611301-02	1.00	01	17.82	14.79	10.93
WG611301-03	1.00	01	17.82	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5264474

Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075

Instrument ID: HPMS8

Workgroup (AAB#): WG611408

ICAL CCV Number: WG610410-08

CAL ID: HPMS8-17-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041075-06	1.00	01	17.82	14.79	10.93
L17041075-07	1.00	01	17.82	14.79	10.93
L17041075-08	1.00	01	17.81	14.79	10.92
L17041075-09	1.00	01	17.82	14.79	10.93
L17041075-10	1.00	01	17.81	14.79	10.92
L17041075-11	1.00	01	17.82	14.79	10.93
L17041075-12	1.00	01	17.81	14.79	10.92
L17041075-13	1.00	01	17.82	14.79	10.93
L17041075-14	1.00	01	17.82	14.79	10.92
L17041075-15	1.00	01	17.82	14.79	10.93
L17041075-16	1.00	01	17.81	14.79	10.92
L17041075-17	1.00	01	17.82	14.79	10.92
L17041075-18	1.00	01	17.82	14.79	10.92
L17041075-19	1.00	01	17.82	14.79	10.92
L17041075-20	1.00	01	17.82	14.79	10.92
WG611408-01	1.00	01	17.82	14.79	10.93
WG611408-02	1.00	01	17.82	14.79	10.93
WG611408-03	1.00	01	17.82	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

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Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS8
Workgroup (AAB#): WG611561

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041075-21	1.00	01	17.82	14.79	10.93
L17041075-22	1.00	01	17.81	14.79	10.92
WG611561-01	1.00	01	17.82	14.79	10.92
WG611561-02	1.00	01	17.81	14.79	10.92
WG611561-03	1.00	01	17.81	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS17
Workgroup (AAB#): WG611721

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041075-23	1.00	01	9.36	8.05	5.27
L17041075-25	1.00	01	9.36	8.05	5.27
L17041075-26	1.00	01	9.36	8.05	5.27
L17041075-27	1.00	01	9.36	8.05	5.27
L17041075-31	1.00	01	9.36	8.05	5.27
L17041075-32	1.00	01	9.36	8.05	5.27
L17041075-33	1.00	01	9.36	8.05	5.27
L17041075-34	1.00	01	9.36	8.05	5.27
L17041075-35	1.00	01	9.36	8.05	5.27
L17041075-36	1.00	01	9.36	8.05	5.27
L17041075-37	1.00	01	9.36	8.05	5.27
L17041075-38	1.00	01	9.36	8.05	5.27
L17041075-39	1.00	01	9.36	8.05	5.28
L17041075-40	1.00	01	9.36	8.05	5.28
WG611721-01	1.00	01	9.36	8.05	5.27
WG611721-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5264474
Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075

Instrument ID: HPMS17

Workgroup (AAB#): WG611827

ICAL CCV Number: WG611454-08

CAL ID: HPMS17-26-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041075-24	1.00	01	9.36	8.05	5.27
L17041075-41	1.00	01	9.36	8.05	5.27
L17041075-42	1.00	01	9.36	8.05	5.27
L17041075-43	1.00	01	9.36	8.05	5.28
L17041075-44	1.00	01	9.36	8.05	5.28
L17041075-45	1.00	01	9.36	8.05	5.27
WG611827-01	1.00	01	9.36	8.05	5.27
WG611827-02	1.00	01	9.36	8.05	5.28

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5264474

Report generated: 07/25/2017 16:10

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041075
Instrument ID: HPMS17
Workgroup (AAB#): WG612030

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041075-28	1.00	02	9.36	8.05	5.27
L17041075-29	1.00	02	9.36	8.05	5.27
L17041075-30	1.00	02	9.36	8.05	5.27
WG612030-01	1.00	01	9.36	8.05	5.27
WG612030-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5264474
Report generated: 07/25/2017 16:10

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419127.D Vial: 13
Acq On : 24 Apr 2017 17:18 Operator: TMB
Sample : L17041075-01 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 17:40:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

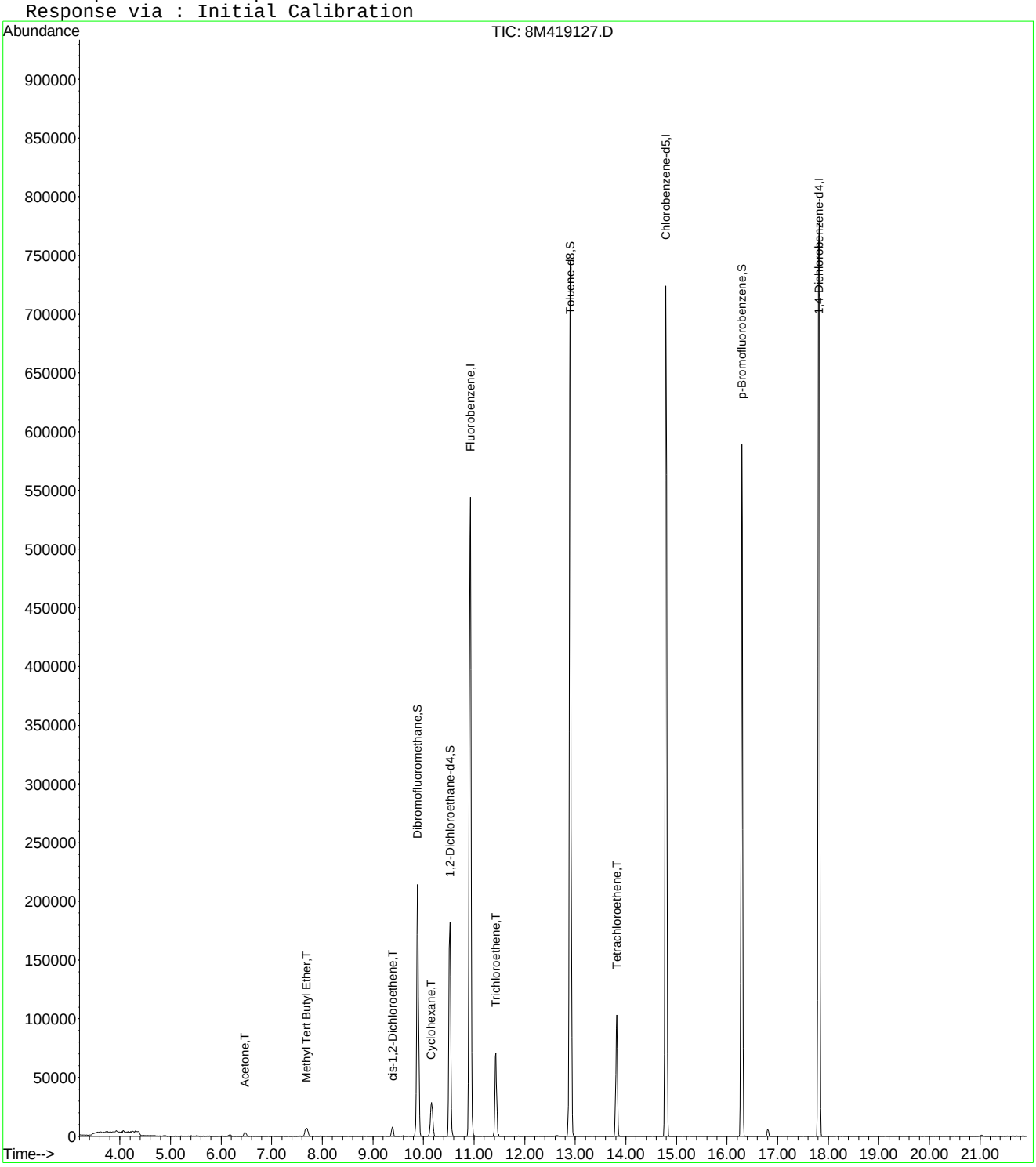
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	679733	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	538417	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	272324	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	179478	25.1737	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.68%			
43) 1,2-Dichloroethane-d4	10.52	65	154289	25.0324	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.12%			
58) Toluene-d8	12.90	98	663479	26.9693	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.88%			
80) p-Bromofluorobenzene	16.29	95	252721	26.2946	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.16%			
Target Compounds						Qvalue
13) Acetone	6.47	43	7404	7.7448	ug/L	91
22) Methyl Tert Butyl Ether	7.69	73	17501	1.2555	ug/L	98
32) cis-1,2-Dichloroethene	9.39	96	5835	0.7371	ug/L	89
39) Cyclohexane	10.15	56	21858	2.1300	ug/L	93
47) Trichloroethene	11.43	130	30827	3.9079	ug/L	99
66) Tetrachloroethene	13.82	164	32411	5.1484	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419127.D 8260WT.M Tue Apr 25 08:36:24 2017 Page 1

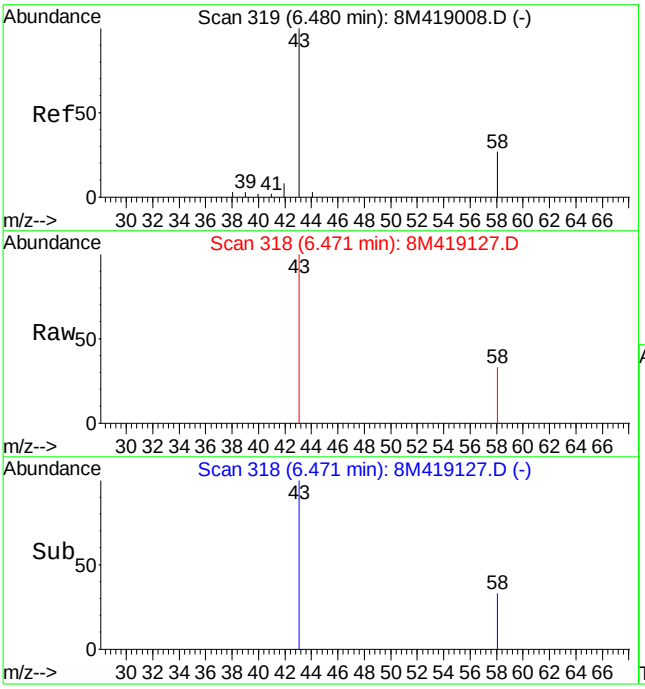
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419127.D Vial: 13
Acq On : 24 Apr 2017 17:18 Operator: TMB
Sample : L17041075-01 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 17:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



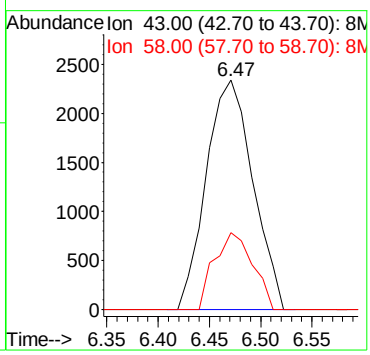
8M419127.D 8260WT.M Tue Apr 25 08:36:24 2017 Page 2

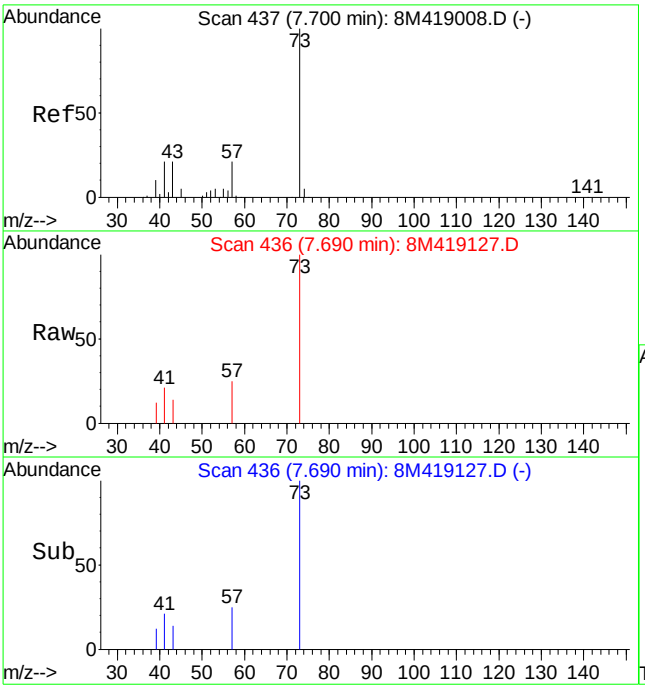


#13
Acetone
Concen: 7.74 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion: 43 Resp: 7404

Ion	Ratio	Lower	Upper
43	100		
58	27.4	19.4	45.4

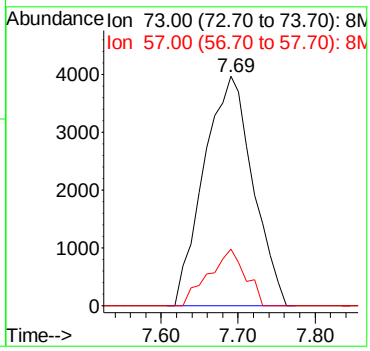


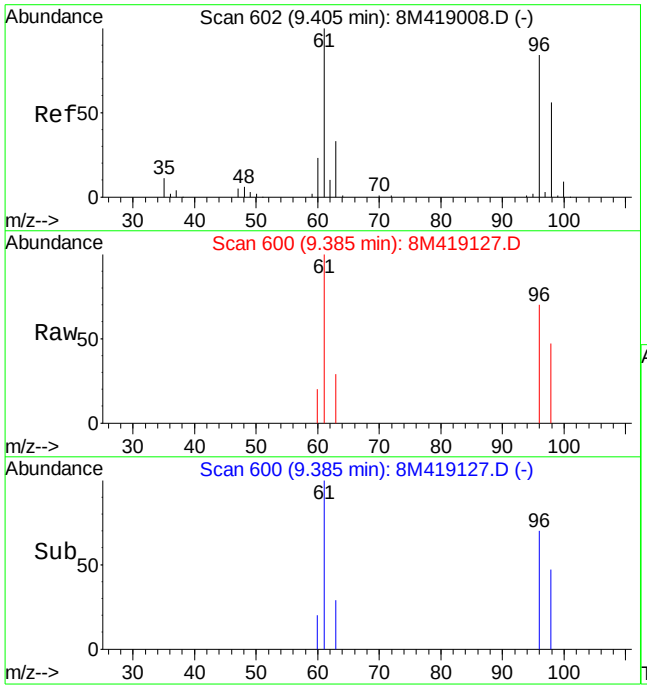


#22
Methyl Tert Butyl Ether
Concen: 1.26 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion: 73 Resp: 17501

Ion	Ratio	Lower	Upper
73	100		
57	18.3	11.4	26.6

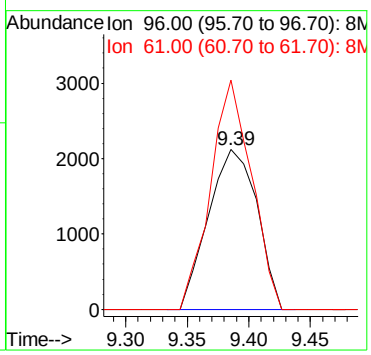


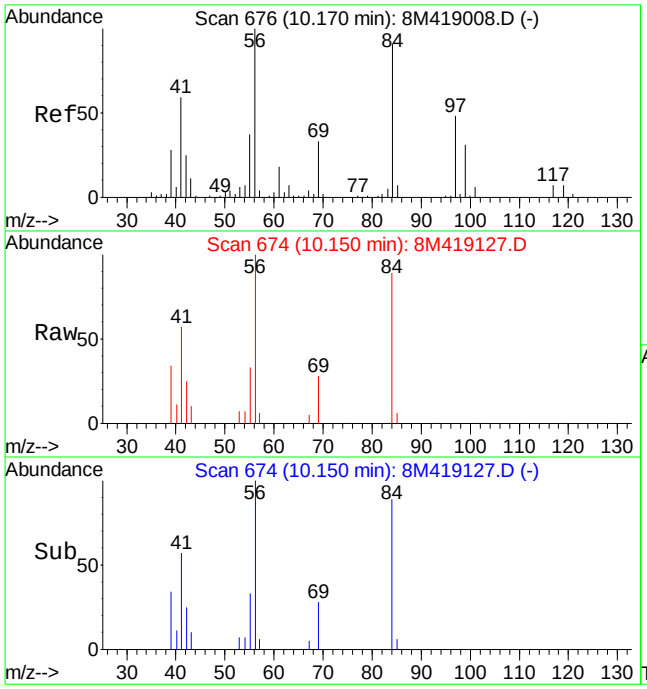


#32
cis-1,2-Dichloroethene
Concen: 0.74 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion: 96 Resp: 5835

Ion	Ratio	Lower	Upper
96	100		
61	121.0	80.3	187.3

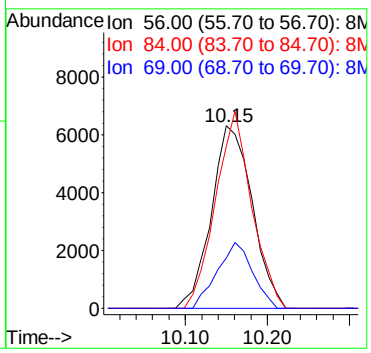


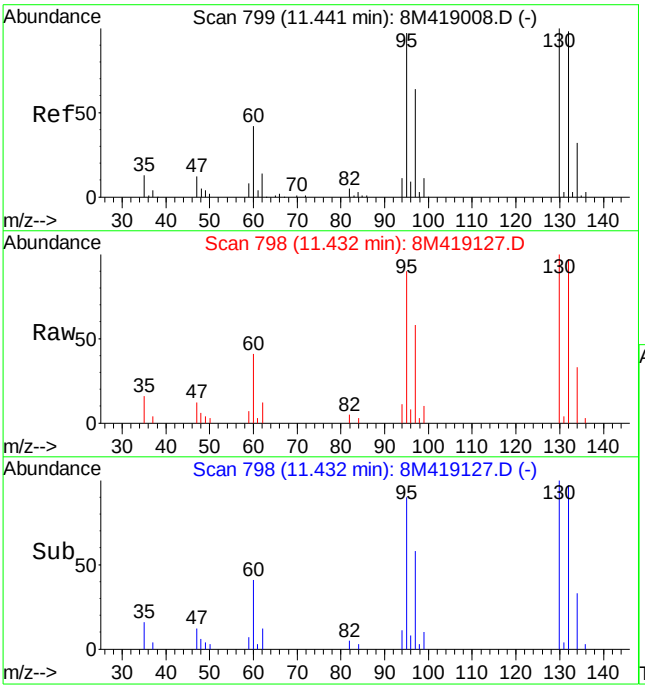


#39
Cyclohexane
Concen: 2.13 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion: 56 Resp: 21858

Ion	Ratio	Lower	Upper
56	100		
84	95.4	61.6	143.8
69	31.2	21.4	50.0

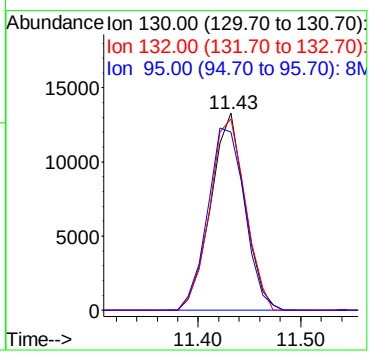


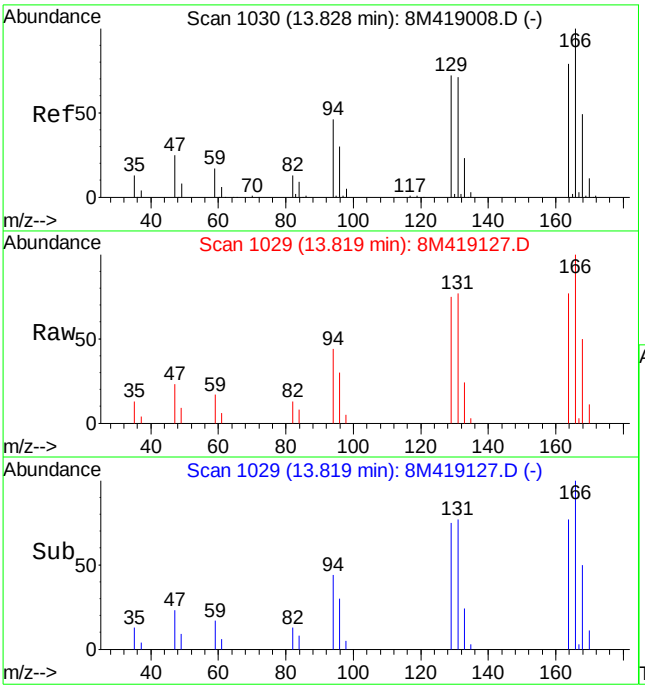


#47
Trichloroethene
Concen: 3.91 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion:130 Resp: 30827

Ion	Ratio	Lower	Upper
130	100		
132	101.3	59.4	138.6
95	100.1	60.1	140.3

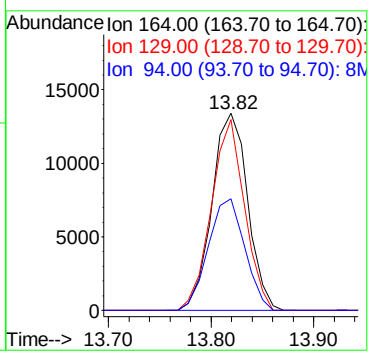




#66
Tetrachloroethene
Concen: 5.15 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419127.D
Acq: 24 Apr 2017 17:18

Tgt Ion:164 Resp: 32411

Ion	Ratio	Lower	Upper
164	100		
129	89.9	53.4	124.6
94	58.0	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419128.D Vial: 14
Acq On : 24 Apr 2017 17:49 Operator: TMB
Sample : L17041075-02 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 18:11:23 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

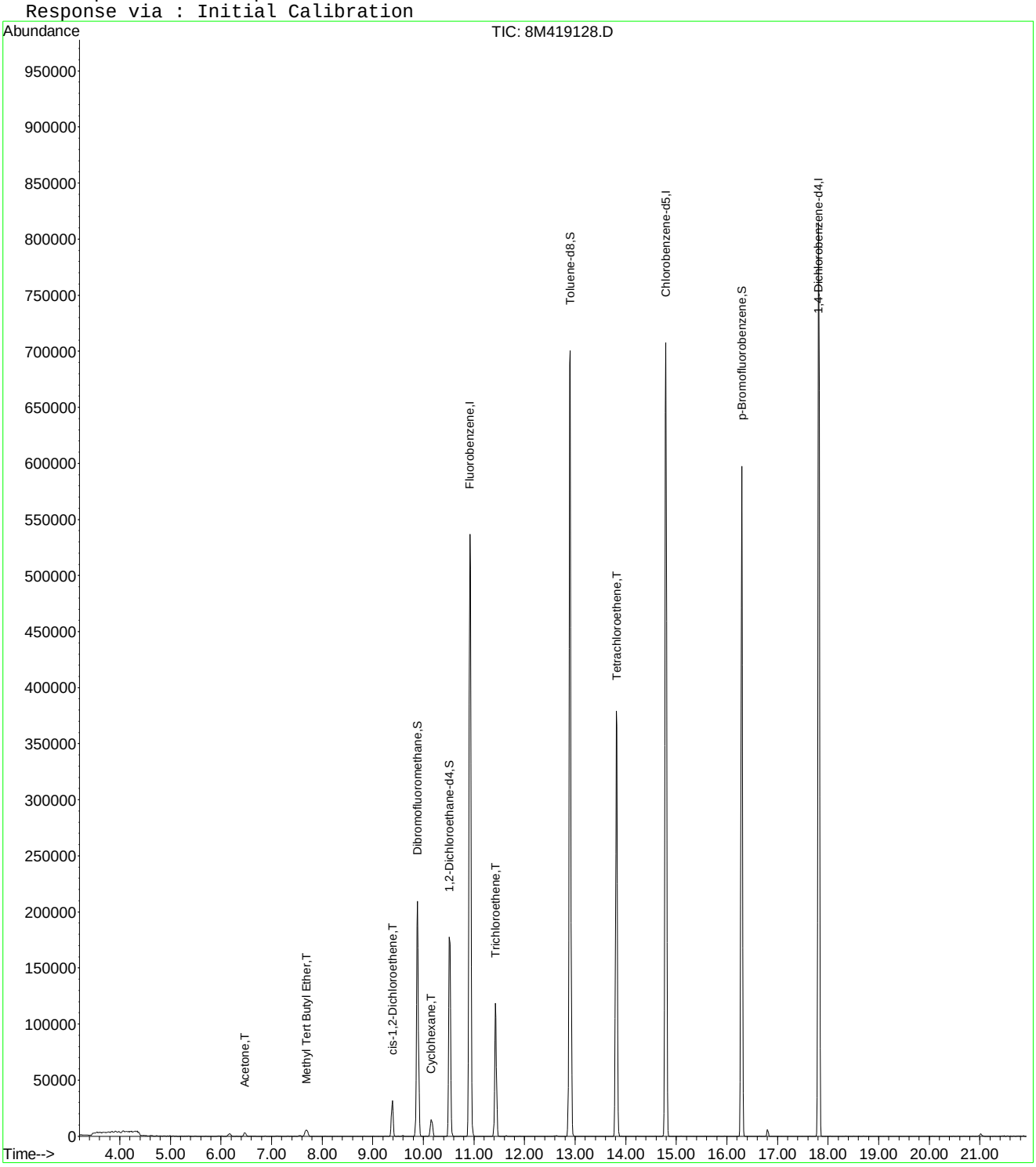
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	670191	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	535757	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	270603	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176351	25.0873	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.36%			
43) 1,2-Dichloroethane-d4	10.51	65	157391	25.8992	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.60%			
58) Toluene-d8	12.90	98	655299	26.7691	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.08%			
80) p-Bromofluorobenzene	16.29	95	247583	25.9238	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.68%			
Target Compounds						Qvalue
13) Acetone	6.47	43	6513	6.9098	ug/L	83
22) Methyl Tert Butyl Ether	7.69	73	12825	0.9332	ug/L	96
32) cis-1,2-Dichloroethene	9.39	96	18554	2.3771	ug/L	93
39) Cyclohexane	10.15	56	12065	1.1924	ug/L	90
47) Trichloroethene	11.42	130	51912	6.6745	ug/L	99
66) Tetrachloroethene	13.82	164	120374	19.2161	ug/L	98

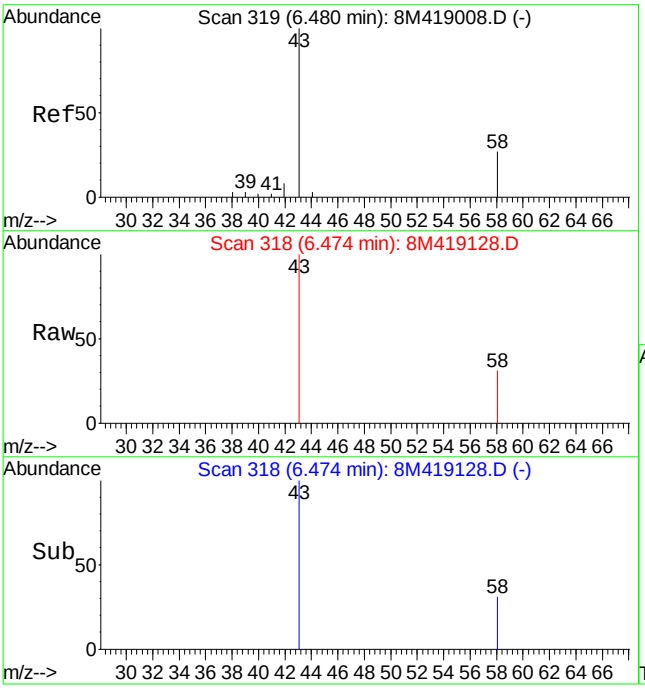
(#) = qualifier out of range (m) = manual integration
8M419128.D 8260WT.M Tue Apr 25 08:36:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419128.D Vial: 14
Acq On : 24 Apr 2017 17:49 Operator: TMB
Sample : L17041075-02 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 18:11 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

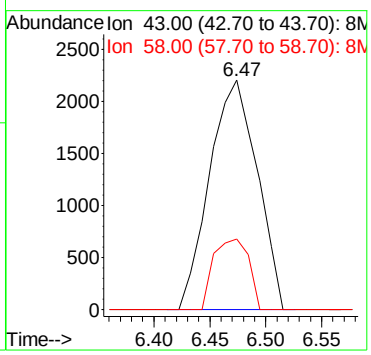


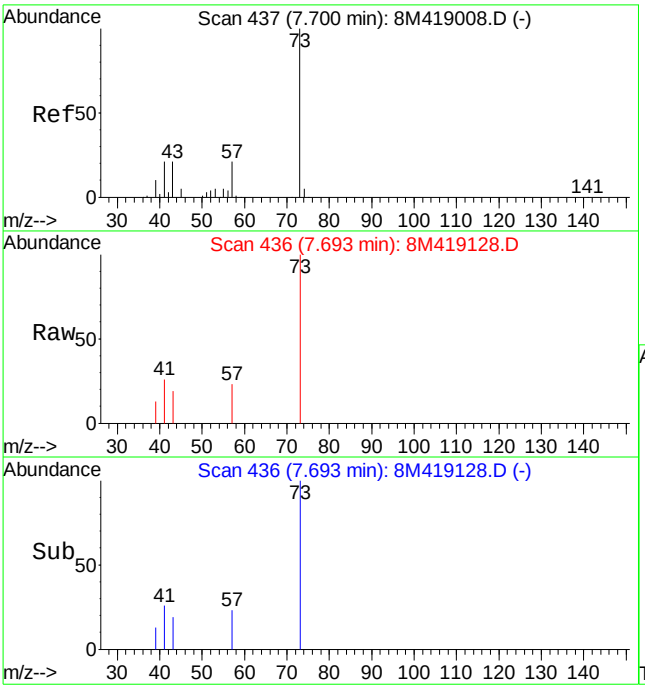


#13
Acetone
Concen: 6.91 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion: 43 Resp: 6513

Ion	Ratio	Lower	Upper
43	100		
58	22.6	19.4	45.4

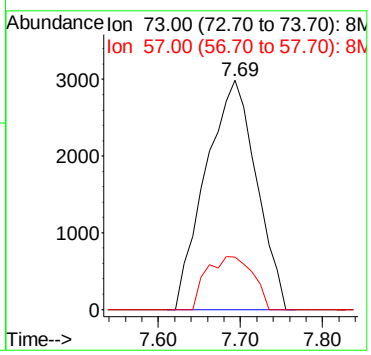


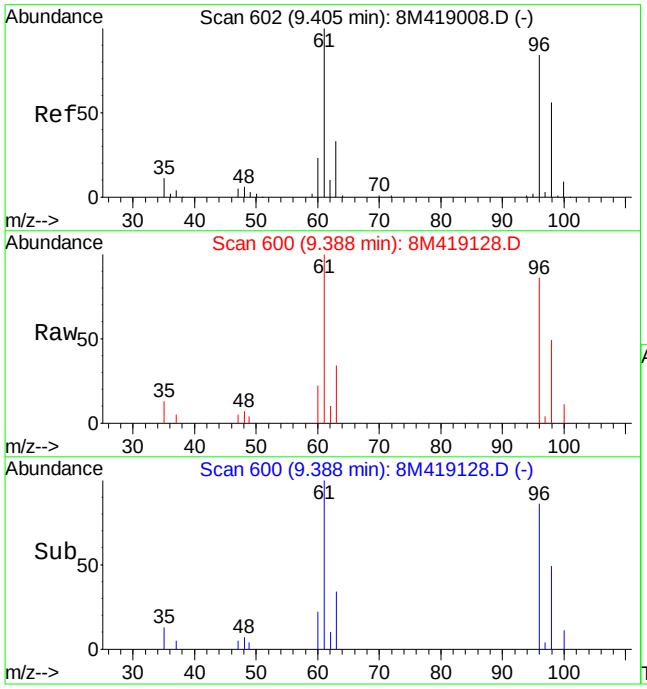


#22
Methyl Tert Butyl Ether
Concen: 0.93 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion: 73 Resp: 12825

Ion	Ratio	Lower	Upper
73	100		
57	20.9	11.4	26.6

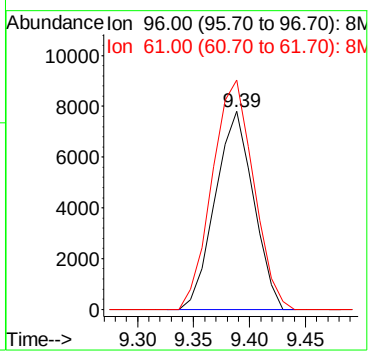


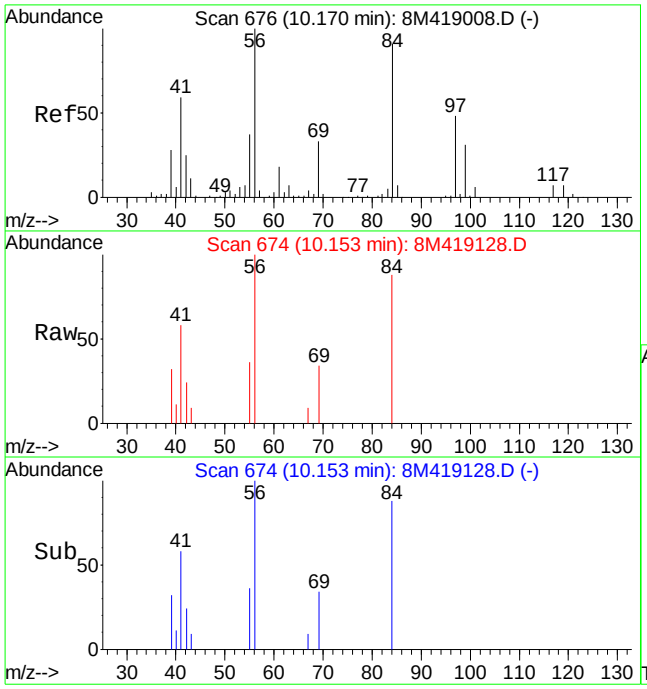


#32
cis-1,2-Dichloroethene
Concen: 2.38 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion: 96 Resp: 18554

Ion	Ratio	Lower	Upper
96	100		
61	125.6	80.3	187.3

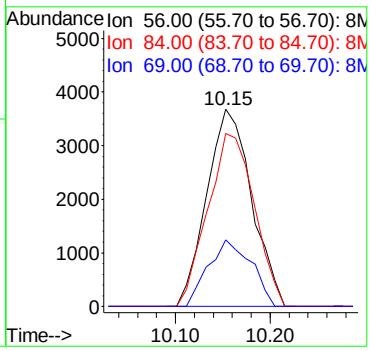


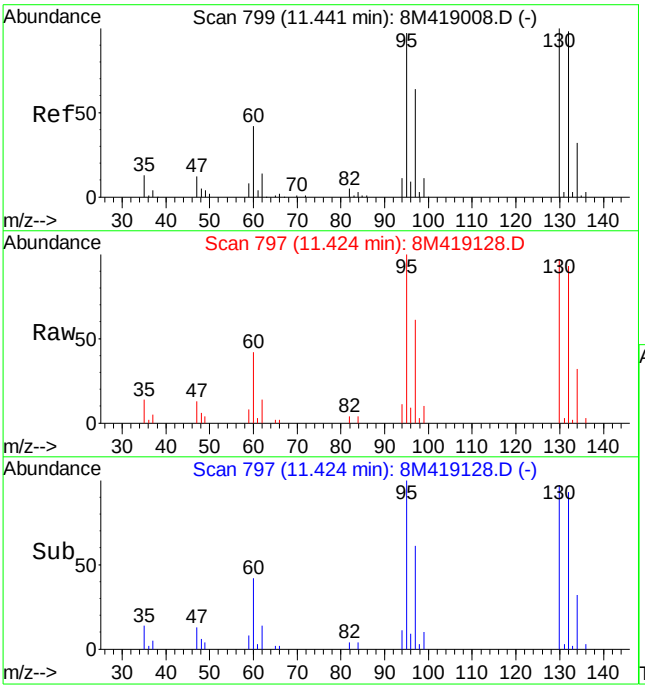


#39
Cyclohexane
Concen: 1.19 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion: 56 Resp: 12065

Ion	Ratio	Lower	Upper
56	100		
84	90.8	61.6	143.8
69	32.2	21.4	50.0

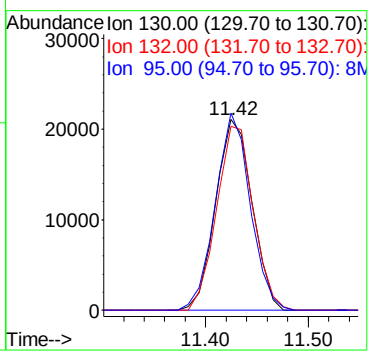


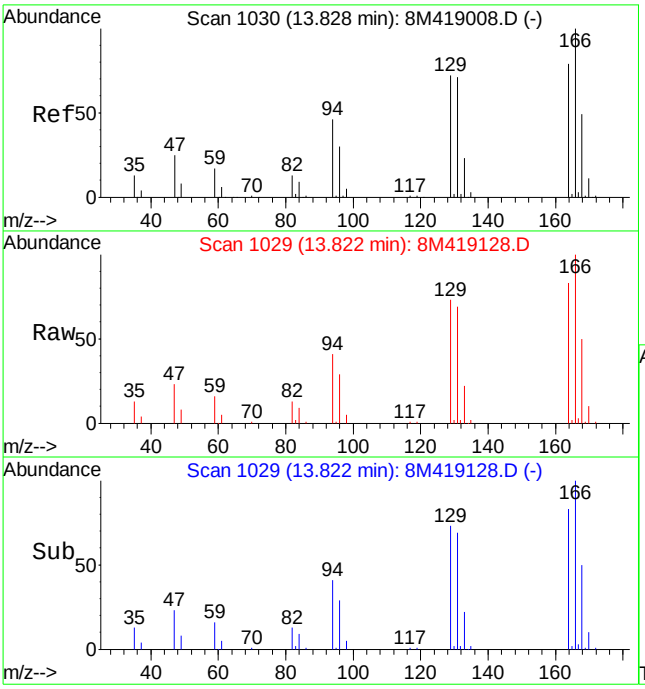


#47
Trichloroethene
Concen: 6.67 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion:130 Resp: 51912

Ion	Ratio	Lower	Upper
130	100		
132	97.2	59.4	138.6
95	99.2	60.1	140.3

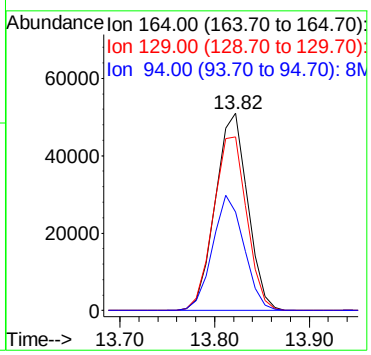




#66
Tetrachloroethene
Concen: 19.22 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419128.D
Acq: 24 Apr 2017 17:49

Tgt Ion:164 Resp: 120374

Ion	Ratio	Lower	Upper
164	100		
129	90.6	53.4	124.6
94	56.9	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419129.D Vial: 15
Acq On : 24 Apr 2017 18:19 Operator: TMB
Sample : L17041075-03 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 18:41:54 2017 Quant Results File: 8260WT.RES

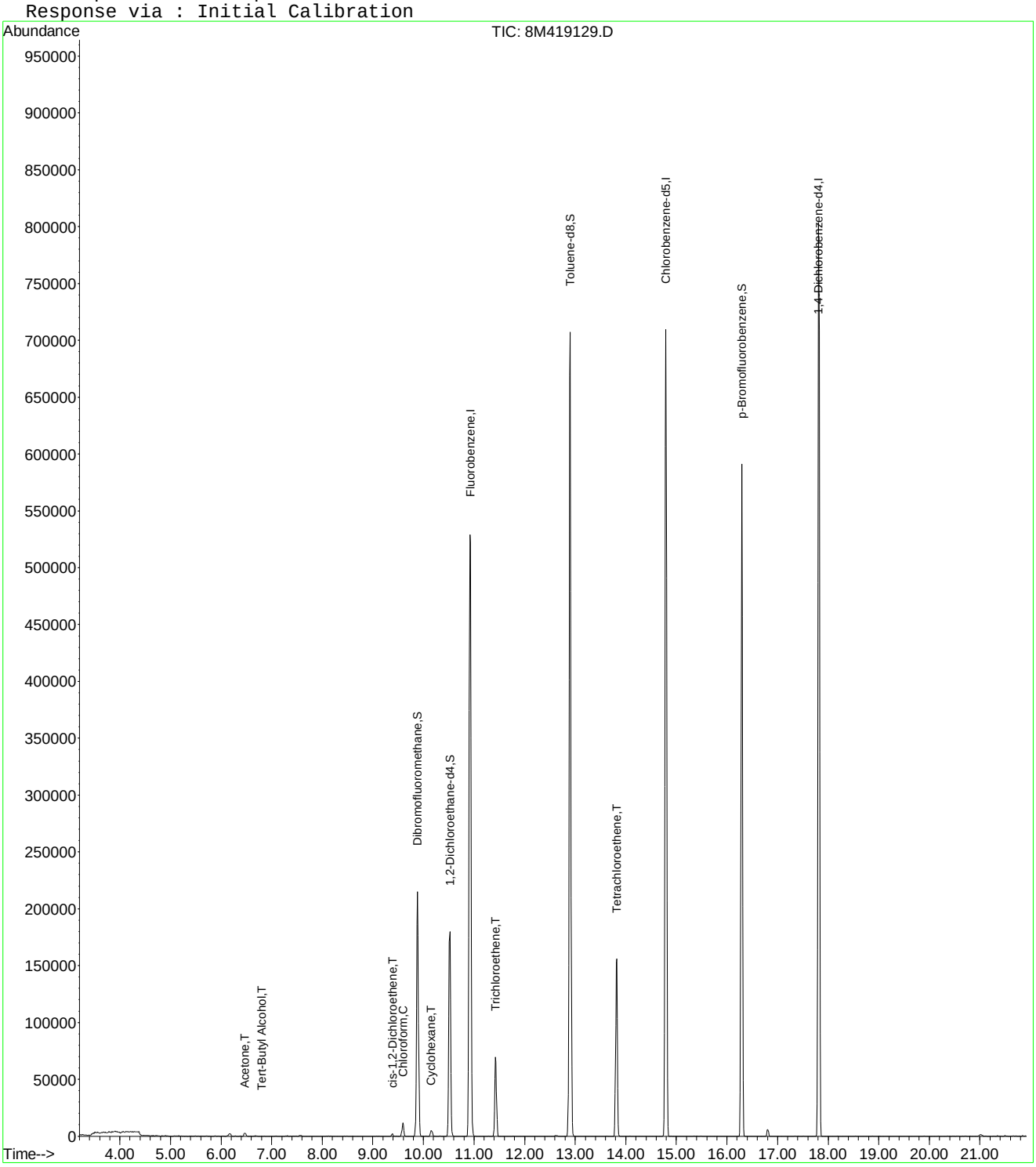
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

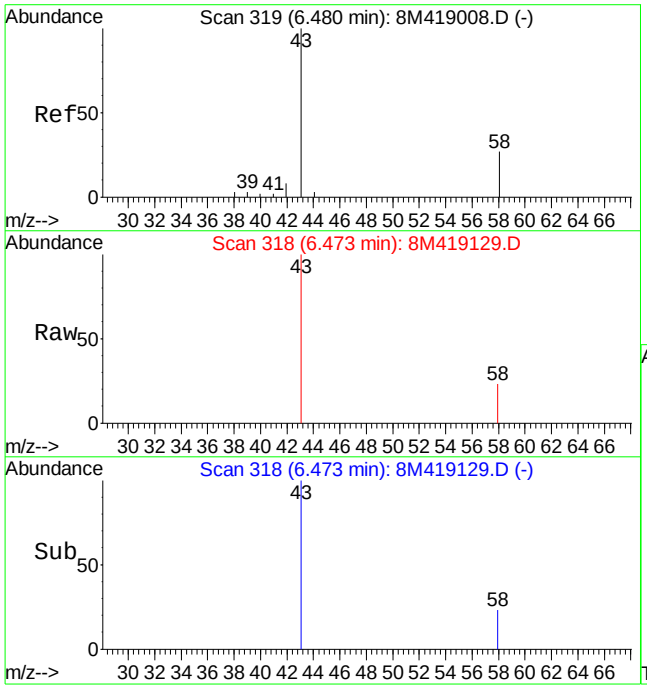
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	674511	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	530623	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	269992	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	178376	25.2128 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.84%		
43) 1,2-Dichloroethane-d4	10.52	65	155857	25.4825 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.92%		
58) Toluene-d8	12.90	98	649632	26.7943 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.16%		
80) p-Bromofluorobenzene	16.29	95	245647	25.7793 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.12%		
Target Compounds					Qvalue
13) Acetone	6.47	43	5244	5.5278 ug/L	79
15) Tert-Butyl Alcohol	6.80	59	213	0.6927 ug/L #	59
32) cis-1,2-Dichloroethene	9.39	96	1325	0.1687 ug/L	87
33) Chloroform	9.59	83	13565	1.0009 ug/L	99
39) Cyclohexane	10.15	56	4115	0.4041 ug/L #	74
47) Trichloroethene	11.42	130	31052	3.9669 ug/L	98
66) Tetrachloroethene	13.82	164	49938	8.0491 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419129.D 8260WT.M Tue Apr 25 08:36:32 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419129.D Vial: 15
Acq On : 24 Apr 2017 18:19 Operator: TMB
Sample : L17041075-03 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 18:41 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

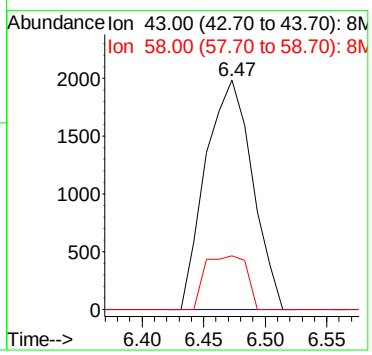


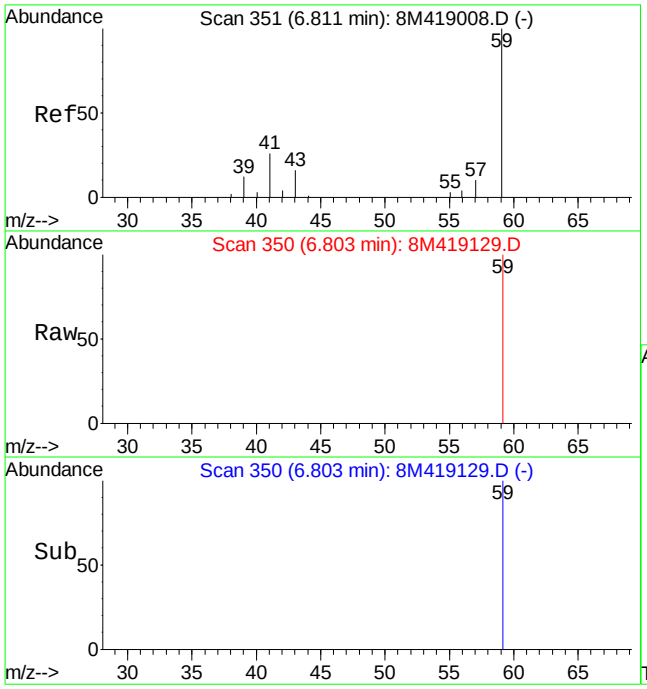


#13
Acetone
Concen: 5.53 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion: 43 Resp: 5244

Ion	Ratio	Lower	Upper
43	100		
58	20.7	19.4	45.4

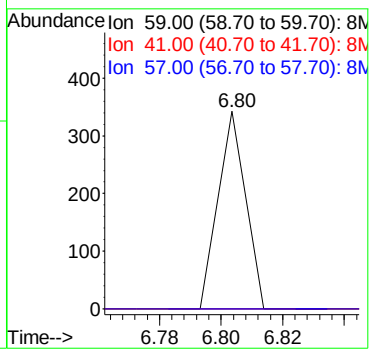


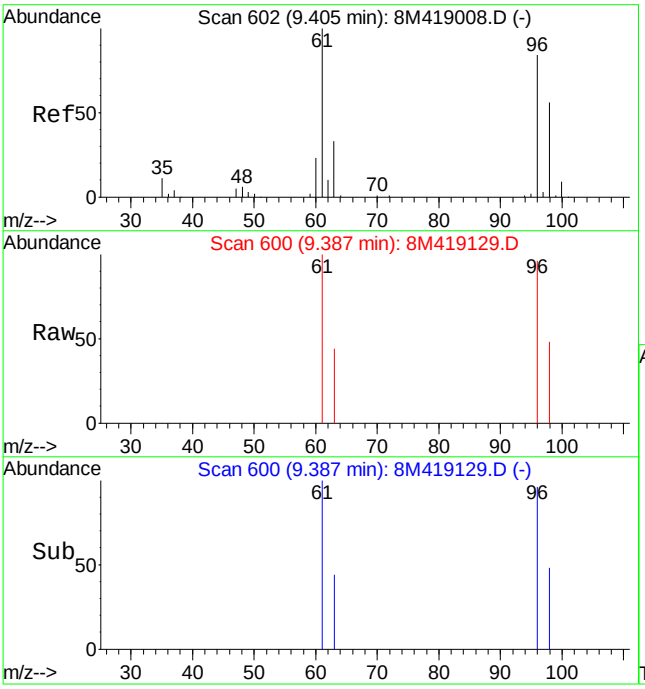


#15
Tert-Butyl Alcohol
Concen: 0.69 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion: 59 Resp: 213

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

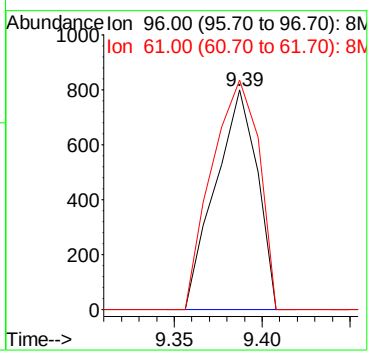


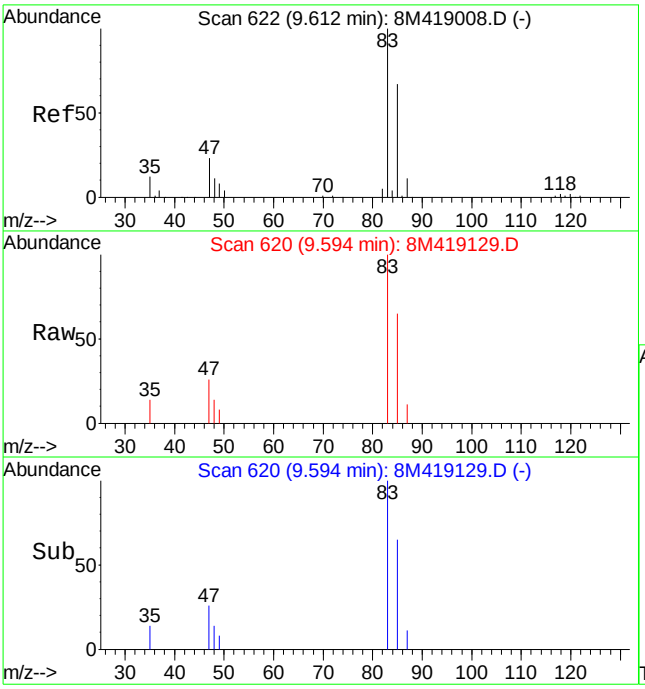


#32
cis-1,2-Dichloroethene
Concen: 0.17 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion: 96 Resp: 1325

Ion	Ratio	Lower	Upper
96	100		
61	118.0	80.3	187.3

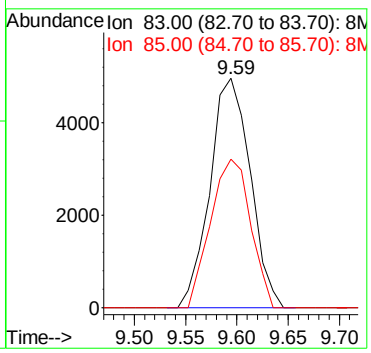


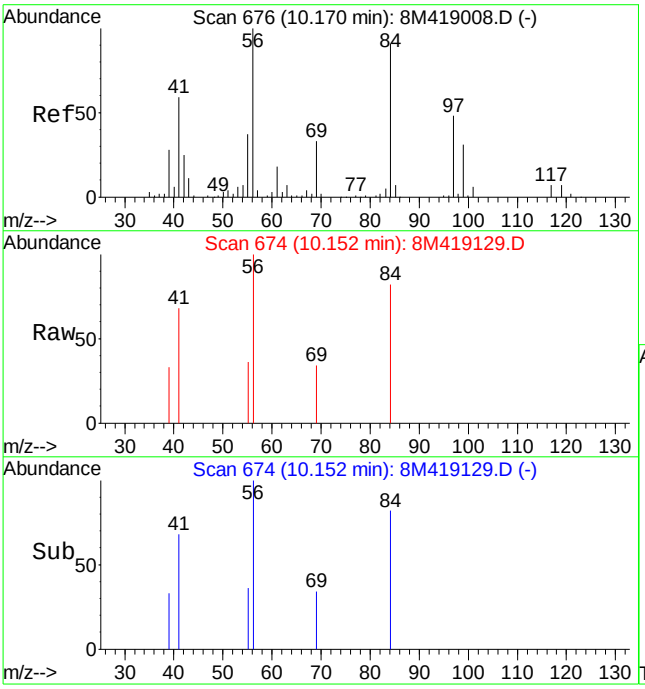


#33
Chloroform
Concen: 1.00 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion: 83 Resp: 13565

Ion	Ratio	Lower	Upper
83	100		
85	64.1	39.1	91.3

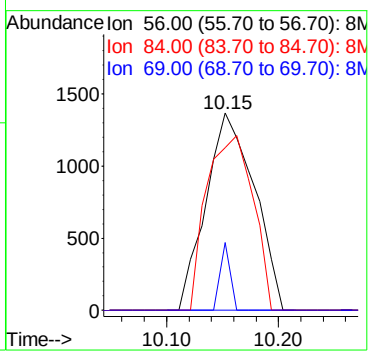


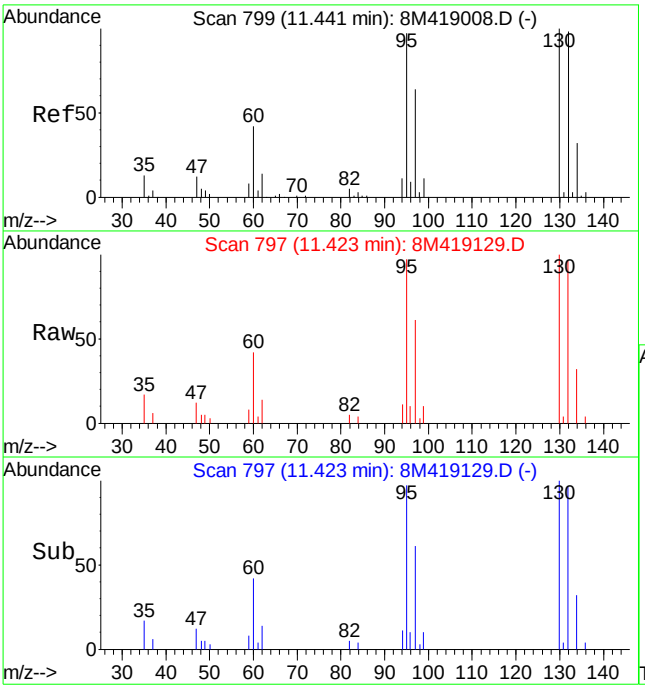


#39
Cyclohexane
Concen: 0.40 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion: 56 Resp: 4115

Ion	Ratio	Lower	Upper
56	100		
84	84.8	61.6	143.8
69	7.1	21.4	50.0#

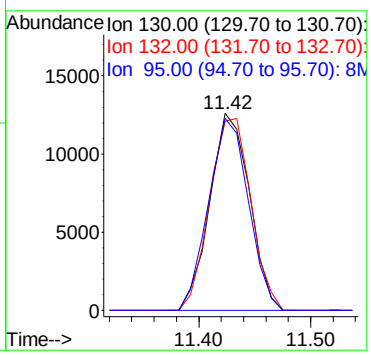


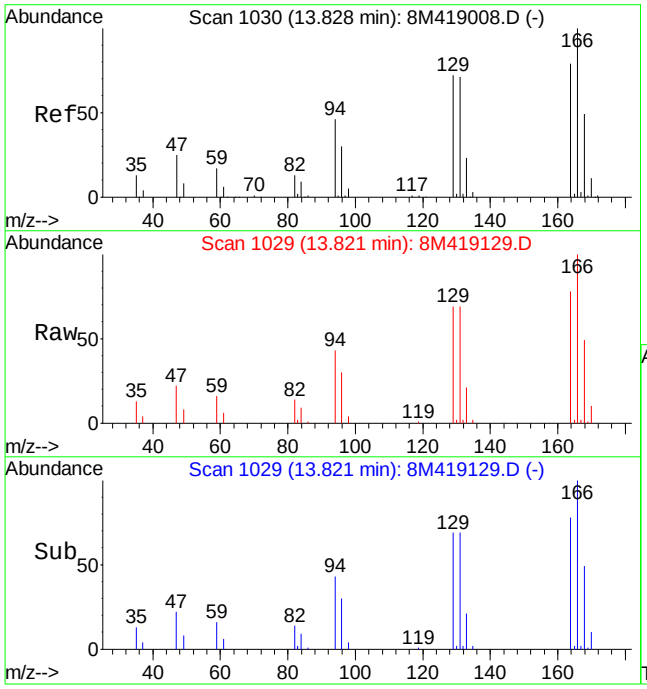


#47
Trichloroethene
Concen: 3.97 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion:130 Resp: 31052

Ion	Ratio	Lower	Upper
130	100		
132	101.3	59.4	138.6
95	97.8	60.1	140.3

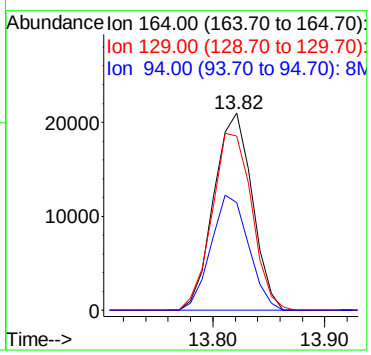




#66
Tetrachloroethene
Concen: 8.05 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419129.D
Acq: 24 Apr 2017 18:19

Tgt Ion:164 Resp: 49938

Ion	Ratio	Lower	Upper
164	100		
129	93.3	53.4	124.6
94	57.5	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419130.D Vial: 16
Acq On : 24 Apr 2017 18:50 Operator: TMB
Sample : L17041075-04 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 19:12:37 2017 Quant Results File: 8260WT.RES

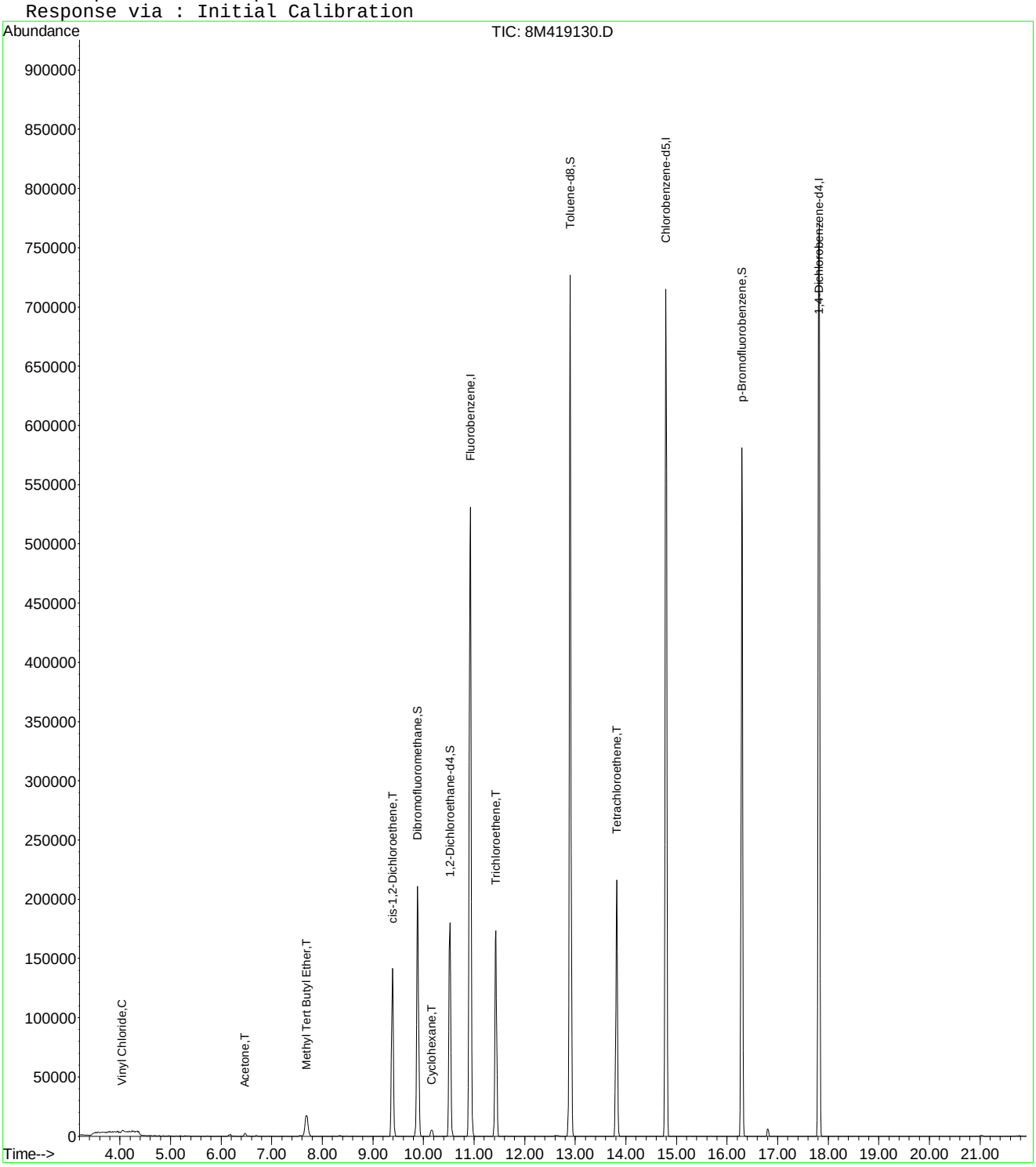
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

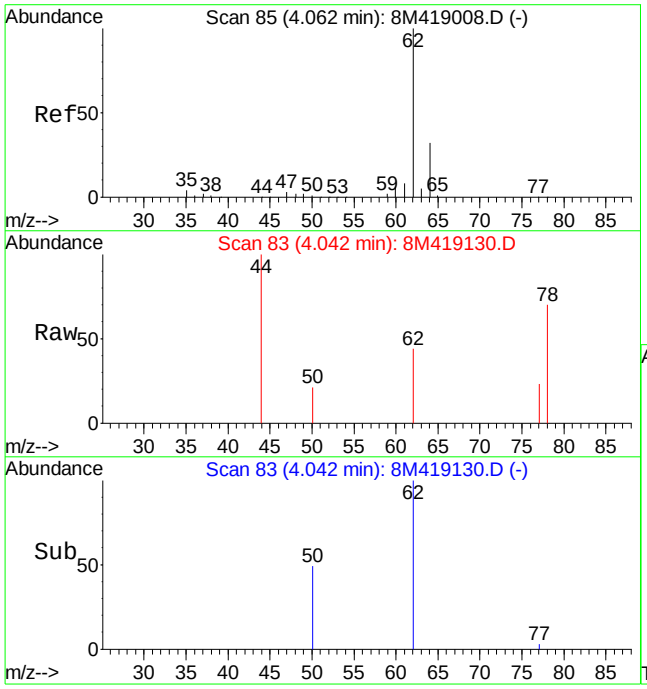
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	662832	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	532074	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	268890	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176904	25.4453	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.80%			
43) 1,2-Dichloroethane-d4	10.52	65	154151	25.6477	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.60%			
58) Toluene-d8	12.90	98	644848	26.5245	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%			
80) p-Bromofluorobenzene	16.29	95	249613	26.3029	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.20%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.04	62	1814	0.1713	ug/L #	65
13) Acetone	6.47	43	4599	4.9333	ug/L	97
22) Methyl Tert Butyl Ether	7.69	73	39963	2.9401	ug/L	96
32) cis-1,2-Dichloroethene	9.39	96	84319	10.9229	ug/L	90
39) Cyclohexane	10.16	56	4217	0.4214	ug/L	95
47) Trichloroethene	11.43	130	77097	10.0227	ug/L	98
66) Tetrachloroethene	13.82	164	66596	10.7047	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419130.D 8260WT.M Tue Apr 25 08:36:36 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419130.D Vial: 16
Acq On : 24 Apr 2017 18:50 Operator: TMB
Sample : L17041075-04 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 19:12 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

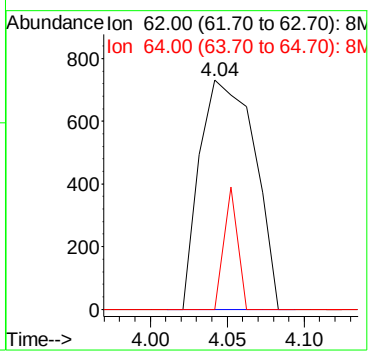


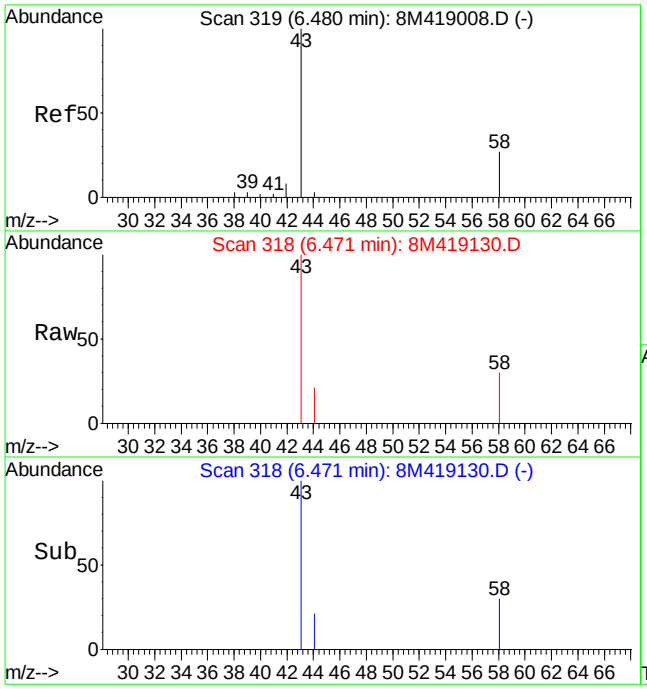


#4
Vinyl Chloride
Concen: 0.17 ug/L
RT: 4.04 min Scan# 83
Delta R.T. -0.01 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion: 62 Resp: 1814

Ion	Ratio	Lower	Upper
62	100		
64	13.4	19.9	46.3#

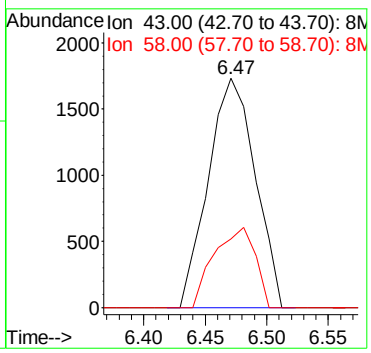


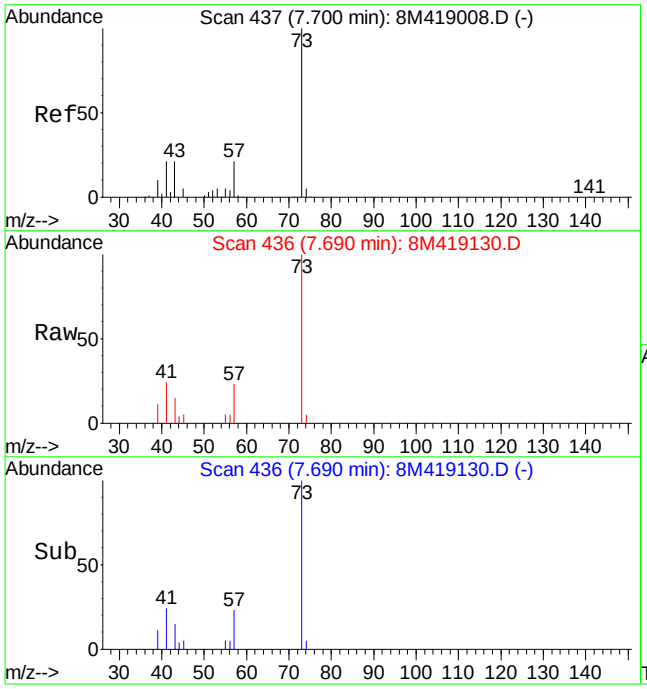


#13
Acetone
Concen: 4.93 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion: 43 Resp: 4599

Ion	Ratio	Lower	Upper
43	100		
58	30.6	19.4	45.4

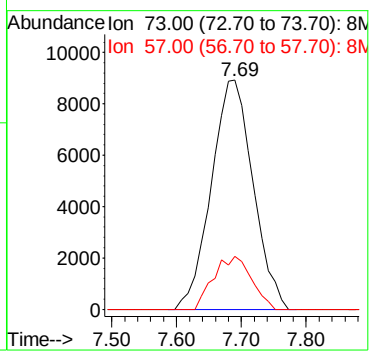


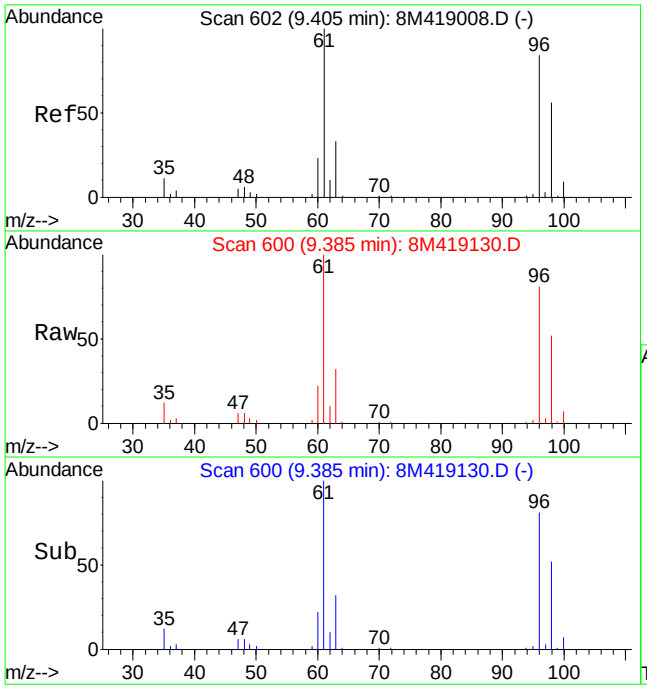


#22
Methyl Tert Butyl Ether
Concen: 2.94 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion: 73 Resp: 39963

Ion	Ratio	Lower	Upper
73	100		
57	20.9	11.4	26.6

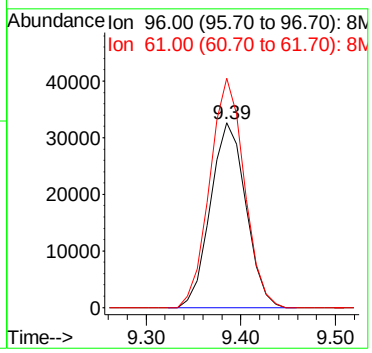


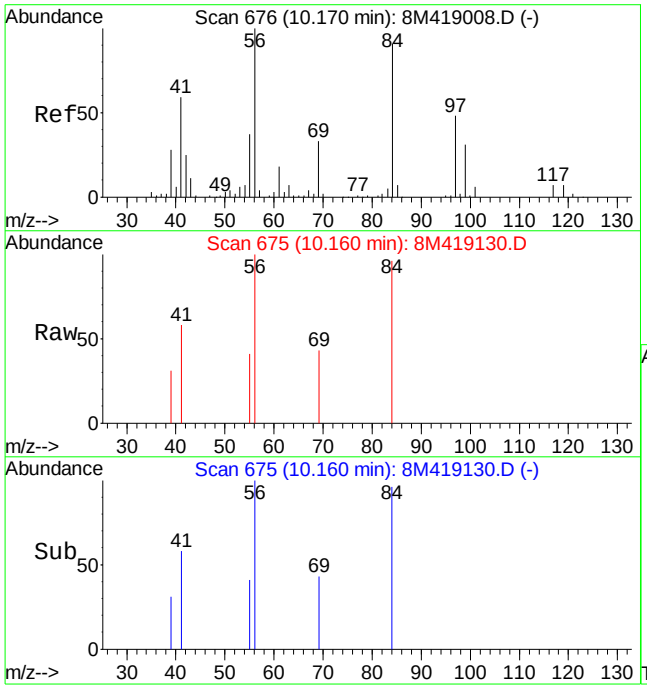


#32
cis-1,2-Dichloroethene
Concen: 10.92 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion: 96 Resp: 84319

Ion	Ratio	Lower	Upper
96	100		
61	121.5	80.3	187.3

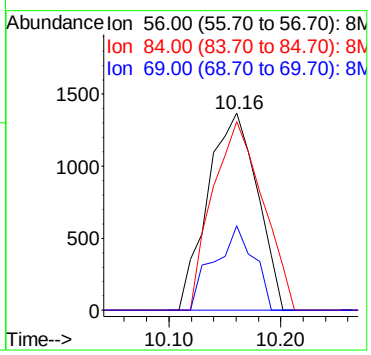


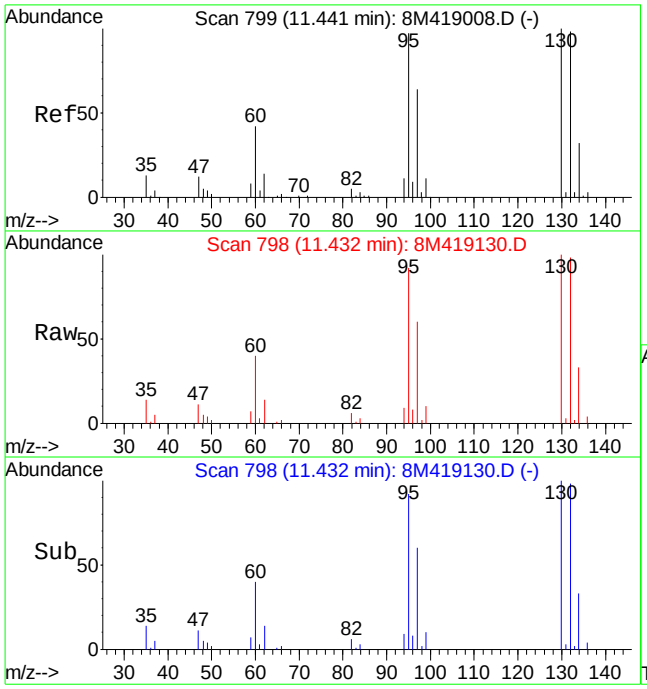


#39
Cyclohexane
Concen: 0.42 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion: 56 Resp: 4217

Ion	Ratio	Lower	Upper
56	100		
84	97.0	61.6	143.8
69	34.5	21.4	50.0

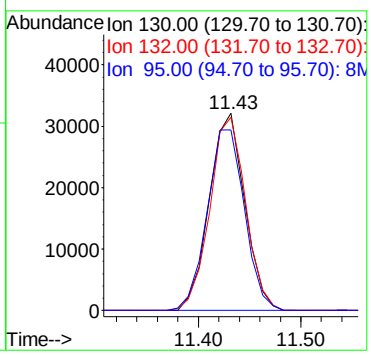


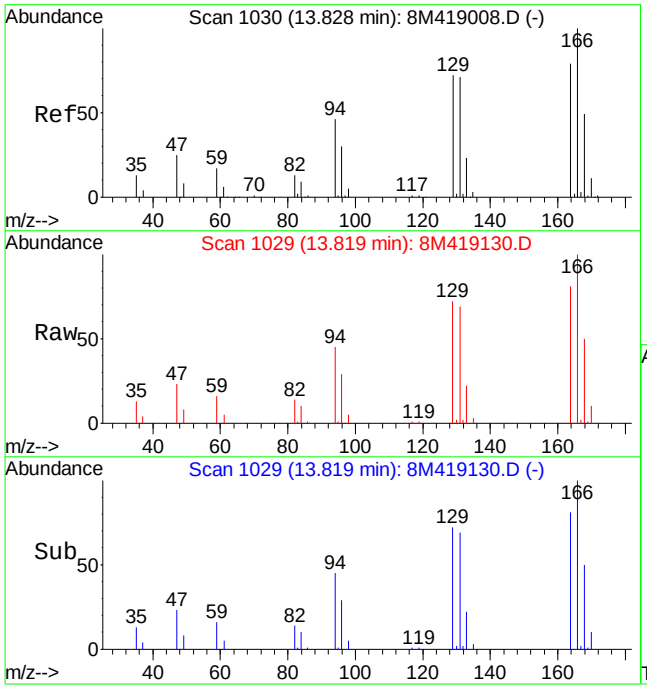


#47
Trichloroethene
Concen: 10.02 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion:130 Resp: 77097

Ion	Ratio	Lower	Upper
130	100		
132	98.6	59.4	138.6
95	96.5	60.1	140.3

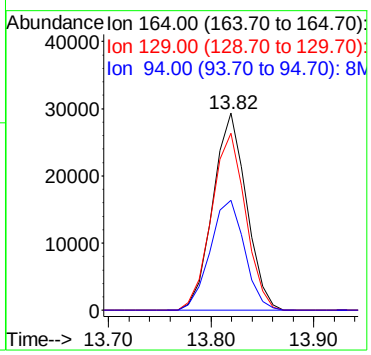




#66
Tetrachloroethene
Concen: 10.70 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419130.D
Acq: 24 Apr 2017 18:50

Tgt Ion:164 Resp: 66596

Ion	Ratio	Lower	Upper
164	100		
129	91.1	53.4	124.6
94	57.4	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419131.D Vial: 17
Acq On : 24 Apr 2017 19:21 Operator: TMB
Sample : L17041075-05 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 19:43:29 2017 Quant Results File: 8260WT.RES

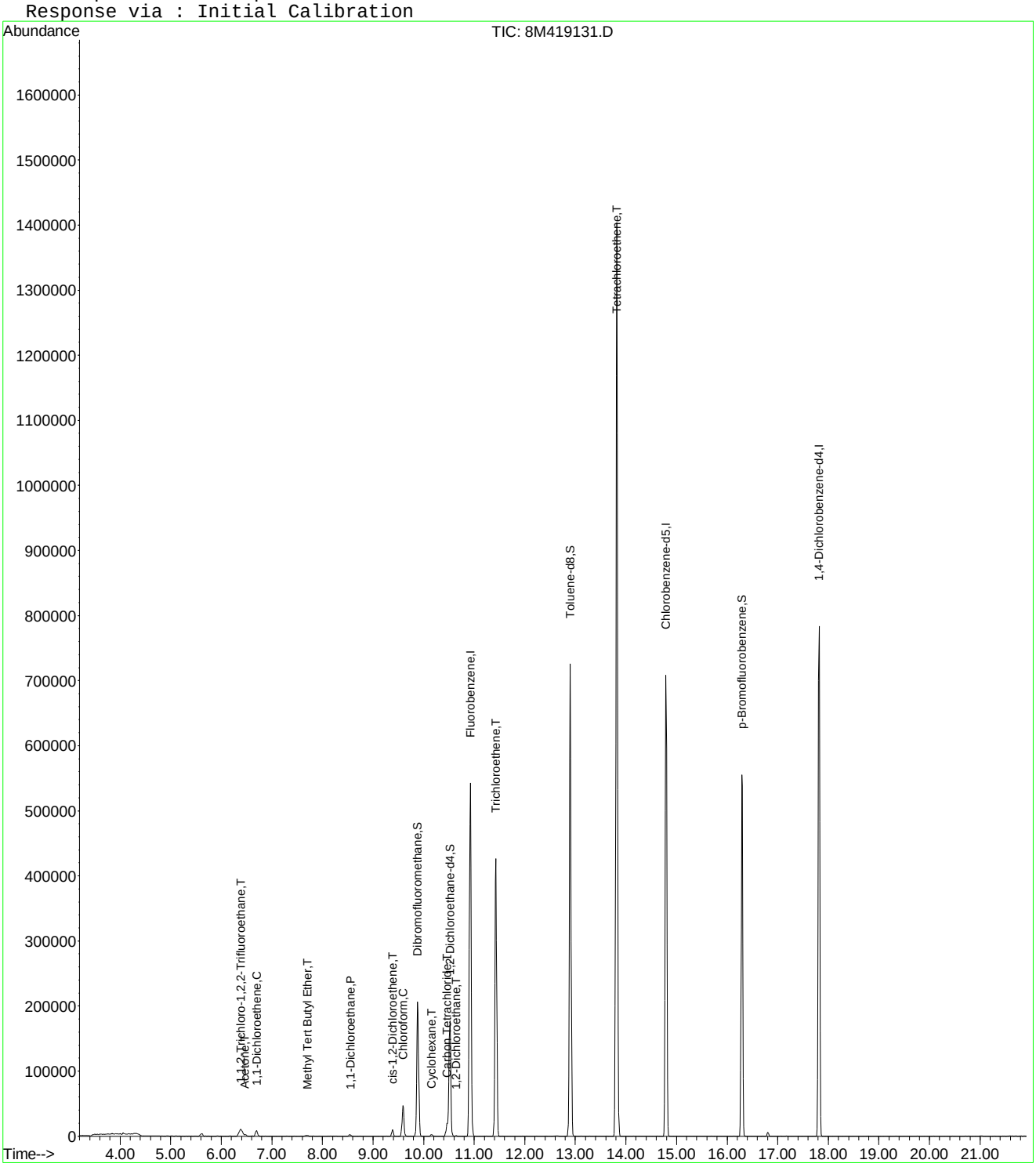
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

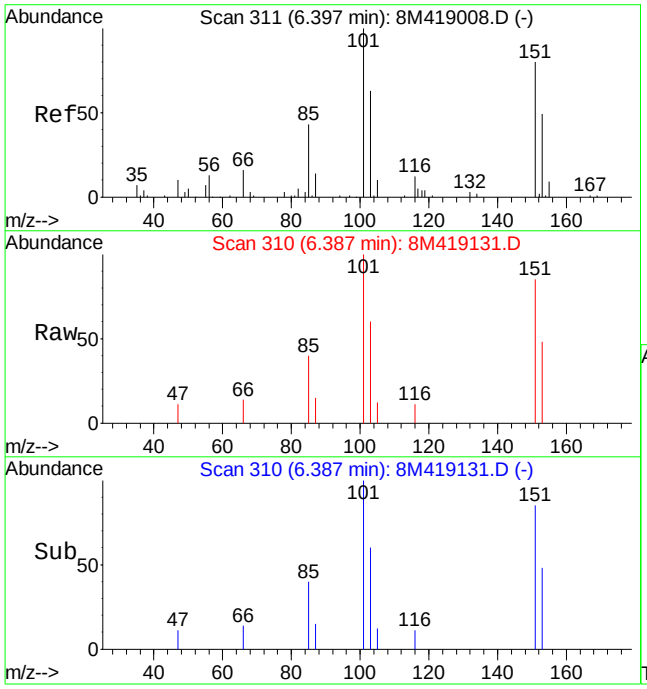
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	660178	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	528865	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	270846	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176688	25.5164	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.08%			
43) 1,2-Dichloroethane-d4	10.52	65	149572	24.9859	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.96%			
58) Toluene-d8	12.90	98	643613	26.6343	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
80) p-Bromofluorobenzene	16.29	95	243191	25.4411	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.76%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	13990	2.1415	ug/L	97
13) Acetone	6.47	43	5210	5.6112	ug/L	89
14) 1,1-Dichloroethene	6.70	61	9301	0.9728	ug/L	92
22) Methyl Tert Butyl Ether	7.70	73	5067	0.3743	ug/L #	58
27) 1,1-Dichloroethane	8.56	63	4636	0.3872	ug/L #	80
32) cis-1,2-Dichloroethene	9.38	96	6274	0.8160	ug/L	90
33) Chloroform	9.59	83	51163	3.8570	ug/L	99
39) Cyclohexane	10.16	56	2073	0.2080	ug/L #	78
42) Carbon Tetrachloride	10.46	117	20732	2.0887	ug/L	99
45) 1,2-Dichloroethane	10.64	62	1685	0.2246	ug/L #	53
47) Trichloroethene	11.43	130	183940	24.0086	ug/L	99
66) Tetrachloroethene	13.82	164	424011	68.5697	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419131.D 8260WT.M Tue Apr 25 08:36:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419131.D Vial: 17
Acq On : 24 Apr 2017 19:21 Operator: TMB
Sample : L17041075-05 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 19:43 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

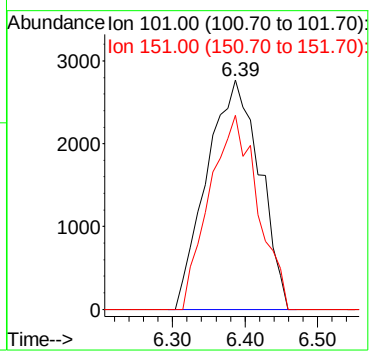


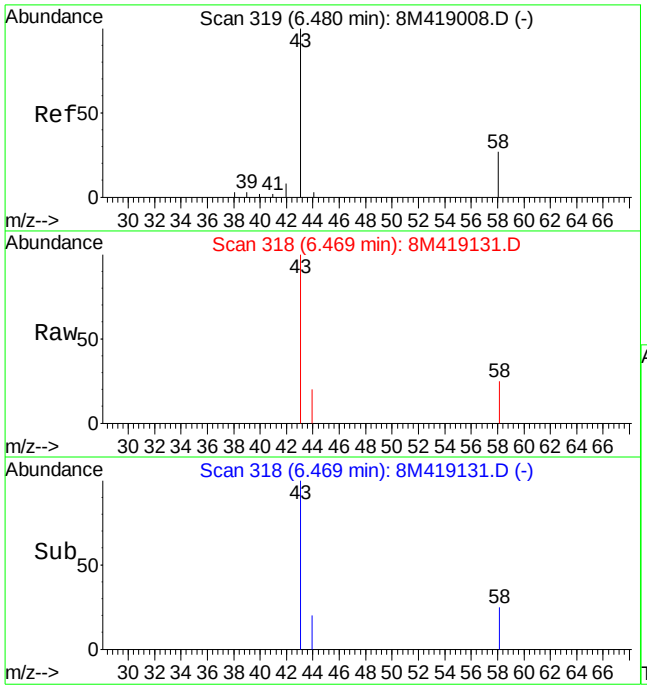


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 2.14 ug/L
RT: 6.39 min Scan# 310
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion:101 Resp: 13990

Ion	Ratio	Lower	Upper
101	100		
151	76.9	39.9	119.9

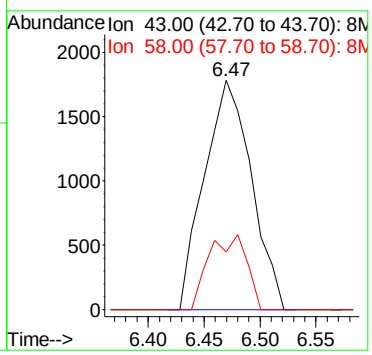


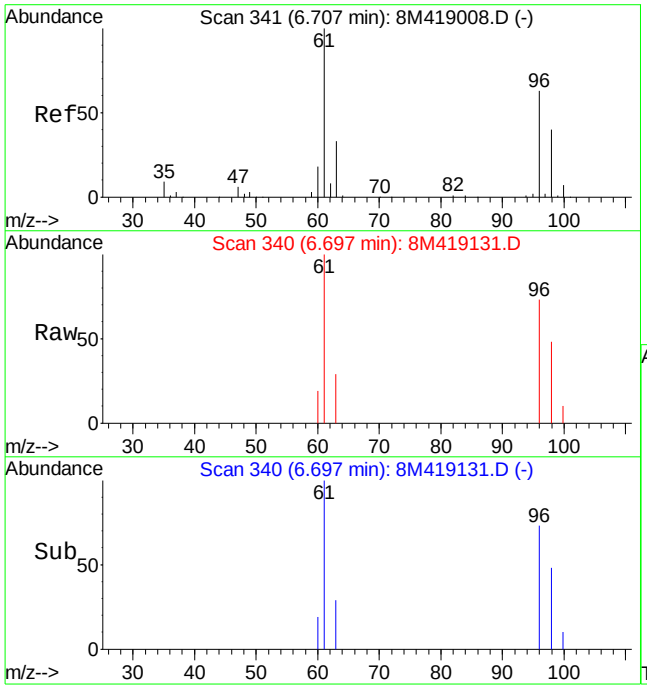


#13
Acetone
Concen: 5.61 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 43 Resp: 5210

Ion	Ratio	Lower	Upper
43	100		
58	26.1	19.4	45.4

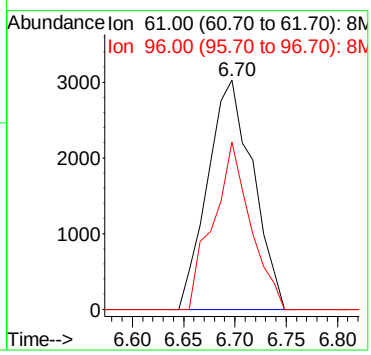


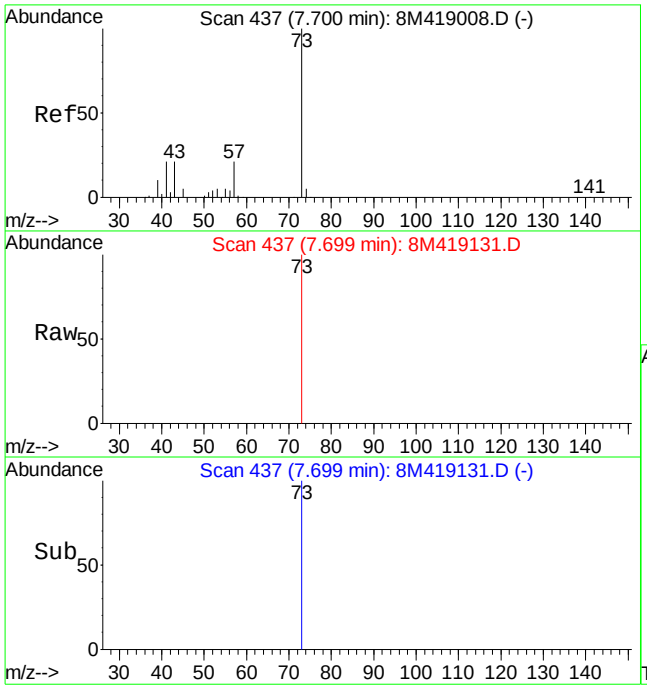


#14
1,1-Dichloroethene
Concen: 0.97 ug/L
RT: 6.70 min Scan# 340
Delta R.T. -0.00 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 61 Resp: 9301

Ion	Ratio	Lower	Upper
61	100		
96	60.3	40.0	93.4

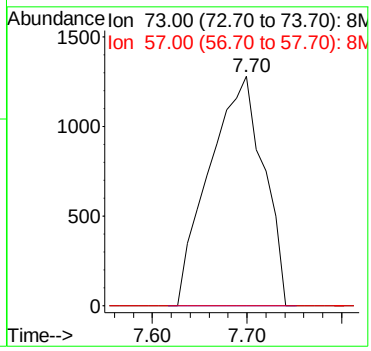


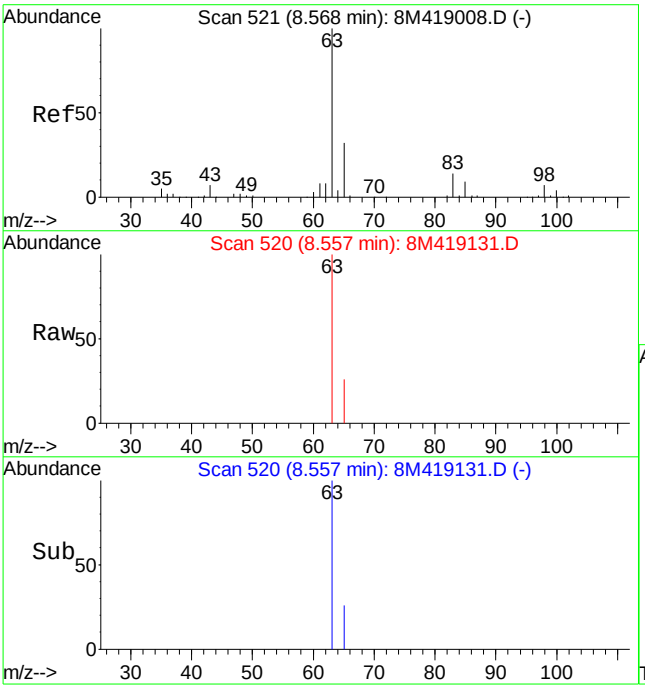


#22
Methyl Tert Butyl Ether
Concen: 0.37 ug/L
RT: 7.70 min Scan# 437
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 73 Resp: 5067

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

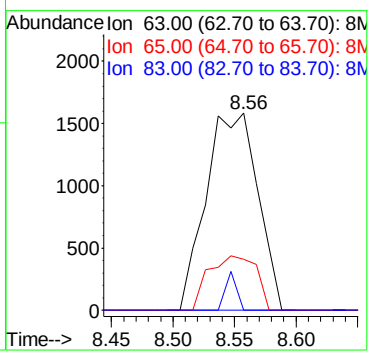


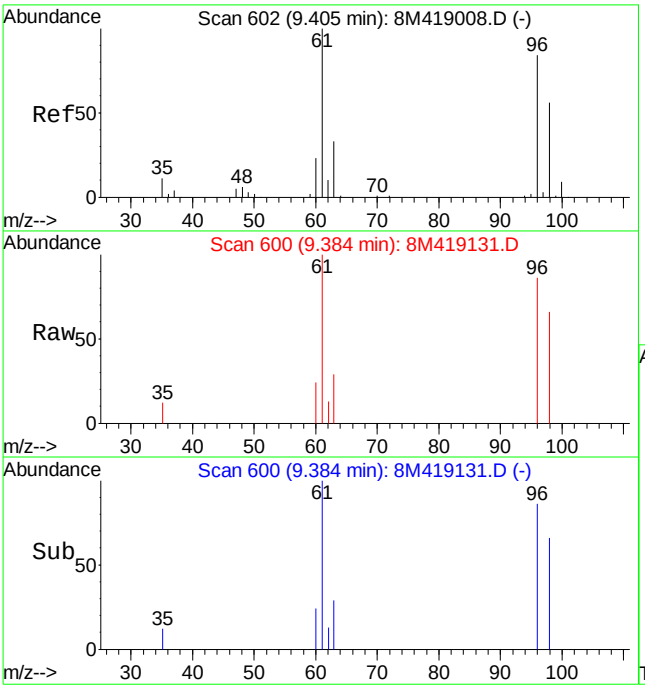


#27
1,1-Dichloroethane
Concen: 0.39 ug/L
RT: 8.56 min Scan# 520
Delta R.T. -0.00 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 63 Resp: 4636

Ion	Ratio	Lower	Upper
63	100		
65	25.2	19.1	44.7
83	0.0	9.0	21.0#

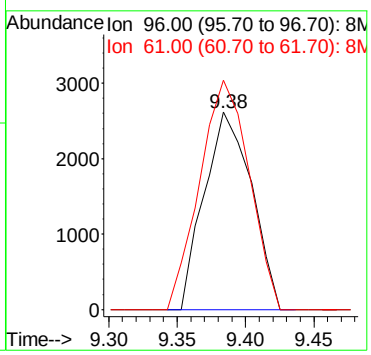


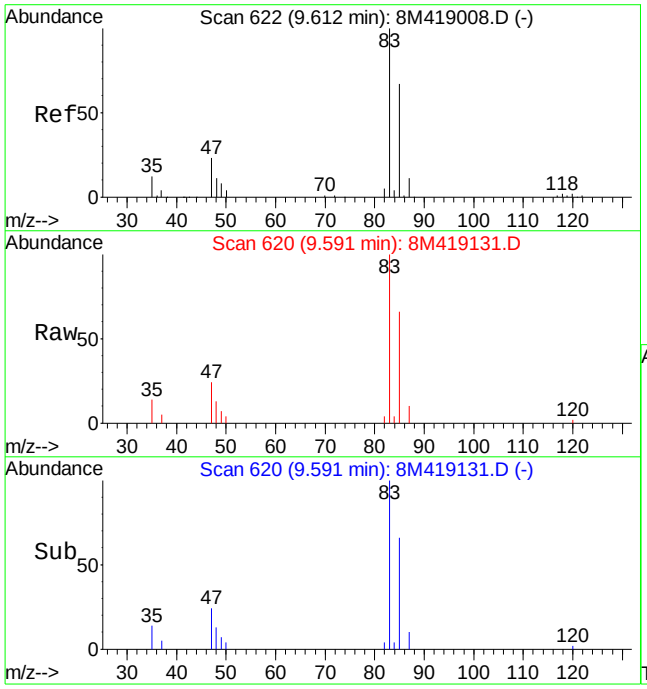


#32
cis-1,2-Dichloroethene
Concen: 0.82 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 96 Resp: 6274

Ion	Ratio	Lower	Upper
96	100		
61	121.8	80.3	187.3

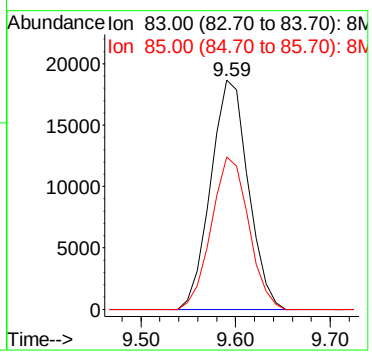


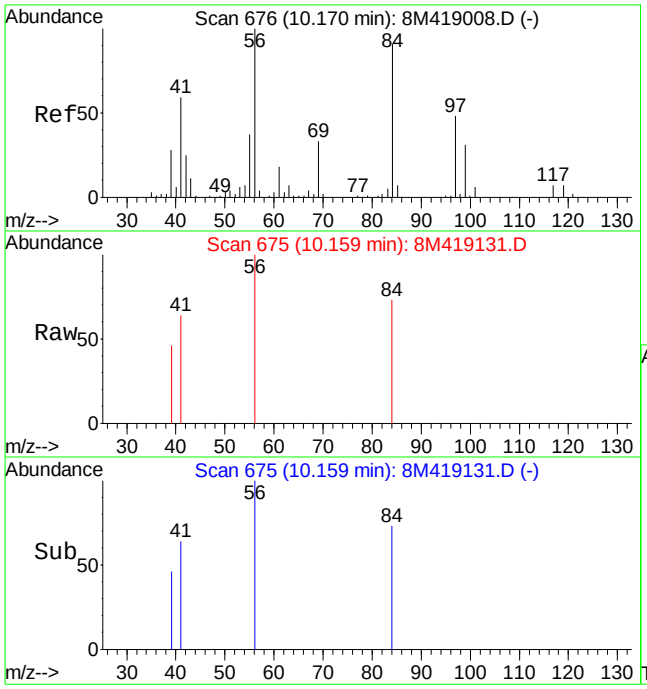


#33
Chloroform
Concen: 3.86 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 83 Resp: 51163

Ion	Ratio	Lower	Upper
83	100		
85	66.0	39.1	91.3

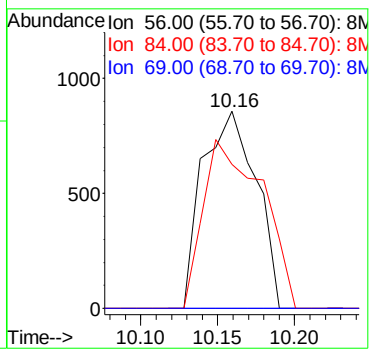


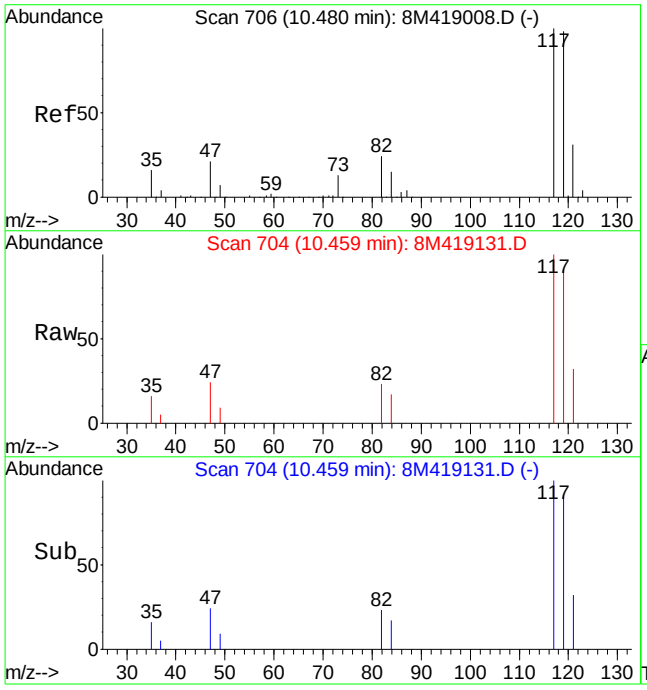


#39
Cyclohexane
Concen: 0.21 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 56 Resp: 2073

Ion	Ratio	Lower	Upper
56	100		
84	94.5	61.6	143.8
69	0.0	21.4	50.0#

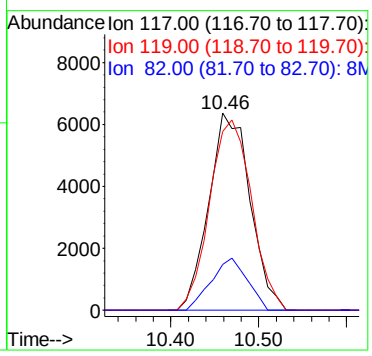


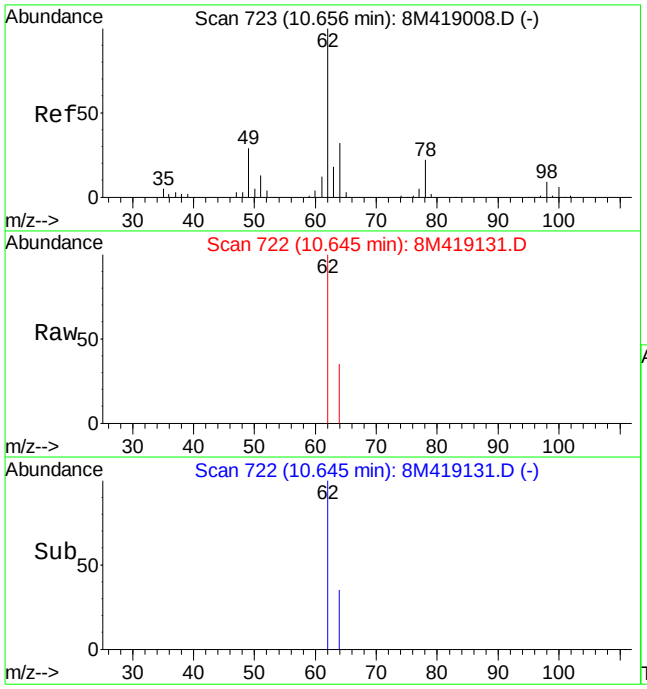


#42
Carbon Tetrachloride
Concen: 2.09 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion:117 Resp: 20732

Ion	Ratio	Lower	Upper
117	100		
119	98.2	58.5	136.5
82	23.2	14.9	34.9

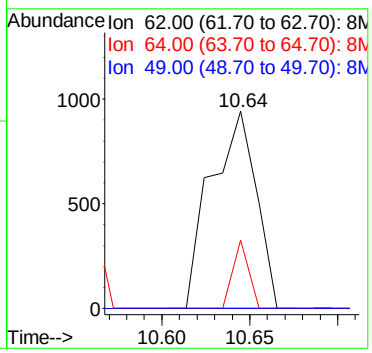


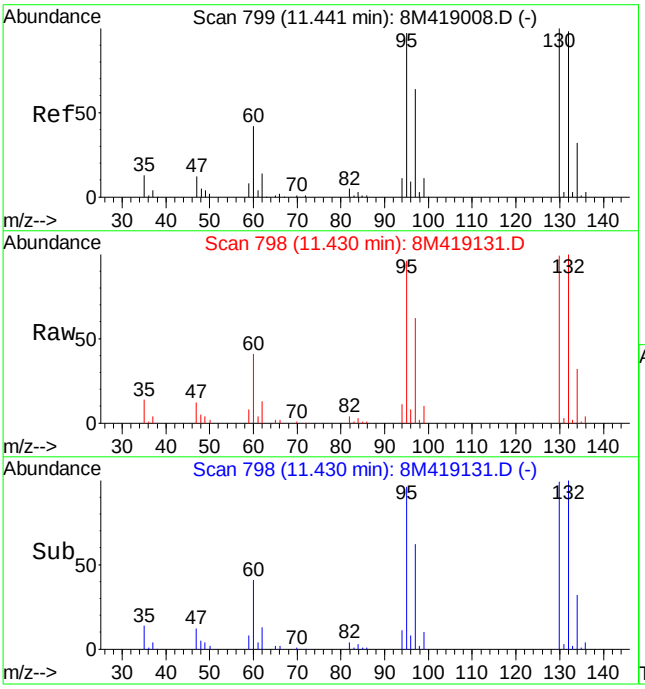


#45
1,2-Dichloroethane
Concen: 0.22 ug/L
RT: 10.64 min Scan# 722
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion: 62 Resp: 1685

Ion	Ratio	Lower	Upper
62	100		
64	12.0	19.6	45.8#
49	0.0	19.4	45.4#

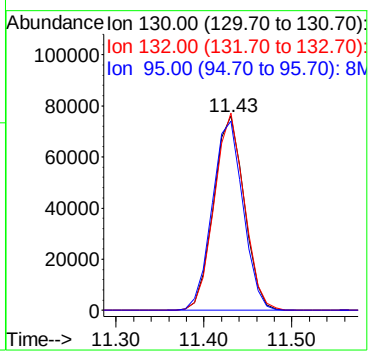


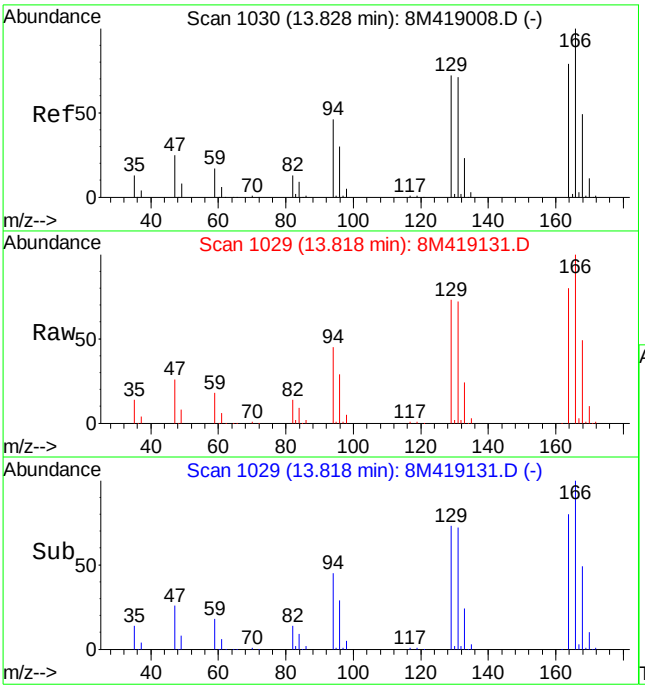


#47
Trichloroethene
Concen: 24.01 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion:130 Resp: 183940

Ion	Ratio	Lower	Upper
130	100		
132	99.6	59.4	138.6
95	98.2	60.1	140.3

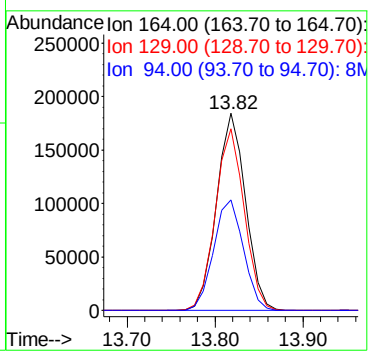




#66
Tetrachloroethene
Concen: 68.57 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419131.D
Acq: 24 Apr 2017 19:21

Tgt Ion:164 Resp: 424011

Ion	Ratio	Lower	Upper
164	100		
129	91.4	53.4	124.6
94	57.5	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419146.D Vial: 11
Acq On : 25 Apr 2017 16:16 Operator: TMB
Sample : L17041075-06 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 16:37:58 2017 Quant Results File: 8260WT.RES

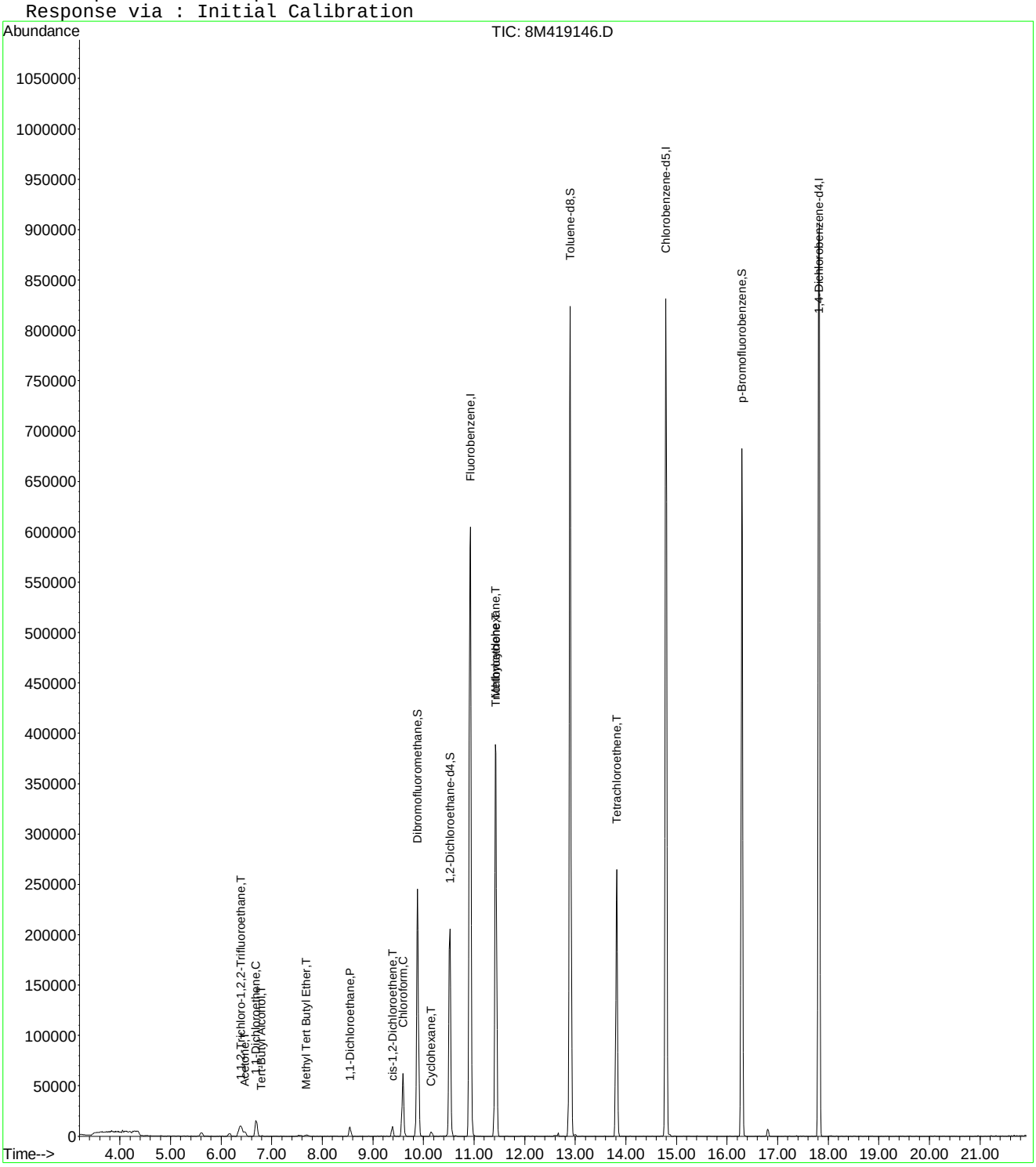
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

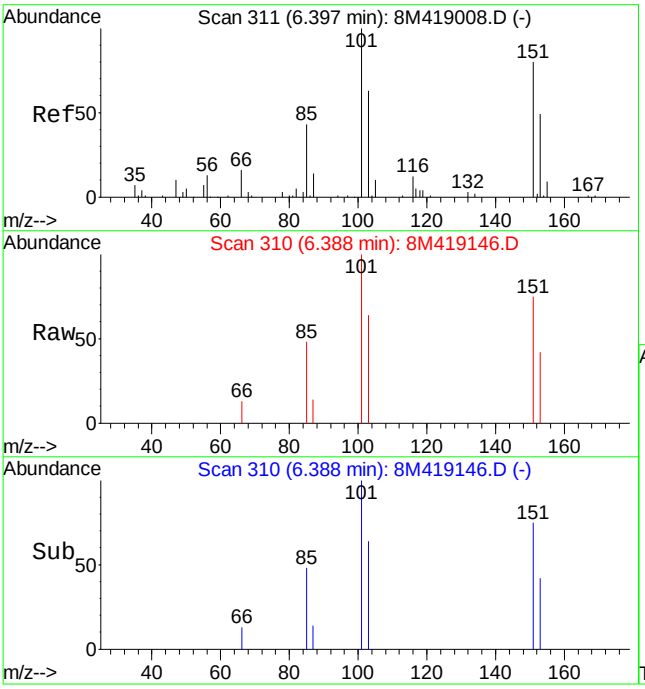
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	762977	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	612306	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	315712	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	202534	25.3081	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.52	65	179413	25.9327	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.72%			
58) Toluene-d8	12.90	98	737793	26.3711	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.48%			
80) p-Bromofluorobenzene	16.29	95	291000	26.1164	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.48%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	13788	1.8262	ug/L	98
13) Acetone	6.47	43	9101	8.4812	ug/L	92
14) 1,1-Dichloroethene	6.69	61	17236	1.5598	ug/L	97
15) Tert-Butyl Alcohol	6.79	59	600	1.7249	ug/L #	59
22) Methyl Tert Butyl Ether	7.68	73	4724	0.3019	ug/L #	67
27) 1,1-Dichloroethane	8.55	63	15100	1.0914	ug/L	97
32) cis-1,2-Dichloroethene	9.39	96	5808	0.6536	ug/L	99
33) Chloroform	9.59	83	63857	4.1654	ug/L	97
39) Cyclohexane	10.15	56	3533	0.3067	ug/L #	68
47) Trichloroethene	11.43	130	173424	19.5861	ug/L	98
48) Methylcyclohexane	11.42	83	2054	0.1740	ug/L #	1
66) Tetrachloroethene	13.82	164	81586	11.3959	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419146.D 8260WT.M Wed Apr 26 07:13:30 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419146.D Vial: 11
Acq On : 25 Apr 2017 16:16 Operator: TMB
Sample : L17041075-06 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 16:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

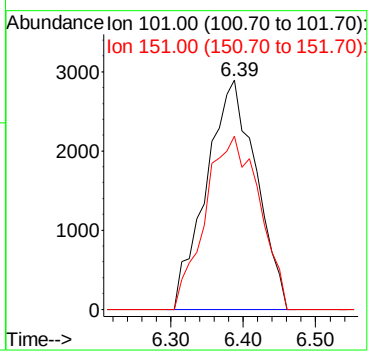


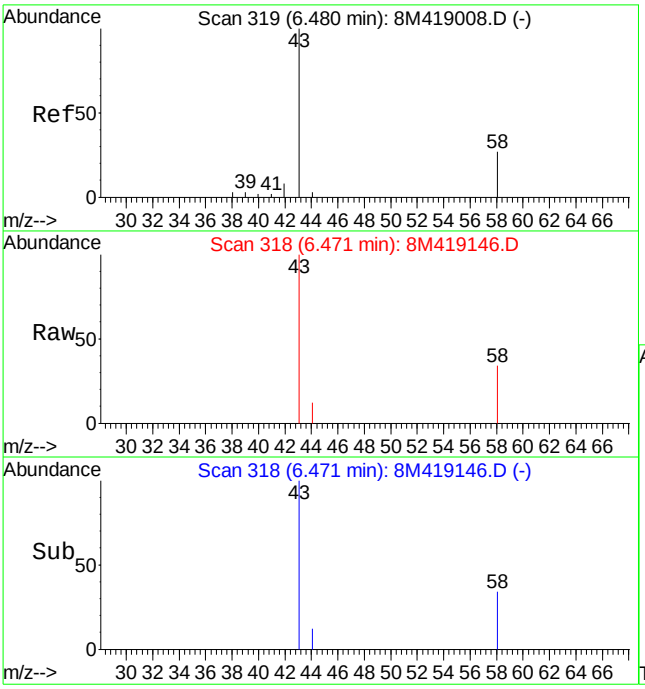


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.83 ug/L
RT: 6.39 min Scan# 310
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion:101 Resp: 13788

Ion	Ratio	Lower	Upper
101	100		
151	82.0	39.9	119.9

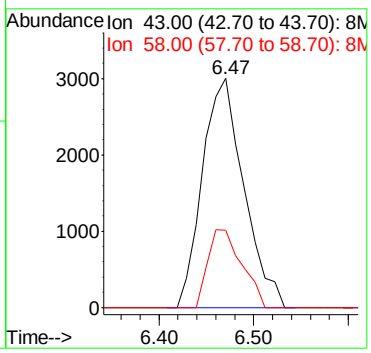


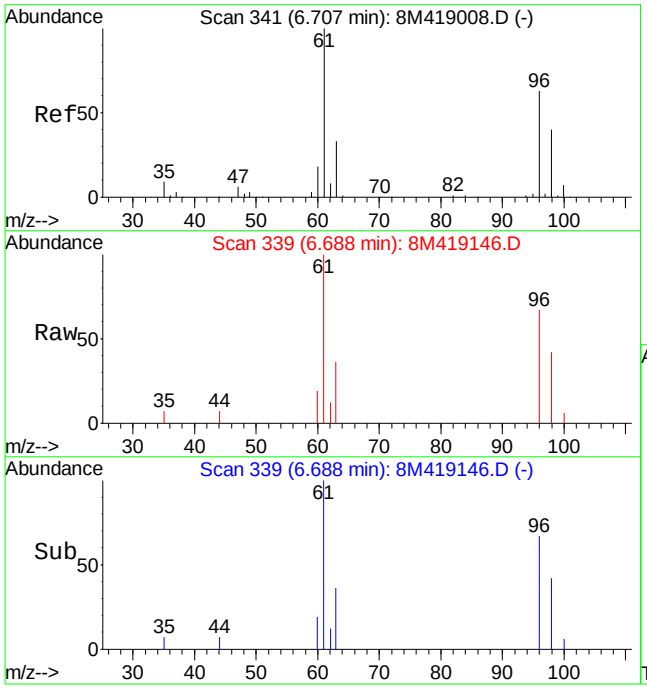


#13
Acetone
Concen: 8.48 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 43 Resp: 9101

Ion	Ratio	Lower	Upper
43	100		
58	27.7	19.4	45.4

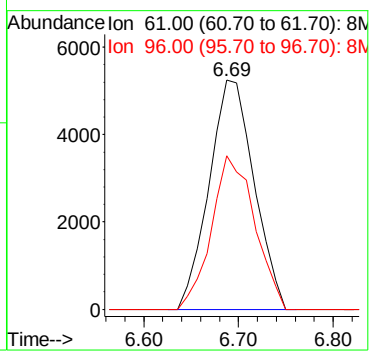


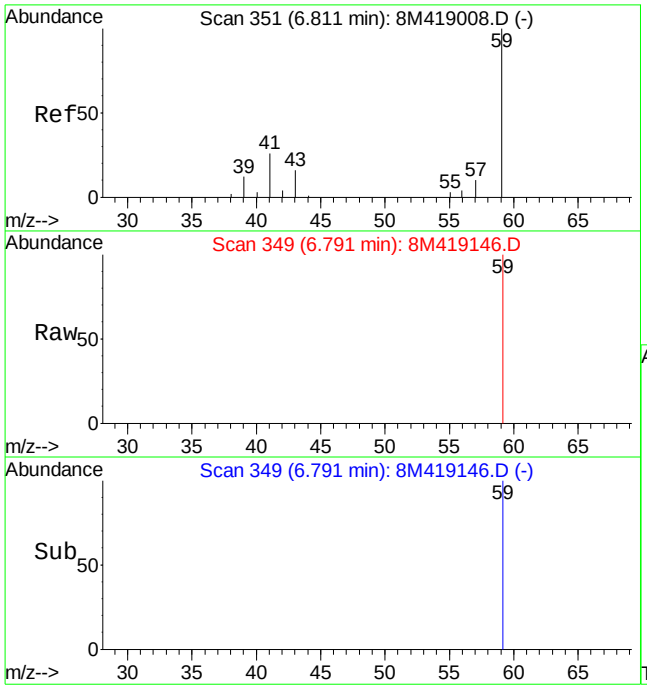


#14
1,1-Dichloroethene
Concen: 1.56 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 61 Resp: 17236

Ion	Ratio	Lower	Upper
61	100		
96	64.3	40.0	93.4

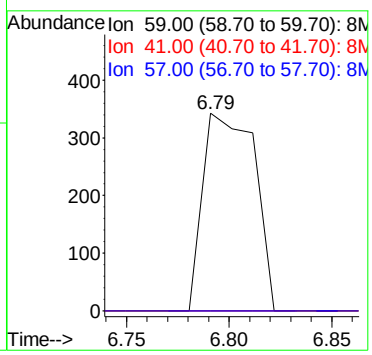


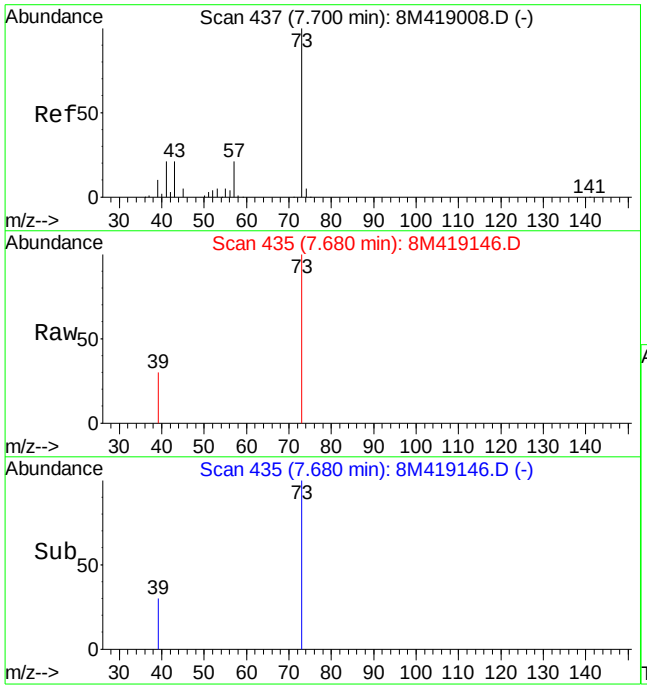


#15
Tert-Butyl Alcohol
Concen: 1.72 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 59 Resp: 600

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

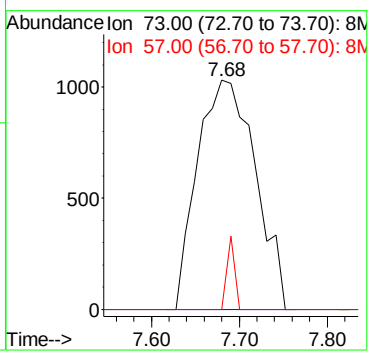


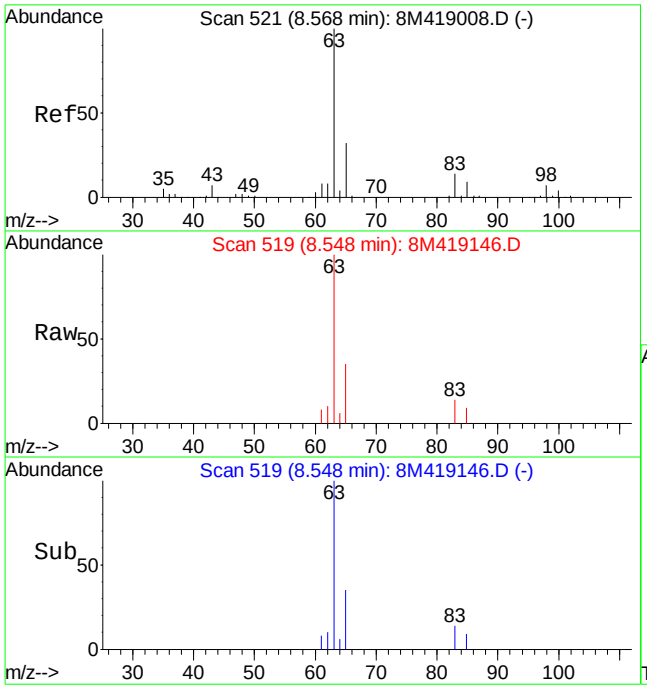


#22
Methyl Tert Butyl Ether
Concen: 0.30 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 73 Resp: 4724

Ion	Ratio	Lower	Upper
73	100		
57	4.3	11.4	26.6#

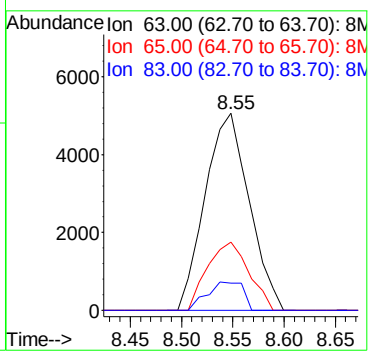


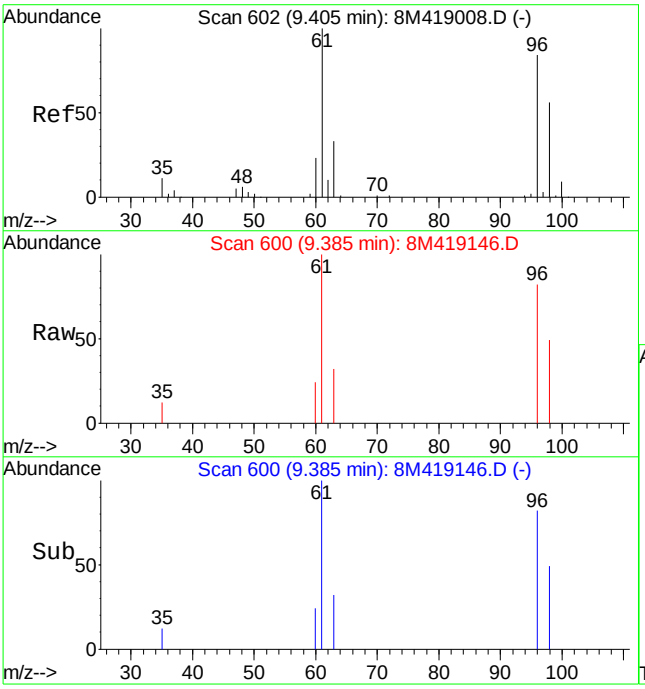


#27
1,1-Dichloroethane
Concen: 1.09 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 63 Resp: 15100

Ion	Ratio	Lower	Upper
63	100		
65	32.6	19.1	44.7
83	11.8	9.0	21.0

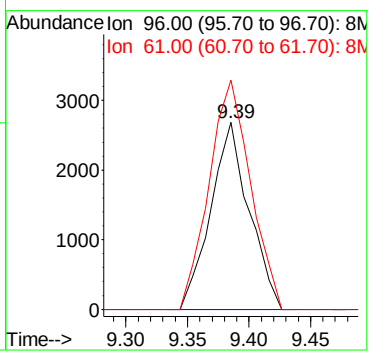


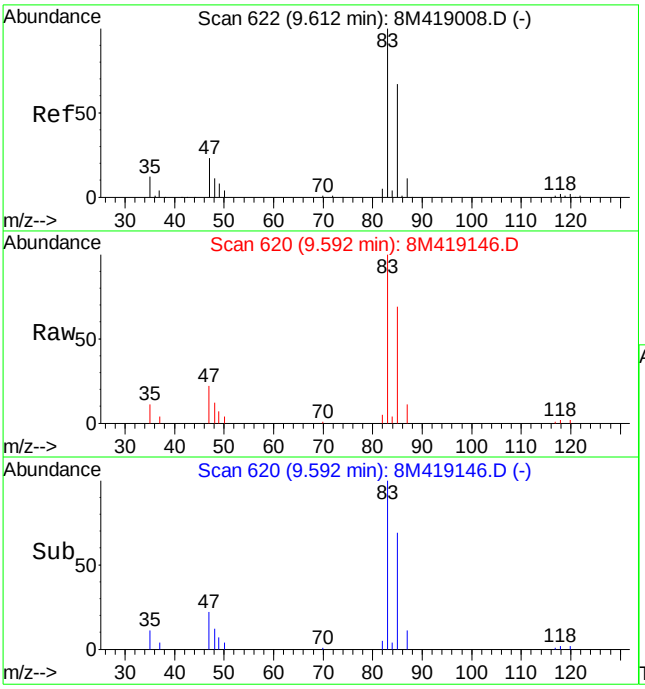


#32
cis-1,2-Dichloroethene
Concen: 0.65 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 96 Resp: 5808

Ion	Ratio	Lower	Upper
96	100		
61	132.9	80.3	187.3

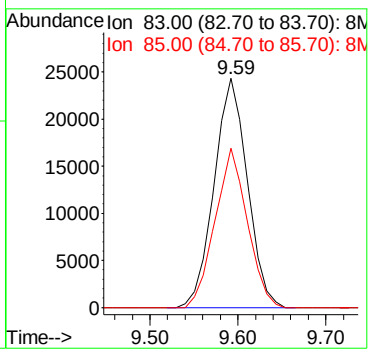


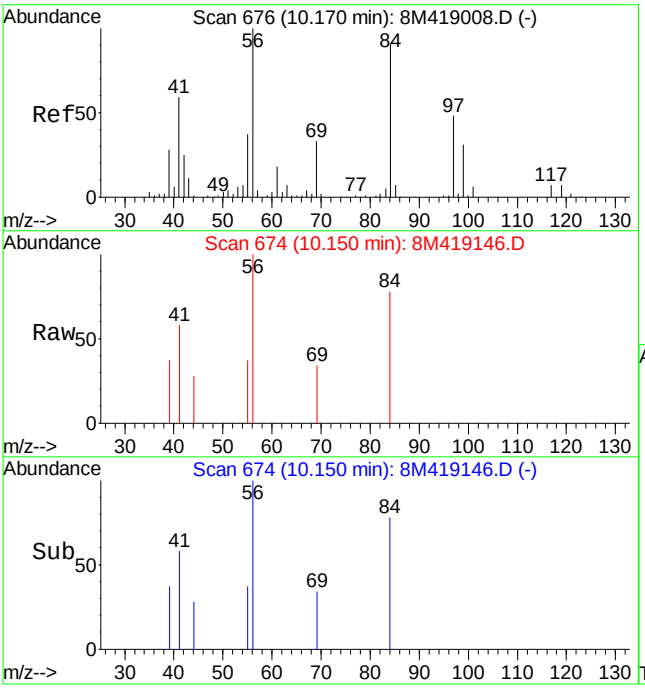


#33
Chloroform
Concen: 4.17 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 83 Resp: 63857

Ion	Ratio	Lower	Upper
83	100		
85	67.5	39.1	91.3

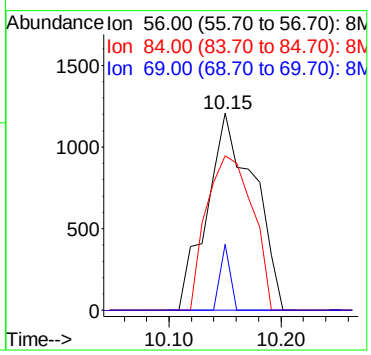


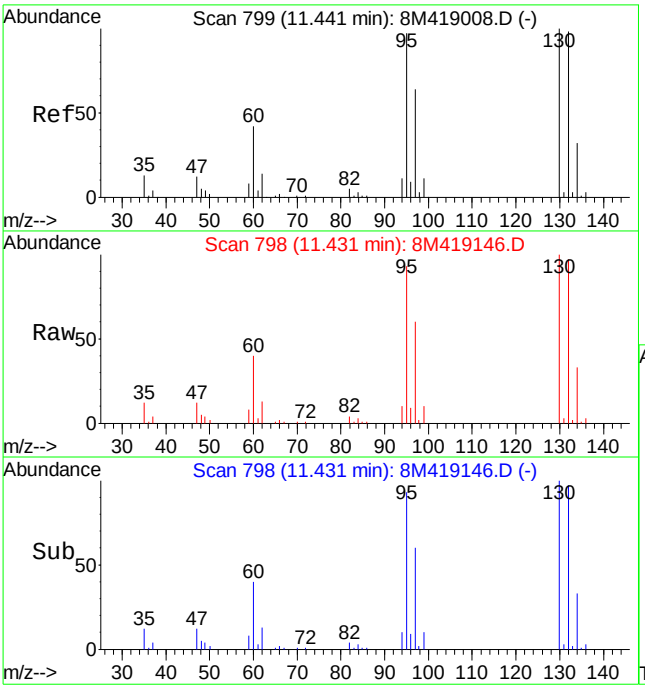


#39
Cyclohexane
Concen: 0.31 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 56 Resp: 3533

Ion	Ratio	Lower	Upper
56	100		
84	76.6	61.6	143.8
69	7.1	21.4	50.0#

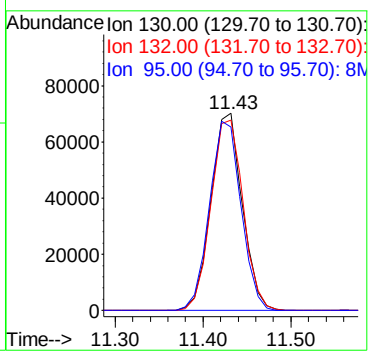


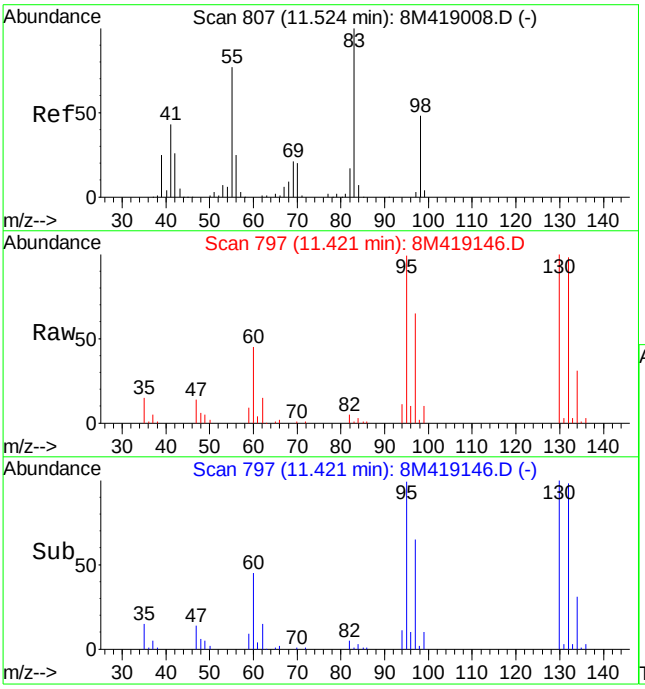


#47
Trichloroethene
Concen: 19.59 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion:130 Resp: 173424

Ion	Ratio	Lower	Upper
130	100		
132	99.0	59.4	138.6
95	96.4	60.1	140.3

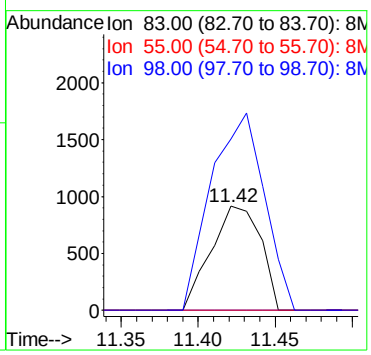


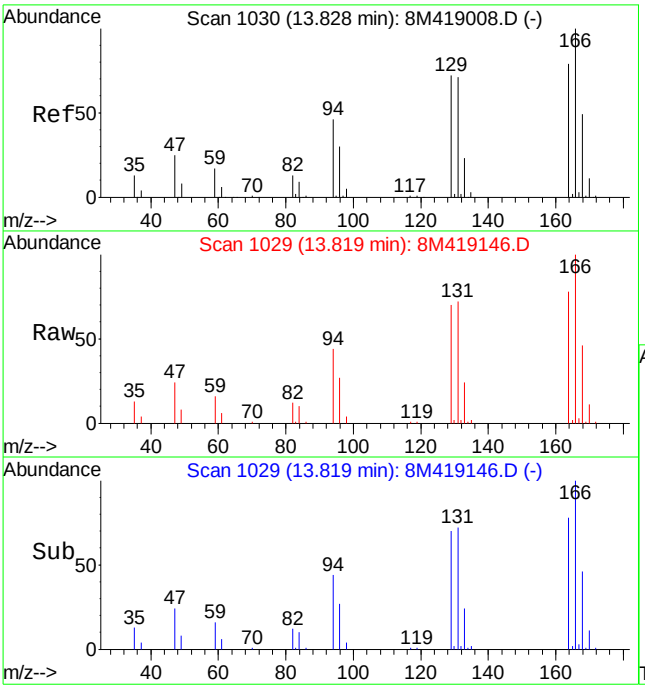


#48
Methylcyclohexane
Concen: 0.17 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.10 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion: 83 Resp: 2054

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	203.4	28.4	66.2#

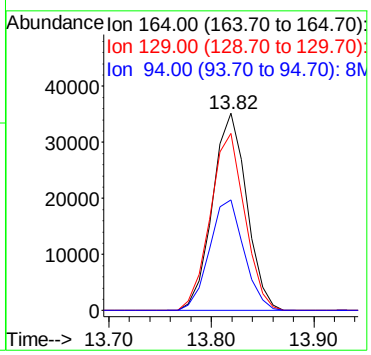




#66
Tetrachloroethene
Concen: 11.40 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419146.D
Acq: 25 Apr 2017 16:16

Tgt Ion:164 Resp: 81586

Ion	Ratio	Lower	Upper
164	100		
129	90.3	53.4	124.6
94	56.4	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419147.D Vial: 12
Acq On : 25 Apr 2017 16:46 Operator: TMB
Sample : L17041075-07 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 17:08:16 2017 Quant Results File: 8260WT.RES

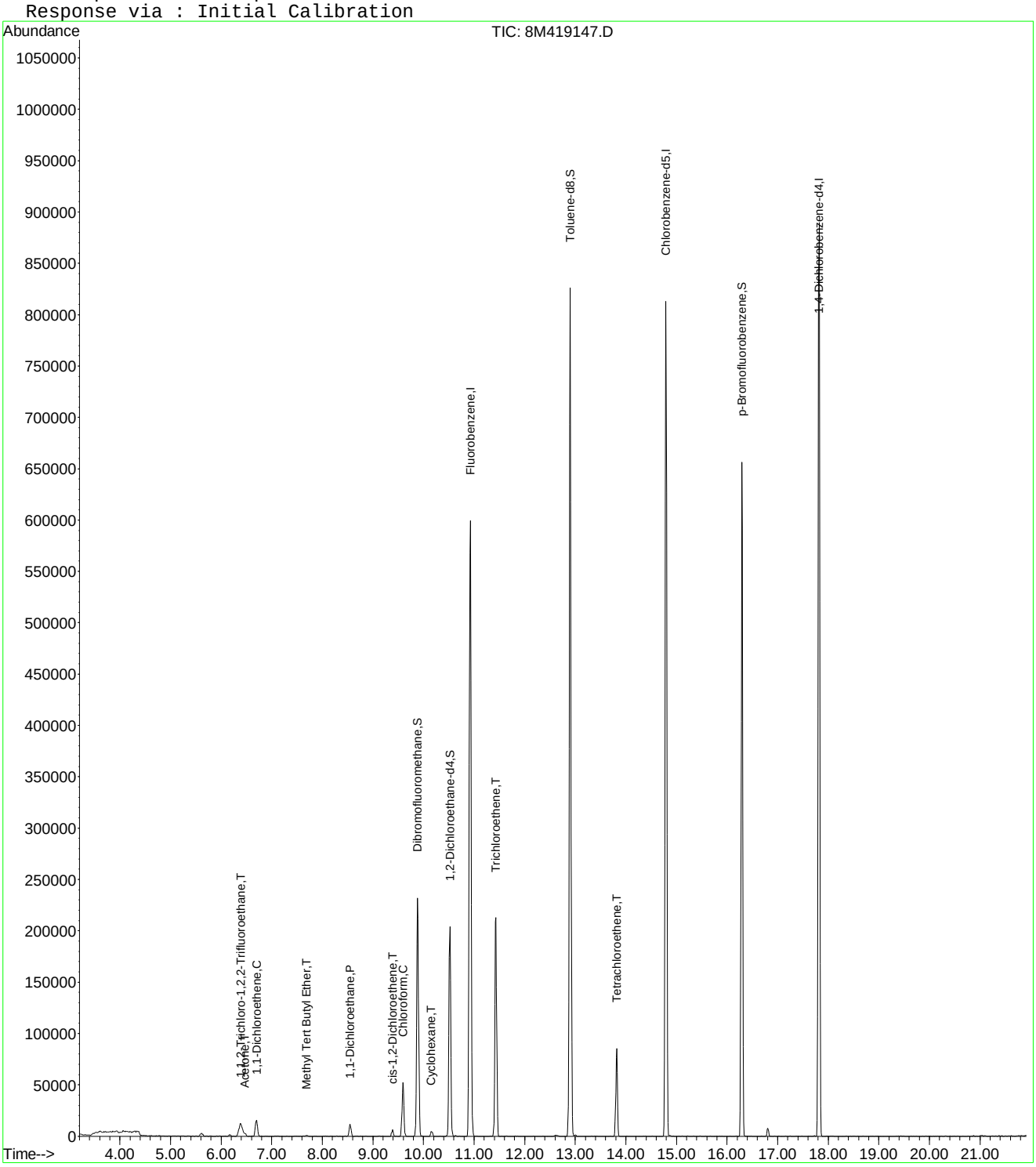
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

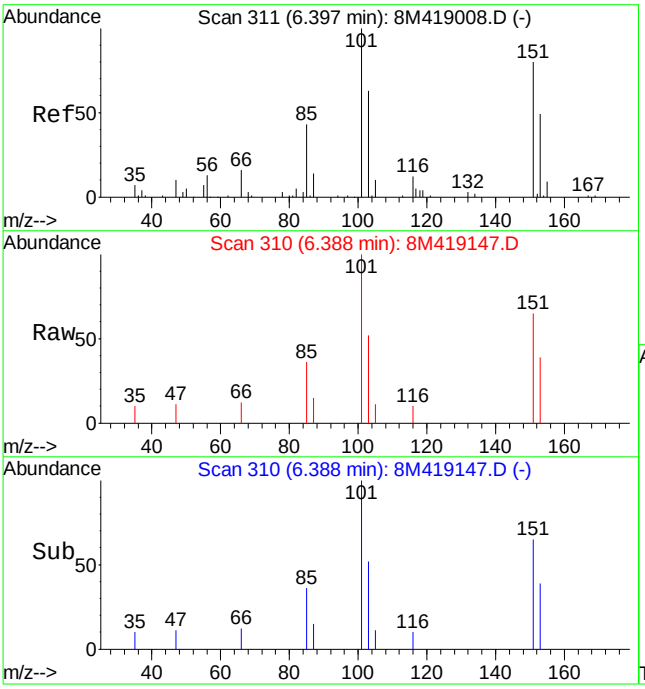
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	751199	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	599631	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	306467	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	198095	25.1416 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.56%		
43) 1,2-Dichloroethane-d4	10.52	65	171877	25.2330 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.92%		
58) Toluene-d8	12.90	98	732513	26.7358 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.96%		
80) p-Bromofluorobenzene	16.29	95	282701	26.1369 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.56%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	15871	2.1350 ug/L	97
13) Acetone	6.47	43	4977	4.7108 ug/L	82
14) 1,1-Dichloroethene	6.70	61	17993	1.6539 ug/L	88
22) Methyl Tert Butyl Ether	7.69	73	2266	0.1471 ug/L #	58
27) 1,1-Dichloroethane	8.55	63	18362	1.3479 ug/L	96
32) cis-1,2-Dichloroethene	9.39	96	4144	0.4737 ug/L	79
33) Chloroform	9.59	83	55573	3.6818 ug/L	100
39) Cyclohexane	10.15	56	3923	0.3459 ug/L #	71
47) Trichloroethene	11.43	130	93829	10.7630 ug/L	99
66) Tetrachloroethene	13.82	164	28113	4.0098 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419147.D 8260WT.M Wed Apr 26 07:13:35 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419147.D Vial: 12
Acq On : 25 Apr 2017 16:46 Operator: TMB
Sample : L17041075-07 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 17:08 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

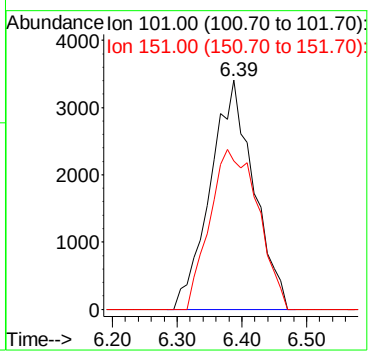


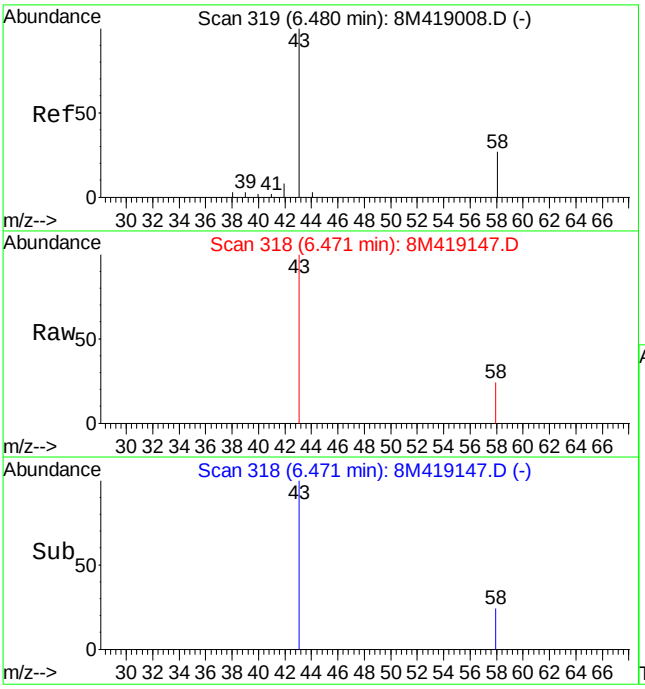


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 2.14 ug/L
RT: 6.39 min Scan# 310
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion:101 Resp: 15871

Ion	Ratio	Lower	Upper
101	100		
151	77.5	39.9	119.9

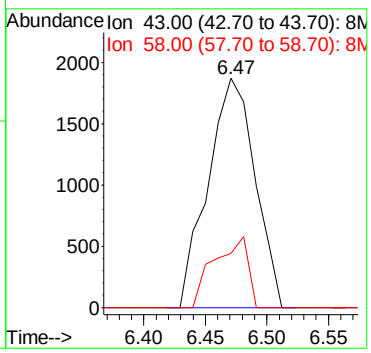


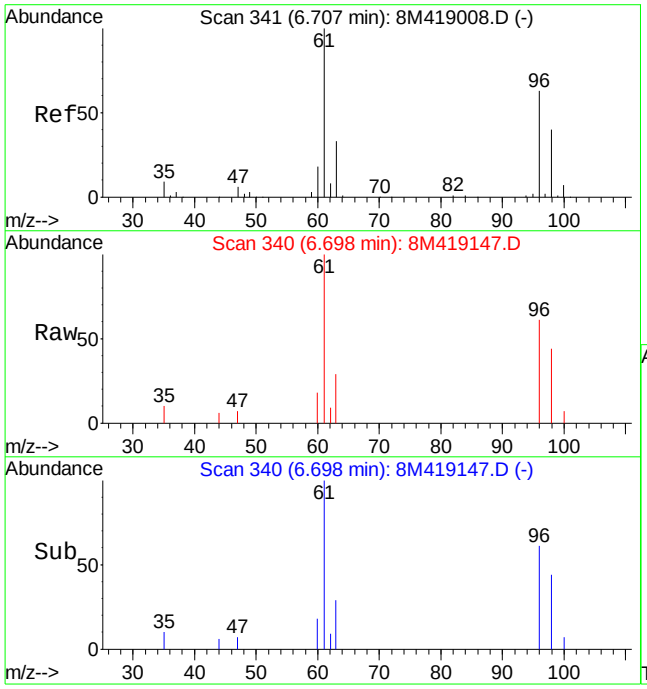


#13
Acetone
Concen: 4.71 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 43 Resp: 4977

Ion	Ratio	Lower	Upper
43	100		
58	22.1	19.4	45.4

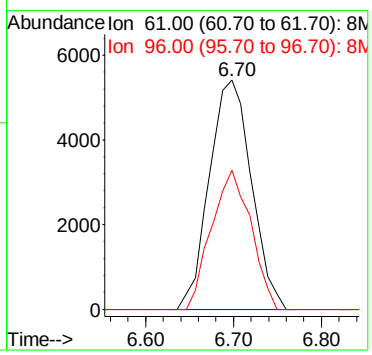


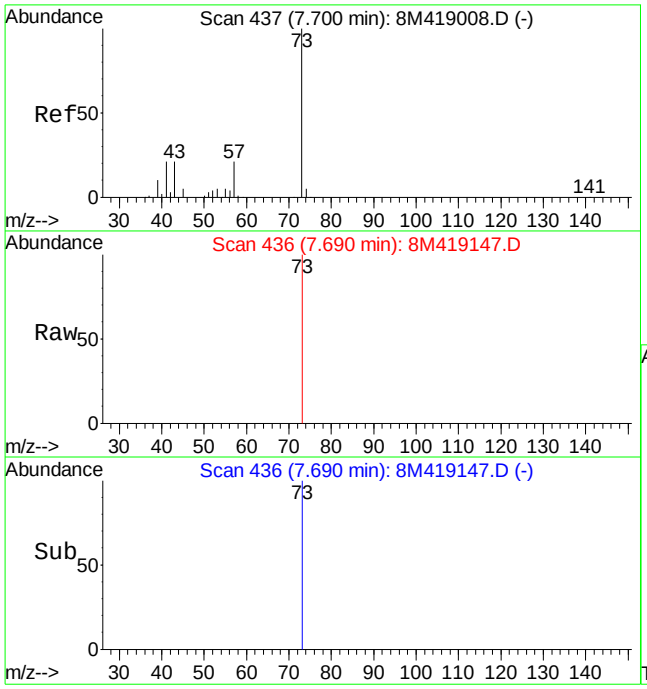


#14
1,1-Dichloroethene
Concen: 1.65 ug/L
RT: 6.70 min Scan# 340
Delta R.T. -0.00 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 61 Resp: 17993

Ion	Ratio	Lower	Upper
61	100		
96	56.9	40.0	93.4

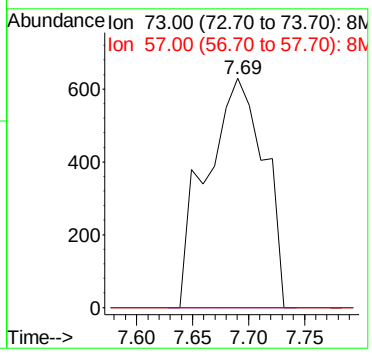


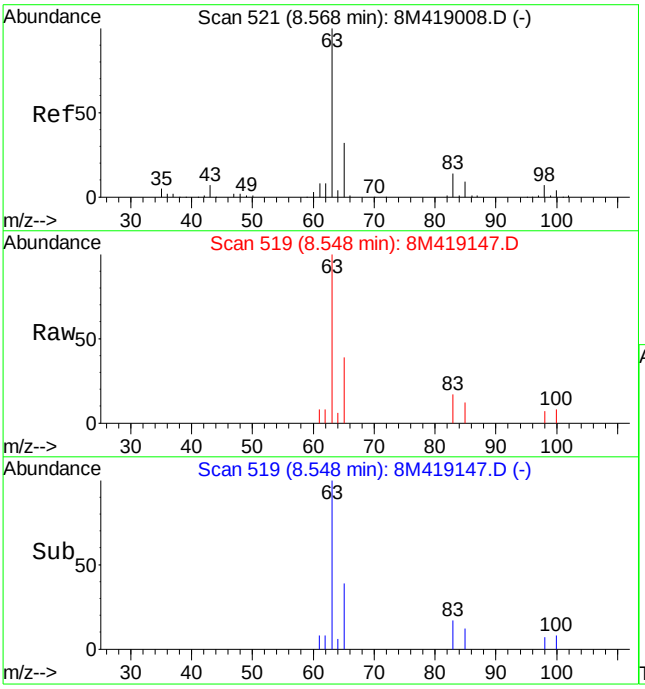


#22
Methyl Tert Butyl Ether
Concen: 0.15 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 73 Resp: 2266

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

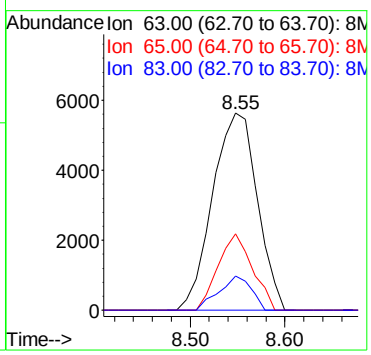


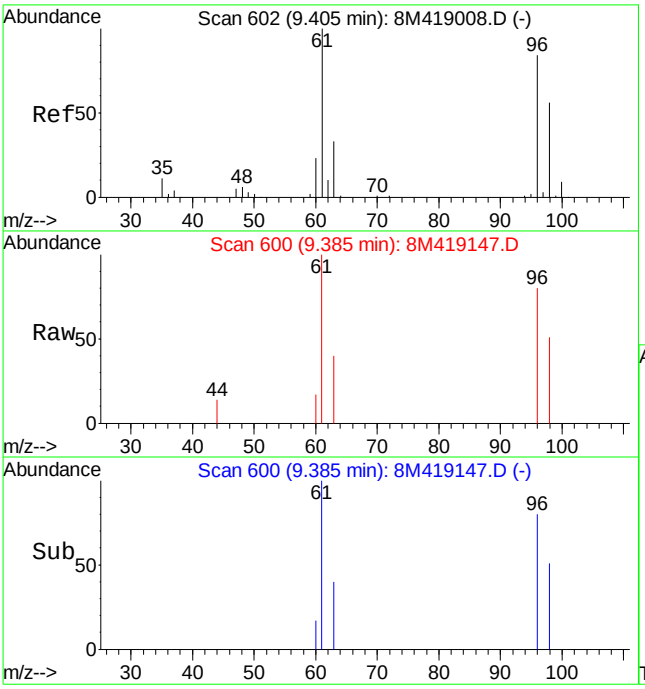


#27
1,1-Dichloroethane
Concen: 1.35 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 63 Resp: 18362

Ion	Ratio	Lower	Upper
63	100		
65	29.8	19.1	44.7
83	12.6	9.0	21.0

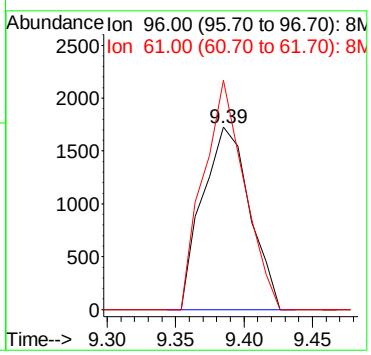


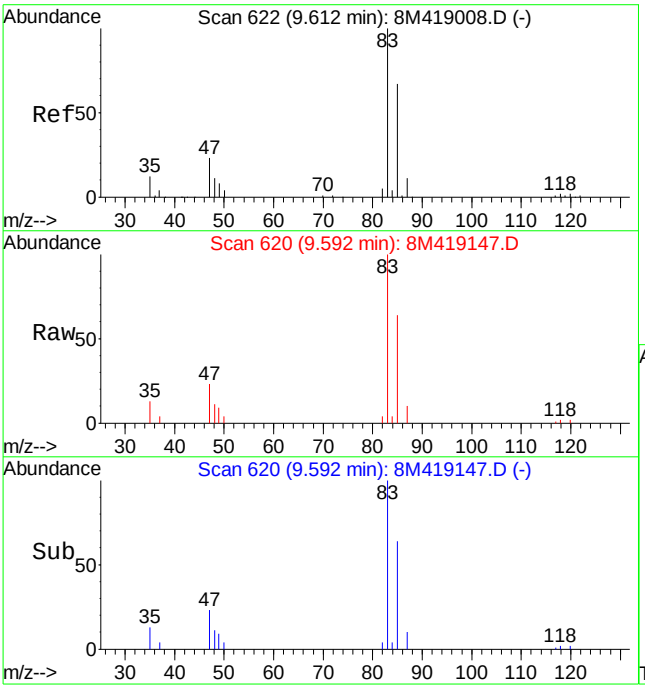


#32
cis-1,2-Dichloroethene
Concen: 0.47 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 96 Resp: 4144

Ion	Ratio	Lower	Upper
96	100		
61	109.3	80.3	187.3

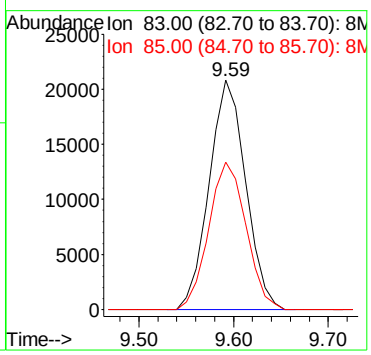


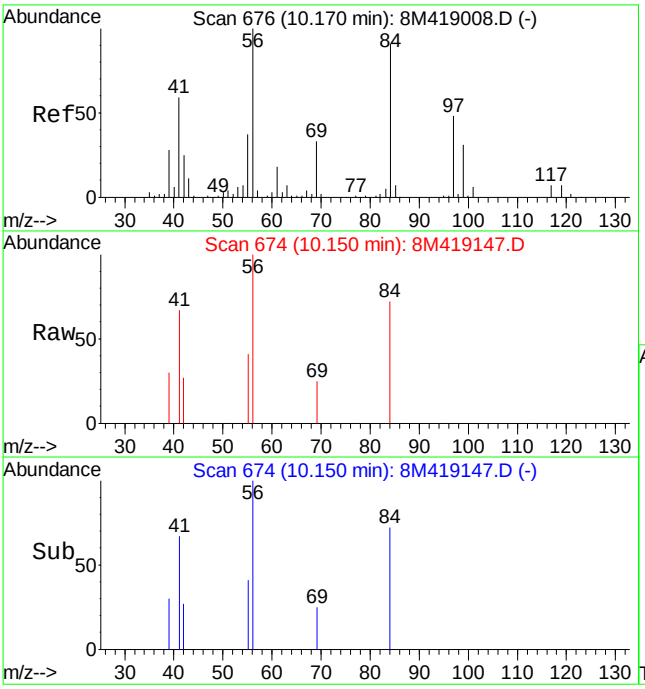


#33
Chloroform
Concen: 3.68 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 83 Resp: 55573

Ion	Ratio	Lower	Upper
83	100		
85	65.6	39.1	91.3

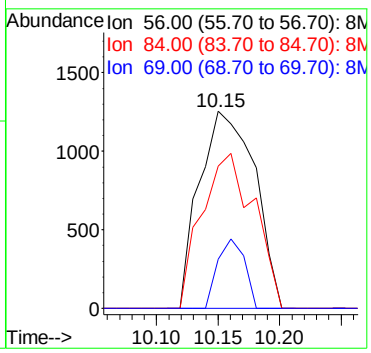


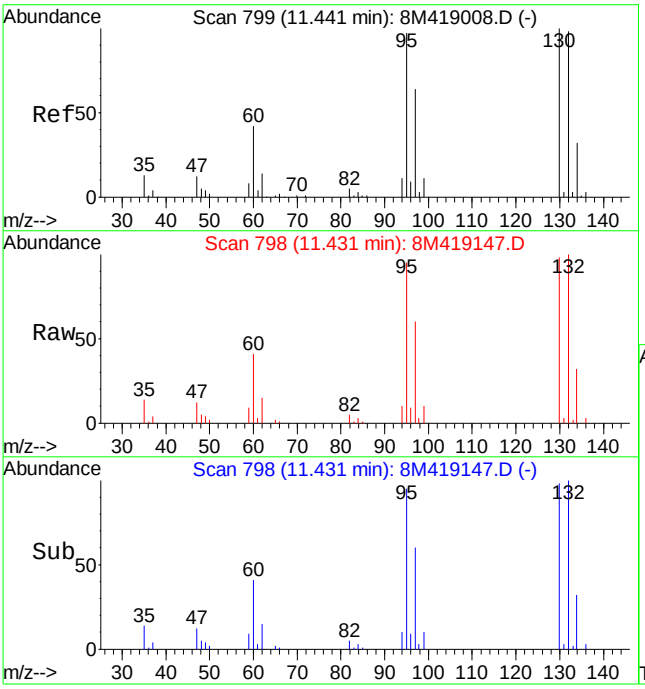


#39
Cyclohexane
Concen: 0.35 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion: 56 Resp: 3923

Ion	Ratio	Lower	Upper
56	100		
84	74.5	61.6	143.8
69	17.2	21.4	50.0#

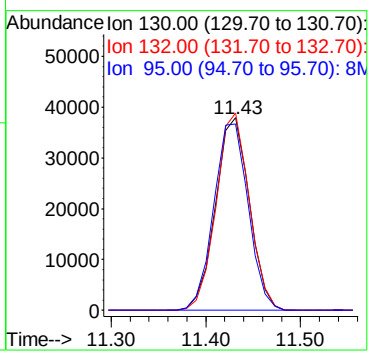


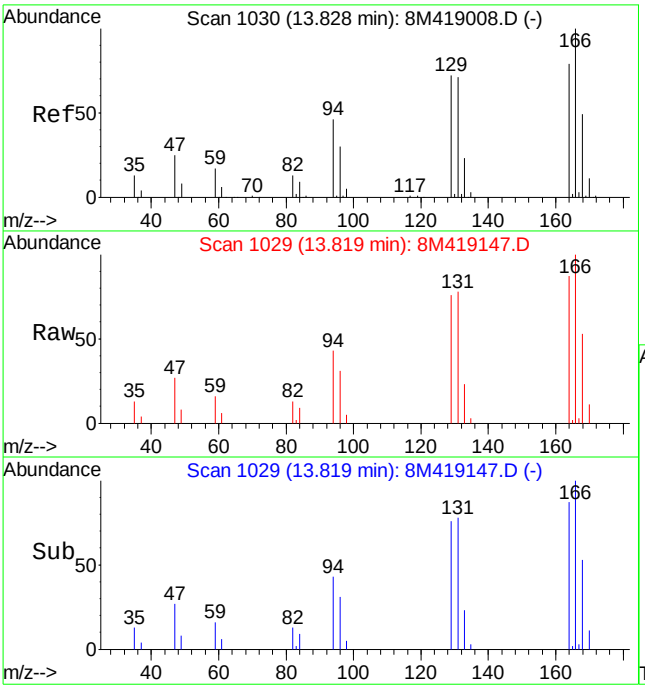


#47
Trichloroethene
Concen: 10.76 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion:130 Resp: 93829

Ion	Ratio	Lower	Upper
130	100		
132	99.9	59.4	138.6
95	98.8	60.1	140.3

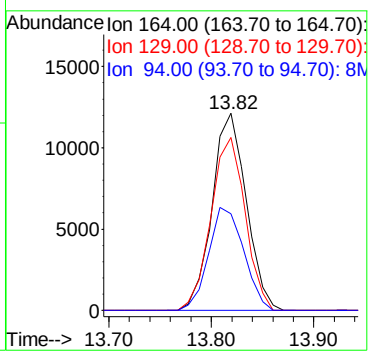




#66
Tetrachloroethene
Concen: 4.01 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419147.D
Acq: 25 Apr 2017 16:46

Tgt Ion:164 Resp: 28113

Ion	Ratio	Lower	Upper
164	100		
129	87.8	53.4	124.6
94	53.8	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419152.D Vial: 17
Acq On : 25 Apr 2017 19:15 Operator: TMB
Sample : L17041075-08 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 19:37:09 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

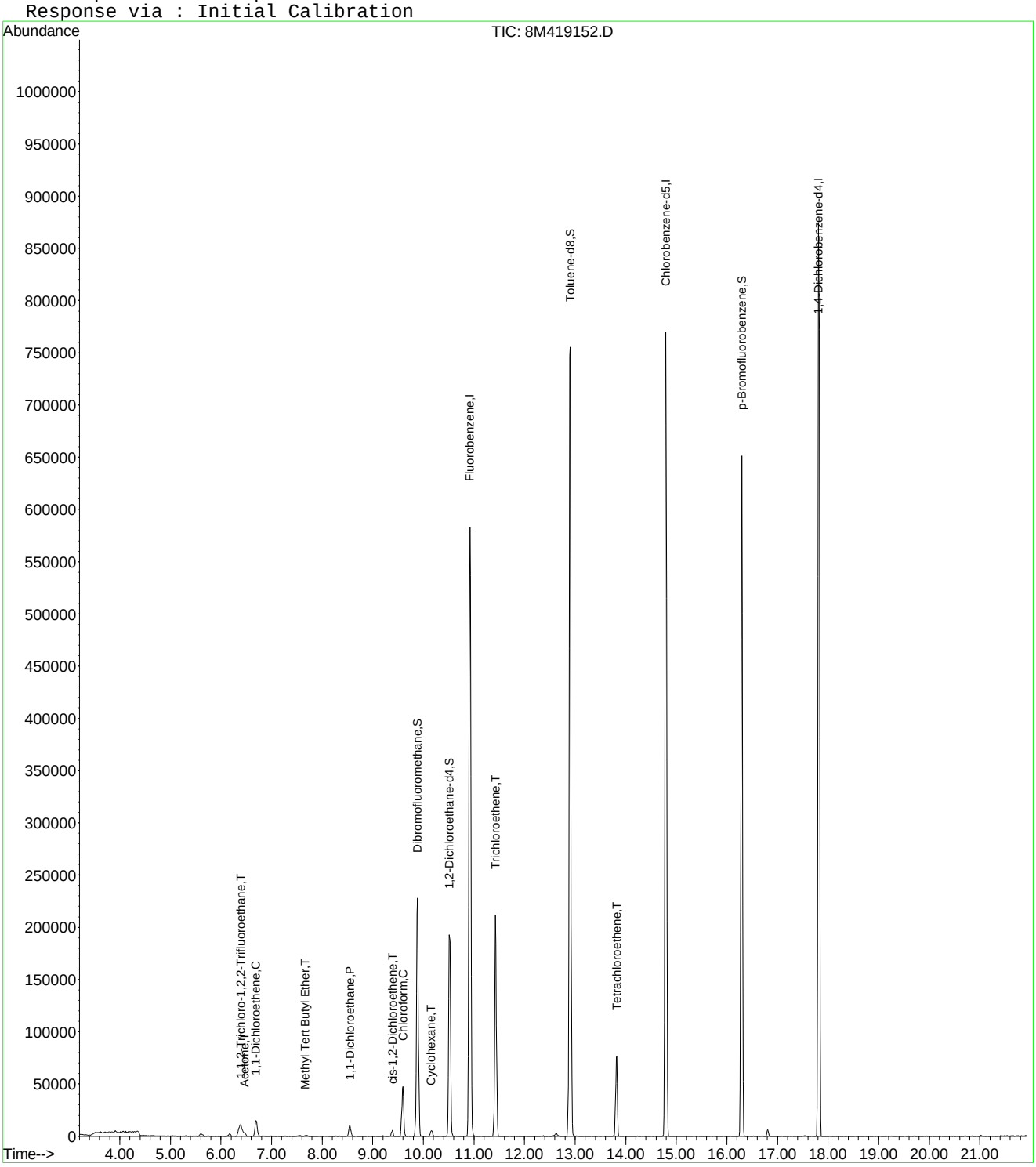
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	728996	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	578396	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	295158	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	191986	25.1084 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.44%		
43) 1,2-Dichloroethane-d4	10.51	65	171434	25.9345 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.72%		
58) Toluene-d8	12.90	98	701931	26.5602 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.24%		
80) p-Bromofluorobenzene	16.29	95	271686	26.0810 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.32%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	14261	1.9769 ug/L	100
13) Acetone	6.46	43	6617	6.4538 ug/L	82
14) 1,1-Dichloroethene	6.69	61	17097	1.6194 ug/L	93
22) Methyl Tert Butyl Ether	7.66	73	2609	0.1745 ug/L #	58
27) 1,1-Dichloroethane	8.55	63	18246	1.3802 ug/L	98
32) cis-1,2-Dichloroethene	9.39	96	3721	0.4383 ug/L	93
33) Chloroform	9.59	83	52310	3.5712 ug/L	97
39) Cyclohexane	10.15	56	4400	0.3998 ug/L	83
47) Trichloroethene	11.42	130	88997	10.5197 ug/L	99
66) Tetrachloroethene	13.82	164	25238	3.7319 ug/L	97

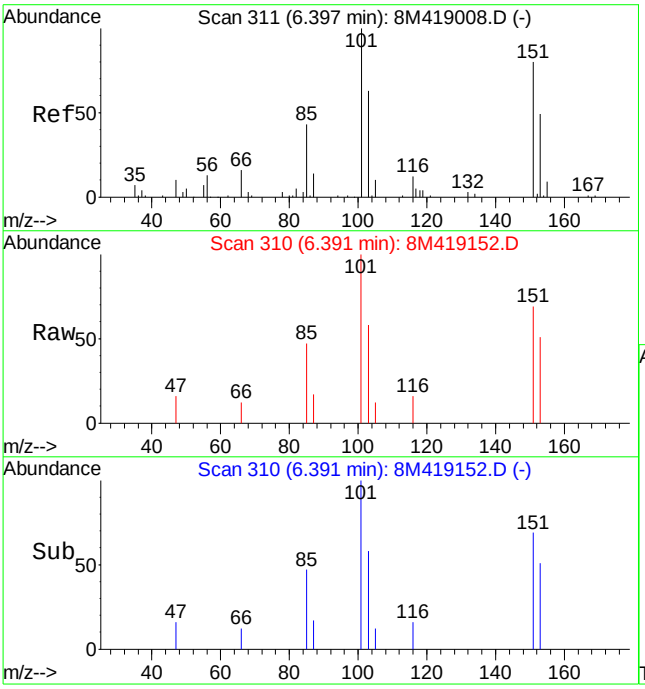
(#) = qualifier out of range (m) = manual integration
8M419152.D 8260WT.M Wed Apr 26 07:14:00 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419152.D Vial: 17
Acq On : 25 Apr 2017 19:15 Operator: TMB
Sample : L17041075-08 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 19:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

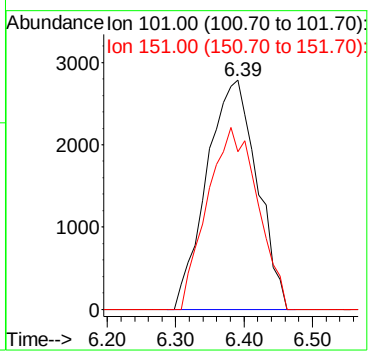


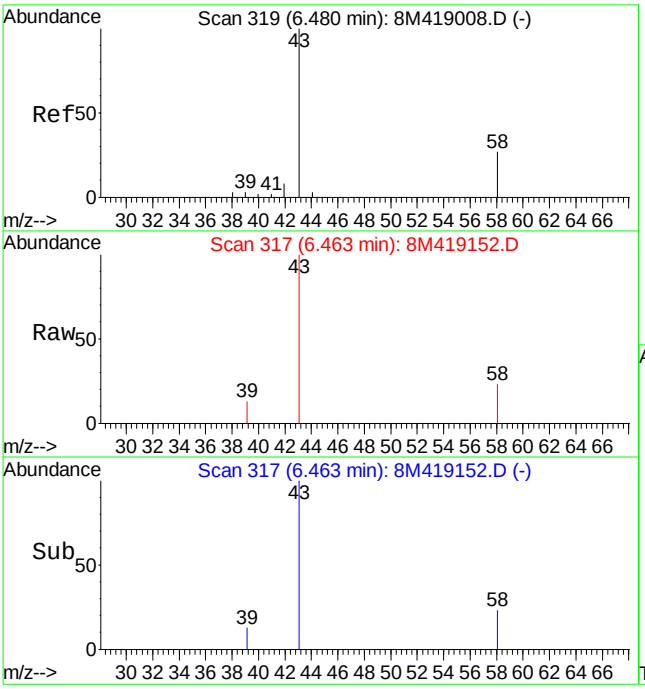


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.98 ug/L
RT: 6.39 min Scan# 310
Delta R.T. -0.01 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion:101 Resp: 14261

Ion	Ratio	Lower	Upper
101	100		
151	79.5	39.9	119.9

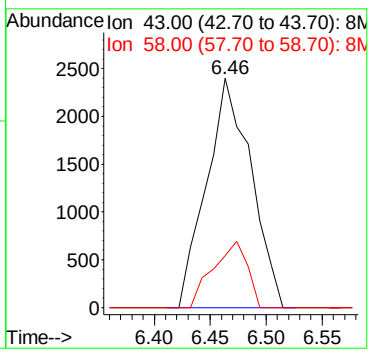


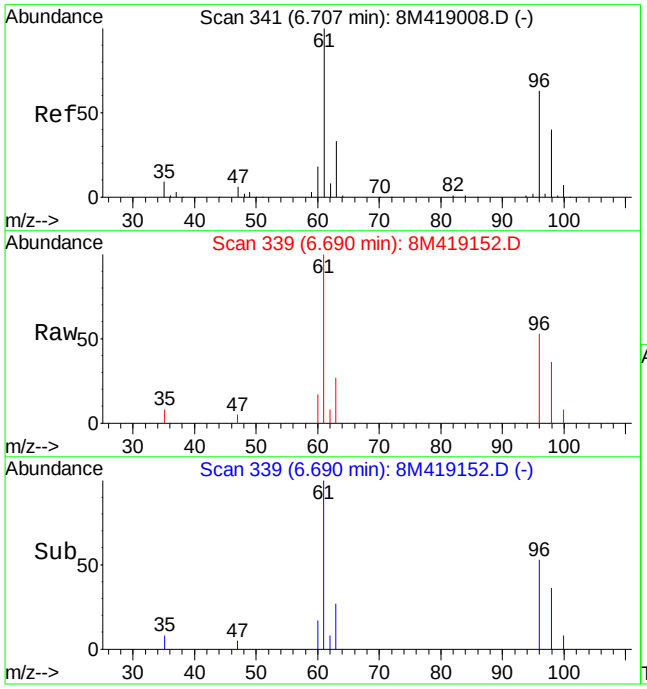


#13
Acetone
Concen: 6.45 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 43 Resp: 6617

Ion	Ratio	Lower	Upper
43	100		
58	22.3	19.4	45.4

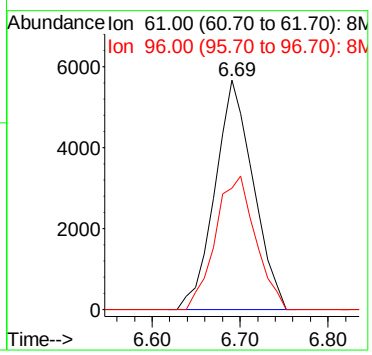


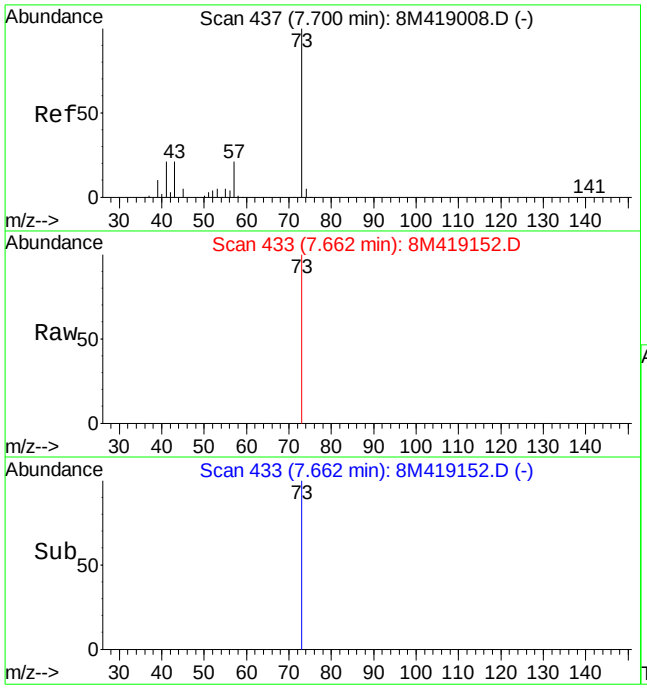


#14
1,1-Dichloroethene
Concen: 1.62 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 61 Resp: 17097

Ion	Ratio	Lower	Upper
61	100		
96	60.9	40.0	93.4

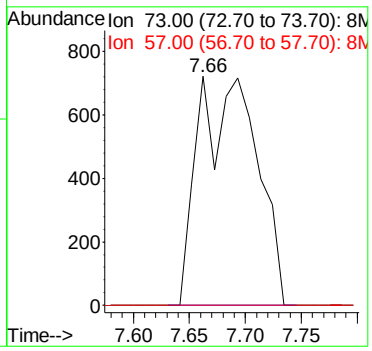


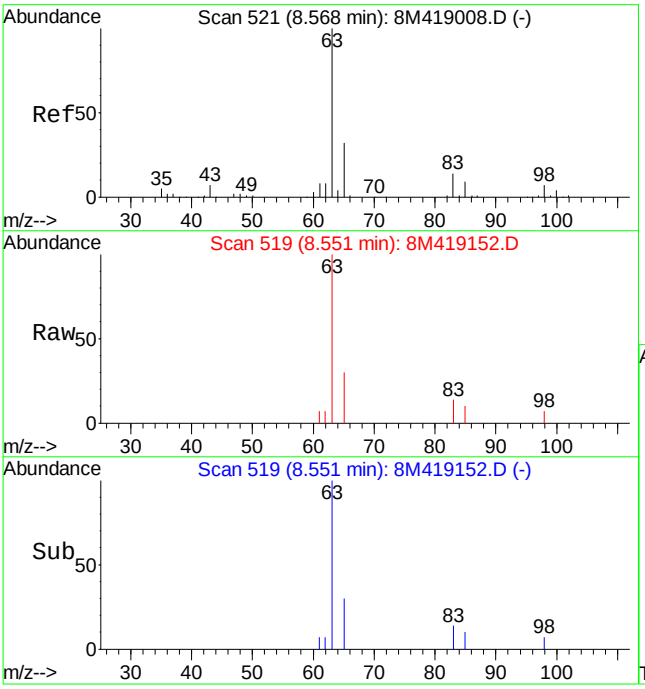


#22
Methyl Tert Butyl Ether
Concen: 0.17 ug/L
RT: 7.66 min Scan# 433
Delta R.T. -0.05 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 73 Resp: 2609

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

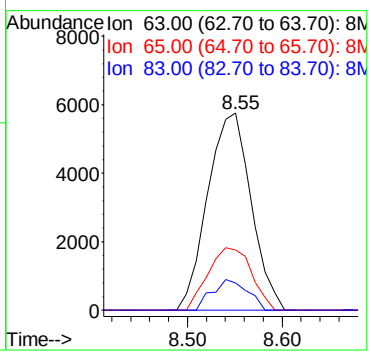


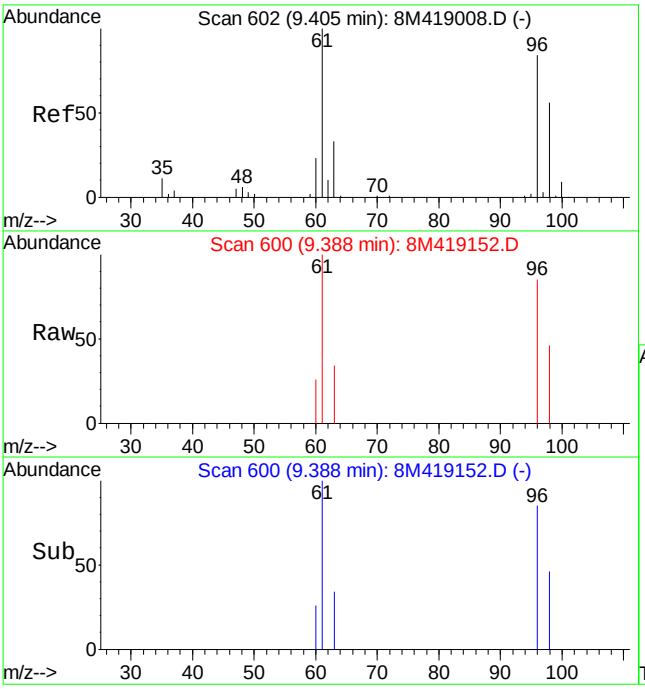


#27
1,1-Dichloroethane
Concen: 1.38 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 63 Resp: 18246

Ion	Ratio	Lower	Upper
63	100		
65	31.7	19.1	44.7
83	12.8	9.0	21.0

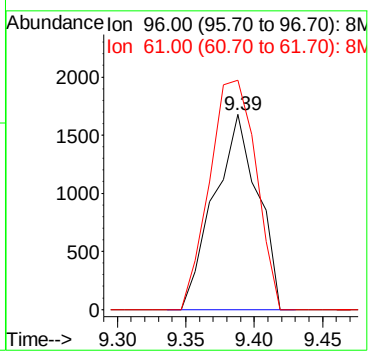


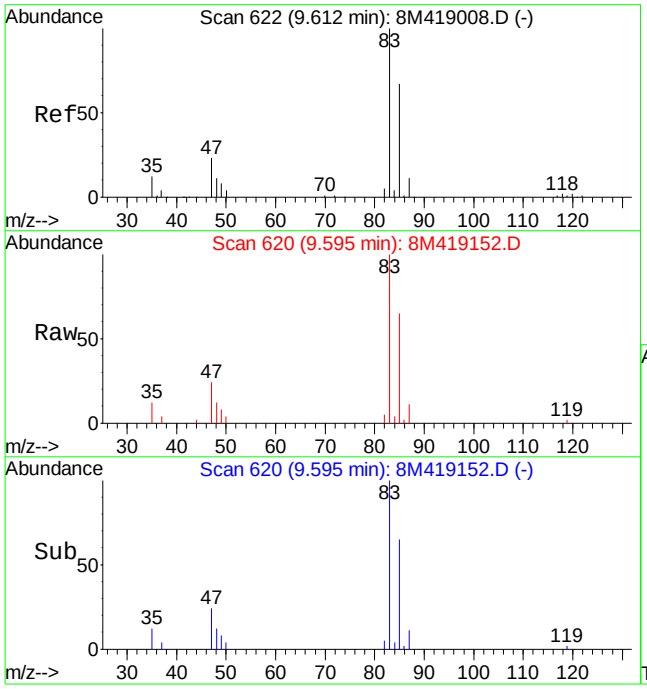


#32
cis-1,2-Dichloroethene
Concen: 0.44 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 96 Resp: 3721

Ion	Ratio	Lower	Upper
96	100		
61	125.1	80.3	187.3

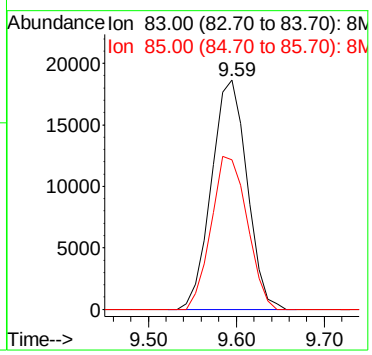


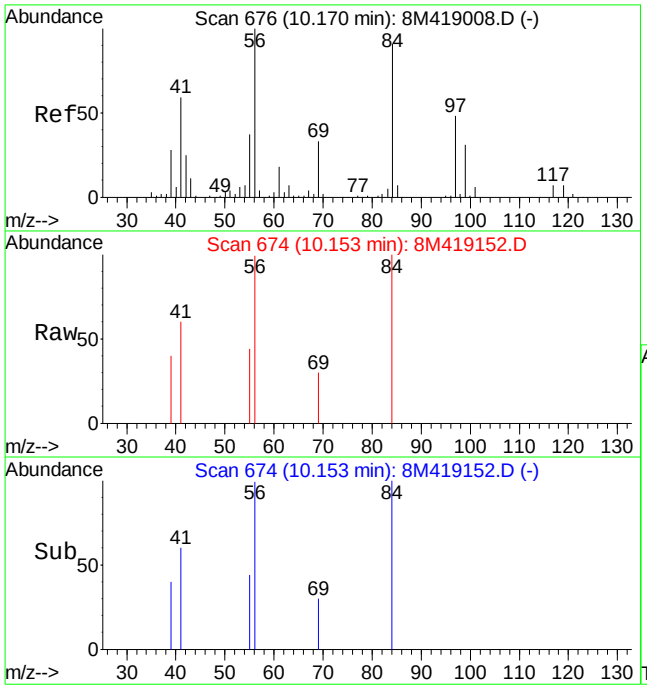


#33
Chloroform
Concen: 3.57 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 83 Resp: 52310

Ion	Ratio	Lower	Upper
83	100		
85	67.4	39.1	91.3

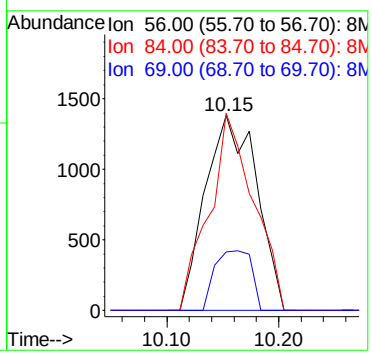


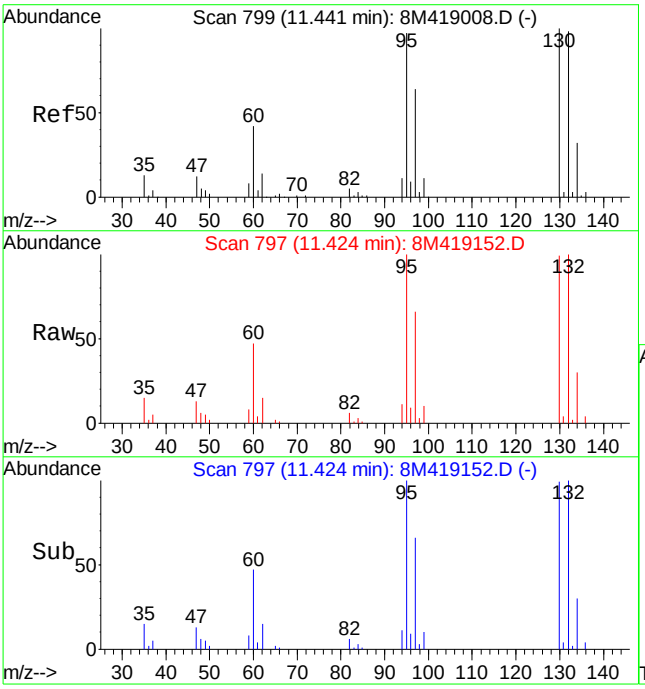


#39
Cyclohexane
Concen: 0.40 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion: 56 Resp: 4400

Ion	Ratio	Lower	Upper
56	100		
84	87.5	61.6	143.8
69	22.0	21.4	50.0

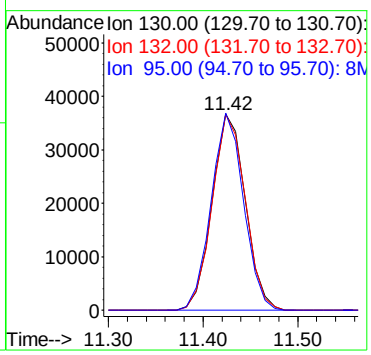


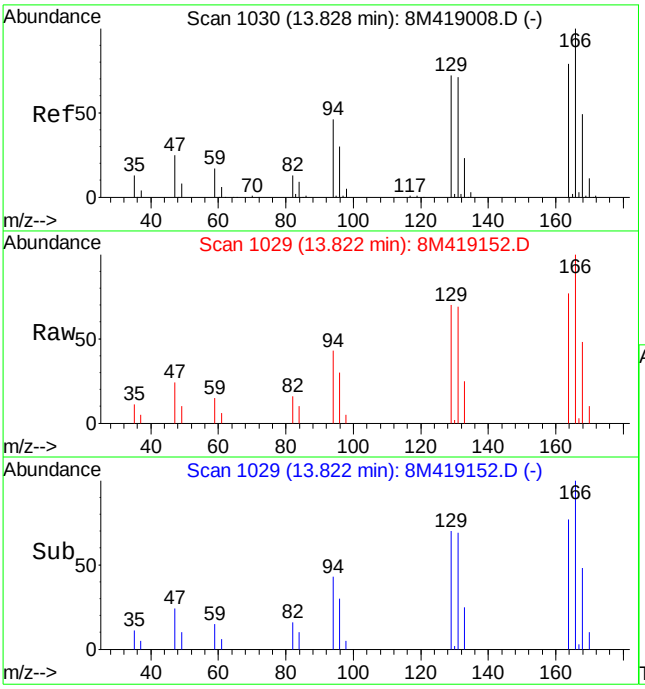


#47
Trichloroethene
Concen: 10.52 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion:130 Resp: 88997

Ion	Ratio	Lower	Upper
130	100		
132	99.3	59.4	138.6
95	98.2	60.1	140.3

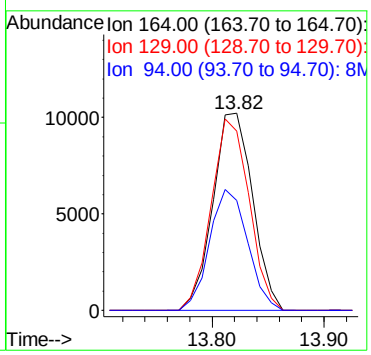




#66
Tetrachloroethene
Concen: 3.73 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419152.D
Acq: 25 Apr 2017 19:15

Tgt Ion:164 Resp: 25238

Ion	Ratio	Lower	Upper
164	100		
129	92.6	53.4	124.6
94	58.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419148.D Vial: 13
Acq On : 25 Apr 2017 17:16 Operator: TMB
Sample : L17041075-09 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 17:38:13 2017 Quant Results File: 8260WT.RES

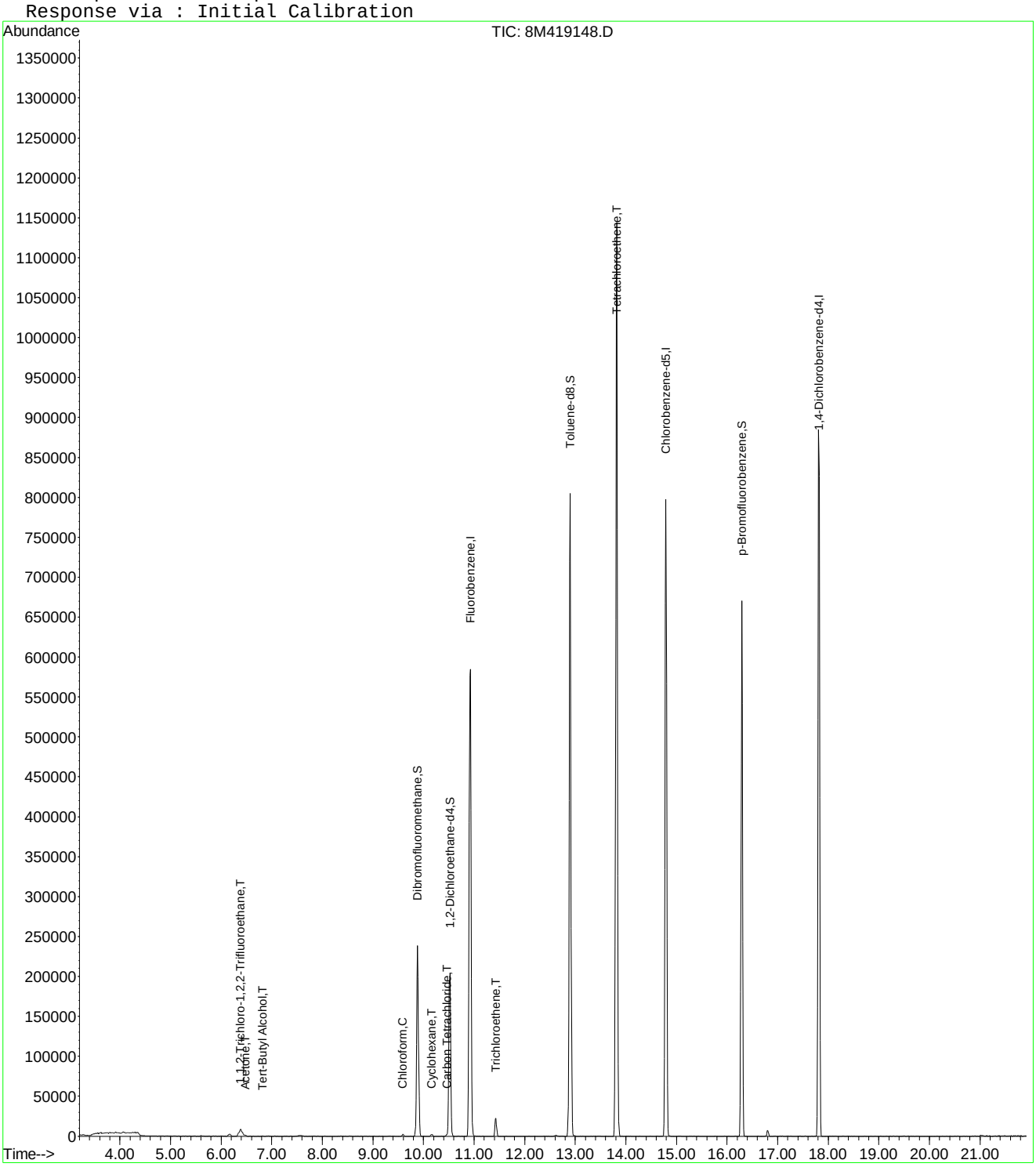
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

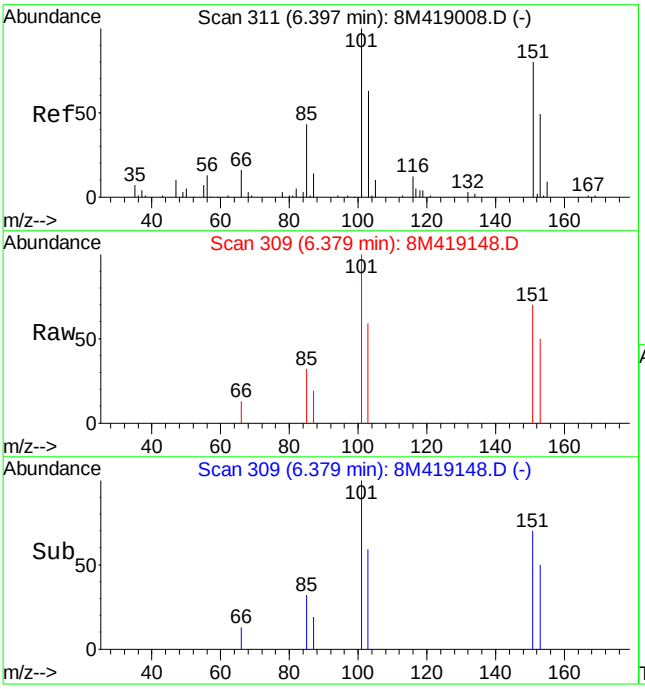
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	747832	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	600785	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	306375	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	197548	25.1850 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.76%		
43) 1,2-Dichloroethane-d4	10.52	65	175112	25.8236 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.28%		
58) Toluene-d8	12.90	98	721319	26.2767 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.12%		
80) p-Bromofluorobenzene	16.29	95	280426	25.9344 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.72%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	10380	1.4026 ug/L	98
13) Acetone	6.48	43	3192	3.0349 ug/L #	42
15) Tert-Butyl Alcohol	6.82	59	468	1.3727 ug/L #	59
33) Chloroform	9.58	83	3037	0.2021 ug/L	96
39) Cyclohexane	10.16	56	1684	0.1492 ug/L #	77
42) Carbon Tetrachloride	10.46	117	2817	0.2505 ug/L #	80
47) Trichloroethene	11.43	130	10859	1.2512 ug/L	100
66) Tetrachloroethene	13.82	164	352352	50.1600 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419148.D 8260WT.M Wed Apr 26 07:13:40 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419148.D Vial: 13
Acq On : 25 Apr 2017 17:16 Operator: TMB
Sample : L17041075-09 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 17:38 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

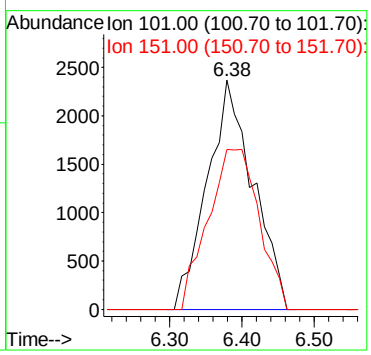


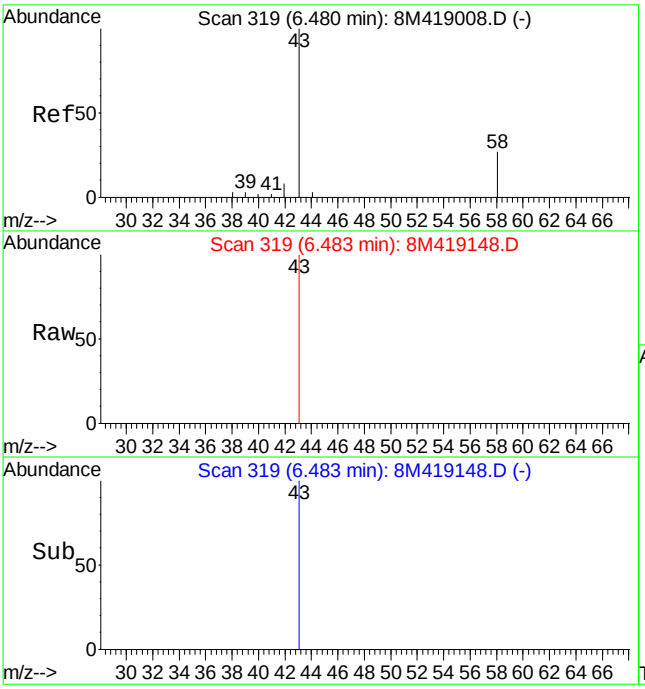


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.40 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion:101 Resp: 10380

Ion	Ratio	Lower	Upper
101	100		
151	77.7	39.9	119.9

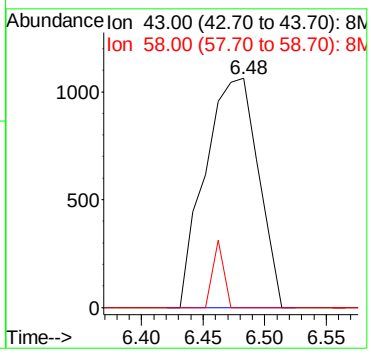


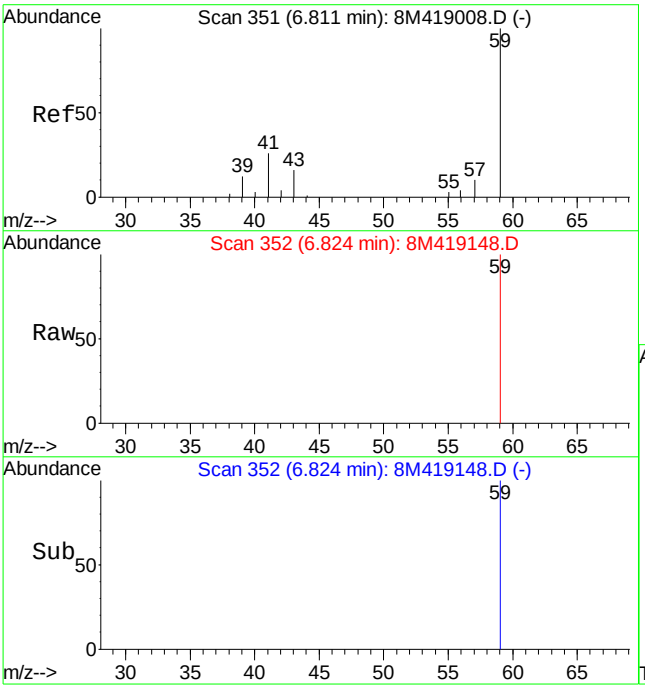


#13
Acetone
Concen: 3.03 ug/L
RT: 6.48 min Scan# 319
Delta R.T. 0.00 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion: 43 Resp: 3192

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

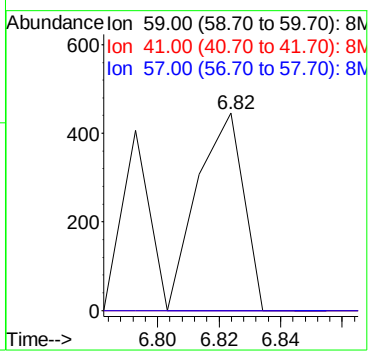


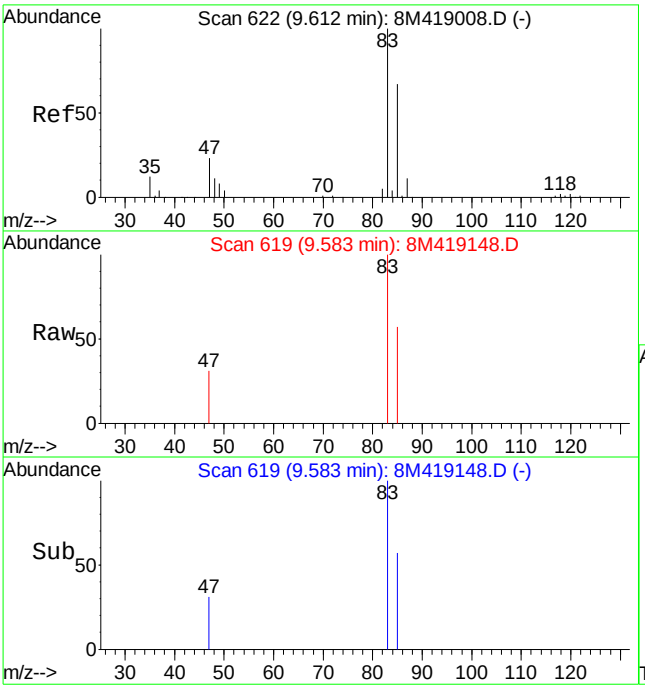


#15
Tert-Butyl Alcohol
Concen: 1.37 ug/L
RT: 6.82 min Scan# 352
Delta R.T. -0.01 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion: 59 Resp: 468

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

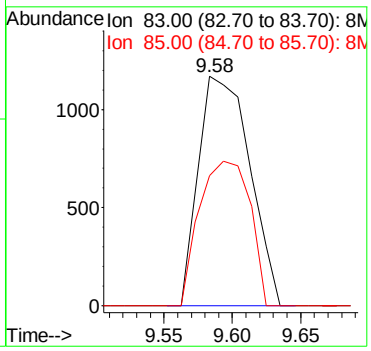


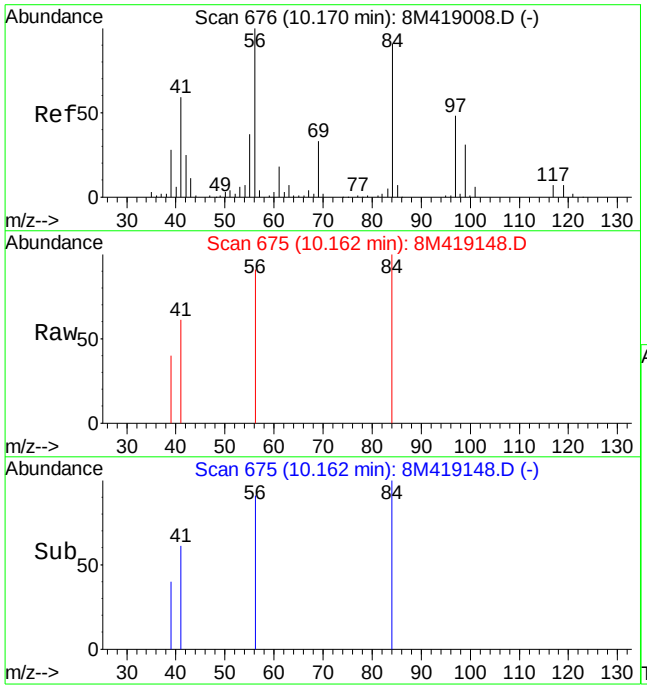


#33
Chloroform
Concen: 0.20 ug/L
RT: 9.58 min Scan# 619
Delta R.T. -0.02 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion: 83 Resp: 3037

Ion	Ratio	Lower	Upper
83	100		
85	62.3	39.1	91.3

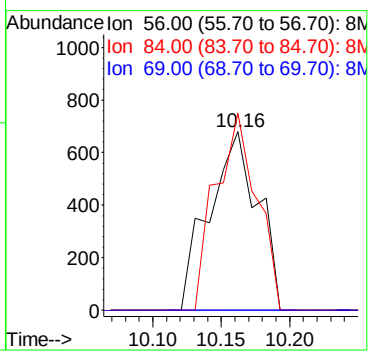


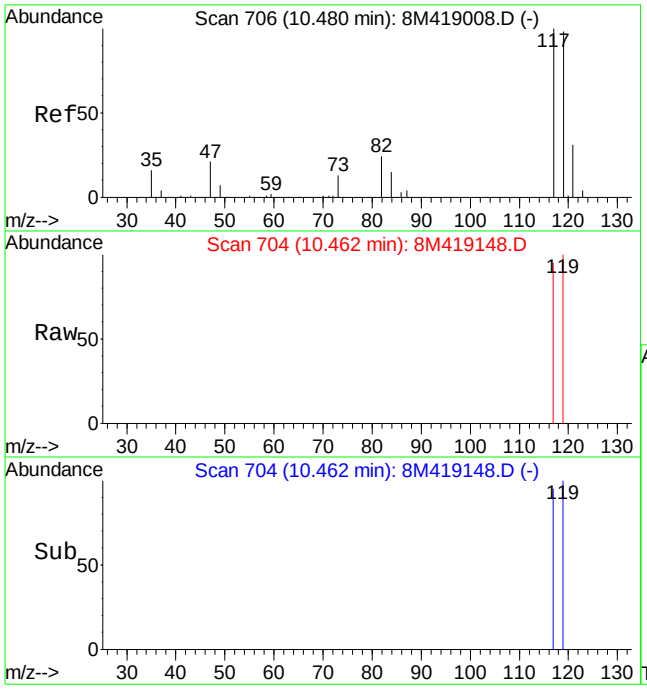


#39
Cyclohexane
Concen: 0.15 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion: 56 Resp: 1684

Ion	Ratio	Lower	Upper
56	100		
84	93.2	61.6	143.8
69	0.0	21.4	50.0#

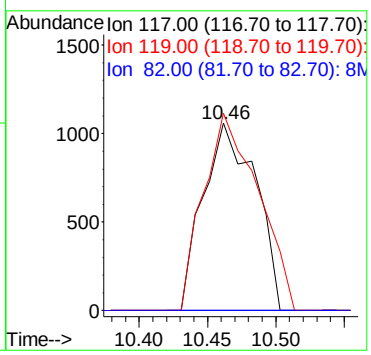


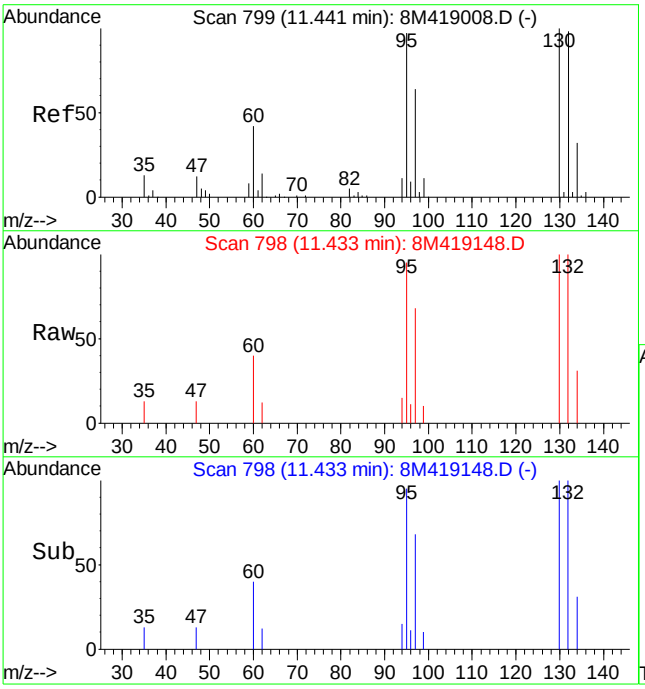


#42
Carbon Tetrachloride
Concen: 0.25 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion:117 Resp: 2817

Ion	Ratio	Lower	Upper
117	100		
119	110.0	58.5	136.5
82	0.0	14.9	34.9#

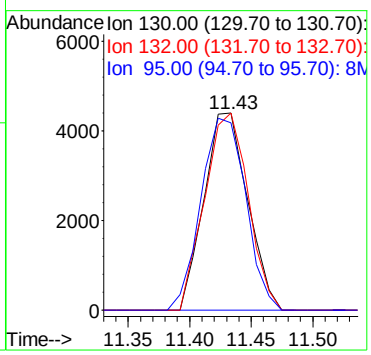


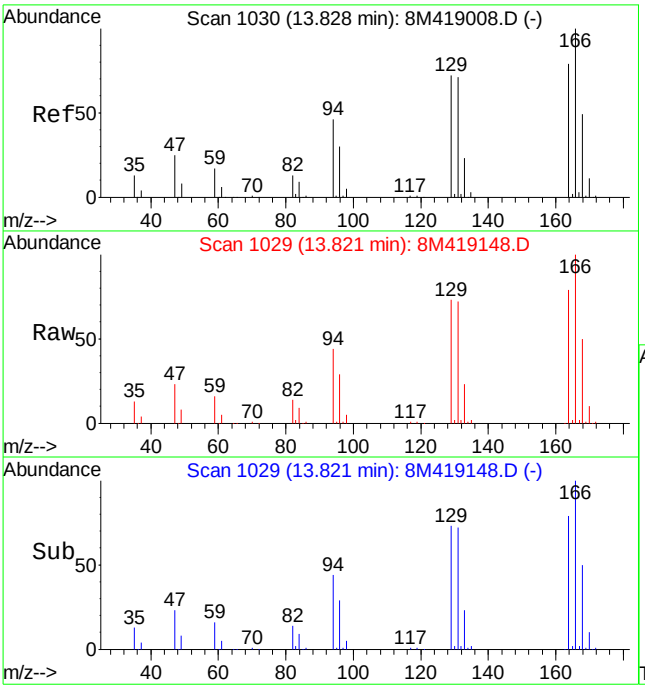


#47
Trichloroethene
Concen: 1.25 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion:130 Resp: 10859

Ion	Ratio	Lower	Upper
130	100		
132	99.6	59.4	138.6
95	100.2	60.1	140.3

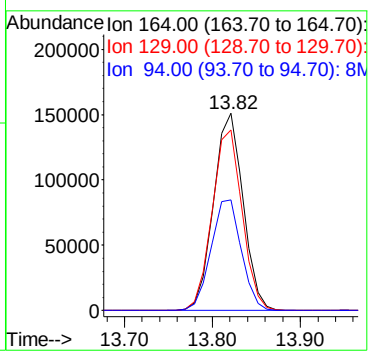




#66
Tetrachloroethene
Concen: 50.16 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419148.D
Acq: 25 Apr 2017 17:16

Tgt Ion:164 Resp: 352352

Ion	Ratio	Lower	Upper
164	100		
129	92.6	53.4	124.6
94	57.6	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419149.D Vial: 14
Acq On : 25 Apr 2017 17:45 Operator: TMB
Sample : L17041075-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 18:07:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

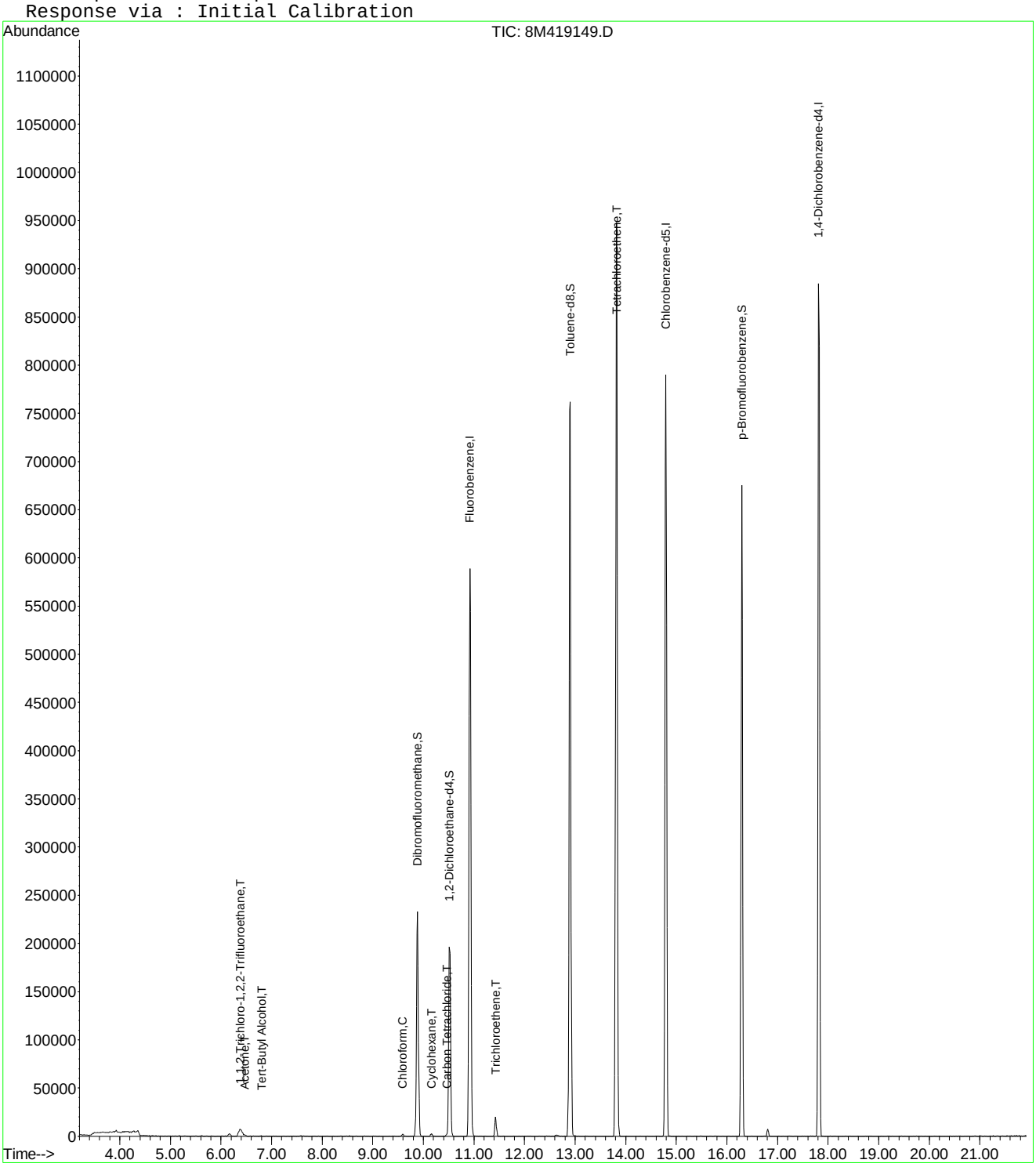
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	735205	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	593995	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	304587	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	193669	25.1146	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.44%			
43) 1,2-Dichloroethane-d4	10.51	65	171876	25.7817	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.12%			
58) Toluene-d8	12.90	98	710332	26.1722	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.68%			
80) p-Bromofluorobenzene	16.29	95	283778	26.3984	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.60%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	10187	1.4002	ug/L	89
13) Acetone	6.47	43	3149	3.0454	ug/L #	65
15) Tert-Butyl Alcohol	6.80	59	611	1.8229	ug/L #	59
33) Chloroform	9.58	83	2882	0.1951	ug/L	98
39) Cyclohexane	10.16	56	2014	0.1815	ug/L #	65
42) Carbon Tetrachloride	10.46	117	2874	0.2600	ug/L #	90
47) Trichloroethene	11.43	130	9465	1.1093	ug/L	96
66) Tetrachloroethene	13.82	164	299385	43.1070	ug/L	98

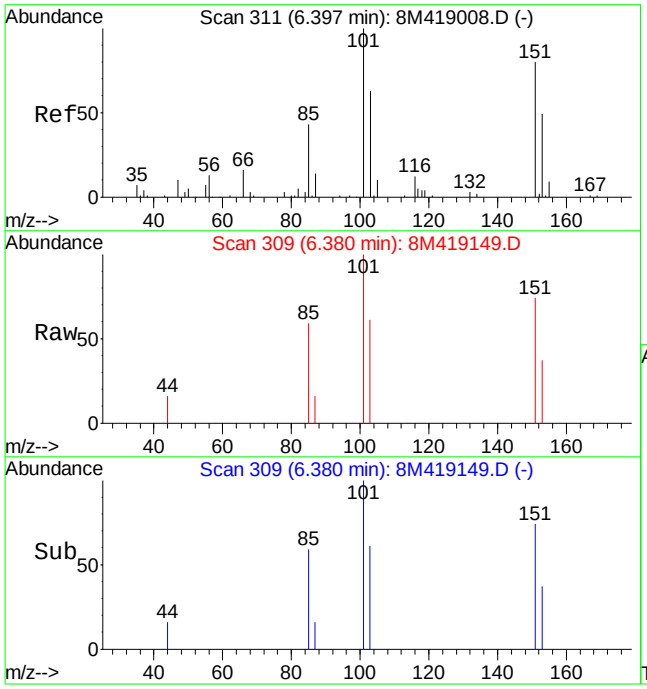
(#) = qualifier out of range (m) = manual integration
8M419149.D 8260WT.M Wed Apr 26 07:13:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419149.D Vial: 14
Acq On : 25 Apr 2017 17:45 Operator: TMB
Sample : L17041075-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 18:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

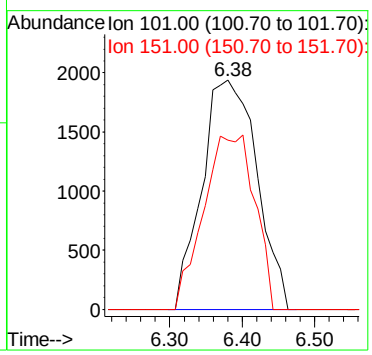


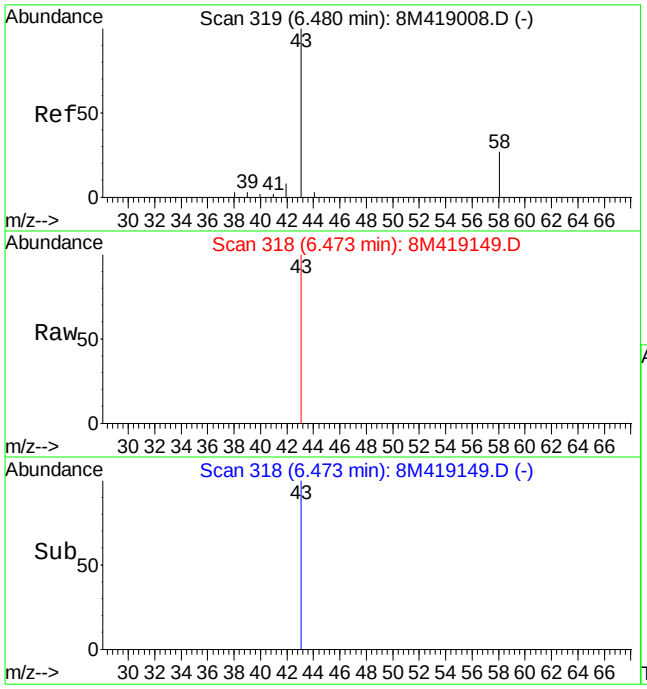


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.40 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion:101 Resp: 10187

Ion	Ratio	Lower	Upper
101	100		
151	70.6	39.9	119.9

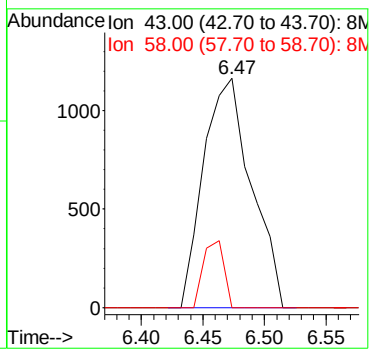


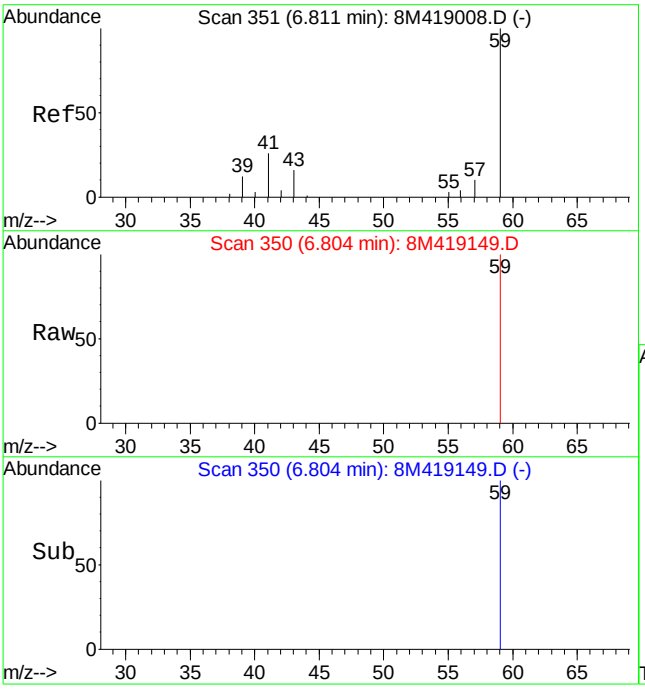


#13
Acetone
Concen: 3.05 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion: 43 Resp: 3149

Ion	Ratio	Lower	Upper
43	100		
58	12.6	19.4	45.4#

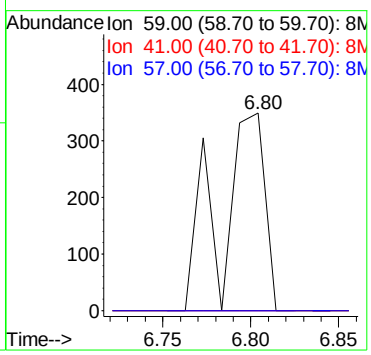


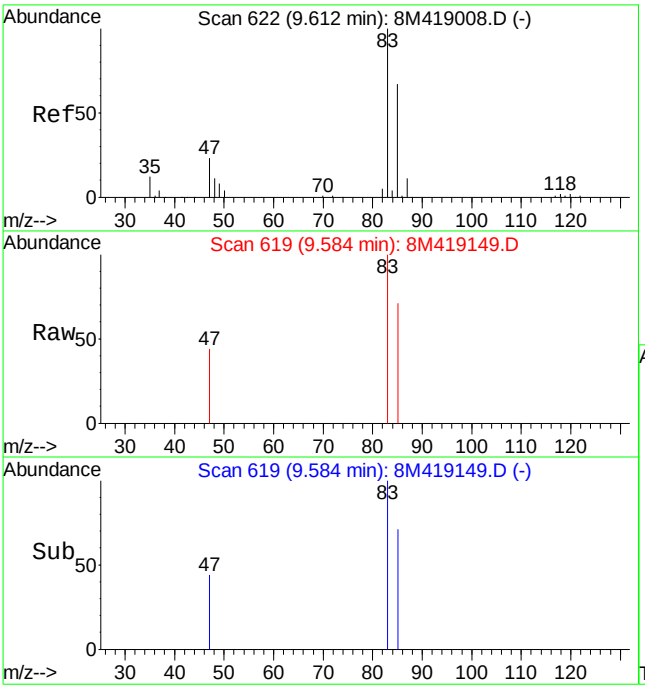


#15
Tert-Butyl Alcohol
Concen: 1.82 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion: 59 Resp: 611

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

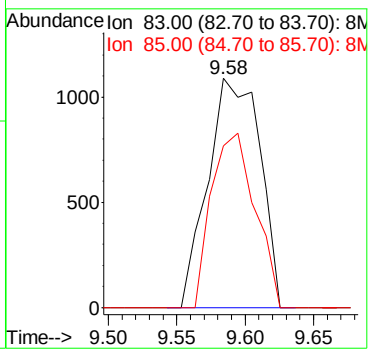


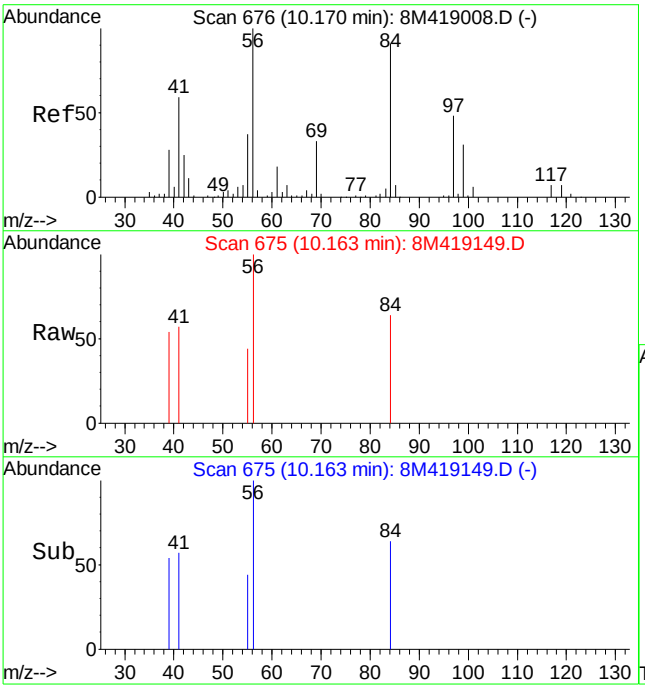


#33
Chloroform
Concen: 0.20 ug/L
RT: 9.58 min Scan# 619
Delta R.T. -0.02 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion: 83 Resp: 2882

Ion	Ratio	Lower	Upper
83	100		
85	63.8	39.1	91.3

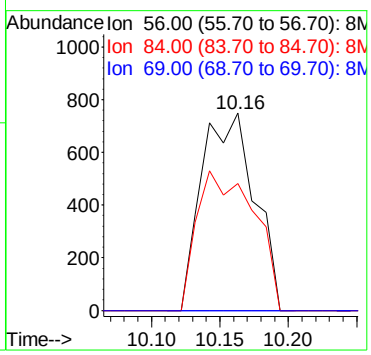


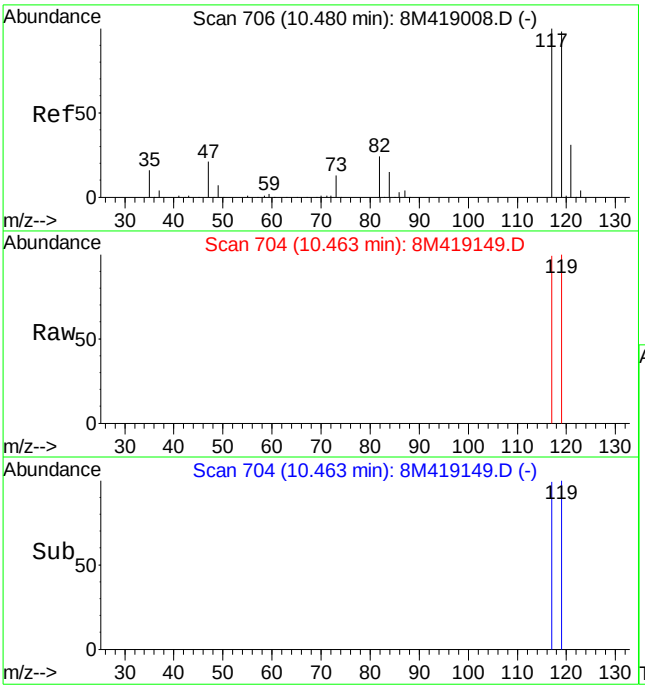


#39
Cyclohexane
Concen: 0.18 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion: 56 Resp: 2014

Ion	Ratio	Lower	Upper
56	100		
84	76.4	61.6	143.8
69	0.0	21.4	50.0#

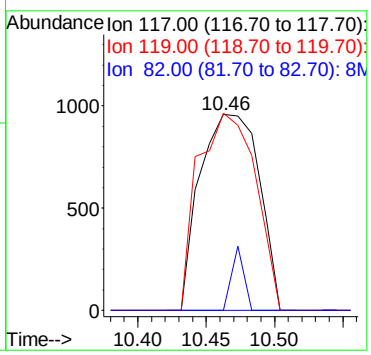


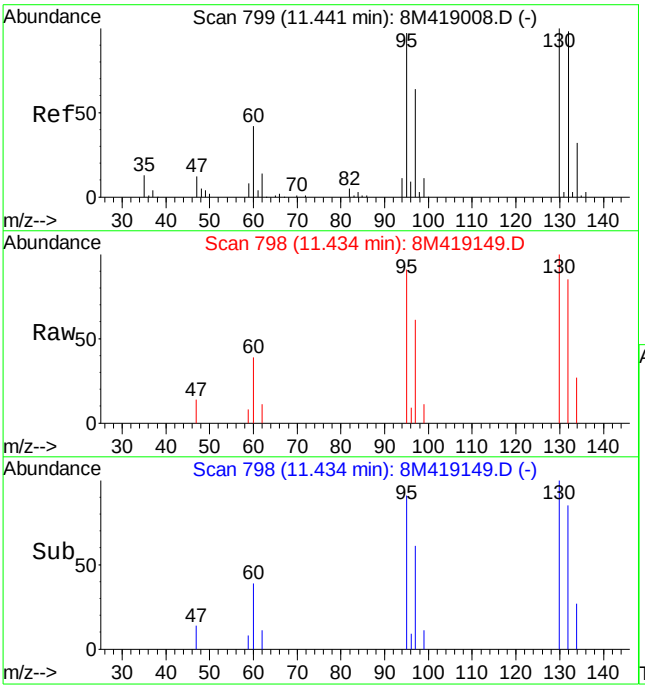


#42
Carbon Tetrachloride
Concen: 0.26 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion:117 Resp: 2874

Ion	Ratio	Lower	Upper
117	100		
119	97.9	58.5	136.5
82	0.0	14.9	34.9#

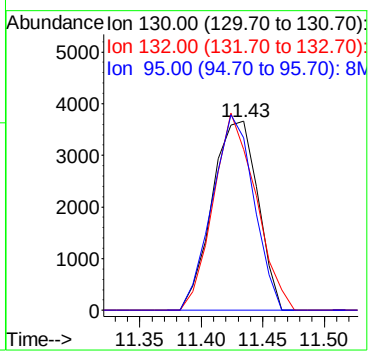


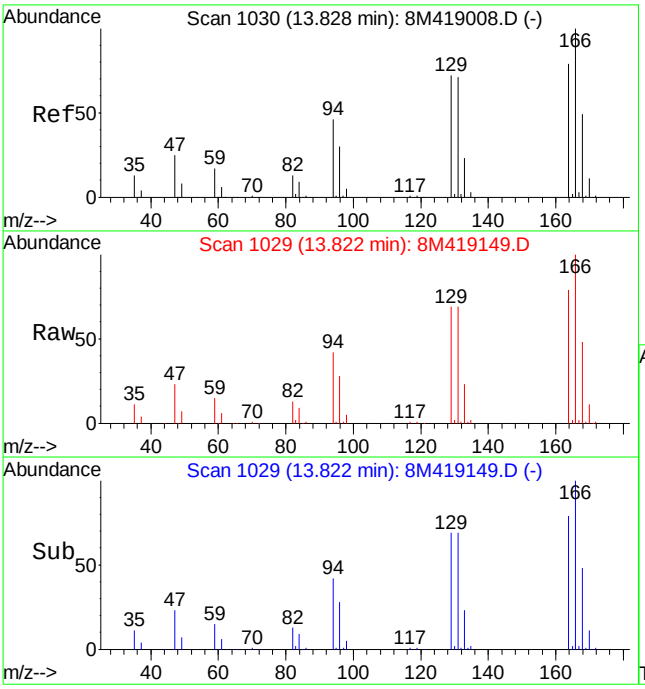


#47
Trichloroethene
Concen: 1.11 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion:130 Resp: 9465

Ion	Ratio	Lower	Upper
130	100		
132	97.1	59.4	138.6
95	94.1	60.1	140.3

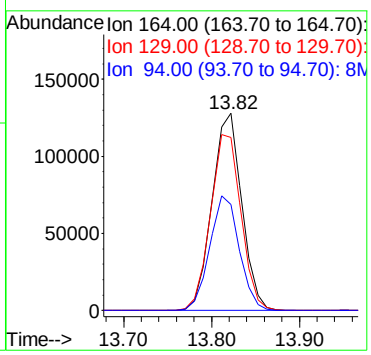




#66
Tetrachloroethene
Concen: 43.11 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419149.D
Acq: 25 Apr 2017 17:45

Tgt Ion:164 Resp: 299385

Ion	Ratio	Lower	Upper
164	100		
129	91.7	53.4	124.6
94	57.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419150.D Vial: 15
Acq On : 25 Apr 2017 18:15 Operator: TMB
Sample : L17041075-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 18:37:27 2017 Quant Results File: 8260WT.RES

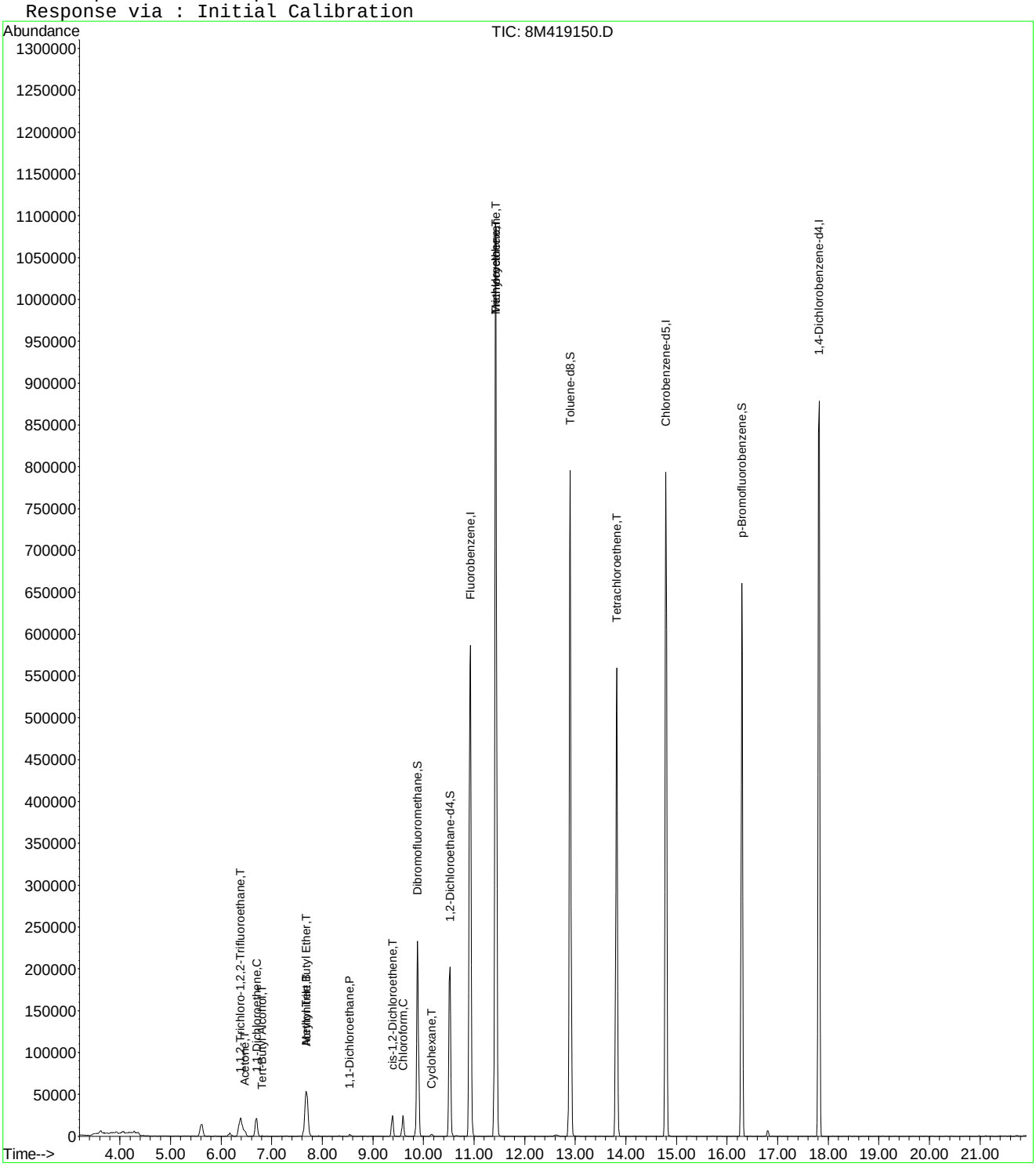
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

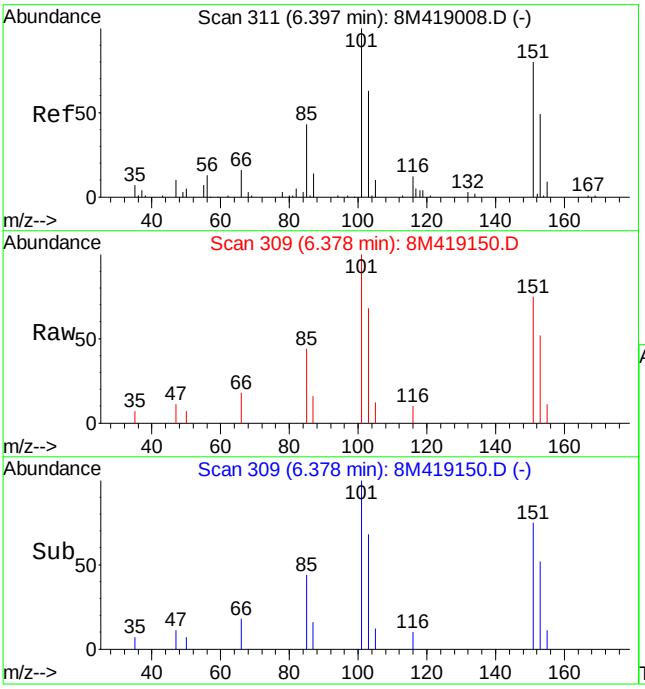
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	737329	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	590066	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	304733	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	195610	25.2932	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%			
43) 1,2-Dichloroethane-d4	10.52	65	173332	25.9253	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.72%			
58) Toluene-d8	12.90	98	717274	26.6040	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.40%			
80) p-Bromofluorobenzene	16.29	95	280560	26.0866	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.36%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	25631	3.5128	ug/L	97
13) Acetone	6.47	43	12138	11.7049	ug/L	96
14) 1,1-Dichloroethene	6.70	61	23591	2.2092	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	742	2.2073	ug/L #	59
21) Acrylonitrile	7.69	53	407	0.2829	ug/L #	10
22) Methyl Tert Butyl Ether	7.68	73	118605	7.8442	ug/L	94
27) 1,1-Dichloroethane	8.54	63	4166	0.3116	ug/L #	78
32) cis-1,2-Dichloroethene	9.39	96	16227	1.8897	ug/L	92
33) Chloroform	9.59	83	25052	1.6910	ug/L	96
39) Cyclohexane	10.16	56	2555	0.2295	ug/L #	64
47) Trichloroethene	11.43	130	481959	56.3249	ug/L	99
48) Methylcyclohexane	11.43	83	5671	0.4972	ug/L #	1
66) Tetrachloroethene	13.82	164	172732	25.0364	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419150.D 8260WT.M Wed Apr 26 07:13:49 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419150.D Vial: 15
Acq On : 25 Apr 2017 18:15 Operator: TMB
Sample : L17041075-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 18:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

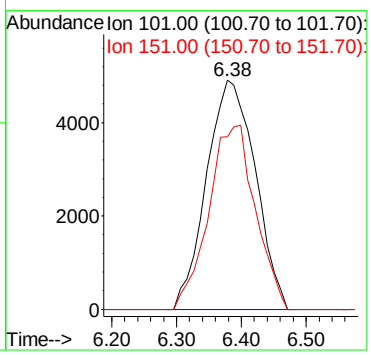


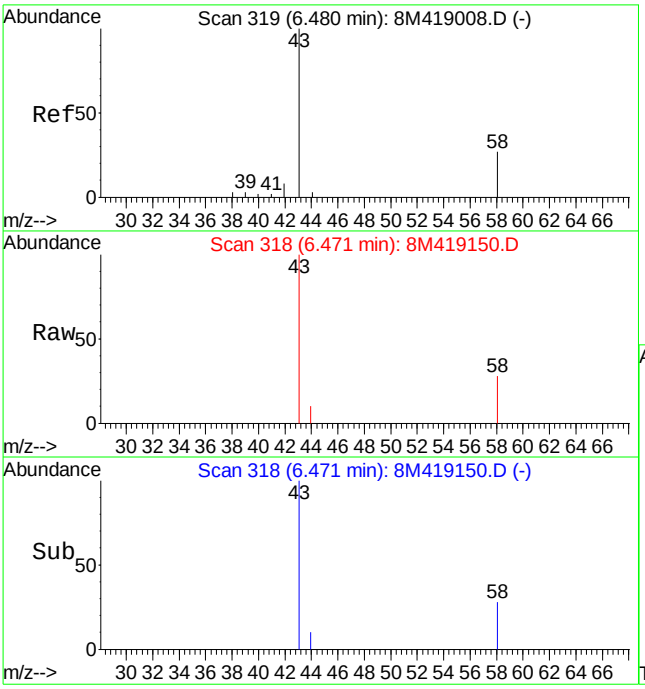


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 3.51 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion:101 Resp: 25631

Ion	Ratio	Lower	Upper
101	100		
151	76.9	39.9	119.9

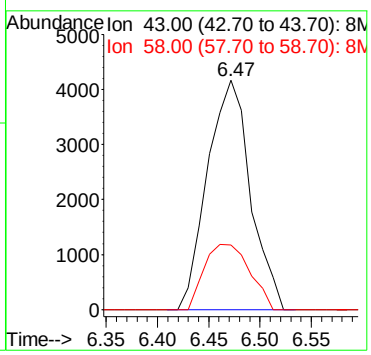


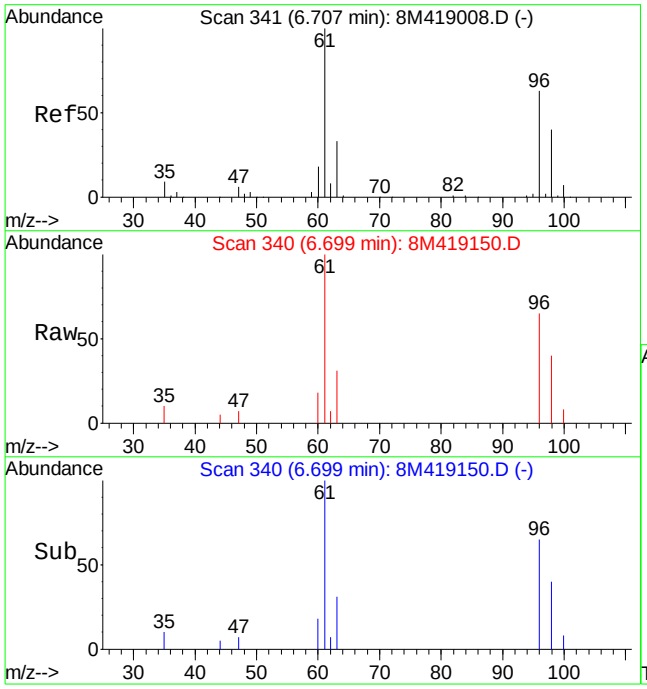


#13
Acetone
Concen: 11.70 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 43 Resp: 12138

Ion	Ratio	Lower	Upper
43	100		
58	30.0	19.4	45.4

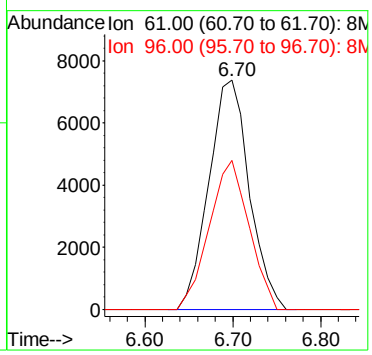


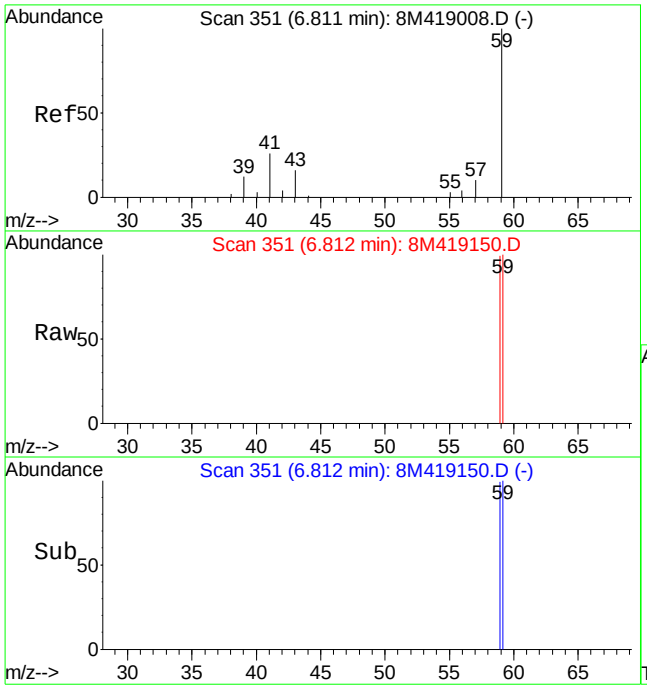


#14
1,1-Dichloroethene
Concen: 2.21 ug/L
RT: 6.70 min Scan# 340
Delta R.T. 0.00 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 61 Resp: 23591

Ion	Ratio	Lower	Upper
61	100		
96	63.9	40.0	93.4

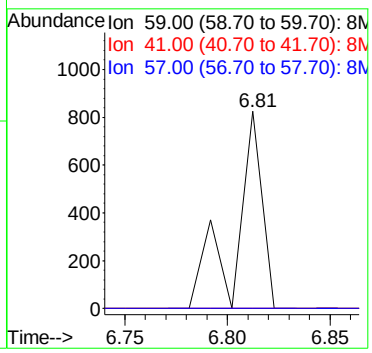


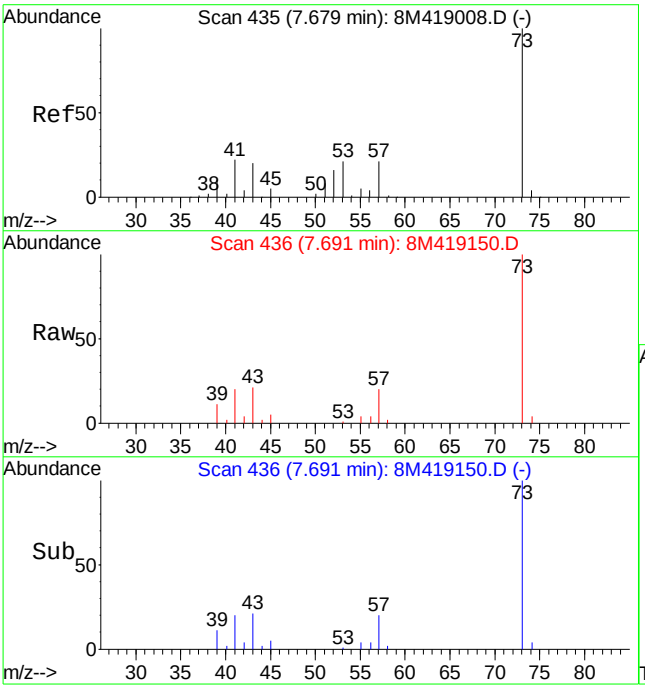


#15
Tert-Butyl Alcohol
Concen: 2.21 ug/L
RT: 6.81 min Scan# 351
Delta R.T. -0.02 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 59 Resp: 742

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

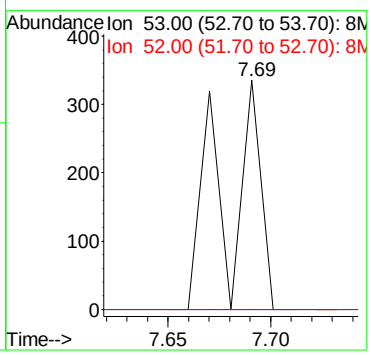


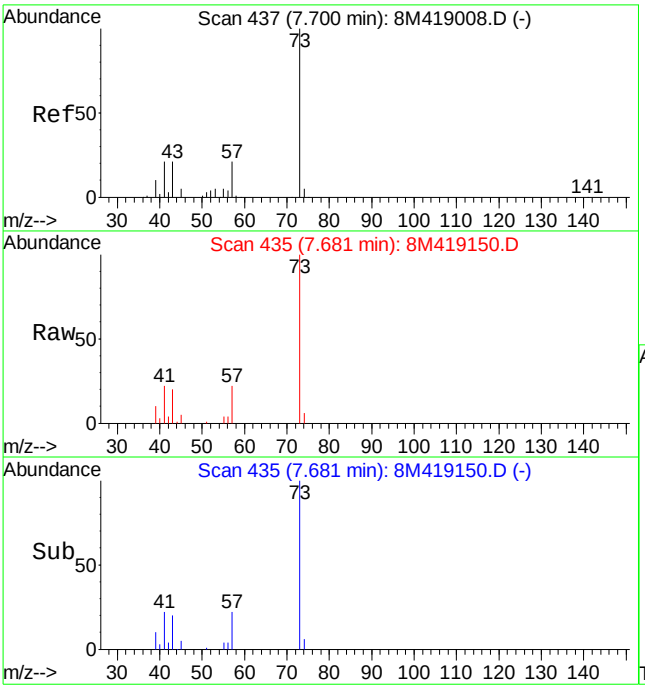


#21
Acrylonitrile
Concen: 0.28 ug/L
RT: 7.69 min Scan# 436
Delta R.T. 0.02 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 53 Resp: 407

Ion	Ratio	Lower	Upper
53	100		
52	0.0	46.8	109.2#

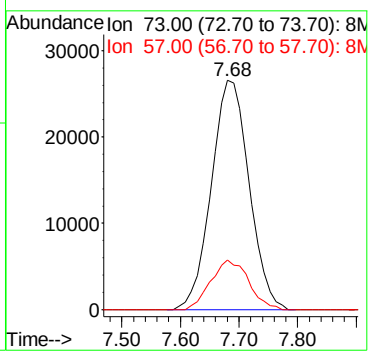


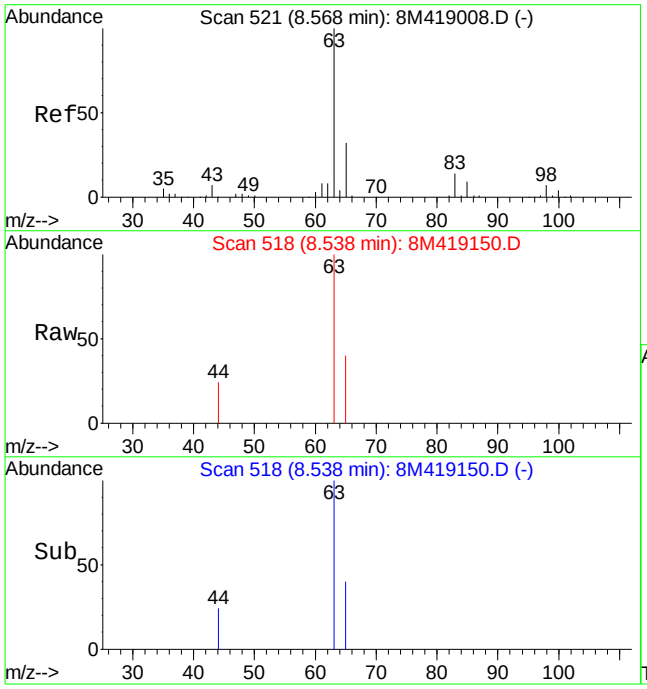


#22
Methyl Tert Butyl Ether
Concen: 7.84 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 73 Resp: 118605

Ion	Ratio	Lower	Upper
73	100		
57	21.6	11.4	26.6

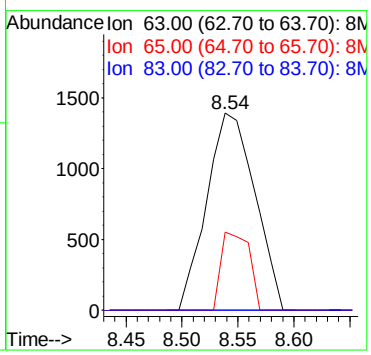


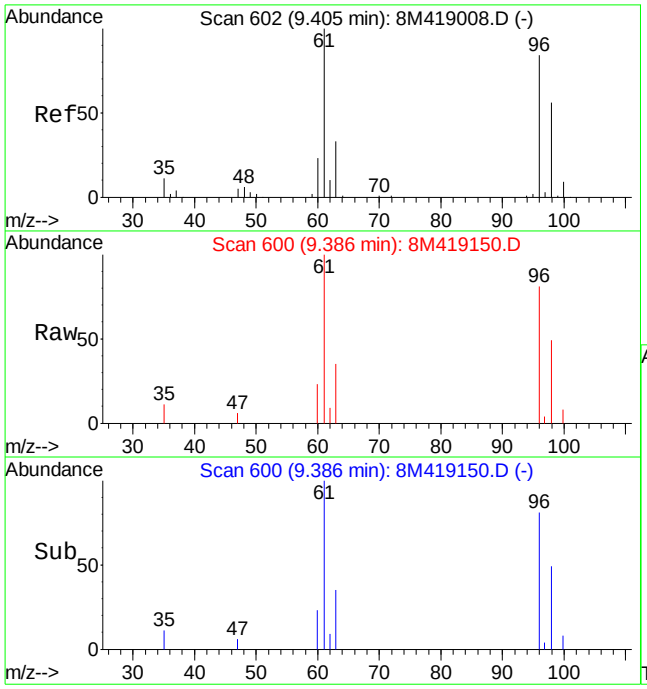


#27
1,1-Dichloroethane
Concen: 0.31 ug/L
RT: 8.54 min Scan# 518
Delta R.T. -0.02 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 63 Resp: 4166

Ion	Ratio	Lower	Upper
63	100		
65	23.1	19.1	44.7
83	0.0	9.0	21.0#

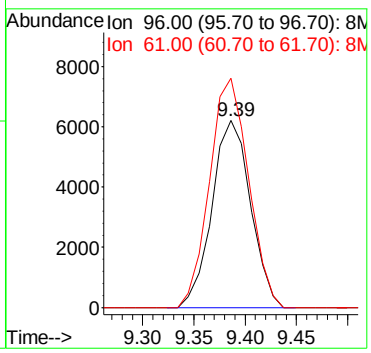


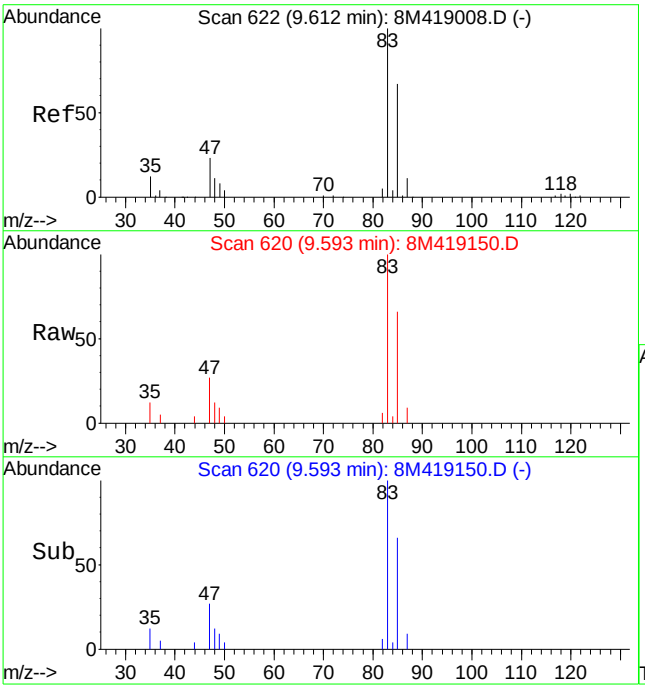


#32
cis-1,2-Dichloroethene
Concen: 1.89 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 96 Resp: 16227

Ion	Ratio	Lower	Upper
96	100		
61	124.1	80.3	187.3

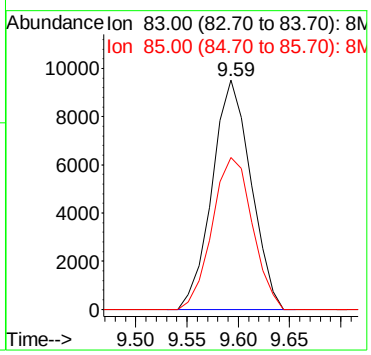


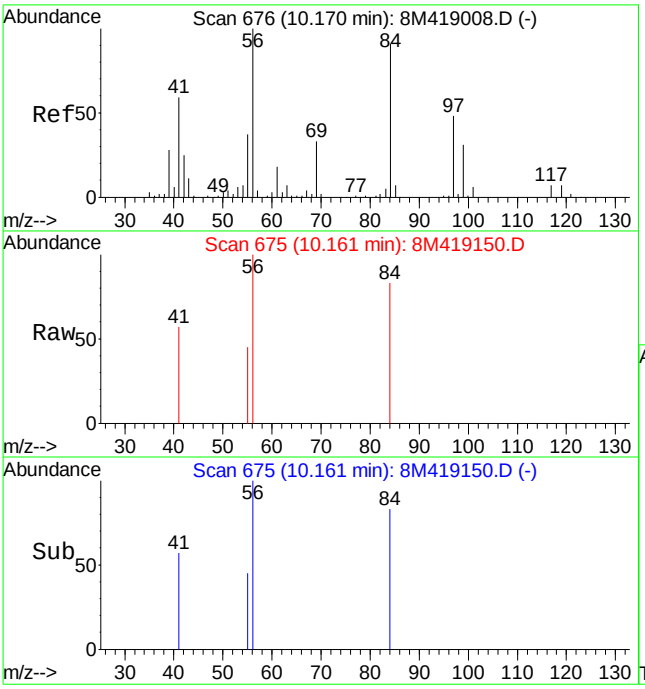


#33
Chloroform
Concen: 1.69 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 83 Resp: 25052

Ion	Ratio	Lower	Upper
83	100		
85	68.5	39.1	91.3

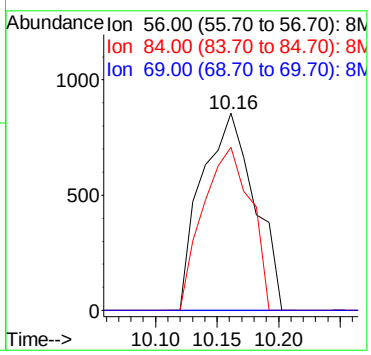


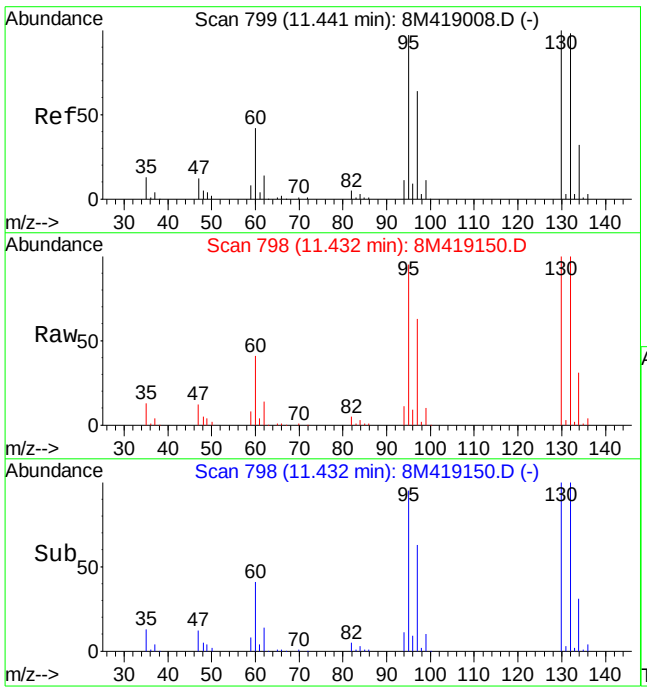


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 56 Resp: 2555

Ion	Ratio	Lower	Upper
56	100		
84	74.8	61.6	143.8
69	0.0	21.4	50.0#

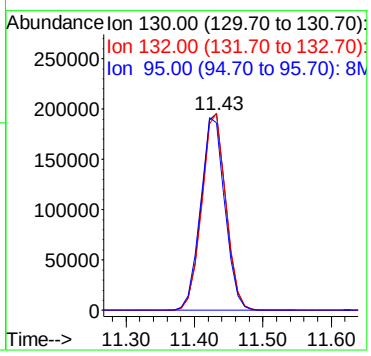


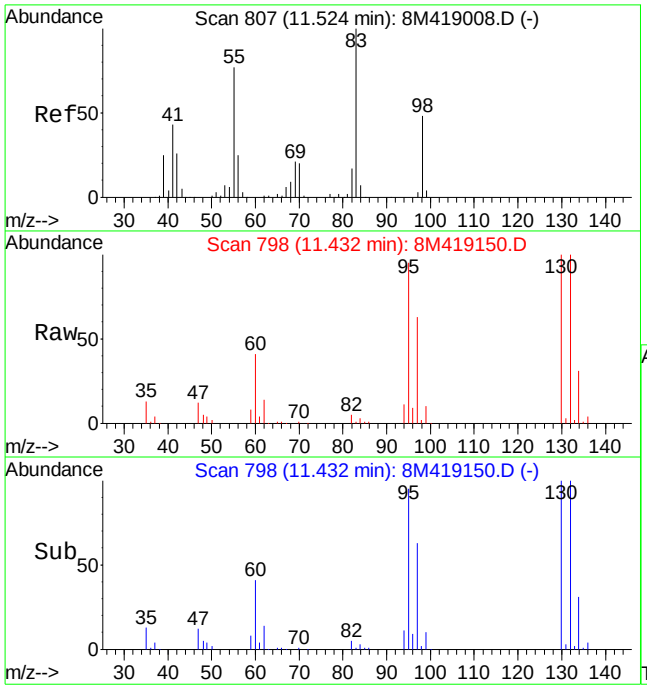


#47
Trichloroethene
Concen: 56.32 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion:130 Resp: 481959

Ion	Ratio	Lower	Upper
130	100		
132	98.8	59.4	138.6
95	97.9	60.1	140.3

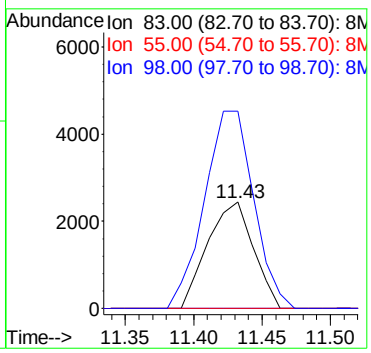


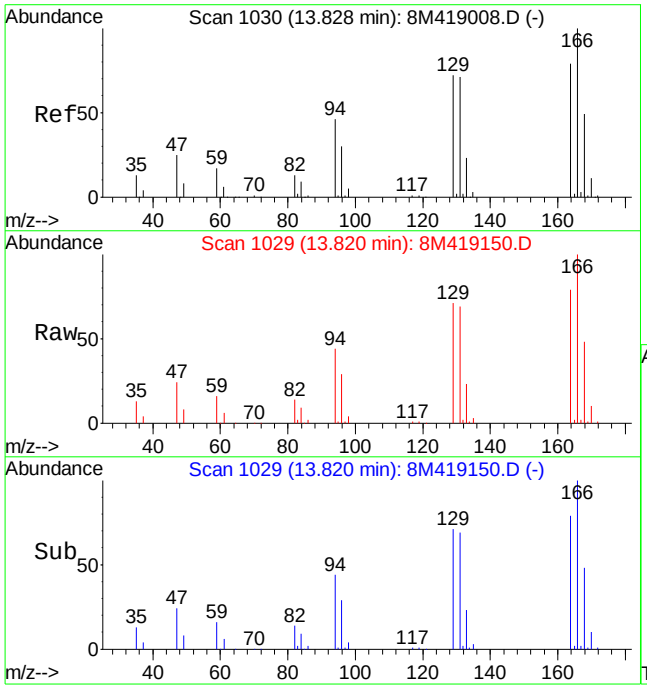


#48
Methylcyclohexane
Concen: 0.50 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.09 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion: 83 Resp: 5671

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	199.8	28.4	66.2#

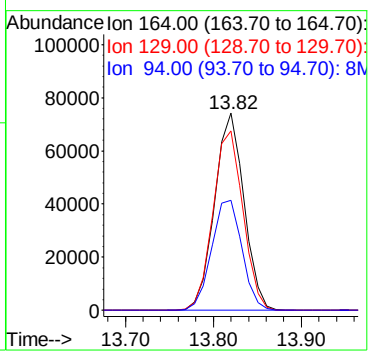




#66
Tetrachloroethene
Concen: 25.04 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419150.D
Acq: 25 Apr 2017 18:15

Tgt Ion:164 Resp: 172732

Ion	Ratio	Lower	Upper
164	100		
129	92.5	53.4	124.6
94	57.6	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419151.D Vial: 16
Acq On : 25 Apr 2017 18:45 Operator: TMB
Sample : L17041075-12 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 19:07:33 2017 Quant Results File: 8260WT.RES

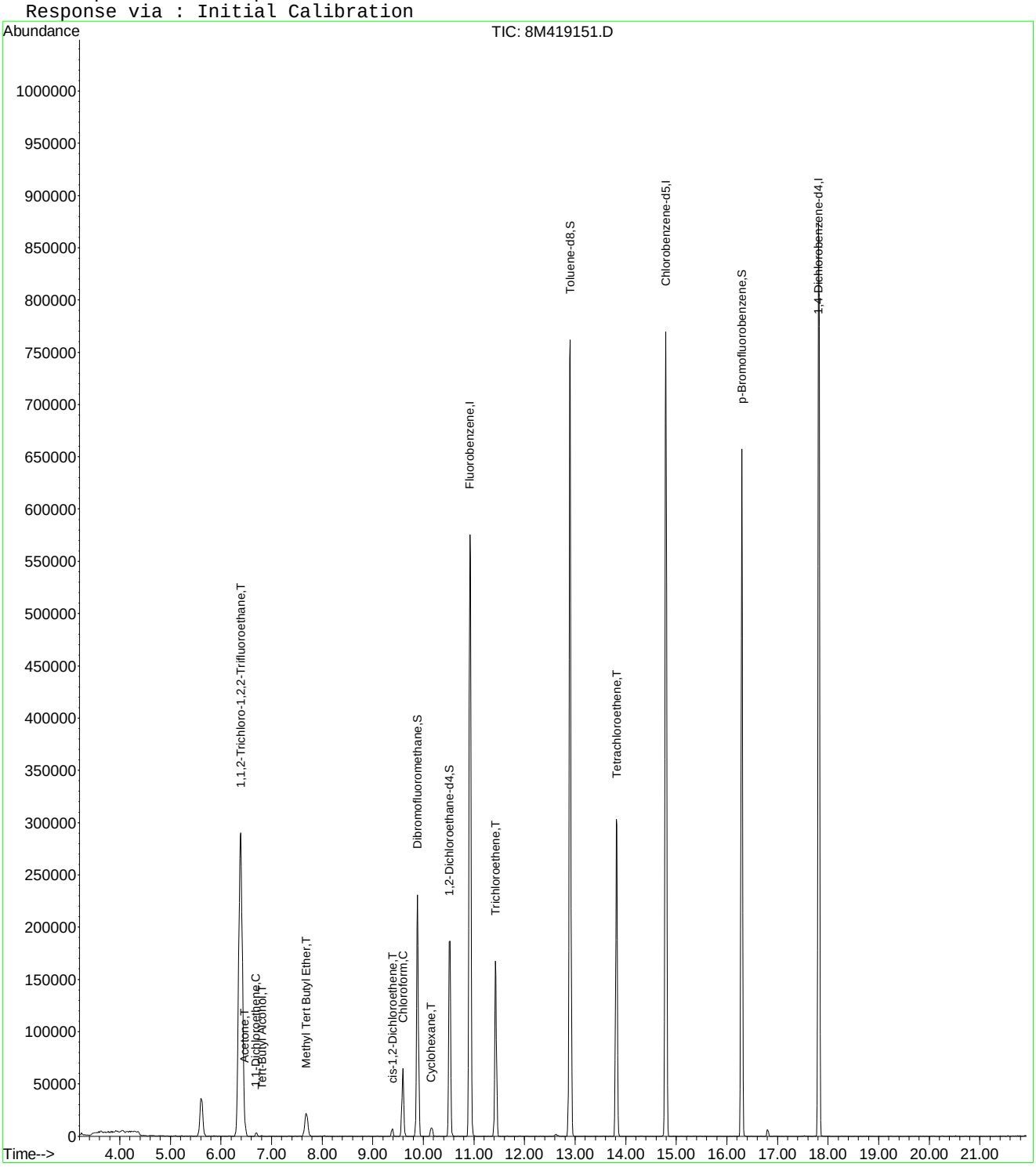
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

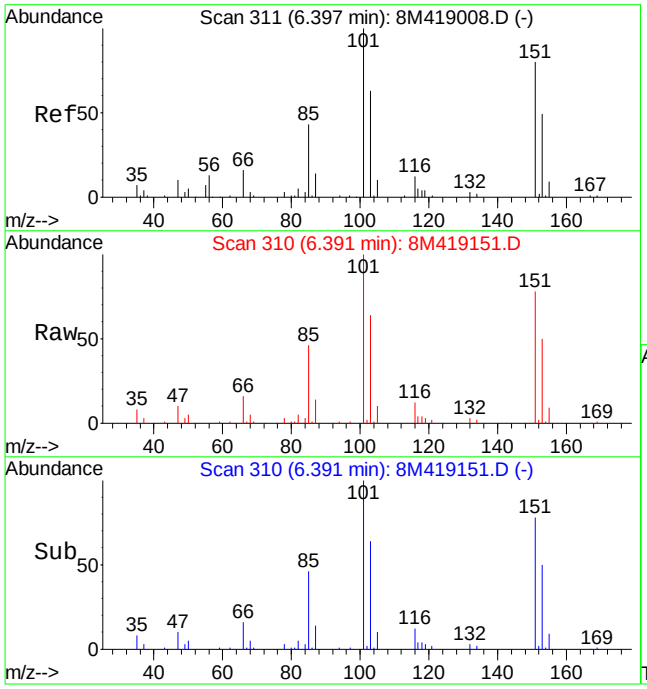
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	724447	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	580495	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	296712	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	191349	25.1822 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.72%		
43) 1,2-Dichloroethane-d4	10.51	65	166820	25.3949 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.56%		
58) Toluene-d8	12.90	98	709626	26.7543 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.00%		
80) p-Bromofluorobenzene	16.29	95	274880	26.2494 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.00%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	320079	44.6480 ug/L	99
13) Acetone	6.46	43	8119	7.9685 ug/L	85
14) 1,1-Dichloroethene	6.69	61	3367	0.3209 ug/L	99
15) Tert-Butyl Alcohol	6.81	59	680	2.0589 ug/L #	59
22) Methyl Tert Butyl Ether	7.68	73	48402	3.2581 ug/L	95
32) cis-1,2-Dichloroethene	9.39	96	4751	0.5631 ug/L	89
33) Chloroform	9.59	83	68168	4.6831 ug/L	97
39) Cyclohexane	10.15	56	7050	0.6446 ug/L	83
47) Trichloroethene	11.42	130	73242	8.7117 ug/L	99
66) Tetrachloroethene	13.82	164	96106	14.1596 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419151.D 8260WT.M Wed Apr 26 07:13:55 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419151.D Vial: 16
Acq On : 25 Apr 2017 18:45 Operator: TMB
Sample : L17041075-12 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 19:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

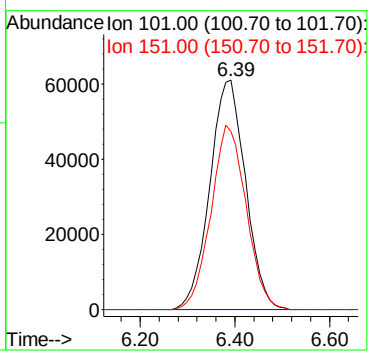


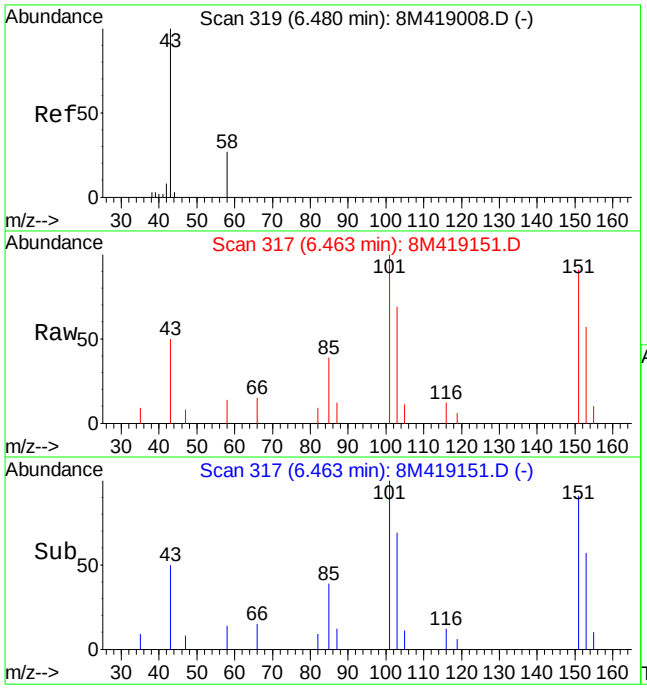


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 44.65 ug/L
RT: 6.39 min Scan# 310
Delta R.T. -0.01 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion:101 Resp: 320079

Ion	Ratio	Lower	Upper
101	100		
151	79.0	39.9	119.9

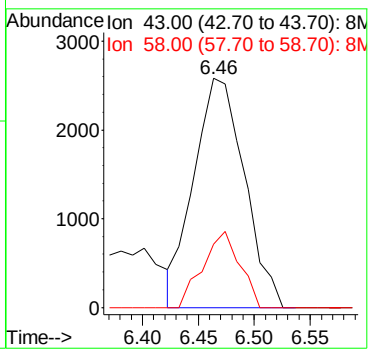


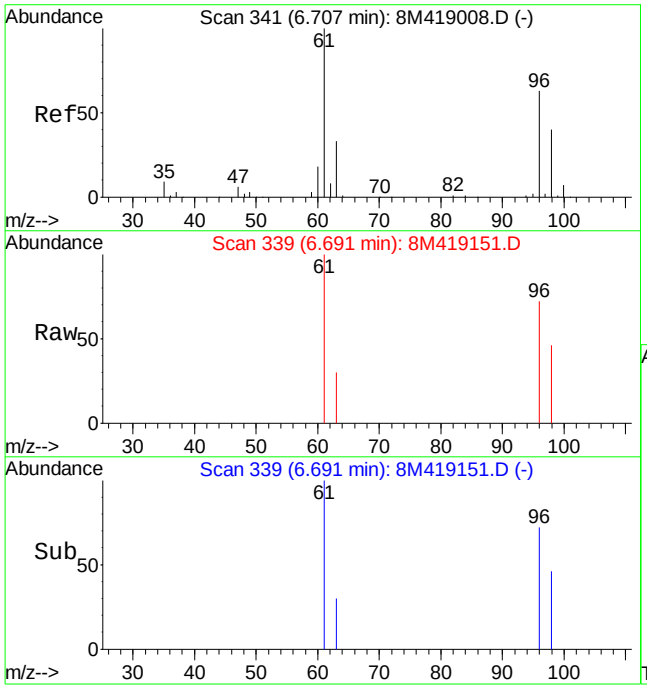


#13
Acetone
Concen: 7.97 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 43 Resp: 8119

Ion	Ratio	Lower	Upper
43	100		
58	24.1	19.4	45.4

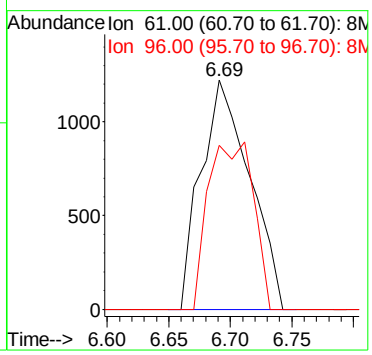


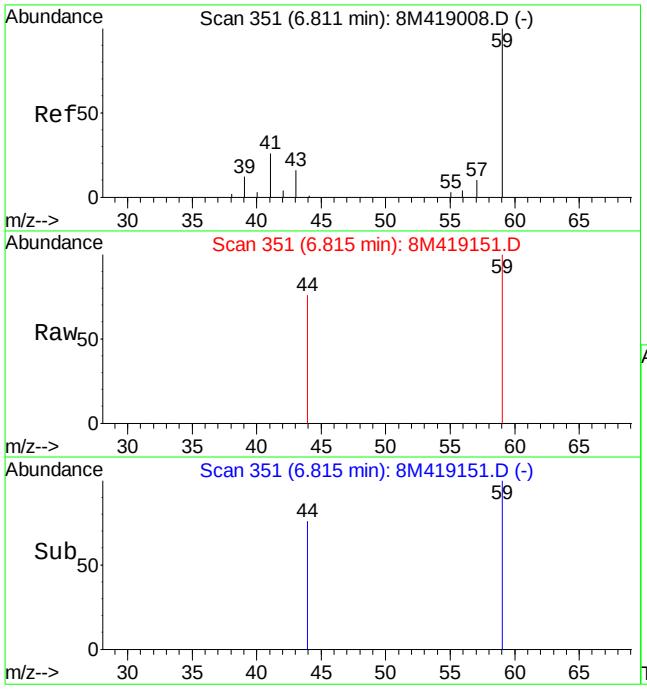


#14
1,1-Dichloroethene
Concen: 0.32 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 61 Resp: 3367

Ion	Ratio	Lower	Upper
61	100		
96	67.8	40.0	93.4

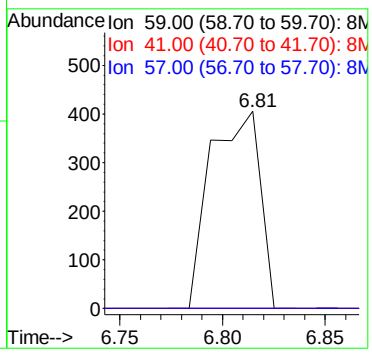


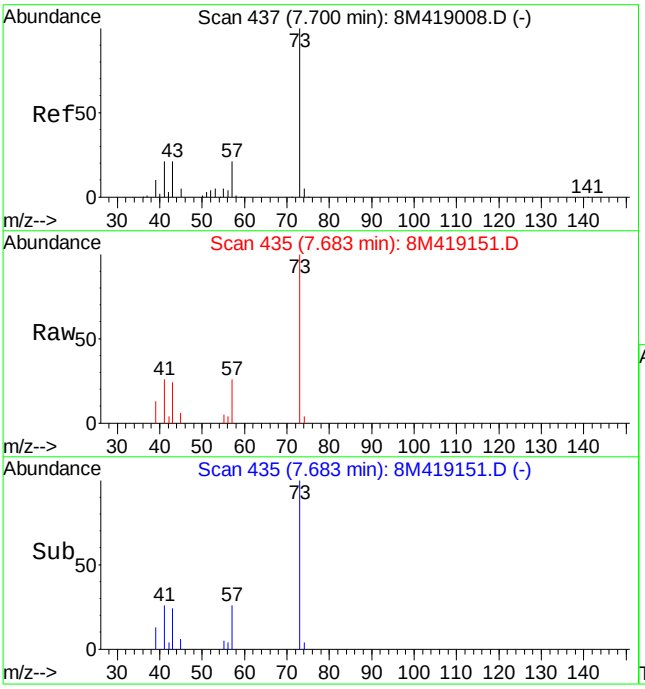


#15
Tert-Butyl Alcohol
Concen: 2.06 ug/L
RT: 6.81 min Scan# 351
Delta R.T. -0.02 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 59 Resp: 680

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

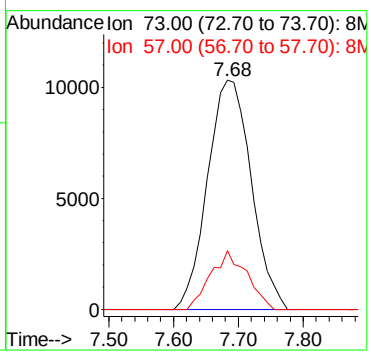


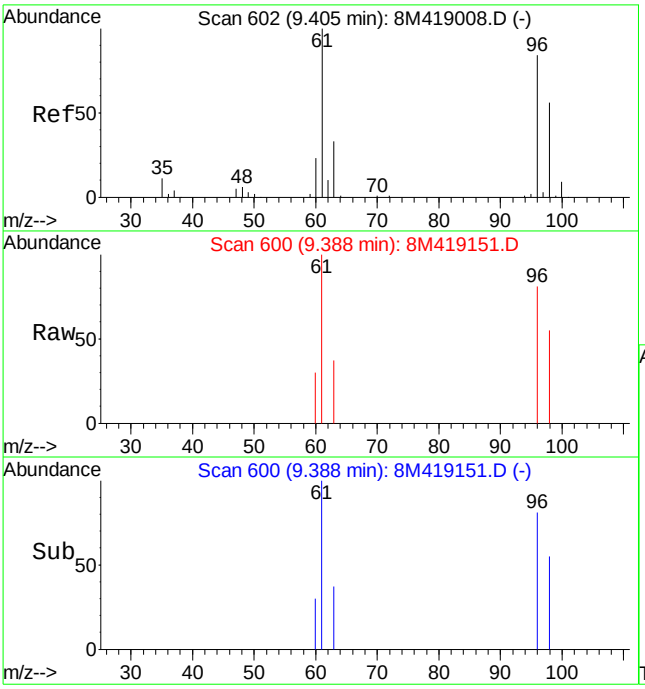


#22
Methyl Tert Butyl Ether
Concen: 3.26 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 73 Resp: 48402

Ion	Ratio	Lower	Upper
73	100		
57	21.2	11.4	26.6

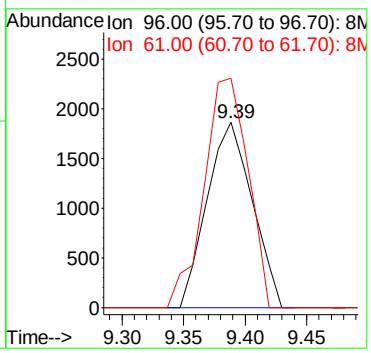


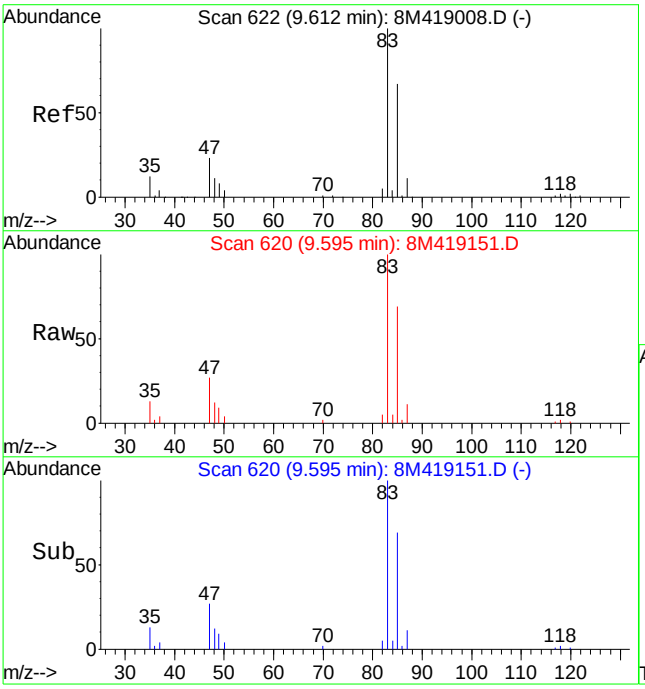


#32
cis-1,2-Dichloroethene
Concen: 0.56 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 96 Resp: 4751

Ion	Ratio	Lower	Upper
96	100		
61	120.4	80.3	187.3

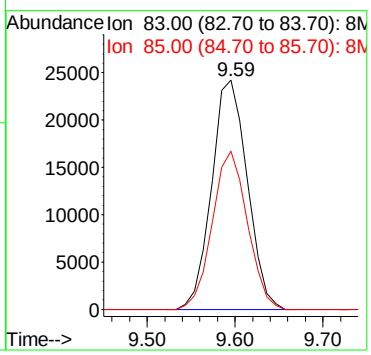


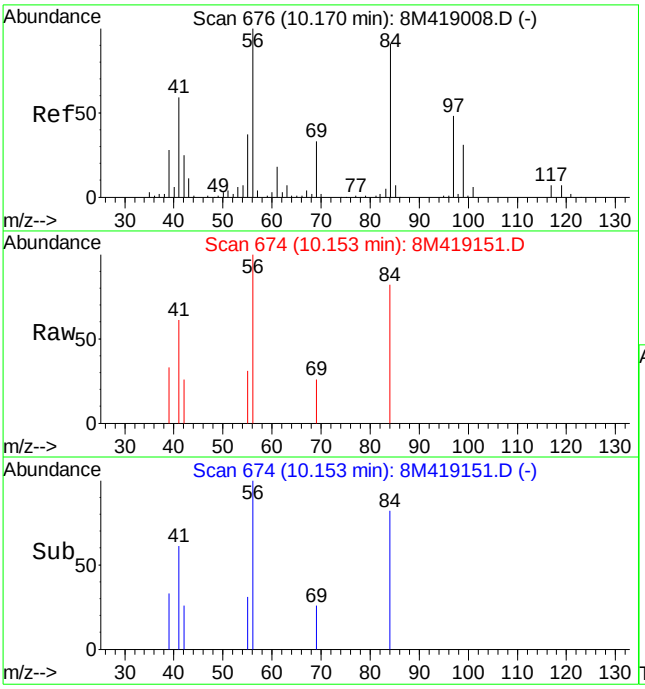


#33
Chloroform
Concen: 4.68 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 83 Resp: 68168

Ion	Ratio	Lower	Upper
83	100		
85	67.9	39.1	91.3

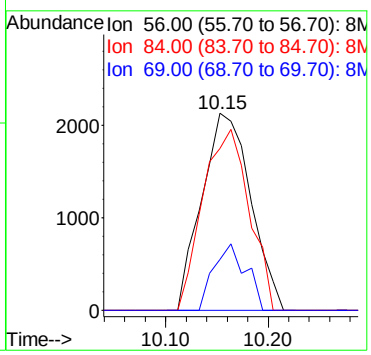


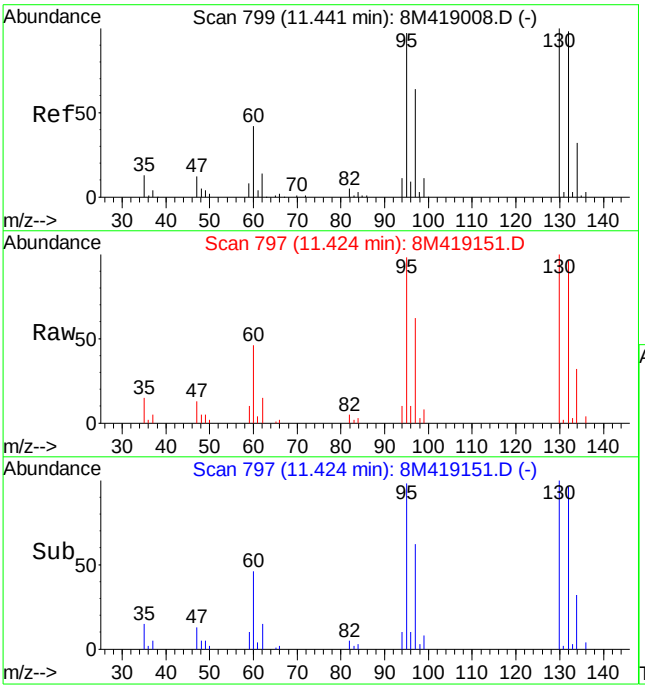


#39
Cyclohexane
Concen: 0.64 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion: 56 Resp: 7050

Ion	Ratio	Lower	Upper
56	100		
84	87.1	61.6	143.8
69	22.3	21.4	50.0

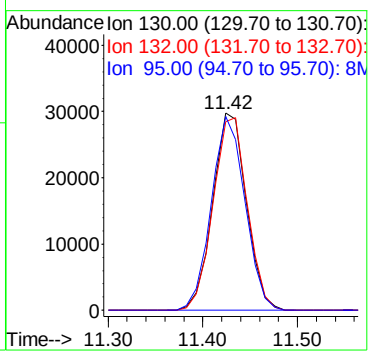


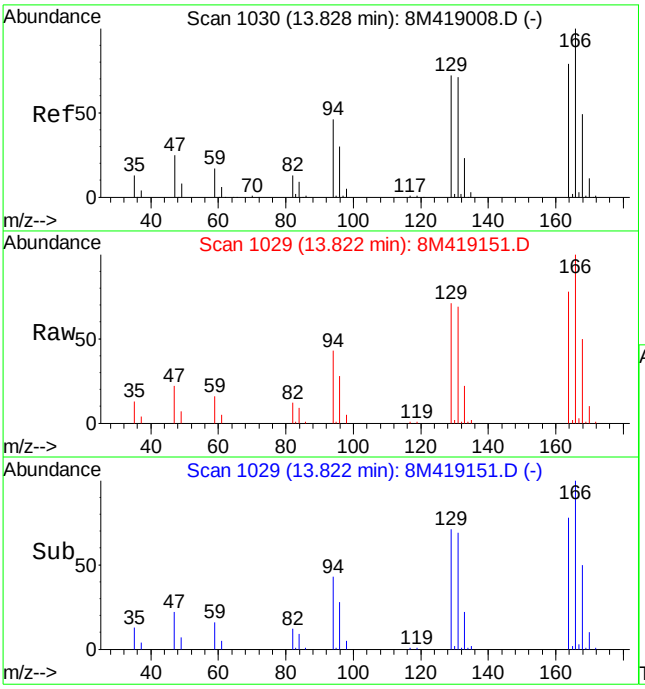


#47
Trichloroethene
Concen: 8.71 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion:130 Resp: 73242

Ion	Ratio	Lower	Upper
130	100		
132	99.0	59.4	138.6
95	98.1	60.1	140.3

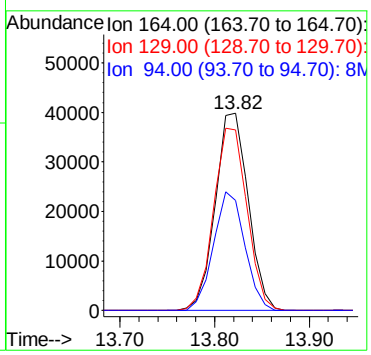




#66
Tetrachloroethene
Concen: 14.16 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419151.D
Acq: 25 Apr 2017 18:45

Tgt Ion:164 Resp: 96106

Ion	Ratio	Lower	Upper
164	100		
129	93.2	53.4	124.6
94	57.0	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419153.D Vial: 18
Acq On : 25 Apr 2017 19:45 Operator: TMB
Sample : L17041075-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 20:07:13 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

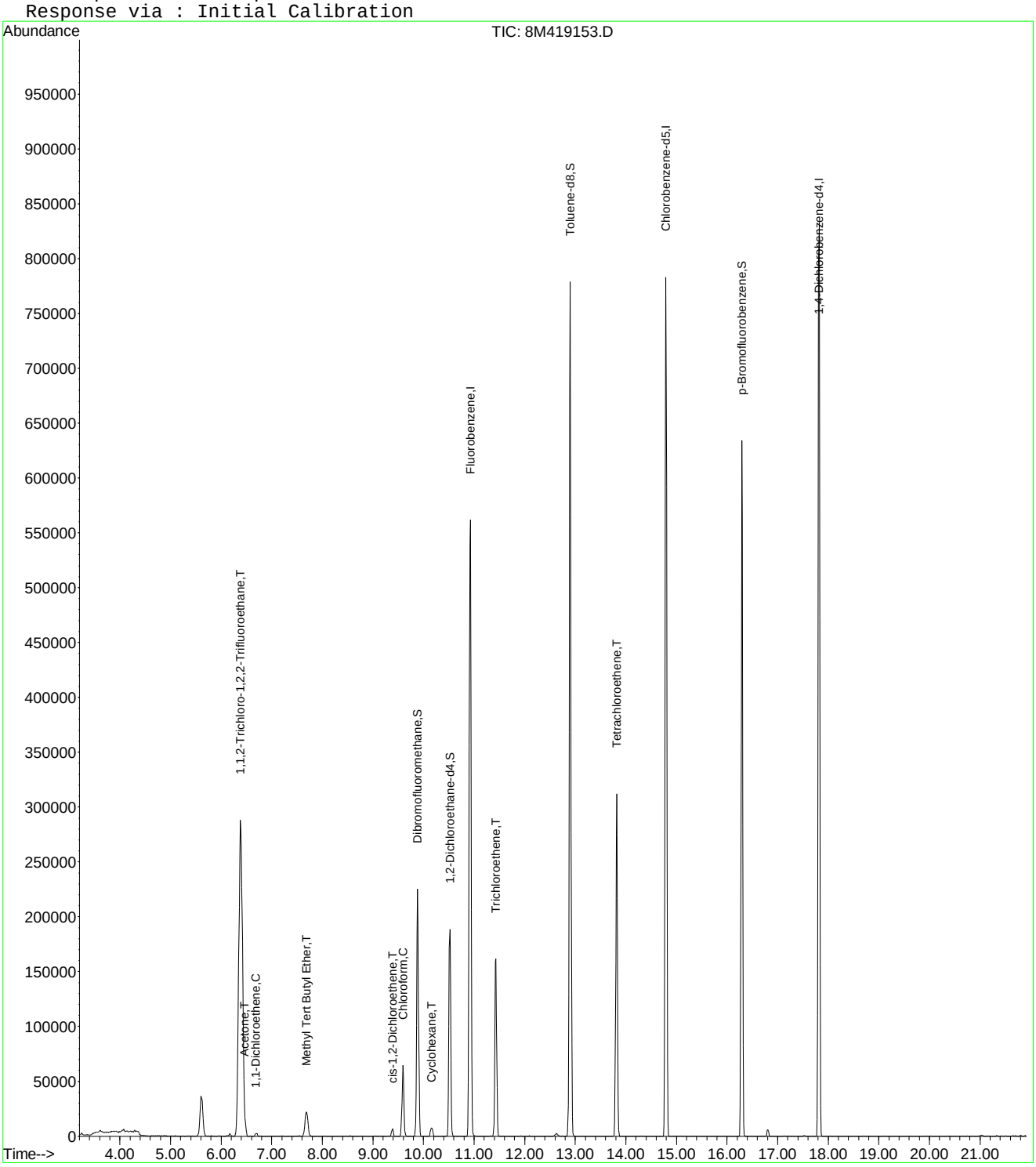
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	712817	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	570912	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	286478	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	187860	25.1264 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.52%		
43) 1,2-Dichloroethane-d4	10.52	65	163648	25.3185 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.28%		
58) Toluene-d8	12.90	98	696255	26.6908 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.76%		
80) p-Bromofluorobenzene	16.29	95	270829	26.7864 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.16%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	318106	45.0967 ug/L	99
13) Acetone	6.46	43	10473	10.4466 ug/L	89
14) 1,1-Dichloroethene	6.69	61	3757	0.3639 ug/L	83
22) Methyl Tert Butyl Ether	7.69	73	47502	3.2497 ug/L	98
32) cis-1,2-Dichloroethene	9.39	96	4689	0.5648 ug/L	97
33) Chloroform	9.59	83	67344	4.7019 ug/L	98
39) Cyclohexane	10.16	56	6761	0.6283 ug/L	78
47) Trichloroethene	11.43	130	73100	8.8367 ug/L	98
66) Tetrachloroethene	13.82	164	95207	14.2626 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419153.D 8260WT.M Wed Apr 26 07:14:04 2017 Page 1

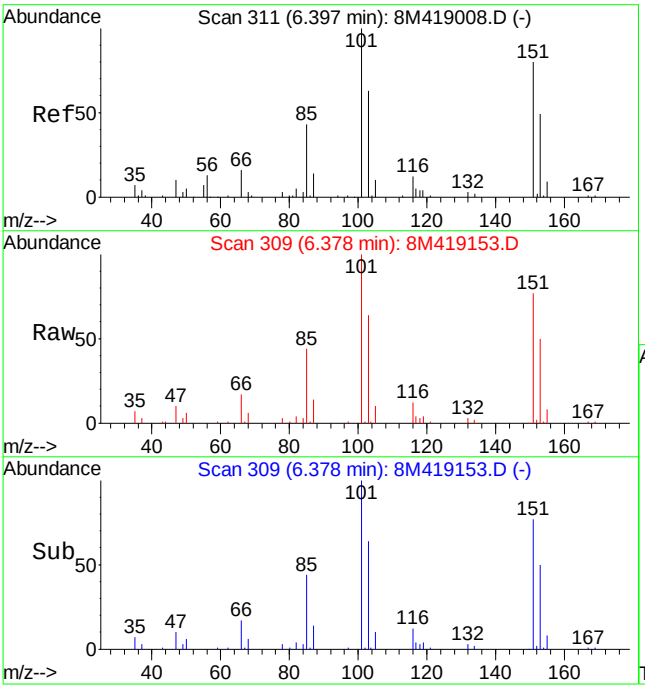
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419153.D Vial: 18
Acq On : 25 Apr 2017 19:45 Operator: TMB
Sample : L17041075-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 20:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



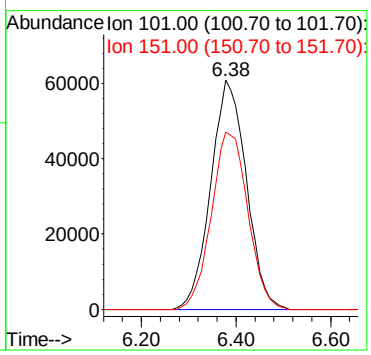
8M419153.D 8260WT.M Wed Apr 26 07:14:05 2017 Page 2

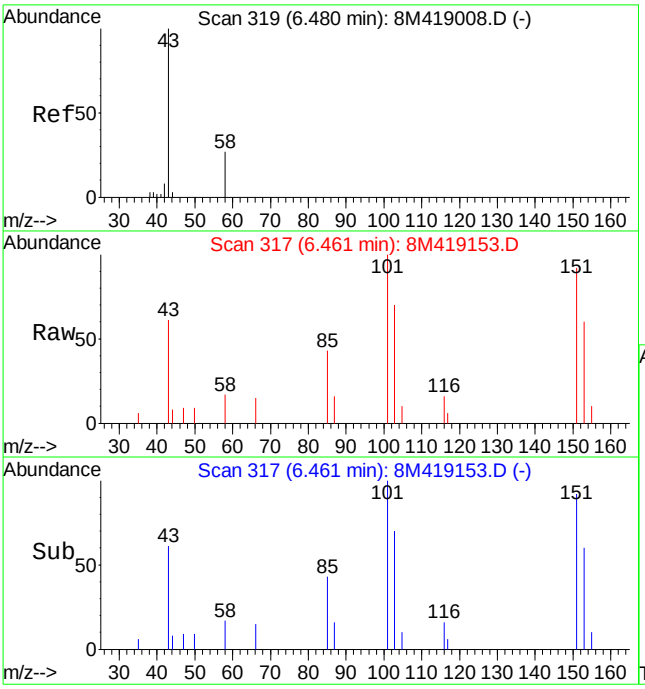


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 45.10 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion:101 Resp: 318106

Ion	Ratio	Lower	Upper
101	100		
151	79.2	39.9	119.9

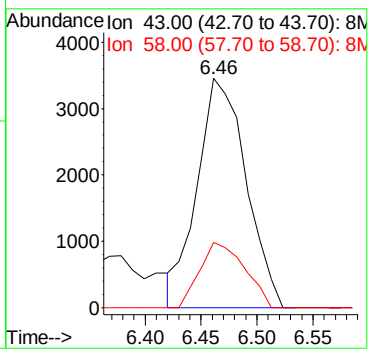


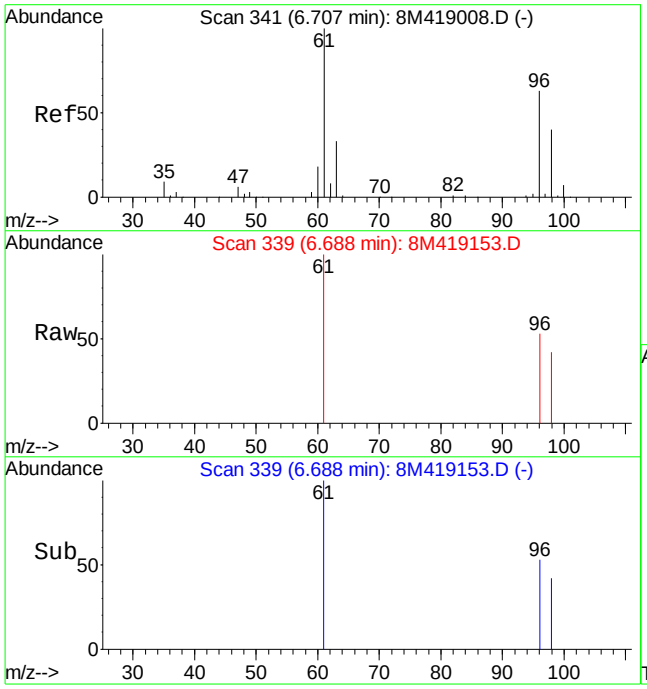


#13
Acetone
Concen: 10.45 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 43 Resp: 10473

Ion	Ratio	Lower	Upper
43	100		
58	26.1	19.4	45.4

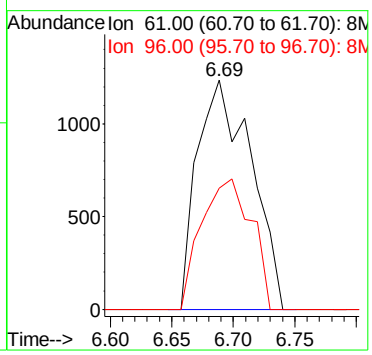


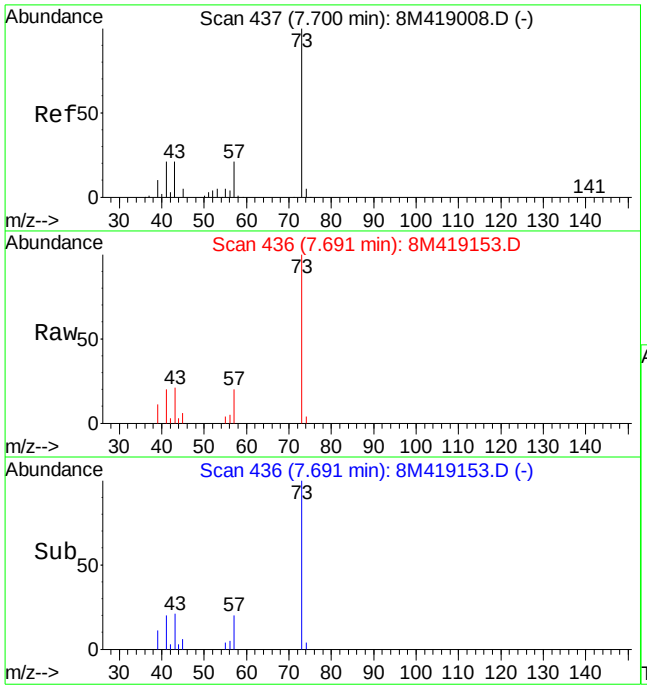


#14
1,1-Dichloroethene
Concen: 0.36 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 61 Resp: 3757

Ion	Ratio	Lower	Upper
61	100		
96	52.9	40.0	93.4

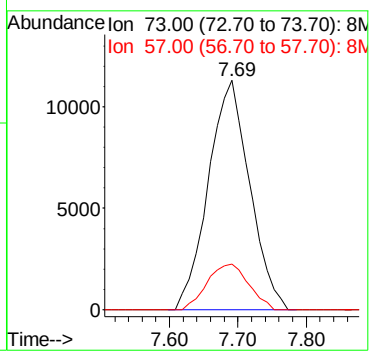


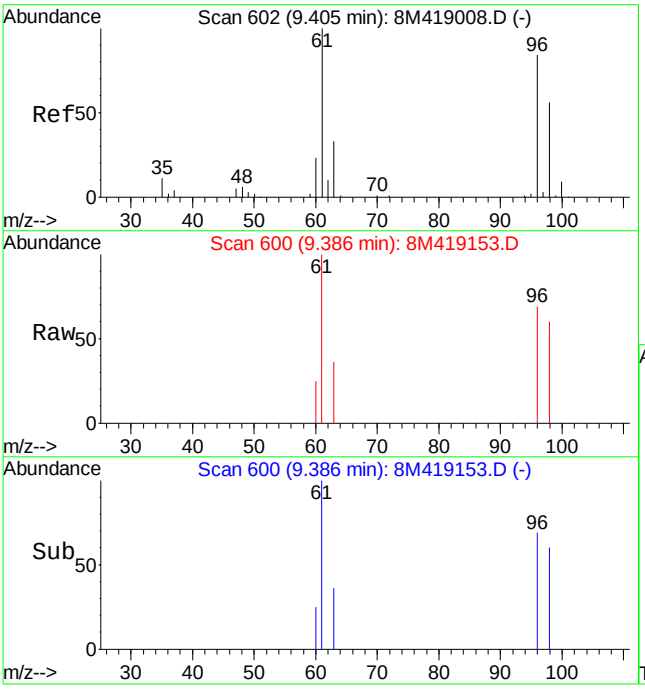


#22
Methyl Tert Butyl Ether
Concen: 3.25 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 73 Resp: 47502

Ion	Ratio	Lower	Upper
73	100		
57	19.9	11.4	26.6

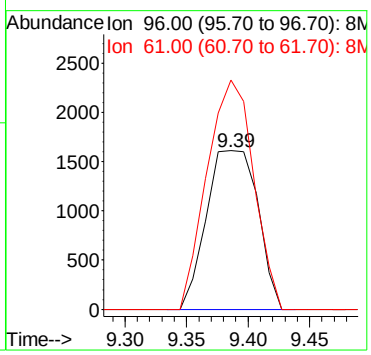


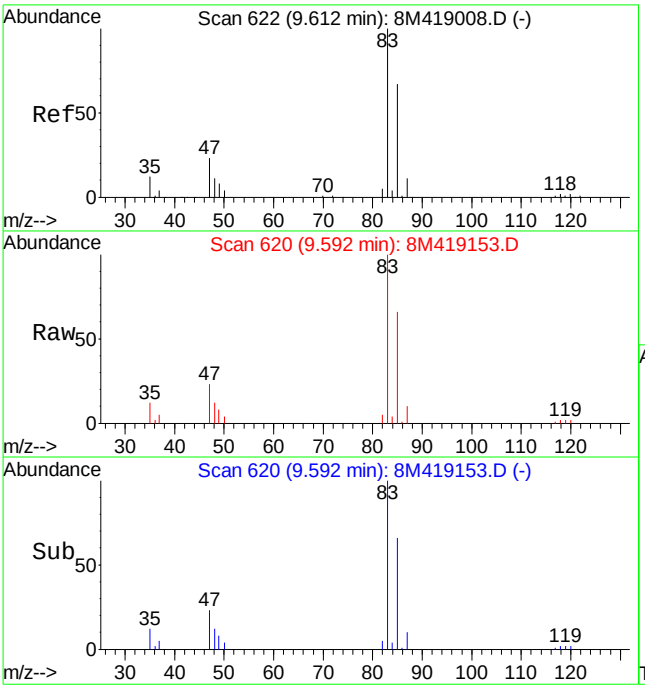


#32
cis-1,2-Dichloroethene
Concen: 0.56 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 96 Resp: 4689

Ion	Ratio	Lower	Upper
96	100		
61	130.6	80.3	187.3

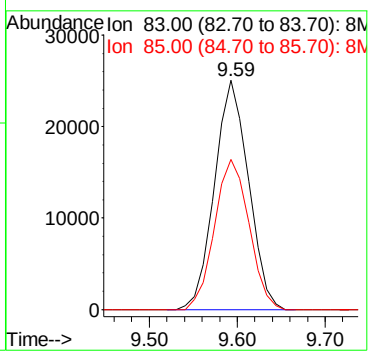


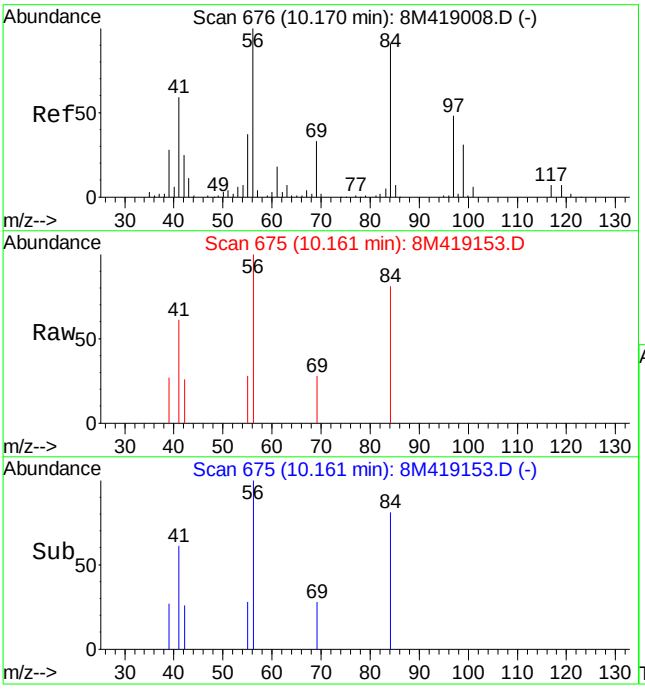


#33
Chloroform
Concen: 4.70 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 83 Resp: 67344

Ion	Ratio	Lower	Upper
83	100		
85	66.4	39.1	91.3

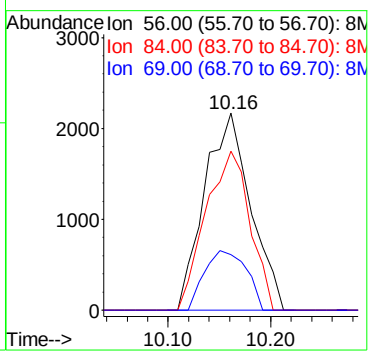


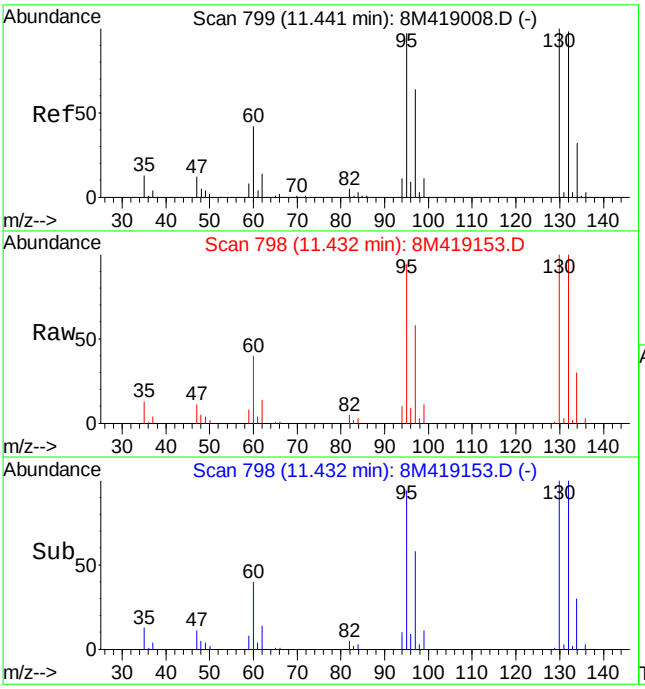


#39
Cyclohexane
Concen: 0.63 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion: 56 Resp: 6761

Ion	Ratio	Lower	Upper
56	100		
84	77.3	61.6	143.8
69	27.6	21.4	50.0

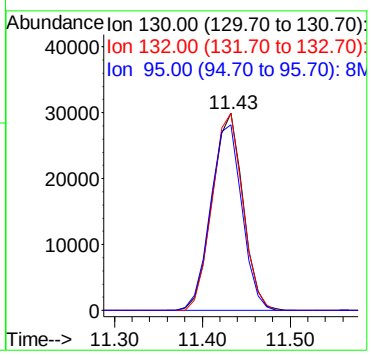


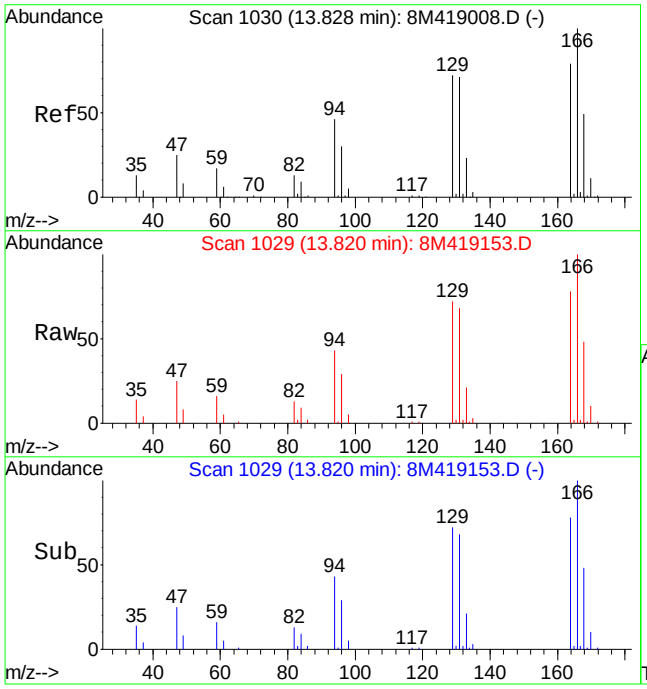


#47
Trichloroethene
Concen: 8.84 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion:130 Resp: 73100

Ion	Ratio	Lower	Upper
130	100		
132	98.6	59.4	138.6
95	95.6	60.1	140.3

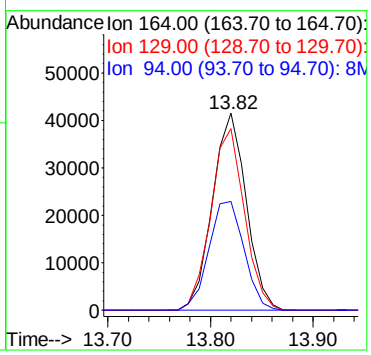




#66
Tetrachloroethene
Concen: 14.26 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419153.D
Acq: 25 Apr 2017 19:45

Tgt Ion:164 Resp: 95207

Ion	Ratio	Lower	Upper
164	100		
129	91.4	53.4	124.6
94	57.6	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419154.D Vial: 19
Acq On : 25 Apr 2017 20:14 Operator: TMB
Sample : L17041075-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 20:36:51 2017 Quant Results File: 8260WT.RES

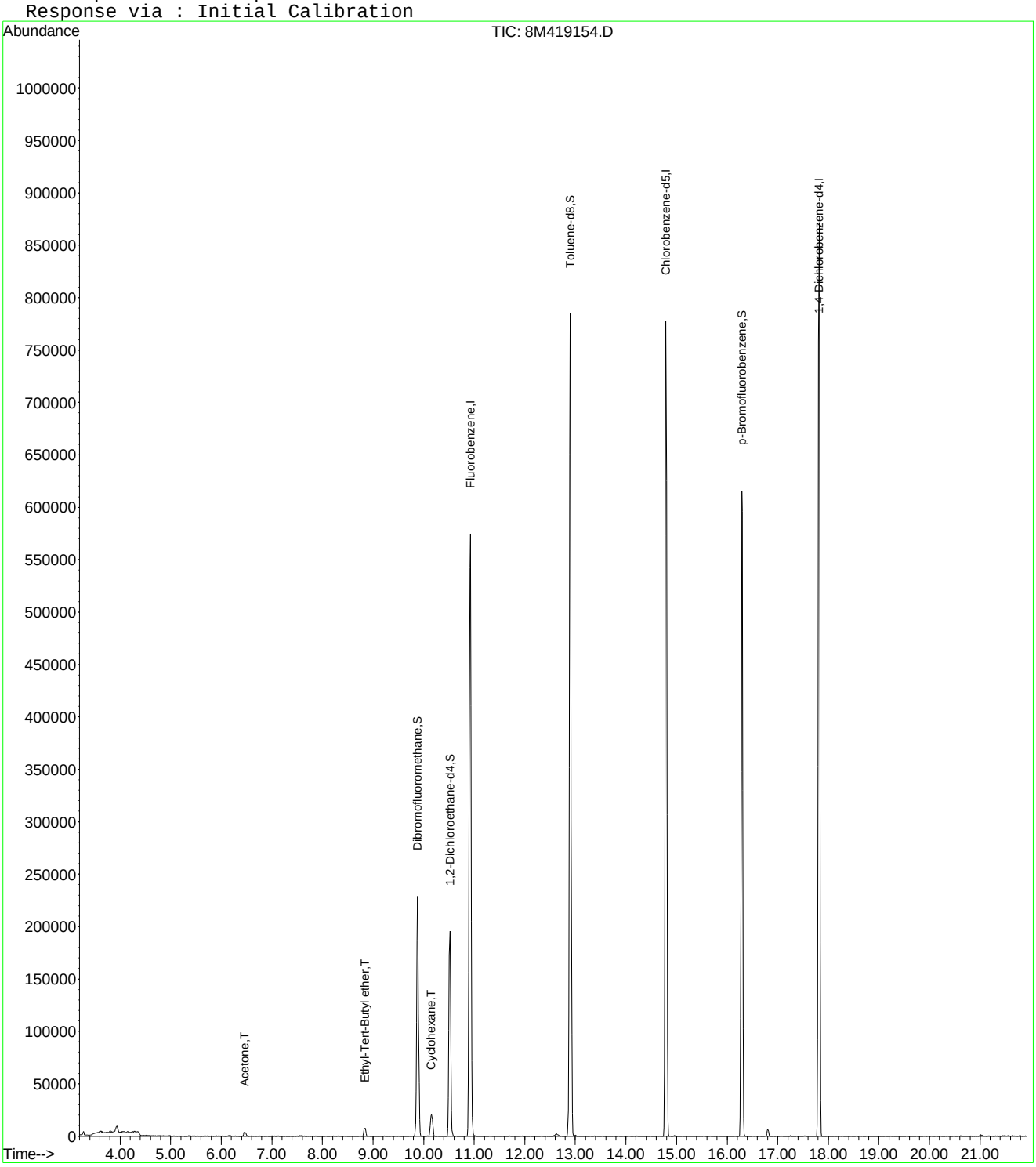
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

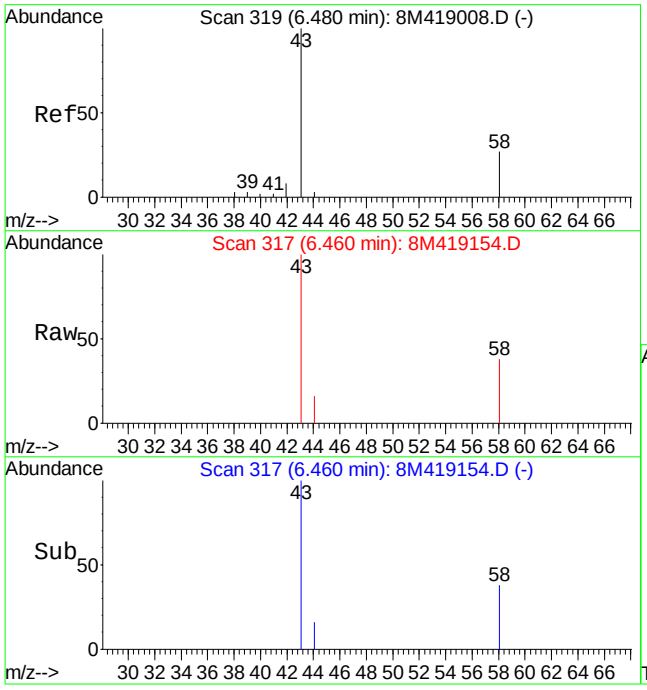
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	714358	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	578475	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	291138	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	189954	25.3517	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.40%			
43) 1,2-Dichloroethane-d4	10.52	65	167219	25.8152	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.28%			
58) Toluene-d8	12.90	98	698730	26.4354	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.76%			
80) p-Bromofluorobenzene	16.29	95	271908	26.4627	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.84%			
Target Compounds						Qvalue
13) Acetone	6.46	43	8367	8.3279	ug/L	100
28) Ethyl-Tert-Butyl ether	8.84	59	5369	0.2802	ug/L #	39
39) Cyclohexane	10.15	56	16325	1.5137	ug/L	88

(#) = qualifier out of range (m) = manual integration
8M419154.D 8260WT.M Wed Apr 26 07:14:09 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419154.D Vial: 19
Acq On : 25 Apr 2017 20:14 Operator: TMB
Sample : L17041075-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 20:36 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

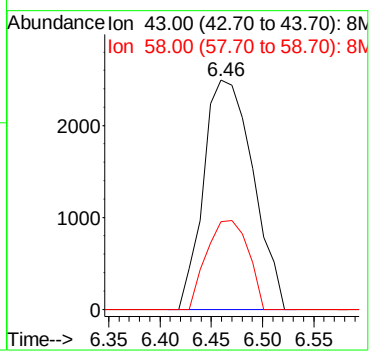


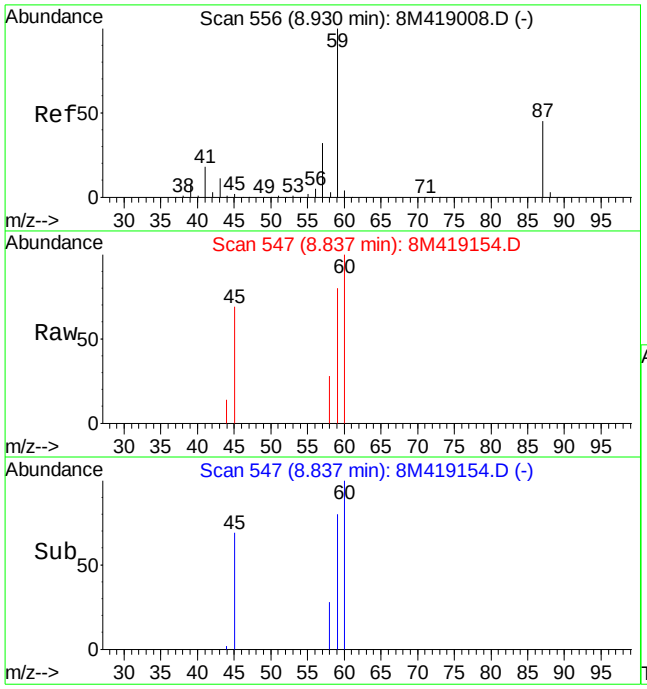


#13
Acetone
Concen: 8.33 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419154.D
Acq: 25 Apr 2017 20:14

Tgt Ion: 43 Resp: 8367

Ion	Ratio	Lower	Upper
43	100		
58	32.6	19.4	45.4

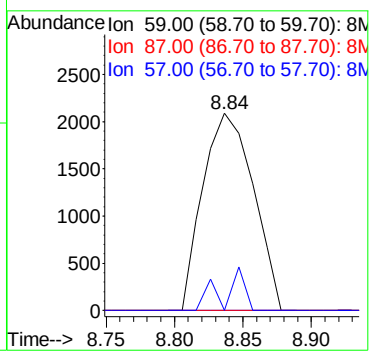


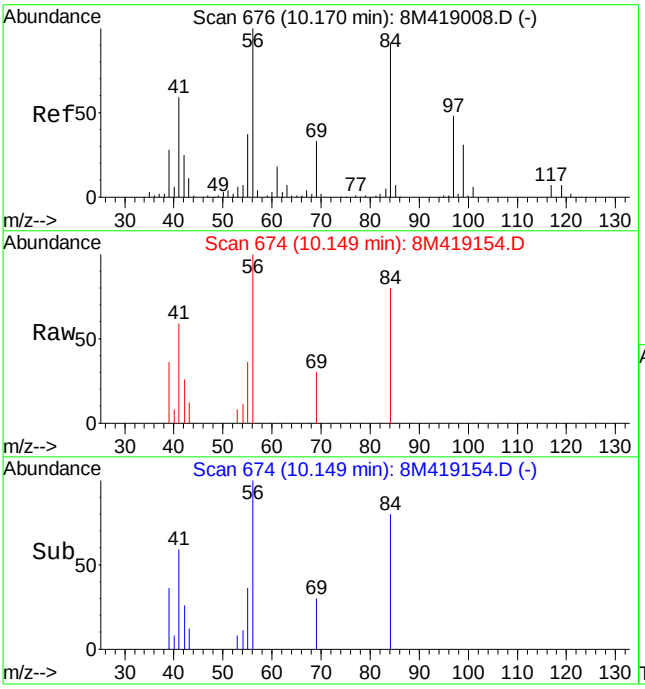


#28
Ethyl-Tert-Butyl ether
Concen: 0.28 ug/L
RT: 8.84 min Scan# 547
Delta R.T. -0.09 min
Lab File: 8M419154.D
Acq: 25 Apr 2017 20:14

Tgt Ion: 59 Resp: 5369

Ion	Ratio	Lower	Upper
59	100		
87	0.0	27.5	64.1#
57	3.9	18.2	42.4#

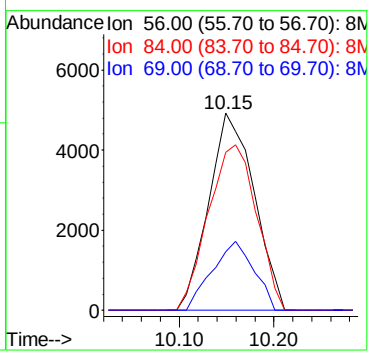




#39
Cyclohexane
Concen: 1.51 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419154.D
Acq: 25 Apr 2017 20:14

Tgt Ion: 56 Resp: 16325

Ion	Ratio	Lower	Upper
56	100		
84	88.9	61.6	143.8
69	32.2	21.4	50.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419155.D Vial: 20
Acq On : 25 Apr 2017 20:45 Operator: TMB
Sample : L17041075-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 21:07:37 2017 Quant Results File: 8260WT.RES

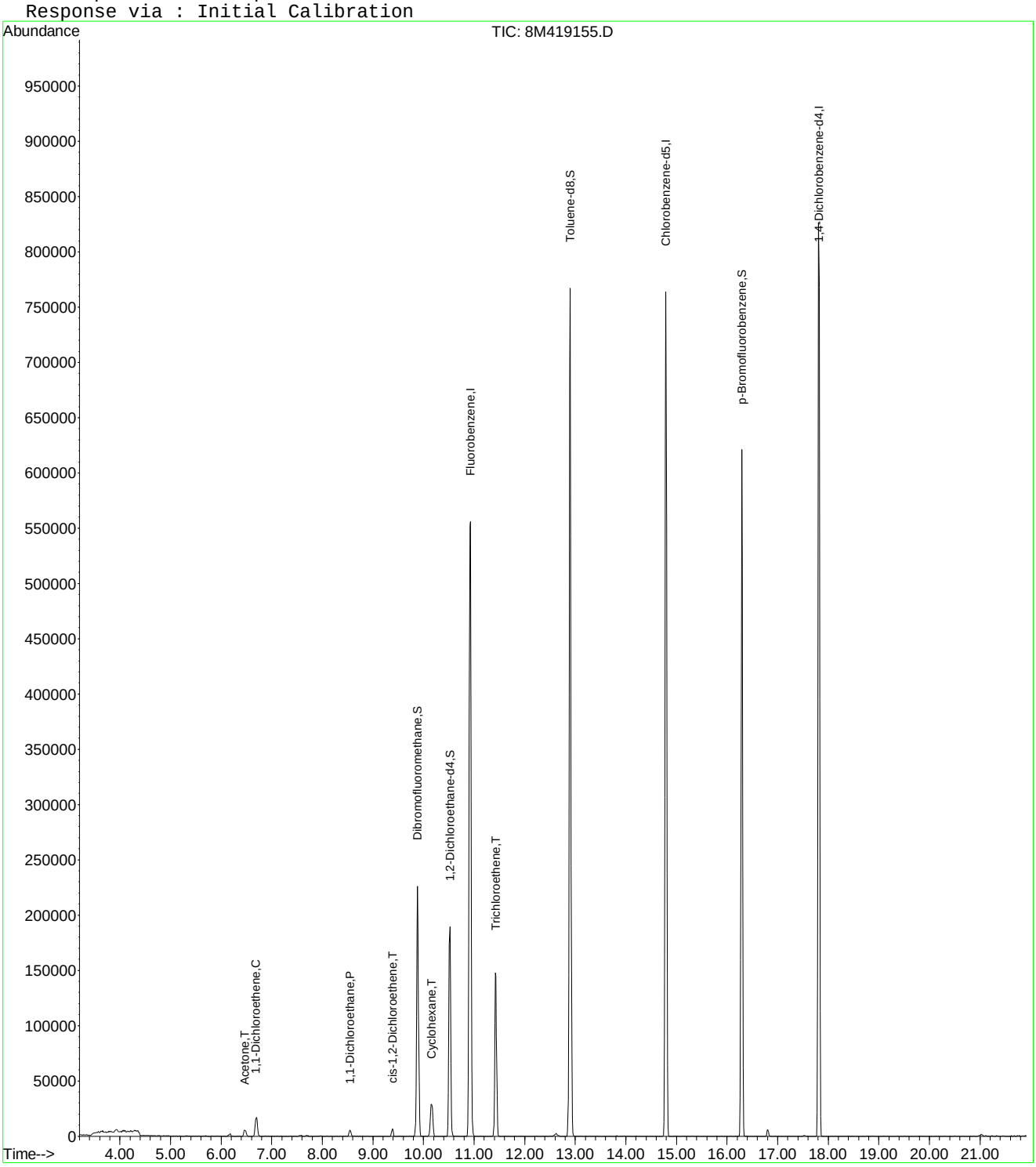
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

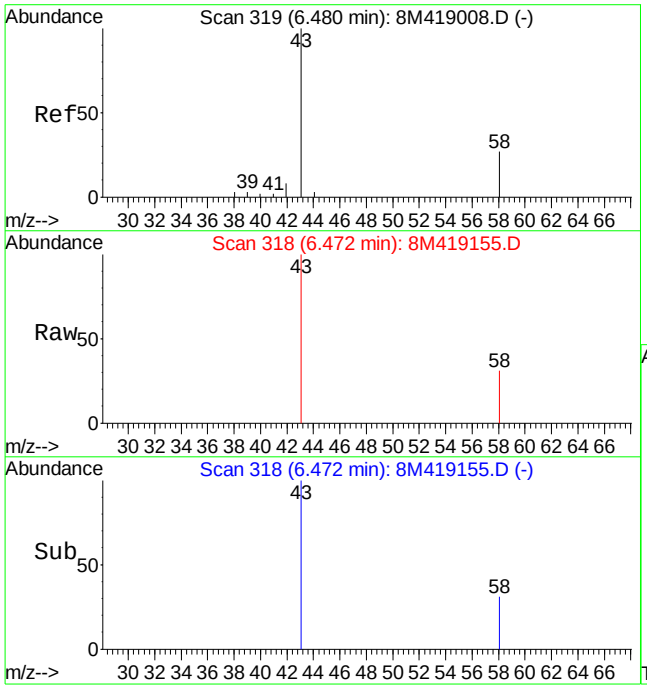
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	708845	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	567320	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	282888	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	186508	25.0853	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.36%			
43) 1,2-Dichloroethane-d4	10.52	65	163654	25.4613	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.84%			
58) Toluene-d8	12.90	98	690451	26.6358	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.56%			
80) p-Bromofluorobenzene	16.29	95	261167	26.1586	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.64%			
Target Compounds						Qvalue
13) Acetone	6.47	43	11960	11.9967	ug/L	96
14) 1,1-Dichloroethene	6.69	61	19759	1.9247	ug/L	93
27) 1,1-Dichloroethane	8.55	63	10187	0.7925	ug/L #	92
32) cis-1,2-Dichloroethene	9.39	96	4302	0.5211	ug/L	96
39) Cyclohexane	10.16	56	23825	2.2263	ug/L	87
47) Trichloroethene	11.43	130	66384	8.0698	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419155.D 8260WT.M Wed Apr 26 07:14:12 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419155.D Vial: 20
Acq On : 25 Apr 2017 20:45 Operator: TMB
Sample : L17041075-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 21:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

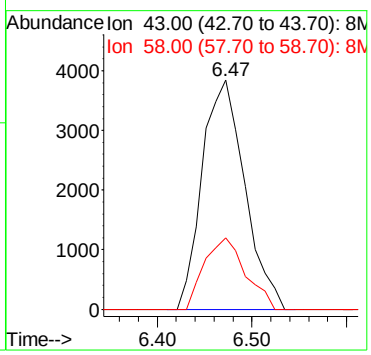


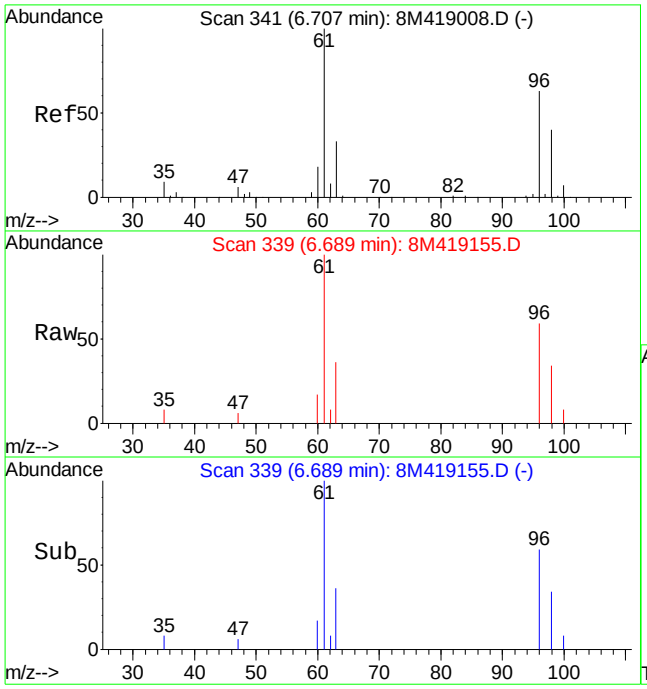


#13
Acetone
Concen: 12.00 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion: 43 Resp: 11960

Ion	Ratio	Lower	Upper
43	100		
58	30.1	19.4	45.4

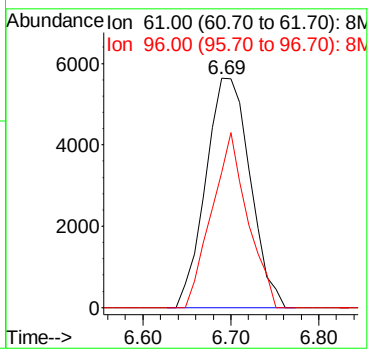


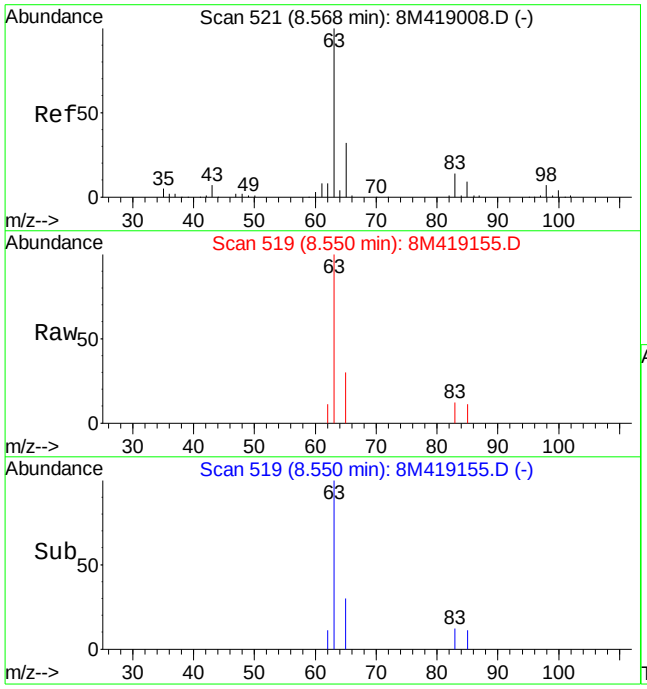


#14
1,1-Dichloroethene
Concen: 1.92 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion: 61 Resp: 19759

Ion	Ratio	Lower	Upper
61	100		
96	61.4	40.0	93.4

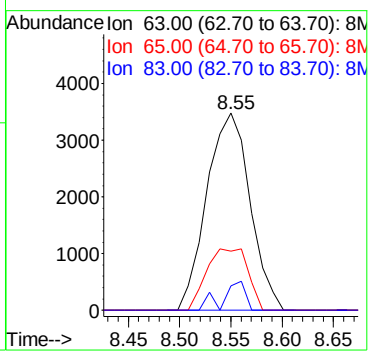


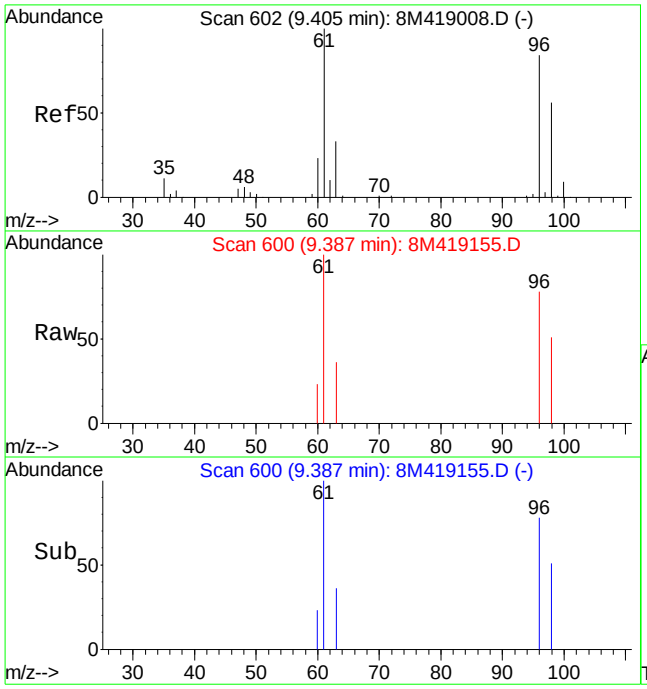


#27
1,1-Dichloroethane
Concen: 0.79 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion: 63 Resp: 10187

Ion	Ratio	Lower	Upper
63	100		
65	29.8	19.1	44.7
83	7.7	9.0	21.0#

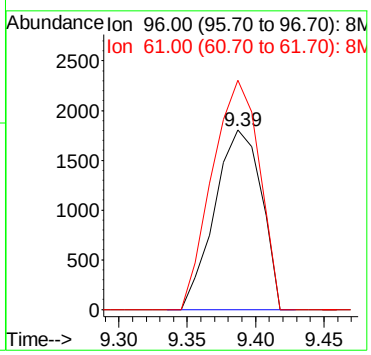


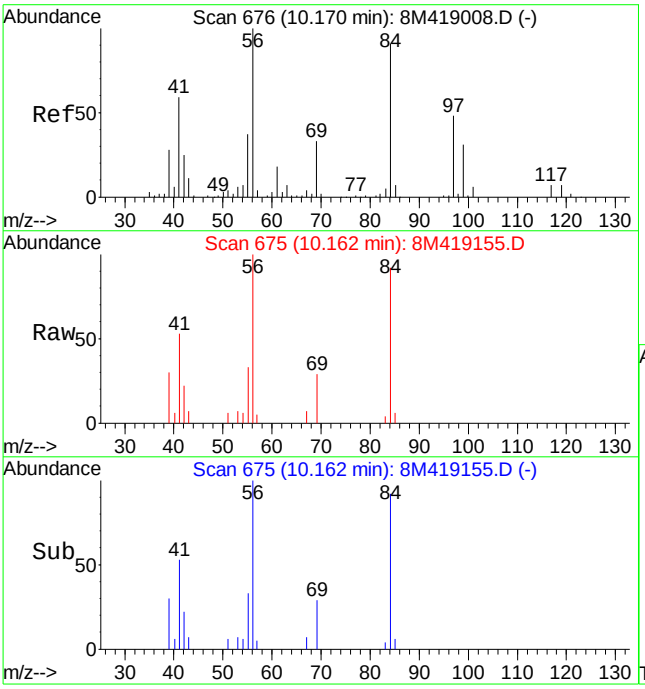


#32
cis-1,2-Dichloroethene
Concen: 0.52 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion: 96 Resp: 4302

Ion	Ratio	Lower	Upper
96	100		
61	128.6	80.3	187.3

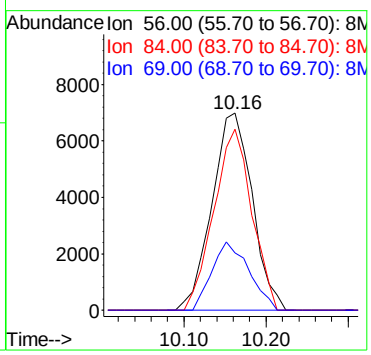


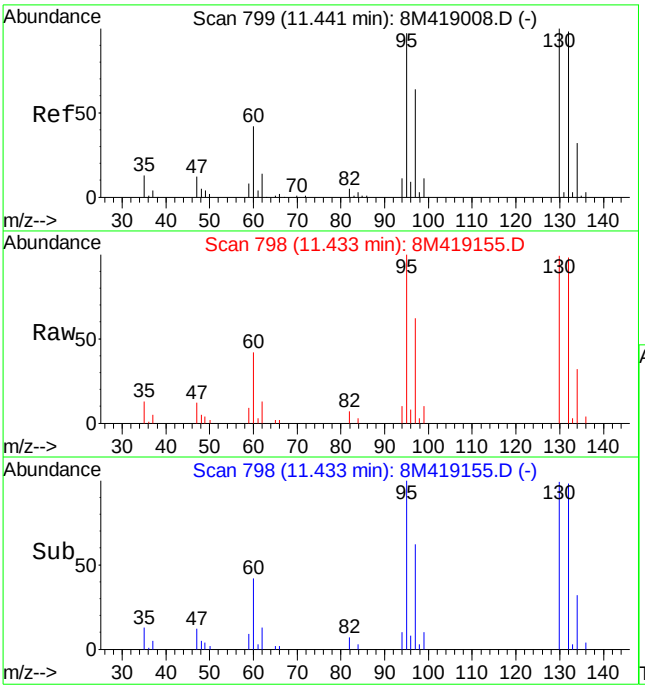


#39
Cyclohexane
Concen: 2.23 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion: 56 Resp: 23825

Ion	Ratio	Lower	Upper
56	100		
84	86.6	61.6	143.8
69	32.0	21.4	50.0

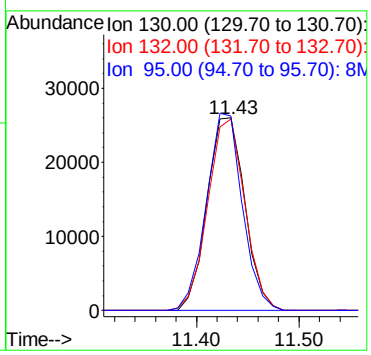




#47
Trichloroethene
Concen: 8.07 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419155.D
Acq: 25 Apr 2017 20:45

Tgt Ion:130 Resp: 66384

Ion	Ratio	Lower	Upper
130	100		
132	97.8	59.4	138.6
95	97.6	60.1	140.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419156.D Vial: 21
Acq On : 25 Apr 2017 21:15 Operator: TMB
Sample : L17041075-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 21:37:46 2017 Quant Results File: 8260WT.RES

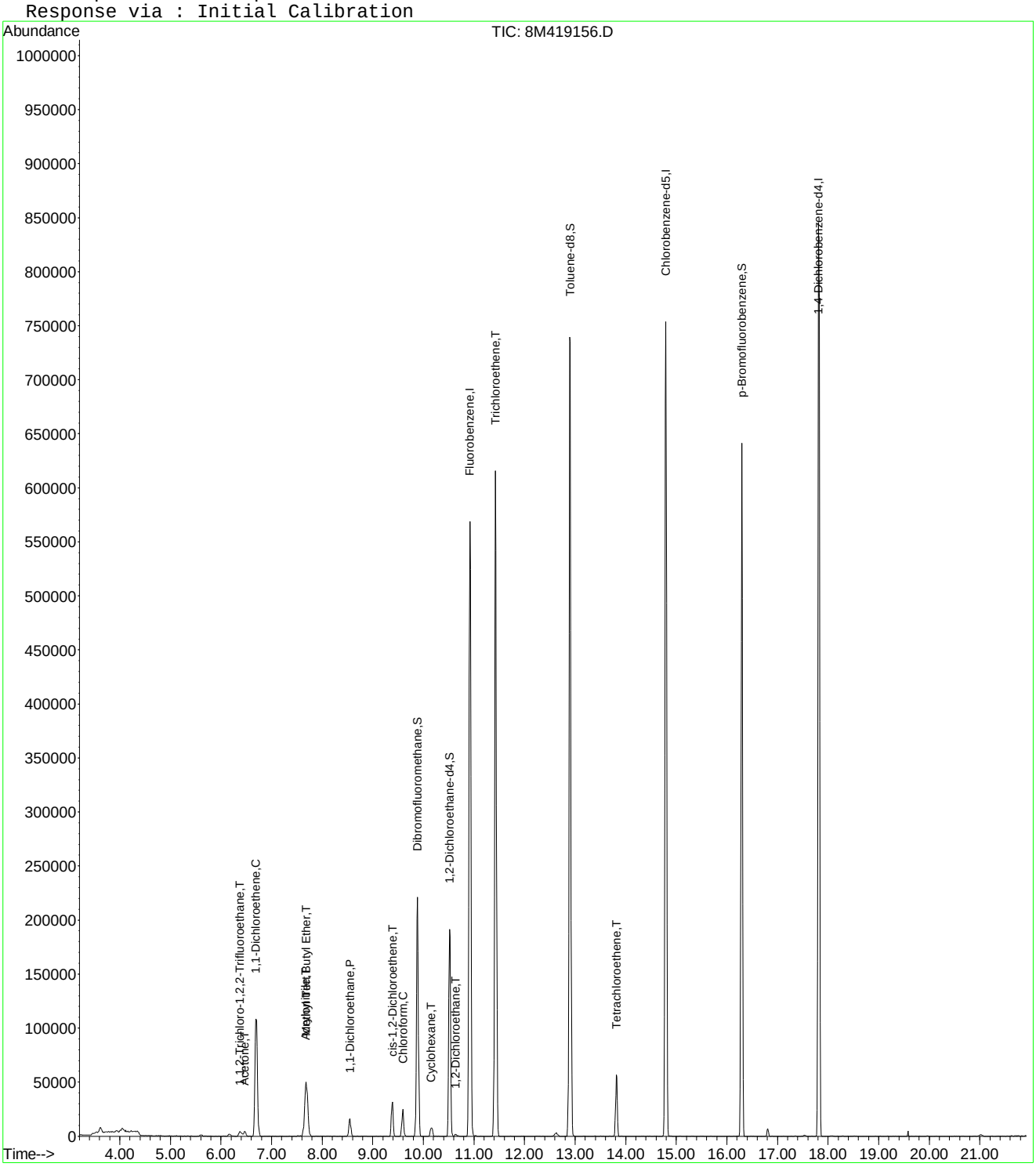
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

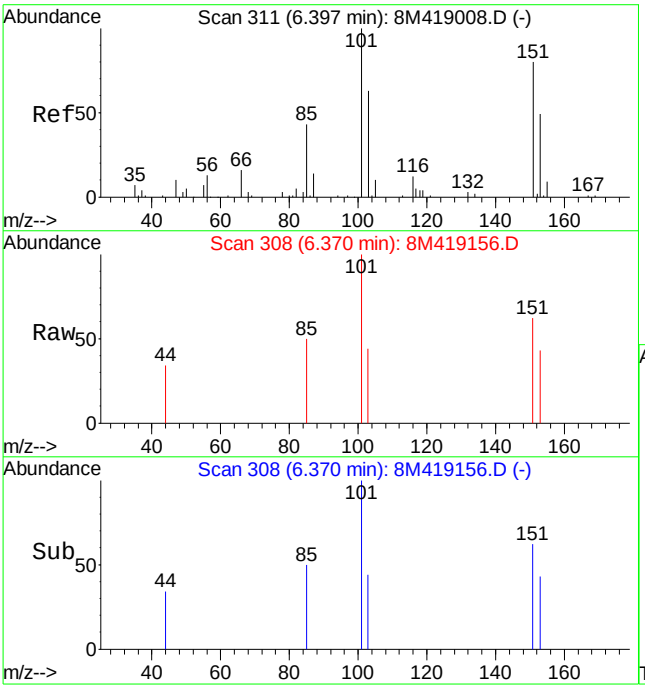
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	707755	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	567001	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	289215	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	187723	25.2876 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%		
43) 1,2-Dichloroethane-d4	10.51	65	166591	25.9582 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.84%		
58) Toluene-d8	12.90	98	690887	26.6677 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.68%		
80) p-Bromofluorobenzene	16.29	95	266448	26.1037 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.40%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.37	101	5312	0.7584 ug/L	95
13) Acetone	6.46	43	8389	8.4277 ug/L	96
14) 1,1-Dichloroethene	6.69	61	119710	11.6789 ug/L	96
21) Acrylonitrile	7.67	53	213	0.1543 ug/L #	10
22) Methyl Tert Butyl Ether	7.68	73	109688	7.5576 ug/L	96
27) 1,1-Dichloroethane	8.55	63	25493	1.9863 ug/L	95
32) cis-1,2-Dichloroethene	9.39	96	19755	2.3967 ug/L	89
33) Chloroform	9.59	83	25899	1.8212 ug/L	99
39) Cyclohexane	10.15	56	6908	0.6465 ug/L	85
45) 1,2-Dichloroethane	10.64	62	2456	0.3054 ug/L #	83
47) Trichloroethene	11.42	130	265007	32.2646 ug/L	97
66) Tetrachloroethene	13.81	164	18167	2.7403 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419156.D 8260WT.M Wed Apr 26 07:14:16 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419156.D Vial: 21
Acq On : 25 Apr 2017 21:15 Operator: TMB
Sample : L17041075-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 21:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

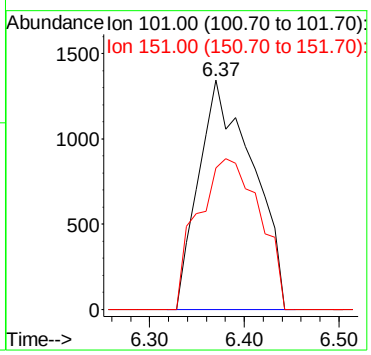


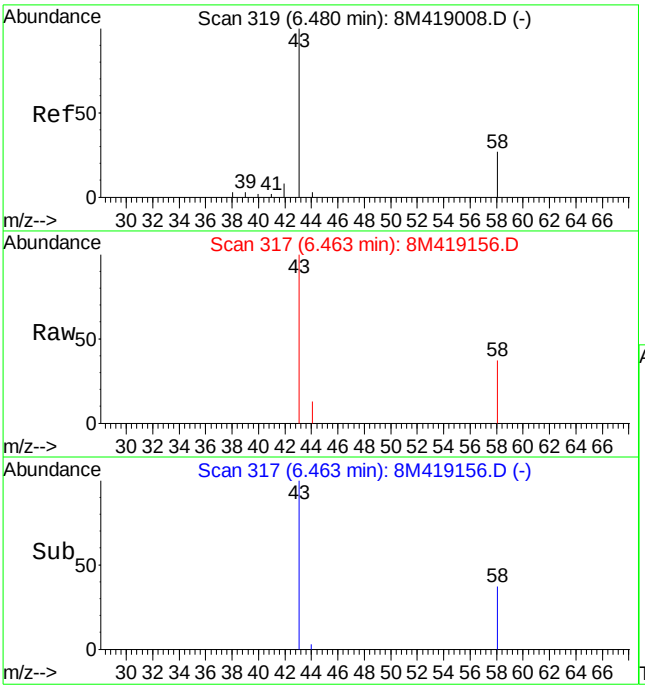


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.76 ug/L
RT: 6.37 min Scan# 308
Delta R.T. -0.03 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion:101 Resp: 5312

Ion	Ratio	Lower	Upper
101	100		
151	75.3	39.9	119.9

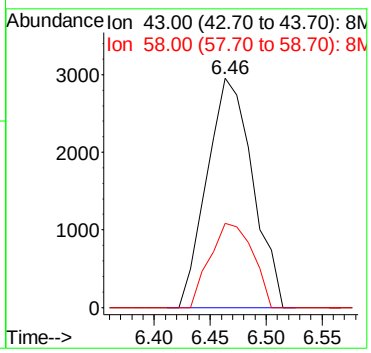


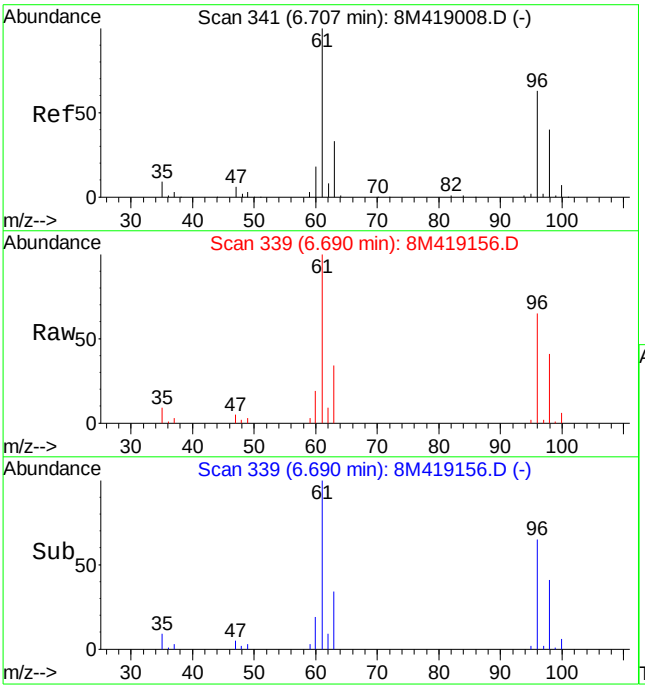


#13
Acetone
Concen: 8.43 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 43 Resp: 8389

Ion	Ratio	Lower	Upper
43	100		
58	34.4	19.4	45.4

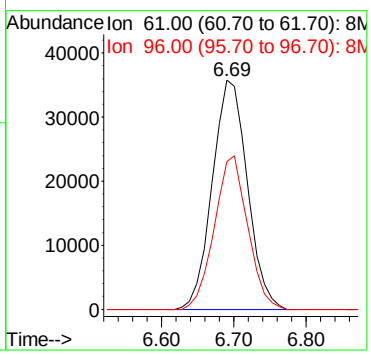


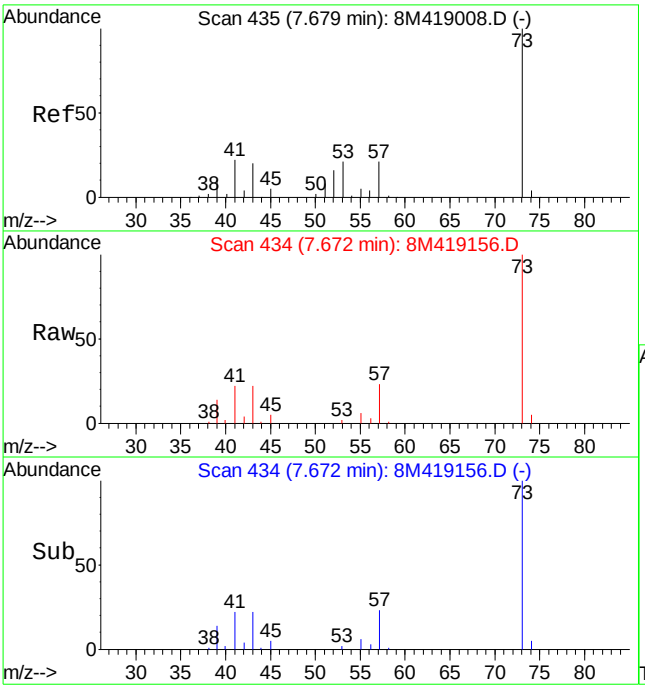


#14
1,1-Dichloroethene
Concen: 11.68 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 61 Resp: 119710

Ion	Ratio	Lower	Upper
61	100		
96	63.5	40.0	93.4

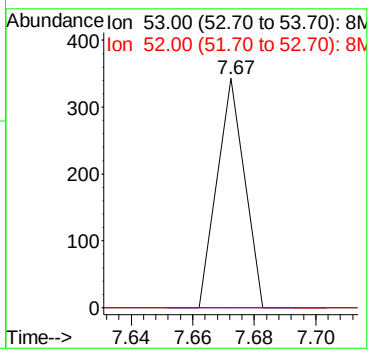


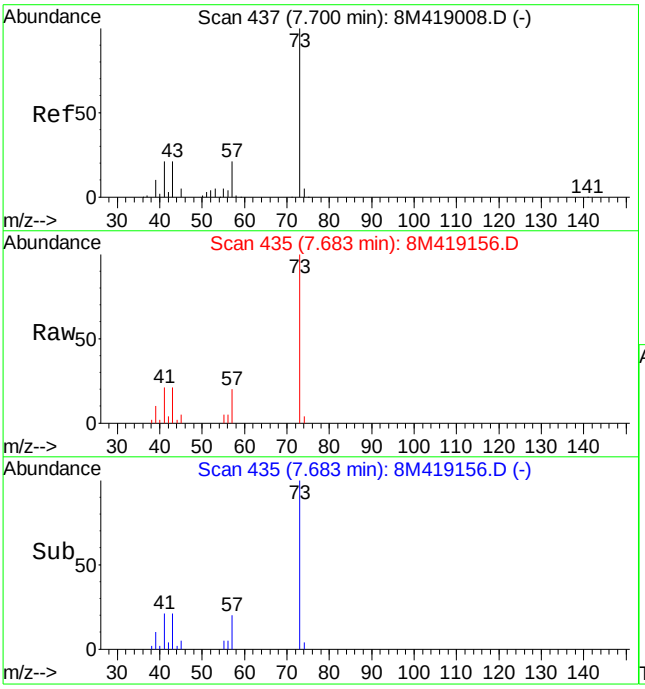


#21
Acrylonitrile
Concen: 0.15 ug/L
RT: 7.67 min Scan# 434
Delta R.T. 0.00 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 53 Resp: 213

Ion	Ratio	Lower	Upper
53	100		
52	0.0	46.8	109.2#

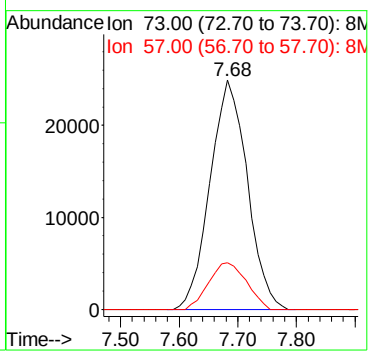


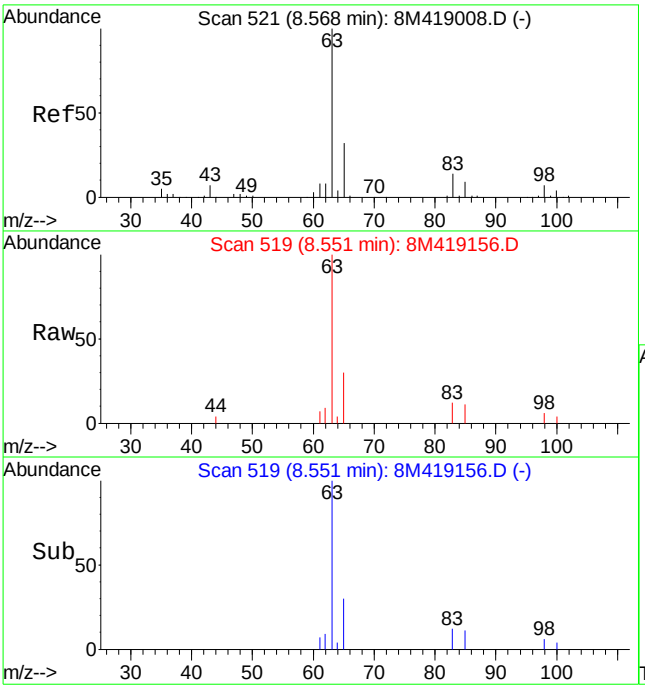


#22
Methyl Tert Butyl Ether
Concen: 7.56 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 73 Resp: 109688

Ion	Ratio	Lower	Upper
73	100		
57	20.6	11.4	26.6

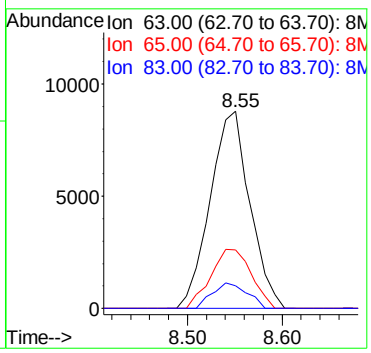


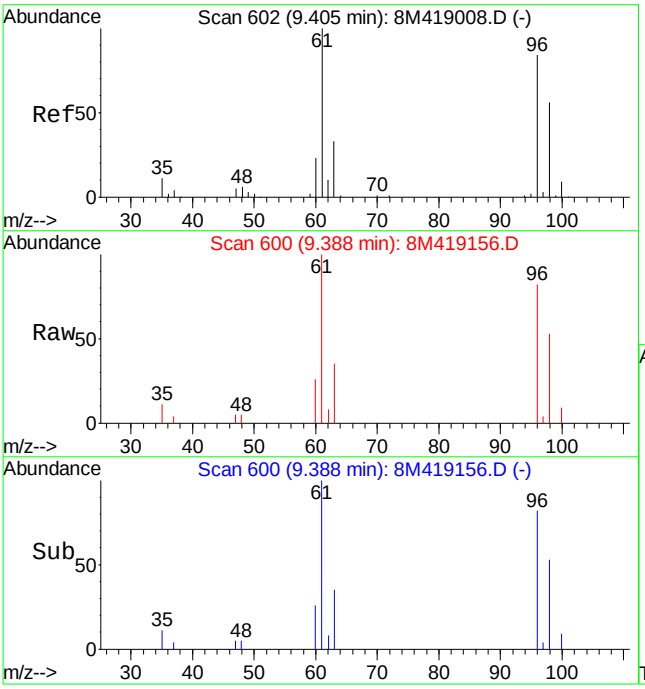


#27
1,1-Dichloroethane
Concen: 1.99 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 63 Resp: 25493

Ion	Ratio	Lower	Upper
63	100		
65	30.5	19.1	44.7
83	11.3	9.0	21.0

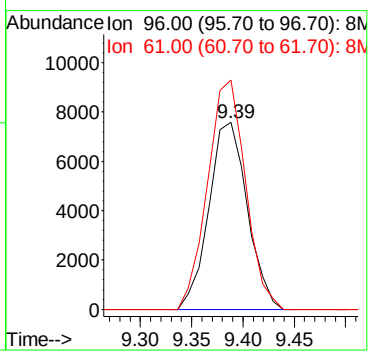


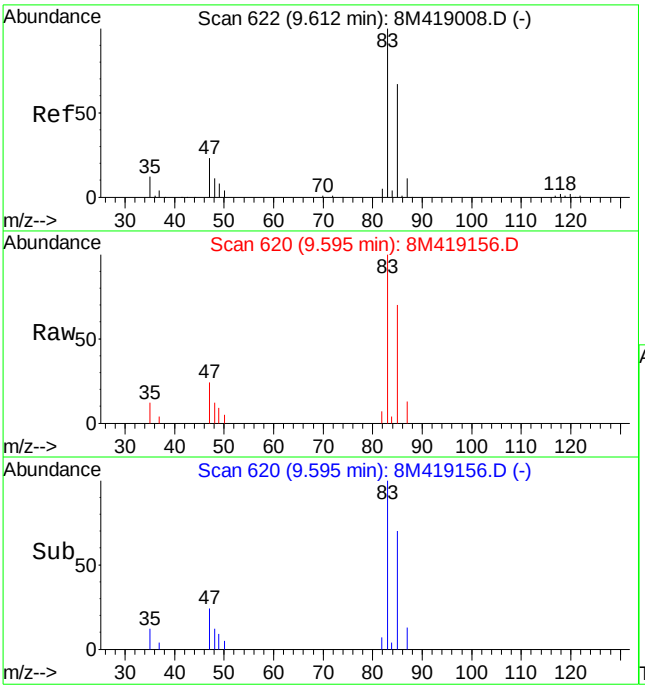


#32
cis-1,2-Dichloroethene
Concen: 2.40 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 96 Resp: 19755

Ion	Ratio	Lower	Upper
96	100		
61	121.2	80.3	187.3

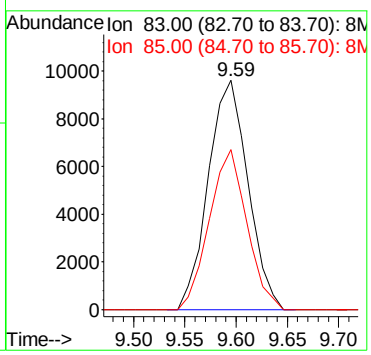


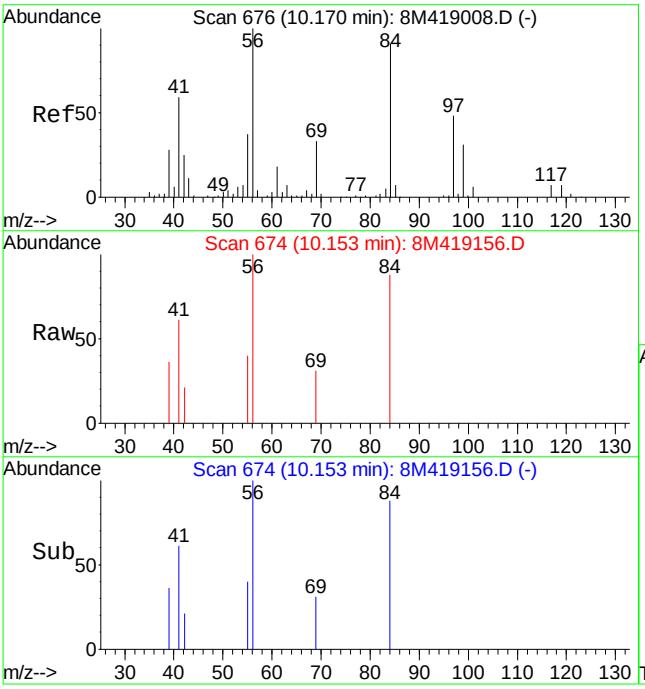


#33
Chloroform
Concen: 1.82 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 83 Resp: 25899

Ion	Ratio	Lower	Upper
83	100		
85	65.9	39.1	91.3

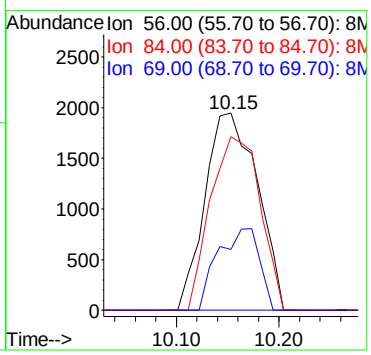


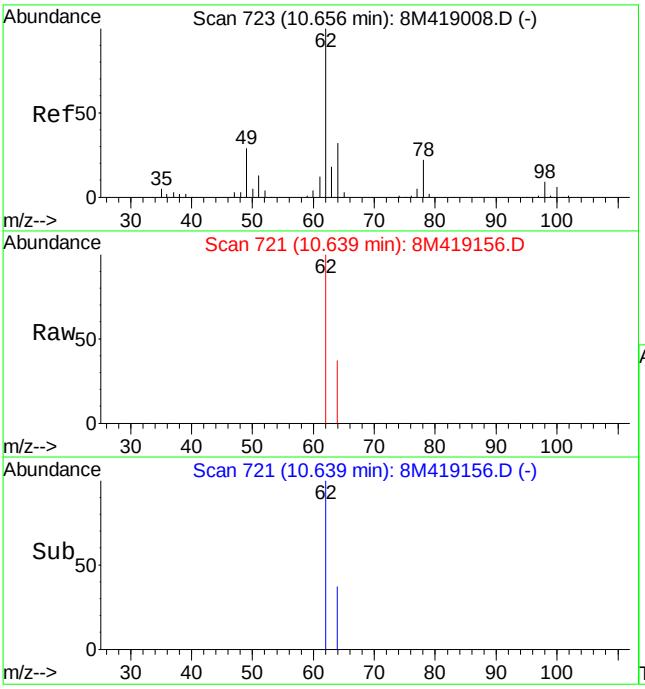


#39
Cyclohexane
Concen: 0.65 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 56 Resp: 6908

Ion	Ratio	Lower	Upper
56	100		
84	83.4	61.6	143.8
69	32.8	21.4	50.0

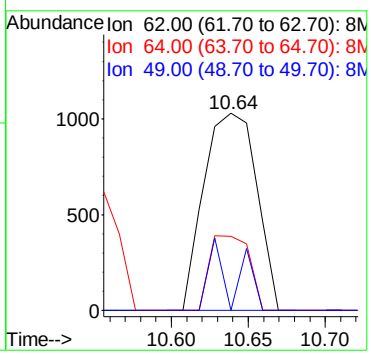


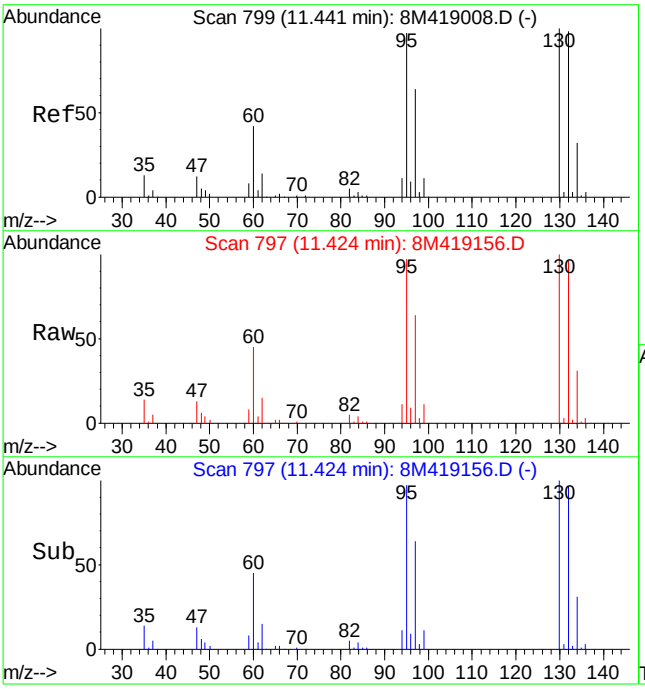


#45
1,2-Dichloroethane
Concen: 0.31 ug/L
RT: 10.64 min Scan# 721
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion: 62 Resp: 2456

Ion	Ratio	Lower	Upper
62	100		
64	28.4	19.6	45.8
49	17.7	19.4	45.4#

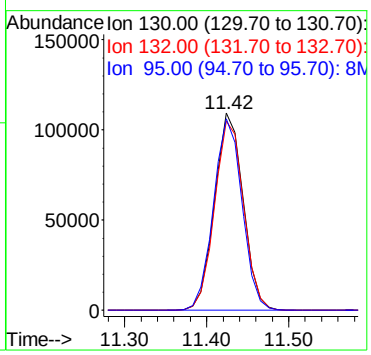


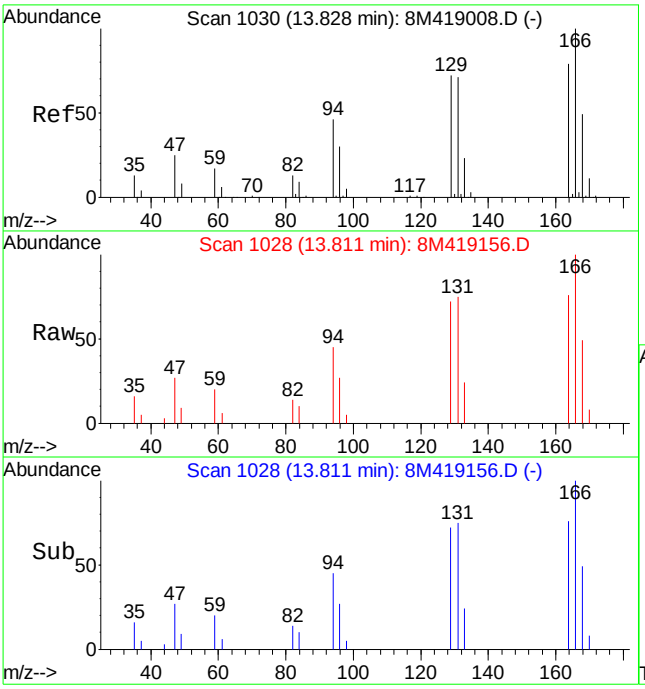


#47
Trichloroethene
Concen: 32.26 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion:130 Resp: 265007

Ion	Ratio	Lower	Upper
130	100		
132	97.0	59.4	138.6
95	97.1	60.1	140.3

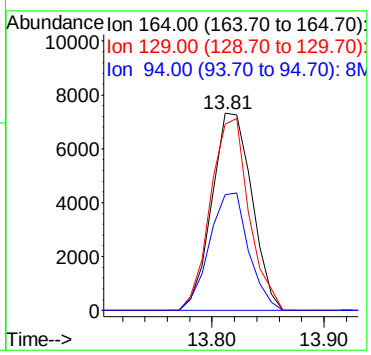




#66
Tetrachloroethene
Concen: 2.74 ug/L
RT: 13.81 min Scan# 1028
Delta R.T. -0.02 min
Lab File: 8M419156.D
Acq: 25 Apr 2017 21:15

Tgt Ion:164 Resp: 18167

Ion	Ratio	Lower	Upper
164	100		
129	93.8	53.4	124.6
94	58.6	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419157.D Vial: 22
Acq On : 25 Apr 2017 21:46 Operator: TMB
Sample : L17041075-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 22:08:00 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

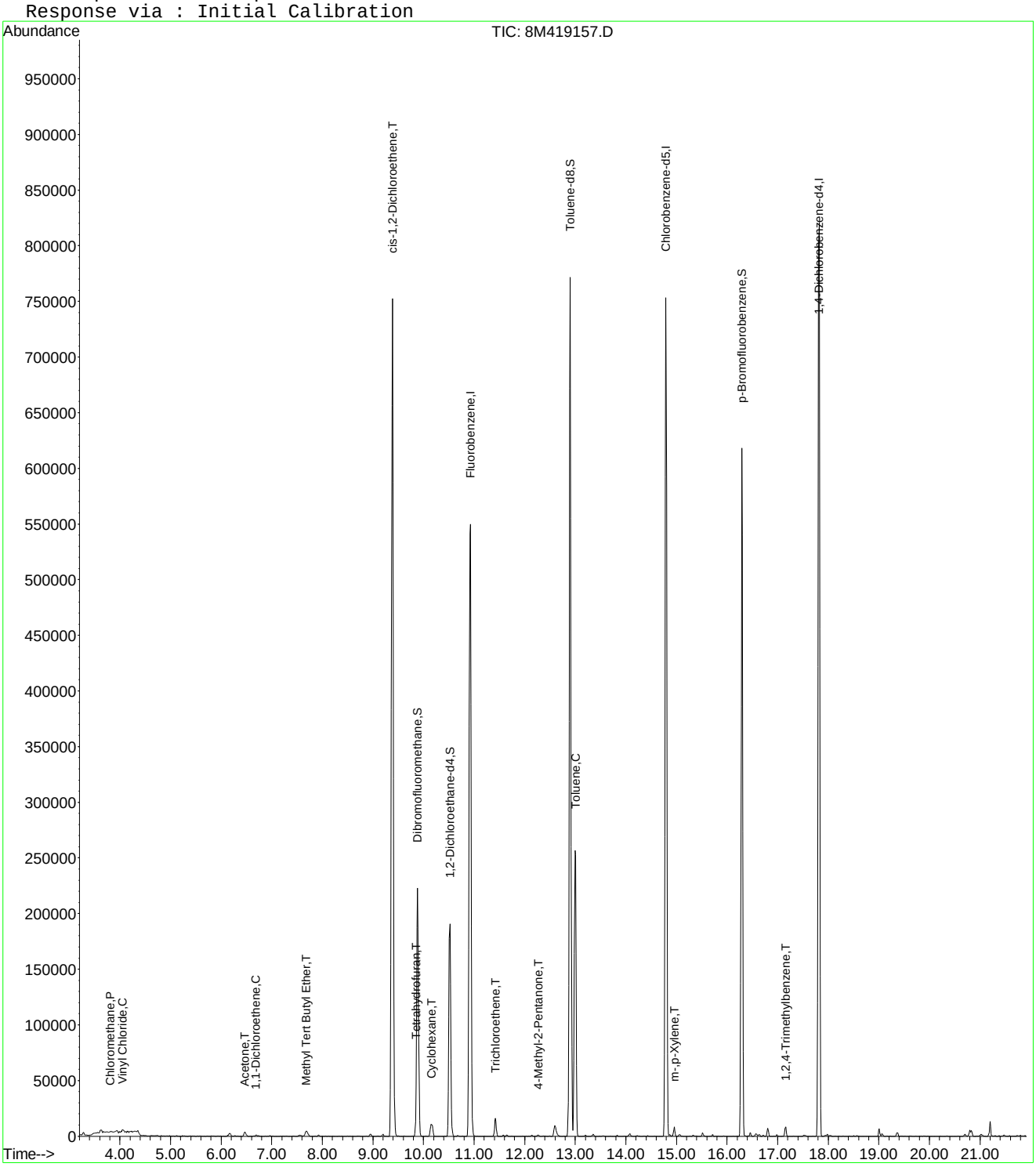
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	703433	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	558666	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	285990	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	187764	25.4486	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.80%			
43) 1,2-Dichloroethane-d4	10.52	65	165315	25.9176	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.68%			
58) Toluene-d8	12.90	98	684807	26.8273	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.32%			
80) p-Bromofluorobenzene	16.29	95	265190	26.2735	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.08%			
Target Compounds						Qvalue
3) Chloromethane	3.80	50	1649	0.1386	ug/L	88
4) Vinyl Chloride	4.05	62	2841	0.2528	ug/L #	68
13) Acetone	6.47	43	7124	7.2008	ug/L	87
14) 1,1-Dichloroethene	6.69	61	1261	0.1238	ug/L #	17
22) Methyl Tert Butyl Ether	7.68	73	10812	0.7495	ug/L	90
32) cis-1,2-Dichloroethene	9.38	96	439249	53.6172	ug/L	91
36) Tetrahydrofuran	9.85	42	219	0.2051	ug/L #	24
39) Cyclohexane	10.16	56	9909	0.9331	ug/L	85
47) Trichloroethene	11.42	130	1514	0.1855	ug/L #	1
54) 4-Methyl-2-Pentanone	12.27	58	221	0.1607	ug/L #	33
59) Toluene	13.00	91	267275	8.5948	ug/L	97
73) m-,p-Xylene	14.96	106	3456	0.2407	ug/L	86
90) 1,2,4-Trimethylbenzene	17.16	105	7890	0.2667	ug/L	88

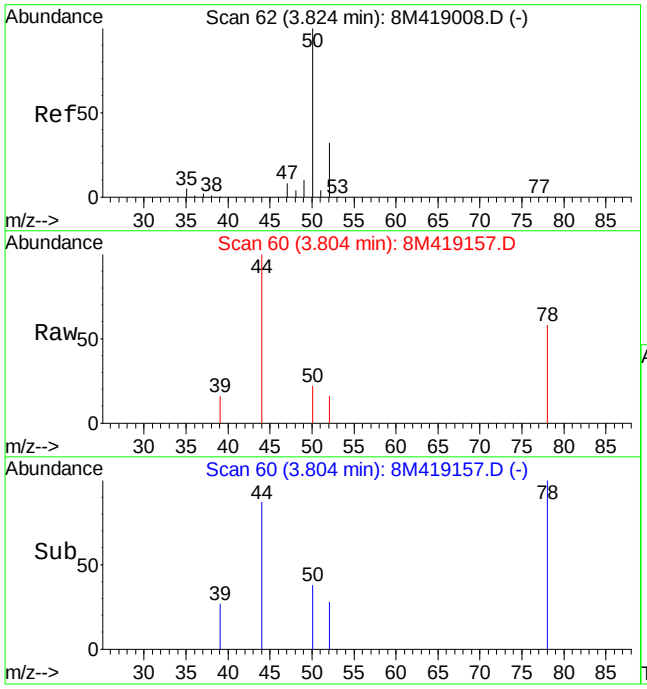
(#) = qualifier out of range (m) = manual integration
8M419157.D 8260WT.M Wed Apr 26 07:14:21 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419157.D Vial: 22
Acq On : 25 Apr 2017 21:46 Operator: TMB
Sample : L17041075-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 22:08 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

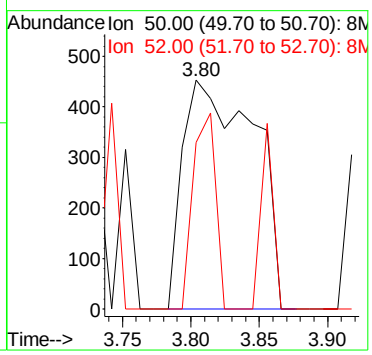


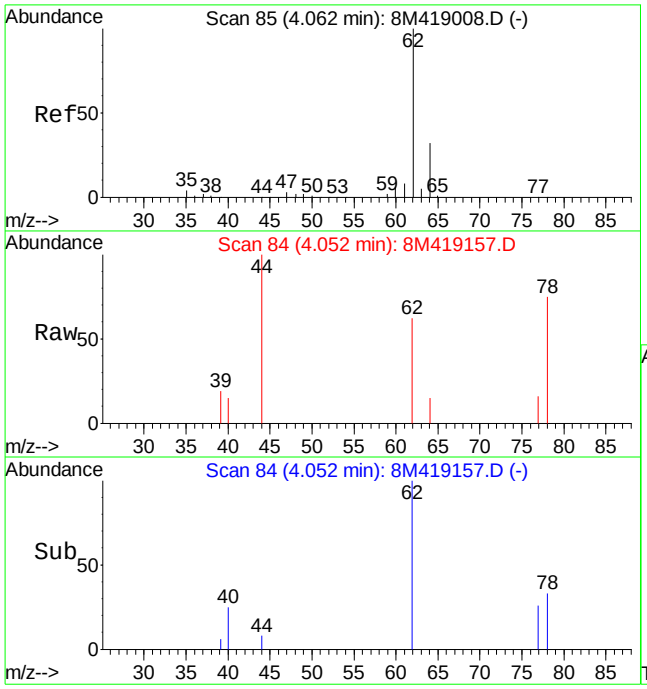


#3
Chloromethane
Concen: 0.14 ug/L
RT: 3.80 min Scan# 60
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 50 Resp: 1649

Ion	Ratio	Lower	Upper
50	100		
52	27.0	20.4	47.6

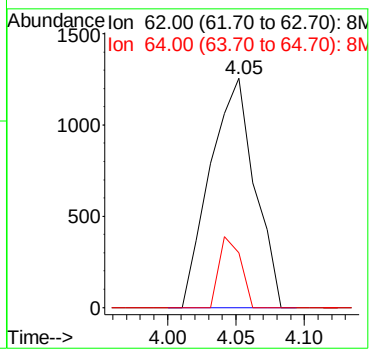


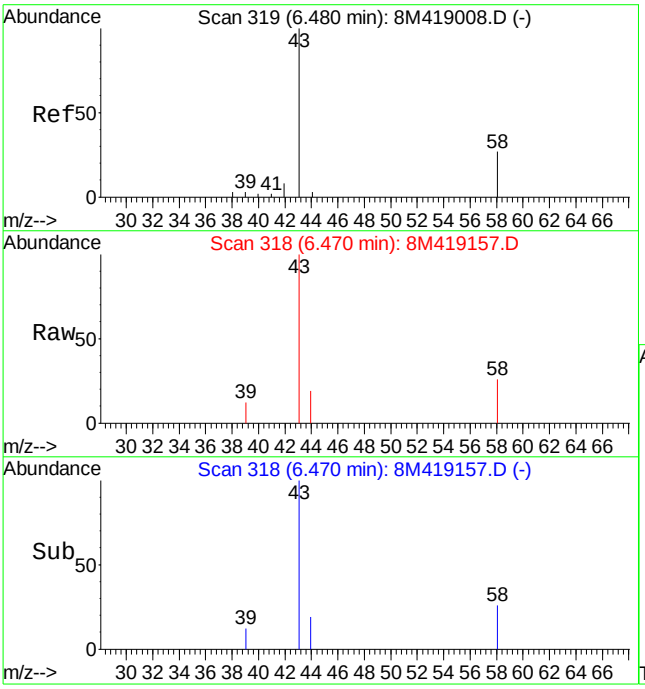


#4
Vinyl Chloride
Concen: 0.25 ug/L
RT: 4.05 min Scan# 84
Delta R.T. -0.00 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 62 Resp: 2841

Ion	Ratio	Lower	Upper
62	100		
64	15.0	19.9	46.3#

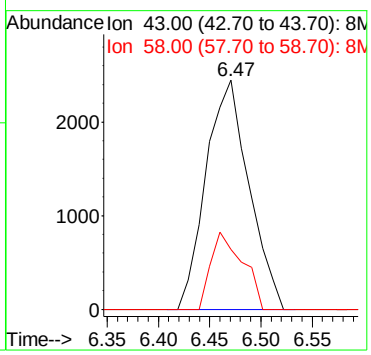


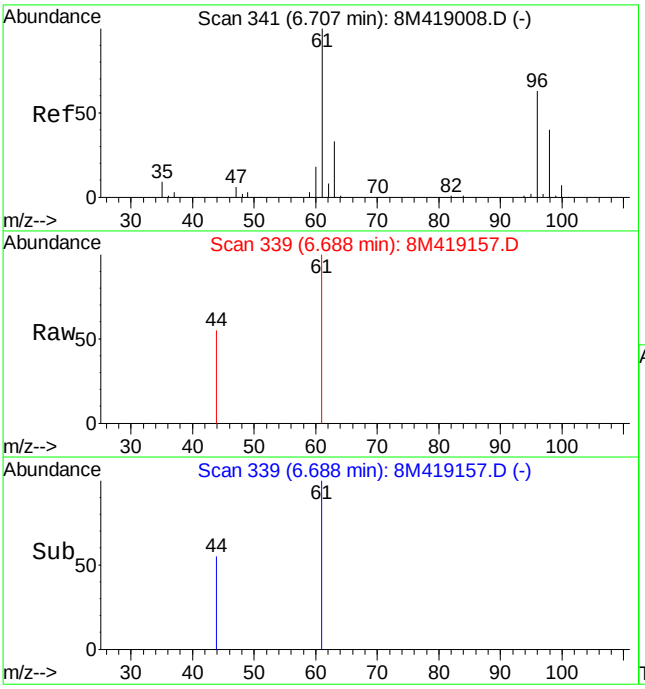


#13
Acetone
Concen: 7.20 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 43 Resp: 7124

Ion	Ratio	Lower	Upper
43	100		
58	25.0	19.4	45.4

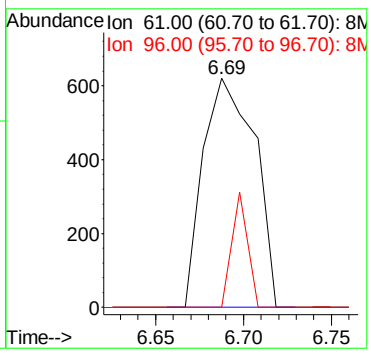


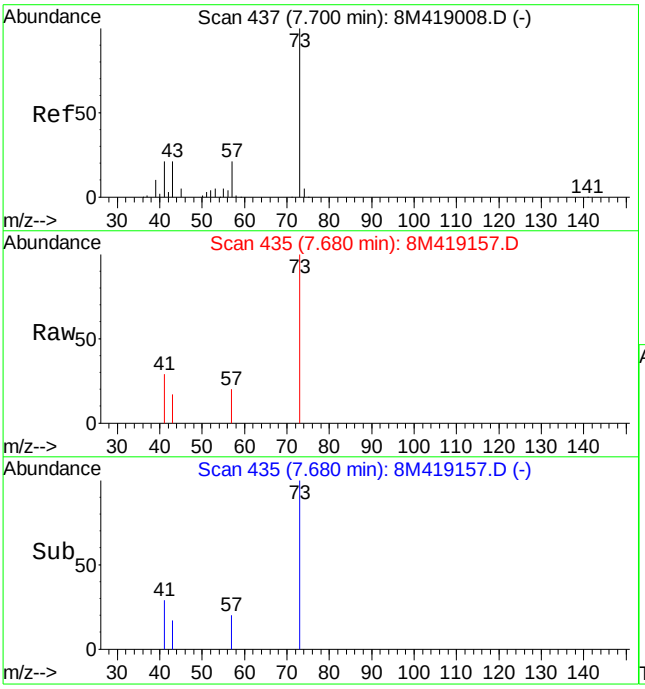


#14
1,1-Dichloroethene
Concen: 0.12 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 61 Resp: 1261

Ion	Ratio	Lower	Upper
61	100		
96	0.0	40.0	93.4#

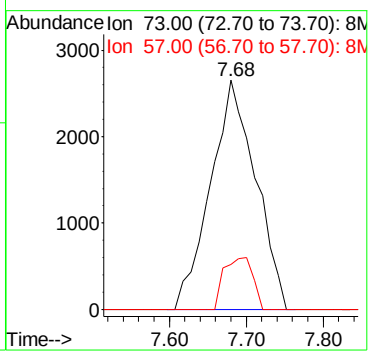


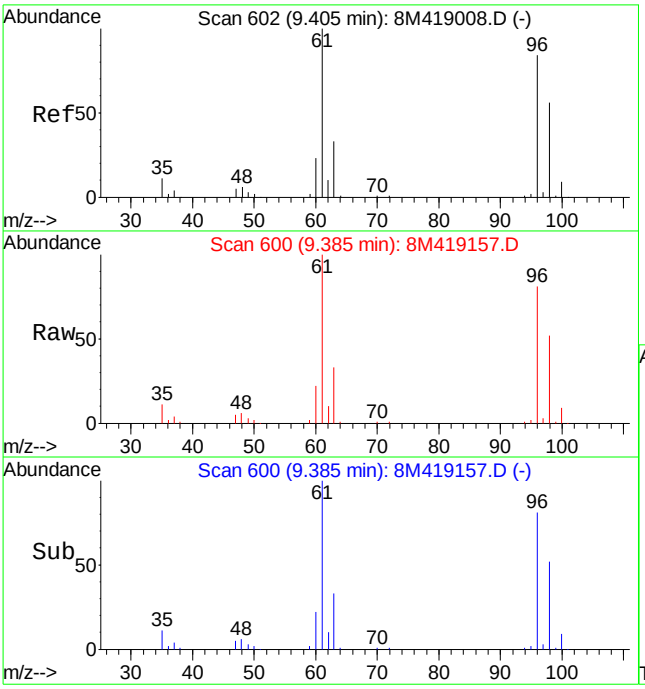


#22
Methyl Tert Butyl Ether
Concen: 0.75 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 73 Resp: 10812

Ion	Ratio	Lower	Upper
73	100		
57	14.4	11.4	26.6

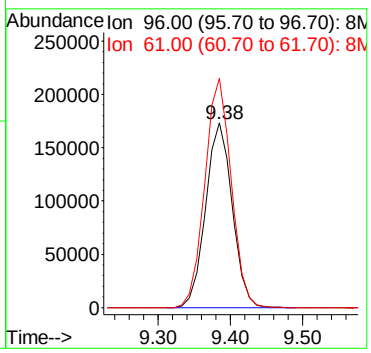


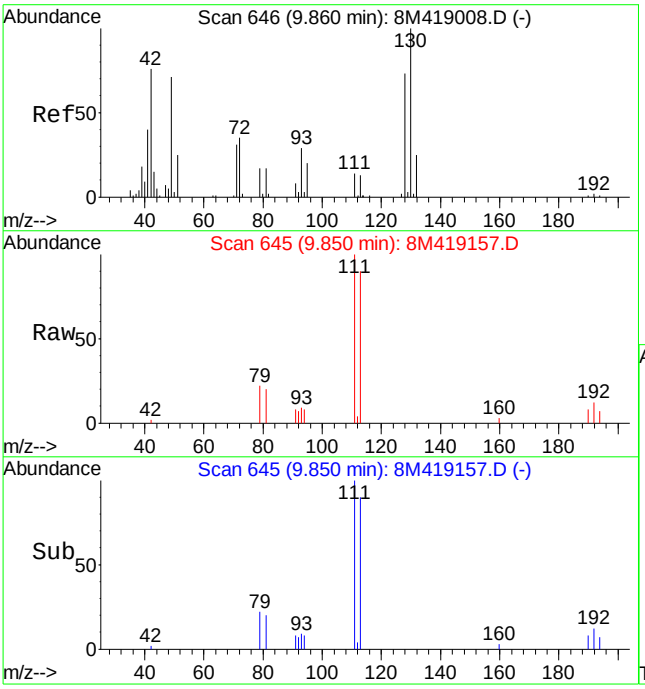


#32
cis-1,2-Dichloroethene
Concen: 53.62 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 96 Resp: 439249

Ion	Ratio	Lower	Upper
96	100		
61	123.5	80.3	187.3

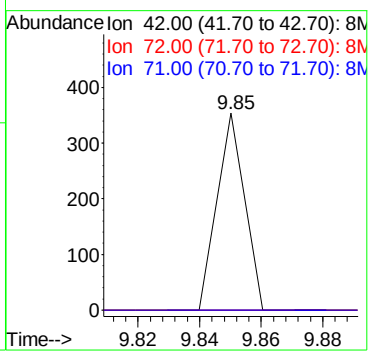


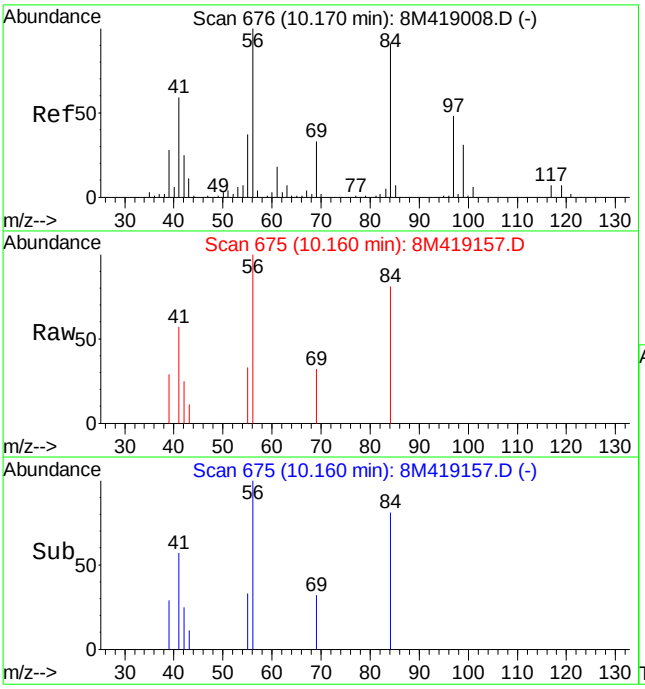


#36
Tetrahydrofuran
Concen: 0.21 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 42 Resp: 219

Ion	Ratio	Lower	Upper
42	100		
72	0.0	32.9	76.9#
71	0.0	32.1	74.9#

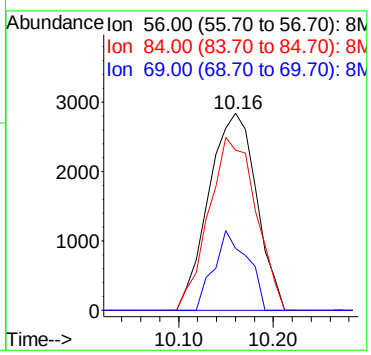


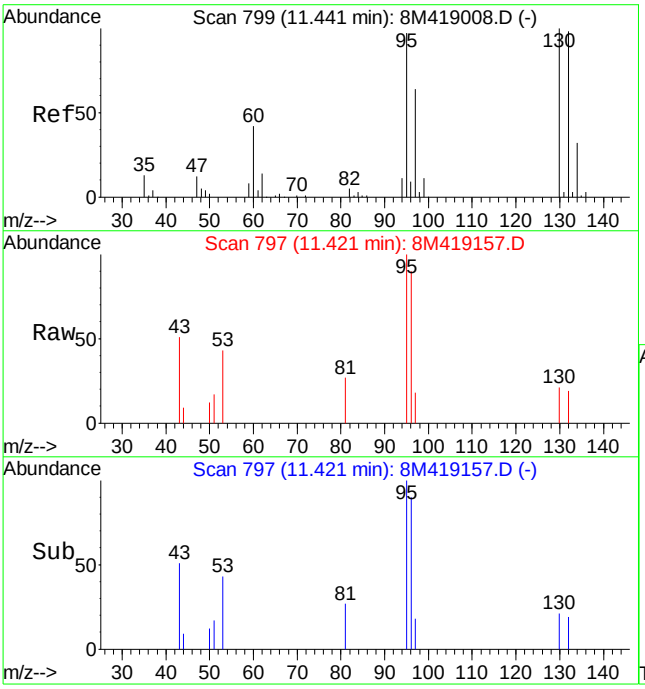


#39
Cyclohexane
Concen: 0.93 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 56 Resp: 9909

Ion	Ratio	Lower	Upper
56	100		
84	86.5	61.6	143.8
69	28.6	21.4	50.0

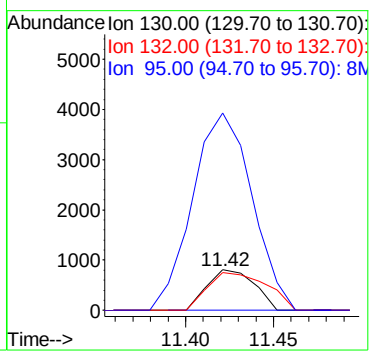


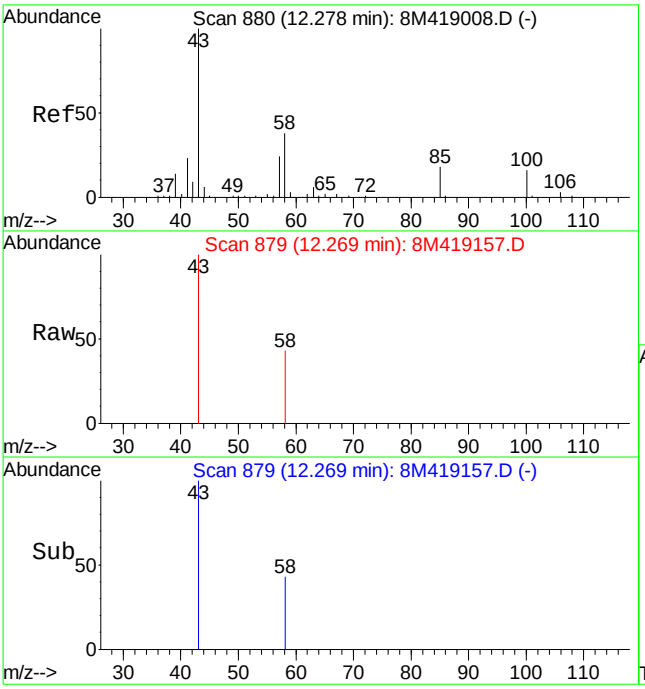


#47
Trichloroethene
Concen: 0.19 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion:130 Resp: 1514

Ion	Ratio	Lower	Upper
130	100		
132	116.5	59.4	138.6
95	611.5	60.1	140.3#

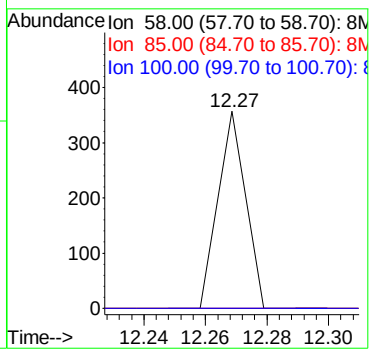


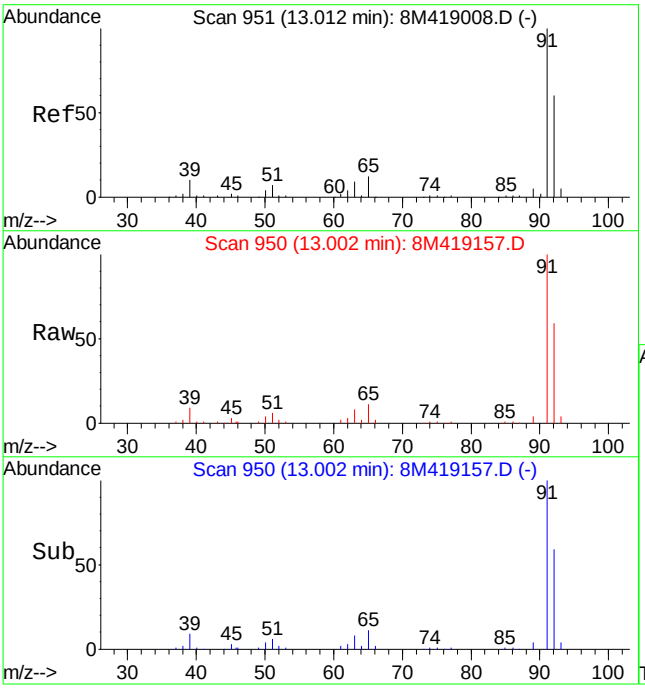


#54
4-Methyl-2-Pentanone
Concen: 0.16 ug/L
RT: 12.27 min Scan# 879
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 58 Resp: 221

Ion	Ratio	Lower	Upper
58	100		
85	0.0	27.7	64.7#
100	0.0	22.8	53.2#

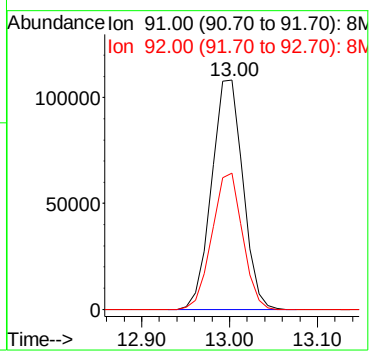


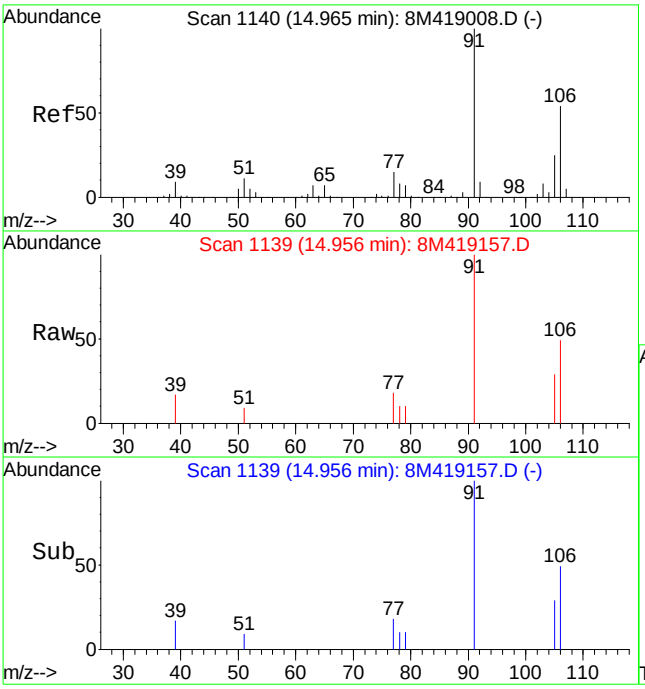


#59
Toluene
Concen: 8.59 ug/L
RT: 13.00 min Scan# 950
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion: 91 Resp: 267275

Ion	Ratio	Lower	Upper
91	100		
92	57.9	35.9	83.7

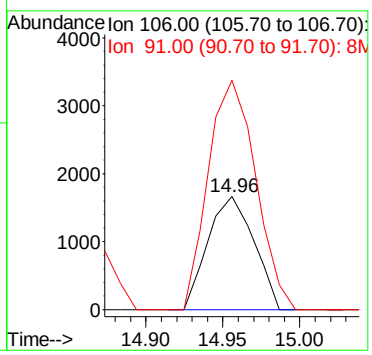


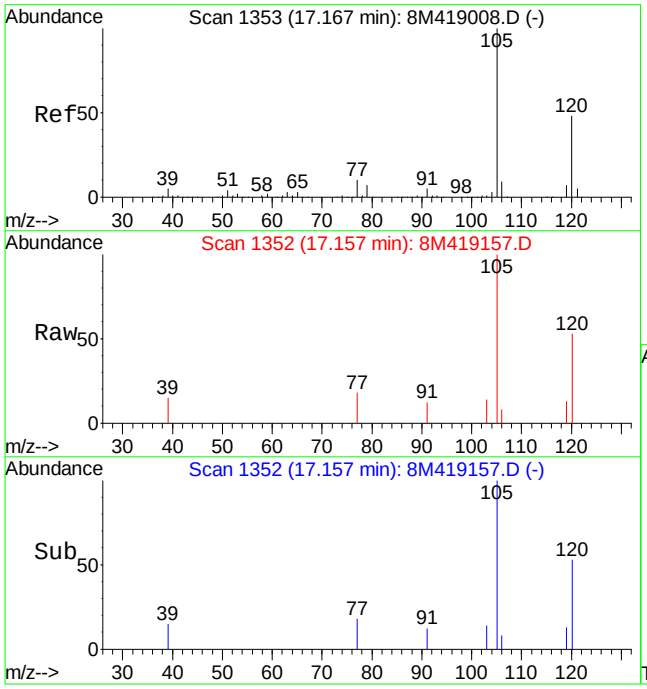


#73
m-,p-Xylene
Concen: 0.24 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion:106 Resp: 3456

Ion	Ratio	Lower	Upper
106	100		
91	209.8	113.4	264.6

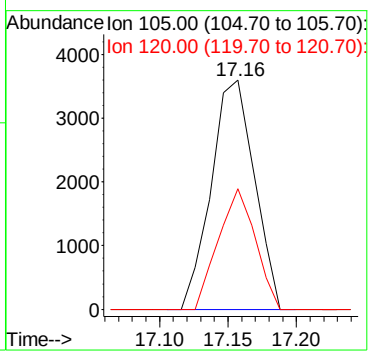




#90
1,2,4-Trimethylbenzene
Concen: 0.27 ug/L
RT: 17.16 min Scan# 1352
Delta R.T. -0.01 min
Lab File: 8M419157.D
Acq: 25 Apr 2017 21:46

Tgt Ion:105 Resp: 7890

Ion	Ratio	Lower	Upper
105	100		
120	45.0	32.2	75.2



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419158.D Vial: 23
Acq On : 25 Apr 2017 22:16 Operator: TMB
Sample : L17041075-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 22:37:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

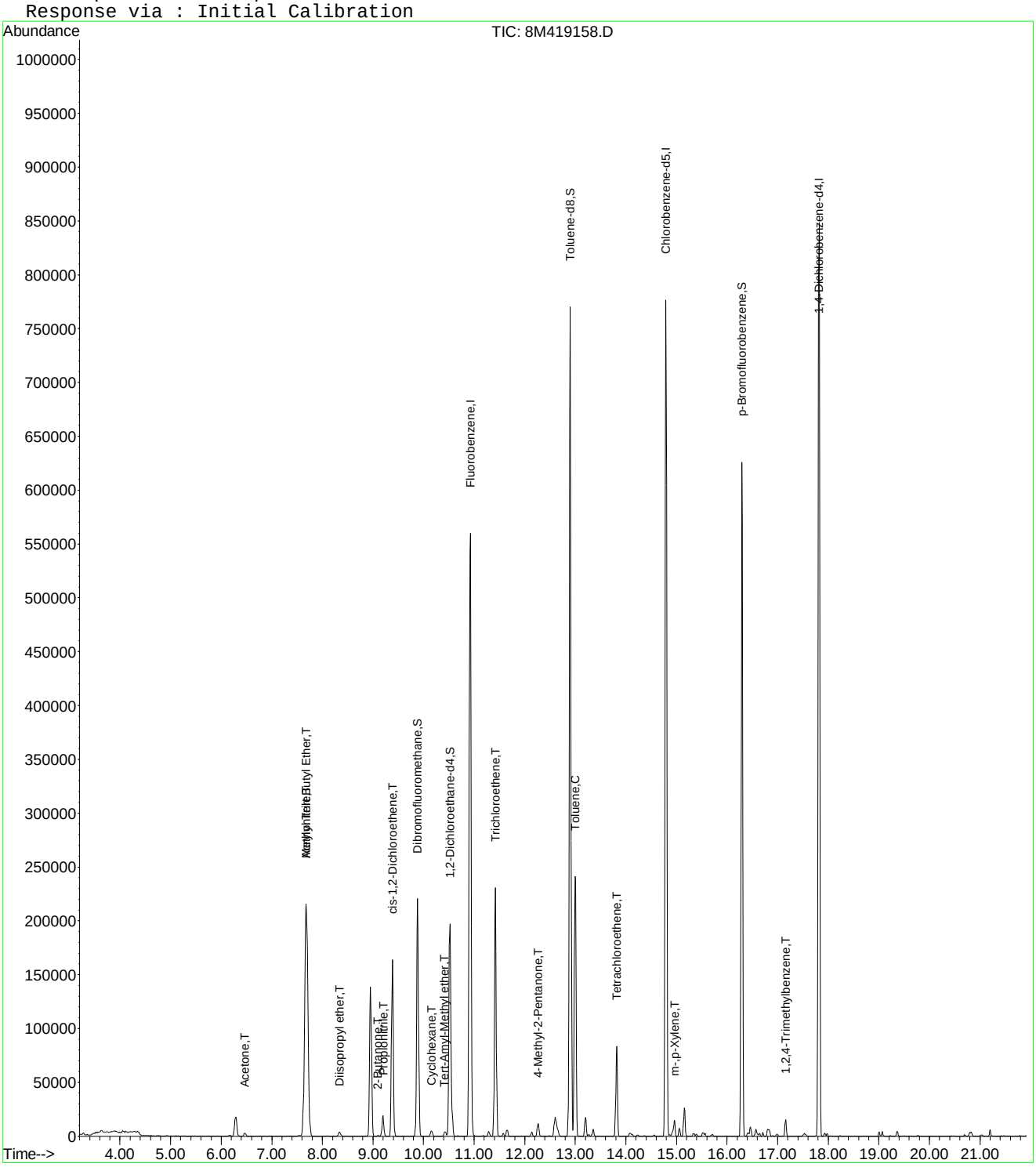
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	702586	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	569691	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	293528	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	184794	25.0762 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.32%		
43) 1,2-Dichloroethane-d4	10.52	65	165514	25.9801 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.92%		
58) Toluene-d8	12.90	98	686553	26.3752 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%		
80) p-Bromofluorobenzene	16.29	95	273013	26.3539 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.40%		
Target Compounds					Qvalue
13) Acetone	6.47	43	5731	5.7998 ug/L	87
21) Acrylonitrile	7.68	53	4409	3.2166 ug/L #	10
22) Methyl Tert Butyl Ether	7.68	73	479227	33.2620 ug/L	96
25) Diisopropyl ether	8.34	45	6721	0.3033 ug/L #	82
29) 2-Butanone	9.10	43	1116	0.7202 ug/L #	44
30) Propionitrile	9.21	54	2158	4.4932 ug/L #	60
32) cis-1,2-Dichloroethene	9.38	96	96287	11.7675 ug/L	93
39) Cyclohexane	10.16	56	3923	0.3699 ug/L	88
41) Tert-Amyl-Methyl ether	10.41	73	5980	0.3544 ug/L #	89
47) Trichloroethene	11.42	130	4801	0.5888 ug/L #	1
54) 4-Methyl-2-Pentanone	12.26	58	4588	3.3393 ug/L	89
59) Toluene	12.99	91	253684	7.9999 ug/L	98
66) Tetrachloroethene	13.82	164	27047	4.0605 ug/L	99
73) m-,p-Xylene	14.97	106	3344	0.2284 ug/L	68
90) 1,2,4-Trimethylbenzene	17.16	105	12334	0.4061 ug/L	94

(#) = qualifier out of range (m) = manual integration
8M419158.D 8260WT.M Wed Apr 26 07:14:26 2017 Page 1

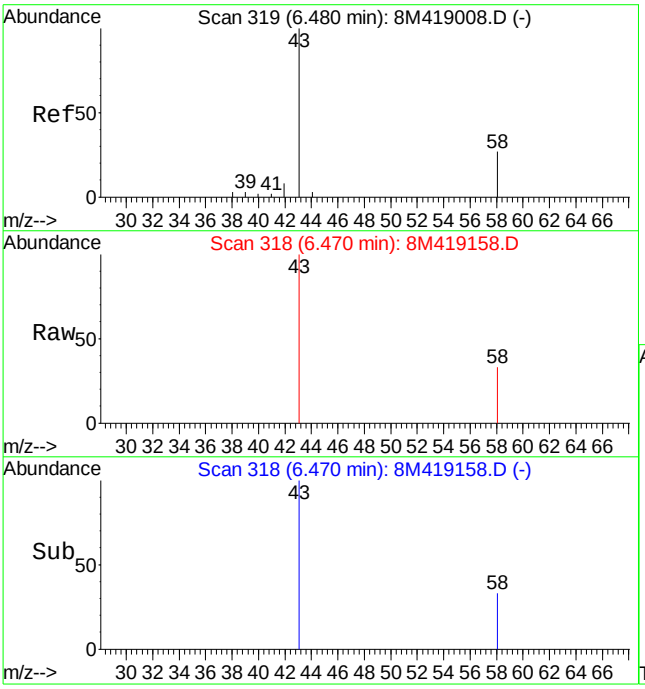
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419158.D Vial: 23
Acq On : 25 Apr 2017 22:16 Operator: TMB
Sample : L17041075-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 22:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



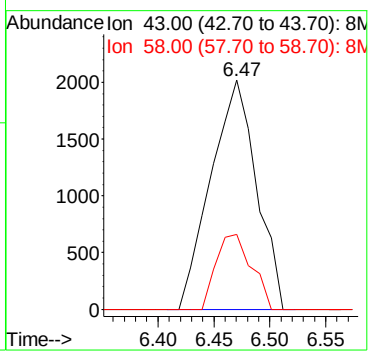
8M419158.D 8260WT.M Wed Apr 26 07:14:27 2017 Page 2

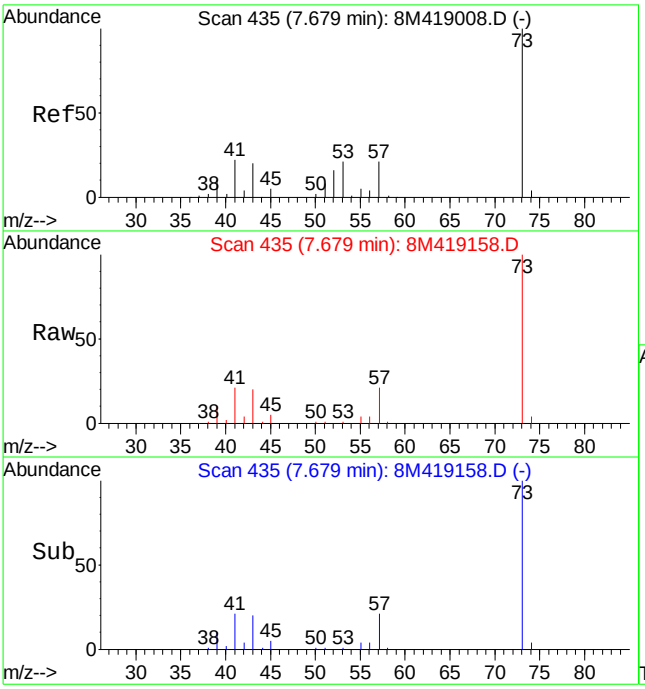


#13
Acetone
Concen: 5.80 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 43 Resp: 5731

Ion	Ratio	Lower	Upper
43	100		
58	25.4	19.4	45.4

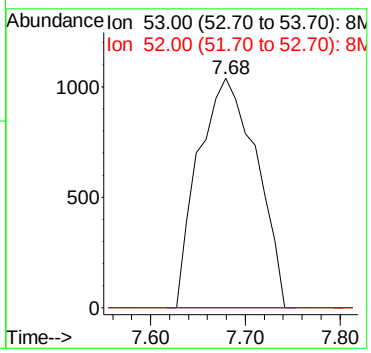


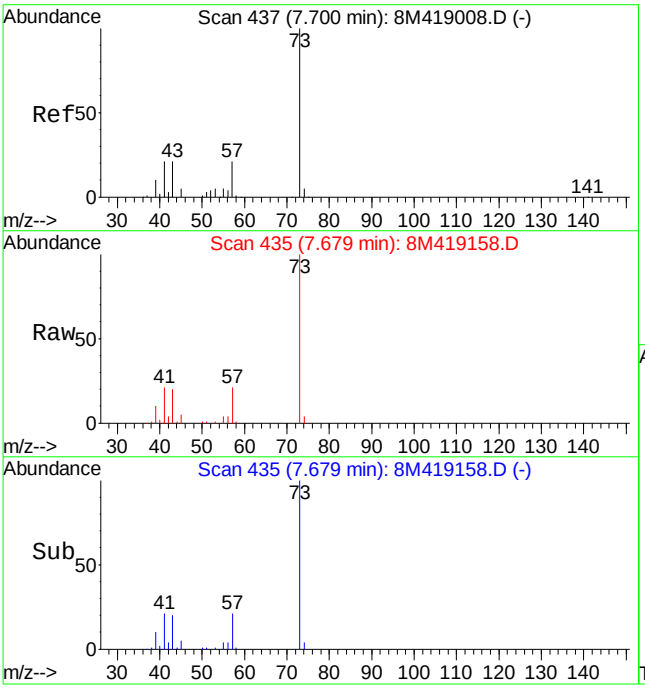


#21
Acrylonitrile
Concen: 3.22 ug/L
RT: 7.68 min Scan# 435
Delta R.T. 0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 53 Resp: 4409

Ion	Ratio	Lower	Upper
53	100		
52	0.0	46.8	109.2#

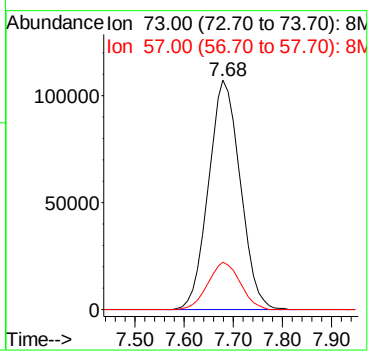


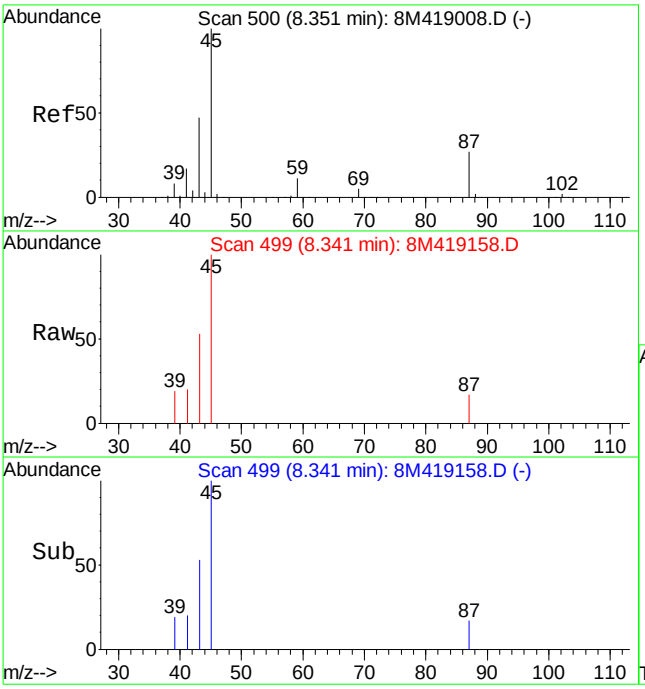


#22
Methyl Tert Butyl Ether
Concen: 33.26 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 73 Resp: 479227

Ion	Ratio	Lower	Upper
73	100		
57	20.8	11.4	26.6

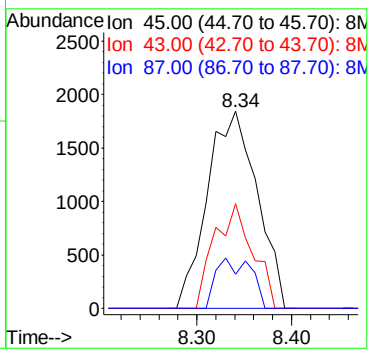


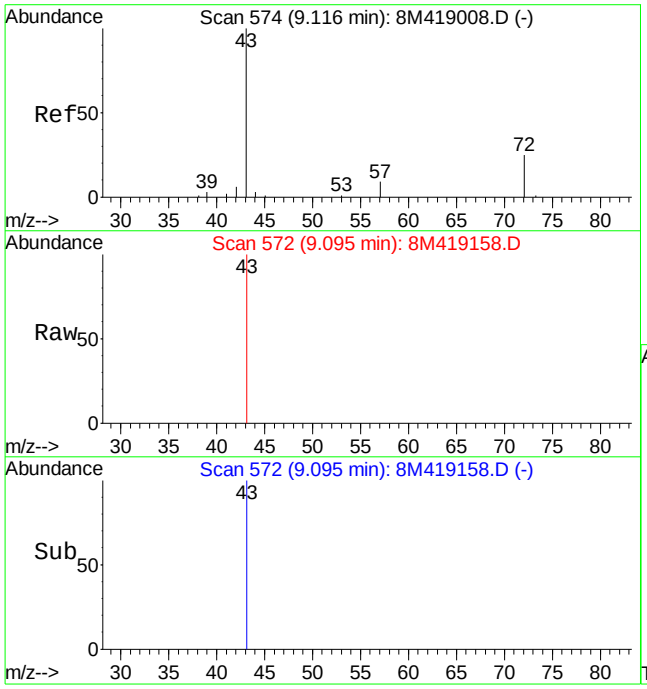


#25
Diisopropyl ether
Concen: 0.30 ug/L
RT: 8.34 min Scan# 499
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 45 Resp: 6721

Ion	Ratio	Lower	Upper
45	100		
43	40.7	29.2	68.2
87	17.8	19.6	45.6#

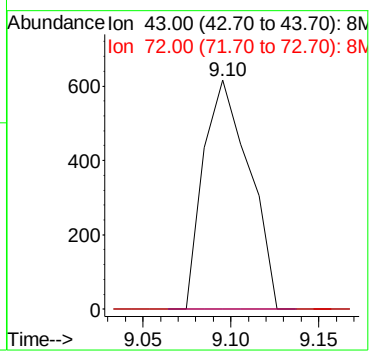


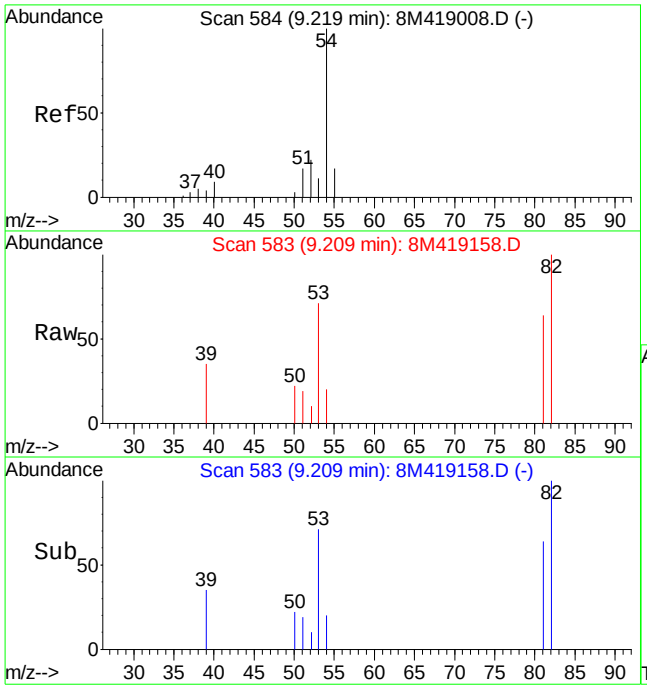


#29
2-Butanone
Concen: 0.72 ug/L
RT: 9.10 min Scan# 572
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 43 Resp: 1116

Ion	Ratio	Lower	Upper
43	100		
72	0.0	18.4	42.8#

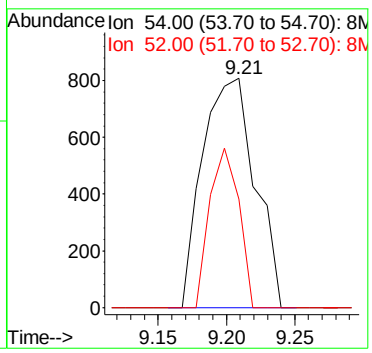


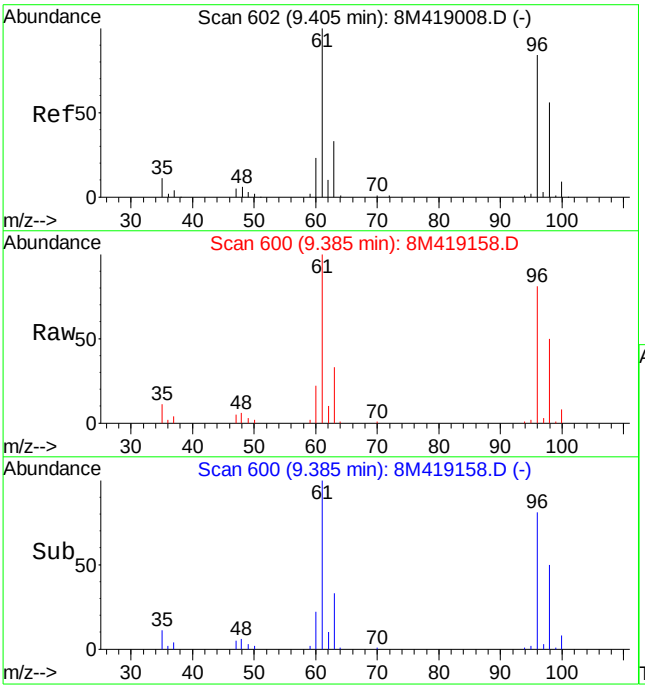


#30
Propionitrile
Concen: 4.49 ug/L
RT: 9.21 min Scan# 583
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 54 Resp: 2158

Ion	Ratio	Lower	Upper
54	100		
52	38.6	12.1	28.3#

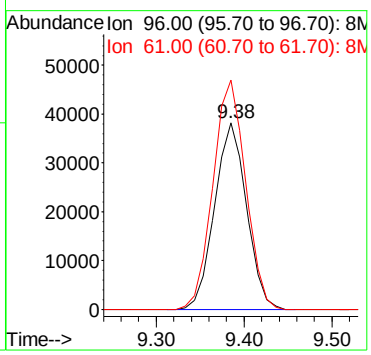


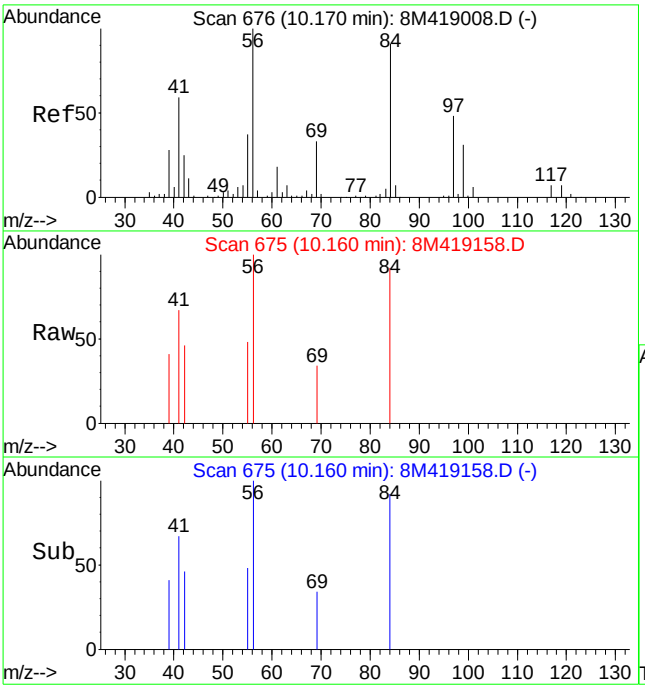


#32
cis-1,2-Dichloroethene
Concen: 11.77 ug/L
RT: 9.38 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 96 Resp: 96287

Ion	Ratio	Lower	Upper
96	100		
61	125.6	80.3	187.3

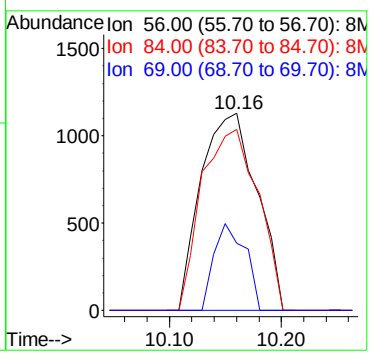


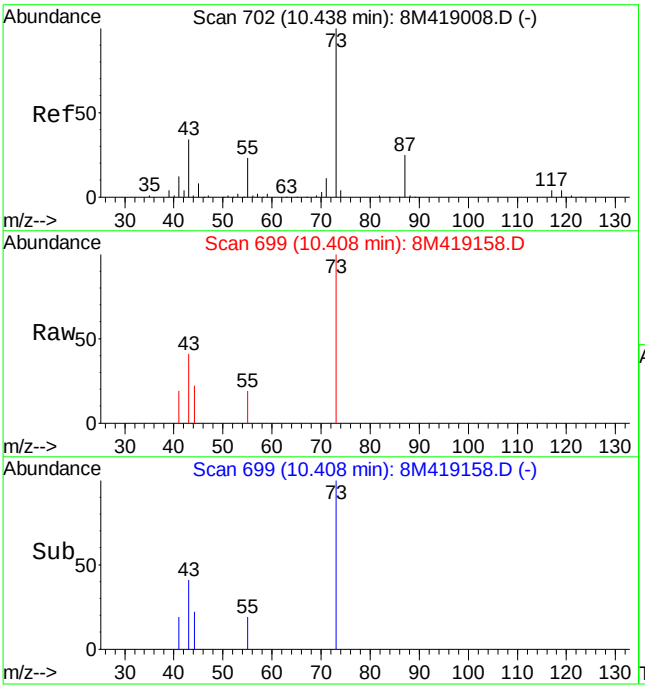


#39
Cyclohexane
Concen: 0.37 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 56 Resp: 3923

Ion	Ratio	Lower	Upper
56	100		
84	92.5	61.6	143.8
69	24.6	21.4	50.0

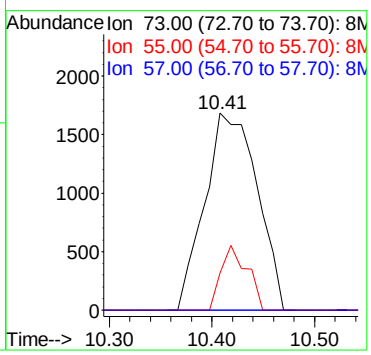


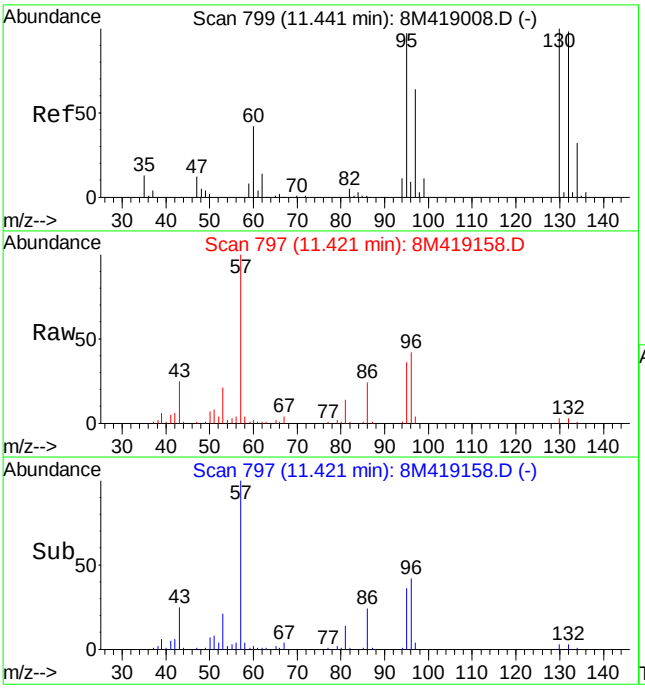


#41
Tert-Amyl-Methyl ether
Concen: 0.35 ug/L
RT: 10.41 min Scan# 699
Delta R.T. -0.03 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 73 Resp: 5980

Ion	Ratio	Lower	Upper
73	100		
55	16.4	13.0	30.2
57	0.0	1.1	2.5#

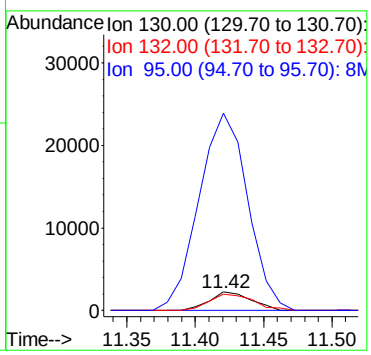


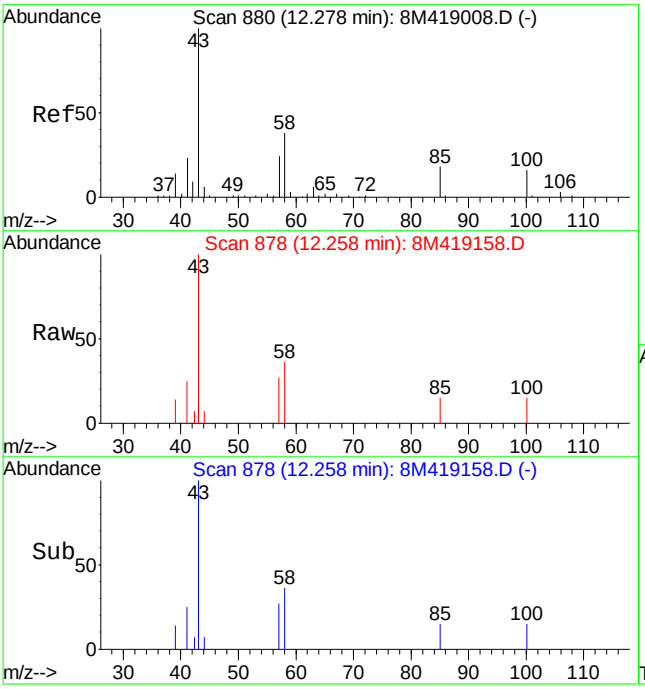


#47
Trichloroethene
Concen: 0.59 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion:130 Resp: 4801

Ion	Ratio	Lower	Upper
130	100		
132	94.2	59.4	138.6
95	1232.9	60.1	140.3#

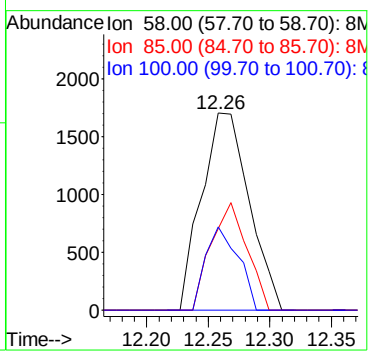


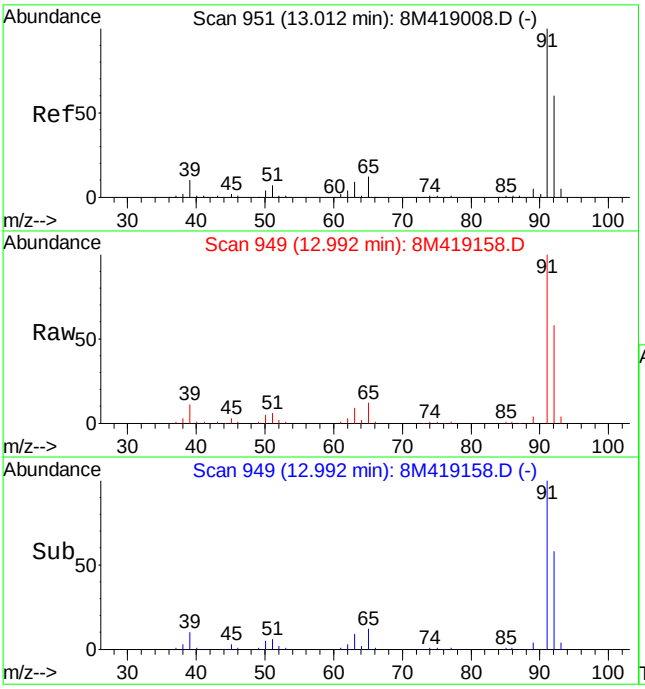


#54
4-Methyl-2-Pentanone
Concen: 3.34 ug/L
RT: 12.26 min Scan# 878
Delta R.T. -0.02 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 58 Resp: 4588

Ion	Ratio	Lower	Upper
58	100		
85	41.2	27.7	64.7
100	29.0	22.8	53.2

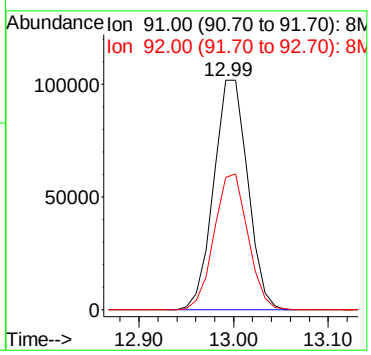


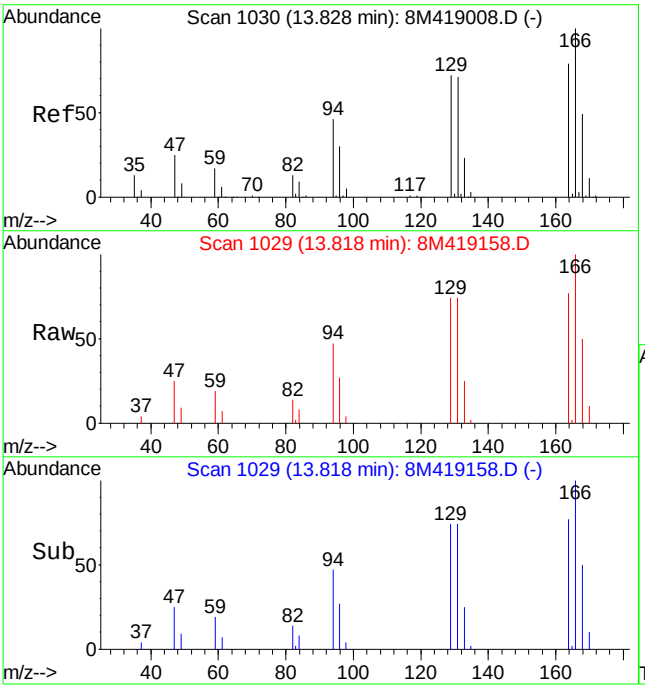


#59
Toluene
Concen: 8.00 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion: 91 Resp: 253684

Ion	Ratio	Lower	Upper
91	100		
92	58.4	35.9	83.7

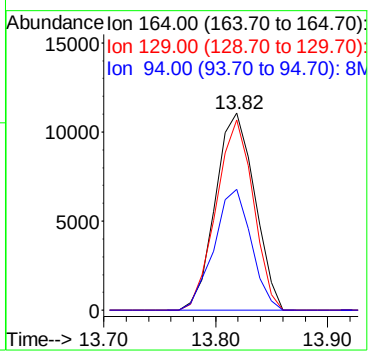


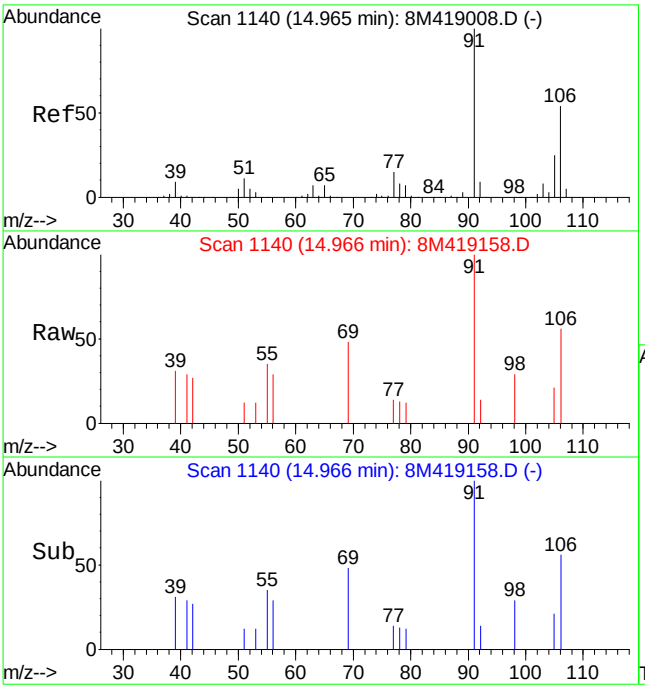


#66
Tetrachloroethene
Concen: 4.06 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion:164 Resp: 27047

Ion	Ratio	Lower	Upper
164	100		
129	90.9	53.4	124.6
94	58.2	34.7	81.1

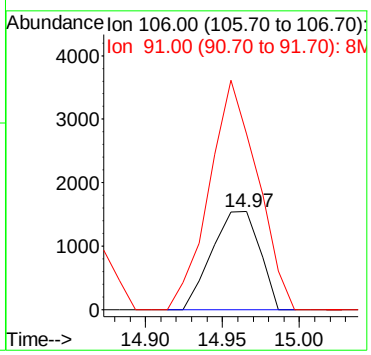


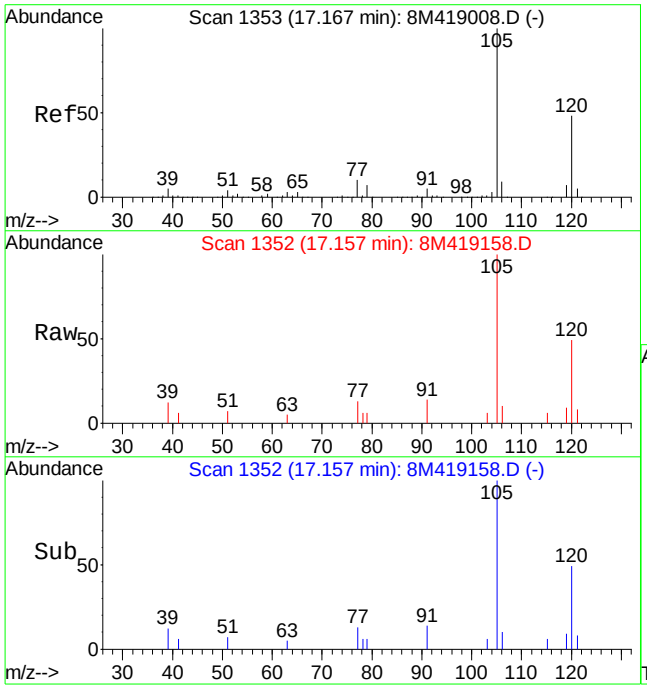


#73
m-,p-Xylene
Concen: 0.23 ug/L
RT: 14.97 min Scan# 1140
Delta R.T. -0.00 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion:106 Resp: 3344

Ion	Ratio	Lower	Upper
106	100		
91	236.1	113.4	264.6

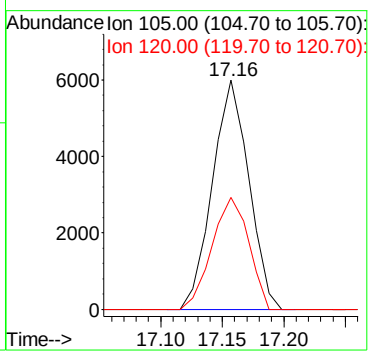




#90
1,2,4-Trimethylbenzene
Concen: 0.41 ug/L
RT: 17.16 min Scan# 1352
Delta R.T. -0.01 min
Lab File: 8M419158.D
Acq: 25 Apr 2017 22:16

Tgt Ion:105 Resp: 12334

Ion	Ratio	Lower	Upper
105	100		
120	49.3	32.2	75.2



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419159.D Vial: 24
Acq On : 25 Apr 2017 22:45 Operator: TMB
Sample : L17041075-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 23:07:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

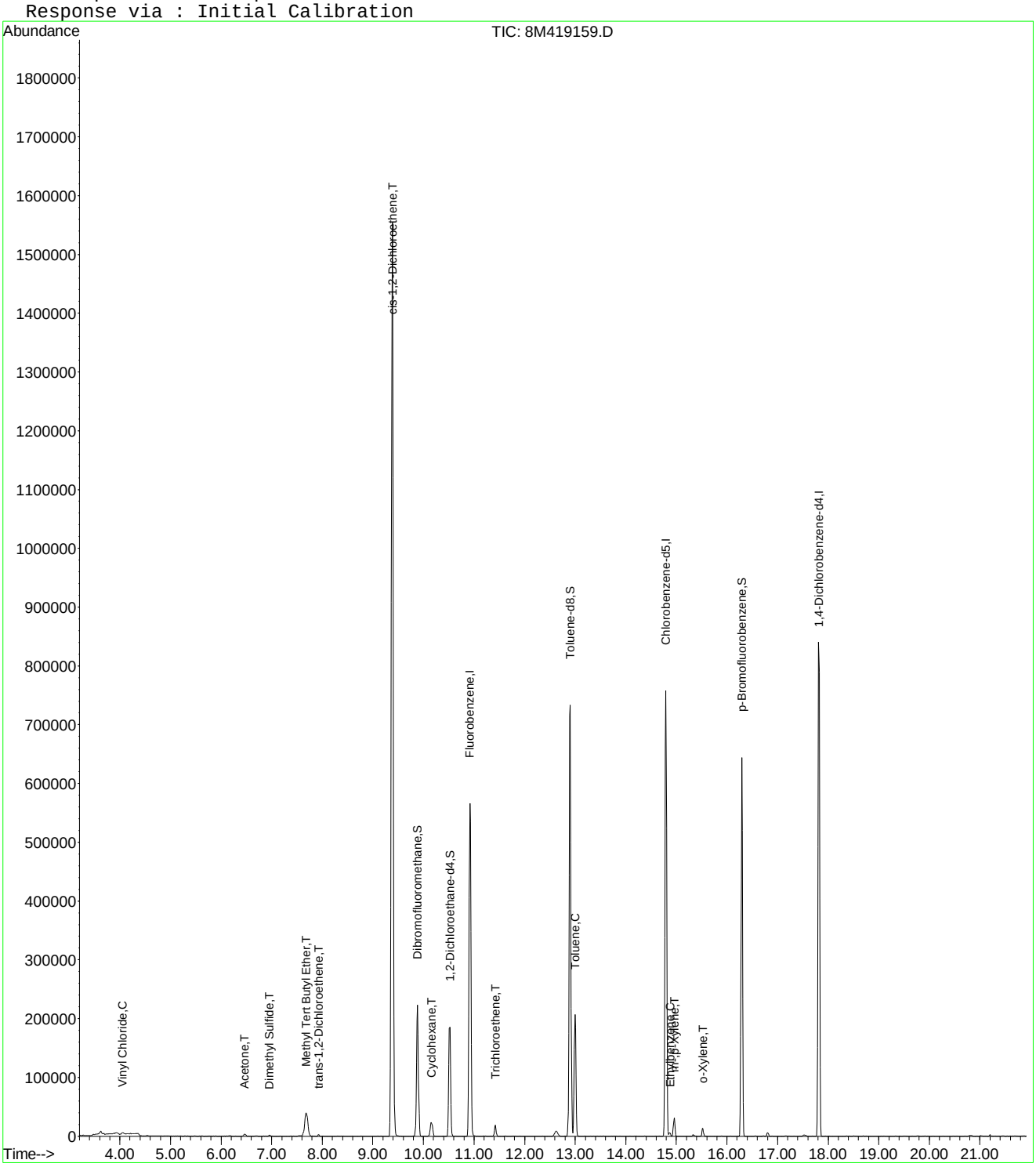
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	702981	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	567181	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	289582	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	187007	25.3623	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.44%			
43) 1,2-Dichloroethane-d4	10.52	65	164709	25.8392	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.36%			
58) Toluene-d8	12.90	98	686633	26.4951	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%			
80) p-Bromofluorobenzene	16.29	95	266174	26.0438	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.16%			
Target Compounds						Qvalue
4) Vinyl Chloride	4.05	62	2642	0.2352	ug/L	85
13) Acetone	6.46	43	6763	6.8403	ug/L	82
16) Dimethyl Sulfide	6.96	62	1070	0.1578	ug/L #	62
22) Methyl Tert Butyl Ether	7.68	73	87563	6.0741	ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	1890	0.1908	ug/L	87
32) cis-1,2-Dichloroethene	9.39	96	909022	111.0317	ug/L	92
39) Cyclohexane	10.16	56	18347	1.7287	ug/L	88
47) Trichloroethene	11.42	130	1484	0.1819	ug/L #	1
59) Toluene	12.99	91	206267	6.5334	ug/L	98
72) Ethylbenzene	14.88	106	2572	0.2043	ug/L	86
73) m-,p-Xylene	14.96	106	13355	0.9162	ug/L	96
74) o-Xylene	15.53	106	6067	0.4140	ug/L	87

(#) = qualifier out of range (m) = manual integration
8M419159.D 8260WT.M Wed Apr 26 07:14:32 2017 Page 1

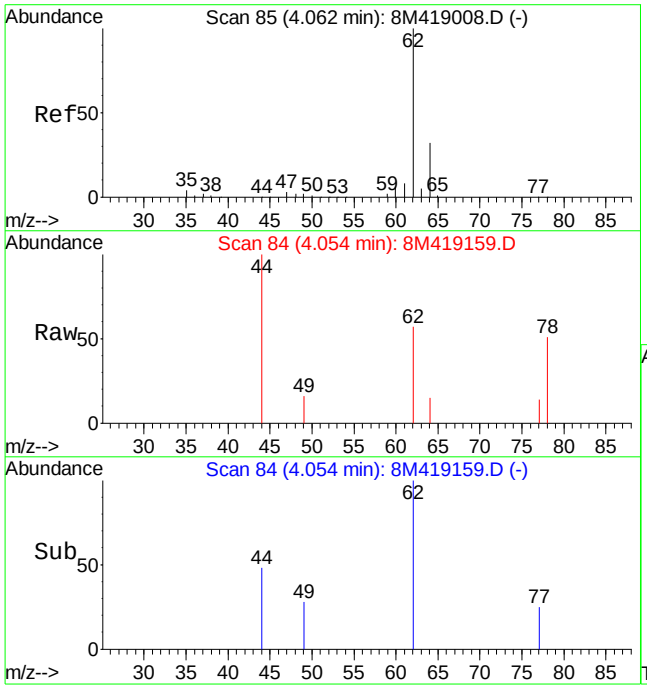
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419159.D Vial: 24
Acq On : 25 Apr 2017 22:45 Operator: TMB
Sample : L17041075-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 23:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



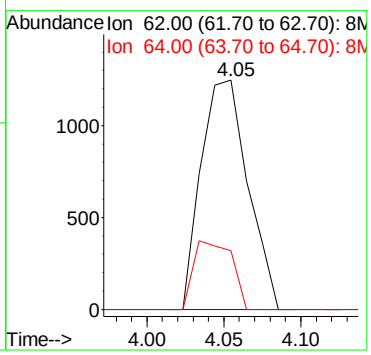
8M419159.D 8260WT.M Wed Apr 26 07:14:32 2017 Page 2

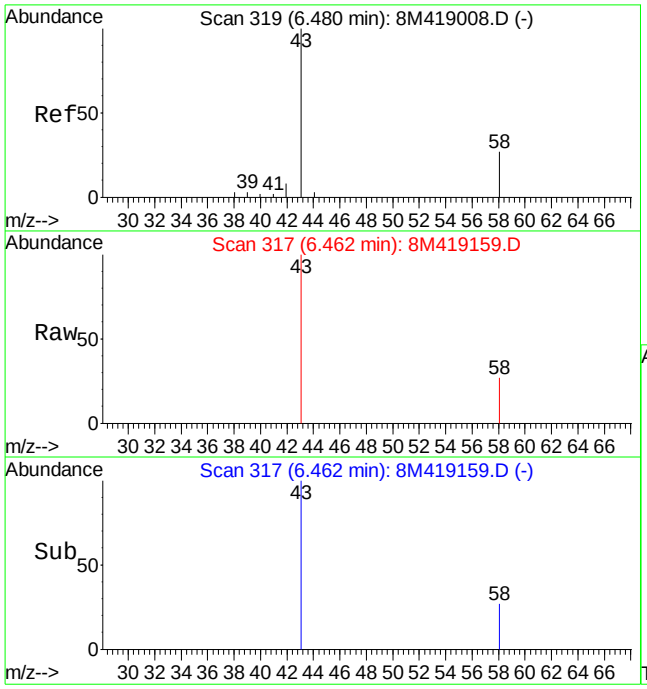


#4
Vinyl Chloride
Concen: 0.24 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 62 Resp: 2642

Ion	Ratio	Lower	Upper
62	100		
64	24.4	19.9	46.3

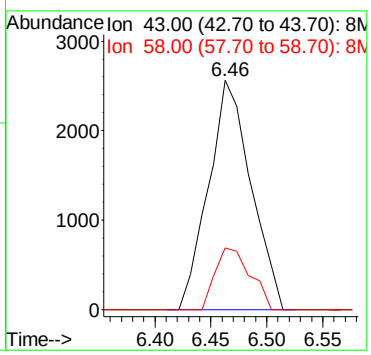


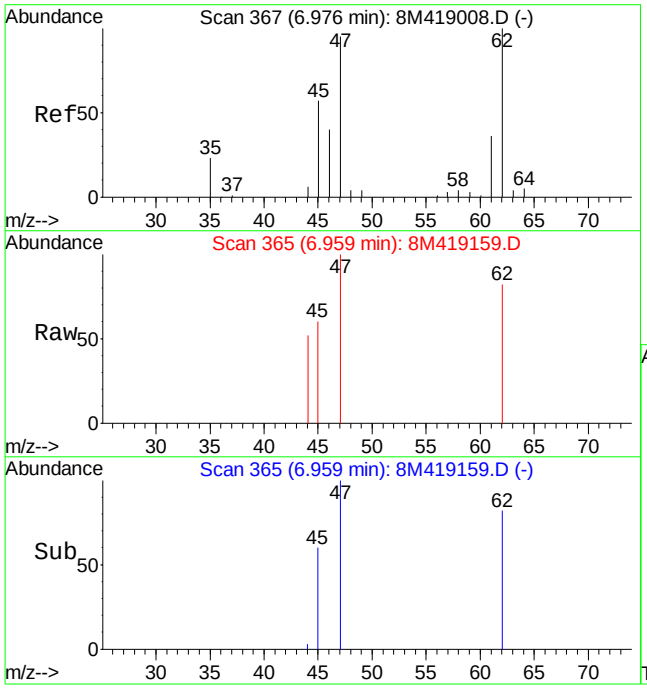


#13
Acetone
Concen: 6.84 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 43 Resp: 6763

Ion	Ratio	Lower	Upper
43	100		
58	22.2	19.4	45.4

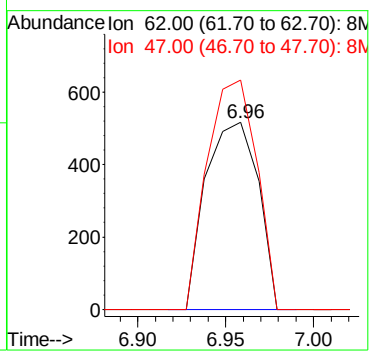


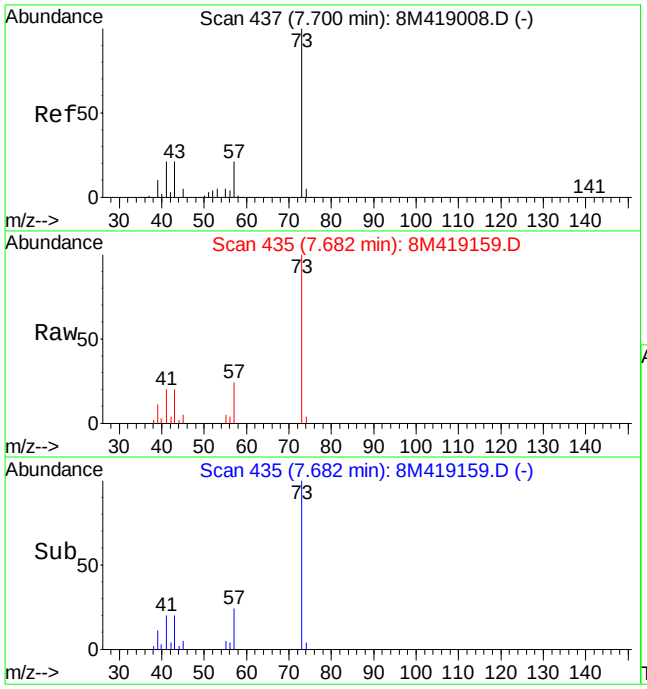


#16
Dimethyl Sulfide
Concen: 0.16 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 62 Resp: 1070

Ion	Ratio	Lower	Upper
62	100		
47	115.5	49.0	114.4#

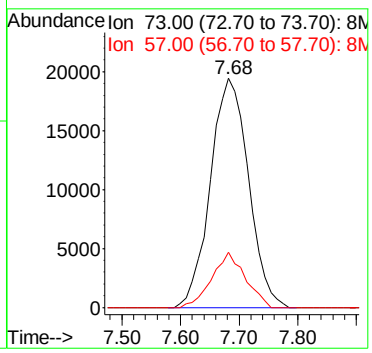


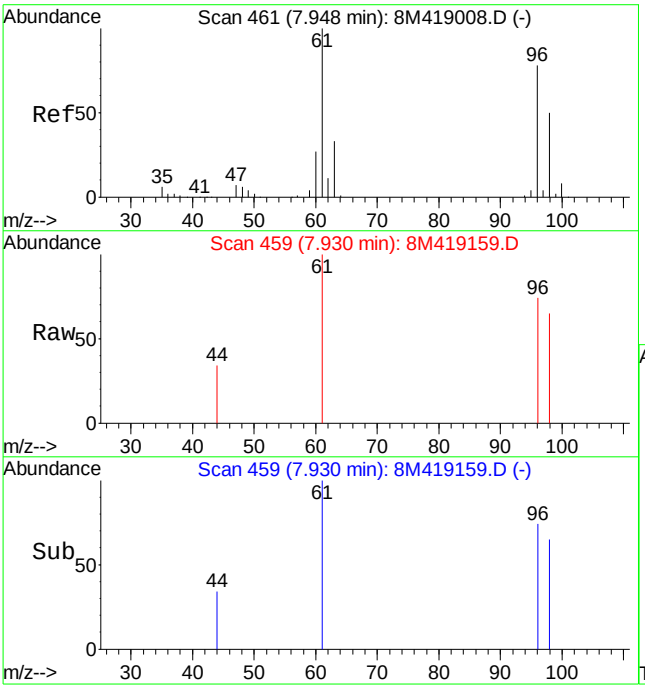


#22
Methyl Tert Butyl Ether
Concen: 6.07 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 73 Resp: 87563

Ion	Ratio	Lower	Upper
73	100		
57	21.1	11.4	26.6

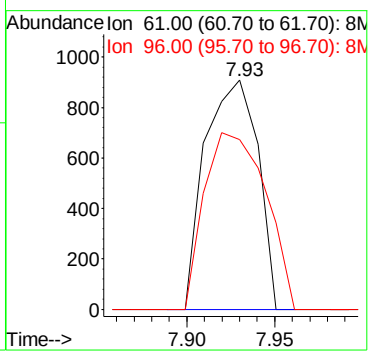


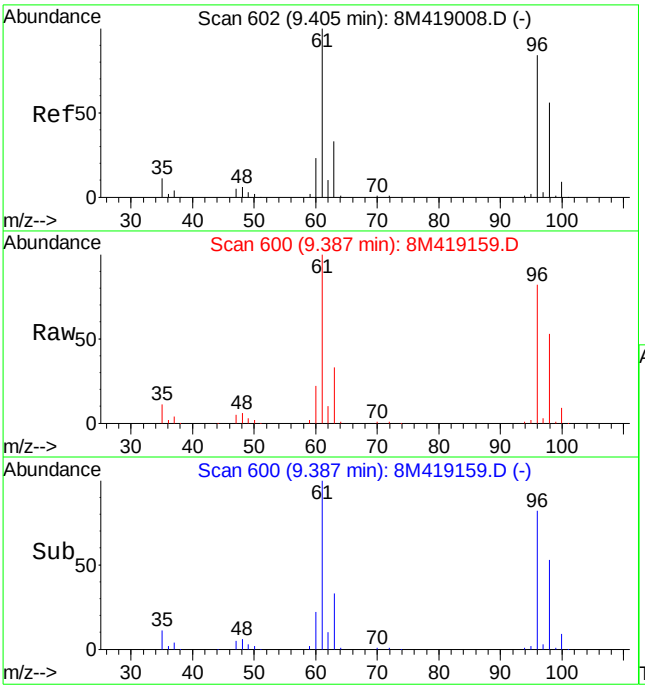


#23
trans-1,2-Dichloroethene
Concen: 0.19 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 61 Resp: 1890

Ion	Ratio	Lower	Upper
61	100		
96	89.8	47.2	110.0

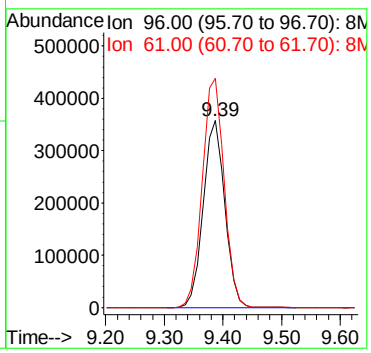


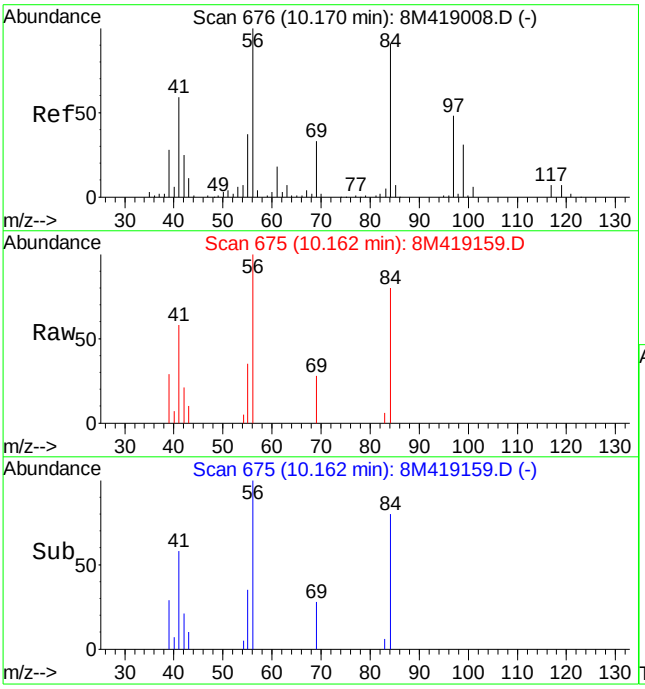


#32
cis-1,2-Dichloroethene
Concen: 111.03 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 96 Resp: 909022

Ion	Ratio	Lower	Upper
96	100		
61	124.6	80.3	187.3

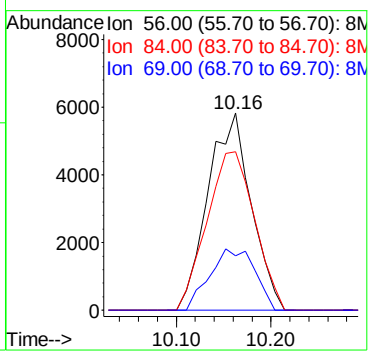


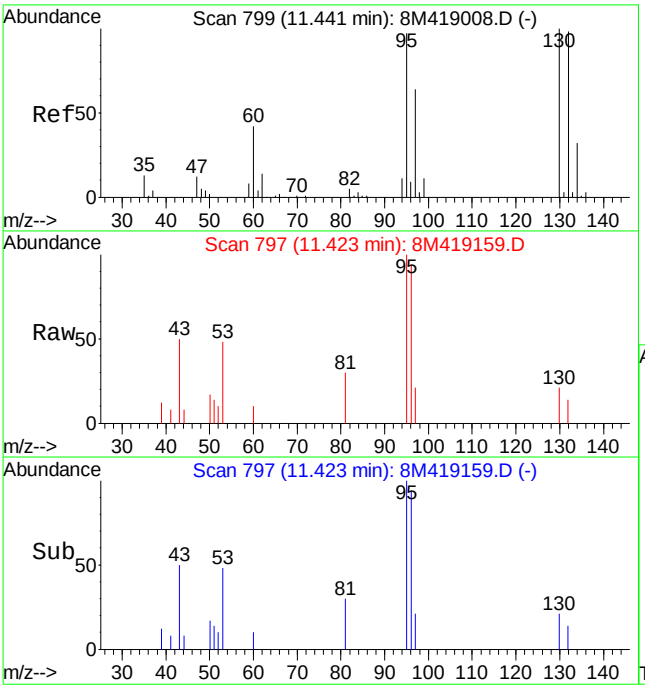


#39
Cyclohexane
Concen: 1.73 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 56 Resp: 18347

Ion	Ratio	Lower	Upper
56	100		
84	88.7	61.6	143.8
69	32.4	21.4	50.0

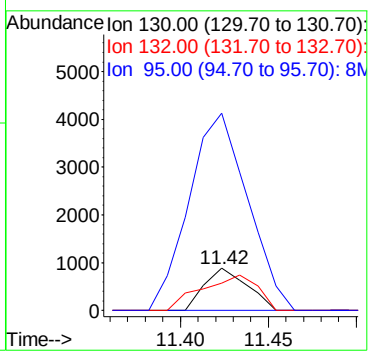


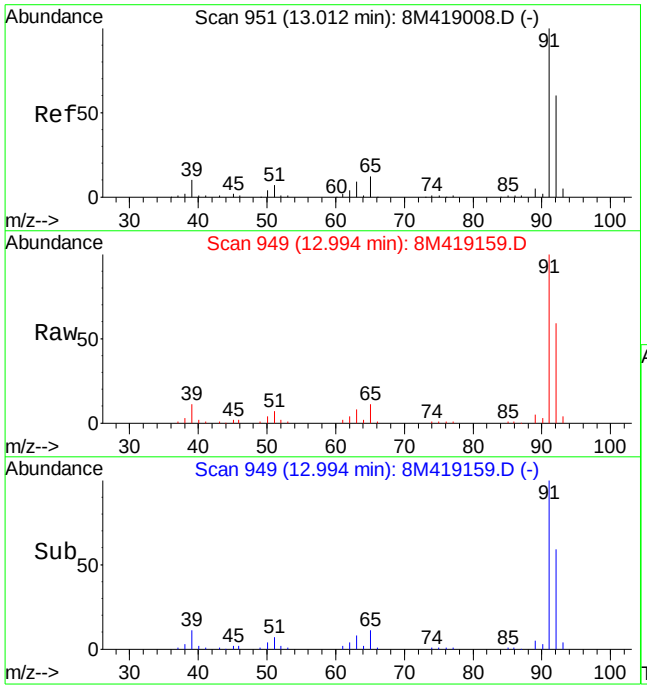


#47
Trichloroethene
Concen: 0.18 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion:130 Resp: 1484

Ion	Ratio	Lower	Upper
130	100		
132	109.9	59.4	138.6
95	647.2	60.1	140.3#

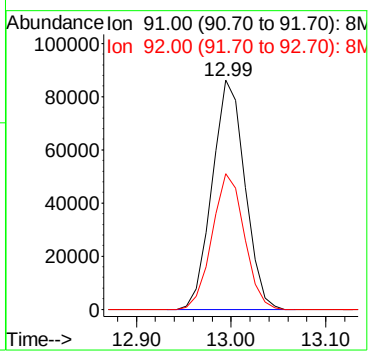


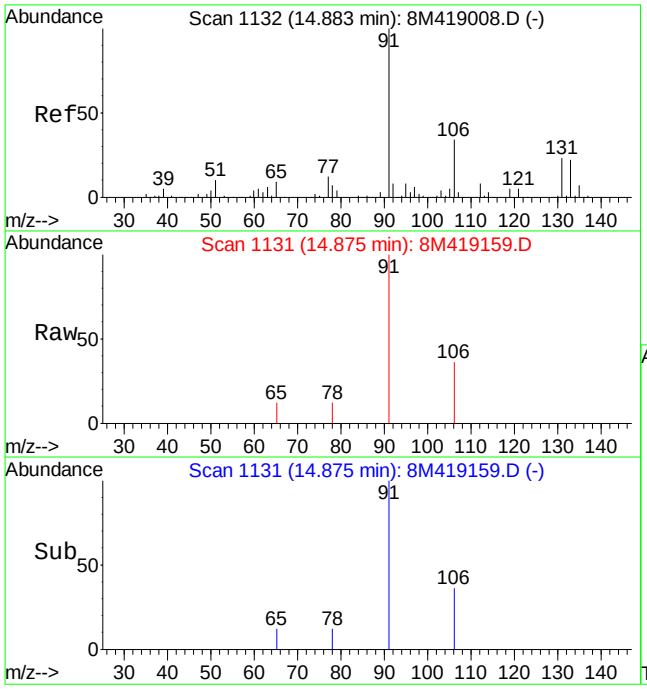


#59
Toluene
Concen: 6.53 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion: 91 Resp: 206267

Ion	Ratio	Lower	Upper
91	100		
92	58.1	35.9	83.7

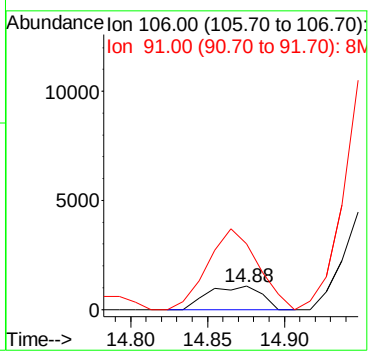


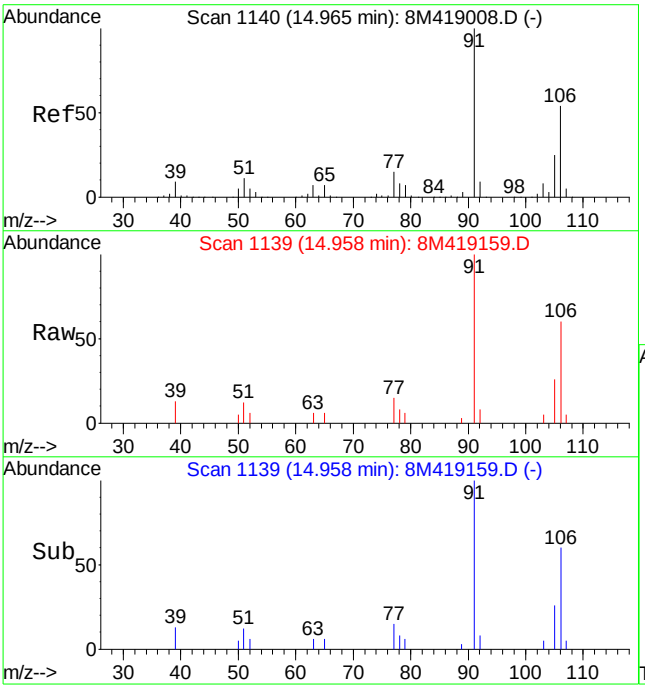


#72
Ethylbenzene
Concen: 0.20 ug/L
RT: 14.88 min Scan# 1131
Delta R.T. -0.01 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion:106 Resp: 2572

Ion	Ratio	Lower	Upper
106	100		
91	325.3	179.2	418.2

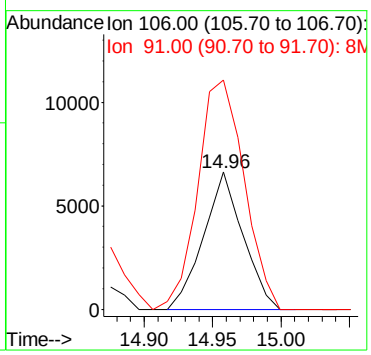


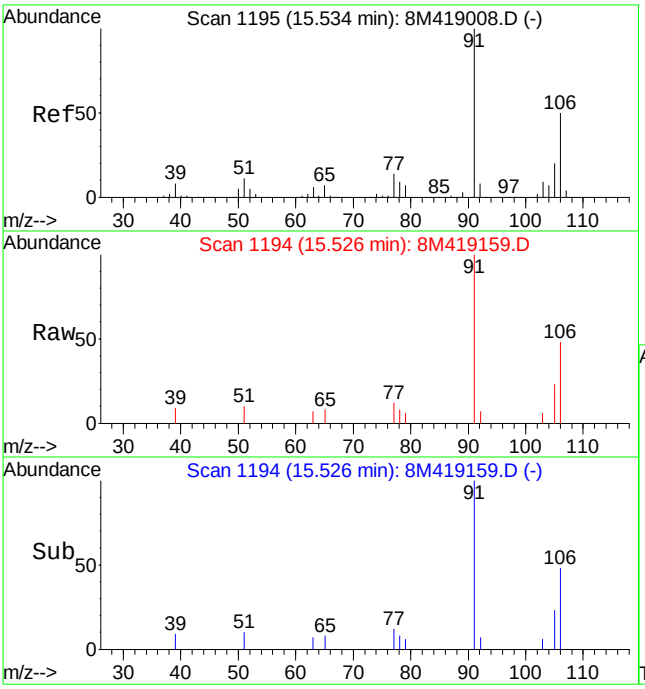


#73
m-,p-Xylene
Concen: 0.92 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion:106 Resp: 13355

Ion	Ratio	Lower	Upper
106	100		
91	195.1	113.4	264.6

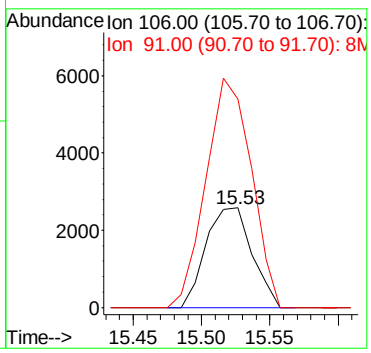




#74
o-Xylene
Concen: 0.41 ug/L
RT: 15.53 min Scan# 1194
Delta R.T. 0.00 min
Lab File: 8M419159.D
Acq: 25 Apr 2017 22:45

Tgt Ion:106 Resp: 6067

Ion	Ratio	Lower	Upper
106	100		
91	225.7	123.4	287.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419160.D Vial: 25
Acq On : 25 Apr 2017 23:16 Operator: TMB
Sample : L17041075-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 23:37:58 2017 Quant Results File: 8260WT.RES

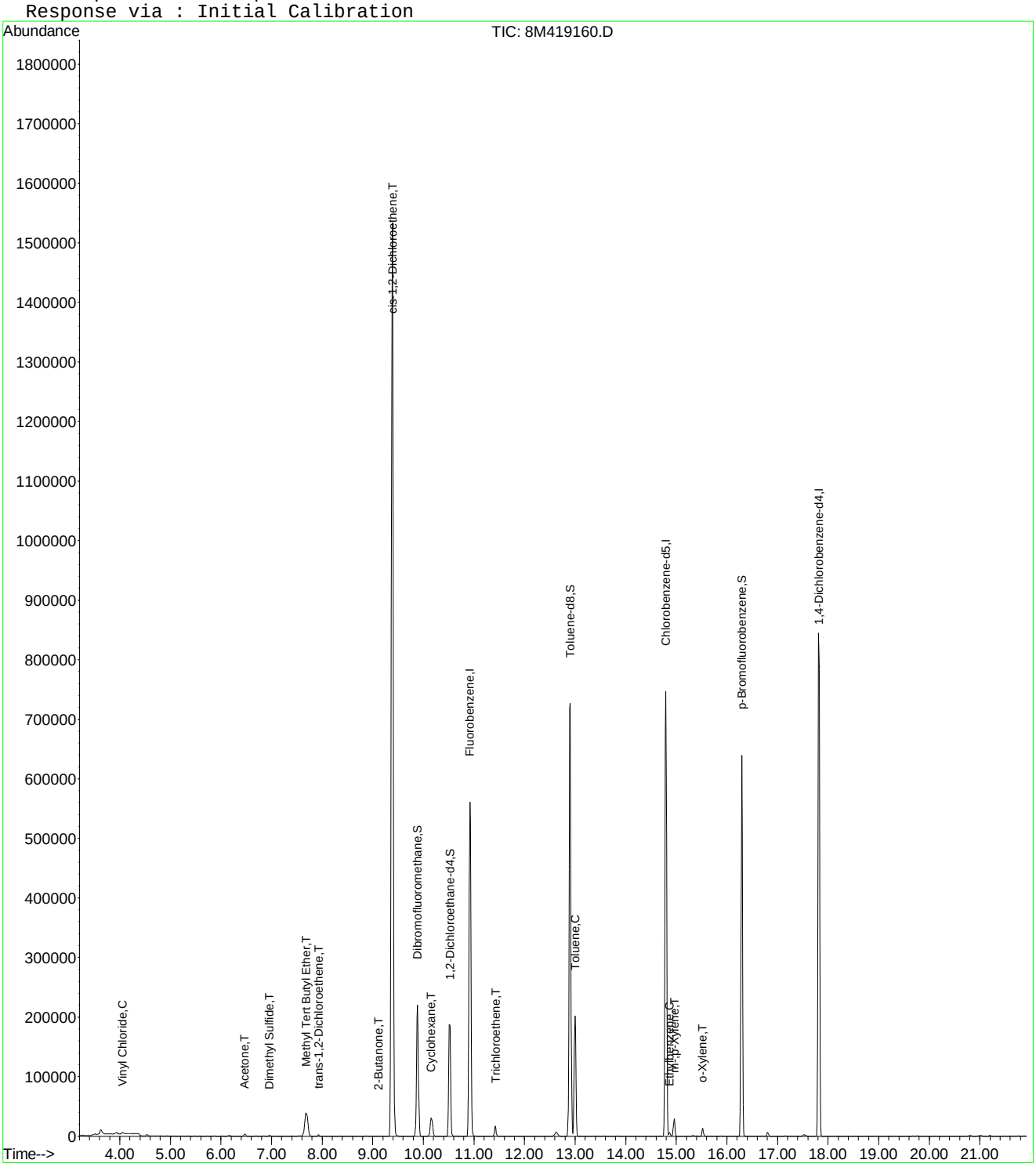
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

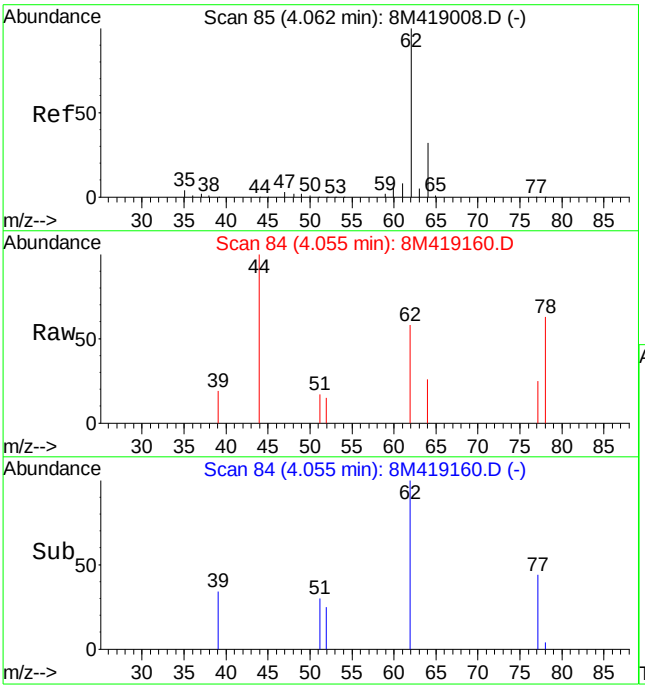
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	695348	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	561558	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	289783	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	184709	25.3256 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.32%		
43) 1,2-Dichloroethane-d4	10.52	65	165199	26.2006 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.80%		
58) Toluene-d8	12.90	98	677227	26.3938 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.56%		
80) p-Bromofluorobenzene	16.29	95	268620	26.2649 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.04%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	2888	0.2599 ug/L	93
13) Acetone	6.46	43	7019	7.1772 ug/L	82
16) Dimethyl Sulfide	6.96	62	1077	0.1606 ug/L	81
22) Methyl Tert Butyl Ether	7.68	73	87257	6.1193 ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	2033	0.2075 ug/L	84
29) 2-Butanone	9.11	43	206	0.1343 ug/L #	44
32) cis-1,2-Dichloroethene	9.39	96	896209	110.6683 ug/L	92
39) Cyclohexane	10.15	56	24399	2.3242 ug/L	90
47) Trichloroethene	11.43	130	1478	0.1832 ug/L #	1
59) Toluene	12.99	91	199968	6.3973 ug/L	98
72) Ethylbenzene	14.87	106	2508	0.2013 ug/L	91
73) m-,p-Xylene	14.96	106	11757	0.8147 ug/L	82
74) o-Xylene	15.52	106	5829	0.4017 ug/L	90

(#) = qualifier out of range (m) = manual integration
8M419160.D 8260WT.M Wed Apr 26 07:14:37 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419160.D Vial: 25
Acq On : 25 Apr 2017 23:16 Operator: TMB
Sample : L17041075-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 23:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

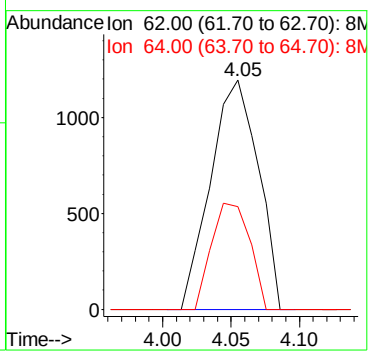


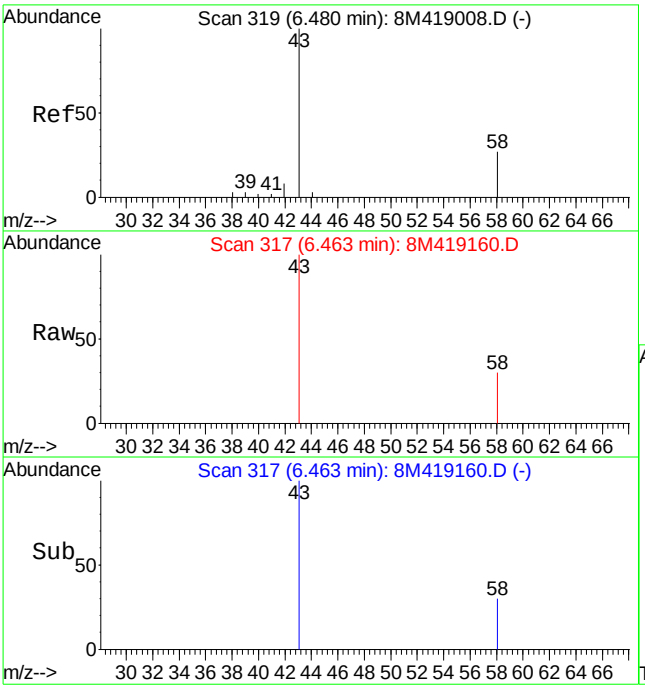


#4
Vinyl Chloride
Concen: 0.26 ug/L
RT: 4.05 min Scan# 84
Delta R.T. 0.00 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 62 Resp: 2888

Ion	Ratio	Lower	Upper
62	100		
64	37.2	19.9	46.3

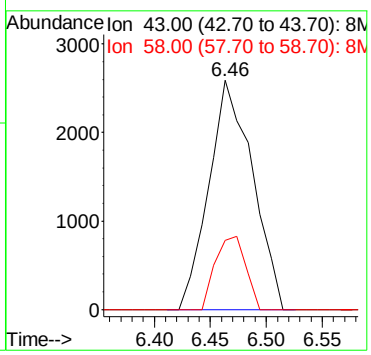


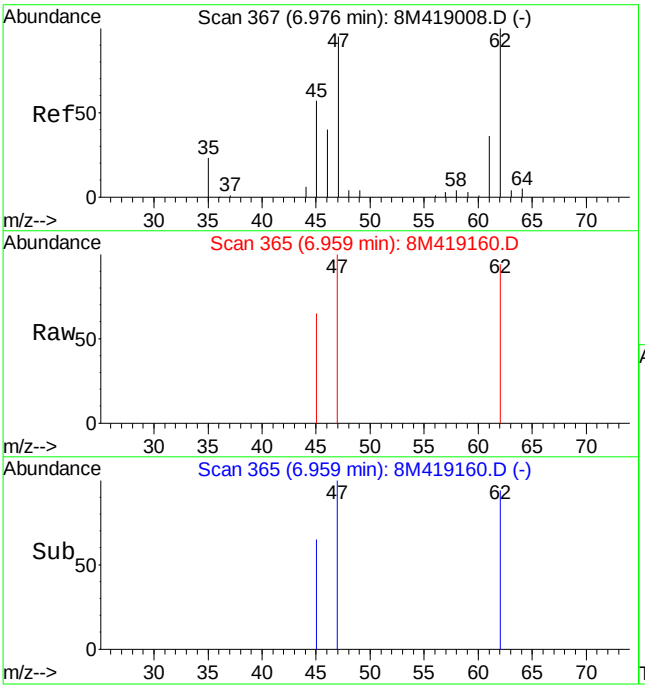


#13
Acetone
Concen: 7.18 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 43 Resp: 7019

Ion	Ratio	Lower	Upper
43	100		
58	22.1	19.4	45.4

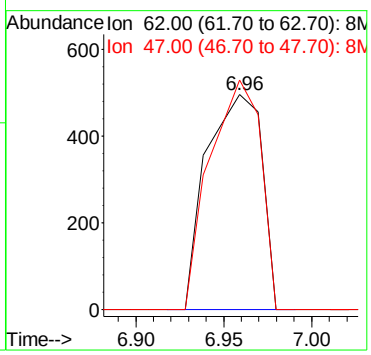


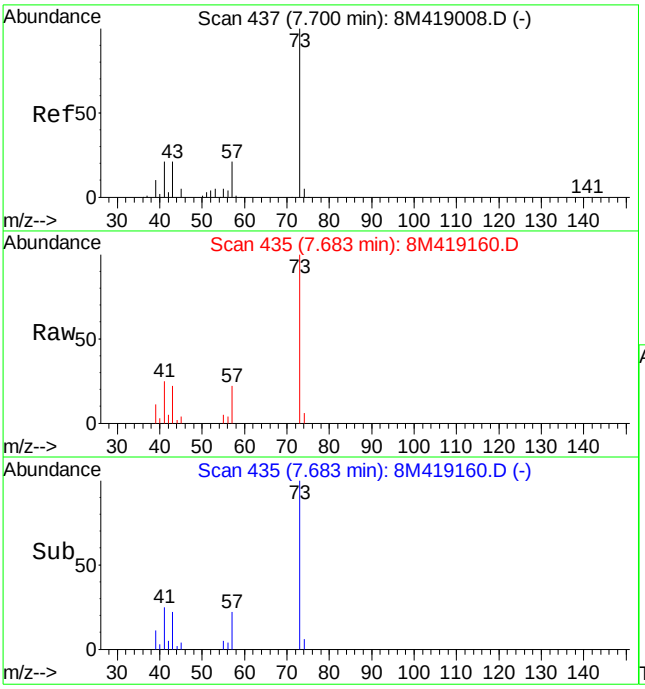


#16
Dimethyl Sulfide
Concen: 0.16 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 62 Resp: 1077

Ion	Ratio	Lower	Upper
62	100		
47	98.6	49.0	114.4

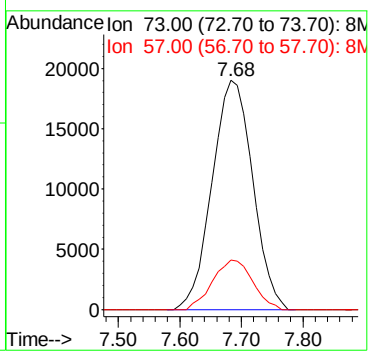


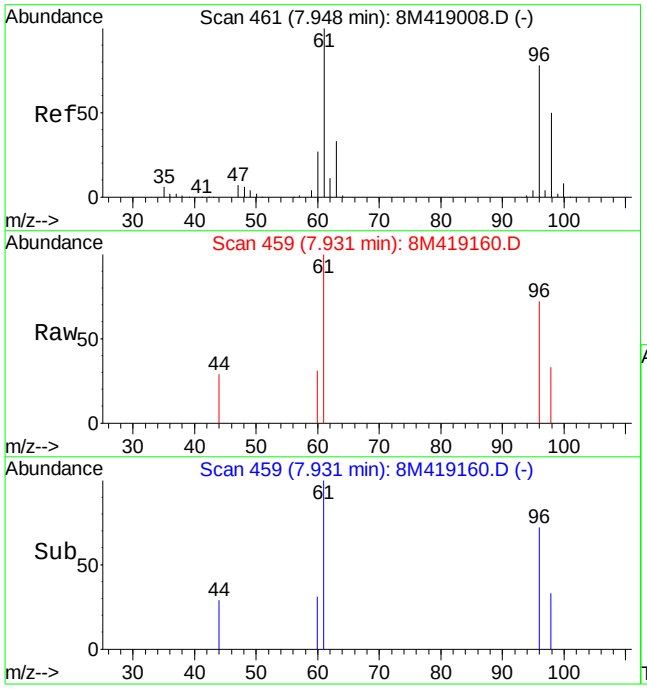


#22
Methyl Tert Butyl Ether
Concen: 6.12 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 73 Resp: 87257

Ion	Ratio	Lower	Upper
73	100		
57	21.2	11.4	26.6

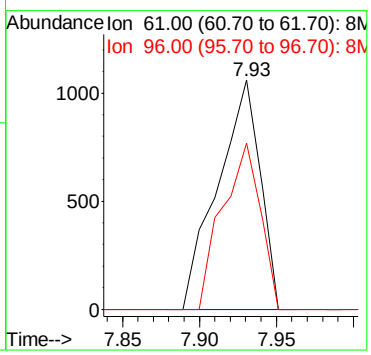


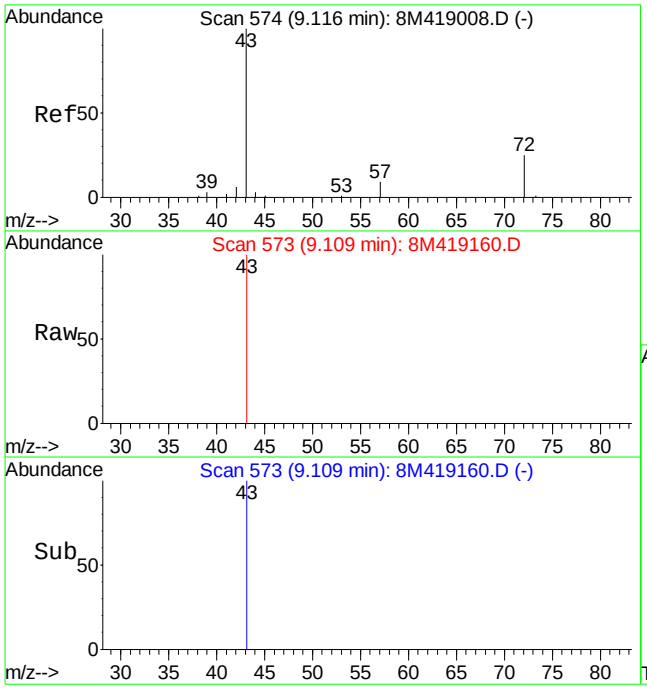


#23
trans-1,2-Dichloroethene
Concen: 0.21 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 61 Resp: 2033

Ion	Ratio	Lower	Upper
61	100		
96	64.9	47.2	110.0

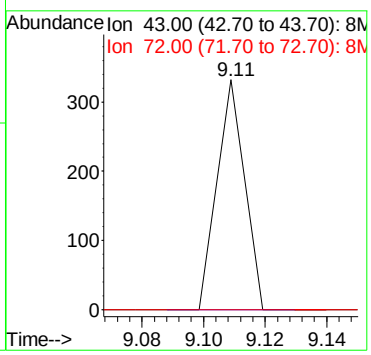


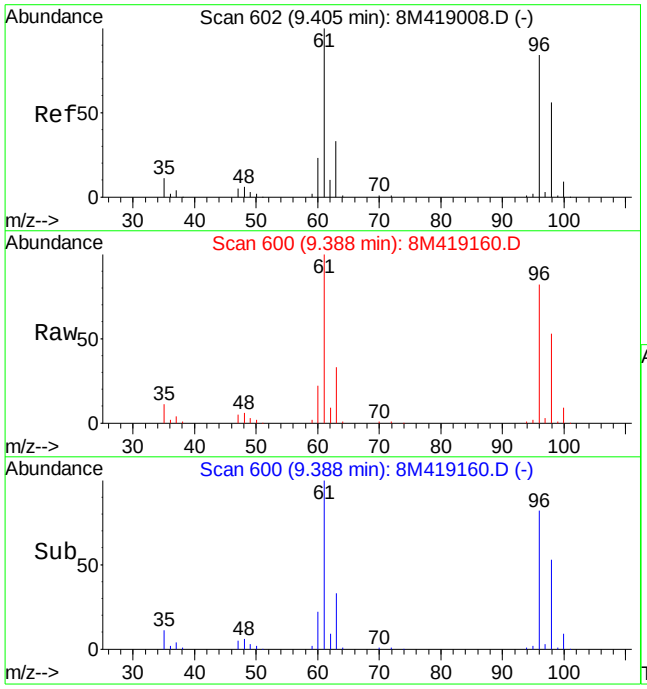


#29
2-Butanone
Concen: 0.13 ug/L
RT: 9.11 min Scan# 573
Delta R.T. 0.00 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 43 Resp: 206

Ion	Ratio	Lower	Upper
43	100		
72	0.0	18.4	42.8#

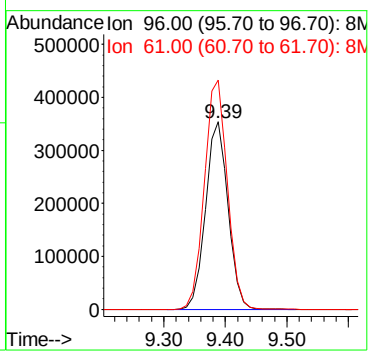


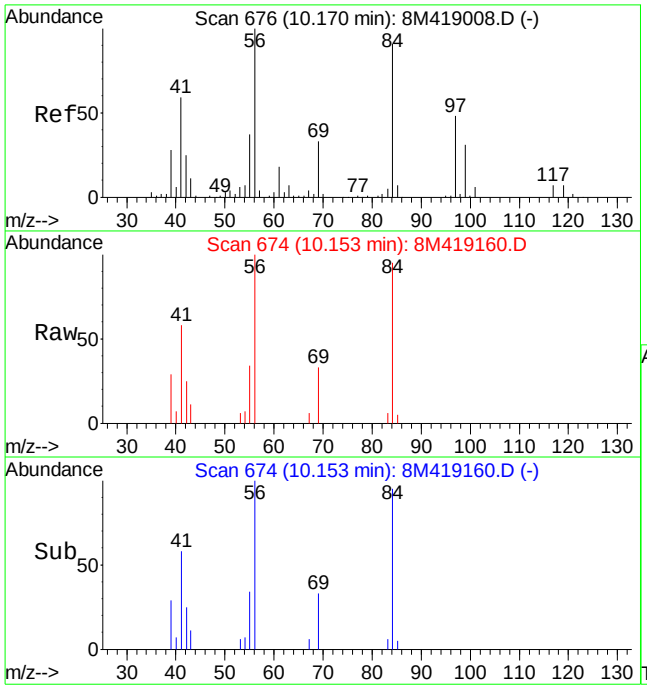


#32
cis-1,2-Dichloroethene
Concen: 110.67 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 96 Resp: 896209

Ion	Ratio	Lower	Upper
96	100		
61	124.9	80.3	187.3

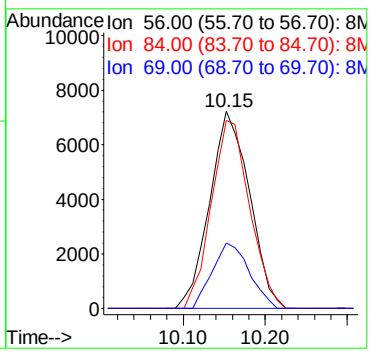


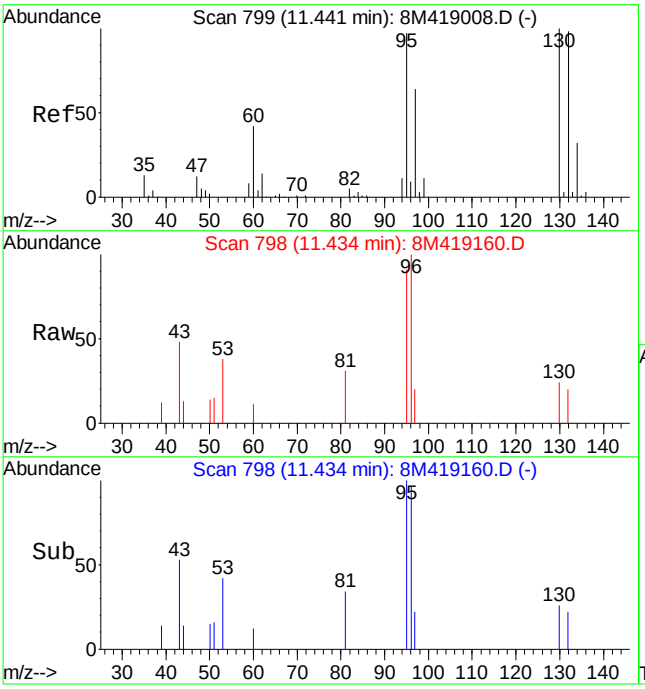


#39
Cyclohexane
Concen: 2.32 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 56 Resp: 24399

Ion	Ratio	Lower	Upper
56	100		
84	91.5	61.6	143.8
69	30.8	21.4	50.0

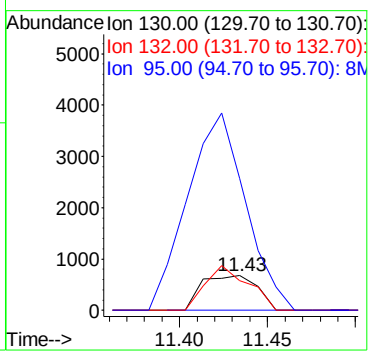


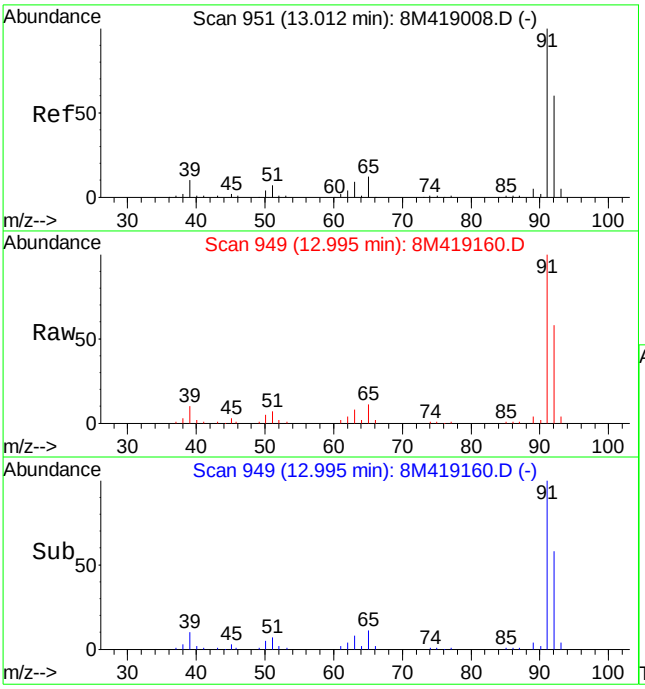


#47
Trichloroethene
Concen: 0.18 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion:130 Resp: 1478

Ion	Ratio	Lower	Upper
130	100		
132	99.7	59.4	138.6
95	598.0	60.1	140.3#

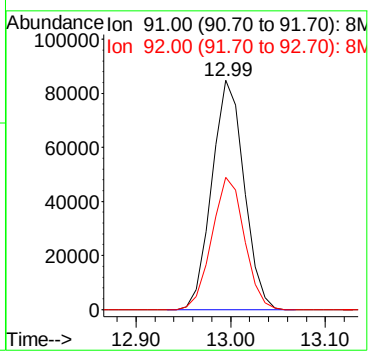


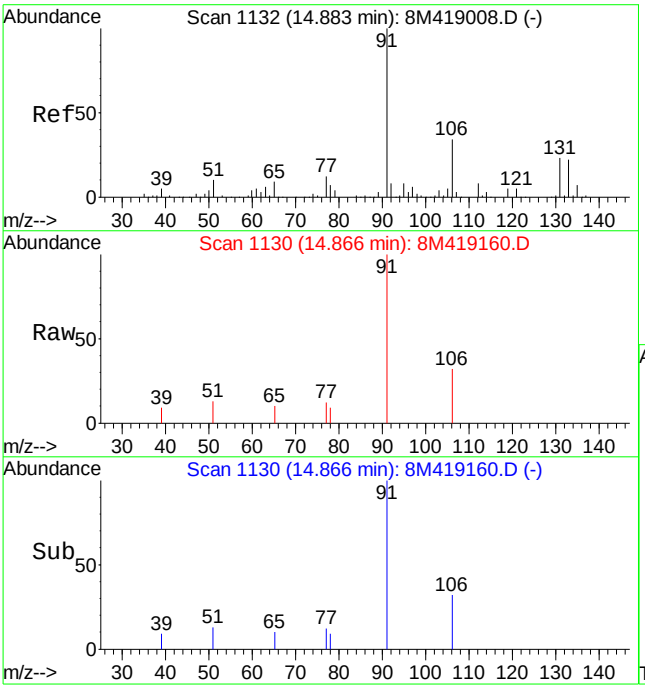


#59
Toluene
Concen: 6.40 ug/L
RT: 12.99 min Scan# 949
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion: 91 Resp: 199968

Ion	Ratio	Lower	Upper
91	100		
92	58.0	35.9	83.7

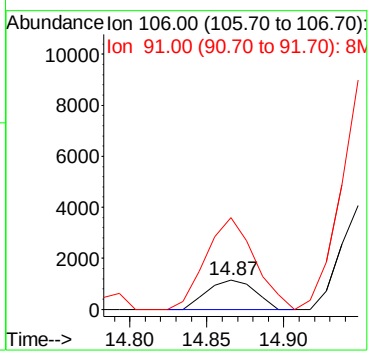


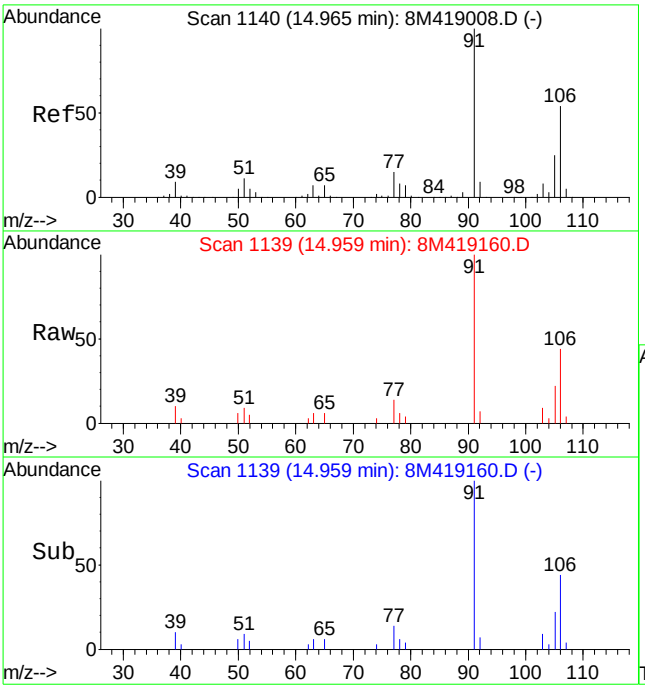


#72
Ethylbenzene
Concen: 0.20 ug/L
RT: 14.87 min Scan# 1130
Delta R.T. -0.02 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion:106 Resp: 2508

Ion	Ratio	Lower	Upper
106	100		
91	316.0	179.2	418.2

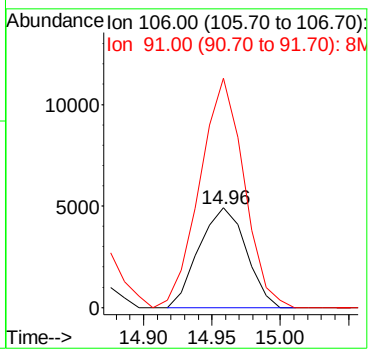


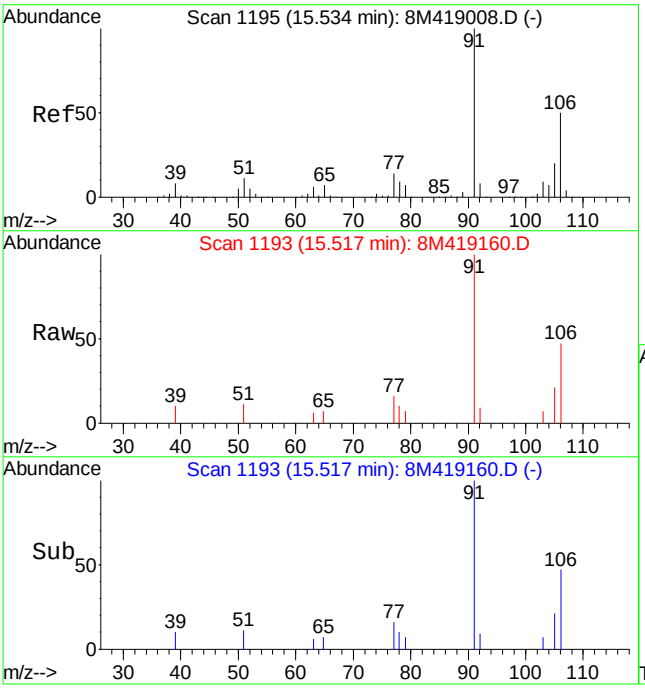


#73
m-,p-Xylene
Concen: 0.81 ug/L
RT: 14.96 min Scan# 1139
Delta R.T. -0.01 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion:106 Resp: 11757

Ion	Ratio	Lower	Upper
106	100		
91	215.7	113.4	264.6

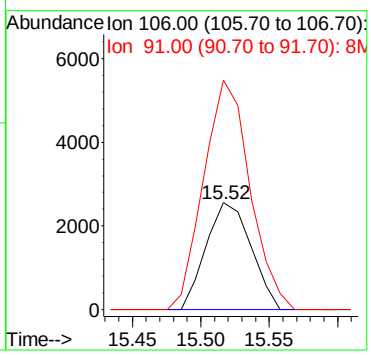




#74
o-Xylene
Concen: 0.40 ug/L
RT: 15.52 min Scan# 1193
Delta R.T. -0.01 min
Lab File: 8M419160.D
Acq: 25 Apr 2017 23:16

Tgt Ion:106 Resp: 5829

Ion	Ratio	Lower	Upper
106	100		
91	221.3	123.4	287.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419182.D Vial: 19
Acq On : 26 Apr 2017 16:58 Operator: TMB
Sample : L17041075-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 17:20:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

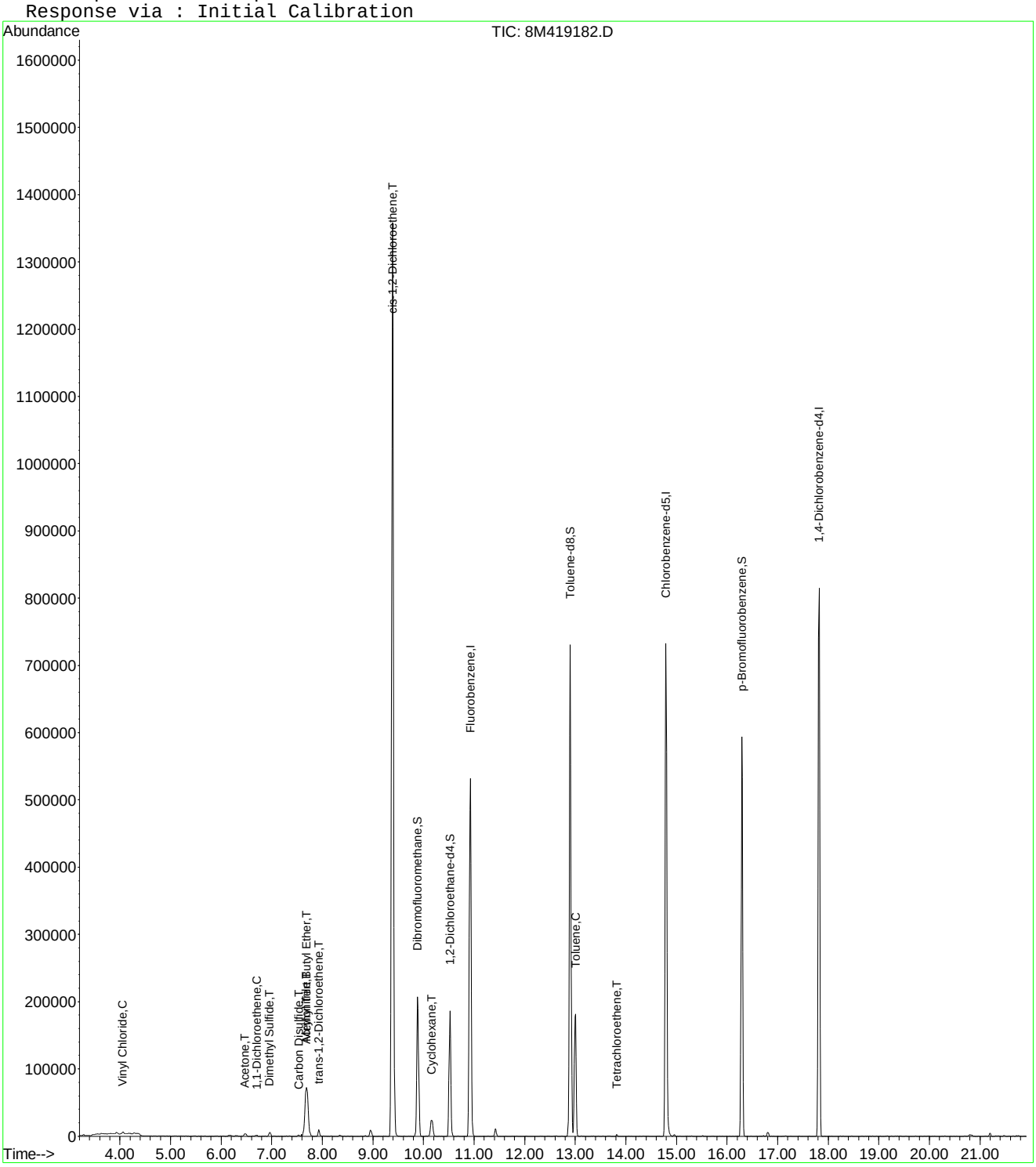
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	654952	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	533501	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	274518	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	173777	25.2963 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.20%		
43) 1,2-Dichloroethane-d4	10.52	65	155801	26.2341 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.92%		
58) Toluene-d8	12.90	98	638213	26.1814 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.72%		
80) p-Bromofluorobenzene	16.29	95	255742	26.3963 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.60%		
Target Compounds					Qvalue
4) Vinyl Chloride	4.05	62	2864	0.2737 ug/L	93
13) Acetone	6.47	43	8116	8.8108 ug/L	86
14) 1,1-Dichloroethene	6.70	61	1415	0.1492 ug/L	98
16) Dimethyl Sulfide	6.96	62	4217	0.6675 ug/L	88
20) Carbon Disulfide	7.54	76	3073	0.1558 ug/L #	74
21) Acrylonitrile	7.68	53	1253	0.9806 ug/L #	10
22) Methyl Tert Butyl Ether	7.69	73	161700	12.0395 ug/L	96
23) trans-1,2-Dichloroethene	7.93	61	8006	0.8675 ug/L	86
32) cis-1,2-Dichloroethene	9.39	96	776670	101.8224 ug/L	93
39) Cyclohexane	10.16	56	20064	2.0292 ug/L	84
59) Toluene	13.00	91	186579	6.2828 ug/L	97
66) Tetrachloroethene	13.82	164	840	0.1347 ug/L #	64

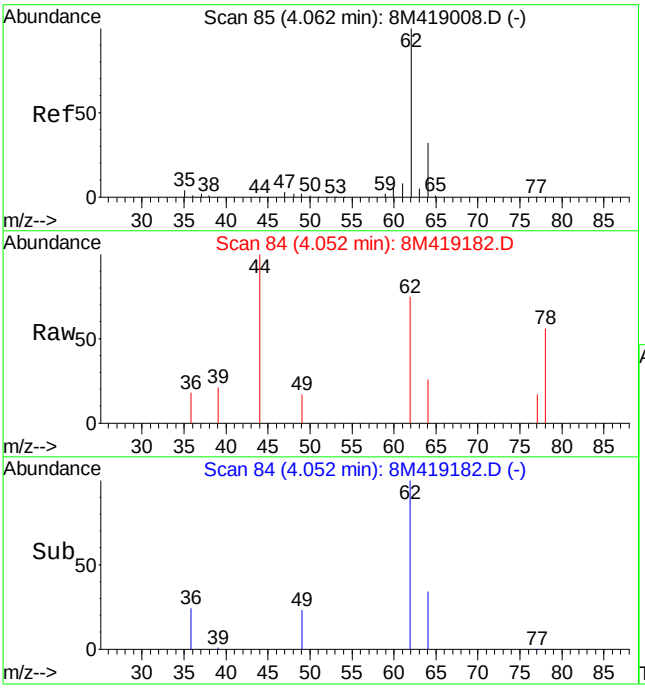
(#) = qualifier out of range (m) = manual integration
8M419182.D 8260WT.M Thu Apr 27 08:32:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419182.D Vial: 19
Acq On : 26 Apr 2017 16:58 Operator: TMB
Sample : L17041075-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 17:20 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

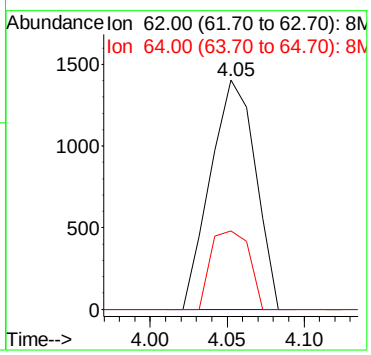


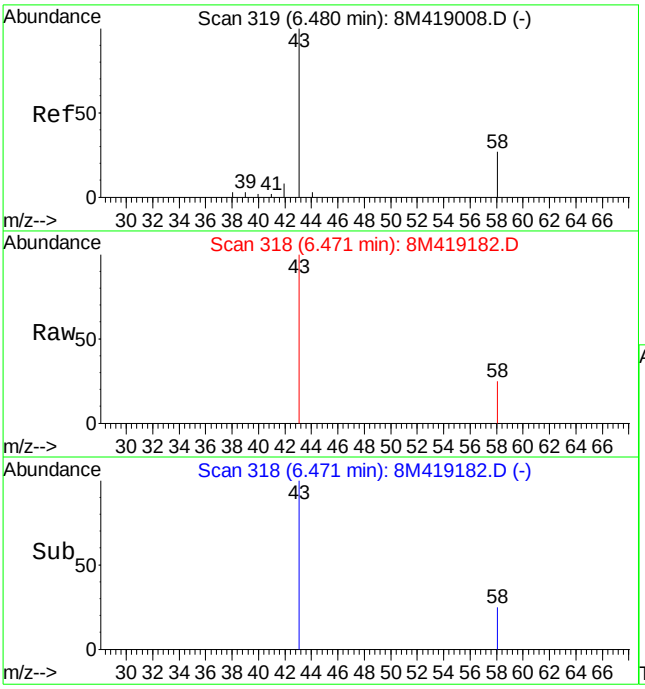


#4
Vinyl Chloride
Concen: 0.27 ug/L
RT: 4.05 min Scan# 84
Delta R.T. -0.00 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 62 Resp: 2864

Ion	Ratio	Lower	Upper
62	100		
64	29.1	19.9	46.3

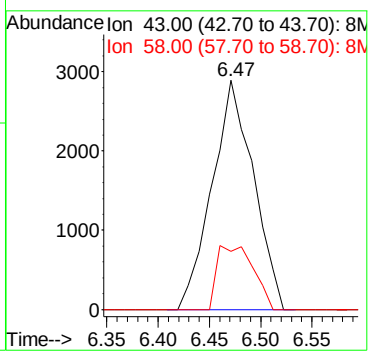


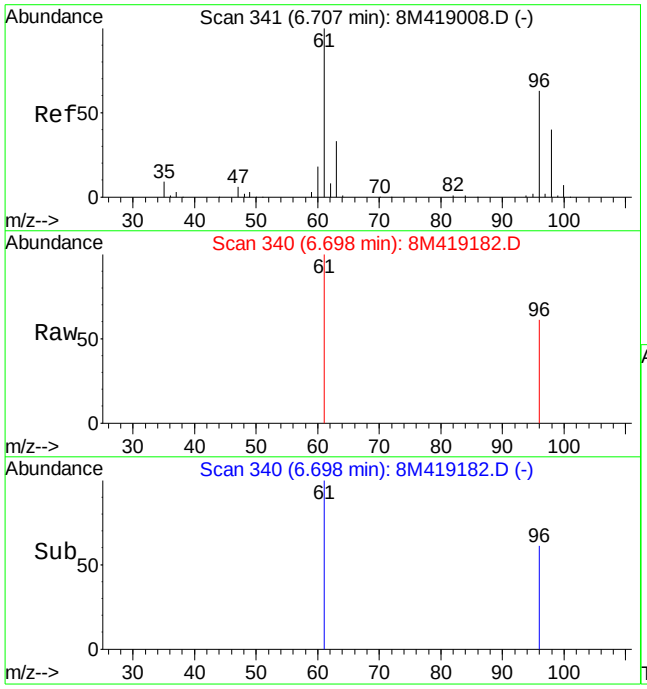


#13
Acetone
Concen: 8.81 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 43 Resp: 8116

Ion	Ratio	Lower	Upper
43	100		
58	24.3	19.4	45.4

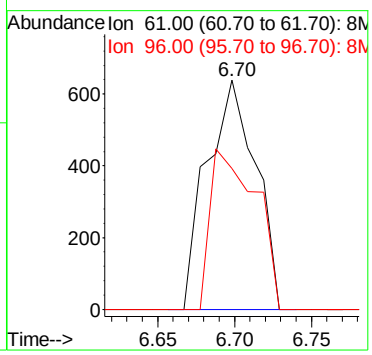


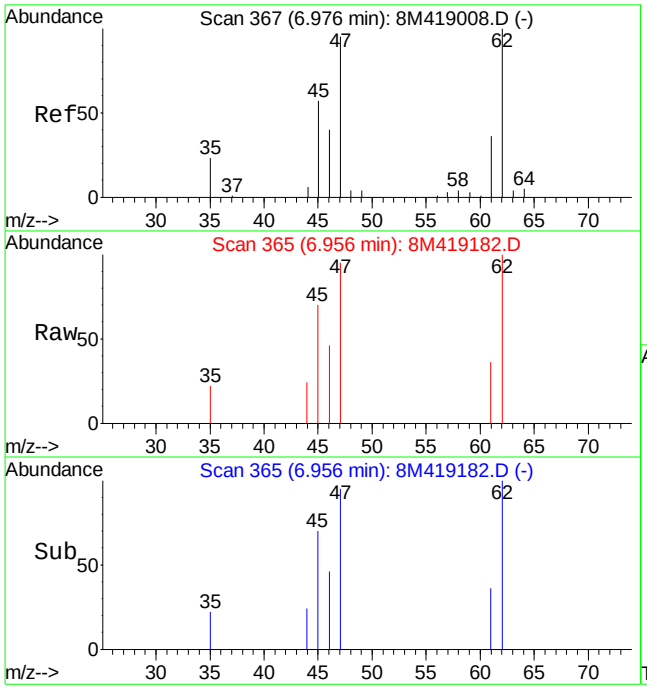


#14
1,1-Dichloroethene
Concen: 0.15 ug/L
RT: 6.70 min Scan# 340
Delta R.T. -0.00 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 61 Resp: 1415

Ion	Ratio	Lower	Upper
61	100		
96	65.4	40.0	93.4

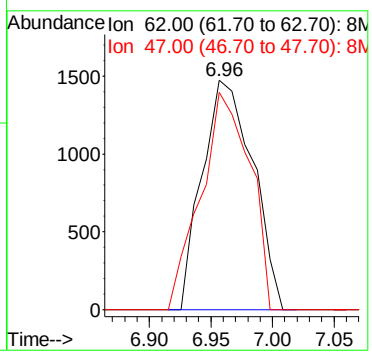


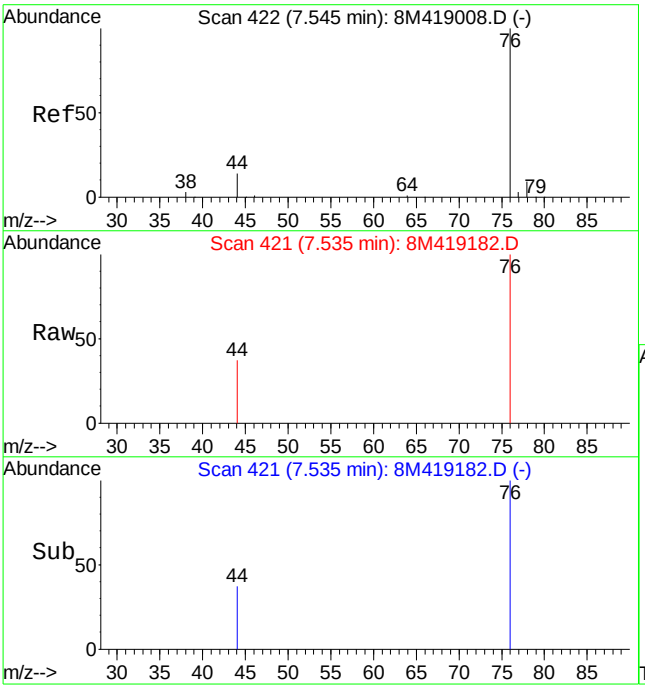


#16
Dimethyl Sulfide
Concen: 0.67 ug/L
RT: 6.96 min Scan# 365
Delta R.T. -0.02 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 62 Resp: 4217

Ion	Ratio	Lower	Upper
62	100		
47	92.2	49.0	114.4

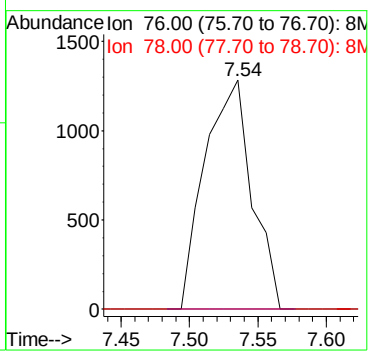


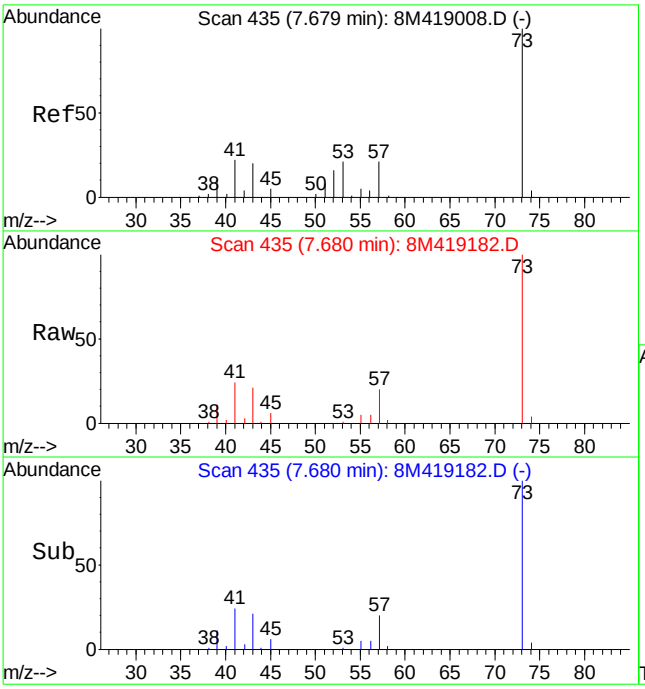


#20
Carbon Disulfide
Concen: 0.16 ug/L
RT: 7.54 min Scan# 421
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 76 Resp: 3073

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#

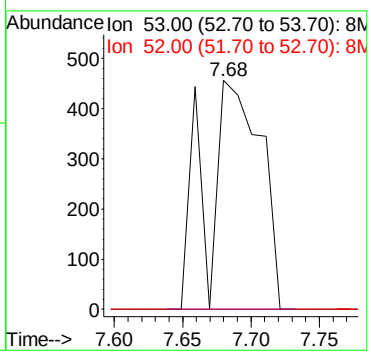


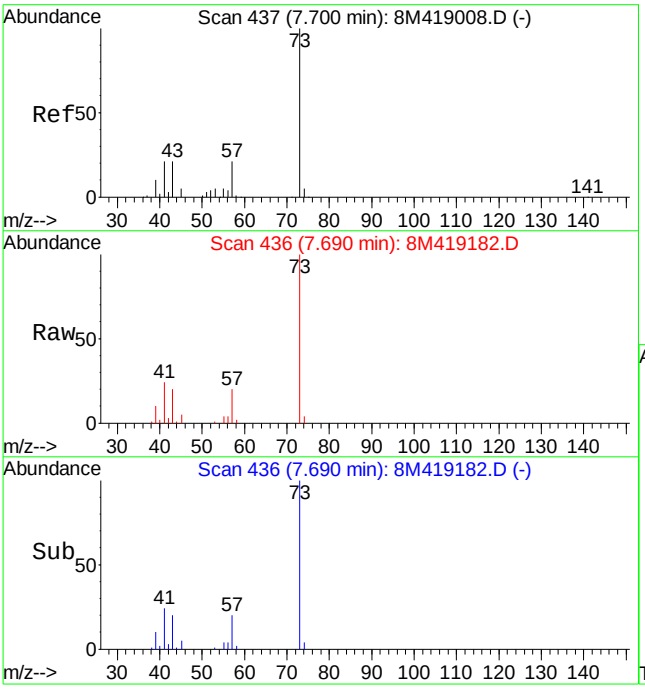


#21
Acrylonitrile
Concen: 0.98 ug/L
RT: 7.68 min Scan# 435
Delta R.T. 0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 53 Resp: 1253

Ion	Ratio	Lower	Upper
53	100		
52	0.0	46.8	109.2#

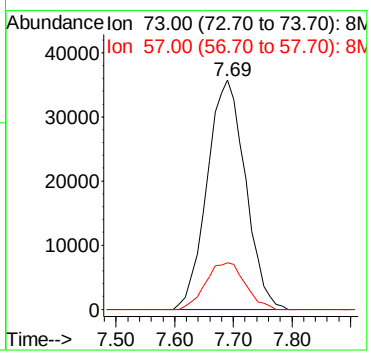


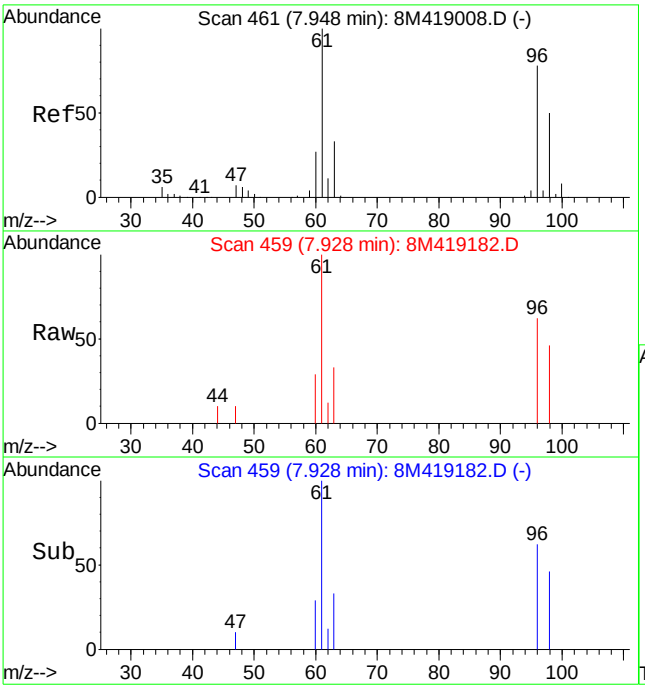


#22
Methyl Tert Butyl Ether
Concen: 12.04 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 73 Resp: 161700

Ion	Ratio	Lower	Upper
73	100		
57	20.9	11.4	26.6

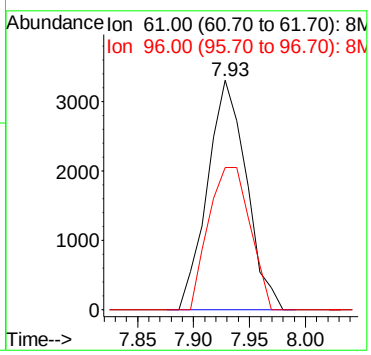


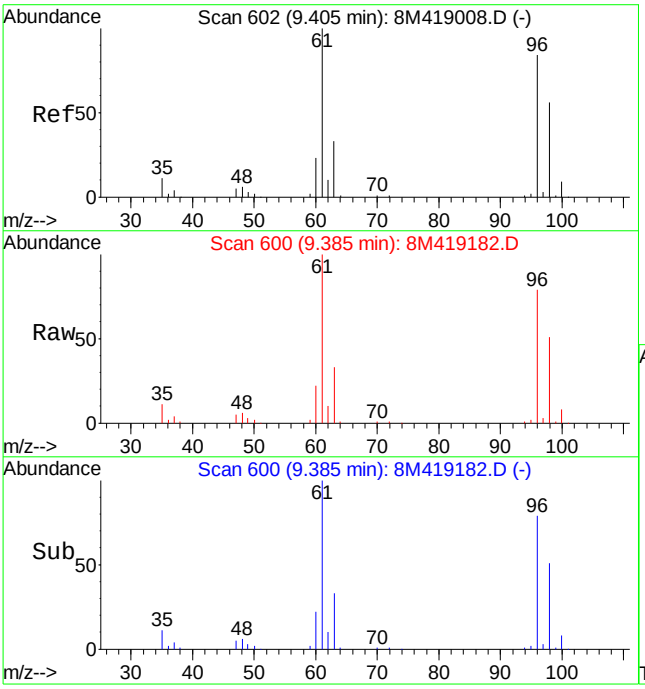


#23
trans-1,2-Dichloroethene
Concen: 0.87 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 61 Resp: 8006

Ion	Ratio	Lower	Upper
61	100		
96	66.0	47.2	110.0

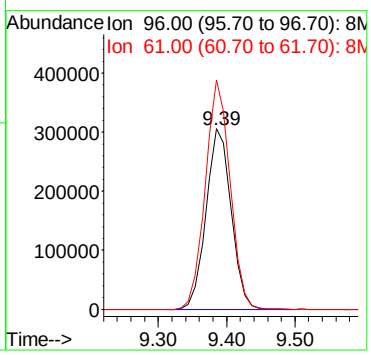


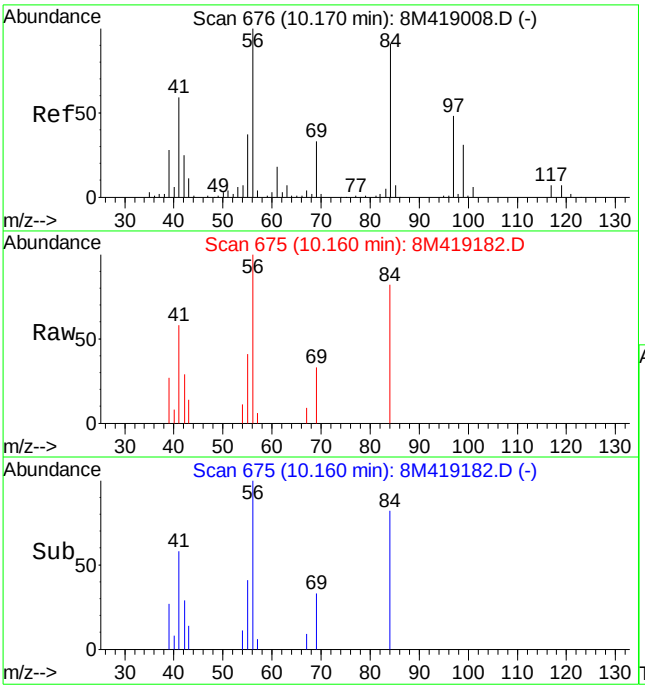


#32
cis-1,2-Dichloroethene
Concen: 101.82 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 96 Resp: 776670

Ion	Ratio	Lower	Upper
96	100		
61	125.9	80.3	187.3

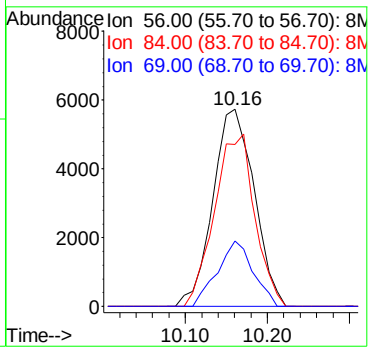


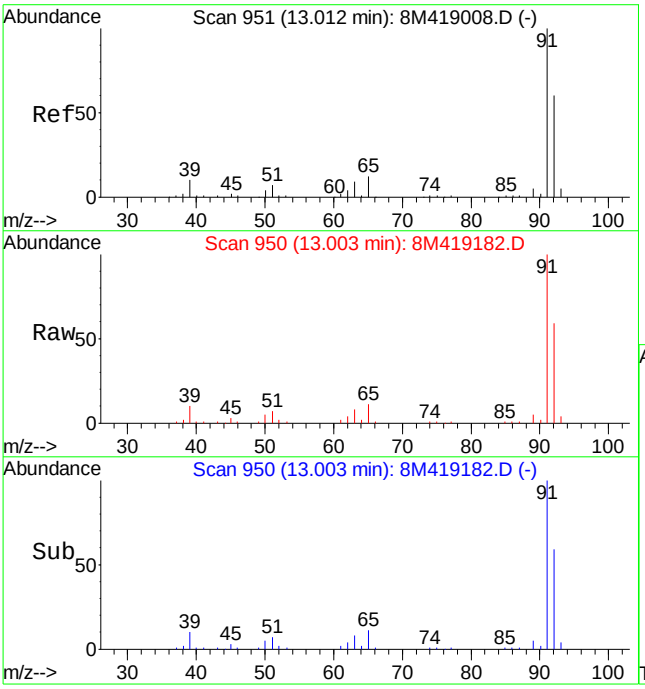


#39
Cyclohexane
Concen: 2.03 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 56 Resp: 20064

Ion	Ratio	Lower	Upper
56	100		
84	85.2	61.6	143.8
69	28.7	21.4	50.0

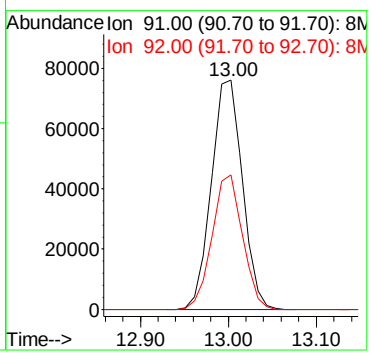


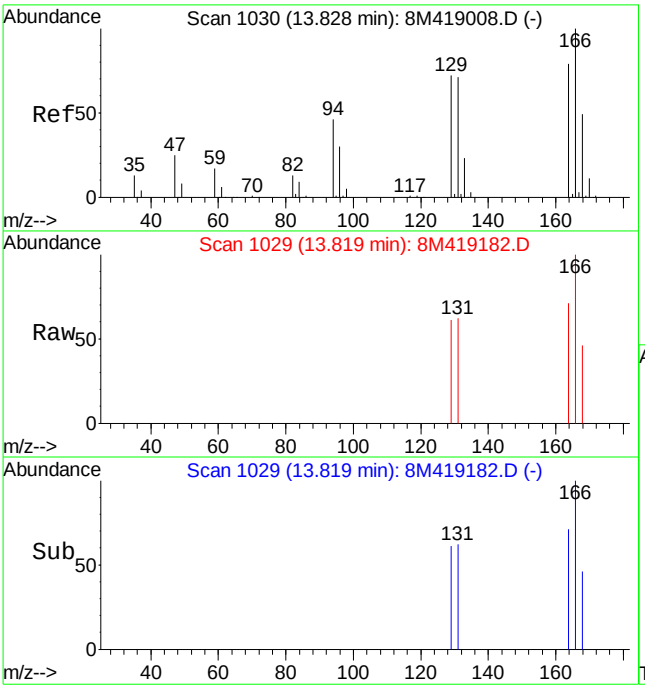


#59
Toluene
Concen: 6.28 ug/L
RT: 13.00 min Scan# 950
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion: 91 Resp: 186579

Ion	Ratio	Lower	Upper
91	100		
92	57.5	35.9	83.7

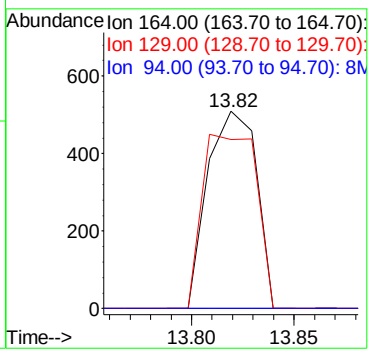




#66
Tetrachloroethene
Concen: 0.13 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419182.D
Acq: 26 Apr 2017 16:58

Tgt Ion:164 Resp: 840

Ion	Ratio	Lower	Upper
164	100		
129	97.9	53.4	124.6
94	0.0	34.7	81.1#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419183.D Vial: 20
Acq On : 26 Apr 2017 17:27 Operator: TMB
Sample : L17041075-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 17:49:25 2017 Quant Results File: 8260WT.RES

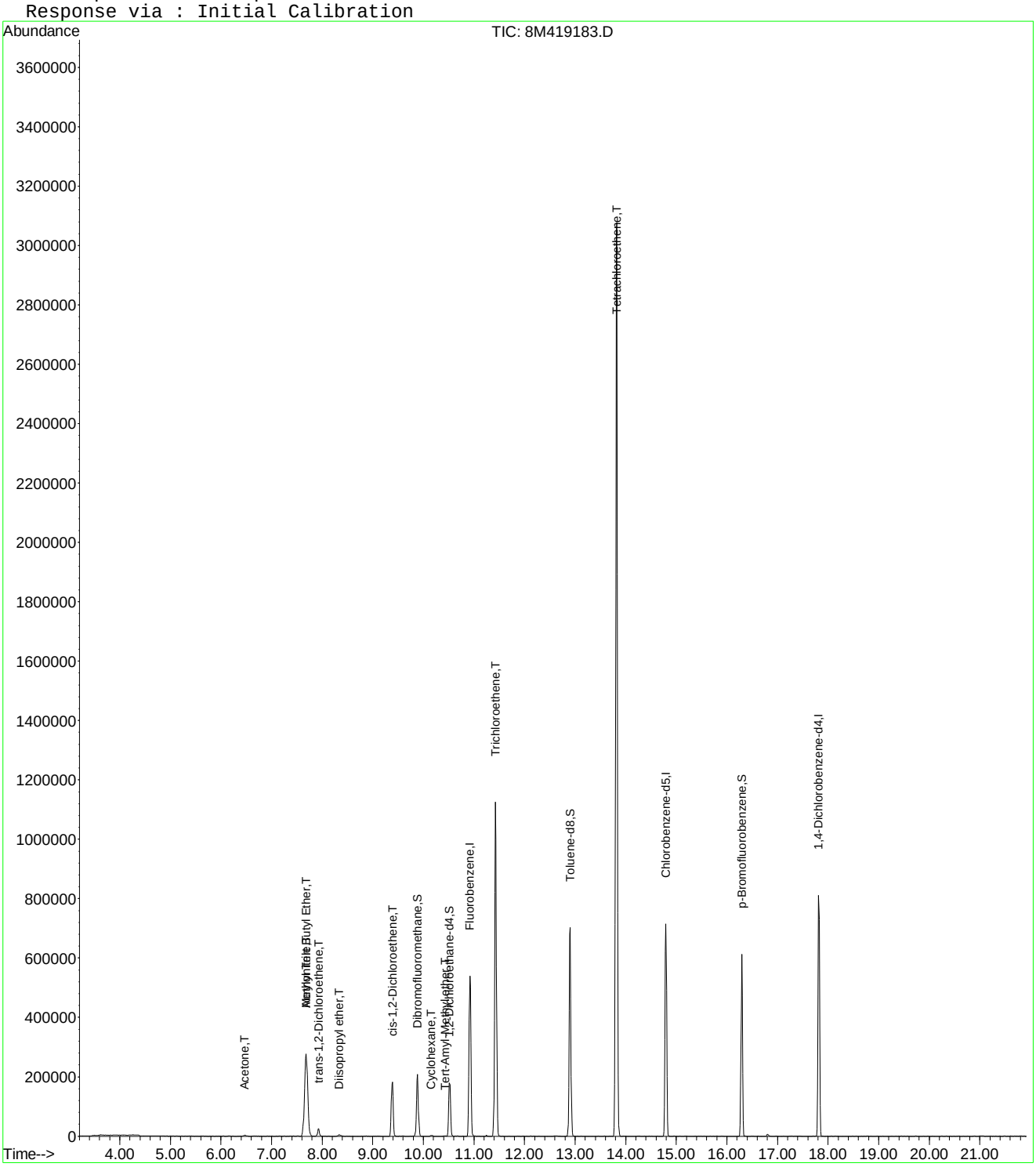
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

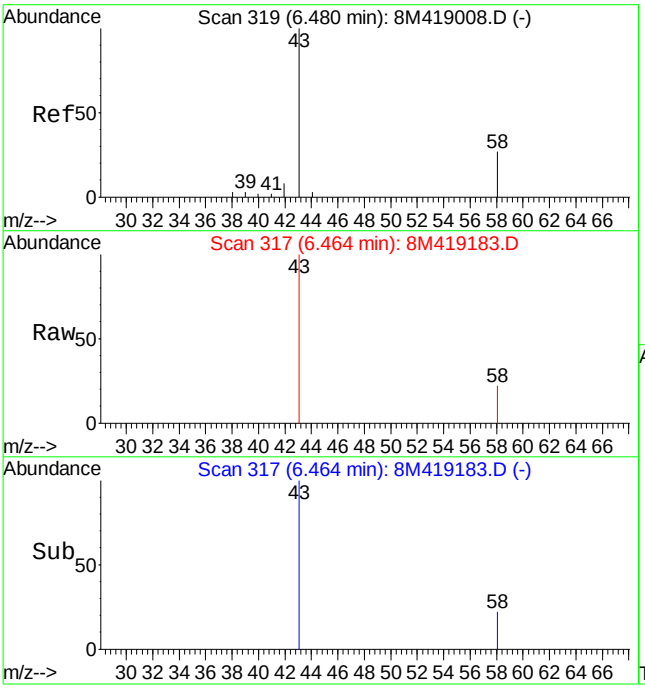
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	664080	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	535352	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	273029	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176836	25.3877	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.52	65	156525	25.9937	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.96%			
58) Toluene-d8	12.90	98	647043	26.4518	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.80%			
80) p-Bromofluorobenzene	16.29	95	255718	26.5377	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.16%			
Target Compounds						Qvalue
13) Acetone	6.46	43	7090	7.5911	ug/L #	77
21) Acrylonitrile	7.68	53	5857	4.5208	ug/L #	10
22) Methyl Tert Butyl Ether	7.68	73	597768	43.8954	ug/L	96
23) trans-1,2-Dichloroethene	7.93	61	20814	2.2244	ug/L	91
25) Diisopropyl ether	8.33	45	8132	0.3883	ug/L #	88
32) cis-1,2-Dichloroethene	9.39	96	111507	14.4178	ug/L	92
39) Cyclohexane	10.15	56	2602	0.2595	ug/L #	73
41) Tert-Amyl-Methyl ether	10.43	73	1946	0.1220	ug/L #	57
47) Trichloroethene	11.42	130	470429	61.0415	ug/L	100
66) Tetrachloroethene	13.82	164	937746	149.8118	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419183.D 8260WT.M Thu Apr 27 08:32:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419183.D Vial: 20
Acq On : 26 Apr 2017 17:27 Operator: TMB
Sample : L17041075-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 17:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

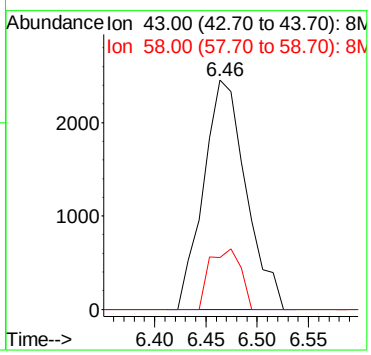


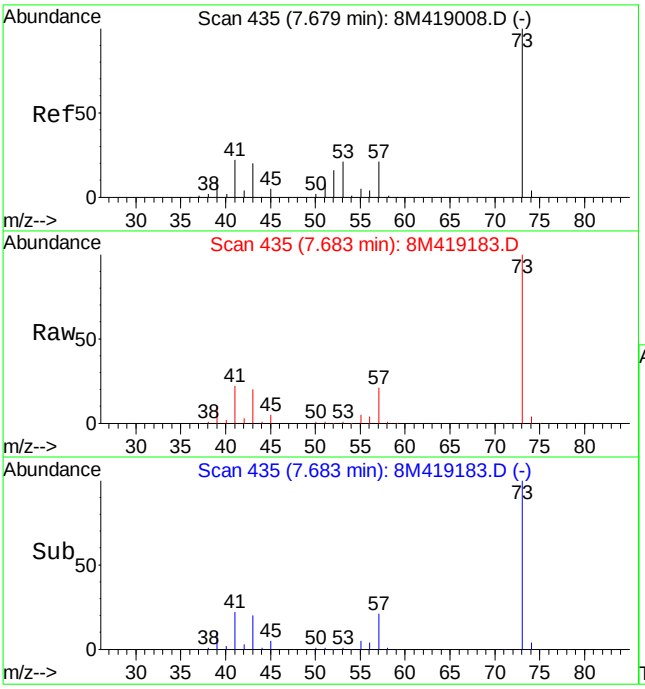


#13
Acetone
Concen: 7.59 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 43 Resp: 7090

Ion	Ratio	Lower	Upper
43	100		
58	19.3	19.4	45.4#

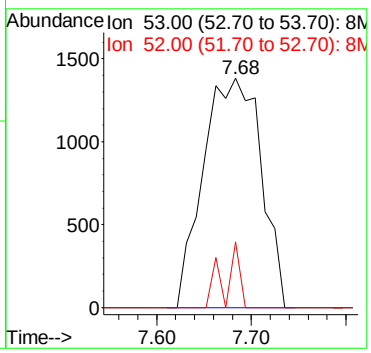


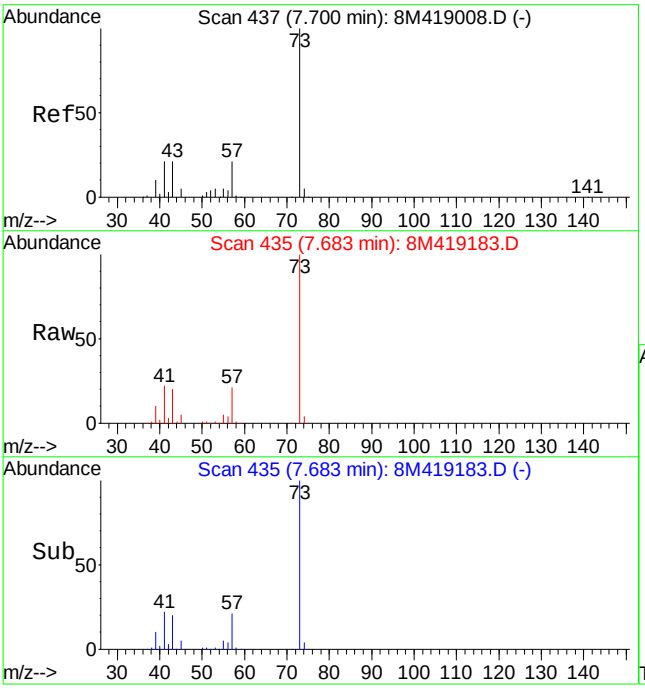


#21
Acrylonitrile
Concen: 4.52 ug/L
RT: 7.68 min Scan# 435
Delta R.T. 0.01 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 53 Resp: 5857

Ion	Ratio	Lower	Upper
53	100		
52	0.0	46.8	109.2#

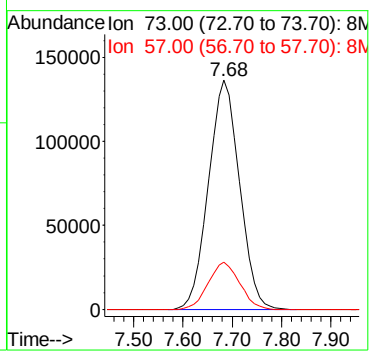


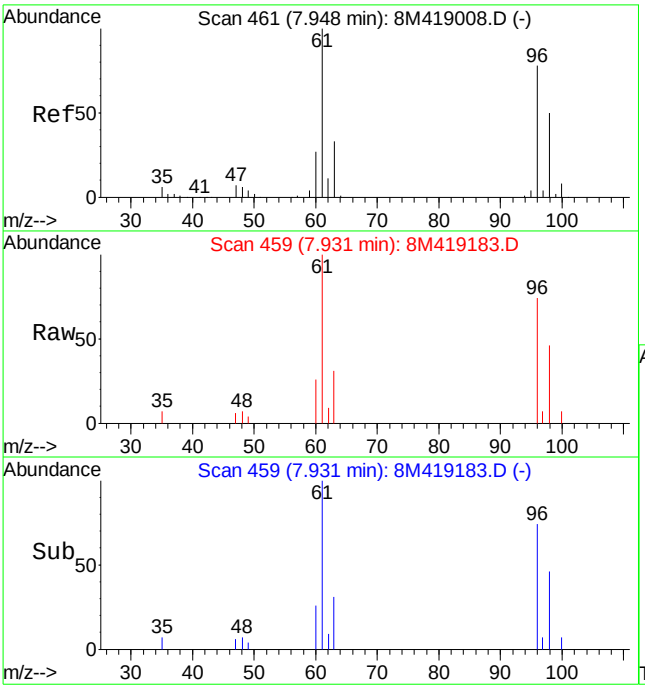


#22
Methyl Tert Butyl Ether
Concen: 43.90 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 73 Resp: 597768

Ion	Ratio	Lower	Upper
73	100		
57	20.8	11.4	26.6

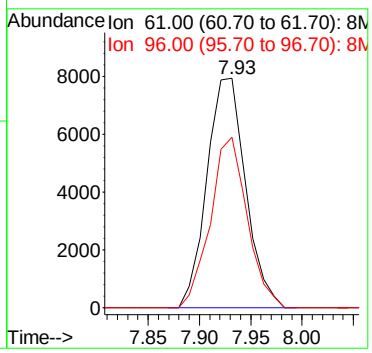


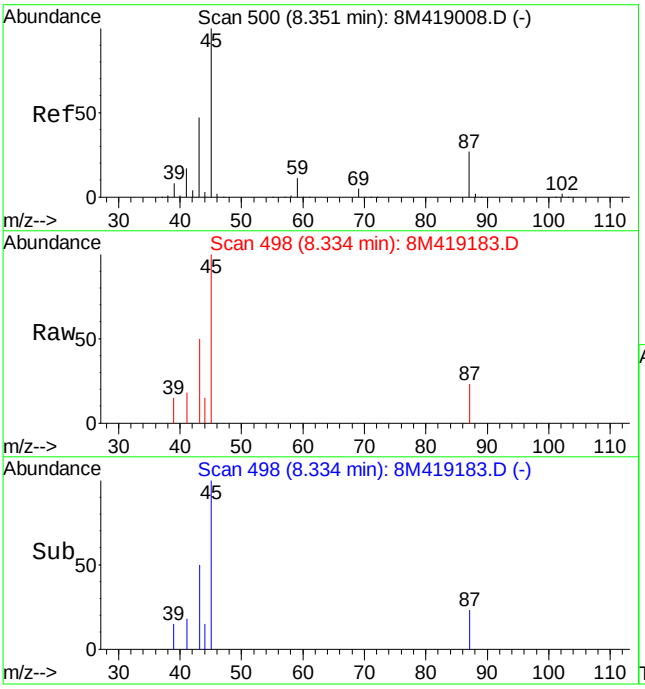


#23
trans-1,2-Dichloroethene
Concen: 2.22 ug/L
RT: 7.93 min Scan# 459
Delta R.T. -0.01 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 61 Resp: 20814

Ion	Ratio	Lower	Upper
61	100		
96	70.5	47.2	110.0

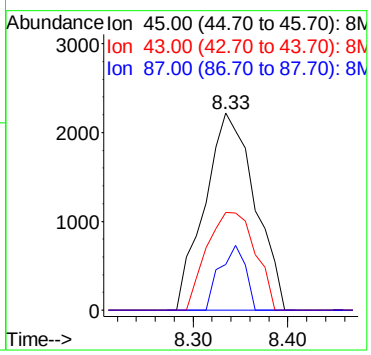


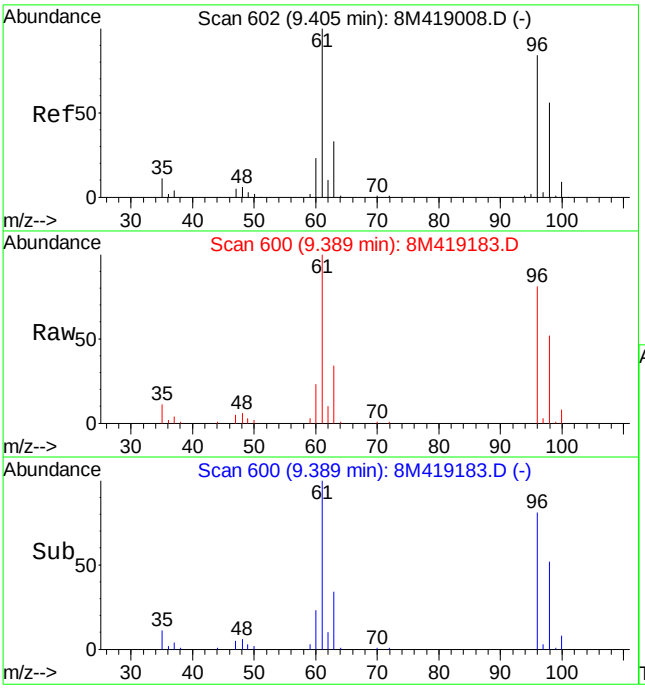


#25
Diisopropyl ether
Concen: 0.39 ug/L
RT: 8.33 min Scan# 498
Delta R.T. -0.02 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 45 Resp: 8132

Ion	Ratio	Lower	Upper
45	100		
43	48.0	29.2	68.2
87	16.9	19.6	45.6#

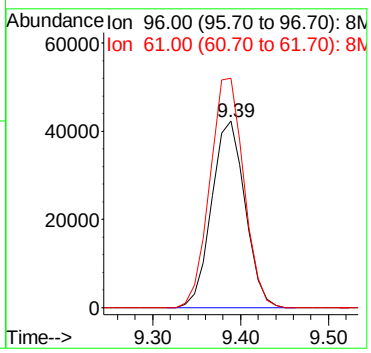


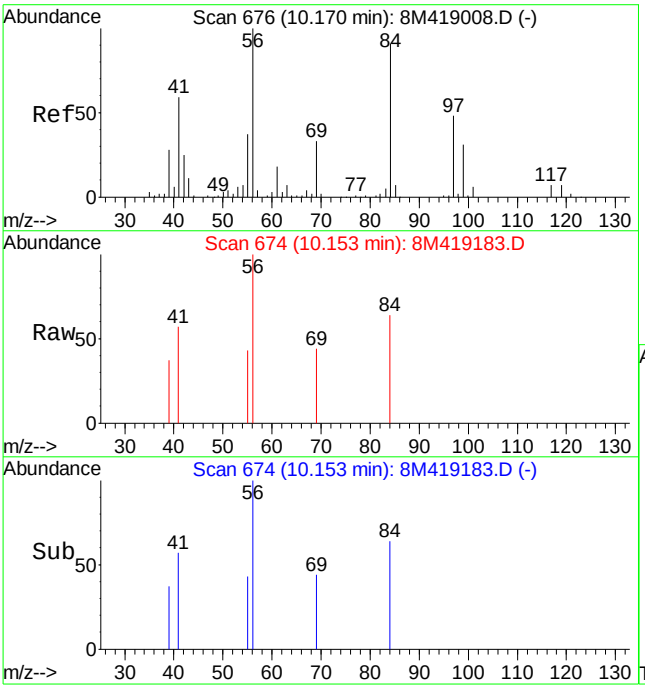


#32
cis-1,2-Dichloroethene
Concen: 14.42 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 96 Resp: 111507

Ion	Ratio	Lower	Upper
96	100		
61	124.9	80.3	187.3

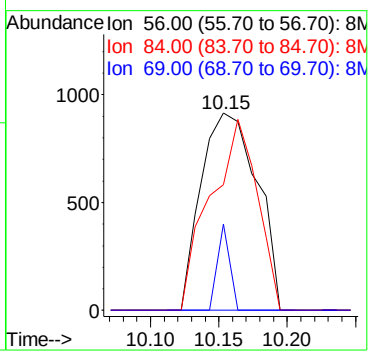


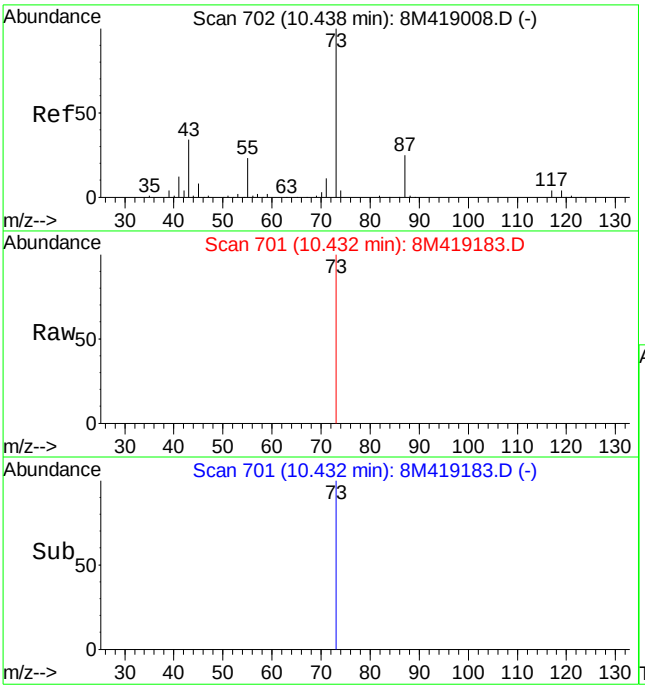


#39
Cyclohexane
Concen: 0.26 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 56 Resp: 2602

Ion	Ratio	Lower	Upper
56	100		
84	80.9	61.6	143.8
69	9.6	21.4	50.0#

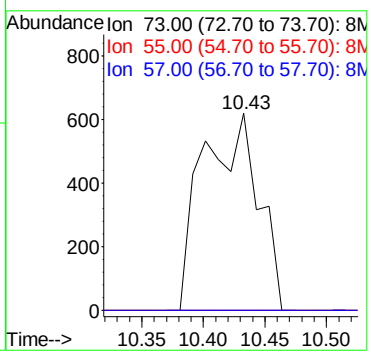


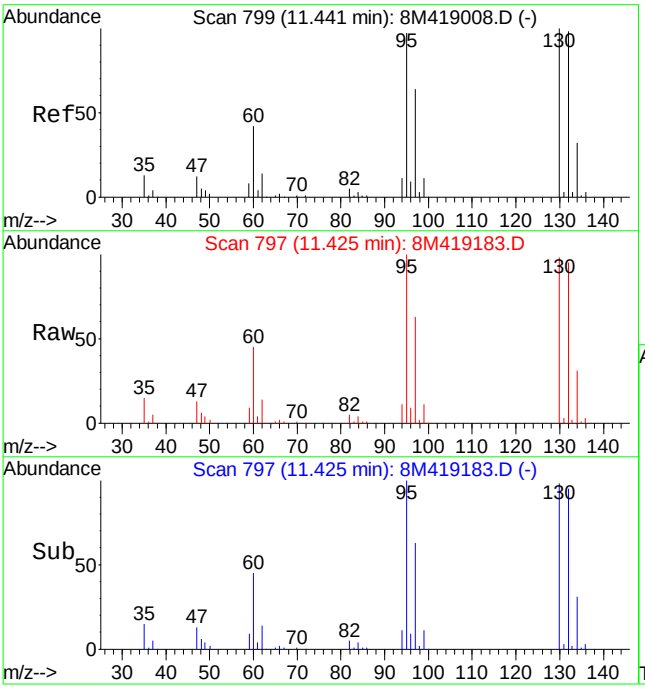


#41
Tert-Amyl-Methyl ether
Concen: 0.12 ug/L
RT: 10.43 min Scan# 701
Delta R.T. -0.01 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion: 73 Resp: 1946

Ion	Ratio	Lower	Upper
73	100		
55	0.0	13.0	30.2#
57	0.0	1.1	2.5#

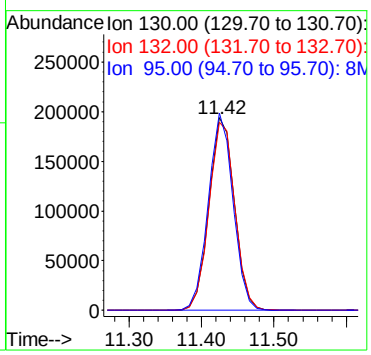


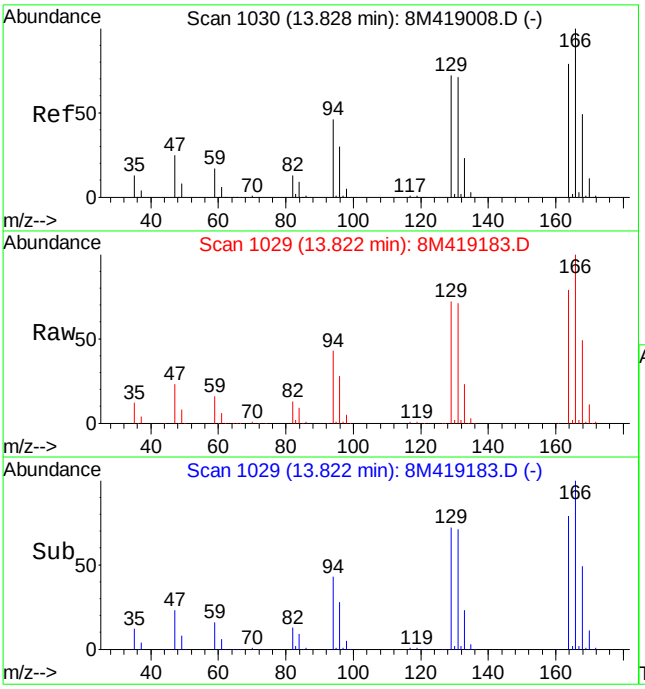


#47
Trichloroethene
Concen: 61.04 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion:130 Resp: 470429

Ion	Ratio	Lower	Upper
130	100		
132	99.1	59.4	138.6
95	99.9	60.1	140.3

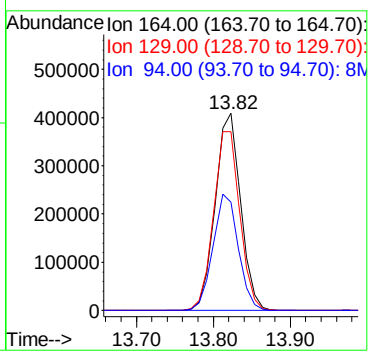




#66
Tetrachloroethene
Concen: 149.81 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419183.D
Acq: 26 Apr 2017 17:27

Tgt Ion:164 Resp: 937746

Ion	Ratio	Lower	Upper
164	100		
129	93.5	53.4	124.6
94	58.9	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273044.D Vial: 17
Acq On : 26 Apr 2017 21:36 Operator: ADC
Sample : L17041075-23 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:48 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

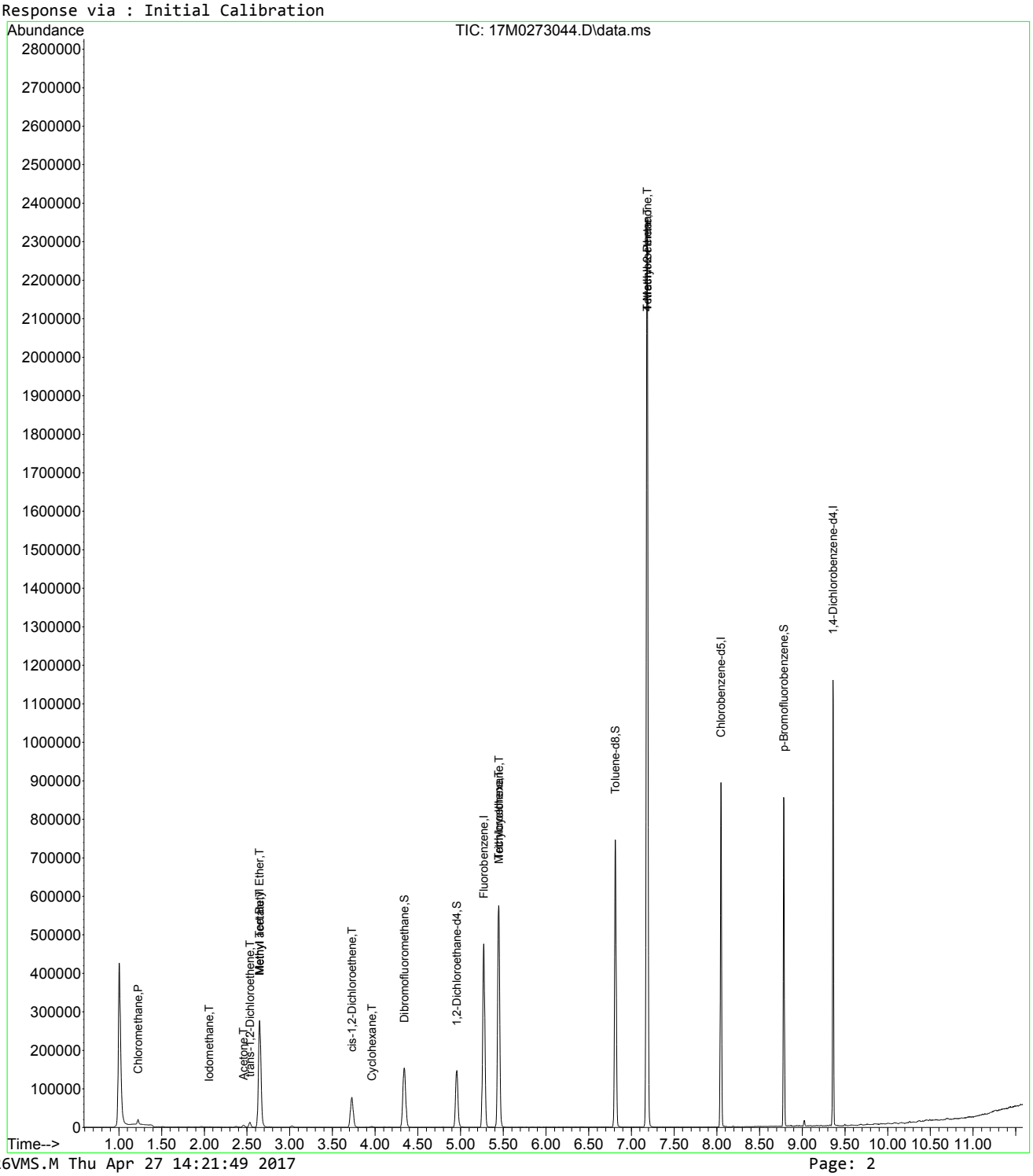
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417684	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	309260	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	156237	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	113525	25.1668	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.667%			
34) 1,2-Dichloroethane-d4	4.953	65	108965	25.7713	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.085%			
47) Toluene-d8	6.812	98	405282	26.2589	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.036%			
66) p-Bromofluorobenzene	8.784	95	141272	27.0055	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.022%			
Target Compounds						Qvalue
3) Chloromethane	1.224	50	625	0.1287	ug/L #	42
13) Iodomethane	2.055	142	324	2.0512	ug/L #	35
16) Acetone	2.460	43	7124	8.4828	ug/L	94
17) trans-1,2-Dichloroethene	2.532	96	5052	1.1500	ug/L	100
18) Methyl acetate	2.648	43	59162	26.8711	ug/L #	90
19) Methyl Tert Butyl Ether	2.645	73	294069	26.3761	ug/L #	100
23) cis-1,2-Dichloroethene	3.728	96	44782	9.0055	ug/L	100
25) Cyclohexane	3.960	56	1578	0.2351	ug/L #	81
36) Methylcyclohexane	5.448	83	2174	0.3092	ug/L #	1
37) Trichloroethene	5.445	130	188579	35.2888	ug/L	99
44) 4-Methyl-2-Pentanone	7.185	58	231	0.1993	ug/L #	1
49) Tetrachloroethene	7.185	166	571466	103.3352	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

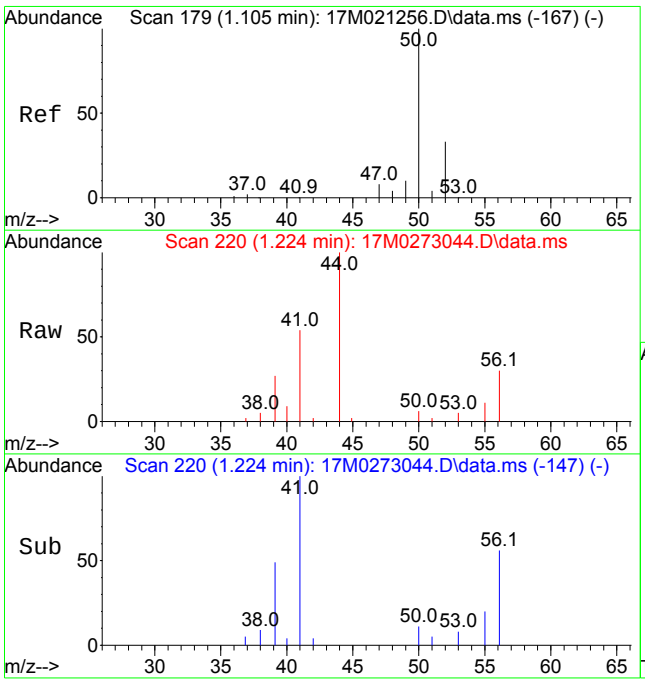
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273044.D Vial: 17
Acq On : 26 Apr 2017 21:36 Operator: ADC
Sample : L17041075-23 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:48 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



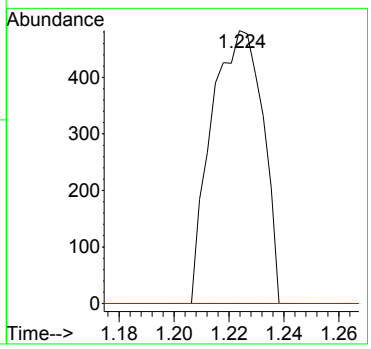
826VMS.M Thu Apr 27 14:21:49 2017 Page: 2

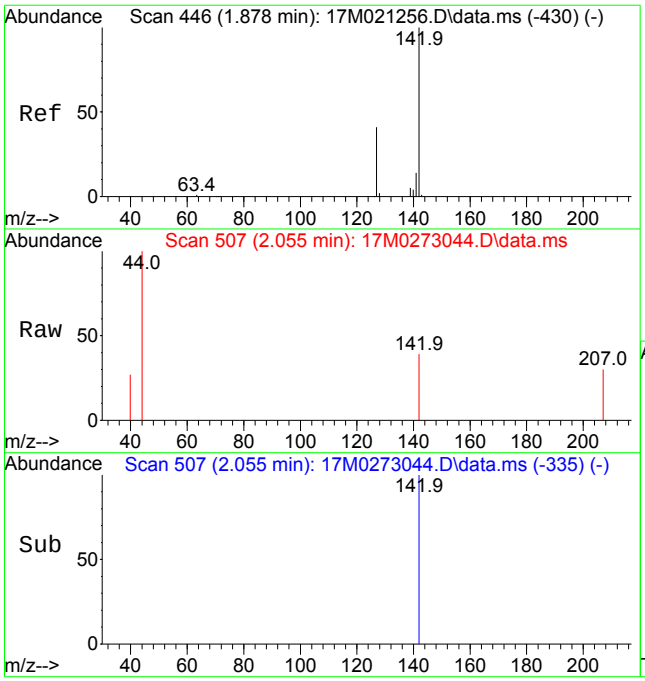


#3
Chloromethane
Concen: 0.1287 ug/L
RT: 1.224 min Scan# 220
Delta R.T. 0.012 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 50 Resp: 625

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

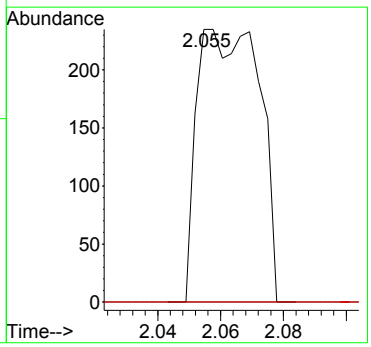


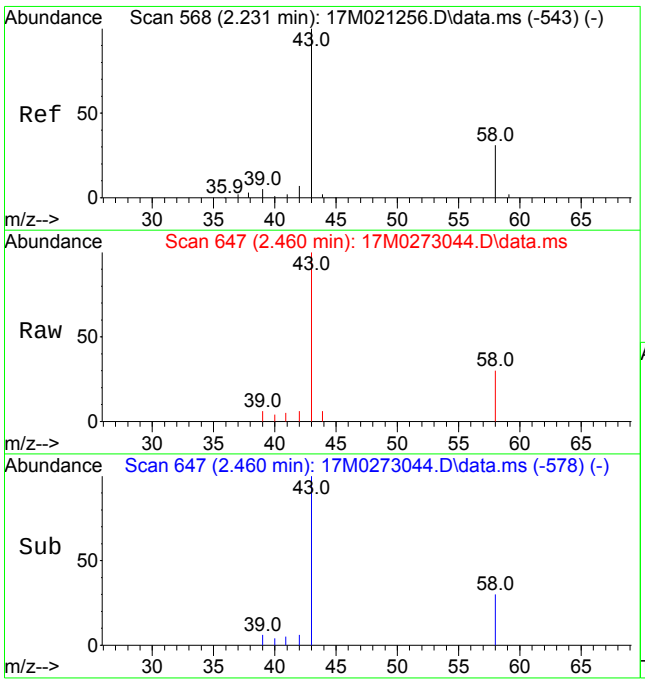


#13
Iodomethane
Concen: 2.0512 ug/L
RT: 2.055 min Scan# 507
Delta R.T. -0.003 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion:142 Resp: 324

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

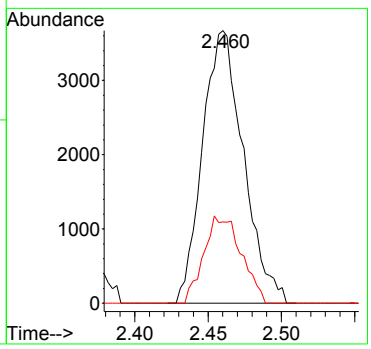


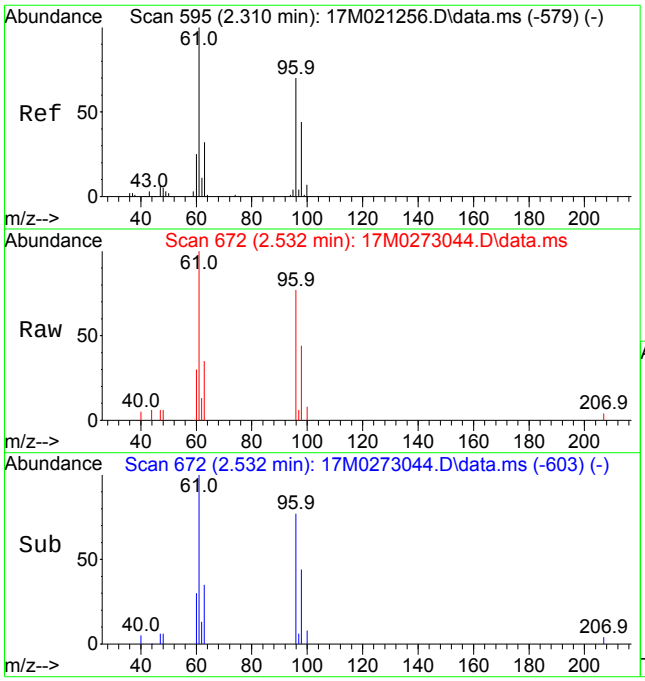


#16
Acetone
Concen: 8.4828 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 43 Resp: 7124

Ion	Ratio	Lower	Upper
43	100		
58	29.2	19.4	45.2

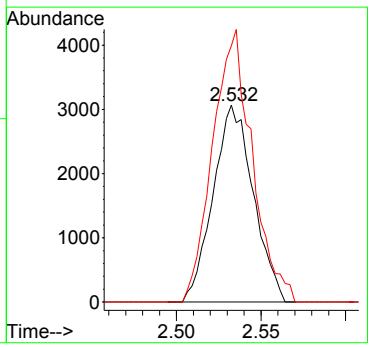


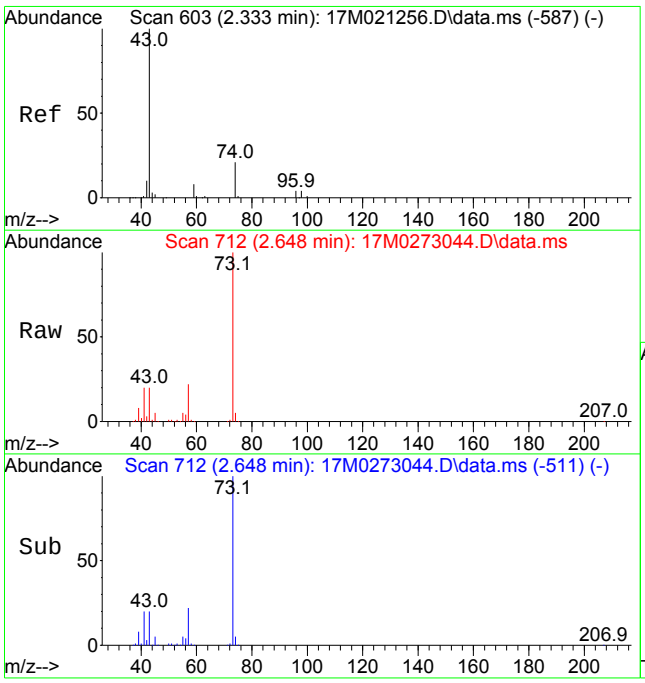


#17
trans-1,2-Dichloroethene
Concen: 1.1500 ug/L
RT: 2.532 min Scan# 672
Delta R.T. 0.000 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 96 Resp: 5052

Ion	Ratio	Lower	Upper
96	100		
61	136.3	109.4	164.0

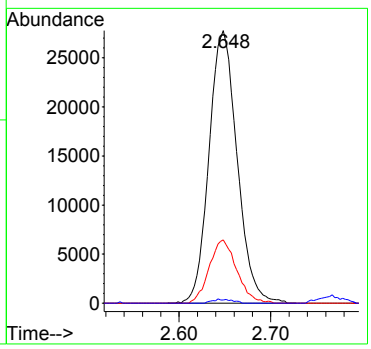


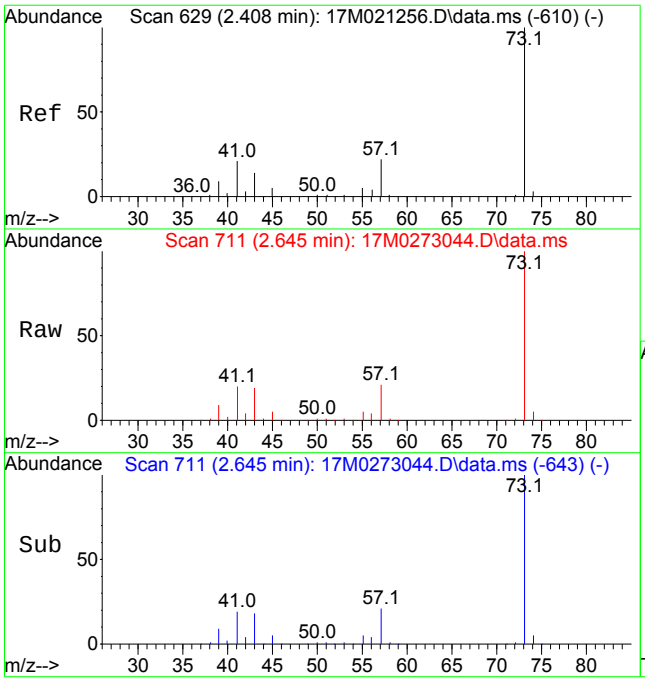


#18
Methyl acetate
Concen: 26.8711 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.081 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 43 Resp: 59162

Ion	Ratio	Lower	Upper
43	100		
74	22.7	25.4	25.4#
59	1.0	7.6	11.4#

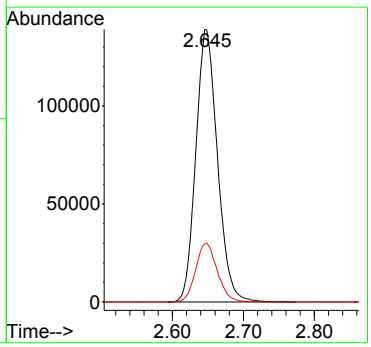


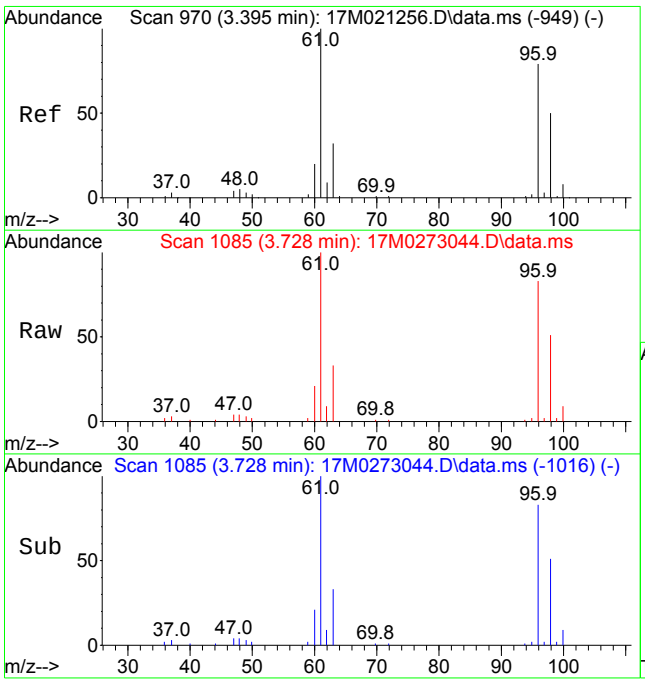


#19
Methyl Tert Butyl Ether
Concen: 26.3761 ug/L
RT: 2.645 min Scan# 711
Delta R.T. -0.003 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 73 Resp: 294069

Ion	Ratio	Lower	Upper
73	100		
57	21.7	0.0	0.0#

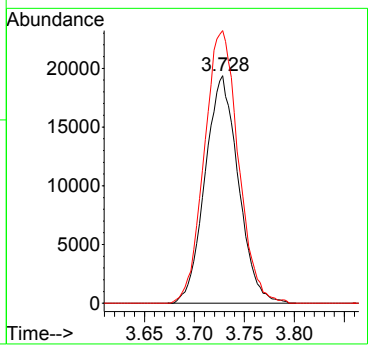


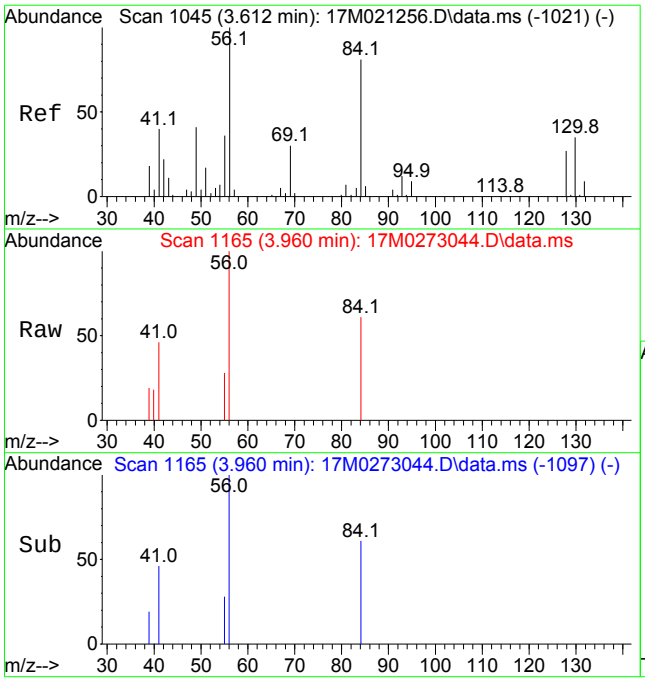


#23
cis-1,2-Dichloroethene
Concen: 9.0055 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 96 Resp: 44782

Ion	Ratio	Lower	Upper
96	100		
61	122.9	98.1	147.1

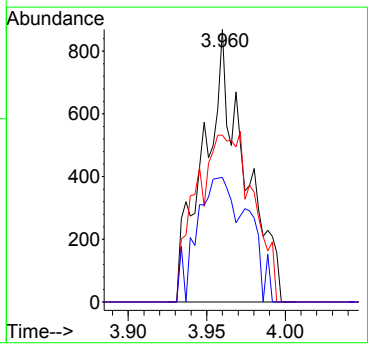


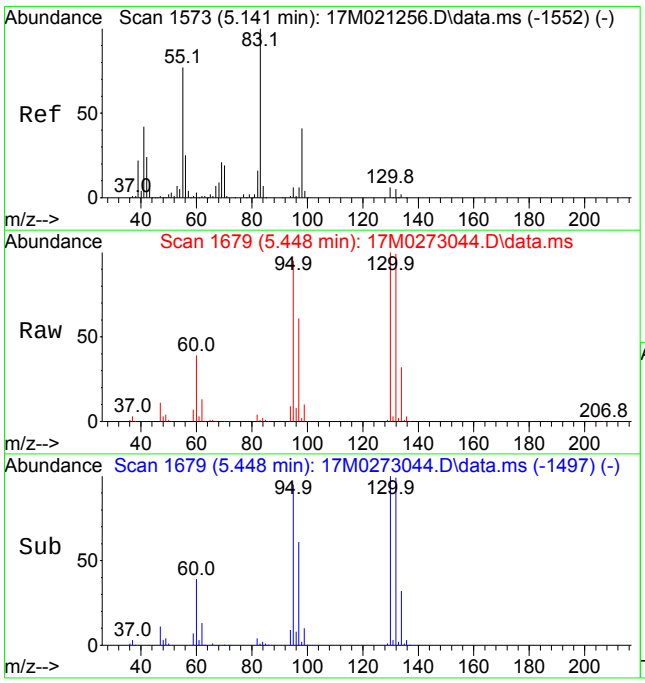


#25
Cyclohexane
Concen: 0.2351 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 56 Resp: 1578

Ion	Ratio	Lower	Upper
56	100		
84	85.6	69.4	104.0
41	56.6	72.2	108.2#

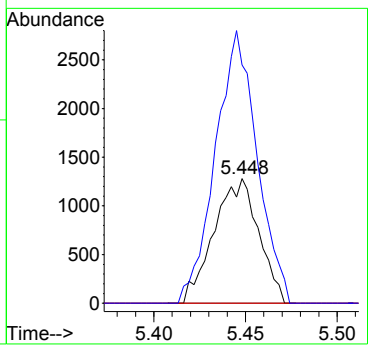


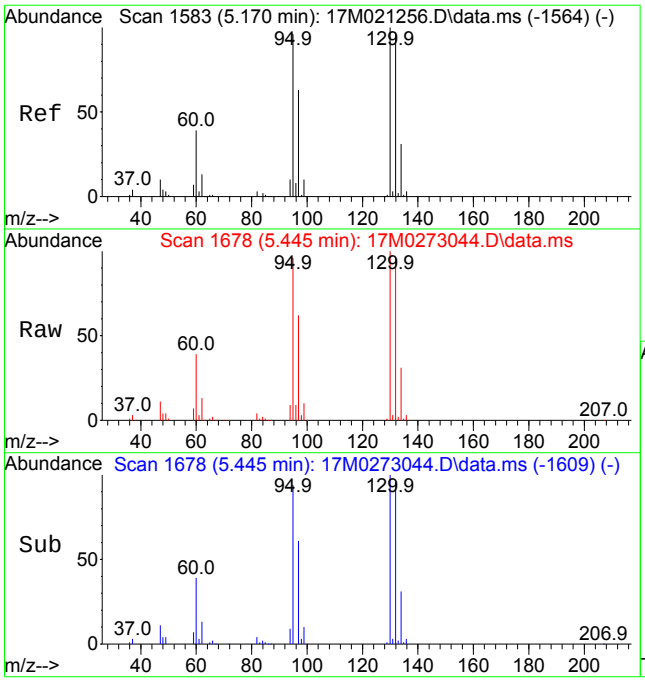


#36
Methylcyclohexane
Concen: 0.3092 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.026 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 83 Resp: 2174

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	203.8	34.4	51.6#

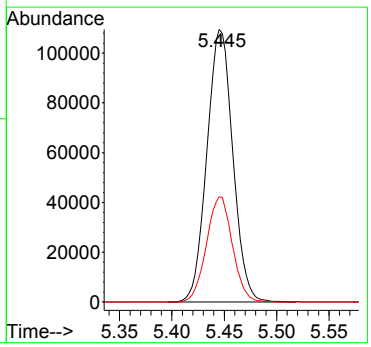


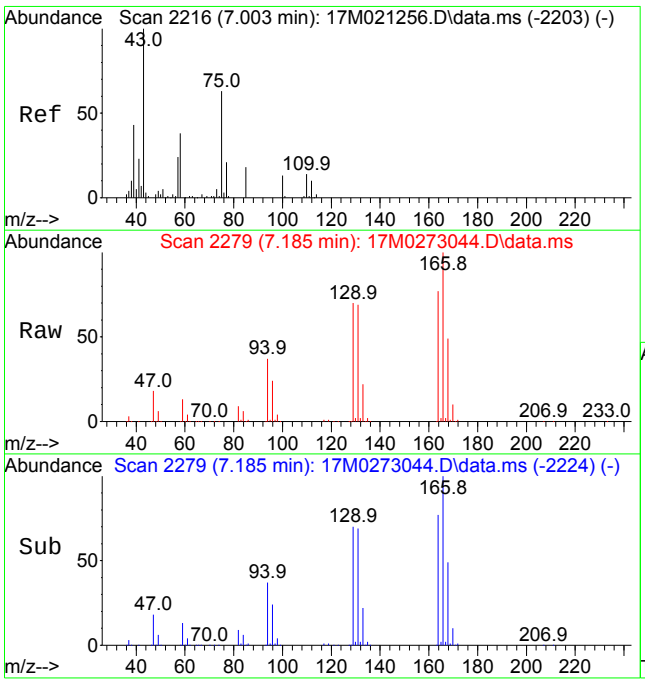


#37
Trichloroethene
Concen: 35.2888 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion:130 Resp: 188579

Ion	Ratio	Lower	Upper
130	100		
60	38.6	22.9	53.3

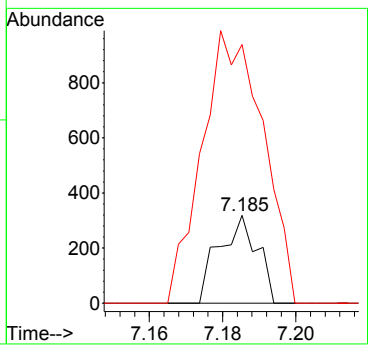


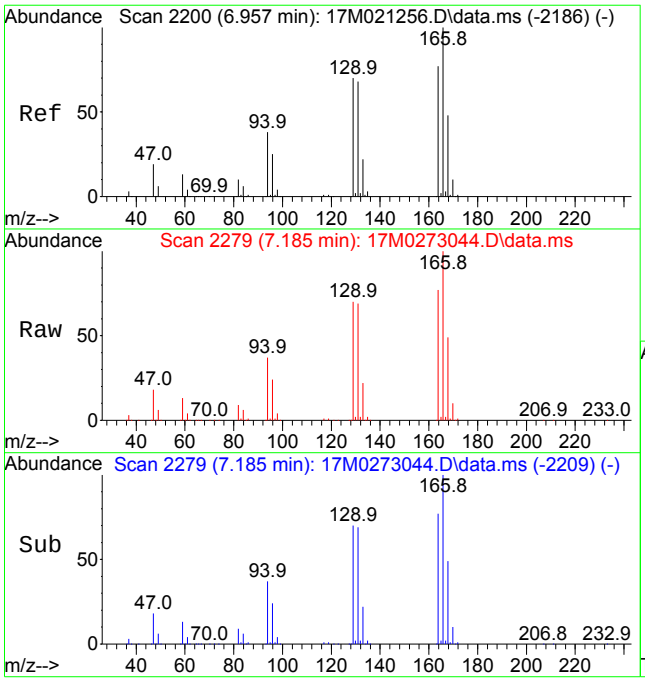


#44
4-Methyl-2-Pentanone
Concen: 0.1993 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. -0.041 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion: 58 Resp: 231

Ion	Ratio	Lower	Upper
58	100		
85	495.7	34.1	79.5#

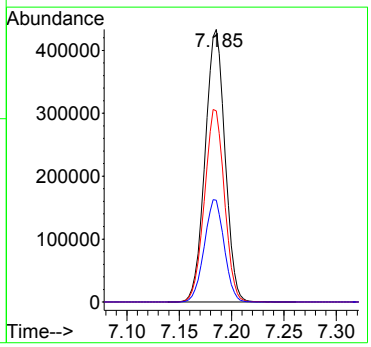




#49
Tetrachloroethene
Concen: 103.3352 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273044.D
Acq: 26 Apr 2017 21:36

Tgt Ion:166 Resp: 571466

Ion	Ratio	Lower	Upper
166	100		
129	70.9	56.2	84.4
94	37.6	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273074.D Vial: 10
Acq On : 27 Apr 2017 15:08 Operator: ADC
Sample : L17041075-24 B 2X 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

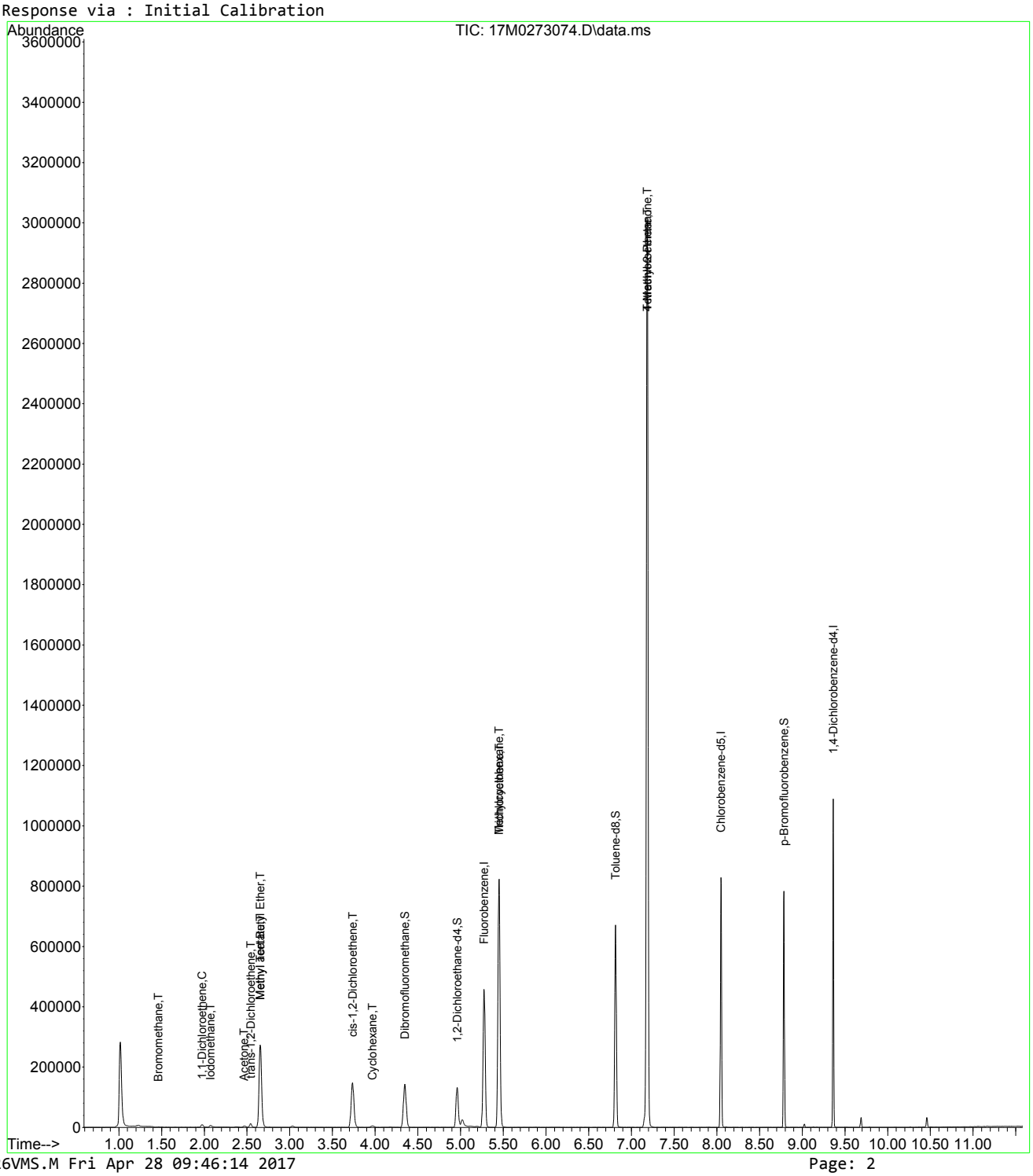
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	395082	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	288964	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	144891	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.348	111	102723	24.0749 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.300%		
34) 1,2-Dichloroethane-d4	4.959	65	98919	24.7337 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.935%		
47) Toluene-d8	6.815	98	362539	25.1394 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.558%		
66) p-Bromofluorobenzene	8.786	95	125775	25.9258 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.703%		
Target Compounds					Qvalue
6) Bromomethane	1.461	94	481	0.1272 ug/L	93
10) 1,1-Dichloroethene	1.971	61	820	0.1344 ug/L	90
13) Iodomethane	2.069	142	9139	3.4918 ug/L	93
16) Acetone	2.463	43	3513	4.4224 ug/L	91
17) trans-1,2-Dichloroethene	2.544	96	5021	1.2083 ug/L	100
18) Methyl acetate	2.654	43	57737	27.7241 ug/L #	89
19) Methyl Tert Butyl Ether	2.654	73	287514	27.2635 ug/L	99
23) cis-1,2-Dichloroethene	3.737	96	84111	17.8821 ug/L	100
25) Cyclohexane	3.969	56	3589	0.5654 ug/L #	79
36) Methylcyclohexane	5.448	83	2958	0.4447 ug/L #	1
37) Trichloroethene	5.451	130	268514	53.1216 ug/L	98
44) 4-Methyl-2-Pentanone	7.185	58	222	0.2025 ug/L #	1
49) Tetrachloroethene	7.185	166	731368	141.5382 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

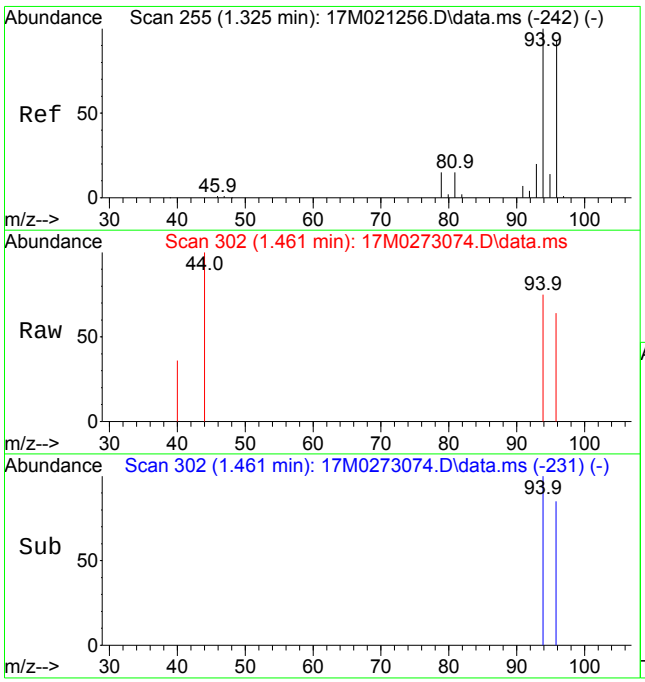
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273074.D Vial: 10
Acq On : 27 Apr 2017 15:08 Operator: ADC
Sample : L17041075-24 B 2X 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



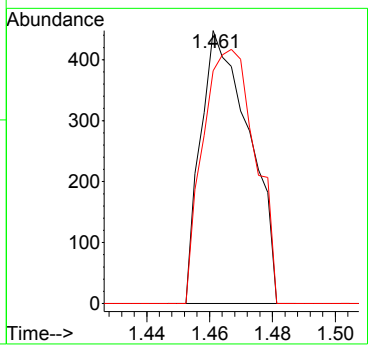
826VMS.M Fri Apr 28 09:46:14 2017 Page: 2

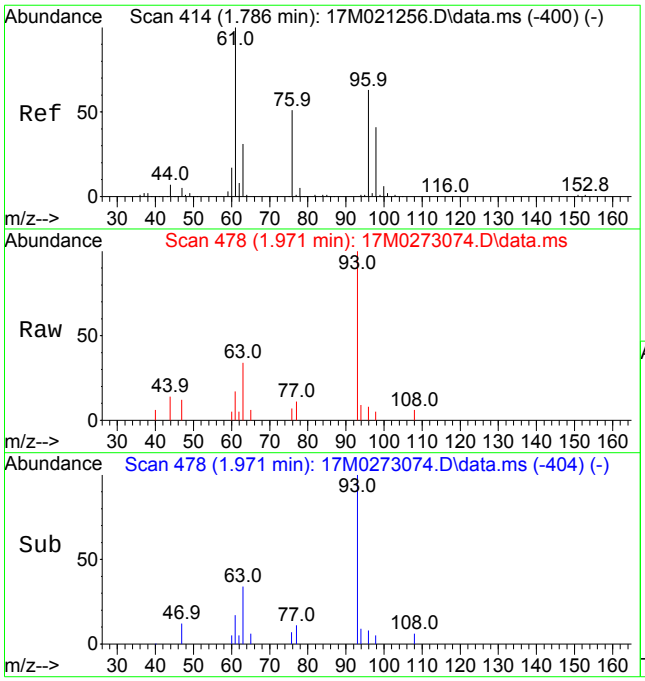


#6
Bromomethane
Concen: 0.1272 ug/L
RT: 1.461 min Scan# 302
Delta R.T. 0.006 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 94 Resp: 481

Ion	Ratio	Lower	Upper
94	100		
96	100.2	56.1	130.9

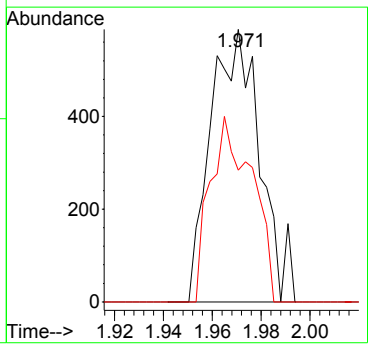


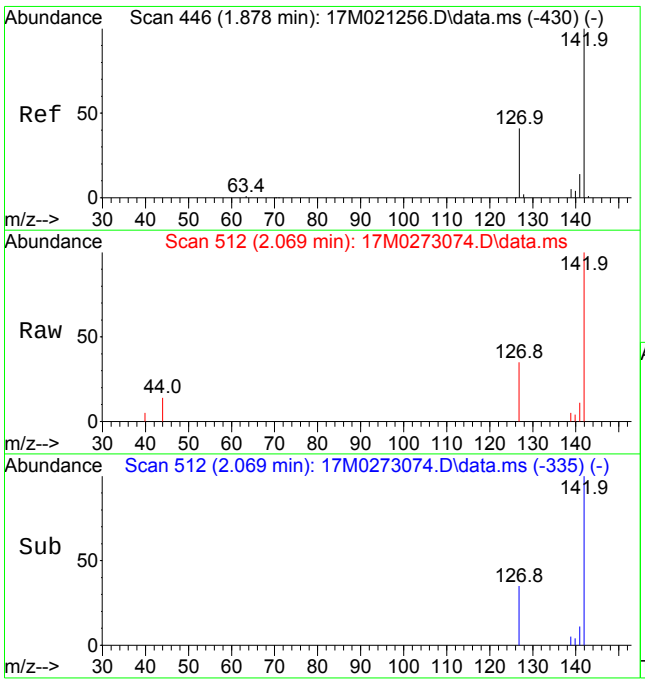


#10
1,1-Dichloroethene
Concen: 0.1344 ug/L
RT: 1.971 min Scan# 478
Delta R.T. 0.015 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 61 Resp: 820

Ion	Ratio	Lower	Upper
61	100		
96	58.0	52.9	79.3

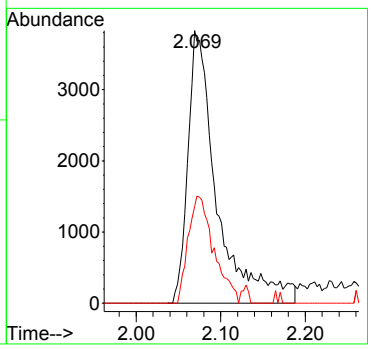


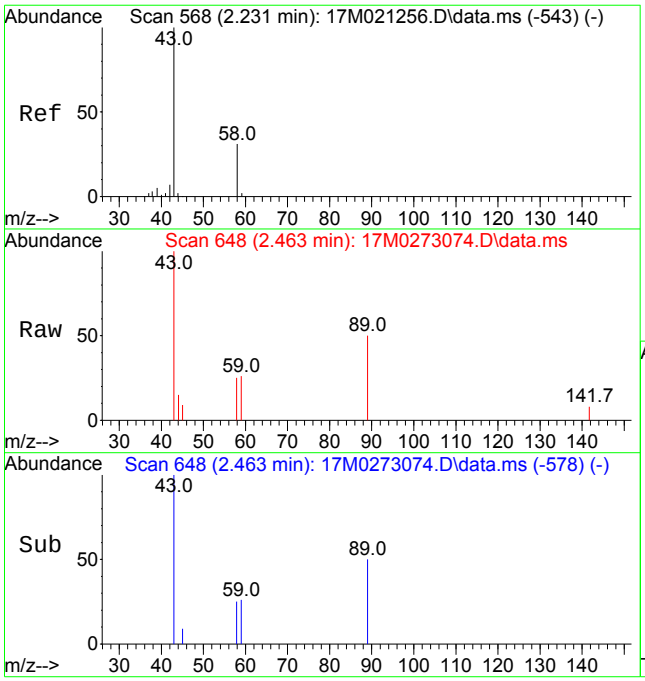


#13
Iodomethane
Concen: 3.4918 ug/L
RT: 2.069 min Scan# 512
Delta R.T. 0.011 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion:142 Resp: 9139

Ion	Ratio	Lower	Upper
142	100		
127	36.1	32.2	48.2

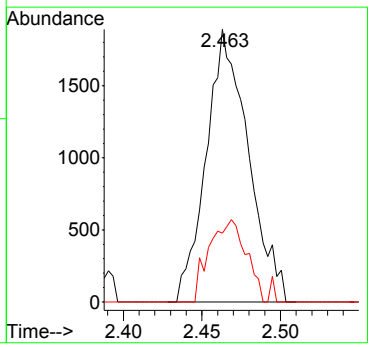


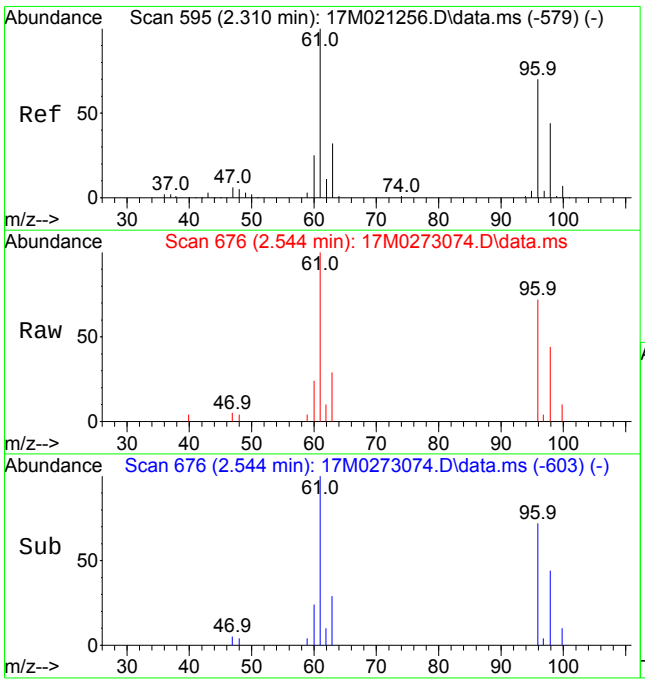


#16
Acetone
Concen: 4.4224 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 43 Resp: 3513

Ion	Ratio	Lower	Upper
43	100		
58	27.4	19.4	45.2

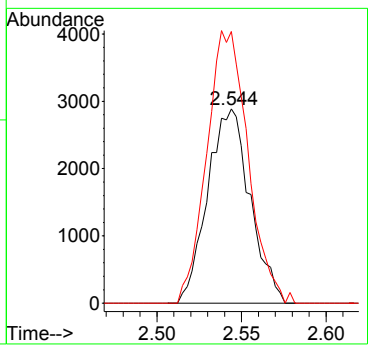


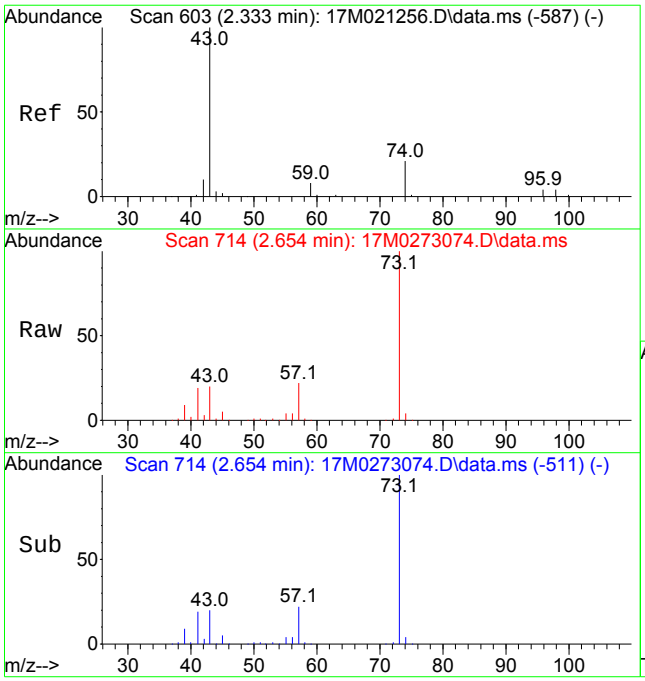


#17
trans-1,2-Dichloroethene
Concen: 1.2083 ug/L
RT: 2.544 min Scan# 676
Delta R.T. 0.012 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 96 Resp: 5021

Ion	Ratio	Lower	Upper
96	100		
61	136.8	109.4	164.0

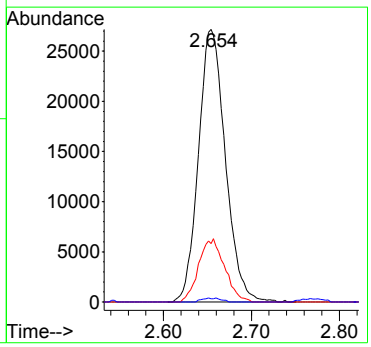


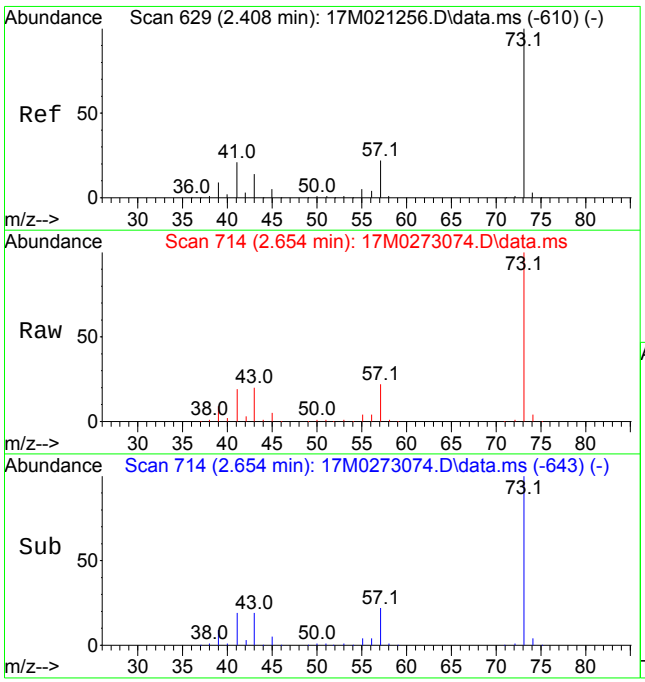


#18
Methyl acetate
Concen: 27.7241 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 43 Resp: 57737

Ion	Ratio	Lower	Upper
43	100		
74	22.4	25.4	25.4#
59	1.0	7.6	11.4#

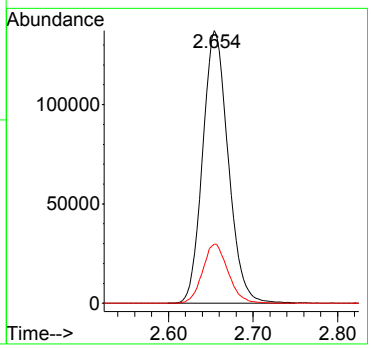


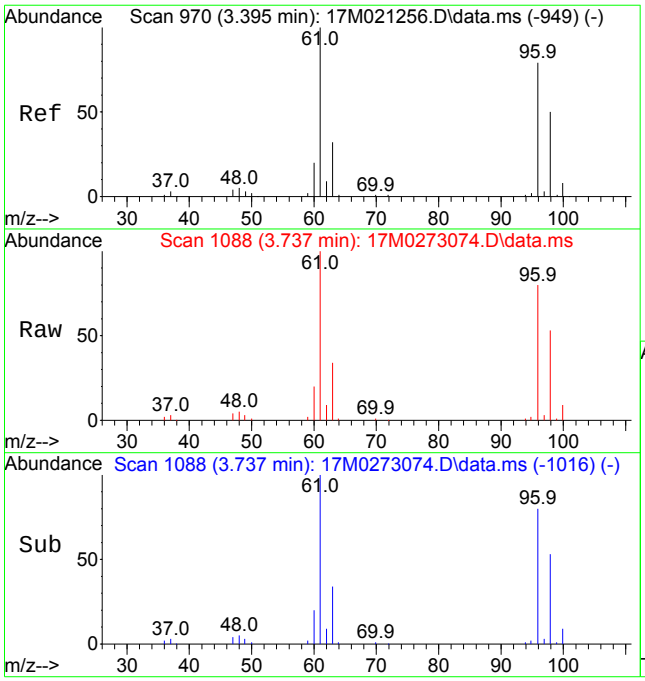


#19
Methyl Tert Butyl Ether
Concen: 27.2635 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 73 Resp: 287514

Ion	Ratio	Lower	Upper
73	100		
57	21.7	17.6	26.4

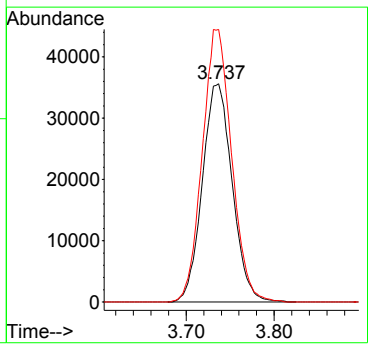


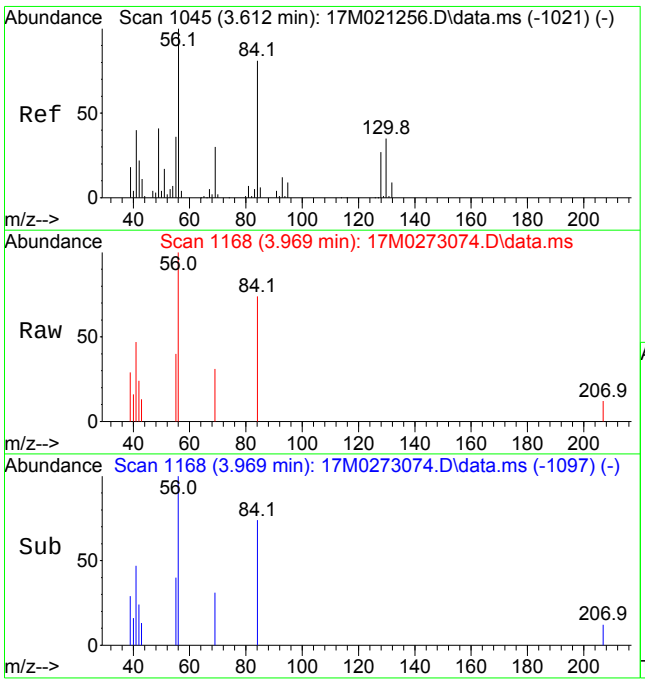


#23
cis-1,2-Dichloroethene
Concen: 17.8821 ug/L
RT: 3.737 min Scan# 1088
Delta R.T. 0.009 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 96 Resp: 84111

Ion	Ratio	Lower	Upper
96	100		
61	122.8	98.1	147.1

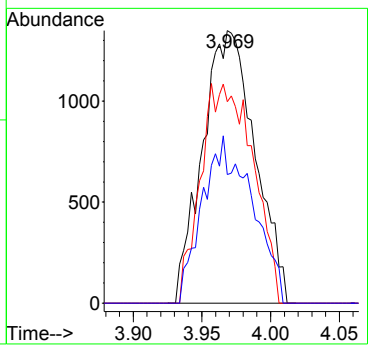


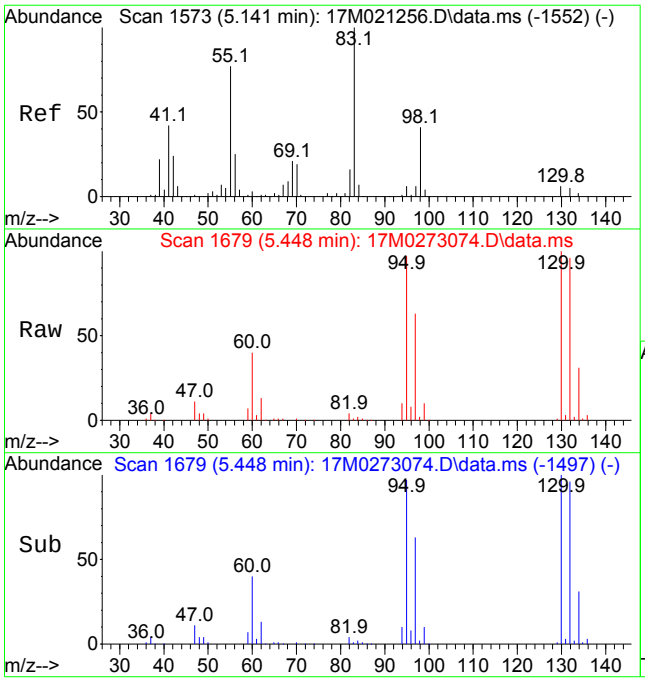


#25
Cyclohexane
Concen: 0.5654 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 56 Resp: 3589

Ion	Ratio	Lower	Upper
56	100		
84	80.2	69.4	104.0
41	57.6	72.2	108.2#

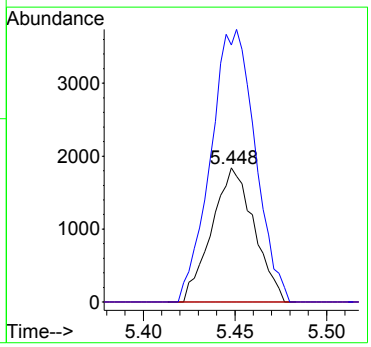


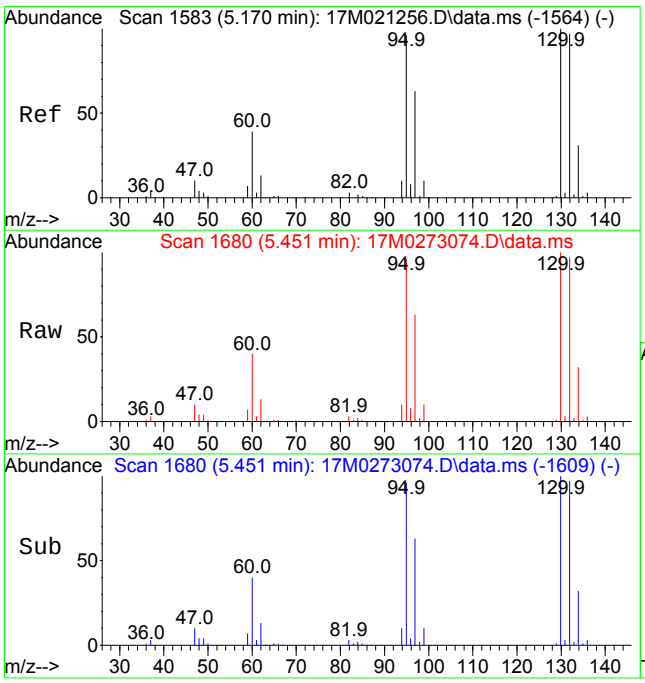


#36
Methylcyclohexane
Concen: 0.4447 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.026 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 83 Resp: 2958

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	213.8	34.4	51.6#

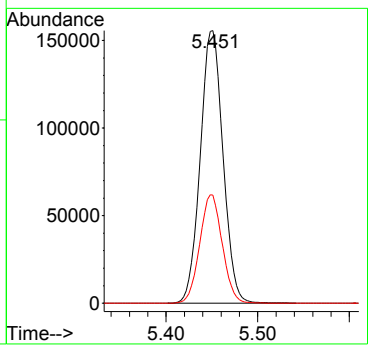


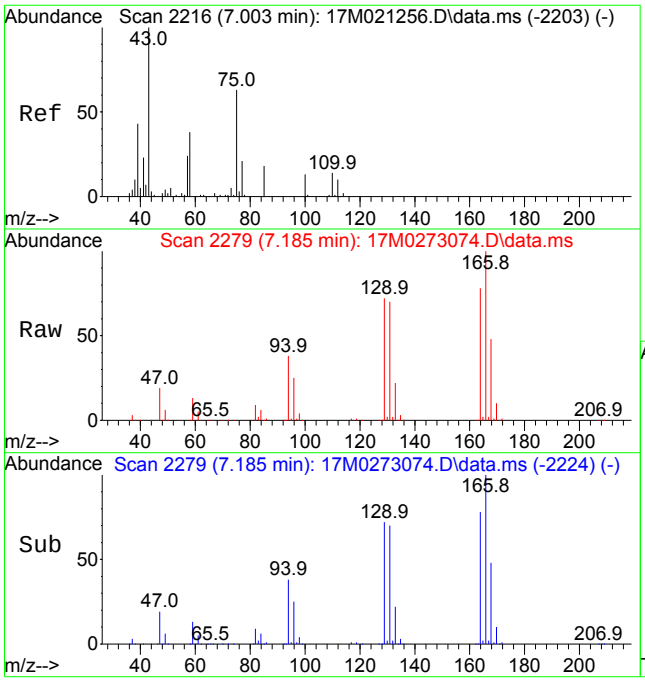


#37
Trichloroethene
Concen: 53.1216 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion:130 Resp: 268514

Ion	Ratio	Lower	Upper
130	100		
60	39.4	22.9	53.3

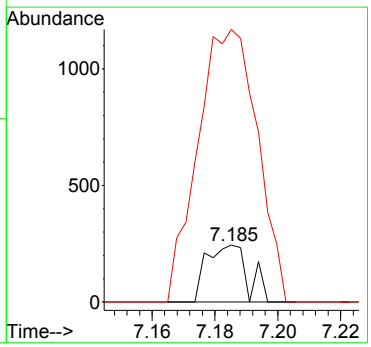


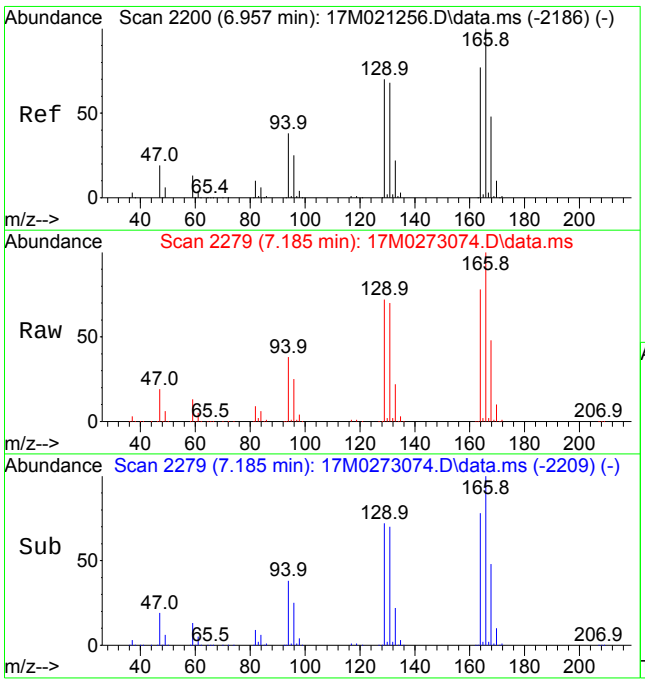


#44
4-Methyl-2-Pentanone
Concen: 0.2025 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. -0.041 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion: 58 Resp: 222

Ion	Ratio	Lower	Upper
58	100		
85	693.2	34.1	79.5#

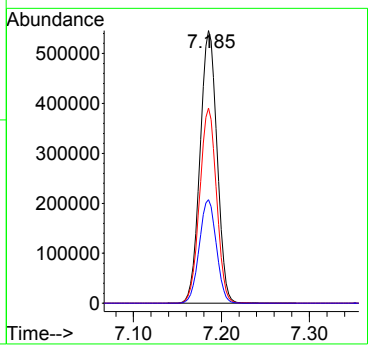




#49
Tetrachloroethene
Concen: 141.5382 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273074.D
Acq: 27 Apr 2017 15:08

Tgt Ion:166 Resp: 731368

Ion	Ratio	Lower	Upper
166	100		
129	70.9	56.2	84.4
94	38.1	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273045.D Vial: 18
Acq On : 26 Apr 2017 22:13 Operator: ADC
Sample : L17041075-25 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

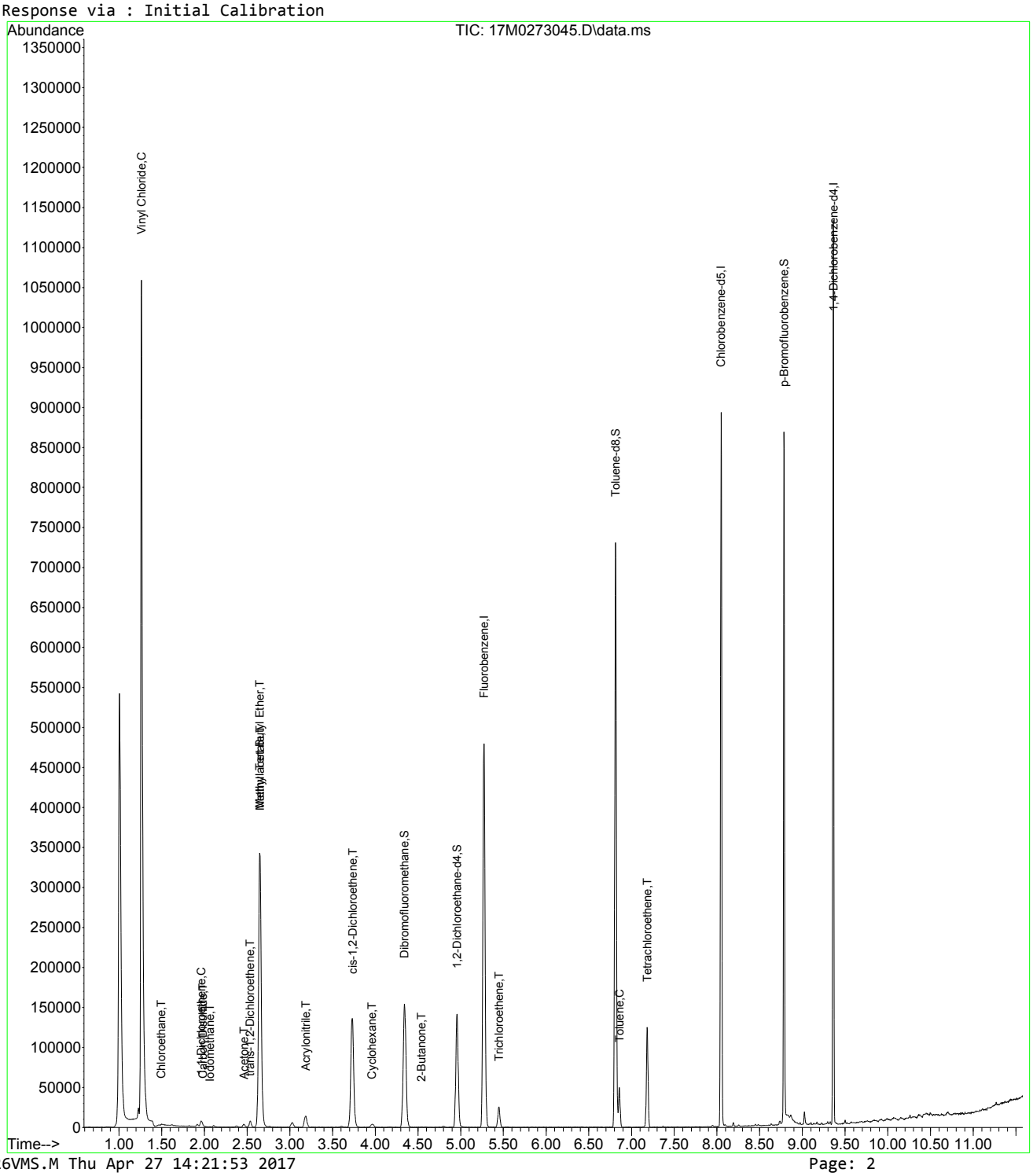
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	417867	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	308518	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	154134	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	111230	24.6473	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.589%			
34) 1,2-Dichloroethane-d4	4.956	65	105204	24.8709	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.484%			
47) Toluene-d8	6.812	98	399337	25.9359	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.744%			
66) p-Bromofluorobenzene	8.784	95	142287	27.5706	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.282%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.264	62	937242	174.2731	ug/L	99
7) Chloroethane	1.493	64	4000	1.5678	ug/L #	73
10) 1,1-Dichloroethene	1.965	61	3253	0.5040	ug/L	99
11) Carbon Disulfide	1.982	76	2891	0.2087	ug/L #	83
13) Iodomethane	2.063	142	358	2.0564	ug/L #	35
16) Acetone	2.463	43	4591	5.4643	ug/L	97
17) trans-1,2-Dichloroethene	2.533	96	3232	0.7354	ug/L	99
18) Methyl acetate	2.651	43	74244	33.7065	ug/L #	90
19) Methyl Tert Butyl Ether	2.648	73	365637	32.7810	ug/L #	100
21) Acrylonitrile	3.187	53	350	0.3266	ug/L #	7
23) cis-1,2-Dichloroethene	3.734	96	78591	15.7975	ug/L	99
25) Cyclohexane	3.960	56	2692	0.4009	ug/L #	77
32) 2-Butanone	4.539	43	159	0.1269	ug/L #	37
37) Trichloroethene	5.448	130	8666	1.6210	ug/L	98
48) Toluene	6.858	91	28755	1.4866	ug/L	99
49) Tetrachloroethene	7.182	166	30519	5.5319	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

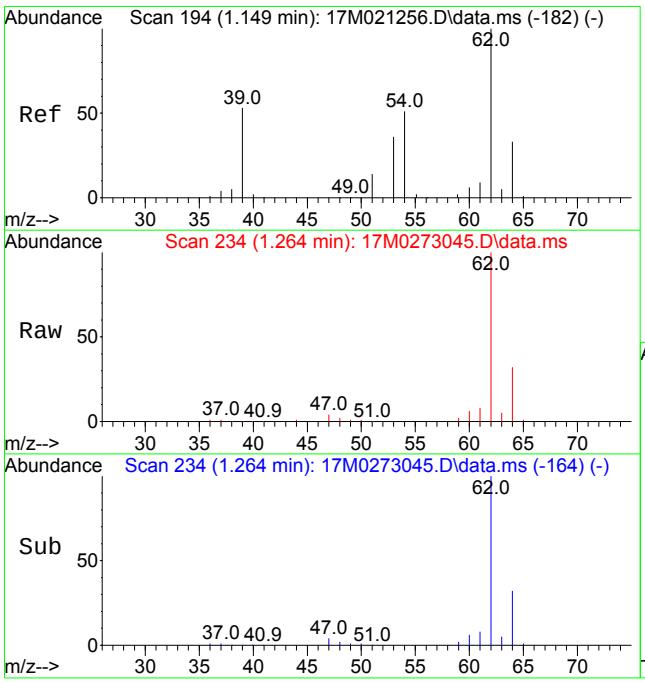
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273045.D Vial: 18
Acq On : 26 Apr 2017 22:13 Operator: ADC
Sample : L17041075-25 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



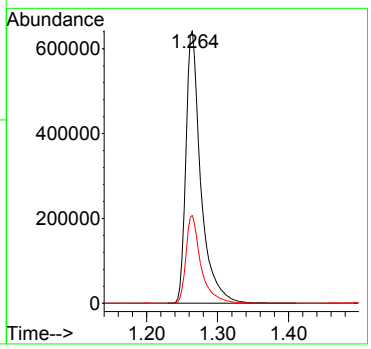
826VMS.M Thu Apr 27 14:21:53 2017 Page: 2

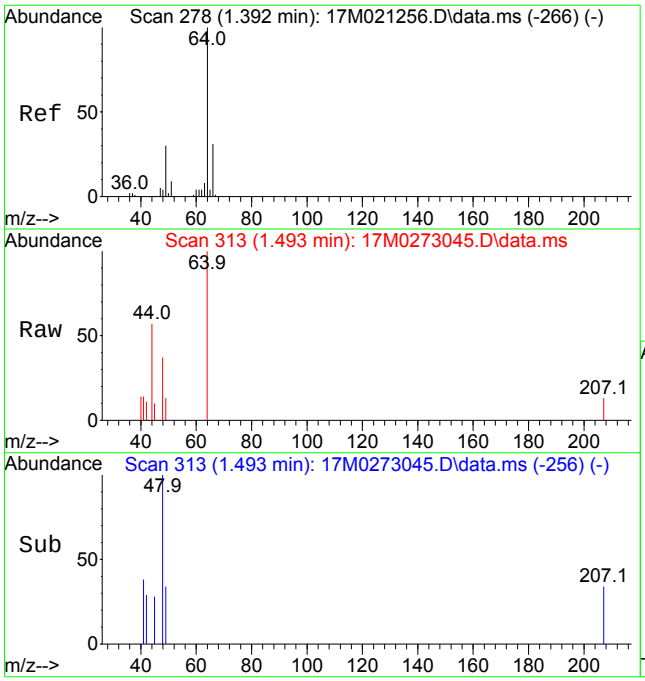


#4
Vinyl Chloride
Concen: 174.2731 ug/L
RT: 1.264 min Scan# 234
Delta R.T. 0.003 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 62 Resp: 937242

Ion	Ratio	Lower	Upper
62	100		
64	32.4	19.2	44.8

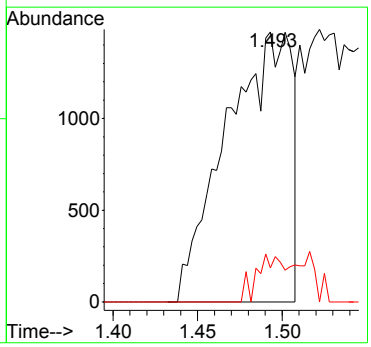


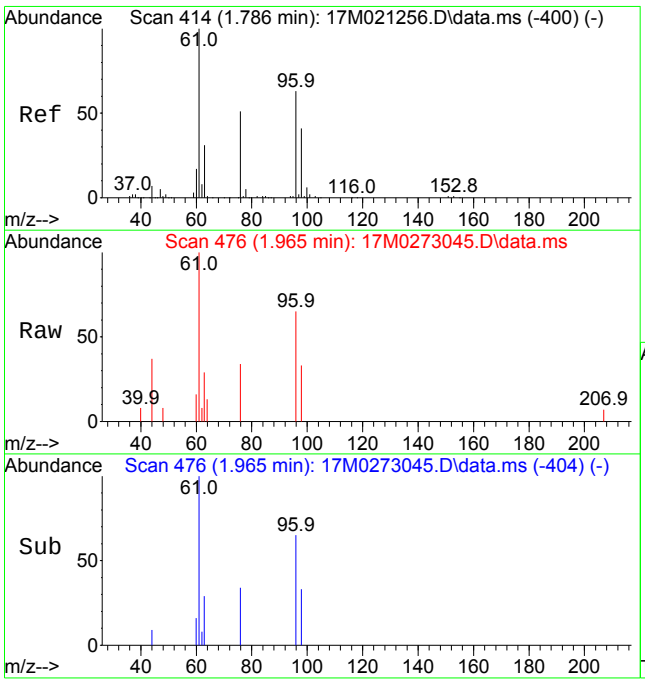


#7
Chloroethane
Concen: 1.5678 ug/L
RT: 1.493 min Scan# 313
Delta R.T. -0.035 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 64 Resp: 4000

Ion	Ratio	Lower	Upper
64	100		
49	13.0	16.0	37.4#

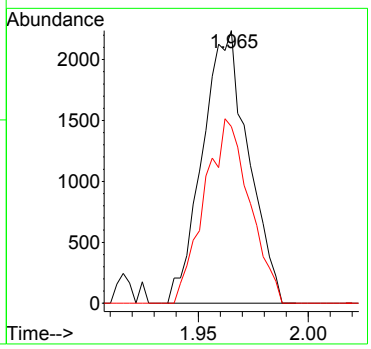


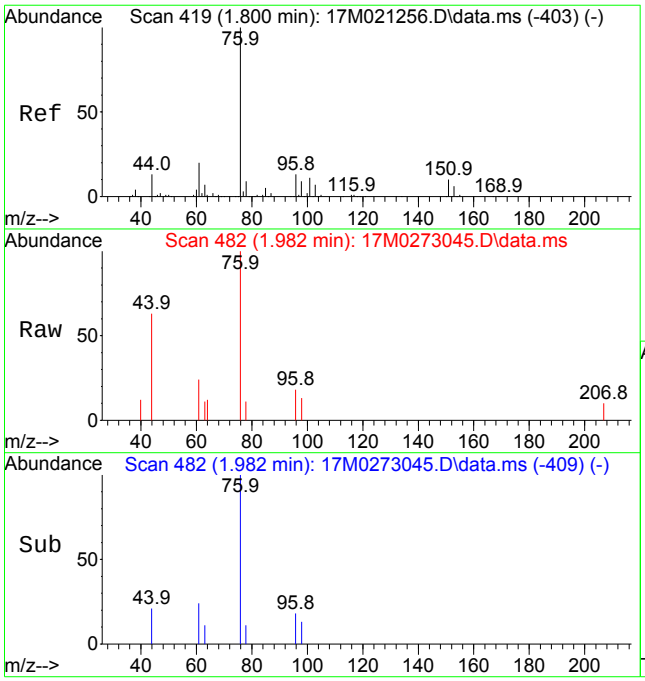


#10
1,1-Dichloroethene
Concen: 0.5040 ug/L
RT: 1.965 min Scan# 476
Delta R.T. 0.009 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 61 Resp: 3253

Ion	Ratio	Lower	Upper
61	100		
96	66.6	52.9	79.3

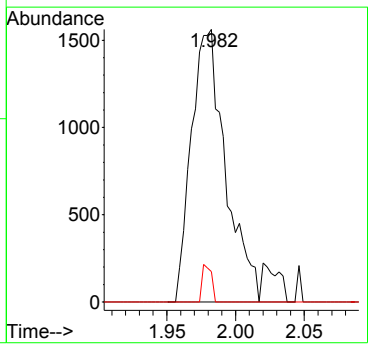


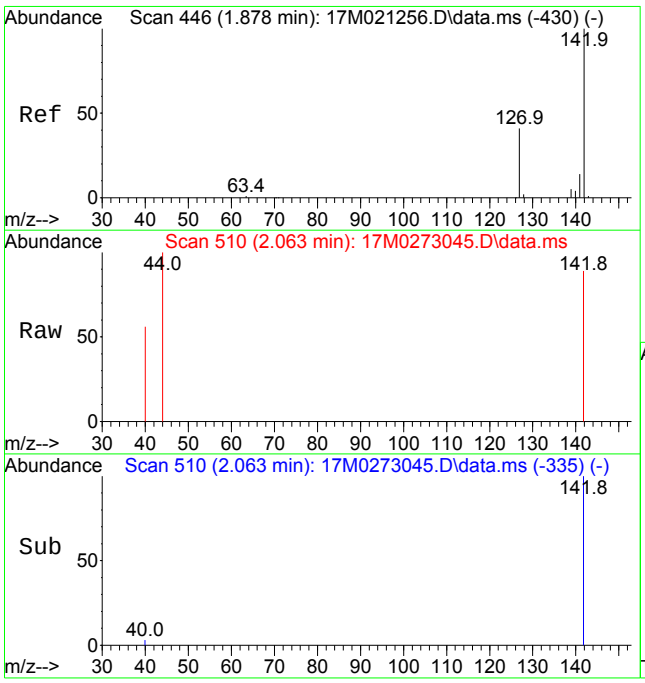


#11
Carbon Disulfide
Concen: 0.2087 ug/L
RT: 1.982 min Scan# 482
Delta R.T. 0.011 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 76 Resp: 2891

Ion	Ratio	Lower	Upper
76	100		
78	3.5	7.8	11.8#

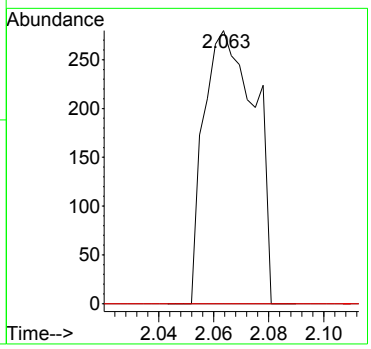


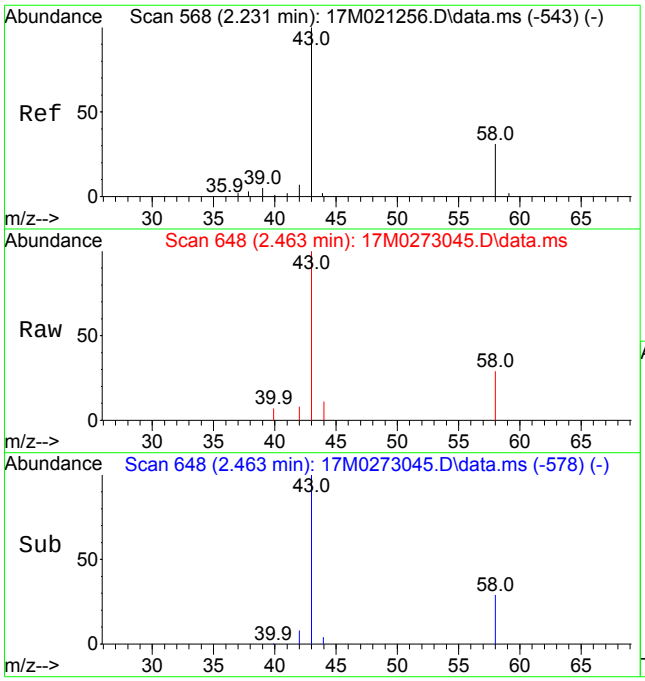


#13
Iodomethane
Concen: 2.0564 ug/L
RT: 2.063 min Scan# 510
Delta R.T. 0.006 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion:142 Resp: 358

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

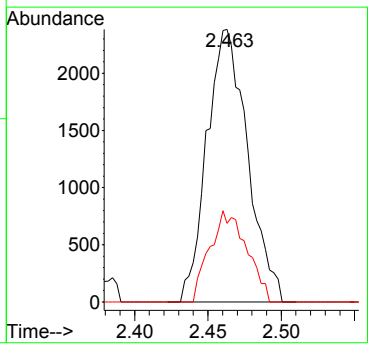


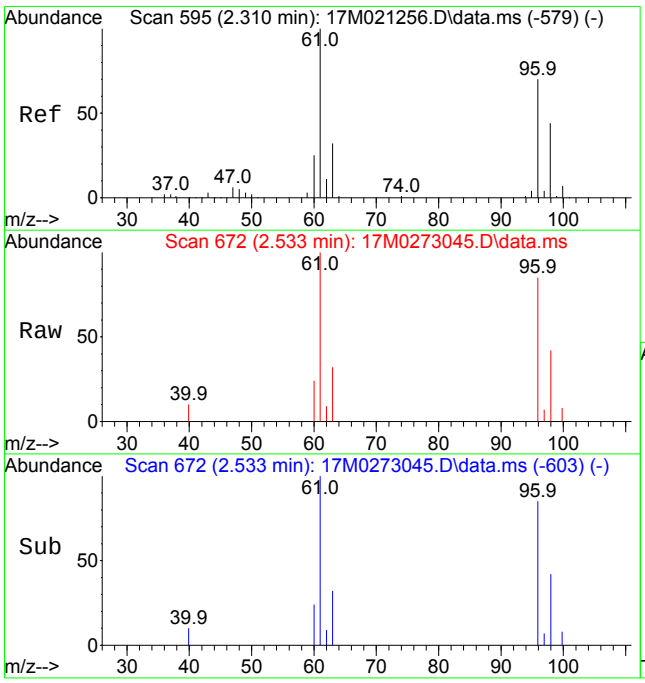


#16
Acetone
Concen: 5.4643 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 43 Resp: 4591

Ion	Ratio	Lower	Upper
43	100		
58	30.4	19.4	45.2

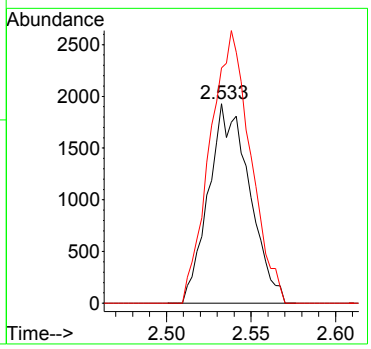


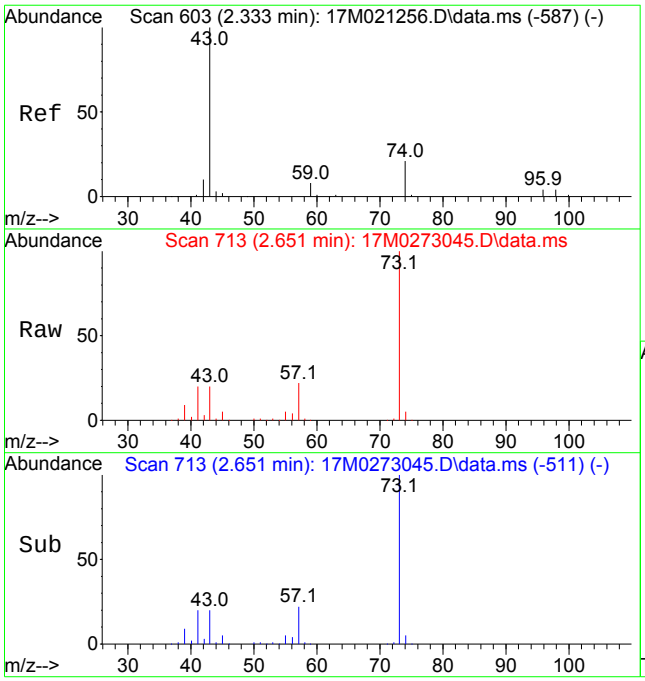


#17
trans-1,2-Dichloroethene
Concen: 0.7354 ug/L
RT: 2.533 min Scan# 672
Delta R.T. 0.001 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 96 Resp: 3232

Ion	Ratio	Lower	Upper
96	100		
61	135.8	109.4	164.0

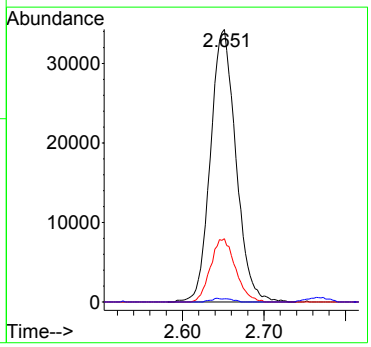


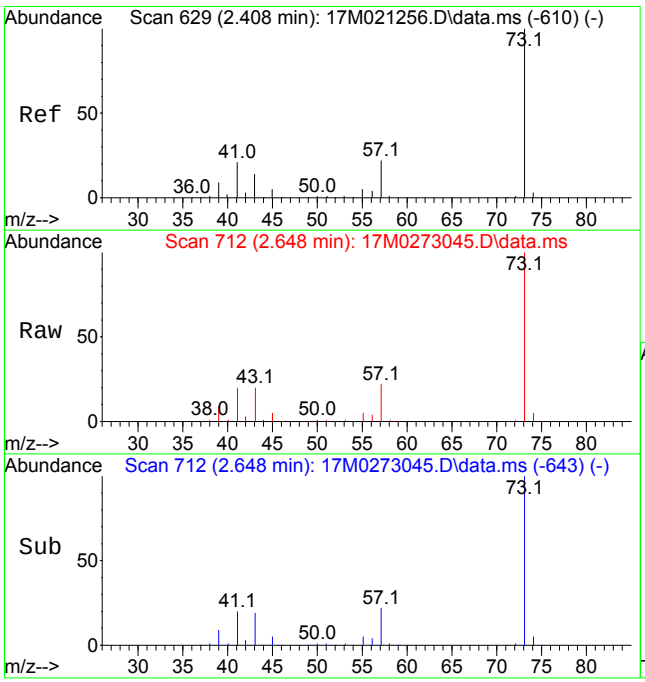


#18
Methyl acetate
Concen: 33.7065 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.084 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 43 Resp: 74244

Ion	Ratio	Lower	Upper
43	100		
74	22.7	25.4	25.4#
59	1.1	7.6	11.4#

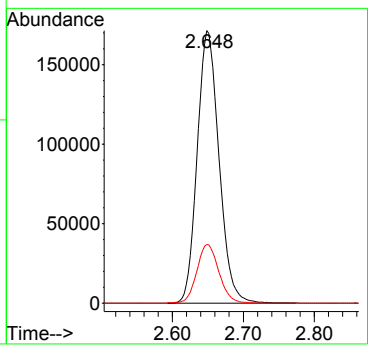


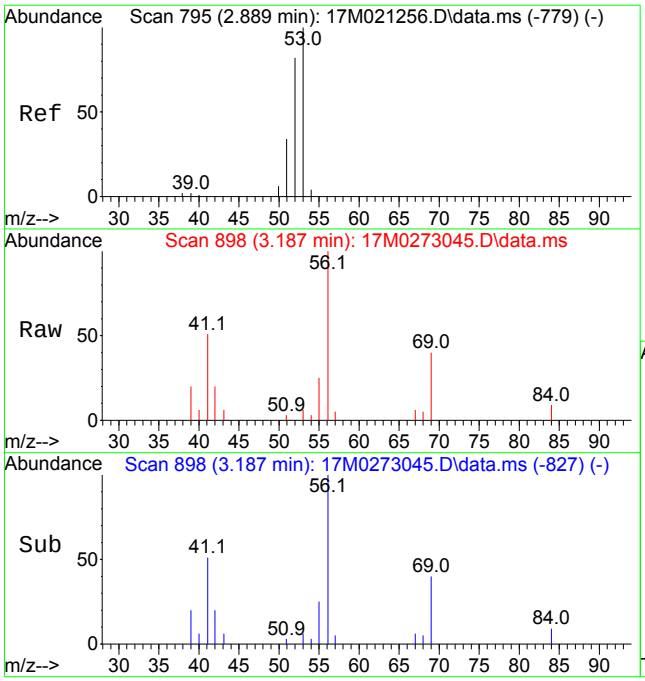


#19
Methyl Tert Butyl Ether
Concen: 32.7810 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.000 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 73 Resp: 365637

Ion	Ratio	Lower	Upper
73	100		
57	21.9	0.0	0.0#

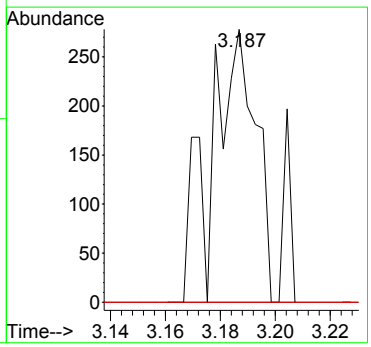


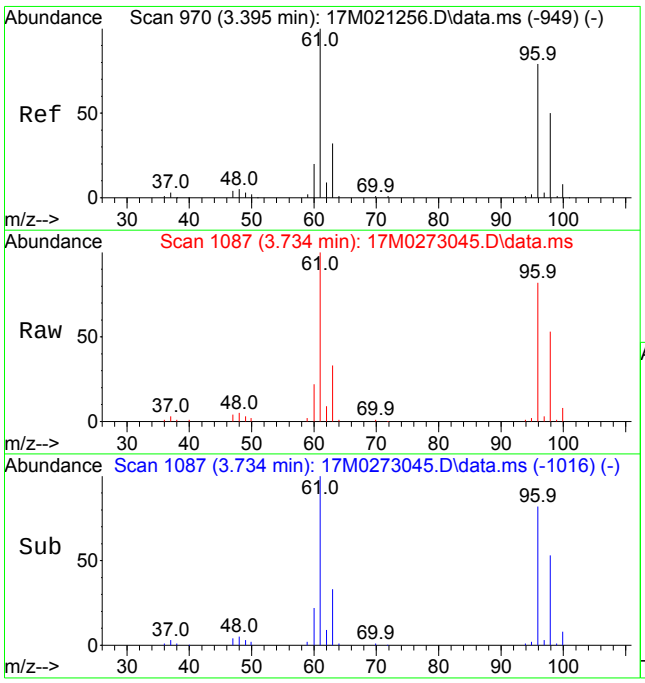


#21
Acrylonitrile
Concen: 0.3266 ug/L
RT: 3.187 min Scan# 898
Delta R.T. 0.006 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 53 Resp: 350

Ion	Ratio	Lower	Upper
53	100		
52	0.0	50.2	117.2#

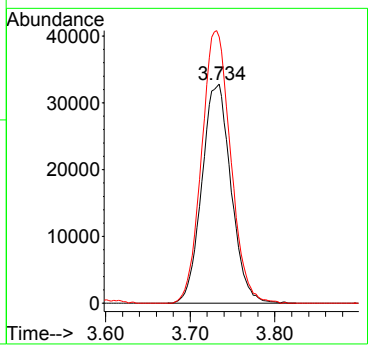


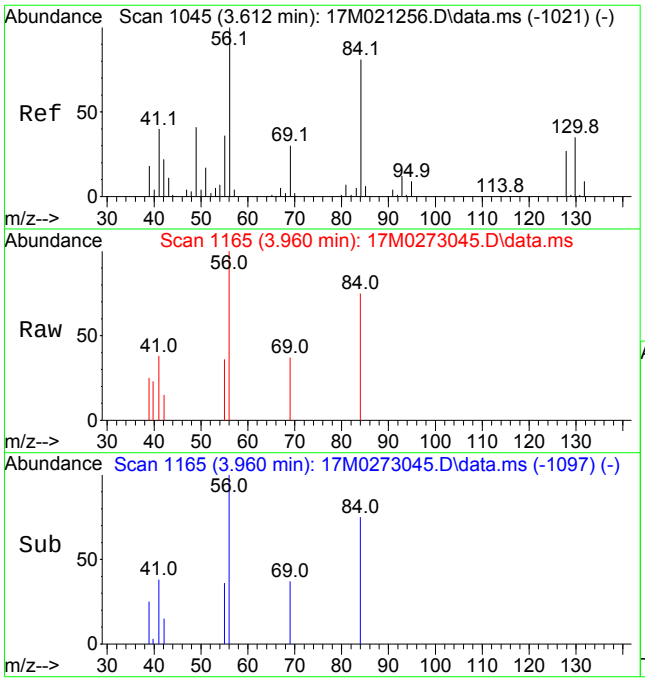


#23
cis-1,2-Dichloroethene
Concen: 15.7975 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 96 Resp: 78591

Ion	Ratio	Lower	Upper
96	100		
61	124.2	98.1	147.1

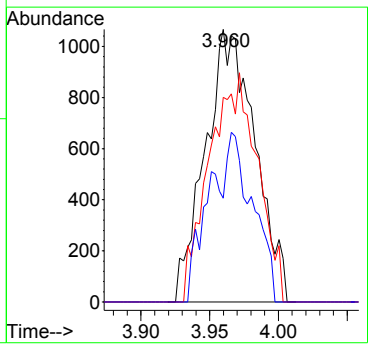


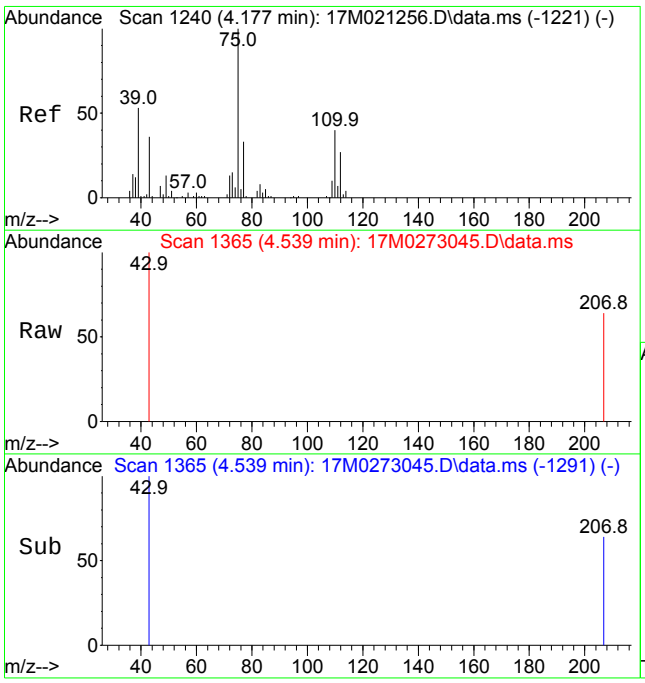


#25
Cyclohexane
Concen: 0.4009 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 56 Resp: 2692

Ion	Ratio	Lower	Upper
56	100		
84	81.4	69.4	104.0
41	53.7	72.2	108.2#

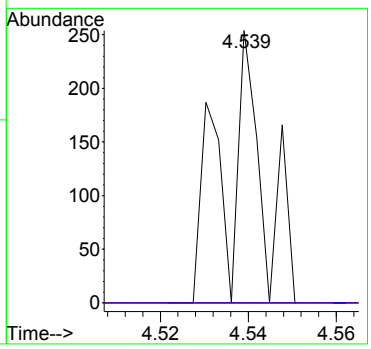


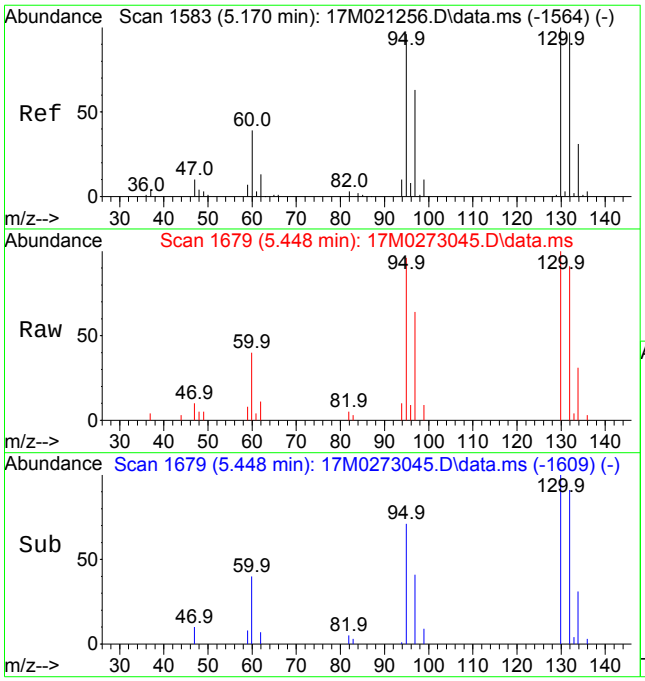


#32
2-Butanone
Concen: 0.1269 ug/L
RT: 4.539 min Scan# 1365
Delta R.T. 0.015 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 43 Resp: 159

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

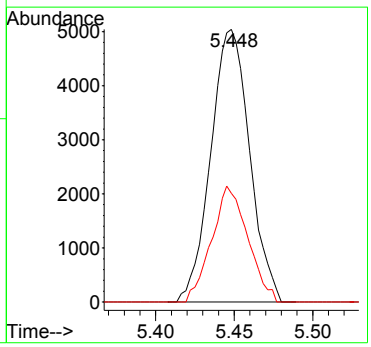


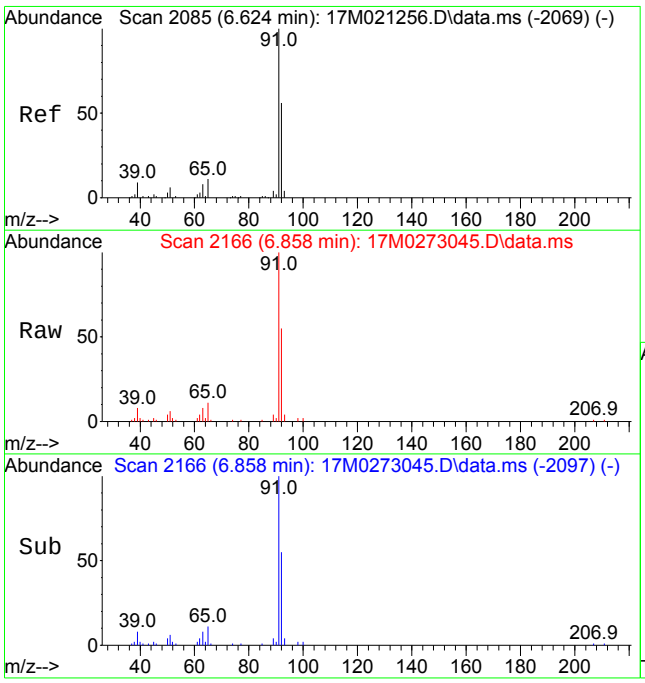


#37
Trichloroethene
Concen: 1.6210 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion:130 Resp: 8666

Ion	Ratio	Lower	Upper
130	100		
60	39.4	22.9	53.3

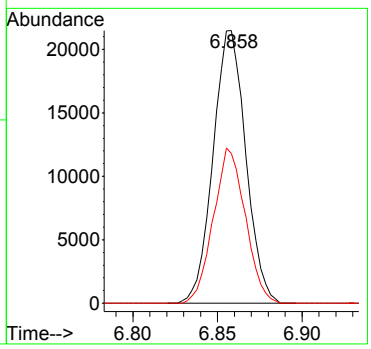


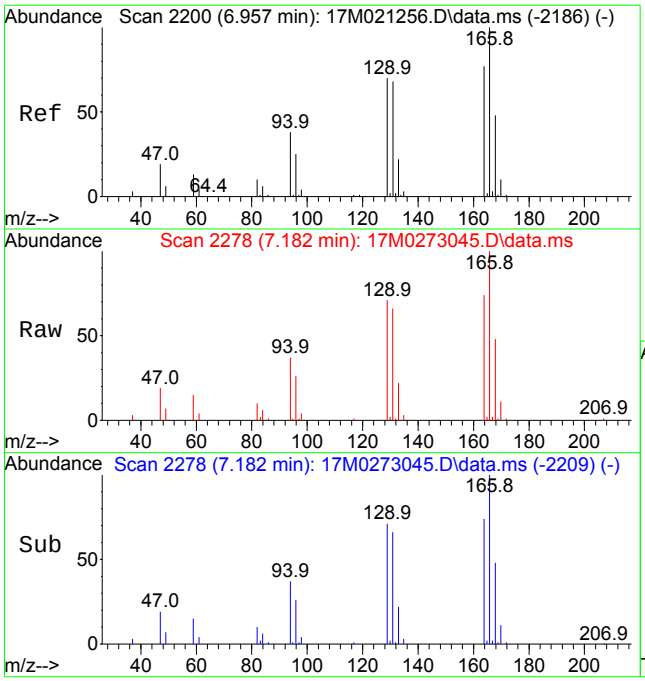


#48
Toluene
Concen: 1.4866 ug/L
RT: 6.858 min Scan# 2166
Delta R.T. 0.000 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion: 91 Resp: 28755

Ion	Ratio	Lower	Upper
91	100		
92	55.6	33.8	78.8

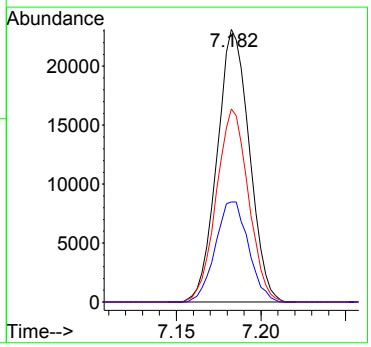




#49
Tetrachloroethene
Concen: 5.5319 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273045.D
Acq: 26 Apr 2017 22:13

Tgt Ion:166 Resp: 30519

Ion	Ratio	Lower	Upper
166	100		
129	70.5	56.2	84.4
94	37.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273041.D Vial: 14
Acq On : 26 Apr 2017 20:26 Operator: ADC
Sample : L17041075-26 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 20:38:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	414707	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	310380	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	162536	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	114245	25.5082	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.033%			
34) 1,2-Dichloroethane-d4	4.956	65	107364	25.5749	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.300%			
47) Toluene-d8	6.815	98	404657	26.1238	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.495%			
66) p-Bromofluorobenzene	8.786	95	142688	26.2191	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.876%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	109093	22.1499	ug/L	100
3) Chloromethane	1.218	50	107232	22.2470	ug/L	99
4) Vinyl Chloride	1.264	62	876582	164.2358	ug/L	99
5) 1,3-Butadiene	1.276	54	93304	28.4717	ug/L	98
6) Bromomethane	1.458	94	77493	19.5286	ug/L	99
7) Chloroethane	1.528	64	42095	16.6250	ug/L	92
8) Trichlorofluoromethane	1.606	101	86860	12.6873	ug/L	100
9) Diethyl ether	1.843	59	246967	74.8040	ug/L	99
10) 1,1-Dichloroethene	1.953	61	117180	18.2926	ug/L	99
11) Carbon Disulfide	1.965	76	216520	15.7484	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	71669	17.5488	ug/L	99
13) Iodomethane	2.058	142	125661	21.5277	ug/L	99
14) Acrolein	2.225	56	38643	94.7548	ug/L	99
15) Methylene Chloride	2.402	84	92517	19.0334	ug/L	99
16) Acetone	2.469	43	22469	26.9467	ug/L	100
17) trans-1,2-Dichloroethene	2.532	96	86393	19.8067	ug/L	99
18) Methyl acetate	2.579	43	49613	22.6958	ug/L #	95
19) Methyl Tert Butyl Ether	2.657	73	590370	53.3326	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	152156	19.4218	ug/L	100
21) Acrylonitrile	3.184	53	21808	20.5051	ug/L	100
22) Vinyl Acetate	2.611	86	11874	16.9144	ug/L	90
23) cis-1,2-Dichloroethene	3.731	96	167808	33.9879	ug/L	98
24) 2,2-Dichloropropane	3.864	77	111031	18.0651	ug/L	99
25) Cyclohexane	3.966	56	104076	15.6189	ug/L #	86
26) Bromochloromethane	3.977	130	64402	20.2451	ug/L	100
27) Chloroform	4.113	83	162872	19.9402	ug/L	100
28) Carbon Tetrachloride	4.249	117	120364	18.6348	ug/L	99
30) 1,1,1-Trichloroethane	4.345	97	139660	19.4480	ug/L	100
31) 1,1-Dichloropropene	4.504	75	105527	18.7112	ug/L	99
32) 2-Butanone	4.533	43	25962	20.8846	ug/L	96
33) Benzene	4.797	78	342226	19.3735	ug/L	100
35) 1,2-Dichloroethane	5.034	62	108962	19.8100	ug/L	100
36) Methylcyclohexane	5.422	83	110828	15.8746	ug/L	99
37) Trichloroethene	5.448	130	102679	19.3523	ug/L	99
38) Dibromomethane	5.859	93	55032	20.3407	ug/L	99
39) 1,2-Dichloropropane	5.966	63	91329	19.7151	ug/L	100
40) Bromodichloromethane	6.050	83	119460	19.3207	ug/L	100
41) 1,4-Dioxane	6.262	88	5415	234.6864	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.644	63	1561	0.7429	ug/L #	73
43) cis-1,3-Dichloropropene	6.647	75	144892	20.7956	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	24052	20.8969	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	117301	19.8035	ug/L	100
48) Toluene	6.858	91	405619	20.8443	ug/L	99
49) Tetrachloroethene	7.185	166	130490	23.5107	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	73486	19.4833	ug/L	99
51) Dibromochloromethane	7.507	129	100004	19.4247	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273041.D Vial: 14
Acq On : 26 Apr 2017 20:26 Operator: ADC
Sample : L17041075-26 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 20:38:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

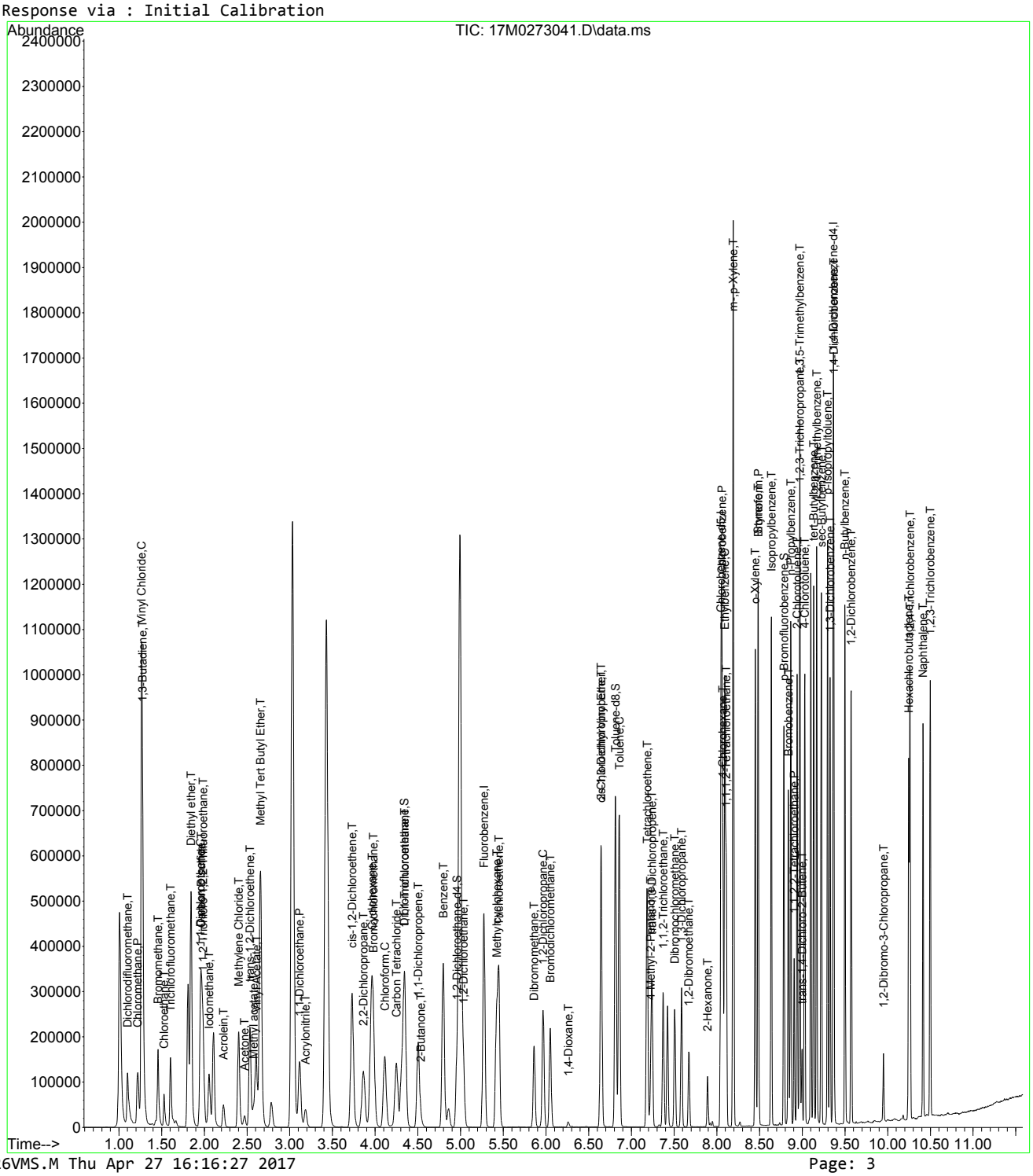
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	122118	20.3720	ug/L		98
53) 1,2-Dibromoethane	7.672	107	74528	19.2860	ug/L		99
54) 2-Hexanone	7.892	43	42325	21.3687	ug/L		99
55) Chlorobenzene	8.060	112	251135	19.2341	ug/L		98
56) 1-Chlorohexane	8.071	69	19763	18.7478	ug/L		81
57) Ethylbenzene	8.094	106	131362	19.3276	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.109	131	97186	19.1212	ug/L		100
59) m-,p-Xylene	8.193	106	322480	39.3144	ug/L		99
60) o-Xylene	8.450	106	157876	19.5344	ug/L		98
61) Styrene	8.482	104	260145	20.1170	ug/L		100
62) Bromoform	8.485	173	71471	19.7349	ug/L		99
63) Isopropylbenzene	8.639	105	396488	18.9530	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	343530	18.9593	ug/L		99
67) Bromobenzene	8.838	156	118559	18.5436	ug/L		98
68) n-Propylbenzene	8.864	91	448503	18.6861	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	90835	20.7761	ug/L		100
70) 2-Chlorotoluene	8.940	91	273657	18.4718	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24696	19.1074	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	15365	15.9471	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.168	105	351212	19.2224	ug/L		99
74) 4-Chlorotoluene	9.030	91	285909	19.3306	ug/L		99
75) tert-Butylbenzene	9.134	134	66325	18.3155	ug/L		98
76) sec-Butylbenzene	9.224	105	413246	18.5126	ug/L		99
77) p-Isopropyltoluene	9.296	119	364949	19.1788	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	208092	18.6700	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	210575	18.7133	ug/L		100
80) n-Butylbenzene	9.499	91	311700	19.4078	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	206355	18.9967	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	16908	21.0802	ug/L		94
83) Hexachlorobutadiene	10.246	225	82654	18.0494	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	161473	20.0101	ug/L		100
85) Naphthalene	10.414	128	325572	20.6898	ug/L		100
86) 1,2,3-Trichlorobenzene	10.497	180	154368	19.6941	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273041.D Vial: 14
Acq On : 26 Apr 2017 20:26 Operator: ADC
Sample : L17041075-26 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 20:38:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Thu Apr 27 16:16:27 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273042.D Vial: 15
Acq On : 26 Apr 2017 20:57 Operator: ADC
Sample : L17041075-27 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 21:08:46 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	414329	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311702	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	160690	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	110634	24.7245	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.898%			
34) 1,2-Dichloroethane-d4	4.953	65	105192	25.0804	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.322%			
47) Toluene-d8	6.812	98	392854	25.2543	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.017%			
66) p-Bromofluorobenzene	8.787	95	137900	25.6304	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.522%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.097	85	105879	21.5170	ug/L	100
3) Chloromethane	1.212	50	106808	22.1792	ug/L	99
4) Vinyl Chloride	1.262	62	889485	166.8054	ug/L	98
5) 1,3-Butadiene	1.270	54	93566	28.5777	ug/L	98
6) Bromomethane	1.453	94	76150	19.2077	ug/L	99
7) Chloroethane	1.525	64	42618	16.8469	ug/L	92
8) Trichlorofluoromethane	1.600	101	82550	12.0687	ug/L	100
9) Diethyl ether	1.841	59	236856	71.8069	ug/L	99
10) 1,1-Dichloroethene	1.948	61	117500	18.3592	ug/L	99
11) Carbon Disulfide	1.962	76	219158	15.9548	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.980	101	68680	16.8323	ug/L	99
13) Iodomethane	2.052	142	128507	21.9882	ug/L	99
14) Acrolein	2.220	56	36585	89.7903	ug/L	99
15) Methylene Chloride	2.397	84	90402	18.6152	ug/L	98
16) Acetone	2.469	43	23369	28.0516	ug/L	100
17) trans-1,2-Dichloroethene	2.530	96	85618	19.6469	ug/L	100
18) Methyl acetate	2.576	43	48351	22.1386	ug/L #	95
19) Methyl Tert Butyl Ether	2.654	73	586788	53.0573	ug/L #	100
20) 1,1-Dichloroethane	3.112	63	152118	19.4347	ug/L	100
21) Acrylonitrile	3.184	53	22072	20.7722	ug/L	97
22) Vinyl Acetate	2.599	86	10647	15.1804	ug/L	85
23) cis-1,2-Dichloroethene	3.725	96	167015	33.8581	ug/L	99
24) 2,2-Dichloropropane	3.856	77	106960	17.4284	ug/L	100
25) Cyclohexane	3.954	56	99736	14.9813	ug/L #	84
26) Bromochloromethane	3.977	130	63661	20.0305	ug/L	99
27) Chloroform	4.108	83	159251	19.5147	ug/L	99
28) Carbon Tetrachloride	4.244	117	119465	18.5125	ug/L	99
30) 1,1,1-Trichloroethane	4.336	97	138216	19.2645	ug/L	100
31) 1,1-Dichloropropene	4.499	75	104415	18.5309	ug/L	99
32) 2-Butanone	4.530	43	25724	20.7121	ug/L	96
33) Benzene	4.794	78	338377	19.1731	ug/L	100
35) 1,2-Dichloroethane	5.031	62	107414	19.5464	ug/L	100
36) Methylcyclohexane	5.416	83	103063	14.7759	ug/L	99
37) Trichloroethene	5.445	130	101050	19.0626	ug/L	99
38) Dibromomethane	5.856	93	53714	19.8717	ug/L	99
39) 1,2-Dichloropropane	5.964	63	89452	19.3275	ug/L	100
40) Bromodichloromethane	6.048	83	117078	18.9528	ug/L	100
41) 1,4-Dioxane	6.265	88	6821	295.8923	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.647	63	1529	0.7283	ug/L	89
43) cis-1,3-Dichloropropene	6.647	75	141328	20.3026	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	23654	20.5699	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	113764	19.2239	ug/L	99
48) Toluene	6.855	91	393563	20.1390	ug/L	100
49) Tetrachloroethene	7.183	166	123447	22.1474	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	72129	19.0424	ug/L	100
51) Dibromochloromethane	7.507	129	96796	18.7219	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273042.D Vial: 15
Acq On : 26 Apr 2017 20:57 Operator: ADC
Sample : L17041075-27 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 21:08:46 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

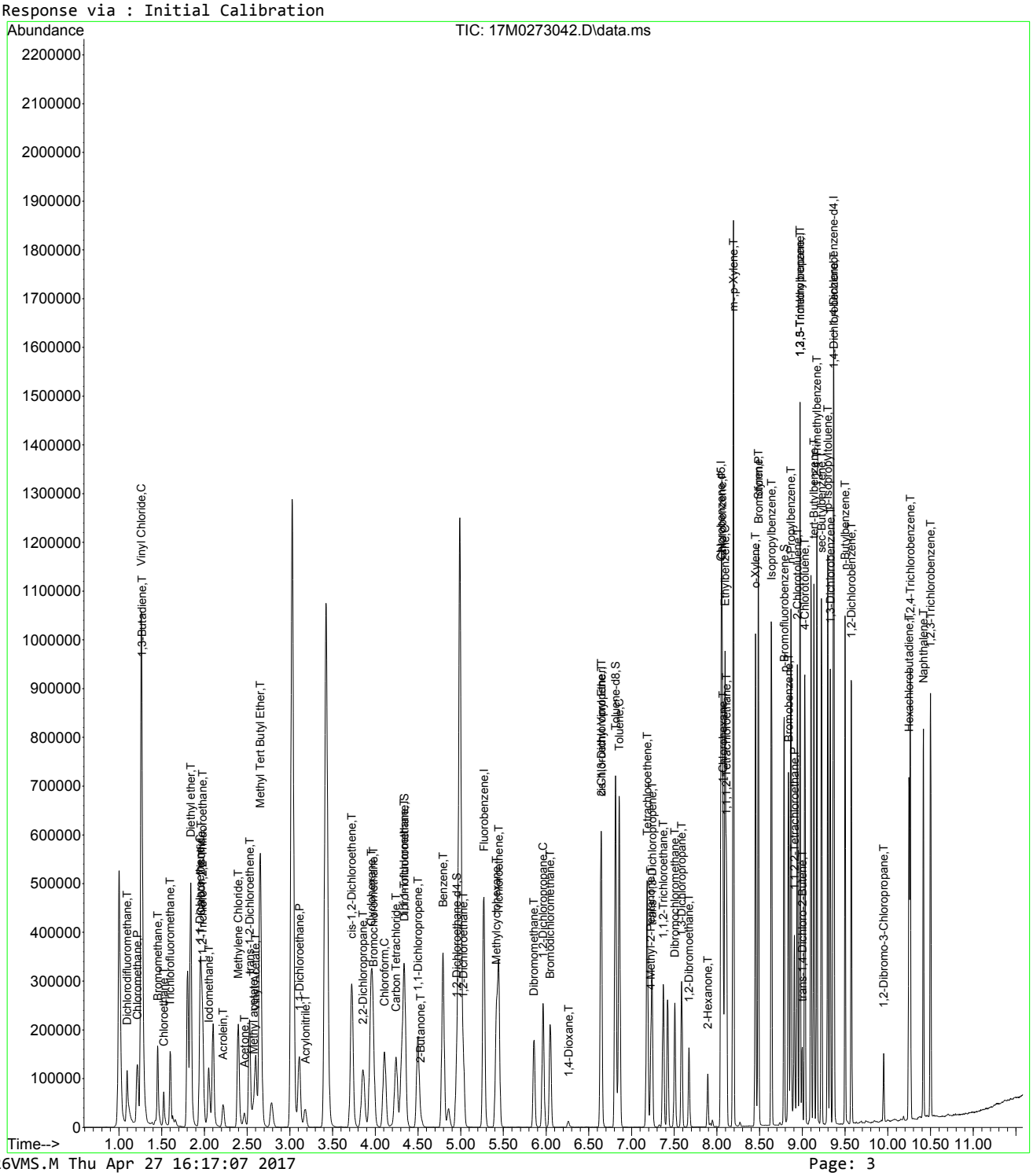
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	119353	19.8263 ug/L	98
53) 1,2-Dibromoethane	7.672	107	73428	18.9207 ug/L	99
54) 2-Hexanone	7.892	43	42315	21.2731 ug/L	100
55) Chlorobenzene	8.060	112	243347	18.5586 ug/L	98
56) 1-Chlorohexane	8.071	69	19087	18.0297 ug/L	85
57) Ethylbenzene	8.095	106	126630	18.5524 ug/L	99
58) 1,1,1,2-Tetrachloroethane	8.112	131	94306	18.4759 ug/L	100
59) m-,p-Xylene	8.193	106	304371	36.9493 ug/L	98
60) o-Xylene	8.451	106	151893	18.7144 ug/L	99
61) Styrene	8.483	104	250824	19.3140 ug/L	100
62) Bromoform	8.485	173	69721	19.1700 ug/L	100
63) Isopropylbenzene	8.639	105	375036	17.8515 ug/L	99
65) 1,3,5-Trimethylbenzene	8.972	105	321904	17.9699 ug/L	99
67) Bromobenzene	8.839	156	114494	18.1135 ug/L	98
68) n-Propylbenzene	8.865	91	418645	17.6425 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	89188	20.6338 ug/L	100
70) 2-Chlorotoluene	8.940	91	258444	17.6453 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	24263	18.9880 ug/L	98
72) trans-1,4-Dichloro-2-B...	8.998	53	14744	15.4784 ug/L #	98
73) 1,2,4-Trimethylbenzene	9.169	105	326567	18.0789 ug/L	100
74) 4-Chlorotoluene	9.030	91	267385	18.2859 ug/L	100
75) tert-Butylbenzene	9.134	134	61808	17.2642 ug/L	98
76) sec-Butylbenzene	9.224	105	378183	17.1365 ug/L	99
77) p-Isopropyltoluene	9.296	119	331832	17.6388 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	194968	17.6935 ug/L	100
79) 1,4-Dichlorobenzene	9.369	146	196508	17.6638 ug/L	100
80) n-Butylbenzene	9.499	91	279284	17.5892 ug/L	98
81) 1,2-Dichlorobenzene	9.574	146	193587	18.0260 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	16481	20.7839 ug/L	94
83) Hexachlorobutadiene	10.246	225	72750	16.0692 ug/L	99
84) 1,2,4-Trichlorobenzene	10.263	180	146245	18.3312 ug/L	100
85) Naphthalene	10.417	128	306233	19.6843 ug/L	100
86) 1,2,3-Trichlorobenzene	10.501	180	139960	18.0611 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273042.D Vial: 15
Acq On : 26 Apr 2017 20:57 Operator: ADC
Sample : L17041075-27 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 21:08:46 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Thu Apr 27 16:17:07 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273111.D Vial: 8
Acq On : 28 Apr 2017 14:53 Operator: ADC
Sample : L17041075-28 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:54 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

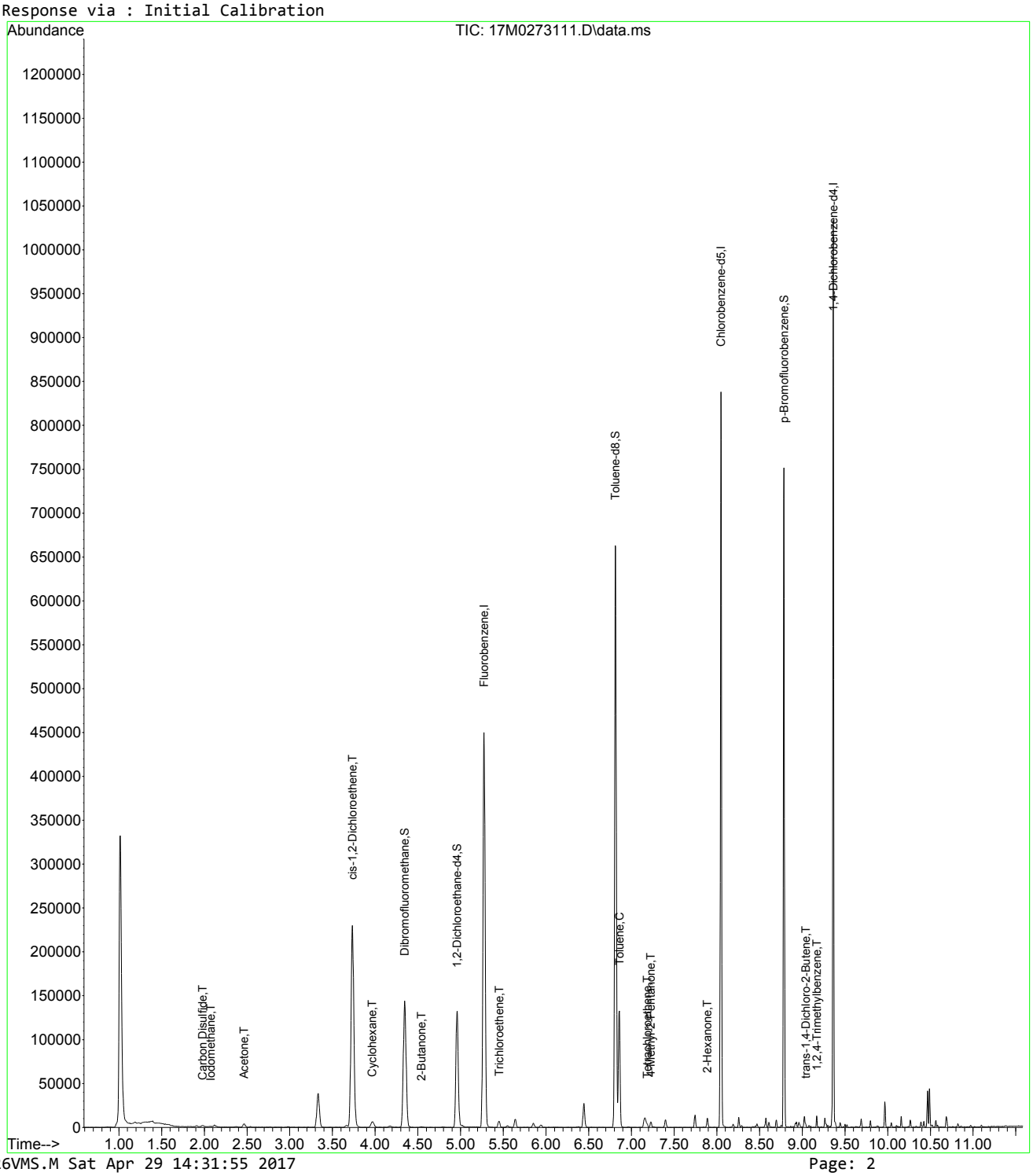
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	385901	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	278446	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	136040	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	102500	24.5942	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.377%			
34) 1,2-Dichloroethane-d4	4.956	65	97008	24.8330	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.332%			
47) Toluene-d8	6.812	98	356926	25.6850	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.740%			
66) p-Bromofluorobenzene	8.786	95	121632	26.7030	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.812%			
Target Compounds						Qvalue
11) Carbon Disulfide	1.979	76	1689	0.1320	ug/L #	73
13) Iodomethane	2.072	142	339	2.0578	ug/L #	35
16) Acetone	2.463	43	4443	5.7262	ug/L	96
23) cis-1,2-Dichloroethene	3.734	96	128711	28.0151	ug/L	99
25) Cyclohexane	3.965	56	4244	0.6844	ug/L #	79
32) 2-Butanone	4.542	43	937	0.8100	ug/L #	37
37) Trichloroethene	5.451	130	2448	0.4958	ug/L	97
44) 4-Methyl-2-Pentanone	7.223	58	1274	1.1895	ug/L	74
48) Toluene	6.858	91	76393	4.3760	ug/L	100
49) Tetrachloroethene	7.185	166	859	0.1725	ug/L	98
54) 2-Hexanone	7.889	43	2775	1.5617	ug/L #	80
72) trans-1,4-Dichloro-2-B...	9.041	53	199	0.2468	ug/L #	1
73) 1,2,4-Trimethylbenzene	9.168	105	3792	0.2480	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

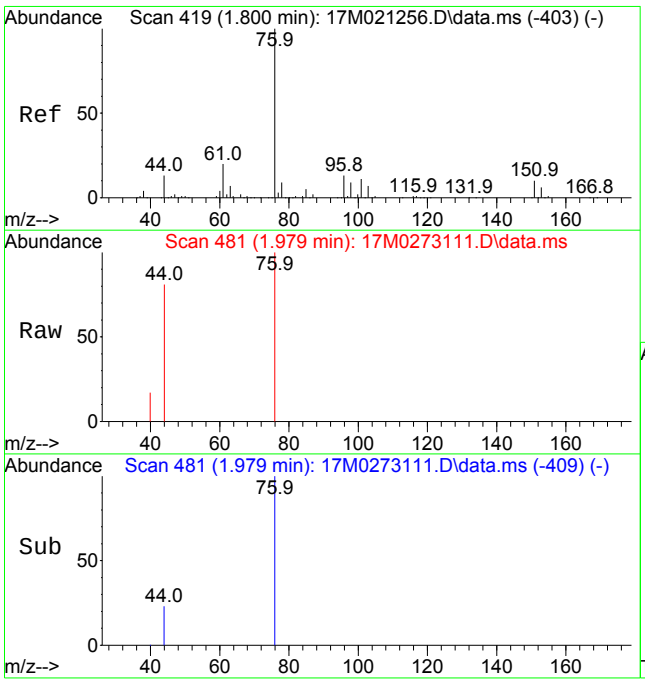
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273111.D Vial: 8
Acq On : 28 Apr 2017 14:53 Operator: ADC
Sample : L17041075-28 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:54 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



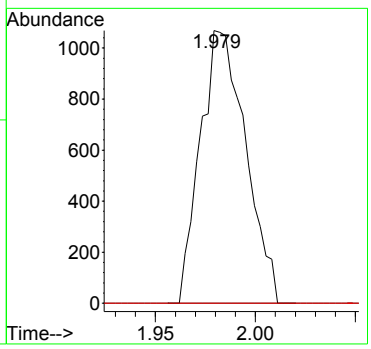
826VMS.M Sat Apr 29 14:31:55 2017 Page: 2

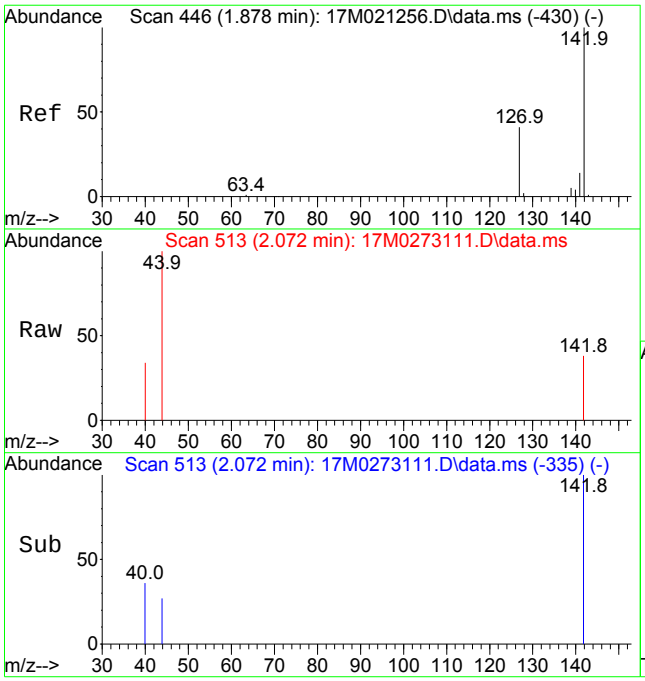


#11
Carbon Disulfide
Concen: 0.1320 ug/L
RT: 1.979 min Scan# 481
Delta R.T. 0.008 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 76 Resp: 1689

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

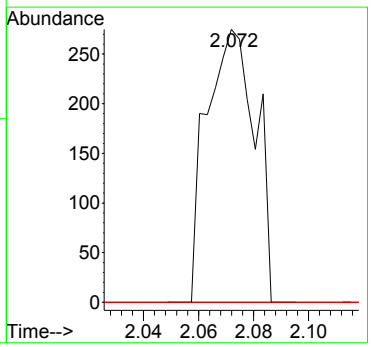


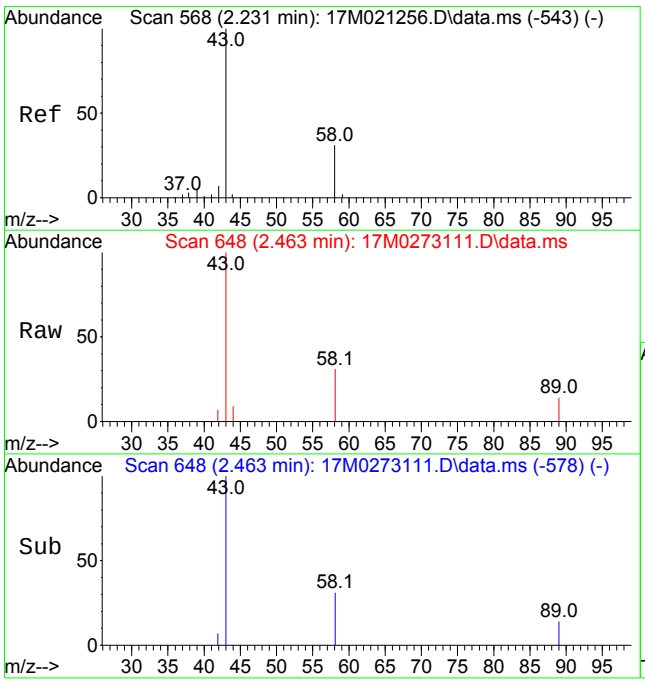


#13
Iodomethane
Concen: 2.0578 ug/L
RT: 2.072 min Scan# 513
Delta R.T. 0.014 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion:142 Resp: 339

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

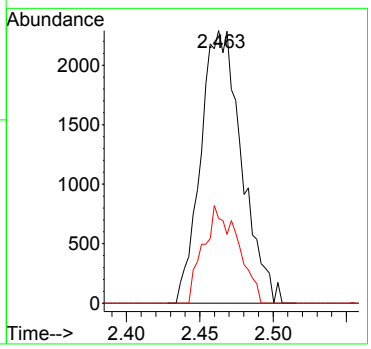


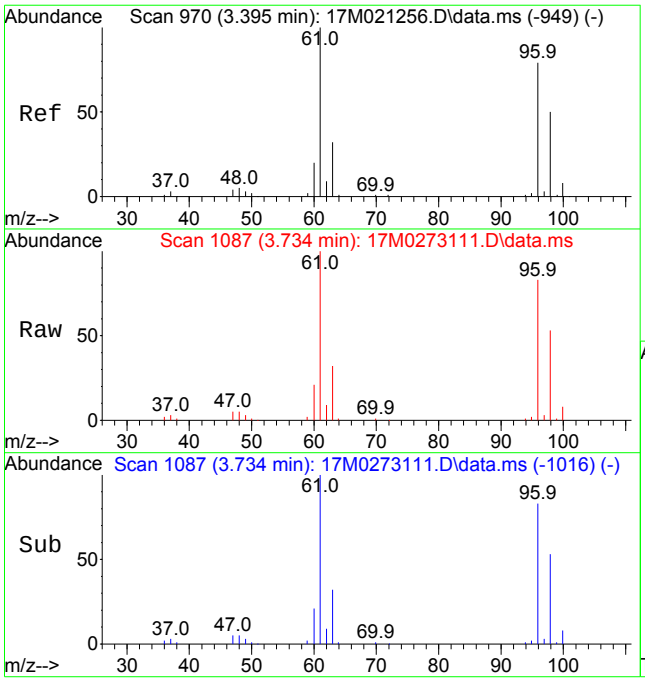


#16
Acetone
Concen: 5.7262 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 43 Resp: 4443

Ion	Ratio	Lower	Upper
43	100		
58	30.1	19.4	45.2

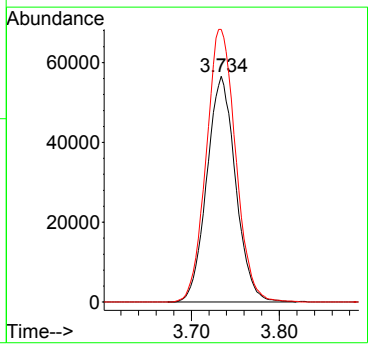


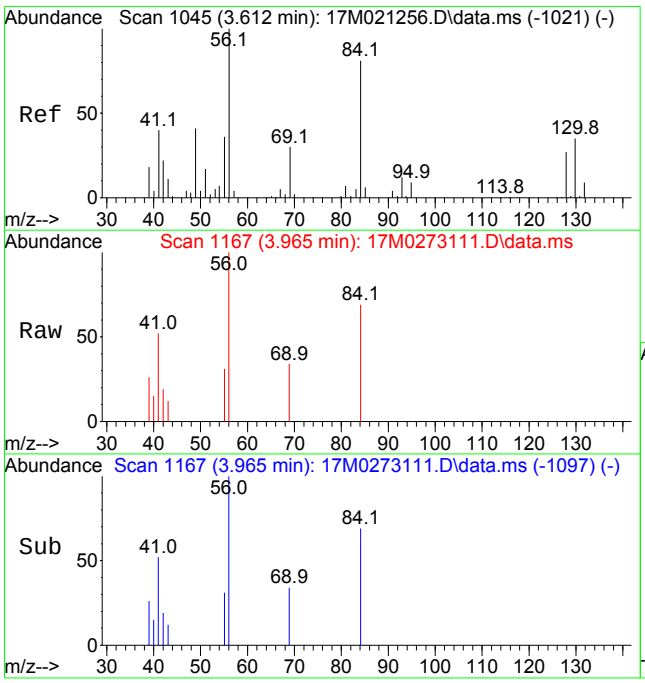


#23
cis-1,2-Dichloroethene
Concen: 28.0151 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 96 Resp: 128711

Ion	Ratio	Lower	Upper
96	100		
61	123.8	98.1	147.1

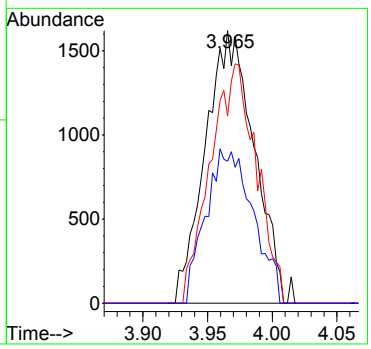


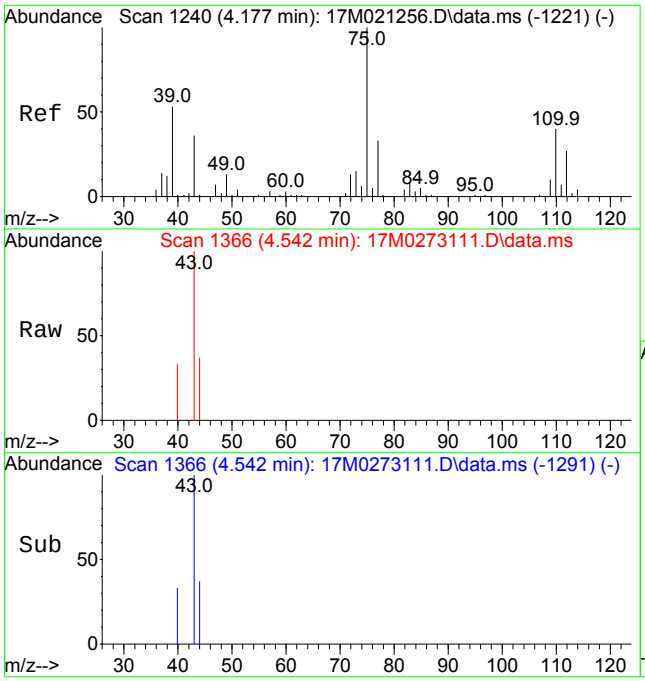


#25
Cyclohexane
Concen: 0.6844 ug/L
RT: 3.965 min Scan# 1167
Delta R.T. 0.002 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 56 Resp: 4244

Ion	Ratio	Lower	Upper
56	100		
84	83.0	69.4	104.0
41	54.5	72.2	108.2#

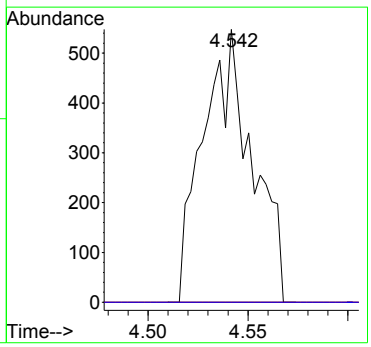


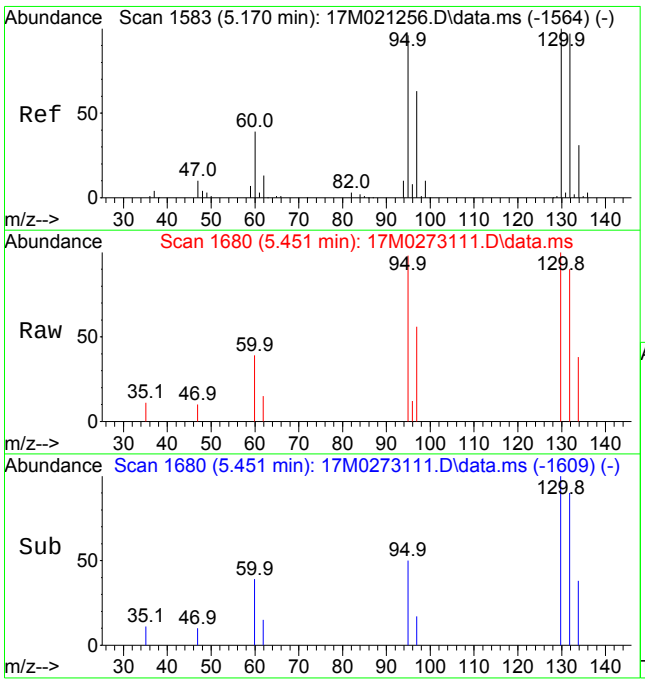


#32
2-Butanone
Concen: 0.8100 ug/L
RT: 4.542 min Scan# 1366
Delta R.T. 0.018 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 43 Resp: 937

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

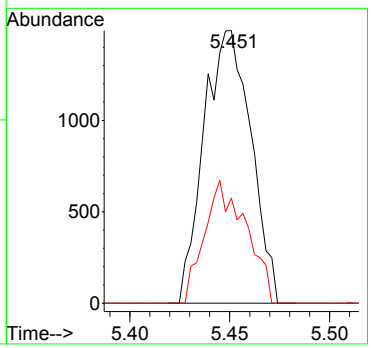


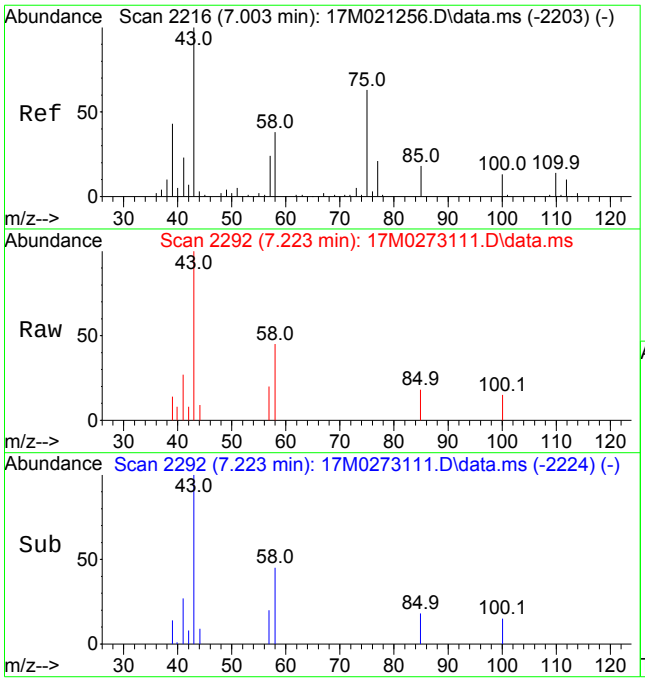


#37
Trichloroethene
Concen: 0.4958 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion:130 Resp: 2448

Ion	Ratio	Lower	Upper
130	100		
60	39.7	22.9	53.3

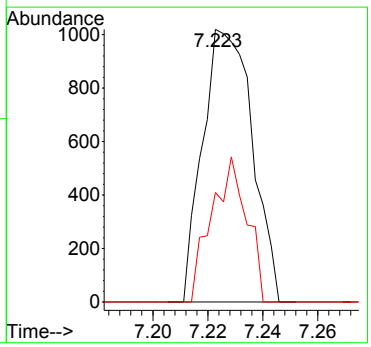


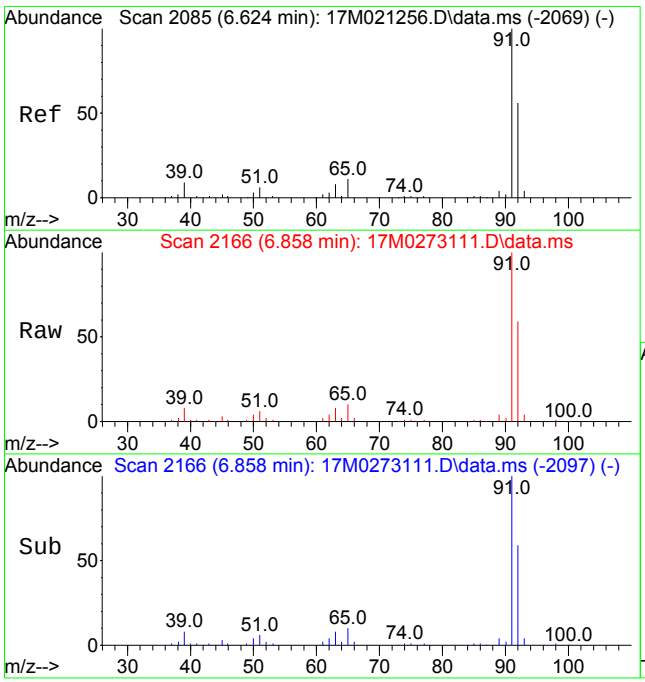


#44
4-Methyl-2-Pentanone
Concen: 1.1895 ug/L
RT: 7.223 min Scan# 2292
Delta R.T. -0.003 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 58 Resp: 1274

Ion	Ratio	Lower	Upper
58	100		
85	38.0	34.1	79.5

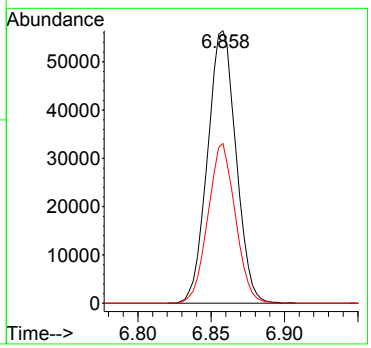


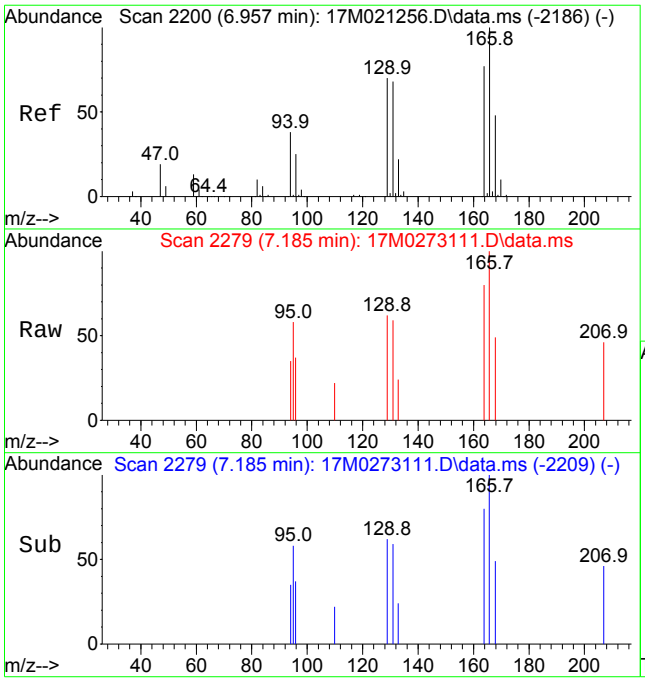


#48
Toluene
Concen: 4.3760 ug/L
RT: 6.858 min Scan# 2166
Delta R.T. -0.000 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 91 Resp: 76393

Ion	Ratio	Lower	Upper
91	100		
92	56.3	33.8	78.8

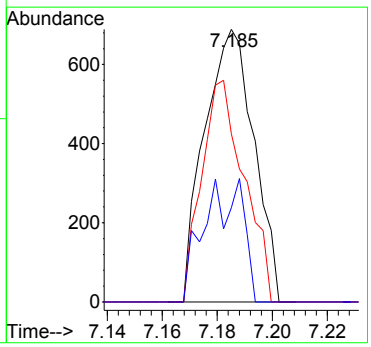


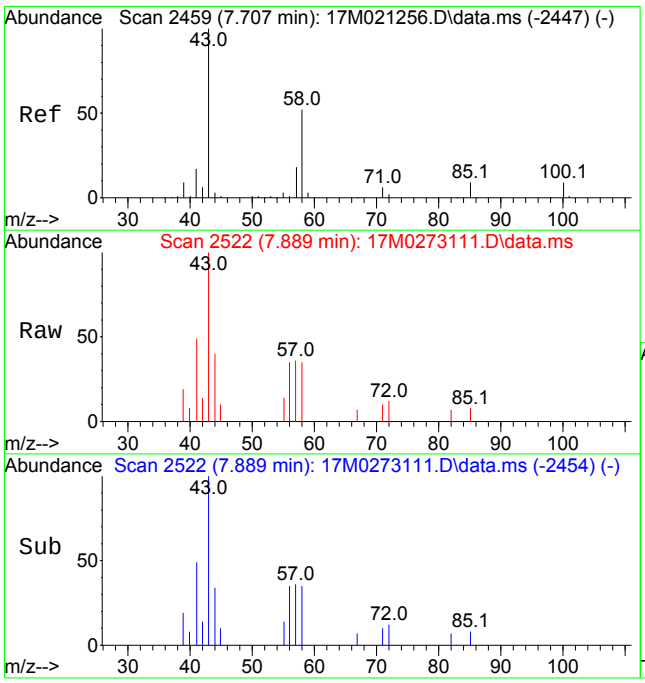


#49
Tetrachloroethene
Concen: 0.1725 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion:166 Resp: 859

Ion	Ratio	Lower	Upper
166	100		
129	69.5	56.2	84.4
94	35.3	29.7	44.5

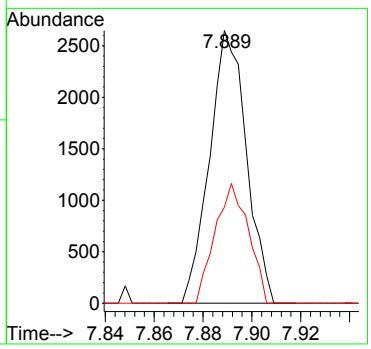


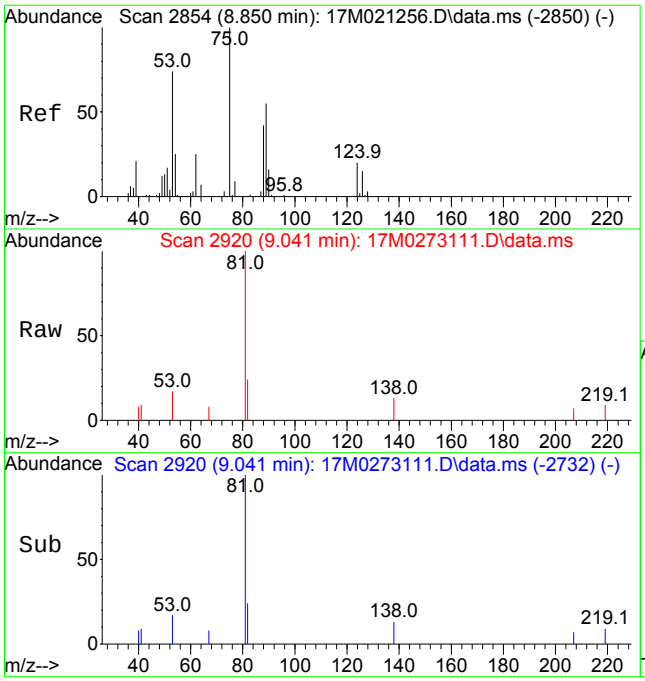


#54
2-Hexanone
Concen: 1.5617 ug/L
RT: 7.889 min Scan# 2522
Delta R.T. -0.003 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 43 Resp: 2775

Ion	Ratio	Lower	Upper
43	100		
58	39.8	43.3	64.9#

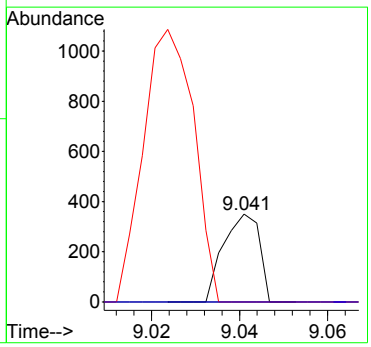


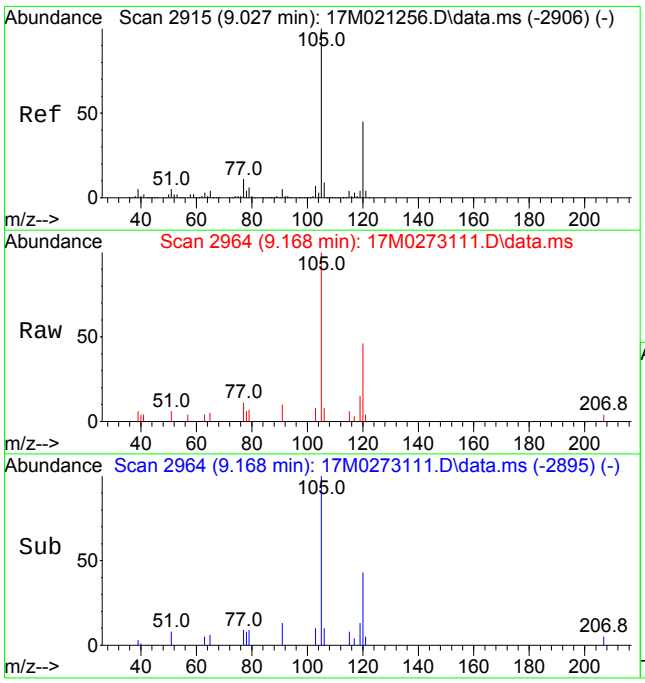


#72
trans-1,4-Dichloro-2-Butene
Concen: 0.2468 ug/L
RT: 9.041 min Scan# 2920
Delta R.T. 0.043 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion: 53 Resp: 199

Ion	Ratio	Lower	Upper
53	100		
75	435.7	152.7	152.7#
89	0.0	68.6	102.8#

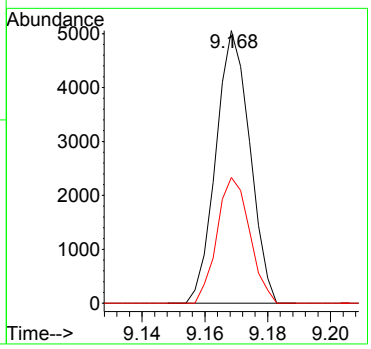




#73
1,2,4-Trimethylbenzene
Concen: 0.2480 ug/L
RT: 9.168 min Scan# 2964
Delta R.T. -0.001 min
Lab File: 17M0273111.D
Acq: 28 Apr 2017 14:53

Tgt Ion:105 Resp: 3792

Ion	Ratio	Lower	Upper
105	100		
120	44.4	37.0	55.4



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273108.D Vial: 5
Acq On : 28 Apr 2017 13:40 Operator: ADC
Sample : L17041075-29 B MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	371463	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	277710	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	141267	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	102043	25.4362	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.745%			
34) 1,2-Dichloroethane-d4	4.956	65	94838	25.2211	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.884%			
47) Toluene-d8	6.812	98	353554	25.5098	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.039%			
66) p-Bromofluorobenzene	8.783	95	122310	25.8583	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.433%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	110340	25.0112	ug/L	100
3) Chloromethane	1.218	50	88260	20.4426	ug/L	98
4) Vinyl Chloride	1.264	62	108266	22.6461	ug/L	98
5) 1,3-Butadiene	1.276	54	90379	30.7897	ug/L	99
6) Bromomethane	1.458	94	58938	16.5817	ug/L	99
7) Chloroethane	1.531	64	47412	20.9047	ug/L	99
8) Trichlorofluoromethane	1.615	101	127878	20.8530	ug/L	100
9) Diethyl ether	1.840	59	175272	59.2685	ug/L	98
10) 1,1-Dichloroethene	1.959	61	111326	19.4019	ug/L	98
11) Carbon Disulfide	1.974	76	208130	16.9005	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	76957	21.0373	ug/L	98
13) Iodomethane	2.061	142	114965	21.9454	ug/L	99
14) Acrolein	2.220	56	26327	72.0705	ug/L	100
15) Methylene Chloride	2.402	84	81253	18.6620	ug/L	98
16) Acetone	2.463	43	15354	20.5574	ug/L	98
17) trans-1,2-Dichloroethene	2.538	96	75939	19.4368	ug/L	99
18) Methyl acetate	2.573	43	34864	17.8054	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	190226	19.1851	ug/L #	47
20) 1,1-Dichloroethane	3.114	63	138946	19.8004	ug/L	100
21) Acrylonitrile	3.184	53	17563	18.4361	ug/L	100
22) Vinyl Acetate	2.614	86	12552	19.9617	ug/L	97
23) cis-1,2-Dichloroethene	3.731	96	199236	45.0510	ug/L	99
24) 2,2-Dichloropropane	3.864	77	117670	21.3240	ug/L	97
25) Cyclohexane	3.963	56	109427	18.3337	ug/L	90
26) Bromochloromethane	3.983	130	56815	19.9393	ug/L	100
27) Chloroform	4.113	83	144731	19.7820	ug/L	100
28) Carbon Tetrachloride	4.249	117	115616	19.9836	ug/L	99
30) 1,1,1-Trichloroethane	4.342	97	129188	20.0841	ug/L	99
31) 1,1-Dichloropropene	4.504	75	98613	19.5208	ug/L	99
32) 2-Butanone	4.530	43	19871	17.8457	ug/L	99
33) Benzene	4.797	78	306702	19.3838	ug/L	99
35) 1,2-Dichloroethane	5.034	62	95291	19.3413	ug/L	99
36) Methylcyclohexane	5.422	83	114733	18.3471	ug/L	99
37) Trichloroethene	5.445	130	87835	18.4818	ug/L	99
38) Dibromomethane	5.859	93	46588	19.2243	ug/L	99
39) 1,2-Dichloropropane	5.966	63	81454	19.6304	ug/L	100
40) Bromodichloromethane	6.050	83	105814	19.1060	ug/L	99
41) 1,4-Dioxane	6.256	88	2118	102.4805	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.644	63	1501	0.7975	ug/L	87
43) cis-1,3-Dichloropropene	6.647	75	129880	20.8111	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	20544	19.9270	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	103216	19.4542	ug/L	99
48) Toluene	6.858	91	409450	23.5165	ug/L	100
49) Tetrachloroethene	7.182	166	96179	19.3674	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	62998	18.6675	ug/L	99
51) Dibromochloromethane	7.507	129	86212	18.7158	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273108.D Vial: 5
Acq On : 28 Apr 2017 13:40 Operator: ADC
Sample : L17041075-29 B MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

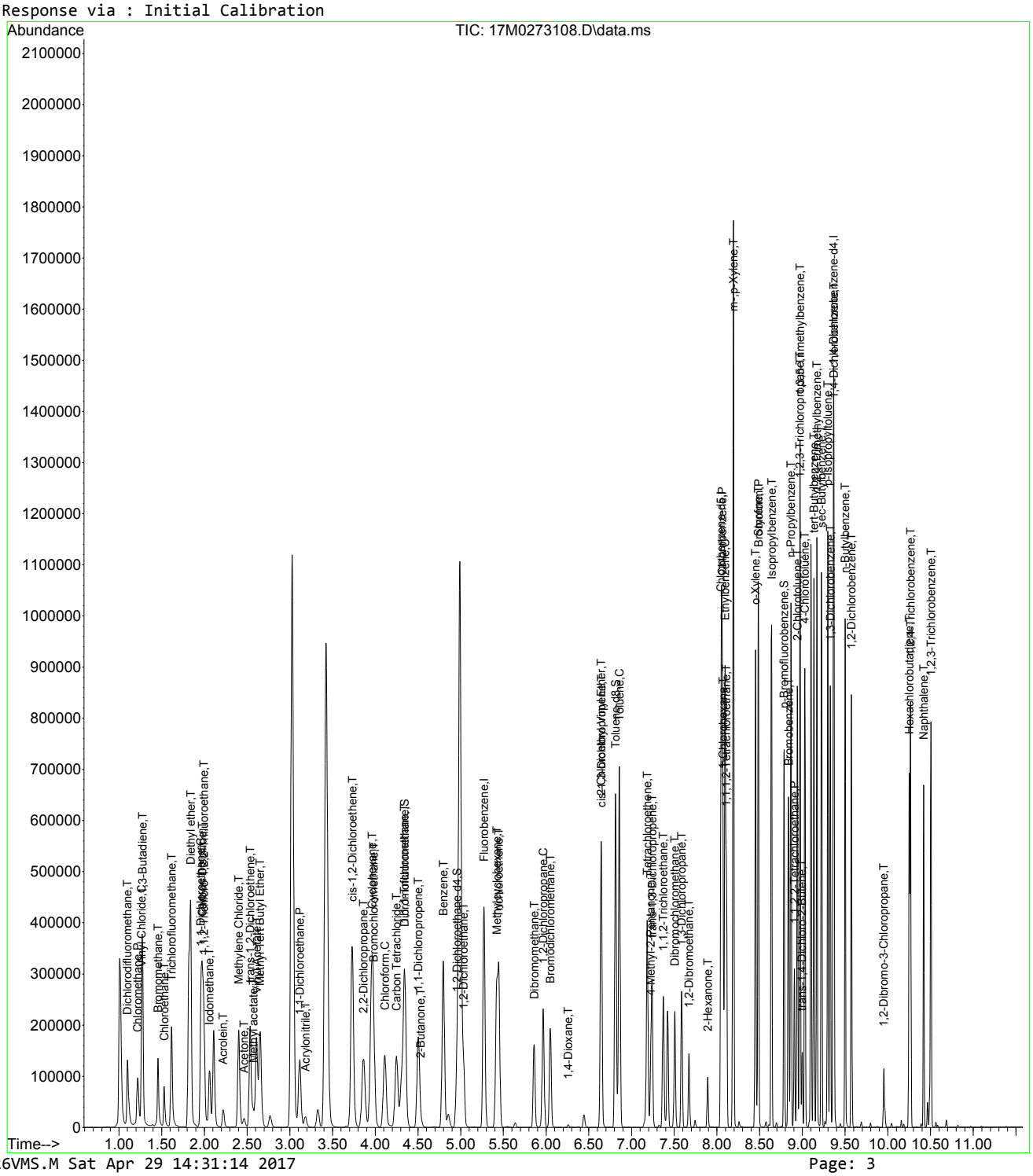
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	106572	19.8700	ug/L		99
53) 1,2-Dibromoethane	7.672	107	64617	18.6884	ug/L		100
54) 2-Hexanone	7.892	43	36762	20.7435	ug/L		96
55) Chlorobenzene	8.060	112	222358	19.0335	ug/L		98
56) 1-Chlorohexane	8.071	69	19452	20.6236	ug/L		96
57) Ethylbenzene	8.094	106	117581	19.3352	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.109	131	85546	18.8111	ug/L		99
59) m-,p-Xylene	8.193	106	286614	39.0524	ug/L		98
60) o-Xylene	8.451	106	137739	19.0478	ug/L		96
61) Styrene	8.482	104	230116	19.8883	ug/L		99
62) Bromoform	8.485	173	60213	18.5822	ug/L		99
63) Isopropylbenzene	8.639	105	352897	18.8537	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	307499	19.5259	ug/L		98
67) Bromobenzene	8.838	156	103197	18.5710	ug/L		98
68) n-Propylbenzene	8.865	91	407847	19.5506	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	77986	20.5228	ug/L		100
70) 2-Chlorotoluene	8.940	91	243538	18.9137	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	20933	18.6344	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	13536	16.1640	ug/L	#	92
73) 1,2,4-Trimethylbenzene	9.169	105	313263	19.7268	ug/L		100
74) 4-Chlorotoluene	9.030	91	252577	19.6481	ug/L		99
75) tert-Butylbenzene	9.134	134	60165	19.1159	ug/L		99
76) sec-Butylbenzene	9.224	105	374117	19.2831	ug/L		99
77) p-Isopropyltoluene	9.296	119	326654	19.7509	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	184129	19.0073	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	183289	18.7409	ug/L		100
80) n-Butylbenzene	9.499	91	282363	20.2282	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	176339	18.6775	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13276	19.0440	ug/L		96
83) Hexachlorobutadiene	10.251	225	71965	18.0813	ug/L		99
84) 1,2,4-Trichlorobenzene	10.266	180	132514	18.8938	ug/L		99
85) Naphthalene	10.419	128	249423	18.2370	ug/L		99
86) 1,2,3-Trichlorobenzene	10.503	180	125972	18.4911	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273108.D Vial: 5
Acq On : 28 Apr 2017 13:40 Operator: ADC
Sample : L17041075-29 B MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:14 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273109.D Vial: 6
Acq On : 28 Apr 2017 14:00 Operator: ADC
Sample : L17041075-30 B MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	376473	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	283157	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	142732	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	102641	25.2448	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.979%			
34) 1,2-Dichloroethane-d4	4.959	65	97268	25.5231	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.092%			
47) Toluene-d8	6.812	98	354611	25.0939	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.376%			
66) p-Bromofluorobenzene	8.787	95	119750	25.0573	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.229%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	107794	24.1089	ug/L	100
3) Chloromethane	1.221	50	90116	20.5947	ug/L	99
4) Vinyl Chloride	1.267	62	108608	22.4153	ug/L	99
5) 1,3-Butadiene	1.276	54	90483	30.4150	ug/L	100
6) Bromomethane	1.458	94	58952	16.3650	ug/L	99
7) Chloroethane	1.531	64	52344	22.7722	ug/L	96
8) Trichlorofluoromethane	1.615	101	124274	19.9957	ug/L	100
9) Diethyl ether	1.843	59	174705	58.2906	ug/L	98
10) 1,1-Dichloroethene	1.959	61	107257	18.4440	ug/L	98
11) Carbon Disulfide	1.974	76	203089	16.2717	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	74991	20.2271	ug/L	98
13) Iodomethane	2.061	142	115525	21.7758	ug/L	99
14) Acrolein	2.226	56	27536	74.3770	ug/L	100
15) Methylene Chloride	2.402	84	79982	18.1257	ug/L	98
16) Acetone	2.466	43	17803	23.5192	ug/L	100
17) trans-1,2-Dichloroethene	2.538	96	74297	18.7634	ug/L	100
18) Methyl acetate	2.576	43	39988	20.1505	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	197039	19.6078	ug/L	97
20) 1,1-Dichloroethane	3.117	63	136377	19.1756	ug/L	100
21) Acrylonitrile	3.184	53	18399	19.0567	ug/L	99
22) Vinyl Acetate	2.614	86	11876	18.6354	ug/L	88
23) cis-1,2-Dichloroethene	3.731	96	200065	44.6365	ug/L	99
24) 2,2-Dichloropropane	3.864	77	113445	20.2981	ug/L	98
25) Cyclohexane	3.966	56	106968	17.6832	ug/L	90
26) Bromochloromethane	3.980	130	56984	19.7325	ug/L	100
27) Chloroform	4.113	83	142126	19.1674	ug/L	99
28) Carbon Tetrachloride	4.252	117	112942	19.2616	ug/L	99
30) 1,1,1-Trichloroethane	4.342	97	126361	19.3831	ug/L	99
31) 1,1-Dichloropropene	4.507	75	96136	18.7772	ug/L	99
32) 2-Butanone	4.536	43	21442	19.0003	ug/L	98
33) Benzene	4.797	78	300660	18.7490	ug/L	100
35) 1,2-Dichloroethane	5.034	62	94810	18.9876	ug/L	99
36) Methylcyclohexane	5.422	83	111297	17.5608	ug/L	98
37) Trichloroethene	5.448	130	86660	17.9919	ug/L	99
38) Dibromomethane	5.862	93	47712	19.4261	ug/L	100
39) 1,2-Dichloropropane	5.966	63	79973	19.0170	ug/L	99
40) Bromodichloromethane	6.050	83	104372	18.5949	ug/L	100
41) 1,4-Dioxane	6.262	88	2494	119.0676	ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.644	63	1414	0.7413	ug/L	81
43) cis-1,3-Dichloropropene	6.647	75	130034	20.5585	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	22045	21.0984	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	104725	19.4759	ug/L	100
48) Toluene	6.858	91	400742	22.5736	ug/L	100
49) Tetrachloroethene	7.185	166	93817	18.5283	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	64471	18.7365	ug/L	100
51) Dibromochloromethane	7.507	129	87403	18.6093	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273109.D Vial: 6
Acq On : 28 Apr 2017 14:00 Operator: ADC
Sample : L17041075-30 B MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

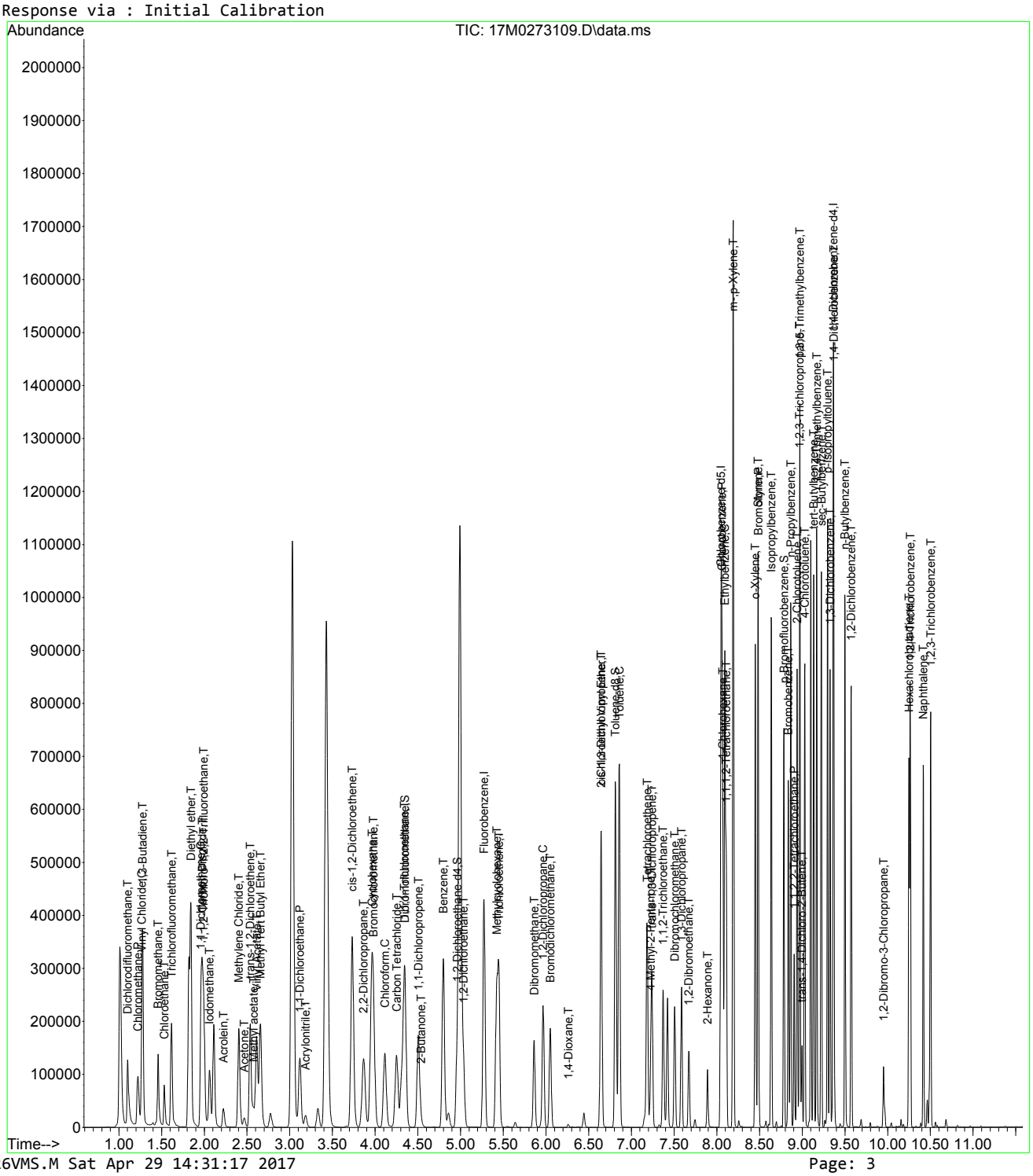
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	106405	19.4573 ug/L	98
53) 1,2-Dibromoethane	7.672	107	66065	18.7396 ug/L	100
54) 2-Hexanone	7.892	43	39680	21.9594 ug/L	97
55) Chlorobenzene	8.060	112	217336	18.2458 ug/L	97
56) 1-Chlorohexane	8.071	69	18987	19.7433 ug/L	98
57) Ethylbenzene	8.095	106	114446	18.4576 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.109	131	84566	18.2379 ug/L	100
59) m-,p-Xylene	8.193	106	280114	37.4326 ug/L	97
60) o-Xylene	8.451	106	136117	18.4614 ug/L	97
61) Styrene	8.482	104	226693	19.2155 ug/L	100
62) Bromoform	8.485	173	62199	18.8259 ug/L	100
63) Isopropylbenzene	8.636	105	348629	18.2674 ug/L	99
65) 1,3,5-Trimethylbenzene	8.972	105	301482	18.9473 ug/L	98
67) Bromobenzene	8.836	156	102538	18.2630 ug/L	98
68) n-Propylbenzene	8.865	91	395629	18.7702 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	80266	20.9060 ug/L	100
70) 2-Chlorotoluene	8.940	91	239473	18.4072 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	21645	19.0704 ug/L	97
72) trans-1,4-Dichloro-2-B...	8.995	53	14639	17.3017 ug/L #	91
73) 1,2,4-Trimethylbenzene	9.169	105	307216	19.1474 ug/L	100
74) 4-Chlorotoluene	9.030	91	247871	19.0841 ug/L	99
75) tert-Butylbenzene	9.134	134	57613	18.1171 ug/L	96
76) sec-Butylbenzene	9.224	105	364711	18.6053 ug/L	99
77) p-Isopropyltoluene	9.296	119	319436	19.1162 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	179399	18.3289 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	180313	18.2473 ug/L	99
80) n-Butylbenzene	9.499	91	277371	19.6666 ug/L	97
81) 1,2-Dichlorobenzene	9.574	146	176001	18.4504 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13733	19.4974 ug/L	93
83) Hexachlorobutadiene	10.249	225	71254	17.7189 ug/L	100
84) 1,2,4-Trichlorobenzene	10.266	180	134075	18.9201 ug/L	100
85) Naphthalene	10.417	128	258979	18.7414 ug/L	100
86) 1,2,3-Trichlorobenzene	10.503	180	127527	18.5272 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273109.D Vial: 6
Acq On : 28 Apr 2017 14:00 Operator: ADC
Sample : L17041075-30 B MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:17 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273046.D Vial: 19
Acq On : 26 Apr 2017 22:33 Operator: ADC
Sample : L17041075-31 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

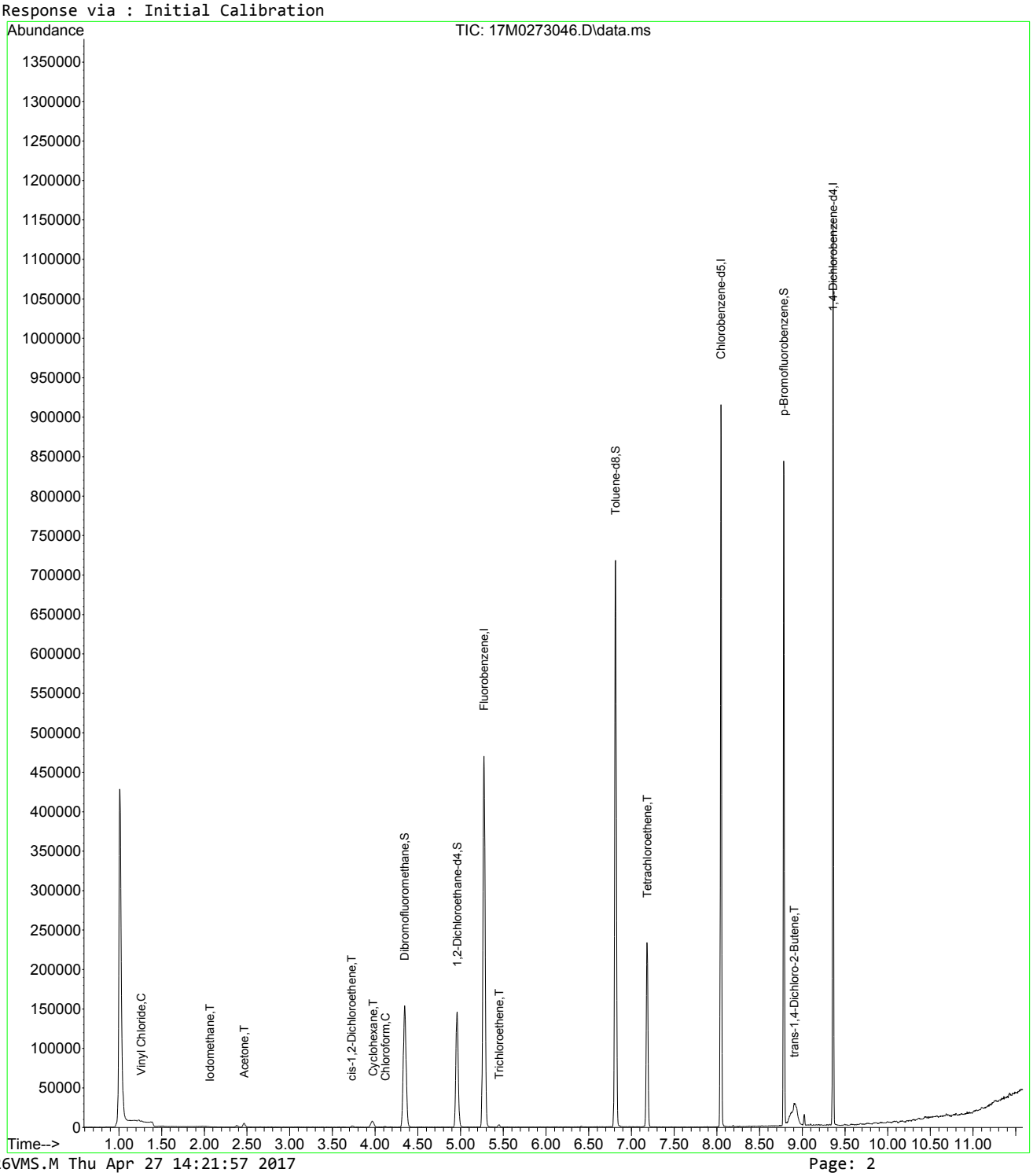
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	414072	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	310503	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	153735	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	110603	24.7329 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.932%		
34) 1,2-Dichloroethane-d4	4.959	65	106859	25.4937 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.975%		
47) Toluene-d8	6.815	98	396492	25.5865 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.346%		
66) p-Bromofluorobenzene	8.784	95	136835	26.5830 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.332%		
Target Compounds					Qvalue
4) Vinyl Chloride	1.262	62	1044	0.1959 ug/L	96
13) Iodomethane	2.066	142	123	2.0203 ug/L #	35
16) Acetone	2.466	43	6407	7.6956 ug/L	93
23) cis-1,2-Dichloroethene	3.725	96	991	0.2010 ug/L	94
25) Cyclohexane	3.974	56	5375	0.8079 ug/L #	80
27) Chloroform	4.119	83	1197	0.1468 ug/L #	81
37) Trichloroethene	5.451	130	1105	0.2086 ug/L	90
49) Tetrachloroethene	7.185	166	57179	10.2980 ug/L	99
72) trans-1,4-Dichloro-2-B...	8.905	53	198	0.2173 ug/L #	1

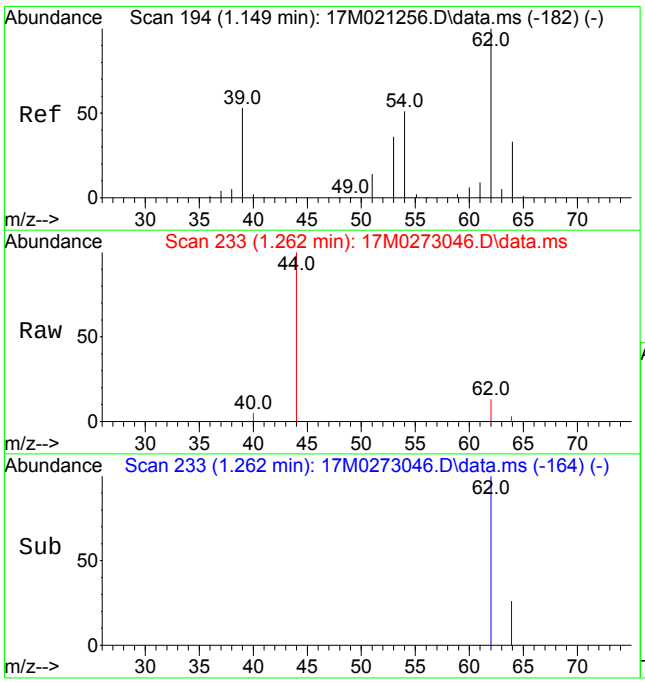
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273046.D Vial: 19
Acq On : 26 Apr 2017 22:33 Operator: ADC
Sample : L17041075-31 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

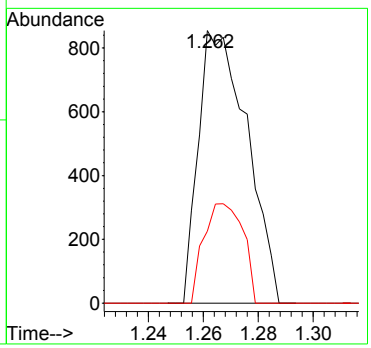


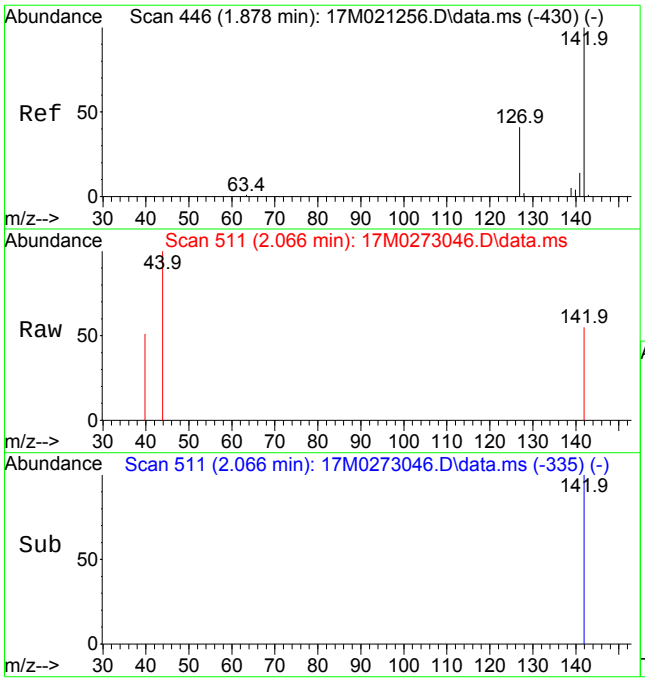


#4
Vinyl Chloride
Concen: 0.1959 ug/L
RT: 1.262 min Scan# 233
Delta R.T. 0.001 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 62 Resp: 1044

Ion	Ratio	Lower	Upper
62	100		
64	29.5	19.2	44.8

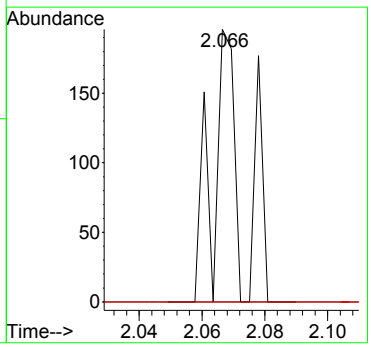


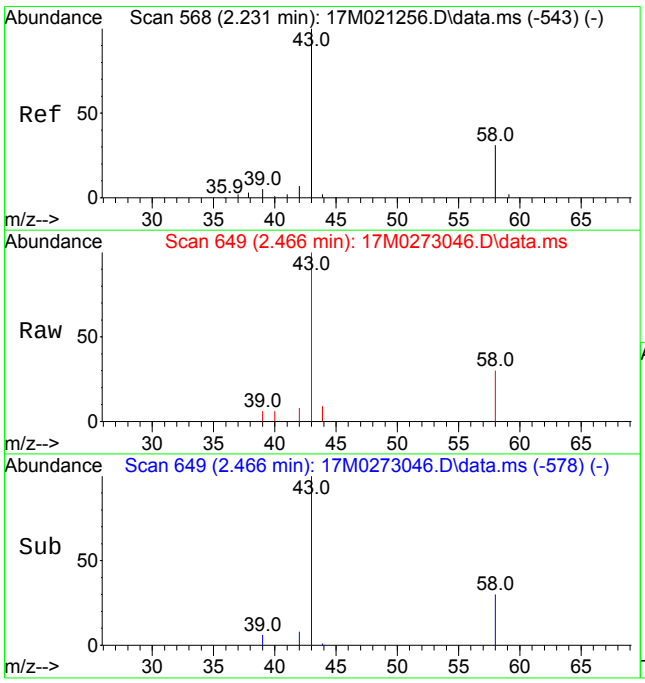


#13
Iodomethane
Concen: 2.0203 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion:142 Resp: 123

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

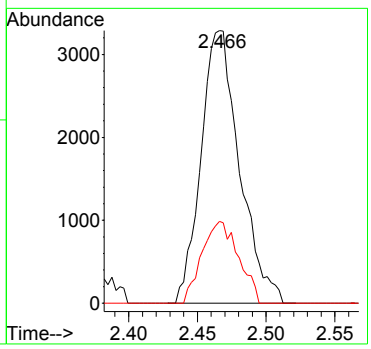


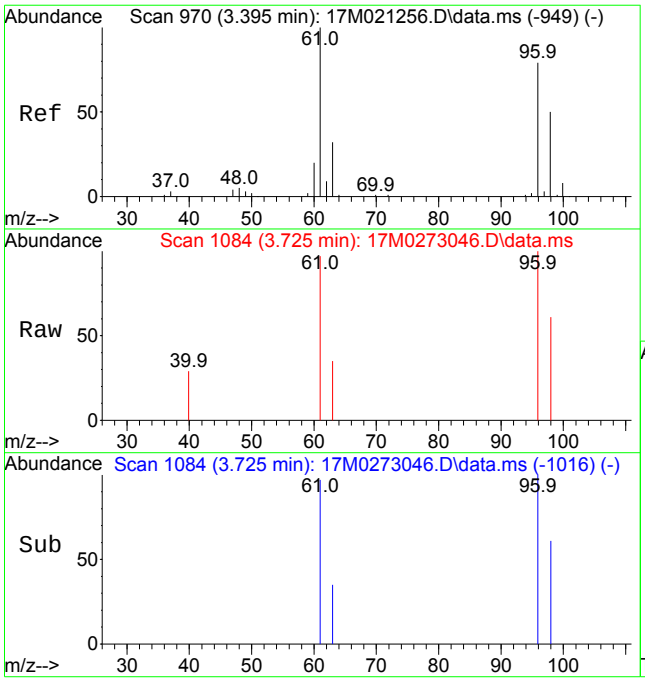


#16
Acetone
Concen: 7.6956 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 43 Resp: 6407

Ion	Ratio	Lower	Upper
43	100		
58	28.5	19.4	45.2

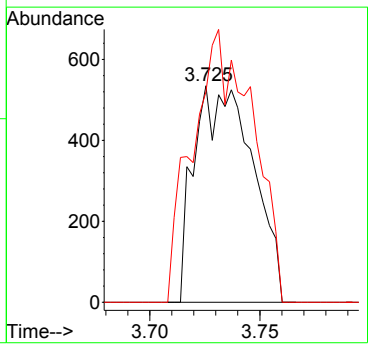


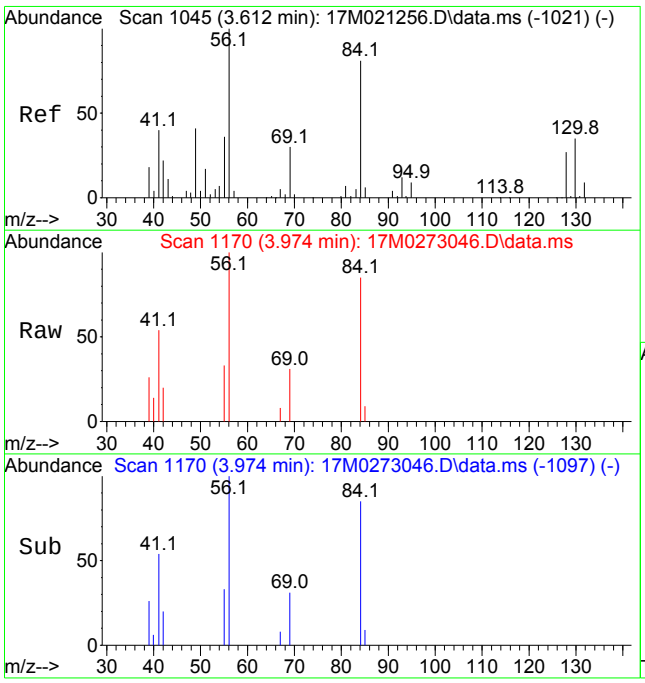


#23
cis-1,2-Dichloroethene
Concen: 0.2010 ug/L
RT: 3.725 min Scan# 1084
Delta R.T. -0.003 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 96 Resp: 991

Ion	Ratio	Lower	Upper
96	100		
61	129.7	98.1	147.1

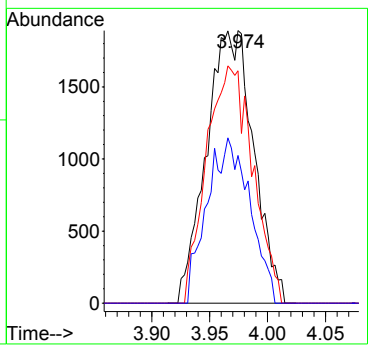


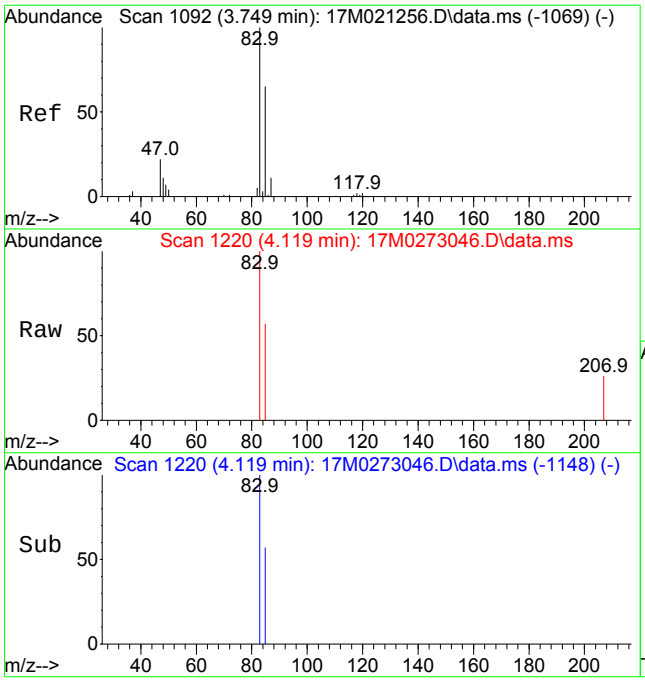


#25
Cyclohexane
Concen: 0.8079 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 56 Resp: 5375

Ion	Ratio	Lower	Upper
56	100		
84	85.2	69.4	104.0
41	54.6	72.2	108.2#

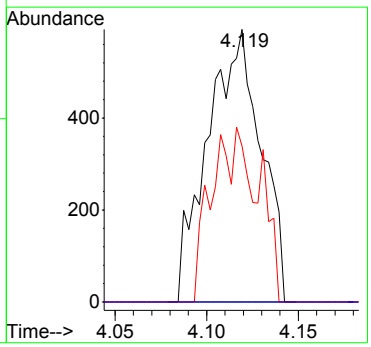


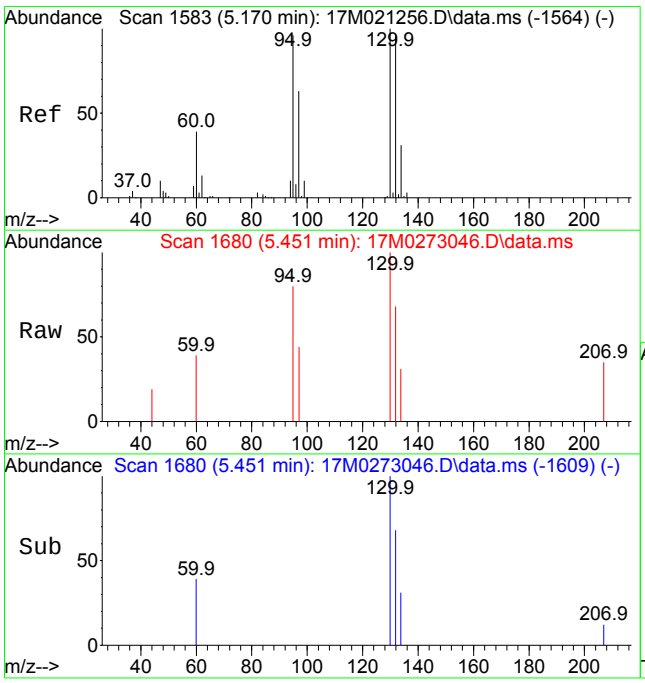


#27
Chloroform
Concen: 0.1468 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 83 Resp: 1197

Ion	Ratio	Lower	Upper
83	100		
85	57.0	39.2	91.4
47	0.0	12.9	30.1#

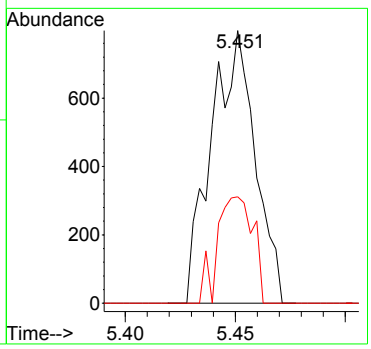


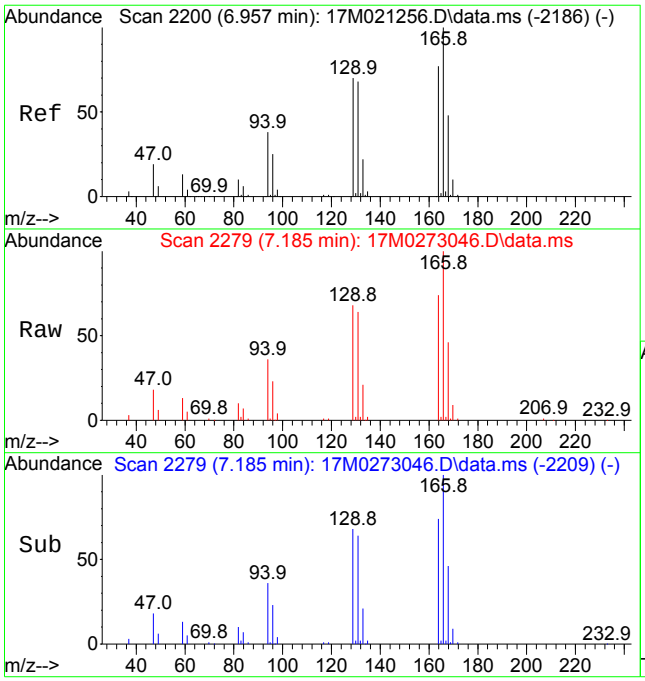


#37
Trichloroethene
Concen: 0.2086 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion:130 Resp: 1105

Ion	Ratio	Lower	Upper
130	100		
60	31.9	22.9	53.3

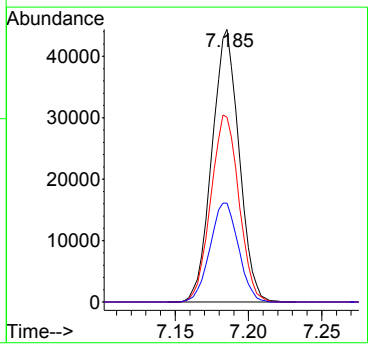


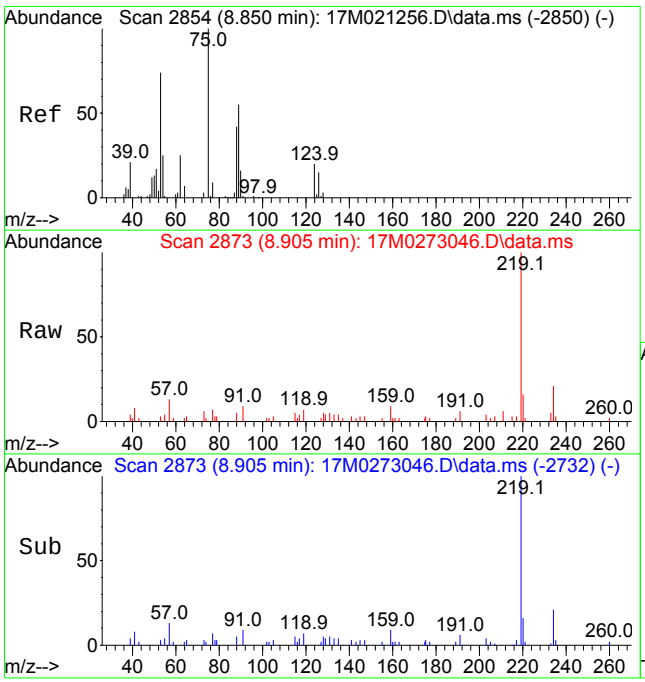


#49
Tetrachloroethene
Concen: 10.2980 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion:166 Resp: 57179

Ion	Ratio	Lower	Upper
166	100		
129	70.9	56.2	84.4
94	38.0	29.7	44.5

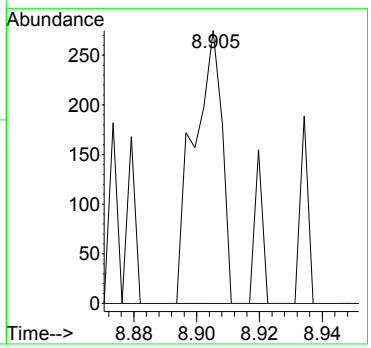




#72
trans-1,4-Dichloro-2-Butene
Concen: 0.2173 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. -0.093 min
Lab File: 17M0273046.D
Acq: 26 Apr 2017 22:33

Tgt Ion: 53 Resp: 198

Ion	Ratio	Lower	Upper
53	100		
75	0.0	152.7	152.7#
89	0.0	68.6	102.8#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273047.D Vial: 20
Acq On : 26 Apr 2017 23:01 Operator: ADC
Sample : L17041075-32 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

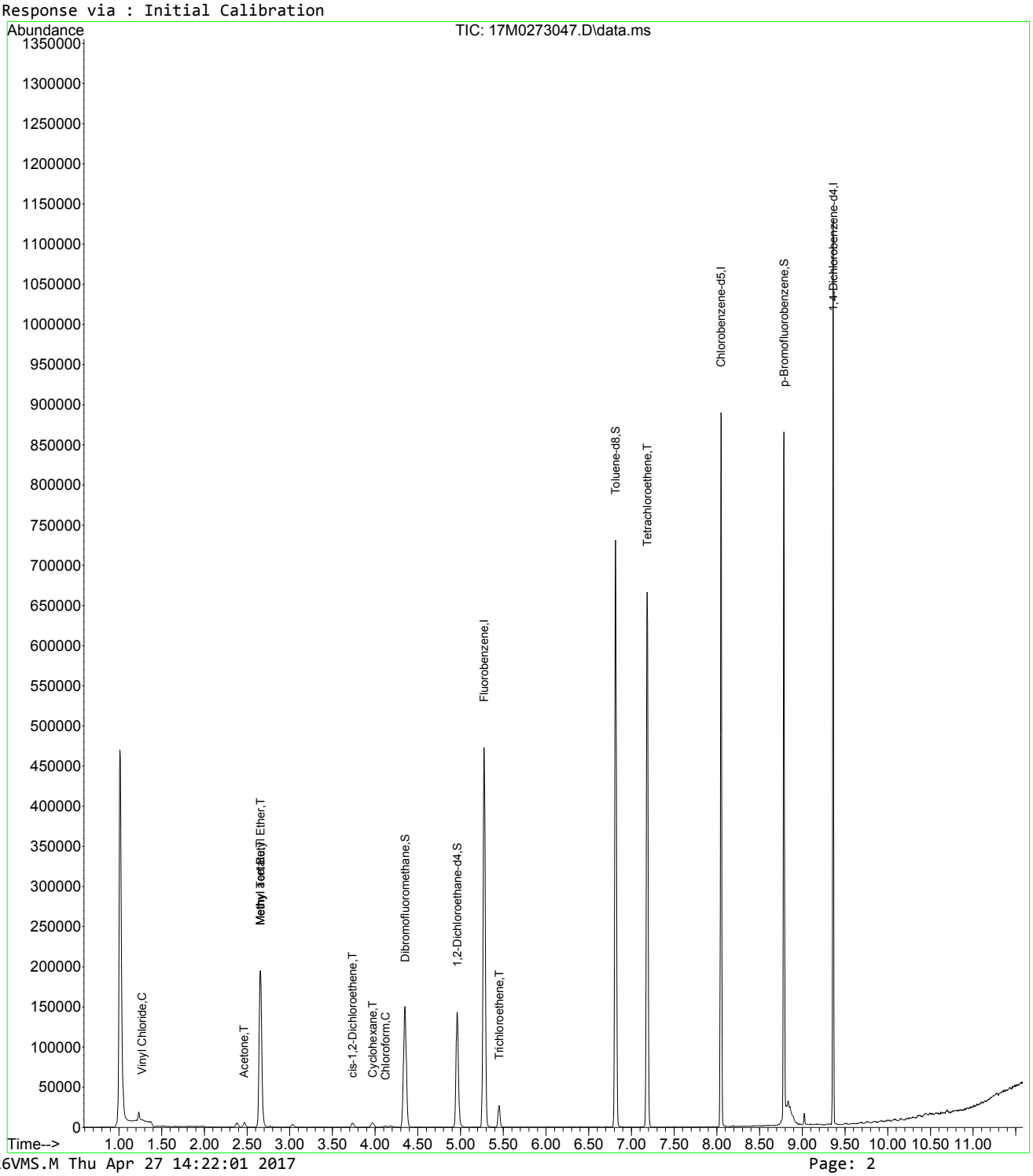
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	414801	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	309640	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	154655	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	107986	24.1053	ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.421%			
34) 1,2-Dichloroethane-d4	4.959	65	104847	24.9697	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.879%			
47) Toluene-d8	6.815	98	397646	25.7325	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.930%			
66) p-Bromofluorobenzene	8.786	95	141235	27.2746	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.098%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.270	62	789	0.1478	ug/L	95
16) Acetone	2.463	43	6654	7.9782	ug/L	94
18) Methyl acetate	2.654	43	41731	19.0858	ug/L #	90
19) Methyl Tert Butyl Ether	2.657	73	210098	18.9754	ug/L #	100
23) cis-1,2-Dichloroethene	3.734	96	3184	0.6447	ug/L	93
25) Cyclohexane	3.971	56	3878	0.5818	ug/L #	81
27) Chloroform	4.119	83	1990	0.2436	ug/L #	93
37) Trichloroethene	5.451	130	8765	1.6516	ug/L	98
49) Tetrachloroethene	7.185	166	162400	29.3299	ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

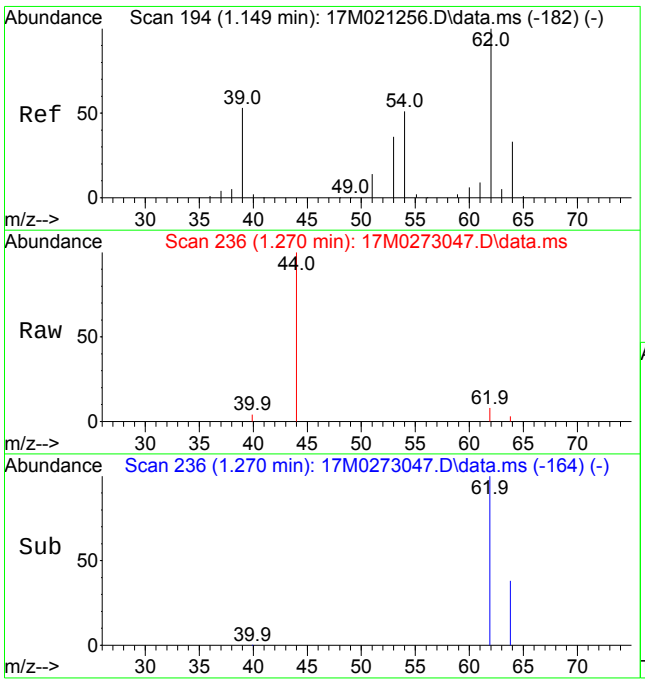
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273047.D Vial: 20
Acq On : 26 Apr 2017 23:01 Operator: ADC
Sample : L17041075-32 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



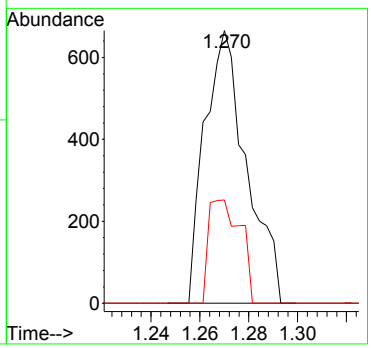
826VMS.M Thu Apr 27 14:22:01 2017 Page: 2

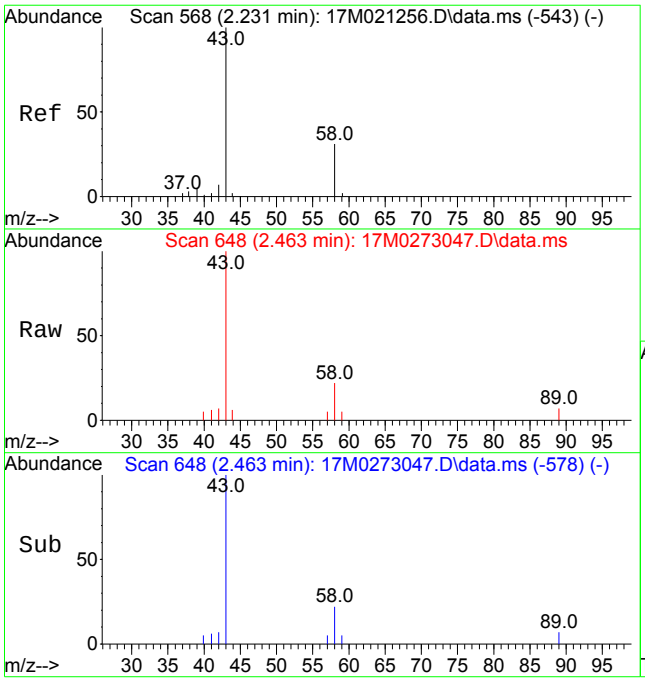


#4
Vinyl Chloride
Concen: 0.1478 ug/L
RT: 1.270 min Scan# 236
Delta R.T. 0.009 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 62 Resp: 789

Ion	Ratio	Lower	Upper
62	100		
64	29.0	19.2	44.8

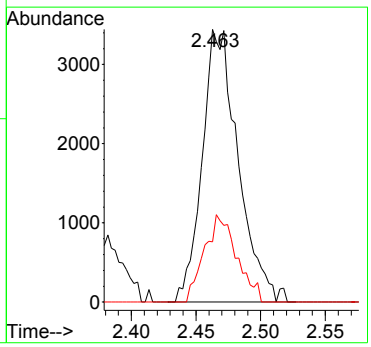


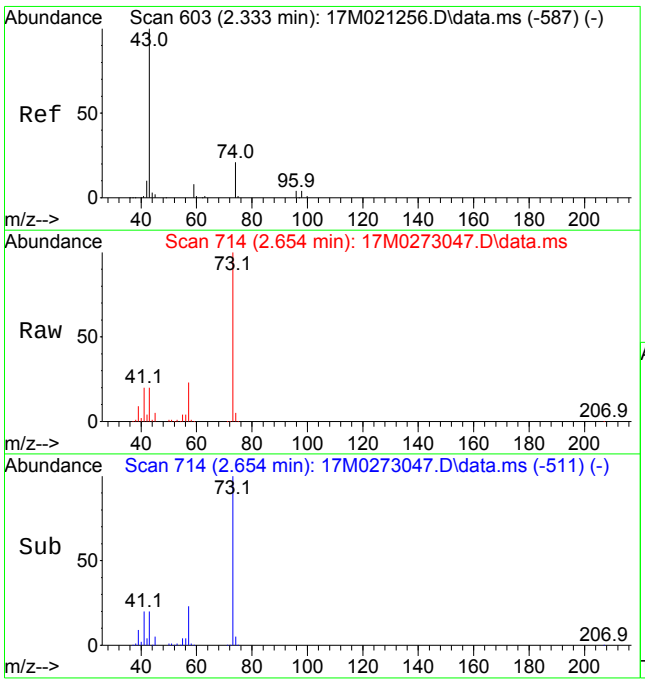


#16
Acetone
Concen: 7.9782 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 43 Resp: 6654

Ion	Ratio	Lower	Upper
43	100		
58	28.7	19.4	45.2

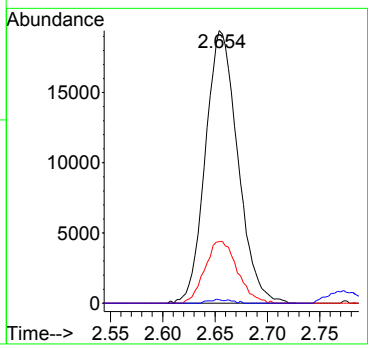


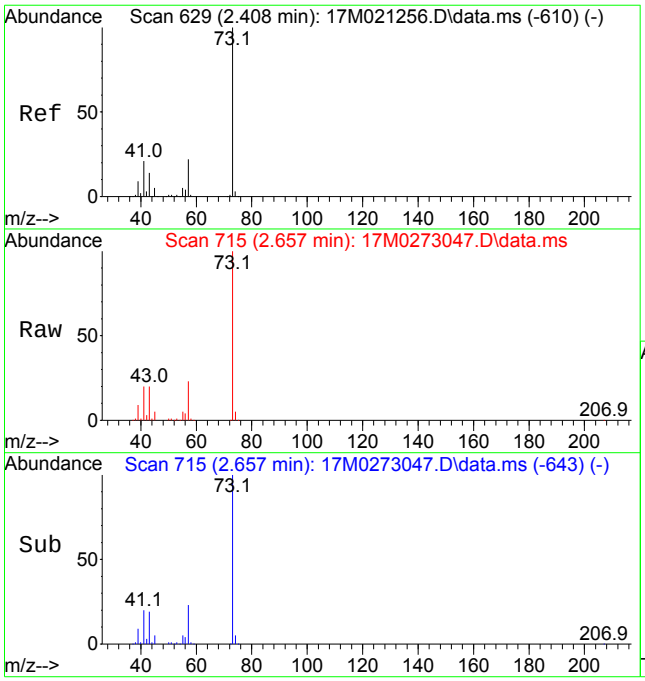


#18
Methyl acetate
Concen: 19.0858 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 43 Resp: 41731

Ion	Ratio	Lower	Upper
43	100		
74	22.8	25.4	25.4#
59	1.0	7.6	11.4#

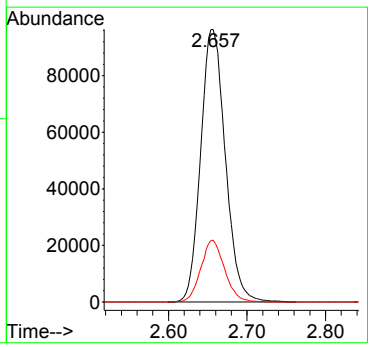


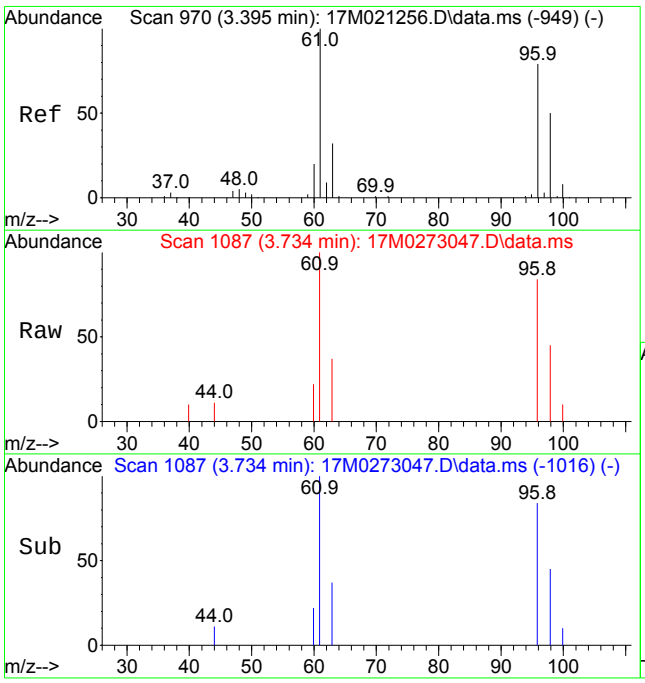


#19
Methyl Tert Butyl Ether
Concen: 18.9754 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 73 Resp: 210098

Ion	Ratio	Lower	Upper
73	100		
57	21.8	0.0	0.0#

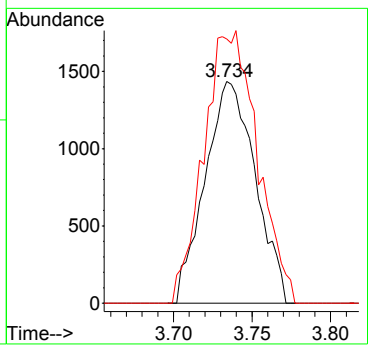


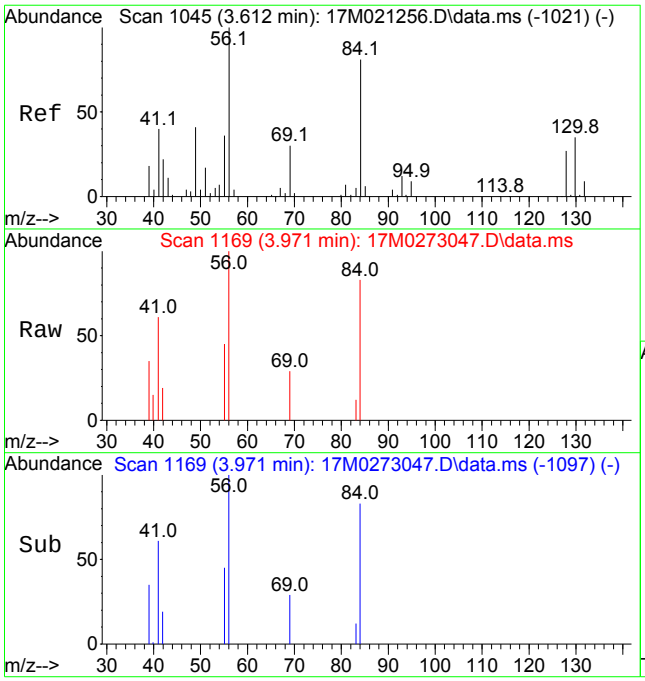


#23
cis-1,2-Dichloroethene
Concen: 0.6447 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 96 Resp: 3184

Ion	Ratio	Lower	Upper
96	100		
61	131.0	98.1	147.1

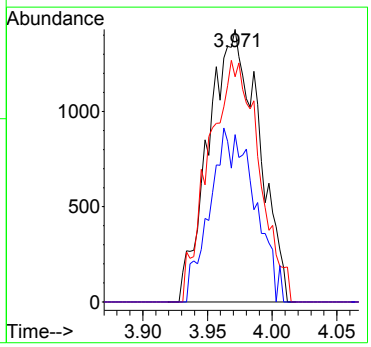


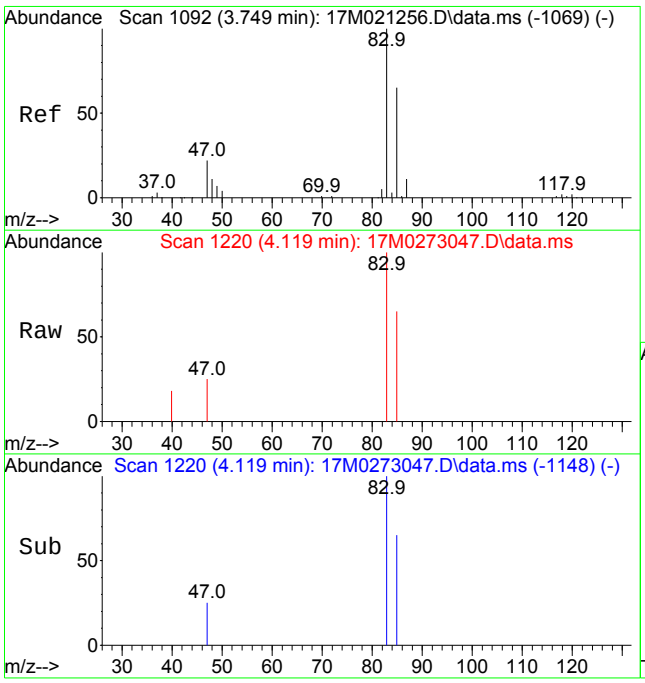


#25
Cyclohexane
Concen: 0.5818 ug/L
RT: 3.971 min Scan# 1169
Delta R.T. 0.008 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 56 Resp: 3878

Ion	Ratio	Lower	Upper
56	100		
84	87.9	69.4	104.0
41	56.3	72.2	108.2#

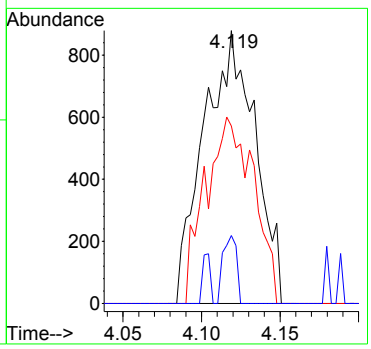


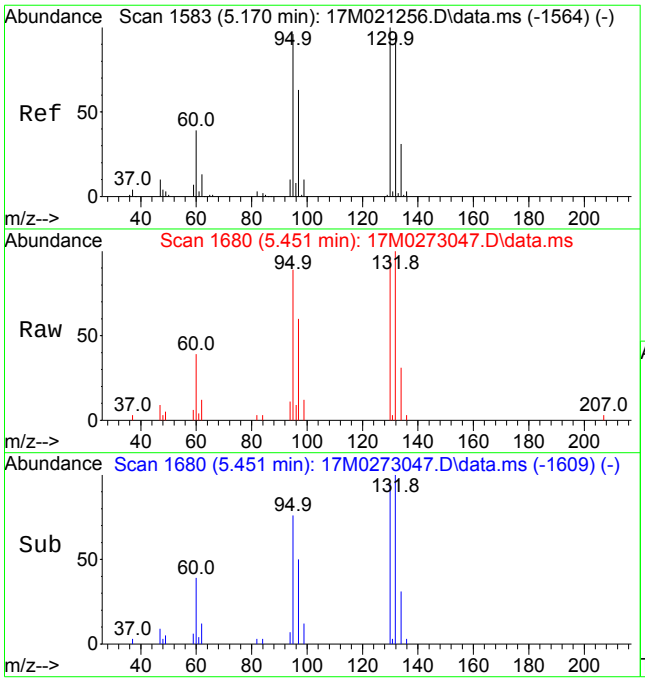


#27
Chloroform
Concen: 0.2436 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion: 83 Resp: 1990

Ion	Ratio	Lower	Upper
83	100		
85	64.5	39.2	91.4
47	9.3	12.9	30.1#

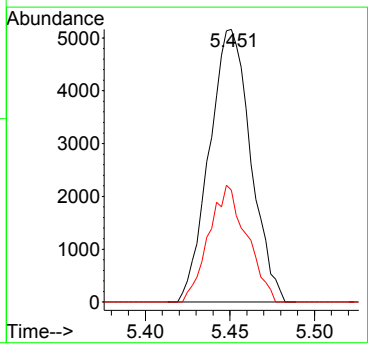


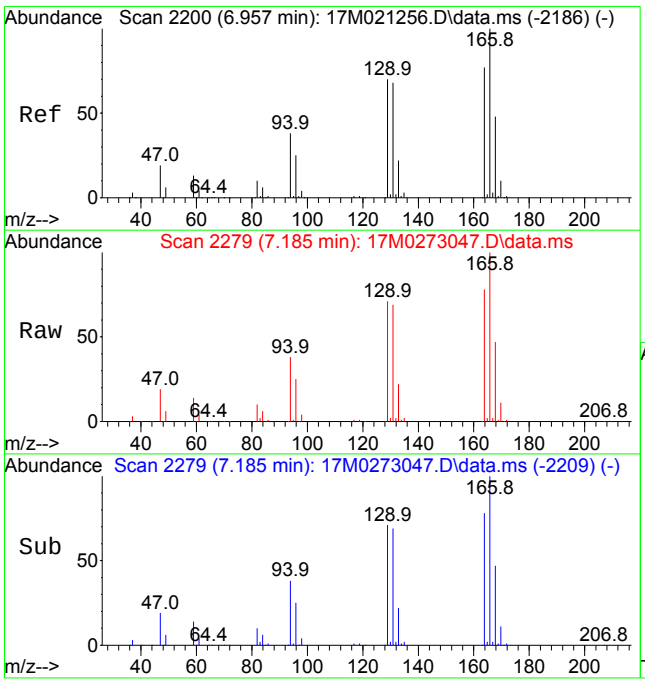


#37
Trichloroethene
Concen: 1.6516 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion:130 Resp: 8765

Ion	Ratio	Lower	Upper
130	100		
60	39.2	22.9	53.3

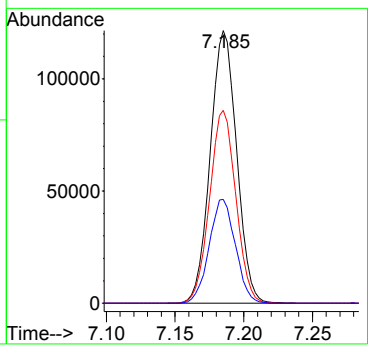




#49
Tetrachloroethene
Concen: 29.3299 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273047.D
Acq: 26 Apr 2017 23:01

Tgt Ion:166 Resp: 162400

Ion	Ratio	Lower	Upper
166	100		
129	70.3	56.2	84.4
94	37.9	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273048.D Vial: 21
Acq On : 26 Apr 2017 23:20 Operator: ADC
Sample : L17041075-33 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

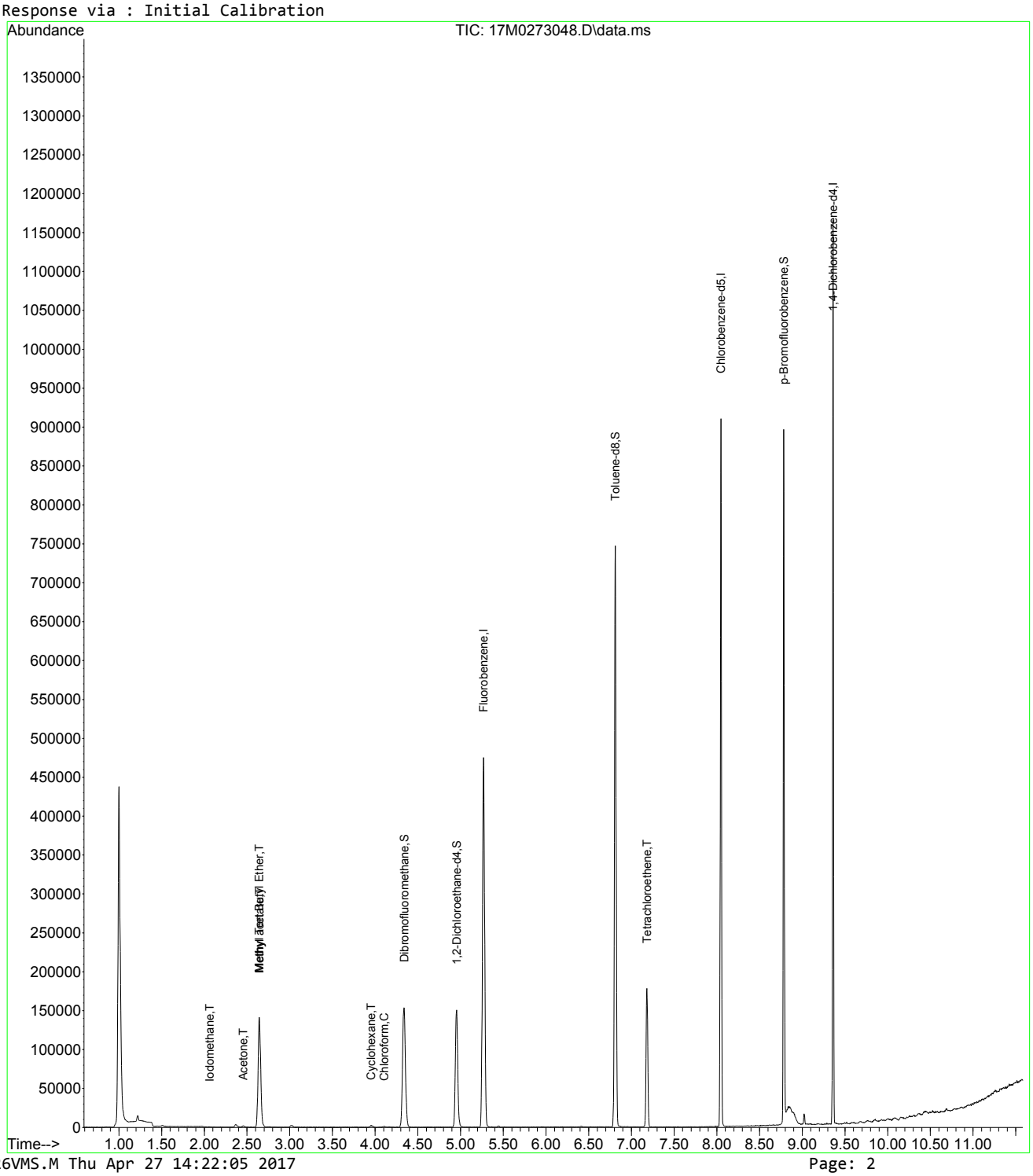
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.268	96	418568	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	310025	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	155378	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	112534	24.8944	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.578%			
34) 1,2-Dichloroethane-d4	4.953	65	109183	25.7683	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.073%			
47) Toluene-d8	6.812	98	406598	26.2792	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.117%			
66) p-Bromofluorobenzene	8.783	95	143497	27.5824	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.330%			
Target Compounds						Qvalue
13) Iodomethane	2.063	142	164	2.0264	ug/L #	35
16) Acetone	2.454	43	2328	2.7662	ug/L	87
18) Methyl acetate	2.645	43	29869	13.5377	ug/L #	90
19) Methyl Tert Butyl Ether	2.642	73	150137	13.4379	ug/L #	100
25) Cyclohexane	3.951	56	1526	0.2269	ug/L #	78
27) Chloroform	4.105	83	1430	0.1735	ug/L #	83
49) Tetrachloroethene	7.182	166	44861	8.0920	ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

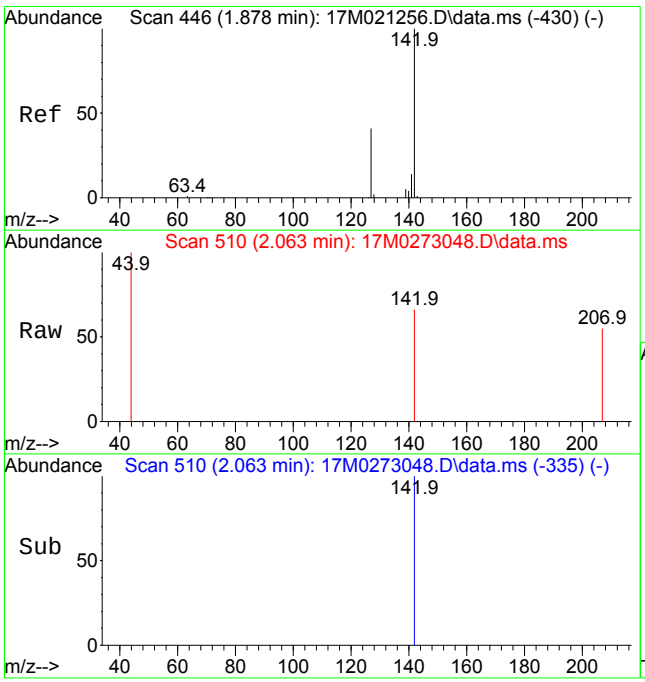
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273048.D Vial: 21
Acq On : 26 Apr 2017 23:20 Operator: ADC
Sample : L17041075-33 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



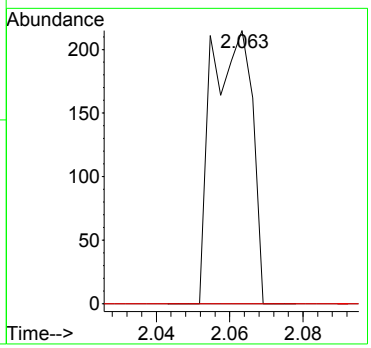
826VMS.M Thu Apr 27 14:22:05 2017 Page: 2

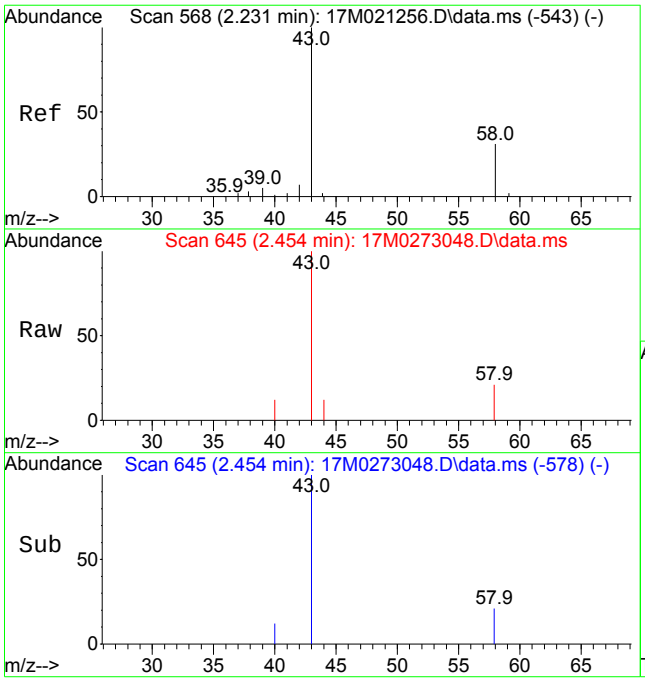


#13
Iodomethane
Concen: 2.0264 ug/L
RT: 2.063 min Scan# 510
Delta R.T. 0.005 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion:142 Resp: 164

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

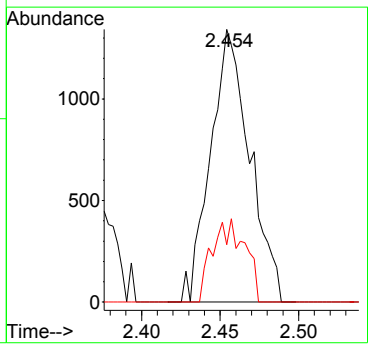


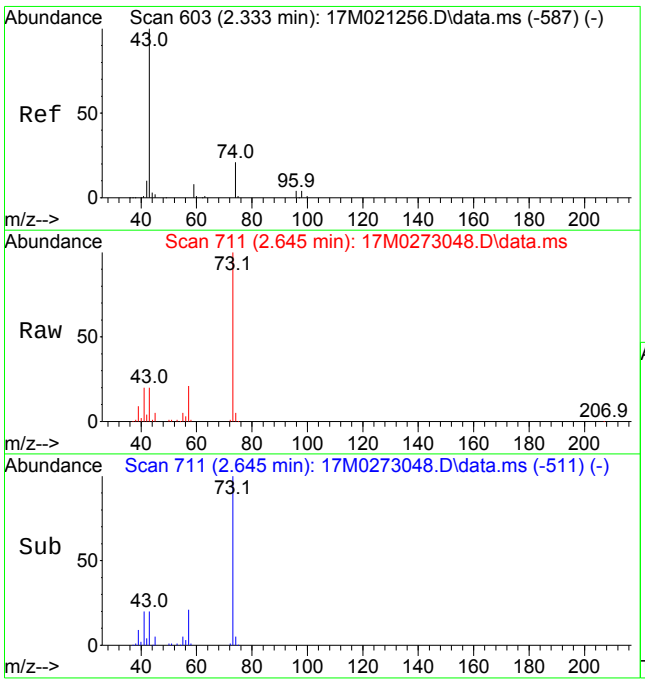


#16
Acetone
Concen: 2.7662 ug/L
RT: 2.454 min Scan# 645
Delta R.T. -0.006 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion: 43 Resp: 2328

Ion	Ratio	Lower	Upper
43	100		
58	25.2	19.4	45.2

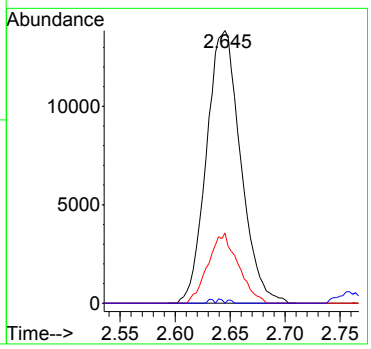


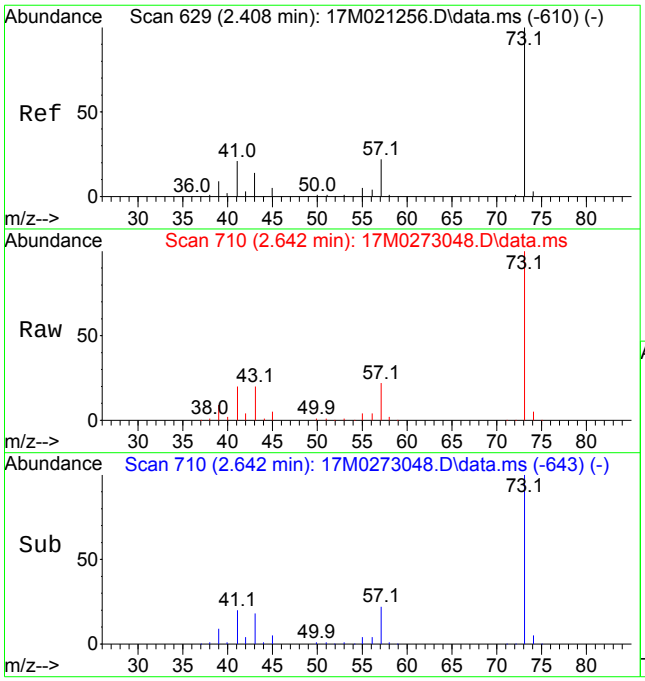


#18
Methyl acetate
Concen: 13.5377 ug/L
RT: 2.645 min Scan# 711
Delta R.T. 0.078 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion: 43 Resp: 29869

Ion	Ratio	Lower	Upper
43	100		
74	22.7	25.4	25.4#
59	0.6	7.6	11.4#

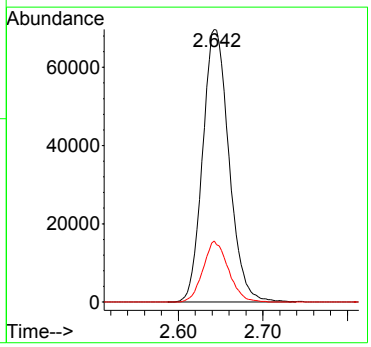


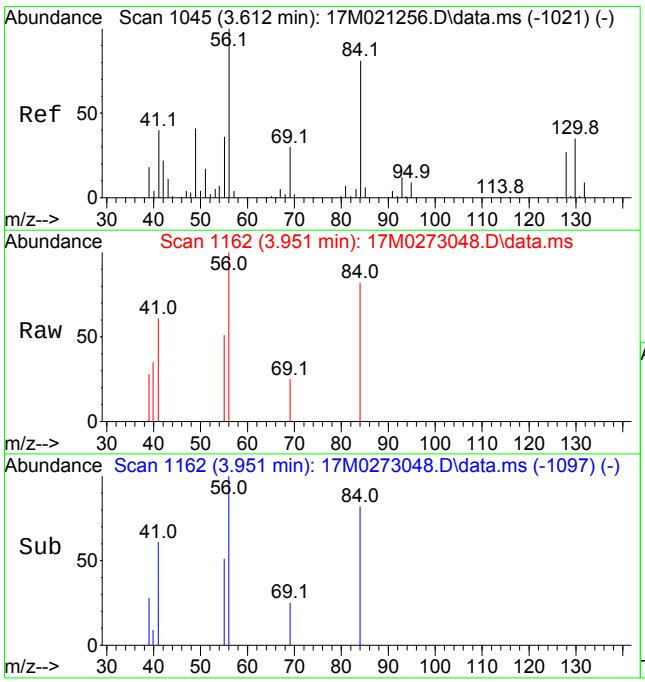


#19
Methyl Tert Butyl Ether
Concen: 13.4379 ug/L
RT: 2.642 min Scan# 710
Delta R.T. -0.006 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion: 73 Resp: 150137

Ion	Ratio	Lower	Upper
73	100		
57	21.5	0.0	0.0#

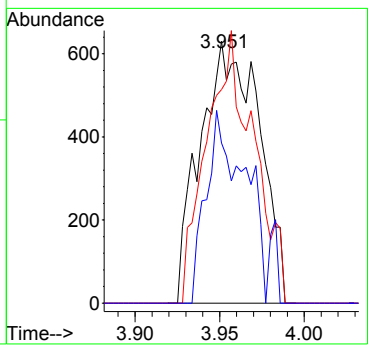


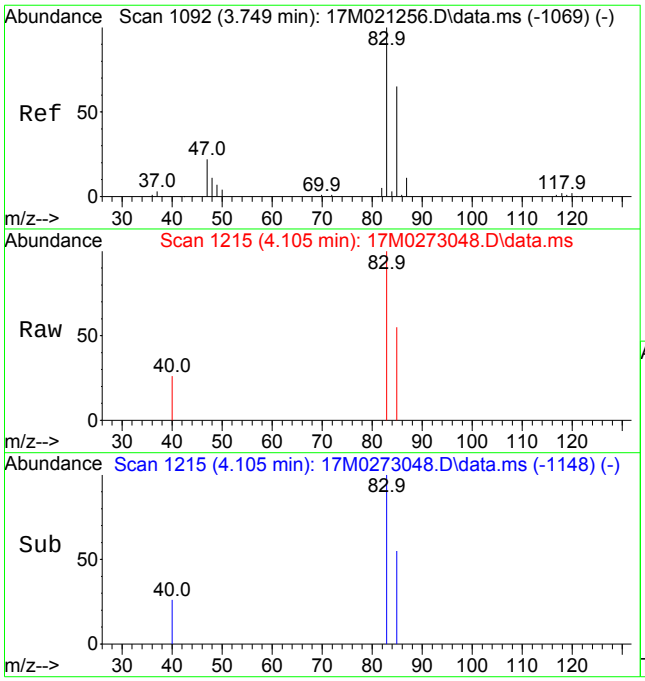


#25
Cyclohexane
Concen: 0.2269 ug/L
RT: 3.951 min Scan# 1162
Delta R.T. -0.012 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion: 56 Resp: 1526

Ion	Ratio	Lower	Upper
56	100		
84	83.0	69.4	104.0
41	52.5	72.2	108.2#

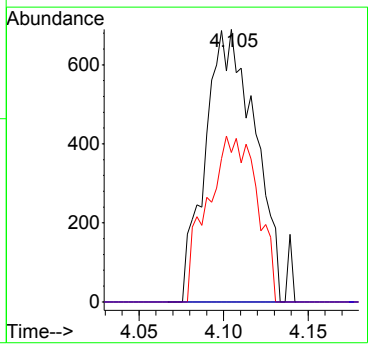


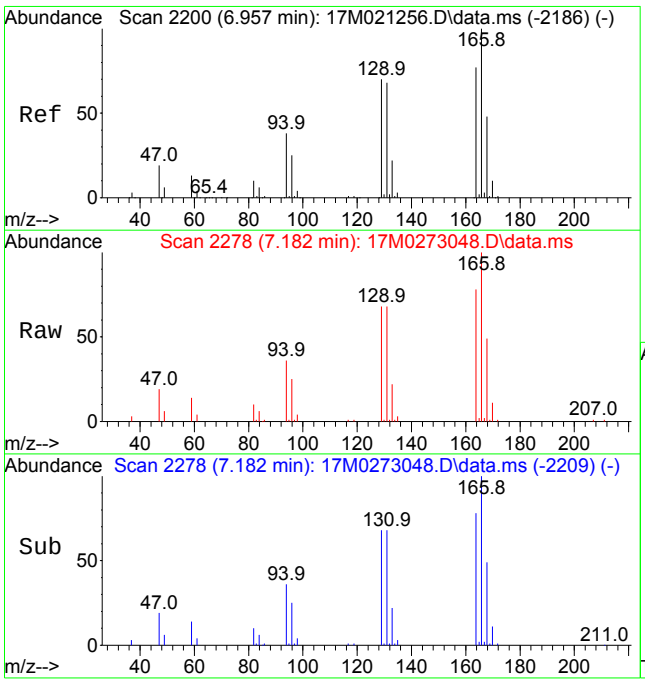


#27
Chloroform
Concen: 0.1735 ug/L
RT: 4.105 min Scan# 1215
Delta R.T. -0.005 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion: 83 Resp: 1430

Ion	Ratio	Lower	Upper
83	100		
85	59.8	39.2	91.4
47	0.0	12.9	30.1#

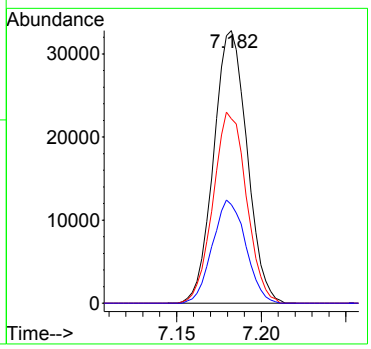




#49
Tetrachloroethene
Concen: 8.0920 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273048.D
Acq: 26 Apr 2017 23:20

Tgt Ion:166 Resp: 44861

Ion	Ratio	Lower	Upper
166	100		
129	70.1	56.2	84.4
94	37.7	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273049.D Vial: 22
Acq On : 26 Apr 2017 23:55 Operator: ADC
Sample : L17041075-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

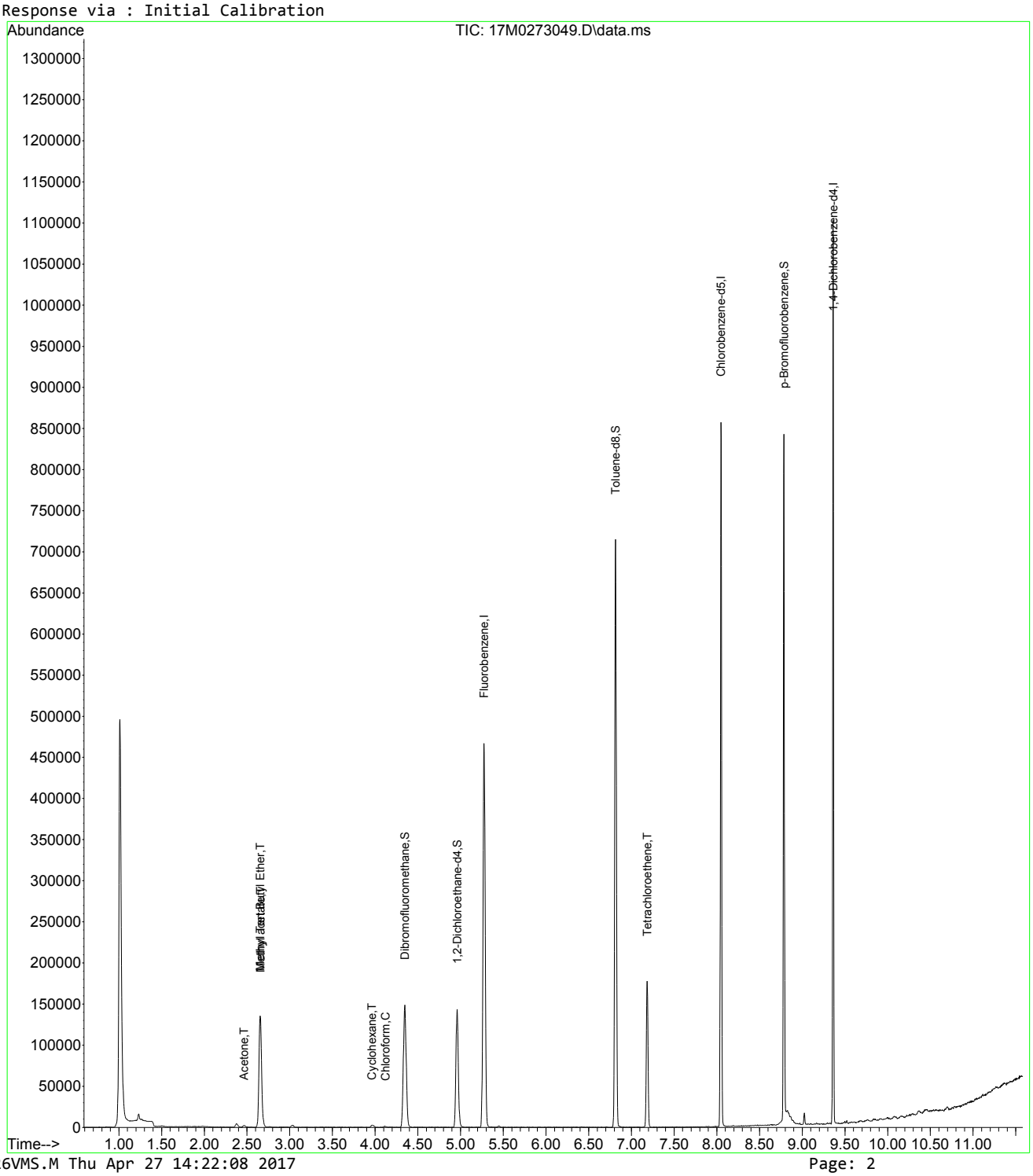
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	406903	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	297945	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	146219	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.348	111	107467	24.4551 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.820%		
34) 1,2-Dichloroethane-d4	4.959	65	104249	25.3092 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.237%		
47) Toluene-d8	6.815	98	391493	26.3288 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.315%		
66) p-Bromofluorobenzene	8.787	95	135467	27.6700 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.680%		
Target Compounds					Qvalue
16) Acetone	2.463	43	3025	3.6974 ug/L	93
18) Methyl acetate	2.657	43	29301	13.6610 ug/L #	89
19) Methyl Tert Butyl Ether	2.654	73	144977	13.3480 ug/L #	100
25) Cyclohexane	3.963	56	1781	0.2724 ug/L #	81
27) Chloroform	4.119	83	1512	0.1887 ug/L #	86
49) Tetrachloroethene	7.185	166	42964	8.0640 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

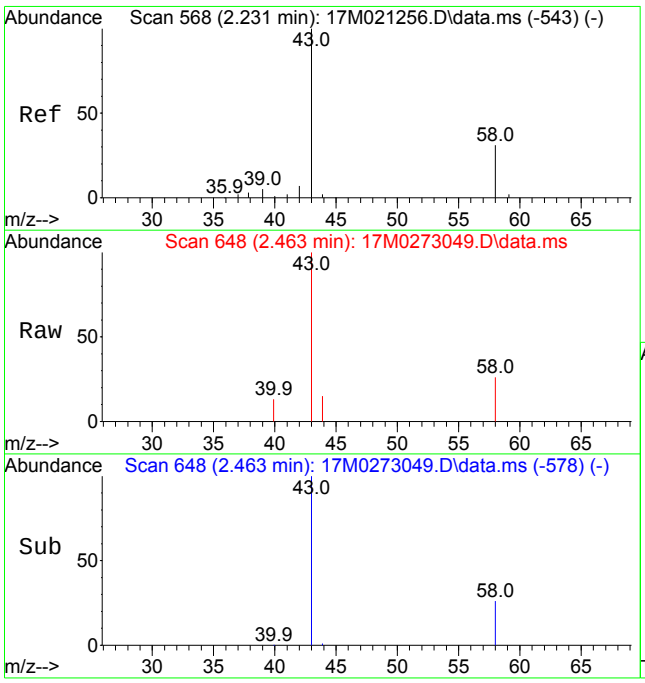
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273049.D Vial: 22
Acq On : 26 Apr 2017 23:55 Operator: ADC
Sample : L17041075-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



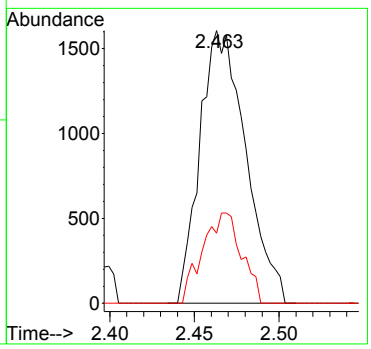
826VMS.M Thu Apr 27 14:22:08 2017 Page: 2

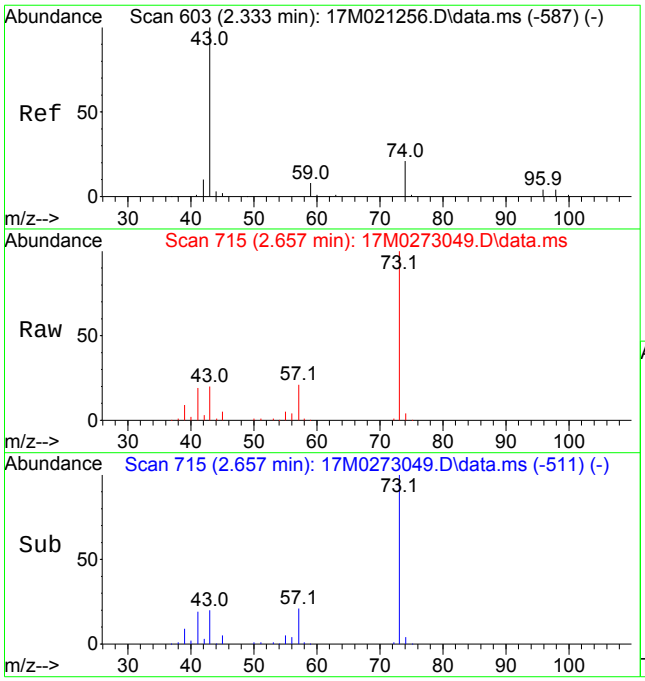


#16
Acetone
Concen: 3.6974 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion: 43 Resp: 3025

Ion	Ratio	Lower	Upper
43	100		
58	28.2	19.4	45.2

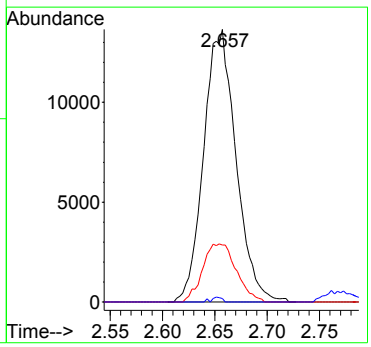


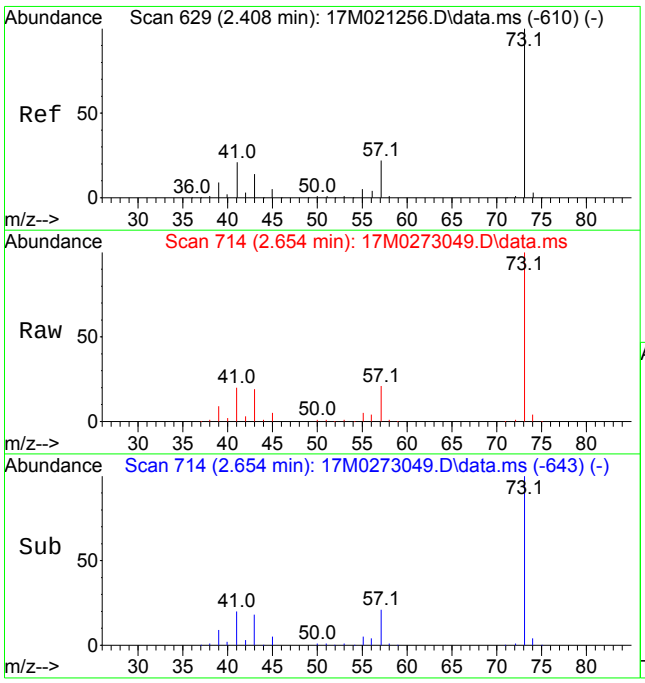


#18
Methyl acetate
Concen: 13.6610 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.090 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion: 43 Resp: 29301

Ion	Ratio	Lower	Upper
43	100		
74	22.1	25.4	25.4#
59	0.6	7.6	11.4#

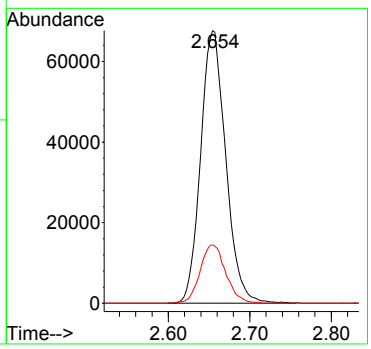


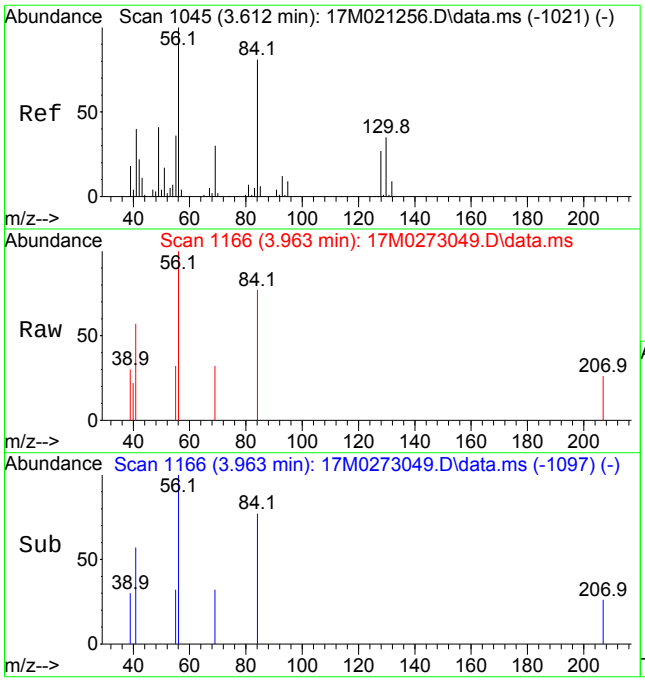


#19
Methyl Tert Butyl Ether
Concen: 13.3480 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion: 73 Resp: 144977

Ion	Ratio	Lower	Upper
73	100		
57	21.9	0.0	0.0#

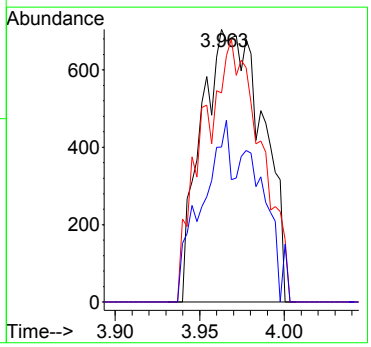


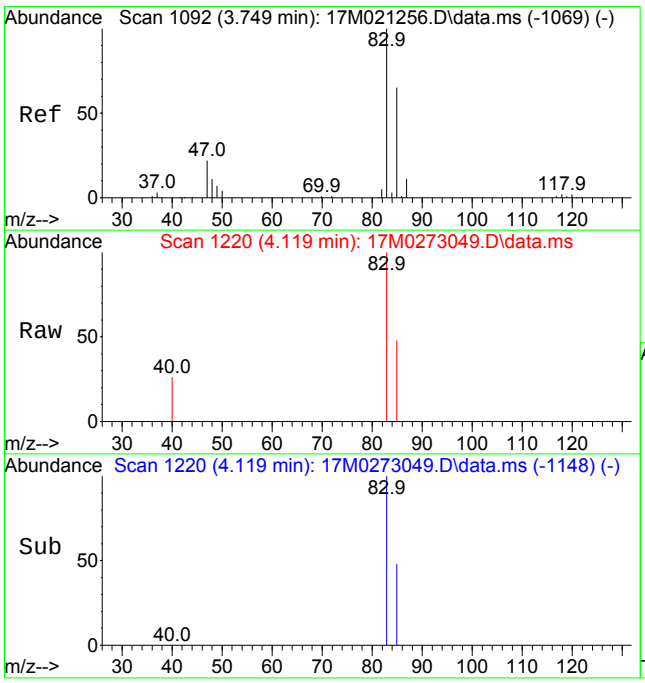


#25
Cyclohexane
Concen: 0.2724 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion: 56 Resp: 1781

Ion	Ratio	Lower	Upper
56	100		
84	91.2	69.4	104.0
41	60.0	72.2	108.2#

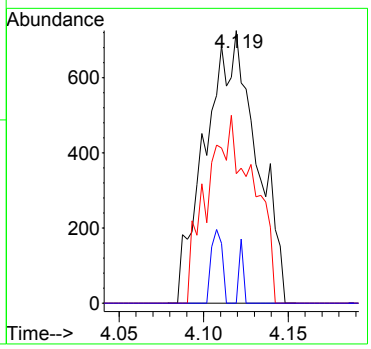


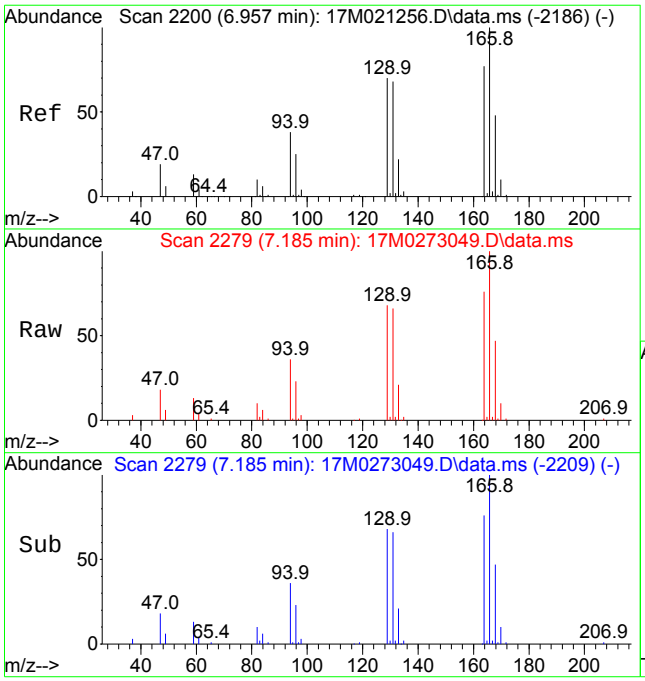


#27
Chloroform
Concen: 0.1887 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion: 83 Resp: 1512

Ion	Ratio	Lower	Upper
83	100		
85	62.9	39.2	91.4
47	0.0	12.9	30.1#

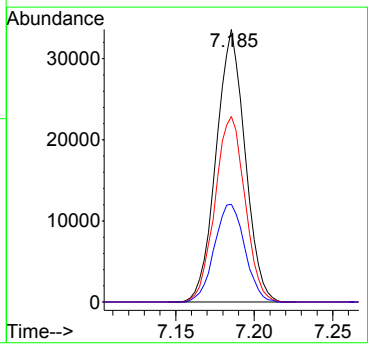




#49
Tetrachloroethene
Concen: 8.0640 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273049.D
Acq: 26 Apr 2017 23:55

Tgt Ion:166 Resp: 42964

Ion	Ratio	Lower	Upper
166	100		
129	70.6	56.2	84.4
94	37.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273050.D Vial: 23
Acq On : 27 Apr 2017 00:14 Operator: ADC
Sample : L17041075-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

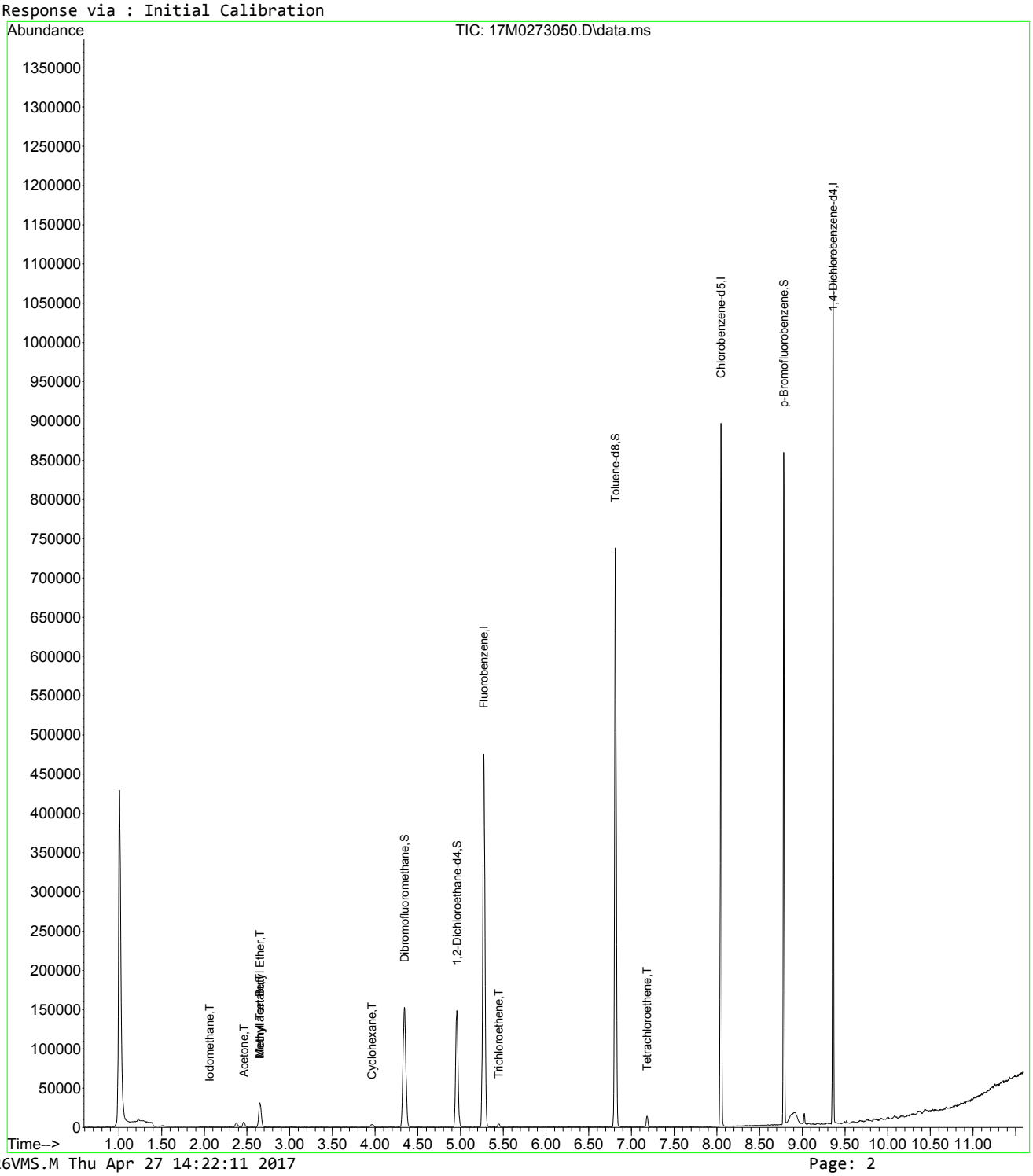
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	413430	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	305885	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	151168	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	110877	24.8327	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.331%			
34) 1,2-Dichloroethane-d4	4.956	65	108975	26.0389	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.156%			
47) Toluene-d8	6.812	98	398027	26.0734	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.294%			
66) p-Bromofluorobenzene	8.783	95	139330	27.5273	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.109%			
Target Compounds						Qvalue
13) Iodomethane	2.063	142	142	2.0233	ug/L #	35
16) Acetone	2.463	43	8024	9.6528	ug/L	98
18) Methyl acetate	2.648	43	6710	3.0790	ug/L #	87
19) Methyl Tert Butyl Ether	2.651	73	33188	3.0074	ug/L #	100
25) Cyclohexane	3.963	56	2387	0.3593	ug/L #	78
37) Trichloroethene	5.445	130	1510	0.2855	ug/L	93
49) Tetrachloroethene	7.182	166	3474	0.6351	ug/L	96

(#) = qualifier out of range (m) = manual integration (+) = signals summed

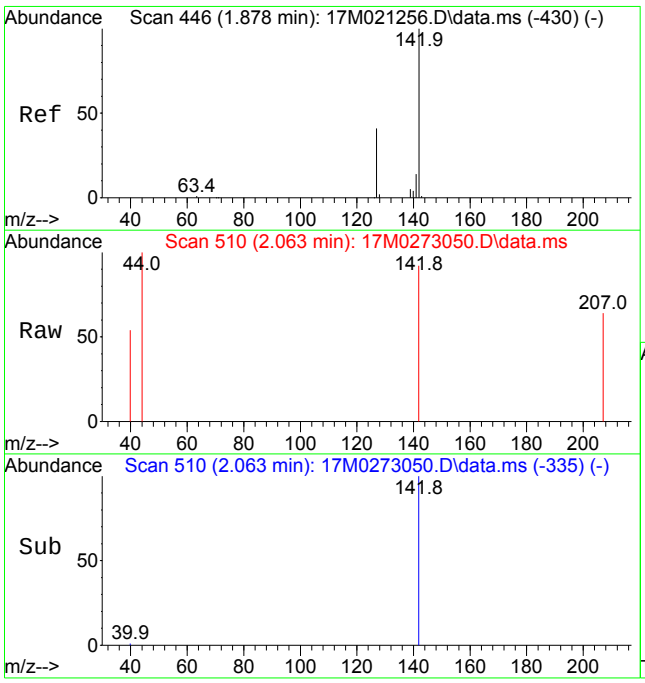
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273050.D Vial: 23
Acq On : 27 Apr 2017 00:14 Operator: ADC
Sample : L17041075-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



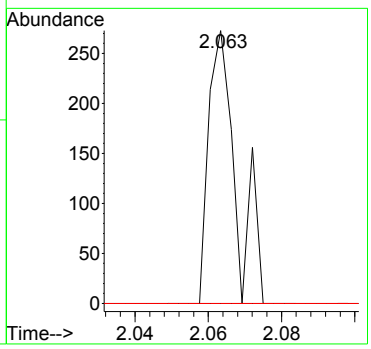
826VMS.M Thu Apr 27 14:22:11 2017 Page: 2

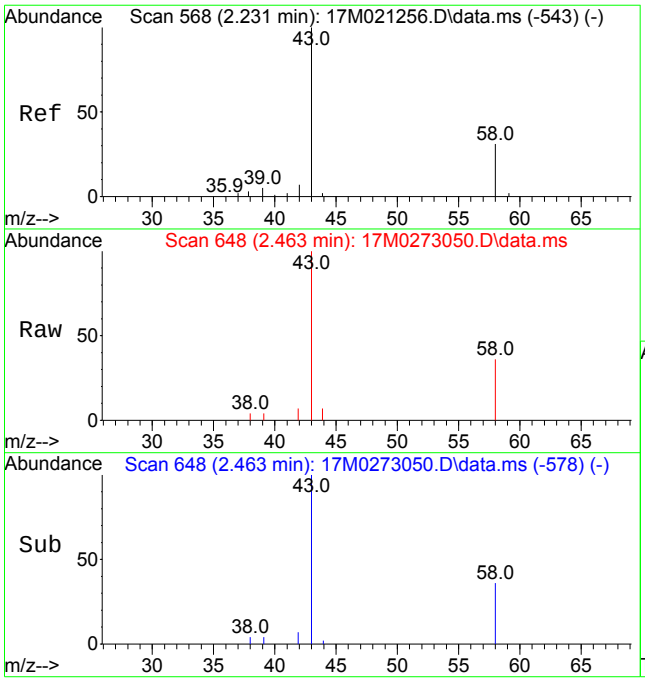


#13
Iodomethane
Concen: 2.0233 ug/L
RT: 2.063 min Scan# 510
Delta R.T. 0.005 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion:142 Resp: 142

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

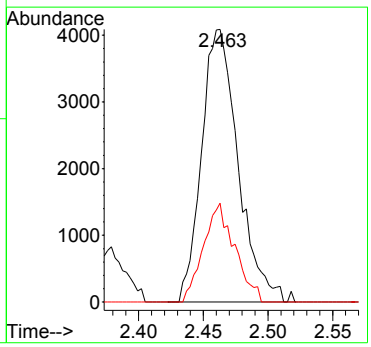


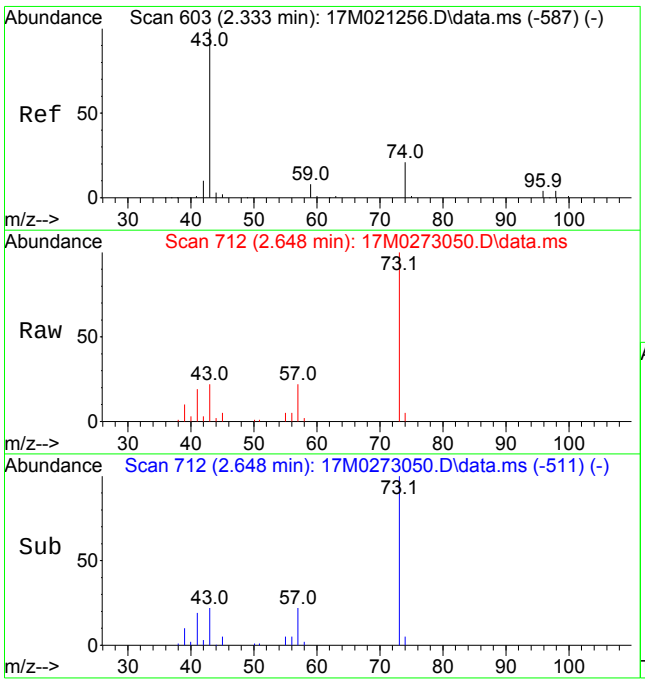


#16
Acetone
Concen: 9.6528 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion: 43 Resp: 8024

Ion	Ratio	Lower	Upper
43	100		
58	31.0	19.4	45.2

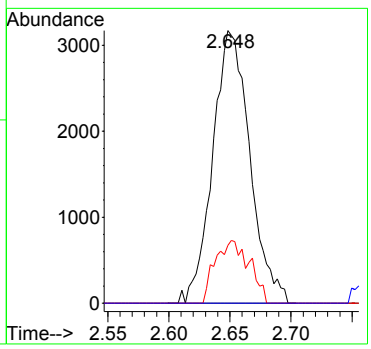


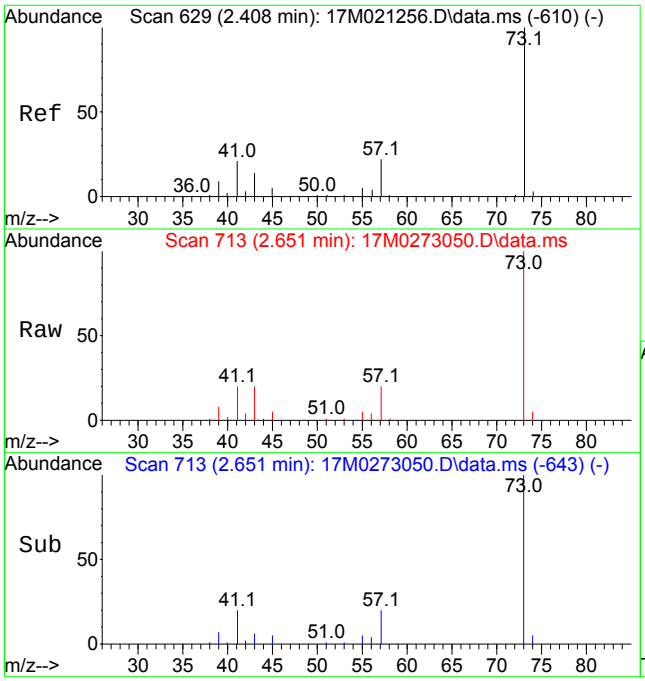


#18
Methyl acetate
Concen: 3.0790 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.081 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion: 43 Resp: 6710

Ion	Ratio	Lower	Upper
43	100		
74	21.1	25.4	25.4#
59	0.0	7.6	11.4#

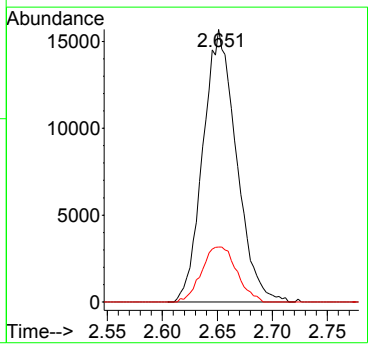


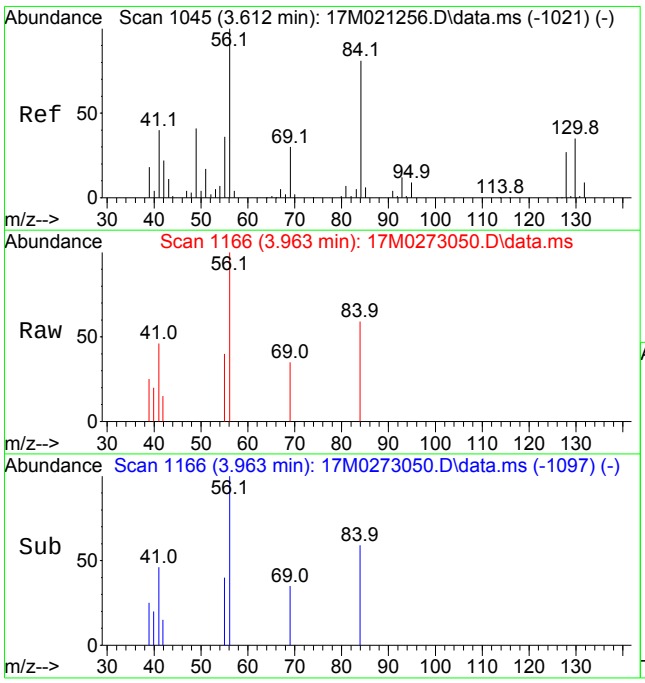


#19
Methyl Tert Butyl Ether
Concen: 3.0074 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.003 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion: 73 Resp: 33188

Ion	Ratio	Lower	Upper
73	100		
57	21.2	0.0	0.0#

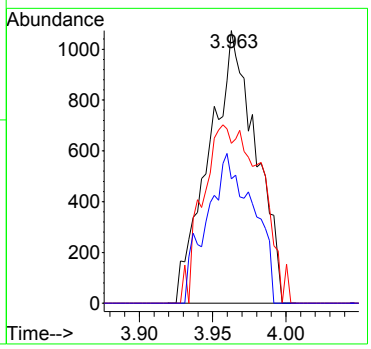


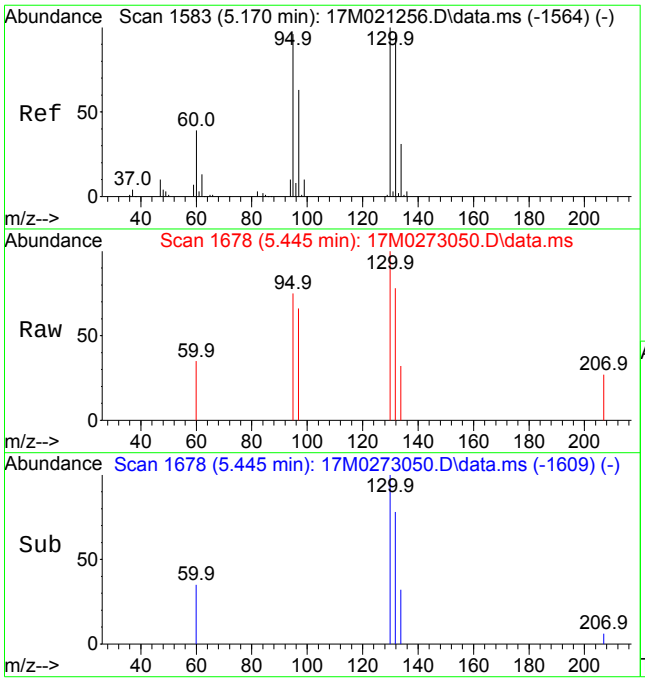


#25
Cyclohexane
Concen: 0.3593 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion: 56 Resp: 2387

Ion	Ratio	Lower	Upper
56	100		
84	81.4	69.4	104.0
41	54.3	72.2	108.2#

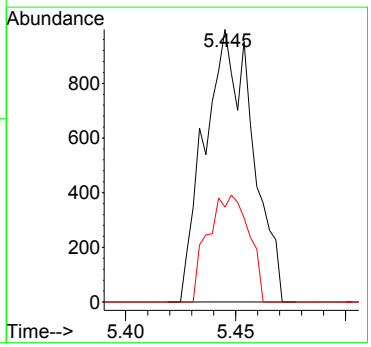


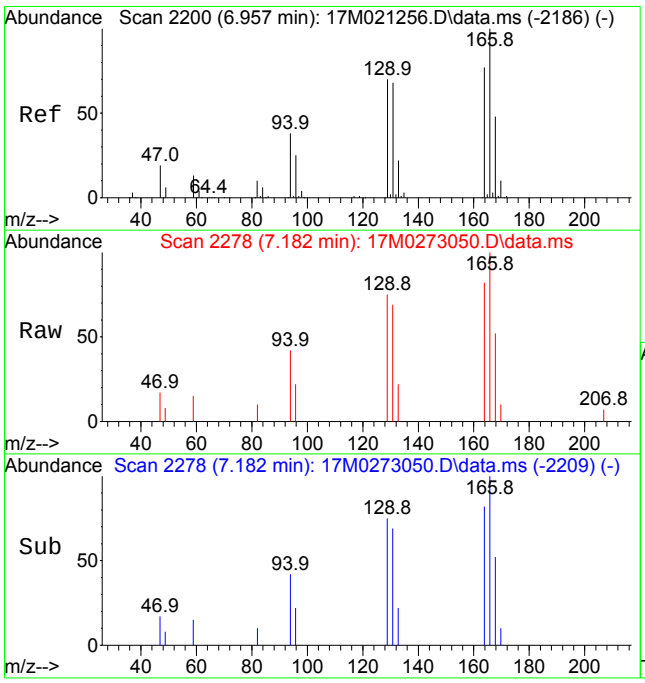


#37
Trichloroethene
Concen: 0.2855 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion:130 Resp: 1510

Ion	Ratio	Lower	Upper
130	100		
60	33.7	22.9	53.3

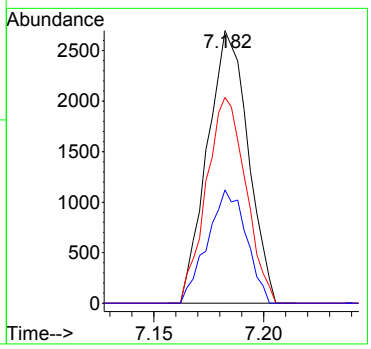




#49
Tetrachloroethene
Concen: 0.6351 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273050.D
Acq: 27 Apr 2017 00:14

Tgt Ion:166 Resp: 3474

Ion	Ratio	Lower	Upper
166	100		
129	73.2	56.2	84.4
94	39.7	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273051.D Vial: 24
Acq On : 27 Apr 2017 00:47 Operator: ADC
Sample : L17041075-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

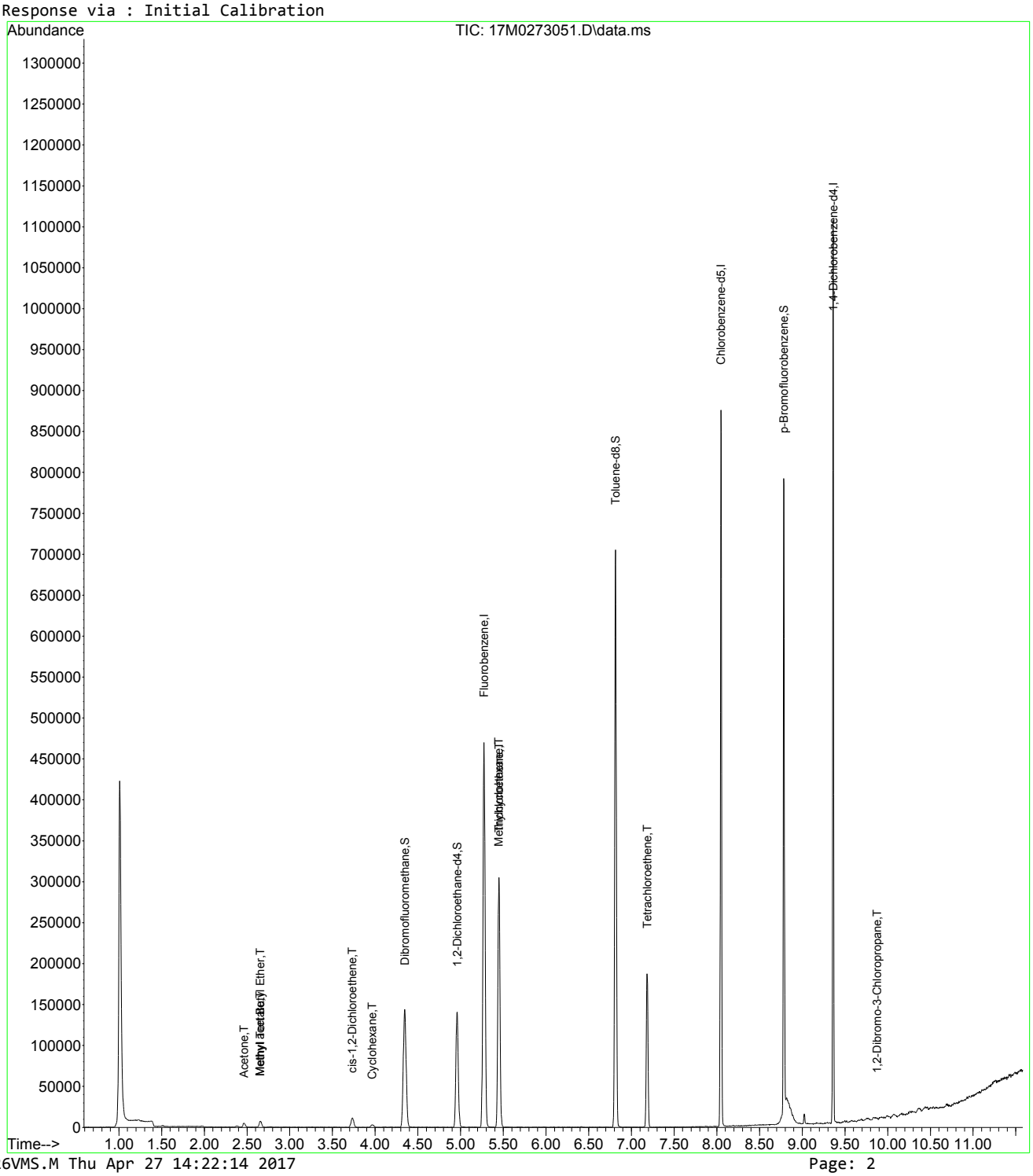
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	404812	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	301245	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	152320	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	104551	23.9144	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.658%			
34) 1,2-Dichloroethane-d4	4.959	65	102813	25.0895	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.358%			
47) Toluene-d8	6.815	98	377884	25.1352	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.541%			
66) p-Bromofluorobenzene	8.783	95	128283	25.1531	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.612%			
Target Compounds						Qvalue
16) Acetone	2.463	43	6430	7.8999	ug/L	95
18) Methyl acetate	2.651	43	1666	0.7808	ug/L #	66
19) Methyl Tert Butyl Ether	2.654	73	7914	0.7324	ug/L #	100
23) cis-1,2-Dichloroethene	3.731	96	6948	1.4416	ug/L	99
25) Cyclohexane	3.966	56	2163	0.3325	ug/L #	76
36) Methylcyclohexane	5.445	83	1109	0.1627	ug/L #	1
37) Trichloroethene	5.448	130	99521	19.2156	ug/L	98
49) Tetrachloroethene	7.185	166	46356	8.6053	ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.875	75	108	0.1437	ug/L #	1

(#) = qualifier out of range (m) = manual integration (+) = signals summed

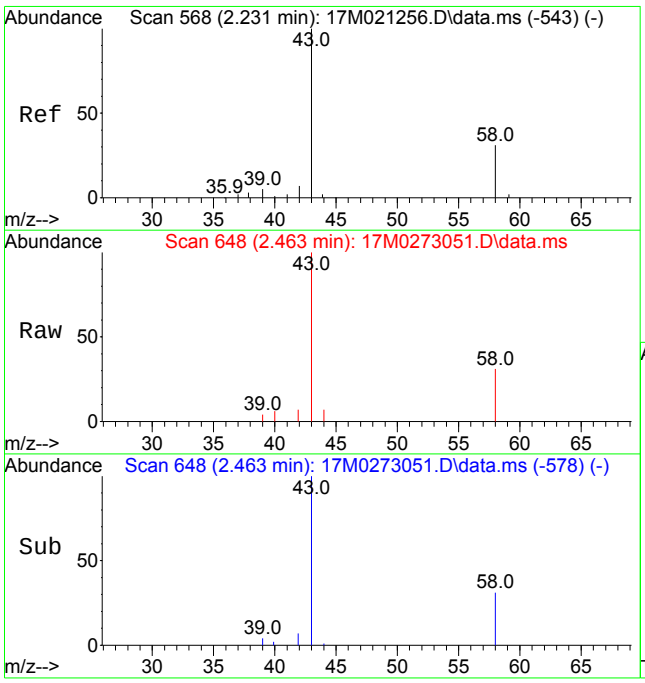
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273051.D Vial: 24
Acq On : 27 Apr 2017 00:47 Operator: ADC
Sample : L17041075-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



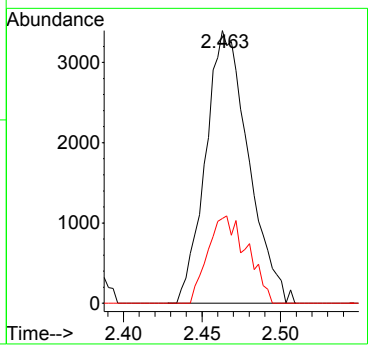
826VMS.M Thu Apr 27 14:22:14 2017 Page: 2

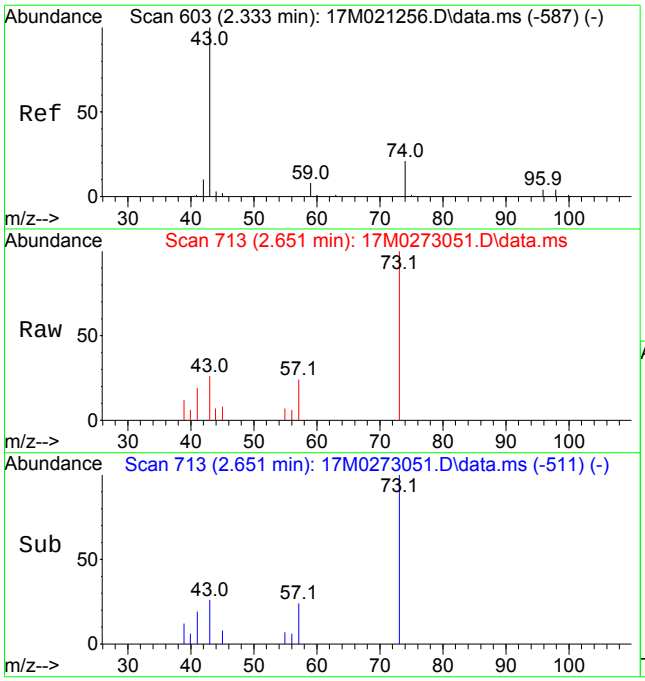


#16
Acetone
Concen: 7.8999 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 43 Resp: 6430

Ion	Ratio	Lower	Upper
43	100		
58	29.5	19.4	45.2

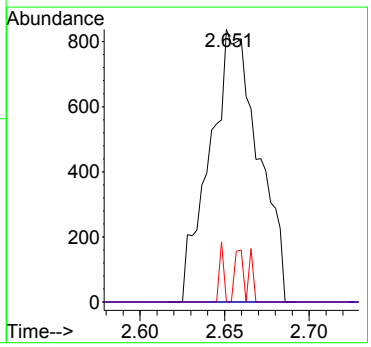


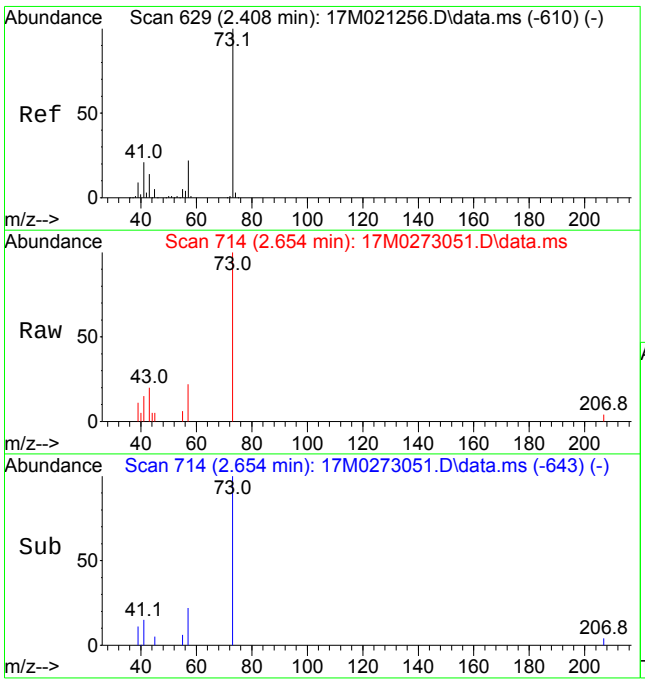


#18
Methyl acetate
Concen: 0.7808 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.084 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 43 Resp: 1666

Ion	Ratio	Lower	Upper
43	100		
74	7.0	25.4	25.4#
59	0.0	7.6	11.4#

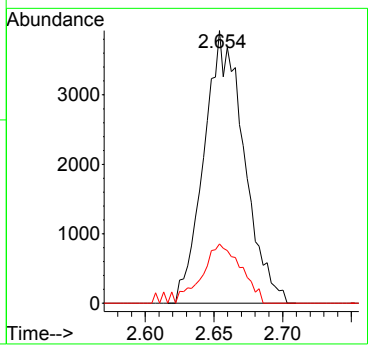


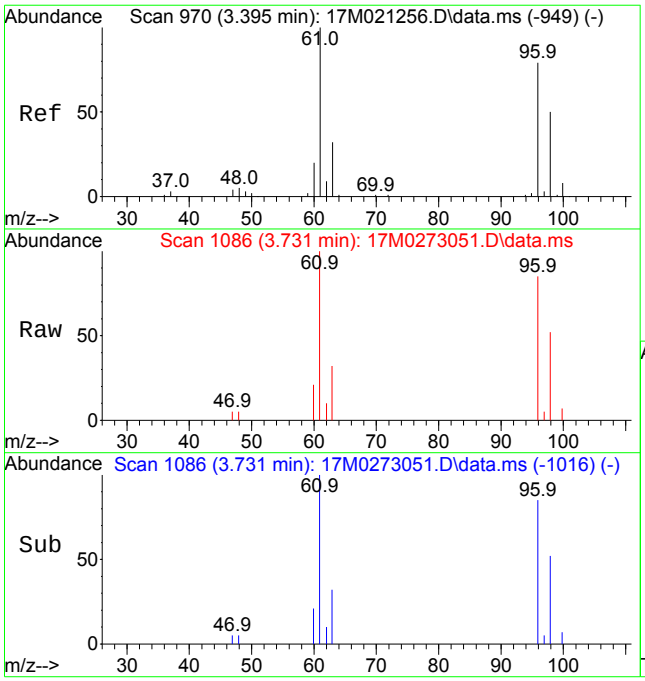


#19
Methyl Tert Butyl Ether
Concen: 0.7324 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 73 Resp: 7914

Ion	Ratio	Lower	Upper
73	100		
57	21.6	0.0	0.0#

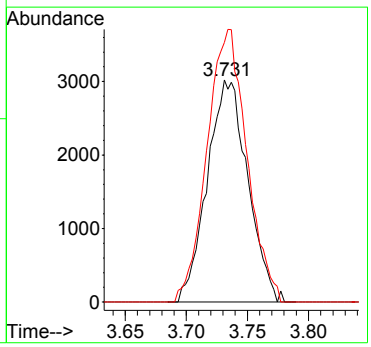


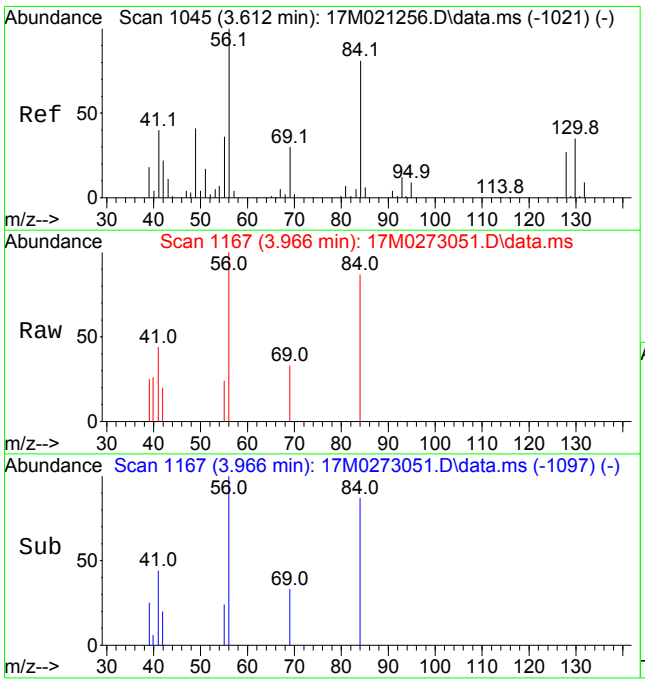


#23
cis-1,2-Dichloroethene
Concen: 1.4416 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 96 Resp: 6948

Ion	Ratio	Lower	Upper
96	100		
61	121.3	98.1	147.1

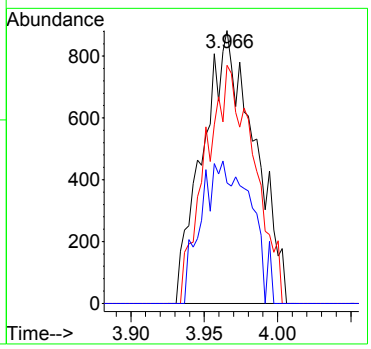


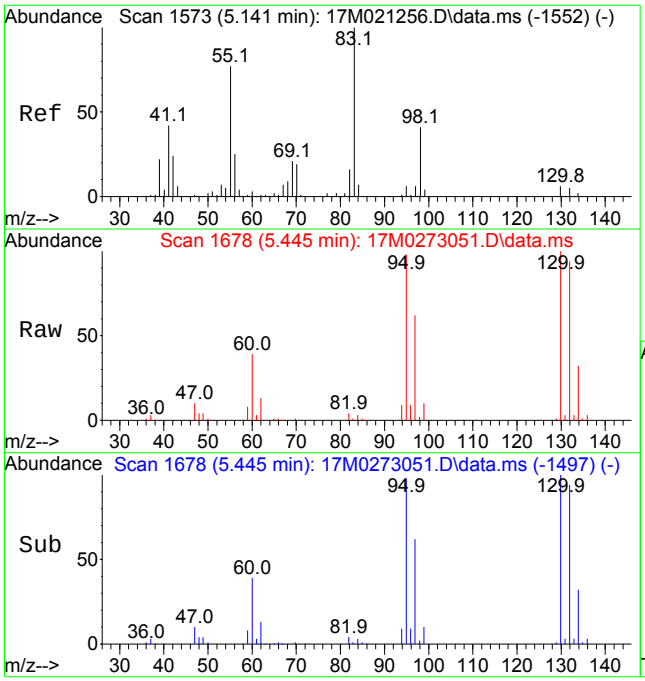


#25
Cyclohexane
Concen: 0.3325 ug/L
RT: 3.966 min Scan# 1167
Delta R.T. 0.003 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 56 Resp: 2163

Ion	Ratio	Lower	Upper
56	100		
84	81.9	69.4	104.0
41	50.2	72.2	108.2#

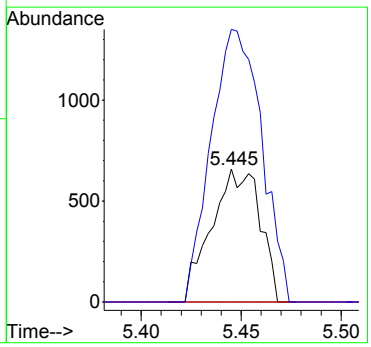


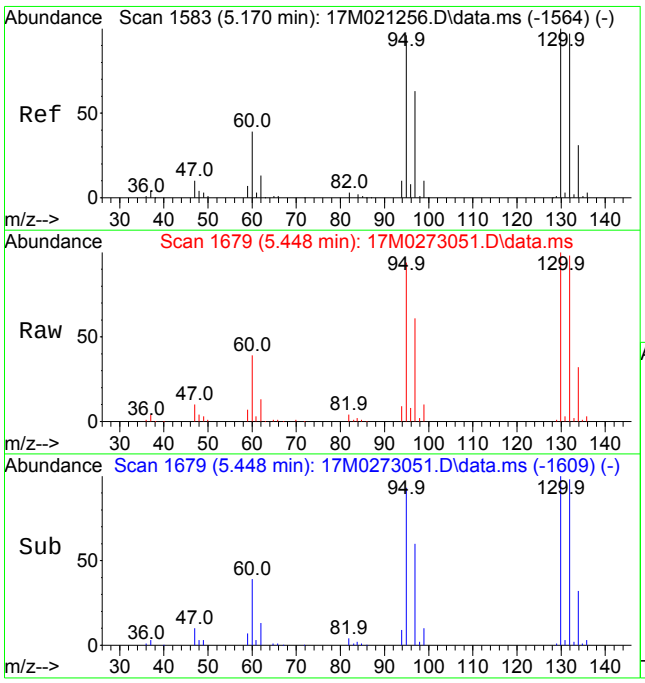


#36
Methylcyclohexane
Concen: 0.1627 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.023 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 83 Resp: 1109

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	214.4	34.4	51.6#

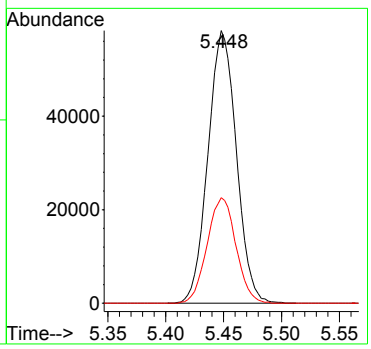


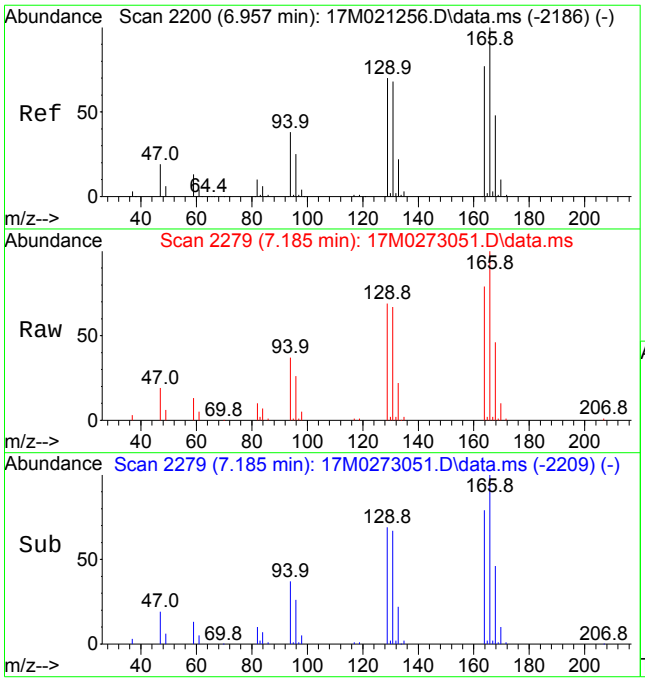


#37
Trichloroethene
Concen: 19.2156 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion:130 Resp: 99521

Ion	Ratio	Lower	Upper
130	100		
60	39.3	22.9	53.3

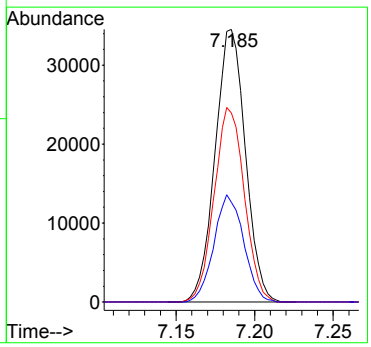


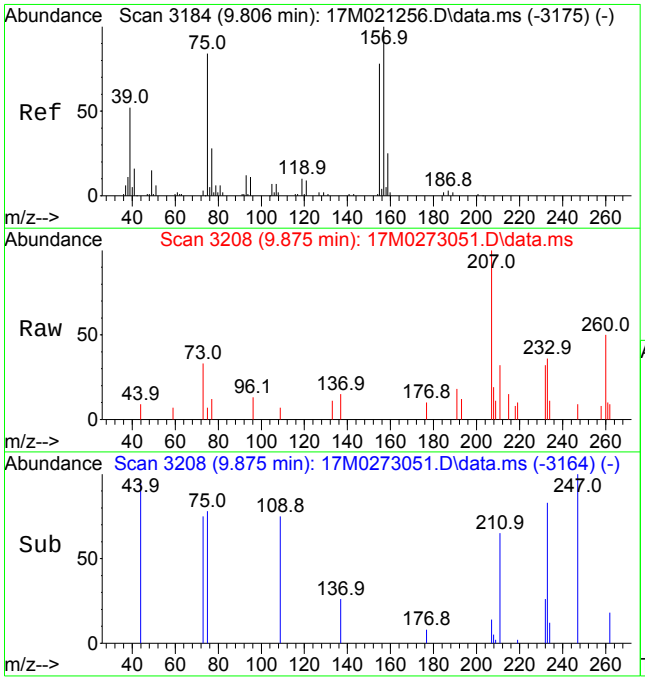


#49
Tetrachloroethene
Concen: 8.6053 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion:166 Resp: 46356

Ion	Ratio	Lower	Upper
166	100		
129	70.9	56.2	84.4
94	38.5	29.7	44.5

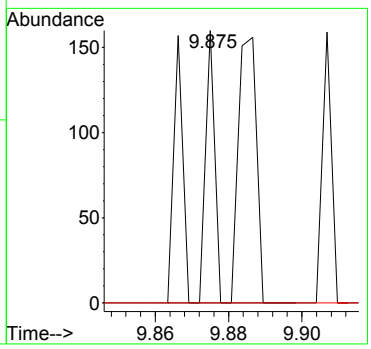




#82
1,2-Dibromo-3-Chloropropane
Concen: 0.1437 ug/L
RT: 9.875 min Scan# 3208
Delta R.T. -0.072 min
Lab File: 17M0273051.D
Acq: 27 Apr 2017 00:47

Tgt Ion: 75 Resp: 108

Ion	Ratio	Lower	Upper
75	100		
157	0.0	79.1	184.7#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273052.D Vial: 25
Acq On : 27 Apr 2017 01:06 Operator: ADC
Sample : L17041075-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:17 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

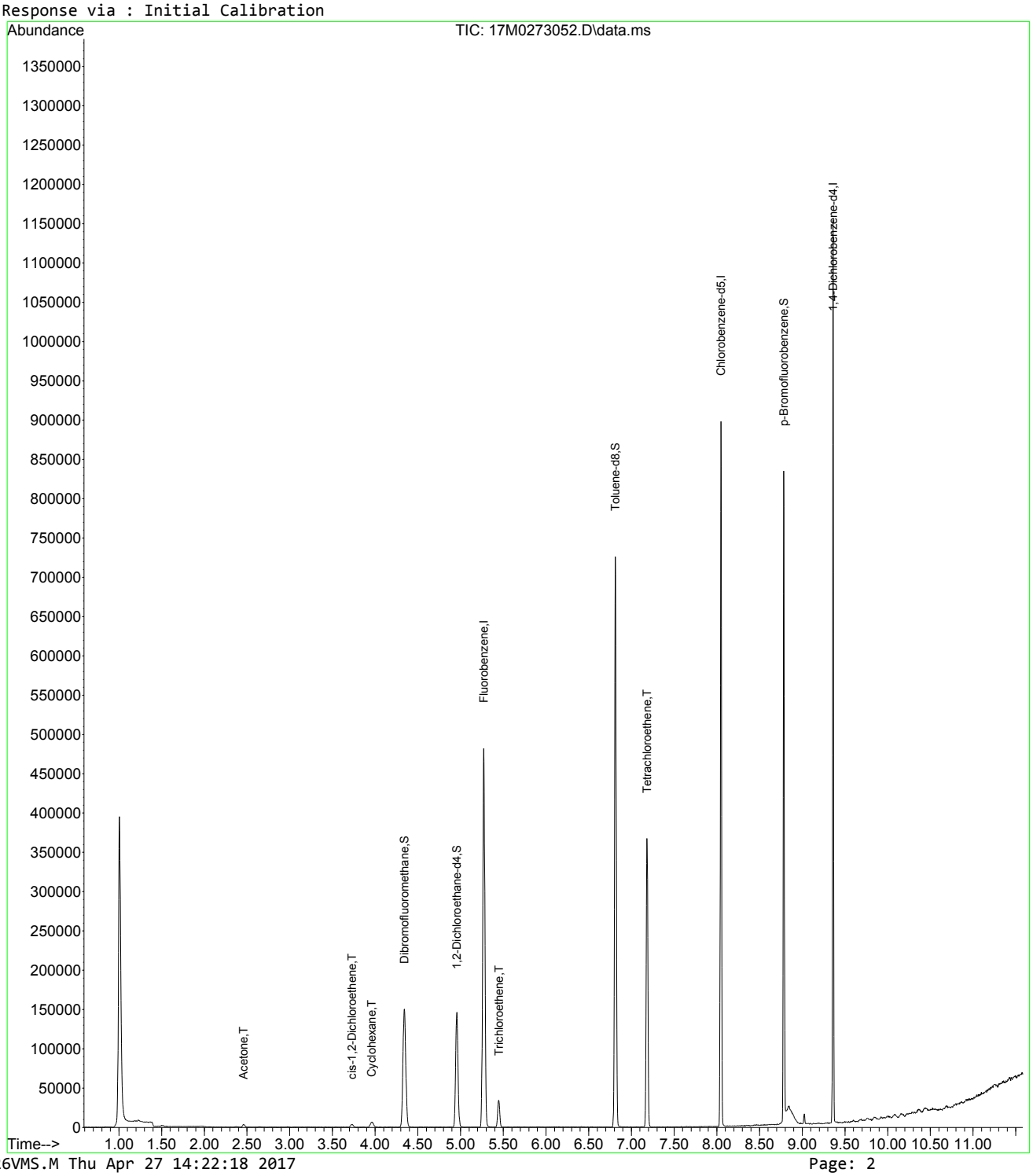
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	415161	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307389	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	153537	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.339	111	108465	24.1912 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.765%		
34) 1,2-Dichloroethane-d4	4.953	65	104911	24.9633 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.853%		
47) Toluene-d8	6.812	98	393162	25.6287 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.515%		
66) p-Bromofluorobenzene	8.784	95	135322	26.3230 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.292%		
Target Compounds					Qvalue
16) Acetone	2.457	43	4408	5.2807 ug/L	97
23) cis-1,2-Dichloroethene	3.728	96	2316	0.4686 ug/L	100
25) Cyclohexane	3.957	56	4807	0.7206 ug/L #	76
37) Trichloroethene	5.448	130	11453	2.1562 ug/L	100
49) Tetrachloroethene	7.182	166	89000	16.1914 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

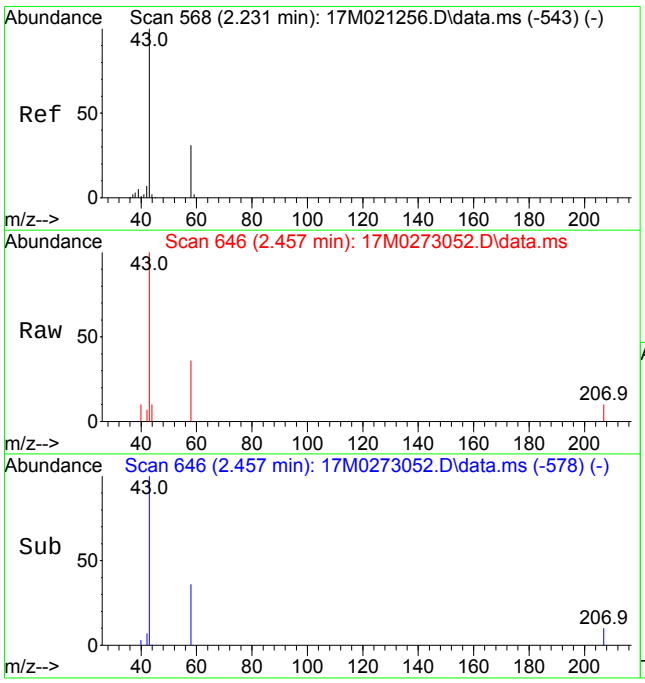
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273052.D Vial: 25
Acq On : 27 Apr 2017 01:06 Operator: ADC
Sample : L17041075-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:17 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



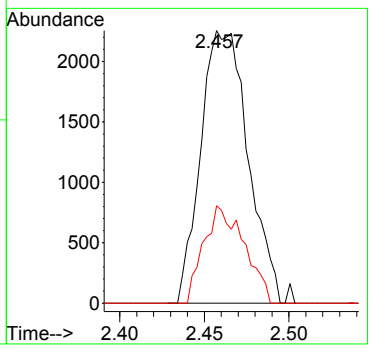
826VMS.M Thu Apr 27 14:22:18 2017 Page: 2

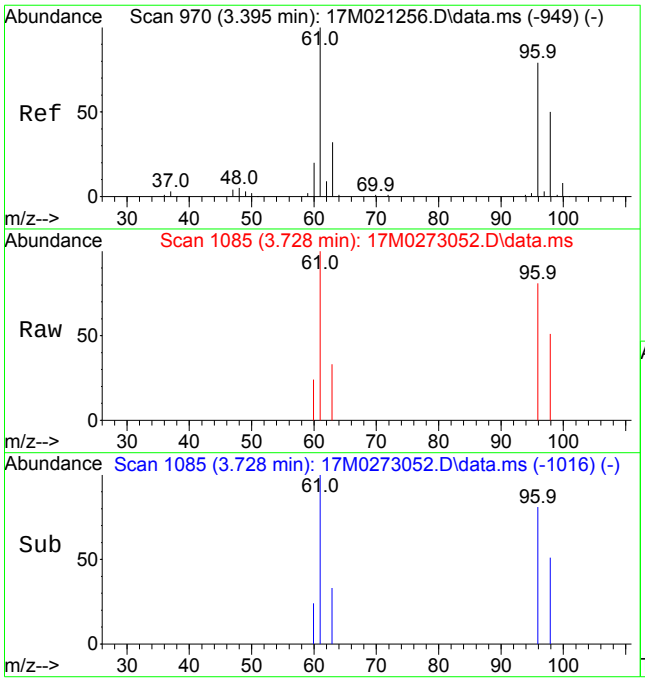


#16
Acetone
Concen: 5.2807 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273052.D
Acq: 27 Apr 2017 01:06

Tgt Ion: 43 Resp: 4408

Ion	Ratio	Lower	Upper
43	100		
58	30.4	19.4	45.2

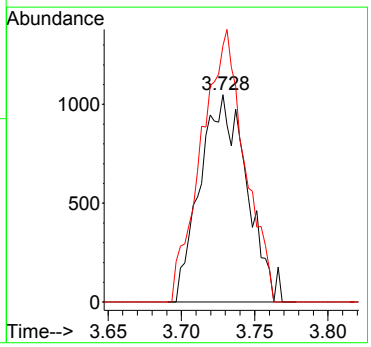


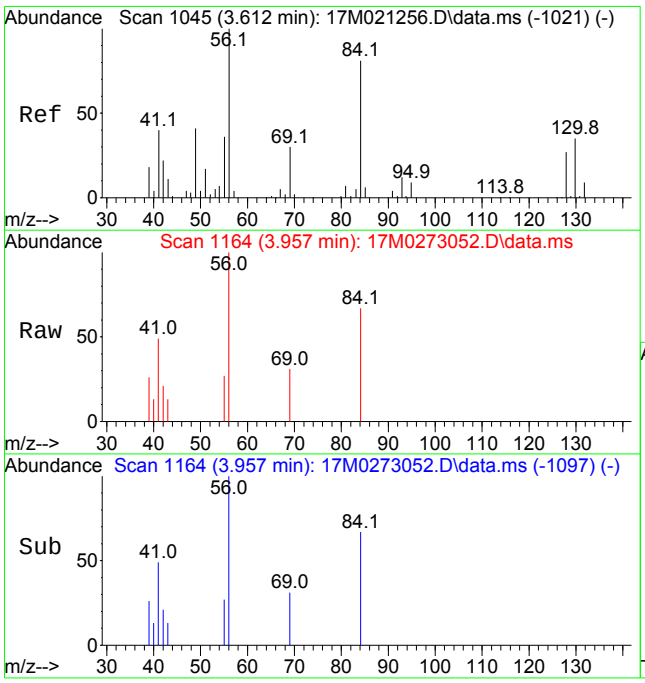


#23
cis-1,2-Dichloroethene
Concen: 0.4686 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273052.D
Acq: 27 Apr 2017 01:06

Tgt Ion: 96 Resp: 2316

Ion	Ratio	Lower	Upper
96	100		
61	122.1	98.1	147.1

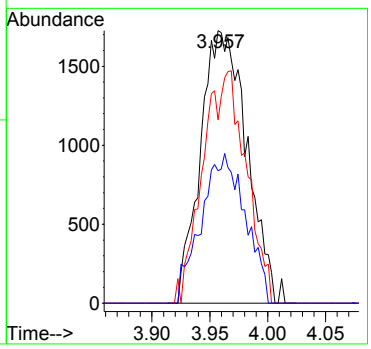


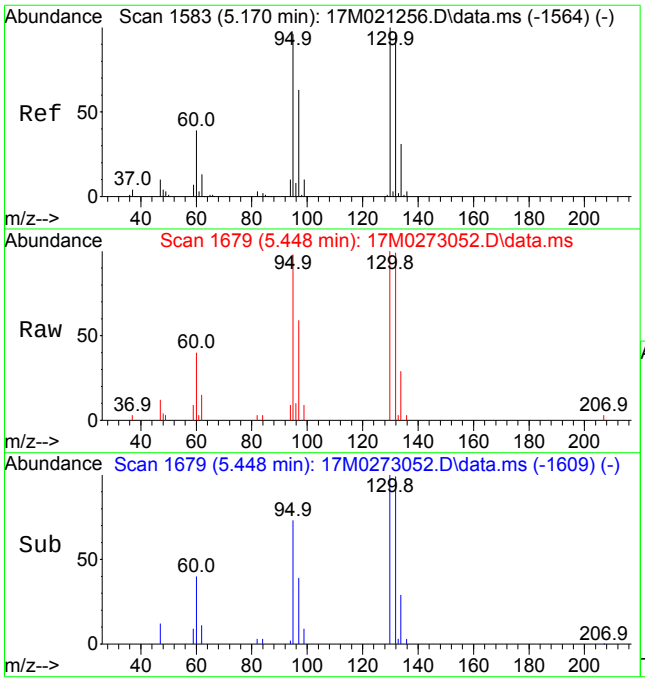


#25
Cyclohexane
Concen: 0.7206 ug/L
RT: 3.957 min Scan# 1164
Delta R.T. -0.006 min
Lab File: 17M0273052.D
Acq: 27 Apr 2017 01:06

Tgt Ion: 56 Resp: 4807

Ion	Ratio	Lower	Upper
56	100		
84	79.9	69.4	104.0
41	52.3	72.2	108.2#

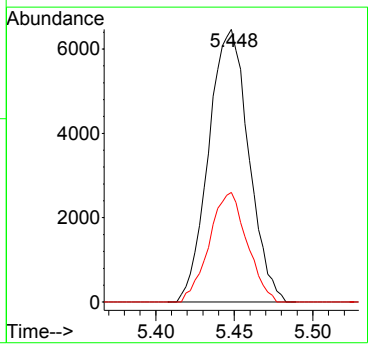


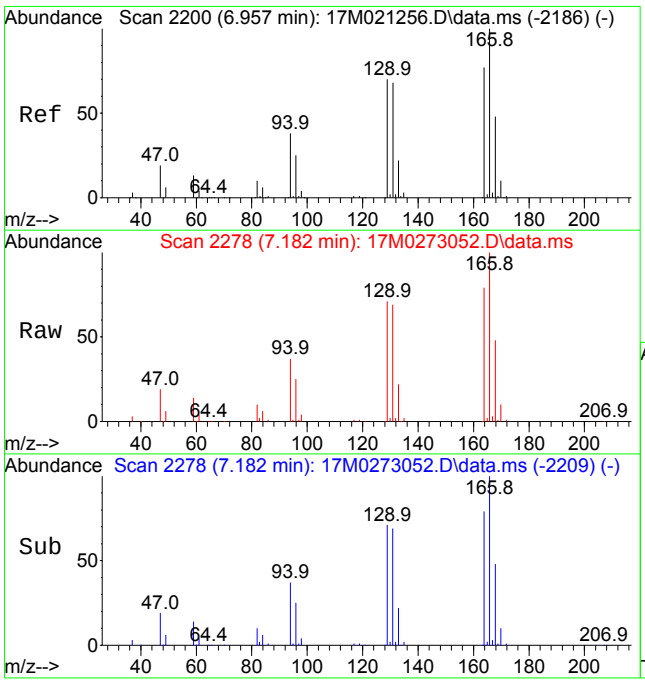


#37
Trichloroethene
Concen: 2.1562 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273052.D
Acq: 27 Apr 2017 01:06

Tgt Ion:130 Resp: 11453

Ion	Ratio	Lower	Upper
130	100		
60	37.9	22.9	53.3

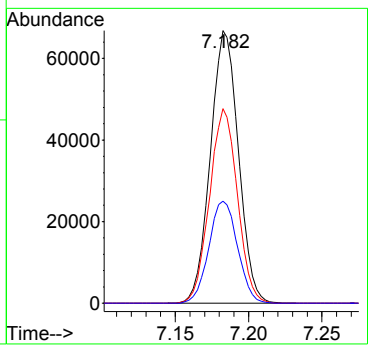




#49
Tetrachloroethene
Concen: 16.1914 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273052.D
Acq: 27 Apr 2017 01:06

Tgt Ion:166 Resp: 89000

Ion	Ratio	Lower	Upper
166	100		
129	70.8	56.2	84.4
94	38.3	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273053.D Vial: 26
Acq On : 27 Apr 2017 01:41 Operator: ADC
Sample : L17041075-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:20 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

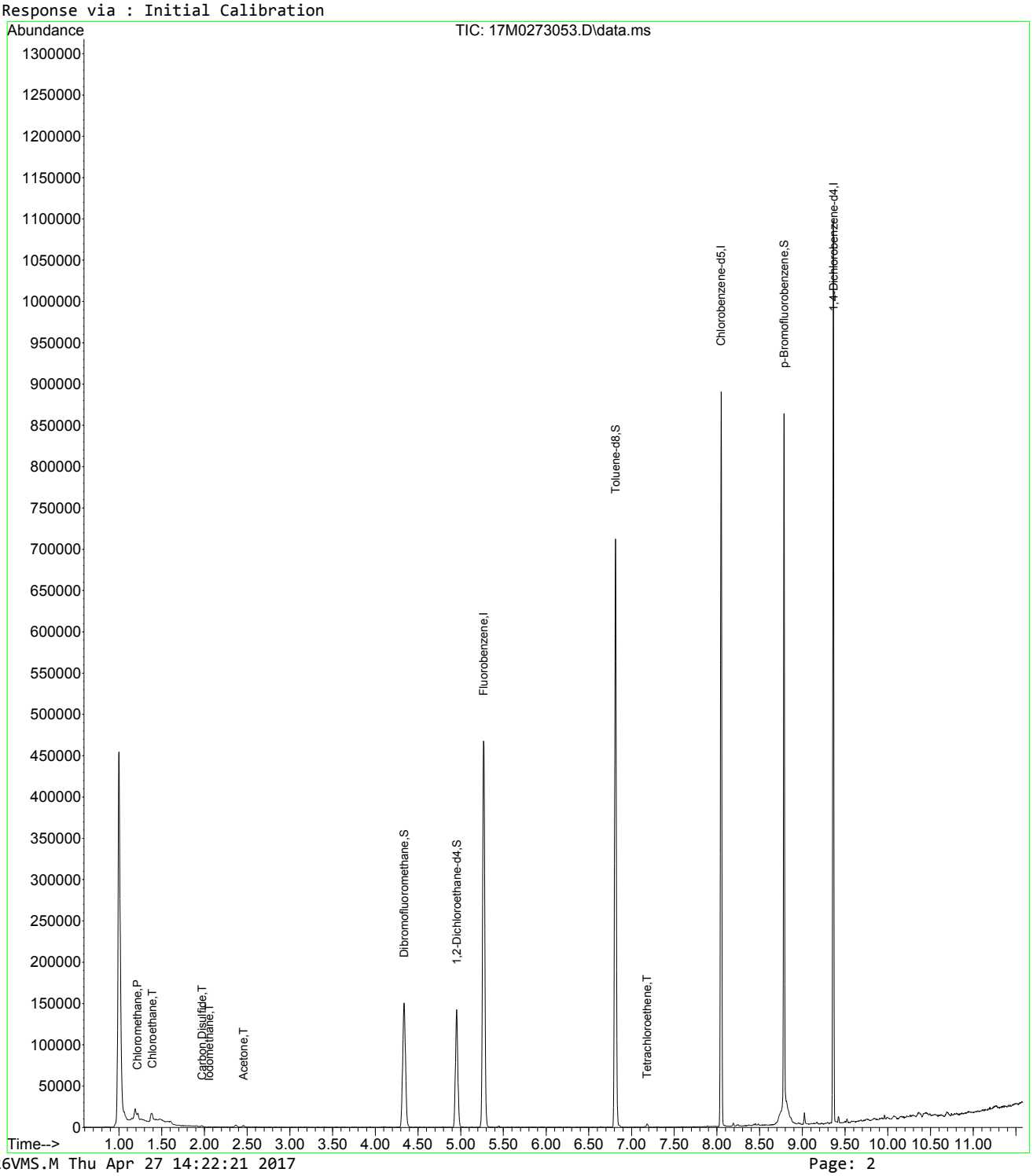
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	409535	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	301747	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148686	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	109244	24.6997	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.799%			
34) 1,2-Dichloroethane-d4	4.953	65	103614	24.9934	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.974%			
47) Toluene-d8	6.812	98	389316	25.8525	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.410%			
66) p-Bromofluorobenzene	8.784	95	138550	27.8302	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.321%			
Target Compounds						Qvalue
3) Chloromethane	1.212	50	763	0.1603	ug/L #	42
7) Chloroethane	1.389	64	19912	7.9633	ug/L #	54
11) Carbon Disulfide	1.971	76	2084	0.1535	ug/L #	73
13) Iodomethane	2.058	142	224	2.0364	ug/L #	35
16) Acetone	2.457	43	2376	2.8855	ug/L	87
49) Tetrachloroethene	7.180	166	1085	0.2011	ug/L	92

(#) = qualifier out of range (m) = manual integration (+) = signals summed

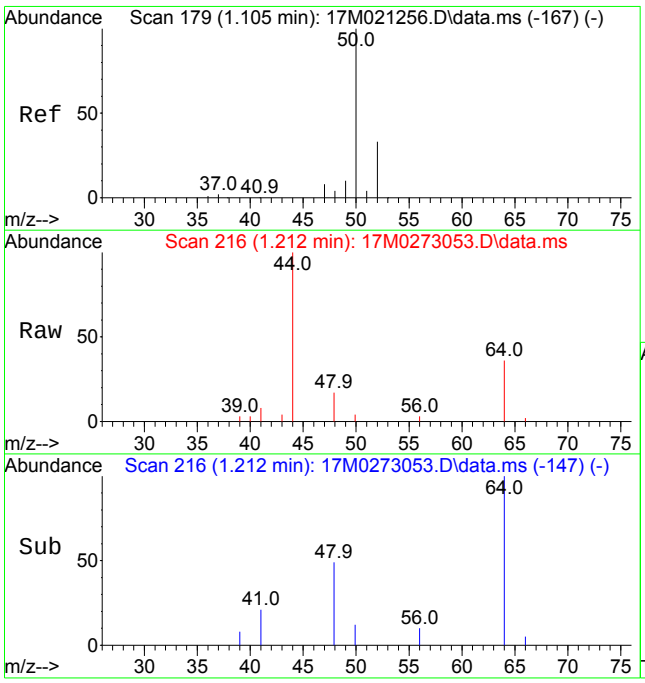
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273053.D Vial: 26
Acq On : 27 Apr 2017 01:41 Operator: ADC
Sample : L17041075-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:20 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



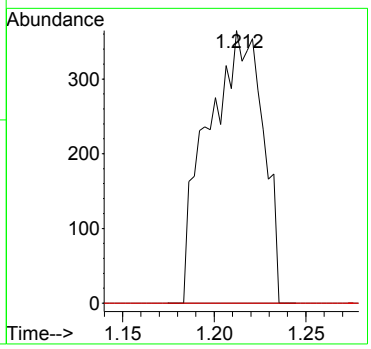
826VMS.M Thu Apr 27 14:22:21 2017 Page: 2

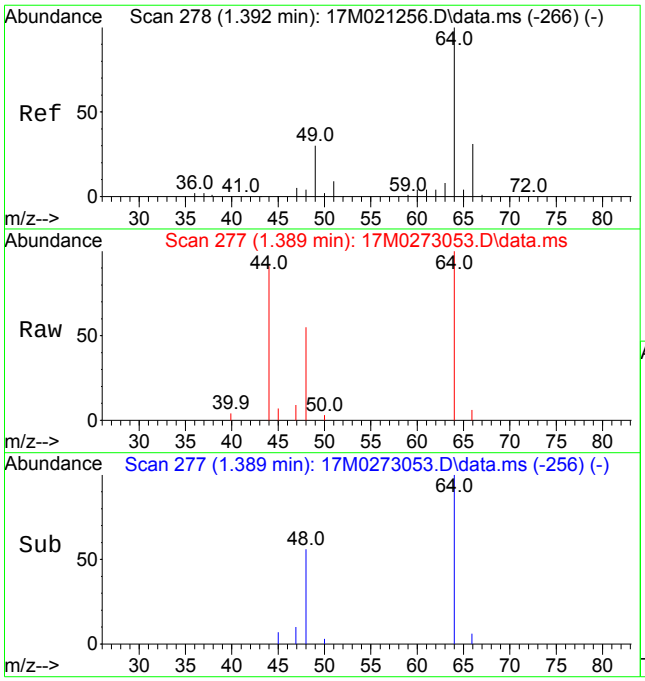


#3
Chloromethane
Concen: 0.1603 ug/L
RT: 1.212 min Scan# 216
Delta R.T. 0.000 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion: 50 Resp: 763

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

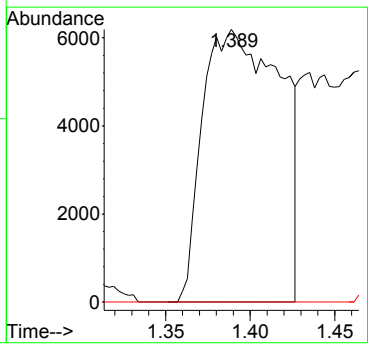


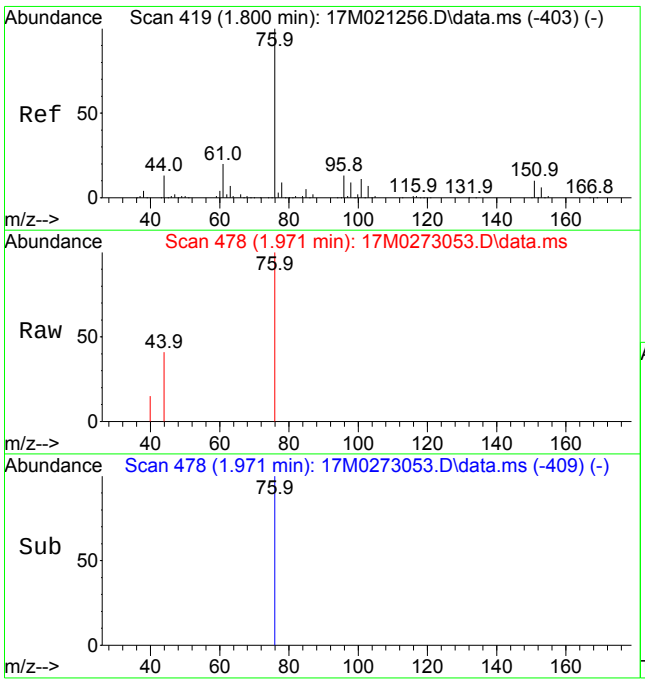


#7
Chloroethane
Concen: 7.9633 ug/L
RT: 1.389 min Scan# 277
Delta R.T. -0.139 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion: 64 Resp: 19912

Ion	Ratio	Lower	Upper
64	100		
49	3.1	16.0	37.4#

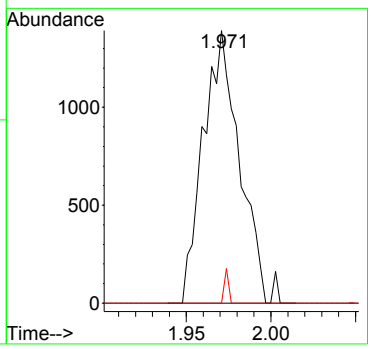


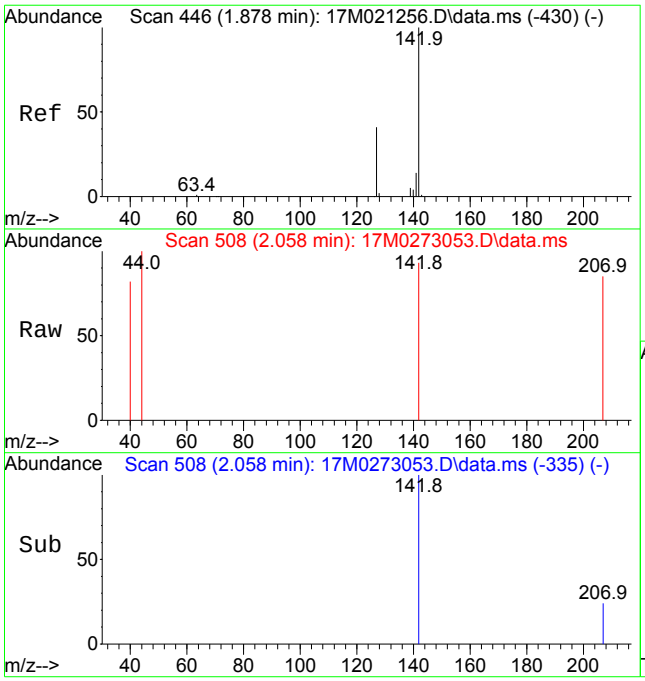


#11
Carbon Disulfide
Concen: 0.1535 ug/L
RT: 1.971 min Scan# 478
Delta R.T. -0.000 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion: 76 Resp: 2084

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

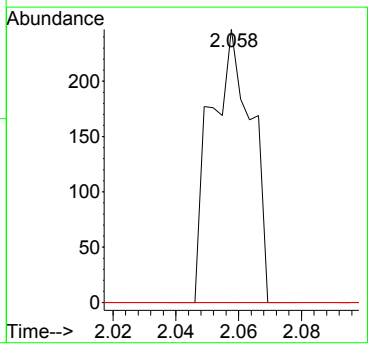


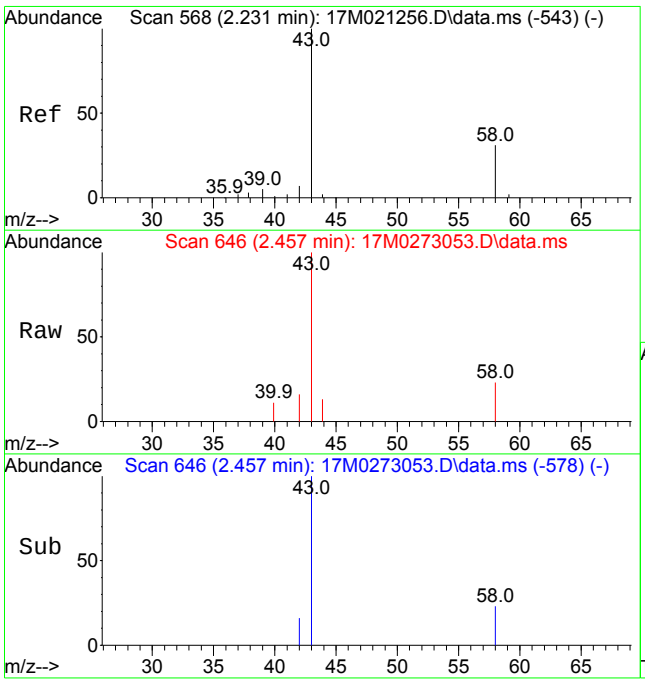


#13
Iodomethane
Concen: 2.0364 ug/L
RT: 2.058 min Scan# 508
Delta R.T. -0.000 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion:142 Resp: 224

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

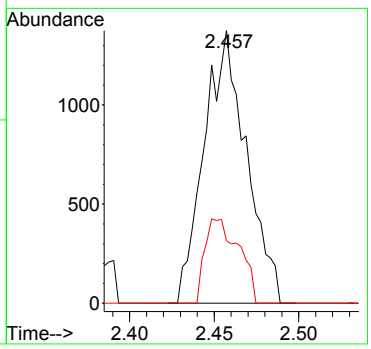


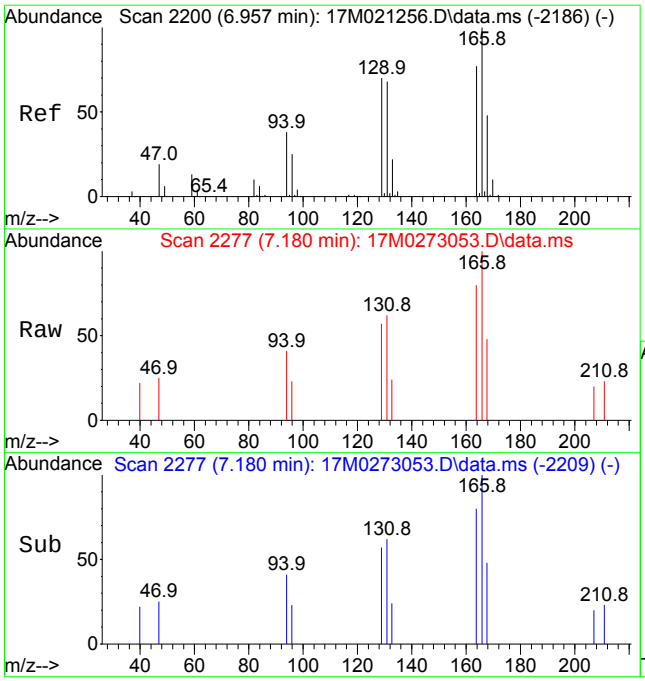


#16
Acetone
Concen: 2.8855 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion: 43 Resp: 2376

Ion	Ratio	Lower	Upper
43	100		
58	24.9	19.4	45.2

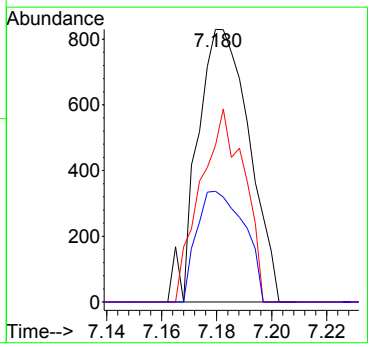




#49
Tetrachloroethene
Concen: 0.2011 ug/L
RT: 7.180 min Scan# 2277
Delta R.T. -0.002 min
Lab File: 17M0273053.D
Acq: 27 Apr 2017 01:41

Tgt Ion:166 Resp: 1085

Ion	Ratio	Lower	Upper
166	100		
129	60.0	56.2	84.4
94	37.2	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273054.D Vial: 27
Acq On : 27 Apr 2017 02:01 Operator: ADC
Sample : L17041075-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:23 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

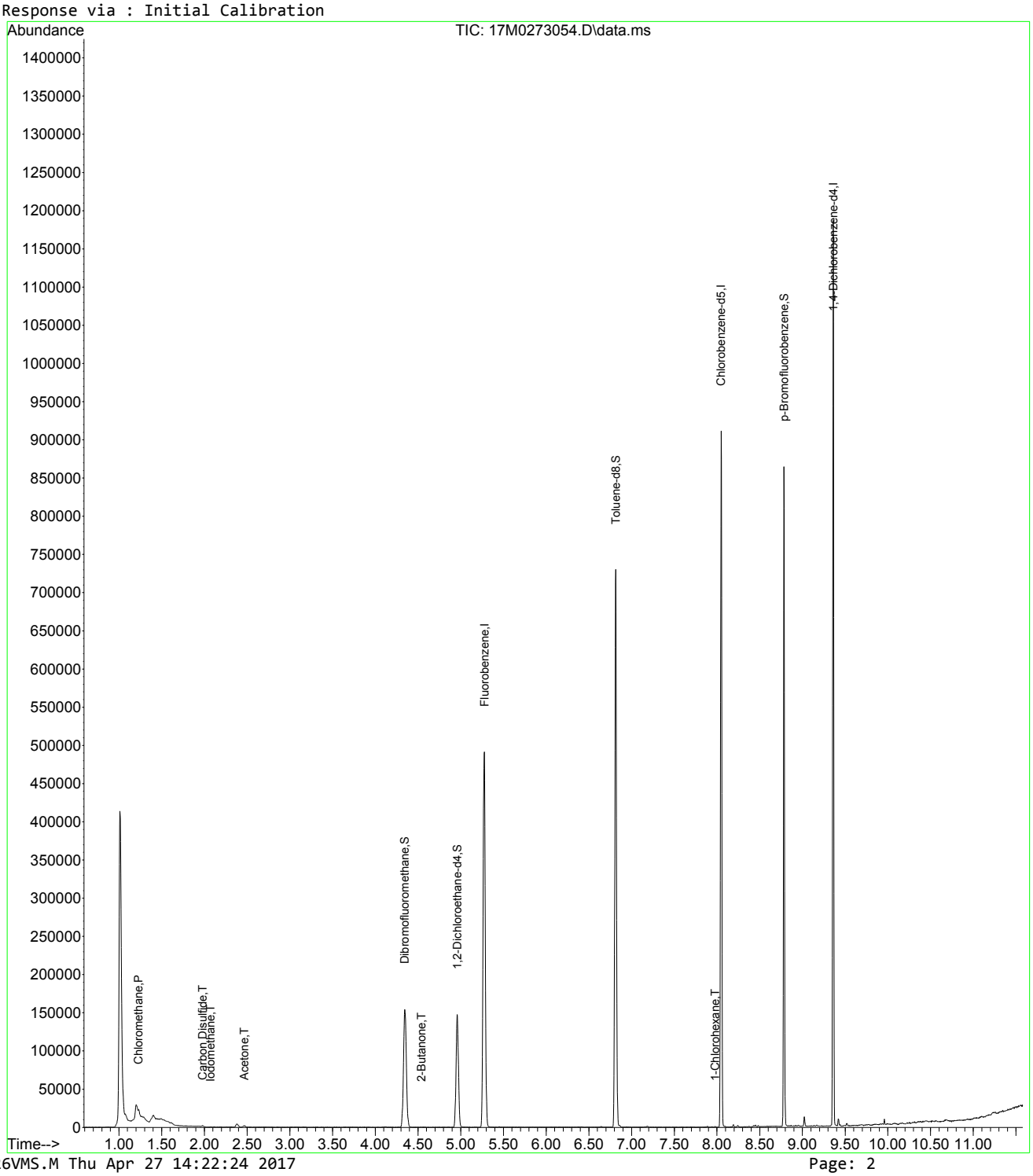
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	426416	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	317165	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	158085	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	112242	24.3729	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.492%			
34) 1,2-Dichloroethane-d4	4.959	65	108124	25.0487	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.195%			
47) Toluene-d8	6.815	98	395025	24.9564	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.826%			
66) p-Bromofluorobenzene	8.783	95	139575	26.3692	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.477%			
Target Compounds						Qvalue
3) Chloromethane	1.227	50	1496	0.3018	ug/L #	42
11) Carbon Disulfide	1.979	76	1931	0.1366	ug/L #	73
13) Iodomethane	2.069	142	164	2.0260	ug/L #	35
16) Acetone	2.466	43	2851	3.3253	ug/L	91
32) 2-Butanone	4.542	43	209	0.1635	ug/L #	37
56) 1-Chlorohexane	7.979	69	141	0.1309	ug/L #	1

(#) = qualifier out of range (m) = manual integration (+) = signals summed

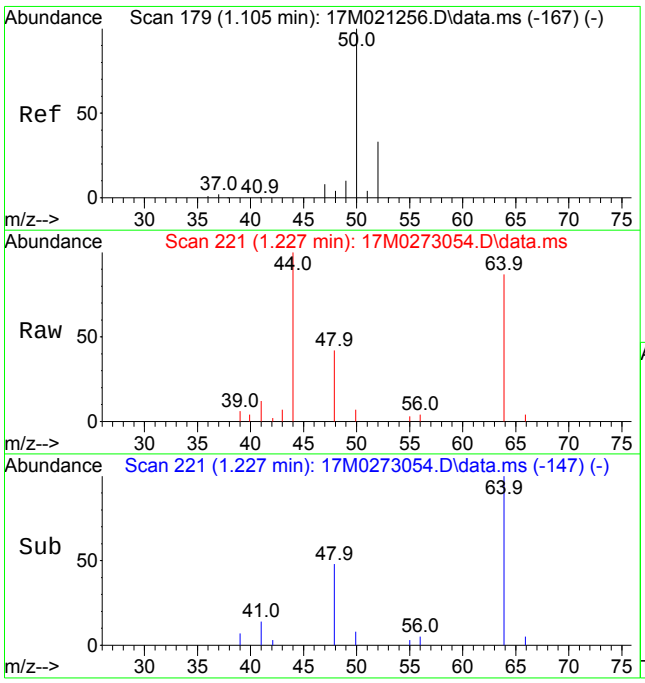
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273054.D Vial: 27
Acq On : 27 Apr 2017 02:01 Operator: ADC
Sample : L17041075-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:23 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



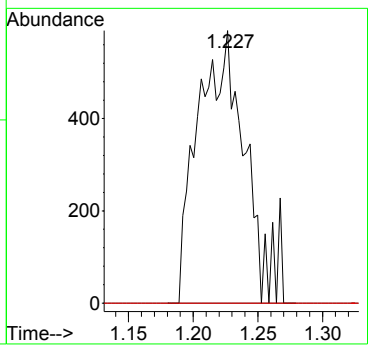
826VMS.M Thu Apr 27 14:22:24 2017 Page: 2

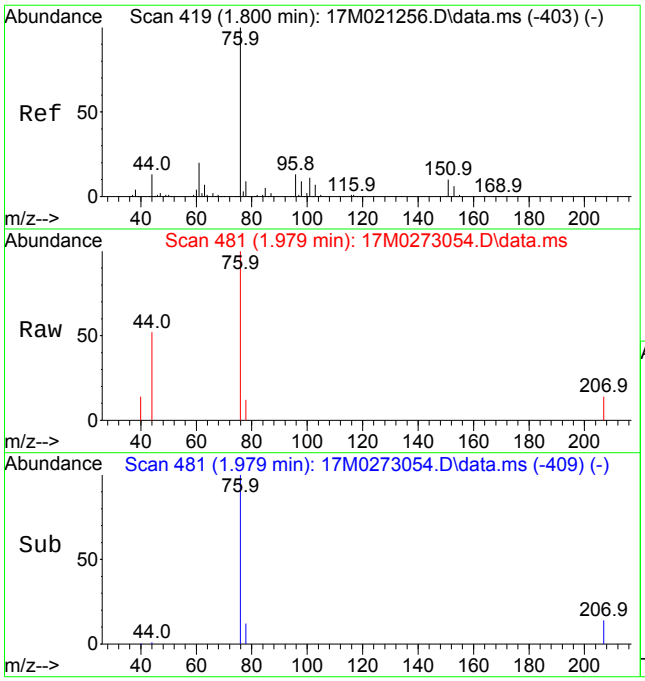


#3
Chloromethane
Concen: 0.3018 ug/L
RT: 1.227 min Scan# 221
Delta R.T. 0.015 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion: 50 Resp: 1496

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

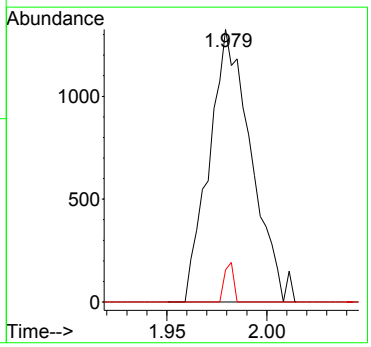


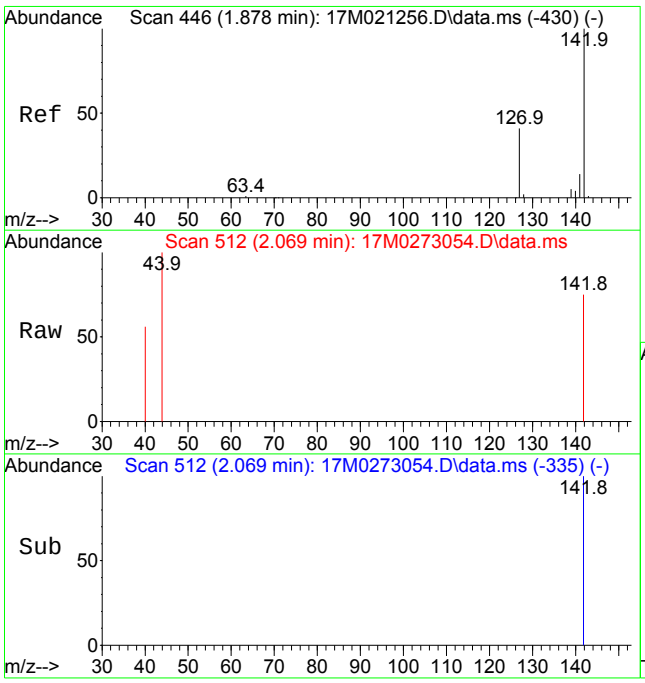


#11
Carbon Disulfide
Concen: 0.1366 ug/L
RT: 1.979 min Scan# 481
Delta R.T. 0.008 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion: 76 Resp: 1931

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

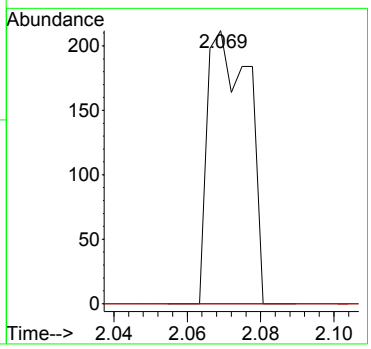


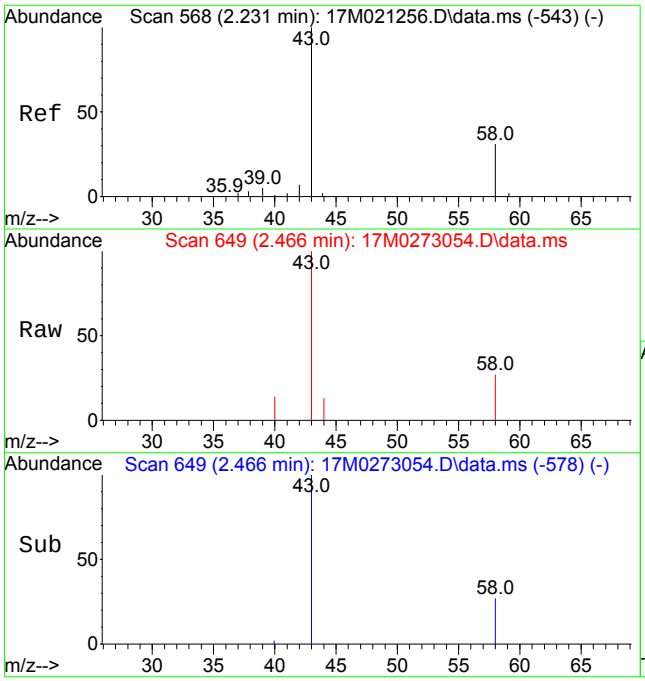


#13
Iodomethane
Concen: 2.0260 ug/L
RT: 2.069 min Scan# 512
Delta R.T. 0.011 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion:142 Resp: 164

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

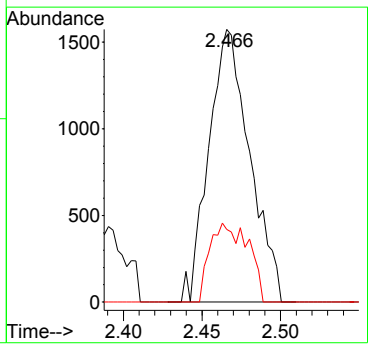


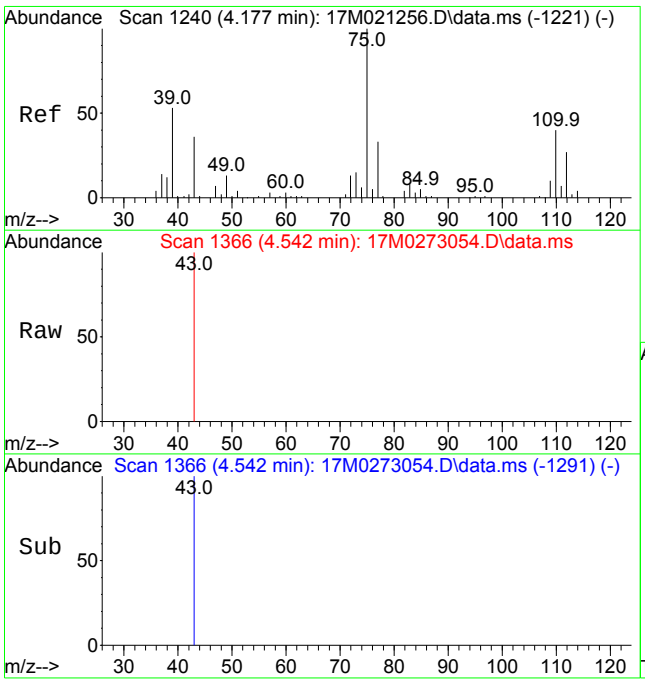


#16
Acetone
Concen: 3.3253 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion: 43 Resp: 2851

Ion	Ratio	Lower	Upper
43	100		
58	27.1	19.4	45.2

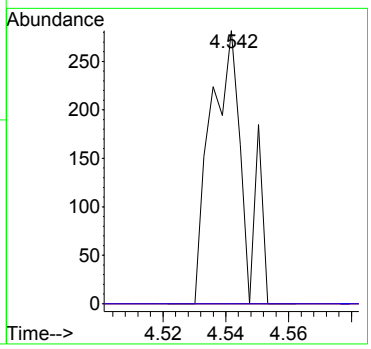


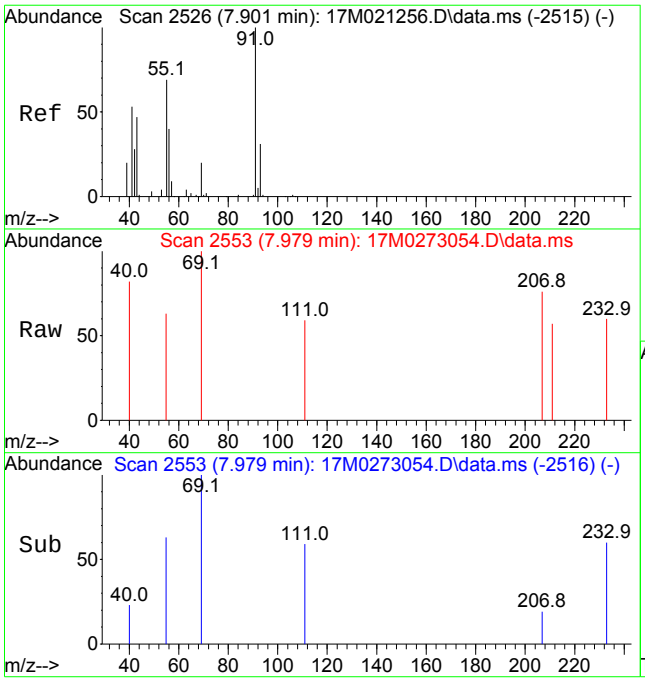


#32
2-Butanone
Concen: 0.1635 ug/L
RT: 4.542 min Scan# 1366
Delta R.T. 0.018 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion: 43 Resp: 209

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

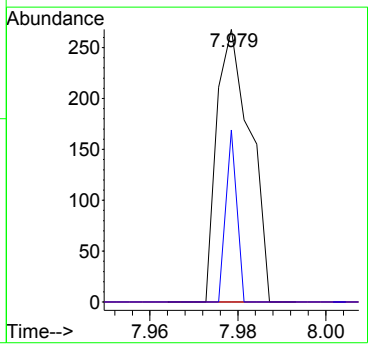




#56
1-Chlorohexane
Concen: 0.1309 ug/L
RT: 7.979 min Scan# 2553
Delta R.T. -0.092 min
Lab File: 17M0273054.D
Acq: 27 Apr 2017 02:01

Tgt Ion: 69 Resp: 141

Ion	Ratio	Lower	Upper
69	100		
91	431.9	1938.3	2907.5#
55	2114.2	283.0	424.6#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273055.D Vial: 28
Acq On : 27 Apr 2017 02:40 Operator: ADC
Sample : L17041075-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

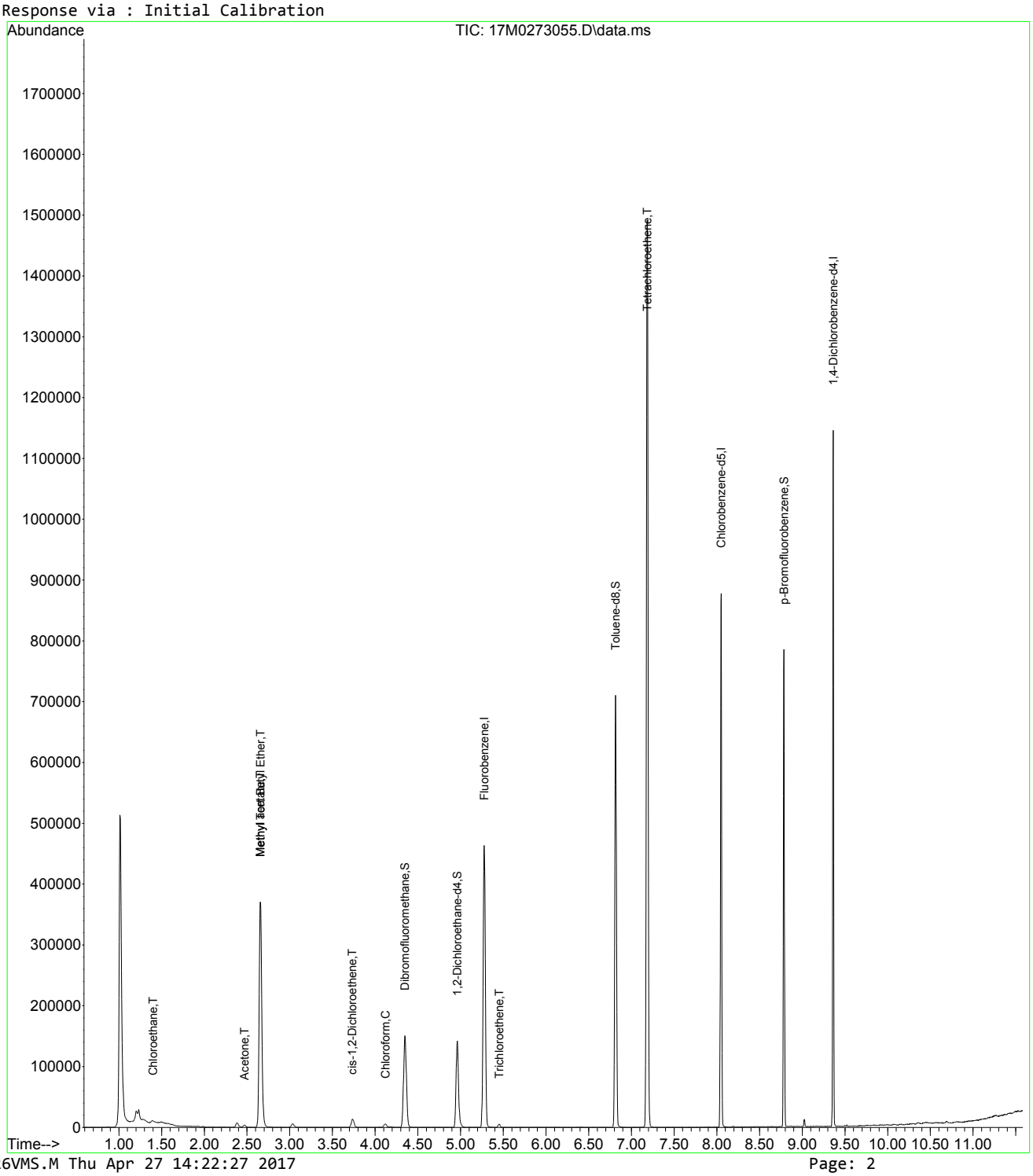
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	408635	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	302523	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151823	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.348	111	108910	24.6784 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.714%		
34) 1,2-Dichloroethane-d4	4.962	65	104012	25.1446 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.578%		
47) Toluene-d8	6.815	98	382845	25.3576 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.430%		
66) p-Bromofluorobenzene	8.786	95	129315	25.4385 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.754%		
Target Compounds					Qvalue
7) Chloroethane	1.400	64	19686	7.8903 ug/L #	50
16) Acetone	2.469	43	4430	5.3918 ug/L	96
18) Methyl acetate	2.654	43	79076	36.7113 ug/L #	89
19) Methyl Tert Butyl Ether	2.657	73	392207	35.9575 ug/L #	100
23) cis-1,2-Dichloroethene	3.731	96	7761	1.5953 ug/L	96
27) Chloroform	4.122	83	6198	0.7701 ug/L	99
37) Trichloroethene	5.451	130	1926	0.3684 ug/L	97
49) Tetrachloroethene	7.185	166	362939	67.0898 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

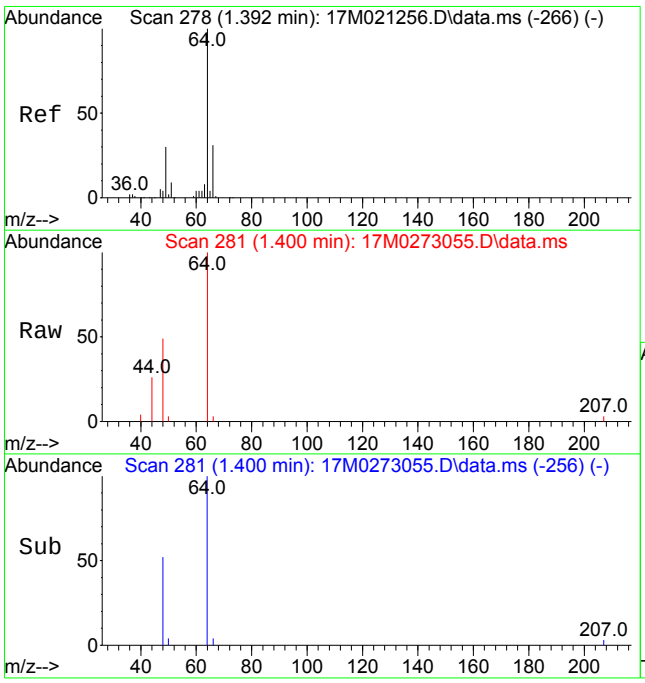
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273055.D Vial: 28
Acq On : 27 Apr 2017 02:40 Operator: ADC
Sample : L17041075-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:22:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



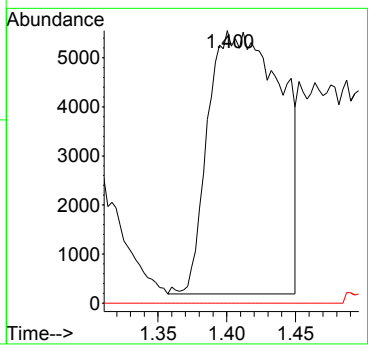
826VMS.M Thu Apr 27 14:22:27 2017 Page: 2

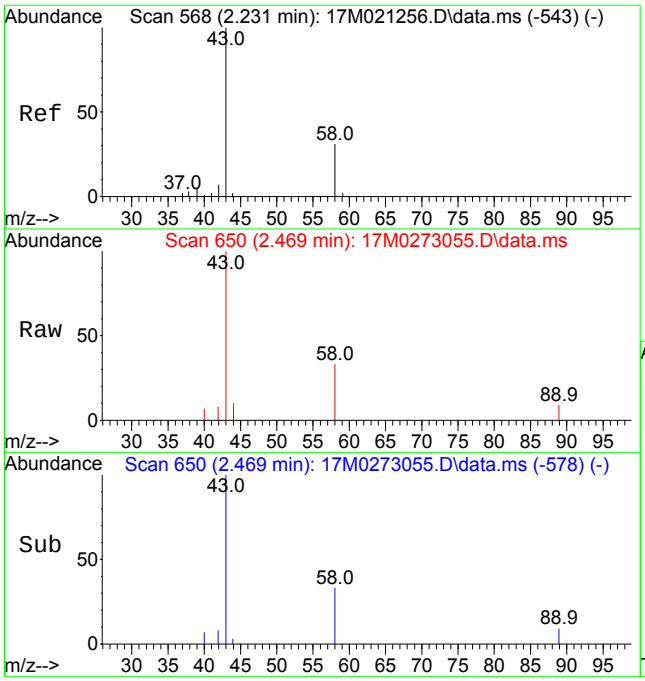


#7
Chloroethane
Concen: 7.8903 ug/L
RT: 1.400 min Scan# 281
Delta R.T. -0.128 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 64 Resp: 19686

Ion	Ratio	Lower	Upper
64	100		
49	1.0	16.0	37.4#

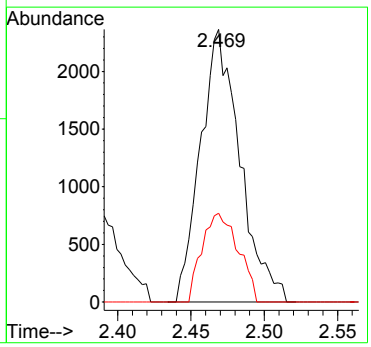


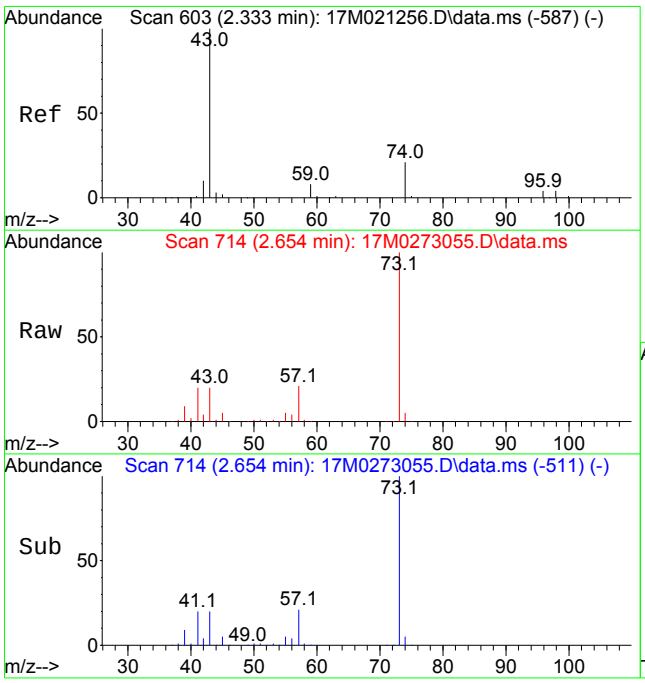


#16
Acetone
Concen: 5.3918 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 43 Resp: 4430

Ion	Ratio	Lower	Upper
43	100		
58	29.8	19.4	45.2

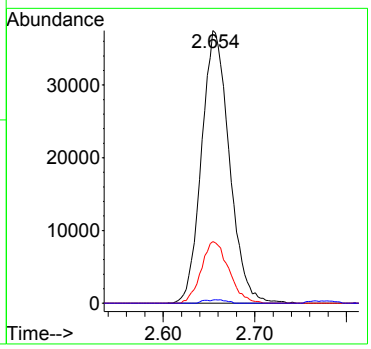


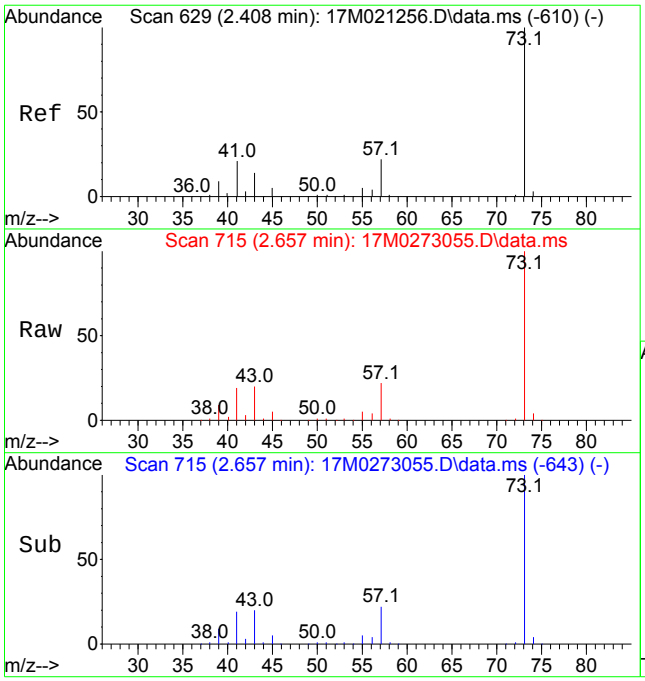


#18
Methyl acetate
Concen: 36.7113 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 43 Resp: 79076

Ion	Ratio	Lower	Upper
43	100		
74	22.4	25.4	25.4#
59	1.0	7.6	11.4#

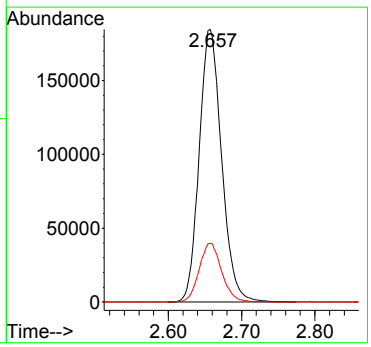


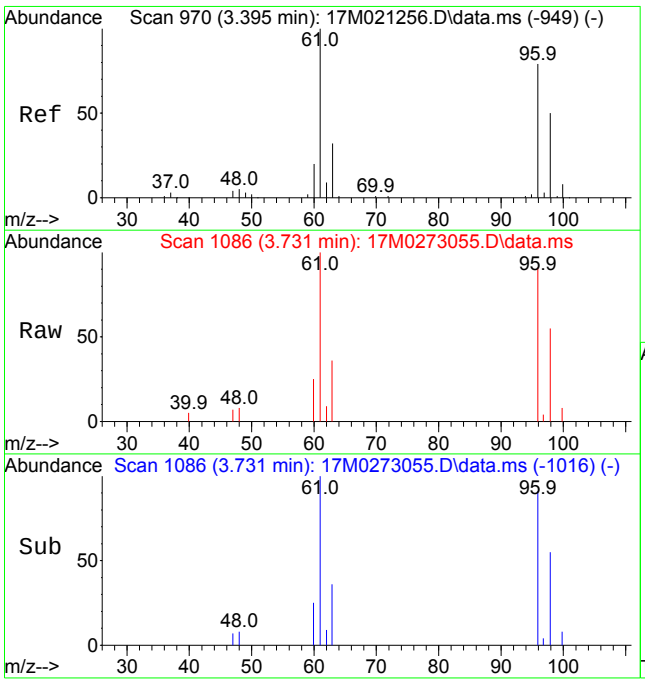


#19
Methyl Tert Butyl Ether
Concen: 35.9575 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 73 Resp: 392207

Ion	Ratio	Lower	Upper
73	100		
57	21.7	0.0	0.0#

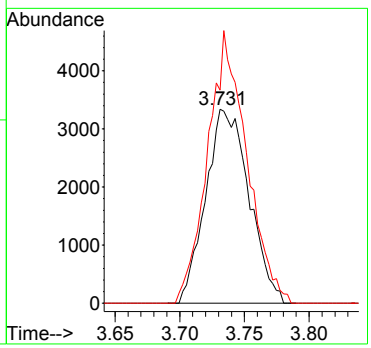


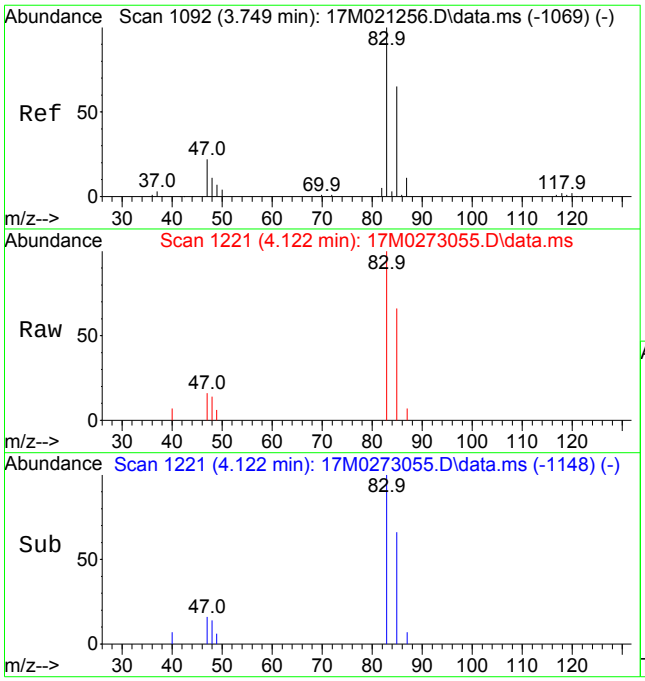


#23
cis-1,2-Dichloroethene
Concen: 1.5953 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 96 Resp: 7761

Ion	Ratio	Lower	Upper
96	100		
61	126.5	98.1	147.1

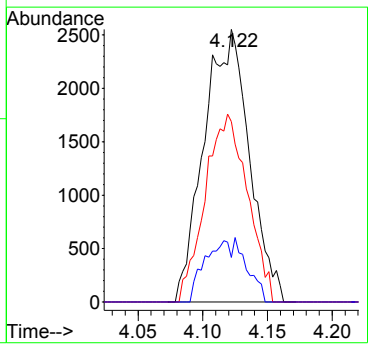


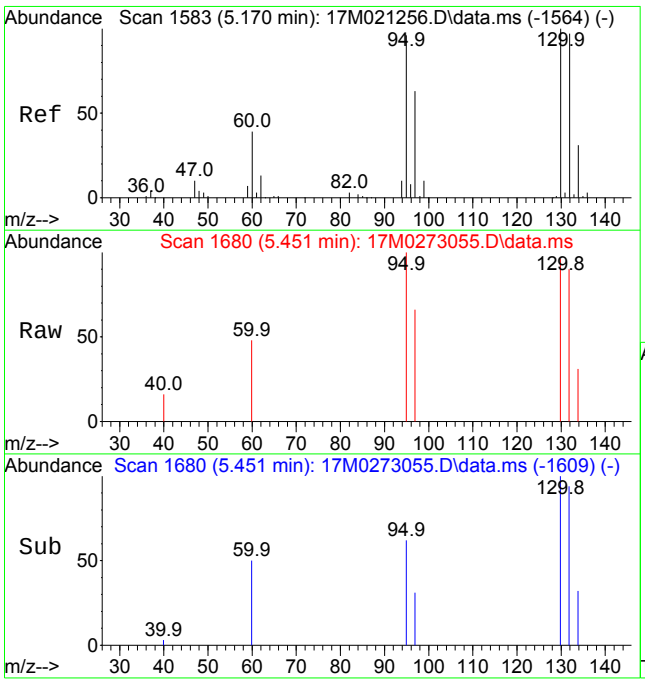


#27
Chloroform
Concen: 0.7701 ug/L
RT: 4.122 min Scan# 1221
Delta R.T. 0.012 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion: 83 Resp: 6198

Ion	Ratio	Lower	Upper
83	100		
85	64.4	39.2	91.4
47	20.6	12.9	30.1

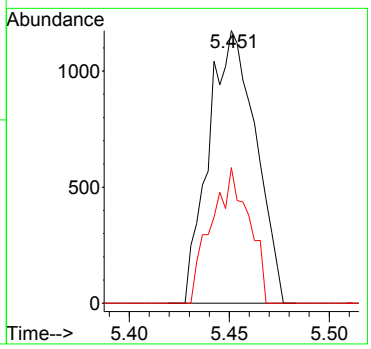


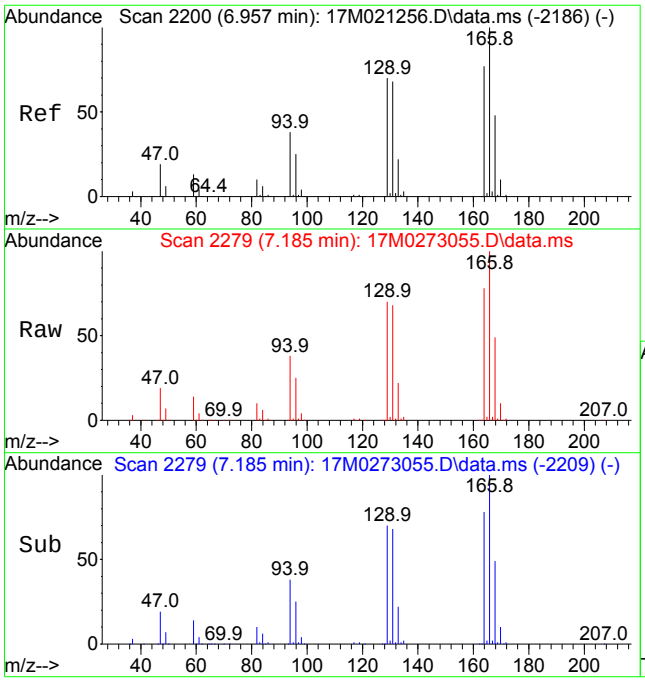


#37
Trichloroethene
Concen: 0.3684 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion:130 Resp: 1926

Ion	Ratio	Lower	Upper
130	100		
60	39.8	22.9	53.3

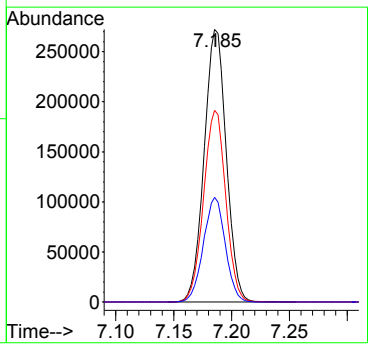




#49
Tetrachloroethene
Concen: 67.0898 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273055.D
Acq: 27 Apr 2017 02:40

Tgt Ion:166 Resp: 362939

Ion	Ratio	Lower	Upper
166	100		
129	70.3	56.2	84.4
94	38.0	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273076.D Vial: 12
Acq On : 27 Apr 2017 15:47 Operator: ADC
Sample : L17041075-41 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:20 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

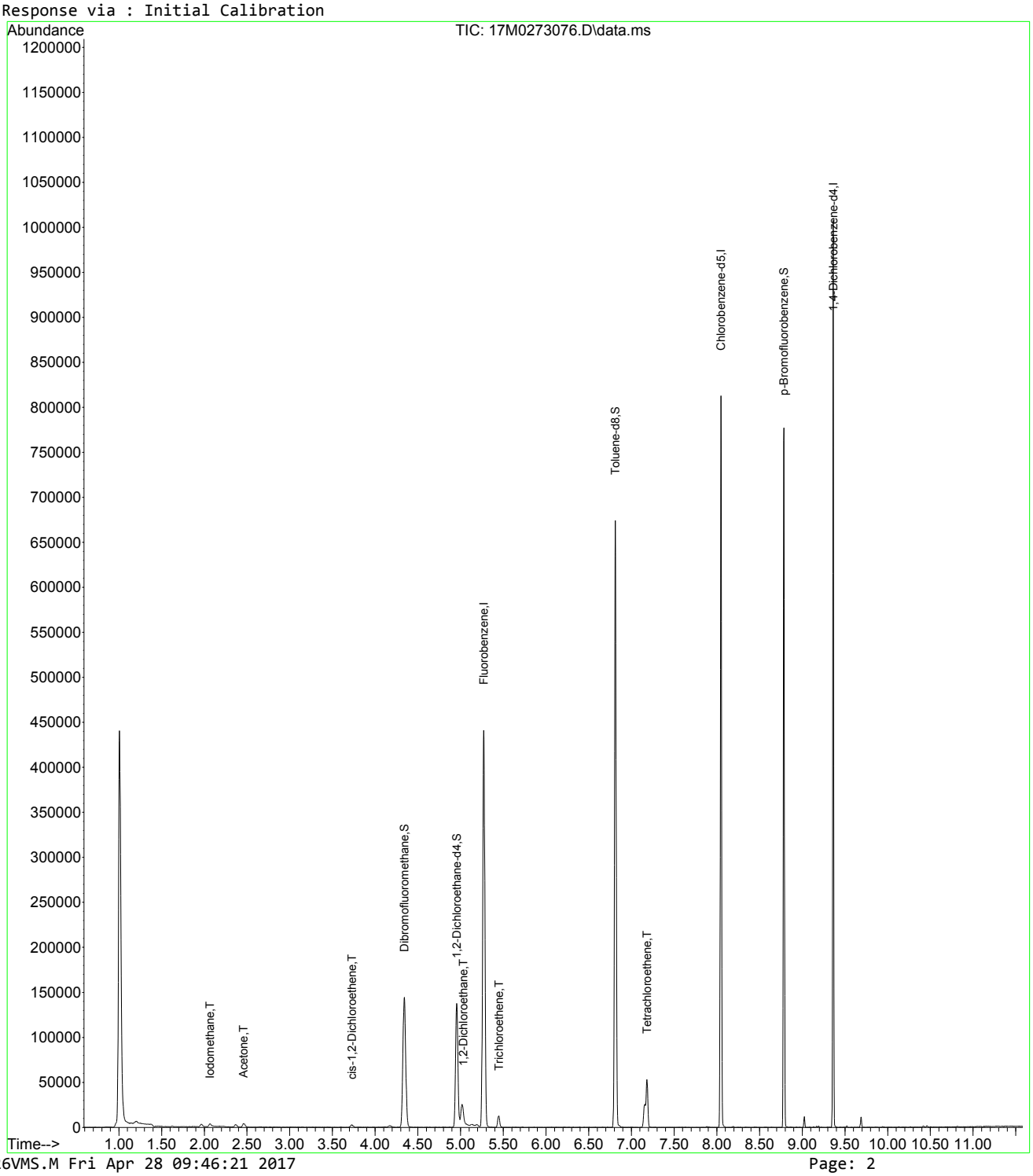
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	383513	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	276634	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	133998	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	103846	25.0723	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.289%			
34) 1,2-Dichloroethane-d4	4.953	65	100544	25.8984	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.594%			
47) Toluene-d8	6.812	98	363648	26.3402	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.361%			
66) p-Bromofluorobenzene	8.783	95	126634	28.2248	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 112.899%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	5031	2.8465	ug/L	92
16) Acetone	2.457	43	2477	3.2122	ug/L	92
23) cis-1,2-Dichloroethene	3.728	96	1587	0.3476	ug/L	93
35) 1,2-Dichloroethane	5.031	62	3751	0.7374	ug/L #	86
37) Trichloroethene	5.448	130	4346	0.8857	ug/L	99
49) Tetrachloroethene	7.182	166	12542	2.5354	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

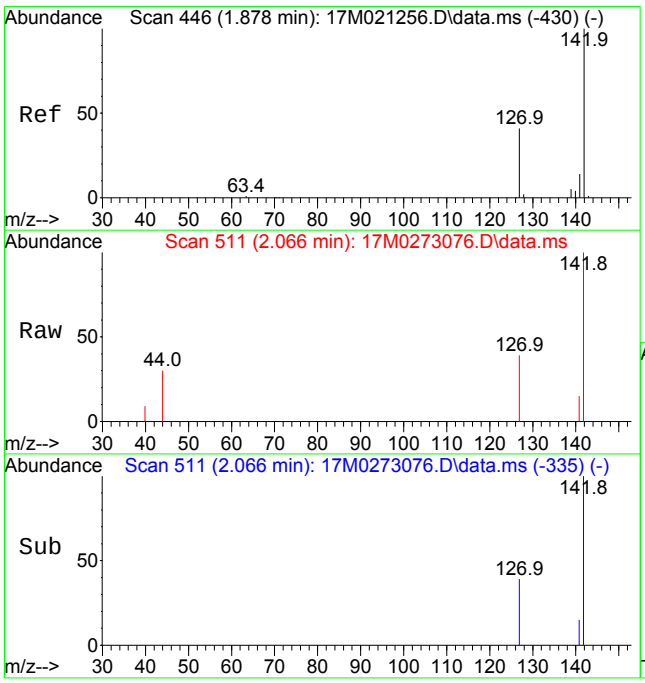
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273076.D Vial: 12
Acq On : 27 Apr 2017 15:47 Operator: ADC
Sample : L17041075-41 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:20 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



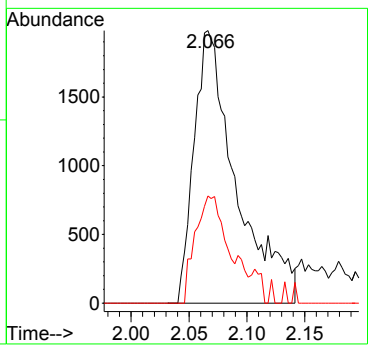
826VMS.M Fri Apr 28 09:46:21 2017 Page: 2

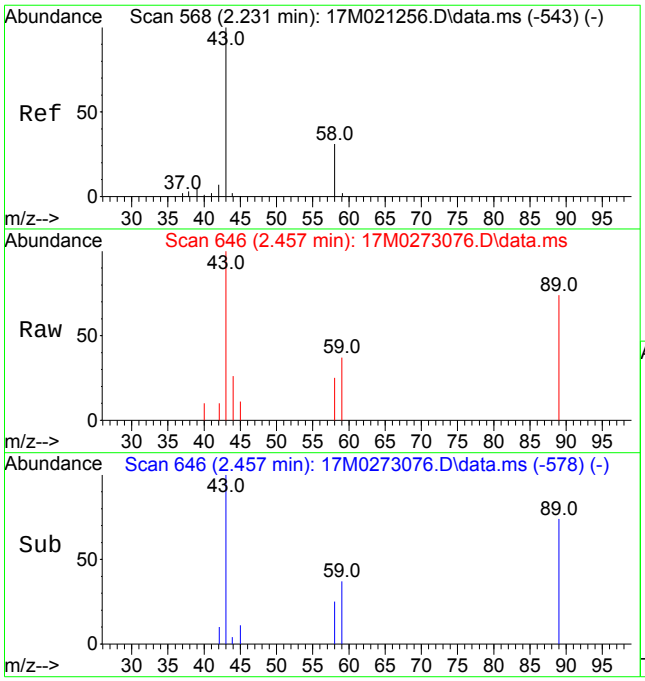


#13
Iodomethane
Concen: 2.8465 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion:142 Resp: 5031

Ion	Ratio	Lower	Upper
142	100		
127	35.2	32.2	48.2

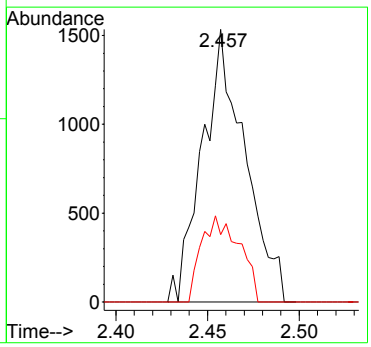


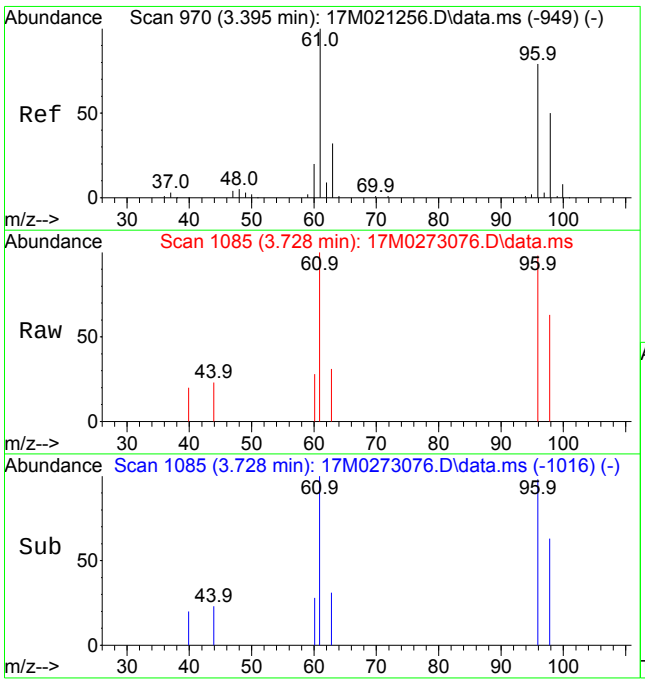


#16
Acetone
Concen: 3.2122 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion: 43 Resp: 2477

Ion	Ratio	Lower	Upper
43	100		
58	28.0	19.4	45.2

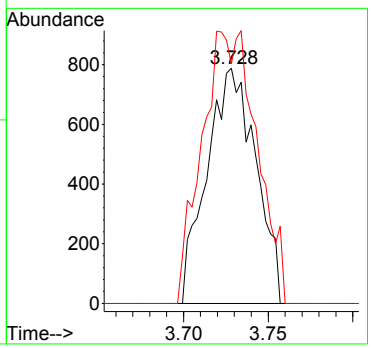


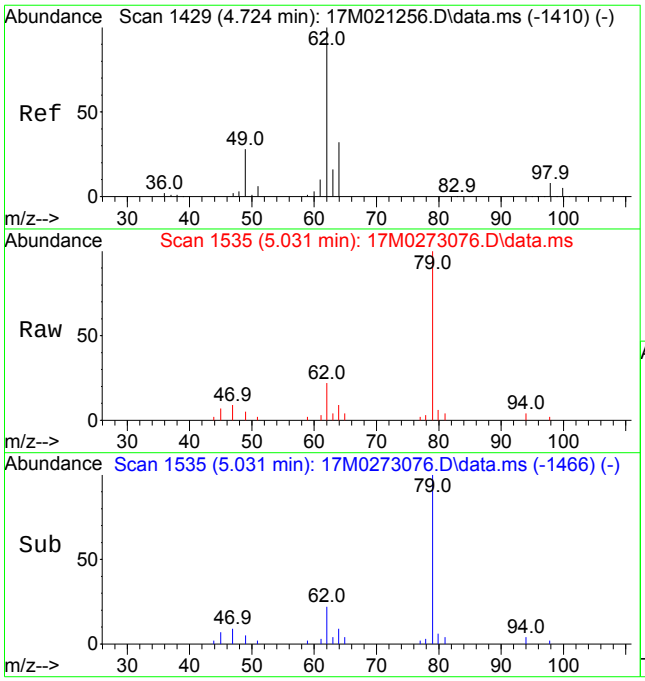


#23
cis-1,2-Dichloroethene
Concen: 0.3476 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion: 96 Resp: 1587

Ion	Ratio	Lower	Upper
96	100		
61	130.0	98.1	147.1

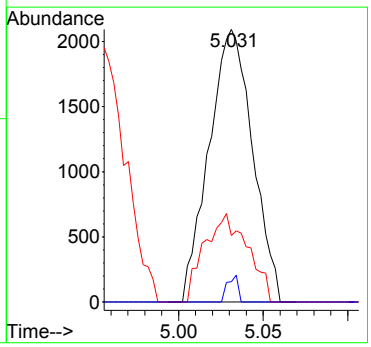


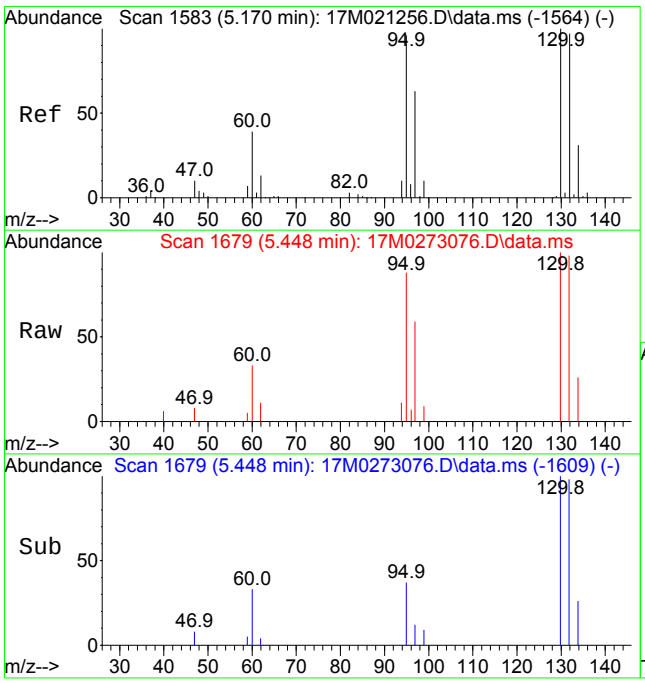


#35
1,2-Dichloroethane
Concen: 0.7374 ug/L
RT: 5.031 min Scan# 1535
Delta R.T. 0.000 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion: 62 Resp: 3751

Ion	Ratio	Lower	Upper
62	100		
49	31.9	15.9	37.1
98	0.0	5.2	12.0#

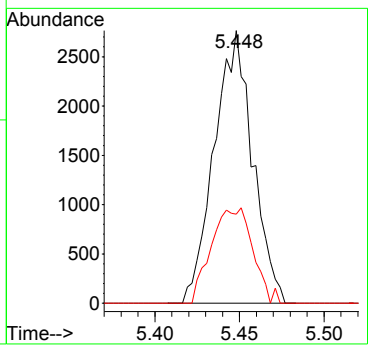


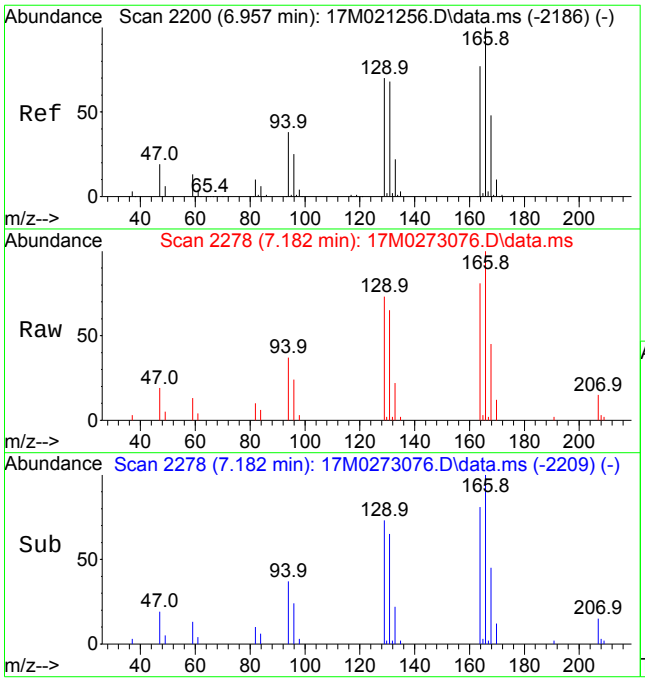


#37
Trichloroethene
Concen: 0.8857 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion:130 Resp: 4346

Ion	Ratio	Lower	Upper
130	100		
60	37.8	22.9	53.3

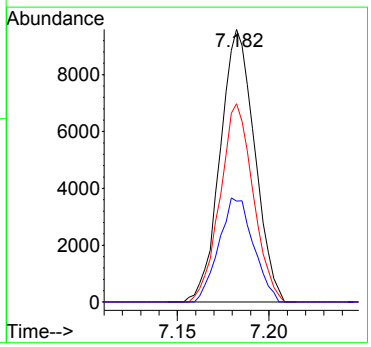




#49
Tetrachloroethene
Concen: 2.5354 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273076.D
Acq: 27 Apr 2017 15:47

Tgt Ion:166 Resp: 12542

Ion	Ratio	Lower	Upper
166	100		
129	69.9	56.2	84.4
94	38.3	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273079.D Vial: 15
Acq On : 27 Apr 2017 16:47 Operator: ADC
Sample : L17041075-42 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:29 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

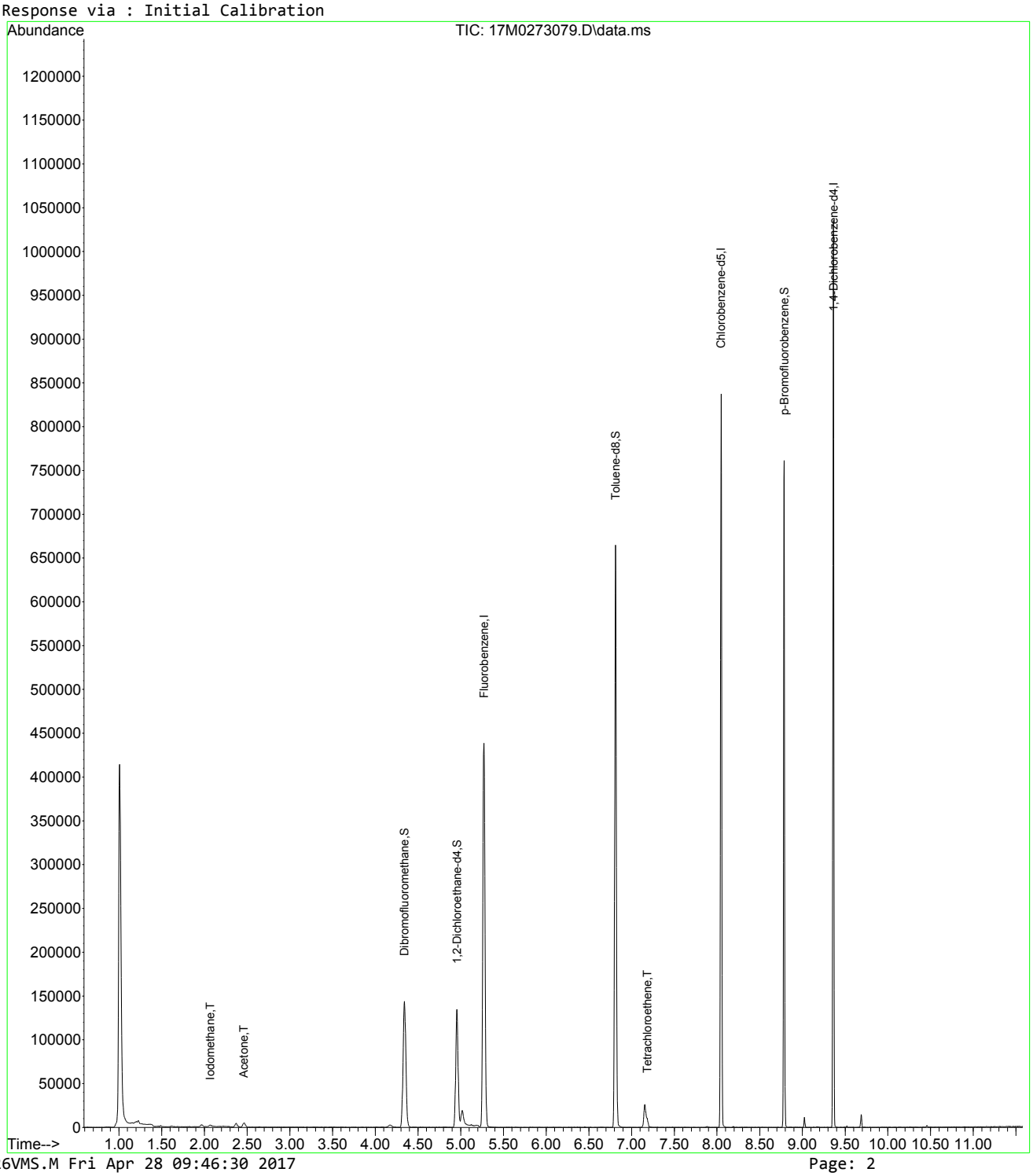
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	384154	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	280211	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	138511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	102902	24.8029	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.212%			
34) 1,2-Dichloroethane-d4	4.956	65	98685	25.3772	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.509%			
47) Toluene-d8	6.812	98	354588	25.3561	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.424%			
66) p-Bromofluorobenzene	8.786	95	122836	26.4863	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.945%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	3204	2.5387	ug/L #	85
16) Acetone	2.460	43	3092	4.0031	ug/L	93
49) Tetrachloroethene	7.185	166	2057	0.4105	ug/L	94

(#) = qualifier out of range (m) = manual integration (+) = signals summed

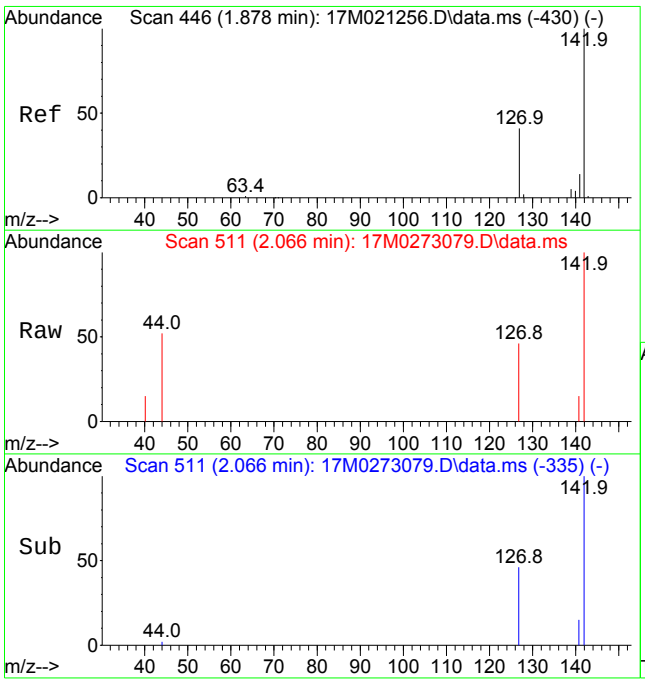
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273079.D Vial: 15
Acq On : 27 Apr 2017 16:47 Operator: ADC
Sample : L17041075-42 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:29 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



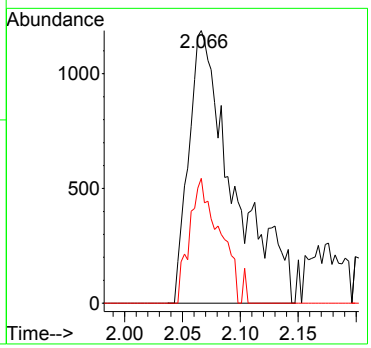
826VMS.M Fri Apr 28 09:46:30 2017 Page: 2

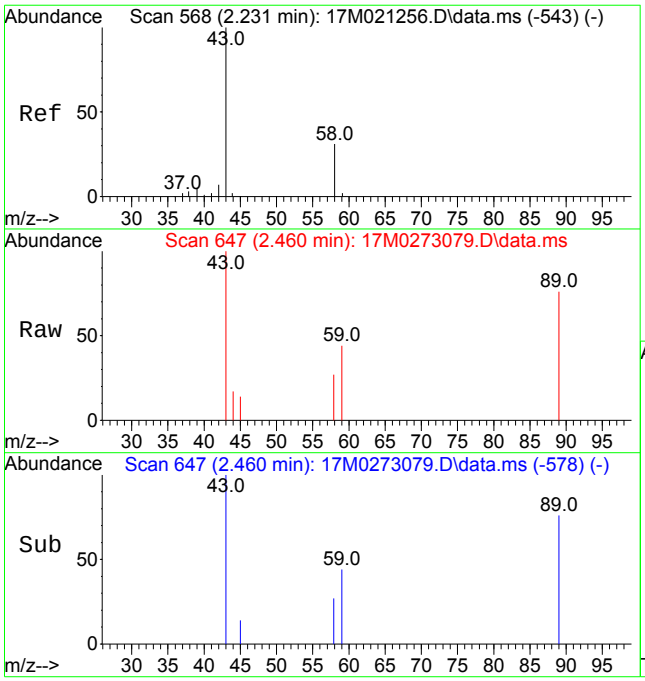


#13
Iodomethane
Concen: 2.5387 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273079.D
Acq: 27 Apr 2017 16:47

Tgt Ion:142 Resp: 3204

Ion	Ratio	Lower	Upper
142	100		
127	31.1	32.2	48.2#

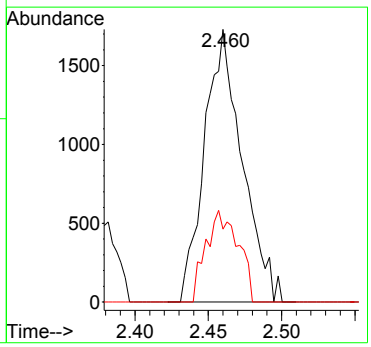


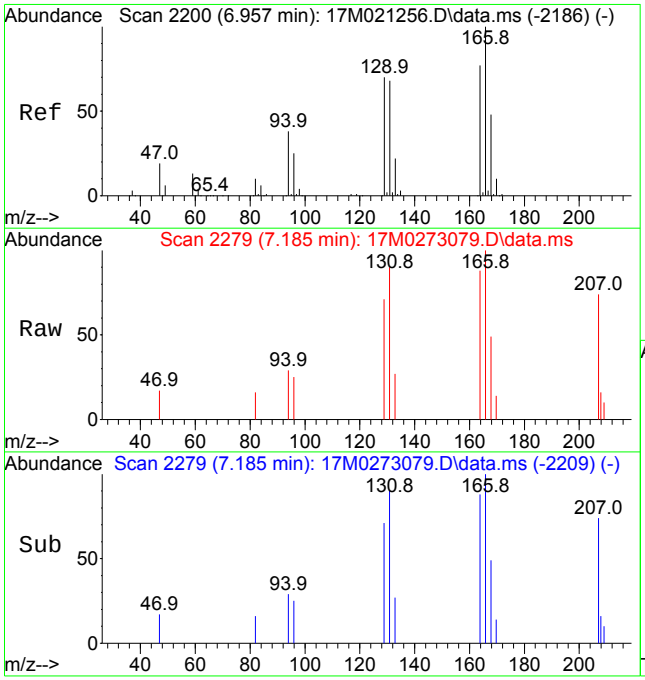


#16
Acetone
Concen: 4.0031 ug/L
RT: 2.460 min Scan# 647
Delta R.T. -0.000 min
Lab File: 17M0273079.D
Acq: 27 Apr 2017 16:47

Tgt Ion: 43 Resp: 3092

Ion	Ratio	Lower	Upper
43	100		
58	28.6	19.4	45.2

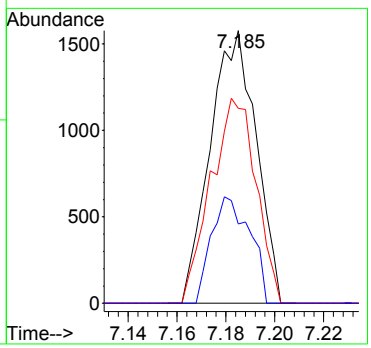




#49
Tetrachloroethene
Concen: 0.4105 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273079.D
Acq: 27 Apr 2017 16:47

Tgt Ion:166 Resp: 2057

Ion	Ratio	Lower	Upper
166	100		
129	74.2	56.2	84.4
94	32.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273075.D Vial: 11
Acq On : 27 Apr 2017 15:28 Operator: ADC
Sample : L17041075-43 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:17 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

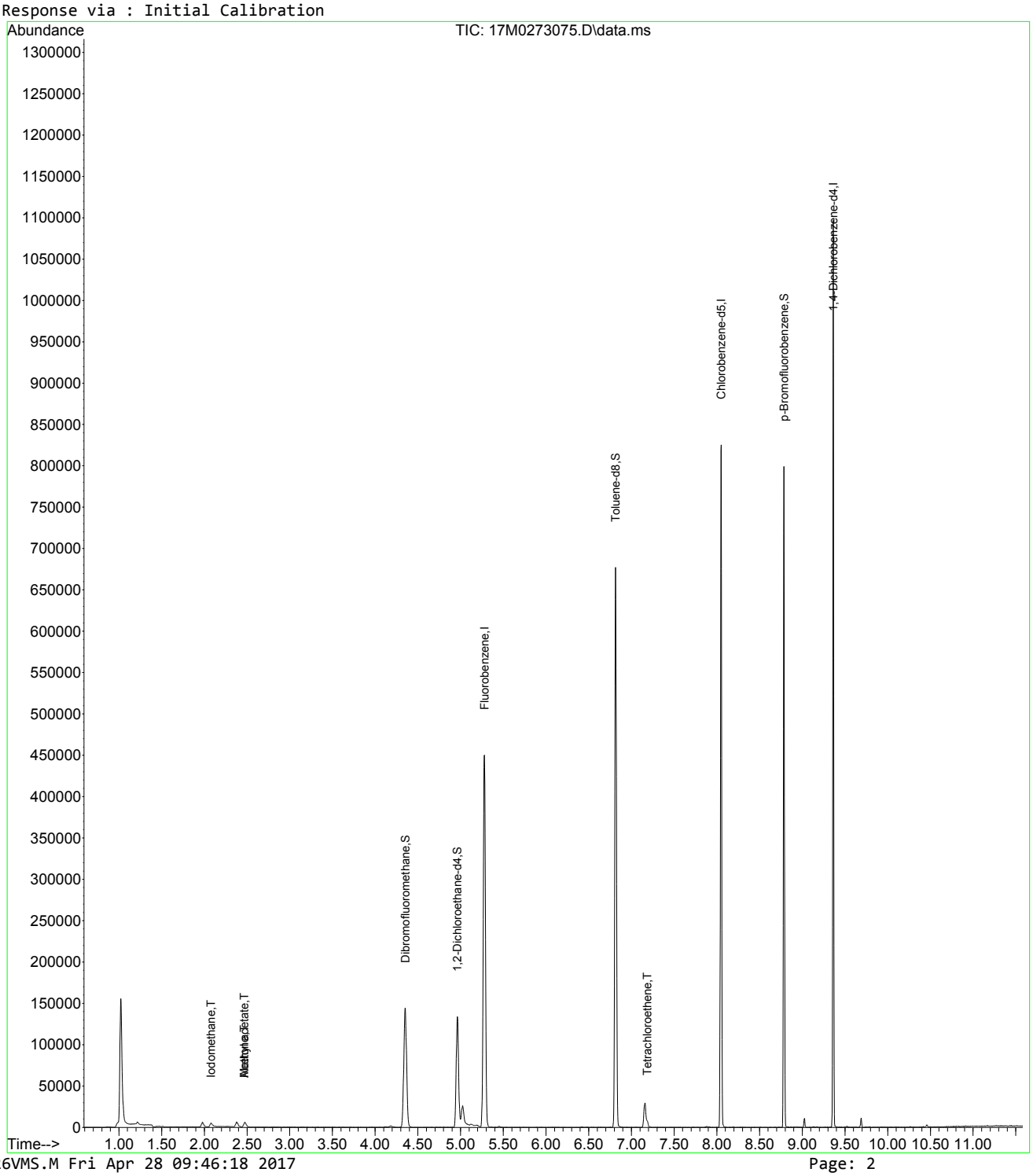
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.280	96	389875	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	288807	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	143484	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.354	111	103241	24.5195	ug/L	0.0145
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.078%			
34) 1,2-Dichloroethane-d4	4.962	65	100393	25.4375	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.750%			
47) Toluene-d8	6.815	98	363011	25.1858	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.743%			
66) p-Bromofluorobenzene	8.786	95	125174	26.0549	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.220%			
Target Compounds						Qvalue
13) Iodomethane	2.078	142	6808	3.1265	ug/L	93
16) Acetone	2.466	43	3923	5.0044	ug/L	96
18) Methyl acetate	2.466	43	3923	1.9089	ug/L #	34
49) Tetrachloroethene	7.185	166	1438	0.2784	ug/L	96

(#) = qualifier out of range (m) = manual integration (+) = signals summed

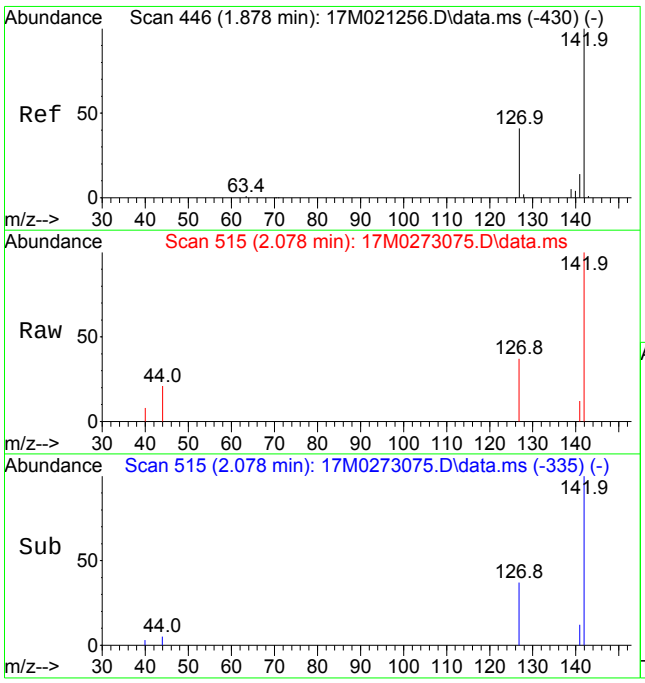
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273075.D Vial: 11
Acq On : 27 Apr 2017 15:28 Operator: ADC
Sample : L17041075-43 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:17 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



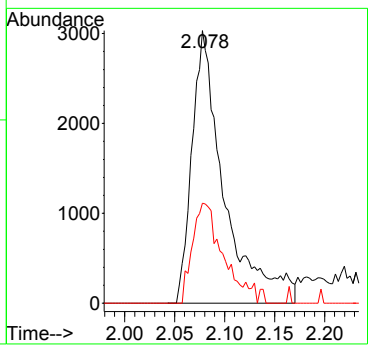
826VMS.M Fri Apr 28 09:46:18 2017 Page: 2

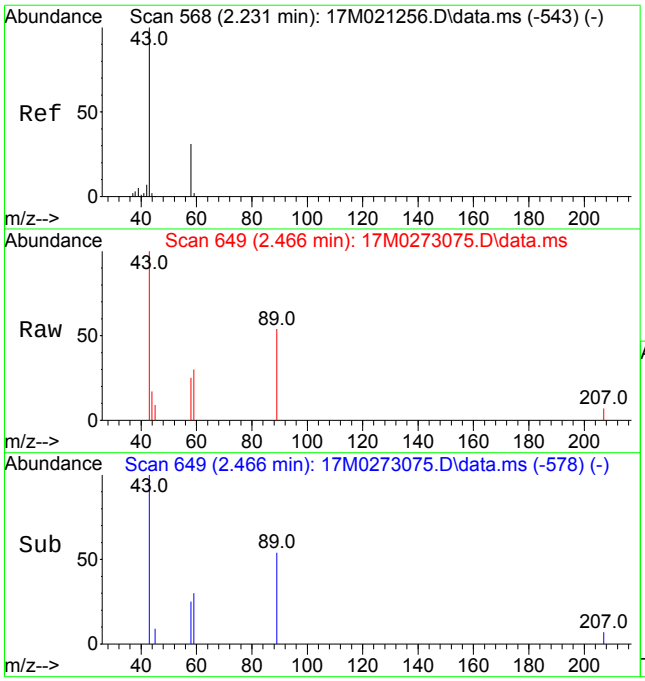


#13
Iodomethane
Concen: 3.1265 ug/L
RT: 2.078 min Scan# 515
Delta R.T. 0.020 min
Lab File: 17M0273075.D
Acq: 27 Apr 2017 15:28

Tgt Ion:142 Resp: 6808

Ion	Ratio	Lower	Upper
142	100		
127	35.8	32.2	48.2

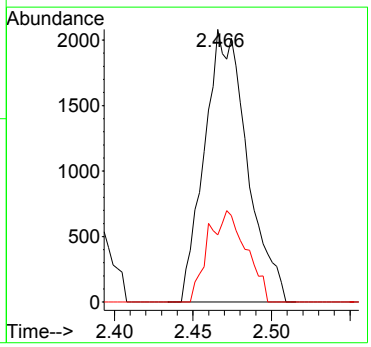


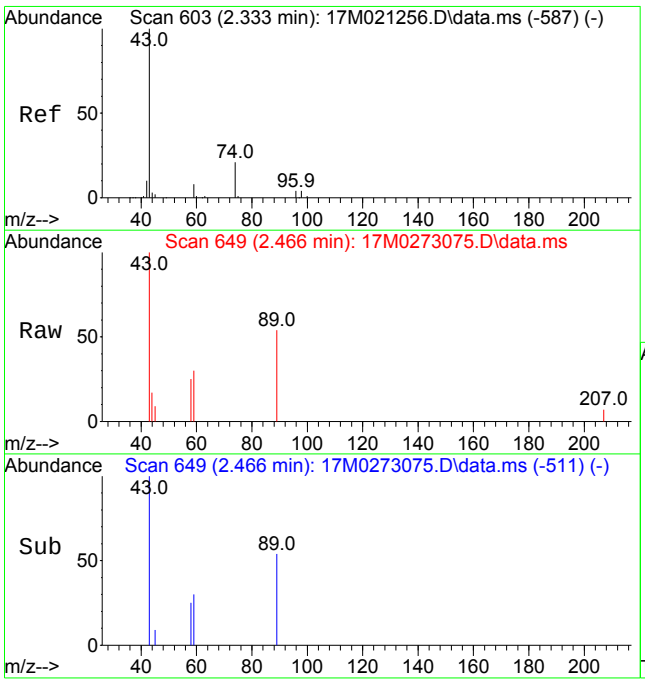


#16
Acetone
Concen: 5.0044 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273075.D
Acq: 27 Apr 2017 15:28

Tgt Ion: 43 Resp: 3923

Ion	Ratio	Lower	Upper
43	100		
58	30.0	19.4	45.2

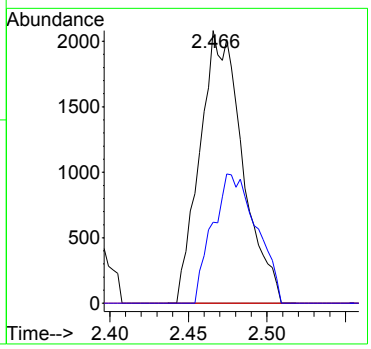


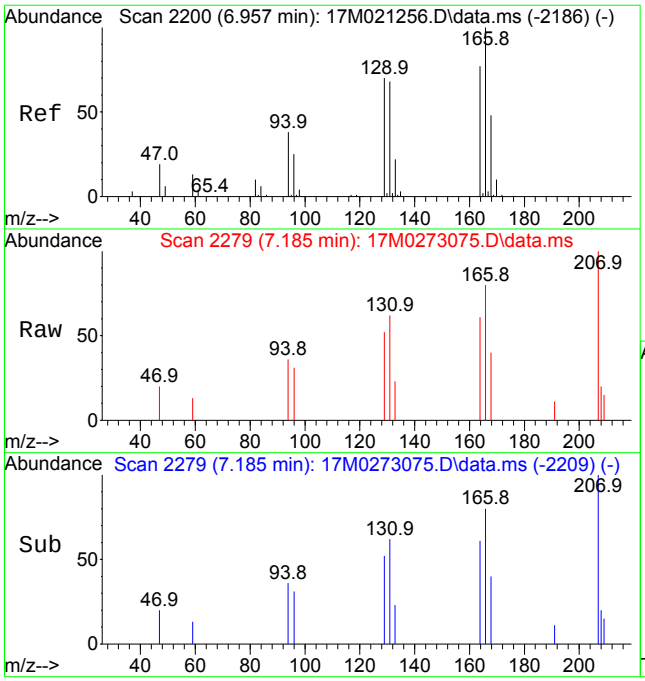


#18
Methyl acetate
Concen: 1.9089 ug/L
RT: 2.466 min Scan# 649
Delta R.T. -0.101 min
Lab File: 17M0273075.D
Acq: 27 Apr 2017 15:28

Tgt Ion: 43 Resp: 3923

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	49.1	7.6	11.4#

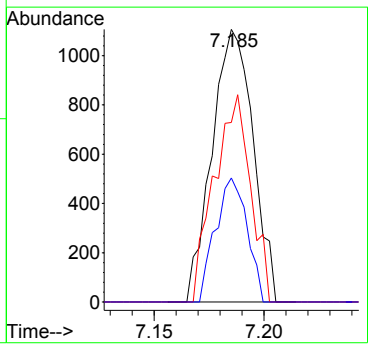




#49
Tetrachloroethene
Concen: 0.2784 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273075.D
Acq: 27 Apr 2017 15:28

Tgt Ion:166 Resp: 1438

Ion	Ratio	Lower	Upper
166	100		
129	67.1	56.2	84.4
94	35.0	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273077.D Vial: 13
Acq On : 27 Apr 2017 16:07 Operator: ADC
Sample : L17041075-44 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:23 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

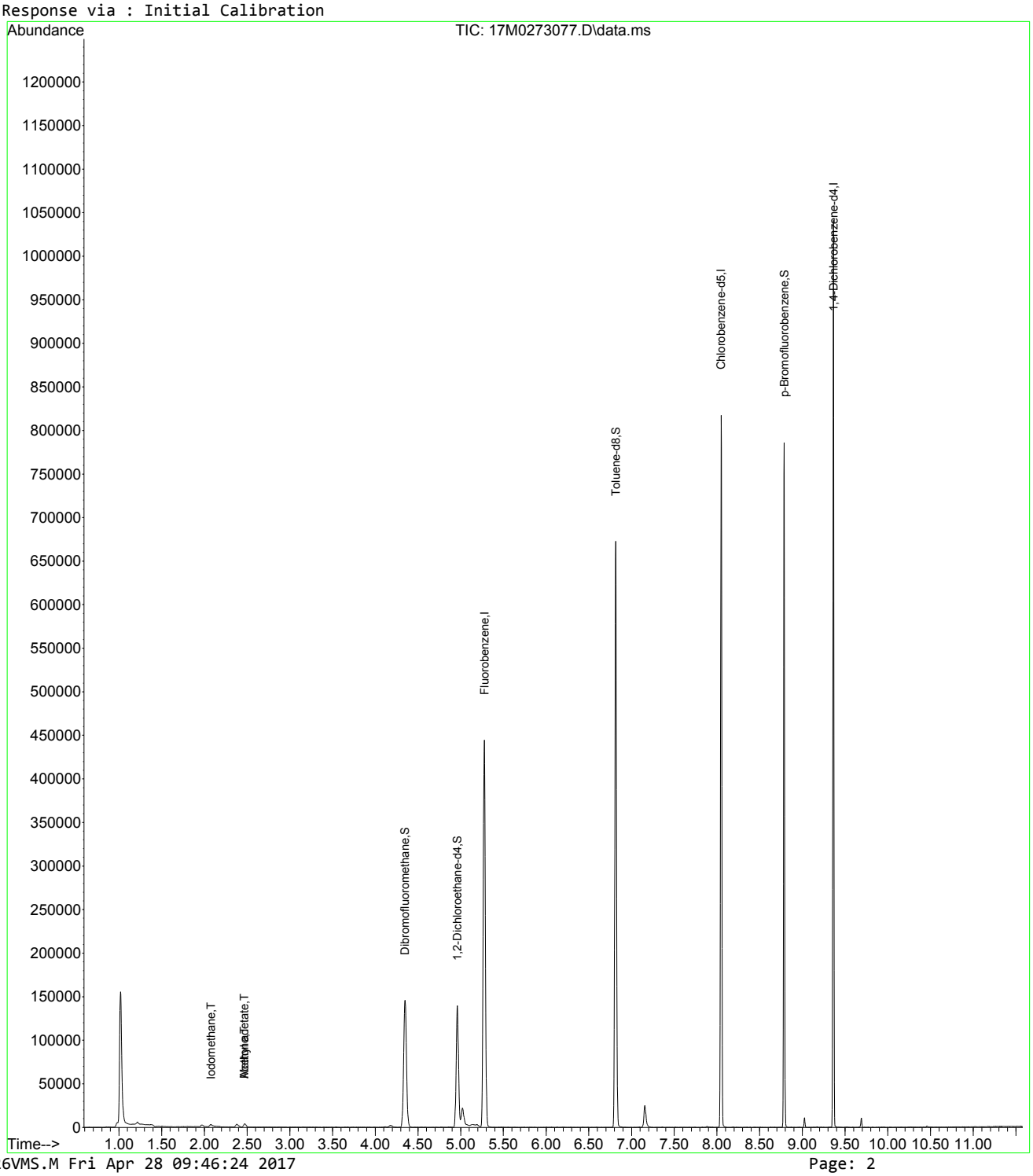
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	377608	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	278646	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	139062	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	104437	25.6093	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.437%			
34) 1,2-Dichloroethane-d4	4.962	65	101000	26.4227	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.691%			
47) Toluene-d8	6.815	98	367483	26.4258	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.703%			
66) p-Bromofluorobenzene	8.787	95	125502	26.9539	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.816%			
Target Compounds						Qvalue
13) Iodomethane	2.075	142	3732	2.6381	ug/L	100
16) Acetone	2.466	43	2351	3.0965	ug/L	98
18) Methyl acetate	2.466	43	2351	1.1811	ug/L #	28

(#) = qualifier out of range (m) = manual integration (+) = signals summed

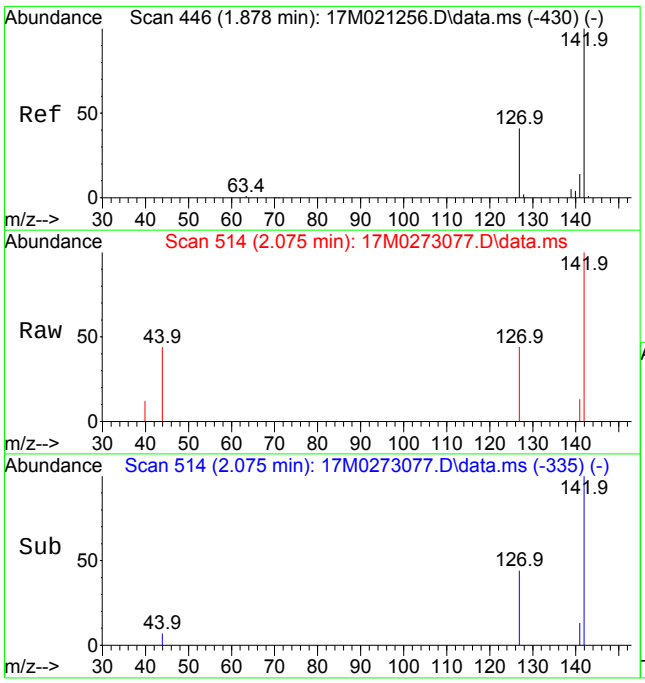
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273077.D Vial: 13
Acq On : 27 Apr 2017 16:07 Operator: ADC
Sample : L17041075-44 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:23 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



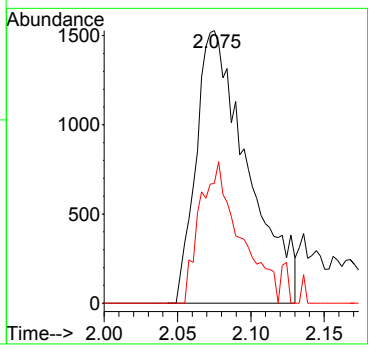
826VMS.M Fri Apr 28 09:46:24 2017 Page: 2

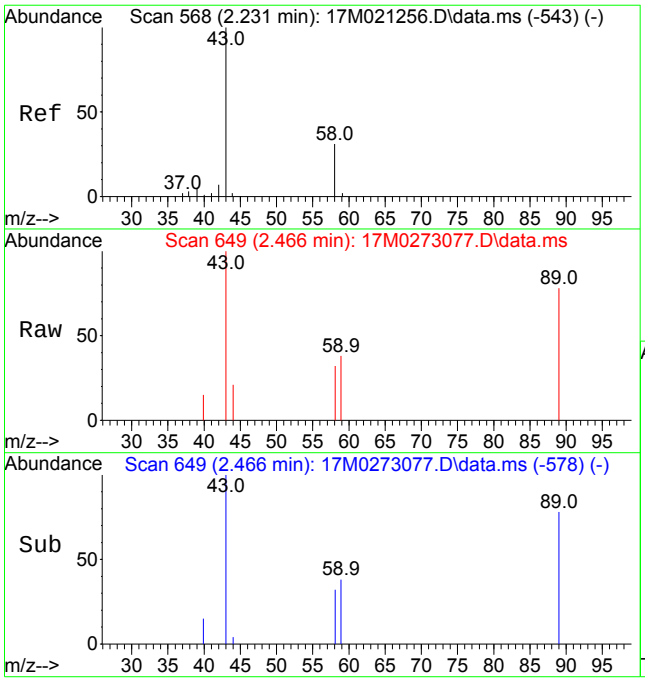


#13
Iodomethane
Concen: 2.6381 ug/L
RT: 2.075 min Scan# 514
Delta R.T. 0.017 min
Lab File: 17M0273077.D
Acq: 27 Apr 2017 16:07

Tgt Ion:142 Resp: 3732

Ion	Ratio	Lower	Upper
142	100		
127	40.4	32.2	48.2

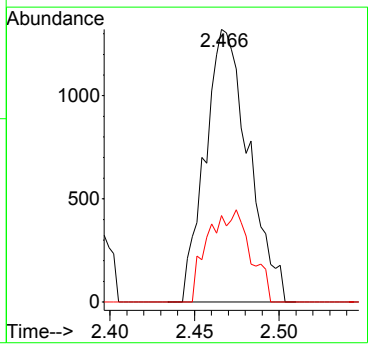


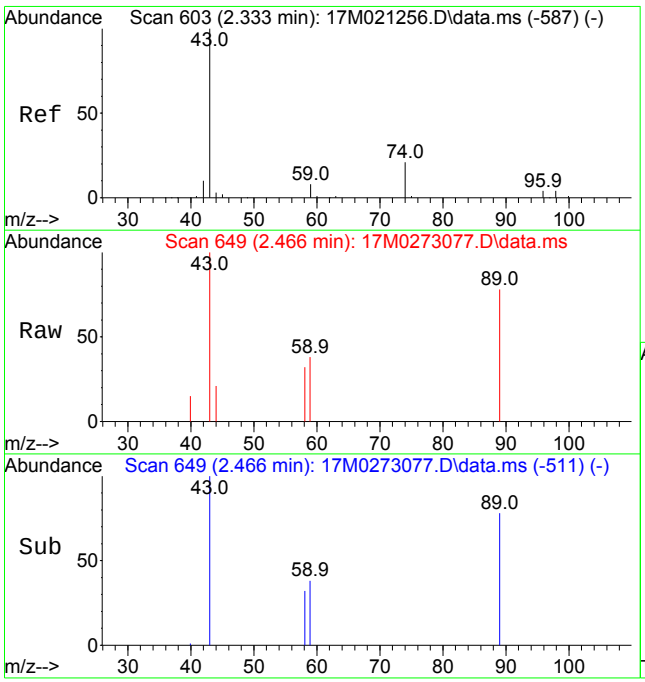


#16
Acetone
Concen: 3.0965 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273077.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 43 Resp: 2351

Ion	Ratio	Lower	Upper
43	100		
58	33.2	19.4	45.2

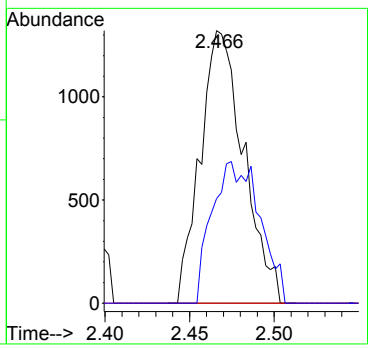




#18
Methyl acetate
Concen: 1.1811 ug/L
RT: 2.466 min Scan# 649
Delta R.T. -0.101 min
Lab File: 17M0273077.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 43 Resp: 2351

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	57.1	7.6	11.4#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273078.D Vial: 14
Acq On : 27 Apr 2017 16:27 Operator: ADC
Sample : L17041075-45 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

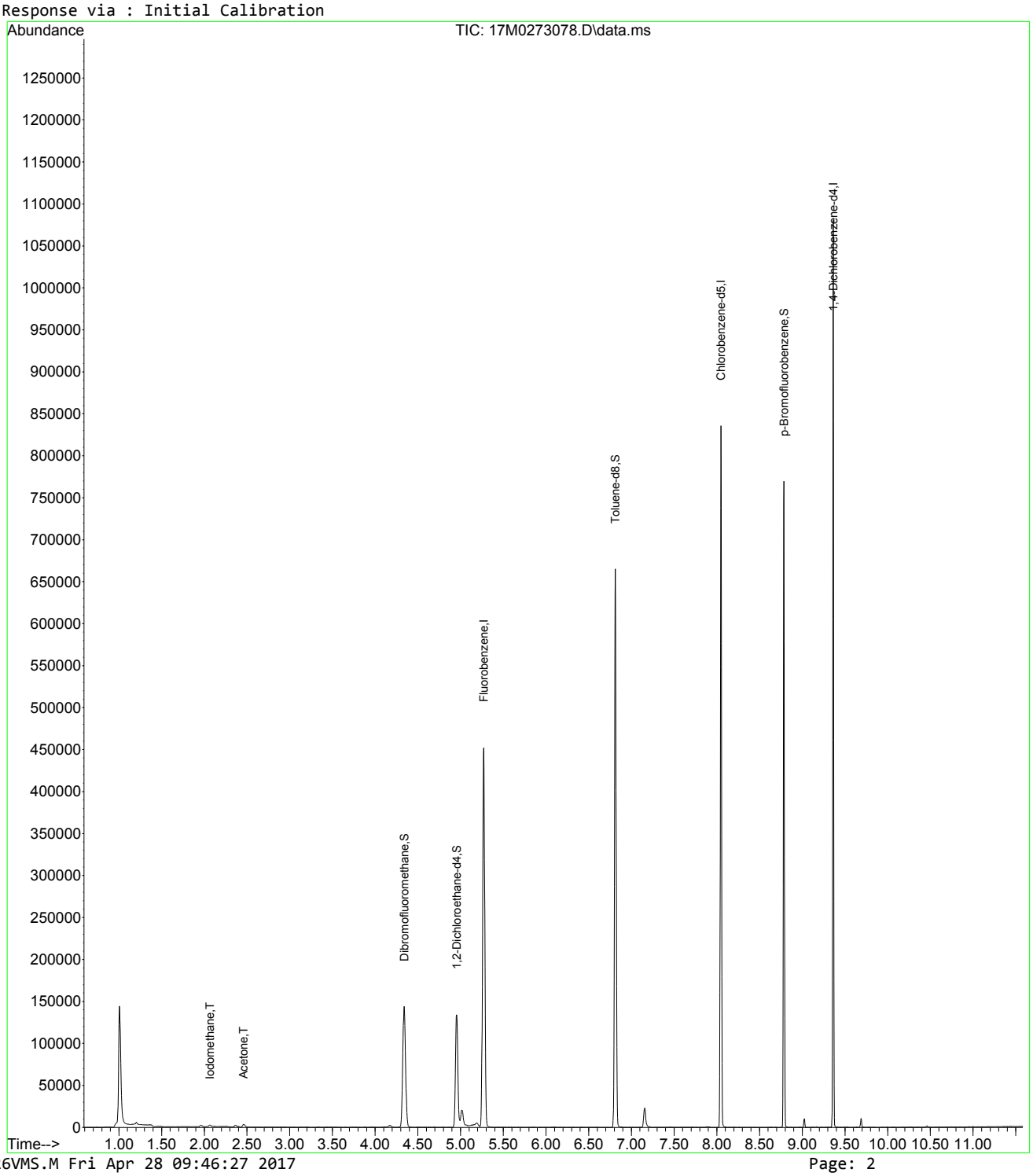
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	392286	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	287230	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	141161	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	102788	24.2619	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.048%			
34) 1,2-Dichloroethane-d4	4.953	65	98667	24.8466	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.386%			
47) Toluene-d8	6.812	98	357208	24.9192	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.677%			
66) p-Bromofluorobenzene	8.786	95	120678	25.5325	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.130%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	3019	2.4971	ug/L	91
16) Acetone	2.457	43	1505	1.9081	ug/L	92

(#) = qualifier out of range (m) = manual integration (+) = signals summed

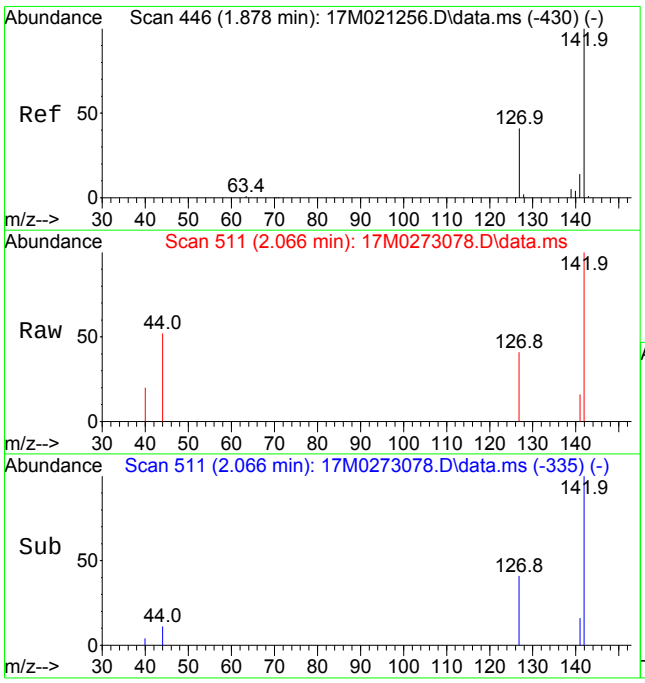
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273078.D Vial: 14
Acq On : 27 Apr 2017 16:27 Operator: ADC
Sample : L17041075-45 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



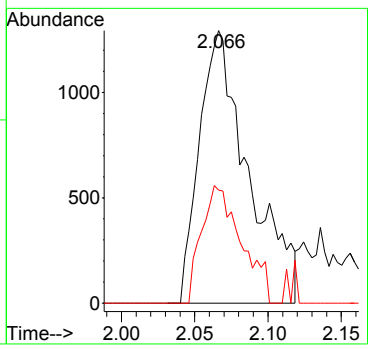
826VMS.M Fri Apr 28 09:46:27 2017 Page: 2

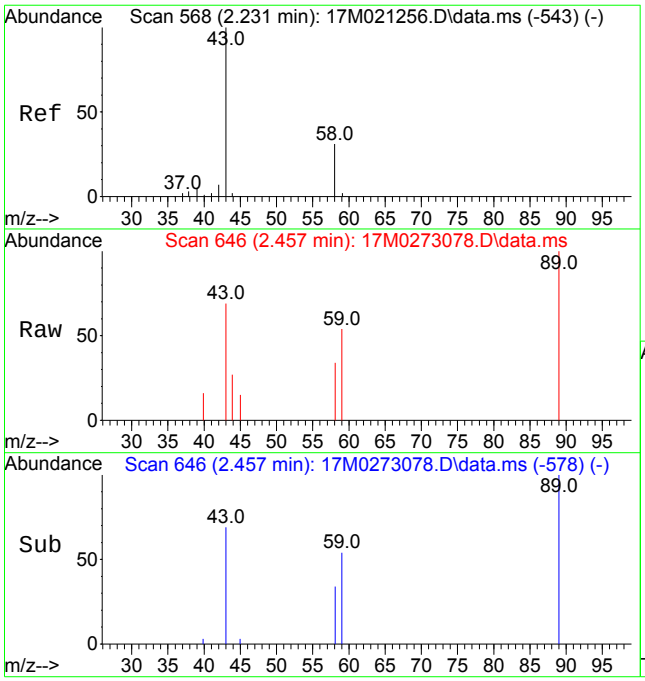


#13
Iodomethane
Concen: 2.4971 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273078.D
Acq: 27 Apr 2017 16:27

Tgt Ion:142 Resp: 3019

Ion	Ratio	Lower	Upper
142	100		
127	34.9	32.2	48.2

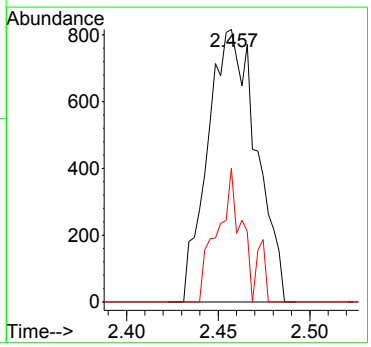




#16
Acetone
Concen: 1.9081 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273078.D
Acq: 27 Apr 2017 16:27

Tgt Ion: 43 Resp: 1505

Ion	Ratio	Lower	Upper
43	100		
58	27.9	19.4	45.2



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	423656	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311145	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.956	65	238	0.0555	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.222%#		
47) Toluene-d8	6.815	98	3708	0.2388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.955%#		
66) p-Bromofluorobenzene	8.784	95	1270	0.2423	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.969%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	1386	0.2755	ug/L #	71
3) Chloromethane	1.215	50	1742	0.3538	ug/L	88
4) Vinyl Chloride	1.267	62	1689	0.3098	ug/L	88
5) 1,3-Butadiene	1.273	54	1144	0.3417	ug/L	97
6) Bromomethane	1.458	94	1616	0.3986	ug/L	94
7) Chloroethane	1.539	64	848	0.3278	ug/L #	77
8) Trichlorofluoromethane	1.626	101	2195	0.3138	ug/L	96
10) 1,1-Dichloroethene	1.962	61	2150	0.3285	ug/L	100
11) Carbon Disulfide	1.977	76	4627	0.3294	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	1335	0.3200	ug/L	97
13) Iodomethane	2.069	142	665	2.1023	ug/L	88
15) Methylene Chloride	2.405	84	1853	0.3732	ug/L	98
16) Acetone	2.463	43	744	0.8734	ug/L #	42
17) trans-1,2-Dichloroethene	2.544	96	1433	0.3216	ug/L	97
18) Methyl acetate	2.564	43	325	0.1455	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	3236	0.2862	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	2399	0.2998	ug/L #	88
23) cis-1,2-Dichloroethene	3.731	96	1523	0.3020	ug/L	99
24) 2,2-Dichloropropane	3.864	77	1041	0.4368	ug/L #	81
25) Cyclohexane	3.960	56	2117	0.3110	ug/L	93
26) Bromochloromethane	3.992	130	693	0.2132	ug/L	93
27) Chloroform	4.113	83	2418	0.2898	ug/L	97
28) Carbon Tetrachloride	4.252	117	1818	0.2755	ug/L #	92
30) 1,1,1-Trichloroethane	4.339	97	2183	0.2976	ug/L	95
31) 1,1-Dichloropropene	4.499	75	1767	0.3067	ug/L	94
32) 2-Butanone	4.542	43	223	0.1756	ug/L #	37
33) Benzene	4.803	78	5779	0.3202	ug/L	96
35) 1,2-Dichloroethane	5.028	62	1675	0.2981	ug/L #	83
36) Methylcyclohexane	5.422	83	2260	0.3169	ug/L	99
37) Trichloroethene	5.445	130	1637	0.3020	ug/L	99
38) Dibromomethane	5.862	93	745	0.2695	ug/L	97
39) 1,2-Dichloropropane	5.961	63	1450	0.3064	ug/L	87
40) Bromodichloromethane	6.050	83	1785	0.2826	ug/L	93
43) cis-1,3-Dichloropropene	6.647	75	1935	0.2719	ug/L	97
44) 4-Methyl-2-Pentanone	7.229	58	288	0.2449	ug/L #	23
45) trans-1,3-Dichloropropene	7.240	75	1352	0.2234	ug/L #	91
48) Toluene	6.858	91	6302	0.3231	ug/L	100
49) Tetrachloroethene	7.185	166	1930	0.3469	ug/L	91
50) 1,1,2-Trichloroethane	7.371	97	1139	0.3012	ug/L	94
51) Dibromochloromethane	7.504	129	1421	0.2753	ug/L	95
52) 1,3-Dichloropropane	7.585	76	1813	0.3017	ug/L	98
53) 1,2-Dibromoethane	7.672	107	1035	0.2672	ug/L	97
54) 2-Hexanone	7.889	43	602	0.3032	ug/L	97
55) Chlorobenzene	8.057	112	4294	0.3281	ug/L #	18
56) 1-Chlorohexane	8.068	69	297	0.2811	ug/L #	1
57) Ethylbenzene	8.095	106	2178	0.3197	ug/L	88

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

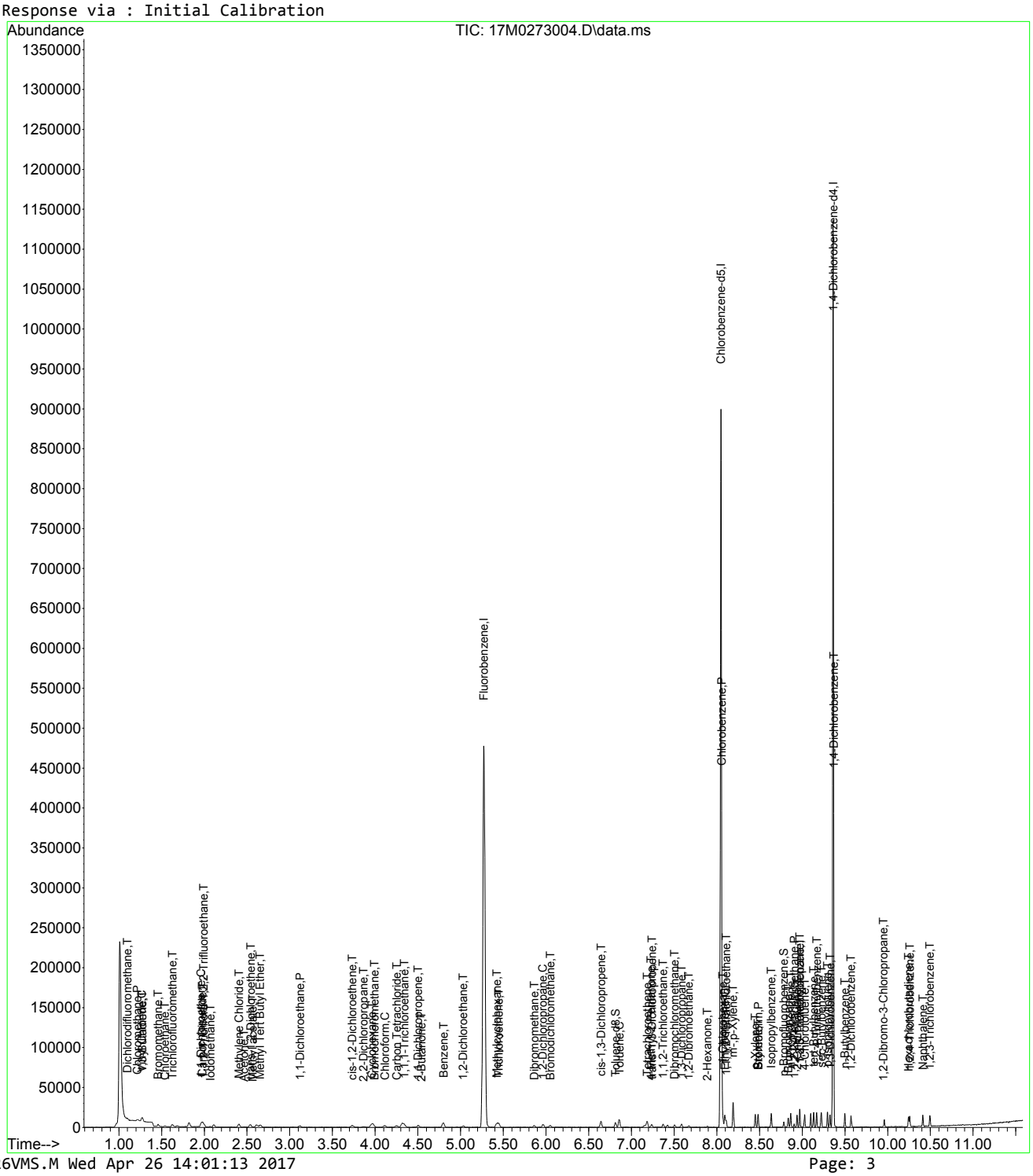
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
58) 1,1,1,2-Tetrachloroethane	8.109	131	1430	0.2807	ug/L	84
59) m-,p-Xylene	8.190	106	5242	0.6375	ug/L	99
60) o-Xylene	8.451	106	2600	0.3209	ug/L	98
61) Styrene	8.483	104	3767	0.2906	ug/L	99
62) Bromoform	8.485	173	950	0.2617	ug/L	94
63) Isopropylbenzene	8.636	105	6492	0.3096	ug/L	95
65) 1,3,5-Trimethylbenzene	8.972	105	5612	0.3216	ug/L	97
67) Bromobenzene	8.836	156	1948	0.3164	ug/L	95
68) n-Propylbenzene	8.865	91	7312	0.3164	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	1172	0.2784	ug/L	97
70) 2-Chlorotoluene	8.940	91	4467	0.3131	ug/L	97
71) 1,2,3-Trichloropropane	8.972	110	337	0.2708	ug/L	78
73) 1,2,4-Trimethylbenzene	9.169	105	5331	0.3030	ug/L	99
74) 4-Chlorotoluene	9.030	91	4520	0.3174	ug/L	99
75) tert-Butylbenzene	9.134	134	1169	0.3352	ug/L	95
76) sec-Butylbenzene	9.224	105	6865	0.3194	ug/L	99
77) p-Isopropyltoluene	9.296	119	5855	0.3195	ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	3604	0.3358	ug/L	97
79) 1,4-Dichlorobenzene	9.368	146	3693	0.3408	ug/L	89
80) n-Butylbenzene	9.499	91	5016	0.3243	ug/L	99
81) 1,2-Dichlorobenzene	9.571	146	3159	0.3020	ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	194	0.2512	ug/L	85
83) Hexachlorobutadiene	10.243	225	1532	0.3474	ug/L	94
84) 1,2,4-Trichlorobenzene	10.260	180	2401	0.3090	ug/L	96
85) Naphthalene	10.411	128	4948	0.3265	ug/L	95
86) 1,2,3-Trichlorobenzene	10.495	180	2415	0.3200	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:13 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.275	0.0	0	0.000
3	P	Chloromethane	-1.000	0.354	0.0	0	0.000
4	C	Vinyl Chloride	-1.000	0.310	0.0	0	0.000
5	T	1,3-Butadiene	-1.000	0.342	0.0	0	0.000
6	T	Bromomethane	-1.000	0.399	0.0	0	0.000
7	T	Chloroethane	-1.000	0.328	0.0	0	0.011
8	T	Trichlorofluoromethane	-1.000	0.314	0.0	0	0.011
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	-1.000	0.329	0.0	0	0.000
11	T	Carbon Disulfide	-1.000	0.329	0.0	0	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.000	0.320	0.0	0	0.000
13	T	Iodomethane	-1.000	2.102	0.0	0	0.011
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	-1.000	0.373	0.0	0	0.000
16	T	Acetone	-1.000	0.873	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	-1.000	0.322	0.0	0	0.012
18	T	Methyl acetate	-1.000	0.146	0.0	0	0.000
19	T	Methyl Tert Butyl Ether	-1.000	0.286	0.0	0	0.000
20	P	1,1-Dichloroethane	-1.000	0.300	0.0	0	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	-1.000	0.302	0.0	0	0.000
24	T	2,2-Dichloropropane	-1.000	0.437	0.0	0	0.000
25	T	Cyclohexane	-1.000	0.311	0.0	0	0.000
26	T	Bromochloromethane	-1.000	0.213	0.0	0	0.018
27	C	Chloroform	0.300	0.290	3.3#	100	0.000
28	T	Carbon Tetrachloride	-1.000	0.276	0.0	0	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	-1.000	0.298	0.0	0	0.000
31	T	1,1-Dichloropropene	-1.000	0.307	0.0	0	0.000
32	T	2-Butanone	-1.000	0.176	0.0	0	0.018
33	T	Benzene	-1.000	0.320	0.0	0	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.055	0.0	0	0.000
35	T	1,2-Dichloroethane	-1.000	0.298	0.0	0	0.000
36	T	Methylcyclohexane	0.300	0.317	-5.7	100	0.000
37	T	Trichloroethene	-1.000	0.302	0.0	0	0.000
38	T	Dibromomethane	-1.000	0.270	0.0	0	0.000
39	C	1,2-Dichloropropane	-1.000	0.306	0.0	0	0.000
40	T	Bromodichloromethane	-1.000	0.283	0.0	0	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.098	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	-1.000	0.272	0.0	0	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.245	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.223	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.239	0.0	0	0.000
48	C	Toluene	-1.000	0.323	0.0	0	0.000
49	T	Tetrachloroethene	-1.000	0.347	0.0	0	0.000
50	T	1,1,2-Trichloroethane	-1.000	0.301	0.0	0	0.000
51	T	Dibromochloromethane	-1.000	0.275	0.0	0	0.000
52	T	1,3-Dichloropropane	-1.000	0.302	0.0	0	0.000
53	T	1,2-Dibromoethane	-1.000	0.267	0.0	0	0.000
54	T	2-Hexanone	-1.000	0.303	0.0	0	0.000
55	P	Chlorobenzene	-1.000	0.328	0.0	0	0.000
56	T	1-Chlorohexane	-1.000	0.281	0.0	0	0.000
57	C	Ethylbenzene	-1.000	0.320	0.0	0	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	-1.000	0.281	0.0	0	0.000
59	T	m-,p-Xylene	-1.000	0.637	0.0	0	0.000
60	T	o-Xylene	-1.000	0.321	0.0	0	0.000
61	T	Styrene	-1.000	0.291	0.0	0	0.000
62	P	Bromoform	-1.000	0.262	0.0	0	0.000
63	T	Isopropylbenzene	-1.000	0.310	0.0	0	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	-1.000	0.322	0.0	0	0.000
66	S	p-Bromofluorobenzene	-1.000	0.242	0.0	0	0.000
67	T	Bromobenzene	0.300	0.316	-5.3	100	0.000
68	T	n-Propylbenzene	-1.000	0.316	0.0	0	0.000
69	P	1,1,2,2-Tetrachloroethane	-1.000	0.278	0.0	0	0.000
70	T	2-Chlorotoluene	-1.000	0.313	0.0	0	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.271	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.110	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	-1.000	0.303	0.0	0	0.000
74	T	4-Chlorotoluene	-1.000	0.317	0.0	0	0.000
75	T	tert-Butylbenzene	-1.000	0.335	0.0	0	0.000
76	T	sec-Butylbenzene	-1.000	0.319	0.0	0	0.000
77	T	p-Isopropyltoluene	-1.000	0.320	0.0	0	0.000
78	T	1,3-Dichlorobenzene	-1.000	0.336	0.0	0	0.000
79	T	1,4-Dichlorobenzene	0.300	0.341	-13.7	100	0.000
80	T	n-Butylbenzene	-1.000	0.324	0.0	0	0.000
81	T	1,2-Dichlorobenzene	0.300	0.302	-0.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.251	0.0	0	0.000
83	T	Hexachlorobutadiene	-1.000	0.347	0.0	0	0.000
84	T	1,2,4-Trichlorobenzene	-1.000	0.309	0.0	0	0.000
85	T	Naphthalene	-1.000	0.327	0.0	0	0.000
86	T	1,2,3-Trichlorobenzene	0.300	0.320	-6.7	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	420908	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307739	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151803	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.968	65	216	0.0507	ug/L	0.0145
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.203%#		
47) Toluene-d8	6.818	98	3149	0.2050	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.820%#		
66) p-Bromofluorobenzene	8.786	95	1018	0.2003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.801%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1833	0.3667	ug/L #	71
3) Chloromethane	1.224	50	2073	0.4237	ug/L	97
4) Vinyl Chloride	1.267	62	2251	0.4155	ug/L	86
5) 1,3-Butadiene	1.276	54	1444	0.4341	ug/L	90
6) Bromomethane	1.467	94	2073	0.5147	ug/L	98
7) Chloroethane	1.545	64	1207	0.4697	ug/L	84
8) Trichlorofluoromethane	1.632	101	3013	0.4336	ug/L	98
10) 1,1-Dichloroethene	1.968	61	2718	0.4180	ug/L	98
11) Carbon Disulfide	1.982	76	5991	0.4293	ug/L	97
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	1729	0.4171	ug/L	96
13) Iodomethane	2.066	142	736	2.1139	ug/L #	78
15) Methylene Chloride	2.411	84	2286	0.4634	ug/L	99
16) Acetone	2.463	43	807	0.9536	ug/L #	77
17) trans-1,2-Dichloroethene	2.541	96	1807	0.4082	ug/L	97
18) Methyl acetate	2.573	43	725	0.3268	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	4361	0.3882	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	3143	0.3953	ug/L	96
23) cis-1,2-Dichloroethene	3.731	96	2019	0.4029	ug/L	97
24) 2,2-Dichloropropane	3.870	77	1332	0.4838	ug/L	99
25) Cyclohexane	3.966	56	2634	0.3895	ug/L	99
26) Bromochloromethane	3.992	130	1100	0.3407	ug/L	90
27) Chloroform	4.113	83	3459	0.4172	ug/L	98
28) Carbon Tetrachloride	4.258	117	2434	0.3713	ug/L #	92
30) 1,1,1-Trichloroethane	4.351	97	2888	0.3962	ug/L	97
31) 1,1-Dichloropropene	4.507	75	2338	0.4084	ug/L	94
32) 2-Butanone	4.539	43	444	0.3519	ug/L #	37
33) Benzene	4.797	78	7693	0.4291	ug/L	98
35) 1,2-Dichloroethane	5.037	62	2311	0.4140	ug/L #	86
36) Methylcyclohexane	5.422	83	2910	0.4107	ug/L	98
37) Trichloroethene	5.454	130	2296	0.4264	ug/L	96
38) Dibromomethane	5.862	93	1026	0.3736	ug/L	94
39) 1,2-Dichloropropane	5.966	63	1791	0.3809	ug/L	98
40) Bromodichloromethane	6.053	83	2463	0.3925	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.632	63	400	0.1876	ug/L #	42
43) cis-1,3-Dichloropropene	6.650	75	2541	0.3593	ug/L	94
44) 4-Methyl-2-Pentanone	7.226	58	368	0.3150	ug/L	79
45) trans-1,3-Dichloropropene	7.237	75	1772	0.2948	ug/L	98
48) Toluene	6.858	91	8187	0.4243	ug/L	97
49) Tetrachloroethene	7.185	166	2388	0.4339	ug/L	97
50) 1,1,2-Trichloroethane	7.376	97	1530	0.4091	ug/L	98
51) Dibromochloromethane	7.507	129	2046	0.4008	ug/L	98
52) 1,3-Dichloropropane	7.588	76	2378	0.4001	ug/L	92
53) 1,2-Dibromoethane	7.672	107	1583	0.4132	ug/L	95
54) 2-Hexanone	7.892	43	744	0.3788	ug/L	96
55) Chlorobenzene	8.060	112	5389	0.4163	ug/L #	31
56) 1-Chlorohexane	8.071	69	449	0.4296	ug/L #	66

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

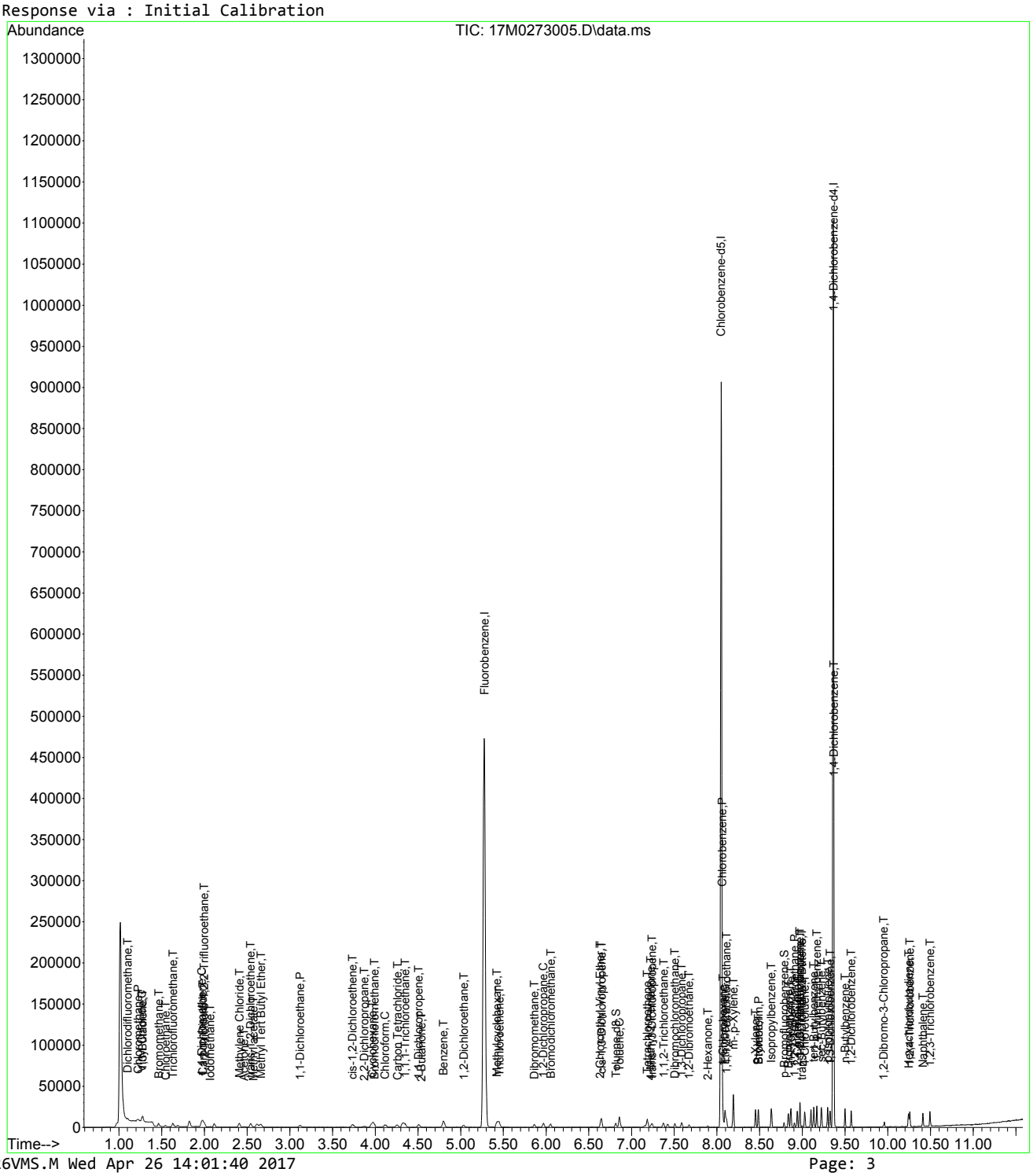
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
57) Ethylbenzene	8.094	106	2751	0.4082	ug/L		85
58) 1,1,1,2-Tetrachloroethane	8.112	131	2018	0.4004	ug/L		92
59) m-,p-Xylene	8.193	106	6639	0.8163	ug/L		98
60) o-Xylene	8.451	106	3154	0.3936	ug/L		95
61) Styrene	8.482	104	4908	0.3828	ug/L		98
62) Bromoform	8.485	173	1308	0.3643	ug/L		88
63) Isopropylbenzene	8.636	105	8520	0.4108	ug/L		99
65) 1,3,5-Trimethylbenzene	8.969	105	6976	0.4122	ug/L		97
67) Bromobenzene	8.836	156	2470	0.4136	ug/L		97
68) n-Propylbenzene	8.865	91	9526	0.4249	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	1521	0.3725	ug/L		100
70) 2-Chlorotoluene	8.940	91	5795	0.4188	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	488	0.4043	ug/L		94
72) trans-1,4-Dichloro-2-B...	8.995	53	204	0.2267	ug/L	#	80
73) 1,2,4-Trimethylbenzene	9.169	105	7147	0.4188	ug/L		97
74) 4-Chlorotoluene	9.027	91	5692	0.4121	ug/L		99
75) tert-Butylbenzene	9.131	134	1424	0.4210	ug/L		97
76) sec-Butylbenzene	9.224	105	8888	0.4263	ug/L		96
77) p-Isopropyltoluene	9.296	119	7466	0.4201	ug/L		99
78) 1,3-Dichlorobenzene	9.322	146	4514	0.4336	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	4491	0.4273	ug/L		85
80) n-Butylbenzene	9.499	91	6442	0.4295	ug/L		95
81) 1,2-Dichlorobenzene	9.571	146	4496	0.4432	ug/L		96
82) 1,2-Dibromo-3-Chloropr...	9.947	75	266	0.3551	ug/L		81
83) Hexachlorobutadiene	10.243	225	1975	0.4618	ug/L		93
84) 1,2,4-Trichlorobenzene	10.257	180	3124	0.4145	ug/L		95
85) Naphthalene	10.411	128	6130	0.4171	ug/L		98
86) 1,2,3-Trichlorobenzene	10.495	180	3077	0.4203	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:40 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.367	0.0	0	0.000
3	P	Chloromethane	-1.000	0.424	0.0	0	0.012
4	C	Vinyl Chloride	0.400	0.416	-4.0#	100	0.000
5	T	1,3-Butadiene	-1.000	0.434	0.0	0	0.000
6	T	Bromomethane	-1.000	0.515	0.0	0	0.012
7	T	Chloroethane	-1.000	0.470	0.0	0	0.017
8	T	Trichlorofluoromethane	0.400	0.434	-8.5	100	0.017
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	0.400	0.418	-4.5#	100	0.012
11	T	Carbon Disulfide	0.400	0.429	-7.2	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.400	0.417	-4.2	100	0.000
13	T	Iodomethane	-1.000	2.114	0.0	0	0.000
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	0.400	0.463	-15.8	100	0.012
16	T	Acetone	-1.000	0.954	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	0.400	0.408	-2.0	100	0.000
18	T	Methyl acetate	0.400	0.327	18.3	100	0.000
19	T	Methyl Tert Butyl Ether	0.400	0.388	3.0	100	0.015
20	P	1,1-Dichloroethane	0.400	0.395	1.3	100	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	0.400	0.403	-0.8	100	0.000
24	T	2,2-Dichloropropane	0.400	0.484	-21.0	100	0.012
25	T	Cyclohexane	0.400	0.389	2.8	100	0.000
26	T	Bromochloromethane	-1.000	0.341	0.0	0	0.018
27	C	Chloroform	0.400	0.417	-4.2#	100	0.000
28	T	Carbon Tetrachloride	0.400	0.371	7.3	100	0.012
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	0.400	0.396	1.0	100	0.000
31	T	1,1-Dichloropropene	0.400	0.408	-2.0	100	0.000
32	T	2-Butanone	-1.000	0.352	0.0	0	0.015
33	T	Benzene	0.400	0.429	-7.2	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.051	0.0	0	0.014
35	T	1,2-Dichloroethane	0.400	0.414	-3.5	100	0.000
36	T	Methylcyclohexane	0.400	0.411	-2.7	100	0.000
37	T	Trichloroethene	0.400	0.426	-6.5	100	0.000
38	T	Dibromomethane	0.400	0.374	6.5	100	0.000
39	C	1,2-Dichloropropane	0.400	0.381	4.8#	100	0.000
40	T	Bromodichloromethane	0.400	0.392	2.0	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.188	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	0.400	0.359	10.3	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.315	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.295	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.205	0.0	0	0.000
48	C	Toluene	0.400	0.424	-6.0#	100	0.000
49	T	Tetrachloroethene	0.400	0.434	-8.5	100	0.000
50	T	1,1,2-Trichloroethane	0.400	0.409	-2.2	100	0.000
51	T	Dibromochloromethane	0.400	0.401	-0.3	100	0.000
52	T	1,3-Dichloropropane	0.400	0.400	0.0	100	0.000
53	T	1,2-Dibromoethane	0.400	0.413	-3.2	100	0.000
54	T	2-Hexanone	-1.000	0.379	0.0	0	0.000
55	P	Chlorobenzene	0.400	0.416	-4.0	100	0.000
56	T	1-Chlorohexane	-1.000	0.430	0.0	0	0.000
57	C	Ethylbenzene	0.400	0.408	-2.0#	100	0.000

826VMS.M Wed Apr 26 14:01:37 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.400	0.400	0.0	100	0.000
59	T	m-,p-Xylene	0.800	0.816	-2.0	100	0.000
60	T	o-Xylene	0.400	0.394	1.5	100	0.000
61	T	Styrene	0.400	0.383	4.3	100	0.000
62	P	Bromoform	0.400	0.364	9.0	100	0.000
63	T	Isopropylbenzene	0.400	0.411	-2.7	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	0.400	0.412	-3.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.200	0.0	0	0.000
67	T	Bromobenzene	0.400	0.414	-3.5	100	0.000
68	T	n-Propylbenzene	0.400	0.425	-6.2	100	0.000
69	P	1,1,2,2-Tetrachloroethane	0.400	0.372	7.0	100	0.000
70	T	2-Chlorotoluene	0.400	0.419	-4.7	100	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.404	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.227	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	0.400	0.419	-4.7	100	0.000
74	T	4-Chlorotoluene	0.400	0.412	-3.0	100	0.000
75	T	tert-Butylbenzene	0.400	0.421	-5.2	100	0.000
76	T	sec-Butylbenzene	0.400	0.426	-6.5	100	0.000
77	T	p-Isopropyltoluene	0.400	0.420	-5.0	100	0.000
78	T	1,3-Dichlorobenzene	0.400	0.434	-8.5	100	0.000
79	T	1,4-Dichlorobenzene	0.400	0.427	-6.7	100	0.000
80	T	n-Butylbenzene	0.400	0.429	-7.2	100	0.000
81	T	1,2-Dichlorobenzene	0.400	0.443	-10.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.355	0.0	0	0.000
83	T	Hexachlorobutadiene	0.400	0.462	-15.5	100	0.000
84	T	1,2,4-Trichlorobenzene	0.400	0.415	-3.7	100	0.000
85	T	Naphthalene	0.400	0.417	-4.2	100	0.000
86	T	1,2,3-Trichlorobenzene	0.400	0.420	-5.0	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	426227	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	321768	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	162525	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.959	65	153	0.0355	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.142%#		
47) Toluene-d8	6.815	98	2654	0.1653	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.661%#		
66) p-Bromofluorobenzene	8.783	95	924	0.1698	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.679%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	4435	0.8761	ug/L	90
3) Chloromethane	1.218	50	4921	0.9933	ug/L	95
4) Vinyl Chloride	1.267	62	5224	0.9523	ug/L	100
5) 1,3-Butadiene	1.276	54	3212	0.9536	ug/L	92
6) Bromomethane	1.461	94	4459	1.0933	ug/L	94
7) Chloroethane	1.539	64	2867	1.1017	ug/L	94
8) Trichlorofluoromethane	1.626	101	7223	1.0265	ug/L	99
9) Diethyl ether	1.837	59	16707	4.9236	ug/L	98
10) 1,1-Dichloroethene	1.965	61	6575	0.9987	ug/L	99
11) Carbon Disulfide	1.976	76	13954	0.9875	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	4132	0.9844	ug/L	99
13) Iodomethane	2.060	142	2054	2.3117	ug/L	97
14) Acrolein	2.217	56	1026	2.4478	ug/L	97
15) Methylene Chloride	2.402	84	5125	1.0259	ug/L	99
16) Acetone	2.460	43	1354	1.5799	ug/L #	71
17) trans-1,2-Dichloroethene	2.538	96	4313	0.9621	ug/L	100
18) Methyl acetate	2.573	43	2105	0.9369	ug/L #	84
19) Methyl Tert Butyl Ether	2.654	73	11029	0.9694	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	7772	0.9652	ug/L	99
21) Acrylonitrile	3.187	53	2537	2.3210	ug/L	98
22) Vinyl Acetate	2.611	86	589	0.8163	ug/L	72
23) cis-1,2-Dichloroethene	3.737	96	4813	0.9485	ug/L	99
24) 2,2-Dichloropropane	3.864	77	4555	0.9837	ug/L	99
25) Cyclohexane	3.966	56	6602	0.9640	ug/L	100
26) Bromochloromethane	3.980	130	2843	0.8696	ug/L	97
27) Chloroform	4.113	83	8392	0.9997	ug/L	98
28) Carbon Tetrachloride	4.252	117	6172	0.9297	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	7196	0.9750	ug/L	99
31) 1,1-Dichloropropene	4.501	75	5583	0.9632	ug/L	97
32) 2-Butanone	4.539	43	1222	0.9564	ug/L #	37
33) Benzene	4.799	78	17817	0.9814	ug/L	99
35) 1,2-Dichloroethane	5.034	62	5412	0.9573	ug/L	96
36) Methylcyclohexane	5.422	83	7060	0.9839	ug/L	95
37) Trichloroethene	5.445	130	5322	0.9759	ug/L	97
38) Dibromomethane	5.862	93	2591	0.9318	ug/L	98
39) 1,2-Dichloropropane	5.963	63	4551	0.9559	ug/L	93
40) Bromodichloromethane	6.050	83	5958	0.9376	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	1303	0.6034	ug/L	88
43) cis-1,3-Dichloropropene	6.650	75	6508	0.9088	ug/L	98
44) 4-Methyl-2-Pentanone	7.232	58	1028	0.8690	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	5180	0.8509	ug/L	98
48) Toluene	6.858	91	19458	0.9645	ug/L	98
49) Tetrachloroethene	7.185	166	5539	0.9627	ug/L	97
50) 1,1,2-Trichloroethane	7.373	97	3713	0.9496	ug/L	99
51) Dibromochloromethane	7.507	129	4726	0.8855	ug/L	97
52) 1,3-Dichloropropane	7.588	76	5873	0.9451	ug/L	96

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

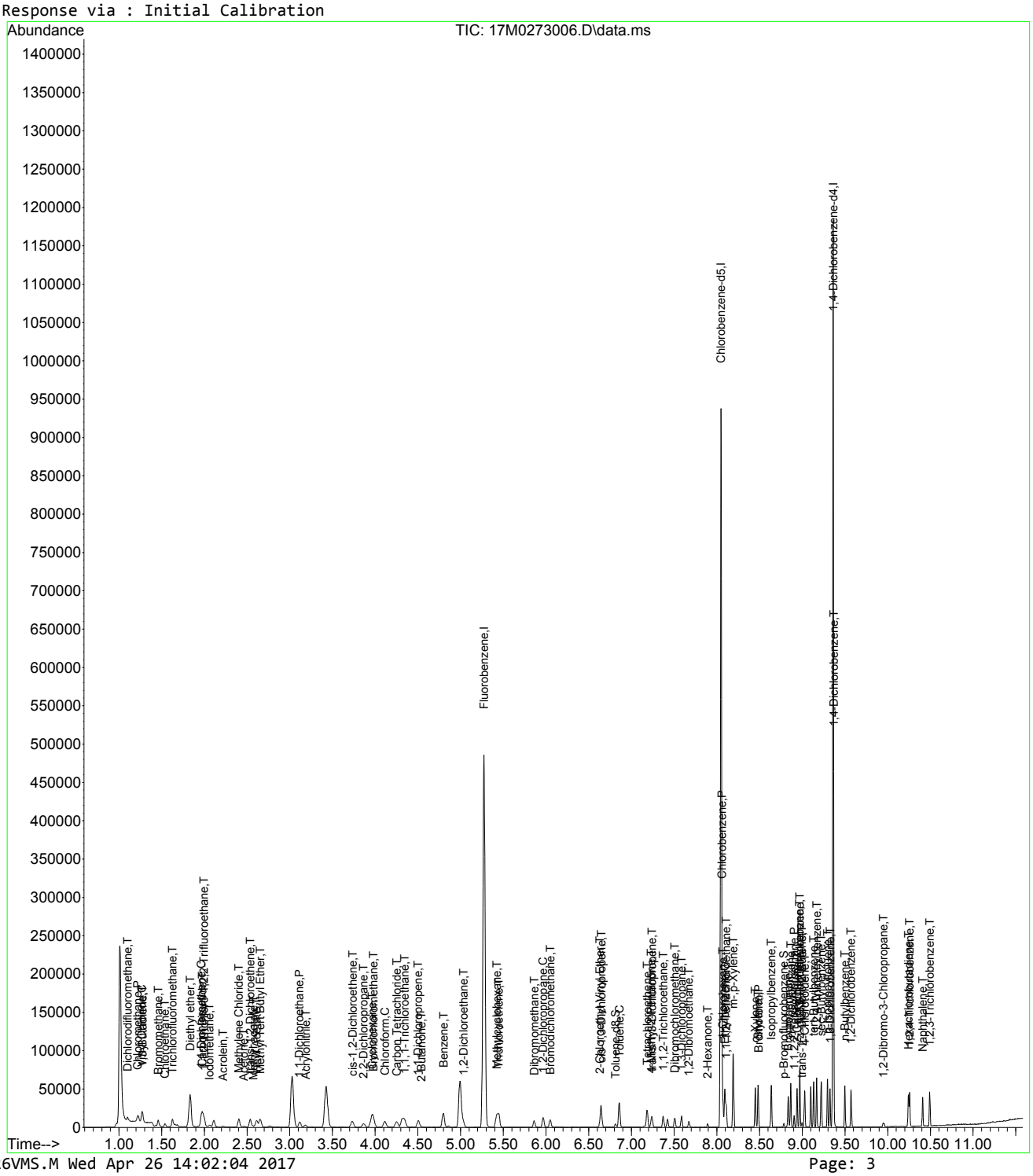
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
53) 1,2-Dibromoethane	7.672	107	3784	0.9445 ug/L	97
54) 2-Hexanone	7.892	43	1881	0.9161 ug/L	97
55) Chlorobenzene	8.060	112	13080	0.9663 ug/L	72
56) 1-Chlorohexane	8.068	69	1019	0.9324 ug/L	78
57) Ethylbenzene	8.094	106	6455	0.9161 ug/L	89
58) 1,1,1,2-Tetrachloroethane	8.109	131	4898	0.9296 ug/L	95
59) m-,p-Xylene	8.193	106	15829	1.8615 ug/L	97
60) o-Xylene	8.450	106	7831	0.9347 ug/L	97
61) Styrene	8.482	104	11851	0.8840 ug/L	99
62) Bromoform	8.488	173	3119	0.8308 ug/L	98
63) Isopropylbenzene	8.636	105	20533	0.9468 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	17243	0.9517 ug/L	98
67) Bromobenzene	8.836	156	6018	0.9413 ug/L	99
68) n-Propylbenzene	8.864	91	22729	0.9470 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	4042	0.9246 ug/L	95
70) 2-Chlorotoluene	8.940	91	14288	0.9645 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	1215	0.9401 ug/L	94
72) trans-1,4-Dichloro-2-B...	8.995	53	570	0.5916 ug/L #	89
73) 1,2,4-Trimethylbenzene	9.168	105	17160	0.9393 ug/L	98
74) 4-Chlorotoluene	9.027	91	14292	0.9664 ug/L	98
75) tert-Butylbenzene	9.134	134	3479	0.9608 ug/L	99
76) sec-Butylbenzene	9.221	105	21376	0.9577 ug/L	99
77) p-Isopropyltoluene	9.296	119	17861	0.9387 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	10532	0.9450 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	10637	0.9454 ug/L	94
80) n-Butylbenzene	9.499	91	14714	0.9162 ug/L	100
81) 1,2-Dichlorobenzene	9.571	146	10274	0.9459 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.947	75	692	0.8628 ug/L	85
83) Hexachlorobutadiene	10.243	225	4412	0.9635 ug/L	97
84) 1,2,4-Trichlorobenzene	10.257	180	7410	0.9183 ug/L	99
85) Naphthalene	10.408	128	14173	0.9007 ug/L	99
86) 1,2,3-Trichlorobenzene	10.492	180	7259	0.9262 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:04 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	1.000	0.876	12.4	100	0.000
3	P	Chloromethane	1.000	0.993	0.7	100	0.000
4	C	Vinyl Chloride	1.000	0.952	4.8#	100	0.000
5	T	1,3-Butadiene	1.000	0.954	4.6	100	0.000
6	T	Bromomethane	1.000	1.093	-9.3	100	0.000
7	T	Chloroethane	1.000	1.102	-10.2	100	0.011
8	T	Trichlorofluoromethane	1.000	1.027	-2.7	100	0.011
9	T	Diethyl ether	5.000	4.924	1.5	100	0.000
10	C	1,1-Dichloroethene	1.000	0.999	0.1#	100	0.000
11	T	Carbon Disulfide	1.000	0.988	1.2	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.000	0.984	1.6	100	0.000
13	T	Iodomethane	-1.000	2.312	0.0	0	0.000
14	T	Acrolein	2.500	2.448	2.1	100	0.000
15	T	Methylene Chloride	1.000	1.026	-2.6	100	0.000
16	T	Acetone	-1.000	1.580	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	1.000	0.962	3.8	100	0.000
18	T	Methyl acetate	1.000	0.937	6.3	100	0.000
19	T	Methyl Tert Butyl Ether	1.000	0.969	3.1	100	0.000
20	P	1,1-Dichloroethane	1.000	0.965	3.5	100	0.000
21	T	Acrylonitrile	2.500	2.321	7.2	100	0.000
22	T	Vinyl Acetate	-1.000	0.816	0.0	0	0.000
23	T	cis-1,2-Dichloroethene	1.000	0.948	5.2	100	0.000
24	T	2,2-Dichloropropane	1.000	0.984	1.6	100	0.000
25	T	Cyclohexane	1.000	0.964	3.6	100	0.000
26	T	Bromochloromethane	1.000	0.870	13.0	100	0.000
27	C	Chloroform	1.000	1.000	0.0	100	0.000
28	T	Carbon Tetrachloride	1.000	0.930	7.0	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	1.000	0.975	2.5	100	0.000
31	T	1,1-Dichloropropene	1.000	0.963	3.7	100	0.000
32	T	2-Butanone	-1.000	0.956	0.0	0	0.015
33	T	Benzene	1.000	0.981	1.9	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.035	0.0	0	0.000
35	T	1,2-Dichloroethane	1.000	0.957	4.3	100	0.000
36	T	Methylcyclohexane	1.000	0.984	1.6	100	0.000
37	T	Trichloroethene	1.000	0.976	2.4	100	0.000
38	T	Dibromomethane	1.000	0.932	6.8	100	0.000
39	C	1,2-Dichloropropane	1.000	0.956	4.4#	100	0.000
40	T	Bromodichloromethane	1.000	0.938	6.2	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.603	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	1.000	0.909	9.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.869	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	1.000	0.851	14.9	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.165	0.0	0	0.000
48	C	Toluene	1.000	0.965	3.5#	100	0.000
49	T	Tetrachloroethene	1.000	0.963	3.7	100	0.000
50	T	1,1,2-Trichloroethane	1.000	0.950	5.0	100	0.000
51	T	Dibromochloromethane	1.000	0.885	11.5	100	0.000
52	T	1,3-Dichloropropane	1.000	0.945	5.5	100	0.000
53	T	1,2-Dibromoethane	1.000	0.945	5.5	100	0.000
54	T	2-Hexanone	-1.000	0.916	0.0	0	0.000
55	P	Chlorobenzene	1.000	0.966	3.4	100	0.000
56	T	1-Chlorohexane	1.000	0.932	6.8	100	0.000
57	C	Ethylbenzene	1.000	0.916	8.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	1.000	0.930	7.0	100	0.000
59	T	m-,p-Xylene	2.000	1.861	7.0	100	0.000
60	T	o-Xylene	1.000	0.935	6.5	100	0.000
61	T	Styrene	1.000	0.884	11.6	100	0.000
62	P	Bromoform	1.000	0.831	16.9	100	0.000
63	T	Isopropylbenzene	1.000	0.947	5.3	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	1.000	0.952	4.8	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.170	0.0	0	0.000
67	T	Bromobenzene	1.000	0.941	5.9	100	0.000
68	T	n-Propylbenzene	1.000	0.947	5.3	100	0.000
69	P	1,1,2,2-Tetrachloroethane	1.000	0.925	7.5	100	0.000
70	T	2-Chlorotoluene	1.000	0.965	3.5	100	0.000
71	T	1,2,3-Trichloropropane	1.000	0.940	6.0	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.592	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	1.000	0.939	6.1	100	0.000
74	T	4-Chlorotoluene	1.000	0.966	3.4	100	0.000
75	T	tert-Butylbenzene	1.000	0.961	3.9	100	0.000
76	T	sec-Butylbenzene	1.000	0.958	4.2	100	0.000
77	T	p-Isopropyltoluene	1.000	0.939	6.1	100	0.000
78	T	1,3-Dichlorobenzene	1.000	0.945	5.5	100	0.000
79	T	1,4-Dichlorobenzene	1.000	0.945	5.5	100	0.000
80	T	n-Butylbenzene	1.000	0.916	8.4	100	0.000
81	T	1,2-Dichlorobenzene	1.000	0.946	5.4	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	1.000	0.863	13.7	100	0.000
83	T	Hexachlorobutadiene	1.000	0.964	3.6	100	0.000
84	T	1,2,4-Trichlorobenzene	1.000	0.918	8.2	100	0.000
85	T	Naphthalene	1.000	0.901	9.9	100	0.000
86	T	1,2,3-Trichlorobenzene	1.000	0.926	7.4	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 5

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	419250	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	301521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148386	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.973	65	410	0.0966	ug/L	0.0203
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.386%#		
47) Toluene-d8	6.812	98	2299	0.1528	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.611%#		
66) p-Bromofluorobenzene	8.786	95	744	0.1497	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.599%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	8266	1.6601	ug/L	96
3) Chloromethane	1.224	50	9490	1.9475	ug/L	97
4) Vinyl Chloride	1.264	62	9802	1.8166	ug/L	100
5) 1,3-Butadiene	1.276	54	6439	1.9436	ug/L	97
6) Bromomethane	1.461	94	8818	2.1981	ug/L	97
7) Chloroethane	1.539	64	5382	2.1025	ug/L	99
8) Trichlorofluoromethane	1.626	101	13476	1.9470	ug/L	99
9) Diethyl ether	1.841	59	82987	24.8636	ug/L	99
10) 1,1-Dichloroethene	1.965	61	12193	1.8828	ug/L	100
11) Carbon Disulfide	1.979	76	25350	1.8238	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	7533	1.8245	ug/L	100
13) Iodomethane	2.066	142	4068	2.6265	ug/L	98
14) Acrolein	2.223	56	4766	11.5599	ug/L	98
15) Methylene Chloride	2.408	84	9550	1.9434	ug/L	98
16) Acetone	2.469	43	2137	2.5351	ug/L	88
17) trans-1,2-Dichloroethene	2.541	96	8550	1.9390	ug/L	99
18) Methyl acetate	2.576	43	3864	1.7485	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	21515	1.9226	ug/L #	100
20) 1,1-Dichloroethane	3.123	63	15207	1.9201	ug/L	98
21) Acrylonitrile	3.184	53	13059	12.1457	ug/L	100
22) Vinyl Acetate	2.619	86	1095	1.5429	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	9709	1.9452	ug/L	99
24) 2,2-Dichloropropane	3.870	77	9712	1.8129	ug/L	95
25) Cyclohexane	3.966	56	12484	1.8532	ug/L	98
26) Bromochloromethane	3.992	130	5989	1.8623	ug/L	99
27) Chloroform	4.113	83	16510	1.9994	ug/L	99
28) Carbon Tetrachloride	4.255	117	12159	1.8621	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	13879	1.9117	ug/L	99
31) 1,1-Dichloropropene	4.507	75	10473	1.8369	ug/L	98
32) 2-Butanone	4.536	43	2256	1.7951	ug/L #	64
33) Benzene	4.800	78	34359	1.9240	ug/L	100
35) 1,2-Dichloroethane	5.037	62	10797	1.9417	ug/L	99
36) Methylcyclohexane	5.425	83	12634	1.7900	ug/L	99
37) Trichloroethene	5.448	130	10311	1.9223	ug/L	99
38) Dibromomethane	5.859	93	5276	1.9290	ug/L	97
39) 1,2-Dichloropropane	5.966	63	9039	1.9301	ug/L	97
40) Bromodichloromethane	6.053	83	12025	1.9238	ug/L	96
41) 1,4-Dioxane	6.265	88	961	41.1985	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.627	63	2988	1.4066	ug/L	98
43) cis-1,3-Dichloropropene	6.647	75	13096	1.8592	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	2026	1.7412	ug/L	95
45) trans-1,3-Dichloropropene	7.243	75	10805	1.8044	ug/L	100
48) Toluene	6.858	91	37329	1.9747	ug/L	100
49) Tetrachloroethene	7.185	166	10472	1.9422	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	7445	2.0319	ug/L	99
51) Dibromochloromethane	7.510	129	9685	1.9365	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

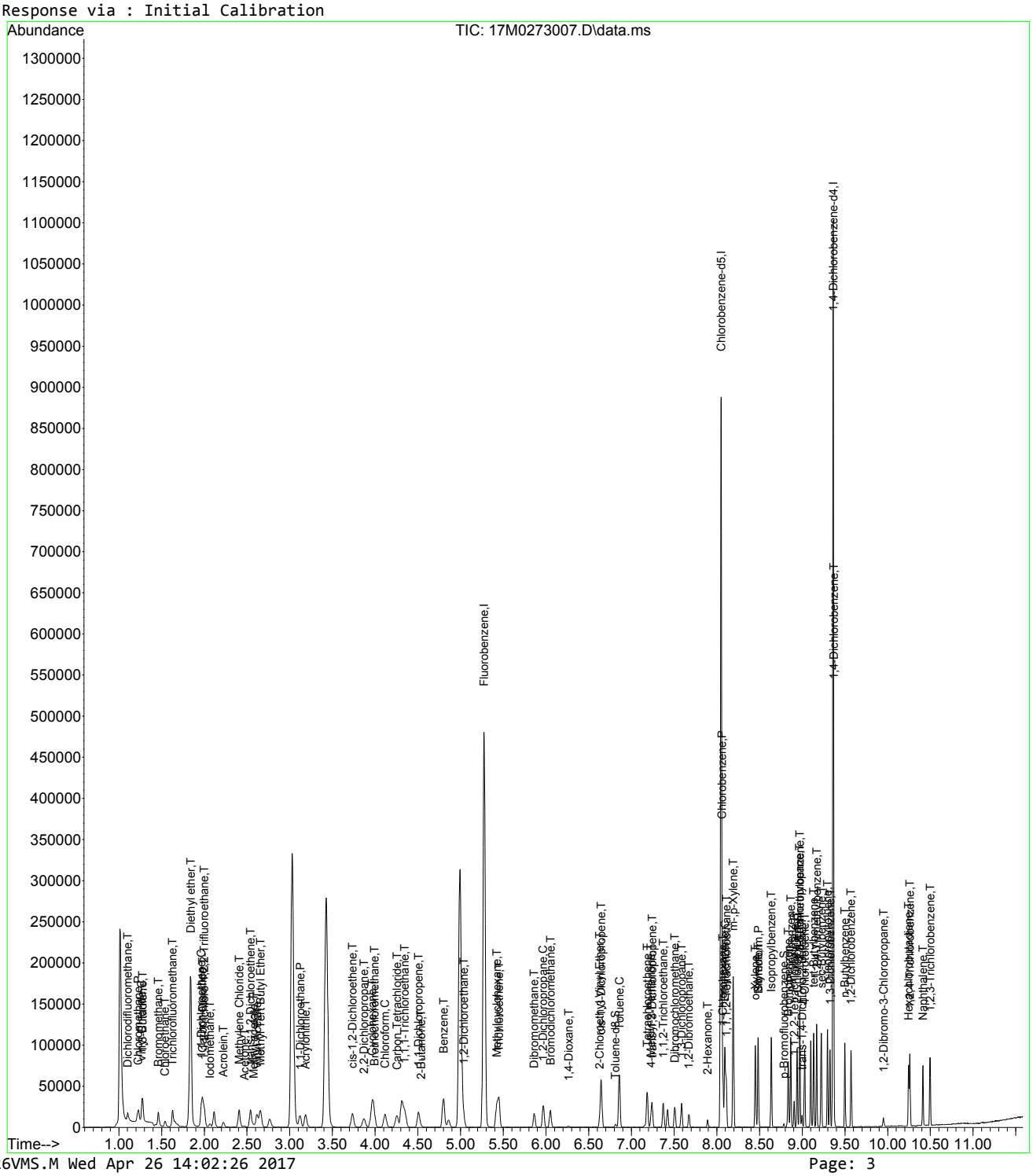
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	11727	2.0138	ug/L		98
53) 1,2-Dibromoethane	7.672	107	7414	1.9749	ug/L		100
54) 2-Hexanone	7.892	43	3567	1.8538	ug/L		100
55) Chlorobenzene	8.060	112	24892	1.9625	ug/L		85
56) 1-Chlorohexane	8.071	69	1995	1.9481	ug/L	#	85
57) Ethylbenzene	8.094	106	13014	1.9710	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	9923	2.0097	ug/L		100
59) m-,p-Xylene	8.193	106	30447	3.8209	ug/L		97
60) o-Xylene	8.451	106	15486	1.9724	ug/L		100
61) Styrene	8.482	104	23501	1.8707	ug/L		99
62) Bromoform	8.485	173	6423	1.8257	ug/L		100
63) Isopropylbenzene	8.636	105	38809	1.9097	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	32427	1.9603	ug/L		99
67) Bromobenzene	8.836	156	11776	2.0175	ug/L		100
68) n-Propylbenzene	8.865	91	42908	1.9582	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	7761	1.9444	ug/L		99
70) 2-Chlorotoluene	8.940	91	27206	2.0115	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	2495	2.1145	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	1392	1.5825	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.169	105	33214	1.9912	ug/L		100
74) 4-Chlorotoluene	9.027	91	26984	1.9984	ug/L		98
75) tert-Butylbenzene	9.134	134	6697	2.0257	ug/L		99
76) sec-Butylbenzene	9.224	105	40402	1.9825	ug/L		99
77) p-Isopropyltoluene	9.296	119	33833	1.9475	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	20210	1.9861	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	20145	1.9610	ug/L		98
80) n-Butylbenzene	9.499	91	26982	1.8402	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	19850	2.0016	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	1468	2.0048	ug/L		87
83) Hexachlorobutadiene	10.243	225	7947	1.9009	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	13652	1.8531	ug/L		97
85) Naphthalene	10.414	128	27628	1.9232	ug/L		99
86) 1,2,3-Trichlorobenzene	10.498	180	13906	1.9433	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:26 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	2.000	1.660	17.0	100	0.000
3	P	Chloromethane	2.000	1.948	2.6	100	0.012
4	C	Vinyl Chloride	2.000	1.817	9.2#	100	0.000
5	T	1,3-Butadiene	2.000	1.944	2.8	100	0.000
6	T	Bromomethane	2.000	2.198	-9.9	100	0.000
7	T	Chloroethane	2.000	2.103	-5.2	100	0.011
8	T	Trichlorofluoromethane	2.000	1.947	2.6	100	0.011
9	T	Diethyl ether	25.000	24.864	0.5	100	0.000
10	C	1,1-Dichloroethene	2.000	1.883	5.8#	100	0.000
11	T	Carbon Disulfide	2.000	1.824	8.8	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.000	1.825	8.8	100	0.000
13	T	Iodomethane	2.000	2.626	-31.3#	100	0.000
14	T	Acrolein	12.500	11.560	7.5	100	0.000
15	T	Methylene Chloride	2.000	1.943	2.8	100	0.000
16	T	Acetone	-1.000	2.535	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	2.000	1.939	3.0	100	0.000
18	T	Methyl acetate	2.000	1.748	12.6	100	0.000
19	T	Methyl Tert Butyl Ether	2.000	1.923	3.8	100	0.000
20	P	1,1-Dichloroethane	2.000	1.920	4.0	100	0.012
21	T	Acrylonitrile	12.500	12.146	2.8	100	0.000
22	T	Vinyl Acetate	-1.000	1.543	0.0	0	0.011
23	T	cis-1,2-Dichloroethene	2.000	1.945	2.7	100	0.000
24	T	2,2-Dichloropropane	2.000	1.813	9.4	100	0.012
25	T	Cyclohexane	2.000	1.853	7.4	100	0.000
26	T	Bromochloromethane	2.000	1.862	6.9	100	0.018
27	C	Chloroform	2.000	1.999	0.0#	100	0.000
28	T	Carbon Tetrachloride	2.000	1.862	6.9	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	2.000	1.912	4.4	100	0.000
31	T	1,1-Dichloropropene	2.000	1.837	8.2	100	0.000
32	T	2-Butanone	-1.000	1.795	0.0	0	0.012
33	T	Benzene	2.000	1.924	3.8	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.097	0.0	0	0.020
35	T	1,2-Dichloroethane	2.000	1.942	2.9	100	0.000
36	T	Methylcyclohexane	2.000	1.790	10.5	100	0.000
37	T	Trichloroethene	2.000	1.922	3.9	100	0.000
38	T	Dibromomethane	2.000	1.929	3.5	100	0.000
39	C	1,2-Dichloropropane	2.000	1.930	3.5#	100	0.000
40	T	Bromodichloromethane	2.000	1.924	3.8	100	0.000
41	T	1,4-Dioxane	50.000	41.198	17.6	100	0.000
42	T	2-Chloroethyl Vinyl Ether	-1.000	1.407	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	2.000	1.859	7.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	1.741	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	2.000	1.804	9.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.153	0.0	0	0.000
48	C	Toluene	2.000	1.975	1.2#	100	0.000
49	T	Tetrachloroethene	2.000	1.942	2.9	100	0.000
50	T	1,1,2-Trichloroethane	2.000	2.032	-1.6	100	0.000
51	T	Dibromochloromethane	2.000	1.936	3.2	100	0.000
52	T	1,3-Dichloropropane	2.000	2.014	-0.7	100	0.000
53	T	1,2-Dibromoethane	2.000	1.975	1.2	100	0.000
54	T	2-Hexanone	2.000	1.854	7.3	100	0.000
55	P	Chlorobenzene	2.000	1.962	1.9	100	0.000
56	T	1-Chlorohexane	2.000	1.948	2.6	100	0.000
57	C	Ethylbenzene	2.000	1.971	1.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	2.000	2.010	-0.5	100	0.000
59	T	m-,p-Xylene	4.000	3.821	4.5	100	0.000
60	T	o-Xylene	2.000	1.972	1.4	100	0.000
61	T	Styrene	2.000	1.871	6.5	100	0.000
62	P	Bromoform	2.000	1.826	8.7	100	0.000
63	T	Isopropylbenzene	2.000	1.910	4.5	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	2.000	1.960	2.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.150	0.0	0	0.000
67	T	Bromobenzene	2.000	2.018	-0.9	100	0.000
68	T	n-Propylbenzene	2.000	1.958	2.1	100	0.000
69	P	1,1,2,2-Tetrachloroethane	2.000	1.944	2.8	100	0.000
70	T	2-Chlorotoluene	2.000	2.012	-0.6	100	0.000
71	T	1,2,3-Trichloropropane	2.000	2.114	-5.7	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	2.000	1.583	20.9	100	0.000
73	T	1,2,4-Trimethylbenzene	2.000	1.991	0.4	100	0.000
74	T	4-Chlorotoluene	2.000	1.998	0.1	100	0.000
75	T	tert-Butylbenzene	2.000	2.026	-1.3	100	0.000
76	T	sec-Butylbenzene	2.000	1.983	0.8	100	0.000
77	T	p-Isopropyltoluene	2.000	1.948	2.6	100	0.000
78	T	1,3-Dichlorobenzene	2.000	1.986	0.7	100	0.000
79	T	1,4-Dichlorobenzene	2.000	1.961	1.9	100	0.000
80	T	n-Butylbenzene	2.000	1.840	8.0	100	0.000
81	T	1,2-Dichlorobenzene	2.000	2.002	-0.1	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	2.000	2.005	-0.2	100	0.000
83	T	Hexachlorobutadiene	2.000	1.901	4.9	100	0.000
84	T	1,2,4-Trichlorobenzene	2.000	1.853	7.4	100	0.000
85	T	Naphthalene	2.000	1.923	3.8	100	0.000
86	T	1,2,3-Trichlorobenzene	2.000	1.943	2.8	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	431262	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	319022	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	163434	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.351	111	23759	5.1012 ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.405%#		
34) 1,2-Dichloroethane-d4	4.964	65	23294	5.3358 ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.343%#		
47) Toluene-d8	6.815	98	82876	5.2054 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 20.822%#		
66) p-Bromofluorobenzene	8.783	95	24857	4.5424 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 18.170%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	1.108	85	23001	4.4908 ug/L	99
3) Chloromethane	1.224	50	24053	4.7986 ug/L	98
4) Vinyl Chloride	1.270	62	26844	4.8364 ug/L	100
5) 1,3-Butadiene	1.282	54	17084	5.0131 ug/L	98
6) Bromomethane	1.464	94	22223	5.3853 ug/L	99
7) Chloroethane	1.539	64	14714	5.5881 ug/L	93
8) Trichlorofluoromethane	1.632	101	37891	5.3221 ug/L	99
9) Diethyl ether	1.843	59	169782	49.4513 ug/L	100
10) 1,1-Dichloroethene	1.971	61	33029	4.9581 ug/L	100
11) Carbon Disulfide	1.982	76	71308	4.9874 ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	21872	5.1500 ug/L	100
13) Iodomethane	2.069	142	16154	4.4150 ug/L	99
14) Acrolein	2.225	56	10883	25.6613 ug/L	100
15) Methylene Chloride	2.411	84	25075	4.9606 ug/L	100
16) Acetone	2.469	43	5224	6.0246 ug/L	95
17) trans-1,2-Dichloroethene	2.544	96	22591	4.9805 ug/L	99
18) Methyl acetate	2.576	43	11275	4.9598 ug/L #	97
19) Methyl Tert Butyl Ether	2.660	73	58542	5.0855 ug/L #	100
20) 1,1-Dichloroethane	3.120	63	41374	5.0784 ug/L	99
21) Acrylonitrile	3.190	53	27474	24.8409 ug/L	97
22) Vinyl Acetate	2.616	86	3460	4.7395 ug/L #	45
23) cis-1,2-Dichloroethene	3.740	96	26009	5.0656 ug/L	98
24) 2,2-Dichloropropane	3.870	77	28316	4.6367 ug/L	100
25) Cyclohexane	3.971	56	35009	5.0522 ug/L	99
26) Bromochloromethane	3.986	130	16786	5.0742 ug/L	98
27) Chloroform	4.116	83	43019	5.0646 ug/L	99
28) Carbon Tetrachloride	4.255	117	34147	5.0837 ug/L	98
30) 1,1,1-Trichloroethane	4.351	97	37529	5.0254 ug/L	99
31) 1,1-Dichloropropene	4.510	75	28981	4.9414 ug/L	98
32) 2-Butanone	4.539	43	6581	5.0907 ug/L #	96
33) Benzene	4.799	78	91557	4.9841 ug/L	100
35) 1,2-Dichloroethane	5.037	62	29435	5.1460 ug/L	99
36) Methylcyclohexane	5.428	83	36223	4.9893 ug/L	99
37) Trichloroethene	5.451	130	27251	4.9389 ug/L	99
38) Dibromomethane	5.862	93	14614	5.1942 ug/L	98
39) 1,2-Dichloropropane	5.969	63	24584	5.1032 ug/L	99
40) Bromodichloromethane	6.053	83	32146	4.9995 ug/L	100
41) 1,4-Dioxane	6.262	88	2257	94.0635 ug/L	90
42) 2-Chloroethyl Vinyl Ether	6.629	63	9083	4.1568 ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	36540	5.0431 ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	5813	4.8566 ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	31049	5.0407 ug/L	100
48) Toluene	6.858	91	101530	5.0762 ug/L	99
49) Tetrachloroethene	7.185	166	29104	5.1017 ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	20117	5.1891 ug/L	99
51) Dibromochloromethane	7.509	129	26886	5.0809 ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

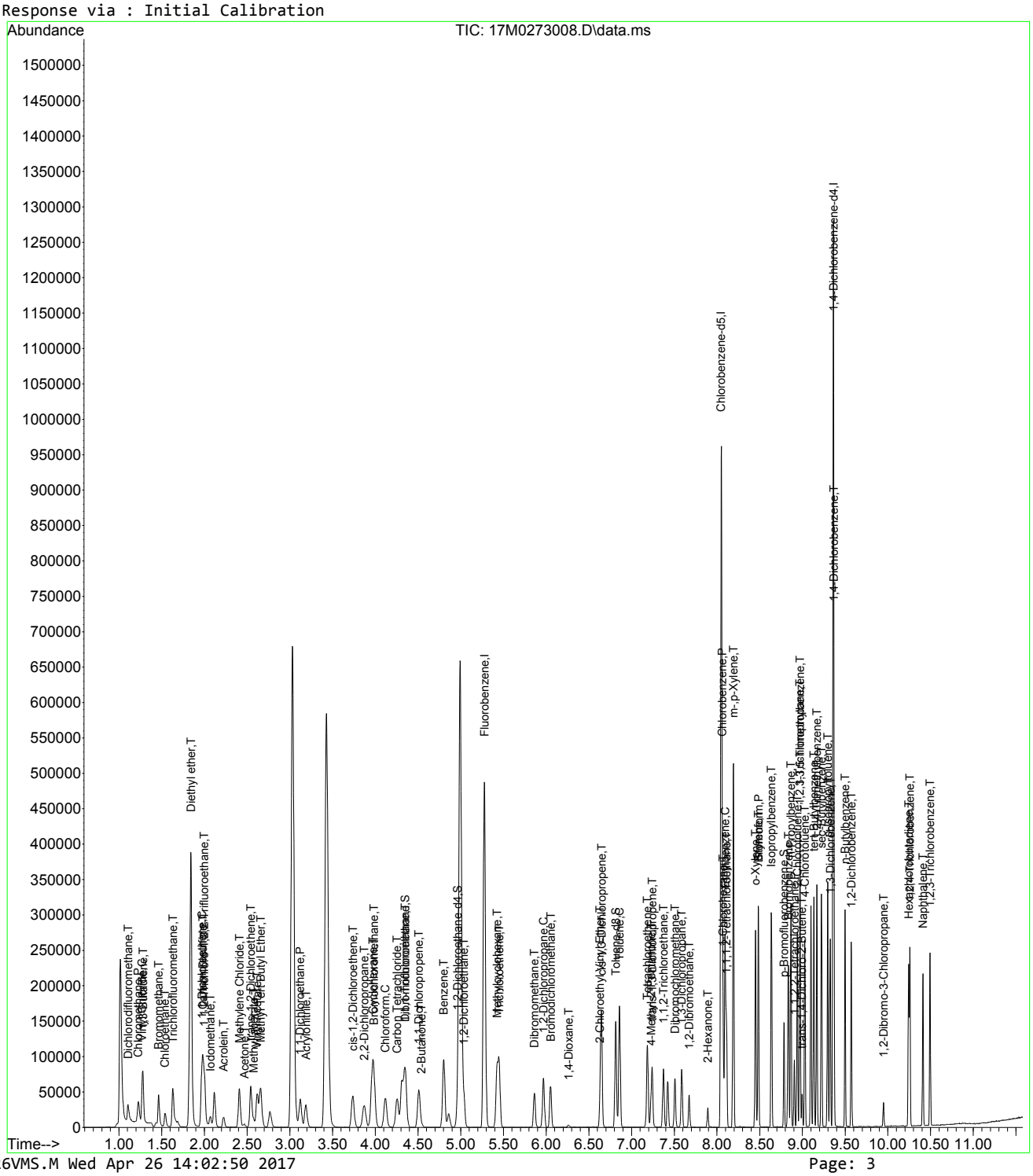
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	31843	5.1682	ug/L		98
53) 1,2-Dibromoethane	7.674	107	20257	5.1000	ug/L		99
54) 2-Hexanone	7.892	43	10630	5.2214	ug/L		100
55) Chlorobenzene	8.060	112	67203	5.0076	ug/L		93
56) 1-Chlorohexane	8.071	69	5432	5.0134	ug/L		83
57) Ethylbenzene	8.094	106	35155	5.0323	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	26571	5.0862	ug/L		99
59) m-,p-Xylene	8.193	106	85229	10.1090	ug/L		97
60) o-Xylene	8.450	106	41928	5.0473	ug/L		97
61) Styrene	8.482	104	66320	4.9896	ug/L		100
62) Bromoform	8.485	173	18946	5.0897	ug/L		99
63) Isopropylbenzene	8.636	105	109791	5.1061	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	93688	5.1422	ug/L		99
67) Bromobenzene	8.835	156	32100	4.9931	ug/L		99
68) n-Propylbenzene	8.864	91	123890	5.1333	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	23301	5.3002	ug/L		100
70) 2-Chlorotoluene	8.940	91	75963	5.0993	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	6702	5.1569	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	4475	4.6190	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.168	105	94879	5.1644	ug/L		99
74) 4-Chlorotoluene	9.029	91	75469	5.0745	ug/L		99
75) tert-Butylbenzene	9.134	134	18683	5.1309	ug/L		99
76) sec-Butylbenzene	9.223	105	116472	5.1891	ug/L		99
77) p-Isopropyltoluene	9.296	119	98419	5.1437	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	56651	5.0548	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	56423	4.9866	ug/L		99
80) n-Butylbenzene	9.499	91	82542	5.1112	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	55072	5.0420	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	4044	5.0142	ug/L		98
83) Hexachlorobutadiene	10.243	225	23413	5.0847	ug/L		99
84) 1,2,4-Trichlorobenzene	10.257	180	40601	5.0037	ug/L		100
85) Naphthalene	10.411	128	82078	5.1873	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	39894	5.0617	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:50 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	5.000	4.491	10.2	100	0.012
3	P	Chloromethane	5.000	4.799	4.0	100	0.012
4	C	Vinyl Chloride	5.000	4.836	3.3#	100	0.000
5	T	1,3-Butadiene	5.000	5.013	-0.3	100	0.012
6	T	Bromomethane	5.000	5.385	-7.7	100	0.000
7	T	Chloroethane	5.000	5.588	-11.8	100	0.011
8	T	Trichlorofluoromethane	5.000	5.322	-6.4	100	0.017
9	T	Diethyl ether	50.000	49.451	1.1	100	0.000
10	C	1,1-Dichloroethene	5.000	4.958	0.8#	100	0.015
11	T	Carbon Disulfide	5.000	4.987	0.3	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.000	5.150	-3.0	100	0.012
13	T	Iodomethane	5.000	4.415	11.7	100	0.011
14	T	Acrolein	25.000	25.661	-2.6	100	0.000
15	T	Methylene Chloride	5.000	4.961	0.8	100	0.012
16	T	Acetone	5.000	6.025	-20.5	100	0.000
17	T	trans-1,2-Dichloroethene	5.000	4.980	0.4	100	0.012
18	T	Methyl acetate	5.000	4.960	0.8	100	0.000
19	T	Methyl Tert Butyl Ether	5.000	5.086	-1.7	100	0.012
20	P	1,1-Dichloroethane	5.000	5.078	-1.6	100	0.000
21	T	Acrylonitrile	25.000	24.841	0.6	100	0.000
22	T	Vinyl Acetate	5.000	4.740	5.2	100	0.000
23	T	cis-1,2-Dichloroethene	5.000	5.066	-1.3	100	0.012
24	T	2,2-Dichloropropane	5.000	4.637	7.3	100	0.012
25	T	Cyclohexane	5.000	5.052	-1.0	100	0.000
26	T	Bromochloromethane	5.000	5.074	-1.5	100	0.012
27	C	Chloroform	5.000	5.065	-1.3#	100	0.000
28	T	Carbon Tetrachloride	5.000	5.084	-1.7	100	0.000
29	S	Dibromofluoromethane	5.000	5.101	-2.0	100	0.012
30	T	1,1,1-Trichloroethane	5.000	5.025	-0.5	100	0.000
31	T	1,1-Dichloropropene	5.000	4.941	1.2	100	0.000
32	T	2-Butanone	5.000	5.091	-1.8	100	0.015
33	T	Benzene	5.000	4.984	0.3	100	0.000
34	S	1,2-Dichloroethane-d4	5.000	5.336	-6.7	100	0.011
35	T	1,2-Dichloroethane	5.000	5.146	-2.9	100	0.000
36	T	Methylcyclohexane	5.000	4.989	0.2	100	0.000
37	T	Trichloroethene	5.000	4.939	1.2	100	0.000
38	T	Dibromomethane	5.000	5.194	-3.9	100	0.000
39	C	1,2-Dichloropropane	5.000	5.103	-2.1#	100	0.000
40	T	Bromodichloromethane	5.000	5.000	0.0	100	0.000
41	T	1,4-Dioxane	100.000	94.064	5.9	100	0.000
42	T	2-Chloroethyl Vinyl Ether	5.000	4.157	16.9	100	0.000
43	T	cis-1,3-Dichloropropene	5.000	5.043	-0.9	100	0.000
44	T	4-Methyl-2-Pentanone	5.000	4.857	2.9	100	0.000
45	T	trans-1,3-Dichloropropene	5.000	5.041	-0.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	5.000	5.205	-4.1	100	0.000
48	C	Toluene	5.000	5.076	-1.5#	100	0.000
49	T	Tetrachloroethene	5.000	5.102	-2.0	100	0.000
50	T	1,1,2-Trichloroethane	5.000	5.189	-3.8	100	0.000
51	T	Dibromochloromethane	5.000	5.081	-1.6	100	0.000
52	T	1,3-Dichloropropane	5.000	5.168	-3.4	100	0.000
53	T	1,2-Dibromoethane	5.000	5.100	-2.0	100	0.000
54	T	2-Hexanone	5.000	5.221	-4.4	100	0.000
55	P	Chlorobenzene	5.000	5.008	-0.2	100	0.000
56	T	1-Chlorohexane	5.000	5.013	-0.3	100	0.000
57	C	Ethylbenzene	5.000	5.032	-0.6#	100	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	5.000	5.086	-1.7	100	0.000
59	T	m-,p-Xylene	10.000	10.109	-1.1	100	0.000
60	T	o-Xylene	5.000	5.047	-0.9	100	0.000
61	T	Styrene	5.000	4.990	0.2	100	0.000
62	P	Bromoform	5.000	5.090	-1.8	100	0.000
63	T	Isopropylbenzene	5.000	5.106	-2.1	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	5.000	5.142	-2.8	100	0.000
66	S	p-Bromofluorobenzene	5.000	4.542	9.2	100	0.000
67	T	Bromobenzene	5.000	4.993	0.1	100	0.000
68	T	n-Propylbenzene	5.000	5.133	-2.7	100	0.000
69	P	1,1,2,2-Tetrachloroethane	5.000	5.300	-6.0	100	0.000
70	T	2-Chlorotoluene	5.000	5.099	-2.0	100	0.000
71	T	1,2,3-Trichloropropane	5.000	5.157	-3.1	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	5.000	4.619	7.6	100	0.000
73	T	1,2,4-Trimethylbenzene	5.000	5.164	-3.3	100	0.000
74	T	4-Chlorotoluene	5.000	5.075	-1.5	100	0.000
75	T	tert-Butylbenzene	5.000	5.131	-2.6	100	0.000
76	T	sec-Butylbenzene	5.000	5.189	-3.8	100	0.000
77	T	p-Isopropyltoluene	5.000	5.144	-2.9	100	0.000
78	T	1,3-Dichlorobenzene	5.000	5.055	-1.1	100	0.000
79	T	1,4-Dichlorobenzene	5.000	4.987	0.3	100	0.000
80	T	n-Butylbenzene	5.000	5.111	-2.2	100	0.000
81	T	1,2-Dichlorobenzene	5.000	5.042	-0.8	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	5.000	5.014	-0.3	100	0.000
83	T	Hexachlorobutadiene	5.000	5.085	-1.7	100	0.000
84	T	1,2,4-Trichlorobenzene	5.000	5.004	-0.1	100	0.000
85	T	Naphthalene	5.000	5.187	-3.7	100	0.000
86	T	1,2,3-Trichlorobenzene	5.000	5.062	-1.2	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	415989	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	308316	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	155966	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	41370	9.2085	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.834%#			
34) 1,2-Dichloroethane-d4	4.956	65	39416	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.441%#			
47) Toluene-d8	6.815	98	144252	9.3749	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 37.500%#			
66) p-Bromofluorobenzene	8.784	95	48881	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 37.441%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	107073	21.6728	ug/L	100
3) Chloromethane	1.218	50	97047	20.0719	ug/L	100
4) Vinyl Chloride	1.264	62	110236	20.5901	ug/L	99
5) 1,3-Butadiene	1.276	54	65854	20.0334	ug/L	99
6) Bromomethane	1.458	94	79989	20.0955	ug/L	100
7) Chloroethane	1.534	64	58403	22.9945	ug/L	100
8) Trichlorofluoromethane	1.626	101	147654	21.5007	ug/L	99
9) Diethyl ether	1.838	59	271363	81.9400	ug/L	100
10) 1,1-Dichloroethene	1.962	61	129870	20.2111	ug/L	100
11) Carbon Disulfide	1.977	76	273076	19.8007	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	82665	20.1789	ug/L	100
13) Iodomethane	2.063	142	90634	16.0415	ug/L	99
14) Acrolein	2.220	56	16470	40.2609	ug/L	100
15) Methylene Chloride	2.405	84	94958	19.4753	ug/L	99
16) Acetone	2.463	43	17323	20.7112	ug/L	97
17) trans-1,2-Dichloroethene	2.538	96	87762	20.0586	ug/L	99
18) Methyl acetate	2.573	43	47763	21.7821	ug/L #	98
19) Methyl Tert Butyl Ether	2.654	73	223741	20.1499	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	159579	20.3066	ug/L	99
21) Acrylonitrile	3.181	53	43518	40.7919	ug/L	100
22) Vinyl Acetate	2.616	86	13399	19.0279	ug/L	87
23) cis-1,2-Dichloroethene	3.731	96	98926	19.9747	ug/L	100
24) 2,2-Dichloropropane	3.867	77	117122	18.9833	ug/L	98
25) Cyclohexane	3.966	56	132299	19.7932	ug/L	99
26) Bromochloromethane	3.983	130	65363	20.4839	ug/L	100
27) Chloroform	4.116	83	162820	19.8724	ug/L	100
28) Carbon Tetrachloride	4.255	117	133209	20.5600	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	146436	20.3288	ug/L	100
31) 1,1-Dichloropropene	4.504	75	113299	20.0273	ug/L	99
32) 2-Butanone	4.530	43	23212	18.6149	ug/L	97
33) Benzene	4.800	78	350607	19.7868	ug/L	100
35) 1,2-Dichloroethane	5.031	62	110449	20.0184	ug/L	100
36) Methylcyclohexane	5.422	83	133533	19.0679	ug/L	100
37) Trichloroethene	5.448	130	105023	19.7330	ug/L	100
38) Dibromomethane	5.859	93	54492	20.0791	ug/L	100
39) 1,2-Dichloropropane	5.966	63	93539	20.1299	ug/L	100
40) Bromodichloromethane	6.050	83	125080	20.1673	ug/L	99
41) 1,4-Dioxane	6.259	88	3291	142.1926	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.629	63	38855	18.4348	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	142778	20.4290	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	21644	18.7468	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	121640	20.4727	ug/L	100
48) Toluene	6.858	91	390265	20.1896	ug/L	100
49) Tetrachloroethene	7.185	166	108682	19.7126	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	75279	20.0923	ug/L	100
51) Dibromochloromethane	7.507	129	104430	20.4202	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

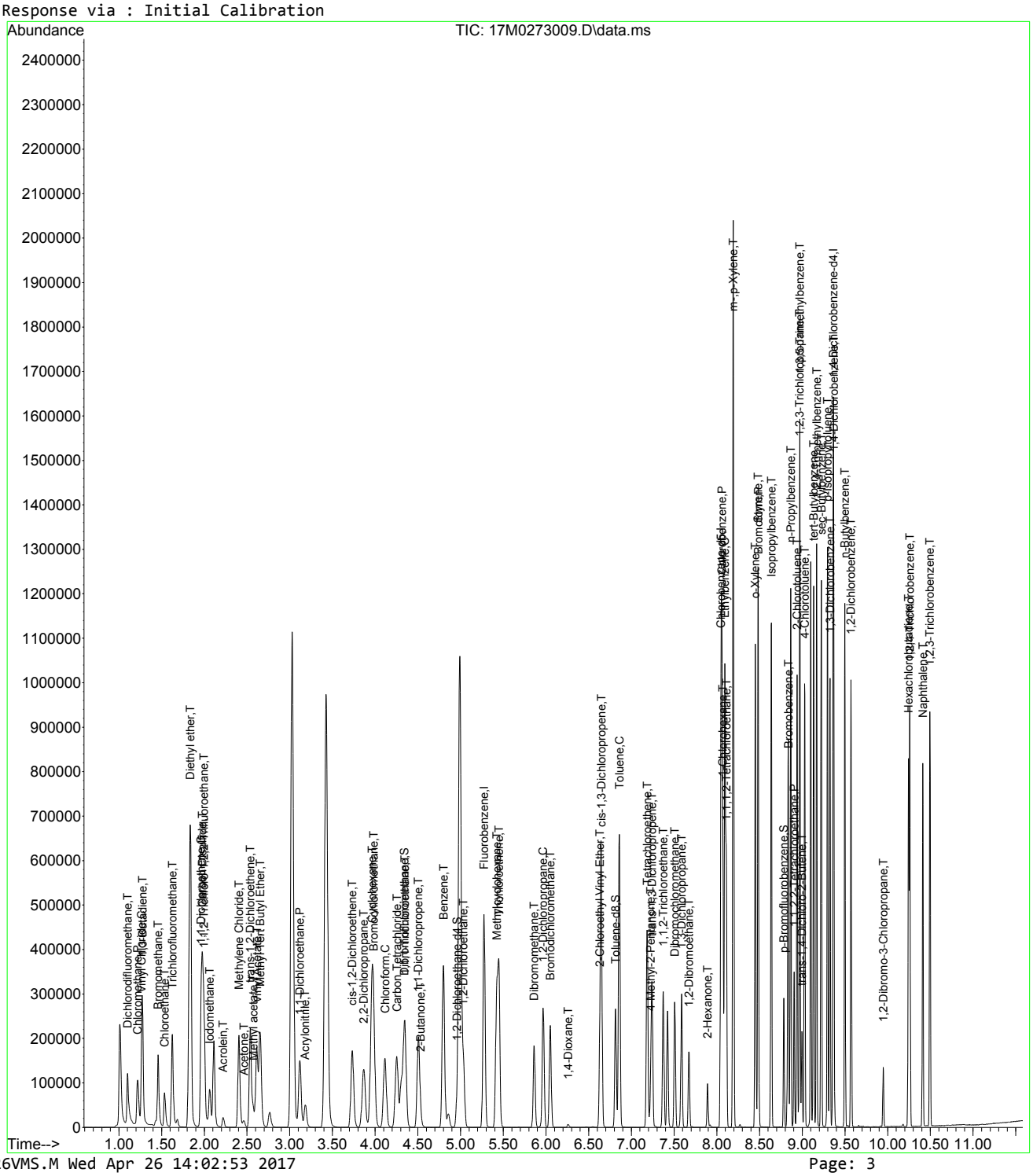
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	121547	20.4125	ug/L		100
53) 1,2-Dibromoethane	7.675	107	76988	20.0559	ug/L		99
54) 2-Hexanone	7.892	43	38232	19.4315	ug/L		100
55) Chlorobenzene	8.060	112	258733	19.9487	ug/L		98
56) 1-Chlorohexane	8.071	69	20340	19.4243	ug/L		84
57) Ethylbenzene	8.095	106	135392	20.0539	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.112	131	101795	20.1621	ug/L		100
59) m-,p-Xylene	8.193	106	327137	40.1491	ug/L		97
60) o-Xylene	8.451	106	160719	20.0193	ug/L		98
61) Styrene	8.482	104	262832	20.4609	ug/L		100
62) Bromoform	8.485	173	73848	20.5278	ug/L		100
63) Isopropylbenzene	8.639	105	420954	20.2572	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	353581	20.3360	ug/L		100
67) Bromobenzene	8.839	156	122250	19.9264	ug/L		99
68) n-Propylbenzene	8.865	91	469314	20.3768	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	85621	20.4085	ug/L		100
70) 2-Chlorotoluene	8.940	91	286030	20.1202	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24779	19.9792	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	20177	21.8236	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	356727	20.3467	ug/L		100
74) 4-Chlorotoluene	9.027	91	285276	20.1003	ug/L		99
75) tert-Butylbenzene	9.134	134	69653	20.0447	ug/L		100
76) sec-Butylbenzene	9.224	105	435489	20.3309	ug/L		100
77) p-Isopropyltoluene	9.296	119	374739	20.5229	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	213997	20.0086	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	209144	19.3691	ug/L		100
80) n-Butylbenzene	9.499	91	311602	20.2190	ug/L		99
81) 1,2-Dichlorobenzene	9.571	146	208933	20.0442	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	15581	20.2441	ug/L		97
83) Hexachlorobutadiene	10.243	225	85120	19.3709	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	156012	20.1477	ug/L		100
85) Naphthalene	10.411	128	308618	20.4385	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	149504	19.8771	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:53 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417906	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	317098	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167026	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115980	25.6974	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.790%			
34) 1,2-Dichloroethane-d4	4.953	65	108720	25.6997	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.799%			
47) Toluene-d8	6.812	98	406817	25.7068	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.827%			
66) p-Bromofluorobenzene	8.783	95	141725	25.3421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.368%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	273383	55.0820	ug/L	100
3) Chloromethane	1.212	50	241081	49.6332	ug/L	100
4) Vinyl Chloride	1.261	62	274798	51.0919	ug/L	100
5) 1,3-Butadiene	1.270	54	170920	51.7569	ug/L	100
6) Bromomethane	1.455	94	185476	46.3830	ug/L	100
7) Chloroethane	1.528	64	113694	44.5585	ug/L	100
8) Trichlorofluoromethane	1.615	101	370004	53.6311	ug/L	100
9) Diethyl ether	1.835	59	343062	103.1148	ug/L	100
10) 1,1-Dichloroethene	1.956	61	324434	50.2586	ug/L	100
11) Carbon Disulfide	1.971	76	711965	51.3878	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	212072	51.5304	ug/L	100
13) Iodomethane	2.058	142	303865	48.8576	ug/L	100
14) Acrolein	2.217	56	22080	53.7270	ug/L	100
15) Methylene Chloride	2.399	84	234342	47.8417	ug/L	100
16) Acetone	2.460	43	40588	48.3039	ug/L	99
17) trans-1,2-Dichloroethene	2.532	96	221078	50.2970	ug/L	100
18) Methyl acetate	2.567	43	128727	58.4362	ug/L #	98
19) Methyl Tert Butyl Ether	2.648	73	575057	51.5516	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	399083	50.5507	ug/L	100
21) Acrylonitrile	3.181	53	55941	52.1961	ug/L	100
22) Vinyl Acetate	2.608	86	37712	53.3092	ug/L	91
23) cis-1,2-Dichloroethene	3.728	96	250294	50.3065	ug/L	100
24) 2,2-Dichloropropane	3.858	77	316045	50.5289	ug/L	100
25) Cyclohexane	3.963	56	351763	52.3857	ug/L	100
26) Bromochloromethane	3.974	130	167162	52.1461	ug/L	100
27) Chloroform	4.110	83	408367	49.6131	ug/L	100
28) Carbon Tetrachloride	4.246	117	339910	52.2223	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	366464	50.6404	ug/L	100
31) 1,1-Dichloropropene	4.501	75	294187	51.7635	ug/L	100
32) 2-Butanone	4.524	43	63238	50.4812	ug/L	100
33) Benzene	4.797	78	884324	49.6787	ug/L	100
35) 1,2-Dichloroethane	5.031	62	277929	50.1424	ug/L	100
36) Methylcyclohexane	5.422	83	366430	52.0844	ug/L	100
37) Trichloroethene	5.445	130	266043	49.7582	ug/L	100
38) Dibromomethane	5.859	93	140437	51.5105	ug/L	100
39) 1,2-Dichloropropane	5.966	63	238320	51.0521	ug/L	100
40) Bromodichloromethane	6.047	83	318787	51.1640	ug/L	100
41) 1,4-Dioxane	6.256	88	4661	200.4617	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	106937	50.5036	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	371992	52.9813	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	58337	50.2965	ug/L	100
45) trans-1,3-Dichloropropene	7.240	75	316603	53.0417	ug/L	100
48) Toluene	6.858	91	1001874	50.3945	ug/L	100
49) Tetrachloroethene	7.182	166	285329	50.3192	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	194901	50.5792	ug/L	100
51) Dibromochloromethane	7.507	129	274126	52.1181	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

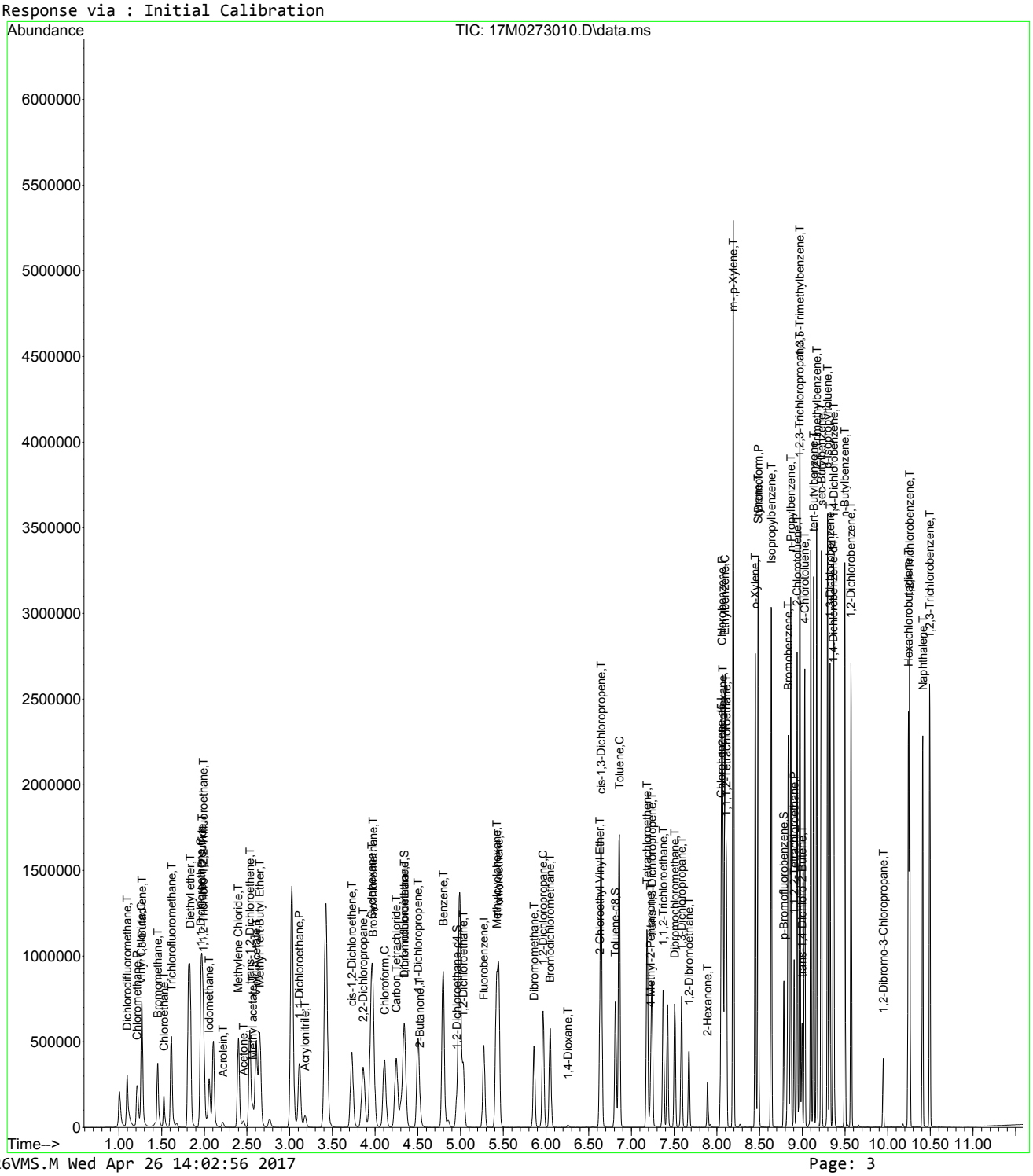
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	310634	50.7227	ug/L		100
53) 1,2-Dibromoethane	7.675	107	202402	51.2669	ug/L		100
54) 2-Hexanone	7.892	43	102578	50.6916	ug/L		100
55) Chlorobenzene	8.060	112	671778	50.3605	ug/L		100
56) 1-Chlorohexane	8.071	69	56830	52.7686	ug/L		100
57) Ethylbenzene	8.094	106	354570	51.0636	ug/L		100
58) 1,1,1,2-Tetrachloroethane	8.112	131	263117	50.6712	ug/L		100
59) m-,p-Xylene	8.193	106	866538	103.4037	ug/L		100
60) o-Xylene	8.450	106	423285	51.2646	ug/L		100
61) Styrene	8.482	104	700211	53.0002	ug/L		100
62) Bromoform	8.485	173	202713	54.7882	ug/L		100
63) Isopropylbenzene	8.639	105	1095961	51.2793	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	941312	50.5541	ug/L		100
67) Bromobenzene	8.836	156	322344	49.0619	ug/L		100
68) n-Propylbenzene	8.864	91	1246315	50.5297	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	238334	53.0473	ug/L		100
70) 2-Chlorotoluene	8.940	91	752979	49.4596	ug/L		100
71) 1,2,3-Trichloropropane	8.969	110	66677	50.2014	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	54428	54.9716	ug/L	#	100
73) 1,2,4-Trimethylbenzene	9.169	105	950457	50.6217	ug/L		100
74) 4-Chlorotoluene	9.030	91	761067	50.0733	ug/L		100
75) tert-Butylbenzene	9.134	134	183420	49.2893	ug/L		100
76) sec-Butylbenzene	9.224	105	1166744	50.8629	ug/L		100
77) p-Isopropyltoluene	9.296	119	1013386	51.8240	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	575762	50.2687	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	570068	49.2988	ug/L		100
80) n-Butylbenzene	9.499	91	877964	53.1964	ug/L		100
81) 1,2-Dichlorobenzene	9.571	146	560761	50.2349	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	44335	53.7892	ug/L		100
83) Hexachlorobutadiene	10.243	225	244851	52.0316	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	445052	53.6691	ug/L		100
85) Naphthalene	10.411	128	870655	53.8418	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	422273	52.4250	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:56 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	416412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	322460	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.366	152	174149	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	231222	51.4151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 205.660%#			
34) 1,2-Dichloroethane-d4	4.959	65	212387	50.3851	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 201.540%#			
47) Toluene-d8	6.815	98	820550	50.9885	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 203.954%#			
66) p-Bromofluorobenzene	8.786	95	299359	51.3394	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 205.358%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	539830	109.1568	ug/L	100
3) Chloromethane	1.215	50	509696	105.3116	ug/L	100
4) Vinyl Chloride	1.261	62	558799	104.2675	ug/L	100
5) 1,3-Butadiene	1.273	54	332020	100.9009	ug/L	99
6) Bromomethane	1.455	94	363546	91.2402	ug/L	99
7) Chloroethane	1.528	64	219087	86.1717	ug/L	99
8) Trichlorofluoromethane	1.606	101	628305	91.3979	ug/L	99
9) Diethyl ether	1.841	59	666542	201.0626	ug/L	100
10) 1,1-Dichloroethene	1.953	61	657831	102.2712	ug/L	100
11) Carbon Disulfide	1.968	76	1388153	100.5527	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	410087	100.0026	ug/L	100
13) Iodomethane	2.058	142	632275	99.8486	ug/L	100
14) Acrolein	2.220	56	41772	102.0079	ug/L	99
15) Methylene Chloride	2.399	84	477038	97.7384	ug/L	100
16) Acetone	2.466	43	81015	96.7621	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	452419	103.2982	ug/L	99
18) Methyl acetate	2.573	43	246307	112.2133	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	1158243	104.2044	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	814580	103.5507	ug/L	100
21) Acrylonitrile	3.184	53	109445	102.4848	ug/L	99
22) Vinyl Acetate	2.605	86	68474	97.1413	ug/L	81
23) cis-1,2-Dichloroethene	3.731	96	513237	103.5255	ug/L	99
24) 2,2-Dichloropropane	3.861	77	635375	101.6691	ug/L	100
25) Cyclohexane	3.963	56	686248	102.5650	ug/L	99
26) Bromochloromethane	3.980	130	340996	106.7552	ug/L	100
27) Chloroform	4.110	83	831165	101.3417	ug/L	100
28) Carbon Tetrachloride	4.249	117	691112	106.5604	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	746228	103.4887	ug/L	100
31) 1,1-Dichloropropene	4.504	75	587037	103.6624	ug/L	100
32) 2-Butanone	4.530	43	127054	101.7877	ug/L	100
33) Benzene	4.797	78	1806588	101.8528	ug/L	100
35) 1,2-Dichloroethane	5.034	62	560473	101.4803	ug/L	100
36) Methylcyclohexane	5.425	83	693665	98.9514	ug/L	100
37) Trichloroethene	5.448	130	544959	102.2898	ug/L	99
38) Dibromomethane	5.862	93	286873	105.5988	ug/L	100
39) 1,2-Dichloropropane	5.966	63	487994	104.9115	ug/L	100
40) Bromodichloromethane	6.050	83	655753	105.6233	ug/L	100
41) 1,4-Dioxane	6.259	88	11272	486.5289	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.632	63	223283	105.8292	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	759853	108.6111	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	117344	101.5337	ug/L	99
45) trans-1,3-Dichloropropene	7.243	75	639506	107.5233	ug/L	100
48) Toluene	6.861	91	2019788	99.9064	ug/L	99
49) Tetrachloroethene	7.185	166	569494	98.7631	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	391353	99.8722	ug/L	100
51) Dibromochloromethane	7.510	129	559220	104.5535	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

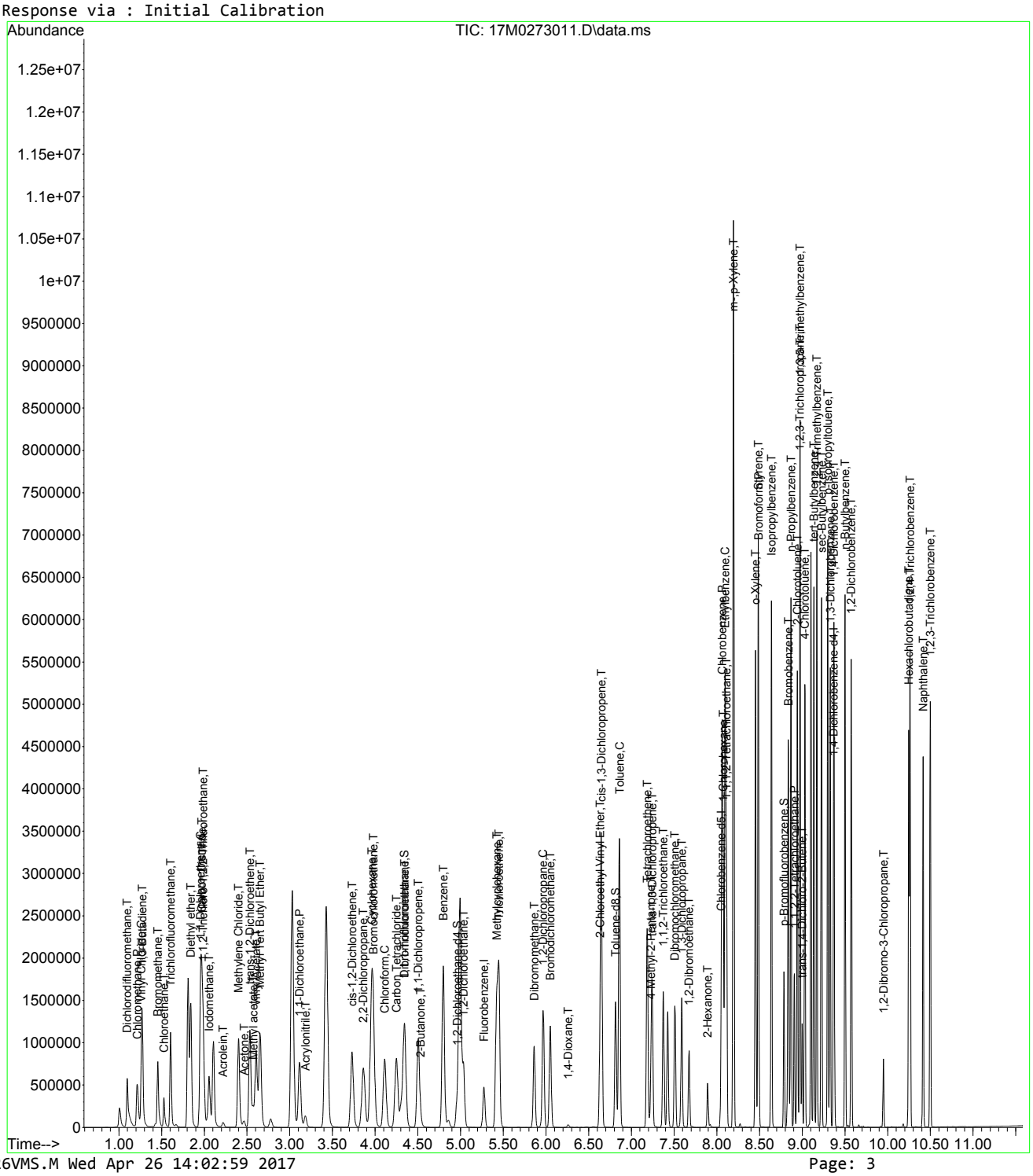
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	628375	100.8998	ug/L		100
53) 1,2-Dibromoethane	7.675	107	404718	100.8074	ug/L		99
54) 2-Hexanone	7.892	43	205809	100.0147	ug/L		100
55) Chlorobenzene	8.063	112	1370148	101.0066	ug/L		100
56) 1-Chlorohexane	8.074	69	110333	100.7444	ug/L		93
57) Ethylbenzene	8.097	106	720227	101.9990	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	539757	102.2182	ug/L		100
59) m-,p-Xylene	8.196	106	1760776	206.6191	ug/L		98
60) o-Xylene	8.453	106	860737	102.5116	ug/L		99
61) Styrene	8.485	104	1437076	106.9660	ug/L		100
62) Bromoform	8.488	173	409507	108.8390	ug/L		100
63) Isopropylbenzene	8.639	105	2195751	101.0295	ug/L		100
65) 1,3,5-Trimethylbenzene	8.975	105	1894143	97.5661	ug/L		100
67) Bromobenzene	8.839	156	656082	95.7737	ug/L		100
68) n-Propylbenzene	8.867	91	2460312	95.6691	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.908	83	459840	98.1628	ug/L		100
70) 2-Chlorotoluene	8.943	91	1511609	95.2292	ug/L		100
71) 1,2,3-Trichloropropane	8.972	110	133032	96.0637	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	104884	101.5987	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.172	105	1913672	97.7541	ug/L		100
74) 4-Chlorotoluene	9.030	91	1517738	95.7730	ug/L		99
75) tert-Butylbenzene	9.137	134	369444	95.2178	ug/L		99
76) sec-Butylbenzene	9.227	105	2287023	95.6223	ug/L		99
77) p-Isopropyltoluene	9.299	119	1998379	98.0160	ug/L		99
78) 1,3-Dichlorobenzene	9.328	146	1155544	96.7618	ug/L		99
79) 1,4-Dichlorobenzene	9.371	146	1146291	95.0753	ug/L		100
80) n-Butylbenzene	9.502	91	1722841	100.1183	ug/L		100
81) 1,2-Dichlorobenzene	9.574	146	1130299	97.1145	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	91272	106.2061	ug/L		99
83) Hexachlorobutadiene	10.246	225	476519	97.1199	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	897981	103.8590	ug/L		100
85) Naphthalene	10.417	128	1727630	102.4678	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	823456	98.0503	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:59 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	422742	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.054	117	336124	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.365	152	172896	25.00000	ug/L	# 0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	457792	100.2715	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 401.086%#			
34) 1,2-Dichloroethane-d4	4.962	65	411299	96.1124	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 384.450%#			
47) Toluene-d8	6.817	98	1632836	97.3388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 389.355%#			
66) p-Bromofluorobenzene	8.789	95	645488	111.5020	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 446.008%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1123418	223.7603	ug/L	100
3) Chloromethane	1.218	50	1006074	204.7589	ug/L	100
4) Vinyl Chloride	1.264	62	1130871	207.8521	ug/L	100
5) 1,3-Butadiene	1.276	54	685580	205.2281	ug/L	100
6) Bromomethane	1.458	94	716567	177.1461	ug/L	99
7) Chloroethane	1.531	64	426821	165.3643	ug/L	97
8) Trichlorofluoromethane	1.606	101	1102484	157.9741	ug/L	99
9) Diethyl ether	1.843	59	3720	1.1053	ug/L	93
10) 1,1-Dichloroethene	1.956	61	1286118	196.9553	ug/L	100
11) Carbon Disulfide	1.971	76	2821100	201.2903	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	825067	198.1856	ug/L	100
13) Iodomethane	2.058	142	1333071	205.2109	ug/L	100
14) Acrolein	2.220	56	2243	5.3954	ug/L	100
15) Methylene Chloride	2.402	84	935406	188.7818	ug/L	100
16) Acetone	2.469	43	158152	186.0640	ug/L	99
17) trans-1,2-Dichloroethene	2.535	96	898207	202.0115	ug/L	100
18) Methyl acetate	2.576	43	529604	237.6658	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	2259635	200.2500	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	1611611	201.8029	ug/L	100
21) Acrylonitrile	3.184	53	143	0.1319	ug/L #	7
22) Vinyl Acetate	2.611	86	152152	212.6197	ug/L	79
23) cis-1,2-Dichloroethene	3.731	96	1025145	203.6866	ug/L	100
24) 2,2-Dichloropropane	3.867	77	1266128	199.3016	ug/L	99
25) Cyclohexane	3.968	56	1443111	212.4544	ug/L	98
26) Bromochloromethane	3.986	130	680841	209.9583	ug/L	100
27) Chloroform	4.116	83	1630953	195.8801	ug/L	100
28) Carbon Tetrachloride	4.252	117	1390908	211.2485	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	1477746	201.8688	ug/L	100
31) 1,1-Dichloropropene	4.507	75	1190890	207.1454	ug/L	100
32) 2-Butanone	4.533	43	254497	200.8340	ug/L	100
33) Benzene	4.799	78	3549706	197.1306	ug/L	100
35) 1,2-Dichloroethane	5.037	62	1109187	197.8242	ug/L	100
36) Methylcyclohexane	5.428	83	1502567	211.1318	ug/L	100
37) Trichloroethene	5.451	130	1086595	200.9018	ug/L	99
38) Dibromomethane	5.862	93	573997	208.1262	ug/L	100
39) 1,2-Dichloropropane	5.969	63	972277	205.8952	ug/L	99
40) Bromodichloromethane	6.053	83	1300334	206.3109	ug/L	100
41) 1,4-Dioxane	6.267	88	427	18.1545	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.635	63	462111	215.7466	ug/L	100
43) cis-1,3-Dichloropropene	6.652	75	1544723	217.4919	ug/L	100
44) 4-Methyl-2-Pentanone	7.231	58	247079	210.5876	ug/L	99
45) trans-1,3-Dichloropropene	7.246	75	1303100	215.8160	ug/L	100
48) Toluene	6.864	91	4027711	191.1271	ug/L	99
49) Tetrachloroethene	7.188	166	1179771	196.2816	ug/L	99
50) 1,1,2-Trichloroethane	7.376	97	783346	191.7811	ug/L	99
51) Dibromochloromethane	7.512	129	1136390	203.8259	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

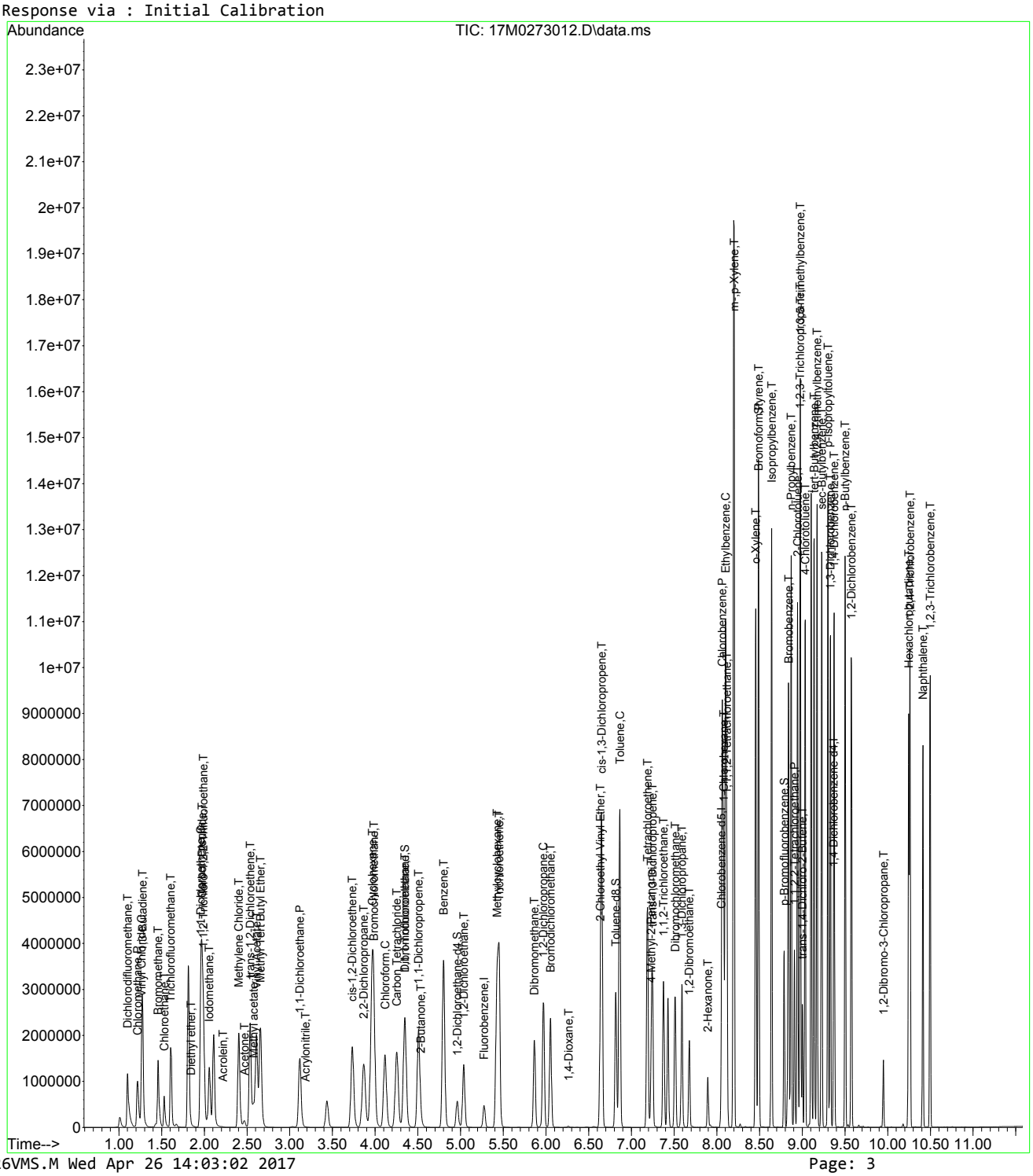
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1259427	194.0084 ug/L	99
53) 1,2-Dibromoethane	7.677	107	819308	195.7778 ug/L	99
54) 2-Hexanone	7.895	43	433472	202.0863 ug/L	99
55) Chlorobenzene	8.062	112	2815311	199.1062 ug/L	99
56) 1-Chlorohexane	8.080	69	241282	211.3571 ug/L	93
57) Ethylbenzene	8.103	106	1512310	205.4678 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.117	131	1104704	200.7023 ug/L	99
59) m-,p-Xylene	8.201	106	3595369	404.7493 ug/L	92
60) o-Xylene	8.456	106	1810464	206.8564 ug/L	97
61) Styrene	8.488	104	3005372	214.6053 ug/L	99
62) Bromoform	8.491	173	876359	223.4506 ug/L	100
63) Isopropylbenzene	8.642	105	4537785	200.3019 ug/L	97
65) 1,3,5-Trimethylbenzene	8.977	105	3876481	201.1221 ug/L	98
67) Bromobenzene	8.841	156	1397197	205.4384 ug/L	100
68) n-Propylbenzene	8.870	91	5099958	199.7489 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.908	83	975708	209.7955 ug/L	100
70) 2-Chlorotoluene	8.946	91	3200183	203.0680 ug/L	99
71) 1,2,3-Trichloropropane	8.975	110	277077	201.5300 ug/L	95
72) trans-1,4-Dichloro-2-B...	9.001	53	221040	215.6681 ug/L #	96
73) 1,2,4-Trimethylbenzene	9.174	105	3801181	195.5789 ug/L	97
74) 4-Chlorotoluene	9.035	91	3225947	205.0404 ug/L	98
75) tert-Butylbenzene	9.140	134	776105	201.4772 ug/L	94
76) sec-Butylbenzene	9.229	105	4546895	191.4871 ug/L	97
77) p-Isopropyltoluene	9.302	119	3910662	193.1992 ug/L	97
78) 1,3-Dichlorobenzene	9.331	146	2355778	198.6954 ug/L	98
79) 1,4-Dichlorobenzene	9.374	146	2315642	193.4552 ug/L	100
80) n-Butylbenzene	9.501	91	3388493	198.3403 ug/L	98
81) 1,2-Dichlorobenzene	9.577	146	2200775	190.4594 ug/L	98
82) 1,2-Dibromo-3-Chloropr...	9.950	75	167553	196.3812 ug/L	100
83) Hexachlorobutadiene	10.246	225	910189	186.8511 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	1714658	199.7517 ug/L	99
85) Naphthalene	10.413	128	3126949	186.8072 ug/L	99
86) 1,2,3-Trichlorobenzene	10.497	180	1583634	189.9325 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	421163	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.051	117	318095	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167190	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.348	111	349	0.0767	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.307%#			
34) 1,2-Dichloroethane-d4	4.994	65	5040	1.1822	ug/L		0.0405
Spiked Amount 25.000	Range 80 - 120		Recovery =	4.729%#			
47) Toluene-d8	6.818	98	3065	0.1931	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.772%#			
66) p-Bromofluorobenzene	8.784	95	2416	0.4316	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.726%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.105	85	6972	1.3939	ug/L		92
3) Chloromethane	1.212	50	17159	3.5053	ug/L		99
4) Vinyl Chloride	1.267	62	3350	0.6180	ug/L		95
5) 1,3-Butadiene	1.276	54	1017883	305.8452	ug/L		100
6) Bromomethane	1.458	94	147661	36.6409	ug/L		99
7) Chloroethane	1.528	64	774	0.3010	ug/L	#	1
8) Trichlorofluoromethane	1.606	101	3390	0.4876	ug/L		94
9) Diethyl ether	1.846	59	976700	291.2984	ug/L		100
10) 1,1-Dichloroethene	1.953	61	4141	0.6365	ug/L		100
11) Carbon Disulfide	1.965	76	4144048	296.7934	ug/L		99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	4030	0.9717	ug/L		99
13) Iodomethane	2.058	142	1505993	232.4313	ug/L		100
14) Acrolein	2.228	56	60168	145.2737	ug/L		99
15) Methylene Chloride	2.405	84	2234	0.4526	ug/L		97
16) Acetone	2.475	43	227499	268.6534	ug/L		100
17) trans-1,2-Dichloroethene	2.538	96	4122	0.9305	ug/L		98
18) Methyl acetate	2.579	43	793361	357.3646	ug/L	#	97
19) Methyl Tert Butyl Ether	2.666	73	1685	0.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	1574	0.1978	ug/L		92
21) Acrylonitrile	3.190	53	164892	152.6638	ug/L		100
22) Vinyl Acetate	2.608	86	202937	284.6507	ug/L		82
23) cis-1,2-Dichloroethene	3.740	96	2225	0.4437	ug/L		93
24) 2,2-Dichloropropane	3.873	77	904	0.4162	ug/L	#	81
25) Cyclohexane	3.969	56	2110437	311.8629	ug/L		99
26) Bromochloromethane	3.986	130	800	0.2476	ug/L		99
27) Chloroform	4.119	83	2791	0.3365	ug/L		95
28) Carbon Tetrachloride	4.258	117	2228	0.3397	ug/L		99
30) 1,1,1-Trichloroethane	4.348	97	1716	0.2353	ug/L		97
31) 1,1-Dichloropropene	4.504	75	5532	0.9659	ug/L	#	1
32) 2-Butanone	4.533	43	386102	305.8312	ug/L	#	75
33) Benzene	4.802	78	6042	0.3368	ug/L		98
35) 1,2-Dichloroethane	5.034	62	890	0.1593	ug/L	#	55
36) Methylcyclohexane	5.428	83	2089398	294.6906	ug/L		99
37) Trichloroethene	5.451	130	4538	0.8422	ug/L		96
38) Dibromomethane	5.862	93	711	0.2588	ug/L		99
39) 1,2-Dichloropropane	5.972	63	809	0.1720	ug/L	#	75
40) Bromodichloromethane	6.050	83	1149	0.1830	ug/L		94
41) 1,4-Dioxane	6.262	88	15860	676.8366	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.635	63	704063	329.9396	ug/L		99
43) cis-1,3-Dichloropropene	6.653	75	3088	0.4364	ug/L		94
44) 4-Methyl-2-Pentanone	7.229	58	356679	305.1404	ug/L		89
45) trans-1,3-Dichloropropene	7.246	75	2608	0.4335	ug/L	#	44
48) Toluene	6.858	91	10685	0.5358	ug/L		100
49) Tetrachloroethene	7.185	166	7101	1.2484	ug/L		99
50) 1,1,2-Trichloroethane	7.373	97	542	0.1402	ug/L	#	65
51) Dibromochloromethane	7.510	129	818	0.1550	ug/L		98

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

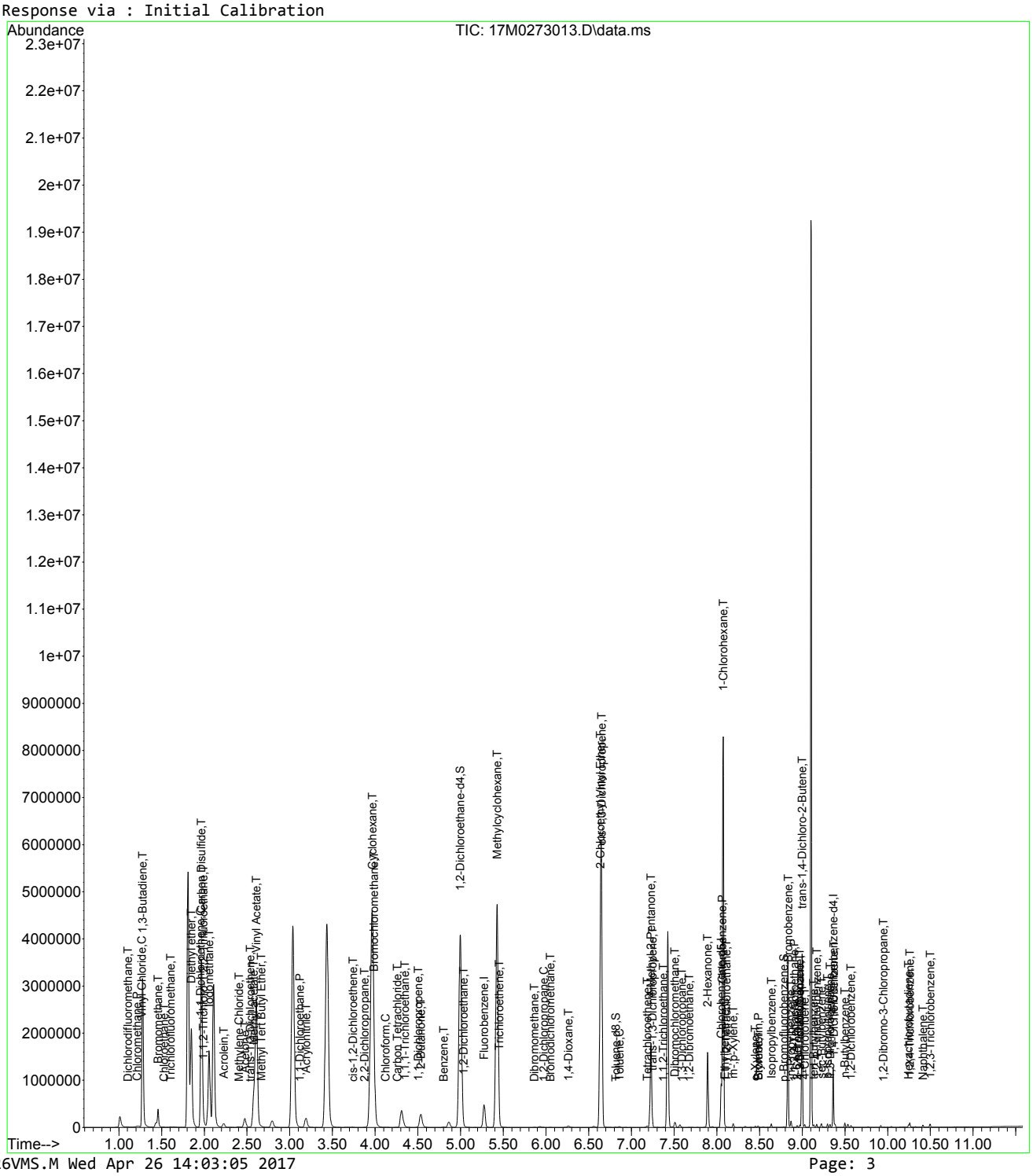
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1557	0.2534	ug/L		96
53) 1,2-Dibromoethane	7.677	107	1315	0.3320	ug/L		83
54) 2-Hexanone	7.892	43	628976	309.8508	ug/L		99
55) Chlorobenzene	8.063	112	8335	0.6229	ug/L	#	1
56) 1-Chlorohexane	8.074	69	332865	308.1078	ug/L	#	1
57) Ethylbenzene	8.094	106	4492	0.6449	ug/L	#	1
58) 1,1,1,2-Tetrachloroethane	8.112	131	902	0.1732	ug/L		85
59) m-,p-Xylene	8.193	106	12446	1.4805	ug/L		92
60) o-Xylene	8.451	106	4066	0.4909	ug/L		99
61) Styrene	8.485	104	8240	0.6217	ug/L		98
62) Bromoform	8.485	173	663	0.1786	ug/L	#	79
63) Isopropylbenzene	8.639	105	23066	1.0759	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	14997	0.8046	ug/L		97
67) Bromobenzene	8.836	156	4020	0.6113	ug/L	#	1
68) n-Propylbenzene	8.865	91	32164	1.3028	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	643	0.1430	ug/L		99
70) 2-Chlorotoluene	8.940	91	11336	0.7439	ug/L		97
71) 1,2,3-Trichloropropane	8.972	110	252	0.1895	ug/L	#	1
72) trans-1,4-Dichloro-2-B...	8.998	53	334602	337.6122	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	15648	0.8326	ug/L		99
74) 4-Chlorotoluene	9.030	91	16738	1.1002	ug/L		100
75) tert-Butylbenzene	9.134	134	2631	0.7063	ug/L		98
76) sec-Butylbenzene	9.224	105	25971	1.1311	ug/L		99
77) p-Isopropyltoluene	9.296	119	20909	1.0682	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	13448	1.1730	ug/L		98
79) 1,4-Dichlorobenzene	9.368	146	14447	1.2481	ug/L		96
80) n-Butylbenzene	9.499	91	25212	1.5261	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	8203	0.7341	ug/L		98
82) 1,2-Dibromo-3-Chloropr...	9.947	75	274	0.3321	ug/L		74
83) Hexachlorobutadiene	10.243	225	5645	1.1984	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	15501	1.8674	ug/L		99
85) Naphthalene	10.414	128	18220	1.1256	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	11288	1.4000	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

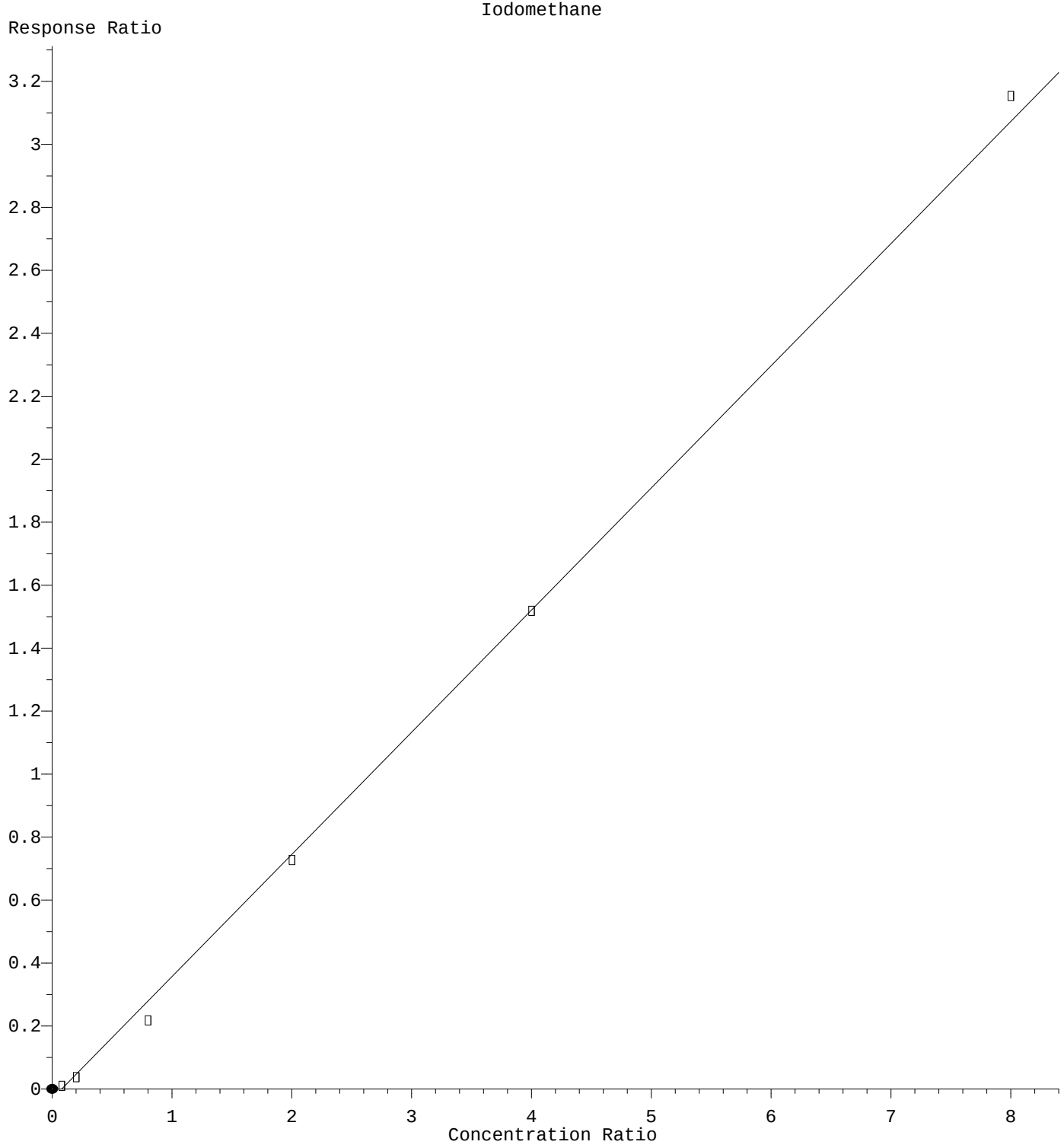
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

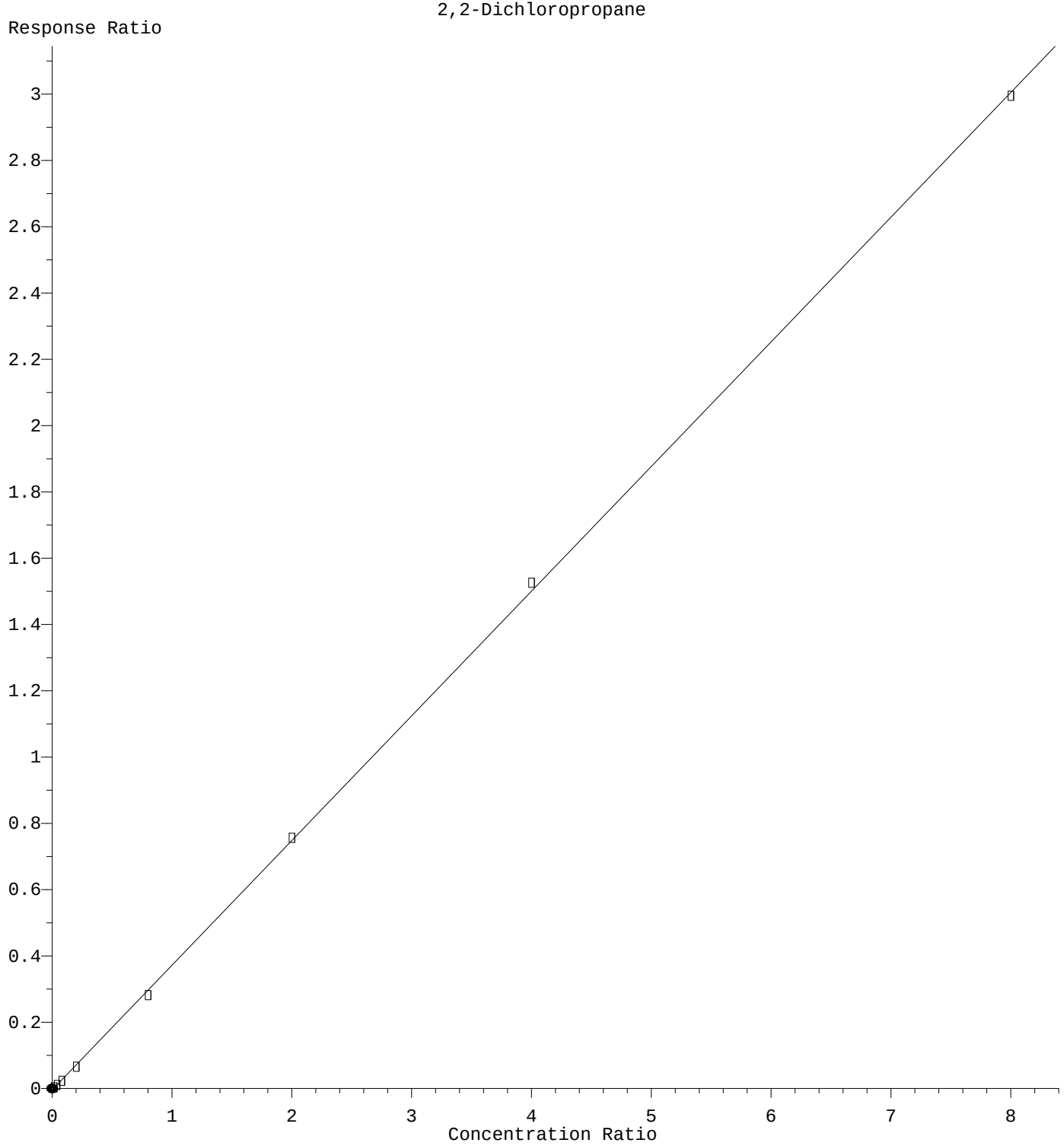
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:05 2017 Page: 3



Response = 3.879e-001 * Amt - 3.105e-002
Coef of Det (r^2) = 0.996358 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017



Response = 3.762e-001 * Amt - 4.116e-003
Coef of Det (r^2) = 0.999589 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	427426	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	325357	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	172416	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115154	24.9461	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.784%			
34) 1,2-Dichloroethane-d4	4.956	65	107614	24.8717	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.487%			
47) Toluene-d8	6.812	98	413254	25.4507	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.803%			
66) p-Bromofluorobenzene	8.786	95	146143	25.3151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.260%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.091	85	340360	67.0494	ug/L	100
3) Chloromethane	1.209	50	296192	59.6212	ug/L	99
4) Vinyl Chloride	1.256	62	335286	60.9497	ug/L	100
5) 1,3-Butadiene	1.267	54	281377	83.3070	ug/L	99
6) Bromomethane	1.450	94	177201	43.3267	ug/L	99
7) Chloroethane	1.519	64	108932	41.7413	ug/L	99
8) Trichlorofluoromethane	1.597	101	225737	31.9912	ug/L	100
9) Diethyl ether	1.841	59	316851	93.1153	ug/L	100
10) 1,1-Dichloroethene	1.939	61	284785	43.1339	ug/L	100
11) Carbon Disulfide	1.951	76	621205	43.8383	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.971	101	212873	50.5729	ug/L	99
13) Iodomethane	2.043	142	436680	67.8380	ug/L	100
14) Acrolein	2.220	56	42666	101.5062	ug/L	100
15) Methylene Chloride	2.394	84	222390	44.3905	ug/L	99
16) Acetone	2.472	43	42575	49.5401	ug/L	99
17) trans-1,2-Dichloroethene	2.524	96	211286	46.9986	ug/L	100
18) Methyl acetate	2.585	43	266388	118.2346	ug/L #	77
19) Methyl Tert Butyl Ether	2.657	73	586859	51.4378	ug/L #	100
20) 1,1-Dichloroethane	3.106	63	386650	47.8850	ug/L	100
21) Acrylonitrile	3.184	53	55958	51.0491	ug/L	100
22) Vinyl Acetate	2.593	86	33146	45.8112	ug/L #	1
23) cis-1,2-Dichloroethene	3.720	96	246047	48.3515	ug/L	100
24) 2,2-Dichloropropane	3.853	77	277540	43.4231	ug/L	100
25) Cyclohexane	3.951	56	319980	46.5911	ug/L	92
26) Bromochloromethane	3.974	130	161439	49.2391	ug/L	100
27) Chloroform	4.108	83	411531	48.8839	ug/L	100
28) Carbon Tetrachloride	4.241	117	326387	49.0278	ug/L	100
30) 1,1,1-Trichloroethane	4.336	97	369604	49.9368	ug/L	100
31) 1,1-Dichloropropene	4.496	75	278322	47.8813	ug/L	100
32) 2-Butanone	4.533	43	64598	50.4183	ug/L #	77
33) Benzene	4.791	78	864999	47.5107	ug/L	100
35) 1,2-Dichloroethane	5.028	62	268041	47.2814	ug/L	100
36) Methylcyclohexane	5.416	83	337902	46.9597	ug/L	99
37) Trichloroethene	5.442	130	264383	48.3464	ug/L	100
38) Dibromomethane	5.859	93	136084	48.8021	ug/L	100
39) 1,2-Dichloropropane	5.964	63	232197	48.6326	ug/L	100
40) Bromodichloromethane	6.047	83	305406	47.9247	ug/L	100
41) 1,4-Dioxane	6.268	88	4924	207.0561	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	119939	55.3825	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	366582	51.0479	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	61610	51.9353	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	294490	48.2382	ug/L	100
48) Toluene	6.855	91	962641	47.1919	ug/L	100
49) Tetrachloroethene	7.182	166	271333	46.6363	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	183455	46.4003	ug/L	100
51) Dibromochloromethane	7.507	129	255775	47.3947	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

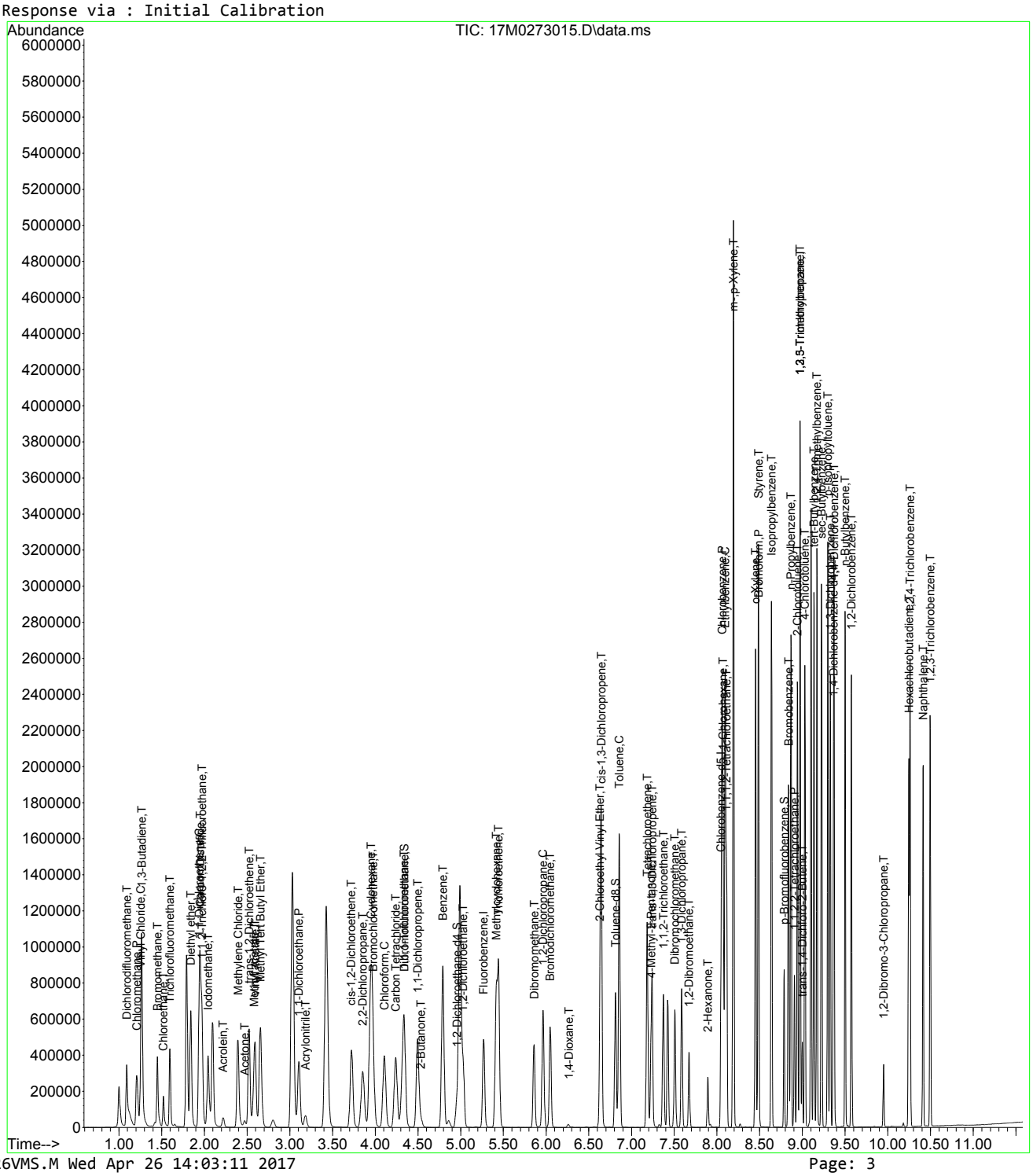
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	304079	48.3920	ug/L		100
53) 1,2-Dibromoethane	7.672	107	188269	46.4766	ug/L		99
54) 2-Hexanone	7.892	43	111735	53.8151	ug/L		99
55) Chlorobenzene	8.060	112	645652	47.1733	ug/L		100
56) 1-Chlorohexane	8.071	69	57184	51.7495	ug/L		92
57) Ethylbenzene	8.094	106	338763	47.5487	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.112	131	249632	46.8539	ug/L		99
59) m-,p-Xylene	8.193	106	824011	95.8330	ug/L		100
60) o-Xylene	8.451	106	407790	48.1343	ug/L		99
61) Styrene	8.485	104	676703	49.9206	ug/L		100
62) Bromoform	8.488	173	186092	49.0192	ug/L		100
63) Isopropylbenzene	8.639	105	1026933	46.8298	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	881437	45.8586	ug/L		100
67) Bromobenzene	8.839	156	305375	45.0262	ug/L		98
68) n-Propylbenzene	8.865	91	1132307	44.4723	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	209471	45.1656	ug/L		100
70) 2-Chlorotoluene	8.940	91	699415	44.5050	ug/L		99
71) 1,2,3-Trichloropropane	8.972	110	63151	46.0603	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	41660	40.7607	ug/L	#	93
73) 1,2,4-Trimethylbenzene	9.169	105	890512	45.9463	ug/L		100
74) 4-Chlorotoluene	9.030	91	720079	45.8955	ug/L		100
75) tert-Butylbenzene	9.134	134	171753	44.7113	ug/L		99
76) sec-Butylbenzene	9.224	105	1059058	44.7251	ug/L		100
77) p-Isopropyltoluene	9.296	119	926654	45.9071	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	527115	44.5827	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	537479	45.0275	ug/L		100
80) n-Butylbenzene	9.499	91	781454	45.8686	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	530951	46.0775	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	39964	46.9704	ug/L		96
83) Hexachlorobutadiene	10.246	225	211253	43.4885	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	408655	47.7394	ug/L		100
85) Naphthalene	10.414	128	784767	47.0133	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	377306	45.3780	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:11 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	102	0.000
2	T	Dichlorodifluoromethane	50.000	67.049	-34.1#	124	0.000
3	P	Chloromethane	50.000	59.621	-19.2	123	0.000
4	C	Vinyl Chloride	50.000	60.950	-21.9#	122	0.000
5	T	1,3-Butadiene	50.000	83.307	-66.6#	165	0.000
6	T	Bromomethane	50.000	43.327	13.3	96	0.000
7	T	Chloroethane	50.000	41.741	16.5	96	0.000
8	T	Trichlorofluoromethane	50.000	31.991	36.0#	61	-0.018
9	T	Diethyl ether	100.000	93.115	6.9	92	0.000
10	C	1,1-Dichloroethene	50.000	43.134	13.7#	88	-0.017
11	T	Carbon Disulfide	50.000	43.838	12.3	87	-0.020
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	50.573	-1.1	100	-0.017
13	T	Iodomethane	50.000	67.838	-35.7#	144	-0.015
14	T	Acrolein	50.000	101.506	-103.0#	193	0.000
15	T	Methylene Chloride	50.000	44.390	11.2	95	0.000
16	T	Acetone	50.000	49.540	0.9	105	0.012
17	T	trans-1,2-Dichloroethene	50.000	46.999	6.0	96	0.000
18	T	Methyl acetate	50.000	118.235	-136.5#	207	0.018
19	T	Methyl Tert Butyl Ether	50.000	51.438	-2.9	102	0.000
20	P	1,1-Dichloroethane	50.000	47.885	4.2	97	0.000
21	T	Acrylonitrile	50.000	51.049	-2.1	100	0.000
22	T	Vinyl Acetate	50.000	45.811	8.4	88	-0.015
23	T	cis-1,2-Dichloroethene	50.000	48.351	3.3	98	0.000
24	T	2,2-Dichloropropane	50.000	43.423	13.2	88	0.000
25	T	Cyclohexane	50.000	46.591	6.8	91	-0.012
26	T	Bromochloromethane	50.000	49.239	1.5	97	0.000
27	C	Chloroform	50.000	48.884	2.2#	101	0.000
28	T	Carbon Tetrachloride	50.000	49.028	1.9	96	0.000
29	S	Dibromofluoromethane	25.000	24.946	0.2	99	0.000
30	T	1,1,1-Trichloroethane	50.000	49.937	0.1	101	0.000
31	T	1,1-Dichloropropene	50.000	47.881	4.2	95	0.000
32	T	2-Butanone	50.000	50.418	-0.8	102	0.000
33	T	Benzene	50.000	47.511	5.0	98	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.872	0.5	99	0.000
35	T	1,2-Dichloroethane	50.000	47.281	5.4	96	0.000
36	T	Methylcyclohexane	50.000	46.960	6.1	92	0.000
37	T	Trichloroethene	50.000	48.346	3.3	99	0.000
38	T	Dibromomethane	50.000	48.802	2.4	97	0.000
39	C	1,2-Dichloropropane	50.000	48.633	2.7#	97	0.000
40	T	Bromodichloromethane	50.000	47.925	4.2	96	0.000
41	T	1,4-Dioxane	200.000	207.056	-3.5	106	0.012
42	T	2-Chloroethyl Vinyl Ether	50.000	55.383	-10.8	112	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.048	-2.1	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	51.935	-3.9	106	0.000
45	T	trans-1,3-Dichloropropene	50.000	48.238	3.5	93	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.451	-1.8	102	0.000
48	C	Toluene	50.000	47.192	5.6#	96	0.000
49	T	Tetrachloroethene	50.000	46.636	6.7	95	0.000
50	T	1,1,2-Trichloroethane	50.000	46.400	7.2	94	0.000
51	T	Dibromochloromethane	50.000	47.395	5.2	93	0.000
52	T	1,3-Dichloropropane	50.000	48.392	3.2	98	0.000
53	T	1,2-Dibromoethane	50.000	46.477	7.0	93	0.000
54	T	2-Hexanone	50.000	53.815	-7.6	109	0.000
55	P	Chlorobenzene	50.000	47.173	5.7	96	0.000
56	T	1-Chlorohexane	50.000	51.749	-3.5	101	0.000
57	C	Ethylbenzene	50.000	47.549	4.9#	96	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	46.854	6.3	95	0.000
59	T	m-,p-Xylene	100.000	95.833	4.2	95	0.000
60	T	o-Xylene	50.000	48.134	3.7	96	0.000
61	T	Styrene	50.000	49.921	0.2	97	0.000
62	P	Bromoform	50.000	49.019	2.0	92	0.000
63	T	Isopropylbenzene	50.000	46.830	6.3	94	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	103	0.000
65	T	1,3,5-Trimethylbenzene	50.000	45.859	8.3	94	0.000
66	S	p-Bromofluorobenzene	25.000	25.315	-1.3	103	0.000
67	T	Bromobenzene	50.000	45.026	9.9	95	0.000
68	T	n-Propylbenzene	50.000	44.472	11.1	91	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.166	9.7	88	0.000
70	T	2-Chlorotoluene	50.000	44.505	11.0	93	0.000
71	T	1,2,3-Trichloropropane	50.000	46.060	7.9	95	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	40.761	18.5	77	0.000
73	T	1,2,4-Trimethylbenzene	50.000	45.946	8.1	94	0.000
74	T	4-Chlorotoluene	50.000	45.895	8.2	95	0.000
75	T	tert-Butylbenzene	50.000	44.711	10.6	94	0.000
76	T	sec-Butylbenzene	50.000	44.725	10.5	91	0.000
77	T	p-Isopropyltoluene	50.000	45.907	8.2	91	0.000
78	T	1,3-Dichlorobenzene	50.000	44.583	10.8	92	0.000
79	T	1,4-Dichlorobenzene	50.000	45.027	9.9	94	0.000
80	T	n-Butylbenzene	50.000	45.869	8.3	89	0.000
81	T	1,2-Dichlorobenzene	50.000	46.077	7.8	95	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.970	6.1	90	0.000
83	T	Hexachlorobutadiene	50.000	43.488	13.0	86	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.739	4.5	92	0.000
85	T	Naphthalene	50.000	47.013	6.0	90	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.378	9.2	89	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:24 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

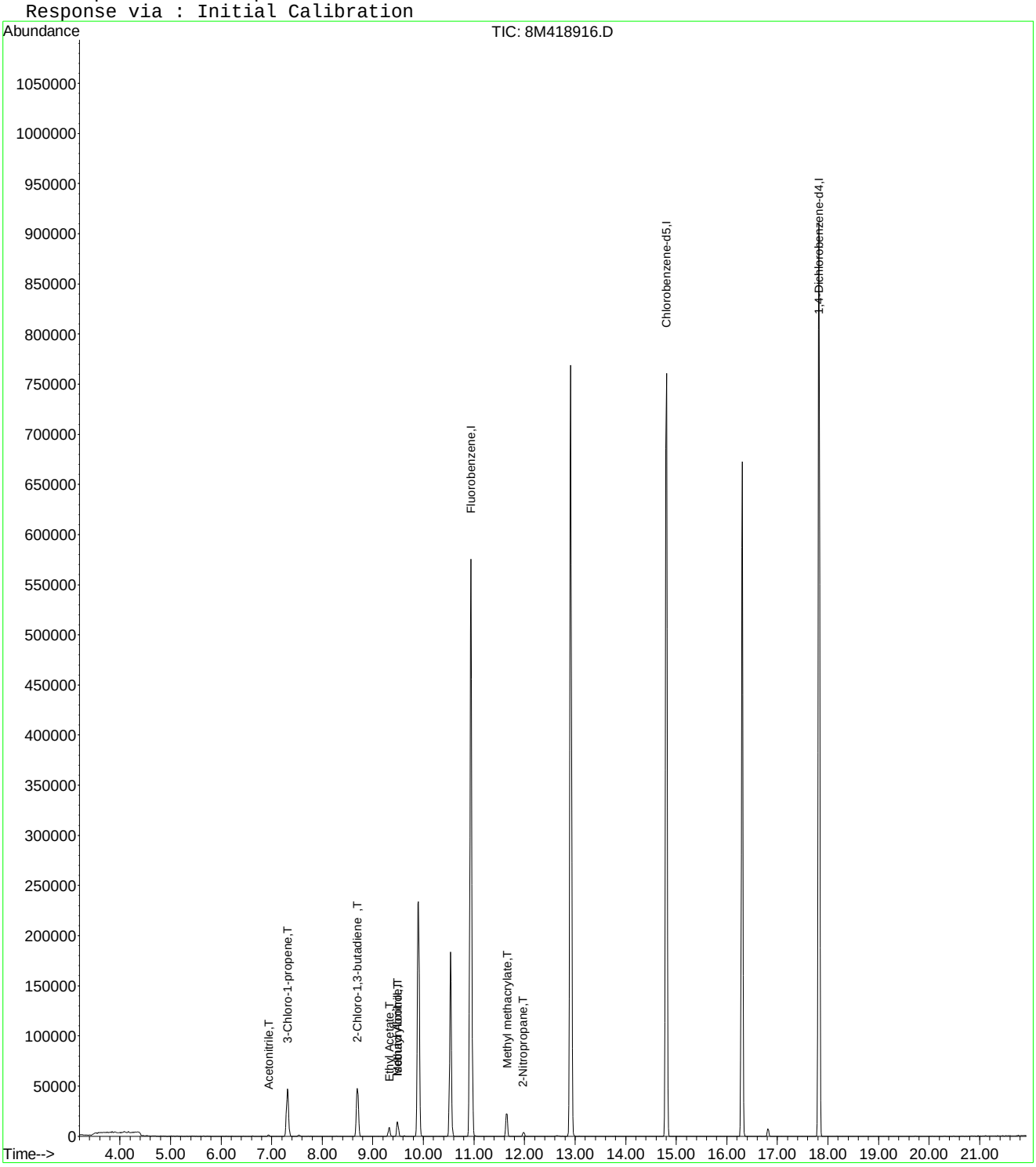
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746277	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	612130	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	333789	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.95	41	1710	4.5291	ug/L		90
3) 3-Chloro-1-propene	7.31	41	46601	4.6885	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	42607	4.4258	ug/L		60
5) Ethyl Acetate	9.33	43	14817	4.8044	ug/L		100
6) Methacrylonitrile	9.49	67	7777	4.3375	ug/L	#	64
7) Isobutyl Alcohol	9.49	43	409	3.2163	ug/L	#	8
9) Methyl methacrylate	11.65	41	14303	4.3932	ug/L	#	57
10) 2-Nitropropane	11.97	43	3479	3.6066	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418916.D A9FOOWT.M Mon Jul 03 11:20:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418916.D A9FOOWT.M Mon Jul 03 11:20:25 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	-1.0000	4.5291	0.0	100	0.01
3	T	3-Chloro-1-propene	5.0000	4.6885	6.2	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.4258	11.5	100	0.00
5	T	Ethyl Acetate	5.0000	4.8044	3.9	100	0.01
6	T	Methacrylonitrile	5.0000	4.3375	13.2	100	0.00
7	T	Isobutyl Alcohol	-1.0000	3.2163	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.41#
9	T	Methyl methacrylate	5.0000	4.3932	12.1	100	0.01
10	T	2-Nitropropane	-1.0000	3.6066	0.0	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	0.0000	0.0	0	-16.07#

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418916.D A9FOOWT.M Fri Apr 14 14:10:53 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:26 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

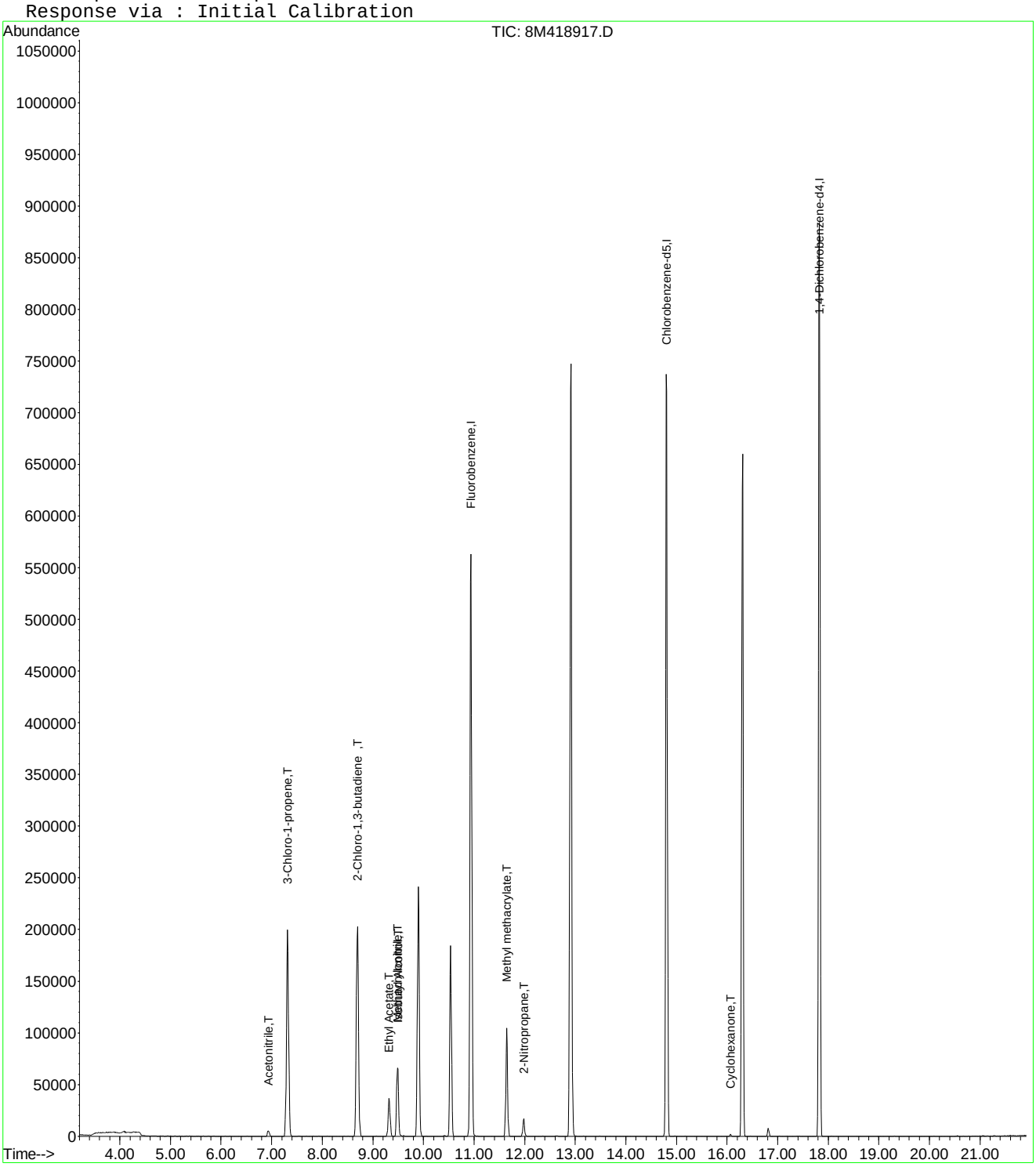
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746151	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	609753	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	336388	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	7512	19.8997	ug/L		98
3) 3-Chloro-1-propene	7.31	41	187894	18.9072	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	178575	18.5528	ug/L		58
5) Ethyl Acetate	9.32	43	60325	19.5637	ug/L		93
6) Methacrylonitrile	9.48	67	35176	19.6222	ug/L	#	56
7) Isobutyl Alcohol	9.49	43	3848	30.2653	ug/L	#	98
9) Methyl methacrylate	11.64	41	60538	18.5974	ug/L		57
10) 2-Nitropropane	11.99	43	15961	16.5493	ug/L		97
13) Cyclohexanone	16.07	55	1572	15.8886	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418917.D A9FOOWT.M Mon Jul 03 11:20:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.8997	0.5	100	0.00
3	T	3-Chloro-1-propene	20.0000	18.9072	5.5	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	18.5528	7.2	100	0.00
5	T	Ethyl Acetate	20.0000	19.5637	2.2	100	0.00
6	T	Methacrylonitrile	20.0000	19.6222	1.9	100	0.00
7	T	Isobutyl Alcohol	-1.0000	30.2653	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	20.0000	18.5974	7.0	100	0.00
10	T	2-Nitropropane	20.0000	16.5493	17.3	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	15.8886	20.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418917.D A9FOOWT.M Fri Apr 14 14:07:45 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

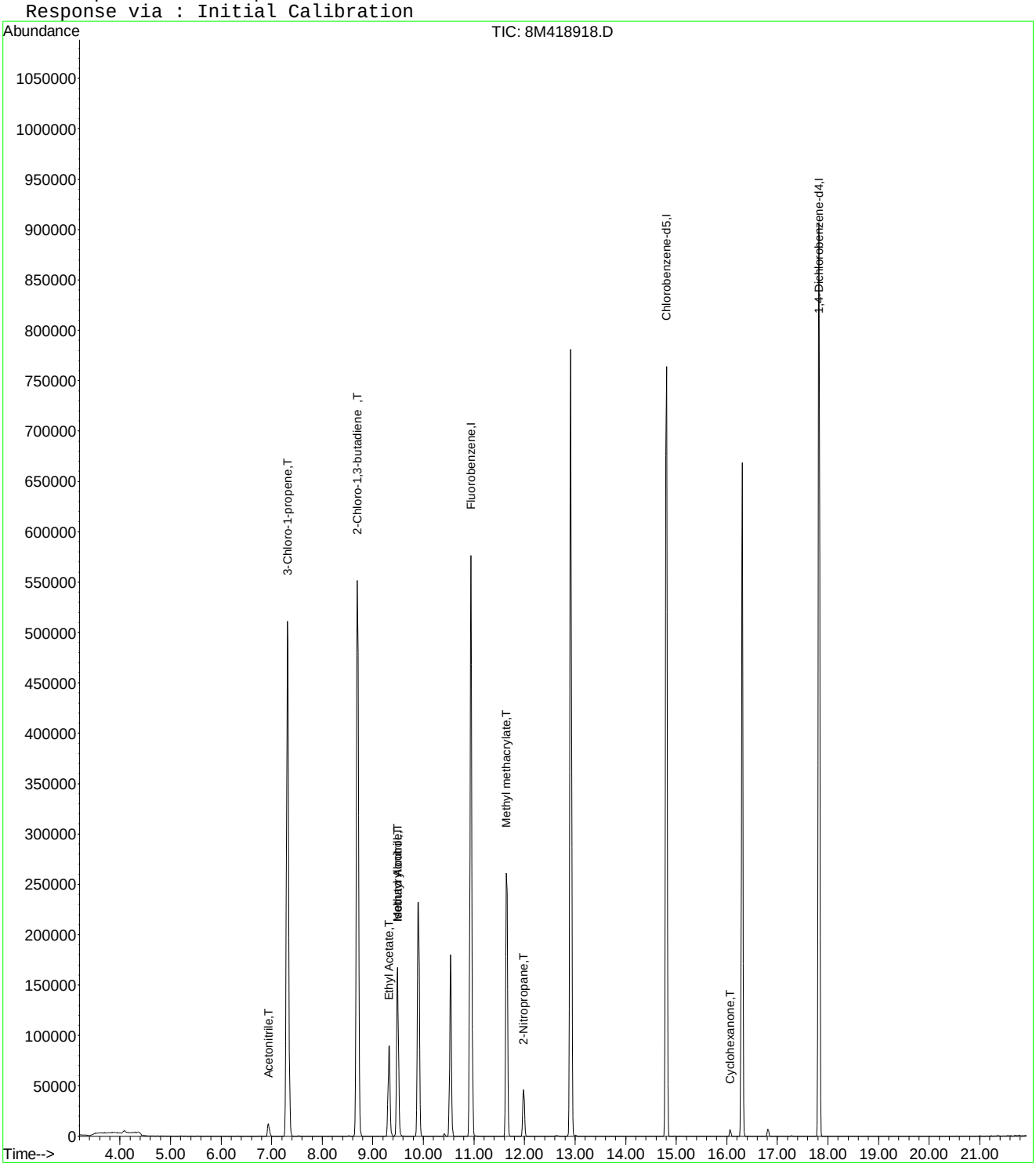
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	742498	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	604990	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	330523	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	17705	47.1322	ug/L		98
3) 3-Chloro-1-propene	7.31	41	486302	49.1759	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	471228	49.1983	ug/L		59
5) Ethyl Acetate	9.32	43	145956	47.5671	ug/L		92
6) Methacrylonitrile	9.49	67	84850	47.5646	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	10376	82.0109	ug/L		100
9) Methyl methacrylate	11.64	41	152652	47.1258	ug/L		59
10) 2-Nitropropane	11.98	43	41969	43.7301	ug/L		97
13) Cyclohexanone	16.07	55	4089	42.0619	ug/L	#	58

(#) = qualifier out of range (m) = manual integration
8M418918.D A9FOOWT.M Mon Jul 03 11:20:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	47.1322	5.7	100	0.00
3	T	3-Chloro-1-propene	50.0000	49.1759	1.6	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	49.1983	1.6	100	0.00
5	T	Ethyl Acetate	50.0000	47.5671	4.9	100	0.00
6	T	Methacrylonitrile	50.0000	47.5646	4.9	100	0.00
7	T	Isobutyl Alcohol	100.0000	82.0109	18.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	50.0000	47.1258	5.7	100	0.00
10	T	2-Nitropropane	50.0000	43.7301	12.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	42.0619	15.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418918.D A9FOOWT.M Fri Apr 14 14:08:07 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:30 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

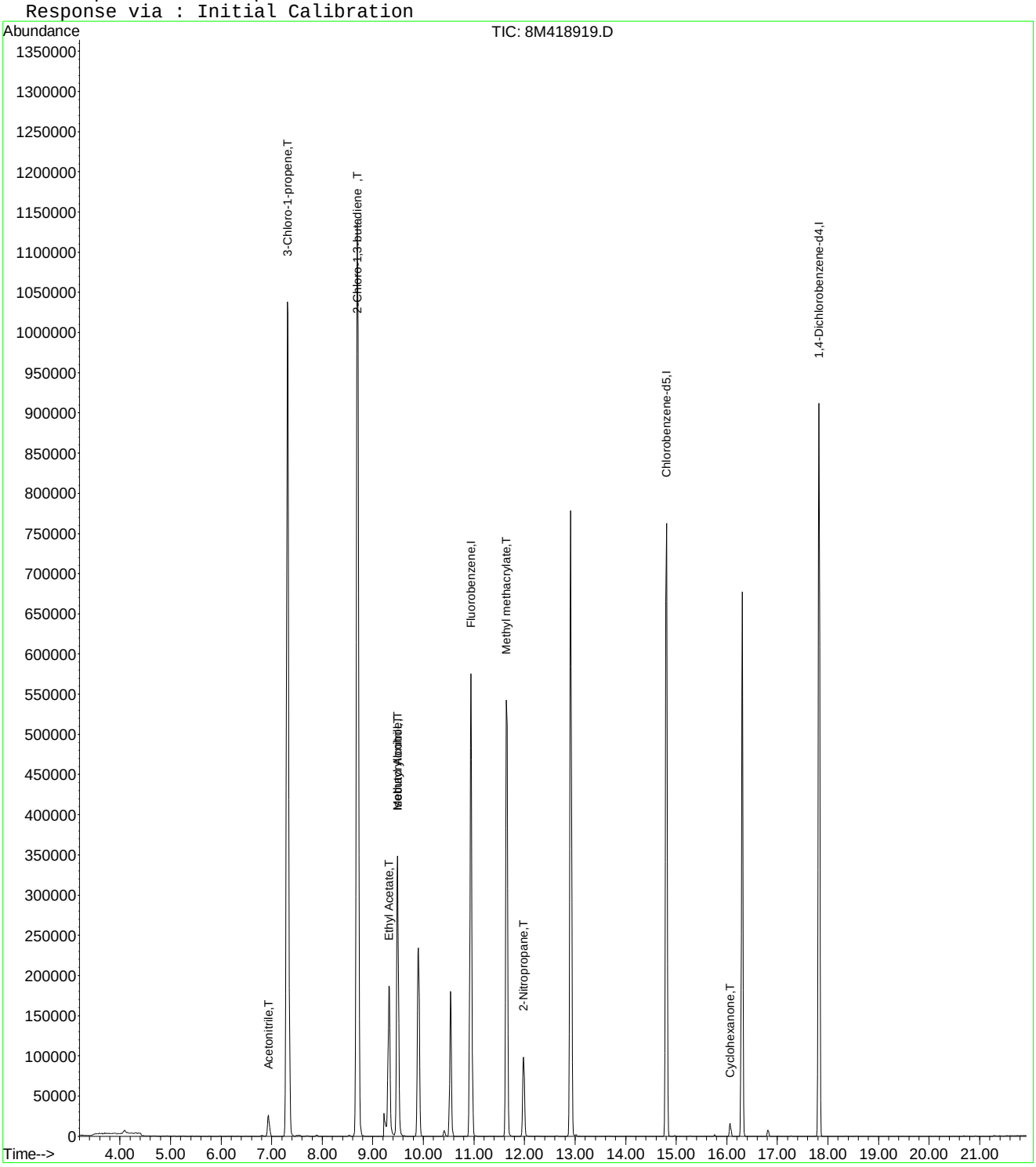
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	739808	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	600111	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	325970	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	37316	99.6994	ug/L		97
3) 3-Chloro-1-propene	7.31	41	997371	101.2231	ug/L		83
4) 2-Chloro-1,3-butadiene	8.69	53	975175	102.1828	ug/L		59
5) Ethyl Acetate	9.32	43	298184	97.5316	ug/L		91
6) Methacrylonitrile	9.49	67	175302	98.6268	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	23313	184.9338	ug/L		94
9) Methyl methacrylate	11.64	41	318110	98.5622	ug/L		58
10) 2-Nitropropane	11.98	43	93106	97.3657	ug/L		99
13) Cyclohexanone	16.07	55	9597	100.0994	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	99.6994	0.3	100	0.00
3	T	3-Chloro-1-propene	100.0000	101.2231	-1.2	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	102.1828	-2.2	100	0.00
5	T	Ethyl Acetate	100.0000	97.5315	2.5	100	0.00
6	T	Methacrylonitrile	100.0000	98.6268	1.4	100	0.00
7	T	Isobutyl Alcohol	200.0000	184.9338	7.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	100.0000	98.5622	1.4	100	0.00
10	T	2-Nitropropane	100.0000	97.3657	2.6	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	100.0994	-0.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:08:27 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:32 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

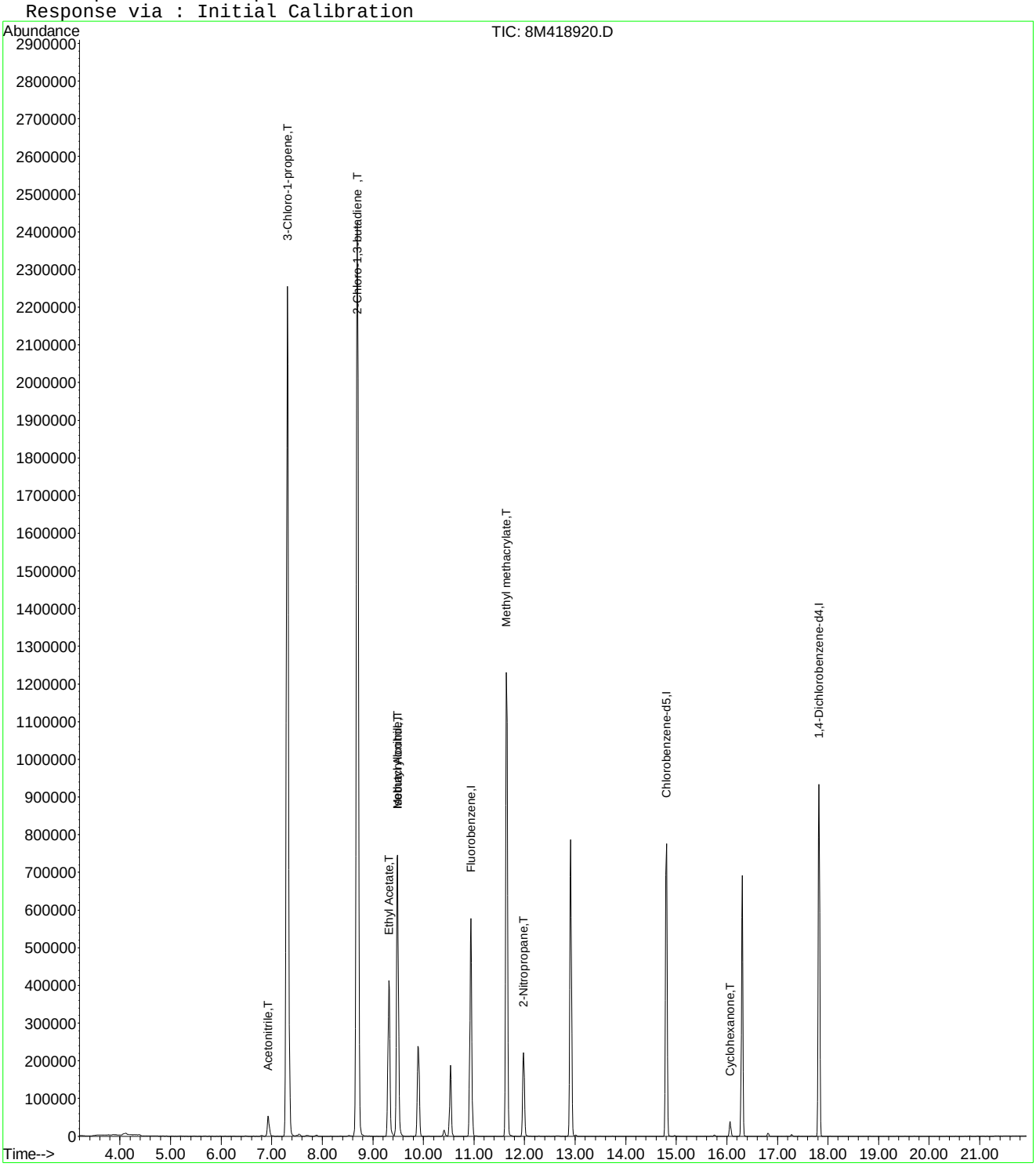
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	757530	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	615643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	339067	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	77830	203.0784	ug/L		95
3) 3-Chloro-1-propene	7.31	41	2094851	207.6324	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	2059315	210.7353	ug/L		59
5) Ethyl Acetate	9.31	43	656953	209.8526	ug/L		92
6) Methacrylonitrile	9.49	67	384959	211.5153	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	53170	411.9115	ug/L		94
9) Methyl methacrylate	11.64	41	704517	213.1786	ug/L		59
10) 2-Nitropropane	11.98	43	205555	209.9305	ug/L		100
13) Cyclohexanone	16.07	55	21273	213.3128	ug/L	#	65

(#) = qualifier out of range (m) = manual integration
8M418920.D A9FOOWT.M Mon Jul 03 11:20:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41:23 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

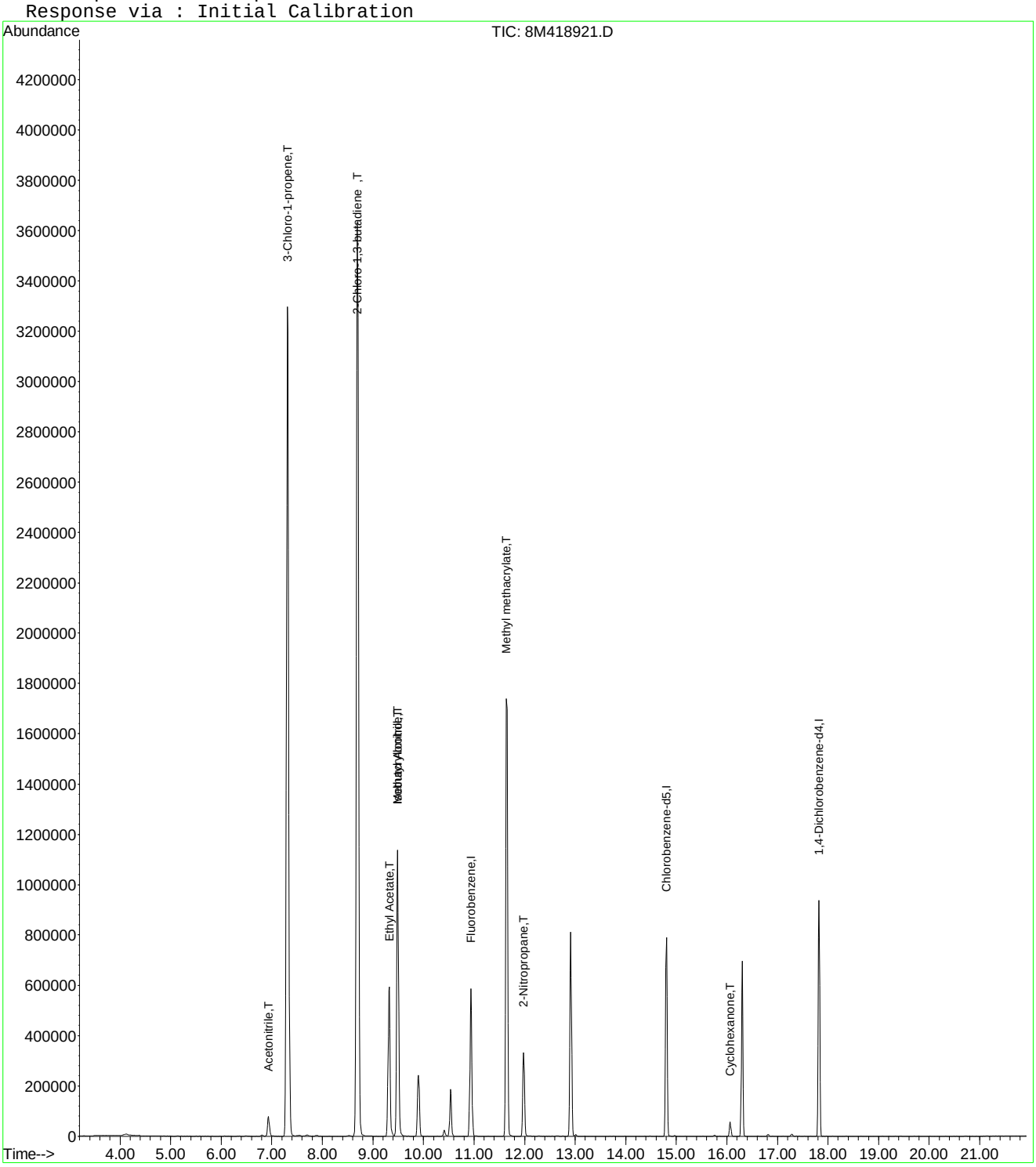
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	760698	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	622355	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	340966	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	112530	292.3968	ug/L		96
3) 3-Chloro-1-propene	7.31	41	3114799	307.4394	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	3064882	312.3316	ug/L		58
5) Ethyl Acetate	9.32	43	942946	299.9538	ug/L		92
6) Methacrylonitrile	9.49	67	556822	304.6711	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	76292	588.5777	ug/L		95
9) Methyl methacrylate	11.64	41	1020819	307.6014	ug/L		57
10) 2-Nitropropane	11.98	43	308845	314.1056	ug/L		97
13) Cyclohexanone	16.07	55	30268	301.8189	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418921.D 8260BWT.M Fri Apr 14 13:48:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:36 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

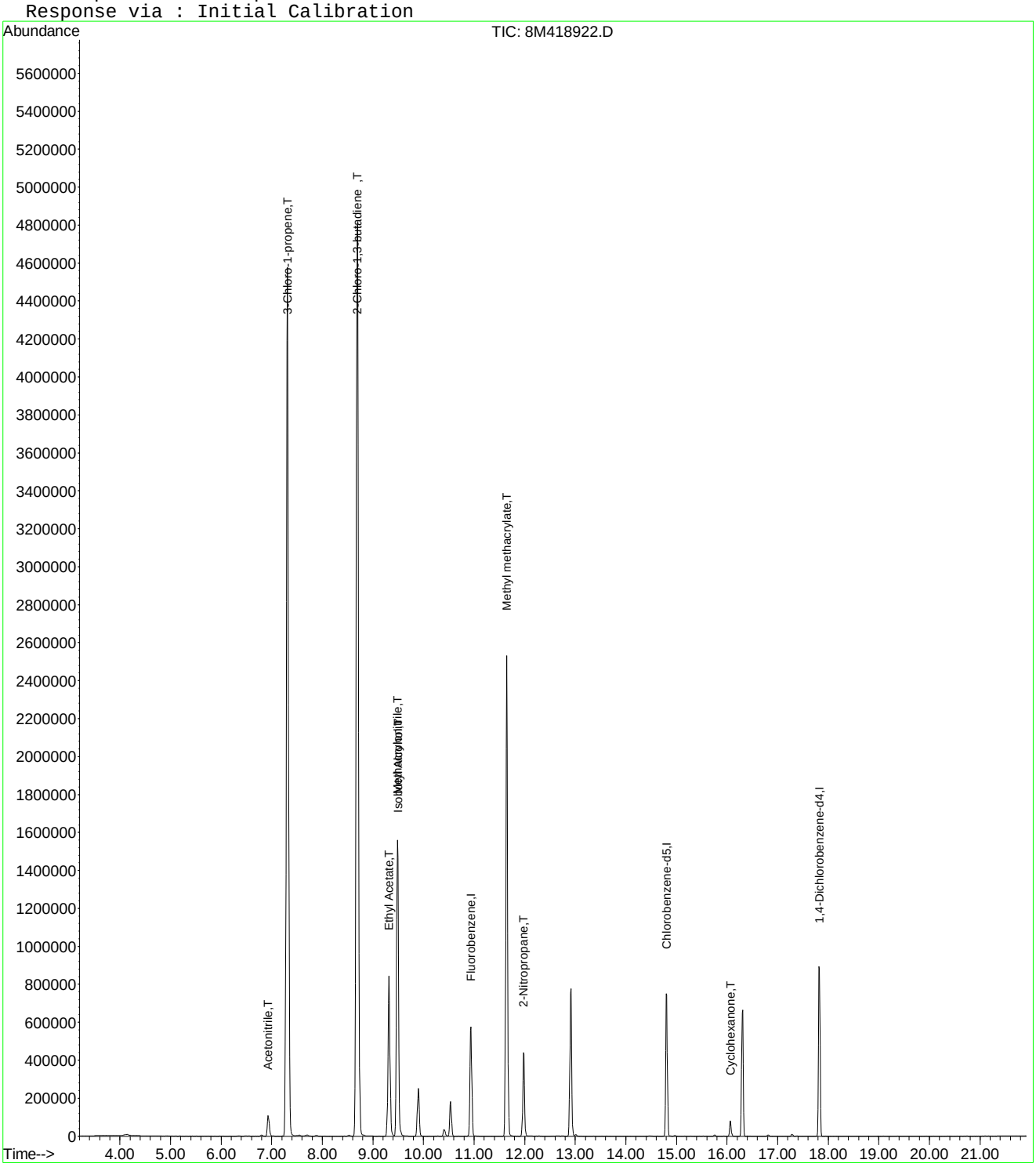
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	765828	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	627777	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	342670	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	158097	408.0459	ug/L		96
3) 3-Chloro-1-propene	7.31	41	4220040	413.7396	ug/L		81
4) 2-Chloro-1,3-butadiene	8.69	53	4133844	418.4439	ug/L		56
5) Ethyl Acetate	9.32	43	1301555	411.2549	ug/L		91
6) Methacrylonitrile	9.48	67	774795	421.0975	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	112499	862.0938	ug/L		94
9) Methyl methacrylate	11.64	41	1421838	425.5698	ug/L		57
10) 2-Nitropropane	11.98	43	433957	438.3922	ug/L		96
13) Cyclohexanone	16.07	55	45392	450.3778	ug/L	#	62

(#) = qualifier out of range (m) = manual integration
8M418922.D A9FOOWT.M Mon Jul 03 11:20:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

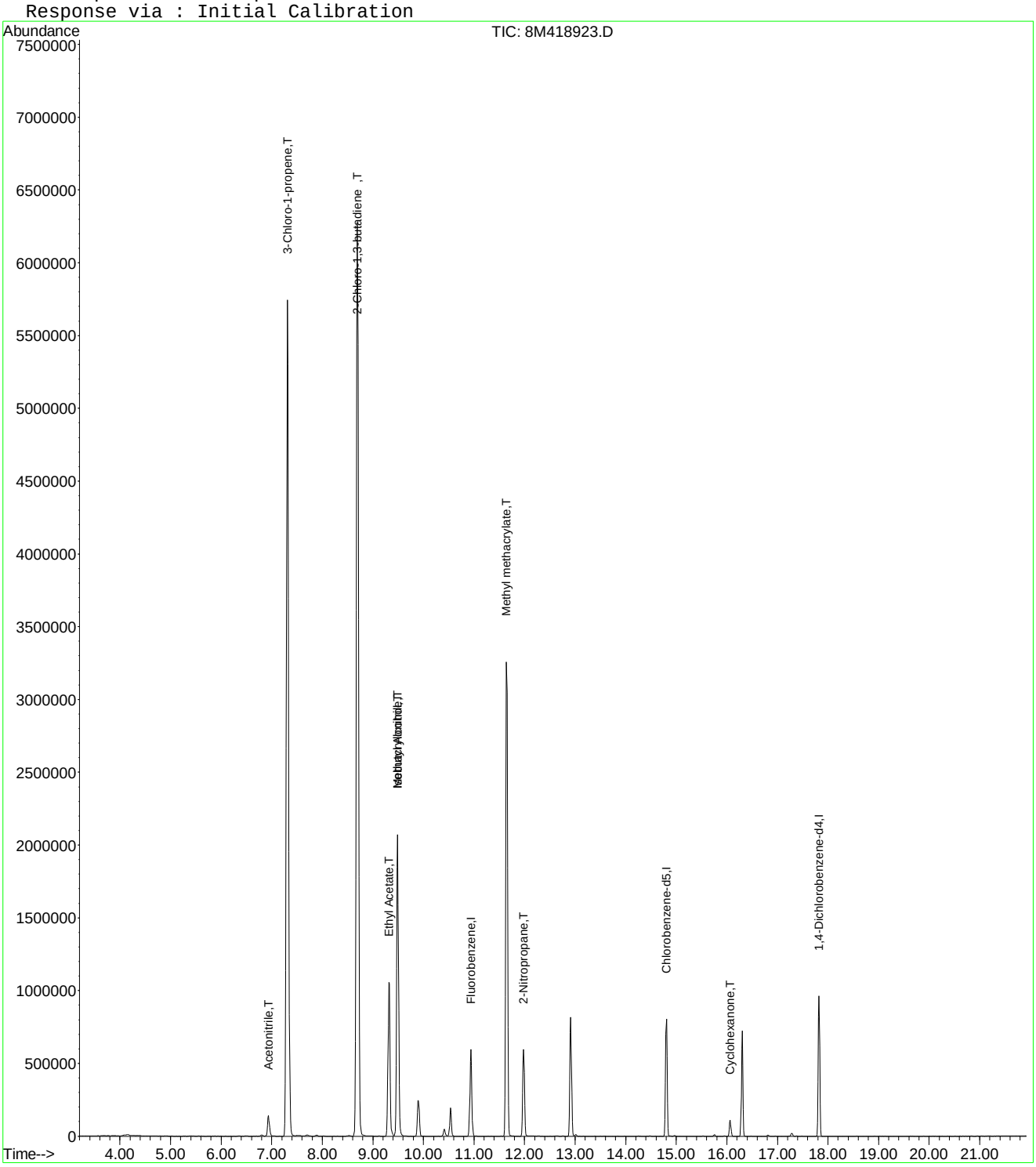
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	771678	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	638069	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	349522	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	205983	527.6086	ug/L		94
3) 3-Chloro-1-propene	7.31	41	5261515	511.9369	ug/L		79
4) 2-Chloro-1,3-butadiene	8.69	53	5178897	520.2542	ug/L		54
5) Ethyl Acetate	9.31	43	1685443	528.5156	ug/L		91
6) Methacrylonitrile	9.49	67	1008521	543.9712	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	153433	1166.8627	ug/L		93
9) Methyl methacrylate	11.64	41	1865399	554.0992	ug/L		57
10) 2-Nitropropane	11.98	43	564365	565.8109	ug/L		96
13) Cyclohexanone	16.07	55	59870	582.3827	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32:00 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 09:07:42 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	198928	23.9627	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.84%			
43) 1,2-Dichloroethane-d4	10.54	65	152795	21.2389	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 84.96%			
58) Toluene-d8	12.91	98	717629	24.0240	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 96.08%			
80) p-Bromofluorobenzene	16.30	95	278441	22.8541	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 91.40%			

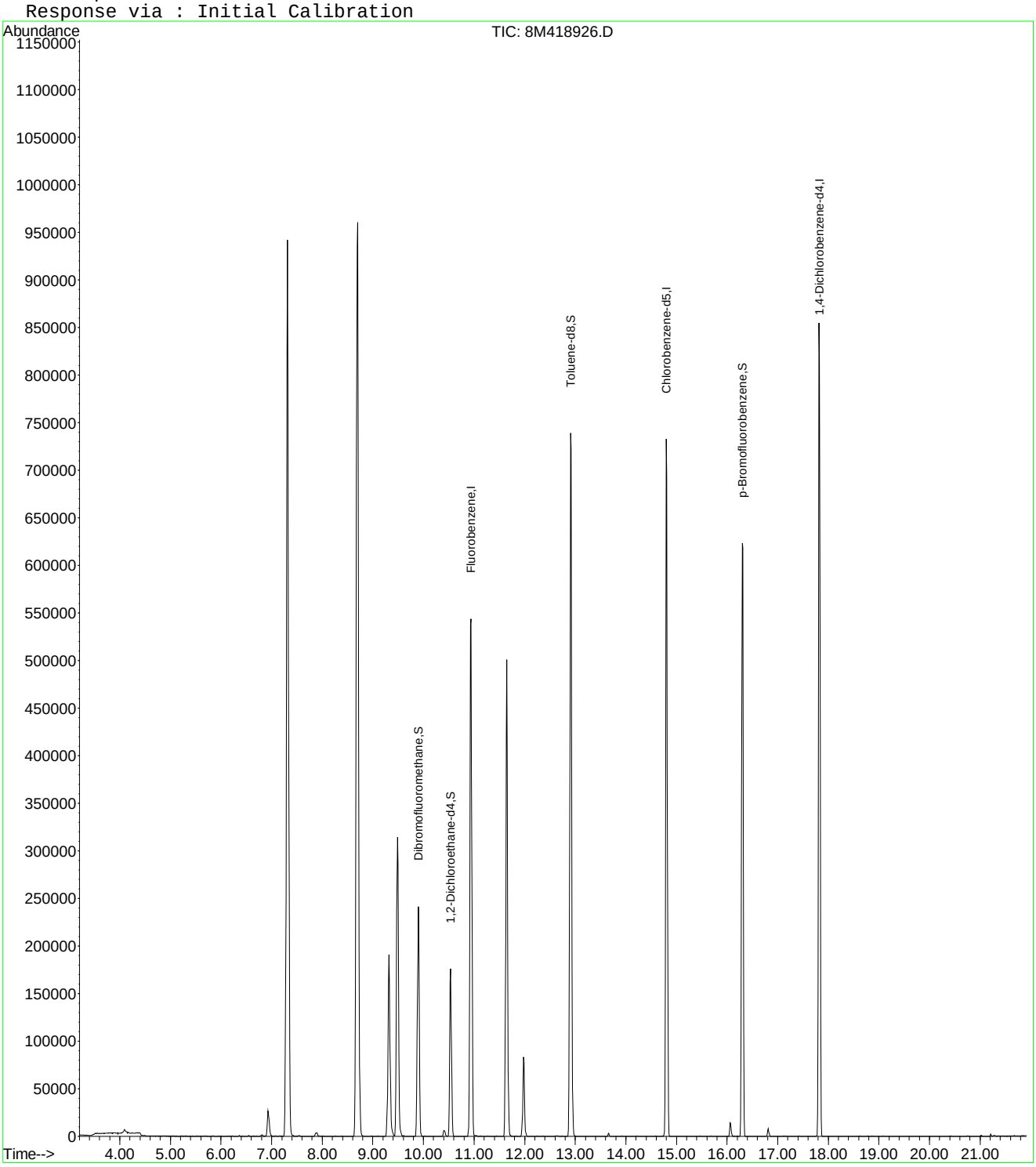
Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
8M418926.D 8260WTR.M Fri Apr 14 13:50:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32 2017 Quant Results File: 8260WTR.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 10:18:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

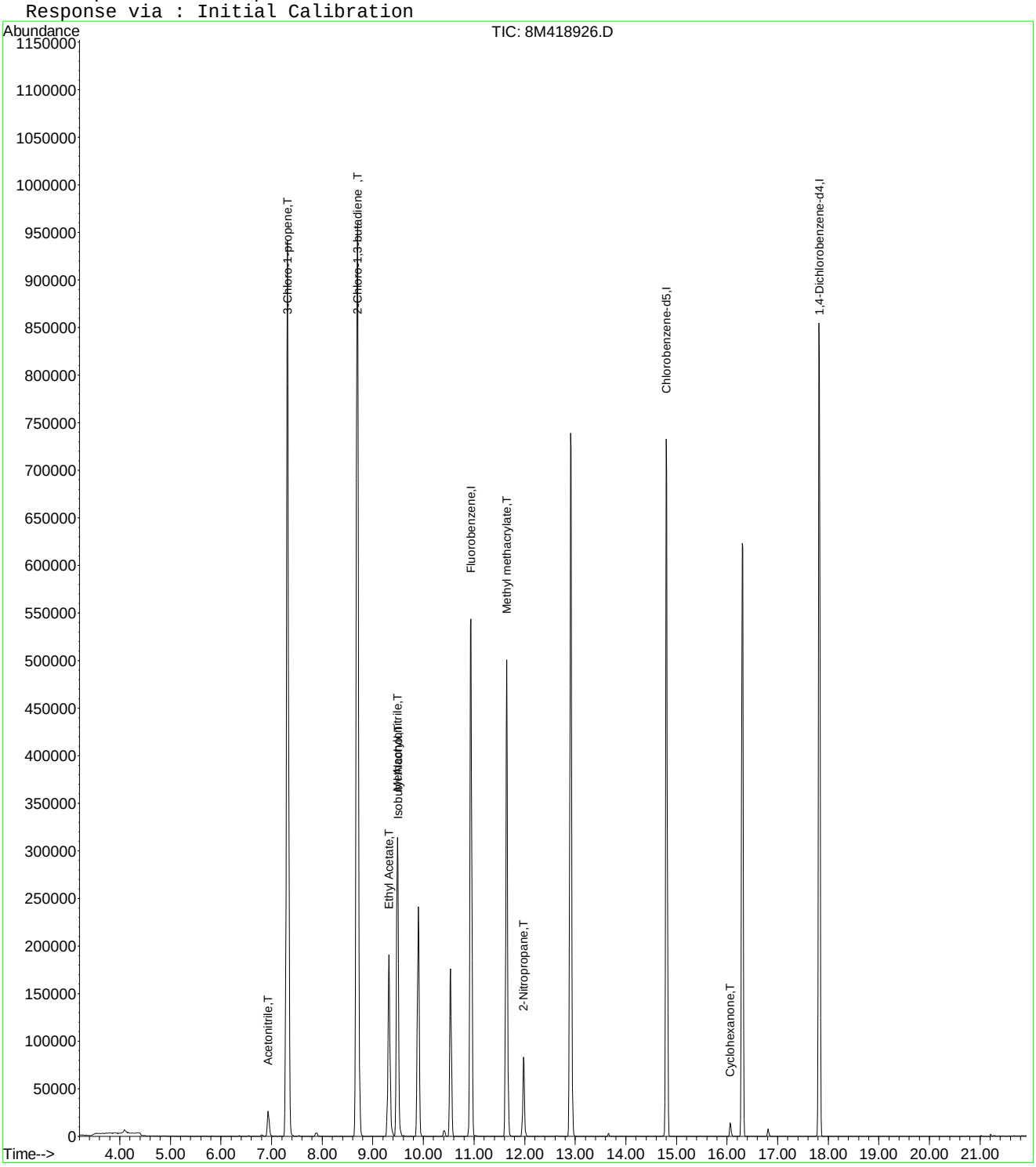
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	36372	98.2177	ug/L		97
3) 3-Chloro-1-propene	7.31	41	875524	89.8082	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	843244	89.3046	ug/L		59
5) Ethyl Acetate	9.32	43	297830	98.4588	ug/L		92
6) Methacrylonitrile	9.48	67	153966	87.5504	ug/L	#	60
7) Isobutyl Alcohol	9.49	43	24214	194.1377	ug/L		91
9) Methyl methacrylate	11.64	41	284340	89.0422	ug/L		58
10) 2-Nitropropane	11.98	43	76371	80.7201	ug/L		99
13) Cyclohexanone	16.06	55	8405	88.7579	ug/L	#	59

(#) = qualifier out of range (m) = manual integration
8M418926.D A9FOOWT.M Mon Jul 03 11:20:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	99	0.00
2	T	Acetonitrile	100.0000	98.2177	1.8	97	0.00
3	T	3-Chloro-1-propene	100.0000	89.8082	10.2	88	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	89.3046	10.7	86	0.00
5	T	Ethyl Acetate	100.0000	98.4588	1.5	100	0.00
6	T	Methacrylonitrile	100.0000	87.5504	12.4	88	0.00
7	T	Isobutyl Alcohol	200.0000	194.1377	2.9	104	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	83	0.00
9	T	Methyl methacrylate	100.0000	89.0422	11.0	89	0.00
10	T	2-Nitropropane	100.0000	80.7202	19.3	82	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
13	T	Cyclohexanone	100.0000	88.7579	11.2	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:11:32 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	803771	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	623661	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	312774	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.91	98	456	0.0160	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.08%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2205	0.2027	ug/L	97
3) Chloromethane	3.83	50	5565	0.4092	ug/L	76
4) Vinyl Chloride	4.07	62	4202	0.3272	ug/L	93
5) 1,3-Butadiene	4.12	54	2857	Below Cal	#	1
7) Chloroethane	5.14	64	1232	0.2196	ug/L #	45
8) Trichlorofluoromethane	5.62	101	3405	0.2441	ug/L #	94
10) Isoprene	6.18	67	2827	0.2563	ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1919	0.2413	ug/L #	53
14) 1,1-Dichloroethene	6.72	61	2851	0.2449	ug/L	87
16) Dimethyl Sulfide	6.98	62	1743	0.2248	ug/L	76
19) Methylene Chloride	7.51	84	3288	0.3930	ug/L	95
20) Carbon Disulfide	7.55	76	8902	0.3678	ug/L	96
22) Methyl Tert Butyl Ether	7.71	73	4778	0.2899	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	3284	0.2900	ug/L	96
24) n-Hexane	8.02	57	2298	0.2431	ug/L	89
26) Vinyl Acetate	8.53	43	3061	0.2692	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	3743	0.2568	ug/L #	88
31) 2,2-Dichloropropane	9.34	77	3225	0.2621	ug/L #	77
32) cis-1,2-Dichloroethene	9.40	96	2463	0.2631	ug/L	90
33) Chloroform	9.62	83	5969	0.3696	ug/L	94
35) Bromochloromethane	9.84	130	1452	0.2875	ug/L	93
38) 1,1,1-Trichloroethane	10.14	97	3644	0.2796	ug/L	97
39) Cyclohexane	10.18	56	3332	0.2746	ug/L #	87
40) 1,1-Dichloropropene	10.33	75	3293	0.2894	ug/L	95
42) Carbon Tetrachloride	10.49	117	3061	0.2533	ug/L #	81
45) 1,2-Dichloroethane	10.65	62	2799	0.3065	ug/L #	64
46) Benzene	10.70	78	11003	0.3314	ug/L	94
47) Trichloroethene	11.43	130	2640	0.2830	ug/L	93
48) Methylcyclohexane	11.53	83	3718	0.2990	ug/L	93
49) 1,2-Dichloropropane	11.65	63	2260	0.2787	ug/L	87
50) Bromodichloromethane	11.96	83	2937	0.2767	ug/L #	87
52) Dibromomethane	12.04	93	1092	0.2616	ug/L	85
53) 2-Chloroethyl Vinyl Ether	12.25	63	496	0.1413	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3354	0.2775	ug/L	86
56) Dimethyl Disulfide	12.85	79	410	6.5739	ug/L #	24
59) Toluene	13.02	91	10893	0.3138	ug/L	96
60) Ethyl Methacrylate	13.10	69	1281	0.1956	ug/L	70
62) trans-1,3-Dichloropropene	13.18	75	2847	0.2828	ug/L	78
63) 1,1,2-Trichloroethane	13.41	97	1378	0.2413	ug/L	80
65) 1,3-Dichloropropane	13.71	76	3029	0.3137	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

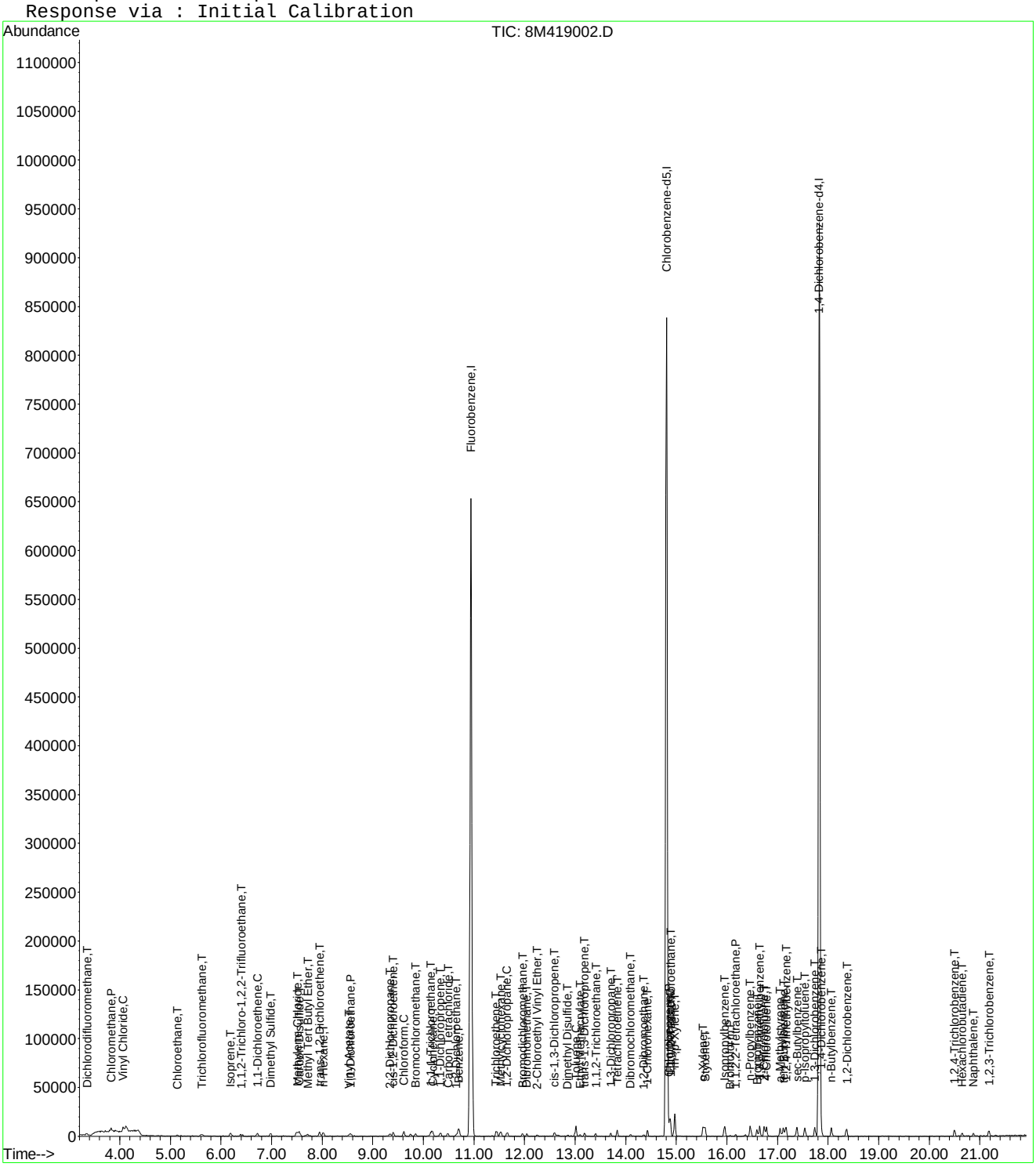
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
66)	Tetrachloroethene	13.83	164	2097	0.2876	ug/L		94
67)	Dibromochloromethane	14.09	129	1754	0.2390	ug/L		96
68)	1,2-Dibromoethane	14.35	107	1560	0.2796	ug/L		80
69)	1-Chlorohexane	14.42	91	2902	0.2642	ug/L		93
70)	Chlorobenzene	14.86	112	7625	0.3086	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.89	131	2025	0.2309	ug/L		92
72)	Ethylbenzene	14.88	106	3702	0.2675	ug/L		78
73)	m-,p-Xylene	14.97	106	9617	0.6000	ug/L		93
74)	o-Xylene	15.53	106	4785	0.2969	ug/L		96
75)	Styrene	15.57	104	6235	0.2468	ug/L		87
76)	Bromoform	16.06	173	794	1.3534	ug/L	#	27
77)	Isopropylbenzene	15.95	105	11105	0.2878	ug/L		97
79)	1,1,2,2-Tetrachloroethane	16.17	83	1461	0.2476	ug/L	#	92
83)	n-Propylbenzene	16.46	91	13614	0.3110	ug/L		97
84)	Bromobenzene	16.60	156	2823	0.2752	ug/L		78
85)	1,3,5-Trimethylbenzene	16.64	105	9120	0.2877	ug/L		91
86)	2-Chlorotoluene	16.74	91	9154	0.3063	ug/L		80
87)	4-Chlorotoluene	16.78	91	8789	0.3263	ug/L		88
88)	a-Methylstyrene	17.05	118	4528	0.2548	ug/L		94
89)	tert-Butylbenzene	17.12	134	1769	0.2465	ug/L		76
90)	1,2,4-Trimethylbenzene	17.17	105	9542	0.2949	ug/L		94
91)	sec-Butylbenzene	17.39	105	11285	0.2842	ug/L		93
92)	p-Isopropyltoluene	17.54	119	9114	0.2726	ug/L		94
93)	1,3-Dichlorobenzene	17.74	146	6334	0.3186	ug/L		92
94)	1,4-Dichlorobenzene	17.86	146	6652	0.3291	ug/L	#	49
95)	n-Butylbenzene	18.06	91	8752	0.2906	ug/L		94
96)	1,2-Dichlorobenzene	18.37	146	5133	0.2939	ug/L		98
98)	1,2,4-Trichlorobenzene	20.50	180	3486	0.2965	ug/L		89
99)	Hexachlorobutadiene	20.64	225	1480	0.2705	ug/L	#	86
100)	Naphthalene	20.87	128	4833	0.2876	ug/L	#	80
101)	1,2,3-Trichlorobenzene	21.18	180	2987	0.3059	ug/L	#	93

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2027	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.4092	0.0	100	0.01
4	C	Vinyl Chloride	-1.0000	0.3272	0.0	100	0.01
5	T	1,3-Butadiene	-1.0000	-20.2217	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	-1.0000	0.2196	0.0	100	0.01
8	T	Trichlorofluoromethane	-1.0000	0.2441	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.2563	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.2413	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	-1.0000	0.2449	0.0	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.2248	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.0662	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3930	0.0	100	0.01
20	T	Carbon Disulfide	-1.0000	0.3678	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2899	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	-1.0000	0.2900	0.0	100	0.01
24	T	n-Hexane	-1.0000	0.2431	0.0	100	0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.2692	0.0	100	0.00
27	P	1,1-Dichloroethane	-1.0000	0.2568	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	-1.0000	0.2621	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2631	0.0	100	0.00
33	C	Chloroform	0.3000	0.3696	-23.2#	100	0.01
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	-1.0000	0.2875	0.0	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-9.86#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	-1.0000	0.2796	0.0	100	0.00
39	T	Cyclohexane	-1.0000	0.2746	0.0	100	0.01
40	T	1,1-Dichloropropene	-1.0000	0.2894	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	-1.0000	0.2533	0.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	-1.0000	0.3065	0.0	100	0.00
46	T	Benzene	-1.0000	0.3314	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2830	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.2990	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.2787	0.0	100	0.00
50	T	Bromodichloromethane	-1.0000	0.2767	0.0	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	-1.0000	0.2616	0.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1413	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2775	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.5739	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0160	0.0	100	0.00
59	C	Toluene	-1.0000	0.3138	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.1956	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2828	0.0	100	0.00
63	T	1,1,2-Trichloroethane	-1.0000	0.2413	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	-1.0000	0.3137	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.2876	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2390	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2796	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.2642	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3086	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2309	0.0	0	0.01
72	C	Ethylbenzene	-1.0000	0.2675	0.0	0	0.00
73	T	m-,p-Xylene	-1.0000	0.6000	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2969	0.0	100	0.00
75	T	Styrene	-1.0000	0.2468	0.0	100	0.00
76	P	Bromoform	-1.0000	1.3534	0.0	100	0.01
77	T	Isopropylbenzene	-1.0000	0.2878	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.2476	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1194	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	-1.0000	0.3110	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.2752	8.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.2877	0.0	100	0.00
86	T	2-Chlorotoluene	-1.0000	0.3063	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3263	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2548	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2465	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.2949	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.2842	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.2726	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3186	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3291	-9.7	100	0.00
95	T	n-Butylbenzene	-1.0000	0.2906	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.2939	2.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.2965	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.2705	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.2876	0.0	100	0.00
101	T	1,2,3-Trichlorobenzene	0.3000	0.3059	-2.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	787150	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	615912	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	306493	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.92	98	201	0.0071	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	3389	0.3181	ug/L	86
3) Chloromethane	3.82	50	7334	0.5507	ug/L	96
4) Vinyl Chloride	4.07	62	5367	0.4267	ug/L	99
5) 1,3-Butadiene	4.12	54	3783	Below Cal #		53
7) Chloroethane	5.13	64	2045	0.3723	ug/L #	45
8) Trichlorofluoromethane	5.62	101	4954	0.3627	ug/L #	93
10) Isoprene	6.18	67	3988	0.3692	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	2378	0.3053	ug/L	89
14) 1,1-Dichloroethene	6.71	61	4170	0.3658	ug/L	97
16) Dimethyl Sulfide	6.98	62	2440	0.3213	ug/L	86
18) Methyl acetate	7.23	43	600	0.1979	ug/L #	53
19) Methylene Chloride	7.48	84	3294	0.4021	ug/L	63
20) Carbon Disulfide	7.54	76	9802	0.4135	ug/L	98
22) Methyl Tert Butyl Ether	7.71	73	5656	0.3504	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	4304	0.3881	ug/L	85
24) n-Hexane	8.02	57	3612	0.3902	ug/L	91
26) Vinyl Acetate	8.53	43	3817	0.3428	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	5095	0.3569	ug/L #	76
31) 2,2-Dichloropropane	9.34	77	4235	0.3515	ug/L	77
32) cis-1,2-Dichloroethene	9.40	96	3310	0.3611	ug/L	95
33) Chloroform	9.61	83	6791	0.4294	ug/L	94
35) Bromochloromethane	9.85	130	1484	0.3000	ug/L	78
36) Tetrahydrofuran	9.86	42	394	0.3297	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	4246	0.3327	ug/L	95
39) Cyclohexane	10.17	56	4729	0.3979	ug/L	82
40) 1,1-Dichloropropene	10.32	75	4225	0.3791	ug/L	84
42) Carbon Tetrachloride	10.48	117	3628	0.3065	ug/L	85
45) 1,2-Dichloroethane	10.66	62	3115	0.3483	ug/L #	68
46) Benzene	10.70	78	12752	0.3921	ug/L	99
47) Trichloroethene	11.44	130	3526	0.3860	ug/L	94
48) Methylcyclohexane	11.53	83	4742	0.3894	ug/L	98
49) 1,2-Dichloropropane	11.66	63	2964	0.3732	ug/L	72
50) Bromodichloromethane	11.96	83	3435	0.3305	ug/L #	95
52) Dibromomethane	12.05	93	1271	0.3110	ug/L	92
53) 2-Chloroethyl Vinyl Ether	12.25	63	562	0.1635	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3811	0.3220	ug/L	88
56) Dimethyl Disulfide	12.86	79	827	6.6305	ug/L	76
59) Toluene	13.01	91	12577	0.3668	ug/L	100
60) Ethyl Methacrylate	13.09	69	1611	0.2491	ug/L #	68
62) trans-1,3-Dichloropropene	13.19	75	3144	0.3162	ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

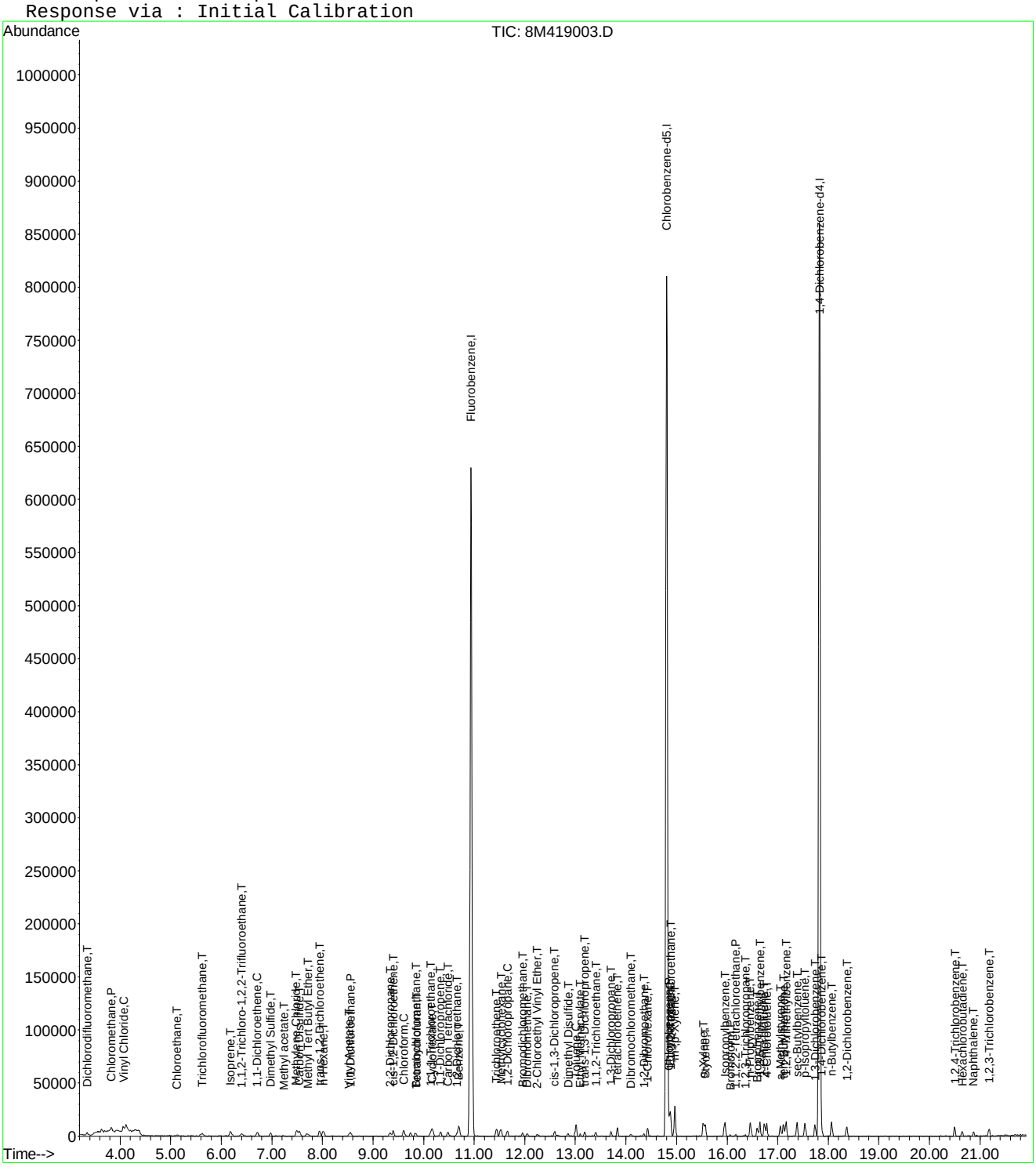
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
63)	1,1,2-Trichloroethane	13.40	97	2066	0.3663 ug/L		83
65)	1,3-Dichloropropane	13.70	76	3481	0.3651 ug/L		81
66)	Tetrachloroethene	13.83	164	2419	0.3359 ug/L		93
67)	Dibromochloromethane	14.10	129	2287	0.3155 ug/L		95
68)	1,2-Dibromoethane	14.36	107	1857	0.3370 ug/L		87
69)	1-Chlorohexane	14.43	91	3796	0.3500 ug/L		88
70)	Chlorobenzene	14.85	112	9935	0.4071 ug/L		80
71)	1,1,1,2-Tetrachloroethane	14.88	131	2985	0.3447 ug/L		94
72)	Ethylbenzene	14.87	106	4602	0.3367 ug/L		81
73)	m-,p-Xylene	14.97	106	11280	0.7126 ug/L		87
74)	o-Xylene	15.53	106	5356	0.3366 ug/L		95
75)	Styrene	15.56	104	8019	0.3214 ug/L		98
76)	Bromoform	16.07	173	792	1.3549 ug/L	#	65
77)	Isopropylbenzene	15.96	105	14417	0.3784 ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.16	83	1888	0.3265 ug/L	#	87
81)	1,2,3-Trichloropropane	16.36	110	210	0.1267 ug/L	#	6
83)	n-Propylbenzene	16.45	91	17056	0.3976 ug/L		93
84)	Bromobenzene	16.60	156	3412	0.3395 ug/L		91
85)	1,3,5-Trimethylbenzene	16.65	105	12100	0.3896 ug/L		98
86)	2-Chlorotoluene	16.73	91	13111	0.4477 ug/L		99
87)	4-Chlorotoluene	16.78	91	9782	0.3706 ug/L		95
88)	a-Methylstyrene	17.05	118	5086	0.2921 ug/L		99
89)	tert-Butylbenzene	17.11	134	2759	0.3923 ug/L		83
90)	1,2,4-Trimethylbenzene	17.17	105	11199	0.3532 ug/L		96
91)	sec-Butylbenzene	17.38	105	16076	0.4132 ug/L		92
92)	p-Isopropyltoluene	17.54	119	11698	0.3571 ug/L		98
93)	1,3-Dichlorobenzene	17.75	146	7364	0.3780 ug/L		96
94)	1,4-Dichlorobenzene	17.87	146	7953	0.4015 ug/L		83
95)	n-Butylbenzene	18.07	91	12640	0.4283 ug/L	#	94
96)	1,2-Dichlorobenzene	18.37	146	5812	0.3396 ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	4235	0.3675 ug/L		99
99)	Hexachlorobutadiene	20.65	225	1988	0.3708 ug/L		96
100)	Naphthalene	20.87	128	6635	0.4029 ug/L	#	86
101)	1,2,3-Trichlorobenzene	21.18	180	3757	0.3926 ug/L		95

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:53 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3181	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.5507	0.0	100	0.00
4	C	Vinyl Chloride	0.4000	0.4267	-6.7	100	0.02
5	T	1,3-Butadiene	-1.0000	-19.9254	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	0.4000	0.3723	6.9	100	0.00
8	T	Trichlorofluoromethane	0.4000	0.3627	9.3	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.3692	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3053	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	0.4000	0.3658	8.6	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.3213	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.1979	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4021	0.0	100	-0.01
20	T	Carbon Disulfide	-1.0000	0.4135	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3504	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	0.4000	0.3881	3.0	100	0.00
24	T	n-Hexane	-1.0000	0.3902	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.3428	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.3569	10.8	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	0.4000	0.3514	12.1	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.3611	9.7	100	0.00
33	C	Chloroform	0.4000	0.4294	-7.3	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	0.4000	0.3000	25.0#	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.3297	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	0.4000	0.3327	16.8	100	0.00
39	T	Cyclohexane	-1.0000	0.3979	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3791	0.0	100	-0.01
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	0.4000	0.3065	23.4	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	0.4000	0.3483	12.9	100	0.00
46	T	Benzene	0.4000	0.3922	2.0	100	0.00
47	T	Trichloroethene	0.4000	0.3860	3.5	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3894	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3732	6.7	100	0.00
50	T	Bromodichloromethane	0.4000	0.3305	17.4	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	0.4000	0.3110	22.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1635	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419003.D 8260WT.M Tue Apr 18 11:59:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3220	19.5	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.6305	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0071	0.0	100	0.00
59	C	Toluene	0.4000	0.3669	8.3	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2491	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3162	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3663	8.4	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	0.4000	0.3651	8.7	100	0.00
66	T	Tetrachloroethene	0.4000	0.3359	16.0	100	0.00
67	T	Dibromochloromethane	0.4000	0.3155	21.1	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.3371	15.7	100	0.00
69	T	1-Chlorohexane	0.4000	0.3500	12.5	100	0.00
70	P	Chlorobenzene	0.4000	0.4071	-1.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3447	13.8	100	0.00
72	C	Ethylbenzene	0.4000	0.3367	15.8	100	-0.01
73	T	m-,p-Xylene	0.8000	0.7126	10.9	100	0.00
74	T	o-Xylene	-1.0000	0.3366	0.0	100	0.00
75	T	Styrene	0.4000	0.3214	19.6	100	0.00
76	P	Bromoform	-1.0000	1.3549	0.0	100	0.02
77	T	Isopropylbenzene	0.4000	0.3784	5.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.3265	18.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1267	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	0.4000	0.3976	0.6	100	0.00
84	T	Bromobenzene	0.4000	0.3395	15.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.3896	2.6	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4477	-11.9	100	0.00
87	T	4-Chlorotoluene	0.4000	0.3706	7.3	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2921	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3923	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	0.4000	0.3532	11.7	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4132	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3571	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.3780	5.5	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4015	-0.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4283	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.3396	15.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	0.4000	0.3675	8.1	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.3708	7.3	100	0.00
100	T	Naphthalene	0.4000	0.4029	-0.7	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.3926	1.8	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419003.D 8260WT.M Tue Apr 18 11:59:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.93	96	779914	25.00	ug/L		0.00
57) Chlorobenzene-d5	14.80	117	608999	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	308129	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	9.90	111	3656	0.4469	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.80%#			
43) 1,2-Dichloroethane-d4	10.54	65	3358	0.4748	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#			
58) Toluene-d8	12.91	98	13712	0.4928	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	1.96%#			
80) p-Bromofluorobenzene	16.30	95	5409	0.4974	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.35	85	9773	0.9259	ug/L		89
3) Chloromethane	3.82	50	14220	1.0777	ug/L		94
4) Vinyl Chloride	4.06	62	13411	1.0762	ug/L		98
5) 1,3-Butadiene	4.12	54	9735	Below Cal	#		74
6) Bromomethane	4.98	94	2003	1.2503	ug/L		89
7) Chloroethane	5.14	64	5085	0.9342	ug/L		98
8) Trichlorofluoromethane	5.63	101	14425	1.0658	ug/L	#	94
9) Diethyl ether	6.15	59	24837	4.8725	ug/L		91
10) Isoprene	6.19	67	11081	1.0355	ug/L		99
11) Acrolein	6.39	56	1283	1.8174	ug/L		87
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	7816	1.0127	ug/L		95
13) Acetone	6.50	43	1194	1.0885	ug/L	#	42
14) 1,1-Dichloroethene	6.72	61	11427	1.0117	ug/L		93
15) Tert-Butyl Alcohol	6.82	59	3335	9.3795	ug/L	#	68
16) Dimethyl Sulfide	6.98	62	7490	0.9956	ug/L		98
18) Methyl acetate	7.24	43	2479	0.8253	ug/L	#	53
19) Methylene Chloride	7.49	84	8465	1.0429	ug/L		79
20) Carbon Disulfide	7.54	76	24774	1.0549	ug/L		99
21) Acrylonitrile	7.68	53	3342	2.1964	ug/L		91
22) Methyl Tert Butyl Ether	7.71	73	15457	0.9665	ug/L		97
23) trans-1,2-Dichloroethene	7.95	61	10769	0.9800	ug/L		94
24) n-Hexane	8.02	57	9445	1.0297	ug/L		89
25) Diisopropyl ether	8.36	45	121009	4.9196	ug/L		94
26) Vinyl Acetate	8.53	43	10576	0.9587	ug/L		90
27) 1,1-Dichloroethane	8.57	63	14365	1.0157	ug/L		95
28) Ethyl-Tert-Butyl ether	8.93	59	101471	4.8508	ug/L		97
29) 2-Butanone	9.13	43	992	0.5767	ug/L	#	44
30) Propionitrile	9.23	54	2404	4.5091	ug/L	#	56
31) 2,2-Dichloropropane	9.34	77	12075	1.0114	ug/L		99
32) cis-1,2-Dichloroethene	9.41	96	8962	0.9867	ug/L		89
33) Chloroform	9.61	83	16050	1.0242	ug/L		99
34) 1-Bromopropane	9.75	122	1768	0.9867	ug/L		91
35) Bromochloromethane	9.84	130	4693	0.9575	ug/L		83
36) Tetrahydrofuran	9.87	42	6126	5.1735	ug/L		80
38) 1,1,1-Trichloroethane	10.14	97	12661	1.0011	ug/L		93
39) Cyclohexane	10.18	56	11570	0.9826	ug/L		96
40) 1,1-Dichloropropene	10.34	75	11057	1.0014	ug/L		98
41) Tert-Amyl-Methyl ether	10.44	73	88613	4.7307	ug/L		96
42) Carbon Tetrachloride	10.49	117	11842	1.0099	ug/L		98
45) 1,2-Dichloroethane	10.66	62	8720	0.9841	ug/L		97

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:55 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

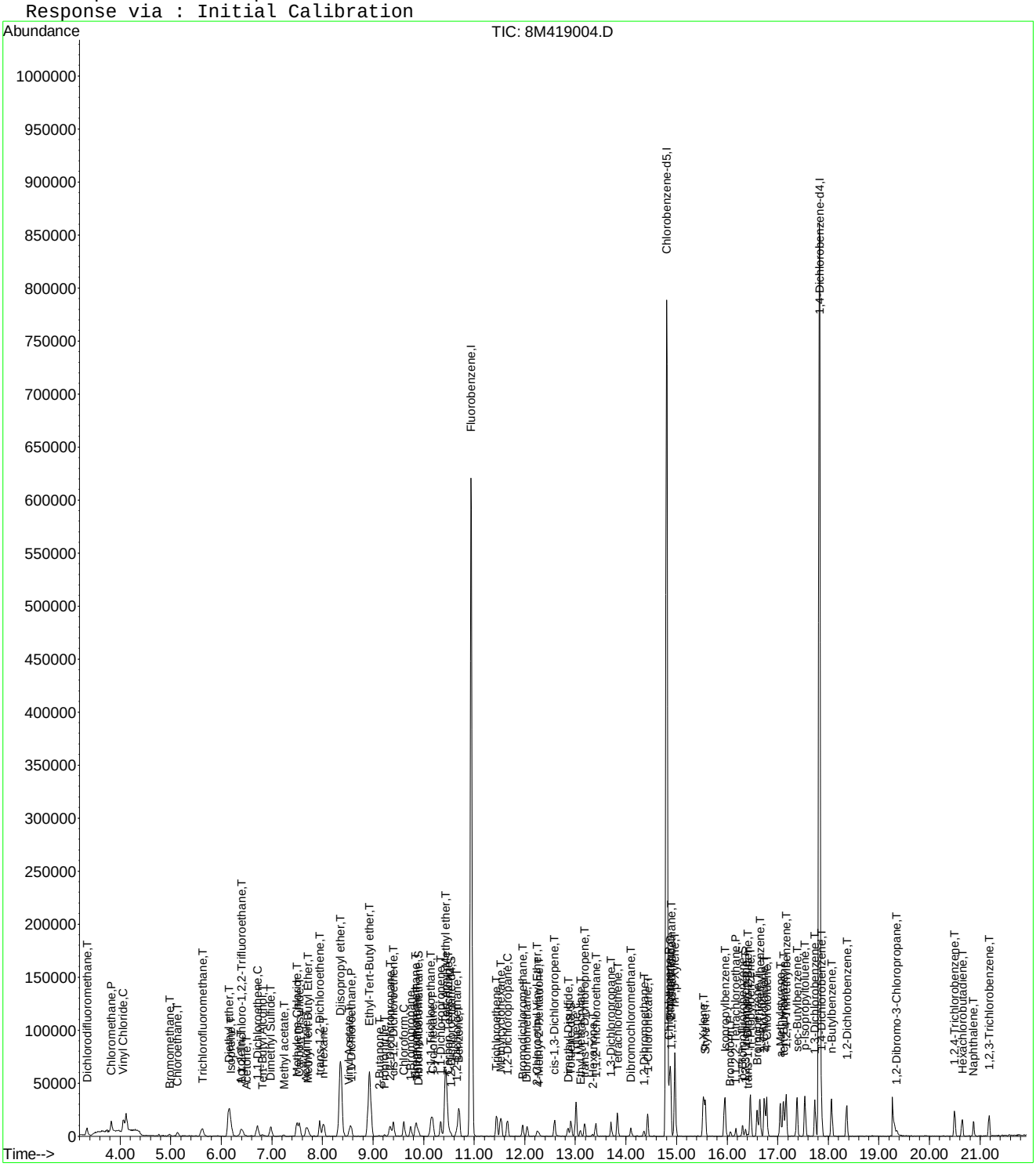
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
46)	Benzene	10.70	78	32995	1.0241 ug/L		98
47)	Trichloroethene	11.44	130	9064	1.0014 ug/L		96
48)	Methylcyclohexane	11.52	83	12257	1.0159 ug/L		96
49)	1,2-Dichloropropane	11.66	63	7625	0.9690 ug/L		89
50)	Bromodichloromethane	11.96	83	9755	0.9472 ug/L		97
52)	Dibromomethane	12.04	93	3914	0.9665 ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	3022	0.8875 ug/L		86
54)	4-Methyl-2-Pentanone	12.28	58	1067	0.6996 ug/L	#	33
55)	cis-1,3-Dichloropropene	12.59	75	11045	0.9418 ug/L		99
56)	Dimethyl Disulfide	12.86	79	3184	6.9480 ug/L		100
59)	Toluene	13.01	91	34963	1.0314 ug/L		98
60)	Ethyl Methacrylate	13.11	69	5063	0.7916 ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	8931	0.9085 ug/L		94
63)	1,1,2-Trichloroethane	13.40	97	5720	1.0256 ug/L		92
64)	2-Hexanone	13.34	58	660	0.4822 ug/L	#	1
65)	1,3-Dichloropropane	13.70	76	9865	1.0463 ug/L		88
66)	Tetrachloroethene	13.84	164	6911	0.9706 ug/L		94
67)	Dibromochloromethane	14.10	129	6507	0.9079 ug/L		93
68)	1,2-Dibromoethane	14.36	107	5094	0.9351 ug/L		96
69)	1-Chlorohexane	14.44	91	10710	0.9986 ug/L		96
70)	Chlorobenzene	14.85	112	23511	0.9743 ug/L		74
71)	1,1,1,2-Tetrachloroethane	14.89	131	7696	0.8987 ug/L		99
72)	Ethylbenzene	14.87	106	12181	0.9013 ug/L		83
73)	m-,p-Xylene	14.97	106	31012	1.9815 ug/L		91
74)	o-Xylene	15.53	106	14876	0.9454 ug/L		96
75)	Styrene	15.56	104	22652	0.9182 ug/L		96
76)	Bromoform	16.06	173	3053	1.1801 ug/L		92
77)	Isopropylbenzene	15.96	105	37771	1.0025 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	6072	1.0444 ug/L	#	97
81)	1,2,3-Trichloropropane	16.36	110	1447	0.8681 ug/L		93
82)	trans-1,4-Dichloro-2-Buten	16.41	53	711	1.1263 ug/L	#	1
83)	n-Propylbenzene	16.46	91	45884	1.0639 ug/L		99
84)	Bromobenzene	16.60	156	10336	1.0229 ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	30984	0.9922 ug/L		98
86)	2-Chlorotoluene	16.73	91	32327	1.0980 ug/L		96
87)	4-Chlorotoluene	16.78	91	26310	0.9916 ug/L		96
88)	a-Methylstyrene	17.05	118	14557	0.8315 ug/L		95
89)	tert-Butylbenzene	17.12	134	6410	0.9066 ug/L		87
90)	1,2,4-Trimethylbenzene	17.17	105	32136	1.0080 ug/L		99
91)	sec-Butylbenzene	17.38	105	40408	1.0331 ug/L		98
92)	p-Isopropyltoluene	17.54	119	32541	0.9881 ug/L		100
93)	1,3-Dichlorobenzene	17.74	146	19666	1.0041 ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	20254	1.0171 ug/L	#	70
95)	n-Butylbenzene	18.07	91	29903	1.0080 ug/L		97
96)	1,2-Dichlorobenzene	18.37	146	18343	1.0661 ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.35	75	619	0.6542 ug/L		90
98)	1,2,4-Trichlorobenzene	20.49	180	11339	0.9788 ug/L		98
99)	Hexachlorobutadiene	20.65	225	5266	0.9769 ug/L		99
100)	Naphthalene	20.87	128	15692	0.9479 ug/L		98
101)	1,2,3-Trichlorobenzene	21.18	180	9244	0.9609 ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:56 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9260	7.4	100	0.00
3	P	Chloromethane	1.0000	1.0777	-7.8	100	0.00
4	C	Vinyl Chloride	1.0000	1.0762	-7.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-18.1082	0.0	0	0.03
6	T	Bromomethane	1.0000	1.2503	-25.0#	100	0.02
7	T	Chloroethane	1.0000	0.9342	6.6	100	0.01
8	T	Trichlorofluoromethane	1.0000	1.0658	-6.6	100	0.03
9	T	Diethyl ether	5.0000	4.8725	2.6	100	0.00
10	T	Isoprene	-1.0000	1.0355	0.0	100	0.00
11	T	Acrolein	-1.0000	1.8174	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0127	-1.3	100	0.00
13	T	Acetone	-1.0000	1.0885	0.0	100	0.02
14	C	1,1-Dichloroethene	1.0000	1.0117	-1.2	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	9.3795	0.0	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	0.9956	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.8253	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0429	-4.3	100	0.00
20	T	Carbon Disulfide	1.0000	1.0549	-5.5	100	0.00
21	T	Acrylonitrile	2.5000	2.1965	12.1	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	0.9665	3.4	100	0.00
23	T	trans-1,2-Dichloroethene	1.0000	0.9800	2.0	100	0.00
24	T	n-Hexane	-1.0000	1.0297	0.0	100	0.00
25	T	Diisopropyl ether	5.0000	4.9196	1.6	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9587	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	1.0157	-1.6	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	4.8508	3.0	100	0.00
29	T	2-Butanone	-1.0000	0.5767	0.0	100	0.02
30	T	Propionitrile	5.0000	4.5091	9.8	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.0114	-1.1	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9867	1.3	100	0.00
33	C	Chloroform	1.0000	1.0242	-2.4	100	0.00
34		1-Bromopropane	1.0000	0.9867	1.3	100	0.00
35	T	Bromochloromethane	1.0000	0.9575	4.2	100	-0.01
36	T	Tetrahydrofuran	5.0000	5.1735	-3.5	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.4469	0.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0011	-0.1	100	0.00
39	T	Cyclohexane	1.0000	0.9826	1.7	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0014	-0.1	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	4.7307	5.4	100	0.00
42	T	Carbon Tetrachloride	1.0000	1.0099	-1.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.4748	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	1.0000	0.9841	1.6	100	0.00
46	T	Benzene	1.0000	1.0241	-2.4	100	0.00
47	T	Trichloroethene	1.0000	1.0014	-0.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.0159	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9690	3.1	100	0.00
50	T	Bromodichloromethane	1.0000	0.9473	5.3	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	1.0000	0.9665	3.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8875	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.6996	0.0	100	0.00

(#) = Out of Range
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9417	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.9480	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.4928	0.0	100	0.00
59	C	Toluene	1.0000	1.0314	-3.1	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.7916	20.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	1.0000	0.9084	9.2	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0256	-2.6	100	0.00
64	T	2-Hexanone	-1.0000	0.4822	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0463	-4.6	100	0.00
66	T	Tetrachloroethene	1.0000	0.9706	2.9	100	0.00
67	T	Dibromochloromethane	1.0000	0.9079	9.2	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9351	6.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9986	0.1	100	0.00
70	P	Chlorobenzene	1.0000	0.9743	2.6	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.8987	10.1	100	0.02
72	C	Ethylbenzene	1.0000	0.9013	9.9	100	-0.01
73	T	m-,p-Xylene	2.0000	1.9815	0.9	100	0.00
74	T	o-Xylene	1.0000	0.9454	5.5	100	0.00
75	T	Styrene	1.0000	0.9182	8.2	100	0.00
76	P	Bromoform	1.0000	1.1801	-18.0	100	0.00
77	T	Isopropylbenzene	1.0000	1.0025	-0.3	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0444	-4.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.4974	0.0	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	0.8681	13.2	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	1.0000	1.1263	-12.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0639	-6.4	100	0.00
84	T	Bromobenzene	1.0000	1.0229	-2.3	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	0.9922	0.8	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0980	-9.8	100	0.00
87	T	4-Chlorotoluene	1.0000	0.9916	0.8	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8315	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9066	9.3	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0080	-0.8	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0331	-3.3	100	0.00
92	T	p-Isopropyltoluene	1.0000	0.9881	1.2	100	0.00
93	T	1,3-Dichlorobenzene	1.0000	1.0041	-0.4	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	1.0171	-1.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0079	-0.8	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0661	-6.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.6542	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	0.9788	2.1	100	0.00
99	T	Hexachlorobutadiene	1.0000	0.9769	2.3	100	0.00
100	T	Naphthalene	1.0000	0.9479	5.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	0.9609	3.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	786816	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.80	117	613120	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	307545	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.90	111	7910	0.9585 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.84%#	
43) 1,2-Dichloroethane-d4	10.53	65	6765	0.9482 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.80%#	
58) Toluene-d8	12.91	98	27609	0.9855 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	3.96%#	
80) p-Bromofluorobenzene	16.30	95	11029	1.0161 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.08%#	
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.35	85	18197	1.7090 ug/L	98
3) Chloromethane	3.82	50	27723	2.0826 ug/L	96
4) Vinyl Chloride	4.06	62	26048	2.0720 ug/L	98
5) 1,3-Butadiene	4.12	54	18463	Below Cal #	71
6) Bromomethane	4.97	94	4285	1.8796 ug/L	92
7) Chloroethane	5.15	64	10874	1.9802 ug/L	96
8) Trichlorofluoromethane	5.62	101	25863	1.8941 ug/L	99
9) Diethyl ether	6.15	59	125724	24.4479 ug/L	91
10) Isoprene	6.19	67	20005	1.8530 ug/L	94
11) Acrolein	6.39	56	8808	12.3674 ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	14374	1.8461 ug/L	99
13) Acetone	6.49	43	2188	1.9772 ug/L #	61
14) 1,1-Dichloroethene	6.72	61	21622	1.8975 ug/L	94
15) Tert-Butyl Alcohol	6.82	59	15100	42.0952 ug/L	95
16) Dimethyl Sulfide	6.99	62	14397	1.8968 ug/L	83
17) Iodomethane	7.24	142	1183	0.3475 ug/L #	31
18) Methyl acetate	7.23	43	6243	2.0602 ug/L #	64
19) Methylene Chloride	7.49	84	15417	1.8827 ug/L	82
20) Carbon Disulfide	7.54	76	46839	1.9769 ug/L	99
21) Acrylonitrile	7.68	53	17600	11.4657 ug/L	93
22) Methyl Tert Butyl Ether	7.70	73	29822	1.8483 ug/L	99
23) trans-1,2-Dichloroethene	7.95	61	21949	1.9798 ug/L	92
24) n-Hexane	8.03	57	18571	2.0068 ug/L	92
25) Diisopropyl ether	8.36	45	624517	25.1670 ug/L	95
26) Vinyl Acetate	8.53	43	20892	1.8772 ug/L	91
27) 1,1-Dichloroethane	8.57	63	27479	1.9259 ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	512681	24.2936 ug/L	97
29) 2-Butanone	9.12	43	2972	1.7126 ug/L #	59
30) Propionitrile	9.23	54	12326	22.9166 ug/L	98
31) 2,2-Dichloropropane	9.34	77	24154	2.0053 ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	17720	1.9338 ug/L	92
33) Chloroform	9.61	83	31381	1.9850 ug/L	97
34) 1-Bromopropane	9.75	122	3352	1.8543 ug/L	99
35) Bromochloromethane	9.84	130	9815	1.9850 ug/L	94
36) Tetrahydrofuran	9.87	42	27490	23.0121 ug/L	86
38) 1,1,1-Trichloroethane	10.15	97	23941	1.8765 ug/L	99
39) Cyclohexane	10.17	56	22528	1.8965 ug/L	89
40) 1,1-Dichloropropene	10.34	75	21378	1.9191 ug/L	100
41) Tert-Amyl-Methyl ether	10.44	73	455514	24.1049 ug/L	97
42) Carbon Tetrachloride	10.49	117	22574	1.9082 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

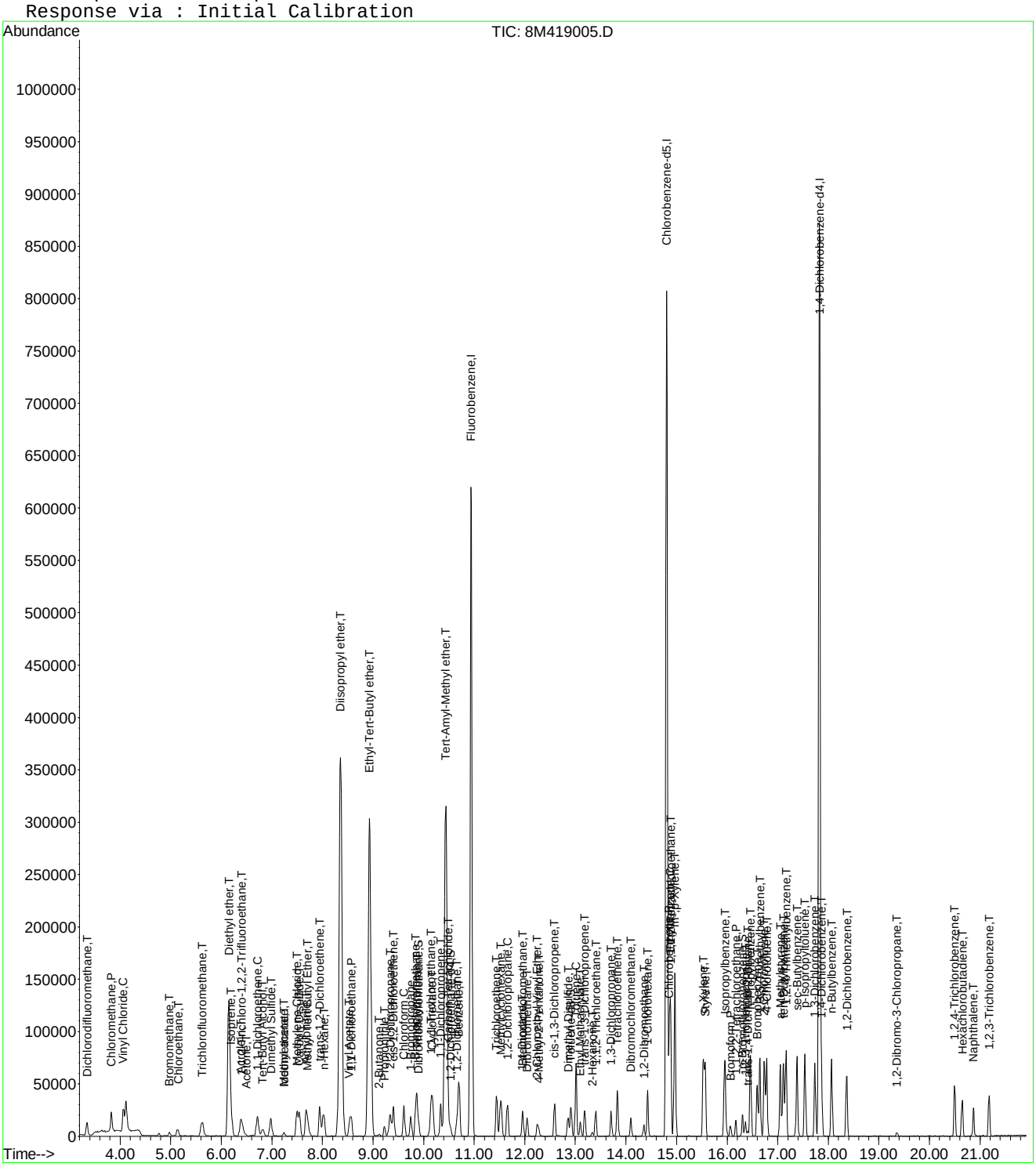
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	17154	1.9189	ug/L		100
46)	Benzene	10.70	78	65094	2.0026	ug/L		98
47)	Trichloroethene	11.44	130	17338	1.8988	ug/L		94
48)	Methylcyclohexane	11.52	83	22736	1.8679	ug/L		91
49)	1,2-Dichloropropane	11.66	63	15665	1.9732	ug/L		97
50)	Bromodichloromethane	11.96	83	20105	1.9351	ug/L		99
51)	1,4-Dioxane	11.95	88	1498	33.0951	ug/L		74
52)	Dibromomethane	12.05	93	8093	1.9809	ug/L		95
53)	2-Chloroethyl Vinyl Ether	12.25	63	5724	1.6664	ug/L		91
54)	4-Methyl-2-Pentanone	12.28	58	2383	1.5488	ug/L	#	73
55)	cis-1,3-Dichloropropene	12.59	75	21986	1.8582	ug/L		99
56)	Dimethyl Disulfide	12.86	79	7091	7.4642	ug/L		90
59)	Toluene	13.01	91	69700	2.0423	ug/L		98
60)	Ethyl Methacrylate	13.09	69	10905	1.6936	ug/L		84
62)	trans-1,3-Dichloropropene	13.19	75	17794	1.7978	ug/L		98
63)	1,1,2-Trichloroethane	13.40	97	10978	1.9551	ug/L		92
64)	2-Hexanone	13.33	58	1923	1.3955	ug/L	#	21
65)	1,3-Dichloropropane	13.70	76	18233	1.9209	ug/L		89
66)	Tetrachloroethene	13.83	164	13703	1.9115	ug/L		98
67)	Dibromochloromethane	14.10	129	13297	1.8429	ug/L		95
68)	1,2-Dibromoethane	14.36	107	10688	1.9487	ug/L		95
69)	1-Chlorohexane	14.43	91	20724	1.9193	ug/L		94
70)	Chlorobenzene	14.85	112	47662	1.9619	ug/L		90
71)	1,1,1,2-Tetrachloroethane	14.88	131	15693	1.8203	ug/L		97
72)	Ethylbenzene	14.87	106	26084	1.9171	ug/L		97
73)	m-,p-Xylene	14.97	106	60868	3.8629	ug/L		91
74)	o-Xylene	15.53	106	29031	1.8326	ug/L		95
75)	Styrene	15.56	104	45562	1.8345	ug/L		96
76)	Bromoform	16.07	173	6974	1.9520	ug/L		96
77)	Isopropylbenzene	15.96	105	75544	1.9916	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	11188	1.9280	ug/L		91
81)	1,2,3-Trichloropropane	16.36	110	3124	1.8778	ug/L		76
82)	trans-1,4-Dichloro-2-Buten	16.41	53	1589	1.7434	ug/L	#	37
83)	n-Propylbenzene	16.46	91	90826	2.1100	ug/L		99
84)	Bromobenzene	16.60	156	19940	1.9771	ug/L		98
85)	1,3,5-Trimethylbenzene	16.65	105	62132	1.9935	ug/L		99
86)	2-Chlorotoluene	16.73	91	56721	1.9302	ug/L		87
87)	4-Chlorotoluene	16.78	91	60016	2.2662	ug/L		88
88)	a-Methylstyrene	17.05	118	30045	1.7194	ug/L		99
89)	tert-Butylbenzene	17.12	134	13646	1.9338	ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	64473	2.0262	ug/L		99
91)	sec-Butylbenzene	17.38	105	80995	2.0748	ug/L		96
92)	p-Isopropyltoluene	17.54	119	64103	1.9501	ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	38573	1.9731	ug/L		98
94)	1,4-Dichlorobenzene	17.87	146	39209	1.9728	ug/L		84
95)	n-Butylbenzene	18.07	91	57496	1.9417	ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	34361	2.0008	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.36	75	1793	1.8985	ug/L		85
98)	1,2,4-Trichlorobenzene	20.49	180	21702	1.8770	ug/L		93
99)	Hexachlorobutadiene	20.65	225	10481	1.9480	ug/L		99
100)	Naphthalene	20.87	128	30316	1.8348	ug/L		95
101)	1,2,3-Trichlorobenzene	21.18	180	17347	1.8067	ug/L		99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7090	14.6	100	0.00
3	P	Chloromethane	2.0000	2.0826	-4.1	100	0.00
4	C	Vinyl Chloride	2.0000	2.0720	-3.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-15.5080	0.0	0	0.03
6	T	Bromomethane	2.0000	1.8796	6.0	100	0.00
7	T	Chloroethane	2.0000	1.9802	1.0	100	0.02
8	T	Trichlorofluoromethane	2.0000	1.8941	5.3	100	0.02
9	T	Diethyl ether	25.0000	24.4479	2.2	100	0.00
10	T	Isoprene	-1.0000	1.8530	0.0	100	0.00
11	T	Acrolein	12.5000	12.3674	1.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8461	7.7	100	0.00
13	T	Acetone	-1.0000	1.9772	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.8975	5.1	100	0.02
15	T	Tert-Butyl Alcohol	50.0000	42.0951	15.8	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.8968	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.3475	0.0	0	0.02
18	T	Methyl acetate	-1.0000	2.0602	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.8827	5.9	100	0.00
20	T	Carbon Disulfide	2.0000	1.9769	1.2	100	0.00
21	T	Acrylonitrile	12.5000	11.4657	8.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.8483	7.6	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9798	1.0	100	0.00
24	T	n-Hexane	-1.0000	2.0068	0.0	100	0.02
25	T	Diisopropyl ether	25.0000	25.1670	-0.7	100	0.00
26	T	Vinyl Acetate	-1.0000	1.8772	0.0	100	0.00
27	P	1,1-Dichloroethane	2.0000	1.9259	3.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	24.2936	2.8	100	0.00
29	T	2-Butanone	-1.0000	1.7126	0.0	100	0.00
30	T	Propionitrile	25.0000	22.9166	8.3	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0053	-0.3	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9338	3.3	100	0.00
33	C	Chloroform	2.0000	1.9850	0.8	100	0.00
34		1-Bromopropane	2.0000	1.8543	7.3	100	0.00
35	T	Bromochloromethane	2.0000	1.9850	0.8	100	-0.01
36	T	Tetrahydrofuran	25.0000	23.0121	8.0	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9585	4.2	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.8765	6.2	100	0.00
39	T	Cyclohexane	2.0000	1.8965	5.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9191	4.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.1049	3.6	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.9082	4.6	100	0.02
43	S	1,2-Dichloroethane-d4	1.0000	0.9482	5.2	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	2.0000	1.9189	4.1	100	0.00
46	T	Benzene	2.0000	2.0026	-0.1	100	0.00
47	T	Trichloroethene	2.0000	1.8988	5.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.8679	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	1.9732	1.3	100	0.00
50	T	Bromodichloromethane	2.0000	1.9351	3.2	100	0.00
51	T	1,4-Dioxane	-1.0000	33.0951	0.0	100	0.00
52	T	Dibromomethane	2.0000	1.9809	1.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.6664	16.7	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	1.5488	0.0	100	0.00

(#) = Out of Range
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8582	7.1	100	0.00
56	T	Dimethyl Disulfide	-1.0000	7.4642	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	0.9855	1.4	100	0.00
59	C	Toluene	2.0000	2.0423	-2.1	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.6936	15.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	2.0000	1.7978	10.1	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9551	2.2	100	0.00
64	T	2-Hexanone	-1.0000	1.3955	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9209	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9115	4.4	100	0.00
67	T	Dibromochloromethane	2.0000	1.8429	7.9	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9487	2.6	100	0.00
69	T	1-Chlorohexane	2.0000	1.9193	4.0	100	0.00
70	P	Chlorobenzene	2.0000	1.9619	1.9	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8203	9.0	100	0.00
72	C	Ethylbenzene	2.0000	1.9171	4.1	100	-0.01
73	T	m-,p-Xylene	4.0000	3.8629	3.4	100	0.00
74	T	o-Xylene	2.0000	1.8326	8.4	100	0.00
75	T	Styrene	2.0000	1.8345	8.3	100	0.00
76	P	Bromoform	2.0000	1.9520	2.4	100	0.02
77	T	Isopropylbenzene	2.0000	1.9916	0.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9280	3.6	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0161	-1.6	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8778	6.1	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7434	12.8	100	0.00
83	T	n-Propylbenzene	2.0000	2.1100	-5.5	100	0.00
84	T	Bromobenzene	2.0000	1.9771	1.1	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	1.9935	0.3	100	0.00
86	T	2-Chlorotoluene	2.0000	1.9302	3.5	100	0.00
87	T	4-Chlorotoluene	2.0000	2.2662	-13.3	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7194	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	1.9338	3.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	2.0262	-1.3	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0748	-3.7	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9501	2.5	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	1.9731	1.3	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9728	1.4	100	0.00
95	T	n-Butylbenzene	2.0000	1.9417	2.9	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	2.0008	-0.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.8985	5.1	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.8770	6.2	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.9480	2.6	100	0.00
100	T	Naphthalene	2.0000	1.8348	8.3	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8067	9.7	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	778912	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	612991	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	325196	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	19042	2.3308	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	9.32%#		
43) 1,2-Dichloroethane-d4	10.53	65	17061	2.4156	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	9.68%#		
58) Toluene-d8	12.91	98	67864	2.4230	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	9.68%#		
80) p-Bromofluorobenzene	16.30	95	27271	2.3761	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	9.52%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	43158	4.0943	ug/L	99
3) Chloromethane	3.83	50	64959	4.9293	ug/L	98
4) Vinyl Chloride	4.06	62	61310	4.9264	ug/L	99
5) 1,3-Butadiene	4.11	54	42524	3.2475	ug/L	80
6) Bromomethane	4.97	94	11598	3.9117	ug/L	96
7) Chloroethane	5.13	64	26632	4.8991	ug/L	96
8) Trichlorofluoromethane	5.62	101	65432	4.8407	ug/L	98
9) Diethyl ether	6.15	59	254455	49.9827	ug/L	91
10) Isoprene	6.19	67	49212	4.6047	ug/L	89
11) Acrolein	6.38	56	18060	25.6156	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	36923	4.7903	ug/L	99
13) Acetone	6.49	43	5612	5.1228	ug/L	83
14) 1,1-Dichloroethene	6.72	61	54337	4.8168	ug/L	92
15) Tert-Butyl Alcohol	6.82	59	38399	108.1334	ug/L	97
16) Dimethyl Sulfide	6.98	62	36188	4.8162	ug/L	88
17) Iodomethane	7.24	142	4078	1.2101	ug/L	89
18) Methyl acetate	7.25	43	15352	5.1176	ug/L #	85
19) Methylene Chloride	7.49	84	38847	4.7920	ug/L	82
20) Carbon Disulfide	7.55	76	116168	4.9528	ug/L	98
21) Acrylonitrile	7.67	53	38351	25.2377	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	78139	4.8920	ug/L	96
23) trans-1,2-Dichloroethene	7.95	61	52084	4.7457	ug/L	95
24) n-Hexane	8.02	57	46838	5.1127	ug/L	96
25) Diisopropyl ether	8.35	45	1253906	51.0432	ug/L	95
26) Vinyl Acetate	8.53	43	55036	4.9952	ug/L	92
27) 1,1-Dichloroethane	8.57	63	68755	4.8676	ug/L	98
28) Ethyl-Tert-Butyl ether	8.93	59	1064807	50.9683	ug/L	97
29) 2-Butanone	9.12	43	8240	4.7964	ug/L	80
30) Propionitrile	9.22	54	27971	52.5317	ug/L	100
31) 2,2-Dichloropropane	9.33	77	58069	4.8700	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	44615	4.9182	ug/L	96
33) Chloroform	9.61	83	71537	4.5709	ug/L	96
34) 1-Bromopropane	9.75	122	8516	4.7588	ug/L	99
35) Bromochloromethane	9.84	130	24918	5.0905	ug/L	91
36) Tetrahydrofuran	9.86	42	59759	50.5323	ug/L	85
38) 1,1,1-Trichloroethane	10.14	97	61305	4.8538	ug/L	98
39) Cyclohexane	10.17	56	57878	4.9219	ug/L	89
40) 1,1-Dichloropropene	10.34	75	52556	4.7657	ug/L	98
41) Tert-Amyl-Methyl ether	10.43	73	963240	51.4900	ug/L	97
42) Carbon Tetrachloride	10.48	117	56505	4.8249	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

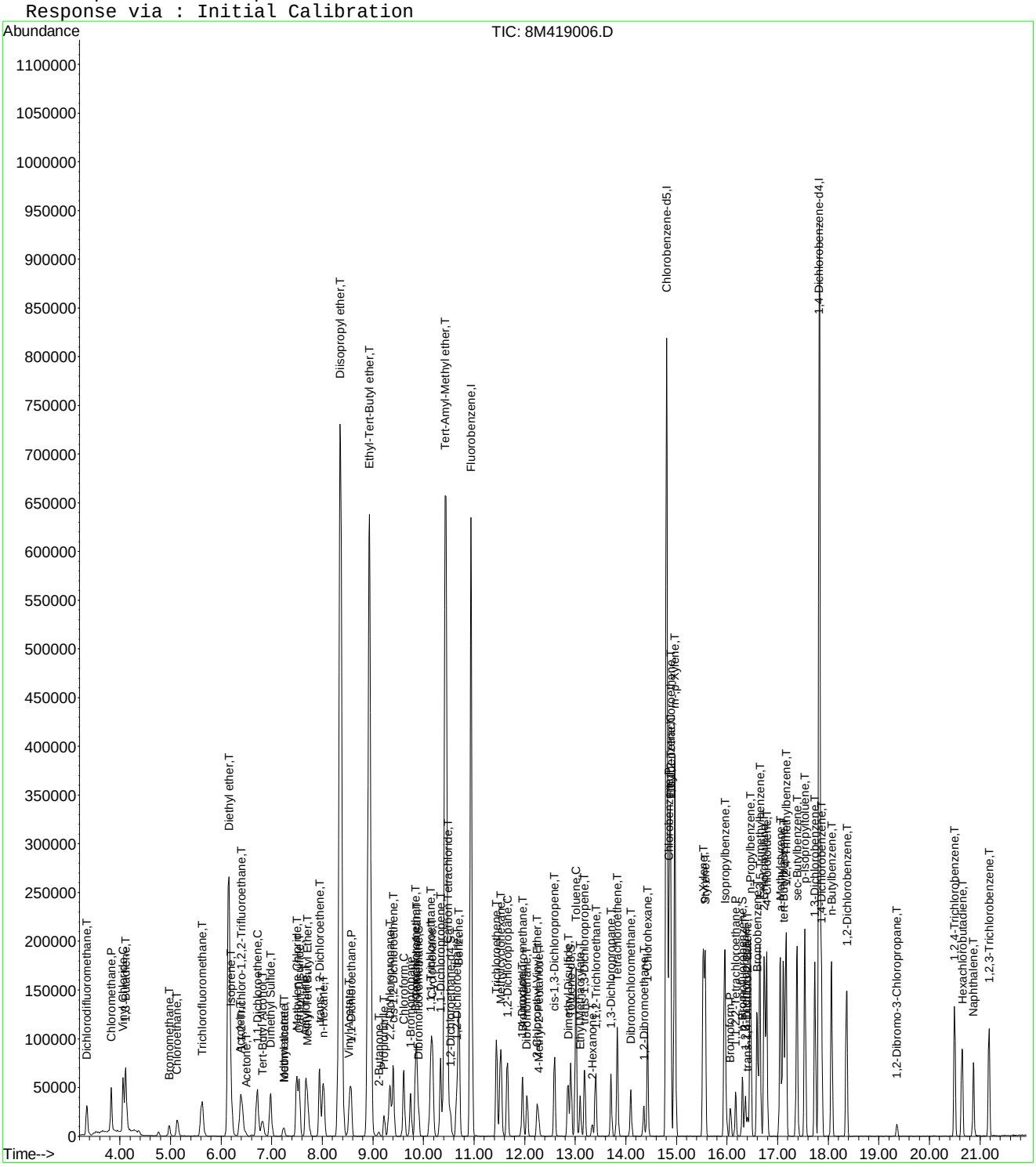
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	43458	4.9106	ug/L		97
46)	Benzene	10.70	78	157813	4.9044	ug/L		96
47)	Trichloroethene	11.44	130	42638	4.7169	ug/L		97
48)	Methylcyclohexane	11.52	83	57749	4.7926	ug/L		95
49)	1,2-Dichloropropane	11.66	63	37898	4.8221	ug/L		94
50)	Bromodichloromethane	11.96	83	49682	4.8305	ug/L		98
51)	1,4-Dioxane	11.95	88	4215	94.0662	ug/L		87
52)	Dibromomethane	12.04	93	20146	4.9810	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	15782	4.6410	ug/L		93
54)	4-Methyl-2-Pentanone	12.28	58	6536	4.2910	ug/L		95
55)	cis-1,3-Dichloropropene	12.59	75	56759	4.8458	ug/L		99
56)	Dimethyl Disulfide	12.86	79	20741	5.9847	ug/L		89
59)	Toluene	13.01	91	173564	5.0867	ug/L		97
60)	Ethyl Methacrylate	13.10	69	30943	4.8067	ug/L		84
62)	trans-1,3-Dichloropropene	13.18	75	47647	4.8150	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	27951	4.9790	ug/L		97
64)	2-Hexanone	13.33	58	5889	4.2746	ug/L	#	80
65)	1,3-Dichloropropane	13.71	76	45722	4.8179	ug/L		84
66)	Tetrachloroethene	13.83	164	34889	4.8678	ug/L		97
67)	Dibromochloromethane	14.10	129	35461	4.9157	ug/L		98
68)	1,2-Dibromoethane	14.36	107	27169	4.9547	ug/L		98
69)	1-Chlorohexane	14.43	91	52484	4.8617	ug/L		91
70)	Chlorobenzene	14.85	112	114782	4.7258	ug/L		100
71)	1,1,1,2-Tetrachloroethane	14.88	131	41080	4.7660	ug/L		99
72)	Ethylbenzene	14.88	106	62867	4.6214	ug/L		90
73)	m-,p-Xylene	14.97	106	153807	9.7633	ug/L		91
74)	o-Xylene	15.53	106	76425	4.8253	ug/L		99
75)	Styrene	15.57	104	122002	4.9133	ug/L		98
76)	Bromoform	16.06	173	19962	4.5235	ug/L		95
77)	Isopropylbenzene	15.96	105	195151	5.1460	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	30245	4.9291	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	8507	4.8359	ug/L		83
82)	trans-1,4-Dichloro-2-Buten	16.40	53	5523	4.2935	ug/L		74
83)	n-Propylbenzene	16.47	91	234652	5.1554	ug/L		99
84)	Bromobenzene	16.60	156	52847	4.9554	ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	163016	4.9464	ug/L		99
86)	2-Chlorotoluene	16.73	91	166031	5.3432	ug/L		95
87)	4-Chlorotoluene	16.79	91	121429	4.3363	ug/L		100
88)	a-Methylstyrene	17.05	118	84298	4.5624	ug/L		95
89)	tert-Butylbenzene	17.12	134	34340	4.6022	ug/L		94
90)	1,2,4-Trimethylbenzene	17.17	105	167693	4.9841	ug/L		100
91)	sec-Butylbenzene	17.38	105	207005	5.0149	ug/L		100
92)	p-Isopropyltoluene	17.54	119	170789	4.9137	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	99857	4.8307	ug/L		97
94)	1,4-Dichlorobenzene	17.87	146	98681	4.6956	ug/L		94
95)	n-Butylbenzene	18.07	91	145988	4.6626	ug/L		98
96)	1,2-Dichlorobenzene	18.37	146	89702	4.9398	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	4713	4.7194	ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	55429	4.5338	ug/L		97
99)	Hexachlorobutadiene	20.65	225	26149	4.5963	ug/L		99
100)	Naphthalene	20.87	128	81337	4.6555	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	44939	4.4263	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419006.D 8260WT.M Tue Apr 18 11:59:03 2017 Page 3

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.0943	18.1	100	-0.01
3	P	Chloromethane	5.0000	4.9293	1.4	100	0.01
4	C	Vinyl Chloride	5.0000	4.9264	1.5	100	0.01
5	T	1,3-Butadiene	5.0000	3.2475	35.0#	100	0.02
6	T	Bromomethane	5.0000	3.9117	21.8	100	0.01
7	T	Chloroethane	5.0000	4.8991	2.0	100	0.00
8	T	Trichlorofluoromethane	5.0000	4.8407	3.2	100	0.02
9	T	Diethyl ether	50.0000	49.9827	0.0	100	0.01
10	T	Isoprene	5.0000	4.6047	7.9	100	0.01
11	T	Acrolein	25.0000	25.6156	-2.5	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.7903	4.2	100	0.00
13	T	Acetone	5.0000	5.1228	-2.5	100	0.01
14	C	1,1-Dichloroethene	5.0000	4.8168	3.7	100	0.02
15	T	Tert-Butyl Alcohol	100.0000	108.1334	-8.1	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8162	3.7	100	0.00
17	T	Iodomethane	5.0000	1.2101	75.8#	100	0.01
18	T	Methyl acetate	5.0000	5.1176	-2.4	100	0.01
19	T	Methylene Chloride	5.0000	4.7920	4.2	100	0.00
20	T	Carbon Disulfide	5.0000	4.9528	0.9	100	0.00
21	T	Acrylonitrile	25.0000	25.2377	-1.0	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	4.8920	2.2	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.7457	5.1	100	0.01
24	T	n-Hexane	5.0000	5.1127	-2.3	100	0.01
25	T	Diisopropyl ether	50.0000	51.0432	-2.1	100	0.00
26	T	Vinyl Acetate	5.0000	4.9952	0.1	100	0.00
27	P	1,1-Dichloroethane	5.0000	4.8676	2.6	100	0.01
28	T	Ethyl-Tert-Butyl ether	50.0000	50.9683	-1.9	100	0.00
29	T	2-Butanone	5.0000	4.7964	4.1	100	0.01
30	T	Propionitrile	50.0000	52.5317	-5.1	100	0.00
31	T	2,2-Dichloropropane	5.0000	4.8700	2.6	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9182	1.6	100	0.00
33	C	Chloroform	5.0000	4.5709	8.6	100	0.01
34		1-Bromopropane	5.0000	4.7588	4.8	100	0.00
35	T	Bromochloromethane	5.0000	5.0905	-1.8	100	-0.01
36	T	Tetrahydrofuran	50.0000	50.5323	-1.1	100	0.00
37	S	Dibromofluoromethane	2.5000	2.3308	6.8	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8538	2.9	100	0.00
39	T	Cyclohexane	5.0000	4.9219	1.6	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.7657	4.7	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	51.4900	-3.0	100	-0.01
42	T	Carbon Tetrachloride	5.0000	4.8249	3.5	100	0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4156	3.4	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	5.0000	4.9106	1.8	100	0.00
46	T	Benzene	5.0000	4.9044	1.9	100	0.00
47	T	Trichloroethene	5.0000	4.7169	5.7	100	0.00
48	T	Methylcyclohexane	5.0000	4.7926	4.1	100	0.00
49	C	1,2-Dichloropropane	5.0000	4.8221	3.6	100	0.01
50	T	Bromodichloromethane	5.0000	4.8305	3.4	100	0.00
51	T	1,4-Dioxane	100.0000	94.0662	5.9	100	0.00
52	T	Dibromomethane	5.0000	4.9810	0.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	4.6410	7.2	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.2910	14.2	100	0.00

(#) = Out of Range
8M419006.D 8260WT.M Tue Apr 18 12:00:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	4.8458	3.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	5.9847	-19.7	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.4230	3.1	100	0.00
59	C	Toluene	5.0000	5.0867	-1.7	100	0.00
60	T	Ethyl Methacrylate	5.0000	4.8067	3.9	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	5.0000	4.8150	3.7	100	-0.01
63	T	1,1,2-Trichloroethane	5.0000	4.9790	0.4	100	0.00
64	T	2-Hexanone	5.0000	4.2745	14.5	100	0.00
65	T	1,3-Dichloropropane	5.0000	4.8179	3.6	100	0.00
66	T	Tetrachloroethene	5.0000	4.8678	2.6	100	0.00
67	T	Dibromochloromethane	5.0000	4.9157	1.7	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9547	0.9	100	0.00
69	T	1-Chlorohexane	5.0000	4.8617	2.8	100	0.00
70	P	Chlorobenzene	5.0000	4.7258	5.5	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.7660	4.7	100	0.01
72	C	Ethylbenzene	5.0000	4.6214	7.6	100	0.00
73	T	m-,p-Xylene	10.0000	9.7632	2.4	100	0.00
74	T	o-Xylene	5.0000	4.8253	3.5	100	0.01
75	T	Styrene	5.0000	4.9133	1.7	100	0.00
76	P	Bromoform	5.0000	4.5235	9.5	100	0.01
77	T	Isopropylbenzene	5.0000	5.1460	-2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	4.9291	1.4	100	-0.01
80	S	p-Bromofluorobenzene	2.5000	2.3761	5.0	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	4.8359	3.3	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.2935	14.1	100	0.00
83	T	n-Propylbenzene	5.0000	5.1554	-3.1	100	0.01
84	T	Bromobenzene	5.0000	4.9554	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9464	1.1	100	0.01
86	T	2-Chlorotoluene	5.0000	5.3432	-6.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.3363	13.3	100	0.00
88	T	a-Methylstyrene	5.0000	4.5624	8.8	100	0.00
89	T	tert-Butylbenzene	5.0000	4.6022	8.0	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9841	0.3	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0149	-0.3	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9136	1.7	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8308	3.4	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.6956	6.1	100	0.00
95	T	n-Butylbenzene	5.0000	4.6626	6.7	100	0.01
96	T	1,2-Dichlorobenzene	5.0000	4.9398	1.2	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	4.7194	5.6	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.5338	9.3	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.5963	8.1	100	0.00
100	T	Naphthalene	5.0000	4.6555	6.9	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.4263	11.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419006.D 8260WT.M Tue Apr 18 12:00:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	821977	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	642967	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	340149	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	85773	9.9487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 39.80%#			
43) 1,2-Dichloroethane-d4	10.53	65	74599	10.0087	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.04%#			
58) Toluene-d8	12.91	98	304223	10.3554	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 41.44%#			
80) p-Bromofluorobenzene	16.30	95	119256	9.9340	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 39.72%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	252364	22.6868	ug/L	99
3) Chloromethane	3.83	50	287414	20.6672	ug/L	98
4) Vinyl Chloride	4.06	62	282320	21.4964	ug/L	98
5) 1,3-Butadiene	4.11	54	161495	28.2603	ug/L	87
6) Bromomethane	4.97	94	81674	20.2735	ug/L	99
7) Chloroethane	5.13	64	120257	20.9628	ug/L	97
8) Trichlorofluoromethane	5.62	101	297058	20.8251	ug/L	100
9) Diethyl ether	6.15	59	415326	77.3083	ug/L	91
10) Isoprene	6.19	67	213582	18.9375	ug/L	91
11) Acrolein	6.38	56	27406	36.8350	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	166401	20.4573	ug/L	99
13) Acetone	6.48	43	21719	18.7871	ug/L	94
14) 1,1-Dichloroethene	6.72	61	247619	20.8008	ug/L	96
15) Tert-Butyl Alcohol	6.82	59	55617	148.4145	ug/L	99
16) Dimethyl Sulfide	6.98	62	148417	18.7178	ug/L	90
17) Iodomethane	7.24	142	44249	12.4422	ug/L	90
18) Methyl acetate	7.24	43	60034	18.9640	ug/L	90
19) Methylene Chloride	7.49	84	172623	20.1783	ug/L	82
20) Carbon Disulfide	7.55	76	479534	19.3736	ug/L	99
21) Acrylonitrile	7.67	53	64007	39.9143	ug/L	100
22) Methyl Tert Butyl Ether	7.70	73	348421	20.6705	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	236570	20.4261	ug/L	96
24) n-Hexane	8.02	57	182974	18.9267	ug/L	91
25) Diisopropyl ether	8.36	45	2083333	80.3637	ug/L	95
26) Vinyl Acetate	8.53	43	230138	19.7935	ug/L	95
27) 1,1-Dichloroethane	8.57	63	311422	20.8926	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	1753329	79.5282	ug/L	97
29) 2-Butanone	9.12	43	34263	18.8992	ug/L	91
30) Propionitrile	9.22	54	43804	77.9572	ug/L	100
31) 2,2-Dichloropropane	9.34	77	262688	20.8761	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	197079	20.5872	ug/L	94
33) Chloroform	9.61	83	315049	19.0755	ug/L	99
34) 1-Bromopropane	9.75	122	36957	19.5700	ug/L	98
35) Bromochloromethane	9.84	130	109675	21.2316	ug/L	94
36) Tetrahydrofuran	9.86	42	95917	76.8581	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	279934	21.0024	ug/L	99
39) Cyclohexane	10.17	56	235278	18.9596	ug/L	91
40) 1,1-Dichloropropene	10.34	75	238994	20.5364	ug/L	99
41) Tert-Amyl-Methyl ether	10.44	73	1574273	79.7438	ug/L	98
42) Carbon Tetrachloride	10.48	117	265448	21.4787	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

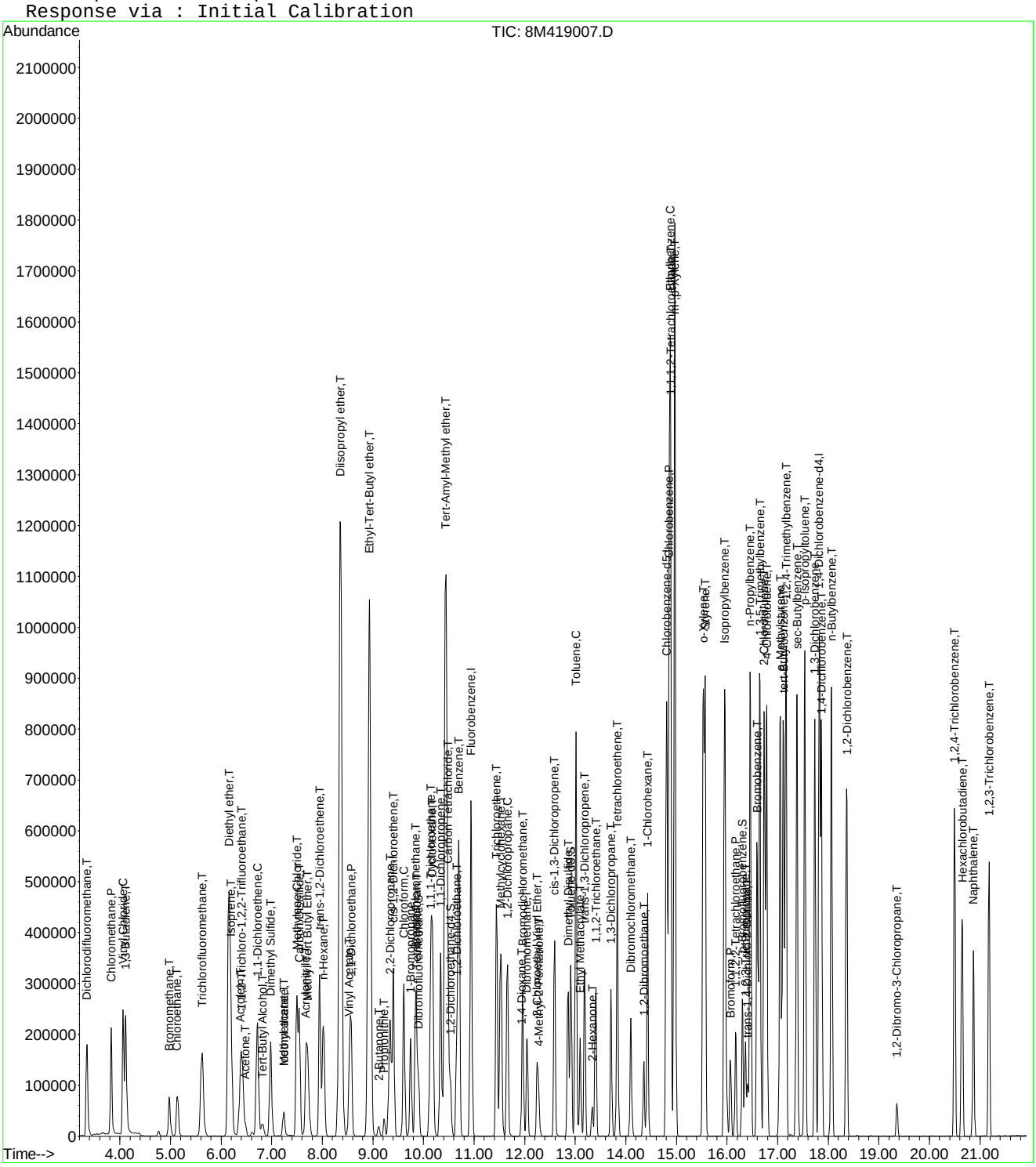
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	195832	20.9688	ug/L	96
46)	Benzene	10.70	78	711384	20.9494	ug/L	96
47)	Trichloroethene	11.44	130	193633	20.2988	ug/L	98
48)	Methylcyclohexane	11.53	83	242870	19.0998	ug/L	96
49)	1,2-Dichloropropane	11.66	63	168889	20.3636	ug/L	95
50)	Bromodichloromethane	11.96	83	229920	21.1836	ug/L	99
51)	1,4-Dioxane	11.94	88	6600	139.5754	ug/L	85
52)	Dibromomethane	12.04	93	90632	21.2345	ug/L	100
53)	2-Chloroethyl Vinyl Ether	12.25	63	69708	19.4252	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	29890	18.5953	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	263367	21.3068	ug/L	99
56)	Dimethyl Disulfide	12.86	79	111248	17.7360	ug/L	95
59)	Toluene	13.01	91	775026	21.6549	ug/L	99
60)	Ethyl Methacrylate	13.10	69	134570	19.9297	ug/L	85
62)	trans-1,3-Dichloropropene	13.19	75	216517	20.8604	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	122992	20.8877	ug/L	97
64)	2-Hexanone	13.33	58	27313	18.9010	ug/L	86
65)	1,3-Dichloropropane	13.71	76	210672	21.1642	ug/L	88
66)	Tetrachloroethene	13.83	164	159386	21.2013	ug/L	98
67)	Dibromochloromethane	14.10	129	162011	21.4115	ug/L	100
68)	1,2-Dibromoethane	14.36	107	124514	21.6484	ug/L	98
69)	1-Chlorohexane	14.43	91	226576	20.0098	ug/L	94
70)	Chlorobenzene	14.85	112	518298	20.3445	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.88	131	195026	21.5715	ug/L	99
72)	Ethylbenzene	14.87	106	295348	20.6992	ug/L	97
73)	m-,p-Xylene	14.97	106	708993	42.9068	ug/L	96
74)	o-Xylene	15.54	106	341856	20.5778	ug/L	100
75)	Styrene	15.57	104	572956	21.9986	ug/L	97
76)	Bromoform	16.07	173	98140	19.0943	ug/L	98
77)	Isopropylbenzene	15.95	105	862970	21.6948	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.17	83	138371	21.5592	ug/L	98
81)	1,2,3-Trichloropropane	16.36	110	38934	21.1594	ug/L	72
82)	trans-1,4-Dichloro-2-Buten	16.40	53	29562	19.3838	ug/L	86
83)	n-Propylbenzene	16.45	91	1035858	21.7579	ug/L	100
84)	Bromobenzene	16.60	156	233146	20.9007	ug/L	97
85)	1,3,5-Trimethylbenzene	16.65	105	744817	21.6064	ug/L	99
86)	2-Chlorotoluene	16.73	91	638655	19.6497	ug/L	93
87)	4-Chlorotoluene	16.79	91	644553	22.0056	ug/L	99
88)	a-Methylstyrene	17.05	118	368766	19.0812	ug/L	97
89)	tert-Butylbenzene	17.12	134	159935	20.4918	ug/L	94
90)	1,2,4-Trimethylbenzene	17.17	105	766585	21.7826	ug/L	98
91)	sec-Butylbenzene	17.39	105	933219	21.6142	ug/L	99
92)	p-Isopropyltoluene	17.54	119	792583	21.8005	ug/L	98
93)	1,3-Dichlorobenzene	17.74	146	452988	20.9507	ug/L	97
94)	1,4-Dichlorobenzene	17.87	146	445404	20.2622	ug/L	99
95)	n-Butylbenzene	18.07	91	716182	21.8682	ug/L	100
96)	1,2-Dichlorobenzene	18.37	146	397181	20.9107	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.36	75	20637	19.7567	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	259021	20.2551	ug/L	99
99)	Hexachlorobutadiene	20.65	225	122095	20.5178	ug/L	100
100)	Naphthalene	20.87	128	379929	20.7902	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	218288	20.5554	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:05 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	830845	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	667165	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	355416	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	225758	25.9058	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.64%			
43) 1,2-Dichloroethane-d4	10.53	65	196828	26.1260	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.52%			
58) Toluene-d8	12.91	98	790662	25.9370	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.76%			
80) p-Bromofluorobenzene	16.30	95	316705	25.2481	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	614921	54.6895	ug/L	100
3) Chloromethane	3.82	50	669133	47.6020	ug/L	99
4) Vinyl Chloride	4.06	62	646175	48.6760	ug/L	98
5) 1,3-Butadiene	4.10	54	271666	52.3987	ug/L	95
6) Bromomethane	4.97	94	247075	50.8432	ug/L	99
7) Chloroethane	5.14	64	294319	50.7572	ug/L	96
8) Trichlorofluoromethane	5.62	101	725121	50.2916	ug/L	99
9) Diethyl ether	6.15	59	532757	98.1084	ug/L	92
10) Isoprene	6.18	67	574160	50.3651	ug/L	91
11) Acrolein	6.39	56	36832	48.9756	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	415693	50.5596	ug/L	99
13) Acetone	6.48	43	59341	50.7827	ug/L	93
14) 1,1-Dichloroethene	6.71	61	615843	51.1806	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	75781	200.0639	ug/L	99
16) Dimethyl Sulfide	6.98	62	398383	49.7064	ug/L	89
17) Iodomethane	7.23	142	201159	55.9595	ug/L	95
18) Methyl acetate	7.23	43	161579	50.4959	ug/L	92
19) Methylene Chloride	7.49	84	428023	49.4986	ug/L	84
20) Carbon Disulfide	7.54	76	1268101	50.6857	ug/L	100
21) Acrylonitrile	7.68	53	87950	54.2596	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	877515	51.5041	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	586042	50.0603	ug/L	95
24) n-Hexane	8.02	57	481804	49.3054	ug/L	92
25) Diisopropyl ether	8.35	45	2603190	99.3452	ug/L	96
26) Vinyl Acetate	8.53	43	596735	50.7757	ug/L	95
27) 1,1-Dichloroethane	8.57	63	767008	50.9075	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2222589	99.7371	ug/L	98
29) 2-Butanone	9.12	43	93741	51.1549	ug/L	90
30) Propionitrile	9.22	54	56850	100.0950	ug/L	99
31) 2,2-Dichloropropane	9.33	77	643624	50.6036	ug/L	100
32) cis-1,2-Dichloroethene	9.40	96	492349	50.8826	ug/L	96
33) Chloroform	9.61	83	775769	46.4696	ug/L	98
34) 1-Bromopropane	9.75	122	94615	49.5670	ug/L	98
35) Bromochloromethane	9.84	130	277955	53.2340	ug/L	94
36) Tetrahydrofuran	9.86	42	125929	99.8297	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	697375	51.7630	ug/L	99
39) Cyclohexane	10.17	56	629161	50.1591	ug/L	91
40) 1,1-Dichloropropene	10.34	75	585776	49.7976	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	2000715	100.2633	ug/L	97
42) Carbon Tetrachloride	10.48	117	654658	52.4061	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:07 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

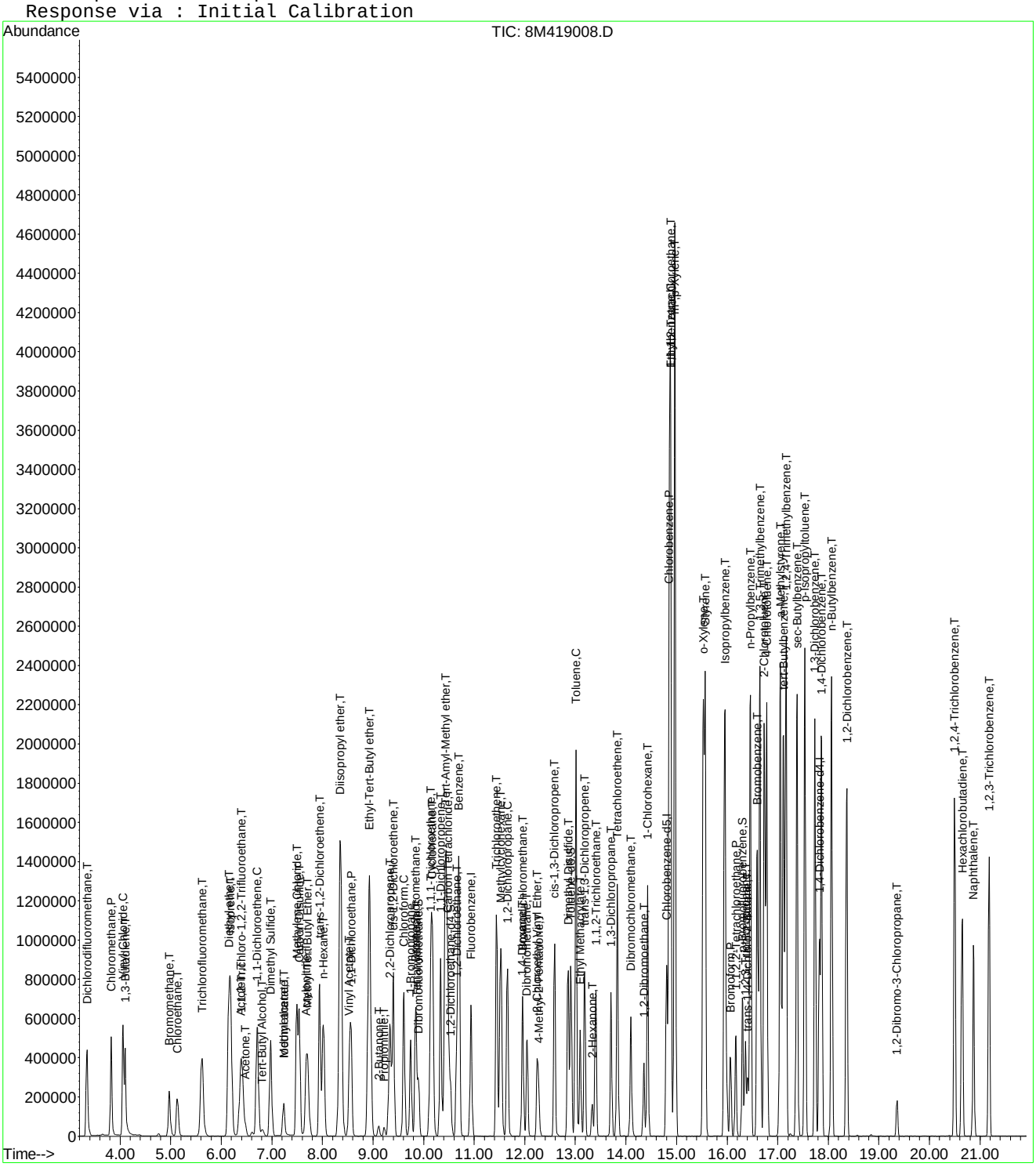
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	486966	51.5856	ug/L	96
46)	Benzene	10.70	78	1734691	50.5393	ug/L	95
47)	Trichloroethene	11.44	130	482430	50.0340	ug/L	98
48)	Methylcyclohexane	11.52	83	641638	49.9211	ug/L	95
49)	1,2-Dichloropropane	11.66	63	424777	50.6703	ug/L	95
50)	Bromodichloromethane	11.96	83	576854	52.5810	ug/L	98
51)	1,4-Dioxane	11.95	88	10143	212.2125	ug/L	95
52)	Dibromomethane	12.04	93	226605	52.5254	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.25	63	188674	52.0156	ug/L	98
54)	4-Methyl-2-Pentanone	12.28	58	83519	51.4047	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	670536	53.6685	ug/L	99
56)	Dimethyl Disulfide	12.86	79	333317	46.4713	ug/L	95
59)	Toluene	13.01	91	1910471	51.4442	ug/L	99
60)	Ethyl Methacrylate	13.09	69	383134	54.6839	ug/L	86
62)	trans-1,3-Dichloropropene	13.19	75	563669	52.3371	ug/L	99
63)	1,1,2-Trichloroethane	13.40	97	305450	49.9930	ug/L	98
64)	2-Hexanone	13.33	58	78016	52.0300	ug/L	88
65)	1,3-Dichloropropane	13.70	76	530141	51.3266	ug/L	88
66)	Tetrachloroethene	13.83	164	393935	50.5000	ug/L	97
67)	Dibromochloromethane	14.10	129	424633	54.0844	ug/L	100
68)	1,2-Dibromoethane	14.36	107	314486	52.6944	ug/L	100
69)	1-Chlorohexane	14.43	91	601634	51.2055	ug/L	95
70)	Chlorobenzene	14.85	112	1317659	49.8455	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	513627	54.7508	ug/L	100
72)	Ethylbenzene	14.88	106	758538	51.2333	ug/L	99
73)	m-,p-Xylene	14.97	106	1805748	105.3165	ug/L	100
74)	o-Xylene	15.53	106	865202	50.1913	ug/L	99
75)	Styrene	15.56	104	1482377	54.8515	ug/L	96
76)	Bromoform	16.07	173	261596	48.1536	ug/L	100
77)	Isopropylbenzene	15.96	105	2152073	52.1403	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	351132	52.3588	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	102223	53.1686	ug/L	89
82)	trans-1,4-Dichloro-2-Buten	16.40	53	86624	53.2257	ug/L	89
83)	n-Propylbenzene	16.46	91	2542578	51.1120	ug/L	98
84)	Bromobenzene	16.60	156	600757	51.5423	ug/L	96
85)	1,3,5-Trimethylbenzene	16.65	105	1864667	51.7685	ug/L	97
86)	2-Chlorotoluene	16.73	91	1562483	46.0085	ug/L	82
87)	4-Chlorotoluene	16.78	91	1653591	54.0299	ug/L	92
88)	a-Methylstyrene	17.05	118	1034318	51.2201	ug/L	100
89)	tert-Butylbenzene	17.12	134	406063	49.7923	ug/L	95
90)	1,2,4-Trimethylbenzene	17.17	105	1948760	52.9955	ug/L	97
91)	sec-Butylbenzene	17.38	105	2311933	51.2464	ug/L	98
92)	p-Isopropyltoluene	17.54	119	1987599	52.3217	ug/L	99
93)	1,3-Dichlorobenzene	17.74	146	1155357	51.1399	ug/L	98
94)	1,4-Dichlorobenzene	17.87	146	1131775	49.2748	ug/L	99
95)	n-Butylbenzene	18.07	91	1806946	52.8040	ug/L	99
96)	1,2-Dichlorobenzene	18.37	146	1022039	51.4969	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	56496	51.7628	ug/L	90
98)	1,2,4-Trichlorobenzene	20.49	180	698538	52.2784	ug/L	99
99)	Hexachlorobutadiene	20.65	225	312987	50.3375	ug/L	98
100)	Naphthalene	20.87	128	1020583	53.4486	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583406	52.5775	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	890949	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	720891	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	383088	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	472717	52.5898	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 210.36%#			
43) 1,2-Dichloroethane-d4	10.53	65	409191	52.1214	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 208.48%#			
58) Toluene-d8	12.91	98	1637669	49.8807	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 199.52%#			
80) p-Bromofluorobenzene	16.30	95	659264	49.4208	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 197.68%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	1290950	114.7073	ug/L	99
3) Chloromethane	3.82	50	1428240	91.5868	ug/L	99
4) Vinyl Chloride	4.06	62	1309074	87.7619	ug/L	99
5) 1,3-Butadiene	4.10	54	464115	48.1221	ug/L	96
6) Bromomethane	4.97	94	643662	218.3047	ug/L	99
7) Chloroethane	5.13	64	642480	105.8029	ug/L	98
8) Trichlorofluoromethane	5.62	101	1556663	102.1329	ug/L	100
9) Diethyl ether	6.15	59	1193850	209.2873	ug/L	91
10) Isoprene	6.18	67	1256334	110.0441	ug/L	89
11) Acrolein	6.39	56	84264	106.8054	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	896546	103.8513	ug/L	98
13) Acetone	6.48	43	131839	107.1463	ug/L	95
14) 1,1-Dichloroethene	6.71	61	1340489	106.4797	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	161800	419.1836	ug/L	100
16) Dimethyl Sulfide	6.98	62	875323	107.2557	ug/L	91
17) Iodomethane	7.24	142	550506	330.5339	ug/L	94
18) Methyl acetate	7.24	43	350126	103.5017	ug/L	91
19) Methylene Chloride	7.49	84	940849	102.7095	ug/L	84
20) Carbon Disulfide	7.55	76	2734573	101.8614	ug/L	99
21) Acrylonitrile	7.68	53	192477	116.4657	ug/L	98
22) Methyl Tert Butyl Ether	7.70	73	1934910	108.5495	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	1292550	104.8396	ug/L	95
24) n-Hexane	8.02	57	1050655	101.8502	ug/L	92
25) Diisopropyl ether	8.36	45	5712696	202.4948	ug/L	97
26) Vinyl Acetate	8.53	43	1305418	104.1714	ug/L	95
27) 1,1-Dichloroethane	8.57	63	1685691	106.7005	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	4942845	209.1646	ug/L	98
29) 2-Butanone	9.12	43	205108	109.6264	ug/L	92
30) Propionitrile	9.22	54	127357	217.6184	ug/L	100
31) 2,2-Dichloropropane	9.33	77	1411824	105.4011	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	1085665	107.4406	ug/L	95
33) Chloroform	9.61	83	1687138	91.3508	ug/L	97
34) 1-Bromopropane	9.75	122	211298	107.4131	ug/L	100
35) Bromochloromethane	9.84	130	607058	113.4193	ug/L	94
36) Tetrahydrofuran	9.86	42	282824	212.9932	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	1536060	110.9408	ug/L	100
39) Cyclohexane	10.17	56	1386309	106.7139	ug/L	90
40) 1,1-Dichloropropene	10.34	75	1279941	102.9919	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	4484638	212.9890	ug/L	97
42) Carbon Tetrachloride	10.48	117	1460831	114.3286	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:10 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

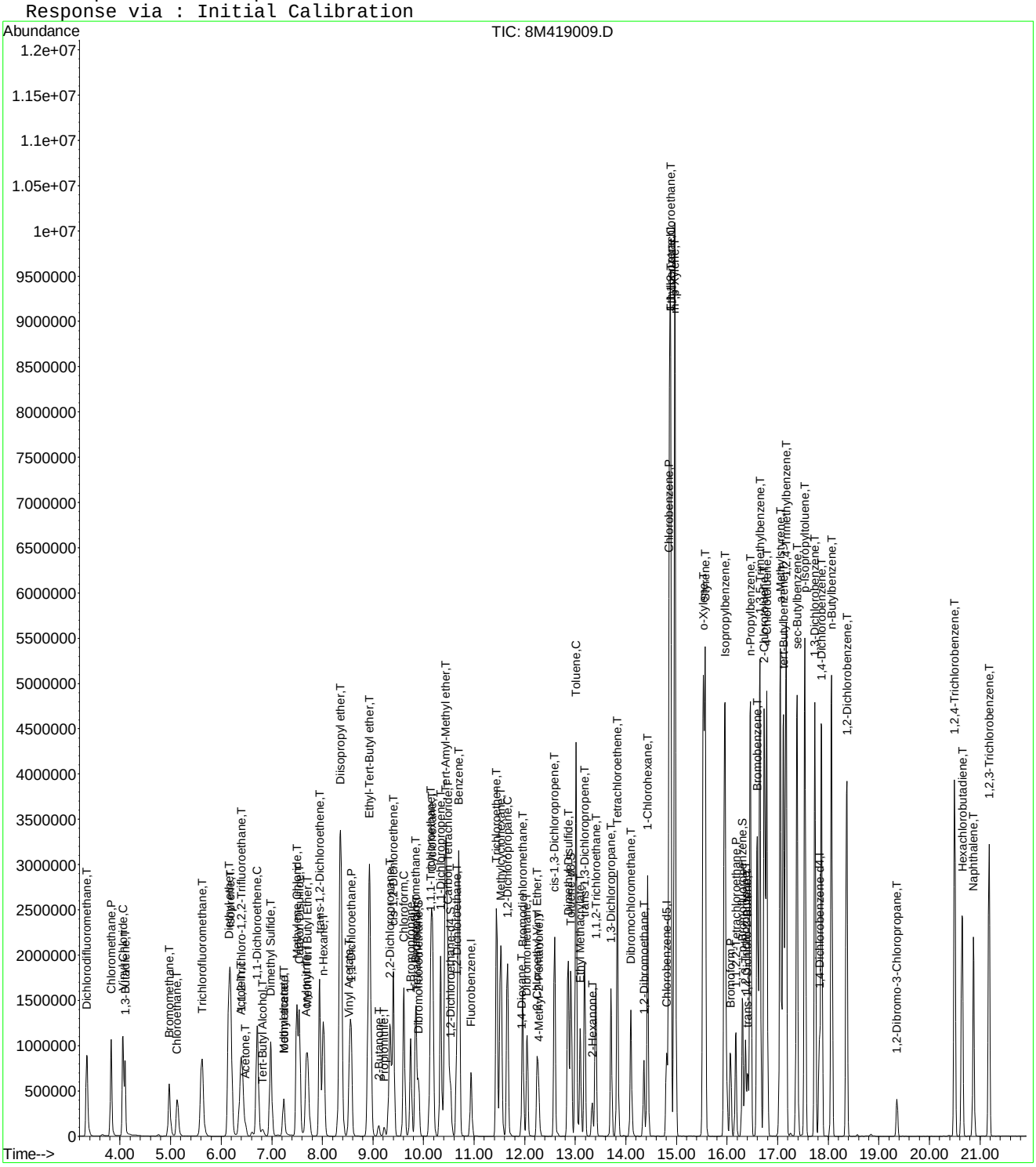
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	1085356	110.6535	ug/L		97
46)	Benzene	10.70	78	3722629	100.4557	ug/L		93
47)	Trichloroethene	11.44	130	1074923	106.6468	ug/L		98
48)	Methylcyclohexane	11.52	83	1398054	106.0194	ug/L		95
49)	1,2-Dichloropropane	11.66	63	942189	107.5812	ug/L		95
50)	Bromodichloromethane	11.96	83	1280673	114.1972	ug/L		98
51)	1,4-Dioxane	11.94	88	22104	475.7434	ug/L		90
52)	Dibromomethane	12.04	93	499793	112.7164	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	415136	117.1702	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	182865	117.4045	ug/L		98
55)	cis-1,3-Dichloropropene	12.59	75	1487011	117.8164	ug/L		100
56)	Dimethyl Disulfide	12.86	79	764852	141.9810	ug/L		96
59)	Toluene	13.01	91	4070819	100.0521	ug/L		97
60)	Ethyl Methacrylate	13.10	69	835156	122.6996	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	1269353	114.4143	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	683956	104.4552	ug/L		97
64)	2-Hexanone	13.33	58	172797	118.5052	ug/L		88
65)	1,3-Dichloropropane	13.70	76	1162920	105.4392	ug/L		87
66)	Tetrachloroethene	13.83	164	900370	111.2776	ug/L		98
67)	Dibromochloromethane	14.10	129	959992	121.1054	ug/L		100
68)	1,2-Dibromoethane	14.36	107	694704	111.6258	ug/L		100
69)	1-Chlorohexane	14.43	91	1319148	108.1005	ug/L		93
70)	Chlorobenzene	14.85	112	3004153	106.5496	ug/L		99
71)	1,1,1,2-Tetrachloroethane	14.88	131	1219121	127.8831	ug/L		99
72)	Ethylbenzene	14.88	106	1786508	119.7983	ug/L		90
73)	m-,p-Xylene	14.97	106	4003661	220.6823	ug/L		86
74)	o-Xylene	15.53	106	1960306	109.1849	ug/L		94
75)	Styrene	15.57	104	3292073	119.3828	ug/L		99
76)	Bromoform	16.07	173	597737	133.4926	ug/L		99
77)	Isopropylbenzene	15.96	105	4545601	100.7509	ug/L		94
79)	1,1,2,2-Tetrachloroethane	16.17	83	769153	108.8387	ug/L		96
81)	1,2,3-Trichloropropane	16.36	110	224094	112.8735	ug/L	#	29
82)	trans-1,4-Dichloro-2-Buten	16.40	53	175819	145.3184	ug/L	#	32
83)	n-Propylbenzene	16.46	91	5183759	92.3935	ug/L		93
84)	Bromobenzene	16.60	156	1335569	109.7181	ug/L		95
85)	1,3,5-Trimethylbenzene	16.65	105	3967760	101.5410	ug/L		94
86)	2-Chlorotoluene	16.73	91	3371801	88.0052	ug/L		79
87)	4-Chlorotoluene	16.78	91	3536460	106.8023	ug/L		95
88)	a-Methylstyrene	17.05	118	2324630	114.4381	ug/L		99
89)	tert-Butylbenzene	17.12	134	920850	109.7387	ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	4138155	104.6152	ug/L		93
91)	sec-Butylbenzene	17.38	105	4819621	95.4354	ug/L		95
92)	p-Isopropyltoluene	17.54	119	4194755	101.5359	ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	2515568	104.3629	ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	2479841	99.2322	ug/L		99
95)	n-Butylbenzene	18.07	91	3805421	103.0498	ug/L		95
96)	1,2-Dichlorobenzene	18.37	146	2228398	105.4250	ug/L		100
97)	1,2-Dibromo-3-Chloropropan	19.36	75	126624	112.0824	ug/L		88
98)	1,2,4-Trichlorobenzene	20.50	180	1566801	114.3776	ug/L		99
99)	Hexachlorobutadiene	20.65	225	698852	108.1043	ug/L		98
100)	Naphthalene	20.87	128	2244301	112.5737	ug/L		99
101)	1,2,3-Trichlorobenzene	21.18	180	1297908	112.6794	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	916133	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.81	117	758457	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	404542	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	985298	106.6012	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 426.40%#			
43) 1,2-Dichloroethane-d4	10.54	65	821015	101.7034	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 406.80%#			
58) Toluene-d8	12.91	98	3407259	98.6394	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 394.56%#			
80) p-Bromofluorobenzene	16.30	95	1421252	100.8919	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 403.56%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2732295	236.1042	ug/L	97
3) Chloromethane	3.82	50	2983027	186.0300	ug/L	100
4) Vinyl Chloride	4.05	62	2540371	165.6278	ug/L	99
5) 1,3-Butadiene	4.10	54	866990	87.4234	ug/L	96
6) Bromomethane	4.97	94	1545771	509.8527	ug/L	99
7) Chloroethane	5.13	64	1366615	218.8661	ug/L	97
8) Trichlorofluoromethane	5.62	101	3365549	214.7442	ug/L	99
10) Isoprene	6.19	67	2589463	220.5797	ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1913316	215.5364	ug/L	97
13) Acetone	6.49	43	249206	196.9637	ug/L	95
14) 1,1-Dichloroethene	6.71	61	2810695	217.1259	ug/L	98
16) Dimethyl Sulfide	6.98	62	1824420	217.4058	ug/L	89
17) Iodomethane	7.23	142	1201977	701.8503	ug/L	96
18) Methyl acetate	7.23	43	677953	194.9022	ug/L	93
19) Methylene Chloride	7.49	84	1990660	211.3402	ug/L	86
20) Carbon Disulfide	7.54	76	5610478	203.2424	ug/L	97
21) Acrylonitrile	7.70	53	33650	19.8015	ug/L #	32
22) Methyl Tert Butyl Ether	7.70	73	3788672	206.7038	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	2733215	215.5987	ug/L	96
24) n-Hexane	8.02	57	2197012	207.1230	ug/L	92
26) Vinyl Acetate	8.53	43	2553826	198.1912	ug/L	96
27) 1,1-Dichloroethane	8.57	63	3486757	214.6369	ug/L	98
29) 2-Butanone	9.12	43	389130	202.2654	ug/L	91
31) 2,2-Dichloropropane	9.34	77	2923670	212.2692	ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	2276453	219.0916	ug/L	96
33) Chloroform	9.61	83	3453780	181.8658	ug/L	95
34) 1-Bromopropane	9.75	122	446868	220.9203	ug/L	100
35) Bromochloromethane	9.85	130	1233768	224.1736	ug/L	95
36) Tetrahydrofuran	9.88	42	870	0.6372	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	3296755	231.5603	ug/L	98
39) Cyclohexane	10.17	56	2952221	221.0060	ug/L	91
40) 1,1-Dichloropropene	10.33	75	2719959	212.8482	ug/L	96
42) Carbon Tetrachloride	10.49	117	3008633	228.9911	ug/L	99
45) 1,2-Dichloroethane	10.66	62	2188642	217.0011	ug/L	96
46) Benzene	10.70	78	7143494	187.4691	ug/L	88
47) Trichloroethene	11.44	130	2308292	222.7182	ug/L	98
48) Methylcyclohexane	11.53	83	2934528	216.4182	ug/L	94
49) 1,2-Dichloropropane	11.66	63	1973272	219.1188	ug/L	96
50) Bromodichloromethane	11.96	83	2645509	229.4144	ug/L	96
51) 1,4-Dioxane	11.95	88	4065	85.0857	ug/L #	36

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

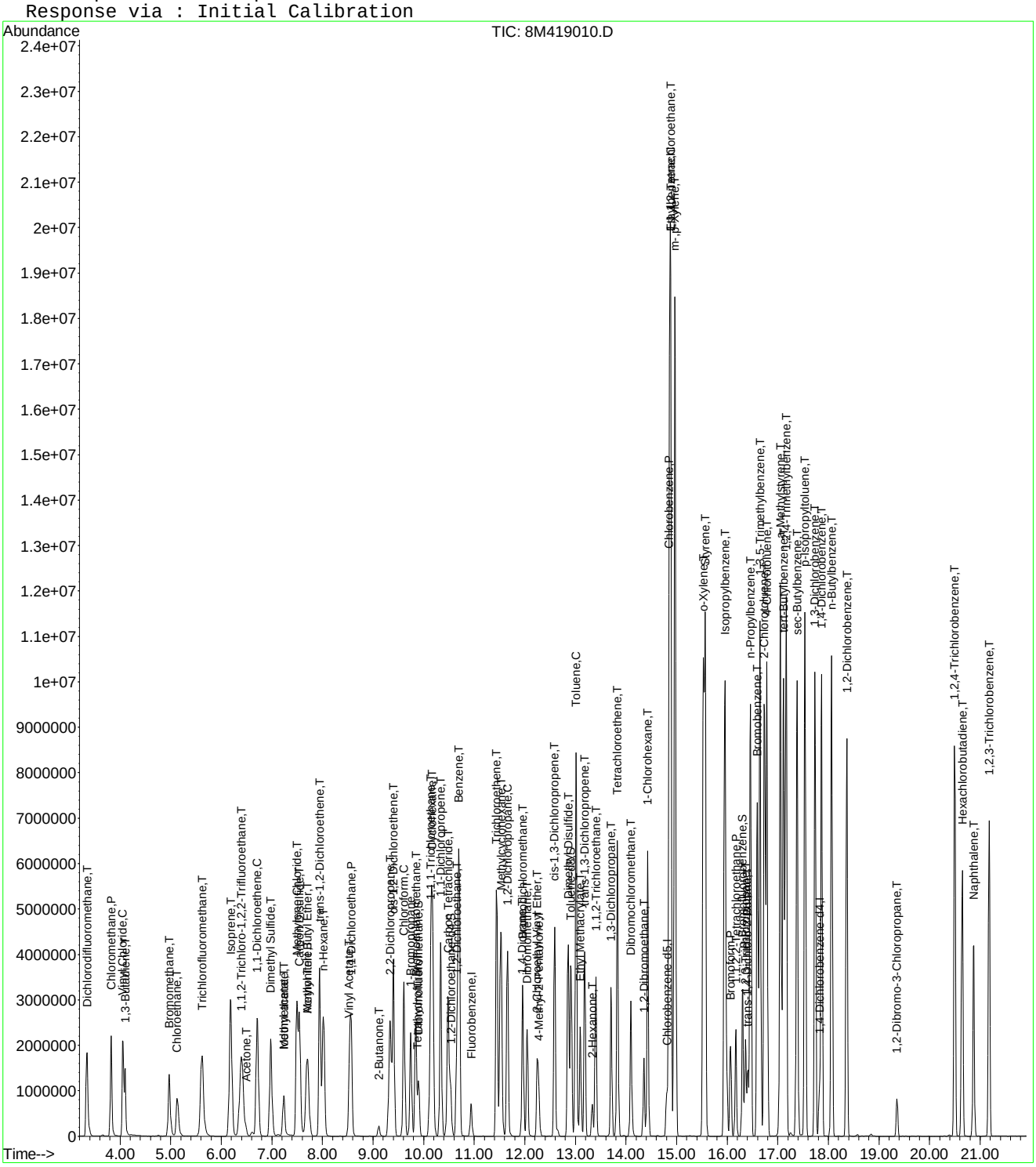
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
52)	Dibromomethane	12.05	93	1024578	224.7172	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	831891	228.3430	ug/L		98
54)	4-Methyl-2-Pentanone	12.28	58	360147	224.8683	ug/L		100
55)	cis-1,3-Dichloropropene	12.59	75	3048770	234.9149	ug/L		98
56)	Dimethyl Disulfide	12.86	79	1659189	299.5317	ug/L		99
59)	Toluene	13.01	91	7488758	174.9415	ug/L		89
60)	Ethyl Methacrylate	13.09	69	1679080	234.4692	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	2568979	220.0883	ug/L		97
63)	1,1,2-Trichloroethane	13.40	97	1396211	202.6709	ug/L		97
64)	2-Hexanone	13.33	58	330423	215.3823	ug/L		88
65)	1,3-Dichloropropane	13.70	76	2325588	200.4119	ug/L		86
66)	Tetrachloroethene	13.83	164	1990187	233.7864	ug/L		97
67)	Dibromochloromethane	14.10	129	1990057	238.6162	ug/L		99
68)	1,2-Dibromoethane	14.36	107	1415902	216.2402	ug/L		99
69)	1-Chlorohexane	14.43	91	2828351	220.2957	ug/L		92
70)	Chlorobenzene	14.85	112	6105996	205.8377	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.88	131	2810140	280.1772	ug/L		99
72)	Ethylbenzene	14.88	106	4032119	256.9908	ug/L		59
73)	m-,p-Xylene	14.96	106	7563563	396.2554	ug/L		66
74)	o-Xylene	15.53	106	4264660	225.7677	ug/L		79
75)	Styrene	15.56	104	6476388	223.2255	ug/L		92
76)	Bromoform	16.07	173	1258352	267.1087	ug/L		99
77)	Isopropylbenzene	15.96	105	8256603	173.9393	ug/L		81
79)	1,1,2,2-Tetrachloroethane	16.17	83	1527344	204.6644	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	447781	213.5809	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.40	53	367713	287.8052	ug/L	#	26
83)	n-Propylbenzene	16.46	91	8822276	148.9059	ug/L	#	76
84)	Bromobenzene	16.60	156	2898738	225.5047	ug/L		92
85)	1,3,5-Trimethylbenzene	16.65	105	7463417	180.8708	ug/L		82
86)	2-Chlorotoluene	16.73	91	7153343	176.8033	ug/L		79
87)	4-Chlorotoluene	16.78	91	5772378	165.0827	ug/L		82
88)	a-Methylstyrene	17.05	118	4847570	225.9830	ug/L		96
89)	tert-Butylbenzene	17.11	134	2112689	238.4192	ug/L		79
90)	1,2,4-Trimethylbenzene	17.17	105	7584285	181.5672	ug/L		77
91)	sec-Butylbenzene	17.38	105	8521003	159.7799	ug/L	#	81
92)	p-Isopropyltoluene	17.54	119	7724336	177.0554	ug/L		84
93)	1,3-Dichlorobenzene	17.73	146	5116611	201.0146	ug/L		93
94)	1,4-Dichlorobenzene	17.87	146	5000020	189.4678	ug/L		93
95)	n-Butylbenzene	18.07	91	7068933	181.2731	ug/L		85
96)	1,2-Dichlorobenzene	18.37	146	4516876	202.3597	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.36	75	250305	209.8099	ug/L		86
98)	1,2,4-Trichlorobenzene	20.49	180	3378961	233.5852	ug/L		99
99)	Hexachlorobutadiene	20.65	225	1595889	233.7735	ug/L		98
100)	Naphthalene	20.88	128	4334998	205.9111	ug/L		96
101)	1,2,3-Trichlorobenzene	21.18	180	2739944	225.2564	ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419010.D 8260WT.M Tue Apr 18 11:59:15 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	930696	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	749881	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	397655	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	1524398	162.3468	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 649.40%#			
43) 1,2-Dichloroethane-d4	10.53	65	1314412	160.2752	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 641.12%#			
58) Toluene-d8	12.91	98	5112365	149.6945	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 598.76%#			
80) p-Bromofluorobenzene	16.30	95	2230349	161.0701	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 644.28%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	5624	0.4784	ug/L	87
3) Chloromethane	3.81	50	108738	6.6751	ug/L	99
4) Vinyl Chloride	4.05	62	3886	0.2494	ug/L	93
5) 1,3-Butadiene	4.09	54	1246692	123.7438	ug/L	96
6) Bromomethane	4.96	94	300170	97.4580	ug/L	98
8) Trichlorofluoromethane	5.60	101	2530	0.1589	ug/L #	94
9) Diethyl ether	6.14	59	1962473	329.3380	ug/L	92
10) Isoprene	6.18	67	4088373	342.8128	ug/L	88
11) Acrolein	6.39	56	131510	159.5714	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	3091	0.3428	ug/L	94
13) Acetone	6.48	43	393174	305.8885	ug/L	96
14) 1,1-Dichloroethene	6.70	61	3035	0.2308	ug/L	80
15) Tert-Butyl Alcohol	6.83	59	293536	728.0013	ug/L	97
16) Dimethyl Sulfide	6.98	62	2844355	333.6421	ug/L	89
17) Iodomethane	7.23	142	1295425	744.5798	ug/L	95
18) Methyl acetate	7.24	43	1115371	315.6365	ug/L	92
19) Methylene Chloride	7.49	84	3692	0.3858	ug/L	89
20) Carbon Disulfide	7.55	76	7967065	284.0949	ug/L	95
21) Acrylonitrile	7.67	53	273516	158.4334	ug/L	95
22) Methyl Tert Butyl Ether	7.71	73	3414	0.1833	ug/L #	1
23) trans-1,2-Dichloroethene	7.94	61	6140	0.4768	ug/L	75
24) n-Hexane	8.01	57	3358910	311.7059	ug/L	91
25) Diisopropyl ether	8.35	45	8576863	291.0356	ug/L	97
26) Vinyl Acetate	8.53	43	3848978	294.0283	ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	7584668	307.2506	ug/L	97
29) 2-Butanone	9.11	43	656445	335.8737	ug/L	92
30) Propionitrile	9.22	54	211846	346.5277	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	2415	0.2288	ug/L	92
33) Chloroform	9.60	83	4216	0.2185	ug/L	95
34) 1-Bromopropane	9.75	122	686822	334.2345	ug/L	99
35) Bromochloromethane	9.85	130	960	0.1717	ug/L #	25
36) Tetrahydrofuran	9.86	42	436518	314.6999	ug/L	87
39) Cyclohexane	10.17	56	4365494	321.6913	ug/L	90
40) 1,1-Dichloropropene	10.34	75	4278	0.3295	ug/L	77
41) Tert-Amyl-Methyl ether	10.44	73	6796184	308.9868	ug/L	95
42) Carbon Tetrachloride	10.47	117	1728	0.1295	ug/L #	76
45) 1,2-Dichloroethane	10.66	62	2027	0.1978	ug/L #	62
46) Benzene	10.70	78	6536	0.1688	ug/L	90
47) Trichloroethene	11.44	130	3270	0.3106	ug/L	87
48) Methylcyclohexane	11.52	83	4485299	325.6100	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

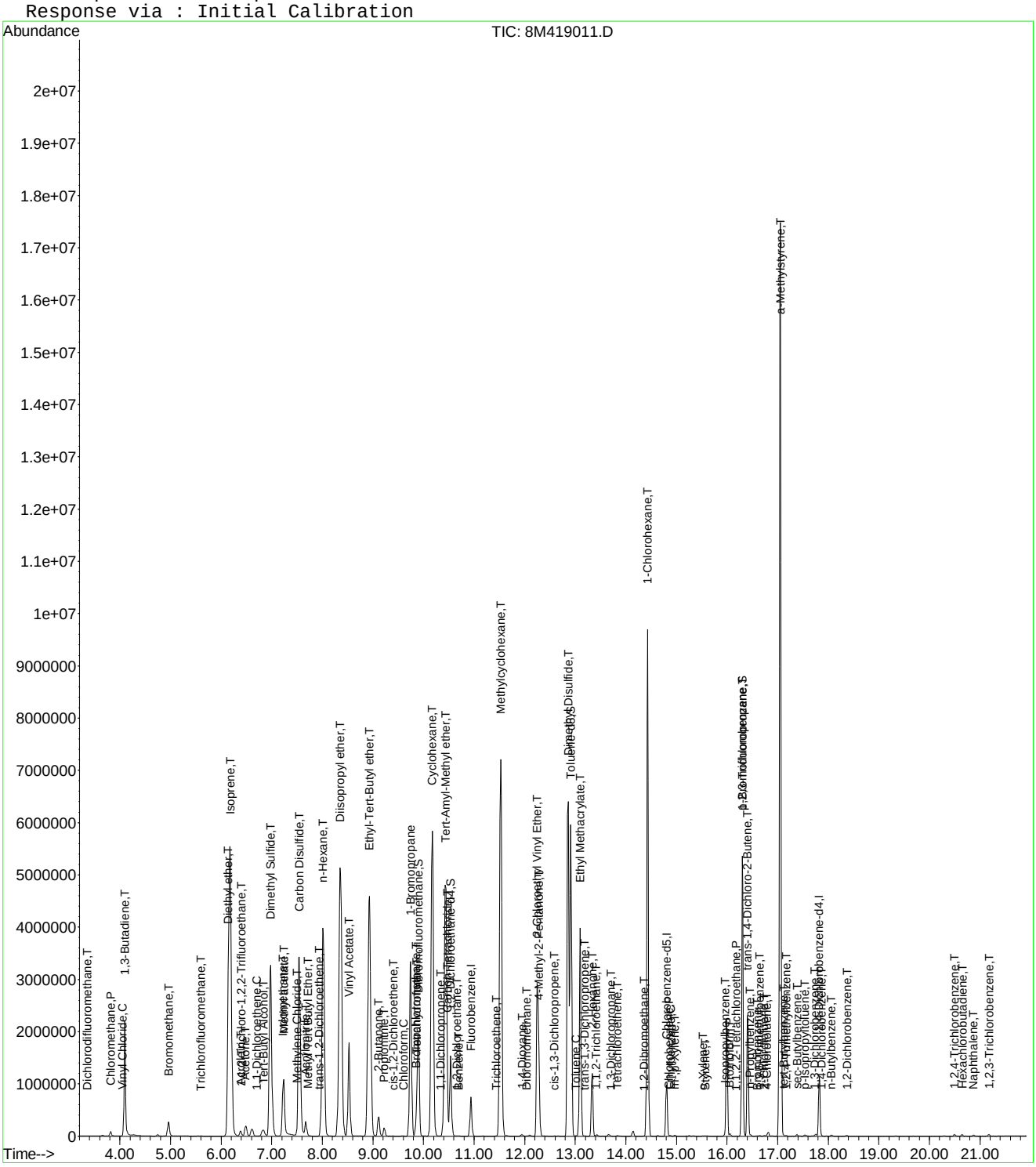
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

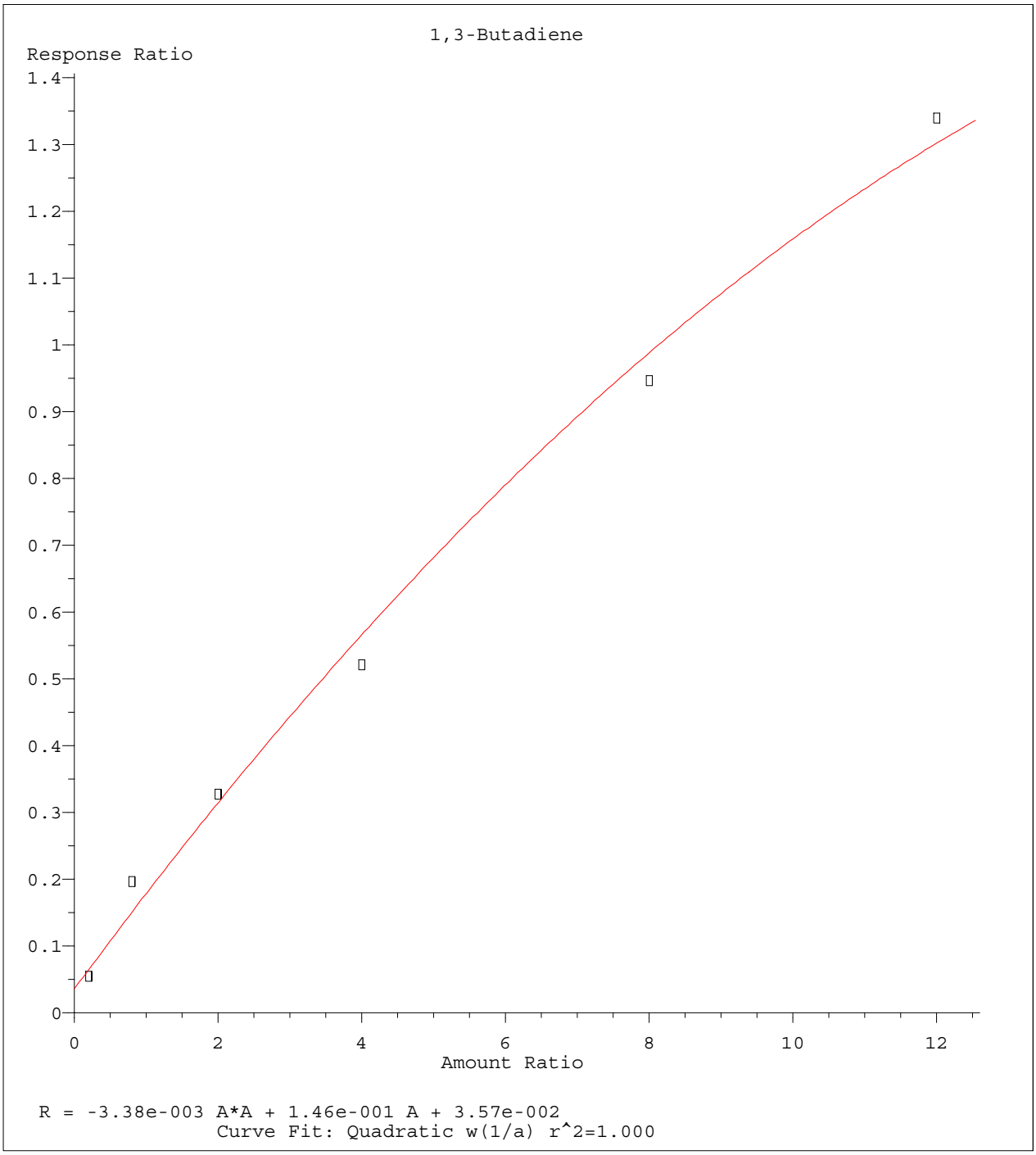
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
51)	1,4-Dioxane	11.95	88	33659	693.5026	ug/L		89
52)	Dibromomethane	12.04	93	1293	0.2792	ug/L		96
53)	2-Chloroethyl Vinyl Ether	12.25	63	1364979	368.8059	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	616547	378.9355	ug/L		99
55)	cis-1,3-Dichloropropene	12.59	75	2930	0.2222	ug/L		90
56)	Dimethyl Disulfide	12.86	79	2642662	469.6121	ug/L		97
59)	Toluene	13.01	91	8813	0.2082	ug/L		96
60)	Ethyl Methacrylate	13.10	69	2723549	384.6698	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	4235	0.3670	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	876	0.1286	ug/L		98
64)	2-Hexanone	13.33	58	568157	374.5818	ug/L		90
65)	1,3-Dichloropropane	13.71	76	2049	0.1786	ug/L	#	1
66)	Tetrachloroethene	13.83	164	2941	0.3494	ug/L		93
68)	1,2-Dibromoethane	14.36	107	1642	0.2536	ug/L		90
69)	1-Chlorohexane	14.43	91	4247410	334.6073	ug/L		90
70)	Chlorobenzene	14.85	112	7000	0.2387	ug/L		82
72)	Ethylbenzene	14.88	106	3495	0.2253	ug/L		86
73)	m-,p-Xylene	14.97	106	8767	0.4646	ug/L		94
74)	o-Xylene	15.52	106	3350	0.1794	ug/L		99
75)	Styrene	15.57	104	6628	0.2311	ug/L		93
76)	Bromoform	16.05	173	997	0.2141	ug/L	#	27
77)	Isopropylbenzene	15.96	105	32558	0.6937	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.18	83	1079	0.1471	ug/L	#	70
81)	1,2,3-Trichloropropane	16.30	110	745	0.3615	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.40	53	554896	441.8333	ug/L	#	1
83)	n-Propylbenzene	16.45	91	27737	0.4763	ug/L		84
84)	Bromobenzene	16.60	156	3516	0.2783	ug/L		92
85)	1,3,5-Trimethylbenzene	16.64	105	13389	0.3301	ug/L		97
86)	2-Chlorotoluene	16.73	91	9839	0.2474	ug/L		98
87)	4-Chlorotoluene	16.79	91	11812	0.3437	ug/L		97
88)	a-Methylstyrene	17.05	118	6686703	317.1180	ug/L		90
89)	tert-Butylbenzene	17.12	134	5062	0.5811	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.17	105	13828	0.3368	ug/L		90
91)	sec-Butylbenzene	17.38	105	38994	0.7439	ug/L		98
92)	p-Isopropyltoluene	17.54	119	20259	0.4724	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	10177	0.4067	ug/L		99
94)	1,4-Dichlorobenzene	17.87	146	11796	0.4547	ug/L		86
95)	n-Butylbenzene	18.06	91	22615	0.5900	ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	7307	0.3330	ug/L		97
98)	1,2,4-Trichlorobenzene	20.50	180	15569	1.0949	ug/L		99
99)	Hexachlorobutadiene	20.65	225	10959	1.6331	ug/L		96
100)	Naphthalene	20.87	128	27819	1.3443	ug/L		97
101)	1,2,3-Trichlorobenzene	21.18	180	15009	1.2553	ug/L		94

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:17 2017 Page 2

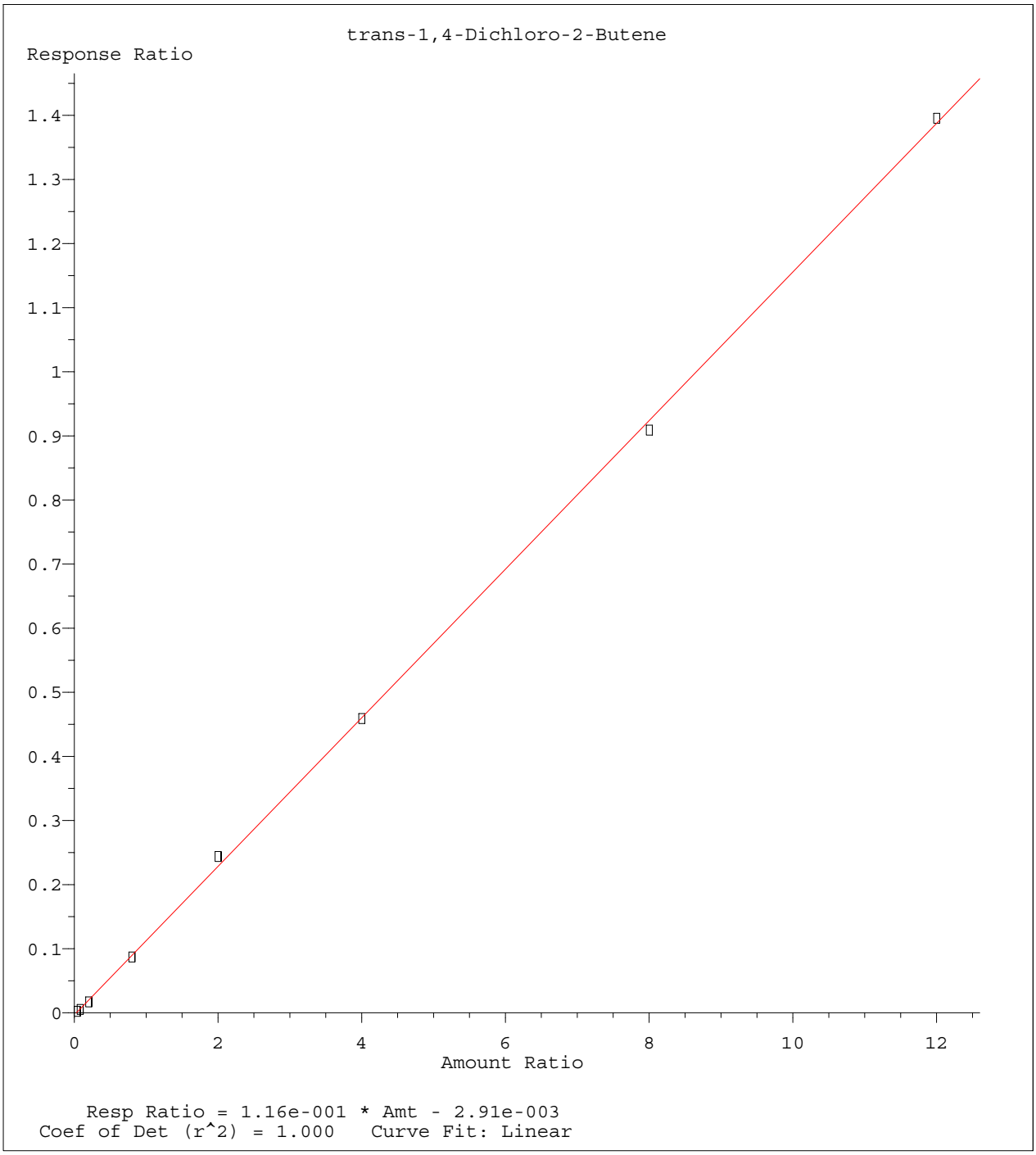
Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

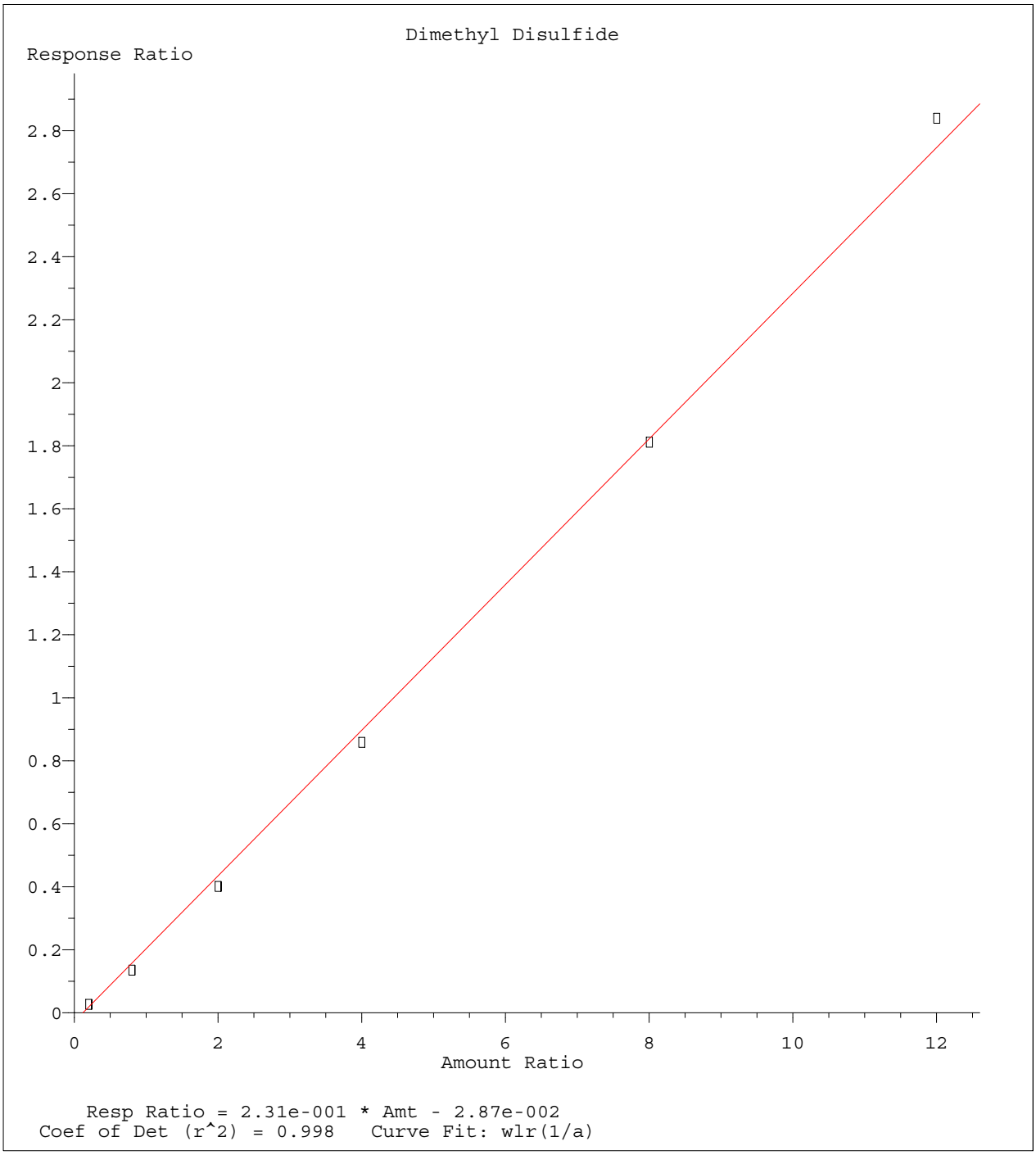




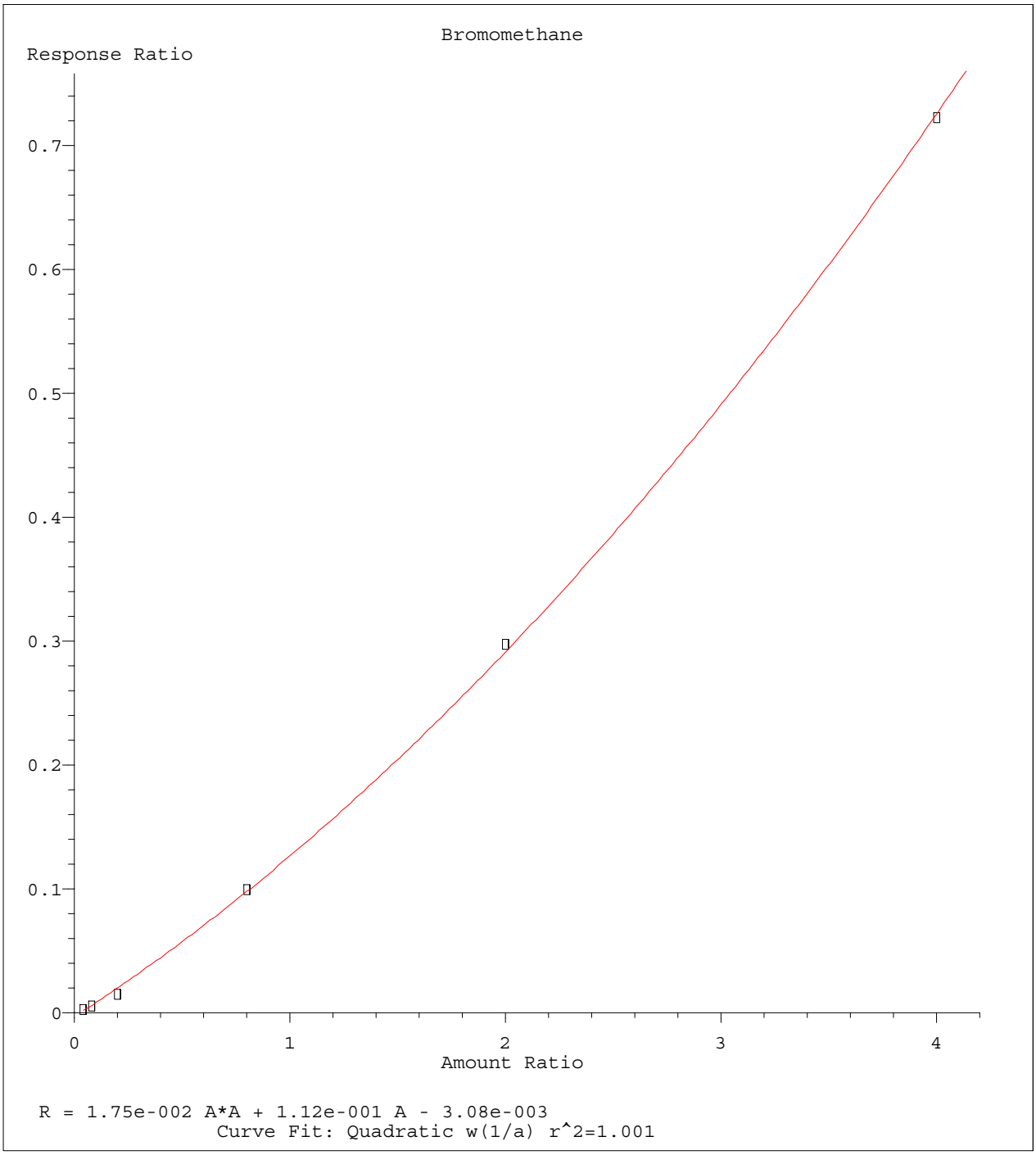
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



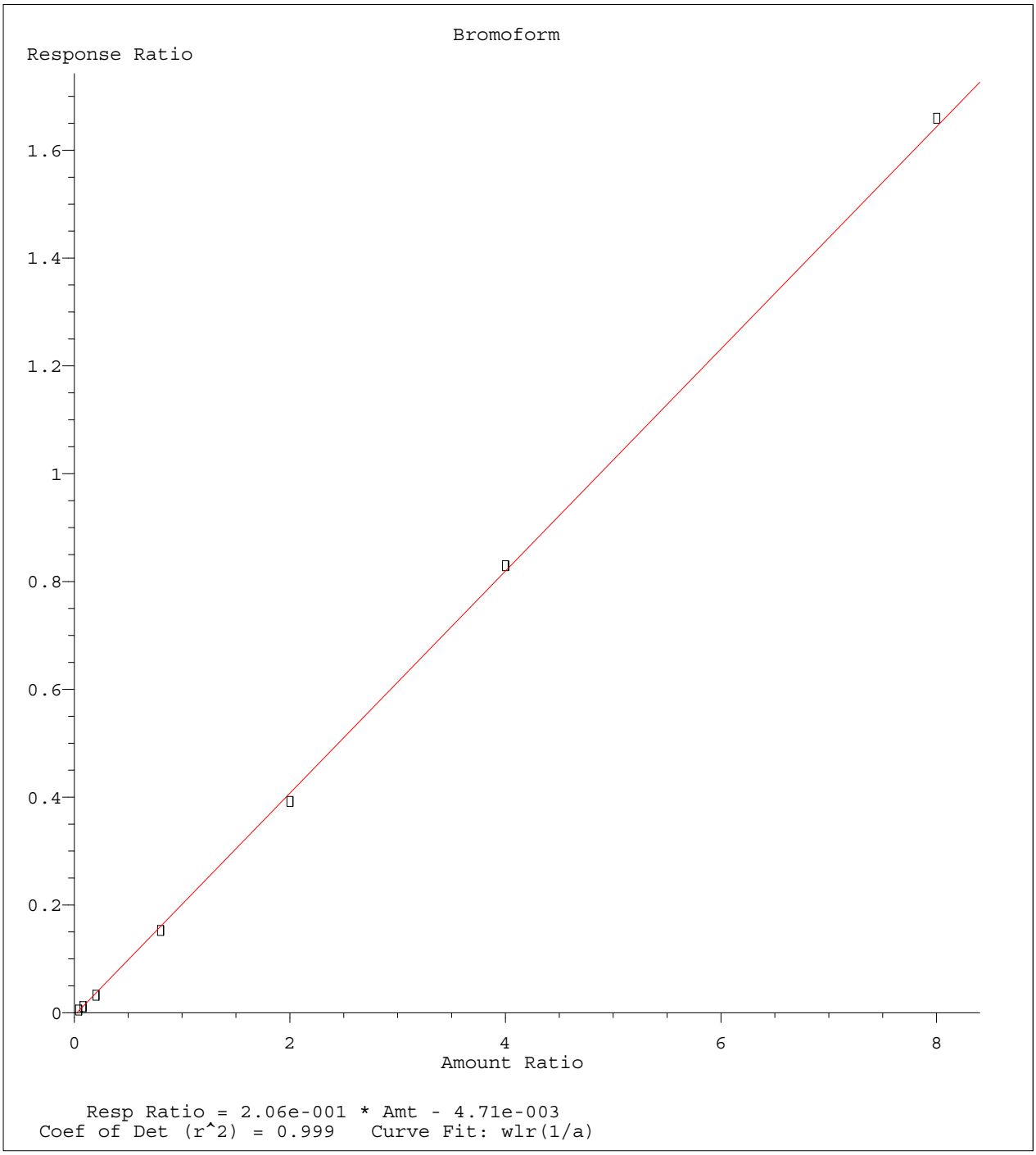
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	876345	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	707189	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	383750	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	227423	24.7419	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.96%			
43) 1,2-Dichloroethane-d4	10.53	65	193344	24.3311	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.32%			
58) Toluene-d8	12.91	98	800923	24.7866	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.16%			
80) p-Bromofluorobenzene	16.30	95	322047	23.7784	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.12%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	667667	56.2976	ug/L	100
3) Chloromethane	3.82	50	720887	48.6211	ug/L	98
4) Vinyl Chloride	4.05	62	635481	45.3850	ug/L	98
5) 1,3-Butadiene	4.10	54	359379	68.4146	ug/L	96
6) Bromomethane	4.96	94	215525	43.6302	ug/L	99
7) Chloroethane	5.13	64	324474	53.0523	ug/L	96
8) Trichlorofluoromethane	5.61	101	738420	48.5549	ug/L	99
9) Diethyl ether	6.14	59	498151	86.9727	ug/L	91
10) Isoprene	6.18	67	610998	50.8138	ug/L	89
11) Acrolein	6.39	56	80484	101.4634	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	445386	51.3586	ug/L	97
13) Acetone	6.49	43	53217	43.1773	ug/L	96
14) 1,1-Dichloroethene	6.71	61	596314	46.9846	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	66729	167.0197	ug/L	97
16) Dimethyl Sulfide	6.98	62	449123	53.1278	ug/L	91
17) Iodomethane	7.24	142	397109	104.7342	ug/L	90
18) Methyl acetate	7.24	43	145496	43.1089	ug/L	93
19) Methylene Chloride	7.50	84	425943	46.7005	ug/L	84
20) Carbon Disulfide	7.55	76	1144667	43.3766	ug/L	100
21) Acrylonitrile	7.67	53	78412	45.8636	ug/L	99
22) Methyl Tert Butyl Ether	7.70	73	827526	46.0483	ug/L	94
23) trans-1,2-Dichloroethene	7.94	61	583968	47.2932	ug/L	96
24) n-Hexane	8.02	57	502871	48.7894	ug/L	93
25) Diisopropyl ether	8.35	45	2651186	95.9237	ug/L	96
26) Vinyl Acetate	8.53	43	616012	49.6945	ug/L	96
27) 1,1-Dichloroethane	8.56	63	756542	47.6058	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2118923	90.1483	ug/L	98
29) 2-Butanone	9.12	43	83993	43.4556	ug/L	91
30) Propionitrile	9.22	54	56456	94.2403	ug/L	99
31) 2,2-Dichloropropane	9.34	77	626218	46.6788	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	489725	47.9836	ug/L	96
33) Chloroform	9.61	83	787042	44.6971	ug/L	97
34) 1-Bromopropane	9.75	122	124602	61.8875	ug/L	100
35) Bromochloromethane	9.84	130	272025	49.3934	ug/L	95
36) Tetrahydrofuran	9.86	42	114805	86.2858	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	721765	50.7918	ug/L	100
39) Cyclohexane	10.17	56	587817	44.4298	ug/L	91
40) 1,1-Dichloropropene	10.34	75	586359	47.2590	ug/L	97
41) Tert-Amyl-Methyl ether	10.44	73	1981831	94.1604	ug/L	98
42) Carbon Tetrachloride	10.48	117	660929	50.1611	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

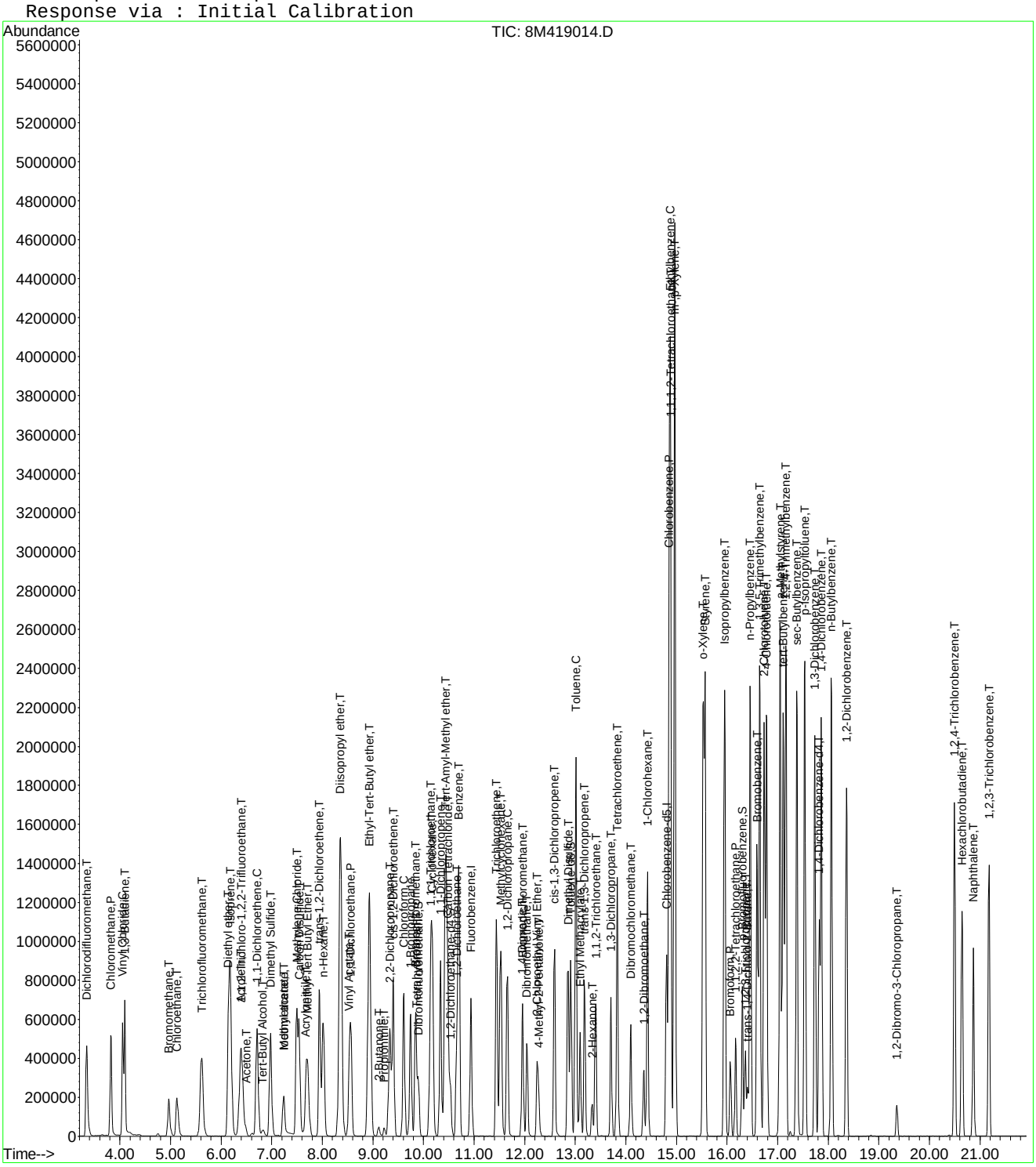
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	470242	47.2276	ug/L	97
46)	Benzene	10.70	78	1721941	47.5631	ug/L	95
47)	Trichloroethene	11.44	130	483157	47.5077	ug/L	97
48)	Methylcyclohexane	11.53	83	636402	46.9430	ug/L	95
49)	1,2-Dichloropropane	11.66	63	418165	47.2917	ug/L	95
50)	Bromodichloromethane	11.96	83	555676	48.0208	ug/L	98
51)	1,4-Dioxane	11.95	88	8508	168.7628	ug/L	89
52)	Dibromomethane	12.04	93	215781	47.4196	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.25	63	183970	48.0854	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	77823	45.4120	ug/L	99
55)	cis-1,3-Dichloropropene	12.59	75	666388	50.5672	ug/L	100
56)	Dimethyl Disulfide	12.86	79	345797	45.7592	ug/L	95
59)	Toluene	13.01	91	1910652	48.5373	ug/L	100
60)	Ethyl Methacrylate	13.10	69	388584	52.3228	ug/L	88
62)	trans-1,3-Dichloropropene	13.18	75	531560	46.5624	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	293466	45.3132	ug/L	96
64)	2-Hexanone	13.34	58	76776	48.3051	ug/L	91
65)	1,3-Dichloropropane	13.71	76	516864	47.2090	ug/L	88
66)	Tetrachloroethene	13.83	164	418500	50.6128	ug/L	97
67)	Dibromochloromethane	14.10	129	402089	48.3146	ug/L	99
68)	1,2-Dibromoethane	14.36	107	298114	47.1242	ug/L	99
69)	1-Chlorohexane	14.43	91	648721	52.0883	ug/L	94
70)	Chlorobenzene	14.85	112	1321464	47.1602	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.89	131	500071	50.2889	ug/L	99
72)	Ethylbenzene	14.87	106	767808	48.9244	ug/L	99
73)	m-,p-Xylene	14.97	106	1848951	101.7331	ug/L	100
74)	o-Xylene	15.53	106	879490	48.1326	ug/L	100
75)	Styrene	15.57	104	1509115	52.6805	ug/L	96
76)	Bromoform	16.06	173	246815	42.9243	ug/L	99
77)	Isopropylbenzene	15.95	105	2164038	49.4628	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	331079	45.7235	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	97508	46.9716	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.40	53	63669	36.4332	ug/L	93
83)	n-Propylbenzene	16.46	91	2539452	47.2799	ug/L	97
84)	Bromobenzene	16.60	156	605699	48.1294	ug/L	96
85)	1,3,5-Trimethylbenzene	16.64	105	1903333	48.9404	ug/L	97
86)	2-Chlorotoluene	16.74	91	1618818	44.1478	ug/L	92
87)	4-Chlorotoluene	16.78	91	1639005	49.5992	ug/L	98
88)	a-Methylstyrene	17.06	118	1156988	53.0644	ug/L	97
89)	tert-Butylbenzene	17.11	134	423431	48.0884	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1982610	49.9352	ug/L	96
91)	sec-Butylbenzene	17.38	105	2331979	47.8741	ug/L	99
92)	p-Isopropyltoluene	17.54	119	2050846	50.0005	ug/L	100
93)	1,3-Dichlorobenzene	17.74	146	1155418	47.3665	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	1144693	46.1575	ug/L	99
95)	n-Butylbenzene	18.06	91	1844076	49.9102	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	1012196	47.2353	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	51865	44.0112	ug/L	90
98)	1,2,4-Trichlorobenzene	20.50	180	707379	49.0312	ug/L	100
99)	Hexachlorobutadiene	20.64	225	326033	48.5641	ug/L	99
100)	Naphthalene	20.87	128	990859	48.0605	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583838	48.7315	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	56.2976	-12.6	109	0.00
3	P	Chloromethane	50.0000	48.6212	2.8	108	0.00
4	C	Vinyl Chloride	50.0000	45.3850	9.2	98	0.00
5	T	1,3-Butadiene	50.0000	68.4146	-36.8#	132	0.00
6	T	Bromomethane	50.0000	43.6302	12.7	87	0.00
7	T	Chloroethane	50.0000	53.0523	-6.1	110	0.00
8	T	Trichlorofluoromethane	50.0000	48.5549	2.9	102	0.01
9	T	Diethyl ether	100.0000	86.9727	13.0	94	0.00
10	T	Isoprene	50.0000	50.8138	-1.6	106	0.00
11	T	Acrolein	50.0000	101.4634	-102.9#	219	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.3586	-2.7	107	0.00
13	T	Acetone	50.0000	43.1773	13.6	90	0.01
14	C	1,1-Dichloroethene	50.0000	46.9845	6.0	97	0.01
15	T	Tert-Butyl Alcohol	200.0000	167.0197	16.5	88	0.00
16	T	Dimethyl Sulfide	50.0000	53.1278	-6.3	113	0.00
17	T	Iodomethane	50.0000	104.7342	-109.5#	197	0.01
18	T	Methyl acetate	50.0000	43.1089	13.8	90	0.00
19	T	Methylene Chloride	50.0000	46.7005	6.6	100	0.00
20	T	Carbon Disulfide	50.0000	43.3766	13.2	90	0.00
21	T	Acrylonitrile	50.0000	45.8636	8.3	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.0483	7.9	94	0.00
23	T	trans-1,2-Dichloroethene	50.0000	47.2932	5.4	100	0.00
24	T	n-Hexane	50.0000	48.7894	2.4	104	0.01
25	T	Diisopropyl ether	100.0000	95.9237	4.1	102	0.00
26	T	Vinyl Acetate	50.0000	49.6946	0.6	103	0.00
27	P	1,1-Dichloroethane	50.0000	47.6058	4.8	99	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	90.1483	9.9	95	0.00
29	T	2-Butanone	50.0000	43.4556	13.1	90	0.01
30	T	Propionitrile	100.0000	94.2404	5.8	99	0.00
31	T	2,2-Dichloropropane	50.0000	46.6788	6.6	97	0.00
32	T	cis-1,2-Dichloroethene	50.0000	47.9836	4.0	99	0.00
33	C	Chloroform	50.0000	44.6971	10.6	101	0.01
34		1-Bromopropane	50.0000	61.8875	-23.8	132	0.00
35	T	Bromochloromethane	50.0000	49.3934	1.2	98	0.00
36	T	Tetrahydrofuran	100.0000	86.2858	13.7	91	0.00
37	S	Dibromofluoromethane	25.0000	24.7419	1.0	101	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.7918	-1.6	103	0.00
39	T	Cyclohexane	50.0000	44.4298	11.1	93	0.00
40	T	1,1-Dichloropropene	50.0000	47.2591	5.5	100	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.1604	5.8	99	0.00
42	T	Carbon Tetrachloride	50.0000	50.1611	-0.3	101	0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.3311	2.7	98	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	47.2276	5.5	97	0.00
46	T	Benzene	50.0000	47.5631	4.9	99	0.00
47	T	Trichloroethene	50.0000	47.5078	5.0	100	0.00
48	T	Methylcyclohexane	50.0000	46.9430	6.1	99	0.00
49	C	1,2-Dichloropropane	50.0000	47.2917	5.4	98	0.01
50	T	Bromodichloromethane	50.0000	48.0208	4.0	96	0.00
51	T	1,4-Dioxane	200.0000	168.7628	15.6	84	0.00
52	T	Dibromomethane	50.0000	47.4196	5.2	95	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.0854	3.8	98	0.00
54	T	4-Methyl-2-Pentanone	50.0000	45.4120	9.2	93	0.00
55	T	cis-1,3-Dichloropropene	50.0000	50.5673	-1.1	99	0.00
56	T	Dimethyl Disulfide	50.0000	45.7592	8.5	104	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	106	0.00

58	S	Toluene-d8	25.0000	24.7866	0.9	101	0.00	
59	C	Toluene	50.0000	48.5373	2.9	100	0.00	
60	T	Ethyl Methacrylate	50.0000	52.3228	-4.6	101	0.00	
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#	
62	T	trans-1,3-Dichloropropene	50.0000	46.5624	6.9	94	0.00	
63	T	1,1,2-Trichloroethane	50.0000	45.3132	9.4	96	0.00	
64	T	2-Hexanone	50.0000	48.3051	3.4	98	0.00	
65	T	1,3-Dichloropropane	50.0000	47.2090	5.6	97	0.00	
66	T	Tetrachloroethene	50.0000	50.6128	-1.2	106	0.00	
67	T	Dibromochloromethane	50.0000	48.3146	3.4	95	0.00	
68	T	1,2-Dibromoethane	50.0000	47.1242	5.8	95	0.00	
69	T	1-Chlorohexane	50.0000	52.0883	-4.2	108	0.00	
70	P	Chlorobenzene	50.0000	47.1602	5.7	100	0.00	
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.2889	-0.6	97	0.01	
72	C	Ethylbenzene	50.0000	48.9244	2.2	101	0.00	
73	T	m-,p-Xylene	100.0000	101.7331	-1.7	102	0.00	
74	T	o-Xylene	50.0000	48.1326	3.7	102	0.00	
75	T	Styrene	50.0000	52.6805	-5.4	102	0.00	
76	P	Bromoform	50.0000	42.9243	14.2	94	0.01	
77	T	Isopropylbenzene	50.0000	49.4628	1.1	101	0.00	
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	108	0.00	
79	P	1,1,2,2-Tetrachloroethane	50.0000	45.7235	8.6	94	0.00	
80	S	p-Bromofluorobenzene	25.0000	23.7784	4.9	102	0.00	
81	T	1,2,3-Trichloropropane	50.0000	46.9716	6.1	95	0.06	
82	T	trans-1,4-Dichloro-2-Butene	50.0000	36.4332	27.1#	74	0.00	
83	T	n-Propylbenzene	50.0000	47.2799	5.4	100	0.00	
84	T	Bromobenzene	50.0000	48.1294	3.7	101	0.00	
85	T	1,3,5-Trimethylbenzene	50.0000	48.9404	2.1	102	0.00	
86	T	2-Chlorotoluene	50.0000	44.1478	11.7	104	0.00	
87	T	4-Chlorotoluene	50.0000	49.5992	0.8	99	0.00	
88	T	a-Methylstyrene	50.0000	53.0644	-6.1	112	0.00	
89	T	tert-Butylbenzene	50.0000	48.0884	3.8	104	0.00	
90	T	1,2,4-Trimethylbenzene	50.0000	49.9352	0.1	102	0.00	
91	T	sec-Butylbenzene	50.0000	47.8741	4.3	101	0.00	
92	T	p-Isopropyltoluene	50.0000	50.0005	-0.0	103	0.00	
93	T	1,3-Dichlorobenzene	50.0000	47.3665	5.3	100	0.00	
94	T	1,4-Dichlorobenzene	50.0000	46.1575	7.7	101	0.00	
95	T	n-Butylbenzene	50.0000	49.9102	0.2	102	0.00	
96	T	1,2-Dichlorobenzene	50.0000	47.2353	5.5	99	0.00	
97	T	1,2-Dibromo-3-Chloropropane	50.0000	44.0112	12.0	92	0.00	
98	T	1,2,4-Trichlorobenzene	50.0000	49.0312	1.9	101	0.00	
99	T	Hexachlorobutadiene	50.0000	48.5641	2.9	104	0.00	
100	T	Naphthalene	50.0000	48.0605	3.9	97	0.00	
101	T	1,2,3-Trichlorobenzene	50.0000	48.7315	2.5	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419008.D 8260WT.M Tue Apr 18 12:35:57 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	430983	25.00	ug/L	0.00
46) Chlorobenzene-d5	8.051	117	327235	25.00	ug/L	0.00
64) 1,4-Dichlorobenzene-d4	9.366	152	168617	25.00	ug/L	0.00
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	117302	25.20	ug/L	0.01
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.80%			
34) 1,2-Dichloroethane-d4	4.962	65	106911	24.51	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.04%			
47) Toluene-d8	6.815	98	409511	25.08	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.32%			
66) p-Bromofluorobenzene	8.787	95	140069	24.81	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.24%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	295905	57.8108	ug/L	100
3) Chloromethane	1.221	50	261624	52.2283	ug/L	100
4) Vinyl Chloride	1.267	62	290233	52.3243	ug/L	100
5) 1,3-Butadiene	1.279	54	178526	52.4198	ug/L	99
6) Bromomethane	1.461	94	180014	43.6512	ug/L	99
7) Chloroethane	1.534	64	119801	45.5273	ug/L	100
8) Trichlorofluoromethane	1.618	101	390943	54.9468	ug/L	99
9) Diethyl ether	1.843	59	315410	91.9269	ug/L	100
10) 1,1-Dichloroethene	1.962	61	341276	51.2634	ug/L	99
11) Carbon Disulfide	1.977	76	745330	52.1637	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	226844	53.4473	ug/L	99
13) Iodomethane	2.064	142	340237	52.8743	ug/L	99
14) Acrolein	2.226	56	19054	44.9570	ug/L	98
15) Methylene Chloride	2.405	84	237742	47.0632	ug/L	99
16) Acetone	2.466	43	34974	40.3597	ug/L	99
17) trans-1,2-Dichloroethene	2.538	96	230580	50.8671	ug/L	100
18) Methyl acetate	2.579	43	110321	48.5611	ug/L #	98
19) Methyl Tert Butyl Ether	2.657	73	524035	45.5522	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	409310	50.2730	ug/L	100
21) Acrylonitrile	3.187	53	47716	43.1708	ug/L	99
22) Vinyl Acetate	2.614	86	42944	58.8632	ug/L	94
23) cis-1,2-Dichloroethene	3.734	96	253942	49.4911	ug/L	99
24) 2,2-Dichloropropane	3.867	77	356682	55.2698	ug/L	99
25) Cyclohexane	3.969	56	365830	52.8276	ug/L	99
26) Bromochloromethane	3.986	130	160962	48.6885	ug/L	100
27) Chloroform	4.116	83	416795	49.1006	ug/L	100
28) Carbon Tetrachloride	4.255	117	348843	51.9685	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	375906	50.3691	ug/L	100
31) 1,1-Dichloropropene	4.507	75	303285	51.7452	ug/L	99
32) 2-Butanone	4.536	43	53740	41.5975	ug/L	97
33) Benzene	4.803	78	904430	49.2665	ug/L	100
35) 1,2-Dichloroethane	5.037	62	269027	47.0637	ug/L	100
36) Methylcyclohexane	5.425	83	385251	53.0981	ug/L	99
37) Trichloroethene	5.451	130	266985	48.4193	ug/L	99
38) Dibromomethane	5.862	93	131607	46.8071	ug/L	100
39) 1,2-Dichloropropane	5.969	63	238184	49.4748	ug/L	99
40) Bromodichloromethane	6.053	83	315217	49.0560	ug/L	100
41) 1,4-Dioxane	6.262	88	6196	258.3938	ug/L	98

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

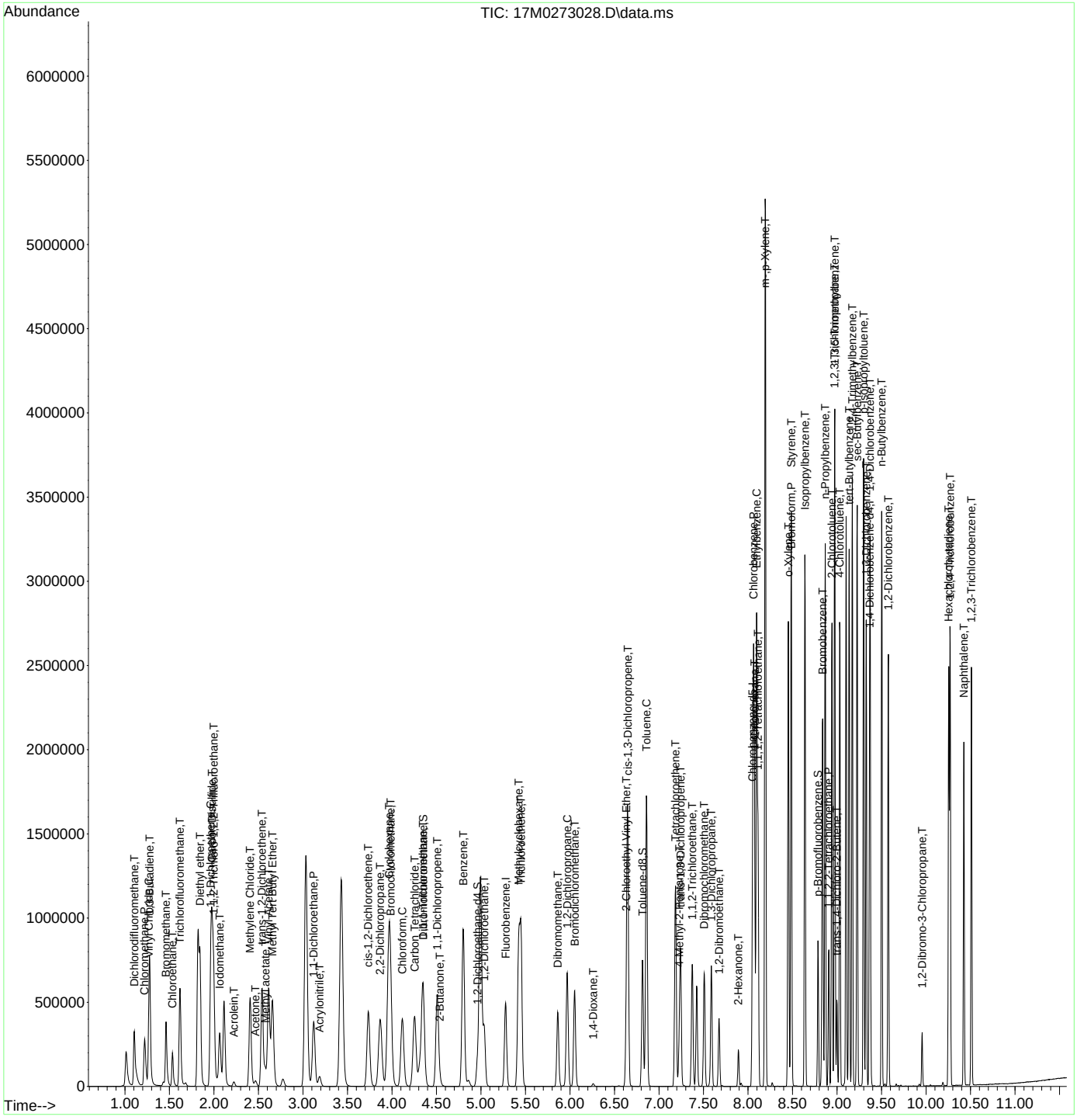
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
42) 2-Chloroethyl Vinyl Ether	6.632	63	99155	45.4075 ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	366595	50.6284 ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	48900	40.8810 ug/L	100
45) trans-1,3-Dichloropropene	7.243	75	303136	49.2446 ug/L	100
48) Toluene	6.858	91	1016560	49.5492 ug/L	100
49) Tetrachloroethene	7.185	166	295676	50.5287 ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	178526	44.8945 ug/L	99
51) Dibromochloromethane	7.507	129	255332	47.0411 ug/L	99
52) 1,3-Dichloropropane	7.588	76	288246	45.6090 ug/L	99
53) 1,2-Dibromoethane	7.675	107	181017	44.4299 ug/L	99
54) 2-Hexanone	7.892	43	84254	40.3465 ug/L	99
55) Chlorobenzene	8.063	112	676691	49.1574 ug/L	99
56) 1-Chlorohexane	8.074	69	58708	52.8237 ug/L	98
57) Ethylbenzene	8.097	106	360012	50.2412 ug/L	98
58) 1,1,1,2-Tetrachloroethane	8.112	131	258454	48.2314 ug/L	100
59) m-,p-Xylene	8.193	106	882630	102.0613 ug/L	99
60) o-Xylene	8.454	106	424731	49.8463 ug/L	99
61) Styrene	8.485	104	701721	51.4691 ug/L	100
62) Bromoform	8.488	173	177407	46.4633 ug/L	99
63) Isopropylbenzene	8.639	105	1117907	50.6858 ug/L	99
65) 1,3,5-Trimethylbenzene	8.975	105	964339	51.3021 ug/L	99
67) Bromobenzene	8.839	156	316926	47.7821 ug/L	100
68) n-Propylbenzene	8.868	91	1291082	51.8508 ug/L	100
69) 1,1,2,2-Tetrachloroethane	8.905	83	204374	45.0594 ug/L	100
70) 2-Chlorotoluene	8.943	91	771413	50.1923 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	56938	42.4644 ug/L	98
72) trans-1,4-Dichloro-2-B...	8.998	53	46067	46.0881 ug/L #	95
73) 1,2,4-Trimethylbenzene	9.172	105	971091	51.2327 ug/L	100
74) 4-Chlorotoluene	9.030	91	779564	50.8063 ug/L	100
75) tert-Butylbenzene	9.137	134	184789	49.1887 ug/L	99
76) sec-Butylbenzene	9.227	105	1194048	51.5620 ug/L	100
77) p-Isopropyltoluene	9.299	119	1045904	52.9823 ug/L	100
78) 1,3-Dichlorobenzene	9.328	146	580828	50.2325 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	572893	49.0756 ug/L	100
80) n-Butylbenzene	9.502	91	931071	55.8819 ug/L	99
81) 1,2-Dichlorobenzene	9.577	146	542743	48.1620 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.956	75	36623	44.0134 ug/L	98
83) Hexachlorobutadiene	10.254	225	255449	53.7715 ug/L	100
84) 1,2,4-Trichlorobenzene	10.272	180	446179	53.2974 ug/L	100
85) Naphthalene	10.425	128	762307	46.6967 ug/L	100
86) 1,2,3-Trichlorobenzene	10.509	180	403009	49.5613 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	103	0.000
2	T	Dichlorodifluoromethane	0.297	0.343	-15.5	108	0.000
3	P	Chloromethane	0.291	0.304	-4.5	109	0.000
4	C	Vinyl Chloride	0.322	0.337	-4.7#	106	0.000
5	T	1,3-Butadiene	0.198	0.207	-4.5	104	0.000
6	T	Bromomethane	0.239	0.209	12.6	97	0.000
7	T	Chloroethane	0.153	0.139	9.2	105	0.000
8	T	Trichlorofluoromethane	0.413	0.454	-9.9	106	0.000
9	T	Diethyl ether	0.199	0.183	8.0	92	0.000
10	C	1,1-Dichloroethene	0.386	0.396	-2.6#	105	0.000
11	T	Carbon Disulfide	0.829	0.865	-4.3	105	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.263	-6.9	107	0.000
13	T	Iodomethane	0.286	0.395	-38.1#	112	0.000
14	T	Acrolein	0.025	0.022	12.0	86	0.000
15	T	Methylene Chloride	0.293	0.276	5.8	101	0.000
16	T	Acetone	0.050	0.041	18.0	86	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.268	-1.9	104	0.000
18	T	Methyl acetate	0.132	0.128	3.0	86	0.012
19	T	Methyl Tert Butyl Ether	0.667	0.608	8.8	91	0.000
20	P	1,1-Dichloroethane	0.472	0.475	-0.6	103	0.000
21	T	Acrylonitrile	0.064	0.055	14.1	85	0.000
22	T	Vinyl Acetate	0.042	0.050	-19.0	114	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.295	1.0	101	0.000
24	T	2,2-Dichloropropane	0.321	0.414	-29.0#	113	0.000
25	T	Cyclohexane	0.402	0.424	-5.5	104	0.000
26	T	Bromochloromethane	0.192	0.187	2.6	96	0.012
27	C	Chloroform	0.492	0.484	1.6#	102	0.000
28	T	Carbon Tetrachloride	0.389	0.405	-4.1	103	0.000
29	S	Dibromofluoromethane	0.270	0.272	-0.7	101	0.012
30	T	1,1,1-Trichloroethane	0.433	0.436	-0.7	103	0.000
31	T	1,1-Dichloropropene	0.340	0.352	-3.5	103	0.000
32	T	2-Butanone	0.075	0.062	17.3	85	0.012
33	T	Benzene	1.065	1.049	1.5	102	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.248	2.0	98	0.000
35	T	1,2-Dichloroethane	0.332	0.312	6.0	97	0.000
36	T	Methylcyclohexane	0.421	0.447	-6.2	105	0.000
37	T	Trichloroethene	0.320	0.310	3.1	100	0.000
38	T	Dibromomethane	0.163	0.153	6.1	94	0.000
39	C	1,2-Dichloropropane	0.279	0.276	1.1#	100	0.000
40	T	Bromodichloromethane	0.373	0.366	1.9	99	0.000
41	T	1,4-Dioxane	0.001	0.002	-100.0#	133	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.115	9.4	93	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.425	-1.2	99	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.057	17.4	84	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.352	1.4	96	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	103	0.000
47	S	Toluene-d8	1.248	1.251	-0.2	101	0.000
48	C	Toluene	1.567	1.553	0.9#	101	0.000
49	T	Tetrachloroethene	0.447	0.452	-1.1	104	0.000
50	T	1,1,2-Trichloroethane	0.304	0.273	10.2	92	0.000
51	T	Dibromochloromethane	0.415	0.390	6.0	93	0.000
52	T	1,3-Dichloropropane	0.483	0.440	8.9	93	0.000
53	T	1,2-Dibromoethane	0.311	0.277	10.9	89	0.000
54	T	2-Hexanone	0.160	0.129	19.4	82	0.000
55	P	Chlorobenzene	1.052	1.034	1.7	101	0.000
56	T	1-Chlorohexane	0.085	0.090	-5.9	103	0.000
57	C	Ethylbenzene	0.547	0.550	-0.5#	102	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.395	3.4	98	0.000
59	T	m-,p-Xylene	0.661	0.674	-2.0	102	0.000
60	T	o-Xylene	0.651	0.649	0.3	100	0.000
61	T	Styrene	1.042	1.072	-2.9	100	0.000
62	P	Bromoform	0.292	0.271	7.2	88	0.000
63	T	Isopropylbenzene	1.685	1.708	-1.4	102	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	101	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.860	-2.6	102	0.000
66	S	p-Bromofluorobenzene	0.837	0.831	0.7	99	0.000
67	T	Bromobenzene	0.983	0.940	4.4	98	0.000
68	T	n-Propylbenzene	3.692	3.828	-3.7	104	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.606	9.8	86	0.000
70	T	2-Chlorotoluene	2.279	2.287	-0.4	102	0.000
71	T	1,2,3-Trichloropropane	0.199	0.169	15.1	85	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.137	7.4	85	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.880	-2.5	102	0.000
74	T	4-Chlorotoluene	2.275	2.312	-1.6	102	0.000
75	T	tert-Butylbenzene	0.557	0.548	1.6	101	0.000
76	T	sec-Butylbenzene	3.433	3.541	-3.1	102	0.000
77	T	p-Isopropyltoluene	2.927	3.101	-5.9	103	0.000
78	T	1,3-Dichlorobenzene	1.714	1.722	-0.5	101	0.000
79	T	1,4-Dichlorobenzene	1.731	1.699	1.8	100	0.000
80	T	n-Butylbenzene	2.470	2.761	-11.8	106	0.000
81	T	1,2-Dichlorobenzene	1.671	1.609	3.7	97	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.109	11.4	83	0.000
83	T	Hexachlorobutadiene	0.704	0.757	-7.5	104	0.011
84	T	1,2,4-Trichlorobenzene	1.241	1.323	-6.6	100	0.015
85	T	Naphthalene	2.420	2.260	6.6	88	0.014
86	T	1,2,3-Trichlorobenzene	1.206	1.195	0.9	95	0.017

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	103	0.000
2	T	Dichlorodifluoromethane	50.000	57.811	-15.6	108	0.000
3	P	Chloromethane	50.000	52.228	-4.5	109	0.000
4	C	Vinyl Chloride	50.000	52.324	-4.6#	106	0.000
5	T	1,3-Butadiene	50.000	52.420	-4.8	104	0.000
6	T	Bromomethane	50.000	43.651	12.7	97	0.000
7	T	Chloroethane	50.000	45.527	8.9	105	0.000
8	T	Trichlorofluoromethane	50.000	54.947	-9.9	106	0.000
9	T	Diethyl ether	100.000	91.927	8.1	92	0.000
10	C	1,1-Dichloroethene	50.000	51.263	-2.5#	105	0.000
11	T	Carbon Disulfide	50.000	52.164	-4.3	105	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	53.447	-6.9	107	0.000
13	T	Iodomethane	50.000	52.874	-5.7	112	0.000
14	T	Acrolein	50.000	44.957	10.1	86	0.000
15	T	Methylene Chloride	50.000	47.063	5.9	101	0.000
16	T	Acetone	50.000	40.360	19.3	86	0.000
17	T	trans-1,2-Dichloroethene	50.000	50.867	-1.7	104	0.000
18	T	Methyl acetate	50.000	48.561	2.9	86	0.012
19	T	Methyl Tert Butyl Ether	50.000	45.552	8.9	91	0.000
20	P	1,1-Dichloroethane	50.000	50.273	-0.5	103	0.000
21	T	Acrylonitrile	50.000	43.171	13.7	85	0.000
22	T	Vinyl Acetate	50.000	58.863	-17.7	114	0.000
23	T	cis-1,2-Dichloroethene	50.000	49.491	1.0	101	0.000
24	T	2,2-Dichloropropane	50.000	55.270	-10.5	113	0.000
25	T	Cyclohexane	50.000	52.828	-5.7	104	0.000
26	T	Bromochloromethane	50.000	48.688	2.6	96	0.012
27	C	Chloroform	50.000	49.101	1.8#	102	0.000
28	T	Carbon Tetrachloride	50.000	51.969	-3.9	103	0.000
29	S	Dibromofluoromethane	25.000	25.202	-0.8	101	0.012
30	T	1,1,1-Trichloroethane	50.000	50.369	-0.7	103	0.000
31	T	1,1-Dichloropropene	50.000	51.745	-3.5	103	0.000
32	T	2-Butanone	50.000	41.598	16.8	85	0.012
33	T	Benzene	50.000	49.267	1.5	102	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.505	2.0	98	0.000
35	T	1,2-Dichloroethane	50.000	47.064	5.9	97	0.000
36	T	Methylcyclohexane	50.000	53.098	-6.2	105	0.000
37	T	Trichloroethene	50.000	48.419	3.2	100	0.000
38	T	Dibromomethane	50.000	46.807	6.4	94	0.000
39	C	1,2-Dichloropropane	50.000	49.475	1.0#	100	0.000
40	T	Bromodichloromethane	50.000	49.056	1.9	99	0.000
41	T	1,4-Dioxane	200.000	258.394	-29.2#	133	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	45.408	9.2	93	0.000
43	T	cis-1,3-Dichloropropene	50.000	50.628	-1.3	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	40.881	18.2	84	0.000
45	T	trans-1,3-Dichloropropene	50.000	49.245	1.5	96	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.075	-0.3	101	0.000
48	C	Toluene	50.000	49.549	0.9#	101	0.000
49	T	Tetrachloroethene	50.000	50.529	-1.1	104	0.000
50	T	1,1,2-Trichloroethane	50.000	44.895	10.2	92	0.000
51	T	Dibromochloromethane	50.000	47.041	5.9	93	0.000
52	T	1,3-Dichloropropane	50.000	45.609	8.8	93	0.000
53	T	1,2-Dibromoethane	50.000	44.430	11.1	89	0.000
54	T	2-Hexanone	50.000	40.347	19.3	82	0.000
55	P	Chlorobenzene	50.000	49.157	1.7	101	0.000
56	T	1-Chlorohexane	50.000	52.824	-5.6	103	0.000
57	C	Ethylbenzene	50.000	50.241	-0.5#	102	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273028.D Vial: 1
Acq On : 26 Apr 2017 15:05 Operator: ADC
Sample : WG611720-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 15:17:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	48.231	3.5	98	0.000
59	T	m-,p-Xylene	100.000	102.061	-2.1	102	0.000
60	T	o-Xylene	50.000	49.846	0.3	100	0.000
61	T	Styrene	50.000	51.469	-2.9	100	0.000
62	P	Bromoform	50.000	46.463	7.1	88	0.000
63	T	Isopropylbenzene	50.000	50.686	-1.4	102	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	101	0.000
65	T	1,3,5-Trimethylbenzene	50.000	51.302	-2.6	102	0.000
66	S	p-Bromofluorobenzene	25.000	24.810	0.8	99	0.000
67	T	Bromobenzene	50.000	47.782	4.4	98	0.000
68	T	n-Propylbenzene	50.000	51.851	-3.7	104	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.059	9.9	86	0.000
70	T	2-Chlorotoluene	50.000	50.192	-0.4	102	0.000
71	T	1,2,3-Trichloropropane	50.000	42.464	15.1	85	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	46.088	7.8	85	0.000
73	T	1,2,4-Trimethylbenzene	50.000	51.233	-2.5	102	0.000
74	T	4-Chlorotoluene	50.000	50.806	-1.6	102	0.000
75	T	tert-Butylbenzene	50.000	49.189	1.6	101	0.000
76	T	sec-Butylbenzene	50.000	51.562	-3.1	102	0.000
77	T	p-Isopropyltoluene	50.000	52.982	-6.0	103	0.000
78	T	1,3-Dichlorobenzene	50.000	50.232	-0.5	101	0.000
79	T	1,4-Dichlorobenzene	50.000	49.076	1.8	100	0.000
80	T	n-Butylbenzene	50.000	55.882	-11.8	106	0.000
81	T	1,2-Dichlorobenzene	50.000	48.162	3.7	97	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	44.013	12.0	83	0.000
83	T	Hexachlorobutadiene	50.000	53.771	-7.5	104	0.011
84	T	1,2,4-Trichlorobenzene	50.000	53.297	-6.6	100	0.015
85	T	Naphthalene	50.000	46.697	6.6	88	0.014
86	T	1,2,3-Trichlorobenzene	50.000	49.561	0.9	95	0.017

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	417842	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	312089	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	162882	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	112419	24.9122	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.649%			
34) 1,2-Dichloroethane-d4	4.962	65	102044	24.1253	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.501%			
47) Toluene-d8	6.815	98	400508	25.7144	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.858%			
66) p-Bromofluorobenzene	8.786	95	138759	25.4429	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.772%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	259545	52.3019	ug/L	99
3) Chloromethane	1.221	50	207176	42.6595	ug/L	100
4) Vinyl Chloride	1.270	62	253962	47.2252	ug/L	99
5) 1,3-Butadiene	1.279	54	162630	49.2541	ug/L	97
6) Bromomethane	1.464	94	167080	41.7891	ug/L	99
7) Chloroethane	1.534	64	115747	45.3700	ug/L	100
8) Trichlorofluoromethane	1.626	101	349102	50.6092	ug/L	100
9) Diethyl ether	1.840	59	299534	90.0453	ug/L	99
10) 1,1-Dichloroethene	1.968	61	305646	47.3553	ug/L	98
11) Carbon Disulfide	1.982	76	677897	48.9363	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	201459	48.9590	ug/L	98
13) Iodomethane	2.069	142	280276	45.2267	ug/L	100
14) Acrolein	2.220	56	19100	46.4829	ug/L	98
15) Methylene Chloride	2.408	84	219105	44.7379	ug/L	95
16) Acetone	2.463	43	33632	40.0317	ug/L	97
17) trans-1,2-Dichloroethene	2.541	96	206202	46.9198	ug/L	99
18) Methyl acetate	2.576	43	107978	49.0246	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	481989	43.2150	ug/L #	1
20) 1,1-Dichloroethane	3.120	63	375383	47.5560	ug/L	100
21) Acrylonitrile	3.187	53	46295	43.2025	ug/L	98
22) Vinyl Acetate	2.619	86	39584	55.9640	ug/L #	49
23) cis-1,2-Dichloroethene	3.734	96	230110	46.2568	ug/L	98
24) 2,2-Dichloropropane	3.867	77	327982	52.4350	ug/L	98
25) Cyclohexane	3.969	56	340180	50.6685	ug/L	98
26) Bromochloromethane	3.983	130	145276	45.3257	ug/L	99
27) Chloroform	4.116	83	377351	45.8519	ug/L	100
28) Carbon Tetrachloride	4.252	117	309285	47.5245	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	335729	46.4004	ug/L	99
31) 1,1-Dichloropropene	4.507	75	271821	47.8355	ug/L	98
32) 2-Butanone	4.533	43	54356	43.3976	ug/L	100
33) Benzene	4.800	78	823883	46.2904	ug/L	99
35) 1,2-Dichloroethane	5.037	62	246812	44.5353	ug/L	99
36) Methylcyclohexane	5.425	83	348793	49.5851	ug/L	98
37) Trichloroethene	5.451	130	236372	44.2156	ug/L	98
38) Dibromomethane	5.862	93	120425	44.1771	ug/L	100
39) 1,2-Dichloropropane	5.966	63	219546	47.0376	ug/L	100
40) Bromodichloromethane	6.050	83	287011	46.0712	ug/L	100
41) 1,4-Dioxane	6.259	88	5771	248.2389	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.632	63	103937	49.0943	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	341741	48.6803	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	48356	41.6976	ug/L	98
45) trans-1,3-Dichloropropene	7.243	75	284505	47.6715	ug/L	100
48) Toluene	6.858	91	918484	46.9415	ug/L	100
49) Tetrachloroethene	7.185	166	259217	46.4479	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	163097	43.0050	ug/L	99
51) Dibromochloromethane	7.507	129	229085	44.2537	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

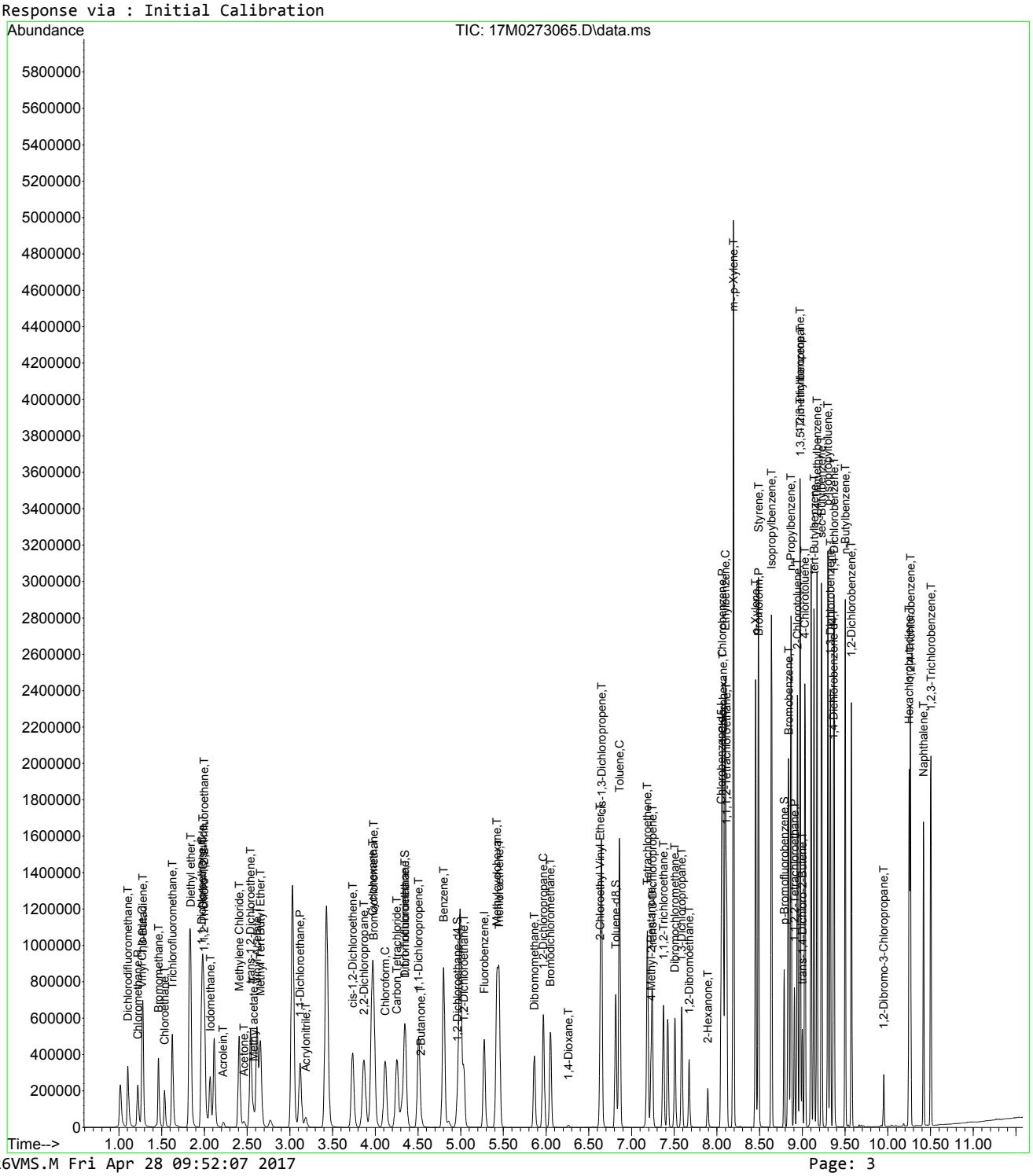
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	266828	44.2690 ug/L	98
53) 1,2-Dibromoethane	7.675	107	167154	43.0184 ug/L	99
54) 2-Hexanone	7.892	43	84907	42.6325 ug/L	98
55) Chlorobenzene	8.060	112	602735	45.9099 ug/L	98
56) 1-Chlorohexane	8.071	69	54111	51.0503 ug/L	94
57) Ethylbenzene	8.097	106	321952	47.1102 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.112	131	231737	45.3443 ug/L	99
59) m-,p-Xylene	8.193	106	785227	95.2048 ug/L	98
60) o-Xylene	8.451	106	380251	46.7919 ug/L	98
61) Styrene	8.485	104	628397	48.3278 ug/L	99
62) Bromoform	8.488	173	158654	43.5684 ug/L	99
63) Isopropylbenzene	8.639	105	992079	47.1638 ug/L	99
65) 1,3,5-Trimethylbenzene	8.975	105	850901	46.8612 ug/L	99
67) Bromobenzene	8.839	156	280810	43.8277 ug/L	98
68) n-Propylbenzene	8.865	91	1151000	47.8525 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	190519	43.4837 ug/L	100
70) 2-Chlorotoluene	8.940	91	691541	46.5797 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	52347	40.4150 ug/L	96
72) trans-1,4-Dichloro-2-B...	8.998	53	48229	49.9500 ug/L #	97
73) 1,2,4-Trimethylbenzene	9.172	105	857783	46.8482 ug/L	100
74) 4-Chlorotoluene	9.030	91	700937	47.2904 ug/L	99
75) tert-Butylbenzene	9.137	134	161869	44.6047 ug/L	99
76) sec-Butylbenzene	9.224	105	1044322	46.6843 ug/L	99
77) p-Isopropyltoluene	9.296	119	903254	47.3671 ug/L	100
78) 1,3-Dichlorobenzene	9.328	146	515644	46.1653 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	508770	45.1172 ug/L	100
80) n-Butylbenzene	9.502	91	802771	49.8779 ug/L	98
81) 1,2-Dichlorobenzene	9.574	146	481245	44.2084 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	33992	42.2899 ug/L	95
83) Hexachlorobutadiene	10.249	225	200842	43.7654 ug/L	100
84) 1,2,4-Trichlorobenzene	10.266	180	368387	45.5543 ug/L	99
85) Naphthalene	10.416	128	633632	40.1811 ug/L	100
86) 1,2,3-Trichlorobenzene	10.503	180	325787	41.4753 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Fri Apr 28 09:52:07 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	0.297	0.311	-4.7	95	0.000
3	P	Chloromethane	0.291	0.248	14.8	86	0.000
4	C	Vinyl Chloride	0.322	0.304	5.6#	92	0.000
5	T	1,3-Butadiene	0.198	0.195	1.5	95	0.000
6	T	Bromomethane	0.239	0.200	16.3	90	0.000
7	T	Chloroethane	0.153	0.139	9.2	102	0.000
8	T	Trichlorofluoromethane	0.413	0.418	-1.2	94	0.011
9	T	Diethyl ether	0.199	0.179	10.1	87	0.000
10	C	1,1-Dichloroethene	0.386	0.366	5.2#	94	0.012
11	T	Carbon Disulfide	0.829	0.811	2.2	95	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.241	2.0	95	0.012
13	T	Iodomethane	0.286	0.335	-17.1	92	0.011
14	T	Acrolein	0.025	0.023	8.0	87	0.000
15	T	Methylene Chloride	0.293	0.262	10.6	93	0.000
16	T	Acetone	0.050	0.040	20.0	83	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.247	6.1	93	0.000
18	T	Methyl acetate	0.132	0.129	2.3	84	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.577	13.5	84	0.000
20	P	1,1-Dichloroethane	0.472	0.449	4.9	94	0.000
21	T	Acrylonitrile	0.064	0.055	14.1	83	0.000
22	T	Vinyl Acetate	0.042	0.047	-11.9	105	0.011
23	T	cis-1,2-Dichloroethene	0.298	0.275	7.7	92	0.000
24	T	2,2-Dichloropropane	0.321	0.392	-22.1	104	0.000
25	T	Cyclohexane	0.402	0.407	-1.2	97	0.000
26	T	Bromochloromethane	0.192	0.174	9.4	87	0.000
27	C	Chloroform	0.492	0.452	8.1#	92	0.000
28	T	Carbon Tetrachloride	0.389	0.370	4.9	91	0.000
29	S	Dibromofluoromethane	0.270	0.269	0.4	97	0.000
30	T	1,1,1-Trichloroethane	0.433	0.402	7.2	92	0.000
31	T	1,1-Dichloropropene	0.340	0.325	4.4	92	0.000
32	T	2-Butanone	0.075	0.065	13.3	86	0.000
33	T	Benzene	1.065	0.986	7.4	93	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.244	3.6	94	0.000
35	T	1,2-Dichloroethane	0.332	0.295	11.1	89	0.000
36	T	Methylcyclohexane	0.421	0.417	1.0	95	0.000
37	T	Trichloroethene	0.320	0.283	11.6	89	0.000
38	T	Dibromomethane	0.163	0.144	11.7	86	0.000
39	C	1,2-Dichloropropane	0.279	0.263	5.7#	92	0.000
40	T	Bromodichloromethane	0.373	0.343	8.0	90	0.000
41	T	1,4-Dioxane	0.001	0.002	-100.0#	124	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.124	2.4	97	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.409	2.6	92	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.058	15.9	83	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.340	4.8	90	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	98	0.000
47	S	Toluene-d8	1.248	1.283	-2.8	98	0.000
48	C	Toluene	1.567	1.472	6.1#	92	0.000
49	T	Tetrachloroethene	0.447	0.415	7.2	91	0.000
50	T	1,1,2-Trichloroethane	0.304	0.261	14.1	84	0.000
51	T	Dibromochloromethane	0.415	0.367	11.6	84	0.000
52	T	1,3-Dichloropropane	0.483	0.427	11.6	86	0.000
53	T	1,2-Dibromoethane	0.311	0.268	13.8	83	0.000
54	T	2-Hexanone	0.160	0.136	15.0	83	0.000
55	P	Chlorobenzene	1.052	0.966	8.2	90	0.000
56	T	1-Chlorohexane	0.085	0.087	-2.4	95	0.000
57	C	Ethylbenzene	0.547	0.516	5.7#	91	0.000

826VMS.M Thu Apr 27 12:17:51 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.371	9.3	88	0.000
59	T	m-,p-Xylene	0.661	0.629	4.8	91	0.000
60	T	o-Xylene	0.651	0.609	6.5	90	0.000
61	T	Styrene	1.042	1.007	3.4	90	0.000
62	P	Bromoform	0.292	0.254	13.0	78	0.000
63	T	Isopropylbenzene	1.685	1.589	5.7	91	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	98	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.612	6.3	90	0.000
66	S	p-Bromofluorobenzene	0.837	0.852	-1.8	98	0.000
67	T	Bromobenzene	0.983	0.862	12.3	87	0.000
68	T	n-Propylbenzene	3.692	3.533	4.3	92	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.585	12.9	80	0.000
70	T	2-Chlorotoluene	2.279	2.123	6.8	92	0.000
71	T	1,2,3-Trichloropropane	0.199	0.161	19.1	79	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.148	0.0	89	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.633	6.3	90	0.000
74	T	4-Chlorotoluene	2.275	2.152	5.4	92	0.000
75	T	tert-Butylbenzene	0.557	0.497	10.8	88	0.000
76	T	sec-Butylbenzene	3.433	3.206	6.6	90	0.000
77	T	p-Isopropyltoluene	2.927	2.773	5.3	89	0.000
78	T	1,3-Dichlorobenzene	1.714	1.583	7.6	90	0.000
79	T	1,4-Dichlorobenzene	1.731	1.562	9.8	89	0.000
80	T	n-Butylbenzene	2.470	2.464	0.2	91	0.000
81	T	1,2-Dichlorobenzene	1.671	1.477	11.6	86	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.104	15.4	77	0.000
83	T	Hexachlorobutadiene	0.704	0.617	12.4	82	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.131	8.9	83	0.000
85	T	Naphthalene	2.420	1.945	19.6	73	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.000	17.1	77	0.011

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	50.000	52.302	-4.6	95	0.000
3	P	Chloromethane	50.000	42.659	14.7	86	0.000
4	C	Vinyl Chloride	50.000	47.225	5.5#	92	0.000
5	T	1,3-Butadiene	50.000	49.254	1.5	95	0.000
6	T	Bromomethane	50.000	41.789	16.4	90	0.000
7	T	Chloroethane	50.000	45.370	9.3	102	0.000
8	T	Trichlorofluoromethane	50.000	50.609	-1.2	94	0.011
9	T	Diethyl ether	100.000	90.045	10.0	87	0.000
10	C	1,1-Dichloroethene	50.000	47.355	5.3#	94	0.012
11	T	Carbon Disulfide	50.000	48.936	2.1	95	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	48.959	2.1	95	0.012
13	T	Iodomethane	50.000	45.227	9.5	92	0.011
14	T	Acrolein	50.000	46.483	7.0	87	0.000
15	T	Methylene Chloride	50.000	44.738	10.5	93	0.000
16	T	Acetone	50.000	40.032	19.9	83	0.000
17	T	trans-1,2-Dichloroethene	50.000	46.920	6.2	93	0.000
18	T	Methyl acetate	50.000	49.025	2.0	84	0.000
19	T	Methyl Tert Butyl Ether	50.000	43.215	13.6	84	0.000
20	P	1,1-Dichloroethane	50.000	47.556	4.9	94	0.000
21	T	Acrylonitrile	50.000	43.202	13.6	83	0.000
22	T	Vinyl Acetate	50.000	55.964	-11.9	105	0.011
23	T	cis-1,2-Dichloroethene	50.000	46.257	7.5	92	0.000
24	T	2,2-Dichloropropane	50.000	52.435	-4.9	104	0.000
25	T	Cyclohexane	50.000	50.669	-1.3	97	0.000
26	T	Bromochloromethane	50.000	45.326	9.3	87	0.000
27	C	Chloroform	50.000	45.852	8.3#	92	0.000
28	T	Carbon Tetrachloride	50.000	47.524	5.0	91	0.000
29	S	Dibromofluoromethane	25.000	24.912	0.4	97	0.000
30	T	1,1,1-Trichloroethane	50.000	46.400	7.2	92	0.000
31	T	1,1-Dichloropropene	50.000	47.835	4.3	92	0.000
32	T	2-Butanone	50.000	43.398	13.2	86	0.000
33	T	Benzene	50.000	46.290	7.4	93	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.125	3.5	94	0.000
35	T	1,2-Dichloroethane	50.000	44.535	10.9	89	0.000
36	T	Methylcyclohexane	50.000	49.585	0.8	95	0.000
37	T	Trichloroethene	50.000	44.216	11.6	89	0.000
38	T	Dibromomethane	50.000	44.177	11.6	86	0.000
39	C	1,2-Dichloropropane	50.000	47.038	5.9#	92	0.000
40	T	Bromodichloromethane	50.000	46.071	7.9	90	0.000
41	T	1,4-Dioxane	200.000	248.239	-24.1	124	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	49.094	1.8	97	0.000
43	T	cis-1,3-Dichloropropene	50.000	48.680	2.6	92	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.698	16.6	83	0.000
45	T	trans-1,3-Dichloropropene	50.000	47.672	4.7	90	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	98	0.000
47	S	Toluene-d8	25.000	25.714	-2.9	98	0.000
48	C	Toluene	50.000	46.941	6.1#	92	0.000
49	T	Tetrachloroethene	50.000	46.448	7.1	91	0.000
50	T	1,1,2-Trichloroethane	50.000	43.005	14.0	84	0.000
51	T	Dibromochloromethane	50.000	44.254	11.5	84	0.000
52	T	1,3-Dichloropropane	50.000	44.269	11.5	86	0.000
53	T	1,2-Dibromoethane	50.000	43.018	14.0	83	0.000
54	T	2-Hexanone	50.000	42.632	14.7	83	0.000
55	P	Chlorobenzene	50.000	45.910	8.2	90	0.000
56	T	1-Chlorohexane	50.000	51.050	-2.1	95	0.000
57	C	Ethylbenzene	50.000	47.110	5.8#	91	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	45.344	9.3	88	0.000
59	T	m-,p-Xylene	100.000	95.205	4.8	91	0.000
60	T	o-Xylene	50.000	46.792	6.4	90	0.000
61	T	Styrene	50.000	48.328	3.3	90	0.000
62	P	Bromoform	50.000	43.568	12.9	78	0.000
63	T	Isopropylbenzene	50.000	47.164	5.7	91	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	98	0.000
65	T	1,3,5-Trimethylbenzene	50.000	46.861	6.3	90	0.000
66	S	p-Bromofluorobenzene	25.000	25.443	-1.8	98	0.000
67	T	Bromobenzene	50.000	43.828	12.3	87	0.000
68	T	n-Propylbenzene	50.000	47.853	4.3	92	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	43.484	13.0	80	0.000
70	T	2-Chlorotoluene	50.000	46.580	6.8	92	0.000
71	T	1,2,3-Trichloropropane	50.000	40.415	19.2	79	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.950	0.1	89	0.000
73	T	1,2,4-Trimethylbenzene	50.000	46.848	6.3	90	0.000
74	T	4-Chlorotoluene	50.000	47.290	5.4	92	0.000
75	T	tert-Butylbenzene	50.000	44.605	10.8	88	0.000
76	T	sec-Butylbenzene	50.000	46.684	6.6	90	0.000
77	T	p-Isopropyltoluene	50.000	47.367	5.3	89	0.000
78	T	1,3-Dichlorobenzene	50.000	46.165	7.7	90	0.000
79	T	1,4-Dichlorobenzene	50.000	45.117	9.8	89	0.000
80	T	n-Butylbenzene	50.000	49.878	0.2	91	0.000
81	T	1,2-Dichlorobenzene	50.000	44.208	11.6	86	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	42.290	15.4	77	0.000
83	T	Hexachlorobutadiene	50.000	43.765	12.5	82	0.000
84	T	1,2,4-Trichlorobenzene	50.000	45.554	8.9	83	0.000
85	T	Naphthalene	50.000	40.181	19.6	73	0.000
86	T	1,2,3-Trichlorobenzene	50.000	41.475	17.0	77	0.011

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	385785	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	287200	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	145182	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	104329	25.0406 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.162%		
34) 1,2-Dichloroethane-d4	4.956	65	94521	24.2036 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.814%		
47) Toluene-d8	6.812	98	359220	25.0622 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.249%		
66) p-Bromofluorobenzene	8.786	95	122899	25.2822 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.129%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	1.099	85	254492	55.5451 ug/L	100
3) Chloromethane	1.215	50	210371	46.9168 ug/L	99
4) Vinyl Chloride	1.264	62	253843	51.1254 ug/L	100
5) 1,3-Butadiene	1.273	54	164421	53.9344 ug/L	99
6) Bromomethane	1.455	94	137560	37.2646 ug/L	99
7) Chloroethane	1.528	64	109611	46.5351 ug/L	98
8) Trichlorofluoromethane	1.615	101	345749	54.2881 ug/L	99
9) Diethyl ether	1.837	59	284264	92.5558 ug/L	98
10) 1,1-Dichloroethene	1.959	61	299336	50.2315 ug/L	98
11) Carbon Disulfide	1.971	76	645427	50.4640 ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	199701	52.5646 ug/L	98
13) Iodomethane	2.060	142	284263	49.4846 ug/L	98
14) Acrolein	2.220	56	16152	42.5748 ug/L	99
15) Methylene Chloride	2.402	84	208845	46.1864 ug/L	98
16) Acetone	2.463	43	32137	41.4308 ug/L	97
17) trans-1,2-Dichloroethene	2.535	96	198924	49.0249 ug/L	99
18) Methyl acetate	2.570	43	101588	49.9560 ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	459890	44.6599 ug/L #	24
20) 1,1-Dichloroethane	3.114	63	362626	49.7572 ug/L	100
21) Acrylonitrile	3.184	53	44000	44.4727 ug/L	99
22) Vinyl Acetate	2.613	86	36600	56.0450 ug/L	97
23) cis-1,2-Dichloroethene	3.728	96	220793	48.0720 ug/L	99
24) 2,2-Dichloropropane	3.864	77	316006	54.7065 ug/L	98
25) Cyclohexane	3.963	56	323029	52.1120 ug/L	98
26) Bromochloromethane	3.980	130	141396	47.7809 ug/L	100
27) Chloroform	4.110	83	365318	48.0784 ug/L	99
28) Carbon Tetrachloride	4.249	117	301083	50.1085 ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	328754	49.2119 ug/L	100
31) 1,1-Dichloropropene	4.501	75	260702	49.6910 ug/L	99
32) 2-Butanone	4.530	43	49629	42.9161 ug/L	98
33) Benzene	4.797	78	794098	48.3243 ug/L	99
35) 1,2-Dichloroethane	5.034	62	237120	46.3418 ug/L	99
36) Methylcyclohexane	5.425	83	335056	51.5902 ug/L	99
37) Trichloroethene	5.445	130	227592	46.1109 ug/L	98
38) Dibromomethane	5.859	93	115371	45.8399 ug/L	100
39) 1,2-Dichloropropane	5.966	63	209340	48.5779 ug/L	100
40) Bromodichloromethane	6.050	83	276266	48.0313 ug/L	100
41) 1,4-Dioxane	6.259	88	4405	205.2256 ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.629	63	85773	43.8812 ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	329359	50.8150 ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	44186	41.2678 ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	269998	49.0000 ug/L	100
48) Toluene	6.858	91	889735	49.4128 ug/L	100
49) Tetrachloroethene	7.185	166	250486	48.7731 ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	157695	45.1840 ug/L	99
51) Dibromochloromethane	7.507	129	222443	46.6945 ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

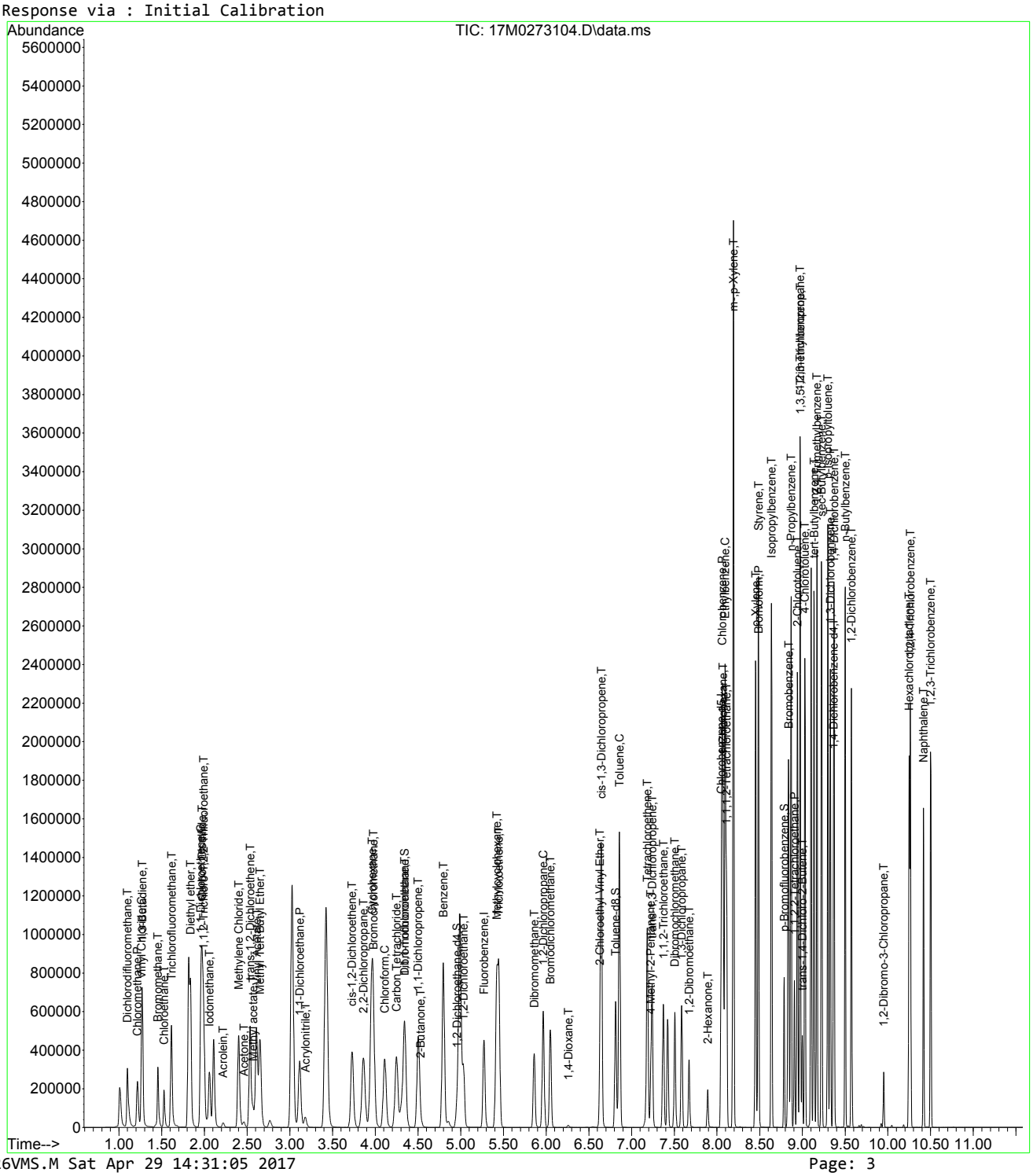
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	256210	46.1912 ug/L	99
53) 1,2-Dibromoethane	7.674	107	159461	44.5950 ug/L	99
54) 2-Hexanone	7.892	43	75989	41.4612 ug/L	99
55) Chlorobenzene	8.060	112	586054	48.5078 ug/L	99
56) 1-Chlorohexane	8.071	69	51526	52.8243 ug/L	96
57) Ethylbenzene	8.094	106	310654	49.3964 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.112	131	224220	47.6756 ug/L	99
59) m-,p-Xylene	8.193	106	763160	100.5480 ug/L	99
60) o-Xylene	8.453	106	362667	48.4956 ug/L	97
61) Styrene	8.485	104	608376	50.8428 ug/L	100
62) Bromoform	8.488	173	155509	46.4056 ug/L	99
63) Isopropylbenzene	8.639	105	959579	49.5721 ug/L	100
65) 1,3,5-Trimethylbenzene	8.974	105	827338	51.1184 ug/L	99
67) Bromobenzene	8.838	156	271383	47.5203 ug/L	98
68) n-Propylbenzene	8.867	91	1117433	52.1208 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	188462	48.2583 ug/L	100
70) 2-Chlorotoluene	8.940	91	662592	50.0709 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	50968	44.1478 ug/L	97
72) trans-1,4-Dichloro-2-B...	8.998	53	42862	49.8035 ug/L #	97
73) 1,2,4-Trimethylbenzene	9.168	105	831889	50.9731 ug/L	100
74) 4-Chlorotoluene	9.029	91	674434	51.0498 ug/L	99
75) tert-Butylbenzene	9.137	134	158261	48.9273 ug/L	99
76) sec-Butylbenzene	9.223	105	1018664	51.0890 ug/L	99
77) p-Isopropyltoluene	9.296	119	883541	51.9821 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	497129	49.9338 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	487390	48.4906 ug/L	100
80) n-Butylbenzene	9.501	91	782954	54.5774 ug/L	98
81) 1,2-Dichlorobenzene	9.574	146	464122	47.8334 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	33874	47.2810 ug/L	93
83) Hexachlorobutadiene	10.248	225	193657	47.3445 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	352636	48.9229 ug/L	99
85) Naphthalene	10.416	128	614902	43.7473 ug/L	100
86) 1,2,3-Trichlorobenzene	10.500	180	317140	45.2968 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:05 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	92	0.000
2	T	Dichlorodifluoromethane	0.297	0.330	-11.1	93	0.000
3	P	Chloromethane	0.291	0.273	6.2	87	0.000
4	C	Vinyl Chloride	0.322	0.329	-2.2#	92	0.000
5	T	1,3-Butadiene	0.198	0.213	-7.6	96	0.000
6	T	Bromomethane	0.239	0.178	25.5#	74	0.000
7	T	Chloroethane	0.153	0.142	7.2	96	0.000
8	T	Trichlorofluoromethane	0.413	0.448	-8.5	93	0.000
9	T	Diethyl ether	0.199	0.184	7.5	83	0.000
10	C	1,1-Dichloroethene	0.386	0.388	-0.5#	92	0.000
11	T	Carbon Disulfide	0.829	0.837	-1.0	91	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.259	-5.3	94	0.000
13	T	Iodomethane	0.286	0.368	-28.7#	94	0.000
14	T	Acrolein	0.025	0.021	16.0	73	0.000
15	T	Methylene Chloride	0.293	0.271	7.5	89	0.000
16	T	Acetone	0.050	0.042	16.0	79	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.258	1.9	90	0.000
18	T	Methyl acetate	0.132	0.132	0.0	79	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.596	10.6	80	0.000
20	P	1,1-Dichloroethane	0.472	0.470	0.4	91	0.000
21	T	Acrylonitrile	0.064	0.057	10.9	79	0.000
22	T	Vinyl Acetate	0.042	0.047	-11.9	97	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.286	4.0	88	0.000
24	T	2,2-Dichloropropane	0.321	0.410	-27.7#	100	0.000
25	T	Cyclohexane	0.402	0.419	-4.2	92	0.000
26	T	Bromochloromethane	0.192	0.183	4.7	85	0.000
27	C	Chloroform	0.492	0.473	3.9#	89	0.000
28	T	Carbon Tetrachloride	0.389	0.390	-0.3	89	0.000
29	S	Dibromofluoromethane	0.270	0.270	0.0	90	0.000
30	T	1,1,1-Trichloroethane	0.433	0.426	1.6	90	0.000
31	T	1,1-Dichloropropene	0.340	0.338	0.6	89	0.000
32	T	2-Butanone	0.075	0.064	14.7	78	0.000
33	T	Benzene	1.065	1.029	3.4	90	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.245	3.2	87	0.000
35	T	1,2-Dichloroethane	0.332	0.307	7.5	85	0.000
36	T	Methylcyclohexane	0.421	0.434	-3.1	91	0.000
37	T	Trichloroethene	0.320	0.295	7.8	86	0.000
38	T	Dibromomethane	0.163	0.150	8.0	82	0.000
39	C	1,2-Dichloropropane	0.279	0.271	2.9#	88	0.000
40	T	Bromodichloromethane	0.373	0.358	4.0	87	0.000
41	T	1,4-Dioxane	0.001	0.001	0.0	95	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.111	12.6	80	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.427	-1.7	89	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.057	17.4	76	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.350	2.0	85	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	91	0.000
47	S	Toluene-d8	1.248	1.251	-0.2	88	0.000
48	C	Toluene	1.567	1.549	1.1#	89	0.000
49	T	Tetrachloroethene	0.447	0.436	2.5	88	0.000
50	T	1,1,2-Trichloroethane	0.304	0.275	9.5	81	0.000
51	T	Dibromochloromethane	0.415	0.387	6.7	81	0.000
52	T	1,3-Dichloropropane	0.483	0.446	7.7	82	0.000
53	T	1,2-Dibromoethane	0.311	0.278	10.6	79	0.000
54	T	2-Hexanone	0.160	0.132	17.5	74	0.000
55	P	Chlorobenzene	1.052	1.020	3.0	87	0.000
56	T	1-Chlorohexane	0.085	0.090	-5.9	91	0.000
57	C	Ethylbenzene	0.547	0.541	1.1#	88	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.390	4.6	85	0.000
59	T	m-,p-Xylene	0.661	0.664	-0.5	88	0.000
60	T	o-Xylene	0.651	0.631	3.1	86	0.000
61	T	Styrene	1.042	1.059	-1.6	87	0.000
62	P	Bromoform	0.292	0.271	7.2	77	0.000
63	T	Isopropylbenzene	1.685	1.671	0.8	88	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	87	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.849	-2.2	88	0.000
66	S	p-Bromofluorobenzene	0.837	0.847	-1.2	87	0.000
67	T	Bromobenzene	0.983	0.935	4.9	84	0.000
68	T	n-Propylbenzene	3.692	3.848	-4.2	90	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.649	3.4	79	0.000
70	T	2-Chlorotoluene	2.279	2.282	-0.1	88	0.000
71	T	1,2,3-Trichloropropane	0.199	0.176	11.6	76	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.148	0.0	79	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.865	-2.0	88	0.000
74	T	4-Chlorotoluene	2.275	2.323	-2.1	89	0.000
75	T	tert-Butylbenzene	0.557	0.545	2.2	86	0.000
76	T	sec-Butylbenzene	3.433	3.508	-2.2	87	0.000
77	T	p-Isopropyltoluene	2.927	3.043	-4.0	87	0.000
78	T	1,3-Dichlorobenzene	1.714	1.712	0.1	86	0.000
79	T	1,4-Dichlorobenzene	1.731	1.679	3.0	85	0.000
80	T	n-Butylbenzene	2.470	2.696	-9.1	89	0.000
81	T	1,2-Dichlorobenzene	1.671	1.598	4.4	83	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.117	4.9	76	0.000
83	T	Hexachlorobutadiene	0.704	0.667	5.3	79	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.214	2.2	79	0.000
85	T	Naphthalene	2.420	2.118	12.5	71	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.092	9.5	75	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	92	0.000
2	T	Dichlorodifluoromethane	50.000	55.545	-11.1	93	0.000
3	P	Chloromethane	50.000	46.917	6.2	87	0.000
4	C	Vinyl Chloride	50.000	51.125	-2.3#	92	0.000
5	T	1,3-Butadiene	50.000	53.934	-7.9	96	0.000
6	T	Bromomethane	50.000	37.265	25.5#	74	0.000
7	T	Chloroethane	50.000	46.535	6.9	96	0.000
8	T	Trichlorofluoromethane	50.000	54.288	-8.6	93	0.000
9	T	Diethyl ether	100.000	92.556	7.4	83	0.000
10	C	1,1-Dichloroethene	50.000	50.231	-0.5#	92	0.000
11	T	Carbon Disulfide	50.000	50.464	-0.9	91	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	52.565	-5.1	94	0.000
13	T	Iodomethane	50.000	49.485	1.0	94	0.000
14	T	Acrolein	50.000	42.575	14.8	73	0.000
15	T	Methylene Chloride	50.000	46.186	7.6	89	0.000
16	T	Acetone	50.000	41.431	17.1	79	0.000
17	T	trans-1,2-Dichloroethene	50.000	49.025	2.0	90	0.000
18	T	Methyl acetate	50.000	49.956	0.1	79	0.000
19	T	Methyl Tert Butyl Ether	50.000	44.660	10.7	80	0.000
20	P	1,1-Dichloroethane	50.000	49.757	0.5	91	0.000
21	T	Acrylonitrile	50.000	44.473	11.1	79	0.000
22	T	Vinyl Acetate	50.000	56.045	-12.1	97	0.000
23	T	cis-1,2-Dichloroethene	50.000	48.072	3.9	88	0.000
24	T	2,2-Dichloropropane	50.000	54.707	-9.4	100	0.000
25	T	Cyclohexane	50.000	52.112	-4.2	92	0.000
26	T	Bromochloromethane	50.000	47.781	4.4	85	0.000
27	C	Chloroform	50.000	48.078	3.8#	89	0.000
28	T	Carbon Tetrachloride	50.000	50.109	-0.2	89	0.000
29	S	Dibromofluoromethane	25.000	25.041	-0.2	90	0.000
30	T	1,1,1-Trichloroethane	50.000	49.212	1.6	90	0.000
31	T	1,1-Dichloropropene	50.000	49.691	0.6	89	0.000
32	T	2-Butanone	50.000	42.916	14.2	78	0.000
33	T	Benzene	50.000	48.324	3.4	90	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.204	3.2	87	0.000
35	T	1,2-Dichloroethane	50.000	46.342	7.3	85	0.000
36	T	Methylcyclohexane	50.000	51.590	-3.2	91	0.000
37	T	Trichloroethene	50.000	46.111	7.8	86	0.000
38	T	Dibromomethane	50.000	45.840	8.3	82	0.000
39	C	1,2-Dichloropropane	50.000	48.578	2.8#	88	0.000
40	T	Bromodichloromethane	50.000	48.031	3.9	87	0.000
41	T	1,4-Dioxane	200.000	205.226	-2.6	95	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	43.881	12.2	80	0.000
43	T	cis-1,3-Dichloropropene	50.000	50.815	-1.6	89	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.268	17.5	76	0.000
45	T	trans-1,3-Dichloropropene	50.000	49.000	2.0	85	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	91	0.000
47	S	Toluene-d8	25.000	25.062	-0.2	88	0.000
48	C	Toluene	50.000	49.413	1.2#	89	0.000
49	T	Tetrachloroethene	50.000	48.773	2.5	88	0.000
50	T	1,1,2-Trichloroethane	50.000	45.184	9.6	81	0.000
51	T	Dibromochloromethane	50.000	46.695	6.6	81	0.000
52	T	1,3-Dichloropropane	50.000	46.191	7.6	82	0.000
53	T	1,2-Dibromoethane	50.000	44.595	10.8	79	0.000
54	T	2-Hexanone	50.000	41.461	17.1	74	0.000
55	P	Chlorobenzene	50.000	48.508	3.0	87	0.000
56	T	1-Chlorohexane	50.000	52.824	-5.6	91	0.000
57	C	Ethylbenzene	50.000	49.396	1.2#	88	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	47.676	4.6	85	0.000
59	T	m-,p-Xylene	100.000	100.548	-0.5	88	0.000
60	T	o-Xylene	50.000	48.496	3.0	86	0.000
61	T	Styrene	50.000	50.843	-1.7	87	0.000
62	P	Bromoform	50.000	46.406	7.2	77	0.000
63	T	Isopropylbenzene	50.000	49.572	0.9	88	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	87	0.000
65	T	1,3,5-Trimethylbenzene	50.000	51.118	-2.2	88	0.000
66	S	p-Bromofluorobenzene	25.000	25.282	-1.1	87	0.000
67	T	Bromobenzene	50.000	47.520	5.0	84	0.000
68	T	n-Propylbenzene	50.000	52.121	-4.2	90	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	48.258	3.5	79	0.000
70	T	2-Chlorotoluene	50.000	50.071	-0.1	88	0.000
71	T	1,2,3-Trichloropropane	50.000	44.148	11.7	76	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.803	0.4	79	0.000
73	T	1,2,4-Trimethylbenzene	50.000	50.973	-1.9	88	0.000
74	T	4-Chlorotoluene	50.000	51.050	-2.1	89	0.000
75	T	tert-Butylbenzene	50.000	48.927	2.1	86	0.000
76	T	sec-Butylbenzene	50.000	51.089	-2.2	87	0.000
77	T	p-Isopropyltoluene	50.000	51.982	-4.0	87	0.000
78	T	1,3-Dichlorobenzene	50.000	49.934	0.1	86	0.000
79	T	1,4-Dichlorobenzene	50.000	48.491	3.0	85	0.000
80	T	n-Butylbenzene	50.000	54.577	-9.2	89	0.000
81	T	1,2-Dichlorobenzene	50.000	47.833	4.3	83	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	47.281	5.4	76	0.000
83	T	Hexachlorobutadiene	50.000	47.344	5.3	79	0.000
84	T	1,2,4-Trichlorobenzene	50.000	48.923	2.2	79	0.000
85	T	Naphthalene	50.000	43.747	12.5	71	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.297	9.4	75	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12:06 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.91	96	792026	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	640690	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	347354	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	213878	25.7455 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.00%		
43) 1,2-Dichloroethane-d4	10.51	65	179452	24.9870 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.96%		
58) Toluene-d8	12.90	98	770492	26.3198 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.28%		
80) p-Bromofluorobenzene	16.29	95	303020	24.7178 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.88%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	593394	55.3616 ug/L	99
3) Chloromethane	3.80	50	685523	51.1583 ug/L	99
4) Vinyl Chloride	4.04	62	645561	51.0132 ug/L	98
5) 1,3-Butadiene	4.08	54	320229	67.2848 ug/L	92
6) Bromomethane	4.95	94	291794	60.1953 ug/L	98
7) Chloroethane	5.11	64	283915	51.3627 ug/L	97
8) Trichlorofluoromethane	5.60	101	705901	51.3581 ug/L	100
9) Diethyl ether	6.12	59	493295	95.2937 ug/L	91
10) Isoprene	6.16	67	613736	56.4753 ug/L	90
11) Acrolein	6.37	56	29985	41.8253 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	409775	52.2826 ug/L	99
13) Acetone	6.46	43	54260	48.7103 ug/L	94
14) 1,1-Dichloroethene	6.69	61	591085	51.5307 ug/L	98
15) Tert-Butyl Alcohol	6.79	59	67272	186.3044 ug/L	99
16) Dimethyl Sulfide	6.96	62	403322	52.7891 ug/L	88
17) Iodomethane	7.21	142	137955	40.2580 ug/L	88
18) Methyl acetate	7.21	43	168136	55.1204 ug/L #	88
19) Methylene Chloride	7.47	84	401608	48.7201 ug/L	84
20) Carbon Disulfide	7.52	76	1389292	58.2513 ug/L	100
21) Acrylonitrile	7.65	53	80347	51.9985 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	799197	49.2064 ug/L	95
23) trans-1,2-Dichloroethene	7.92	61	561694	50.3321 ug/L	96
24) n-Hexane	8.00	57	553480	59.4164 ug/L	93
25) Diisopropyl ether	8.33	45	2499147	100.0492 ug/L	95
26) Vinyl Acetate	8.51	43	513259	45.8133 ug/L	94
27) 1,1-Dichloroethane	8.54	63	731400	50.9234 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2088364	98.3070 ug/L	98
29) 2-Butanone	9.09	43	80987	46.3611 ug/L	90
30) Propionitrile	9.20	54	52982	97.8568 ug/L	99
31) 2,2-Dichloropropane	9.31	77	656456	54.1421 ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	470964	51.0581 ug/L	95
33) Chloroform	9.59	83	738965	46.4345 ug/L	98
34) 1-Bromopropane	9.73	122	91813	50.4565 ug/L	97
35) Bromochloromethane	9.82	130	256679	51.5687 ug/L	93
36) Tetrahydrofuran	9.84	42	227971	189.5807 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	672673	52.3767 ug/L	99
39) Cyclohexane	10.15	56	662474	55.4035 ug/L	91
40) 1,1-Dichloropropene	10.32	75	568165	50.6677 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1865134	98.0499 ug/L	98
42) Carbon Tetrachloride	10.46	117	633083	53.1629 ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419116.D 8260WT.M Mon Apr 24 12:51:05 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12:06 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

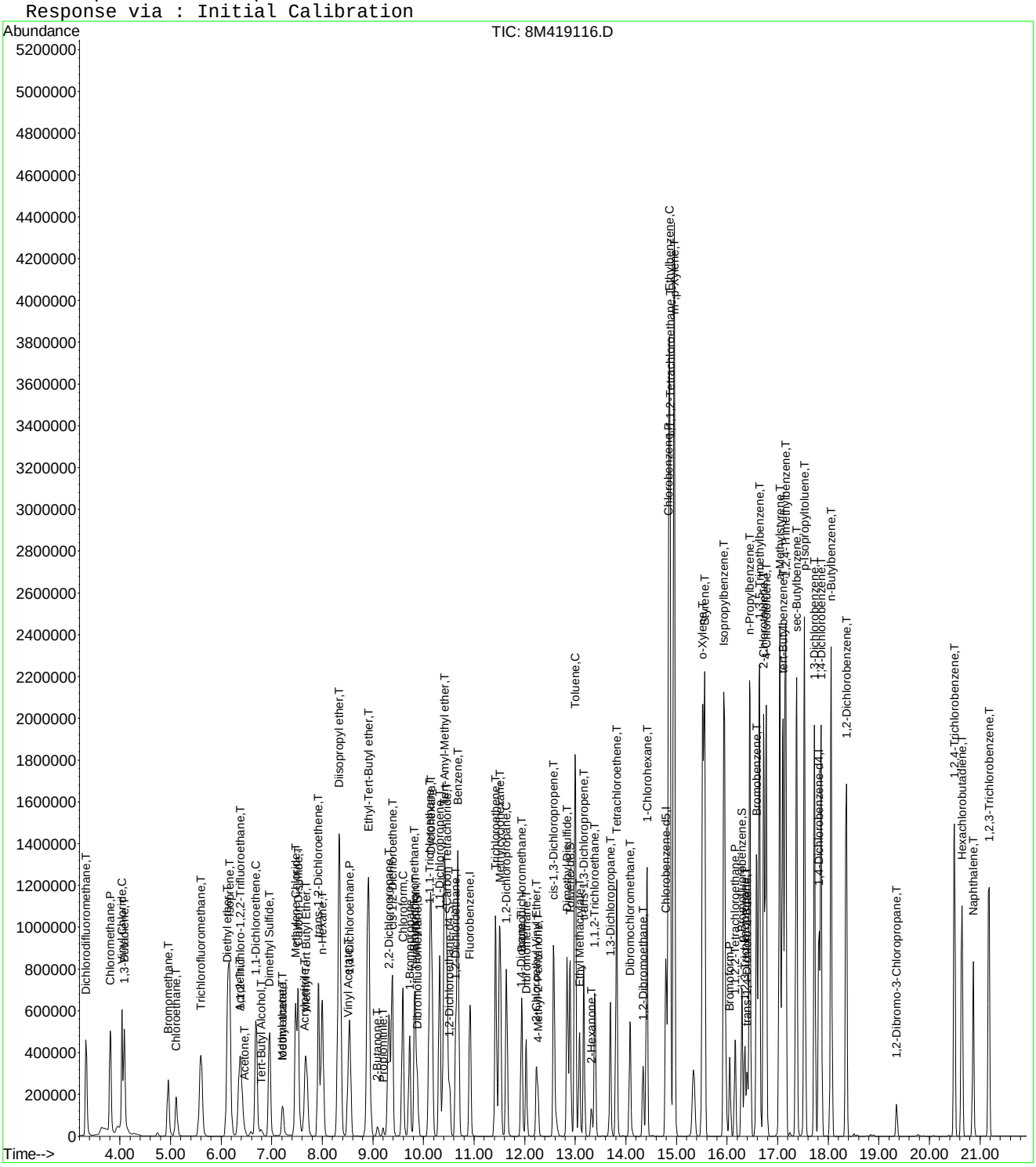
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	451352	50.1563	ug/L		96
46)	Benzene	10.68	78	1654210	50.5567	ug/L		95
47)	Trichloroethene	11.42	130	459014	49.9388	ug/L		98
48)	Methylcyclohexane	11.51	83	677126	55.2643	ug/L		94
49)	1,2-Dichloropropane	11.64	63	396770	49.6492	ug/L		95
50)	Bromodichloromethane	11.94	83	541115	51.7408	ug/L		98
51)	1,4-Dioxane	11.93	88	9546	209.5108	ug/L		84
52)	Dibromomethane	12.03	93	209560	50.9552	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	159865	46.2334	ug/L		97
54)	4-Methyl-2-Pentanone	12.26	58	71697	46.2913	ug/L		99
55)	cis-1,3-Dichloropropene	12.57	75	630314	52.9218	ug/L		98
56)	Dimethyl Disulfide	12.84	79	333001	48.5536	ug/L		95
59)	Toluene	12.99	91	1825378	51.1840	ug/L		99
60)	Ethyl Methacrylate	13.09	69	360325	53.5536	ug/L		85
62)	trans-1,3-Dichloropropene	13.17	75	522638	50.5326	ug/L		99
63)	1,1,2-Trichloroethane	13.38	97	280107	47.7395	ug/L		96
64)	2-Hexanone	13.32	58	65181	45.2665	ug/L		85
65)	1,3-Dichloropropane	13.70	76	476494	48.0390	ug/L		87
66)	Tetrachloroethene	13.82	164	387308	51.7022	ug/L		98
67)	Dibromochloromethane	14.08	129	392314	52.0328	ug/L		100
68)	1,2-Dibromoethane	14.34	107	282655	49.3180	ug/L		100
69)	1-Chlorohexane	14.42	91	620543	54.9973	ug/L		94
70)	Chlorobenzene	14.84	112	1242154	48.9309	ug/L		97
71)	1,1,1,2-Tetrachloroethane	14.87	131	476267	52.8662	ug/L		99
72)	Ethylbenzene	14.86	106	712379	50.1039	ug/L		97
73)	m-,p-Xylene	14.96	106	1724014	104.7045	ug/L		99
74)	o-Xylene	15.51	106	823697	49.7581	ug/L		98
75)	Styrene	15.56	104	1396403	53.8054	ug/L		96
76)	Bromoform	16.05	173	238577	45.7599	ug/L		100
77)	Isopropylbenzene	15.94	105	2050964	51.7439	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.15	83	310957	47.4443	ug/L		97
81)	1,2,3-Trichloropropane	16.35	110	88513	47.1063	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.39	53	76883	48.3945	ug/L	#	22
83)	n-Propylbenzene	16.44	91	2457182	50.5417	ug/L		98
84)	Bromobenzene	16.59	156	555512	48.7667	ug/L		96
85)	1,3,5-Trimethylbenzene	16.64	105	1779503	50.5508	ug/L		97
86)	2-Chlorotoluene	16.72	91	1504359	45.3251	ug/L		82
87)	4-Chlorotoluene	16.77	91	1540974	51.5189	ug/L		93
88)	a-Methylstyrene	17.04	118	1036721	52.5306	ug/L		99
89)	tert-Butylbenzene	17.11	134	388907	48.7955	ug/L		94
90)	1,2,4-Trimethylbenzene	17.16	105	1857606	51.6891	ug/L		97
91)	sec-Butylbenzene	17.37	105	2219465	50.3386	ug/L		99
92)	p-Isopropyltoluene	17.53	119	1923959	51.8219	ug/L		100
93)	1,3-Dichlorobenzene	17.73	146	1077568	48.8038	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	1062274	47.3223	ug/L		98
95)	n-Butylbenzene	18.06	91	1753868	52.4425	ug/L		98
96)	1,2-Dichlorobenzene	18.36	146	940696	48.4984	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	48184	45.1718	ug/L		89
98)	1,2,4-Trichlorobenzene	20.50	180	634951	48.6225	ug/L		100
99)	Hexachlorobutadiene	20.64	225	302718	49.8160	ug/L		99
100)	Naphthalene	20.87	128	846129	45.3408	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	521230	48.0643	ug/L		100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 12:12 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	95	-0.02
2	T	Dichlorodifluoromethane	0.3383	0.3746	-10.7	96	-0.02
3	P	Chloromethane	0.4230	0.4328	-2.3	102	-0.01
4	C	Vinyl Chloride	0.3994	0.4075	-2.0	100	-0.01
5	T	1,3-Butadiene	0.1737	0.2022	-16.4	118	0.00
6	T	Bromomethane	0.1100	0.1842	-67.4#	118	-0.01
7	T	Chloroethane	0.1745	0.1792	-2.7	96	-0.02
8	T	Trichlorofluoromethane	0.4339	0.4456	-2.7	97	0.00
9	T	Diethyl ether	0.1634	0.1557	4.7	93	-0.02
10	T	Isoprene	0.3430	0.3875	-13.0	107	-0.02
11	T	Acrolein	0.0226	0.0189	16.3	81	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2587	-4.6	99	-0.02
13	T	Acetone	0.0352	0.0343	2.6	91	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3731	-3.1	96	-0.01
15	T	Tert-Butyl Alcohol	0.0114	0.0106	6.8	89	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2546	-5.6	101	-0.02
17	T	Iodomethane	0.1082	0.0871	19.5	69	-0.01
18	T	Methyl acetate	0.0963	0.1061	-10.2	104	-0.02
19	T	Methylene Chloride	0.2602	0.2535	2.6	94	-0.02
20	T	Carbon Disulfide	0.7528	0.8771	-16.5	110	-0.02
21	T	Acrylonitrile	0.0488	0.0507	-4.0	91	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.5045	1.6	91	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3546	-0.7	96	-0.02
24	T	n-Hexane	0.2940	0.3494	-18.8	115	-0.01
25	T	Diisopropyl ether	0.7885	0.7889	-0.0	96	-0.02
26	T	Vinyl Acetate	0.3536	0.3240	8.4	86	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4617	-1.8	95	-0.02
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6592	1.7	94	-0.02
29	T	2-Butanone	0.0551	0.0511	7.3	86	-0.02
30	T	Propionitrile	0.0171	0.0167	2.2	93	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4144	-8.3	102	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.2973	-2.1	96	-0.02
33	C	Chloroform	0.5023	0.4665	7.1	95	-0.01
34		1-Bromopropane	0.0574	0.0580	-0.9	97	-0.02
35	T	Bromochloromethane	0.1571	0.1620	-3.1	92	-0.03
36	T	Tetrahydrofuran	0.0380	0.0720	-89.6#	181#	-0.02
37	S	Dibromofluoromethane	0.2622	0.2700	-3.0	95	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4247	-4.8	96	-0.02
39	T	Cyclohexane	0.3774	0.4182	-10.8	105	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3587	-1.3	97	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5887	2.0	93	-0.02
42	T	Carbon Tetrachloride	0.3759	0.3997	-6.3	97	-0.01
43	S	1,2-Dichloroethane-d4	0.2267	0.2266	0.1	91	-0.02
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2849	-0.3	93	-0.02
46	T	Benzene	1.0328	1.0443	-1.1	95	-0.02
47	T	Trichloroethene	0.2901	0.2898	0.1	95	-0.02
48	T	Methylcyclohexane	0.3867	0.4275	-10.5	106	-0.01
49	C	1,2-Dichloropropane	0.2522	0.2505	0.7	93	-0.01
50	T	Bromodichloromethane	0.3301	0.3416	-3.5	94	-0.02
51	T	1,4-Dioxane	0.0014	0.0015	-4.9	94	-0.02
52	T	Dibromomethane	0.1298	0.1323	-1.9	92	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.1009	7.5	85	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0453	7.4	86	-0.02

(#) = Out of Range
8M419116.D 8260WT.M Mon Apr 24 12:51:20 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.3979	-5.8	94	-0.02
56	T	Dimethyl Disulfide	0.1968	0.2102	-6.8	100	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	96	-0.01
58	S	Toluene-d8	1.1423	1.2026	-5.3	97	-0.01
59	C	Toluene	1.3916	1.4245	-2.4	96	-0.02
60	T	Ethyl Methacrylate	0.2625	0.2812	-7.1	94	-0.01
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4079	-1.1	93	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2186	4.5	92	-0.02
64	T	2-Hexanone	0.0562	0.0509	9.5	84	-0.01
65	T	1,3-Dichloropropane	0.3870	0.3719	3.9	90	-0.01
66	T	Tetrachloroethene	0.2923	0.3023	-3.4	98	-0.01
67	T	Dibromochloromethane	0.2942	0.3062	-4.1	92	-0.02
68	T	1,2-Dibromoethane	0.2236	0.2206	1.4	90	-0.02
69	T	1-Chlorohexane	0.4403	0.4843	-10.0	103	-0.01
70	P	Chlorobenzene	0.9906	0.9694	2.1	94	-0.01
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3717	-5.7	93	0.00
72	C	Ethylbenzene	0.5548	0.5560	-0.2	94	-0.02
73	T	m-,p-Xylene	0.6425	0.6727	-4.7	95	-0.01
74	T	o-Xylene	0.6460	0.6428	0.5	95	-0.01
75	T	Styrene	1.0127	1.0898	-7.6	94	-0.01
76	P	Bromoform	0.1760	0.1862	-5.8	91	0.00
77	T	Isopropylbenzene	1.5466	1.6006	-3.5	95	-0.02
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4476	5.1	89	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.8724	1.1	96	-0.01
81	T	1,2,3-Trichloropropane	0.1352	0.1274	5.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1107	-13.2	89	-0.01
83	T	n-Propylbenzene	3.4991	3.5370	-1.1	97	-0.01
84	T	Bromobenzene	0.8199	0.7996	2.5	92	-0.01
85	T	1,3,5-Trimethylbenzene	2.5336	2.5615	-1.1	95	0.00
86	T	2-Chlorotoluene	2.3888	2.1655	9.3	96	-0.01
87	T	4-Chlorotoluene	2.1528	2.2182	-3.0	93	-0.01
88	T	a-Methylstyrene	1.4204	1.4923	-5.1	100	-0.01
89	T	tert-Butylbenzene	0.5736	0.5598	2.4	96	-0.01
90	T	1,2,4-Trimethylbenzene	2.5866	2.6739	-3.4	95	-0.01
91	T	sec-Butylbenzene	3.1733	3.1948	-0.7	96	-0.01
92	T	p-Isopropyltoluene	2.6721	2.7695	-3.6	97	-0.01
93	T	1,3-Dichlorobenzene	1.5891	1.5511	2.4	93	-0.01
94	T	1,4-Dichlorobenzene	1.6156	1.5291	5.4	94	-0.01
95	T	n-Butylbenzene	2.4070	2.5246	-4.9	97	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.3541	3.0	92	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0694	9.7	85	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.9140	2.8	91	0.00
99	T	Hexachlorobutadiene	0.4374	0.4358	0.4	97	-0.01
100	T	Naphthalene	1.3431	1.2180	9.3	83	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7503	3.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419116.D 8260WT.M Mon Apr 24 12:51:20 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	95	-0.02
2	T	Dichlorodifluoromethane	50.0000	55.3616	-10.7	96	-0.02
3	P	Chloromethane	50.0000	51.1583	-2.3	102	-0.01
4	C	Vinyl Chloride	50.0000	51.0132	-2.0	100	-0.01
5	T	1,3-Butadiene	50.0000	67.2848	-34.6#	118	0.00
6	T	Bromomethane	50.0000	60.1953	-20.4	118	-0.01
7	T	Chloroethane	50.0000	51.3627	-2.7	96	-0.02
8	T	Trichlorofluoromethane	50.0000	51.3581	-2.7	97	0.00
9	T	Diethyl ether	100.0000	95.2937	4.7	93	-0.02
10	T	Isoprene	50.0000	56.4753	-13.0	107	-0.02
11	T	Acrolein	50.0000	41.8253	16.3	81	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.2826	-4.6	99	-0.02
13	T	Acetone	50.0000	48.7103	2.6	91	-0.02
14	C	1,1-Dichloroethene	50.0000	51.5307	-3.1	96	-0.01
15	T	Tert-Butyl Alcohol	200.0000	186.3044	6.8	89	-0.04
16	T	Dimethyl Sulfide	50.0000	52.7891	-5.6	101	-0.02
17	T	Iodomethane	50.0000	40.2580	19.5	69	-0.01
18	T	Methyl acetate	50.0000	55.1204	-10.2	104	-0.02
19	T	Methylene Chloride	50.0000	48.7201	2.6	94	-0.02
20	T	Carbon Disulfide	50.0000	58.2513	-16.5	110	-0.02
21	T	Acrylonitrile	50.0000	51.9985	-4.0	91	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	49.2064	1.6	91	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	50.3321	-0.7	96	-0.02
24	T	n-Hexane	50.0000	59.4164	-18.8	115	-0.01
25	T	Diisopropyl ether	100.0000	100.0492	-0.0	96	-0.02
26	T	Vinyl Acetate	50.0000	45.8133	8.4	86	-0.02
27	P	1,1-Dichloroethane	50.0000	50.9234	-1.8	95	-0.02
28	T	Ethyl-Tert-Butyl ether	100.0000	98.3070	1.7	94	-0.02
29	T	2-Butanone	50.0000	46.3611	7.3	86	-0.02
30	T	Propionitrile	100.0000	97.8568	2.1	93	-0.02
31	T	2,2-Dichloropropane	50.0000	54.1421	-8.3	102	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	51.0581	-2.1	96	-0.02
33	C	Chloroform	50.0000	46.4345	7.1	95	-0.01
34		1-Bromopropane	50.0000	50.4565	-0.9	97	-0.02
35	T	Bromochloromethane	50.0000	51.5687	-3.1	92	-0.03
36	T	Tetrahydrofuran	100.0000	189.5807	-89.6#	181	-0.02
37	S	Dibromofluoromethane	25.0000	25.7455	-3.0	95	-0.02
38	T	1,1,1-Trichloroethane	50.0000	52.3766	-4.8	96	-0.02
39	T	Cyclohexane	50.0000	55.4035	-10.8	105	-0.02
40	T	1,1-Dichloropropene	50.0000	50.6677	-1.3	97	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	98.0499	2.0	93	-0.02
42	T	Carbon Tetrachloride	50.0000	53.1629	-6.3	97	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.9870	0.1	91	-0.02
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	50.1563	-0.3	93	-0.02
46	T	Benzene	50.0000	50.5567	-1.1	95	-0.02
47	T	Trichloroethene	50.0000	49.9388	0.1	95	-0.02
48	T	Methylcyclohexane	50.0000	55.2643	-10.5	106	-0.01
49	C	1,2-Dichloropropane	50.0000	49.6491	0.7	93	-0.01
50	T	Bromodichloromethane	50.0000	51.7408	-3.5	94	-0.02
51	T	1,4-Dioxane	200.0000	209.5108	-4.8	94	-0.02
52	T	Dibromomethane	50.0000	50.9552	-1.9	92	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	46.2334	7.5	85	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	46.2913	7.4	86	-0.02

(#) = Out of Range
8M419116.D 8260WT.M Mon Apr 24 12:51:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419116.D Vial: 2
Acq On : 24 Apr 2017 11:42 Operator: TMB
Sample : WG611300-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	52.9218	-5.8	94	-0.02
56	T	Dimethyl Disulfide	50.0000	48.5536	2.9	100	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	96	-0.01
58	S	Toluene-d8	25.0000	26.3198	-5.3	97	-0.01
59	C	Toluene	50.0000	51.1840	-2.4	96	-0.02
60	T	Ethyl Methacrylate	50.0000	53.5536	-7.1	94	-0.01
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	50.5326	-1.1	93	-0.02
63	T	1,1,2-Trichloroethane	50.0000	47.7395	4.5	92	-0.02
64	T	2-Hexanone	50.0000	45.2664	9.5	84	-0.01
65	T	1,3-Dichloropropane	50.0000	48.0390	3.9	90	-0.01
66	T	Tetrachloroethene	50.0000	51.7022	-3.4	98	-0.01
67	T	Dibromochloromethane	50.0000	52.0328	-4.1	92	-0.02
68	T	1,2-Dibromoethane	50.0000	49.3180	1.4	90	-0.02
69	T	1-Chlorohexane	50.0000	54.9973	-10.0	103	-0.01
70	P	Chlorobenzene	50.0000	48.9309	2.1	94	-0.01
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.8662	-5.7	93	0.00
72	C	Ethylbenzene	50.0000	50.1039	-0.2	94	-0.02
73	T	m-,p-Xylene	100.0000	104.7045	-4.7	95	-0.01
74	T	o-Xylene	50.0000	49.7581	0.5	95	-0.01
75	T	Styrene	50.0000	53.8054	-7.6	94	-0.01
76	P	Bromoform	50.0000	45.7599	8.5	91	0.00
77	T	Isopropylbenzene	50.0000	51.7439	-3.5	95	-0.02
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	47.4443	5.1	89	-0.02
80	S	p-Bromofluorobenzene	25.0000	24.7178	1.1	96	-0.01
81	T	1,2,3-Trichloropropane	50.0000	47.1063	5.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	48.3945	3.2	89	-0.01
83	T	n-Propylbenzene	50.0000	50.5418	-1.1	97	-0.01
84	T	Bromobenzene	50.0000	48.7667	2.5	92	-0.01
85	T	1,3,5-Trimethylbenzene	50.0000	50.5508	-1.1	95	0.00
86	T	2-Chlorotoluene	50.0000	45.3251	9.3	96	-0.01
87	T	4-Chlorotoluene	50.0000	51.5189	-3.0	93	-0.01
88	T	a-Methylstyrene	50.0000	52.5306	-5.1	100	-0.01
89	T	tert-Butylbenzene	50.0000	48.7955	2.4	96	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	51.6891	-3.4	95	-0.01
91	T	sec-Butylbenzene	50.0000	50.3386	-0.7	96	-0.01
92	T	p-Isopropyltoluene	50.0000	51.8219	-3.6	97	-0.01
93	T	1,3-Dichlorobenzene	50.0000	48.8038	2.4	93	-0.01
94	T	1,4-Dichlorobenzene	50.0000	47.3223	5.4	94	-0.01
95	T	n-Butylbenzene	50.0000	52.4425	-4.9	97	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.4984	3.0	92	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	45.1718	9.7	85	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	48.6225	2.8	91	0.00
99	T	Hexachlorobutadiene	50.0000	49.8160	0.4	97	-0.01
100	T	Naphthalene	50.0000	45.3408	9.3	83	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	48.0643	3.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419116.D 8260WT.M Mon Apr 24 12:51:23 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 13:06:28 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	838481	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	685089	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	371982	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	226378	25.7404 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.96%		
43) 1,2-Dichloroethane-d4	10.52	65	195327	25.6906 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.76%		
58) Toluene-d8	12.90	98	821310	26.2375 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.96%		
80) p-Bromofluorobenzene	16.29	95	329283	25.0818 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	626845	55.2423 ug/L	100
3) Chloromethane	3.81	50	748678	52.7758 ug/L	98
4) Vinyl Chloride	4.04	62	688306	51.3775 ug/L	98
5) 1,3-Butadiene	4.08	54	358863	71.9363 ug/L	91
6) Bromomethane	4.95	94	289887	57.2779 ug/L	100
7) Chloroethane	5.12	64	302461	51.6863 ug/L	98
8) Trichlorofluoromethane	5.60	101	754873	51.8782 ug/L	100
9) Diethyl ether	6.13	59	547015	99.8166 ug/L	92
10) Isoprene	6.16	67	642880	55.8796 ug/L	90
11) Acrolein	6.37	56	33002	43.4832 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	437328	52.7066 ug/L	98
13) Acetone	6.46	43	61227	51.9195 ug/L	93
14) 1,1-Dichloroethene	6.69	61	631236	51.9821 ug/L	97
15) Tert-Butyl Alcohol	6.79	59	75973	198.7441 ug/L	98
16) Dimethyl Sulfide	6.96	62	435177	53.8027 ug/L	88
17) Iodomethane	7.22	142	226574	62.4555 ug/L	86
18) Methyl acetate	7.22	43	187746	58.1392 ug/L	91
19) Methylene Chloride	7.47	84	438544	50.2534 ug/L	84
20) Carbon Disulfide	7.53	76	1435777	56.8650 ug/L	100
21) Acrylonitrile	7.65	53	89208	54.5345 ug/L	99
22) Methyl Tert Butyl Ether	7.68	73	895504	52.0812 ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	603393	51.0730 ug/L	95
24) n-Hexane	8.00	57	579471	58.7601 ug/L	92
25) Diisopropyl ether	8.33	45	2696196	101.9575 ug/L	96
26) Vinyl Acetate	8.51	43	575084	48.4878 ug/L	95
27) 1,1-Dichloroethane	8.55	63	779558	51.2693 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2312241	102.8152 ug/L	97
29) 2-Butanone	9.10	43	96840	52.3648 ug/L	90
30) Propionitrile	9.20	54	59291	103.4421 ug/L	98
31) 2,2-Dichloropropane	9.31	77	705551	54.9673 ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	497424	50.9389 ug/L	93
33) Chloroform	9.59	83	787303	46.7310 ug/L	98
34) 1-Bromopropane	9.73	122	96393	50.0386 ug/L	99
35) Bromochloromethane	9.83	130	277718	52.7043 ug/L	93
36) Tetrahydrofuran	9.85	42	132807	104.3234 ug/L	87
38) 1,1,1-Trichloroethane	10.12	97	721811	53.0889 ug/L	99
39) Cyclohexane	10.15	56	712092	56.2536 ug/L	90
40) 1,1-Dichloropropene	10.32	75	620728	52.2883 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	2101050	104.3325 ug/L	98
42) Carbon Tetrachloride	10.46	117	684197	54.2719 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419139.D 8260WT.M Tue Apr 25 15:59:26 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 13:06:28 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

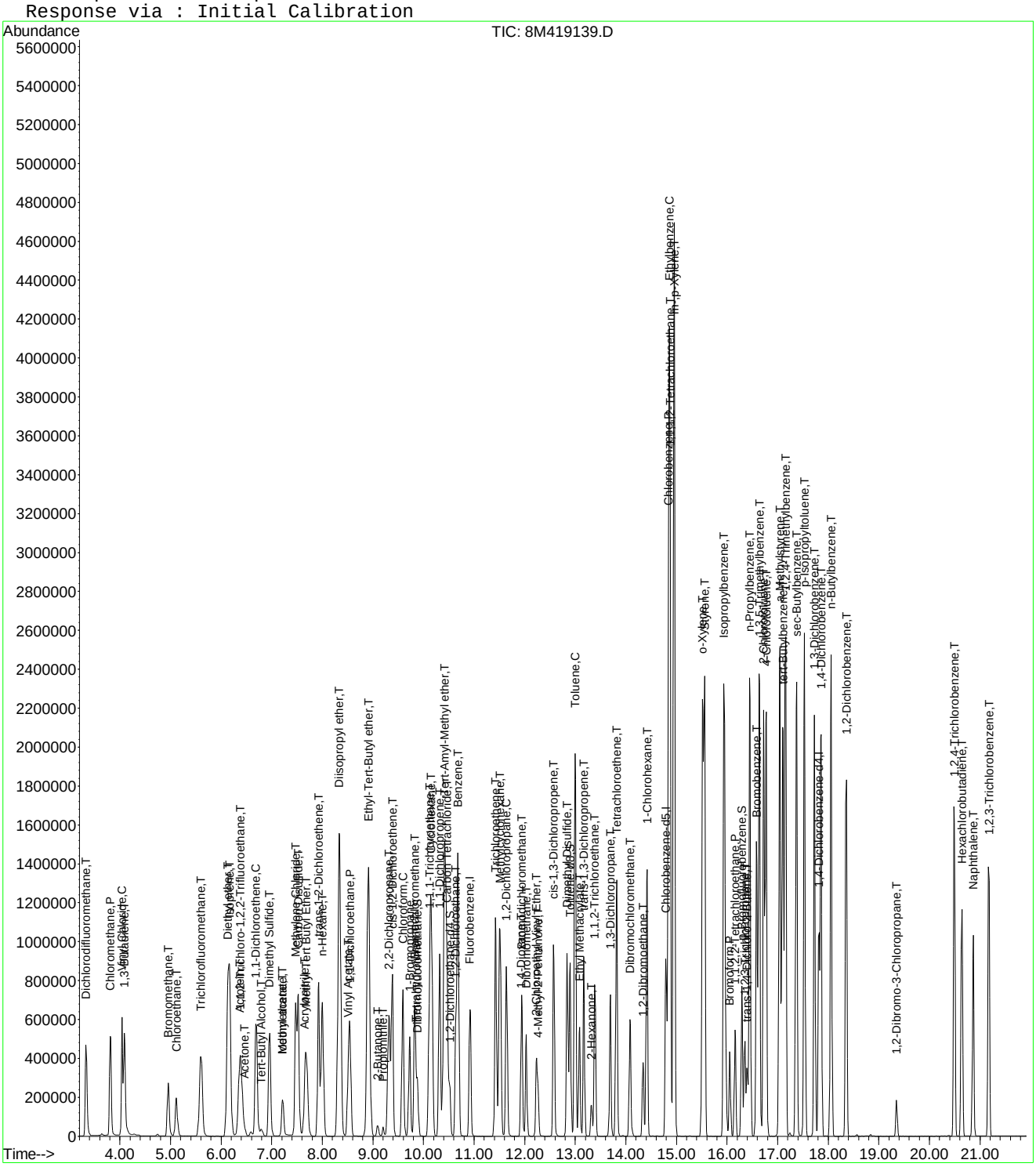
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	497938	52.2675	ug/L		96
46)	Benzene	10.68	78	1770731	51.1195	ug/L		95
47)	Trichloroethene	11.42	130	489366	50.2912	ug/L		98
48)	Methylcyclohexane	11.52	83	722079	55.6680	ug/L		95
49)	1,2-Dichloropropane	11.64	63	432905	51.1696	ug/L		96
50)	Bromodichloromethane	11.94	83	589609	53.2542	ug/L		98
51)	1,4-Dioxane	11.93	88	10014	207.6055	ug/L		89
52)	Dibromomethane	12.03	93	231975	53.2804	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	192486	52.5833	ug/L		98
54)	4-Methyl-2-Pentanone	12.26	58	86668	52.8571	ug/L		99
55)	cis-1,3-Dichloropropene	12.57	75	696942	55.2740	ug/L		98
56)	Dimethyl Disulfide	12.84	79	364168	50.0536	ug/L		96
59)	Toluene	12.99	91	1951553	51.1755	ug/L		99
60)	Ethyl Methacrylate	13.09	69	409212	56.8779	ug/L		84
62)	trans-1,3-Dichloropropene	13.17	75	588936	53.2525	ug/L		100
63)	1,1,2-Trichloroethane	13.39	97	317988	50.6834	ug/L		96
64)	2-Hexanone	13.32	58	80056	51.9936	ug/L		86
65)	1,3-Dichloropropane	13.70	76	538122	50.7362	ug/L		87
66)	Tetrachloroethene	13.82	164	414262	51.7164	ug/L		97
67)	Dibromochloromethane	14.08	129	431570	53.5298	ug/L		100
68)	1,2-Dibromoethane	14.34	107	319652	52.1588	ug/L		100
69)	1-Chlorohexane	14.42	91	665288	55.1417	ug/L		93
70)	Chlorobenzene	14.84	112	1341477	49.4188	ug/L		98
71)	1,1,1,2-Tetrachloroethane	14.87	131	518941	53.8700	ug/L		100
72)	Ethylbenzene	14.86	106	767485	50.4814	ug/L		97
73)	m-,p-Xylene	14.96	106	1859090	105.5908	ug/L		100
74)	o-Xylene	15.51	106	884813	49.9860	ug/L		98
75)	Styrene	15.56	104	1498533	53.9986	ug/L		96
76)	Bromoform	16.05	173	267145	47.8916	ug/L		100
77)	Isopropylbenzene	15.94	105	2214778	52.2556	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.16	83	363034	51.7228	ug/L		97
81)	1,2,3-Trichloropropane	16.35	110	102122	50.7506	ug/L	#	29
82)	trans-1,4-Dichloro-2-Buten	16.39	53	87632	51.4681	ug/L	#	25
83)	n-Propylbenzene	16.45	91	2645757	50.8175	ug/L		98
84)	Bromobenzene	16.59	156	603603	49.4802	ug/L		97
85)	1,3,5-Trimethylbenzene	16.64	105	1903633	50.4966	ug/L		97
86)	2-Chlorotoluene	16.72	91	1643645	46.2430	ug/L		92
87)	4-Chlorotoluene	16.78	91	1644234	51.3316	ug/L		98
88)	a-Methylstyrene	17.04	118	1090583	51.6012	ug/L		100
89)	tert-Butylbenzene	17.11	134	415573	48.6891	ug/L		94
90)	1,2,4-Trimethylbenzene	17.16	105	1990592	51.7223	ug/L		97
91)	sec-Butylbenzene	17.38	105	2380455	50.4154	ug/L		99
92)	p-Isopropyltoluene	17.53	119	2035049	51.1850	ug/L		100
93)	1,3-Dichlorobenzene	17.73	146	1168933	49.4366	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	1154771	48.0370	ug/L		99
95)	n-Butylbenzene	18.06	91	1871368	52.2512	ug/L		98
96)	1,2-Dichlorobenzene	18.36	146	1030537	49.6126	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	57087	49.9749	ug/L		87
98)	1,2,4-Trichlorobenzene	20.50	180	715442	51.1589	ug/L		99
99)	Hexachlorobutadiene	20.64	225	317407	48.7750	ug/L		99
100)	Naphthalene	20.87	128	1065125	53.2971	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	594591	51.1991	ug/L		100

(#) = qualifier out of range (m) = manual integration
8M419139.D 8260WT.M Tue Apr 25 15:59:26 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 13:06 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: HPMS8
Initial cal date: 17 Apr 2017 16:54
CCV date: 25 Apr 2017 12:44
CCV Filename: 8M419139.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	830845	10.93	667165	14.80	355416	17.83
CCV	838481	10.92	685089	14.79	371982	17.82

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	101	-0.02
2	T	Dichlorodifluoromethane	0.3383	0.3738	-10.5	102	-0.02
3	P	Chloromethane	0.4230	0.4465	-5.6	112	0.00
4	C	Vinyl Chloride	0.3994	0.4104	-2.8	107	0.00
5	T	1,3-Butadiene	0.1737	0.2140	-23.2	132	0.00
6	T	Bromomethane	0.1100	0.1729	-57.1#	117	0.00
7	T	Chloroethane	0.1745	0.1804	-3.4	103	0.00
8	T	Trichlorofluoromethane	0.4339	0.4501	-3.8	104	0.00
9	T	Diethyl ether	0.1634	0.1631	0.2	103	0.00
10	T	Isoprene	0.3430	0.3834	-11.8	112	-0.02
11	T	Acrolein	0.0226	0.0197	13.0	90	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2608	-5.4	105	-0.02
13	T	Acetone	0.0352	0.0365	-3.8	103	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3764	-4.0	102	0.00
15	T	Tert-Butyl Alcohol	0.0114	0.0113	0.6	100	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2595	-7.6	109	-0.02
17	T	Iodomethane	0.1082	0.1351	-24.9	113	0.00
18	T	Methyl acetate	0.0963	0.1120	-16.3	116	-0.02
19	T	Methylene Chloride	0.2602	0.2615	-0.5	102	-0.02
20	T	Carbon Disulfide	0.7528	0.8562	-13.7	113	-0.02
21	T	Acrylonitrile	0.0488	0.0532	-9.1	101	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.5340	-4.2	102	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3598	-2.1	103	0.00
24	T	n-Hexane	0.2940	0.3456	-17.5	120	0.00
25	T	Diisopropyl ether	0.7885	0.8039	-2.0	104	-0.02
26	T	Vinyl Acetate	0.3536	0.3429	3.0	96	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4649	-2.5	102	0.00
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6894	-2.8	104	-0.02
29	T	2-Butanone	0.0551	0.0578	-4.7	103	0.00
30	T	Propionitrile	0.0171	0.0177	-3.5	104	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4207	-9.9	110	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.2966	-1.9	101	-0.02
33	C	Chloroform	0.5023	0.4695	6.5	101	0.00
34		1-Bromopropane	0.0574	0.0575	-0.1	102	-0.02
35	T	Bromochloromethane	0.1571	0.1656	-5.4	100	-0.02
36	T	Tetrahydrofuran	0.0380	0.0396	-4.3	105	0.00
37	S	Dibromofluoromethane	0.2622	0.2700	-3.0	100	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4304	-6.2	104	-0.02
39	T	Cyclohexane	0.3774	0.4246	-12.5	113	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3701	-4.6	106	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.6264	-4.3	105	-0.02
42	T	Carbon Tetrachloride	0.3759	0.4080	-8.5	105	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2329	-2.8	99	0.00
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2969	-4.5	102	-0.02
46	T	Benzene	1.0328	1.0559	-2.2	102	-0.02
47	T	Trichloroethene	0.2901	0.2918	-0.6	101	-0.02
48	T	Methylcyclohexane	0.3867	0.4306	-11.3	113	0.00
49	C	1,2-Dichloropropane	0.2522	0.2581	-2.3	102	0.00
50	T	Bromodichloromethane	0.3301	0.3516	-6.5	102	-0.02
51	T	1,4-Dioxane	0.0014	0.0015	-3.5	99	-0.02
52	T	Dibromomethane	0.1298	0.1383	-6.6	102	0.00
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.1148	-5.2	102	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0517	-5.7	104	-0.02

(#) = Out of Range
8M419139.D 8260WT.M Tue Apr 25 15:59:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.4156	-10.5	104	-0.02
56	T	Dimethyl Disulfide	0.1968	0.2172	-10.4	109	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	103	0.00
58	S	Toluene-d8	1.1423	1.1988	-5.0	104	0.00
59	C	Toluene	1.3916	1.4243	-2.4	102	-0.02
60	T	Ethyl Methacrylate	0.2625	0.2987	-13.8	107	0.00
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4298	-6.5	104	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2321	-1.4	104	-0.02
64	T	2-Hexanone	0.0562	0.0584	-4.0	103	0.00
65	T	1,3-Dichloropropane	0.3870	0.3927	-1.5	102	0.00
66	T	Tetrachloroethene	0.2923	0.3023	-3.4	105	0.00
67	T	Dibromochloromethane	0.2942	0.3150	-7.1	102	-0.02
68	T	1,2-Dibromoethane	0.2236	0.2333	-4.3	102	-0.02
69	T	1-Chlorohexane	0.4403	0.4855	-10.3	111	0.00
70	P	Chlorobenzene	0.9906	0.9790	1.2	102	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3787	-7.7	101	0.00
72	C	Ethylbenzene	0.5548	0.5601	-1.0	101	-0.02
73	T	m-,p-Xylene	0.6425	0.6784	-5.6	103	0.00
74	T	o-Xylene	0.6460	0.6458	0.0	102	0.00
75	T	Styrene	1.0127	1.0937	-8.0	101	0.00
76	P	Bromoform	0.1760	0.1950	-10.8	102	0.00
77	T	Isopropylbenzene	1.5466	1.6164	-4.5	103	-0.02
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	105	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4880	-3.4	103	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.8852	-0.3	104	0.00
81	T	1,2,3-Trichloropropane	0.1352	0.1373	-1.5	100	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1178	-20.5	101	0.00
83	T	n-Propylbenzene	3.4991	3.5563	-1.6	104	0.00
84	T	Bromobenzene	0.8199	0.8113	1.0	100	0.00
85	T	1,3,5-Trimethylbenzene	2.5336	2.5588	-1.0	102	0.00
86	T	2-Chlorotoluene	2.3888	2.2093	7.5	105	0.00
87	T	4-Chlorotoluene	2.1528	2.2101	-2.7	99	0.00
88	T	a-Methylstyrene	1.4204	1.4659	-3.2	105	0.00
89	T	tert-Butylbenzene	0.5736	0.5586	2.6	102	0.00
90	T	1,2,4-Trimethylbenzene	2.5866	2.6757	-3.4	102	0.00
91	T	sec-Butylbenzene	3.1733	3.1997	-0.8	103	0.00
92	T	p-Isopropyltoluene	2.6721	2.7354	-2.4	102	0.00
93	T	1,3-Dichlorobenzene	1.5891	1.5712	1.1	101	0.00
94	T	1,4-Dichlorobenzene	1.6156	1.5522	3.9	102	0.00
95	T	n-Butylbenzene	2.4070	2.5154	-4.5	104	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.3852	0.8	101	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0767	0.1	101	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.9617	-2.3	102	0.00
99	T	Hexachlorobutadiene	0.4374	0.4266	2.5	101	0.00
100	T	Naphthalene	1.3431	1.4317	-6.6	104	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7992	-2.4	102	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419139.D 8260WT.M Tue Apr 25 15:59:58 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	101	-0.02
2	T	Dichlorodifluoromethane	50.0000	55.2423	-10.5	102	-0.02
3	P	Chloromethane	50.0000	52.7758	-5.6	112	0.00
4	C	Vinyl Chloride	50.0000	51.3775	-2.8	107	0.00
5	T	1,3-Butadiene	50.0000	71.9363	-43.9#	132	0.00
6	T	Bromomethane	50.0000	57.2779	-14.6	117	0.00
7	T	Chloroethane	50.0000	51.6863	-3.4	103	0.00
8	T	Trichlorofluoromethane	50.0000	51.8783	-3.8	104	0.00
9	T	Diethyl ether	100.0000	99.8166	0.2	103	0.00
10	T	Isoprene	50.0000	55.8796	-11.8	112	-0.02
11	T	Acrolein	50.0000	43.4832	13.0	90	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.7067	-5.4	105	-0.02
13	T	Acetone	50.0000	51.9195	-3.8	103	-0.02
14	C	1,1-Dichloroethene	50.0000	51.9821	-4.0	102	0.00
15	T	Tert-Butyl Alcohol	200.0000	198.7441	0.6	100	-0.04
16	T	Dimethyl Sulfide	50.0000	53.8027	-7.6	109	-0.02
17	T	Iodomethane	50.0000	62.4555	-24.9	113	0.00
18	T	Methyl acetate	50.0000	58.1392	-16.3	116	-0.02
19	T	Methylene Chloride	50.0000	50.2534	-0.5	102	-0.02
20	T	Carbon Disulfide	50.0000	56.8650	-13.7	113	-0.02
21	T	Acrylonitrile	50.0000	54.5345	-9.1	101	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	52.0812	-4.2	102	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	51.0730	-2.1	103	0.00
24	T	n-Hexane	50.0000	58.7601	-17.5	120	0.00
25	T	Diisopropyl ether	100.0000	101.9575	-2.0	104	-0.02
26	T	Vinyl Acetate	50.0000	48.4878	3.0	96	-0.02
27	P	1,1-Dichloroethane	50.0000	51.2693	-2.5	102	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	102.8152	-2.8	104	-0.02
29	T	2-Butanone	50.0000	52.3648	-4.7	103	0.00
30	T	Propionitrile	100.0000	103.4421	-3.4	104	-0.02
31	T	2,2-Dichloropropane	50.0000	54.9673	-9.9	110	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	50.9389	-1.9	101	-0.02
33	C	Chloroform	50.0000	46.7310	6.5	101	0.00
34		1-Bromopropane	50.0000	50.0386	-0.1	102	-0.02
35	T	Bromochloromethane	50.0000	52.7043	-5.4	100	-0.02
36	T	Tetrahydrofuran	100.0000	104.3234	-4.3	105	0.00
37	S	Dibromofluoromethane	25.0000	25.7404	-3.0	100	-0.02
38	T	1,1,1-Trichloroethane	50.0000	53.0889	-6.2	104	-0.02
39	T	Cyclohexane	50.0000	56.2536	-12.5	113	-0.02
40	T	1,1-Dichloropropene	50.0000	52.2883	-4.6	106	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	104.3325	-4.3	105	-0.02
42	T	Carbon Tetrachloride	50.0000	54.2719	-8.5	105	0.00
43	S	1,2-Dichloroethane-d4	25.0000	25.6906	-2.8	99	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	52.2675	-4.5	102	-0.02
46	T	Benzene	50.0000	51.1195	-2.2	102	-0.02
47	T	Trichloroethene	50.0000	50.2912	-0.6	101	-0.02
48	T	Methylcyclohexane	50.0000	55.6680	-11.3	113	0.00
49	C	1,2-Dichloropropane	50.0000	51.1696	-2.3	102	0.00
50	T	Bromodichloromethane	50.0000	53.2542	-6.5	102	-0.02
51	T	1,4-Dioxane	200.0000	207.6055	-3.8	99	-0.02
52	T	Dibromomethane	50.0000	53.2805	-6.6	102	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	52.5833	-5.2	102	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	52.8571	-5.7	104	-0.02

(#) = Out of Range
8M419139.D 8260WT.M Tue Apr 25 16:00:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419139.D Vial: 4
Acq On : 25 Apr 2017 12:44 Operator: TMB
Sample : WG611407-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	55.2740	-10.5	104	-0.02
56	T	Dimethyl Disulfide	50.0000	50.0536	-0.1	109	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	103	0.00
58	S	Toluene-d8	25.0000	26.2375	-4.9	104	0.00
59	C	Toluene	50.0000	51.1756	-2.4	102	-0.02
60	T	Ethyl Methacrylate	50.0000	56.8779	-13.8	107	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	53.2525	-6.5	104	-0.02
63	T	1,1,2-Trichloroethane	50.0000	50.6834	-1.4	104	-0.02
64	T	2-Hexanone	50.0000	51.9936	-4.0	103	0.00
65	T	1,3-Dichloropropane	50.0000	50.7362	-1.5	102	0.00
66	T	Tetrachloroethene	50.0000	51.7164	-3.4	105	0.00
67	T	Dibromochloromethane	50.0000	53.5298	-7.1	102	-0.02
68	T	1,2-Dibromoethane	50.0000	52.1588	-4.3	102	-0.02
69	T	1-Chlorohexane	50.0000	55.1417	-10.3	111	0.00
70	P	Chlorobenzene	50.0000	49.4188	1.2	102	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	53.8700	-7.7	101	0.00
72	C	Ethylbenzene	50.0000	50.4814	-1.0	101	-0.02
73	T	m-,p-Xylene	100.0000	105.5908	-5.6	103	0.00
74	T	o-Xylene	50.0000	49.9860	0.0	102	0.00
75	T	Styrene	50.0000	53.9986	-8.0	101	0.00
76	P	Bromoform	50.0000	47.8916	4.2	102	0.00
77	T	Isopropylbenzene	50.0000	52.2556	-4.5	103	-0.02
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	105	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	51.7228	-3.4	103	-0.02
80	S	p-Bromofluorobenzene	25.0000	25.0818	-0.3	104	0.00
81	T	1,2,3-Trichloropropane	50.0000	50.7506	-1.5	100	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	51.4681	-2.9	101	0.00
83	T	n-Propylbenzene	50.0000	50.8175	-1.6	104	0.00
84	T	Bromobenzene	50.0000	49.4802	1.0	100	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	50.4966	-1.0	102	0.00
86	T	2-Chlorotoluene	50.0000	46.2430	7.5	105	0.00
87	T	4-Chlorotoluene	50.0000	51.3316	-2.7	99	0.00
88	T	a-Methylstyrene	50.0000	51.6012	-3.2	105	0.00
89	T	tert-Butylbenzene	50.0000	48.6891	2.6	102	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	51.7223	-3.4	102	0.00
91	T	sec-Butylbenzene	50.0000	50.4153	-0.8	103	0.00
92	T	p-Isopropyltoluene	50.0000	51.1850	-2.4	102	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.4366	1.1	101	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.0370	3.9	102	0.00
95	T	n-Butylbenzene	50.0000	52.2512	-4.5	104	0.00
96	T	1,2-Dichlorobenzene	50.0000	49.6126	0.8	101	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	49.9749	0.1	101	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	51.1589	-2.3	102	0.00
99	T	Hexachlorobutadiene	50.0000	48.7750	2.5	101	0.00
100	T	Naphthalene	50.0000	53.2971	-6.6	104	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	51.1991	-2.4	102	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419139.D 8260WT.M Tue Apr 25 16:00:01 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 08:44:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	771505	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	622116	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	332171	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	205222	25.3606 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.44%		
43) 1,2-Dichloroethane-d4	10.52	65	173046	24.7359 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.96%		
58) Toluene-d8	12.90	98	759461	26.7175 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.88%		
80) p-Bromofluorobenzene	16.29	95	296395	25.2825 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.12%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	582124	55.7547 ug/L	99
3) Chloromethane	3.81	50	674566	51.6796 ug/L	98
4) Vinyl Chloride	4.04	62	675115	54.7676 ug/L	98
5) 1,3-Butadiene	4.08	54	394330	88.6470 ug/L	90
6) Bromomethane	4.95	94	202799	46.0490 ug/L	99
7) Chloroethane	5.12	64	286367	53.1843 ug/L	97
8) Trichlorofluoromethane	5.60	101	698657	52.1831 ug/L	100
9) Diethyl ether	6.13	59	443425	87.9383 ug/L	90
10) Isoprene	6.17	67	605067	57.1586 ug/L	89
11) Acrolein	6.37	56	25382	36.3464 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	408923	53.5617 ug/L	98
13) Acetone	6.46	43	48320	44.5316 ug/L	94
14) 1,1-Dichloroethene	6.69	61	593238	53.0940 ug/L	96
15) Tert-Butyl Alcohol	6.79	59	57232	162.7153 ug/L	100
16) Dimethyl Sulfide	6.96	62	398066	53.4870 ug/L	89
17) Iodomethane	7.21	142	264751	79.3146 ug/L	96
18) Methyl acetate	7.21	43	156025	52.5106 ug/L	90
19) Methylene Chloride	7.47	84	400328	49.8566 ug/L	82
20) Carbon Disulfide	7.52	76	1354036	58.2831 ug/L	100
21) Acrylonitrile	7.65	53	70436	46.7969 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	740976	46.8352 ug/L	95
23) trans-1,2-Dichloroethene	7.93	61	561857	51.6858 ug/L	95
24) n-Hexane	8.00	57	542766	59.8161 ug/L	92
25) Diisopropyl ether	8.34	45	2329140	95.7234 ug/L	95
26) Vinyl Acetate	8.51	43	459681	42.1223 ug/L	95
27) 1,1-Dichloroethane	8.55	63	734814	52.5219 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1888999	91.2873 ug/L	97
29) 2-Butanone	9.09	43	77085	45.3011 ug/L	89
30) Propionitrile	9.20	54	45658	86.5725 ug/L	98
31) 2,2-Dichloropropane	9.32	77	654492	55.4159 ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	468130	52.1007 ug/L	94
33) Chloroform	9.59	83	734581	47.3868 ug/L	98
34) 1-Bromopropane	9.72	122	90244	50.9134 ug/L	98
35) Bromochloromethane	9.83	130	244804	50.4911 ug/L	92
36) Tetrahydrofuran	9.85	42	102343	87.3722 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	667500	53.3563 ug/L	99
39) Cyclohexane	10.16	56	669818	57.5077 ug/L	91
40) 1,1-Dichloropropene	10.31	75	573309	52.4864 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1679121	90.6191 ug/L	97
42) Carbon Tetrachloride	10.47	117	632314	54.5106 ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419165.D 8260WT.M Wed Apr 26 09:35:19 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 08:44:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

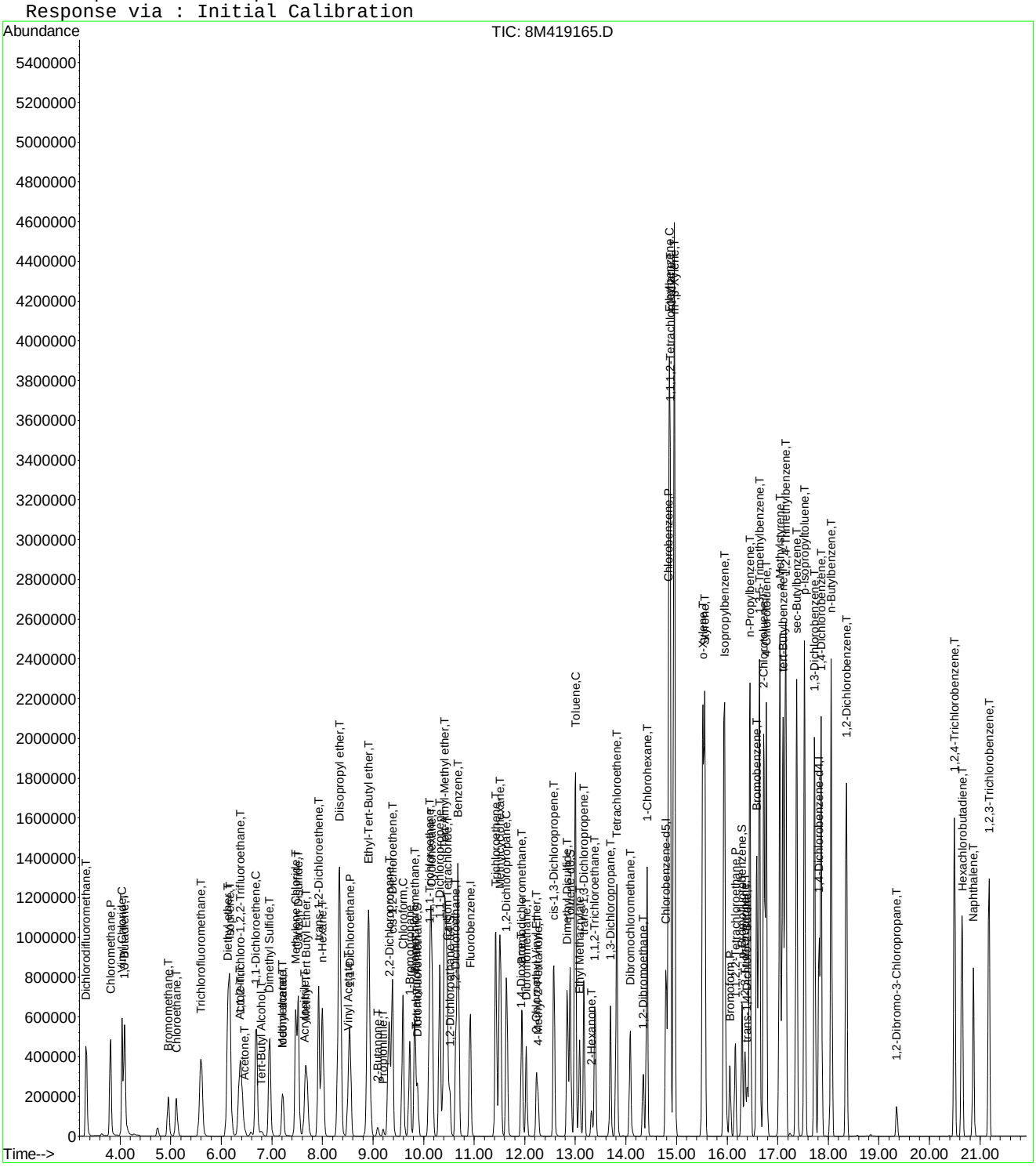
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.63	62	438299	50.0013	ug/L	95
46)	Benzene	10.68	78	1658775	52.0446	ug/L	95
47)	Trichloroethene	11.43	130	455965	50.9265	ug/L	99
48)	Methylcyclohexane	11.51	83	674958	56.5526	ug/L	95
49)	1,2-Dichloropropane	11.64	63	398857	51.2379	ug/L	95
50)	Bromodichloromethane	11.94	83	536680	52.6817	ug/L	99
51)	1,4-Dioxane	11.93	88	8180	184.3058	ug/L	90
52)	Dibromomethane	12.03	93	201137	50.2080	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	153016	45.4297	ug/L	96
54)	4-Methyl-2-Pentanone	12.26	58	66397	44.0096	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	619284	53.3787	ug/L	99
56)	Dimethyl Disulfide	12.84	79	291273	43.9160	ug/L	96
59)	Toluene	13.00	91	1841423	53.1755	ug/L	99
60)	Ethyl Methacrylate	13.08	69	340968	52.1896	ug/L	85
62)	trans-1,3-Dichloropropene	13.17	75	506016	50.3862	ug/L	100
63)	1,1,2-Trichloroethane	13.38	97	274120	48.1140	ug/L	97
64)	2-Hexanone	13.32	58	61883	44.2592	ug/L	87
65)	1,3-Dichloropropane	13.69	76	474588	49.2753	ug/L	87
66)	Tetrachloroethene	13.82	164	384172	52.8147	ug/L	98
67)	Dibromochloromethane	14.09	129	379069	51.7772	ug/L	100
68)	1,2-Dibromoethane	14.33	107	274362	49.3003	ug/L	99
69)	1-Chlorohexane	14.42	91	624162	56.9697	ug/L	92
70)	Chlorobenzene	14.84	112	1257223	51.0031	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	481418	55.0335	ug/L	99
72)	Ethylbenzene	14.86	106	741804	53.7311	ug/L	98
73)	m-,p-Xylene	14.95	106	1760133	110.0897	ug/L	99
74)	o-Xylene	15.52	106	835509	51.9785	ug/L	99
75)	Styrene	15.55	104	1403205	55.6818	ug/L	97
76)	Bromoform	16.06	173	228357	45.1155	ug/L	100
77)	Isopropylbenzene	15.95	105	2110544	54.8369	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.16	83	315793	50.3845	ug/L	98
81)	1,2,3-Trichloropropane	16.35	110	89133	49.6045	ug/L	90
82)	trans-1,4-Dichloro-2-Buten	16.39	53	65814	43.3865	ug/L	87
83)	n-Propylbenzene	16.45	91	2526150	54.3354	ug/L	99
84)	Bromobenzene	16.59	156	559934	51.4017	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	1829333	54.3416	ug/L	97
86)	2-Chlorotoluene	16.72	91	1750450	55.1503	ug/L	93
87)	4-Chlorotoluene	16.77	91	1383957	48.3843	ug/L	98
88)	a-Methylstyrene	17.04	118	1055106	55.9059	ug/L	98
89)	tert-Butylbenzene	17.10	134	394809	51.8002	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1921216	55.9026	ug/L	98
91)	sec-Butylbenzene	17.37	105	2278240	54.0334	ug/L	100
92)	p-Isopropyltoluene	17.53	119	1956758	55.1144	ug/L	99
93)	1,3-Dichlorobenzene	17.72	146	1113552	52.7387	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	1091749	50.8584	ug/L	99
95)	n-Butylbenzene	18.06	91	1790935	55.9986	ug/L	99
96)	1,2-Dichlorobenzene	18.35	146	958978	51.7008	ug/L	99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	48917	47.9551	ug/L	89
98)	1,2,4-Trichlorobenzene	20.49	180	645493	51.6891	ug/L	99
99)	Hexachlorobutadiene	20.65	225	298388	51.3478	ug/L	98
100)	Naphthalene	20.87	128	862136	48.3102	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	524552	50.5816	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419165.D 8260WT.M Wed Apr 26 09:35:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: HPMS8
Initial cal date: 17 Apr 2017 16:54
CCV date: 26 Apr 2017 8:22
CCV Filename: 8M419165.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	830845	10.93	667165	14.80	355416	17.83
CCV	771505	10.92	622116	14.79	332171	17.82

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	93	-0.01
2	T	Dichlorodifluoromethane	0.3383	0.3773	-11.5	95	-0.02
3	P	Chloromethane	0.4230	0.4372	-3.4	101	0.00
4	C	Vinyl Chloride	0.3994	0.4375	-9.5	104	-0.01
5	T	1,3-Butadiene	0.1737	0.2556	-47.1#	145	-0.01
6	T	Bromomethane	0.1100	0.1314	-19.4	82	-0.01
7	T	Chloroethane	0.1745	0.1856	-6.4	97	-0.01
8	T	Trichlorofluoromethane	0.4339	0.4528	-4.4	96	0.00
9	T	Diethyl ether	0.1634	0.1437	12.1	83	-0.01
10	T	Isoprene	0.3430	0.3921	-14.3	105	-0.01
11	T	Acrolein	0.0226	0.0164	27.3#	69	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2650	-7.1	98	-0.02
13	T	Acetone	0.0352	0.0313	10.9	81	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3845	-6.2	96	-0.01
15	T	Tert-Butyl Alcohol	0.0114	0.0093	18.7	76	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2580	-7.0	100	-0.02
17	T	Iodomethane	0.1082	0.1716	-58.6#	132	-0.01
18	T	Methyl acetate	0.0963	0.1011	-5.0	97	-0.02
19	T	Methylene Chloride	0.2602	0.2595	0.3	94	-0.02
20	T	Carbon Disulfide	0.7528	0.8775	-16.6	107	-0.02
21	T	Acrylonitrile	0.0488	0.0457	6.4	80	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.4802	6.3	84	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3641	-3.4	96	-0.01
24	T	n-Hexane	0.2940	0.3518	-19.6	113	-0.01
25	T	Diisopropyl ether	0.7885	0.7547	4.3	89	-0.01
26	T	Vinyl Acetate	0.3536	0.2979	15.8	77	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4762	-5.0	96	-0.01
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6121	8.7	85	-0.02
29	T	2-Butanone	0.0551	0.0500	9.4	82	-0.01
30	T	Propionitrile	0.0171	0.0148	13.4	80	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4242	-10.8	102	-0.01
32	T	cis-1,2-Dichloroethene	0.2912	0.3034	-4.2	95	-0.02
33	C	Chloroform	0.5023	0.4761	5.2	95	-0.01
34		1-Bromopropane	0.0574	0.0585	-1.8	95	-0.02
35	T	Bromochloromethane	0.1571	0.1587	-1.0	88	-0.02
36	T	Tetrahydrofuran	0.0380	0.0332	12.6	81	-0.01
37	S	Dibromofluoromethane	0.2622	0.2660	-1.4	91	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4326	-6.7	96	-0.02
39	T	Cyclohexane	0.3774	0.4341	-15.0	106	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3715	-5.0	98	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5441	9.4	84	-0.02
42	T	Carbon Tetrachloride	0.3759	0.4098	-9.0	97	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2243	1.1	88	-0.01
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2841	0.0	90	-0.02
46	T	Benzene	1.0328	1.0750	-4.1	96	-0.02
47	T	Trichloroethene	0.2901	0.2955	-1.9	95	-0.01
48	T	Methylcyclohexane	0.3867	0.4374	-13.1	105	-0.01
49	C	1,2-Dichloropropane	0.2522	0.2585	-2.5	94	-0.01
50	T	Bromodichloromethane	0.3301	0.3478	-5.4	93	-0.02
51	T	1,4-Dioxane	0.0014	0.0013	7.6	81	-0.02
52	T	Dibromomethane	0.1298	0.1303	-0.4	89	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.0992	9.1	81	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0430	12.0	79	-0.02

(#) = Out of Range
8M419165.D 8260WT.M Wed Apr 26 09:35:35 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.4013	-6.8	92	-0.01
56	T	Dimethyl Disulfide	0.1968	0.1888	4.1	87	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	93	-0.01
58	S	Toluene-d8	1.1423	1.2208	-6.9	96	-0.01
59	C	Toluene	1.3916	1.4800	-6.4	96	-0.01
60	T	Ethyl Methacrylate	0.2625	0.2740	-4.4	89	-0.01
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4067	-0.8	90	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2203	3.8	90	-0.02
64	T	2-Hexanone	0.0562	0.0497	11.5	79	-0.01
65	T	1,3-Dichloropropane	0.3870	0.3814	1.4	90	-0.01
66	T	Tetrachloroethene	0.2923	0.3088	-5.6	98	-0.01
67	T	Dibromochloromethane	0.2942	0.3047	-3.6	89	-0.01
68	T	1,2-Dibromoethane	0.2236	0.2205	1.4	87	-0.02
69	T	1-Chlorohexane	0.4403	0.5016	-13.9	104	-0.01
70	P	Chlorobenzene	0.9906	1.0104	-2.0	95	-0.01
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3869	-10.1	94	0.00
72	C	Ethylbenzene	0.5548	0.5962	-7.5	98	-0.02
73	T	m-,p-Xylene	0.6425	0.7073	-10.1	97	-0.01
74	T	o-Xylene	0.6460	0.6715	-4.0	97	0.00
75	T	Styrene	1.0127	1.1278	-11.4	95	-0.01
76	P	Bromoform	0.1760	0.1835	-4.3	87	0.00
77	T	Isopropylbenzene	1.5466	1.6963	-9.7	98	-0.01
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	93	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4753	-0.8	90	-0.01
80	S	p-Bromofluorobenzene	0.8823	0.8923	-1.1	94	-0.01
81	T	1,2,3-Trichloropropane	0.1352	0.1342	0.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.0991	-1.3	76	-0.01
83	T	n-Propylbenzene	3.4991	3.8025	-8.7	99	0.00
84	T	Bromobenzene	0.8199	0.8428	-2.8	93	-0.01
85	T	1,3,5-Trimethylbenzene	2.5336	2.7536	-8.7	98	0.00
86	T	2-Chlorotoluene	2.3888	2.6349	-10.3	112	-0.01
87	T	4-Chlorotoluene	2.1528	2.0832	3.2	84	-0.01
88	T	a-Methylstyrene	1.4204	1.5882	-11.8	102	-0.01
89	T	tert-Butylbenzene	0.5736	0.5943	-3.6	97	-0.01
90	T	1,2,4-Trimethylbenzene	2.5866	2.8919	-11.8	99	-0.01
91	T	sec-Butylbenzene	3.1733	3.4293	-8.1	99	-0.01
92	T	p-Isopropyltoluene	2.6721	2.9454	-10.2	98	-0.01
93	T	1,3-Dichlorobenzene	1.5891	1.6762	-5.5	96	-0.01
94	T	1,4-Dichlorobenzene	1.6156	1.6434	-1.7	96	-0.01
95	T	n-Butylbenzene	2.4070	2.6958	-12.0	99	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.4435	-3.4	94	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0736	4.1	87	-0.01
98	T	1,2,4-Trichlorobenzene	0.9399	0.9716	-3.4	92	0.00
99	T	Hexachlorobutadiene	0.4374	0.4491	-2.7	95	0.00
100	T	Naphthalene	1.3431	1.2977	3.4	84	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7896	-1.2	90	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419165.D 8260WT.M Wed Apr 26 09:35:36 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	93	-0.01
2	T	Dichlorodifluoromethane	50.0000	55.7547	-11.5	95	-0.02
3	P	Chloromethane	50.0000	51.6796	-3.4	101	0.00
4	C	Vinyl Chloride	50.0000	54.7676	-9.5	104	-0.01
5	T	1,3-Butadiene	50.0000	88.6470	-77.3#	145	-0.01
6	T	Bromomethane	50.0000	46.0490	7.9	82	-0.01
7	T	Chloroethane	50.0000	53.1843	-6.4	97	-0.01
8	T	Trichlorofluoromethane	50.0000	52.1831	-4.4	96	0.00
9	T	Diethyl ether	100.0000	87.9384	12.1	83	-0.01
10	T	Isoprene	50.0000	57.1586	-14.3	105	-0.01
11	T	Acrolein	50.0000	36.3464	27.3#	69	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	53.5617	-7.1	98	-0.02
13	T	Acetone	50.0000	44.5316	10.9	81	-0.02
14	C	1,1-Dichloroethene	50.0000	53.0940	-6.2	96	-0.01
15	T	Tert-Butyl Alcohol	200.0000	162.7153	18.6	76	-0.04
16	T	Dimethyl Sulfide	50.0000	53.4870	-7.0	100	-0.02
17	T	Iodomethane	50.0000	79.3145	-58.6#	132	-0.01
18	T	Methyl acetate	50.0000	52.5106	-5.0	97	-0.02
19	T	Methylene Chloride	50.0000	49.8566	0.3	94	-0.02
20	T	Carbon Disulfide	50.0000	58.2831	-16.6	107	-0.02
21	T	Acrylonitrile	50.0000	46.7969	6.4	80	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	46.8352	6.3	84	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	51.6859	-3.4	96	-0.01
24	T	n-Hexane	50.0000	59.8161	-19.6	113	-0.01
25	T	Diisopropyl ether	100.0000	95.7233	4.3	89	-0.01
26	T	Vinyl Acetate	50.0000	42.1223	15.8	77	-0.02
27	P	1,1-Dichloroethane	50.0000	52.5219	-5.0	96	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	91.2873	8.7	85	-0.02
29	T	2-Butanone	50.0000	45.3011	9.4	82	-0.01
30	T	Propionitrile	100.0000	86.5725	13.4	80	-0.02
31	T	2,2-Dichloropropane	50.0000	55.4159	-10.8	102	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	52.1007	-4.2	95	-0.02
33	C	Chloroform	50.0000	47.3868	5.2	95	-0.01
34		1-Bromopropane	50.0000	50.9134	-1.8	95	-0.02
35	T	Bromochloromethane	50.0000	50.4911	-1.0	88	-0.02
36	T	Tetrahydrofuran	100.0000	87.3722	12.6	81	-0.01
37	S	Dibromofluoromethane	25.0000	25.3606	-1.4	91	-0.02
38	T	1,1,1-Trichloroethane	50.0000	53.3563	-6.7	96	-0.02
39	T	Cyclohexane	50.0000	57.5076	-15.0	106	-0.01
40	T	1,1-Dichloropropene	50.0000	52.4864	-5.0	98	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	90.6191	9.4	84	-0.02
42	T	Carbon Tetrachloride	50.0000	54.5106	-9.0	97	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.7359	1.1	88	-0.01
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	50.0013	-0.0	90	-0.02
46	T	Benzene	50.0000	52.0446	-4.1	96	-0.02
47	T	Trichloroethene	50.0000	50.9265	-1.9	95	-0.01
48	T	Methylcyclohexane	50.0000	56.5526	-13.1	105	-0.01
49	C	1,2-Dichloropropane	50.0000	51.2379	-2.5	94	-0.01
50	T	Bromodichloromethane	50.0000	52.6817	-5.4	93	-0.02
51	T	1,4-Dioxane	200.0000	184.3058	7.8	81	-0.02
52	T	Dibromomethane	50.0000	50.2080	-0.4	89	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	45.4297	9.1	81	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	44.0096	12.0	79	-0.02

(#) = Out of Range
8M419165.D 8260WT.M Wed Apr 26 09:35:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419165.D Vial: 2
Acq On : 26 Apr 2017 8:22 Operator: TMB
Sample : WG611560-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

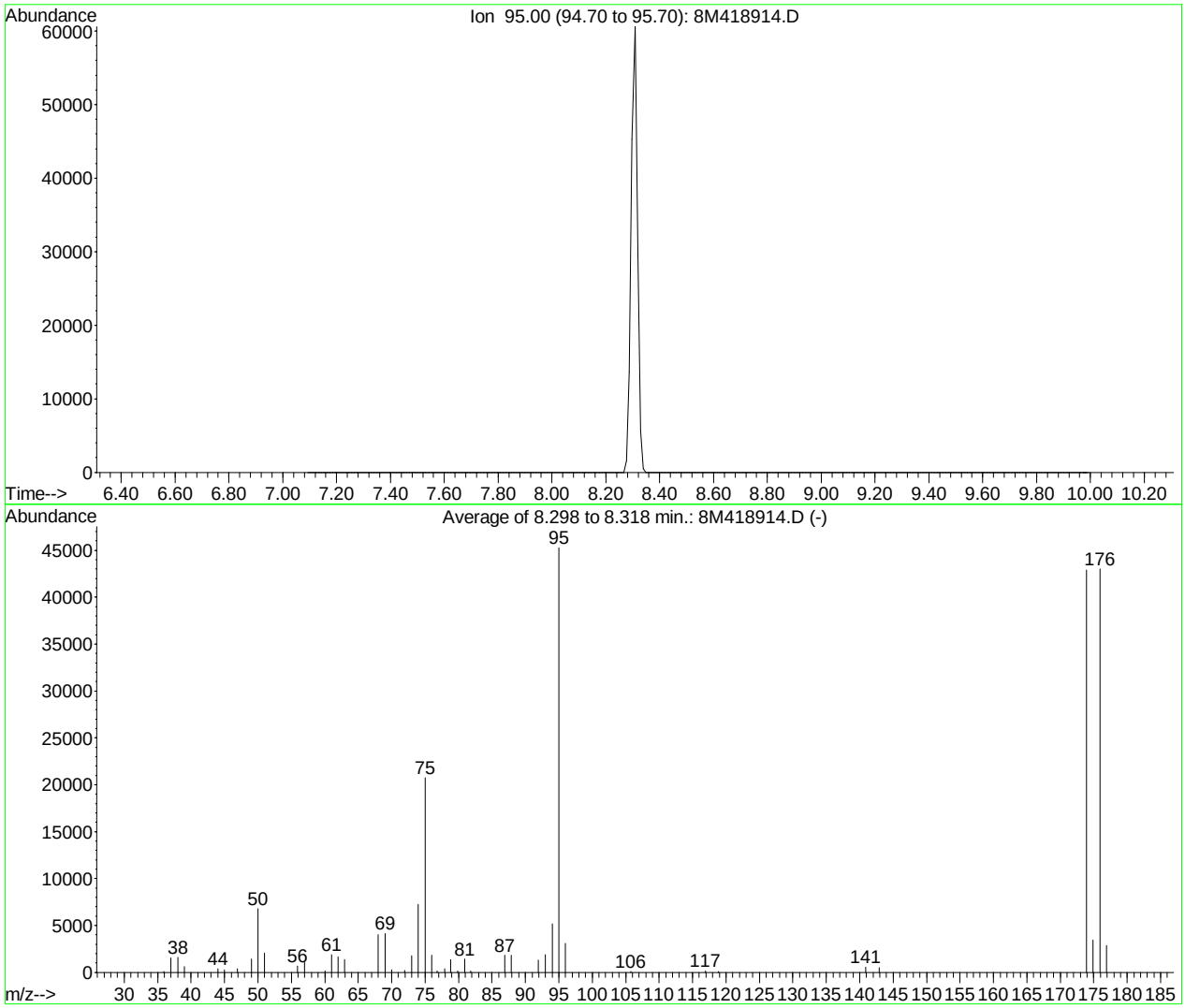
Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	53.3787	-6.8	92	-0.01
56	T	Dimethyl Disulfide	50.0000	43.9160	12.2	87	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	93	-0.01
58	S	Toluene-d8	25.0000	26.7175	-6.9	96	-0.01
59	C	Toluene	50.0000	53.1755	-6.4	96	-0.01
60	T	Ethyl Methacrylate	50.0000	52.1896	-4.4	89	-0.01
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	50.3862	-0.8	90	-0.02
63	T	1,1,2-Trichloroethane	50.0000	48.1140	3.8	90	-0.02
64	T	2-Hexanone	50.0000	44.2592	11.5	79	-0.01
65	T	1,3-Dichloropropane	50.0000	49.2753	1.4	90	-0.01
66	T	Tetrachloroethene	50.0000	52.8147	-5.6	98	-0.01
67	T	Dibromochloromethane	50.0000	51.7772	-3.6	89	-0.01
68	T	1,2-Dibromoethane	50.0000	49.3003	1.4	87	-0.02
69	T	1-Chlorohexane	50.0000	56.9697	-13.9	104	-0.01
70	P	Chlorobenzene	50.0000	51.0031	-2.0	95	-0.01
71	T	1,1,1,2-Tetrachloroethane	50.0000	55.0335	-10.1	94	0.00
72	C	Ethylbenzene	50.0000	53.7311	-7.5	98	-0.02
73	T	m-,p-Xylene	100.0000	110.0897	-10.1	97	-0.01
74	T	o-Xylene	50.0000	51.9785	-4.0	97	0.00
75	T	Styrene	50.0000	55.6818	-11.4	95	-0.01
76	P	Bromoform	50.0000	45.1155	9.8	87	0.00
77	T	Isopropylbenzene	50.0000	54.8368	-9.7	98	-0.01
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	93	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	50.3845	-0.8	90	-0.01
80	S	p-Bromofluorobenzene	25.0000	25.2825	-1.1	94	-0.01
81	T	1,2,3-Trichloropropane	50.0000	49.6045	0.8	87	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	43.3865	13.2	76	-0.01
83	T	n-Propylbenzene	50.0000	54.3354	-8.7	99	0.00
84	T	Bromobenzene	50.0000	51.4017	-2.8	93	-0.01
85	T	1,3,5-Trimethylbenzene	50.0000	54.3416	-8.7	98	0.00
86	T	2-Chlorotoluene	50.0000	55.1503	-10.3	112	-0.01
87	T	4-Chlorotoluene	50.0000	48.3843	3.2	84	-0.01
88	T	a-Methylstyrene	50.0000	55.9059	-11.8	102	-0.01
89	T	tert-Butylbenzene	50.0000	51.8002	-3.6	97	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	55.9026	-11.8	99	-0.01
91	T	sec-Butylbenzene	50.0000	54.0334	-8.1	99	-0.01
92	T	p-Isopropyltoluene	50.0000	55.1144	-10.2	98	-0.01
93	T	1,3-Dichlorobenzene	50.0000	52.7387	-5.5	96	-0.01
94	T	1,4-Dichlorobenzene	50.0000	50.8584	-1.7	96	-0.01
95	T	n-Butylbenzene	50.0000	55.9986	-12.0	99	0.00
96	T	1,2-Dichlorobenzene	50.0000	51.7008	-3.4	94	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	47.9551	4.1	87	-0.01
98	T	1,2,4-Trichlorobenzene	50.0000	51.6891	-3.4	92	0.00
99	T	Hexachlorobutadiene	50.0000	51.3478	-2.7	95	0.00
100	T	Naphthalene	50.0000	48.3102	3.4	84	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	50.5816	-1.2	90	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419165.D 8260WT.M Wed Apr 26 09:35:38 2017 Page 2

2.1.1.5 Raw QC Data

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418914.D Vial: 1
Acq On : 12 Apr 2017 10:17 Operator: TMB
Sample : WG609829-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8

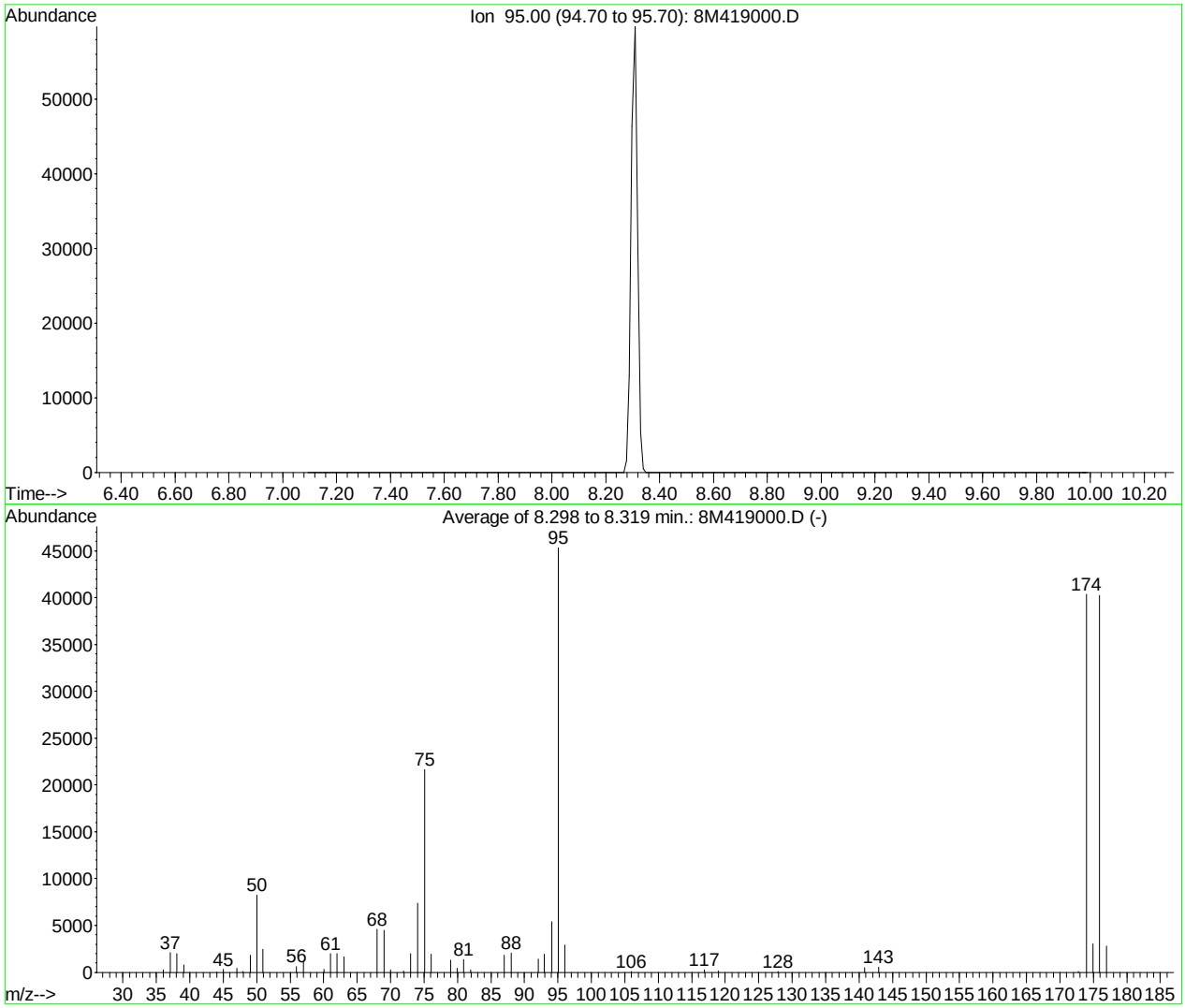


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	15.0	6807	PASS
75	95	30	60	45.8	20724	PASS
95	95	100	100	100.0	45280	PASS
96	95	5	9	6.8	3077	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	94.7	42898	PASS
175	174	5	9	8.0	3453	PASS
176	174	95	101	100.2	42994	PASS
177	176	5	9	6.7	2876	PASS

8M418914.D 8260WTR.M Fri Apr 14 13:50:48 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419000.D Vial: 1
Acq On : 17 Apr 2017 12:58 Operator: TMB
Sample : WG610410-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8

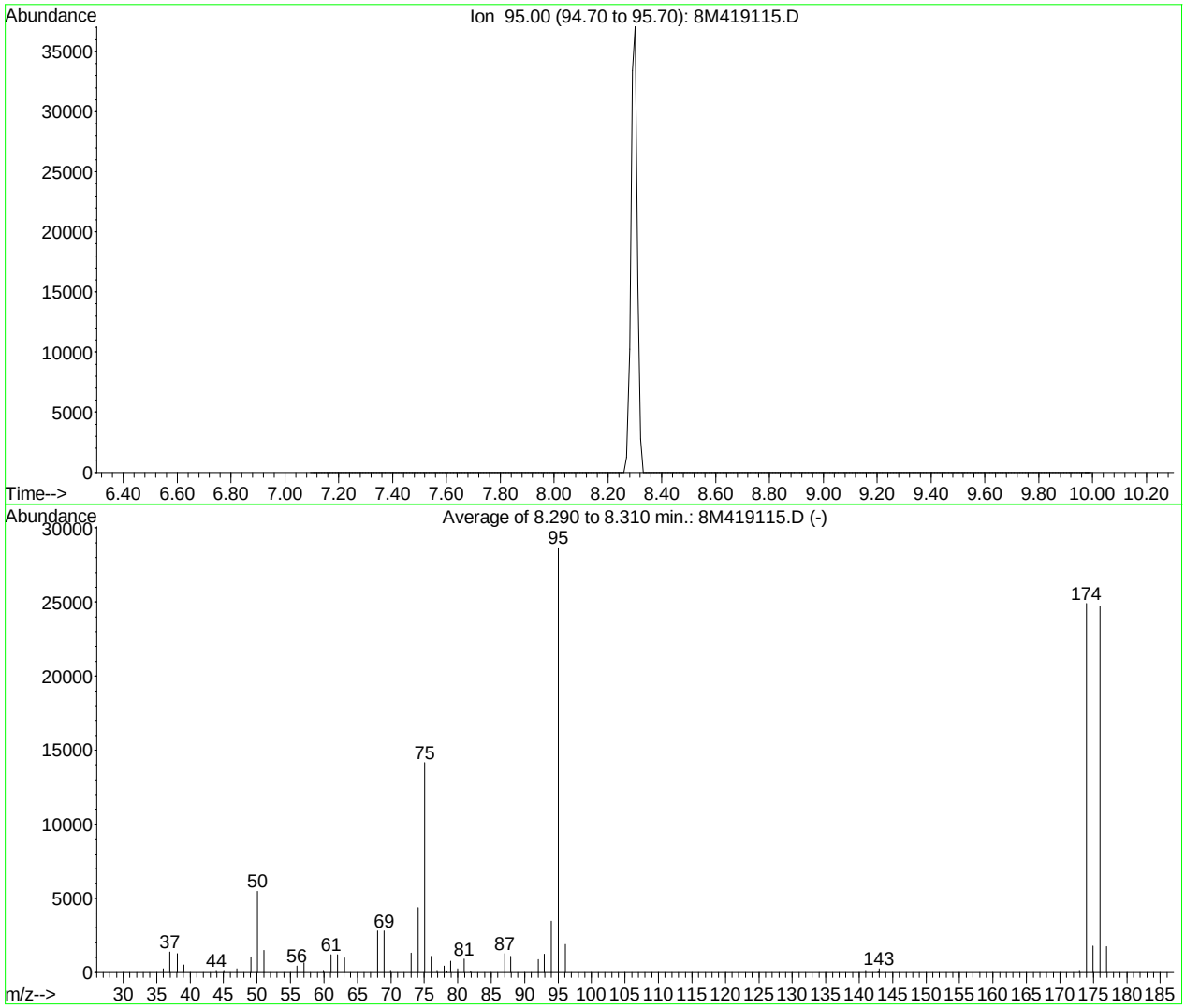


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.1	8216	PASS
75	95	30	60	47.8	21655	PASS
95	95	100	100	100.0	45349	PASS
96	95	5	9	6.4	2901	PASS
173	174	0.00	2	0.3	110	PASS
174	95	50	100	89.0	40349	PASS
175	174	5	9	7.5	3042	PASS
176	174	95	101	99.8	40256	PASS
177	176	5	9	7.0	2800	PASS

8M419000.D 8260WT.M Tue Apr 18 11:58:27 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419115.D Vial: 1
Acq On : 24 Apr 2017 11:16 Operator: TMB
Sample : WG611300-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8

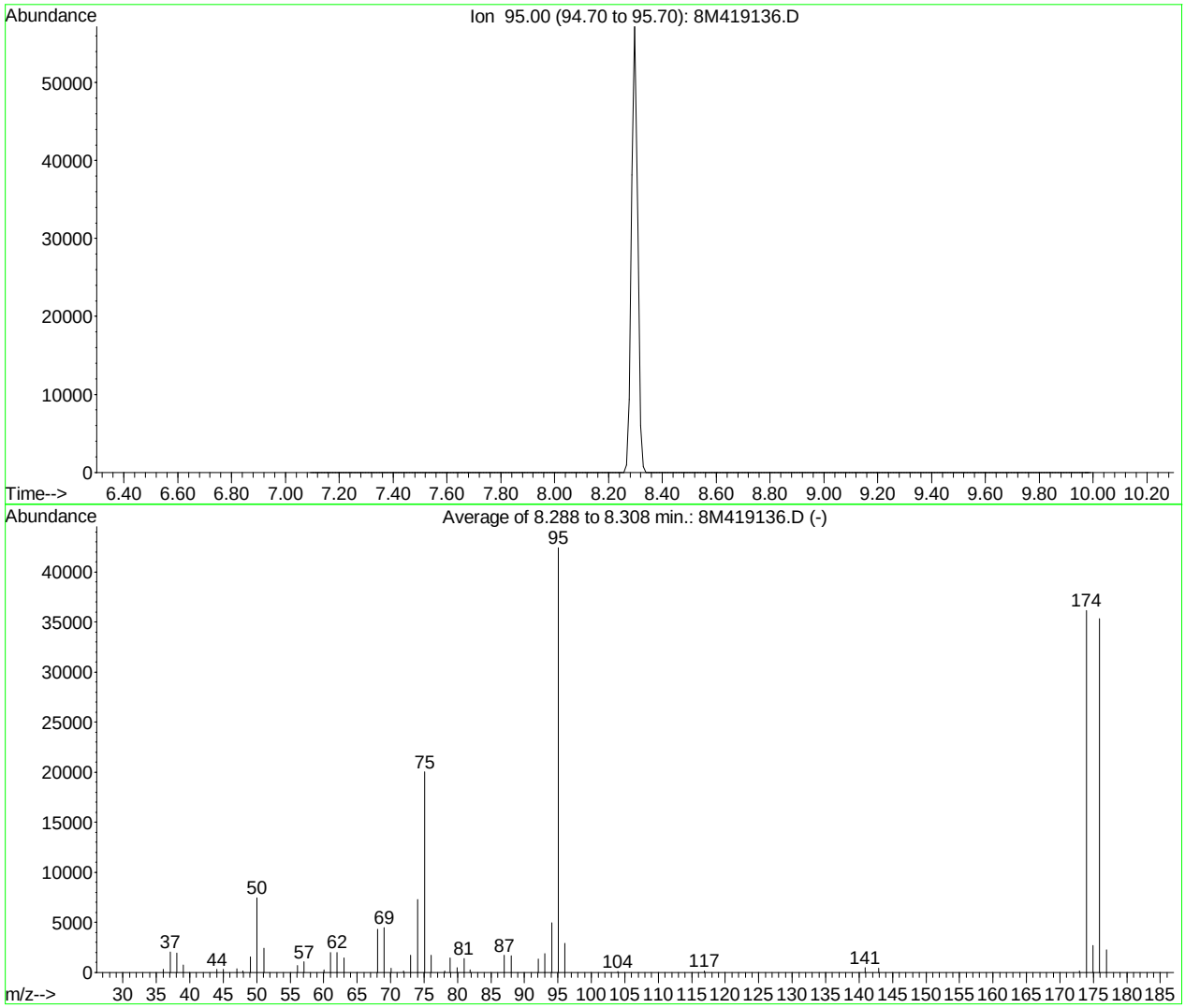


AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.1	5480	PASS
75	95	30	60	49.3	14142	PASS
95	95	100	100	100.0	28672	PASS
96	95	5	9	6.6	1898	PASS
173	174	0.00	2	0.5	126	PASS
174	95	50	100	86.8	24885	PASS
175	174	5	9	7.2	1790	PASS
176	174	95	101	99.3	24712	PASS
177	176	5	9	7.0	1730	PASS

8M419115.D 8260WT.M Mon Apr 24 12:50:49 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419136.D Vial: 1
Acq On : 25 Apr 2017 11:20 Operator: TMB
Sample : WG611407-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

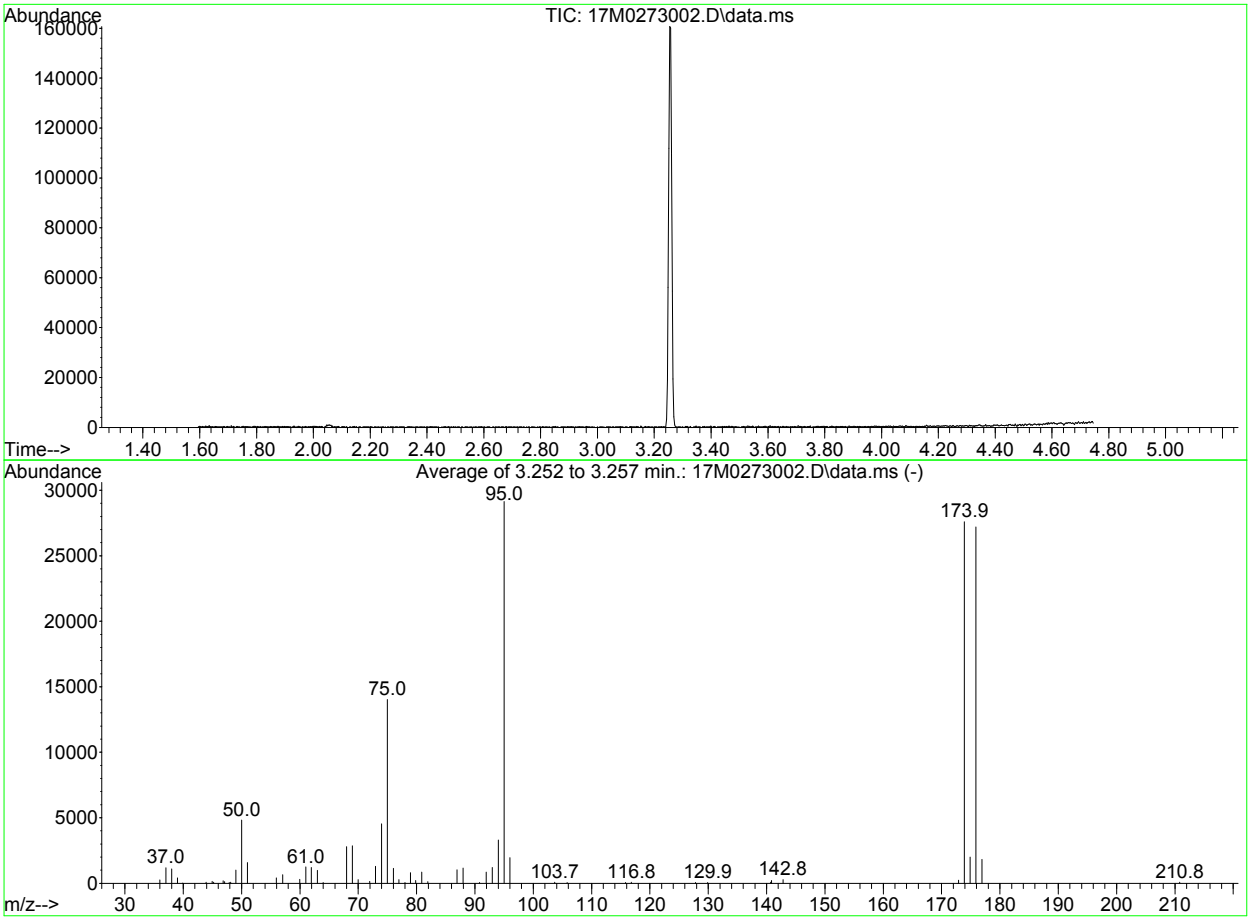
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.5	7418	PASS
75	95	30	60	47.2	20033	PASS
95	95	100	100	100.0	42440	PASS
96	95	5	9	6.8	2869	PASS
173	174	0.00	2	0.4	156	PASS
174	95	50	100	85.2	36162	PASS
175	174	5	9	7.5	2699	PASS
176	174	95	101	97.8	35370	PASS
177	176	5	9	6.4	2251	PASS

8M419136.D 8260WT.M Tue Apr 25 15:59:01 2017

Data Path : D:\MassHunter\GCMS\1\data\042517\
Data File : 17M0273002.D
Acq On : 25 Apr 2017 20:07
Operator : FJB
Sample : WG611454-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

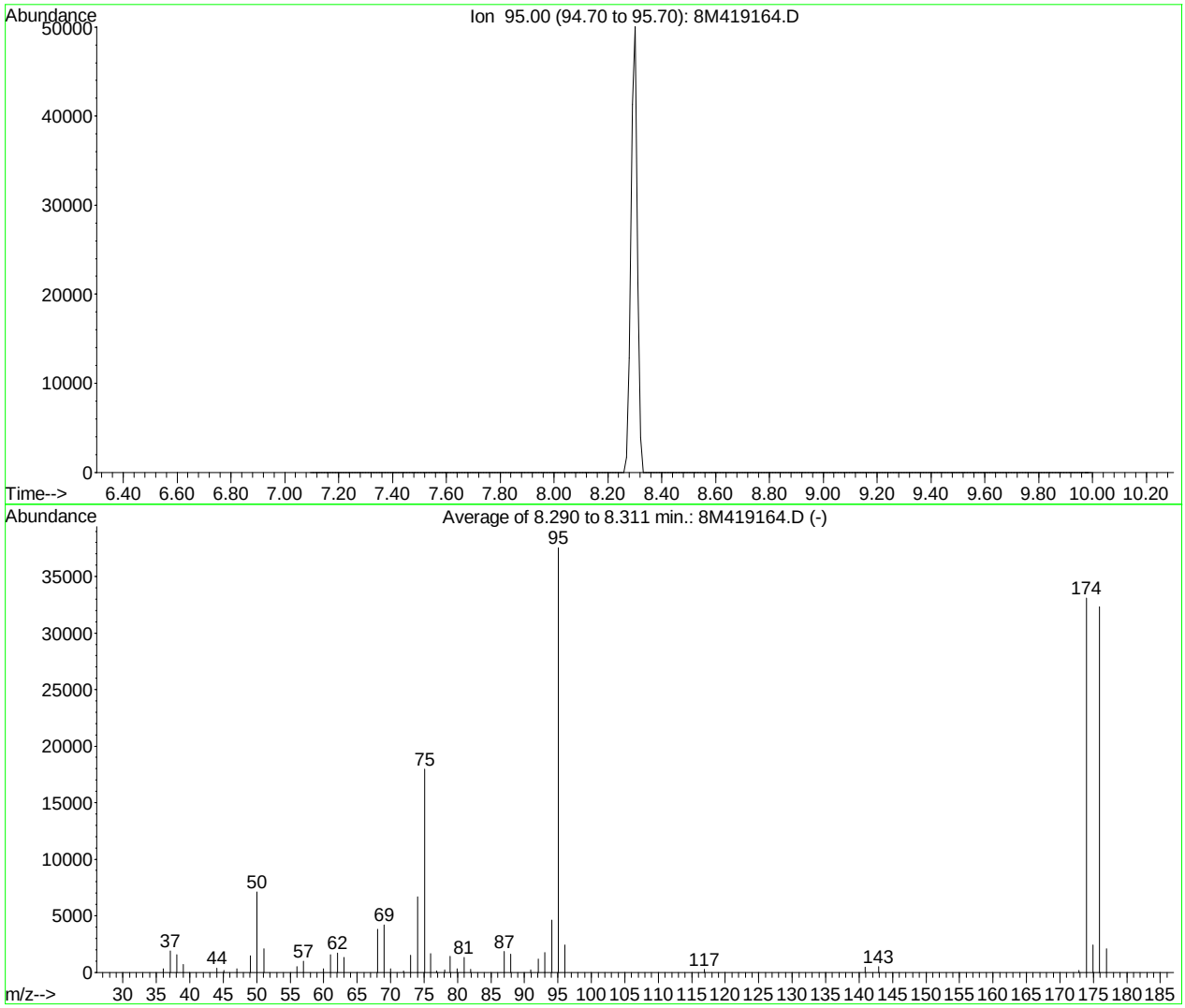
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	4824	PASS
75	95	30	60	48.1	14022	PASS
95	95	100	100	100.0	29152	PASS
96	95	5	9	6.7	1953	PASS
173	174	0.00	2	0.8	223	PASS
174	95	50	100	94.7	27600	PASS
175	174	5	9	7.3	2004	PASS
176	174	95	101	98.5	27192	PASS
177	176	5	9	6.7	1814	PASS

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419164.D Vial: 1
Acq On : 26 Apr 2017 7:53 Operator: TMB
Sample : WG611560-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

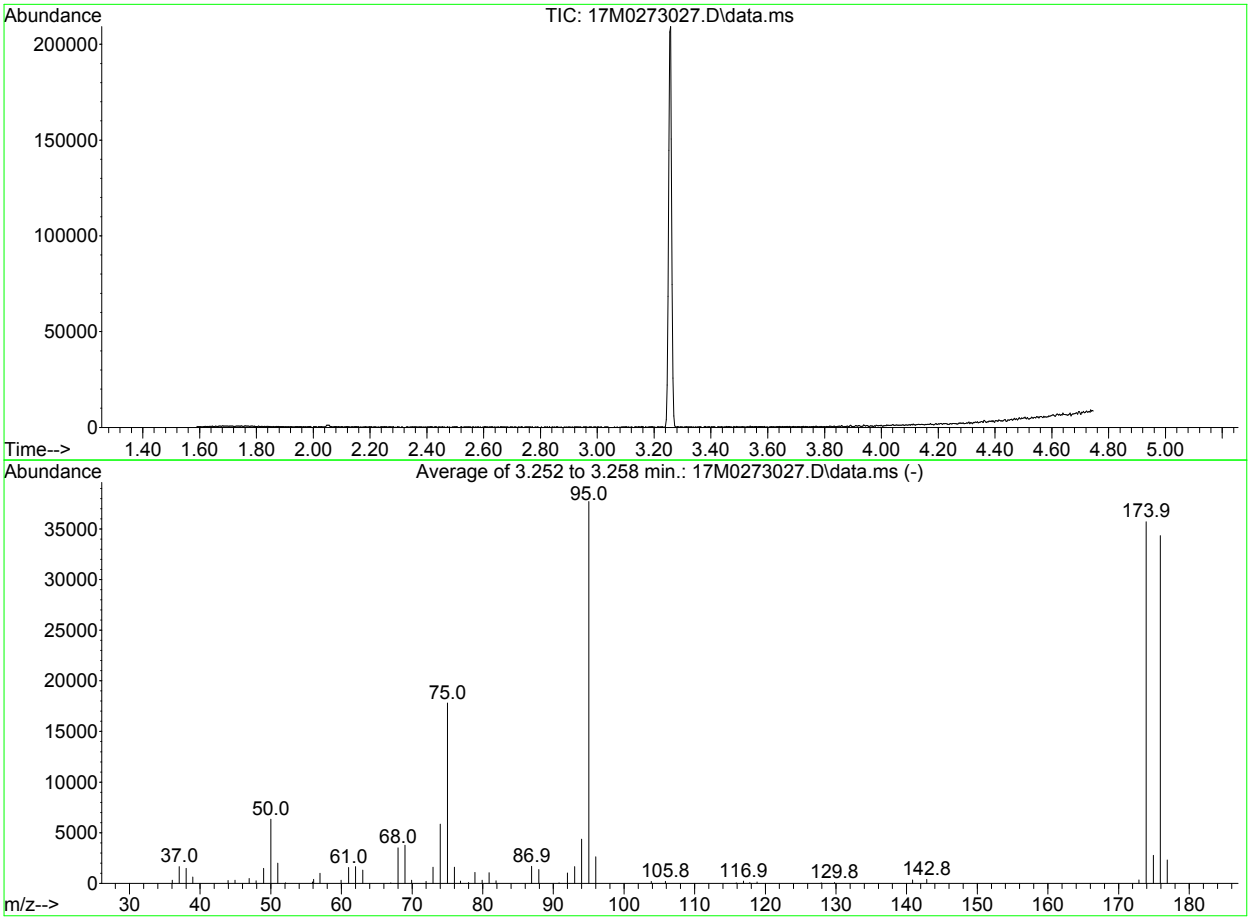
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.9	7090	PASS
75	95	30	60	47.8	17949	PASS
95	95	100	100	100.0	37554	PASS
96	95	5	9	6.4	2408	PASS
173	174	0.00	2	0.5	182	PASS
174	95	50	100	88.1	33098	PASS
175	174	5	9	7.2	2399	PASS
176	174	95	101	97.7	32344	PASS
177	176	5	9	6.5	2088	PASS

8M419164.D 8260WT.M Wed Apr 26 09:35:03 2017

Data Path : D:\MassHunter\GCMS\1\data\042617\
Data File : 17M0273027.D
Acq On : 26 Apr 2017 14:46
Operator : ADC
Sample : WG611720-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

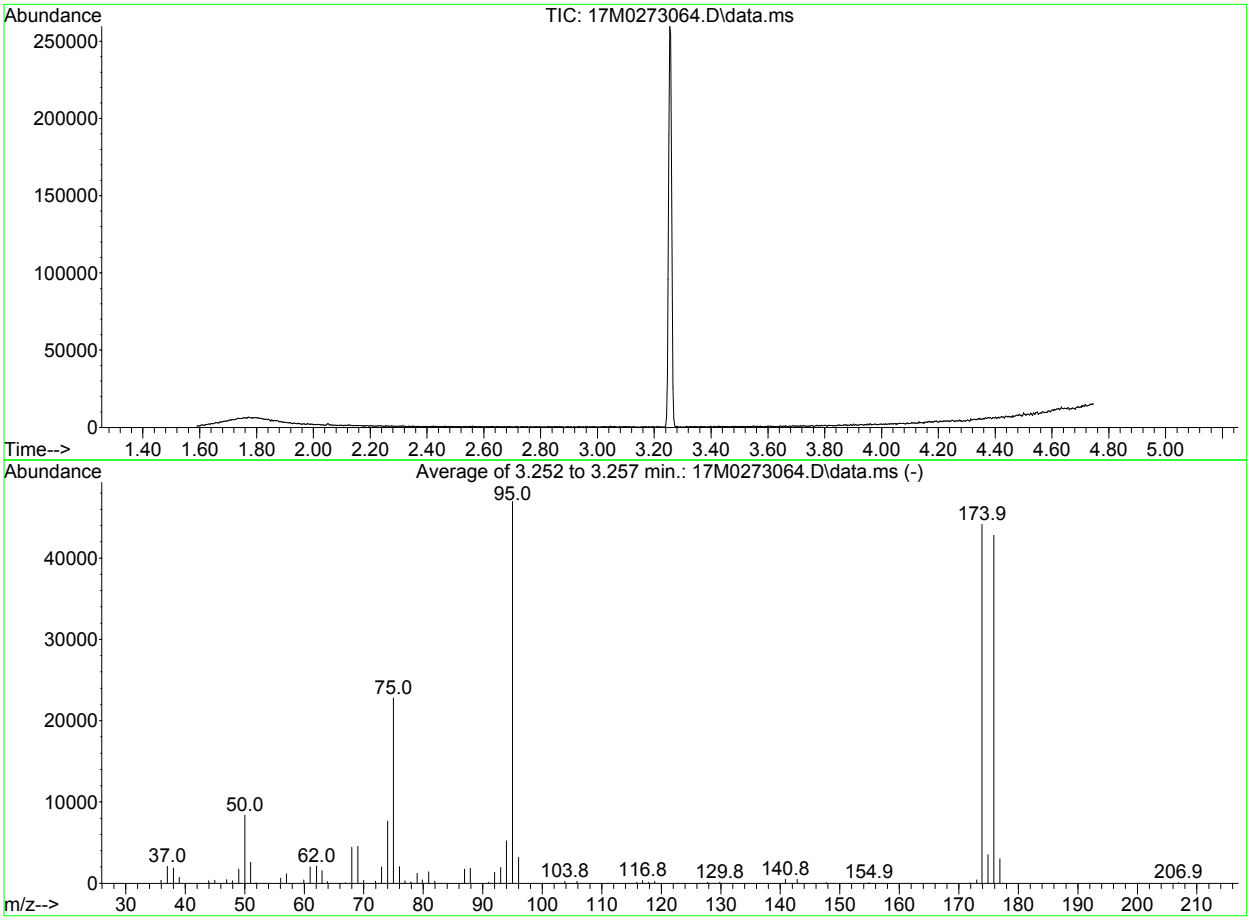
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.7	6318	PASS
75	95	30	60	47.2	17819	PASS
95	95	100	100	100.0	37739	PASS
96	95	5	9	6.9	2610	PASS
173	174	0.00	2	0.9	327	PASS
174	95	50	100	94.7	35725	PASS
175	174	5	9	7.7	2761	PASS
176	174	95	101	96.1	34347	PASS
177	176	5	9	6.7	2314	PASS

826VMS.M Wed Apr 26 15:41:37 2017 Page: 1

Data Path : D:\MassHunter\GCMS\1\data\042717\
Data File : 17M0273064.D
Acq On : 27 Apr 2017 11:37
Operator : ADC
Sample : WG611826-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

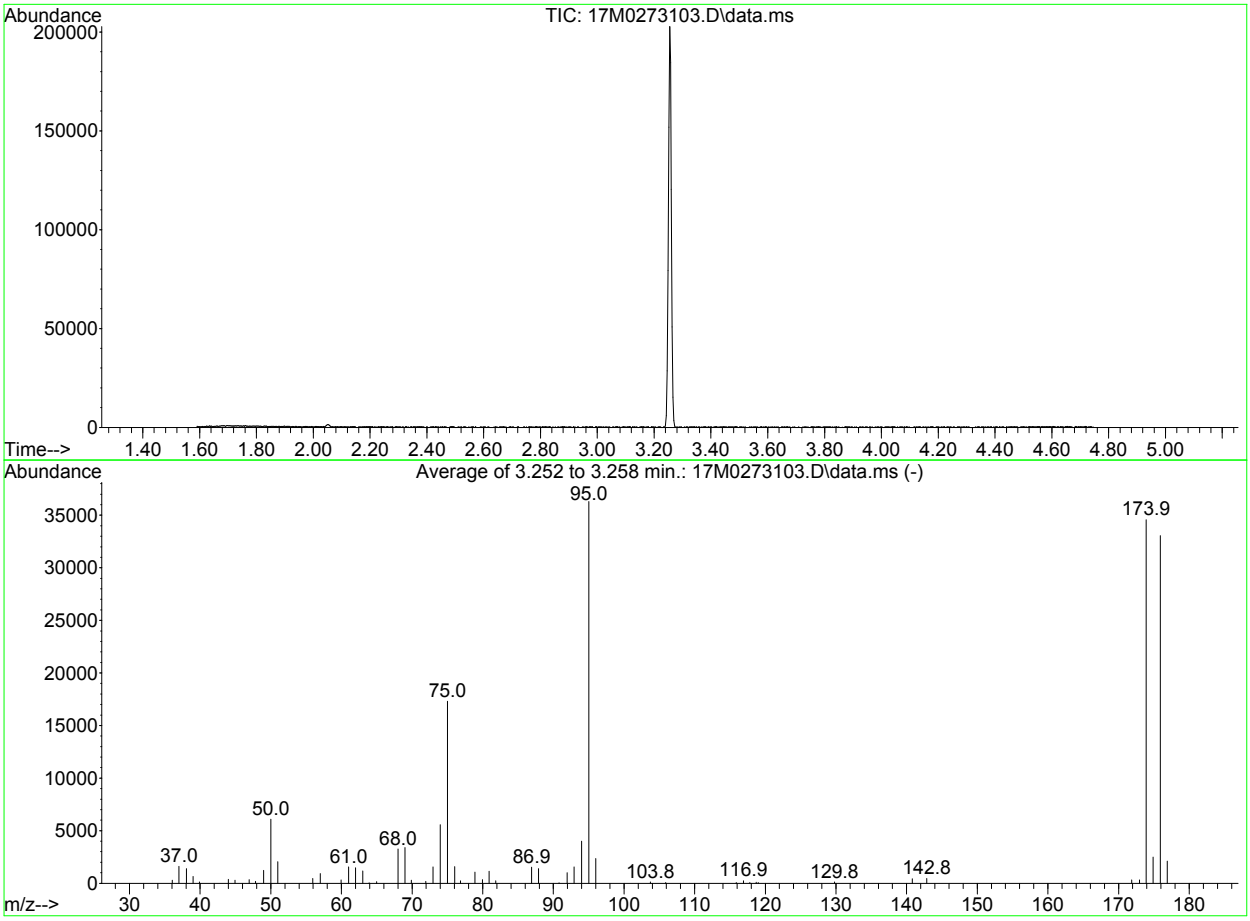
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.9	8386	PASS
75	95	30	60	48.5	22779	PASS
95	95	100	100	100.0	46968	PASS
96	95	5	9	6.8	3172	PASS
173	174	0.00	2	0.9	407	PASS
174	95	50	100	94.0	44133	PASS
175	174	5	9	7.9	3505	PASS
176	174	95	101	97.0	42800	PASS
177	176	5	9	7.0	3001	PASS

826VMS.M Thu Apr 27 12:17:40 2017 Page: 1

Data Path : D:\MassHunter\GCMS\1\data\042817\
Data File : 17M0273103.D
Acq On : 28 Apr 2017 12:01
Operator : ADC
Sample : WG612029-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.8	6101	PASS
75	95	30	60	47.7	17307	PASS
95	95	100	100	100.0	36315	PASS
96	95	5	9	6.5	2365	PASS
173	174	0.00	2	0.9	322	PASS
174	95	50	100	95.2	34571	PASS
175	174	5	9	7.2	2501	PASS
176	174	95	101	95.6	33064	PASS
177	176	5	9	6.4	2111	PASS

826VMS.M Fri Apr 28 13:19:54 2017 Page: 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273030.D Vial: 3
Acq On : 26 Apr 2017 15:50 Operator: ADC
Sample : WG611721-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

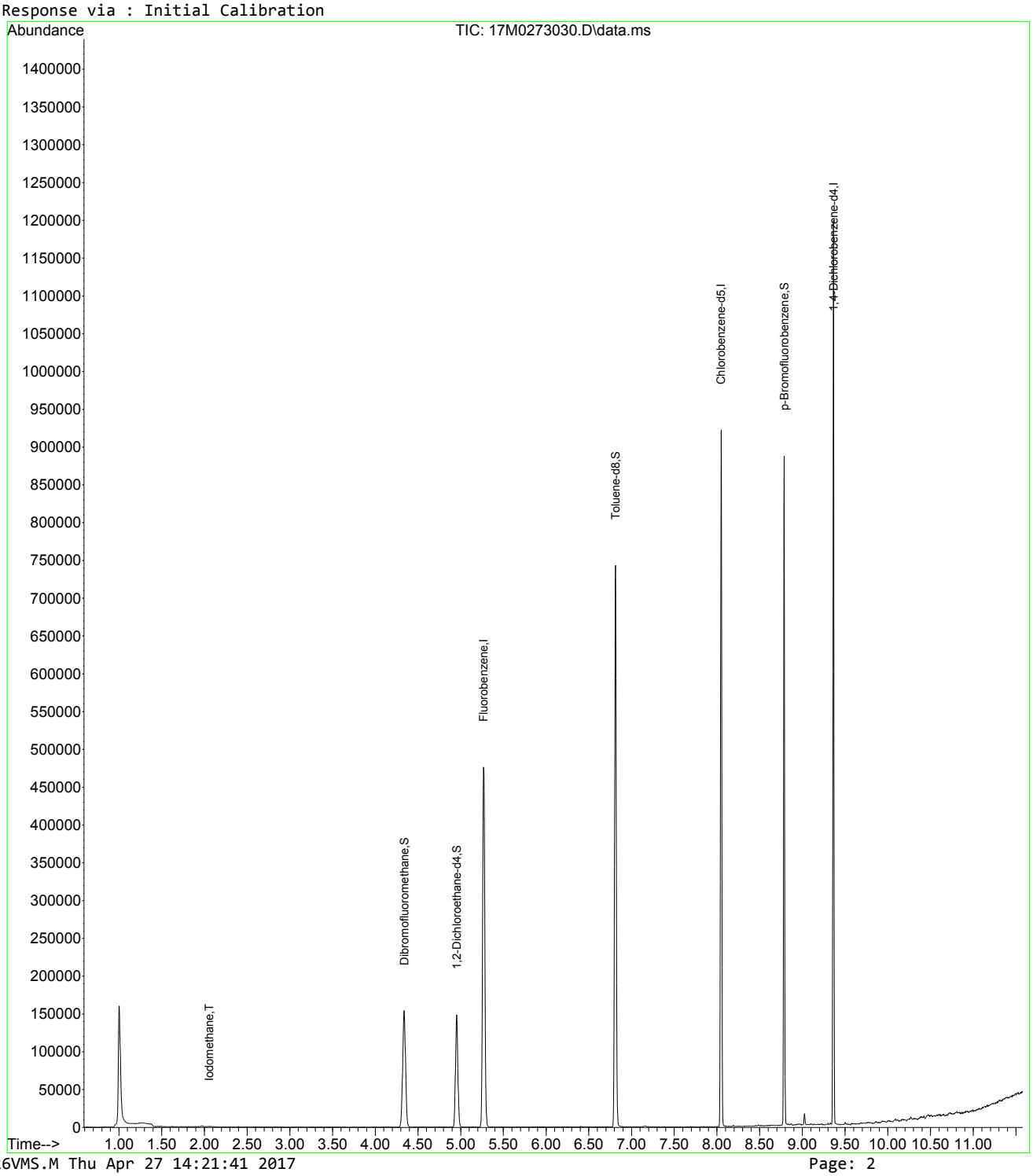
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	423130	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	314320	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156977	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	111267	24.3488	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.395%			
34) 1,2-Dichloroethane-d4	4.953	65	108731	25.3850	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.540%			
47) Toluene-d8	6.812	98	409916	26.1316	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.526%			
66) p-Bromofluorobenzene	8.786	95	143011	27.2090	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.836%			
Target Compounds						Qvalue
13) Iodomethane	2.058	142	262	2.0411	ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

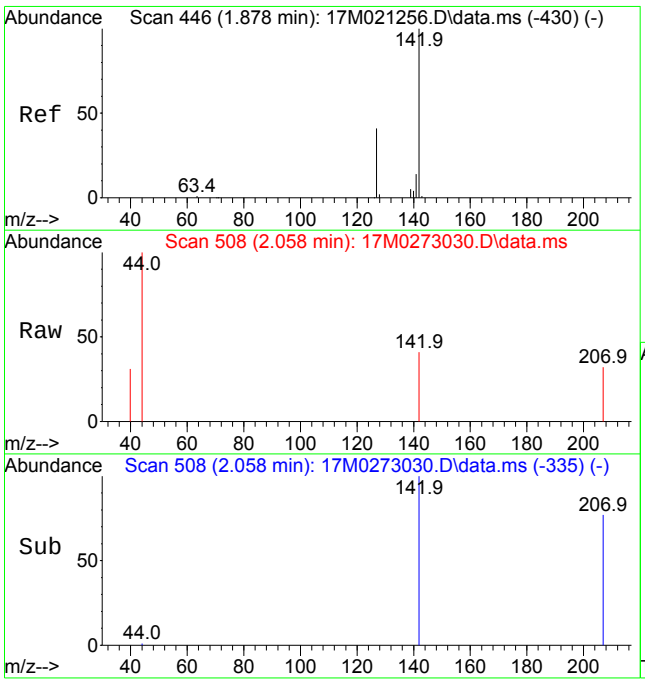
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042617\17M0273030.D Vial: 3
Acq On : 26 Apr 2017 15:50 Operator: ADC
Sample : WG611721-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 14:21:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



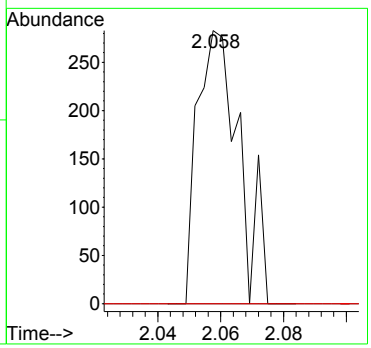
826VMS.M Thu Apr 27 14:21:41 2017 Page: 2



#13
Iodomethane
Concen: 2.0411 ug/L
RT: 2.058 min Scan# 508
Delta R.T. -0.000 min
Lab File: 17M0273030.D
Acq: 26 Apr 2017 15:50

Tgt Ion:142 Resp: 262

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273067.D Vial: 3
Acq On : 27 Apr 2017 12:42 Operator: ADC
Sample : WG611827-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

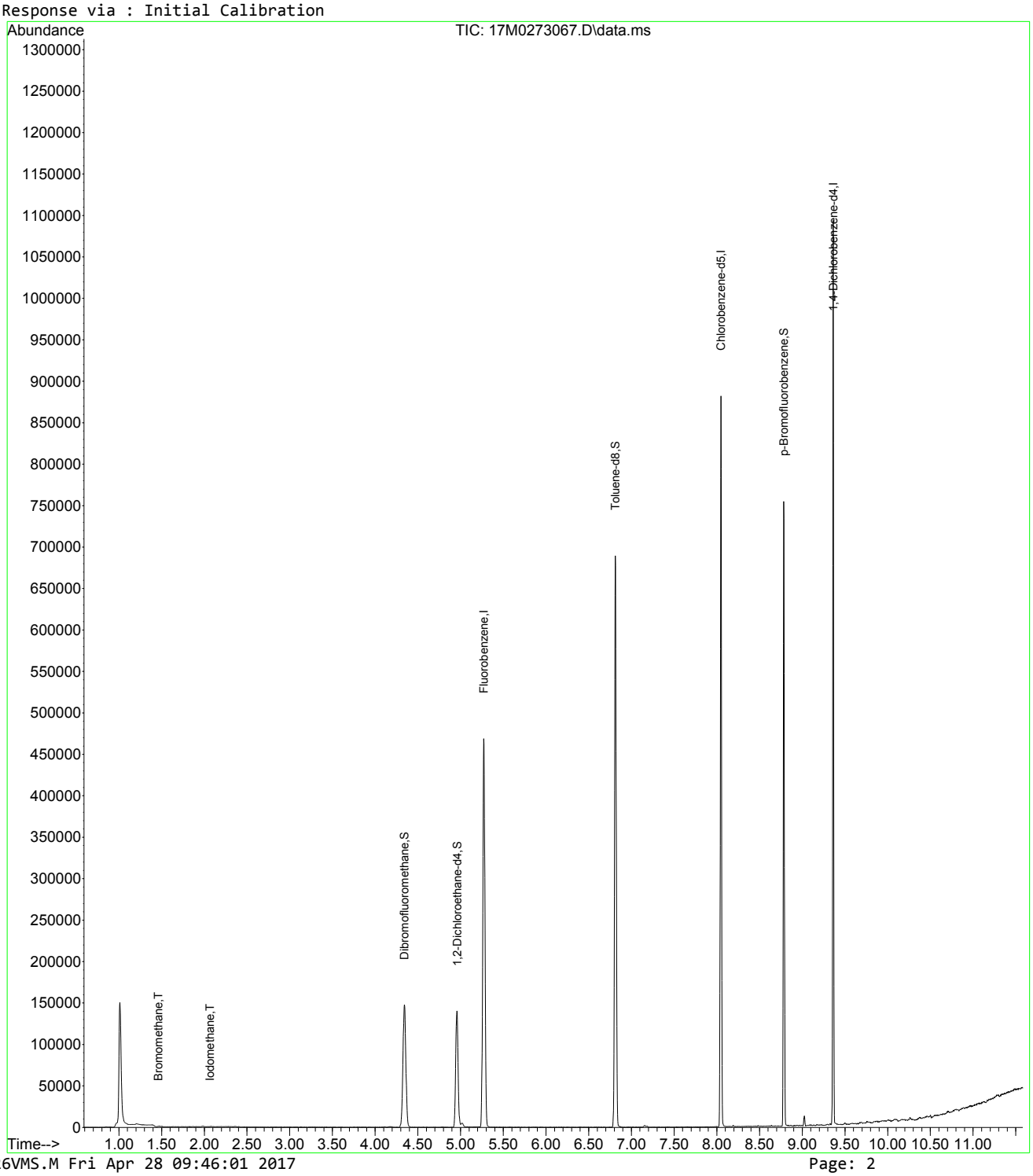
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	402256	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	295946	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	145053	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	106178	24.4409 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.764%		
34) 1,2-Dichloroethane-d4	4.959	65	102355	25.1364 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.546%		
47) Toluene-d8	6.812	98	376237	25.4737 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.895%		
66) p-Bromofluorobenzene	8.783	95	126786	26.1050 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.420%		
Target Compounds					Qvalue
6) Bromomethane	1.461	94	490	0.1273 ug/L	96
13) Iodomethane	2.066	142	357	2.0584 ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

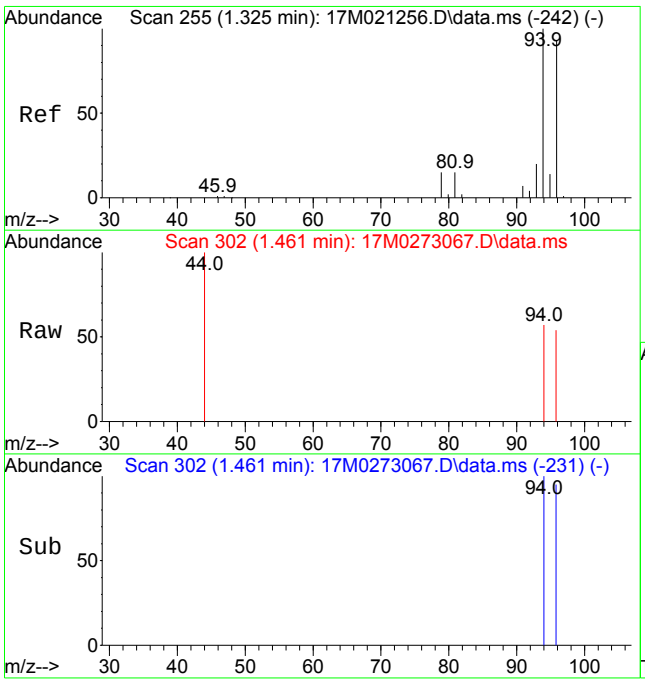
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273067.D Vial: 3
Acq On : 27 Apr 2017 12:42 Operator: ADC
Sample : WG611827-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



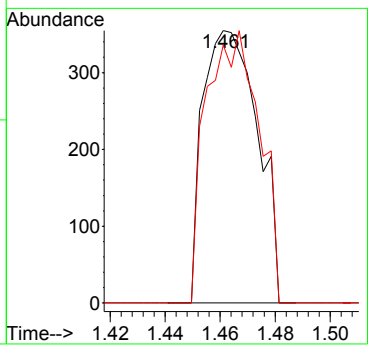
826VMS.M Fri Apr 28 09:46:01 2017 Page: 2

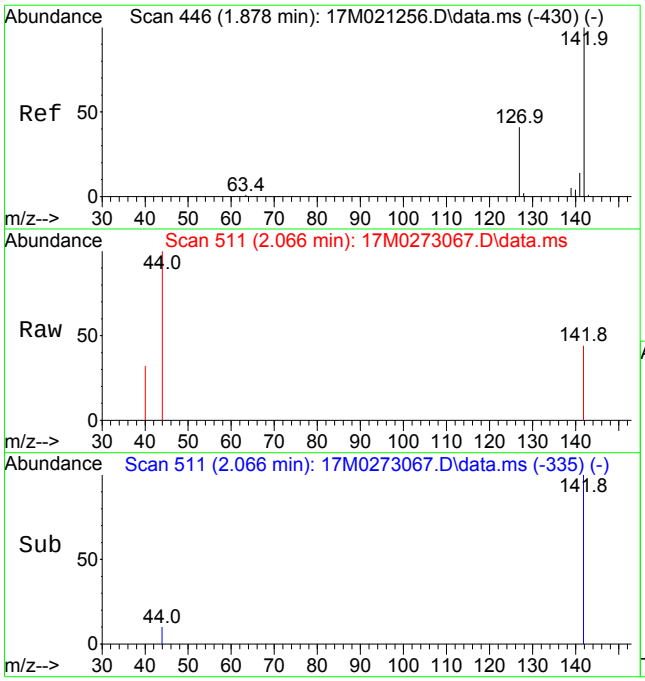


#6
Bromomethane
Concen: 0.1273 ug/L
RT: 1.461 min Scan# 302
Delta R.T. 0.006 min
Lab File: 17M0273067.D
Acq: 27 Apr 2017 12:42

Tgt Ion: 94 Resp: 490

Ion	Ratio	Lower	Upper
94	100		
96	97.3	56.1	130.9

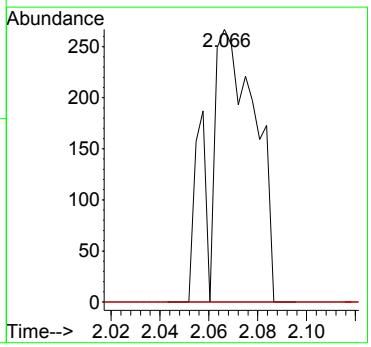




#13
Iodomethane
Concen: 2.0584 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273067.D
Acq: 27 Apr 2017 12:42

Tgt Ion:142 Resp: 357

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273106.D Vial: 3
Acq On : 28 Apr 2017 13:01 Operator: ADC
Sample : WG612030-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

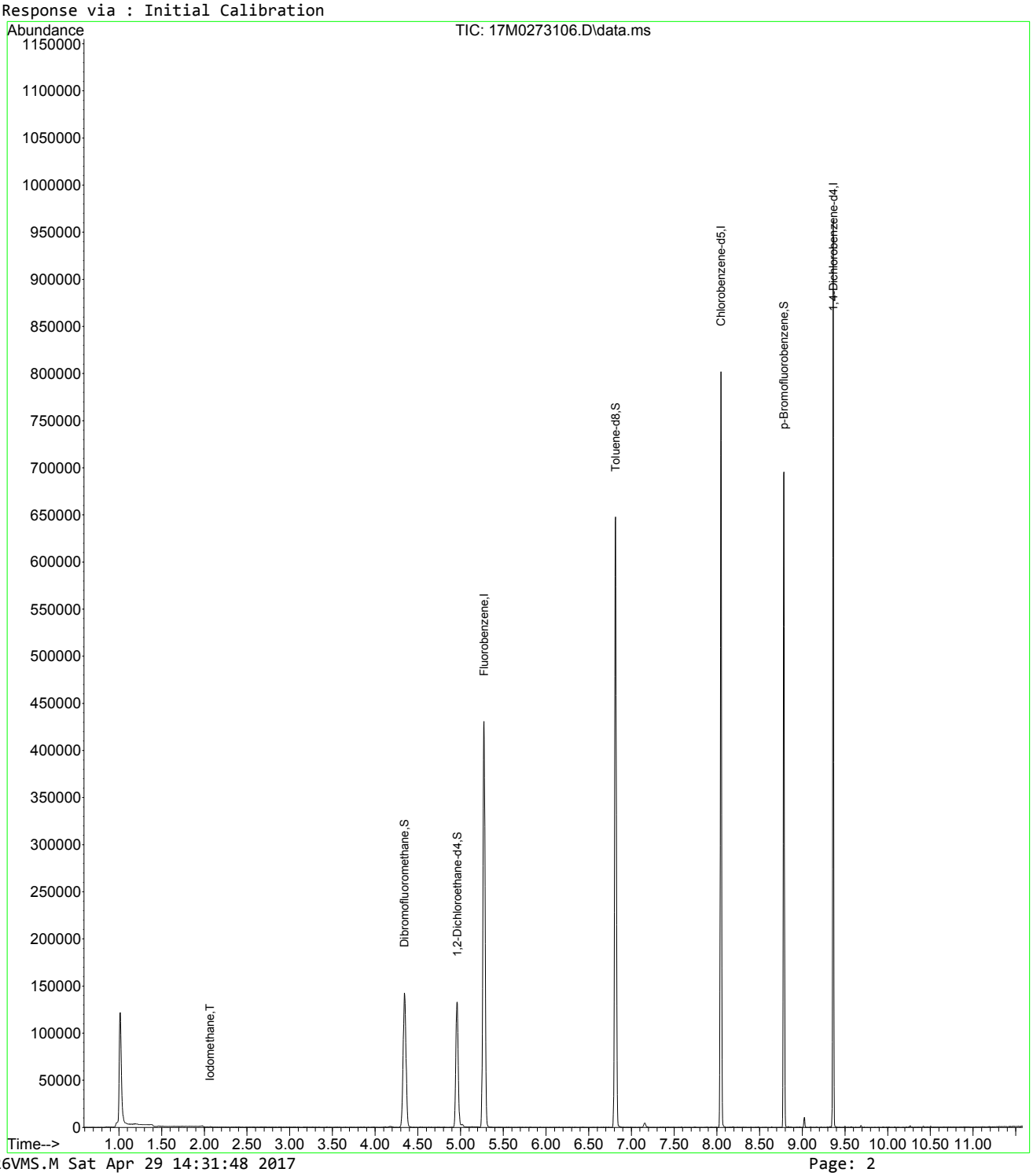
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	372168	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	271660	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129762	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	101128	25.1604	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.642%			
34) 1,2-Dichloroethane-d4	4.959	65	97378	25.8475	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.390%			
47) Toluene-d8	6.815	98	353592	26.0807	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.323%			
66) p-Bromofluorobenzene	8.784	95	117733	27.0976	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.390%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	463	2.0814	ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

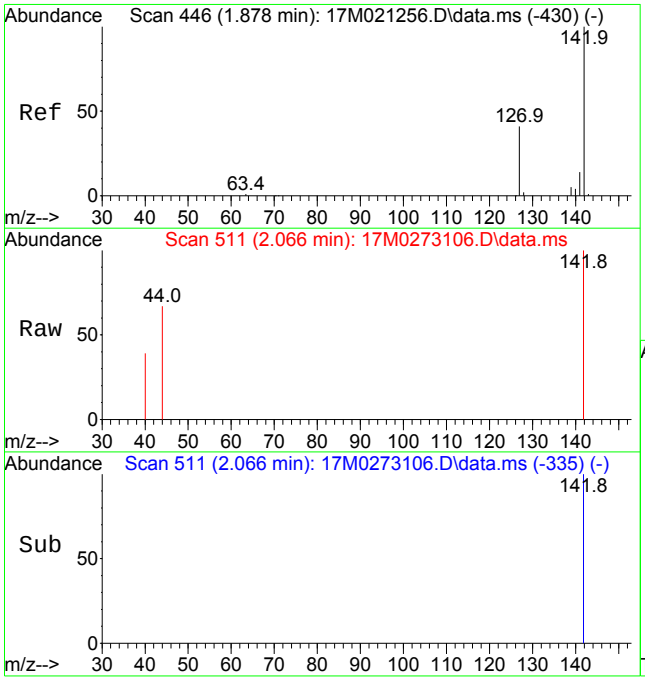
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273106.D Vial: 3
Acq On : 28 Apr 2017 13:01 Operator: ADC
Sample : WG612030-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



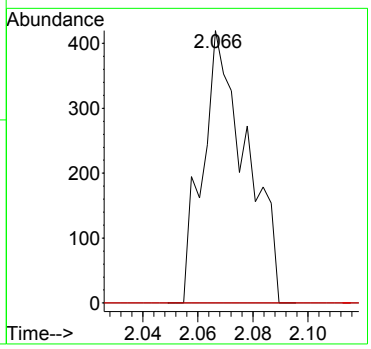
826VMS.M Sat Apr 29 14:31:48 2017 Page: 2



#13
Iodomethane
Concen: 2.0814 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273106.D
Acq: 28 Apr 2017 13:01

Tgt Ion:142 Resp: 463

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419118.D Vial: 4
Acq On : 24 Apr 2017 12:42 Operator: TMB
Sample : WG611301-01 VBLK0424 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:04:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

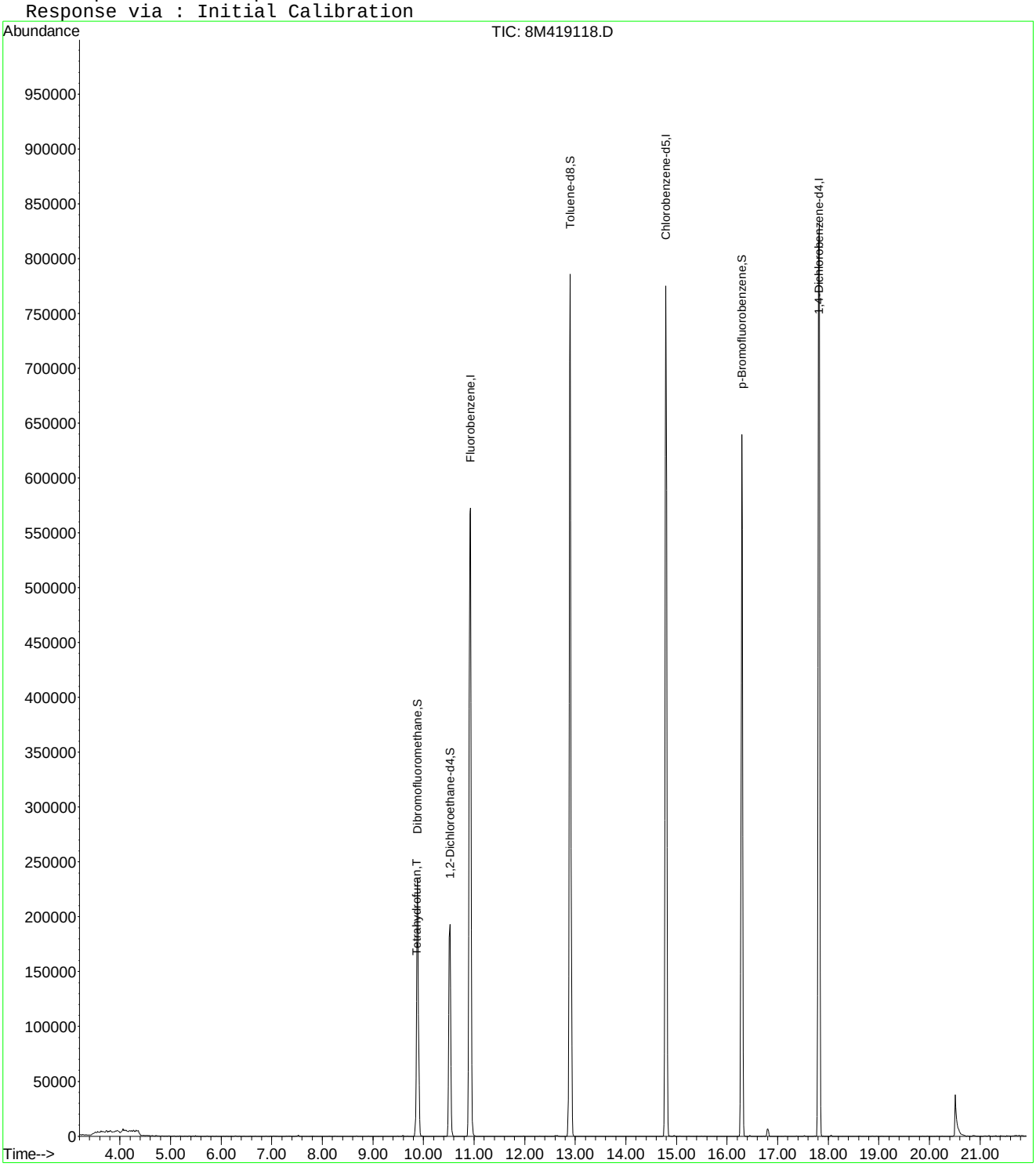
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	733239	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	583306	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	298713	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	197035	25.6196	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.48%			
43) 1,2-Dichloroethane-d4	10.52	65	169008	25.4195	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.68%			
58) Toluene-d8	12.90	98	706884	26.5224	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%			
80) p-Bromofluorobenzene	16.29	95	275055	26.0901	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.36%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.86	42	2846	2.5565	ug/L #	70

(#) = qualifier out of range (m) = manual integration
8M419118.D 8260WT.M Tue Apr 25 08:35:54 2017 Page 1

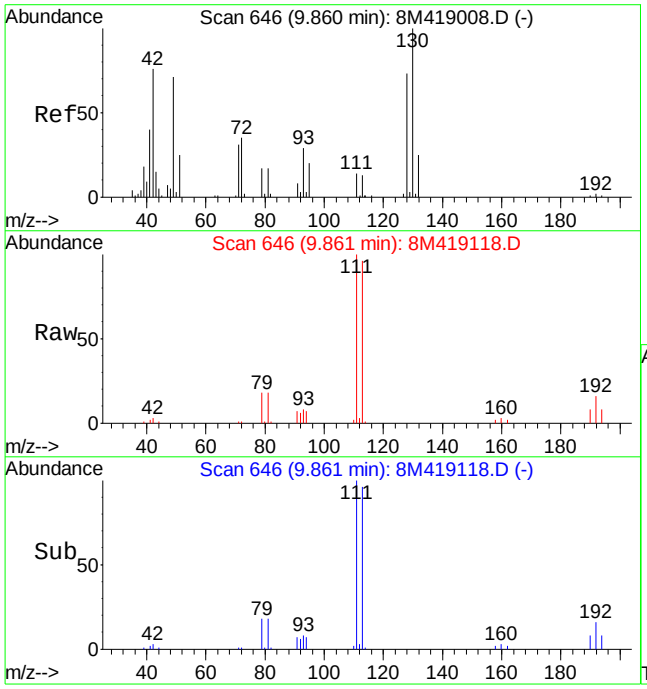
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419118.D Vial: 4
Acq On : 24 Apr 2017 12:42 Operator: TMB
Sample : WG611301-01 VBLK0424 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:04 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



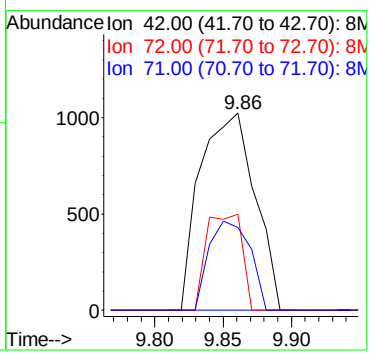
8M419118.D 8260WT.M Tue Apr 25 08:35:54 2017 Page 2



#36
Tetrahydrofuran
Concen: 2.56 ug/L
RT: 9.86 min Scan# 646
Delta R.T. -0.00 min
Lab File: 8M419118.D
Acq: 24 Apr 2017 12:42

Tgt Ion: 42 Resp: 2846

Ion	Ratio	Lower	Upper
42	100		
72	31.7	32.9	76.9#
71	33.8	32.1	74.9



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419141.D Vial: 6
Acq On : 25 Apr 2017 13:45 Operator: TMB
Sample : WG611408-01 VBLK0425 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 14:07:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

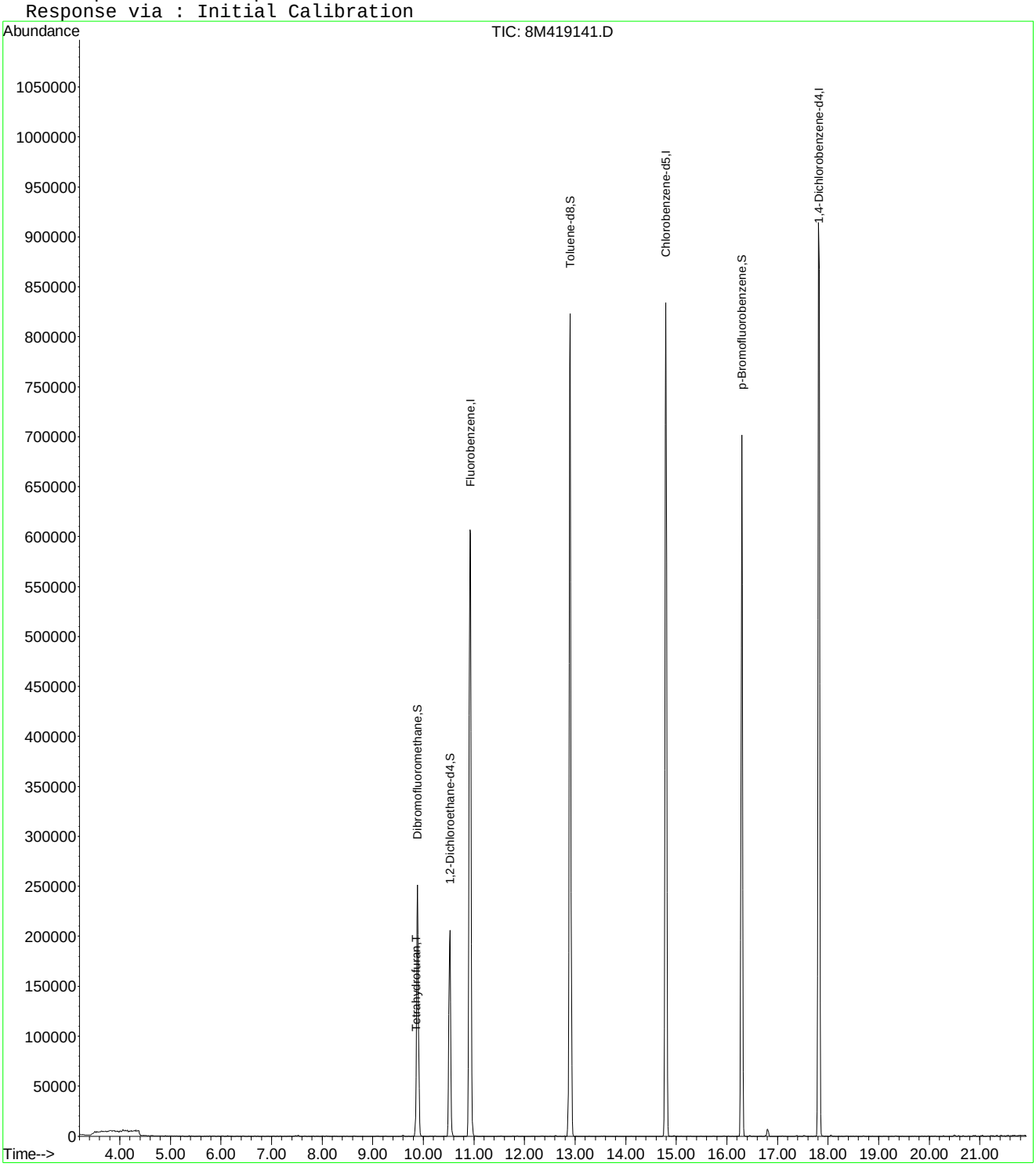
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	778852	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	625907	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	318113	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	206154	25.2354	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.96%			
43) 1,2-Dichloroethane-d4	10.52	65	178923	25.3348	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.32%			
58) Toluene-d8	12.90	98	754117	26.3688	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.48%			
80) p-Bromofluorobenzene	16.29	95	291328	25.9485	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.80%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.85	42	3526	2.9818	ug/L	79

(#) = qualifier out of range (m) = manual integration
8M419141.D 8260WT.M Wed Apr 26 07:13:15 2017 Page 1

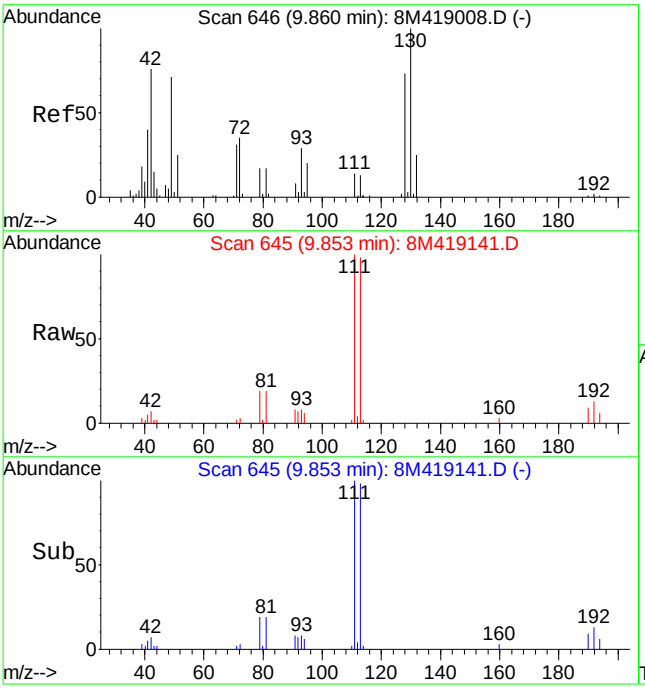
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419141.D Vial: 6
Acq On : 25 Apr 2017 13:45 Operator: TMB
Sample : WG611408-01 VBLK0425 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 14:07 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



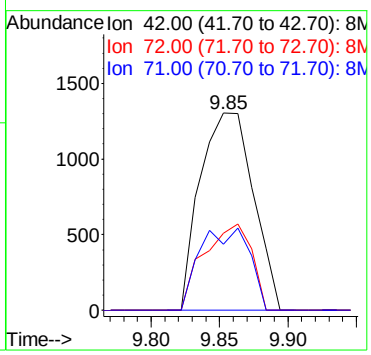
8M419141.D 8260WT.M Wed Apr 26 07:13:15 2017 Page 2



#36
Tetrahydrofuran
Concen: 2.98 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419141.D
Acq: 25 Apr 2017 13:45

Tgt Ion: 42 Resp: 3526

Ion	Ratio	Lower	Upper
42	100		
72	39.1	32.9	76.9
71	38.8	32.1	74.9



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419167.D Vial: 4
Acq On : 26 Apr 2017 9:27 Operator: TMB
Sample : WG611561-01 VBLK0426 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 09:49:10 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

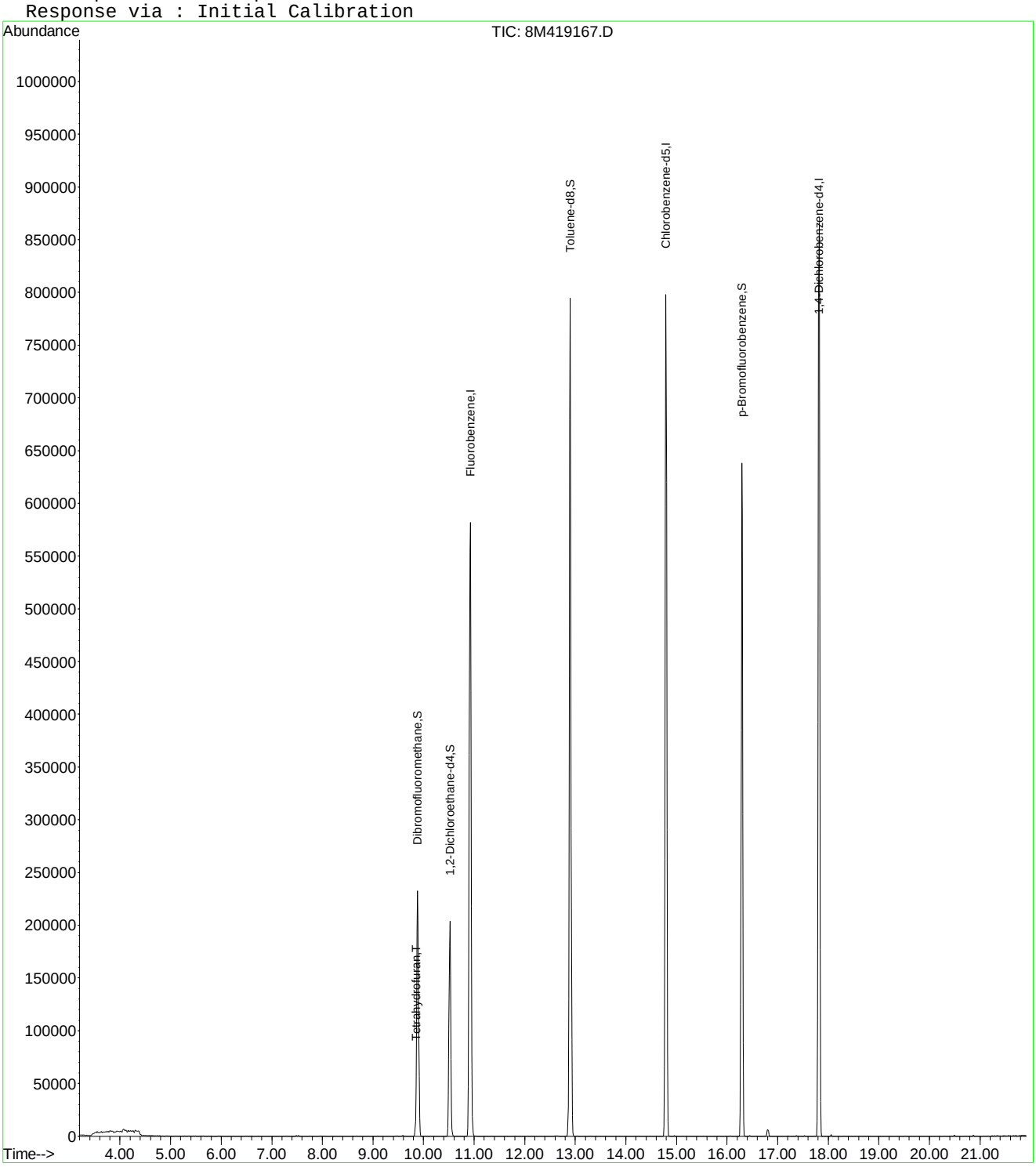
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	727213	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	577927	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	300614	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	196001	25.6963	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.52	65	173880	26.3690	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.48%			
58) Toluene-d8	12.90	98	710754	26.9159	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.68%			
80) p-Bromofluorobenzene	16.29	95	275531	25.9700	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.85	42	4318	3.9109	ug/L #	76

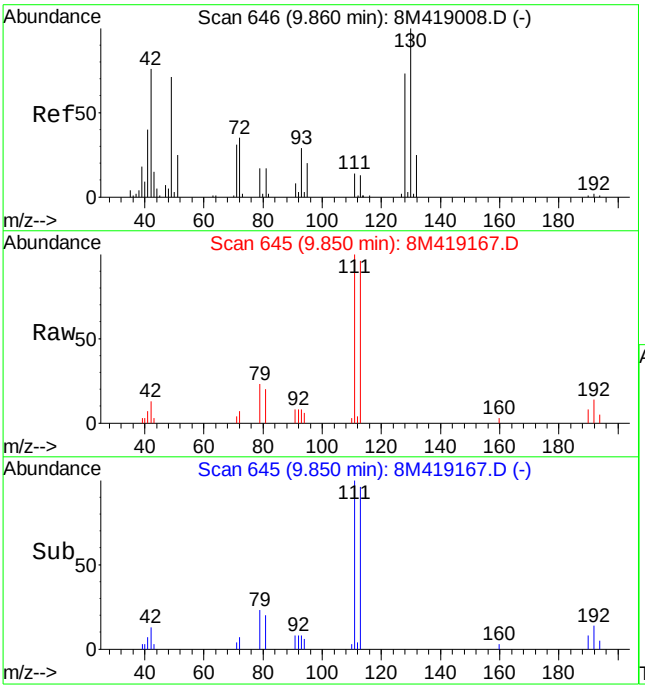
(#) = qualifier out of range (m) = manual integration
8M419167.D 8260WT.M Thu Apr 27 08:31:59 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419167.D Vial: 4
Acq On : 26 Apr 2017 9:27 Operator: TMB
Sample : WG611561-01 VBLK0426 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 9:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

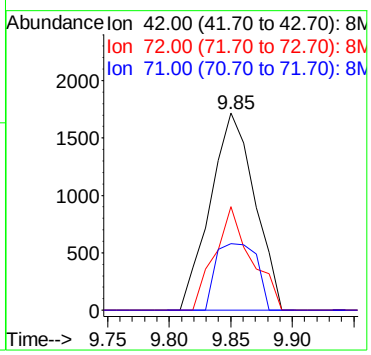




#36
Tetrahydrofuran
Concen: 3.91 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419167.D
Acq: 26 Apr 2017 9:27

Tgt Ion: 42 Resp: 4318

Ion	Ratio	Lower	Upper
42	100		
72	43.2	32.9	76.9
71	31.1	32.1	74.9#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	395669	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	296865	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	152225	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	107724	25.2096	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.838%			
34) 1,2-Dichloroethane-d4	4.962	65	102707	25.6428	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.571%			
47) Toluene-d8	6.815	98	381102	25.7232	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.893%			
66) p-Bromofluorobenzene	8.784	95	133452	26.1829	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.732%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	127554	27.1443	ug/L	100
3) Chloromethane	1.224	50	95534	20.7737	ug/L	100
4) Vinyl Chloride	1.273	62	120513	23.6657	ug/L	100
5) 1,3-Butadiene	1.285	54	100473	32.1345	ug/L	98
6) Bromomethane	1.464	94	79163	20.9093	ug/L	99
7) Chloroethane	1.537	64	48568	20.1043	ug/L	95
8) Trichlorofluoromethane	1.621	101	140836	21.5611	ug/L	100
9) Diethyl ether	1.849	59	218443	69.3479	ug/L	98
10) 1,1-Dichloroethene	1.965	61	120721	19.7521	ug/L	97
11) Carbon Disulfide	1.980	76	217353	16.5697	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	84408	21.6626	ug/L	99
13) Iodomethane	2.066	142	113958	20.5612	ug/L	99
14) Acrolein	2.229	56	35368	90.8971	ug/L	99
15) Methylene Chloride	2.408	84	89241	19.2428	ug/L	98
16) Acetone	2.475	43	16174	20.3305	ug/L	99
17) trans-1,2-Dichloroethene	2.544	96	83132	19.9761	ug/L	99
18) Methyl acetate	2.579	43	47091	22.5786	ug/L #	96
19) Methyl Tert Butyl Ether	2.660	73	217626	20.6057	ug/L	96
20) 1,1-Dichloroethane	3.123	63	151831	20.3129	ug/L	100
21) Acrylonitrile	3.190	53	21450	21.1389	ug/L	99
22) Vinyl Acetate	2.619	86	14188	21.1831	ug/L	87
23) cis-1,2-Dichloroethene	3.737	96	94040	19.9633	ug/L	98
24) 2,2-Dichloropropane	3.867	77	127707	21.7219	ug/L	97
25) Cyclohexane	3.969	56	119087	18.7316	ug/L #	88
26) Bromochloromethane	3.986	130	62515	20.5975	ug/L	99
27) Chloroform	4.119	83	158573	20.3480	ug/L	99
28) Carbon Tetrachloride	4.255	117	126582	20.5405	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	142715	20.8297	ug/L	98
31) 1,1-Dichloropropene	4.510	75	108869	20.2326	ug/L	98
32) 2-Butanone	4.539	43	25094	21.1577	ug/L	97
33) Benzene	4.800	78	336107	19.9426	ug/L	99
35) 1,2-Dichloroethane	5.037	62	106191	20.2351	ug/L	99
36) Methylcyclohexane	5.425	83	131192	19.6957	ug/L	99
37) Trichloroethene	5.448	130	94574	18.6823	ug/L	98
38) Dibromomethane	5.862	93	52948	20.5121	ug/L	99
39) 1,2-Dichloropropane	5.966	63	89345	20.2148	ug/L	100
40) Bromodichloromethane	6.053	83	116205	19.6986	ug/L	100
41) 1,4-Dioxane	6.262	88	3360	152.6294	ug/L	92
42) 2-Chloroethyl Vinyl Ether	6.632	63	46690	23.2898	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	145824	21.9364	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	23440	21.3451	ug/L	97
45) trans-1,3-Dichloropropene	7.243	75	117811	20.8466	ug/L	99
48) Toluene	6.858	91	370398	19.9009	ug/L	100
49) Tetrachloroethene	7.185	166	105214	19.8197	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	70918	19.6584	ug/L	99
51) Dibromochloromethane	7.507	129	95352	19.3643	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

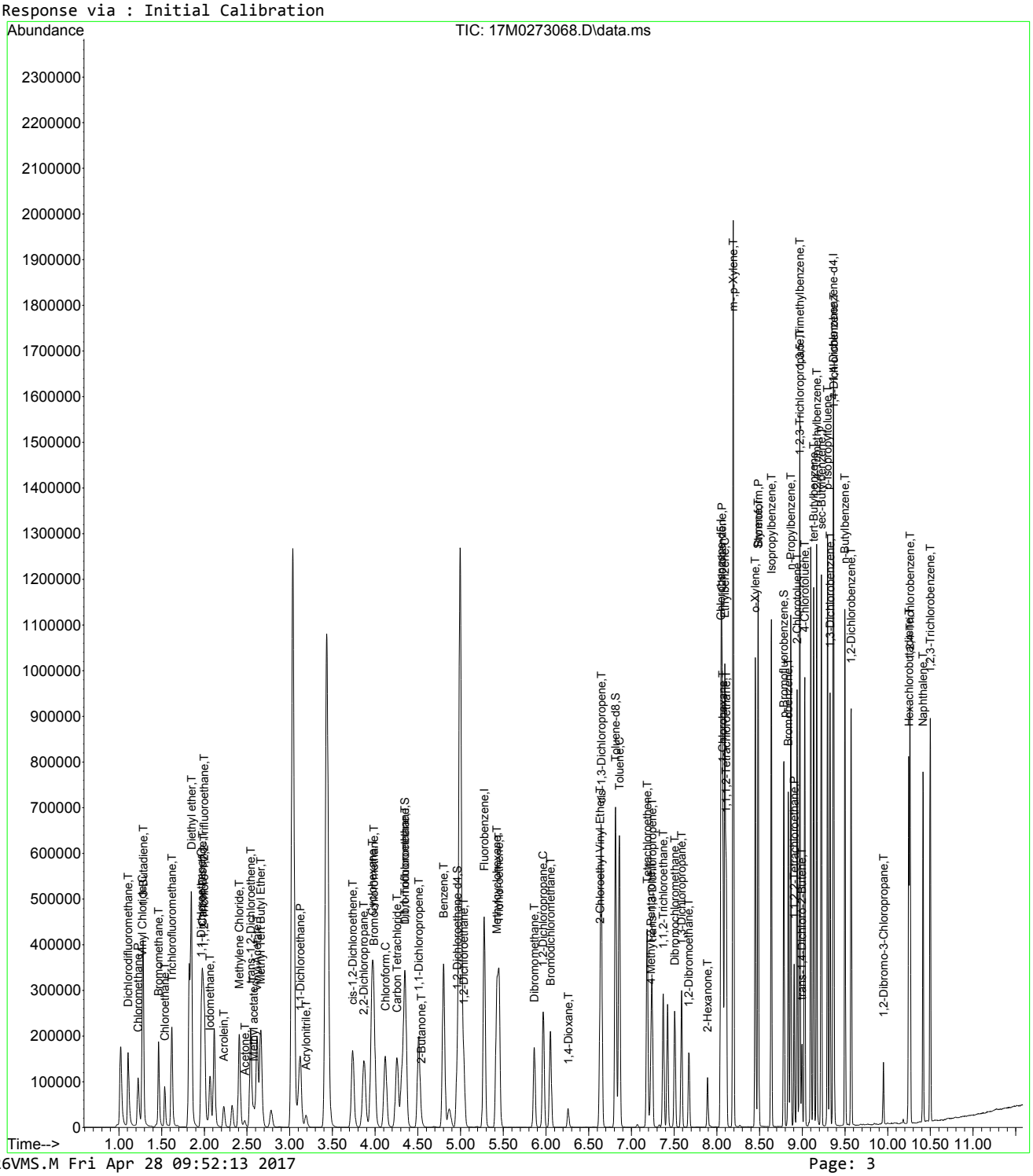
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	118833	20.7265	ug/L		98
53) 1,2-Dibromoethane	7.672	107	72527	19.6226	ug/L		99
54) 2-Hexanone	7.892	43	41953	22.1452	ug/L		98
55) Chlorobenzene	8.060	112	242776	19.4404	ug/L		96
56) 1-Chlorohexane	8.071	69	21596	21.4193	ug/L		96
57) Ethylbenzene	8.095	106	129447	19.9129	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.109	131	93213	19.1745	ug/L		99
59) m-,p-Xylene	8.193	106	313957	40.0178	ug/L		97
60) o-Xylene	8.451	106	154561	19.9949	ug/L		99
61) Styrene	8.482	104	252287	20.3975	ug/L		99
62) Bromoform	8.485	173	67961	19.6200	ug/L		99
63) Isopropylbenzene	8.639	105	392841	19.6335	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	338127	19.9251	ug/L		98
67) Bromobenzene	8.836	156	114040	19.0450	ug/L		99
68) n-Propylbenzene	8.865	91	447750	19.9183	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	86075	21.0209	ug/L		99
70) 2-Chlorotoluene	8.940	91	269257	19.4058	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	24363	20.1265	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.995	53	17268	19.1362	ug/L	#	94
73) 1,2,4-Trimethylbenzene	9.169	105	338169	19.7622	ug/L		100
74) 4-Chlorotoluene	9.030	91	278026	20.0709	ug/L		99
75) tert-Butylbenzene	9.134	134	65446	19.2969	ug/L		98
76) sec-Butylbenzene	9.224	105	416294	19.9124	ug/L		99
77) p-Isopropyltoluene	9.296	119	360953	20.2537	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	199617	19.1227	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	201286	19.0995	ug/L		100
80) n-Butylbenzene	9.499	91	311126	20.6842	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	196375	19.3024	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	15567	20.7230	ug/L		94
83) Hexachlorobutadiene	10.249	225	82183	19.1622	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	150424	19.9035	ug/L		100
85) Naphthalene	10.414	128	291228	19.7608	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	139223	18.9651	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Fri Apr 28 09:52:13 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	372242	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	276134	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	138671	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	102790	25.5688	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.275%			
34) 1,2-Dichloroethane-d4	4.962	65	97919	25.9860	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.944%			
47) Toluene-d8	6.815	98	358005	25.9784	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.914%			
66) p-Bromofluorobenzene	8.784	95	122508	26.3851	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.540%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	115030	26.0197	ug/L	100
3) Chloromethane	1.224	50	89330	20.6472	ug/L	100
4) Vinyl Chloride	1.270	62	112886	23.5630	ug/L	99
5) 1,3-Butadiene	1.279	54	97040	32.9898	ug/L	98
6) Bromomethane	1.461	94	61505	17.2677	ug/L	99
7) Chloroethane	1.537	64	47562	20.9270	ug/L	97
8) Trichlorofluoromethane	1.623	101	132487	21.5594	ug/L	99
9) Diethyl ether	1.844	59	183867	62.0448	ug/L	98
10) 1,1-Dichloroethene	1.965	61	115209	20.0366	ug/L	98
11) Carbon Disulfide	1.980	76	203000	16.4494	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	80053	21.8379	ug/L	98
13) Iodomethane	2.066	142	109216	20.9084	ug/L	99
14) Acrolein	2.226	56	27153	74.1761	ug/L	99
15) Methylene Chloride	2.408	84	83079	19.0415	ug/L	98
16) Acetone	2.469	43	11488	15.3491	ug/L	95
17) trans-1,2-Dichloroethene	2.538	96	75742	19.3458	ug/L	98
18) Methyl acetate	2.573	43	36576	18.6407	ug/L #	100
19) Methyl Tert Butyl Ether	2.657	73	192483	19.3721	ug/L #	53
20) 1,1-Dichloroethane	3.120	63	141490	20.1207	ug/L	100
21) Acrylonitrile	3.190	53	17909	18.7600	ug/L	100
22) Vinyl Acetate	2.617	86	12779	20.2802	ug/L	97
23) cis-1,2-Dichloroethene	3.734	96	86607	19.5425	ug/L	99
24) 2,2-Dichloropropane	3.867	77	117051	21.1695	ug/L	98
25) Cyclohexane	3.969	56	107338	17.9461	ug/L #	88
26) Bromochloromethane	3.986	130	57486	20.1326	ug/L	100
27) Chloroform	4.116	83	147060	20.0583	ug/L	99
28) Carbon Tetrachloride	4.252	117	117263	20.2258	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	132040	20.4845	ug/L	99
31) 1,1-Dichloropropene	4.507	75	100562	19.8650	ug/L	99
32) 2-Butanone	4.536	43	19009	17.0359	ug/L	98
33) Benzene	4.800	78	311380	19.6382	ug/L	99
35) 1,2-Dichloroethane	5.037	62	95900	19.4242	ug/L	99
36) Methylcyclohexane	5.425	83	117058	18.6797	ug/L	99
37) Trichloroethene	5.451	130	87331	18.3373	ug/L	98
38) Dibromomethane	5.862	93	48086	19.8009	ug/L	100
39) 1,2-Dichloropropane	5.966	63	81390	19.5739	ug/L	100
40) Bromodichloromethane	6.050	83	106987	19.2774	ug/L	100
41) 1,4-Dioxane	6.262	88	1257	60.6933	ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.630	63	36557	19.3829	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	131620	21.0458	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19445	18.8215	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	105251	19.7962	ug/L	99
48) Toluene	6.858	91	343748	19.8556	ug/L	99
49) Tetrachloroethene	7.185	166	96627	19.5686	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	64747	19.2953	ug/L	99
51) Dibromochloromethane	7.507	129	87312	19.0628	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

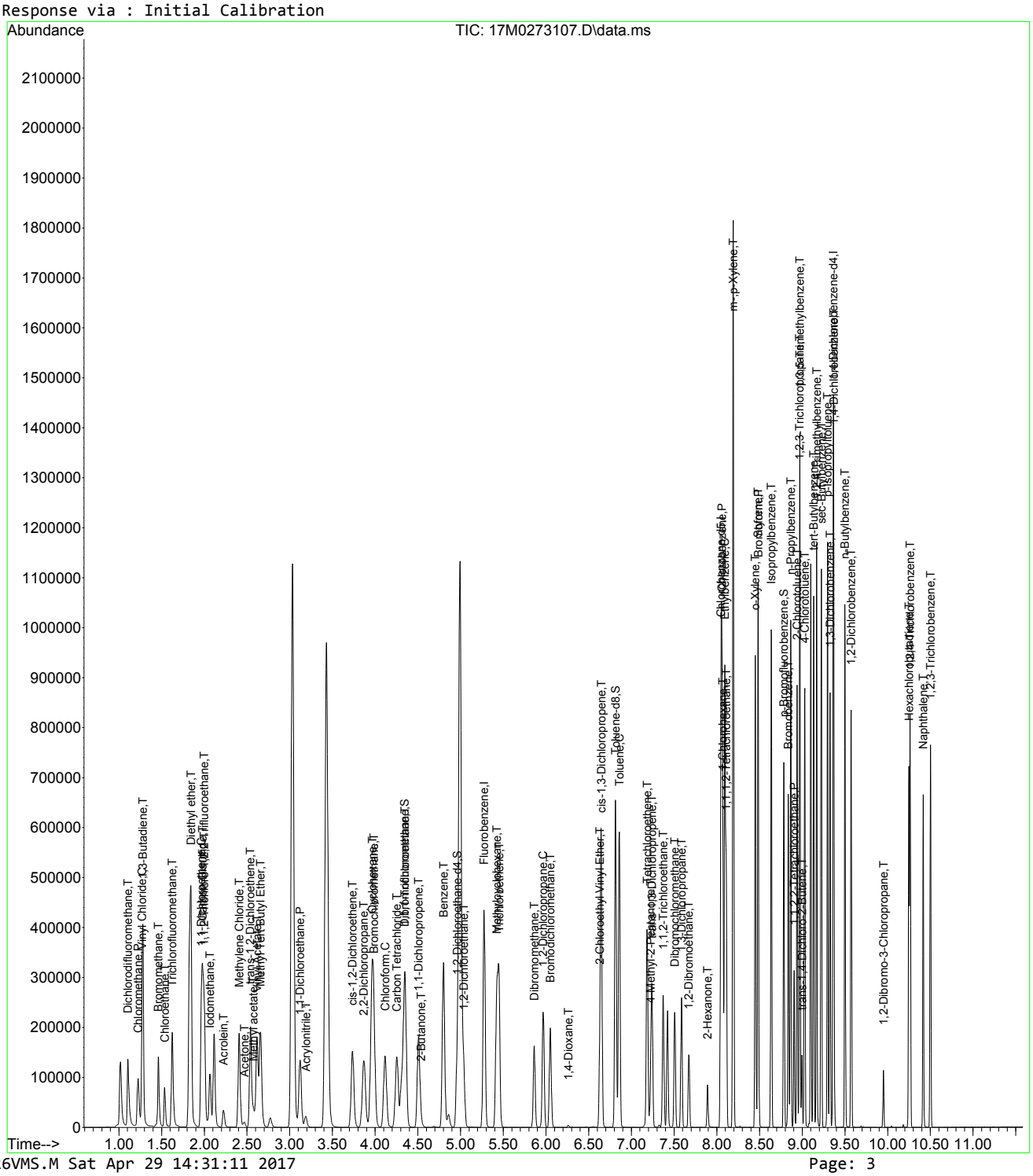
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	107884	20.2295 ug/L	99
53) 1,2-Dibromoethane	7.672	107	65753	19.1254 ug/L	100
54) 2-Hexanone	7.892	43	33529	19.0273 ug/L	99
55) Chlorobenzene	8.060	112	221900	19.1027 ug/L	98
56) 1-Chlorohexane	8.071	69	19494	20.7861 ug/L	98
57) Ethylbenzene	8.095	106	118953	19.6724 ug/L	97
58) 1,1,1,2-Tetrachloroethane	8.109	131	85234	18.8495 ug/L	98
59) m-,p-Xylene	8.193	106	288282	39.5039 ug/L	98
60) o-Xylene	8.451	106	139340	19.3791 ug/L	99
61) Styrene	8.483	104	229413	19.9407 ug/L	99
62) Bromoform	8.485	173	62073	19.2656 ug/L	100
63) Isopropylbenzene	8.636	105	359008	19.2897 ug/L	99
65) 1,3,5-Trimethylbenzene	8.972	105	306580	19.8319 ug/L	99
67) Bromobenzene	8.836	156	103205	18.9201 ug/L	99
68) n-Propylbenzene	8.865	91	407450	19.8972 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	78479	21.0392 ug/L	100
70) 2-Chlorotoluene	8.940	91	243883	19.2951 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	21151	19.1809 ug/L	98
72) trans-1,4-Dichloro-2-B...	8.998	53	13863	16.8644 ug/L #	91
73) 1,2,4-Trimethylbenzene	9.169	105	311723	19.9973 ug/L	99
74) 4-Chlorotoluene	9.030	91	252763	20.0306 ug/L	99
75) tert-Butylbenzene	9.134	134	60611	19.6181 ug/L	98
76) sec-Butylbenzene	9.224	105	380261	19.9667 ug/L	99
77) p-Isopropyltoluene	9.296	119	327254	20.1576 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	182319	19.1728 ug/L	100
79) 1,4-Dichlorobenzene	9.369	146	182093	18.9671 ug/L	100
80) n-Butylbenzene	9.499	91	281662	20.5557 ug/L	98
81) 1,2-Dichlorobenzene	9.574	146	178441	19.2540 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13434	19.6315 ug/L	92
83) Hexachlorobutadiene	10.249	225	73724	18.8700 ug/L	99
84) 1,2,4-Trichlorobenzene	10.263	180	129546	18.8164 ug/L	99
85) Naphthalene	10.417	128	247958	18.4693 ug/L	100
86) 1,2,3-Trichlorobenzene	10.501	180	124865	18.6717 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:11 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	759307	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	609137	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	323407	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	201261	25.2706 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.08%		
43) 1,2-Dichloroethane-d4	10.52	65	169095	24.5595 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.24%		
58) Toluene-d8	12.90	98	744185	26.7379 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.96%		
80) p-Bromofluorobenzene	16.29	95	287174	25.1598 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.64%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	213080	20.7362 ug/L	100
3) Chloromethane	3.80	50	268002	20.8619 ug/L	97
4) Vinyl Chloride	4.04	62	237969	19.6150 ug/L	99
5) 1,3-Butadiene	4.08	54	137880	25.5790 ug/L	95
6) Bromomethane	4.95	94	77679	20.7951 ug/L	100
7) Chloroethane	5.12	64	111905	21.1169 ug/L	96
8) Trichlorofluoromethane	5.60	101	259101	19.6633 ug/L	100
9) Diethyl ether	6.13	59	423113	85.2581 ug/L	91
10) Isoprene	6.17	67	213578	20.5001 ug/L	90
11) Acrolein	6.37	56	58183	84.6552 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	156990	20.8932 ug/L	99
13) Acetone	6.47	43	18569	17.3881 ug/L	87
14) 1,1-Dichloroethene	6.69	61	200945	18.2732 ug/L	97
15) Tert-Butyl Alcohol	6.80	59	58962	170.3268 ug/L	99
16) Dimethyl Sulfide	6.96	62	154138	21.0438 ug/L	90
17) Iodomethane	7.21	142	45814	13.9455 ug/L	93
18) Methyl acetate	7.21	43	51360	17.5630 ug/L	91
19) Methylene Chloride	7.47	84	142908	18.0836 ug/L	83
20) Carbon Disulfide	7.52	76	384856	16.8319 ug/L	99
21) Acrylonitrile	7.66	53	27206	18.3657 ug/L	95
22) Methyl Tert Butyl Ether	7.68	73	278685	17.8979 ug/L	96
23) trans-1,2-Dichloroethene	7.93	61	197068	18.4197 ug/L	96
24) n-Hexane	8.00	57	178697	20.0099 ug/L	91
25) Diisopropyl ether	8.34	45	2308181	96.3859 ug/L	95
26) Vinyl Acetate	8.51	43	200226	18.6422 ug/L	94
27) 1,1-Dichloroethane	8.55	63	260276	18.9025 ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1792767	88.0286 ug/L	98
29) 2-Butanone	9.10	43	27842	16.6250 ug/L	91
30) Propionitrile	9.21	54	46506	89.5970 ug/L	100
31) 2,2-Dichloropropane	9.32	77	220728	18.9893 ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	168445	19.0483 ug/L	96
33) Chloroform	9.59	83	272854	17.8842 ug/L	97
34) 1-Bromopropane	9.73	122	42347	24.2749 ug/L	100
35) Bromochloromethane	9.83	130	93298	19.5519 ug/L	94
36) Tetrahydrofuran	9.85	42	100352	87.0487 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	243178	19.7506 ug/L	99
39) Cyclohexane	10.16	56	203320	17.7366 ug/L	91
40) 1,1-Dichloropropene	10.32	75	201733	18.7653 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1675260	91.8632 ug/L	98
42) Carbon Tetrachloride	10.47	117	225694	19.7692 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419119.D 8260WT.M Mon Apr 24 14:27:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

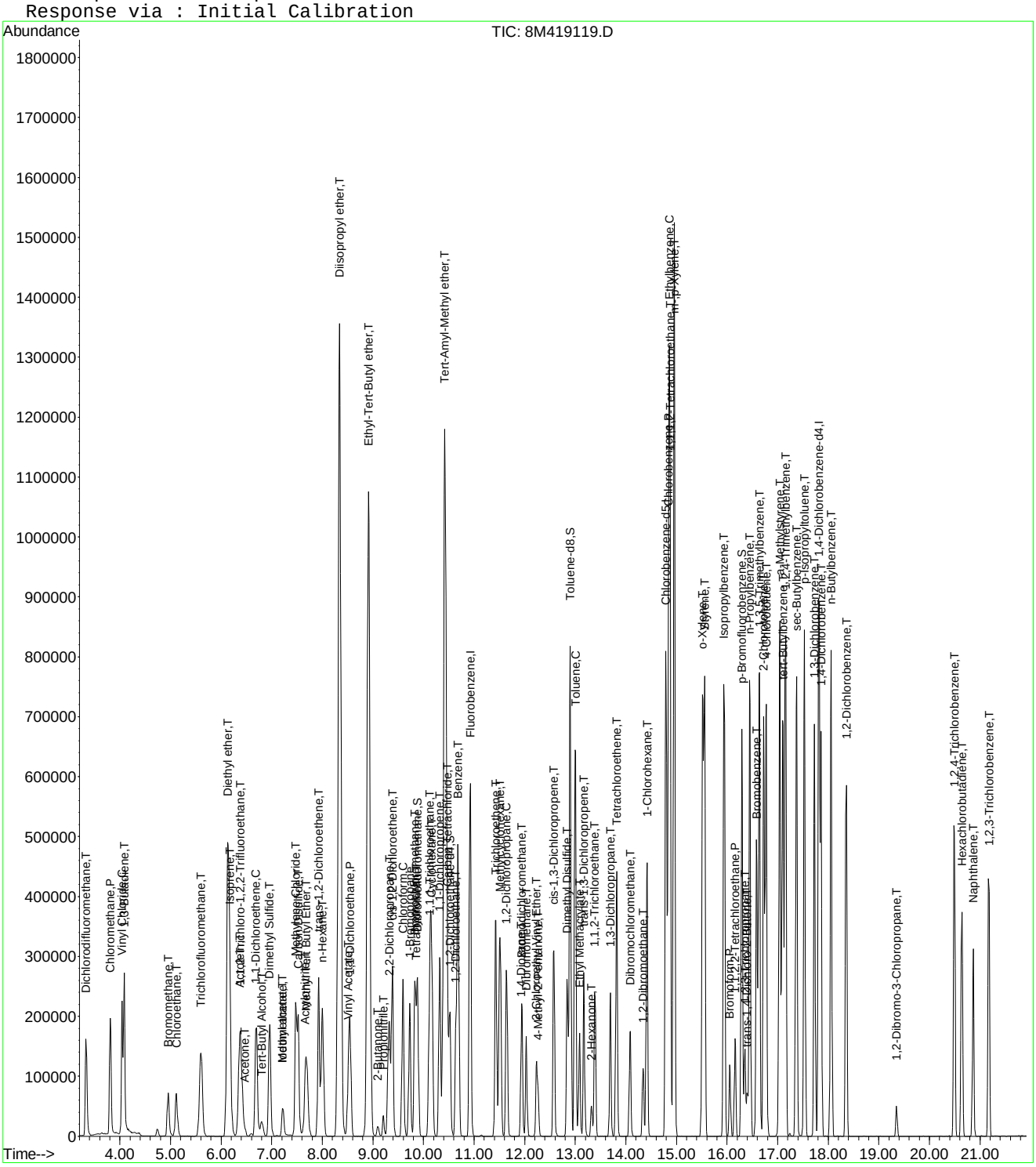
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	160479	18.6016	ug/L	96
46)	Benzene	10.68	78	605936	19.3169	ug/L	96
47)	Trichloroethene	11.43	130	162622	18.4550	ug/L	98
48)	Methylcyclohexane	11.51	83	223175	18.9995	ug/L	95
49)	1,2-Dichloropropane	11.64	63	142777	18.6360	ug/L	96
50)	Bromodichloromethane	11.94	83	185961	18.5476	ug/L	98
51)	1,4-Dioxane	11.93	88	7767	177.8117	ug/L	92
52)	Dibromomethane	12.03	93	74195	18.8182	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	61262	18.4806	ug/L	98
54)	4-Methyl-2-Pentanone	12.26	58	25658	17.2800	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	227725	19.9439	ug/L	100
56)	Dimethyl Disulfide	12.84	79	103956	17.9054	ug/L	86
59)	Toluene	13.00	91	663143	19.5579	ug/L	98
60)	Ethyl Methacrylate	13.09	69	126453	19.7677	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	175285	17.8258	ug/L	100
63)	1,1,2-Trichloroethane	13.38	97	99109	17.7664	ug/L	96
64)	2-Hexanone	13.32	58	24364	17.7966	ug/L	89
65)	1,3-Dichloropropane	13.69	76	174508	18.5048	ug/L	87
66)	Tetrachloroethene	13.82	164	139808	19.6299	ug/L	98
67)	Dibromochloromethane	14.09	129	131999	18.4140	ug/L	99
68)	1,2-Dibromoethane	14.34	107	98542	18.0844	ug/L	99
69)	1-Chlorohexane	14.42	91	225115	20.9849	ug/L	93
70)	Chlorobenzene	14.84	112	444143	18.4020	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.87	131	158578	18.5141	ug/L	99
72)	Ethylbenzene	14.86	106	248444	18.3790	ug/L	93
73)	m-,p-Xylene	14.96	106	609510	38.9348	ug/L	95
74)	o-Xylene	15.51	106	291483	18.5201	ug/L	99
75)	Styrene	15.56	104	494664	20.0474	ug/L	95
76)	Bromoform	16.05	173	75215	15.5559	ug/L	98
77)	Isopropylbenzene	15.94	105	732255	19.4311	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.15	83	109550	17.9523	ug/L	98
81)	1,2,3-Trichloropropane	16.35	110	31375	17.9340	ug/L	70
82)	trans-1,4-Dichloro-2-Buten	16.39	53	19067	13.3515	ug/L	81
83)	n-Propylbenzene	16.44	91	869593	19.2111	ug/L	99
84)	Bromobenzene	16.59	156	196820	18.5576	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	637517	19.4511	ug/L	99
86)	2-Chlorotoluene	16.72	91	538267	17.4184	ug/L	94
87)	4-Chlorotoluene	16.77	91	555475	19.9461	ug/L	100
88)	a-Methylstyrene	17.04	118	381126	20.7416	ug/L	98
89)	tert-Butylbenzene	17.11	134	137003	18.4623	ug/L	93
90)	1,2,4-Trimethylbenzene	17.16	105	666069	19.9062	ug/L	99
91)	sec-Butylbenzene	17.37	105	794994	19.3660	ug/L	100
92)	p-Isopropyltoluene	17.53	119	686446	19.8585	ug/L	99
93)	1,3-Dichlorobenzene	17.73	146	381428	18.5543	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	379918	18.1778	ug/L	100
95)	n-Butylbenzene	18.06	91	628355	20.1797	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	333923	18.4904	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	16276	16.3884	ug/L	94
98)	1,2,4-Trichlorobenzene	20.50	180	227660	18.7243	ug/L	99
99)	Hexachlorobutadiene	20.64	225	102887	18.1850	ug/L	98
100)	Naphthalene	20.87	128	322711	18.5733	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	185889	18.4107	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419119.D 8260WT.M Mon Apr 24 14:27:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419119.D Vial: 5
Acq On : 24 Apr 2017 13:13 Operator: TMB
Sample : WG611301-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 13:35 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419119.D 8260WT.M Mon Apr 24 14:27:16 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419142.D Vial: 7
Acq On : 25 Apr 2017 14:15 Operator: TMB
Sample : WG611408-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 14:37:21 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	821058	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	659546	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	358594	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	218208	25.3379	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.36%			
43) 1,2-Dichloroethane-d4	10.52	65	190453	25.5811	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.32%			
58) Toluene-d8	12.90	98	796236	26.4216	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.68%			
80) p-Bromofluorobenzene	16.29	95	318698	25.1818	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.72%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	238122	21.4304	ug/L	100
3) Chloromethane	3.81	50	299693	21.5743	ug/L	98
4) Vinyl Chloride	4.04	62	266211	20.2926	ug/L	99
5) 1,3-Butadiene	4.08	54	155303	26.9397	ug/L	96
6) Bromomethane	4.95	94	96388	23.4317	ug/L	97
7) Chloroethane	5.11	64	123143	21.4899	ug/L	96
8) Trichlorofluoromethane	5.59	101	286290	20.0926	ug/L	100
9) Diethyl ether	6.13	59	491618	91.6117	ug/L	91
10) Isoprene	6.16	67	235946	20.9438	ug/L	91
11) Acrolein	6.37	56	63882	85.9566	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	175537	21.6046	ug/L	99
13) Acetone	6.46	43	22663	19.6257	ug/L	91
14) 1,1-Dichloroethene	6.69	61	228139	19.1858	ug/L	96
15) Tert-Butyl Alcohol	6.80	59	69832	186.5559	ug/L	99
16) Dimethyl Sulfide	6.96	62	170419	21.5167	ug/L	89
17) Iodomethane	7.22	142	40587	11.4253	ug/L	95
18) Methyl acetate	7.22	43	63645	20.1271	ug/L	89
19) Methylene Chloride	7.47	84	161728	18.9259	ug/L	83
20) Carbon Disulfide	7.53	76	419858	16.9817	ug/L	100
21) Acrylonitrile	7.66	53	31671	19.7719	ug/L	95
22) Methyl Tert Butyl Ether	7.69	73	327525	19.4526	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	223267	19.2990	ug/L	95
24) n-Hexane	8.00	57	190904	19.7690	ug/L	92
25) Diisopropyl ether	8.34	45	2619917	101.1754	ug/L	95
26) Vinyl Acetate	8.51	43	211098	18.1763	ug/L	94
27) 1,1-Dichloroethane	8.55	63	287054	19.2793	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	2082254	94.5534	ug/L	97
29) 2-Butanone	9.10	43	35779	19.7575	ug/L	87
30) Propionitrile	9.20	54	54842	97.7105	ug/L	99
31) 2,2-Dichloropropane	9.31	77	224525	17.8632	ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	184290	19.2728	ug/L	94
33) Chloroform	9.59	83	301234	18.2594	ug/L	97
34) 1-Bromopropane	9.73	122	46147	24.4637	ug/L	98
35) Bromochloromethane	9.83	130	102421	19.8495	ug/L	92
36) Tetrahydrofuran	9.85	42	123782	99.2973	ug/L	86
38) 1,1,1-Trichloroethane	10.13	97	271909	20.4232	ug/L	99
39) Cyclohexane	10.16	56	225973	18.2302	ug/L	91
40) 1,1-Dichloropropene	10.32	75	225222	19.3746	ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1970513	99.9268	ug/L	97
42) Carbon Tetrachloride	10.46	117	251465	20.3700	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419142.D 8260WT.M Tue Apr 25 15:59:36 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419142.D Vial: 7
Acq On : 25 Apr 2017 14:15 Operator: TMB
Sample : WG611408-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 14:37:21 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

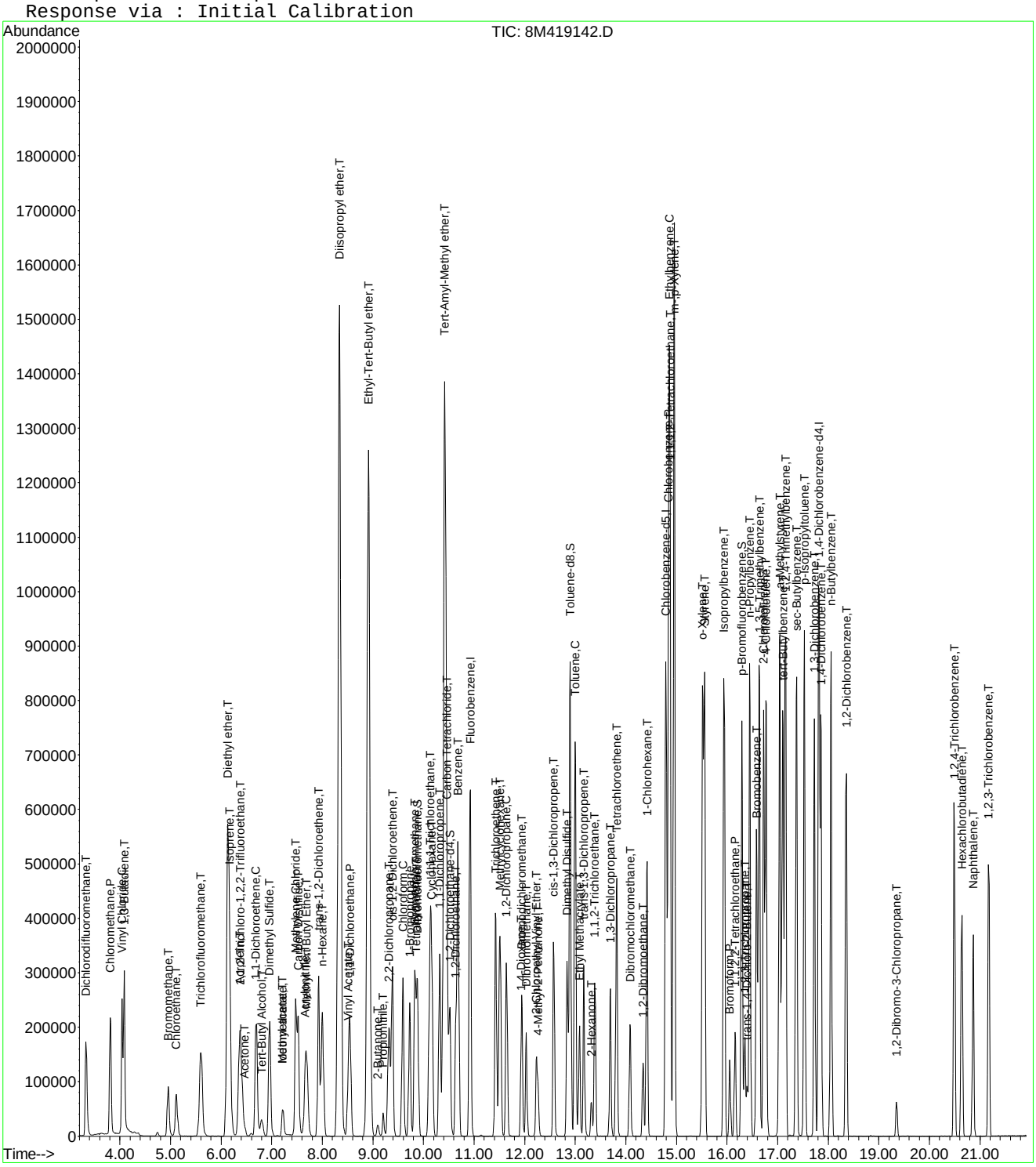
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	183450	19.6650	ug/L	96
46)	Benzene	10.68	78	663120	19.5499	ug/L	95
47)	Trichloroethene	11.43	130	183182	19.2247	ug/L	98
48)	Methylcyclohexane	11.52	83	245432	19.3229	ug/L	94
49)	1,2-Dichloropropane	11.64	63	158834	19.1726	ug/L	96
50)	Bromodichloromethane	11.94	83	209377	19.3125	ug/L	98
51)	1,4-Dioxane	11.93	88	8184	173.2672	ug/L	89
52)	Dibromomethane	12.03	93	84652	19.8556	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.23	63	70693	19.7217	ug/L	100
54)	4-Methyl-2-Pentanone	12.26	58	31747	19.7727	ug/L	100
55)	cis-1,3-Dichloropropene	12.57	75	254943	20.6484	ug/L	98
56)	Dimethyl Disulfide	12.84	79	123884	19.4160	ug/L	86
59)	Toluene	12.99	91	736470	20.0604	ug/L	98
60)	Ethyl Methacrylate	13.09	69	151502	21.8733	ug/L	87
62)	trans-1,3-Dichloropropene	13.17	75	199340	18.7227	ug/L	99
63)	1,1,2-Trichloroethane	13.39	97	115148	19.0640	ug/L	96
64)	2-Hexanone	13.32	58	29959	20.2109	ug/L	87
65)	1,3-Dichloropropane	13.70	76	204648	20.0423	ug/L	87
66)	Tetrachloroethene	13.82	164	155332	20.1426	ug/L	98
67)	Dibromochloromethane	14.09	129	148513	19.1342	ug/L	100
68)	1,2-Dibromoethane	14.34	107	114923	19.4786	ug/L	100
69)	1-Chlorohexane	14.42	91	245273	21.1165	ug/L	92
70)	Chlorobenzene	14.84	112	487493	18.6543	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	175802	18.9563	ug/L	98
72)	Ethylbenzene	14.86	106	274155	18.7309	ug/L	93
73)	m-,p-Xylene	14.96	106	675551	39.8552	ug/L	95
74)	o-Xylene	15.52	106	323592	18.9888	ug/L	100
75)	Styrene	15.56	104	542136	20.2921	ug/L	96
76)	Bromoform	16.05	173	88981	16.9435	ug/L	99
77)	Isopropylbenzene	15.94	105	817382	20.0322	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.16	83	128466	18.9863	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	39522	20.3742	ug/L	64
82)	trans-1,4-Dichloro-2-Buten	16.39	53	23698	14.8901	ug/L	86
83)	n-Propylbenzene	16.45	91	968999	19.3066	ug/L	100
84)	Bromobenzene	16.59	156	221882	18.8678	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	707238	19.4609	ug/L	99
86)	2-Chlorotoluene	16.72	91	603755	17.6205	ug/L	94
87)	4-Chlorotoluene	16.77	91	615831	19.9435	ug/L	100
88)	a-Methylstyrene	17.04	118	416017	20.4188	ug/L	96
89)	tert-Butylbenzene	17.11	134	153148	18.6129	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	739731	19.9383	ug/L	98
91)	sec-Butylbenzene	17.38	105	885075	19.4447	ug/L	100
92)	p-Isopropyltoluene	17.53	119	757219	19.7564	ug/L	99
93)	1,3-Dichlorobenzene	17.73	146	429495	18.8424	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	427739	18.4577	ug/L	99
95)	n-Butylbenzene	18.06	91	688901	19.9532	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	382576	19.1058	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	20794	18.8830	ug/L	99
98)	1,2,4-Trichlorobenzene	20.50	180	258041	19.1406	ug/L	99
99)	Hexachlorobutadiene	20.64	225	112174	17.8810	ug/L	99
100)	Naphthalene	20.87	128	386523	20.0631	ug/L	100
101)	1,2,3-Trichlorobenzene	21.17	180	214826	19.1889	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419142.D 8260WT.M Tue Apr 25 15:59:36 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419142.D Vial: 7
Acq On : 25 Apr 2017 14:15 Operator: TMB
Sample : WG611408-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 14:37 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419142.D 8260WT.M Tue Apr 25 15:59:37 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	767268	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	623663	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	337676	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	204297	25.3857	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.52	65	181120	26.0330	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.12%			
58) Toluene-d8	12.90	98	747586	26.2345	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%			
80) p-Bromofluorobenzene	16.29	95	299616	25.1406	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.56%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	263719	25.3980	ug/L	100
3) Chloromethane	3.81	50	293571	22.6151	ug/L	97
4) Vinyl Chloride	4.04	62	275534	22.4757	ug/L	98
5) 1,3-Butadiene	4.09	54	150161	28.1225	ug/L	96
6) Bromomethane	4.95	94	91669	23.7898	ug/L	99
7) Chloroethane	5.11	64	123581	23.0783	ug/L	96
8) Trichlorofluoromethane	5.59	101	287846	21.6181	ug/L	99
9) Diethyl ether	6.12	59	463584	92.4439	ug/L	90
10) Isoprene	6.16	67	209614	19.9109	ug/L	89
11) Acrolein	6.36	56	62938	90.6235	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	170435	22.4472	ug/L	100
13) Acetone	6.46	43	22162	20.5373	ug/L	93
14) 1,1-Dichloroethene	6.69	61	206204	18.5569	ug/L	94
15) Tert-Butyl Alcohol	6.79	59	68880	196.9130	ug/L	99
16) Dimethyl Sulfide	6.96	62	156462	21.1394	ug/L	89
17) Iodomethane	7.22	142	63202	19.0387	ug/L	97
18) Methyl acetate	7.22	43	61800	20.9138	ug/L	89
19) Methylene Chloride	7.48	84	148087	18.5445	ug/L	82
20) Carbon Disulfide	7.52	76	373830	16.1800	ug/L	100
21) Acrylonitrile	7.65	53	32181	21.4987	ug/L	99
22) Methyl Tert Butyl Ether	7.68	73	314934	20.0161	ug/L	94
23) trans-1,2-Dichloroethene	7.92	61	204407	18.9075	ug/L	95
24) n-Hexane	8.00	57	174584	19.3465	ug/L	89
25) Diisopropyl ether	8.33	45	2456058	101.4969	ug/L	95
26) Vinyl Acetate	8.51	43	222666	20.5164	ug/L	94
27) 1,1-Dichloroethane	8.54	63	265884	19.1094	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1951527	94.8298	ug/L	97
29) 2-Butanone	9.09	43	34704	20.5074	ug/L	91
30) Propionitrile	9.20	54	52702	100.4805	ug/L	99
31) 2,2-Dichloropropane	9.32	77	224273	19.0941	ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	170801	19.1143	ug/L	94
33) Chloroform	9.59	83	280106	18.1690	ug/L	98
34) 1-Bromopropane	9.73	122	41598	23.5982	ug/L	97
35) Bromochloromethane	9.82	130	96613	20.0366	ug/L	92
36) Tetrahydrofuran	9.84	42	120381	103.3391	ug/L	84
38) 1,1,1-Trichloroethane	10.12	97	248355	19.9618	ug/L	100
39) Cyclohexane	10.15	56	215667	18.6185	ug/L	90
40) 1,1-Dichloropropene	10.32	75	207754	19.1249	ug/L	97
41) Tert-Amyl-Methyl ether	10.42	73	1851884	100.4947	ug/L	97
42) Carbon Tetrachloride	10.46	117	234277	20.3081	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419168.D 8260WT.M Wed Apr 26 13:01:13 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

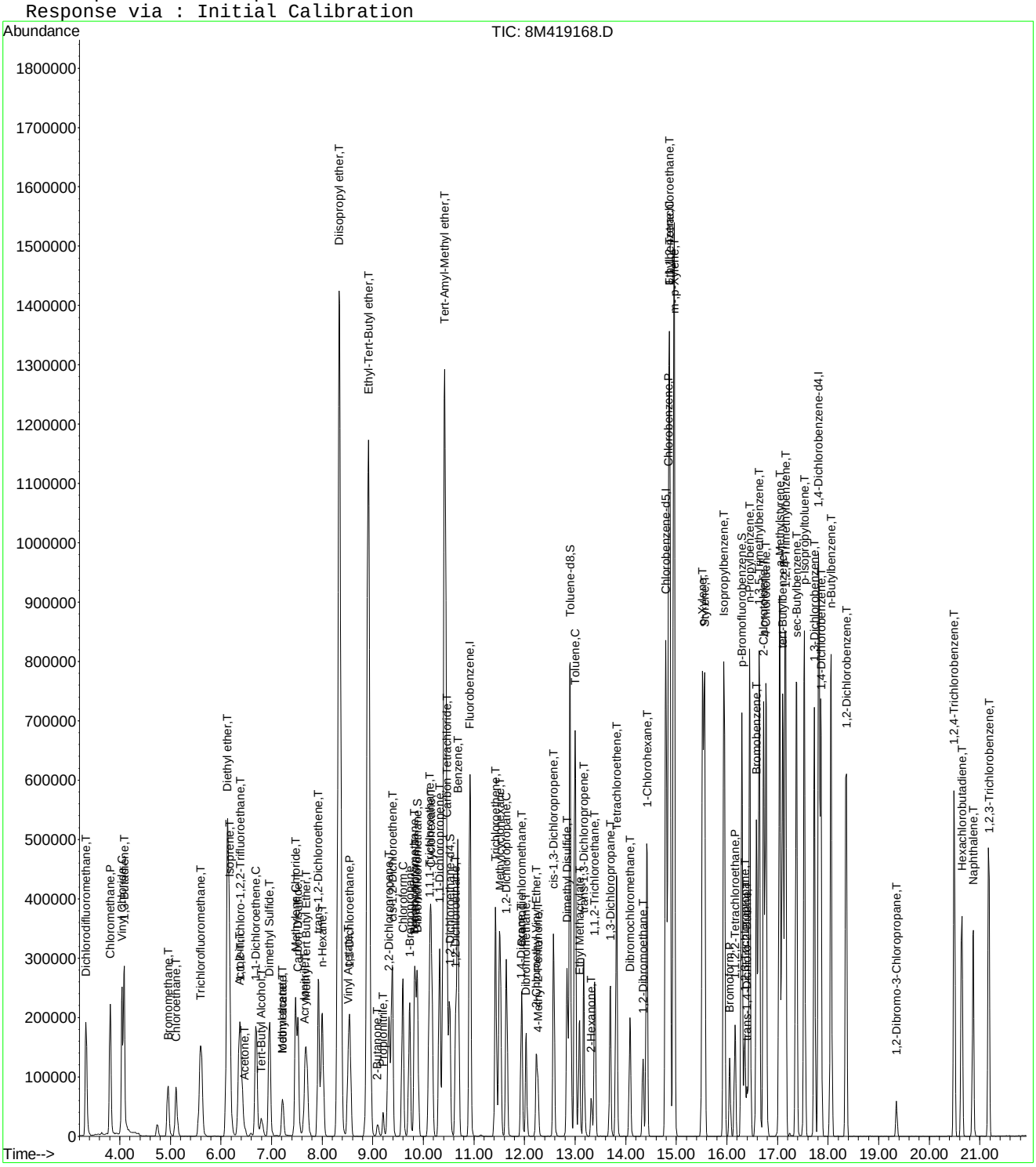
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	173102	19.8566	ug/L		96
46)	Benzene	10.68	78	619325	19.5388	ug/L		96
47)	Trichloroethene	11.42	130	165244	18.5579	ug/L		98
48)	Methylcyclohexane	11.52	83	235087	19.8060	ug/L		95
49)	1,2-Dichloropropane	11.64	63	149605	19.3246	ug/L		92
50)	Bromodichloromethane	11.94	83	194703	19.2180	ug/L		98
51)	1,4-Dioxane	11.93	88	8014	181.5627	ug/L		90
52)	Dibromomethane	12.02	93	80403	20.1811	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	68315	20.3944	ug/L		97
54)	4-Methyl-2-Pentanone	12.26	58	31571	21.0416	ug/L		99
55)	cis-1,3-Dichloropropene	12.57	75	238040	20.6310	ug/L		98
56)	Dimethyl Disulfide	12.84	79	110304	18.6462	ug/L		89
59)	Toluene	12.99	91	684862	19.7280	ug/L		98
60)	Ethyl Methacrylate	13.09	69	147633	22.5411	ug/L		85
62)	trans-1,3-Dichloropropene	13.17	75	190398	18.9117	ug/L		99
63)	1,1,2-Trichloroethane	13.39	97	108167	18.9386	ug/L		97
64)	2-Hexanone	13.32	58	28983	20.6774	ug/L	#	40
65)	1,3-Dichloropropane	13.70	76	192373	19.9241	ug/L		86
66)	Tetrachloroethene	13.82	164	143451	19.6722	ug/L		99
67)	Dibromochloromethane	14.08	129	140341	19.1217	ug/L		100
68)	1,2-Dibromoethane	14.34	107	107858	19.3330	ug/L		99
69)	1-Chlorohexane	14.42	91	240448	21.8922	ug/L		92
70)	Chlorobenzene	14.84	112	451096	18.2547	ug/L		98
71)	1,1,1,2-Tetrachloroethane	14.87	131	165290	18.8483	ug/L		99
72)	Ethylbenzene	14.87	106	255842	18.4855	ug/L		93
73)	m-,p-Xylene	14.96	106	622652	38.8479	ug/L		93
74)	o-Xylene	15.52	106	300743	18.6634	ug/L		99
75)	Styrene	15.56	104	510321	20.2002	ug/L		95
76)	Bromoform	16.05	173	83352	16.7902	ug/L		99
77)	Isopropylbenzene	15.94	105	762244	19.7557	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	126036	19.7811	ug/L		98
81)	1,2,3-Trichloropropane	16.35	110	36404	19.9293	ug/L		65
82)	trans-1,4-Dichloro-2-Buten	16.39	53	21952	14.6577	ug/L		85
83)	n-Propylbenzene	16.45	91	909042	19.2340	ug/L		100
84)	Bromobenzene	16.58	156	205599	18.5662	ug/L		99
85)	1,3,5-Trimethylbenzene	16.63	105	650918	19.0207	ug/L		98
86)	2-Chlorotoluene	16.73	91	573615	17.7779	ug/L		94
87)	4-Chlorotoluene	16.77	91	565154	19.4361	ug/L		99
88)	a-Methylstyrene	17.05	118	402232	20.9652	ug/L		98
89)	tert-Butylbenzene	17.10	134	139843	18.0487	ug/L		92
90)	1,2,4-Trimethylbenzene	17.16	105	689191	19.7268	ug/L		99
91)	sec-Butylbenzene	17.38	105	817361	19.0695	ug/L		99
92)	p-Isopropyltoluene	17.53	119	707309	19.5974	ug/L		98
93)	1,3-Dichlorobenzene	17.73	146	396242	18.4604	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	400910	18.3717	ug/L		99
95)	n-Butylbenzene	18.06	91	648966	19.9609	ug/L		99
96)	1,2-Dichlorobenzene	18.36	146	356124	18.8865	ug/L		97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18465	17.8068	ug/L		92
98)	1,2,4-Trichlorobenzene	20.49	180	240854	18.9724	ug/L		100
99)	Hexachlorobutadiene	20.64	225	101980	17.2630	ug/L		99
100)	Naphthalene	20.87	128	372565	20.5365	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	203385	19.2923	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419168.D 8260WT.M Wed Apr 26 13:01:13 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419168.D Vial: 5
Acq On : 26 Apr 2017 9:56 Operator: TMB
Sample : WG611561-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06:32 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	776037	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	627617	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	334340	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	205643	25.2642 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.04%		
43) 1,2-Dichloroethane-d4	10.52	65	175717	24.9711 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.88%		
58) Toluene-d8	12.90	98	752402	26.2372 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.96%		
80) p-Bromofluorobenzene	16.29	95	297255	25.1914 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.76%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	229689	21.8707 ug/L	99
3) Chloromethane	3.81	50	279327	21.2747 ug/L	97
4) Vinyl Chloride	4.04	62	241094	19.4441 ug/L	98
5) 1,3-Butadiene	4.08	54	142087	25.8498 ug/L	97
6) Bromomethane	4.95	94	87210	22.5629 ug/L	98
7) Chloroethane	5.12	64	117395	21.6754 ug/L	98
8) Trichlorofluoromethane	5.60	101	271258	20.1421 ug/L	99
9) Diethyl ether	6.13	59	455563	89.8179 ug/L	92
10) Isoprene	6.17	67	222672	20.9122 ug/L	91
11) Acrolein	6.37	56	61691	87.8242 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	165319	21.5274 ug/L	99
13) Acetone	6.47	43	20044	18.3646 ug/L	95
14) 1,1-Dichloroethene	6.70	61	211582	18.8257 ug/L	99
15) Tert-Butyl Alcohol	6.80	59	66736	188.6280 ug/L	99
16) Dimethyl Sulfide	6.96	62	161228	21.5372 ug/L	90
17) Iodomethane	7.21	142	52638	15.6773 ug/L	96
18) Methyl acetate	7.22	43	56392	18.8680 ug/L	91
19) Methylene Chloride	7.47	84	150809	18.6720 ug/L	83
20) Carbon Disulfide	7.52	76	403523	17.2678 ug/L	100
21) Acrylonitrile	7.66	53	28661	18.9308 ug/L	99
22) Methyl Tert Butyl Ether	7.69	73	301936	18.9732 ug/L	93
23) trans-1,2-Dichloroethene	7.93	61	208634	19.0804 ug/L	95
24) n-Hexane	8.00	57	189580	20.7708 ug/L	90
25) Diisopropyl ether	8.34	45	2418406	98.8116 ug/L	96
26) Vinyl Acetate	8.51	43	214452	19.5363 ug/L	94
27) 1,1-Dichloroethane	8.55	63	269400	19.1433 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1921533	92.3173 ug/L	98
29) 2-Butanone	9.09	43	30538	17.8417 ug/L	93
30) Propionitrile	9.21	54	51008	96.1519 ug/L	99
31) 2,2-Dichloropropane	9.32	77	236072	19.8715 ug/L	99
32) cis-1,2-Dichloroethene	9.38	96	175662	19.4362 ug/L	96
33) Chloroform	9.59	83	279602	17.9314 ug/L	96
34) 1-Bromopropane	9.74	122	45011	25.2458 ug/L	96
35) Bromochloromethane	9.83	130	97284	19.9478 ug/L	96
36) Tetrahydrofuran	9.85	42	110757	94.0032 ug/L	85
38) 1,1,1-Trichloroethane	10.13	97	254597	20.2322 ug/L	99
39) Cyclohexane	10.16	56	212753	18.1594 ug/L	91
40) 1,1-Dichloropropene	10.31	75	210743	19.1808 ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1797634	96.4485 ug/L	98
42) Carbon Tetrachloride	10.47	117	238617	20.4506 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419120.D 8260WT.M Mon Apr 24 14:27:19 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06:32 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

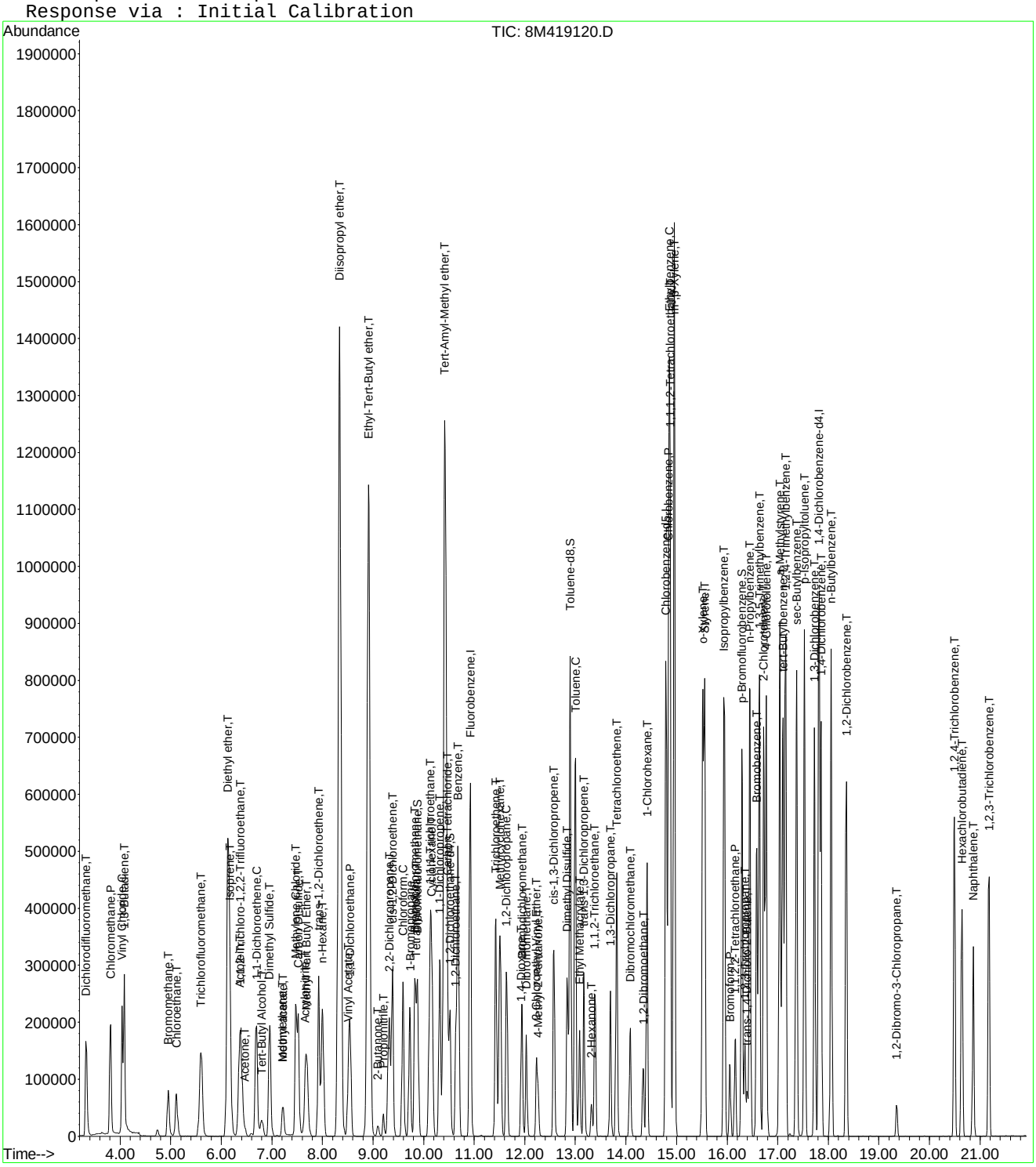
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.63	62	171649	19.4674	ug/L	97
46)	Benzene	10.68	78	625225	19.5021	ug/L	96
47)	Trichloroethene	11.43	130	172329	19.1349	ug/L	97
48)	Methylcyclohexane	11.51	83	231803	19.3086	ug/L	95
49)	1,2-Dichloropropane	11.64	63	147351	18.8184	ug/L	95
50)	Bromodichloromethane	11.95	83	197594	19.2830	ug/L	99
51)	1,4-Dioxane	11.93	88	8967	200.8580	ug/L	87
52)	Dibromomethane	12.03	93	77593	19.2557	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.23	63	64573	19.0594	ug/L	99
54)	4-Methyl-2-Pentanone	12.26	58	29061	19.1499	ug/L	96
55)	cis-1,3-Dichloropropene	12.58	75	236575	20.2723	ug/L	100
56)	Dimethyl Disulfide	12.84	79	111402	18.6235	ug/L	87
59)	Toluene	13.00	91	683147	19.5546	ug/L	99
60)	Ethyl Methacrylate	13.08	69	138496	21.0128	ug/L	90
62)	trans-1,3-Dichloropropene	13.17	75	185392	18.2985	ug/L	99
63)	1,1,2-Trichloroethane	13.38	97	104435	18.1699	ug/L	96
64)	2-Hexanone	13.32	58	26045	18.4643	ug/L	83
65)	1,3-Dichloropropane	13.69	76	185948	19.1373	ug/L	86
66)	Tetrachloroethene	13.82	164	144775	19.7287	ug/L	97
67)	Dibromochloromethane	14.09	129	135377	18.3291	ug/L	99
68)	1,2-Dibromoethane	14.35	107	105371	18.7682	ug/L	100
69)	1-Chlorohexane	14.42	91	229591	20.7720	ug/L	93
70)	Chlorobenzene	14.84	112	454927	18.2938	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.87	131	166631	18.8815	ug/L	98
72)	Ethylbenzene	14.86	106	259307	18.6178	ug/L	95
73)	m-,p-Xylene	14.95	106	636015	39.4317	ug/L	95
74)	o-Xylene	15.52	106	304205	18.7593	ug/L	100
75)	Styrene	15.55	104	513015	20.1789	ug/L	96
76)	Bromoform	16.06	173	80900	16.2139	ug/L	100
77)	Isopropylbenzene	15.94	105	763449	19.6623	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.15	83	116488	18.4650	ug/L	96
81)	1,2,3-Trichloropropane	16.35	110	34144	18.8786	ug/L	69
82)	trans-1,4-Dichloro-2-Buten	16.39	53	20505	13.8637	ug/L	79
83)	n-Propylbenzene	16.44	91	908240	19.4087	ug/L	99
84)	Bromobenzene	16.59	156	205363	18.7299	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	660733	19.5002	ug/L	98
86)	2-Chlorotoluene	16.72	91	546614	17.1101	ug/L	83
87)	4-Chlorotoluene	16.77	91	586496	20.3714	ug/L	91
88)	a-Methylstyrene	17.04	118	392182	20.6454	ug/L	97
89)	tert-Butylbenzene	17.10	134	143753	18.7385	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	686131	19.8352	ug/L	98
91)	sec-Butylbenzene	17.37	105	830182	19.5618	ug/L	100
92)	p-Isopropyltoluene	17.53	119	719810	20.1428	ug/L	98
93)	1,3-Dichlorobenzene	17.72	146	398610	18.7560	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	398620	18.4490	ug/L	98
95)	n-Butylbenzene	18.06	91	649852	20.1876	ug/L	100
96)	1,2-Dichlorobenzene	18.36	146	352130	18.8610	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	17525	17.0689	ug/L	94
98)	1,2,4-Trichlorobenzene	20.49	180	238142	18.9460	ug/L	100
99)	Hexachlorobutadiene	20.64	225	109270	18.6816	ug/L	99
100)	Naphthalene	20.87	128	342143	19.0478	ug/L	99
101)	1,2,3-Trichlorobenzene	21.18	180	197200	18.8923	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419120.D 8260WT.M Mon Apr 24 14:27:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042417\8M419120.D Vial: 6
Acq On : 24 Apr 2017 13:44 Operator: TMB
Sample : WG611301-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 24 14:06 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419143.D Vial: 8
Acq On : 25 Apr 2017 14:46 Operator: TMB
Sample : WG611408-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 15:08:15 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	840315	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	678834	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	364334	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	223178	25.3211	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.28%			
43) 1,2-Dichloroethane-d4	10.52	65	195637	25.6752	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.72%			
58) Toluene-d8	12.90	98	819770	26.4296	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.72%			
80) p-Bromofluorobenzene	16.29	95	322189	25.0566	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.24%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	244003	21.4565	ug/L	99
3) Chloromethane	3.80	50	300473	21.1347	ug/L	98
4) Vinyl Chloride	4.04	62	266386	19.8406	ug/L	98
5) 1,3-Butadiene	4.08	54	149678	24.9568	ug/L	94
6) Bromomethane	4.95	94	104466	24.6189	ug/L	98
7) Chloroethane	5.12	64	127856	21.8011	ug/L	97
8) Trichlorofluoromethane	5.60	101	294840	20.2185	ug/L	100
9) Diethyl ether	6.13	59	498129	90.6978	ug/L	91
10) Isoprene	6.17	67	241439	20.9403	ug/L	88
11) Acrolein	6.37	56	65570	86.2061	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	177008	21.2864	ug/L	98
13) Acetone	6.47	43	22055	18.6615	ug/L	98
14) 1,1-Dichloroethene	6.69	61	229789	18.8818	ug/L	96
15) Tert-Butyl Alcohol	6.80	59	74334	194.0321	ug/L	99
16) Dimethyl Sulfide	6.96	62	175511	21.6518	ug/L	89
17) Iodomethane	7.21	142	57773	15.8905	ug/L	87
18) Methyl acetate	7.21	43	64085	19.8018	ug/L	91
19) Methylene Chloride	7.47	84	165524	18.9262	ug/L	83
20) Carbon Disulfide	7.52	76	435411	17.2071	ug/L	100
21) Acrylonitrile	7.66	53	31422	19.1669	ug/L	98
22) Methyl Tert Butyl Ether	7.69	73	333153	19.3334	ug/L	93
23) trans-1,2-Dichloroethene	7.93	61	224519	18.9625	ug/L	96
24) n-Hexane	8.00	57	194189	19.6484	ug/L	92
25) Diisopropyl ether	8.34	45	2637772	99.5305	ug/L	95
26) Vinyl Acetate	8.51	43	227218	19.1159	ug/L	94
27) 1,1-Dichloroethane	8.55	63	296939	19.4862	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	2097147	93.0474	ug/L	97
29) 2-Butanone	9.09	43	35815	19.3242	ug/L	85
30) Propionitrile	9.21	54	55056	95.8439	ug/L	99
31) 2,2-Dichloropropane	9.32	77	233907	18.1832	ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	189446	19.3580	ug/L	96
33) Chloroform	9.59	83	303866	17.9969	ug/L	98
34) 1-Bromopropane	9.73	122	46903	24.2947	ug/L	99
35) Bromochloromethane	9.83	130	104931	19.8699	ug/L	92
36) Tetrahydrofuran	9.85	42	122357	95.9048	ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	276259	20.2744	ug/L	98
39) Cyclohexane	10.16	56	236867	18.6711	ug/L	89
40) 1,1-Dichloropropene	10.31	75	229467	19.2874	ug/L	98
41) Tert-Amyl-Methyl ether	10.42	73	1969713	97.5972	ug/L	98
42) Carbon Tetrachloride	10.46	117	254507	20.1440	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419143.D 8260WT.M Tue Apr 25 15:59:39 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419143.D Vial: 8
Acq On : 25 Apr 2017 14:46 Operator: TMB
Sample : WG611408-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 15:08:15 2017 Quant Results File: 8260WT.RES

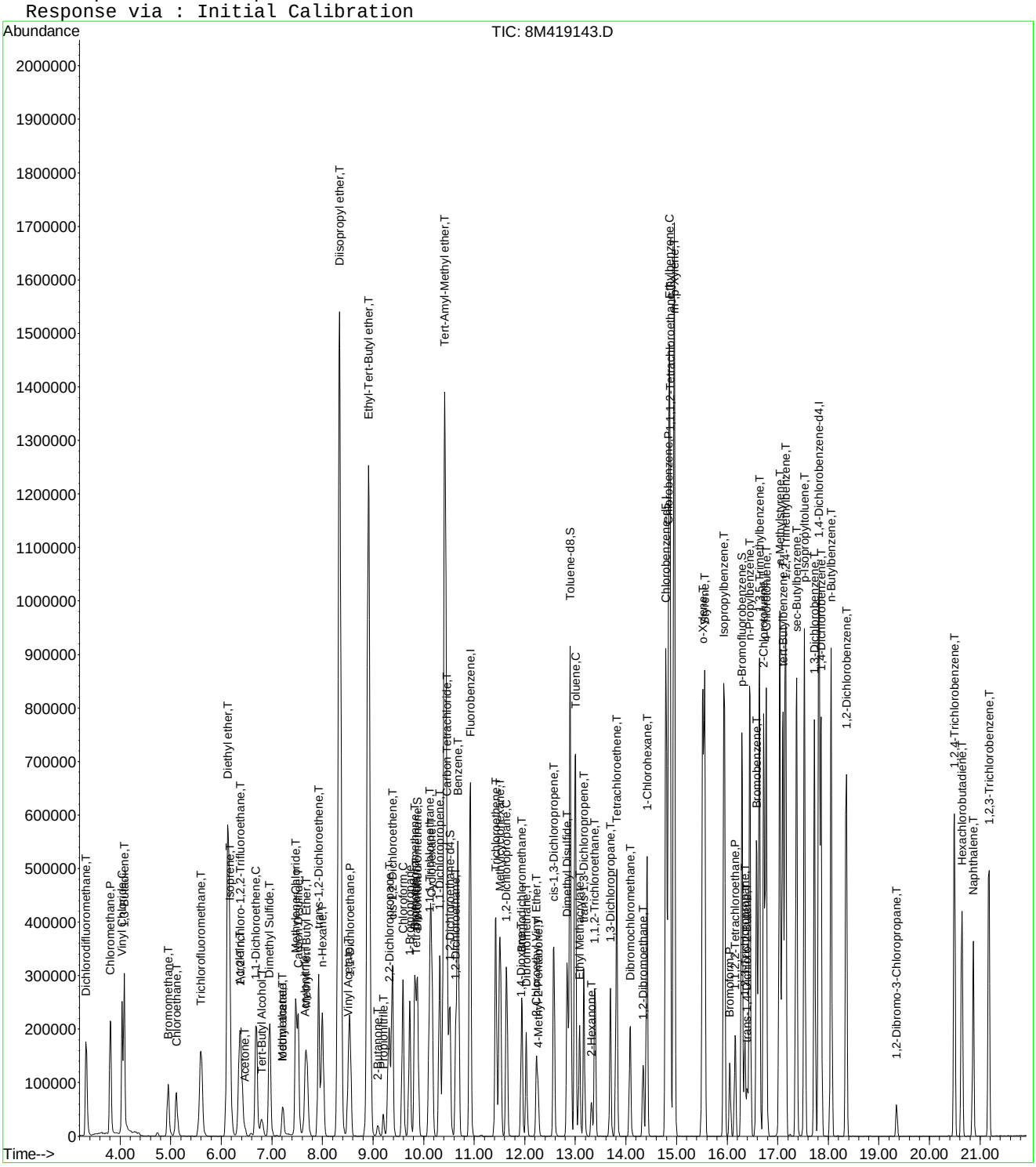
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.63	62	188560	19.7496	ug/L	96
46)	Benzene	10.68	78	676632	19.4912	ug/L	96
47)	Trichloroethene	11.43	130	185408	19.0124	ug/L	99
48)	Methylcyclohexane	11.51	83	249248	19.1736	ug/L	94
49)	1,2-Dichloropropane	11.64	63	159122	18.7672	ug/L	95
50)	Bromodichloromethane	11.94	83	211978	19.1043	ug/L	98
51)	1,4-Dioxane	11.93	88	9679	200.2225	ug/L	82
52)	Dibromomethane	12.03	93	85461	19.5860	ug/L	97
53)	2-Chloroethyl Vinyl Ether	12.23	63	74501	20.3077	ug/L	99
54)	4-Methyl-2-Pentanone	12.27	58	31063	18.9034	ug/L	98
55)	cis-1,3-Dichloropropene	12.58	75	255792	20.2424	ug/L	99
56)	Dimethyl Disulfide	12.84	79	126979	19.4403	ug/L	87
59)	Toluene	13.00	91	736955	19.5032	ug/L	99
60)	Ethyl Methacrylate	13.08	69	154325	21.6478	ug/L	87
62)	trans-1,3-Dichloropropene	13.17	75	203041	18.5284	ug/L	99
63)	1,1,2-Trichloroethane	13.38	97	114855	18.4752	ug/L	96
64)	2-Hexanone	13.32	58	29096	19.0710	ug/L	85
65)	1,3-Dichloropropane	13.69	76	206390	19.6385	ug/L	88
66)	Tetrachloroethene	13.82	164	155375	19.5757	ug/L	99
67)	Dibromochloromethane	14.09	129	152391	19.0760	ug/L	98
68)	1,2-Dibromoethane	14.33	107	114000	18.7732	ug/L	100
69)	1-Chlorohexane	14.42	91	250365	20.9425	ug/L	93
70)	Chlorobenzene	14.84	112	488990	18.1799	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	179087	18.7619	ug/L	99
72)	Ethylbenzene	14.86	106	276767	18.3721	ug/L	93
73)	m-,p-Xylene	14.95	106	679588	38.9542	ug/L	95
74)	o-Xylene	15.52	106	325746	18.5720	ug/L	99
75)	Styrene	15.55	104	552148	20.0796	ug/L	95
76)	Bromoform	16.05	173	87708	16.2508	ug/L	99
77)	Isopropylbenzene	15.94	105	828857	19.7363	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.15	83	130114	18.9269	ug/L	99
81)	1,2,3-Trichloropropane	16.35	110	38221	19.3931	ug/L	69
82)	trans-1,4-Dichloro-2-Buten	16.39	53	23580	14.5955	ug/L	82
83)	n-Propylbenzene	16.44	91	973979	19.1001	ug/L	100
84)	Bromobenzene	16.59	156	221435	18.5331	ug/L	97
85)	1,3,5-Trimethylbenzene	16.64	105	716011	19.3919	ug/L	98
86)	2-Chlorotoluene	16.72	91	592742	17.0265	ug/L	83
87)	4-Chlorotoluene	16.77	91	631393	20.1253	ug/L	91
88)	a-Methylstyrene	17.04	118	420683	20.3226	ug/L	99
89)	tert-Butylbenzene	17.10	134	153156	18.3206	ug/L	93
90)	1,2,4-Trimethylbenzene	17.16	105	737233	19.5579	ug/L	97
91)	sec-Butylbenzene	17.37	105	886599	19.1713	ug/L	100
92)	p-Isopropyltoluene	17.53	119	763773	19.6135	ug/L	98
93)	1,3-Dichlorobenzene	17.72	146	428016	18.4817	ug/L	97
94)	1,4-Dichlorobenzene	17.86	146	427147	18.1418	ug/L	100
95)	n-Butylbenzene	18.06	91	693648	19.7742	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	383456	18.8480	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18764	16.7711	ug/L	88
98)	1,2,4-Trichlorobenzene	20.49	180	257943	18.8319	ug/L	99
99)	Hexachlorobutadiene	20.64	225	115294	18.0888	ug/L	99
100)	Naphthalene	20.87	128	380341	19.4311	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	215925	18.9832	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419143.D 8260WT.M Tue Apr 25 15:59:39 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042517\8M419143.D Vial: 8
Acq On : 25 Apr 2017 14:46 Operator: TMB
Sample : WG611408-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 25 15:08 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	788127	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	636816	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	344756	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	208755	25.2531 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.00%		
43) 1,2-Dichloroethane-d4	10.52	65	181270	25.3650 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.48%		
58) Toluene-d8	12.90	98	770069	26.4653 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%		
80) p-Bromofluorobenzene	16.29	95	305663	25.1213 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.48%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	273651	25.6570 ug/L	100
3) Chloromethane	3.81	50	296380	22.2273 ug/L	99
4) Vinyl Chloride	4.04	62	274389	21.7899 ug/L	97
5) 1,3-Butadiene	4.09	54	142502	25.4397 ug/L	94
6) Bromomethane	4.95	94	104140	25.9437 ug/L	98
7) Chloroethane	5.11	64	127123	23.1114 ug/L	98
8) Trichlorofluoromethane	5.61	101	291514	21.3141 ug/L	99
9) Diethyl ether	6.13	59	467190	90.6973 ug/L	91
10) Isoprene	6.17	67	212297	19.6320 ug/L	90
11) Acrolein	6.37	56	63400	88.8726 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	178665	22.9084 ug/L	99
13) Acetone	6.47	43	20690	18.6657 ug/L	94
14) 1,1-Dichloroethene	6.69	61	212814	18.6449 ug/L	94
15) Tert-Butyl Alcohol	6.80	59	67852	188.8403 ug/L	99
16) Dimethyl Sulfide	6.96	62	159439	20.9715 ug/L	88
17) Iodomethane	7.22	142	76686	22.4892 ug/L	92
18) Methyl acetate	7.22	43	59730	19.6783 ug/L	91
19) Methylene Chloride	7.48	84	154131	18.7905 ug/L	84
20) Carbon Disulfide	7.53	76	382298	16.1086 ug/L	99
21) Acrylonitrile	7.66	53	30245	19.6706 ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	310711	19.2250 ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	209241	18.8424 ug/L	94
24) n-Hexane	8.00	57	186290	20.0973 ug/L	91
25) Diisopropyl ether	8.34	45	2519969	101.3818 ug/L	95
26) Vinyl Acetate	8.51	43	227887	20.4417 ug/L	93
27) 1,1-Dichloroethane	8.55	63	274771	19.2255 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1968261	93.1116 ug/L	97
29) 2-Butanone	9.10	43	34365	19.7696 ug/L	91
30) Propionitrile	9.20	54	54033	100.2916 ug/L	99
31) 2,2-Dichloropropane	9.32	77	241625	20.0269 ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	177571	19.3460 ug/L	93
33) Chloroform	9.59	83	287680	18.1665 ug/L	98
34) 1-Bromopropane	9.73	122	43389	23.9627 ug/L	97
35) Bromochloromethane	9.82	130	98060	19.7984 ug/L	93
36) Tetrahydrofuran	9.85	42	116835	97.6406 ug/L	86
38) 1,1,1-Trichloroethane	10.12	97	256707	20.0870 ug/L	99
39) Cyclohexane	10.16	56	219916	18.4828 ug/L	89
40) 1,1-Dichloropropene	10.32	75	217392	19.4825 ug/L	100
41) Tert-Amyl-Methyl ether	10.42	73	1851108	97.7940 ug/L	97
42) Carbon Tetrachloride	10.46	117	241403	20.3720 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419169.D 8260WT.M Wed Apr 26 13:01:16 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

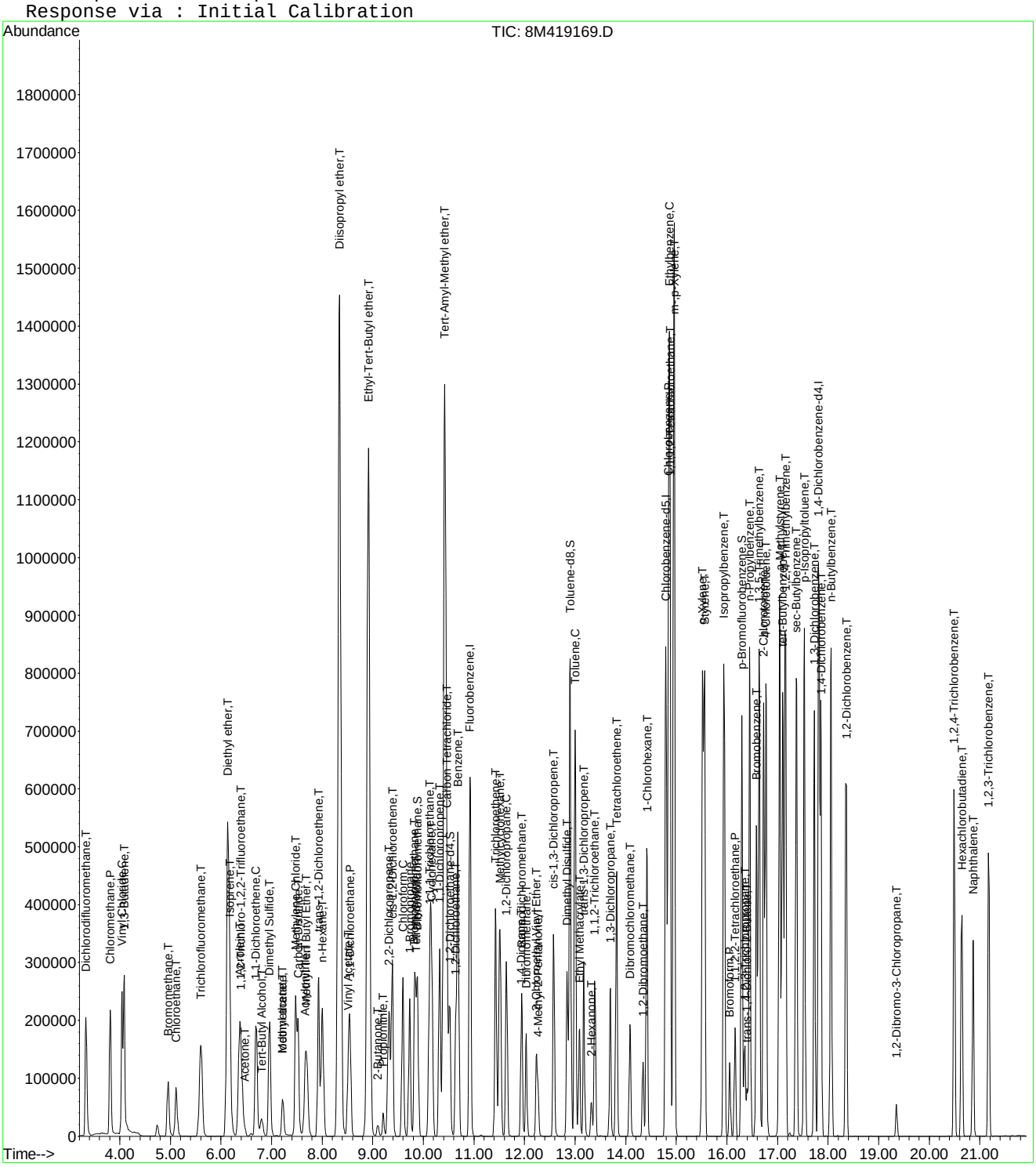
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	170984	19.0945	ug/L	96
46)	Benzene	10.68	78	635964	19.5328	ug/L	95
47)	Trichloroethene	11.42	130	170718	18.6653	ug/L	98
48)	Methylcyclohexane	11.52	83	241169	19.7806	ug/L	95
49)	1,2-Dichloropropane	11.64	63	152664	19.1979	ug/L	95
50)	Bromodichloromethane	11.94	83	200767	19.2921	ug/L	99
51)	1,4-Dioxane	11.93	88	9504	209.6209	ug/L	88
52)	Dibromomethane	12.03	93	80616	19.6990	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	70065	20.3632	ug/L	98
54)	4-Methyl-2-Pentanone	12.26	58	29664	19.2474	ug/L	99
55)	cis-1,3-Dichloropropene	12.57	75	242784	20.4852	ug/L	99
56)	Dimethyl Disulfide	12.84	79	107906	17.9060	ug/L	84
59)	Toluene	12.99	91	700300	19.7560	ug/L	98
60)	Ethyl Methacrylate	13.09	69	144401	21.5923	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	191887	18.6660	ug/L	98
63)	1,1,2-Trichloroethane	13.39	97	107549	18.4414	ug/L	98
64)	2-Hexanone	13.33	58	27922	19.5090	ug/L	84
65)	1,3-Dichloropropane	13.70	76	192397	19.5150	ug/L	86
66)	Tetrachloroethene	13.82	164	145414	19.5296	ug/L	98
67)	Dibromochloromethane	14.08	129	138687	18.5060	ug/L	100
68)	1,2-Dibromoethane	14.34	107	106946	18.7736	ug/L	100
69)	1-Chlorohexane	14.42	91	245059	21.8512	ug/L	92
70)	Chlorobenzene	14.84	112	463274	18.3603	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	168895	18.8616	ug/L	100
72)	Ethylbenzene	14.87	106	264943	18.7476	ug/L	93
73)	m-,p-Xylene	14.96	106	648522	39.6263	ug/L	96
74)	o-Xylene	15.52	106	311731	18.9457	ug/L	100
75)	Styrene	15.56	104	524165	20.3197	ug/L	95
76)	Bromoform	16.05	173	79745	15.7679	ug/L	99
77)	Isopropylbenzene	15.94	105	782193	19.8541	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	123738	19.0216	ug/L	99
81)	1,2,3-Trichloropropane	16.35	110	35785	19.1881	ug/L	63
82)	trans-1,4-Dichloro-2-Buten	16.40	53	21714	14.2206	ug/L	90
83)	n-Propylbenzene	16.45	91	939413	19.4684	ug/L	100
84)	Bromobenzene	16.58	156	210993	18.6620	ug/L	99
85)	1,3,5-Trimethylbenzene	16.63	105	673985	19.2903	ug/L	98
86)	2-Chlorotoluene	16.73	91	588060	17.8513	ug/L	94
87)	4-Chlorotoluene	16.77	91	585680	19.7284	ug/L	100
88)	a-Methylstyrene	17.05	118	410115	20.9371	ug/L	97
89)	tert-Butylbenzene	17.10	134	144154	18.2230	ug/L	92
90)	1,2,4-Trimethylbenzene	17.16	105	705493	19.7787	ug/L	99
91)	sec-Butylbenzene	17.37	105	842978	19.2632	ug/L	100
92)	p-Isopropyltoluene	17.53	119	729766	19.8044	ug/L	97
93)	1,3-Dichlorobenzene	17.73	146	405197	18.4899	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	406013	18.2234	ug/L	100
95)	n-Butylbenzene	18.06	91	671631	20.2338	ug/L	100
96)	1,2-Dichlorobenzene	18.36	146	357021	18.5452	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	17265	16.3077	ug/L	91
98)	1,2,4-Trichlorobenzene	20.49	180	245454	18.9377	ug/L	99
99)	Hexachlorobutadiene	20.64	225	105356	17.4683	ug/L	99
100)	Naphthalene	20.87	128	364632	19.6865	ug/L	99
101)	1,2,3-Trichlorobenzene	21.17	180	203058	18.8657	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419169.D 8260WT.M Wed Apr 26 13:01:16 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042617\8M419169.D Vial: 6
Acq On : 26 Apr 2017 10:27 Operator: TMB
Sample : WG611561-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 26 10:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419169.D 8260WT.M Wed Apr 26 13:01:17 2017 Page 3

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 26, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BNB – Brandi N. Bentley
BRG – BRENDA R. GREGORY	CAS – Craig A. Smith
CEB – CHAD E. BARNES	CLC – CHRYS L. CRAWFORD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	REK – BOB E. KYER
RLB – BOB BUCHANAN	RNP – RICK N. PETTY
SAV – SARAH A. VANDENBERG	SCA – SUEELLEN C. ADAMS
SCB – SARAH C. BOGOLIN	SCJ – SUE ELLEN C. JOHNSON
SDC – SHALYN D. CONLEY	TB – TODD BOYLE
TMB – TIFFANY M. BAILEY	TMM – TAMMY M. MORRIS
VC – VICKI COLLIER	WTD – WADE T. DELONG
XXX – UNAVAILABLE OR SUBCONTRACT	ZTB – ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 26, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

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Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 8
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
Preservation Code:									
MW-85-LS-25	4/19/17	~~845~~ 850	G	W	N		x		
PMW-85-01-LS-25	4/19/17	850	G	W	N		x		
DUP-10	4/19/17	~~850~~ 855	G	W	N		x		
PMW-85-05-LS-25	4/19/17	920	G	W	N		x		
DR2-3-LS-25	4/19/17	953	G	W	N		x		
MW-113-LS-25	4/19/17	1007	G	W	N		x		
PMW92-03-LS-25	4/19/17	1015	G	W	N	x	x		
PMW92-02-LS-25	4/19/17	1031	G	W	N		x		
DUP-3	4/19/17	1040	G	W	N		x		
MW-92-LS-25	4/19/17	1042	G	W	N		x		
DR2-1-LS-25	4/19/17	1102	G	W	N		x		

Microbac OVD
Received: 04/21/2017 10:11
By: BRENDA GREENWALT 221000099807
Brenda Greenwalt

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 2
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days):			A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-88-LS-25	4/19/17	1110	G	W	N		x		
DR2-2-LS-25	4/19/17	1125	G	W	N		x		
MW-266-LS-25	4/19/17	1135	G	W	N		x		
MW-267-LS-25	4/19/17	1308	G	W	N		x		
MW-26-LS-25	4/19/17	1322	G	W	N		x		
DR2-6-LS-25	4/19/17	1331	G	W	N		x		
MW-217-LS-25	4/19/17	1339	G	W	N		x		
MW-64-LS-25	4/19/17	1347	G	W	N		x		
MW-218-LS-25	4/19/17	1357	G	W	N		x		
MW-268-LS-25	4/19/17	1405	G	W	N		x		
MW-270-LS-25	4/19/17	1415	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1600	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 3 of 8
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days):			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112	PO #:			
Phone: 404-295-3279	WO #:			Other:
Email: thomas.holmes@hdrinc.com	Project #:			
Project Name: LTM 2017	SSOW#:			
Site: DDMT				

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-272-LS-25	4/19/17	1428	G	W	N		x		
MW-259-LS-25	4/19/17	1457	G	W	N	X	x		
MW-271-LS-25	4/19/17	1510	G	W	N		x		
MW-97-LS-25	4/19/17	1528	G	W	N		x		
MW-204A-LS-25	4/19/17	1538	G	W	N		x		
MW-204B-LS-25	4/19/17	1543	G	W	N	X	x		
MW-197A-LS-25	4/19/17	1600	G	W	N		x		
MW-197B-LS-25	4/19/17	1605	G	W	N		x		
MW-203A-LS-25	4/19/17	1625	G	W	N		x		
MW-203B-LS-25	4/19/17	1630	G	W	N		x		
MW-210A-LS-25	4/19/17	1646	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	4/20/17 1800	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

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Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 4 of 8
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-210B-LS-25	4/19/17	1652	G	W	N		x		
MW-277-LS-25	4/19/17	1521	G	W	N		x		
MW-280-LS-25	4/19/17	1116	G	W	N		x		
MW-98-LS-25	4/20/17	755	G	W	N		x		
DUP-6	4/20/17	758	G	W	N		x		
MW-205A-LS-25	4/20/17	805	G	W	N		x		
MW-205B-LS-25	4/20/17	810	G	W	N		x		
MW-39A-LS-25	4/20/17	821	G	W	N		x		
MW-39-LS-25	4/20/17	826	G	W	N		x		
MW-206B-LS-25	4/20/17	837	G	W	N		x		
MW-206A-LS-25	4/20/17	842	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

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L17041075 / Revision: 2 / 938 total pages

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 5 of 8
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days):			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112	PO #:			
Phone: 404-295-3279	WO #:			Other:
Email: thomas.holmes@hdrinc.com	Project #:			
Project Name: LTM 2017	SSOW#:			
Site: DDMT				

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-265-LS-25	4/20/17	1023	G	W	N		x		
✓ DUP-8	4/20/17	1028	G	W	N		x		
✓ MW-264-LS-25	4/20/17	1031	G	W	N		x		
✓ MW-104-LS-25	4/20/17	1040	G	W	N		x		
✓ MW-263-LS-25	4/20/17	1048	G	W	N		x		
✓ DR1-5A-LS-25	4/20/17	1302	G	W	N		x		
✓ DR1-5-LS-25	4/20/17	1310	G	W	N		x		
✓ MW-21-LS-25	4/20/17	1338	G	W	N		x		
✓ DUP-2	4/20/17	1344	G	W	N		x		
✓ PMW21-01-LS-25	4/20/17	1350	G	W	N		x		
✓ PMW21-02-LS-25	4/20/17	~~1357~~ 1358	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	4/20/17 1800	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Generated: 07/26/2017 08:42

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 6 of 16
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-200-LS-25	4/20/17	849	G	W	N		x		
MW-94A-LS-25	4/20/17	856	G	W	N		x		
MW-208B-LS-25	4/20/17	903	G	W	N		x		
MW-208A-LS-25	4/20/17	908	G	W	N		x		
MW-207B-LS-25	4/20/17	918	G	W	N		x		
MW-207A-LS-25	4/20/17	923	G	W	N		x		
MW-108-LS-25	4/20/17	937	G	W	N		x		
DUP-4	4/20/17	940	G	W	N		x		
MW-107B-LS-25	4/20/17	955	G	W	N		x		
MW-107T-LS-25	4/20/17	955	G	W	N		x		
MW-258-LS-25	4/20/17	1017	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/20/17 1800	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

L17041075 / Revision: 2 / 938 total pages

Generated: 07/26/2017 08:42

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 2
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days):			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
PMW21-03-LS-25	4/20/17	1410	G	W	N		x		
PMW21-04-LS-25	4/20/17	1416	G	W	N		x		
MW-100B-LS-25	4/20/17	1423	G	W	N	X	x		
DR1-6A-LS-25	4/20/17	1441	G	W	N	X	x		
DR1-6-LS-25	4/20/17	1448	G	W	N		x		
PMW101-06A-LS-25	4/20/17	1500	G	W	N		x		
DUP-11	4/20/17	1503	G	W	N		x		
PMW101-06B-LS-25	4/20/17	1510	G	W	N		x		
PMW101-07A-LS-25	4/20/17	1525	G	W	N		x		
PMW101-07B-LS-25	4/20/17	1530	G	W	N		x		
PMW21-05-LS-25	4/20/17	1539	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
JBS	4/20/17 1600	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

MICROBAC

COOLER TEMP >6° C LOG

Cooler ID 9807

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

4/21/17

BLG

pH Lot # N/A

pH Exceptions

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

4/21/17

BLG

PRESERVATIVE EXCEPTIONS

__NONE

__AS NOTED

BLG 4/21/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-01	897424	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:00	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:00	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:00	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17041075-02	897425	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-03	897426	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17041075-04	897427	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-05	897428	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17041075-06	897429	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-07	897430	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-08	897431	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-09	897432	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-10	897433	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:01	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-11	897434	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-12	897435	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-13	897436	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-14	897437	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:02	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-15	897438	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-16	897439	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-17	897440	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-18	897441	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-19	897442	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-20	897443	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-21	897444	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-22	897445	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:03	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-23	897446	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17041075-24	897447	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-25	897448	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:40	BJO	JST	

Samplenum	Container ID	Products
L17041075-26	897449	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:40	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:40	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-27	897450	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:39	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:39	BJO	JST	

Samplenum	Container ID	Products
L17041075-28	897451	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-29	897452	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:08	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

Samplenum	Container ID	Products
L17041075-30	897453	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:07	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-31	897454	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

Samplenum	Container ID	Products
L17041075-32	897455	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:10	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-33	897456	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Samplenum	Container ID	Products
L17041075-34	897457	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:06	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:20	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-35	897458	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Samplenum	Container ID	Products
L17041075-36	897459	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-37	897460	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Samplenum	Container ID	Products
L17041075-38	897461	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-39	897462	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Samplenum	Container ID	Products
L17041075-40	897463	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-41	897464	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:05	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:11	BJO	BJO	

Samplenum	Container ID	Products
L17041075-42	897465	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-43	897466	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Samplenum	Container ID	Products
L17041075-44	897467	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041075
Account: 2694
Project: 2694.011
Samples: 45
Due Date: 28-APR-2017

Samplenum	Container ID	Products
L17041075-45	897468	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:40	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	21-APR-2017 14:25	BRG		
2	ANALYZ	V1	ORG4	21-APR-2017 15:04	HRF	CLS	
3	STORE	ORG4	A2	05-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:40	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17041110 *(Revised)*

Report revised to remove 1,4 Dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 26 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041110
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: PMW101-02A-LS-25. All 3 voa vials received w/headspace >6mm. BRG	Per the client, please proceed with analysis. ALS

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
0019904	H	3.0		1001893333160004575000778966597181	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17041110
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
PMW101-02A-LS-25	L17041110-01	04/21/2017 07:55	04/22/2017 11:05
PMW101-02B-LS-25	L17041110-02	04/21/2017 08:00	04/22/2017 11:05
PMW101-04B-LS-25	L17041110-03	04/21/2017 08:12	04/22/2017 11:05
PMW101-04A-LS-25	L17041110-04	04/21/2017 08:18	04/22/2017 11:05
PMW101-03B-LS-25	L17041110-05	04/21/2017 08:24	04/22/2017 11:05
PMW101-03A-LS-25	L17041110-06	04/21/2017 08:30	04/22/2017 11:05
DR1-3-LS-25	L17041110-07	04/21/2017 08:45	04/22/2017 11:05
DUP-1	L17041110-08	04/21/2017 08:49	04/22/2017 11:05
MW-199B-LS-25	L17041110-09	04/21/2017 09:22	04/22/2017 11:05
MW-141-LS-25	L17041110-10	04/21/2017 09:40	04/22/2017 11:05
MW-89-LS-25	L17041110-11	04/21/2017 09:50	04/22/2017 11:05
MW-90-LS-25	L17041110-12	04/21/2017 09:56	04/22/2017 11:05
MW-101B-LS-25	L17041110-13	04/21/2017 09:58	04/22/2017 11:05
MW-101T-LS-25	L17041110-14	04/21/2017 10:03	04/22/2017 11:05
MW-212-LS-25	L17041110-15	04/21/2017 10:35	04/22/2017 11:05
DUP-7	L17041110-16	04/21/2017 10:40	04/22/2017 11:05
MW-62-LS-25	L17041110-17	04/21/2017 11:00	04/22/2017 11:05
MW-202B-LS-25	L17041110-18	04/21/2017 11:08	04/22/2017 11:05
DUP-5	L17041110-19	04/21/2017 11:10	04/22/2017 11:05
MW-202A-LS-25	L17041110-20	04/21/2017 11:15	04/22/2017 11:05
MW-143-LS-25	L17041110-21	04/21/2017 11:35	04/22/2017 11:05
MW-262-LS-25	L17041110-22	04/21/2017 11:40	04/22/2017 11:05
MW-256-LS-25	L17041110-23	04/21/2017 14:00	04/22/2017 11:05
MW-140-LS-25	L17041110-24	04/21/2017 14:25	04/22/2017 11:05
MW-213-LS-25	L17041110-25	04/21/2017 16:02	04/22/2017 11:05
MW-282-LS-25	L17041110-26	04/21/2017 11:01	04/22/2017 11:05
MW-282-LS-25	L17041110-27	04/21/2017 11:01	04/22/2017 11:05
MW-282-LS-25	L17041110-28	04/21/2017 11:01	04/22/2017 11:05
MW-281-LS-25	L17041110-29	04/21/2017 08:27	04/22/2017 11:05
LTM-TB4-LS-25	L17041110-30	04/21/2017 16:30	04/22/2017 11:05

Microbac REPORT L17041110
PREPARED FOR CT Laboratories
WORK ID:

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1.0 Summary Data

1.1 Narratives

Login Number: L17041110
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: In the alternate source analyzed 4/26/17 on HPMS17, WG611454-12, dichlorodifluoromethane exceeded the limit for percent difference, biased high. In the same alternate source, trichlorofluoromethane exceeded the limit for percent difference, biased low. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: All acceptance criteria were met.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 25 was analyzed at a dilution due to dark, foamy sample matrix. Antifoam was added to the sample; unable to analyze more concentrated.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

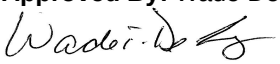
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124785
Approved By: Wade DeLong



1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041110-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-02A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 17:27
Collect Date:	04/21/2017 07:55	**Dilution:**	1	**File ID:**	17M0273081
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6	4.69	F	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	7.35		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.978	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	0.950	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.7	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-02B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 17:55
Collect Date:	04/21/2017 08:00	**Dilution:**	1	**File ID:**	17M0273082
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.71		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.257	F	1.00	0.250
Toluene	108-88-3	3.30		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.53		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.0	85	115	
1,2-Dichloroethane-d4	98.5	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-04B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:15
Collect Date:	04/21/2017 08:12	**Dilution:**	1	**File ID:**	17M0273083
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.38	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.197	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.260	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.795	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	53.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.3	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-04A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:35
Collect Date:	04/21/2017 08:18	**Dilution:**	1	**File ID:**	17M0273084
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.41	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.27		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.14		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.61		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	16.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.03		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.6	85	115	
1,2-Dichloroethane-d4	98.8	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-03B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:55
Collect Date:	04/21/2017 08:24	**Dilution:**	1	**File ID:**	17M0273085
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.10	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.186	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.284	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	10.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.747	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	51.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-03A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 19:15
Collect Date:	04/21/2017 08:30	**Dilution:**	1	**File ID:**	17M0273086
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.39	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	14.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.268	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	7.08		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.5	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	98.5	81	120	
4-Bromofluorobenzene	95.2	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-3-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 19:34
Collect Date:	04/21/2017 08:45	**Dilution:**	1	**File ID:**	17M0273087
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.46		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.91		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-1	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 20:01
Collect Date:	04/21/2017 08:49	**Dilution:**	1	**File ID:**	17M0273088
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.39		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	17.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.02		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-199B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:28
Collect Date:	04/21/2017 09:22	**Dilution:**	1	**File ID:**	6M146803
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.225	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.396	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	50.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.264	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-141-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:57
Collect Date:	04/21/2017 09:40	**Dilution:**	1	**File ID:**	8M419221
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.607	F	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.11		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.253	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	31.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-89-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:25
Collect Date:	04/21/2017 09:50	**Dilution:**	1	**File ID:**	8M419210
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.41	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.140	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.871	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.64		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-90-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:59
Collect Date:	04/21/2017 09:56	**Dilution:**	1	**File ID:**	6M146804
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.931	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.892	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.05		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.341	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-101B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:55
Collect Date:	04/21/2017 09:58	**Dilution:**	1	**File ID:**	8M419211
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.61	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	38.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-101T-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 17:25
Collect Date:	04/21/2017 10:03	**Dilution:**	1	**File ID:**	8M419212
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.57	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.129	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.81	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	37.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-212-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 17:55
Collect Date:	04/21/2017 10:35	**Dilution:**	1	**File ID:**	8M419213
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.83	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	30.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.39		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-7	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 18:25
Collect Date:	04/21/2017 10:40	**Dilution:**	1	**File ID:**	8M419214
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	31.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.48		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-62-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 10:29
Collect Date:	04/21/2017 11:00	**Dilution:**	1	**File ID:**	6M146805
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	12.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.475	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	3.05		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	9.47		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-202B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:56
Collect Date:	04/21/2017 11:08	**Dilution:**	1	**File ID:**	8M419219
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.34	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.534	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.427		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.37		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	35.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-5	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:26
Collect Date:	04/21/2017 11:10	**Dilution:**	1	**File ID:**	8M419220
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.87	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.525	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.421		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.55		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	36.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-202A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 18:56
Collect Date:	04/21/2017 11:15	**Dilution:**	1	**File ID:**	8M419215
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.167	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.16		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-143-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 19:25
Collect Date:	04/21/2017 11:35	**Dilution:**	1	**File ID:**	8M419216
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.417	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-262-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 19:56
Collect Date:	04/21/2017 11:40	**Dilution:**	1	**File ID:**	8M419217
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	16.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-256-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:27
Collect Date:	04/21/2017 14:00	**Dilution:**	1	**File ID:**	8M419218
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.562	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.643	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.633	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.48		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.294	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.77		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	27.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-140-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:13
Collect Date:	04/21/2017 14:25	**Dilution:**	1	**File ID:**	6M146783
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.43	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.162	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.26		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	94.7	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-213-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:36
Collect Date:	04/21/2017 16:02	**Dilution:**	5	**File ID:**	6M146818
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1	42.8	F	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	15.8		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3	70.8		50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	3.22	F	5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4		U	5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 15:55
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419209
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 14:25
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419206
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.8		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	20.2		1.00	0.125
1,1-Dichloroethene	75-35-4	19.7		1.00	0.500
1,1-Dichloropropene	563-58-6	19.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.4		1.00	0.150
1,2,3-Trichloropropane	96-18-4	18.7		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.0		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.8		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.8		1.00	0.250
1,3-Dichloropropane	142-28-9	19.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.6		1.00	0.250
2-Hexanone	591-78-6	17.6		10.0	2.50
2-Chlorotoluene	95-49-8	20.3		1.00	0.125
4-Chlorotoluene	106-43-4	18.2		1.00	0.250
Acetone	67-64-1	21.2		10.0	2.50
Benzene	71-43-2	20.3		0.400	0.125
Bromobenzene	108-86-1	19.1		1.00	0.125
Bromochloromethane	74-97-5	19.8		1.00	0.200
Bromodichloromethane	75-27-4	19.8		0.500	0.250
Bromoform	75-25-2	15.4		1.00	0.500
Bromomethane	74-83-9	22.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.6		1.00	0.500
Carbon tetrachloride	56-23-5	20.7		1.00	0.250
Chlorobenzene	108-90-7	18.9		0.500	0.125
Chloroethane	75-00-3	22.9		1.00	0.500
Chloroform	67-66-3	19.0		0.300	0.125
Chloromethane	74-87-3	21.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	18.5		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.4		1.00	0.250
Ethylbenzene	100-41-4	18.8		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.6		5.00	0.500
MEK (2-Butanone)	78-93-3	17.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.2		10.0	2.50
n-Butylbenzene	104-51-8	20.6		1.00	0.250
n-Propylbenzene	103-65-1	20.0		1.00	0.125
m-,p-Xylene	179601-23-1	39.8		2.00	0.500
Naphthalene	91-20-3	18.0		1.00	0.200
o-Xylene	95-47-6	19.0		1.00	0.250
p-Isopropyltoluene	99-87-6	20.0		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	20.3		1.00	0.125
Trichloroethene	79-01-6	19.4		1.00	0.250
tert-Butylbenzene	98-06-6	18.9		1.00	0.250
Tetrachloroethene	127-18-4	19.7		1.00	0.250
Toluene	108-88-3	20.3		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.0		1.00	0.500
Trichlorofluoromethane	75-69-4	20.4		1.00	0.250
Vinyl chloride	75-01-4	21.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.6	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Sample #:	L17041110-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 14:55
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419207
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.4		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	19.4		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.9		1.00	0.250
1,2-Dichloroethane	107-06-2	20.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.6		1.00	0.200
1,2-Dibromoethane	106-93-4	19.6		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.8		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.5		0.500	0.125
1-Chlorohexane	544-10-5	20.8		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	20.5		10.0	2.50
2-Chlorotoluene	95-49-8	17.4		1.00	0.125
4-Chlorotoluene	106-43-4	20.5		1.00	0.250
Acetone	67-64-1	22.0		10.0	2.50
Benzene	71-43-2	20.0		0.400	0.125
Bromobenzene	108-86-1	19.0		1.00	0.125
Bromochloromethane	74-97-5	20.5		1.00	0.200
Bromodichloromethane	75-27-4	19.9		0.500	0.250
Bromoform	75-25-2	16.6		1.00	0.500
Bromomethane	74-83-9	23.7		1.00	0.500
Carbon disulfide	75-15-0	15.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	18.8		0.500	0.125
Chloroethane	75-00-3	22.4		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	21.4		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.6		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	20.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.3		1.00	0.250
Ethylbenzene	100-41-4	18.6		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.0		5.00	0.500
MEK (2-Butanone)	78-93-3	20.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.9		10.0	2.50
n-Butylbenzene	104-51-8	20.4		1.00	0.250
n-Propylbenzene	103-65-1	19.5		1.00	0.125
m-,p-Xylene	179601-23-1	40.0		2.00	0.500
Naphthalene	91-20-3	20.2		1.00	0.200
o-Xylene	95-47-6	19.2		1.00	0.250
p-Isopropyltoluene	99-87-6	19.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.4		1.00	0.250
Styrene	100-42-5	20.6		1.00	0.125
Trichloroethene	79-01-6	19.0		1.00	0.250
tert-Butylbenzene	98-06-6	18.2		1.00	0.250
Tetrachloroethene	127-18-4	19.3		1.00	0.250
Toluene	108-88-3	20.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.6		1.00	0.500
Trichlorofluoromethane	75-69-4	20.3		1.00	0.250
Vinyl chloride	75-01-4	21.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Sample #:	L17041110-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-281-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:42
Collect Date:	04/21/2017 08:27	**Dilution:**	1	**File ID:**	6M146782
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.687	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.24		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.57		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.31		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	49.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.21		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB4-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:07
Collect Date:	04/21/2017 16:30	**Dilution:**	1	**File ID:**	6M146773
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041110
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: In the alternate source analyzed 4/26/17 on HPMS17, WG611454-12, dichlorodifluoromethane exceeded the limit for percent difference, biased high. In the same alternate source, trichlorofluoromethane exceeded the limit for percent difference, biased low. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: All acceptance criteria were met.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 25 was analyzed at a dilution due to dark, foamy sample matrix. Antifoam was added to the sample; unable to analyze more concentrated.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

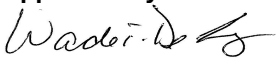
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124785
Approved By: Wade DeLong



Certificate of Analysis

Sample #:	L17041110-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-02A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 17:27
Collect Date:	04/21/2017 07:55	**Dilution:**	1	**File ID:**	17M0273081
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6	4.69	F	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	7.35		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.978	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	0.950	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.7	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-02B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 17:55
Collect Date:	04/21/2017 08:00	**Dilution:**	1	**File ID:**	17M0273082
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.71		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.257	F	1.00	0.250
Toluene	108-88-3	3.30		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.53		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.0	85	115	
1,2-Dichloroethane-d4	98.5	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-04B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:15
Collect Date:	04/21/2017 08:12	**Dilution:**	1	**File ID:**	17M0273083
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.38	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.197	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.260	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.795	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	53.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.3	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-04A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:35
Collect Date:	04/21/2017 08:18	**Dilution:**	1	**File ID:**	17M0273084
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.41	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.27		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.14		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.61		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	16.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.03		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.6	85	115	
1,2-Dichloroethane-d4	98.8	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-03B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 18:55
Collect Date:	04/21/2017 08:24	**Dilution:**	1	**File ID:**	17M0273085
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.10	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.186	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.284	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	10.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.747	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	51.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-03A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 19:15
Collect Date:	04/21/2017 08:30	**Dilution:**	1	**File ID:**	17M0273086
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.39	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	14.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.268	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	7.08		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.5	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	98.5	81	120	
4-Bromofluorobenzene	95.2	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR1-3-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 19:34
Collect Date:	04/21/2017 08:45	**Dilution:**	1	**File ID:**	17M0273087
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.46		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.91		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-1	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG611827	**Analyst:**	ADC	**Run Date:**	04/27/2017 20:01
Collect Date:	04/21/2017 08:49	**Dilution:**	1	**File ID:**	17M0273088
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.39		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	17.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.02		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-199B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:28
Collect Date:	04/21/2017 09:22	**Dilution:**	1	**File ID:**	6M146803
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.225	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.396	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	50.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.264	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-141-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:57
Collect Date:	04/21/2017 09:40	**Dilution:**	1	**File ID:**	8M419221
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.607	F	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.11		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.253	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	31.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-89-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:25
Collect Date:	04/21/2017 09:50	**Dilution:**	1	**File ID:**	8M419210
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.41	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.140	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.871	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.64		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-90-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:59
Collect Date:	04/21/2017 09:56	**Dilution:**	1	**File ID:**	6M146804
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.931	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.892	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.05		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.341	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-101B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:55
Collect Date:	04/21/2017 09:58	**Dilution:**	1	**File ID:**	8M419211
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.61	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	38.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-101T-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 17:25
Collect Date:	04/21/2017 10:03	**Dilution:**	1	**File ID:**	8M419212
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.57	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.129	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.81	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	37.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-212-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 17:55
Collect Date:	04/21/2017 10:35	**Dilution:**	1	**File ID:**	8M419213
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.83	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	30.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.39		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-7	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 18:25
Collect Date:	04/21/2017 10:40	**Dilution:**	1	**File ID:**	8M419214
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	31.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.48		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-62-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 10:29
Collect Date:	04/21/2017 11:00	**Dilution:**	1	**File ID:**	6M146805
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	12.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.475	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	3.05		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	9.47		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-202B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:56
Collect Date:	04/21/2017 11:08	**Dilution:**	1	**File ID:**	8M419219
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.34	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.534	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.427		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.37		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	35.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-5	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:26
Collect Date:	04/21/2017 11:10	**Dilution:**	1	**File ID:**	8M419220
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.87	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.525	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.421		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.55		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	36.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-202A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 18:56
Collect Date:	04/21/2017 11:15	**Dilution:**	1	**File ID:**	8M419215
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.167	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.16		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-143-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 19:25
Collect Date:	04/21/2017 11:35	**Dilution:**	1	**File ID:**	8M419216
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.417	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-262-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 19:56
Collect Date:	04/21/2017 11:40	**Dilution:**	1	**File ID:**	8M419217
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	16.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-256-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:27
Collect Date:	04/21/2017 14:00	**Dilution:**	1	**File ID:**	8M419218
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.562	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.643	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.633	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.48		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.294	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.77		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	27.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-140-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 21:13
Collect Date:	04/21/2017 14:25	**Dilution:**	1	**File ID:**	6M146783
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.43	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.162	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.26		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	94.7	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-213-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:36
Collect Date:	04/21/2017 16:02	**Dilution:**	5	**File ID:**	6M146818
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1	42.8	F	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	15.8		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3	70.8		50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	3.22	F	5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4		U	5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 15:55
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419209
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 14:25
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419206
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.8		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.7		1.00	0.250
1,1-Dichloroethane	75-34-3	20.2		1.00	0.125
1,1-Dichloroethene	75-35-4	19.7		1.00	0.500
1,1-Dichloropropene	563-58-6	19.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.4		1.00	0.150
1,2,3-Trichloropropane	96-18-4	18.7		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.0		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.8		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.8		1.00	0.250
1,3-Dichloropropane	142-28-9	19.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.6		1.00	0.250
2-Hexanone	591-78-6	17.6		10.0	2.50
2-Chlorotoluene	95-49-8	20.3		1.00	0.125
4-Chlorotoluene	106-43-4	18.2		1.00	0.250
Acetone	67-64-1	21.2		10.0	2.50
Benzene	71-43-2	20.3		0.400	0.125
Bromobenzene	108-86-1	19.1		1.00	0.125
Bromochloromethane	74-97-5	19.8		1.00	0.200
Bromodichloromethane	75-27-4	19.8		0.500	0.250
Bromoform	75-25-2	15.4		1.00	0.500
Bromomethane	74-83-9	22.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.6		1.00	0.500
Carbon tetrachloride	56-23-5	20.7		1.00	0.250
Chlorobenzene	108-90-7	18.9		0.500	0.125
Chloroethane	75-00-3	22.9		1.00	0.500
Chloroform	67-66-3	19.0		0.300	0.125
Chloromethane	74-87-3	21.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	18.5		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.4		1.00	0.250
Ethylbenzene	100-41-4	18.8		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.6		5.00	0.500
MEK (2-Butanone)	78-93-3	17.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.2		10.0	2.50
n-Butylbenzene	104-51-8	20.6		1.00	0.250
n-Propylbenzene	103-65-1	20.0		1.00	0.125
m-,p-Xylene	179601-23-1	39.8		2.00	0.500
Naphthalene	91-20-3	18.0		1.00	0.200
o-Xylene	95-47-6	19.0		1.00	0.250
p-Isopropyltoluene	99-87-6	20.0		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	20.3		1.00	0.125
Trichloroethene	79-01-6	19.4		1.00	0.250
tert-Butylbenzene	98-06-6	18.9		1.00	0.250
Tetrachloroethene	127-18-4	19.7		1.00	0.250
Toluene	108-88-3	20.3		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.0		1.00	0.500
Trichlorofluoromethane	75-69-4	20.4		1.00	0.250
Vinyl chloride	75-01-4	21.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.6	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Sample #:	L17041110-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-282-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611829	**Analyst:**	TMB	**Run Date:**	04/27/2017 14:55
Collect Date:	04/21/2017 11:01	**Dilution:**	1	**File ID:**	8M419207
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.4		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	19.4		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.9		1.00	0.250
1,2-Dichloroethane	107-06-2	20.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	17.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.6		1.00	0.200
1,2-Dibromoethane	106-93-4	19.6		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.8		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.5		0.500	0.125
1-Chlorohexane	544-10-5	20.8		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	20.5		10.0	2.50
2-Chlorotoluene	95-49-8	17.4		1.00	0.125
4-Chlorotoluene	106-43-4	20.5		1.00	0.250
Acetone	67-64-1	22.0		10.0	2.50
Benzene	71-43-2	20.0		0.400	0.125
Bromobenzene	108-86-1	19.0		1.00	0.125
Bromochloromethane	74-97-5	20.5		1.00	0.200
Bromodichloromethane	75-27-4	19.9		0.500	0.250
Bromoform	75-25-2	16.6		1.00	0.500
Bromomethane	74-83-9	23.7		1.00	0.500
Carbon disulfide	75-15-0	15.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	18.8		0.500	0.125
Chloroethane	75-00-3	22.4		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	21.4		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.6		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	20.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.3		1.00	0.250
Ethylbenzene	100-41-4	18.6		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.0		5.00	0.500
MEK (2-Butanone)	78-93-3	20.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.9		10.0	2.50
n-Butylbenzene	104-51-8	20.4		1.00	0.250
n-Propylbenzene	103-65-1	19.5		1.00	0.125
m-,p-Xylene	179601-23-1	40.0		2.00	0.500
Naphthalene	91-20-3	20.2		1.00	0.200
o-Xylene	95-47-6	19.2		1.00	0.250
p-Isopropyltoluene	99-87-6	19.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.4		1.00	0.250
Styrene	100-42-5	20.6		1.00	0.125
Trichloroethene	79-01-6	19.0		1.00	0.250
tert-Butylbenzene	98-06-6	18.2		1.00	0.250
Tetrachloroethene	127-18-4	19.3		1.00	0.250
Toluene	108-88-3	20.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.6		1.00	0.500
Trichlorofluoromethane	75-69-4	20.3		1.00	0.250
Vinyl chloride	75-01-4	21.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Sample #:	L17041110-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-281-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 20:42
Collect Date:	04/21/2017 08:27	**Dilution:**	1	**File ID:**	6M146782
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.687	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.24		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.57		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.31		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	49.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.21		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041110-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB4-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611838	**Analyst:**	TMB	**Run Date:**	04/27/2017 16:07
Collect Date:	04/21/2017 16:30	**Dilution:**	1	**File ID:**	6M146773
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144707	WG598323-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 08:36
6M144708	WG598323-02 5ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:02
6M144709	WG598323-03 20ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:37
6M144710	WG598323-04 50ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:10
6M144711	WG598323-05 100ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:42
6M144712	WG598323-06 200ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:14
6M144713	WG598323-07 300ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:47
6M144714	WG598323-08 400ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:19
6M144715	WG598323-09 500ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:52
6M144716	rinse	NA	1	1		01/12/17 13:25
6M144717	WG598323-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD79496	01/12/17 13:56
6M144718	WG598430-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 14:27
6M144719	WG598430-02 50ug/L CCV STD 8260	NA	1	1	STD79829	01/12/17 14:52
6M144720	WG598452-01 100ug/L A9 CCV STD 8260	NA	1	1	STD79571	01/12/17 15:27
6M144721	WG598431-01 VBLK0112 BLANK STD 826	NA	1	1		01/12/17 15:59
6M144722	WG598431-02 20ug/L LCS STD 8260	NA	1	1	STD79908	01/12/17 16:32
6M144723	L16120615-05 B MS 826-A9-SPE	7	1	1	STD79909	01/12/17 17:04
6M144724	L16120615-06 B MSD 826-A9-SPE	7	1	1	STD79909	01/12/17 17:37
6M144725	WG598431-03 100ug/L A9/FOO LCS	NA	1	1	STD79496	01/12/17 18:09
6M144726	L16120718-01 B TB 826-AP-SPE	<2	1	1		01/12/17 18:42
6M144727	L16120973-01 B TB 826-AP-SPE	<2	1	1		01/12/17 19:14
6M144728	L16120615-01 B 826-AP-SPE	7	1	1		01/12/17 19:46
6M144729	L16120615-02 B 826-AP-SPE	7	1	1		01/12/17 20:19
6M144730	L16120615-03 B EB 826-AP-SPE	4	1	1		01/12/17 20:51
6M144731	L16120615-04 B RS 826-AP-SPE	7	1	1		01/12/17 21:23
6M144732	L16120615-07 B 826-AP-SPE	4	1	1		01/12/17 21:55
6M144733	L16120615-08 B 826-AP-SPE	7	1	1		01/12/17 22:27
6M144734	L16120615-09 B 826-AP-SPE	7	1	1		01/12/17 22:59
6M144735	L16120718-02 B 826-AP-SPE	7	1	1		01/12/17 23:31
6M144736	L16120718-03 B 826-AP-SPE	7	1	1		01/13/17 00:03
6M144737	L16120718-04 B 826-AP-SPE	4	1	1		01/13/17 00:36
6M144738	L16120718-05 B 826-AP-SPE	4	1	1		01/13/17 01:08
6M144739	L16120718-06 B 826-AP-SPE	7	1	1		01/13/17 01:40
6M144740	L16120718-07 B 826-AP-SPE	7	1	1		01/13/17 02:12

Approved: January 13, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144741	RINSE	NA	1	1		01/13/17 02:44
6M144742	WG598431-07 VBLK0112 BLANK STD 624	NA	2	1		01/13/17 03:16
6M144743	L17010300-04 A 624	7	2	1		01/13/17 03:47
6M144744	L17010466-03 A 624-SPE	7	2	1		01/13/17 04:20
6M144745	L17010446-02 A 624-SPE1	7	2	1		01/13/17 04:52
6M144746	CCV	NA	1	1		01/13/17 05:24
6M144747	RINSE	NA	1	1		01/13/17 05:56
6M144748	RINSE	NA	1	1		01/13/17 06:28

Approved: January 13, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040517
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54116

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194 LCS: STD81257 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608938

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146219	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:24
6M146220	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:38
6M146221	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 16:29
6M146222	RINSE	NA	1	1	STD80989	04/05/17 16:54
6M146223	WG608938-02 0.3ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:25
6M146224	WG608938-03 0.4ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:57
6M146225	WG608938-04 1ug/L STD 8260	NA	1	1	STD81194	04/05/17 18:28
6M146226	WG608938-05 2ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:00
6M146227	WG608938-06 5ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:31
6M146228	WG608938-07 20ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:02
6M146229	WG608938-08 50ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:34
6M146230	WG608938-09 100ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:06
6M146231	WG608938-10 200ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:37
6M146232	WG608938-11 300ug/L STD 8260	NA	1	1	STD81194	04/05/17 22:09
6M146233	RINSE	NA	1	1		04/05/17 22:40

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 6M146219				
	Tune failed, DNR.			
2	X			
File ID: 6M146220				
	Tune failed, DNR. Clipped the column and repalced the ferrule on the column.			

Approved: April 07, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146234	RINSE	NA	1	1		04/06/17 12:16
6M146235	RINSE	NA	1	1		04/06/17 13:19
6M146236	WG609128-01 50ng BFB STD 8260	NA	1	1	STD80989	04/06/17 13:59
6M146237	WG609128-02 50ug/L CCV STD 8260	NA	1	1	STD81194	04/06/17 14:24
6M146238	WG608979-01 100ug/L A9 CCV STD 8260	NA	1	1	STD80642	04/06/17 14:54
6M146239	WG608987-01 VBLK0406 BLANK STD 826	NA	1	1		04/06/17 15:26
6M146240	WG608938-12 20ug/L ALT SRC STD 8260	NA	1	1	STD81257	04/06/17 15:57
6M146241	WG608987-02 20ug/L LCS STD 8260	NA	1	1	STD81257	04/06/17 16:28
6M146242	L17040128-01 B 1000X 826-SPE D1	<2	1	1000		04/06/17 16:59
6M146243	L17031533-15 A 826-SPE	<2	1	1		04/06/17 17:30
6M146244	L17031574-17 A RS 826-SPE	NA	1	1		04/06/17 18:01
6M146245	L17031574-18 A MS 826-SPE	NA	1	1	STD81257	04/06/17 18:32
6M146246	L17031574-19 A MSD 826-SPE	NA	1	1	STD81257	04/06/17 19:02
6M146247	L17040128-02 B 200X 826-SPE D1	10	1	200		04/06/17 19:32
6M146248	L17031574-28 TB A 826-SPE	<2	1	1		04/06/17 20:03
6M146249	L17031690-02 TB A 826-SPE	<2	1	1		04/06/17 20:33
6M146250	L17040002-01 LOQ 826-SPE	NA	1	1	STD81310	04/06/17 21:03
6M146251	L17040004-01 LOD 826-SPE	NA	1	1	STD81310	04/06/17 21:33
6M146252	L17031690-01 A 826-SPE	<2	1	1		04/06/17 22:04
6M146253	L17031574-25 A 826-SPE	<2	1	1		04/06/17 22:34
6M146254	L17031574-24 A 826-SPE	<2	1	1		04/06/17 23:04
6M146255	L17031574-27 A 2.5X 826-SPE	<2	1	2.5		04/06/17 23:35
6M146256	L17031574-26 A 826-SPE	<2	1	1		04/07/17 00:05
6M146257	L17031574-23 A 826-SPE	<2	1	1		04/07/17 00:35
6M146258	L17040173-01 A 10X 826-TC	5	17	10		04/07/17 01:06
6M146259	ccv	NA	1	1		04/07/17 01:36
6M146260	rinse	NA	1	1		04/07/17 02:06
6M146261	rinse	NA	1	1		04/07/17 02:36
6M146262	WG608867-01 A FBLK 10X 826-TC	NA	17	10		04/07/17 03:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes
14	X	1000	Over Calibration Range	D.ETHER

Approved: April 07, 2017
Sarah Vandenberg

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Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M146247				
20	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146253				
21	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146254				

Approved: April 07, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54128

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81397 LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609829

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418914	WG609829-01 50ng BFB STD 8260	NA	1	1	STD80989	04/12/17 10:17
8M418915	RINSE	NA	1	1	STD80989	04/12/17 10:42
8M418916	WG609829-02 5ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:11
8M418917	WG609829-03 20ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:40
8M418918	WG609829-04 50ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:10
8M418919	WG609829-05 100ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:41
8M418920	WG609829-06 200ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:10
8M418921	WG609829-07 300ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:40
8M418922	WG609829-08 400ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:10
8M418923	WG609829-09 500ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:39
8M418924	RINSE	NA	1	1		04/12/17 15:09
8M418925	RINSE	NA	1	1		04/12/17 15:39
8M418926	WG609829-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD81404	04/12/17 16:10
8M418927	WG609948-01 50ug/L CCV STD 8260	NA	1	1	STD81377	04/12/17 16:39
8M418928	RINSE	NA	1	1		04/12/17 17:09

Approved: April 18, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18/1
Maintenance Log ID: 54132

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610410

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418996	WG610373-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 09:44
8M418997	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:10
8M418998	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:42
8M418999	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/17/17 11:13
8M419000	WG610410-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 12:58
8M419001	RINSE	NA	1	1		04/17/17 13:21
8M419002	WG610410-02 0.3ug/L STD 8260	NA	1	1	STD81447	04/17/17 13:51
8M419003	WG610410-03 0.4ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:25
8M419004	WG610410-04 1ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:55
8M419005	WG610410-05 2ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:25
8M419006	WG610410-06 5ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:54
8M419007	WG610410-07 20ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:24
8M419008	WG610410-08 50ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:54
8M419009	WG610410-09 100ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:23
8M419010	WG610410-10 200ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:54
8M419011	WG610410-11 300ug/L STD 8260	NA	1	1	STD81447	04/17/17 18:24
8M419012	RINSE	NA	1	1		04/17/17 18:53
8M419013	RINSE	NA	1	1		04/17/17 19:23
8M419014	WG610410-12 50ug/L ALT SRC STD 8260	NA	1	1	STD81461	04/17/17 19:53
8M419015	RINSE	NA	1	1		04/17/17 20:23

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 8M418997				
			Bromomethane was low, DNR.	
3	X			
File ID: 8M418998				
			Bromomethane and iodomethane were low, DNR.	
4				
File ID: 8M418999				
			Not needed, DNR.	

Approved: April 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042517
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611545, WG611456

Comments: MDLS need RR for DCDF

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273002	WG611454-01 BFB 50ng 8260	NA	1	1	STD81491	04/25/17 20:07
17M0273003	RINSE	NA	1	1		04/25/17 20:25
17M0273004	WG611454-02 0.3ug/L STD 8260	NA	1	1	STD81577	04/25/17 20:45
17M0273005	WG611454-03 0.4ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:05
17M0273006	WG611454-04 1ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:24
17M0273007	WG611454-05 2ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:56
17M0273008	WG611454-06 5ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:15
17M0273009	WG611454-07 20ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:46
17M0273010	WG611454-08 50ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:06
17M0273011	WG611454-09 100ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:38
17M0273012	WG611454-10 200ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:58
17M0273013	WG611454-11 300ug/L STD 8260	NA	1	1	STD81577	04/26/17 00:33
17M0273014	RINSE	NA	1	1		04/26/17 00:53
17M0273015	WG611454-12 50ug/L ICV 8260	NA	1	1	STD81596	04/26/17 01:35
17M0273016	RINSE	NA	1	1		04/26/17 02:19
17M0273017	WG611456-01 BLANK 8260	NA	1	1		04/26/17 02:53
17M0273018	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 03:32
17M0273019	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 04:14
17M0273020	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 04:34
17M0273021	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 05:22
17M0273022	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 05:58
17M0273023	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 06:18
17M0273024	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 07:01
17M0273025	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 07:21
17M0273026	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 08:14

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54145

Internal Standard: STD81412 Surrogate Standard: STD81412
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG511829

Comments: Archon had a stuck vial error and did not finish the sequence.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419200	WG611802-01 50ng BFB STD 8260	NA	1	1	STD81491	04/27/17 11:30
8M419201	WG611802-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/27/17 11:55
8M419202	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/27/17 12:25
8M419203	WG611829-01 VBLK0427 BLANK STD 826	NA	1	1		04/27/17 12:55
8M419204	WG611829-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/27/17 13:25
8M419205	L17041086-01 B 10X 826-SPE 00	<2	1	10		04/27/17 13:55
8M419206	L17041110-27 A MS 826-SPE	<2	1	1	STD81634	04/27/17 14:25
8M419207	L17041110-28 A MSD 826-SPE	<2	1	1	STD81634	04/27/17 14:55
8M419208	L17041081-01 B 5X 826-SPE D1	<2	1	5		04/27/17 15:25
8M419209	L17041110-26 A RS 826-SPE	<2	1	1		04/27/17 15:55
8M419210	L17041110-11 A 826-SPE	<2	1	1		04/27/17 16:25
8M419211	L17041110-13 A 826-SPE	<2	1	1		04/27/17 16:55
8M419212	L17041110-14 A 826-SPE	<2	1	1		04/27/17 17:25
8M419213	L17041110-15 A 826-SPE	<2	1	1		04/27/17 17:55
8M419214	L17041110-16 A 826-SPE	<2	1	1		04/27/17 18:25
8M419215	L17041110-20 A 826-SPE	<2	1	1		04/27/17 18:56
8M419216	L17041110-21 A 826-SPE	<2	1	1		04/27/17 19:25
8M419217	L17041110-22 A 826-SPE	<2	1	1		04/27/17 19:56
8M419218	L17041110-23 A 826-SPE	<2	1	1		04/27/17 20:27
8M419219	L17041110-18 A 826-SPE	<2	1	1		04/27/17 20:56
8M419220	L17041110-19 A 826-SPE	<2	1	1		04/27/17 21:26
8M419221	L17041110-10 A 826-SPE	<2	1	1		04/27/17 21:57

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M419202				
Not needed, DNR.				
6	X	50	Over Calibration Range	TCE
File ID: 8M419205				

Approved: April 28, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611827, WG611888

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273064	WG611826-01 BFB 50ng 8260	NA	1	1	STD81491	04/27/17 11:37
17M0273065	WG611826-02 50ug/L CCV 8260	NA	1	1	STD81577	04/27/17 11:56
17M0273066	RINSE	NA	1	1		04/27/17 12:23
17M0273067	WG611827-01 BLANK 8260	NA	1	1		04/27/17 12:42
17M0273068	WG611827-02 20ug/L LCS 8260	NA	1	1	STD81596	04/27/17 13:02
17M0273069	L17041075-29 A MS 826-SPE	<2	1	1	STD81596	04/27/17 13:22
17M0273070	L17041075-30 A MSD 826-SPE	<2	1	1	STD81596	04/27/17 13:42
17M0273071	L17041120-01 B 10X 826-TC	NA	17	10		04/27/17 14:02
17M0273072	L17041120-02 B 10X 826-TC	NA	17	10		04/27/17 14:22
17M0273073	L17041120-03 B 10X 826-TC	NA	17	10		04/27/17 14:48
17M0273074	L17041075-24 B 2X 826-SPE	<2	1	1		04/27/17 15:08
17M0273075	L17041075-43 A 826-SPE	<2	1	1		04/27/17 15:28
17M0273076	L17041075-41 B 826-SPE	<2	1	1		04/27/17 15:47
17M0273077	L17041075-44 A 826-SPE	<2	1	1		04/27/17 16:07
17M0273078	L17041075-45 A 826-SPE	<2	1	1		04/27/17 16:27
17M0273079	L17041075-42 A 826-SPE	<2	1	1		04/27/17 16:47
17M0273080	L17041075-28 A 826-SPE	<2	1	1		04/27/17 17:07
17M0273081	L17041110-01 A 826-SPE	<2	1	1		04/27/17 17:27
17M0273082	L17041110-02 A 826-SPE	<2	1	1		04/27/17 17:55
17M0273083	L17041110-03 A 826-SPE	<2	1	1		04/27/17 18:15
17M0273084	L17041110-04 A 826-SPE	<2	1	1		04/27/17 18:35
17M0273085	L17041110-05 A 826-SPE	<2	1	1		04/27/17 18:55
17M0273086	L17041110-06 A 826-SPE	<2	1	1		04/27/17 19:15
17M0273087	L17041110-07 A 826-SPE	<2	1	1		04/27/17 19:34
17M0273088	L17041110-08 A 826-SPE	<2	1	1		04/27/17 20:01
17M0273089	WG611888-01 BLK 8260	NA	1	1		04/27/17 20:21
17M0273090	WG611888-02 20ug/L LCS 8260	NA	1	1	STD81596	04/27/17 20:51
17M0273091	L17041244-04 A MS 826-SPE	<2	1	1	STD81596	04/27/17 21:11
17M0273092	L17041244-05 A MSD 826-SPE	<2	1	1	STD81596	04/27/17 21:31
17M0273093	RINSE	NA	1	1		04/27/17 21:58
17M0273094	L17041244-01 A 826-SPE	<2	1	1		04/27/17 22:18
17M0273095	L17041244-02 A 826-SPE	<2	1	1		04/27/17 22:38
17M0273096	L17041244-03 A 826-SPE	<2	1	1		04/27/17 23:10
17M0273097	L17041244-06 A 826-SPE	5	1	1		04/27/17 23:30

Approved: April 28, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611827, WG611888

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273098	L17041244-08 A 826-SPE	<2	1	1		04/27/17 23:50
17M0273099	L17041244-09 A 826-SPE	3	1	1		04/28/17 00:20
17M0273100	RINSE	NA	1	1		04/28/17 00:40
17M0273101	RINSE	NA	1	1		04/28/17 01:17
17M0273102	RINSE	NA	1	1		04/28/17 01:36

Comments

Seq.	Rerun	Dil.	Reason	Analytes
35	X			
File ID: 17M0273098				
			L17041244-08 DNR MT	
36				
File ID: 17M0273099				
			L17041244-09 DNR MT	

Approved: April 28, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81599; STD81397 LCS: STD81634 MS/MSD: STD81638

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611838; WG611913

Comments: SAV secondary reviewed L17041088s only on 4/28/17.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146765	WG611834-01 50ng BFB STD 8260	NA	1	1	STD81491	04/27/17 12:00
6M146766	WG611834-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/27/17 12:26
6M146767	WG611839-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/27/17 13:03
6M146768	WG611838-01 VBLK0427 BLANK STD 826	NA	1	1		04/27/17 13:34
6M146769	WG611838-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/27/17 14:05
6M146770	L17041249-07 B MS 826-A9-SPE	7	1	1	STD81638	04/27/17 14:35
6M146771	L17041249-08 B MSD 826-A9-SPE	7	1	1	STD81638	04/27/17 15:06
6M146772	WG611838-06 100ug/L A9/FOO LCS	NA	1	1	STD81600	04/27/17 15:37
6M146773	L17041110-30 A TB 826-SPE	<2	1	1		04/27/17 16:07
6M146774	L17041251-03 B 826-A9-SPE	7	1	1		04/27/17 16:38
6M146775	L17041249-06 B RS 826-A9-SPE	7	1	1		04/27/17 17:09
6M146776	L17041249-13 B 20X 826-A9-SPE 00	7	1	20		04/27/17 17:39
6M146777	L17041314-04 A 826-A9-SPE	7	1	1		04/27/17 18:09
6M146778	L17041314-03 A 20X 826-A9-SPE	7	1	20		04/27/17 18:40
6M146779	L17041314-02 A 10X 826-A9-SPE	7	1	10		04/27/17 19:10
6M146780	L17041314-01 A 10X 826-A9-SPE	7	1	10		04/27/17 19:41
6M146781	L17041110-09 A 826-SPE	<2	1	1		04/27/17 20:12
6M146782	L17041110-29 A 826-SPE	<2	1	1		04/27/17 20:42
6M146783	L17041110-24 A 826-SPE	<2	1	1		04/27/17 21:13
6M146784	L17041110-25 A 10X 826-SPE	3	1	10		04/27/17 21:43
6M146785	L17041088-06 B 826-SPE2	<2	1	1		04/27/17 22:14
6M146786	L17041088-09 B 826-SPE2	<2	1	1		04/27/17 22:46
6M146787	WG611913-02 20ug/L LCS STD 624	NA	2	1	STD81634	04/27/17 23:16
6M146788	WG611913-03 20ug/L LCS2 STD 624	NA	2	1	STD81634	04/27/17 23:47
6M146789	RINSE	NA	2	1		04/28/17 00:19
6M146790	WG611913-01 VBLK0427 BLANK STD 624	NA	2	1		04/28/17 00:49
6M146791	L17041308-02 A TB 624-SPE	5	2	1		04/28/17 01:20
6M146792	L17041329-04 A TB 624-SPE	5	2	1		04/28/17 01:51
6M146793	L17041308-01 A 624-SPE	7	2	1		04/28/17 02:22
6M146794	L17041329-03 A 624-SPE	7	2	1		04/28/17 02:53
6M146795	CCV	NA	1	1		04/28/17 03:24
6M146796	RINSE	NA	1	1		04/28/17 03:55

Approved: May 01, 2017

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81599; STD81397 LCS: STD81634 MS/MSD: STD81638

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611838; WG611913

Comments: SAV secondary reviewed L17041088s only on 4/28/17.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
13	X	5	Over Calibration Range	C.TET
File ID: 6M146777				
14	X	100	Over Calibration Range	TCE
File ID: 6M146778				
15	X	5	Analyzed too dilute	
File ID: 6M146779				
16	X	5	Analyzed too dilute	
File ID: 6M146780				
17	X	1	Carry-over contamination	
File ID: 6M146781				
Possible cis 12 and tce carry over.				
20	X	5	Analyzed too dilute	
File ID: 6M146784				

Approved: May 01, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146797	WG611920-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 06:27
6M146798	WG611920-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 06:52
6M146799	WG611923-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 07:23
6M146800	WG611922-01 VBLK0428 BLANK STD 826	NA	1	1		04/28/17 07:54
6M146801	WG611922-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 08:25
6M146802	WG611922-03 100ug/L A9 LCS STD 8260	NA	1	1	STD81640	04/28/17 08:57
6M146803	L17041110-09 B 826-SPE	<2	1	1		04/28/17 09:28
6M146804	L17041110-12 A 826-SPE	<2	1	1		04/28/17 09:59
6M146805	L17041110-17 A 826-SPE	<2	1	1		04/28/17 10:29
6M146806	L17041200-50 A 826-SPE	<2	1	1		04/28/17 11:00
6M146807	L17041200-51 A 826-SPE	<2	1	1		04/28/17 11:30
6M146808	L17041200-52 A 826-SPE	<2	1	1		04/28/17 12:02
6M146809	L17041200-53 A 826-SPE	<2	1	1		04/28/17 12:32
6M146810	L17041200-54 A 826-SPE	<2	1	1		04/28/17 13:03
6M146811	L17041200-55 A 826-SPE	<2	1	1		04/28/17 13:34
6M146812	L17041200-56 RS A 826-SPE	<2	1	1		04/28/17 14:03
6M146813	L17041200-59 A 826-SPE	<2	1	1		04/28/17 14:33
6M146814	L17041200-57 A MS 826-SPE	<2	1	1	STD8	04/28/17 15:04
6M146816	L17041200-58 A MSD 826-SPE	<2	1	1	STD81634	04/28/17 15:35
6M146817	L17041314-04 B 5X 826-A9-SPE D1	6	1	5		04/28/17 16:05
6M146818	L17041110-25 B 5X 826-SPE 00	6	1	5		04/28/17 16:36
6M146819	L17041314-02 B 5X 826-SPE 00	3	1	5		04/28/17 17:06
6M146820	WG612082-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 18:32
6M146821	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 18:57
6M146822	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 19:35
6M146823	WG612110-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 20:07
6M146824	WG612085-01 BLANK STD 8260	NA	1	1		04/28/17 20:38
6M146825	WG612085-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 21:09
6M146826	L17041203-11 A MS 826-SPE	NA	1	1	STD81634	04/28/17 21:40
6M146827	L17041203-12 A MSD 826-SPE	NA	1	1	STD81634	04/28/17 22:10
6M146828	WG612085-06 100ug/L LCS STD 826-A9	NA	1	1	STD81640	04/28/17 22:41
6M146829	L17041431-05 A EB 826-A9-SPE	5	1	1		04/28/17 23:11
6M146830	L17041203-10 A REF 826-SPE	NA	1	1		04/28/17 23:42

Approved: May 03, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146831	L17041431-07 A 826-A9-SPE	6	1	1		04/29/17 00:12

Comments

Seq.	Rerun	Dil.	Reason	Analytes
21				
File ID: 6M146818				
			L17041110-25 B 5X 826-SPE 00 antifoam added. Sample is dark and foamy-unable to run more concentrated.	
22				
File ID: 6M146819				
			L17041314-02 B 5X 826-SPE 00 analyzed at a dilution based on sample history.	
24				
File ID: 6M146821				
			WG612082-02 50ug/L CCV STD 8260 rerun CCV, vinyl chloride is low.	
43				
File ID: 6M146830				
			L17041203-10 A REF 826-SPE F flag hits present in the blank. The sample is non-detect for all analytes.	

Approved: May 03, 2017

Microbac Laboratories Inc.

Data Checklist

Date: 12-JAN-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 79799
Analytical Workgroups: WG598323; WG598431

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-JAN-2017
Tiffany Bailey

Secondary Reviewer:
13-JAN-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: JAN-13-2017 13:54:15

Microbac Laboratories Inc.

Data Checklist

Date: 05-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81399
Analytical Workgroups: WG608938

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
06-APR-2017

Tiffany Bailey

Secondary Reviewer:
07-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:59:30

Microbac Laboratories Inc.

Data Checklist

Date: 06-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81412
Analytical Workgroups: WG608987

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
07-APR-2017
Tiffany Bailey

Secondary Reviewer:
07-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:09:55

Microbac Laboratories Inc.

Data Checklist

Date: 12-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81580
Analytical Workgroups: WG609829

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
17-APR-2017
Tiffany Bailey

Secondary Reviewer:
18-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-18-2017 13:13:22

Microbac Laboratories Inc.

Data Checklist

Date: 17-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81593
Analytical Workgroups: WG610410

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	TMB
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-APR-2017

Tiffany Bailey

Secondary Reviewer:
20-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-20-2017 13:10:53

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81782
Analytical Workgroups: WG611454, WG611456

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-31-2017 15:17:00

Microbac Laboratories Inc.

Data Checklist

Date: 27-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81810
Analytical Workgroups: WG611829

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-APR-2017
Tiffany Bailey

Secondary Reviewer:
28-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 14:15:35

Microbac Laboratories Inc.

Data Checklist

Date: 27-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81805
Analytical Workgroups: WG611827, WG611888

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 13:11:18

Microbac Laboratories Inc.

Data Checklist

Date: 27-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81812
Analytical Workgroups: WG611838; WG611913

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	MES
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
	SAV SECONDARIED L17041088 ON 4/28/
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-APR-2017
Tiffany Bailey

Secondary Reviewer:
01-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-01-2017 10:28:57

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81824
Analytical Workgroups: WG611922; WG612085

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
29-APR-2017
Tiffany Bailey

Secondary Reviewer:
03-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-03-2017 09:32:40

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611827

Login Number: L17041110

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW101-02A-LS-25	01	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-02B-LS-25	02	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-04B-LS-25	03	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-04A-LS-25	04	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-03B-LS-25	05	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
PMW101-03A-LS-25	06	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
DR1-3-LS-25	07	04/21/17					04/27/2017	6.5	14		04/27/17	6.5	14	
DUP-1	08	04/21/17					04/27/2017	6.5	14		04/27/17	6.5	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5267583
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611829

Login Number: L17041110

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-141-LS-25	10	04/21/17					04/27/2017	6.5	14		04/27/17	6.5	14	
MW-89-LS-25	11	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-101B-LS-25	13	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-101T-LS-25	14	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-212-LS-25	15	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
DUP-7	16	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-202B-LS-25	18	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
DUP-5	19	04/21/17					04/27/2017	6.4	14		04/27/17	6.4	14	
MW-202A-LS-25	20	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-143-LS-25	21	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-262-LS-25	22	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-256-LS-25	23	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-282-LS-25	26	04/21/17					04/27/2017	6.2	14		04/27/17	6.2	14	
MW-282-LS-25	27	04/21/17					04/27/2017	6.1	14		04/27/17	6.1	14	
MW-282-LS-25	28	04/21/17					04/27/2017	6.2	14		04/27/17	6.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5267583
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611838

Login Number: L17041110

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-140-LS-25	24	04/21/17					04/27/2017	6.3	14		04/27/17	6.3	14	
MW-281-LS-25	29	04/21/17					04/27/2017	6.5	14		04/27/17	6.5	14	
LTM-TB4-LS-25	30	04/21/17					04/27/2017	6	14		04/27/17	6	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5267583
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611922

Login Number: L17041110

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-199B-LS-25	09	04/21/17					04/28/2017	7	14		04/28/17	7	14	
MW-90-LS-25	12	04/21/17					04/28/2017	7	14		04/28/17	7	14	
MW-62-LS-25	17	04/21/17					04/28/2017	7	14		04/28/17	7	14	
MW-213-LS-25	25	04/21/17					04/28/2017	7	14		04/28/17	7	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5267583
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041110 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-05-APR-17
Workgroup (AAB#): WG611838 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041110-24	1.00	01	107	94.7	111	107
L17041110-29	1.00	01	109	103	110	106
L17041110-30	1.00	01	108	100	110	107
WG611838-01	1.00	01	107	99.3	110	107
WG611838-02	1.00	01	107	102	108	107
WG611838-06	1.00	02	106	102	110	107

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5267591
Report generated: 05/01/2017 14:05

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041110 **Method:** 8260
Instrument Id: HPMS17 **CAL ID:** HPMS17-26-APR-17
Workgroup (AAB#): WG611827 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041110-01	1.00	01	99.4	97.7	101	98.8
L17041110-02	1.00	01	98.5	98.0	101	99.8
L17041110-03	1.00	01	101	99.3	103	101
L17041110-04	1.00	01	98.8	97.6	99.0	99.6
L17041110-05	1.00	01	105	103	110	106
L17041110-06	1.00	01	101	98.5	95.2	98.5
L17041110-07	1.00	01	103	100	100	100
L17041110-08	1.00	01	103	101	110	105
WG611827-01	1.00	01	101	97.8	104	102
WG611827-02	1.00	01	103	101	105	103

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5267591
Report generated: 05/01/2017 14:05

Login Number: L17041110
Instrument Id: HPMS8
Workgroup (AAB#): WG611829

Method: 8260
CAL ID: HPMS8-17-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041110-10	1.00	01	104	101	106	107
L17041110-11	1.00	01	103	101	105	107
L17041110-13	1.00	01	102	101	105	107
L17041110-14	1.00	01	101	101	106	107
L17041110-15	1.00	01	101	99.8	106	107
L17041110-16	1.00	01	103	100	105	106
L17041110-18	1.00	01	106	101	106	108
L17041110-19	1.00	01	103	102	107	107
L17041110-20	1.00	01	103	101	106	108
L17041110-21	1.00	01	104	101	106	106
L17041110-22	1.00	01	103	101	107	108
L17041110-23	1.00	01	102	100	106	107
L17041110-26	1.00	01	101	100	108	107
L17041110-27	1.00	01	99.6	102	102	107
L17041110-28	1.00	01	102	102	101	107
WG611829-01	1.00	01	103	100	107	108
WG611829-02	1.00	01	104	103	102	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5267591
Report generated: 05/01/2017 14:05

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041110 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-05-APR-17
Workgroup (AAB#): WG611922 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041110-09	1.00	02	107	102	110	107
L17041110-12	1.00	01	110	102	111	106
L17041110-17	1.00	01	110	101	112	106
L17041110-25	5.00	DL01	109	103	109	106
WG611922-01	1.00	01	110	102	109	106
WG611922-02	1.00	01	110	104	106	106
WG611922-03	1.00	01	110	105	112	108

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5267591
Report generated: 05/01/2017 14:05

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041110
Blank File ID: 17M0273067
Prep Date: 04/27/17 12:42
Analyzed Date: 04/27/17 12:42
Analyst: ADC

Work Group: WG611827
Blank Sample ID: WG611827-01
Instrument ID: HPMS17
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611827-02	17M0273068	04/27/17 13:02	01
PMW101-02A-LS-25	L17041110-01	17M0273081	04/27/17 17:27	01
PMW101-02B-LS-25	L17041110-02	17M0273082	04/27/17 17:55	01
PMW101-04B-LS-25	L17041110-03	17M0273083	04/27/17 18:15	01
PMW101-04A-LS-25	L17041110-04	17M0273084	04/27/17 18:35	01
PMW101-03B-LS-25	L17041110-05	17M0273085	04/27/17 18:55	01
PMW101-03A-LS-25	L17041110-06	17M0273086	04/27/17 19:15	01
DR1-3-LS-25	L17041110-07	17M0273087	04/27/17 19:34	01
DUP-1	L17041110-08	17M0273088	04/27/17 20:01	01

Report Name: BLANK_SUMMARY
PDF File ID: 5267584
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041110
Work Group: WG611838
Blank File ID: 6M146768
Blank Sample ID: WG611838-01
Prep Date: 04/27/17 13:34
Instrument ID: HPMS6
Analyzed Date: 04/27/17 13:34
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611838-02	6M146769	04/27/17 14:05	01
LCS	WG611838-06	6M146772	04/27/17 15:37	02
LTM-TB4-LS-25	L17041110-30	6M146773	04/27/17 16:07	01
MW-281-LS-25	L17041110-29	6M146782	04/27/17 20:42	01
MW-140-LS-25	L17041110-24	6M146783	04/27/17 21:13	01

Report Name: BLANK_SUMMARY
PDF File ID: 5267584
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041110
Blank File ID: 6M146800
Prep Date: 04/28/17 07:54
Analyzed Date: 04/28/17 07:54
Analyst: TMB

Work Group: WG611922
Blank Sample ID: WG611922-01
Instrument ID: HPMS6
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611922-02	6M146801	04/28/17 08:25	01
LCS	WG611922-03	6M146802	04/28/17 08:57	01
MW-199B-LS-25	L17041110-09	6M146803	04/28/17 09:28	02
MW-90-LS-25	L17041110-12	6M146804	04/28/17 09:59	01
MW-62-LS-25	L17041110-17	6M146805	04/28/17 10:29	01
MW-213-LS-25	L17041110-25	6M146818	04/28/17 16:36	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5267584
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041110
Work Group: WG611829
Blank File ID: 8M419203
Blank Sample ID: WG611829-01
Prep Date: 04/27/17 12:55
Instrument ID: HPMS8
Analyzed Date: 04/27/17 12:55
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611829-02	8M419204	04/27/17 13:25	01
MW-282-LS-25	L17041110-27	8M419206	04/27/17 14:25	01
MW-282-LS-25	L17041110-28	8M419207	04/27/17 14:55	01
MW-282-LS-25	L17041110-26	8M419209	04/27/17 15:55	01
MW-89-LS-25	L17041110-11	8M419210	04/27/17 16:25	01
MW-101B-LS-25	L17041110-13	8M419211	04/27/17 16:55	01
MW-101T-LS-25	L17041110-14	8M419212	04/27/17 17:25	01
MW-212-LS-25	L17041110-15	8M419213	04/27/17 17:55	01
DUP-7	L17041110-16	8M419214	04/27/17 18:25	01
MW-202A-LS-25	L17041110-20	8M419215	04/27/17 18:56	01
MW-143-LS-25	L17041110-21	8M419216	04/27/17 19:25	01
MW-262-LS-25	L17041110-22	8M419217	04/27/17 19:56	01
MW-256-LS-25	L17041110-23	8M419218	04/27/17 20:27	01
MW-202B-LS-25	L17041110-18	8M419219	04/27/17 20:56	01
DUP-5	L17041110-19	8M419220	04/27/17 21:26	01
MW-141-LS-25	L17041110-10	8M419221	04/27/17 21:57	01

Report Name: BLANK_SUMMARY
PDF File ID: 5267584
Report generated 05/01/2017 14:03

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041110 Prep Date:04/27/17 12:42 Sample ID:WG611827-01
Instrument ID:HPMS17 Run Date:04/27/17 12:42 Prep Method:5030B/5030C/503
File ID:17M0273067 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611827 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041110 Prep Date:04/27/17 12:42 Sample ID:WG611827-01
Instrument ID:HPMS17 Run Date:04/27/17 12:42 Prep Method:5030B/5030C/503
File ID:17M0273067 Analyst:ADC Method:8260B
Workgroup (AAB#):WG611827 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.8	85 - 115	PASS
1,2-Dichloroethane-d4	101	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041110 Prep Date: 04/27/17 13:34 Sample ID: WG611838-01
Instrument ID: HPMS6 Run Date: 04/27/17 13:34 Prep Method: 5030B/5030C/503
File ID: 6M146768 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611838 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041110 Prep Date: 04/27/17 13:34 Sample ID: WG611838-01
Instrument ID: HPMS6 Run Date: 04/27/17 13:34 Prep Method: 5030B/5030C/503
File ID: 6M146768 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611838 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.3	85 - 115	PASS
1,2-Dichloroethane-d4	107	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	110	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

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METHOD BLANK REPORT

Login Number:L17041110 Prep Date:04/28/17 07:54 Sample ID:WG611922-01
Instrument ID:HPMS6 Run Date:04/28/17 07:54 Prep Method:5030B/5030C/503
File ID:6M146800 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611922 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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METHOD BLANK REPORT

Login Number: L17041110 Prep Date: 04/28/17 07:54 Sample ID: WG611922-01
Instrument ID: HPMS6 Run Date: 04/28/17 07:54 Prep Method: 5030B/5030C/503
File ID: 6M146800 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	110	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	109	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041110 Prep Date:04/27/17 12:55 Sample ID:WG611829-01
Instrument ID:HPMS8 Run Date:04/27/17 12:55 Prep Method:5030B/5030C/503
File ID:8M419203 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611829 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041110 Prep Date:04/27/17 12:55 Sample ID:WG611829-01
Instrument ID:HPMS8 Run Date:04/27/17 12:55 Prep Method:5030B/5030C/503
File ID:8M419203 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611829 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	100	85	-	115	PASS
1,2-Dichloroethane-d4	103	72	-	119	PASS
Toluene-d8	108	81	-	120	PASS
4-Bromofluorobenzene	107	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5267585
25-JUL-2017 15:55

LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611827-02
Instrument ID: HPMS17 Run Time: 13:02 Prep Method: 5030B/5030C/503
File ID: 17M0273068 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611827 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.2	95.9	81 - 129	
1,1,1-Trichloroethane	20.0	20.8	104	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.3	75 - 125	
1,1-Dichloroethane	20.0	20.3	102	69 - 133	
1,1-Dichloroethene	20.0	19.8	98.8	68 - 130	
1,1-Dichloropropene	20.0	20.2	101	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.0	94.8	67 - 137	
1,2,3-Trichloropropane	20.0	20.1	101	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.9	99.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.8	98.8	74 - 132	
1,2-Dichloroethane	20.0	20.2	101	69 - 132	
1,2-Dichlorobenzene	20.0	19.3	96.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.7	104	50 - 132	
1,2-Dichloropropane	20.0	20.2	101	75 - 125	
1,2-Dibromoethane	20.0	19.6	98.1	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.9	99.6	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.6	75 - 124	
1,3-Dichloropropane	20.0	20.7	104	73 - 126	
1,4-Dichlorobenzene	20.0	19.1	95.5	74 - 123	
1-Chlorohexane	20.0	21.4	107	70 - 125	
2,2-Dichloropropane	20.0	21.7	109	69 - 137	
2-Hexanone	20.0	22.1	111	55 - 130	
2-Chlorotoluene	20.0	19.4	97.0	73 - 126	
4-Chlorotoluene	20.0	20.1	100	74 - 128	
Acetone	20.0	20.3	102	40 - 135	
Benzene	20.0	19.9	99.7	81 - 122	
Bromobenzene	20.0	19.0	95.2	76 - 124	
Bromochloromethane	20.0	20.6	103	65 - 129	
Bromodichloromethane	20.0	19.7	98.5	76 - 121	
Bromoform	20.0	19.6	98.1	69 - 128	
Bromomethane	20.0	20.9	105	30 - 141	
Carbon disulfide	20.0	16.6	82.8	58 - 128	
Carbon tetrachloride	20.0	20.5	103	66 - 138	
Chlorobenzene	20.0	19.4	97.2	81 - 122	
Chloroethane	20.0	20.1	101	58 - 133	
Chloroform	20.0	20.3	102	69 - 128	
Chloromethane	20.0	20.8	104	56 - 131	
cis-1,2-Dichloroethene	20.0	20.0	99.8	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	110	69 - 131	
Dibromochloromethane	20.0	19.4	96.8	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5267586
Report generated: 07/25/2017 15:56

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611827-02
Instrument ID: HPMS17 Run Time: 13:02 Prep Method: 5030B/5030C/503
File ID: 17M0273068 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG611827 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.5	103	76 - 125	
Dichlorodifluoromethane	20.0	27.1	136	30 - 153	
Ethylbenzene	20.0	19.9	99.6	73 - 127	
Hexachlorobutadiene	20.0	19.2	95.8	67 - 131	
Isopropylbenzene	20.0	19.6	98.2	75 - 127	
Methylene chloride	20.0	19.2	96.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.6	103	65 - 123	
MEK (2-Butanone)	20.0	21.2	106	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.3	107	58 - 134	
n-Butylbenzene	20.0	20.7	103	69 - 137	
n-Propylbenzene	20.0	19.9	99.6	72 - 129	
m-,p-Xylene	40.0	40.0	100	76 - 128	
Naphthalene	20.0	19.8	98.8	54 - 138	
o-Xylene	20.0	20.0	100	80 - 121	
p-Isopropyltoluene	20.0	20.3	101	73 - 130	
sec-Butylbenzene	20.0	19.9	99.6	72 - 127	
Styrene	20.0	20.4	102	65 - 134	
Trichloroethene	20.0	18.7	93.4	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.8	99.1	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	20.0	99.9	63 - 137	
trans-1,3-Dichloropropene	20.0	20.8	104	59 - 135	
Trichlorofluoromethane	20.0	21.6	108	57 - 129	
Vinyl chloride	20.0	23.7	118	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	105	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5267586
Report generated: 07/25/2017 15:56

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611838-02
Instrument ID: HPMS6 Run Time: 14:05 Prep Method: 5030B/5030C/503
File ID: 6M146769 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611838 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.2	96.0	81 - 129	
1,1,1-Trichloroethane	20.0	20.7	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.7	103	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	21.1	105	69 - 133	
1,1-Dichloroethene	20.0	20.9	105	68 - 130	
1,1-Dichloropropene	20.0	20.7	104	73 - 132	
1,2,3-Trichlorobenzene	20.0	16.8	83.9	67 - 137	
1,2,3-Trichloropropane	20.0	20.5	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	17.6	88.0	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	20.7	104	69 - 132	
1,2-Dichlorobenzene	20.0	18.6	93.1	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.0	95.1	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.2	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.3	102	74 - 131	
1,3-Dichlorobenzene	20.0	18.7	93.7	75 - 124	
1,3-Dichloropropane	20.0	21.1	106	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.8	104	70 - 125	
2,2-Dichloropropane	20.0	17.5	87.3	69 - 137	
2-Hexanone	20.0	23.0	115	55 - 130	
2-Chlorotoluene	20.0	18.9	94.5	73 - 126	
4-Chlorotoluene	20.0	22.2	111	74 - 128	
Acetone	20.0	22.4	112	40 - 135	
Benzene	20.0	19.9	99.7	81 - 122	
Bromobenzene	20.0	19.3	96.3	76 - 124	
Bromochloromethane	20.0	19.9	99.5	65 - 129	
Bromodichloromethane	20.0	20.1	100	76 - 121	
Bromoform	20.0	18.1	90.7	69 - 128	
Bromomethane	20.0	14.4	71.9	30 - 141	
Carbon disulfide	20.0	14.7	73.5	58 - 128	
Carbon tetrachloride	20.0	20.1	101	66 - 138	
Chlorobenzene	20.0	19.4	96.8	81 - 122	
Chloroethane	20.0	21.5	107	58 - 133	
Chloroform	20.0	19.0	94.8	69 - 128	
Chloromethane	20.0	21.6	108	56 - 131	
cis-1,2-Dichloroethene	20.0	19.7	98.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.7	108	69 - 131	
Dibromochloromethane	20.0	19.3	96.4	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611838-02
Instrument ID: HPMS6 Run Time: 14:05 Prep Method: 5030B/5030C/503
File ID: 6M146769 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611838 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.1	101	76 - 125	
Dichlorodifluoromethane	20.0	21.7	109	30 - 153	
Ethylbenzene	20.0	19.4	97.1	73 - 127	
Hexachlorobutadiene	20.0	17.3	86.3	67 - 131	
Isopropylbenzene	20.0	19.7	98.6	75 - 127	
Methylene chloride	20.0	19.1	95.5	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.2	101	65 - 123	
MEK (2-Butanone)	20.0	21.6	108	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.8	104	58 - 134	
n-Butylbenzene	20.0	20.5	103	69 - 137	
n-Propylbenzene	20.0	20.3	101	72 - 129	
m-,p-Xylene	40.0	39.4	98.6	76 - 128	
Naphthalene	20.0	18.2	90.9	54 - 138	
o-Xylene	20.0	19.6	98.2	80 - 121	
p-Isopropyltoluene	20.0	20.1	100	73 - 130	
sec-Butylbenzene	20.0	20.1	101	72 - 127	
Styrene	20.0	20.1	100	65 - 134	
Trichloroethene	20.0	18.4	92.0	70 - 127	
tert-Butylbenzene	20.0	19.9	99.4	70 - 129	
Tetrachloroethene	20.0	19.5	97.3	66 - 128	
Toluene	20.0	20.2	101	77 - 122	
trans-1,2-Dichloroethene	20.0	19.5	97.6	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	103	59 - 135	
Trichlorofluoromethane	20.0	19.8	99.1	57 - 129	
Vinyl chloride	20.0	17.4	86.9	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	107	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	108	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5267586
Report generated: 07/25/2017 15:56

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG611922-02
Instrument ID: HPMS6 Run Time: 08:25 Prep Method: 5030B/5030C/503
File ID: 6M146801 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.6	93.1	81 - 129	
1,1,1-Trichloroethane	20.0	19.9	99.7	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.2	106	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.7	75 - 125	
1,1-Dichloroethane	20.0	20.7	104	69 - 133	
1,1-Dichloroethene	20.0	20.1	101	68 - 130	
1,1-Dichloropropene	20.0	19.7	98.4	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.7	88.7	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.4	92.2	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.8	99.2	74 - 132	
1,2-Dichloroethane	20.0	21.0	105	69 - 132	
1,2-Dichlorobenzene	20.0	18.5	92.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.9	104	50 - 132	
1,2-Dichloropropane	20.0	20.4	102	75 - 125	
1,2-Dibromoethane	20.0	19.4	97.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.6	97.9	74 - 131	
1,3-Dichlorobenzene	20.0	18.4	92.2	75 - 124	
1,3-Dichloropropane	20.0	21.3	107	73 - 126	
1,4-Dichlorobenzene	20.0	18.4	92.2	74 - 123	
1-Chlorohexane	20.0	20.0	100	70 - 125	
2,2-Dichloropropane	20.0	22.3	111	69 - 137	
2-Hexanone	20.0	24.2	121	55 - 130	
2-Chlorotoluene	20.0	19.9	99.7	73 - 126	
4-Chlorotoluene	20.0	19.4	97.0	74 - 128	
Acetone	20.0	21.3	107	40 - 135	
Benzene	20.0	19.5	97.3	81 - 122	
Bromobenzene	20.0	18.5	92.7	76 - 124	
Bromochloromethane	20.0	20.8	104	65 - 129	
Bromodichloromethane	20.0	19.6	98.2	76 - 121	
Bromoform	20.0	18.5	92.3	69 - 128	
Bromomethane	20.0	15.0	75.1	30 - 141	
Carbon disulfide	20.0	14.5	72.7	58 - 128	
Carbon tetrachloride	20.0	20.3	102	66 - 138	
Chlorobenzene	20.0	18.7	93.5	81 - 122	
Chloroethane	20.0	22.1	110	58 - 133	
Chloroform	20.0	18.7	93.5	69 - 128	
Chloromethane	20.0	21.5	107	56 - 131	
cis-1,2-Dichloroethene	20.0	19.2	96.0	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	109	69 - 131	
Dibromochloromethane	20.0	18.8	94.0	66 - 133	

LCS - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG611922-02
Instrument ID: HPMS6 Run Time: 08:25 Prep Method: 5030B/5030C/503
File ID: 6M146801 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	22.5	112	30 - 153	
Ethylbenzene	20.0	18.9	94.7	73 - 127	
Hexachlorobutadiene	20.0	17.3	86.4	67 - 131	
Isopropylbenzene	20.0	19.1	95.6	75 - 127	
Methylene chloride	20.0	19.3	96.5	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.6	103	65 - 123	
MEK (2-Butanone)	20.0	22.7	113	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	22.0	110	58 - 134	
n-Butylbenzene	20.0	20.2	101	69 - 137	
n-Propylbenzene	20.0	19.5	97.4	72 - 129	
m-,p-Xylene	40.0	38.2	95.6	76 - 128	
Naphthalene	20.0	19.5	97.6	54 - 138	
o-Xylene	20.0	19.3	96.6	80 - 121	
p-Isopropyltoluene	20.0	19.5	97.3	73 - 130	
sec-Butylbenzene	20.0	19.3	96.7	72 - 127	
Styrene	20.0	19.8	99.0	65 - 134	
Trichloroethene	20.0	17.2	85.9	70 - 127	
tert-Butylbenzene	20.0	18.8	93.8	70 - 129	
Tetrachloroethene	20.0	18.5	92.4	66 - 128	
Toluene	20.0	19.5	97.7	77 - 122	
trans-1,2-Dichloroethene	20.0	19.0	95.1	63 - 137	
trans-1,3-Dichloropropene	20.0	21.6	108	59 - 135	
Trichlorofluoromethane	20.0	19.7	98.4	57 - 129	
Vinyl chloride	20.0	20.2	101	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	110	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5267586
Report generated: 07/25/2017 15:56

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611829-02
Instrument ID: HPMS8 Run Time: 13:25 Prep Method: 5030B/5030C/503
File ID: 8M419204 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611829 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.9	94.5	81 - 129	
1,1,1-Trichloroethane	20.0	21.3	106	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.5	97.4	63 - 128	
1,1,2-Trichloroethane	20.0	18.8	94.2	75 - 125	
1,1-Dichloroethane	20.0	20.6	103	69 - 133	
1,1-Dichloroethene	20.0	20.6	103	68 - 130	
1,1-Dichloropropene	20.0	20.4	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.1	90.4	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.6	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.3	91.6	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.2	101	74 - 132	
1,2-Dichloroethane	20.0	20.6	103	69 - 132	
1,2-Dichlorobenzene	20.0	18.8	94.1	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	17.6	88.1	50 - 132	
1,2-Dichloropropane	20.0	20.3	102	75 - 125	
1,2-Dibromoethane	20.0	19.5	97.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.7	98.3	74 - 131	
1,3-Dichlorobenzene	20.0	18.5	92.3	75 - 124	
1,3-Dichloropropane	20.0	20.1	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.5	92.6	74 - 123	
1-Chlorohexane	20.0	21.3	107	70 - 125	
2,2-Dichloropropane	20.0	20.4	102	69 - 137	
2-Hexanone	20.0	19.6	98.1	55 - 130	
2-Chlorotoluene	20.0	17.4	86.9	73 - 126	
4-Chlorotoluene	20.0	20.9	104	74 - 128	
Acetone	20.0	19.1	95.6	40 - 135	
Benzene	20.0	20.6	103	81 - 122	
Bromobenzene	20.0	19.0	95.2	76 - 124	
Bromochloromethane	20.0	20.4	102	65 - 129	
Bromodichloromethane	20.0	20.0	99.8	76 - 121	
Bromoform	20.0	16.0	80.1	69 - 128	
Bromomethane	20.0	21.6	108	30 - 141	
Carbon disulfide	20.0	16.2	80.9	58 - 128	
Carbon tetrachloride	20.0	21.1	106	66 - 138	
Chlorobenzene	20.0	18.7	93.3	81 - 122	
Chloroethane	20.0	23.3	117	58 - 133	
Chloroform	20.0	19.2	95.8	69 - 128	
Chloromethane	20.0	22.0	110	56 - 131	
cis-1,2-Dichloroethene	20.0	20.0	100	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	110	69 - 131	
Dibromochloromethane	20.0	18.9	94.4	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611829-02
Instrument ID: HPMS8 Run Time: 13:25 Prep Method: 5030B/5030C/503
File ID: 8M419204 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611829 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81461 Cal ID: HPMS8-17-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	24.6	123	30 - 153	
Ethylbenzene	20.0	18.6	93.2	73 - 127	
Hexachlorobutadiene	20.0	17.7	88.6	67 - 131	
Isopropylbenzene	20.0	19.9	99.7	75 - 127	
Methylene chloride	20.0	19.7	98.7	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.4	97.1	65 - 123	
MEK (2-Butanone)	20.0	20.2	101	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.3	101	58 - 134	
n-Butylbenzene	20.0	20.8	104	69 - 137	
n-Propylbenzene	20.0	19.8	99.2	72 - 129	
m-,p-Xylene	40.0	40.1	100	76 - 128	
Naphthalene	20.0	18.8	93.8	54 - 138	
o-Xylene	20.0	19.1	95.3	80 - 121	
p-Isopropyltoluene	20.0	20.1	101	73 - 130	
sec-Butylbenzene	20.0	19.9	99.5	72 - 127	
Styrene	20.0	20.5	102	65 - 134	
Trichloroethene	20.0	19.5	97.7	70 - 127	
tert-Butylbenzene	20.0	18.6	93.0	70 - 129	
Tetrachloroethene	20.0	19.7	98.5	66 - 128	
Toluene	20.0	20.3	101	77 - 122	
trans-1,2-Dichloroethene	20.0	20.5	102	63 - 137	
trans-1,3-Dichloropropene	20.0	19.0	95.1	59 - 135	
Trichlorofluoromethane	20.0	21.5	107	57 - 129	
Vinyl chloride	20.0	23.0	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041110 Cal ID: HPMS8- 17-APR-17 Worknum: WG611829

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041110-26 File ID: 8M419209 Dil: 1 Method: 5035A

Sample ID: L17041110-27 MS File ID: 8M419206 Dil: 1 Matrix: 8260B

Sample ID: L17041110-28 MSD File ID: 8M419207 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.0	95.2	20.0	19.1	95.6	0.458	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.8	104	20.0	20.1	101	3.22	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	18.9	94.7	20.0	19.9	99.6	5.03	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.7	93.5	20.0	19.4	96.8	3.38	75 - 125	20	
1,1-Dichloroethane	U	20.0	20.2	101	20.0	20.0	100	0.852	69 - 133	20	
1,1-Dichloroethene	U	20.0	19.7	98.3	20.0	19.4	97.1	1.21	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.8	98.8	20.0	19.4	96.8	2.04	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	17.4	87.1	20.0	18.7	93.3	6.79	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	18.7	93.6	20.0	19.4	96.8	3.37	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.4	92.2	20.0	18.7	93.7	1.69	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.2	101	20.0	19.9	99.3	1.51	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.8	99.2	20.0	20.1	100	1.27	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	19.0	94.8	20.0	18.9	94.4	0.495	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	17.0	84.8	20.0	17.8	89.1	4.91	50 - 132	20	
1,2-Dichloropropane	U	20.0	20.1	101	20.0	19.6	98.1	2.57	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.0	94.9	20.0	19.6	98.2	3.35	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.8	99.1	20.0	19.6	97.8	1.34	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.8	93.8	20.0	18.8	93.9	0.138	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.4	96.9	20.0	20.5	103	5.70	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.1	95.6	20.0	18.5	92.5	3.27	74 - 123	20	
1-Chlorohexane	U	20.0	20.9	104	20.0	20.8	104	0.581	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.6	103	20.0	20.3	102	1.52	69 - 137	20	
2-Hexanone	U	20.0	17.6	88.2	20.0	20.5	103	15.2	55 - 130	20	
2-Chlorotoluene	U	20.0	20.3	102	20.0	17.4	87	15.6	73 - 126	20	
4-Chlorotoluene	U	20.0	18.2	91	20.0	20.5	102	11.8	74 - 128	20	
Acetone	U	20.0	21.2	106	20.0	22.0	110	3.41	40 - 135	20	
Benzene	U	20.0	20.3	101	20.0	20.0	99.8	1.69	81 - 122	20	
Bromobenzene	U	20.0	19.1	95.6	20.0	19.0	95.1	0.547	76 - 124	20	
Bromochloromethane	U	20.0	19.8	99	20.0	20.5	103	3.72	65 - 129	20	
Bromodichloromethane	U	20.0	19.8	98.8	20.0	19.9	99.5	0.720	76 - 121	20	
Bromoform	U	20.0	15.4	77.2	20.0	16.6	83.2	7.48	69 - 128	20	
Bromomethane	U	20.0	22.7	114	20.0	23.7	118	3.98	30 - 141	20	
Carbon disulfide	U	20.0	15.6	77.9	20.0	15.7	78.7	1.09	58 - 128	20	
Carbon tetrachloride	U	20.0	20.7	103	20.0	20.1	101	2.70	66 - 138	20	
Chlorobenzene	U	20.0	18.9	94.5	20.0	18.8	94.2	0.293	81 - 122	20	
Chloroethane	U	20.0	22.9	115	20.0	22.4	112	2.25	58 - 133	20	
Chloroform	U	20.0	19.0	95.2	20.0	18.7	93.3	1.97	69 - 128	20	
Chloromethane	U	20.0	21.2	106	20.0	21.4	107	0.870	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	20.1	101	20.0	19.5	97.6	3.05	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	21.1	105	20.0	21.6	108	2.34	69 - 131	20	
Dibromochloromethane	U	20.0	18.5	92.7	20.0	19.4	97.2	4.80	66 - 133	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5267771

Report generated 07/25/2017 15:56

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041110 Cal ID: HPMS8 17-APR-17 Worknum: WG611829

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041110-26 File ID: 8M419209 Dil: 1 Method: 5035A

Sample ID: L17041110-27 MS File ID: 8M419206 Dil: 1 Matrix: 8260B

Sample ID: L17041110-28 MSD File ID: 8M419207 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.0	100	20.0	20.4	102	1.90	76 - 125	20	
Dichlorodifluoromethane	U	20.0	23.4	117	20.0	23.3	117	0.277	30 - 153	20	
Ethylbenzene	U	20.0	18.8	94.1	20.0	18.6	93	1.12	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.0	90.2	20.0	18.0	89.8	0.479	67 - 131	20	
Isopropylbenzene	U	20.0	19.8	99.2	20.0	19.7	98.4	0.862	75 - 127	20	
Methylene chloride	U	20.0	19.4	97.2	20.0	19.6	97.9	0.717	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	18.6	93.1	20.0	20.0	100	7.28	65 - 123	20	
MEK (2-Butanone)	U	20.0	17.9	89.4	20.0	20.2	101	12.2	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	17.2	85.9	20.0	18.9	94.7	9.66	58 - 134	20	
n-Butylbenzene	U	20.0	20.6	103	20.0	20.4	102	0.849	69 - 137	20	
n-Propylbenzene	U	20.0	20.0	99.9	20.0	19.5	97.4	2.58	72 - 129	20	
m-,p-Xylene	U	40.0	39.8	99.4	40.0	40.0	100	0.700	76 - 128	20	
Naphthalene	U	20.0	18.0	89.8	20.0	20.2	101	11.6	54 - 138	20	
o-Xylene	U	20.0	19.0	95.2	20.0	19.2	95.8	0.683	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.0	100	20.0	19.8	99.2	1.09	73 - 130	20	
sec-Butylbenzene	U	20.0	19.9	99.7	20.0	19.4	97	2.74	72 - 127	20	
Styrene	U	20.0	20.3	102	20.0	20.6	103	1.58	65 - 134	20	
Trichloroethene	U	20.0	19.4	96.8	20.0	19.0	94.8	2.09	70 - 127	20	
tert-Butylbenzene	U	20.0	18.9	94.7	20.0	18.2	91.2	3.70	70 - 129	20	
Tetrachloroethene	U	20.0	19.7	98.7	20.0	19.3	96.4	2.46	66 - 128	20	
Toluene	U	20.0	20.3	102	20.0	20.2	101	0.598	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.8	99.2	20.0	19.6	98.1	1.11	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.0	95.2	20.0	19.6	98	2.94	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.4	102	20.0	20.3	102	0.172	57 - 129	20	
Vinyl chloride	U	20.0	21.8	109	20.0	21.0	105	3.80	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5267771

Report generated 07/25/2017 15:56

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS17
Analyst: FJB
Workgroup: WG611454

Tune ID: WG611454-01
Run Date: 04/25/2017
Run Time: 20:07
File ID: 17M0273002
Cal ID: HPMS17 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	4824	PASS
75.0	95.0	30.0	60.0	48.1	14022	PASS
95.0	95.0	100	100	100	29152	PASS
96.0	95.0	5.00	9.00	6.70	1953	PASS
173	174	0	2.00	0.808	223	PASS
174	95.0	50.0	100	94.7	27600	PASS
175	174	5.00	9.00	7.26	2004	PASS
176	174	95.0	101	98.5	27192	PASS
177	176	5.00	9.00	6.67	1814	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611454-02	STD	01	04/25/2017 20:45	
WG611454-03	STD	01	04/25/2017 21:05	
WG611454-04	STD	01	04/25/2017 21:24	
WG611454-05	STD	01	04/25/2017 21:56	
WG611454-06	STD	01	04/25/2017 22:15	
WG611454-07	STD	01	04/25/2017 22:46	
WG611454-08	STD-CCV	01	04/25/2017 23:06	
WG611454-09	STD	01	04/25/2017 23:38	
WG611454-10	STD	01	04/25/2017 23:58	
WG611454-11	STD	01	04/26/2017 00:33	
WG611454-12	SSCV	01	04/26/2017 01:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS17
Analyst: ADC
Workgroup: WG611826

Tune ID: WG611826-01
Run Date: 04/27/2017
Run Time: 11:37
File ID: 17M0273064
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.9	8386	PASS
75.0	95.0	30.0	60.0	48.5	22779	PASS
95.0	95.0	100	100	100	46968	PASS
96.0	95.0	5.00	9.00	6.75	3172	PASS
173	174	0	2.00	0.922	407	PASS
174	95.0	50.0	100	94.0	44133	PASS
175	174	5.00	9.00	7.94	3505	PASS
176	174	95.0	101	97.0	42800	PASS
177	176	5.00	9.00	7.01	3001	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611826-02	CCV	01	04/27/2017 11:56	
WG611827-01	BLANK	01	04/27/2017 12:42	
WG611827-02	LCS	01	04/27/2017 13:02	
L17041110-01	PMW101-02A-LS-25	01	04/27/2017 17:27	
L17041110-02	PMW101-02B-LS-25	01	04/27/2017 17:55	
L17041110-03	PMW101-04B-LS-25	01	04/27/2017 18:15	
L17041110-04	PMW101-04A-LS-25	01	04/27/2017 18:35	
L17041110-05	PMW101-03B-LS-25	01	04/27/2017 18:55	
L17041110-06	PMW101-03A-LS-25	01	04/27/2017 19:15	
L17041110-07	DR1-3-LS-25	01	04/27/2017 19:34	
L17041110-08	DUP-1	01	04/27/2017 20:01	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS6
Analyst: TMB
Workgroup: WG608938

Tune ID: WG608938-01
Run Date: 04/05/2017
Run Time: 16:29
File ID: 6M146221
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.3	4043	PASS
75.0	95.0	30.0	60.0	46.5	10875	PASS
95.0	95.0	100	100	100	23389	PASS
96.0	95.0	5.00	9.00	7.16	1674	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.5	17883	PASS
175	174	5.00	9.00	7.58	1356	PASS
176	174	95.0	101	96.1	17186	PASS
177	176	5.00	9.00	7.35	1263	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-02	STD	01	04/05/2017 17:25	
WG608938-03	STD	01	04/05/2017 17:57	
WG608938-04	STD	01	04/05/2017 18:28	
WG608938-05	STD	01	04/05/2017 19:00	
WG608938-06	STD	01	04/05/2017 19:31	
WG608938-07	STD	01	04/05/2017 20:02	
WG608938-08	STD-CCV	01	04/05/2017 20:34	
WG608938-09	STD	01	04/05/2017 21:06	
WG608938-10	STD	01	04/05/2017 21:37	
WG608938-11	STD	01	04/05/2017 22:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS6
Analyst: TMB
Workgroup: WG609128

Tune ID: WG609128-01
Run Date: 04/06/2017
Run Time: 13:59
File ID: 6M146236
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	6056	PASS
75.0	95.0	30.0	60.0	47.8	16465	PASS
95.0	95.0	100	100	100	34464	PASS
96.0	95.0	5.00	9.00	7.14	2460	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	26498	PASS
175	174	5.00	9.00	7.37	1953	PASS
176	174	95.0	101	98.9	26205	PASS
177	176	5.00	9.00	6.88	1804	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-12	SSCV	01	04/06/2017 15:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS6
Analyst: TMB
Workgroup: WG611834

Tune ID: WG611834-01
Run Date: 04/27/2017
Run Time: 12:00
File ID: 6M146765
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.8	5725	PASS
75.0	95.0	30.0	60.0	50.5	15371	PASS
95.0	95.0	100	100	100	30453	PASS
96.0	95.0	5.00	9.00	7.09	2159	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	69.4	21142	PASS
175	174	5.00	9.00	7.38	1561	PASS
176	174	95.0	101	97.7	20656	PASS
177	176	5.00	9.00	6.60	1364	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611834-02	CCV	01	04/27/2017 12:26	
WG611839-01	CCV	01	04/27/2017 13:03	
WG611838-01	BLANK	01	04/27/2017 13:34	
WG611838-02	LCS	01	04/27/2017 14:05	
L17041110-30	LTM-TB4-LS-25	01	04/27/2017 16:07	
L17041110-29	MW-281-LS-25	01	04/27/2017 20:42	
L17041110-24	MW-140-LS-25	01	04/27/2017 21:13	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS6
Analyst: TMB
Workgroup: WG611920

Tune ID: WG611920-01
Run Date: 04/28/2017
Run Time: 06:27
File ID: 6M146797
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.9	5780	PASS
75.0	95.0	30.0	60.0	49.3	15935	PASS
95.0	95.0	100	100	100	32354	PASS
96.0	95.0	5.00	9.00	6.78	2194	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	69.1	22363	PASS
175	174	5.00	9.00	7.22	1614	PASS
176	174	95.0	101	97.3	21763	PASS
177	176	5.00	9.00	7.25	1577	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611920-02	CCV	01	04/28/2017 06:52	
WG611923-01	CCV	01	04/28/2017 07:23	
WG611922-01	BLANK	01	04/28/2017 07:54	
WG611922-02	LCS	01	04/28/2017 08:25	
L17041110-09	MW-199B-LS-25	02	04/28/2017 09:28	
L17041110-12	MW-90-LS-25	01	04/28/2017 09:59	
L17041110-17	MW-62-LS-25	01	04/28/2017 10:29	
L17041110-25	MW-213-LS-25	DL01	04/28/2017 16:36	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS8
Analyst: TMB
Workgroup: WG609829

Tune ID: WG609829-01
Run Date: 04/12/2017
Run Time: 10:17
File ID: 8M418914
Cal ID: HPMS8-12-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.0	6807	PASS
75.0	95.0	30.0	60.0	45.8	20724	PASS
95.0	95.0	100	100	100	45280	PASS
96.0	95.0	5.00	9.00	6.80	3077	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	94.7	42898	PASS
175	174	5.00	9.00	8.05	3453	PASS
176	174	95.0	101	100	42994	PASS
177	176	5.00	9.00	6.69	2876	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609829-02	STD	01	04/12/2017 11:11	
WG609829-03	STD	01	04/12/2017 11:40	
WG609829-04	STD	01	04/12/2017 12:10	
WG609829-05	STD-CCV	01	04/12/2017 12:41	
WG609829-06	STD	01	04/12/2017 13:10	
WG609829-07	STD	01	04/12/2017 13:40	
WG609829-08	STD	01	04/12/2017 14:10	
WG609829-09	STD	01	04/12/2017 14:39	
WG609829-10	SSCV	01	04/12/2017 16:10	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS8
Analyst: TMB
Workgroup: WG610410

Tune ID: WG610410-01
Run Date: 04/17/2017
Run Time: 12:58
File ID: 8M419000
Cal ID: HPMS8 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.1	8216	PASS
75.0	95.0	30.0	60.0	47.8	21655	PASS
95.0	95.0	100	100	100	45349	PASS
96.0	95.0	5.00	9.00	6.40	2901	PASS
173	174	0	2.00	0.273	110	PASS
174	95.0	50.0	100	89.0	40349	PASS
175	174	5.00	9.00	7.54	3042	PASS
176	174	95.0	101	99.8	40256	PASS
177	176	5.00	9.00	6.96	2800	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610410-02	STD	01	04/17/2017 13:51	
WG610410-03	STD	01	04/17/2017 14:25	
WG610410-04	STD	01	04/17/2017 14:55	
WG610410-05	STD	01	04/17/2017 15:25	
WG610410-06	STD	01	04/17/2017 15:54	
WG610410-07	STD	01	04/17/2017 16:24	
WG610410-08	STD-CCV	01	04/17/2017 16:54	
WG610410-09	STD	01	04/17/2017 17:23	
WG610410-10	STD	01	04/17/2017 17:54	
WG610410-11	STD	01	04/17/2017 18:24	
WG610410-12	SSCV	01	04/17/2017 19:53	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041110
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611802

Tune ID: WG611802-01
Run Date: 04/27/2017
Run Time: 11:30
File ID: 8M419200
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.2	7535	PASS
75.0	95.0	30.0	60.0	49.1	19271	PASS
95.0	95.0	100	100	100	39280	PASS
96.0	95.0	5.00	9.00	6.33	2488	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	83.0	32621	PASS
175	174	5.00	9.00	7.87	2567	PASS
176	174	95.0	101	98.1	32016	PASS
177	176	5.00	9.00	6.59	2110	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611802-02	CCV	01	04/27/2017 11:55	
WG611829-01	BLANK	01	04/27/2017 12:55	
WG611829-02	LCS	01	04/27/2017 13:25	
L17041110-27	MW-282-LS-25	01	04/27/2017 14:25	
L17041110-28	MW-282-LS-25	01	04/27/2017 14:55	
L17041110-26	MW-282-LS-25	01	04/27/2017 15:55	
L17041110-11	MW-89-LS-25	01	04/27/2017 16:25	
L17041110-13	MW-101B-LS-25	01	04/27/2017 16:55	
L17041110-14	MW-101T-LS-25	01	04/27/2017 17:25	
L17041110-15	MW-212-LS-25	01	04/27/2017 17:55	
L17041110-16	DUP-7	01	04/27/2017 18:25	
L17041110-20	MW-202A-LS-25	01	04/27/2017 18:56	
L17041110-21	MW-143-LS-25	01	04/27/2017 19:25	
L17041110-22	MW-262-LS-25	01	04/27/2017 19:56	
L17041110-23	MW-256-LS-25	01	04/27/2017 20:27	
L17041110-18	MW-202B-LS-25	01	04/27/2017 20:56	
L17041110-19	DUP-5	01	04/27/2017 21:26	
L17041110-10	MW-141-LS-25	01	04/27/2017 21:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5267588
Report generated 05/01/2017 14:04

Response Factor Report HPMS17

Method Path : D:\MassHunter\GCMS\1\methods\
Method File : 826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017
Response Via : Initial Calibration
Curve: WG611454
Calibration Files
0.3 =17M0273004.D 0.4 =17M0273005.D 1 =17M0273006.D 2 =17M0273007.D 5 =17M0273008.D 20 =17M0273009.D
50 =17M0273010.D 100 =17M0273011.D 200 =17M0273012.D 300 =17M0273013.D

		Compound	0.3	0.4	1	2	5	20	50	100	200	300	Avg	%RSD	Linear	
1)	I	Fluorobenzene	----------	----------	ISTD	----------	----------	----------	----------	----------	----------	----------				
2)	T	Dichlorodifluo...			0.260	0.246	0.267	0.322	0.327	0.324	0.332		0.297	12.54		
3)	P	Chloromethane			0.289	0.283	0.279	0.292	0.288	0.306	0.297		0.291	3.11		
4)	C	Vinyl Chloride		0.334	0.306	0.292	0.311	0.331	0.329	0.335	0.334		0.322	5.07#		
5)	T	1,3-Butadiene			0.188	0.192	0.198	0.198	0.204	0.199	0.203		0.198	2.87		
6)	T	Bromomethane			0.262	0.263	0.258	0.240	0.222	0.218	0.212		0.239	9.17		
7)	T	Chloroethane			0.168	0.160	0.171	0.175	0.136	0.132	0.126		0.153	13.55		
8)	T	Trichlorofluor...		0.447	0.424	0.402	0.439	0.444	0.443	0.377	0.326		0.413	10.36		
9)	T	Diethyl ether			0.196	0.198	0.197	0.204	0.205	0.200		0.193	0.199	2.16		
10)	C	1,1-Dichloroet...		0.404	0.386	0.364	0.383	0.390	0.388	0.395	0.380		0.386	3.03#		
11)	T	Carbon Disulfide		0.890	0.818	0.756	0.827	0.821	0.852	0.833	0.834		0.829	4.51		
12)	T	1,1,2-Trichlor...		0.257	0.242	0.225	0.254	0.248	0.254	0.246	0.244		0.246	4.10		
13)	T	Iodomethane				0.121	0.187	0.272	0.364	0.380	0.394		0.286	39.36	0.996	
14)	T	Acrolein			0.024	0.023	0.025	0.025	0.026	0.025		0.024	0.025	4.79		
15)	T	Methylene Chlo...		0.339	0.301	0.285	0.291	0.285	0.280	0.286	0.277		0.293	6.85		
16)	T	Acetone					0.061	0.052	0.049	0.049	0.047	0.045	0.050	11.07		
17)	T	trans-1,2-Dich...		0.268	0.253	0.255	0.262	0.264	0.265	0.272	0.266		0.263	2.40		
18)	T	Methyl acetate		0.108	0.123	0.115	0.131	0.144	0.154	0.148			0.132	13.21		
19)	T	Methyl Tert Bu...		0.648	0.647	0.641	0.679	0.672	0.688	0.695	0.668		0.667	3.02		
20)	P	1,1-Dichloroet...		0.467	0.456	0.453	0.480	0.480	0.477	0.489	0.477		0.472	2.64		
21)	T	Acrylonitrile			0.060	0.062	0.064	0.065	0.067	0.066		0.065	0.064	3.92		
22)	T	Vinyl Acetate					0.040	0.040	0.045	0.041	0.045		0.042	5.97		
23)	T	cis-1,2-Dichlo...		0.300	0.282	0.289	0.302	0.297	0.299	0.308	0.303		0.298	2.74		
24)	T	2,2-Dichloropr...		0.198	0.267	0.290	0.328	0.352	0.378	0.381	0.374		0.321	20.34	1.000	
25)	T	Cyclohexane		0.391	0.387	0.372	0.406	0.398	0.421	0.412	0.427		0.402	4.54		
26)	T	Bromochloromet...			0.167	0.179	0.195	0.196	0.200	0.205	0.201		0.192	7.24		
27)	C	Chloroform	0.476	0.514	0.492	0.492	0.499	0.489	0.489	0.499	0.482		0.492	2.21#		
28)	T	Carbon Tetrach...		0.361	0.362	0.363	0.396	0.400	0.407	0.415	0.411		0.389	6.02		
29)	S	Dibromofluorom...					0.275	0.249	0.278	0.278	0.271		0.270	4.54		
30)	T	1,1,1-Trichlor...		0.429	0.422	0.414	0.435	0.440	0.438	0.448	0.437		0.433	2.51		
31)	T	1,1-Dichloropr...		0.347	0.327	0.312	0.336	0.340	0.352	0.352	0.352		0.340	4.22		
32)	T	2-Butanone					0.076	0.070	0.076	0.076	0.075	0.076	0.075	3.44		
33)	T	Benzene		1.142	1.045	1.024	1.062	1.054	1.058	1.085	1.050		1.065	3.34		
34)	S	1,2-Dichloroet...					0.270	0.237	0.260	0.255	0.243		0.253	5.23		
35)	T	1,2-Dichloroet...		0.343	0.317	0.322	0.341	0.332	0.333	0.336	0.328		0.332	2.70		
36)	T	Methylcyclohexane	0.445	0.432	0.414	0.377	0.420	0.401	0.438	0.416	0.444		0.421	5.28		
37)	T	Trichloroethene		0.341	0.312	0.307	0.316	0.316	0.318	0.327	0.321		0.320	3.24		

38)	T	Dibromomethane		0.152	0.152	0.157	0.169	0.164	0.168	0.172	0.170		0.163	5.00
39)	C	1,2-Dichloropr...		0.266	0.267	0.269	0.285	0.281	0.285	0.293	0.287		0.279	3.71#
40)	T	Bromodichlorom...		0.366	0.349	0.359	0.373	0.376	0.381	0.394	0.384		0.373	3.87
41)	T	1,4-Dioxane				0.001	0.001	0.001	0.001	0.002		0.002	0.001	14.84
42)	T	2-Chloroethyl ...					0.105	0.117	0.128	0.134	0.137	0.139	0.127	10.41
43)	T	cis-1,3-Dichlo...		0.377	0.382	0.390	0.424	0.429	0.445	0.456	0.457		0.420	7.82
44)	T	4-Methyl-2-Pen...					0.067	0.065	0.070	0.070	0.073	0.071	0.069	4.03
45)	T	trans-1,3-Dich...			0.304	0.322	0.360	0.366	0.379	0.384	0.385		0.357	8.95
46)	I	Chlorobenzene-d5	----------				ISTD							
47)	S	Toluene-d8					1.299	1.170	1.283	1.272	1.214		1.248	4.33
48)	C	Toluene		1.663	1.512	1.548	1.591	1.582	1.580	1.566	1.498		1.567	3.27#
49)	T	Tetrachloroethene		0.485	0.430	0.434	0.456	0.441	0.450	0.442	0.439		0.447	3.89
50)	T	1,1,2-Trichlor...		0.311	0.288	0.309	0.315	0.305	0.307	0.303	0.291		0.304	3.07
51)	T	Dibromochlorom...		0.416	0.367	0.402	0.421	0.423	0.432	0.434	0.423		0.415	5.22
52)	T	1,3-Dichloropr...		0.483	0.456	0.486	0.499	0.493	0.490	0.487	0.468		0.483	2.88
53)	T	1,2-Dibromoethane		0.321	0.294	0.307	0.317	0.312	0.319	0.314	0.305		0.311	2.90
54)	T	2-Hexanone				0.148	0.167	0.155	0.162	0.160	0.161	0.165	0.160	3.98
55)	P	Chlorobenzene		1.094	1.016	1.032	1.053	1.049	1.059	1.062	1.047		1.052	2.18
56)	T	1-Chlorohexane			0.079	0.083	0.085	0.082	0.090	0.086	0.090		0.085	4.55
57)	C	Ethylbenzene		0.559	0.502	0.540	0.551	0.549	0.559	0.558	0.562		0.547	3.65#
58)	T	1,1,1,2-Tetrac...		0.410	0.381	0.411	0.416	0.413	0.415	0.418	0.411		0.409	2.94
59)	T	m-,p-Xylene		0.674	0.615	0.631	0.668	0.663	0.683	0.683	0.669		0.661	3.73
60)	T	o-Xylene		0.641	0.608	0.642	0.657	0.652	0.667	0.667	0.673		0.651	3.22
61)	T	Styrene		0.997	0.921	0.974	1.039	1.066	1.104	1.114	1.118		1.042	6.95
62)	P	Bromoform		0.266	0.242	0.266	0.297	0.299	0.320	0.317	0.326		0.292	10.42
63)	T	Isopropylbenzene		1.730	1.595	1.609	1.721	1.707	1.728	1.702	1.688		1.685	3.16
64)	I	1,4-Dichlorobenzen...	----------				ISTD							
65)	T	1,3,5-Trimethy...		2.872	2.652	2.732	2.866	2.834	2.818	2.719	2.803		2.787	2.80
66)	S	p-Bromofluorob...					0.760	0.784	0.849	0.859	0.933		0.837	8.16
67)	T	Bromobenzene	1.037	1.017	0.926	0.992	0.982	0.980	0.965	0.942	1.010		0.983	3.63
68)	T	n-Propylbenzene		3.922	3.496	3.615	3.790	3.761	3.731	3.532	3.687		3.692	3.82
69)	P	1,1,2,2-Tetrac...		0.626	0.622	0.654	0.713	0.686	0.713	0.660	0.705		0.672	5.56
70)	T	2-Chlorotoluene		2.386	2.198	2.292	2.324	2.292	2.254	2.170	2.314		2.279	3.06
71)	T	1,2,3-Trichlor...			0.187	0.210	0.205	0.199	0.200	0.191	0.200		0.199	3.97
72)	T	trans-1,4-Dich...				0.117	0.137	0.162	0.163	0.151	0.160		0.148	12.16
73)	T	1,2,4-Trimethy...		2.943	2.640	2.798	2.903	2.859	2.845	2.747	2.748		2.810	3.47
74)	T	4-Chlorotoluene		2.343	2.198	2.273	2.309	2.286	2.278	2.179	2.332		2.275	2.59
75)	T	tert-Butylbenzene		0.586	0.535	0.564	0.572	0.558	0.549	0.530	0.561		0.557	3.32
76)	T	sec-Butylbenzene		3.659	3.288	3.403	3.563	3.490	3.493	3.283	3.287		3.433	4.13
77)	T	p-Isopropyltol...		3.074	2.747	2.850	3.010	3.003	3.034	2.869	2.827		2.927	4.03
78)	T	1,3-Dichlorobe...		1.858	1.620	1.702	1.733	1.715	1.724	1.659	1.703		1.714	4.03
79)	T	1,4-Dichlorobe...	1.966	1.849	1.636	1.697	1.726	1.676	1.707	1.646	1.674		1.731	6.25
80)	T	n-Butylbenzene		2.652	2.263	2.273	2.525	2.497	2.628	2.473	2.450		2.470	5.81
81)	T	1,2-Dichlorobe...	1.682	1.851	1.580	1.672	1.685	1.675	1.679	1.623	1.591		1.671	4.72
82)	T	1,2-Dibromo-3-...			0.106	0.124	0.124	0.125	0.133	0.131	0.121		0.123	6.94
83)	T	Hexachlorobuta...		0.813	0.679	0.669	0.716	0.682	0.733	0.684	0.658		0.704	7.14
84)	T	1,2,4-Trichlor...		1.286	1.140	1.150	1.242	1.250	1.332	1.289	1.240		1.241	5.39
85)	T	Naphthalene		2.524	2.180	2.327	2.511	2.473	2.606	2.480	2.261		2.420	6.08
86)	T	1,2,3-Trichlor...	1.286	1.267	1.117	1.171	1.220	1.198	1.264	1.182	1.145		1.206	4.84

(#) = Out of Range

826VMS.M Thu Apr 27 10:23:42 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water - IC: 011217 - HPMS6
Last Calibration: Thu Jan 12 13:53:06 2017
Curve: WG598323
Calibration Files

	Compound	5 6M144708.D	20 6M144709.D	50 6M144710.D	100 6M144711.D	200 6M144712.D	300 6M144713.D	400 6M144714.D	500 6M144715.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile	0.021	0.019	0.018	0.017	0.018	0.016	0.017	0.017	0.018	8.729
T	3-Chloro-1-propene	0.301	0.305	0.307	0.308	0.306	0.295	0.287	0.289	0.300	2.763
T	2-Chloro-1,3-butadiene	0.348	0.368	0.380	0.385	0.382	0.371	0.361	0.364	0.370	3.335
T	Ethyl Acetate	0.144	0.163	0.169	0.166	0.171	0.152	0.159	0.159	0.160	5.700
T	Methacrylonitrile	0.076	0.087	0.089	0.088	0.089	0.080	0.083	0.083	0.084	5.535
T	Isobutyl Alcohol	0.004	0.006	0.006	0.005	0.005	0.004	0.005	0.006	0.005	13.176
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.146	0.173	0.185	0.185	0.188	0.171	0.177	0.178	0.175	7.640
T	2-Nitropropane		0.063	0.071	0.071	0.076	0.070	0.075	0.074	0.071	6.228
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.008	0.009	0.008	0.010	0.009	0.011	0.012	0.009	14.808

Fri Jan 13 10:37:15 2017

Calibration Table Report
Method: 8260BWT.M
Title: 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Calibration: Thu Apr 06 09:55:03 2017
Curve: WG608938
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
		6M146223.D	6M146224.D	6M146225.D	6M146226.D	6M146227.D	6M146228.D	6M146229.D	6M146230.D	6M146231.D	6M146232.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.381	0.345	0.365	0.434	0.430	0.411	0.412		0.397	8.516		
P	Chloromethane			0.725	0.639	0.561	0.528	0.467	0.463	0.448		0.547	18.885	0.999	
C	Vinyl Chloride		0.564	0.506	0.438	0.420	0.464	0.451	0.364	0.420		0.454	13.323		
T	1,3-Butadiene					0.220	0.212	0.176	0.135	0.148	0.118	0.168	24.710		0.990
T	Bromomethane			0.176	0.159	0.179	0.196	0.221	0.211	0.228		0.196	13.055		
T	Chloroethane			0.192	0.183	0.199	0.207	0.203	0.189	0.193		0.195	4.273		
T	Trichlorofluoromethane		0.432	0.460	0.431	0.458	0.479	0.482	0.482	0.492		0.465	5.013		
T	Diethyl ether			0.191	0.192	0.193	0.189	0.192	0.197		0.202	0.194	2.274		
T	Isoprene					0.366	0.355	0.386	0.387	0.385	0.414	0.382	5.221		
T	Acrolein				0.021	0.021	0.020	0.021	0.023		0.021	0.021	4.175		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.269	0.247	0.261	0.264	0.264	0.265	0.271		0.263	2.932		
T	Acetone					0.057	0.058	0.055	0.053	0.056	0.045	0.054	8.929		
C	1,1-Dichloroethene		0.380	0.369	0.368	0.387	0.390	0.386	0.377	0.392		0.381	2.398		
T	Tert-Butyl Alcohol				0.017	0.018	0.016	0.014	0.018		0.017	0.017	8.130		
T	Dimethyl Sulfide					0.267	0.261	0.276	0.270	0.280	0.281	0.272	2.955		
T	Iodomethane			0.108	0.126	0.150	0.197	0.214	0.251	0.224	0.221	0.186	27.720	0.997	
T	Methyl acetate					0.129	0.125	0.134	0.140	0.141	0.143	0.135	5.216		
T	Methylene Chloride			0.311	0.287	0.287	0.286	0.285	0.274	0.287		0.288	3.813		
T	Carbon Disulfide			0.835	0.817	0.814	0.779	0.841	0.818	0.842	0.816	0.820	2.481		
T	Acrylonitrile			0.058	0.059	0.063	0.063	0.066	0.067		0.060	0.063	5.597		
T	Methyl Tert Butyl Ether			0.650	0.621	0.661	0.659	0.631	0.620	0.582		0.632	4.438		
T	trans-1,2-Dichloroethene		0.269	0.274	0.273	0.272	0.276	0.276	0.271	0.283		0.274	1.519		
T	n-Hexane					0.313	0.290	0.312	0.311	0.316	0.319	0.310	3.309		
T	Diisopropyl ether			0.719	0.724	0.709	0.699	0.694	0.699		0.699	0.706	1.627		
T	Vinyl Acetate					0.192	0.169	0.166	0.232	0.223	0.194	0.196	13.694		
P	1,1-Dichloroethane		0.460	0.450	0.445	0.457	0.465	0.452	0.444	0.462		0.454	1.740		
T	Ethyl-Tert-Butyl ether			0.716	0.722	0.718	0.705	0.702	0.724		0.720	0.715	1.185		
T	2-Butanone					0.068	0.068	0.066	0.071	0.069	0.067	0.068	2.393		
T	Propionitrile			0.020	0.022	0.023	0.022	0.023	0.023		0.023	0.022	5.579		
T	2,2-Dichloropropane		0.387	0.403	0.350	0.359	0.297	0.277	0.350	0.342		0.346	12.129		
T	cis-1,2-Dichloroethene		0.303	0.299	0.296	0.301	0.302	0.301	0.298	0.312		0.302	1.628		
C	Chloroform	0.658	0.590	0.542	0.485	0.482	0.482	0.476	0.463	0.481		0.518	12.803		
T	1-Bromopropane			0.041	0.052	0.052	0.056	0.057	0.058	0.053	0.060	0.053	11.075		
T	Bromochloromethane		0.132	0.144	0.150	0.165	0.170	0.168	0.171	0.170		0.159	9.183		
T	Tetrahydrofuran			0.050	0.044	0.045	0.043	0.043	0.045		0.043	0.045	5.367		
S	Dibromofluoromethane			0.245	0.236	0.256	0.262	0.259	0.257	0.262	0.265	0.255	3.868		
T	1,1,1-Trichloroethane		0.405	0.424	0.407	0.410	0.424	0.424	0.425	0.447		0.421	3.239		
T	Cyclohexane			0.387	0.368	0.384	0.366	0.397	0.394	0.411	0.406	0.389	4.204		
T	1,1-Dichloropropene			0.357	0.349	0.355	0.358	0.357	0.352	0.362		0.356	1.233		
T	Tert-Amyl-Methyl ether			0.684	0.674	0.681	0.663	0.669	0.698		0.685	0.679	1.728		
T	Carbon Tetrachloride			0.282	0.274	0.323	0.351	0.366	0.377	0.35		0.33183	12.2386		
S	1,2-Dichloroethane-d4				0.244	0.246	0.257	0.253	0.252	0.254	0.254	0.25153	1.86029		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.327	0.326	0.306	0.328	0.323	0.321	0.32	0.325		0.32202	2.174		
T	Benzene		1.21	1.101	1.077	1.063	1.054	1.025	1.007	1.019		1.06965	6.04095		
T	Trichloroethene		0.288	0.284	0.274	0.29	0.299	0.302	0.292	0.3		0.29115	3.19828		
T	Methylcyclohexane					0.413	0.393	0.422	0.423	0.432	0.44	0.42065	3.83804		
C	1,2-Dichloropropane		0.232	0.251	0.254	0.257	0.263	0.256	0.249	0.258		0.25244	3.71187		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.00184	6.16966		
T	Bromodichloromethane		0.334	0.34	0.341	0.358	0.37	0.369	0.364	0.376		0.35636	4.47459		
T	Dibromomethane		0.122	0.155	0.145	0.155	0.154	0.153	0.153	0.153		0.14868	7.44253		
T	2-Chloroethyl Vinyl Ether				0.076	0.1	0.106	0.106	0.109	0.088	0.107	0.09902	12.5245		
T	4-Methyl-2-Pentanone					0.063	0.064	0.064	0.068	0.065	0.065	0.06495	2.52742		
T	cis-1,3-Dichloropropene		0.346	0.382	0.37	0.401	0.412	0.407	0.409	0.413		0.39243	6.25845		
T	Dimethyl Disulfide					0.227	0.225	0.247	0.252	0.264	0.27	0.24758	7.53484		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.282	1.288	1.306	1.276	1.265	1.243	1.262	1.283	1.27569	1.48449		
C	Toluene		1.652	1.626	1.556	1.57	1.551	1.537	1.51	1.503		1.56301	3.34424		
T	Ethyl Methacrylate			0.354	0.349	0.379	0.362	0.386	0.4	0.394	0.402	0.37824	5.56152		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.466	0.427	0.489	0.494	0.497	0.503	0.498		0.48194	5.63896		
T	1,1,2-Trichloroethane		0.273	0.296	0.289	0.303	0.3	0.298	0.298	0.3		0.29455	3.27325		
T	2-Hexanone					0.142	0.14	0.14	0.146	0.139	0.141	0.14144	1.87214		
T	1,3-Dichloropropane		0.484	0.508	0.475	0.504	0.5	0.497	0.495	0.494		0.49443	2.17868		
T	Tetrachloroethene		0.355	0.38	0.375	0.383	0.381	0.385	0.382	0.389		0.37875	2.7685		
T	Dibromochloromethane		0.322	0.345	0.344	0.362	0.378	0.381	0.388	0.394		0.36412	6.97018		
T	1,2-Dibromoethane		0.284	0.282	0.277	0.28	0.281	0.286	0.29	0.283		0.28283	1.39806		
T	1-Chlorohexane		0.501	0.501	0.486	0.499	0.469	0.513	0.509	0.521	0.544	0.50473	4.18396		
P	Chlorobenzene		1.095	1.077	1.019	1.044	1.045	1.064	1.071	1.141		1.06977	3.47515		
T	1,1,1,2-Tetrachloroethane		0.348	0.357	0.345	0.371	0.385	0.4	0.413	0.446		0.3831	9.19348		
C	Ethylbenzene		0.6	0.536	0.538	0.559	0.564	0.581	0.595	0.659		0.57912	6.92495		
T	m-,p-Xylene		0.711	0.677	0.667	0.681	0.673	0.697	0.701	0.731		0.69221	3.13862		
T	o-Xylene			0.671	0.642	0.655	0.669	0.678	0.657	0.704		0.66797	2.95161		
T	Styrene		1.073	1.059	1.076	1.12	1.133	1.168	1.147	1.193		1.12136	4.31921		
P	Bromoform			0.2	0.2	0.214	0.226	0.238	0.239	0.237		0.22189	7.90635		
T	Isopropylbenzene		1.776	1.697	1.623	1.674	1.668	1.699	1.625	1.612		1.67159	3.22323		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.698	0.661	0.65	0.674	0.635	0.606	0.637	0.648		0.65111	4.24655		
S	p-Bromofluorobenzene			0.963	0.993	0.912	0.973	0.934	0.902	0.947	0.972	0.94951	3.31848		

T	1,2,3-Trichloropropane			0.195	0.177	0.197	0.197	0.19	0.193	0.197		0.19228	3.72212
T	trans-1,4-Dichloro-2-Butene			0.124	0.117	0.135	0.132	0.142	0.151	0.15	0.155	0.13826	10.0162
T	n-Propylbenzene		4.071	3.929	3.827	3.847	3.789	3.738	3.585	3.496		3.78518	4.83282
T	Bromobenzene	0.861	0.852	0.867	0.84	0.843	0.856	0.84	0.822	0.872		0.85035	1.84632
T	1,3,5-Trimethylbenzene		2.773	2.744	2.708	2.654	2.661	2.647	2.591	2.682		2.68251	2.16658
T	2-Chlorotoluene		2.733	2.689	2.575	2.498	2.579	2.388	2.346	2.355		2.52034	5.92259
T	4-Chlorotoluene		2.395	2.337	2.248	2.223	2.051	2.189	2.093	2.284		2.22752	5.21159
T	a-Methylstyrene					1.445	1.366	1.463	1.473	1.542	1.611	1.48341	5.66686
T	tert-Butylbenzene			0.551	0.564	0.544	0.568	0.565	0.555	0.589		0.56208	2.558
T	1,2,4-Trimethylbenzene			2.798	2.729	2.745	2.76	2.745	2.714	2.793		2.75494	1.13121
T	sec-Butylbenzene			3.56	3.327	3.322	3.297	3.276	3.197	3.178		3.30805	3.79322
T	p-Isopropyltoluene			2.879	2.746	2.749	2.779	2.779	2.76	2.787		2.78269	1.6223
T	1,3-Dichlorobenzene		1.745	1.595	1.607	1.558	1.601	1.574	1.559	1.608		1.60589	3.7263
T	1,4-Dichlorobenzene	1.858	1.642	1.613	1.574	1.578	1.594	1.578	1.564	1.615		1.62397	5.60487
T	n-Butylbenzene			2.643	2.479	2.524	2.512	2.536	2.56	2.533		2.54099	2.02916
T	1,2-Dichlorobenzene	1.566	1.589	1.537	1.453	1.471	1.497	1.472	1.477	1.484		1.50524	3.15458
T	1,2-Dibromo-3-Chloropropane				0.103	0.12	0.121	0.119	0.128	0.117		0.11794	7.07341
T	1,2,4-Trichlorobenzene		1.219	1.11	1.06	1.059	1.082	1.083	1.092	1.105		1.10135	4.63701
T	Hexachlorobutadiene		0.476	0.446	0.394	0.418	0.403	0.409	0.409	0.41		0.42065	6.42356
T	Naphthalene		2.283	2.179	2.049	2.212	2.236	2.219	2.289	2.175		2.20527	3.4468
T	1,2,3-Trichlorobenzene	1.267	1.197	1.116	1.005	0.999	0.994	0.992	1.004	0.995		1.06323	9.83782

Thu Apr 06 14:39:00 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Calibration: Thu Apr 13 16:40:13 2017
Curve: WG609829
Calibration Files

	Compound	5 8M418916.D	20 8M418917.D	50 8M418918.D	100 8M418919.D	200 8M418920.D	300 8M418921.D	400 8M418922.D	500 8M418923.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile		0.013	0.012	0.013	0.013	0.012	0.013	0.013	0.013	3.572
T	3-Chloro-1-propene	0.312	0.315	0.327	0.337	0.346	0.341	0.344	0.341	0.333	3.984
T	2-Chloro-1,3-butadiene	0.285	0.299	0.317	0.330	0.340	0.336	0.337	0.336	0.322	6.267
T	Ethyl Acetate	0.099	0.101	0.098	0.101	0.108	0.103	0.106	0.109	0.103	4.045
T	Methacrylonitrile	0.052	0.059	0.057	0.059	0.064	0.061	0.063	0.065	0.060	7.025
T	Isobutyl Alcohol			0.003	0.004	0.004	0.004	0.005	0.005	0.004	12.096
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.096	0.101	0.103	0.107	0.116	0.112	0.116	0.121	0.109	7.922
T	2-Nitropropane		0.027	0.028	0.031	0.034	0.034	0.035	0.037	0.032	11.358
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.006	0.006	0.007	0.008	0.007	0.008	0.009	0.007	13.841

Mon Apr 17 15:45:45 2017

Calibration Table Report
Method: 8260WT.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Calibration: Tue Apr 18 08:45:38 2017
Curve: WG610410
Calibration Files

	Compound	0.3 8M419002.D	0.4 8M419003.D	1 8M419004.D	2 8M419005.D	5 8M419006.D	20 8M419007.D	50 8M419008.D	100 8M419009.D	200 8M419010.D	300 8M419011.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.313	0.289	0.277	0.384	0.370	0.362	0.373		0.338	13.019		
P	Chloromethane			0.456	0.440	0.417	0.437	0.403	0.401	0.407		0.423	5.087		
C	Vinyl Chloride		0.426	0.430	0.414	0.394	0.429	0.389	0.367	0.347		0.399	7.750		
T	1,3-Butadiene					0.273	0.246	0.164	0.130	0.118	0.112	0.174	39.828		1.000
T	Bromomethane			0.064	0.068	0.074	0.124	0.149	0.181			0.110	44.154		1.001
T	Chloroethane		0.162	0.163	0.173	0.171	0.183	0.177	0.180	0.186		0.174	5.074		
T	Trichlorofluoromethane		0.393	0.462	0.411	0.420	0.452	0.436	0.437	0.459		0.434	5.614		
T	Diethyl ether			0.159	0.160	0.163	0.158	0.160	0.167		0.176	0.163	3.861		
T	Isoprene					0.316	0.325	0.346	0.353	0.353	0.366	0.343	5.533		
T	Acrolein				0.022	0.023	0.021	0.022	0.024		0.024	0.023	4.706		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.251	0.228	0.237	0.253	0.250	0.252	0.261		0.247	4.440		
T	Acetone					0.036	0.033	0.036	0.037	0.034	0.035	0.035	4.082		
C	1,1-Dichloroethene		0.331	0.366	0.344	0.349	0.377	0.371	0.376	0.383		0.362	5.154		
T	Tert-Butyl Alcohol				0.010	0.012	0.011	0.011	0.011		0.013	0.011	10.980		
T	Dimethyl Sulfide					0.232	0.226	0.240	0.246	0.249	0.255	0.241	4.476		
T	Iodomethane					0.026	0.067	0.121	0.154	0.164	0.116	0.108	48.714	NO CAL	
T	Methyl acetate					0.099	0.091	0.097	0.098	0.093	0.100	0.096	3.655		
T	Methylene Chloride			0.271	0.245	0.249	0.263	0.258	0.264	0.272		0.260	3.943		
T	Carbon Disulfide			0.794	0.744	0.746	0.729	0.763	0.767	0.766	0.713	0.753	3.339		
T	Acrylonitrile			0.043	0.045	0.049	0.049	0.053	0.054		0.049	0.049	8.214		
T	Methyl Tert Butyl Ether			0.495	0.474	0.502	0.530	0.528	0.543	0.517		0.513	4.642		
T	trans-1,2-Dichloroethene		0.342	0.345	0.349	0.334	0.360	0.353	0.363	0.373		0.352	3.537		
T	n-Hexane					0.301	0.278	0.290	0.295	0.300	0.301	0.294	2.997		
T	Diisopropyl ether			0.776	0.794	0.805	0.792	0.783	0.801		0.768	0.788	1.708		
T	Vinyl Acetate					0.353	0.350	0.359	0.366	0.348	0.345	0.354	2.233		
P	1,1-Dichloroethane		0.405	0.460	0.437	0.441	0.474	0.462	0.473	0.476		0.453	5.418		
T	Ethyl-Tert-Butyl ether			0.651	0.652	0.684	0.667	0.669	0.693		0.679	0.671	2.398		
T	2-Butanone					0.053	0.052	0.056	0.058	0.053	0.059	0.055	5.073		
T	Propionitrile			0.015	0.016	0.018	0.017	0.017	0.018		0.019	0.017	7.523		
T	2,2-Dichloropropane		0.336	0.387	0.384	0.373	0.399	0.387	0.396	0.399		0.383	5.430		
T	cis-1,2-Dichloroethene		0.263	0.287	0.282	0.286	0.300	0.296	0.305	0.311		0.291	5.182		
C	Chloroform	0.619	0.539	0.514	0.499	0.459	0.479	0.467	0.473	0.471		0.502	10.092		
T	1-Bromopropane			0.057	0.053	0.055	0.056	0.057	0.059	0.061	0.061	0.057	5.096		
T	Bromochloromethane		0.118	0.150	0.156	0.160	0.167	0.167	0.170	0.168		0.157	11.011		
T	Tetrahydrofuran			0.039	0.035	0.038	0.036	0.038	0.040		0.039	0.038	4.497		
S	Dibromofluoromethane				0.251	0.244	0.261	0.272	0.265	0.269	0.273	0.262	4.105		
T	1,1,1-Trichloroethane		0.337	0.406	0.380	0.394	0.426	0.420	0.431	0.450		0.405	8.684		
T	Cyclohexane			0.371	0.358	0.372	0.358	0.379	0.389	0.403	0.391	0.377	4.255		
T	1,1-Dichloropropene			0.354	0.340	0.337	0.363	0.353	0.359	0.371		0.354	3.449		
T	Tert-Amyl-Methyl ether			0.568	0.579	0.618	0.598	0.602	0.629		0.609	0.600	3.552		
T	Carbon Tetrachloride		0.288	0.38	0.359	0.363	0.404	0.394	0.41	0.411		0.3759	10.8547		
S	1,2-Dichloroethane-d4				0.215	0.219	0.227	0.237	0.23	0.224	0.235	0.2267	3.56551		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.247	0.28	0.273	0.279	0.298	0.293	0.305	0.299		0.284	6.56007		
T	Benzene		1.013	1.058	1.034	1.013	1.082	1.044	1.045	0.975		1.0328	3.16185		
T	Trichloroethene		0.28	0.291	0.275	0.274	0.294	0.29	0.302	0.315		0.2901	4.79714		
T	Methylcyclohexane					0.371	0.369	0.386	0.392	0.4	0.402	0.3867	3.65443		
C	1,2-Dichloropropane		0.235	0.244	0.249	0.243	0.257	0.256	0.264	0.269		0.2522	4.51345		
T	Bromodichloromethane		0.273	0.313	0.319	0.319	0.35	0.347	0.359	0.361		0.3301	9.09766		
T	1,4-Dioxane					0.001	0.001	0.002	0.002		0.002	0.0014	8.93532		
T	Dibromomethane		0.101	0.125	0.129	0.129	0.138	0.136	0.14	0.14		0.1298	9.96462		
T	2-Chloroethyl Vinyl Ether				0.091	0.101	0.106	0.114	0.116	0.114	0.122	0.1091	9.65313		
T	4-Methyl-2-Pentanone					0.042	0.045	0.05	0.051	0.049	0.055	0.0489	9.48763		
T	cis-1,3-Dichloropropene		0.303	0.354	0.349	0.364	0.401	0.404	0.417	0.416		0.3759	10.7244		

T	Dimethyl Disulfide					0.133	0.169	0.201	0.215	0.226	0.237	0.1968	19.8258	0.998
I	Chlorobenzene-d5	ISTD												
S	Toluene-d8				1.126	1.107	1.183	1.185	1.136	1.123	1.136	1.1423	2.63592	
C	Toluene		1.276	1.435	1.421	1.416	1.507	1.432	1.412	1.234		1.3916	6.46773	
T	Ethyl Methacrylate			0.208	0.222	0.252	0.262	0.287	0.29	0.277	0.303	0.2625	12.7656	
T	Paraldehyde											0	0	
T	trans-1,3-Dichloropropene			0.367	0.363	0.389	0.421	0.422	0.44	0.423		0.4036	7.59969	
T	1,1,2-Trichloroethane		0.21	0.235	0.224	0.228	0.239	0.229	0.237	0.23		0.2289	4.06629	
T	2-Hexanone					0.048	0.053	0.058	0.06	0.054	0.063	0.0562	9.63322	
T	1,3-Dichloropropane		0.353	0.405	0.372	0.373	0.41	0.397	0.403	0.383		0.387	5.15702	
T	Tetrachloroethene		0.245	0.284	0.279	0.285	0.31	0.295	0.312	0.328		0.2923	8.65757	
T	Dibromochloromethane		0.232	0.267	0.271	0.289	0.315	0.318	0.333	0.328		0.2942	12.052	
T	1,2-Dibromoethane		0.188	0.209	0.218	0.222	0.242	0.236	0.241	0.233		0.2236	8.21869	
T	1-Chlorohexane		0.385	0.44	0.423	0.428	0.44	0.451	0.457	0.466	0.472	0.4403	5.99946	
P	Chlorobenzene		1.008	0.965	0.972	0.936	1.008	0.988	1.042	1.006		0.9906	3.29062	
T	1,1,1,2-Tetrachloroethane		0.303	0.316	0.32	0.335	0.379	0.385	0.423			0.3515	12.6454	
C	Ethylbenzene		0.467	0.5	0.532	0.513	0.574	0.568	0.62	0.665		0.5548	11.7603	
T	m-,p-Xylene		0.572	0.637	0.62	0.627	0.689	0.677	0.694	0.623		0.6425	6.46237	
T	o-Xylene			0.611	0.592	0.623	0.665	0.648	0.68	0.703		0.6459	6.13337	
T	Styrene		0.814	0.93	0.929	0.995	1.114	1.111	1.142	1.067		1.0127	11.3997	
P	Bromoform			0.125	0.142	0.163	0.191	0.196	0.207	0.207		0.176	18.66	0.999
T	Isopropylbenzene		1.463	1.551	1.54	1.592	1.678	1.613	1.576	1.361		1.5466	6.28276	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.385	0.493	0.455	0.465	0.508	0.494	0.502	0.472		0.4717	8.42371	
S	p-Bromofluorobenzene				0.897	0.839	0.876	0.891	0.86	0.878	0.935	0.8823	3.42248	
T	1,2,3-Trichloropropane			0.117	0.127	0.131	0.143	0.144	0.146	0.138		0.1352	7.82469	
T	trans-1,4-Dichloro-2-Butene			0.058	0.065	0.085	0.109	0.122	0.115	0.114	0.116	0.0978	25.7933	1.000
T	n-Propylbenzene		3.478	3.723	3.692	3.608	3.807	3.577	3.383	2.726		3.4991	9.72861	
T	Bromobenzene	0.752	0.696	0.839	0.81	0.813	0.857	0.845	0.872	0.896		0.8199	7.58093	
T	1,3,5-Trimethylbenzene		2.467	2.514	2.525	2.506	2.737	2.623	2.589	2.306		2.5336	4.94471	
T	2-Chlorotoluene		2.674	2.623	2.305	2.553	2.347	2.198	2.2	2.21		2.3888	8.30021	
T	4-Chlorotoluene		1.995	2.135	2.439	1.867	2.369	2.326	2.308	1.784		2.1528	11.4607	
T	a-Methylstyrene					1.296	1.355	1.455	1.517	1.498	1.401	1.4204	6.02416	
T	tert-Butylbenzene			0.52	0.555	0.528	0.588	0.571	0.601	0.653		0.5736	7.96677	
T	1,2,4-Trimethylbenzene		2.284	2.607	2.62	2.578	2.817	2.742	2.701	2.343		2.5866	7.19751	
T	sec-Butylbenzene			3.278	3.292	3.183	3.429	3.252	3.145	2.633		3.1733	8.03336	
T	p-Isopropyltoluene			2.64	2.605	2.626	2.913	2.796	2.737	2.387		2.6721	6.23483	
T	1,3-Dichlorobenzene		1.502	1.596	1.568	1.535	1.665	1.625	1.642	1.581		1.5891	3.4371	
T	1,4-Dichlorobenzene	1.772	1.622	1.643	1.594	1.517	1.637	1.592	1.618	1.545		1.6156	4.45875	
T	n-Butylbenzene			2.426	2.337	2.245	2.632	2.542	2.483	2.184		2.407	6.69686	
T	1,2-Dichlorobenzene	1.368	1.185	1.488	1.397	1.379	1.46	1.438	1.454	1.396		1.396	6.36818	
T	1,2-Dibromo-3-Chloropropane				0.073	0.072	0.076	0.079	0.083	0.077		0.0768	5.09915	
T	1,2,4-Trichlorobenzene		0.864	0.92	0.882	0.852	0.952	0.983	1.022	1.044		0.9399	7.72424	
T	Hexachlorobutadiene		0.405	0.427	0.426	0.402	0.449	0.44	0.456	0.493		0.4374	6.74711	
T	Naphthalene		1.353	1.273	1.232	1.251	1.396	1.436	1.465	1.339		1.3431	6.41915	
T	1,2,3-Trichlorobenzene	0.796	0.766	0.75	0.705	0.691	0.802	0.821	0.847	0.847		0.7805	7.29917	

Tue Apr 18 12:15:24 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041110 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.1	ug/L	0.333	13.7	25	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.272	2.70	25	
Chloroform	CCC	50.0	48.9	ug/L	0.481	2.20	25	
Ethylbenzene	CCC	50.0	47.5	ug/L	0.521	4.90	25	
Toluene	CCC	50.0	47.2	ug/L	1.48	5.60	25	
Vinyl Chloride	CCC	50.0	60.9	ug/L	0.392	21.9	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.2	ug/L	0.608	9.70	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.452	4.20	25	
Bromoform	SPCC	50.0	49.0	ug/L	0.286	2.00	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.992	5.70	25	
Chloromethane	SPCC	50.0	59.6	ug/L	0.347	19.2	25	
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.384	6.30	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.432	0.100	25	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.282	7.20	25	
1,1-Dichloropropene		50.0	47.9	ug/L	0.326	4.20	25	
1,2,3-Trichlorobenzene		50.0	45.4	ug/L	1.09	9.20	25	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.183	7.90	25	
1,2,4-Trichlorobenzene		50.0	47.7	ug/L	1.19	4.50	25	
1,2,4-Trimethylbenzene		50.0	45.9	ug/L	2.58	8.10	25	
1,2-Dichloroethane		50.0	47.3	ug/L	0.314	5.40	25	
1,2-Dichlorobenzene		50.0	46.1	ug/L	1.54	7.80	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.116	6.10	25	
1,2-Dibromoethane		50.0	46.5	ug/L	0.289	7.00	25	
1,3,5-Trimethylbenzene		50.0	45.9	ug/L	2.56	8.30	25	
1,3-Dichlorobenzene		50.0	44.6	ug/L	1.53	10.8	25	
1,3-Dichloropropane		50.0	48.4	ug/L	0.467	3.20	25	
1,4-Dichlorobenzene		50.0	45.0	ug/L	1.56	9.90	25	
1-Chlorohexane		50.0	51.7	ug/L	0.0879	3.50	25	
2,2-Dichloropropane		50.0	43.4	ug/L	0.325	13.2	25	
2-Hexanone		50.0	53.8	ug/L	0.172	7.60	25	
2-Chlorotoluene		50.0	44.5	ug/L	2.03	11.0	25	
4-Chlorotoluene		50.0	45.9	ug/L	2.09	8.20	25	
Acetone		50.0	49.5	ug/L	0.0498	0.900	25	
Benzene		50.0	47.5	ug/L	1.01	5.00	25	
Bromobenzene		50.0	45.0	ug/L	0.886	9.90	25	
Bromochloromethane		50.0	49.2	ug/L	0.189	1.50	25	
Bromodichloromethane		50.0	47.9	ug/L	0.357	4.20	25	
Bromomethane		50.0	43.3	ug/L	0.207	13.3	25	
Carbon Disulfide		50.0	43.8	ug/L	0.727	12.3	25	
Carbon Tetrachloride		50.0	49.0	ug/L	0.382	1.90	25	
Chloroethane		50.0	41.7	ug/L	0.127	16.5	25	
cis-1,2-Dichloroethene		50.0	48.4	ug/L	0.288	3.30	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041110 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	51.0	ug/L	0.429	2.10	25	
Dibromochloromethane		50.0	47.4	ug/L	0.393	5.20	25	
Dibromomethane		50.0	48.8	ug/L	0.159	2.40	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.398	34.1	25	*
Hexachlorobutadiene		50.0	43.5	ug/L	0.613	13.0	25	
Isopropylbenzene		50.0	46.8	ug/L	1.58	6.30	25	
Methylene Chloride		50.0	44.4	ug/L	0.260	11.2	25	
Methyl Tert Butyl Ether		50.0	51.4	ug/L	0.687	2.90	25	
2-Butanone		50.0	50.4	ug/L	0.0756	0.800	25	
4-Methyl-2-Pentanone		50.0	51.9	ug/L	0.0721	3.90	25	
n-Butylbenzene		50.0	45.9	ug/L	2.27	8.30	25	
n-Propylbenzene		50.0	44.5	ug/L	3.28	11.1	25	
m-,p-Xylene		100	95.8	ug/L	0.633	4.20	25	
Naphthalene		50.0	47.0	ug/L	2.28	6.00	25	
o-Xylene		50.0	48.1	ug/L	0.627	3.70	25	
p-Isopropyltoluene		50.0	45.9	ug/L	2.69	8.20	25	
sec-Butylbenzene		50.0	44.7	ug/L	3.07	10.5	25	
Styrene		50.0	49.9	ug/L	1.04	0.200	25	
Trichloroethene		50.0	48.3	ug/L	0.309	3.30	25	
tert-Butylbenzene		50.0	44.7	ug/L	0.498	10.6	25	
Tetrachloroethene		50.0	46.6	ug/L	0.417	6.70	25	
trans-1,2-Dichloroethene		50.0	47.0	ug/L	0.247	6.00	25	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.345	3.50	25	
Trichlorofluoromethane		50.0	32.0	ug/L	0.264	36.0	25	*

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041110 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	20.0	20.0	ug/L	0.381	0.100	25	
1,2-Dichloropropane	CCC	20.0	19.6	ug/L	0.248	1.90	25	
Chloroform	CCC	20.0	18.5	ug/L	0.479	7.50	25	
Ethylbenzene	CCC	20.0	18.6	ug/L	0.538	7.10	25	
Toluene	CCC	20.0	18.5	ug/L	1.45	7.30	25	
Vinyl Chloride	CCC	20.0	22.0	ug/L	0.499	10.0	25	
1,1,2,2-Tetrachloroethane	SPCC	20.0	19.6	ug/L	0.638	2.00	25	
1,1-Dichloroethane	SPCC	20.0	19.7	ug/L	0.448	1.50	25	
Bromoform	SPCC	20.0	18.7	ug/L	0.208	6.30	25	
Chlorobenzene	SPCC	20.0	18.3	ug/L	0.981	8.30	25	
Chloromethane	SPCC	20.0	22.5	ug/L	0.529	12.3	25	
1,1,1,2-Tetrachloroethane		20.0	18.6	ug/L	0.356	7.10	25	
1,1,1-Trichloroethane		20.0	20.1	ug/L	0.423	0.600	25	
1,1,2-Trichloroethane		20.0	18.9	ug/L	0.278	5.50	25	
1,1-Dichloropropene		20.0	19.6	ug/L	0.349	1.90	25	
1,2,3-Trichlorobenzene		20.0	18.2	ug/L	0.968	9.00	25	
1,2,3-Trichloropropane		20.0	19.5	ug/L	0.188	2.40	25	
1,2,4-Trichlorobenzene		20.0	18.7	ug/L	1.03	6.40	25	
1,2,4-Trimethylbenzene		20.0	18.7	ug/L	2.58	6.50	25	
1,2-Dichloroethane		20.0	19.5	ug/L	0.314	2.60	25	
1,2-Dichlorobenzene		20.0	18.5	ug/L	1.39	7.30	25	
1,2-Dibromo-3-Chloropropane		20.0	19.4	ug/L	0.114	3.00	25	
1,2-Dibromoethane		20.0	19.5	ug/L	0.276	2.50	25	
1,3,5-Trimethylbenzene		20.0	18.5	ug/L	2.49	7.30	25	
1,3-Dichlorobenzene		20.0	18.4	ug/L	1.48	7.90	25	
1,3-Dichloropropane		20.0	20.1	ug/L	0.498	0.700	25	
1,4-Dichlorobenzene		20.0	18.4	ug/L	1.50	7.80	25	
1-Chlorohexane		20.0	20.5	ug/L	0.517	2.40	25	
2,2-Dichloropropane		20.0	22.0	ug/L	0.381	10.1	25	
2-Hexanone		20.0	21.4	ug/L	0.151	7.00	25	
2-Chlorotoluene		20.0	17.4	ug/L	2.19	13.2	25	
4-Chlorotoluene		20.0	18.9	ug/L	2.10	5.70	25	
Acetone		20.0	19.0	ug/L	0.0513	4.90	25	
Benzene		20.0	18.8	ug/L	1.01	5.90	25	
Bromobenzene		20.0	18.5	ug/L	0.788	7.30	25	
Bromochloromethane		20.0	21.4	ug/L	0.170	7.00	25	
Bromodichloromethane		20.0	19.4	ug/L	0.346	2.80	25	
Bromomethane		20.0	17.7	ug/L	0.173	11.5	25	
Carbon Disulfide		20.0	16.1	ug/L	0.662	19.3	25	
Carbon Tetrachloride		20.0	20.6	ug/L	0.342	3.10	25	
Chloroethane		20.0	22.9	ug/L	0.223	14.3	25	
cis-1,2-Dichloroethene		20.0	19.5	ug/L	0.294	2.60	25	

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Login Number: L17041110 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		20.0	21.6	ug/L	0.424	8.00	25	
Dibromochloromethane		20.0	19.4	ug/L	0.352	3.20	25	
Dibromomethane		20.0	20.5	ug/L	0.152	2.50	25	
Dichlorodifluoromethane		20.0	24.5	ug/L	0.487	22.7	25	
Hexachlorobutadiene		20.0	18.6	ug/L	0.391	7.00	25	
Isopropylbenzene		20.0	18.7	ug/L	1.56	6.40	25	
Methylene Chloride		20.0	19.4	ug/L	0.280	3.00	25	
Methyl Tert Butyl Ether		20.0	20.8	ug/L	0.658	4.10	25	
2-Butanone		20.0	20.3	ug/L	0.0689	1.30	25	
4-Methyl-2-Pentanone		20.0	20.8	ug/L	0.0677	4.20	25	
n-Butylbenzene		20.0	18.9	ug/L	2.40	5.50	25	
n-Propylbenzene		20.0	18.3	ug/L	3.47	8.30	25	
m-,p-Xylene		40.0	37.4	ug/L	0.646	6.60	25	
Naphthalene		20.0	18.7	ug/L	2.07	6.30	25	
o-Xylene		20.0	18.9	ug/L	0.631	5.50	25	
p-Isopropyltoluene		20.0	19.0	ug/L	2.64	5.20	25	
sec-Butylbenzene		20.0	18.3	ug/L	3.02	8.60	25	
Styrene		20.0	19.3	ug/L	1.08	3.50	25	
Trichloroethene		20.0	18.6	ug/L	0.271	6.80	25	
tert-Butylbenzene		20.0	19.0	ug/L	0.535	4.80	25	
Tetrachloroethene		20.0	19.4	ug/L	0.367	3.00	25	
trans-1,2-Dichloroethene		20.0	19.6	ug/L	0.268	2.20	25	
trans-1,3-Dichloropropene		20.0	19.9	ug/L	0.479	0.700	25	
Trichlorofluoromethane		20.0	21.0	ug/L	0.489	5.20	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041110 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.0	ug/L	0.340	6.00	25	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.239	5.40	25	
Chloroform	CCC	50.0	44.7	ug/L	0.449	10.6	25	
Ethylbenzene	CCC	50.0	48.9	ug/L	0.543	2.20	25	
Toluene	CCC	50.0	48.5	ug/L	1.35	2.90	25	
Vinyl Chloride	CCC	50.0	45.4	ug/L	0.363	9.20	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.7	ug/L	0.431	8.60	25	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.432	4.80	25	
Bromoform	SPCC	50.0	42.9	ug/L	0.175	14.2	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.934	5.70	25	
Chloromethane	SPCC	50.0	48.6	ug/L	0.411	2.80	25	
1,1,1,2-Tetrachloroethane		50.0	50.3	ug/L	0.354	0.600	25	
1,1,1-Trichloroethane		50.0	50.8	ug/L	0.412	1.60	25	
1,1,2-Trichloroethane		50.0	45.3	ug/L	0.208	9.40	25	
1,1-Dichloropropene		50.0	47.3	ug/L	0.335	5.50	25	
1,2,3-Trichlorobenzene		50.0	48.7	ug/L	0.761	2.50	25	
1,2,3-Trichloropropane		50.0	47.0	ug/L	0.127	6.10	25	
1,2,4-Trichlorobenzene		50.0	49.0	ug/L	0.922	1.90	25	
1,2,4-Trimethylbenzene		50.0	49.9	ug/L	2.58	0.100	25	
1,2-Dichloroethane		50.0	47.2	ug/L	0.268	5.50	25	
1,2-Dichlorobenzene		50.0	47.2	ug/L	1.32	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	44.0	ug/L	0.0676	12.0	25	
1,2-Dibromoethane		50.0	47.1	ug/L	0.211	5.80	25	
1,3,5-Trimethylbenzene		50.0	48.9	ug/L	2.48	2.10	25	
1,3-Dichlorobenzene		50.0	47.4	ug/L	1.51	5.30	25	
1,3-Dichloropropane		50.0	47.2	ug/L	0.365	5.60	25	
1,4-Dichlorobenzene		50.0	46.2	ug/L	1.49	7.70	25	
1-Chlorohexane		50.0	52.1	ug/L	0.459	4.20	25	
2,2-Dichloropropane		50.0	46.7	ug/L	0.357	6.60	25	
2-Hexanone		50.0	48.3	ug/L	0.0543	3.40	25	
2-Chlorotoluene		50.0	44.1	ug/L	2.11	11.7	25	
4-Chlorotoluene		50.0	49.6	ug/L	2.14	0.800	25	
Acetone		50.0	43.2	ug/L	0.0304	13.6	25	
Benzene		50.0	47.6	ug/L	0.983	4.90	25	
Bromobenzene		50.0	48.1	ug/L	0.789	3.70	25	
Bromochloromethane		50.0	49.4	ug/L	0.155	1.20	25	
Bromodichloromethane		50.0	48.0	ug/L	0.317	4.00	25	
Bromomethane		50.0	43.6	ug/L	0.123	12.7	25	
Carbon Disulfide		50.0	43.4	ug/L	0.653	13.2	25	
Carbon Tetrachloride		50.0	50.2	ug/L	0.377	0.300	25	
Chloroethane		50.0	53.1	ug/L	0.185	6.10	25	
cis-1,2-Dichloroethene		50.0	48.0	ug/L	0.279	4.00	25	

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ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041110 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	50.6	ug/L	0.380	1.10	25	
Dibromochloromethane		50.0	48.3	ug/L	0.284	3.40	25	
Dibromomethane		50.0	47.4	ug/L	0.123	5.20	25	
Dichlorodifluoromethane		50.0	56.3	ug/L	0.381	12.6	25	
Hexachlorobutadiene		50.0	48.6	ug/L	0.425	2.90	25	
Isopropylbenzene		50.0	49.5	ug/L	1.53	1.10	25	
Methylene Chloride		50.0	46.7	ug/L	0.243	6.60	25	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.472	7.90	25	
2-Butanone		50.0	43.5	ug/L	0.0479	13.1	25	
4-Methyl-2-Pentanone		50.0	45.4	ug/L	0.0444	9.20	25	
n-Butylbenzene		50.0	49.9	ug/L	2.40	0.200	25	
n-Propylbenzene		50.0	47.3	ug/L	3.31	5.40	25	
m-,p-Xylene		100	102	ug/L	0.654	1.70	25	
Naphthalene		50.0	48.1	ug/L	1.29	3.90	25	
o-Xylene		50.0	48.1	ug/L	0.622	3.70	25	
p-Isopropyltoluene		50.0	50.0	ug/L	2.67	0	25	
sec-Butylbenzene		50.0	47.9	ug/L	3.04	4.30	25	
Styrene		50.0	52.7	ug/L	1.07	5.40	25	
Trichloroethene		50.0	47.5	ug/L	0.276	5.00	25	
tert-Butylbenzene		50.0	48.1	ug/L	0.552	3.80	25	
Tetrachloroethene		50.0	50.6	ug/L	0.296	1.20	25	
trans-1,2-Dichloroethene		50.0	47.3	ug/L	0.333	5.40	25	
trans-1,3-Dichloropropene		50.0	46.6	ug/L	0.376	6.90	25	
Trichlorofluoromethane		50.0	48.6	ug/L	0.421	2.90	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611826-02

Instrument ID: HPMS17 Run Time: 11:56 Method: 8260B

File ID: 17M0273065 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG611827 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.4	ug/L	0.366	5.29	20	
1,2-Dichloropropane	CCC	50.0	47.0	ug/L	0.263	5.92	20	
Chloroform	CCC	50.0	45.9	ug/L	0.452	8.30	20	
Ethylbenzene	CCC	50.0	47.1	ug/L	0.516	5.78	20	
Toluene	CCC	50.0	46.9	ug/L	1.47	6.12	20	
Vinyl Chloride	CCC	50.0	47.2	ug/L	0.304	5.55	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	43.5	ug/L	0.585	13.0	20	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.449	4.89	20	
Bromoform	SPCC	50.0	43.6	ug/L	0.254	12.9	20	
Chlorobenzene	SPCC	50.0	45.9	ug/L	0.966	8.18	20	
Chloromethane	SPCC	50.0	42.7	ug/L	0.248	14.7	20	
Xylenes		150	142	ug/L	0.619	5.34	20	
1,1,1,2-Tetrachloroethane		50.0	45.3	ug/L	0.371	9.31	20	
1,1,1-Trichloroethane		50.0	46.4	ug/L	0.402	7.20	20	
1,1,2-Trichloroethane		50.0	43.0	ug/L	0.261	14.0	20	
1,1-Dichloropropene		50.0	47.8	ug/L	0.325	4.33	20	
1,2,3-Trichlorobenzene		50.0	41.5	ug/L	1.00	17.0	20	
1,2,3-Trichloropropane		50.0	40.4	ug/L	0.161	19.2	20	
1,2,4-Trichlorobenzene		50.0	45.6	ug/L	1.13	8.89	20	
1,2,4-Trimethylbenzene		50.0	46.8	ug/L	2.63	6.30	20	
1,2-Dichloroethane		50.0	44.5	ug/L	0.295	10.9	20	
1,2-Dichlorobenzene		50.0	44.2	ug/L	1.48	11.6	20	
1,2-Dibromo-3-Chloropropane		50.0	42.3	ug/L	0.104	15.4	20	
1,2-Dibromoethane		50.0	43.0	ug/L	0.268	14.0	20	
1,3,5-Trimethylbenzene		50.0	46.9	ug/L	2.61	6.28	20	
1,3-Dichlorobenzene		50.0	46.2	ug/L	1.58	7.67	20	
1,3-Dichloropropane		50.0	44.3	ug/L	0.428	11.5	20	
1,4-Dichlorobenzene		50.0	45.1	ug/L	1.56	9.77	20	
1-Chlorohexane		50.0	51.1	ug/L	0.0867	2.10	20	
2,2-Dichloropropane		50.0	52.4	ug/L	0.393	4.87	20	
2-Hexanone		50.0	42.6	ug/L	0.136	14.7	20	
2-Chlorotoluene		50.0	46.6	ug/L	2.12	6.84	20	
4-Chlorotoluene		50.0	47.3	ug/L	2.15	5.42	20	
Acetone		50.0	40.0	ug/L	0.0402	19.9	20	
Benzene		50.0	46.3	ug/L	0.986	7.42	20	
Bromobenzene		50.0	43.8	ug/L	0.862	12.3	20	
Bromochloromethane		50.0	45.3	ug/L	0.174	9.35	20	
Bromodichloromethane		50.0	46.1	ug/L	0.343	7.86	20	
Bromomethane		50.0	41.8	ug/L	0.200	16.4	20	
Carbon Disulfide		50.0	48.9	ug/L	0.811	2.13	20	
Carbon Tetrachloride		50.0	47.5	ug/L	0.370	4.95	20	
Chloroethane		50.0	45.4	ug/L	0.139	9.26	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611826-02

Instrument ID: HPMS17 Run Time: 11:56 Method: 8260B

File ID: 17M0273065 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG611827 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.3	ug/L	0.275	7.49	20	
cis-1,3-Dichloropropene		50.0	48.7	ug/L	0.409	2.64	20	
Dibromochloromethane		50.0	44.3	ug/L	0.367	11.5	20	
Dibromomethane		50.0	44.2	ug/L	0.144	11.6	20	
Dichlorodifluoromethane		50.0	52.3	ug/L	0.311	4.60	20	
Hexachlorobutadiene		50.0	43.8	ug/L	0.617	12.5	20	
Isopropylbenzene		50.0	47.2	ug/L	1.59	5.67	20	
Methylene Chloride		50.0	44.7	ug/L	0.262	10.5	20	
Methyl Tert Butyl Ether		50.0	43.2	ug/L	0.577	13.6	20	
2-Butanone		50.0	43.4	ug/L	0.0650	13.2	20	
4-Methyl-2-Pentanone		50.0	41.7	ug/L	0.0579	16.6	20	
n-Butylbenzene		50.0	49.9	ug/L	2.46	0.244	20	
n-Propylbenzene		50.0	47.9	ug/L	3.53	4.30	20	
m-,p-Xylene		100	95.2	ug/L	0.629	4.80	20	
Naphthalene		50.0	40.2	ug/L	1.95	19.6	20	
o-Xylene		50.0	46.8	ug/L	0.609	6.42	20	
p-Isopropyltoluene		50.0	47.4	ug/L	2.77	5.27	20	
sec-Butylbenzene		50.0	46.7	ug/L	3.21	6.63	20	
Styrene		50.0	48.3	ug/L	1.01	3.34	20	
Trichloroethene		50.0	44.2	ug/L	0.283	11.6	20	
tert-Butylbenzene		50.0	44.6	ug/L	0.497	10.8	20	
Tetrachloroethene		50.0	46.4	ug/L	0.415	7.10	20	
trans-1,2-Dichloroethene		50.0	46.9	ug/L	0.247	6.16	20	
trans-1,3-Dichloropropene		50.0	47.7	ug/L	0.340	4.66	20	
Trichlorofluoromethane		50.0	50.6	ug/L	0.418	1.22	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611802-02

Instrument ID: HPMS8 Run Time: 11:55 Method: 8260B

File ID: 8M419201 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611829 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.6	ug/L	0.374	3.19	20	
1,2-Dichloropropane	CCC	50.0	50.7	ug/L	0.256	1.36	20	
Chloroform	CCC	50.0	46.5	ug/L	0.468	6.92	20	
Ethylbenzene	CCC	50.0	50.8	ug/L	0.564	1.62	20	
Toluene	CCC	50.0	52.0	ug/L	1.45	3.91	20	
Vinyl Chloride	CCC	50.0	54.5	ug/L	0.435	8.90	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	48.0	ug/L	0.453	3.98	20	
1,1-Dichloroethane	SPCC	50.0	51.8	ug/L	0.470	3.67	20	
Bromoform	SPCC	50.0	42.9	ug/L	0.175	14.1	20	
Chlorobenzene	SPCC	50.0	49.2	ug/L	0.975	1.56	20	
Chloromethane	SPCC	50.0	50.9	ug/L	0.431	1.87	20	
Xylenes		150	156	ug/L	0.661	3.69	20	
1,1,1,2-Tetrachloroethane		50.0	52.9	ug/L	0.372	5.86	20	
1,1,1-Trichloroethane		50.0	51.6	ug/L	0.419	3.22	20	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.220	3.84	20	
1,1-Dichloropropene		50.0	50.2	ug/L	0.356	0.437	20	
1,2,3-Trichlorobenzene		50.0	45.1	ug/L	0.704	9.79	20	
1,2,3-Trichloropropane		50.0	47.7	ug/L	0.129	4.56	20	
1,2,4-Trichlorobenzene		50.0	47.2	ug/L	0.888	5.54	20	
1,2,4-Trimethylbenzene		50.0	52.7	ug/L	2.72	5.33	20	
1,2-Dichloroethane		50.0	49.5	ug/L	0.281	1.03	20	
1,2-Dichlorobenzene		50.0	48.7	ug/L	1.36	2.66	20	
1,2-Dibromo-3-Chloropropane		50.0	44.4	ug/L	0.0682	11.2	20	
1,2-Dibromoethane		50.0	49.0	ug/L	0.219	2.03	20	
1,3,5-Trimethylbenzene		50.0	51.6	ug/L	2.61	3.19	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.58	0.393	20	
1,3-Dichloropropane		50.0	48.4	ug/L	0.375	3.23	20	
1,4-Dichlorobenzene		50.0	47.8	ug/L	1.55	4.33	20	
1-Chlorohexane		50.0	54.7	ug/L	0.481	9.32	20	
2,2-Dichloropropane		50.0	53.8	ug/L	0.412	7.60	20	
2-Hexanone		50.0	44.8	ug/L	0.0503	10.4	20	
2-Chlorotoluene		50.0	48.2	ug/L	2.31	3.50	20	
4-Chlorotoluene		50.0	51.9	ug/L	2.23	3.76	20	
Acetone		50.0	46.4	ug/L	0.0326	7.18	20	
Benzene		50.0	51.2	ug/L	1.06	2.48	20	
Bromobenzene		50.0	49.0	ug/L	0.804	1.94	20	
Bromochloromethane		50.0	49.8	ug/L	0.157	0.414	20	
Bromodichloromethane		50.0	52.2	ug/L	0.344	4.33	20	
Bromomethane		50.0	40.5	ug/L	0.112	19.1	20	
Carbon Disulfide		50.0	57.7	ug/L	0.869	15.4	20	
Carbon Tetrachloride		50.0	52.4	ug/L	0.394	4.88	20	
Chloroethane		50.0	52.0	ug/L	0.182	4.00	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611802-02

Instrument ID: HPMS8 Run Time: 11:55 Method: 8260B

File ID: 8M419201 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611829 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	50.9	ug/L	0.296	1.73	20	
cis-1,3-Dichloropropene		50.0	52.8	ug/L	0.397	5.57	20	
Dibromochloromethane		50.0	50.8	ug/L	0.299	1.57	20	
Dibromomethane		50.0	49.8	ug/L	0.129	0.303	20	
Dichlorodifluoromethane		50.0	53.5	ug/L	0.362	7.01	20	
Hexachlorobutadiene		50.0	47.7	ug/L	0.417	4.62	20	
Isopropylbenzene		50.0	52.1	ug/L	1.61	4.26	20	
Methylene Chloride		50.0	49.3	ug/L	0.257	1.39	20	
Methyl Tert Butyl Ether		50.0	47.2	ug/L	0.484	5.57	20	
2-Butanone		50.0	47.0	ug/L	0.0518	6.07	20	
4-Methyl-2-Pentanone		50.0	46.0	ug/L	0.0450	7.92	20	
n-Butylbenzene		50.0	53.8	ug/L	2.59	7.58	20	
n-Propylbenzene		50.0	52.1	ug/L	3.64	4.13	20	
m-,p-Xylene		100	106	ug/L	0.680	5.81	20	
Naphthalene		50.0	46.5	ug/L	1.25	7.10	20	
o-Xylene		50.0	49.7	ug/L	0.643	0.532	20	
p-Isopropyltoluene		50.0	52.3	ug/L	2.80	4.65	20	
sec-Butylbenzene		50.0	51.7	ug/L	3.28	3.44	20	
Styrene		50.0	53.9	ug/L	1.09	7.78	20	
Trichloroethene		50.0	49.2	ug/L	0.286	1.55	20	
tert-Butylbenzene		50.0	49.3	ug/L	0.565	1.44	20	
Tetrachloroethene		50.0	49.6	ug/L	0.290	0.824	20	
trans-1,2-Dichloroethene		50.0	51.2	ug/L	0.361	2.46	20	
trans-1,3-Dichloropropene		50.0	50.7	ug/L	0.409	1.34	20	
Trichlorofluoromethane		50.0	50.2	ug/L	0.436	0.447	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611834-02

Instrument ID: HPMS6 Run Time: 12:26 Method: 8260B

File ID: 6M146766 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611838 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.3	ug/L	0.414	8.61	20	
1,2-Dichloropropane	CCC	50.0	53.5	ug/L	0.270	6.92	20	
Chloroform	CCC	50.0	47.0	ug/L	0.486	6.04	20	
Ethylbenzene	CCC	50.0	50.8	ug/L	0.589	1.69	20	
Toluene	CCC	50.0	51.1	ug/L	1.60	2.22	20	
Vinyl Chloride	CCC	50.0	49.1	ug/L	0.446	1.77	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	52.0	ug/L	0.678	4.09	20	
1,1-Dichloroethane	SPCC	50.0	54.1	ug/L	0.492	8.28	20	
Bromoform	SPCC	50.0	48.9	ug/L	0.217	2.11	20	
Chlorobenzene	SPCC	50.0	50.1	ug/L	1.07	0.260	20	
Chloromethane	SPCC	50.0	47.9	ug/L	0.443	4.29	20	
Xylenes		150	155	ug/L	0.701	3.15	20	
1,1,1,2-Tetrachloroethane		50.0	51.6	ug/L	0.395	3.11	20	
1,1,1-Trichloroethane		50.0	51.4	ug/L	0.432	2.71	20	
1,1,2-Trichloroethane		50.0	49.6	ug/L	0.292	0.746	20	
1,1-Dichloropropene		50.0	52.3	ug/L	0.372	4.63	20	
1,2,3-Trichlorobenzene		50.0	42.5	ug/L	0.904	14.9	20	
1,2,3-Trichloropropane		50.0	48.9	ug/L	0.188	2.27	20	
1,2,4-Trichlorobenzene		50.0	46.4	ug/L	1.02	7.18	20	
1,2,4-Trimethylbenzene		50.0	54.6	ug/L	3.01	9.16	20	
1,2-Dichloroethane		50.0	50.8	ug/L	0.327	1.53	20	
1,2-Dichlorobenzene		50.0	48.8	ug/L	1.47	2.35	20	
1,2-Dibromo-3-Chloropropane		50.0	48.7	ug/L	0.115	2.63	20	
1,2-Dibromoethane		50.0	47.4	ug/L	0.268	5.16	20	
1,3,5-Trimethylbenzene		50.0	53.2	ug/L	2.86	6.47	20	
1,3-Dichlorobenzene		50.0	50.3	ug/L	1.62	0.636	20	
1,3-Dichloropropane		50.0	51.1	ug/L	0.505	2.14	20	
1,4-Dichlorobenzene		50.0	49.3	ug/L	1.60	1.37	20	
1-Chlorohexane		50.0	52.2	ug/L	0.527	4.31	20	
2,2-Dichloropropane		50.0	43.0	ug/L	0.297	14.0	20	
2-Hexanone		50.0	47.1	ug/L	0.133	5.71	20	
2-Chlorotoluene		50.0	50.7	ug/L	2.56	1.41	20	
4-Chlorotoluene		50.0	56.8	ug/L	2.53	13.6	20	
Acetone		50.0	51.9	ug/L	0.0560	3.85	20	
Benzene		50.0	49.7	ug/L	1.06	0.550	20	
Bromobenzene		50.0	49.2	ug/L	0.837	1.63	20	
Bromochloromethane		50.0	48.7	ug/L	0.155	2.51	20	
Bromodichloromethane		50.0	51.9	ug/L	0.370	3.77	20	
Bromomethane		50.0	42.9	ug/L	0.168	14.2	20	
Carbon Disulfide		50.0	54.2	ug/L	0.889	8.40	20	
Carbon Tetrachloride		50.0	53.8	ug/L	0.357	7.51	20	
Chloroethane		50.0	53.6	ug/L	0.209	7.23	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/27/2017 Sample ID: WG611834-02

Instrument ID: HPMS6 Run Time: 12:26 Method: 8260B

File ID: 6M146766 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611838 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.8	ug/L	0.300	0.418	20	
cis-1,3-Dichloropropene		50.0	54.1	ug/L	0.425	8.22	20	
Dibromochloromethane		50.0	49.6	ug/L	0.361	0.895	20	
Dibromomethane		50.0	48.7	ug/L	0.145	2.67	20	
Dichlorodifluoromethane		50.0	49.1	ug/L	0.389	1.89	20	
Hexachlorobutadiene		50.0	46.9	ug/L	0.395	6.13	20	
Isopropylbenzene		50.0	52.5	ug/L	1.76	5.09	20	
Methylene Chloride		50.0	49.4	ug/L	0.285	1.27	20	
Methyl Tert Butyl Ether		50.0	47.7	ug/L	0.603	4.61	20	
2-Butanone		50.0	47.0	ug/L	0.0639	6.06	20	
4-Methyl-2-Pentanone		50.0	45.5	ug/L	0.0591	8.94	20	
n-Butylbenzene		50.0	55.5	ug/L	2.82	11.1	20	
n-Propylbenzene		50.0	53.8	ug/L	4.08	7.70	20	
m-,p-Xylene		100	103	ug/L	0.715	3.24	20	
Naphthalene		50.0	45.1	ug/L	1.99	9.76	20	
o-Xylene		50.0	51.5	ug/L	0.688	2.97	20	
p-Isopropyltoluene		50.0	52.8	ug/L	2.94	5.54	20	
sec-Butylbenzene		50.0	53.1	ug/L	3.51	6.14	20	
Styrene		50.0	53.5	ug/L	1.20	6.92	20	
Trichloroethene		50.0	46.4	ug/L	0.270	7.16	20	
tert-Butylbenzene		50.0	51.5	ug/L	0.579	2.96	20	
Tetrachloroethene		50.0	48.3	ug/L	0.366	3.38	20	
trans-1,2-Dichloroethene		50.0	50.2	ug/L	0.275	0.311	20	
trans-1,3-Dichloropropene		50.0	54.6	ug/L	0.526	9.22	20	
Trichlorofluoromethane		50.0	52.4	ug/L	0.487	4.73	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG611920-02
Instrument ID: HPMS6 Run Time: 06:52 Method: 8260B
File ID: 6M146798 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	57.4	ug/L	0.438	14.9	20	
1,2-Dichloropropane	CCC	50.0	54.8	ug/L	0.277	9.55	20	
Chloroform	CCC	50.0	48.8	ug/L	0.505	2.37	20	
Ethylbenzene	CCC	50.0	52.9	ug/L	0.612	5.73	20	
Toluene	CCC	50.0	53.2	ug/L	1.66	6.41	20	
Vinyl Chloride	CCC	50.0	50.6	ug/L	0.459	1.26	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.1	ug/L	0.639	1.82	20	
1,1-Dichloroethane	SPCC	50.0	56.9	ug/L	0.517	13.8	20	
Bromoform	SPCC	50.0	48.0	ug/L	0.213	4.06	20	
Chlorobenzene	SPCC	50.0	51.4	ug/L	1.10	2.74	20	
Chloromethane	SPCC	50.0	48.8	ug/L	0.452	2.39	20	
Xylenes		150	159	ug/L	0.721	5.97	20	
1,1,1,2-Tetrachloroethane		50.0	52.6	ug/L	0.403	5.17	20	
1,1,1-Trichloroethane		50.0	53.3	ug/L	0.448	6.56	20	
1,1,2-Trichloroethane		50.0	49.8	ug/L	0.293	0.431	20	
1,1-Dichloropropene		50.0	54.2	ug/L	0.386	8.47	20	
1,2,3-Trichlorobenzene		50.0	41.3	ug/L	0.879	17.4	20	
1,2,3-Trichloropropane		50.0	46.0	ug/L	0.177	8.02	20	
1,2,4-Trichlorobenzene		50.0	45.2	ug/L	0.995	9.69	20	
1,2,4-Trimethylbenzene		50.0	53.7	ug/L	2.96	7.31	20	
1,2-Dichloroethane		50.0	52.7	ug/L	0.339	5.35	20	
1,2-Dichlorobenzene		50.0	47.5	ug/L	1.43	5.04	20	
1,2-Dibromo-3-Chloropropane		50.0	46.4	ug/L	0.110	7.10	20	
1,2-Dibromoethane		50.0	48.6	ug/L	0.275	2.88	20	
1,3,5-Trimethylbenzene		50.0	52.5	ug/L	2.81	4.90	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.60	0.326	20	
1,3-Dichloropropane		50.0	52.1	ug/L	0.515	4.15	20	
1,4-Dichlorobenzene		50.0	49.2	ug/L	1.60	1.52	20	
1-Chlorohexane		50.0	53.3	ug/L	0.538	6.57	20	
2,2-Dichloropropane		50.0	54.2	ug/L	0.375	8.50	20	
2-Hexanone		50.0	49.2	ug/L	0.139	1.63	20	
2-Chlorotoluene		50.0	53.6	ug/L	2.70	7.19	20	
4-Chlorotoluene		50.0	51.6	ug/L	2.30	3.24	20	
Acetone		50.0	50.8	ug/L	0.0548	1.63	20	
Benzene		50.0	51.9	ug/L	1.11	3.82	20	
Bromobenzene		50.0	48.1	ug/L	0.819	3.70	20	
Bromochloromethane		50.0	52.2	ug/L	0.166	4.50	20	
Bromodichloromethane		50.0	53.3	ug/L	0.380	6.53	20	
Bromomethane		50.0	46.6	ug/L	0.183	6.82	20	
Carbon Disulfide		50.0	55.4	ug/L	0.908	10.7	20	
Carbon Tetrachloride		50.0	56.3	ug/L	0.374	12.7	20	
Chloroethane		50.0	56.1	ug/L	0.219	12.1	20	

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG611920-02

Instrument ID: HPMS6 Run Time: 06:52 Method: 8260B

File ID: 6M146798 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	52.3	ug/L	0.315	4.55	20	
cis-1,3-Dichloropropene		50.0	56.2	ug/L	0.441	12.4	20	
Dibromochloromethane		50.0	50.0	ug/L	0.364	0.0562	20	
Dibromomethane		50.0	50.4	ug/L	0.150	0.836	20	
Dichlorodifluoromethane		50.0	57.4	ug/L	0.456	14.9	20	
Hexachlorobutadiene		50.0	45.6	ug/L	0.384	8.71	20	
Isopropylbenzene		50.0	54.0	ug/L	1.80	7.96	20	
Methylene Chloride		50.0	51.8	ug/L	0.298	3.52	20	
Methyl Tert Butyl Ether		50.0	50.9	ug/L	0.643	1.70	20	
2-Butanone		50.0	48.6	ug/L	0.0661	2.84	20	
4-Methyl-2-Pentanone		50.0	46.3	ug/L	0.0601	7.48	20	
n-Butylbenzene		50.0	55.7	ug/L	2.83	11.3	20	
n-Propylbenzene		50.0	53.3	ug/L	4.04	6.67	20	
m-,p-Xylene		100	106	ug/L	0.733	5.87	20	
Naphthalene		50.0	43.8	ug/L	1.93	12.4	20	
o-Xylene		50.0	53.1	ug/L	0.709	6.16	20	
p-Isopropyltoluene		50.0	52.9	ug/L	2.94	5.77	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.54	6.89	20	
Styrene		50.0	54.8	ug/L	1.23	9.57	20	
Trichloroethene		50.0	48.2	ug/L	0.281	3.54	20	
tert-Butylbenzene		50.0	51.0	ug/L	0.574	2.04	20	
Tetrachloroethene		50.0	49.6	ug/L	0.376	0.727	20	
trans-1,2-Dichloroethene		50.0	52.4	ug/L	0.288	4.86	20	
trans-1,3-Dichloropropene		50.0	56.6	ug/L	0.546	13.3	20	
Trichlorofluoromethane		50.0	53.9	ug/L	0.501	7.87	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	56.2	ug/L	0.429	12.5	20	
1,2-Dichloropropane	CCC	50.0	54.5	ug/L	0.275	9.10	20	
Chloroform	CCC	50.0	47.5	ug/L	0.492	4.97	20	
Ethylbenzene	CCC	50.0	50.6	ug/L	0.586	1.14	20	
Toluene	CCC	50.0	51.2	ug/L	1.60	2.48	20	
Vinyl Chloride	CCC	50.0	48.2	ug/L	0.437	3.67	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.8	ug/L	0.662	1.61	20	
1,1-Dichloroethane	SPCC	50.0	55.6	ug/L	0.505	11.2	20	
Bromoform	SPCC	50.0	46.6	ug/L	0.207	6.70	20	
Chlorobenzene	SPCC	50.0	49.5	ug/L	1.06	0.967	20	
Chloromethane	SPCC	50.0	50.6	ug/L	0.468	1.22	20	
Xylenes		150	153	ug/L	0.694	1.87	20	
1,1,1,2-Tetrachloroethane		50.0	50.0	ug/L	0.384	0.0966	20	
1,1,1-Trichloroethane		50.0	51.6	ug/L	0.434	3.22	20	
1,1,2-Trichloroethane		50.0	50.6	ug/L	0.298	1.16	20	
1,1-Dichloropropene		50.0	52.9	ug/L	0.377	5.86	20	
1,2,3-Trichlorobenzene		50.0	44.3	ug/L	0.942	11.4	20	
1,2,3-Trichloropropane		50.0	49.0	ug/L	0.188	1.99	20	
1,2,4-Trichlorobenzene		50.0	47.3	ug/L	1.04	5.40	20	
1,2,4-Trimethylbenzene		50.0	53.4	ug/L	2.94	6.87	20	
1,2-Dichloroethane		50.0	52.2	ug/L	0.336	4.46	20	
1,2-Dichlorobenzene		50.0	48.1	ug/L	1.45	3.80	20	
1,2-Dibromo-3-Chloropropane		50.0	51.7	ug/L	0.122	3.32	20	
1,2-Dibromoethane		50.0	49.5	ug/L	0.280	1.06	20	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.83	5.41	20	
1,3-Dichlorobenzene		50.0	49.1	ug/L	1.58	1.90	20	
1,3-Dichloropropane		50.0	52.4	ug/L	0.518	4.75	20	
1,4-Dichlorobenzene		50.0	48.2	ug/L	1.57	3.54	20	
1-Chlorohexane		50.0	54.3	ug/L	0.548	8.66	20	
2,2-Dichloropropane		50.0	55.1	ug/L	0.381	10.2	20	
2-Hexanone		50.0	52.7	ug/L	0.149	5.40	20	
2-Chlorotoluene		50.0	53.4	ug/L	2.69	6.71	20	
4-Chlorotoluene		50.0	52.0	ug/L	2.32	4.02	20	
Acetone		50.0	55.6	ug/L	0.0600	11.2	20	
Benzene		50.0	50.3	ug/L	1.08	0.583	20	
Bromobenzene		50.0	48.2	ug/L	0.819	3.64	20	
Bromochloromethane		50.0	50.6	ug/L	0.161	1.15	20	
Bromodichloromethane		50.0	52.1	ug/L	0.371	4.10	20	
Bromomethane		50.0	47.4	ug/L	0.186	5.28	20	
Carbon Disulfide		50.0	55.8	ug/L	0.915	11.6	20	
Carbon Tetrachloride		50.0	52.1	ug/L	0.346	4.16	20	
Chloroethane		50.0	55.1	ug/L	0.215	10.3	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041110 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	51.1	ug/L	0.308	2.12	20	
cis-1,3-Dichloropropene		50.0	55.2	ug/L	0.433	10.3	20	
Dibromochloromethane		50.0	48.9	ug/L	0.356	2.18	20	
Dibromomethane		50.0	50.2	ug/L	0.149	0.376	20	
Dichlorodifluoromethane		50.0	53.8	ug/L	0.427	7.59	20	
Hexachlorobutadiene		50.0	49.3	ug/L	0.415	1.42	20	
Isopropylbenzene		50.0	52.3	ug/L	1.75	4.59	20	
Methylene Chloride		50.0	51.3	ug/L	0.296	2.54	20	
Methyl Tert Butyl Ether		50.0	52.9	ug/L	0.668	5.77	20	
2-Butanone		50.0	52.8	ug/L	0.0718	5.61	20	
4-Methyl-2-Pentanone		50.0	50.3	ug/L	0.0653	0.596	20	
n-Butylbenzene		50.0	55.7	ug/L	2.83	11.5	20	
n-Propylbenzene		50.0	53.6	ug/L	4.06	7.17	20	
m-,p-Xylene		100	101	ug/L	0.702	1.47	20	
Naphthalene		50.0	48.0	ug/L	2.12	3.96	20	
o-Xylene		50.0	51.3	ug/L	0.686	2.67	20	
p-Isopropyltoluene		50.0	52.7	ug/L	2.94	5.49	20	
sec-Butylbenzene		50.0	53.3	ug/L	3.52	6.51	20	
Styrene		50.0	52.8	ug/L	1.18	5.61	20	
Trichloroethene		50.0	47.1	ug/L	0.274	5.75	20	
tert-Butylbenzene		50.0	51.3	ug/L	0.577	2.66	20	
Tetrachloroethene		50.0	48.2	ug/L	0.365	3.69	20	
trans-1,2-Dichloroethene		50.0	51.2	ug/L	0.281	2.30	20	
trans-1,3-Dichloropropene		50.0	56.1	ug/L	0.541	12.3	20	
Trichlorofluoromethane		50.0	51.4	ug/L	0.478	2.86	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS17
Workgroup (AAB#): WG611827

ICAL CCV Number: WG611454-08
CAL ID: HPMS17 - 26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041110-01	1.00	01	141850	284138	382990
L17041110-02	1.00	01	135572	276467	377412
L17041110-03	1.00	01	134600	274407	372946
L17041110-04	1.00	01	141405	286335	387503
L17041110-05	1.00	01	132283	271091	369676
L17041110-06	1.00	01	139541	278360	373440
L17041110-07	1.00	01	130539	268483	363995
L17041110-08	1.00	01	128141	266508	366120
WG611827-01	1.00	01	145053	295946	402256
WG611827-02	1.00	01	152225	296865	395669

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Report generated 05/01/2017 14:05

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS8
Workgroup (AAB#): WG611829

ICAL CCV Number: WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041110-10	1.00	01	242317	481327	591099
L17041110-11	1.00	01	279133	550552	681751
L17041110-13	1.00	01	273528	537256	667986
L17041110-14	1.00	01	264269	520235	644000
L17041110-15	1.00	01	262942	527598	655763
L17041110-16	1.00	01	261374	520549	651473
L17041110-18	1.00	01	247429	499553	620343
L17041110-19	1.00	01	243493	490646	599951
L17041110-20	1.00	01	255548	510769	638156
L17041110-21	1.00	01	254272	512291	632248
L17041110-22	1.00	01	249791	502601	627839
L17041110-23	1.00	01	249492	496202	604415
L17041110-26	1.00	01	274014	559366	696490
L17041110-27	1.00	01	311500	592371	731045
L17041110-28	1.00	01	323670	605015	750105
WG611829-01	1.00	01	274776	544970	682398
WG611829-02	1.00	01	311188	586035	712330

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS6
Workgroup (AAB#): WG611838

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041110-24	1.00	01	192181	388818	566716
L17041110-29	1.00	01	192877	386811	560435
L17041110-30	1.00	01	210413	426309	623379
WG611838-01	1.00	01	201206	410120	596145
WG611838-02	1.00	01	226867	443423	646310
WG611838-06	1.00	02	216611	438174	642745

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS6
Workgroup (AAB#): WG611922

ICAL CCV Number: WG608938-08
CAL ID: HPMS6 - 05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041110-09	1.00	02	201209	404726	585227
L17041110-12	1.00	01	197358	402218	581667
L17041110-17	1.00	01	199403	402467	582280
L17041110-25	5.00	DL01	199684	395813	575984
WG611922-01	1.00	01	201980	403127	587274
WG611922-02	1.00	01	224441	424126	613920
WG611922-03	1.00	01	207516	417470	613072

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5267590
Report generated 05/01/2017 14:05

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS6
Workgroup (AAB#): WG611838

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041110-24	1.00	01	18.16	15.13	11.25
L17041110-29	1.00	01	18.16	15.13	11.25
L17041110-30	1.00	01	18.16	15.13	11.25
WG611838-01	1.00	01	18.16	15.13	11.25
WG611838-02	1.00	01	18.16	15.13	11.25
WG611838-06	1.00	02	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS6
Workgroup (AAB#): WG611922

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041110-09	1.00	02	18.16	15.13	11.25
L17041110-12	1.00	01	18.16	15.13	11.25
L17041110-17	1.00	01	18.16	15.13	11.25
L17041110-25	5.00	DL01	18.16	15.13	11.25
WG611922-01	1.00	01	18.16	15.13	11.25
WG611922-02	1.00	01	18.16	15.13	11.25
WG611922-03	1.00	01	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5267592
Report generated: 05/01/2017 14:06

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS8
Workgroup (AAB#): WG611829

ICAL CCV Number: WG610410-08
CAL ID: HPMS8 - 17-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041110-10	1.00	01	17.82	14.79	10.93
L17041110-11	1.00	01	17.81	14.79	10.93
L17041110-13	1.00	01	17.82	14.79	10.92
L17041110-14	1.00	01	17.82	14.79	10.92
L17041110-15	1.00	01	17.82	14.79	10.92
L17041110-16	1.00	01	17.82	14.79	10.93
L17041110-18	1.00	01	17.82	14.79	10.93
L17041110-19	1.00	01	17.82	14.79	10.93
L17041110-20	1.00	01	17.82	14.79	10.93
L17041110-21	1.00	01	17.82	14.79	10.92
L17041110-22	1.00	01	17.82	14.79	10.93
L17041110-23	1.00	01	17.82	14.79	10.93
L17041110-26	1.00	01	17.82	14.79	10.92
L17041110-27	1.00	01	17.82	14.79	10.92
L17041110-28	1.00	01	17.82	14.79	10.93
WG611829-01	1.00	01	17.82	14.79	10.93
WG611829-02	1.00	01	17.82	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5267592
Report generated: 05/01/2017 14:06

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041110
Instrument ID: HPMS17
Workgroup (AAB#): WG611827

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041110-01	1.00	01	9.36	8.05	5.27
L17041110-02	1.00	01	9.36	8.05	5.27
L17041110-03	1.00	01	9.36	8.05	5.27
L17041110-04	1.00	01	9.36	8.05	5.27
L17041110-05	1.00	01	9.36	8.05	5.27
L17041110-06	1.00	01	9.36	8.05	5.28
L17041110-07	1.00	01	9.36	8.05	5.28
L17041110-08	1.00	01	9.36	8.05	5.27
WG611827-01	1.00	01	9.36	8.05	5.27
WG611827-02	1.00	01	9.36	8.05	5.28

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5267592
Report generated: 05/01/2017 14:06

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273081.D Vial: 17
Acq On : 27 Apr 2017 17:27 Operator: ADC
Sample : L17041110-01 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

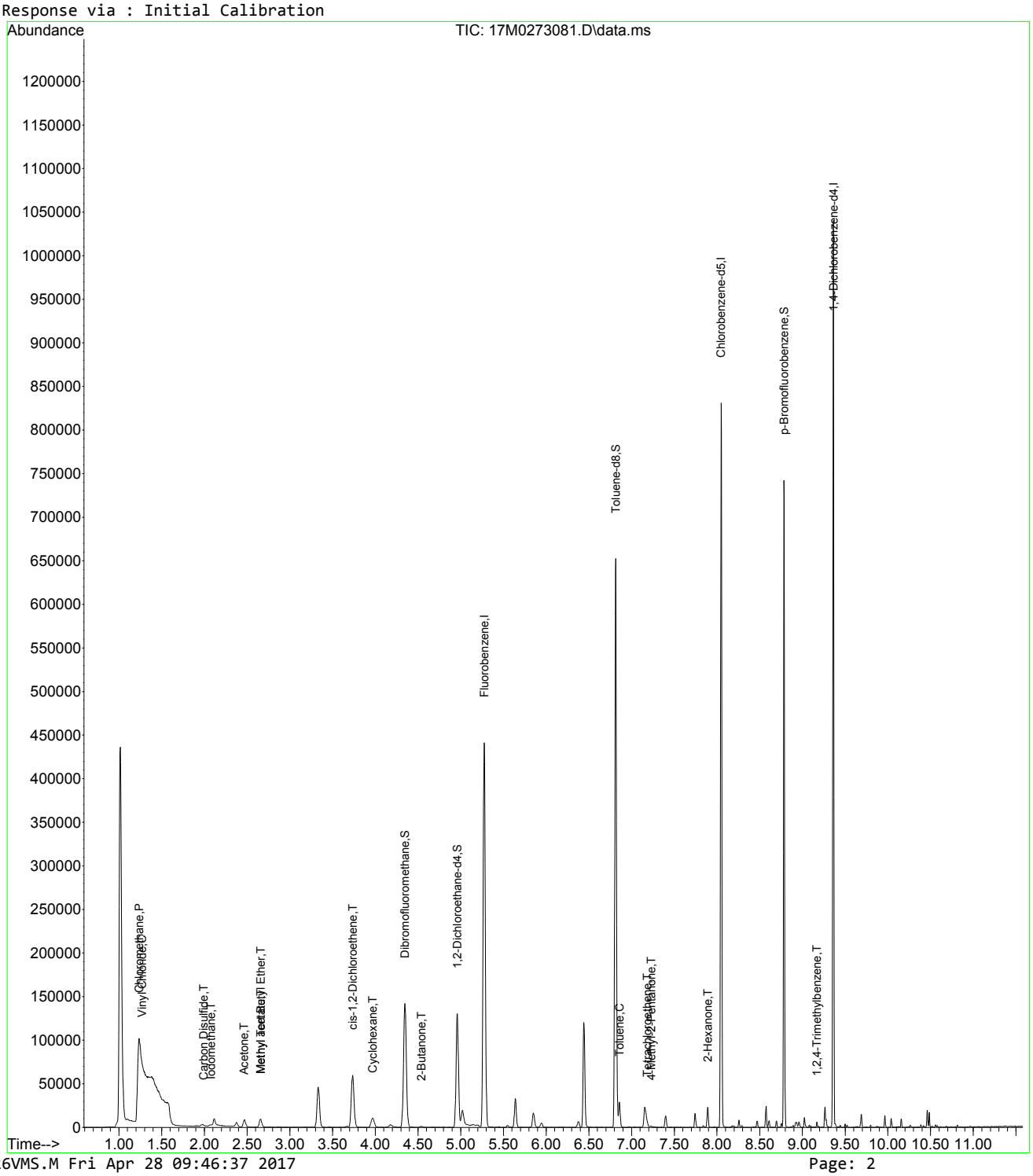
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	382990	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	284138	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	141850	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	101051	24.4308	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.723%			
34) 1,2-Dichloroethane-d4	4.959	65	96309	24.8414	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.366%			
47) Toluene-d8	6.815	98	350206	24.6966	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 98.786%			
66) p-Bromofluorobenzene	8.783	95	119628	25.1874	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.750%			
Target Compounds						Qvalue
3) Chloromethane	1.238	50	3521	0.7910	ug/L #	42
4) Vinyl Chloride	1.270	62	739	0.1499	ug/L #	1
11) Carbon Disulfide	1.991	76	1890	0.1489	ug/L #	73
13) Iodomethane	2.075	142	1737	2.2935	ug/L #	84
16) Acetone	2.463	43	7621	9.8966	ug/L	98
18) Methyl acetate	2.660	43	1993	0.9872	ug/L #	76
19) Methyl Tert Butyl Ether	2.660	73	9996	0.9778	ug/L	96
23) cis-1,2-Dichloroethene	3.734	96	33491	7.3450	ug/L	99
25) Cyclohexane	3.968	56	7098	1.1534	ug/L #	79
32) 2-Butanone	4.542	43	1648	1.4355	ug/L #	58
44) 4-Methyl-2-Pentanone	7.229	58	258	0.2427	ug/L #	23
48) Toluene	6.858	91	16930	0.9504	ug/L	99
49) Tetrachloroethene	7.185	166	937	0.1844	ug/L	98
54) 2-Hexanone	7.892	43	8500	4.6878	ug/L	95
73) 1,2,4-Trimethylbenzene	9.168	105	1927	0.1208	ug/L	93

(#) = qualifier out of range (m) = manual integration (+) = signals summed

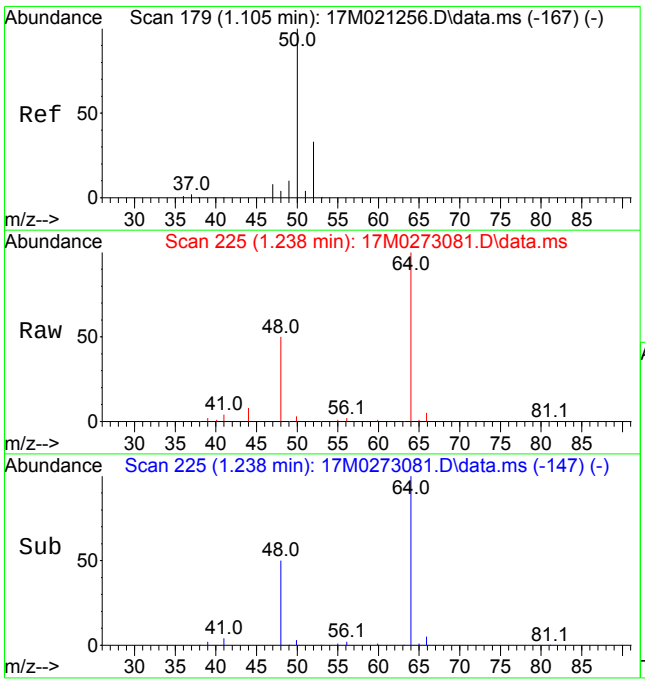
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273081.D Vial: 17
Acq On : 27 Apr 2017 17:27 Operator: ADC
Sample : L17041110-01 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



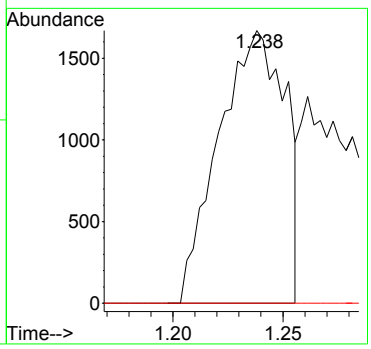
826VMS.M Fri Apr 28 09:46:37 2017 Page: 2

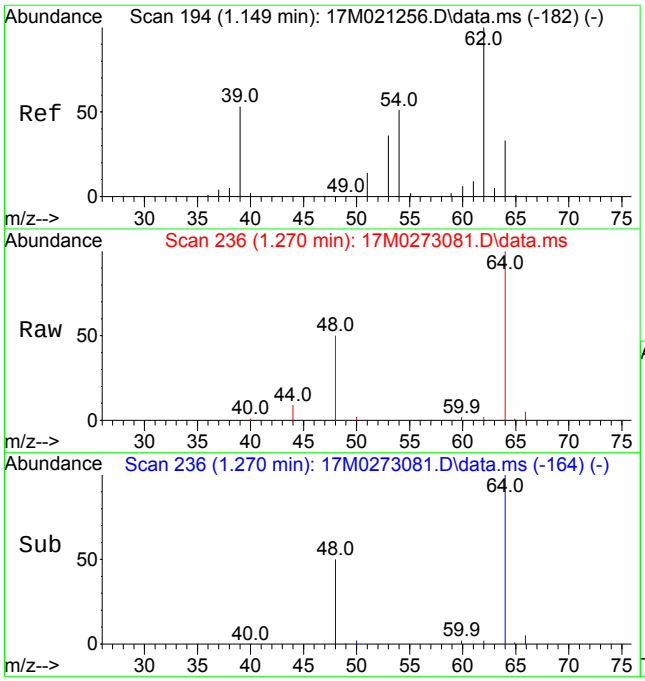


#3
Chloromethane
Concen: 0.7910 ug/L
RT: 1.238 min Scan# 225
Delta R.T. 0.026 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 50 Resp: 3521

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

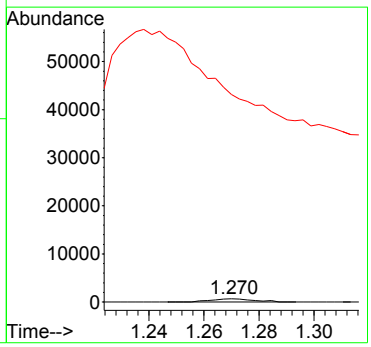


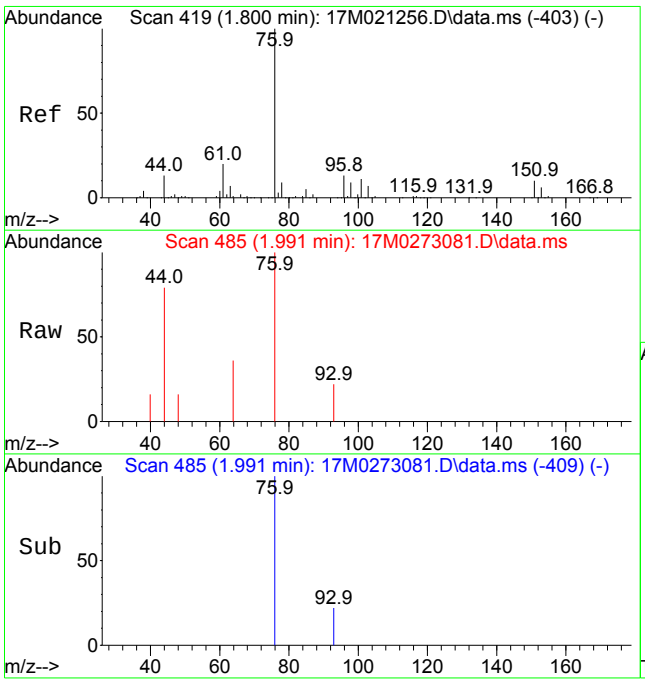


#4
Vinyl Chloride
Concen: 0.1499 ug/L
RT: 1.270 min Scan# 236
Delta R.T. 0.009 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 62 Resp: 739

Ion	Ratio	Lower	Upper
62	100		
64	43043.3	19.2	44.8#

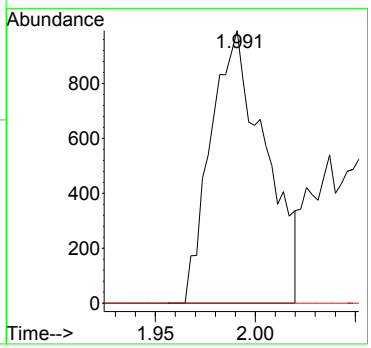


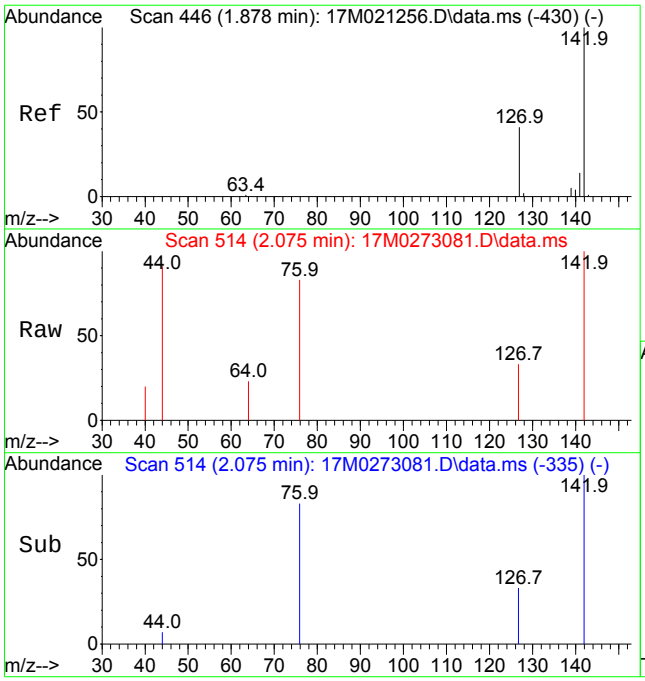


#11
Carbon Disulfide
Concen: 0.1489 ug/L
RT: 1.991 min Scan# 485
Delta R.T. 0.020 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 76 Resp: 1890

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

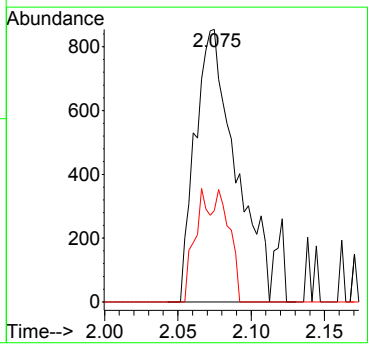


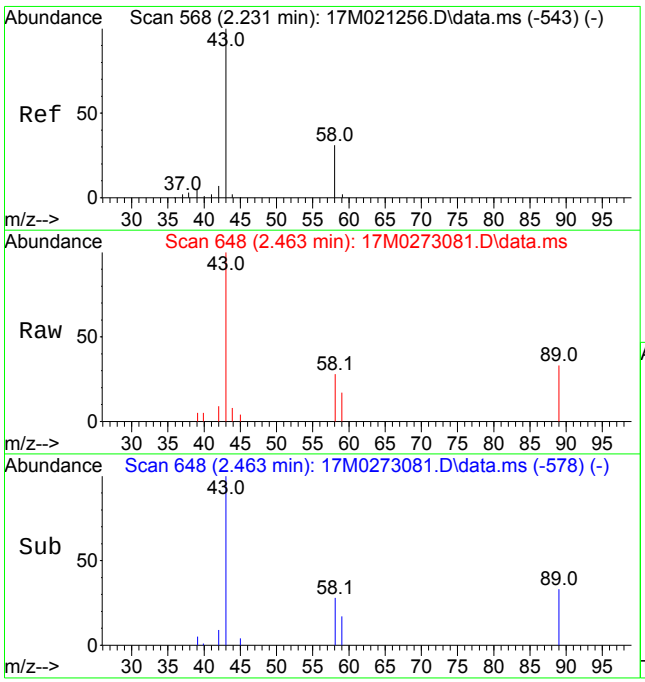


#13
Iodomethane
Concen: 2.2935 ug/L
RT: 2.075 min Scan# 514
Delta R.T. 0.017 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion:142 Resp: 1737

Ion	Ratio	Lower	Upper
142	100		
127	30.3	32.2	48.2#

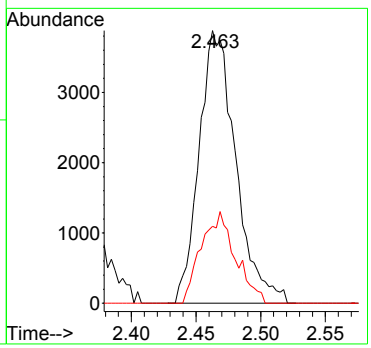


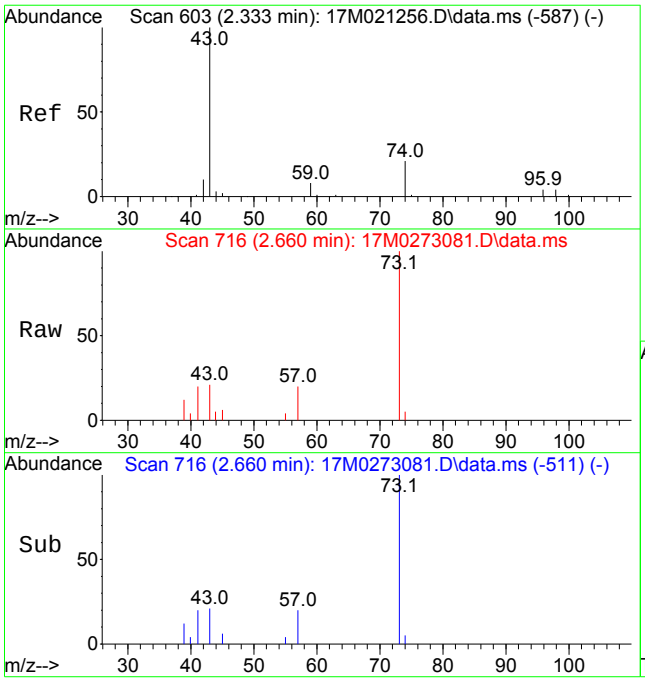


#16
Acetone
Concen: 9.8966 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 43 Resp: 7621

Ion	Ratio	Lower	Upper
43	100		
58	31.3	19.4	45.2

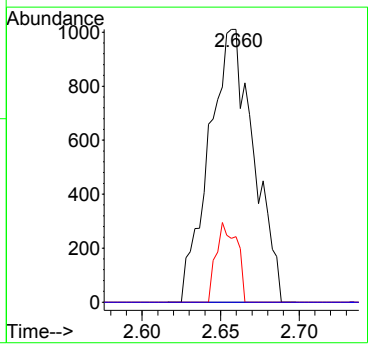


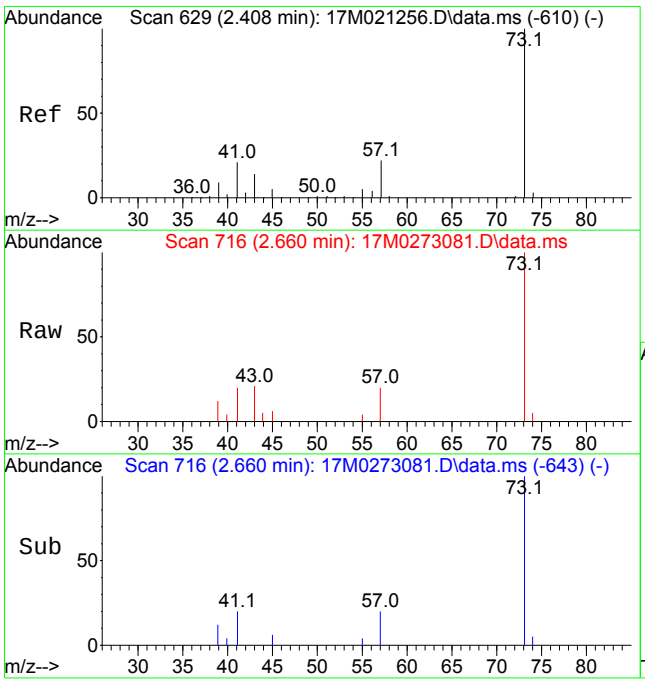


#18
Methyl acetate
Concen: 0.9872 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.093 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 43 Resp: 1993

Ion	Ratio	Lower	Upper
43	100		
74	13.6	25.4	25.4#
59	0.0	7.6	11.4#

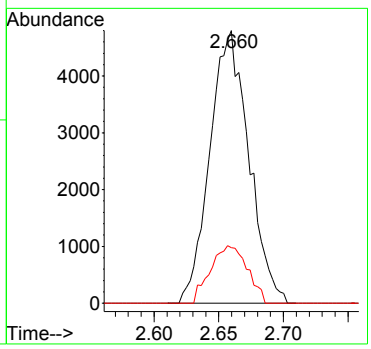


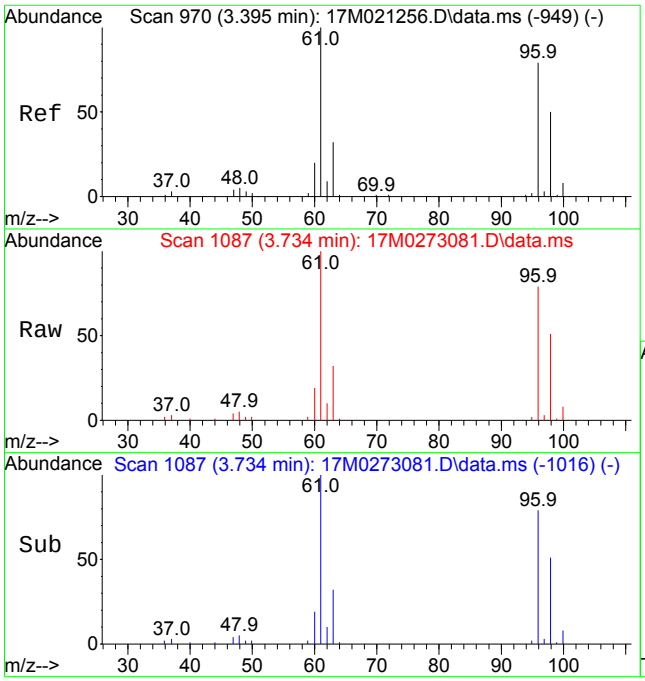


#19
Methyl Tert Butyl Ether
Concen: 0.9778 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.012 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 73 Resp: 9996

Ion	Ratio	Lower	Upper
73	100		
57	20.0	17.6	26.4

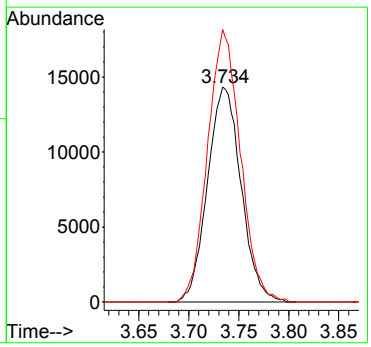


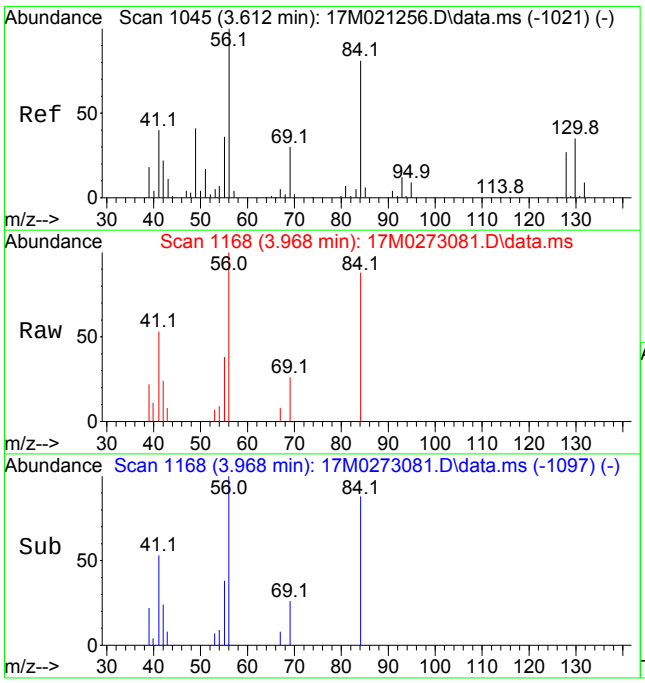


#23
cis-1,2-Dichloroethene
Concen: 7.3450 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 96 Resp: 33491

Ion	Ratio	Lower	Upper
96	100		
61	124.2	98.1	147.1

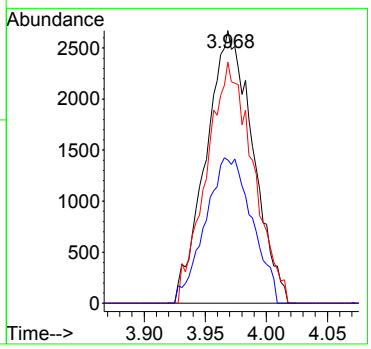


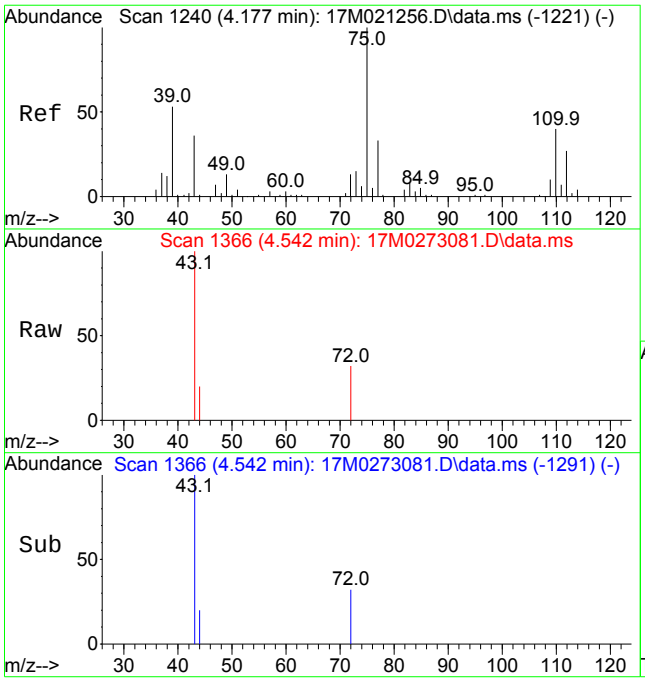


#25
Cyclohexane
Concen: 1.1534 ug/L
RT: 3.968 min Scan# 1168
Delta R.T. 0.005 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 56 Resp: 7098

Ion	Ratio	Lower	Upper
56	100		
84	88.0	69.4	104.0
41	53.5	72.2	108.2#

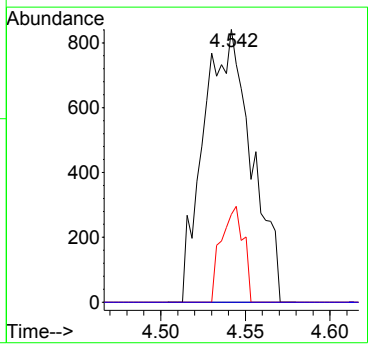


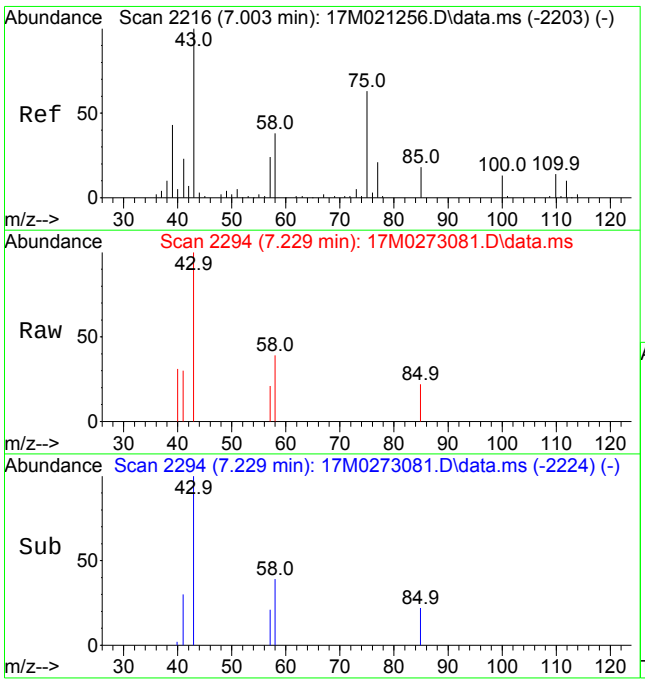


#32
2-Butanone
Concen: 1.4355 ug/L
RT: 4.542 min Scan# 1366
Delta R.T. 0.018 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 43 Resp: 1648

Ion	Ratio	Lower	Upper
43	100		
72	16.4	37.3	55.9#
57	0.0	6.9	10.3#

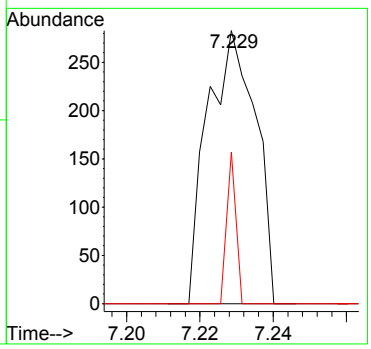


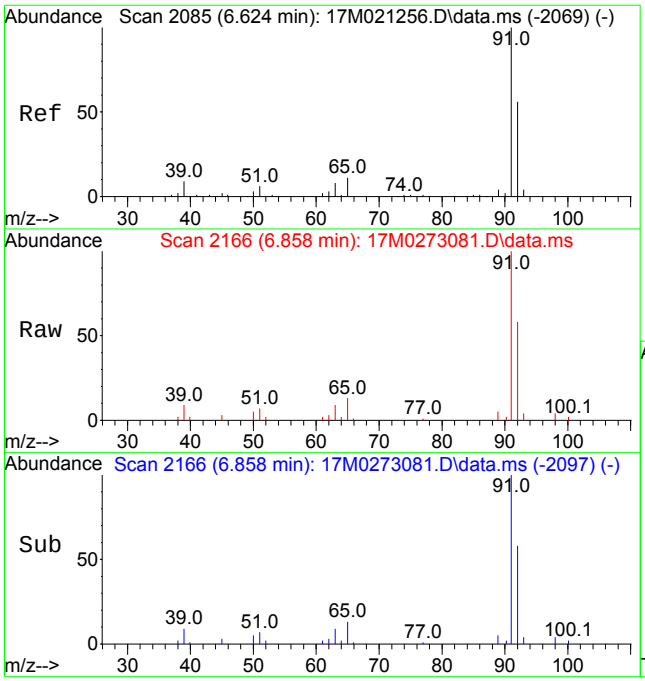


#44
4-Methyl-2-Pentanone
Concen: 0.2427 ug/L
RT: 7.229 min Scan# 2294
Delta R.T. 0.003 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 58 Resp: 258

Ion	Ratio	Lower	Upper
58	100		
85	0.0	34.1	79.5#

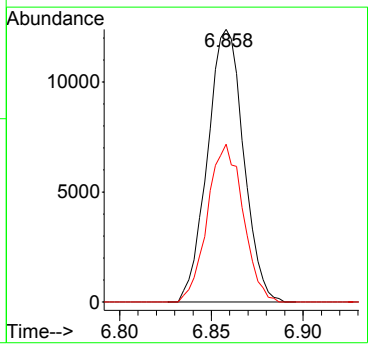


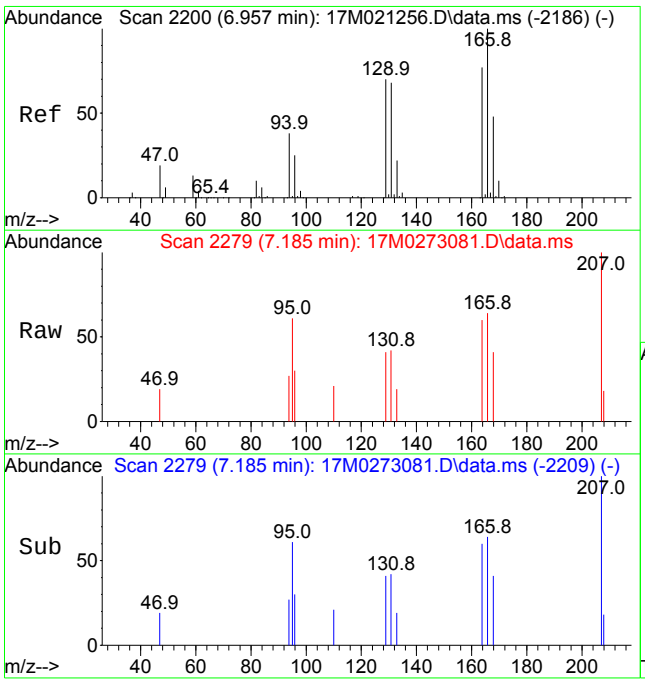


#48
Toluene
Concen: 0.9504 ug/L
RT: 6.858 min Scan# 2166
Delta R.T. -0.000 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 91 Resp: 16930

Ion	Ratio	Lower	Upper
91	100		
92	57.1	33.8	78.8

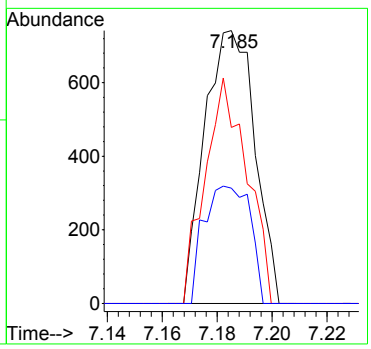


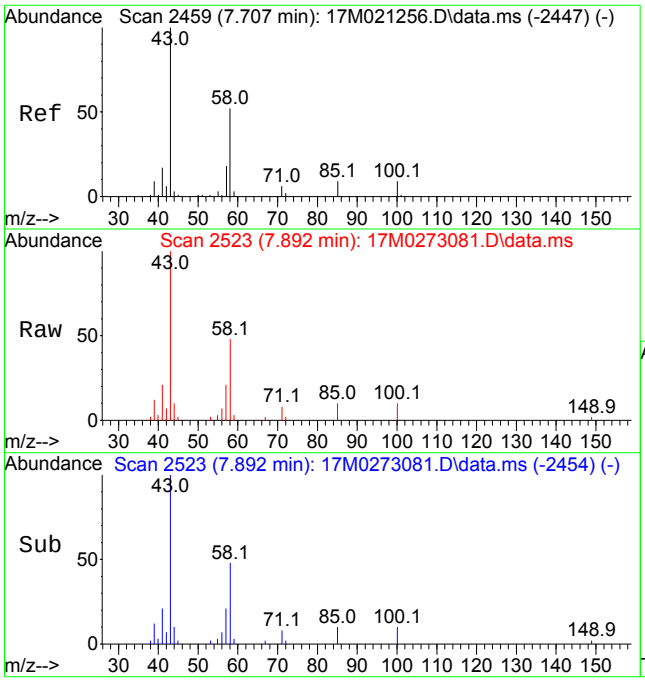


#49
Tetrachloroethene
Concen: 0.1844 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion:166 Resp: 937

Ion	Ratio	Lower	Upper
166	100		
129	69.3	56.2	84.4
94	39.6	29.7	44.5

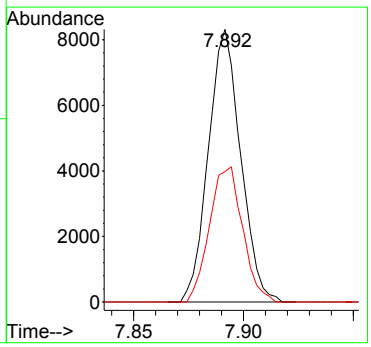


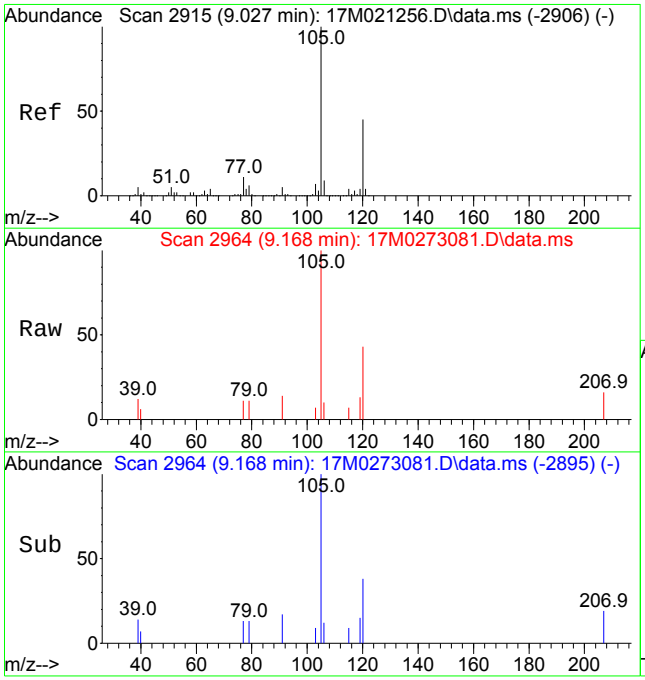


#54
2-Hexanone
Concen: 4.6878 ug/L
RT: 7.892 min Scan# 2523
Delta R.T. -0.000 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion: 43 Resp: 8500

Ion	Ratio	Lower	Upper
43	100		
58	50.8	43.3	64.9

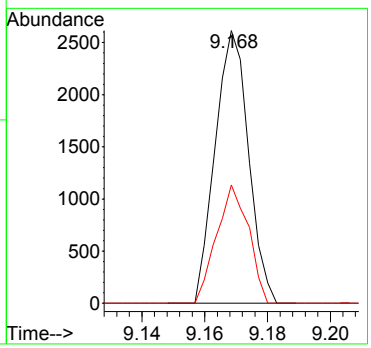




#73
1,2,4-Trimethylbenzene
Concen: 0.1208 ug/L
RT: 9.168 min Scan# 2964
Delta R.T. -0.001 min
Lab File: 17M0273081.D
Acq: 27 Apr 2017 17:27

Tgt Ion:105 Resp: 1927

Ion	Ratio	Lower	Upper
105	100		
120	41.7	37.0	55.4



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273082.D Vial: 18
Acq On : 27 Apr 2017 17:55 Operator: ADC
Sample : L17041110-02 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

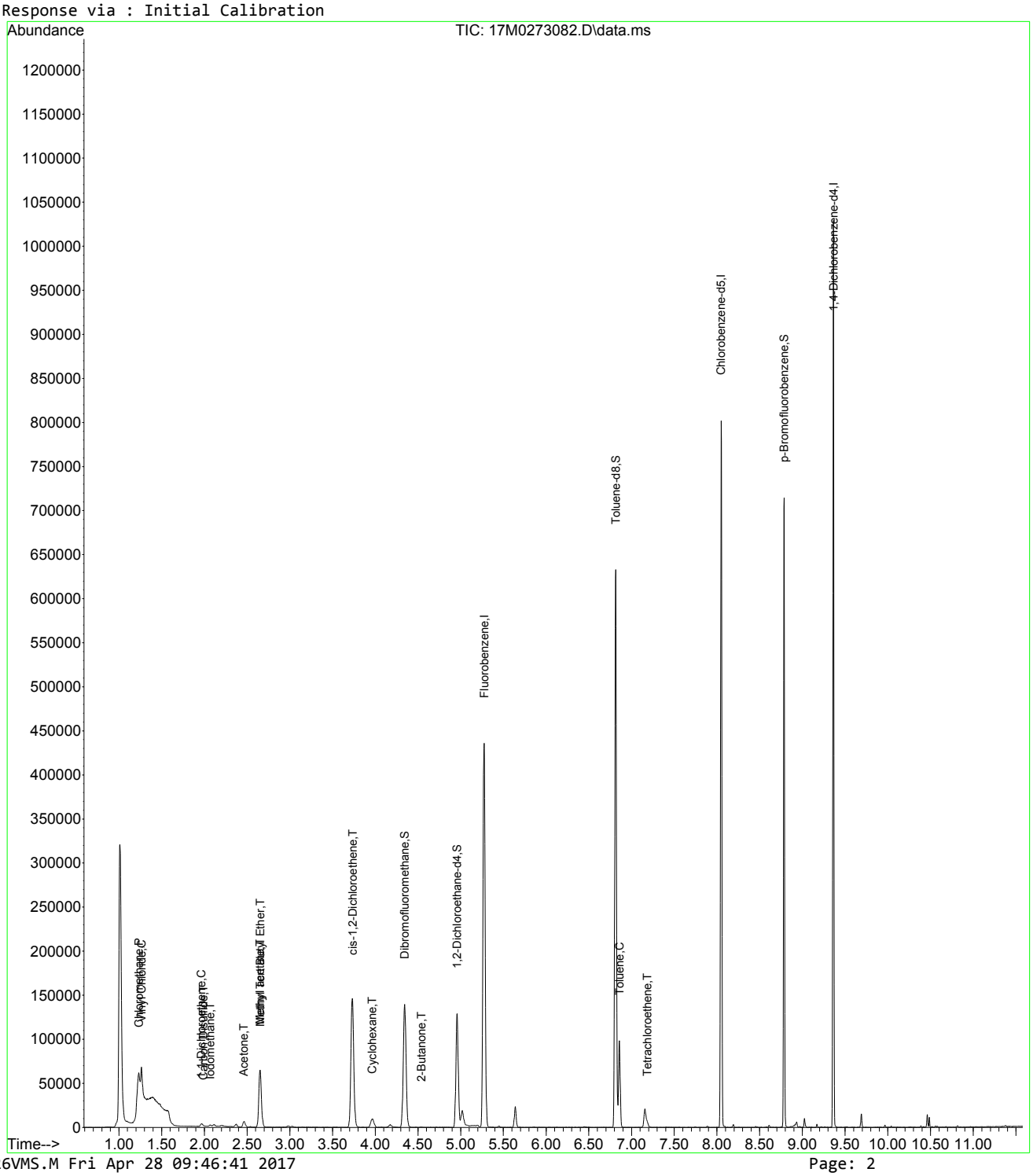
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	377412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	276467	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	135572	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	99812	24.4879	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.952%			
34) 1,2-Dichloroethane-d4	4.956	65	94102	24.6309	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.524%			
47) Toluene-d8	6.815	98	344104	24.9396	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.758%			
66) p-Bromofluorobenzene	8.783	95	114420	25.2064	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.826%			
Target Compounds						Qvalue
3) Chloromethane	1.232	50	2690	0.6132	ug/L #	42
4) Vinyl Chloride	1.264	62	22019	4.5331	ug/L #	1
10) 1,1-Dichloroethene	1.965	61	935	0.1604	ug/L	91
11) Carbon Disulfide	1.988	76	1838	0.1469	ug/L #	73
13) Iodomethane	2.066	142	1548	2.2655	ug/L	89
16) Acetone	2.460	43	6180	8.1440	ug/L	95
18) Methyl acetate	2.651	43	14052	7.0634	ug/L #	87
19) Methyl Tert Butyl Ether	2.654	73	67631	6.7134	ug/L	99
23) cis-1,2-Dichloroethene	3.734	96	82402	18.3390	ug/L	99
25) Cyclohexane	3.963	56	6470	1.0669	ug/L #	80
32) 2-Butanone	4.539	43	601	0.5312	ug/L #	37
48) Toluene	6.858	91	57171	3.2983	ug/L	99
49) Tetrachloroethene	7.185	166	1270	0.2569	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

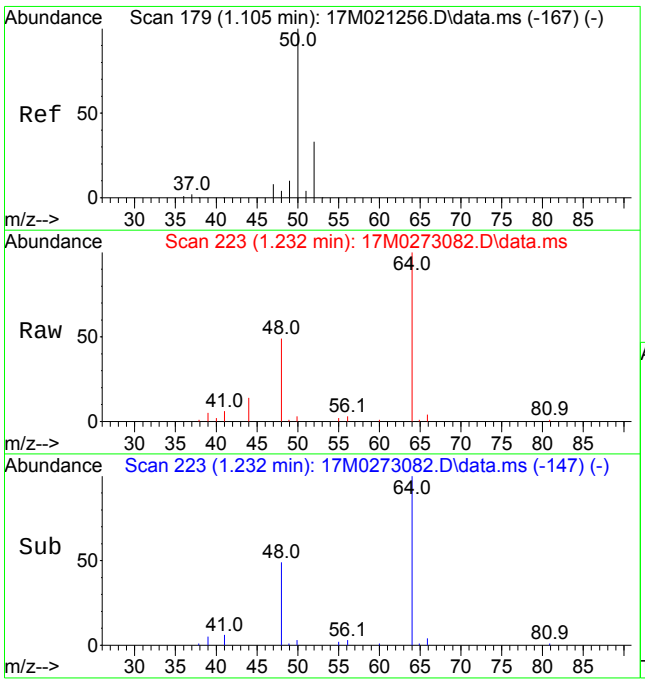
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273082.D Vial: 18
Acq On : 27 Apr 2017 17:55 Operator: ADC
Sample : L17041110-02 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



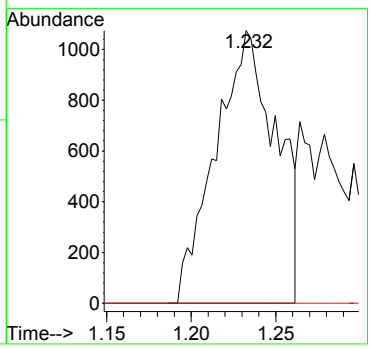
826VMS.M Fri Apr 28 09:46:41 2017 Page: 2

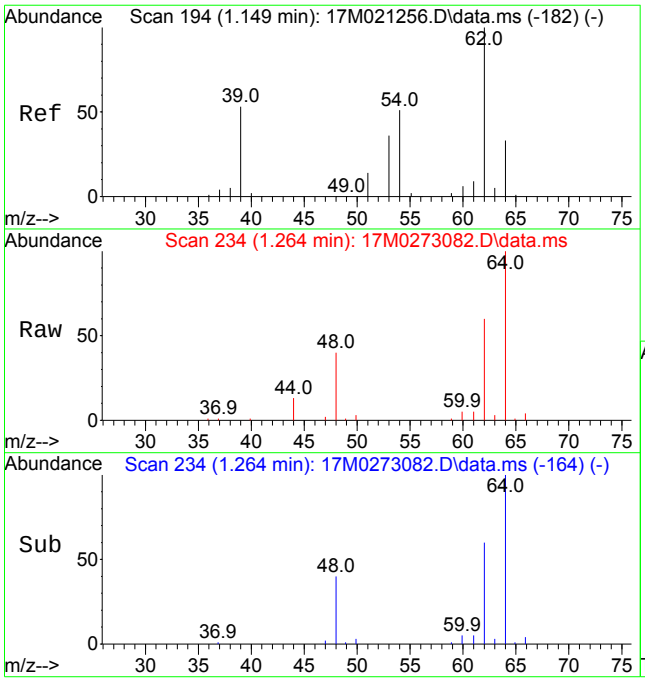


#3
Chloromethane
Concen: 0.6132 ug/L
RT: 1.232 min Scan# 223
Delta R.T. 0.020 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 50 Resp: 2690

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

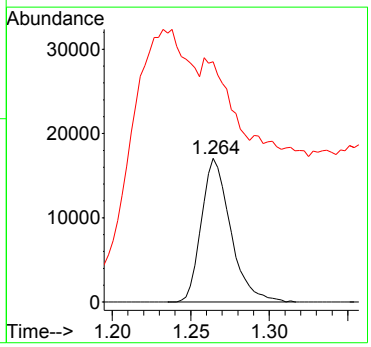


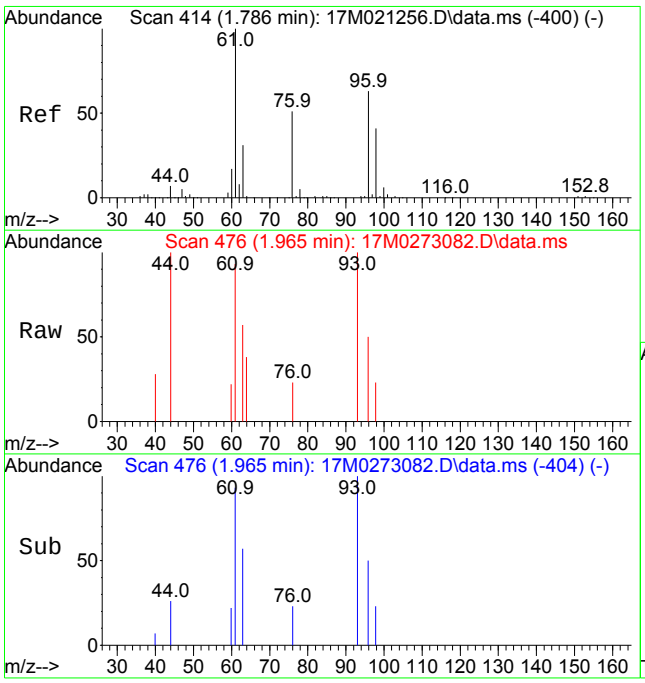


#4
Vinyl Chloride
Concen: 4.5331 ug/L
RT: 1.264 min Scan# 234
Delta R.T. 0.003 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 62 Resp: 22019

Ion	Ratio	Lower	Upper
62	100		
64	892.1	19.2	44.8#

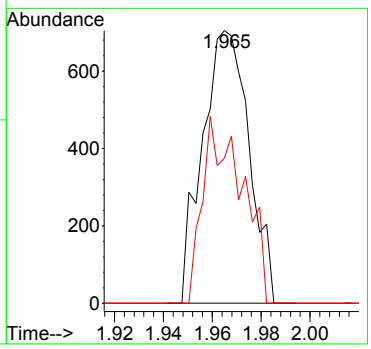


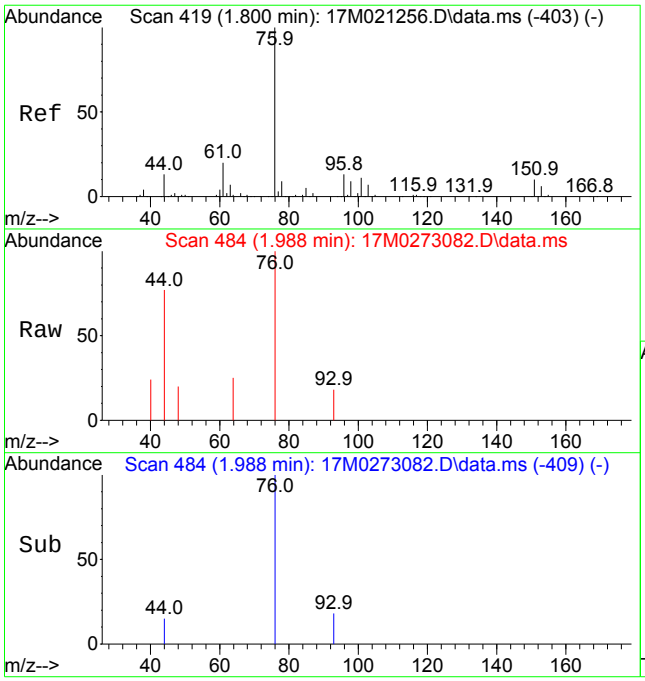


#10
1,1-Dichloroethene
Concen: 0.1604 ug/L
RT: 1.965 min Scan# 476
Delta R.T. 0.009 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 61 Resp: 935

Ion	Ratio	Lower	Upper
61	100		
96	58.7	52.9	79.3

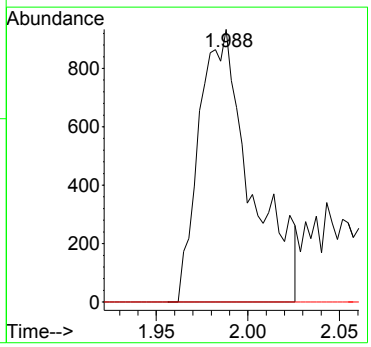


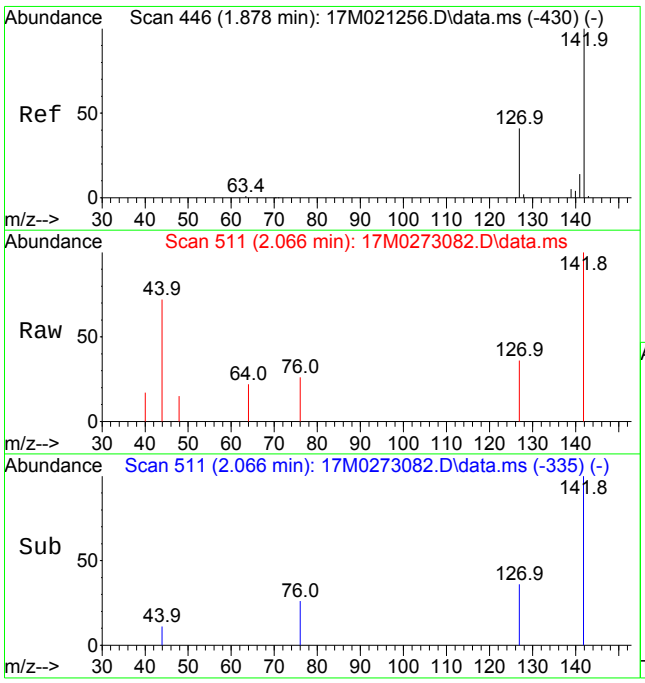


#11
Carbon Disulfide
Concen: 0.1469 ug/L
RT: 1.988 min Scan# 484
Delta R.T. 0.017 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 76 Resp: 1838

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

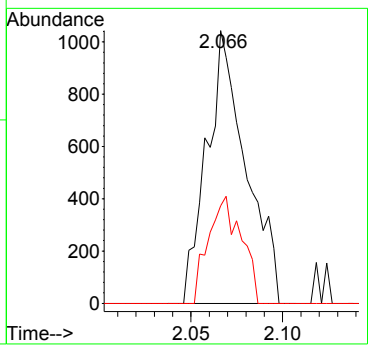


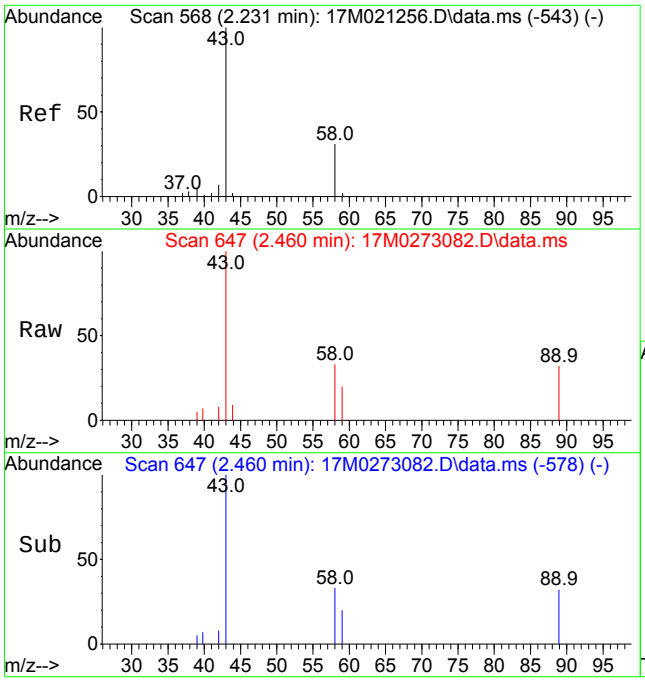


#13
Iodomethane
Concen: 2.2655 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion:142 Resp: 1548

Ion	Ratio	Lower	Upper
142	100		
127	33.1	32.2	48.2

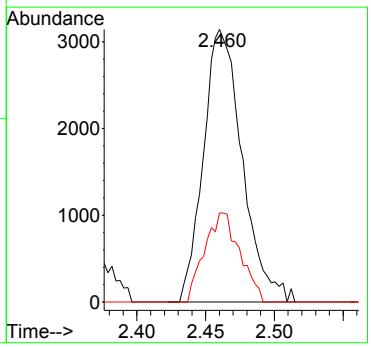


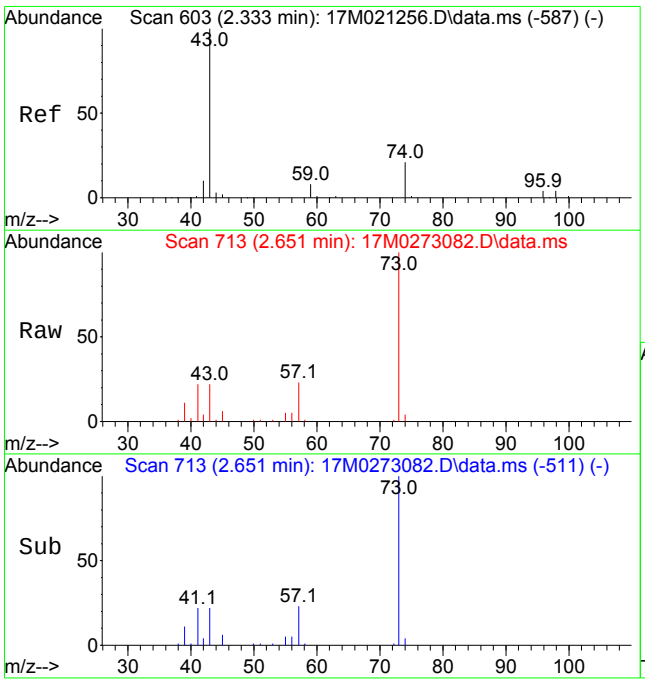


#16
Acetone
Concen: 8.1440 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 43 Resp: 6180

Ion	Ratio	Lower	Upper
43	100		
58	29.6	19.4	45.2

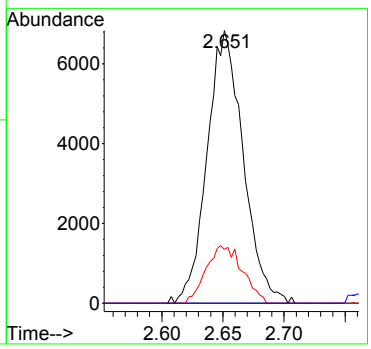


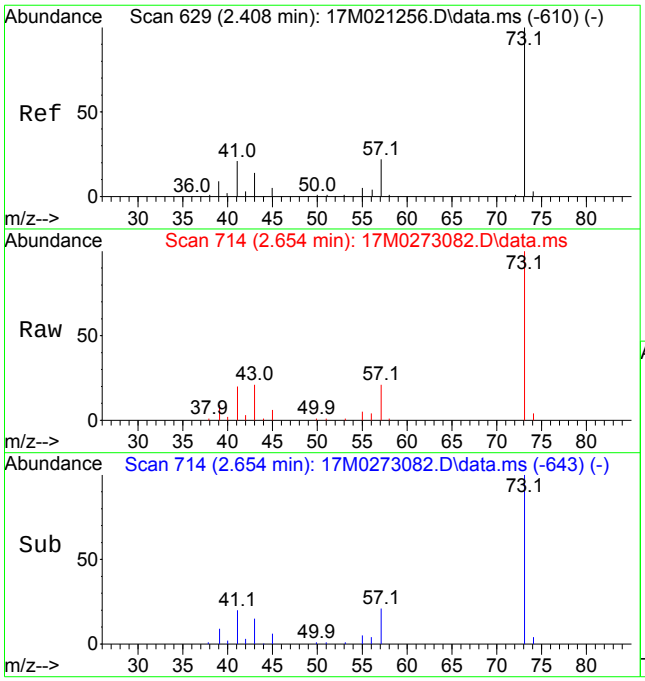


#18
Methyl acetate
Concen: 7.0634 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.084 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 43 Resp: 14052

Ion	Ratio	Lower	Upper
43	100		
74	21.2	25.4	25.4#
59	0.0	7.6	11.4#

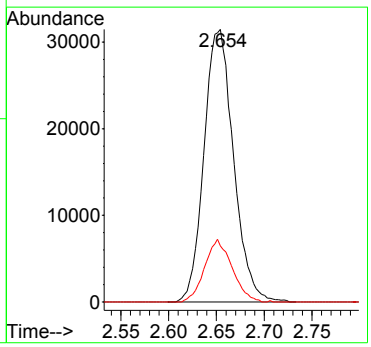


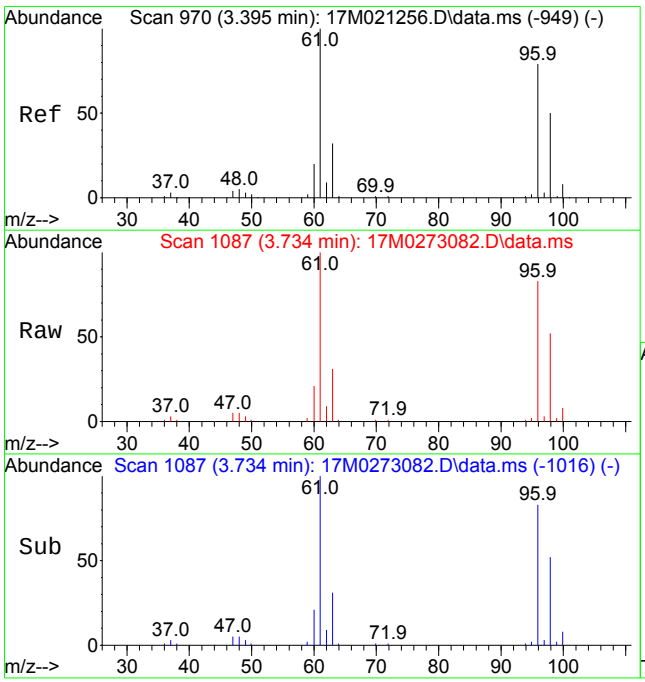


#19
Methyl Tert Butyl Ether
Concen: 6.7134 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 73 Resp: 67631

Ion	Ratio	Lower	Upper
73	100		
57	21.3	17.6	26.4

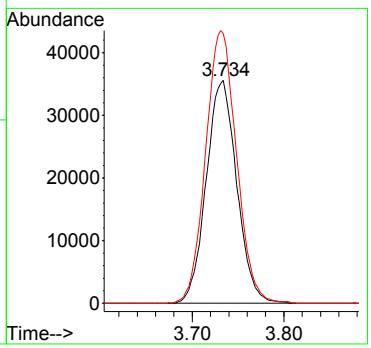


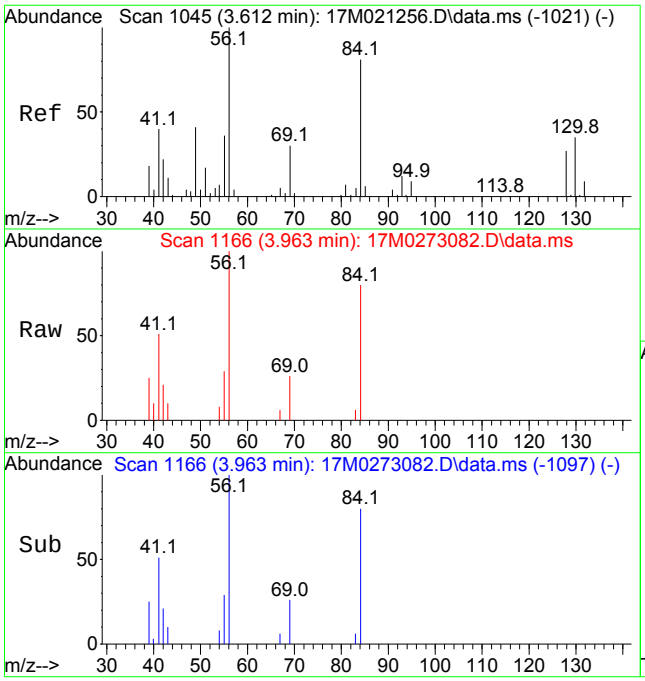


#23
cis-1,2-Dichloroethene
Concen: 18.3390 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 96 Resp: 82402

Ion	Ratio	Lower	Upper
96	100		
61	124.0	98.1	147.1

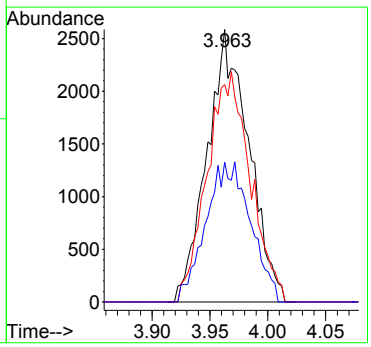


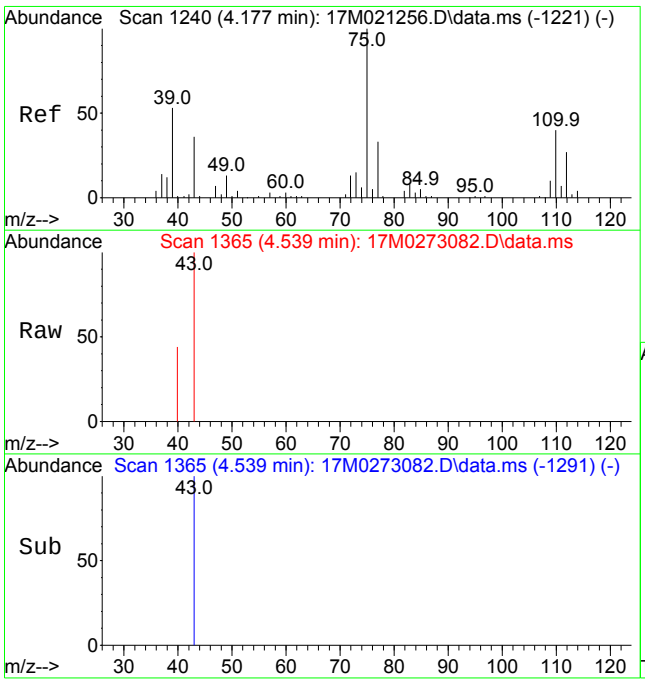


#25
Cyclohexane
Concen: 1.0669 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 56 Resp: 6470

Ion	Ratio	Lower	Upper
56	100		
84	87.5	69.4	104.0
41	54.8	72.2	108.2#

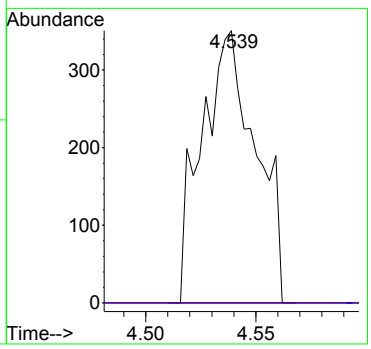


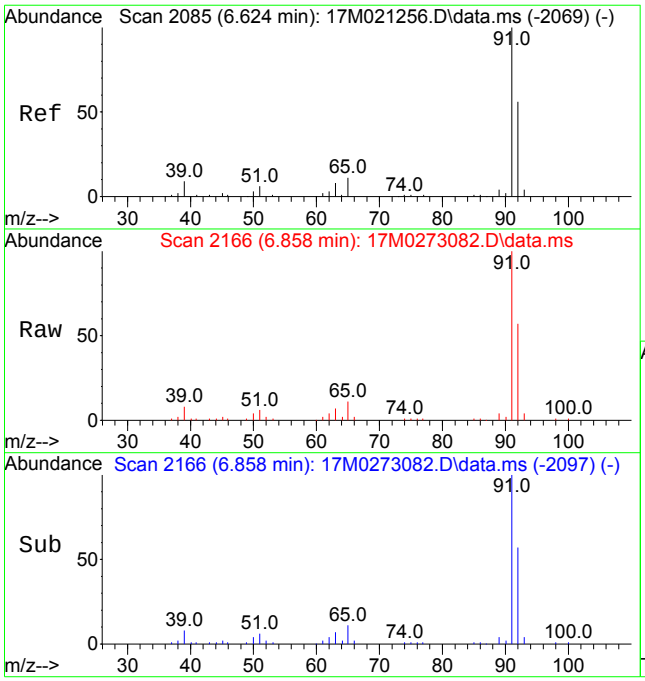


#32
2-Butanone
Concen: 0.5312 ug/L
RT: 4.539 min Scan# 1365
Delta R.T. 0.015 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 43 Resp: 601

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

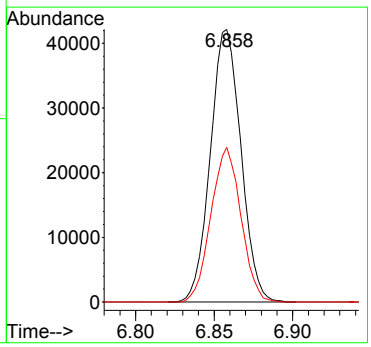


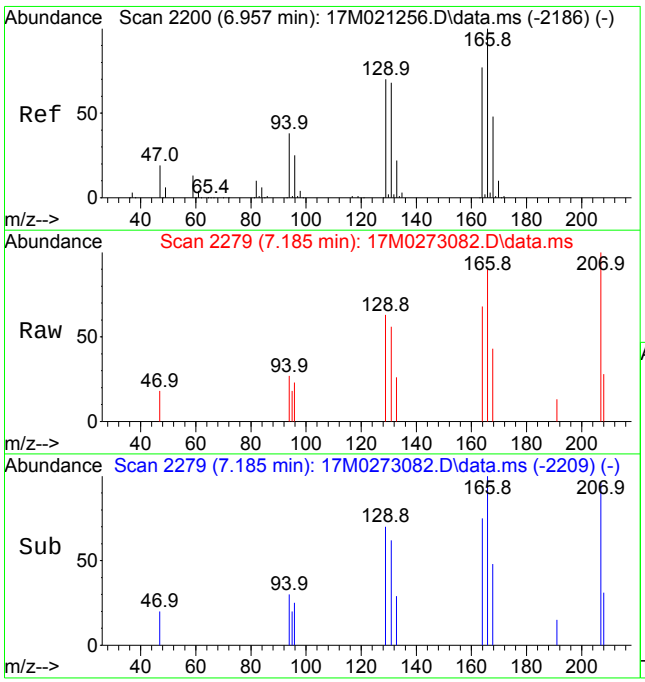


#48
Toluene
Concen: 3.2983 ug/L
RT: 6.858 min Scan# 2166
Delta R.T. 0.000 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 91 Resp: 57171

Ion	Ratio	Lower	Upper
91	100		
92	55.6	33.8	78.8

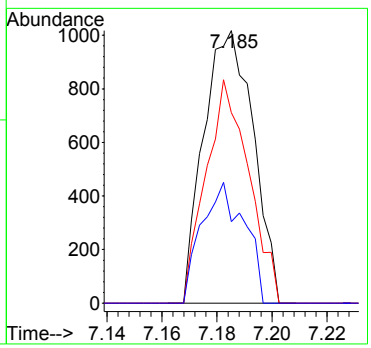




#49
Tetrachloroethene
Concen: 0.2569 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273082.D
Acq: 27 Apr 2017 17:55

Tgt Ion:166 Resp: 1270

Ion	Ratio	Lower	Upper
166	100		
129	71.0	56.2	84.4
94	38.1	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273083.D Vial: 19
Acq On : 27 Apr 2017 18:15 Operator: ADC
Sample : L17041110-03 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

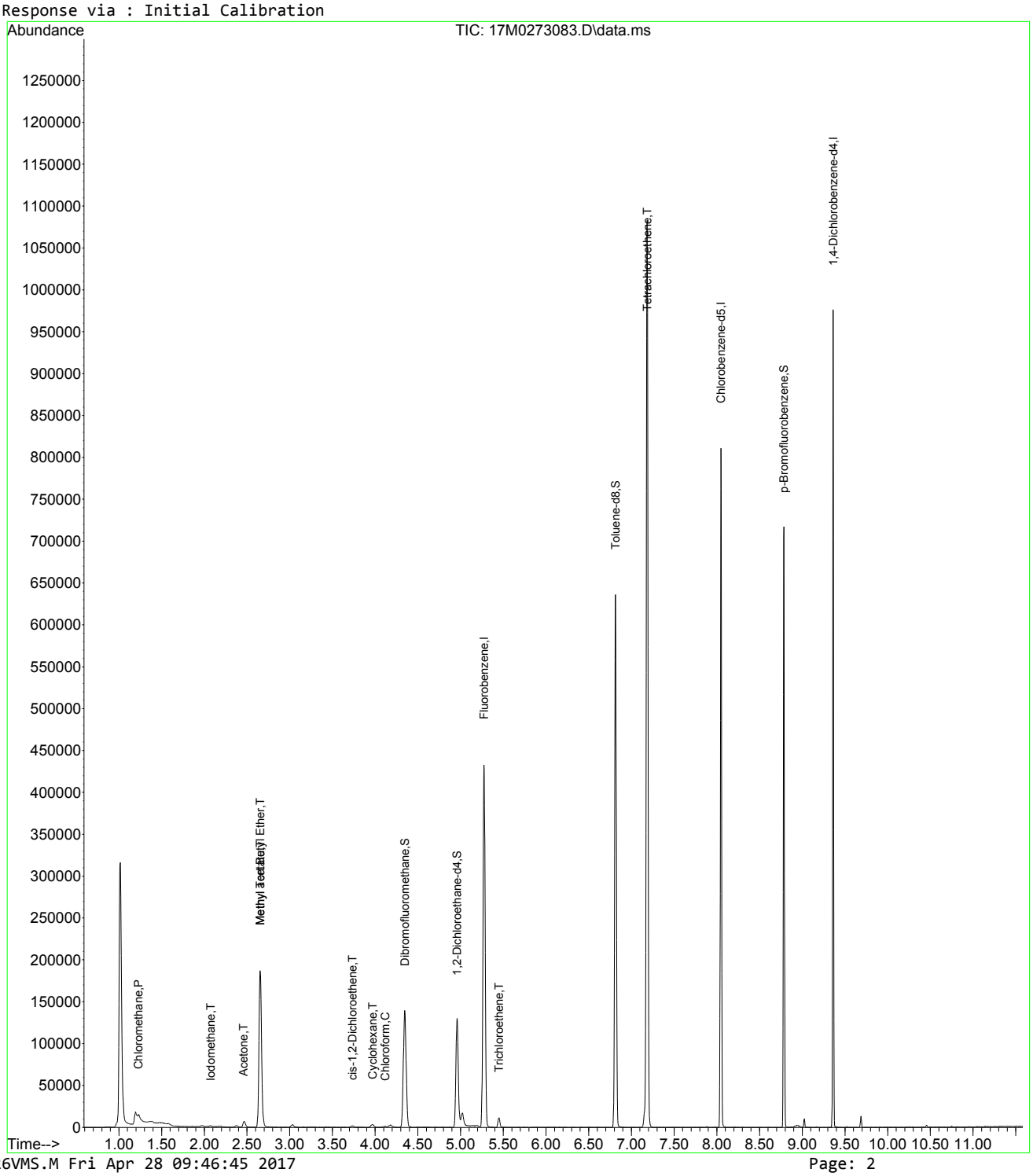
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	372946	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	274407	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	134600	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	99967	24.8196	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.278%			
34) 1,2-Dichloroethane-d4	4.956	65	95071	25.1825	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.730%			
47) Toluene-d8	6.815	98	345840	25.2536	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.014%			
66) p-Bromofluorobenzene	8.784	95	115888	25.7142	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.857%			
Target Compounds						Qvalue
3) Chloromethane	1.227	50	586	0.1352	ug/L #	42
13) Iodomethane	2.072	142	1310	2.2275	ug/L #	80
16) Acetone	2.460	43	7035	9.3817	ug/L	95
18) Methyl acetate	2.654	43	39083	19.8808	ug/L #	90
19) Methyl Tert Butyl Ether	2.654	73	193924	19.4803	ug/L	99
23) cis-1,2-Dichloroethene	3.734	96	1156	0.2604	ug/L	100
25) Cyclohexane	3.972	56	2283	0.3810	ug/L #	78
27) Chloroform	4.116	83	1445	0.1967	ug/L	91
37) Trichloroethene	5.448	130	3795	0.7953	ug/L	99
49) Tetrachloroethene	7.185	166	261183	53.2269	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

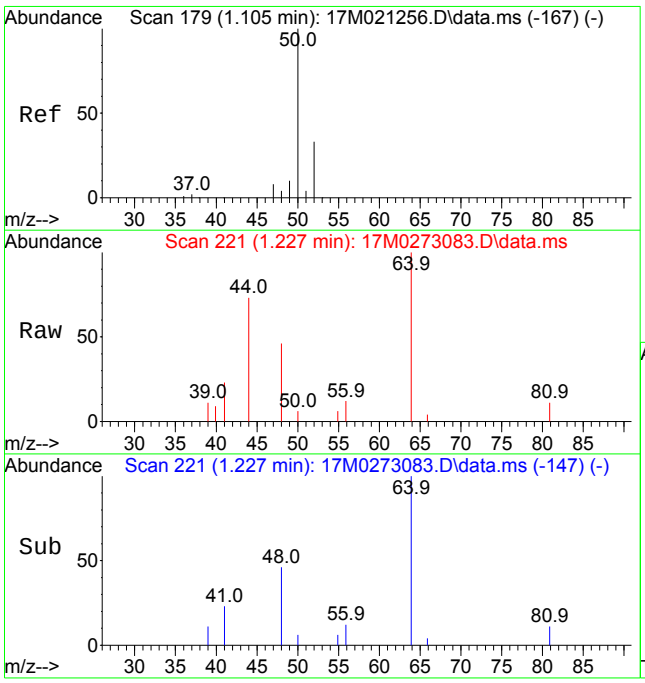
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273083.D Vial: 19
Acq On : 27 Apr 2017 18:15 Operator: ADC
Sample : L17041110-03 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



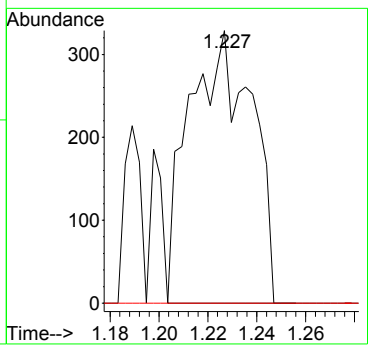
826VMS.M Fri Apr 28 09:46:45 2017 Page: 2

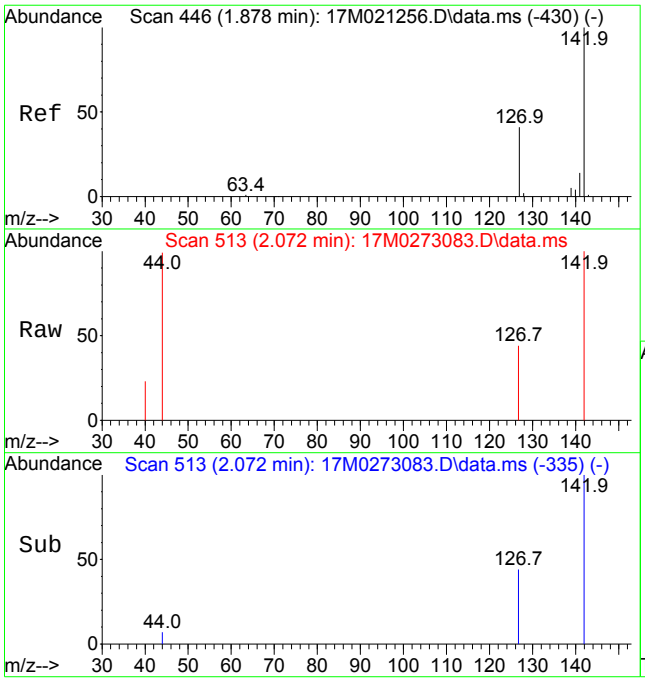


#3
Chloromethane
Concen: 0.1352 ug/L
RT: 1.227 min Scan# 221
Delta R.T. 0.015 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 50 Resp: 586

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.9	46.3#

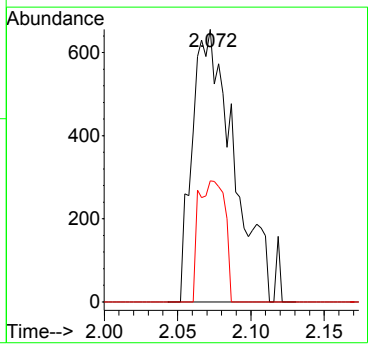


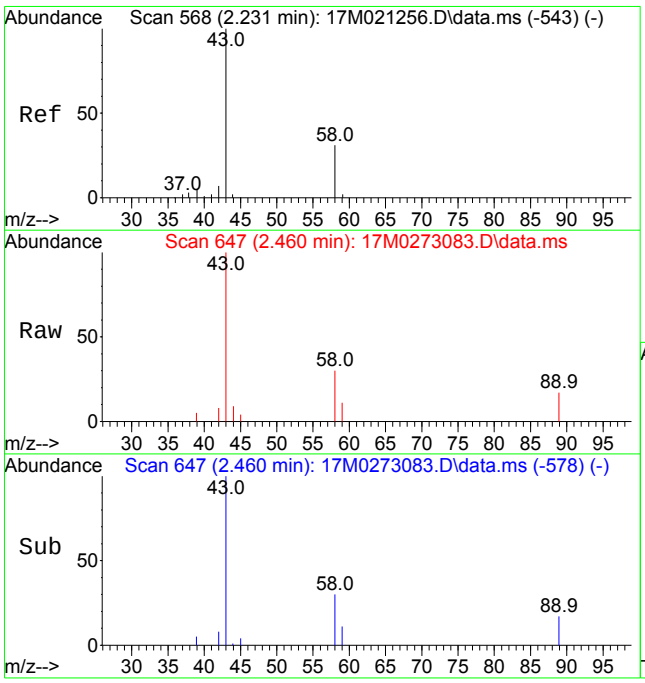


#13
Iodomethane
Concen: 2.2275 ug/L
RT: 2.072 min Scan# 513
Delta R.T. 0.014 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion:142 Resp: 1310

Ion	Ratio	Lower	Upper
142	100		
127	27.8	32.2	48.2#

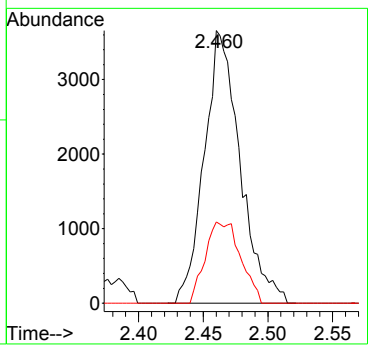


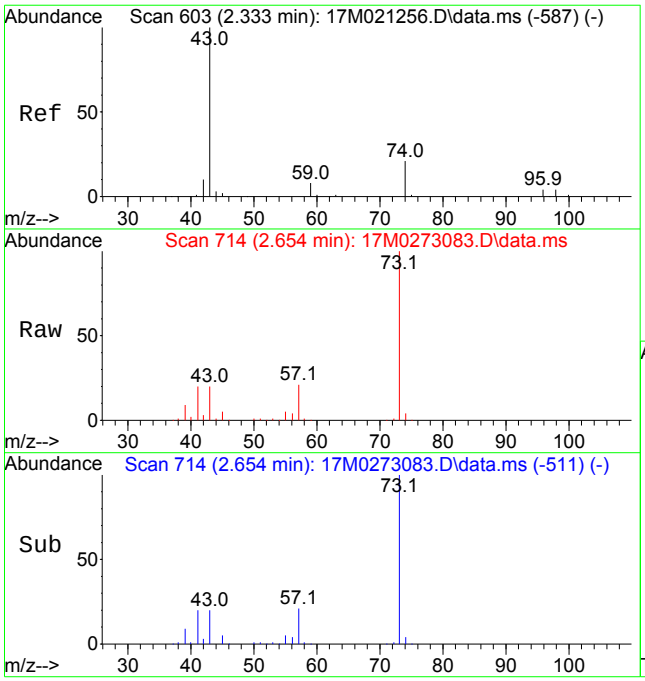


#16
Acetone
Concen: 9.3817 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 43 Resp: 7035

Ion	Ratio	Lower	Upper
43	100		
58	29.3	19.4	45.2

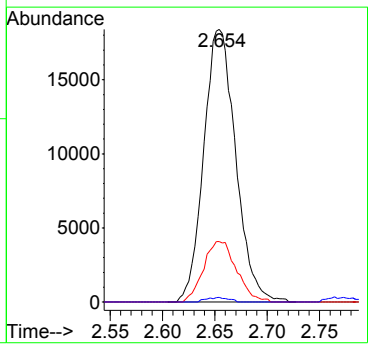


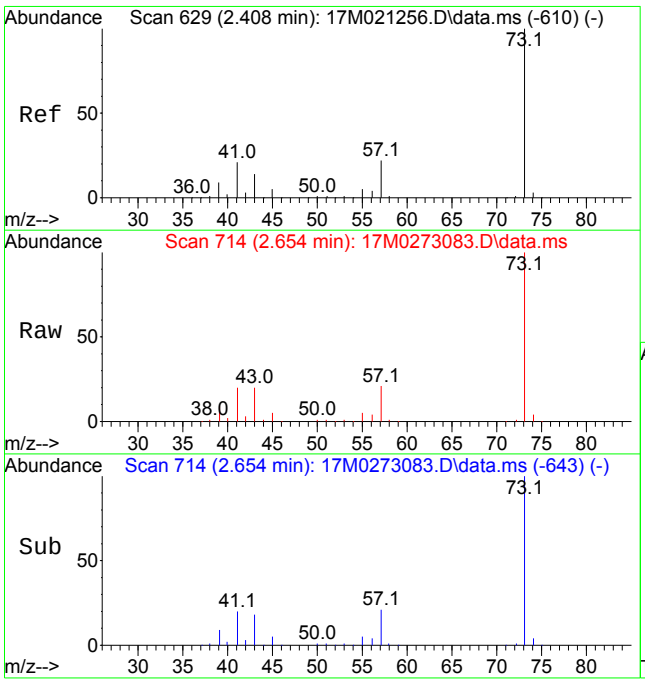


#18
Methyl acetate
Concen: 19.8808 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 43 Resp: 39083

Ion	Ratio	Lower	Upper
43	100		
74	22.9	25.4	25.4#
59	1.2	7.6	11.4#

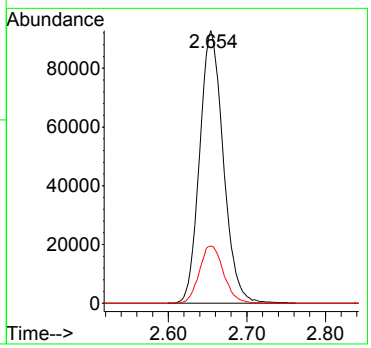


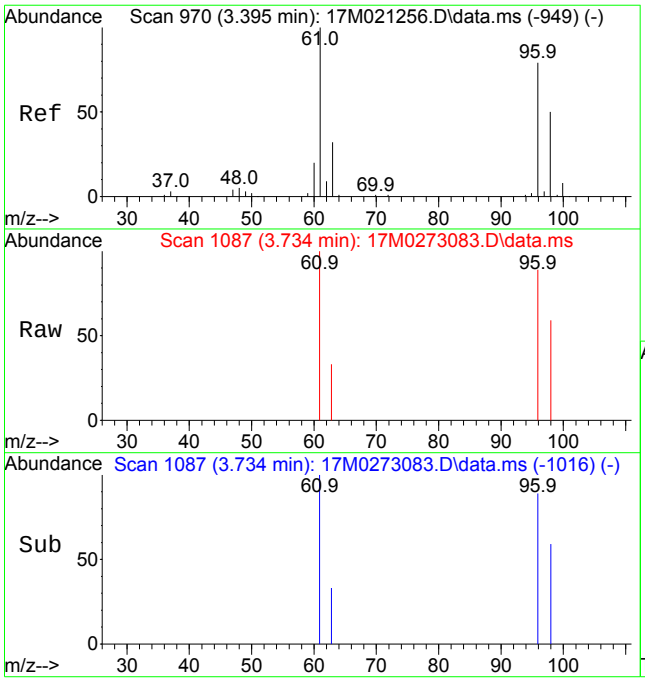


#19
Methyl Tert Butyl Ether
Concen: 19.4803 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 73 Resp: 193924

Ion	Ratio	Lower	Upper
73	100		
57	21.6	17.6	26.4

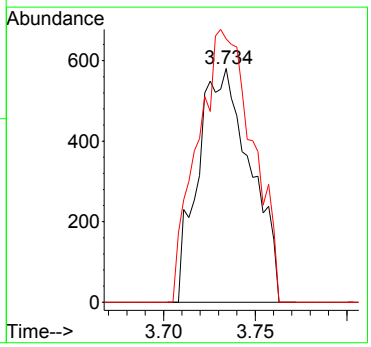


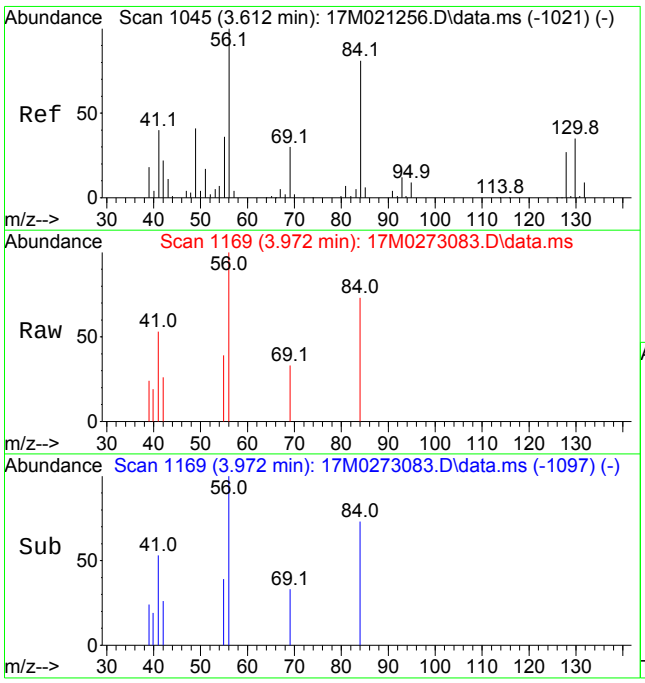


#23
cis-1,2-Dichloroethene
Concen: 0.2604 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 96 Resp: 1156

Ion	Ratio	Lower	Upper
96	100		
61	123.0	98.1	147.1

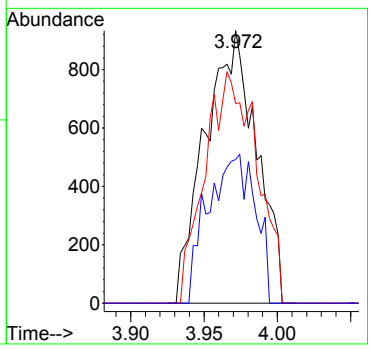


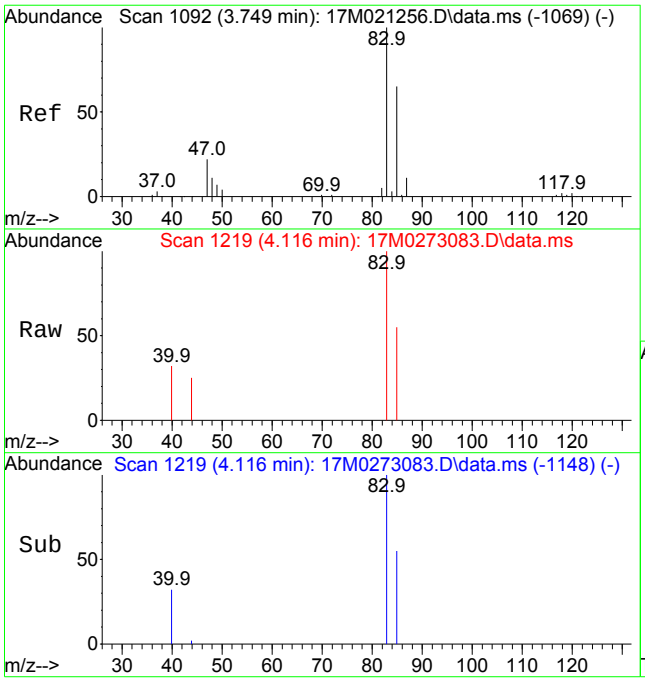


#25
Cyclohexane
Concen: 0.3810 ug/L
RT: 3.972 min Scan# 1169
Delta R.T. 0.009 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 56 Resp: 2283

Ion	Ratio	Lower	Upper
56	100		
84	85.9	69.4	104.0
41	50.1	72.2	108.2#

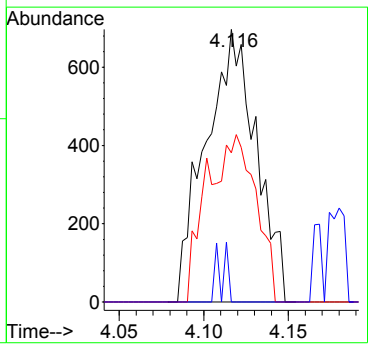


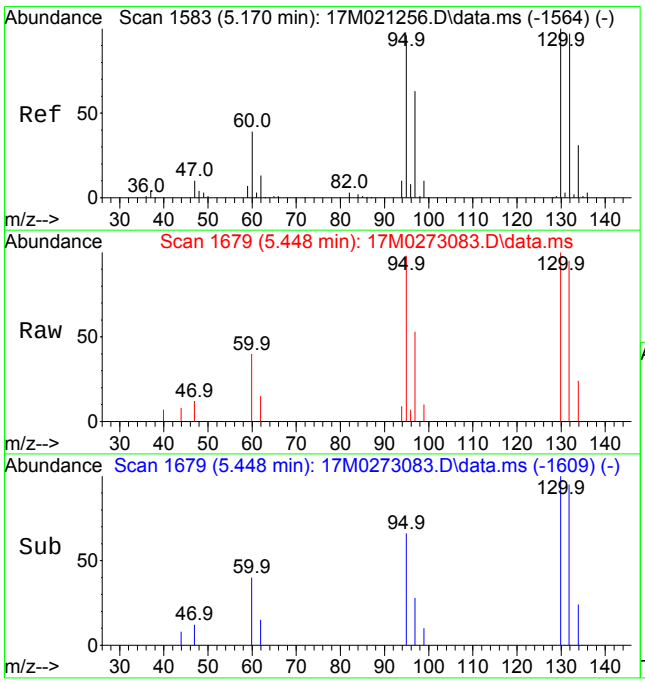


#27
Chloroform
Concen: 0.1967 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion: 83 Resp: 1445

Ion	Ratio	Lower	Upper
83	100		
85	59.5	39.2	91.4
47	15.6	12.9	30.1

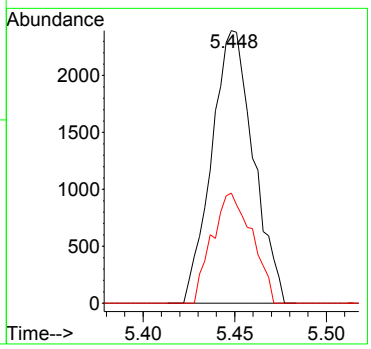


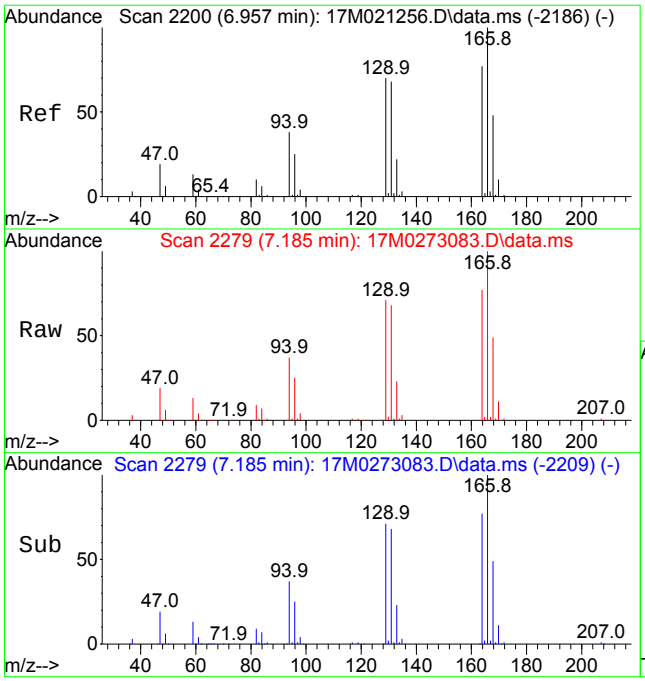


#37
Trichloroethene
Concen: 0.7953 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion:130 Resp: 3795

Ion	Ratio	Lower	Upper
130	100		
60	38.7	22.9	53.3

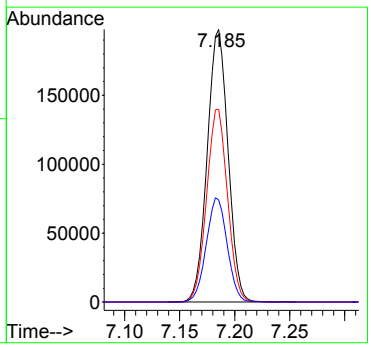




#49
Tetrachloroethene
Concen: 53.2269 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273083.D
Acq: 27 Apr 2017 18:15

Tgt Ion:166 Resp: 261183

Ion	Ratio	Lower	Upper
166	100		
129	70.9	56.2	84.4
94	38.3	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273084.D Vial: 20
Acq On : 27 Apr 2017 18:35 Operator: ADC
Sample : L17041110-04 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:48 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

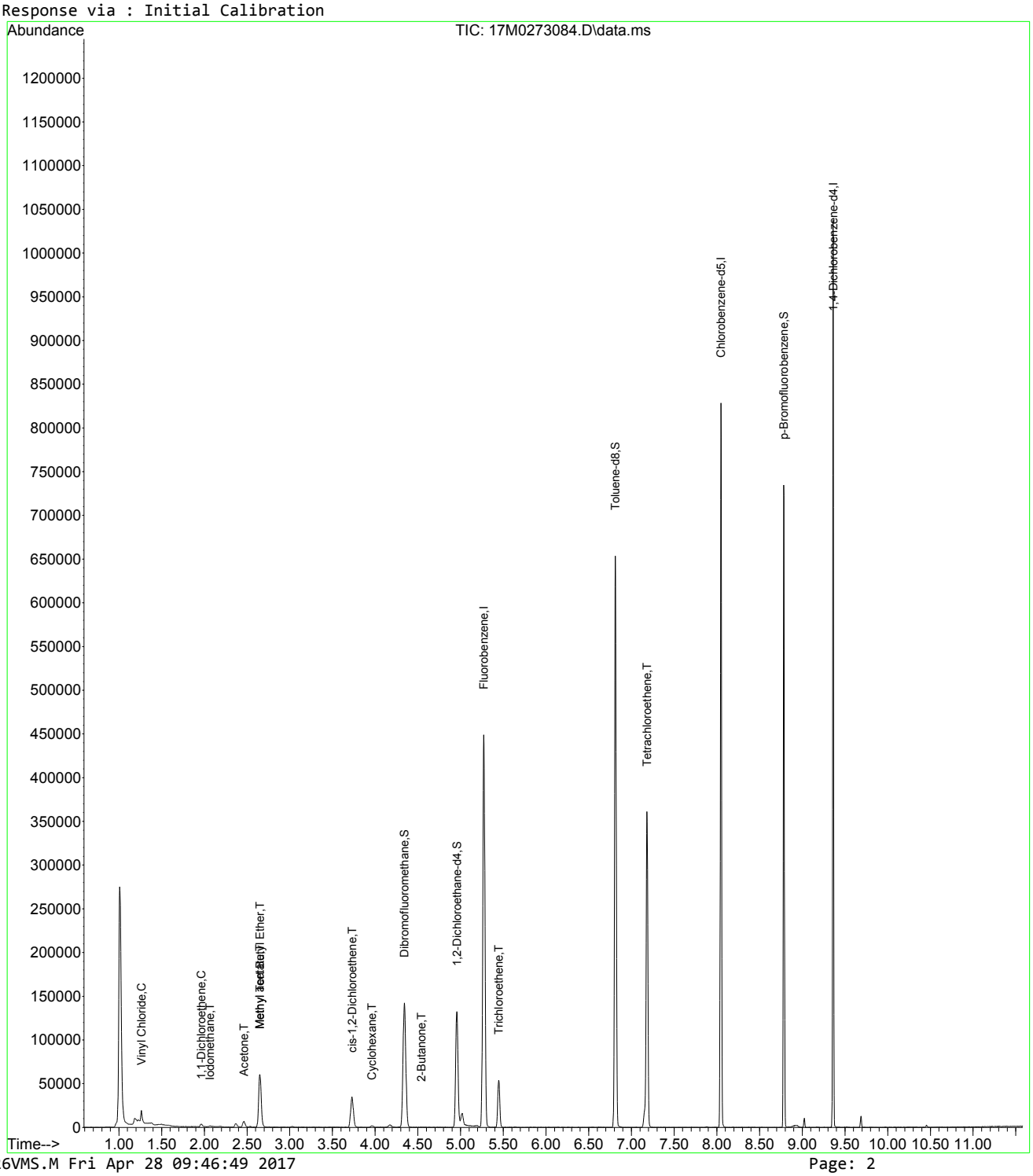
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	387503	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	286335	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	141405	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	102081	24.3924	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.570%			
34) 1,2-Dichloroethane-d4	4.956	65	96879	24.6974	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.790%			
47) Toluene-d8	6.812	98	355717	24.8928	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.571%			
66) p-Bromofluorobenzene	8.783	95	117158	24.7449	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.980%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.264	62	10105	2.0262	ug/L #	49
10) 1,1-Dichloroethene	1.965	61	928	0.1550	ug/L	95
13) Iodomethane	2.066	142	1103	2.1846	ug/L #	75
16) Acetone	2.463	43	5770	7.4057	ug/L	97
18) Methyl acetate	2.648	43	12986	6.3576	ug/L #	87
19) Methyl Tert Butyl Ether	2.651	73	63514	6.1405	ug/L	99
23) cis-1,2-Dichloroethene	3.731	96	19722	4.2749	ug/L	100
25) Cyclohexane	3.963	56	1271	0.2041	ug/L #	75
32) 2-Butanone	4.539	43	159	0.1369	ug/L #	37
37) Trichloroethene	5.445	130	17899	3.6103	ug/L	100
49) Tetrachloroethene	7.182	166	86774	16.9471	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

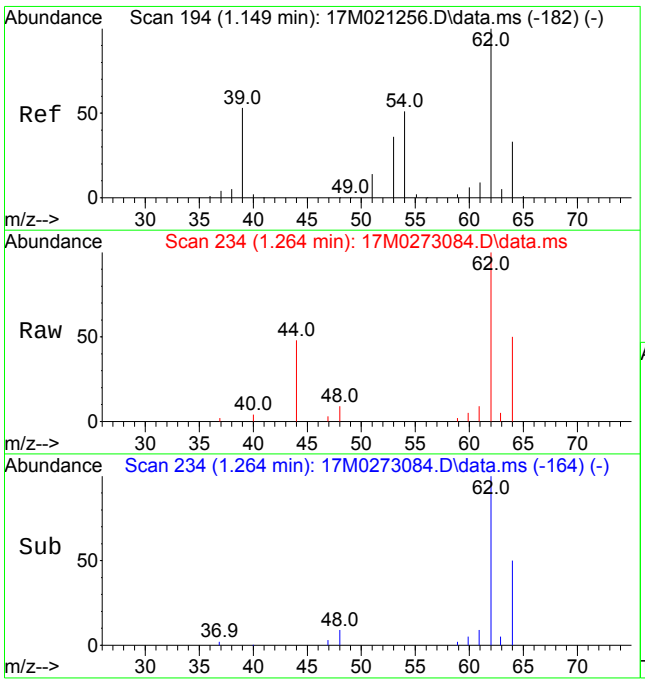
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273084.D Vial: 20
Acq On : 27 Apr 2017 18:35 Operator: ADC
Sample : L17041110-04 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:48 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



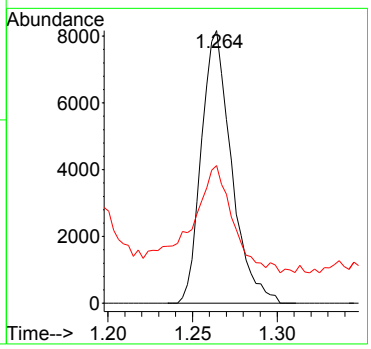
826VMS.M Fri Apr 28 09:46:49 2017 Page: 2

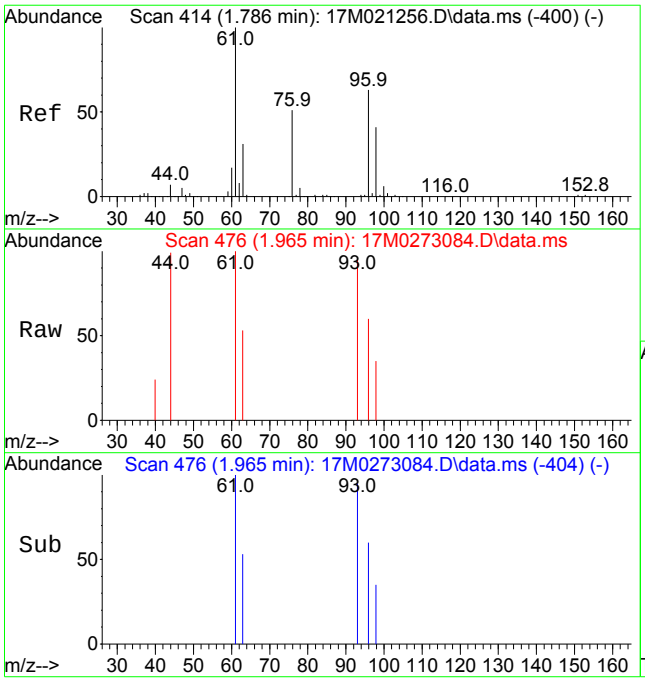


#4
Vinyl Chloride
Concen: 2.0262 ug/L
RT: 1.264 min Scan# 234
Delta R.T. 0.003 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 62 Resp: 10105

Ion	Ratio	Lower	Upper
62	100		
64	60.2	19.2	44.8#

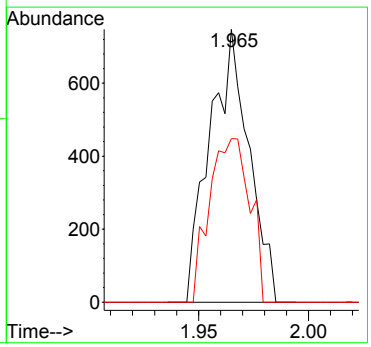


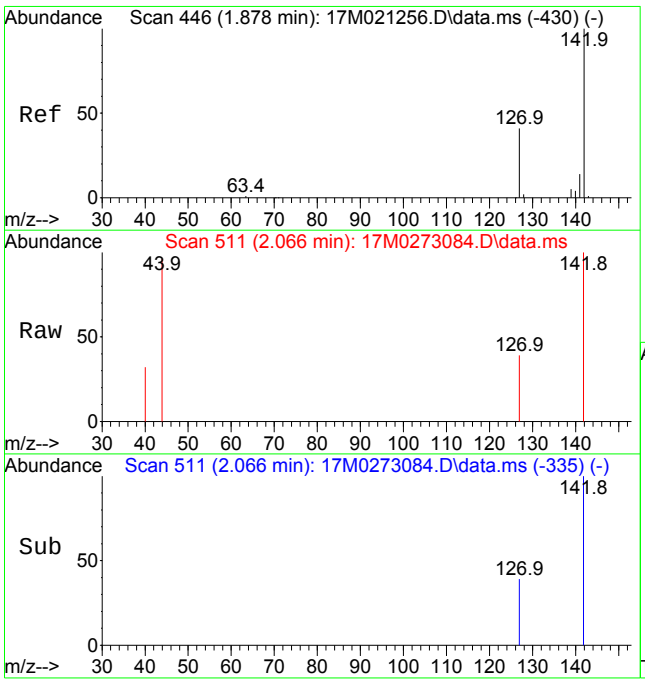


#10
1,1-Dichloroethene
Concen: 0.1550 ug/L
RT: 1.965 min Scan# 476
Delta R.T. 0.009 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 61 Resp: 928

Ion	Ratio	Lower	Upper
61	100		
96	62.1	52.9	79.3

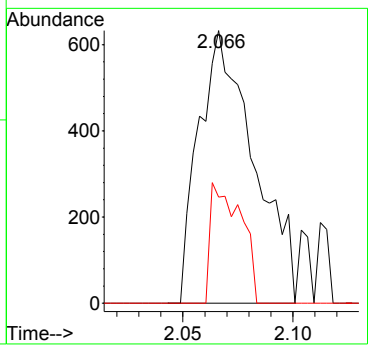


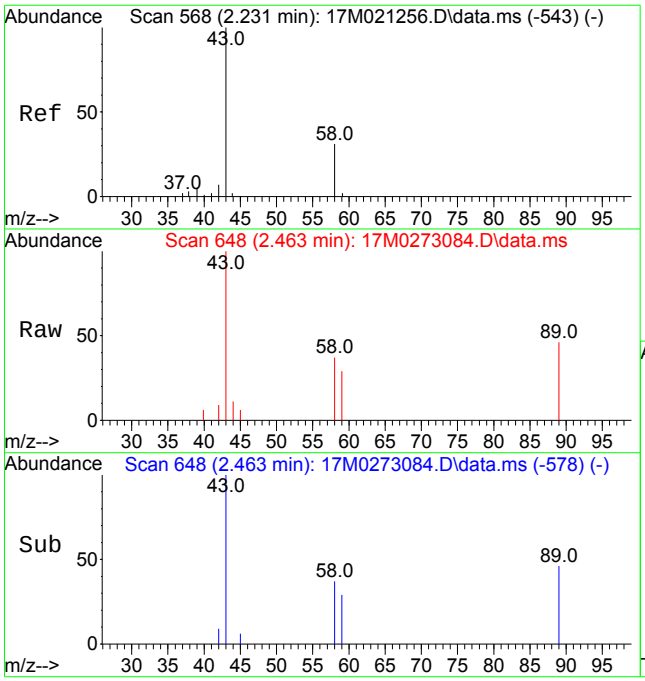


#13
Iodomethane
Concen: 2.1846 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion:142 Resp: 1103

Ion	Ratio	Lower	Upper
142	100		
127	24.5	32.2	48.2#

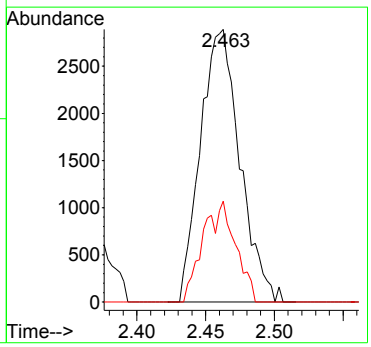


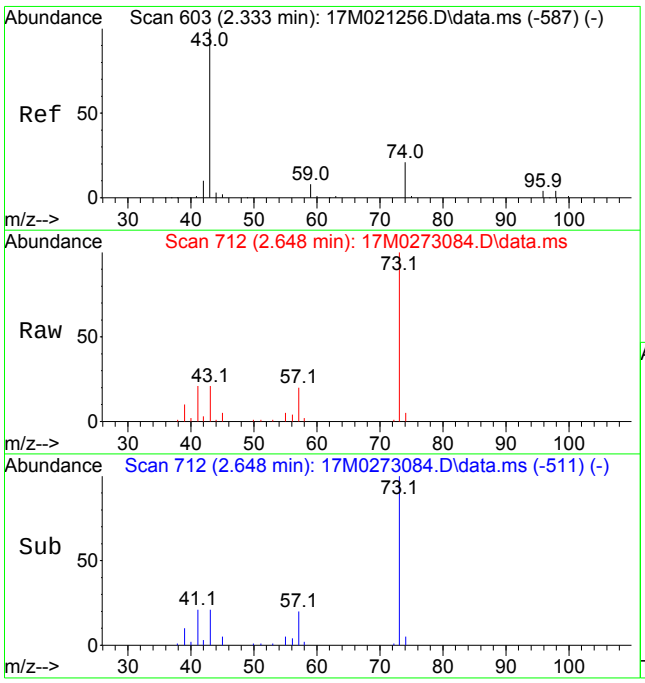


#16
Acetone
Concen: 7.4057 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 43 Resp: 5770

Ion	Ratio	Lower	Upper
43	100		
58	30.7	19.4	45.2

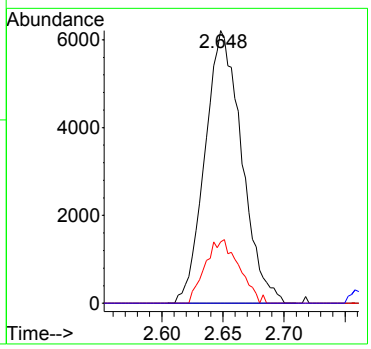


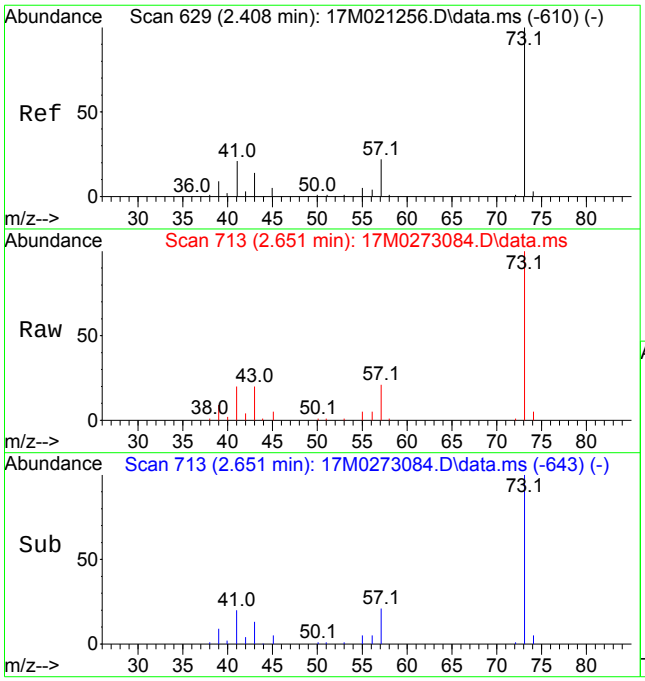


#18
Methyl acetate
Concen: 6.3576 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.081 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 43 Resp: 12986

Ion	Ratio	Lower	Upper
43	100		
74	21.6	25.4	25.4#
59	0.0	7.6	11.4#

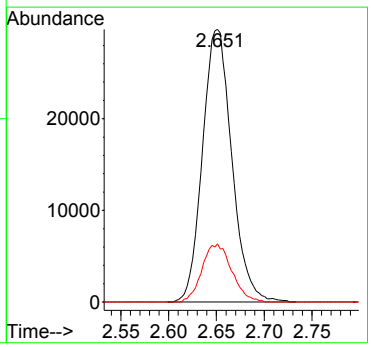


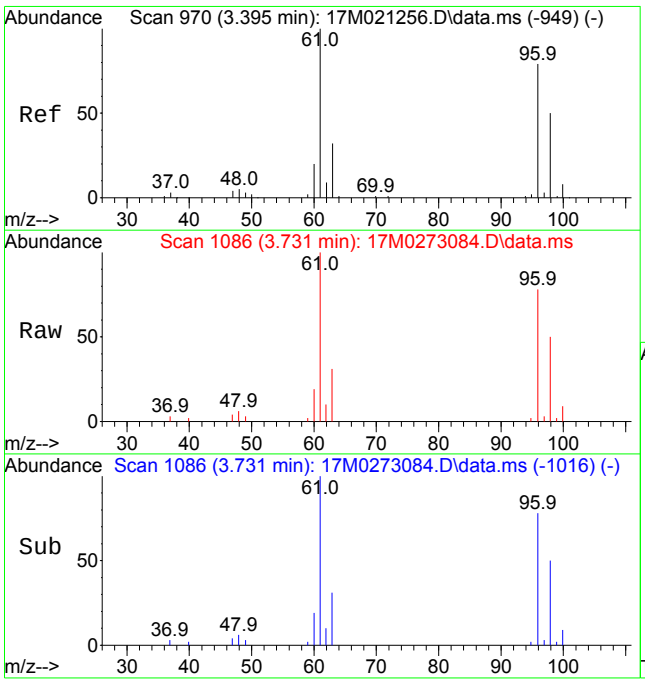


#19
Methyl Tert Butyl Ether
Concen: 6.1405 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.003 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 73 Resp: 63514

Ion	Ratio	Lower	Upper
73	100		
57	21.5	17.6	26.4

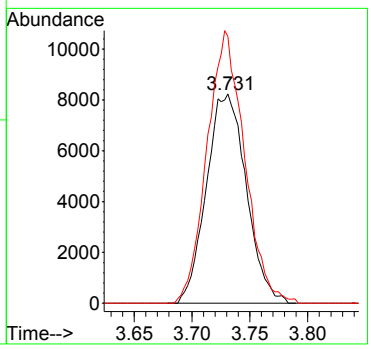


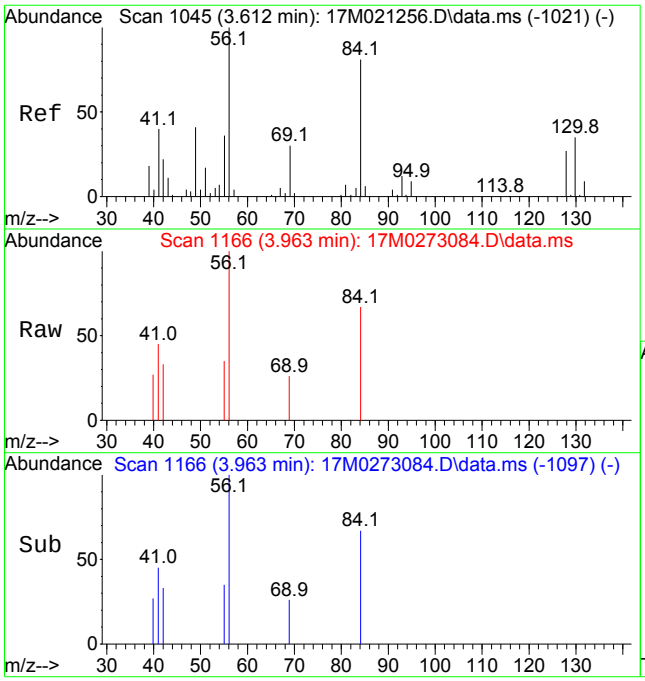


#23
cis-1,2-Dichloroethene
Concen: 4.2749 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 96 Resp: 19722

Ion	Ratio	Lower	Upper
96	100		
61	122.5	98.1	147.1

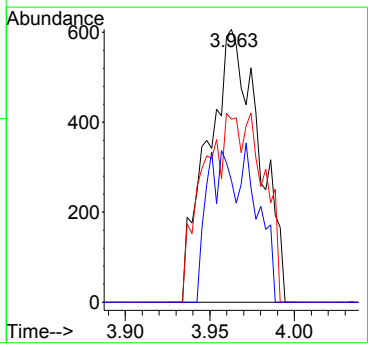


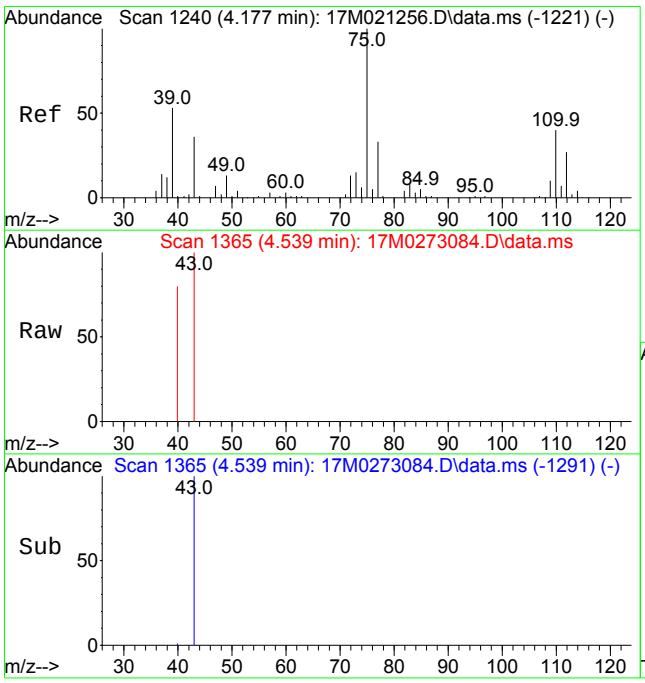


#25
Cyclohexane
Concen: 0.2041 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 56 Resp: 1271

Ion	Ratio	Lower	Upper
56	100		
84	80.5	69.4	104.0
41	50.8	72.2	108.2#

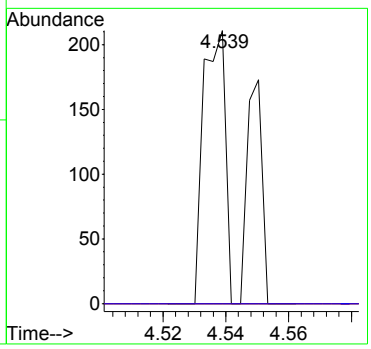


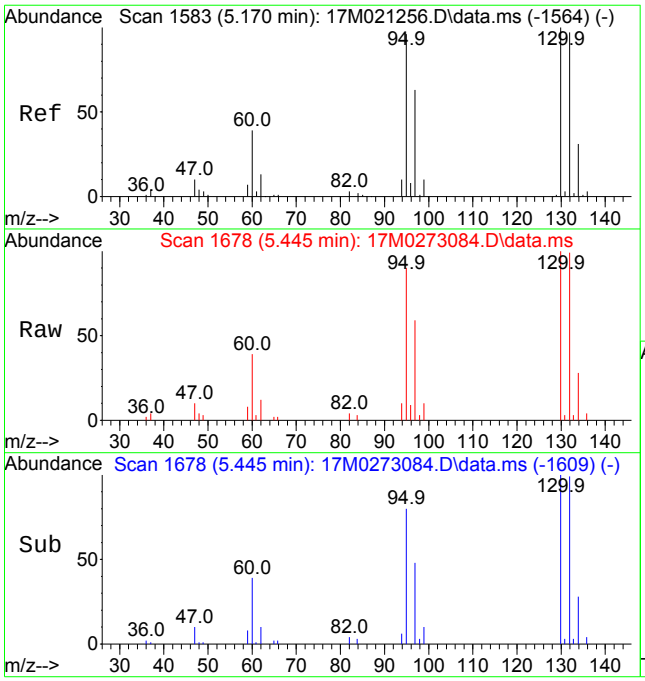


#32
2-Butanone
Concen: 0.1369 ug/L
RT: 4.539 min Scan# 1365
Delta R.T. 0.015 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion: 43 Resp: 159

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

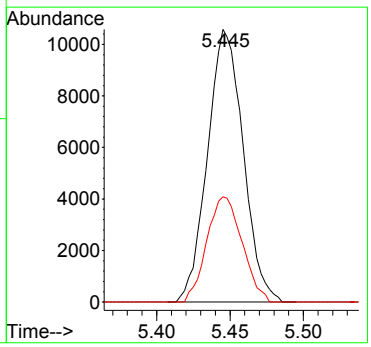


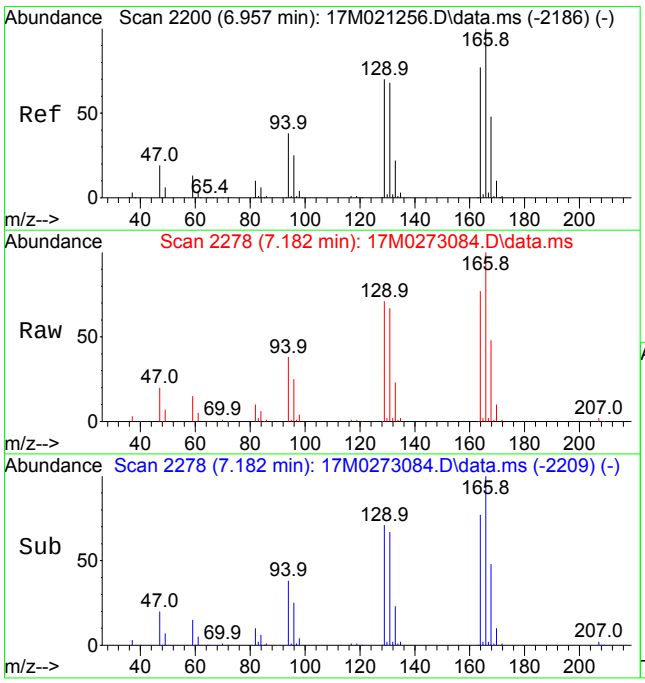


#37
Trichloroethene
Concen: 3.6103 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion:130 Resp: 17899

Ion	Ratio	Lower	Upper
130	100		
60	38.1	22.9	53.3

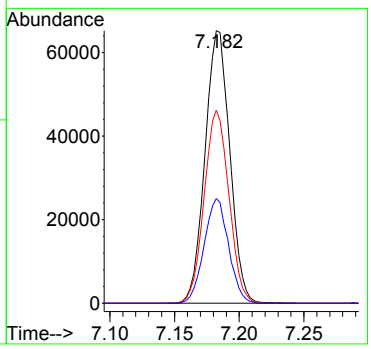




#49
Tetrachloroethene
Concen: 16.9471 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273084.D
Acq: 27 Apr 2017 18:35

Tgt Ion:166 Resp: 86774

Ion	Ratio	Lower	Upper
166	100		
129	70.6	56.2	84.4
94	37.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273085.D Vial: 21
Acq On : 27 Apr 2017 18:55 Operator: ADC
Sample : L17041110-05 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

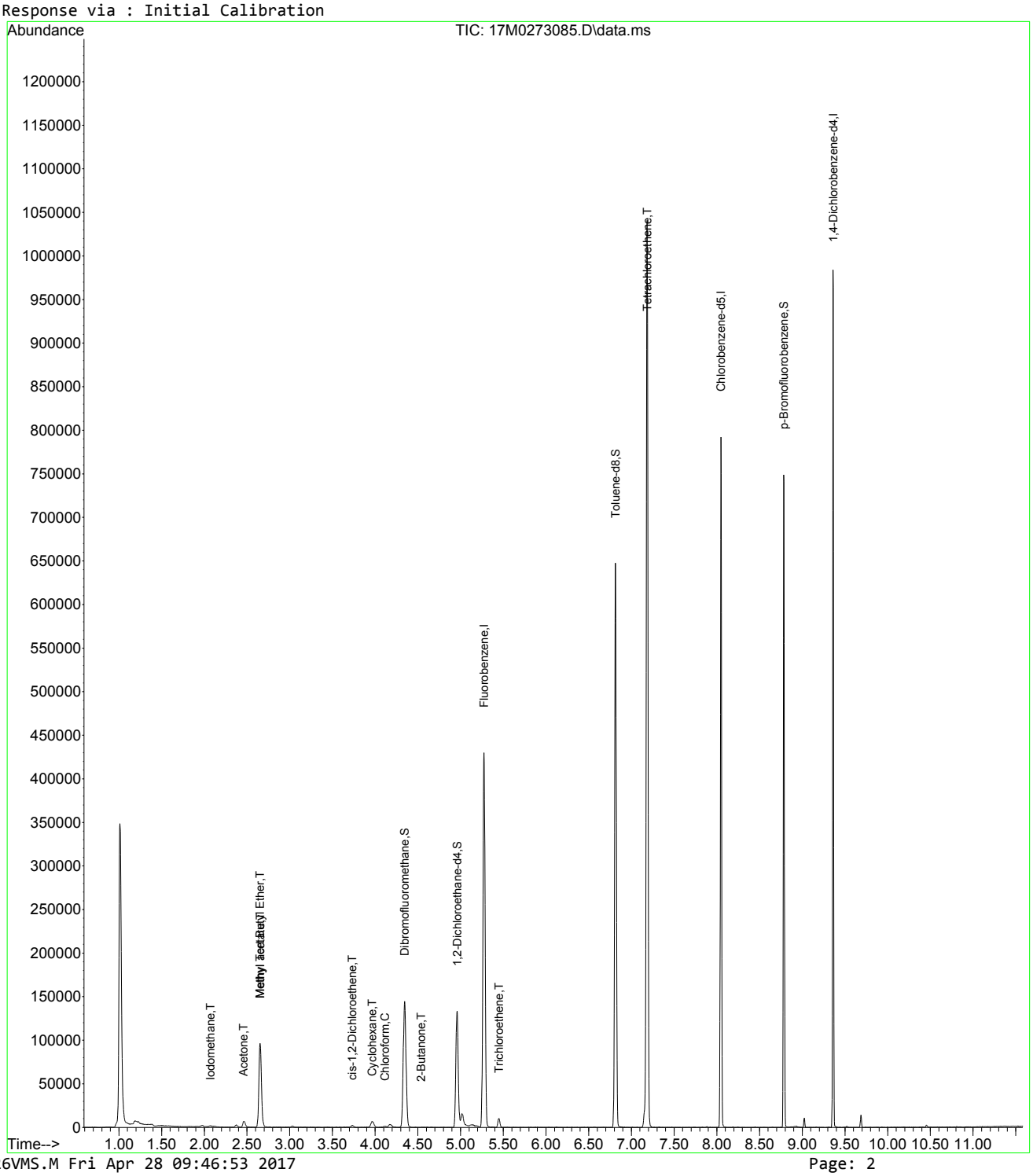
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	369676	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	271091	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	132283	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	102760	25.7388 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.955%		
34) 1,2-Dichloroethane-d4	4.959	65	98026	26.1949 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.780%		
47) Toluene-d8	6.815	98	357898	26.4538 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.815%		
66) p-Bromofluorobenzene	8.784	95	121266	27.3788 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.515%		
Target Compounds					Qvalue
13) Iodomethane	2.069	142	1017	2.1785 ug/L #	82
16) Acetone	2.457	43	6766	9.1028 ug/L	97
18) Methyl acetate	2.654	43	20098	10.3139 ug/L #	87
19) Methyl Tert Butyl Ether	2.651	73	99321	10.0654 ug/L	100
23) cis-1,2-Dichloroethene	3.731	96	1248	0.2836 ug/L	97
25) Cyclohexane	3.966	56	4475	0.7534 ug/L #	80
27) Chloroform	4.113	83	1355	0.1861 ug/L #	95
32) 2-Butanone	4.536	43	152	0.1372 ug/L #	37
37) Trichloroethene	5.448	130	3533	0.7470 ug/L	99
49) Tetrachloroethene	7.185	166	250776	51.7312 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

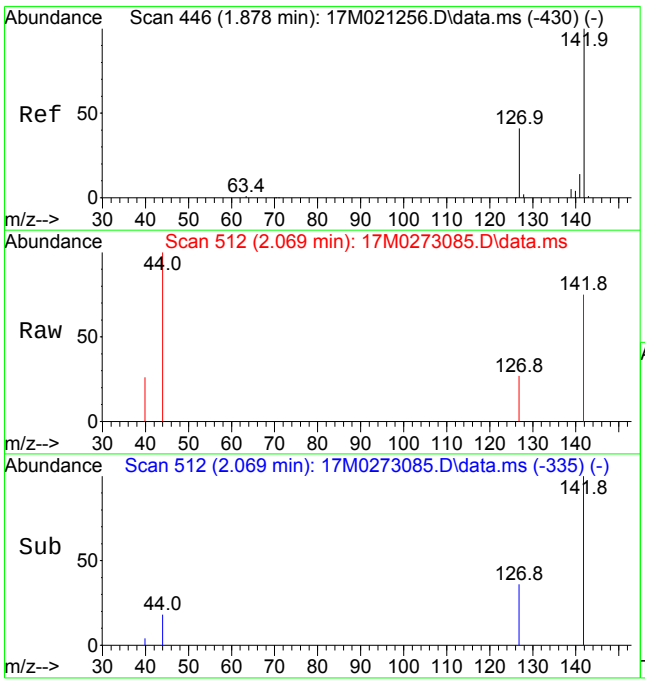
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273085.D Vial: 21
Acq On : 27 Apr 2017 18:55 Operator: ADC
Sample : L17041110-05 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



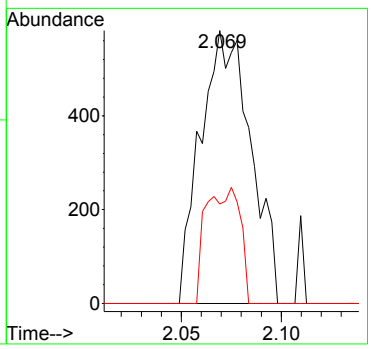
826VMS.M Fri Apr 28 09:46:53 2017 Page: 2

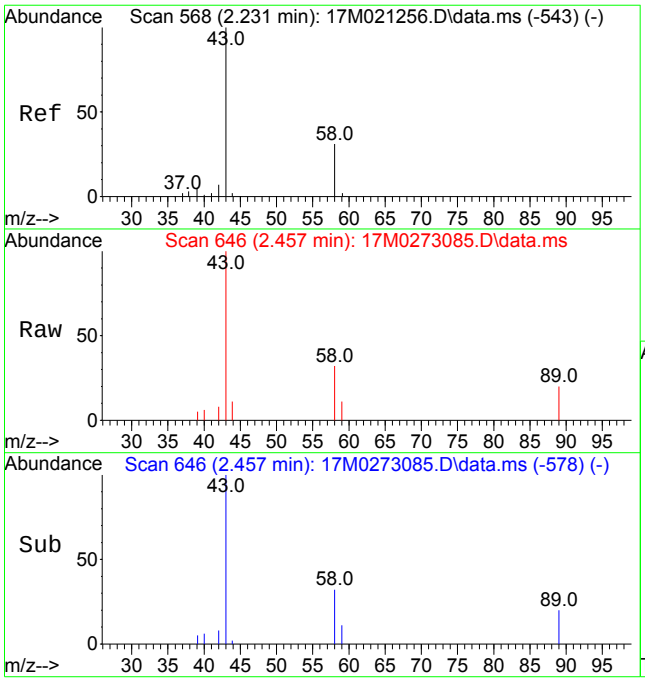


#13
Iodomethane
Concen: 2.1785 ug/L
RT: 2.069 min Scan# 512
Delta R.T. 0.011 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion:142 Resp: 1017

Ion	Ratio	Lower	Upper
142	100		
127	29.0	32.2	48.2#

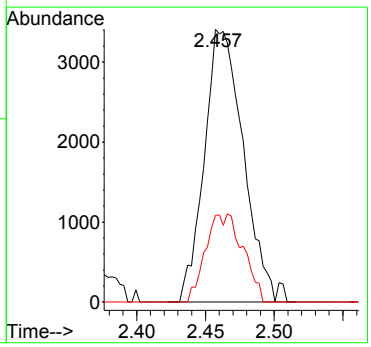


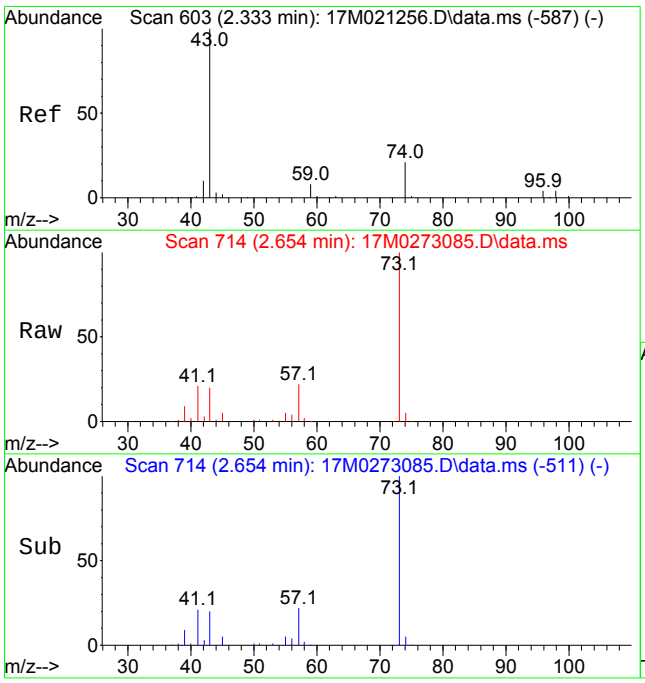


#16
Acetone
Concen: 9.1028 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 43 Resp: 6766

Ion	Ratio	Lower	Upper
43	100		
58	30.7	19.4	45.2

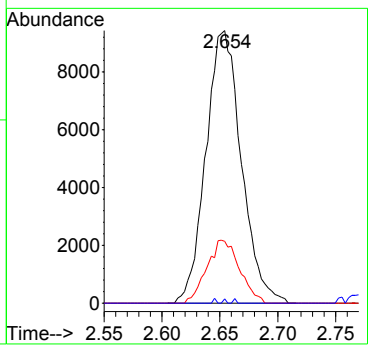


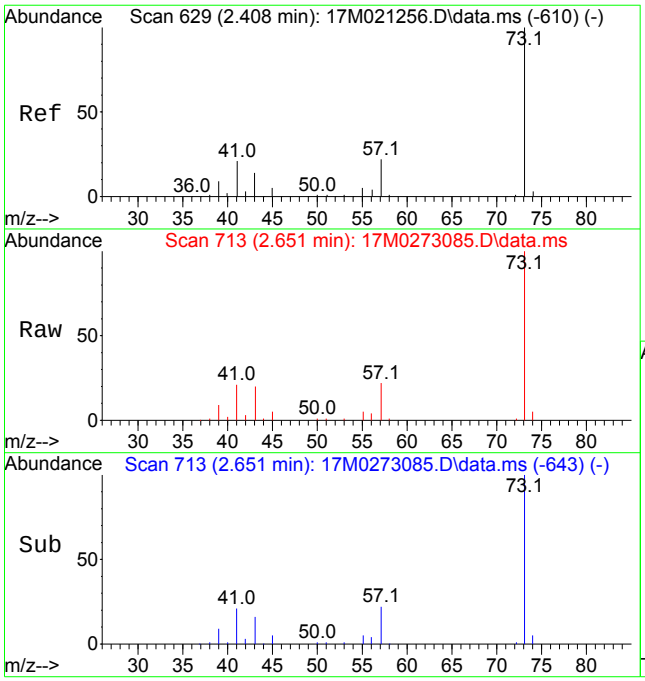


#18
Methyl acetate
Concen: 10.3139 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 43 Resp: 20098

Ion	Ratio	Lower	Upper
43	100		
74	21.3	25.4	25.4#
59	0.0	7.6	11.4#

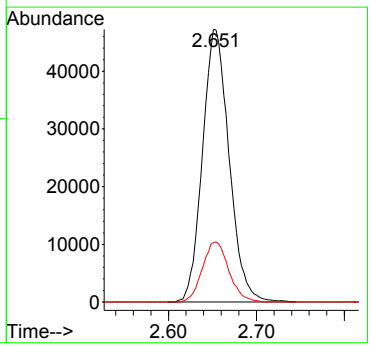


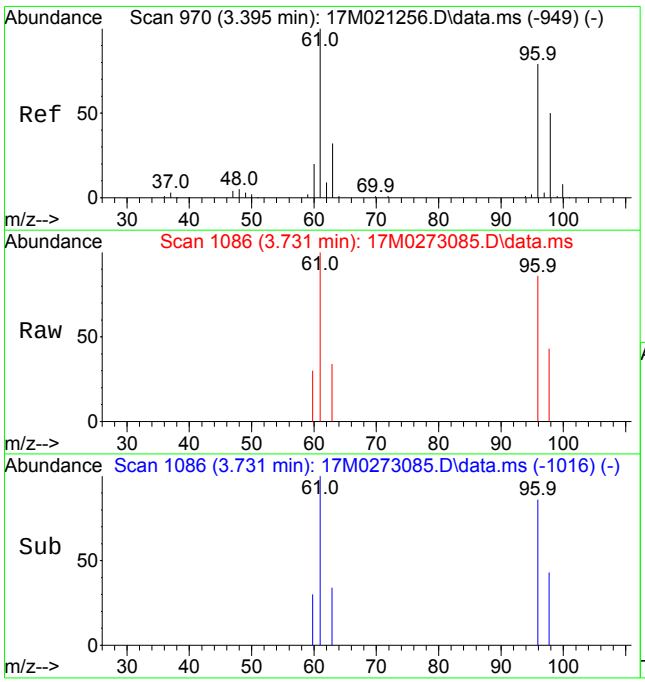


#19
Methyl Tert Butyl Ether
Concen: 10.0654 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 73 Resp: 99321

Ion	Ratio	Lower	Upper
73	100		
57	21.9	17.6	26.4

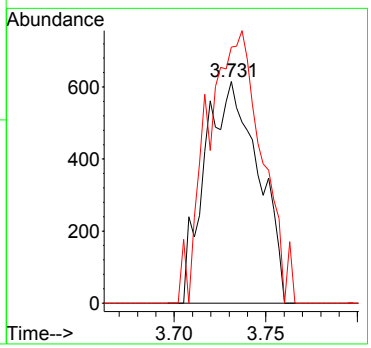


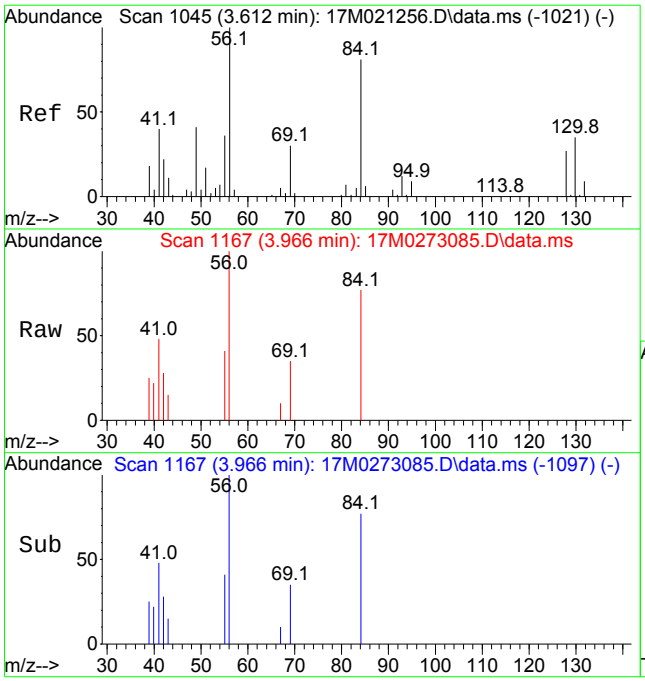


#23
cis-1,2-Dichloroethene
Concen: 0.2836 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 96 Resp: 1248

Ion	Ratio	Lower	Upper
96	100		
61	125.5	98.1	147.1

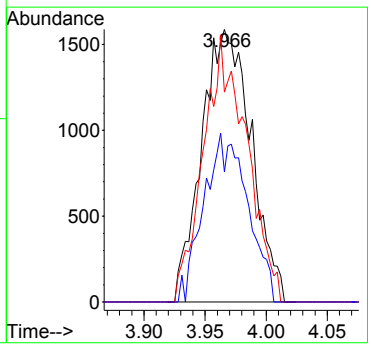


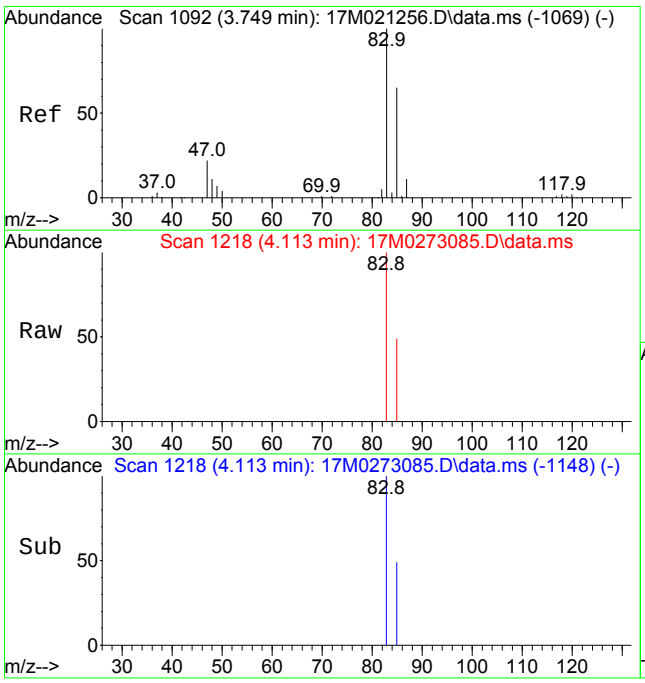


#25
Cyclohexane
Concen: 0.7534 ug/L
RT: 3.966 min Scan# 1167
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 56 Resp: 4475

Ion	Ratio	Lower	Upper
56	100		
84	85.1	69.4	104.0
41	54.5	72.2	108.2#

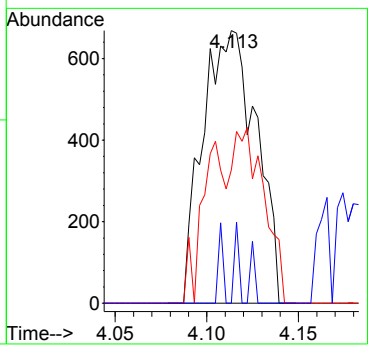


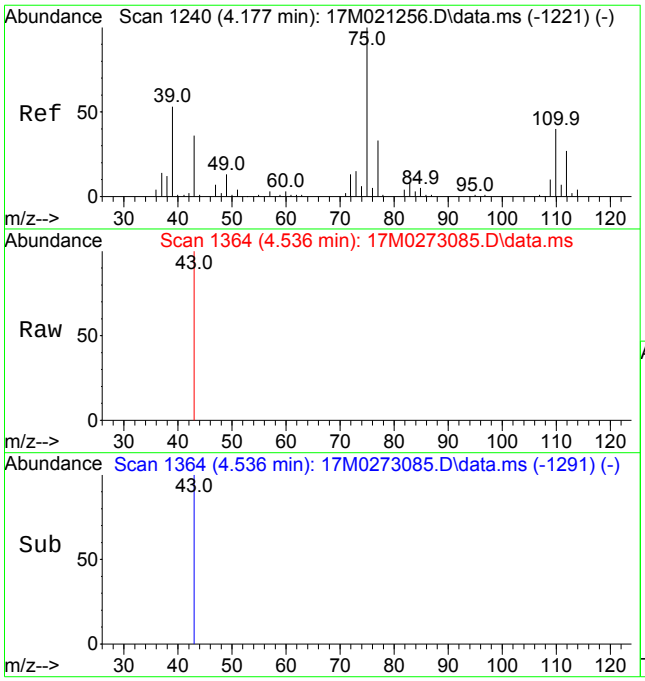


#27
Chloroform
Concen: 0.1861 ug/L
RT: 4.113 min Scan# 1218
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 83 Resp: 1355

Ion	Ratio	Lower	Upper
83	100		
85	65.2	39.2	91.4
47	30.6	12.9	30.1#

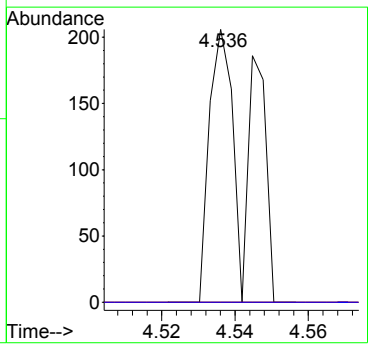


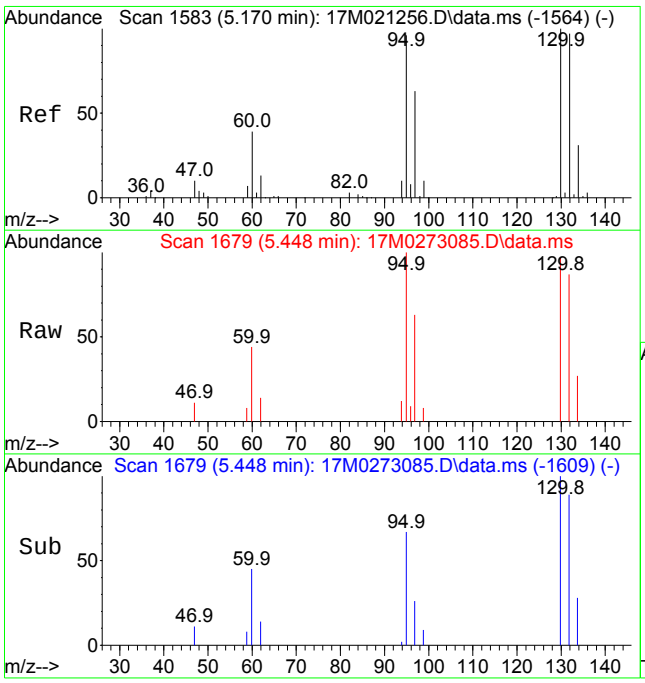


#32
2-Butanone
Concen: 0.1372 ug/L
RT: 4.536 min Scan# 1364
Delta R.T. 0.012 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion: 43 Resp: 152

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

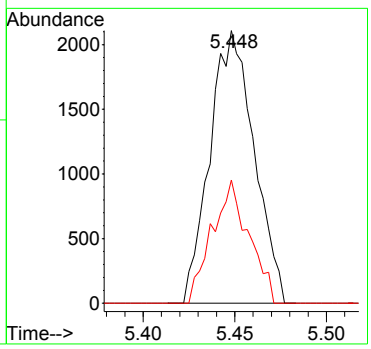


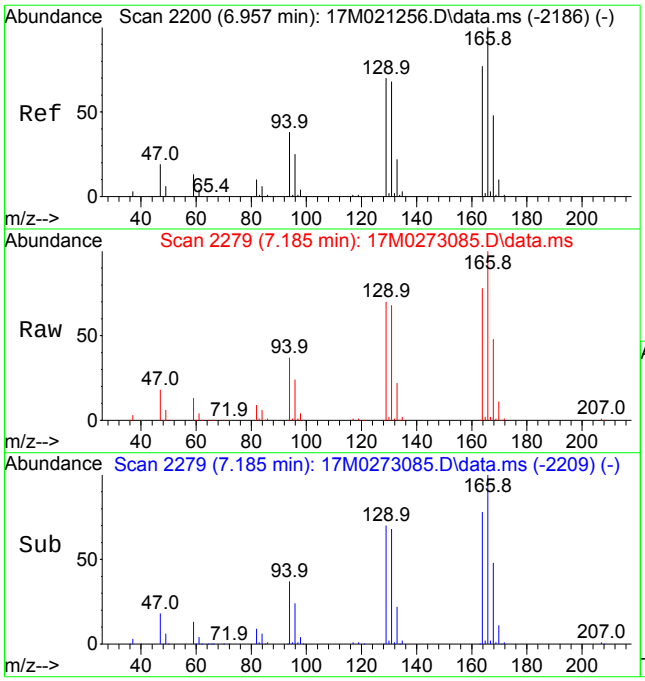


#37
Trichloroethene
Concen: 0.7470 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion:130 Resp: 3533

Ion	Ratio	Lower	Upper
130	100		
60	37.5	22.9	53.3

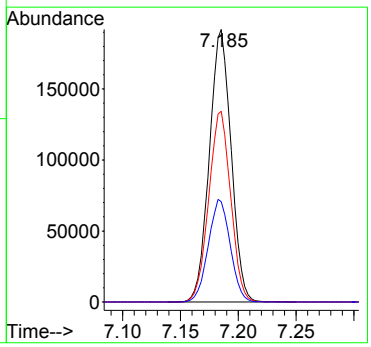




#49
Tetrachloroethene
Concen: 51.7312 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273085.D
Acq: 27 Apr 2017 18:55

Tgt Ion:166 Resp: 250776

Ion	Ratio	Lower	Upper
166	100		
129	70.5	56.2	84.4
94	37.9	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273086.D Vial: 22
Acq On : 27 Apr 2017 19:15 Operator: ADC
Sample : L17041110-06 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

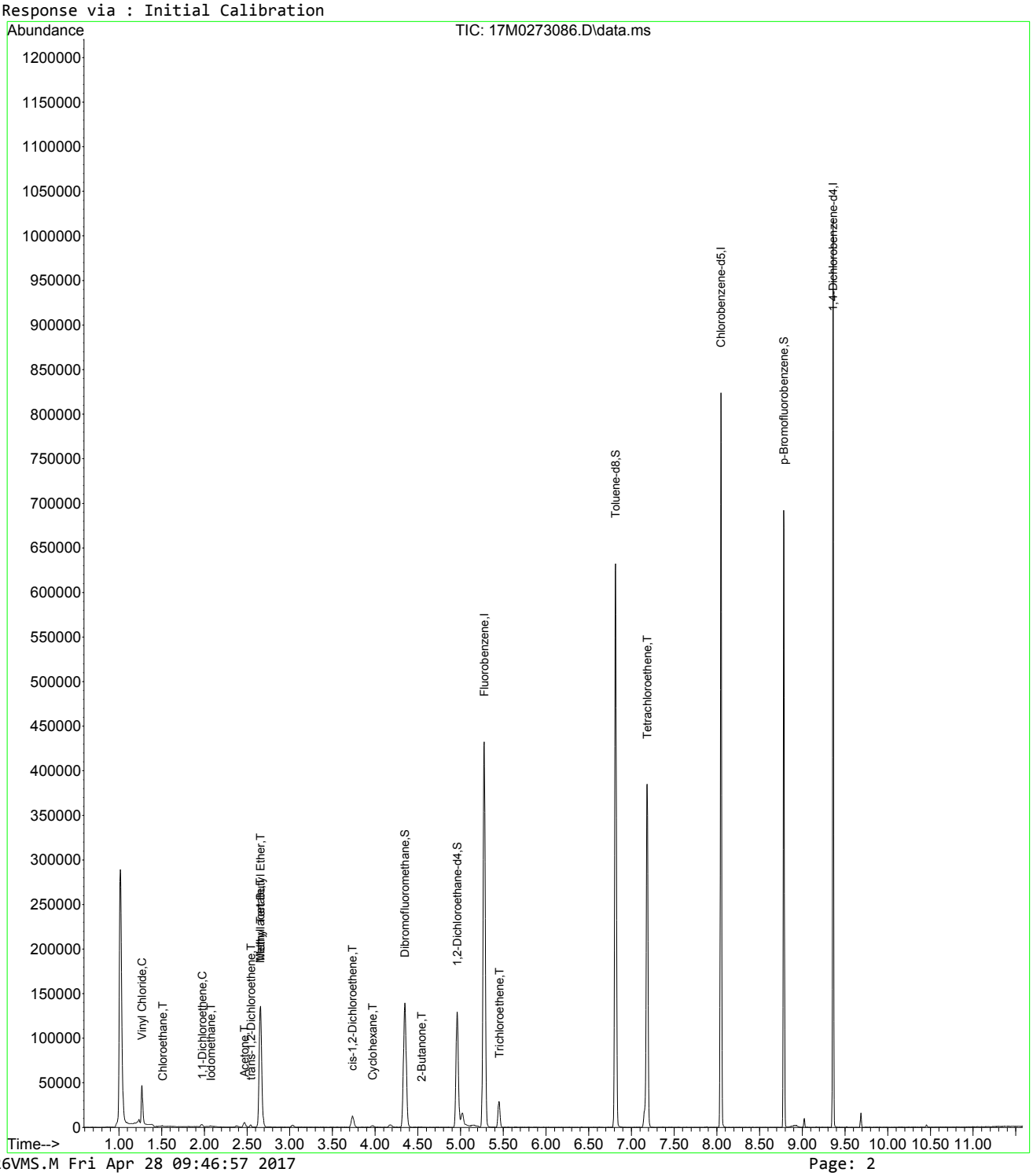
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	373440	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	278360	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	139541	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	99318	24.6259	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.504%			
34) 1,2-Dichloroethane-d4	4.959	65	95372	25.2288	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.915%			
47) Toluene-d8	6.815	98	342246	24.6363	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 98.545%			
66) p-Bromofluorobenzene	8.783	95	111244	23.8097	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.239%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.270	62	34037	7.0819	ug/L	100
7) Chloroethane	1.510	64	474	0.2079	ug/L #	48
10) 1,1-Dichloroethene	1.974	61	1012	0.1754	ug/L	88
13) Iodomethane	2.078	142	934	2.1624	ug/L #	76
16) Acetone	2.469	43	4796	6.3874	ug/L	97
17) trans-1,2-Dichloroethene	2.547	96	1054	0.2683	ug/L	94
18) Methyl acetate	2.654	43	28308	14.3807	ug/L #	90
19) Methyl Tert Butyl Ether	2.657	73	140937	14.1388	ug/L	99
23) cis-1,2-Dichloroethene	3.734	96	7257	1.6323	ug/L	99
25) Cyclohexane	3.971	56	1354	0.2257	ug/L #	81
32) 2-Butanone	4.545	43	210	0.1876	ug/L #	37
37) Trichloroethene	5.454	130	9783	2.0476	ug/L	99
49) Tetrachloroethene	7.185	166	93806	18.8454	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

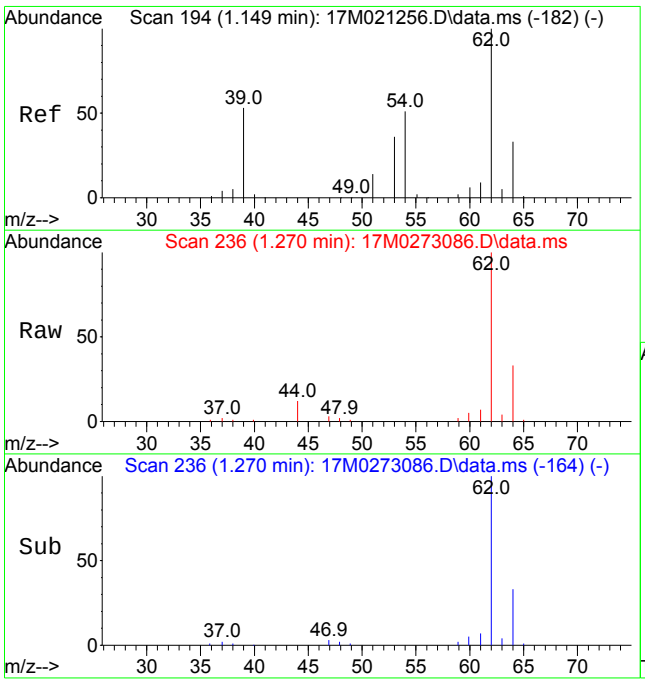
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273086.D Vial: 22
Acq On : 27 Apr 2017 19:15 Operator: ADC
Sample : L17041110-06 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



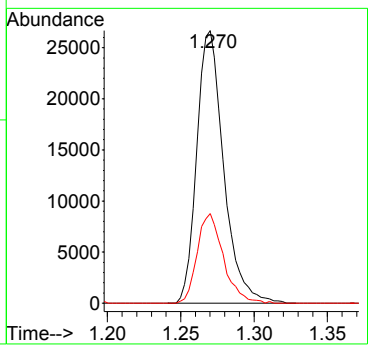
826VMS.M Fri Apr 28 09:46:57 2017 Page: 2

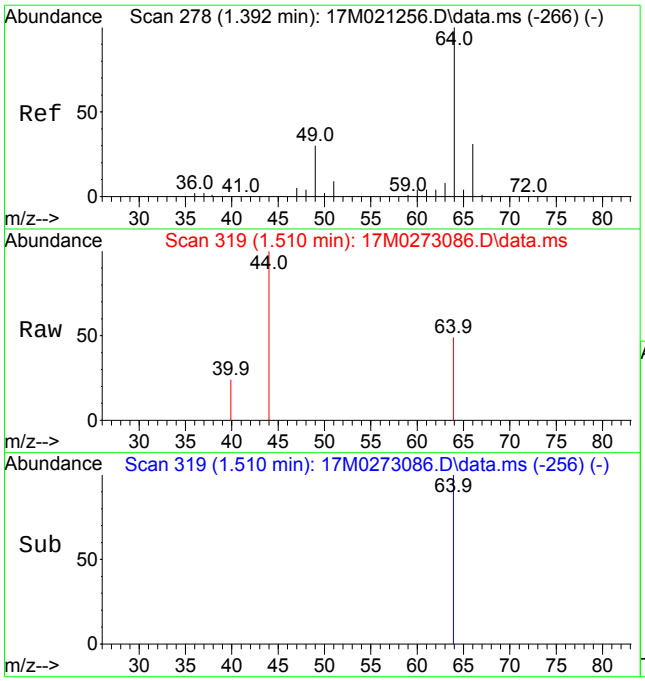


#4
Vinyl Chloride
Concen: 7.0819 ug/L
RT: 1.270 min Scan# 236
Delta R.T. 0.009 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 62 Resp: 34037

Ion	Ratio	Lower	Upper
62	100		
64	32.1	19.2	44.8

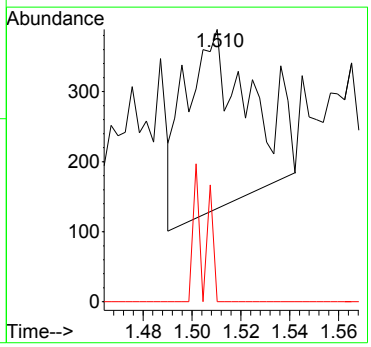


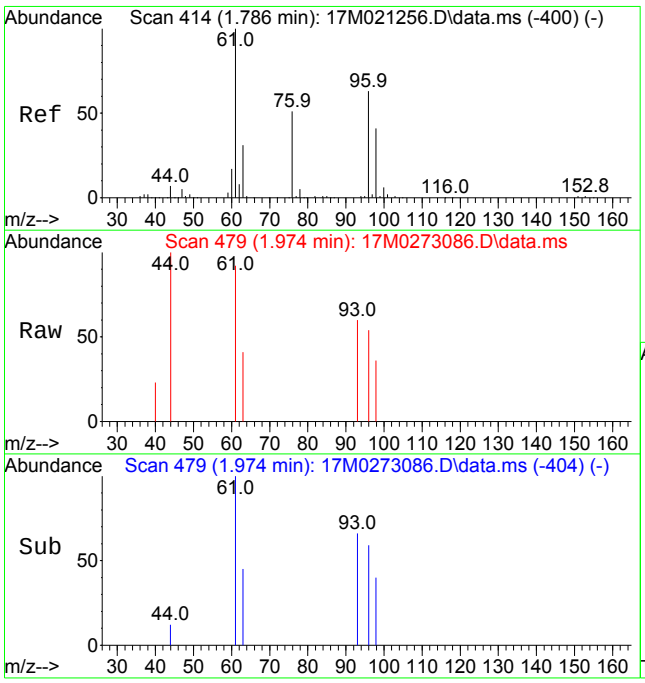


#7
Chloroethane
Concen: 0.2079 ug/L
RT: 1.510 min Scan# 319
Delta R.T. -0.018 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 64 Resp: 474

Ion	Ratio	Lower	Upper
64	100		
49	0.0	16.0	37.4#

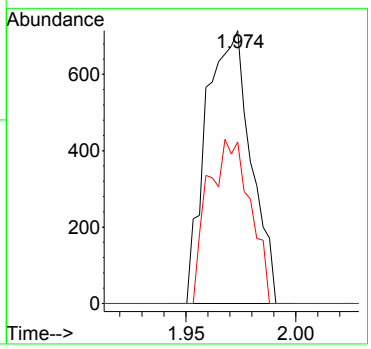


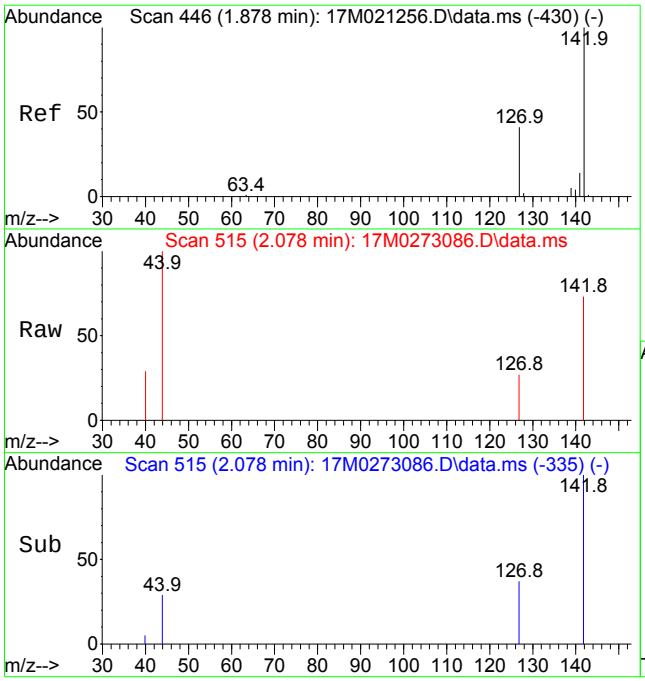


#10
1,1-Dichloroethene
Concen: 0.1754 ug/L
RT: 1.974 min Scan# 479
Delta R.T. 0.018 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 61 Resp: 1012

Ion	Ratio	Lower	Upper
61	100		
96	56.6	52.9	79.3

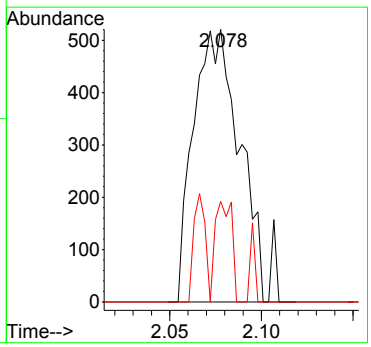


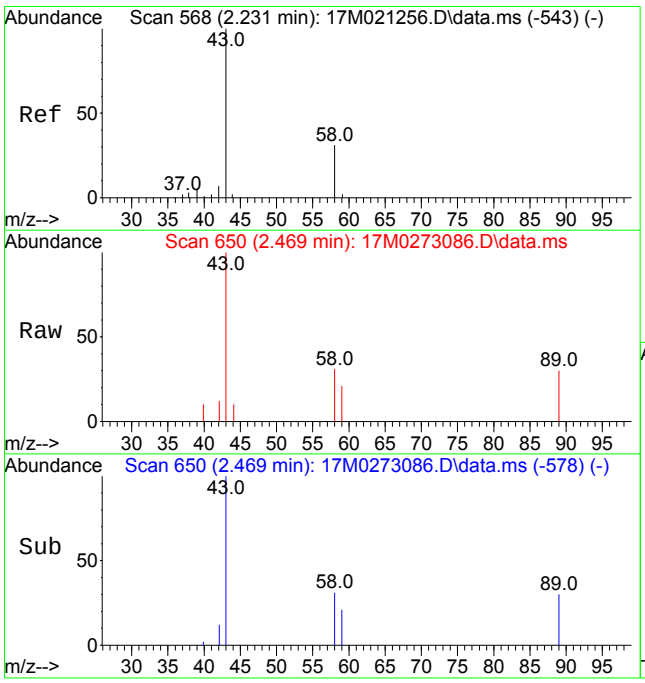


#13
Iodomethane
Concen: 2.1624 ug/L
RT: 2.078 min Scan# 515
Delta R.T. 0.020 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion:142 Resp: 934

Ion	Ratio	Lower	Upper
142	100		
127	25.6	32.2	48.2#

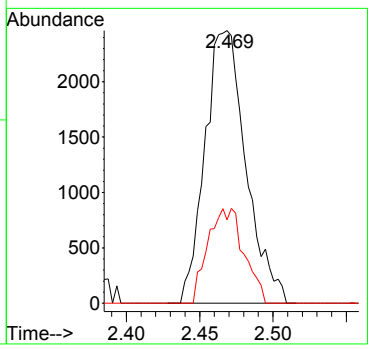


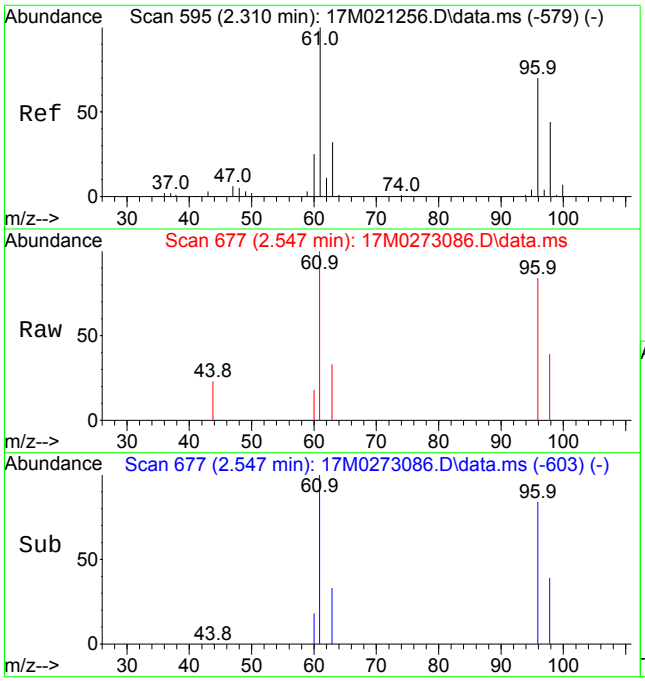


#16
Acetone
Concen: 6.3874 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 43 Resp: 4796

Ion	Ratio	Lower	Upper
43	100		
58	30.5	19.4	45.2

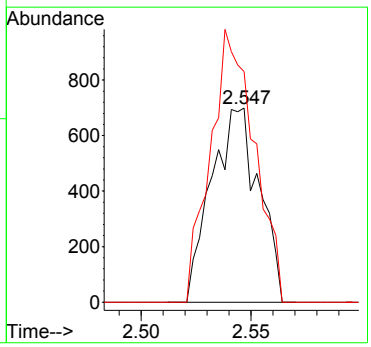


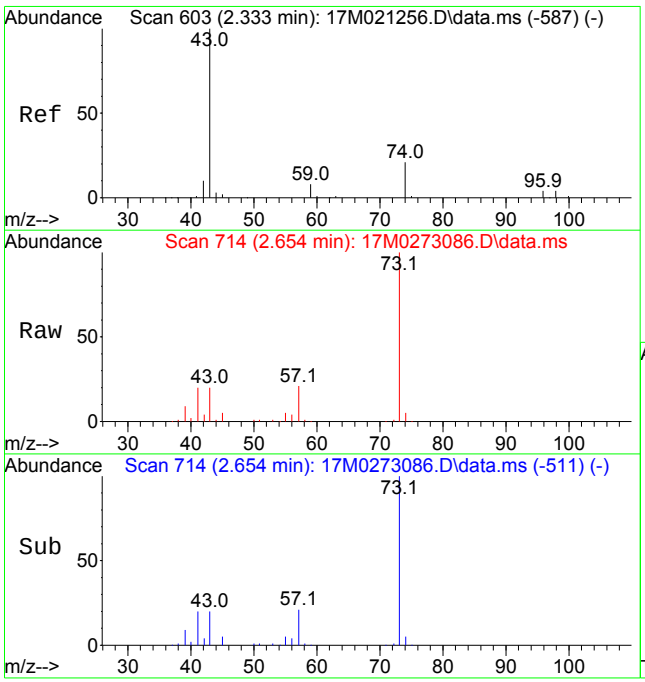


#17
trans-1,2-Dichloroethene
Concen: 0.2683 ug/L
RT: 2.547 min Scan# 677
Delta R.T. 0.015 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 96 Resp: 1054

Ion	Ratio	Lower	Upper
96	100		
61	129.7	109.4	164.0

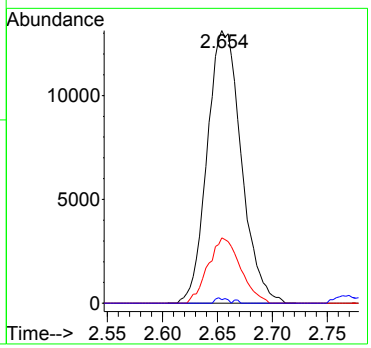


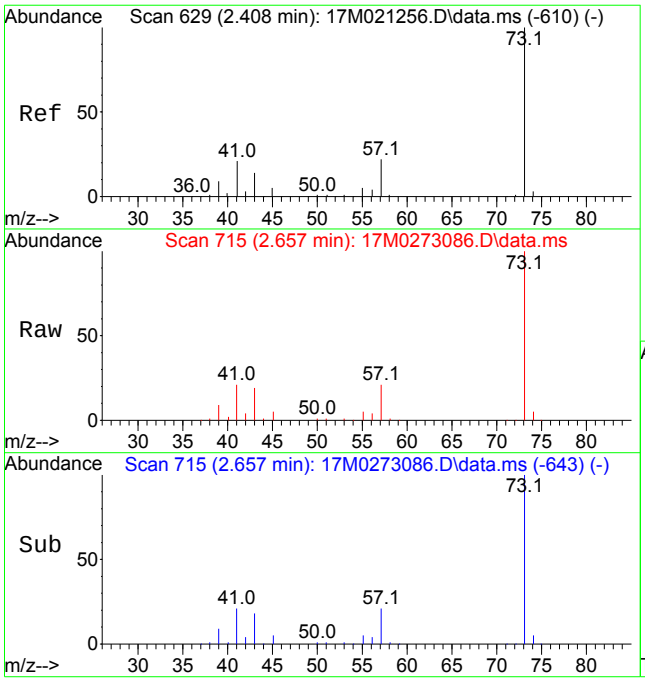


#18
Methyl acetate
Concen: 14.3807 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.087 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 43 Resp: 28308

Ion	Ratio	Lower	Upper
43	100		
74	22.8	25.4	25.4#
59	0.8	7.6	11.4#

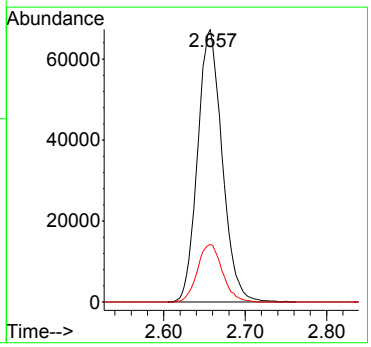


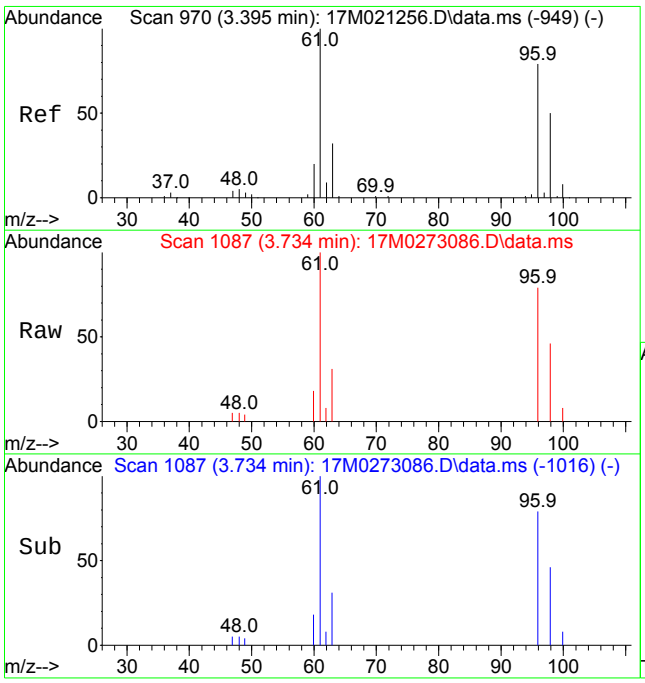


#19
Methyl Tert Butyl Ether
Concen: 14.1388 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 73 Resp: 140937

Ion	Ratio	Lower	Upper
73	100		
57	21.5	17.6	26.4

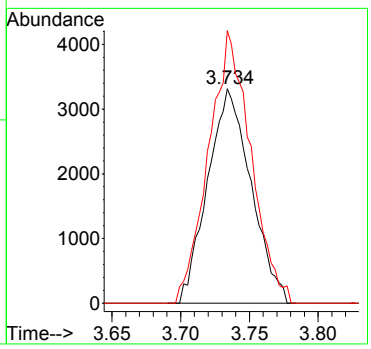


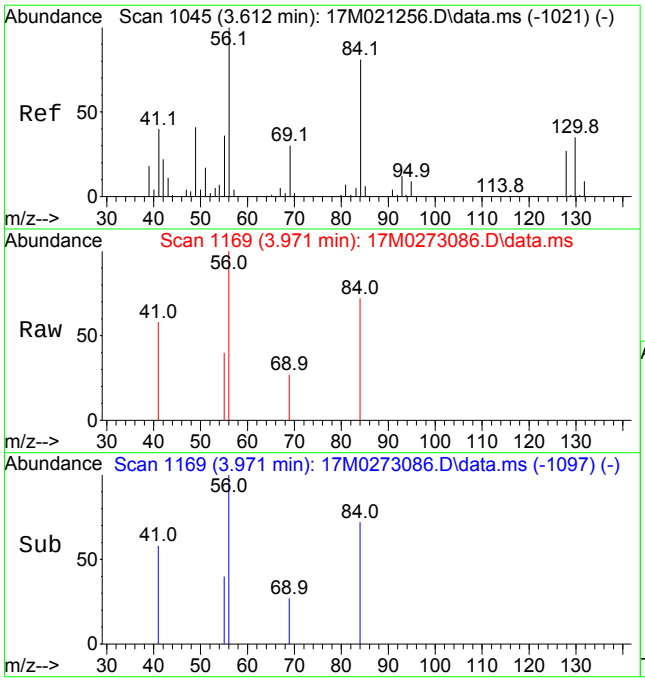


#23
cis-1,2-Dichloroethene
Concen: 1.6323 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 96 Resp: 7257

Ion	Ratio	Lower	Upper
96	100		
61	123.4	98.1	147.1

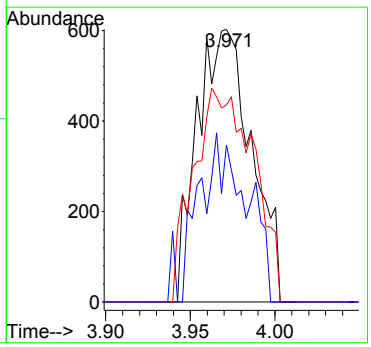


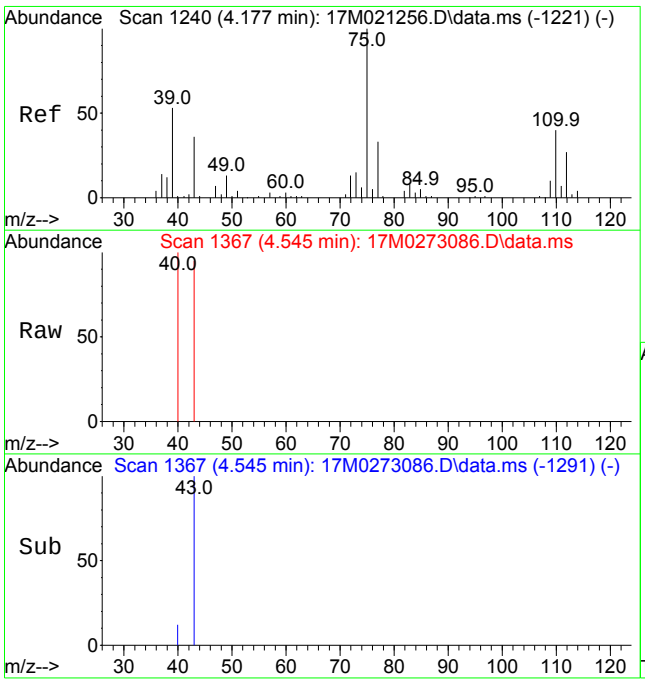


#25
Cyclohexane
Concen: 0.2257 ug/L
RT: 3.971 min Scan# 1169
Delta R.T. 0.008 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 56 Resp: 1354

Ion	Ratio	Lower	Upper
56	100		
84	86.2	69.4	104.0
41	55.1	72.2	108.2#

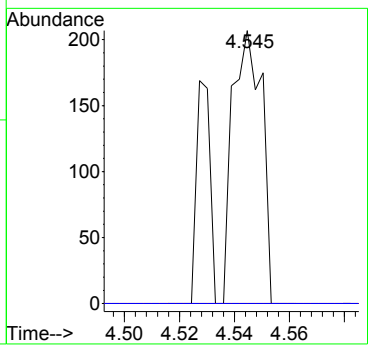


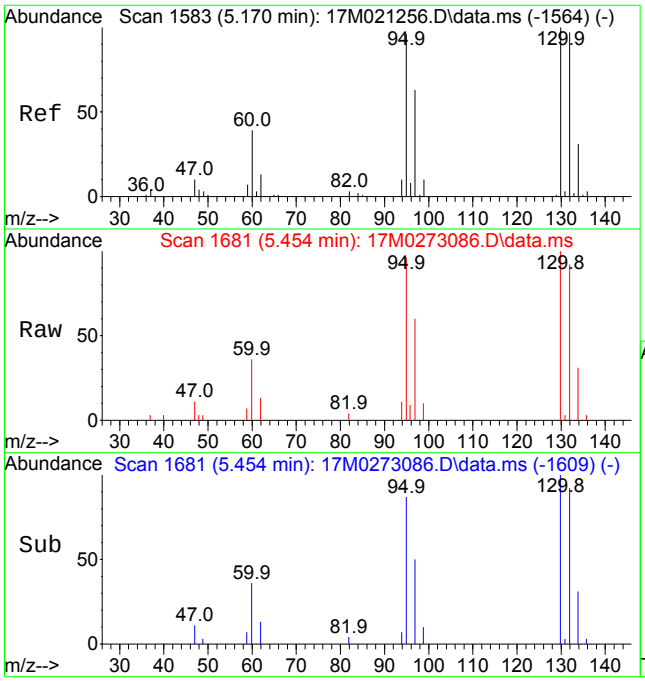


#32
2-Butanone
Concen: 0.1876 ug/L
RT: 4.545 min Scan# 1367
Delta R.T. 0.021 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion: 43 Resp: 210

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

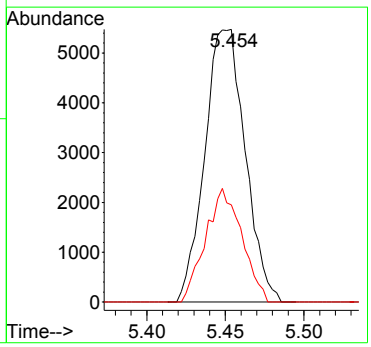


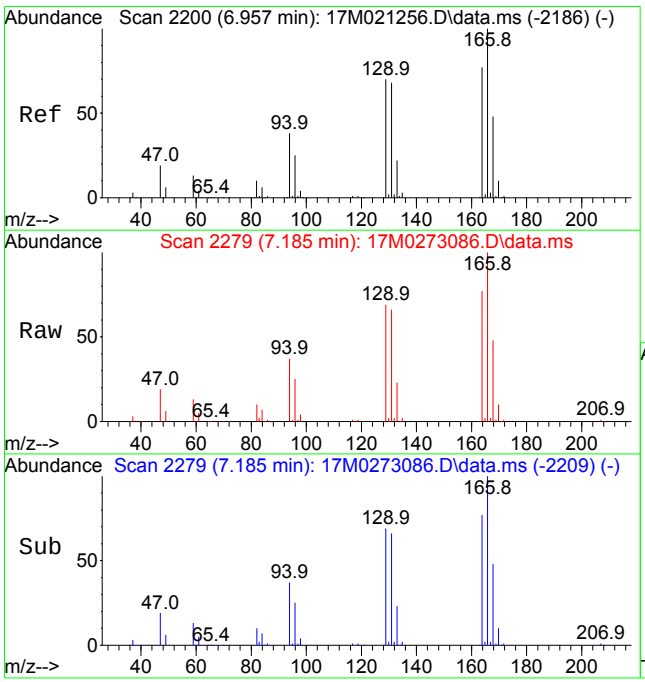


#37
Trichloroethene
Concen: 2.0476 ug/L
RT: 5.454 min Scan# 1681
Delta R.T. 0.009 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion:130 Resp: 9783

Ion	Ratio	Lower	Upper
130	100		
60	37.5	22.9	53.3

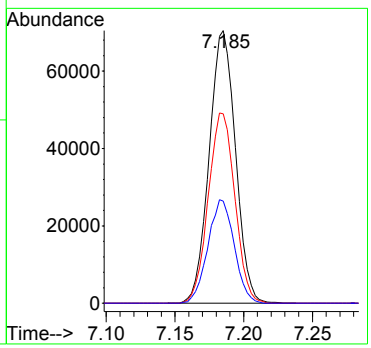




#49
Tetrachloroethene
Concen: 18.8454 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273086.D
Acq: 27 Apr 2017 19:15

Tgt Ion:166 Resp: 93806

Ion	Ratio	Lower	Upper
166	100		
129	70.3	56.2	84.4
94	37.9	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273087.D Vial: 23
Acq On : 27 Apr 2017 19:34 Operator: ADC
Sample : L17041110-07 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:47:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

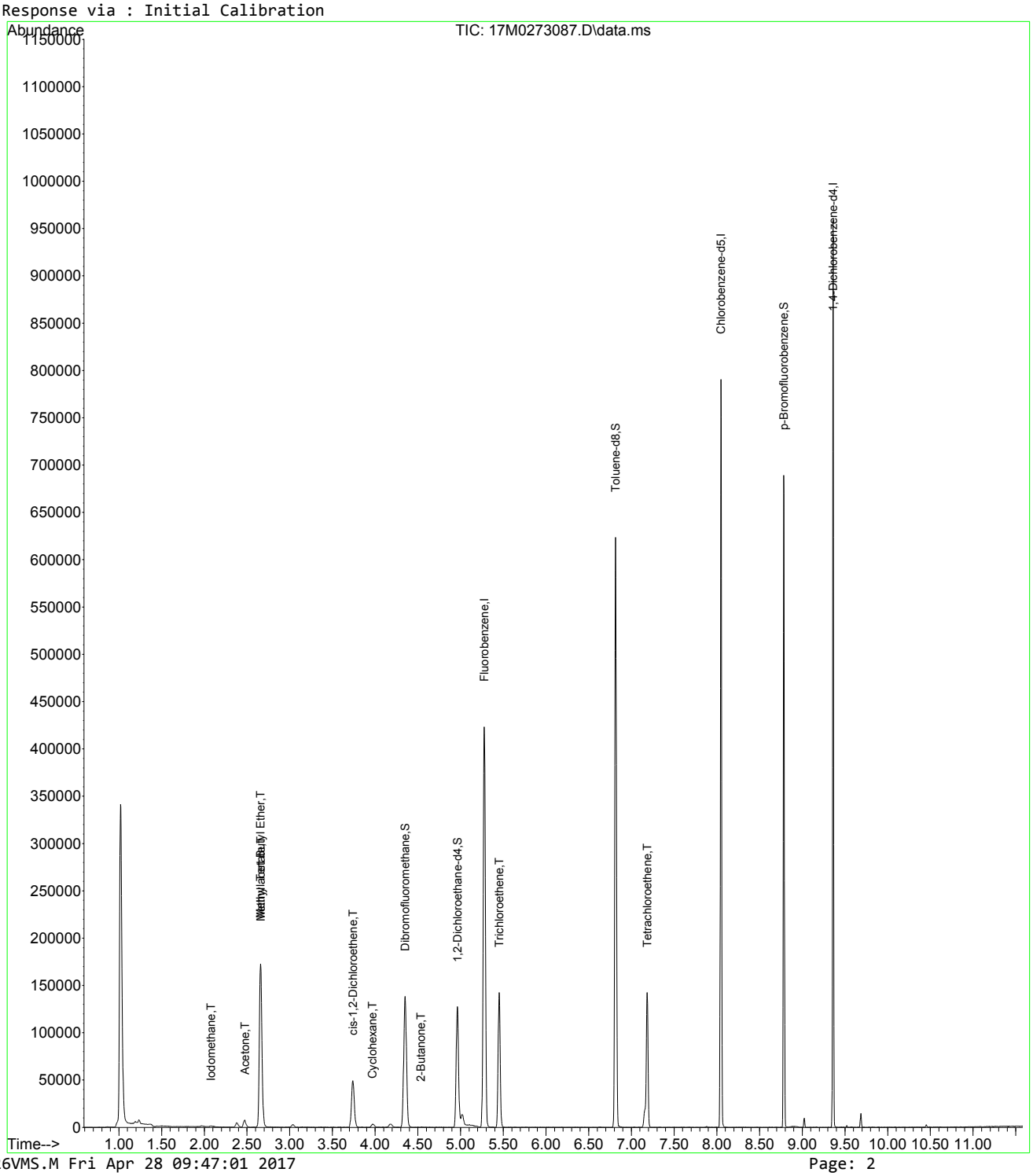
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	363995	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	268483	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	130539	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	98483	25.0525	ug/L	0.0118
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.210%			
34) 1,2-Dichloroethane-d4	4.965	65	94590	25.6712	ug/L	0.0116
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.685%			
47) Toluene-d8	6.815	98	335052	25.0057	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.023%			
66) p-Bromofluorobenzene	8.784	95	109711	25.1009	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.404%			
Target Compounds						Qvalue
13) Iodomethane	2.078	142	704	2.1258	ug/L #	35
16) Acetone	2.475	43	7954	10.8681	ug/L	96
18) Methyl acetate	2.660	43	35461	18.4819	ug/L #	90
19) Methyl Tert Butyl Ether	2.657	73	178917	18.4147	ug/L	99
23) cis-1,2-Dichloroethene	3.740	96	27994	6.4598	ug/L	100
25) Cyclohexane	3.969	56	2309	0.3948	ug/L #	77
32) 2-Butanone	4.533	43	221	0.2025	ug/L #	37
37) Trichloroethene	5.451	130	46158	9.9116	ug/L	98
49) Tetrachloroethene	7.185	166	34163	7.1158	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

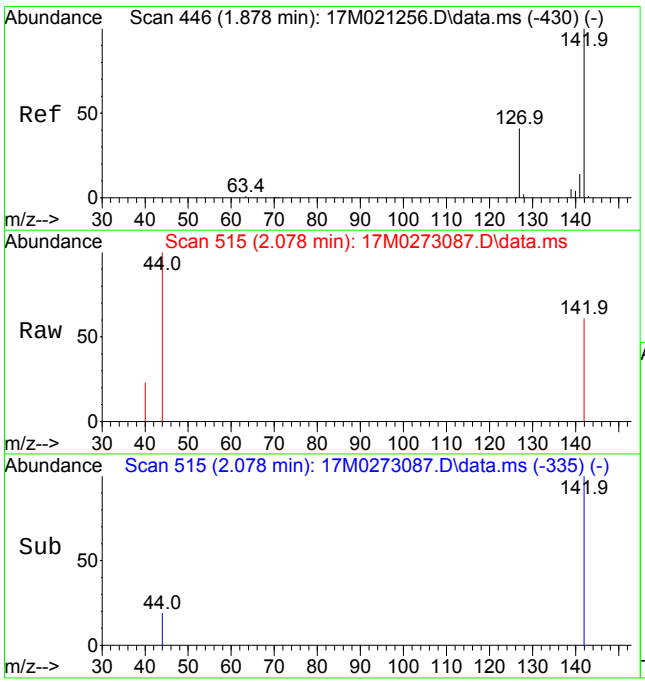
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273087.D Vial: 23
Acq On : 27 Apr 2017 19:34 Operator: ADC
Sample : L17041110-07 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:47:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



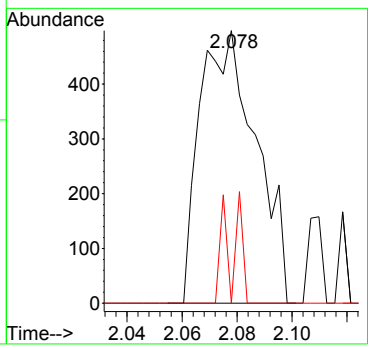
826VMS.M Fri Apr 28 09:47:01 2017 Page: 2

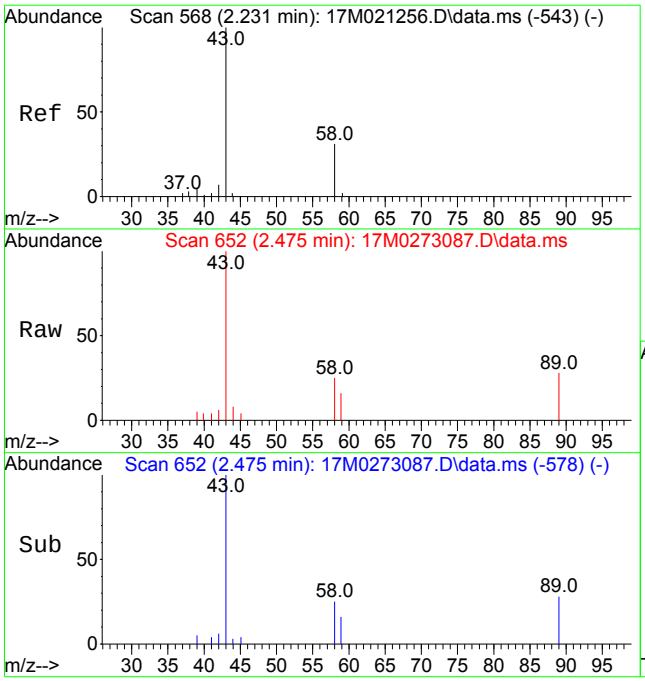


#13
Iodomethane
Concen: 2.1258 ug/L
RT: 2.078 min Scan# 515
Delta R.T. 0.020 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion:142 Resp: 704

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

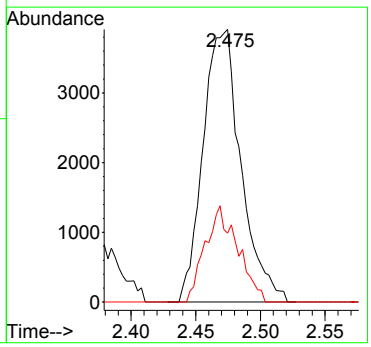


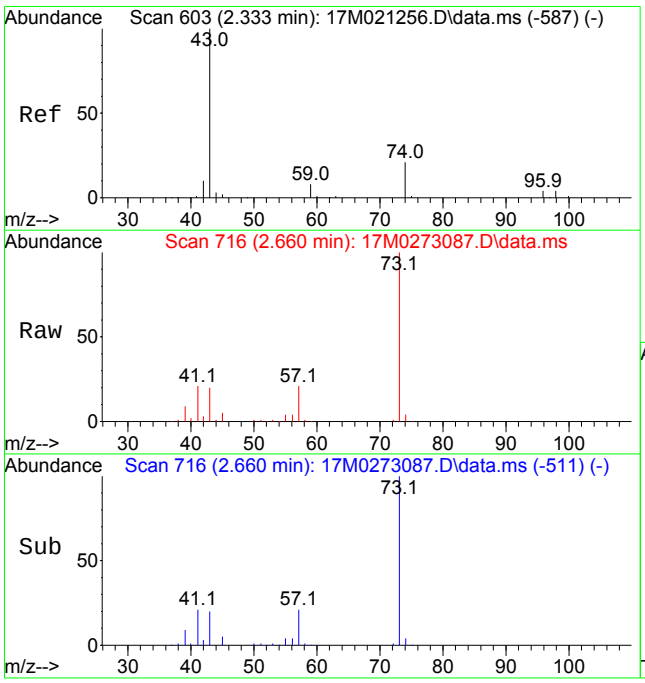


#16
Acetone
Concen: 10.8681 ug/L
RT: 2.475 min Scan# 652
Delta R.T. 0.015 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 43 Resp: 7954

Ion	Ratio	Lower	Upper
43	100		
58	30.2	19.4	45.2

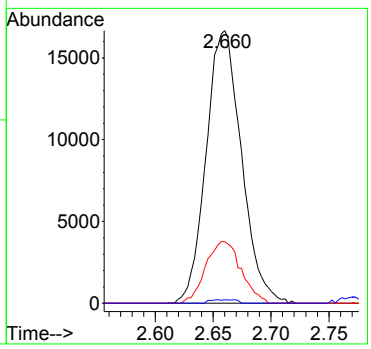


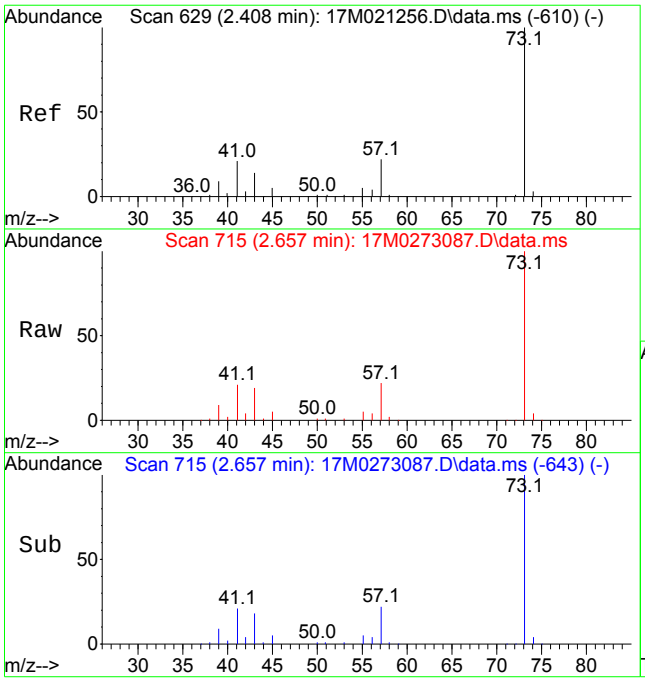


#18
Methyl acetate
Concen: 18.4819 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.093 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 43 Resp: 35461

Ion	Ratio	Lower	Upper
43	100		
74	22.6	25.4	25.4#
59	1.0	7.6	11.4#

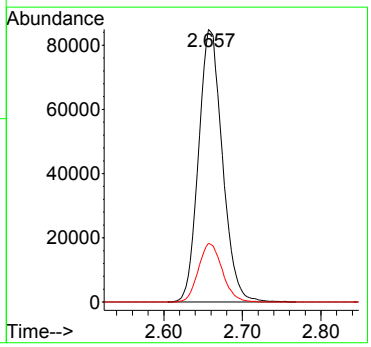


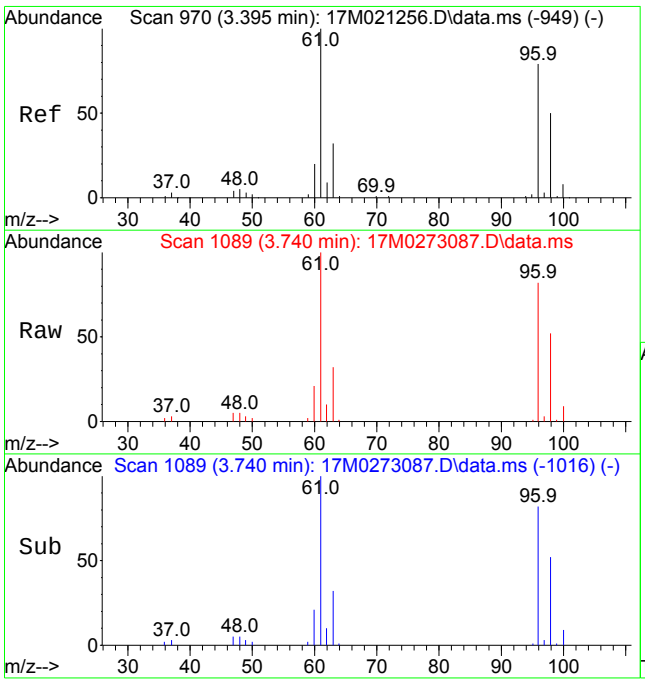


#19
Methyl Tert Butyl Ether
Concen: 18.4147 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 73 Resp: 178917

Ion	Ratio	Lower	Upper
73	100		
57	21.5	17.6	26.4

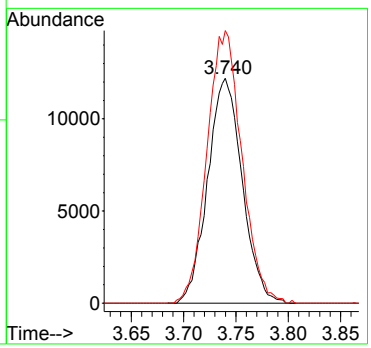


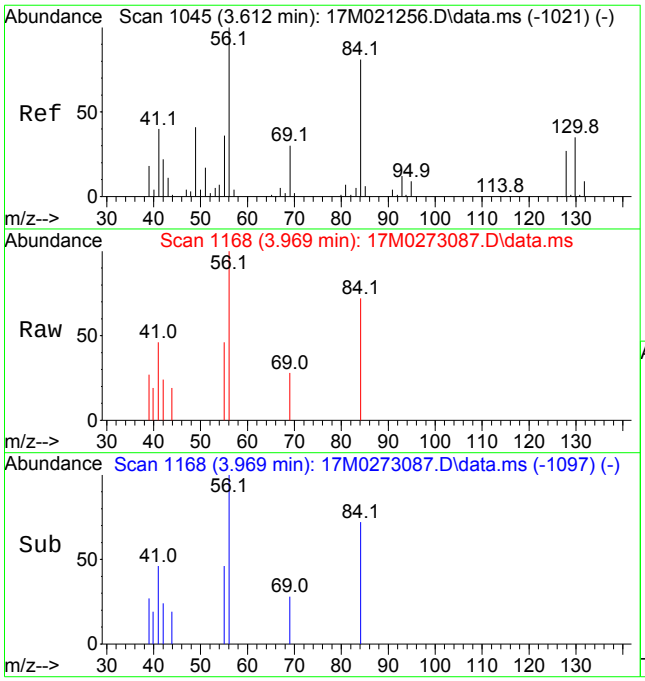


#23
cis-1,2-Dichloroethene
Concen: 6.4598 ug/L
RT: 3.740 min Scan# 1089
Delta R.T. 0.012 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 96 Resp: 27994

Ion	Ratio	Lower	Upper
96	100		
61	122.6	98.1	147.1

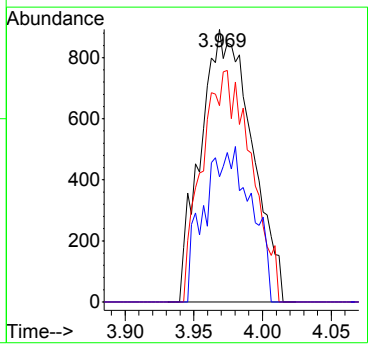


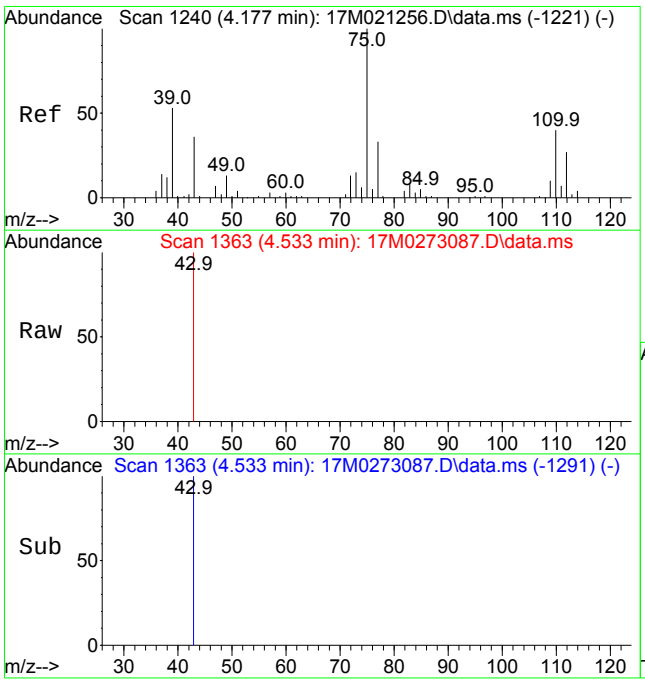


#25
Cyclohexane
Concen: 0.3948 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 56 Resp: 2309

Ion	Ratio	Lower	Upper
56	100		
84	81.8	69.4	104.0
41	52.1	72.2	108.2#

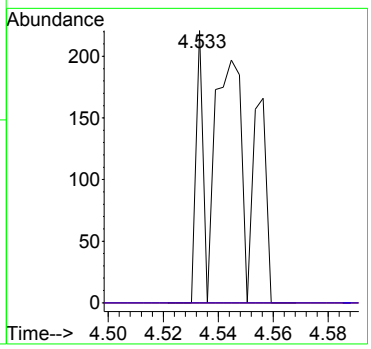


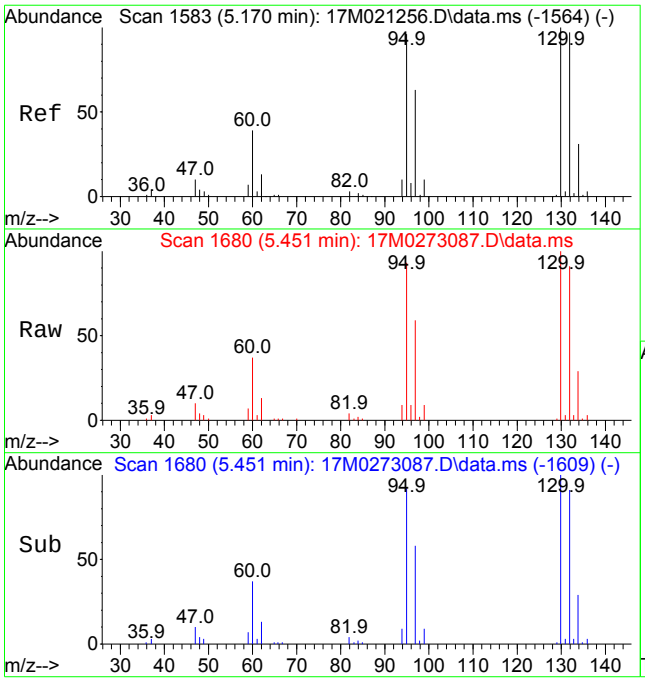


#32
2-Butanone
Concen: 0.2025 ug/L
RT: 4.533 min Scan# 1363
Delta R.T. 0.009 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion: 43 Resp: 221

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

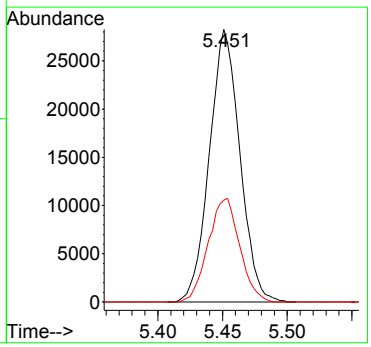


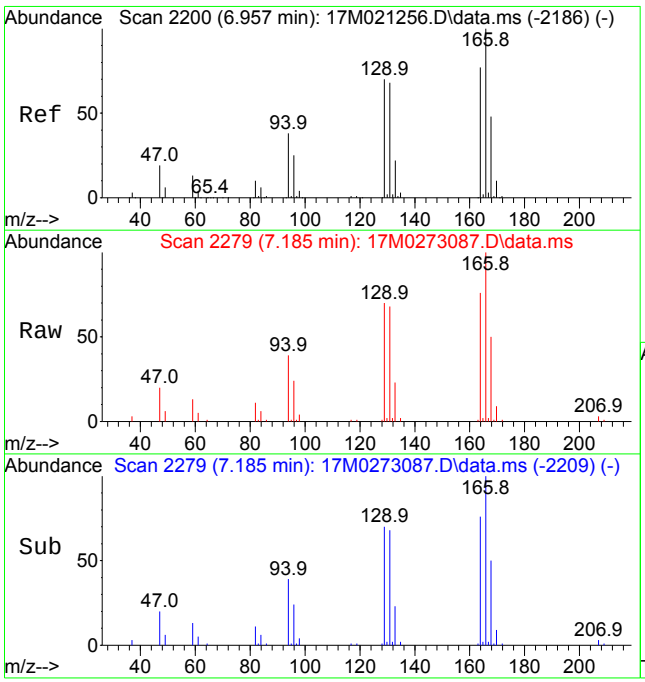


#37
Trichloroethene
Concen: 9.9116 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion:130 Resp: 46158

Ion	Ratio	Lower	Upper
130	100		
60	39.2	22.9	53.3

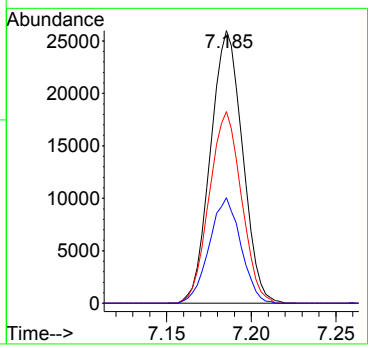




#49
Tetrachloroethene
Concen: 7.1158 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273087.D
Acq: 27 Apr 2017 19:34

Tgt Ion:166 Resp: 34163

Ion	Ratio	Lower	Upper
166	100		
129	70.4	56.2	84.4
94	38.1	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273088.D Vial: 24
Acq On : 27 Apr 2017 20:01 Operator: ADC
Sample : L17041110-08 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:47:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

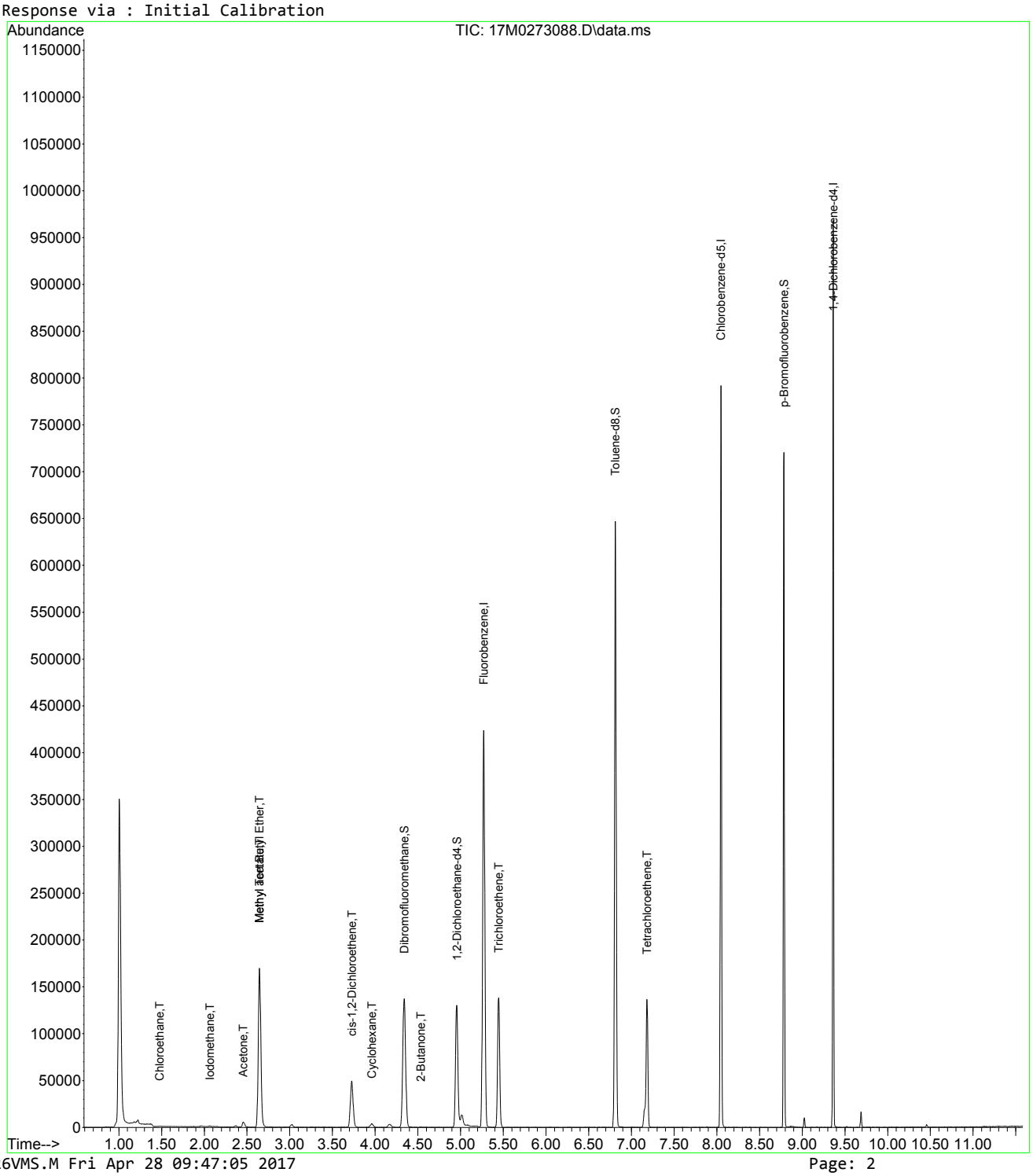
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	366120	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	266508	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	128141	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	99882	25.2609	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.044%			
34) 1,2-Dichloroethane-d4	4.956	65	95690	25.8190	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.276%			
47) Toluene-d8	6.812	98	347553	26.1309	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.524%			
66) p-Bromofluorobenzene	8.786	95	118449	27.6072	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.429%			
Target Compounds						Qvalue
7) Chloroethane	1.476	64	787	0.3521	ug/L #	48
13) Iodomethane	2.066	142	652	2.1159	ug/L #	35
16) Acetone	2.454	43	5480	7.4442	ug/L	98
18) Methyl acetate	2.645	43	35224	18.2518	ug/L #	89
19) Methyl Tert Butyl Ether	2.645	73	174157	17.8208	ug/L	100
23) cis-1,2-Dichloroethene	3.728	96	27871	6.3941	ug/L	100
25) Cyclohexane	3.963	56	2470	0.4199	ug/L #	78
32) 2-Butanone	4.533	43	153	0.1394	ug/L #	37
37) Trichloroethene	5.445	130	45044	9.6162	ug/L	97
49) Tetrachloroethene	7.182	166	33451	7.0191	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

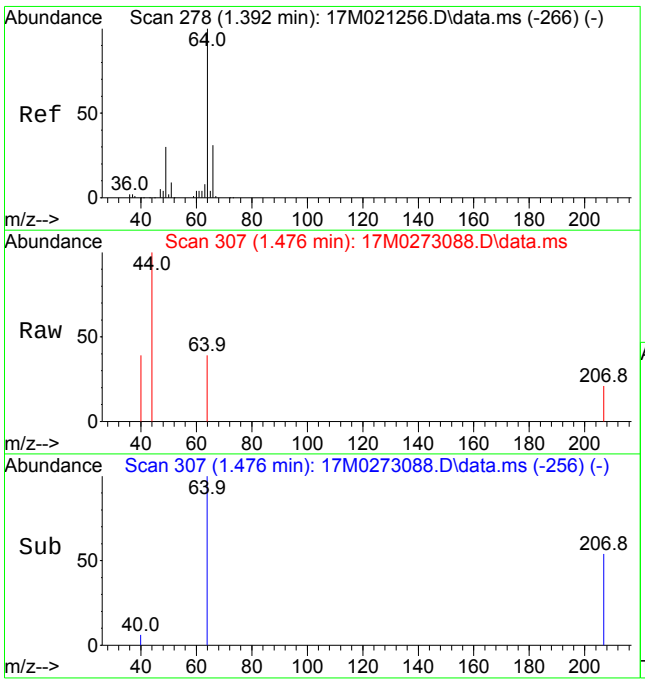
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273088.D Vial: 24
Acq On : 27 Apr 2017 20:01 Operator: ADC
Sample : L17041110-08 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:47:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



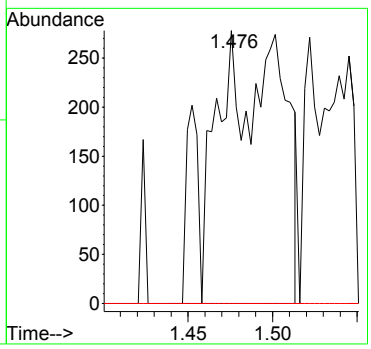
826VMS.M Fri Apr 28 09:47:05 2017 Page: 2

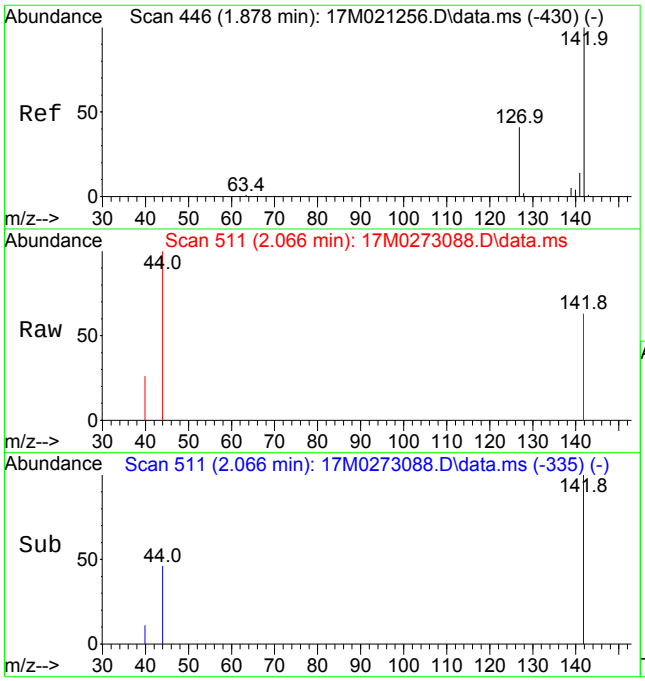


#7
Chloroethane
Concen: 0.3521 ug/L
RT: 1.476 min Scan# 307
Delta R.T. -0.052 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 64 Resp: 787

Ion	Ratio	Lower	Upper
64	100		
49	0.0	16.0	37.4#

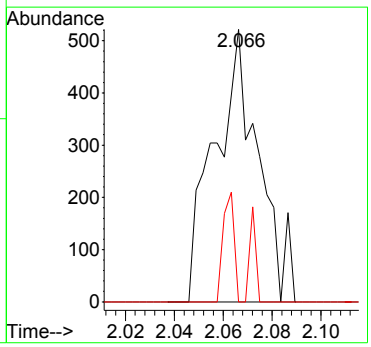


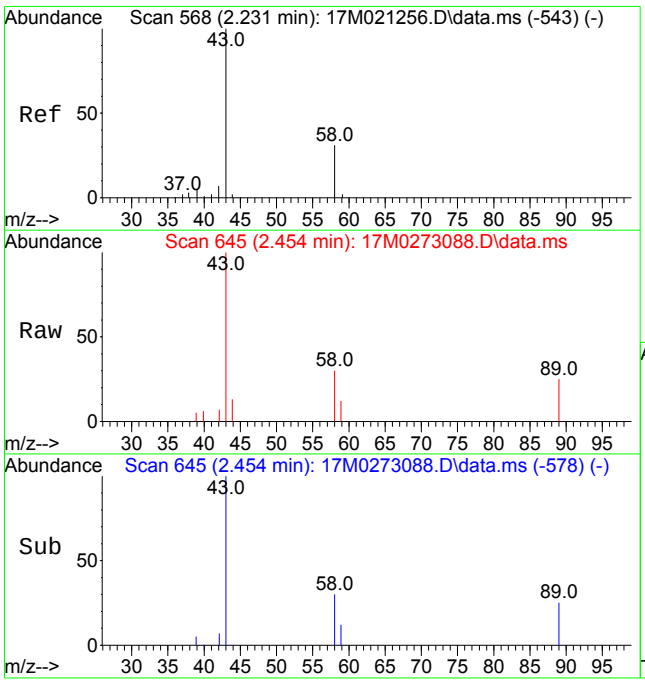


#13
Iodomethane
Concen: 2.1159 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion:142 Resp: 652

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

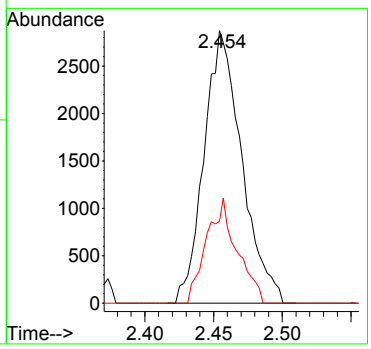


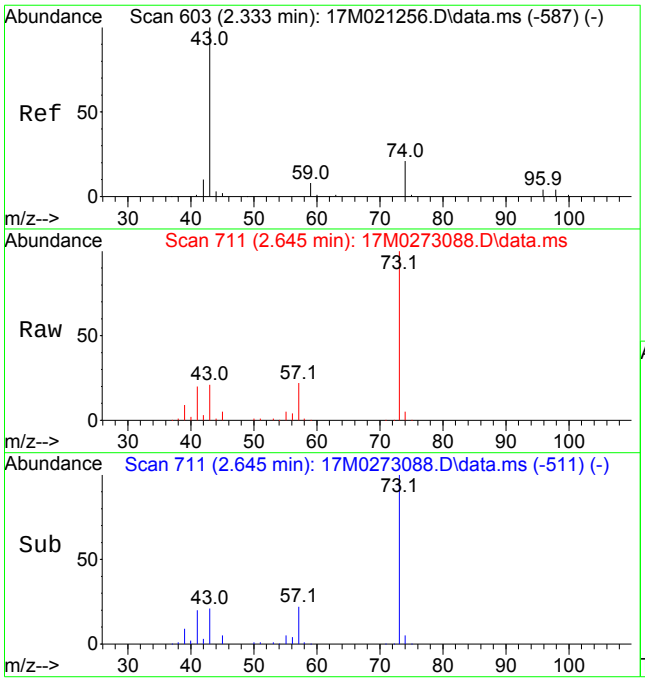


#16
Acetone
Concen: 7.4442 ug/L
RT: 2.454 min Scan# 645
Delta R.T. -0.006 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 43 Resp: 5480

Ion	Ratio	Lower	Upper
43	100		
58	31.1	19.4	45.2

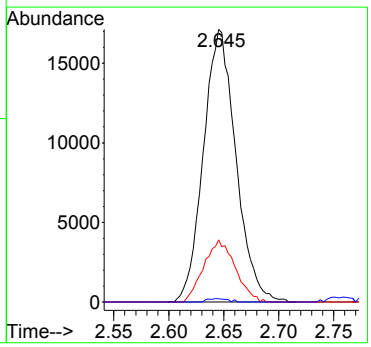


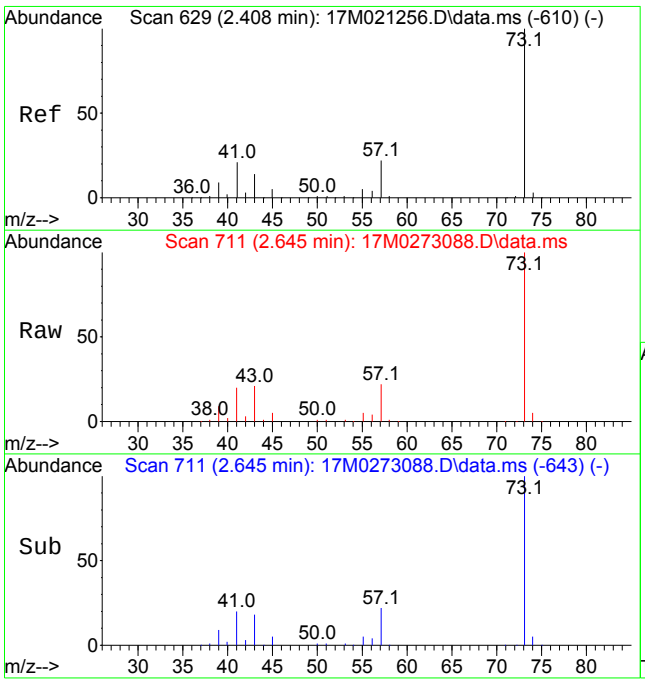


#18
Methyl acetate
Concen: 18.2518 ug/L
RT: 2.645 min Scan# 711
Delta R.T. 0.078 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 43 Resp: 35224

Ion	Ratio	Lower	Upper
43	100		
74	21.9	25.4	25.4#
59	0.8	7.6	11.4#

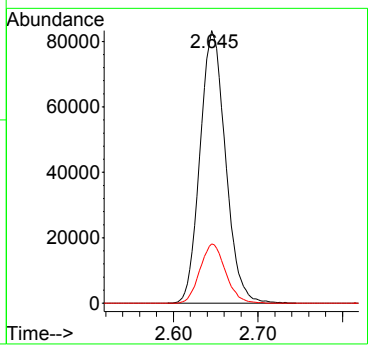


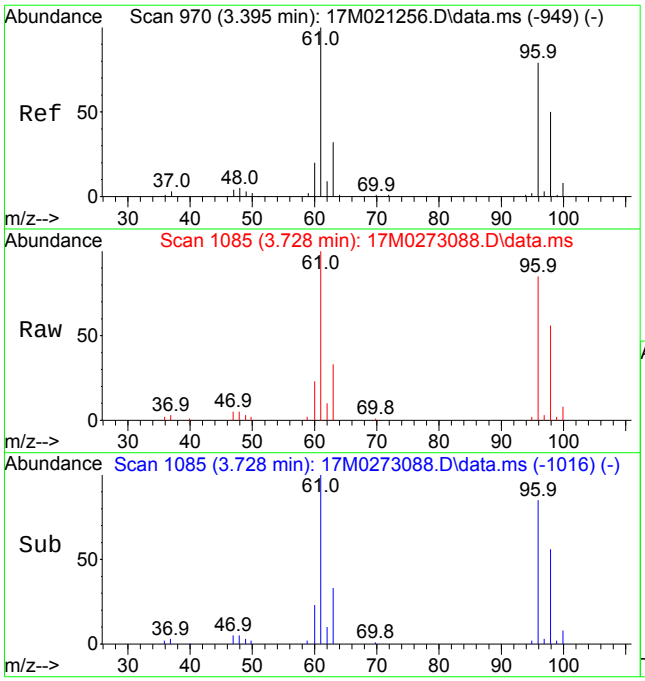


#19
Methyl Tert Butyl Ether
Concen: 17.8208 ug/L
RT: 2.645 min Scan# 711
Delta R.T. -0.003 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 73 Resp: 174157

Ion	Ratio	Lower	Upper
73	100		
57	21.9	17.6	26.4

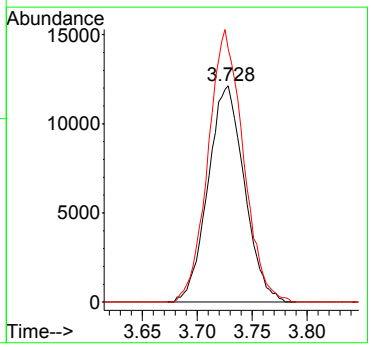


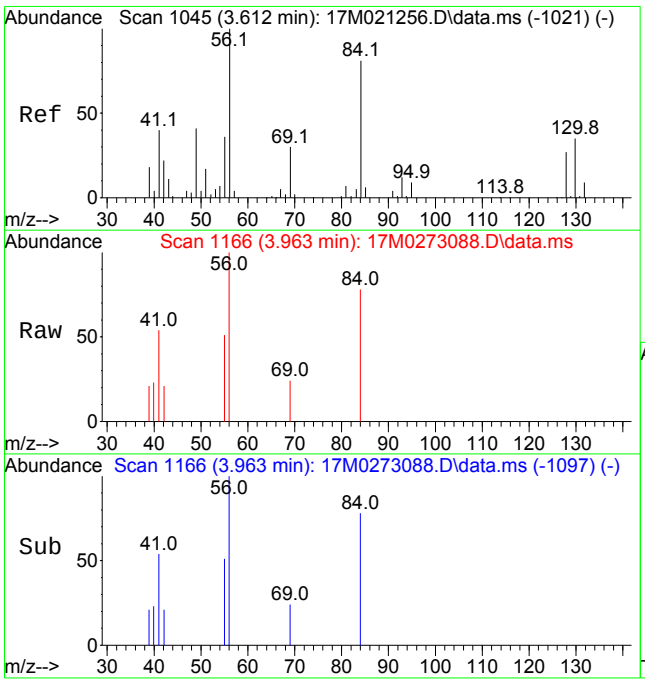


#23
cis-1,2-Dichloroethene
Concen: 6.3941 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 96 Resp: 27871

Ion	Ratio	Lower	Upper
96	100		
61	122.2	98.1	147.1

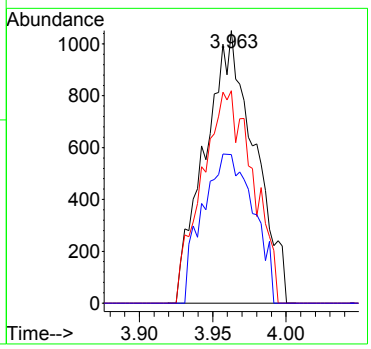


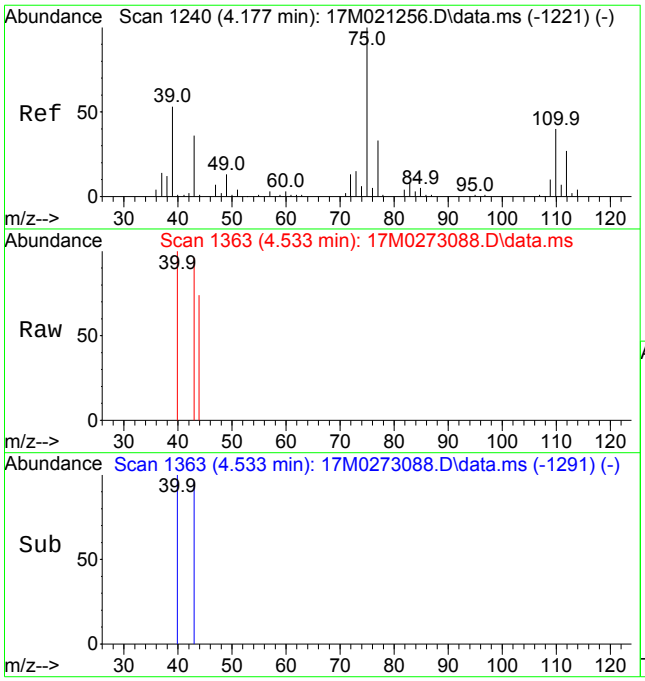


#25
Cyclohexane
Concen: 0.4199 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 56 Resp: 2470

Ion	Ratio	Lower	Upper
56	100		
84	80.6	69.4	104.0
41	56.3	72.2	108.2#

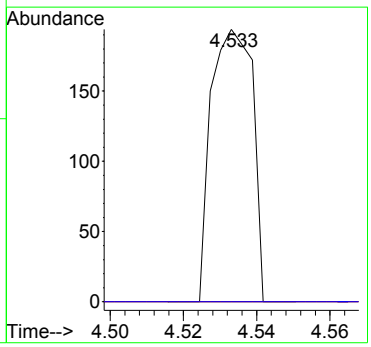


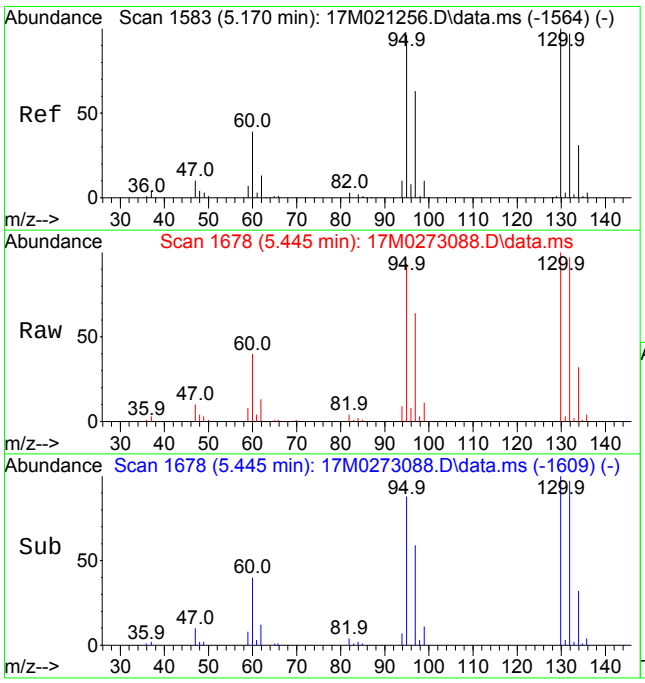


#32
2-Butanone
Concen: 0.1394 ug/L
RT: 4.533 min Scan# 1363
Delta R.T. 0.009 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion: 43 Resp: 153

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

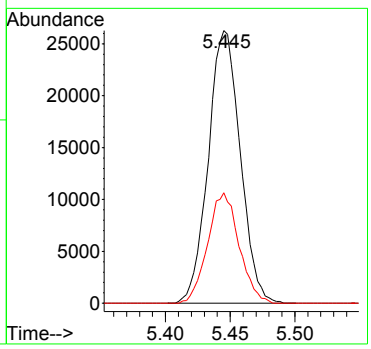


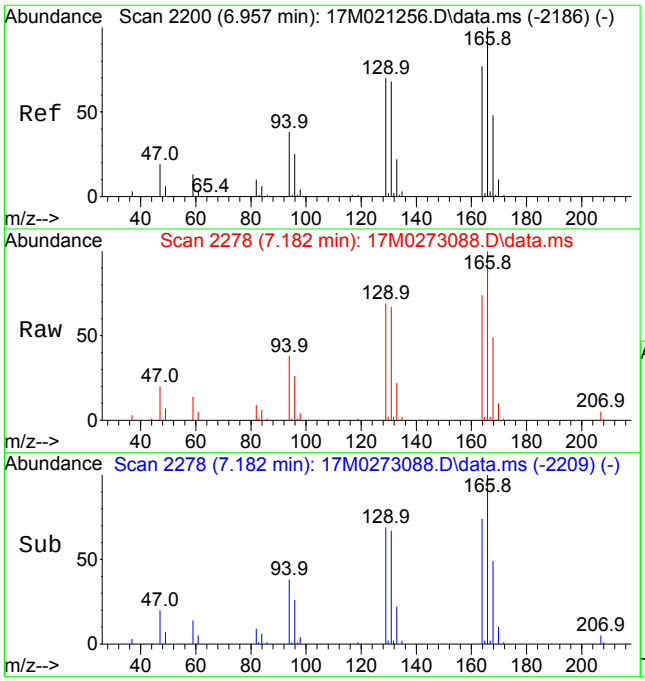


#37
Trichloroethene
Concen: 9.6162 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion:130 Resp: 45044

Ion	Ratio	Lower	Upper
130	100		
60	39.6	22.9	53.3

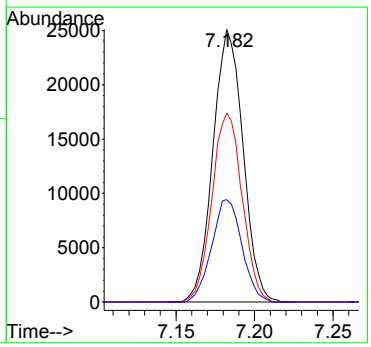




#49
Tetrachloroethene
Concen: 7.0191 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273088.D
Acq: 27 Apr 2017 20:01

Tgt Ion:166 Resp: 33451

Ion	Ratio	Lower	Upper
166	100		
129	69.5	56.2	84.4
94	37.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146803.D Vial: 7
Acq On : 28 Apr 2017 9:28 Operator: TMB
Sample : L17041110-09 B 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 09:50:08 2017 Quant Results File: 8260BWT.RES

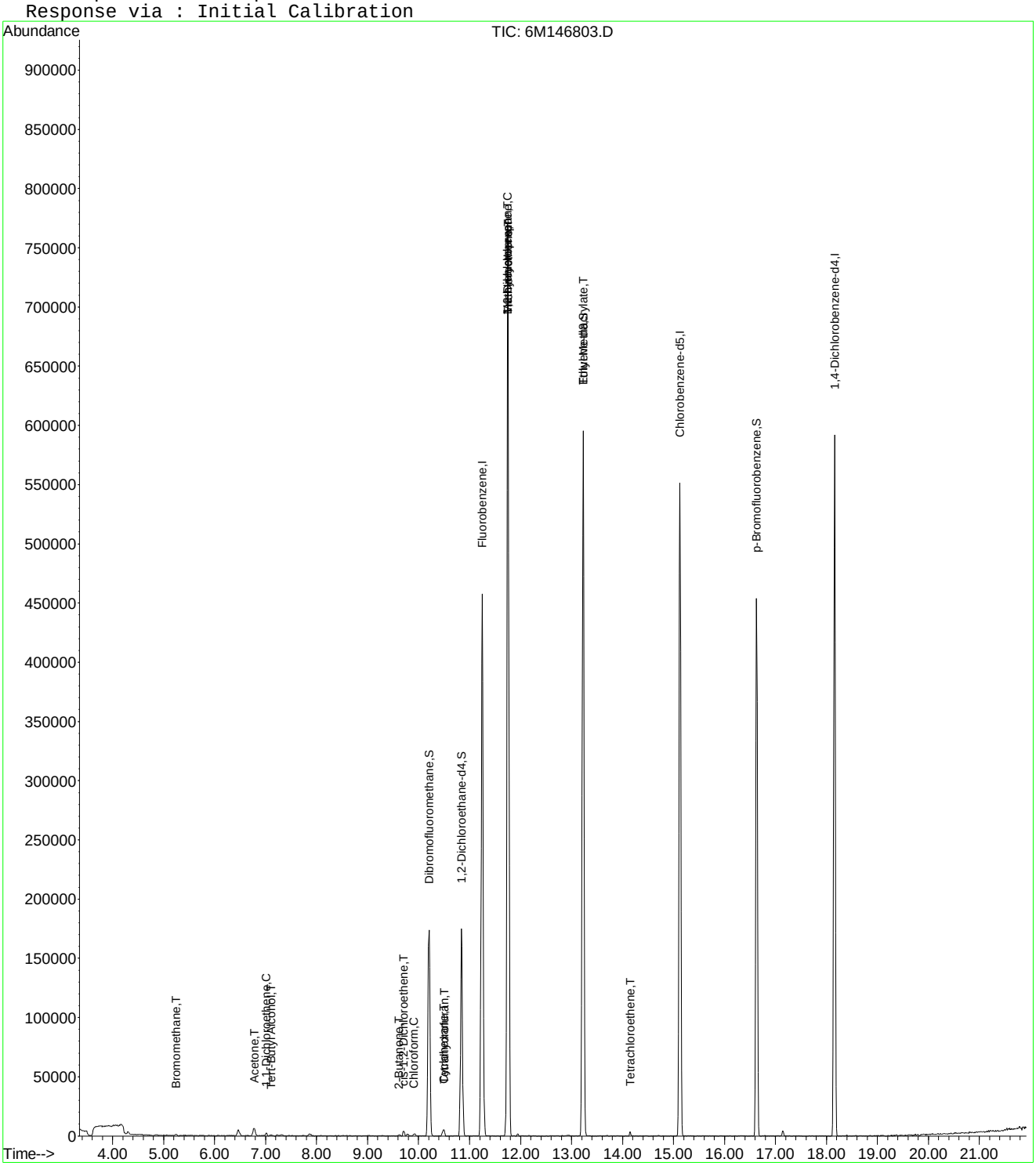
Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

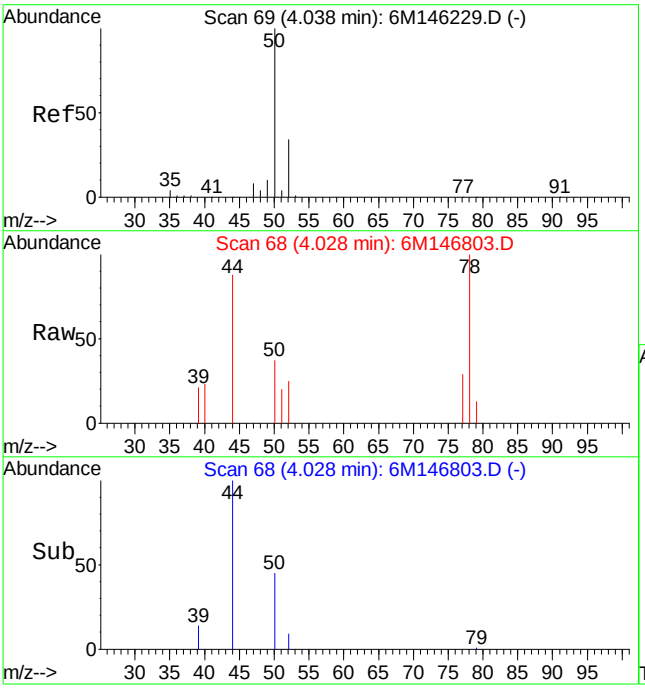
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	585227	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	404726	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	201209	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	152088	25.4576 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.84%		
43) 1,2-Dichloroethane-d4	10.84	65	158139	26.8577 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.44%		
58) Toluene-d8	13.23	98	552639	26.7593 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.04%		
80) p-Bromofluorobenzene	16.63	95	209967	27.4754 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.92%		
Target Compounds					Qvalue
3) Chloromethane	4.03	50	1513	Below Cal #	42
6) Bromomethane	5.24	94	1149	0.2507 ug/L	89
13) Acetone	6.77	43	12811	10.1444 ug/L	93
14) 1,1-Dichloroethene	7.01	61	2409	0.2700 ug/L	97
15) Tert-Butyl Alcohol	7.11	59	1254	3.2013 ug/L #	57
29) 2-Butanone	9.61	43	2100	1.3194 ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	2797	0.3962 ug/L	70
33) Chloroform	9.91	83	2725	0.2249 ug/L #	66
36) Tetrahydrofuran	10.50	42	394	0.3759 ug/L #	41
39) Cyclohexane	10.49	56	4548	0.4992 ug/L	84
47) Trichloroethene	11.76	130	342687	50.2796 ug/L	93
48) Methylcyclohexane	11.75	83	4450	0.4519 ug/L #	1
49) 1,2-Dichloropropane	11.75	63	1144	0.1936 ug/L #	35
60) Ethyl Methacrylate	13.23	69	1203	0.1965 ug/L	81
66) Tetrachloroethene	14.16	166	1621	0.2644 ug/L	86

(#) = qualifier out of range (m) = manual integration
6M146803.D 8260BWT.M Sat Apr 29 12:16:08 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146803.D Vial: 7
Acq On : 28 Apr 2017 9:28 Operator: TMB
Sample : L17041110-09 B 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 9:50 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

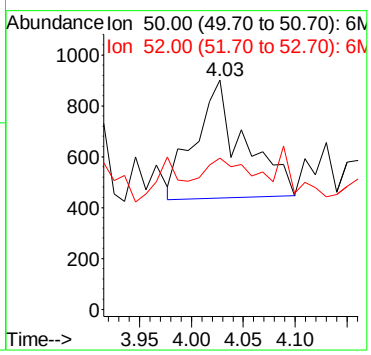


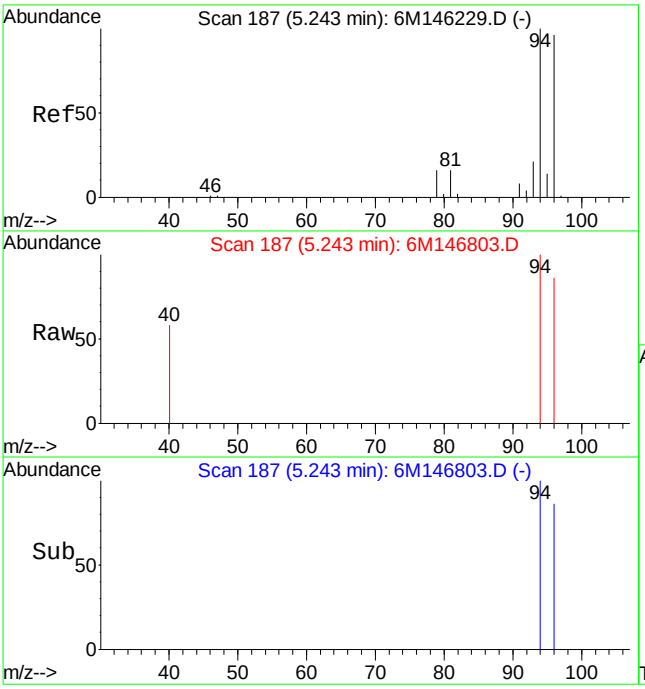


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 50 Resp: 1513

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

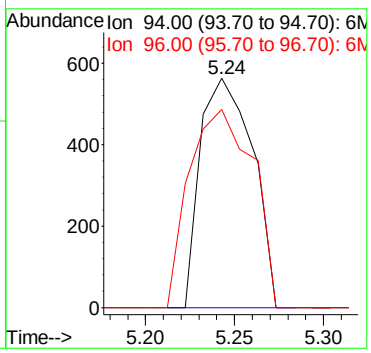


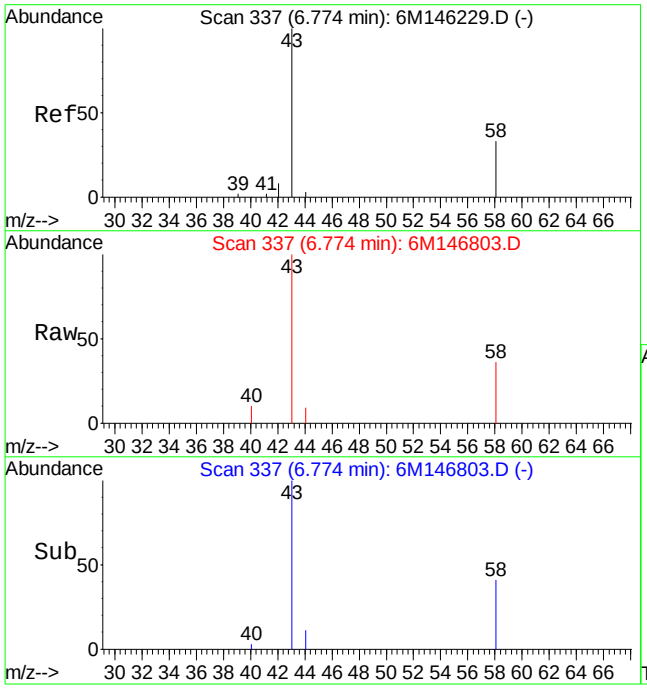


#6
Bromomethane
Concen: 0.25 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 94 Resp: 1149

Ion	Ratio	Lower	Upper
94	100		
96	105.5	56.7	132.3

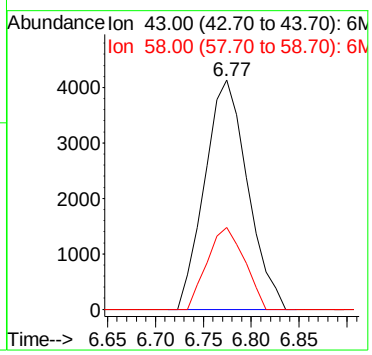


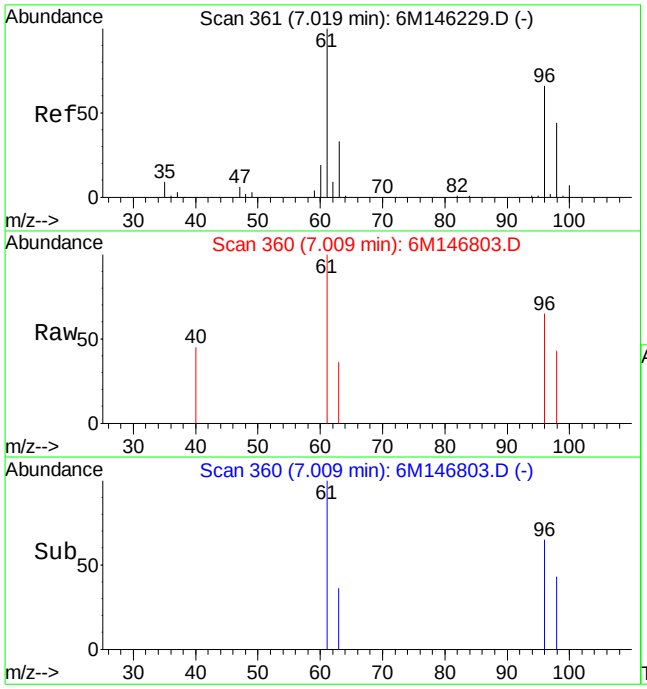


#13
Acetone
Concen: 10.14 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 43 Resp: 12811

Ion	Ratio	Lower	Upper
43	100		
58	31.0	16.4	38.2

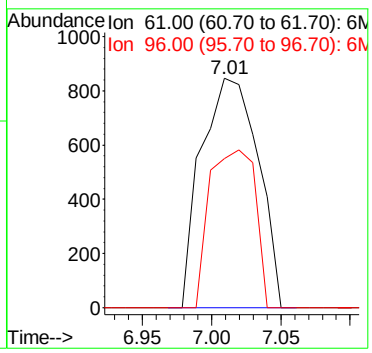


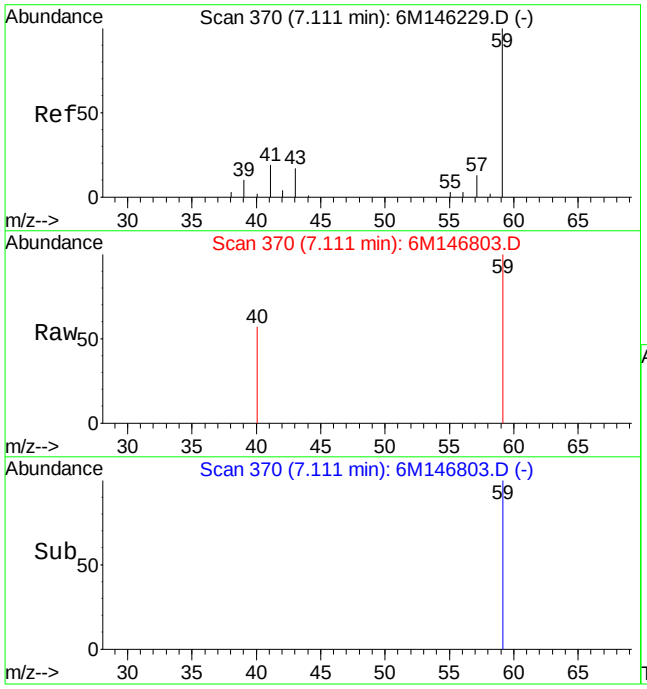


#14
1,1-Dichloroethene
Concen: 0.27 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 61 Resp: 2409

Ion	Ratio	Lower	Upper
61	100		
96	55.3	32.0	74.6

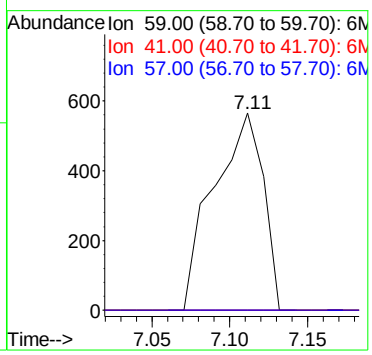


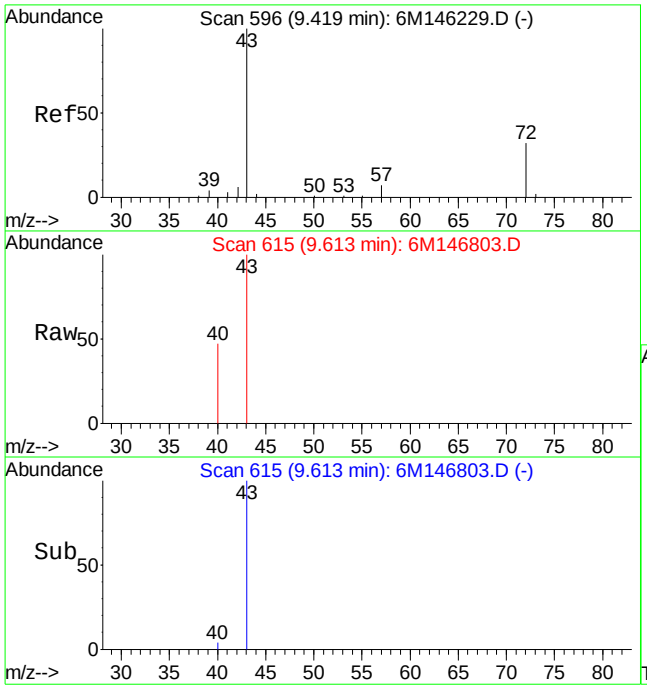


#15
Tert-Butyl Alcohol
Concen: 3.20 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 59 Resp: 1254

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

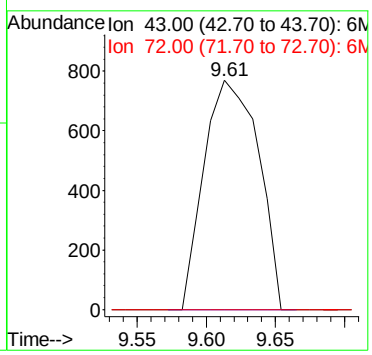


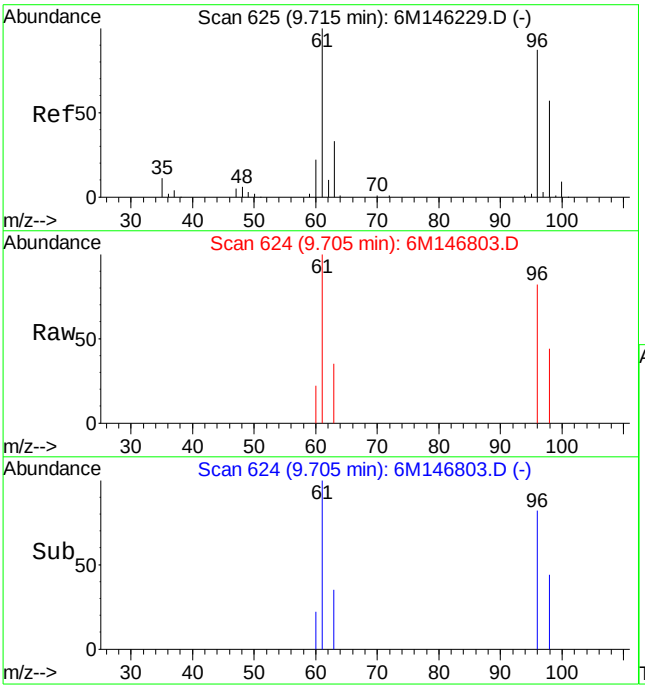


#29
2-Butanone
Concen: 1.32 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 43 Resp: 2100

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

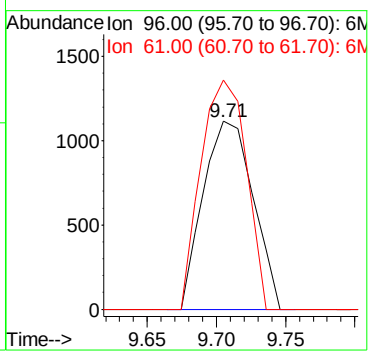


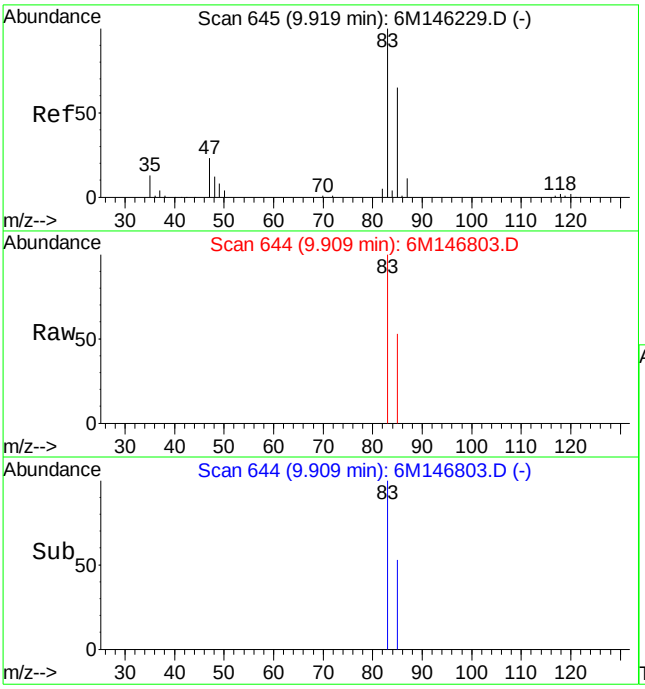


#32
cis-1,2-Dichloroethene
Concen: 0.40 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 96 Resp: 2797

Ion	Ratio	Lower	Upper
96	100		
61	110.6	89.2	208.2

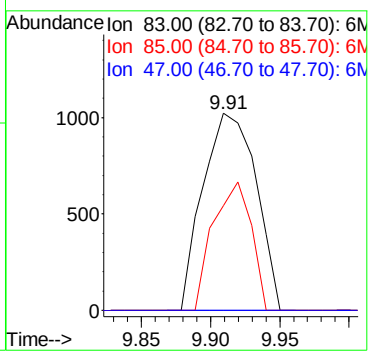


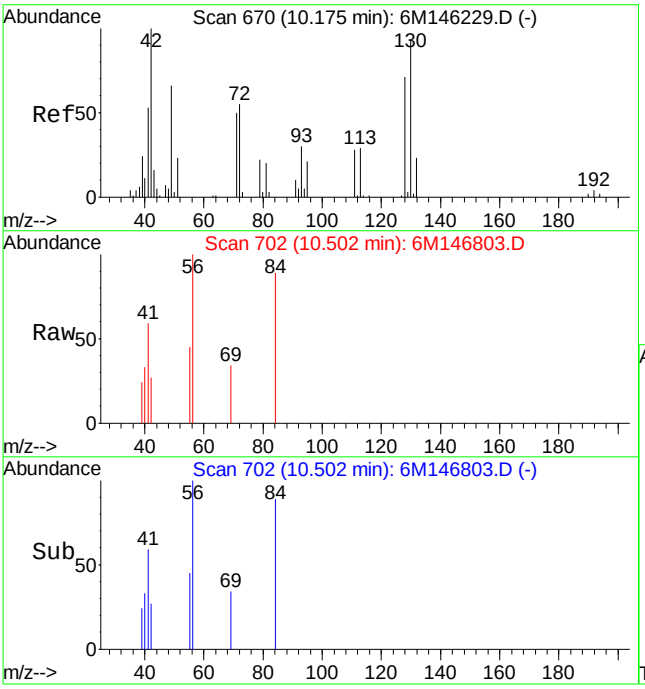


#33
Chloroform
Concen: 0.22 ug/L
RT: 9.91 min Scan# 644
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 83 Resp: 2725

Ion	Ratio	Lower	Upper
83	100		
85	46.7	39.0	91.0
47	0.0	18.5	43.1#

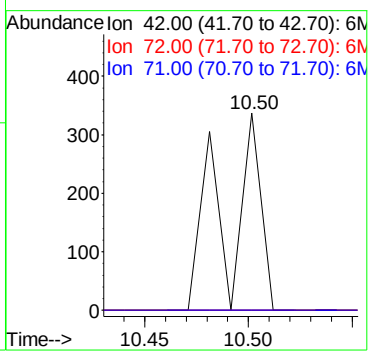


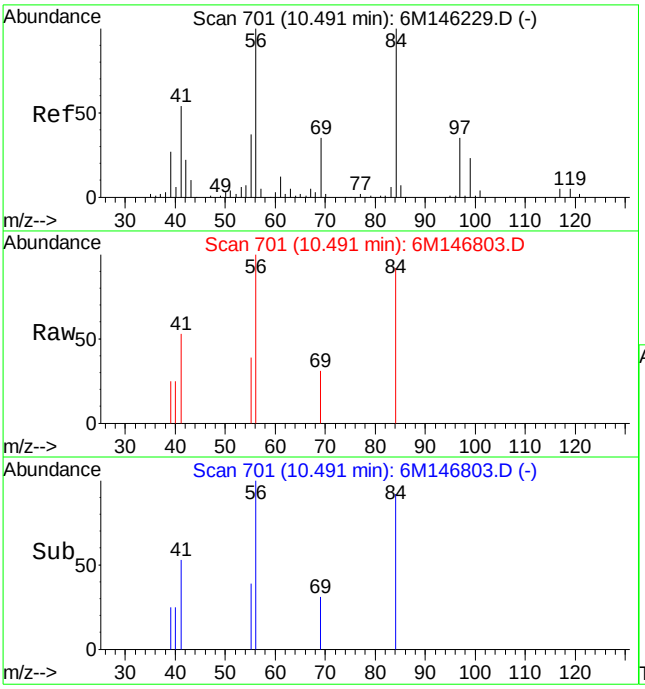


#36
Tetrahydrofuran
Concen: 0.38 ug/L
RT: 10.50 min Scan# 702
Delta R.T. 0.33 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 42 Resp: 394

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

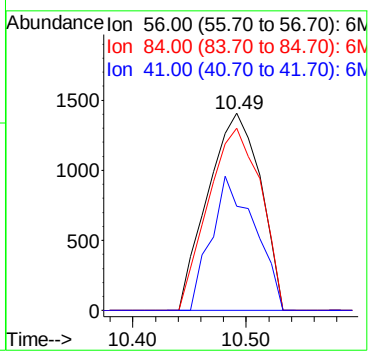


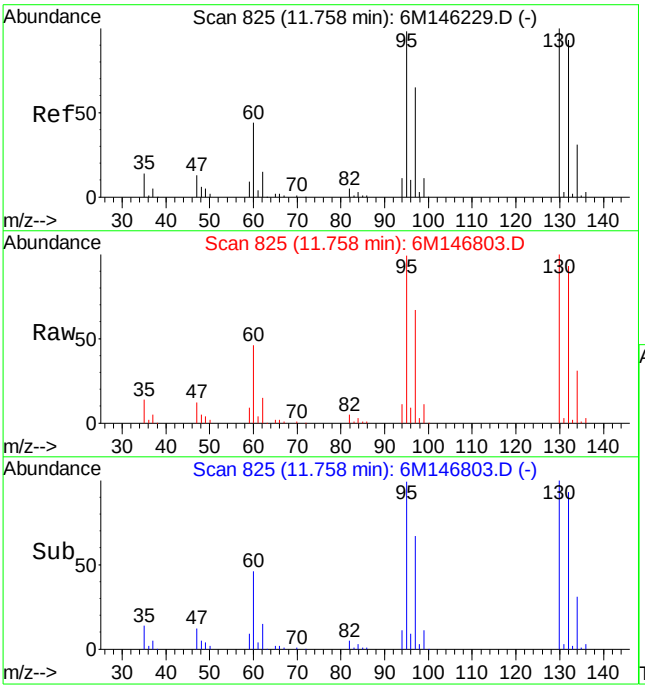


#39
Cyclohexane
Concen: 0.50 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 56 Resp: 4548

Ion	Ratio	Lower	Upper
56	100		
84	92.7	43.6	101.6
41	56.6	37.1	86.5

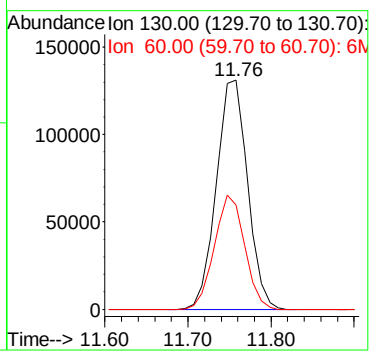


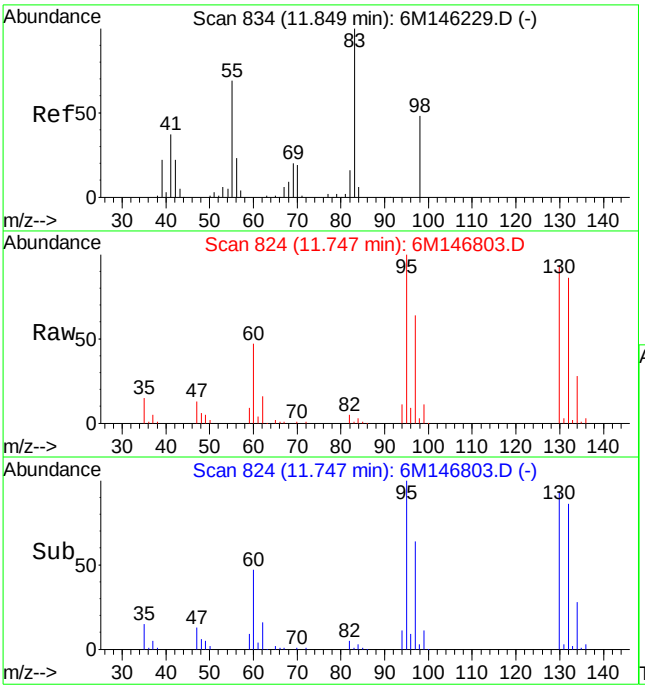


#47
Trichloroethene
Concen: 50.28 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion:130 Resp: 342687

Ion	Ratio	Lower	Upper
130	100		
60	48.3	32.0	74.6

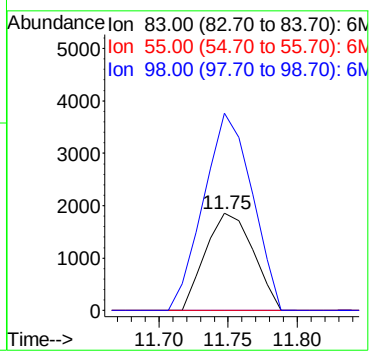


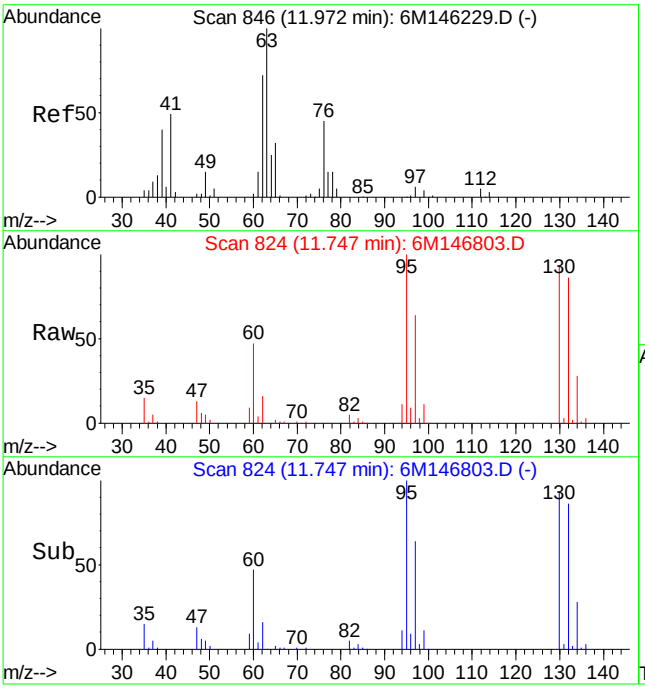


#48
Methylcyclohexane
Concen: 0.45 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.10 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 83 Resp: 4450

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	206.4	28.4	66.4#

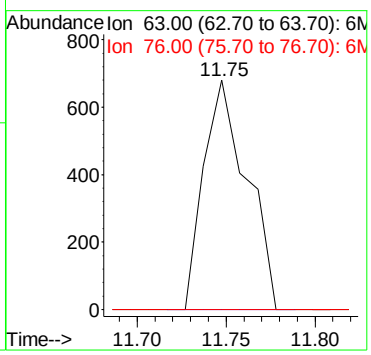


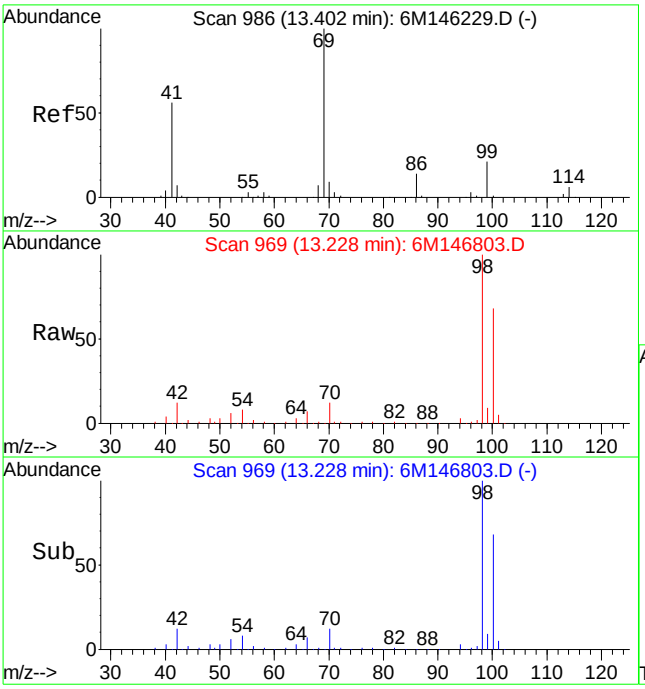


#49
1,2-Dichloropropane
Concen: 0.19 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.23 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 63 Resp: 1144

Ion	Ratio	Lower	Upper
63	100		
76	0.0	24.2	56.4#

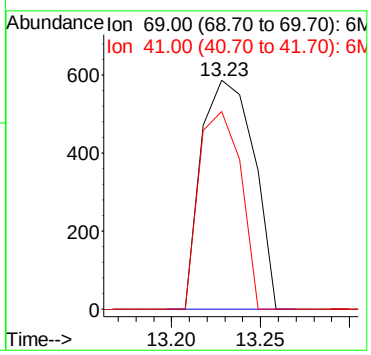


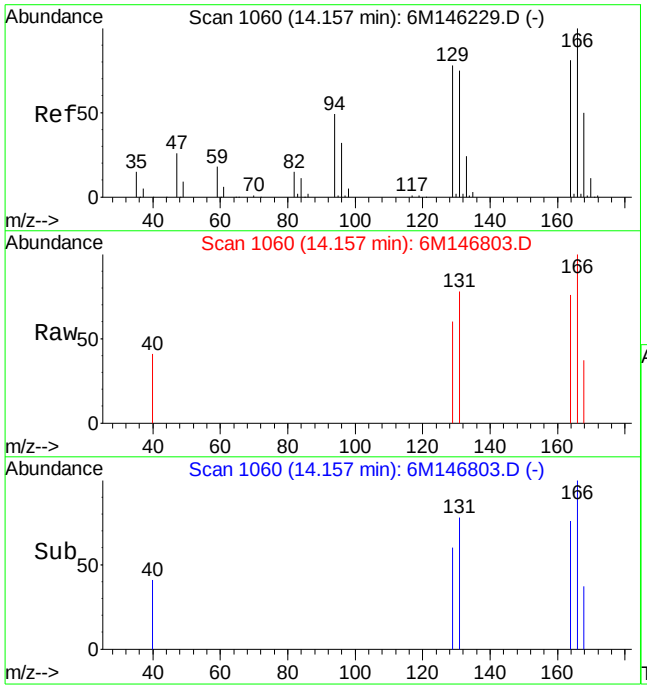


#60
Ethyl Methacrylate
Concen: 0.20 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion: 69 Resp: 1203

Ion	Ratio	Lower	Upper
69	100		
41	68.6	51.4	120.0

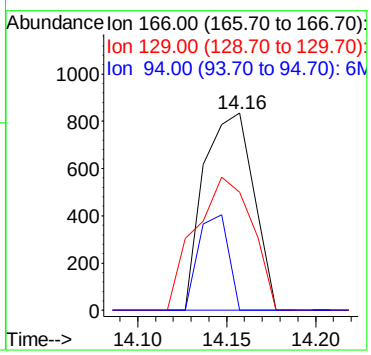




#66
Tetrachloroethene
Concen: 0.26 ug/L
RT: 14.16 min Scan# 1060
Delta R.T. -0.00 min
Lab File: 6M146803.D
Acq: 28 Apr 2017 9:28

Tgt Ion:166 Resp: 1621

Ion	Ratio	Lower	Upper
166	100		
129	77.5	43.5	101.5
94	29.1	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419221.D Vial: 22
Acq On : 27 Apr 2017 21:57 Operator: TMB
Sample : L17041110-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 22:19:46 2017 Quant Results File: 8260WT.RES

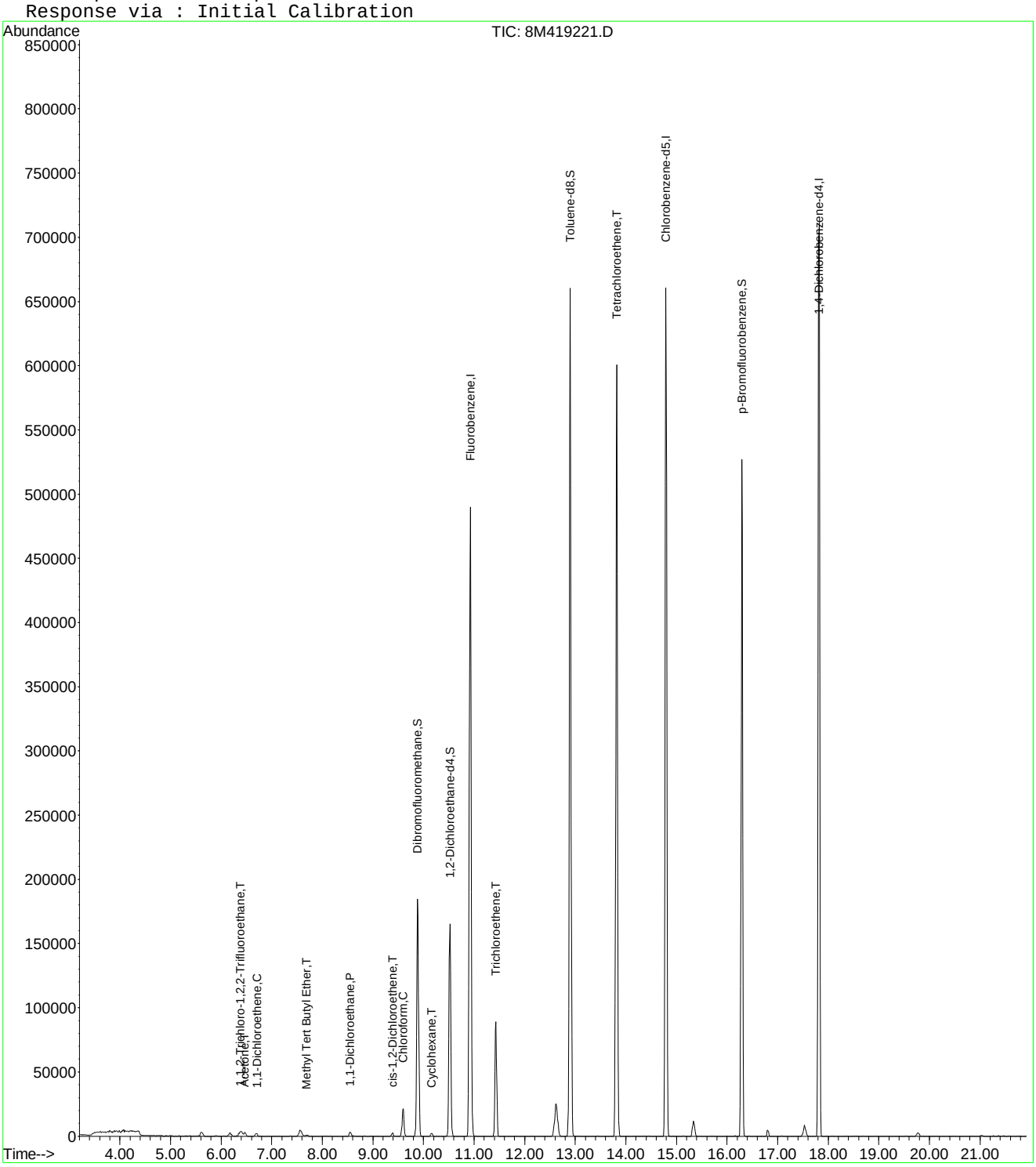
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

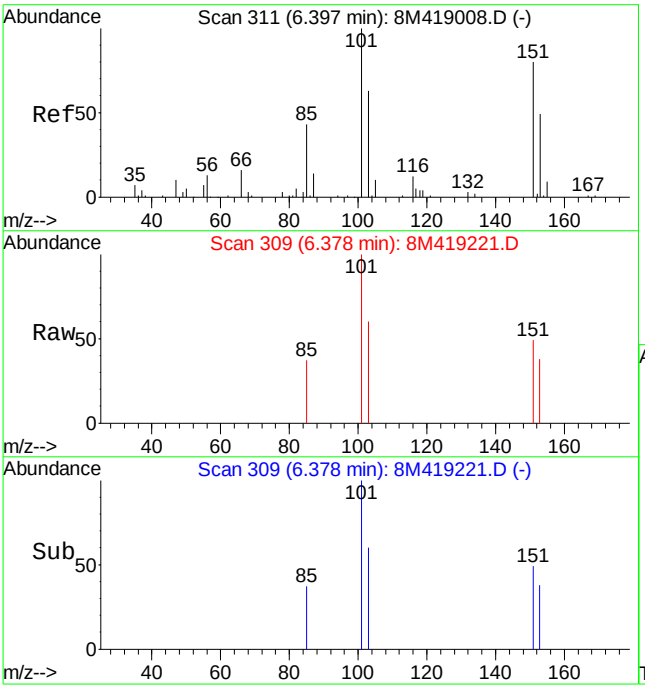
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	591099	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	481327	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	242317	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	156837	25.2966	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.20%			
43) 1,2-Dichloroethane-d4	10.52	65	139435	26.0146	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.04%			
58) Toluene-d8	12.90	98	587157	26.6978	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%			
80) p-Bromofluorobenzene	16.29	95	225702	26.3914	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.56%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	5453	0.9322	ug/L	60
13) Acetone	6.46	43	5451	6.5569	ug/L	89
14) 1,1-Dichloroethene	6.71	61	3187	0.3723	ug/L	75
22) Methyl Tert Butyl Ether	7.69	73	2709	0.2235	ug/L #	58
27) 1,1-Dichloroethane	8.55	63	6503	0.6067	ug/L #	87
32) cis-1,2-Dichloroethene	9.39	96	1742	0.2530	ug/L	100
33) Chloroform	9.59	83	25010	2.1058	ug/L	98
39) Cyclohexane	10.16	56	2023	0.2267	ug/L #	68
47) Trichloroethene	11.43	130	38773	5.6522	ug/L	97
66) Tetrachloroethene	13.82	164	178510	31.7192	ug/L	95

(#) = qualifier out of range (m) = manual integration
8M419221.D 8260WT.M Fri Apr 28 06:56:59 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419221.D Vial: 22
Acq On : 27 Apr 2017 21:57 Operator: TMB
Sample : L17041110-10 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 22:19 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

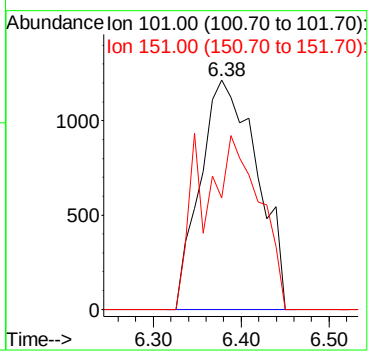


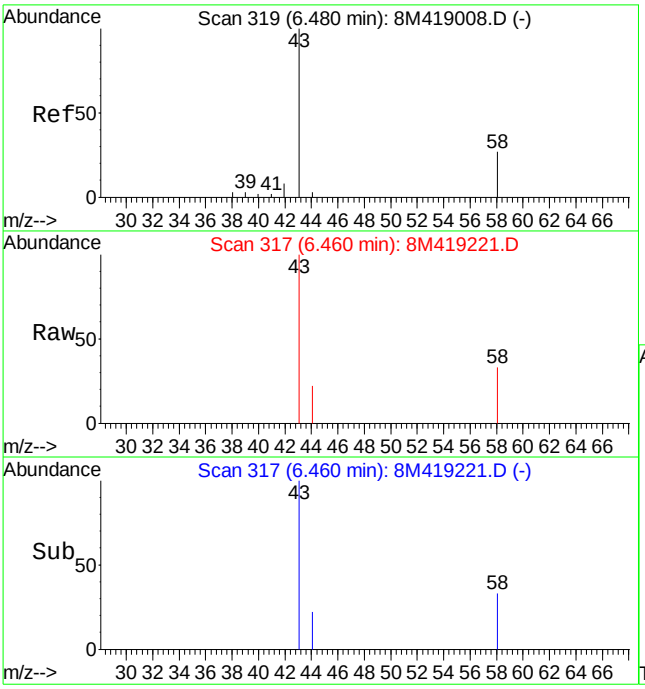


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.93 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion:101 Resp: 5453

Ion	Ratio	Lower	Upper
101	100		
151	44.3	39.9	119.9

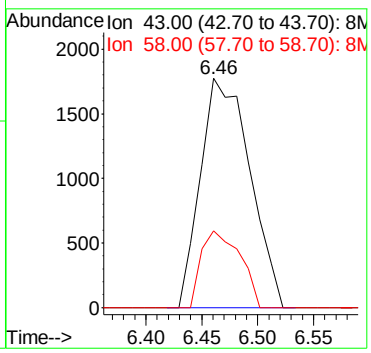


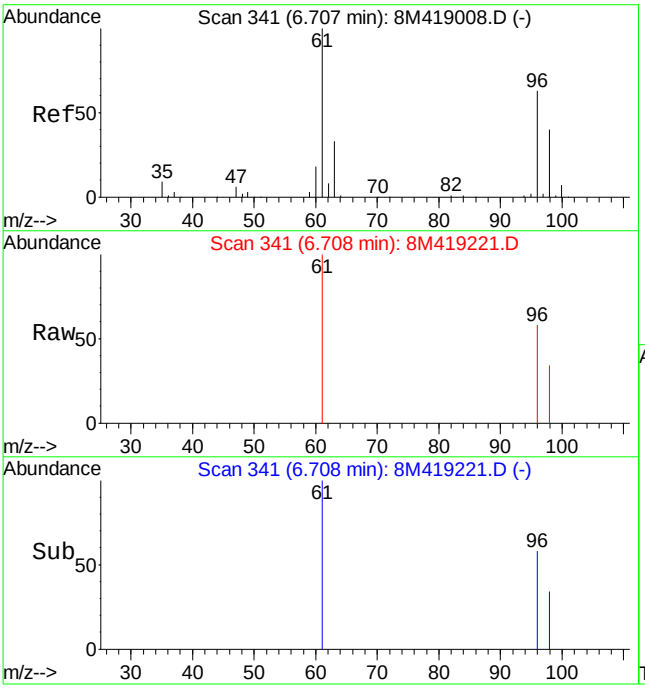


#13
Acetone
Concen: 6.56 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 43 Resp: 5451

Ion	Ratio	Lower	Upper
43	100		
58	26.3	19.4	45.4

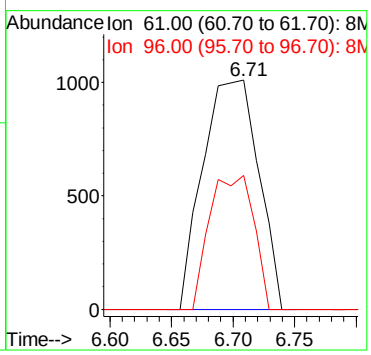


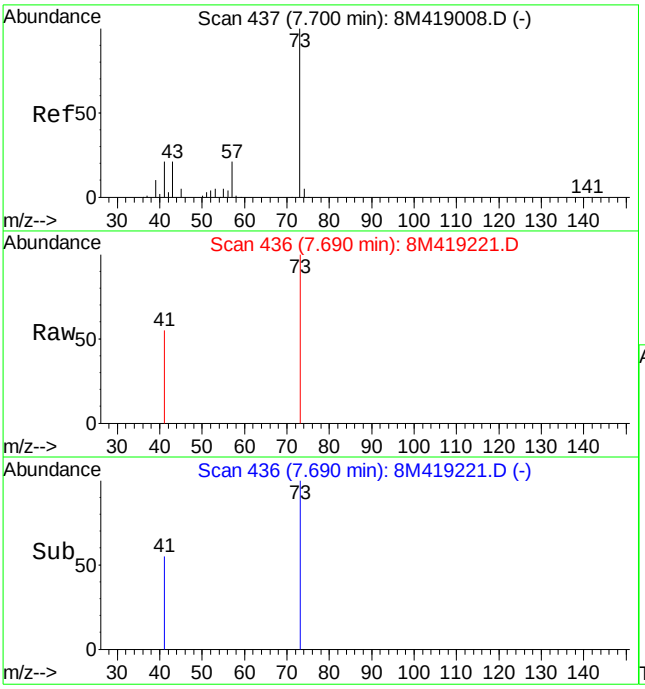


#14
1,1-Dichloroethene
Concen: 0.37 ug/L
RT: 6.71 min Scan# 341
Delta R.T. 0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 61 Resp: 3187

Ion	Ratio	Lower	Upper
61	100		
96	46.3	40.0	93.4

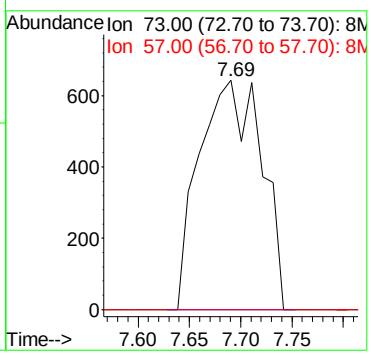


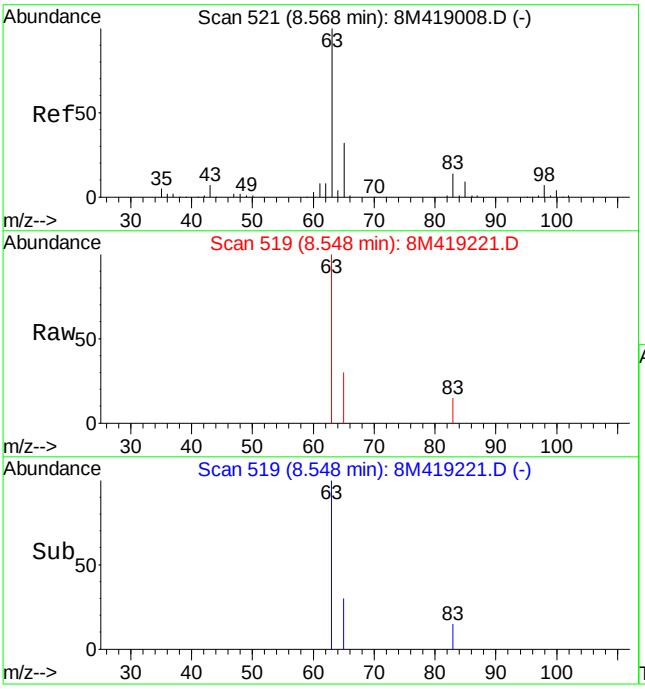


#22
Methyl Tert Butyl Ether
Concen: 0.22 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 73 Resp: 2709

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

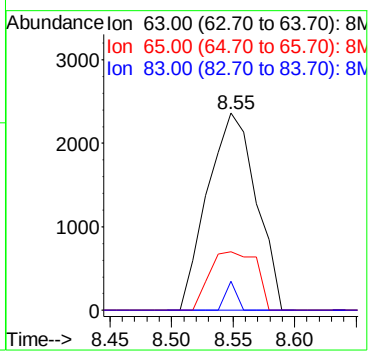


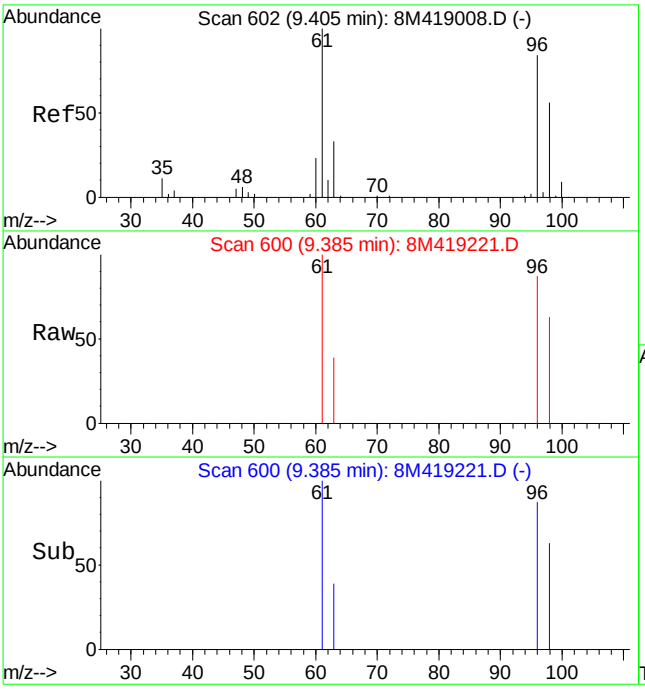


#27
1,1-Dichloroethane
Concen: 0.61 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 63 Resp: 6503

Ion	Ratio	Lower	Upper
63	100		
65	28.6	19.1	44.7
83	3.3	9.0	21.0#

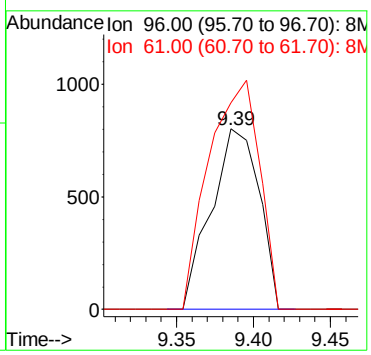


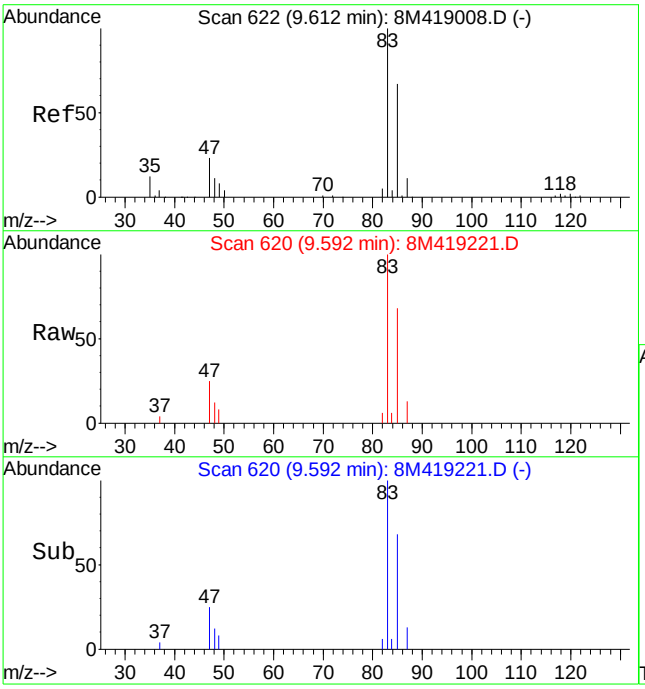


#32
cis-1,2-Dichloroethene
Concen: 0.25 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 96 Resp: 1742

Ion	Ratio	Lower	Upper
96	100		
61	133.9	80.3	187.3

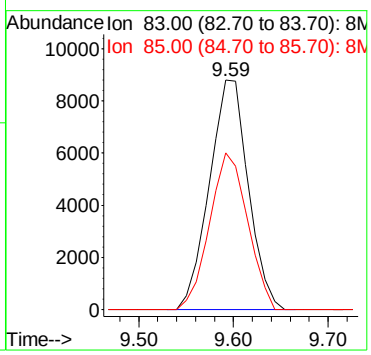


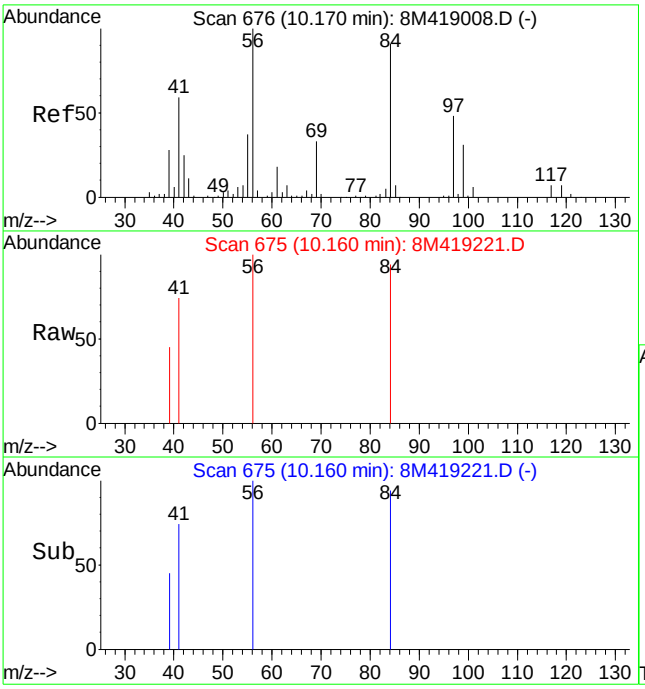


#33
Chloroform
Concen: 2.11 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 83 Resp: 25010

Ion	Ratio	Lower	Upper
83	100		
85	66.6	39.1	91.3

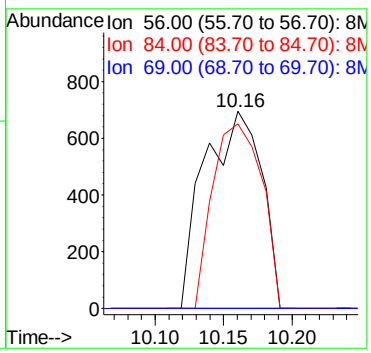


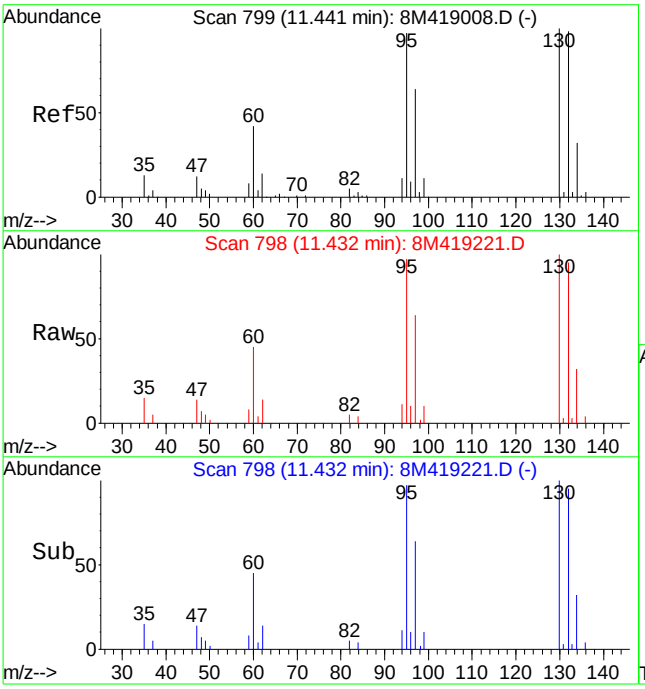


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion: 56 Resp: 2023

Ion	Ratio	Lower	Upper
56	100		
84	80.4	61.6	143.8
69	0.0	21.4	50.0#

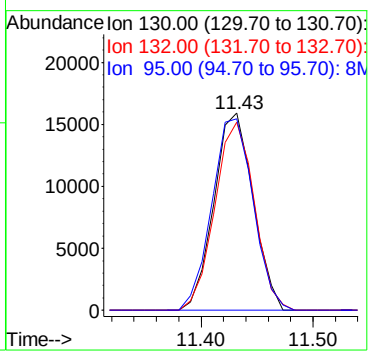


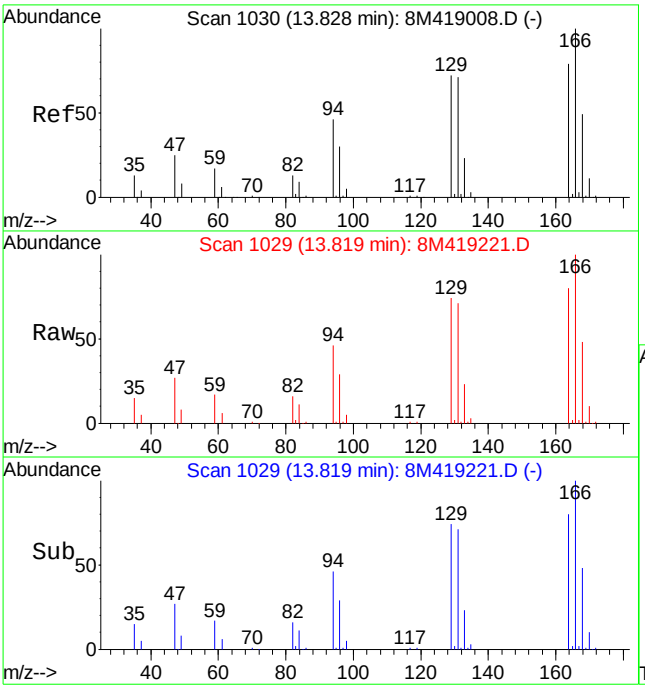


#47
Trichloroethene
Concen: 5.65 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion:130 Resp: 38773

Ion	Ratio	Lower	Upper
130	100		
132	96.0	59.4	138.6
95	102.4	60.1	140.3

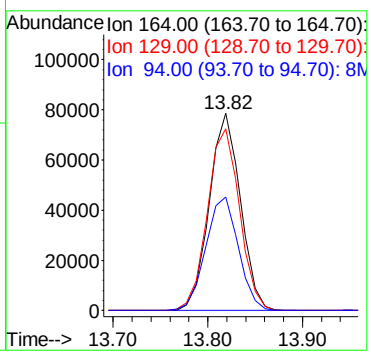




#66
Tetrachloroethene
Concen: 31.72 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419221.D
Acq: 27 Apr 2017 21:57

Tgt Ion:164 Resp: 178510

Ion	Ratio	Lower	Upper
164	100		
129	95.1	53.4	124.6
94	60.4	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419210.D Vial: 11
Acq On : 27 Apr 2017 16:25 Operator: TMB
Sample : L17041110-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:47:52 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

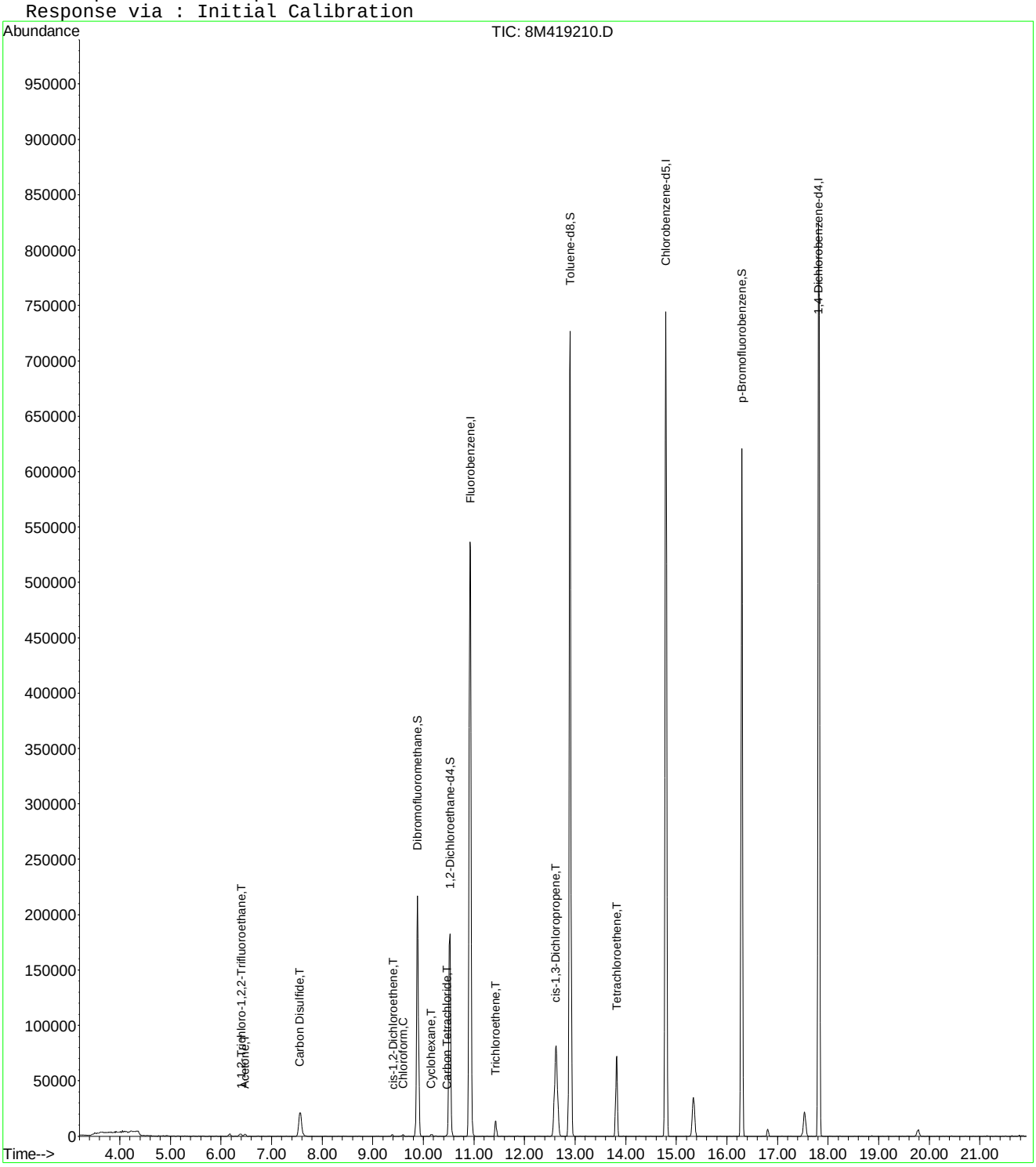
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	681751	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	550552	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	279133	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	180489	25.2405	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.96%			
43) 1,2-Dichloroethane-d4	10.52	65	159009	25.7218	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.88%			
58) Toluene-d8	12.90	98	670043	26.6358	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.56%			
80) p-Bromofluorobenzene	16.29	95	257382	26.1263	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.52%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	2648	0.3925	ug/L	74
13) Acetone	6.47	43	3273	3.4135	ug/L	79
20) Carbon Disulfide	7.56	76	4944	0.2408	ug/L #	74
32) cis-1,2-Dichloroethene	9.40	96	1117	0.1407	ug/L	83
33) Chloroform	9.59	83	1922	0.1403	ug/L	93
39) Cyclohexane	10.15	56	1755	0.1705	ug/L #	65
42) Carbon Tetrachloride	10.46	117	1545	0.1507	ug/L #	90
47) Trichloroethene	11.42	130	6893	0.8712	ug/L	98
55) cis-1,3-Dichloropropene	12.61	75	2482	0.2421	ug/L #	42
66) Tetrachloroethene	13.82	164	23405	3.6359	ug/L	95

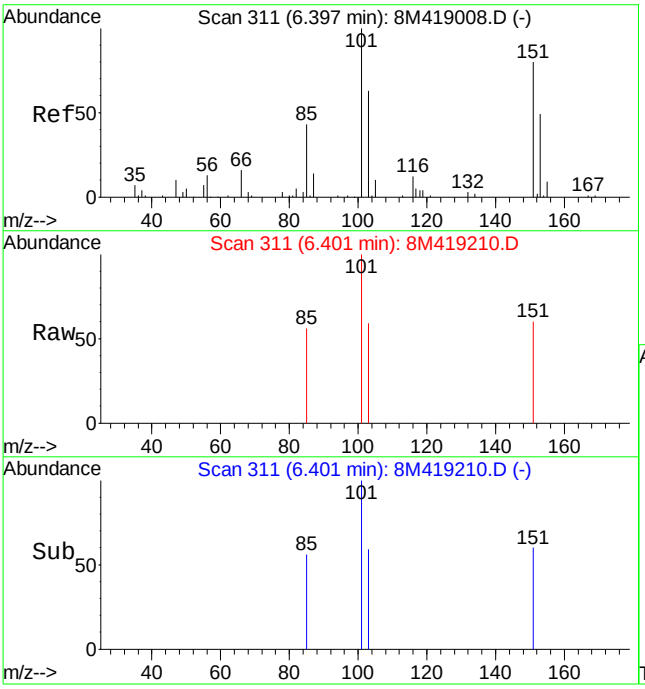
(#) = qualifier out of range (m) = manual integration
8M419210.D 8260WT.M Fri Apr 28 06:56:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419210.D Vial: 11
Acq On : 27 Apr 2017 16:25 Operator: TMB
Sample : L17041110-11 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:47 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

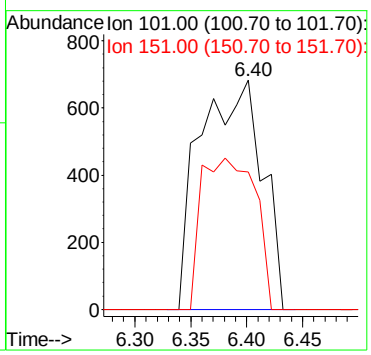


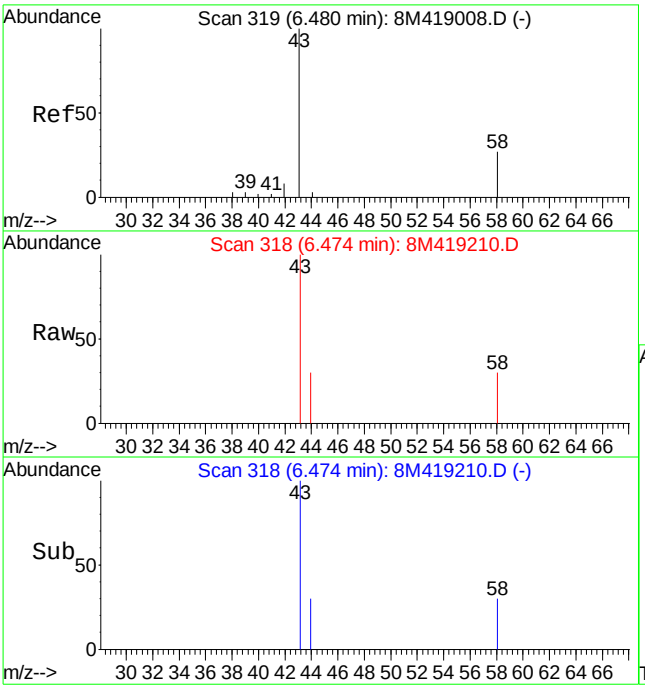


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.39 ug/L
RT: 6.40 min Scan# 311
Delta R.T. 0.00 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion:101 Resp: 2648

Ion	Ratio	Lower	Upper
101	100		
151	57.1	39.9	119.9

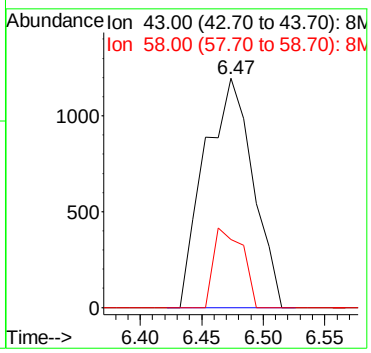


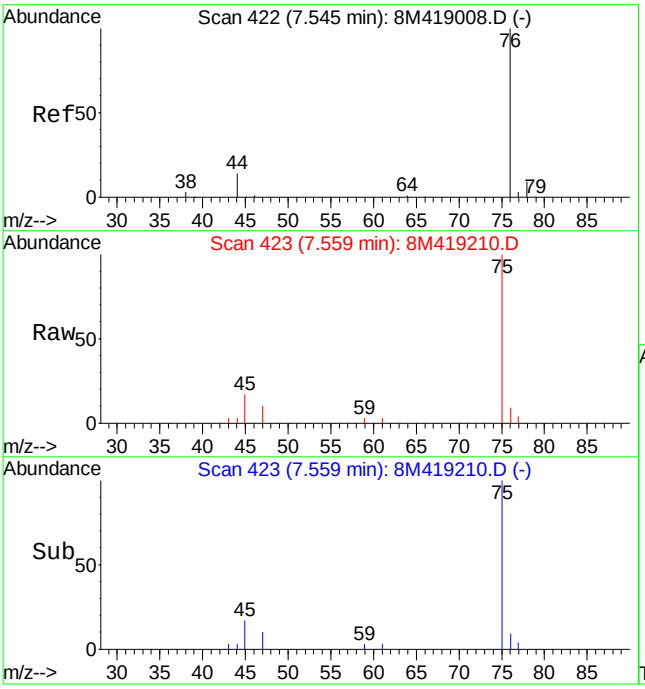


#13
Acetone
Concen: 3.41 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 43 Resp: 3273

Ion	Ratio	Lower	Upper
43	100		
58	20.7	19.4	45.4

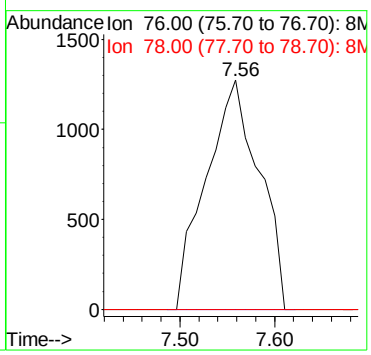


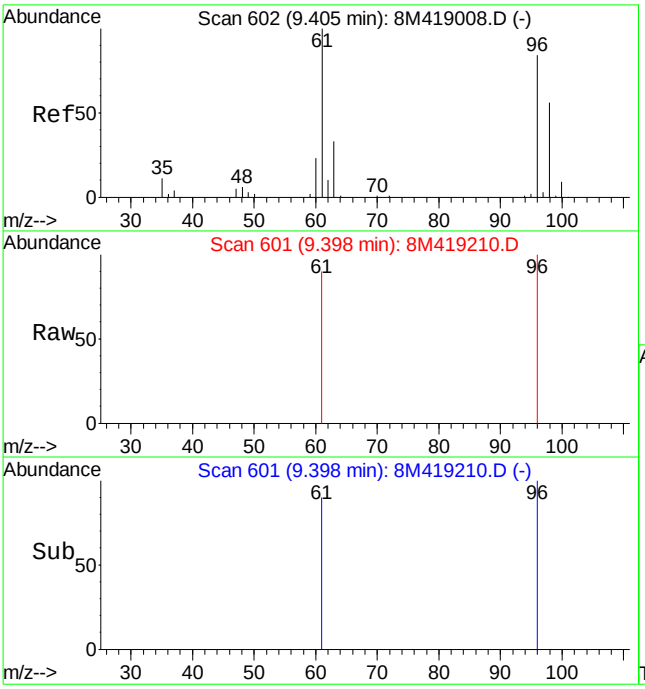


#20
Carbon Disulfide
Concen: 0.24 ug/L
RT: 7.56 min Scan# 423
Delta R.T. 0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 76 Resp: 4944

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#

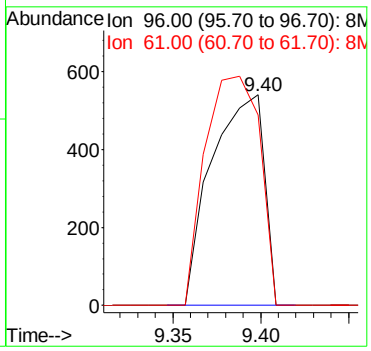


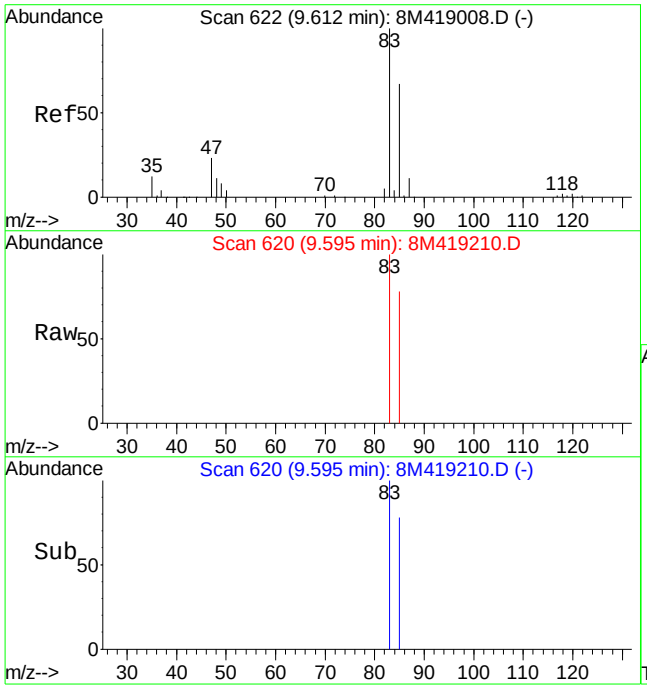


#32
cis-1,2-Dichloroethene
Concen: 0.14 ug/L
RT: 9.40 min Scan# 601
Delta R.T. -0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 96 Resp: 1117

Ion	Ratio	Lower	Upper
96	100		
61	113.3	80.3	187.3

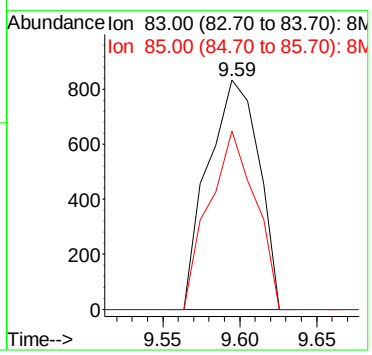


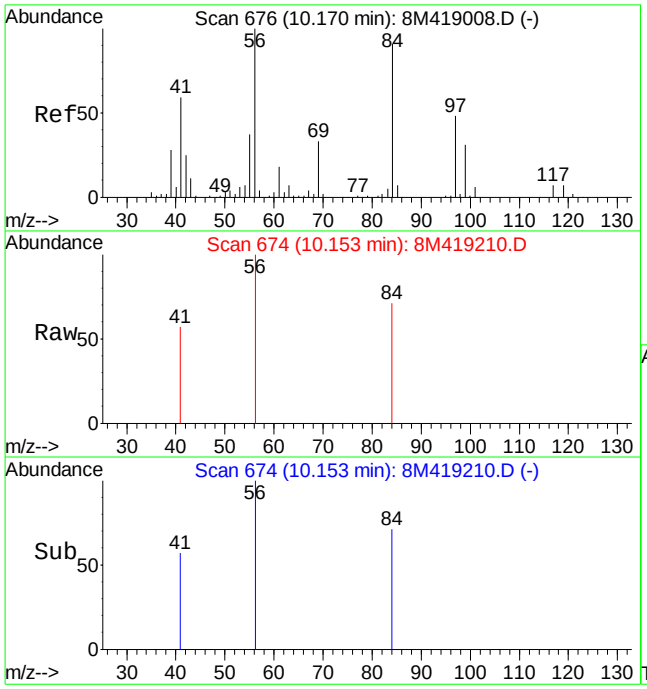


#33
Chloroform
Concen: 0.14 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 83 Resp: 1922

Ion	Ratio	Lower	Upper
83	100		
85	70.7	39.1	91.3

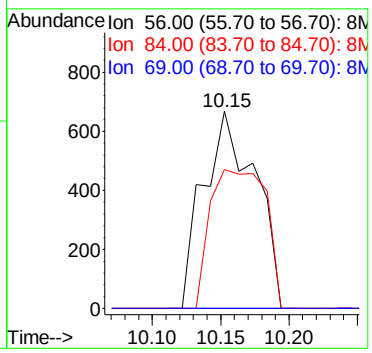


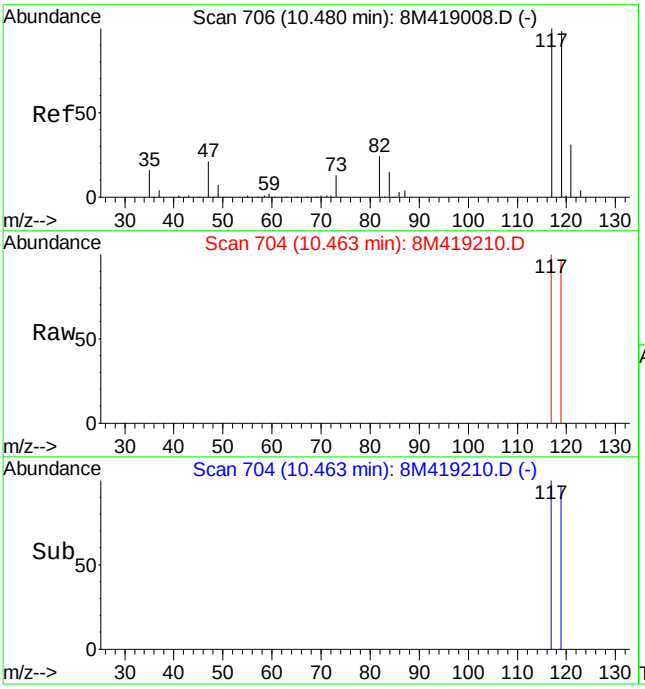


#39
Cyclohexane
Concen: 0.17 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 56 Resp: 1755

Ion	Ratio	Lower	Upper
56	100		
84	75.8	61.6	143.8
69	0.0	21.4	50.0#

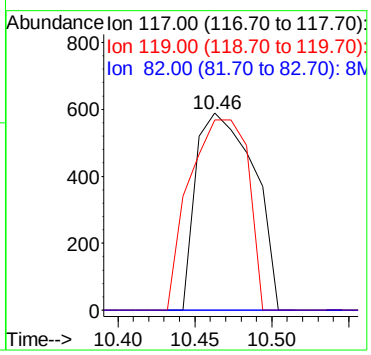


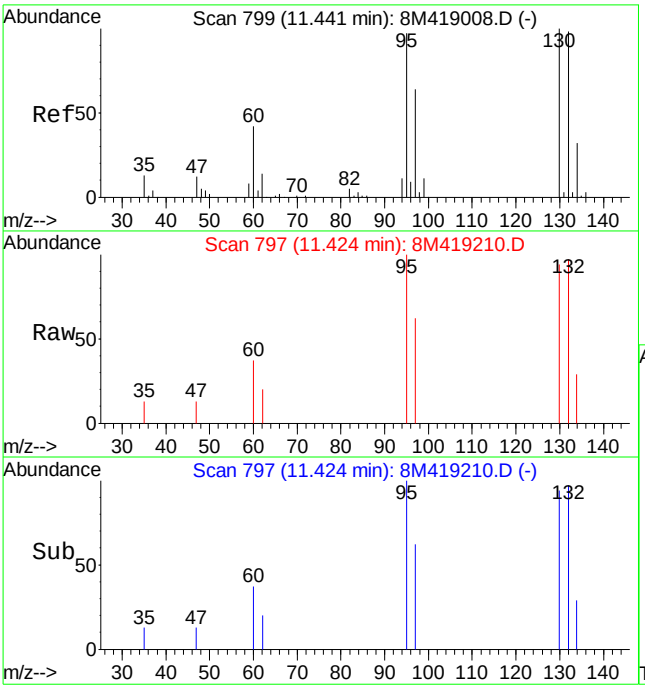


#42
Carbon Tetrachloride
Concen: 0.15 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion:117 Resp: 1545

Ion	Ratio	Lower	Upper
117	100		
119	97.8	58.5	136.5
82	0.0	14.9	34.9#

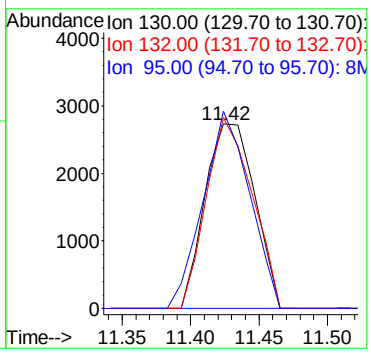


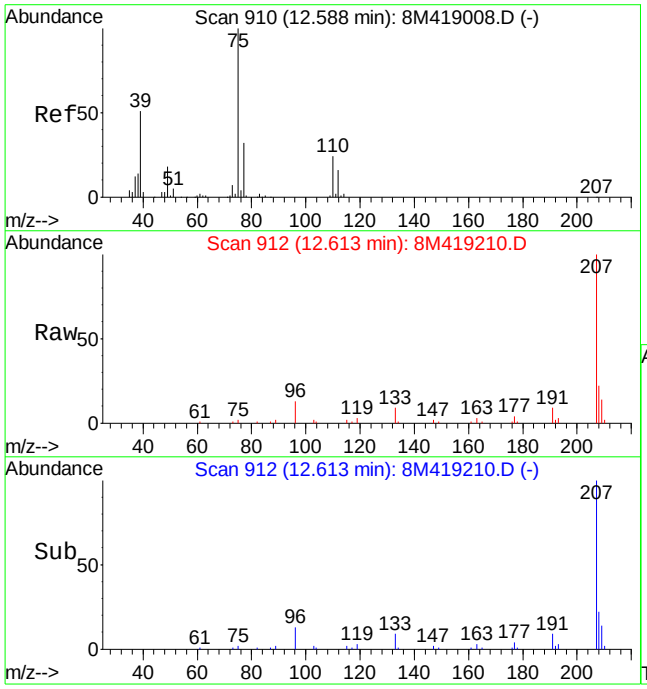


#47
Trichloroethene
Concen: 0.87 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion:130 Resp: 6893

Ion	Ratio	Lower	Upper
130	100		
132	95.2	59.4	138.6
95	99.5	60.1	140.3

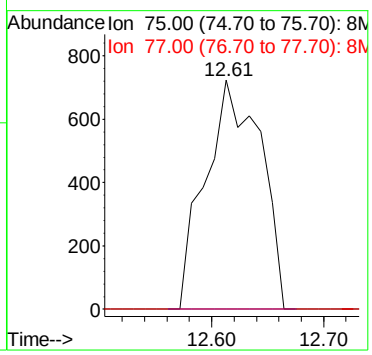


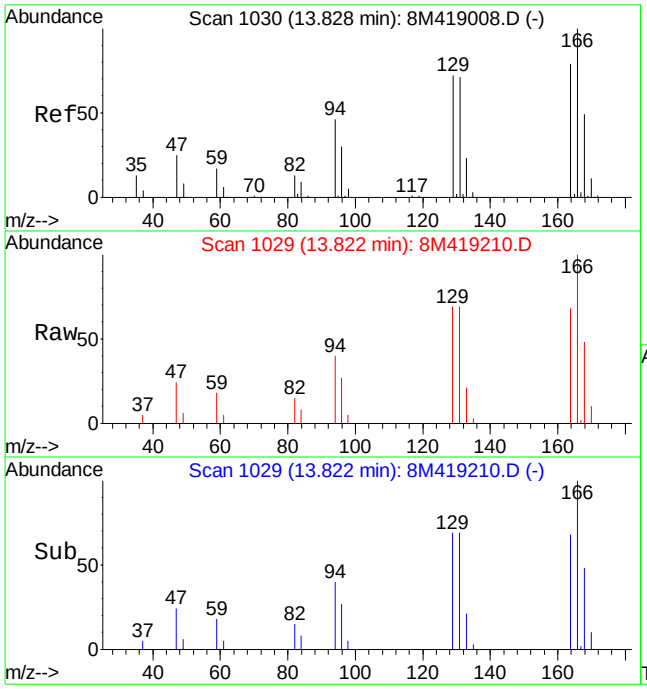


#55
cis-1,3-Dichloropropene
Concen: 0.24 ug/L
RT: 12.61 min Scan# 912
Delta R.T. 0.02 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion: 75 Resp: 2482

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#

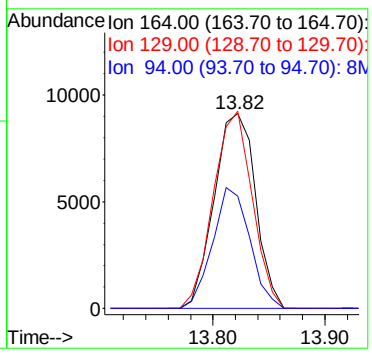




#66
Tetrachloroethene
Concen: 3.64 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419210.D
Acq: 27 Apr 2017 16:25

Tgt Ion:164 Resp: 23405

Ion	Ratio	Lower	Upper
164	100		
129	95.4	53.4	124.6
94	56.0	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146804.D Vial: 8
Acq On : 28 Apr 2017 9:59 Operator: TMB
Sample : L17041110-12 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 10:21:22 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

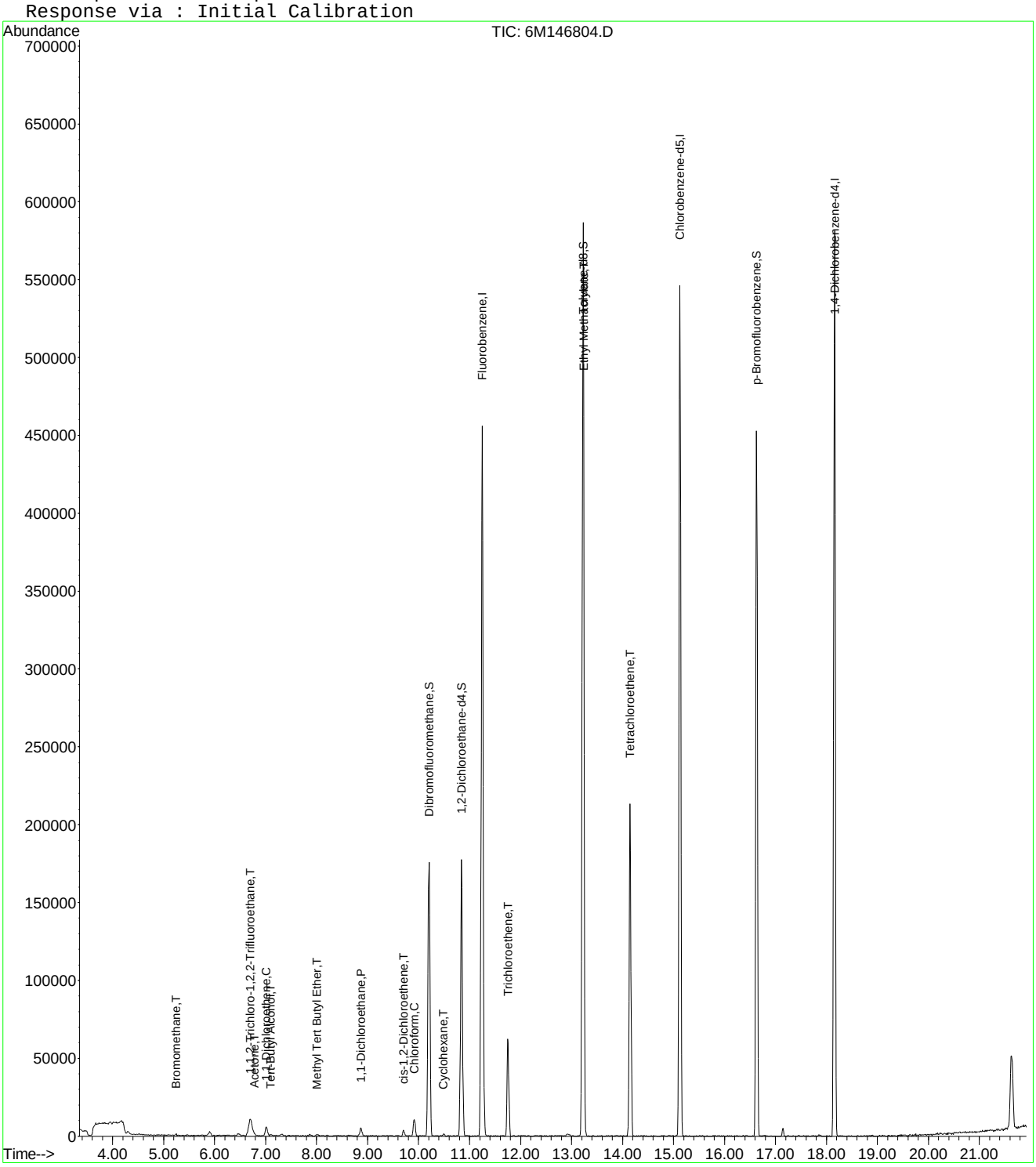
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	581667	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	402218	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	197358	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	151292	25.4793 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.92%		
43) 1,2-Dichloroethane-d4	10.84	65	160352	27.4002 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.60%		
58) Toluene-d8	13.23	98	546012	26.6033 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.40%		
80) p-Bromofluorobenzene	16.63	95	207859	27.7303 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.92%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	1091	Below Cal #	1
6) Bromomethane	5.24	94	786	0.1725 ug/L	92
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	13540	2.2116 ug/L	97
13) Acetone	6.77	43	3424	2.7279 ug/L	98
14) 1,1-Dichloroethene	7.01	61	7913	0.8923 ug/L	90
15) Tert-Butyl Alcohol	7.10	59	1700	4.3664 ug/L #	57
22) Methyl Tert Butyl Ether	8.01	73	2766	0.1881 ug/L #	49
27) 1,1-Dichloroethane	8.87	63	9838	0.9306 ug/L	98
32) cis-1,2-Dichloroethene	9.71	96	2392	0.3409 ug/L	83
33) Chloroform	9.92	83	12600	1.0462 ug/L	93
39) Cyclohexane	10.48	56	1207	0.1333 ug/L #	57
47) Trichloroethene	11.76	130	29263	4.3198 ug/L	90
60) Ethyl Methacrylate	13.24	69	857	0.1408 ug/L	81
66) Tetrachloroethene	14.15	166	82434	13.5279 ug/L	95

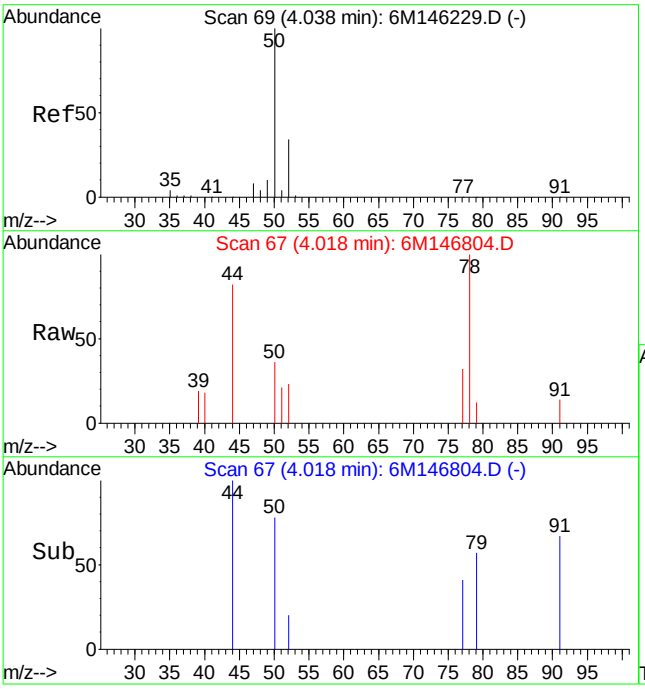
(#) = qualifier out of range (m) = manual integration
6M146804.D 8260BWT.M Sat Apr 29 12:16:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146804.D Vial: 8
Acq On : 28 Apr 2017 9:59 Operator: TMB
Sample : L17041110-12 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 10:21 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

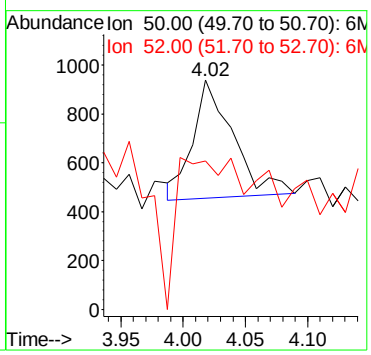


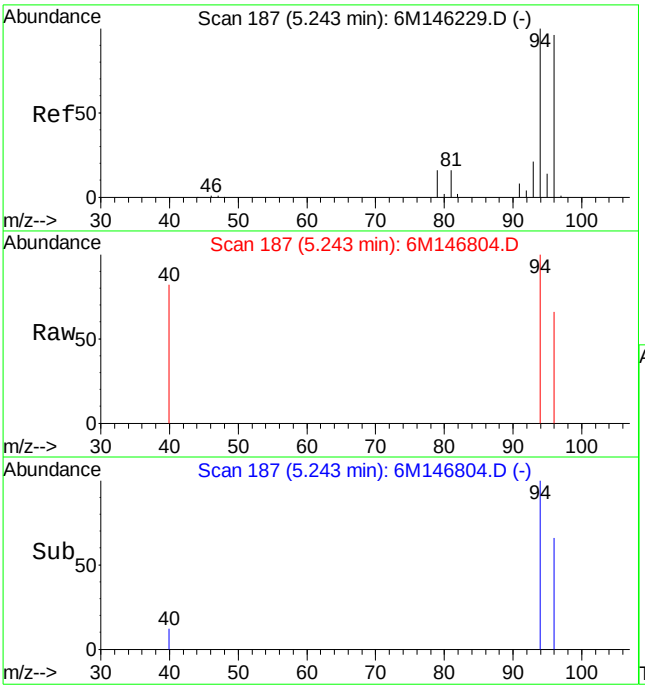


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. -0.00 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 50 Resp: 1091

Ion	Ratio	Lower	Upper
50	100		
52	307.2	19.8	46.2#

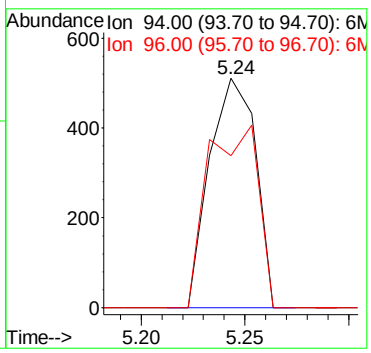


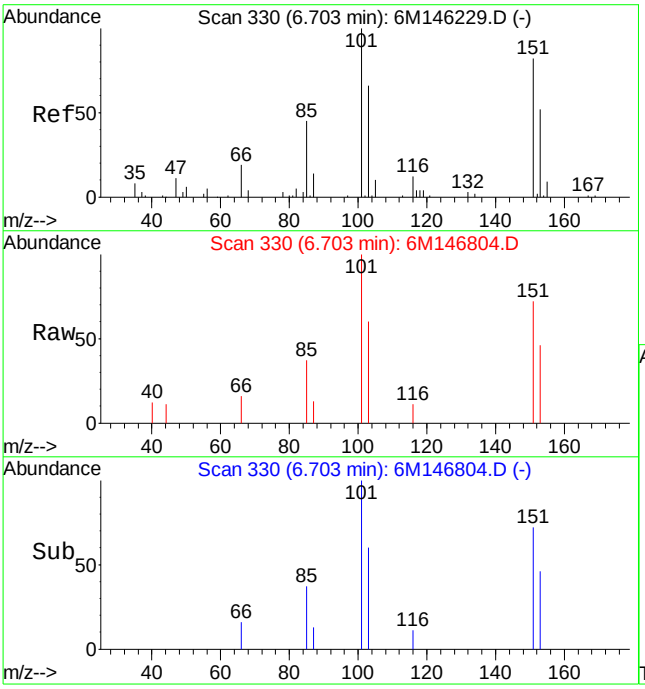


#6
Bromomethane
Concen: 0.17 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 94 Resp: 786

Ion	Ratio	Lower	Upper
94	100		
96	87.2	56.7	132.3

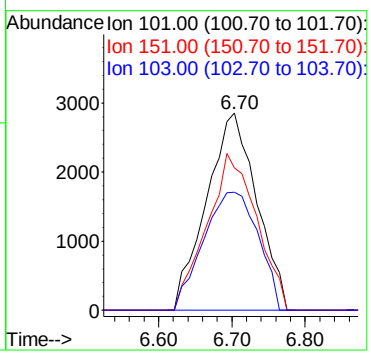


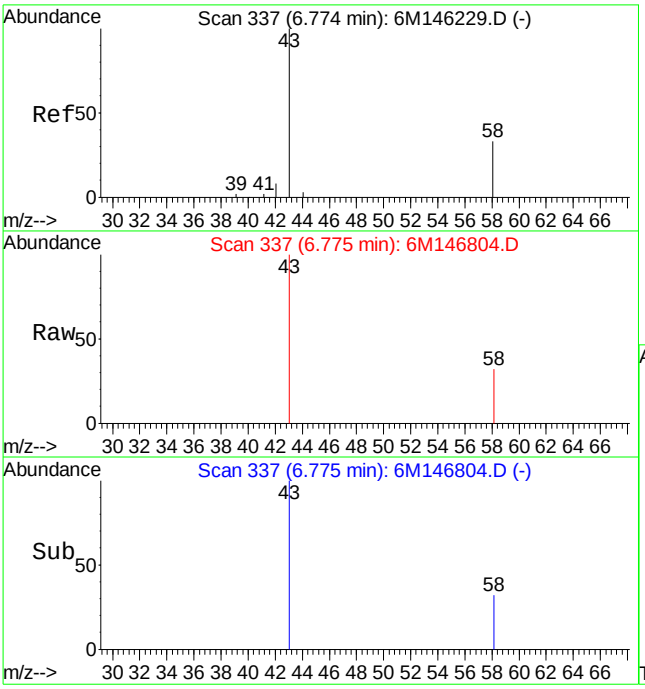


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 2.21 ug/L
RT: 6.70 min Scan# 330
Delta R.T. 0.02 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion:101 Resp: 13540

Ion	Ratio	Lower	Upper
101	100		
151	78.3	49.4	115.2
103	65.2	38.8	90.4

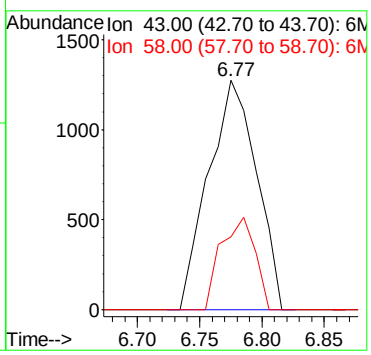


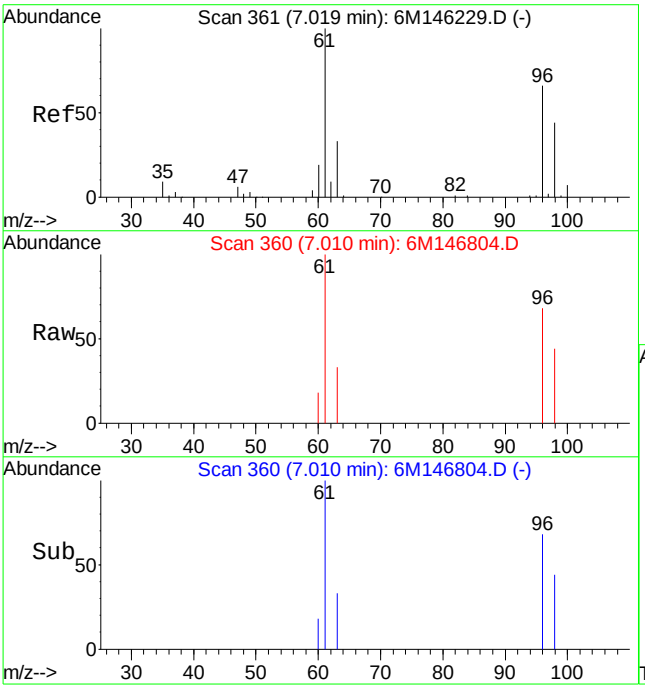


#13
Acetone
Concen: 2.73 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 43 Resp: 3424

Ion	Ratio	Lower	Upper
43	100		
58	28.5	16.4	38.2

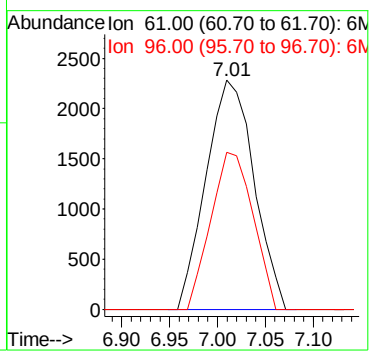


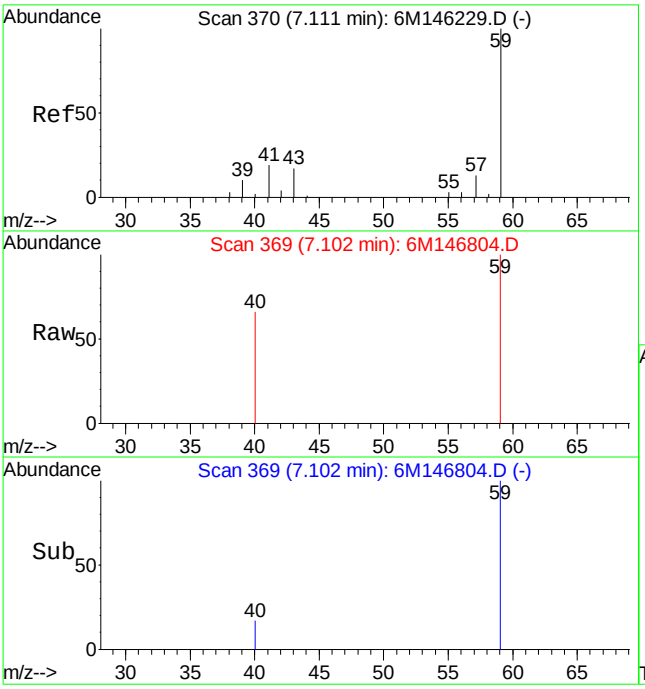


#14
1,1-Dichloroethene
Concen: 0.89 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.00 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 61 Resp: 7913

Ion	Ratio	Lower	Upper
61	100		
96	60.1	32.0	74.6

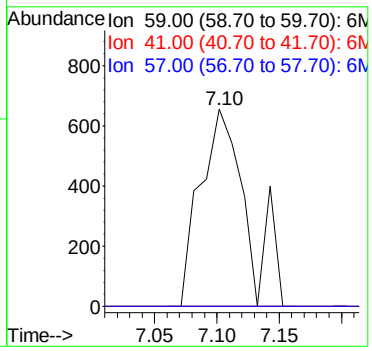


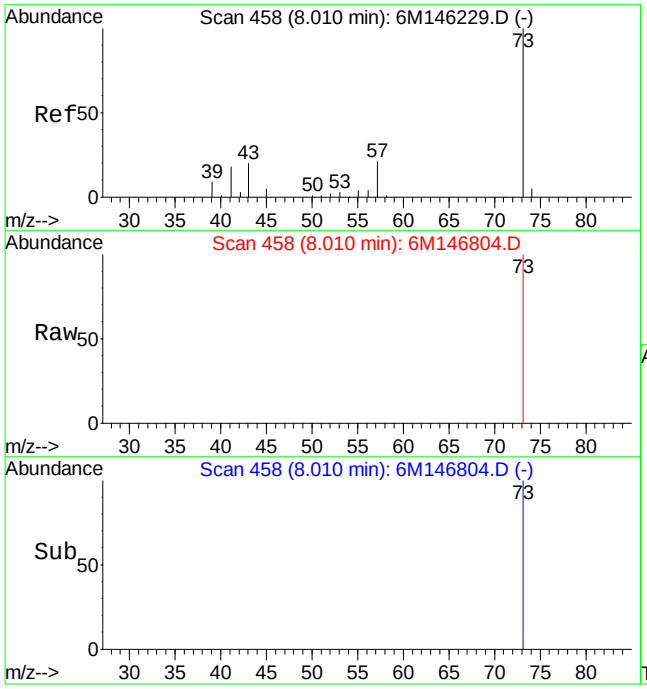


#15
Tert-Butyl Alcohol
Concen: 4.37 ug/L
RT: 7.10 min Scan# 369
Delta R.T. -0.02 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 59 Resp: 1700

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

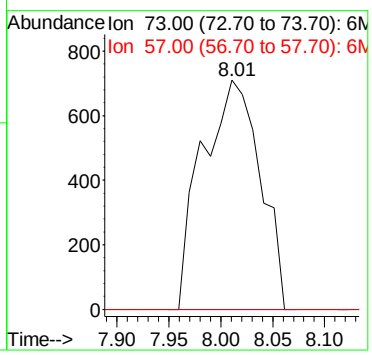


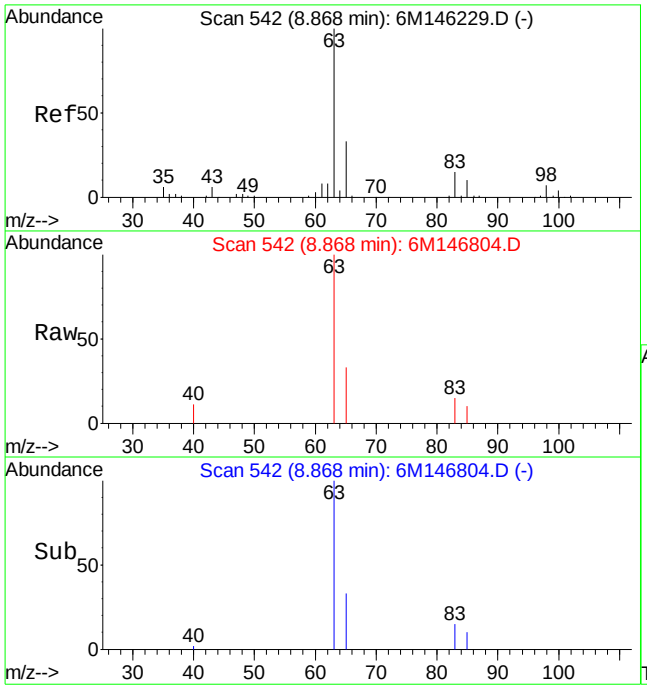


#22
Methyl Tert Butyl Ether
Concen: 0.19 ug/L
RT: 8.01 min Scan# 458
Delta R.T. -0.01 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 73 Resp: 2766

Ion	Ratio	Lower	Upper
73	100		
57	0.0	15.7	36.5#

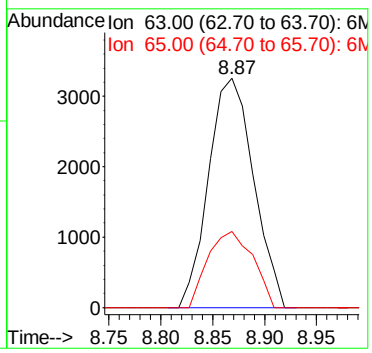


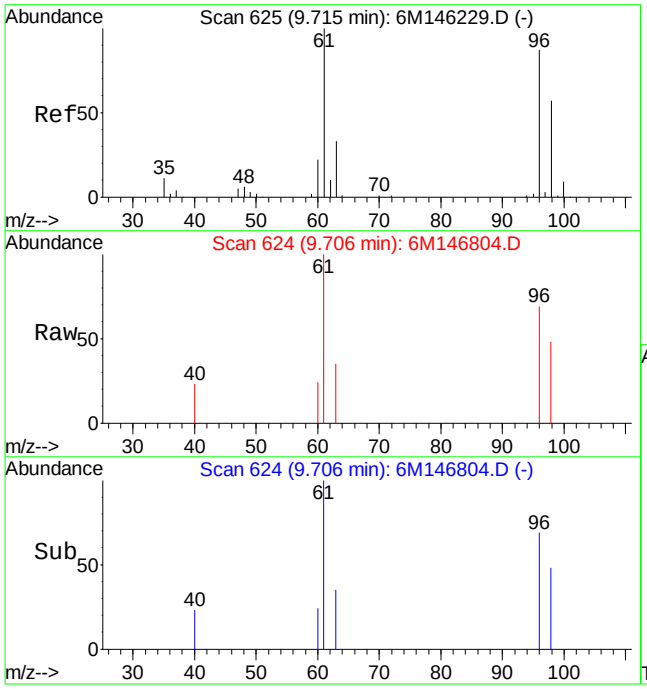


#27
1,1-Dichloroethane
Concen: 0.93 ug/L
RT: 8.87 min Scan# 542
Delta R.T. -0.00 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 63 Resp: 9838

Ion	Ratio	Lower	Upper
63	100		
65	33.1	19.3	44.9

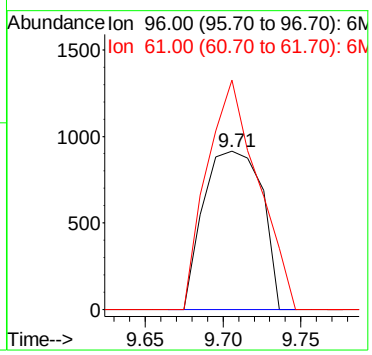


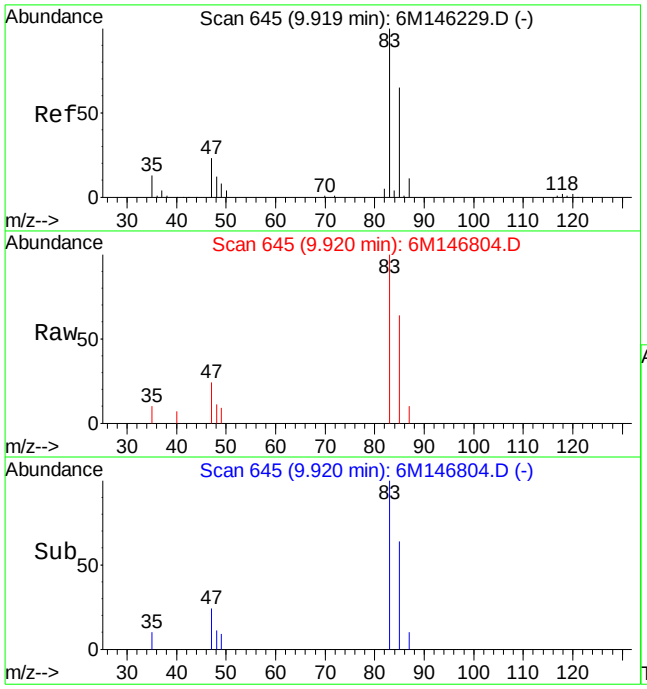


#32
cis-1,2-Dichloroethene
Concen: 0.34 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 96 Resp: 2392

Ion	Ratio	Lower	Upper
96	100		
61	126.7	89.2	208.2

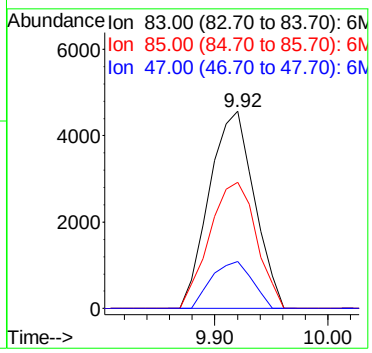


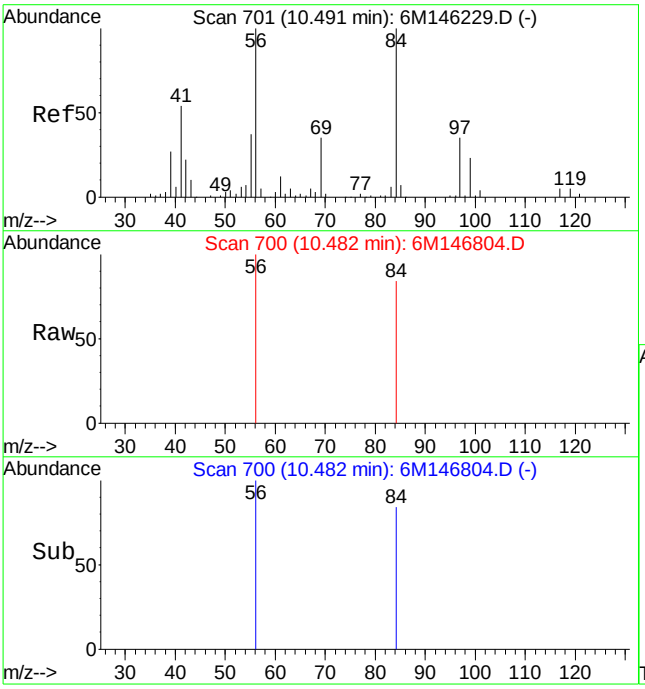


#33
Chloroform
Concen: 1.05 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 83 Resp: 12600

Ion	Ratio	Lower	Upper
83	100		
85	66.7	39.0	91.0
47	21.6	18.5	43.1

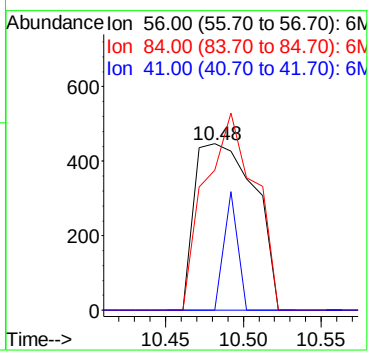


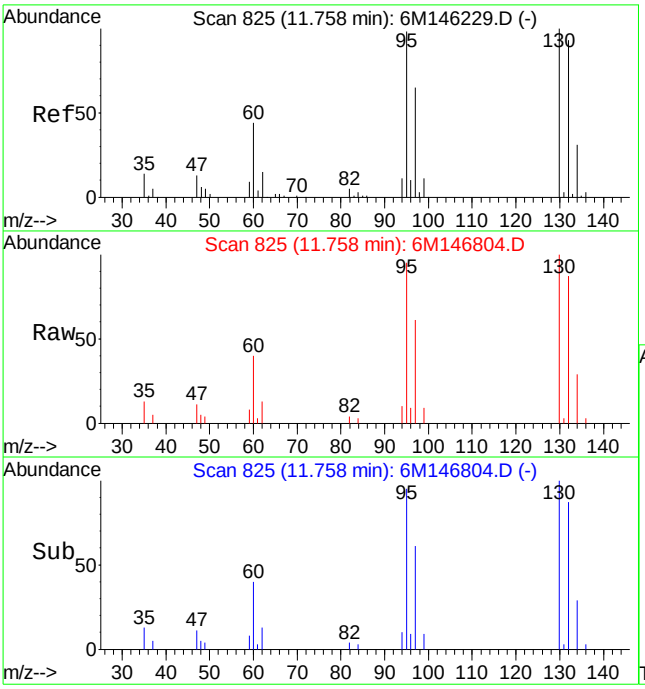


#39
Cyclohexane
Concen: 0.13 ug/L
RT: 10.48 min Scan# 700
Delta R.T. -0.01 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 56 Resp: 1207

Ion	Ratio	Lower	Upper
56	100		
84	97.6	43.6	101.6
41	16.2	37.1	86.5#

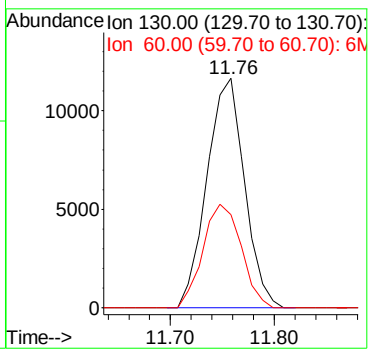


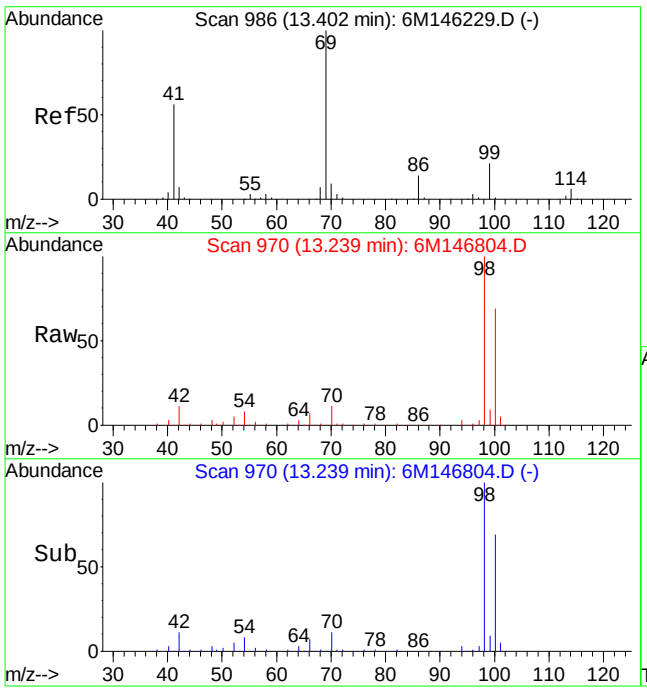


#47
Trichloroethene
Concen: 4.32 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion:130 Resp: 29263

Ion	Ratio	Lower	Upper
130	100		
60	46.0	32.0	74.6

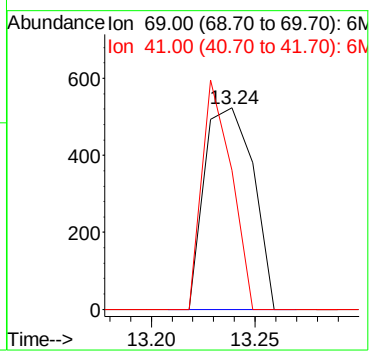


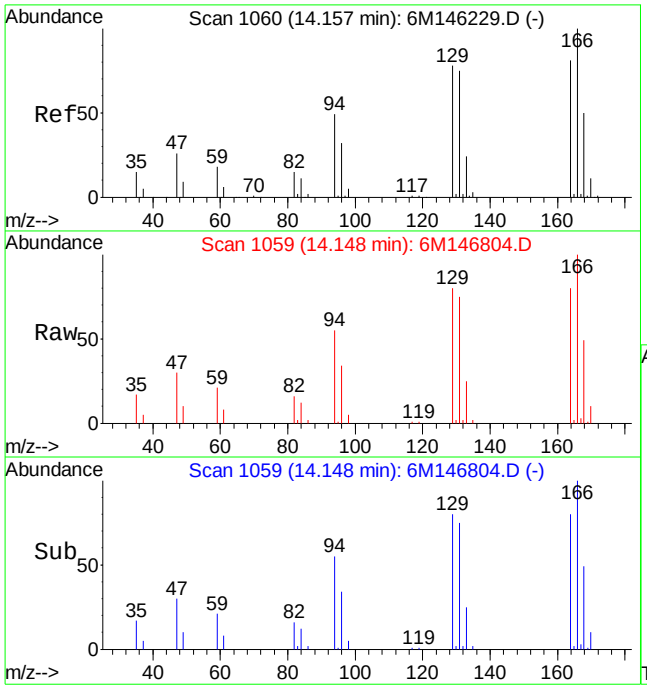


#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion: 69 Resp: 857

Ion	Ratio	Lower	Upper
69	100		
41	68.5	51.4	120.0

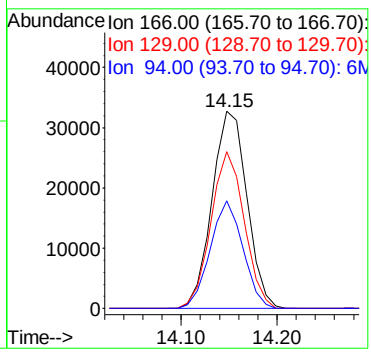




#66
Tetrachloroethene
Concen: 13.53 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146804.D
Acq: 28 Apr 2017 9:59

Tgt Ion:166 Resp: 82434

Ion	Ratio	Lower	Upper
166	100		
129	76.0	43.5	101.5
94	51.2	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419211.D Vial: 12
Acq On : 27 Apr 2017 16:55 Operator: TMB
Sample : L17041110-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 17:18:25 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

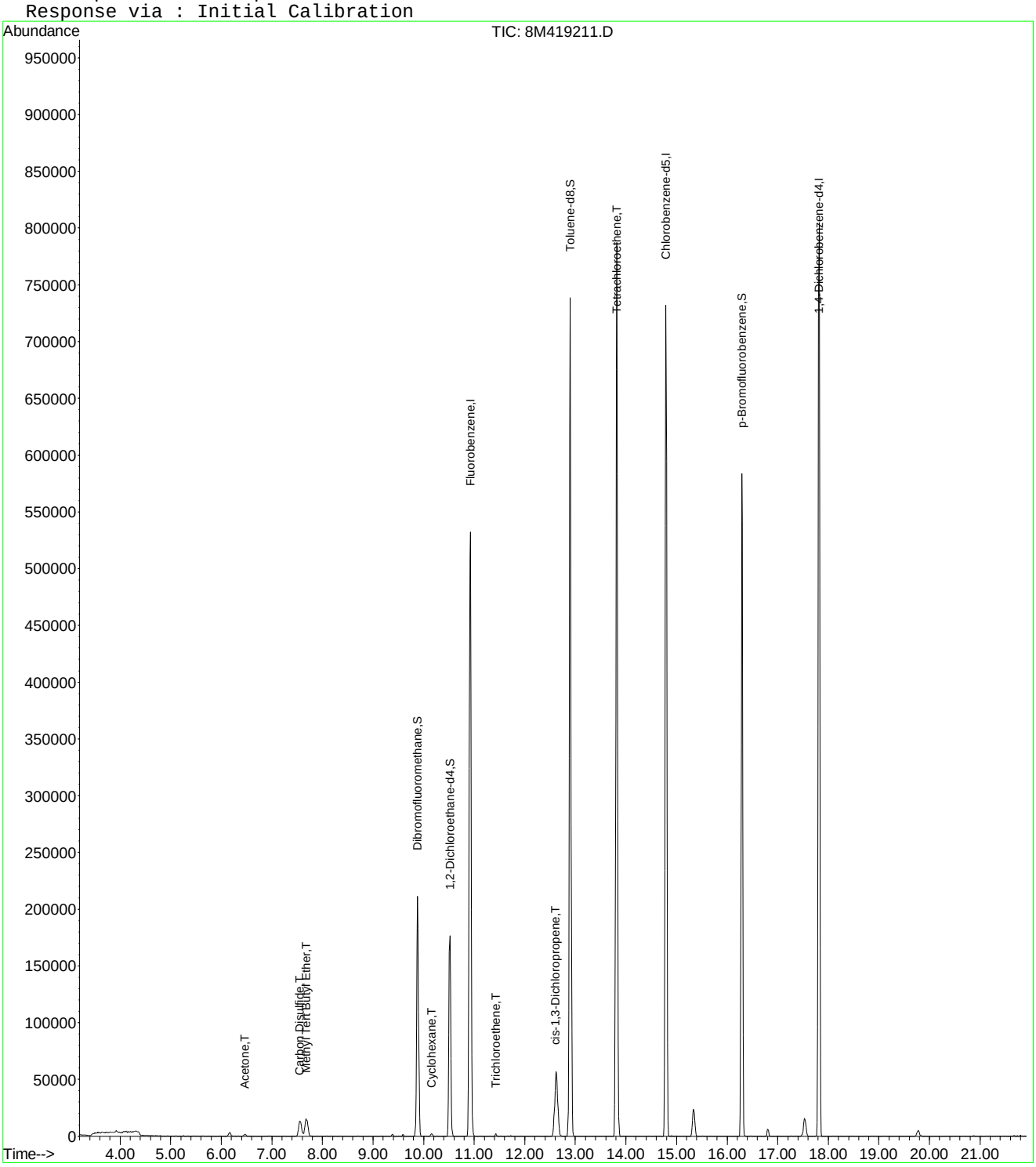
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	667986	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	537256	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	273528	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176451	25.1843	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.72%			
43) 1,2-Dichloroethane-d4	10.52	65	155061	25.6000	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.40%			
58) Toluene-d8	12.90	98	653761	26.6317	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
80) p-Bromofluorobenzene	16.29	95	253833	26.2940	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.16%			
Target Compounds						Qvalue
13) Acetone	6.47	43	3396	3.6148	ug/L #	66
20) Carbon Disulfide	7.55	76	3255	0.1618	ug/L #	74
22) Methyl Tert Butyl Ether	7.68	73	34612	2.5268	ug/L	97
39) Cyclohexane	10.16	56	1778	0.1763	ug/L #	87
47) Trichloroethene	11.43	130	1030	0.1329	ug/L	89
55) cis-1,3-Dichloropropene	12.60	75	1512	0.1505	ug/L #	42
66) Tetrachloroethene	13.82	164	238477	37.9634	ug/L	98

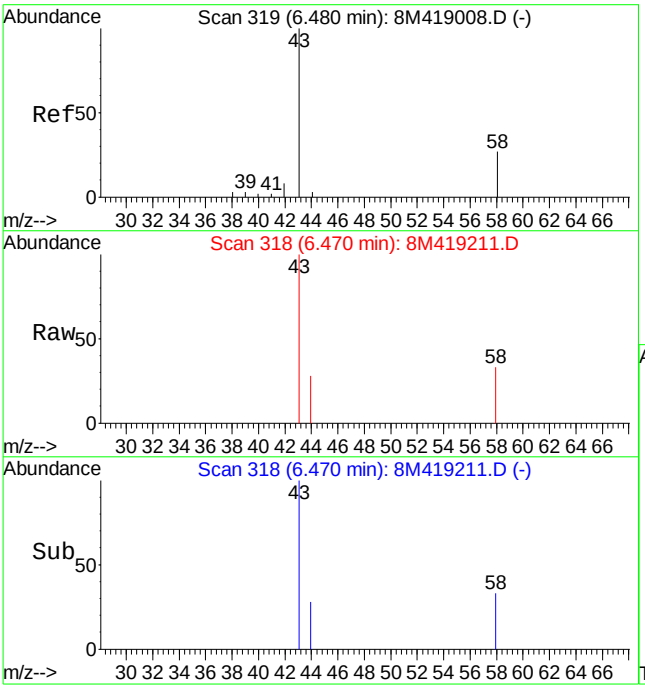
(#) = qualifier out of range (m) = manual integration
8M419211.D 8260WT.M Fri Apr 28 06:56:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419211.D Vial: 12
Acq On : 27 Apr 2017 16:55 Operator: TMB
Sample : L17041110-13 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 17:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

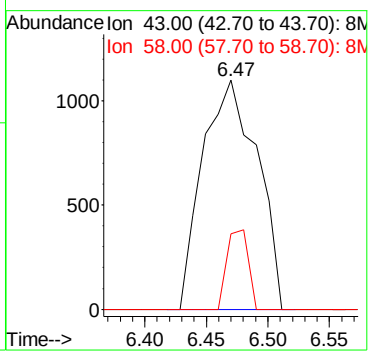


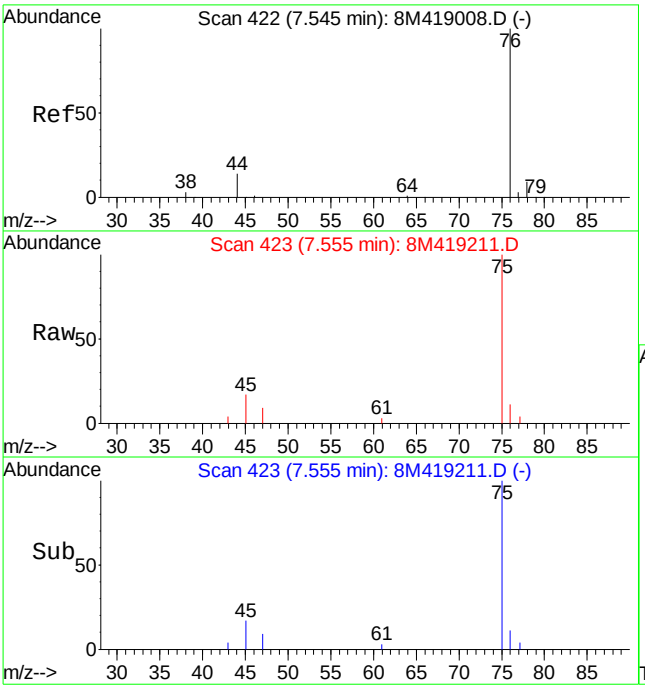


#13
Acetone
Concen: 3.61 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion: 43 Resp: 3396

Ion	Ratio	Lower	Upper
43	100		
58	13.6	19.4	45.4#

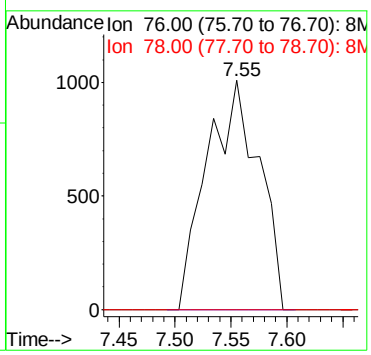


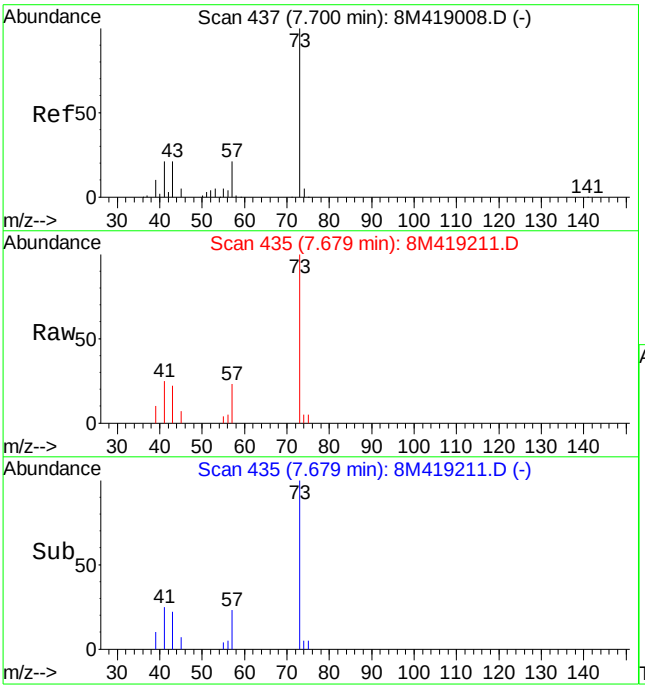


#20
Carbon Disulfide
Concen: 0.16 ug/L
RT: 7.55 min Scan# 423
Delta R.T. 0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion: 76 Resp: 3255

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#

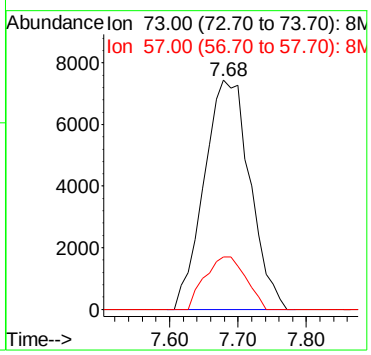


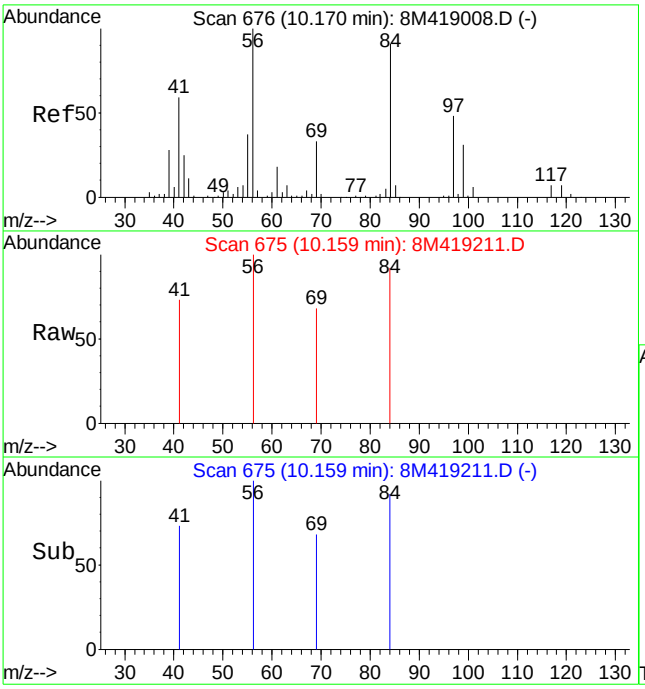


#22
Methyl Tert Butyl Ether
Concen: 2.53 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion: 73 Resp: 34612

Ion	Ratio	Lower	Upper
73	100		
57	20.4	11.4	26.6

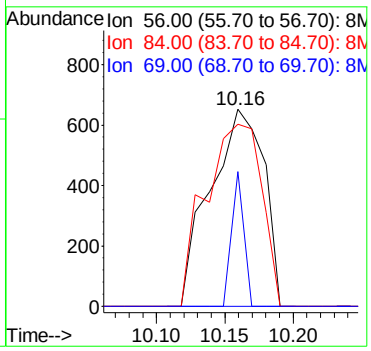


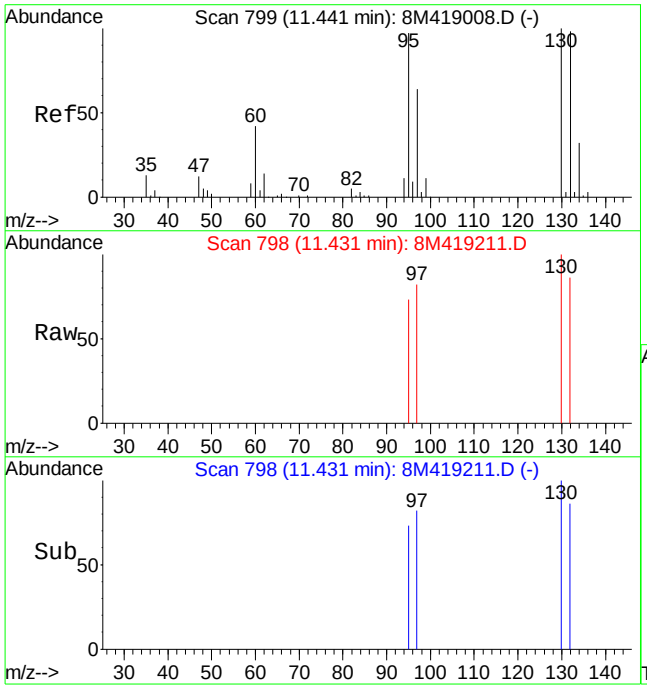


#39
Cyclohexane
Concen: 0.18 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion: 56 Resp: 1778

Ion	Ratio	Lower	Upper
56	100		
84	96.7	61.6	143.8
69	15.6	21.4	50.0#

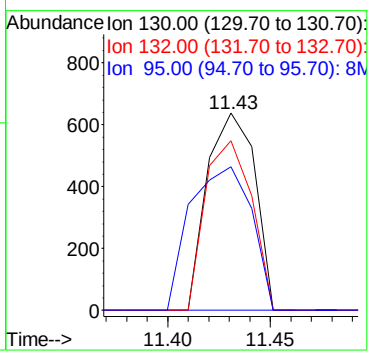


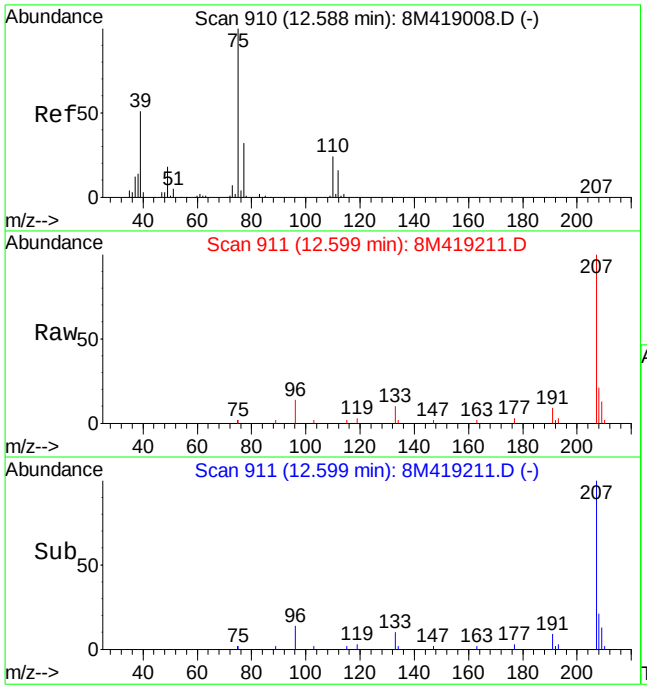


#47
Trichloroethene
Concen: 0.13 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion:130 Resp: 1030

Ion	Ratio	Lower	Upper
130	100		
132	83.6	59.4	138.6
95	93.7	60.1	140.3

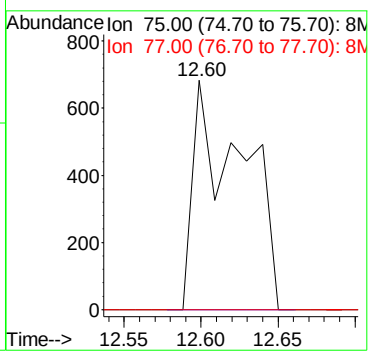


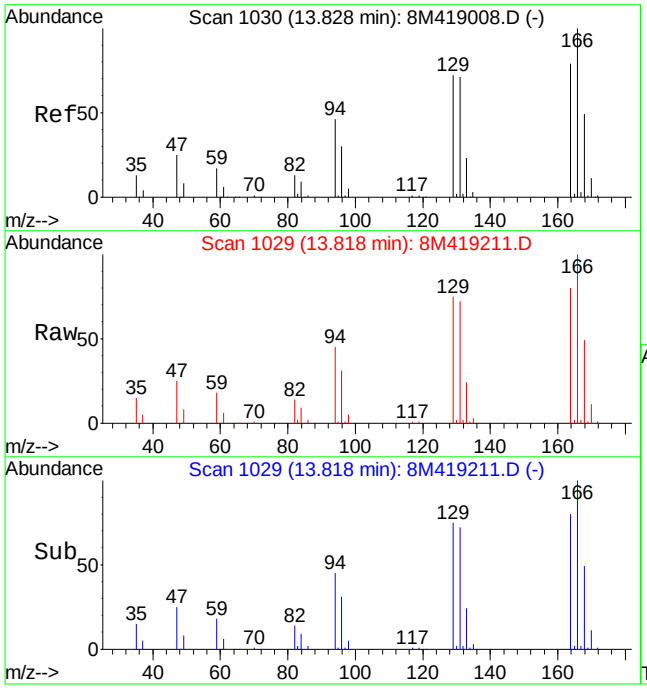


#55
cis-1,3-Dichloropropene
Concen: 0.15 ug/L
RT: 12.60 min Scan# 911
Delta R.T. 0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion: 75 Resp: 1512

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#

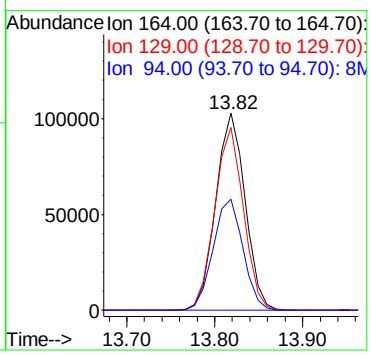




#66
Tetrachloroethene
Concen: 37.96 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419211.D
Acq: 27 Apr 2017 16:55

Tgt Ion:164 Resp: 238477

Ion	Ratio	Lower	Upper
164	100		
129	90.8	53.4	124.6
94	57.3	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419212.D Vial: 13
Acq On : 27 Apr 2017 17:25 Operator: TMB
Sample : L17041110-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 17:47:23 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

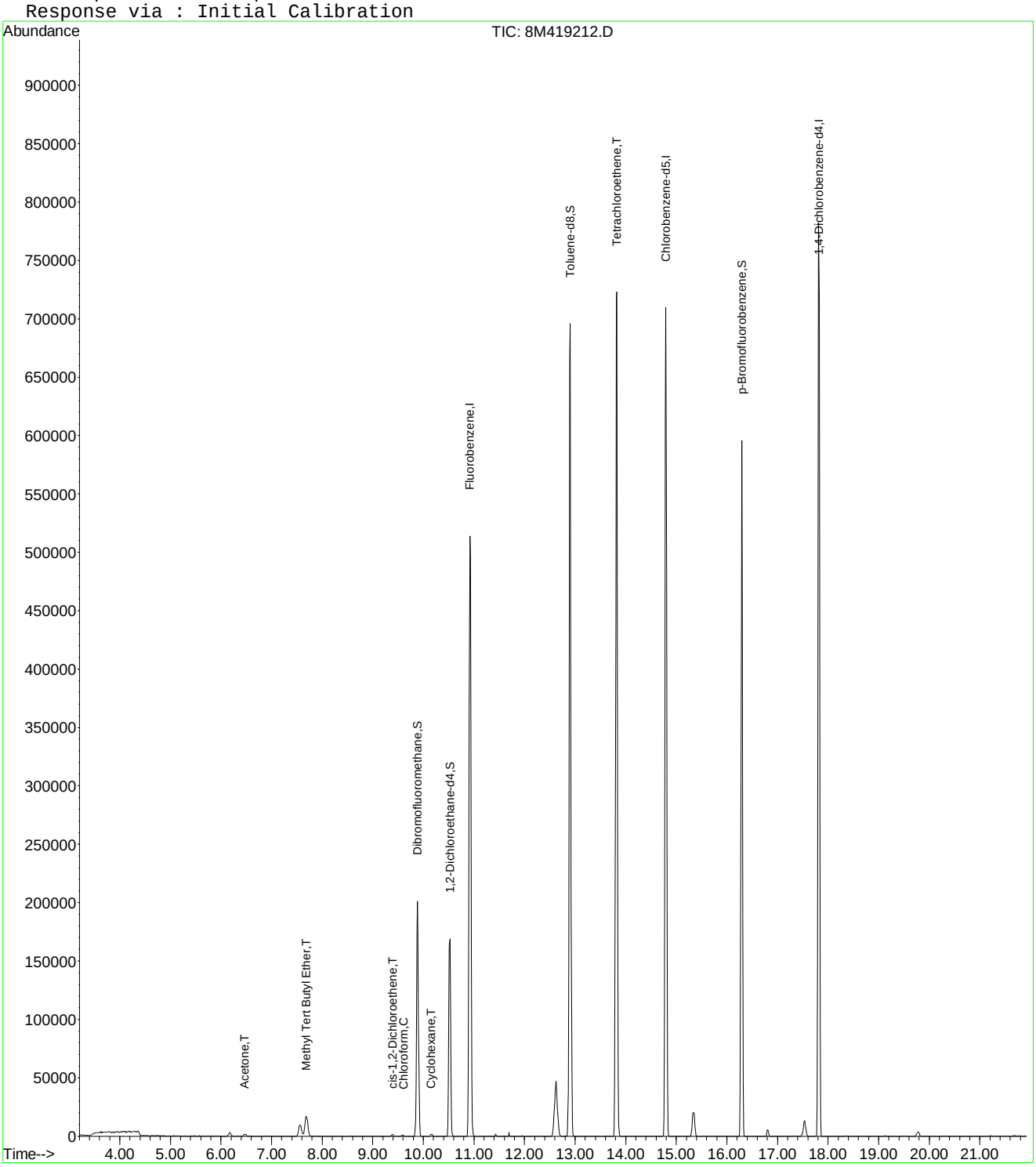
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	644000	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	520235	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	264269	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	170314	25.2138	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.84%			
43) 1,2-Dichloroethane-d4	10.52	65	147933	25.3329	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.32%			
58) Toluene-d8	12.90	98	637179	26.8055	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%			
80) p-Bromofluorobenzene	16.29	95	247646	26.5519	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.20%			
Target Compounds						Qvalue
13) Acetone	6.46	43	3237	3.5739	ug/L	82
22) Methyl Tert Butyl Ether	7.68	73	37135	2.8119	ug/L	98
32) cis-1,2-Dichloroethene	9.39	96	1098	0.1464	ug/L	91
33) Chloroform	9.61	83	1667	0.1288	ug/L	95
39) Cyclohexane	10.15	56	1976	0.2032	ug/L #	63
66) Tetrachloroethene	13.82	164	225516	37.0747	ug/L	96

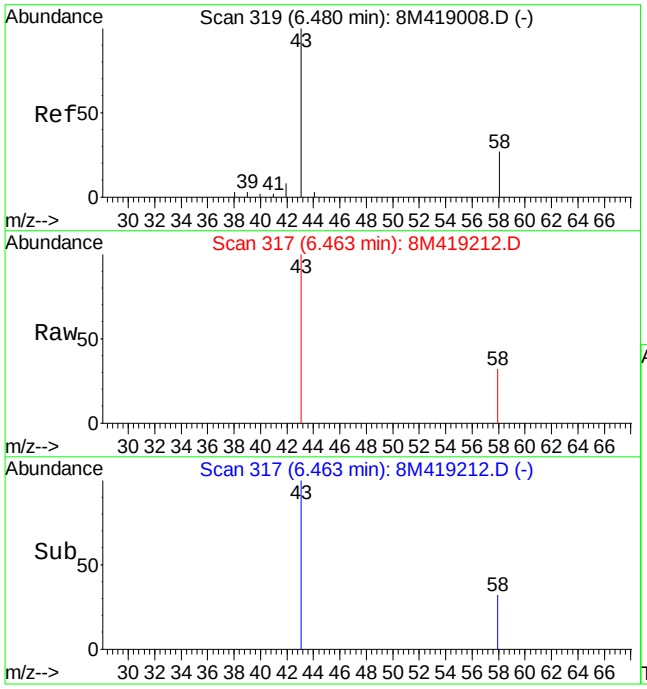
(#) = qualifier out of range (m) = manual integration
8M419212.D 8260WT.M Fri Apr 28 06:56:21 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419212.D Vial: 13
Acq On : 27 Apr 2017 17:25 Operator: TMB
Sample : L17041110-14 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 17:47 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

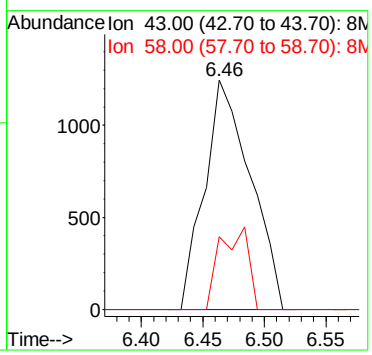


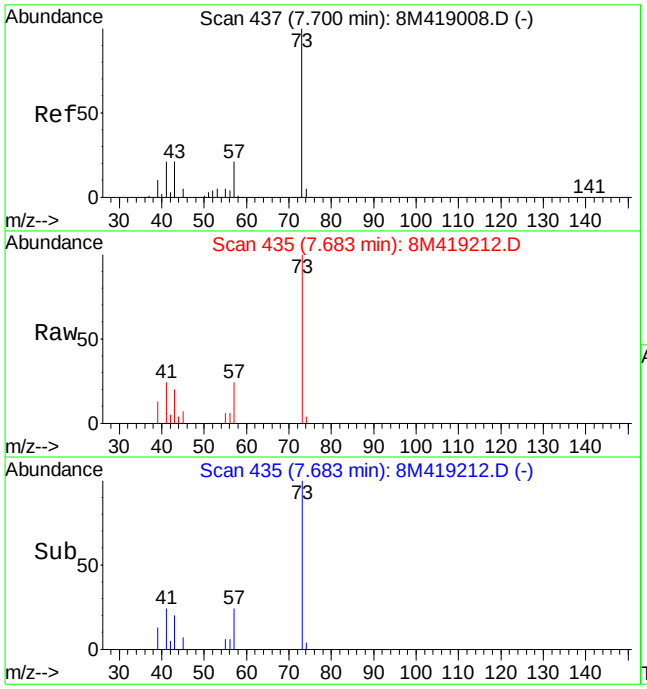


#13
Acetone
Concen: 3.57 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion: 43 Resp: 3237

Ion	Ratio	Lower	Upper
43	100		
58	22.4	19.4	45.4

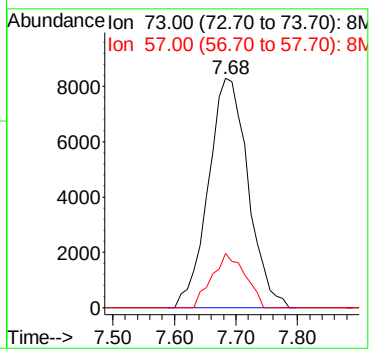


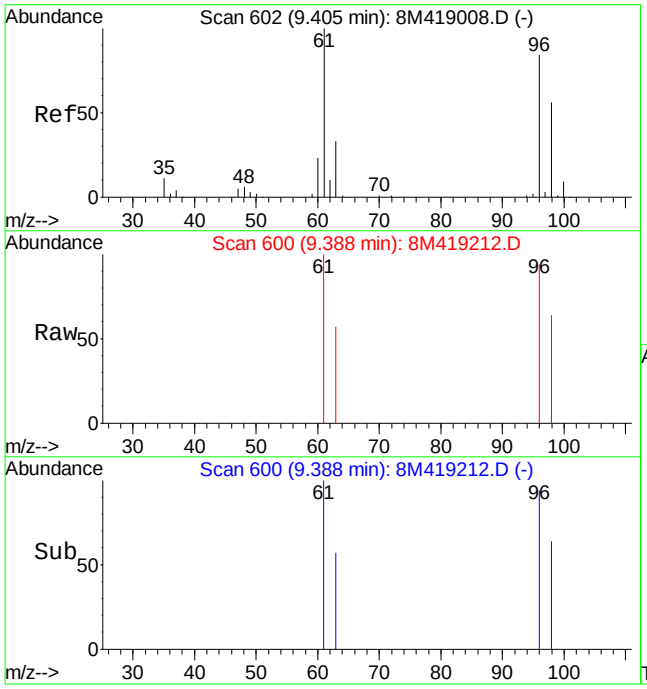


#22
Methyl Tert Butyl Ether
Concen: 2.81 ug/L
RT: 7.68 min Scan# 435
Delta R.T. -0.03 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion: 73 Resp: 37135

Ion	Ratio	Lower	Upper
73	100		
57	19.7	11.4	26.6

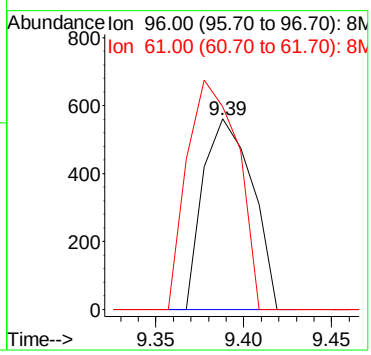


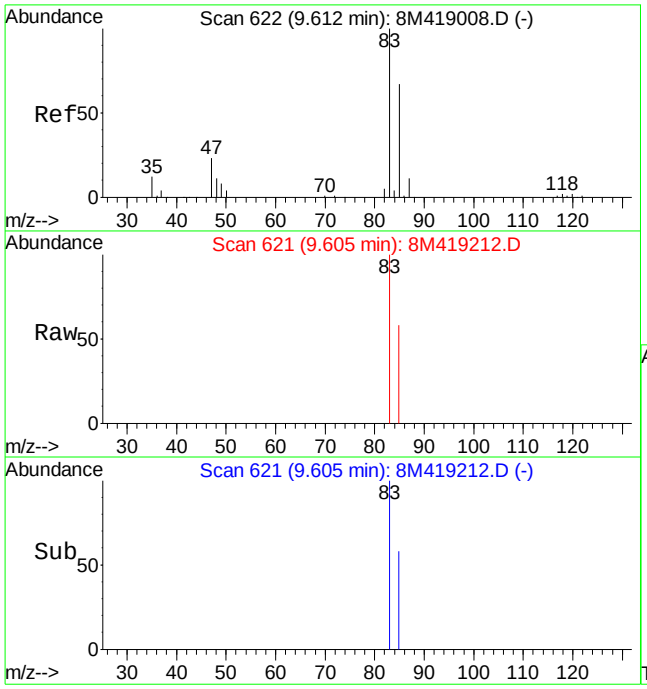


#32
cis-1,2-Dichloroethene
Concen: 0.15 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion: 96 Resp: 1098

Ion	Ratio	Lower	Upper
96	100		
61	123.4	80.3	187.3

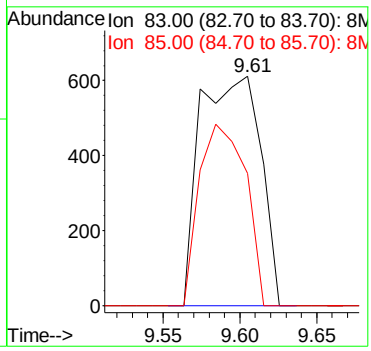


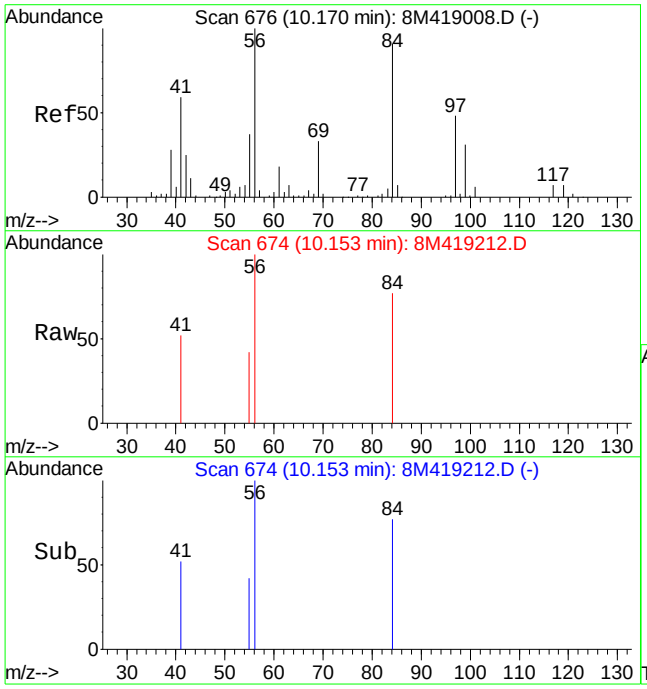


#33
Chloroform
Concen: 0.13 ug/L
RT: 9.61 min Scan# 621
Delta R.T. 0.00 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion: 83 Resp: 1667

Ion	Ratio	Lower	Upper
83	100		
85	60.9	39.1	91.3

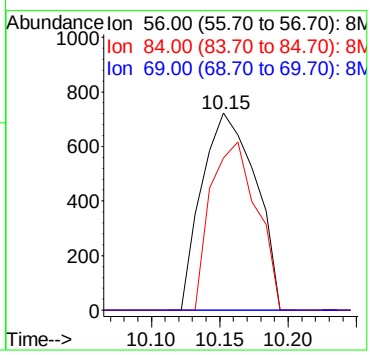


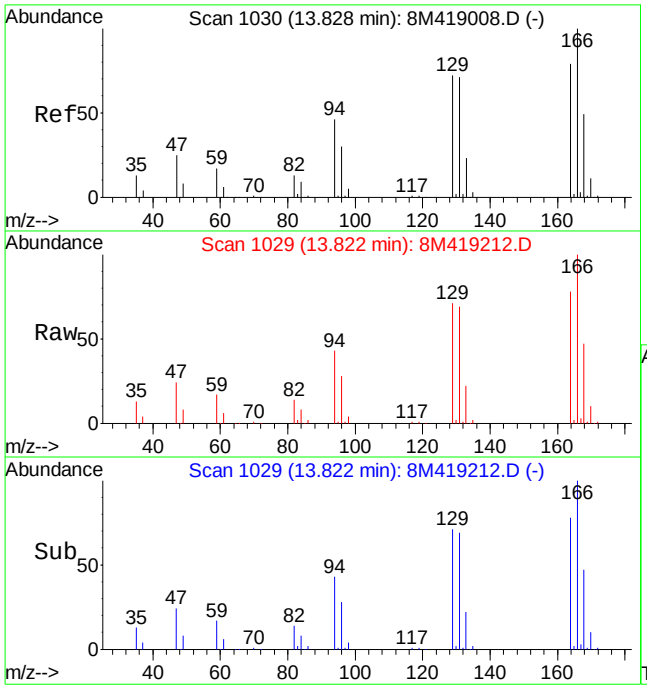


#39
Cyclohexane
Concen: 0.20 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion: 56 Resp: 1976

Ion	Ratio	Lower	Upper
56	100		
84	73.2	61.6	143.8
69	0.0	21.4	50.0#

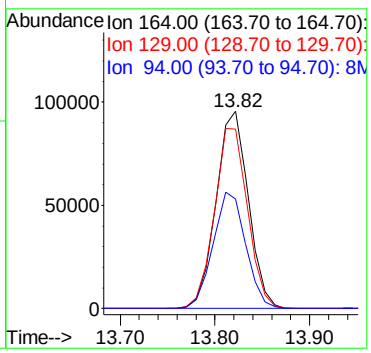




#66
Tetrachloroethene
Concen: 37.07 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419212.D
Acq: 27 Apr 2017 17:25

Tgt Ion:164 Resp: 225516

Ion	Ratio	Lower	Upper
164	100		
129	93.5	53.4	124.6
94	59.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419213.D Vial: 14
Acq On : 27 Apr 2017 17:55 Operator: TMB
Sample : L17041110-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 18:17:48 2017 Quant Results File: 8260WT.RES

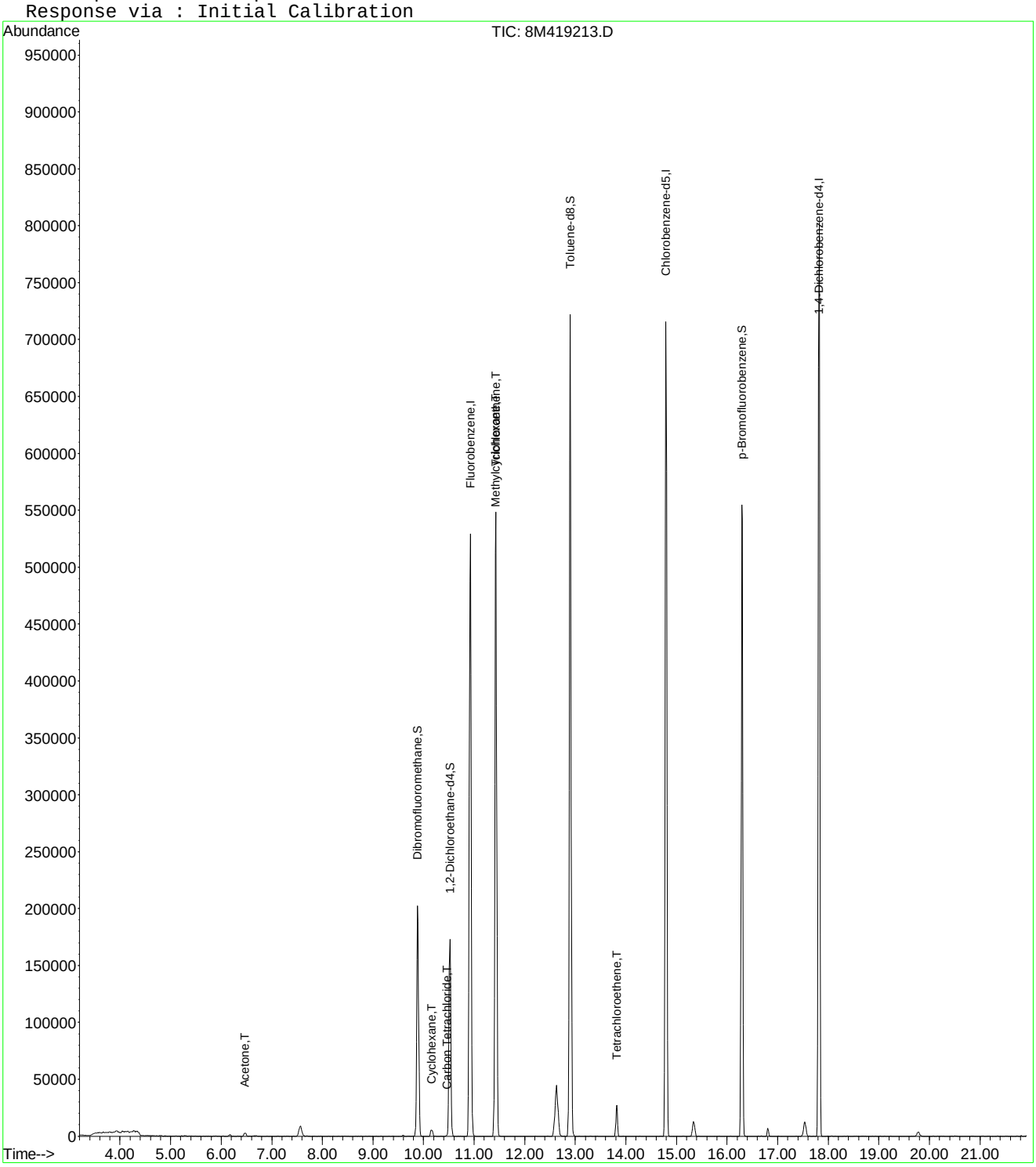
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

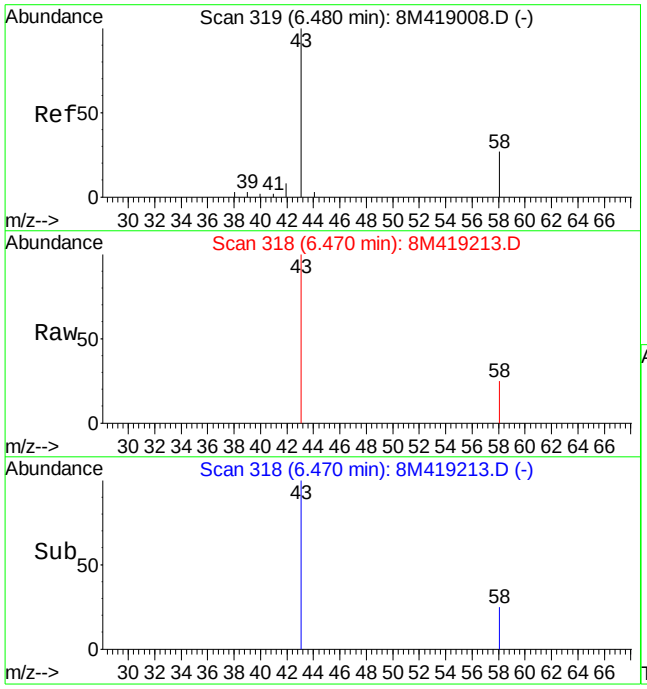
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	655763	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	527598	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	262942	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	171696	24.9624	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.84%			
43) 1,2-Dichloroethane-d4	10.52	65	149430	25.1302	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.52%			
58) Toluene-d8	12.90	98	645618	26.7815	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.12%			
80) p-Bromofluorobenzene	16.29	95	247053	26.6220	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.48%			
Target Compounds						Qvalue
13) Acetone	6.47	43	6303	6.8341	ug/L	87
39) Cyclohexane	10.16	56	4505	0.4550	ug/L	86
42) Carbon Tetrachloride	10.46	117	1757	0.1782	ug/L #	79
47) Trichloroethene	11.43	130	232094	30.4978	ug/L	99
48) Methylcyclohexane	11.42	83	2702	0.2664	ug/L #	1
66) Tetrachloroethene	13.82	164	8598	1.3938	ug/L	93

(#) = qualifier out of range (m) = manual integration
8M419213.D 8260WT.M Fri Apr 28 06:56:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419213.D Vial: 14
Acq On : 27 Apr 2017 17:55 Operator: TMB
Sample : L17041110-15 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 18:17 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

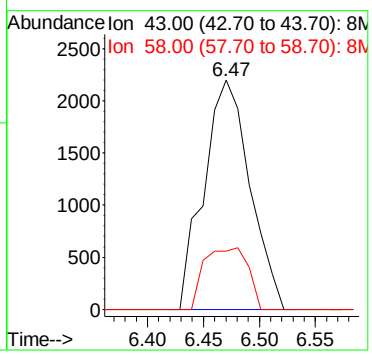


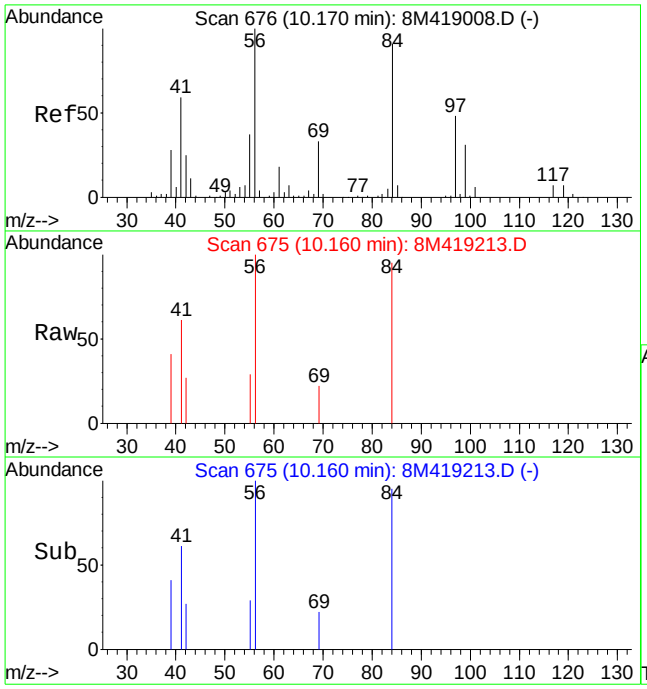


#13
Acetone
Concen: 6.83 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 43 Resp: 6303

Ion	Ratio	Lower	Upper
43	100		
58	25.4	19.4	45.4

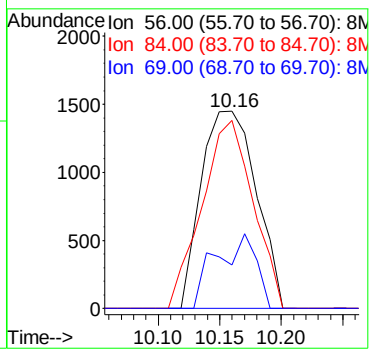


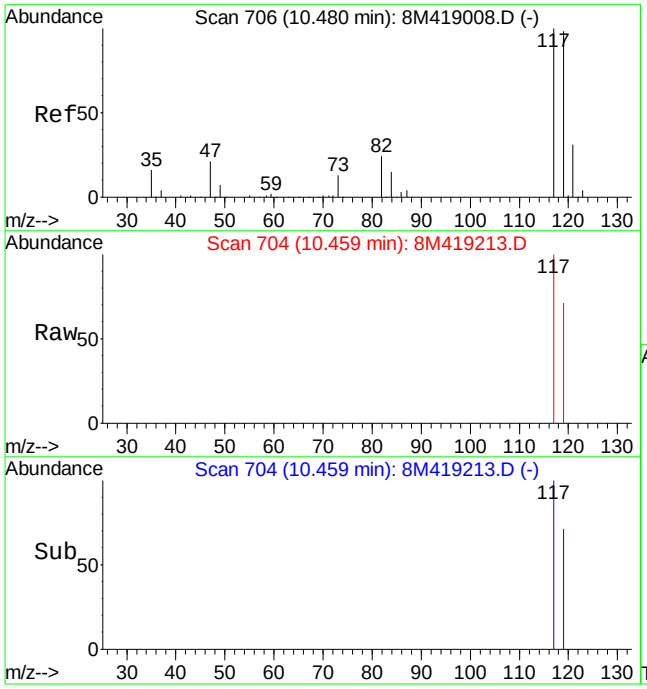


#39
Cyclohexane
Concen: 0.46 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 56 Resp: 4505

Ion	Ratio	Lower	Upper
56	100		
84	88.8	61.6	143.8
69	27.7	21.4	50.0

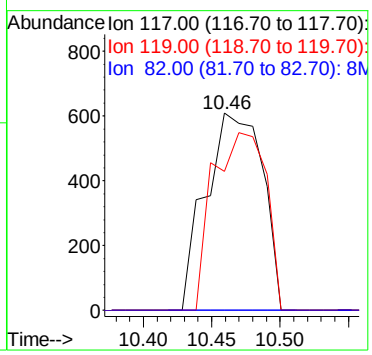


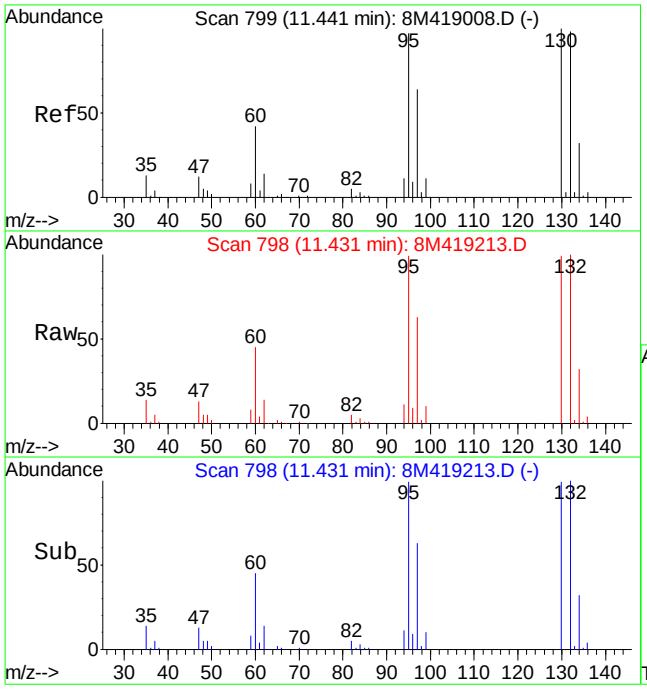


#42
Carbon Tetrachloride
Concen: 0.18 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion:117 Resp: 1757

Ion	Ratio	Lower	Upper
117	100		
119	84.4	58.5	136.5
82	0.0	14.9	34.9#

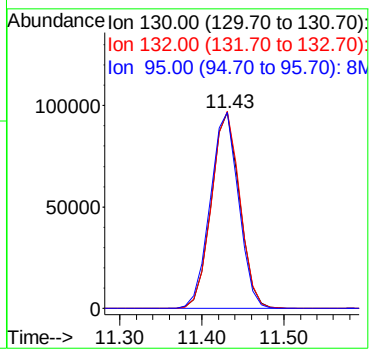


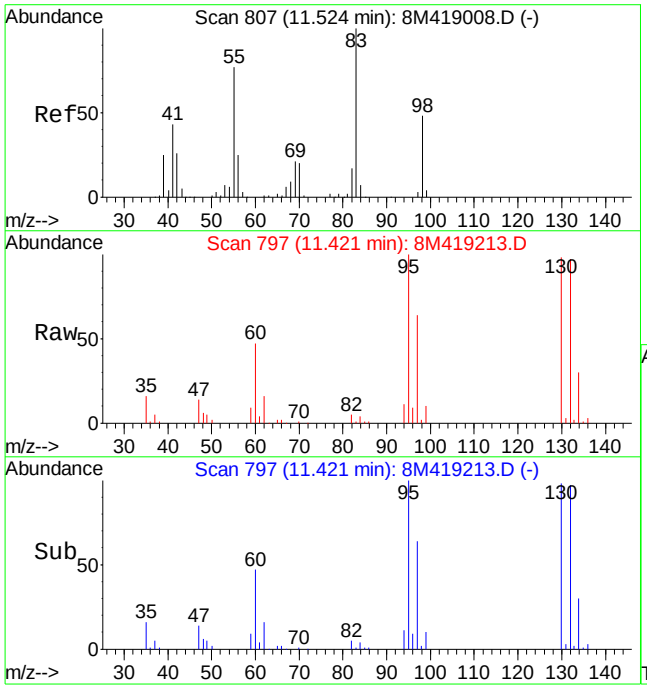


#47
Trichloroethene
Concen: 30.50 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion:130 Resp: 232094

Ion	Ratio	Lower	Upper
130	100		
132	100.4	59.4	138.6
95	100.1	60.1	140.3

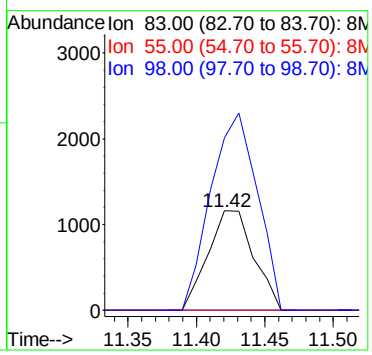


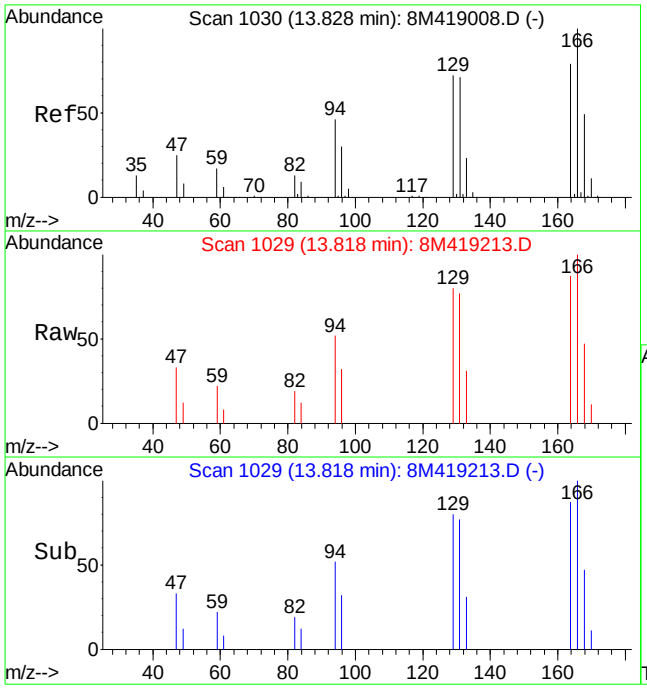


#48
Methylcyclohexane
Concen: 0.27 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.10 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion: 83 Resp: 2702

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	201.3	28.4	66.2#

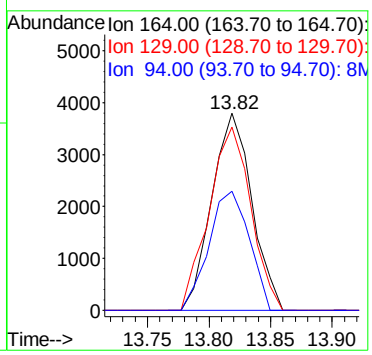




#66
Tetrachloroethene
Concen: 1.39 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419213.D
Acq: 27 Apr 2017 17:55

Tgt Ion:164 Resp: 8598

Ion	Ratio	Lower	Upper
164	100		
129	97.0	53.4	124.6
94	61.0	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419214.D Vial: 15
Acq On : 27 Apr 2017 18:25 Operator: TMB
Sample : L17041110-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 18:47:16 2017 Quant Results File: 8260WT.RES

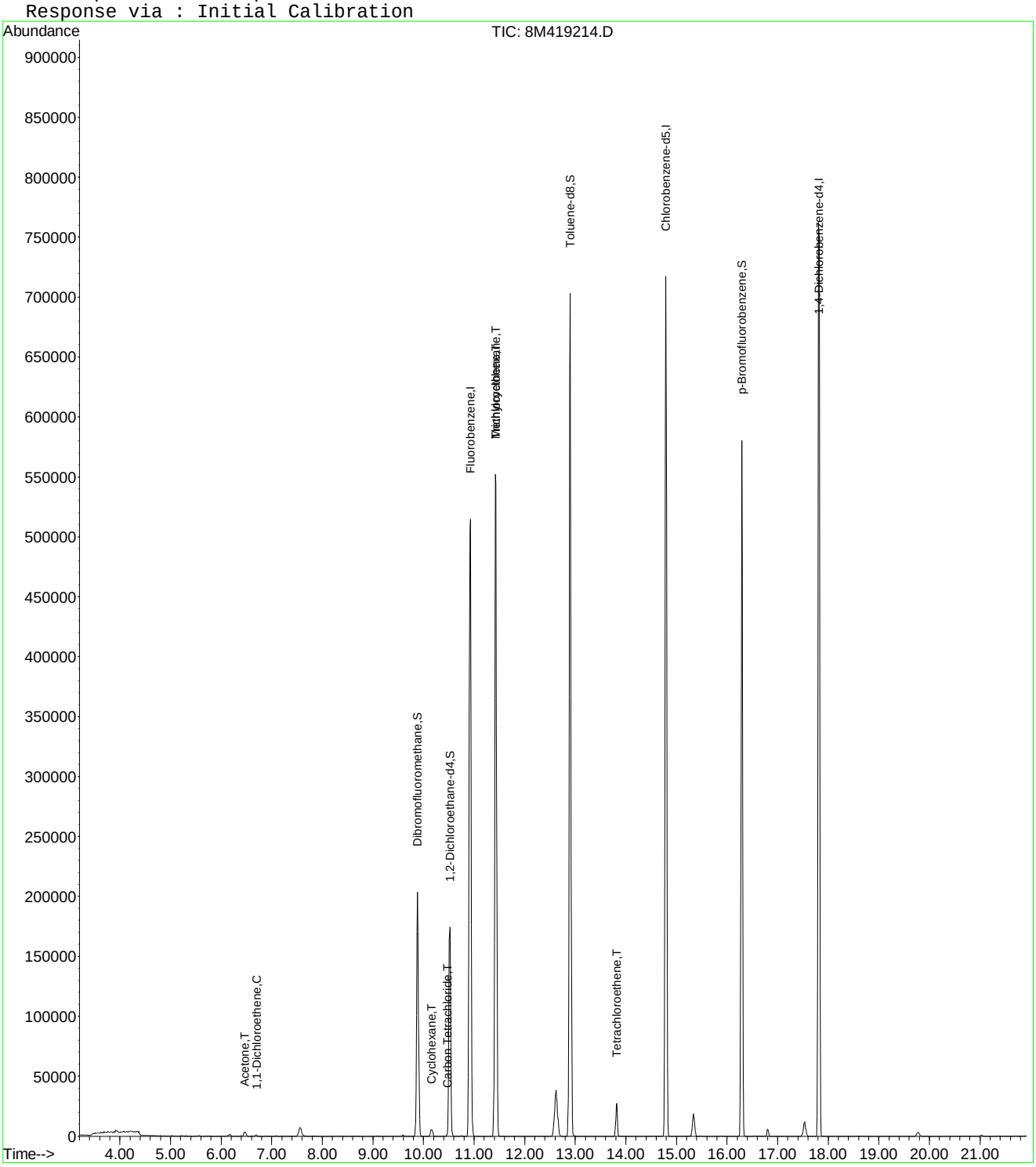
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

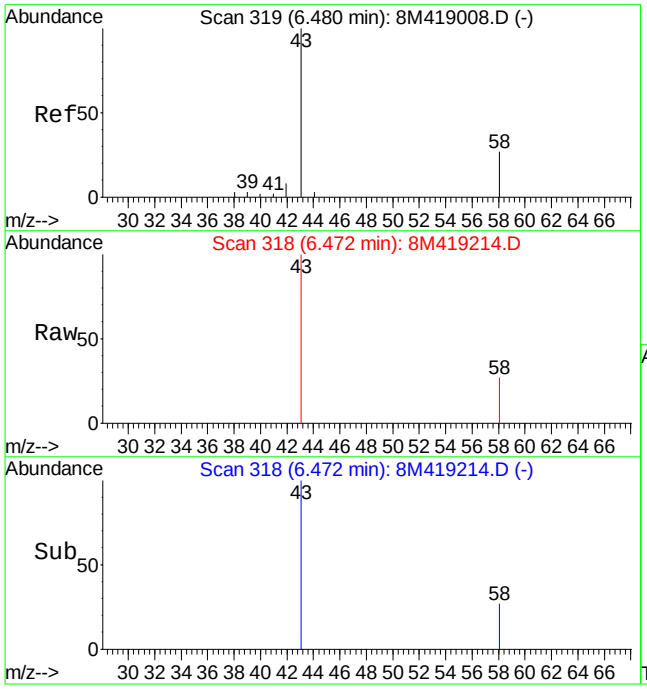
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	651473	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.79	117	520549	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	261374	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	171084	25.0373 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.16%		
43) 1,2-Dichloroethane-d4	10.52	65	152236	25.7707 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.08%		
58) Toluene-d8	12.90	98	629060	26.4480 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.80%		
80) p-Bromofluorobenzene	16.29	95	242004	26.2344 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.92%		
Target Compounds					Qvalue
13) Acetone	6.47	43	7845	8.5620 ug/L	90
14) 1,1-Dichloroethene	6.70	61	1212	0.1285 ug/L #	57
39) Cyclohexane	10.16	56	4938	0.5021 ug/L	86
42) Carbon Tetrachloride	10.47	117	1252	0.1278 ug/L #	88
47) Trichloroethene	11.43	130	241327	31.9198 ug/L	98
48) Methylcyclohexane	11.43	83	3000	0.2977 ug/L #	1
66) Tetrachloroethene	13.82	164	9020	1.4820 ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419214.D 8260WT.M Fri Apr 28 06:56:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419214.D Vial: 15
Acq On : 27 Apr 2017 18:25 Operator: TMB
Sample : L17041110-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 18:47 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

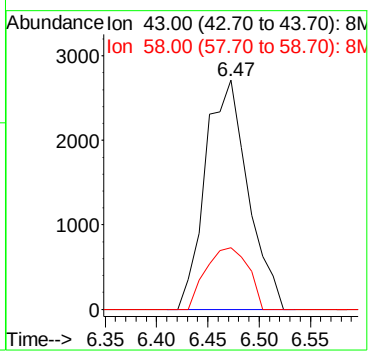


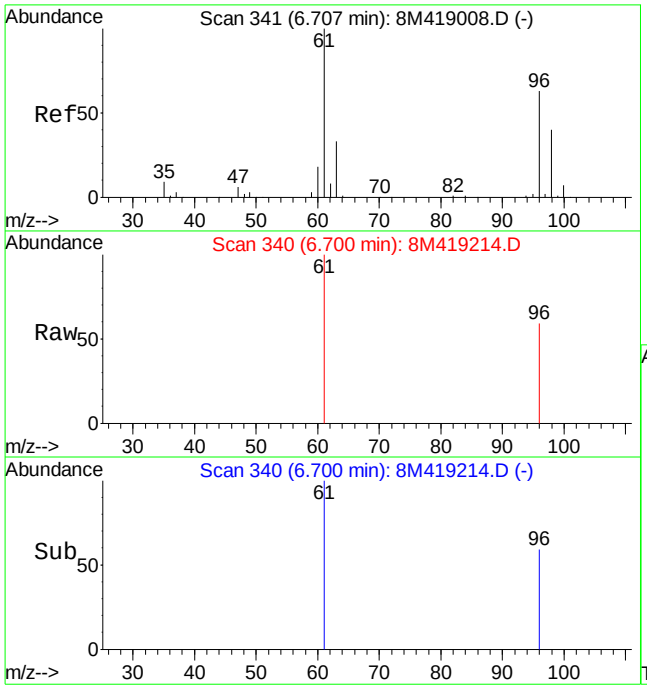


#13
Acetone
Concen: 8.56 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion: 43 Resp: 7845

Ion	Ratio	Lower	Upper
43	100		
58	26.7	19.4	45.4

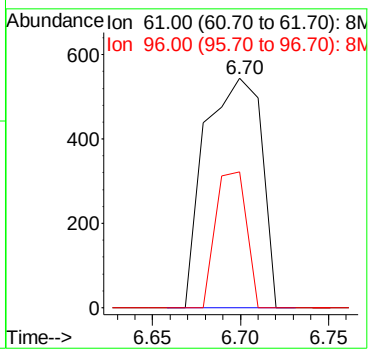


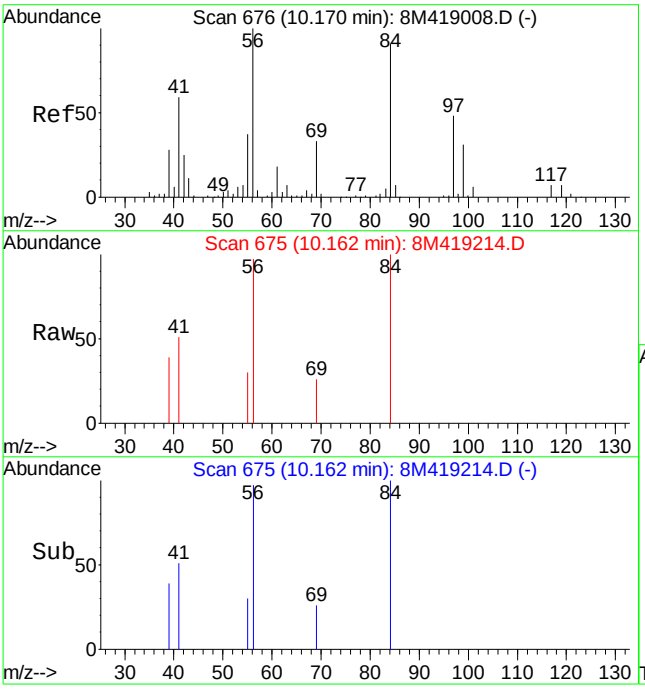


#14
1,1-Dichloroethene
Concen: 0.13 ug/L
RT: 6.70 min Scan# 340
Delta R.T. 0.00 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion: 61 Resp: 1212

Ion	Ratio	Lower	Upper
61	100		
96	32.4	40.0	93.4#

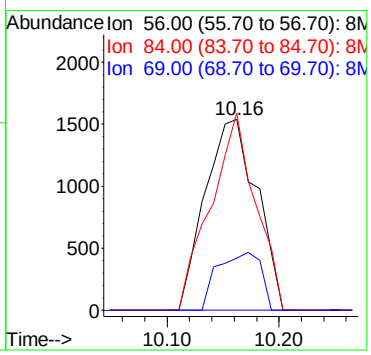


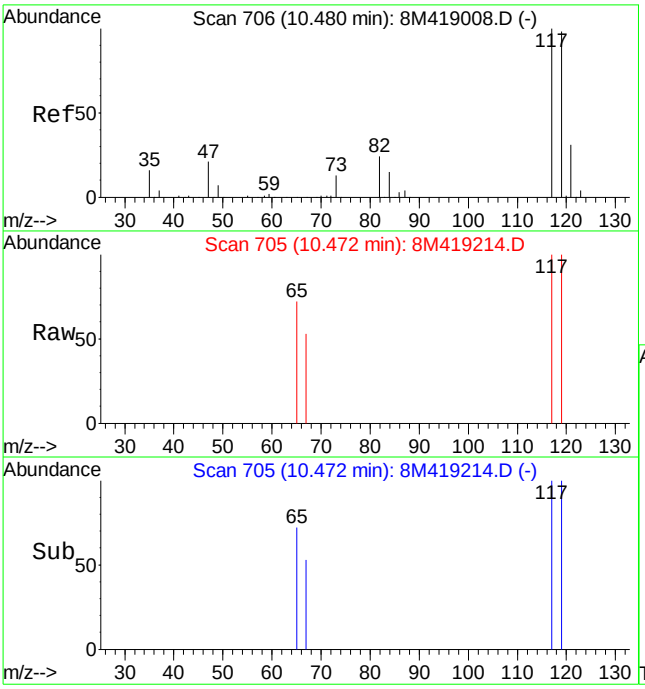


#39
Cyclohexane
Concen: 0.50 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion: 56 Resp: 4938

Ion	Ratio	Lower	Upper
56	100		
84	89.4	61.6	143.8
69	25.3	21.4	50.0

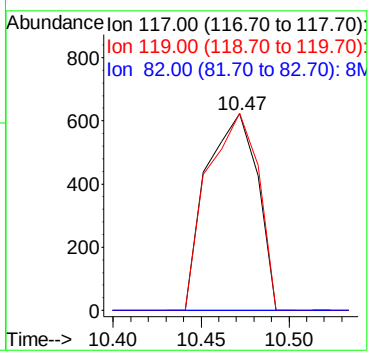


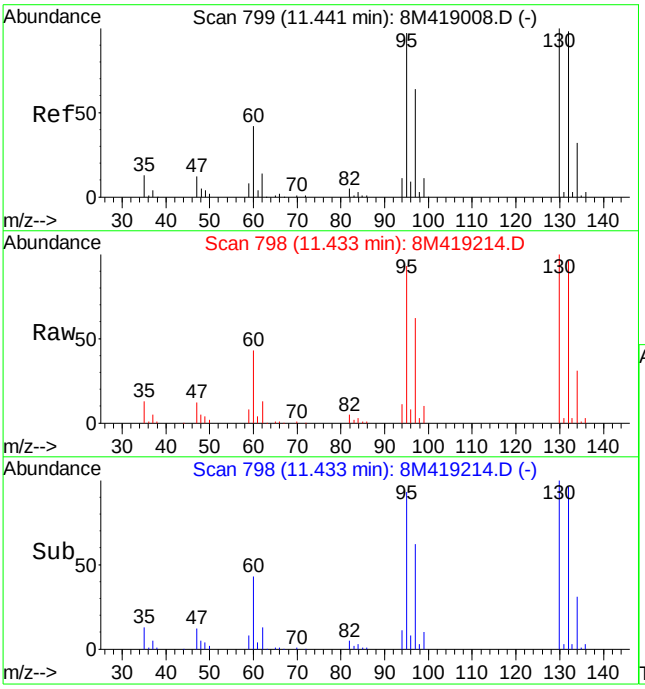


#42
Carbon Tetrachloride
Concen: 0.13 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion:117 Resp: 1252

Ion	Ratio	Lower	Upper
117	100		
119	100.2	58.5	136.5
82	0.0	14.9	34.9#

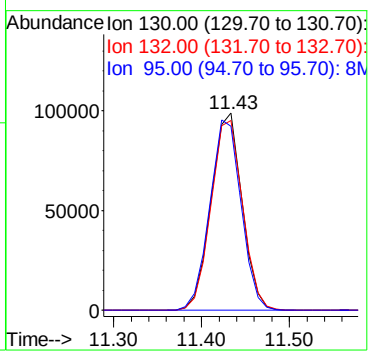


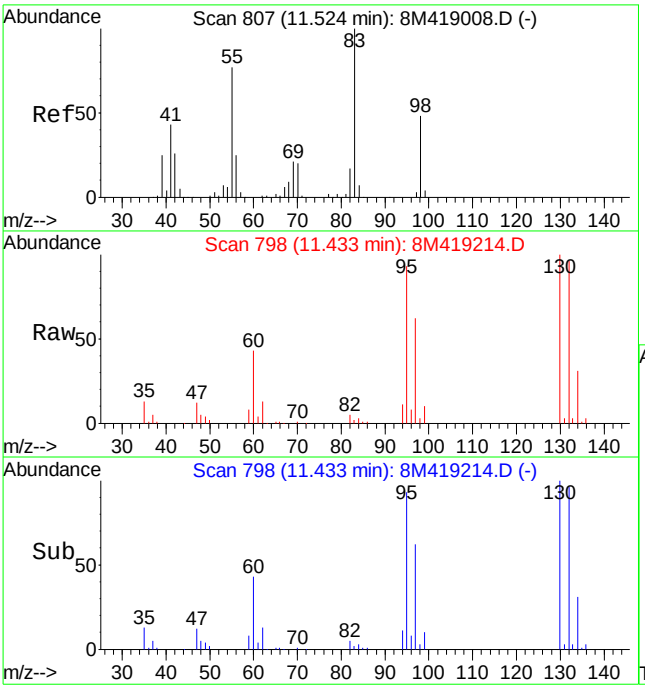


#47
Trichloroethene
Concen: 31.92 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion:130 Resp: 241327

Ion	Ratio	Lower	Upper
130	100		
132	98.3	59.4	138.6
95	97.6	60.1	140.3

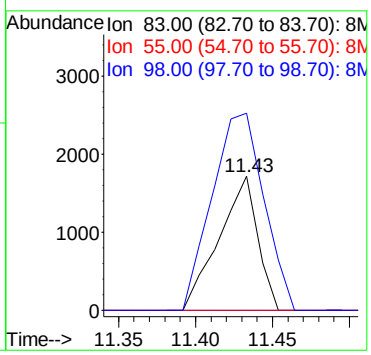


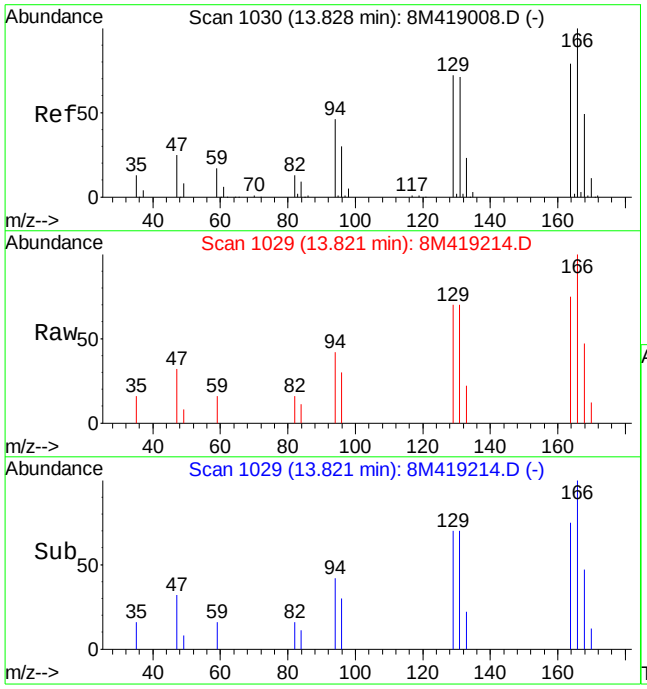


#48
Methylcyclohexane
Concen: 0.30 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.09 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion: 83 Resp: 3000

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	197.2	28.4	66.2#

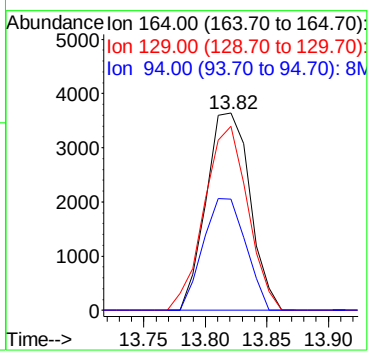




#66
Tetrachloroethene
Concen: 1.48 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419214.D
Acq: 27 Apr 2017 18:25

Tgt Ion:164 Resp: 9020

Ion	Ratio	Lower	Upper
164	100		
129	92.4	53.4	124.6
94	54.8	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146805.D Vial: 9
Acq On : 28 Apr 2017 10:29 Operator: TMB
Sample : L17041110-17 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:15 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

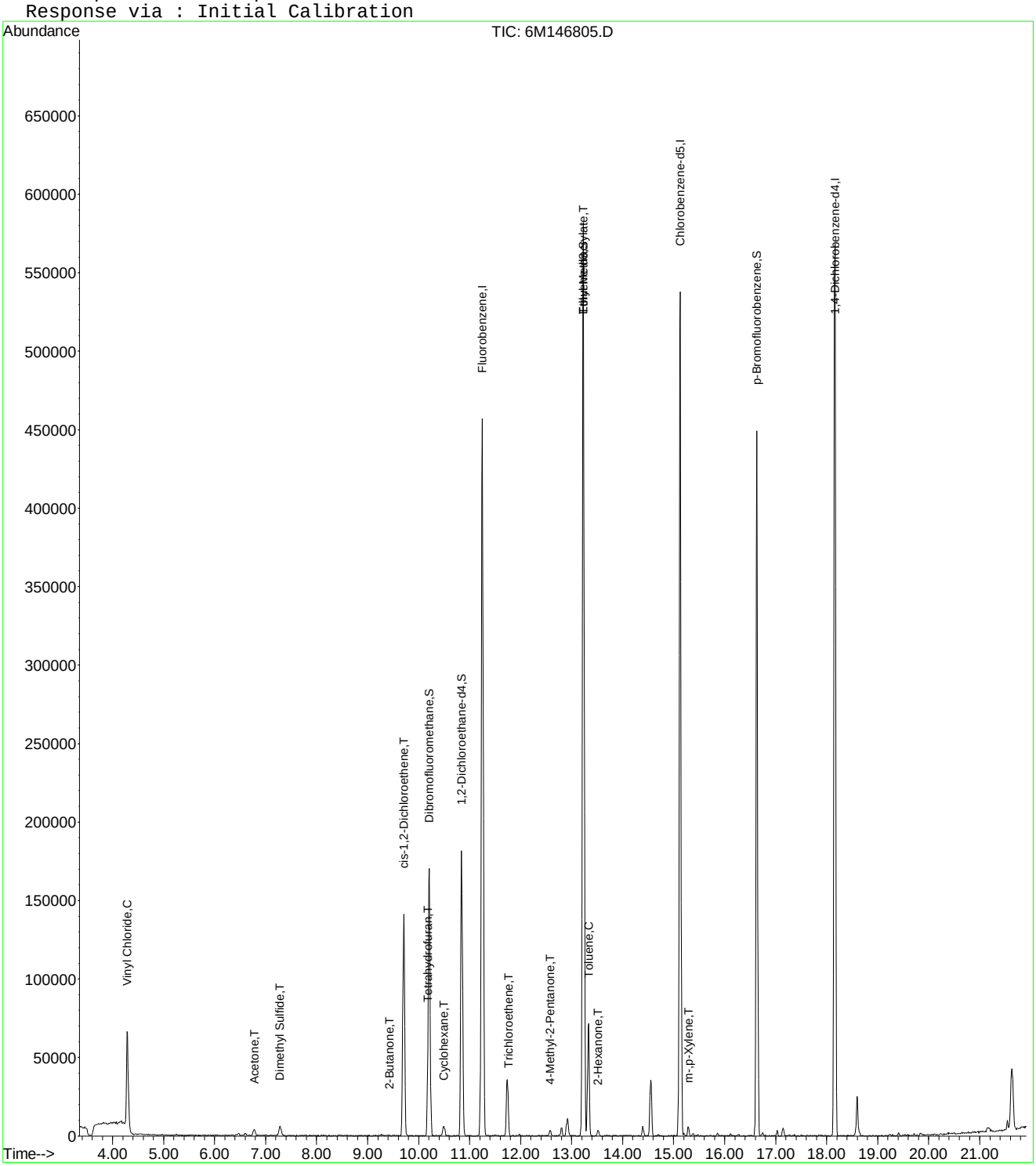
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	582280	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	402467	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	199403	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	149897	25.2178 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.88%		
43) 1,2-Dichloroethane-d4	10.84	65	161246	27.5240 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 110.08%		
58) Toluene-d8	13.23	98	544276	26.5023 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%		
80) p-Bromofluorobenzene	16.63	95	211467	27.9223 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.68%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	1386	Below Cal #	42
4) Vinyl Chloride	4.29	62	100057	9.4721 ug/L	99
13) Acetone	6.78	43	7517	5.9825 ug/L	86
16) Dimethyl Sulfide	7.28	62	4804	0.7573 ug/L	80
29) 2-Butanone	9.42	43	657	0.4149 ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	85188	12.1283 ug/L	81
36) Tetrahydrofuran	10.18	42	219	0.2100 ug/L #	41
39) Cyclohexane	10.49	56	5117	0.5645 ug/L	83
47) Trichloroethene	11.76	130	3218	0.4745 ug/L	87
54) 4-Methyl-2-Pentanone	12.58	58	1792	1.1845 ug/L #	56
59) Toluene	13.33	91	76791	3.0518 ug/L	98
60) Ethyl Methacrylate	13.23	69	876	0.1439 ug/L	83
64) 2-Hexanone	13.52	43	2530	1.1111 ug/L #	28
73) m-,p-Xylene	15.29	106	1466	0.1316 ug/L	69

(#) = qualifier out of range (m) = manual integration
6M146805.D 8260BWT.M Sat Apr 29 12:16:18 2017 Page 1

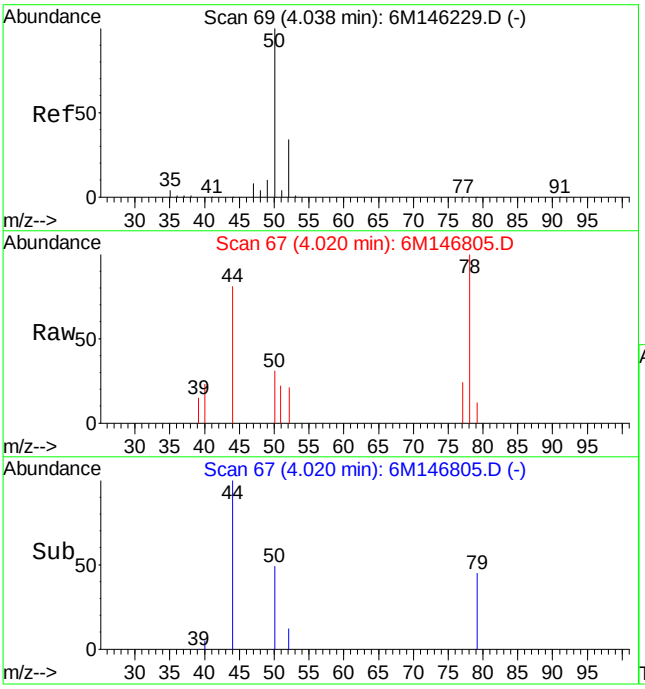
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146805.D Vial: 9
Acq On : 28 Apr 2017 10:29 Operator: TMB
Sample : L17041110-17 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



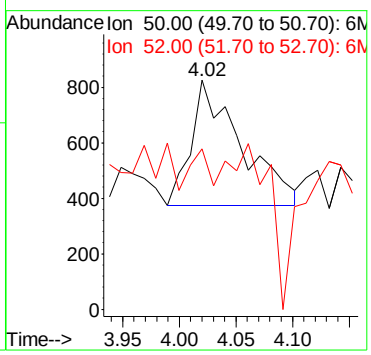
6M146805.D 8260BWT.M Sat Apr 29 12:16:18 2017 Page 2

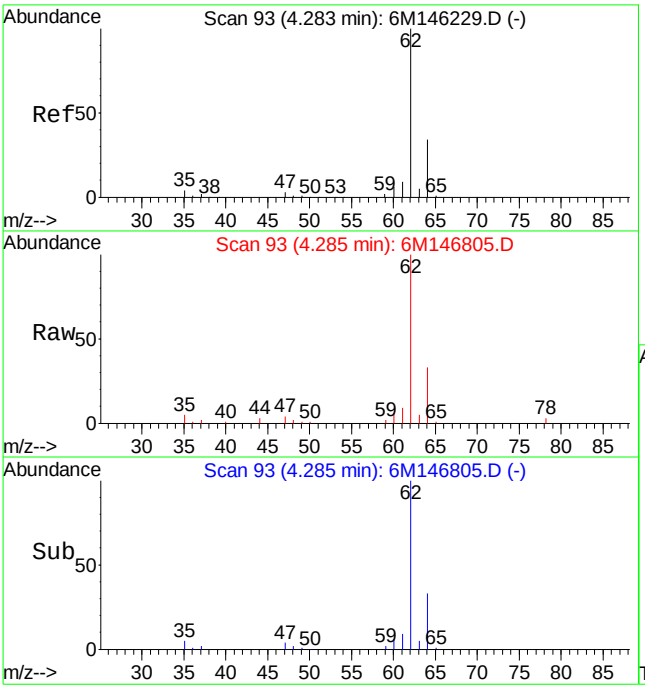


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 50 Resp: 1386

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

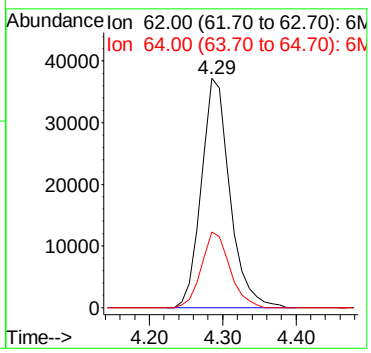


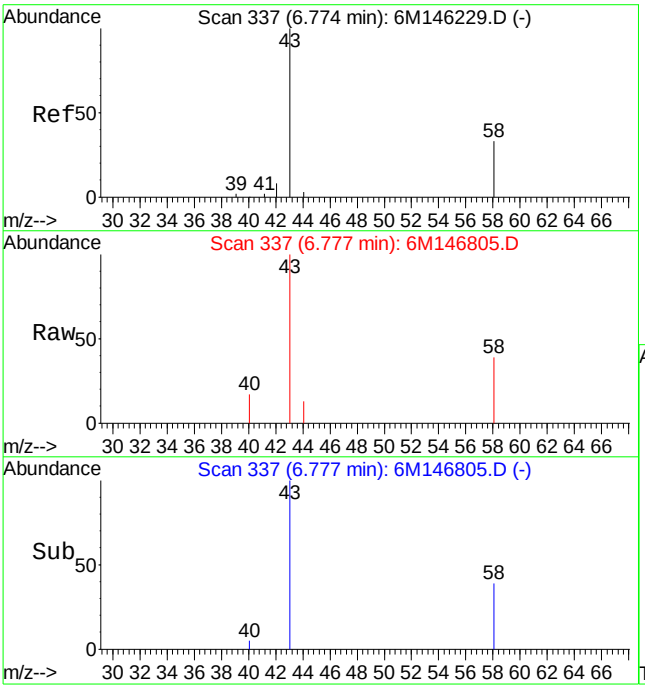


#4
Vinyl Chloride
Concen: 9.47 ug/L
RT: 4.29 min Scan# 93
Delta R.T. 0.01 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 62 Resp: 100057

Ion	Ratio	Lower	Upper
62	100		
64	32.8	19.3	45.1

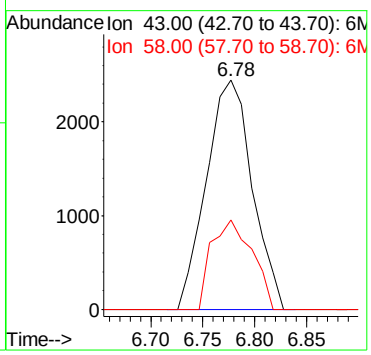


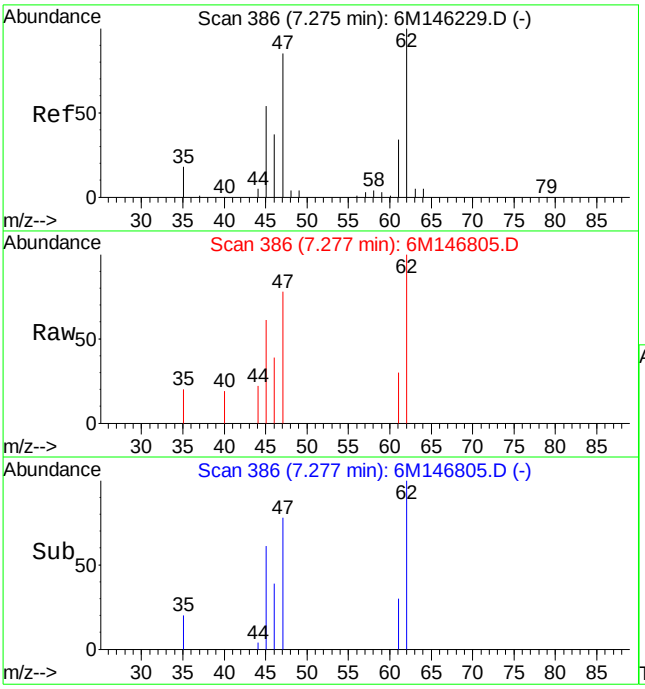


#13
Acetone
Concen: 5.98 ug/L
RT: 6.78 min Scan# 337
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 43 Resp: 7517

Ion	Ratio	Lower	Upper
43	100		
58	34.6	16.4	38.2

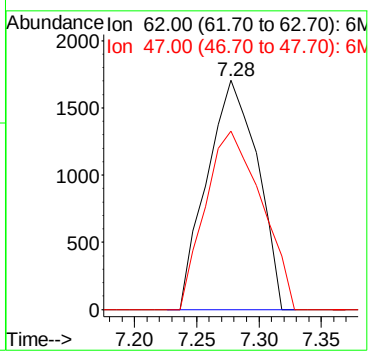


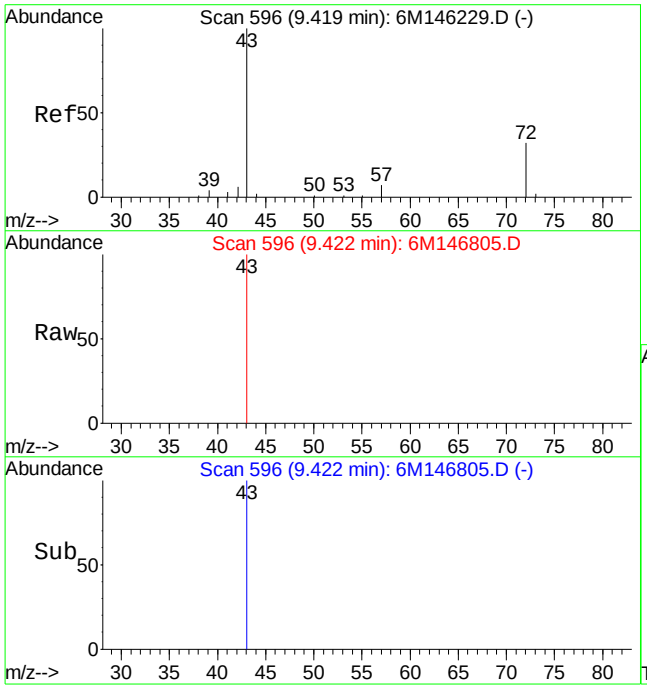


#16
Dimethyl Sulfide
Concen: 0.76 ug/L
RT: 7.28 min Scan# 386
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 62 Resp: 4804

Ion	Ratio	Lower	Upper
62	100		
47	86.8	64.7	151.1

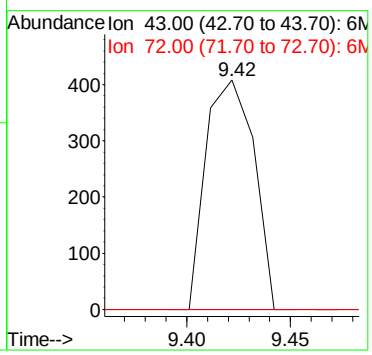


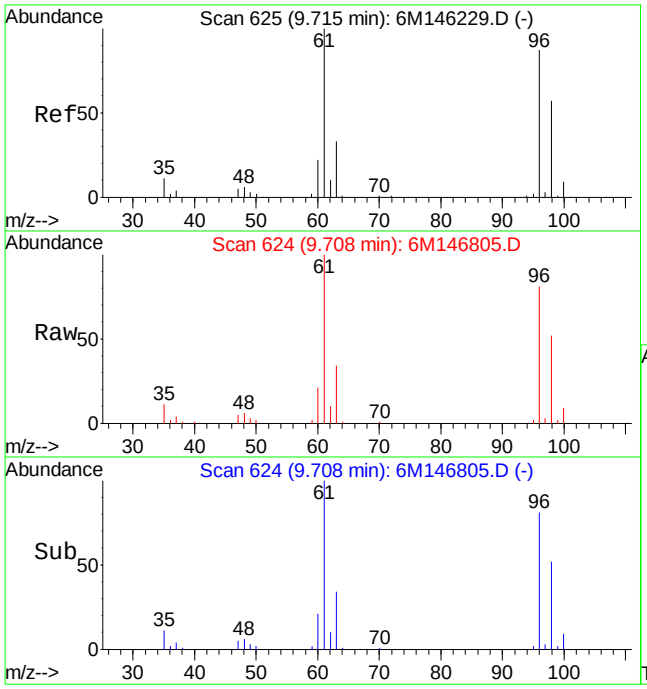


#29
2-Butanone
Concen: 0.41 ug/L
RT: 9.42 min Scan# 596
Delta R.T. 0.01 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 43 Resp: 657

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

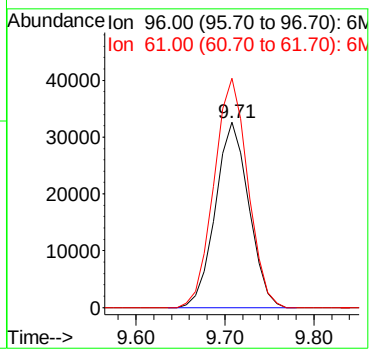


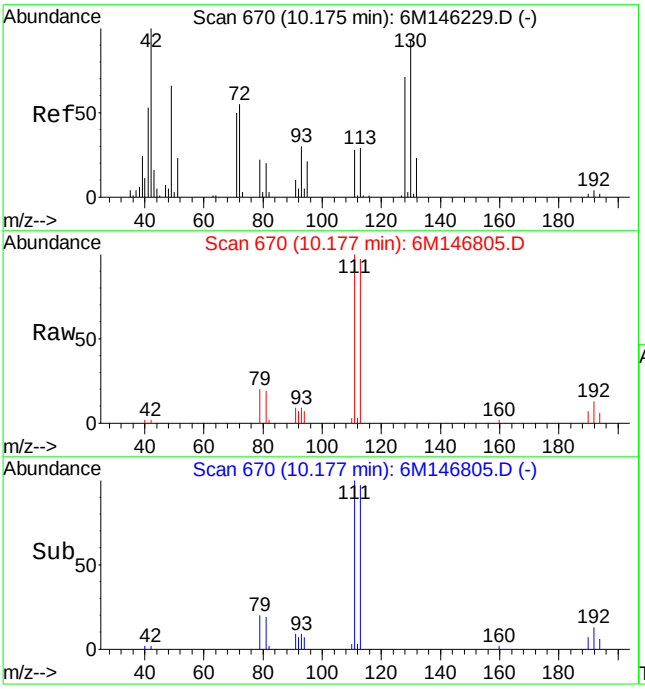


#32
cis-1,2-Dichloroethene
Concen: 12.13 ug/L
RT: 9.71 min Scan# 624
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 96 Resp: 85188

Ion	Ratio	Lower	Upper
96	100		
61	125.3	89.2	208.2

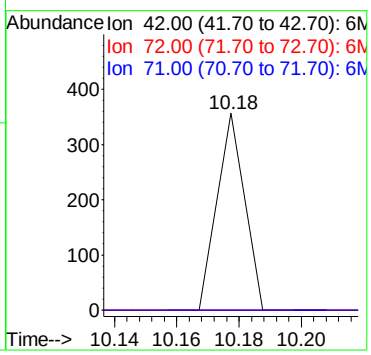


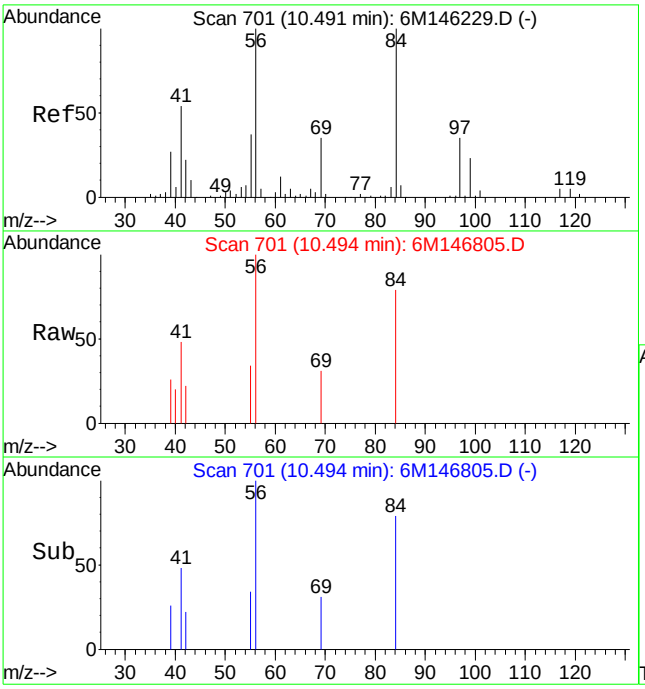


#36
Tetrahydrofuran
Concen: 0.21 ug/L
RT: 10.18 min Scan# 670
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 42 Resp: 219

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

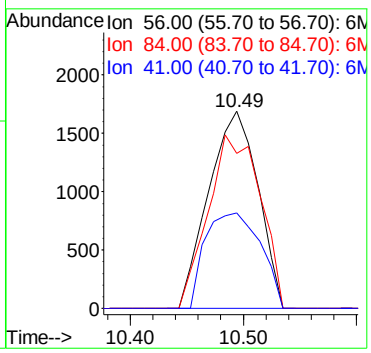


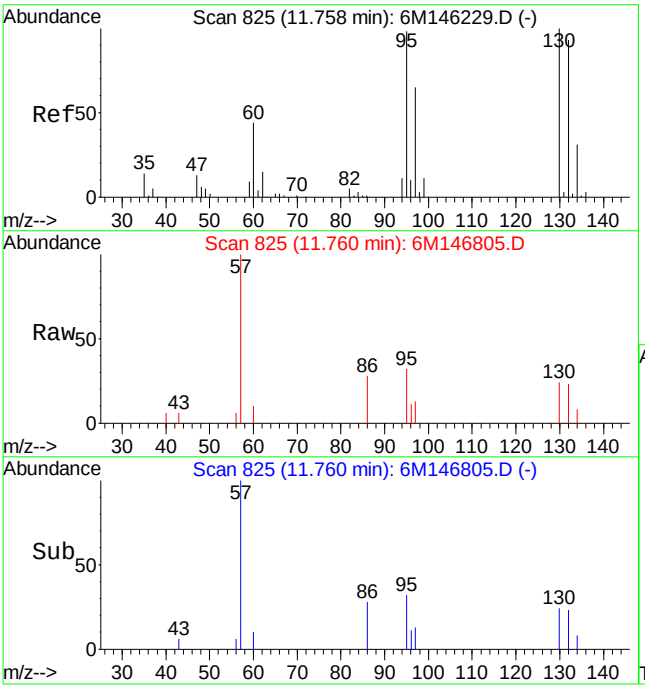


#39
Cyclohexane
Concen: 0.56 ug/L
RT: 10.49 min Scan# 701
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 56 Resp: 5117

Ion	Ratio	Lower	Upper
56	100		
84	92.8	43.6	101.6
41	54.4	37.1	86.5

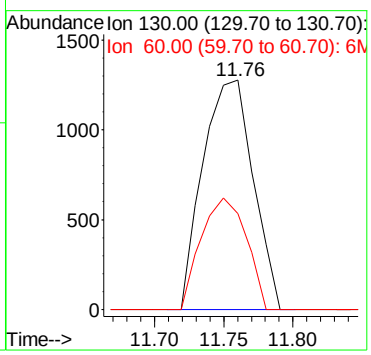


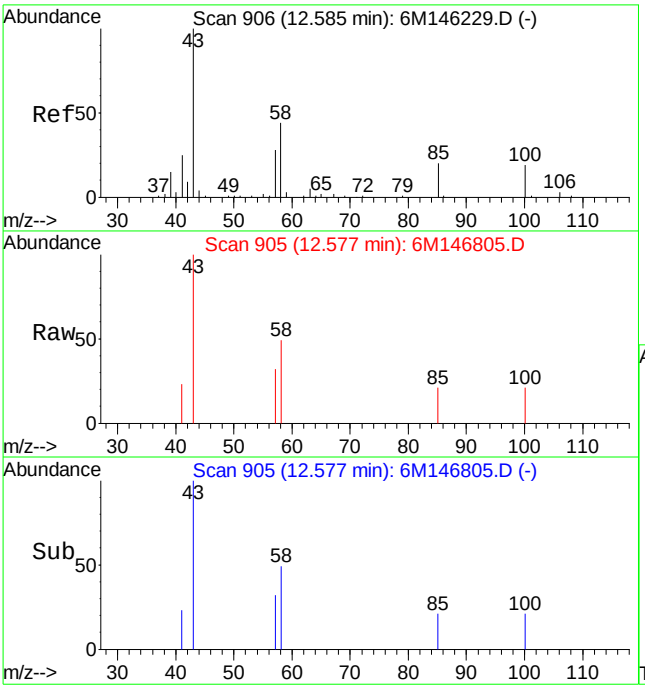


#47
Trichloroethene
Concen: 0.47 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion:130 Resp: 3218

Ion	Ratio	Lower	Upper
130	100		
60	43.8	32.0	74.6

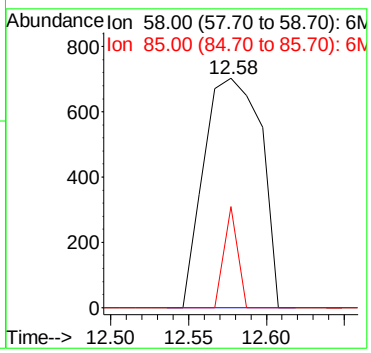


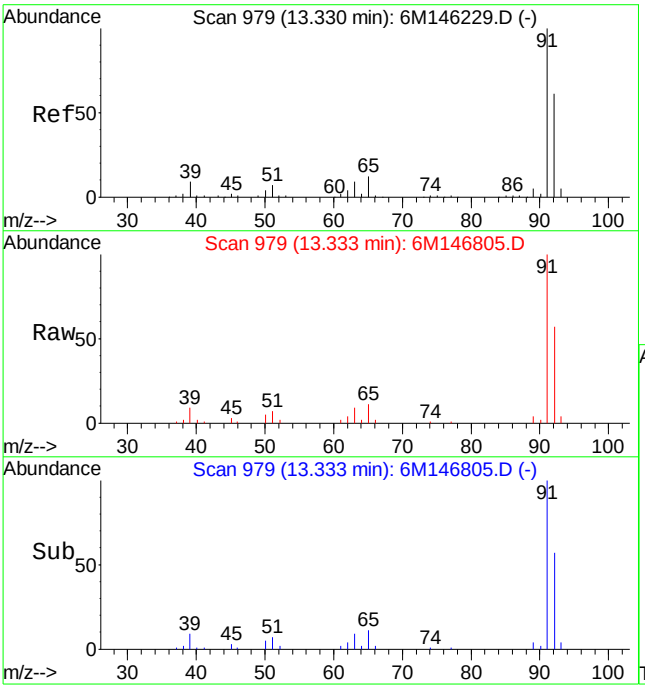


#54
4-Methyl-2-Pentanone
Concen: 1.18 ug/L
RT: 12.58 min Scan# 905
Delta R.T. -0.01 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 58 Resp: 1792

Ion	Ratio	Lower	Upper
58	100		
85	10.5	22.2	51.8#

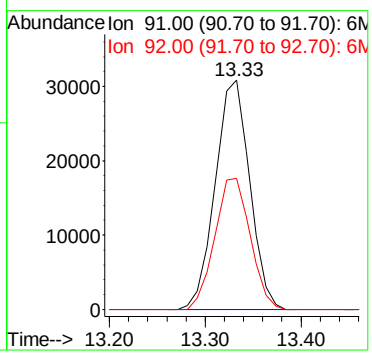


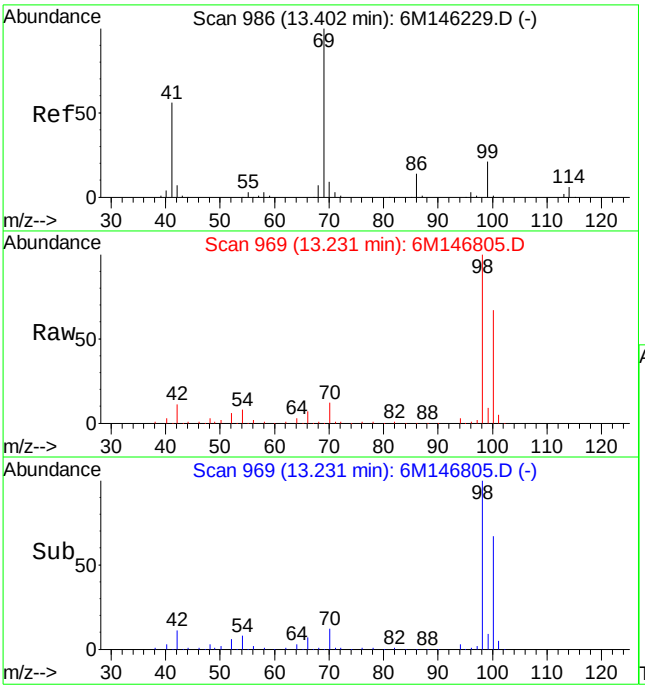


#59
Toluene
Concen: 3.05 ug/L
RT: 13.33 min Scan# 979
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 91 Resp: 76791

Ion	Ratio	Lower	Upper
91	100		
92	58.7	36.2	84.4

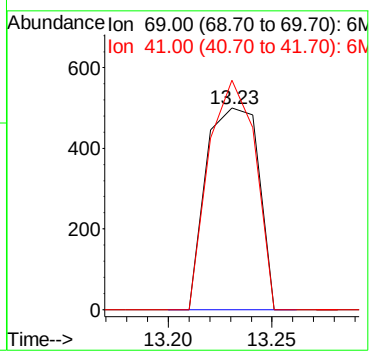


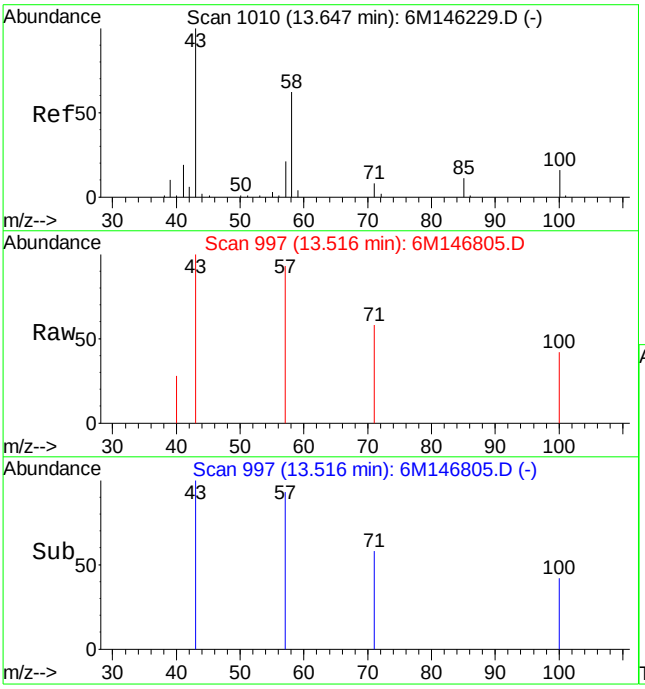


#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 69 Resp: 876

Ion	Ratio	Lower	Upper
69	100		
41	101.3	51.4	120.0

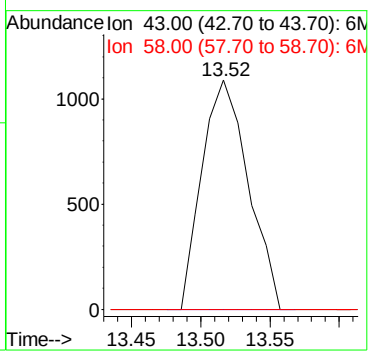


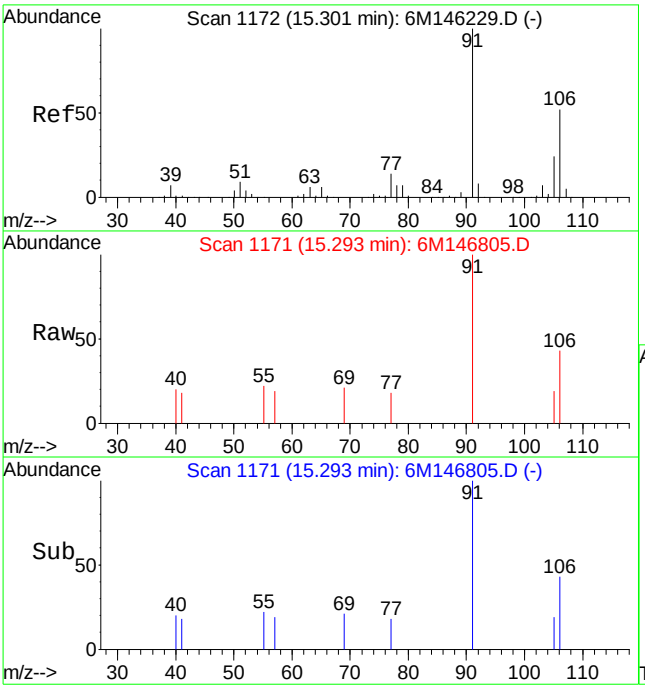


#64
2-Hexanone
Concen: 1.11 ug/L
RT: 13.52 min Scan# 997
Delta R.T. -0.12 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion: 43 Resp: 2530

Ion	Ratio	Lower	Upper
43	100		
58	0.0	29.6	69.2#

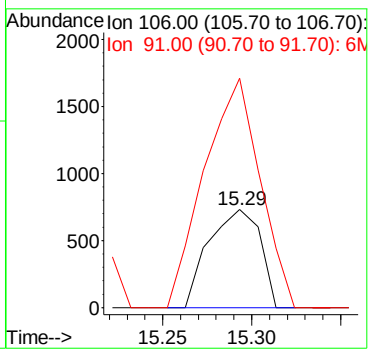




#73
m-,p-Xylene
Concen: 0.13 ug/L
RT: 15.29 min Scan# 1171
Delta R.T. 0.00 min
Lab File: 6M146805.D
Acq: 28 Apr 2017 10:29

Tgt Ion:106 Resp: 1466

Ion	Ratio	Lower	Upper
106	100		
91	253.8	123.8	288.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419219.D Vial: 20
Acq On : 27 Apr 2017 20:56 Operator: TMB
Sample : L17041110-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:18:45 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

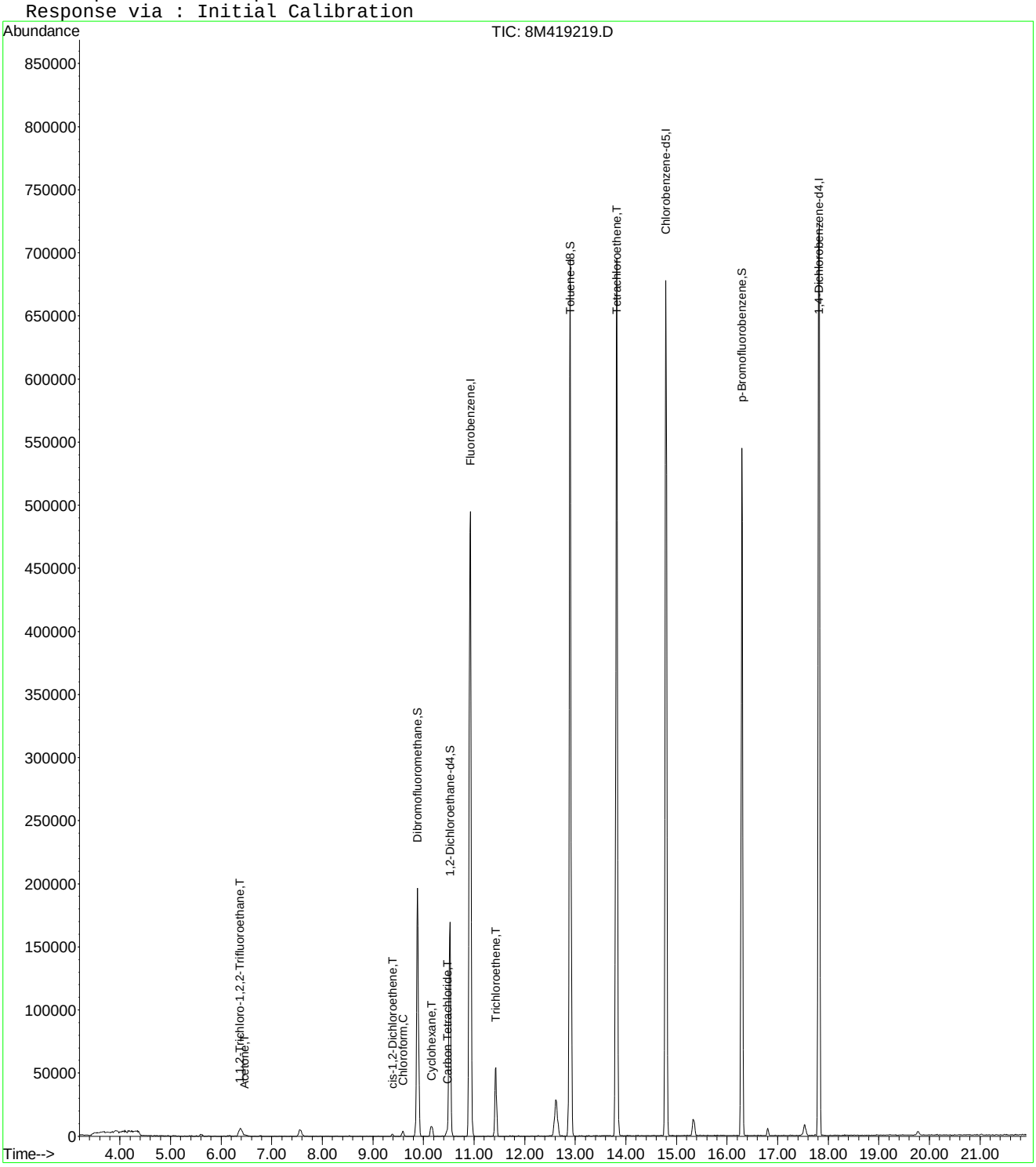
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	620343	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	499553	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	247429	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	164548	25.2892	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%			
43) 1,2-Dichloroethane-d4	10.52	65	149251	26.5333	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.12%			
58) Toluene-d8	12.90	98	613648	26.8843	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.52%			
80) p-Bromofluorobenzene	16.29	95	231940	26.5605	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.24%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.37	101	8468	1.3794	ug/L	97
13) Acetone	6.46	43	2913	3.3388	ug/L #	55
32) cis-1,2-Dichloroethene	9.39	96	1149	0.1590	ug/L	89
33) Chloroform	9.59	83	5328	0.4275	ug/L	90
39) Cyclohexane	10.16	56	7028	0.7504	ug/L	85
42) Carbon Tetrachloride	10.47	117	4977	0.5336	ug/L	97
47) Trichloroethene	11.43	130	24263	3.3703	ug/L	99
66) Tetrachloroethene	13.82	164	209471	35.8627	ug/L	96

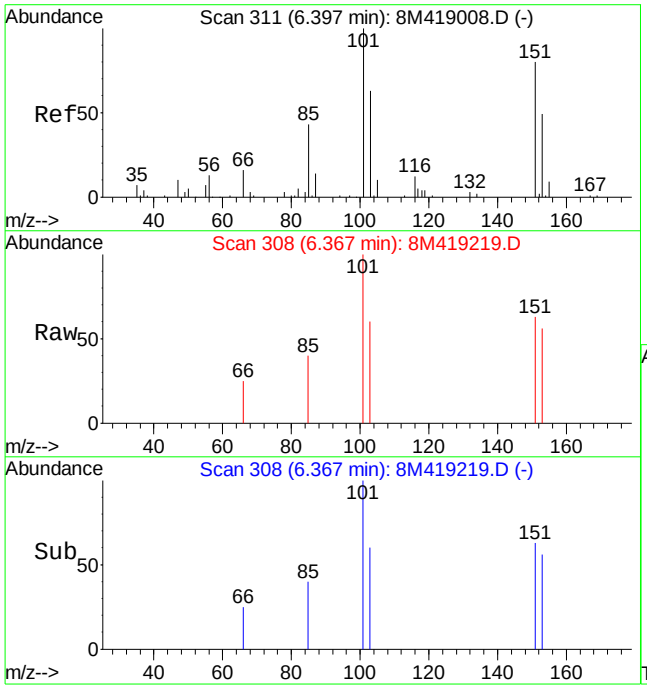
(#) = qualifier out of range (m) = manual integration
8M419219.D 8260WT.M Fri Apr 28 06:56:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419219.D Vial: 20
Acq On : 27 Apr 2017 20:56 Operator: TMB
Sample : L17041110-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

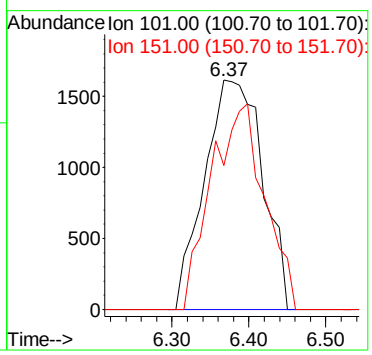


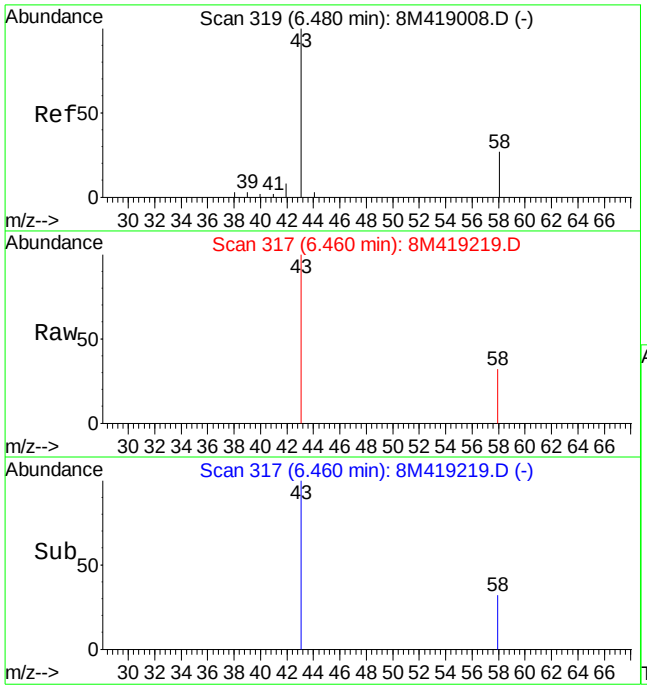


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.38 ug/L
RT: 6.37 min Scan# 308
Delta R.T. -0.03 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion:101 Resp: 8468

Ion	Ratio	Lower	Upper
101	100		
151	82.1	39.9	119.9

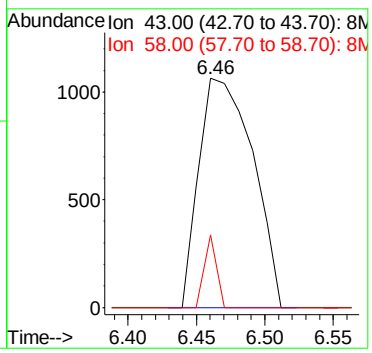


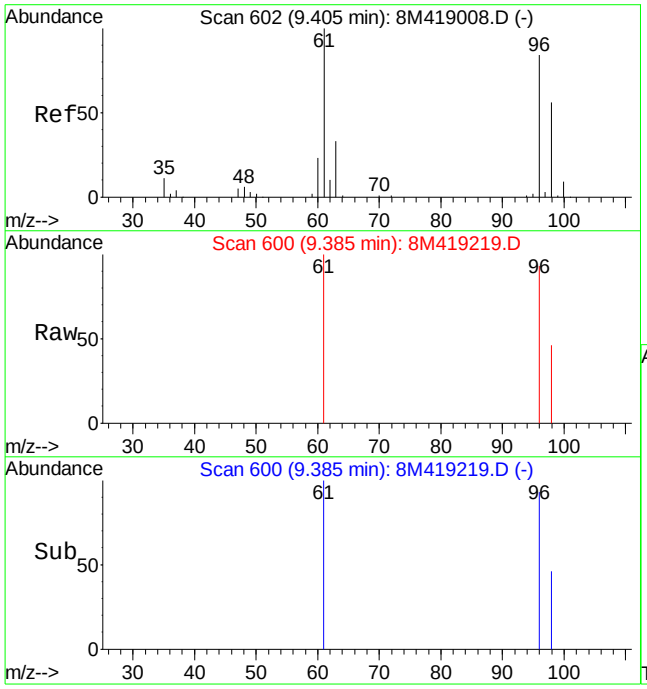


#13
Acetone
Concen: 3.34 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion: 43 Resp: 2913

Ion	Ratio	Lower	Upper
43	100		
58	7.2	19.4	45.4#

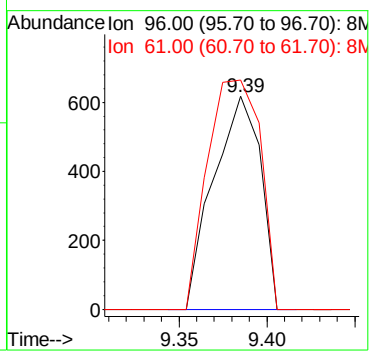


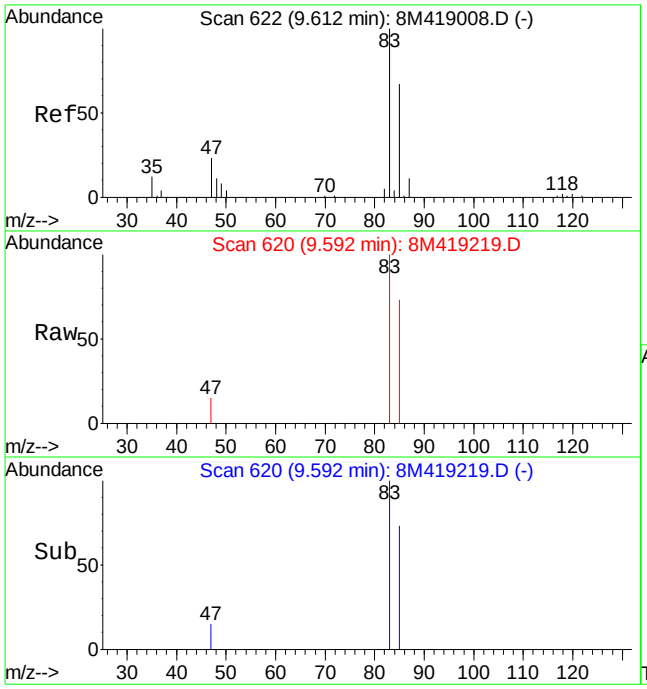


#32
cis-1,2-Dichloroethene
Concen: 0.16 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion: 96 Resp: 1149

Ion	Ratio	Lower	Upper
96	100		
61	121.1	80.3	187.3

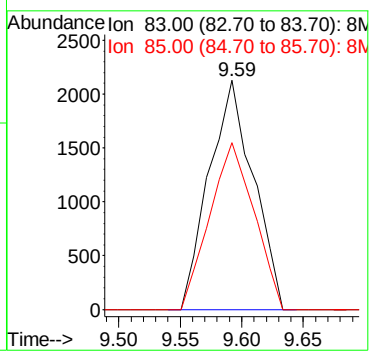


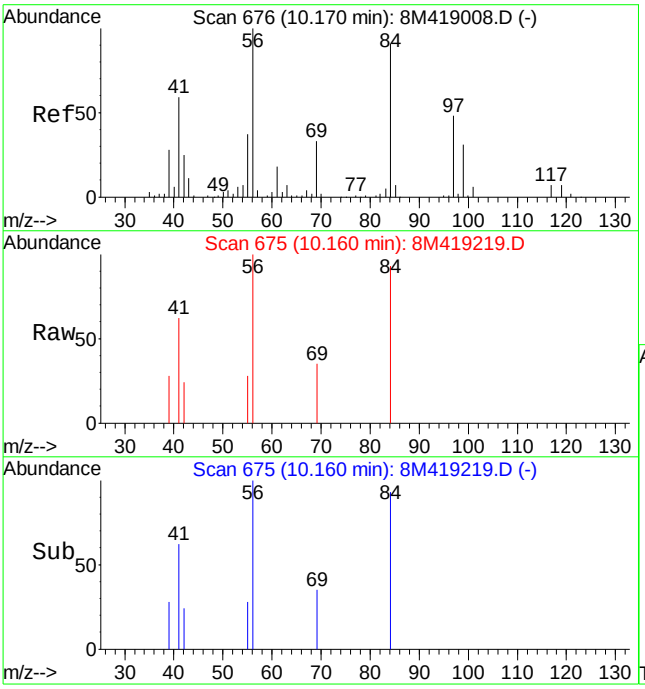


#33
Chloroform
Concen: 0.43 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion: 83 Resp: 5328

Ion	Ratio	Lower	Upper
83	100		
85	72.8	39.1	91.3

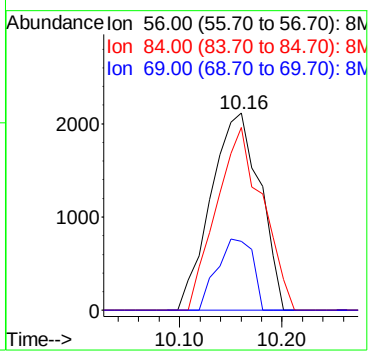


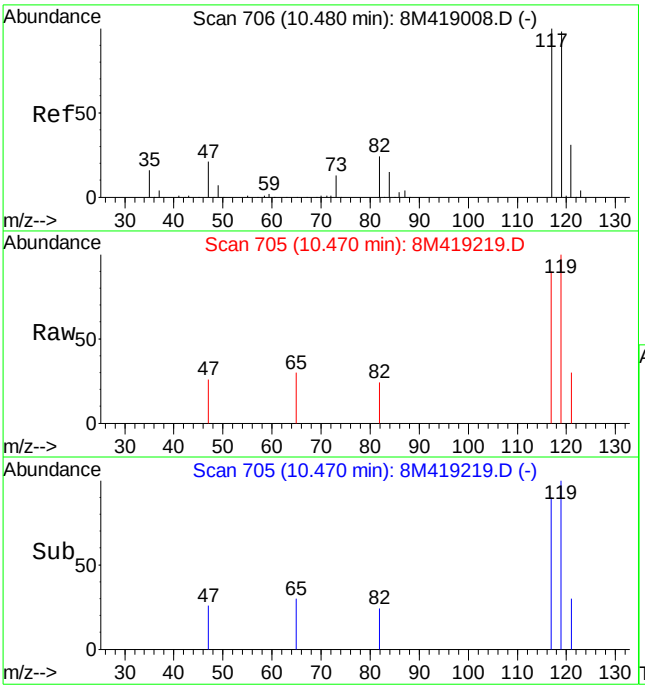


#39
Cyclohexane
Concen: 0.75 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion: 56 Resp: 7028

Ion	Ratio	Lower	Upper
56	100		
84	87.2	61.6	143.8
69	26.3	21.4	50.0

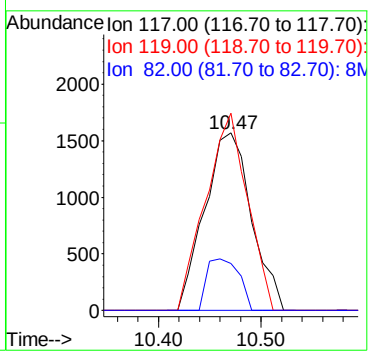


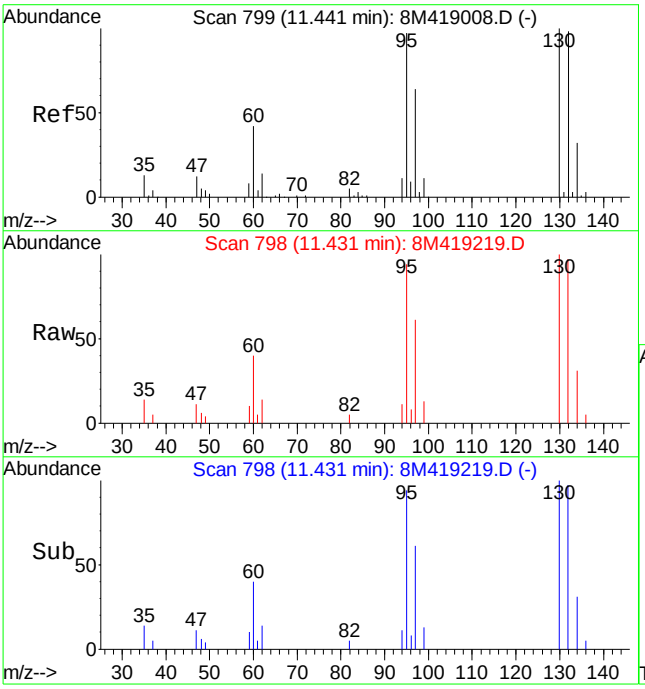


#42
Carbon Tetrachloride
Concen: 0.53 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion:117 Resp: 4977

Ion	Ratio	Lower	Upper
117	100		
119	99.1	58.5	136.5
82	20.0	14.9	34.9

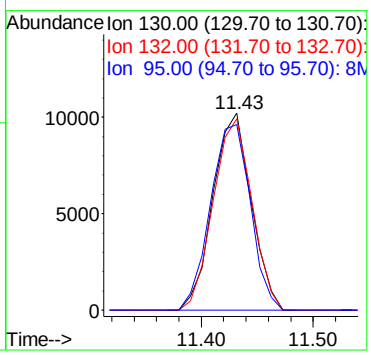


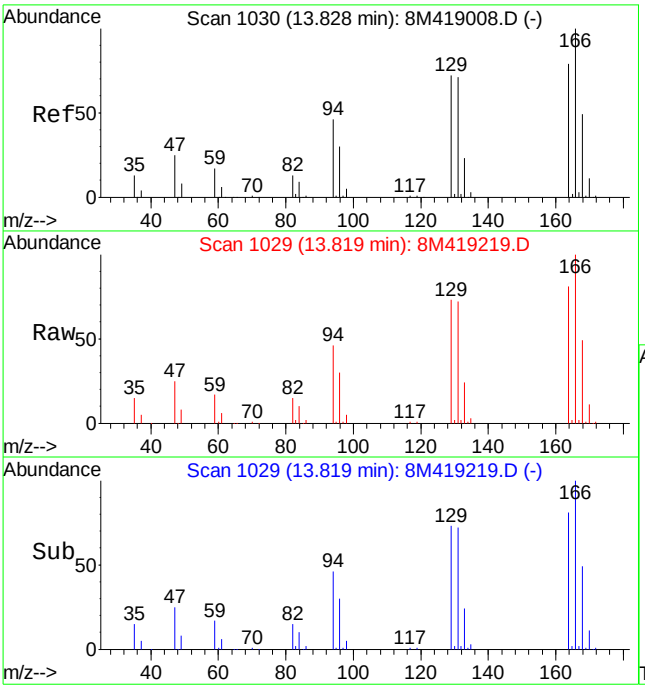


#47
Trichloroethene
Concen: 3.37 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion:130 Resp: 24263

Ion	Ratio	Lower	Upper
130	100		
132	98.1	59.4	138.6
95	98.4	60.1	140.3

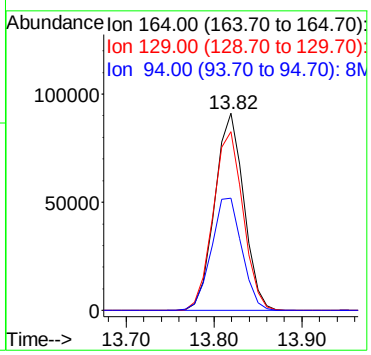




#66
Tetrachloroethene
Concen: 35.86 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419219.D
Acq: 27 Apr 2017 20:56

Tgt Ion:164 Resp: 209471

Ion	Ratio	Lower	Upper
164	100		
129	93.1	53.4	124.6
94	59.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419220.D Vial: 21
Acq On : 27 Apr 2017 21:26 Operator: TMB
Sample : L17041110-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:48:52 2017 Quant Results File: 8260WT.RES

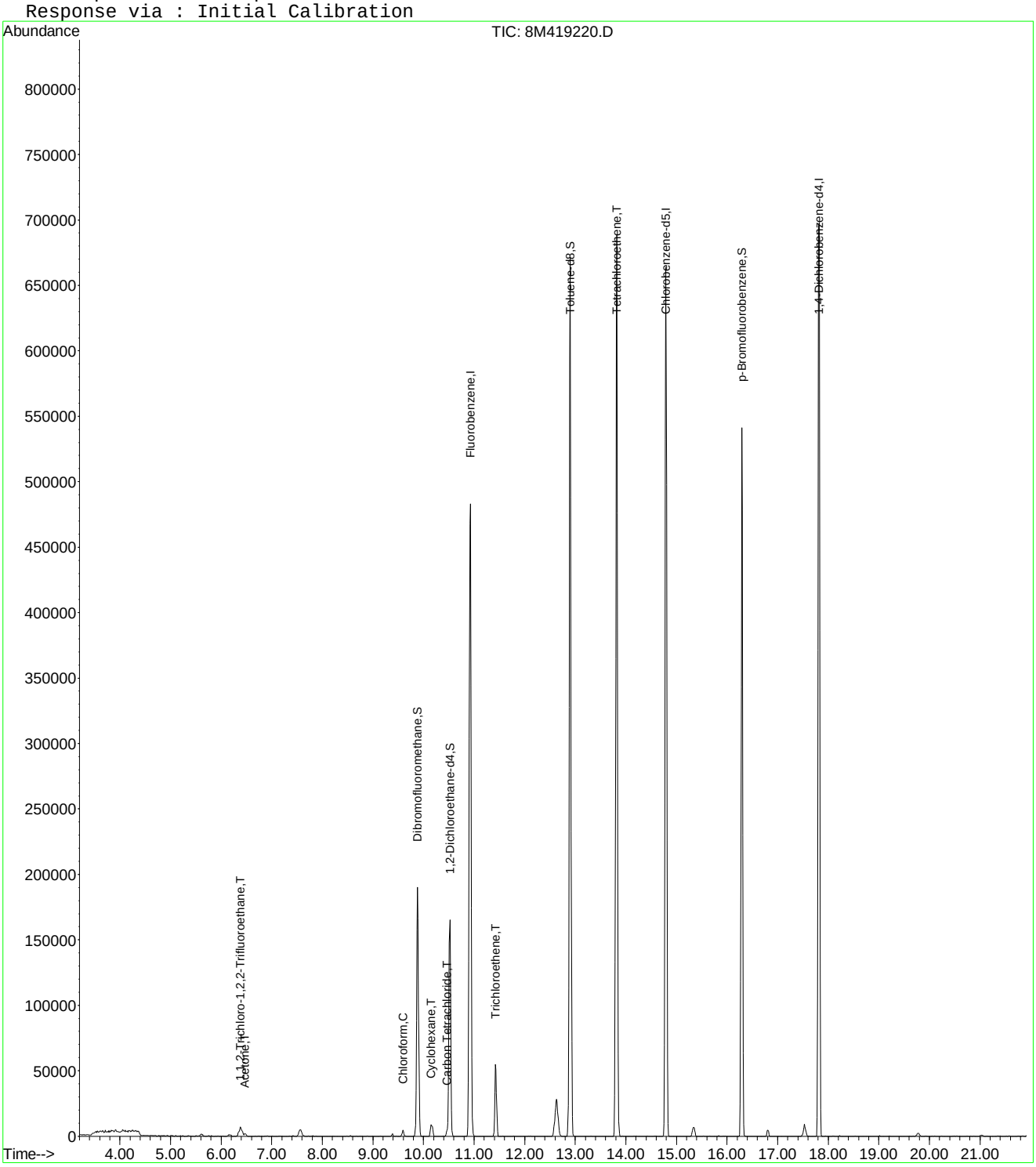
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

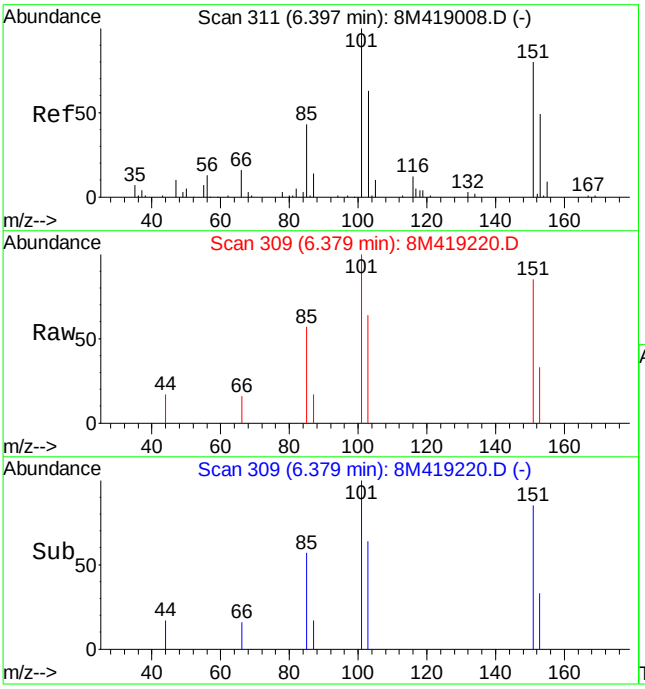
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	599951	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	490646	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	243493	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	161036	25.5906	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.36%			
43) 1,2-Dichloroethane-d4	10.52	65	140119	25.7565	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.04%			
58) Toluene-d8	12.90	98	600757	26.7974	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.20%			
80) p-Bromofluorobenzene	16.29	95	230528	26.8255	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.32%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	8322	1.4017	ug/L	98
13) Acetone	6.47	43	4106	4.8661	ug/L #	76
33) Chloroform	9.59	83	5074	0.4209	ug/L	91
39) Cyclohexane	10.15	56	7350	0.8115	ug/L	82
42) Carbon Tetrachloride	10.46	117	4737	0.5251	ug/L	90
47) Trichloroethene	11.42	130	24704	3.5482	ug/L	93
66) Tetrachloroethene	13.82	164	206668	36.0251	ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419220.D 8260WT.M Fri Apr 28 06:56:54 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419220.D Vial: 21
Acq On : 27 Apr 2017 21:26 Operator: TMB
Sample : L17041110-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:48 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

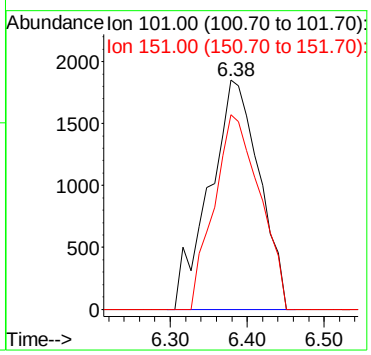


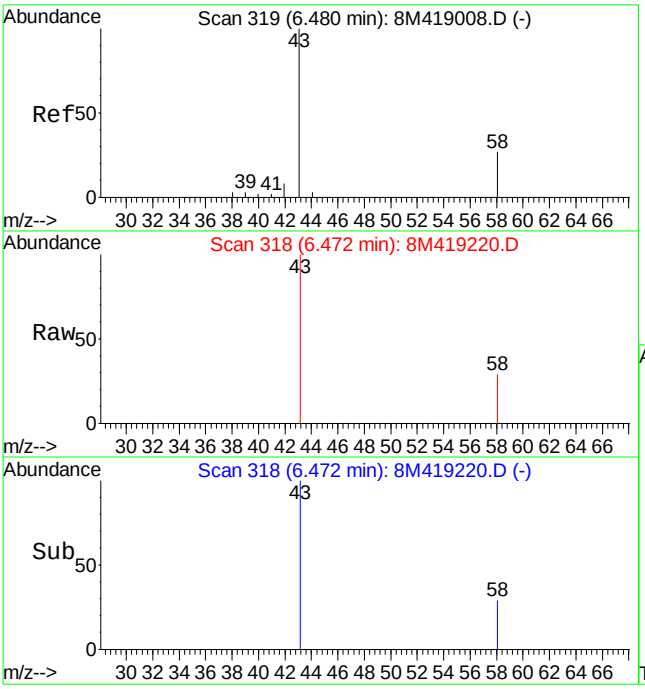


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.40 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion:101 Resp: 8322

Ion	Ratio	Lower	Upper
101	100		
151	78.3	39.9	119.9

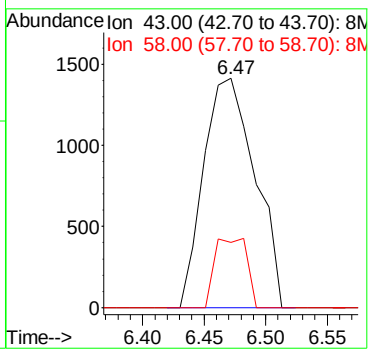


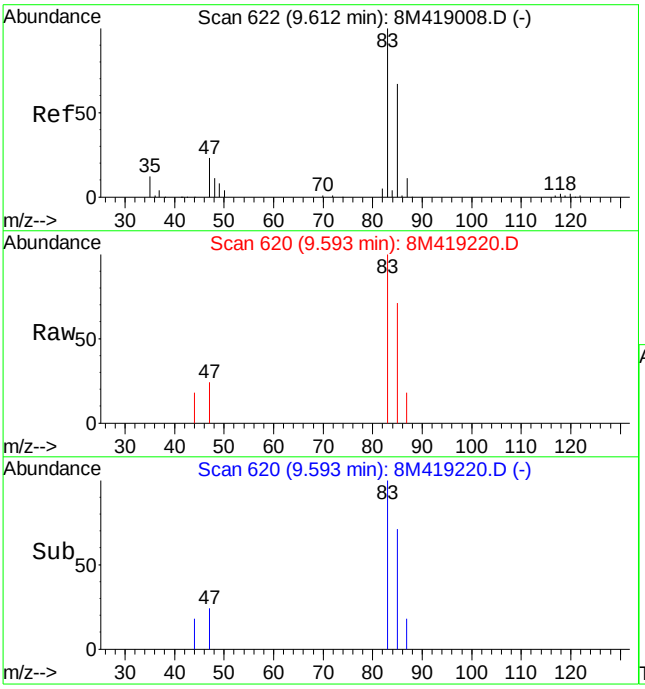


#13
Acetone
Concen: 4.87 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion: 43 Resp: 4106

Ion	Ratio	Lower	Upper
43	100		
58	18.9	19.4	45.4#

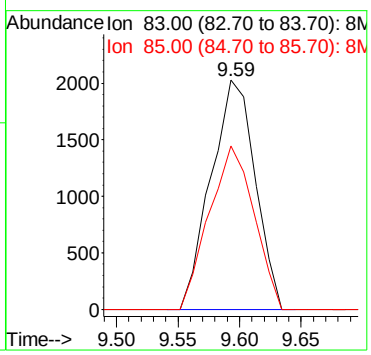


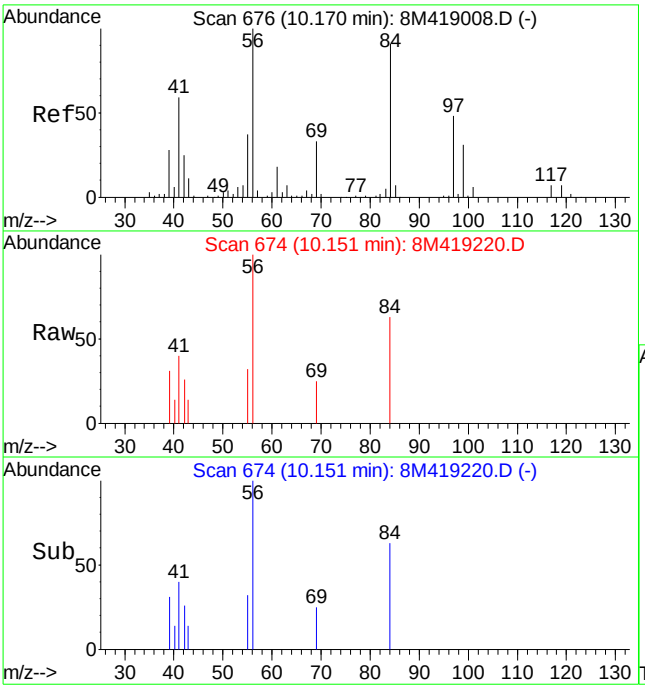


#33
Chloroform
Concen: 0.42 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion: 83 Resp: 5074

Ion	Ratio	Lower	Upper
83	100		
85	72.2	39.1	91.3

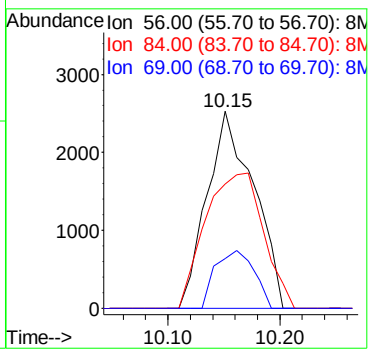


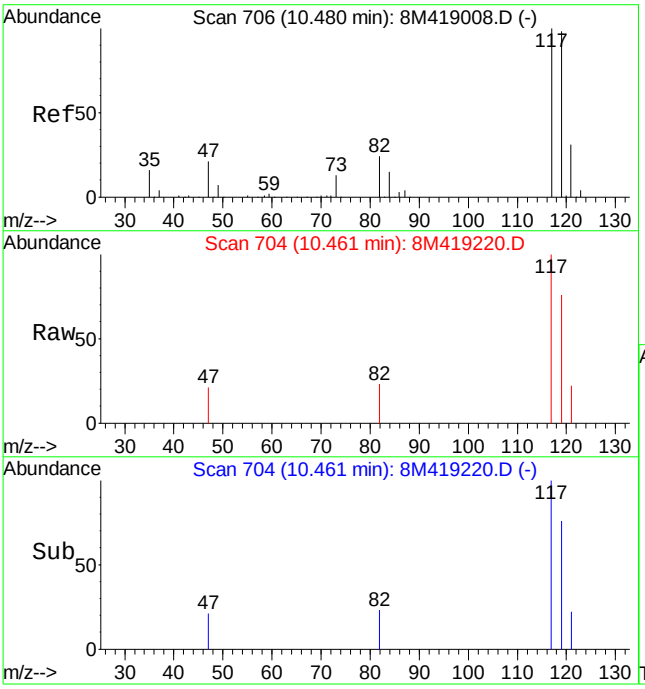


#39
Cyclohexane
Concen: 0.81 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion: 56 Resp: 7350

Ion	Ratio	Lower	Upper
56	100		
84	85.0	61.6	143.8
69	24.4	21.4	50.0

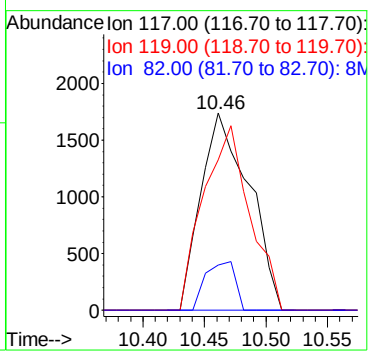


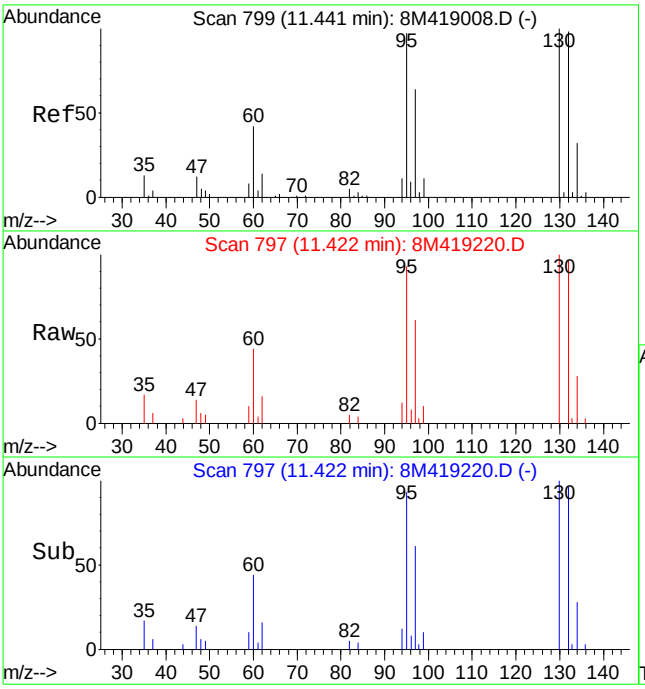


#42
Carbon Tetrachloride
Concen: 0.53 ug/L
RT: 10.46 min Scan# 704
Delta R.T. -0.01 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion:117 Resp: 4737

Ion	Ratio	Lower	Upper
117	100		
119	89.8	58.5	136.5
82	15.1	14.9	34.9

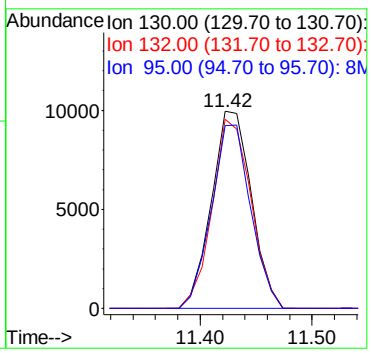


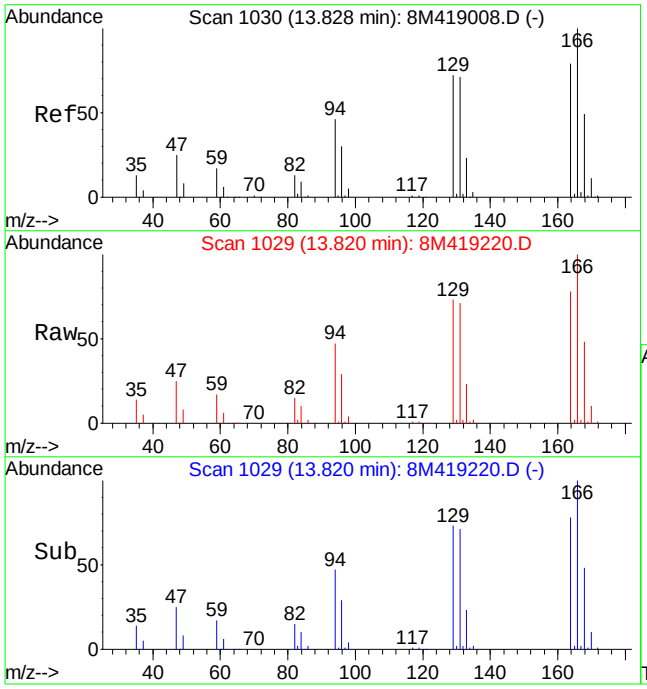


#47
Trichloroethene
Concen: 3.55 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion:130 Resp: 24704

Ion	Ratio	Lower	Upper
130	100		
132	92.9	59.4	138.6
95	91.6	60.1	140.3

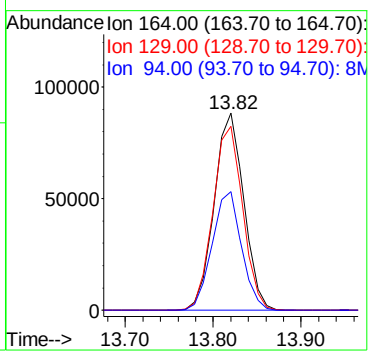




#66
Tetrachloroethene
Concen: 36.03 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419220.D
Acq: 27 Apr 2017 21:26

Tgt Ion:164 Resp: 206668

Ion	Ratio	Lower	Upper
164	100		
129	93.6	53.4	124.6
94	59.8	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419215.D Vial: 16
Acq On : 27 Apr 2017 18:56 Operator: TMB
Sample : L17041110-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 19:18:25 2017 Quant Results File: 8260WT.RES

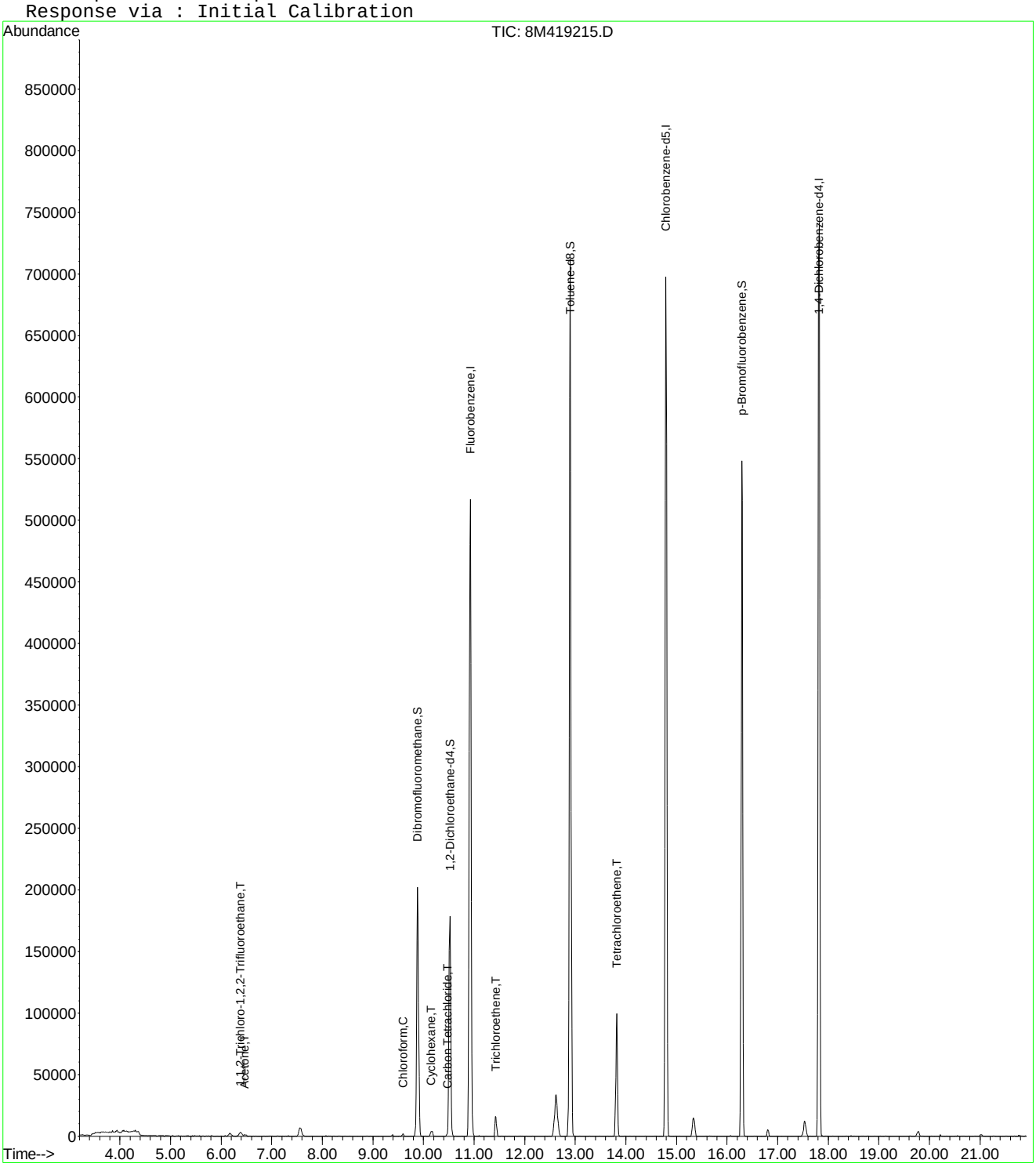
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

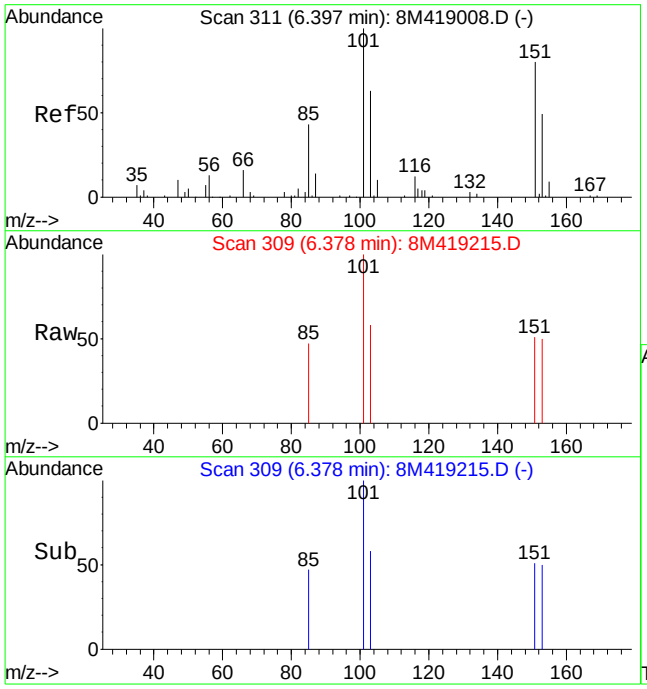
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	638156	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	510769	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	255548	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	168246	25.1357 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.56%		
43) 1,2-Dichloroethane-d4	10.52	65	148439	25.6523 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.60%		
58) Toluene-d8	12.90	98	632159	27.0872 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.36%		
80) p-Bromofluorobenzene	16.29	95	238855	26.4833 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.92%		
Target Compounds					Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	3586	0.5679 ug/L	94
13) Acetone	6.46	43	3168	3.5297 ug/L #	42
33) Chloroform	9.59	83	2143	0.1671 ug/L	93
39) Cyclohexane	10.15	56	3623	0.3761 ug/L #	77
42) Carbon Tetrachloride	10.47	117	1972	0.2055 ug/L #	65
47) Trichloroethene	11.43	130	7788	1.0516 ug/L	95
66) Tetrachloroethene	13.82	164	30821	5.1609 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419215.D 8260WT.M Fri Apr 28 06:56:33 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419215.D Vial: 16
Acq On : 27 Apr 2017 18:56 Operator: TMB
Sample : L17041110-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 19:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

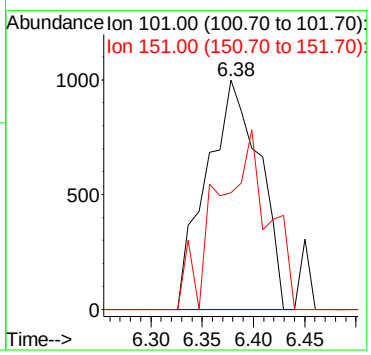


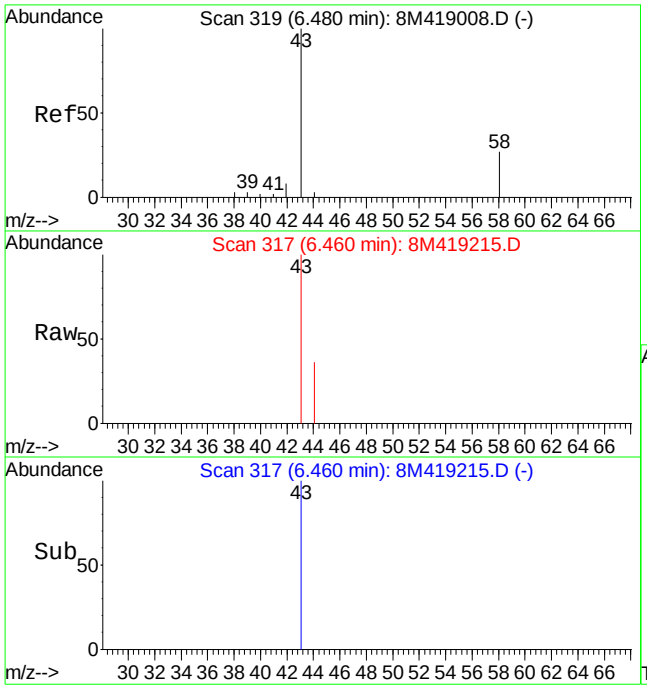


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.57 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion:101 Resp: 3586

Ion	Ratio	Lower	Upper
101	100		
151	74.8	39.9	119.9

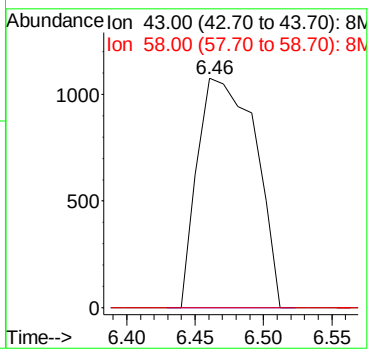


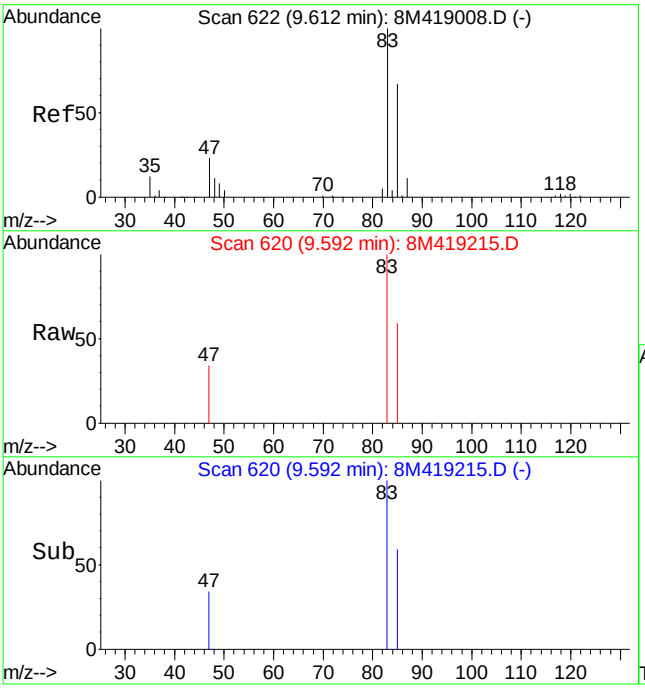


#13
Acetone
Concen: 3.53 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion: 43 Resp: 3168

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

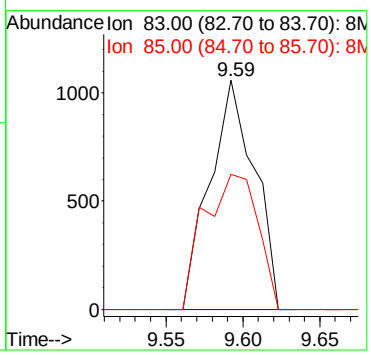


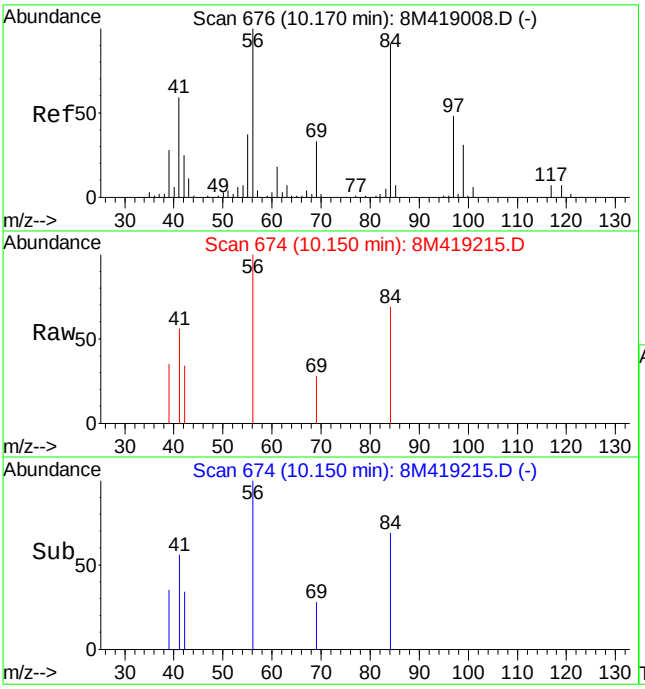


#33
Chloroform
Concen: 0.17 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion: 83 Resp: 2143

Ion	Ratio	Lower	Upper
83	100		
85	70.7	39.1	91.3

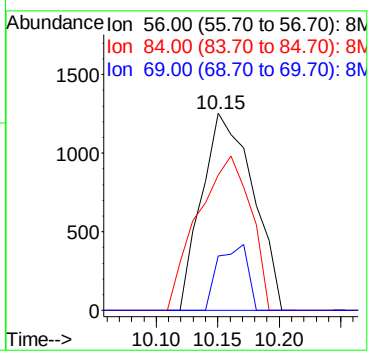


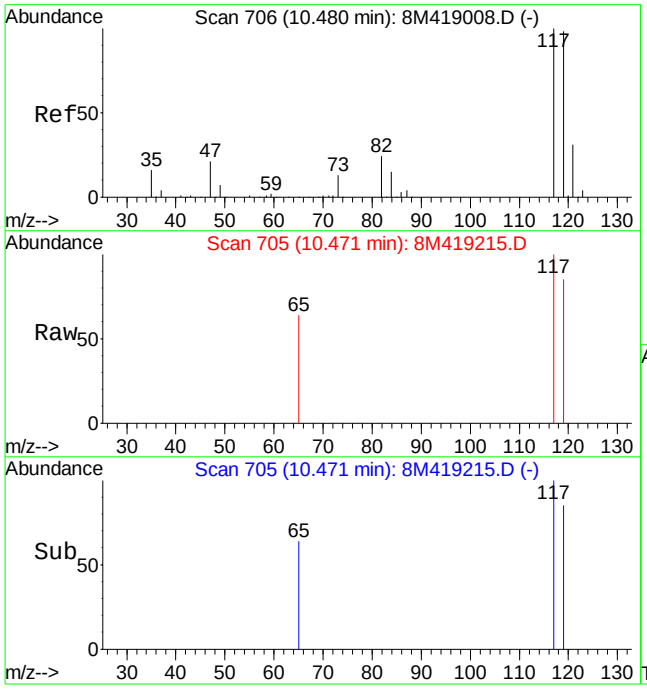


#39
Cyclohexane
Concen: 0.38 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion: 56 Resp: 3623

Ion	Ratio	Lower	Upper
56	100		
84	81.0	61.6	143.8
69	19.2	21.4	50.0#

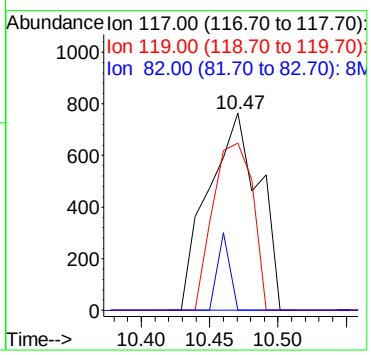


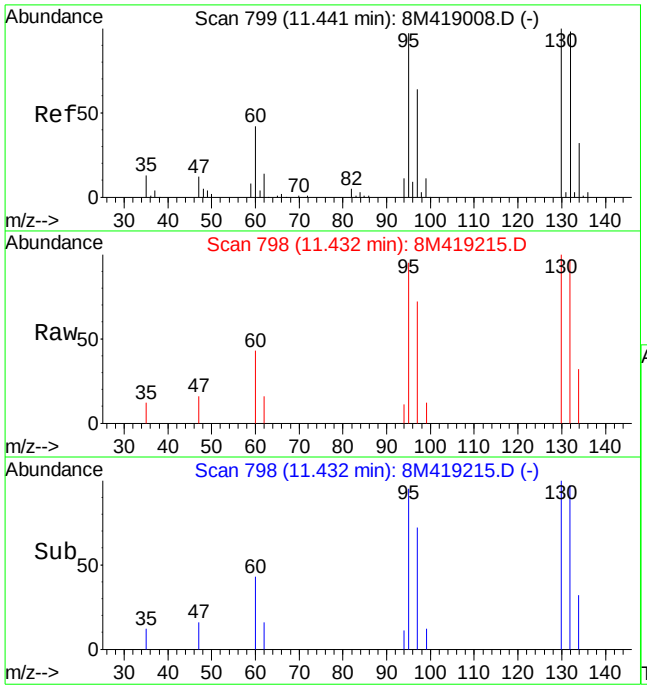


#42
Carbon Tetrachloride
Concen: 0.21 ug/L
RT: 10.47 min Scan# 705
Delta R.T. -0.00 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion:117 Resp: 1972

Ion	Ratio	Lower	Upper
117	100		
119	66.4	58.5	136.5
82	0.0	14.9	34.9#

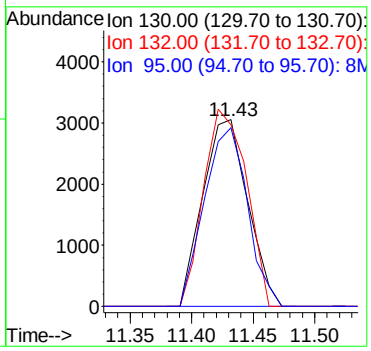


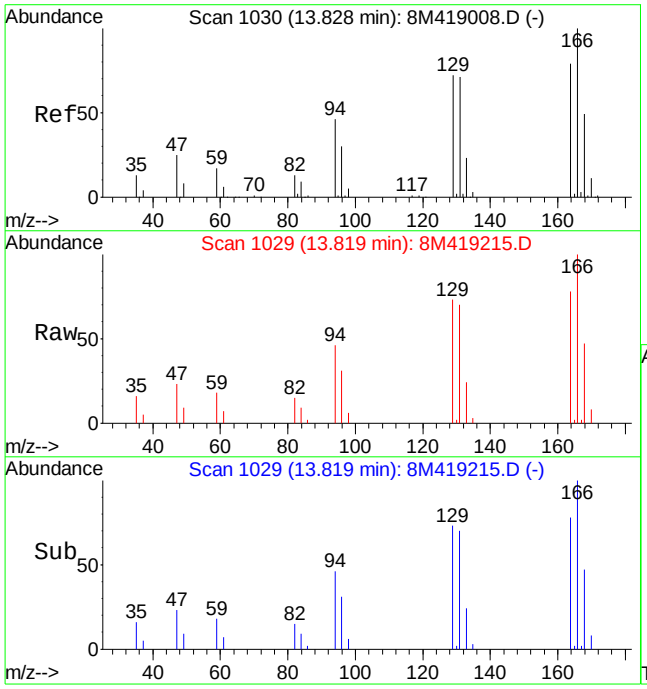


#47
Trichloroethene
Concen: 1.05 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion:130 Resp: 7788

Ion	Ratio	Lower	Upper
130	100		
132	100.4	59.4	138.6
95	91.4	60.1	140.3

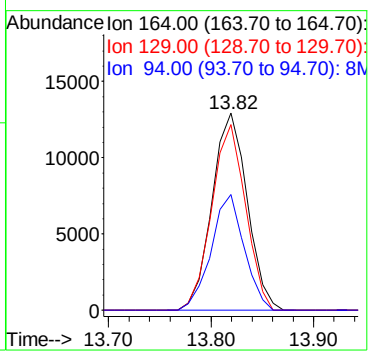




#66
Tetrachloroethene
Concen: 5.16 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419215.D
Acq: 27 Apr 2017 18:56

Tgt Ion:164 Resp: 30821

Ion	Ratio	Lower	Upper
164	100		
129	90.7	53.4	124.6
94	55.2	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419216.D Vial: 17
Acq On : 27 Apr 2017 19:25 Operator: TMB
Sample : L17041110-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 19:47:51 2017 Quant Results File: 8260WT.RES

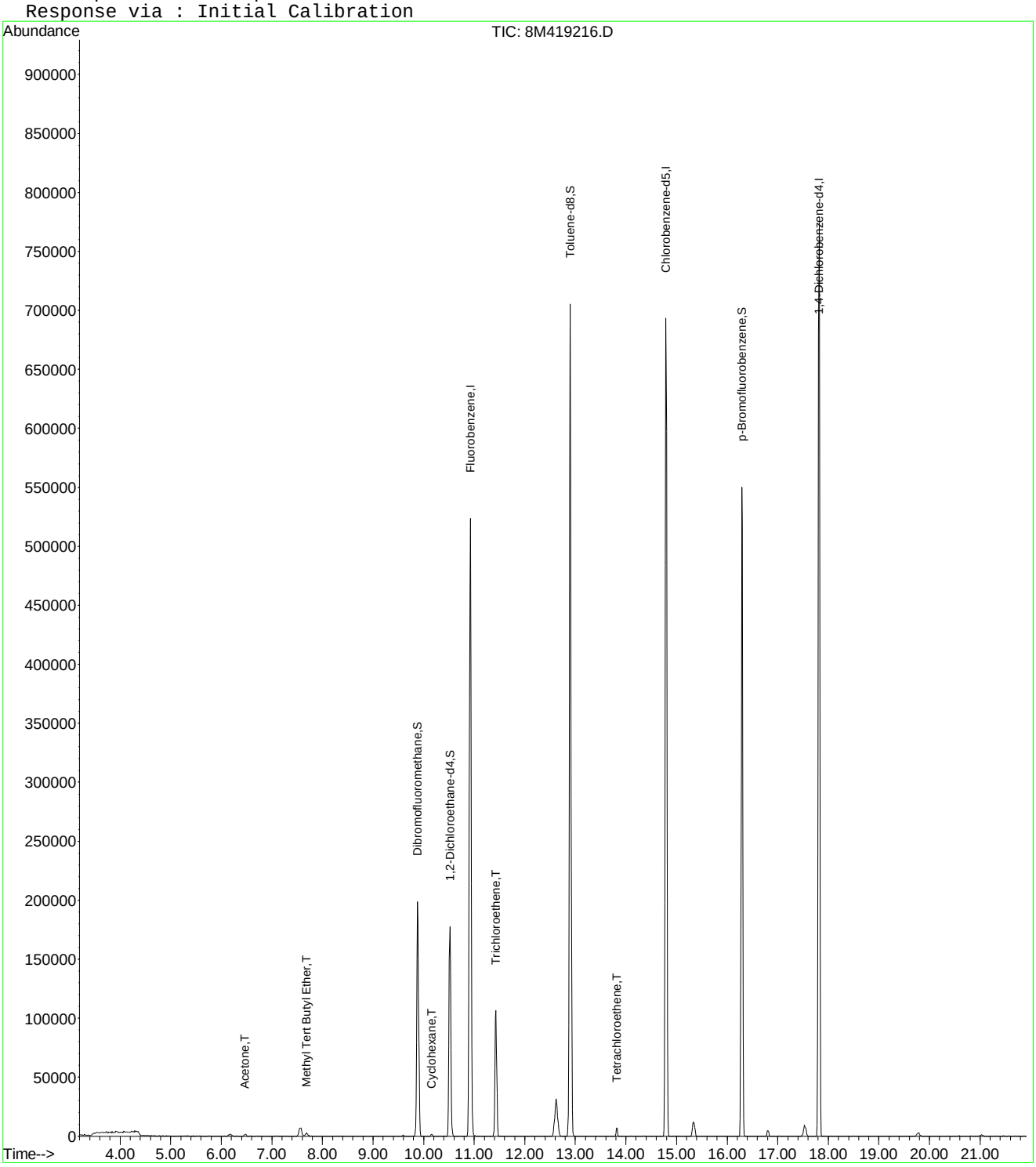
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

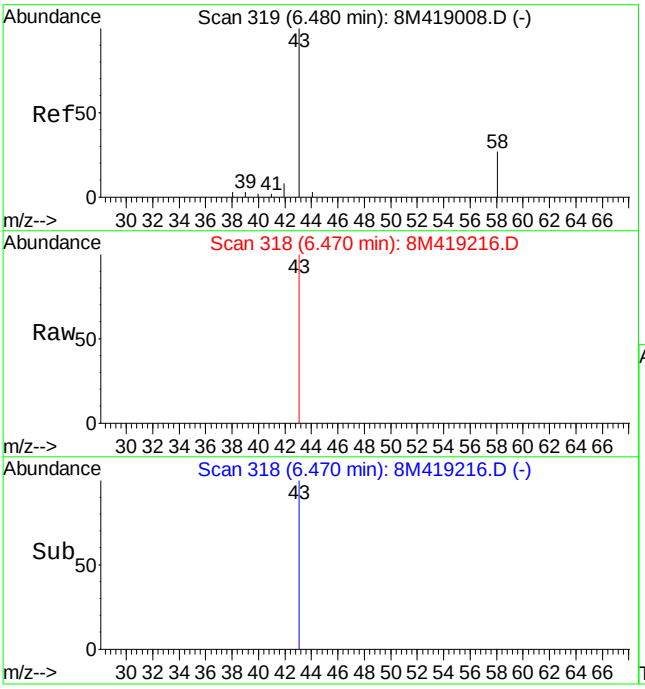
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	632248	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	512291	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	254272	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	167920	25.3215 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.28%		
43) 1,2-Dichloroethane-d4	10.52	65	149603	26.0951 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.40%		
58) Toluene-d8	12.90	98	620913	26.5262 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.12%		
80) p-Bromofluorobenzene	16.29	95	238471	26.5735 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.28%		
Target Compounds					Qvalue
13) Acetone	6.47	43	3717	4.1801 ug/L #	63
22) Methyl Tert Butyl Ether	7.69	73	6457	0.4980 ug/L #	73
39) Cyclohexane	10.16	56	1404	0.1471 ug/L #	79
47) Trichloroethene	11.43	130	47192	6.4318 ug/L	97
66) Tetrachloroethene	13.82	164	2498	0.4170 ug/L	93

(#) = qualifier out of range (m) = manual integration
8M419216.D 8260WT.M Fri Apr 28 06:56:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419216.D Vial: 17
Acq On : 27 Apr 2017 19:25 Operator: TMB
Sample : L17041110-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 19:47 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

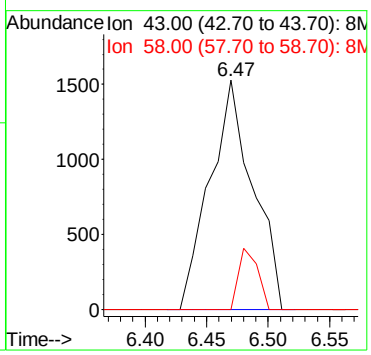


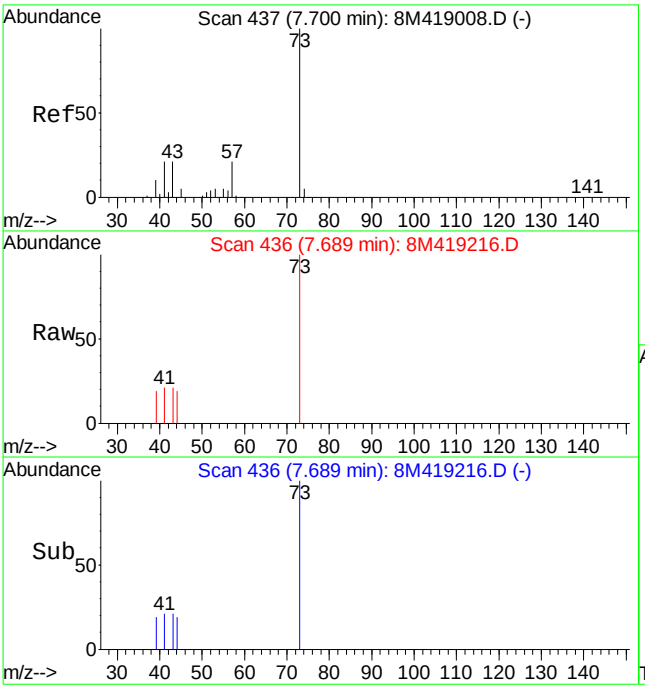


#13
Acetone
Concen: 4.18 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419216.D
Acq: 27 Apr 2017 19:25

Tgt Ion: 43 Resp: 3717

Ion	Ratio	Lower	Upper
43	100		
58	11.9	19.4	45.4#

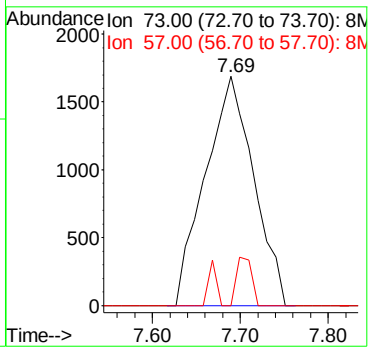


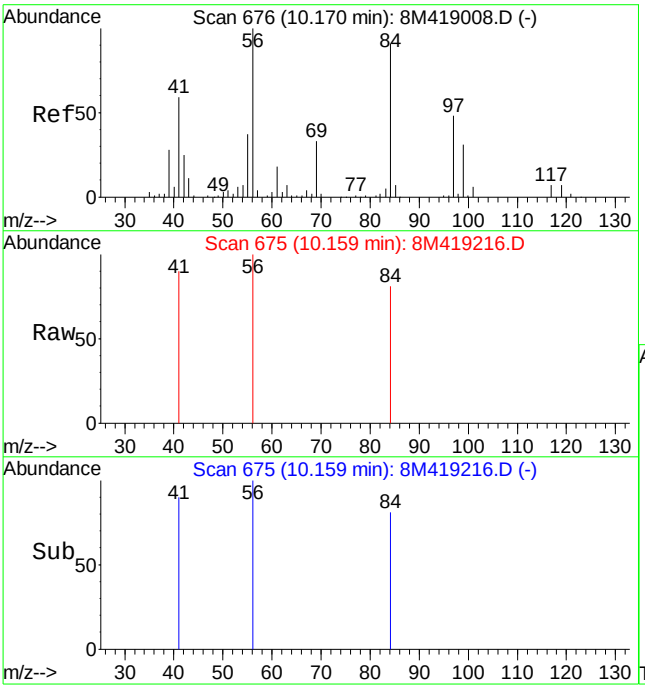


#22
Methyl Tert Butyl Ether
Concen: 0.50 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419216.D
Acq: 27 Apr 2017 19:25

Tgt Ion: 73 Resp: 6457

Ion	Ratio	Lower	Upper
73	100		
57	6.6	11.4	26.6#

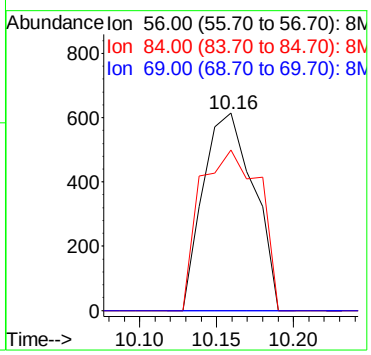


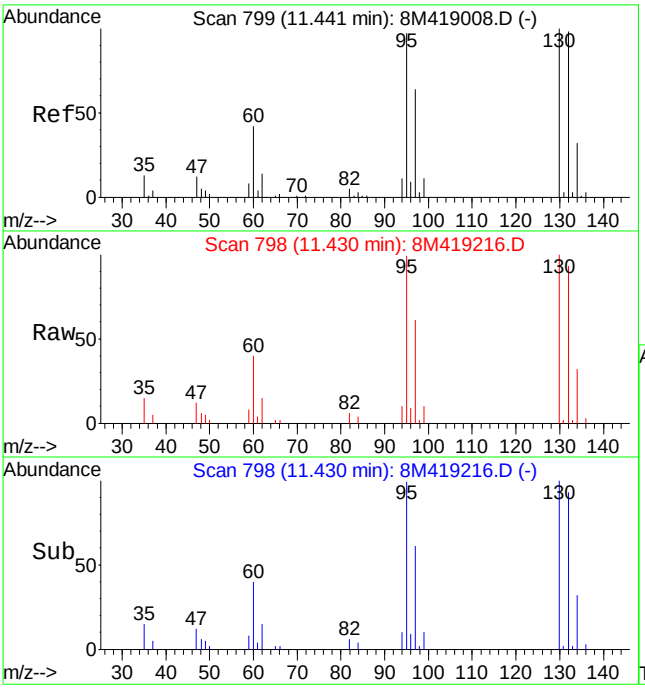


#39
Cyclohexane
Concen: 0.15 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419216.D
Acq: 27 Apr 2017 19:25

Tgt Ion: 56 Resp: 1404

Ion	Ratio	Lower	Upper
56	100		
84	95.8	61.6	143.8
69	0.0	21.4	50.0#

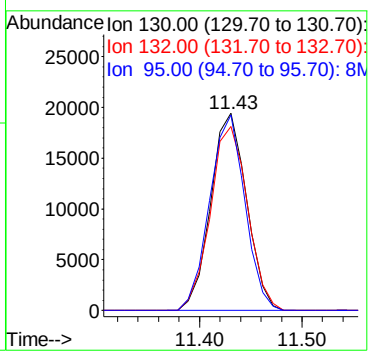


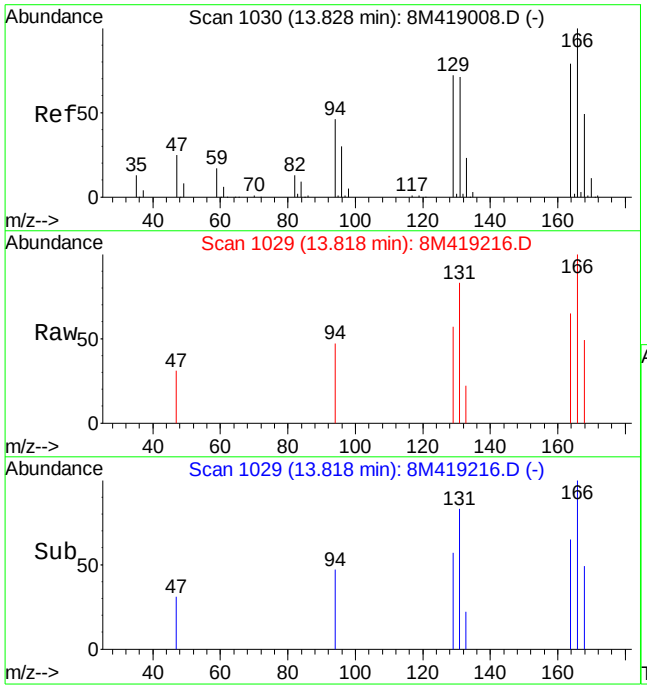


#47
Trichloroethene
Concen: 6.43 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419216.D
Acq: 27 Apr 2017 19:25

Tgt Ion:130 Resp: 47192

Ion	Ratio	Lower	Upper
130	100		
132	96.8	59.4	138.6
95	97.2	60.1	140.3

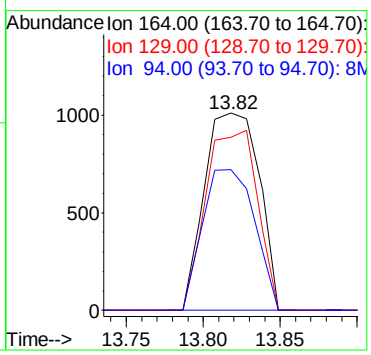




#66
Tetrachloroethene
Concen: 0.42 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419216.D
Acq: 27 Apr 2017 19:25

Tgt Ion:164 Resp: 2498

Ion	Ratio	Lower	Upper
164	100		
129	85.9	53.4	124.6
94	67.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419217.D Vial: 18
Acq On : 27 Apr 2017 19:56 Operator: TMB
Sample : L17041110-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 20:18:28 2017 Quant Results File: 8260WT.RES

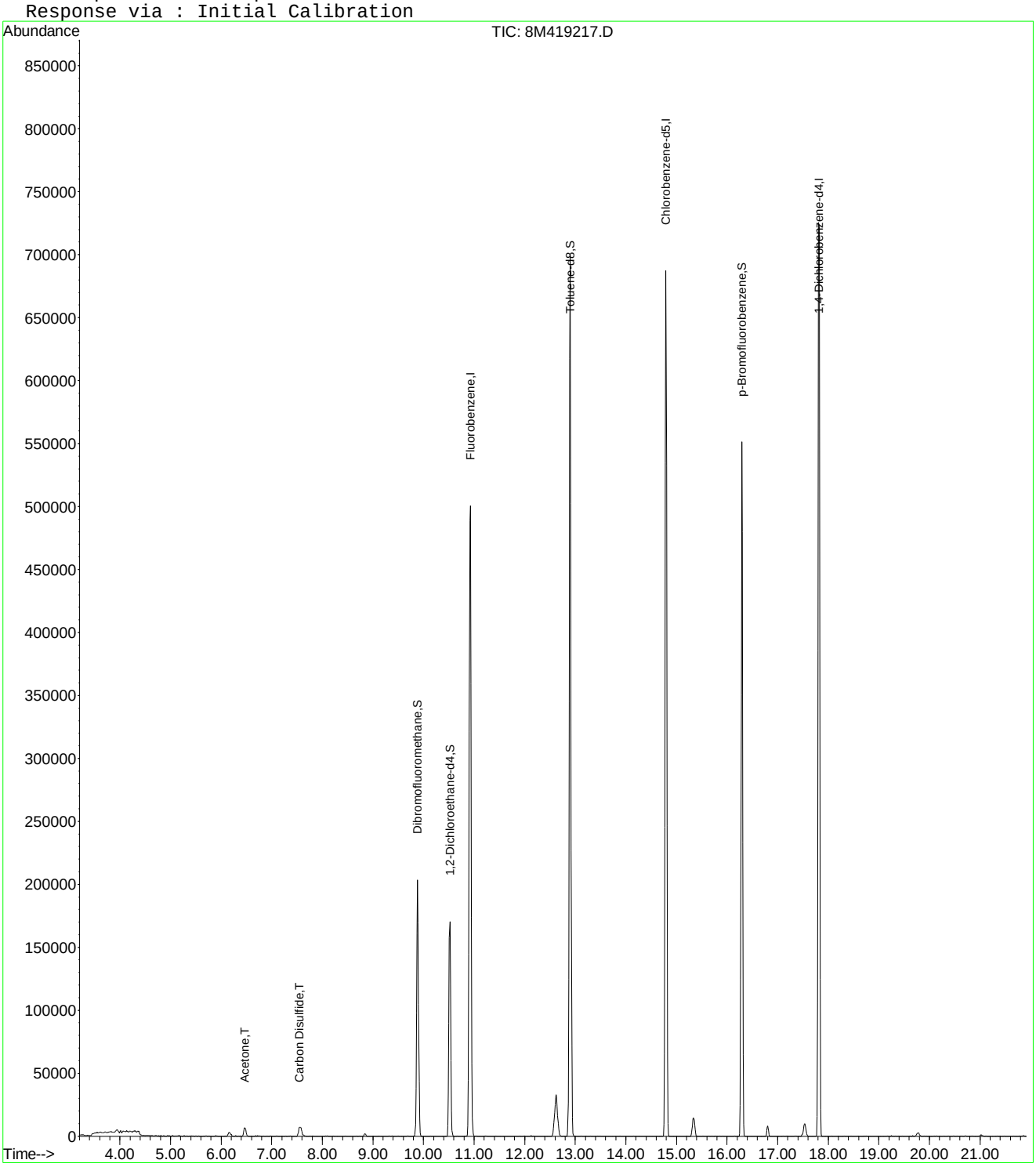
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

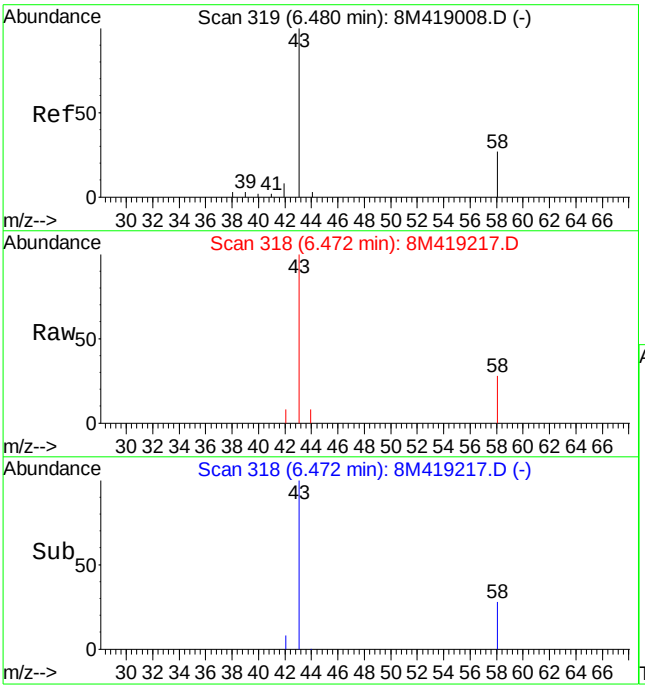
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	627839	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	502601	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	249791	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	166910	25.3459	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.40%			
43) 1,2-Dichloroethane-d4	10.52	65	146970	25.8158	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.28%			
58) Toluene-d8	12.90	98	619435	26.9733	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.88%			
80) p-Bromofluorobenzene	16.29	95	235771	26.7439	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.96%			
Target Compounds						Qvalue
13) Acetone	6.47	43	14168	16.0450	ug/L	93
20) Carbon Disulfide	7.55	76	2273	0.1202	ug/L #	74

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419217.D Vial: 18
Acq On : 27 Apr 2017 19:56 Operator: TMB
Sample : L17041110-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 20:18 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

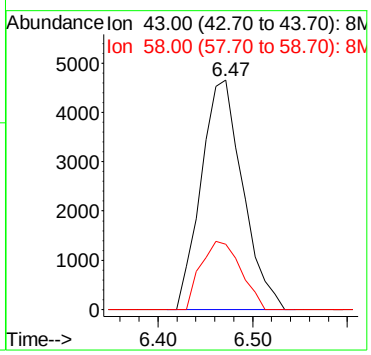


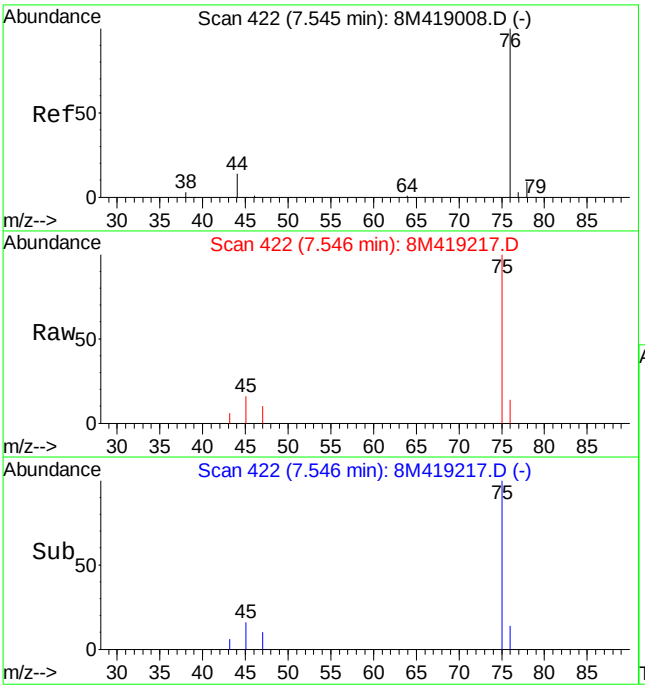


#13
Acetone
Concen: 16.05 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419217.D
Acq: 27 Apr 2017 19:56

Tgt Ion: 43 Resp: 14168

Ion	Ratio	Lower	Upper
43	100		
58	28.5	19.4	45.4

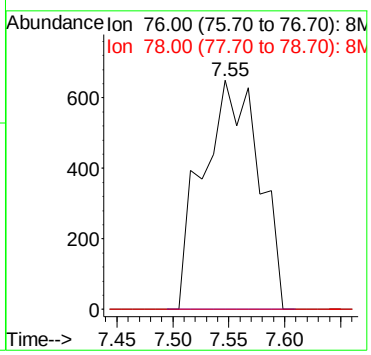




#20
Carbon Disulfide
Concen: 0.12 ug/L
RT: 7.55 min Scan# 422
Delta R.T. 0.00 min
Lab File: 8M419217.D
Acq: 27 Apr 2017 19:56

Tgt Ion: 76 Resp: 2273

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419218.D Vial: 19
Acq On : 27 Apr 2017 20:27 Operator: TMB
Sample : L17041110-23 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 20:49:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

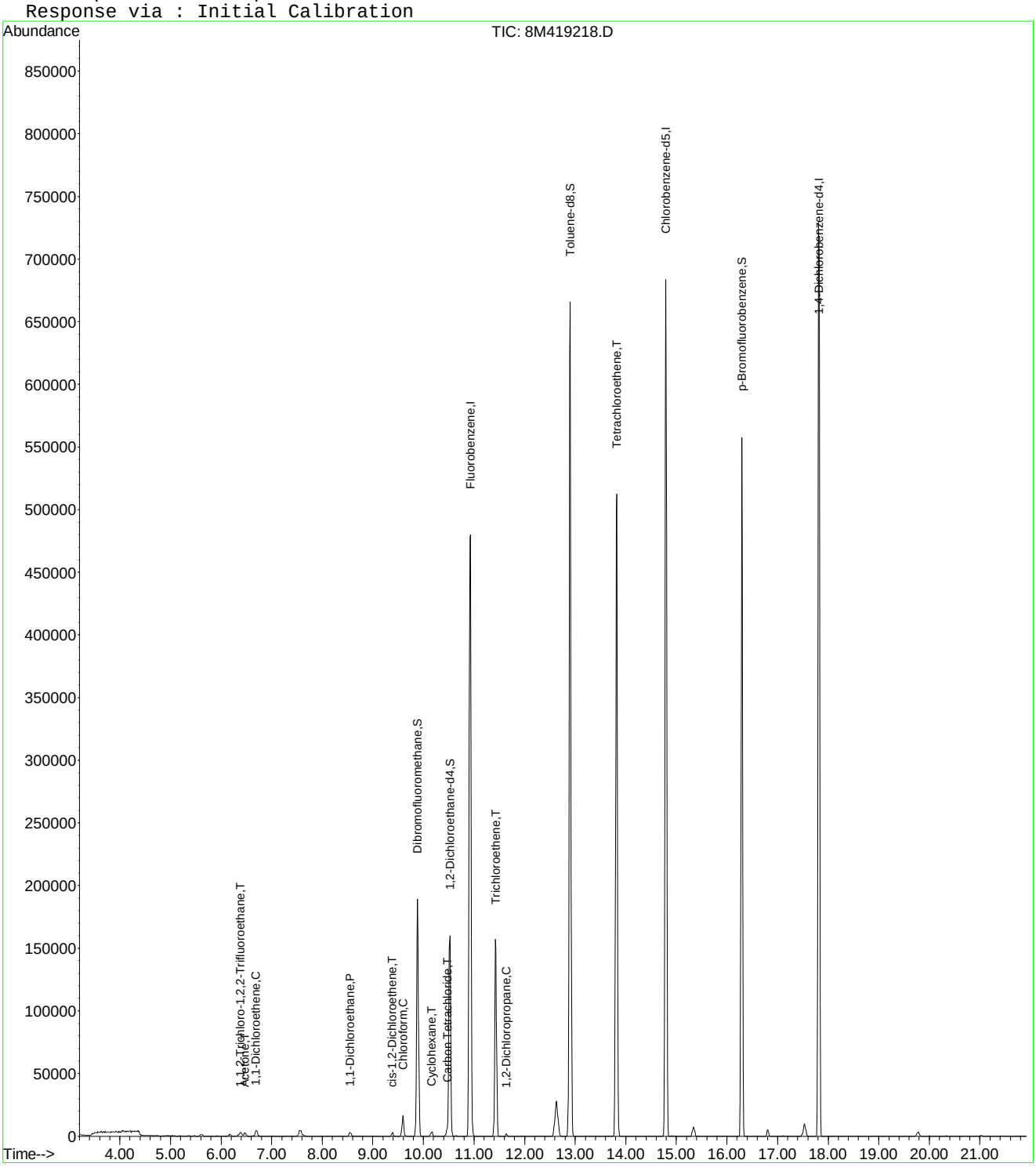
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	604415	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	496202	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	249492	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	158740	25.0395	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.16%			
43) 1,2-Dichloroethane-d4	10.52	65	140011	25.5466	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.20%			
58) Toluene-d8	12.90	98	603869	26.6346	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
80) p-Bromofluorobenzene	16.29	95	233788	26.5507	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.20%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	3710	0.6203	ug/L	86
13) Acetone	6.47	43	5457	6.4195	ug/L	87
14) 1,1-Dichloroethene	6.69	61	5625	0.6426	ug/L	85
27) 1,1-Dichloroethane	8.55	63	6157	0.5617	ug/L #	85
32) cis-1,2-Dichloroethene	9.38	96	2072	0.2944	ug/L	88
33) Chloroform	9.59	83	17945	1.4776	ug/L	97
39) Cyclohexane	10.16	56	2899	0.3177	ug/L #	77
42) Carbon Tetrachloride	10.47	117	5751	0.6328	ug/L	97
47) Trichloroethene	11.43	130	68501	9.7659	ug/L	99
49) 1,2-Dichloropropane	11.64	63	1109	0.1818	ug/L #	60
66) Tetrachloroethene	13.82	164	161967	27.9170	ug/L	98

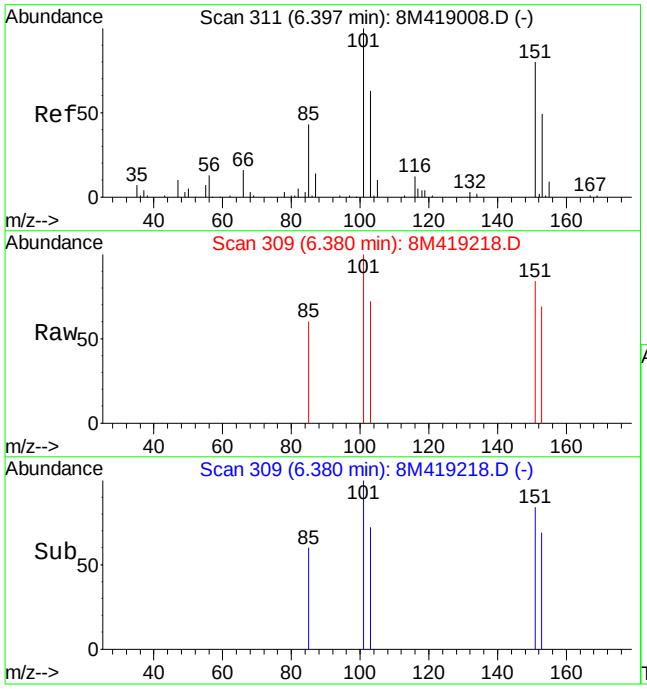
(#) = qualifier out of range (m) = manual integration
8M419218.D 8260WT.M Fri Apr 28 06:56:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419218.D Vial: 19
Acq On : 27 Apr 2017 20:27 Operator: TMB
Sample : L17041110-23 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 20:49 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

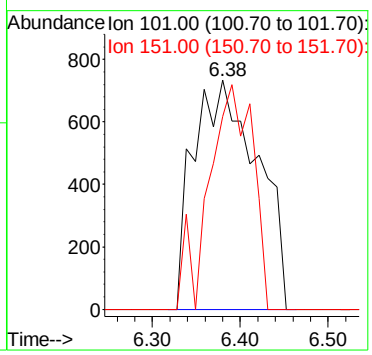


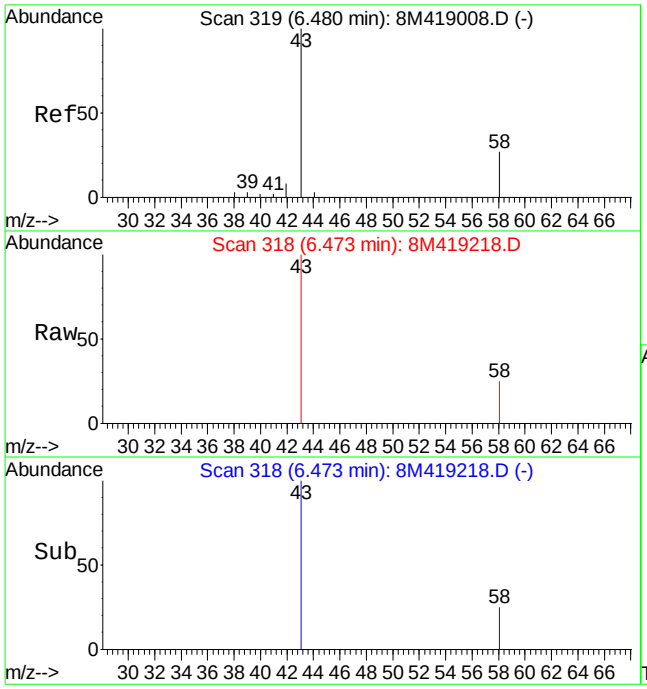


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.62 ug/L
RT: 6.38 min Scan# 309
Delta R.T. -0.02 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion:101 Resp: 3710

Ion	Ratio	Lower	Upper
101	100		
151	67.3	39.9	119.9

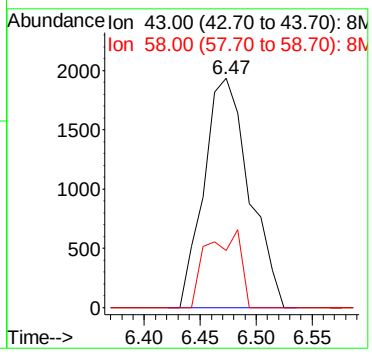


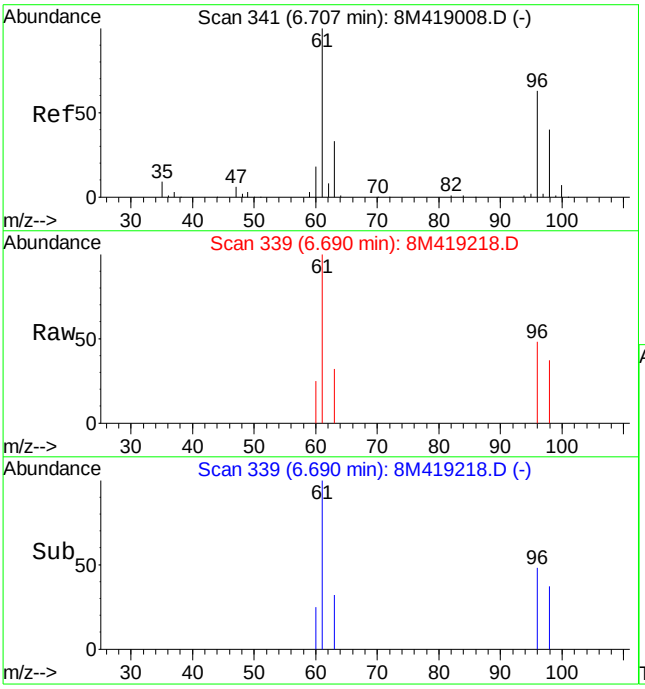


#13
Acetone
Concen: 6.42 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 43 Resp: 5457

Ion	Ratio	Lower	Upper
43	100		
58	25.1	19.4	45.4

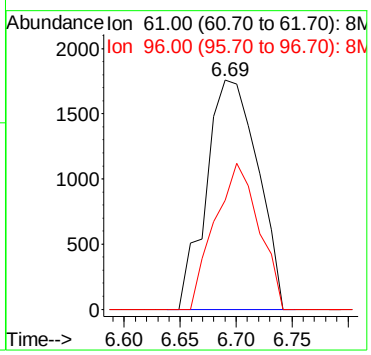


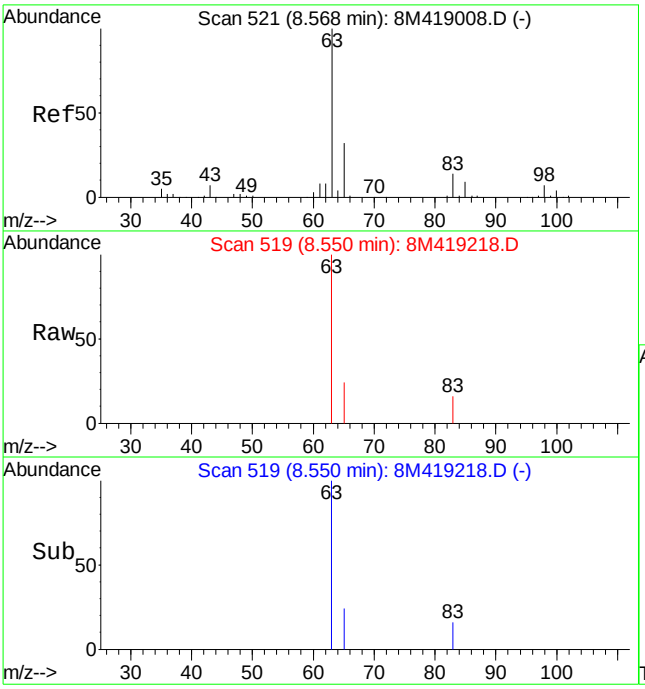


#14
1,1-Dichloroethene
Concen: 0.64 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 61 Resp: 5625

Ion	Ratio	Lower	Upper
61	100		
96	54.7	40.0	93.4

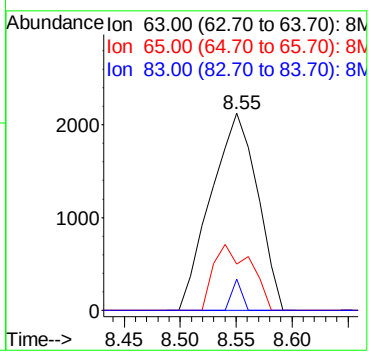


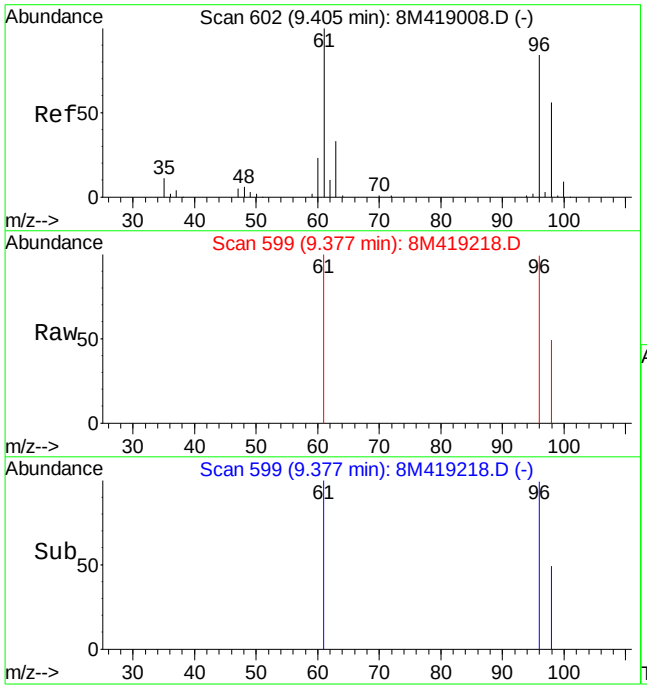


#27
1,1-Dichloroethane
Concen: 0.56 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 63 Resp: 6157

Ion	Ratio	Lower	Upper
63	100		
65	26.6	19.1	44.7
83	3.4	9.0	21.0#

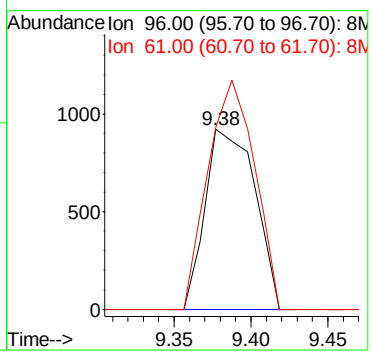


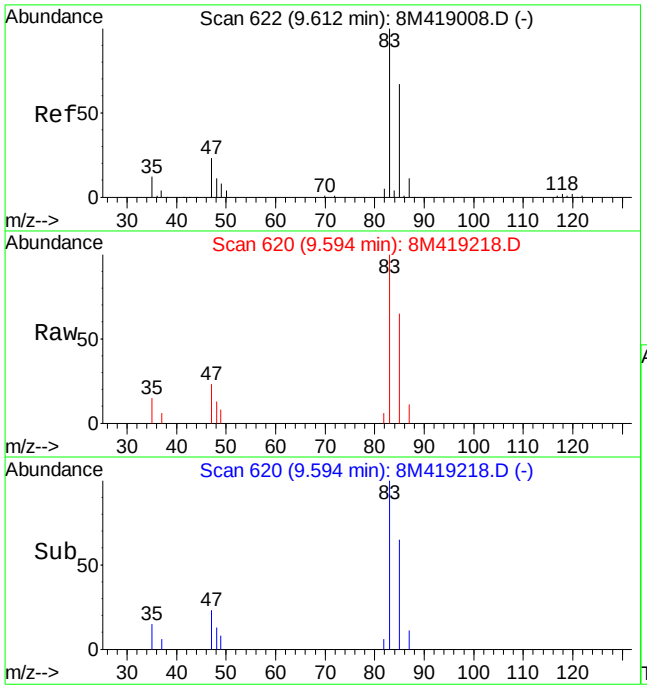


#32
cis-1,2-Dichloroethene
Concen: 0.29 ug/L
RT: 9.38 min Scan# 599
Delta R.T. -0.03 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 96 Resp: 2072

Ion	Ratio	Lower	Upper
96	100		
61	120.0	80.3	187.3

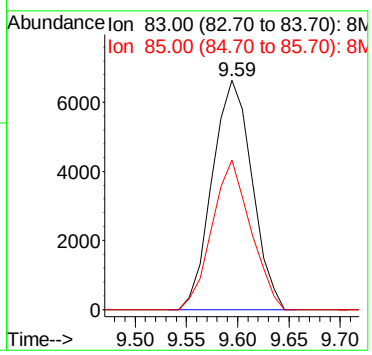


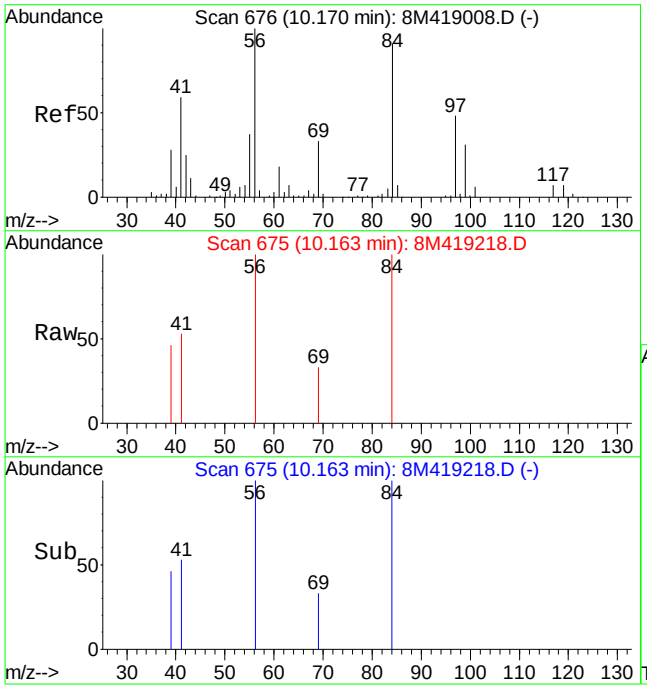


#33
Chloroform
Concen: 1.48 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 83 Resp: 17945

Ion	Ratio	Lower	Upper
83	100		
85	63.1	39.1	91.3

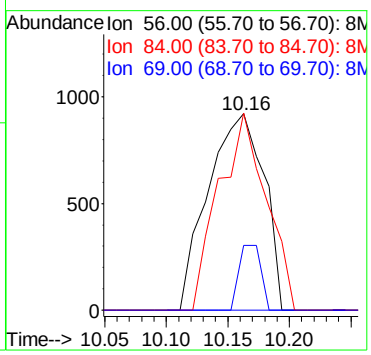


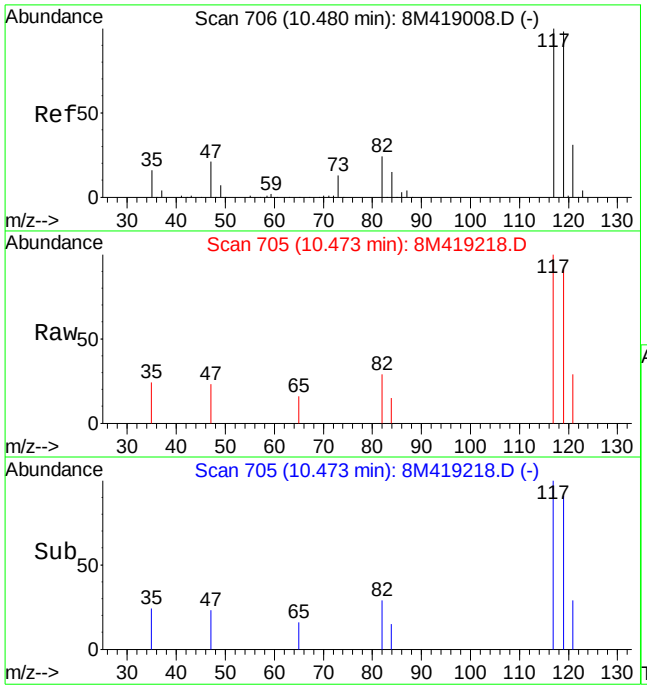


#39
Cyclohexane
Concen: 0.32 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 56 Resp: 2899

Ion	Ratio	Lower	Upper
56	100		
84	85.2	61.6	143.8
69	13.0	21.4	50.0#

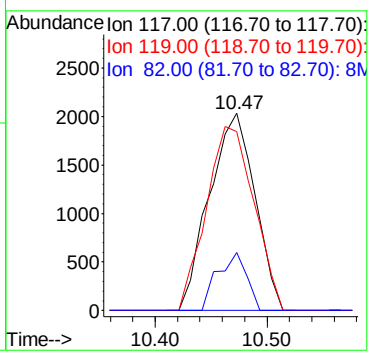


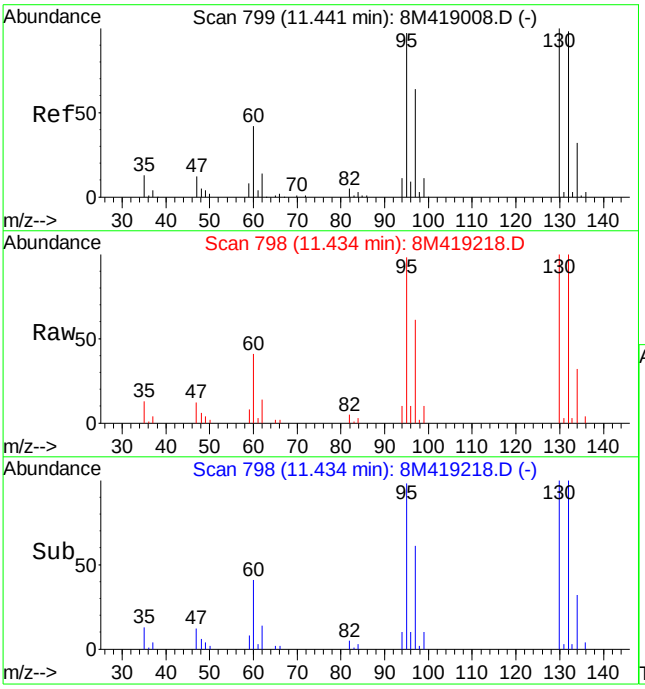


#42
Carbon Tetrachloride
Concen: 0.63 ug/L
RT: 10.47 min Scan# 705
Delta R.T. 0.00 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion:117 Resp: 5751

Ion	Ratio	Lower	Upper
117	100		
119	97.6	58.5	136.5
82	18.7	14.9	34.9

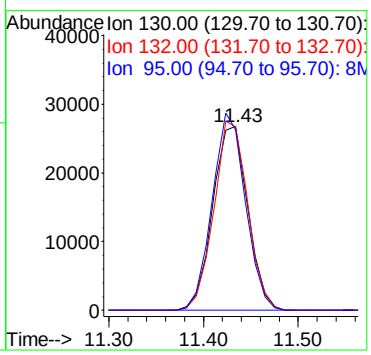


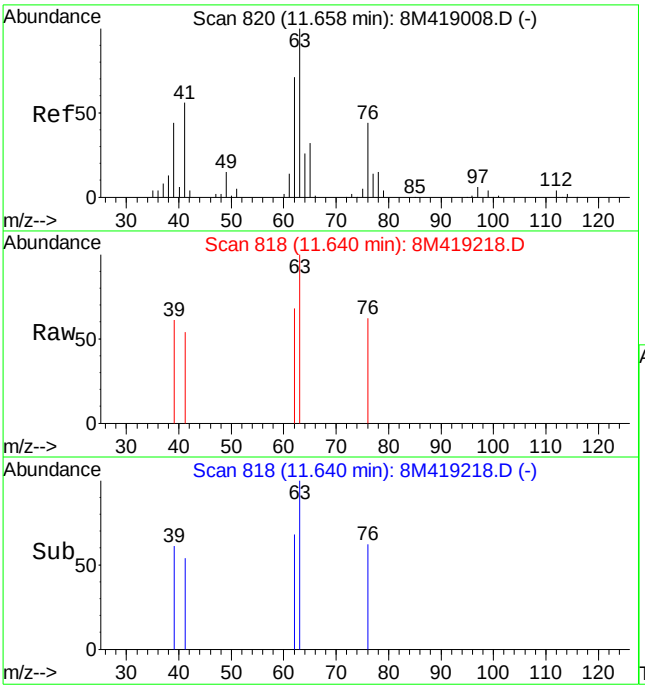


#47
Trichloroethene
Concen: 9.77 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion:130 Resp: 68501

Ion	Ratio	Lower	Upper
130	100		
132	99.1	59.4	138.6
95	101.5	60.1	140.3

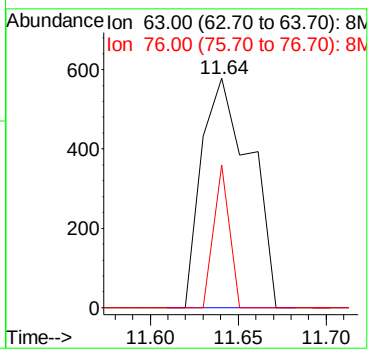


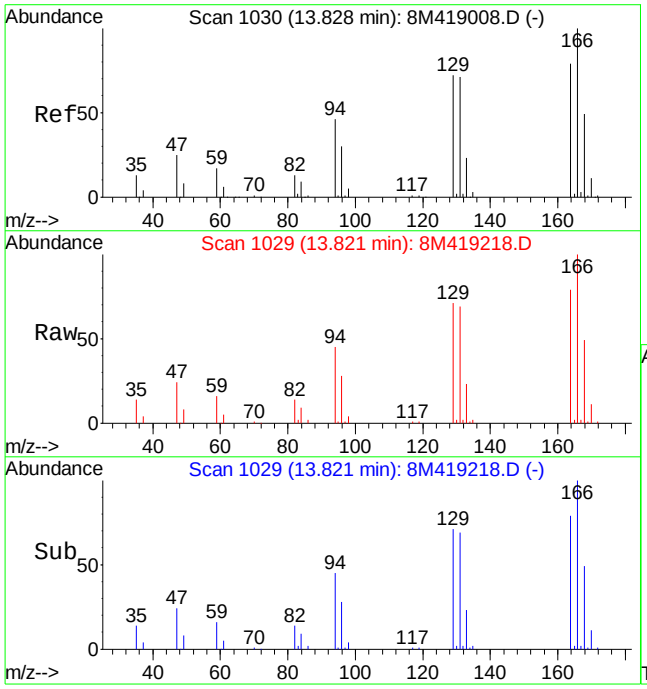


#49
1,2-Dichloropropane
Concen: 0.18 ug/L
RT: 11.64 min Scan# 818
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion: 63 Resp: 1109

Ion	Ratio	Lower	Upper
63	100		
76	20.1	28.2	65.8#

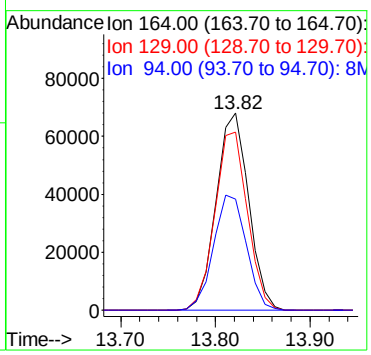




#66
Tetrachloroethene
Concen: 27.92 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419218.D
Acq: 27 Apr 2017 20:27

Tgt Ion:164 Resp: 161967

Ion	Ratio	Lower	Upper
164	100		
129	90.5	53.4	124.6
94	59.1	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146783.D Vial: 19
Acq On : 27 Apr 2017 21:13 Operator: TMB
Sample : L17041110-24 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:35:39 2017 Quant Results File: 8260BWT.RES

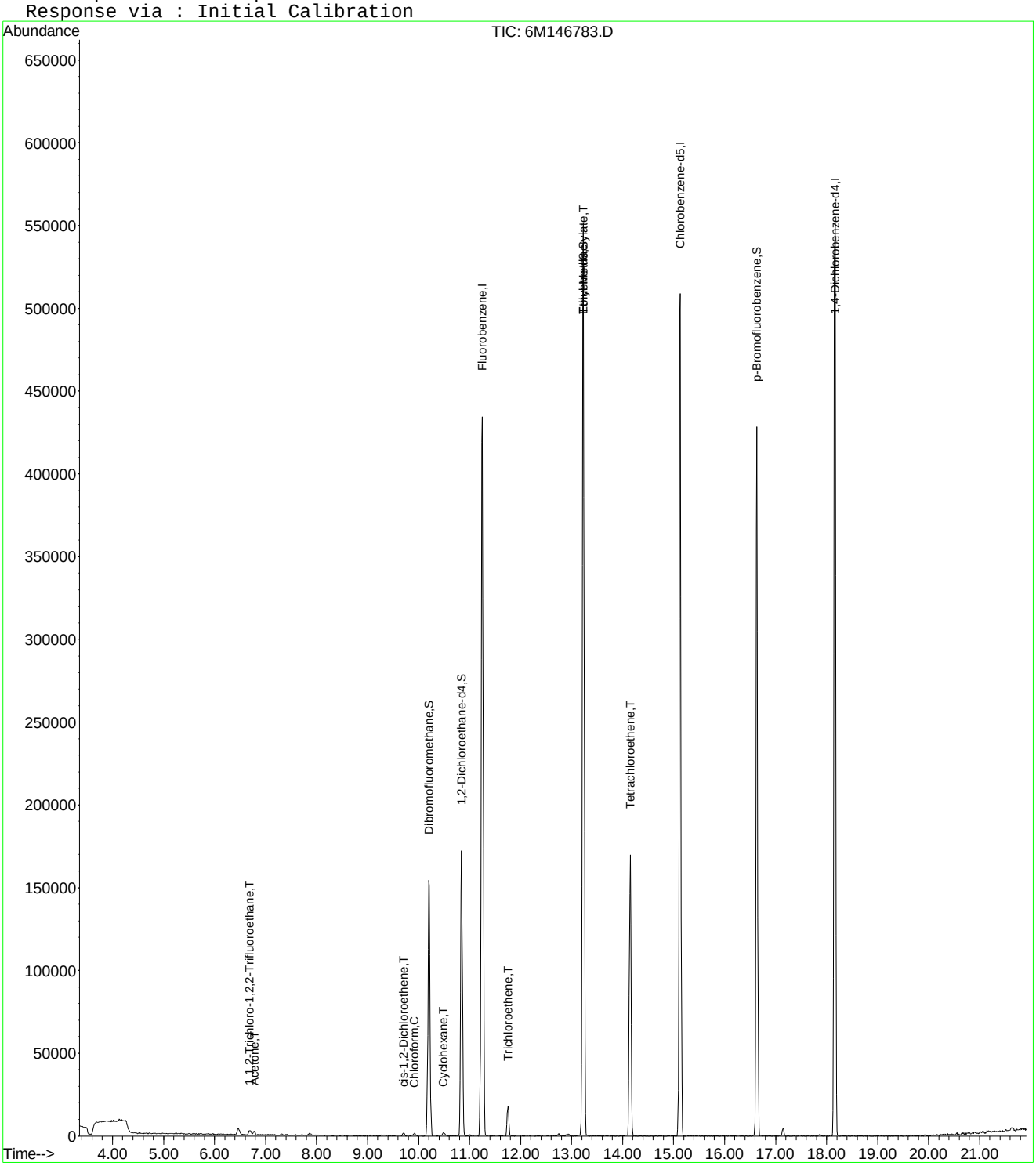
Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

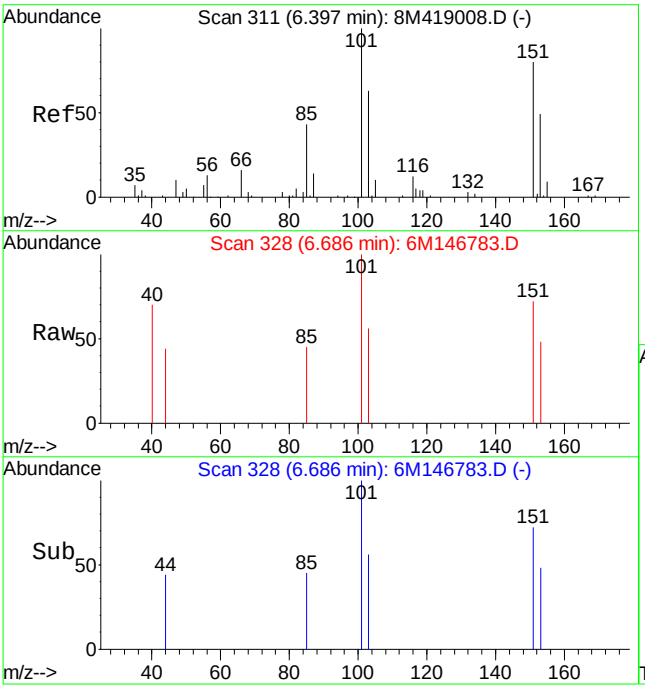
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	566716	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	388818	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	192181	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.20	111	137026	23.6856	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 94.76%			
43) 1,2-Dichloroethane-d4	10.84	65	152138	26.6825	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.72%			
58) Toluene-d8	13.23	98	528633	26.6442	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.56%			
80) p-Bromofluorobenzene	16.63	95	202529	27.7470	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.00%			
Target Compounds						Qvalue
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	3188	0.5345	ug/L	93
13) Acetone	6.78	43	4191	3.4270	ug/L	95
32) cis-1,2-Dichloroethene	9.70	96	1101	0.1611	ug/L	95
33) Chloroform	9.91	83	1900	0.1619	ug/L #	74
39) Cyclohexane	10.48	56	2074	0.2351	ug/L #	68
47) Trichloroethene	11.75	130	8318	1.2603	ug/L	93
60) Ethyl Methacrylate	13.23	69	957	0.1627	ug/L	79
66) Tetrachloroethene	14.15	166	63985	10.8622	ug/L	93

(#) = qualifier out of range (m) = manual integration
6M146783.D 8260WT.M Fri Apr 28 06:48:28 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146783.D Vial: 19
Acq On : 27 Apr 2017 21:13 Operator: TMB
Sample : L17041110-24 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:35 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

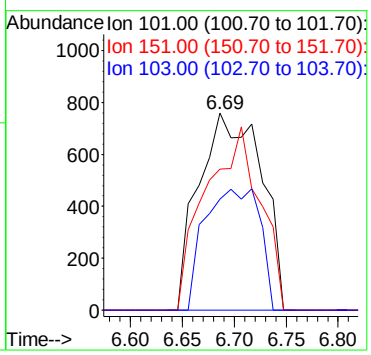


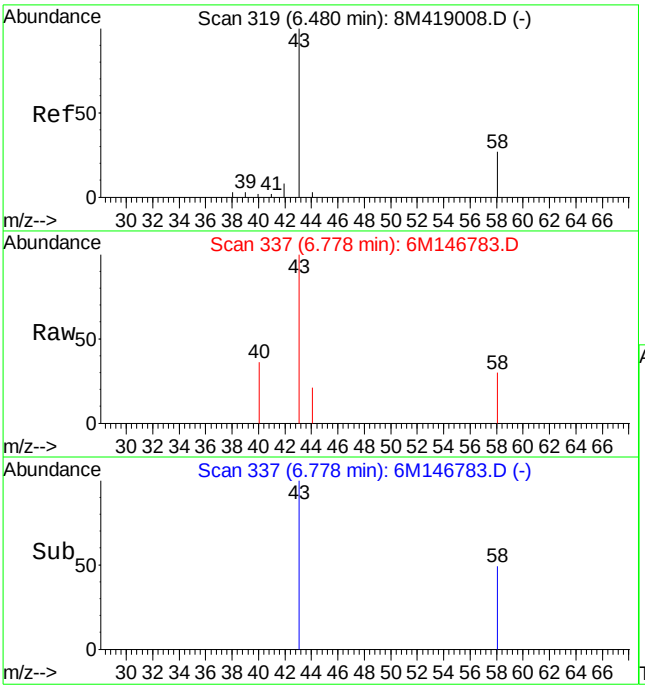


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 0.53 ug/L
RT: 6.69 min Scan# 328
Delta R.T. 0.00 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion:101 Resp: 3188

Ion	Ratio	Lower	Upper
101	100		
151	80.8	49.4	115.2
103	54.0	38.8	90.4

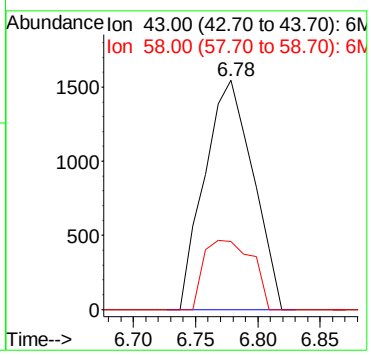


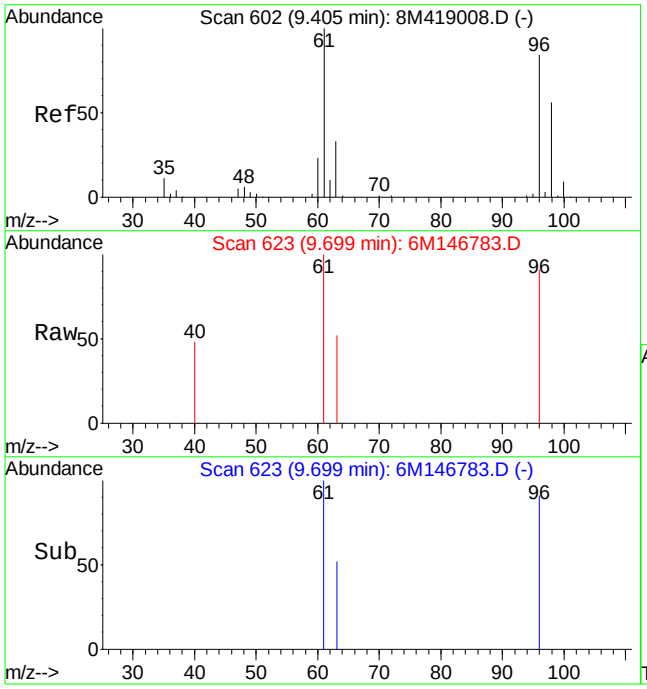


#13
Acetone
Concen: 3.43 ug/L
RT: 6.78 min Scan# 337
Delta R.T. 0.00 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion: 43 Resp: 4191

Ion	Ratio	Lower	Upper
43	100		
58	30.1	16.4	38.2

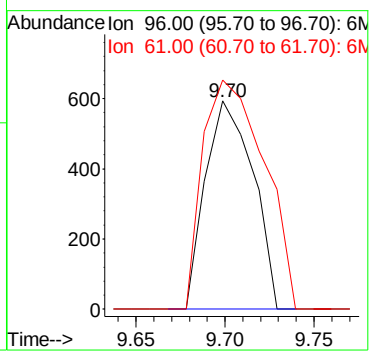


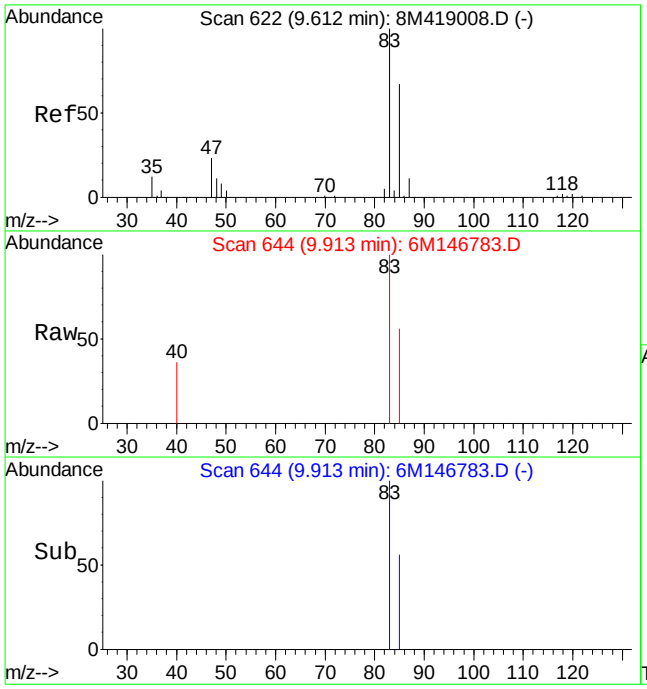


#32
cis-1,2-Dichloroethene
Concen: 0.16 ug/L
RT: 9.70 min Scan# 623
Delta R.T. -0.01 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion: 96 Resp: 1101

Ion	Ratio	Lower	Upper
96	100		
61	142.1	89.2	208.2

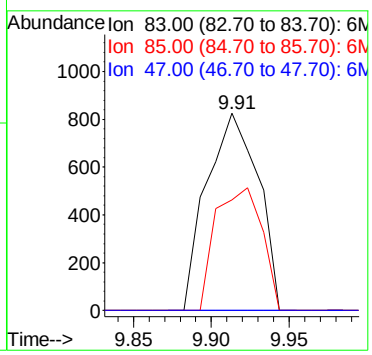


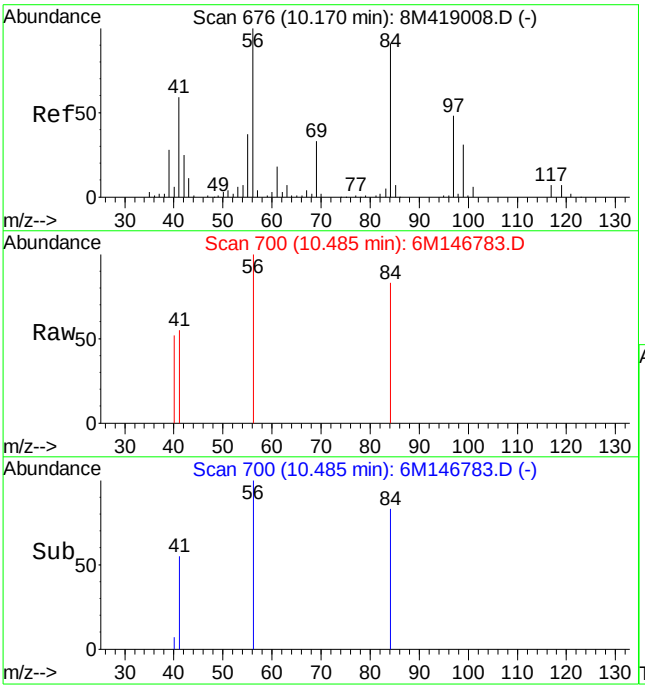


#33
Chloroform
Concen: 0.16 ug/L
RT: 9.91 min Scan# 644
Delta R.T. 0.00 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion: 83 Resp: 1900

Ion	Ratio	Lower	Upper
83	100		
85	55.7	39.0	91.0
47	0.0	18.5	43.1#

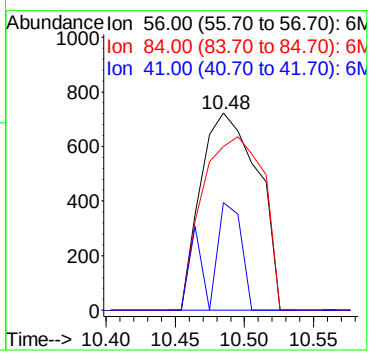


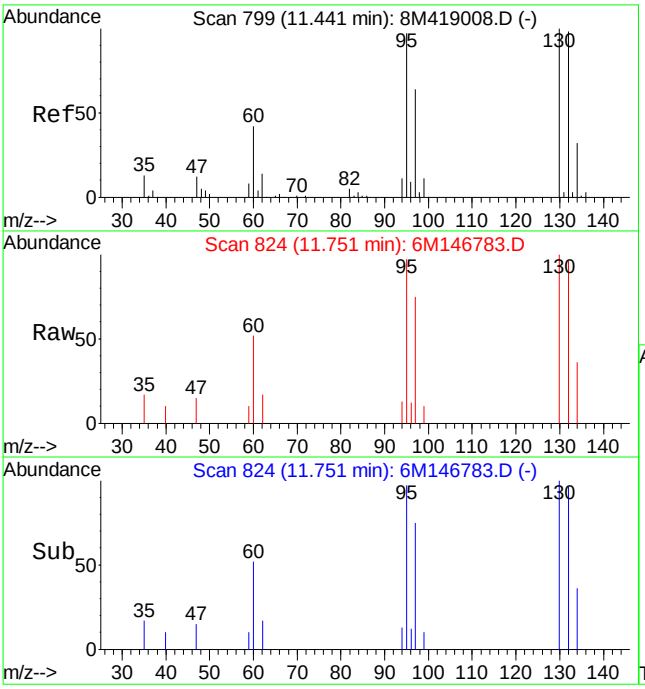


#39
Cyclohexane
Concen: 0.24 ug/L
RT: 10.48 min Scan# 700
Delta R.T. -0.01 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion: 56 Resp: 2074

Ion	Ratio	Lower	Upper
56	100		
84	93.8	43.6	101.6
41	31.1	37.1	86.5#

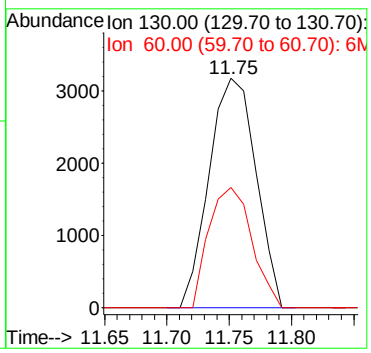


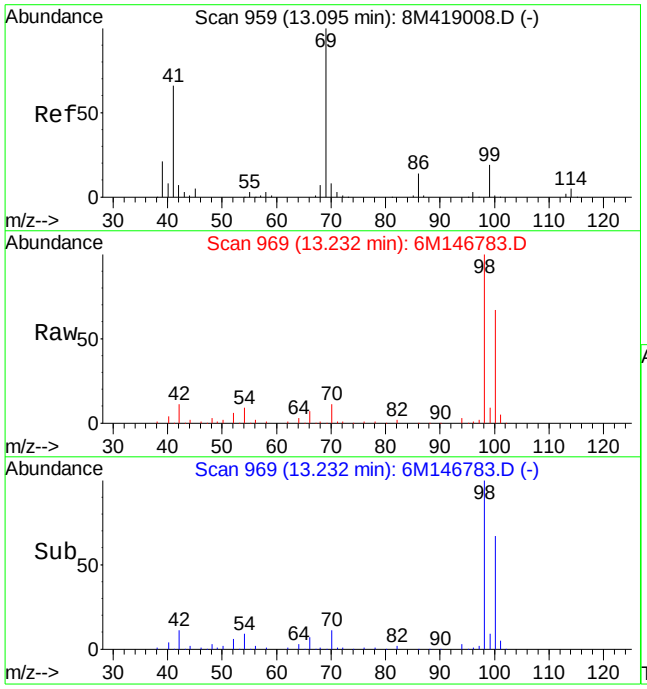


#47
Trichloroethene
Concen: 1.26 ug/L
RT: 11.75 min Scan# 824
Delta R.T. 0.00 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion:130 Resp: 8318

Ion	Ratio	Lower	Upper
130	100		
60	48.0	32.0	74.6

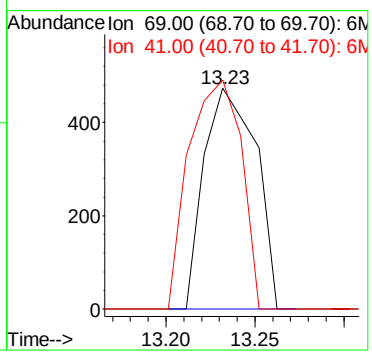


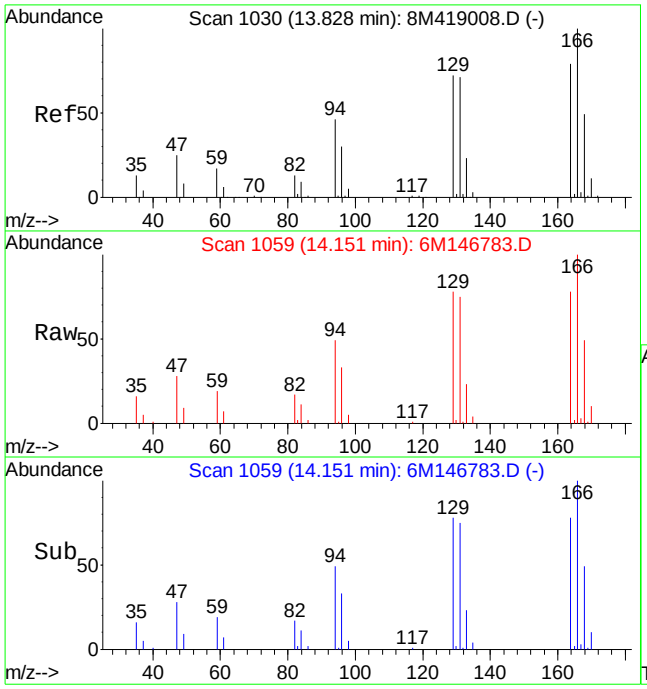


#60
Ethyl Methacrylate
Concen: 0.16 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion: 69 Resp: 957

Ion	Ratio	Lower	Upper
69	100		
41	104.9	51.4	120.0

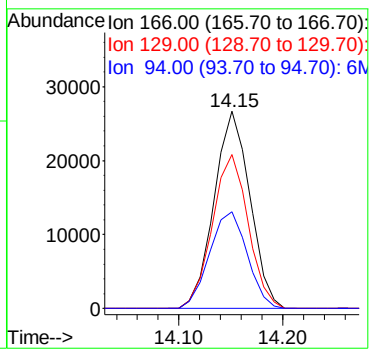




#66
Tetrachloroethene
Concen: 10.86 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146783.D
Acq: 27 Apr 2017 21:13

Tgt Ion:166 Resp: 63985

Ion	Ratio	Lower	Upper
166	100		
129	78.3	43.5	101.5
94	51.7	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146818.D Vial: 21
Acq On : 28 Apr 2017 16:36 Operator: TMB
Sample : L17041110-25 B 5X 826-SPE 00 Inst : Hpms6
Misc : 1,5 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:02:27 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

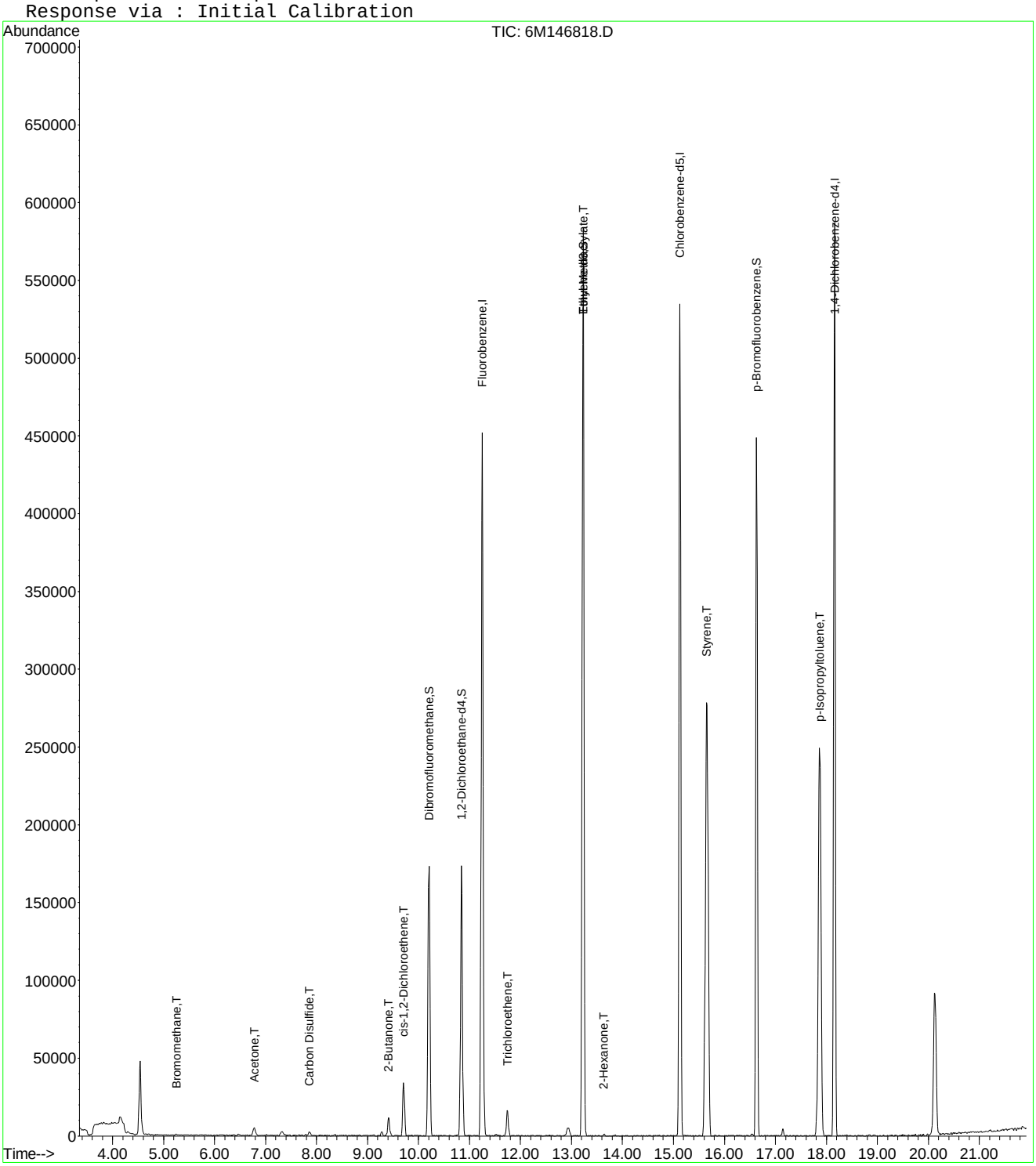
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	575984	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	395813	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	199684	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	151127	25.7026 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%		
43) 1,2-Dichloroethane-d4	10.84	65	157658	27.2057 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.84%		
58) Toluene-d8	13.23	98	537610	26.6178 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%		
80) p-Bromofluorobenzene	16.63	95	206992	27.2929 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.16%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	1556	Below Cal #	66
6) Bromomethane	5.25	94	692	0.1534 ug/L	96
13) Acetone	6.78	43	10627	8.5500 ug/L	83
20) Carbon Disulfide	7.86	76	3054	0.1616 ug/L	91
29) 2-Butanone	9.41	43	22171	14.1531 ug/L #	82
32) cis-1,2-Dichloroethene	9.71	96	21905	3.1527 ug/L	80
47) Trichloroethene	11.75	130	4318	0.6437 ug/L	88
60) Ethyl Methacrylate	13.23	69	815	0.1361 ug/L	89
64) 2-Hexanone	13.63	43	1402	0.6261 ug/L	86
75) Styrene	15.65	104	3520	0.1983 ug/L #	26
92) p-Isopropyltoluene	17.88	119	3739	0.1682 ug/L #	69

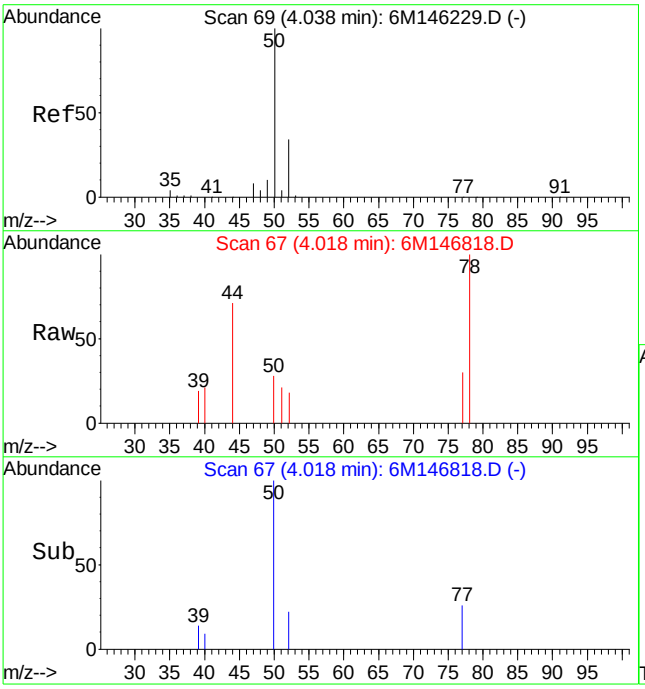
(#) = qualifier out of range (m) = manual integration
6M146818.D 8260BWT.M Sat Apr 29 12:17:02 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146818.D Vial: 21
Acq On : 28 Apr 2017 16:36 Operator: TMB
Sample : L17041110-25 B 5X 826-SPE 00 Inst : Hpms6
Misc : 1,5 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:02 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

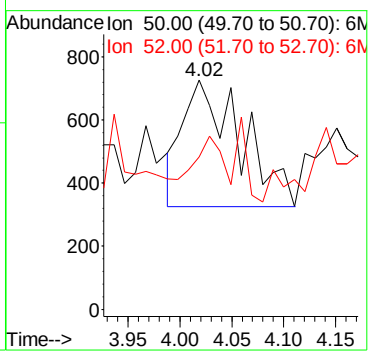


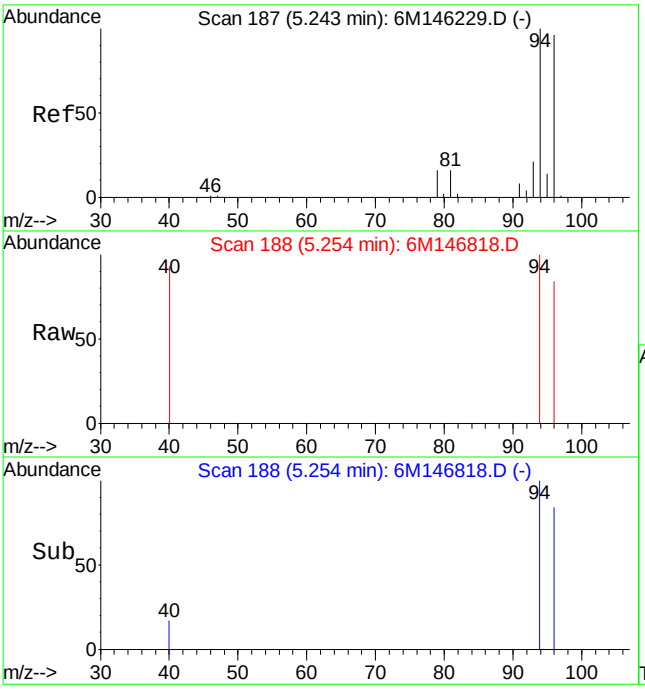


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. 0.00 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 50 Resp: 1556

Ion	Ratio	Lower	Upper
50	100		
52	13.8	19.8	46.2#

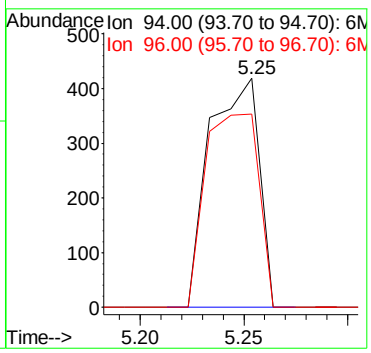


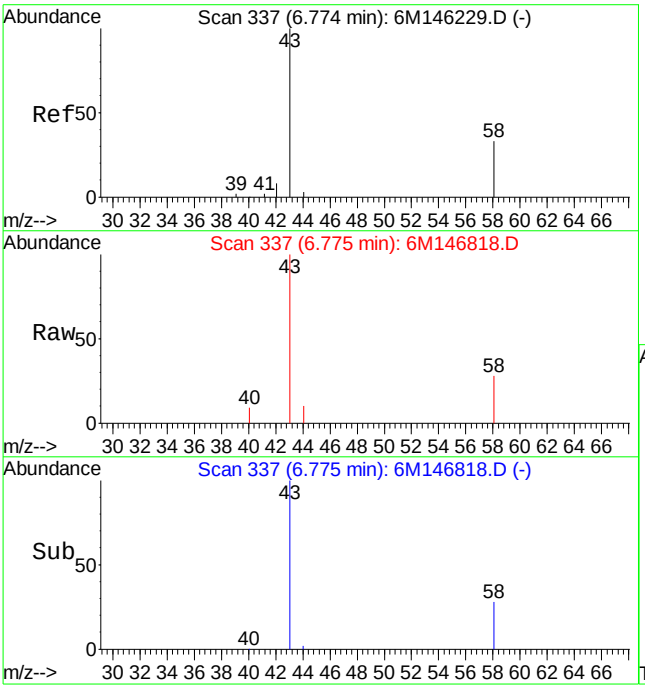


#6
Bromomethane
Concen: 0.15 ug/L
RT: 5.25 min Scan# 188
Delta R.T. 0.04 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 94 Resp: 692

Ion	Ratio	Lower	Upper
94	100		
96	90.9	56.7	132.3

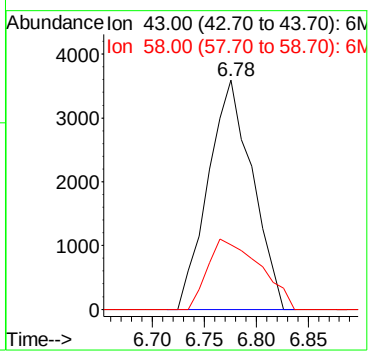


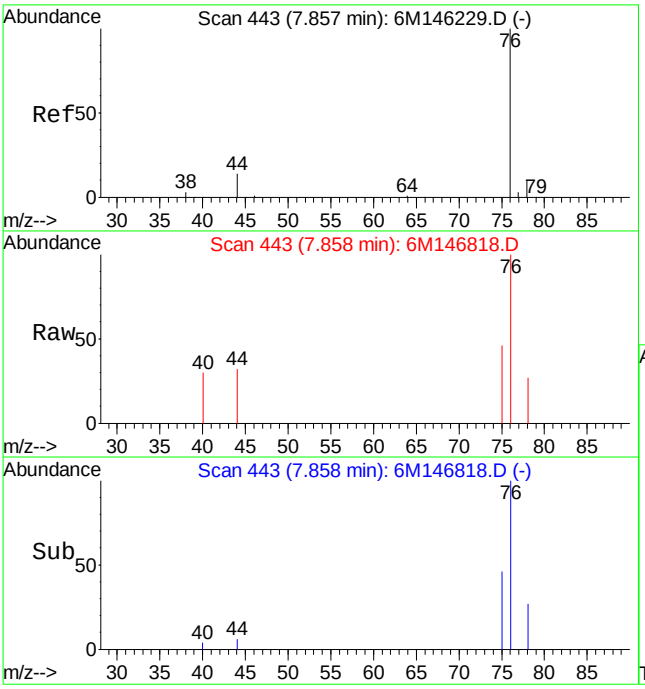


#13
Acetone
Concen: 8.55 ug/L
RT: 6.78 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 43 Resp: 10627

Ion	Ratio	Lower	Upper
43	100		
58	36.3	16.4	38.2

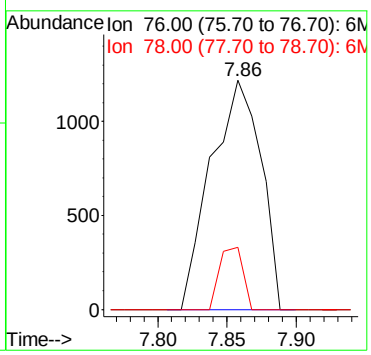


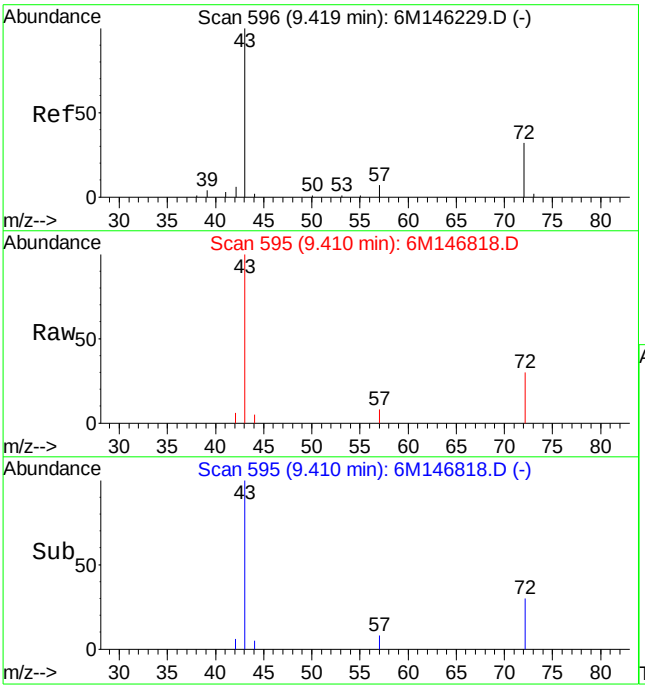


#20
Carbon Disulfide
Concen: 0.16 ug/L
RT: 7.86 min Scan# 443
Delta R.T. 0.01 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 76 Resp: 3054

Ion	Ratio	Lower	Upper
76	100		
78	12.8	5.7	13.3

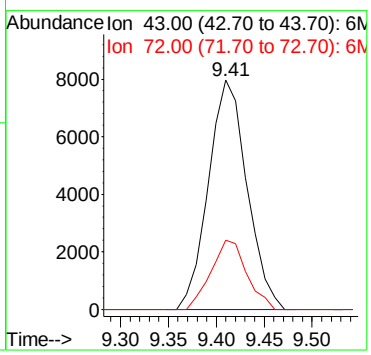


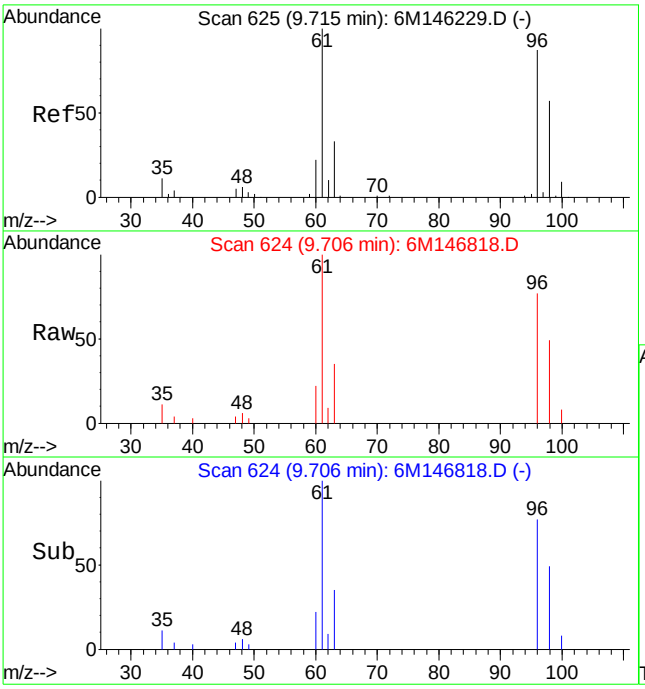


#29
2-Butanone
Concen: 14.15 ug/L
RT: 9.41 min Scan# 595
Delta R.T. -0.00 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 43 Resp: 22171

Ion	Ratio	Lower	Upper
43	100		
72	28.0	11.9	27.9#

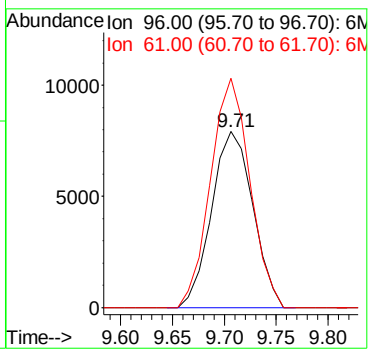


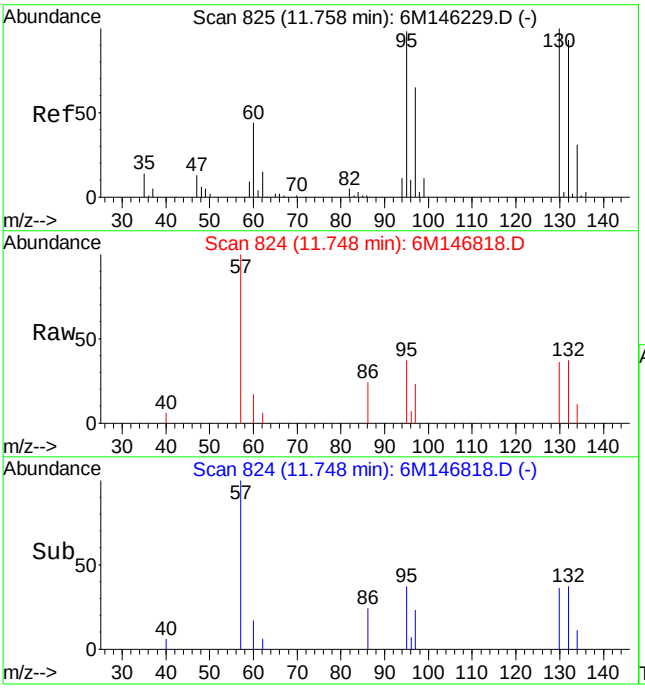


#32
cis-1,2-Dichloroethene
Concen: 3.15 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 96 Resp: 21905

Ion	Ratio	Lower	Upper
96	100		
61	123.9	89.2	208.2

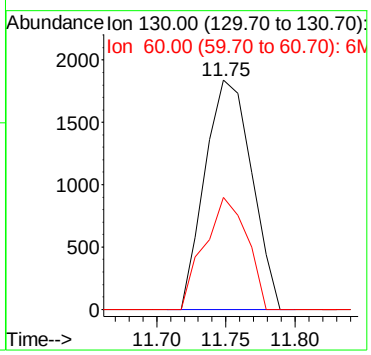


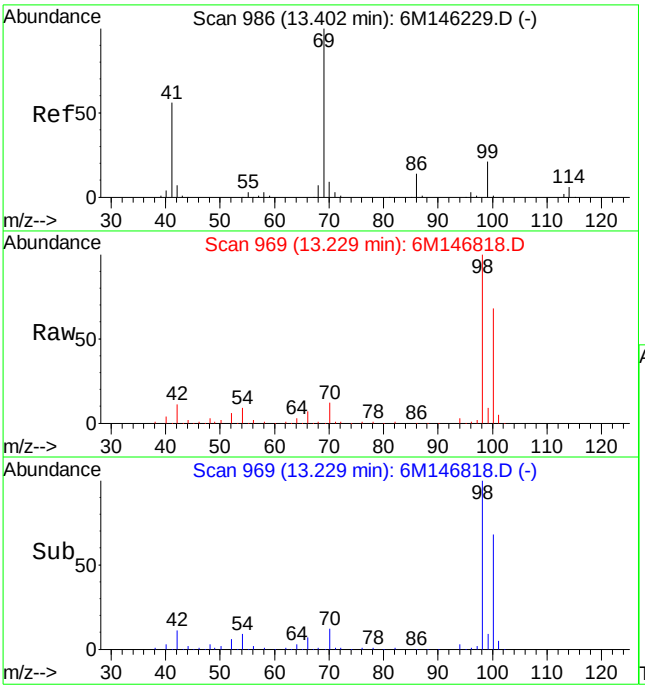


#47
Trichloroethene
Concen: 0.64 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion:130 Resp: 4318

Ion	Ratio	Lower	Upper
130	100		
60	44.4	32.0	74.6

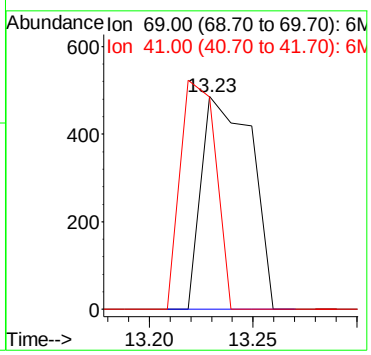


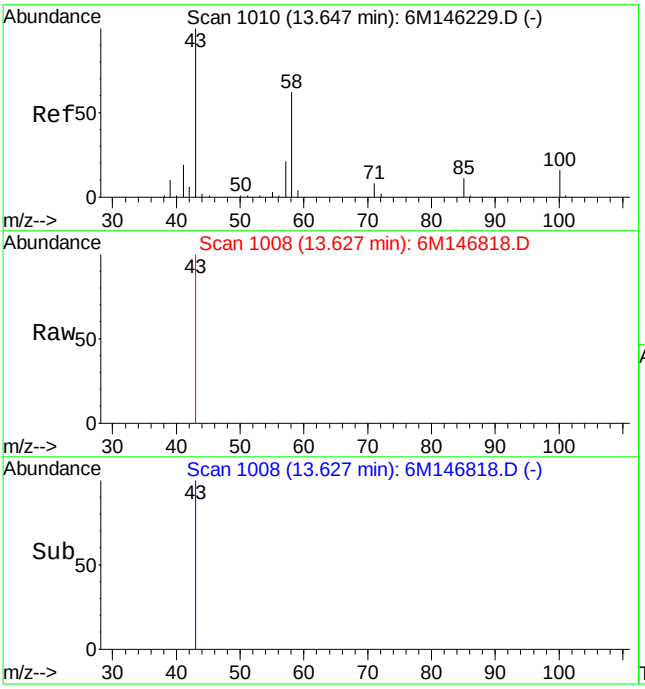


#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 69 Resp: 815

Ion	Ratio	Lower	Upper
69	100		
41	75.8	51.4	120.0

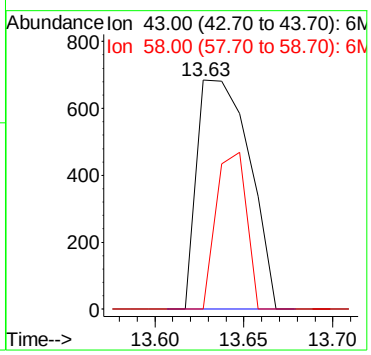


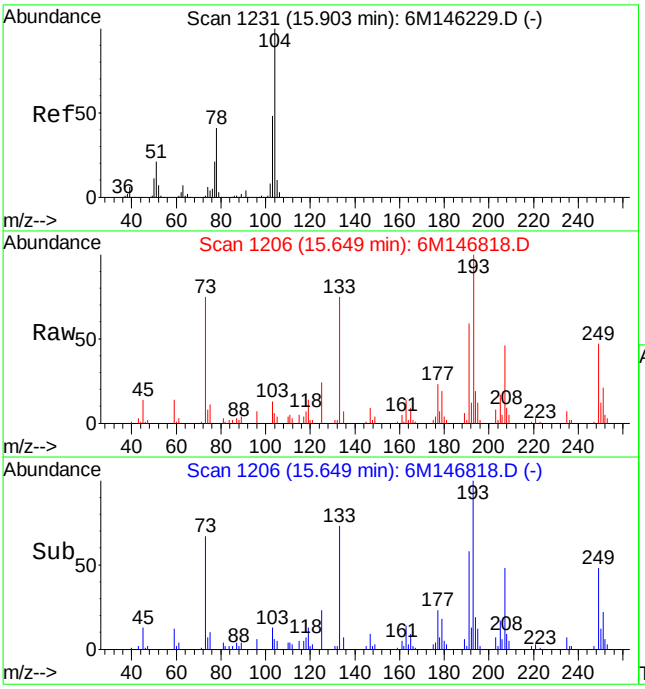


#64
2-Hexanone
Concen: 0.63 ug/L
RT: 13.63 min Scan# 1008
Delta R.T. -0.01 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion: 43 Resp: 1402

Ion	Ratio	Lower	Upper
43	100		
58	39.5	29.6	69.2

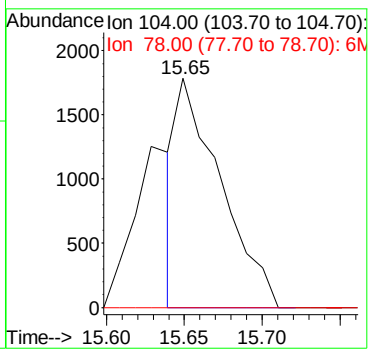


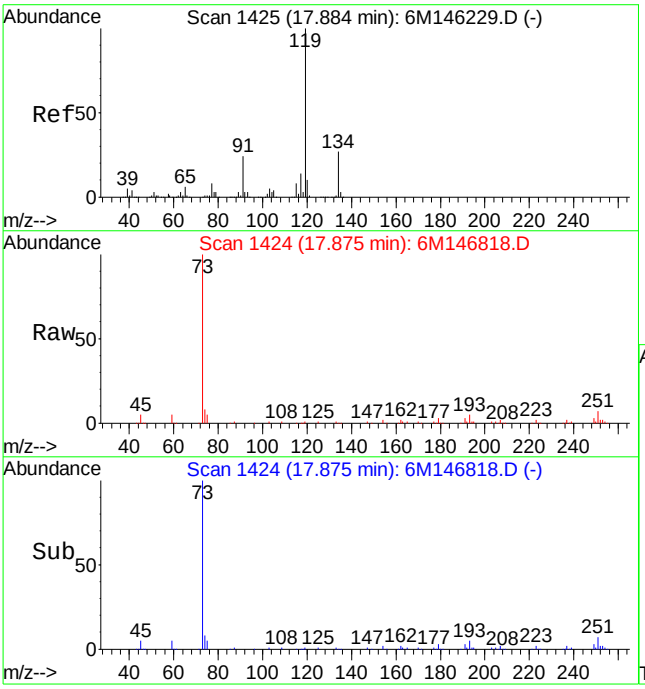


#75
Styrene
Concen: 0.20 ug/L
RT: 15.65 min Scan# 1206
Delta R.T. -0.26 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion:104 Resp: 3520

Ion	Ratio	Lower	Upper
104	100		
78	0.0	31.4	73.4#

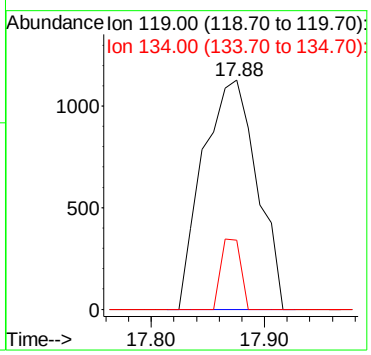




#92
p-Isopropyltoluene
Concen: 0.17 ug/L
RT: 17.88 min Scan# 1424
Delta R.T. -0.01 min
Lab File: 6M146818.D
Acq: 28 Apr 2017 16:36

Tgt Ion:119 Resp: 3739

Ion	Ratio	Lower	Upper
119	100		
134	11.2	16.4	38.2#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419209.D Vial: 10
Acq On : 27 Apr 2017 15:55 Operator: TMB
Sample : L17041110-26 A RS 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:17:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

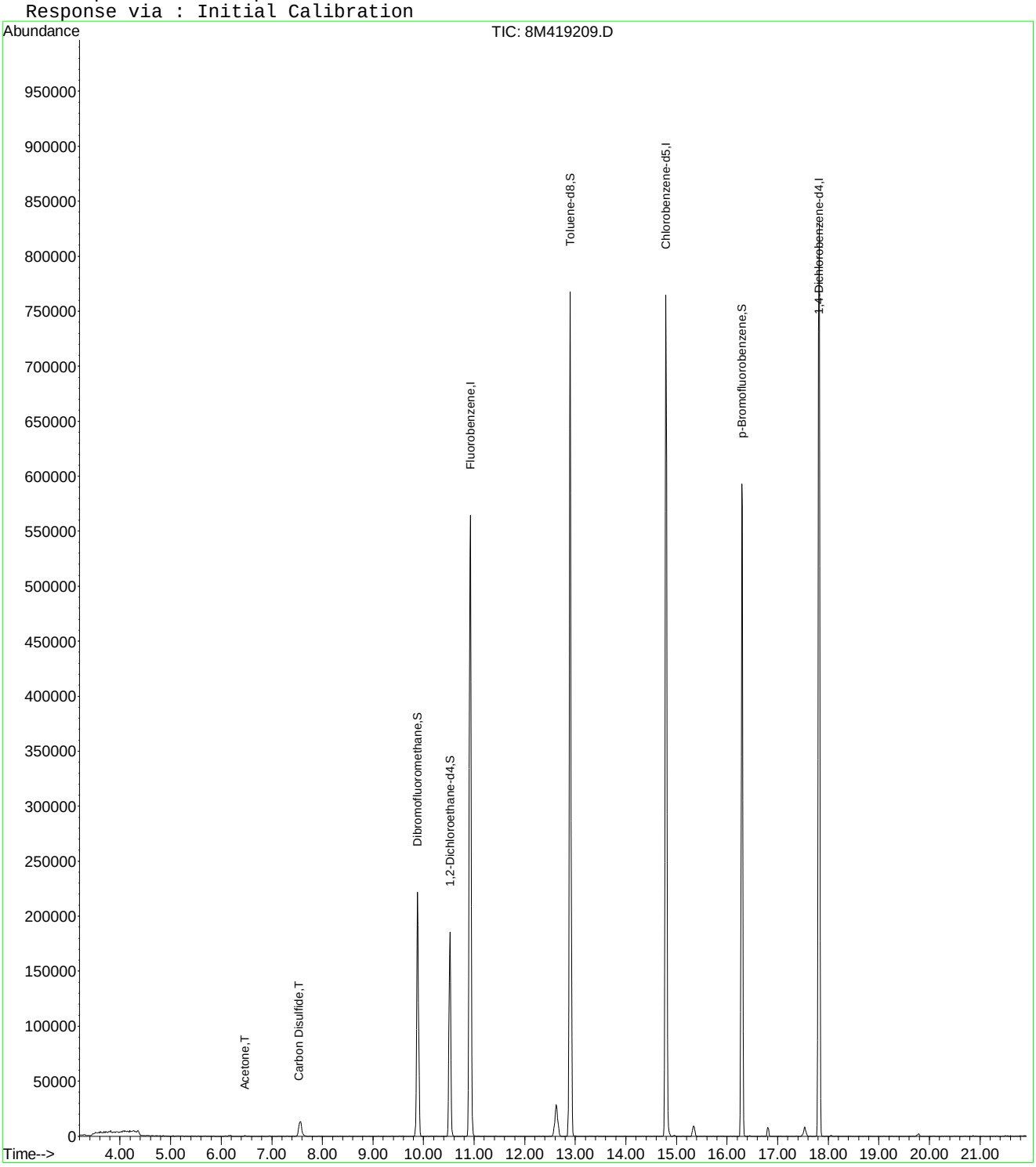
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	696490	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	559366	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	274014	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	183451	25.1119	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.44%			
43) 1,2-Dichloroethane-d4	10.52	65	159080	25.1887	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.76%			
58) Toluene-d8	12.90	98	681122	26.6496	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.60%			
80) p-Bromofluorobenzene	16.29	95	261213	27.0105	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.04%			
Target Compounds						Qvalue
13) Acetone	6.47	43	1090	1.1127	ug/L	# 42
20) Carbon Disulfide	7.53	76	4398	0.2097	ug/L	# 74

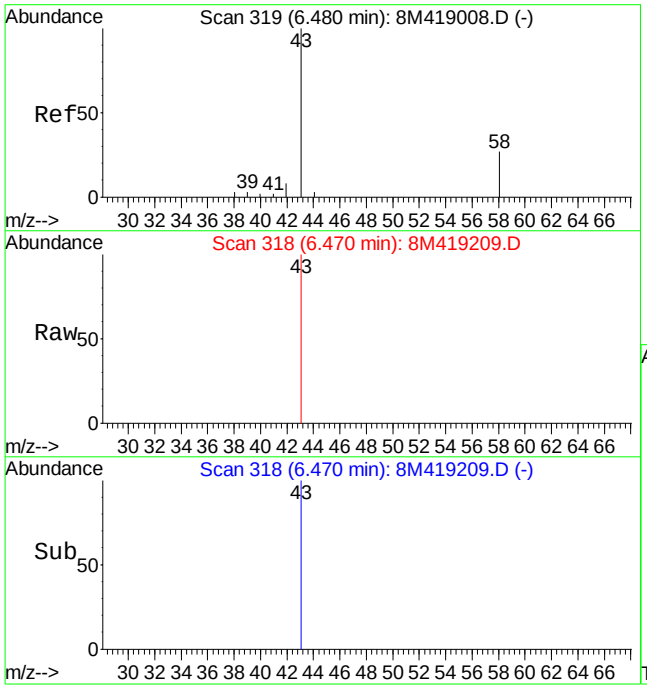
(#) = qualifier out of range (m) = manual integration
8M419209.D 8260WT.M Fri Apr 28 06:56:09 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419209.D Vial: 10
Acq On : 27 Apr 2017 15:55 Operator: TMB
Sample : L17041110-26 A RS 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:17 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

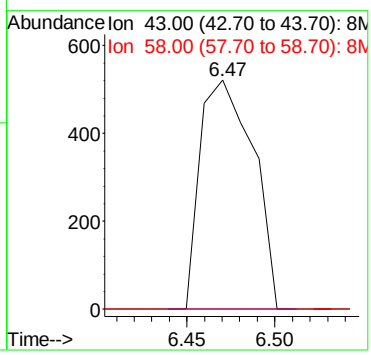


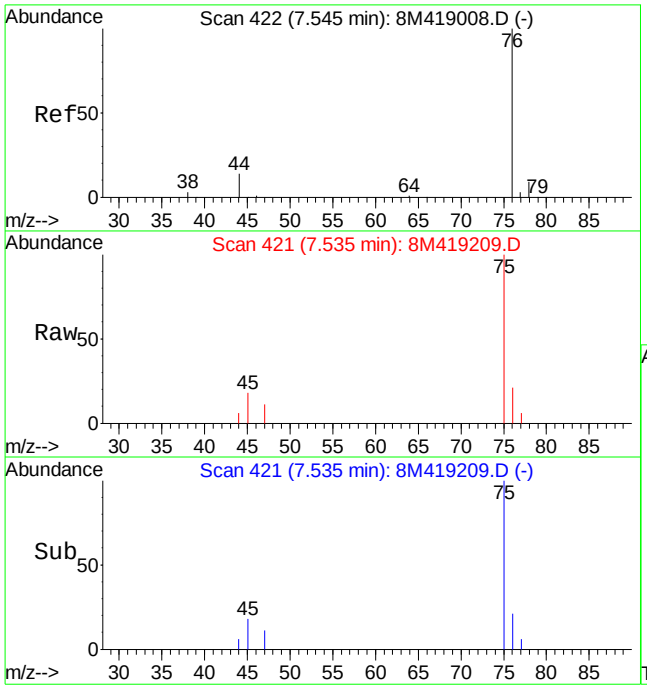


#13
Acetone
Concen: 1.11 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419209.D
Acq: 27 Apr 2017 15:55

Tgt Ion: 43 Resp: 1090

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

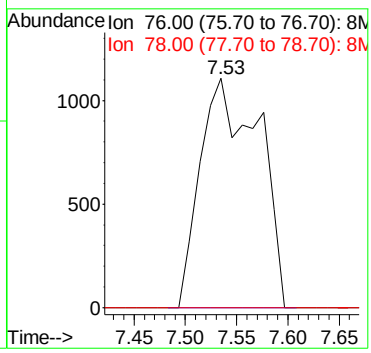




#20
Carbon Disulfide
Concen: 0.21 ug/L
RT: 7.53 min Scan# 421
Delta R.T. -0.01 min
Lab File: 8M419209.D
Acq: 27 Apr 2017 15:55

Tgt Ion: 76 Resp: 4398

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419206.D Vial: 7
Acq On : 27 Apr 2017 14:25 Operator: TMB
Sample : L17041110-27 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:47:45 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	731045	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	592371	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	311500	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	194669	25.3879	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.52	65	164990	24.8897	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.56%			
58) Toluene-d8	12.90	98	721264	26.6479	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.60%			
80) p-Bromofluorobenzene	16.29	95	280277	25.4941	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.96%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	231436	23.3933	ug/L	99
3) Chloromethane	3.81	50	262402	21.2156	ug/L	97
4) Vinyl Chloride	4.04	62	254211	21.7638	ug/L	98
5) 1,3-Butadiene	4.08	54	162914	33.0469	ug/L	95
6) Bromomethane	4.96	94	82903	22.7410	ug/L	98
7) Chloroethane	5.12	64	116931	22.9184	ug/L	97
8) Trichlorofluoromethane	5.60	101	258481	20.3746	ug/L	99
9) Diethyl ether	6.13	59	411000	86.0190	ug/L	88
10) Isoprene	6.17	67	190709	19.0127	ug/L	90
11) Acrolein	6.37	56	54541	82.4240	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.39	101	154974	21.4223	ug/L	100
13) Acetone	6.47	43	21816	21.2183	ug/L	92
14) 1,1-Dichloroethene	6.70	61	208167	19.6618	ug/L	96
15) Tert-Butyl Alcohol	6.80	59	50517	151.5730	ug/L	98
16) Dimethyl Sulfide	6.96	62	142638	20.2266	ug/L	88
17) Iodomethane	7.21	142	52373	16.5584	ug/L	100
18) Methyl acetate	7.22	43	52855	18.7730	ug/L	90
19) Methylene Chloride	7.48	84	147870	19.4349	ug/L	80
20) Carbon Disulfide	7.52	76	342784	15.5714	ug/L	100
21) Acrylonitrile	7.65	53	27120	19.0154	ug/L	98
22) Methyl Tert Butyl Ether	7.68	73	279157	18.6214	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	204418	19.8454	ug/L	94
24) n-Hexane	8.00	57	169646	19.7308	ug/L	92
25) Diisopropyl ether	8.34	45	2281191	98.9415	ug/L	95
26) Vinyl Acetate	8.52	43	210908	20.3959	ug/L	93
27) 1,1-Dichloroethane	8.55	63	268027	20.2179	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1746618	89.0782	ug/L	97
29) 2-Butanone	9.09	43	28826	17.8780	ug/L	88
30) Propionitrile	9.21	54	45244	90.5355	ug/L	98
31) 2,2-Dichloropropane	9.32	77	231032	20.6442	ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	171432	20.1356	ug/L	93
33) Chloroform	9.59	83	279606	19.0353	ug/L	98
34) 1-Bromopropane	9.74	122	41755	24.8609	ug/L	99
35) Bromochloromethane	9.83	130	90934	19.7933	ug/L	89
36) Tetrahydrofuran	9.85	42	95127	85.7065	ug/L	85
38) 1,1,1-Trichloroethane	10.13	97	246543	20.7980	ug/L	98
39) Cyclohexane	10.16	56	191695	17.3690	ug/L	91
40) 1,1-Dichloropropene	10.31	75	204580	19.7659	ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1624419	92.5189	ug/L	97
42) Carbon Tetrachloride	10.47	117	227125	20.6637	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419206.D 8260WT.M Thu Apr 27 16:38:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419206.D Vial: 7
Acq On : 27 Apr 2017 14:25 Operator: TMB
Sample : L17041110-27 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:47:45 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

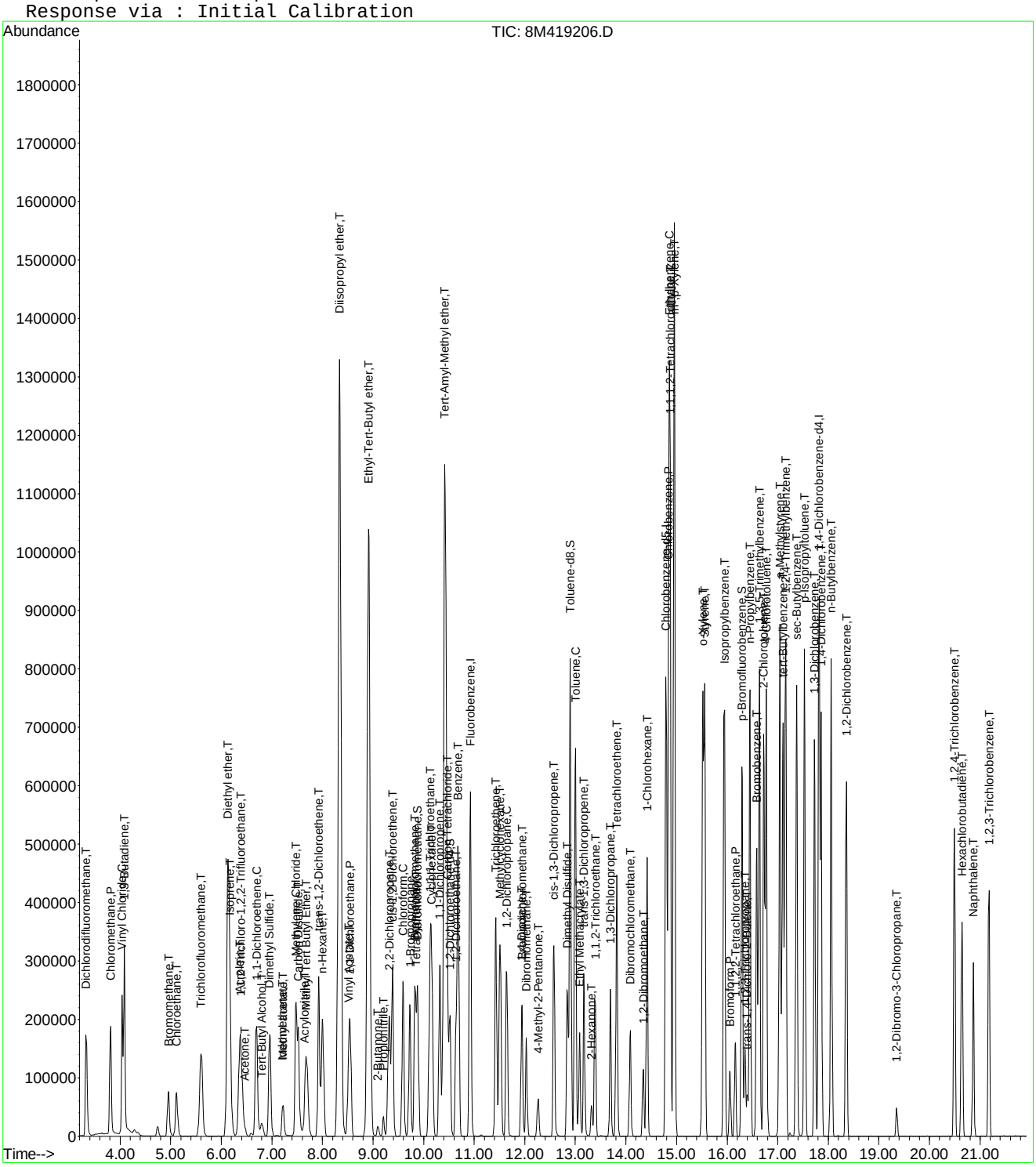
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	164783	19.8389	ug/L	96
46)	Benzene	10.68	78	612960	20.2962	ug/L	96
47)	Trichloroethene	11.43	130	164274	19.3631	ug/L	98
48)	Methylcyclohexane	11.51	83	214450	18.9625	ug/L	95
49)	1,2-Dichloropropane	11.65	63	148434	20.1234	ug/L	93
50)	Bromodichloromethane	11.95	83	190762	19.7620	ug/L	99
51)	1,4-Dioxane	11.94	88	5401	128.4265	ug/L	92
52)	Dibromomethane	12.03	93	76077	20.0415	ug/L	98
54)	4-Methyl-2-Pentanone	12.27	58	24572	17.1883	ug/L	98
55)	cis-1,3-Dichloropropene	12.58	75	231866	21.0916	ug/L	99
56)	Dimethyl Disulfide	12.85	79	99166	17.7693	ug/L	85
59)	Toluene	13.00	91	670407	20.3317	ug/L	98
60)	Ethyl Methacrylate	13.08	69	129992	20.8961	ug/L	87
62)	trans-1,3-Dichloropropene	13.17	75	182017	19.0343	ug/L	99
63)	1,1,2-Trichloroethane	13.39	97	101494	18.7089	ug/L	96
64)	2-Hexanone	13.32	58	23496	17.6483	ug/L	82
65)	1,3-Dichloropropane	13.69	76	177651	19.3713	ug/L	85
66)	Tetrachloroethene	13.82	164	136787	19.7493	ug/L	98
67)	Dibromochloromethane	14.09	129	129202	18.5339	ug/L	100
68)	1,2-Dibromoethane	14.34	107	100619	18.9882	ug/L	100
69)	1-Chlorohexane	14.42	91	217957	20.8927	ug/L	92
70)	Chlorobenzene	14.84	112	443544	18.8973	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	158541	19.0337	ug/L	100
72)	Ethylbenzene	14.86	106	247325	18.8141	ug/L	91
73)	m-,p-Xylene	14.95	106	605415	39.7678	ug/L	94
74)	o-Xylene	15.52	106	291285	19.0313	ug/L	99
75)	Styrene	15.55	104	487136	20.3011	ug/L	97
76)	Bromoform	16.06	173	72592	15.4427	ug/L	100
77)	Isopropylbenzene	15.95	105	727248	19.8444	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	111300	18.9362	ug/L	99
81)	1,2,3-Trichloropropane	16.35	110	31535	18.7145	ug/L	70
82)	trans-1,4-Dichloro-2-Buten	16.39	53	19037	13.8171	ug/L	79
83)	n-Propylbenzene	16.45	91	871258	19.9836	ug/L	100
84)	Bromobenzene	16.59	156	195363	19.1243	ug/L	98
85)	1,3,5-Trimethylbenzene	16.64	105	625985	19.8293	ug/L	98
86)	2-Chlorotoluene	16.72	91	605314	20.3368	ug/L	95
87)	4-Chlorotoluene	16.77	91	488303	18.2043	ug/L	100
88)	a-Methylstyrene	17.04	118	364458	20.5927	ug/L	99
89)	tert-Butylbenzene	17.10	134	135349	18.9366	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	649688	20.1588	ug/L	99
91)	sec-Butylbenzene	17.37	105	788154	19.9332	ug/L	98
92)	p-Isopropyltoluene	17.53	119	667468	20.0476	ug/L	98
93)	1,3-Dichlorobenzene	17.72	146	371449	18.7595	ug/L	99
94)	1,4-Dichlorobenzene	17.86	146	384800	19.1152	ug/L	99
95)	n-Butylbenzene	18.06	91	616576	20.5583	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	329903	18.9661	ug/L	100
97)	1,2-Dibromo-3-Chloropropan	19.35	75	16228	16.9646	ug/L	99
98)	1,2,4-Trichlorobenzene	20.49	180	215871	18.4334	ug/L	99
99)	Hexachlorobutadiene	20.64	225	98315	18.0412	ug/L	98
100)	Naphthalene	20.87	128	300646	17.9648	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	169491	17.4283	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419206.D 8260WT.M Thu Apr 27 16:38:04 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419206.D Vial: 7
Acq On : 27 Apr 2017 14:25 Operator: TMB
Sample : L17041110-27 A MS 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:47 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419207.D Vial: 8
Acq On : 27 Apr 2017 14:55 Operator: TMB
Sample : L17041110-28 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:17:36 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	750105	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	605015	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	323670	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	200573	25.4932	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.96%			
43) 1,2-Dichloroethane-d4	10.52	65	173010	25.4363	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.76%			
58) Toluene-d8	12.90	98	737773	26.6881	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.76%			
80) p-Bromofluorobenzene	16.29	95	288997	25.2989	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.20%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	236812	23.3285	ug/L	100
3) Chloromethane	3.80	50	271595	21.4009	ug/L	96
4) Vinyl Chloride	4.04	62	251102	20.9514	ug/L	99
5) 1,3-Butadiene	4.08	54	155546	30.2316	ug/L	97
6) Bromomethane	4.95	94	89073	23.6647	ug/L	96
7) Chloroethane	5.12	64	117311	22.4087	ug/L	96
8) Trichlorofluoromethane	5.60	101	264765	20.3396	ug/L	99
9) Diethyl ether	6.13	59	438768	89.4973	ug/L	89
10) Isoprene	6.17	67	190215	18.4816	ug/L	90
11) Acrolein	6.37	56	58047	85.4934	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	158192	21.3115	ug/L	98
13) Acetone	6.46	43	23162	21.9551	ug/L	93
14) 1,1-Dichloroethene	6.69	61	211032	19.4259	ug/L	96
15) Tert-Butyl Alcohol	6.80	59	62482	182.7095	ug/L	100
16) Dimethyl Sulfide	6.96	62	151513	20.9392	ug/L	89
17) Iodomethane	7.22	142	52014	16.0270	ug/L	93
18) Methyl acetate	7.22	43	58091	20.1084	ug/L #	85
19) Methylene Chloride	7.47	84	152817	19.5747	ug/L	81
20) Carbon Disulfide	7.53	76	355570	15.7418	ug/L	100
21) Acrylonitrile	7.66	53	29371	20.0705	ug/L	99
22) Methyl Tert Butyl Ether	7.68	73	308089	20.0291	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	207440	19.6271	ug/L	94
24) n-Hexane	8.00	57	171358	19.4235	ug/L	91
25) Diisopropyl ether	8.34	45	2354778	99.5380	ug/L	95
26) Vinyl Acetate	8.51	43	223587	21.0727	ug/L	93
27) 1,1-Dichloroethane	8.55	63	272683	20.0465	ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1851981	92.0517	ug/L	97
29) 2-Butanone	9.10	43	33407	20.1926	ug/L	90
30) Propionitrile	9.21	54	48709	94.9924	ug/L	99
31) 2,2-Dichloropropane	9.32	77	233470	20.3319	ug/L	99
32) cis-1,2-Dichloroethene	9.39	96	170611	19.5299	ug/L	92
33) Chloroform	9.59	83	281293	18.6635	ug/L	98
34) 1-Bromopropane	9.74	122	42496	24.6592	ug/L	98
35) Bromochloromethane	9.83	130	96839	20.5430	ug/L	91
36) Tetrahydrofuran	9.85	42	105710	92.8213	ug/L	85
38) 1,1,1-Trichloroethane	10.13	97	244952	20.1387	ug/L	99
39) Cyclohexane	10.16	56	195597	17.2722	ug/L	89
40) 1,1-Dichloropropene	10.32	75	205680	19.3672	ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1734664	96.2875	ug/L	97
42) Carbon Tetrachloride	10.47	117	226848	20.1141	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419207.D 8260WT.M Thu Apr 27 16:38:09 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419207.D Vial: 8
Acq On : 27 Apr 2017 14:55 Operator: TMB
Sample : L17041110-28 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:17:36 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

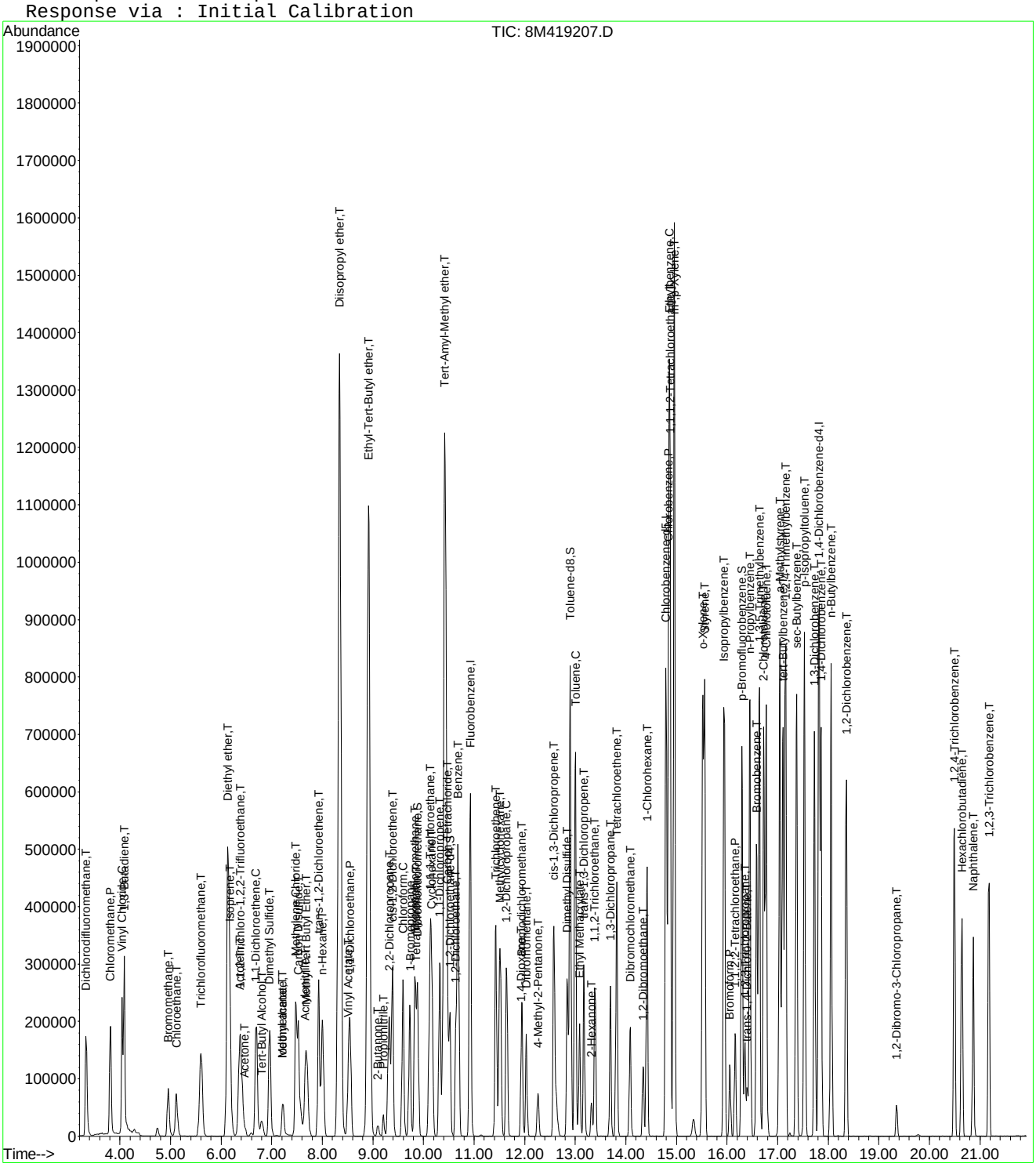
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	171248	20.0934	ug/L	96
46)	Benzene	10.68	78	618376	19.9553	ug/L	95
47)	Trichloroethene	11.43	130	165063	18.9618	ug/L	97
48)	Methylcyclohexane	11.51	83	220079	18.9658	ug/L	96
49)	1,2-Dichloropropane	11.64	63	148442	19.6131	ug/L	95
50)	Bromodichloromethane	11.94	83	197150	19.9048	ug/L	99
51)	1,4-Dioxane	11.93	88	8703	201.6840	ug/L	91
52)	Dibromomethane	12.03	93	79561	20.4267	ug/L	98
54)	4-Methyl-2-Pentanone	12.26	58	27772	18.9331	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	243546	21.5912	ug/L	99
56)	Dimethyl Disulfide	12.84	79	107708	18.6277	ug/L	87
59)	Toluene	13.00	91	680634	20.2105	ug/L	98
60)	Ethyl Methacrylate	13.09	69	142636	22.4494	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	191447	19.6020	ug/L	98
63)	1,1,2-Trichloroethane	13.39	97	107224	19.3521	ug/L	97
64)	2-Hexanone	13.32	58	27939	20.5470	ug/L	88
65)	1,3-Dichloropropane	13.70	76	192083	20.5072	ug/L	88
66)	Tetrachloroethene	13.82	164	136318	19.2702	ug/L	98
67)	Dibromochloromethane	14.09	129	138456	19.4463	ug/L	98
68)	1,2-Dibromoethane	14.34	107	106267	19.6349	ug/L	100
69)	1-Chlorohexane	14.42	91	221320	20.7717	ug/L	91
70)	Chlorobenzene	14.84	112	451687	18.8420	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	162668	19.1211	ug/L	99
72)	Ethylbenzene	14.86	106	249803	18.6054	ug/L	90
73)	m-,p-Xylene	14.96	106	622679	40.0471	ug/L	96
74)	o-Xylene	15.52	106	299540	19.1617	ug/L	99
75)	Styrene	15.56	104	505453	20.6242	ug/L	95
76)	Bromoform	16.05	173	80124	16.6426	ug/L	99
77)	Isopropylbenzene	15.94	105	736394	19.6740	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	121616	19.9134	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	33890	19.3559	ug/L	76
82)	trans-1,4-Dichloro-2-Buten	16.39	53	22126	15.3808	ug/L	85
83)	n-Propylbenzene	16.45	91	882224	19.4743	ug/L	100
84)	Bromobenzene	16.59	156	201889	19.0201	ug/L	99
85)	1,3,5-Trimethylbenzene	16.64	105	641774	19.5650	ug/L	99
86)	2-Chlorotoluene	16.72	91	538210	17.4024	ug/L	84
87)	4-Chlorotoluene	16.78	91	571196	20.4940	ug/L	90
88)	a-Methylstyrene	17.04	118	366201	19.9132	ug/L	99
89)	tert-Butylbenzene	17.11	134	135533	18.2494	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	664972	19.8572	ug/L	98
91)	sec-Butylbenzene	17.37	105	796799	19.3942	ug/L	98
92)	p-Isopropyltoluene	17.53	119	686057	19.8311	ug/L	98
93)	1,3-Dichlorobenzene	17.73	146	386494	18.7854	ug/L	99
94)	1,4-Dichlorobenzene	17.86	146	386986	18.5010	ug/L	100
95)	n-Butylbenzene	18.06	91	635248	20.3845	ug/L	99
96)	1,2-Dichlorobenzene	18.36	146	341100	18.8725	ug/L	99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	17710	17.8178	ug/L	98
98)	1,2,4-Trichlorobenzene	20.50	180	228125	18.7473	ug/L	99
99)	Hexachlorobutadiene	20.64	225	101668	17.9550	ug/L	99
100)	Naphthalene	20.87	128	350857	20.1768	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	188482	18.6523	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419207.D 8260WT.M Thu Apr 27 16:38:09 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419207.D Vial: 8
Acq On : 27 Apr 2017 14:55 Operator: TMB
Sample : L17041110-28 A MSD 826-SPE Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:17 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146782.D Vial: 18
Acq On : 27 Apr 2017 20:42 Operator: TMB
Sample : L17041110-29 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:04:27 2017 Quant Results File: 8260BWT.RES

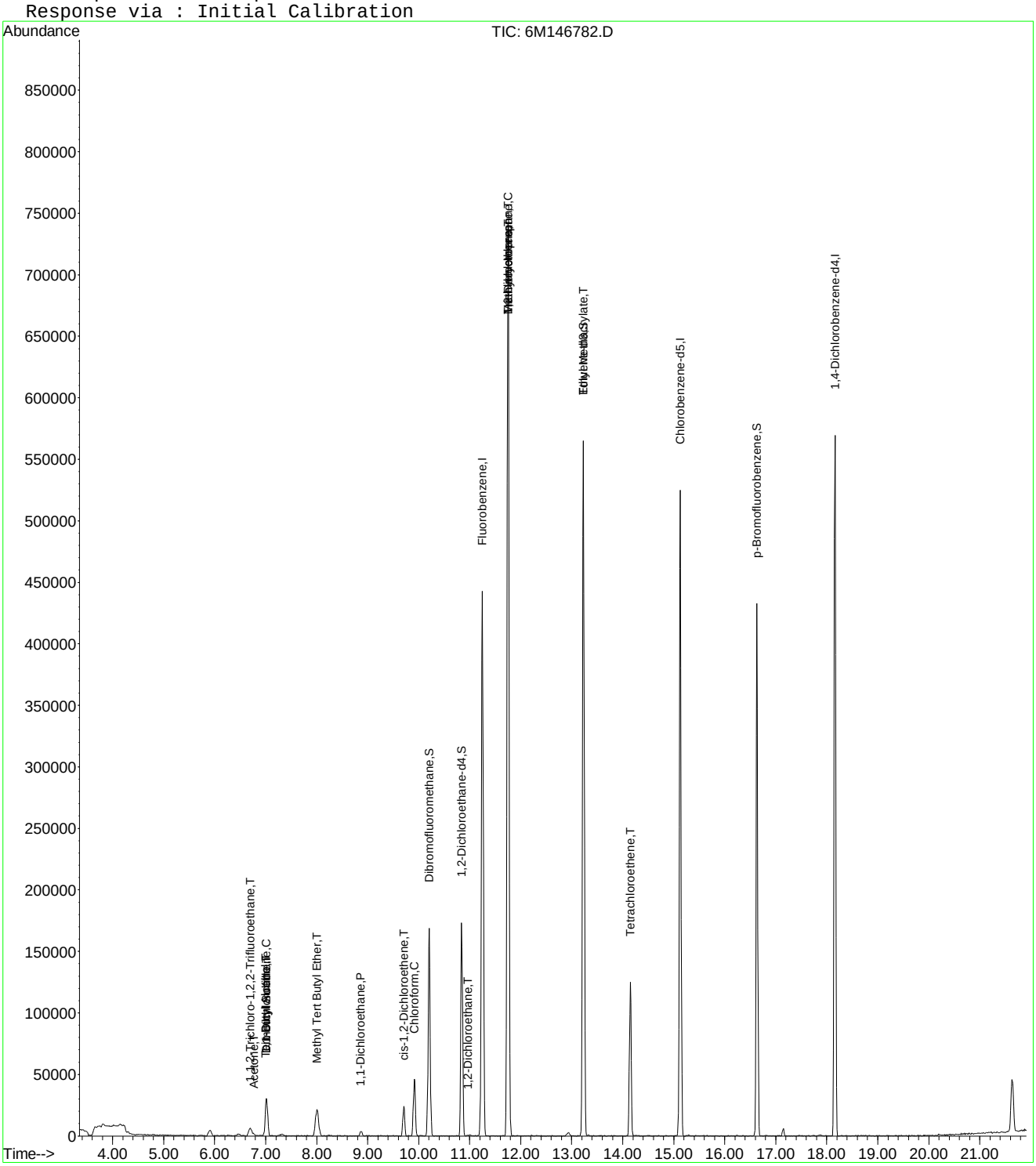
Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

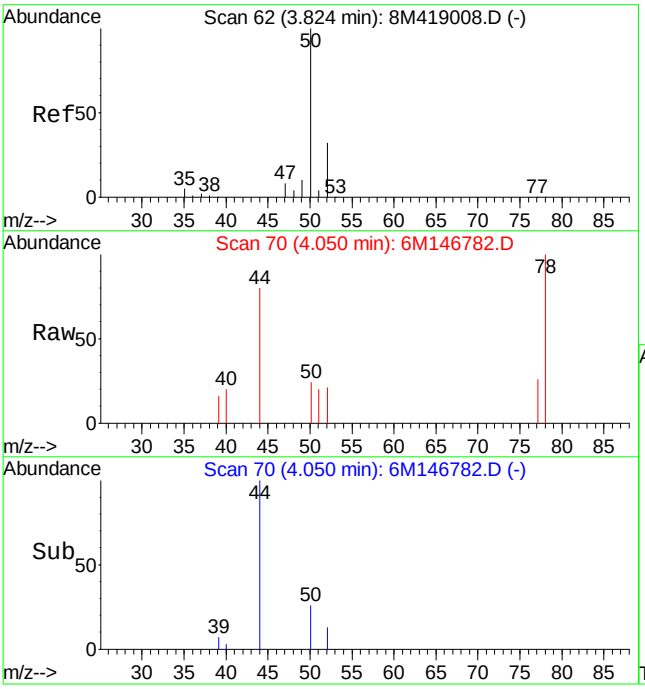
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	560435	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	386811	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	192877	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	147623	25.8033	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.20%			
43) 1,2-Dichloroethane-d4	10.84	65	153575	27.2364	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.96%			
58) Toluene-d8	13.23	98	524289	26.5623	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.24%			
80) p-Bromofluorobenzene	16.63	95	200941	27.4301	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.72%			
Target Compounds						Qvalue
3) Chloromethane	4.05	50	1119	Below Cal		91
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	8007	1.3574	ug/L	92
13) Acetone	6.77	43	1579	1.3056	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	36241	4.2416	ug/L	91
15) Tert-Butyl Alcohol	7.00	59	872	2.3246	ug/L #	57
16) Dimethyl Sulfide	7.01	62	1852	0.3033	ug/L #	58
22) Methyl Tert Butyl Ether	8.00	73	50066	3.5345	ug/L	88
27) 1,1-Dichloroethane	8.86	63	7002	0.6874	ug/L	97
32) cis-1,2-Dichloroethene	9.71	96	15592	2.3064	ug/L	82
33) Chloroform	9.91	83	53057	4.5723	ug/L	95
45) 1,2-Dichloroethane	10.96	62	1136	0.1574	ug/L #	41
47) Trichloroethene	11.75	130	325663	49.8955	ug/L	94
48) Methylcyclohexane	11.75	83	4195	0.4449	ug/L #	1
49) 1,2-Dichloropropane	11.75	63	839	0.1483	ug/L #	35
60) Ethyl Methacrylate	13.23	69	1028	0.1757	ug/L #	60
66) Tetrachloroethene	14.15	166	48100	8.2079	ug/L	93

(#) = qualifier out of range (m) = manual integration
6M146782.D 8260WT.M Fri Apr 28 06:48:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146782.D Vial: 18
Acq On : 27 Apr 2017 20:42 Operator: TMB
Sample : L17041110-29 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 21:04 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

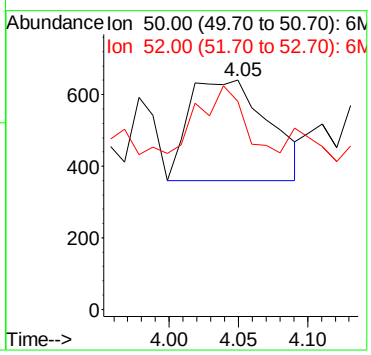


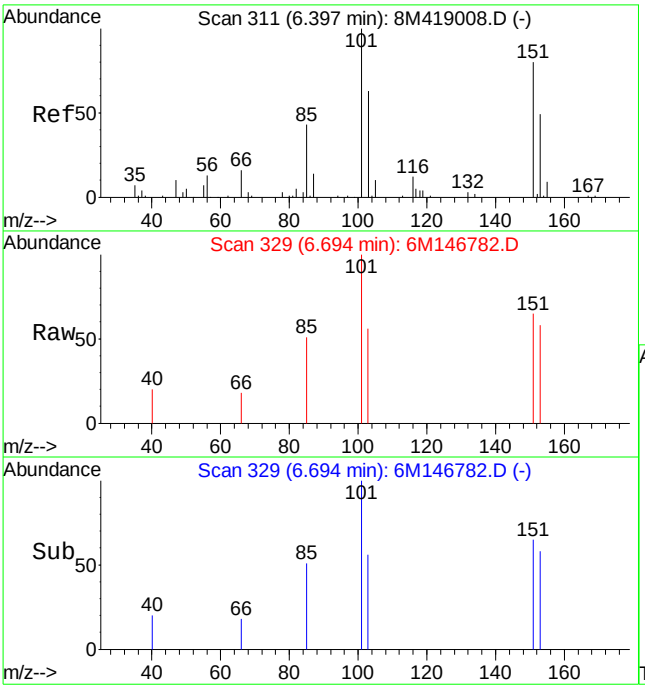


#3
Chloromethane
Concen: Below Cal
RT: 4.05 min Scan# 70
Delta R.T. 0.03 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 50 Resp: 1119

Ion	Ratio	Lower	Upper
50	100		
52	38.1	19.8	46.2

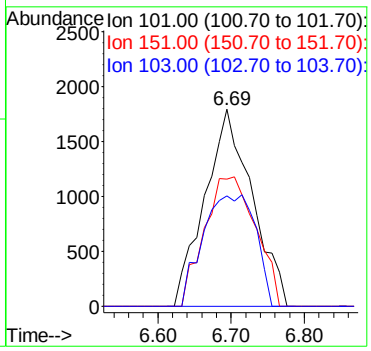


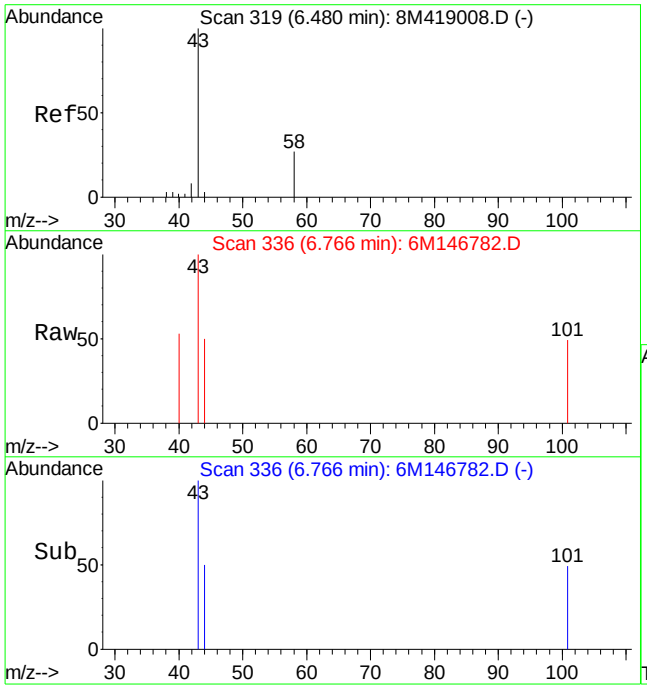


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.36 ug/L
RT: 6.69 min Scan# 329
Delta R.T. 0.01 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion:101 Resp: 8007

Ion	Ratio	Lower	Upper
101	100		
151	71.3	49.4	115.2
103	63.0	38.8	90.4

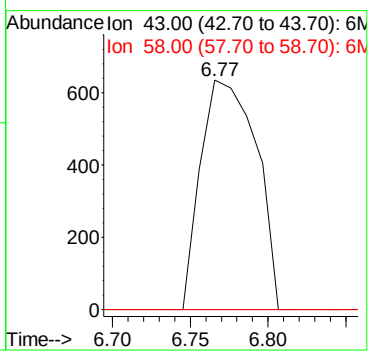


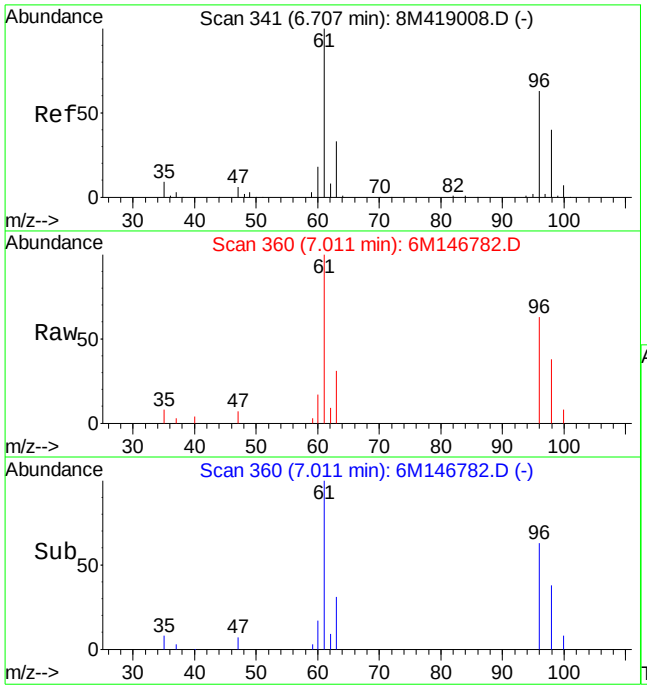


#13
Acetone
Concen: 1.31 ug/L
RT: 6.77 min Scan# 336
Delta R.T. -0.01 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 43 Resp: 1579

Ion	Ratio	Lower	Upper
43	100		
58	0.0	16.4	38.2#

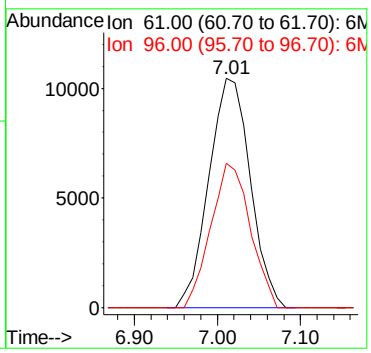


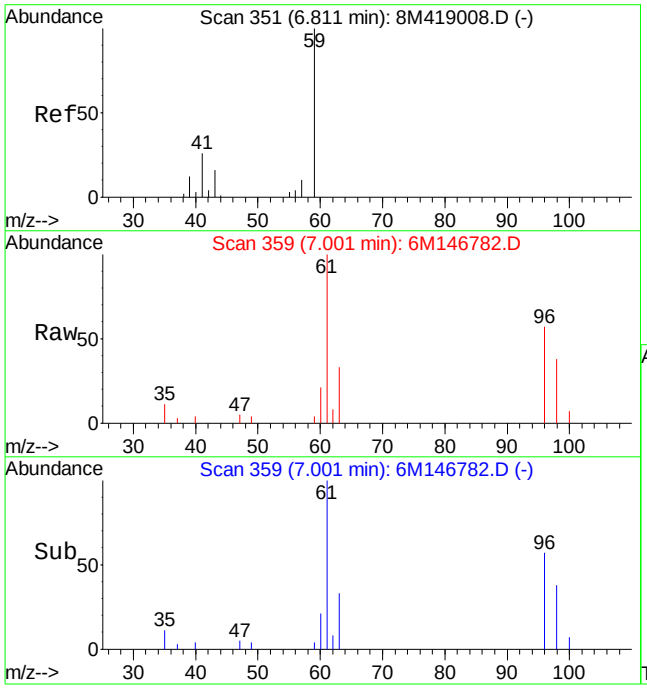


#14
1,1-Dichloroethene
Concen: 4.24 ug/L
RT: 7.01 min Scan# 360
Delta R.T. 0.00 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 61 Resp: 36241

Ion	Ratio	Lower	Upper
61	100		
96	59.8	32.0	74.6

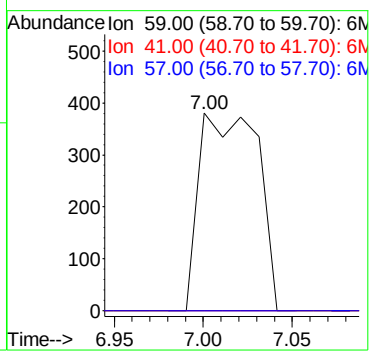


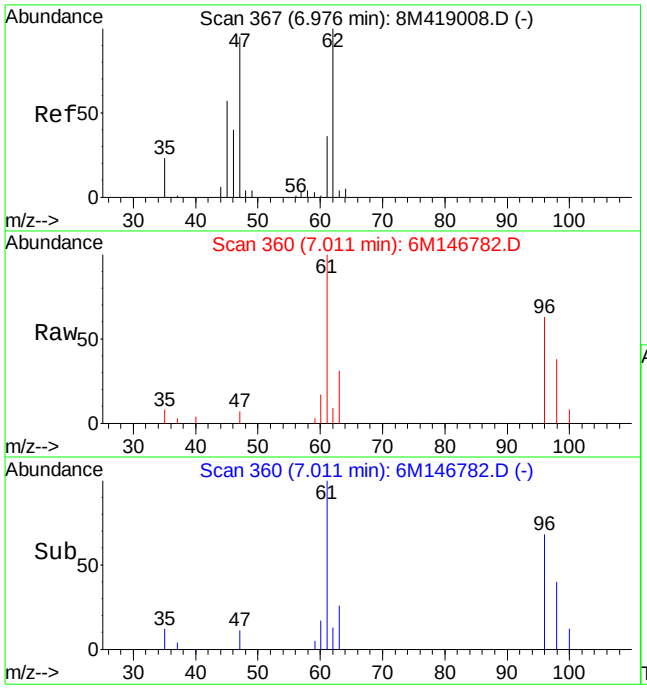


#15
Tert-Butyl Alcohol
Concen: 2.32 ug/L
RT: 7.00 min Scan# 359
Delta R.T. -0.12 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 59 Resp: 872

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

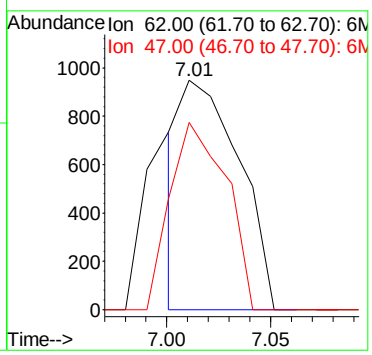


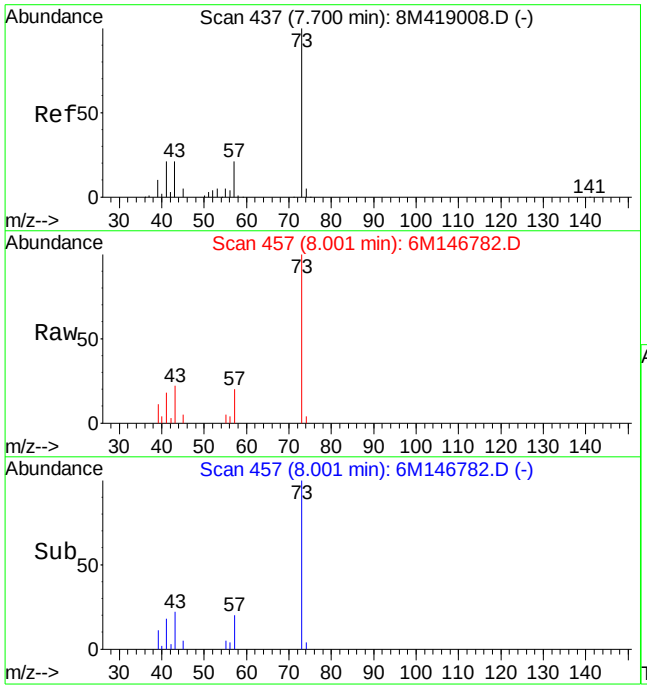


#16
Dimethyl Sulfide
Concen: 0.30 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.27 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 62 Resp: 1852

Ion	Ratio	Lower	Upper
62	100		
47	63.9	64.7	151.1#

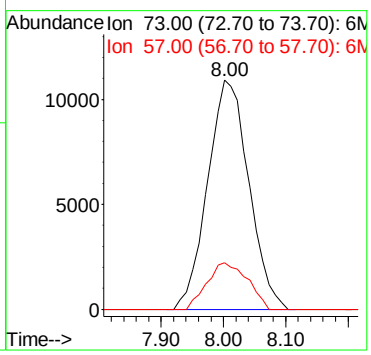


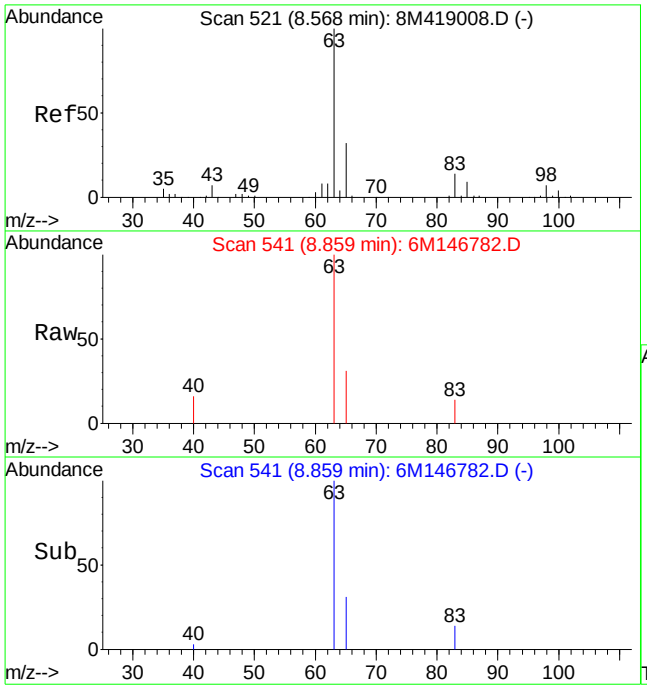


#22
Methyl Tert Butyl Ether
Concen: 3.53 ug/L
RT: 8.00 min Scan# 457
Delta R.T. -0.02 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 73 Resp: 50066

Ion	Ratio	Lower	Upper
73	100		
57	19.9	15.7	36.5

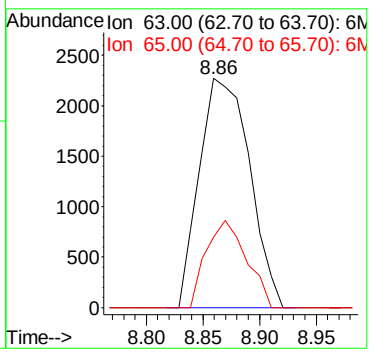


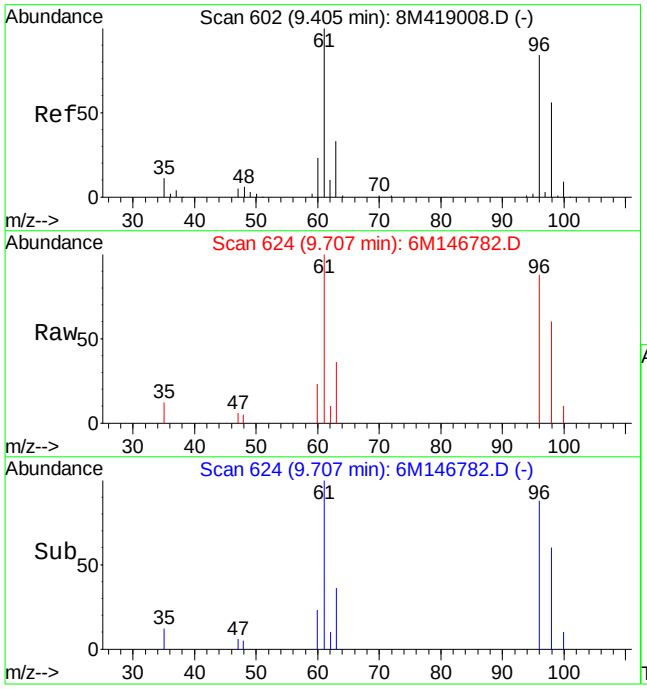


#27
1,1-Dichloroethane
Concen: 0.69 ug/L
RT: 8.86 min Scan# 541
Delta R.T. -0.01 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 63 Resp: 7002

Ion	Ratio	Lower	Upper
63	100		
65	30.4	19.3	44.9

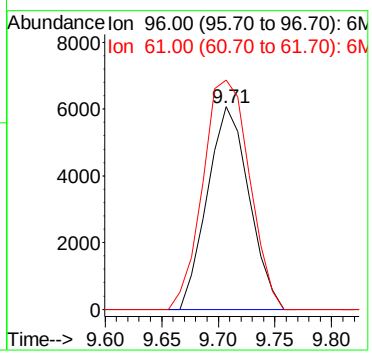


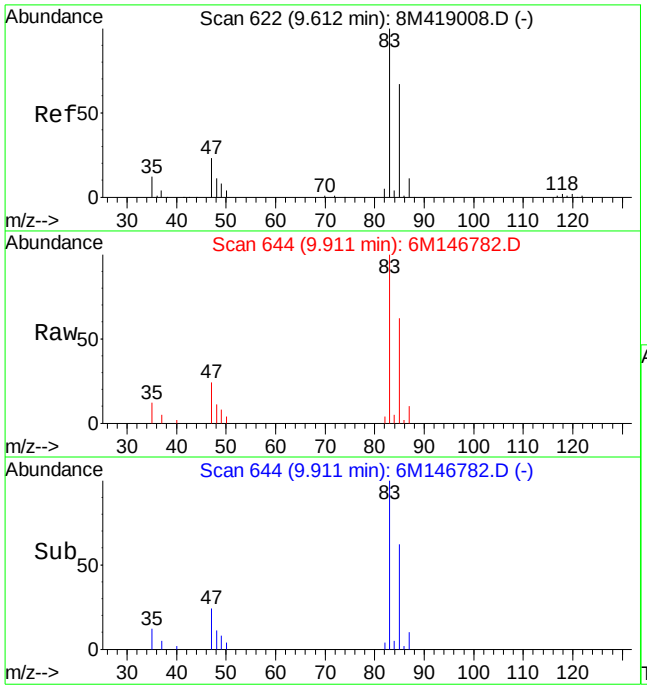


#32
cis-1,2-Dichloroethene
Concen: 2.31 ug/L
RT: 9.71 min Scan# 624
Delta R.T. 0.00 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 96 Resp: 15592

Ion	Ratio	Lower	Upper
96	100		
61	126.6	89.2	208.2

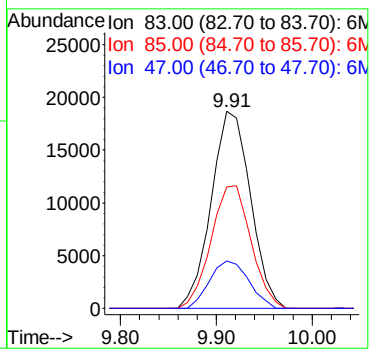


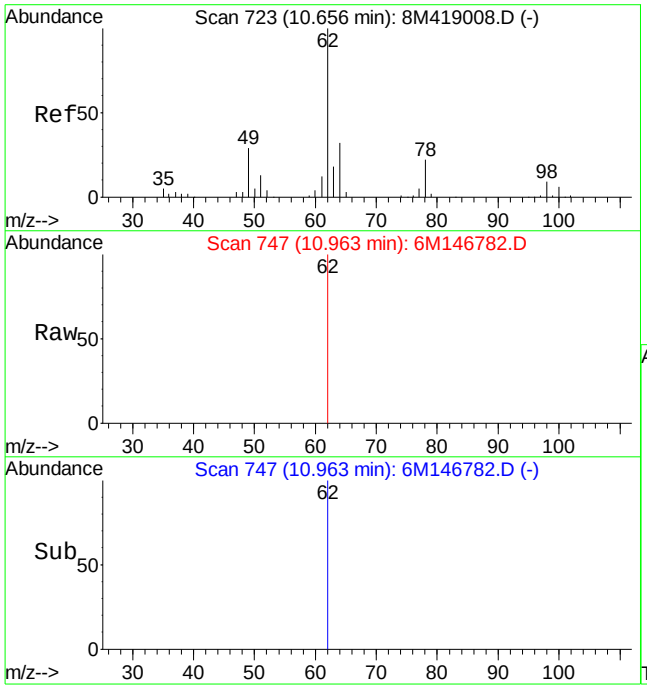


#33
Chloroform
Concen: 4.57 ug/L
RT: 9.91 min Scan# 644
Delta R.T. 0.00 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 83 Resp: 53057

Ion	Ratio	Lower	Upper
83	100		
85	63.3	39.0	91.0
47	24.1	18.5	43.1

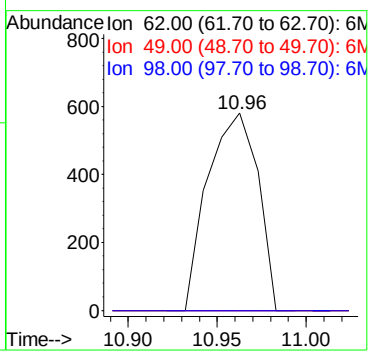


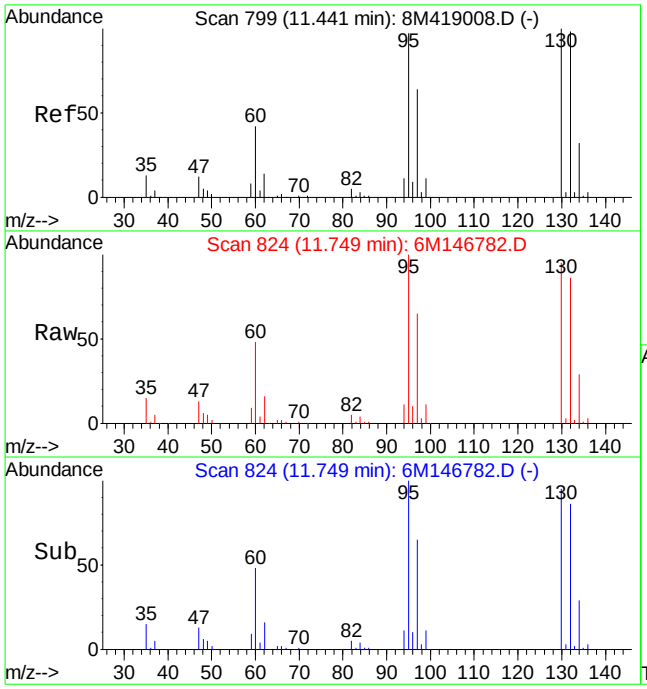


#45
1,2-Dichloroethane
Concen: 0.16 ug/L
RT: 10.96 min Scan# 747
Delta R.T. 0.00 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 62 Resp: 1136

Ion	Ratio	Lower	Upper
62	100		
49	0.0	25.1	58.5#
98	0.0	5.2	12.0#

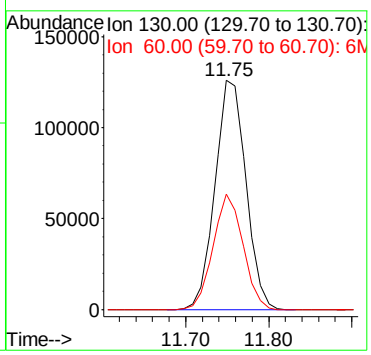


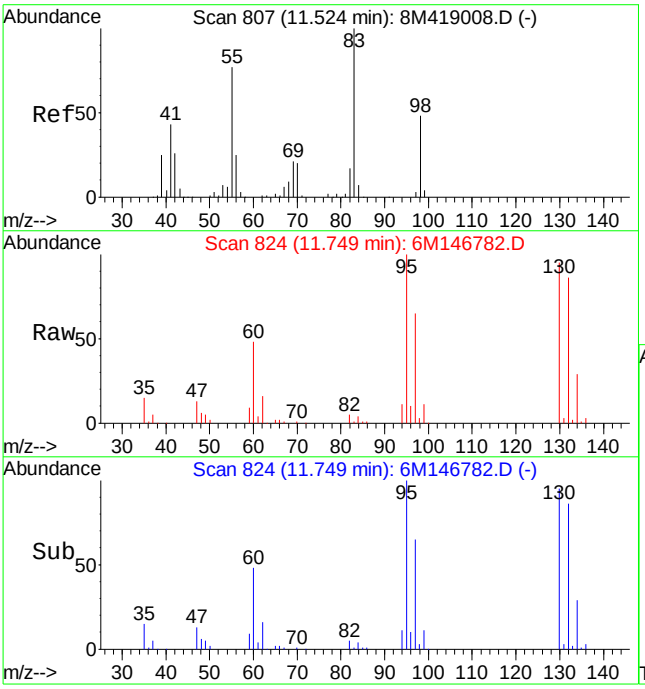


#47
Trichloroethene
Concen: 49.90 ug/L
RT: 11.75 min Scan# 824
Delta R.T. 0.00 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion:130 Resp: 325663

Ion	Ratio	Lower	Upper
130	100		
60	48.7	32.0	74.6

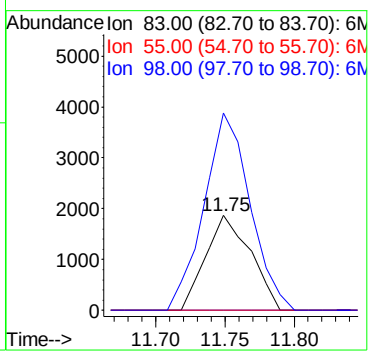


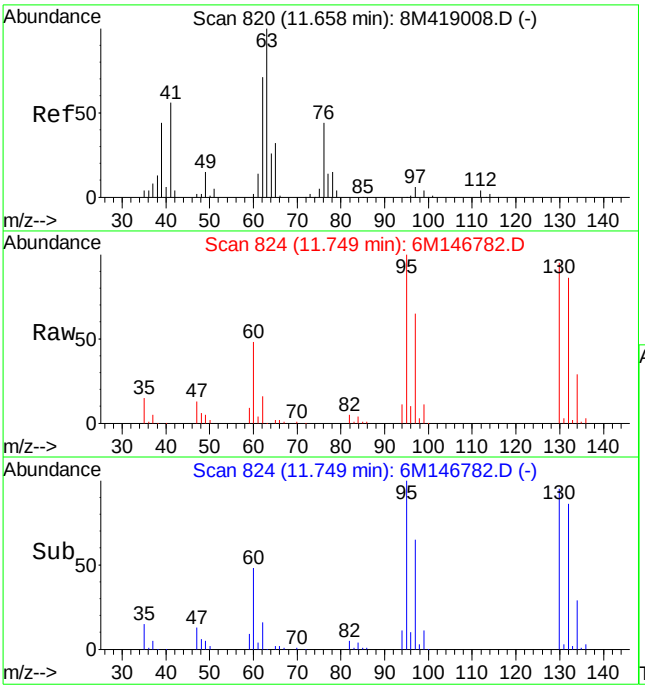


#48
Methylcyclohexane
Concen: 0.44 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.10 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 83 Resp: 4195

Ion	Ratio	Lower	Upper
83	100		
55	0.0	56.3	131.3#
98	213.8	28.4	66.4#

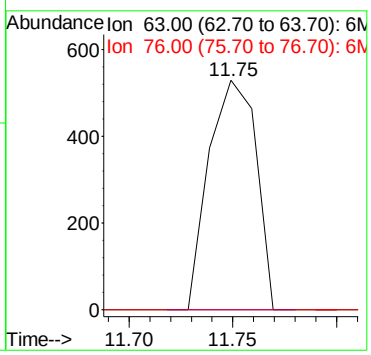


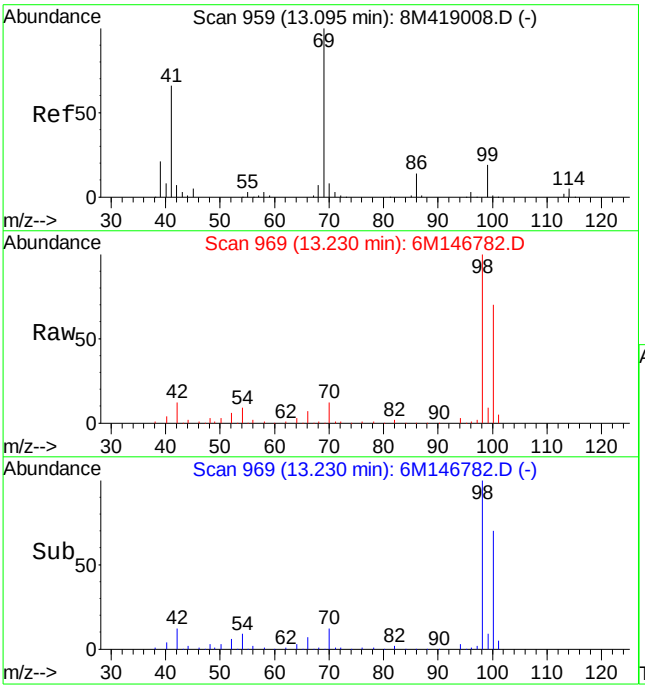


#49
1,2-Dichloropropane
Concen: 0.15 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.22 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 63 Resp: 839

Ion	Ratio	Lower	Upper
63	100		
76	0.0	24.2	56.4#

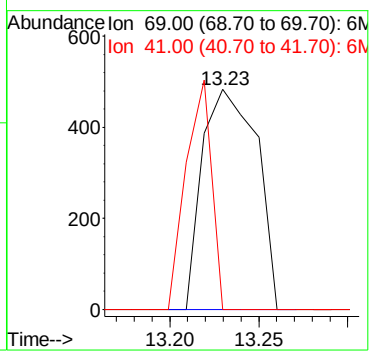


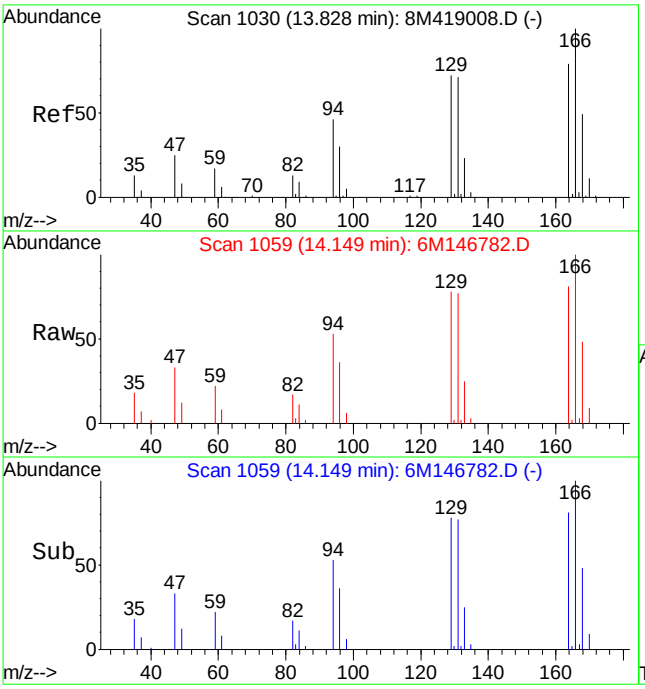


#60
Ethyl Methacrylate
Concen: 0.18 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion: 69 Resp: 1028

Ion	Ratio	Lower	Upper
69	100		
41	49.3	51.4	120.0#

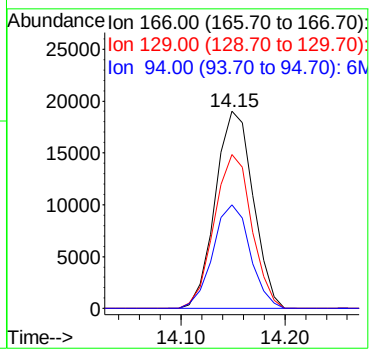




#66
Tetrachloroethene
Concen: 8.21 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146782.D
Acq: 27 Apr 2017 20:42

Tgt Ion:166 Resp: 48100

Ion	Ratio	Lower	Upper
166	100		
129	77.3	43.5	101.5
94	51.9	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146773.D Vial: 9
Acq On : 27 Apr 2017 16:07 Operator: TMB
Sample : L17041110-30 A TB 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:29:57 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

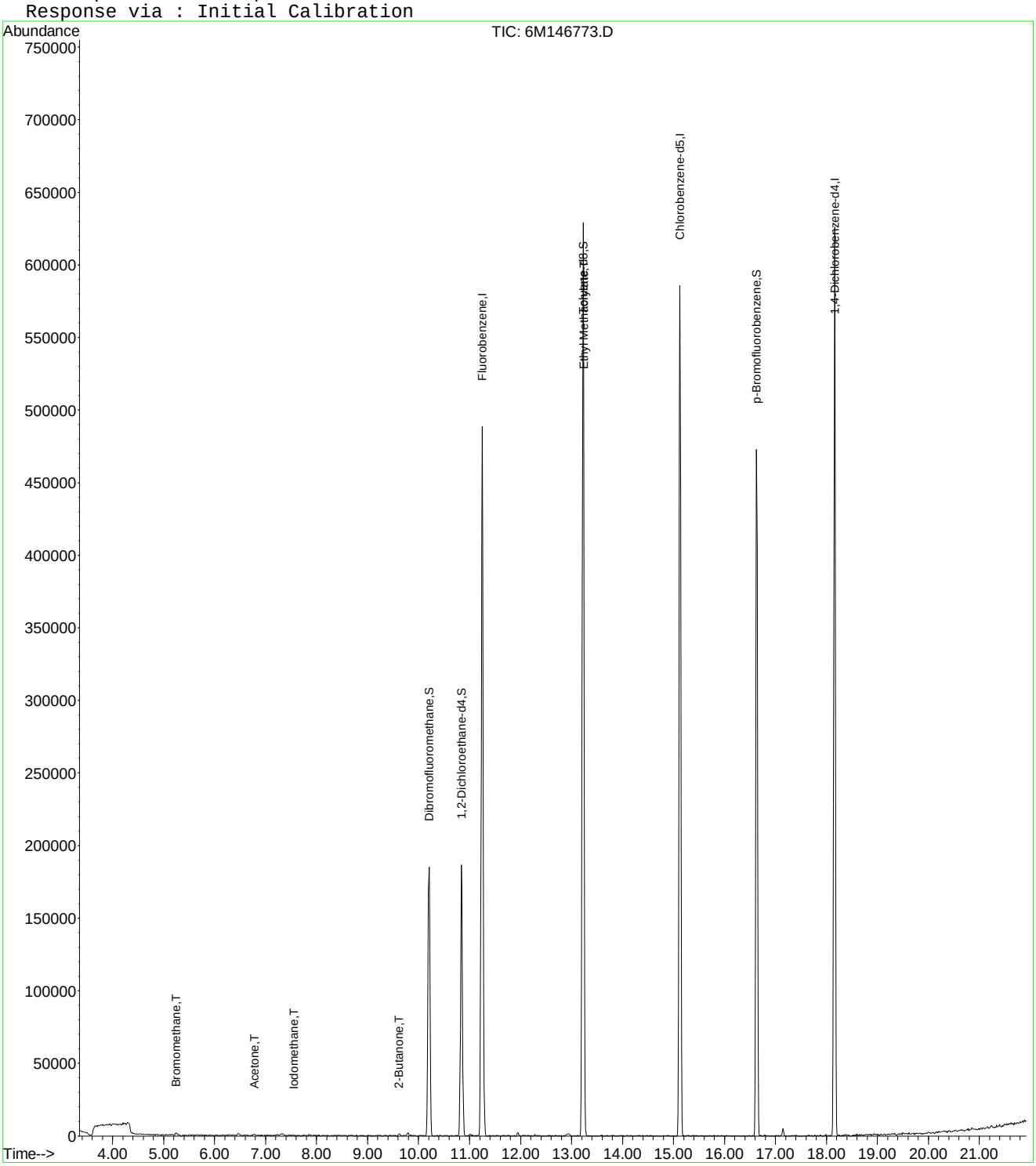
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	623379	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	426309	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	210413	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	159820	25.1145 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.44%		
43) 1,2-Dichloroethane-d4	10.84	65	168636	26.8876 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.56%		
58) Toluene-d8	13.23	98	581206	26.7177 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.88%		
80) p-Bromofluorobenzene	16.63	95	219704	27.4919 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.96%		
Target Compounds					Qvalue
3) Chloromethane	4.03	50	2261	Below Cal	83
6) Bromomethane	5.24	94	2017	0.4131 ug/L	100
13) Acetone	6.78	43	2160	1.6057 ug/L #	48
17) Iodomethane	7.55	142	402	0.8559 ug/L #	32
29) 2-Butanone	9.61	43	2993	1.7654 ug/L #	57
60) Ethyl Methacrylate	13.24	69	976	0.1513 ug/L	68

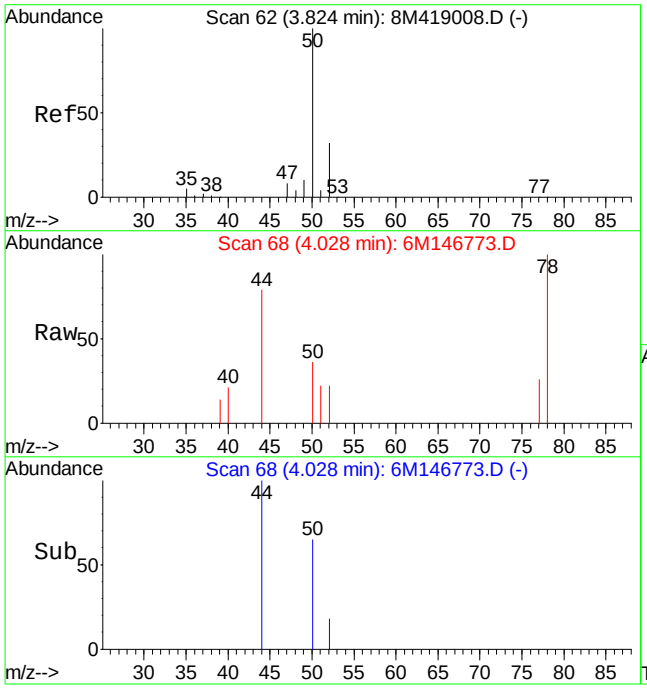
(#) = qualifier out of range (m) = manual integration
6M146773.D 8260WT.M Fri Apr 28 06:47:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146773.D Vial: 9
Acq On : 27 Apr 2017 16:07 Operator: TMB
Sample : L17041110-30 A TB 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 16:29 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

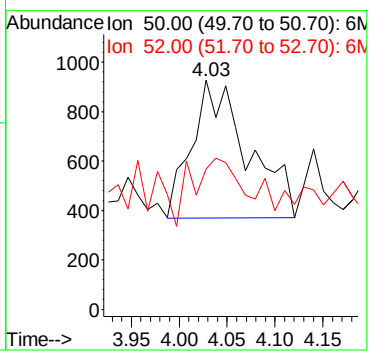


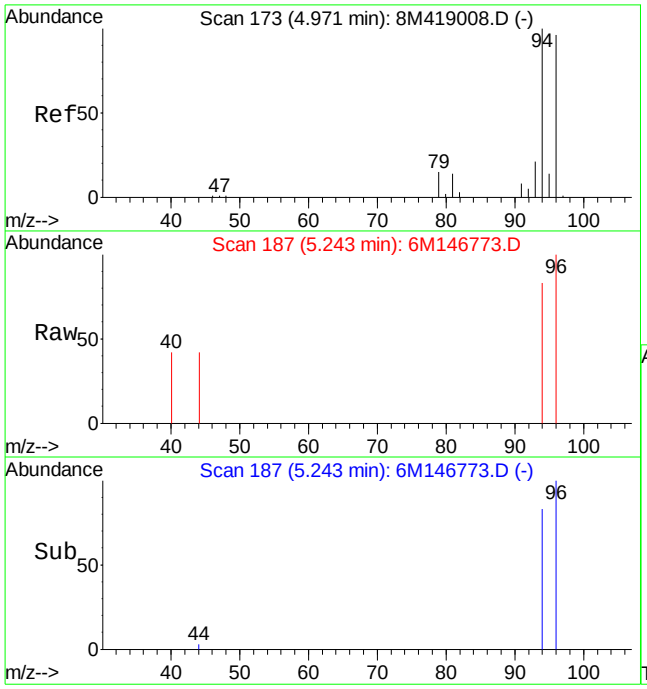


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 50 Resp: 2261

Ion	Ratio	Lower	Upper
50	100		
52	42.8	19.8	46.2

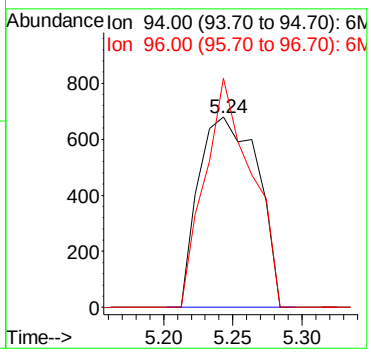


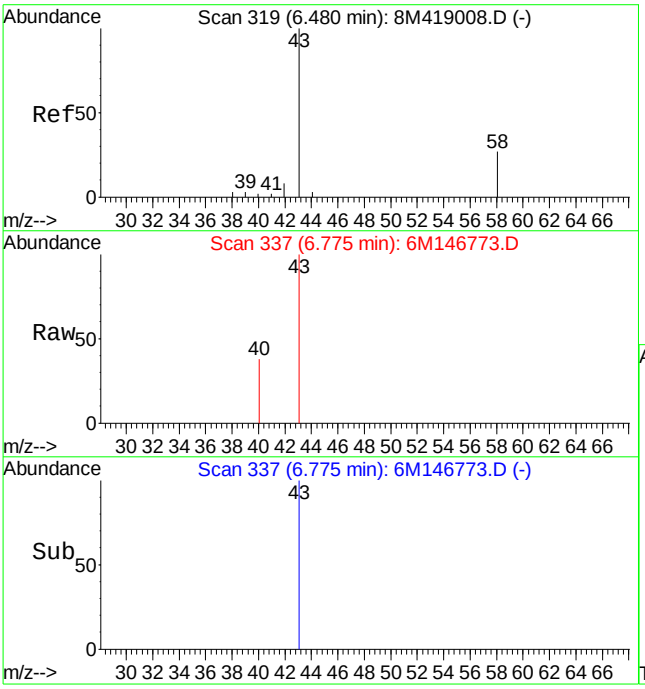


#6
Bromomethane
Concen: 0.41 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 94 Resp: 2017

Ion	Ratio	Lower	Upper
94	100		
96	94.9	56.7	132.3

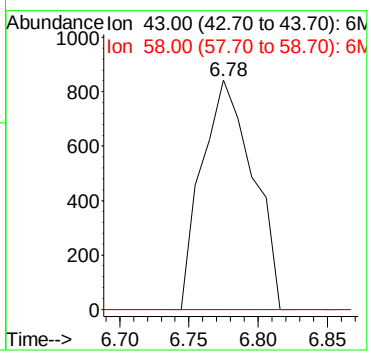


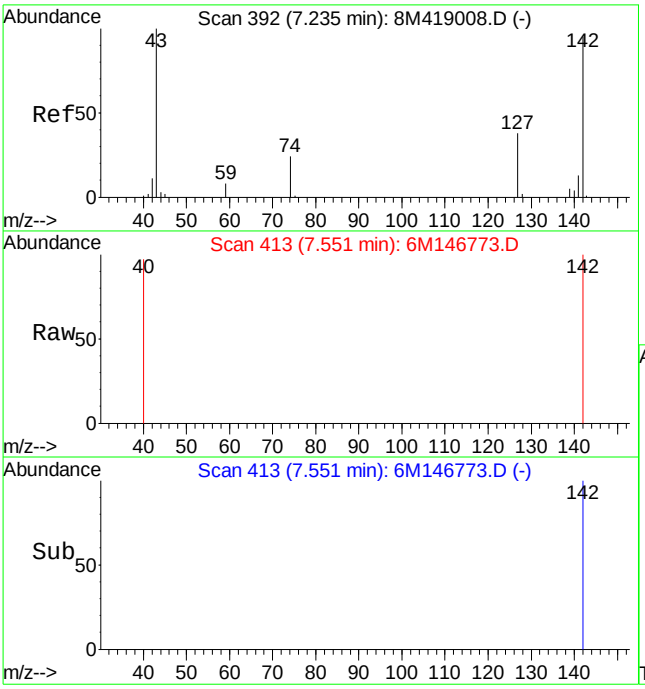


#13
Acetone
Concen: 1.61 ug/L
RT: 6.78 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 43 Resp: 2160

Ion	Ratio	Lower	Upper
43	100		
58	0.0	16.4	38.2#

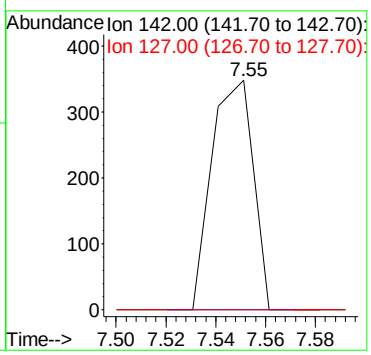


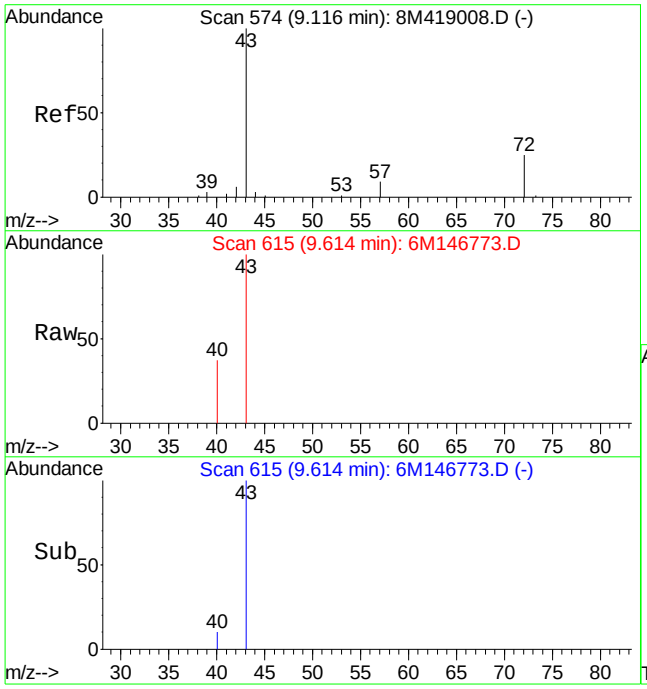


#17
Iodomethane
Concen: 0.86 ug/L
RT: 7.55 min Scan# 413
Delta R.T. 0.02 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion:142 Resp: 402

Ion	Ratio	Lower	Upper
142	100		
127	0.0	26.4	61.6#

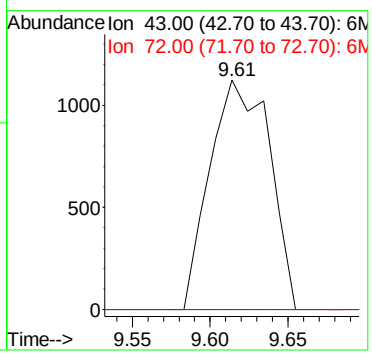


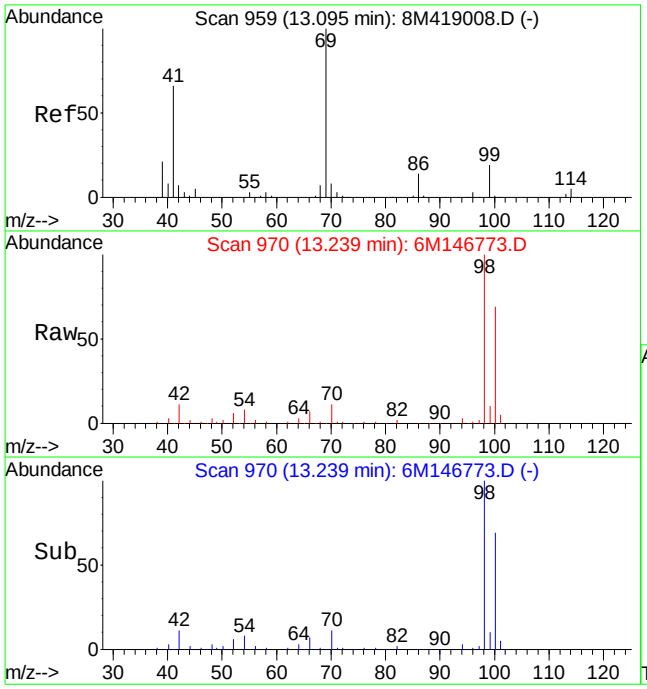


#29
2-Butanone
Concen: 1.77 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 43 Resp: 2993

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

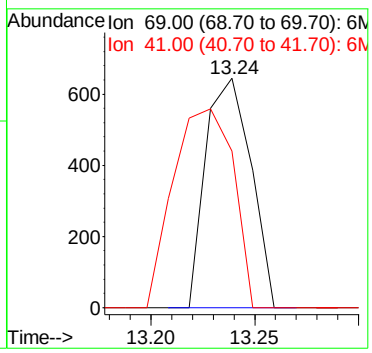




#60
Ethyl Methacrylate
Concen: 0.15 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146773.D
Acq: 27 Apr 2017 16:07

Tgt Ion: 69 Resp: 976

Ion	Ratio	Lower	Upper
69	100		
41	115.4	51.4	120.0



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	423656	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311145	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.956	65	238	0.0555	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.222%#		
47) Toluene-d8	6.815	98	3708	0.2388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.955%#		
66) p-Bromofluorobenzene	8.784	95	1270	0.2423	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.969%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	1386	0.2755	ug/L #	71
3) Chloromethane	1.215	50	1742	0.3538	ug/L	88
4) Vinyl Chloride	1.267	62	1689	0.3098	ug/L	88
5) 1,3-Butadiene	1.273	54	1144	0.3417	ug/L	97
6) Bromomethane	1.458	94	1616	0.3986	ug/L	94
7) Chloroethane	1.539	64	848	0.3278	ug/L #	77
8) Trichlorofluoromethane	1.626	101	2195	0.3138	ug/L	96
10) 1,1-Dichloroethene	1.962	61	2150	0.3285	ug/L	100
11) Carbon Disulfide	1.977	76	4627	0.3294	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	1335	0.3200	ug/L	97
13) Iodomethane	2.069	142	665	2.1023	ug/L	88
15) Methylene Chloride	2.405	84	1853	0.3732	ug/L	98
16) Acetone	2.463	43	744	0.8734	ug/L #	42
17) trans-1,2-Dichloroethene	2.544	96	1433	0.3216	ug/L	97
18) Methyl acetate	2.564	43	325	0.1455	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	3236	0.2862	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	2399	0.2998	ug/L #	88
23) cis-1,2-Dichloroethene	3.731	96	1523	0.3020	ug/L	99
24) 2,2-Dichloropropane	3.864	77	1041	0.4368	ug/L #	81
25) Cyclohexane	3.960	56	2117	0.3110	ug/L	93
26) Bromochloromethane	3.992	130	693	0.2132	ug/L	93
27) Chloroform	4.113	83	2418	0.2898	ug/L	97
28) Carbon Tetrachloride	4.252	117	1818	0.2755	ug/L #	92
30) 1,1,1-Trichloroethane	4.339	97	2183	0.2976	ug/L	95
31) 1,1-Dichloropropene	4.499	75	1767	0.3067	ug/L	94
32) 2-Butanone	4.542	43	223	0.1756	ug/L #	37
33) Benzene	4.803	78	5779	0.3202	ug/L	96
35) 1,2-Dichloroethane	5.028	62	1675	0.2981	ug/L #	83
36) Methylcyclohexane	5.422	83	2260	0.3169	ug/L	99
37) Trichloroethene	5.445	130	1637	0.3020	ug/L	99
38) Dibromomethane	5.862	93	745	0.2695	ug/L	97
39) 1,2-Dichloropropane	5.961	63	1450	0.3064	ug/L	87
40) Bromodichloromethane	6.050	83	1785	0.2826	ug/L	93
43) cis-1,3-Dichloropropene	6.647	75	1935	0.2719	ug/L	97
44) 4-Methyl-2-Pentanone	7.229	58	288	0.2449	ug/L #	23
45) trans-1,3-Dichloropropene	7.240	75	1352	0.2234	ug/L #	91
48) Toluene	6.858	91	6302	0.3231	ug/L	100
49) Tetrachloroethene	7.185	166	1930	0.3469	ug/L	91
50) 1,1,2-Trichloroethane	7.371	97	1139	0.3012	ug/L	94
51) Dibromochloromethane	7.504	129	1421	0.2753	ug/L	95
52) 1,3-Dichloropropane	7.585	76	1813	0.3017	ug/L	98
53) 1,2-Dibromoethane	7.672	107	1035	0.2672	ug/L	97
54) 2-Hexanone	7.889	43	602	0.3032	ug/L	97
55) Chlorobenzene	8.057	112	4294	0.3281	ug/L #	18
56) 1-Chlorohexane	8.068	69	297	0.2811	ug/L #	1
57) Ethylbenzene	8.095	106	2178	0.3197	ug/L	88

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

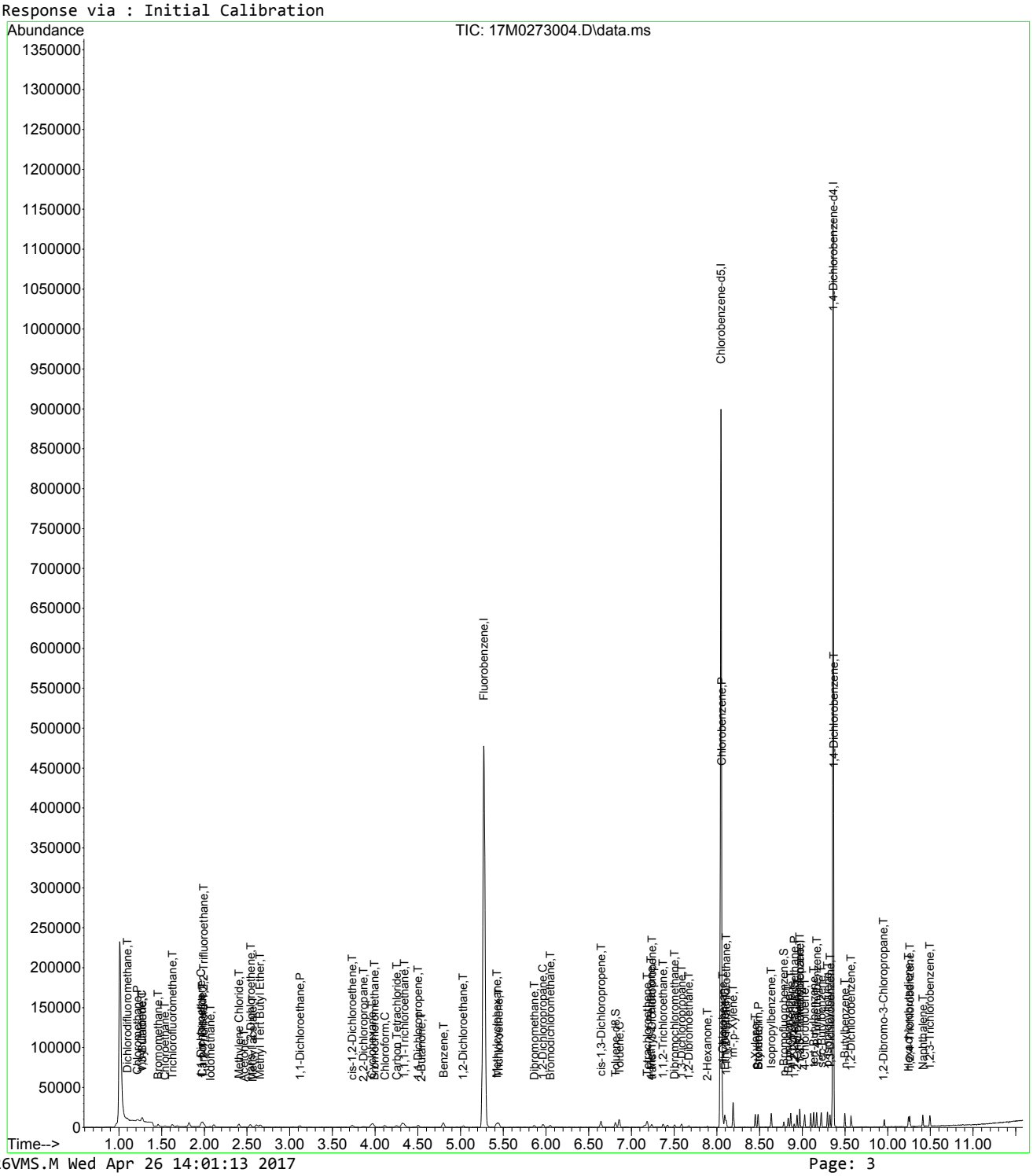
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
58) 1,1,1,2-Tetrachloroethane	8.109	131	1430	0.2807	ug/L	84
59) m-,p-Xylene	8.190	106	5242	0.6375	ug/L	99
60) o-Xylene	8.451	106	2600	0.3209	ug/L	98
61) Styrene	8.483	104	3767	0.2906	ug/L	99
62) Bromoform	8.485	173	950	0.2617	ug/L	94
63) Isopropylbenzene	8.636	105	6492	0.3096	ug/L	95
65) 1,3,5-Trimethylbenzene	8.972	105	5612	0.3216	ug/L	97
67) Bromobenzene	8.836	156	1948	0.3164	ug/L	95
68) n-Propylbenzene	8.865	91	7312	0.3164	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	1172	0.2784	ug/L	97
70) 2-Chlorotoluene	8.940	91	4467	0.3131	ug/L	97
71) 1,2,3-Trichloropropane	8.972	110	337	0.2708	ug/L	78
73) 1,2,4-Trimethylbenzene	9.169	105	5331	0.3030	ug/L	99
74) 4-Chlorotoluene	9.030	91	4520	0.3174	ug/L	99
75) tert-Butylbenzene	9.134	134	1169	0.3352	ug/L	95
76) sec-Butylbenzene	9.224	105	6865	0.3194	ug/L	99
77) p-Isopropyltoluene	9.296	119	5855	0.3195	ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	3604	0.3358	ug/L	97
79) 1,4-Dichlorobenzene	9.368	146	3693	0.3408	ug/L	89
80) n-Butylbenzene	9.499	91	5016	0.3243	ug/L	99
81) 1,2-Dichlorobenzene	9.571	146	3159	0.3020	ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	194	0.2512	ug/L	85
83) Hexachlorobutadiene	10.243	225	1532	0.3474	ug/L	94
84) 1,2,4-Trichlorobenzene	10.260	180	2401	0.3090	ug/L	96
85) Naphthalene	10.411	128	4948	0.3265	ug/L	95
86) 1,2,3-Trichlorobenzene	10.495	180	2415	0.3200	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:13 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.275	0.0	0	0.000
3	P	Chloromethane	-1.000	0.354	0.0	0	0.000
4	C	Vinyl Chloride	-1.000	0.310	0.0	0	0.000
5	T	1,3-Butadiene	-1.000	0.342	0.0	0	0.000
6	T	Bromomethane	-1.000	0.399	0.0	0	0.000
7	T	Chloroethane	-1.000	0.328	0.0	0	0.011
8	T	Trichlorofluoromethane	-1.000	0.314	0.0	0	0.011
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	-1.000	0.329	0.0	0	0.000
11	T	Carbon Disulfide	-1.000	0.329	0.0	0	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.000	0.320	0.0	0	0.000
13	T	Iodomethane	-1.000	2.102	0.0	0	0.011
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	-1.000	0.373	0.0	0	0.000
16	T	Acetone	-1.000	0.873	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	-1.000	0.322	0.0	0	0.012
18	T	Methyl acetate	-1.000	0.146	0.0	0	0.000
19	T	Methyl Tert Butyl Ether	-1.000	0.286	0.0	0	0.000
20	P	1,1-Dichloroethane	-1.000	0.300	0.0	0	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	-1.000	0.302	0.0	0	0.000
24	T	2,2-Dichloropropane	-1.000	0.437	0.0	0	0.000
25	T	Cyclohexane	-1.000	0.311	0.0	0	0.000
26	T	Bromochloromethane	-1.000	0.213	0.0	0	0.018
27	C	Chloroform	0.300	0.290	3.3#	100	0.000
28	T	Carbon Tetrachloride	-1.000	0.276	0.0	0	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	-1.000	0.298	0.0	0	0.000
31	T	1,1-Dichloropropene	-1.000	0.307	0.0	0	0.000
32	T	2-Butanone	-1.000	0.176	0.0	0	0.018
33	T	Benzene	-1.000	0.320	0.0	0	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.055	0.0	0	0.000
35	T	1,2-Dichloroethane	-1.000	0.298	0.0	0	0.000
36	T	Methylcyclohexane	0.300	0.317	-5.7	100	0.000
37	T	Trichloroethene	-1.000	0.302	0.0	0	0.000
38	T	Dibromomethane	-1.000	0.270	0.0	0	0.000
39	C	1,2-Dichloropropane	-1.000	0.306	0.0	0	0.000
40	T	Bromodichloromethane	-1.000	0.283	0.0	0	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.098	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	-1.000	0.272	0.0	0	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.245	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.223	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.239	0.0	0	0.000
48	C	Toluene	-1.000	0.323	0.0	0	0.000
49	T	Tetrachloroethene	-1.000	0.347	0.0	0	0.000
50	T	1,1,2-Trichloroethane	-1.000	0.301	0.0	0	0.000
51	T	Dibromochloromethane	-1.000	0.275	0.0	0	0.000
52	T	1,3-Dichloropropane	-1.000	0.302	0.0	0	0.000
53	T	1,2-Dibromoethane	-1.000	0.267	0.0	0	0.000
54	T	2-Hexanone	-1.000	0.303	0.0	0	0.000
55	P	Chlorobenzene	-1.000	0.328	0.0	0	0.000
56	T	1-Chlorohexane	-1.000	0.281	0.0	0	0.000
57	C	Ethylbenzene	-1.000	0.320	0.0	0	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	-1.000	0.281	0.0	0	0.000
59	T	m-,p-Xylene	-1.000	0.637	0.0	0	0.000
60	T	o-Xylene	-1.000	0.321	0.0	0	0.000
61	T	Styrene	-1.000	0.291	0.0	0	0.000
62	P	Bromoform	-1.000	0.262	0.0	0	0.000
63	T	Isopropylbenzene	-1.000	0.310	0.0	0	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	-1.000	0.322	0.0	0	0.000
66	S	p-Bromofluorobenzene	-1.000	0.242	0.0	0	0.000
67	T	Bromobenzene	0.300	0.316	-5.3	100	0.000
68	T	n-Propylbenzene	-1.000	0.316	0.0	0	0.000
69	P	1,1,2,2-Tetrachloroethane	-1.000	0.278	0.0	0	0.000
70	T	2-Chlorotoluene	-1.000	0.313	0.0	0	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.271	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.110	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	-1.000	0.303	0.0	0	0.000
74	T	4-Chlorotoluene	-1.000	0.317	0.0	0	0.000
75	T	tert-Butylbenzene	-1.000	0.335	0.0	0	0.000
76	T	sec-Butylbenzene	-1.000	0.319	0.0	0	0.000
77	T	p-Isopropyltoluene	-1.000	0.320	0.0	0	0.000
78	T	1,3-Dichlorobenzene	-1.000	0.336	0.0	0	0.000
79	T	1,4-Dichlorobenzene	0.300	0.341	-13.7	100	0.000
80	T	n-Butylbenzene	-1.000	0.324	0.0	0	0.000
81	T	1,2-Dichlorobenzene	0.300	0.302	-0.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.251	0.0	0	0.000
83	T	Hexachlorobutadiene	-1.000	0.347	0.0	0	0.000
84	T	1,2,4-Trichlorobenzene	-1.000	0.309	0.0	0	0.000
85	T	Naphthalene	-1.000	0.327	0.0	0	0.000
86	T	1,2,3-Trichlorobenzene	0.300	0.320	-6.7	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	420908	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307739	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151803	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.968	65	216	0.0507	ug/L	0.0145
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.203%#		
47) Toluene-d8	6.818	98	3149	0.2050	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.820%#		
66) p-Bromofluorobenzene	8.786	95	1018	0.2003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.801%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1833	0.3667	ug/L #	71
3) Chloromethane	1.224	50	2073	0.4237	ug/L	97
4) Vinyl Chloride	1.267	62	2251	0.4155	ug/L	86
5) 1,3-Butadiene	1.276	54	1444	0.4341	ug/L	90
6) Bromomethane	1.467	94	2073	0.5147	ug/L	98
7) Chloroethane	1.545	64	1207	0.4697	ug/L	84
8) Trichlorofluoromethane	1.632	101	3013	0.4336	ug/L	98
10) 1,1-Dichloroethene	1.968	61	2718	0.4180	ug/L	98
11) Carbon Disulfide	1.982	76	5991	0.4293	ug/L	97
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	1729	0.4171	ug/L	96
13) Iodomethane	2.066	142	736	2.1139	ug/L #	78
15) Methylene Chloride	2.411	84	2286	0.4634	ug/L	99
16) Acetone	2.463	43	807	0.9536	ug/L #	77
17) trans-1,2-Dichloroethene	2.541	96	1807	0.4082	ug/L	97
18) Methyl acetate	2.573	43	725	0.3268	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	4361	0.3882	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	3143	0.3953	ug/L	96
23) cis-1,2-Dichloroethene	3.731	96	2019	0.4029	ug/L	97
24) 2,2-Dichloropropane	3.870	77	1332	0.4838	ug/L	99
25) Cyclohexane	3.966	56	2634	0.3895	ug/L	99
26) Bromochloromethane	3.992	130	1100	0.3407	ug/L	90
27) Chloroform	4.113	83	3459	0.4172	ug/L	98
28) Carbon Tetrachloride	4.258	117	2434	0.3713	ug/L #	92
30) 1,1,1-Trichloroethane	4.351	97	2888	0.3962	ug/L	97
31) 1,1-Dichloropropene	4.507	75	2338	0.4084	ug/L	94
32) 2-Butanone	4.539	43	444	0.3519	ug/L #	37
33) Benzene	4.797	78	7693	0.4291	ug/L	98
35) 1,2-Dichloroethane	5.037	62	2311	0.4140	ug/L #	86
36) Methylcyclohexane	5.422	83	2910	0.4107	ug/L	98
37) Trichloroethene	5.454	130	2296	0.4264	ug/L	96
38) Dibromomethane	5.862	93	1026	0.3736	ug/L	94
39) 1,2-Dichloropropane	5.966	63	1791	0.3809	ug/L	98
40) Bromodichloromethane	6.053	83	2463	0.3925	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.632	63	400	0.1876	ug/L #	42
43) cis-1,3-Dichloropropene	6.650	75	2541	0.3593	ug/L	94
44) 4-Methyl-2-Pentanone	7.226	58	368	0.3150	ug/L	79
45) trans-1,3-Dichloropropene	7.237	75	1772	0.2948	ug/L	98
48) Toluene	6.858	91	8187	0.4243	ug/L	97
49) Tetrachloroethene	7.185	166	2388	0.4339	ug/L	97
50) 1,1,2-Trichloroethane	7.376	97	1530	0.4091	ug/L	98
51) Dibromochloromethane	7.507	129	2046	0.4008	ug/L	98
52) 1,3-Dichloropropane	7.588	76	2378	0.4001	ug/L	92
53) 1,2-Dibromoethane	7.672	107	1583	0.4132	ug/L	95
54) 2-Hexanone	7.892	43	744	0.3788	ug/L	96
55) Chlorobenzene	8.060	112	5389	0.4163	ug/L #	31
56) 1-Chlorohexane	8.071	69	449	0.4296	ug/L #	66

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

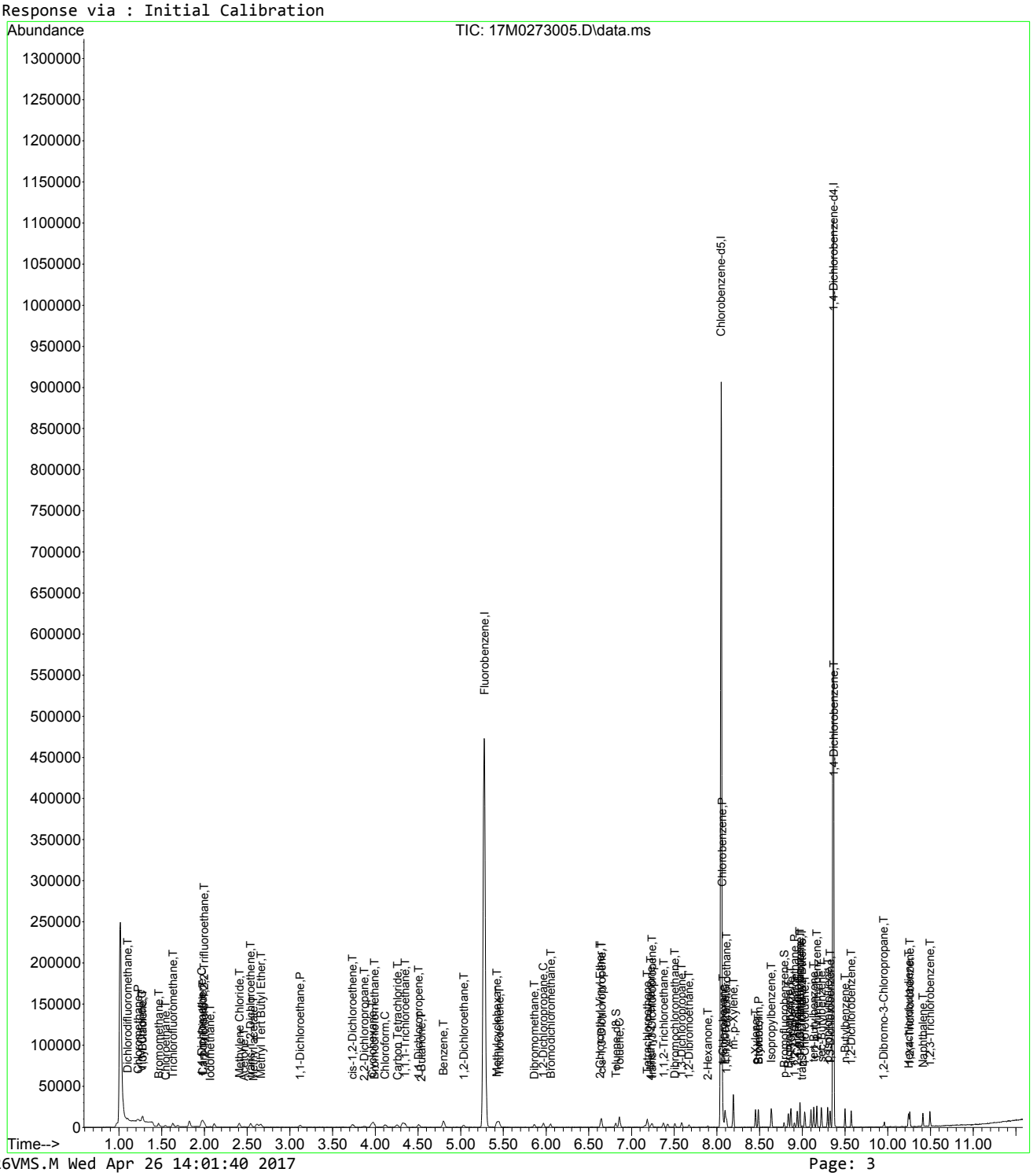
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
57) Ethylbenzene	8.094	106	2751	0.4082	ug/L		85
58) 1,1,1,2-Tetrachloroethane	8.112	131	2018	0.4004	ug/L		92
59) m-,p-Xylene	8.193	106	6639	0.8163	ug/L		98
60) o-Xylene	8.451	106	3154	0.3936	ug/L		95
61) Styrene	8.482	104	4908	0.3828	ug/L		98
62) Bromoform	8.485	173	1308	0.3643	ug/L		88
63) Isopropylbenzene	8.636	105	8520	0.4108	ug/L		99
65) 1,3,5-Trimethylbenzene	8.969	105	6976	0.4122	ug/L		97
67) Bromobenzene	8.836	156	2470	0.4136	ug/L		97
68) n-Propylbenzene	8.865	91	9526	0.4249	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	1521	0.3725	ug/L		100
70) 2-Chlorotoluene	8.940	91	5795	0.4188	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	488	0.4043	ug/L		94
72) trans-1,4-Dichloro-2-B...	8.995	53	204	0.2267	ug/L	#	80
73) 1,2,4-Trimethylbenzene	9.169	105	7147	0.4188	ug/L		97
74) 4-Chlorotoluene	9.027	91	5692	0.4121	ug/L		99
75) tert-Butylbenzene	9.131	134	1424	0.4210	ug/L		97
76) sec-Butylbenzene	9.224	105	8888	0.4263	ug/L		96
77) p-Isopropyltoluene	9.296	119	7466	0.4201	ug/L		99
78) 1,3-Dichlorobenzene	9.322	146	4514	0.4336	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	4491	0.4273	ug/L		85
80) n-Butylbenzene	9.499	91	6442	0.4295	ug/L		95
81) 1,2-Dichlorobenzene	9.571	146	4496	0.4432	ug/L		96
82) 1,2-Dibromo-3-Chloropr...	9.947	75	266	0.3551	ug/L		81
83) Hexachlorobutadiene	10.243	225	1975	0.4618	ug/L		93
84) 1,2,4-Trichlorobenzene	10.257	180	3124	0.4145	ug/L		95
85) Naphthalene	10.411	128	6130	0.4171	ug/L		98
86) 1,2,3-Trichlorobenzene	10.495	180	3077	0.4203	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:40 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.367	0.0	0	0.000
3	P	Chloromethane	-1.000	0.424	0.0	0	0.012
4	C	Vinyl Chloride	0.400	0.416	-4.0#	100	0.000
5	T	1,3-Butadiene	-1.000	0.434	0.0	0	0.000
6	T	Bromomethane	-1.000	0.515	0.0	0	0.012
7	T	Chloroethane	-1.000	0.470	0.0	0	0.017
8	T	Trichlorofluoromethane	0.400	0.434	-8.5	100	0.017
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	0.400	0.418	-4.5#	100	0.012
11	T	Carbon Disulfide	0.400	0.429	-7.2	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.400	0.417	-4.2	100	0.000
13	T	Iodomethane	-1.000	2.114	0.0	0	0.000
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	0.400	0.463	-15.8	100	0.012
16	T	Acetone	-1.000	0.954	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	0.400	0.408	-2.0	100	0.000
18	T	Methyl acetate	0.400	0.327	18.3	100	0.000
19	T	Methyl Tert Butyl Ether	0.400	0.388	3.0	100	0.015
20	P	1,1-Dichloroethane	0.400	0.395	1.3	100	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	0.400	0.403	-0.8	100	0.000
24	T	2,2-Dichloropropane	0.400	0.484	-21.0	100	0.012
25	T	Cyclohexane	0.400	0.389	2.8	100	0.000
26	T	Bromochloromethane	-1.000	0.341	0.0	0	0.018
27	C	Chloroform	0.400	0.417	-4.2#	100	0.000
28	T	Carbon Tetrachloride	0.400	0.371	7.3	100	0.012
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	0.400	0.396	1.0	100	0.000
31	T	1,1-Dichloropropene	0.400	0.408	-2.0	100	0.000
32	T	2-Butanone	-1.000	0.352	0.0	0	0.015
33	T	Benzene	0.400	0.429	-7.2	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.051	0.0	0	0.014
35	T	1,2-Dichloroethane	0.400	0.414	-3.5	100	0.000
36	T	Methylcyclohexane	0.400	0.411	-2.7	100	0.000
37	T	Trichloroethene	0.400	0.426	-6.5	100	0.000
38	T	Dibromomethane	0.400	0.374	6.5	100	0.000
39	C	1,2-Dichloropropane	0.400	0.381	4.8#	100	0.000
40	T	Bromodichloromethane	0.400	0.392	2.0	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.188	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	0.400	0.359	10.3	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.315	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.295	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.205	0.0	0	0.000
48	C	Toluene	0.400	0.424	-6.0#	100	0.000
49	T	Tetrachloroethene	0.400	0.434	-8.5	100	0.000
50	T	1,1,2-Trichloroethane	0.400	0.409	-2.2	100	0.000
51	T	Dibromochloromethane	0.400	0.401	-0.3	100	0.000
52	T	1,3-Dichloropropane	0.400	0.400	0.0	100	0.000
53	T	1,2-Dibromoethane	0.400	0.413	-3.2	100	0.000
54	T	2-Hexanone	-1.000	0.379	0.0	0	0.000
55	P	Chlorobenzene	0.400	0.416	-4.0	100	0.000
56	T	1-Chlorohexane	-1.000	0.430	0.0	0	0.000
57	C	Ethylbenzene	0.400	0.408	-2.0#	100	0.000

826VMS.M Wed Apr 26 14:01:37 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.400	0.400	0.0	100	0.000
59	T	m-,p-Xylene	0.800	0.816	-2.0	100	0.000
60	T	o-Xylene	0.400	0.394	1.5	100	0.000
61	T	Styrene	0.400	0.383	4.3	100	0.000
62	P	Bromoform	0.400	0.364	9.0	100	0.000
63	T	Isopropylbenzene	0.400	0.411	-2.7	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	0.400	0.412	-3.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.200	0.0	0	0.000
67	T	Bromobenzene	0.400	0.414	-3.5	100	0.000
68	T	n-Propylbenzene	0.400	0.425	-6.2	100	0.000
69	P	1,1,2,2-Tetrachloroethane	0.400	0.372	7.0	100	0.000
70	T	2-Chlorotoluene	0.400	0.419	-4.7	100	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.404	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.227	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	0.400	0.419	-4.7	100	0.000
74	T	4-Chlorotoluene	0.400	0.412	-3.0	100	0.000
75	T	tert-Butylbenzene	0.400	0.421	-5.2	100	0.000
76	T	sec-Butylbenzene	0.400	0.426	-6.5	100	0.000
77	T	p-Isopropyltoluene	0.400	0.420	-5.0	100	0.000
78	T	1,3-Dichlorobenzene	0.400	0.434	-8.5	100	0.000
79	T	1,4-Dichlorobenzene	0.400	0.427	-6.7	100	0.000
80	T	n-Butylbenzene	0.400	0.429	-7.2	100	0.000
81	T	1,2-Dichlorobenzene	0.400	0.443	-10.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.355	0.0	0	0.000
83	T	Hexachlorobutadiene	0.400	0.462	-15.5	100	0.000
84	T	1,2,4-Trichlorobenzene	0.400	0.415	-3.7	100	0.000
85	T	Naphthalene	0.400	0.417	-4.2	100	0.000
86	T	1,2,3-Trichlorobenzene	0.400	0.420	-5.0	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	426227	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	321768	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	162525	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.959	65	153	0.0355	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.142%#		
47) Toluene-d8	6.815	98	2654	0.1653	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.661%#		
66) p-Bromofluorobenzene	8.783	95	924	0.1698	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.679%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	4435	0.8761	ug/L	90
3) Chloromethane	1.218	50	4921	0.9933	ug/L	95
4) Vinyl Chloride	1.267	62	5224	0.9523	ug/L	100
5) 1,3-Butadiene	1.276	54	3212	0.9536	ug/L	92
6) Bromomethane	1.461	94	4459	1.0933	ug/L	94
7) Chloroethane	1.539	64	2867	1.1017	ug/L	94
8) Trichlorofluoromethane	1.626	101	7223	1.0265	ug/L	99
9) Diethyl ether	1.837	59	16707	4.9236	ug/L	98
10) 1,1-Dichloroethene	1.965	61	6575	0.9987	ug/L	99
11) Carbon Disulfide	1.976	76	13954	0.9875	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	4132	0.9844	ug/L	99
13) Iodomethane	2.060	142	2054	2.3117	ug/L	97
14) Acrolein	2.217	56	1026	2.4478	ug/L	97
15) Methylene Chloride	2.402	84	5125	1.0259	ug/L	99
16) Acetone	2.460	43	1354	1.5799	ug/L #	71
17) trans-1,2-Dichloroethene	2.538	96	4313	0.9621	ug/L	100
18) Methyl acetate	2.573	43	2105	0.9369	ug/L #	84
19) Methyl Tert Butyl Ether	2.654	73	11029	0.9694	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	7772	0.9652	ug/L	99
21) Acrylonitrile	3.187	53	2537	2.3210	ug/L	98
22) Vinyl Acetate	2.611	86	589	0.8163	ug/L	72
23) cis-1,2-Dichloroethene	3.737	96	4813	0.9485	ug/L	99
24) 2,2-Dichloropropane	3.864	77	4555	0.9837	ug/L	99
25) Cyclohexane	3.966	56	6602	0.9640	ug/L	100
26) Bromochloromethane	3.980	130	2843	0.8696	ug/L	97
27) Chloroform	4.113	83	8392	0.9997	ug/L	98
28) Carbon Tetrachloride	4.252	117	6172	0.9297	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	7196	0.9750	ug/L	99
31) 1,1-Dichloropropene	4.501	75	5583	0.9632	ug/L	97
32) 2-Butanone	4.539	43	1222	0.9564	ug/L #	37
33) Benzene	4.799	78	17817	0.9814	ug/L	99
35) 1,2-Dichloroethane	5.034	62	5412	0.9573	ug/L	96
36) Methylcyclohexane	5.422	83	7060	0.9839	ug/L	95
37) Trichloroethene	5.445	130	5322	0.9759	ug/L	97
38) Dibromomethane	5.862	93	2591	0.9318	ug/L	98
39) 1,2-Dichloropropane	5.963	63	4551	0.9559	ug/L	93
40) Bromodichloromethane	6.050	83	5958	0.9376	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	1303	0.6034	ug/L	88
43) cis-1,3-Dichloropropene	6.650	75	6508	0.9088	ug/L	98
44) 4-Methyl-2-Pentanone	7.232	58	1028	0.8690	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	5180	0.8509	ug/L	98
48) Toluene	6.858	91	19458	0.9645	ug/L	98
49) Tetrachloroethene	7.185	166	5539	0.9627	ug/L	97
50) 1,1,2-Trichloroethane	7.373	97	3713	0.9496	ug/L	99
51) Dibromochloromethane	7.507	129	4726	0.8855	ug/L	97
52) 1,3-Dichloropropane	7.588	76	5873	0.9451	ug/L	96

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

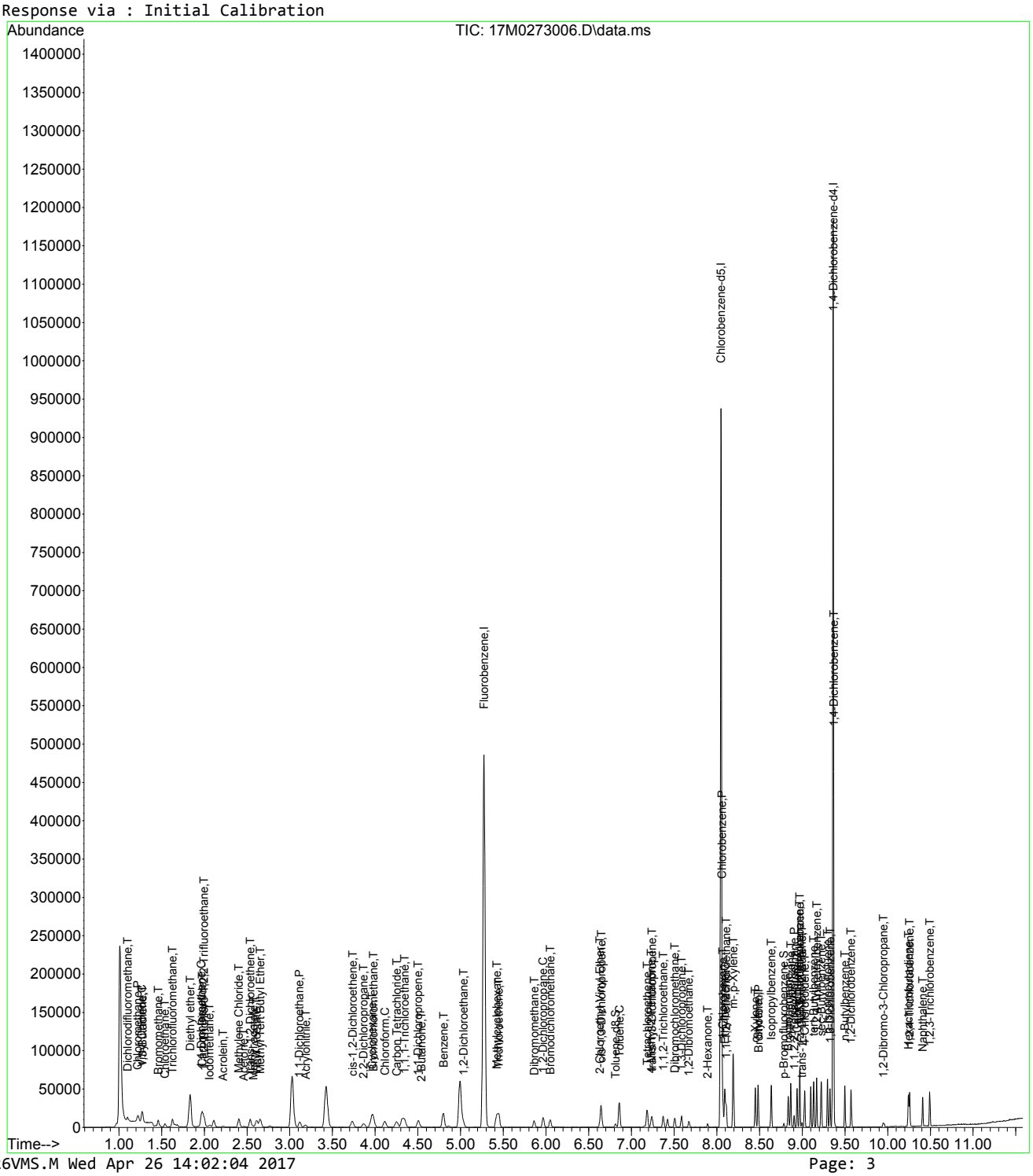
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
53) 1,2-Dibromoethane	7.672	107	3784	0.9445 ug/L	97
54) 2-Hexanone	7.892	43	1881	0.9161 ug/L	97
55) Chlorobenzene	8.060	112	13080	0.9663 ug/L	72
56) 1-Chlorohexane	8.068	69	1019	0.9324 ug/L	78
57) Ethylbenzene	8.094	106	6455	0.9161 ug/L	89
58) 1,1,1,2-Tetrachloroethane	8.109	131	4898	0.9296 ug/L	95
59) m-,p-Xylene	8.193	106	15829	1.8615 ug/L	97
60) o-Xylene	8.450	106	7831	0.9347 ug/L	97
61) Styrene	8.482	104	11851	0.8840 ug/L	99
62) Bromoform	8.488	173	3119	0.8308 ug/L	98
63) Isopropylbenzene	8.636	105	20533	0.9468 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	17243	0.9517 ug/L	98
67) Bromobenzene	8.836	156	6018	0.9413 ug/L	99
68) n-Propylbenzene	8.864	91	22729	0.9470 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	4042	0.9246 ug/L	95
70) 2-Chlorotoluene	8.940	91	14288	0.9645 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	1215	0.9401 ug/L	94
72) trans-1,4-Dichloro-2-B...	8.995	53	570	0.5916 ug/L #	89
73) 1,2,4-Trimethylbenzene	9.168	105	17160	0.9393 ug/L	98
74) 4-Chlorotoluene	9.027	91	14292	0.9664 ug/L	98
75) tert-Butylbenzene	9.134	134	3479	0.9608 ug/L	99
76) sec-Butylbenzene	9.221	105	21376	0.9577 ug/L	99
77) p-Isopropyltoluene	9.296	119	17861	0.9387 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	10532	0.9450 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	10637	0.9454 ug/L	94
80) n-Butylbenzene	9.499	91	14714	0.9162 ug/L	100
81) 1,2-Dichlorobenzene	9.571	146	10274	0.9459 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.947	75	692	0.8628 ug/L	85
83) Hexachlorobutadiene	10.243	225	4412	0.9635 ug/L	97
84) 1,2,4-Trichlorobenzene	10.257	180	7410	0.9183 ug/L	99
85) Naphthalene	10.408	128	14173	0.9007 ug/L	99
86) 1,2,3-Trichlorobenzene	10.492	180	7259	0.9262 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:04 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	1.000	0.876	12.4	100	0.000
3	P	Chloromethane	1.000	0.993	0.7	100	0.000
4	C	Vinyl Chloride	1.000	0.952	4.8#	100	0.000
5	T	1,3-Butadiene	1.000	0.954	4.6	100	0.000
6	T	Bromomethane	1.000	1.093	-9.3	100	0.000
7	T	Chloroethane	1.000	1.102	-10.2	100	0.011
8	T	Trichlorofluoromethane	1.000	1.027	-2.7	100	0.011
9	T	Diethyl ether	5.000	4.924	1.5	100	0.000
10	C	1,1-Dichloroethene	1.000	0.999	0.1#	100	0.000
11	T	Carbon Disulfide	1.000	0.988	1.2	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.000	0.984	1.6	100	0.000
13	T	Iodomethane	-1.000	2.312	0.0	0	0.000
14	T	Acrolein	2.500	2.448	2.1	100	0.000
15	T	Methylene Chloride	1.000	1.026	-2.6	100	0.000
16	T	Acetone	-1.000	1.580	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	1.000	0.962	3.8	100	0.000
18	T	Methyl acetate	1.000	0.937	6.3	100	0.000
19	T	Methyl Tert Butyl Ether	1.000	0.969	3.1	100	0.000
20	P	1,1-Dichloroethane	1.000	0.965	3.5	100	0.000
21	T	Acrylonitrile	2.500	2.321	7.2	100	0.000
22	T	Vinyl Acetate	-1.000	0.816	0.0	0	0.000
23	T	cis-1,2-Dichloroethene	1.000	0.948	5.2	100	0.000
24	T	2,2-Dichloropropane	1.000	0.984	1.6	100	0.000
25	T	Cyclohexane	1.000	0.964	3.6	100	0.000
26	T	Bromochloromethane	1.000	0.870	13.0	100	0.000
27	C	Chloroform	1.000	1.000	0.0	100	0.000
28	T	Carbon Tetrachloride	1.000	0.930	7.0	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	1.000	0.975	2.5	100	0.000
31	T	1,1-Dichloropropene	1.000	0.963	3.7	100	0.000
32	T	2-Butanone	-1.000	0.956	0.0	0	0.015
33	T	Benzene	1.000	0.981	1.9	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.035	0.0	0	0.000
35	T	1,2-Dichloroethane	1.000	0.957	4.3	100	0.000
36	T	Methylcyclohexane	1.000	0.984	1.6	100	0.000
37	T	Trichloroethene	1.000	0.976	2.4	100	0.000
38	T	Dibromomethane	1.000	0.932	6.8	100	0.000
39	C	1,2-Dichloropropane	1.000	0.956	4.4#	100	0.000
40	T	Bromodichloromethane	1.000	0.938	6.2	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.603	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	1.000	0.909	9.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.869	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	1.000	0.851	14.9	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.165	0.0	0	0.000
48	C	Toluene	1.000	0.965	3.5#	100	0.000
49	T	Tetrachloroethene	1.000	0.963	3.7	100	0.000
50	T	1,1,2-Trichloroethane	1.000	0.950	5.0	100	0.000
51	T	Dibromochloromethane	1.000	0.885	11.5	100	0.000
52	T	1,3-Dichloropropane	1.000	0.945	5.5	100	0.000
53	T	1,2-Dibromoethane	1.000	0.945	5.5	100	0.000
54	T	2-Hexanone	-1.000	0.916	0.0	0	0.000
55	P	Chlorobenzene	1.000	0.966	3.4	100	0.000
56	T	1-Chlorohexane	1.000	0.932	6.8	100	0.000
57	C	Ethylbenzene	1.000	0.916	8.4#	100	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	1.000	0.930	7.0	100	0.000
59	T	m-,p-Xylene	2.000	1.861	7.0	100	0.000
60	T	o-Xylene	1.000	0.935	6.5	100	0.000
61	T	Styrene	1.000	0.884	11.6	100	0.000
62	P	Bromoform	1.000	0.831	16.9	100	0.000
63	T	Isopropylbenzene	1.000	0.947	5.3	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	1.000	0.952	4.8	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.170	0.0	0	0.000
67	T	Bromobenzene	1.000	0.941	5.9	100	0.000
68	T	n-Propylbenzene	1.000	0.947	5.3	100	0.000
69	P	1,1,2,2-Tetrachloroethane	1.000	0.925	7.5	100	0.000
70	T	2-Chlorotoluene	1.000	0.965	3.5	100	0.000
71	T	1,2,3-Trichloropropane	1.000	0.940	6.0	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.592	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	1.000	0.939	6.1	100	0.000
74	T	4-Chlorotoluene	1.000	0.966	3.4	100	0.000
75	T	tert-Butylbenzene	1.000	0.961	3.9	100	0.000
76	T	sec-Butylbenzene	1.000	0.958	4.2	100	0.000
77	T	p-Isopropyltoluene	1.000	0.939	6.1	100	0.000
78	T	1,3-Dichlorobenzene	1.000	0.945	5.5	100	0.000
79	T	1,4-Dichlorobenzene	1.000	0.945	5.5	100	0.000
80	T	n-Butylbenzene	1.000	0.916	8.4	100	0.000
81	T	1,2-Dichlorobenzene	1.000	0.946	5.4	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	1.000	0.863	13.7	100	0.000
83	T	Hexachlorobutadiene	1.000	0.964	3.6	100	0.000
84	T	1,2,4-Trichlorobenzene	1.000	0.918	8.2	100	0.000
85	T	Naphthalene	1.000	0.901	9.9	100	0.000
86	T	1,2,3-Trichlorobenzene	1.000	0.926	7.4	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 5

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	419250	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	301521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148386	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.973	65	410	0.0966	ug/L	0.0203
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.386%#		
47) Toluene-d8	6.812	98	2299	0.1528	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.611%#		
66) p-Bromofluorobenzene	8.786	95	744	0.1497	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.599%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	8266	1.6601	ug/L	96
3) Chloromethane	1.224	50	9490	1.9475	ug/L	97
4) Vinyl Chloride	1.264	62	9802	1.8166	ug/L	100
5) 1,3-Butadiene	1.276	54	6439	1.9436	ug/L	97
6) Bromomethane	1.461	94	8818	2.1981	ug/L	97
7) Chloroethane	1.539	64	5382	2.1025	ug/L	99
8) Trichlorofluoromethane	1.626	101	13476	1.9470	ug/L	99
9) Diethyl ether	1.841	59	82987	24.8636	ug/L	99
10) 1,1-Dichloroethene	1.965	61	12193	1.8828	ug/L	100
11) Carbon Disulfide	1.979	76	25350	1.8238	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	7533	1.8245	ug/L	100
13) Iodomethane	2.066	142	4068	2.6265	ug/L	98
14) Acrolein	2.223	56	4766	11.5599	ug/L	98
15) Methylene Chloride	2.408	84	9550	1.9434	ug/L	98
16) Acetone	2.469	43	2137	2.5351	ug/L	88
17) trans-1,2-Dichloroethene	2.541	96	8550	1.9390	ug/L	99
18) Methyl acetate	2.576	43	3864	1.7485	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	21515	1.9226	ug/L #	100
20) 1,1-Dichloroethane	3.123	63	15207	1.9201	ug/L	98
21) Acrylonitrile	3.184	53	13059	12.1457	ug/L	100
22) Vinyl Acetate	2.619	86	1095	1.5429	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	9709	1.9452	ug/L	99
24) 2,2-Dichloropropane	3.870	77	9712	1.8129	ug/L	95
25) Cyclohexane	3.966	56	12484	1.8532	ug/L	98
26) Bromochloromethane	3.992	130	5989	1.8623	ug/L	99
27) Chloroform	4.113	83	16510	1.9994	ug/L	99
28) Carbon Tetrachloride	4.255	117	12159	1.8621	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	13879	1.9117	ug/L	99
31) 1,1-Dichloropropene	4.507	75	10473	1.8369	ug/L	98
32) 2-Butanone	4.536	43	2256	1.7951	ug/L #	64
33) Benzene	4.800	78	34359	1.9240	ug/L	100
35) 1,2-Dichloroethane	5.037	62	10797	1.9417	ug/L	99
36) Methylcyclohexane	5.425	83	12634	1.7900	ug/L	99
37) Trichloroethene	5.448	130	10311	1.9223	ug/L	99
38) Dibromomethane	5.859	93	5276	1.9290	ug/L	97
39) 1,2-Dichloropropane	5.966	63	9039	1.9301	ug/L	97
40) Bromodichloromethane	6.053	83	12025	1.9238	ug/L	96
41) 1,4-Dioxane	6.265	88	961	41.1985	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.627	63	2988	1.4066	ug/L	98
43) cis-1,3-Dichloropropene	6.647	75	13096	1.8592	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	2026	1.7412	ug/L	95
45) trans-1,3-Dichloropropene	7.243	75	10805	1.8044	ug/L	100
48) Toluene	6.858	91	37329	1.9747	ug/L	100
49) Tetrachloroethene	7.185	166	10472	1.9422	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	7445	2.0319	ug/L	99
51) Dibromochloromethane	7.510	129	9685	1.9365	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

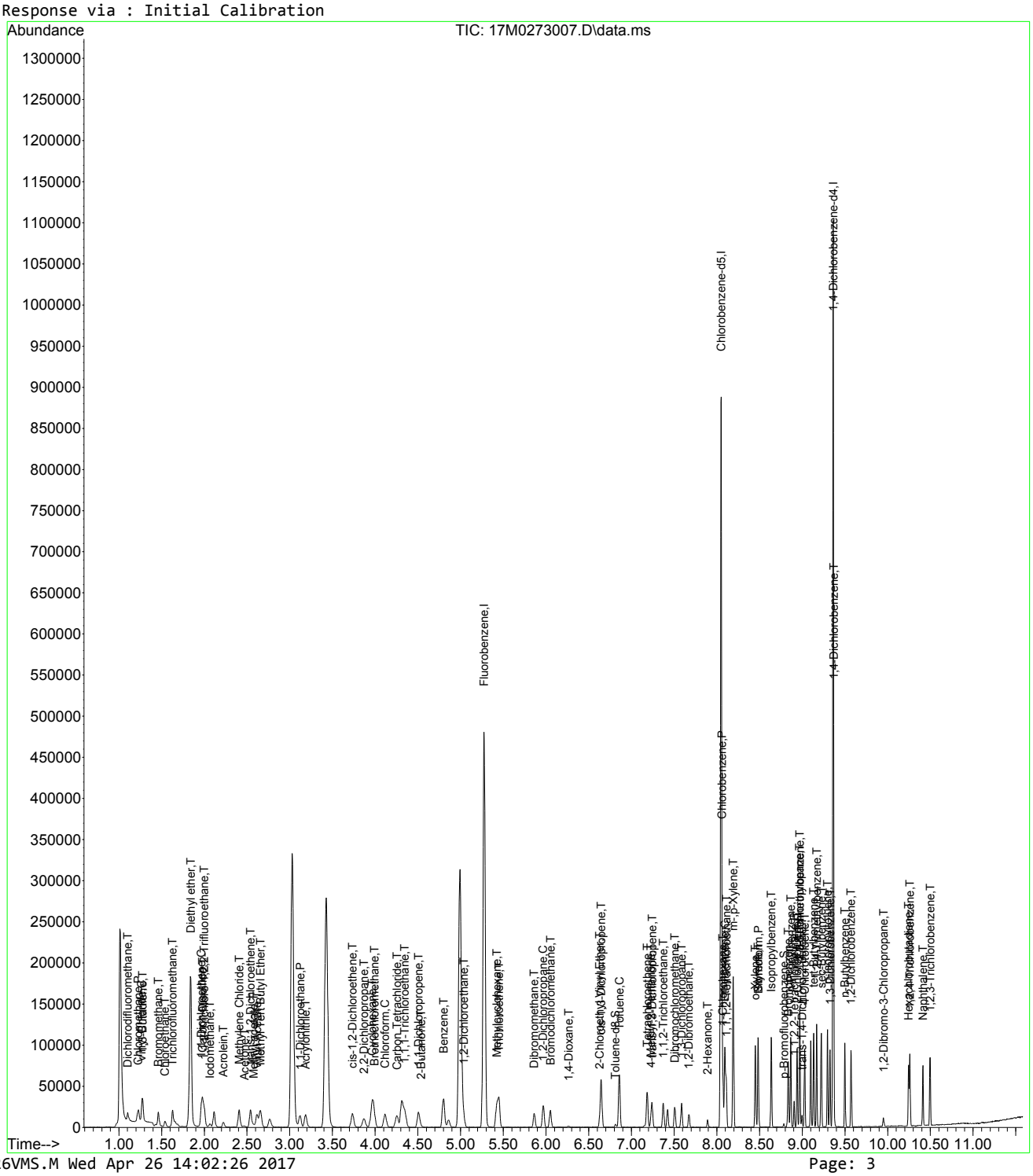
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	11727	2.0138 ug/L	98
53) 1,2-Dibromoethane	7.672	107	7414	1.9749 ug/L	100
54) 2-Hexanone	7.892	43	3567	1.8538 ug/L	100
55) Chlorobenzene	8.060	112	24892	1.9625 ug/L	85
56) 1-Chlorohexane	8.071	69	1995	1.9481 ug/L #	85
57) Ethylbenzene	8.094	106	13014	1.9710 ug/L	98
58) 1,1,1,2-Tetrachloroethane	8.112	131	9923	2.0097 ug/L	100
59) m-,p-Xylene	8.193	106	30447	3.8209 ug/L	97
60) o-Xylene	8.451	106	15486	1.9724 ug/L	100
61) Styrene	8.482	104	23501	1.8707 ug/L	99
62) Bromoform	8.485	173	6423	1.8257 ug/L	100
63) Isopropylbenzene	8.636	105	38809	1.9097 ug/L	99
65) 1,3,5-Trimethylbenzene	8.972	105	32427	1.9603 ug/L	99
67) Bromobenzene	8.836	156	11776	2.0175 ug/L	100
68) n-Propylbenzene	8.865	91	42908	1.9582 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	7761	1.9444 ug/L	99
70) 2-Chlorotoluene	8.940	91	27206	2.0115 ug/L	98
71) 1,2,3-Trichloropropane	8.969	110	2495	2.1145 ug/L	96
72) trans-1,4-Dichloro-2-B...	8.998	53	1392	1.5825 ug/L #	91
73) 1,2,4-Trimethylbenzene	9.169	105	33214	1.9912 ug/L	100
74) 4-Chlorotoluene	9.027	91	26984	1.9984 ug/L	98
75) tert-Butylbenzene	9.134	134	6697	2.0257 ug/L	99
76) sec-Butylbenzene	9.224	105	40402	1.9825 ug/L	99
77) p-Isopropyltoluene	9.296	119	33833	1.9475 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	20210	1.9861 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	20145	1.9610 ug/L	98
80) n-Butylbenzene	9.499	91	26982	1.8402 ug/L	98
81) 1,2-Dichlorobenzene	9.571	146	19850	2.0016 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	1468	2.0048 ug/L	87
83) Hexachlorobutadiene	10.243	225	7947	1.9009 ug/L	99
84) 1,2,4-Trichlorobenzene	10.260	180	13652	1.8531 ug/L	97
85) Naphthalene	10.414	128	27628	1.9232 ug/L	99
86) 1,2,3-Trichlorobenzene	10.498	180	13906	1.9433 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:26 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	2.000	1.660	17.0	100	0.000
3	P	Chloromethane	2.000	1.948	2.6	100	0.012
4	C	Vinyl Chloride	2.000	1.817	9.2#	100	0.000
5	T	1,3-Butadiene	2.000	1.944	2.8	100	0.000
6	T	Bromomethane	2.000	2.198	-9.9	100	0.000
7	T	Chloroethane	2.000	2.103	-5.2	100	0.011
8	T	Trichlorofluoromethane	2.000	1.947	2.6	100	0.011
9	T	Diethyl ether	25.000	24.864	0.5	100	0.000
10	C	1,1-Dichloroethene	2.000	1.883	5.8#	100	0.000
11	T	Carbon Disulfide	2.000	1.824	8.8	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.000	1.825	8.8	100	0.000
13	T	Iodomethane	2.000	2.626	-31.3#	100	0.000
14	T	Acrolein	12.500	11.560	7.5	100	0.000
15	T	Methylene Chloride	2.000	1.943	2.8	100	0.000
16	T	Acetone	-1.000	2.535	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	2.000	1.939	3.0	100	0.000
18	T	Methyl acetate	2.000	1.748	12.6	100	0.000
19	T	Methyl Tert Butyl Ether	2.000	1.923	3.8	100	0.000
20	P	1,1-Dichloroethane	2.000	1.920	4.0	100	0.012
21	T	Acrylonitrile	12.500	12.146	2.8	100	0.000
22	T	Vinyl Acetate	-1.000	1.543	0.0	0	0.011
23	T	cis-1,2-Dichloroethene	2.000	1.945	2.7	100	0.000
24	T	2,2-Dichloropropane	2.000	1.813	9.4	100	0.012
25	T	Cyclohexane	2.000	1.853	7.4	100	0.000
26	T	Bromochloromethane	2.000	1.862	6.9	100	0.018
27	C	Chloroform	2.000	1.999	0.0#	100	0.000
28	T	Carbon Tetrachloride	2.000	1.862	6.9	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	2.000	1.912	4.4	100	0.000
31	T	1,1-Dichloropropene	2.000	1.837	8.2	100	0.000
32	T	2-Butanone	-1.000	1.795	0.0	0	0.012
33	T	Benzene	2.000	1.924	3.8	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.097	0.0	0	0.020
35	T	1,2-Dichloroethane	2.000	1.942	2.9	100	0.000
36	T	Methylcyclohexane	2.000	1.790	10.5	100	0.000
37	T	Trichloroethene	2.000	1.922	3.9	100	0.000
38	T	Dibromomethane	2.000	1.929	3.5	100	0.000
39	C	1,2-Dichloropropane	2.000	1.930	3.5#	100	0.000
40	T	Bromodichloromethane	2.000	1.924	3.8	100	0.000
41	T	1,4-Dioxane	50.000	41.198	17.6	100	0.000
42	T	2-Chloroethyl Vinyl Ether	-1.000	1.407	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	2.000	1.859	7.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	1.741	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	2.000	1.804	9.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.153	0.0	0	0.000
48	C	Toluene	2.000	1.975	1.2#	100	0.000
49	T	Tetrachloroethene	2.000	1.942	2.9	100	0.000
50	T	1,1,2-Trichloroethane	2.000	2.032	-1.6	100	0.000
51	T	Dibromochloromethane	2.000	1.936	3.2	100	0.000
52	T	1,3-Dichloropropane	2.000	2.014	-0.7	100	0.000
53	T	1,2-Dibromoethane	2.000	1.975	1.2	100	0.000
54	T	2-Hexanone	2.000	1.854	7.3	100	0.000
55	P	Chlorobenzene	2.000	1.962	1.9	100	0.000
56	T	1-Chlorohexane	2.000	1.948	2.6	100	0.000
57	C	Ethylbenzene	2.000	1.971	1.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	2.000	2.010	-0.5	100	0.000
59	T	m-,p-Xylene	4.000	3.821	4.5	100	0.000
60	T	o-Xylene	2.000	1.972	1.4	100	0.000
61	T	Styrene	2.000	1.871	6.5	100	0.000
62	P	Bromoform	2.000	1.826	8.7	100	0.000
63	T	Isopropylbenzene	2.000	1.910	4.5	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	2.000	1.960	2.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.150	0.0	0	0.000
67	T	Bromobenzene	2.000	2.018	-0.9	100	0.000
68	T	n-Propylbenzene	2.000	1.958	2.1	100	0.000
69	P	1,1,2,2-Tetrachloroethane	2.000	1.944	2.8	100	0.000
70	T	2-Chlorotoluene	2.000	2.012	-0.6	100	0.000
71	T	1,2,3-Trichloropropane	2.000	2.114	-5.7	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	2.000	1.583	20.9	100	0.000
73	T	1,2,4-Trimethylbenzene	2.000	1.991	0.4	100	0.000
74	T	4-Chlorotoluene	2.000	1.998	0.1	100	0.000
75	T	tert-Butylbenzene	2.000	2.026	-1.3	100	0.000
76	T	sec-Butylbenzene	2.000	1.983	0.8	100	0.000
77	T	p-Isopropyltoluene	2.000	1.948	2.6	100	0.000
78	T	1,3-Dichlorobenzene	2.000	1.986	0.7	100	0.000
79	T	1,4-Dichlorobenzene	2.000	1.961	1.9	100	0.000
80	T	n-Butylbenzene	2.000	1.840	8.0	100	0.000
81	T	1,2-Dichlorobenzene	2.000	2.002	-0.1	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	2.000	2.005	-0.2	100	0.000
83	T	Hexachlorobutadiene	2.000	1.901	4.9	100	0.000
84	T	1,2,4-Trichlorobenzene	2.000	1.853	7.4	100	0.000
85	T	Naphthalene	2.000	1.923	3.8	100	0.000
86	T	1,2,3-Trichlorobenzene	2.000	1.943	2.8	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	431262	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	319022	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	163434	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.351	111	23759	5.1012 ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.405%#		
34) 1,2-Dichloroethane-d4	4.964	65	23294	5.3358 ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.343%#		
47) Toluene-d8	6.815	98	82876	5.2054 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 20.822%#		
66) p-Bromofluorobenzene	8.783	95	24857	4.5424 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 18.170%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	1.108	85	23001	4.4908 ug/L	99
3) Chloromethane	1.224	50	24053	4.7986 ug/L	98
4) Vinyl Chloride	1.270	62	26844	4.8364 ug/L	100
5) 1,3-Butadiene	1.282	54	17084	5.0131 ug/L	98
6) Bromomethane	1.464	94	22223	5.3853 ug/L	99
7) Chloroethane	1.539	64	14714	5.5881 ug/L	93
8) Trichlorofluoromethane	1.632	101	37891	5.3221 ug/L	99
9) Diethyl ether	1.843	59	169782	49.4513 ug/L	100
10) 1,1-Dichloroethene	1.971	61	33029	4.9581 ug/L	100
11) Carbon Disulfide	1.982	76	71308	4.9874 ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	21872	5.1500 ug/L	100
13) Iodomethane	2.069	142	16154	4.4150 ug/L	99
14) Acrolein	2.225	56	10883	25.6613 ug/L	100
15) Methylene Chloride	2.411	84	25075	4.9606 ug/L	100
16) Acetone	2.469	43	5224	6.0246 ug/L	95
17) trans-1,2-Dichloroethene	2.544	96	22591	4.9805 ug/L	99
18) Methyl acetate	2.576	43	11275	4.9598 ug/L #	97
19) Methyl Tert Butyl Ether	2.660	73	58542	5.0855 ug/L #	100
20) 1,1-Dichloroethane	3.120	63	41374	5.0784 ug/L	99
21) Acrylonitrile	3.190	53	27474	24.8409 ug/L	97
22) Vinyl Acetate	2.616	86	3460	4.7395 ug/L #	45
23) cis-1,2-Dichloroethene	3.740	96	26009	5.0656 ug/L	98
24) 2,2-Dichloropropane	3.870	77	28316	4.6367 ug/L	100
25) Cyclohexane	3.971	56	35009	5.0522 ug/L	99
26) Bromochloromethane	3.986	130	16786	5.0742 ug/L	98
27) Chloroform	4.116	83	43019	5.0646 ug/L	99
28) Carbon Tetrachloride	4.255	117	34147	5.0837 ug/L	98
30) 1,1,1-Trichloroethane	4.351	97	37529	5.0254 ug/L	99
31) 1,1-Dichloropropene	4.510	75	28981	4.9414 ug/L	98
32) 2-Butanone	4.539	43	6581	5.0907 ug/L #	96
33) Benzene	4.799	78	91557	4.9841 ug/L	100
35) 1,2-Dichloroethane	5.037	62	29435	5.1460 ug/L	99
36) Methylcyclohexane	5.428	83	36223	4.9893 ug/L	99
37) Trichloroethene	5.451	130	27251	4.9389 ug/L	99
38) Dibromomethane	5.862	93	14614	5.1942 ug/L	98
39) 1,2-Dichloropropane	5.969	63	24584	5.1032 ug/L	99
40) Bromodichloromethane	6.053	83	32146	4.9995 ug/L	100
41) 1,4-Dioxane	6.262	88	2257	94.0635 ug/L	90
42) 2-Chloroethyl Vinyl Ether	6.629	63	9083	4.1568 ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	36540	5.0431 ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	5813	4.8566 ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	31049	5.0407 ug/L	100
48) Toluene	6.858	91	101530	5.0762 ug/L	99
49) Tetrachloroethene	7.185	166	29104	5.1017 ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	20117	5.1891 ug/L	99
51) Dibromochloromethane	7.509	129	26886	5.0809 ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

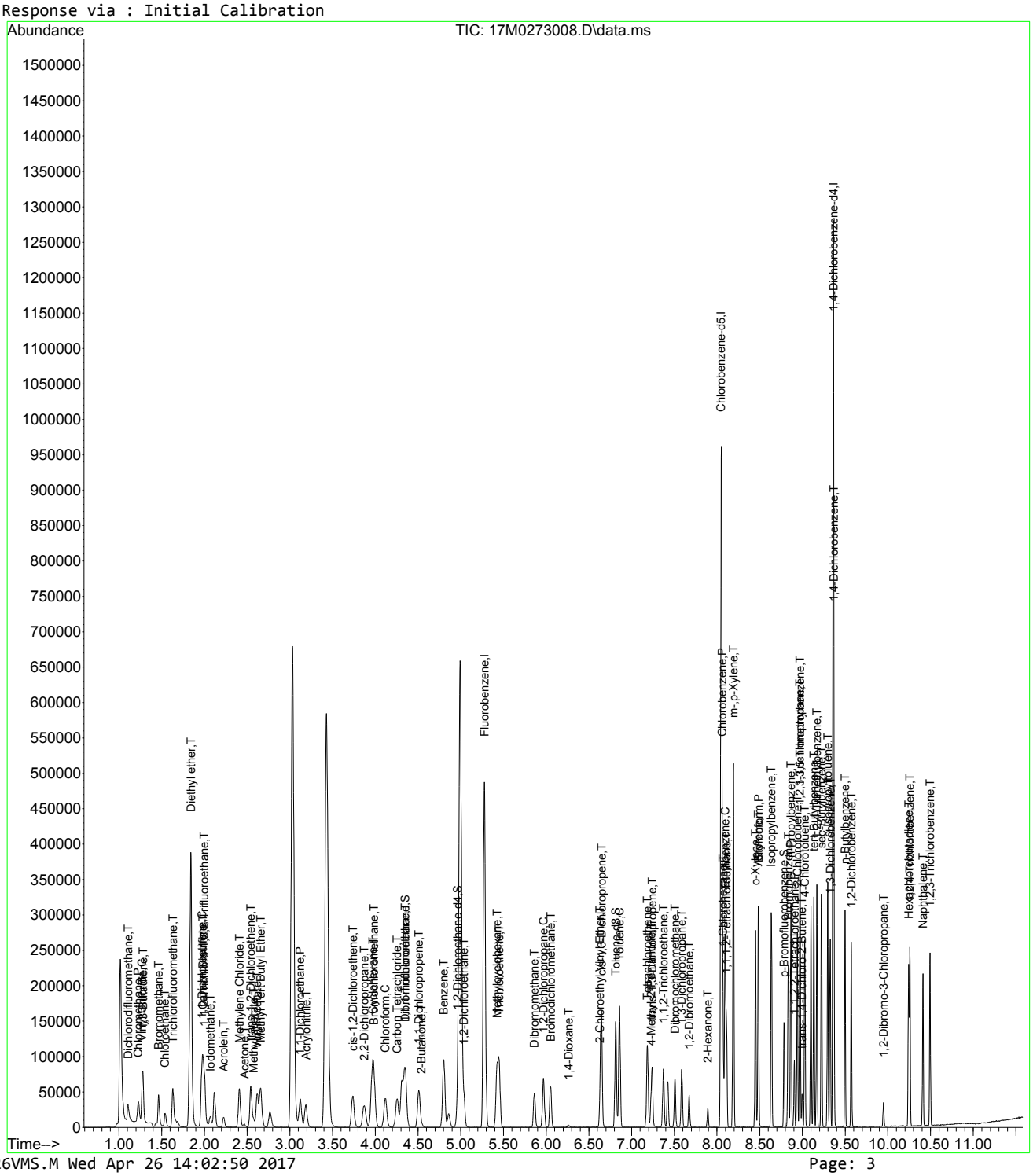
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	31843	5.1682	ug/L		98
53) 1,2-Dibromoethane	7.674	107	20257	5.1000	ug/L		99
54) 2-Hexanone	7.892	43	10630	5.2214	ug/L		100
55) Chlorobenzene	8.060	112	67203	5.0076	ug/L		93
56) 1-Chlorohexane	8.071	69	5432	5.0134	ug/L		83
57) Ethylbenzene	8.094	106	35155	5.0323	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	26571	5.0862	ug/L		99
59) m-,p-Xylene	8.193	106	85229	10.1090	ug/L		97
60) o-Xylene	8.450	106	41928	5.0473	ug/L		97
61) Styrene	8.482	104	66320	4.9896	ug/L		100
62) Bromoform	8.485	173	18946	5.0897	ug/L		99
63) Isopropylbenzene	8.636	105	109791	5.1061	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	93688	5.1422	ug/L		99
67) Bromobenzene	8.835	156	32100	4.9931	ug/L		99
68) n-Propylbenzene	8.864	91	123890	5.1333	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	23301	5.3002	ug/L		100
70) 2-Chlorotoluene	8.940	91	75963	5.0993	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	6702	5.1569	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	4475	4.6190	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.168	105	94879	5.1644	ug/L		99
74) 4-Chlorotoluene	9.029	91	75469	5.0745	ug/L		99
75) tert-Butylbenzene	9.134	134	18683	5.1309	ug/L		99
76) sec-Butylbenzene	9.223	105	116472	5.1891	ug/L		99
77) p-Isopropyltoluene	9.296	119	98419	5.1437	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	56651	5.0548	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	56423	4.9866	ug/L		99
80) n-Butylbenzene	9.499	91	82542	5.1112	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	55072	5.0420	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	4044	5.0142	ug/L		98
83) Hexachlorobutadiene	10.243	225	23413	5.0847	ug/L		99
84) 1,2,4-Trichlorobenzene	10.257	180	40601	5.0037	ug/L		100
85) Naphthalene	10.411	128	82078	5.1873	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	39894	5.0617	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:50 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	5.000	4.491	10.2	100	0.012
3	P	Chloromethane	5.000	4.799	4.0	100	0.012
4	C	Vinyl Chloride	5.000	4.836	3.3#	100	0.000
5	T	1,3-Butadiene	5.000	5.013	-0.3	100	0.012
6	T	Bromomethane	5.000	5.385	-7.7	100	0.000
7	T	Chloroethane	5.000	5.588	-11.8	100	0.011
8	T	Trichlorofluoromethane	5.000	5.322	-6.4	100	0.017
9	T	Diethyl ether	50.000	49.451	1.1	100	0.000
10	C	1,1-Dichloroethene	5.000	4.958	0.8#	100	0.015
11	T	Carbon Disulfide	5.000	4.987	0.3	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.000	5.150	-3.0	100	0.012
13	T	Iodomethane	5.000	4.415	11.7	100	0.011
14	T	Acrolein	25.000	25.661	-2.6	100	0.000
15	T	Methylene Chloride	5.000	4.961	0.8	100	0.012
16	T	Acetone	5.000	6.025	-20.5	100	0.000
17	T	trans-1,2-Dichloroethene	5.000	4.980	0.4	100	0.012
18	T	Methyl acetate	5.000	4.960	0.8	100	0.000
19	T	Methyl Tert Butyl Ether	5.000	5.086	-1.7	100	0.012
20	P	1,1-Dichloroethane	5.000	5.078	-1.6	100	0.000
21	T	Acrylonitrile	25.000	24.841	0.6	100	0.000
22	T	Vinyl Acetate	5.000	4.740	5.2	100	0.000
23	T	cis-1,2-Dichloroethene	5.000	5.066	-1.3	100	0.012
24	T	2,2-Dichloropropane	5.000	4.637	7.3	100	0.012
25	T	Cyclohexane	5.000	5.052	-1.0	100	0.000
26	T	Bromochloromethane	5.000	5.074	-1.5	100	0.012
27	C	Chloroform	5.000	5.065	-1.3#	100	0.000
28	T	Carbon Tetrachloride	5.000	5.084	-1.7	100	0.000
29	S	Dibromofluoromethane	5.000	5.101	-2.0	100	0.012
30	T	1,1,1-Trichloroethane	5.000	5.025	-0.5	100	0.000
31	T	1,1-Dichloropropene	5.000	4.941	1.2	100	0.000
32	T	2-Butanone	5.000	5.091	-1.8	100	0.015
33	T	Benzene	5.000	4.984	0.3	100	0.000
34	S	1,2-Dichloroethane-d4	5.000	5.336	-6.7	100	0.011
35	T	1,2-Dichloroethane	5.000	5.146	-2.9	100	0.000
36	T	Methylcyclohexane	5.000	4.989	0.2	100	0.000
37	T	Trichloroethene	5.000	4.939	1.2	100	0.000
38	T	Dibromomethane	5.000	5.194	-3.9	100	0.000
39	C	1,2-Dichloropropane	5.000	5.103	-2.1#	100	0.000
40	T	Bromodichloromethane	5.000	5.000	0.0	100	0.000
41	T	1,4-Dioxane	100.000	94.064	5.9	100	0.000
42	T	2-Chloroethyl Vinyl Ether	5.000	4.157	16.9	100	0.000
43	T	cis-1,3-Dichloropropene	5.000	5.043	-0.9	100	0.000
44	T	4-Methyl-2-Pentanone	5.000	4.857	2.9	100	0.000
45	T	trans-1,3-Dichloropropene	5.000	5.041	-0.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	5.000	5.205	-4.1	100	0.000
48	C	Toluene	5.000	5.076	-1.5#	100	0.000
49	T	Tetrachloroethene	5.000	5.102	-2.0	100	0.000
50	T	1,1,2-Trichloroethane	5.000	5.189	-3.8	100	0.000
51	T	Dibromochloromethane	5.000	5.081	-1.6	100	0.000
52	T	1,3-Dichloropropane	5.000	5.168	-3.4	100	0.000
53	T	1,2-Dibromoethane	5.000	5.100	-2.0	100	0.000
54	T	2-Hexanone	5.000	5.221	-4.4	100	0.000
55	P	Chlorobenzene	5.000	5.008	-0.2	100	0.000
56	T	1-Chlorohexane	5.000	5.013	-0.3	100	0.000
57	C	Ethylbenzene	5.000	5.032	-0.6#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	5.000	5.086	-1.7	100	0.000
59	T	m-,p-Xylene	10.000	10.109	-1.1	100	0.000
60	T	o-Xylene	5.000	5.047	-0.9	100	0.000
61	T	Styrene	5.000	4.990	0.2	100	0.000
62	P	Bromoform	5.000	5.090	-1.8	100	0.000
63	T	Isopropylbenzene	5.000	5.106	-2.1	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	5.000	5.142	-2.8	100	0.000
66	S	p-Bromofluorobenzene	5.000	4.542	9.2	100	0.000
67	T	Bromobenzene	5.000	4.993	0.1	100	0.000
68	T	n-Propylbenzene	5.000	5.133	-2.7	100	0.000
69	P	1,1,2,2-Tetrachloroethane	5.000	5.300	-6.0	100	0.000
70	T	2-Chlorotoluene	5.000	5.099	-2.0	100	0.000
71	T	1,2,3-Trichloropropane	5.000	5.157	-3.1	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	5.000	4.619	7.6	100	0.000
73	T	1,2,4-Trimethylbenzene	5.000	5.164	-3.3	100	0.000
74	T	4-Chlorotoluene	5.000	5.075	-1.5	100	0.000
75	T	tert-Butylbenzene	5.000	5.131	-2.6	100	0.000
76	T	sec-Butylbenzene	5.000	5.189	-3.8	100	0.000
77	T	p-Isopropyltoluene	5.000	5.144	-2.9	100	0.000
78	T	1,3-Dichlorobenzene	5.000	5.055	-1.1	100	0.000
79	T	1,4-Dichlorobenzene	5.000	4.987	0.3	100	0.000
80	T	n-Butylbenzene	5.000	5.111	-2.2	100	0.000
81	T	1,2-Dichlorobenzene	5.000	5.042	-0.8	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	5.000	5.014	-0.3	100	0.000
83	T	Hexachlorobutadiene	5.000	5.085	-1.7	100	0.000
84	T	1,2,4-Trichlorobenzene	5.000	5.004	-0.1	100	0.000
85	T	Naphthalene	5.000	5.187	-3.7	100	0.000
86	T	1,2,3-Trichlorobenzene	5.000	5.062	-1.2	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	415989	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.048	117	308316	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	155966	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.342	111	41370	9.2085	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.834%#				
34) 1,2-Dichloroethane-d4	4.956	65	39416	9.3603	ug/L		0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.441%#				
47) Toluene-d8	6.815	98	144252	9.3749	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 37.500%#				
66) p-Bromofluorobenzene	8.784	95	48881	9.3603	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 37.441%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.102	85	107073	21.6728	ug/L		100
3) Chloromethane	1.218	50	97047	20.0719	ug/L		100
4) Vinyl Chloride	1.264	62	110236	20.5901	ug/L		99
5) 1,3-Butadiene	1.276	54	65854	20.0334	ug/L		99
6) Bromomethane	1.458	94	79989	20.0955	ug/L		100
7) Chloroethane	1.534	64	58403	22.9945	ug/L		100
8) Trichlorofluoromethane	1.626	101	147654	21.5007	ug/L		99
9) Diethyl ether	1.838	59	271363	81.9400	ug/L		100
10) 1,1-Dichloroethene	1.962	61	129870	20.2111	ug/L		100
11) Carbon Disulfide	1.977	76	273076	19.8007	ug/L		100
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	82665	20.1789	ug/L		100
13) Iodomethane	2.063	142	90634	16.0415	ug/L		99
14) Acrolein	2.220	56	16470	40.2609	ug/L		100
15) Methylene Chloride	2.405	84	94958	19.4753	ug/L		99
16) Acetone	2.463	43	17323	20.7112	ug/L		97
17) trans-1,2-Dichloroethene	2.538	96	87762	20.0586	ug/L		99
18) Methyl acetate	2.573	43	47763	21.7821	ug/L	#	98
19) Methyl Tert Butyl Ether	2.654	73	223741	20.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	159579	20.3066	ug/L		99
21) Acrylonitrile	3.181	53	43518	40.7919	ug/L		100
22) Vinyl Acetate	2.616	86	13399	19.0279	ug/L		87
23) cis-1,2-Dichloroethene	3.731	96	98926	19.9747	ug/L		100
24) 2,2-Dichloropropane	3.867	77	117122	18.9833	ug/L		98
25) Cyclohexane	3.966	56	132299	19.7932	ug/L		99
26) Bromochloromethane	3.983	130	65363	20.4839	ug/L		100
27) Chloroform	4.116	83	162820	19.8724	ug/L		100
28) Carbon Tetrachloride	4.255	117	133209	20.5600	ug/L		100
30) 1,1,1-Trichloroethane	4.348	97	146436	20.3288	ug/L		100
31) 1,1-Dichloropropene	4.504	75	113299	20.0273	ug/L		99
32) 2-Butanone	4.530	43	23212	18.6149	ug/L		97
33) Benzene	4.800	78	350607	19.7868	ug/L		100
35) 1,2-Dichloroethane	5.031	62	110449	20.0184	ug/L		100
36) Methylcyclohexane	5.422	83	133533	19.0679	ug/L		100
37) Trichloroethene	5.448	130	105023	19.7330	ug/L		100
38) Dibromomethane	5.859	93	54492	20.0791	ug/L		100
39) 1,2-Dichloropropane	5.966	63	93539	20.1299	ug/L		100
40) Bromodichloromethane	6.050	83	125080	20.1673	ug/L		99
41) 1,4-Dioxane	6.259	88	3291	142.1926	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.629	63	38855	18.4348	ug/L		99
43) cis-1,3-Dichloropropene	6.650	75	142778	20.4290	ug/L		100
44) 4-Methyl-2-Pentanone	7.226	58	21644	18.7468	ug/L		98
45) trans-1,3-Dichloropropene	7.240	75	121640	20.4727	ug/L		100
48) Toluene	6.858	91	390265	20.1896	ug/L		100
49) Tetrachloroethene	7.185	166	108682	19.7126	ug/L		100
50) 1,1,2-Trichloroethane	7.374	97	75279	20.0923	ug/L		100
51) Dibromochloromethane	7.507	129	104430	20.4202	ug/L		100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

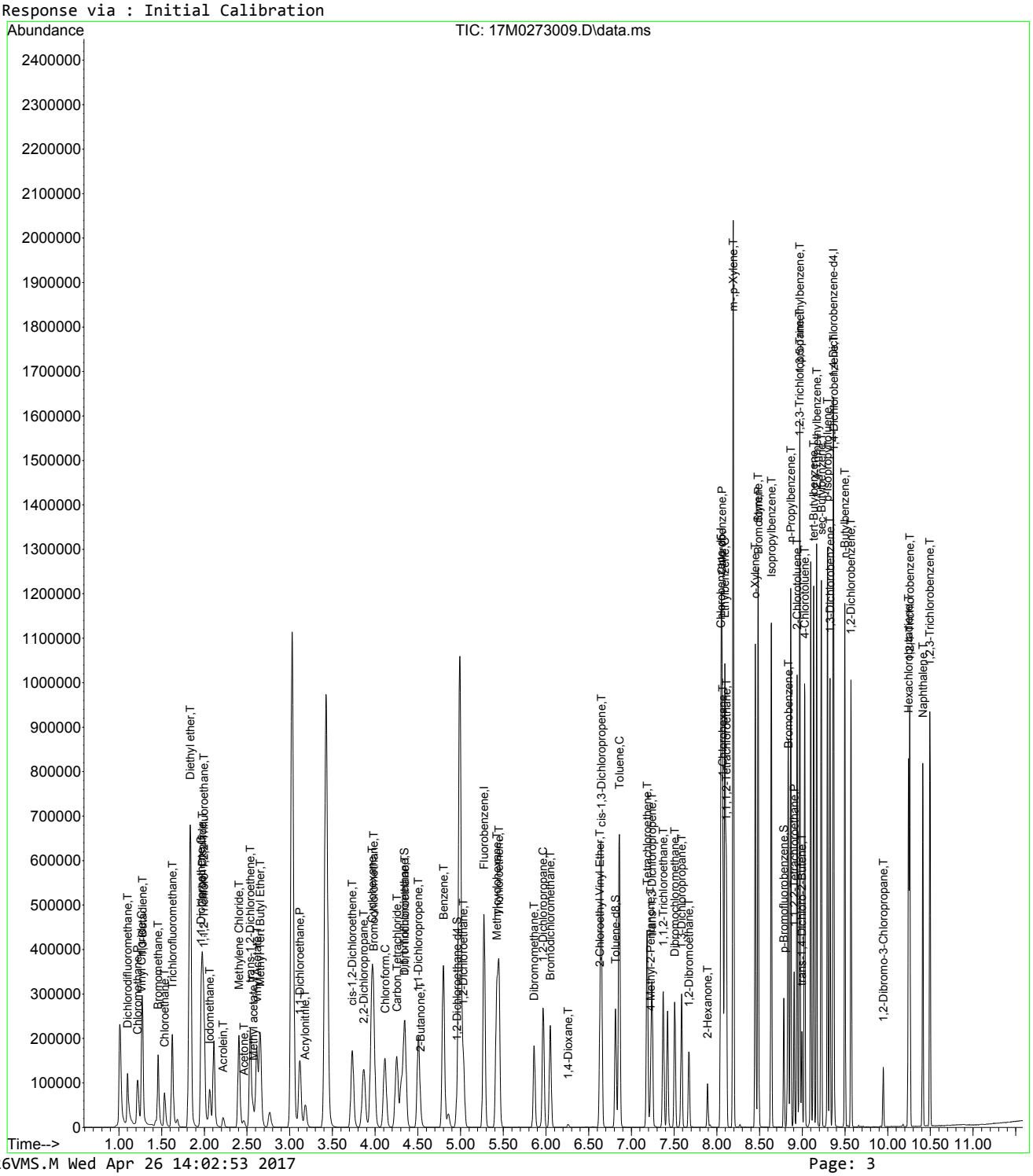
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	121547	20.4125	ug/L		100
53) 1,2-Dibromoethane	7.675	107	76988	20.0559	ug/L		99
54) 2-Hexanone	7.892	43	38232	19.4315	ug/L		100
55) Chlorobenzene	8.060	112	258733	19.9487	ug/L		98
56) 1-Chlorohexane	8.071	69	20340	19.4243	ug/L		84
57) Ethylbenzene	8.095	106	135392	20.0539	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.112	131	101795	20.1621	ug/L		100
59) m-,p-Xylene	8.193	106	327137	40.1491	ug/L		97
60) o-Xylene	8.451	106	160719	20.0193	ug/L		98
61) Styrene	8.482	104	262832	20.4609	ug/L		100
62) Bromoform	8.485	173	73848	20.5278	ug/L		100
63) Isopropylbenzene	8.639	105	420954	20.2572	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	353581	20.3360	ug/L		100
67) Bromobenzene	8.839	156	122250	19.9264	ug/L		99
68) n-Propylbenzene	8.865	91	469314	20.3768	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	85621	20.4085	ug/L		100
70) 2-Chlorotoluene	8.940	91	286030	20.1202	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24779	19.9792	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	20177	21.8236	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	356727	20.3467	ug/L		100
74) 4-Chlorotoluene	9.027	91	285276	20.1003	ug/L		99
75) tert-Butylbenzene	9.134	134	69653	20.0447	ug/L		100
76) sec-Butylbenzene	9.224	105	435489	20.3309	ug/L		100
77) p-Isopropyltoluene	9.296	119	374739	20.5229	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	213997	20.0086	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	209144	19.3691	ug/L		100
80) n-Butylbenzene	9.499	91	311602	20.2190	ug/L		99
81) 1,2-Dichlorobenzene	9.571	146	208933	20.0442	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	15581	20.2441	ug/L		97
83) Hexachlorobutadiene	10.243	225	85120	19.3709	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	156012	20.1477	ug/L		100
85) Naphthalene	10.411	128	308618	20.4385	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	149504	19.8771	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:53 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417906	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	317098	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167026	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115980	25.6974	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.790%			
34) 1,2-Dichloroethane-d4	4.953	65	108720	25.6997	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.799%			
47) Toluene-d8	6.812	98	406817	25.7068	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.827%			
66) p-Bromofluorobenzene	8.783	95	141725	25.3421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.368%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	273383	55.0820	ug/L	100
3) Chloromethane	1.212	50	241081	49.6332	ug/L	100
4) Vinyl Chloride	1.261	62	274798	51.0919	ug/L	100
5) 1,3-Butadiene	1.270	54	170920	51.7569	ug/L	100
6) Bromomethane	1.455	94	185476	46.3830	ug/L	100
7) Chloroethane	1.528	64	113694	44.5585	ug/L	100
8) Trichlorofluoromethane	1.615	101	370004	53.6311	ug/L	100
9) Diethyl ether	1.835	59	343062	103.1148	ug/L	100
10) 1,1-Dichloroethene	1.956	61	324434	50.2586	ug/L	100
11) Carbon Disulfide	1.971	76	711965	51.3878	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	212072	51.5304	ug/L	100
13) Iodomethane	2.058	142	303865	48.8576	ug/L	100
14) Acrolein	2.217	56	22080	53.7270	ug/L	100
15) Methylene Chloride	2.399	84	234342	47.8417	ug/L	100
16) Acetone	2.460	43	40588	48.3039	ug/L	99
17) trans-1,2-Dichloroethene	2.532	96	221078	50.2970	ug/L	100
18) Methyl acetate	2.567	43	128727	58.4362	ug/L #	98
19) Methyl Tert Butyl Ether	2.648	73	575057	51.5516	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	399083	50.5507	ug/L	100
21) Acrylonitrile	3.181	53	55941	52.1961	ug/L	100
22) Vinyl Acetate	2.608	86	37712	53.3092	ug/L	91
23) cis-1,2-Dichloroethene	3.728	96	250294	50.3065	ug/L	100
24) 2,2-Dichloropropane	3.858	77	316045	50.5289	ug/L	100
25) Cyclohexane	3.963	56	351763	52.3857	ug/L	100
26) Bromochloromethane	3.974	130	167162	52.1461	ug/L	100
27) Chloroform	4.110	83	408367	49.6131	ug/L	100
28) Carbon Tetrachloride	4.246	117	339910	52.2223	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	366464	50.6404	ug/L	100
31) 1,1-Dichloropropene	4.501	75	294187	51.7635	ug/L	100
32) 2-Butanone	4.524	43	63238	50.4812	ug/L	100
33) Benzene	4.797	78	884324	49.6787	ug/L	100
35) 1,2-Dichloroethane	5.031	62	277929	50.1424	ug/L	100
36) Methylcyclohexane	5.422	83	366430	52.0844	ug/L	100
37) Trichloroethene	5.445	130	266043	49.7582	ug/L	100
38) Dibromomethane	5.859	93	140437	51.5105	ug/L	100
39) 1,2-Dichloropropane	5.966	63	238320	51.0521	ug/L	100
40) Bromodichloromethane	6.047	83	318787	51.1640	ug/L	100
41) 1,4-Dioxane	6.256	88	4661	200.4617	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	106937	50.5036	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	371992	52.9813	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	58337	50.2965	ug/L	100
45) trans-1,3-Dichloropropene	7.240	75	316603	53.0417	ug/L	100
48) Toluene	6.858	91	1001874	50.3945	ug/L	100
49) Tetrachloroethene	7.182	166	285329	50.3192	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	194901	50.5792	ug/L	100
51) Dibromochloromethane	7.507	129	274126	52.1181	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

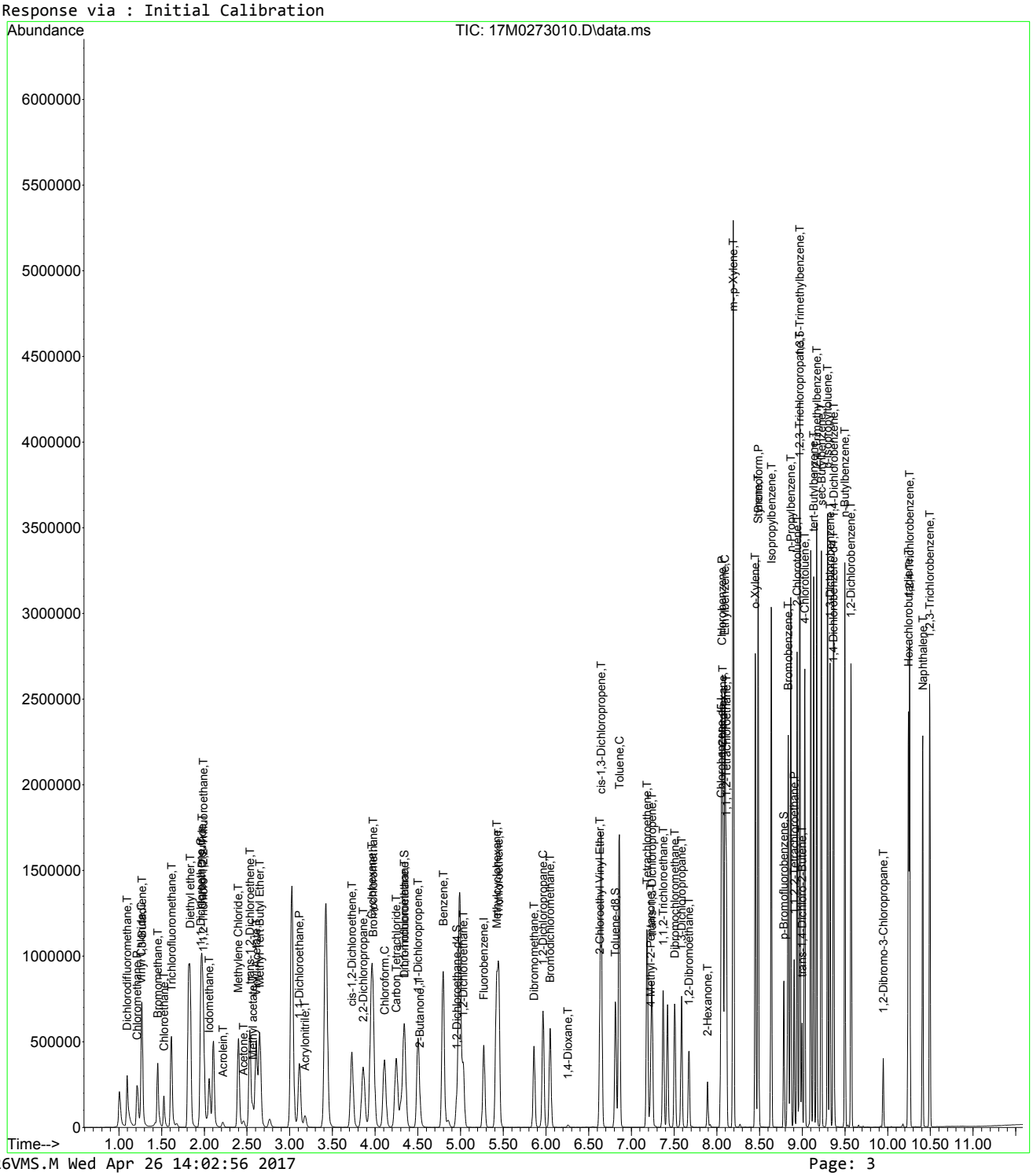
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	310634	50.7227	ug/L		100
53) 1,2-Dibromoethane	7.675	107	202402	51.2669	ug/L		100
54) 2-Hexanone	7.892	43	102578	50.6916	ug/L		100
55) Chlorobenzene	8.060	112	671778	50.3605	ug/L		100
56) 1-Chlorohexane	8.071	69	56830	52.7686	ug/L		100
57) Ethylbenzene	8.094	106	354570	51.0636	ug/L		100
58) 1,1,1,2-Tetrachloroethane	8.112	131	263117	50.6712	ug/L		100
59) m-,p-Xylene	8.193	106	866538	103.4037	ug/L		100
60) o-Xylene	8.450	106	423285	51.2646	ug/L		100
61) Styrene	8.482	104	700211	53.0002	ug/L		100
62) Bromoform	8.485	173	202713	54.7882	ug/L		100
63) Isopropylbenzene	8.639	105	1095961	51.2793	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	941312	50.5541	ug/L		100
67) Bromobenzene	8.836	156	322344	49.0619	ug/L		100
68) n-Propylbenzene	8.864	91	1246315	50.5297	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	238334	53.0473	ug/L		100
70) 2-Chlorotoluene	8.940	91	752979	49.4596	ug/L		100
71) 1,2,3-Trichloropropane	8.969	110	66677	50.2014	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	54428	54.9716	ug/L	#	100
73) 1,2,4-Trimethylbenzene	9.169	105	950457	50.6217	ug/L		100
74) 4-Chlorotoluene	9.030	91	761067	50.0733	ug/L		100
75) tert-Butylbenzene	9.134	134	183420	49.2893	ug/L		100
76) sec-Butylbenzene	9.224	105	1166744	50.8629	ug/L		100
77) p-Isopropyltoluene	9.296	119	1013386	51.8240	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	575762	50.2687	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	570068	49.2988	ug/L		100
80) n-Butylbenzene	9.499	91	877964	53.1964	ug/L		100
81) 1,2-Dichlorobenzene	9.571	146	560761	50.2349	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	44335	53.7892	ug/L		100
83) Hexachlorobutadiene	10.243	225	244851	52.0316	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	445052	53.6691	ug/L		100
85) Naphthalene	10.411	128	870655	53.8418	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	422273	52.4250	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:56 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	416412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	322460	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.366	152	174149	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	231222	51.4151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 205.660%#			
34) 1,2-Dichloroethane-d4	4.959	65	212387	50.3851	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 201.540%#			
47) Toluene-d8	6.815	98	820550	50.9885	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 203.954%#			
66) p-Bromofluorobenzene	8.786	95	299359	51.3394	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 205.358%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	539830	109.1568	ug/L	100
3) Chloromethane	1.215	50	509696	105.3116	ug/L	100
4) Vinyl Chloride	1.261	62	558799	104.2675	ug/L	100
5) 1,3-Butadiene	1.273	54	332020	100.9009	ug/L	99
6) Bromomethane	1.455	94	363546	91.2402	ug/L	99
7) Chloroethane	1.528	64	219087	86.1717	ug/L	99
8) Trichlorofluoromethane	1.606	101	628305	91.3979	ug/L	99
9) Diethyl ether	1.841	59	666542	201.0626	ug/L	100
10) 1,1-Dichloroethene	1.953	61	657831	102.2712	ug/L	100
11) Carbon Disulfide	1.968	76	1388153	100.5527	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	410087	100.0026	ug/L	100
13) Iodomethane	2.058	142	632275	99.8486	ug/L	100
14) Acrolein	2.220	56	41772	102.0079	ug/L	99
15) Methylene Chloride	2.399	84	477038	97.7384	ug/L	100
16) Acetone	2.466	43	81015	96.7621	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	452419	103.2982	ug/L	99
18) Methyl acetate	2.573	43	246307	112.2133	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	1158243	104.2044	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	814580	103.5507	ug/L	100
21) Acrylonitrile	3.184	53	109445	102.4848	ug/L	99
22) Vinyl Acetate	2.605	86	68474	97.1413	ug/L	81
23) cis-1,2-Dichloroethene	3.731	96	513237	103.5255	ug/L	99
24) 2,2-Dichloropropane	3.861	77	635375	101.6691	ug/L	100
25) Cyclohexane	3.963	56	686248	102.5650	ug/L	99
26) Bromochloromethane	3.980	130	340996	106.7552	ug/L	100
27) Chloroform	4.110	83	831165	101.3417	ug/L	100
28) Carbon Tetrachloride	4.249	117	691112	106.5604	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	746228	103.4887	ug/L	100
31) 1,1-Dichloropropene	4.504	75	587037	103.6624	ug/L	100
32) 2-Butanone	4.530	43	127054	101.7877	ug/L	100
33) Benzene	4.797	78	1806588	101.8528	ug/L	100
35) 1,2-Dichloroethane	5.034	62	560473	101.4803	ug/L	100
36) Methylcyclohexane	5.425	83	693665	98.9514	ug/L	100
37) Trichloroethene	5.448	130	544959	102.2898	ug/L	99
38) Dibromomethane	5.862	93	286873	105.5988	ug/L	100
39) 1,2-Dichloropropane	5.966	63	487994	104.9115	ug/L	100
40) Bromodichloromethane	6.050	83	655753	105.6233	ug/L	100
41) 1,4-Dioxane	6.259	88	11272	486.5289	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.632	63	223283	105.8292	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	759853	108.6111	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	117344	101.5337	ug/L	99
45) trans-1,3-Dichloropropene	7.243	75	639506	107.5233	ug/L	100
48) Toluene	6.861	91	2019788	99.9064	ug/L	99
49) Tetrachloroethene	7.185	166	569494	98.7631	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	391353	99.8722	ug/L	100
51) Dibromochloromethane	7.510	129	559220	104.5535	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

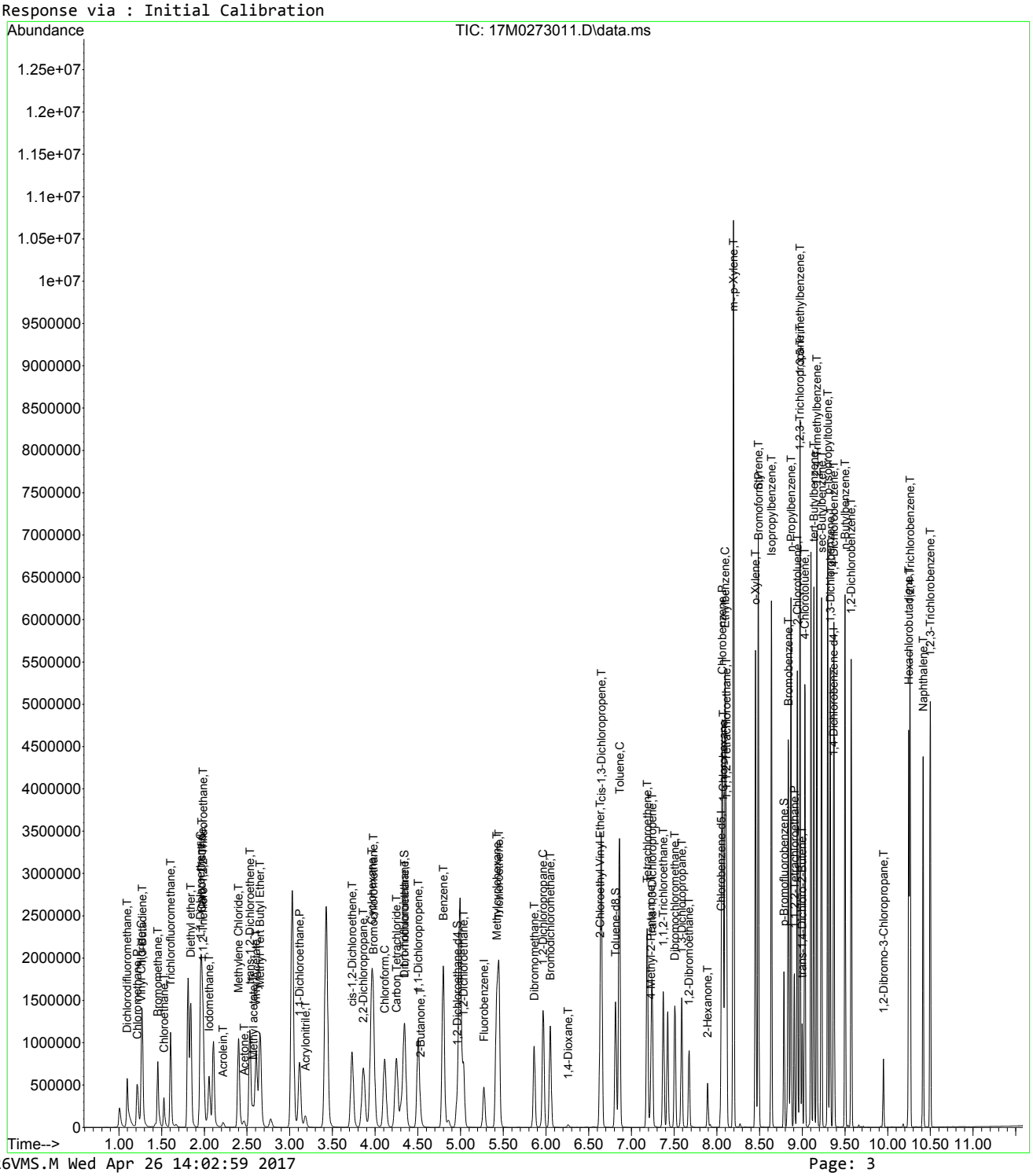
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	628375	100.8998	ug/L		100
53) 1,2-Dibromoethane	7.675	107	404718	100.8074	ug/L		99
54) 2-Hexanone	7.892	43	205809	100.0147	ug/L		100
55) Chlorobenzene	8.063	112	1370148	101.0066	ug/L		100
56) 1-Chlorohexane	8.074	69	110333	100.7444	ug/L		93
57) Ethylbenzene	8.097	106	720227	101.9990	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	539757	102.2182	ug/L		100
59) m-,p-Xylene	8.196	106	1760776	206.6191	ug/L		98
60) o-Xylene	8.453	106	860737	102.5116	ug/L		99
61) Styrene	8.485	104	1437076	106.9660	ug/L		100
62) Bromoform	8.488	173	409507	108.8390	ug/L		100
63) Isopropylbenzene	8.639	105	2195751	101.0295	ug/L		100
65) 1,3,5-Trimethylbenzene	8.975	105	1894143	97.5661	ug/L		100
67) Bromobenzene	8.839	156	656082	95.7737	ug/L		100
68) n-Propylbenzene	8.867	91	2460312	95.6691	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.908	83	459840	98.1628	ug/L		100
70) 2-Chlorotoluene	8.943	91	1511609	95.2292	ug/L		100
71) 1,2,3-Trichloropropane	8.972	110	133032	96.0637	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	104884	101.5987	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.172	105	1913672	97.7541	ug/L		100
74) 4-Chlorotoluene	9.030	91	1517738	95.7730	ug/L		99
75) tert-Butylbenzene	9.137	134	369444	95.2178	ug/L		99
76) sec-Butylbenzene	9.227	105	2287023	95.6223	ug/L		99
77) p-Isopropyltoluene	9.299	119	1998379	98.0160	ug/L		99
78) 1,3-Dichlorobenzene	9.328	146	1155544	96.7618	ug/L		99
79) 1,4-Dichlorobenzene	9.371	146	1146291	95.0753	ug/L		100
80) n-Butylbenzene	9.502	91	1722841	100.1183	ug/L		100
81) 1,2-Dichlorobenzene	9.574	146	1130299	97.1145	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	91272	106.2061	ug/L		99
83) Hexachlorobutadiene	10.246	225	476519	97.1199	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	897981	103.8590	ug/L		100
85) Naphthalene	10.417	128	1727630	102.4678	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	823456	98.0503	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:59 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	422742	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.054	117	336124	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.365	152	172896	25.00000	ug/L	# 0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	457792	100.2715	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 401.086%#			
34) 1,2-Dichloroethane-d4	4.962	65	411299	96.1124	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 384.450%#			
47) Toluene-d8	6.817	98	1632836	97.3388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 389.355%#			
66) p-Bromofluorobenzene	8.789	95	645488	111.5020	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 446.008%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1123418	223.7603	ug/L	100
3) Chloromethane	1.218	50	1006074	204.7589	ug/L	100
4) Vinyl Chloride	1.264	62	1130871	207.8521	ug/L	100
5) 1,3-Butadiene	1.276	54	685580	205.2281	ug/L	100
6) Bromomethane	1.458	94	716567	177.1461	ug/L	99
7) Chloroethane	1.531	64	426821	165.3643	ug/L	97
8) Trichlorofluoromethane	1.606	101	1102484	157.9741	ug/L	99
9) Diethyl ether	1.843	59	3720	1.1053	ug/L	93
10) 1,1-Dichloroethene	1.956	61	1286118	196.9553	ug/L	100
11) Carbon Disulfide	1.971	76	2821100	201.2903	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	825067	198.1856	ug/L	100
13) Iodomethane	2.058	142	1333071	205.2109	ug/L	100
14) Acrolein	2.220	56	2243	5.3954	ug/L	100
15) Methylene Chloride	2.402	84	935406	188.7818	ug/L	100
16) Acetone	2.469	43	158152	186.0640	ug/L	99
17) trans-1,2-Dichloroethene	2.535	96	898207	202.0115	ug/L	100
18) Methyl acetate	2.576	43	529604	237.6658	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	2259635	200.2500	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	1611611	201.8029	ug/L	100
21) Acrylonitrile	3.184	53	143	0.1319	ug/L #	7
22) Vinyl Acetate	2.611	86	152152	212.6197	ug/L	79
23) cis-1,2-Dichloroethene	3.731	96	1025145	203.6866	ug/L	100
24) 2,2-Dichloropropane	3.867	77	1266128	199.3016	ug/L	99
25) Cyclohexane	3.968	56	1443111	212.4544	ug/L	98
26) Bromochloromethane	3.986	130	680841	209.9583	ug/L	100
27) Chloroform	4.116	83	1630953	195.8801	ug/L	100
28) Carbon Tetrachloride	4.252	117	1390908	211.2485	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	1477746	201.8688	ug/L	100
31) 1,1-Dichloropropene	4.507	75	1190890	207.1454	ug/L	100
32) 2-Butanone	4.533	43	254497	200.8340	ug/L	100
33) Benzene	4.799	78	3549706	197.1306	ug/L	100
35) 1,2-Dichloroethane	5.037	62	1109187	197.8242	ug/L	100
36) Methylcyclohexane	5.428	83	1502567	211.1318	ug/L	100
37) Trichloroethene	5.451	130	1086595	200.9018	ug/L	99
38) Dibromomethane	5.862	93	573997	208.1262	ug/L	100
39) 1,2-Dichloropropane	5.969	63	972277	205.8952	ug/L	99
40) Bromodichloromethane	6.053	83	1300334	206.3109	ug/L	100
41) 1,4-Dioxane	6.267	88	427	18.1545	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.635	63	462111	215.7466	ug/L	100
43) cis-1,3-Dichloropropene	6.652	75	1544723	217.4919	ug/L	100
44) 4-Methyl-2-Pentanone	7.231	58	247079	210.5876	ug/L	99
45) trans-1,3-Dichloropropene	7.246	75	1303100	215.8160	ug/L	100
48) Toluene	6.864	91	4027711	191.1271	ug/L	99
49) Tetrachloroethene	7.188	166	1179771	196.2816	ug/L	99
50) 1,1,2-Trichloroethane	7.376	97	783346	191.7811	ug/L	99
51) Dibromochloromethane	7.512	129	1136390	203.8259	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

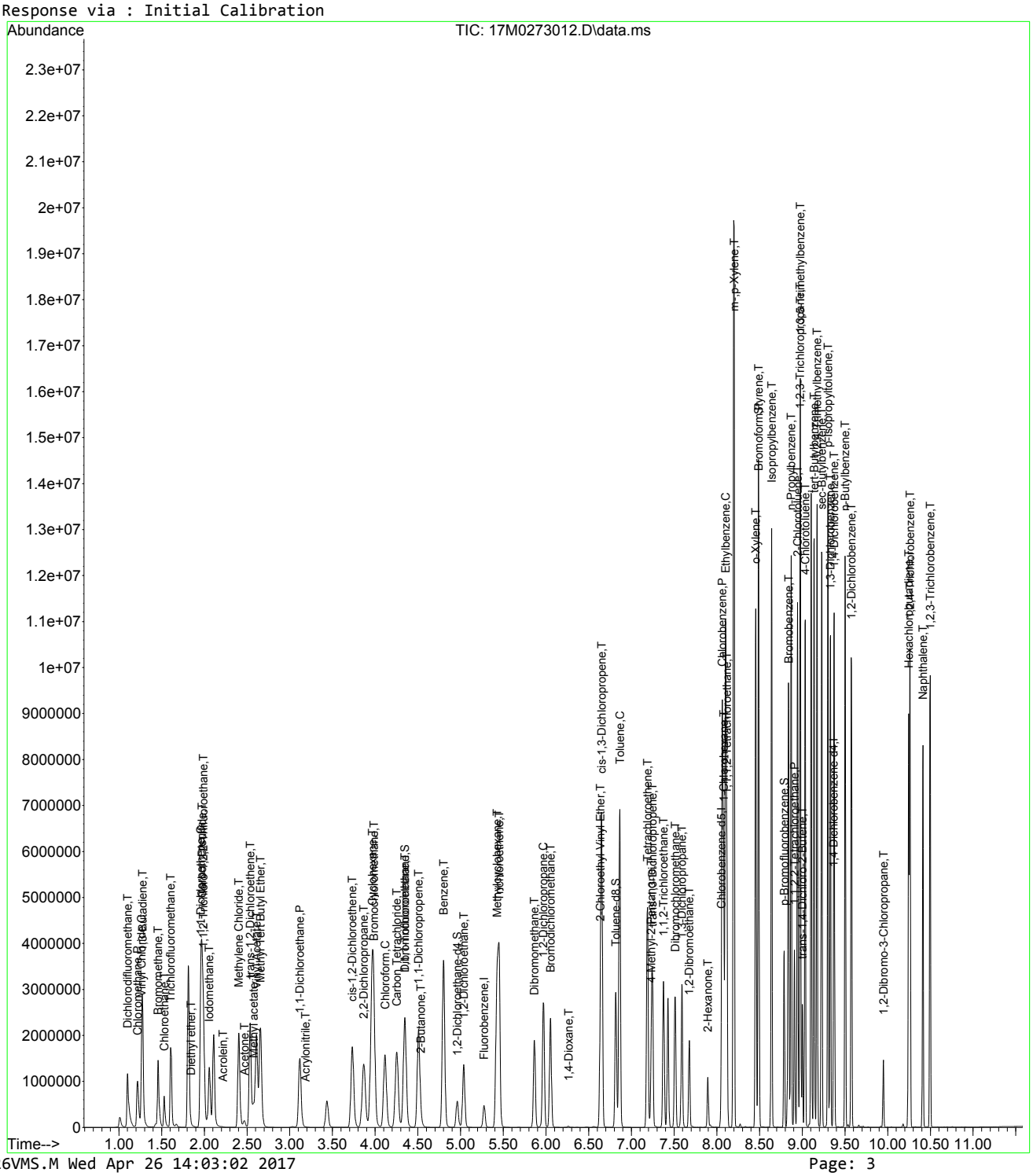
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1259427	194.0084 ug/L	99
53) 1,2-Dibromoethane	7.677	107	819308	195.7778 ug/L	99
54) 2-Hexanone	7.895	43	433472	202.0863 ug/L	99
55) Chlorobenzene	8.062	112	2815311	199.1062 ug/L	99
56) 1-Chlorohexane	8.080	69	241282	211.3571 ug/L	93
57) Ethylbenzene	8.103	106	1512310	205.4678 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.117	131	1104704	200.7023 ug/L	99
59) m-,p-Xylene	8.201	106	3595369	404.7493 ug/L	92
60) o-Xylene	8.456	106	1810464	206.8564 ug/L	97
61) Styrene	8.488	104	3005372	214.6053 ug/L	99
62) Bromoform	8.491	173	876359	223.4506 ug/L	100
63) Isopropylbenzene	8.642	105	4537785	200.3019 ug/L	97
65) 1,3,5-Trimethylbenzene	8.977	105	3876481	201.1221 ug/L	98
67) Bromobenzene	8.841	156	1397197	205.4384 ug/L	100
68) n-Propylbenzene	8.870	91	5099958	199.7489 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.908	83	975708	209.7955 ug/L	100
70) 2-Chlorotoluene	8.946	91	3200183	203.0680 ug/L	99
71) 1,2,3-Trichloropropane	8.975	110	277077	201.5300 ug/L	95
72) trans-1,4-Dichloro-2-B...	9.001	53	221040	215.6681 ug/L #	96
73) 1,2,4-Trimethylbenzene	9.174	105	3801181	195.5789 ug/L	97
74) 4-Chlorotoluene	9.035	91	3225947	205.0404 ug/L	98
75) tert-Butylbenzene	9.140	134	776105	201.4772 ug/L	94
76) sec-Butylbenzene	9.229	105	4546895	191.4871 ug/L	97
77) p-Isopropyltoluene	9.302	119	3910662	193.1992 ug/L	97
78) 1,3-Dichlorobenzene	9.331	146	2355778	198.6954 ug/L	98
79) 1,4-Dichlorobenzene	9.374	146	2315642	193.4552 ug/L	100
80) n-Butylbenzene	9.501	91	3388493	198.3403 ug/L	98
81) 1,2-Dichlorobenzene	9.577	146	2200775	190.4594 ug/L	98
82) 1,2-Dibromo-3-Chloropr...	9.950	75	167553	196.3812 ug/L	100
83) Hexachlorobutadiene	10.246	225	910189	186.8511 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	1714658	199.7517 ug/L	99
85) Naphthalene	10.413	128	3126949	186.8072 ug/L	99
86) 1,2,3-Trichlorobenzene	10.497	180	1583634	189.9325 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	421163	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.051	117	318095	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167190	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.348	111	349	0.0767	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.307%#			
34) 1,2-Dichloroethane-d4	4.994	65	5040	1.1822	ug/L		0.0405
Spiked Amount 25.000	Range 80 - 120		Recovery =	4.729%#			
47) Toluene-d8	6.818	98	3065	0.1931	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.772%#			
66) p-Bromofluorobenzene	8.784	95	2416	0.4316	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.726%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.105	85	6972	1.3939	ug/L		92
3) Chloromethane	1.212	50	17159	3.5053	ug/L		99
4) Vinyl Chloride	1.267	62	3350	0.6180	ug/L		95
5) 1,3-Butadiene	1.276	54	1017883	305.8452	ug/L		100
6) Bromomethane	1.458	94	147661	36.6409	ug/L		99
7) Chloroethane	1.528	64	774	0.3010	ug/L	#	1
8) Trichlorofluoromethane	1.606	101	3390	0.4876	ug/L		94
9) Diethyl ether	1.846	59	976700	291.2984	ug/L		100
10) 1,1-Dichloroethene	1.953	61	4141	0.6365	ug/L		100
11) Carbon Disulfide	1.965	76	4144048	296.7934	ug/L		99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	4030	0.9717	ug/L		99
13) Iodomethane	2.058	142	1505993	232.4313	ug/L		100
14) Acrolein	2.228	56	60168	145.2737	ug/L		99
15) Methylene Chloride	2.405	84	2234	0.4526	ug/L		97
16) Acetone	2.475	43	227499	268.6534	ug/L		100
17) trans-1,2-Dichloroethene	2.538	96	4122	0.9305	ug/L		98
18) Methyl acetate	2.579	43	793361	357.3646	ug/L	#	97
19) Methyl Tert Butyl Ether	2.666	73	1685	0.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	1574	0.1978	ug/L		92
21) Acrylonitrile	3.190	53	164892	152.6638	ug/L		100
22) Vinyl Acetate	2.608	86	202937	284.6507	ug/L		82
23) cis-1,2-Dichloroethene	3.740	96	2225	0.4437	ug/L		93
24) 2,2-Dichloropropane	3.873	77	904	0.4162	ug/L	#	81
25) Cyclohexane	3.969	56	2110437	311.8629	ug/L		99
26) Bromochloromethane	3.986	130	800	0.2476	ug/L		99
27) Chloroform	4.119	83	2791	0.3365	ug/L		95
28) Carbon Tetrachloride	4.258	117	2228	0.3397	ug/L		99
30) 1,1,1-Trichloroethane	4.348	97	1716	0.2353	ug/L		97
31) 1,1-Dichloropropene	4.504	75	5532	0.9659	ug/L	#	1
32) 2-Butanone	4.533	43	386102	305.8312	ug/L	#	75
33) Benzene	4.802	78	6042	0.3368	ug/L		98
35) 1,2-Dichloroethane	5.034	62	890	0.1593	ug/L	#	55
36) Methylcyclohexane	5.428	83	2089398	294.6906	ug/L		99
37) Trichloroethene	5.451	130	4538	0.8422	ug/L		96
38) Dibromomethane	5.862	93	711	0.2588	ug/L		99
39) 1,2-Dichloropropane	5.972	63	809	0.1720	ug/L	#	75
40) Bromodichloromethane	6.050	83	1149	0.1830	ug/L		94
41) 1,4-Dioxane	6.262	88	15860	676.8366	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.635	63	704063	329.9396	ug/L		99
43) cis-1,3-Dichloropropene	6.653	75	3088	0.4364	ug/L		94
44) 4-Methyl-2-Pentanone	7.229	58	356679	305.1404	ug/L		89
45) trans-1,3-Dichloropropene	7.246	75	2608	0.4335	ug/L	#	44
48) Toluene	6.858	91	10685	0.5358	ug/L		100
49) Tetrachloroethene	7.185	166	7101	1.2484	ug/L		99
50) 1,1,2-Trichloroethane	7.373	97	542	0.1402	ug/L	#	65
51) Dibromochloromethane	7.510	129	818	0.1550	ug/L		98

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

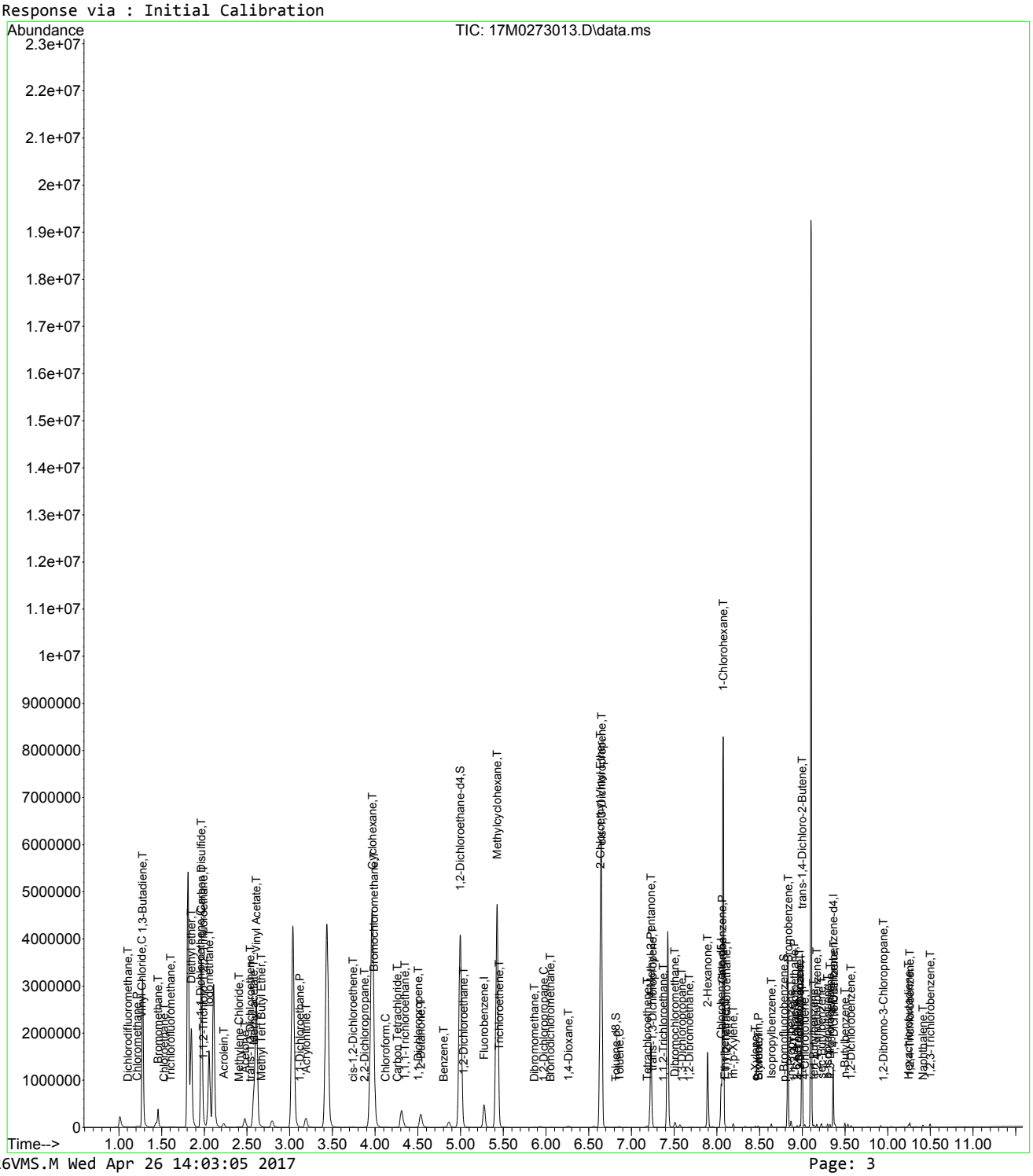
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1557	0.2534	ug/L		96
53) 1,2-Dibromoethane	7.677	107	1315	0.3320	ug/L		83
54) 2-Hexanone	7.892	43	628976	309.8508	ug/L		99
55) Chlorobenzene	8.063	112	8335	0.6229	ug/L	#	1
56) 1-Chlorohexane	8.074	69	332865	308.1078	ug/L	#	1
57) Ethylbenzene	8.094	106	4492	0.6449	ug/L	#	1
58) 1,1,1,2-Tetrachloroethane	8.112	131	902	0.1732	ug/L		85
59) m-,p-Xylene	8.193	106	12446	1.4805	ug/L		92
60) o-Xylene	8.451	106	4066	0.4909	ug/L		99
61) Styrene	8.485	104	8240	0.6217	ug/L		98
62) Bromoform	8.485	173	663	0.1786	ug/L	#	79
63) Isopropylbenzene	8.639	105	23066	1.0759	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	14997	0.8046	ug/L		97
67) Bromobenzene	8.836	156	4020	0.6113	ug/L	#	1
68) n-Propylbenzene	8.865	91	32164	1.3028	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	643	0.1430	ug/L		99
70) 2-Chlorotoluene	8.940	91	11336	0.7439	ug/L		97
71) 1,2,3-Trichloropropane	8.972	110	252	0.1895	ug/L	#	1
72) trans-1,4-Dichloro-2-B...	8.998	53	334602	337.6122	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	15648	0.8326	ug/L		99
74) 4-Chlorotoluene	9.030	91	16738	1.1002	ug/L		100
75) tert-Butylbenzene	9.134	134	2631	0.7063	ug/L		98
76) sec-Butylbenzene	9.224	105	25971	1.1311	ug/L		99
77) p-Isopropyltoluene	9.296	119	20909	1.0682	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	13448	1.1730	ug/L		98
79) 1,4-Dichlorobenzene	9.368	146	14447	1.2481	ug/L		96
80) n-Butylbenzene	9.499	91	25212	1.5261	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	8203	0.7341	ug/L		98
82) 1,2-Dibromo-3-Chloropr...	9.947	75	274	0.3321	ug/L		74
83) Hexachlorobutadiene	10.243	225	5645	1.1984	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	15501	1.8674	ug/L		99
85) Naphthalene	10.414	128	18220	1.1256	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	11288	1.4000	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

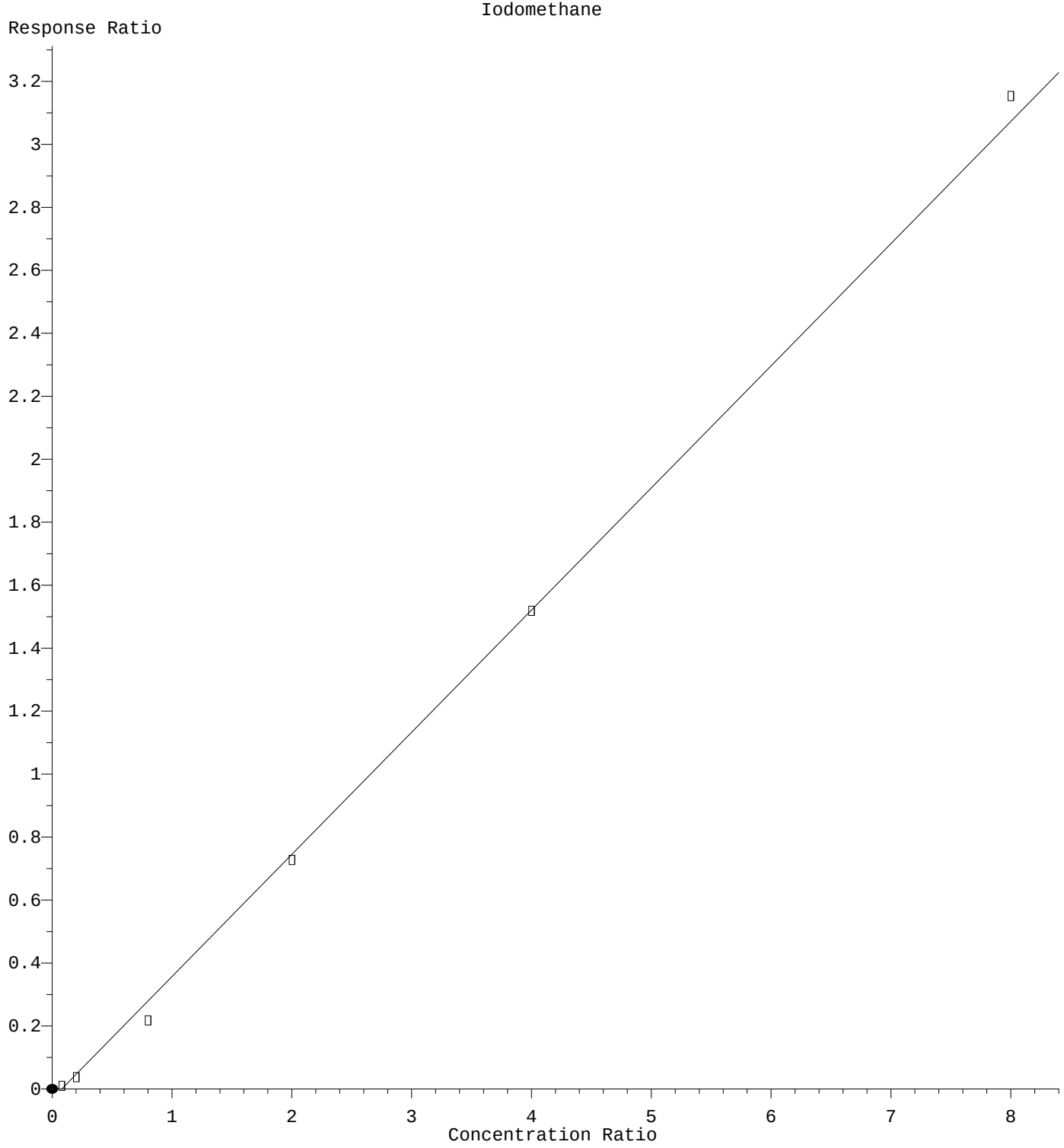
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

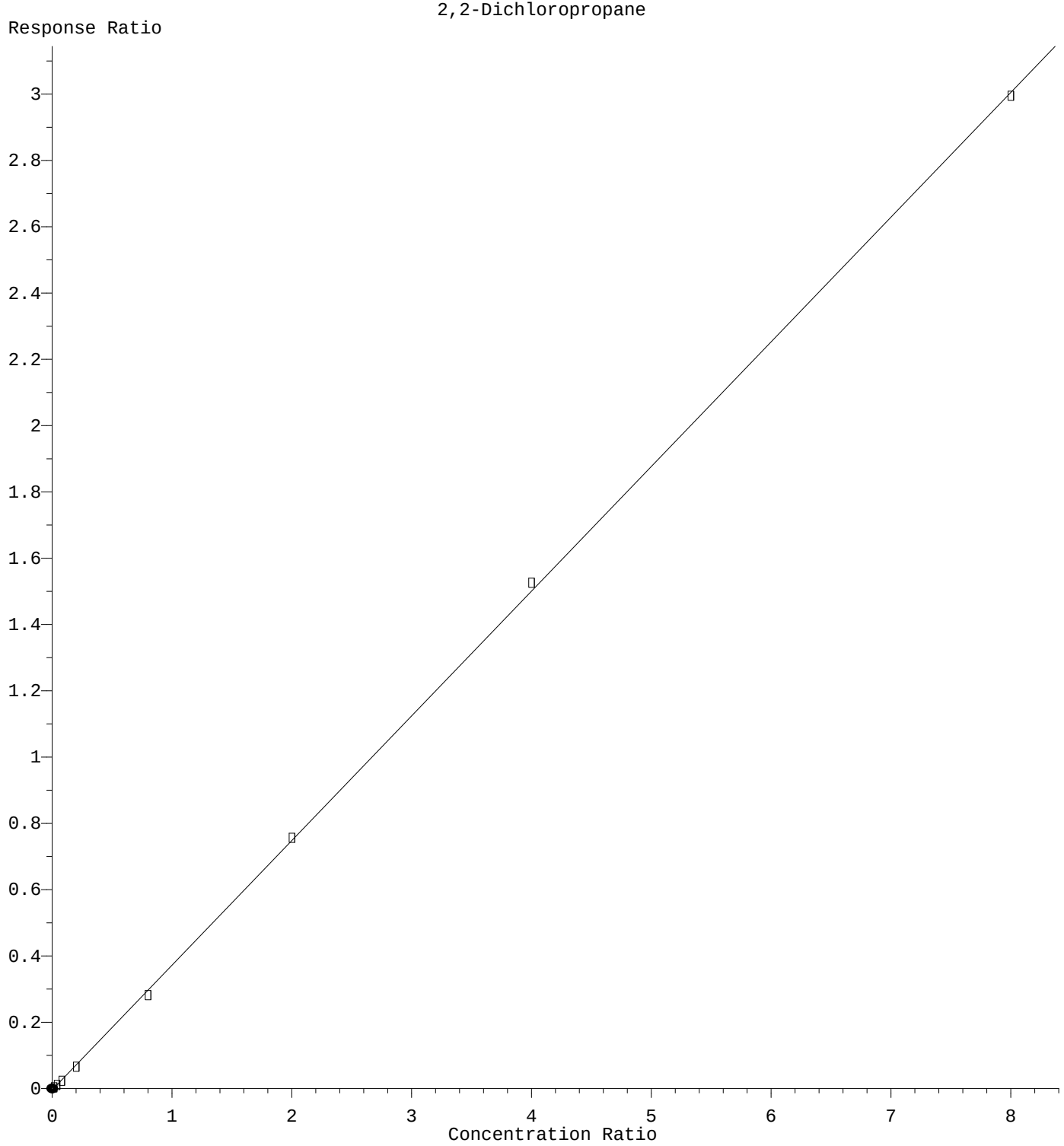
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:05 2017 Page: 3



Response = 3.879e-001 * Amt - 3.105e-002
Coef of Det (r^2) = 0.996358 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017



Response = 3.762e-001 * Amt - 4.116e-003
Coef of Det (r^2) = 0.999589 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	427426	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	325357	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	172416	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115154	24.9461	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.784%			
34) 1,2-Dichloroethane-d4	4.956	65	107614	24.8717	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.487%			
47) Toluene-d8	6.812	98	413254	25.4507	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.803%			
66) p-Bromofluorobenzene	8.786	95	146143	25.3151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.260%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.091	85	340360	67.0494	ug/L	100
3) Chloromethane	1.209	50	296192	59.6212	ug/L	99
4) Vinyl Chloride	1.256	62	335286	60.9497	ug/L	100
5) 1,3-Butadiene	1.267	54	281377	83.3070	ug/L	99
6) Bromomethane	1.450	94	177201	43.3267	ug/L	99
7) Chloroethane	1.519	64	108932	41.7413	ug/L	99
8) Trichlorofluoromethane	1.597	101	225737	31.9912	ug/L	100
9) Diethyl ether	1.841	59	316851	93.1153	ug/L	100
10) 1,1-Dichloroethene	1.939	61	284785	43.1339	ug/L	100
11) Carbon Disulfide	1.951	76	621205	43.8383	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.971	101	212873	50.5729	ug/L	99
13) Iodomethane	2.043	142	436680	67.8380	ug/L	100
14) Acrolein	2.220	56	42666	101.5062	ug/L	100
15) Methylene Chloride	2.394	84	222390	44.3905	ug/L	99
16) Acetone	2.472	43	42575	49.5401	ug/L	99
17) trans-1,2-Dichloroethene	2.524	96	211286	46.9986	ug/L	100
18) Methyl acetate	2.585	43	266388	118.2346	ug/L #	77
19) Methyl Tert Butyl Ether	2.657	73	586859	51.4378	ug/L #	100
20) 1,1-Dichloroethane	3.106	63	386650	47.8850	ug/L	100
21) Acrylonitrile	3.184	53	55958	51.0491	ug/L	100
22) Vinyl Acetate	2.593	86	33146	45.8112	ug/L #	1
23) cis-1,2-Dichloroethene	3.720	96	246047	48.3515	ug/L	100
24) 2,2-Dichloropropane	3.853	77	277540	43.4231	ug/L	100
25) Cyclohexane	3.951	56	319980	46.5911	ug/L	92
26) Bromochloromethane	3.974	130	161439	49.2391	ug/L	100
27) Chloroform	4.108	83	411531	48.8839	ug/L	100
28) Carbon Tetrachloride	4.241	117	326387	49.0278	ug/L	100
30) 1,1,1-Trichloroethane	4.336	97	369604	49.9368	ug/L	100
31) 1,1-Dichloropropene	4.496	75	278322	47.8813	ug/L	100
32) 2-Butanone	4.533	43	64598	50.4183	ug/L #	77
33) Benzene	4.791	78	864999	47.5107	ug/L	100
35) 1,2-Dichloroethane	5.028	62	268041	47.2814	ug/L	100
36) Methylcyclohexane	5.416	83	337902	46.9597	ug/L	99
37) Trichloroethene	5.442	130	264383	48.3464	ug/L	100
38) Dibromomethane	5.859	93	136084	48.8021	ug/L	100
39) 1,2-Dichloropropane	5.964	63	232197	48.6326	ug/L	100
40) Bromodichloromethane	6.047	83	305406	47.9247	ug/L	100
41) 1,4-Dioxane	6.268	88	4924	207.0561	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	119939	55.3825	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	366582	51.0479	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	61610	51.9353	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	294490	48.2382	ug/L	100
48) Toluene	6.855	91	962641	47.1919	ug/L	100
49) Tetrachloroethene	7.182	166	271333	46.6363	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	183455	46.4003	ug/L	100
51) Dibromochloromethane	7.507	129	255775	47.3947	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

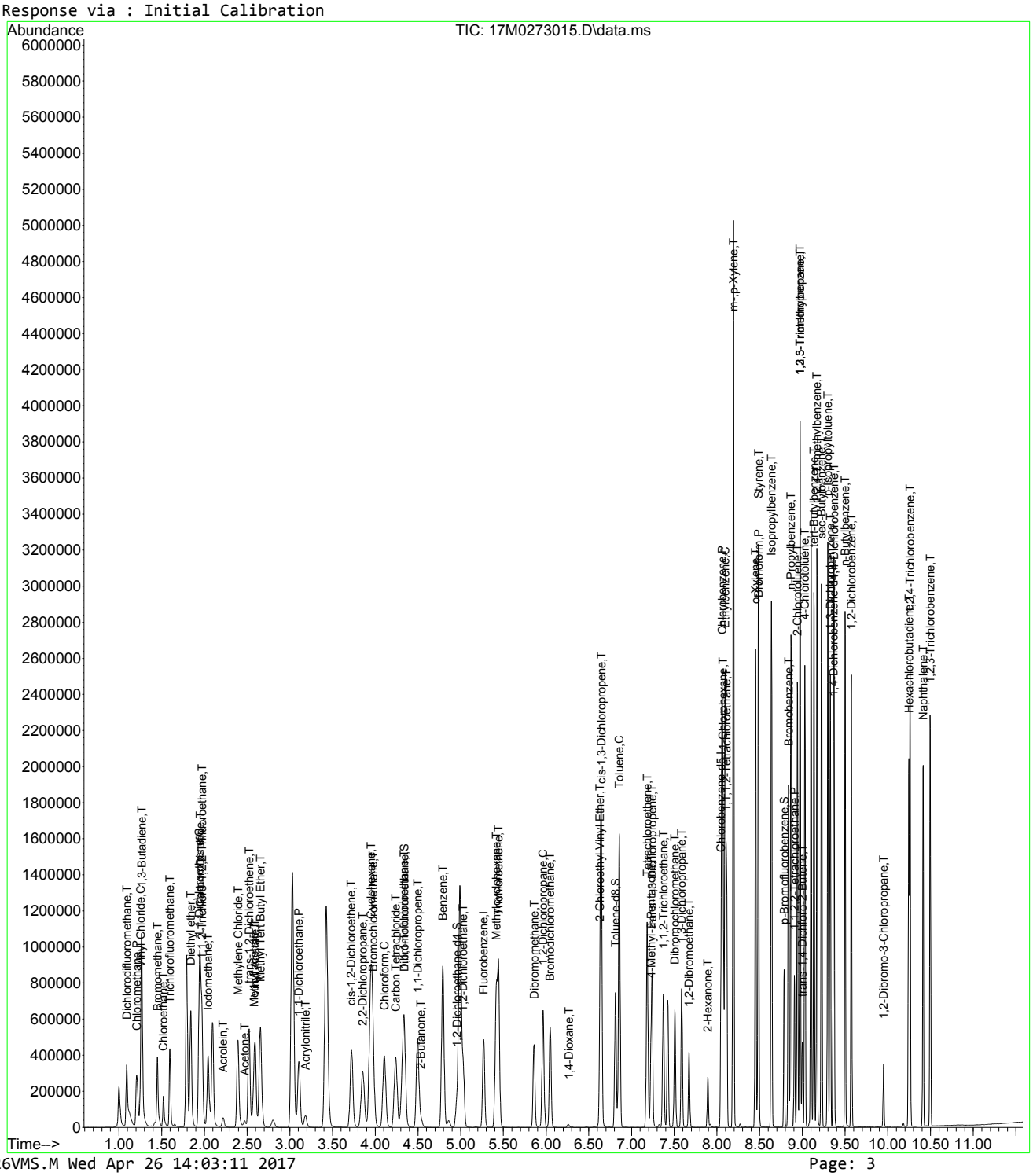
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	304079	48.3920	ug/L		100
53) 1,2-Dibromoethane	7.672	107	188269	46.4766	ug/L		99
54) 2-Hexanone	7.892	43	111735	53.8151	ug/L		99
55) Chlorobenzene	8.060	112	645652	47.1733	ug/L		100
56) 1-Chlorohexane	8.071	69	57184	51.7495	ug/L		92
57) Ethylbenzene	8.094	106	338763	47.5487	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.112	131	249632	46.8539	ug/L		99
59) m-,p-Xylene	8.193	106	824011	95.8330	ug/L		100
60) o-Xylene	8.451	106	407790	48.1343	ug/L		99
61) Styrene	8.485	104	676703	49.9206	ug/L		100
62) Bromoform	8.488	173	186092	49.0192	ug/L		100
63) Isopropylbenzene	8.639	105	1026933	46.8298	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	881437	45.8586	ug/L		100
67) Bromobenzene	8.839	156	305375	45.0262	ug/L		98
68) n-Propylbenzene	8.865	91	1132307	44.4723	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	209471	45.1656	ug/L		100
70) 2-Chlorotoluene	8.940	91	699415	44.5050	ug/L		99
71) 1,2,3-Trichloropropane	8.972	110	63151	46.0603	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	41660	40.7607	ug/L	#	93
73) 1,2,4-Trimethylbenzene	9.169	105	890512	45.9463	ug/L		100
74) 4-Chlorotoluene	9.030	91	720079	45.8955	ug/L		100
75) tert-Butylbenzene	9.134	134	171753	44.7113	ug/L		99
76) sec-Butylbenzene	9.224	105	1059058	44.7251	ug/L		100
77) p-Isopropyltoluene	9.296	119	926654	45.9071	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	527115	44.5827	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	537479	45.0275	ug/L		100
80) n-Butylbenzene	9.499	91	781454	45.8686	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	530951	46.0775	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	39964	46.9704	ug/L		96
83) Hexachlorobutadiene	10.246	225	211253	43.4885	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	408655	47.7394	ug/L		100
85) Naphthalene	10.414	128	784767	47.0133	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	377306	45.3780	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:11 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	102	0.000
2	T	Dichlorodifluoromethane	50.000	67.049	-34.1#	124	0.000
3	P	Chloromethane	50.000	59.621	-19.2	123	0.000
4	C	Vinyl Chloride	50.000	60.950	-21.9#	122	0.000
5	T	1,3-Butadiene	50.000	83.307	-66.6#	165	0.000
6	T	Bromomethane	50.000	43.327	13.3	96	0.000
7	T	Chloroethane	50.000	41.741	16.5	96	0.000
8	T	Trichlorofluoromethane	50.000	31.991	36.0#	61	-0.018
9	T	Diethyl ether	100.000	93.115	6.9	92	0.000
10	C	1,1-Dichloroethene	50.000	43.134	13.7#	88	-0.017
11	T	Carbon Disulfide	50.000	43.838	12.3	87	-0.020
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	50.573	-1.1	100	-0.017
13	T	Iodomethane	50.000	67.838	-35.7#	144	-0.015
14	T	Acrolein	50.000	101.506	-103.0#	193	0.000
15	T	Methylene Chloride	50.000	44.390	11.2	95	0.000
16	T	Acetone	50.000	49.540	0.9	105	0.012
17	T	trans-1,2-Dichloroethene	50.000	46.999	6.0	96	0.000
18	T	Methyl acetate	50.000	118.235	-136.5#	207	0.018
19	T	Methyl Tert Butyl Ether	50.000	51.438	-2.9	102	0.000
20	P	1,1-Dichloroethane	50.000	47.885	4.2	97	0.000
21	T	Acrylonitrile	50.000	51.049	-2.1	100	0.000
22	T	Vinyl Acetate	50.000	45.811	8.4	88	-0.015
23	T	cis-1,2-Dichloroethene	50.000	48.351	3.3	98	0.000
24	T	2,2-Dichloropropane	50.000	43.423	13.2	88	0.000
25	T	Cyclohexane	50.000	46.591	6.8	91	-0.012
26	T	Bromochloromethane	50.000	49.239	1.5	97	0.000
27	C	Chloroform	50.000	48.884	2.2#	101	0.000
28	T	Carbon Tetrachloride	50.000	49.028	1.9	96	0.000
29	S	Dibromofluoromethane	25.000	24.946	0.2	99	0.000
30	T	1,1,1-Trichloroethane	50.000	49.937	0.1	101	0.000
31	T	1,1-Dichloropropene	50.000	47.881	4.2	95	0.000
32	T	2-Butanone	50.000	50.418	-0.8	102	0.000
33	T	Benzene	50.000	47.511	5.0	98	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.872	0.5	99	0.000
35	T	1,2-Dichloroethane	50.000	47.281	5.4	96	0.000
36	T	Methylcyclohexane	50.000	46.960	6.1	92	0.000
37	T	Trichloroethene	50.000	48.346	3.3	99	0.000
38	T	Dibromomethane	50.000	48.802	2.4	97	0.000
39	C	1,2-Dichloropropane	50.000	48.633	2.7#	97	0.000
40	T	Bromodichloromethane	50.000	47.925	4.2	96	0.000
41	T	1,4-Dioxane	200.000	207.056	-3.5	106	0.012
42	T	2-Chloroethyl Vinyl Ether	50.000	55.383	-10.8	112	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.048	-2.1	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	51.935	-3.9	106	0.000
45	T	trans-1,3-Dichloropropene	50.000	48.238	3.5	93	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.451	-1.8	102	0.000
48	C	Toluene	50.000	47.192	5.6#	96	0.000
49	T	Tetrachloroethene	50.000	46.636	6.7	95	0.000
50	T	1,1,2-Trichloroethane	50.000	46.400	7.2	94	0.000
51	T	Dibromochloromethane	50.000	47.395	5.2	93	0.000
52	T	1,3-Dichloropropane	50.000	48.392	3.2	98	0.000
53	T	1,2-Dibromoethane	50.000	46.477	7.0	93	0.000
54	T	2-Hexanone	50.000	53.815	-7.6	109	0.000
55	P	Chlorobenzene	50.000	47.173	5.7	96	0.000
56	T	1-Chlorohexane	50.000	51.749	-3.5	101	0.000
57	C	Ethylbenzene	50.000	47.549	4.9#	96	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	46.854	6.3	95	0.000
59	T	m-,p-Xylene	100.000	95.833	4.2	95	0.000
60	T	o-Xylene	50.000	48.134	3.7	96	0.000
61	T	Styrene	50.000	49.921	0.2	97	0.000
62	P	Bromoform	50.000	49.019	2.0	92	0.000
63	T	Isopropylbenzene	50.000	46.830	6.3	94	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	103	0.000
65	T	1,3,5-Trimethylbenzene	50.000	45.859	8.3	94	0.000
66	S	p-Bromofluorobenzene	25.000	25.315	-1.3	103	0.000
67	T	Bromobenzene	50.000	45.026	9.9	95	0.000
68	T	n-Propylbenzene	50.000	44.472	11.1	91	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.166	9.7	88	0.000
70	T	2-Chlorotoluene	50.000	44.505	11.0	93	0.000
71	T	1,2,3-Trichloropropane	50.000	46.060	7.9	95	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	40.761	18.5	77	0.000
73	T	1,2,4-Trimethylbenzene	50.000	45.946	8.1	94	0.000
74	T	4-Chlorotoluene	50.000	45.895	8.2	95	0.000
75	T	tert-Butylbenzene	50.000	44.711	10.6	94	0.000
76	T	sec-Butylbenzene	50.000	44.725	10.5	91	0.000
77	T	p-Isopropyltoluene	50.000	45.907	8.2	91	0.000
78	T	1,3-Dichlorobenzene	50.000	44.583	10.8	92	0.000
79	T	1,4-Dichlorobenzene	50.000	45.027	9.9	94	0.000
80	T	n-Butylbenzene	50.000	45.869	8.3	89	0.000
81	T	1,2-Dichlorobenzene	50.000	46.077	7.8	95	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.970	6.1	90	0.000
83	T	Hexachlorobutadiene	50.000	43.488	13.0	86	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.739	4.5	92	0.000
85	T	Naphthalene	50.000	47.013	6.0	90	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.378	9.2	89	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:31:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

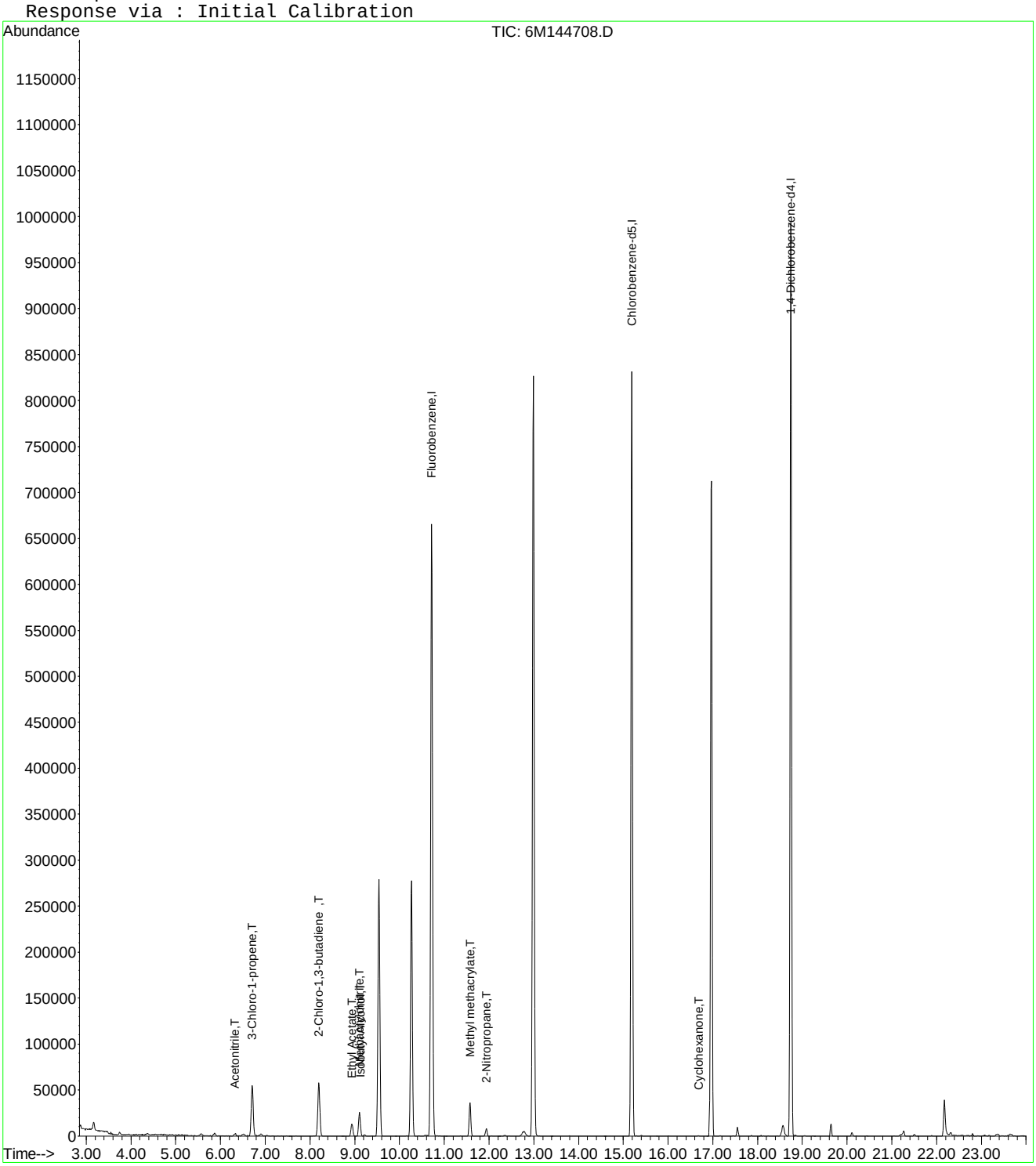
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	865370	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	638669	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	353919	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	3679	5.9467	ug/L		88
3) 3-Chloro-1-propene	6.70	41	52014	5.0135	ug/L		95
4) 2-Chloro-1,3-butadiene	8.19	53	60212	4.7023	ug/L		97
5) Ethyl Acetate	8.93	43	24851	4.4777	ug/L		98
6) Methacrylonitrile	9.10	67	13164	4.5054	ug/L		95
7) Isobutyl Alcohol	9.12	43	1340	7.4492	ug/L	#	85
9) Methyl methacrylate	11.57	41	25255	4.1589	ug/L		95
10) 2-Nitropropane	11.94	43	9310	3.7703	ug/L		96
13) Cyclohexanone	16.69	55	637	4.7569	ug/L	#	25

(#) = qualifier out of range (m) = manual integration
6M144708.D A9FOOWT.M Fri Jan 13 08:34:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:31 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	5.9467	-18.9	100	0.00
3	T	3-Chloro-1-propene	5.0000	5.0135	-0.3	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.7023	6.0	100	0.00
5	T	Ethyl Acetate	5.0000	4.4778	10.4	100	0.00
6	T	Methacrylonitrile	5.0000	4.5054	9.9	100	0.00
7	T	Isobutyl Alcohol	10.0000	7.4492	25.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	5.0000	4.1589	16.8	100	0.00
10	T	2-Nitropropane	-1.0000	3.7703	0.0	0	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	4.7569	0.0	0	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144708.D A9FOOWT.M Fri Jan 13 08:34:56 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

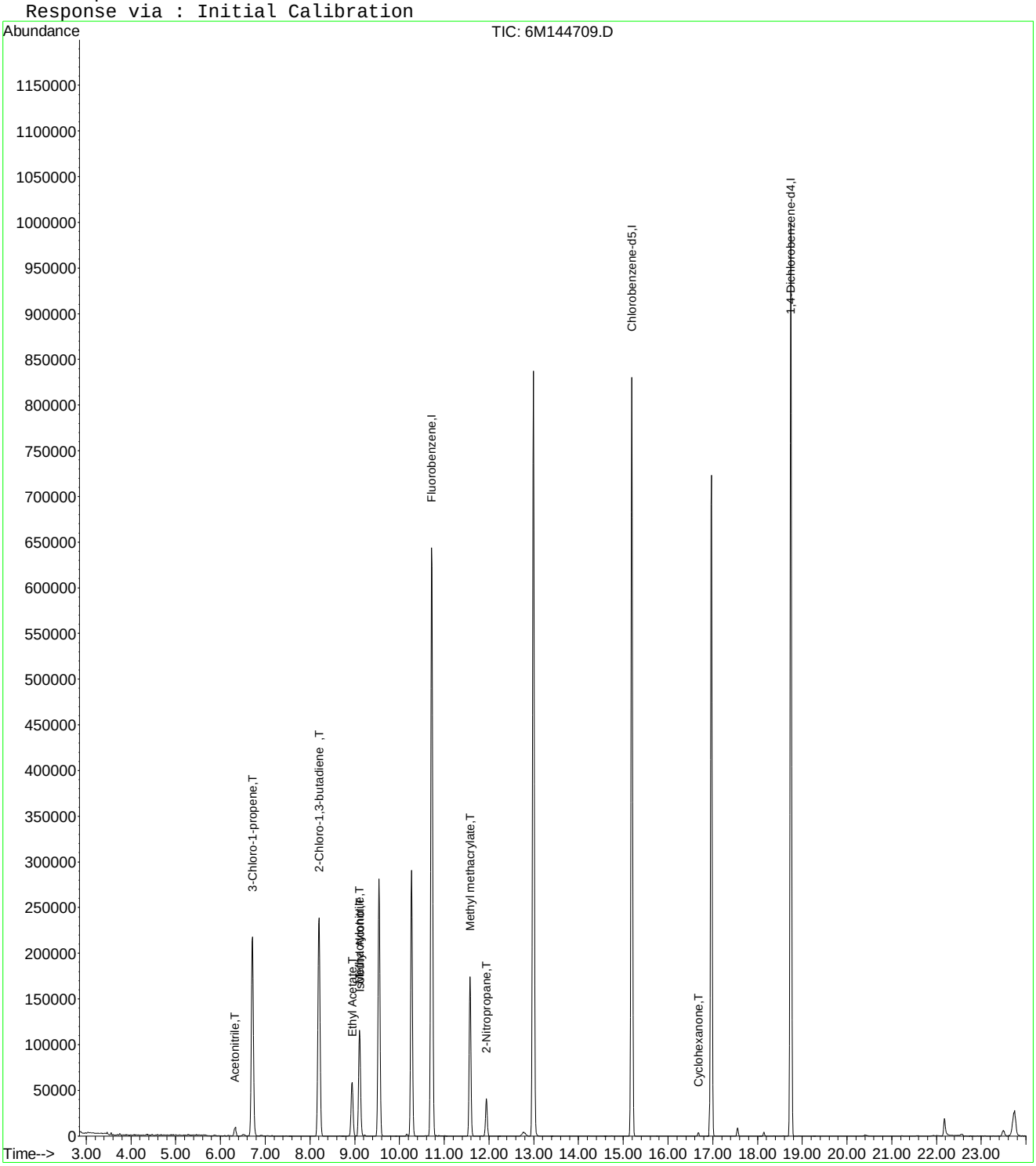
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	858255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	632728	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	350367	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	12918	21.0537	ug/L		97
3) 3-Chloro-1-propene	6.71	41	209633	20.3736	ug/L		94
4) 2-Chloro-1,3-butadiene	8.21	53	252913	19.9152	ug/L		96
5) Ethyl Acetate	8.94	43	112226	20.3889	ug/L		97
6) Methacrylonitrile	9.10	67	59955	20.6898	ug/L		93
7) Isobutyl Alcohol	9.11	43	8059	45.1723	ug/L	#	85
9) Methyl methacrylate	11.58	41	119041	19.7660	ug/L		97
10) 2-Nitropropane	11.94	43	43188	17.6351	ug/L		96
13) Cyclohexanone	16.68	55	2248	16.9576	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M144709.D A9FOOWT.M Fri Jan 13 08:34:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	21.0537	-5.3	100	0.00
3	T	3-Chloro-1-propene	20.0000	20.3736	-1.9	100	0.01
4	T	2-Chloro-1,3-butadiene	20.0000	19.9152	0.4	100	0.01
5	T	Ethyl Acetate	20.0000	20.3890	-1.9	100	0.01
6	T	Methacrylonitrile	20.0000	20.6898	-3.4	100	0.00
7	T	Isobutyl Alcohol	40.0000	45.1723	-12.9	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	20.0000	19.7660	1.2	100	0.00
10	T	2-Nitropropane	20.0000	17.6351	11.8	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	16.9576	15.2	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144709.D A9FOOWT.M Fri Jan 13 08:35:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:24 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

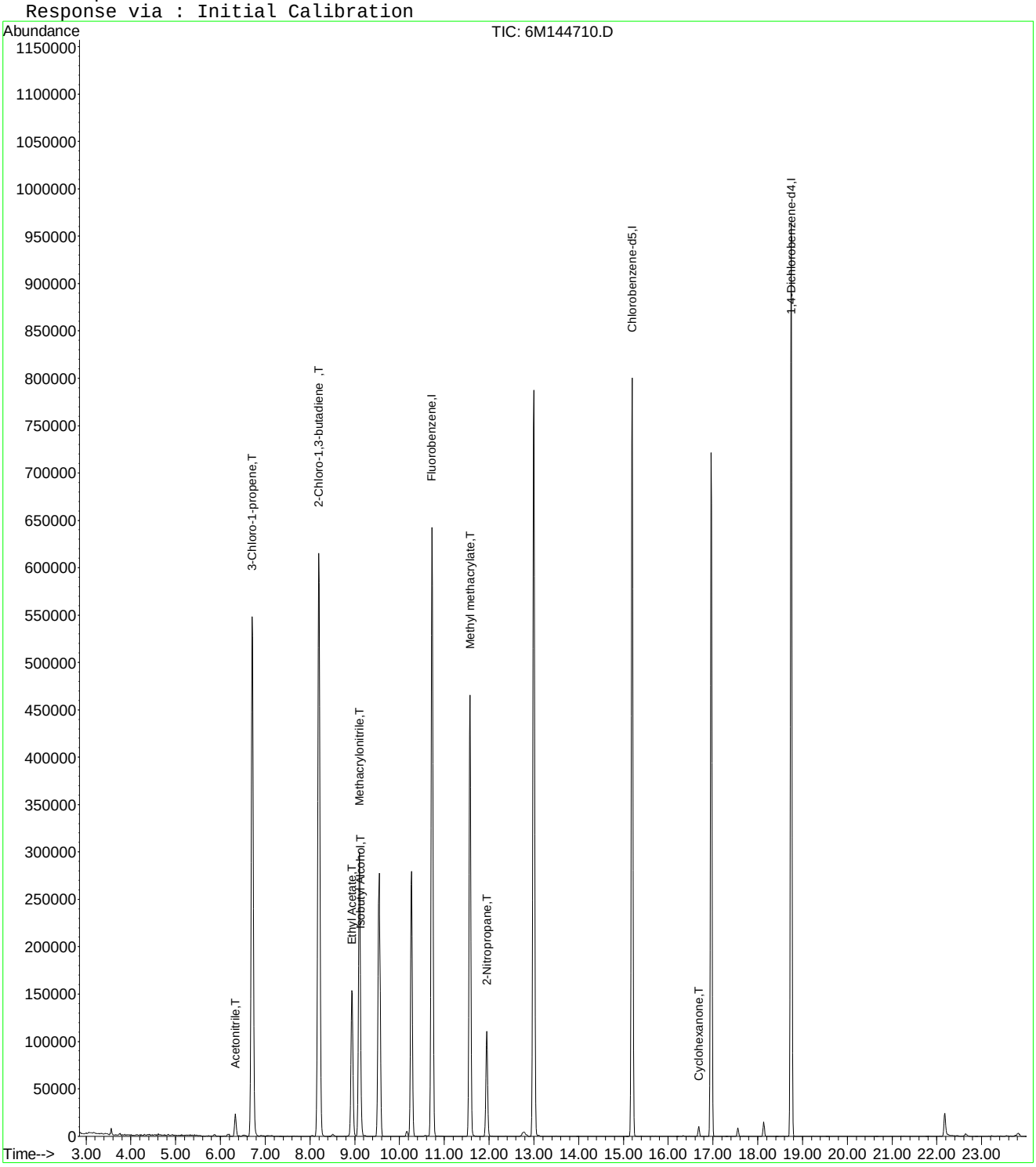
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	838990	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	618534	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	341738	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	29692	49.5030	ug/L		97
3) 3-Chloro-1-propene	6.71	41	515211	51.2215	ug/L		94
4) 2-Chloro-1,3-butadiene	8.20	53	637594	51.3592	ug/L		97
5) Ethyl Acetate	8.93	43	283978	52.7771	ug/L		97
6) Methacrylonitrile	9.11	67	149634	52.8227	ug/L		95
7) Isobutyl Alcohol	9.13	43	18800	107.7975	ug/L	#	86
9) Methyl methacrylate	11.58	41	310762	52.7848	ug/L		96
10) 2-Nitropropane	11.94	43	119051	49.7288	ug/L		97
13) Cyclohexanone	16.68	55	5849	45.2354	ug/L		91

(#) = qualifier out of range (m) = manual integration
6M144710.D A9FOOWT.M Fri Jan 13 08:34:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	49.5030	1.0	100	0.00
3	T	3-Chloro-1-propene	50.0000	51.2215	-2.4	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	51.3592	-2.7	100	0.00
5	T	Ethyl Acetate	50.0000	52.7771	-5.6	100	0.00
6	T	Methacrylonitrile	50.0000	52.8227	-5.6	100	0.00
7	T	Isobutyl Alcohol	100.0000	107.7975	-7.8	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	50.0000	52.7848	-5.6	100	0.00
10	T	2-Nitropropane	50.0000	49.7289	0.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	45.2354	9.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144710.D A9FOOWT.M Fri Jan 13 08:35:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

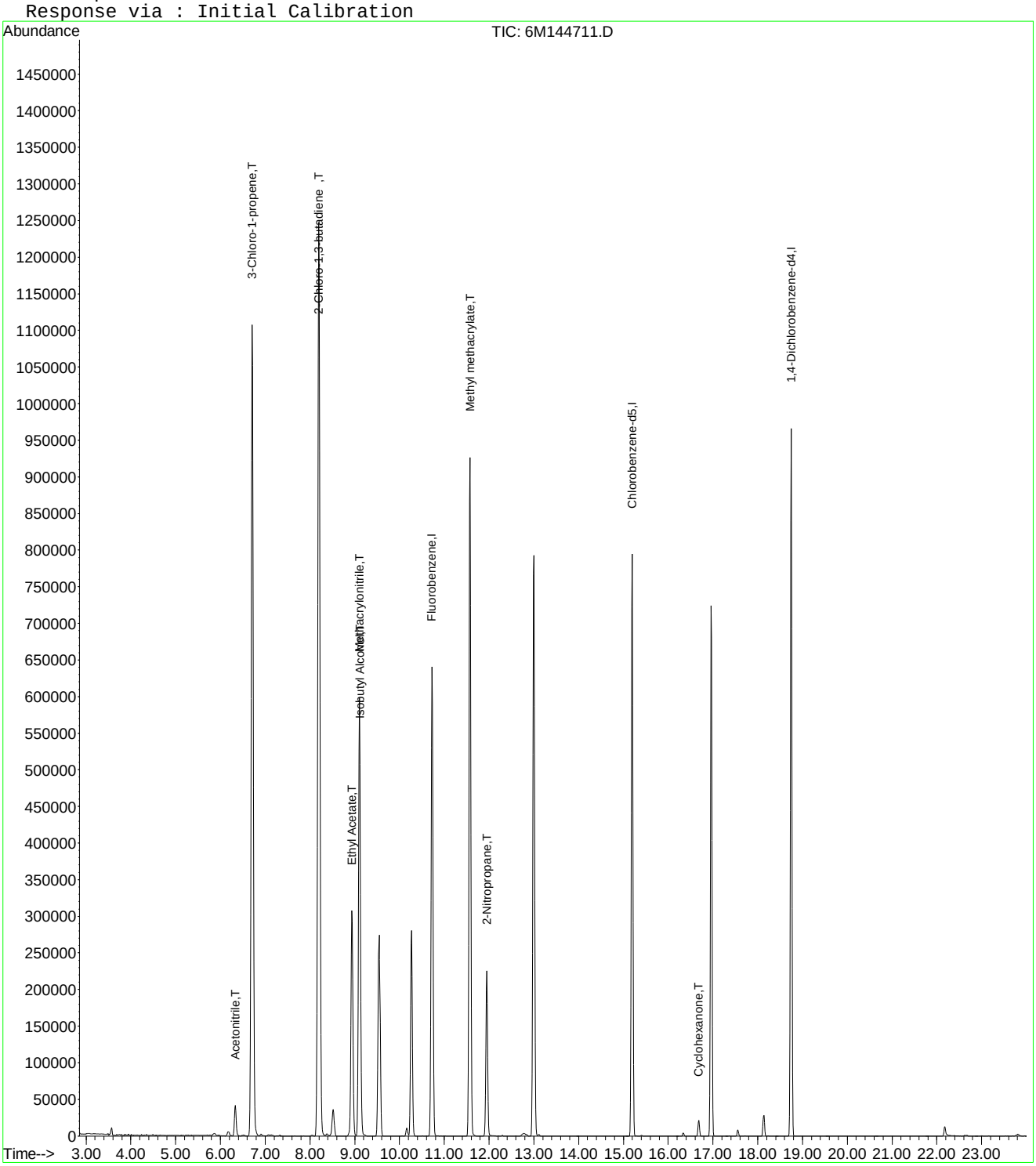
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 08:34:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 09:36:00 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

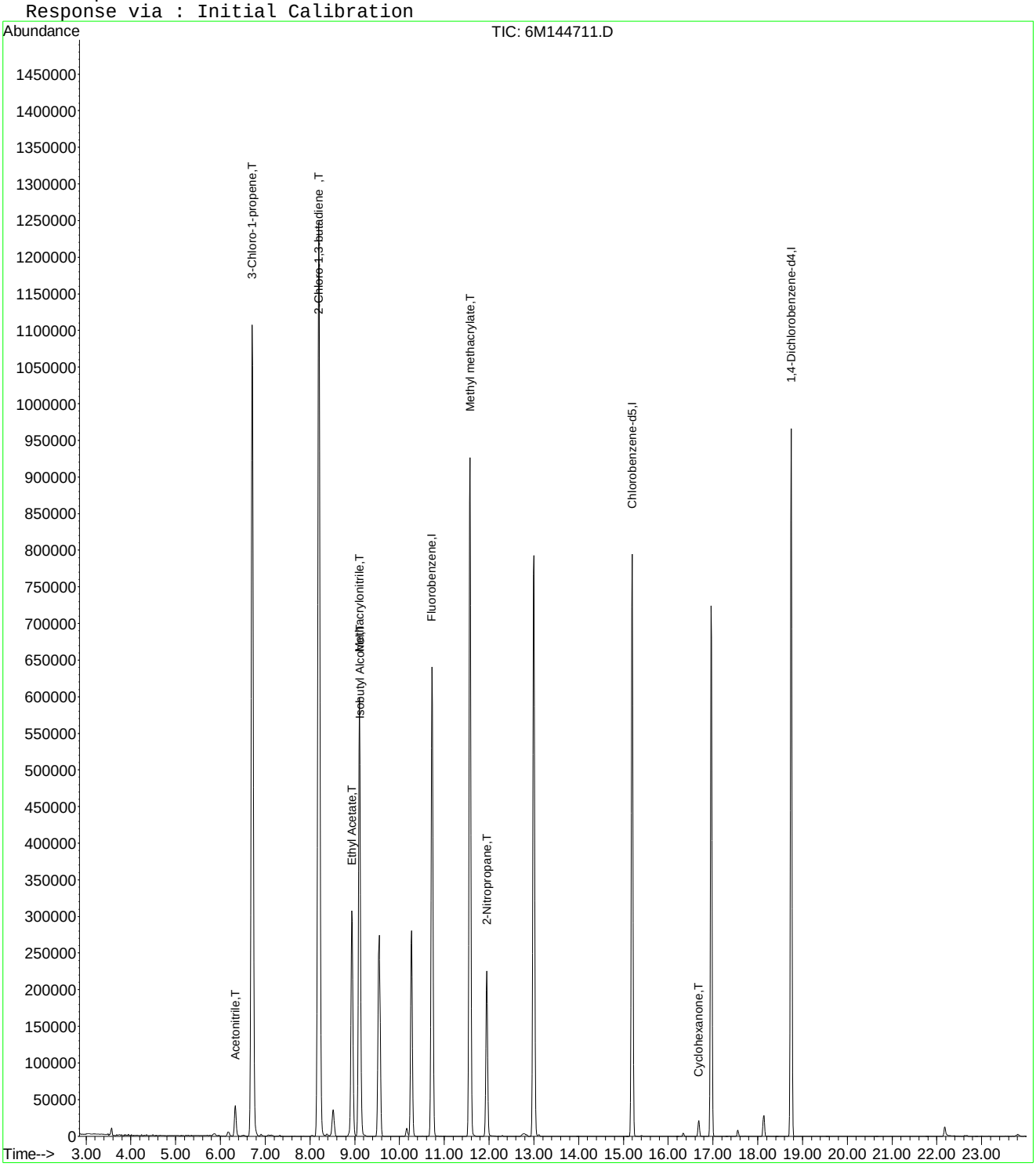
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 09:36:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 9:35 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	97.5407	2.5	100	0.00
3	T	3-Chloro-1-propene	100.0000	102.6783	-2.7	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	104.0084	-4.0	100	0.00
5	T	Ethyl Acetate	100.0000	103.6261	-3.6	100	0.00
6	T	Methacrylonitrile	100.0000	104.3479	-4.3	100	0.00
7	T	Isobutyl Alcohol	200.0000	210.2692	-5.1	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	100.0000	105.4552	-5.5	100	0.00
10	T	2-Nitropropane	100.0000	99.3433	0.7	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	86.0143	14.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144711.D A9FOOWT.M Fri Jan 13 09:36:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

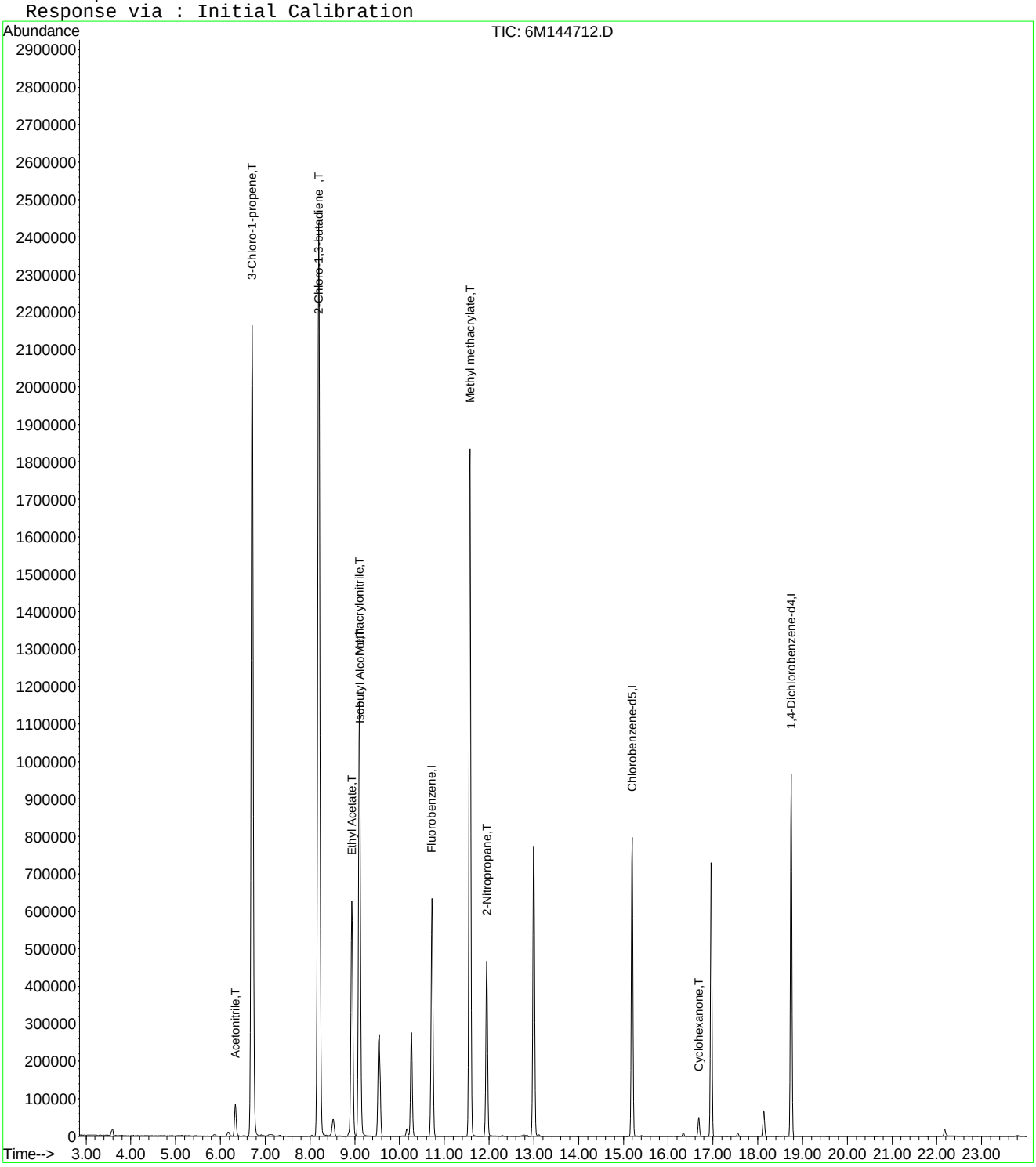
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	831063	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	617643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346241	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	117408	197.6116	ug/L		95
3) 3-Chloro-1-propene	6.71	41	2031969	203.9423	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	2539389	206.5027	ug/L		96
5) Ethyl Acetate	8.93	43	1134089	212.7800	ug/L		97
6) Methacrylonitrile	9.11	67	588766	209.8242	ug/L		92
7) Isobutyl Alcohol	9.12	43	69700	403.4656	ug/L	#	77
9) Methyl methacrylate	11.58	41	1251118	214.5369	ug/L		96
10) 2-Nitropropane	11.94	43	508471	214.4196	ug/L		98
13) Cyclohexanone	16.68	55	26625	203.2365	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144712.D A9FOOWT.M Fri Jan 13 08:34:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:06 2017 Quant Results File: A9FOOWT.RES

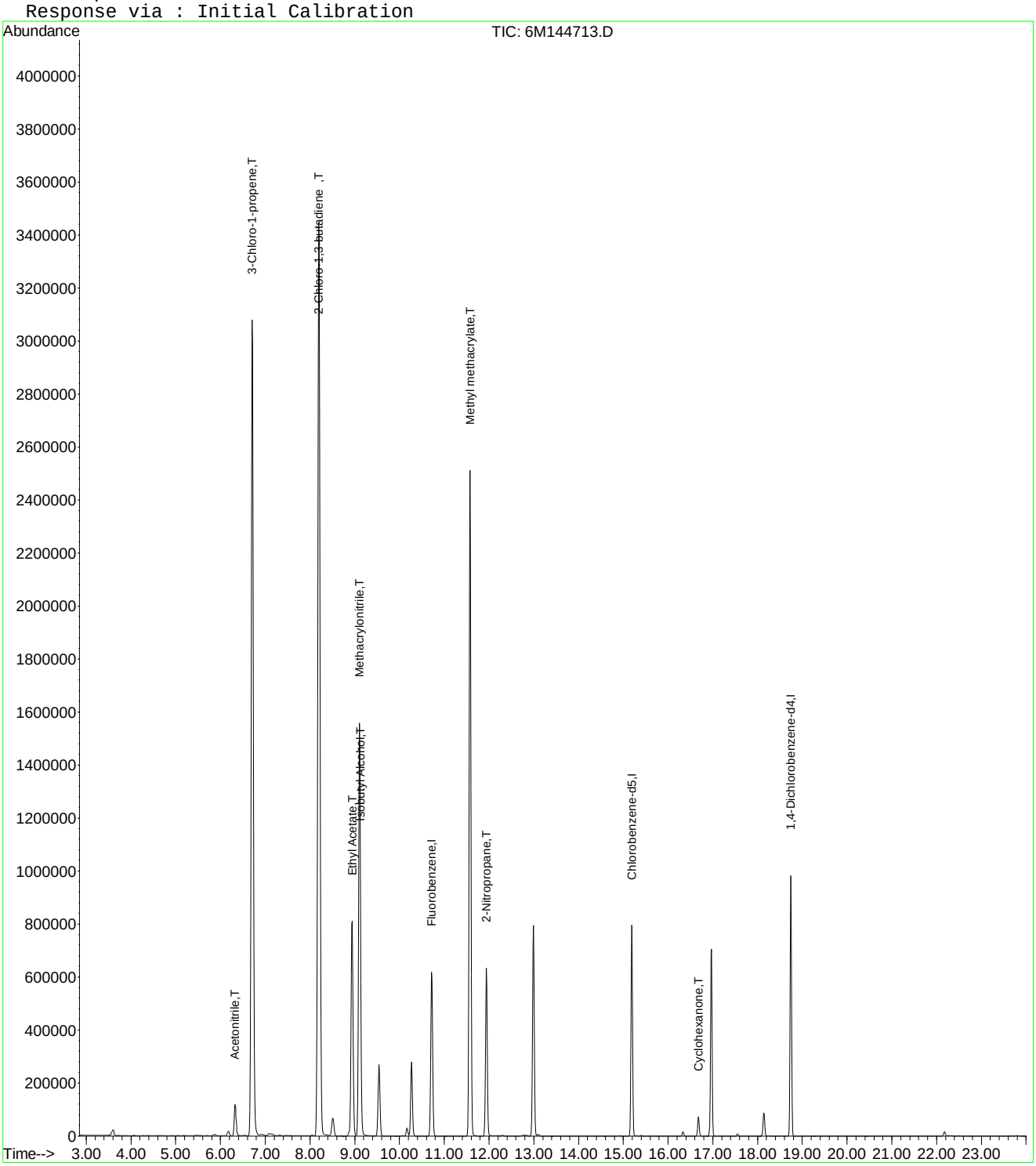
Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	820441	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	609250	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	347545	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	159684	272.2468	ug/L		94
3) 3-Chloro-1-propene	6.70	41	2909215	295.7689	ug/L		93
4) 2-Chloro-1,3-butadiene	8.19	53	3653381	300.9387	ug/L		97
5) Ethyl Acetate	8.94	43	1494846	284.0971	ug/L		98
6) Methacrylonitrile	9.10	67	791160	285.6036	ug/L		92
7) Isobutyl Alcohol	9.12	43	88161	516.9360	ug/L	#	85
9) Methyl methacrylate	11.57	41	1679549	291.7313	ug/L		97
10) 2-Nitropropane	11.94	43	685276	292.7186	ug/L		98
13) Cyclohexanone	16.68	55	38739	294.5967	ug/L		82

(#) = qualifier out of range (m) = manual integration
6M144713.D A9FOOWT.M Fri Jan 13 08:34:28 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:16 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

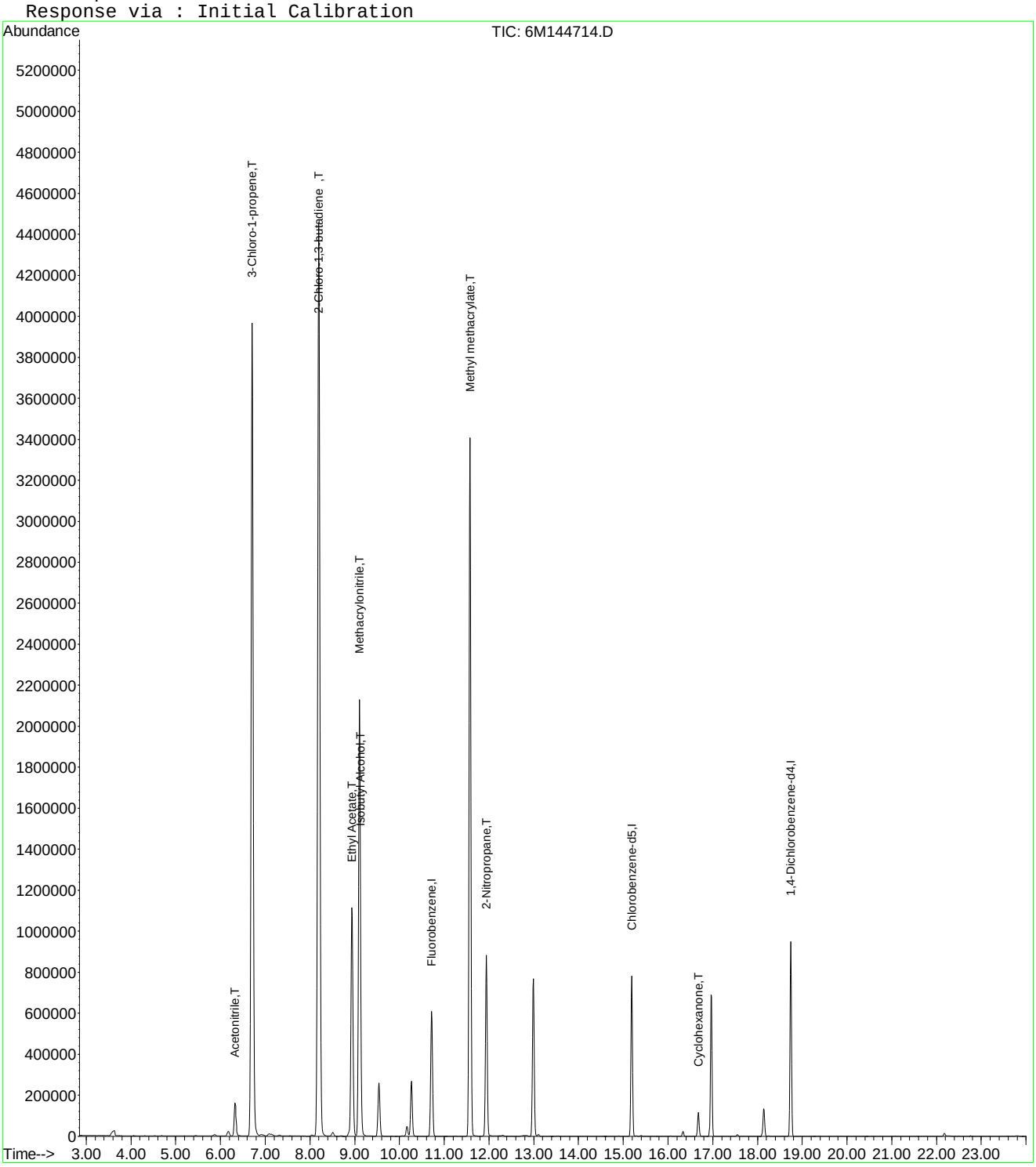
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	806744	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	606622	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	341512	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	218566	378.9620	ug/L		95
3) 3-Chloro-1-propene	6.70	41	3703442	382.9075	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	4659517	390.3333	ug/L		97
5) Ethyl Acetate	8.93	43	2048087	395.8497	ug/L		97
6) Methacrylonitrile	9.10	67	1071225	393.2708	ug/L		92
7) Isobutyl Alcohol	9.12	43	136765	815.5430	ug/L	#	75
9) Methyl methacrylate	11.58	41	2287798	404.1286	ug/L		96
10) 2-Nitropropane	11.94	43	962802	418.2475	ug/L		98
13) Cyclohexanone	16.68	55	59579	461.0815	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M144714.D A9FOOWT.M Fri Jan 13 08:34:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

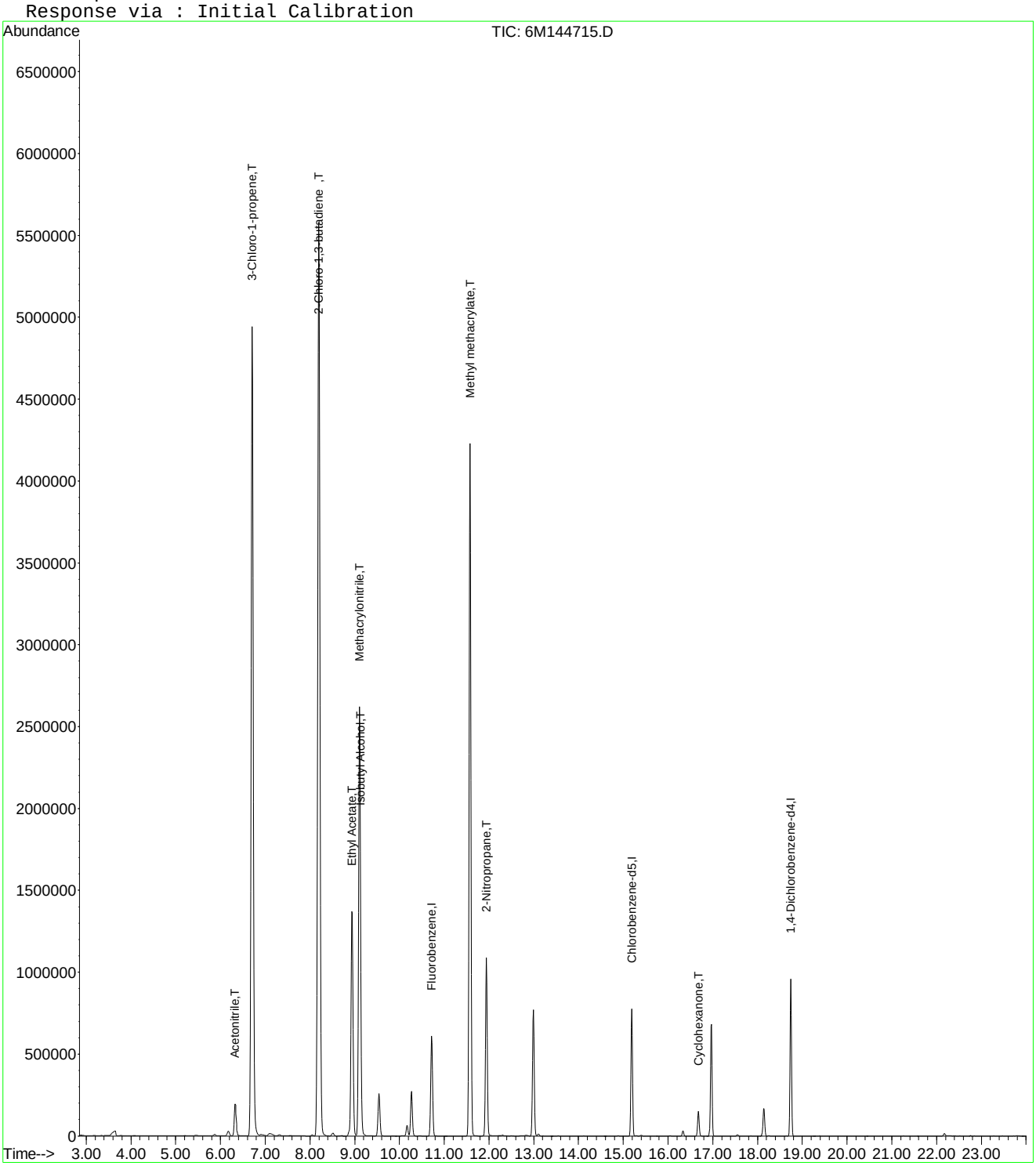
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	800443	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596335	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	335040	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	271689	474.7778	ug/L		94
3) 3-Chloro-1-propene	6.70	41	4627976	482.2639	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	5833383	492.5163	ug/L		97
5) Ethyl Acetate	8.93	43	2547971	496.3428	ug/L		97
6) Methacrylonitrile	9.10	67	1324536	490.0948	ug/L		92
7) Isobutyl Alcohol	9.12	43	184158	1106.7966	ug/L	#	75
9) Methyl methacrylate	11.58	41	2848365	507.1108	ug/L		97
10) 2-Nitropropane	11.94	43	1184018	518.3941	ug/L		98
13) Cyclohexanone	16.68	55	78367	618.1972	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144715.D A9FOOWT.M Fri Jan 13 08:34:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:45 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

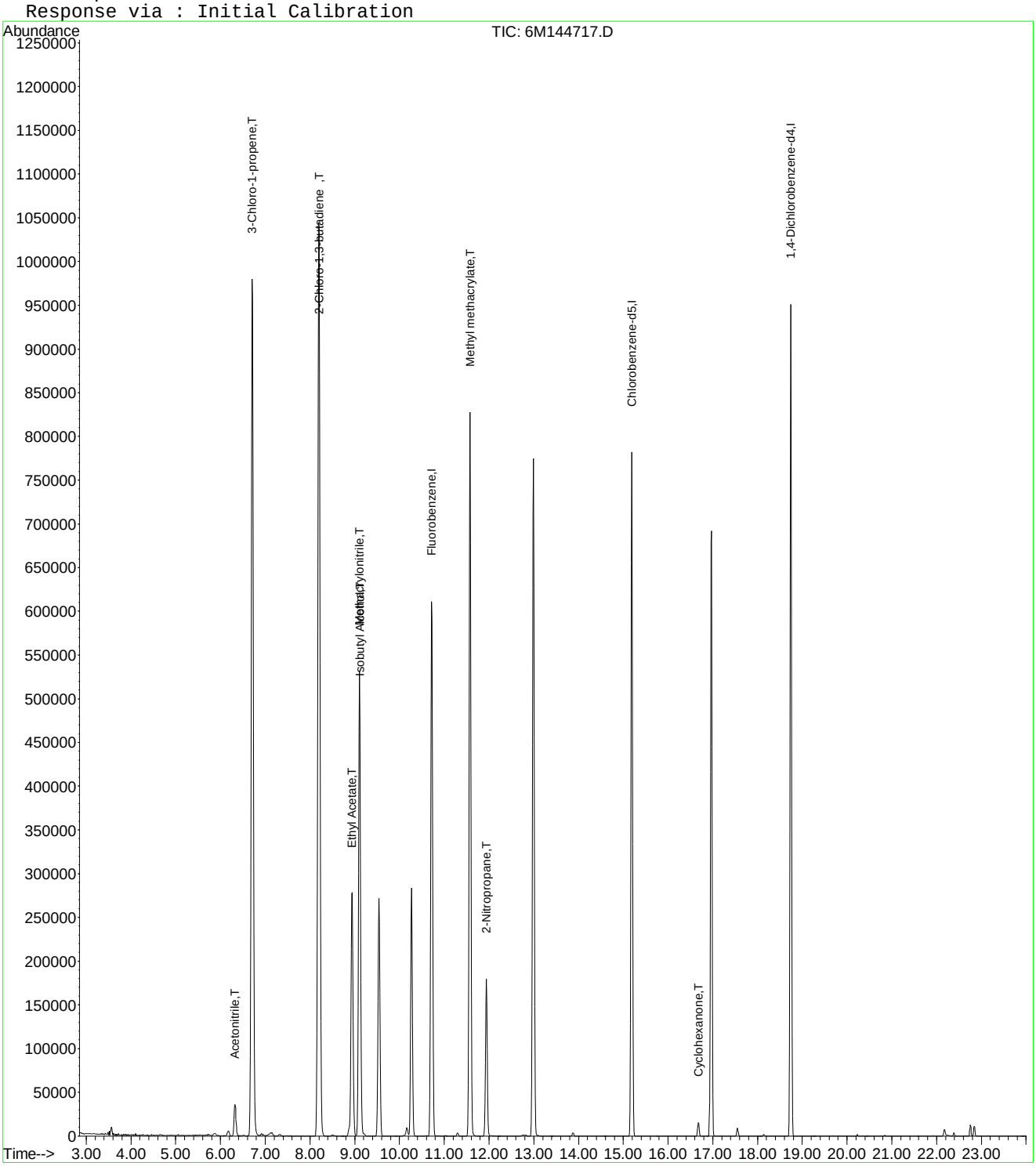
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	814360	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596096	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	332903	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	50370	86.5176	ug/L		93
3) 3-Chloro-1-propene	6.70	41	925364	94.7808	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1105734	91.7624	ug/L		97
5) Ethyl Acetate	8.93	43	511531	97.9429	ug/L		98
6) Methacrylonitrile	9.10	67	268526	97.6600	ug/L		92
7) Isobutyl Alcohol	9.11	43	30815	182.0344	ug/L	#	85
9) Methyl methacrylate	11.57	41	547496	95.8081	ug/L		96
10) 2-Nitropropane	11.94	43	194232	83.5866	ug/L		98
13) Cyclohexanone	16.68	55	8825	70.0628	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144717.D A9FOOWT.M Fri Jan 13 08:34:35 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	96	0.00
2	T	Acetonitrile	100.0000	86.5176	13.5	85	0.00
3	T	3-Chloro-1-propene	100.0000	94.7808	5.2	89	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	91.7624	8.2	85	0.00
5	T	Ethyl Acetate	100.0000	97.9429	2.1	91	0.00
6	T	Methacrylonitrile	100.0000	97.6600	2.3	90	0.00
7	T	Isobutyl Alcohol	200.0000	182.0344	9.0	83	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	100.0000	95.8081	4.2	88	0.00
10	T	2-Nitropropane	100.0000	83.5866	16.4	81	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	97	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	96	0.00
13	T	Cyclohexanone	100.0000	70.0628	29.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144717.D A9FOOWT.M Fri Jan 13 08:36:19 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	640408	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	444925	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226775	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	13.23	98	192	0.0085	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	2815	0.2769	ug/L #	64
3) Chloromethane	4.03	50	6905	Below Cal		88
4) Vinyl Chloride	4.28	62	3256	0.2803	ug/L	87
5) 1,3-Butadiene	4.33	54	2170	Below Cal		73
6) Bromomethane	5.23	94	1315	0.2622	ug/L	87
7) Chloroethane	5.40	64	1308	0.2617	ug/L #	43
8) Trichlorofluoromethane	5.90	101	3191	0.2680	ug/L #	92
10) Isoprene	6.49	67	2782	0.2840	ug/L #	60
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1282	0.1902	ug/L #	63
13) Acetone	6.76	43	1442	1.0435	ug/L #	48
14) 1,1-Dichloroethene	7.02	61	2988	0.3060	ug/L	96
16) Dimethyl Sulfide	7.28	62	1851	0.2653	ug/L	61
17) Iodomethane	7.54	142	460	0.8640	ug/L #	32
19) Methylene Chloride	7.79	84	2606	0.3531	ug/L	59
20) Carbon Disulfide	7.86	76	6466	0.3077	ug/L	98
22) Methyl Tert Butyl Ether	8.01	73	5425	0.3352	ug/L #	49
23) trans-1,2-Dichloroethene	8.26	96	1807	0.2572	ug/L	86
24) n-Hexane	8.33	57	2597	0.3268	ug/L	76
27) 1,1-Dichloroethane	8.87	63	3092	0.2656	ug/L	88
31) 2,2-Dichloropropane	9.64	77	1800	0.2033	ug/L #	31
32) cis-1,2-Dichloroethene	9.72	96	2213	0.2865	ug/L	84
33) Chloroform	9.92	83	5055	0.3812	ug/L #	83
35) Bromochloromethane	10.14	130	638	0.1569	ug/L	91
38) 1,1,1-Trichloroethane	10.45	97	3279	0.3042	ug/L #	50
39) Cyclohexane	10.48	56	2906	0.2915	ug/L #	75
40) 1,1-Dichloropropene	10.65	75	2741	0.3008	ug/L	77
45) 1,2-Dichloroethane	10.96	62	2340	0.2837	ug/L #	52
46) Benzene	11.01	78	9356	0.3415	ug/L #	79
47) Trichloroethene	11.75	130	2089	0.2801	ug/L #	65
48) Methylcyclohexane	11.85	83	3351	0.3110	ug/L	80
49) 1,2-Dichloropropane	11.97	63	2128	0.3291	ug/L #	53
51) Bromodichloromethane	12.27	83	2341	0.2564	ug/L	98
52) Dibromomethane	12.35	93	743	0.1951	ug/L	91
55) cis-1,3-Dichloropropene	12.90	75	2460	0.2447	ug/L #	77
56) Dimethyl Disulfide	13.17	79	1308	0.2062	ug/L #	47
59) Toluene	13.33	91	9335	0.3356	ug/L	99
60) Ethyl Methacrylate	13.40	69	1912	0.2840	ug/L	78
62) trans-1,3-Dichloropropene	13.48	75	2047	0.2387	ug/L #	51
63) 1,1,2-Trichloroethane	13.72	97	1325	0.2528	ug/L	83
64) 2-Hexanone	13.64	43	717	0.2848	ug/L #	28

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

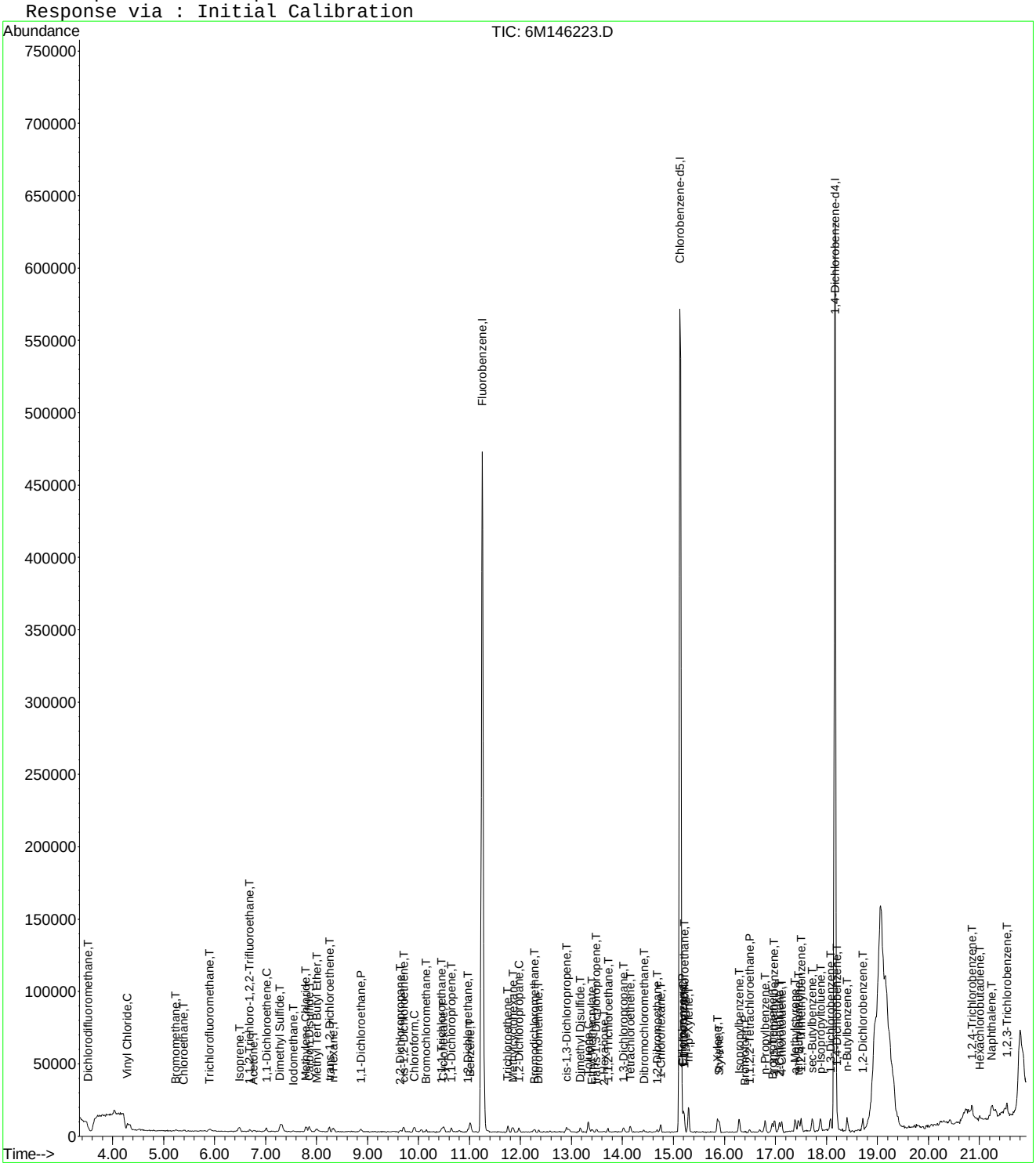
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
65)	1,3-Dichloropropane	14.03	76	2632	0.2991 ug/L		73
66)	Tetrachloroethene	14.16	166	2146	0.3184 ug/L		92
67)	Dibromochloromethane	14.42	129	1611	0.2486 ug/L		96
68)	1,2-Dibromoethane	14.68	107	1255	0.2493 ug/L		83
69)	1-Chlorohexane	14.75	91	2852	0.3175 ug/L		77
70)	Chlorobenzene	15.18	112	5819	0.3056 ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	1834	0.2690 ug/L	#	36
72)	Ethylbenzene	15.20	106	3131	0.3038 ug/L		92
73)	m-,p-Xylene	15.29	106	7511	0.6097 ug/L		97
74)	o-Xylene	15.86	106	3485	0.2932 ug/L		89
75)	Styrene	15.89	104	6272	0.3143 ug/L		93
76)	Bromoform	16.40	173	562	0.1423 ug/L	#	35
77)	Isopropylbenzene	16.29	105	10184	0.3423 ug/L		93
79)	1,1,2,2-Tetrachloroethane	16.50	83	1871	0.3168 ug/L		77
83)	n-Propylbenzene	16.79	91	11774	0.3429 ug/L	#	93
84)	Bromobenzene	16.95	156	2344	0.3039 ug/L	#	63
85)	1,3,5-Trimethylbenzene	16.98	105	7944	0.3265 ug/L		95
86)	2-Chlorotoluene	17.08	91	7914	0.3462 ug/L		93
87)	4-Chlorotoluene	17.12	91	6658	0.3295 ug/L	#	94
88)	a-Methylstyrene	17.38	118	3803	0.2826 ug/L		94
89)	tert-Butylbenzene	17.46	134	1349	0.2646 ug/L		32
90)	1,2,4-Trimethylbenzene	17.51	105	8218	0.3289 ug/L		89
91)	sec-Butylbenzene	17.72	105	10323	0.3440 ug/L		91
92)	p-Isopropyltoluene	17.89	119	8482	0.3360 ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	4887	0.3355 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5055	0.3432 ug/L	#	53
95)	n-Butylbenzene	18.41	91	8369	0.3631 ug/L		92
96)	1,2-Dichlorobenzene	18.71	146	4262	0.3121 ug/L		90
98)	1,2,4-Trichlorobenzene	20.86	180	3679	0.3683 ug/L		84
99)	Hexachlorobutadiene	21.01	225	1397	0.3661 ug/L		82
100)	Naphthalene	21.23	128	6133	0.3066 ug/L		94
101)	1,2,3-Trichlorobenzene	21.54	180	3447	0.3574 ug/L	#	77

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2769	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.2012	0.0	0	0.01
4	C	Vinyl Chloride	-1.0000	0.2803	0.0	0	0.01
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.2622	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.2617	0.0	100	0.02
8	T	Trichlorofluoromethane	-1.0000	0.2680	0.0	100	0.00
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.2840	0.0	100	0.02
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.1902	0.0	100	0.00
13	T	Acetone	-1.0000	1.0435	0.0	100	-0.01
14	C	1,1-Dichloroethene	-1.0000	0.3060	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.2653	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8640	0.0	0	0.01
18	T	Methyl acetate	-1.0000	0.0537	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3531	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3077	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3352	0.0	100	-0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.2572	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.3268	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.0000	0.0	0	-8.83#
27	P	1,1-Dichloroethane	-1.0000	0.2656	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.41#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	-1.0000	0.2033	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2865	0.0	100	0.00
33	C	Chloroform	0.3000	0.3812	-27.1#	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	-1.0000	0.1569	0.0	0	-0.01
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-10.18#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	-1.0000	0.3042	0.0	100	-0.01
39	T	Cyclohexane	-1.0000	0.2915	0.0	100	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.3008	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.1105	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	-1.0000	0.2837	0.0	100	0.00
46	T	Benzene	-1.0000	0.3415	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2801	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3110	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.3291	0.0	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	-1.0000	0.2564	0.0	100	0.00
52	T	Dibromomethane	-1.0000	0.1951	0.0	100	-0.01
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.0000	0.0	0	-12.56#
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.59#

(#) = Out of Range
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2447	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2062	0.0	100	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0085	0.0	100	0.00
59	C	Toluene	-1.0000	0.3356	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2840	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2387	0.0	100	-0.01
63	T	1,1,2-Trichloroethane	-1.0000	0.2528	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.2848	0.0	100	0.00
65	T	1,3-Dichloropropane	-1.0000	0.2991	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.3184	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2486	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2493	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.3175	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3056	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2690	0.0	100	0.00
72	C	Ethylbenzene	-1.0000	0.3038	0.0	100	0.00
73	T	m-,p-Xylene	-1.0000	0.6097	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2932	0.0	100	0.00
75	T	Styrene	-1.0000	0.3143	0.0	100	-0.01
76	P	Bromoform	-1.0000	0.1423	0.0	100	0.00
77	T	Isopropylbenzene	-1.0000	0.3423	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3168	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-16.69#
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	-1.0000	0.3429	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.3039	-1.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.3265	0.0	100	-0.01
86	T	2-Chlorotoluene	-1.0000	0.3462	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3295	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2826	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2646	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.3289	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.3440	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3360	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3355	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3432	-14.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.3631	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.3121	-4.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.3683	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.3661	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.3066	0.0	100	-0.01
101	T	1,2,3-Trichlorobenzene	0.3000	0.3574	-19.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	626609	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	442971	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226791	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	3419	0.3437	ug/L #	64
3) Chloromethane	4.04	50	7947	Below Cal		96
4) Vinyl Chloride	4.29	62	5656	0.4976	ug/L	98
5) 1,3-Butadiene	4.34	54	2862	Below Cal	#	60
6) Bromomethane	5.23	94	1597	0.3254	ug/L	99
7) Chloroethane	5.40	64	1845	0.3772	ug/L #	43
8) Trichlorofluoromethane	5.91	101	4335	0.3721	ug/L #	93
10) Isoprene	6.48	67	3687	0.3847	ug/L	68
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	2169	0.3289	ug/L	74
13) Acetone	6.77	43	782	0.5783	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	3813	0.3991	ug/L	83
16) Dimethyl Sulfide	7.28	62	2499	0.3661	ug/L #	56
17) Iodomethane	7.55	142	506	0.8739	ug/L #	32
18) Methyl acetate	7.54	43	953	0.2810	ug/L #	66
19) Methylene Chloride	7.79	84	3151	0.4363	ug/L	69
20) Carbon Disulfide	7.86	76	8568	0.4167	ug/L	96
22) Methyl Tert Butyl Ether	8.00	73	6676	0.4215	ug/L #	68
23) trans-1,2-Dichloroethene	8.25	96	2699	0.3926	ug/L	77
24) n-Hexane	8.32	57	3415	0.4392	ug/L	70
26) Vinyl Acetate	8.83	43	1421	0.2892	ug/L #	78
27) 1,1-Dichloroethane	8.87	63	4613	0.4050	ug/L #	77
29) 2-Butanone	9.41	43	260	0.1526	ug/L #	57
31) 2,2-Dichloropropane	9.64	77	3882	0.4480	ug/L	72
32) cis-1,2-Dichloroethene	9.72	96	3041	0.4023	ug/L	76
33) Chloroform	9.92	83	5917	0.4561	ug/L #	88
35) Bromochloromethane	10.15	130	1328	0.3338	ug/L	91
36) Tetrahydrofuran	10.17	42	200	0.1782	ug/L #	41
38) 1,1,1-Trichloroethane	10.45	97	4059	0.3848	ug/L	83
39) Cyclohexane	10.49	56	3820	0.3916	ug/L	75
40) 1,1-Dichloropropene	10.64	75	3280	0.3679	ug/L	86
42) Carbon Tetrachloride	10.80	117	2236	0.2688	ug/L #	79
45) 1,2-Dichloroethane	10.97	62	3278	0.4061	ug/L #	68
46) Benzene	11.01	78	12127	0.4523	ug/L	84
47) Trichloroethene	11.76	130	2885	0.3953	ug/L	71
48) Methylcyclohexane	11.85	83	4224	0.4006	ug/L	83
49) 1,2-Dichloropropane	11.97	63	2324	0.3673	ug/L	84
51) Bromodichloromethane	12.27	83	3345	0.3745	ug/L	82
52) Dibromomethane	12.36	93	1227	0.3293	ug/L	99
53) 2-Chloroethyl Vinyl Ether	12.55	63	709	0.2857	ug/L #	41
55) cis-1,3-Dichloropropene	12.90	75	3464	0.3522	ug/L #	77

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

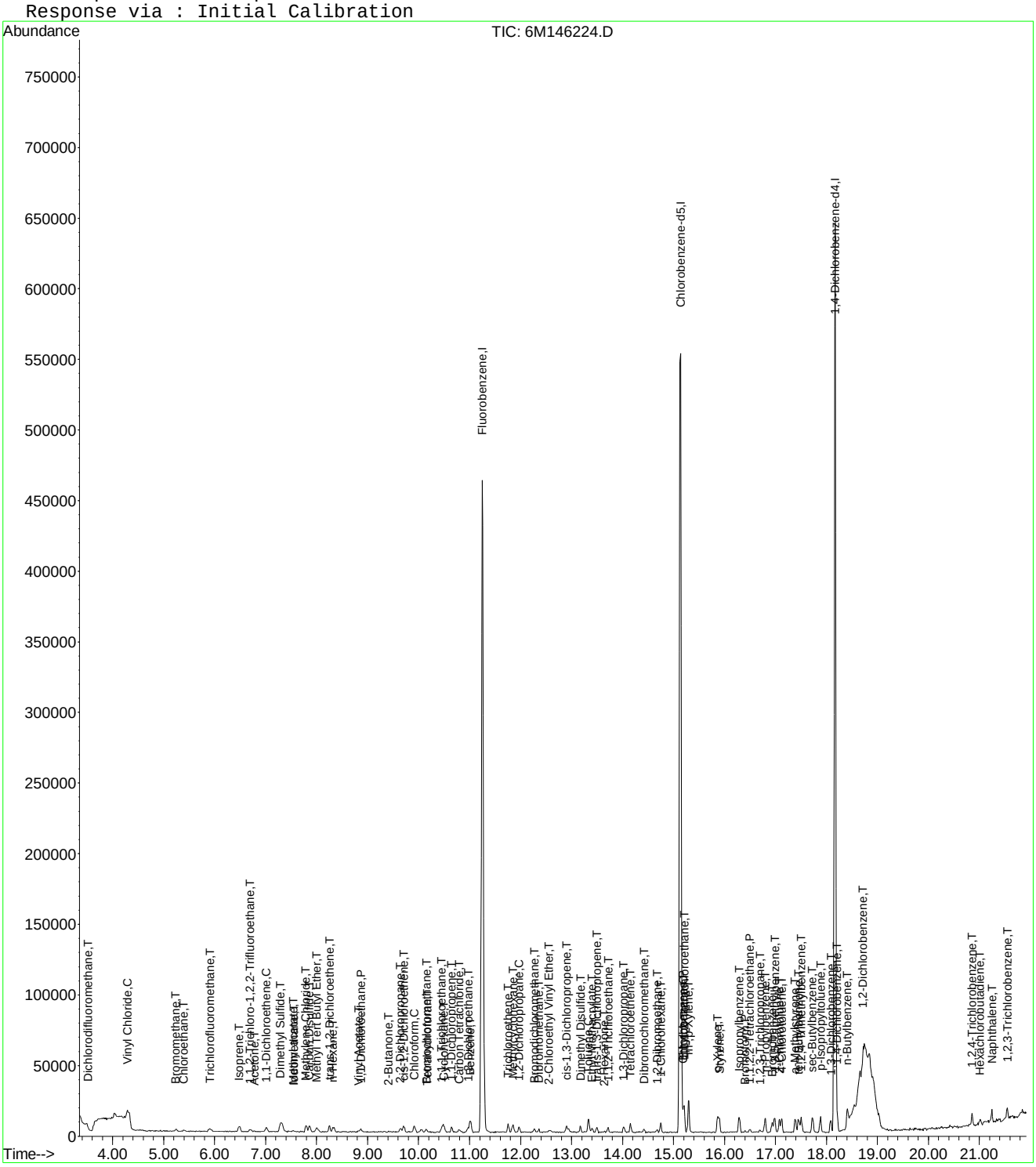
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
56)	Dimethyl Disulfide	13.18	79	1794	0.2891 ug/L	#	47
59)	Toluene	13.33	91	11706	0.4227 ug/L		96
60)	Ethyl Methacrylate	13.40	69	2704	0.4035 ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	3001	0.3514 ug/L		88
63)	1,1,2-Trichloroethane	13.72	97	1935	0.3708 ug/L		97
64)	2-Hexanone	13.64	43	838	0.3344 ug/L	#	28
65)	1,3-Dichloropropane	14.02	76	3430	0.3915 ug/L		80
66)	Tetrachloroethene	14.16	166	2515	0.3748 ug/L		90
67)	Dibromochloromethane	14.42	129	2281	0.3536 ug/L		87
68)	1,2-Dibromoethane	14.68	107	2013	0.4017 ug/L		91
69)	1-Chlorohexane	14.75	91	3553	0.3973 ug/L		75
70)	Chlorobenzene	15.19	112	7763	0.4095 ug/L		93
71)	1,1,1,2-Tetrachloroethane	15.21	131	2463	0.3628 ug/L	#	36
72)	Ethylbenzene	15.20	106	4250	0.4142 ug/L		92
73)	m-,p-Xylene	15.29	106	10084	0.8222 ug/L		94
74)	o-Xylene	15.86	106	4446	0.3756 ug/L		95
75)	Styrene	15.90	104	7608	0.3829 ug/L		91
76)	Bromoform	16.40	173	1201	0.3055 ug/L	#	50
77)	Isopropylbenzene	16.29	105	12585	0.4249 ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	2532	0.4287 ug/L		74
81)	1,2,3-Trichloropropane	16.70	110	576	0.3302 ug/L	#	1
83)	n-Propylbenzene	16.80	91	14774	0.4303 ug/L	#	96
84)	Bromobenzene	16.93	156	3090	0.4006 ug/L		70
85)	1,3,5-Trimethylbenzene	16.99	105	10064	0.4136 ug/L		97
86)	2-Chlorotoluene	17.08	91	9917	0.4337 ug/L		94
87)	4-Chlorotoluene	17.12	91	8689	0.4300 ug/L		97
88)	a-Methylstyrene	17.38	118	4762	0.3539 ug/L		99
89)	tert-Butylbenzene	17.46	134	1902	0.3730 ug/L		48
90)	1,2,4-Trimethylbenzene	17.51	105	10085	0.4035 ug/L		86
91)	sec-Butylbenzene	17.72	105	13346	0.4447 ug/L		93
92)	p-Isopropyltoluene	17.88	119	10657	0.4222 ug/L		97
93)	1,3-Dichlorobenzene	18.09	146	6333	0.4347 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5959	0.4045 ug/L		98
95)	n-Butylbenzene	18.41	91	10090	0.4377 ug/L		88
96)	1,2-Dichlorobenzene	18.71	146	5766	0.4223 ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	4424	0.4428 ug/L		85
99)	Hexachlorobutadiene	21.01	225	1728	0.4528 ug/L		78
100)	Naphthalene	21.24	128	8285	0.4141 ug/L		94
101)	1,2,3-Trichlorobenzene	21.55	180	4343	0.4503 ug/L		83

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3437	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.0968	0.0	0	0.02
4	C	Vinyl Chloride	0.4000	0.4976	-24.4#	100	0.02
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.3254	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.3772	0.0	100	0.02
8	T	Trichlorofluoromethane	0.4000	0.3721	7.0	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.3847	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3289	0.0	100	0.00
13	T	Acetone	-1.0000	0.5783	0.0	100	0.00
14	C	1,1-Dichloroethene	0.4000	0.3991	0.2	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.3661	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8739	0.0	0	0.02
18	T	Methyl acetate	-1.0000	0.2810	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4363	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.4167	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.4215	0.0	100	-0.02
23	T	trans-1,2-Dichloroethene	0.4000	0.3926	1.9	100	0.00
24	T	n-Hexane	-1.0000	0.4392	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.2892	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.4051	-1.3	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.1526	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	0.4000	0.4480	-12.0	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.4023	-0.6	100	0.00
33	C	Chloroform	0.4000	0.4561	-14.0	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	0.4000	0.3338	16.6	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.1782	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	0.4000	0.3848	3.8	100	-0.01
39	T	Cyclohexane	-1.0000	0.3916	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3679	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.2688	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	0.4000	0.4061	-1.5	100	0.00
46	T	Benzene	0.4000	0.4523	-13.1	100	0.00
47	T	Trichloroethene	0.4000	0.3953	1.2	100	0.00
48	T	Methylcyclohexane	-1.0000	0.4006	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3673	8.2	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	0.4000	0.3745	6.4	100	0.00
52	T	Dibromomethane	0.4000	0.3293	17.7	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.2857	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.1142	0.0	100	0.00

(#) = Out of Range
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3522	12.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2891	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0000	0.0	0	-13.23#
59	C	Toluene	0.4000	0.4227	-5.7	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.4035	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3514	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3708	7.3	100	0.00
64	T	2-Hexanone	-1.0000	0.3344	0.0	100	0.00
65	T	1,3-Dichloropropane	0.4000	0.3915	2.1	100	0.00
66	T	Tetrachloroethene	0.4000	0.3748	6.3	100	0.00
67	T	Dibromochloromethane	0.4000	0.3535	11.6	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.4017	-0.4	100	0.00
69	T	1-Chlorohexane	0.4000	0.3973	0.7	100	0.00
70	P	Chlorobenzene	0.4000	0.4096	-2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3628	9.3	100	0.00
72	C	Ethylbenzene	0.4000	0.4142	-3.5	100	0.00
73	T	m-,p-Xylene	0.8000	0.8222	-2.8	100	0.00
74	T	o-Xylene	-1.0000	0.3756	0.0	100	0.00
75	T	Styrene	0.4000	0.3829	4.3	100	0.00
76	P	Bromoform	-1.0000	0.3055	0.0	100	0.00
77	T	Isopropylbenzene	0.4000	0.4249	-6.2	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.4287	-7.2	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.3302	0.0	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	0.4000	0.4303	-7.6	100	0.00
84	T	Bromobenzene	0.4000	0.4006	-0.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.4136	-3.4	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4338	-8.4	100	0.00
87	T	4-Chlorotoluene	0.4000	0.4300	-7.5	100	0.00
88	T	a-Methylstyrene	-1.0000	0.3539	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3730	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.4035	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4447	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.4222	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.4347	-8.7	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4045	-1.1	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4377	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.4223	-5.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	0.4000	0.4428	-10.7	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.4528	-13.2	100	0.00
100	T	Naphthalene	0.4000	0.4141	-3.5	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.4503	-12.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	632181	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	444070	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	224733	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	3097	0.4799	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.92%#		
43) 1,2-Dichloroethane-d4	10.85	65	2998	0.4714	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	13.24	98	11387	0.5025	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	2.00%#		
80) p-Bromofluorobenzene	16.64	95	4328	0.5071	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.04%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	9629	0.9593	ug/L #	85
3) Chloromethane	4.04	50	18344	0.8003	ug/L	93
4) Vinyl Chloride	4.28	62	12799	1.1160	ug/L	96
5) 1,3-Butadiene	4.34	54	8885	0.7170	ug/L	88
6) Bromomethane	5.24	94	4461	0.9009	ug/L	95
7) Chloroethane	5.40	64	4858	0.9845	ug/L	80
8) Trichlorofluoromethane	5.91	101	11643	0.9905	ug/L	95
9) Diethyl ether	6.44	59	24166	4.9333	ug/L	82
10) Isoprene	6.48	67	8997	0.9306	ug/L	79
11) Acrolein	6.68	56	678	1.2633	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	6814	1.0241	ug/L	88
13) Acetone	6.77	43	1642	1.2036	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	9339	0.9690	ug/L	75
15) Tert-Butyl Alcohol	7.10	59	3988	9.4246	ug/L #	57
16) Dimethyl Sulfide	7.27	62	6552	0.9514	ug/L	98
17) Iodomethane	7.55	142	2740	1.2641	ug/L	83
18) Methyl acetate	7.54	43	3105	0.9075	ug/L #	66
19) Methylene Chloride	7.80	84	7857	1.0783	ug/L	64
20) Carbon Disulfide	7.86	76	21108	1.0176	ug/L	95
21) Acrylonitrile	7.97	53	3676	2.3254	ug/L	83
22) Methyl Tert Butyl Ether	8.01	73	16436	1.0286	ug/L	88
23) trans-1,2-Dichloroethene	8.26	96	6924	0.9982	ug/L	75
24) n-Hexane	8.32	57	8671	1.1054	ug/L	80
25) Diisopropyl ether	8.66	45	90855	5.0880	ug/L #	90
26) Vinyl Acetate	8.83	43	4307	0.8689	ug/L #	78
27) 1,1-Dichloroethane	8.87	63	11386	0.9909	ug/L	100
28) Ethyl-Tert-Butyl ether	9.24	59	90588	5.0069	ug/L	90
29) 2-Butanone	9.42	43	1578	0.9178	ug/L #	57
30) Propionitrile	9.52	54	2484	4.4300	ug/L #	56
31) 2,2-Dichloropropane	9.65	77	10191	1.1658	ug/L	75
32) cis-1,2-Dichloroethene	9.72	96	7549	0.9899	ug/L	90
33) Chloroform	9.92	83	13696	1.0463	ug/L	91
34) 1-Bromopropane	10.06	122	1026	0.7587	ug/L	54
35) Bromochloromethane	10.15	130	3643	0.9075	ug/L	100
36) Tetrahydrofuran	10.17	42	6307	5.5703	ug/L	83
38) 1,1,1-Trichloroethane	10.45	97	10730	1.0083	ug/L	83
39) Cyclohexane	10.49	56	9783	0.9941	ug/L	78
40) 1,1-Dichloropropene	10.64	75	9021	1.0028	ug/L	85
41) Tert-Amyl-Methyl ether	10.75	73	86495	5.0351	ug/L	93
42) Carbon Tetrachloride	10.80	117	7124	0.8490	ug/L	95

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

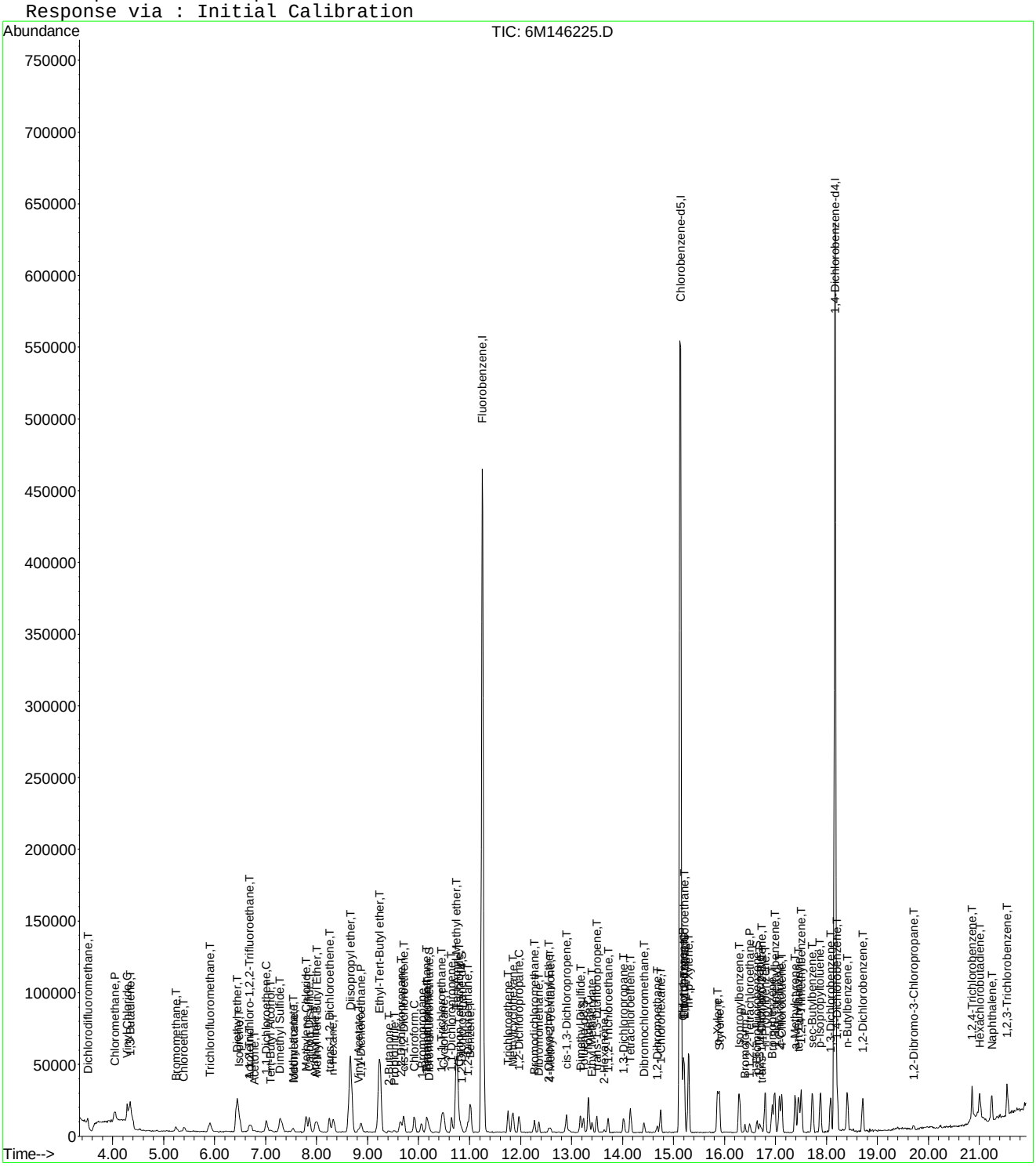
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	8252	1.0134	ug/L	#	79
46)	Benzene	11.01	78	27830	1.0289	ug/L		85
47)	Trichloroethene	11.76	130	7188	0.9763	ug/L		86
48)	Methylcyclohexane	11.85	83	10430	0.9805	ug/L		81
49)	1,2-Dichloropropane	11.97	63	6337	0.9927	ug/L		93
51)	Bromodichloromethane	12.27	83	8602	0.9546	ug/L		100
52)	Dibromomethane	12.36	93	3907	1.0392	ug/L		88
53)	2-Chloroethyl Vinyl Ether	12.55	63	2066	0.8251	ug/L		85
54)	4-Methyl-2-Pentanone	12.58	58	1310	0.7976	ug/L	#	38
55)	cis-1,3-Dichloropropene	12.90	75	9650	0.9724	ug/L	#	91
56)	Dimethyl Disulfide	13.18	79	5152	0.8229	ug/L		84
59)	Toluene	13.33	91	28882	1.0403	ug/L		97
60)	Ethyl Methacrylate	13.40	69	6287	0.9358	ug/L		73
62)	trans-1,3-Dichloropropene	13.49	75	8281	0.9673	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	5263	1.0059	ug/L		98
64)	2-Hexanone	13.64	43	2640	1.0508	ug/L		100
65)	1,3-Dichloropropane	14.02	76	9029	1.0281	ug/L		71
66)	Tetrachloroethene	14.16	166	6743	1.0023	ug/L		96
67)	Dibromochloromethane	14.42	129	6126	0.9472	ug/L		94
68)	1,2-Dibromoethane	14.68	107	5001	0.9955	ug/L		97
69)	1-Chlorohexane	14.75	91	8893	0.9919	ug/L		81
70)	Chlorobenzene	15.19	112	19139	1.0072	ug/L		80
71)	1,1,1,2-Tetrachloroethane	15.21	131	6334	0.9308	ug/L	#	45
72)	Ethylbenzene	15.21	106	9526	0.9260	ug/L		96
73)	m-,p-Xylene	15.29	106	24042	1.9553	ug/L		95
74)	o-Xylene	15.86	106	11918	1.0045	ug/L		97
75)	Styrene	15.90	104	18813	0.9445	ug/L		97
76)	Bromoform	16.40	173	3544	0.8992	ug/L	#	94
77)	Isopropylbenzene	16.29	105	30143	1.0152	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	5946	1.0159	ug/L		93
81)	1,2,3-Trichloropropane	16.69	110	1751	1.0131	ug/L	#	44
82)	trans-1,4-Dichloro-2-Buten	16.73	53	1111	0.8939	ug/L	#	1
83)	n-Propylbenzene	16.80	91	35315	1.0379	ug/L		100
84)	Bromobenzene	16.93	156	7797	1.0200	ug/L		78
85)	1,3,5-Trimethylbenzene	16.99	105	24668	1.0230	ug/L		97
86)	2-Chlorotoluene	17.08	91	24173	1.0670	ug/L		97
87)	4-Chlorotoluene	17.12	91	21009	1.0492	ug/L		97
88)	a-Methylstyrene	17.38	118	11540	0.8654	ug/L		96
89)	tert-Butylbenzene	17.46	134	4954	0.9805	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	25152	1.0156	ug/L		87
91)	sec-Butylbenzene	17.72	105	32001	1.0761	ug/L		95
92)	p-Isopropyltoluene	17.87	119	25877	1.0345	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	14335	0.9930	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	14500	0.9933	ug/L	#	52
95)	n-Butylbenzene	18.42	91	23762	1.0403	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	13818	1.0212	ug/L		94
97)	1,2-Dibromo-3-Chloropropan	19.71	75	1139	1.0744	ug/L		87
98)	1,2,4-Trichlorobenzene	20.86	180	9978	1.0078	ug/L		93
99)	Hexachlorobutadiene	21.01	225	4008	1.0599	ug/L		89
100)	Naphthalene	21.24	128	19584	0.9879	ug/L		98
101)	1,2,3-Trichlorobenzene	21.54	180	10033	1.0497	ug/L		89

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9593	4.1	100	0.00
3	P	Chloromethane	1.0000	0.8003	20.0	100	0.02
4	C	Vinyl Chloride	1.0000	1.1160	-11.6	100	0.00
5	T	1,3-Butadiene	-1.0000	0.7170	0.0	0	0.03
6	T	Bromomethane	1.0000	0.9009	9.9	100	0.03
7	T	Chloroethane	1.0000	0.9845	1.5	100	0.02
8	T	Trichlorofluoromethane	1.0000	0.9905	0.9	100	0.02
9	T	Diethyl ether	5.0000	4.9333	1.3	100	0.00
10	T	Isoprene	-1.0000	0.9306	0.0	100	0.00
11	T	Acrolein	-1.0000	1.2633	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0241	-2.4	100	0.00
13	T	Acetone	-1.0000	1.2036	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.9690	3.1	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	9.4246	0.0	100	-0.02
16	T	Dimethyl Sulfide	-1.0000	0.9514	0.0	100	0.00
17	T	Iodomethane	1.0000	1.2641	-26.4#	100	0.02
18	T	Methyl acetate	-1.0000	0.9075	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0783	-7.8	100	0.00
20	T	Carbon Disulfide	1.0000	1.0176	-1.8	100	0.00
21	T	Acrylonitrile	2.5000	2.3254	7.0	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	1.0286	-2.9	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9982	0.2	100	0.00
24	T	n-Hexane	-1.0000	1.1054	0.0	100	-0.01
25	T	Diisopropyl ether	5.0000	5.0880	-1.8	100	0.00
26	T	Vinyl Acetate	-1.0000	0.8689	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9909	0.9	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0069	-0.1	100	0.00
29	T	2-Butanone	-1.0000	0.9178	0.0	100	0.00
30	T	Propionitrile	5.0000	4.4300	11.4	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.1658	-16.6	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9899	1.0	100	0.00
33	C	Chloroform	1.0000	1.0463	-4.6	100	0.00
34		1-Bromopropane	1.0000	0.7587	24.1#	100	0.00
35	T	Bromochloromethane	1.0000	0.9075	9.2	100	0.00
36	T	Tetrahydrofuran	5.0000	5.5703	-11.4	100	0.00
37	S	Dibromofluoromethane	0.5000	0.4799	4.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0083	-0.8	100	-0.01
39	T	Cyclohexane	1.0000	0.9941	0.6	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0028	-0.3	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	5.0351	-0.7	100	0.00
42	T	Carbon Tetrachloride	1.0000	0.8490	15.1	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.4714	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	1.0000	1.0134	-1.3	100	0.00
46	T	Benzene	1.0000	1.0289	-2.9	100	0.00
47	T	Trichloroethene	1.0000	0.9763	2.4	100	0.00
48	T	Methylcyclohexane	-1.0000	0.9805	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9927	0.7	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	1.0000	0.9546	4.5	100	0.00
52	T	Dibromomethane	1.0000	1.0392	-3.9	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8251	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.7976	0.0	100	0.00

(#) = Out of Range
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9724	2.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.8229	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	0.5000	0.5025	-0.5	100	0.00
59	C	Toluene	1.0000	1.0403	-4.0	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.9358	6.4	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.10
62	T	trans-1,3-Dichloropropene	1.0000	0.9673	3.3	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0059	-0.6	100	0.00
64	T	2-Hexanone	-1.0000	1.0508	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0281	-2.8	100	0.00
66	T	Tetrachloroethene	1.0000	1.0023	-0.2	100	0.00
67	T	Dibromochloromethane	1.0000	0.9472	5.3	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9954	0.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9919	0.8	100	0.00
70	P	Chlorobenzene	1.0000	1.0072	-0.7	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.9308	6.9	100	0.00
72	C	Ethylbenzene	1.0000	0.9260	7.4	100	0.00
73	T	m-,p-Xylene	2.0000	1.9553	2.2	100	0.00
74	T	o-Xylene	1.0000	1.0045	-0.4	100	0.00
75	T	Styrene	1.0000	0.9445	5.5	100	0.00
76	P	Bromoform	1.0000	0.8992	10.1	100	0.00
77	T	Isopropylbenzene	1.0000	1.0152	-1.5	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0159	-1.6	100	0.00
80	S	p-Bromofluorobenzene	0.5000	0.5071	-1.4	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	1.0131	-1.3	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	1.0000	0.8939	10.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0379	-3.8	100	0.00
84	T	Bromobenzene	1.0000	1.0200	-2.0	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	1.0230	-2.3	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0670	-6.7	100	0.00
87	T	4-Chlorotoluene	1.0000	1.0492	-4.9	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8654	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9805	2.0	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0156	-1.6	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0761	-7.6	100	0.00
92	T	p-Isopropyltoluene	1.0000	1.0345	-3.4	100	-0.01
93	T	1,3-Dichlorobenzene	1.0000	0.9930	0.7	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	0.9933	0.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0403	-4.0	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0212	-2.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	1.0744	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	1.0078	-0.8	100	0.00
99	T	Hexachlorobutadiene	1.0000	1.0599	-6.0	100	0.00
100	T	Naphthalene	1.0000	0.9879	1.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	1.0497	-5.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	622575	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	435125	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	222815	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	5872	0.9239	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.68%#			
43) 1,2-Dichloroethane-d4	10.85	65	6086	0.9716	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.88%#			
58) Toluene-d8	13.23	98	22416	1.0096	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	4.04%#			
80) p-Bromofluorobenzene	16.64	95	8846	1.0453	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.20%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	17204	1.7405	ug/L		90
3) Chloromethane	4.04	50	31810	2.0127	ug/L		90
4) Vinyl Chloride	4.28	62	21813	1.9313	ug/L		100
5) 1,3-Butadiene	4.32	54	13563	1.8365	ug/L		98
6) Bromomethane	5.24	94	7916	1.6233	ug/L		98
7) Chloroethane	5.41	64	9130	1.8788	ug/L		79
8) Trichlorofluoromethane	5.91	101	21485	1.8560	ug/L		98
9) Diethyl ether	6.44	59	119329	24.7359	ug/L		81
10) Isoprene	6.48	67	17497	1.8377	ug/L		78
11) Acrolein	6.67	56	6469	12.2399	ug/L		91
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	12320	1.8801	ug/L		96
13) Acetone	6.77	43	2910	2.1660	ug/L		88
14) 1,1-Dichloroethene	7.02	61	18326	1.9308	ug/L		82
15) Tert-Butyl Alcohol	7.11	59	21089	50.6073	ug/L		91
16) Dimethyl Sulfide	7.28	62	13289	1.9594	ug/L		85
17) Iodomethane	7.55	142	6278	1.9004	ug/L		87
18) Methyl acetate	7.54	43	6217	1.8451	ug/L	#	93
19) Methylene Chloride	7.80	84	14280	1.9900	ug/L		58
20) Carbon Disulfide	7.86	76	40699	1.9924	ug/L		98
21) Acrylonitrile	7.97	53	18438	11.8437	ug/L		95
22) Methyl Tert Butyl Ether	8.01	73	30909	1.9643	ug/L		90
23) trans-1,2-Dichloroethene	8.26	96	13599	1.9908	ug/L		73
24) n-Hexane	8.33	57	15204	1.9682	ug/L		83
25) Diisopropyl ether	8.66	45	450794	25.6347	ug/L	#	90
26) Vinyl Acetate	8.82	43	6597	1.3515	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	22151	1.9576	ug/L		100
28) Ethyl-Tert-Butyl ether	9.24	59	449659	25.2364	ug/L		91
29) 2-Butanone	9.42	43	3106	1.8344	ug/L		84
30) Propionitrile	9.52	54	13656	24.7299	ug/L		97
31) 2,2-Dichloropropane	9.64	77	17425	2.0241	ug/L		79
32) cis-1,2-Dichloroethene	9.72	96	14760	1.9654	ug/L		85
33) Chloroform	9.92	83	24171	1.8751	ug/L		93
34) 1-Bromopropane	10.05	122	2578	1.9358	ug/L		99
35) Bromochloromethane	10.15	130	7493	1.8954	ug/L		94
36) Tetrahydrofuran	10.18	42	27217	24.4090	ug/L	#	70
38) 1,1,1-Trichloroethane	10.46	97	20272	1.9343	ug/L		87
39) Cyclohexane	10.49	56	18307	1.8890	ug/L		77
40) 1,1-Dichloropropene	10.65	75	17358	1.9593	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	419848	24.8173	ug/L		93
42) Carbon Tetrachloride	10.80	117	13633	1.6498	ug/L		96

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

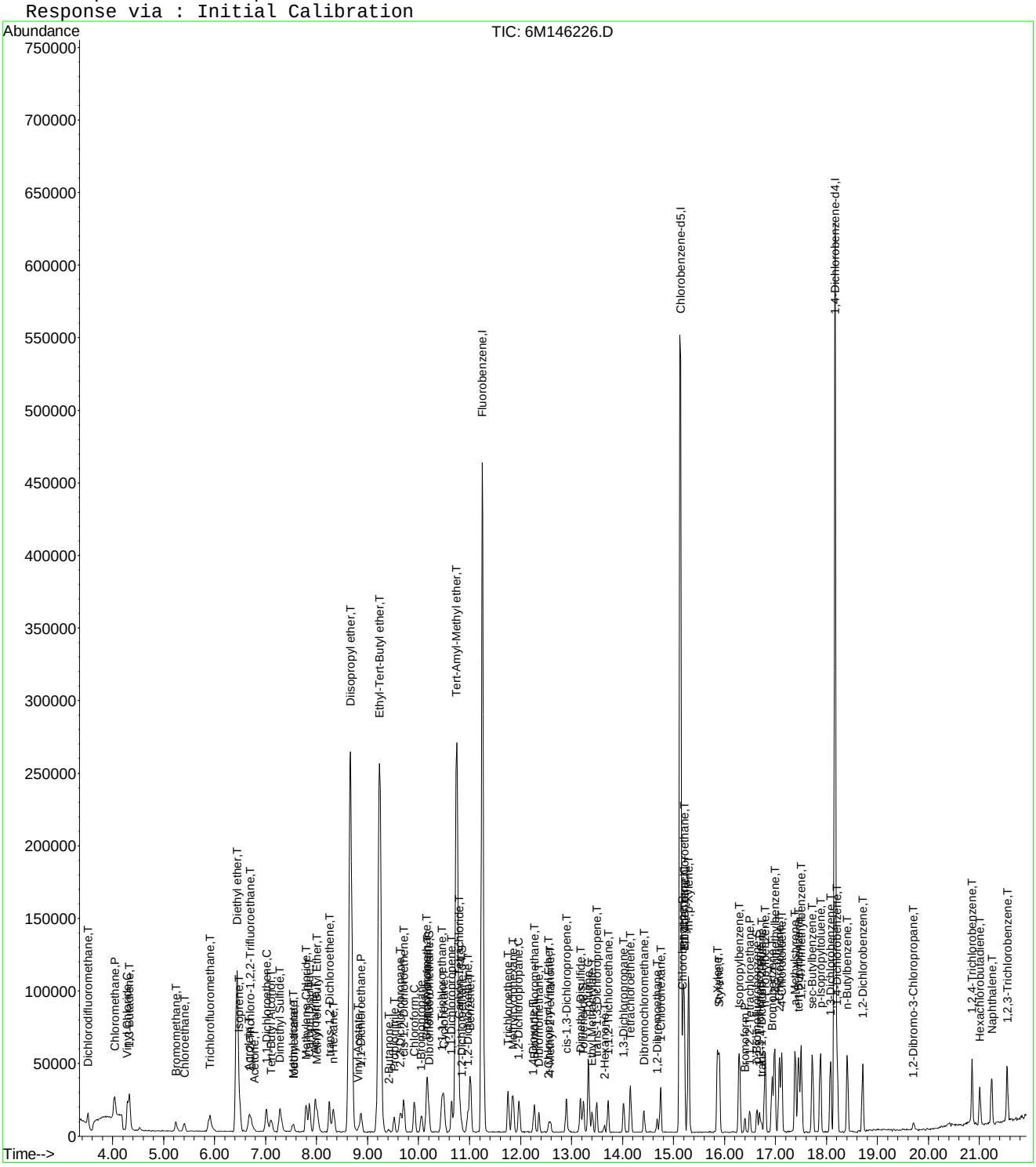
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	15260	1.9029	ug/L		88
46)	Benzene	11.01	78	53642	2.0138	ug/L		84
47)	Trichloroethene	11.76	130	13662	1.8843	ug/L		86
48)	Methylcyclohexane	11.85	83	20180	1.9264	ug/L		83
49)	1,2-Dichloropropane	11.96	63	12672	2.0157	ug/L		96
50)	1,4-Dioxane	12.25	88	2094	45.8104	ug/L		79
51)	Bromodichloromethane	12.27	83	16986	1.9140	ug/L		100
52)	Dibromomethane	12.36	93	7229	1.9525	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.54	63	3804	1.5427	ug/L		93
54)	4-Methyl-2-Pentanone	12.59	58	2633	1.6278	ug/L		97
55)	cis-1,3-Dichloropropene	12.90	75	18417	1.8845	ug/L		93
56)	Dimethyl Disulfide	13.18	79	10342	1.6774	ug/L		85
59)	Toluene	13.33	91	54153	1.9906	ug/L		99
60)	Ethyl Methacrylate	13.40	69	12139	1.8439	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	14848	1.7701	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	10051	1.9605	ug/L		100
64)	2-Hexanone	13.65	43	4642	1.8856	ug/L		83
65)	1,3-Dichloropropane	14.03	76	16522	1.9199	ug/L		72
66)	Tetrachloroethene	14.16	166	13068	1.9824	ug/L		97
67)	Dibromochloromethane	14.42	129	11966	1.8881	ug/L		99
68)	1,2-Dibromoethane	14.68	107	9631	1.9565	ug/L		98
69)	1-Chlorohexane	14.75	91	16906	1.9245	ug/L		76
70)	Chlorobenzene	15.18	112	35469	1.9050	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	12013	1.8016	ug/L		88
72)	Ethylbenzene	15.21	106	18719	1.8571	ug/L		98
73)	m-,p-Xylene	15.29	106	46470	3.8571	ug/L		92
74)	o-Xylene	15.86	106	22349	1.9223	ug/L		97
75)	Styrene	15.89	104	37462	1.9194	ug/L		98
76)	Bromoform	16.40	173	6961	1.8024	ug/L		93
77)	Isopropylbenzene	16.29	105	56507	1.9422	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	11588	1.9969	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	3156	1.8416	ug/L	#	45
82)	trans-1,4-Dichloro-2-Buten	16.73	53	2077	1.6855	ug/L	#	1
83)	n-Propylbenzene	16.79	91	68212	2.0219	ug/L		100
84)	Bromobenzene	16.94	156	14979	1.9764	ug/L		81
85)	1,3,5-Trimethylbenzene	16.99	105	48272	2.0191	ug/L		98
86)	2-Chlorotoluene	17.08	91	45900	2.0434	ug/L		97
87)	4-Chlorotoluene	17.12	91	40071	2.0184	ug/L		97
88)	a-Methylstyrene	17.38	118	23772	1.7980	ug/L		98
89)	tert-Butylbenzene	17.46	134	10046	2.0053	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	48653	1.9815	ug/L		86
91)	sec-Butylbenzene	17.72	105	59307	2.0115	ug/L		96
92)	p-Isopropyltoluene	17.88	119	48956	1.9740	ug/L		96
93)	1,3-Dichlorobenzene	18.08	146	28643	2.0012	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	28060	1.9387	ug/L		82
95)	n-Butylbenzene	18.41	91	44182	1.9509	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	25901	1.9307	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	1831	1.7419	ug/L		85
98)	1,2,4-Trichlorobenzene	20.86	180	18897	1.9251	ug/L		96
99)	Hexachlorobutadiene	21.01	225	7029	1.8748	ug/L		95
100)	Naphthalene	21.24	128	36518	1.8580	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	17908	1.8898	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7405	13.0	100	0.00
3	P	Chloromethane	2.0000	2.0127	-0.6	100	0.02
4	C	Vinyl Chloride	2.0000	1.9313	3.4	100	0.01
5	T	1,3-Butadiene	-1.0000	1.8365	0.0	0	0.01
6	T	Bromomethane	2.0000	1.6233	18.8	100	0.03
7	T	Chloroethane	2.0000	1.8788	6.1	100	0.03
8	T	Trichlorofluoromethane	2.0000	1.8560	7.2	100	0.02
9	T	Diethyl ether	25.0000	24.7359	1.1	100	0.00
10	T	Isoprene	-1.0000	1.8377	0.0	100	0.00
11	T	Acrolein	12.5000	12.2399	2.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8801	6.0	100	0.02
13	T	Acetone	-1.0000	2.1660	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9308	3.5	100	0.00
15	T	Tert-Butyl Alcohol	50.0000	50.6073	-1.2	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.9594	0.0	100	0.00
17	T	Iodomethane	2.0000	1.9004	5.0	100	0.02
18	T	Methyl acetate	-1.0000	1.8451	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.9900	0.5	100	0.00
20	T	Carbon Disulfide	2.0000	1.9924	0.4	100	0.00
21	T	Acrylonitrile	12.5000	11.8437	5.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.9643	1.8	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9908	0.5	100	0.00
24	T	n-Hexane	-1.0000	1.9682	0.0	100	0.00
25	T	Diisopropyl ether	25.0000	25.6347	-2.5	100	0.00
26	T	Vinyl Acetate	-1.0000	1.3515	0.0	100	-0.01
27	P	1,1-Dichloroethane	2.0000	1.9576	2.1	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	25.2364	-0.9	100	0.00
29	T	2-Butanone	-1.0000	1.8344	0.0	100	0.00
30	T	Propionitrile	25.0000	24.7299	1.1	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0241	-1.2	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9654	1.7	100	0.00
33	C	Chloroform	2.0000	1.8751	6.2	100	0.00
34		1-Bromopropane	2.0000	1.9358	3.2	100	0.00
35	T	Bromochloromethane	2.0000	1.8954	5.2	100	0.00
36	T	Tetrahydrofuran	25.0000	24.4090	2.4	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9239	7.6	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.9343	3.3	100	0.00
39	T	Cyclohexane	2.0000	1.8890	5.5	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9593	2.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.8173	0.7	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.6498	17.5	100	-0.01
43	S	1,2-Dichloroethane-d4	1.0000	0.9716	2.8	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	2.0000	1.9029	4.9	100	0.00
46	T	Benzene	2.0000	2.0138	-0.7	100	0.00
47	T	Trichloroethene	2.0000	1.8843	5.8	100	0.00
48	T	Methylcyclohexane	-1.0000	1.9264	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	2.0158	-0.8	100	-0.01
50	T	1,4-Dioxane	-1.0000	45.8104	0.0	100	0.00
51	T	Bromodichloromethane	2.0000	1.9140	4.3	100	0.00
52	T	Dibromomethane	2.0000	1.9525	2.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.5427	22.9#	100	-0.01
54	T	4-Methyl-2-Pentanone	-1.0000	1.6278	0.0	100	0.00

(#) = Out of Range
6M146226.D 8260BWT.M Thu Apr 06 15:02:50 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8845	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	1.6774	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	1.0096	-1.0	100	0.00
59	C	Toluene	2.0000	1.9906	0.5	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.8439	7.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	2.0000	1.7701	11.5	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9605	2.0	100	0.00
64	T	2-Hexanone	-1.0000	1.8856	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9199	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9824	0.9	100	0.00
67	T	Dibromochloromethane	2.0000	1.8882	5.6	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9565	2.2	100	0.00
69	T	1-Chlorohexane	2.0000	1.9245	3.8	100	0.00
70	P	Chlorobenzene	2.0000	1.9050	4.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8016	9.9	100	0.00
72	C	Ethylbenzene	2.0000	1.8571	7.1	100	0.00
73	T	m-,p-Xylene	4.0000	3.8571	3.6	100	0.00
74	T	o-Xylene	2.0000	1.9223	3.9	100	0.00
75	T	Styrene	2.0000	1.9194	4.0	100	-0.01
76	P	Bromoform	2.0000	1.8024	9.9	100	0.00
77	T	Isopropylbenzene	2.0000	1.9422	2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9969	0.2	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0453	-4.5	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8416	7.9	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.6855	15.7	100	0.00
83	T	n-Propylbenzene	2.0000	2.0219	-1.1	100	0.00
84	T	Bromobenzene	2.0000	1.9764	1.2	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	2.0191	-1.0	100	0.00
86	T	2-Chlorotoluene	2.0000	2.0434	-2.2	100	0.00
87	T	4-Chlorotoluene	2.0000	2.0184	-0.9	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7980	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	2.0053	-0.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	1.9815	0.9	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0115	-0.6	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9740	1.3	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	2.0012	-0.1	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9387	3.1	100	0.00
95	T	n-Butylbenzene	2.0000	1.9509	2.5	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	1.9307	3.5	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7419	12.9	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.9251	3.7	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.8748	6.3	100	0.00
100	T	Naphthalene	2.0000	1.8580	7.1	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8898	5.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146226.D 8260BWT.M Thu Apr 06 15:02:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	624930	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	437844	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	229708	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	16009	2.5095	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 10.04%#			
43) 1,2-Dichloroethane-d4	10.85	65	15355	2.4422	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 9.76%#			
58) Toluene-d8	13.24	98	57180	2.5593	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 10.24%#			
80) p-Bromofluorobenzene	16.64	95	20953	2.4017	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 9.60%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	45599	4.5957	ug/L	94
3) Chloromethane	4.04	50	70172	5.3733	ug/L	92
4) Vinyl Chloride	4.28	62	52481	4.6291	ug/L	100
5) 1,3-Butadiene	4.33	54	27485	5.0651	ug/L	93
6) Bromomethane	5.24	94	22408	4.5778	ug/L	98
7) Chloroethane	5.41	64	24876	5.0998	ug/L	86
8) Trichlorofluoromethane	5.91	101	57306	4.9318	ug/L	99
9) Diethyl ether	6.44	59	241182	49.8065	ug/L	81
10) Isoprene	6.48	67	45799	4.7920	ug/L	80
11) Acrolein	6.67	56	13253	24.9813	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	32606	4.9572	ug/L	97
13) Acetone	6.77	43	7120	5.2798	ug/L	90
14) 1,1-Dichloroethene	7.01	61	48384	5.0784	ug/L	84
15) Tert-Butyl Alcohol	7.11	59	45515	108.8107	ug/L	90
16) Dimethyl Sulfide	7.28	62	33336	4.8967	ug/L	83
17) Iodomethane	7.54	142	18689	4.0940	ug/L	98
18) Methyl acetate	7.53	43	16127	4.7683	ug/L	90
19) Methylene Chloride	7.80	84	35921	4.9870	ug/L	61
20) Carbon Disulfide	7.86	76	101736	4.9617	ug/L	99
21) Acrylonitrile	7.97	53	39515	25.2869	ug/L	94
22) Methyl Tert Butyl Ether	8.01	73	82575	5.2279	ug/L	89
23) trans-1,2-Dichloroethene	8.26	96	34052	4.9661	ug/L	78
24) n-Hexane	8.33	57	39086	5.0408	ug/L	81
25) Diisopropyl ether	8.66	45	886670	50.2311	ug/L #	90
26) Vinyl Acetate	8.83	43	24007	4.8995	ug/L #	91
27) 1,1-Dichloroethane	8.87	63	57099	5.0271	ug/L	99
28) Ethyl-Tert-Butyl ether	9.24	59	897158	50.1618	ug/L	90
29) 2-Butanone	9.42	43	8484	4.9917	ug/L	88
30) Propionitrile	9.52	54	29088	52.4775	ug/L	99
31) 2,2-Dichloropropane	9.65	77	44879	5.1936	ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	37579	4.9850	ug/L	89
33) Chloroform	9.92	83	60253	4.6565	ug/L	95
34) 1-Bromopropane	10.06	122	6559	4.9064	ug/L	100
35) Bromochloromethane	10.15	130	20571	5.1839	ug/L	98
36) Tetrahydrofuran	10.17	42	56370	50.3637	ug/L #	72
38) 1,1,1-Trichloroethane	10.46	97	51277	4.8743	ug/L	91
39) Cyclohexane	10.49	56	47949	4.9291	ug/L	78
40) 1,1-Dichloropropene	10.64	75	44354	4.9877	ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	851603	50.1488	ug/L	93
42) Carbon Tetrachloride	10.80	117	40401	4.8706	ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

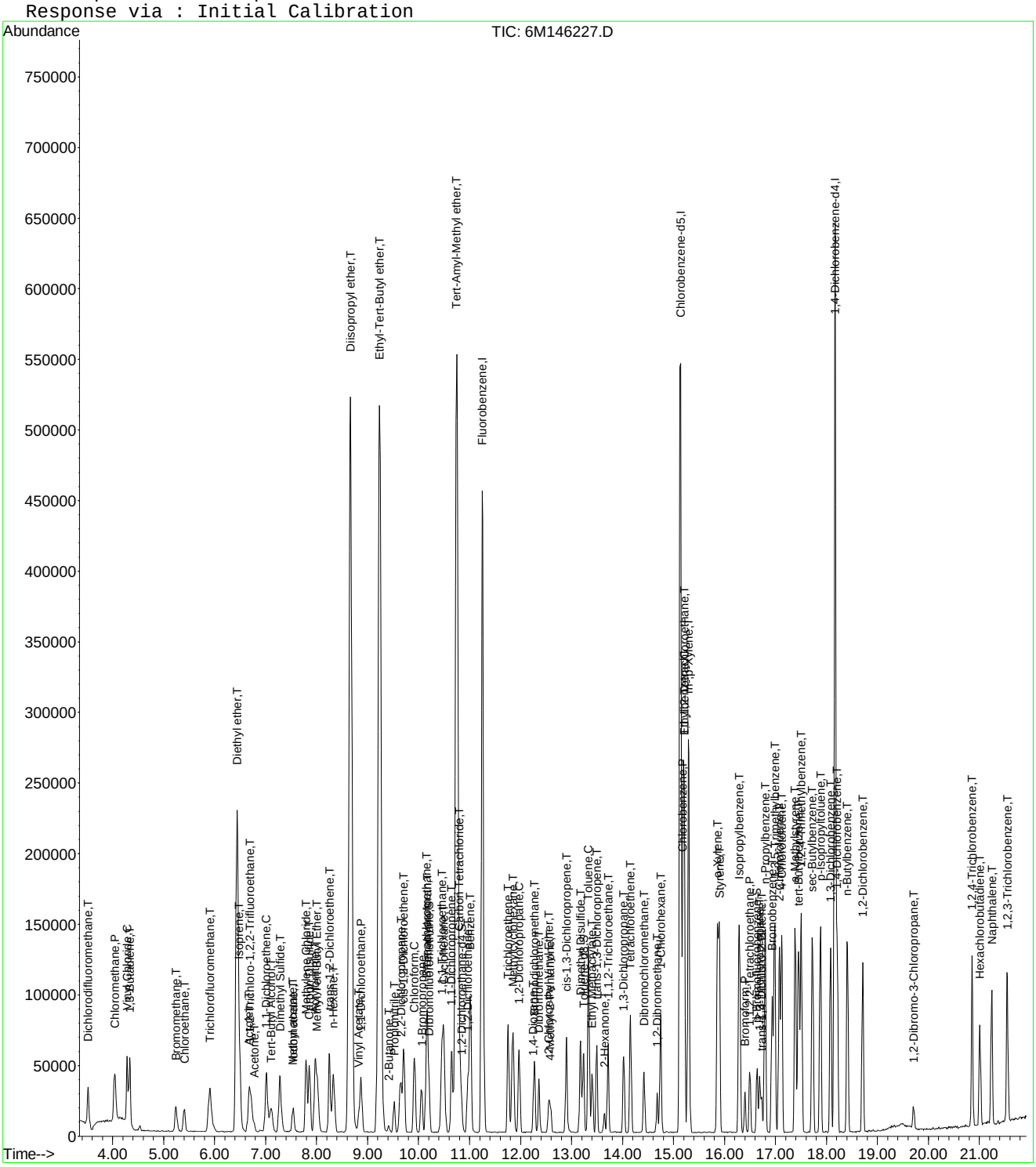
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	40993	5.0925	ug/L		88
46)	Benzene	11.01	78	132914	4.9709	ug/L		86
47)	Trichloroethene	11.76	130	36216	4.9761	ug/L		84
48)	Methylcyclohexane	11.85	83	51654	4.9123	ug/L		82
49)	1,2-Dichloropropane	11.97	63	32123	5.0906	ug/L		96
50)	1,4-Dioxane	12.25	88	4272	93.1064	ug/L		79
51)	Bromodichloromethane	12.27	83	44761	5.0248	ug/L		99
52)	Dibromomethane	12.36	93	19386	5.2162	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	12476	5.0404	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	7903	4.8674	ug/L		86
55)	cis-1,3-Dichloropropene	12.90	75	50089	5.1061	ug/L		95
56)	Dimethyl Disulfide	13.18	79	28390	4.5874	ug/L		89
59)	Toluene	13.33	91	137485	5.0224	ug/L		100
60)	Ethyl Methacrylate	13.40	69	33232	5.0167	ug/L		72
62)	trans-1,3-Dichloropropene	13.49	75	42828	5.0741	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	26530	5.1428	ug/L		99
64)	2-Hexanone	13.65	43	12468	5.0332	ug/L		86
65)	1,3-Dichloropropane	14.02	76	44093	5.0920	ug/L		70
66)	Tetrachloroethene	14.16	166	33551	5.0579	ug/L		98
67)	Dibromochloromethane	14.42	129	31682	4.9681	ug/L		99
68)	1,2-Dibromoethane	14.68	107	24528	4.9517	ug/L		99
69)	1-Chlorohexane	14.75	91	43721	4.9460	ug/L		79
70)	Chlorobenzene	15.18	112	91449	4.8810	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.21	131	32496	4.8433	ug/L		89
72)	Ethylbenzene	15.21	106	48984	4.8296	ug/L		96
73)	m-,p-Xylene	15.29	106	119341	9.8441	ug/L		94
74)	o-Xylene	15.86	106	57354	4.9026	ug/L		97
75)	Styrene	15.90	104	98078	4.9940	ug/L		95
76)	Bromoform	16.40	173	18699	4.8117	ug/L		99
77)	Isopropylbenzene	16.29	105	146585	5.0070	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	30970	5.1767	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	9050	5.1225	ug/L	#	50
82)	trans-1,4-Dichloro-2-Buten	16.73	53	6208	4.8867	ug/L	#	1
83)	n-Propylbenzene	16.80	91	176740	5.0817	ug/L		100
84)	Bromobenzene	16.93	156	38734	4.9575	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	121939	4.9473	ug/L		99
86)	2-Chlorotoluene	17.08	91	114766	4.9559	ug/L		97
87)	4-Chlorotoluene	17.12	91	102125	4.9897	ug/L		97
88)	a-Methylstyrene	17.38	118	66394	4.8711	ug/L		96
89)	tert-Butylbenzene	17.46	134	24993	4.8393	ug/L		71
90)	1,2,4-Trimethylbenzene	17.51	105	126114	4.9821	ug/L		87
91)	sec-Butylbenzene	17.72	105	152633	5.0216	ug/L		97
92)	p-Isopropyltoluene	17.88	119	126283	4.9391	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	71556	4.8495	ug/L		97
94)	1,4-Dichlorobenzene	18.21	146	72485	4.8577	ug/L		94
95)	n-Butylbenzene	18.41	91	115961	4.9668	ug/L		99
96)	1,2-Dichlorobenzene	18.71	146	67580	4.8863	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.71	75	5531	5.1041	ug/L		98
98)	1,2,4-Trichlorobenzene	20.86	180	48642	4.8067	ug/L		98
99)	Hexachlorobutadiene	21.01	225	19187	4.9642	ug/L		98
100)	Naphthalene	21.24	128	101621	5.0152	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	45886	4.6970	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.5957	8.1	100	0.00
3	P	Chloromethane	5.0000	5.3733	-7.5	100	0.02
4	C	Vinyl Chloride	5.0000	4.6291	7.4	100	0.00
5	T	1,3-Butadiene	5.0000	5.0651	-1.3	100	0.02
6	T	Bromomethane	5.0000	4.5778	8.4	100	0.03
7	T	Chloroethane	5.0000	5.0998	-2.0	100	0.03
8	T	Trichlorofluoromethane	5.0000	4.9318	1.4	100	0.02
9	T	Diethyl ether	50.0000	49.8065	0.4	100	0.00
10	T	Isoprene	5.0000	4.7920	4.2	100	0.00
11	T	Acrolein	25.0000	24.9813	0.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.9572	0.9	100	0.00
13	T	Acetone	5.0000	5.2798	-5.6	100	0.00
14	C	1,1-Dichloroethene	5.0000	5.0784	-1.6	100	0.00
15	T	Tert-Butyl Alcohol	100.0000	108.8107	-8.8	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8967	2.1	100	0.00
17	T	Iodomethane	5.0000	4.0940	18.1	100	0.00
18	T	Methyl acetate	5.0000	4.7683	4.6	100	0.00
19	T	Methylene Chloride	5.0000	4.9870	0.3	100	0.00
20	T	Carbon Disulfide	5.0000	4.9617	0.8	100	0.00
21	T	Acrylonitrile	25.0000	25.2869	-1.1	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	5.2279	-4.6	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.9661	0.7	100	0.00
24	T	n-Hexane	5.0000	5.0408	-0.8	100	0.00
25	T	Diisopropyl ether	50.0000	50.2311	-0.5	100	0.00
26	T	Vinyl Acetate	5.0000	4.8995	2.0	100	0.00
27	P	1,1-Dichloroethane	5.0000	5.0271	-0.5	100	0.00
28	T	Ethyl-Tert-Butyl ether	50.0000	50.1618	-0.3	100	0.00
29	T	2-Butanone	5.0000	4.9917	0.2	100	0.00
30	T	Propionitrile	50.0000	52.4775	-5.0	100	0.00
31	T	2,2-Dichloropropane	5.0000	5.1936	-3.9	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9850	0.3	100	0.00
33	C	Chloroform	5.0000	4.6565	6.9	100	0.00
34		1-Bromopropane	5.0000	4.9064	1.9	100	0.00
35	T	Bromochloromethane	5.0000	5.1839	-3.7	100	0.00
36	T	Tetrahydrofuran	50.0000	50.3637	-0.7	100	0.00
37	S	Dibromofluoromethane	2.5000	2.5095	-0.4	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8743	2.5	100	0.00
39	T	Cyclohexane	5.0000	4.9291	1.4	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.9877	0.2	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	50.1488	-0.3	100	0.00
42	T	Carbon Tetrachloride	5.0000	4.8706	2.6	100	-0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4421	2.3	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	0.00
45	T	1,2-Dichloroethane	5.0000	5.0925	-1.9	100	0.00
46	T	Benzene	5.0000	4.9709	0.6	100	0.00
47	T	Trichloroethene	5.0000	4.9761	0.5	100	0.00
48	T	Methylcyclohexane	5.0000	4.9123	1.8	100	0.00
49	C	1,2-Dichloropropane	5.0000	5.0906	-1.8	100	0.00
50	T	1,4-Dioxane	100.0000	93.1064	6.9	100	0.00
51	T	Bromodichloromethane	5.0000	5.0248	-0.5	100	0.00
52	T	Dibromomethane	5.0000	5.2162	-4.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	5.0404	-0.8	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.8674	2.7	100	0.00

(#) = Out of Range
6M146227.D 8260BWT.M Thu Apr 06 15:03:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	5.1061	-2.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	4.5874	8.3	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.5593	-2.4	100	0.00
59	C	Toluene	5.0000	5.0224	-0.4	100	0.00
60	T	Ethyl Methacrylate	5.0000	5.0167	-0.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	5.0000	5.0741	-1.5	100	0.00
63	T	1,1,2-Trichloroethane	5.0000	5.1428	-2.9	100	0.00
64	T	2-Hexanone	5.0000	5.0332	-0.7	100	0.00
65	T	1,3-Dichloropropane	5.0000	5.0920	-1.8	100	0.00
66	T	Tetrachloroethene	5.0000	5.0579	-1.2	100	0.00
67	T	Dibromochloromethane	5.0000	4.9681	0.6	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9517	1.0	100	0.00
69	T	1-Chlorohexane	5.0000	4.9460	1.1	100	0.00
70	P	Chlorobenzene	5.0000	4.8810	2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.8433	3.1	100	0.00
72	C	Ethylbenzene	5.0000	4.8296	3.4	100	0.00
73	T	m-,p-Xylene	10.0000	9.8441	1.6	100	0.00
74	T	o-Xylene	5.0000	4.9026	1.9	100	0.00
75	T	Styrene	5.0000	4.9940	0.1	100	0.00
76	P	Bromoform	5.0000	4.8117	3.8	100	0.00
77	T	Isopropylbenzene	5.0000	5.0070	-0.1	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	5.1767	-3.5	100	0.00
80	S	p-Bromofluorobenzene	2.5000	2.4017	3.9	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	5.1225	-2.5	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.8867	2.3	100	0.00
83	T	n-Propylbenzene	5.0000	5.0817	-1.6	100	0.00
84	T	Bromobenzene	5.0000	4.9575	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9473	1.1	100	0.00
86	T	2-Chlorotoluene	5.0000	4.9558	0.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.9897	0.2	100	0.00
88	T	a-Methylstyrene	5.0000	4.8711	2.6	100	0.00
89	T	tert-Butylbenzene	5.0000	4.8393	3.2	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9821	0.4	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0216	-0.4	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9391	1.2	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8495	3.0	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.8577	2.8	100	0.00
95	T	n-Butylbenzene	5.0000	4.9668	0.7	100	0.00
96	T	1,2-Dichlorobenzene	5.0000	4.8863	2.3	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	5.1041	-2.1	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.8067	3.9	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.9642	0.7	100	0.00
100	T	Naphthalene	5.0000	5.0152	-0.3	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.6970	6.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146227.D 8260BWT.M Thu Apr 06 15:03:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	627241	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	447577	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	235510	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	65613	10.2471	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 41.00%#				
43) 1,2-Dichloroethane-d4	10.84	65	64459	10.2142	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.84%#				
58) Toluene-d8	13.23	98	228384	9.9998	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 40.00%#				
80) p-Bromofluorobenzene	16.63	95	91659	10.2472	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 41.00%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	217664	21.8564	ug/L		93
3) Chloromethane	4.03	50	264881	22.3981	ug/L		99
4) Vinyl Chloride	4.29	62	233054	20.4810	ug/L		99
5) 1,3-Butadiene	4.33	54	106373	23.7613	ug/L		88
6) Bromomethane	5.24	94	98255	19.9988	ug/L		97
7) Chloroethane	5.40	64	103887	21.2191	ug/L		84
8) Trichlorofluoromethane	5.91	101	240343	20.6080	ug/L		99
9) Diethyl ether	6.44	59	380286	78.2436	ug/L		82
10) Isoprene	6.48	67	178379	18.5952	ug/L		80
11) Acrolein	6.68	56	20488	38.4767	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.71	101	132626	20.0893	ug/L		98
13) Acetone	6.78	43	28940	21.3811	ug/L		93
14) 1,1-Dichloroethene	7.01	61	195653	20.4603	ug/L		83
15) Tert-Butyl Alcohol	7.11	59	64817	154.3843	ug/L		90
16) Dimethyl Sulfide	7.28	62	130765	19.1371	ug/L		78
17) Iodomethane	7.54	142	98959	18.2438	ug/L		99
18) Methyl acetate	7.53	43	62843	18.5124	ug/L	#	82
19) Methylene Chloride	7.80	84	143369	19.8310	ug/L		60
20) Carbon Disulfide	7.86	76	390904	18.9942	ug/L		100
21) Acrylonitrile	7.96	53	63296	40.3559	ug/L		97
22) Methyl Tert Butyl Ether	8.01	73	330905	20.8726	ug/L		90
23) trans-1,2-Dichloroethene	8.25	96	138532	20.1290	ug/L		77
24) n-Hexane	8.33	57	145559	18.7032	ug/L		83
25) Diisopropyl ether	8.66	45	1403454	79.2147	ug/L	#	90
26) Vinyl Acetate	8.83	43	85023	17.2882	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	233405	20.4736	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1415029	78.8255	ug/L		91
29) 2-Butanone	9.41	43	34173	20.0320	ug/L	#	81
30) Propionitrile	9.52	54	43958	79.0122	ug/L		100
31) 2,2-Dichloropropane	9.65	77	149189	17.2012	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	151702	20.0499	ug/L		88
33) Chloroform	9.91	83	241705	18.6109	ug/L		94
34) 1-Bromopropane	10.06	122	28065	20.9166	ug/L		97
35) Bromochloromethane	10.15	130	85288	21.4135	ug/L		99
36) Tetrahydrofuran	10.18	42	86703	77.1792	ug/L	#	71
38) 1,1,1-Trichloroethane	10.45	97	212928	20.1661	ug/L		91
39) Cyclohexane	10.49	56	183893	18.8342	ug/L		77
40) 1,1-Dichloropropene	10.65	75	179871	20.1524	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	1330159	78.0412	ug/L		93
42) Carbon Tetrachloride	10.80	117	176032	21.1436	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

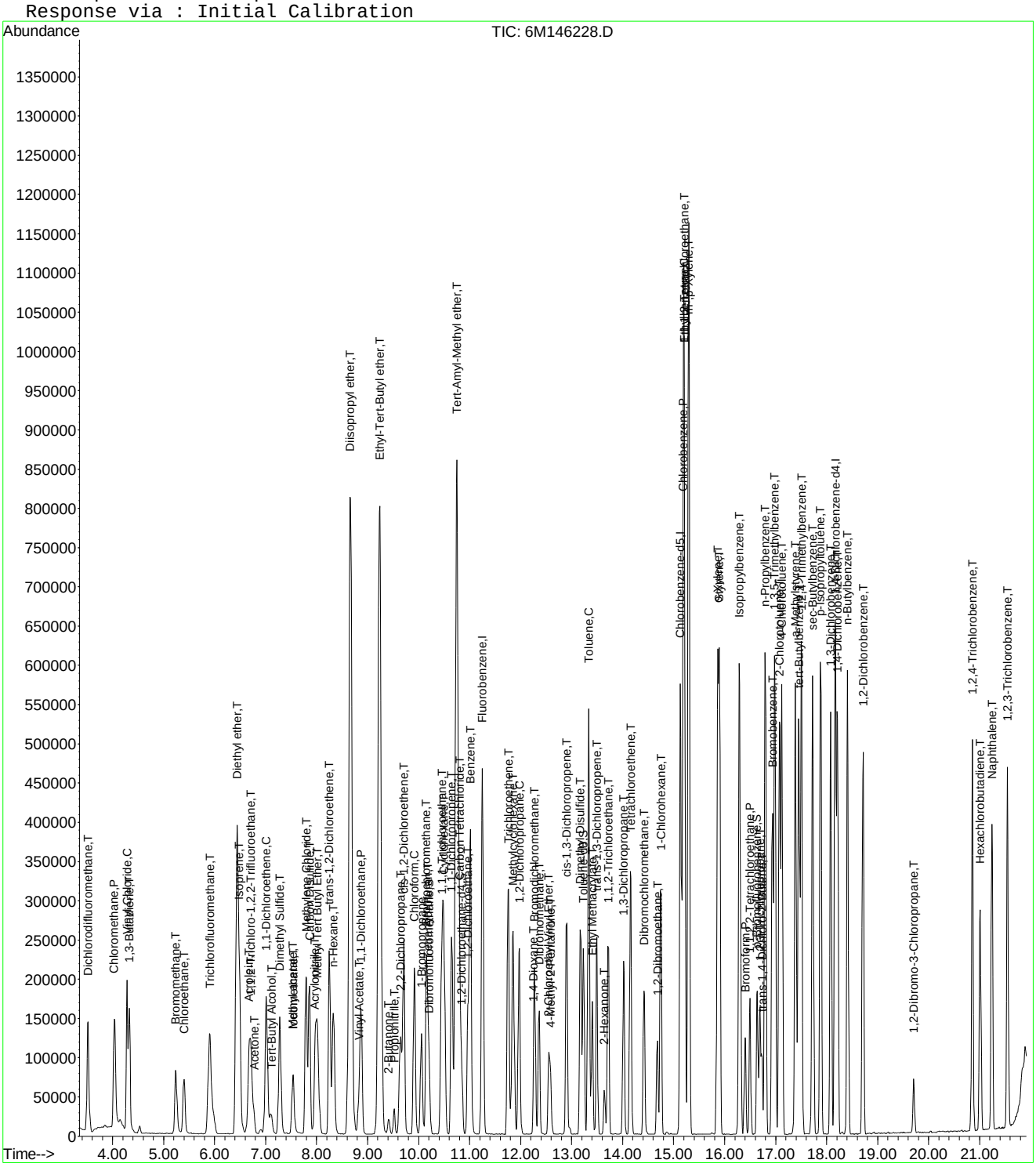
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	162109	20.0644	ug/L		89
46)	Benzene	11.02	78	529115	19.7158	ug/L		86
47)	Trichloroethene	11.76	130	150238	20.5667	ug/L		87
48)	Methylcyclohexane	11.85	83	197423	18.7059	ug/L		81
49)	1,2-Dichloropropane	11.98	63	131909	20.8268	ug/L		95
50)	1,4-Dioxane	12.25	88	7005	152.1084	ug/L		87
51)	Bromodichloromethane	12.27	83	185470	20.7439	ug/L		99
52)	Dibromomethane	12.36	93	77214	20.6995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	53194	21.4116	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	32212	19.7660	ug/L		82
55)	cis-1,3-Dichloropropene	12.90	75	206895	21.0133	ug/L		96
56)	Dimethyl Disulfide	13.17	79	112927	18.1801	ug/L		89
59)	Toluene	13.33	91	555221	19.8416	ug/L		100
60)	Ethyl Methacrylate	13.40	69	129462	19.1184	ug/L		71
62)	trans-1,3-Dichloropropene	13.50	75	176914	20.5042	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107303	20.3482	ug/L		99
64)	2-Hexanone	13.64	43	50259	19.8477	ug/L		85
65)	1,3-Dichloropropane	14.02	76	178966	20.2181	ug/L		71
66)	Tetrachloroethene	14.16	166	136246	20.0929	ug/L		96
67)	Dibromochloromethane	14.42	129	135202	20.7404	ug/L		99
68)	1,2-Dibromoethane	14.68	107	100778	19.9028	ug/L		98
69)	1-Chlorohexane	14.75	91	167924	18.5834	ug/L		76
70)	Chlorobenzene	15.18	112	374272	19.5421	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	138016	20.1228	ug/L		94
72)	Ethylbenzene	15.21	106	202068	19.4896	ug/L		96
73)	m-,p-Xylene	15.29	106	481680	38.8682	ug/L		93
74)	o-Xylene	15.87	106	239598	20.0353	ug/L		93
75)	Styrene	15.90	104	405734	20.2101	ug/L		95
76)	Bromoform	16.41	173	81039	20.4000	ug/L		99
77)	Isopropylbenzene	16.28	105	597096	19.9520	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	119591	19.4973	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	37129	20.4983	ug/L		64
82)	trans-1,4-Dichloro-2-Buten	16.73	53	24964	19.1666	ug/L	#	1
83)	n-Propylbenzene	16.80	91	713905	20.0209	ug/L		99
84)	Bromobenzene	16.94	156	161202	20.1236	ug/L		85
85)	1,3,5-Trimethylbenzene	16.98	105	501322	19.8384	ug/L		100
86)	2-Chlorotoluene	17.07	91	485880	20.4645	ug/L		97
87)	4-Chlorotoluene	17.12	91	386400	18.4139	ug/L		95
88)	a-Methylstyrene	17.39	118	257428	18.4215	ug/L		99
89)	tert-Butylbenzene	17.46	134	106931	20.1945	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	519993	20.0363	ug/L		87
91)	sec-Butylbenzene	17.72	105	621099	19.9306	ug/L		98
92)	p-Isopropyltoluene	17.88	119	523649	19.9759	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	301598	19.9362	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	300266	19.6272	ug/L		97
95)	n-Butylbenzene	18.41	91	473351	19.7747	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	282119	19.8957	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	22784	20.5074	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	203918	19.6545	ug/L		98
99)	Hexachlorobutadiene	21.01	225	76009	19.1810	ug/L		99
100)	Naphthalene	21.24	128	421214	20.2755	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	187267	18.6967	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.26	96	643185	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	452398	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	244954	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	166582	25.3710 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.48%		
43) 1,2-Dichloroethane-d4	10.85	65	162624	25.1306 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.52%		
58) Toluene-d8	13.24	98	572476	24.7988 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.20%		
80) p-Bromofluorobenzene	16.64	95	228722	24.5846 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	553692	54.2200 ug/L	93
3) Chloromethane	4.04	50	600762	50.5019 ug/L	96
4) Vinyl Chloride	4.28	62	580327	49.7355 ug/L	98
5) 1,3-Butadiene	4.32	54	226006	52.2463 ug/L	89
6) Bromomethane	5.24	94	282558	56.0861 ug/L	99
7) Chloroethane	5.40	64	261262	52.0405 ug/L	86
8) Trichlorofluoromethane	5.91	101	620646	51.8976 ug/L	99
9) Diethyl ether	6.44	59	492985	98.9169 ug/L	81
10) Isoprene	6.48	67	496738	50.4991 ug/L	80
11) Acrolein	6.67	56	27556	50.4676 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	339922	50.2127 ug/L	99
13) Acetone	6.77	43	71305	51.3749 ug/L	91
14) 1,1-Dichloroethene	7.02	61	496978	50.6828 ug/L	82
15) Tert-Butyl Alcohol	7.11	59	73877	171.6018 ug/L	92
16) Dimethyl Sulfide	7.27	62	354958	50.6595 ug/L	78
17) Iodomethane	7.54	142	275688	48.2182 ug/L	99
18) Methyl acetate	7.53	43	172494	49.5541 ug/L #	83
19) Methylene Chloride	7.80	84	366519	49.4406 ug/L	58
20) Carbon Disulfide	7.86	76	1082478	51.2943 ug/L	99
21) Acrylonitrile	7.97	53	85120	52.9250 ug/L	99
22) Methyl Tert Butyl Ether	8.01	73	811828	49.9385 ug/L	90
23) trans-1,2-Dichloroethene	8.26	96	354872	50.2856 ug/L	76
24) n-Hexane	8.33	57	401945	50.3665 ug/L	84
25) Diisopropyl ether	8.66	45	1784496	98.2249 ug/L #	89
26) Vinyl Acetate	8.83	43	213738	42.3833 ug/L #	86
27) 1,1-Dichloroethane	8.87	63	581534	49.7460 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	1807267	98.1798 ug/L	90
29) 2-Butanone	9.42	43	84730	48.4371 ug/L #	77
30) Propionitrile	9.52	54	58459	102.4722 ug/L	99
31) 2,2-Dichloropropane	9.65	77	356297	40.0620 ug/L	78
32) cis-1,2-Dichloroethene	9.72	96	387448	49.9382 ug/L	85
33) Chloroform	9.92	83	612607	46.0004 ug/L	95
34) 1-Bromopropane	10.06	122	73633	53.5176 ug/L	100
35) Bromochloromethane	10.15	130	215507	52.7668 ug/L	100
36) Tetrahydrofuran	10.17	42	110912	96.2816 ug/L #	70
38) 1,1,1-Trichloroethane	10.46	97	545213	50.3562 ug/L	90
39) Cyclohexane	10.49	56	510981	51.0369 ug/L	77
40) 1,1-Dichloropropene	10.65	75	459189	50.1714 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	1722091	98.5314 ug/L	92
42) Carbon Tetrachloride	10.80	117	471043	55.1754 ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

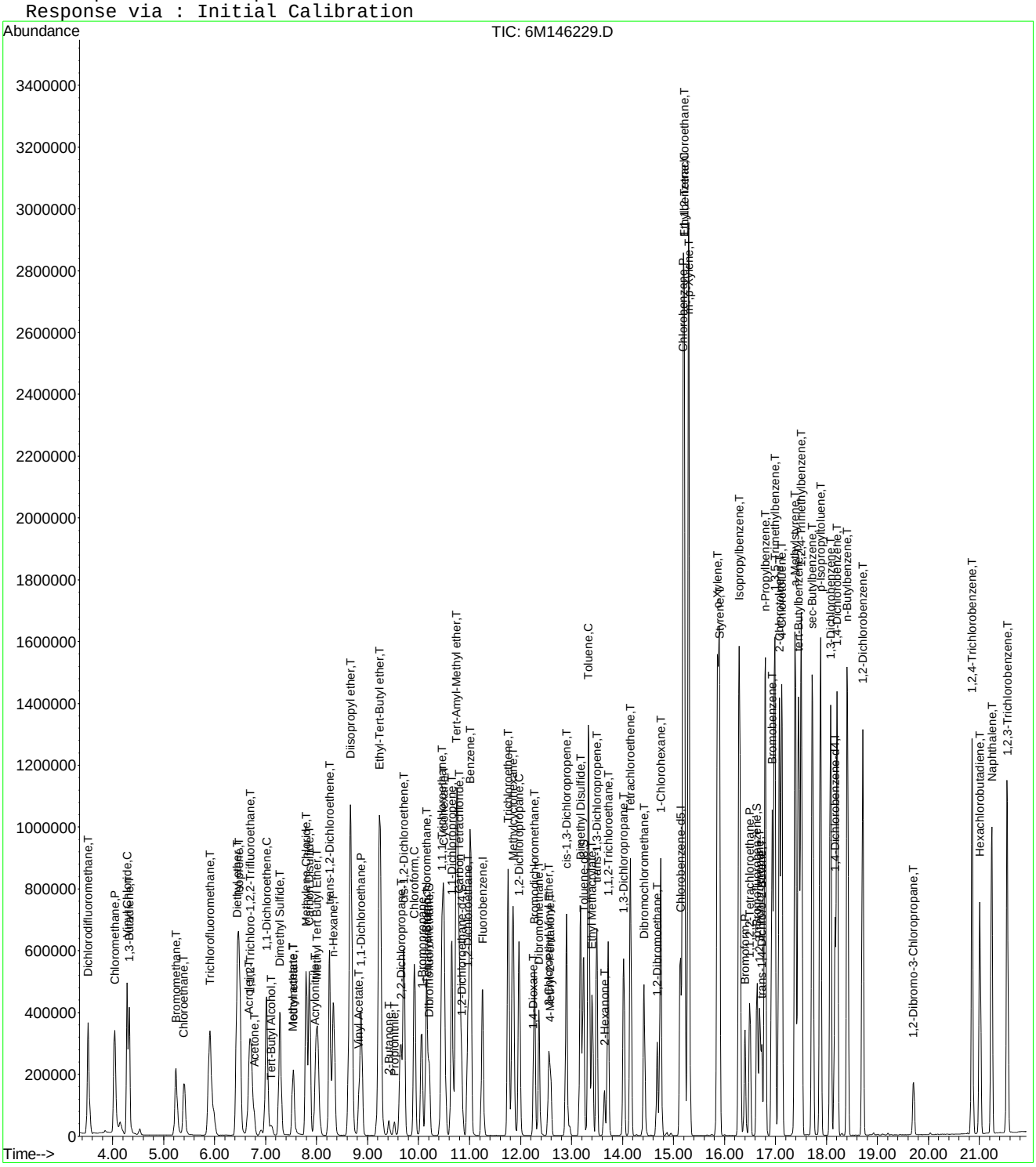
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	412436	49.7821	ug/L		89
46)	Benzene	11.01	78	1319158	47.9357	ug/L		87
47)	Trichloroethene	11.76	130	387869	51.7807	ug/L		87
48)	Methylcyclohexane	11.85	83	542828	50.1582	ug/L		81
49)	1,2-Dichloropropane	11.97	63	328985	50.6551	ug/L		93
50)	1,4-Dioxane	12.25	88	9841	208.3929	ug/L		83
51)	Bromodichloromethane	12.27	83	474501	51.7551	ug/L		99
52)	Dibromomethane	12.36	93	196449	51.3585	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	136743	53.6772	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	82093	49.1253	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	524104	51.9110	ug/L		95
56)	Dimethyl Disulfide	13.18	79	317578	49.8595	ug/L		90
59)	Toluene	13.33	91	1390320	49.1555	ug/L		99
60)	Ethyl Methacrylate	13.40	69	348973	50.9857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	449513	51.5430	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	269281	50.5203	ug/L		99
64)	2-Hexanone	13.65	43	126266	49.3321	ug/L		84
65)	1,3-Dichloropropane	14.02	76	449481	50.2374	ug/L		71
66)	Tetrachloroethene	14.16	166	348547	50.8542	ug/L		96
67)	Dibromochloromethane	14.42	129	344760	52.3235	ug/L		100
68)	1,2-Dibromoethane	14.68	107	258841	50.5741	ug/L		99
69)	1-Chlorohexane	14.75	91	464382	50.8434	ug/L		76
70)	Chlorobenzene	15.19	112	963037	49.7477	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	362017	52.2198	ug/L		100
72)	Ethylbenzene	15.21	106	525624	50.1565	ug/L		94
73)	m-,p-Xylene	15.30	106	1260386	100.6206	ug/L		93
74)	o-Xylene	15.86	106	613404	50.7466	ug/L		93
75)	Styrene	15.90	104	1057078	52.0932	ug/L		95
76)	Bromoform	16.40	173	214895	53.5191	ug/L		100
77)	Isopropylbenzene	16.29	105	1536873	50.8076	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	296759	46.5163	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	93220	49.4809	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	69453	51.2682	ug/L	#	1
83)	n-Propylbenzene	16.80	91	1831263	49.3764	ug/L		99
84)	Bromobenzene	16.93	156	411541	49.3938	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	1296579	49.3302	ug/L		99
86)	2-Chlorotoluene	17.08	91	1170064	47.3812	ug/L		97
87)	4-Chlorotoluene	17.12	91	1072560	49.1422	ug/L		95
88)	a-Methylstyrene	17.38	118	716903	49.3235	ug/L		100
89)	tert-Butylbenzene	17.46	134	276611	50.2256	ug/L		89
90)	1,2,4-Trimethylbenzene	17.51	105	1344827	49.8208	ug/L		86
91)	sec-Butylbenzene	17.72	105	1604756	49.5099	ug/L		98
92)	p-Isopropyltoluene	17.88	119	1361479	49.9346	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	771343	49.0216	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	773205	48.5928	ug/L		98
95)	n-Butylbenzene	18.41	91	1242193	49.8932	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	721223	48.9013	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	58274	50.4290	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	530769	49.1854	ug/L		99
99)	Hexachlorobutadiene	21.01	225	200495	48.6445	ug/L		100
100)	Naphthalene	21.24	128	1087303	50.3204	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	486226	46.6732	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	664065	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	468638	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	250611	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	341745	50.4124 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 201.64%#		
43) 1,2-Dichloroethane-d4	10.85	65	335061	50.1496 ug/L	0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 200.60%#		
58) Toluene-d8	13.23	98	1165336	48.7313 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 194.92%#		
80) p-Bromofluorobenzene	16.64	95	452319	47.5209 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 190.08%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	1092279	103.5976 ug/L	93
3) Chloromethane	4.04	50	1229045	100.8473 ug/L	98
4) Vinyl Chloride	4.27	62	967994	80.3511 ug/L	98
5) 1,3-Butadiene	4.32	54	358708	83.9572 ug/L	89
6) Bromomethane	5.23	94	557041	107.0928 ug/L	99
7) Chloroethane	5.40	64	501046	96.6647 ug/L	86
8) Trichlorofluoromethane	5.90	101	1280944	103.7431 ug/L	99
9) Diethyl ether	6.44	59	1046407	203.3587 ug/L	80
10) Isoprene	6.48	67	1028447	101.2660 ug/L	80
11) Acrolein	6.67	56	60742	107.7484 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	703798	100.6949 ug/L	99
13) Acetone	6.78	43	140983	98.3836 ug/L	90
14) 1,1-Dichloroethene	7.01	61	1000191	98.7943 ug/L	81
15) Tert-Butyl Alcohol	7.11	59	188168	423.3346 ug/L	91
16) Dimethyl Sulfide	7.28	62	716529	99.0473 ug/L	78
17) Iodomethane	7.54	142	665529	111.6922 ug/L	98
18) Methyl acetate	7.53	43	370733	103.1554 ug/L #	80
19) Methylene Chloride	7.80	84	728236	95.1448 ug/L	58
20) Carbon Disulfide	7.86	76	2173570	99.7583 ug/L	99
21) Acrylonitrile	7.97	53	179187	107.9098 ug/L	100
22) Methyl Tert Butyl Ether	8.01	73	1646227	98.0813 ug/L	91
23) trans-1,2-Dichloroethene	8.25	96	720013	98.8182 ug/L	75
24) n-Hexane	8.33	57	825655	100.2073 ug/L	84
25) Diisopropyl ether	8.66	45	3713047	197.9529 ug/L #	89
26) Vinyl Acetate	8.83	43	615132	118.1426 ug/L #	85
27) 1,1-Dichloroethane	8.87	63	1179111	97.6929 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	3847795	202.4591 ug/L	90
29) 2-Butanone	9.41	43	187675	103.9136 ug/L #	77
30) Propionitrile	9.52	54	123101	208.9977 ug/L	100
31) 2,2-Dichloropropane	9.64	77	930942	101.3837 ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	791312	98.7853 ug/L	87
33) Chloroform	9.92	83	1229915	89.4500 ug/L	95
34) 1-Bromopropane	10.06	122	153107	107.7815 ug/L	99
35) Bromochloromethane	10.16	130	453837	107.6278 ug/L	99
36) Tetrahydrofuran	10.18	42	239360	201.2527 ug/L #	68
38) 1,1,1-Trichloroethane	10.45	97	1128754	100.9745 ug/L	90
39) Cyclohexane	10.49	56	1047823	101.3662 ug/L	76
40) 1,1-Dichloropropene	10.65	75	936238	99.0778 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	3710771	205.6403 ug/L	92
42) Carbon Tetrachloride	10.80	117	1002331	113.7160 ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

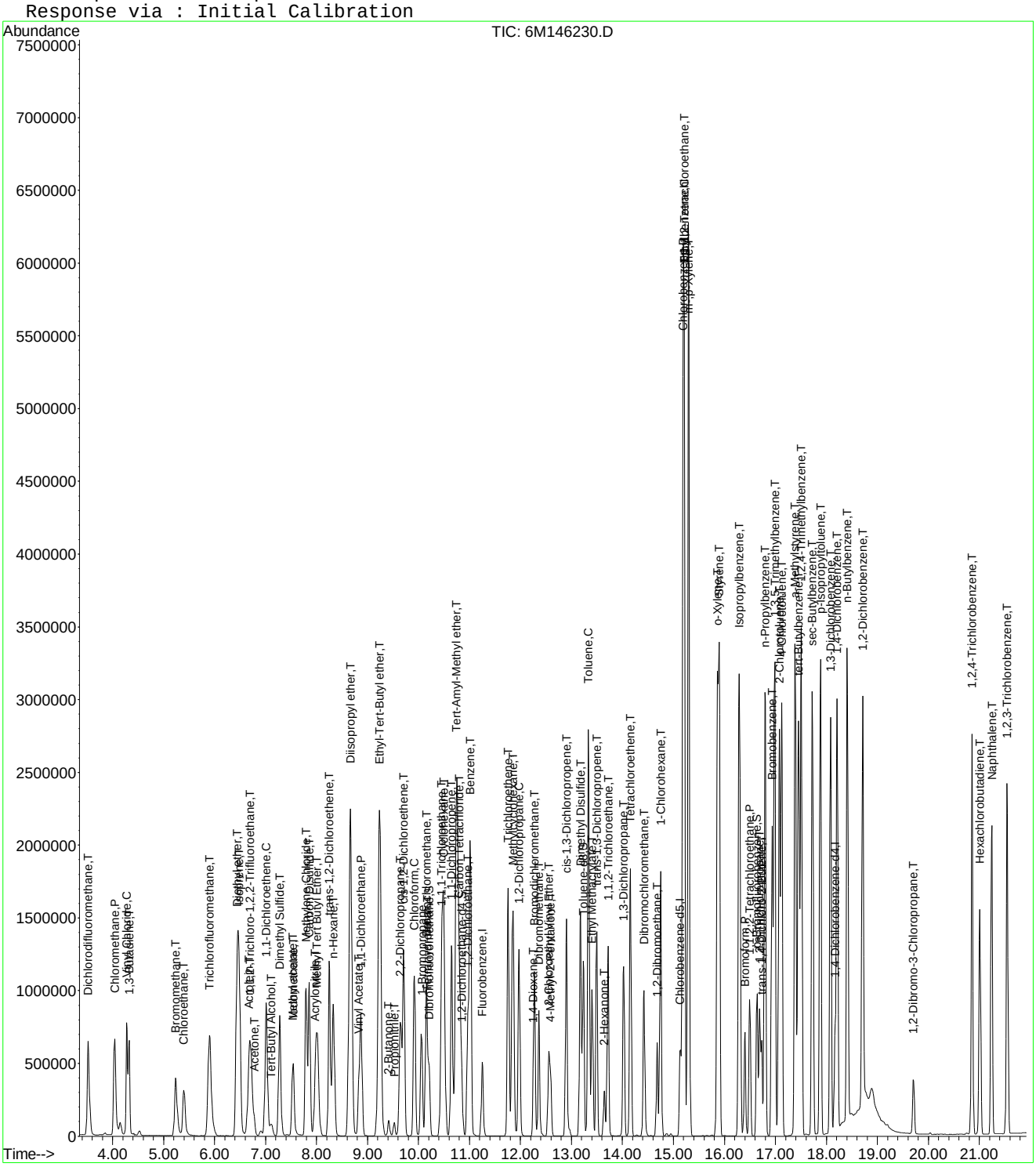
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	848725	99.2223	ug/L		88
46)	Benzene	11.01	78	2675533	94.1668	ug/L		87
47)	Trichloroethene	11.76	130	775075	100.2194	ug/L		86
48)	Methylcyclohexane	11.85	83	1124227	100.6142	ug/L		81
49)	1,2-Dichloropropane	11.97	63	661802	98.6962	ug/L		92
50)	1,4-Dioxane	12.25	88	21047	431.6772	ug/L		82
51)	Bromodichloromethane	12.27	83	965686	102.0182	ug/L		100
52)	Dibromomethane	12.36	93	405664	102.7198	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.56	63	290699	110.5233	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	180197	104.4413	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	1085875	104.1711	ug/L		95
56)	Dimethyl Disulfide	13.18	79	668834	101.7047	ug/L		90
59)	Toluene	13.33	91	2831304	96.6334	ug/L		99
60)	Ethyl Methacrylate	13.40	69	750754	105.8857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	942608	104.3378	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	558224	101.1002	ug/L		99
64)	2-Hexanone	13.64	43	274093	103.3770	ug/L		83
65)	1,3-Dichloropropane	14.03	76	927364	100.0574	ug/L		71
66)	Tetrachloroethene	14.16	166	715953	100.8400	ug/L		95
67)	Dibromochloromethane	14.42	129	727778	106.6258	ug/L		100
68)	1,2-Dibromoethane	14.68	107	543243	102.4642	ug/L		99
69)	1-Chlorohexane	14.75	91	954085	100.8392	ug/L		75
70)	Chlorobenzene	15.19	112	2008196	100.1428	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	774570	107.8575	ug/L		100
72)	Ethylbenzene	15.21	106	1116135	102.8139	ug/L		91
73)	m-,p-Xylene	15.29	106	2626638	202.4261	ug/L		89
74)	o-Xylene	15.86	106	1232018	98.3922	ug/L		94
75)	Styrene	15.89	104	2150597	102.3095	ug/L		96
76)	Bromoform	16.40	173	448000	107.7070	ug/L		99
77)	Isopropylbenzene	16.29	105	3046400	97.2211	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	638495	97.8234	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	193544	100.4136	ug/L	#	54
82)	trans-1,4-Dichloro-2-Buten	16.73	53	151702	109.4542	ug/L	#	1
83)	n-Propylbenzene	16.79	91	3593480	94.7040	ug/L		98
84)	Bromobenzene	16.94	156	823903	96.6540	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	2597441	96.5926	ug/L		99
86)	2-Chlorotoluene	17.08	91	2351484	93.0729	ug/L		97
87)	4-Chlorotoluene	17.12	91	2098144	93.9621	ug/L		95
88)	a-Methylstyrene	17.39	118	1476708	99.3054	ug/L		99
89)	tert-Butylbenzene	17.46	134	556423	98.7517	ug/L		90
90)	1,2,4-Trimethylbenzene	17.51	105	2720771	98.5191	ug/L		86
91)	sec-Butylbenzene	17.72	105	3204852	96.6442	ug/L		99
92)	p-Isopropyltoluene	17.89	119	2766683	99.1824	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	1563276	97.1091	ug/L		98
94)	1,4-Dichlorobenzene	18.21	146	1568190	96.3298	ug/L		98
95)	n-Butylbenzene	18.41	91	2566638	100.7630	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	1480882	98.1422	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	128198	108.4355	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	1094628	99.1474	ug/L		100
99)	Hexachlorobutadiene	21.01	225	409810	97.1846	ug/L		99
100)	Naphthalene	21.25	128	2294953	103.8129	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	1006776	94.4596	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146230.D 8260BWT.M Thu Apr 06 14:58:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	690233	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	498674	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	255138	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	723475	102.6772	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 410.72%#				
43) 1,2-Dichloroethane-d4	10.85	65	702452	101.1521	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 404.60%#				
58) Toluene-d8	13.24	98	2516915	98.9113	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 395.64%#				
80) p-Bromofluorobenzene	16.64	95	966850	99.7755	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 399.12%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	2275311	207.6213	ug/L		93
3) Chloromethane	4.04	50	2474245	196.0665	ug/L		98
4) Vinyl Chloride	4.27	62	2319895	185.2689	ug/L		98
5) 1,3-Butadiene	4.31	54	816680	218.8754	ug/L		89
6) Bromomethane	5.23	94	1250039	231.2125	ug/L		99
7) Chloroethane	5.40	64	1064300	197.5465	ug/L		86
8) Trichlorofluoromethane	5.90	101	2718616	211.8320	ug/L		99
9) Diethyl ether	6.44	59	4640	0.8676	ug/L	#	53
10) Isoprene	6.48	67	2127378	201.5306	ug/L		80
11) Acrolein	6.67	56	9706	16.5644	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	1494747	205.7510	ug/L		99
13) Acetone	6.77	43	308579	207.1749	ug/L		90
14) 1,1-Dichloroethene	7.01	61	2162367	205.4912	ug/L		81
15) Tert-Butyl Alcohol	7.12	59	25996	56.2677	ug/L		92
16) Dimethyl Sulfide	7.27	62	1547256	205.7718	ug/L		78
17) Iodomethane	7.54	142	1235435	198.8594	ug/L		98
18) Methyl acetate	7.53	43	780560	208.9546	ug/L	#	80
19) Methylene Chloride	7.80	84	1587097	199.4946	ug/L		58
20) Carbon Disulfide	7.86	76	4648119	205.2426	ug/L		98
21) Acrylonitrile	8.01	53	30991	17.9558	ug/L	#	37
22) Methyl Tert Butyl Ether	8.01	73	3211564	184.0891	ug/L		91
23) trans-1,2-Dichloroethene	8.24	96	1562245	206.2818	ug/L		75
24) n-Hexane	8.33	57	1747043	203.9948	ug/L		84
25) Diisopropyl ether	8.66	45	2991	0.1534	ug/L	#	78
26) Vinyl Acetate	8.83	43	1230567	227.3831	ug/L	#	84
27) 1,1-Dichloroethane	8.87	63	2550945	203.3406	ug/L		98
28) Ethyl-Tert-Butyl ether	9.24	59	7221	0.3655	ug/L		93
29) 2-Butanone	9.42	43	378724	201.7454	ug/L	#	77
30) Propionitrile	9.52	54	2541	4.1505	ug/L	#	56
31) 2,2-Dichloropropane	9.64	77	1886252	197.6333	ug/L		77
32) cis-1,2-Dichloroethene	9.72	96	1724251	207.0903	ug/L		86
33) Chloroform	9.92	83	2655020	185.7753	ug/L		95
34) 1-Bromopropane	10.06	122	290747	196.9152	ug/L		99
35) Bromochloromethane	10.15	130	939086	214.2618	ug/L		100
36) Tetrahydrofuran	10.18	42	5089	4.1166	ug/L		86
38) 1,1,1-Trichloroethane	10.46	97	2469058	212.4998	ug/L		89
39) Cyclohexane	10.49	56	2270992	211.3662	ug/L	#	75
40) 1,1-Dichloropropene	10.64	75	2000053	203.6322	ug/L		80
41) Tert-Amyl-Methyl ether	10.75	73	11602	0.6186	ug/L		88
42) Carbon Tetrachloride	10.80	117	1931578	210.8325	ug/L		99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

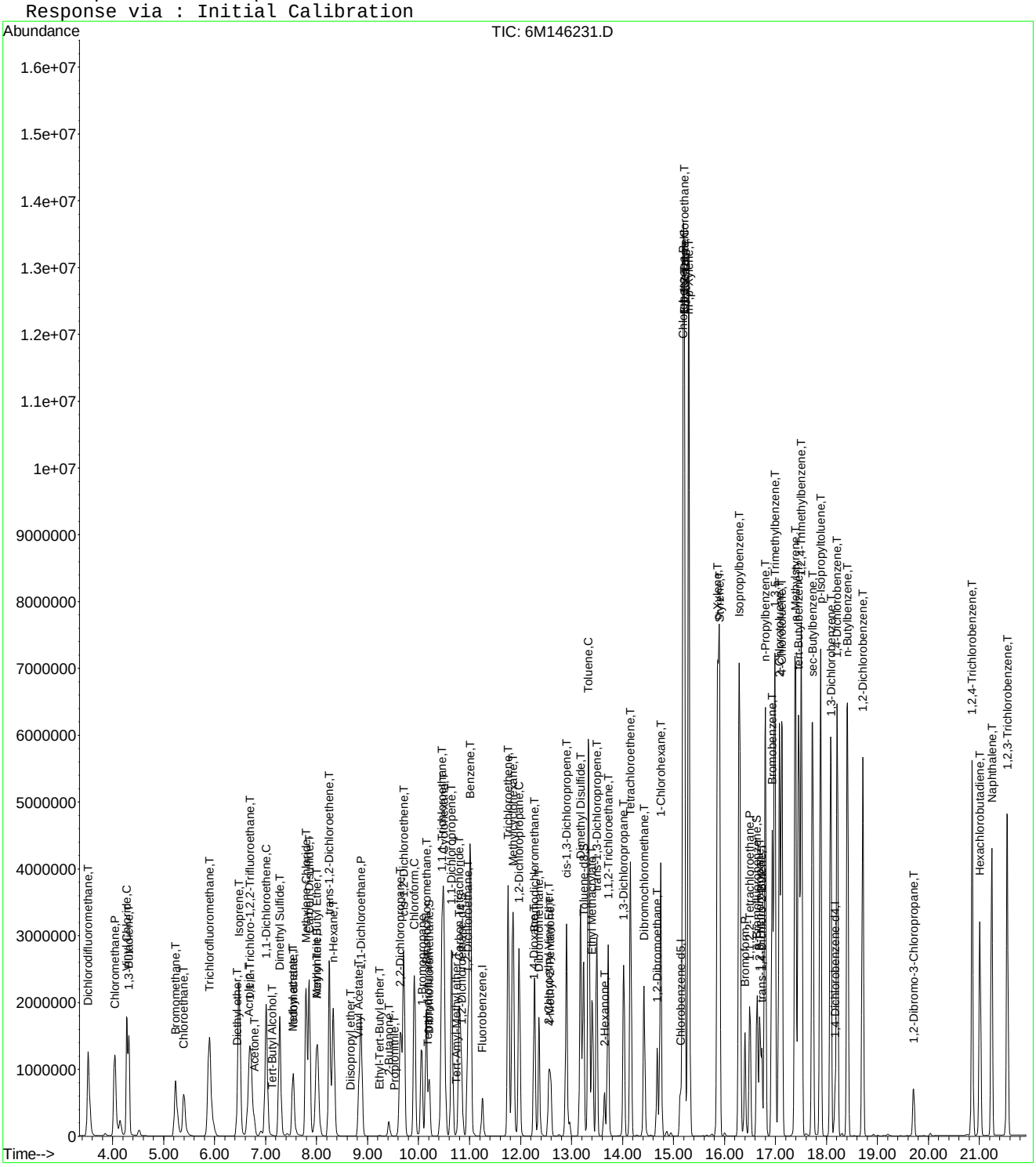
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	1796420	202.0529	ug/L		88
46)	Benzene	11.01	78	5629098	190.6080	ug/L		88
47)	Trichloroethene	11.76	130	1658935	206.3727	ug/L		87
48)	Methylcyclohexane	11.85	83	2386424	205.4792	ug/L		81
49)	1,2-Dichloropropane	11.97	63	1424092	204.3268	ug/L		91
50)	1,4-Dioxane	12.26	88	5637	111.2325	ug/L	#	42
51)	Bromodichloromethane	12.27	83	2075418	210.9415	ug/L		100
52)	Dibromomethane	12.36	93	844625	205.7626	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	484387	177.1812	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	361541	201.6031	ug/L		79
55)	cis-1,3-Dichloropropene	12.90	75	2281875	210.6076	ug/L		95
56)	Dimethyl Disulfide	13.18	79	1458790	213.4177	ug/L		90
59)	Toluene	13.33	91	5996618	192.3392	ug/L		96
60)	Ethyl Methacrylate	13.40	69	1573548	208.5646	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	1986746	206.6682	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	1198048	203.9100	ug/L		99
64)	2-Hexanone	13.65	43	554015	196.3669	ug/L		83
65)	1,3-Dichloropropane	14.02	76	1969579	199.7070	ug/L		71
66)	Tetrachloroethene	14.16	166	1553218	205.5897	ug/L		94
67)	Dibromochloromethane	14.42	129	1570999	216.3018	ug/L		99
68)	1,2-Dibromoethane	14.68	107	1128869	200.0979	ug/L		100
69)	1-Chlorohexane	14.75	91	2077549	206.3548	ug/L		76
70)	Chlorobenzene	15.19	112	4552595	213.3503	ug/L		97
71)	1,1,1,2-Tetrachloroethane	15.21	131	1778263	232.7054	ug/L		99
72)	Ethylbenzene	15.21	106	2629830	227.6583	ug/L		78
73)	m-,p-Xylene	15.30	106	5831651	422.3560	ug/L		72
74)	o-Xylene	15.86	106	2806681	210.6481	ug/L		89
75)	Styrene	15.90	104	4761074	212.8544	ug/L		99
76)	Bromoform	16.40	173	946995	213.9608	ug/L		98
77)	Isopropylbenzene	16.29	105	6429037	192.8147	ug/L		96
79)	1,1,2,2-Tetrachloroethane	16.50	83	1322669	199.0497	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	401464	204.5900	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	305769	216.7003	ug/L	#	1
83)	n-Propylbenzene	16.80	91	7135293	184.7099	ug/L		94
84)	Bromobenzene	16.93	156	1779598	205.0645	ug/L		84
85)	1,3,5-Trimethylbenzene	16.99	105	5473541	199.9363	ug/L		97
86)	2-Chlorotoluene	17.08	91	4805990	186.8483	ug/L		96
87)	4-Chlorotoluene	17.12	91	4663827	205.1564	ug/L		94
88)	a-Methylstyrene	17.39	118	3146362	207.8317	ug/L		99
89)	tert-Butylbenzene	17.46	134	1201485	209.4513	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	5700578	202.7553	ug/L		82
91)	sec-Butylbenzene	17.73	105	6486144	192.1230	ug/L		99
92)	p-Isopropyltoluene	17.88	119	5687835	200.2844	ug/L		98
93)	1,3-Dichlorobenzene	18.09	146	3282192	200.2687	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	3295686	198.8532	ug/L		96
95)	n-Butylbenzene	18.42	91	5169144	199.3335	ug/L		98
96)	1,2-Dichlorobenzene	18.71	146	3028833	197.1676	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.71	75	238291	197.9807	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	2255491	200.6692	ug/L		99
99)	Hexachlorobutadiene	21.01	225	836245	194.7931	ug/L		99
100)	Naphthalene	21.24	128	4440092	197.2852	ug/L		98
101)	1,2,3-Trichlorobenzene	21.55	180	2031369	187.2092	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146231.D 8260BWT.M Thu Apr 06 14:58:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	670280	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	474156	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	251420	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	1065288	155.6886 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 622.76%#		
43) 1,2-Dichloroethane-d4	10.84	65	1022057	151.5559 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 606.24%#		
58) Toluene-d8	13.23	98	3651048	150.9004 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 603.60%#		
80) p-Bromofluorobenzene	16.64	95	1466208	153.5450 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 614.20%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	3198	0.3005 ug/L #	64
3) Chloromethane	4.02	50	124029	9.3687 ug/L	97
4) Vinyl Chloride	4.27	62	2879	0.2368 ug/L	96
5) 1,3-Butadiene	4.31	54	952750	291.3161 ug/L	90
6) Bromomethane	5.21	94	256997	48.9503 ug/L	98
8) Trichlorofluoromethane	5.89	101	1832	0.1470 ug/L #	92
9) Diethyl ether	6.44	59	1626336	313.1315 ug/L	80
10) Isoprene	6.47	67	3326056	324.4632 ug/L	81
11) Acrolein	6.67	56	83031	145.9205 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1896	0.2688 ug/L #	63
13) Acetone	6.78	43	359192	248.3344 ug/L	88
14) 1,1-Dichloroethene	7.01	61	2982	0.2918 ug/L	94
15) Tert-Butyl Alcohol	7.12	59	274170	611.1000 ug/L	90
16) Dimethyl Sulfide	7.28	62	2259113	309.3863 ug/L	78
17) Iodomethane	7.53	142	1774336	293.7287 ug/L	98
18) Methyl acetate	7.53	43	1146284	315.9929 ug/L #	79
19) Methylene Chloride	7.79	84	3453	0.4470 ug/L	74
20) Carbon Disulfide	7.85	76	6560949	298.3296 ug/L	98
21) Acrylonitrile	7.97	53	242452	144.6554 ug/L	93
22) Methyl Tert Butyl Ether	8.02	73	17659	1.0424 ug/L #	49
23) trans-1,2-Dichloroethene	8.25	96	3508	0.4770 ug/L	84
24) n-Hexane	8.33	57	2563085	308.1896 ug/L	84
25) Diisopropyl ether	8.66	45	5624093	297.0560 ug/L #	88
26) Vinyl Acetate	8.83	43	1560345	296.9020 ug/L #	86
27) 1,1-Dichloroethane	8.87	63	1658	0.1361 ug/L #	43
28) Ethyl-Tert-Butyl ether	9.24	59	5792489	301.9568 ug/L	90
29) 2-Butanone	9.41	43	537846	295.0381 ug/L #	77
30) Propionitrile	9.52	54	181548	305.3695 ug/L	99
32) cis-1,2-Dichloroethene	9.71	96	2592	0.3206 ug/L	71
33) Chloroform	9.91	83	3316	0.2389 ug/L #	81
34) 1-Bromopropane	10.05	122	479000	334.0712 ug/L	100
35) Bromochloromethane	10.16	130	2635	0.6191 ug/L	93
36) Tetrahydrofuran	10.18	42	348793	290.5441 ug/L #	69
39) Cyclohexane	10.49	56	3263442	312.7774 ug/L	77
40) 1,1-Dichloropropene	10.65	75	3347	0.3509 ug/L #	34
41) Tert-Amyl-Methyl ether	10.75	73	5509448	302.4868 ug/L	92
45) 1,2-Dichloroethane	10.96	62	6370	0.7378 ug/L #	78
46) Benzene	11.01	78	5876	0.2049 ug/L #	70
47) Trichloroethene	11.75	130	2541	0.3255 ug/L	78
48) Methylcyclohexane	11.85	83	3537517	313.6594 ug/L	81

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:22 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

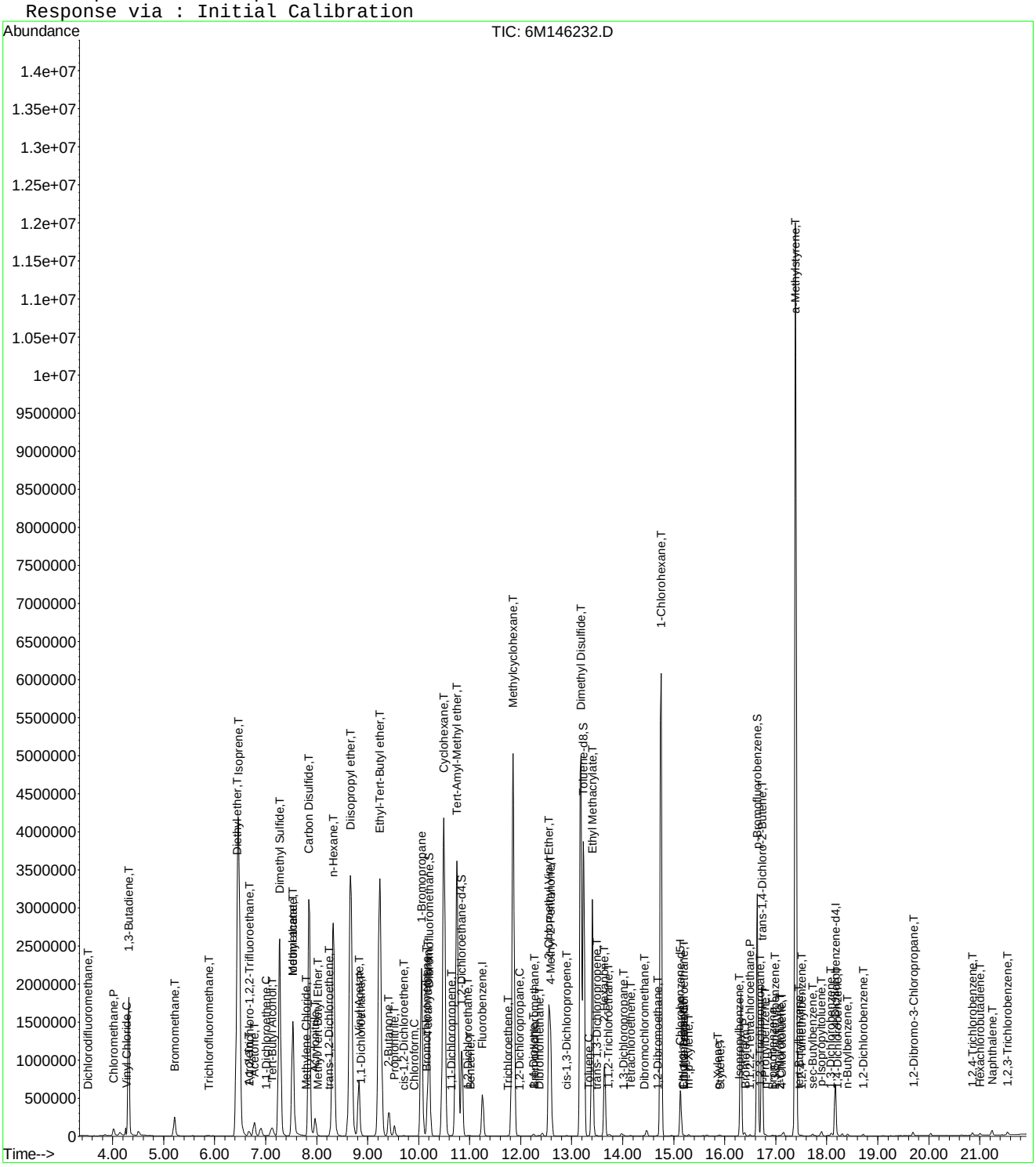
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
49)	1,2-Dichloropropane	11.97	63	846	0.1250	ug/L	#	35
50)	1,4-Dioxane	12.25	88	29442	598.2608	ug/L		83
51)	Bromodichloromethane	12.27	83	2460	0.2575	ug/L		95
52)	Dibromomethane	12.36	93	4528	1.1359	ug/L		94
53)	2-Chloroethyl Vinyl Ether	12.56	63	864405	325.5982	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	524164	300.9860	ug/L		80
55)	cis-1,3-Dichloropropene	12.90	75	4329	0.4114	ug/L		88
56)	Dimethyl Disulfide	13.18	79	2174908	327.6559	ug/L		91
59)	Toluene	13.33	91	8304	0.2801	ug/L		97
60)	Ethyl Methacrylate	13.40	69	2284715	318.4843	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	8074	0.8833	ug/L		92
63)	1,1,2-Trichloroethane	13.72	97	5984	1.0712	ug/L		96
64)	2-Hexanone	13.64	43	803768	299.6215	ug/L		83
65)	1,3-Dichloropropane	14.02	76	10167	1.0842	ug/L		86
66)	Tetrachloroethene	14.16	166	2501	0.3482	ug/L		97
67)	Dibromochloromethane	14.42	129	5257	0.7612	ug/L		98
68)	1,2-Dibromoethane	14.68	107	7804	1.4548	ug/L		95
69)	1-Chlorohexane	14.75	91	3093710	323.1754	ug/L		77
70)	Chlorobenzene	15.18	112	6402	0.3155	ug/L		89
71)	1,1,1,2-Tetrachloroethane	15.20	131	1051	0.1446	ug/L	#	24
72)	Ethylbenzene	15.20	106	2758	0.2511	ug/L		82
73)	m-,p-Xylene	15.29	106	7899	0.6017	ug/L		94
74)	o-Xylene	15.86	106	2490	0.1965	ug/L		71
75)	Styrene	15.90	104	7614	0.3580	ug/L		91
76)	Bromoform	16.41	173	6944	1.6500	ug/L		95
77)	Isopropylbenzene	16.28	105	23768	0.7497	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	12720	1.9426	ug/L		97
81)	1,2,3-Trichloropropane	16.69	110	5207	2.6928	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.73	53	468972	337.2782	ug/L	#	50
83)	n-Propylbenzene	16.79	91	25834	0.6786	ug/L		98
84)	Bromobenzene	16.94	156	4350	0.5087	ug/L		80
85)	1,3,5-Trimethylbenzene	16.99	105	9549	0.3540	ug/L		94
86)	2-Chlorotoluene	17.08	91	10250	0.4044	ug/L		85
87)	4-Chlorotoluene	17.12	91	10678	0.4767	ug/L		93
88)	a-Methylstyrene	17.39	118	4860473	325.8044	ug/L		98
89)	tert-Butylbenzene	17.46	134	3329	0.5889	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.51	105	10602	0.3827	ug/L		84
91)	sec-Butylbenzene	17.72	105	27629	0.8305	ug/L		96
92)	p-Isopropyltoluene	17.89	119	16184	0.5783	ug/L		93
93)	1,3-Dichlorobenzene	18.08	146	10117	0.6264	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	11412	0.6988	ug/L		90
95)	n-Butylbenzene	18.41	91	21424	0.8384	ug/L		95
96)	1,2-Dichlorobenzene	18.71	146	10357	0.6842	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	4375	3.6887	ug/L		97
98)	1,2,4-Trichlorobenzene	20.86	180	14842	1.3400	ug/L		97
99)	Hexachlorobutadiene	21.01	225	8098	1.9142	ug/L		93
100)	Naphthalene	21.25	128	71843	3.2394	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	18787	1.7570	ug/L		95

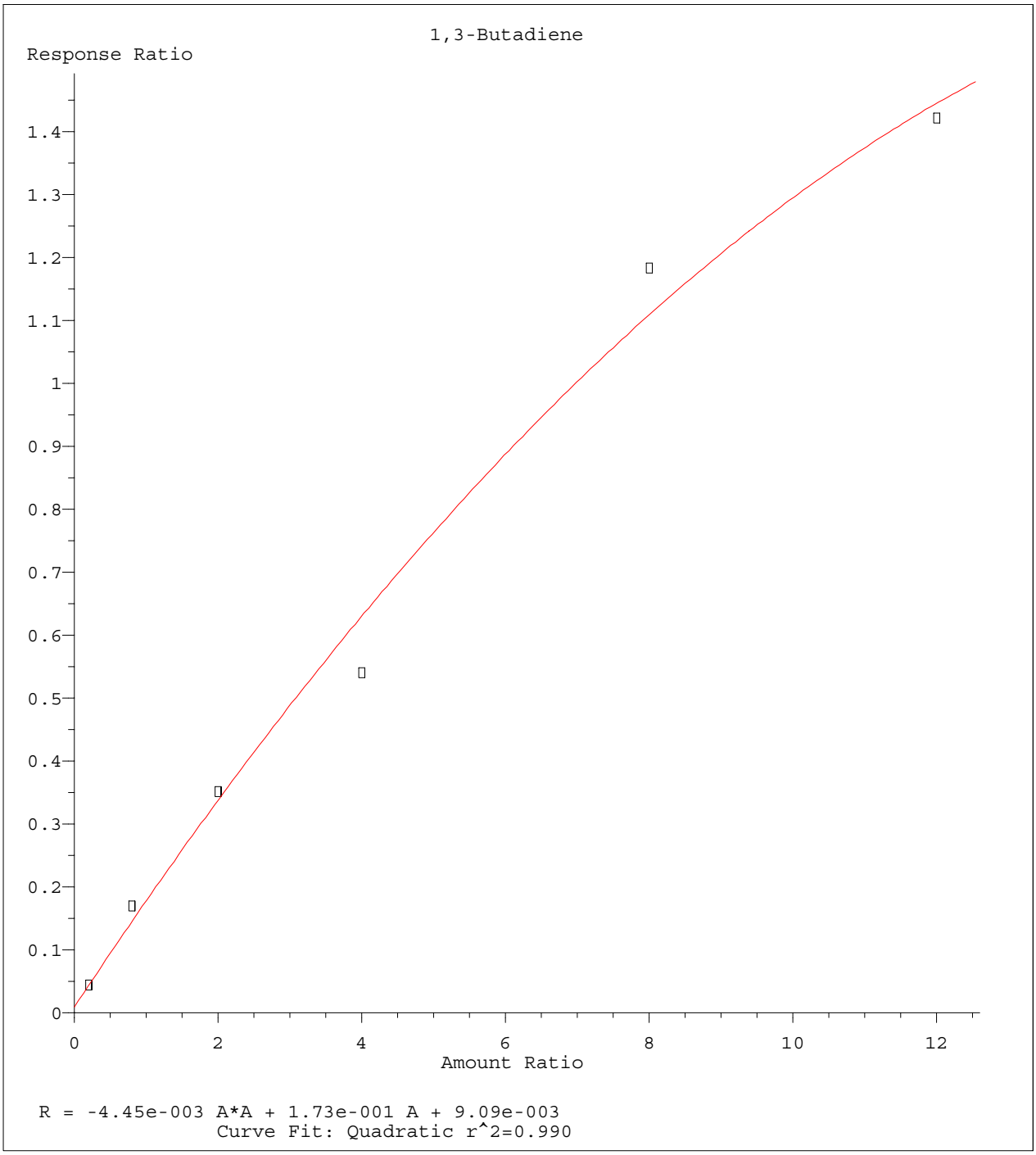
(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:23 2017 Page 2

Quantitation Report (Not Reviewed)

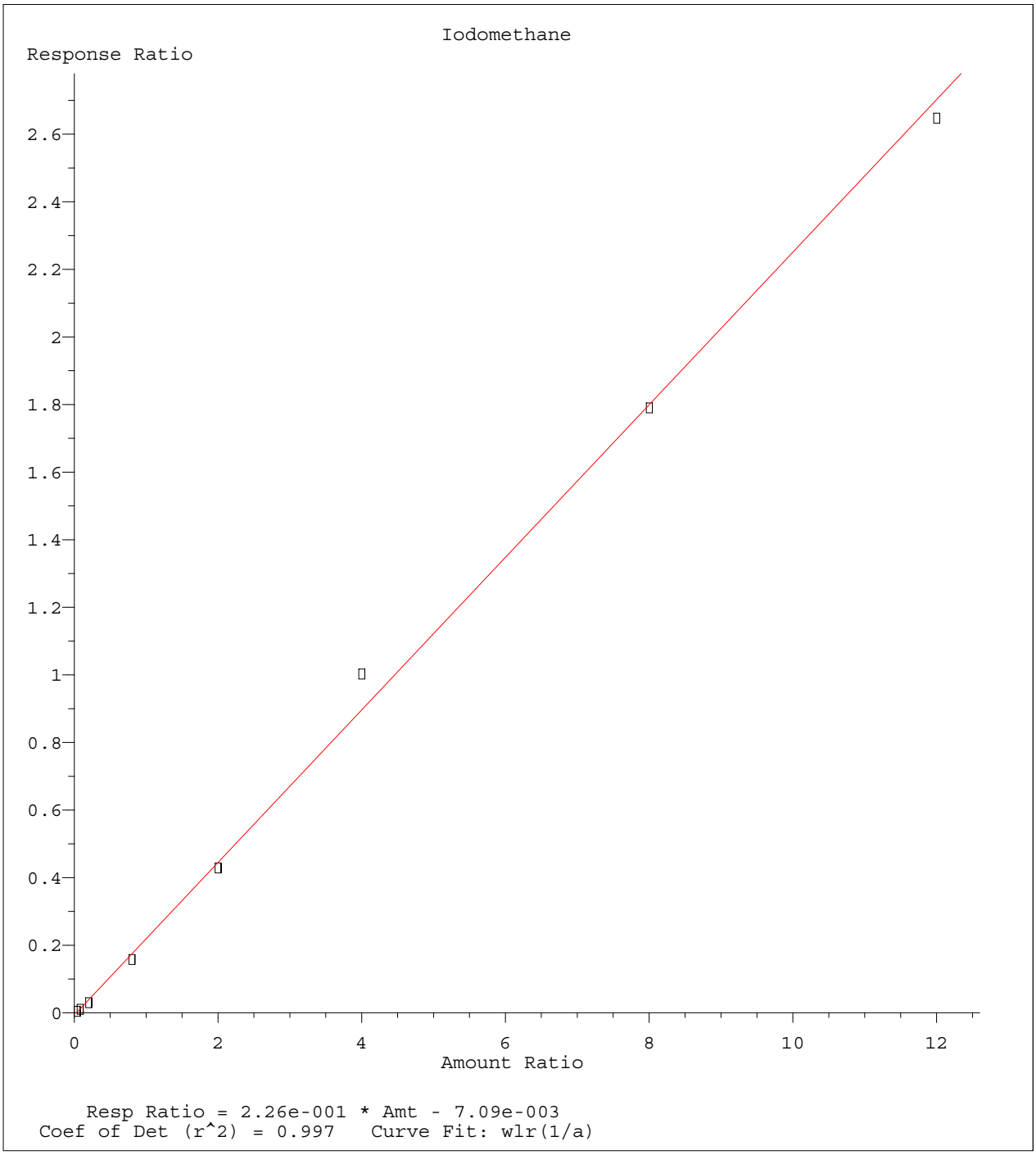
Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

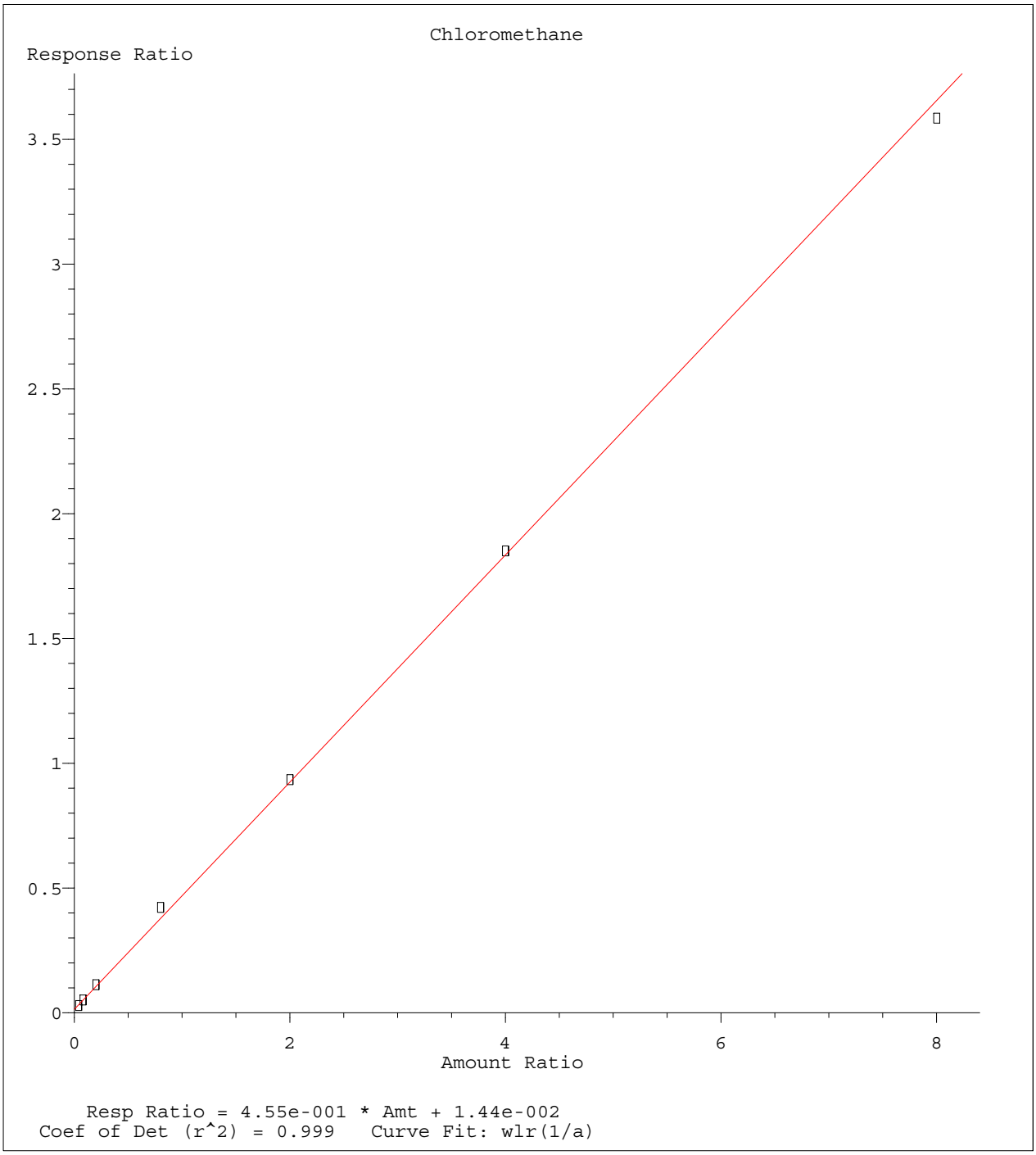




Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.26	96	670831	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	482468	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	257501	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	178273	26.0327	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.12%				
43) 1,2-Dichloroethane-d4	10.85	65	171804	25.4551	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.84%				
58) Toluene-d8	13.24	98	618189	25.1100	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.44%				
80) p-Bromofluorobenzene	16.64	95	243106	24.8575	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.44%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	261278	24.5311	ug/L		94
3) Chloromethane	4.04	50	284057	22.4610	ug/L		99
4) Vinyl Chloride	4.27	62	267730	21.9996	ug/L		98
5) 1,3-Butadiene	4.31	54	117985	24.7175	ug/L		89
6) Bromomethane	5.23	94	93039	17.7066	ug/L		98
7) Chloroethane	5.40	64	119687	22.8578	ug/L		85
8) Trichlorofluoromethane	5.90	101	262422	21.0391	ug/L		99
9) Diethyl ether	6.44	59	528084	101.5927	ug/L		82
10) Isoprene	6.48	67	201796	19.6694	ug/L		81
11) Acrolein	6.67	56	92591	162.5878	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	153538	21.7457	ug/L		98
13) Acetone	6.77	43	27527	19.0157	ug/L		88
14) 1,1-Dichloroethene	7.01	61	204274	19.9737	ug/L		84
15) Tert-Butyl Alcohol	7.12	59	102016	227.1976	ug/L		91
16) Dimethyl Sulfide	7.27	62	152875	20.9191	ug/L		78
17) Iodomethane	7.54	142	153036	26.0301	ug/L		99
18) Methyl acetate	7.53	43	73917	20.3598	ug/L	#	82
19) Methylene Chloride	7.80	84	150043	19.4056	ug/L		61
20) Carbon Disulfide	7.86	76	355422	16.1479	ug/L		99
21) Acrylonitrile	7.97	53	36232	21.5995	ug/L		100
22) Methyl Tert Butyl Ether	8.01	73	352993	20.8190	ug/L		92
23) trans-1,2-Dichloroethene	8.25	96	144008	19.5650	ug/L		78
24) n-Hexane	8.33	57	166297	19.9794	ug/L		85
25) Diisopropyl ether	8.66	45	1988872	104.9629	ug/L	#	90
26) Vinyl Acetate	8.83	43	160945	30.5994	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	240190	19.6997	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1886475	98.2593	ug/L		90
29) 2-Butanone	9.42	43	36957	20.2563	ug/L	#	79
30) Propionitrile	9.52	54	63234	106.2742	ug/L		100
31) 2,2-Dichloropropane	9.65	77	204249	22.0193	ug/L		80
32) cis-1,2-Dichloroethene	9.72	96	157553	19.4701	ug/L		90
33) Chloroform	9.92	83	257055	18.5067	ug/L		94
34) 1-Bromopropane	10.06	122	38246	26.6522	ug/L		98
35) Bromochloromethane	10.15	130	91199	21.4098	ug/L		99
36) Tetrahydrofuran	10.17	42	123208	102.5478	ug/L	#	71
38) 1,1,1-Trichloroethane	10.46	97	227236	20.1227	ug/L		91
39) Cyclohexane	10.49	56	186905	17.8988	ug/L		77
40) 1,1-Dichloropropene	10.65	75	187277	19.6188	ug/L		83
41) Tert-Amyl-Methyl ether	10.75	73	1887460	103.5427	ug/L		92
42) Carbon Tetrachloride	10.80	117	183539	20.6128	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:43 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

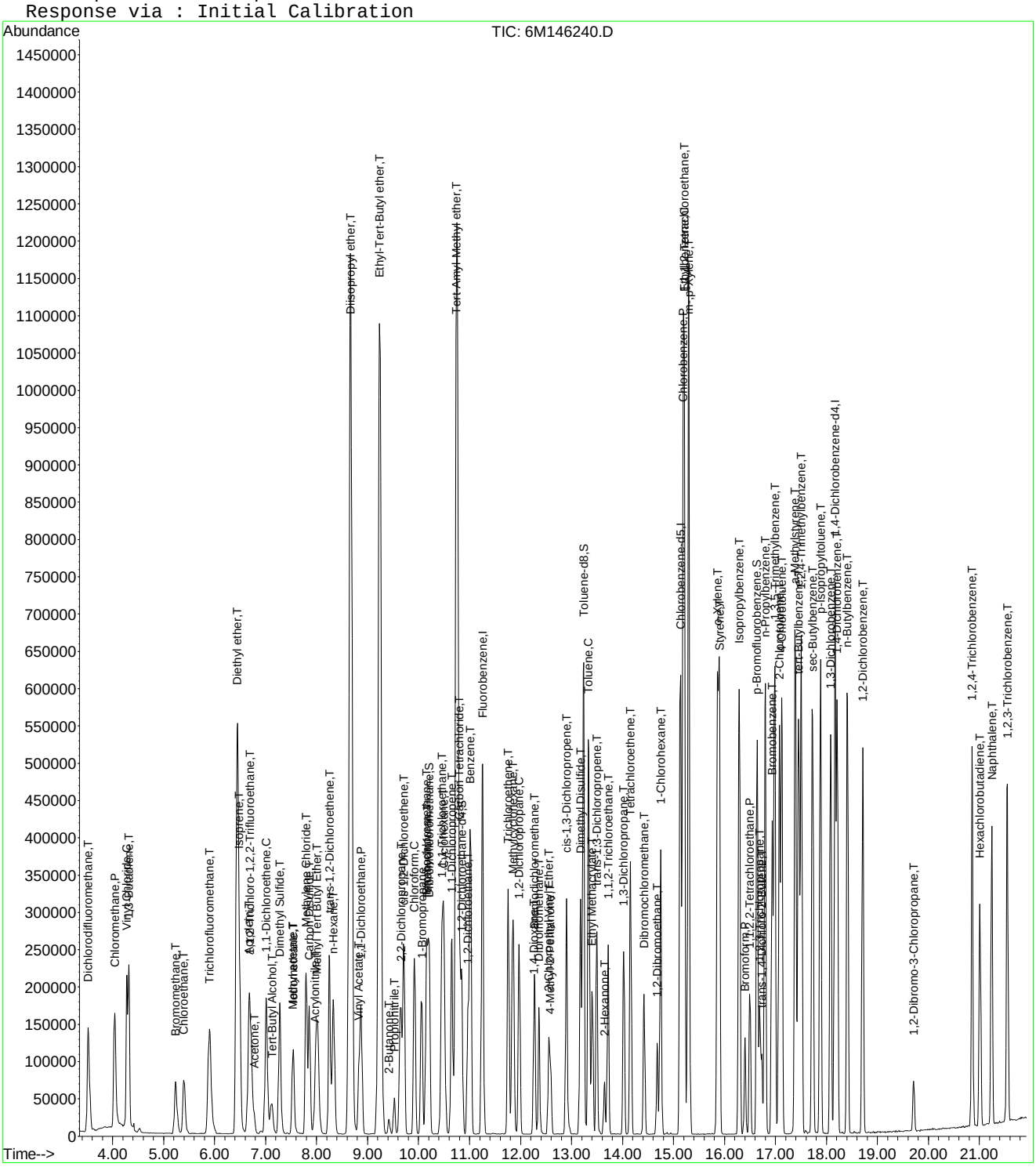
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	168256	19.4720	ug/L		89
46)	Benzene	11.01	78	540364	18.8266	ug/L		86
47)	Trichloroethene	11.76	130	145590	18.6353	ug/L		88
48)	Methylcyclohexane	11.85	83	208804	18.4987	ug/L		82
49)	1,2-Dichloropropane	11.97	63	132922	19.6231	ug/L		94
50)	1,4-Dioxane	12.26	88	10470	212.5754	ug/L		89
51)	Bromodichloromethane	12.27	83	185813	19.4319	ug/L		99
52)	Dibromomethane	12.36	93	81782	20.4995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	67812	25.5220	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	36319	20.8380	ug/L		84
55)	cis-1,3-Dichloropropene	12.90	75	227477	21.6024	ug/L		94
56)	Dimethyl Disulfide	13.18	79	134164	20.1956	ug/L		89
59)	Toluene	13.33	91	559021	18.5327	ug/L		99
60)	Ethyl Methacrylate	13.40	69	152544	20.8980	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	184754	19.8643	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107408	18.8951	ug/L		99
64)	2-Hexanone	13.65	43	58431	21.4061	ug/L		83
65)	1,3-Dichloropropane	14.02	76	192119	20.1344	ug/L		71
66)	Tetrachloroethene	14.16	166	141756	19.3936	ug/L		96
67)	Dibromochloromethane	14.42	129	136028	19.3580	ug/L		98
68)	1,2-Dibromoethane	14.68	107	106469	19.5061	ug/L		100
69)	1-Chlorohexane	14.75	91	199484	20.4795	ug/L		76
70)	Chlorobenzene	15.19	112	378551	18.3361	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	137413	18.5860	ug/L		97
72)	Ethylbenzene	15.21	106	207722	18.5860	ug/L		92
73)	m-,p-Xylene	15.30	106	498999	37.3538	ug/L		92
74)	o-Xylene	15.86	106	243704	18.9049	ug/L		94
75)	Styrene	15.90	104	417768	19.3046	ug/L		96
76)	Bromoform	16.40	173	80208	18.7306	ug/L		98
77)	Isopropylbenzene	16.29	105	603691	18.7136	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	131416	19.5954	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	38665	19.5232	ug/L		71
82)	trans-1,4-Dichloro-2-Buten	16.73	53	25343	17.7959	ug/L	#	1
83)	n-Propylbenzene	16.80	91	714710	18.3318	ug/L		99
84)	Bromobenzene	16.93	156	162348	18.5358	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	512320	18.5422	ug/L		99
86)	2-Chlorotoluene	17.08	91	450684	17.3610	ug/L		97
87)	4-Chlorotoluene	17.12	91	432917	18.8688	ug/L		96
88)	a-Methylstyrene	17.38	118	306134	20.0360	ug/L		98
89)	tert-Butylbenzene	17.46	134	110255	19.0440	ug/L		91
90)	1,2,4-Trimethylbenzene	17.51	105	530643	18.7005	ug/L		86
91)	sec-Butylbenzene	17.73	105	623072	18.2864	ug/L		99
92)	p-Isopropyltoluene	17.88	119	543701	18.9695	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	304800	18.4272	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	308581	18.4481	ug/L		98
95)	n-Butylbenzene	18.41	91	494571	18.8967	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	287359	18.5345	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	23576	19.4080	ug/L		93
98)	1,2,4-Trichlorobenzene	20.86	180	212338	18.7182	ug/L		99
99)	Hexachlorobutadiene	21.01	225	80592	18.6006	ug/L		100
100)	Naphthalene	21.24	128	425467	18.7312	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	199388	18.2068	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 16:54 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	107	0.00
2	T	Dichlorodifluoromethane	20.0000	24.5311	-22.7#	120	0.00
3	P	Chloromethane	20.0000	22.4610	-12.3	107	0.02
4	C	Vinyl Chloride	20.0000	21.9995	-10.0	115	0.00
5	T	1,3-Butadiene	20.0000	24.7175	-23.6#	111	0.00
6	T	Bromomethane	20.0000	17.7066	11.5	95	0.02
7	T	Chloroethane	20.0000	22.8578	-14.3	115	0.02
8	T	Trichlorofluoromethane	20.0000	21.0391	-5.2	109	0.00
9	T	Diethyl ether	80.0000	101.5927	-27.0#	139	0.00
10	T	Isoprene	20.0000	19.6694	1.7	113	0.00
11	T	Acrolein	40.0000	162.5878	-306.5#	452	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	20.0000	21.7457	-8.7	116	0.00
13	T	Acetone	20.0000	19.0157	4.9	95	0.00
14	C	1,1-Dichloroethene	20.0000	19.9737	0.1	104	0.00
15	T	Tert-Butyl Alcohol	160.0000	227.1976	-42.0#	157	0.00
16	T	Dimethyl Sulfide	20.0000	20.9191	-4.6	117	0.00
17	T	Iodomethane	20.0000	26.0301	-30.2#	155	0.00
18	T	Methyl acetate	20.0000	20.3597	-1.8	118	0.00
19	T	Methylene Chloride	20.0000	19.4056	3.0	105	0.00
20	T	Carbon Disulfide	20.0000	16.1479	19.3	91	0.00
21	T	Acrylonitrile	40.0000	21.5995	46.0#	57	0.00
22	T	Methyl Tert Butyl Ether	20.0000	20.8190	-4.1	107	-0.01
23	T	trans-1,2-Dichloroethene	20.0000	19.5650	2.2	104	0.00
24	T	n-Hexane	20.0000	19.9794	0.1	114	0.00
25	T	Diisopropyl ether	80.0000	104.9629	-31.2#	142	0.00
26	T	Vinyl Acetate	20.0000	30.5994	-53.0#	189	0.00
27	P	1,1-Dichloroethane	20.0000	19.6997	1.5	103	0.00
28	T	Ethyl-Tert-Butyl ether	80.0000	98.2593	-22.8#	133	0.00
29	T	2-Butanone	20.0000	20.2563	-1.3	108	0.00
30	T	Propionitrile	80.0000	106.2742	-32.8#	144	0.00
31	T	2,2-Dichloropropane	20.0000	22.0193	-10.1	137	0.00
32	T	cis-1,2-Dichloroethene	20.0000	19.4701	2.6	104	0.00
33	C	Chloroform	20.0000	18.5067	7.5	106	0.00
34		1-Bromopropane	20.0000	26.6522	-33.3#	136	0.00
35	T	Bromochloromethane	20.0000	21.4098	-7.0	107	0.00
36	T	Tetrahydrofuran	80.0000	102.5478	-28.2#	142	0.00
37	S	Dibromofluoromethane	10.0000	26.0327	-160.3#	272	0.00
38	T	1,1,1-Trichloroethane	20.0000	20.1227	-0.6	107	0.00
39	T	Cyclohexane	20.0000	17.8988	10.5	102	0.00
40	T	1,1-Dichloropropene	20.0000	19.6188	1.9	104	0.00
41	T	Tert-Amyl-Methyl ether	80.0000	103.5426	-29.4#	142	0.00
42	T	Carbon Tetrachloride	20.0000	20.6128	-3.1	104	-0.01
43	S	1,2-Dichloroethane-d4	10.0000	25.4551	-154.6#	267	0.00
44		Heptane	-1.0000	0.0000	0.0	142	0.00
45	T	1,2-Dichloroethane	20.0000	19.4720	2.6	104	0.00
46	T	Benzene	20.0000	18.8266	5.9	102	0.00
47	T	Trichloroethene	20.0000	18.6353	6.8	97	0.00
48	T	Methylcyclohexane	20.0000	18.4987	7.5	106	0.00
49	C	1,2-Dichloropropane	20.0000	19.6231	1.9	101	0.00
50	T	1,4-Dioxane	160.0000	212.5754	-32.9#	149	0.00
51	T	Bromodichloromethane	20.0000	19.4319	2.8	100	0.00
52	T	Dibromomethane	20.0000	20.4995	-2.5	106	0.00
53	T	2-Chloroethyl Vinyl Ether	20.0000	25.5220	-27.6#	127	0.00
54	T	4-Methyl-2-Pentanone	20.0000	20.8380	-4.2	113	0.00

(#) = Out of Range
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	20.0000	21.6024	-8.0	110	0.00
56	T	Dimethyl Disulfide	20.0000	20.1956	-1.0	119	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	108	0.00
58	S	Toluene-d8	10.0000	25.1100	-151.1#	271	0.00
59	C	Toluene	20.0000	18.5327	7.3	101	0.00
60	T	Ethyl Methacrylate	20.0000	20.8980	-4.5	118	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	20.0000	19.8643	0.7	104	0.00
63	T	1,1,2-Trichloroethane	20.0000	18.8951	5.5	100	0.00
64	T	2-Hexanone	20.0000	21.4061	-7.0	116	0.00
65	T	1,3-Dichloropropane	20.0000	20.1344	-0.7	107	0.00
66	T	Tetrachloroethene	20.0000	19.3936	3.0	104	0.00
67	T	Dibromochloromethane	20.0000	19.3580	3.2	101	0.00
68	T	1,2-Dibromoethane	20.0000	19.5061	2.5	106	0.00
69	T	1-Chlorohexane	20.0000	20.4795	-2.4	119	0.00
70	P	Chlorobenzene	20.0000	18.3361	8.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	20.0000	18.5860	7.1	100	0.00
72	C	Ethylbenzene	20.0000	18.5860	7.1	103	0.00
73	T	m-,p-Xylene	40.0000	37.3538	6.6	104	0.00
74	T	o-Xylene	20.0000	18.9049	5.5	102	0.00
75	T	Styrene	20.0000	19.3046	3.5	103	0.00
76	P	Bromoform	20.0000	18.7306	6.3	99	0.00
77	T	Isopropylbenzene	20.0000	18.7136	6.4	101	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	109	0.00
79	P	1,1,2,2-Tetrachloroethane	20.0000	19.5954	2.0	110	0.00
80	S	p-Bromofluorobenzene	10.0000	24.8575	-148.6#	265	0.00
81	T	1,2,3-Trichloropropane	20.0000	19.5233	2.4	104	0.00
82	T	trans-1,4-Dichloro-2-Butene	20.0000	17.7959	11.0	102	0.00
83	T	n-Propylbenzene	20.0000	18.3318	8.3	100	0.00
84	T	Bromobenzene	20.0000	18.5358	7.3	101	0.00
85	T	1,3,5-Trimethylbenzene	20.0000	18.5422	7.3	102	0.00
86	T	2-Chlorotoluene	20.0000	17.3610	13.2	93	0.00
87	T	4-Chlorotoluene	20.0000	18.8688	5.7	112	0.00
88	T	a-Methylstyrene	20.0000	20.0360	-0.2	119	0.00
89	T	tert-Butylbenzene	20.0000	19.0440	4.8	103	0.00
90	T	1,2,4-Trimethylbenzene	20.0000	18.7005	6.5	102	0.00
91	T	sec-Butylbenzene	20.0000	18.2864	8.6	100	0.00
92	T	p-Isopropyltoluene	20.0000	18.9695	5.2	104	0.00
93	T	1,3-Dichlorobenzene	20.0000	18.4272	7.9	101	0.00
94	T	1,4-Dichlorobenzene	20.0000	18.4481	7.8	103	0.00
95	T	n-Butylbenzene	20.0000	18.8967	5.5	104	0.00
96	T	1,2-Dichlorobenzene	20.0000	18.5345	7.3	102	0.00
97	T	1,2-Dibromo-3-Chloropropane	20.0000	19.4080	3.0	103	0.00
98	T	1,2,4-Trichlorobenzene	20.0000	18.7182	6.4	104	0.00
99	T	Hexachlorobutadiene	20.0000	18.6007	7.0	106	0.00
100	T	Naphthalene	20.0000	18.7312	6.3	101	0.00
101	T	1,2,3-Trichlorobenzene	20.0000	18.2068	9.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:24 2017 Quant Results File: A9FOOWT.RES

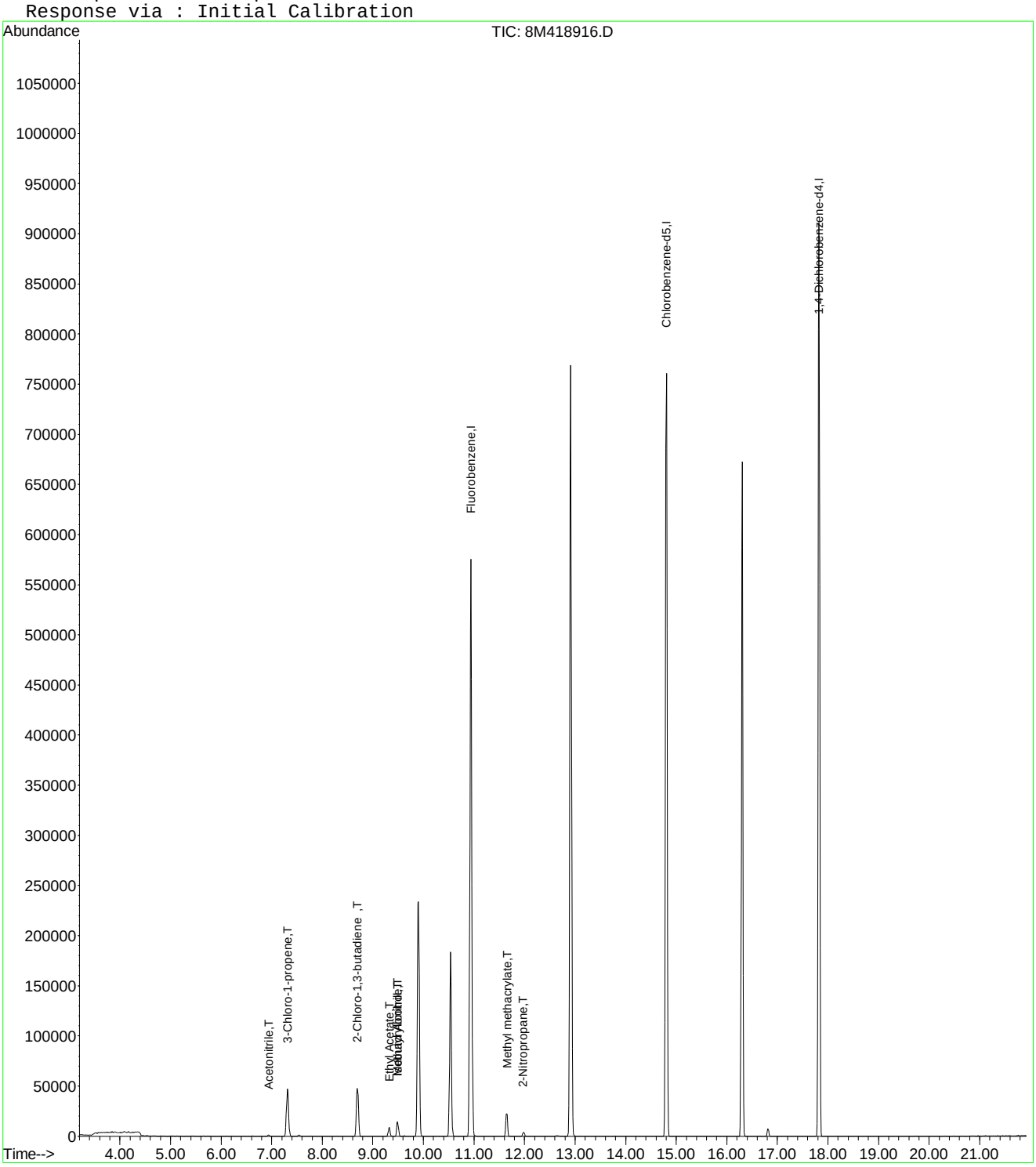
Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746277	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	612130	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	333789	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.95	41	1710	4.5291	ug/L		90
3) 3-Chloro-1-propene	7.31	41	46601	4.6885	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	42607	4.4258	ug/L		60
5) Ethyl Acetate	9.33	43	14817	4.8044	ug/L		100
6) Methacrylonitrile	9.49	67	7777	4.3375	ug/L	#	64
7) Isobutyl Alcohol	9.49	43	409	3.2163	ug/L	#	8
9) Methyl methacrylate	11.65	41	14303	4.3932	ug/L	#	57
10) 2-Nitropropane	11.97	43	3479	3.6066	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418916.D A9FOOWT.M Mon Jul 03 11:20:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	-1.0000	4.5291	0.0	100	0.01
3	T	3-Chloro-1-propene	5.0000	4.6885	6.2	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.4258	11.5	100	0.00
5	T	Ethyl Acetate	5.0000	4.8044	3.9	100	0.01
6	T	Methacrylonitrile	5.0000	4.3375	13.2	100	0.00
7	T	Isobutyl Alcohol	-1.0000	3.2163	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.41#
9	T	Methyl methacrylate	5.0000	4.3932	12.1	100	0.01
10	T	2-Nitropropane	-1.0000	3.6066	0.0	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	0.0000	0.0	0	-16.07#

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418916.D A9FOOWT.M Fri Apr 14 14:10:53 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:26 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

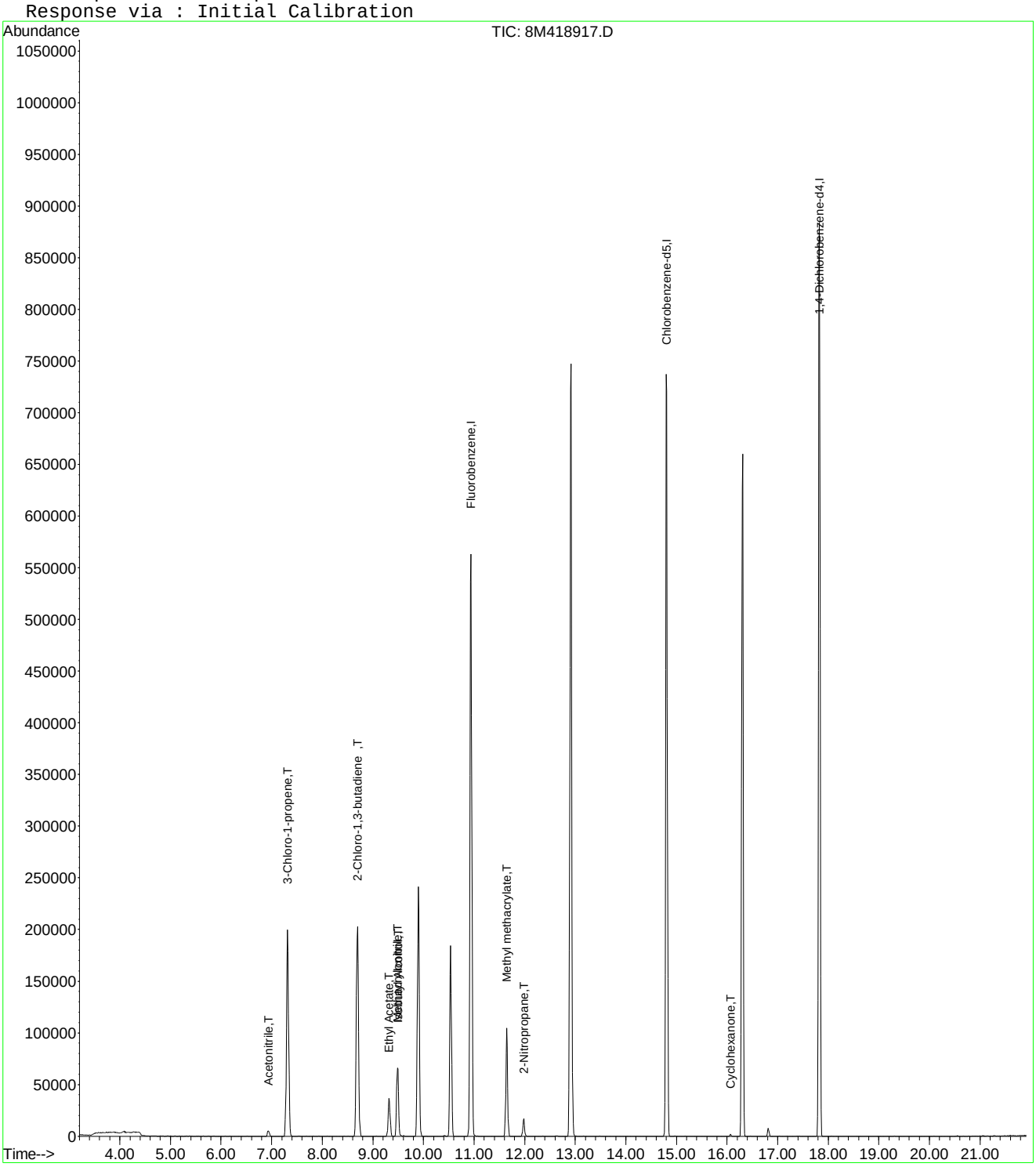
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746151	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	609753	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	336388	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	7512	19.8997	ug/L		98
3) 3-Chloro-1-propene	7.31	41	187894	18.9072	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	178575	18.5528	ug/L		58
5) Ethyl Acetate	9.32	43	60325	19.5637	ug/L		93
6) Methacrylonitrile	9.48	67	35176	19.6222	ug/L	#	56
7) Isobutyl Alcohol	9.49	43	3848	30.2653	ug/L	#	98
9) Methyl methacrylate	11.64	41	60538	18.5974	ug/L		57
10) 2-Nitropropane	11.99	43	15961	16.5493	ug/L		97
13) Cyclohexanone	16.07	55	1572	15.8886	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418917.D A9FOOWT.M Mon Jul 03 11:20:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.8997	0.5	100	0.00
3	T	3-Chloro-1-propene	20.0000	18.9072	5.5	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	18.5528	7.2	100	0.00
5	T	Ethyl Acetate	20.0000	19.5637	2.2	100	0.00
6	T	Methacrylonitrile	20.0000	19.6222	1.9	100	0.00
7	T	Isobutyl Alcohol	-1.0000	30.2653	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	20.0000	18.5974	7.0	100	0.00
10	T	2-Nitropropane	20.0000	16.5493	17.3	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	15.8886	20.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418917.D A9FOOWT.M Fri Apr 14 14:07:45 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

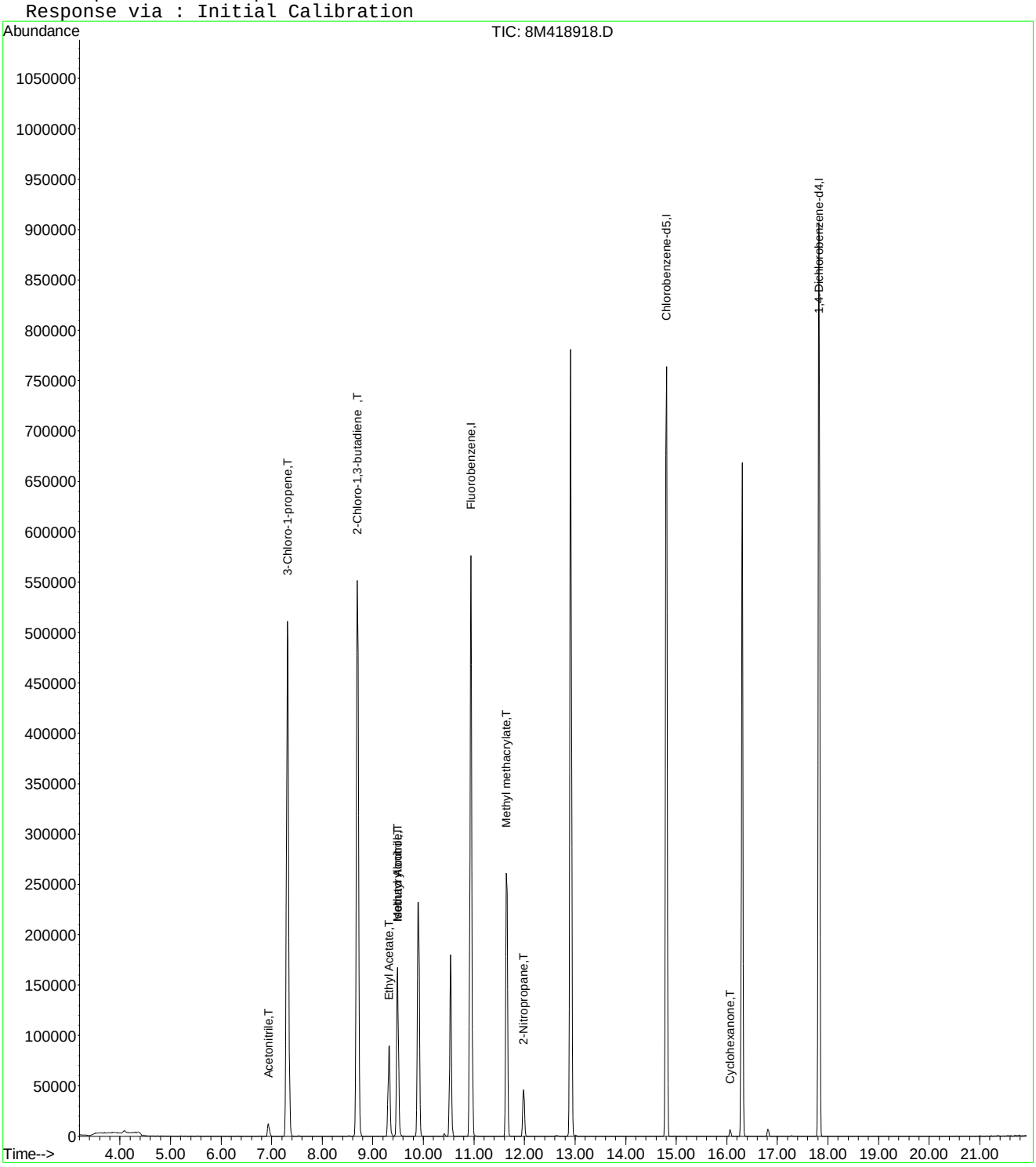
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	742498	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	604990	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	330523	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	17705	47.1322	ug/L		98
3) 3-Chloro-1-propene	7.31	41	486302	49.1759	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	471228	49.1983	ug/L		59
5) Ethyl Acetate	9.32	43	145956	47.5671	ug/L		92
6) Methacrylonitrile	9.49	67	84850	47.5646	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	10376	82.0109	ug/L		100
9) Methyl methacrylate	11.64	41	152652	47.1258	ug/L		59
10) 2-Nitropropane	11.98	43	41969	43.7301	ug/L		97
13) Cyclohexanone	16.07	55	4089	42.0619	ug/L	#	58

(#) = qualifier out of range (m) = manual integration
8M418918.D A9FOOWT.M Mon Jul 03 11:20:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	47.1322	5.7	100	0.00
3	T	3-Chloro-1-propene	50.0000	49.1759	1.6	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	49.1983	1.6	100	0.00
5	T	Ethyl Acetate	50.0000	47.5671	4.9	100	0.00
6	T	Methacrylonitrile	50.0000	47.5646	4.9	100	0.00
7	T	Isobutyl Alcohol	100.0000	82.0109	18.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	50.0000	47.1258	5.7	100	0.00
10	T	2-Nitropropane	50.0000	43.7301	12.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	42.0619	15.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418918.D A9FOOWT.M Fri Apr 14 14:08:07 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:30 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

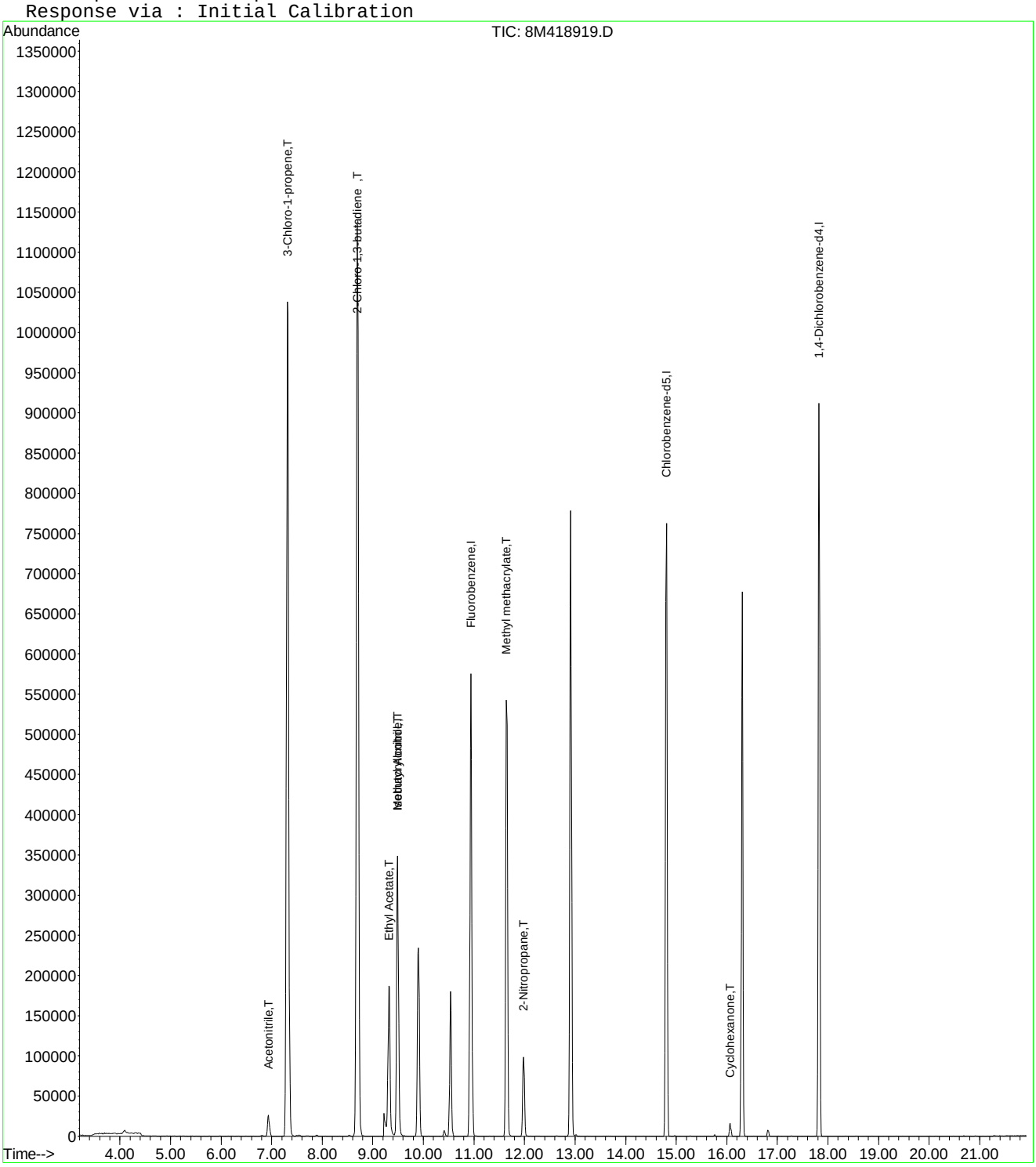
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	739808	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	600111	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	325970	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	37316	99.6994	ug/L		97
3) 3-Chloro-1-propene	7.31	41	997371	101.2231	ug/L		83
4) 2-Chloro-1,3-butadiene	8.69	53	975175	102.1828	ug/L		59
5) Ethyl Acetate	9.32	43	298184	97.5316	ug/L		91
6) Methacrylonitrile	9.49	67	175302	98.6268	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	23313	184.9338	ug/L		94
9) Methyl methacrylate	11.64	41	318110	98.5622	ug/L		58
10) 2-Nitropropane	11.98	43	93106	97.3657	ug/L		99
13) Cyclohexanone	16.07	55	9597	100.0994	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	99.6994	0.3	100	0.00
3	T	3-Chloro-1-propene	100.0000	101.2231	-1.2	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	102.1828	-2.2	100	0.00
5	T	Ethyl Acetate	100.0000	97.5315	2.5	100	0.00
6	T	Methacrylonitrile	100.0000	98.6268	1.4	100	0.00
7	T	Isobutyl Alcohol	200.0000	184.9338	7.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	100.0000	98.5622	1.4	100	0.00
10	T	2-Nitropropane	100.0000	97.3657	2.6	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	100.0994	-0.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:08:27 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:32 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

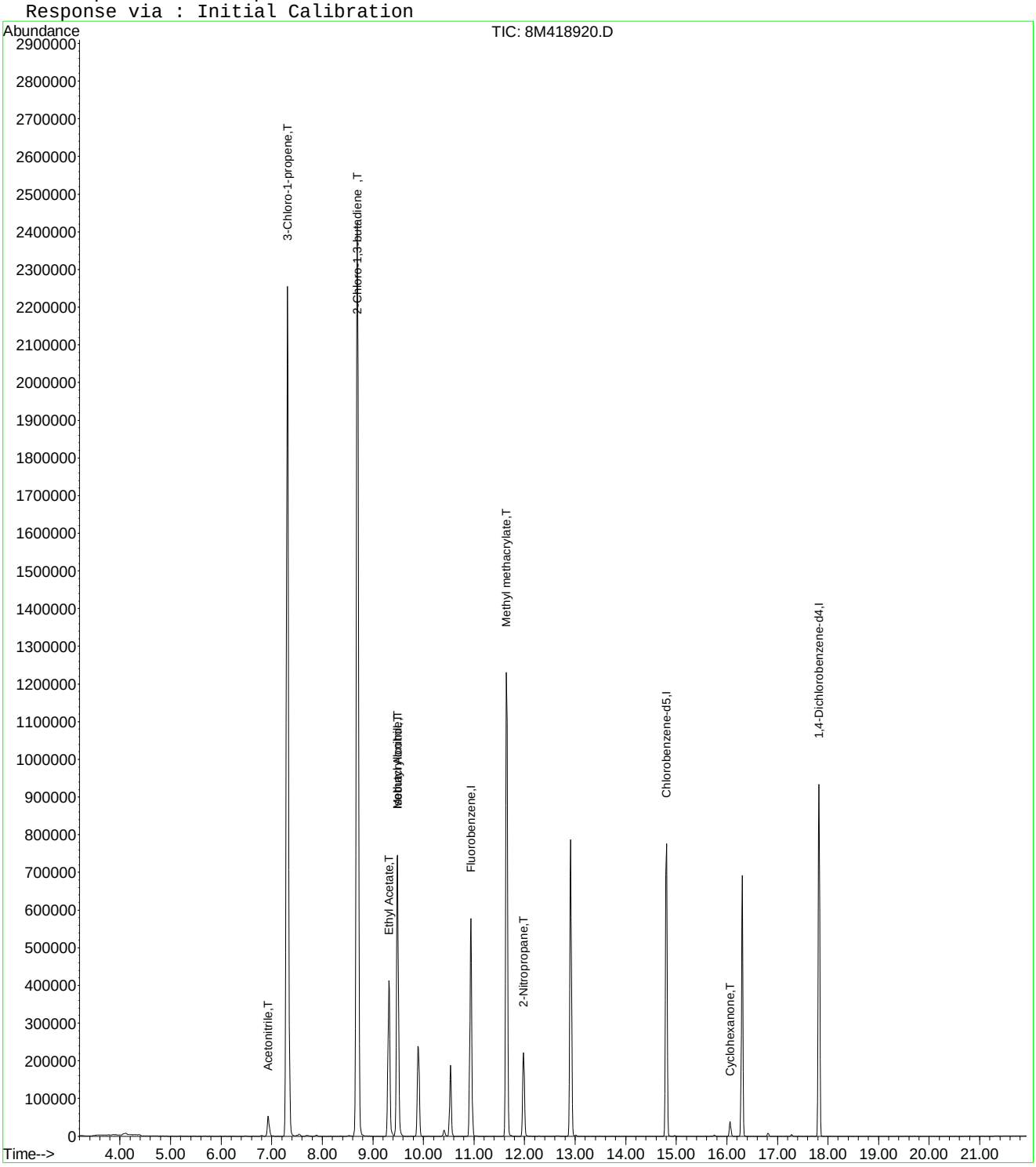
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	757530	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	615643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	339067	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	77830	203.0784	ug/L		95
3) 3-Chloro-1-propene	7.31	41	2094851	207.6324	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	2059315	210.7353	ug/L		59
5) Ethyl Acetate	9.31	43	656953	209.8526	ug/L		92
6) Methacrylonitrile	9.49	67	384959	211.5153	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	53170	411.9115	ug/L		94
9) Methyl methacrylate	11.64	41	704517	213.1786	ug/L		59
10) 2-Nitropropane	11.98	43	205555	209.9305	ug/L		100
13) Cyclohexanone	16.07	55	21273	213.3128	ug/L	#	65

(#) = qualifier out of range (m) = manual integration
8M418920.D A9FOOWT.M Mon Jul 03 11:20:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41:23 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

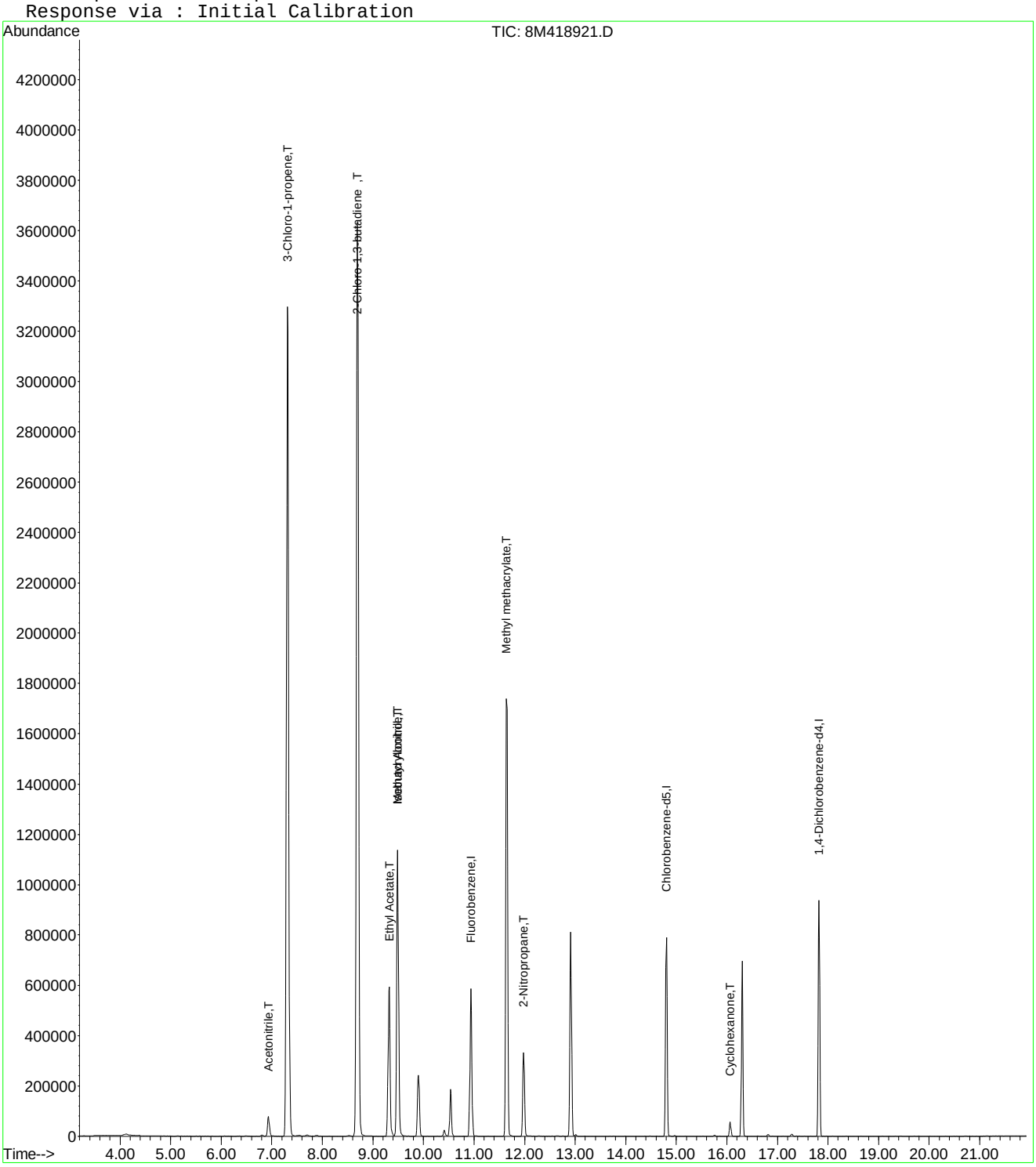
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	760698	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	622355	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	340966	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	112530	292.3968	ug/L		96
3) 3-Chloro-1-propene	7.31	41	3114799	307.4394	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	3064882	312.3316	ug/L		58
5) Ethyl Acetate	9.32	43	942946	299.9538	ug/L		92
6) Methacrylonitrile	9.49	67	556822	304.6711	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	76292	588.5777	ug/L		95
9) Methyl methacrylate	11.64	41	1020819	307.6014	ug/L		57
10) 2-Nitropropane	11.98	43	308845	314.1056	ug/L		97
13) Cyclohexanone	16.07	55	30268	301.8189	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418921.D 8260BWT.M Fri Apr 14 13:48:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



8M418921.D 8260BWT.M Fri Apr 14 13:48:32 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:36 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

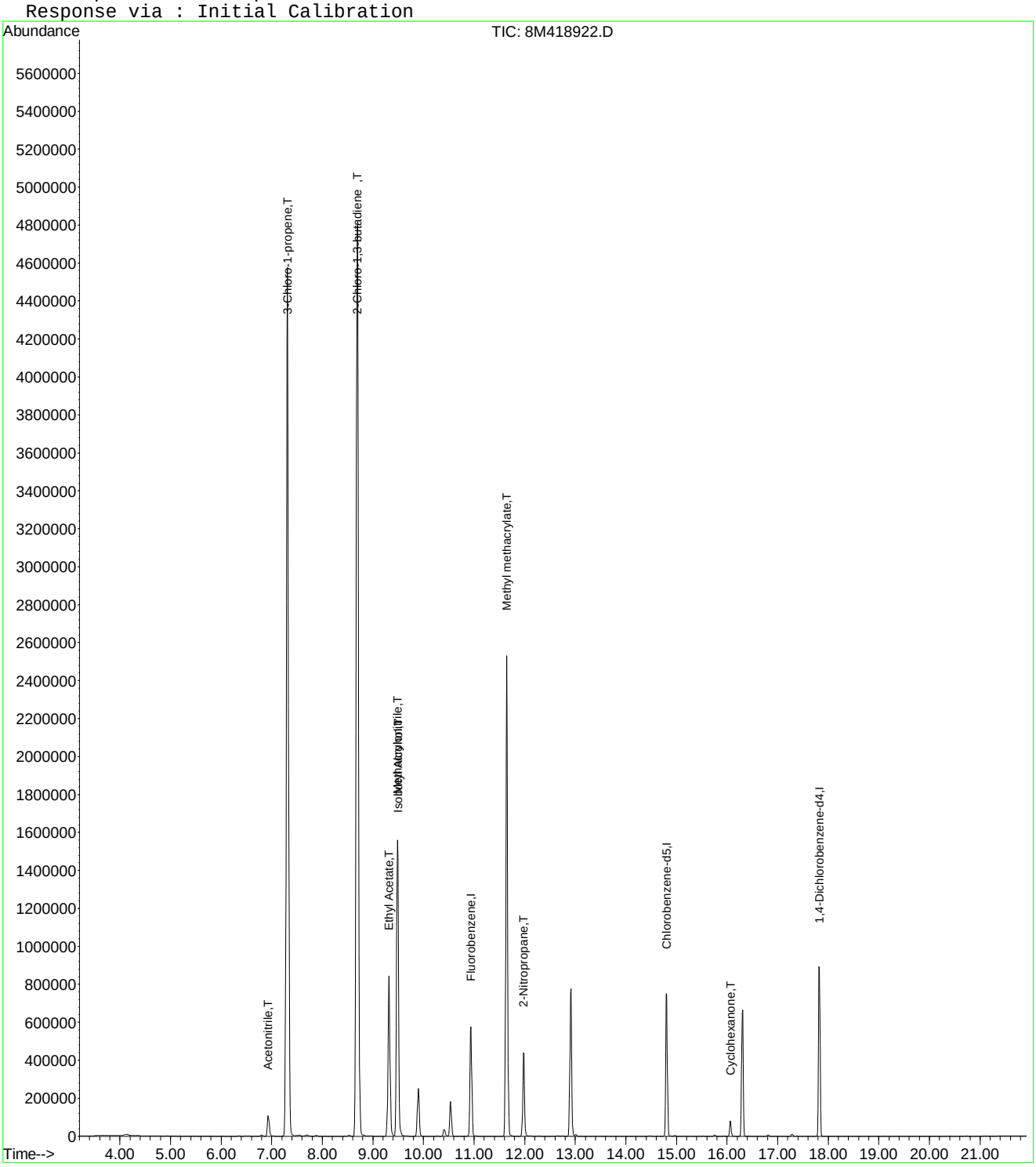
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	765828	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	627777	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	342670	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	158097	408.0459	ug/L		96
3) 3-Chloro-1-propene	7.31	41	4220040	413.7396	ug/L		81
4) 2-Chloro-1,3-butadiene	8.69	53	4133844	418.4439	ug/L		56
5) Ethyl Acetate	9.32	43	1301555	411.2549	ug/L		91
6) Methacrylonitrile	9.48	67	774795	421.0975	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	112499	862.0938	ug/L		94
9) Methyl methacrylate	11.64	41	1421838	425.5698	ug/L		57
10) 2-Nitropropane	11.98	43	433957	438.3922	ug/L		96
13) Cyclohexanone	16.07	55	45392	450.3778	ug/L	#	62

(#) = qualifier out of range (m) = manual integration
8M418922.D A9FOOWT.M Mon Jul 03 11:20:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

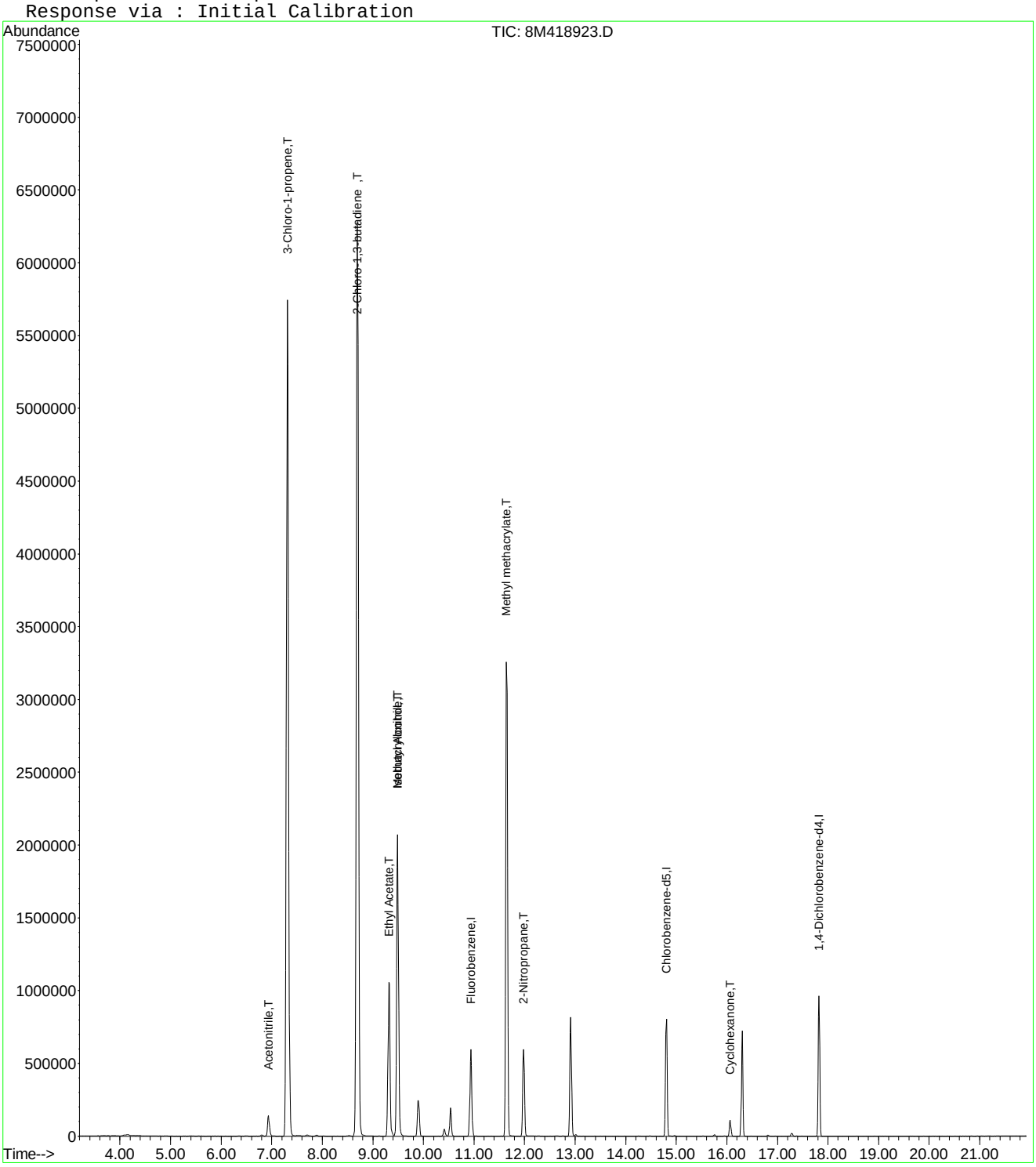
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	771678	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	638069	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	349522	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	205983	527.6086	ug/L		94
3) 3-Chloro-1-propene	7.31	41	5261515	511.9369	ug/L		79
4) 2-Chloro-1,3-butadiene	8.69	53	5178897	520.2542	ug/L		54
5) Ethyl Acetate	9.31	43	1685443	528.5156	ug/L		91
6) Methacrylonitrile	9.49	67	1008521	543.9712	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	153433	1166.8627	ug/L		93
9) Methyl methacrylate	11.64	41	1865399	554.0992	ug/L		57
10) 2-Nitropropane	11.98	43	564365	565.8109	ug/L		96
13) Cyclohexanone	16.07	55	59870	582.3827	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32:00 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 09:07:42 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

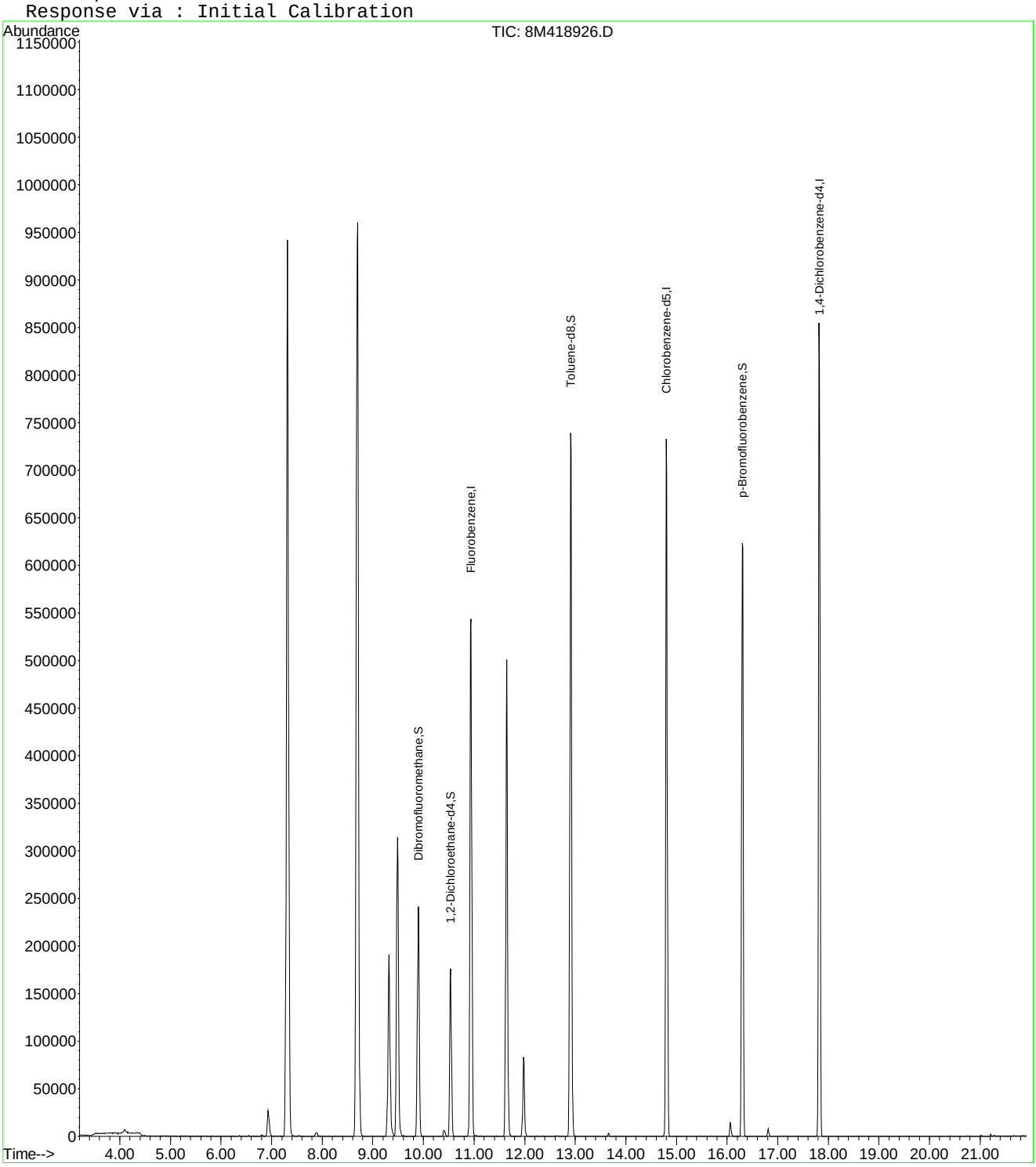
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	198928	23.9627	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.84%			
43) 1,2-Dichloroethane-d4	10.54	65	152795	21.2389	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 84.96%			
58) Toluene-d8	12.91	98	717629	24.0240	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 96.08%			
80) p-Bromofluorobenzene	16.30	95	278441	22.8541	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 91.40%			

Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
8M418926.D 8260WTR.M Fri Apr 14 13:50:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32 2017 Quant Results File: 8260WTR.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 10:18:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

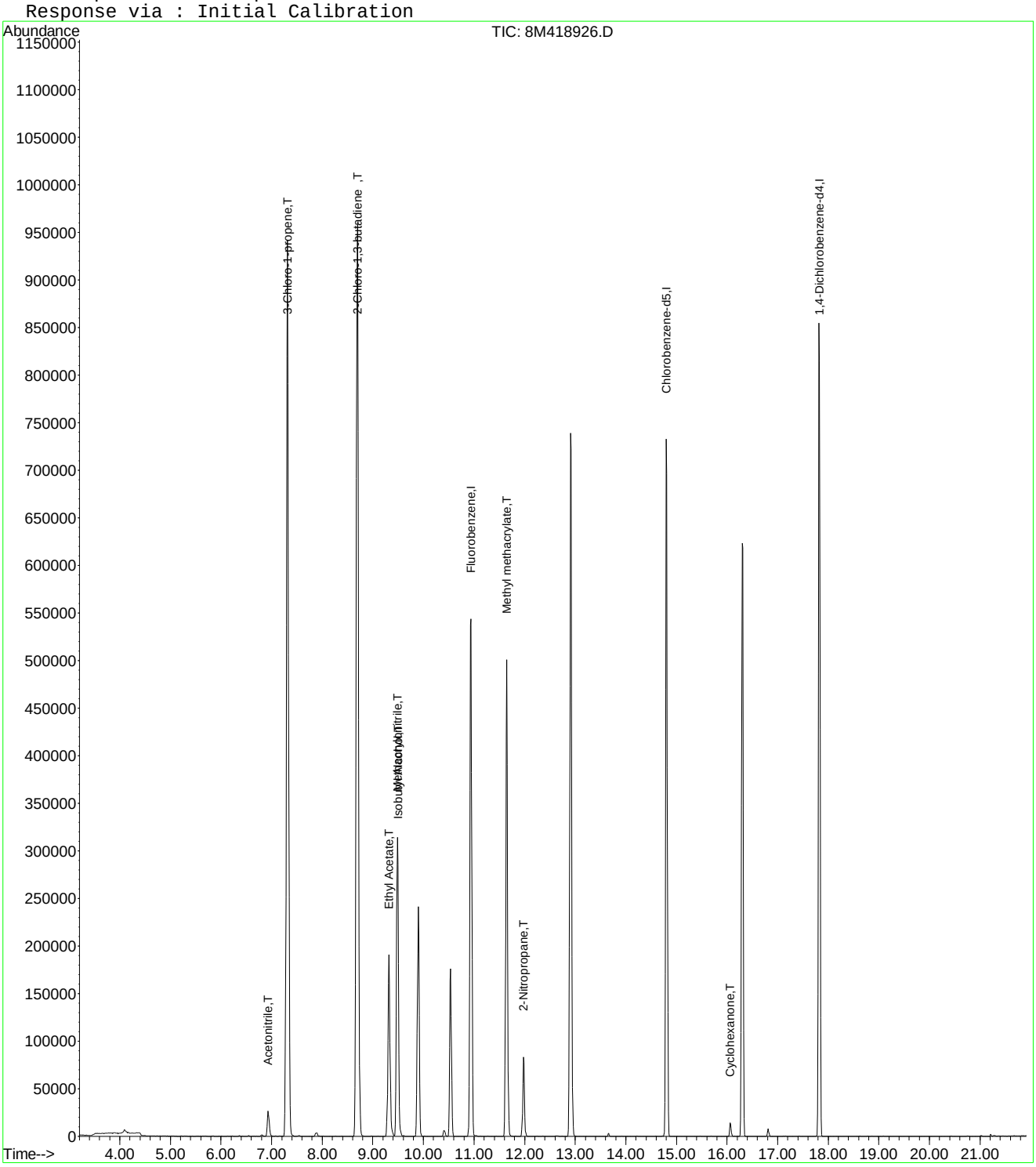
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	36372	98.2177	ug/L		97
3) 3-Chloro-1-propene	7.31	41	875524	89.8082	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	843244	89.3046	ug/L		59
5) Ethyl Acetate	9.32	43	297830	98.4588	ug/L		92
6) Methacrylonitrile	9.48	67	153966	87.5504	ug/L	#	60
7) Isobutyl Alcohol	9.49	43	24214	194.1377	ug/L		91
9) Methyl methacrylate	11.64	41	284340	89.0422	ug/L		58
10) 2-Nitropropane	11.98	43	76371	80.7201	ug/L		99
13) Cyclohexanone	16.06	55	8405	88.7579	ug/L	#	59

(#) = qualifier out of range (m) = manual integration
8M418926.D A9FOOWT.M Mon Jul 03 11:20:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	99	0.00
2	T	Acetonitrile	100.0000	98.2177	1.8	97	0.00
3	T	3-Chloro-1-propene	100.0000	89.8082	10.2	88	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	89.3046	10.7	86	0.00
5	T	Ethyl Acetate	100.0000	98.4588	1.5	100	0.00
6	T	Methacrylonitrile	100.0000	87.5504	12.4	88	0.00
7	T	Isobutyl Alcohol	200.0000	194.1377	2.9	104	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	83	0.00
9	T	Methyl methacrylate	100.0000	89.0422	11.0	89	0.00
10	T	2-Nitropropane	100.0000	80.7202	19.3	82	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
13	T	Cyclohexanone	100.0000	88.7579	11.2	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:11:32 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	803771	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	623661	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	312774	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.91	98	456	0.0160	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.08%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2205	0.2027	ug/L	97
3) Chloromethane	3.83	50	5565	0.4092	ug/L	76
4) Vinyl Chloride	4.07	62	4202	0.3272	ug/L	93
5) 1,3-Butadiene	4.12	54	2857	Below Cal #		1
7) Chloroethane	5.14	64	1232	0.2196	ug/L #	45
8) Trichlorofluoromethane	5.62	101	3405	0.2441	ug/L #	94
10) Isoprene	6.18	67	2827	0.2563	ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1919	0.2413	ug/L #	53
14) 1,1-Dichloroethene	6.72	61	2851	0.2449	ug/L	87
16) Dimethyl Sulfide	6.98	62	1743	0.2248	ug/L	76
19) Methylene Chloride	7.51	84	3288	0.3930	ug/L	95
20) Carbon Disulfide	7.55	76	8902	0.3678	ug/L	96
22) Methyl Tert Butyl Ether	7.71	73	4778	0.2899	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	3284	0.2900	ug/L	96
24) n-Hexane	8.02	57	2298	0.2431	ug/L	89
26) Vinyl Acetate	8.53	43	3061	0.2692	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	3743	0.2568	ug/L #	88
31) 2,2-Dichloropropane	9.34	77	3225	0.2621	ug/L #	77
32) cis-1,2-Dichloroethene	9.40	96	2463	0.2631	ug/L	90
33) Chloroform	9.62	83	5969	0.3696	ug/L	94
35) Bromochloromethane	9.84	130	1452	0.2875	ug/L	93
38) 1,1,1-Trichloroethane	10.14	97	3644	0.2796	ug/L	97
39) Cyclohexane	10.18	56	3332	0.2746	ug/L #	87
40) 1,1-Dichloropropene	10.33	75	3293	0.2894	ug/L	95
42) Carbon Tetrachloride	10.49	117	3061	0.2533	ug/L #	81
45) 1,2-Dichloroethane	10.65	62	2799	0.3065	ug/L #	64
46) Benzene	10.70	78	11003	0.3314	ug/L	94
47) Trichloroethene	11.43	130	2640	0.2830	ug/L	93
48) Methylcyclohexane	11.53	83	3718	0.2990	ug/L	93
49) 1,2-Dichloropropane	11.65	63	2260	0.2787	ug/L	87
50) Bromodichloromethane	11.96	83	2937	0.2767	ug/L #	87
52) Dibromomethane	12.04	93	1092	0.2616	ug/L	85
53) 2-Chloroethyl Vinyl Ether	12.25	63	496	0.1413	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3354	0.2775	ug/L	86
56) Dimethyl Disulfide	12.85	79	410	6.5739	ug/L #	24
59) Toluene	13.02	91	10893	0.3138	ug/L	96
60) Ethyl Methacrylate	13.10	69	1281	0.1956	ug/L	70
62) trans-1,3-Dichloropropene	13.18	75	2847	0.2828	ug/L	78
63) 1,1,2-Trichloroethane	13.41	97	1378	0.2413	ug/L	80
65) 1,3-Dichloropropane	13.71	76	3029	0.3137	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

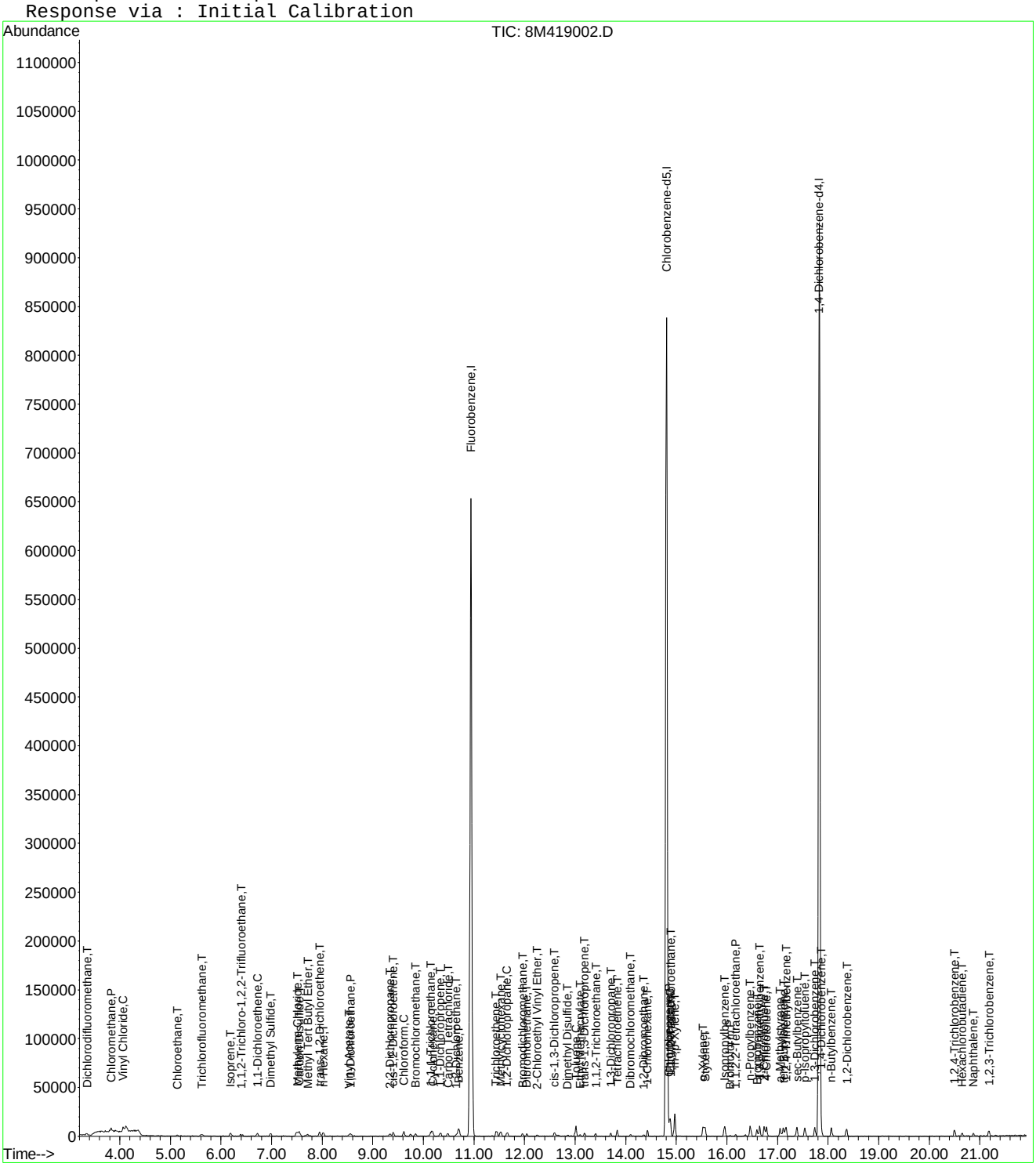
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
66)	Tetrachloroethene	13.83	164	2097	0.2876	ug/L		94
67)	Dibromochloromethane	14.09	129	1754	0.2390	ug/L		96
68)	1,2-Dibromoethane	14.35	107	1560	0.2796	ug/L		80
69)	1-Chlorohexane	14.42	91	2902	0.2642	ug/L		93
70)	Chlorobenzene	14.86	112	7625	0.3086	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.89	131	2025	0.2309	ug/L		92
72)	Ethylbenzene	14.88	106	3702	0.2675	ug/L		78
73)	m-,p-Xylene	14.97	106	9617	0.6000	ug/L		93
74)	o-Xylene	15.53	106	4785	0.2969	ug/L		96
75)	Styrene	15.57	104	6235	0.2468	ug/L		87
76)	Bromoform	16.06	173	794	1.3534	ug/L	#	27
77)	Isopropylbenzene	15.95	105	11105	0.2878	ug/L		97
79)	1,1,2,2-Tetrachloroethane	16.17	83	1461	0.2476	ug/L	#	92
83)	n-Propylbenzene	16.46	91	13614	0.3110	ug/L		97
84)	Bromobenzene	16.60	156	2823	0.2752	ug/L		78
85)	1,3,5-Trimethylbenzene	16.64	105	9120	0.2877	ug/L		91
86)	2-Chlorotoluene	16.74	91	9154	0.3063	ug/L		80
87)	4-Chlorotoluene	16.78	91	8789	0.3263	ug/L		88
88)	a-Methylstyrene	17.05	118	4528	0.2548	ug/L		94
89)	tert-Butylbenzene	17.12	134	1769	0.2465	ug/L		76
90)	1,2,4-Trimethylbenzene	17.17	105	9542	0.2949	ug/L		94
91)	sec-Butylbenzene	17.39	105	11285	0.2842	ug/L		93
92)	p-Isopropyltoluene	17.54	119	9114	0.2726	ug/L		94
93)	1,3-Dichlorobenzene	17.74	146	6334	0.3186	ug/L		92
94)	1,4-Dichlorobenzene	17.86	146	6652	0.3291	ug/L	#	49
95)	n-Butylbenzene	18.06	91	8752	0.2906	ug/L		94
96)	1,2-Dichlorobenzene	18.37	146	5133	0.2939	ug/L		98
98)	1,2,4-Trichlorobenzene	20.50	180	3486	0.2965	ug/L		89
99)	Hexachlorobutadiene	20.64	225	1480	0.2705	ug/L	#	86
100)	Naphthalene	20.87	128	4833	0.2876	ug/L	#	80
101)	1,2,3-Trichlorobenzene	21.18	180	2987	0.3059	ug/L	#	93

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2027	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.4092	0.0	100	0.01
4	C	Vinyl Chloride	-1.0000	0.3272	0.0	100	0.01
5	T	1,3-Butadiene	-1.0000	-20.2217	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	-1.0000	0.2196	0.0	100	0.01
8	T	Trichlorofluoromethane	-1.0000	0.2441	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.2563	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.2413	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	-1.0000	0.2449	0.0	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.2248	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.0662	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3930	0.0	100	0.01
20	T	Carbon Disulfide	-1.0000	0.3678	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2899	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	-1.0000	0.2900	0.0	100	0.01
24	T	n-Hexane	-1.0000	0.2431	0.0	100	0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.2692	0.0	100	0.00
27	P	1,1-Dichloroethane	-1.0000	0.2568	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	-1.0000	0.2621	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2631	0.0	100	0.00
33	C	Chloroform	0.3000	0.3696	-23.2#	100	0.01
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	-1.0000	0.2875	0.0	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-9.86#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	-1.0000	0.2796	0.0	100	0.00
39	T	Cyclohexane	-1.0000	0.2746	0.0	100	0.01
40	T	1,1-Dichloropropene	-1.0000	0.2894	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	-1.0000	0.2533	0.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	-1.0000	0.3065	0.0	100	0.00
46	T	Benzene	-1.0000	0.3314	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2830	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.2990	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.2787	0.0	100	0.00
50	T	Bromodichloromethane	-1.0000	0.2767	0.0	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	-1.0000	0.2616	0.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1413	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2775	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.5739	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0160	0.0	100	0.00
59	C	Toluene	-1.0000	0.3138	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.1956	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2828	0.0	100	0.00
63	T	1,1,2-Trichloroethane	-1.0000	0.2413	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	-1.0000	0.3137	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.2876	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2390	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2796	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.2642	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3086	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2309	0.0	0	0.01
72	C	Ethylbenzene	-1.0000	0.2675	0.0	0	0.00
73	T	m-,p-Xylene	-1.0000	0.6000	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2969	0.0	100	0.00
75	T	Styrene	-1.0000	0.2468	0.0	100	0.00
76	P	Bromoform	-1.0000	1.3534	0.0	100	0.01
77	T	Isopropylbenzene	-1.0000	0.2878	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.2476	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1194	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	-1.0000	0.3110	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.2752	8.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.2877	0.0	100	0.00
86	T	2-Chlorotoluene	-1.0000	0.3063	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3263	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2548	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2465	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.2949	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.2842	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.2726	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3186	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3291	-9.7	100	0.00
95	T	n-Butylbenzene	-1.0000	0.2906	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.2939	2.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.2965	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.2705	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.2876	0.0	100	0.00
101	T	1,2,3-Trichlorobenzene	0.3000	0.3059	-2.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	787150	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	615912	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	306493	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.92	98	201	0.0071	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	3389	0.3181	ug/L	86
3) Chloromethane	3.82	50	7334	0.5507	ug/L	96
4) Vinyl Chloride	4.07	62	5367	0.4267	ug/L	99
5) 1,3-Butadiene	4.12	54	3783	Below Cal #		53
7) Chloroethane	5.13	64	2045	0.3723	ug/L #	45
8) Trichlorofluoromethane	5.62	101	4954	0.3627	ug/L #	93
10) Isoprene	6.18	67	3988	0.3692	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	2378	0.3053	ug/L	89
14) 1,1-Dichloroethene	6.71	61	4170	0.3658	ug/L	97
16) Dimethyl Sulfide	6.98	62	2440	0.3213	ug/L	86
18) Methyl acetate	7.23	43	600	0.1979	ug/L #	53
19) Methylene Chloride	7.48	84	3294	0.4021	ug/L	63
20) Carbon Disulfide	7.54	76	9802	0.4135	ug/L	98
22) Methyl Tert Butyl Ether	7.71	73	5656	0.3504	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	4304	0.3881	ug/L	85
24) n-Hexane	8.02	57	3612	0.3902	ug/L	91
26) Vinyl Acetate	8.53	43	3817	0.3428	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	5095	0.3569	ug/L #	76
31) 2,2-Dichloropropane	9.34	77	4235	0.3515	ug/L	77
32) cis-1,2-Dichloroethene	9.40	96	3310	0.3611	ug/L	95
33) Chloroform	9.61	83	6791	0.4294	ug/L	94
35) Bromochloromethane	9.85	130	1484	0.3000	ug/L	78
36) Tetrahydrofuran	9.86	42	394	0.3297	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	4246	0.3327	ug/L	95
39) Cyclohexane	10.17	56	4729	0.3979	ug/L	82
40) 1,1-Dichloropropene	10.32	75	4225	0.3791	ug/L	84
42) Carbon Tetrachloride	10.48	117	3628	0.3065	ug/L	85
45) 1,2-Dichloroethane	10.66	62	3115	0.3483	ug/L #	68
46) Benzene	10.70	78	12752	0.3921	ug/L	99
47) Trichloroethene	11.44	130	3526	0.3860	ug/L	94
48) Methylcyclohexane	11.53	83	4742	0.3894	ug/L	98
49) 1,2-Dichloropropane	11.66	63	2964	0.3732	ug/L	72
50) Bromodichloromethane	11.96	83	3435	0.3305	ug/L #	95
52) Dibromomethane	12.05	93	1271	0.3110	ug/L	92
53) 2-Chloroethyl Vinyl Ether	12.25	63	562	0.1635	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3811	0.3220	ug/L	88
56) Dimethyl Disulfide	12.86	79	827	6.6305	ug/L	76
59) Toluene	13.01	91	12577	0.3668	ug/L	100
60) Ethyl Methacrylate	13.09	69	1611	0.2491	ug/L #	68
62) trans-1,3-Dichloropropene	13.19	75	3144	0.3162	ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

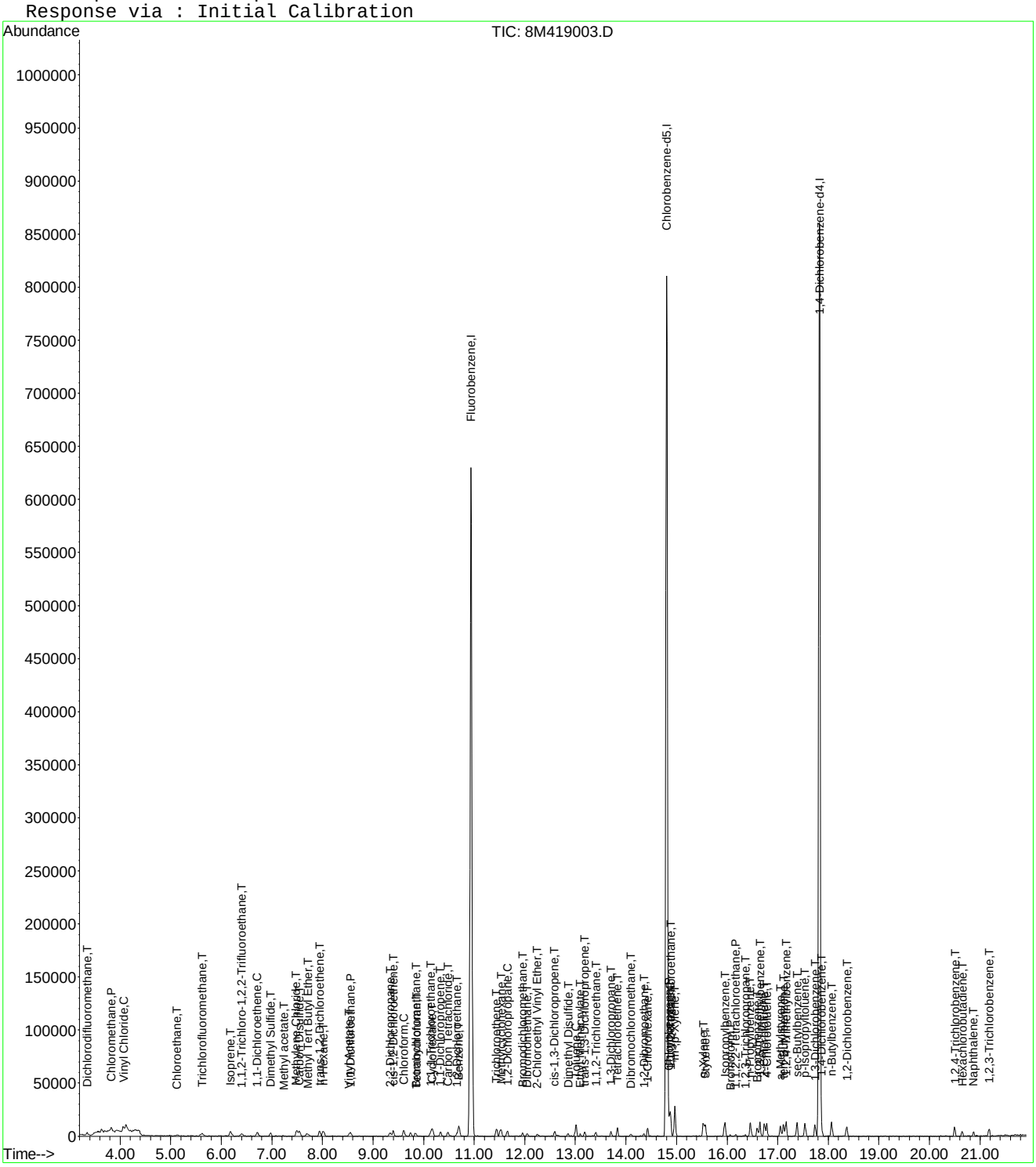
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
63)	1,1,2-Trichloroethane	13.40	97	2066	0.3663 ug/L		83
65)	1,3-Dichloropropane	13.70	76	3481	0.3651 ug/L		81
66)	Tetrachloroethene	13.83	164	2419	0.3359 ug/L		93
67)	Dibromochloromethane	14.10	129	2287	0.3155 ug/L		95
68)	1,2-Dibromoethane	14.36	107	1857	0.3370 ug/L		87
69)	1-Chlorohexane	14.43	91	3796	0.3500 ug/L		88
70)	Chlorobenzene	14.85	112	9935	0.4071 ug/L		80
71)	1,1,1,2-Tetrachloroethane	14.88	131	2985	0.3447 ug/L		94
72)	Ethylbenzene	14.87	106	4602	0.3367 ug/L		81
73)	m-,p-Xylene	14.97	106	11280	0.7126 ug/L		87
74)	o-Xylene	15.53	106	5356	0.3366 ug/L		95
75)	Styrene	15.56	104	8019	0.3214 ug/L		98
76)	Bromoform	16.07	173	792	1.3549 ug/L	#	65
77)	Isopropylbenzene	15.96	105	14417	0.3784 ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.16	83	1888	0.3265 ug/L	#	87
81)	1,2,3-Trichloropropane	16.36	110	210	0.1267 ug/L	#	6
83)	n-Propylbenzene	16.45	91	17056	0.3976 ug/L		93
84)	Bromobenzene	16.60	156	3412	0.3395 ug/L		91
85)	1,3,5-Trimethylbenzene	16.65	105	12100	0.3896 ug/L		98
86)	2-Chlorotoluene	16.73	91	13111	0.4477 ug/L		99
87)	4-Chlorotoluene	16.78	91	9782	0.3706 ug/L		95
88)	a-Methylstyrene	17.05	118	5086	0.2921 ug/L		99
89)	tert-Butylbenzene	17.11	134	2759	0.3923 ug/L		83
90)	1,2,4-Trimethylbenzene	17.17	105	11199	0.3532 ug/L		96
91)	sec-Butylbenzene	17.38	105	16076	0.4132 ug/L		92
92)	p-Isopropyltoluene	17.54	119	11698	0.3571 ug/L		98
93)	1,3-Dichlorobenzene	17.75	146	7364	0.3780 ug/L		96
94)	1,4-Dichlorobenzene	17.87	146	7953	0.4015 ug/L		83
95)	n-Butylbenzene	18.07	91	12640	0.4283 ug/L	#	94
96)	1,2-Dichlorobenzene	18.37	146	5812	0.3396 ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	4235	0.3675 ug/L		99
99)	Hexachlorobutadiene	20.65	225	1988	0.3708 ug/L		96
100)	Naphthalene	20.87	128	6635	0.4029 ug/L	#	86
101)	1,2,3-Trichlorobenzene	21.18	180	3757	0.3926 ug/L		95

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:53 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3181	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.5507	0.0	100	0.00
4	C	Vinyl Chloride	0.4000	0.4267	-6.7	100	0.02
5	T	1,3-Butadiene	-1.0000	-19.9254	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	0.4000	0.3723	6.9	100	0.00
8	T	Trichlorofluoromethane	0.4000	0.3627	9.3	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.3692	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3053	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	0.4000	0.3658	8.6	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.3213	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.1979	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4021	0.0	100	-0.01
20	T	Carbon Disulfide	-1.0000	0.4135	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3504	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	0.4000	0.3881	3.0	100	0.00
24	T	n-Hexane	-1.0000	0.3902	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.3428	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.3569	10.8	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	0.4000	0.3514	12.1	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.3611	9.7	100	0.00
33	C	Chloroform	0.4000	0.4294	-7.3	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	0.4000	0.3000	25.0#	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.3297	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	0.4000	0.3327	16.8	100	0.00
39	T	Cyclohexane	-1.0000	0.3979	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3791	0.0	100	-0.01
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	0.4000	0.3065	23.4	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	0.4000	0.3483	12.9	100	0.00
46	T	Benzene	0.4000	0.3922	2.0	100	0.00
47	T	Trichloroethene	0.4000	0.3860	3.5	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3894	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3732	6.7	100	0.00
50	T	Bromodichloromethane	0.4000	0.3305	17.4	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	0.4000	0.3110	22.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1635	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419003.D 8260WT.M Tue Apr 18 11:59:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3220	19.5	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.6305	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0071	0.0	100	0.00
59	C	Toluene	0.4000	0.3669	8.3	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2491	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3162	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3663	8.4	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	0.4000	0.3651	8.7	100	0.00
66	T	Tetrachloroethene	0.4000	0.3359	16.0	100	0.00
67	T	Dibromochloromethane	0.4000	0.3155	21.1	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.3371	15.7	100	0.00
69	T	1-Chlorohexane	0.4000	0.3500	12.5	100	0.00
70	P	Chlorobenzene	0.4000	0.4071	-1.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3447	13.8	100	0.00
72	C	Ethylbenzene	0.4000	0.3367	15.8	100	-0.01
73	T	m-,p-Xylene	0.8000	0.7126	10.9	100	0.00
74	T	o-Xylene	-1.0000	0.3366	0.0	100	0.00
75	T	Styrene	0.4000	0.3214	19.6	100	0.00
76	P	Bromoform	-1.0000	1.3549	0.0	100	0.02
77	T	Isopropylbenzene	0.4000	0.3784	5.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.3265	18.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1267	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	0.4000	0.3976	0.6	100	0.00
84	T	Bromobenzene	0.4000	0.3395	15.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.3896	2.6	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4477	-11.9	100	0.00
87	T	4-Chlorotoluene	0.4000	0.3706	7.3	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2921	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3923	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	0.4000	0.3532	11.7	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4132	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3571	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.3780	5.5	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4015	-0.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4283	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.3396	15.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	0.4000	0.3675	8.1	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.3708	7.3	100	0.00
100	T	Naphthalene	0.4000	0.4029	-0.7	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.3926	1.8	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419003.D 8260WT.M Tue Apr 18 11:59:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.93	96	779914	25.00	ug/L		0.00
57) Chlorobenzene-d5	14.80	117	608999	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	308129	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	9.90	111	3656	0.4469	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.80%#			
43) 1,2-Dichloroethane-d4	10.54	65	3358	0.4748	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#			
58) Toluene-d8	12.91	98	13712	0.4928	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	1.96%#			
80) p-Bromofluorobenzene	16.30	95	5409	0.4974	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.35	85	9773	0.9259	ug/L		89
3) Chloromethane	3.82	50	14220	1.0777	ug/L		94
4) Vinyl Chloride	4.06	62	13411	1.0762	ug/L		98
5) 1,3-Butadiene	4.12	54	9735	Below Cal	#		74
6) Bromomethane	4.98	94	2003	1.2503	ug/L		89
7) Chloroethane	5.14	64	5085	0.9342	ug/L		98
8) Trichlorofluoromethane	5.63	101	14425	1.0658	ug/L	#	94
9) Diethyl ether	6.15	59	24837	4.8725	ug/L		91
10) Isoprene	6.19	67	11081	1.0355	ug/L		99
11) Acrolein	6.39	56	1283	1.8174	ug/L		87
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	7816	1.0127	ug/L		95
13) Acetone	6.50	43	1194	1.0885	ug/L	#	42
14) 1,1-Dichloroethene	6.72	61	11427	1.0117	ug/L		93
15) Tert-Butyl Alcohol	6.82	59	3335	9.3795	ug/L	#	68
16) Dimethyl Sulfide	6.98	62	7490	0.9956	ug/L		98
18) Methyl acetate	7.24	43	2479	0.8253	ug/L	#	53
19) Methylene Chloride	7.49	84	8465	1.0429	ug/L		79
20) Carbon Disulfide	7.54	76	24774	1.0549	ug/L		99
21) Acrylonitrile	7.68	53	3342	2.1964	ug/L		91
22) Methyl Tert Butyl Ether	7.71	73	15457	0.9665	ug/L		97
23) trans-1,2-Dichloroethene	7.95	61	10769	0.9800	ug/L		94
24) n-Hexane	8.02	57	9445	1.0297	ug/L		89
25) Diisopropyl ether	8.36	45	121009	4.9196	ug/L		94
26) Vinyl Acetate	8.53	43	10576	0.9587	ug/L		90
27) 1,1-Dichloroethane	8.57	63	14365	1.0157	ug/L		95
28) Ethyl-Tert-Butyl ether	8.93	59	101471	4.8508	ug/L		97
29) 2-Butanone	9.13	43	992	0.5767	ug/L	#	44
30) Propionitrile	9.23	54	2404	4.5091	ug/L	#	56
31) 2,2-Dichloropropane	9.34	77	12075	1.0114	ug/L		99
32) cis-1,2-Dichloroethene	9.41	96	8962	0.9867	ug/L		89
33) Chloroform	9.61	83	16050	1.0242	ug/L		99
34) 1-Bromopropane	9.75	122	1768	0.9867	ug/L		91
35) Bromochloromethane	9.84	130	4693	0.9575	ug/L		83
36) Tetrahydrofuran	9.87	42	6126	5.1735	ug/L		80
38) 1,1,1-Trichloroethane	10.14	97	12661	1.0011	ug/L		93
39) Cyclohexane	10.18	56	11570	0.9826	ug/L		96
40) 1,1-Dichloropropene	10.34	75	11057	1.0014	ug/L		98
41) Tert-Amyl-Methyl ether	10.44	73	88613	4.7307	ug/L		96
42) Carbon Tetrachloride	10.49	117	11842	1.0099	ug/L		98
45) 1,2-Dichloroethane	10.66	62	8720	0.9841	ug/L		97

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

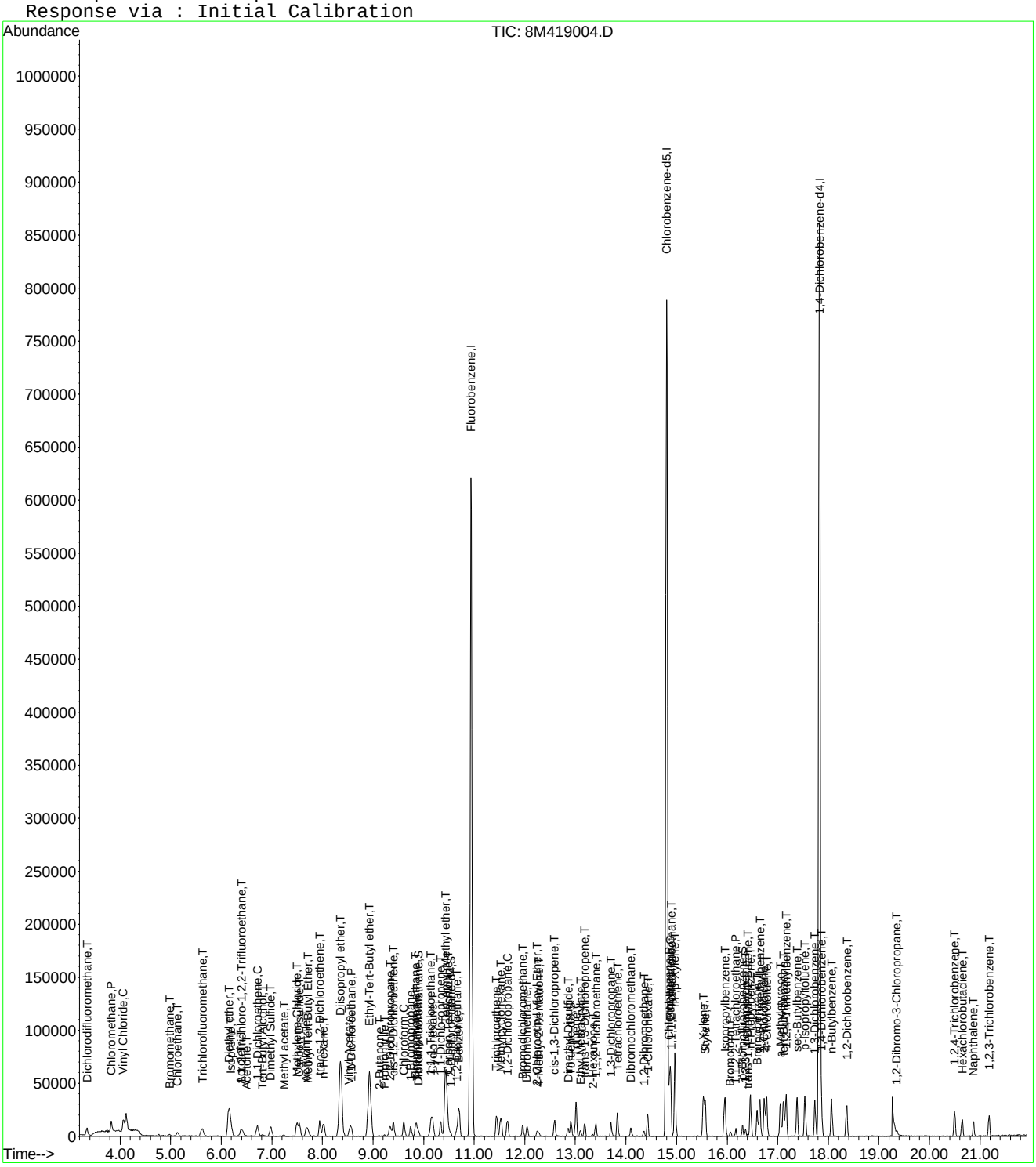
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
46)	Benzene	10.70	78	32995	1.0241 ug/L		98
47)	Trichloroethene	11.44	130	9064	1.0014 ug/L		96
48)	Methylcyclohexane	11.52	83	12257	1.0159 ug/L		96
49)	1,2-Dichloropropane	11.66	63	7625	0.9690 ug/L		89
50)	Bromodichloromethane	11.96	83	9755	0.9472 ug/L		97
52)	Dibromomethane	12.04	93	3914	0.9665 ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	3022	0.8875 ug/L		86
54)	4-Methyl-2-Pentanone	12.28	58	1067	0.6996 ug/L	#	33
55)	cis-1,3-Dichloropropene	12.59	75	11045	0.9418 ug/L		99
56)	Dimethyl Disulfide	12.86	79	3184	6.9480 ug/L		100
59)	Toluene	13.01	91	34963	1.0314 ug/L		98
60)	Ethyl Methacrylate	13.11	69	5063	0.7916 ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	8931	0.9085 ug/L		94
63)	1,1,2-Trichloroethane	13.40	97	5720	1.0256 ug/L		92
64)	2-Hexanone	13.34	58	660	0.4822 ug/L	#	1
65)	1,3-Dichloropropane	13.70	76	9865	1.0463 ug/L		88
66)	Tetrachloroethene	13.84	164	6911	0.9706 ug/L		94
67)	Dibromochloromethane	14.10	129	6507	0.9079 ug/L		93
68)	1,2-Dibromoethane	14.36	107	5094	0.9351 ug/L		96
69)	1-Chlorohexane	14.44	91	10710	0.9986 ug/L		96
70)	Chlorobenzene	14.85	112	23511	0.9743 ug/L		74
71)	1,1,1,2-Tetrachloroethane	14.89	131	7696	0.8987 ug/L		99
72)	Ethylbenzene	14.87	106	12181	0.9013 ug/L		83
73)	m-,p-Xylene	14.97	106	31012	1.9815 ug/L		91
74)	o-Xylene	15.53	106	14876	0.9454 ug/L		96
75)	Styrene	15.56	104	22652	0.9182 ug/L		96
76)	Bromoform	16.06	173	3053	1.1801 ug/L		92
77)	Isopropylbenzene	15.96	105	37771	1.0025 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	6072	1.0444 ug/L	#	97
81)	1,2,3-Trichloropropane	16.36	110	1447	0.8681 ug/L		93
82)	trans-1,4-Dichloro-2-Buten	16.41	53	711	1.1263 ug/L	#	1
83)	n-Propylbenzene	16.46	91	45884	1.0639 ug/L		99
84)	Bromobenzene	16.60	156	10336	1.0229 ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	30984	0.9922 ug/L		98
86)	2-Chlorotoluene	16.73	91	32327	1.0980 ug/L		96
87)	4-Chlorotoluene	16.78	91	26310	0.9916 ug/L		96
88)	a-Methylstyrene	17.05	118	14557	0.8315 ug/L		95
89)	tert-Butylbenzene	17.12	134	6410	0.9066 ug/L		87
90)	1,2,4-Trimethylbenzene	17.17	105	32136	1.0080 ug/L		99
91)	sec-Butylbenzene	17.38	105	40408	1.0331 ug/L		98
92)	p-Isopropyltoluene	17.54	119	32541	0.9881 ug/L		100
93)	1,3-Dichlorobenzene	17.74	146	19666	1.0041 ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	20254	1.0171 ug/L	#	70
95)	n-Butylbenzene	18.07	91	29903	1.0080 ug/L		97
96)	1,2-Dichlorobenzene	18.37	146	18343	1.0661 ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.35	75	619	0.6542 ug/L		90
98)	1,2,4-Trichlorobenzene	20.49	180	11339	0.9788 ug/L		98
99)	Hexachlorobutadiene	20.65	225	5266	0.9769 ug/L		99
100)	Naphthalene	20.87	128	15692	0.9479 ug/L		98
101)	1,2,3-Trichlorobenzene	21.18	180	9244	0.9609 ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:56 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9260	7.4	100	0.00
3	P	Chloromethane	1.0000	1.0777	-7.8	100	0.00
4	C	Vinyl Chloride	1.0000	1.0762	-7.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-18.1082	0.0	0	0.03
6	T	Bromomethane	1.0000	1.2503	-25.0#	100	0.02
7	T	Chloroethane	1.0000	0.9342	6.6	100	0.01
8	T	Trichlorofluoromethane	1.0000	1.0658	-6.6	100	0.03
9	T	Diethyl ether	5.0000	4.8725	2.6	100	0.00
10	T	Isoprene	-1.0000	1.0355	0.0	100	0.00
11	T	Acrolein	-1.0000	1.8174	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0127	-1.3	100	0.00
13	T	Acetone	-1.0000	1.0885	0.0	100	0.02
14	C	1,1-Dichloroethene	1.0000	1.0117	-1.2	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	9.3795	0.0	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	0.9956	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.8253	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0429	-4.3	100	0.00
20	T	Carbon Disulfide	1.0000	1.0549	-5.5	100	0.00
21	T	Acrylonitrile	2.5000	2.1965	12.1	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	0.9665	3.4	100	0.00
23	T	trans-1,2-Dichloroethene	1.0000	0.9800	2.0	100	0.00
24	T	n-Hexane	-1.0000	1.0297	0.0	100	0.00
25	T	Diisopropyl ether	5.0000	4.9196	1.6	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9587	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	1.0157	-1.6	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	4.8508	3.0	100	0.00
29	T	2-Butanone	-1.0000	0.5767	0.0	100	0.02
30	T	Propionitrile	5.0000	4.5091	9.8	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.0114	-1.1	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9867	1.3	100	0.00
33	C	Chloroform	1.0000	1.0242	-2.4	100	0.00
34		1-Bromopropane	1.0000	0.9867	1.3	100	0.00
35	T	Bromochloromethane	1.0000	0.9575	4.2	100	-0.01
36	T	Tetrahydrofuran	5.0000	5.1735	-3.5	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.4469	0.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0011	-0.1	100	0.00
39	T	Cyclohexane	1.0000	0.9826	1.7	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0014	-0.1	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	4.7307	5.4	100	0.00
42	T	Carbon Tetrachloride	1.0000	1.0099	-1.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.4748	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	1.0000	0.9841	1.6	100	0.00
46	T	Benzene	1.0000	1.0241	-2.4	100	0.00
47	T	Trichloroethene	1.0000	1.0014	-0.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.0159	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9690	3.1	100	0.00
50	T	Bromodichloromethane	1.0000	0.9473	5.3	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	1.0000	0.9665	3.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8875	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.6996	0.0	100	0.00

(#) = Out of Range
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9417	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.9480	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.4928	0.0	100	0.00
59	C	Toluene	1.0000	1.0314	-3.1	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.7916	20.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	1.0000	0.9084	9.2	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0256	-2.6	100	0.00
64	T	2-Hexanone	-1.0000	0.4822	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0463	-4.6	100	0.00
66	T	Tetrachloroethene	1.0000	0.9706	2.9	100	0.00
67	T	Dibromochloromethane	1.0000	0.9079	9.2	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9351	6.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9986	0.1	100	0.00
70	P	Chlorobenzene	1.0000	0.9743	2.6	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.8987	10.1	100	0.02
72	C	Ethylbenzene	1.0000	0.9013	9.9	100	-0.01
73	T	m-,p-Xylene	2.0000	1.9815	0.9	100	0.00
74	T	o-Xylene	1.0000	0.9454	5.5	100	0.00
75	T	Styrene	1.0000	0.9182	8.2	100	0.00
76	P	Bromoform	1.0000	1.1801	-18.0	100	0.00
77	T	Isopropylbenzene	1.0000	1.0025	-0.3	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0444	-4.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.4974	0.0	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	0.8681	13.2	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	1.0000	1.1263	-12.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0639	-6.4	100	0.00
84	T	Bromobenzene	1.0000	1.0229	-2.3	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	0.9922	0.8	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0980	-9.8	100	0.00
87	T	4-Chlorotoluene	1.0000	0.9916	0.8	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8315	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9066	9.3	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0080	-0.8	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0331	-3.3	100	0.00
92	T	p-Isopropyltoluene	1.0000	0.9881	1.2	100	0.00
93	T	1,3-Dichlorobenzene	1.0000	1.0041	-0.4	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	1.0171	-1.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0079	-0.8	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0661	-6.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.6542	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	0.9788	2.1	100	0.00
99	T	Hexachlorobutadiene	1.0000	0.9769	2.3	100	0.00
100	T	Naphthalene	1.0000	0.9479	5.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	0.9609	3.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.93	96	786816	25.00	ug/L		0.00
57) Chlorobenzene-d5	14.80	117	613120	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	307545	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	9.90	111	7910	0.9585	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.84%#			
43) 1,2-Dichloroethane-d4	10.53	65	6765	0.9482	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.80%#			
58) Toluene-d8	12.91	98	27609	0.9855	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	3.96%#			
80) p-Bromofluorobenzene	16.30	95	11029	1.0161	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.08%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.35	85	18197	1.7090	ug/L		98
3) Chloromethane	3.82	50	27723	2.0826	ug/L		96
4) Vinyl Chloride	4.06	62	26048	2.0720	ug/L		98
5) 1,3-Butadiene	4.12	54	18463	Below Cal		#	71
6) Bromomethane	4.97	94	4285	1.8796	ug/L		92
7) Chloroethane	5.15	64	10874	1.9802	ug/L		96
8) Trichlorofluoromethane	5.62	101	25863	1.8941	ug/L		99
9) Diethyl ether	6.15	59	125724	24.4479	ug/L		91
10) Isoprene	6.19	67	20005	1.8530	ug/L		94
11) Acrolein	6.39	56	8808	12.3674	ug/L		89
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	14374	1.8461	ug/L		99
13) Acetone	6.49	43	2188	1.9772	ug/L	#	61
14) 1,1-Dichloroethene	6.72	61	21622	1.8975	ug/L		94
15) Tert-Butyl Alcohol	6.82	59	15100	42.0952	ug/L		95
16) Dimethyl Sulfide	6.99	62	14397	1.8968	ug/L		83
17) Iodomethane	7.24	142	1183	0.3475	ug/L	#	31
18) Methyl acetate	7.23	43	6243	2.0602	ug/L	#	64
19) Methylene Chloride	7.49	84	15417	1.8827	ug/L		82
20) Carbon Disulfide	7.54	76	46839	1.9769	ug/L		99
21) Acrylonitrile	7.68	53	17600	11.4657	ug/L		93
22) Methyl Tert Butyl Ether	7.70	73	29822	1.8483	ug/L		99
23) trans-1,2-Dichloroethene	7.95	61	21949	1.9798	ug/L		92
24) n-Hexane	8.03	57	18571	2.0068	ug/L		92
25) Diisopropyl ether	8.36	45	624517	25.1670	ug/L		95
26) Vinyl Acetate	8.53	43	20892	1.8772	ug/L		91
27) 1,1-Dichloroethane	8.57	63	27479	1.9259	ug/L		97
28) Ethyl-Tert-Butyl ether	8.93	59	512681	24.2936	ug/L		97
29) 2-Butanone	9.12	43	2972	1.7126	ug/L	#	59
30) Propionitrile	9.23	54	12326	22.9166	ug/L		98
31) 2,2-Dichloropropane	9.34	77	24154	2.0053	ug/L		99
32) cis-1,2-Dichloroethene	9.40	96	17720	1.9338	ug/L		92
33) Chloroform	9.61	83	31381	1.9850	ug/L		97
34) 1-Bromopropane	9.75	122	3352	1.8543	ug/L		99
35) Bromochloromethane	9.84	130	9815	1.9850	ug/L		94
36) Tetrahydrofuran	9.87	42	27490	23.0121	ug/L		86
38) 1,1,1-Trichloroethane	10.15	97	23941	1.8765	ug/L		99
39) Cyclohexane	10.17	56	22528	1.8965	ug/L		89
40) 1,1-Dichloropropene	10.34	75	21378	1.9191	ug/L		100
41) Tert-Amyl-Methyl ether	10.44	73	455514	24.1049	ug/L		97
42) Carbon Tetrachloride	10.49	117	22574	1.9082	ug/L		97

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

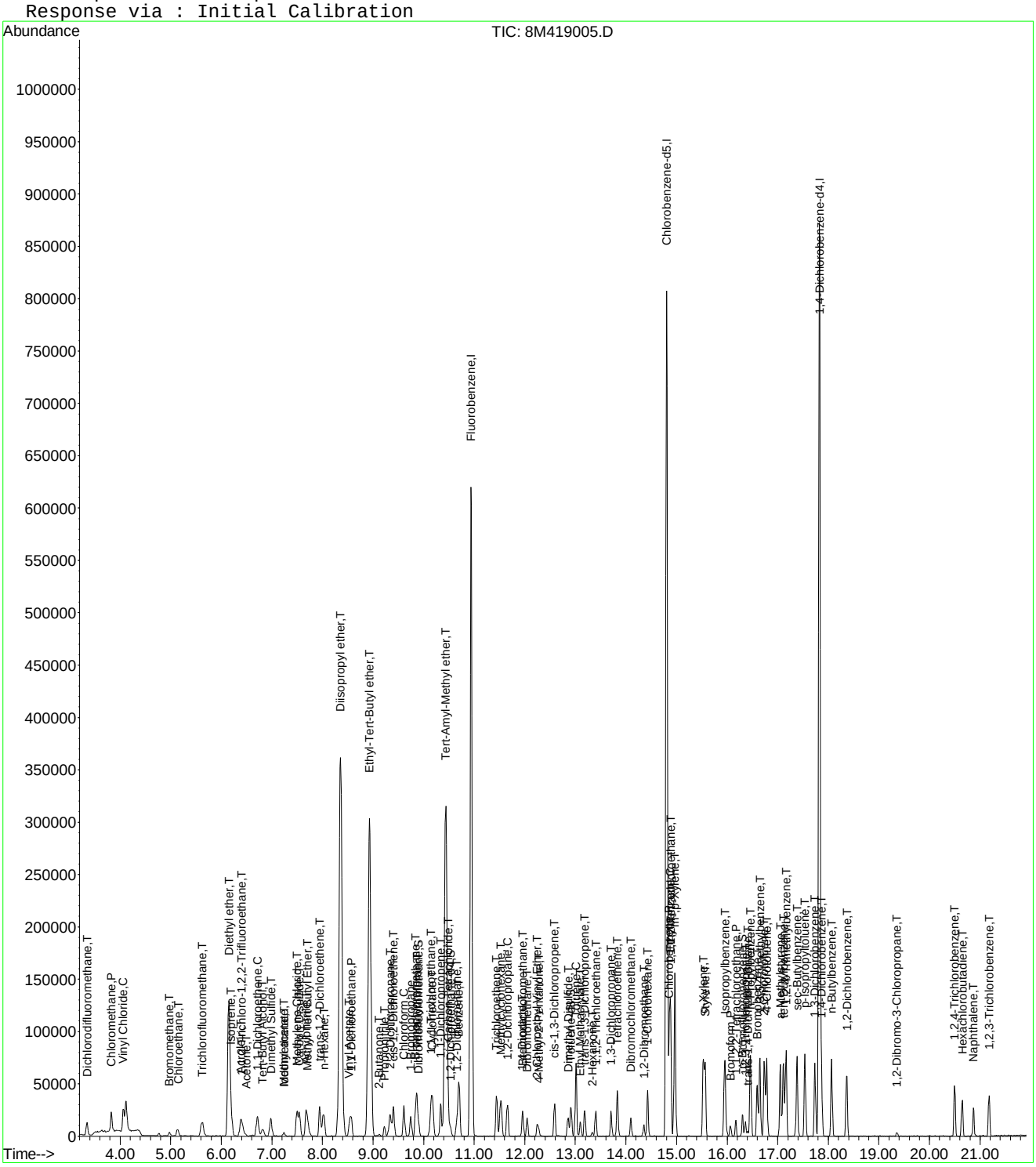
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	17154	1.9189 ug/L		100
46)	Benzene	10.70	78	65094	2.0026 ug/L		98
47)	Trichloroethene	11.44	130	17338	1.8988 ug/L		94
48)	Methylcyclohexane	11.52	83	22736	1.8679 ug/L		91
49)	1,2-Dichloropropane	11.66	63	15665	1.9732 ug/L		97
50)	Bromodichloromethane	11.96	83	20105	1.9351 ug/L		99
51)	1,4-Dioxane	11.95	88	1498	33.0951 ug/L		74
52)	Dibromomethane	12.05	93	8093	1.9809 ug/L		95
53)	2-Chloroethyl Vinyl Ether	12.25	63	5724	1.6664 ug/L		91
54)	4-Methyl-2-Pentanone	12.28	58	2383	1.5488 ug/L	#	73
55)	cis-1,3-Dichloropropene	12.59	75	21986	1.8582 ug/L		99
56)	Dimethyl Disulfide	12.86	79	7091	7.4642 ug/L		90
59)	Toluene	13.01	91	69700	2.0423 ug/L		98
60)	Ethyl Methacrylate	13.09	69	10905	1.6936 ug/L		84
62)	trans-1,3-Dichloropropene	13.19	75	17794	1.7978 ug/L		98
63)	1,1,2-Trichloroethane	13.40	97	10978	1.9551 ug/L		92
64)	2-Hexanone	13.33	58	1923	1.3955 ug/L	#	21
65)	1,3-Dichloropropane	13.70	76	18233	1.9209 ug/L		89
66)	Tetrachloroethene	13.83	164	13703	1.9115 ug/L		98
67)	Dibromochloromethane	14.10	129	13297	1.8429 ug/L		95
68)	1,2-Dibromoethane	14.36	107	10688	1.9487 ug/L		95
69)	1-Chlorohexane	14.43	91	20724	1.9193 ug/L		94
70)	Chlorobenzene	14.85	112	47662	1.9619 ug/L		90
71)	1,1,1,2-Tetrachloroethane	14.88	131	15693	1.8203 ug/L		97
72)	Ethylbenzene	14.87	106	26084	1.9171 ug/L		97
73)	m-,p-Xylene	14.97	106	60868	3.8629 ug/L		91
74)	o-Xylene	15.53	106	29031	1.8326 ug/L		95
75)	Styrene	15.56	104	45562	1.8345 ug/L		96
76)	Bromoform	16.07	173	6974	1.9520 ug/L		96
77)	Isopropylbenzene	15.96	105	75544	1.9916 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	11188	1.9280 ug/L		91
81)	1,2,3-Trichloropropane	16.36	110	3124	1.8778 ug/L		76
82)	trans-1,4-Dichloro-2-Buten	16.41	53	1589	1.7434 ug/L	#	37
83)	n-Propylbenzene	16.46	91	90826	2.1100 ug/L		99
84)	Bromobenzene	16.60	156	19940	1.9771 ug/L		98
85)	1,3,5-Trimethylbenzene	16.65	105	62132	1.9935 ug/L		99
86)	2-Chlorotoluene	16.73	91	56721	1.9302 ug/L		87
87)	4-Chlorotoluene	16.78	91	60016	2.2662 ug/L		88
88)	a-Methylstyrene	17.05	118	30045	1.7194 ug/L		99
89)	tert-Butylbenzene	17.12	134	13646	1.9338 ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	64473	2.0262 ug/L		99
91)	sec-Butylbenzene	17.38	105	80995	2.0748 ug/L		96
92)	p-Isopropyltoluene	17.54	119	64103	1.9501 ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	38573	1.9731 ug/L		98
94)	1,4-Dichlorobenzene	17.87	146	39209	1.9728 ug/L		84
95)	n-Butylbenzene	18.07	91	57496	1.9417 ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	34361	2.0008 ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.36	75	1793	1.8985 ug/L		85
98)	1,2,4-Trichlorobenzene	20.49	180	21702	1.8770 ug/L		93
99)	Hexachlorobutadiene	20.65	225	10481	1.9480 ug/L		99
100)	Naphthalene	20.87	128	30316	1.8348 ug/L		95
101)	1,2,3-Trichlorobenzene	21.18	180	17347	1.8067 ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7090	14.6	100	0.00
3	P	Chloromethane	2.0000	2.0826	-4.1	100	0.00
4	C	Vinyl Chloride	2.0000	2.0720	-3.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-15.5080	0.0	0	0.03
6	T	Bromomethane	2.0000	1.8796	6.0	100	0.00
7	T	Chloroethane	2.0000	1.9802	1.0	100	0.02
8	T	Trichlorofluoromethane	2.0000	1.8941	5.3	100	0.02
9	T	Diethyl ether	25.0000	24.4479	2.2	100	0.00
10	T	Isoprene	-1.0000	1.8530	0.0	100	0.00
11	T	Acrolein	12.5000	12.3674	1.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8461	7.7	100	0.00
13	T	Acetone	-1.0000	1.9772	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.8975	5.1	100	0.02
15	T	Tert-Butyl Alcohol	50.0000	42.0951	15.8	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.8968	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.3475	0.0	0	0.02
18	T	Methyl acetate	-1.0000	2.0602	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.8827	5.9	100	0.00
20	T	Carbon Disulfide	2.0000	1.9769	1.2	100	0.00
21	T	Acrylonitrile	12.5000	11.4657	8.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.8483	7.6	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9798	1.0	100	0.00
24	T	n-Hexane	-1.0000	2.0068	0.0	100	0.02
25	T	Diisopropyl ether	25.0000	25.1670	-0.7	100	0.00
26	T	Vinyl Acetate	-1.0000	1.8772	0.0	100	0.00
27	P	1,1-Dichloroethane	2.0000	1.9259	3.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	24.2936	2.8	100	0.00
29	T	2-Butanone	-1.0000	1.7126	0.0	100	0.00
30	T	Propionitrile	25.0000	22.9166	8.3	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0053	-0.3	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9338	3.3	100	0.00
33	C	Chloroform	2.0000	1.9850	0.8	100	0.00
34		1-Bromopropane	2.0000	1.8543	7.3	100	0.00
35	T	Bromochloromethane	2.0000	1.9850	0.8	100	-0.01
36	T	Tetrahydrofuran	25.0000	23.0121	8.0	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9585	4.2	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.8765	6.2	100	0.00
39	T	Cyclohexane	2.0000	1.8965	5.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9191	4.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.1049	3.6	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.9082	4.6	100	0.02
43	S	1,2-Dichloroethane-d4	1.0000	0.9482	5.2	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	2.0000	1.9189	4.1	100	0.00
46	T	Benzene	2.0000	2.0026	-0.1	100	0.00
47	T	Trichloroethene	2.0000	1.8988	5.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.8679	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	1.9732	1.3	100	0.00
50	T	Bromodichloromethane	2.0000	1.9351	3.2	100	0.00
51	T	1,4-Dioxane	-1.0000	33.0951	0.0	100	0.00
52	T	Dibromomethane	2.0000	1.9809	1.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.6664	16.7	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	1.5488	0.0	100	0.00

(#) = Out of Range
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8582	7.1	100	0.00
56	T	Dimethyl Disulfide	-1.0000	7.4642	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	0.9855	1.4	100	0.00
59	C	Toluene	2.0000	2.0423	-2.1	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.6936	15.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	2.0000	1.7978	10.1	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9551	2.2	100	0.00
64	T	2-Hexanone	-1.0000	1.3955	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9209	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9115	4.4	100	0.00
67	T	Dibromochloromethane	2.0000	1.8429	7.9	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9487	2.6	100	0.00
69	T	1-Chlorohexane	2.0000	1.9193	4.0	100	0.00
70	P	Chlorobenzene	2.0000	1.9619	1.9	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8203	9.0	100	0.00
72	C	Ethylbenzene	2.0000	1.9171	4.1	100	-0.01
73	T	m-,p-Xylene	4.0000	3.8629	3.4	100	0.00
74	T	o-Xylene	2.0000	1.8326	8.4	100	0.00
75	T	Styrene	2.0000	1.8345	8.3	100	0.00
76	P	Bromoform	2.0000	1.9520	2.4	100	0.02
77	T	Isopropylbenzene	2.0000	1.9916	0.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9280	3.6	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0161	-1.6	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8778	6.1	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7434	12.8	100	0.00
83	T	n-Propylbenzene	2.0000	2.1100	-5.5	100	0.00
84	T	Bromobenzene	2.0000	1.9771	1.1	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	1.9935	0.3	100	0.00
86	T	2-Chlorotoluene	2.0000	1.9302	3.5	100	0.00
87	T	4-Chlorotoluene	2.0000	2.2662	-13.3	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7194	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	1.9338	3.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	2.0262	-1.3	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0748	-3.7	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9501	2.5	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	1.9731	1.3	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9728	1.4	100	0.00
95	T	n-Butylbenzene	2.0000	1.9417	2.9	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	2.0008	-0.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.8985	5.1	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.8770	6.2	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.9480	2.6	100	0.00
100	T	Naphthalene	2.0000	1.8348	8.3	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8067	9.7	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	778912	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	612991	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	325196	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	19042	2.3308	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	9.32%#		
43) 1,2-Dichloroethane-d4	10.53	65	17061	2.4156	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	9.68%#		
58) Toluene-d8	12.91	98	67864	2.4230	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	9.68%#		
80) p-Bromofluorobenzene	16.30	95	27271	2.3761	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	9.52%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	43158	4.0943	ug/L	99
3) Chloromethane	3.83	50	64959	4.9293	ug/L	98
4) Vinyl Chloride	4.06	62	61310	4.9264	ug/L	99
5) 1,3-Butadiene	4.11	54	42524	3.2475	ug/L	80
6) Bromomethane	4.97	94	11598	3.9117	ug/L	96
7) Chloroethane	5.13	64	26632	4.8991	ug/L	96
8) Trichlorofluoromethane	5.62	101	65432	4.8407	ug/L	98
9) Diethyl ether	6.15	59	254455	49.9827	ug/L	91
10) Isoprene	6.19	67	49212	4.6047	ug/L	89
11) Acrolein	6.38	56	18060	25.6156	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	36923	4.7903	ug/L	99
13) Acetone	6.49	43	5612	5.1228	ug/L	83
14) 1,1-Dichloroethene	6.72	61	54337	4.8168	ug/L	92
15) Tert-Butyl Alcohol	6.82	59	38399	108.1334	ug/L	97
16) Dimethyl Sulfide	6.98	62	36188	4.8162	ug/L	88
17) Iodomethane	7.24	142	4078	1.2101	ug/L	89
18) Methyl acetate	7.25	43	15352	5.1176	ug/L #	85
19) Methylene Chloride	7.49	84	38847	4.7920	ug/L	82
20) Carbon Disulfide	7.55	76	116168	4.9528	ug/L	98
21) Acrylonitrile	7.67	53	38351	25.2377	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	78139	4.8920	ug/L	96
23) trans-1,2-Dichloroethene	7.95	61	52084	4.7457	ug/L	95
24) n-Hexane	8.02	57	46838	5.1127	ug/L	96
25) Diisopropyl ether	8.35	45	1253906	51.0432	ug/L	95
26) Vinyl Acetate	8.53	43	55036	4.9952	ug/L	92
27) 1,1-Dichloroethane	8.57	63	68755	4.8676	ug/L	98
28) Ethyl-Tert-Butyl ether	8.93	59	1064807	50.9683	ug/L	97
29) 2-Butanone	9.12	43	8240	4.7964	ug/L	80
30) Propionitrile	9.22	54	27971	52.5317	ug/L	100
31) 2,2-Dichloropropane	9.33	77	58069	4.8700	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	44615	4.9182	ug/L	96
33) Chloroform	9.61	83	71537	4.5709	ug/L	96
34) 1-Bromopropane	9.75	122	8516	4.7588	ug/L	99
35) Bromochloromethane	9.84	130	24918	5.0905	ug/L	91
36) Tetrahydrofuran	9.86	42	59759	50.5323	ug/L	85
38) 1,1,1-Trichloroethane	10.14	97	61305	4.8538	ug/L	98
39) Cyclohexane	10.17	56	57878	4.9219	ug/L	89
40) 1,1-Dichloropropene	10.34	75	52556	4.7657	ug/L	98
41) Tert-Amyl-Methyl ether	10.43	73	963240	51.4900	ug/L	97
42) Carbon Tetrachloride	10.48	117	56505	4.8249	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

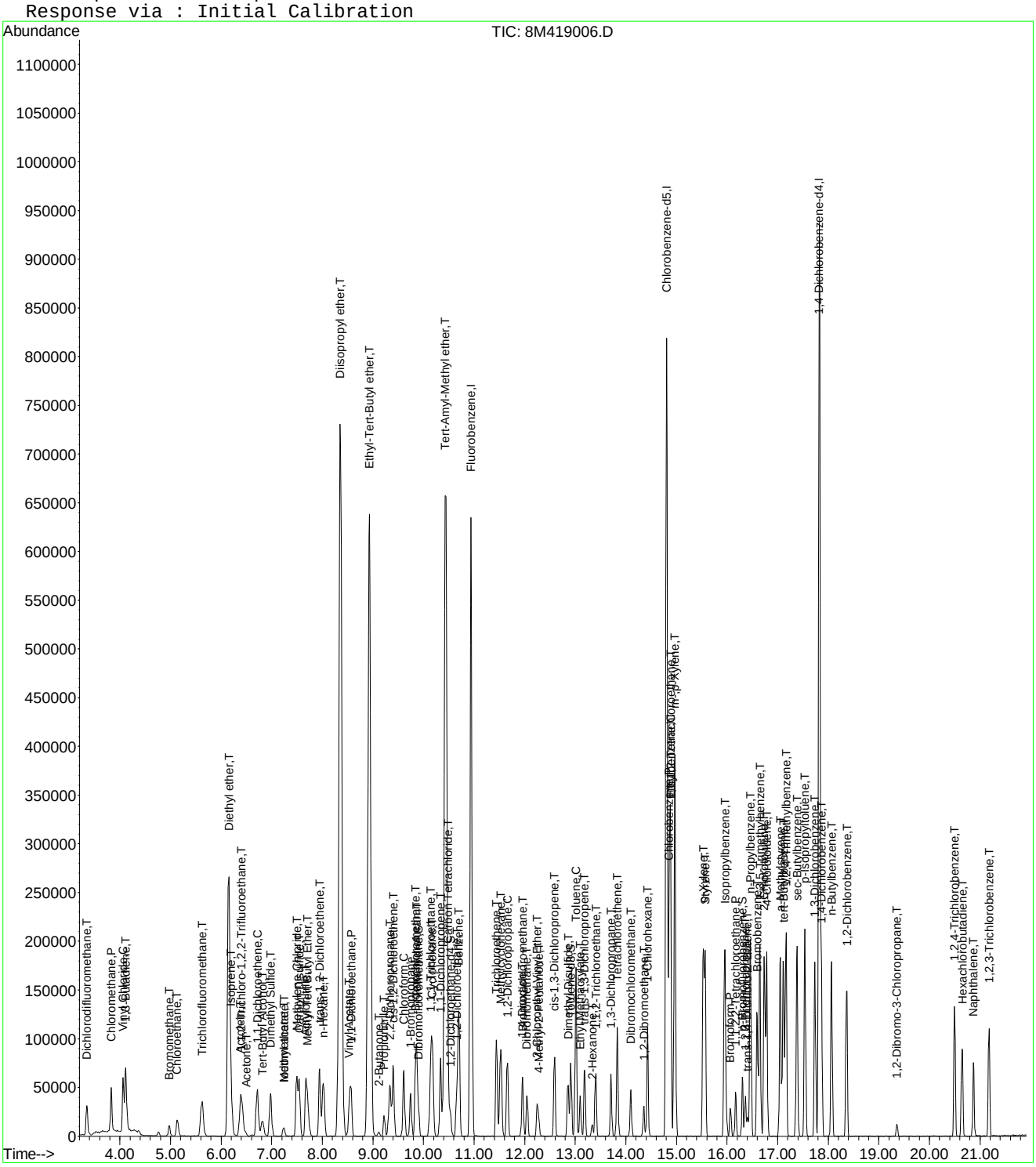
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	43458	4.9106	ug/L		97
46)	Benzene	10.70	78	157813	4.9044	ug/L		96
47)	Trichloroethene	11.44	130	42638	4.7169	ug/L		97
48)	Methylcyclohexane	11.52	83	57749	4.7926	ug/L		95
49)	1,2-Dichloropropane	11.66	63	37898	4.8221	ug/L		94
50)	Bromodichloromethane	11.96	83	49682	4.8305	ug/L		98
51)	1,4-Dioxane	11.95	88	4215	94.0662	ug/L		87
52)	Dibromomethane	12.04	93	20146	4.9810	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	15782	4.6410	ug/L		93
54)	4-Methyl-2-Pentanone	12.28	58	6536	4.2910	ug/L		95
55)	cis-1,3-Dichloropropene	12.59	75	56759	4.8458	ug/L		99
56)	Dimethyl Disulfide	12.86	79	20741	5.9847	ug/L		89
59)	Toluene	13.01	91	173564	5.0867	ug/L		97
60)	Ethyl Methacrylate	13.10	69	30943	4.8067	ug/L		84
62)	trans-1,3-Dichloropropene	13.18	75	47647	4.8150	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	27951	4.9790	ug/L		97
64)	2-Hexanone	13.33	58	5889	4.2746	ug/L	#	80
65)	1,3-Dichloropropane	13.71	76	45722	4.8179	ug/L		84
66)	Tetrachloroethene	13.83	164	34889	4.8678	ug/L		97
67)	Dibromochloromethane	14.10	129	35461	4.9157	ug/L		98
68)	1,2-Dibromoethane	14.36	107	27169	4.9547	ug/L		98
69)	1-Chlorohexane	14.43	91	52484	4.8617	ug/L		91
70)	Chlorobenzene	14.85	112	114782	4.7258	ug/L		100
71)	1,1,1,2-Tetrachloroethane	14.88	131	41080	4.7660	ug/L		99
72)	Ethylbenzene	14.88	106	62867	4.6214	ug/L		90
73)	m-,p-Xylene	14.97	106	153807	9.7633	ug/L		91
74)	o-Xylene	15.53	106	76425	4.8253	ug/L		99
75)	Styrene	15.57	104	122002	4.9133	ug/L		98
76)	Bromoform	16.06	173	19962	4.5235	ug/L		95
77)	Isopropylbenzene	15.96	105	195151	5.1460	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	30245	4.9291	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	8507	4.8359	ug/L		83
82)	trans-1,4-Dichloro-2-Buten	16.40	53	5523	4.2935	ug/L		74
83)	n-Propylbenzene	16.47	91	234652	5.1554	ug/L		99
84)	Bromobenzene	16.60	156	52847	4.9554	ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	163016	4.9464	ug/L		99
86)	2-Chlorotoluene	16.73	91	166031	5.3432	ug/L		95
87)	4-Chlorotoluene	16.79	91	121429	4.3363	ug/L		100
88)	a-Methylstyrene	17.05	118	84298	4.5624	ug/L		95
89)	tert-Butylbenzene	17.12	134	34340	4.6022	ug/L		94
90)	1,2,4-Trimethylbenzene	17.17	105	167693	4.9841	ug/L		100
91)	sec-Butylbenzene	17.38	105	207005	5.0149	ug/L		100
92)	p-Isopropyltoluene	17.54	119	170789	4.9137	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	99857	4.8307	ug/L		97
94)	1,4-Dichlorobenzene	17.87	146	98681	4.6956	ug/L		94
95)	n-Butylbenzene	18.07	91	145988	4.6626	ug/L		98
96)	1,2-Dichlorobenzene	18.37	146	89702	4.9398	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	4713	4.7194	ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	55429	4.5338	ug/L		97
99)	Hexachlorobutadiene	20.65	225	26149	4.5963	ug/L		99
100)	Naphthalene	20.87	128	81337	4.6555	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	44939	4.4263	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419006.D 8260WT.M Tue Apr 18 11:59:03 2017 Page 3

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.0943	18.1	100	-0.01
3	P	Chloromethane	5.0000	4.9293	1.4	100	0.01
4	C	Vinyl Chloride	5.0000	4.9264	1.5	100	0.01
5	T	1,3-Butadiene	5.0000	3.2475	35.0#	100	0.02
6	T	Bromomethane	5.0000	3.9117	21.8	100	0.01
7	T	Chloroethane	5.0000	4.8991	2.0	100	0.00
8	T	Trichlorofluoromethane	5.0000	4.8407	3.2	100	0.02
9	T	Diethyl ether	50.0000	49.9827	0.0	100	0.01
10	T	Isoprene	5.0000	4.6047	7.9	100	0.01
11	T	Acrolein	25.0000	25.6156	-2.5	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.7903	4.2	100	0.00
13	T	Acetone	5.0000	5.1228	-2.5	100	0.01
14	C	1,1-Dichloroethene	5.0000	4.8168	3.7	100	0.02
15	T	Tert-Butyl Alcohol	100.0000	108.1334	-8.1	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8162	3.7	100	0.00
17	T	Iodomethane	5.0000	1.2101	75.8#	100	0.01
18	T	Methyl acetate	5.0000	5.1176	-2.4	100	0.01
19	T	Methylene Chloride	5.0000	4.7920	4.2	100	0.00
20	T	Carbon Disulfide	5.0000	4.9528	0.9	100	0.00
21	T	Acrylonitrile	25.0000	25.2377	-1.0	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	4.8920	2.2	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.7457	5.1	100	0.01
24	T	n-Hexane	5.0000	5.1127	-2.3	100	0.01
25	T	Diisopropyl ether	50.0000	51.0432	-2.1	100	0.00
26	T	Vinyl Acetate	5.0000	4.9952	0.1	100	0.00
27	P	1,1-Dichloroethane	5.0000	4.8676	2.6	100	0.01
28	T	Ethyl-Tert-Butyl ether	50.0000	50.9683	-1.9	100	0.00
29	T	2-Butanone	5.0000	4.7964	4.1	100	0.01
30	T	Propionitrile	50.0000	52.5317	-5.1	100	0.00
31	T	2,2-Dichloropropane	5.0000	4.8700	2.6	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9182	1.6	100	0.00
33	C	Chloroform	5.0000	4.5709	8.6	100	0.01
34		1-Bromopropane	5.0000	4.7588	4.8	100	0.00
35	T	Bromochloromethane	5.0000	5.0905	-1.8	100	-0.01
36	T	Tetrahydrofuran	50.0000	50.5323	-1.1	100	0.00
37	S	Dibromofluoromethane	2.5000	2.3308	6.8	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8538	2.9	100	0.00
39	T	Cyclohexane	5.0000	4.9219	1.6	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.7657	4.7	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	51.4900	-3.0	100	-0.01
42	T	Carbon Tetrachloride	5.0000	4.8249	3.5	100	0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4156	3.4	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	5.0000	4.9106	1.8	100	0.00
46	T	Benzene	5.0000	4.9044	1.9	100	0.00
47	T	Trichloroethene	5.0000	4.7169	5.7	100	0.00
48	T	Methylcyclohexane	5.0000	4.7926	4.1	100	0.00
49	C	1,2-Dichloropropane	5.0000	4.8221	3.6	100	0.01
50	T	Bromodichloromethane	5.0000	4.8305	3.4	100	0.00
51	T	1,4-Dioxane	100.0000	94.0662	5.9	100	0.00
52	T	Dibromomethane	5.0000	4.9810	0.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	4.6410	7.2	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.2910	14.2	100	0.00

(#) = Out of Range
8M419006.D 8260WT.M Tue Apr 18 12:00:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	4.8458	3.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	5.9847	-19.7	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.4230	3.1	100	0.00
59	C	Toluene	5.0000	5.0867	-1.7	100	0.00
60	T	Ethyl Methacrylate	5.0000	4.8067	3.9	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	5.0000	4.8150	3.7	100	-0.01
63	T	1,1,2-Trichloroethane	5.0000	4.9790	0.4	100	0.00
64	T	2-Hexanone	5.0000	4.2745	14.5	100	0.00
65	T	1,3-Dichloropropane	5.0000	4.8179	3.6	100	0.00
66	T	Tetrachloroethene	5.0000	4.8678	2.6	100	0.00
67	T	Dibromochloromethane	5.0000	4.9157	1.7	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9547	0.9	100	0.00
69	T	1-Chlorohexane	5.0000	4.8617	2.8	100	0.00
70	P	Chlorobenzene	5.0000	4.7258	5.5	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.7660	4.7	100	0.01
72	C	Ethylbenzene	5.0000	4.6214	7.6	100	0.00
73	T	m-,p-Xylene	10.0000	9.7632	2.4	100	0.00
74	T	o-Xylene	5.0000	4.8253	3.5	100	0.01
75	T	Styrene	5.0000	4.9133	1.7	100	0.00
76	P	Bromoform	5.0000	4.5235	9.5	100	0.01
77	T	Isopropylbenzene	5.0000	5.1460	-2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	4.9291	1.4	100	-0.01
80	S	p-Bromofluorobenzene	2.5000	2.3761	5.0	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	4.8359	3.3	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.2935	14.1	100	0.00
83	T	n-Propylbenzene	5.0000	5.1554	-3.1	100	0.01
84	T	Bromobenzene	5.0000	4.9554	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9464	1.1	100	0.01
86	T	2-Chlorotoluene	5.0000	5.3432	-6.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.3363	13.3	100	0.00
88	T	a-Methylstyrene	5.0000	4.5624	8.8	100	0.00
89	T	tert-Butylbenzene	5.0000	4.6022	8.0	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9841	0.3	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0149	-0.3	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9136	1.7	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8308	3.4	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.6956	6.1	100	0.00
95	T	n-Butylbenzene	5.0000	4.6626	6.7	100	0.01
96	T	1,2-Dichlorobenzene	5.0000	4.9398	1.2	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	4.7194	5.6	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.5338	9.3	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.5963	8.1	100	0.00
100	T	Naphthalene	5.0000	4.6555	6.9	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.4263	11.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419006.D 8260WT.M Tue Apr 18 12:00:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	821977	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	642967	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	340149	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	85773	9.9487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 39.80%#			
43) 1,2-Dichloroethane-d4	10.53	65	74599	10.0087	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.04%#			
58) Toluene-d8	12.91	98	304223	10.3554	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 41.44%#			
80) p-Bromofluorobenzene	16.30	95	119256	9.9340	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 39.72%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	252364	22.6868	ug/L	99
3) Chloromethane	3.83	50	287414	20.6672	ug/L	98
4) Vinyl Chloride	4.06	62	282320	21.4964	ug/L	98
5) 1,3-Butadiene	4.11	54	161495	28.2603	ug/L	87
6) Bromomethane	4.97	94	81674	20.2735	ug/L	99
7) Chloroethane	5.13	64	120257	20.9628	ug/L	97
8) Trichlorofluoromethane	5.62	101	297058	20.8251	ug/L	100
9) Diethyl ether	6.15	59	415326	77.3083	ug/L	91
10) Isoprene	6.19	67	213582	18.9375	ug/L	91
11) Acrolein	6.38	56	27406	36.8350	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	166401	20.4573	ug/L	99
13) Acetone	6.48	43	21719	18.7871	ug/L	94
14) 1,1-Dichloroethene	6.72	61	247619	20.8008	ug/L	96
15) Tert-Butyl Alcohol	6.82	59	55617	148.4145	ug/L	99
16) Dimethyl Sulfide	6.98	62	148417	18.7178	ug/L	90
17) Iodomethane	7.24	142	44249	12.4422	ug/L	90
18) Methyl acetate	7.24	43	60034	18.9640	ug/L	90
19) Methylene Chloride	7.49	84	172623	20.1783	ug/L	82
20) Carbon Disulfide	7.55	76	479534	19.3736	ug/L	99
21) Acrylonitrile	7.67	53	64007	39.9143	ug/L	100
22) Methyl Tert Butyl Ether	7.70	73	348421	20.6705	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	236570	20.4261	ug/L	96
24) n-Hexane	8.02	57	182974	18.9267	ug/L	91
25) Diisopropyl ether	8.36	45	2083333	80.3637	ug/L	95
26) Vinyl Acetate	8.53	43	230138	19.7935	ug/L	95
27) 1,1-Dichloroethane	8.57	63	311422	20.8926	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	1753329	79.5282	ug/L	97
29) 2-Butanone	9.12	43	34263	18.8992	ug/L	91
30) Propionitrile	9.22	54	43804	77.9572	ug/L	100
31) 2,2-Dichloropropane	9.34	77	262688	20.8761	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	197079	20.5872	ug/L	94
33) Chloroform	9.61	83	315049	19.0755	ug/L	99
34) 1-Bromopropane	9.75	122	36957	19.5700	ug/L	98
35) Bromochloromethane	9.84	130	109675	21.2316	ug/L	94
36) Tetrahydrofuran	9.86	42	95917	76.8581	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	279934	21.0024	ug/L	99
39) Cyclohexane	10.17	56	235278	18.9596	ug/L	91
40) 1,1-Dichloropropene	10.34	75	238994	20.5364	ug/L	99
41) Tert-Amyl-Methyl ether	10.44	73	1574273	79.7438	ug/L	98
42) Carbon Tetrachloride	10.48	117	265448	21.4787	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

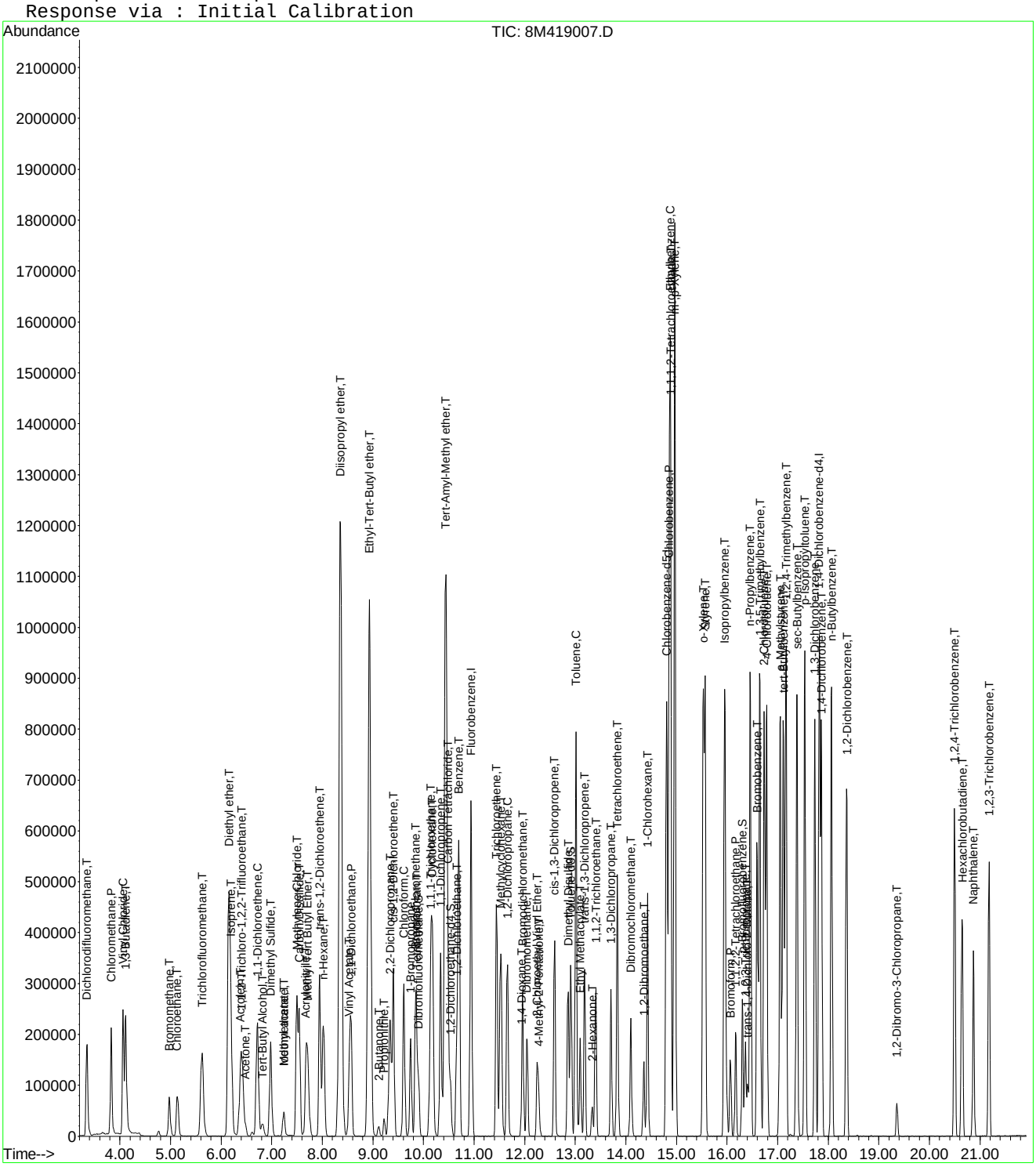
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	195832	20.9688	ug/L	96
46)	Benzene	10.70	78	711384	20.9494	ug/L	96
47)	Trichloroethene	11.44	130	193633	20.2988	ug/L	98
48)	Methylcyclohexane	11.53	83	242870	19.0998	ug/L	96
49)	1,2-Dichloropropane	11.66	63	168889	20.3636	ug/L	95
50)	Bromodichloromethane	11.96	83	229920	21.1836	ug/L	99
51)	1,4-Dioxane	11.94	88	6600	139.5754	ug/L	85
52)	Dibromomethane	12.04	93	90632	21.2345	ug/L	100
53)	2-Chloroethyl Vinyl Ether	12.25	63	69708	19.4252	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	29890	18.5953	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	263367	21.3068	ug/L	99
56)	Dimethyl Disulfide	12.86	79	111248	17.7360	ug/L	95
59)	Toluene	13.01	91	775026	21.6549	ug/L	99
60)	Ethyl Methacrylate	13.10	69	134570	19.9297	ug/L	85
62)	trans-1,3-Dichloropropene	13.19	75	216517	20.8604	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	122992	20.8877	ug/L	97
64)	2-Hexanone	13.33	58	27313	18.9010	ug/L	86
65)	1,3-Dichloropropane	13.71	76	210672	21.1642	ug/L	88
66)	Tetrachloroethene	13.83	164	159386	21.2013	ug/L	98
67)	Dibromochloromethane	14.10	129	162011	21.4115	ug/L	100
68)	1,2-Dibromoethane	14.36	107	124514	21.6484	ug/L	98
69)	1-Chlorohexane	14.43	91	226576	20.0098	ug/L	94
70)	Chlorobenzene	14.85	112	518298	20.3445	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.88	131	195026	21.5715	ug/L	99
72)	Ethylbenzene	14.87	106	295348	20.6992	ug/L	97
73)	m-,p-Xylene	14.97	106	708993	42.9068	ug/L	96
74)	o-Xylene	15.54	106	341856	20.5778	ug/L	100
75)	Styrene	15.57	104	572956	21.9986	ug/L	97
76)	Bromoform	16.07	173	98140	19.0943	ug/L	98
77)	Isopropylbenzene	15.95	105	862970	21.6948	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.17	83	138371	21.5592	ug/L	98
81)	1,2,3-Trichloropropane	16.36	110	38934	21.1594	ug/L	72
82)	trans-1,4-Dichloro-2-Buten	16.40	53	29562	19.3838	ug/L	86
83)	n-Propylbenzene	16.45	91	1035858	21.7579	ug/L	100
84)	Bromobenzene	16.60	156	233146	20.9007	ug/L	97
85)	1,3,5-Trimethylbenzene	16.65	105	744817	21.6064	ug/L	99
86)	2-Chlorotoluene	16.73	91	638655	19.6497	ug/L	93
87)	4-Chlorotoluene	16.79	91	644553	22.0056	ug/L	99
88)	a-Methylstyrene	17.05	118	368766	19.0812	ug/L	97
89)	tert-Butylbenzene	17.12	134	159935	20.4918	ug/L	94
90)	1,2,4-Trimethylbenzene	17.17	105	766585	21.7826	ug/L	98
91)	sec-Butylbenzene	17.39	105	933219	21.6142	ug/L	99
92)	p-Isopropyltoluene	17.54	119	792583	21.8005	ug/L	98
93)	1,3-Dichlorobenzene	17.74	146	452988	20.9507	ug/L	97
94)	1,4-Dichlorobenzene	17.87	146	445404	20.2622	ug/L	99
95)	n-Butylbenzene	18.07	91	716182	21.8682	ug/L	100
96)	1,2-Dichlorobenzene	18.37	146	397181	20.9107	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.36	75	20637	19.7567	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	259021	20.2551	ug/L	99
99)	Hexachlorobutadiene	20.65	225	122095	20.5178	ug/L	100
100)	Naphthalene	20.87	128	379929	20.7902	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	218288	20.5554	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:05 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419007.D 8260WT.M Tue Apr 18 11:59:06 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	830845	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	667165	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	355416	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	225758	25.9058	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.64%			
43) 1,2-Dichloroethane-d4	10.53	65	196828	26.1260	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.52%			
58) Toluene-d8	12.91	98	790662	25.9370	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.76%			
80) p-Bromofluorobenzene	16.30	95	316705	25.2481	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	614921	54.6895	ug/L	100
3) Chloromethane	3.82	50	669133	47.6020	ug/L	99
4) Vinyl Chloride	4.06	62	646175	48.6760	ug/L	98
5) 1,3-Butadiene	4.10	54	271666	52.3987	ug/L	95
6) Bromomethane	4.97	94	247075	50.8432	ug/L	99
7) Chloroethane	5.14	64	294319	50.7572	ug/L	96
8) Trichlorofluoromethane	5.62	101	725121	50.2916	ug/L	99
9) Diethyl ether	6.15	59	532757	98.1084	ug/L	92
10) Isoprene	6.18	67	574160	50.3651	ug/L	91
11) Acrolein	6.39	56	36832	48.9756	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	415693	50.5596	ug/L	99
13) Acetone	6.48	43	59341	50.7827	ug/L	93
14) 1,1-Dichloroethene	6.71	61	615843	51.1806	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	75781	200.0639	ug/L	99
16) Dimethyl Sulfide	6.98	62	398383	49.7064	ug/L	89
17) Iodomethane	7.23	142	201159	55.9595	ug/L	95
18) Methyl acetate	7.23	43	161579	50.4959	ug/L	92
19) Methylene Chloride	7.49	84	428023	49.4986	ug/L	84
20) Carbon Disulfide	7.54	76	1268101	50.6857	ug/L	100
21) Acrylonitrile	7.68	53	87950	54.2596	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	877515	51.5041	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	586042	50.0603	ug/L	95
24) n-Hexane	8.02	57	481804	49.3054	ug/L	92
25) Diisopropyl ether	8.35	45	2603190	99.3452	ug/L	96
26) Vinyl Acetate	8.53	43	596735	50.7757	ug/L	95
27) 1,1-Dichloroethane	8.57	63	767008	50.9075	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2222589	99.7371	ug/L	98
29) 2-Butanone	9.12	43	93741	51.1549	ug/L	90
30) Propionitrile	9.22	54	56850	100.0950	ug/L	99
31) 2,2-Dichloropropane	9.33	77	643624	50.6036	ug/L	100
32) cis-1,2-Dichloroethene	9.40	96	492349	50.8826	ug/L	96
33) Chloroform	9.61	83	775769	46.4696	ug/L	98
34) 1-Bromopropane	9.75	122	94615	49.5670	ug/L	98
35) Bromochloromethane	9.84	130	277955	53.2340	ug/L	94
36) Tetrahydrofuran	9.86	42	125929	99.8297	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	697375	51.7630	ug/L	99
39) Cyclohexane	10.17	56	629161	50.1591	ug/L	91
40) 1,1-Dichloropropene	10.34	75	585776	49.7976	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	2000715	100.2633	ug/L	97
42) Carbon Tetrachloride	10.48	117	654658	52.4061	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:07 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

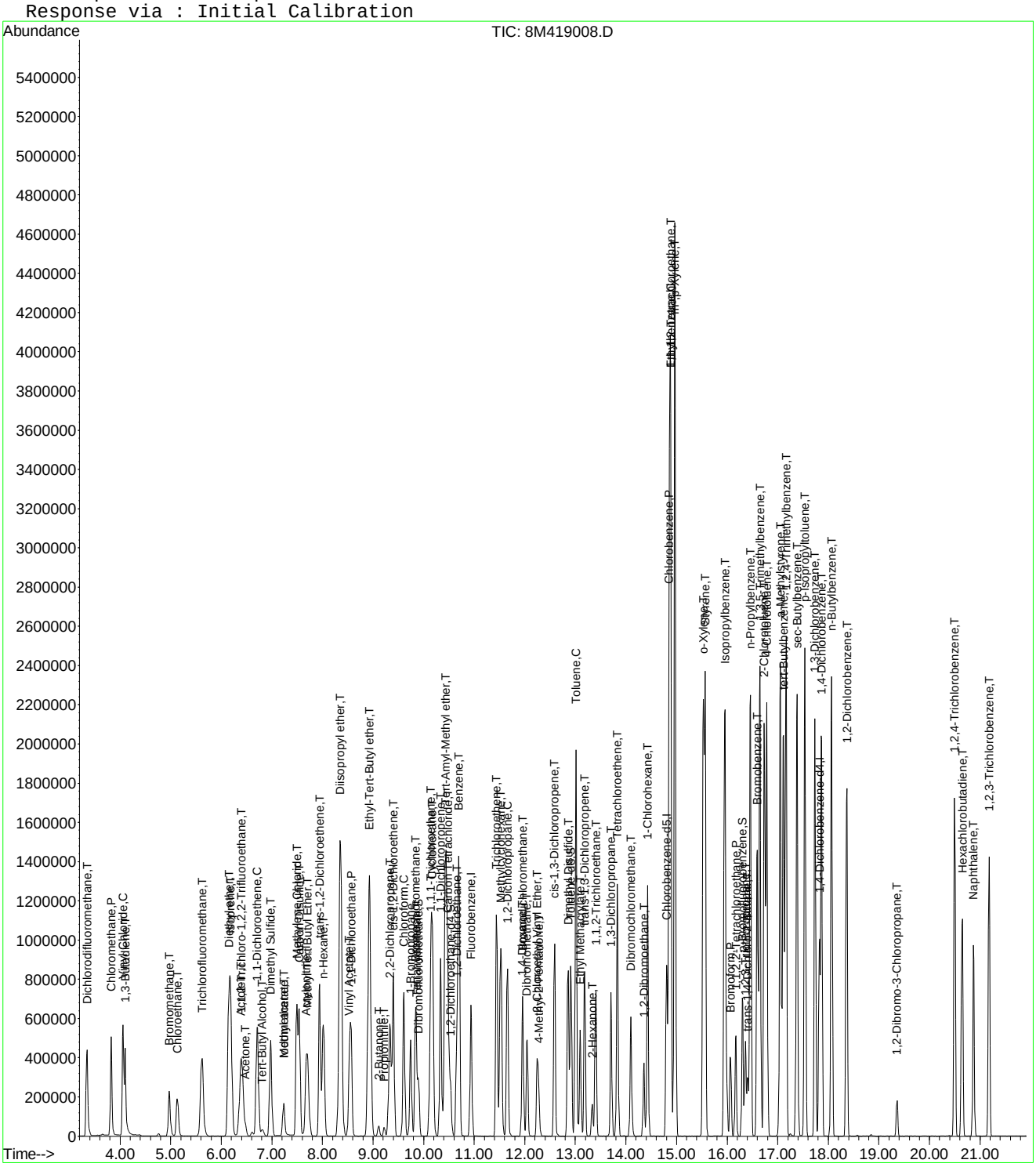
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	486966	51.5856	ug/L	96
46)	Benzene	10.70	78	1734691	50.5393	ug/L	95
47)	Trichloroethene	11.44	130	482430	50.0340	ug/L	98
48)	Methylcyclohexane	11.52	83	641638	49.9211	ug/L	95
49)	1,2-Dichloropropane	11.66	63	424777	50.6703	ug/L	95
50)	Bromodichloromethane	11.96	83	576854	52.5810	ug/L	98
51)	1,4-Dioxane	11.95	88	10143	212.2125	ug/L	95
52)	Dibromomethane	12.04	93	226605	52.5254	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.25	63	188674	52.0156	ug/L	98
54)	4-Methyl-2-Pentanone	12.28	58	83519	51.4047	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	670536	53.6685	ug/L	99
56)	Dimethyl Disulfide	12.86	79	333317	46.4713	ug/L	95
59)	Toluene	13.01	91	1910471	51.4442	ug/L	99
60)	Ethyl Methacrylate	13.09	69	383134	54.6839	ug/L	86
62)	trans-1,3-Dichloropropene	13.19	75	563669	52.3371	ug/L	99
63)	1,1,2-Trichloroethane	13.40	97	305450	49.9930	ug/L	98
64)	2-Hexanone	13.33	58	78016	52.0300	ug/L	88
65)	1,3-Dichloropropane	13.70	76	530141	51.3266	ug/L	88
66)	Tetrachloroethene	13.83	164	393935	50.5000	ug/L	97
67)	Dibromochloromethane	14.10	129	424633	54.0844	ug/L	100
68)	1,2-Dibromoethane	14.36	107	314486	52.6944	ug/L	100
69)	1-Chlorohexane	14.43	91	601634	51.2055	ug/L	95
70)	Chlorobenzene	14.85	112	1317659	49.8455	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	513627	54.7508	ug/L	100
72)	Ethylbenzene	14.88	106	758538	51.2333	ug/L	99
73)	m-,p-Xylene	14.97	106	1805748	105.3165	ug/L	100
74)	o-Xylene	15.53	106	865202	50.1913	ug/L	99
75)	Styrene	15.56	104	1482377	54.8515	ug/L	96
76)	Bromoform	16.07	173	261596	48.1536	ug/L	100
77)	Isopropylbenzene	15.96	105	2152073	52.1403	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	351132	52.3588	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	102223	53.1686	ug/L	89
82)	trans-1,4-Dichloro-2-Buten	16.40	53	86624	53.2257	ug/L	89
83)	n-Propylbenzene	16.46	91	2542578	51.1120	ug/L	98
84)	Bromobenzene	16.60	156	600757	51.5423	ug/L	96
85)	1,3,5-Trimethylbenzene	16.65	105	1864667	51.7685	ug/L	97
86)	2-Chlorotoluene	16.73	91	1562483	46.0085	ug/L	82
87)	4-Chlorotoluene	16.78	91	1653591	54.0299	ug/L	92
88)	a-Methylstyrene	17.05	118	1034318	51.2201	ug/L	100
89)	tert-Butylbenzene	17.12	134	406063	49.7923	ug/L	95
90)	1,2,4-Trimethylbenzene	17.17	105	1948760	52.9955	ug/L	97
91)	sec-Butylbenzene	17.38	105	2311933	51.2464	ug/L	98
92)	p-Isopropyltoluene	17.54	119	1987599	52.3217	ug/L	99
93)	1,3-Dichlorobenzene	17.74	146	1155357	51.1399	ug/L	98
94)	1,4-Dichlorobenzene	17.87	146	1131775	49.2748	ug/L	99
95)	n-Butylbenzene	18.07	91	1806946	52.8040	ug/L	99
96)	1,2-Dichlorobenzene	18.37	146	1022039	51.4969	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	56496	51.7628	ug/L	90
98)	1,2,4-Trichlorobenzene	20.49	180	698538	52.2784	ug/L	99
99)	Hexachlorobutadiene	20.65	225	312987	50.3375	ug/L	98
100)	Naphthalene	20.87	128	1020583	53.4486	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583406	52.5775	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	890949	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	720891	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	383088	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	472717	52.5898	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 210.36%#			
43) 1,2-Dichloroethane-d4	10.53	65	409191	52.1214	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 208.48%#			
58) Toluene-d8	12.91	98	1637669	49.8807	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 199.52%#			
80) p-Bromofluorobenzene	16.30	95	659264	49.4208	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 197.68%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	1290950	114.7073	ug/L	99
3) Chloromethane	3.82	50	1428240	91.5868	ug/L	99
4) Vinyl Chloride	4.06	62	1309074	87.7619	ug/L	99
5) 1,3-Butadiene	4.10	54	464115	48.1221	ug/L	96
6) Bromomethane	4.97	94	643662	218.3047	ug/L	99
7) Chloroethane	5.13	64	642480	105.8029	ug/L	98
8) Trichlorofluoromethane	5.62	101	1556663	102.1329	ug/L	100
9) Diethyl ether	6.15	59	1193850	209.2873	ug/L	91
10) Isoprene	6.18	67	1256334	110.0441	ug/L	89
11) Acrolein	6.39	56	84264	106.8054	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	896546	103.8513	ug/L	98
13) Acetone	6.48	43	131839	107.1463	ug/L	95
14) 1,1-Dichloroethene	6.71	61	1340489	106.4797	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	161800	419.1836	ug/L	100
16) Dimethyl Sulfide	6.98	62	875323	107.2557	ug/L	91
17) Iodomethane	7.24	142	550506	330.5339	ug/L	94
18) Methyl acetate	7.24	43	350126	103.5017	ug/L	91
19) Methylene Chloride	7.49	84	940849	102.7095	ug/L	84
20) Carbon Disulfide	7.55	76	2734573	101.8614	ug/L	99
21) Acrylonitrile	7.68	53	192477	116.4657	ug/L	98
22) Methyl Tert Butyl Ether	7.70	73	1934910	108.5495	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	1292550	104.8396	ug/L	95
24) n-Hexane	8.02	57	1050655	101.8502	ug/L	92
25) Diisopropyl ether	8.36	45	5712696	202.4948	ug/L	97
26) Vinyl Acetate	8.53	43	1305418	104.1714	ug/L	95
27) 1,1-Dichloroethane	8.57	63	1685691	106.7005	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	4942845	209.1646	ug/L	98
29) 2-Butanone	9.12	43	205108	109.6264	ug/L	92
30) Propionitrile	9.22	54	127357	217.6184	ug/L	100
31) 2,2-Dichloropropane	9.33	77	1411824	105.4011	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	1085665	107.4406	ug/L	95
33) Chloroform	9.61	83	1687138	91.3508	ug/L	97
34) 1-Bromopropane	9.75	122	211298	107.4131	ug/L	100
35) Bromochloromethane	9.84	130	607058	113.4193	ug/L	94
36) Tetrahydrofuran	9.86	42	282824	212.9932	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	1536060	110.9408	ug/L	100
39) Cyclohexane	10.17	56	1386309	106.7139	ug/L	90
40) 1,1-Dichloropropene	10.34	75	1279941	102.9919	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	4484638	212.9890	ug/L	97
42) Carbon Tetrachloride	10.48	117	1460831	114.3286	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

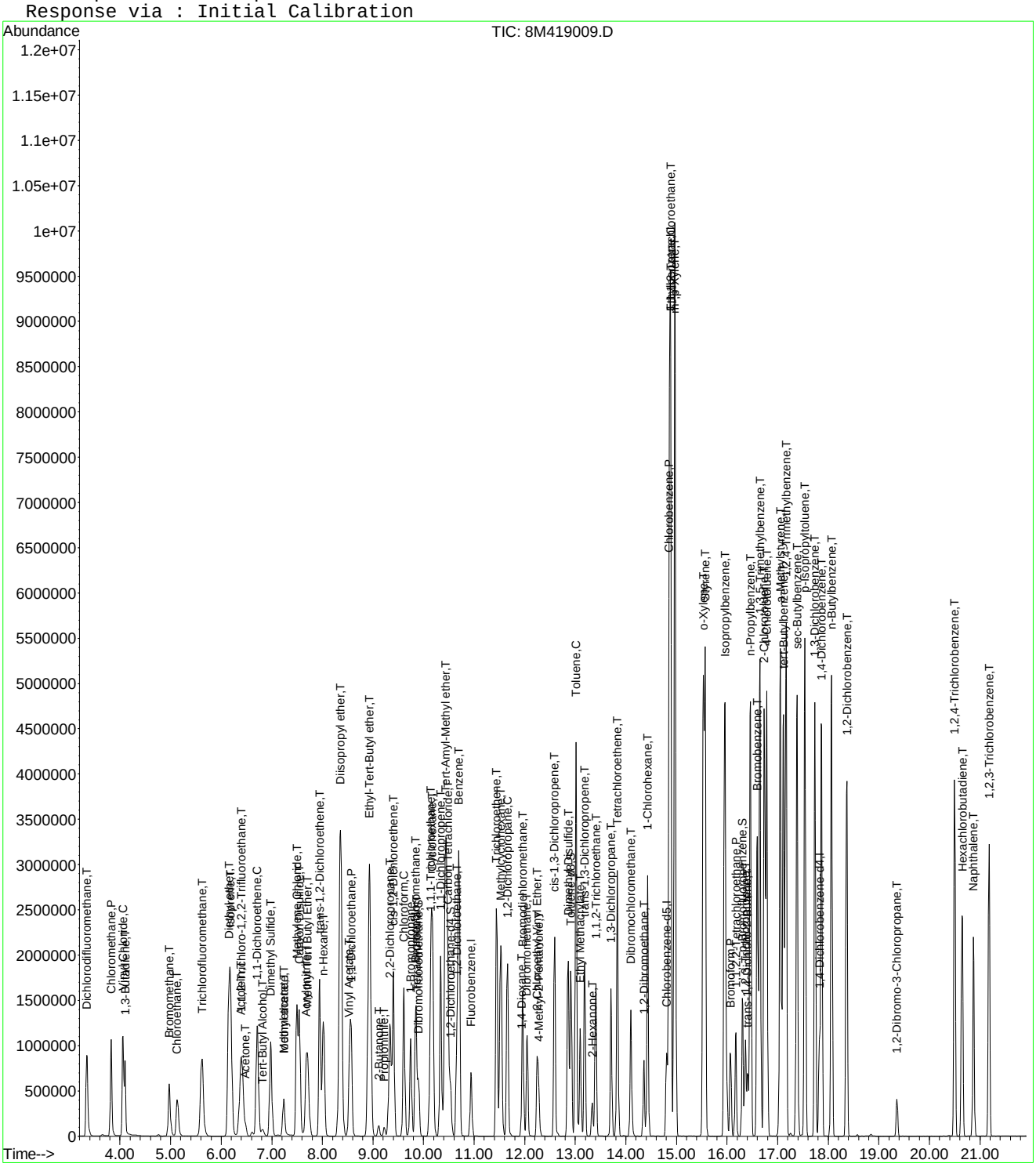
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	1085356	110.6535	ug/L		97
46)	Benzene	10.70	78	3722629	100.4557	ug/L		93
47)	Trichloroethene	11.44	130	1074923	106.6468	ug/L		98
48)	Methylcyclohexane	11.52	83	1398054	106.0194	ug/L		95
49)	1,2-Dichloropropane	11.66	63	942189	107.5812	ug/L		95
50)	Bromodichloromethane	11.96	83	1280673	114.1972	ug/L		98
51)	1,4-Dioxane	11.94	88	22104	475.7434	ug/L		90
52)	Dibromomethane	12.04	93	499793	112.7164	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	415136	117.1702	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	182865	117.4045	ug/L		98
55)	cis-1,3-Dichloropropene	12.59	75	1487011	117.8164	ug/L		100
56)	Dimethyl Disulfide	12.86	79	764852	141.9810	ug/L		96
59)	Toluene	13.01	91	4070819	100.0521	ug/L		97
60)	Ethyl Methacrylate	13.10	69	835156	122.6996	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	1269353	114.4143	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	683956	104.4552	ug/L		97
64)	2-Hexanone	13.33	58	172797	118.5052	ug/L		88
65)	1,3-Dichloropropane	13.70	76	1162920	105.4392	ug/L		87
66)	Tetrachloroethene	13.83	164	900370	111.2776	ug/L		98
67)	Dibromochloromethane	14.10	129	959992	121.1054	ug/L		100
68)	1,2-Dibromoethane	14.36	107	694704	111.6258	ug/L		100
69)	1-Chlorohexane	14.43	91	1319148	108.1005	ug/L		93
70)	Chlorobenzene	14.85	112	3004153	106.5496	ug/L		99
71)	1,1,1,2-Tetrachloroethane	14.88	131	1219121	127.8831	ug/L		99
72)	Ethylbenzene	14.88	106	1786508	119.7983	ug/L		90
73)	m-,p-Xylene	14.97	106	4003661	220.6823	ug/L		86
74)	o-Xylene	15.53	106	1960306	109.1849	ug/L		94
75)	Styrene	15.57	104	3292073	119.3828	ug/L		99
76)	Bromoform	16.07	173	597737	133.4926	ug/L		99
77)	Isopropylbenzene	15.96	105	4545601	100.7509	ug/L		94
79)	1,1,2,2-Tetrachloroethane	16.17	83	769153	108.8387	ug/L		96
81)	1,2,3-Trichloropropane	16.36	110	224094	112.8735	ug/L	#	29
82)	trans-1,4-Dichloro-2-Buten	16.40	53	175819	145.3184	ug/L	#	32
83)	n-Propylbenzene	16.46	91	5183759	92.3935	ug/L		93
84)	Bromobenzene	16.60	156	1335569	109.7181	ug/L		95
85)	1,3,5-Trimethylbenzene	16.65	105	3967760	101.5410	ug/L		94
86)	2-Chlorotoluene	16.73	91	3371801	88.0052	ug/L		79
87)	4-Chlorotoluene	16.78	91	3536460	106.8023	ug/L		95
88)	a-Methylstyrene	17.05	118	2324630	114.4381	ug/L		99
89)	tert-Butylbenzene	17.12	134	920850	109.7387	ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	4138155	104.6152	ug/L		93
91)	sec-Butylbenzene	17.38	105	4819621	95.4354	ug/L		95
92)	p-Isopropyltoluene	17.54	119	4194755	101.5359	ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	2515568	104.3629	ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	2479841	99.2322	ug/L		99
95)	n-Butylbenzene	18.07	91	3805421	103.0498	ug/L		95
96)	1,2-Dichlorobenzene	18.37	146	2228398	105.4250	ug/L		100
97)	1,2-Dibromo-3-Chloropropan	19.36	75	126624	112.0824	ug/L		88
98)	1,2,4-Trichlorobenzene	20.50	180	1566801	114.3776	ug/L		99
99)	Hexachlorobutadiene	20.65	225	698852	108.1043	ug/L		98
100)	Naphthalene	20.87	128	2244301	112.5737	ug/L		99
101)	1,2,3-Trichlorobenzene	21.18	180	1297908	112.6794	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	916133	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.81	117	758457	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	404542	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	985298	106.6012	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 426.40%#			
43) 1,2-Dichloroethane-d4	10.54	65	821015	101.7034	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 406.80%#			
58) Toluene-d8	12.91	98	3407259	98.6394	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 394.56%#			
80) p-Bromofluorobenzene	16.30	95	1421252	100.8919	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 403.56%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2732295	236.1042	ug/L	97
3) Chloromethane	3.82	50	2983027	186.0300	ug/L	100
4) Vinyl Chloride	4.05	62	2540371	165.6278	ug/L	99
5) 1,3-Butadiene	4.10	54	866990	87.4234	ug/L	96
6) Bromomethane	4.97	94	1545771	509.8527	ug/L	99
7) Chloroethane	5.13	64	1366615	218.8661	ug/L	97
8) Trichlorofluoromethane	5.62	101	3365549	214.7442	ug/L	99
10) Isoprene	6.19	67	2589463	220.5797	ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1913316	215.5364	ug/L	97
13) Acetone	6.49	43	249206	196.9637	ug/L	95
14) 1,1-Dichloroethene	6.71	61	2810695	217.1259	ug/L	98
16) Dimethyl Sulfide	6.98	62	1824420	217.4058	ug/L	89
17) Iodomethane	7.23	142	1201977	701.8503	ug/L	96
18) Methyl acetate	7.23	43	677953	194.9022	ug/L	93
19) Methylene Chloride	7.49	84	1990660	211.3402	ug/L	86
20) Carbon Disulfide	7.54	76	5610478	203.2424	ug/L	97
21) Acrylonitrile	7.70	53	33650	19.8015	ug/L #	32
22) Methyl Tert Butyl Ether	7.70	73	3788672	206.7038	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	2733215	215.5987	ug/L	96
24) n-Hexane	8.02	57	2197012	207.1230	ug/L	92
26) Vinyl Acetate	8.53	43	2553826	198.1912	ug/L	96
27) 1,1-Dichloroethane	8.57	63	3486757	214.6369	ug/L	98
29) 2-Butanone	9.12	43	389130	202.2654	ug/L	91
31) 2,2-Dichloropropane	9.34	77	2923670	212.2692	ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	2276453	219.0916	ug/L	96
33) Chloroform	9.61	83	3453780	181.8658	ug/L	95
34) 1-Bromopropane	9.75	122	446868	220.9203	ug/L	100
35) Bromochloromethane	9.85	130	1233768	224.1736	ug/L	95
36) Tetrahydrofuran	9.88	42	870	0.6372	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	3296755	231.5603	ug/L	98
39) Cyclohexane	10.17	56	2952221	221.0060	ug/L	91
40) 1,1-Dichloropropene	10.33	75	2719959	212.8482	ug/L	96
42) Carbon Tetrachloride	10.49	117	3008633	228.9911	ug/L	99
45) 1,2-Dichloroethane	10.66	62	2188642	217.0011	ug/L	96
46) Benzene	10.70	78	7143494	187.4691	ug/L	88
47) Trichloroethene	11.44	130	2308292	222.7182	ug/L	98
48) Methylcyclohexane	11.53	83	2934528	216.4182	ug/L	94
49) 1,2-Dichloropropane	11.66	63	1973272	219.1188	ug/L	96
50) Bromodichloromethane	11.96	83	2645509	229.4144	ug/L	96
51) 1,4-Dioxane	11.95	88	4065	85.0857	ug/L #	36

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

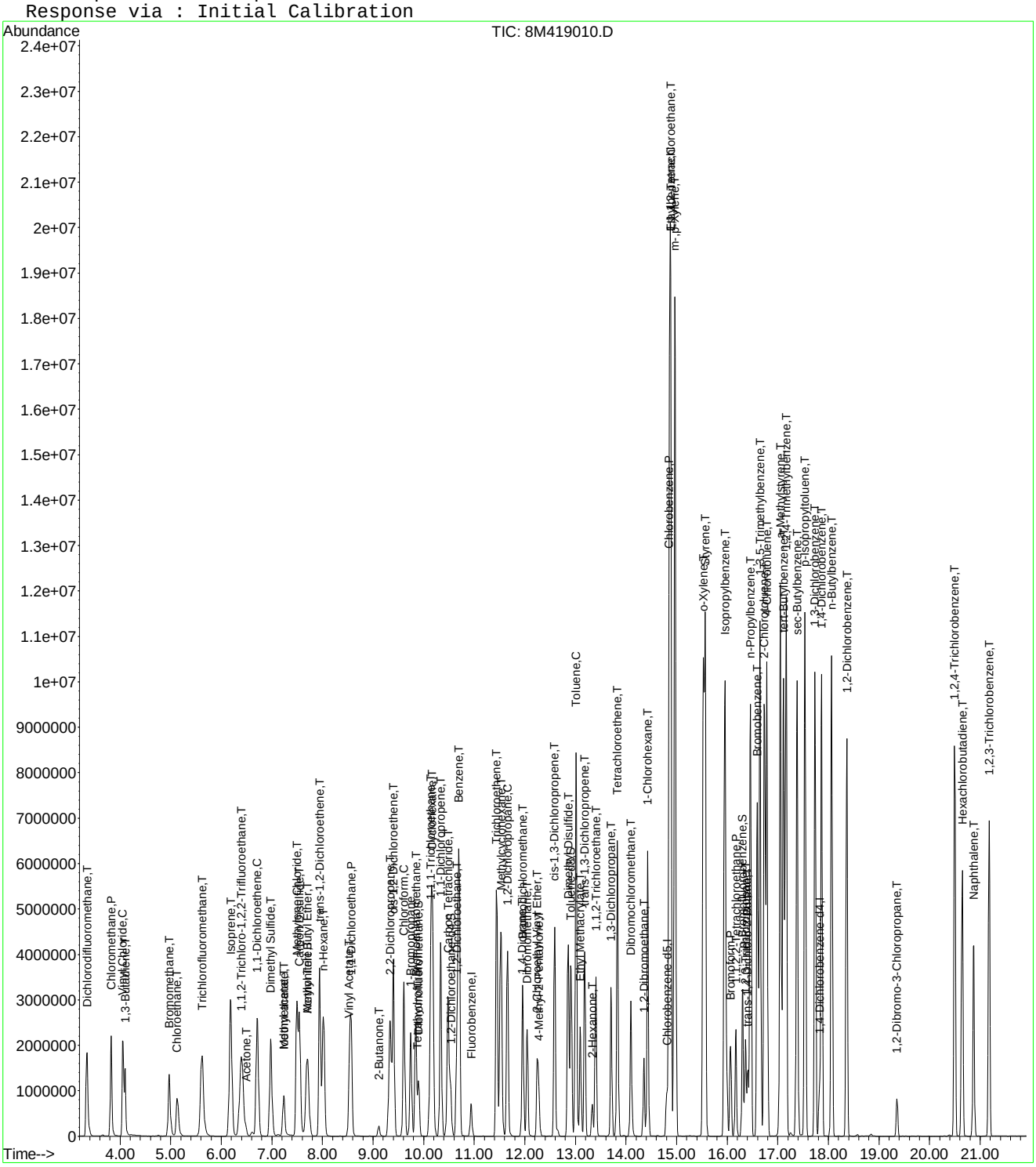
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
52)	Dibromomethane	12.05	93	1024578	224.7172	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	831891	228.3430	ug/L		98
54)	4-Methyl-2-Pentanone	12.28	58	360147	224.8683	ug/L		100
55)	cis-1,3-Dichloropropene	12.59	75	3048770	234.9149	ug/L		98
56)	Dimethyl Disulfide	12.86	79	1659189	299.5317	ug/L		99
59)	Toluene	13.01	91	7488758	174.9415	ug/L		89
60)	Ethyl Methacrylate	13.09	69	1679080	234.4692	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	2568979	220.0883	ug/L		97
63)	1,1,2-Trichloroethane	13.40	97	1396211	202.6709	ug/L		97
64)	2-Hexanone	13.33	58	330423	215.3823	ug/L		88
65)	1,3-Dichloropropane	13.70	76	2325588	200.4119	ug/L		86
66)	Tetrachloroethene	13.83	164	1990187	233.7864	ug/L		97
67)	Dibromochloromethane	14.10	129	1990057	238.6162	ug/L		99
68)	1,2-Dibromoethane	14.36	107	1415902	216.2402	ug/L		99
69)	1-Chlorohexane	14.43	91	2828351	220.2957	ug/L		92
70)	Chlorobenzene	14.85	112	6105996	205.8377	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.88	131	2810140	280.1772	ug/L		99
72)	Ethylbenzene	14.88	106	4032119	256.9908	ug/L		59
73)	m-,p-Xylene	14.96	106	7563563	396.2554	ug/L		66
74)	o-Xylene	15.53	106	4264660	225.7677	ug/L		79
75)	Styrene	15.56	104	6476388	223.2255	ug/L		92
76)	Bromoform	16.07	173	1258352	267.1087	ug/L		99
77)	Isopropylbenzene	15.96	105	8256603	173.9393	ug/L		81
79)	1,1,2,2-Tetrachloroethane	16.17	83	1527344	204.6644	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	447781	213.5809	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.40	53	367713	287.8052	ug/L	#	26
83)	n-Propylbenzene	16.46	91	8822276	148.9059	ug/L	#	76
84)	Bromobenzene	16.60	156	2898738	225.5047	ug/L		92
85)	1,3,5-Trimethylbenzene	16.65	105	7463417	180.8708	ug/L		82
86)	2-Chlorotoluene	16.73	91	7153343	176.8033	ug/L		79
87)	4-Chlorotoluene	16.78	91	5772378	165.0827	ug/L		82
88)	a-Methylstyrene	17.05	118	4847570	225.9830	ug/L		96
89)	tert-Butylbenzene	17.11	134	2112689	238.4192	ug/L		79
90)	1,2,4-Trimethylbenzene	17.17	105	7584285	181.5672	ug/L		77
91)	sec-Butylbenzene	17.38	105	8521003	159.7799	ug/L	#	81
92)	p-Isopropyltoluene	17.54	119	7724336	177.0554	ug/L		84
93)	1,3-Dichlorobenzene	17.73	146	5116611	201.0146	ug/L		93
94)	1,4-Dichlorobenzene	17.87	146	5000020	189.4678	ug/L		93
95)	n-Butylbenzene	18.07	91	7068933	181.2731	ug/L		85
96)	1,2-Dichlorobenzene	18.37	146	4516876	202.3597	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.36	75	250305	209.8099	ug/L		86
98)	1,2,4-Trichlorobenzene	20.49	180	3378961	233.5852	ug/L		99
99)	Hexachlorobutadiene	20.65	225	1595889	233.7735	ug/L		98
100)	Naphthalene	20.88	128	4334998	205.9111	ug/L		96
101)	1,2,3-Trichlorobenzene	21.18	180	2739944	225.2564	ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	930696	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	749881	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	397655	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	1524398	162.3468	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 649.40%#			
43) 1,2-Dichloroethane-d4	10.53	65	1314412	160.2752	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 641.12%#			
58) Toluene-d8	12.91	98	5112365	149.6945	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 598.76%#			
80) p-Bromofluorobenzene	16.30	95	2230349	161.0701	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 644.28%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	5624	0.4784	ug/L	87
3) Chloromethane	3.81	50	108738	6.6751	ug/L	99
4) Vinyl Chloride	4.05	62	3886	0.2494	ug/L	93
5) 1,3-Butadiene	4.09	54	1246692	123.7438	ug/L	96
6) Bromomethane	4.96	94	300170	97.4580	ug/L	98
8) Trichlorofluoromethane	5.60	101	2530	0.1589	ug/L #	94
9) Diethyl ether	6.14	59	1962473	329.3380	ug/L	92
10) Isoprene	6.18	67	4088373	342.8128	ug/L	88
11) Acrolein	6.39	56	131510	159.5714	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	3091	0.3428	ug/L	94
13) Acetone	6.48	43	393174	305.8885	ug/L	96
14) 1,1-Dichloroethene	6.70	61	3035	0.2308	ug/L	80
15) Tert-Butyl Alcohol	6.83	59	293536	728.0013	ug/L	97
16) Dimethyl Sulfide	6.98	62	2844355	333.6421	ug/L	89
17) Iodomethane	7.23	142	1295425	744.5798	ug/L	95
18) Methyl acetate	7.24	43	1115371	315.6365	ug/L	92
19) Methylene Chloride	7.49	84	3692	0.3858	ug/L	89
20) Carbon Disulfide	7.55	76	7967065	284.0949	ug/L	95
21) Acrylonitrile	7.67	53	273516	158.4334	ug/L	95
22) Methyl Tert Butyl Ether	7.71	73	3414	0.1833	ug/L #	1
23) trans-1,2-Dichloroethene	7.94	61	6140	0.4768	ug/L	75
24) n-Hexane	8.01	57	3358910	311.7059	ug/L	91
25) Diisopropyl ether	8.35	45	8576863	291.0356	ug/L	97
26) Vinyl Acetate	8.53	43	3848978	294.0283	ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	7584668	307.2506	ug/L	97
29) 2-Butanone	9.11	43	656445	335.8737	ug/L	92
30) Propionitrile	9.22	54	211846	346.5277	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	2415	0.2288	ug/L	92
33) Chloroform	9.60	83	4216	0.2185	ug/L	95
34) 1-Bromopropane	9.75	122	686822	334.2345	ug/L	99
35) Bromochloromethane	9.85	130	960	0.1717	ug/L #	25
36) Tetrahydrofuran	9.86	42	436518	314.6999	ug/L	87
39) Cyclohexane	10.17	56	4365494	321.6913	ug/L	90
40) 1,1-Dichloropropene	10.34	75	4278	0.3295	ug/L	77
41) Tert-Amyl-Methyl ether	10.44	73	6796184	308.9868	ug/L	95
42) Carbon Tetrachloride	10.47	117	1728	0.1295	ug/L #	76
45) 1,2-Dichloroethane	10.66	62	2027	0.1978	ug/L #	62
46) Benzene	10.70	78	6536	0.1688	ug/L	90
47) Trichloroethene	11.44	130	3270	0.3106	ug/L	87
48) Methylcyclohexane	11.52	83	4485299	325.6100	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

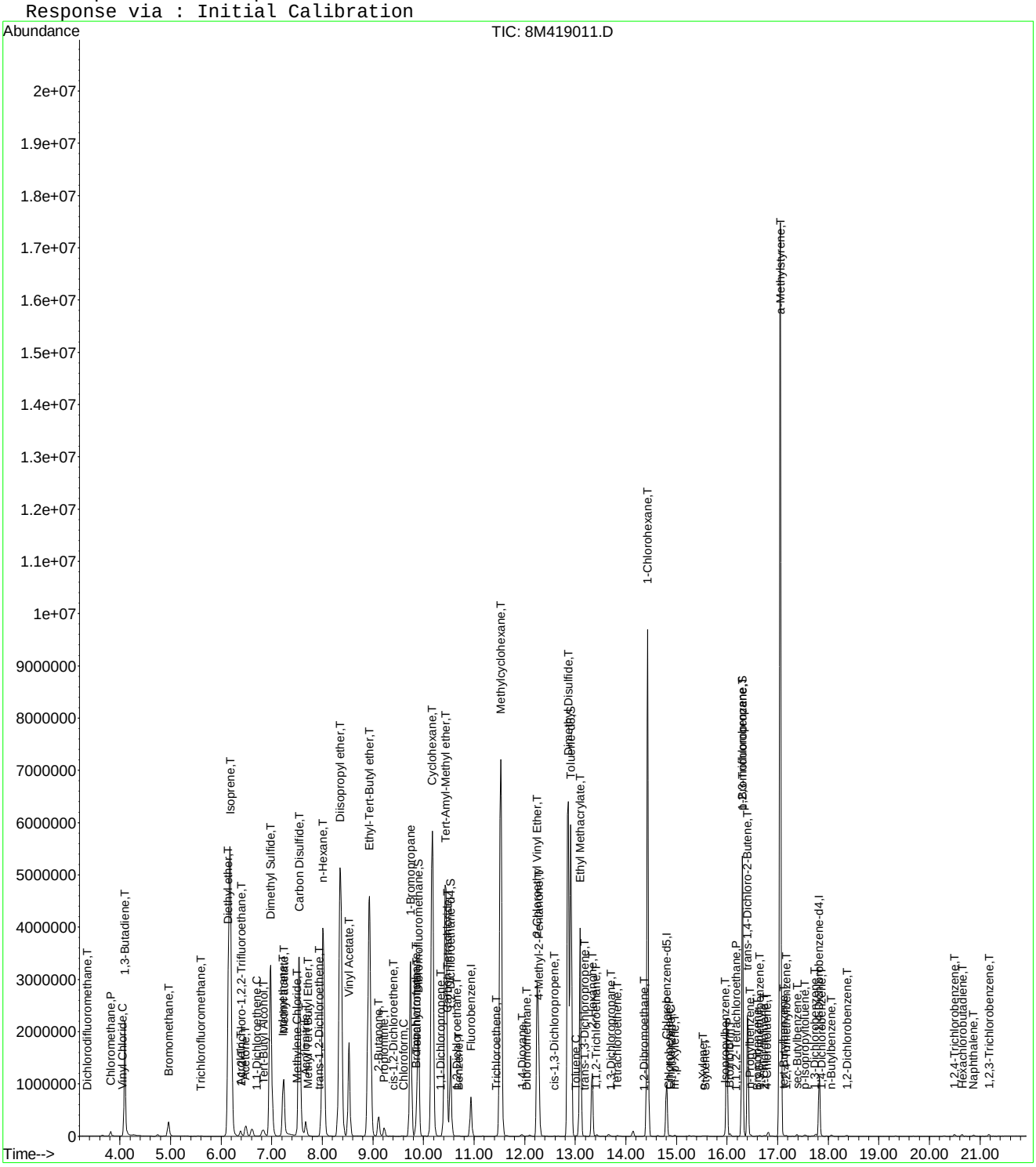
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

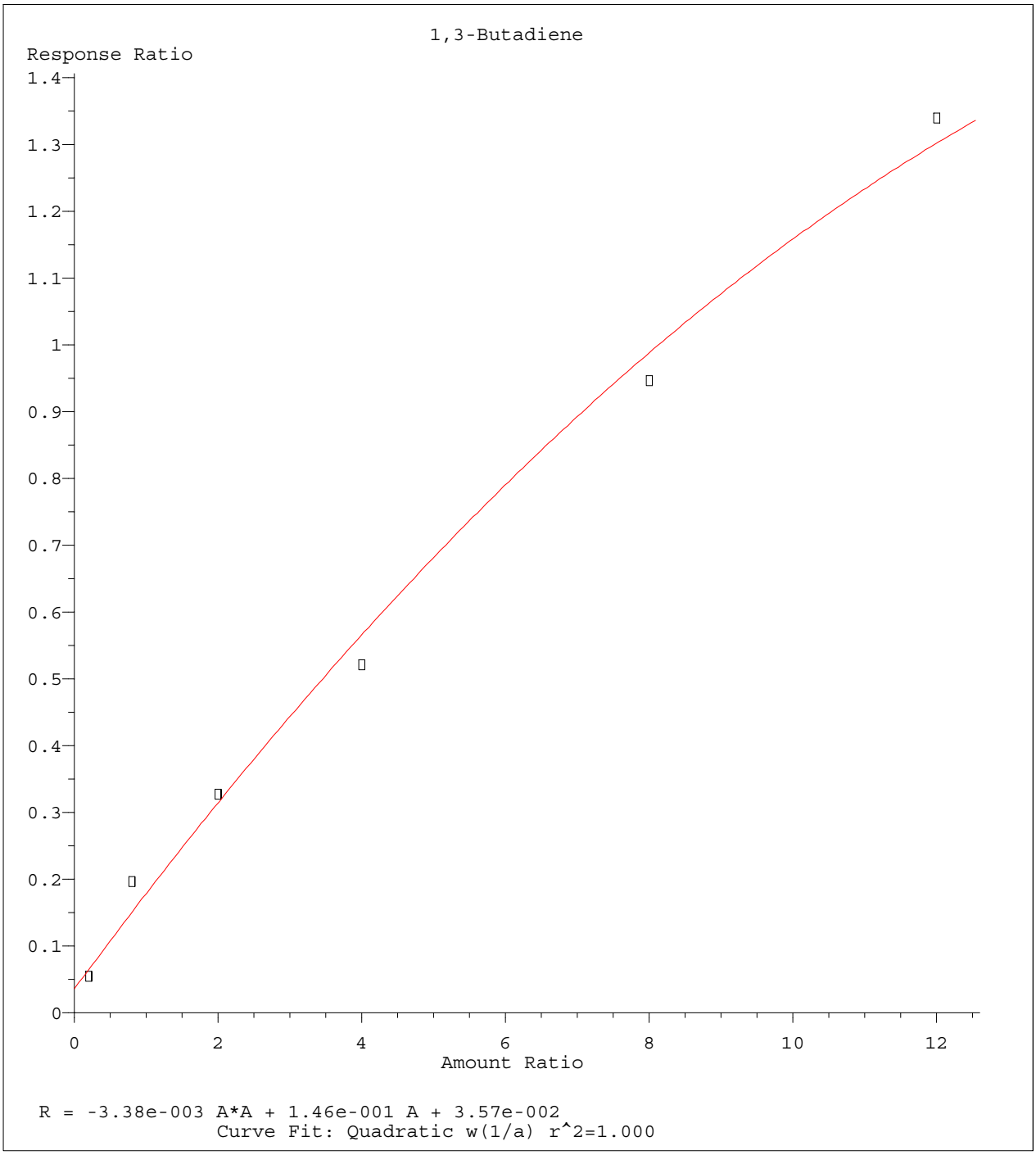
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
51)	1,4-Dioxane	11.95	88	33659	693.5026	ug/L		89
52)	Dibromomethane	12.04	93	1293	0.2792	ug/L		96
53)	2-Chloroethyl Vinyl Ether	12.25	63	1364979	368.8059	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	616547	378.9355	ug/L		99
55)	cis-1,3-Dichloropropene	12.59	75	2930	0.2222	ug/L		90
56)	Dimethyl Disulfide	12.86	79	2642662	469.6121	ug/L		97
59)	Toluene	13.01	91	8813	0.2082	ug/L		96
60)	Ethyl Methacrylate	13.10	69	2723549	384.6698	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	4235	0.3670	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	876	0.1286	ug/L		98
64)	2-Hexanone	13.33	58	568157	374.5818	ug/L		90
65)	1,3-Dichloropropane	13.71	76	2049	0.1786	ug/L	#	1
66)	Tetrachloroethene	13.83	164	2941	0.3494	ug/L		93
68)	1,2-Dibromoethane	14.36	107	1642	0.2536	ug/L		90
69)	1-Chlorohexane	14.43	91	4247410	334.6073	ug/L		90
70)	Chlorobenzene	14.85	112	7000	0.2387	ug/L		82
72)	Ethylbenzene	14.88	106	3495	0.2253	ug/L		86
73)	m-,p-Xylene	14.97	106	8767	0.4646	ug/L		94
74)	o-Xylene	15.52	106	3350	0.1794	ug/L		99
75)	Styrene	15.57	104	6628	0.2311	ug/L		93
76)	Bromoform	16.05	173	997	0.2141	ug/L	#	27
77)	Isopropylbenzene	15.96	105	32558	0.6937	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.18	83	1079	0.1471	ug/L	#	70
81)	1,2,3-Trichloropropane	16.30	110	745	0.3615	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.40	53	554896	441.8333	ug/L	#	1
83)	n-Propylbenzene	16.45	91	27737	0.4763	ug/L		84
84)	Bromobenzene	16.60	156	3516	0.2783	ug/L		92
85)	1,3,5-Trimethylbenzene	16.64	105	13389	0.3301	ug/L		97
86)	2-Chlorotoluene	16.73	91	9839	0.2474	ug/L		98
87)	4-Chlorotoluene	16.79	91	11812	0.3437	ug/L		97
88)	a-Methylstyrene	17.05	118	6686703	317.1180	ug/L		90
89)	tert-Butylbenzene	17.12	134	5062	0.5811	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.17	105	13828	0.3368	ug/L		90
91)	sec-Butylbenzene	17.38	105	38994	0.7439	ug/L		98
92)	p-Isopropyltoluene	17.54	119	20259	0.4724	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	10177	0.4067	ug/L		99
94)	1,4-Dichlorobenzene	17.87	146	11796	0.4547	ug/L		86
95)	n-Butylbenzene	18.06	91	22615	0.5900	ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	7307	0.3330	ug/L		97
98)	1,2,4-Trichlorobenzene	20.50	180	15569	1.0949	ug/L		99
99)	Hexachlorobutadiene	20.65	225	10959	1.6331	ug/L		96
100)	Naphthalene	20.87	128	27819	1.3443	ug/L		97
101)	1,2,3-Trichlorobenzene	21.18	180	15009	1.2553	ug/L		94

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:17 2017 Page 2

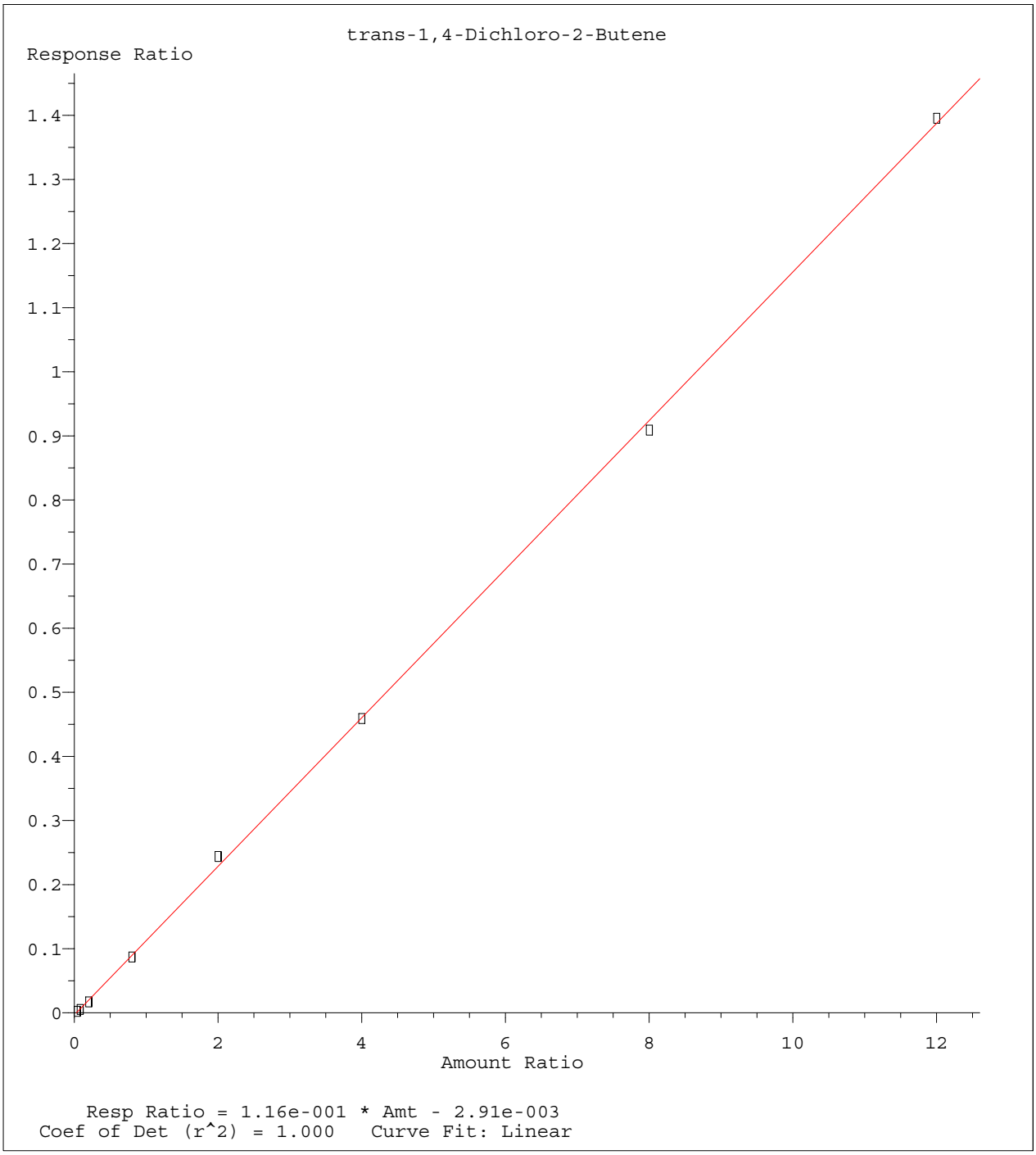
Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

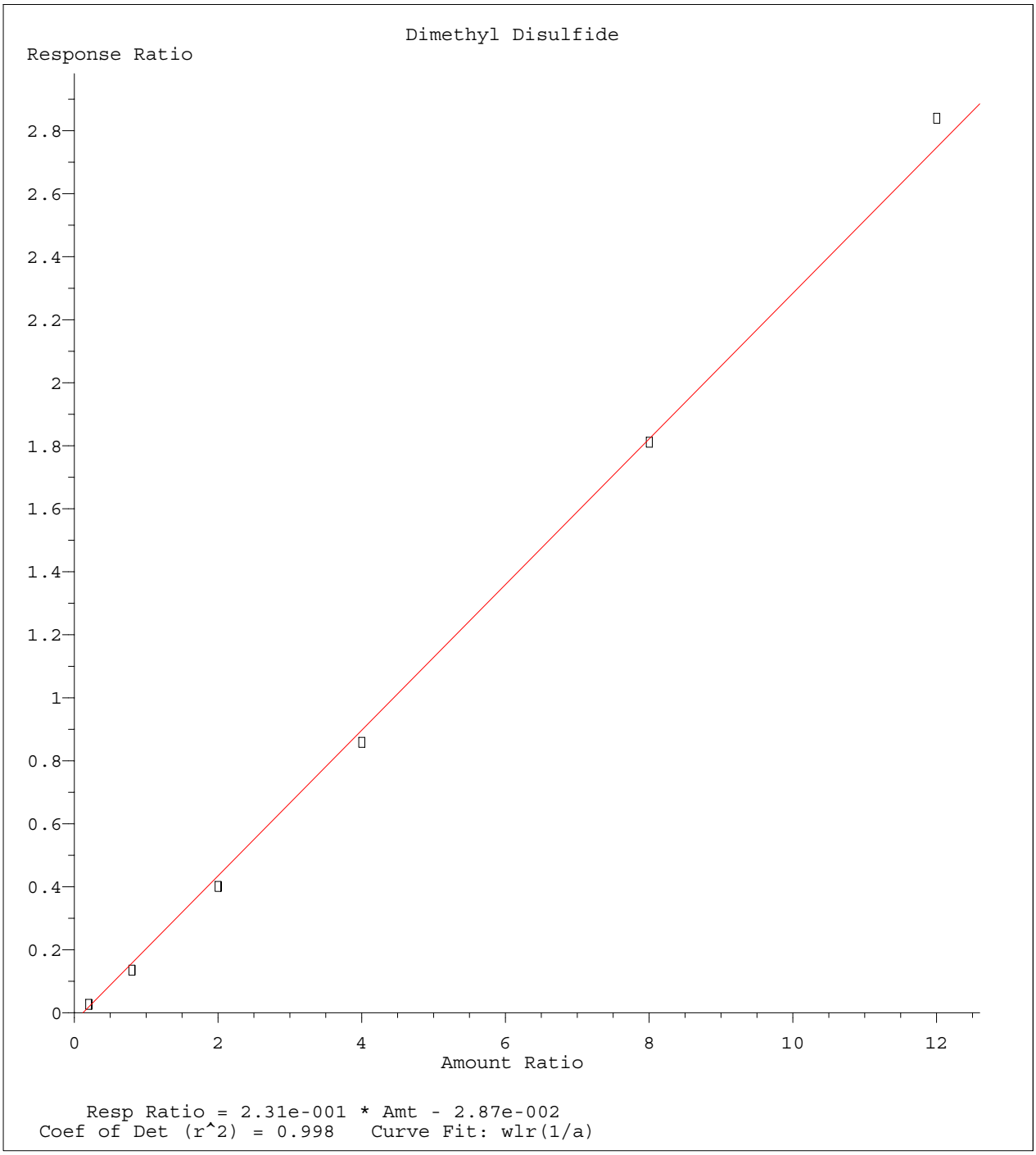




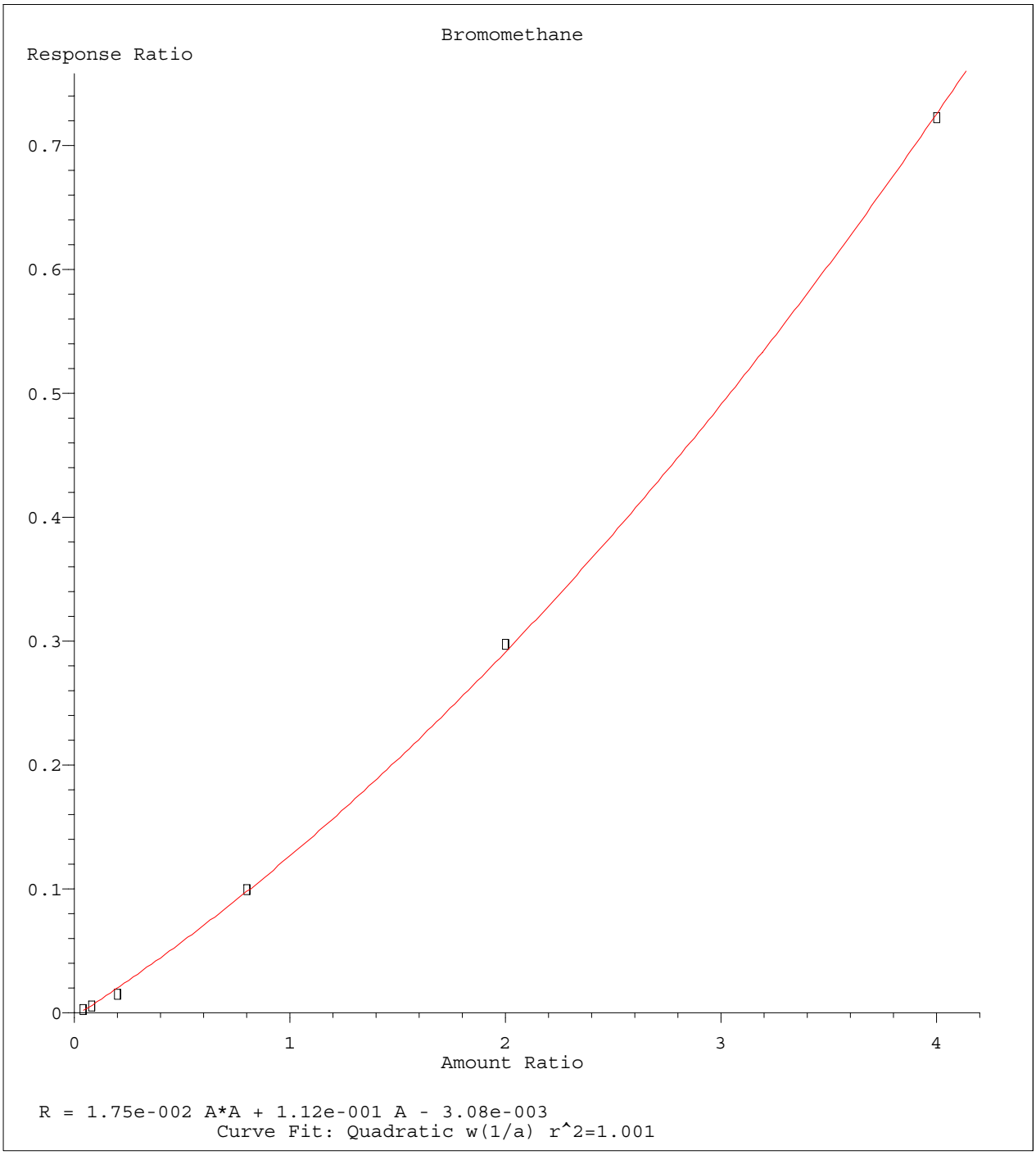
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



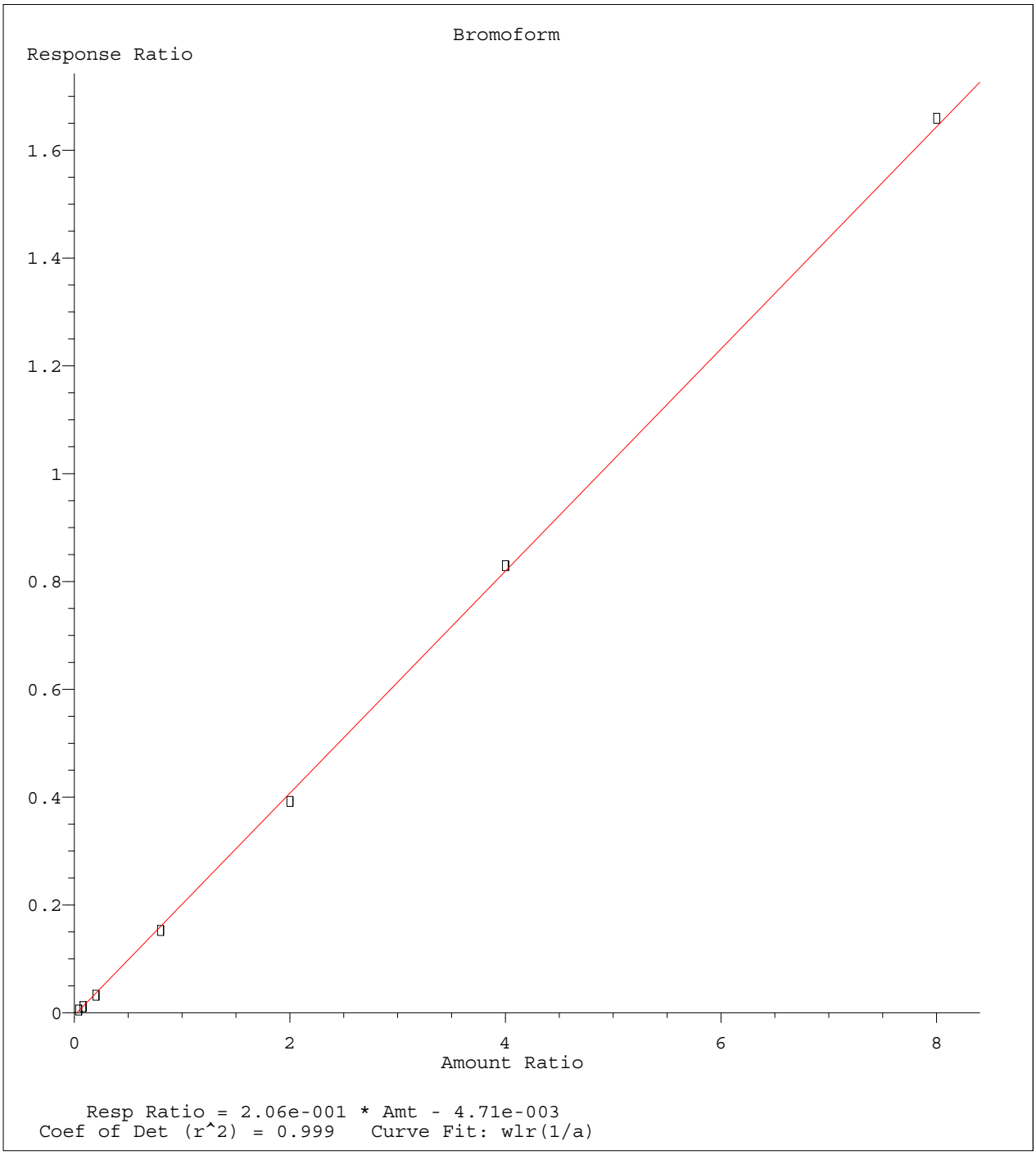
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	876345	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	707189	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	383750	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	227423	24.7419	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.96%			
43) 1,2-Dichloroethane-d4	10.53	65	193344	24.3311	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.32%			
58) Toluene-d8	12.91	98	800923	24.7866	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.16%			
80) p-Bromofluorobenzene	16.30	95	322047	23.7784	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.12%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	667667	56.2976	ug/L	100
3) Chloromethane	3.82	50	720887	48.6211	ug/L	98
4) Vinyl Chloride	4.05	62	635481	45.3850	ug/L	98
5) 1,3-Butadiene	4.10	54	359379	68.4146	ug/L	96
6) Bromomethane	4.96	94	215525	43.6302	ug/L	99
7) Chloroethane	5.13	64	324474	53.0523	ug/L	96
8) Trichlorofluoromethane	5.61	101	738420	48.5549	ug/L	99
9) Diethyl ether	6.14	59	498151	86.9727	ug/L	91
10) Isoprene	6.18	67	610998	50.8138	ug/L	89
11) Acrolein	6.39	56	80484	101.4634	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	445386	51.3586	ug/L	97
13) Acetone	6.49	43	53217	43.1773	ug/L	96
14) 1,1-Dichloroethene	6.71	61	596314	46.9846	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	66729	167.0197	ug/L	97
16) Dimethyl Sulfide	6.98	62	449123	53.1278	ug/L	91
17) Iodomethane	7.24	142	397109	104.7342	ug/L	90
18) Methyl acetate	7.24	43	145496	43.1089	ug/L	93
19) Methylene Chloride	7.50	84	425943	46.7005	ug/L	84
20) Carbon Disulfide	7.55	76	1144667	43.3766	ug/L	100
21) Acrylonitrile	7.67	53	78412	45.8636	ug/L	99
22) Methyl Tert Butyl Ether	7.70	73	827526	46.0483	ug/L	94
23) trans-1,2-Dichloroethene	7.94	61	583968	47.2932	ug/L	96
24) n-Hexane	8.02	57	502871	48.7894	ug/L	93
25) Diisopropyl ether	8.35	45	2651186	95.9237	ug/L	96
26) Vinyl Acetate	8.53	43	616012	49.6945	ug/L	96
27) 1,1-Dichloroethane	8.56	63	756542	47.6058	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2118923	90.1483	ug/L	98
29) 2-Butanone	9.12	43	83993	43.4556	ug/L	91
30) Propionitrile	9.22	54	56456	94.2403	ug/L	99
31) 2,2-Dichloropropane	9.34	77	626218	46.6788	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	489725	47.9836	ug/L	96
33) Chloroform	9.61	83	787042	44.6971	ug/L	97
34) 1-Bromopropane	9.75	122	124602	61.8875	ug/L	100
35) Bromochloromethane	9.84	130	272025	49.3934	ug/L	95
36) Tetrahydrofuran	9.86	42	114805	86.2858	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	721765	50.7918	ug/L	100
39) Cyclohexane	10.17	56	587817	44.4298	ug/L	91
40) 1,1-Dichloropropene	10.34	75	586359	47.2590	ug/L	97
41) Tert-Amyl-Methyl ether	10.44	73	1981831	94.1604	ug/L	98
42) Carbon Tetrachloride	10.48	117	660929	50.1611	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

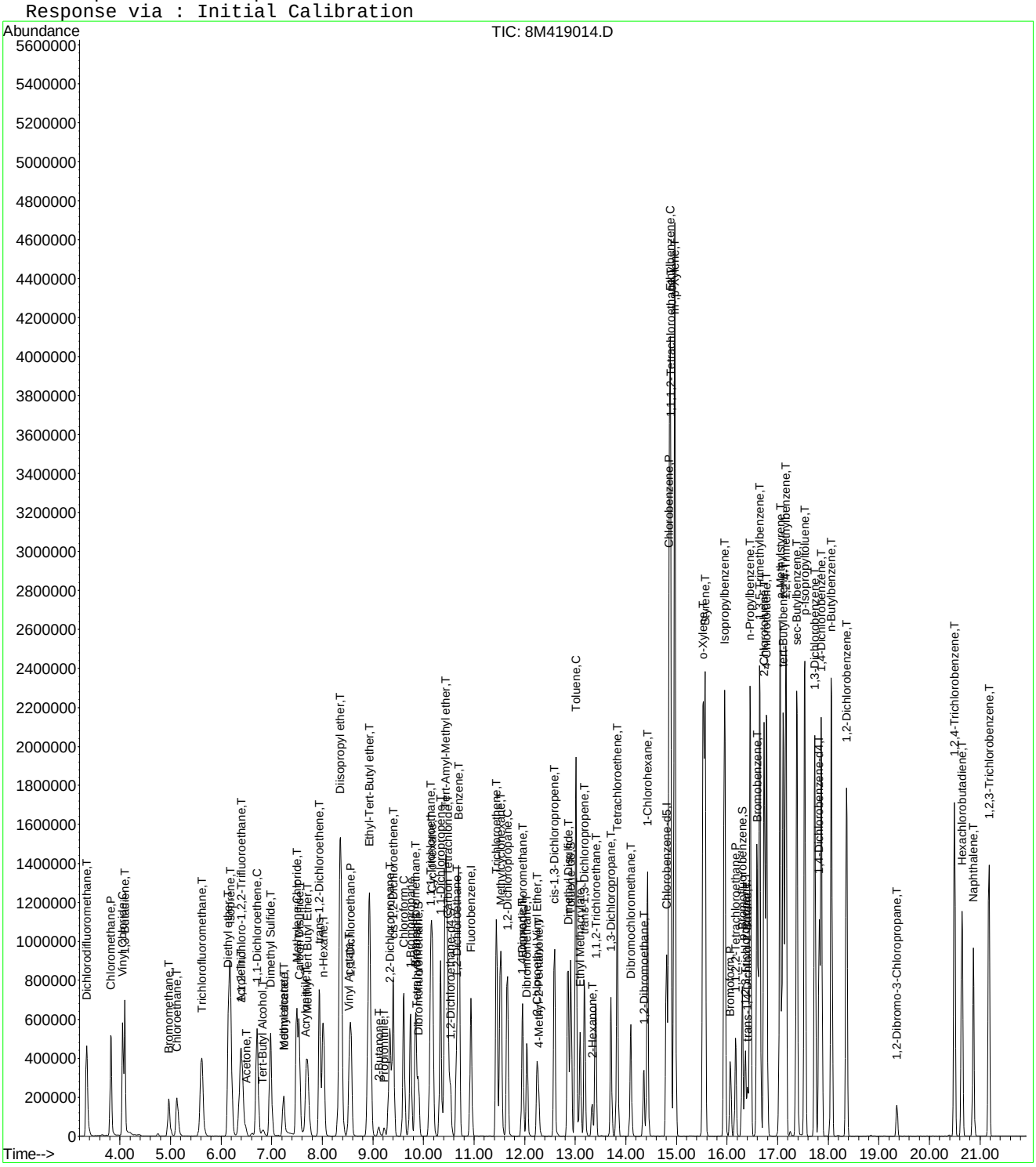
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	470242	47.2276	ug/L	97
46)	Benzene	10.70	78	1721941	47.5631	ug/L	95
47)	Trichloroethene	11.44	130	483157	47.5077	ug/L	97
48)	Methylcyclohexane	11.53	83	636402	46.9430	ug/L	95
49)	1,2-Dichloropropane	11.66	63	418165	47.2917	ug/L	95
50)	Bromodichloromethane	11.96	83	555676	48.0208	ug/L	98
51)	1,4-Dioxane	11.95	88	8508	168.7628	ug/L	89
52)	Dibromomethane	12.04	93	215781	47.4196	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.25	63	183970	48.0854	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	77823	45.4120	ug/L	99
55)	cis-1,3-Dichloropropene	12.59	75	666388	50.5672	ug/L	100
56)	Dimethyl Disulfide	12.86	79	345797	45.7592	ug/L	95
59)	Toluene	13.01	91	1910652	48.5373	ug/L	100
60)	Ethyl Methacrylate	13.10	69	388584	52.3228	ug/L	88
62)	trans-1,3-Dichloropropene	13.18	75	531560	46.5624	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	293466	45.3132	ug/L	96
64)	2-Hexanone	13.34	58	76776	48.3051	ug/L	91
65)	1,3-Dichloropropane	13.71	76	516864	47.2090	ug/L	88
66)	Tetrachloroethene	13.83	164	418500	50.6128	ug/L	97
67)	Dibromochloromethane	14.10	129	402089	48.3146	ug/L	99
68)	1,2-Dibromoethane	14.36	107	298114	47.1242	ug/L	99
69)	1-Chlorohexane	14.43	91	648721	52.0883	ug/L	94
70)	Chlorobenzene	14.85	112	1321464	47.1602	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.89	131	500071	50.2889	ug/L	99
72)	Ethylbenzene	14.87	106	767808	48.9244	ug/L	99
73)	m-,p-Xylene	14.97	106	1848951	101.7331	ug/L	100
74)	o-Xylene	15.53	106	879490	48.1326	ug/L	100
75)	Styrene	15.57	104	1509115	52.6805	ug/L	96
76)	Bromoform	16.06	173	246815	42.9243	ug/L	99
77)	Isopropylbenzene	15.95	105	2164038	49.4628	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	331079	45.7235	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	97508	46.9716	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.40	53	63669	36.4332	ug/L	93
83)	n-Propylbenzene	16.46	91	2539452	47.2799	ug/L	97
84)	Bromobenzene	16.60	156	605699	48.1294	ug/L	96
85)	1,3,5-Trimethylbenzene	16.64	105	1903333	48.9404	ug/L	97
86)	2-Chlorotoluene	16.74	91	1618818	44.1478	ug/L	92
87)	4-Chlorotoluene	16.78	91	1639005	49.5992	ug/L	98
88)	a-Methylstyrene	17.06	118	1156988	53.0644	ug/L	97
89)	tert-Butylbenzene	17.11	134	423431	48.0884	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1982610	49.9352	ug/L	96
91)	sec-Butylbenzene	17.38	105	2331979	47.8741	ug/L	99
92)	p-Isopropyltoluene	17.54	119	2050846	50.0005	ug/L	100
93)	1,3-Dichlorobenzene	17.74	146	1155418	47.3665	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	1144693	46.1575	ug/L	99
95)	n-Butylbenzene	18.06	91	1844076	49.9102	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	1012196	47.2353	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	51865	44.0112	ug/L	90
98)	1,2,4-Trichlorobenzene	20.50	180	707379	49.0312	ug/L	100
99)	Hexachlorobutadiene	20.64	225	326033	48.5641	ug/L	99
100)	Naphthalene	20.87	128	990859	48.0605	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583838	48.7315	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	56.2976	-12.6	109	0.00
3	P	Chloromethane	50.0000	48.6212	2.8	108	0.00
4	C	Vinyl Chloride	50.0000	45.3850	9.2	98	0.00
5	T	1,3-Butadiene	50.0000	68.4146	-36.8#	132	0.00
6	T	Bromomethane	50.0000	43.6302	12.7	87	0.00
7	T	Chloroethane	50.0000	53.0523	-6.1	110	0.00
8	T	Trichlorofluoromethane	50.0000	48.5549	2.9	102	0.01
9	T	Diethyl ether	100.0000	86.9727	13.0	94	0.00
10	T	Isoprene	50.0000	50.8138	-1.6	106	0.00
11	T	Acrolein	50.0000	101.4634	-102.9#	219	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.3586	-2.7	107	0.00
13	T	Acetone	50.0000	43.1773	13.6	90	0.01
14	C	1,1-Dichloroethene	50.0000	46.9845	6.0	97	0.01
15	T	Tert-Butyl Alcohol	200.0000	167.0197	16.5	88	0.00
16	T	Dimethyl Sulfide	50.0000	53.1278	-6.3	113	0.00
17	T	Iodomethane	50.0000	104.7342	-109.5#	197	0.01
18	T	Methyl acetate	50.0000	43.1089	13.8	90	0.00
19	T	Methylene Chloride	50.0000	46.7005	6.6	100	0.00
20	T	Carbon Disulfide	50.0000	43.3766	13.2	90	0.00
21	T	Acrylonitrile	50.0000	45.8636	8.3	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.0483	7.9	94	0.00
23	T	trans-1,2-Dichloroethene	50.0000	47.2932	5.4	100	0.00
24	T	n-Hexane	50.0000	48.7894	2.4	104	0.01
25	T	Diisopropyl ether	100.0000	95.9237	4.1	102	0.00
26	T	Vinyl Acetate	50.0000	49.6946	0.6	103	0.00
27	P	1,1-Dichloroethane	50.0000	47.6058	4.8	99	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	90.1483	9.9	95	0.00
29	T	2-Butanone	50.0000	43.4556	13.1	90	0.01
30	T	Propionitrile	100.0000	94.2404	5.8	99	0.00
31	T	2,2-Dichloropropane	50.0000	46.6788	6.6	97	0.00
32	T	cis-1,2-Dichloroethene	50.0000	47.9836	4.0	99	0.00
33	C	Chloroform	50.0000	44.6971	10.6	101	0.01
34		1-Bromopropane	50.0000	61.8875	-23.8	132	0.00
35	T	Bromochloromethane	50.0000	49.3934	1.2	98	0.00
36	T	Tetrahydrofuran	100.0000	86.2858	13.7	91	0.00
37	S	Dibromofluoromethane	25.0000	24.7419	1.0	101	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.7918	-1.6	103	0.00
39	T	Cyclohexane	50.0000	44.4298	11.1	93	0.00
40	T	1,1-Dichloropropene	50.0000	47.2591	5.5	100	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.1604	5.8	99	0.00
42	T	Carbon Tetrachloride	50.0000	50.1611	-0.3	101	0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.3311	2.7	98	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	47.2276	5.5	97	0.00
46	T	Benzene	50.0000	47.5631	4.9	99	0.00
47	T	Trichloroethene	50.0000	47.5078	5.0	100	0.00
48	T	Methylcyclohexane	50.0000	46.9430	6.1	99	0.00
49	C	1,2-Dichloropropane	50.0000	47.2917	5.4	98	0.01
50	T	Bromodichloromethane	50.0000	48.0208	4.0	96	0.00
51	T	1,4-Dioxane	200.0000	168.7628	15.6	84	0.00
52	T	Dibromomethane	50.0000	47.4196	5.2	95	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.0854	3.8	98	0.00
54	T	4-Methyl-2-Pentanone	50.0000	45.4120	9.2	93	0.00
55	T	cis-1,3-Dichloropropene	50.0000	50.5673	-1.1	99	0.00
56	T	Dimethyl Disulfide	50.0000	45.7592	8.5	104	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	106	0.00

58	S	Toluene-d8	25.0000	24.7866	0.9	101	0.00	
59	C	Toluene	50.0000	48.5373	2.9	100	0.00	
60	T	Ethyl Methacrylate	50.0000	52.3228	-4.6	101	0.00	
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#	
62	T	trans-1,3-Dichloropropene	50.0000	46.5624	6.9	94	0.00	
63	T	1,1,2-Trichloroethane	50.0000	45.3132	9.4	96	0.00	
64	T	2-Hexanone	50.0000	48.3051	3.4	98	0.00	
65	T	1,3-Dichloropropane	50.0000	47.2090	5.6	97	0.00	
66	T	Tetrachloroethene	50.0000	50.6128	-1.2	106	0.00	
67	T	Dibromochloromethane	50.0000	48.3146	3.4	95	0.00	
68	T	1,2-Dibromoethane	50.0000	47.1242	5.8	95	0.00	
69	T	1-Chlorohexane	50.0000	52.0883	-4.2	108	0.00	
70	P	Chlorobenzene	50.0000	47.1602	5.7	100	0.00	
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.2889	-0.6	97	0.01	
72	C	Ethylbenzene	50.0000	48.9244	2.2	101	0.00	
73	T	m-,p-Xylene	100.0000	101.7331	-1.7	102	0.00	
74	T	o-Xylene	50.0000	48.1326	3.7	102	0.00	
75	T	Styrene	50.0000	52.6805	-5.4	102	0.00	
76	P	Bromoform	50.0000	42.9243	14.2	94	0.01	
77	T	Isopropylbenzene	50.0000	49.4628	1.1	101	0.00	
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	108	0.00	
79	P	1,1,2,2-Tetrachloroethane	50.0000	45.7235	8.6	94	0.00	
80	S	p-Bromofluorobenzene	25.0000	23.7784	4.9	102	0.00	
81	T	1,2,3-Trichloropropane	50.0000	46.9716	6.1	95	0.06	
82	T	trans-1,4-Dichloro-2-Butene	50.0000	36.4332	27.1#	74	0.00	
83	T	n-Propylbenzene	50.0000	47.2799	5.4	100	0.00	
84	T	Bromobenzene	50.0000	48.1294	3.7	101	0.00	
85	T	1,3,5-Trimethylbenzene	50.0000	48.9404	2.1	102	0.00	
86	T	2-Chlorotoluene	50.0000	44.1478	11.7	104	0.00	
87	T	4-Chlorotoluene	50.0000	49.5992	0.8	99	0.00	
88	T	a-Methylstyrene	50.0000	53.0644	-6.1	112	0.00	
89	T	tert-Butylbenzene	50.0000	48.0884	3.8	104	0.00	
90	T	1,2,4-Trimethylbenzene	50.0000	49.9352	0.1	102	0.00	
91	T	sec-Butylbenzene	50.0000	47.8741	4.3	101	0.00	
92	T	p-Isopropyltoluene	50.0000	50.0005	-0.0	103	0.00	
93	T	1,3-Dichlorobenzene	50.0000	47.3665	5.3	100	0.00	
94	T	1,4-Dichlorobenzene	50.0000	46.1575	7.7	101	0.00	
95	T	n-Butylbenzene	50.0000	49.9102	0.2	102	0.00	
96	T	1,2-Dichlorobenzene	50.0000	47.2353	5.5	99	0.00	
97	T	1,2-Dibromo-3-Chloropropane	50.0000	44.0112	12.0	92	0.00	
98	T	1,2,4-Trichlorobenzene	50.0000	49.0312	1.9	101	0.00	
99	T	Hexachlorobutadiene	50.0000	48.5641	2.9	104	0.00	
100	T	Naphthalene	50.0000	48.0605	3.9	97	0.00	
101	T	1,2,3-Trichlorobenzene	50.0000	48.7315	2.5	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0

8M419008.D 8260WT.M Tue Apr 18 12:35:57 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	417842	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	312089	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	162882	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	112419	24.9122	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.649%			
34) 1,2-Dichloroethane-d4	4.962	65	102044	24.1253	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.501%			
47) Toluene-d8	6.815	98	400508	25.7144	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.858%			
66) p-Bromofluorobenzene	8.786	95	138759	25.4429	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.772%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	259545	52.3019	ug/L	99
3) Chloromethane	1.221	50	207176	42.6595	ug/L	100
4) Vinyl Chloride	1.270	62	253962	47.2252	ug/L	99
5) 1,3-Butadiene	1.279	54	162630	49.2541	ug/L	97
6) Bromomethane	1.464	94	167080	41.7891	ug/L	99
7) Chloroethane	1.534	64	115747	45.3700	ug/L	100
8) Trichlorofluoromethane	1.626	101	349102	50.6092	ug/L	100
9) Diethyl ether	1.840	59	299534	90.0453	ug/L	99
10) 1,1-Dichloroethene	1.968	61	305646	47.3553	ug/L	98
11) Carbon Disulfide	1.982	76	677897	48.9363	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	201459	48.9590	ug/L	98
13) Iodomethane	2.069	142	280276	45.2267	ug/L	100
14) Acrolein	2.220	56	19100	46.4829	ug/L	98
15) Methylene Chloride	2.408	84	219105	44.7379	ug/L	95
16) Acetone	2.463	43	33632	40.0317	ug/L	97
17) trans-1,2-Dichloroethene	2.541	96	206202	46.9198	ug/L	99
18) Methyl acetate	2.576	43	107978	49.0246	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	481989	43.2150	ug/L #	1
20) 1,1-Dichloroethane	3.120	63	375383	47.5560	ug/L	100
21) Acrylonitrile	3.187	53	46295	43.2025	ug/L	98
22) Vinyl Acetate	2.619	86	39584	55.9640	ug/L #	49
23) cis-1,2-Dichloroethene	3.734	96	230110	46.2568	ug/L	98
24) 2,2-Dichloropropane	3.867	77	327982	52.4350	ug/L	98
25) Cyclohexane	3.969	56	340180	50.6685	ug/L	98
26) Bromochloromethane	3.983	130	145276	45.3257	ug/L	99
27) Chloroform	4.116	83	377351	45.8519	ug/L	100
28) Carbon Tetrachloride	4.252	117	309285	47.5245	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	335729	46.4004	ug/L	99
31) 1,1-Dichloropropene	4.507	75	271821	47.8355	ug/L	98
32) 2-Butanone	4.533	43	54356	43.3976	ug/L	100
33) Benzene	4.800	78	823883	46.2904	ug/L	99
35) 1,2-Dichloroethane	5.037	62	246812	44.5353	ug/L	99
36) Methylcyclohexane	5.425	83	348793	49.5851	ug/L	98
37) Trichloroethene	5.451	130	236372	44.2156	ug/L	98
38) Dibromomethane	5.862	93	120425	44.1771	ug/L	100
39) 1,2-Dichloropropane	5.966	63	219546	47.0376	ug/L	100
40) Bromodichloromethane	6.050	83	287011	46.0712	ug/L	100
41) 1,4-Dioxane	6.259	88	5771	248.2389	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.632	63	103937	49.0943	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	341741	48.6803	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	48356	41.6976	ug/L	98
45) trans-1,3-Dichloropropene	7.243	75	284505	47.6715	ug/L	100
48) Toluene	6.858	91	918484	46.9415	ug/L	100
49) Tetrachloroethene	7.185	166	259217	46.4479	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	163097	43.0050	ug/L	99
51) Dibromochloromethane	7.507	129	229085	44.2537	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

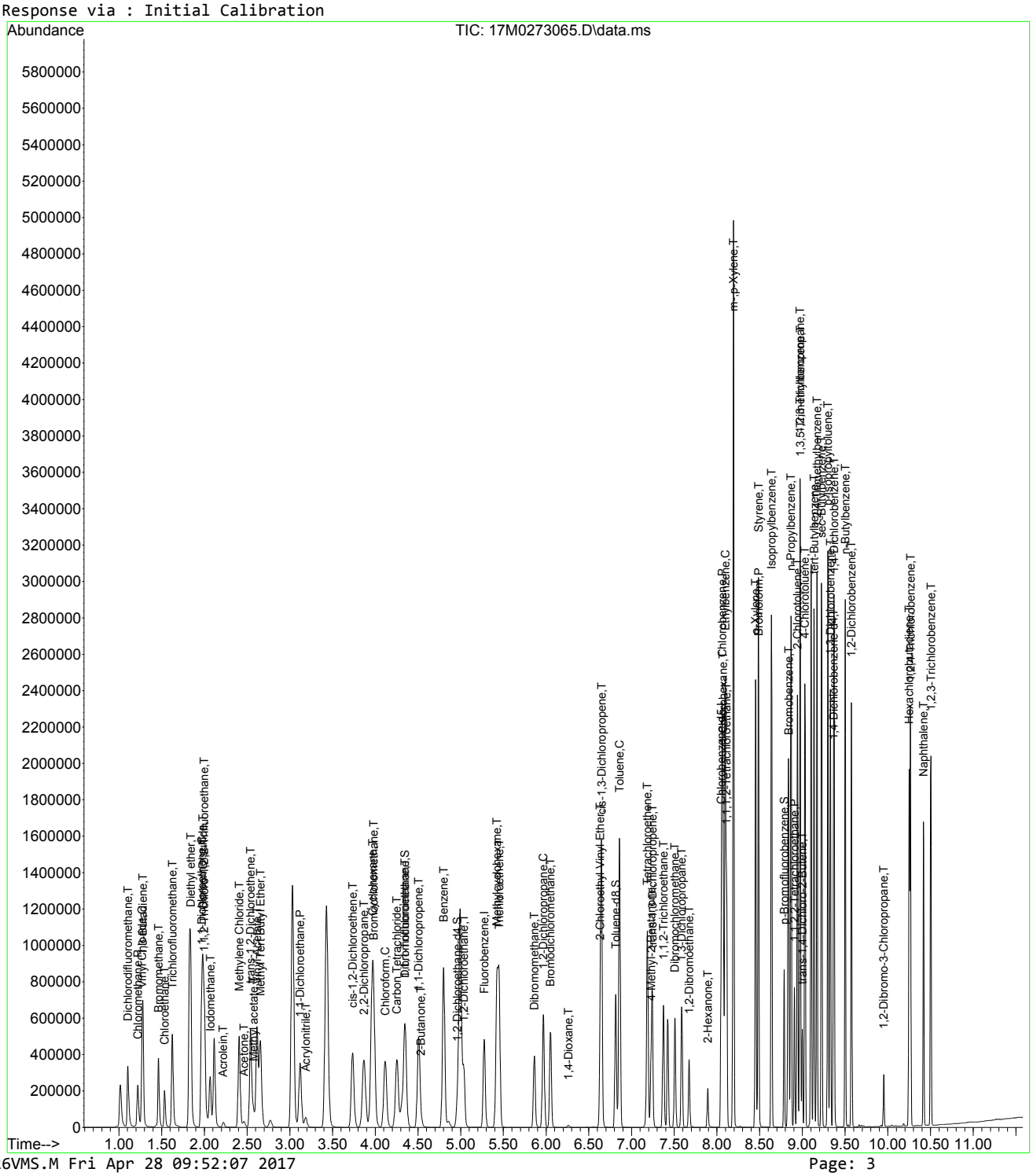
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	266828	44.2690 ug/L	98
53) 1,2-Dibromoethane	7.675	107	167154	43.0184 ug/L	99
54) 2-Hexanone	7.892	43	84907	42.6325 ug/L	98
55) Chlorobenzene	8.060	112	602735	45.9099 ug/L	98
56) 1-Chlorohexane	8.071	69	54111	51.0503 ug/L	94
57) Ethylbenzene	8.097	106	321952	47.1102 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.112	131	231737	45.3443 ug/L	99
59) m-,p-Xylene	8.193	106	785227	95.2048 ug/L	98
60) o-Xylene	8.451	106	380251	46.7919 ug/L	98
61) Styrene	8.485	104	628397	48.3278 ug/L	99
62) Bromoform	8.488	173	158654	43.5684 ug/L	99
63) Isopropylbenzene	8.639	105	992079	47.1638 ug/L	99
65) 1,3,5-Trimethylbenzene	8.975	105	850901	46.8612 ug/L	99
67) Bromobenzene	8.839	156	280810	43.8277 ug/L	98
68) n-Propylbenzene	8.865	91	1151000	47.8525 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	190519	43.4837 ug/L	100
70) 2-Chlorotoluene	8.940	91	691541	46.5797 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	52347	40.4150 ug/L	96
72) trans-1,4-Dichloro-2-B...	8.998	53	48229	49.9500 ug/L #	97
73) 1,2,4-Trimethylbenzene	9.172	105	857783	46.8482 ug/L	100
74) 4-Chlorotoluene	9.030	91	700937	47.2904 ug/L	99
75) tert-Butylbenzene	9.137	134	161869	44.6047 ug/L	99
76) sec-Butylbenzene	9.224	105	1044322	46.6843 ug/L	99
77) p-Isopropyltoluene	9.296	119	903254	47.3671 ug/L	100
78) 1,3-Dichlorobenzene	9.328	146	515644	46.1653 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	508770	45.1172 ug/L	100
80) n-Butylbenzene	9.502	91	802771	49.8779 ug/L	98
81) 1,2-Dichlorobenzene	9.574	146	481245	44.2084 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	33992	42.2899 ug/L	95
83) Hexachlorobutadiene	10.249	225	200842	43.7654 ug/L	100
84) 1,2,4-Trichlorobenzene	10.266	180	368387	45.5543 ug/L	99
85) Naphthalene	10.416	128	633632	40.1811 ug/L	100
86) 1,2,3-Trichlorobenzene	10.503	180	325787	41.4753 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Fri Apr 28 09:52:07 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	0.297	0.311	-4.7	95	0.000
3	P	Chloromethane	0.291	0.248	14.8	86	0.000
4	C	Vinyl Chloride	0.322	0.304	5.6#	92	0.000
5	T	1,3-Butadiene	0.198	0.195	1.5	95	0.000
6	T	Bromomethane	0.239	0.200	16.3	90	0.000
7	T	Chloroethane	0.153	0.139	9.2	102	0.000
8	T	Trichlorofluoromethane	0.413	0.418	-1.2	94	0.011
9	T	Diethyl ether	0.199	0.179	10.1	87	0.000
10	C	1,1-Dichloroethene	0.386	0.366	5.2#	94	0.012
11	T	Carbon Disulfide	0.829	0.811	2.2	95	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.241	2.0	95	0.012
13	T	Iodomethane	0.286	0.335	-17.1	92	0.011
14	T	Acrolein	0.025	0.023	8.0	87	0.000
15	T	Methylene Chloride	0.293	0.262	10.6	93	0.000
16	T	Acetone	0.050	0.040	20.0	83	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.247	6.1	93	0.000
18	T	Methyl acetate	0.132	0.129	2.3	84	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.577	13.5	84	0.000
20	P	1,1-Dichloroethane	0.472	0.449	4.9	94	0.000
21	T	Acrylonitrile	0.064	0.055	14.1	83	0.000
22	T	Vinyl Acetate	0.042	0.047	-11.9	105	0.011
23	T	cis-1,2-Dichloroethene	0.298	0.275	7.7	92	0.000
24	T	2,2-Dichloropropane	0.321	0.392	-22.1	104	0.000
25	T	Cyclohexane	0.402	0.407	-1.2	97	0.000
26	T	Bromochloromethane	0.192	0.174	9.4	87	0.000
27	C	Chloroform	0.492	0.452	8.1#	92	0.000
28	T	Carbon Tetrachloride	0.389	0.370	4.9	91	0.000
29	S	Dibromofluoromethane	0.270	0.269	0.4	97	0.000
30	T	1,1,1-Trichloroethane	0.433	0.402	7.2	92	0.000
31	T	1,1-Dichloropropene	0.340	0.325	4.4	92	0.000
32	T	2-Butanone	0.075	0.065	13.3	86	0.000
33	T	Benzene	1.065	0.986	7.4	93	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.244	3.6	94	0.000
35	T	1,2-Dichloroethane	0.332	0.295	11.1	89	0.000
36	T	Methylcyclohexane	0.421	0.417	1.0	95	0.000
37	T	Trichloroethene	0.320	0.283	11.6	89	0.000
38	T	Dibromomethane	0.163	0.144	11.7	86	0.000
39	C	1,2-Dichloropropane	0.279	0.263	5.7#	92	0.000
40	T	Bromodichloromethane	0.373	0.343	8.0	90	0.000
41	T	1,4-Dioxane	0.001	0.002	-100.0#	124	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.124	2.4	97	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.409	2.6	92	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.058	15.9	83	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.340	4.8	90	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	98	0.000
47	S	Toluene-d8	1.248	1.283	-2.8	98	0.000
48	C	Toluene	1.567	1.472	6.1#	92	0.000
49	T	Tetrachloroethene	0.447	0.415	7.2	91	0.000
50	T	1,1,2-Trichloroethane	0.304	0.261	14.1	84	0.000
51	T	Dibromochloromethane	0.415	0.367	11.6	84	0.000
52	T	1,3-Dichloropropane	0.483	0.427	11.6	86	0.000
53	T	1,2-Dibromoethane	0.311	0.268	13.8	83	0.000
54	T	2-Hexanone	0.160	0.136	15.0	83	0.000
55	P	Chlorobenzene	1.052	0.966	8.2	90	0.000
56	T	1-Chlorohexane	0.085	0.087	-2.4	95	0.000
57	C	Ethylbenzene	0.547	0.516	5.7#	91	0.000

826VMS.M Thu Apr 27 12:17:51 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.371	9.3	88	0.000
59	T	m-,p-Xylene	0.661	0.629	4.8	91	0.000
60	T	o-Xylene	0.651	0.609	6.5	90	0.000
61	T	Styrene	1.042	1.007	3.4	90	0.000
62	P	Bromoform	0.292	0.254	13.0	78	0.000
63	T	Isopropylbenzene	1.685	1.589	5.7	91	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	98	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.612	6.3	90	0.000
66	S	p-Bromofluorobenzene	0.837	0.852	-1.8	98	0.000
67	T	Bromobenzene	0.983	0.862	12.3	87	0.000
68	T	n-Propylbenzene	3.692	3.533	4.3	92	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.585	12.9	80	0.000
70	T	2-Chlorotoluene	2.279	2.123	6.8	92	0.000
71	T	1,2,3-Trichloropropane	0.199	0.161	19.1	79	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.148	0.0	89	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.633	6.3	90	0.000
74	T	4-Chlorotoluene	2.275	2.152	5.4	92	0.000
75	T	tert-Butylbenzene	0.557	0.497	10.8	88	0.000
76	T	sec-Butylbenzene	3.433	3.206	6.6	90	0.000
77	T	p-Isopropyltoluene	2.927	2.773	5.3	89	0.000
78	T	1,3-Dichlorobenzene	1.714	1.583	7.6	90	0.000
79	T	1,4-Dichlorobenzene	1.731	1.562	9.8	89	0.000
80	T	n-Butylbenzene	2.470	2.464	0.2	91	0.000
81	T	1,2-Dichlorobenzene	1.671	1.477	11.6	86	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.104	15.4	77	0.000
83	T	Hexachlorobutadiene	0.704	0.617	12.4	82	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.131	8.9	83	0.000
85	T	Naphthalene	2.420	1.945	19.6	73	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.000	17.1	77	0.011

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	50.000	52.302	-4.6	95	0.000
3	P	Chloromethane	50.000	42.659	14.7	86	0.000
4	C	Vinyl Chloride	50.000	47.225	5.5#	92	0.000
5	T	1,3-Butadiene	50.000	49.254	1.5	95	0.000
6	T	Bromomethane	50.000	41.789	16.4	90	0.000
7	T	Chloroethane	50.000	45.370	9.3	102	0.000
8	T	Trichlorofluoromethane	50.000	50.609	-1.2	94	0.011
9	T	Diethyl ether	100.000	90.045	10.0	87	0.000
10	C	1,1-Dichloroethene	50.000	47.355	5.3#	94	0.012
11	T	Carbon Disulfide	50.000	48.936	2.1	95	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	48.959	2.1	95	0.012
13	T	Iodomethane	50.000	45.227	9.5	92	0.011
14	T	Acrolein	50.000	46.483	7.0	87	0.000
15	T	Methylene Chloride	50.000	44.738	10.5	93	0.000
16	T	Acetone	50.000	40.032	19.9	83	0.000
17	T	trans-1,2-Dichloroethene	50.000	46.920	6.2	93	0.000
18	T	Methyl acetate	50.000	49.025	2.0	84	0.000
19	T	Methyl Tert Butyl Ether	50.000	43.215	13.6	84	0.000
20	P	1,1-Dichloroethane	50.000	47.556	4.9	94	0.000
21	T	Acrylonitrile	50.000	43.202	13.6	83	0.000
22	T	Vinyl Acetate	50.000	55.964	-11.9	105	0.011
23	T	cis-1,2-Dichloroethene	50.000	46.257	7.5	92	0.000
24	T	2,2-Dichloropropane	50.000	52.435	-4.9	104	0.000
25	T	Cyclohexane	50.000	50.669	-1.3	97	0.000
26	T	Bromochloromethane	50.000	45.326	9.3	87	0.000
27	C	Chloroform	50.000	45.852	8.3#	92	0.000
28	T	Carbon Tetrachloride	50.000	47.524	5.0	91	0.000
29	S	Dibromofluoromethane	25.000	24.912	0.4	97	0.000
30	T	1,1,1-Trichloroethane	50.000	46.400	7.2	92	0.000
31	T	1,1-Dichloropropene	50.000	47.835	4.3	92	0.000
32	T	2-Butanone	50.000	43.398	13.2	86	0.000
33	T	Benzene	50.000	46.290	7.4	93	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.125	3.5	94	0.000
35	T	1,2-Dichloroethane	50.000	44.535	10.9	89	0.000
36	T	Methylcyclohexane	50.000	49.585	0.8	95	0.000
37	T	Trichloroethene	50.000	44.216	11.6	89	0.000
38	T	Dibromomethane	50.000	44.177	11.6	86	0.000
39	C	1,2-Dichloropropane	50.000	47.038	5.9#	92	0.000
40	T	Bromodichloromethane	50.000	46.071	7.9	90	0.000
41	T	1,4-Dioxane	200.000	248.239	-24.1	124	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	49.094	1.8	97	0.000
43	T	cis-1,3-Dichloropropene	50.000	48.680	2.6	92	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.698	16.6	83	0.000
45	T	trans-1,3-Dichloropropene	50.000	47.672	4.7	90	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	98	0.000
47	S	Toluene-d8	25.000	25.714	-2.9	98	0.000
48	C	Toluene	50.000	46.941	6.1#	92	0.000
49	T	Tetrachloroethene	50.000	46.448	7.1	91	0.000
50	T	1,1,2-Trichloroethane	50.000	43.005	14.0	84	0.000
51	T	Dibromochloromethane	50.000	44.254	11.5	84	0.000
52	T	1,3-Dichloropropane	50.000	44.269	11.5	86	0.000
53	T	1,2-Dibromoethane	50.000	43.018	14.0	83	0.000
54	T	2-Hexanone	50.000	42.632	14.7	83	0.000
55	P	Chlorobenzene	50.000	45.910	8.2	90	0.000
56	T	1-Chlorohexane	50.000	51.050	-2.1	95	0.000
57	C	Ethylbenzene	50.000	47.110	5.8#	91	0.000

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273065.D Vial: 1
Acq On : 27 Apr 2017 11:56 Operator: ADC
Sample : WG611826-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 27 12:08:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	45.344	9.3	88	0.000
59	T	m-,p-Xylene	100.000	95.205	4.8	91	0.000
60	T	o-Xylene	50.000	46.792	6.4	90	0.000
61	T	Styrene	50.000	48.328	3.3	90	0.000
62	P	Bromoform	50.000	43.568	12.9	78	0.000
63	T	Isopropylbenzene	50.000	47.164	5.7	91	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	98	0.000
65	T	1,3,5-Trimethylbenzene	50.000	46.861	6.3	90	0.000
66	S	p-Bromofluorobenzene	25.000	25.443	-1.8	98	0.000
67	T	Bromobenzene	50.000	43.828	12.3	87	0.000
68	T	n-Propylbenzene	50.000	47.853	4.3	92	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	43.484	13.0	80	0.000
70	T	2-Chlorotoluene	50.000	46.580	6.8	92	0.000
71	T	1,2,3-Trichloropropane	50.000	40.415	19.2	79	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.950	0.1	89	0.000
73	T	1,2,4-Trimethylbenzene	50.000	46.848	6.3	90	0.000
74	T	4-Chlorotoluene	50.000	47.290	5.4	92	0.000
75	T	tert-Butylbenzene	50.000	44.605	10.8	88	0.000
76	T	sec-Butylbenzene	50.000	46.684	6.6	90	0.000
77	T	p-Isopropyltoluene	50.000	47.367	5.3	89	0.000
78	T	1,3-Dichlorobenzene	50.000	46.165	7.7	90	0.000
79	T	1,4-Dichlorobenzene	50.000	45.117	9.8	89	0.000
80	T	n-Butylbenzene	50.000	49.878	0.2	91	0.000
81	T	1,2-Dichlorobenzene	50.000	44.208	11.6	86	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	42.290	15.4	77	0.000
83	T	Hexachlorobutadiene	50.000	43.765	12.5	82	0.000
84	T	1,2,4-Trichlorobenzene	50.000	45.554	8.9	83	0.000
85	T	Naphthalene	50.000	40.181	19.6	73	0.000
86	T	1,2,3-Trichlorobenzene	50.000	41.475	17.0	77	0.011

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:48:45 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	656116	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	455255	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	239048	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	173683	25.9312	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.72%			
43) 1,2-Dichloroethane-d4	10.84	65	173473	26.2788	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.12%			
58) Toluene-d8	13.23	98	610660	26.2869	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.16%			
80) p-Bromofluorobenzene	16.63	95	239365	26.3643	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.44%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	510996	49.0528	ug/L	94
3) Chloromethane	4.04	50	581230	47.8561	ug/L	97
4) Vinyl Chloride	4.28	62	584613	49.1154	ug/L	99
5) 1,3-Butadiene	4.32	54	247960	56.5621	ug/L	92
6) Bromomethane	5.23	94	220399	42.8857	ug/L	99
7) Chloroethane	5.40	64	274570	53.6134	ug/L	88
8) Trichlorofluoromethane	5.91	101	638813	52.3640	ug/L	99
9) Diethyl ether	6.44	59	513324	100.9680	ug/L	84
10) Isoprene	6.48	67	546175	54.4306	ug/L	83
11) Acrolein	6.67	56	32959	59.1733	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	354752	51.3705	ug/L	97
13) Acetone	6.77	43	73514	51.9225	ug/L	92
14) 1,1-Dichloroethene	7.01	61	543208	54.3056	ug/L	88
15) Tert-Butyl Alcohol	7.10	59	47812	108.8692	ug/L	95
16) Dimethyl Sulfide	7.28	62	376636	52.6939	ug/L	81
17) Iodomethane	7.54	142	250716	43.0715	ug/L	97
18) Methyl acetate	7.53	43	175247	49.3527	ug/L #	86
19) Methylene Chloride	7.79	84	373327	49.3665	ug/L	65
20) Carbon Disulfide	7.86	76	1166803	54.2004	ug/L	99
21) Acrylonitrile	7.96	53	87709	53.4600	ug/L	99
22) Methyl Tert Butyl Ether	8.00	73	790939	47.6946	ug/L	92
23) trans-1,2-Dichloroethene	8.25	96	361071	50.1556	ug/L	84
24) n-Hexane	8.33	57	484260	59.4852	ug/L	87
25) Diisopropyl ether	8.65	45	2081553	112.3179	ug/L #	93
26) Vinyl Acetate	8.83	43	356955	69.3876	ug/L #	90
27) 1,1-Dichloroethane	8.87	63	645630	54.1404	ug/L	99
28) Ethyl-Tert-Butyl ether	9.23	59	1970641	104.9453	ug/L	93
29) 2-Butanone	9.41	43	83813	46.9686	ug/L	84
30) Propionitrile	9.51	54	58922	101.2482	ug/L	99
31) 2,2-Dichloropropane	9.64	77	390003	42.9876	ug/L	80
32) cis-1,2-Dichloroethene	9.71	96	394074	49.7911	ug/L	93
33) Chloroform	9.91	83	638218	46.9791	ug/L	95
34) 1-Bromopropane	10.05	122	68898	49.0892	ug/L	100
35) Bromochloromethane	10.15	130	203088	48.7460	ug/L	99
36) Tetrahydrofuran	10.17	42	118556	100.8889	ug/L	78
38) 1,1,1-Trichloroethane	10.45	97	567210	51.3554	ug/L	93
39) Cyclohexane	10.49	56	576732	56.4689	ug/L	82
40) 1,1-Dichloropropene	10.65	75	488420	52.3135	ug/L	85
41) Tert-Amyl-Methyl ether	10.74	73	1752500	98.2951	ug/L	94
42) Carbon Tetrachloride	10.80	117	468159	53.7568	ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146766.D 8260BWT.M Thu Apr 27 16:35:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:48:45 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

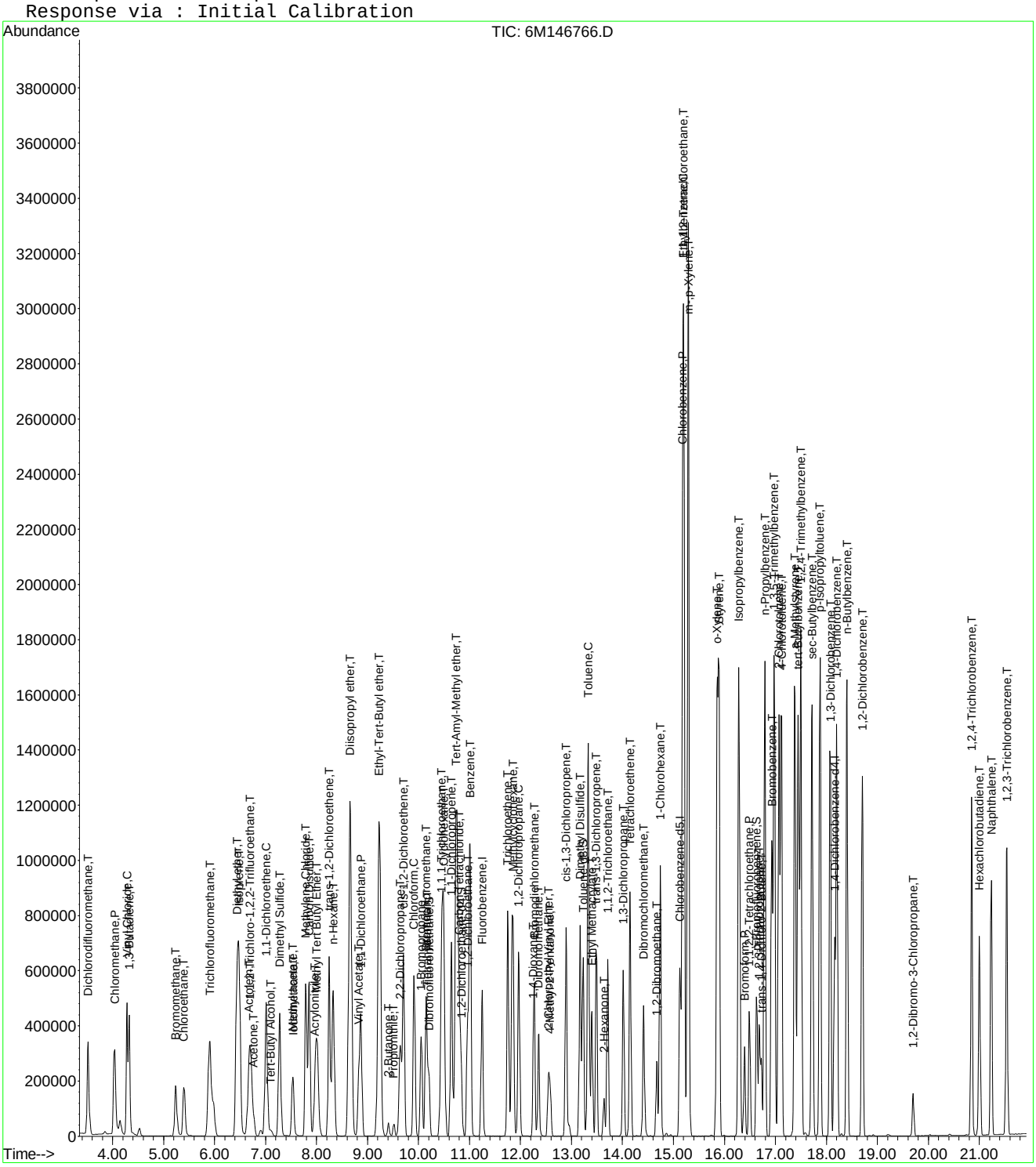
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	429035	50.7651	ug/L		90
46)	Benzene	11.01	78	1395905	49.7248	ug/L		89
47)	Trichloroethene	11.75	130	354713	46.4211	ug/L		93
48)	Methylcyclohexane	11.85	83	565553	51.2282	ug/L		86
49)	1,2-Dichloropropane	11.96	63	354197	53.4622	ug/L		94
50)	1,4-Dioxane	12.25	88	9719	201.7532	ug/L		91
51)	Bromodichloromethane	12.27	83	485264	51.8859	ug/L		99
52)	Dibromomethane	12.35	93	189898	48.6674	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.54	63	112838	43.4206	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	77613	45.5291	ug/L		87
55)	cis-1,3-Dichloropropene	12.89	75	557276	54.1088	ug/L		95
56)	Dimethyl Disulfide	13.17	79	314321	48.3756	ug/L		93
59)	Toluene	13.33	91	1454679	51.1082	ug/L		100
60)	Ethyl Methacrylate	13.40	69	347608	50.4676	ug/L		75
62)	trans-1,3-Dichloropropene	13.48	75	479289	54.6123	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	266191	49.6272	ug/L		98
64)	2-Hexanone	13.64	43	121435	47.1468	ug/L		87
65)	1,3-Dichloropropane	14.02	76	459794	51.0676	ug/L		75
66)	Tetrachloroethene	14.15	166	333196	48.3093	ug/L		92
67)	Dibromochloromethane	14.41	129	328562	49.5523	ug/L		99
68)	1,2-Dibromoethane	14.67	107	244225	47.4189	ug/L		100
69)	1-Chlorohexane	14.74	91	479372	52.1552	ug/L		82
70)	Chlorobenzene	15.18	112	976564	50.1299	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	359654	51.5534	ug/L		98
72)	Ethylbenzene	15.20	106	536203	50.8449	ug/L		99
73)	m-,p-Xylene	15.29	106	1301396	103.2425	ug/L		97
74)	o-Xylene	15.85	106	626248	51.4841	ug/L		98
75)	Styrene	15.89	104	1091640	53.4588	ug/L		100
76)	Bromoform	16.39	173	197762	48.9431	ug/L		98
77)	Isopropylbenzene	16.28	105	1599444	52.5443	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	324038	52.0471	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	89842	48.8661	ug/L	#	47
82)	trans-1,4-Dichloro-2-Buten	16.72	53	67943	51.3926	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1949014	53.8497	ug/L		99
84)	Bromobenzene	16.94	156	399911	49.1838	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1365415	53.2326	ug/L		98
86)	2-Chlorotoluene	17.07	91	1221947	50.7047	ug/L		99
87)	4-Chlorotoluene	17.12	91	1210007	56.8094	ug/L		98
88)	a-Methylstyrene	17.39	118	708930	49.9800	ug/L		100
89)	tert-Butylbenzene	17.45	134	276696	51.4823	ug/L		75
90)	1,2,4-Trimethylbenzene	17.50	105	1437712	54.5777	ug/L		89
91)	sec-Butylbenzene	17.72	105	1678624	53.0684	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1404112	52.7706	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	772652	50.3180	ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	765810	49.3171	ug/L		95
95)	n-Butylbenzene	18.41	91	1349676	55.5496	ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	702764	48.8270	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	54904	48.6866	ug/L		98
98)	1,2,4-Trichlorobenzene	20.85	180	488758	46.4113	ug/L		99
99)	Hexachlorobutadiene	21.00	225	188785	46.9351	ug/L		100
100)	Naphthalene	21.23	128	951416	45.1194	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	432371	42.5290	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146766.D 8260BWT.M Thu Apr 27 16:35:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:48 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	102	0.00
2	T	Dichlorodifluoromethane	0.3969	0.3894	1.9	92	0.00
3	P	Chloromethane	0.5473	0.4429	19.1	97	0.02
4	C	Vinyl Chloride	0.4535	0.4455	1.8	101	0.01
5	T	1,3-Butadiene	0.1682	0.1890	-12.4	110	0.01
6	T	Bromomethane	0.1958	0.1680	14.2	77	0.02
7	T	Chloroethane	0.1951	0.2092	-7.2	105	0.02
8	T	Trichlorofluoromethane	0.4648	0.4868	-4.7	103	0.02
9	T	Diethyl ether	0.1937	0.1956	-1.0	104	0.00
10	T	Isoprene	0.3823	0.4162	-8.9	110	0.00
11	T	Acrolein	0.0212	0.0251	-18.4	120	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2703	-2.7	104	0.00
13	T	Acetone	0.0539	0.0560	-3.8	103	-0.01
14	C	1,1-Dichloroethene	0.3811	0.4140	-8.6	109	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0091	45.5#	65	-0.02
16	T	Dimethyl Sulfide	0.2723	0.2870	-5.4	106	0.00
17	T	Iodomethane	0.1863	0.1911	-2.6	91	0.01
18	T	Methyl acetate	0.1353	0.1336	1.3	102	0.00
19	T	Methylene Chloride	0.2882	0.2845	1.3	102	0.00
20	T	Carbon Disulfide	0.8203	0.8892	-8.4	108	0.00
21	T	Acrylonitrile	0.0625	0.0668	-6.9	103	-0.01
22	T	Methyl Tert Butyl Ether	0.6319	0.6027	4.6	97	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2752	-0.3	102	0.00
24	T	n-Hexane	0.3102	0.3690	-19.0	120	0.00
25	T	Diisopropyl ether	0.7062	0.7931	-12.3	117	-0.01
26	T	Vinyl Acetate	0.1960	0.2720	-38.8#	167	0.00
27	P	1,1-Dichloroethane	0.4544	0.4920	-8.3	111	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7509	-4.9	109	-0.01
29	T	2-Butanone	0.0680	0.0639	6.1	99	0.00
30	T	Propionitrile	0.0222	0.0225	-1.3	101	-0.01
31	T	2,2-Dichloropropane	0.3457	0.2972	14.0	109	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3003	0.4	102	0.00
33	C	Chloroform	0.5176	0.4864	6.0	104	0.00
34		1-Bromopropane	0.0535	0.0525	1.8	94	0.00
35	T	Bromochloromethane	0.1588	0.1548	2.5	94	0.00
36	T	Tetrahydrofuran	0.0448	0.0452	-0.9	107	-0.01
37	S	Dibromofluoromethane	0.2552	0.2647	-3.7	104	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4323	-2.7	104	-0.01
39	T	Cyclohexane	0.3892	0.4395	-12.9	113	0.00
40	T	1,1-Dichloropropene	0.3558	0.3722	-4.6	106	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6678	1.7	102	-0.01
42	T	Carbon Tetrachloride	0.3318	0.3568	-7.5	99	-0.01
43	S	1,2-Dichloroethane-d4	0.2515	0.2644	-5.1	107	0.00
44		Heptane	0.0000	0.0000	0.0	104	0.00
45	T	1,2-Dichloroethane	0.3220	0.3270	-1.5	104	0.00
46	T	Benzene	1.0697	1.0638	0.6	106	0.00
47	T	Trichloroethene	0.2912	0.2703	7.2	91	0.00
48	T	Methylcyclohexane	0.4207	0.4310	-2.5	104	0.00
49	C	1,2-Dichloropropane	0.2524	0.2699	-6.9	108	-0.01
50	T	1,4-Dioxane	0.0018	0.0019	-0.5	99	0.00
51	T	Bromodichloromethane	0.3564	0.3698	-3.8	102	0.00
52	T	Dibromomethane	0.1487	0.1447	2.7	97	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.0860	13.2	83	-0.01
54	T	4-Methyl-2-Pentanone	0.0649	0.0592	8.9	95	-0.01

(#) = Out of Range
6M146766.D 8260BWT.M Thu Apr 27 16:36:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4247	-8.2	106	-0.01
56	T	Dimethyl Disulfide	0.2476	0.2395	3.2	99	-0.01
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	101	0.00
58	S	Toluene-d8	1.2757	1.3414	-5.1	107	0.00
59	C	Toluene	1.5630	1.5977	-2.2	105	0.00
60	T	Ethyl Methacrylate	0.3782	0.3818	-0.9	100	0.00
61		Paraldehyde	0.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	0.4819	0.5264	-9.2	107	-0.01
63	T	1,1,2-Trichloroethane	0.2945	0.2924	0.7	99	-0.01
64	T	2-Hexanone	0.1414	0.1334	5.7	96	0.00
65	T	1,3-Dichloropropane	0.4944	0.5050	-2.1	102	0.00
66	T	Tetrachloroethene	0.3787	0.3659	3.4	96	-0.01
67	T	Dibromochloromethane	0.3641	0.3609	0.9	95	-0.01
68	T	1,2-Dibromoethane	0.2828	0.2682	5.2	94	-0.01
69	T	1-Chlorohexane	0.5047	0.5265	-4.3	103	-0.01
70	P	Chlorobenzene	1.0698	1.0725	-0.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3950	-3.1	99	0.00
72	C	Ethylbenzene	0.5791	0.5889	-1.7	102	0.00
73	T	m-,p-Xylene	0.6922	0.7147	-3.2	103	0.00
74	T	o-Xylene	0.6680	0.6878	-3.0	102	-0.01
75	T	Styrene	1.1214	1.1989	-6.9	103	-0.01
76	P	Bromoform	0.2219	0.2172	2.1	92	-0.01
77	T	Isopropylbenzene	1.6716	1.7567	-5.1	104	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	-0.01
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6778	-4.1	109	-0.01
80	S	p-Bromofluorobenzene	0.9495	1.0013	-5.5	105	-0.01
81	T	1,2,3-Trichloropropane	0.1923	0.1879	2.3	96	-0.01
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1421	-2.8	98	-0.01
83	T	n-Propylbenzene	3.7852	4.0766	-7.7	106	0.00
84	T	Bromobenzene	0.8504	0.8365	1.6	97	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8559	-6.5	105	-0.01
86	T	2-Chlorotoluene	2.5203	2.5559	-1.4	104	-0.01
87	T	4-Chlorotoluene	2.2275	2.5309	-13.6	113	0.00
88	T	a-Methylstyrene	1.4834	1.4828	0.0	99	0.00
89	T	tert-Butylbenzene	0.5621	0.5787	-3.0	100	-0.01
90	T	1,2,4-Trimethylbenzene	2.7549	3.0072	-9.2	107	-0.01
91	T	sec-Butylbenzene	3.3081	3.5111	-6.1	105	0.00
92	T	p-Isopropyltoluene	2.7827	2.9369	-5.5	103	-0.01
93	T	1,3-Dichlorobenzene	1.6059	1.6161	-0.6	100	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.6018	1.4	99	-0.01
95	T	n-Butylbenzene	2.5410	2.8230	-11.1	109	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4699	2.3	97	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1148	2.6	94	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	1.0223	7.2	92	-0.01
99	T	Hexachlorobutadiene	0.4207	0.3949	6.1	94	-0.01
100	T	Naphthalene	2.2053	1.9900	9.8	88	-0.01
101	T	1,2,3-Trichlorobenzene	1.0632	0.9044	14.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146766.D 8260BWT.M Thu Apr 27 16:36:25 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	102	0.00
2	T	Dichlorodifluoromethane	50.0000	49.0528	1.9	92	0.00
3	P	Chloromethane	50.0000	47.8561	4.3	97	0.02
4	C	Vinyl Chloride	50.0000	49.1154	1.8	101	0.01
5	T	1,3-Butadiene	50.0000	56.5621	-13.1	110	0.01
6	T	Bromomethane	50.0000	42.8857	14.2	77	0.02
7	T	Chloroethane	50.0000	53.6134	-7.2	105	0.02
8	T	Trichlorofluoromethane	50.0000	52.3640	-4.7	103	0.02
9	T	Diethyl ether	100.0000	100.9680	-1.0	104	0.00
10	T	Isoprene	50.0000	54.4306	-8.9	110	0.00
11	T	Acrolein	50.0000	59.1733	-18.3	120	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.3706	-2.7	104	0.00
13	T	Acetone	50.0000	51.9225	-3.8	103	-0.01
14	C	1,1-Dichloroethene	50.0000	54.3057	-8.6	109	0.00
15	T	Tert-Butyl Alcohol	200.0000	108.8692	45.6#	65	-0.02
16	T	Dimethyl Sulfide	50.0000	52.6939	-5.4	106	0.00
17	T	Iodomethane	50.0000	43.0715	13.9	91	0.01
18	T	Methyl acetate	50.0000	49.3527	1.3	102	0.00
19	T	Methylene Chloride	50.0000	49.3665	1.3	102	0.00
20	T	Carbon Disulfide	50.0000	54.2004	-8.4	108	0.00
21	T	Acrylonitrile	50.0000	53.4600	-6.9	103	-0.01
22	T	Methyl Tert Butyl Ether	50.0000	47.6946	4.6	97	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	50.1556	-0.3	102	0.00
24	T	n-Hexane	50.0000	59.4852	-19.0	120	0.00
25	T	Diisopropyl ether	100.0000	112.3179	-12.3	117	-0.01
26	T	Vinyl Acetate	50.0000	69.3876	-38.8#	167	0.00
27	P	1,1-Dichloroethane	50.0000	54.1404	-8.3	111	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	104.9453	-4.9	109	-0.01
29	T	2-Butanone	50.0000	46.9686	6.1	99	0.00
30	T	Propionitrile	100.0000	101.2482	-1.2	101	-0.01
31	T	2,2-Dichloropropane	50.0000	42.9876	14.0	109	0.00
32	T	cis-1,2-Dichloroethene	50.0000	49.7911	0.4	102	0.00
33	C	Chloroform	50.0000	46.9791	6.0	104	0.00
34		1-Bromopropane	50.0000	49.0892	1.8	94	0.00
35	T	Bromochloromethane	50.0000	48.7460	2.5	94	0.00
36	T	Tetrahydrofuran	100.0000	100.8889	-0.9	107	-0.01
37	S	Dibromofluoromethane	25.0000	25.9312	-3.7	104	0.00
38	T	1,1,1-Trichloroethane	50.0000	51.3554	-2.7	104	-0.01
39	T	Cyclohexane	50.0000	56.4689	-12.9	113	0.00
40	T	1,1-Dichloropropene	50.0000	52.3135	-4.6	106	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	98.2951	1.7	102	-0.01
42	T	Carbon Tetrachloride	50.0000	53.7569	-7.5	99	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.2788	-5.1	107	0.00
44		Heptane	-1.0000	0.0000	0.0	104	0.00
45	T	1,2-Dichloroethane	50.0000	50.7651	-1.5	104	0.00
46	T	Benzene	50.0000	49.7248	0.6	106	0.00
47	T	Trichloroethene	50.0000	46.4211	7.2	91	0.00
48	T	Methylcyclohexane	50.0000	51.2282	-2.5	104	0.00
49	C	1,2-Dichloropropane	50.0000	53.4622	-6.9	108	-0.01
50	T	1,4-Dioxane	200.0000	201.7532	-0.9	99	0.00
51	T	Bromodichloromethane	50.0000	51.8859	-3.8	102	0.00
52	T	Dibromomethane	50.0000	48.6674	2.7	97	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	43.4206	13.2	83	-0.01
54	T	4-Methyl-2-Pentanone	50.0000	45.5291	8.9	95	-0.01

(#) = Out of Range
6M146766.D 8260BWT.M Thu Apr 27 16:36:27 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146766.D Vial: 2
Acq On : 27 Apr 2017 12:26 Operator: TMB
Sample : WG611834-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	54.1088	-8.2	106	-0.01
56	T	Dimethyl Disulfide	50.0000	48.3756	3.2	99	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	101	0.00
58	S	Toluene-d8	25.0000	26.2869	-5.1	107	0.00
59	C	Toluene	50.0000	51.1082	-2.2	105	0.00
60	T	Ethyl Methacrylate	50.0000	50.4676	-0.9	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	50.0000	54.6123	-9.2	107	-0.01
63	T	1,1,2-Trichloroethane	50.0000	49.6272	0.7	99	-0.01
64	T	2-Hexanone	50.0000	47.1469	5.7	96	0.00
65	T	1,3-Dichloropropane	50.0000	51.0676	-2.1	102	0.00
66	T	Tetrachloroethene	50.0000	48.3093	3.4	96	-0.01
67	T	Dibromochloromethane	50.0000	49.5523	0.9	95	-0.01
68	T	1,2-Dibromoethane	50.0000	47.4189	5.2	94	-0.01
69	T	1-Chlorohexane	50.0000	52.1552	-4.3	103	-0.01
70	P	Chlorobenzene	50.0000	50.1299	-0.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	51.5534	-3.1	99	0.00
72	C	Ethylbenzene	50.0000	50.8449	-1.7	102	0.00
73	T	m-,p-Xylene	100.0000	103.2425	-3.2	103	0.00
74	T	o-Xylene	50.0000	51.4841	-3.0	102	-0.01
75	T	Styrene	50.0000	53.4588	-6.9	103	-0.01
76	P	Bromoform	50.0000	48.9431	2.1	92	-0.01
77	T	Isopropylbenzene	50.0000	52.5443	-5.1	104	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	-0.01
79	P	1,1,2,2-Tetrachloroethane	50.0000	52.0471	-4.1	109	-0.01
80	S	p-Bromofluorobenzene	25.0000	26.3643	-5.5	105	-0.01
81	T	1,2,3-Trichloropropane	50.0000	48.8661	2.3	96	-0.01
82	T	trans-1,4-Dichloro-2-Butene	50.0000	51.3926	-2.8	98	-0.01
83	T	n-Propylbenzene	50.0000	53.8497	-7.7	106	0.00
84	T	Bromobenzene	50.0000	49.1838	1.6	97	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	53.2326	-6.5	105	-0.01
86	T	2-Chlorotoluene	50.0000	50.7047	-1.4	104	-0.01
87	T	4-Chlorotoluene	50.0000	56.8094	-13.6	113	0.00
88	T	a-Methylstyrene	50.0000	49.9800	0.0	99	0.00
89	T	tert-Butylbenzene	50.0000	51.4823	-3.0	100	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	54.5777	-9.2	107	-0.01
91	T	sec-Butylbenzene	50.0000	53.0684	-6.1	105	0.00
92	T	p-Isopropyltoluene	50.0000	52.7706	-5.5	103	-0.01
93	T	1,3-Dichlorobenzene	50.0000	50.3180	-0.6	100	0.00
94	T	1,4-Dichlorobenzene	50.0000	49.3171	1.4	99	-0.01
95	T	n-Butylbenzene	50.0000	55.5496	-11.1	109	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.8270	2.3	97	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	48.6866	2.6	94	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	46.4113	7.2	92	-0.01
99	T	Hexachlorobutadiene	50.0000	46.9351	6.1	94	-0.01
100	T	Naphthalene	50.0000	45.1194	9.8	88	-0.01
101	T	1,2,3-Trichlorobenzene	50.0000	42.5290	14.9	89	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146766.D 8260BWT.M Thu Apr 27 16:36:27 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146767.D Vial: 3
Acq On : 27 Apr 2017 13:03 Operator: TMB
Sample : WG611839-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 08:06:30 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

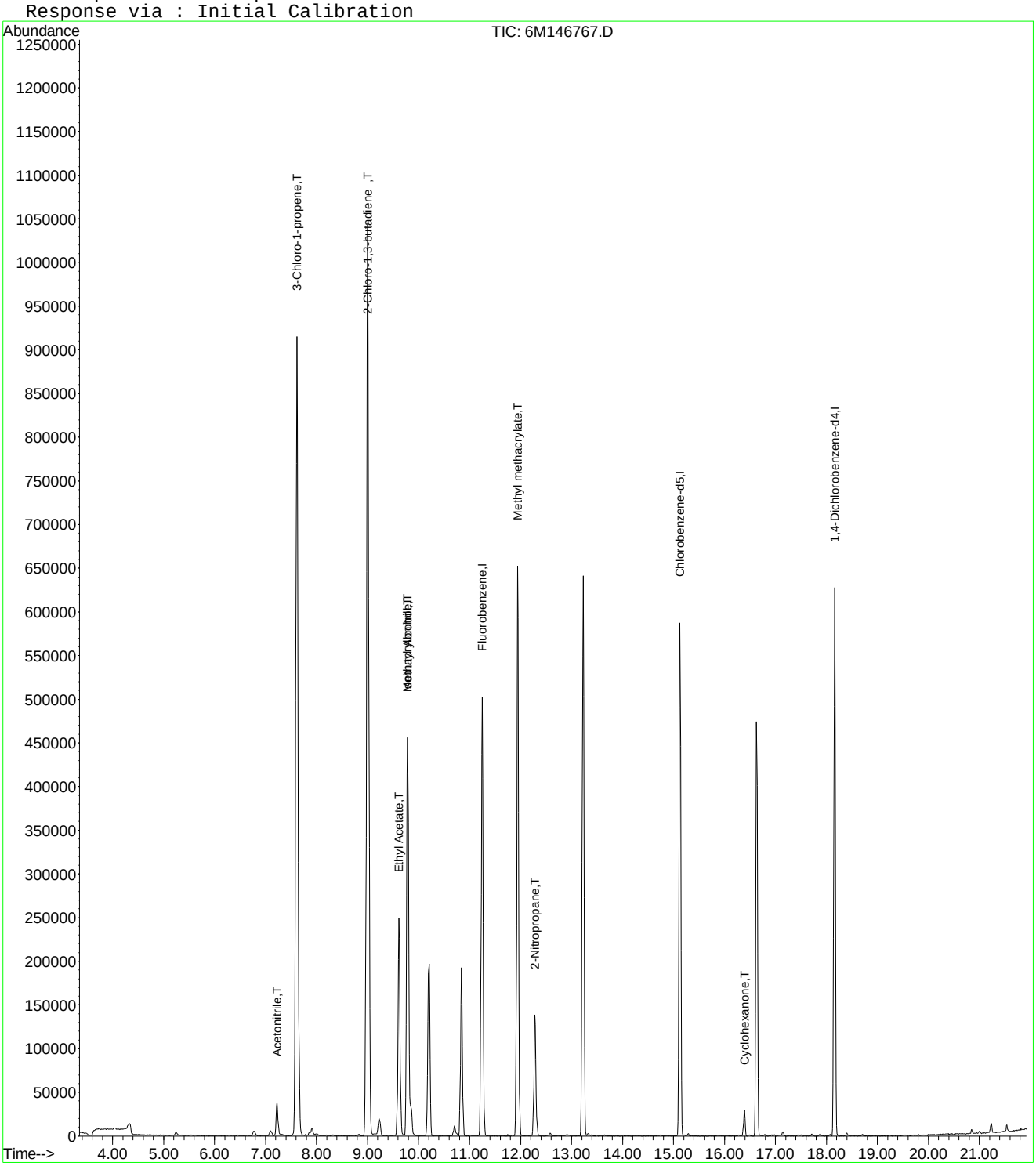
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	638167	25.00	ug/L		-0.02
11) Chlorobenzene-d5	15.13	117	432780	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	211912	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	53309	116.8463	ug/L		97
3) 3-Chloro-1-propene	7.61	41	909631	118.8927	ug/L		94
4) 2-Chloro-1,3-butadiene	9.00	53	975924	103.3504	ug/L		94
5) Ethyl Acetate	9.61	43	409825	100.1340	ug/L		98
6) Methacrylonitrile	9.79	67	214243	99.4304	ug/L		95
7) Isobutyl Alcohol	9.79	43	34776	262.1519	ug/L	#	80
9) Methyl methacrylate	11.94	41	416676	93.0469	ug/L		95
10) 2-Nitropropane	12.28	43	132526	72.7778	ug/L	#	83
13) Cyclohexanone	16.39	55	17498	218.2345	ug/L		92

(#) = qualifier out of range (m) = manual integration
6M146767.D A9FOOWT.M Fri Apr 28 08:06:30 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146767.D Vial: 3
Acq On : 27 Apr 2017 13:03 Operator: TMB
Sample : WG611839-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 8:06 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146767.D Vial: 3
Acq On : 27 Apr 2017 13:03 Operator: TMB
Sample : WG611839-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	75	-0.02
2	T	Acetonitrile	100.0000	116.8463	-16.8	90	0.00
3	T	3-Chloro-1-propene	100.0000	118.8927	-18.9	87	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	103.3504	-3.4	75	0.00
5	T	Ethyl Acetate	100.0000	100.1340	-0.1	73	-0.02
6	T	Methacrylonitrile	100.0000	99.4304	0.6	72	-0.01
7	T	Isobutyl Alcohol	200.0000	262.1519	-31.1	94	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.16
9	T	Methyl methacrylate	100.0000	93.0469	7.0	67	-0.02
10	T	2-Nitropropane	100.0000	72.7778	27.2	55	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	70	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	61	-0.02
13	T	Cyclohexanone	100.0000	218.2345	-118.2#	155	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146767.D A9FOOWT.M Fri Apr 28 08:06:44 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 07:16:21 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	648453	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	445927	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	243153	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.20	111	170660	25.7810 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.12%		
43) 1,2-Dichloroethane-d4	10.84	65	172526	26.4442 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.76%		
58) Toluene-d8	13.23	98	604837	26.5808 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.32%		
80) p-Bromofluorobenzene	16.63	95	240890	26.0843 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	591290	57.4313 ug/L	93
3) Chloromethane	4.03	50	585655	48.8058 ug/L	99
4) Vinyl Chloride	4.29	62	595609	50.6306 ug/L	98
5) 1,3-Butadiene	4.33	54	246841	57.0102 ug/L	90
6) Bromomethane	5.24	94	236635	46.5891 ug/L	99
7) Chloroethane	5.40	64	283762	56.0630 ug/L	86
8) Trichlorofluoromethane	5.90	101	650322	53.9373 ug/L	100
9) Diethyl ether	6.43	59	494431	98.4011 ug/L	84
10) Isoprene	6.48	67	552666	55.7284 ug/L	83
11) Acrolein	6.67	56	30603	55.5927 ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	362981	53.1833 ug/L	96
13) Acetone	6.77	43	71103	50.8131 ug/L	94
14) 1,1-Dichloroethene	7.01	61	567838	57.4388 ug/L	88
15) Tert-Butyl Alcohol	7.11	59	64096	147.6730 ug/L	94
16) Dimethyl Sulfide	7.28	62	377722	53.4704 ug/L	82
17) Iodomethane	7.53	142	281049	48.7478 ug/L	96
18) Methyl acetate	7.52	43	178275	50.7988 ug/L #	86
19) Methylene Chloride	7.79	84	386854	51.7597 ug/L	66
20) Carbon Disulfide	7.85	76	1178011	55.3677 ug/L	99
21) Acrylonitrile	7.96	53	84106	51.8697 ug/L	99
22) Methyl Tert Butyl Ether	8.00	73	833427	50.8506 ug/L	92
23) trans-1,2-Dichloroethene	8.25	96	373023	52.4281 ug/L	84
24) n-Hexane	8.33	57	488809	60.7536 ug/L	87
25) Diisopropyl ether	8.66	45	1982155	108.2184 ug/L #	93
26) Vinyl Acetate	8.82	43	378799	74.5039 ug/L #	90
27) 1,1-Dichloroethane	8.86	63	670328	56.8758 ug/L	99
28) Ethyl-Tert-Butyl ether	9.23	59	1877374	101.1599 ug/L	93
29) 2-Butanone	9.41	43	85673	48.5783 ug/L	84
30) Propionitrile	9.51	54	57187	99.4281 ug/L	99
31) 2,2-Dichloropropane	9.64	77	486422	54.2489 ug/L	80
32) cis-1,2-Dichloroethene	9.71	96	408903	52.2753 ug/L	96
33) Chloroform	9.91	83	655419	48.8154 ug/L	95
34) 1-Bromopropane	10.06	122	71034	51.2091 ug/L	98
35) Bromochloromethane	10.15	130	215137	52.2482 ug/L	100
36) Tetrahydrofuran	10.17	42	115943	99.8313 ug/L	78
38) 1,1,1-Trichloroethane	10.45	97	581587	53.2794 ug/L	92
39) Cyclohexane	10.49	56	583551	57.8117 ug/L	82
40) 1,1-Dichloropropene	10.65	75	500437	54.2340 ug/L	84
41) Tert-Amyl-Methyl ether	10.74	73	1666400	94.5704 ug/L	94
42) Carbon Tetrachloride	10.79	117	484802	56.3257 ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 07:16:21 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

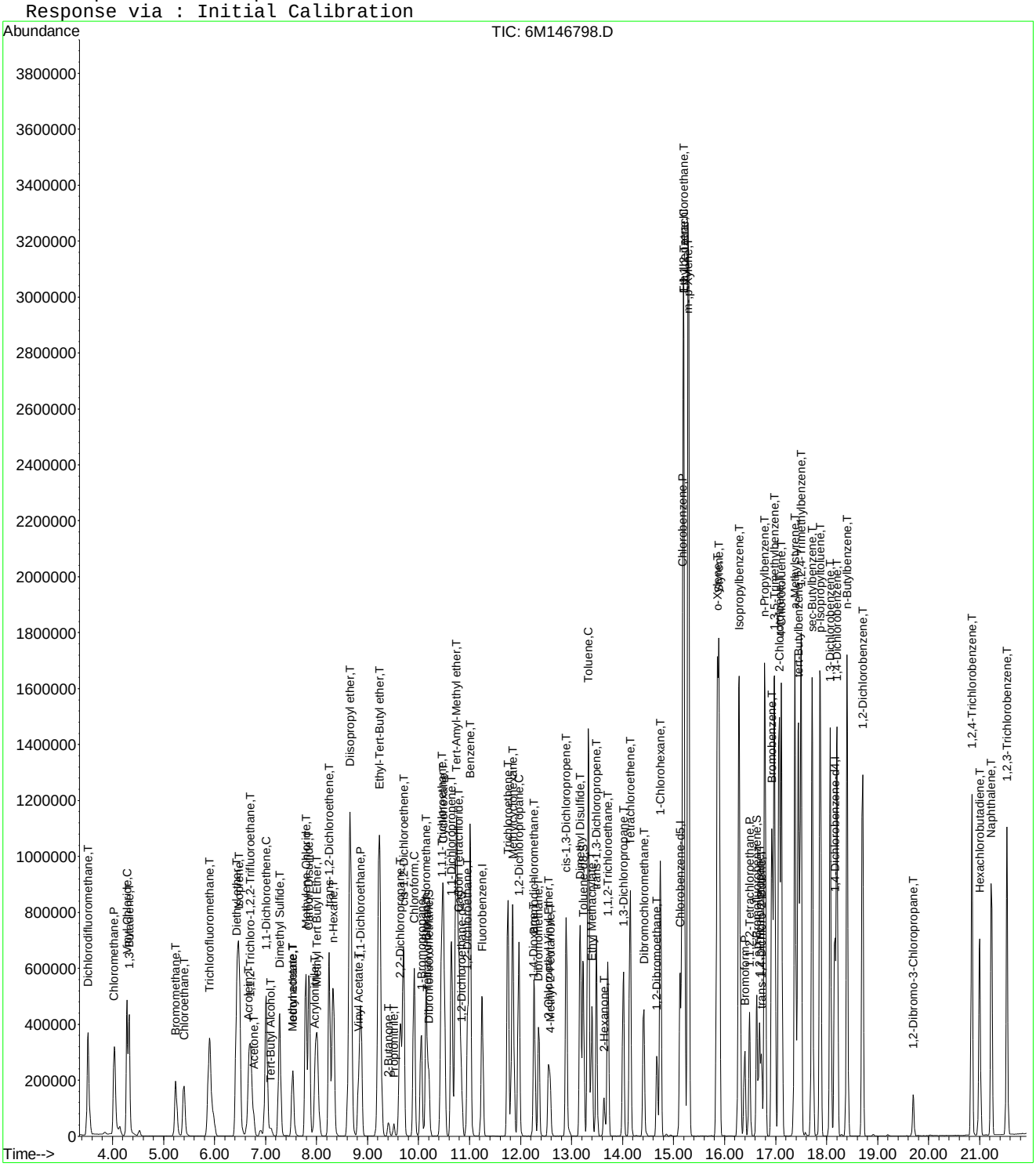
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.95	62	439994	52.6770	ug/L		91
46)	Benzene	11.01	78	1440206	51.9092	ug/L		89
47)	Trichloroethene	11.75	130	364222	48.2288	ug/L		93
48)	Methylcyclohexane	11.84	83	572574	52.4770	ug/L		86
49)	1,2-Dichloropropane	11.97	63	358661	54.7758	ug/L		94
50)	1,4-Dioxane	12.25	88	10101	212.1609	ug/L		86
51)	Bromodichloromethane	12.26	83	492326	53.2631	ug/L		99
52)	Dibromomethane	12.35	93	194432	50.4182	ug/L		100
53)	2-Chloroethyl Vinyl Ether	12.55	63	129255	50.3257	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	77936	46.2589	ug/L		86
55)	cis-1,3-Dichloropropene	12.89	75	572050	56.1996	ug/L		96
56)	Dimethyl Disulfide	13.17	79	316348	49.2629	ug/L		92
59)	Toluene	13.32	91	1483268	53.2027	ug/L		100
60)	Ethyl Methacrylate	13.40	69	350067	51.8877	ug/L		76
62)	trans-1,3-Dichloropropene	13.49	75	486839	56.6330	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	261563	49.7844	ug/L		98
64)	2-Hexanone	13.64	43	124087	49.1842	ug/L		87
65)	1,3-Dichloropropane	14.02	76	459249	52.0740	ug/L		76
66)	Tetrachloroethene	14.15	166	335334	49.6363	ug/L		92
67)	Dibromochloromethane	14.42	129	324920	50.0281	ug/L		100
68)	1,2-Dibromoethane	14.67	107	244972	48.5589	ug/L		100
69)	1-Chlorohexane	14.74	91	479707	53.2834	ug/L		83
70)	Chlorobenzene	15.17	112	980182	51.3682	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	359338	52.5856	ug/L		99
72)	Ethylbenzene	15.20	106	546063	52.8630	ug/L		99
73)	m-,p-Xylene	15.28	106	1307184	105.8710	ug/L		97
74)	o-Xylene	15.86	106	632418	53.0789	ug/L		98
75)	Styrene	15.89	104	1095774	54.7837	ug/L		100
76)	Bromoform	16.40	173	189860	47.9704	ug/L		98
77)	Isopropylbenzene	16.29	105	1609413	53.9777	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	310877	49.0902	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	86007	45.9904	ug/L	#	46
82)	trans-1,4-Dichloro-2-Buten	16.72	53	73406	54.5875	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1963590	53.3365	ug/L		99
84)	Bromobenzene	16.93	156	398210	48.1478	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1368446	52.4501	ug/L		98
86)	2-Chlorotoluene	17.07	91	1313802	53.5959	ug/L		98
87)	4-Chlorotoluene	17.11	91	1118352	51.6198	ug/L		99
88)	a-Methylstyrene	17.38	118	724295	50.2012	ug/L		99
89)	tert-Butylbenzene	17.45	134	278930	51.0218	ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	1437648	53.6539	ug/L		89
91)	sec-Butylbenzene	17.71	105	1719638	53.4472	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1431381	52.8872	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	778407	49.8369	ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	777781	49.2425	ug/L		95
95)	n-Butylbenzene	18.40	91	1375516	55.6574	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	695088	47.4783	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	53279	46.4480	ug/L		97
98)	1,2,4-Trichlorobenzene	20.85	180	483693	45.1549	ug/L		99
99)	Hexachlorobutadiene	21.00	225	186741	45.6431	ug/L		100
100)	Naphthalene	21.23	128	939127	43.7847	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	427233	41.3141	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146798.D 8260BWT.M Fri Apr 28 10:38:48 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 7:16 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



6M146798.D 8260BWT.M Fri Apr 28 10:38:49 2017 Page 3

Continuing Calibration Area and RT check

Instrument: Hpms6
Initial cal date: 5 Apr 2017 20:34
CCV date: 28 Apr 2017 6:52
CCV Filename: 6M146798.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	643185	11.26	452398	15.14	244954	18.17
CCV	648453	11.25	445927	15.13	243153	18.16

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	101	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4559	-14.9	107	0.00
3	P	Chloromethane	0.5473	0.4516	17.5	97	0.01
4	C	Vinyl Chloride	0.4535	0.4592	-1.3	103	0.01
5	T	1,3-Butadiene	0.1682	0.1903	-13.2	109	0.01
6	T	Bromomethane	0.1958	0.1825	6.8	83	0.02
7	T	Chloroethane	0.1951	0.2188	-12.1	109	0.02
8	T	Trichlorofluoromethane	0.4648	0.5014	-7.9	105	0.01
9	T	Diethyl ether	0.1937	0.1906	1.6	100	0.00
10	T	Isoprene	0.3823	0.4261	-11.5	111	0.01
11	T	Acrolein	0.0212	0.0236	-11.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2799	-6.4	107	0.01
13	T	Acetone	0.0539	0.0548	-1.6	100	0.00
14	C	1,1-Dichloroethene	0.3811	0.4378	-14.9	114	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0124	26.1#	87	-0.02
16	T	Dimethyl Sulfide	0.2723	0.2913	-6.9	106	0.00
17	T	Iodomethane	0.1863	0.2167	-16.3	102	0.00
18	T	Methyl acetate	0.1353	0.1375	-1.6	103	0.00
19	T	Methylene Chloride	0.2882	0.2983	-3.5	106	0.00
20	T	Carbon Disulfide	0.8203	0.9083	-10.7	109	0.00
21	T	Acrylonitrile	0.0625	0.0649	-3.7	99	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6426	-1.7	103	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2876	-4.9	105	0.00
24	T	n-Hexane	0.3102	0.3769	-21.5#	122	0.00
25	T	Diisopropyl ether	0.7062	0.7642	-8.2	111	0.00
26	T	Vinyl Acetate	0.1960	0.2921	-49.0#	177	0.00
27	P	1,1-Dichloroethane	0.4544	0.5169	-13.8	115	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7238	-1.2	104	0.00
29	T	2-Butanone	0.0680	0.0661	2.8	101	0.00
30	T	Propionitrile	0.0222	0.0221	0.5	98	0.00
31	T	2,2-Dichloropropane	0.3457	0.3751	-8.5	137	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3153	-4.5	106	0.00
33	C	Chloroform	0.5176	0.5054	2.4	107	0.00
34		1-Bromopropane	0.0535	0.0548	-2.4	96	0.00
35	T	Bromochloromethane	0.1588	0.1659	-4.5	100	0.00
36	T	Tetrahydrofuran	0.0448	0.0447	0.2	105	0.00
37	S	Dibromofluoromethane	0.2552	0.2632	-3.1	102	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4484	-6.6	107	0.00
39	T	Cyclohexane	0.3892	0.4500	-15.6	114	0.00
40	T	1,1-Dichloropropene	0.3558	0.3859	-8.5	109	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6424	5.4	97	0.00
42	T	Carbon Tetrachloride	0.3318	0.3738	-12.7	103	-0.02
43	S	1,2-Dichloroethane-d4	0.2515	0.2661	-5.8	106	0.00
44		Heptane	0.0000	0.0000	0.0	102	0.00
45	T	1,2-Dichloroethane	0.3220	0.3393	-5.4	107	0.00
46	T	Benzene	1.0697	1.1105	-3.8	109	0.00
47	T	Trichloroethene	0.2912	0.2808	3.5	94	0.00
48	T	Methylcyclohexane	0.4207	0.4415	-5.0	105	0.00
49	C	1,2-Dichloropropane	0.2524	0.2766	-9.6	109	0.00
50	T	1,4-Dioxane	0.0018	0.0019	-6.0	103	0.00
51	T	Bromodichloromethane	0.3564	0.3796	-6.5	104	0.00
52	T	Dibromomethane	0.1487	0.1499	-0.8	99	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.0997	-0.6	95	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0601	7.5	95	0.00

(#) = Out of Range
6M146798.D 8260BWT.M Fri Apr 28 10:39:22 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4411	-12.4	109	0.00
56	T	Dimethyl Disulfide	0.2476	0.2439	1.5	100	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	99	0.00
58	S	Toluene-d8	1.2757	1.3564	-6.3	106	0.00
59	C	Toluene	1.5630	1.6631	-6.4	107	0.00
60	T	Ethyl Methacrylate	0.3782	0.3925	-3.8	100	0.00
61		Paraldehyde	0.0000	0.0000	0.0	106	0.08
62	T	trans-1,3-Dichloropropene	0.4819	0.5459	-13.3	108	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2933	0.4	97	0.00
64	T	2-Hexanone	0.1414	0.1391	1.6	98	0.00
65	T	1,3-Dichloropropane	0.4944	0.5149	-4.1	102	0.00
66	T	Tetrachloroethene	0.3787	0.3760	0.7	96	0.00
67	T	Dibromochloromethane	0.3641	0.3643	-0.1	94	0.00
68	T	1,2-Dibromoethane	0.2828	0.2747	2.9	95	0.00
69	T	1-Chlorohexane	0.5047	0.5379	-6.6	103	0.00
70	P	Chlorobenzene	1.0698	1.0990	-2.7	102	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.4029	-5.2	99	0.00
72	C	Ethylbenzene	0.5791	0.6123	-5.7	104	0.00
73	T	m-,p-Xylene	0.6922	0.7329	-5.9	104	0.00
74	T	o-Xylene	0.6680	0.7091	-6.2	103	0.00
75	T	Styrene	1.1214	1.2287	-9.6	104	-0.02
76	P	Bromoform	0.2219	0.2129	4.1	88	0.00
77	T	Isopropylbenzene	1.6716	1.8046	-8.0	105	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	99	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6393	1.8	105	0.00
80	S	p-Bromofluorobenzene	0.9495	0.9907	-4.3	105	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1769	8.0	92	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1510	-9.2	106	0.00
83	T	n-Propylbenzene	3.7852	4.0378	-6.7	107	0.00
84	T	Bromobenzene	0.8504	0.8188	3.7	97	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8140	-4.9	106	0.00
86	T	2-Chlorotoluene	2.5203	2.7016	-7.2	112	0.00
87	T	4-Chlorotoluene	2.2275	2.2997	-3.2	104	0.00
88	T	a-Methylstyrene	1.4834	1.4894	-0.4	101	0.00
89	T	tert-Butylbenzene	0.5621	0.5736	-2.0	101	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.9563	-7.3	107	0.00
91	T	sec-Butylbenzene	3.3081	3.5361	-6.9	107	0.00
92	T	p-Isopropyltoluene	2.7827	2.9434	-5.8	105	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.6006	0.3	101	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5994	1.5	101	0.00
95	T	n-Butylbenzene	2.5410	2.8285	-11.3	111	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4293	5.0	96	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1096	7.1	91	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	0.9946	9.7	91	0.00
99	T	Hexachlorobutadiene	0.4207	0.3840	8.7	93	0.00
100	T	Naphthalene	2.2053	1.9311	12.4	86	-0.02
101	T	1,2,3-Trichlorobenzene	1.0632	0.8785	17.4	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146798.D 8260BWT.M Fri Apr 28 10:39:23 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	101	0.00
2	T	Dichlorodifluoromethane	50.0000	57.4313	-14.9	107	0.00
3	P	Chloromethane	50.0000	48.8058	2.4	97	0.01
4	C	Vinyl Chloride	50.0000	50.6306	-1.3	103	0.01
5	T	1,3-Butadiene	50.0000	57.0102	-14.0	109	0.01
6	T	Bromomethane	50.0000	46.5891	6.8	83	0.02
7	T	Chloroethane	50.0000	56.0630	-12.1	109	0.02
8	T	Trichlorofluoromethane	50.0000	53.9373	-7.9	105	0.01
9	T	Diethyl ether	100.0000	98.4011	1.6	100	0.00
10	T	Isoprene	50.0000	55.7284	-11.5	111	0.01
11	T	Acrolein	50.0000	55.5927	-11.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	53.1833	-6.4	107	0.01
13	T	Acetone	50.0000	50.8131	-1.6	100	0.00
14	C	1,1-Dichloroethene	50.0000	57.4388	-14.9	114	0.00
15	T	Tert-Butyl Alcohol	200.0000	147.6730	26.2#	87	-0.02
16	T	Dimethyl Sulfide	50.0000	53.4704	-6.9	106	0.00
17	T	Iodomethane	50.0000	48.7478	2.5	102	0.00
18	T	Methyl acetate	50.0000	50.7988	-1.6	103	0.00
19	T	Methylene Chloride	50.0000	51.7597	-3.5	106	0.00
20	T	Carbon Disulfide	50.0000	55.3677	-10.7	109	0.00
21	T	Acrylonitrile	50.0000	51.8697	-3.7	99	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.8506	-1.7	103	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	52.4282	-4.9	105	0.00
24	T	n-Hexane	50.0000	60.7536	-21.5#	122	0.00
25	T	Diisopropyl ether	100.0000	108.2184	-8.2	111	0.00
26	T	Vinyl Acetate	50.0000	74.5039	-49.0#	177	0.00
27	P	1,1-Dichloroethane	50.0000	56.8758	-13.8	115	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	101.1599	-1.2	104	0.00
29	T	2-Butanone	50.0000	48.5783	2.8	101	0.00
30	T	Propionitrile	100.0000	99.4281	0.6	98	0.00
31	T	2,2-Dichloropropane	50.0000	54.2489	-8.5	137	0.00
32	T	cis-1,2-Dichloroethene	50.0000	52.2753	-4.6	106	0.00
33	C	Chloroform	50.0000	48.8154	2.4	107	0.00
34		1-Bromopropane	50.0000	51.2092	-2.4	96	0.00
35	T	Bromochloromethane	50.0000	52.2482	-4.5	100	0.00
36	T	Tetrahydrofuran	100.0000	99.8313	0.2	105	0.00
37	S	Dibromofluoromethane	25.0000	25.7810	-3.1	102	0.00
38	T	1,1,1-Trichloroethane	50.0000	53.2794	-6.6	107	0.00
39	T	Cyclohexane	50.0000	57.8117	-15.6	114	0.00
40	T	1,1-Dichloropropene	50.0000	54.2340	-8.5	109	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.5704	5.4	97	0.00
42	T	Carbon Tetrachloride	50.0000	56.3257	-12.7	103	-0.02
43	S	1,2-Dichloroethane-d4	25.0000	26.4442	-5.8	106	0.00
44		Heptane	-1.0000	0.0000	0.0	102	0.00
45	T	1,2-Dichloroethane	50.0000	52.6770	-5.4	107	0.00
46	T	Benzene	50.0000	51.9092	-3.8	109	0.00
47	T	Trichloroethene	50.0000	48.2288	3.5	94	0.00
48	T	Methylcyclohexane	50.0000	52.4770	-5.0	105	0.00
49	C	1,2-Dichloropropane	50.0000	54.7758	-9.6	109	0.00
50	T	1,4-Dioxane	200.0000	212.1609	-6.1	103	0.00
51	T	Bromodichloromethane	50.0000	53.2631	-6.5	104	0.00
52	T	Dibromomethane	50.0000	50.4182	-0.8	99	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	50.3257	-0.7	95	0.00
54	T	4-Methyl-2-Pentanone	50.0000	46.2589	7.5	95	0.00

(#) = Out of Range
6M146798.D 8260BWT.M Fri Apr 28 10:39:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	56.1996	-12.4	109	0.00
56	T	Dimethyl Disulfide	50.0000	49.2629	1.5	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
58	S	Toluene-d8	25.0000	26.5808	-6.3	106	0.00
59	C	Toluene	50.0000	53.2027	-6.4	107	0.00
60	T	Ethyl Methacrylate	50.0000	51.8877	-3.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	106	0.08
62	T	trans-1,3-Dichloropropene	50.0000	56.6330	-13.3	108	0.00
63	T	1,1,2-Trichloroethane	50.0000	49.7844	0.4	97	0.00
64	T	2-Hexanone	50.0000	49.1842	1.6	98	0.00
65	T	1,3-Dichloropropane	50.0000	52.0740	-4.1	102	0.00
66	T	Tetrachloroethene	50.0000	49.6363	0.7	96	0.00
67	T	Dibromochloromethane	50.0000	50.0281	-0.1	94	0.00
68	T	1,2-Dibromoethane	50.0000	48.5589	2.9	95	0.00
69	T	1-Chlorohexane	50.0000	53.2834	-6.6	103	0.00
70	P	Chlorobenzene	50.0000	51.3682	-2.7	102	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.5856	-5.2	99	0.00
72	C	Ethylbenzene	50.0000	52.8630	-5.7	104	0.00
73	T	m-,p-Xylene	100.0000	105.8709	-5.9	104	0.00
74	T	o-Xylene	50.0000	53.0789	-6.2	103	0.00
75	T	Styrene	50.0000	54.7837	-9.6	104	-0.02
76	P	Bromoform	50.0000	47.9704	4.1	88	0.00
77	T	Isopropylbenzene	50.0000	53.9777	-8.0	105	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	49.0902	1.8	105	0.00
80	S	p-Bromofluorobenzene	25.0000	26.0843	-4.3	105	0.00
81	T	1,2,3-Trichloropropane	50.0000	45.9904	8.0	92	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	54.5875	-9.2	106	0.00
83	T	n-Propylbenzene	50.0000	53.3365	-6.7	107	0.00
84	T	Bromobenzene	50.0000	48.1478	3.7	97	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	52.4501	-4.9	106	0.00
86	T	2-Chlorotoluene	50.0000	53.5959	-7.2	112	0.00
87	T	4-Chlorotoluene	50.0000	51.6198	-3.2	104	0.00
88	T	a-Methylstyrene	50.0000	50.2012	-0.4	101	0.00
89	T	tert-Butylbenzene	50.0000	51.0217	-2.0	101	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	53.6539	-7.3	107	0.00
91	T	sec-Butylbenzene	50.0000	53.4472	-6.9	107	0.00
92	T	p-Isopropyltoluene	50.0000	52.8872	-5.8	105	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.8369	0.3	101	0.00
94	T	1,4-Dichlorobenzene	50.0000	49.2424	1.5	101	0.00
95	T	n-Butylbenzene	50.0000	55.6574	-11.3	111	0.00
96	T	1,2-Dichlorobenzene	50.0000	47.4783	5.0	96	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	46.4480	7.1	91	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	45.1549	9.7	91	0.00
99	T	Hexachlorobutadiene	50.0000	45.6431	8.7	93	0.00
100	T	Naphthalene	50.0000	43.7847	12.4	86	-0.02
101	T	1,2,3-Trichlorobenzene	50.0000	41.3141	17.4	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146798.D 8260BWT.M Fri Apr 28 10:39:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14:33 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

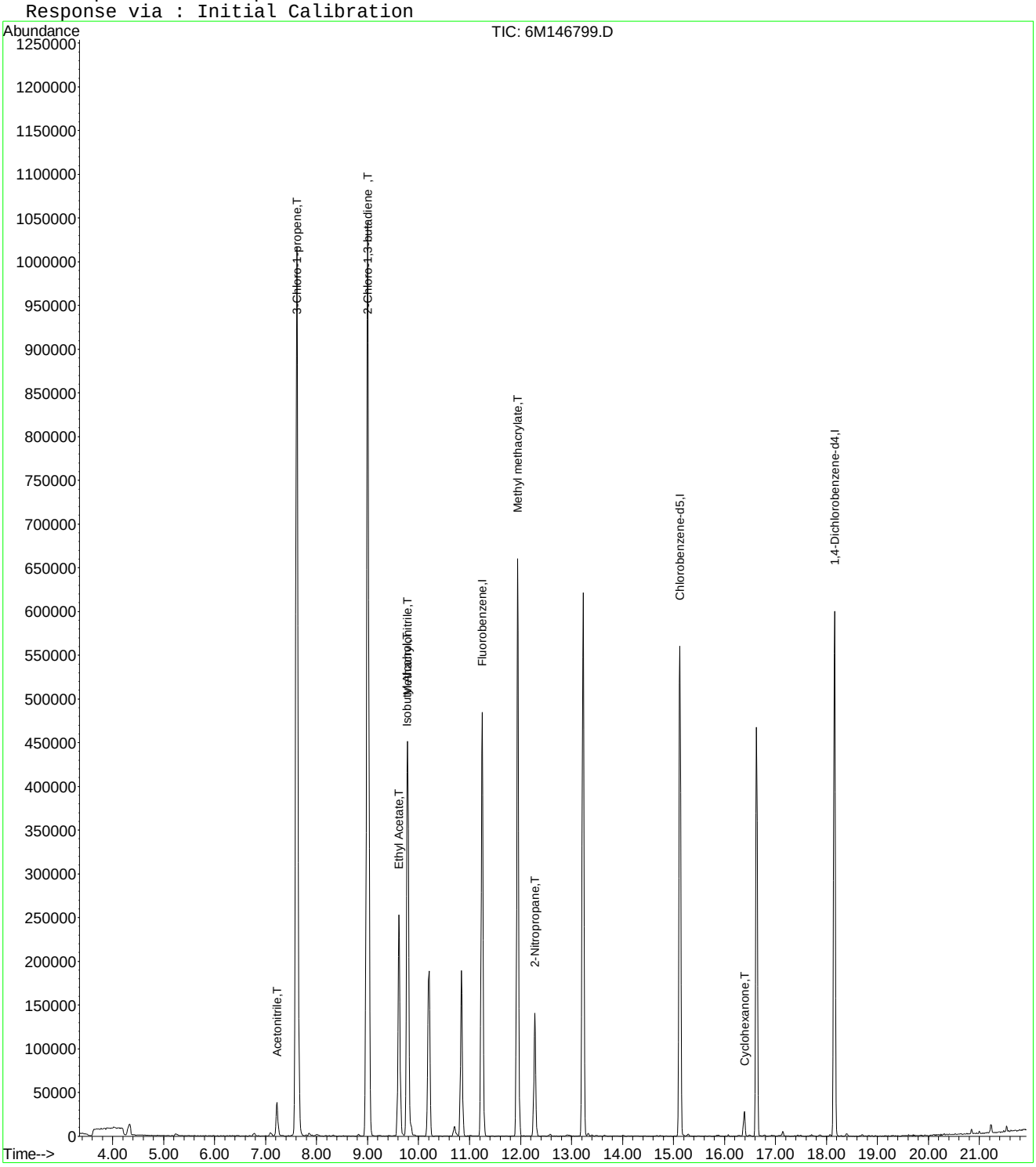
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	619428	25.00	ug/L		-0.02
11) Chlorobenzene-d5	15.13	117	419364	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	209429	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	54992	124.1817	ug/L		92
3) 3-Chloro-1-propene	7.61	41	1012527	136.3452	ug/L		95
4) 2-Chloro-1,3-butadiene	9.00	53	982561	107.2011	ug/L		95
5) Ethyl Acetate	9.61	43	415654	104.6306	ug/L		99
6) Methacrylonitrile	9.79	67	215623	103.0982	ug/L		95
7) Isobutyl Alcohol	9.78	43	35075	272.4046	ug/L	#	82
9) Methyl methacrylate	11.94	41	414687	95.4041	ug/L		94
10) 2-Nitropropane	12.28	43	139626	78.9965	ug/L		95
13) Cyclohexanone	16.39	55	17972	226.8037	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146799.D A9FOOWT.M Sat Apr 29 13:40:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



6M146799.D A9FOOWT.M Sat Apr 29 13:40:15 2017 Page 2

Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	73	-0.02
2	T	Acetonitrile	100.0000	124.1817	-24.2	93	0.00
3	T	3-Chloro-1-propene	100.0000	136.3452	-36.3	97	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.2011	-7.2	76	0.00
5	T	Ethyl Acetate	100.0000	104.6306	-4.6	74	-0.02
6	T	Methacrylonitrile	100.0000	103.0982	-3.1	72	-0.01
7	T	Isobutyl Alcohol	200.0000	272.4046	-36.2	95	-0.02
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.15
9	T	Methyl methacrylate	100.0000	95.4041	4.6	66	-0.02
10	T	2-Nitropropane	100.0000	78.9965	21.0	58	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	68	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	60	-0.02
13	T	Cyclohexanone	100.0000	226.8037	-126.8#	160	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146799.D A9FOOWT.M Sat Apr 29 13:40:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	674511	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	467302	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	245649	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	175428	25.4774	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.92%				
43) 1,2-Dichloroethane-d4	10.84	65	180868	26.6518	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.60%				
58) Toluene-d8	13.23	98	633032	26.5474	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%				
80) p-Bromofluorobenzene	16.63	95	253083	27.1261	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.52%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	576101	53.7943	ug/L		93
3) Chloromethane	4.03	50	631330	50.6084	ug/L		97
4) Vinyl Chloride	4.28	62	589398	48.1670	ug/L		98
5) 1,3-Butadiene	4.32	54	251427	55.7184	ug/L		92
6) Bromomethane	5.24	94	250215	47.3596	ug/L		99
7) Chloroethane	5.40	64	290230	55.1257	ug/L		87
8) Trichlorofluoromethane	5.90	101	645011	51.4301	ug/L		99
9) Diethyl ether	6.43	59	567587	108.5966	ug/L		85
10) Isoprene	6.47	67	577802	56.0121	ug/L		83
11) Acrolein	6.67	56	30675	53.5708	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	366384	51.6080	ug/L		97
13) Acetone	6.77	43	80917	55.5926	ug/L		90
14) 1,1-Dichloroethene	7.01	61	578268	56.2341	ug/L		88
15) Tert-Butyl Alcohol	7.11	59	86431	191.4384	ug/L		92
16) Dimethyl Sulfide	7.28	62	411573	56.0115	ug/L		80
17) Iodomethane	7.53	142	267121	44.6097	ug/L		96
18) Methyl acetate	7.53	43	223477	61.2188	ug/L	#	86
19) Methylene Chloride	7.79	84	398606	51.2718	ug/L		65
20) Carbon Disulfide	7.85	76	1234647	55.7879	ug/L		99
21) Acrylonitrile	7.96	53	95460	56.5975	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	901569	52.8831	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	378554	51.1501	ug/L		84
24) n-Hexane	8.32	57	525000	62.7309	ug/L		87
25) Diisopropyl ether	8.66	45	2165836	113.6786	ug/L	#	93
26) Vinyl Acetate	8.82	43	376570	71.2042	ug/L	#	90
27) 1,1-Dichloroethane	8.86	63	681369	55.5792	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	2082037	107.8538	ug/L		93
29) 2-Butanone	9.41	43	96865	52.8025	ug/L		83
30) Propionitrile	9.52	54	65817	110.0119	ug/L		100
31) 2,2-Dichloropropane	9.65	77	513892	55.0984	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	415446	51.0600	ug/L		96
33) Chloroform	9.91	83	663582	47.5140	ug/L		95
34) 1-Bromopropane	10.06	122	72813	50.4638	ug/L		100
35) Bromochloromethane	10.15	130	216616	50.5751	ug/L		99
36) Tetrahydrofuran	10.17	42	133785	110.7437	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	586013	51.6109	ug/L		92
39) Cyclohexane	10.49	56	619444	58.9968	ug/L		82
40) 1,1-Dichloropropene	10.65	75	508046	52.9316	ug/L		84
41) Tert-Amyl-Methyl ether	10.74	73	1866535	101.8361	ug/L		94
42) Carbon Tetrachloride	10.79	117	466290	52.0821	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

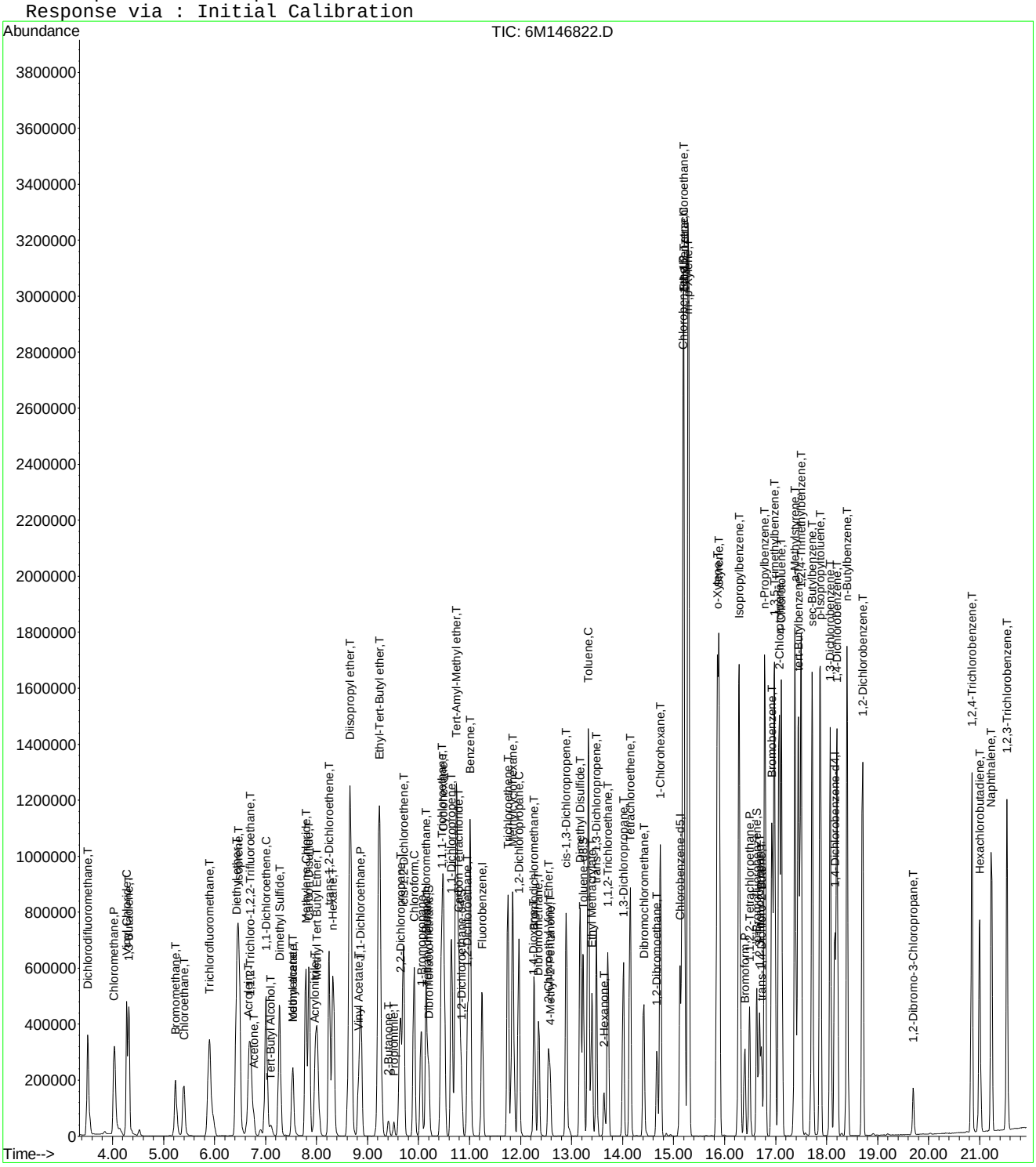
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	453777	52.2284	ug/L		91
46)	Benzene	11.01	78	1451388	50.2913	ug/L		89
47)	Trichloroethene	11.75	130	370184	47.1246	ug/L		93
48)	Methylcyclohexane	11.84	83	607083	53.4903	ug/L		86
49)	1,2-Dichloropropane	11.97	63	371520	54.5477	ug/L		95
50)	1,4-Dioxane	12.25	88	11005	222.2187	ug/L		92
51)	Bromodichloromethane	12.26	83	500450	52.0504	ug/L		99
52)	Dibromomethane	12.35	93	201321	50.1878	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	160509	60.0802	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	88146	50.2978	ug/L		87
55)	cis-1,3-Dichloropropene	12.90	75	584158	55.1720	ug/L		97
56)	Dimethyl Disulfide	13.17	79	342356	51.2534	ug/L		93
59)	Toluene	13.32	91	1497061	51.2413	ug/L		100
60)	Ethyl Methacrylate	13.40	69	387220	54.7693	ug/L		75
62)	trans-1,3-Dichloropropene	13.49	75	505767	56.1437	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	278473	50.5786	ug/L		99
64)	2-Hexanone	13.64	43	139331	52.7004	ug/L		86
65)	1,3-Dichloropropane	14.02	76	484050	52.3756	ug/L		75
66)	Tetrachloroethene	14.15	166	340915	48.1542	ug/L		92
67)	Dibromochloromethane	14.42	129	332881	48.9094	ug/L		99
68)	1,2-Dibromoethane	14.67	107	261538	49.4712	ug/L		100
69)	1-Chlorohexane	14.74	91	512571	54.3296	ug/L		82
70)	Chlorobenzene	15.18	112	990139	49.5165	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	358393	50.0483	ug/L		99
72)	Ethylbenzene	15.20	106	547394	50.5679	ug/L		99
73)	m-,p-Xylene	15.28	106	1312947	101.4737	ug/L		98
74)	o-Xylene	15.86	106	640930	51.3327	ug/L		98
75)	Styrene	15.89	104	1106798	52.8038	ug/L		99
76)	Bromoform	16.40	173	193478	46.6484	ug/L		98
77)	Isopropylbenzene	16.29	105	1633970	52.2947	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.49	83	325050	50.8067	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	92582	49.0032	ug/L	#	42
82)	trans-1,4-Dichloro-2-Buten	16.72	53	78763	57.9760	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1993012	53.5856	ug/L		99
84)	Bromobenzene	16.93	156	402556	48.1787	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1389254	52.7066	ug/L		99
86)	2-Chlorotoluene	17.07	91	1321267	53.3528	ug/L		98
87)	4-Chlorotoluene	17.11	91	1138393	52.0110	ug/L		99
88)	a-Methylstyrene	17.38	118	754151	51.7394	ug/L		99
89)	tert-Butylbenzene	17.45	134	283504	51.3315	ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	1446503	53.4359	ug/L		88
91)	sec-Butylbenzene	17.72	105	1730970	53.2528	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1442137	52.7432	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	773999	49.0512	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	769587	48.2286	ug/L		96
95)	n-Butylbenzene	18.40	91	1391368	55.7268	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	711411	48.0995	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	59865	51.6593	ug/L		95
98)	1,2,4-Trichlorobenzene	20.85	180	511851	47.2981	ug/L		99
99)	Hexachlorobutadiene	21.00	225	203742	49.2925	ug/L		99
100)	Naphthalene	21.23	128	1040596	48.0225	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	462949	44.3131	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4270	-7.6	104	0.00
3	P	Chloromethane	0.5473	0.4680	14.5	105	0.01
4	C	Vinyl Chloride	0.4535	0.4369	3.7	102	0.00
5	T	1,3-Butadiene	0.1682	0.1864	-10.8	111	0.00
6	T	Bromomethane	0.1958	0.1855	5.3	88	0.02
7	T	Chloroethane	0.1951	0.2151	-10.2	111	0.02
8	T	Trichlorofluoromethane	0.4648	0.4781	-2.9	104	0.01
9	T	Diethyl ether	0.1937	0.2104	-8.6	115	0.00
10	T	Isoprene	0.3823	0.4283	-12.0	116	0.00
11	T	Acrolein	0.0212	0.0227	-7.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2716	-3.2	108	0.01
13	T	Acetone	0.0539	0.0600	-11.2	113	0.00
14	C	1,1-Dichloroethene	0.3811	0.4287	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0160	4.2	117	-0.02
16	T	Dimethyl Sulfide	0.2723	0.3051	-12.0	116	0.00
17	T	Iodomethane	0.1863	0.1980	-6.3	97	0.00
18	T	Methyl acetate	0.1353	0.1657	-22.4#	130	0.00
19	T	Methylene Chloride	0.2882	0.2955	-2.5	109	0.00
20	T	Carbon Disulfide	0.8203	0.9152	-11.6	114	0.00
21	T	Acrylonitrile	0.0625	0.0708	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6683	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2806	-2.3	107	0.00
24	T	n-Hexane	0.3102	0.3892	-25.5#	131	0.00
25	T	Diisopropyl ether	0.7062	0.8027	-13.7	121	0.00
26	T	Vinyl Acetate	0.1960	0.2791	-42.4#	176	0.00
27	P	1,1-Dichloroethane	0.4544	0.5051	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7717	-7.9	115	0.00
29	T	2-Butanone	0.0680	0.0718	-5.6	114	0.00
30	T	Propionitrile	0.0222	0.0244	-10.0	113	0.00
31	T	2,2-Dichloropropane	0.3457	0.3809	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3080	-2.1	107	0.00
33	C	Chloroform	0.5176	0.4919	5.0	108	0.00
34		1-Bromopropane	0.0535	0.0540	-0.9	99	0.00
35	T	Bromochloromethane	0.1588	0.1606	-1.1	101	0.00
36	T	Tetrahydrofuran	0.0448	0.0496	-10.7	121	0.00
37	S	Dibromofluoromethane	0.2552	0.2601	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4344	-3.2	107	0.00
39	T	Cyclohexane	0.3892	0.4592	-18.0	121	0.00
40	T	1,1-Dichloropropene	0.3558	0.3766	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6918	-1.8	108	0.00
42	T	Carbon Tetrachloride	0.3318	0.3457	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	0.2515	0.2682	-6.6	111	0.00
44		Heptane	0.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	0.3220	0.3364	-4.5	110	0.00
46	T	Benzene	1.0697	1.0759	-0.6	110	0.00
47	T	Trichloroethene	0.2912	0.2744	5.7	95	0.00
48	T	Methylcyclohexane	0.4207	0.4500	-7.0	112	0.00
49	C	1,2-Dichloropropane	0.2524	0.2754	-9.1	113	0.00
50	T	1,4-Dioxane	0.0018	0.0020	-10.9	112	0.00
51	T	Bromodichloromethane	0.3564	0.3710	-4.1	105	0.00
52	T	Dibromomethane	0.1487	0.1492	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.1190	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0653	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:31 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4330	-10.3	111	0.00
56	T	Dimethyl Disulfide	0.2476	0.2538	-2.5	108	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	103	0.00
58	S	Toluene-d8	1.2757	1.3546	-6.2	111	0.00
59	C	Toluene	1.5630	1.6018	-2.5	108	0.00
60	T	Ethyl Methacrylate	0.3782	0.4143	-9.5	111	0.00
61		Paraldehyde	0.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	0.4819	0.5412	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2980	-1.2	103	0.00
64	T	2-Hexanone	0.1414	0.1491	-5.4	110	0.00
65	T	1,3-Dichloropropane	0.4944	0.5179	-4.8	108	0.00
66	T	Tetrachloroethene	0.3787	0.3648	3.7	98	0.00
67	T	Dibromochloromethane	0.3641	0.3562	2.2	97	0.00
68	T	1,2-Dibromoethane	0.2828	0.2798	1.1	101	0.00
69	T	1-Chlorohexane	0.5047	0.5484	-8.7	110	0.00
70	P	Chlorobenzene	1.0698	1.0594	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3835	-0.1	99	0.00
72	C	Ethylbenzene	0.5791	0.5857	-1.1	104	0.00
73	T	m-,p-Xylene	0.6922	0.7024	-1.5	104	0.00
74	T	o-Xylene	0.6680	0.6858	-2.7	104	0.00
75	T	Styrene	1.1214	1.1842	-5.6	105	-0.02
76	P	Bromoform	0.2219	0.2070	6.7	90	0.00
77	T	Isopropylbenzene	1.6716	1.7483	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6616	-1.6	110	0.00
80	S	p-Bromofluorobenzene	0.9495	1.0303	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1884	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1603	-16.0	113	0.00
83	T	n-Propylbenzene	3.7852	4.0566	-7.2	109	0.00
84	T	Bromobenzene	0.8504	0.8194	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8277	-5.4	107	0.00
86	T	2-Chlorotoluene	2.5203	2.6893	-6.7	113	0.00
87	T	4-Chlorotoluene	2.2275	2.3171	-4.0	106	0.00
88	T	a-Methylstyrene	1.4834	1.5350	-3.5	105	0.00
89	T	tert-Butylbenzene	0.5621	0.5770	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.9442	-6.9	108	0.00
91	T	sec-Butylbenzene	3.3081	3.5233	-6.5	108	0.00
92	T	p-Isopropyltoluene	2.7827	2.9354	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.5754	1.9	100	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5664	3.5	100	0.00
95	T	n-Butylbenzene	2.5410	2.8320	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4480	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1219	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	1.0418	5.4	96	0.00
99	T	Hexachlorobutadiene	0.4207	0.4147	1.4	102	0.00
100	T	Naphthalene	2.2053	2.1181	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	1.0632	0.9423	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:32 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	53.7943	-7.6	104	0.00
3	P	Chloromethane	50.0000	50.6084	-1.2	105	0.01
4	C	Vinyl Chloride	50.0000	48.1670	3.7	102	0.00
5	T	1,3-Butadiene	50.0000	55.7184	-11.4	111	0.00
6	T	Bromomethane	50.0000	47.3596	5.3	88	0.02
7	T	Chloroethane	50.0000	55.1257	-10.3	111	0.02
8	T	Trichlorofluoromethane	50.0000	51.4301	-2.9	104	0.01
9	T	Diethyl ether	100.0000	108.5966	-8.6	115	0.00
10	T	Isoprene	50.0000	56.0121	-12.0	116	0.00
11	T	Acrolein	50.0000	53.5708	-7.1	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.6080	-3.2	108	0.01
13	T	Acetone	50.0000	55.5926	-11.2	113	0.00
14	C	1,1-Dichloroethene	50.0000	56.2341	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	200.0000	191.4384	4.3	117	-0.02
16	T	Dimethyl Sulfide	50.0000	56.0115	-12.0	116	0.00
17	T	Iodomethane	50.0000	44.6097	10.8	97	0.00
18	T	Methyl acetate	50.0000	61.2188	-22.4#	130	0.00
19	T	Methylene Chloride	50.0000	51.2718	-2.5	109	0.00
20	T	Carbon Disulfide	50.0000	55.7879	-11.6	114	0.00
21	T	Acrylonitrile	50.0000	56.5975	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	50.0000	52.8831	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	51.1501	-2.3	107	0.00
24	T	n-Hexane	50.0000	62.7309	-25.5#	131	0.00
25	T	Diisopropyl ether	100.0000	113.6786	-13.7	121	0.00
26	T	Vinyl Acetate	50.0000	71.2042	-42.4#	176	0.00
27	P	1,1-Dichloroethane	50.0000	55.5792	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	107.8538	-7.9	115	0.00
29	T	2-Butanone	50.0000	52.8025	-5.6	114	0.00
30	T	Propionitrile	100.0000	110.0119	-10.0	113	0.00
31	T	2,2-Dichloropropane	50.0000	55.0984	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	50.0000	51.0600	-2.1	107	0.00
33	C	Chloroform	50.0000	47.5140	5.0	108	0.00
34		1-Bromopropane	50.0000	50.4638	-0.9	99	0.00
35	T	Bromochloromethane	50.0000	50.5751	-1.2	101	0.00
36	T	Tetrahydrofuran	100.0000	110.7437	-10.7	121	0.00
37	S	Dibromofluoromethane	25.0000	25.4775	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	50.0000	51.6109	-3.2	107	0.00
39	T	Cyclohexane	50.0000	58.9968	-18.0	121	0.00
40	T	1,1-Dichloropropene	50.0000	52.9316	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	101.8361	-1.8	108	0.00
42	T	Carbon Tetrachloride	50.0000	52.0821	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	25.0000	26.6518	-6.6	111	0.00
44		Heptane	-1.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	50.0000	52.2283	-4.5	110	0.00
46	T	Benzene	50.0000	50.2913	-0.6	110	0.00
47	T	Trichloroethene	50.0000	47.1245	5.8	95	0.00
48	T	Methylcyclohexane	50.0000	53.4903	-7.0	112	0.00
49	C	1,2-Dichloropropane	50.0000	54.5477	-9.1	113	0.00
50	T	1,4-Dioxane	200.0000	222.2187	-11.1	112	0.00
51	T	Bromodichloromethane	50.0000	52.0504	-4.1	105	0.00
52	T	Dibromomethane	50.0000	50.1878	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	60.0802	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	50.0000	50.2978	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	55.1720	-10.3	111	0.00
56	T	Dimethyl Disulfide	50.0000	51.2534	-2.5	108	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	103	0.00
58	S	Toluene-d8	25.0000	26.5474	-6.2	111	0.00
59	C	Toluene	50.0000	51.2413	-2.5	108	0.00
60	T	Ethyl Methacrylate	50.0000	54.7693	-9.5	111	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	50.0000	56.1437	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	50.0000	50.5786	-1.2	103	0.00
64	T	2-Hexanone	50.0000	52.7004	-5.4	110	0.00
65	T	1,3-Dichloropropane	50.0000	52.3756	-4.8	108	0.00
66	T	Tetrachloroethene	50.0000	48.1542	3.7	98	0.00
67	T	Dibromochloromethane	50.0000	48.9094	2.2	97	0.00
68	T	1,2-Dibromoethane	50.0000	49.4712	1.1	101	0.00
69	T	1-Chlorohexane	50.0000	54.3296	-8.7	110	0.00
70	P	Chlorobenzene	50.0000	49.5164	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.0483	-0.1	99	0.00
72	C	Ethylbenzene	50.0000	50.5679	-1.1	104	0.00
73	T	m-,p-Xylene	100.0000	101.4737	-1.5	104	0.00
74	T	o-Xylene	50.0000	51.3327	-2.7	104	0.00
75	T	Styrene	50.0000	52.8038	-5.6	105	-0.02
76	P	Bromoform	50.0000	46.6484	6.7	90	0.00
77	T	Isopropylbenzene	50.0000	52.2947	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	50.8067	-1.6	110	0.00
80	S	p-Bromofluorobenzene	25.0000	27.1261	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	50.0000	49.0032	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	57.9760	-16.0	113	0.00
83	T	n-Propylbenzene	50.0000	53.5856	-7.2	109	0.00
84	T	Bromobenzene	50.0000	48.1787	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	52.7066	-5.4	107	0.00
86	T	2-Chlorotoluene	50.0000	53.3528	-6.7	113	0.00
87	T	4-Chlorotoluene	50.0000	52.0110	-4.0	106	0.00
88	T	a-Methylstyrene	50.0000	51.7394	-3.5	105	0.00
89	T	tert-Butylbenzene	50.0000	51.3315	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	53.4359	-6.9	108	0.00
91	T	sec-Butylbenzene	50.0000	53.2528	-6.5	108	0.00
92	T	p-Isopropyltoluene	50.0000	52.7432	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.0512	1.9	100	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.2286	3.5	100	0.00
95	T	n-Butylbenzene	50.0000	55.7268	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.0995	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	51.6593	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	47.2981	5.4	96	0.00
99	T	Hexachlorobutadiene	50.0000	49.2925	1.4	102	0.00
100	T	Naphthalene	50.0000	48.0225	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	50.0000	44.3131	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 03 09:21:47 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

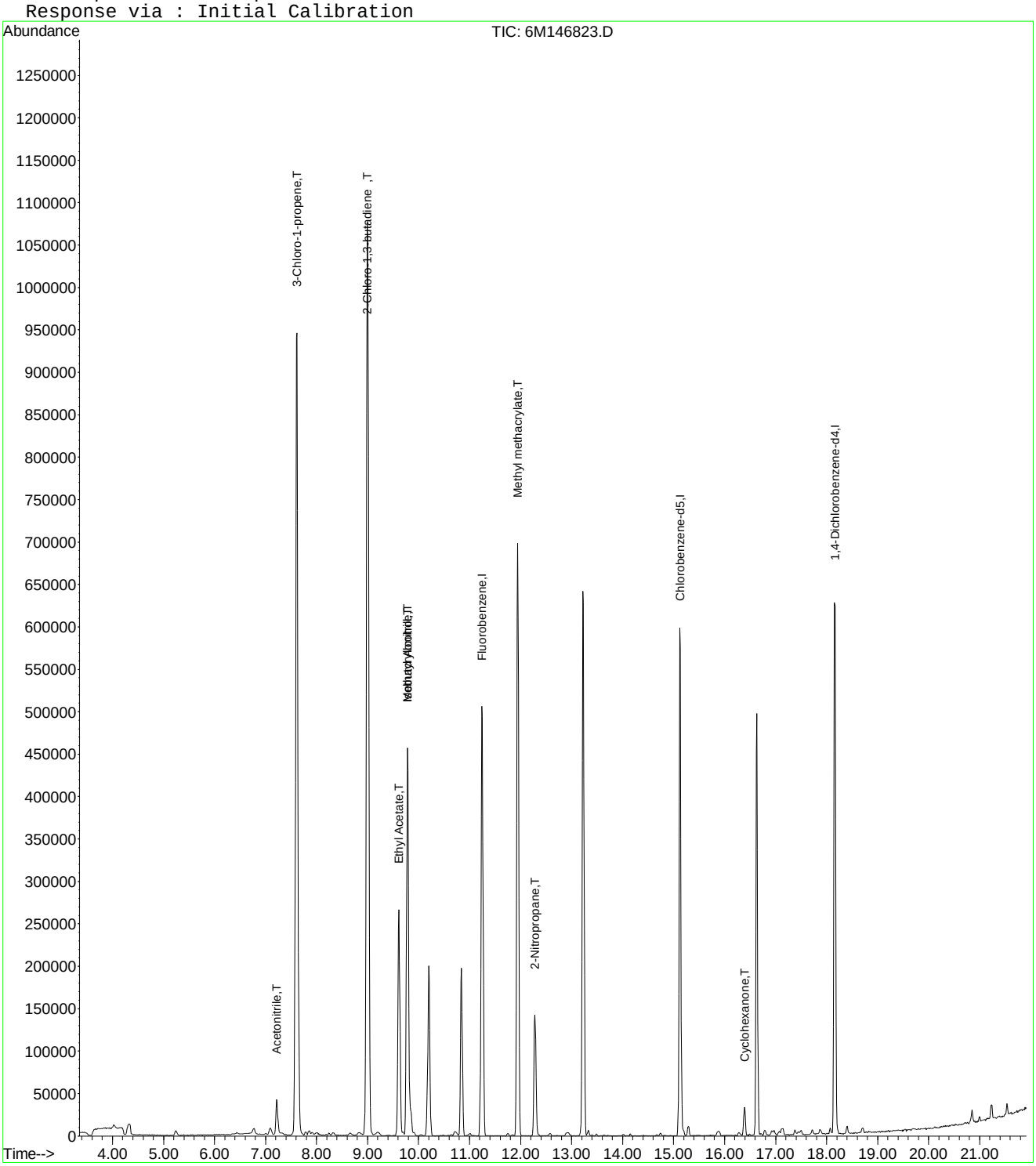
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.24	96	669196	25.00	ug/L		-0.03
11) Chlorobenzene-d5	15.13	117	453141	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	223571	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	59465	124.2959	ug/L		95
3) 3-Chloro-1-propene	7.62	41	991047	123.5279	ug/L		95
4) 2-Chloro-1,3-butadiene	8.99	53	1040852	105.1153	ug/L		95
5) Ethyl Acetate	9.62	43	438811	102.2449	ug/L		98
6) Methacrylonitrile	9.78	67	227767	100.8055	ug/L		97
7) Isobutyl Alcohol	9.78	43	24031	172.7532	ug/L	#	83
9) Methyl methacrylate	11.95	41	442639	94.2614	ug/L		95
10) 2-Nitropropane	12.28	43	141711	74.2134	ug/L		87
13) Cyclohexanone	16.39	55	18410	217.6350	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M146823.D A9FOOWT.M Wed May 03 09:37:30 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 3 9:21 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	79	-0.03
2	T	Acetonitrile	100.0000	124.2959	-24.3	101	-0.01
3	T	3-Chloro-1-propene	100.0000	123.5279	-23.5	95	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	105.1154	-5.1	80	-0.02
5	T	Ethyl Acetate	100.0000	102.2449	-2.2	78	-0.01
6	T	Methacrylonitrile	100.0000	100.8055	-0.8	76	-0.02
7	T	Isobutyl Alcohol	200.0000	172.7532	13.6	65	-0.02
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.06
9	T	Methyl methacrylate	100.0000	94.2614	5.7	71	-0.01
10	T	2-Nitropropane	100.0000	74.2134	25.8	59	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	73	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	65	-0.02
13	T	Cyclohexanone	100.0000	217.6350	-117.6#	163	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146823.D A9FOOWT.M Wed May 03 09:37:34 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:16:57 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	729732	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	587284	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	312058	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	193377	25.2648 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.04%		
43) 1,2-Dichloroethane-d4	10.51	65	162047	24.4897 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.96%		
58) Toluene-d8	12.90	98	711519	26.5155 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%		
80) p-Bromofluorobenzene	16.29	95	282243	25.6271 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.52%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	528388	53.5050 ug/L	100
3) Chloromethane	3.81	50	628865	50.9363 ug/L	98
4) Vinyl Chloride	4.05	62	634885	54.4523 ug/L	98
5) 1,3-Butadiene	4.09	54	380166	90.6681 ug/L	90
6) Bromomethane	4.95	94	163667	40.4651 ug/L	100
7) Chloroethane	5.11	64	264824	51.9988 ug/L	96
8) Trichlorofluoromethane	5.60	101	636011	50.2234 ug/L	99
9) Diethyl ether	6.12	59	439819	92.2163 ug/L	90
10) Isoprene	6.16	67	556689	55.5989 ug/L	89
11) Acrolein	6.36	56	22214	33.6309 ug/L	93
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	362605	50.2136 ug/L	98
13) Acetone	6.46	43	47633	46.4114 ug/L	93
14) 1,1-Dichloroethene	6.69	61	545264	51.5939 ug/L	96
15) Tert-Butyl Alcohol	6.79	59	58346	175.3784 ug/L	99
16) Dimethyl Sulfide	6.96	62	381428	54.1852 ug/L	88
17) Iodomethane	7.21	142	212725	67.3766 ug/L	97
18) Methyl acetate	7.22	43	157760	56.1339 ug/L	90
19) Methylene Chloride	7.48	84	374461	49.3047 ug/L	82
20) Carbon Disulfide	7.52	76	1267579	57.6850 ug/L	100
21) Acrylonitrile	7.65	53	71425	50.1704 ug/L	97
22) Methyl Tert Butyl Ether	7.68	73	706563	47.2166 ug/L	94
23) trans-1,2-Dichloroethene	7.92	61	526748	51.2300 ug/L	94
24) n-Hexane	8.00	57	500102	58.2692 ug/L	91
25) Diisopropyl ether	8.33	45	2299979	99.9359 ug/L	95
26) Vinyl Acetate	8.51	43	433080	41.9565 ug/L	94
27) 1,1-Dichloroethane	8.54	63	685922	51.8338 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1863820	95.2266 ug/L	97
29) 2-Butanone	9.09	43	75593	46.9673 ug/L	92
30) Propionitrile	9.20	54	47940	96.1029 ug/L	97
31) 2,2-Dichloropropane	9.32	77	601014	53.8010 ug/L	100
32) cis-1,2-Dichloroethene	9.39	96	432283	50.8652 ug/L	93
33) Chloroform	9.60	83	682409	46.5413 ug/L	98
34) 1-Bromopropane	9.73	122	84486	50.3934 ug/L	99
35) Bromochloromethane	9.82	130	228348	49.7931 ug/L	90
36) Tetrahydrofuran	9.84	42	109332	98.6820 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	610717	51.6119 ug/L	100
39) Cyclohexane	10.15	56	604016	54.8268 ug/L	90
40) 1,1-Dichloropropene	10.32	75	518835	50.2183 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1657311	94.5621 ug/L	97
42) Carbon Tetrachloride	10.46	117	575337	52.4380 ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419201.D 8260WT.M Thu Apr 27 16:37:40 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:16:57 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

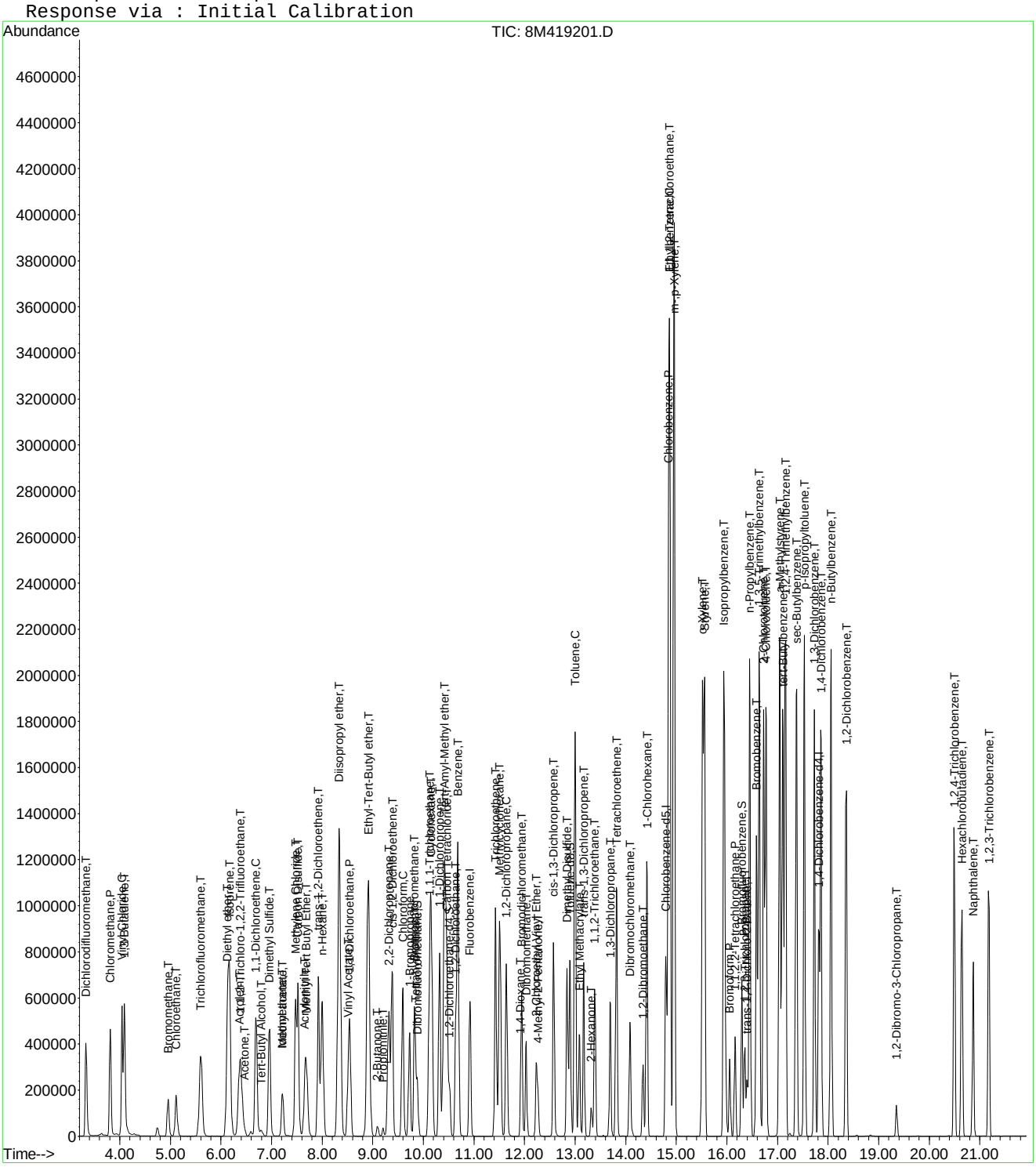
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	410303	49.4870	ug/L	95
46)	Benzene	10.68	78	1544648	51.2382	ug/L	95
47)	Trichloroethene	11.42	130	416867	49.2250	ug/L	99
48)	Methylcyclohexane	11.51	83	612242	54.2343	ug/L	94
49)	1,2-Dichloropropane	11.64	63	373156	50.6803	ug/L	95
50)	Bromodichloromethane	11.94	83	502653	52.1660	ug/L	99
51)	1,4-Dioxane	11.92	88	7728	184.0891	ug/L	82
52)	Dibromomethane	12.03	93	188885	49.8487	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	154962	48.6411	ug/L	95
54)	4-Methyl-2-Pentanone	12.26	58	65703	46.0425	ug/L	98
55)	cis-1,3-Dichloropropene	12.57	75	579232	52.7845	ug/L	99
56)	Dimethyl Disulfide	12.84	79	283846	45.1520	ug/L	97
59)	Toluene	13.00	91	1698450	51.9558	ug/L	99
60)	Ethyl Methacrylate	13.09	69	325123	52.7159	ug/L	83
62)	trans-1,3-Dichloropropene	13.17	75	480386	50.6711	ug/L	100
63)	1,1,2-Trichloroethane	13.39	97	258588	48.0798	ug/L	97
64)	2-Hexanone	13.32	58	59128	44.7969	ug/L	83
65)	1,3-Dichloropropane	13.70	76	439941	48.3872	ug/L	86
66)	Tetrachloroethene	13.82	164	340507	49.5882	ug/L	98
67)	Dibromochloromethane	14.08	129	351004	50.7873	ug/L	99
68)	1,2-Dibromoethane	14.34	107	257348	48.9857	ug/L	99
69)	1-Chlorohexane	14.42	91	565349	54.6621	ug/L	91
70)	Chlorobenzene	14.85	112	1145294	49.2181	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	437100	52.9308	ug/L	100
72)	Ethylbenzene	14.87	106	662204	50.8103	ug/L	95
73)	m-,p-Xylene	14.96	106	1596925	105.8056	ug/L	98
74)	o-Xylene	15.52	106	754673	49.7342	ug/L	100
75)	Styrene	15.56	104	1281972	53.8882	ug/L	97
76)	Bromoform	16.05	173	205086	42.9489	ug/L	99
77)	Isopropylbenzene	15.94	105	1894043	52.1304	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.16	83	282682	48.0086	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	80553	47.7189	ug/L	75
82)	trans-1,4-Dichloro-2-Buten	16.40	53	70272	49.2253	ug/L	71
83)	n-Propylbenzene	16.45	91	2274044	52.0653	ug/L	99
84)	Bromobenzene	16.58	156	501766	49.0307	ug/L	99
85)	1,3,5-Trimethylbenzene	16.63	105	1631762	51.5968	ug/L	97
86)	2-Chlorotoluene	16.73	91	1438663	48.2485	ug/L	94
87)	4-Chlorotoluene	16.77	91	1394082	51.8795	ug/L	99
88)	a-Methylstyrene	17.05	118	955873	53.9123	ug/L	97
89)	tert-Butylbenzene	17.11	134	352870	49.2817	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1700423	52.6671	ug/L	97
91)	sec-Butylbenzene	17.38	105	2048664	51.7202	ug/L	100
92)	p-Isopropyltoluene	17.53	119	1745247	52.3253	ug/L	99
93)	1,3-Dichlorobenzene	17.73	146	987904	49.8035	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	964686	47.8357	ug/L	99
95)	n-Butylbenzene	18.06	91	1616201	53.7922	ug/L	100
96)	1,2-Dichlorobenzene	18.36	146	848058	48.6677	ug/L	99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	42567	44.4196	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	554119	47.2320	ug/L	99
99)	Hexachlorobutadiene	20.64	225	260356	47.6908	ug/L	98
100)	Naphthalene	20.87	128	778756	46.4505	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	439447	45.1063	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419201.D 8260WT.M Thu Apr 27 16:37:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 12:16 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	88	-0.02
2	T	Dichlorodifluoromethane	0.3383	0.3620	-7.0	86	-0.02
3	P	Chloromethane	0.4230	0.4309	-1.9	94	0.00
4	C	Vinyl Chloride	0.3994	0.4350	-8.9	98	0.00
5	T	1,3-Butadiene	0.1737	0.2605	-49.9#	140	0.00
6	T	Bromomethane	0.1100	0.1121	-1.9	66	0.00
7	T	Chloroethane	0.1745	0.1815	-4.0	90	-0.02
8	T	Trichlorofluoromethane	0.4339	0.4358	-0.4	88	0.00
9	T	Diethyl ether	0.1634	0.1507	7.8	83	-0.02
10	T	Isoprene	0.3430	0.3814	-11.2	97	-0.02
11	T	Acrolein	0.0226	0.0152	32.7#	60	-0.03
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2485	-0.4	87	-0.02
13	T	Acetone	0.0352	0.0326	7.2	80	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3736	-3.2	89	0.00
15	T	Tert-Butyl Alcohol	0.0114	0.0100	12.4	77	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2614	-8.4	96	-0.02
17	T	Iodomethane	0.1082	0.1458	-34.8#	106	-0.02
18	T	Methyl acetate	0.0963	0.1081	-12.3	98	-0.02
19	T	Methylene Chloride	0.2602	0.2566	1.4	87	-0.02
20	T	Carbon Disulfide	0.7528	0.8685	-15.4	100	-0.03
21	T	Acrylonitrile	0.0488	0.0489	-0.3	81	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.4841	5.6	81	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3609	-2.5	90	-0.02
24	T	n-Hexane	0.2940	0.3427	-16.5	104	0.00
25	T	Diisopropyl ether	0.7885	0.7880	0.1	88	-0.02
26	T	Vinyl Acetate	0.3536	0.2967	16.1	73	-0.02
27	P	1,1-Dichloroethane	0.4533	0.4700	-3.7	89	-0.02
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6385	4.8	84	-0.02
29	T	2-Butanone	0.0551	0.0518	6.1	81	-0.02
30	T	Propionitrile	0.0171	0.0164	3.9	84	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4118	-7.6	93	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.2962	-1.7	88	-0.02
33	C	Chloroform	0.5023	0.4676	6.9	88	0.00
34		1-Bromopropane	0.0574	0.0579	-0.8	89	-0.02
35	T	Bromochloromethane	0.1571	0.1565	0.4	82	-0.03
36	T	Tetrahydrofuran	0.0380	0.0375	1.3	87	-0.02
37	S	Dibromofluoromethane	0.2622	0.2650	-1.1	86	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4184	-3.2	88	-0.02
39	T	Cyclohexane	0.3774	0.4139	-9.7	96	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3555	-0.4	89	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5678	5.4	83	-0.02
42	T	Carbon Tetrachloride	0.3759	0.3942	-4.9	88	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2221	2.0	82	-0.02
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.2811	1.0	84	-0.02
46	T	Benzene	1.0328	1.0584	-2.5	89	-0.02
47	T	Trichloroethene	0.2901	0.2856	1.6	86	-0.02
48	T	Methylcyclohexane	0.3867	0.4195	-8.5	95	-0.02
49	C	1,2-Dichloropropane	0.2522	0.2557	-1.4	88	0.00
50	T	Bromodichloromethane	0.3301	0.3444	-4.3	87	-0.02
51	T	1,4-Dioxane	0.0014	0.0013	8.3	76	-0.03
52	T	Dibromomethane	0.1298	0.1294	0.3	83	0.00
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.1062	2.7	82	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0450	7.9	79	-0.02

(#) = Out of Range
8M419201.D 8260WT.M Thu Apr 27 16:38:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.3969	-5.6	86	-0.02
56	T	Dimethyl Disulfide	0.1968	0.1945	1.2	85	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	88	0.00
58	S	Toluene-d8	1.1423	1.2115	-6.1	90	0.00
59	C	Toluene	1.3916	1.4460	-3.9	89	-0.02
60	T	Ethyl Methacrylate	0.2625	0.2768	-5.4	85	0.00
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4090	-1.3	85	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2202	3.8	85	-0.02
64	T	2-Hexanone	0.0562	0.0503	10.4	76	-0.02
65	T	1,3-Dichloropropane	0.3870	0.3746	3.2	83	0.00
66	T	Tetrachloroethene	0.2923	0.2899	0.8	86	0.00
67	T	Dibromochloromethane	0.2942	0.2988	-1.6	83	-0.02
68	T	1,2-Dibromoethane	0.2236	0.2191	2.0	82	-0.02
69	T	1-Chlorohexane	0.4403	0.4813	-9.3	94	0.00
70	P	Chlorobenzene	0.9906	0.9751	1.6	87	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.3721	-5.9	85	0.00
72	C	Ethylbenzene	0.5548	0.5638	-1.6	87	-0.02
73	T	m-,p-Xylene	0.6425	0.6798	-5.8	88	0.00
74	T	o-Xylene	0.6460	0.6425	0.5	87	0.00
75	T	Styrene	1.0127	1.0914	-7.8	86	0.00
76	P	Bromoform	0.1760	0.1746	0.8	78	0.00
77	T	Isopropylbenzene	1.5466	1.6125	-4.3	88	-0.02
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	88	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.4529	4.0	81	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.9045	-2.5	89	0.00
81	T	1,2,3-Trichloropropane	0.1352	0.1291	4.6	79	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1126	-15.1	81	0.00
83	T	n-Propylbenzene	3.4991	3.6436	-4.1	89	0.00
84	T	Bromobenzene	0.8199	0.8040	1.9	84	-0.02
85	T	1,3,5-Trimethylbenzene	2.5336	2.6145	-3.2	88	0.00
86	T	2-Chlorotoluene	2.3888	2.3051	3.5	92	0.00
87	T	4-Chlorotoluene	2.1528	2.2337	-3.8	84	-0.02
88	T	a-Methylstyrene	1.4204	1.5316	-7.8	92	0.00
89	T	tert-Butylbenzene	0.5736	0.5654	1.4	87	0.00
90	T	1,2,4-Trimethylbenzene	2.5866	2.7245	-5.3	87	0.00
91	T	sec-Butylbenzene	3.1733	3.2825	-3.4	89	0.00
92	T	p-Isopropyltoluene	2.6721	2.7963	-4.7	88	0.00
93	T	1,3-Dichlorobenzene	1.5891	1.5829	0.4	86	0.00
94	T	1,4-Dichlorobenzene	1.6156	1.5457	4.3	85	0.00
95	T	n-Butylbenzene	2.4070	2.5896	-7.6	89	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.3588	2.7	83	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0682	11.2	75	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.8879	5.5	79	0.00
99	T	Hexachlorobutadiene	0.4374	0.4172	4.6	83	0.00
100	T	Naphthalene	1.3431	1.2478	7.1	76	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.7041	9.8	75	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419201.D 8260WT.M Thu Apr 27 16:38:39 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	88	-0.02
2	T	Dichlorodifluoromethane	50.0000	53.5050	-7.0	86	-0.02
3	P	Chloromethane	50.0000	50.9363	-1.9	94	0.00
4	C	Vinyl Chloride	50.0000	54.4523	-8.9	98	0.00
5	T	1,3-Butadiene	50.0000	90.6680	-81.3#	140	0.00
6	T	Bromomethane	50.0000	40.4651	19.1	66	0.00
7	T	Chloroethane	50.0000	51.9988	-4.0	90	-0.02
8	T	Trichlorofluoromethane	50.0000	50.2234	-0.4	88	0.00
9	T	Diethyl ether	100.0000	92.2163	7.8	83	-0.02
10	T	Isoprene	50.0000	55.5989	-11.2	97	-0.02
11	T	Acrolein	50.0000	33.6309	32.7#	60	-0.03
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	50.2136	-0.4	87	-0.02
13	T	Acetone	50.0000	46.4114	7.2	80	-0.02
14	C	1,1-Dichloroethene	50.0000	51.5939	-3.2	89	0.00
15	T	Tert-Butyl Alcohol	200.0000	175.3784	12.3	77	-0.04
16	T	Dimethyl Sulfide	50.0000	54.1852	-8.4	96	-0.02
17	T	Iodomethane	50.0000	67.3766	-34.8#	106	-0.02
18	T	Methyl acetate	50.0000	56.1339	-12.3	98	-0.02
19	T	Methylene Chloride	50.0000	49.3047	1.4	87	-0.02
20	T	Carbon Disulfide	50.0000	57.6850	-15.4	100	-0.03
21	T	Acrylonitrile	50.0000	50.1704	-0.3	81	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	47.2166	5.6	81	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	51.2300	-2.5	90	-0.02
24	T	n-Hexane	50.0000	58.2692	-16.5	104	0.00
25	T	Diisopropyl ether	100.0000	99.9359	0.1	88	-0.02
26	T	Vinyl Acetate	50.0000	41.9565	16.1	73	-0.02
27	P	1,1-Dichloroethane	50.0000	51.8338	-3.7	89	-0.02
28	T	Ethyl-Tert-Butyl ether	100.0000	95.2266	4.8	84	-0.02
29	T	2-Butanone	50.0000	46.9674	6.1	81	-0.02
30	T	Propionitrile	100.0000	96.1029	3.9	84	-0.02
31	T	2,2-Dichloropropane	50.0000	53.8010	-7.6	93	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	50.8652	-1.7	88	-0.02
33	C	Chloroform	50.0000	46.5412	6.9	88	0.00
34		1-Bromopropane	50.0000	50.3935	-0.8	89	-0.02
35	T	Bromochloromethane	50.0000	49.7931	0.4	82	-0.03
36	T	Tetrahydrofuran	100.0000	98.6820	1.3	87	-0.02
37	S	Dibromofluoromethane	25.0000	25.2648	-1.1	86	-0.02
38	T	1,1,1-Trichloroethane	50.0000	51.6119	-3.2	88	-0.02
39	T	Cyclohexane	50.0000	54.8268	-9.7	96	-0.02
40	T	1,1-Dichloropropene	50.0000	50.2183	-0.4	89	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	94.5621	5.4	83	-0.02
42	T	Carbon Tetrachloride	50.0000	52.4380	-4.9	88	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.4897	2.0	82	-0.02
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	49.4870	1.0	84	-0.02
46	T	Benzene	50.0000	51.2381	-2.5	89	-0.02
47	T	Trichloroethene	50.0000	49.2250	1.6	86	-0.02
48	T	Methylcyclohexane	50.0000	54.2343	-8.5	95	-0.02
49	C	1,2-Dichloropropane	50.0000	50.6803	-1.4	88	0.00
50	T	Bromodichloromethane	50.0000	52.1660	-4.3	87	-0.02
51	T	1,4-Dioxane	200.0000	184.0891	8.0	76	-0.03
52	T	Dibromomethane	50.0000	49.8487	0.3	83	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.6411	2.7	82	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	46.0425	7.9	79	-0.02

(#) = Out of Range
8M419201.D 8260WT.M Thu Apr 27 16:38:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419201.D Vial: 2
Acq On : 27 Apr 2017 11:55 Operator: TMB
Sample : WG611802-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

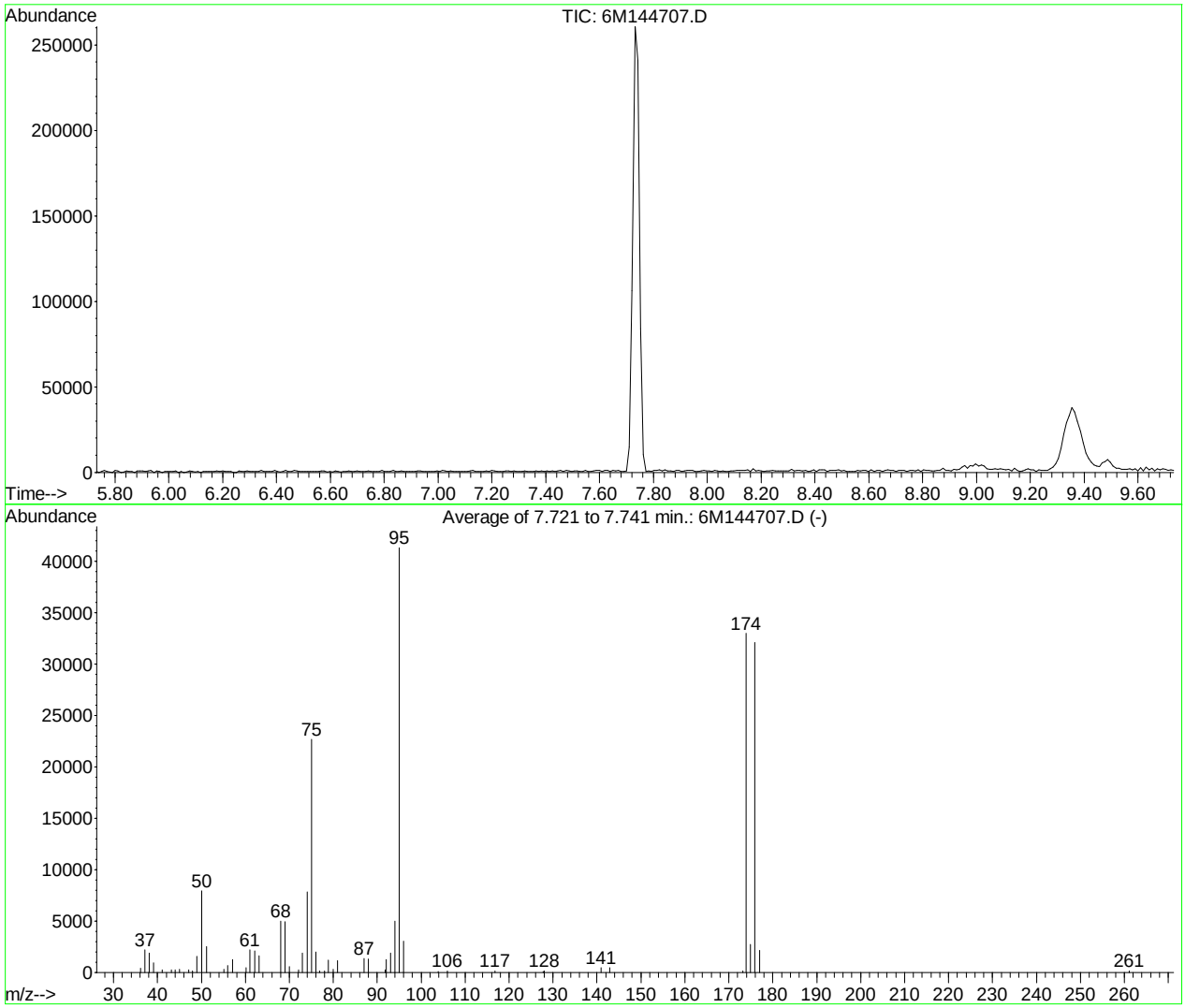
Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	52.7845	-5.6	86	-0.02
56	T	Dimethyl Disulfide	50.0000	45.1520	9.7	85	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	88	0.00
58	S	Toluene-d8	25.0000	26.5155	-6.1	90	0.00
59	C	Toluene	50.0000	51.9558	-3.9	89	-0.02
60	T	Ethyl Methacrylate	50.0000	52.7159	-5.4	85	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	50.6711	-1.3	85	-0.02
63	T	1,1,2-Trichloroethane	50.0000	48.0798	3.8	85	-0.02
64	T	2-Hexanone	50.0000	44.7969	10.4	76	-0.02
65	T	1,3-Dichloropropane	50.0000	48.3872	3.2	83	0.00
66	T	Tetrachloroethene	50.0000	49.5882	0.8	86	0.00
67	T	Dibromochloromethane	50.0000	50.7873	-1.6	83	-0.02
68	T	1,2-Dibromoethane	50.0000	48.9857	2.0	82	-0.02
69	T	1-Chlorohexane	50.0000	54.6621	-9.3	94	0.00
70	P	Chlorobenzene	50.0000	49.2181	1.6	87	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.9308	-5.9	85	0.00
72	C	Ethylbenzene	50.0000	50.8103	-1.6	87	-0.02
73	T	m-,p-Xylene	100.0000	105.8056	-5.8	88	0.00
74	T	o-Xylene	50.0000	49.7342	0.5	87	0.00
75	T	Styrene	50.0000	53.8882	-7.8	86	0.00
76	P	Bromoform	50.0000	42.9489	14.1	78	0.00
77	T	Isopropylbenzene	50.0000	52.1304	-4.3	88	-0.02
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	88	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	48.0086	4.0	81	-0.02
80	S	p-Bromofluorobenzene	25.0000	25.6271	-2.5	89	0.00
81	T	1,2,3-Trichloropropane	50.0000	47.7189	4.6	79	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	49.2253	1.5	81	0.00
83	T	n-Propylbenzene	50.0000	52.0654	-4.1	89	0.00
84	T	Bromobenzene	50.0000	49.0307	1.9	84	-0.02
85	T	1,3,5-Trimethylbenzene	50.0000	51.5968	-3.2	88	0.00
86	T	2-Chlorotoluene	50.0000	48.2485	3.5	92	0.00
87	T	4-Chlorotoluene	50.0000	51.8796	-3.8	84	-0.02
88	T	a-Methylstyrene	50.0000	53.9123	-7.8	92	0.00
89	T	tert-Butylbenzene	50.0000	49.2817	1.4	87	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	52.6671	-5.3	87	0.00
91	T	sec-Butylbenzene	50.0000	51.7202	-3.4	89	0.00
92	T	p-Isopropyltoluene	50.0000	52.3253	-4.7	88	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.8036	0.4	86	0.00
94	T	1,4-Dichlorobenzene	50.0000	47.8357	4.3	85	0.00
95	T	n-Butylbenzene	50.0000	53.7922	-7.6	89	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.6677	2.7	83	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	44.4196	11.2	75	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	47.2320	5.5	79	0.00
99	T	Hexachlorobutadiene	50.0000	47.6908	4.6	83	0.00
100	T	Naphthalene	50.0000	46.4506	7.1	76	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	45.1063	9.8	75	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419201.D 8260WT.M Thu Apr 27 16:38:42 2017 Page 2

2.1.1.5 Raw QC Data

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144707.D Vial: 1
Acq On : 12 Jan 2017 8:36 Operator: TMB
Sample : WG598323-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD79474 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01

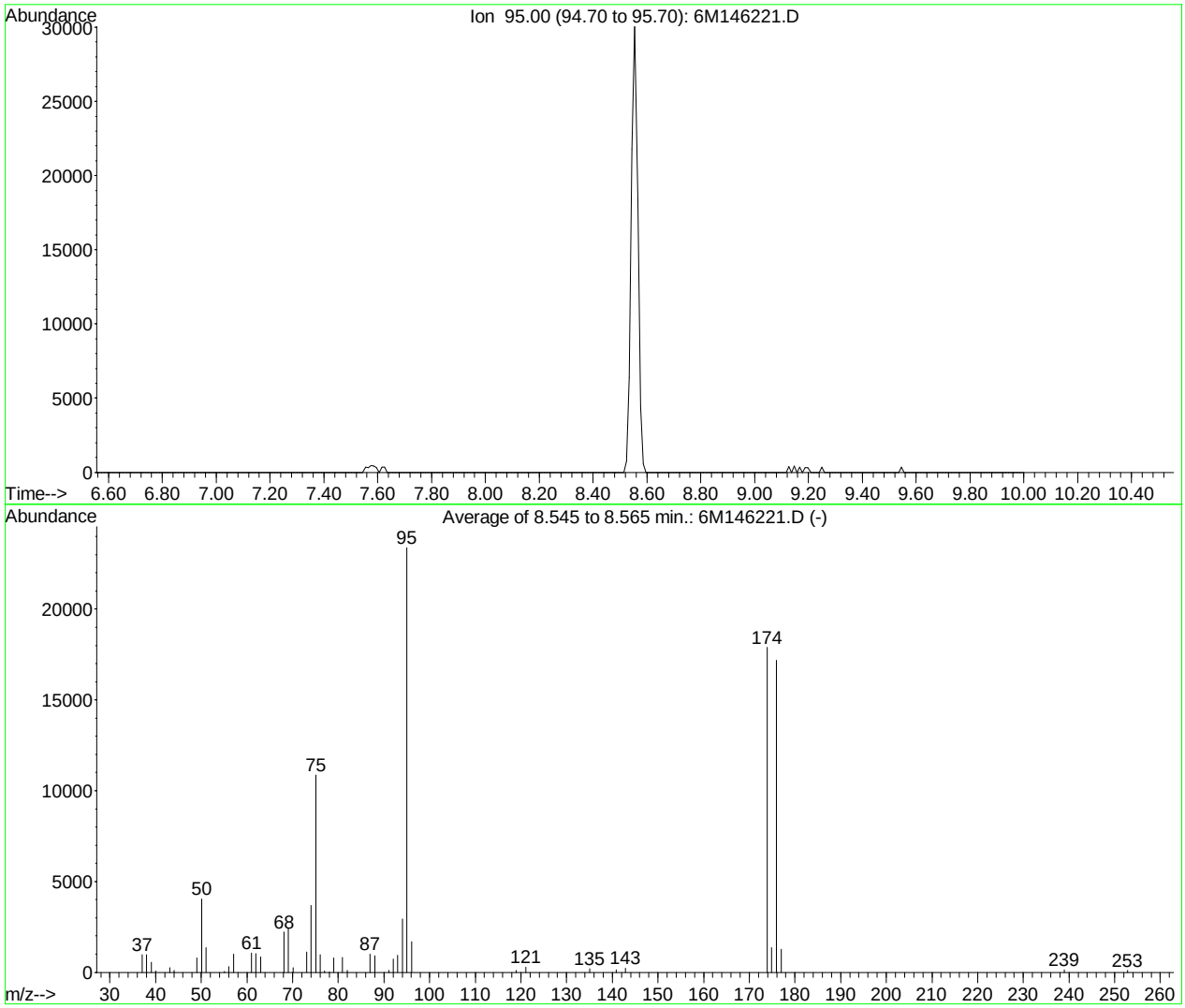


AutoFind: Scans 258, 259, 260; Background Corrected with Scan 253

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	7923	PASS
75	95	30	60	54.8	22651	PASS
95	95	100	100	100.0	41304	PASS
96	95	5	9	7.3	3007	PASS
173	174	0.00	2	0.4	116	PASS
174	95	50	100	79.8	32963	PASS
175	174	5	9	8.2	2709	PASS
176	174	95	101	97.3	32071	PASS
177	176	5	9	6.7	2147	PASS

6M144707.D BFB.M Thu Apr 27 13:11:59 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146221.D Vial: 3
Acq On : 5 Apr 2017 16:29 Operator: TMB
Sample : WG608938-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

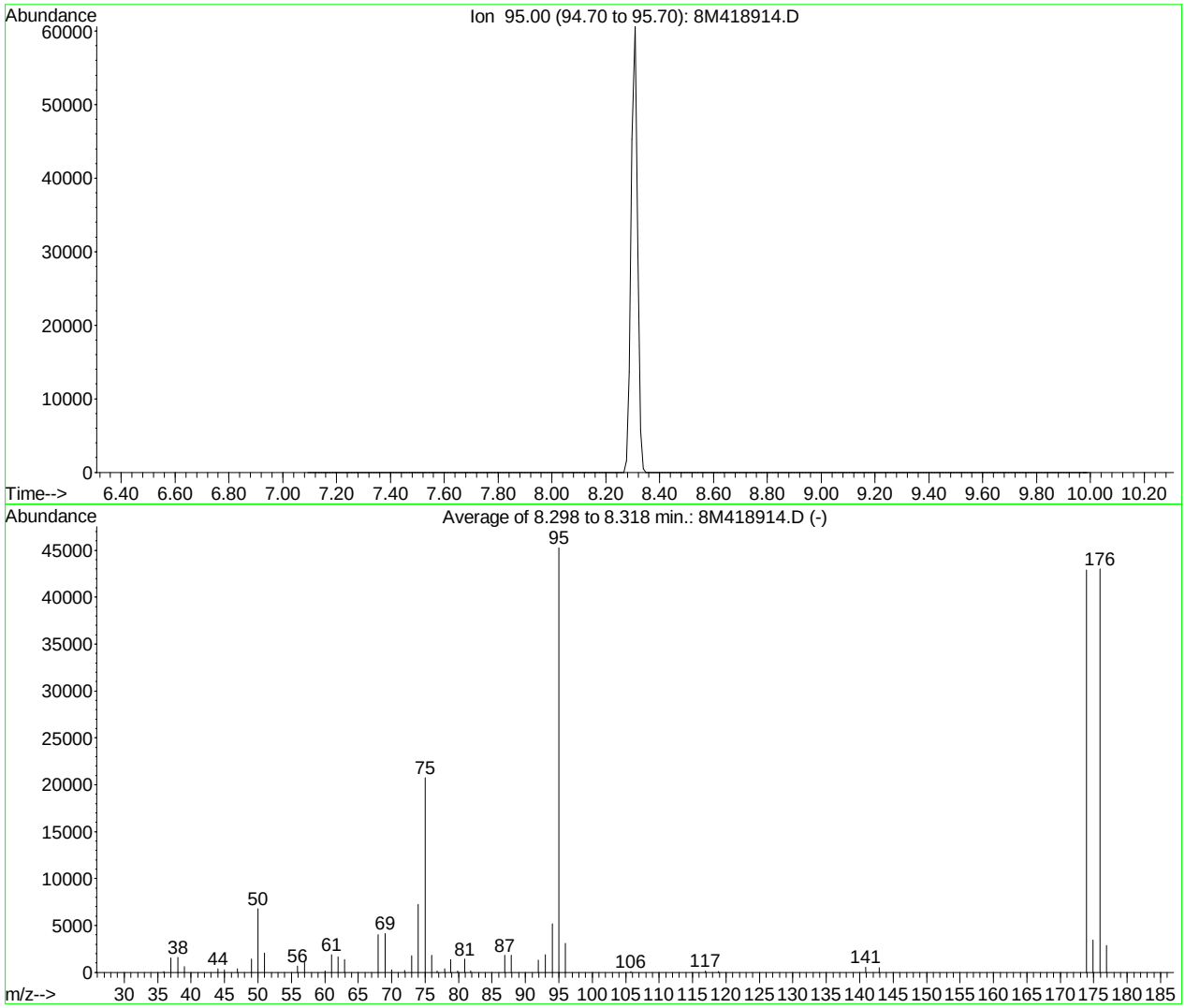


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.3	4043	PASS
75	95	30	60	46.5	10875	PASS
95	95	100	100	100.0	23389	PASS
96	95	5	9	7.2	1674	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	76.5	17883	PASS
175	174	5	9	7.6	1356	PASS
176	174	95	101	96.1	17186	PASS
177	176	5	9	7.3	1263	PASS

6M146221.D 8260BWT.M Thu Apr 06 14:59:20 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418914.D Vial: 1
Acq On : 12 Apr 2017 10:17 Operator: TMB
Sample : WG609829-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8

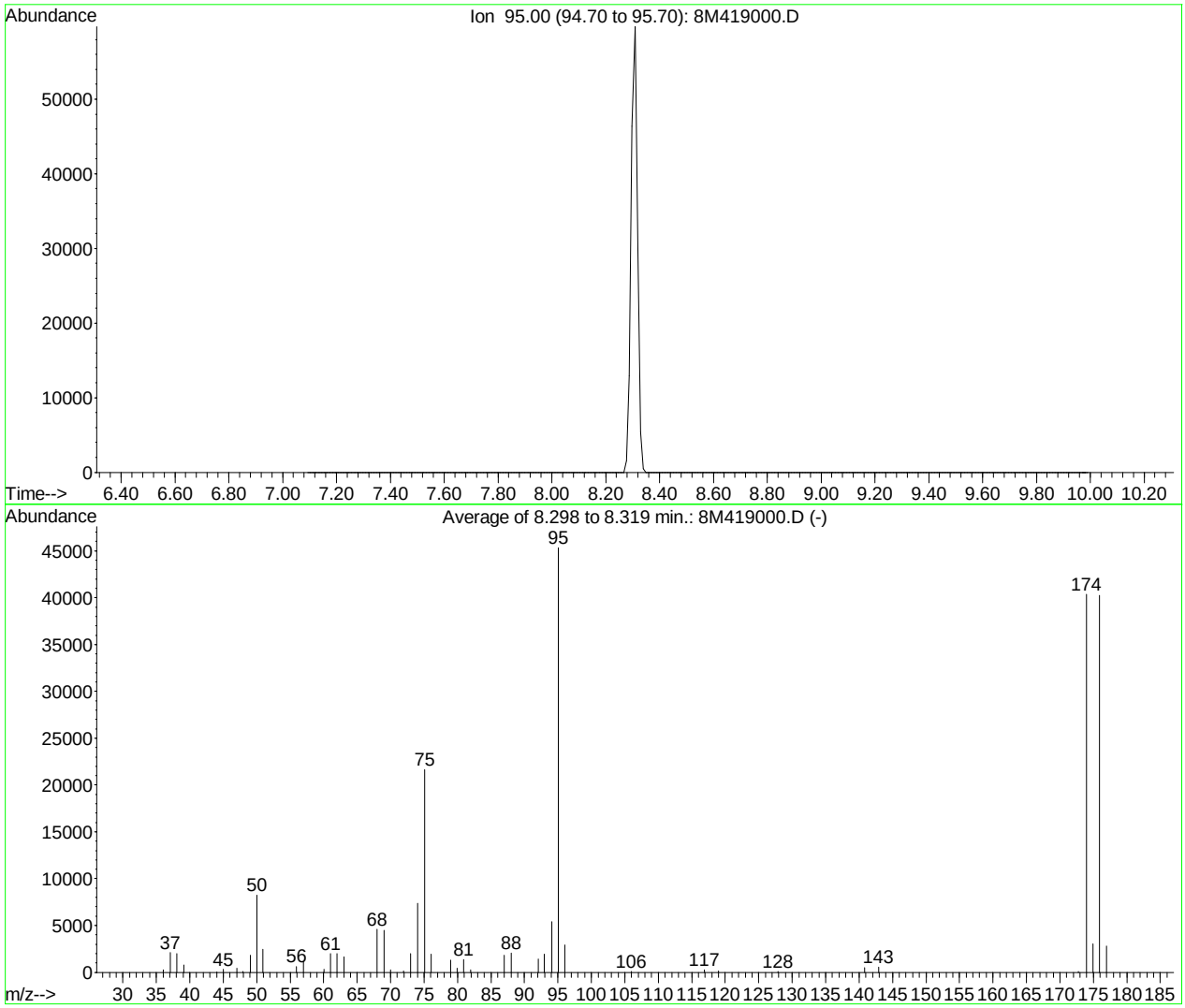


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	15.0	6807	PASS
75	95	30	60	45.8	20724	PASS
95	95	100	100	100.0	45280	PASS
96	95	5	9	6.8	3077	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	94.7	42898	PASS
175	174	5	9	8.0	3453	PASS
176	174	95	101	100.2	42994	PASS
177	176	5	9	6.7	2876	PASS

8M418914.D 8260WTR.M Fri Apr 14 13:50:48 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419000.D Vial: 1
Acq On : 17 Apr 2017 12:58 Operator: TMB
Sample : WG610410-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

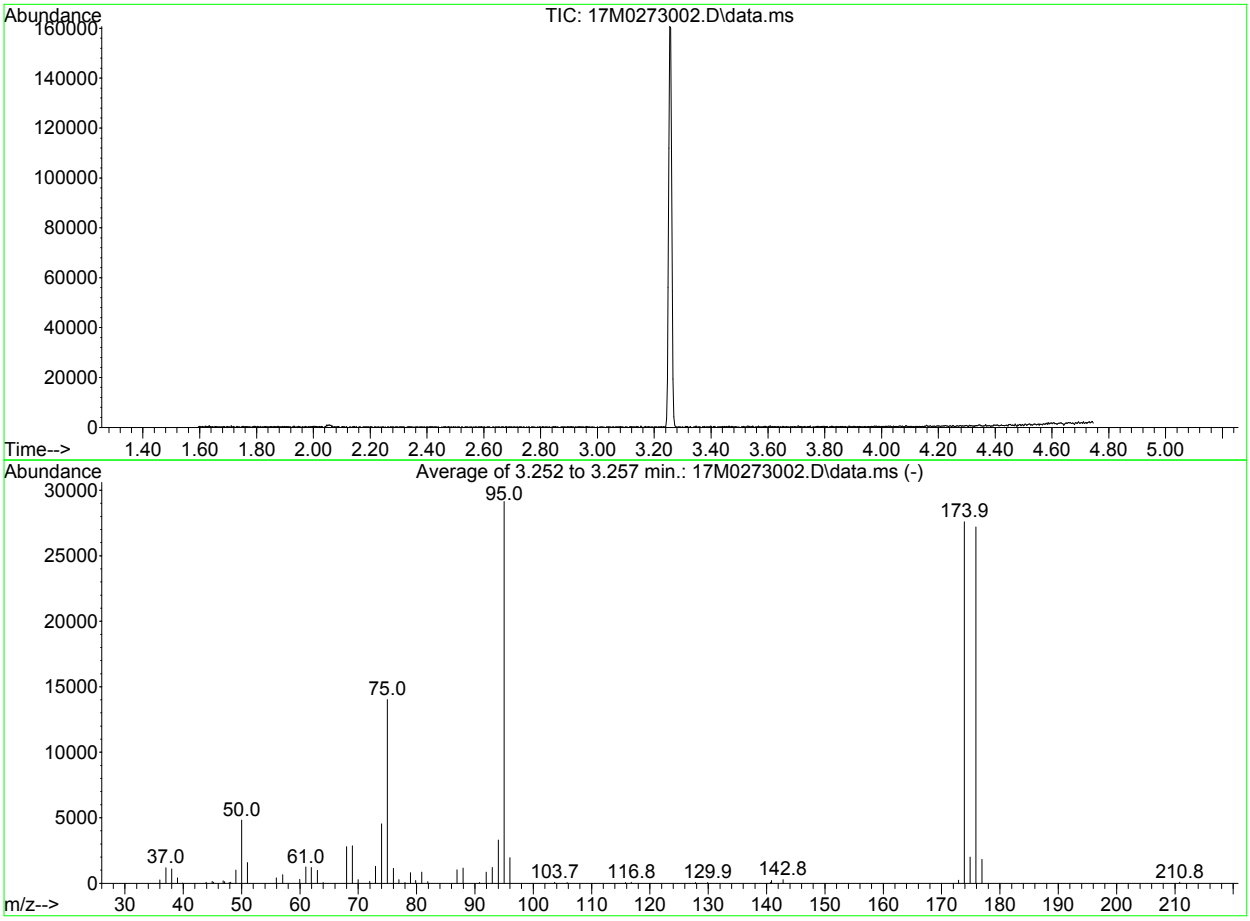
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.1	8216	PASS
75	95	30	60	47.8	21655	PASS
95	95	100	100	100.0	45349	PASS
96	95	5	9	6.4	2901	PASS
173	174	0.00	2	0.3	110	PASS
174	95	50	100	89.0	40349	PASS
175	174	5	9	7.5	3042	PASS
176	174	95	101	99.8	40256	PASS
177	176	5	9	7.0	2800	PASS

8M419000.D 8260WT.M Tue Apr 18 11:58:27 2017

Data Path : D:\MassHunter\GCMS\1\data\042517\
Data File : 17M0273002.D
Acq On : 25 Apr 2017 20:07
Operator : FJB
Sample : WG611454-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

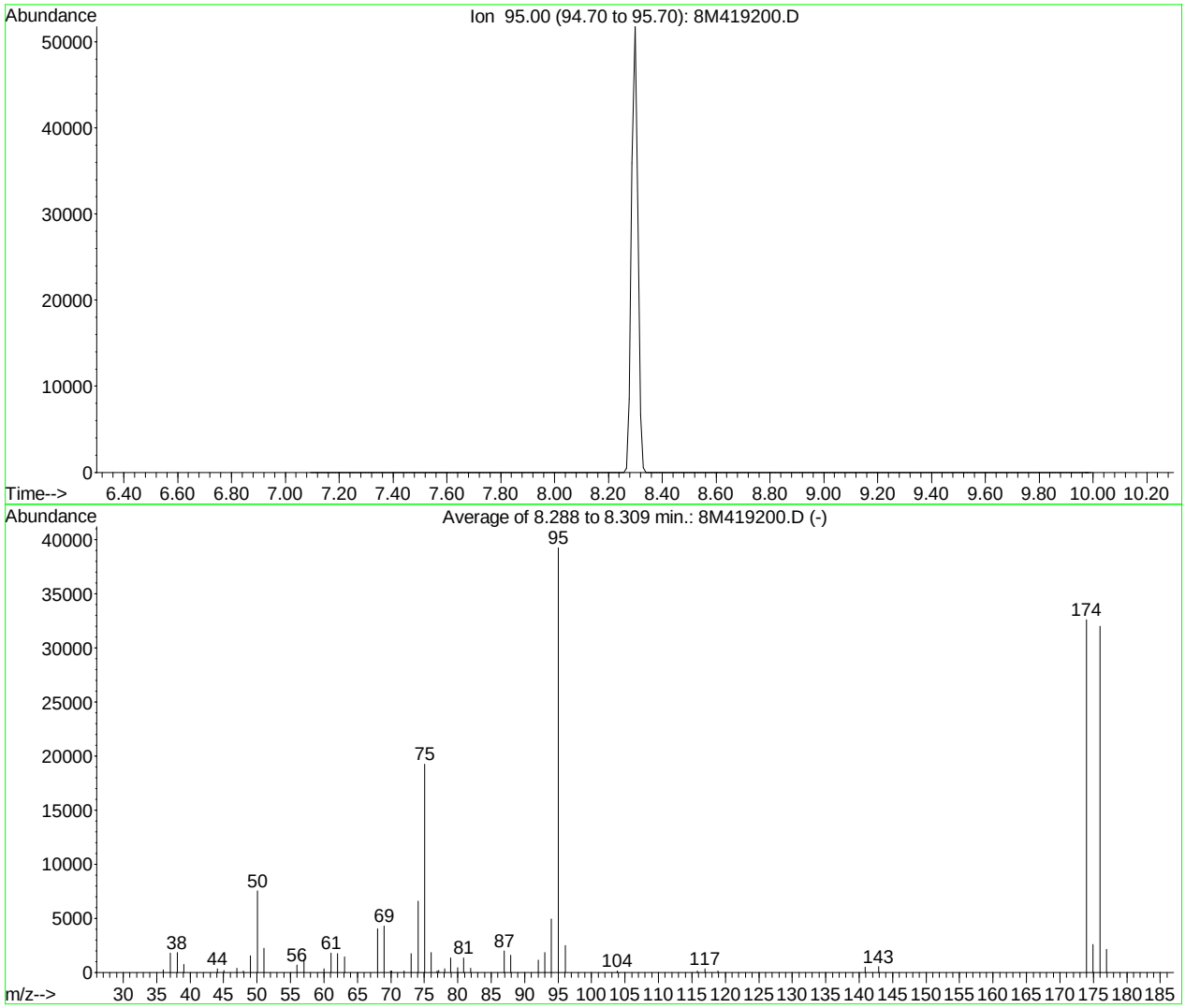
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	4824	PASS
75	95	30	60	48.1	14022	PASS
95	95	100	100	100.0	29152	PASS
96	95	5	9	6.7	1953	PASS
173	174	0.00	2	0.8	223	PASS
174	95	50	100	94.7	27600	PASS
175	174	5	9	7.3	2004	PASS
176	174	95	101	98.5	27192	PASS
177	176	5	9	6.7	1814	PASS

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419200.D Vial: 1
Acq On : 27 Apr 2017 11:30 Operator: TMB
Sample : WG611802-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

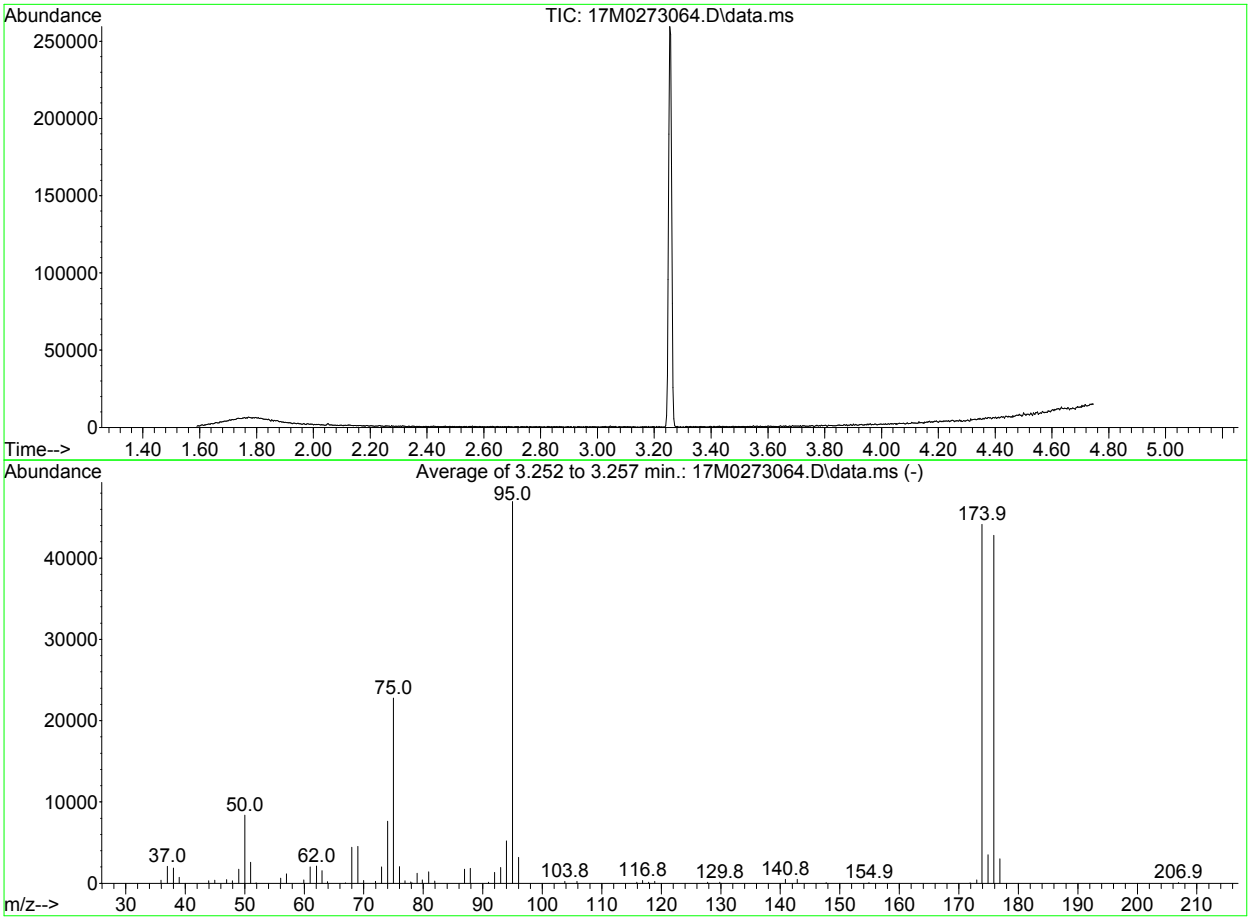
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	7535	PASS
75	95	30	60	49.1	19271	PASS
95	95	100	100	100.0	39280	PASS
96	95	5	9	6.3	2488	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	83.0	32621	PASS
175	174	5	9	7.9	2567	PASS
176	174	95	101	98.1	32016	PASS
177	176	5	9	6.6	2110	PASS

8M419200.D 8260WT.M Thu Apr 27 16:37:18 2017

Data Path : D:\MassHunter\GCMS\1\data\042717\
Data File : 17M0273064.D
Acq On : 27 Apr 2017 11:37
Operator : ADC
Sample : WG611826-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017

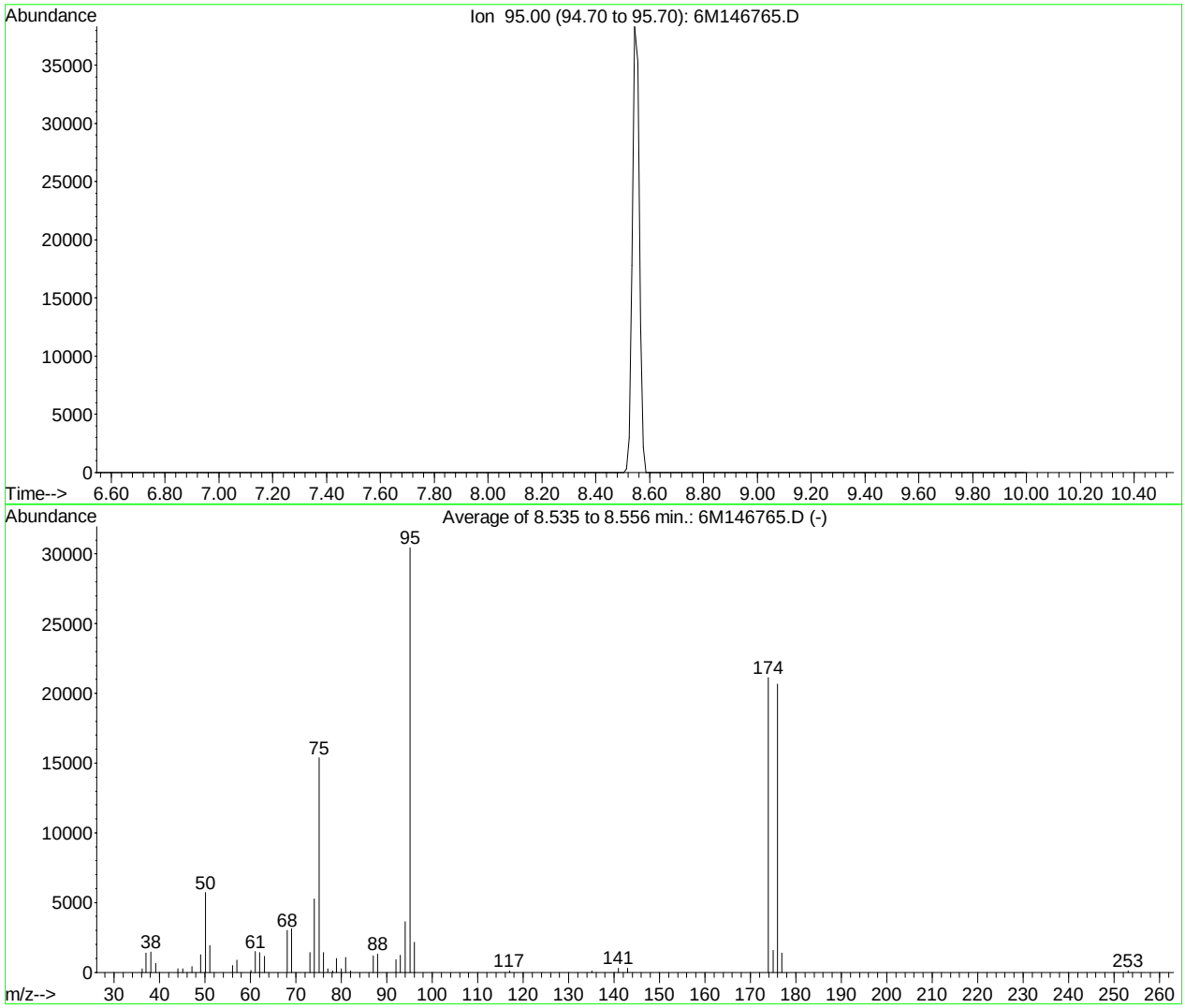


AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.9	8386	PASS
75	95	30	60	48.5	22779	PASS
95	95	100	100	100.0	46968	PASS
96	95	5	9	6.8	3172	PASS
173	174	0.00	2	0.9	407	PASS
174	95	50	100	94.0	44133	PASS
175	174	5	9	7.9	3505	PASS
176	174	95	101	97.0	42800	PASS
177	176	5	9	7.0	3001	PASS

826VMS.M Thu Apr 27 12:17:40 2017 Page: 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146765.D Vial: 1
Acq On : 27 Apr 2017 12:00 Operator: TMB
Sample : WG611834-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

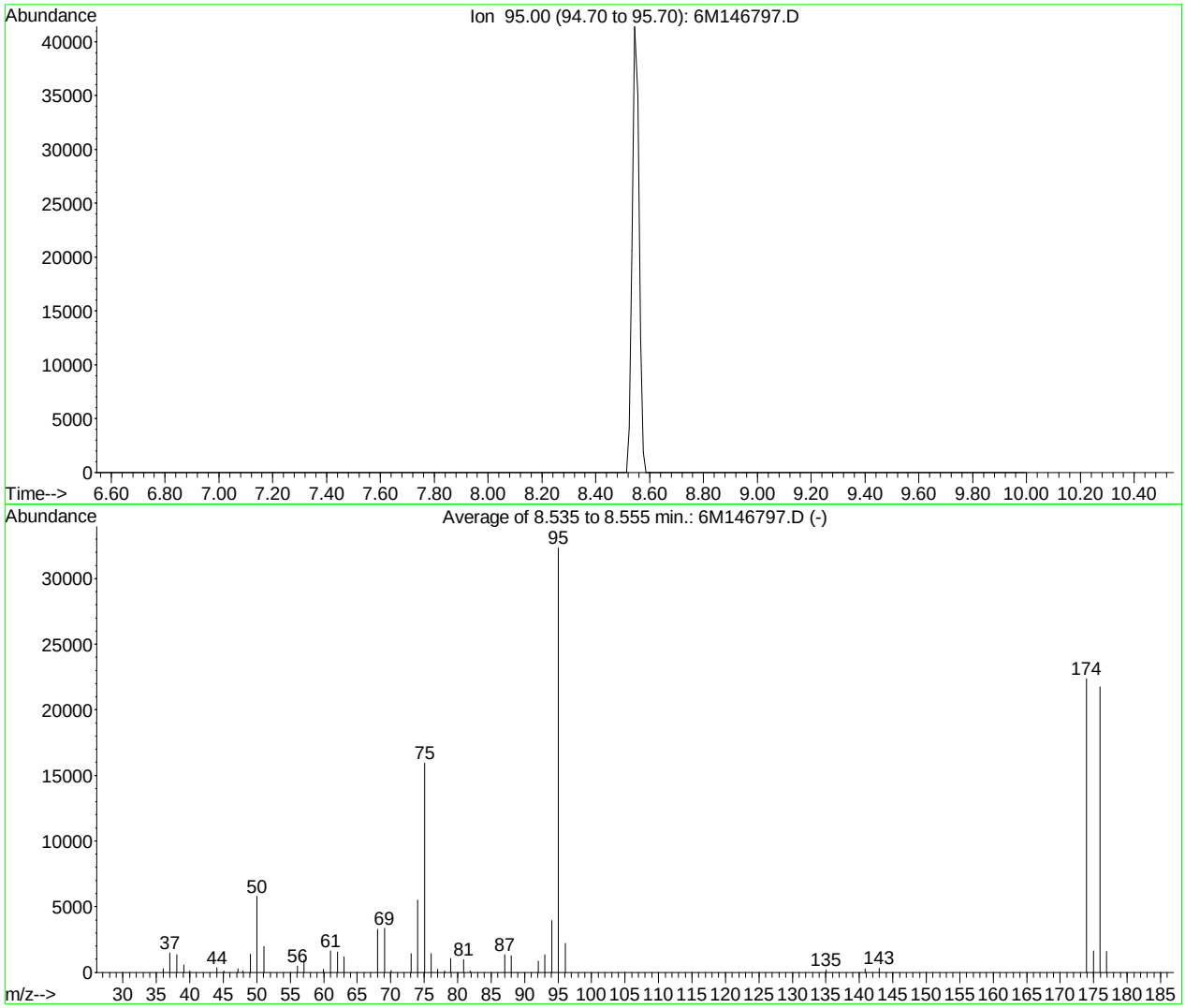


AutoFind: Scans 338, 339, 340; Background Corrected with Scan 333

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.8	5725	PASS
75	95	30	60	50.5	15371	PASS
95	95	100	100	100.0	30453	PASS
96	95	5	9	7.1	2159	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	69.4	21142	PASS
175	174	5	9	7.4	1561	PASS
176	174	95	101	97.7	20656	PASS
177	176	5	9	6.6	1364	PASS

6M146765.D 8260BWT.M Thu Apr 27 16:35:42 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146797.D Vial: 1
Acq On : 28 Apr 2017 6:27 Operator: TMB
Sample : WG611920-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6



AutoFind: Scans 338, 339, 340; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.9	5780	PASS
75	95	30	60	49.3	15935	PASS
95	95	100	100	100.0	32354	PASS
96	95	5	9	6.8	2194	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	69.1	22363	PASS
175	174	5	9	7.2	1614	PASS
176	174	95	101	97.3	21763	PASS
177	176	5	9	7.2	1577	PASS

6M146797.D 8260BWT.M Fri Apr 28 10:38:32 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273067.D Vial: 3
Acq On : 27 Apr 2017 12:42 Operator: ADC
Sample : WG611827-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

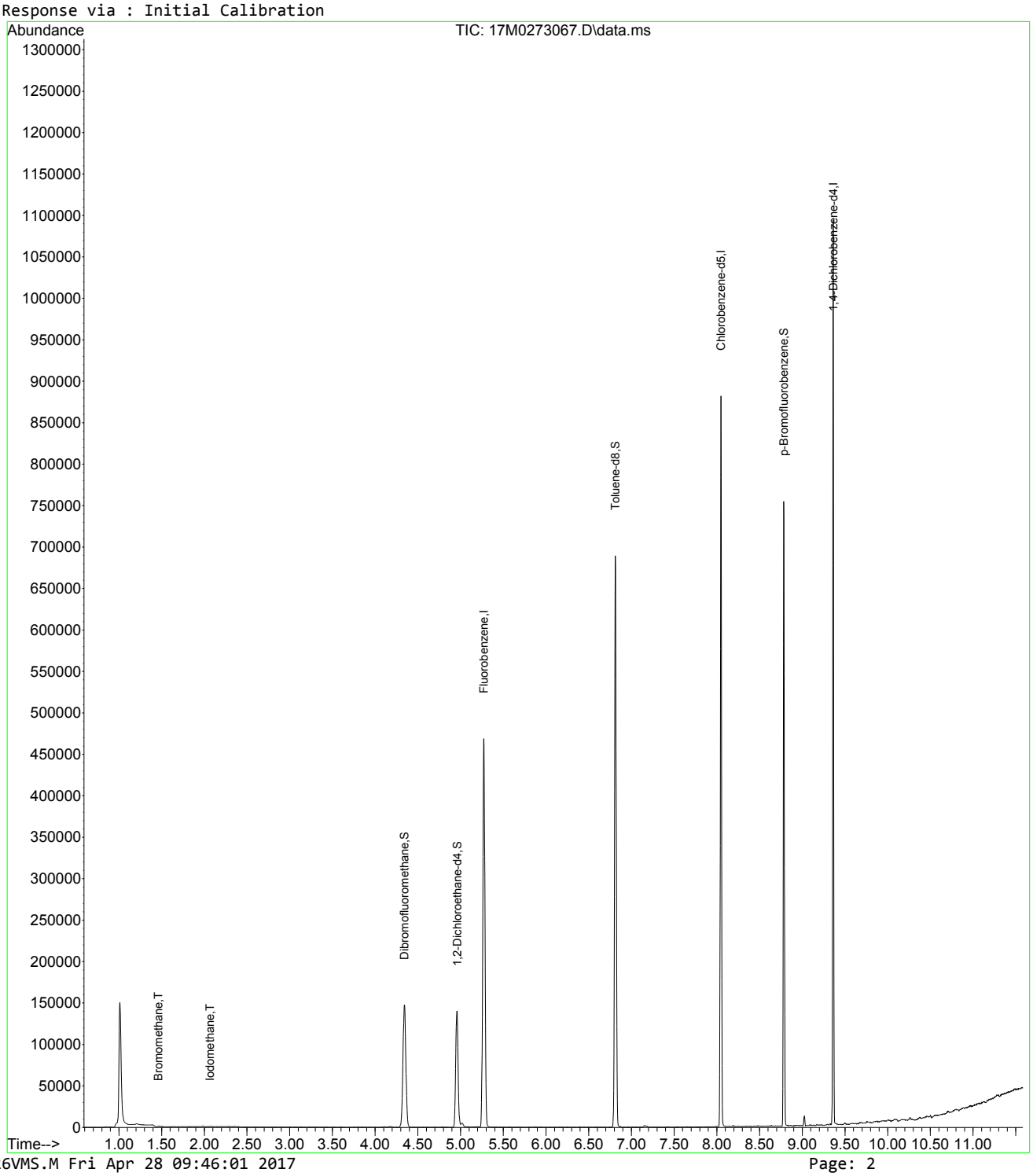
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	402256	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	295946	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	145053	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	106178	24.4409 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.764%		
34) 1,2-Dichloroethane-d4	4.959	65	102355	25.1364 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.546%		
47) Toluene-d8	6.812	98	376237	25.4737 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.895%		
66) p-Bromofluorobenzene	8.783	95	126786	26.1050 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.420%		
Target Compounds					Qvalue
6) Bromomethane	1.461	94	490	0.1273 ug/L	96
13) Iodomethane	2.066	142	357	2.0584 ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

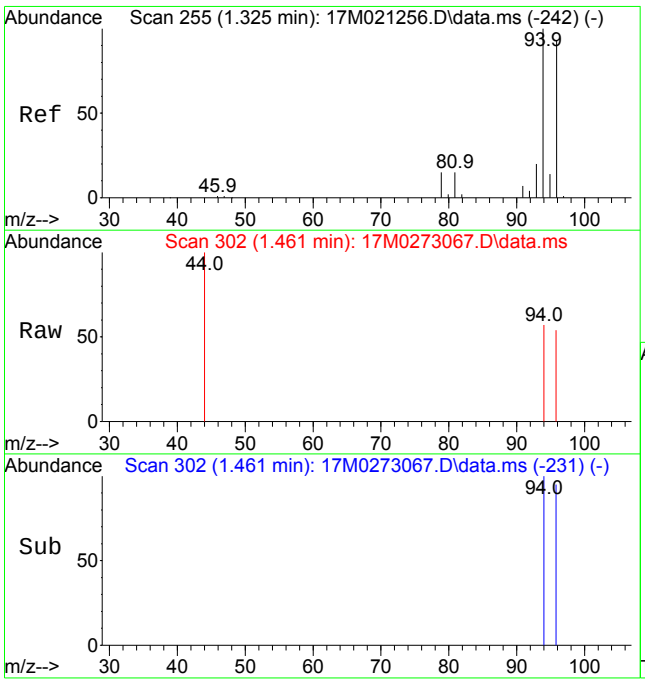
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273067.D Vial: 3
Acq On : 27 Apr 2017 12:42 Operator: ADC
Sample : WG611827-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:46:00 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



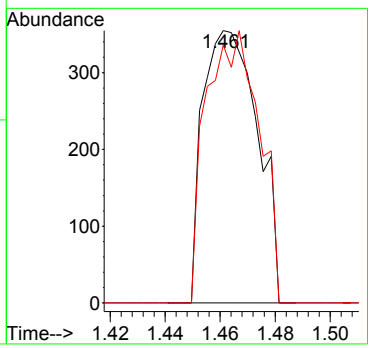
826VMS.M Fri Apr 28 09:46:01 2017 Page: 2

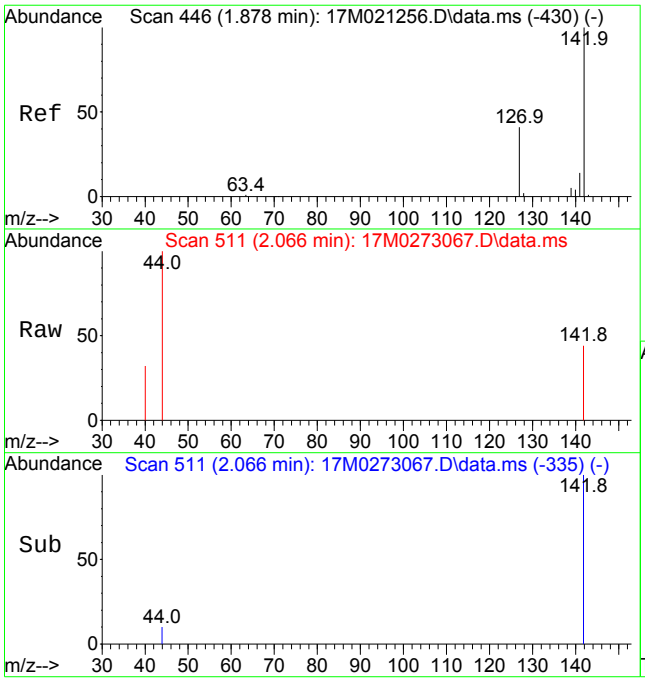


#6
Bromomethane
Concen: 0.1273 ug/L
RT: 1.461 min Scan# 302
Delta R.T. 0.006 min
Lab File: 17M0273067.D
Acq: 27 Apr 2017 12:42

Tgt Ion: 94 Resp: 490

Ion	Ratio	Lower	Upper
94	100		
96	97.3	56.1	130.9

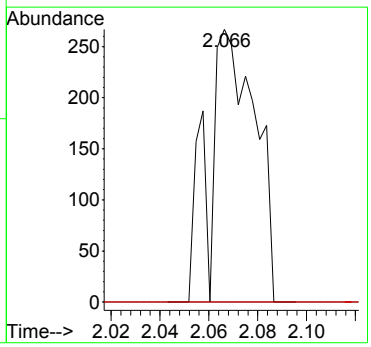




#13
Iodomethane
Concen: 2.0584 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273067.D
Acq: 27 Apr 2017 12:42

Tgt Ion:142 Resp: 357

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146768.D Vial: 4
Acq On : 27 Apr 2017 13:34 Operator: TMB
Sample : WG611838-01 VBLK0427 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 13:56:43 2017 Quant Results File: 8260BWT.RES

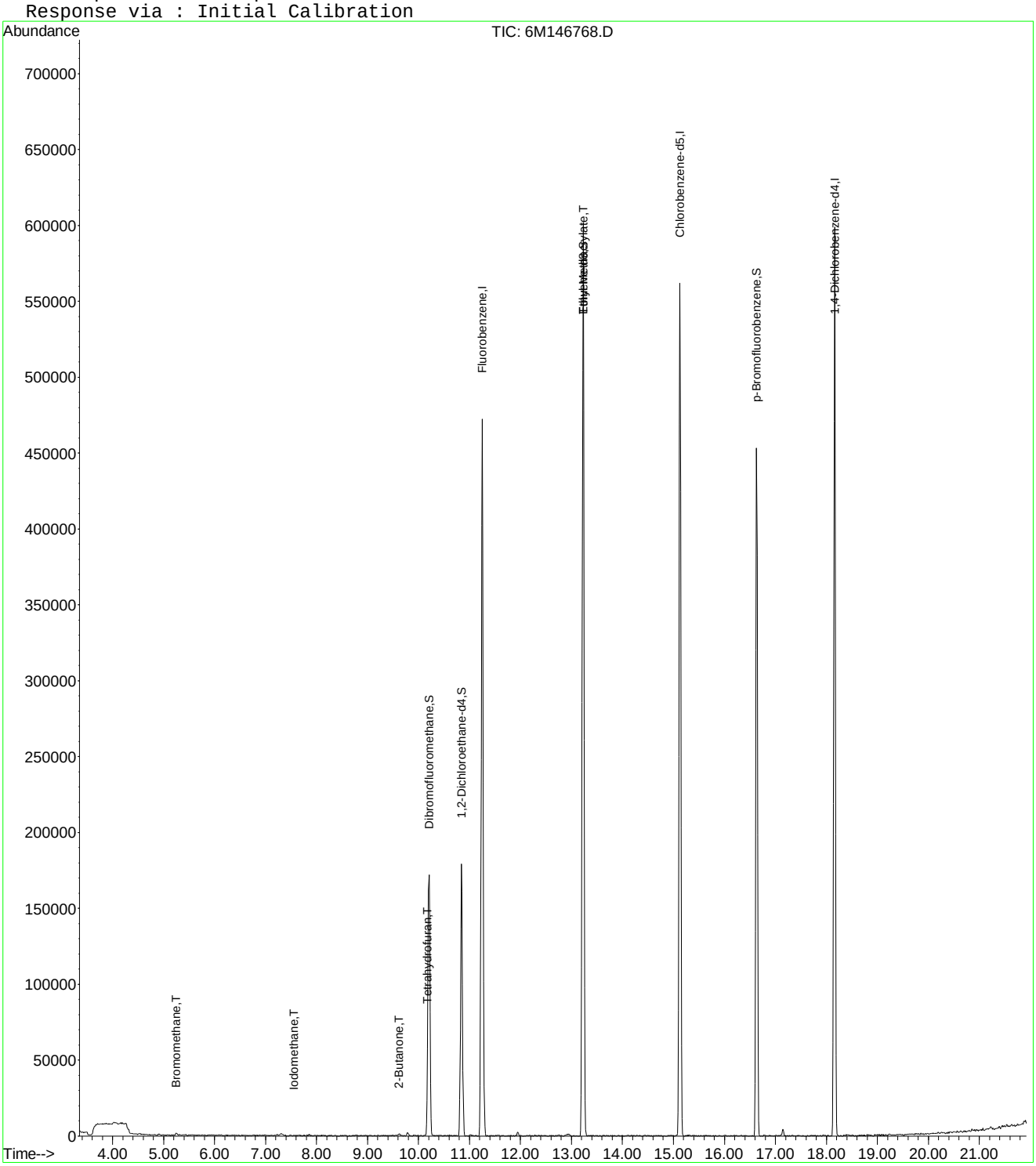
Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

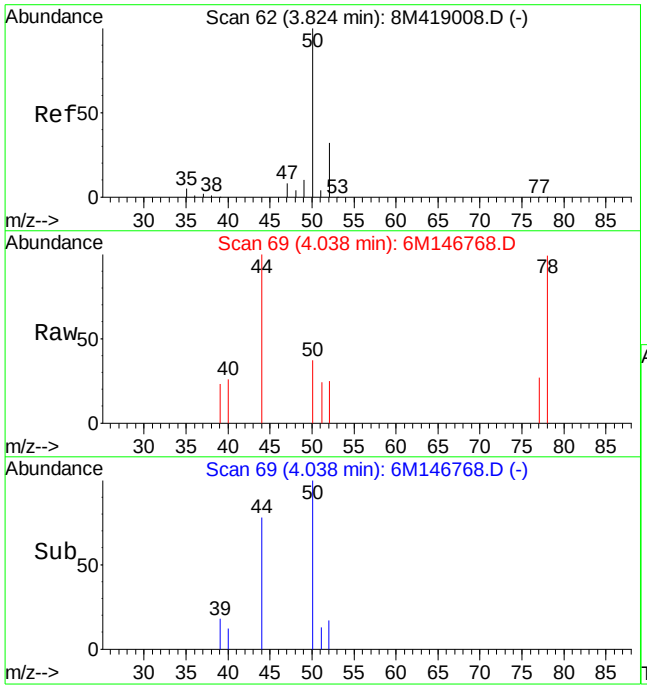
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	596145	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	410120	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	201206	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	151089	24.8272 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.32%		
43) 1,2-Dichloroethane-d4	10.84	65	161128	26.8641 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.44%		
58) Toluene-d8	13.23	98	558797	26.7016 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%		
80) p-Bromofluorobenzene	16.63	95	210511	27.5470 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.20%		
Target Compounds					Qvalue
3) Chloromethane	4.04	50	2555	Below Cal	90
6) Bromomethane	5.24	94	1276	0.2733 ug/L #	60
17) Iodomethane	7.55	142	199	0.8214 ug/L #	32
29) 2-Butanone	9.61	43	2929	1.8065 ug/L #	57
36) Tetrahydrofuran	10.18	42	5430	5.0857 ug/L	86
60) Ethyl Methacrylate	13.23	69	1045	0.1684 ug/L	98

(#) = qualifier out of range (m) = manual integration
6M146768.D 8260WT.M Fri Apr 28 06:47:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146768.D Vial: 4
Acq On : 27 Apr 2017 13:34 Operator: TMB
Sample : WG611838-01 VBLK0427 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 13:56 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

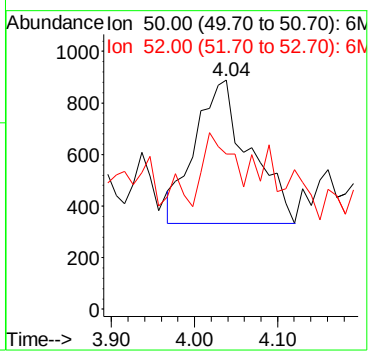


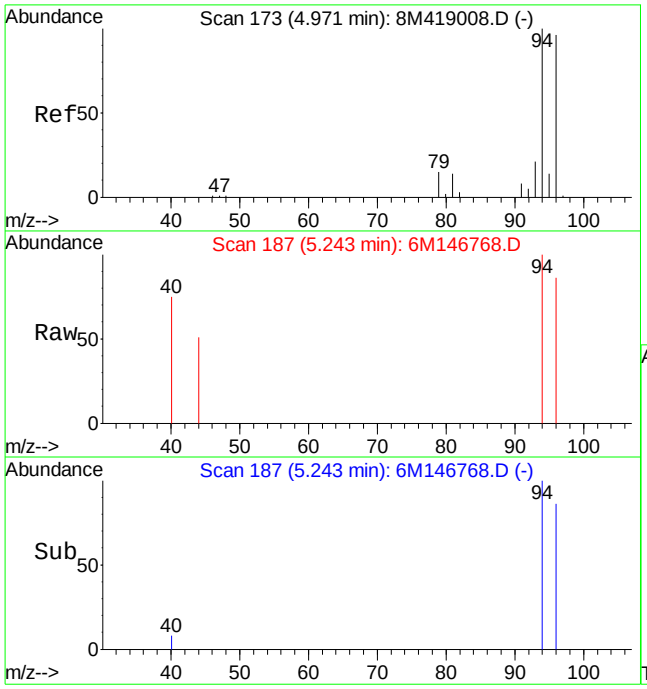


#3
Chloromethane
Concen: Below Cal
RT: 4.04 min Scan# 69
Delta R.T. 0.02 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 50 Resp: 2555

Ion	Ratio	Lower	Upper
50	100		
52	27.4	19.8	46.2

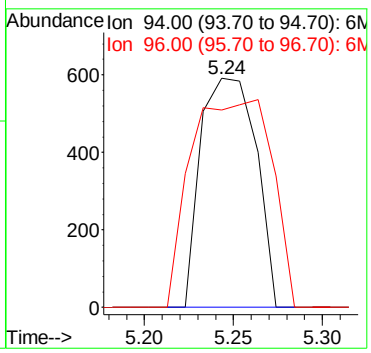


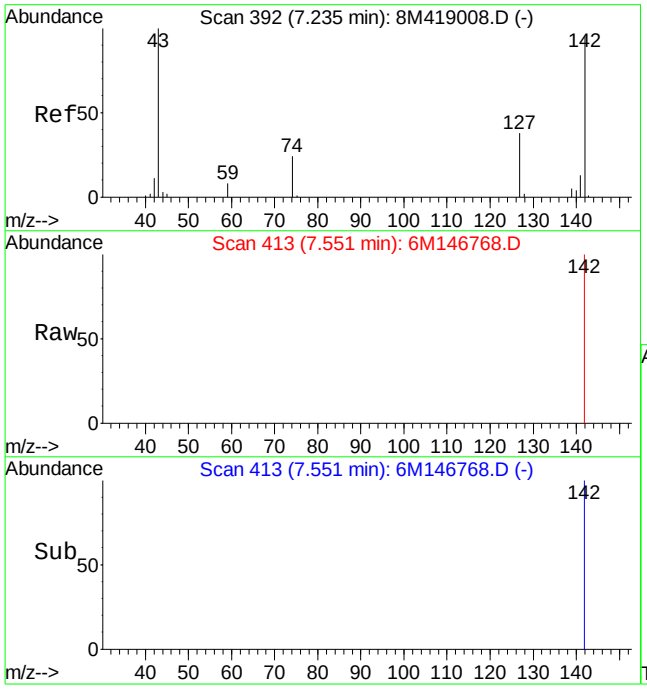


#6
Bromomethane
Concen: 0.27 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 94 Resp: 1276

Ion	Ratio	Lower	Upper
94	100		
96	132.8	56.7	132.3#

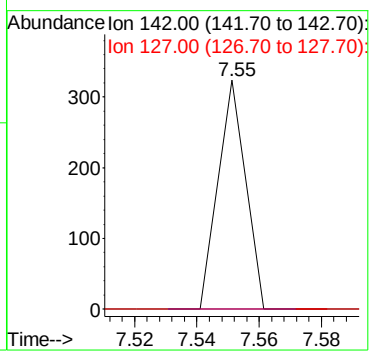


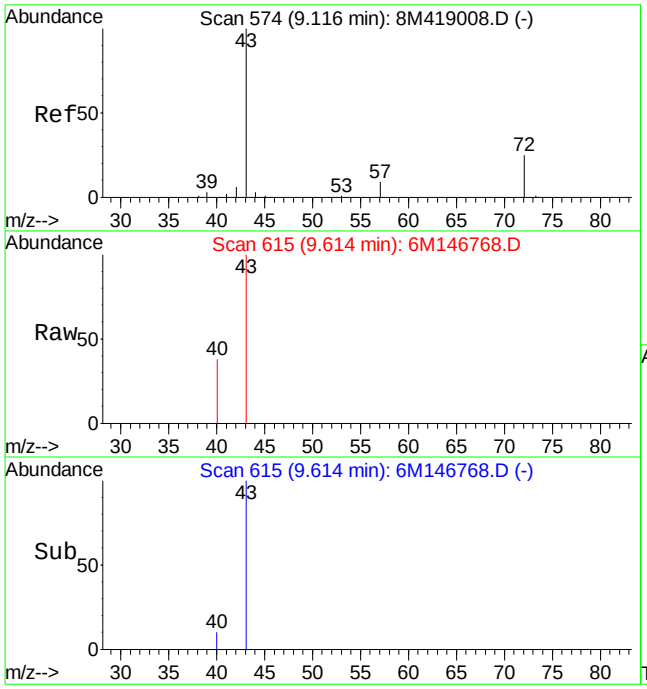


#17
Iodomethane
Concen: 0.82 ug/L
RT: 7.55 min Scan# 413
Delta R.T. 0.02 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion:142 Resp: 199

Ion	Ratio	Lower	Upper
142	100		
127	0.0	26.4	61.6#

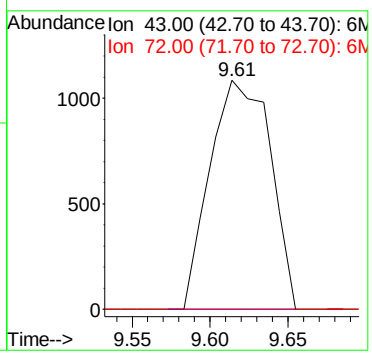


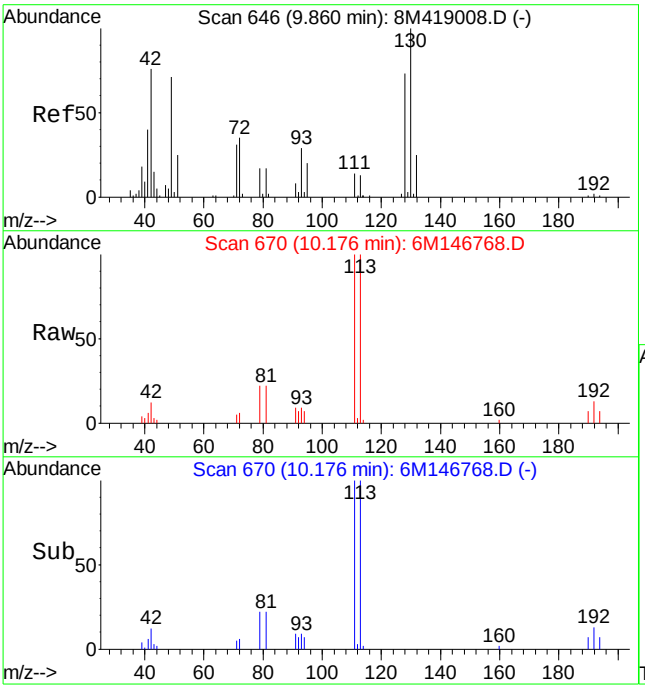


#29
2-Butanone
Concen: 1.81 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 43 Resp: 2929

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

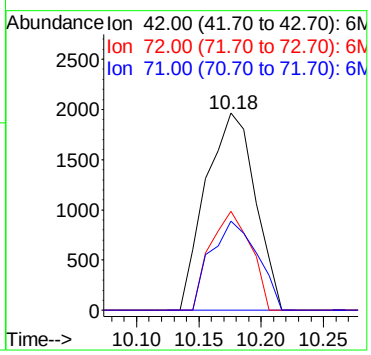


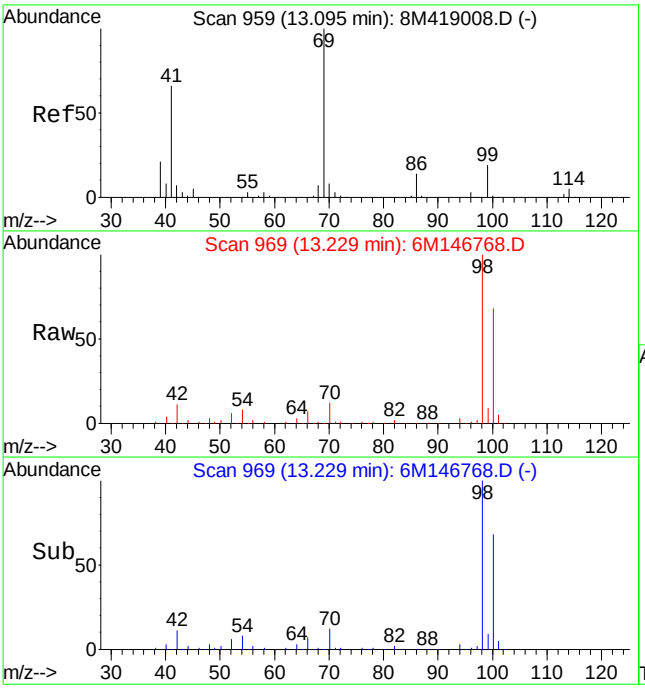


#36
Tetrahydrofuran
Concen: 5.09 ug/L
RT: 10.18 min Scan# 670
Delta R.T. -0.00 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 42 Resp: 5430

Ion	Ratio	Lower	Upper
42	100		
72	41.3	20.8	48.4
71	42.6	19.9	46.5

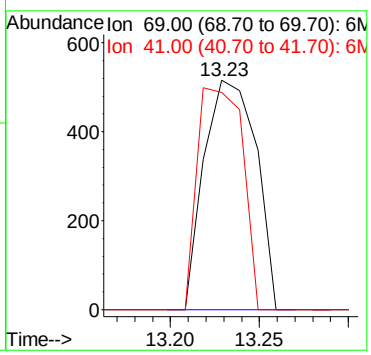




#60
Ethyl Methacrylate
Concen: 0.17 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 69 Resp: 1045

Ion	Ratio	Lower	Upper
69	100		
41	84.3	51.4	120.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146768.D Vial: 4
Acq On : 27 Apr 2017 13:34 Operator: TMB
Sample : WG611838-01 VBLK0427 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 07:20:15 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

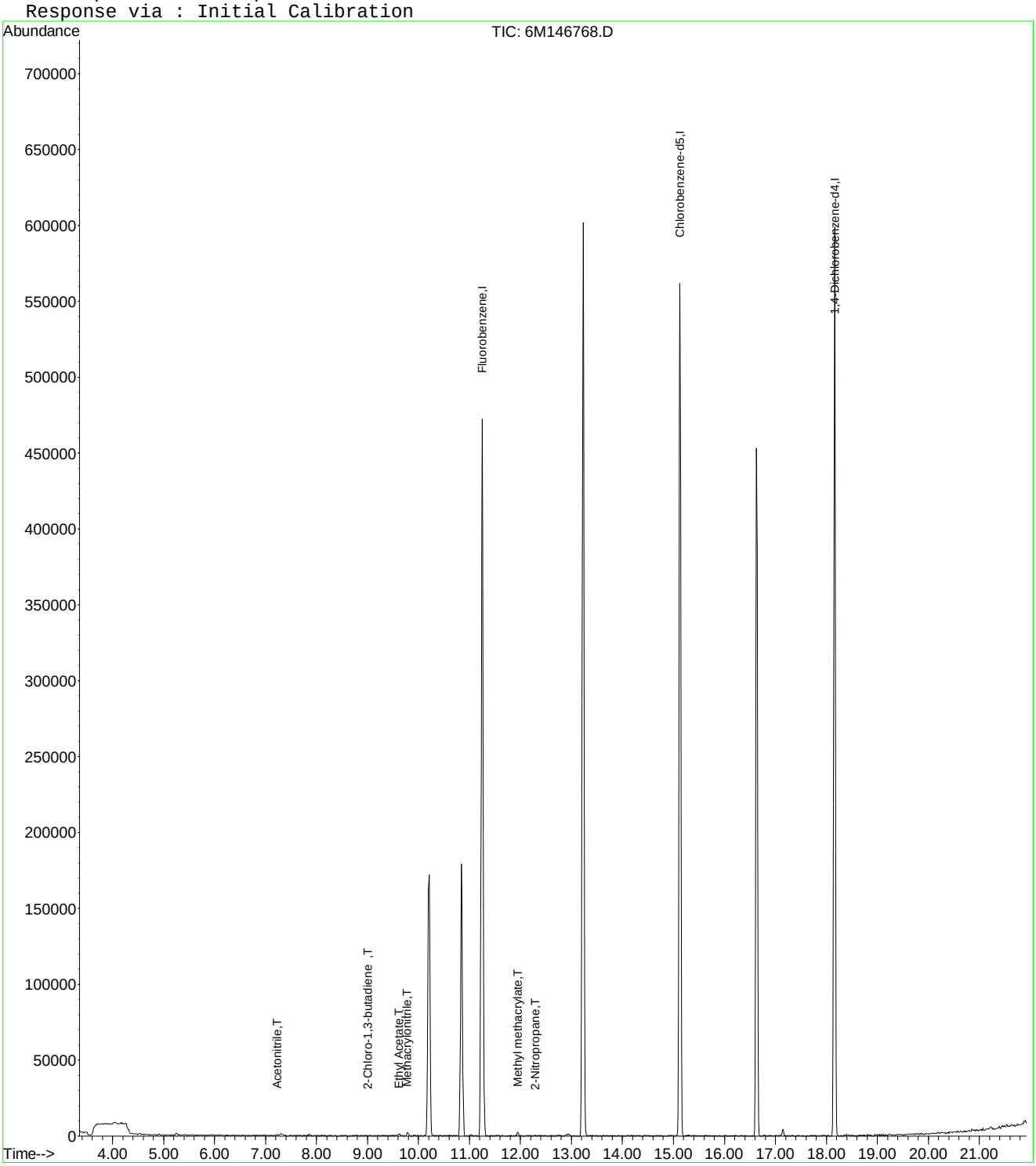
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	596145	25.00	ug/L	-0.02
11) Chlorobenzene-d5	15.13	117	410120	25.00	ug/L	-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	201206	25.00	ug/L	-0.02

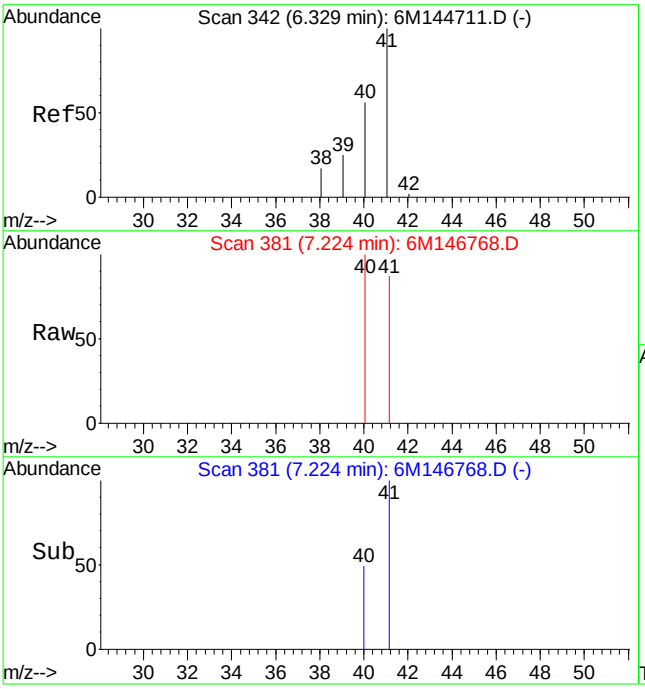
Target Compounds						Qvalue
2) Acetonitrile	7.22	41	830	1.9475	ug/L	# 24
4) 2-Chloro-1,3-butadiene	9.00	53	184	0.0209	ug/L	# 23
5) Ethyl Acetate	9.61	43	2929	0.7661	ug/L	# 68
6) Methacrylonitrile	9.78	67	947	0.4705	ug/L	# 63
9) Methyl methacrylate	11.94	41	1542	0.3686	ug/L	# 73
10) 2-Nitropropane	12.29	43	406	0.2387	ug/L	# 58

(#) = qualifier out of range (m) = manual integration
6M146768.D A9FOOWT.M Fri Apr 28 08:07:45 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146768.D Vial: 4
Acq On : 27 Apr 2017 13:34 Operator: TMB
Sample : WG611838-01 VBLK0427 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 7:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration

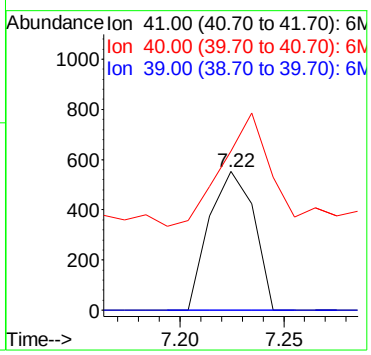


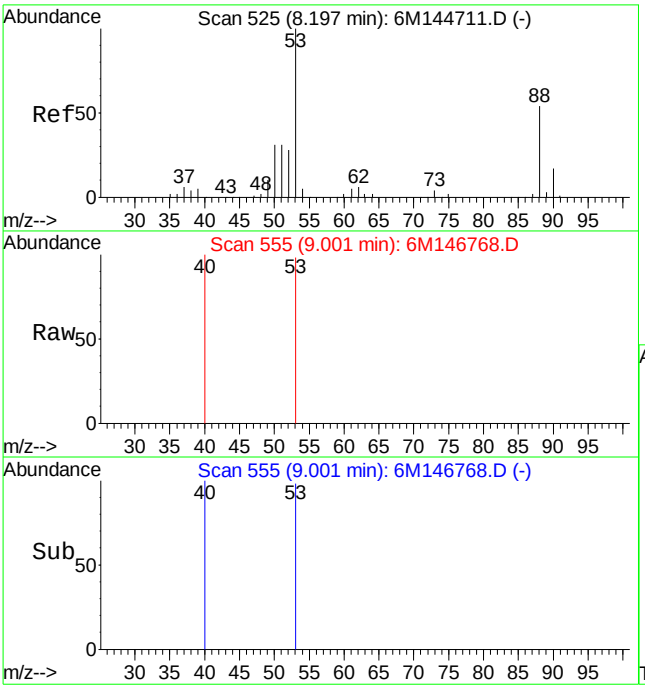


#2
Acetonitrile
Concen: 1.95 ug/L
RT: 7.22 min Scan# 381
Delta R.T. -0.01 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 41 Resp: 830

Ion	Ratio	Lower	Upper
41	100		
40	124.9	19.8	99.8#
39	0.0	0.0	57.7

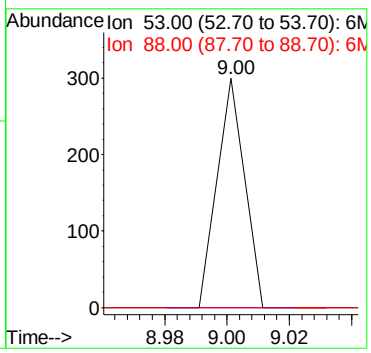


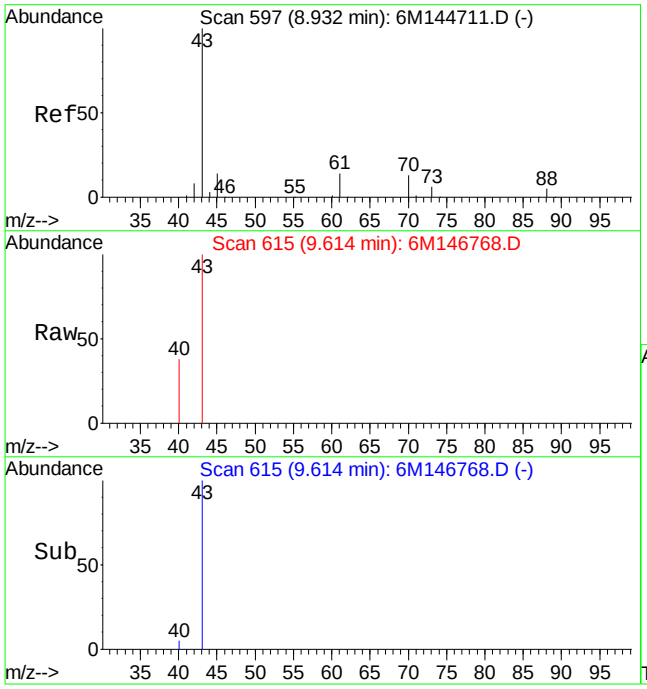


#4
2-Chloro-1,3-butadiene
Concen: 0.02 ug/L
RT: 9.00 min Scan# 555
Delta R.T. -0.01 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 53 Resp: 184

Ion	Ratio	Lower	Upper
53	100		
88	0.0	16.1	96.1#

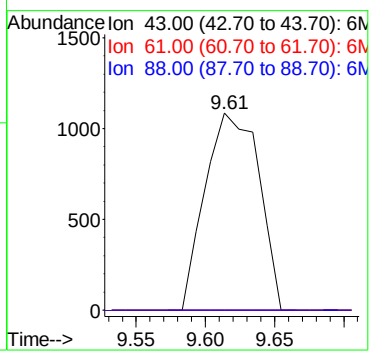


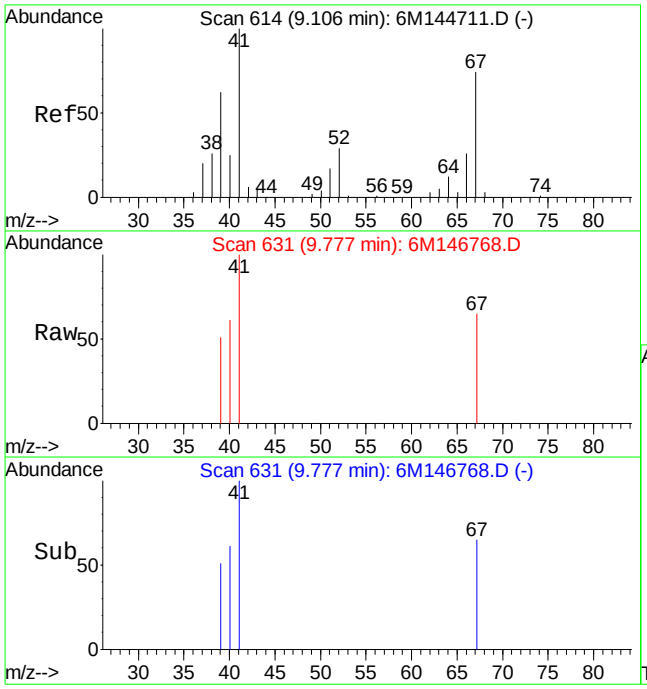


#5
Ethyl Acetate
Concen: 0.77 ug/L
RT: 9.61 min Scan# 615
Delta R.T. -0.02 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 43 Resp: 2929

Ion	Ratio	Lower	Upper
43	100		
61	0.0	9.5	22.1#
88	0.0	2.8	6.4#

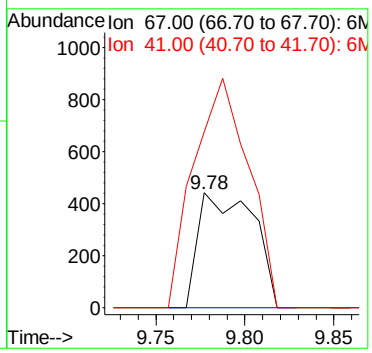


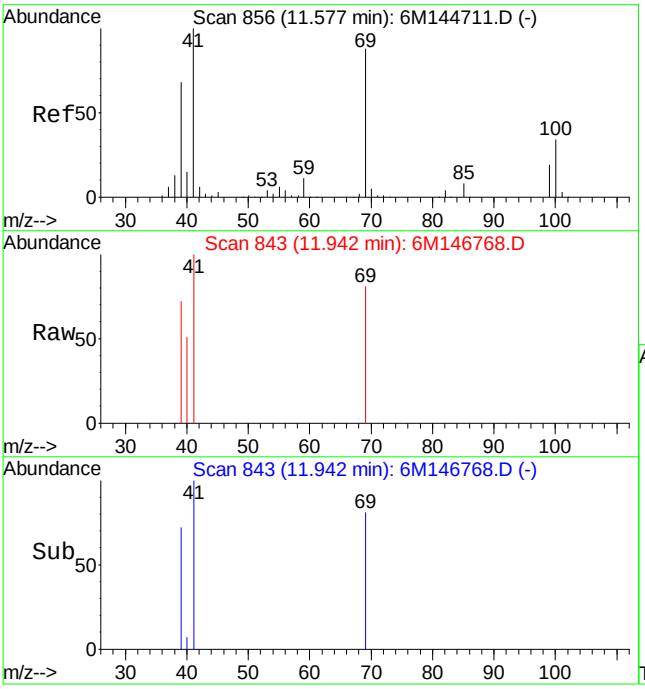


#6
Methacrylonitrile
Concen: 0.47 ug/L
RT: 9.78 min Scan# 631
Delta R.T. -0.02 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 67 Resp: 947

Ion	Ratio	Lower	Upper
67	100		
41	199.9	112.0	192.0#

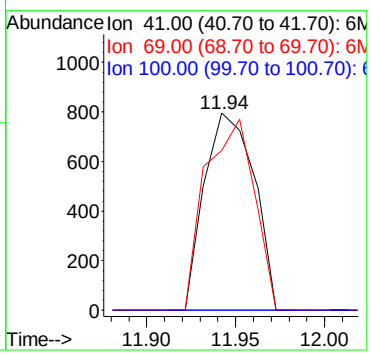


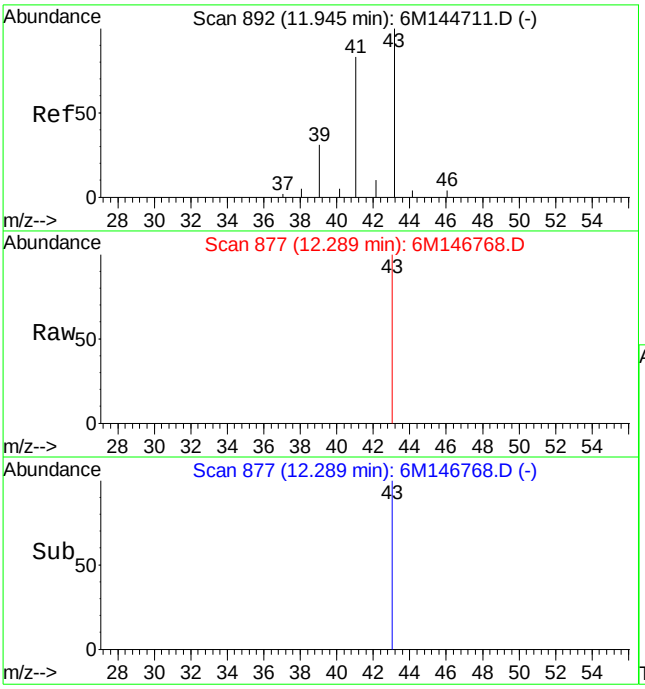


#9
Methyl methacrylate
Concen: 0.37 ug/L
RT: 11.94 min Scan# 843
Delta R.T. -0.02 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 41 Resp: 1542

Ion	Ratio	Lower	Upper
41	100		
69	95.3	42.7	122.7
100	0.0	0.0	73.7

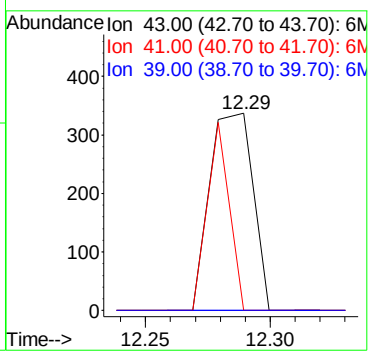




#10
2-Nitropropane
Concen: 0.24 ug/L
RT: 12.29 min Scan# 877
Delta R.T. -0.01 min
Lab File: 6M146768.D
Acq: 27 Apr 2017 13:34

Tgt Ion: 43 Resp: 406

Ion	Ratio	Lower	Upper
43	100		
41	48.5	50.0	116.8#
39	0.0	16.6	38.8#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:16:34 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

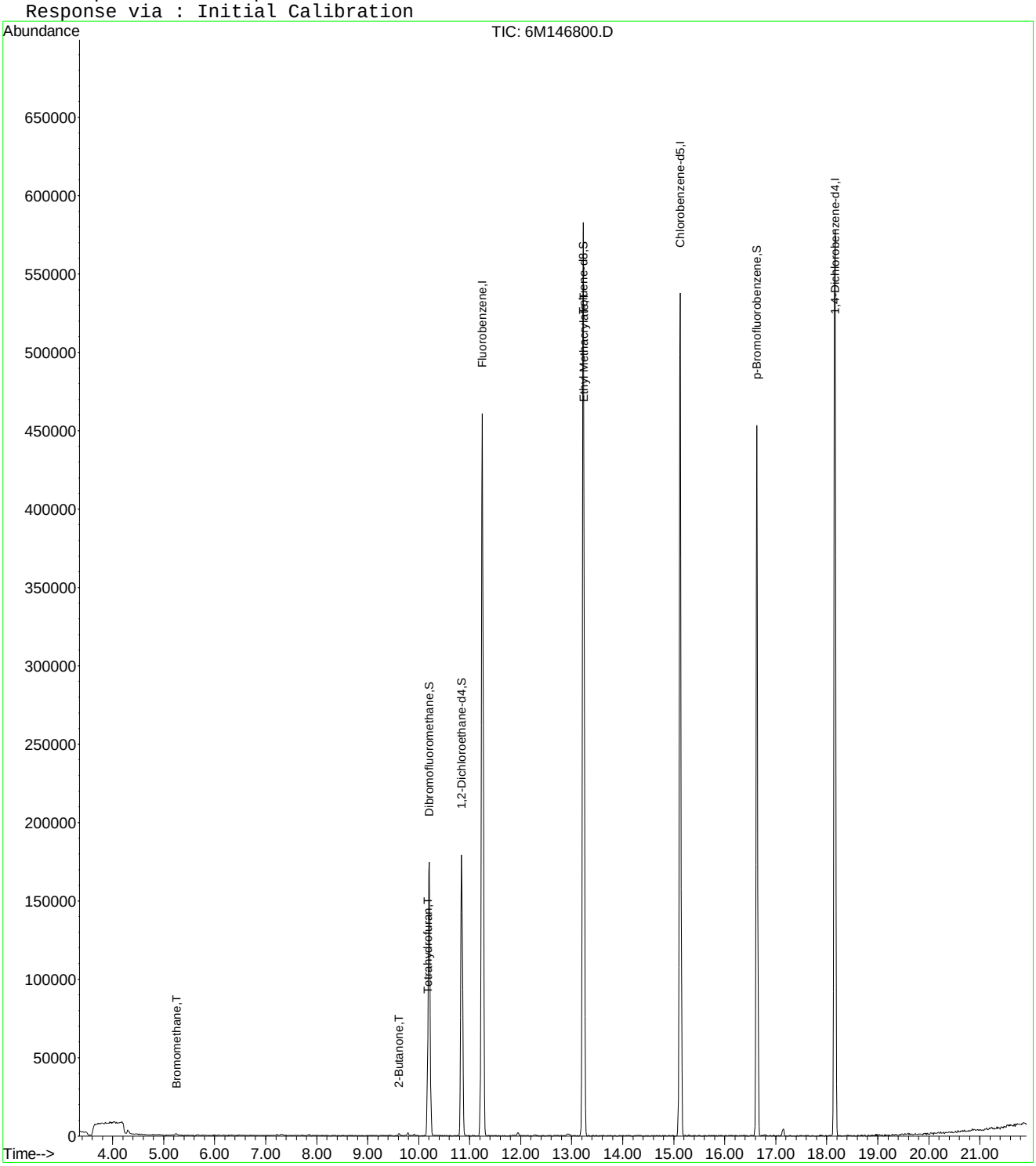
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	587274	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	403127	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	201980	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	153561	25.6145	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.44%			
43) 1,2-Dichloroethane-d4	10.84	65	162056	27.4270	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.72%			
58) Toluene-d8	13.23	98	545120	26.4999	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%			
80) p-Bromofluorobenzene	16.63	95	209143	27.2631	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.04%			
Target Compounds						Qvalue
6) Bromomethane	5.25	94	1430	0.3109	ug/L	97
29) 2-Butanone	9.61	43	2496	1.5627	ug/L #	57
36) Tetrahydrofuran	10.18	42	5230	4.9723	ug/L	85
60) Ethyl Methacrylate	13.24	69	828	0.1358	ug/L #	51

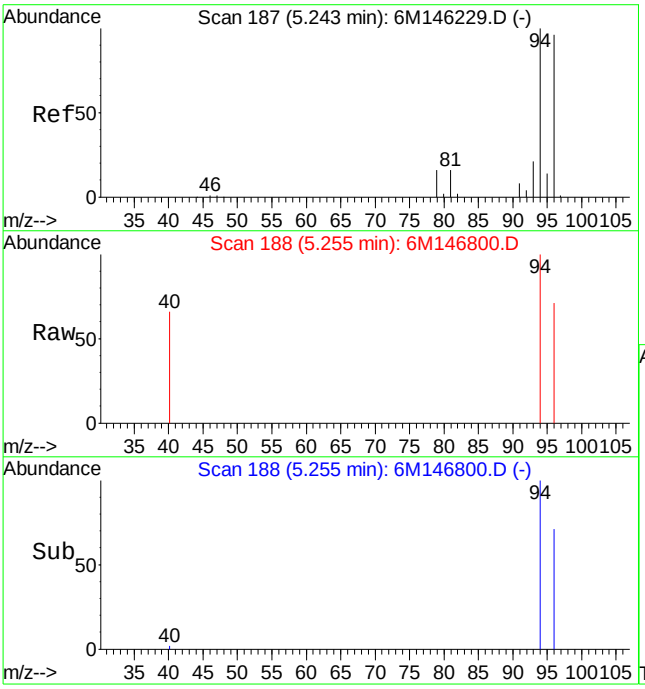
(#) = qualifier out of range (m) = manual integration
6M146800.D 8260BWT.M Sat Apr 29 12:16:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 8:16 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

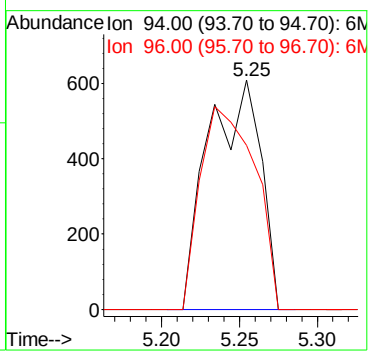


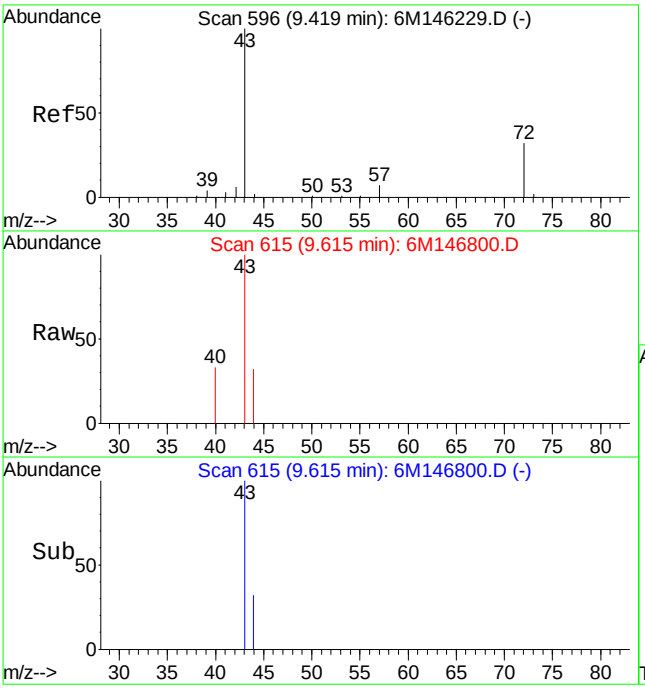


#6
Bromomethane
Concen: 0.31 ug/L
RT: 5.25 min Scan# 188
Delta R.T. 0.04 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 94 Resp: 1430

Ion	Ratio	Lower	Upper
94	100		
96	91.8	56.7	132.3

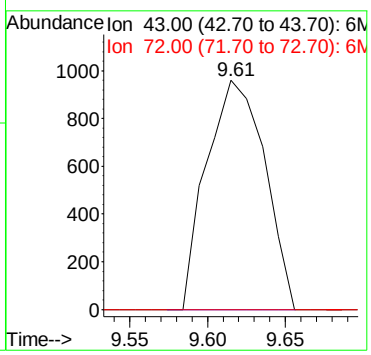


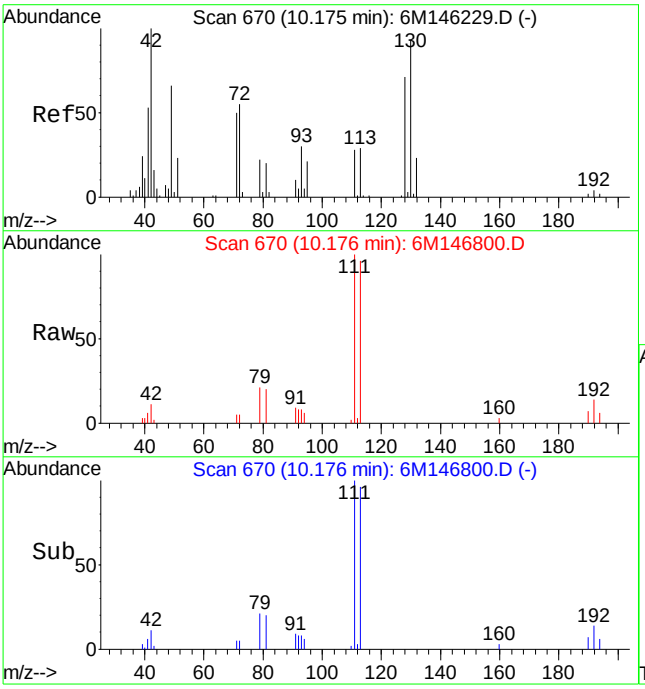


#29
2-Butanone
Concen: 1.56 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 2496

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

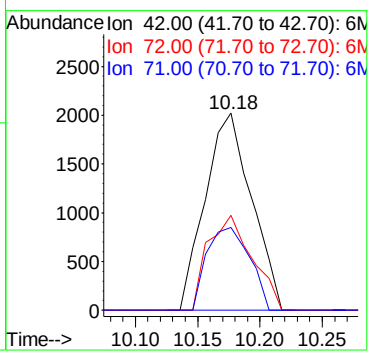


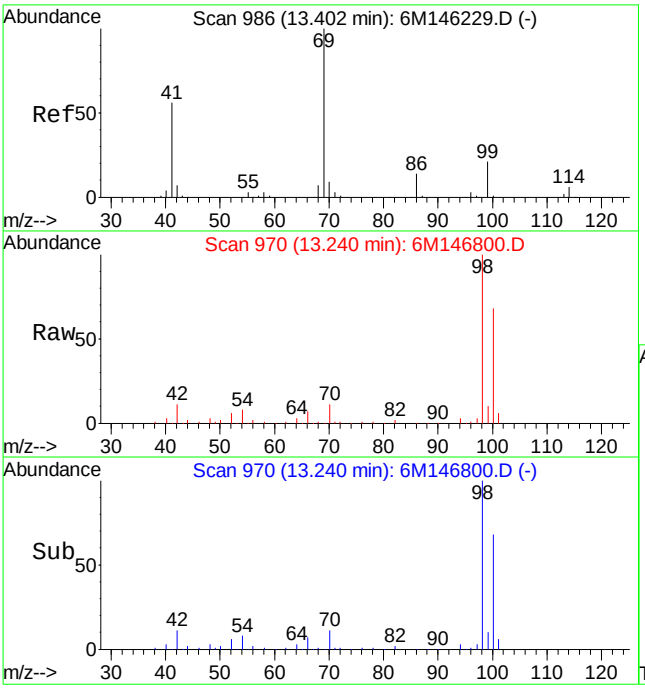


#36
Tetrahydrofuran
Concen: 4.97 ug/L
RT: 10.18 min Scan# 670
Delta R.T. 0.00 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 42 Resp: 5230

Ion	Ratio	Lower	Upper
42	100		
72	45.7	20.8	48.4
71	38.7	19.9	46.5

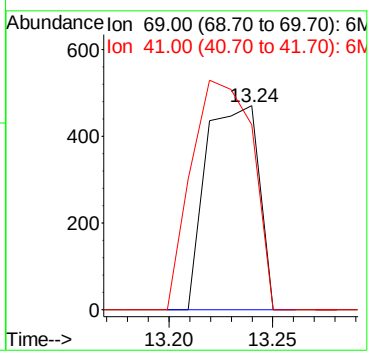




#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 69 Resp: 828

Ion	Ratio	Lower	Upper
69	100		
41	130.6	51.4	120.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

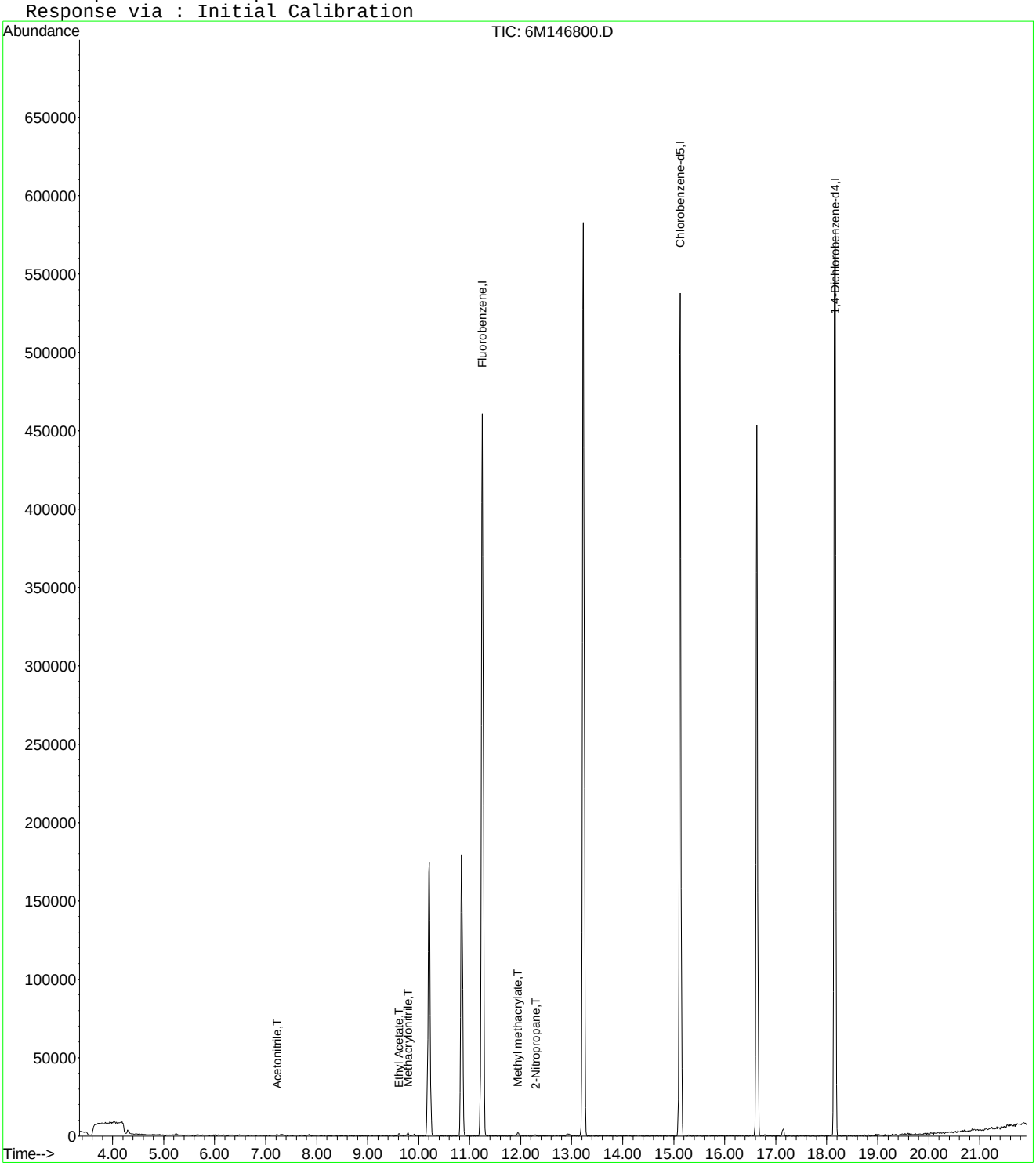
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	587274	25.00	ug/L	-0.02
11) Chlorobenzene-d5	15.13	117	403127	25.00	ug/L	-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	201980	25.00	ug/L	-0.02
Target Compounds						Qvalue
2) Acetonitrile	7.23	41	733	1.7459	ug/L	# 65
5) Ethyl Acetate	9.61	43	2496	0.6627	ug/L	# 68
6) Methacrylonitrile	9.79	67	703	0.3545	ug/L	# 20
9) Methyl methacrylate	11.94	41	1296	0.3145	ug/L	# 69
10) 2-Nitropropane	12.29	43	404	0.2411	ug/L	# 68

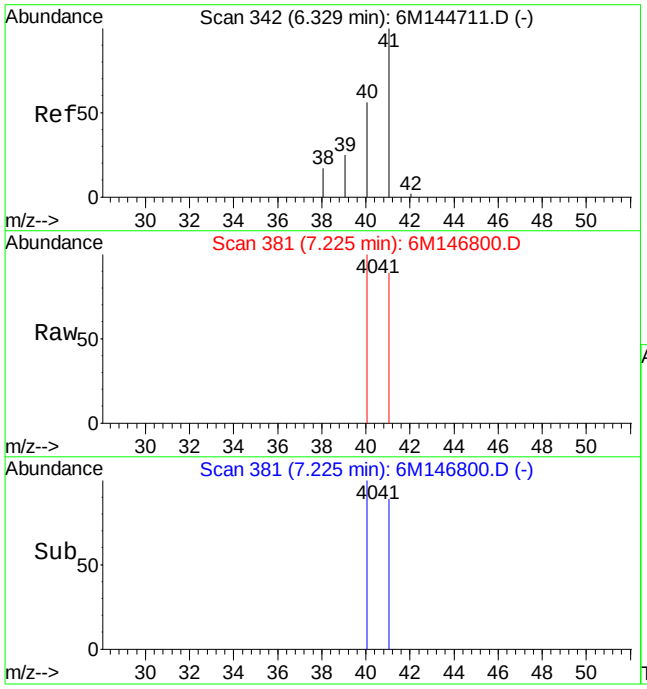
(#) = qualifier out of range (m) = manual integration
6M146800.D A9FOOWT.M Sat Apr 29 13:41:24 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration

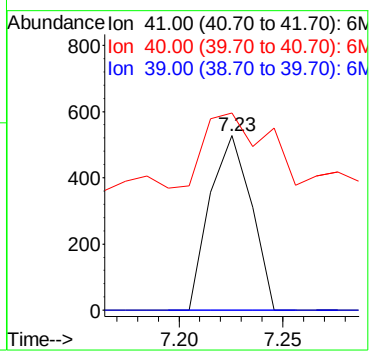


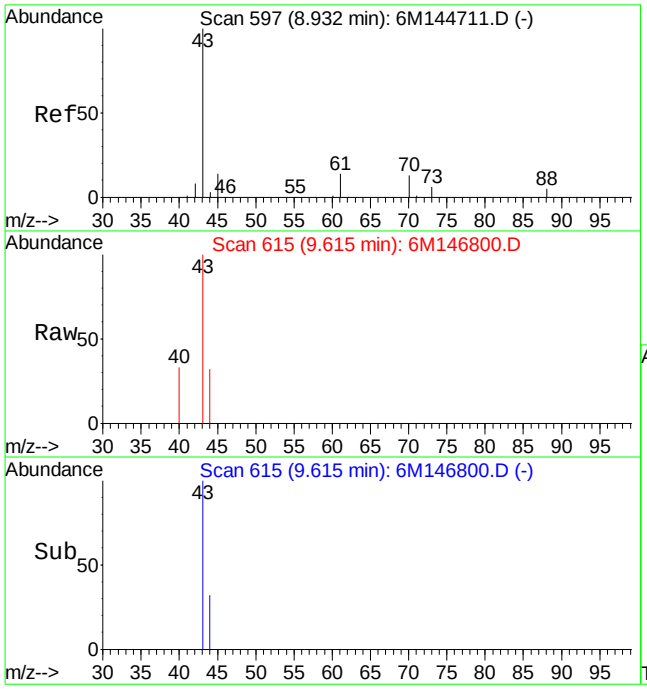


#2
Acetonitrile
Concen: 1.75 ug/L
RT: 7.23 min Scan# 381
Delta R.T. -0.00 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 41 Resp: 733

Ion	Ratio	Lower	Upper
41	100		
40	85.0	19.8	99.8
39	0.0	0.0	57.7

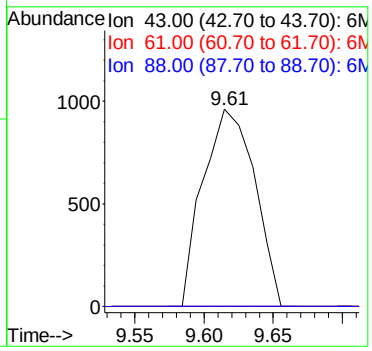


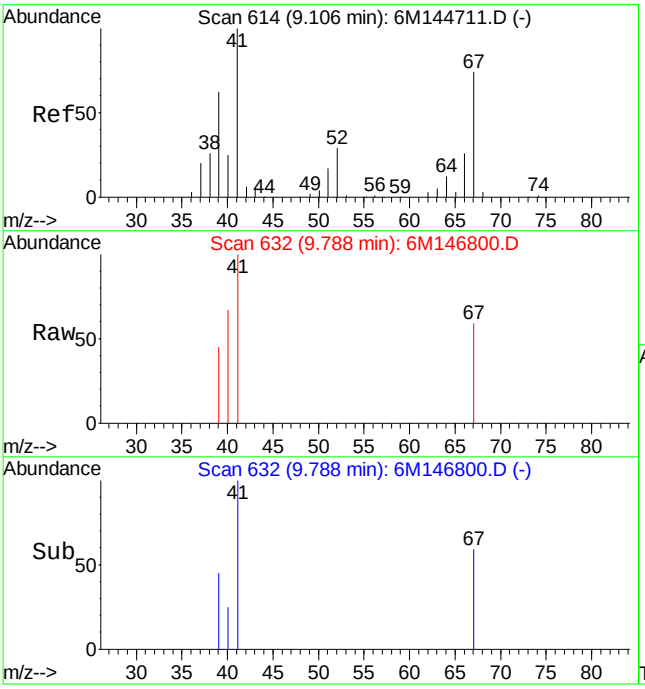


#5
Ethyl Acetate
Concen: 0.66 ug/L
RT: 9.61 min Scan# 615
Delta R.T. -0.02 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 2496

Ion	Ratio	Lower	Upper
43	100		
61	0.0	9.5	22.1#
88	0.0	2.8	6.4#

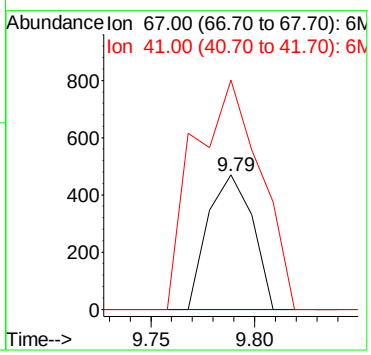


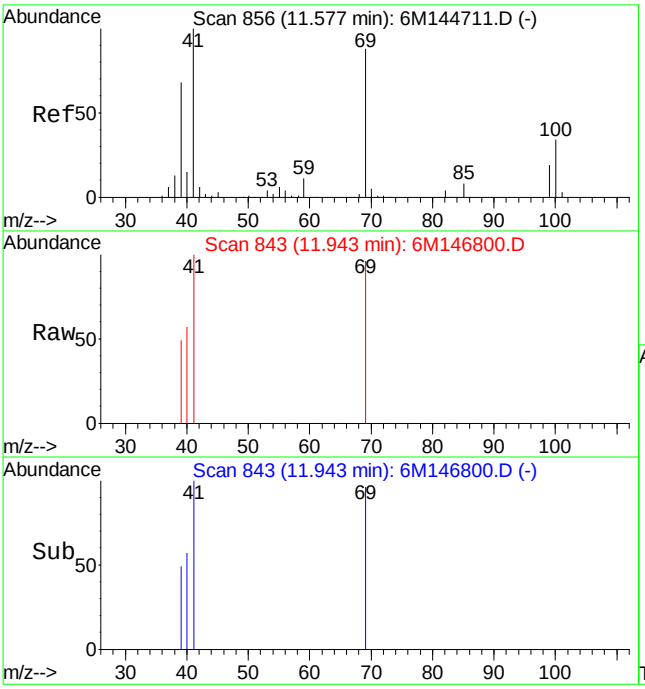


#6
Methacrylonitrile
Concen: 0.35 ug/L
RT: 9.79 min Scan# 632
Delta R.T. -0.01 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 67 Resp: 703

Ion	Ratio	Lower	Upper
67	100		
41	254.1	112.0	192.0#

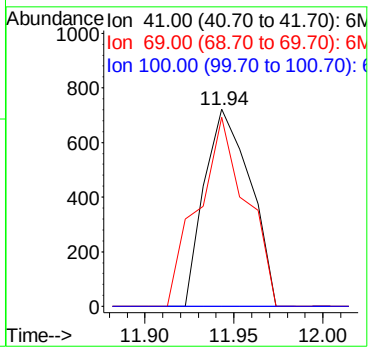


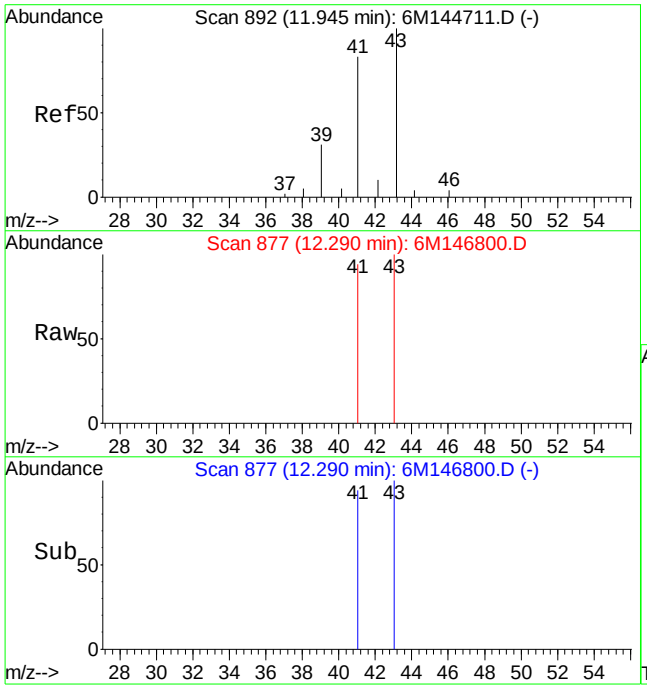


#9
Methyl methacrylate
Concen: 0.31 ug/L
RT: 11.94 min Scan# 843
Delta R.T. -0.02 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 41 Resp: 1296

Ion	Ratio	Lower	Upper
41	100		
69	100.8	42.7	122.7
100	0.0	0.0	73.7

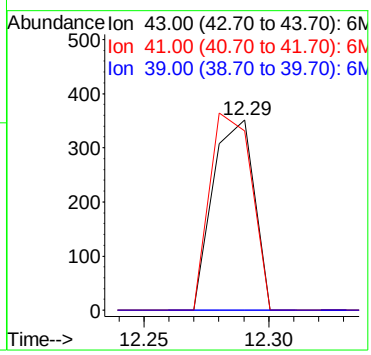




#10
2-Nitropropane
Concen: 0.24 ug/L
RT: 12.29 min Scan# 877
Delta R.T. -0.01 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 404

Ion	Ratio	Lower	Upper
43	100		
41	105.4	50.0	116.8
39	0.0	16.6	38.8#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419203.D Vial: 4
Acq On : 27 Apr 2017 12:55 Operator: TMB
Sample : WG611829-01 VBLK0427 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 13:17:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

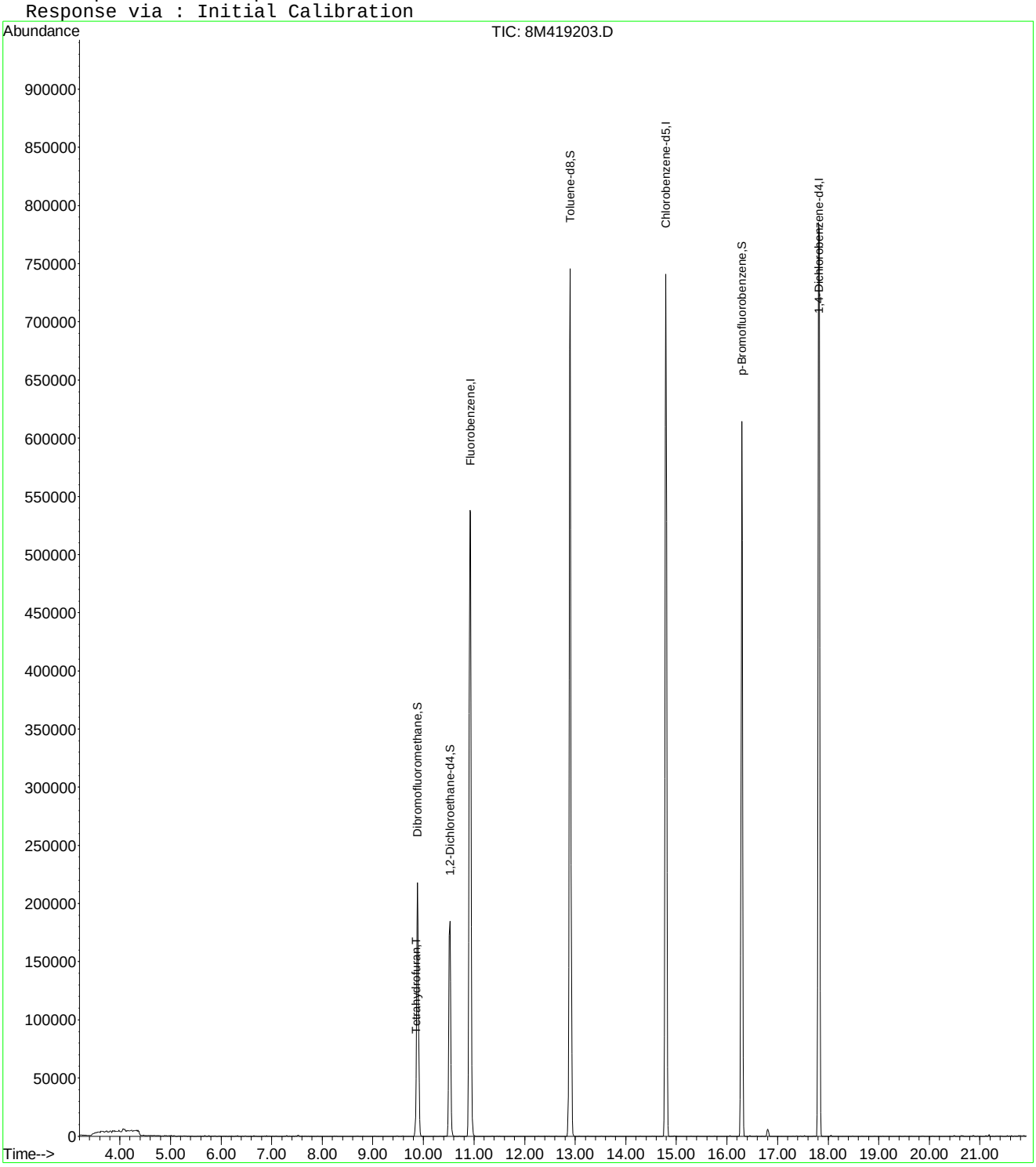
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	682398	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.79	117	544970	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	274776	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	179534	25.0832	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.32%			
43) 1,2-Dichloroethane-d4	10.52	65	159366	25.7551	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.04%			
58) Toluene-d8	12.90	98	670677	26.9341	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.72%			
80) p-Bromofluorobenzene	16.29	95	259192	26.7272	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.92%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.85	42	4347	4.1957	ug/L	76

(#) = qualifier out of range (m) = manual integration
8M419203.D 8260WT.M Fri Apr 28 06:55:52 2017 Page 1

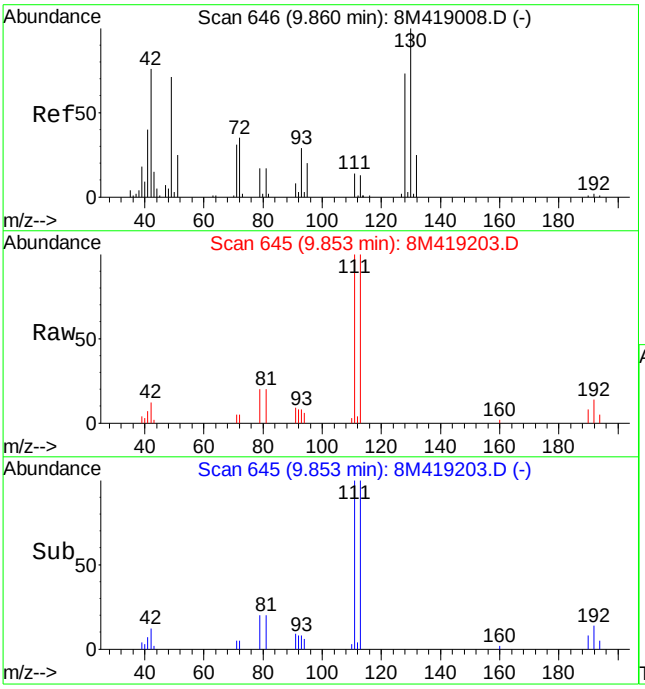
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419203.D Vial: 4
Acq On : 27 Apr 2017 12:55 Operator: TMB
Sample : WG611829-01 VBLK0427 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 13:17 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



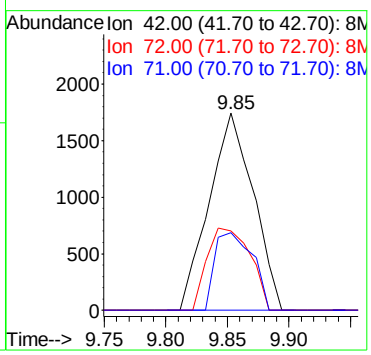
8M419203.D 8260WT.M Fri Apr 28 06:55:52 2017 Page 2



#36
Tetrahydrofuran
Concen: 4.20 ug/L
RT: 9.85 min Scan# 645
Delta R.T. -0.01 min
Lab File: 8M419203.D
Acq: 27 Apr 2017 12:55

Tgt Ion: 42 Resp: 4347

Ion	Ratio	Lower	Upper
42	100		
72	40.7	32.9	76.9
71	33.6	32.1	74.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	395669	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	296865	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	152225	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	107724	25.2096	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.838%			
34) 1,2-Dichloroethane-d4	4.962	65	102707	25.6428	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.571%			
47) Toluene-d8	6.815	98	381102	25.7232	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.893%			
66) p-Bromofluorobenzene	8.784	95	133452	26.1829	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.732%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	127554	27.1443	ug/L	100
3) Chloromethane	1.224	50	95534	20.7737	ug/L	100
4) Vinyl Chloride	1.273	62	120513	23.6657	ug/L	100
5) 1,3-Butadiene	1.285	54	100473	32.1345	ug/L	98
6) Bromomethane	1.464	94	79163	20.9093	ug/L	99
7) Chloroethane	1.537	64	48568	20.1043	ug/L	95
8) Trichlorofluoromethane	1.621	101	140836	21.5611	ug/L	100
9) Diethyl ether	1.849	59	218443	69.3479	ug/L	98
10) 1,1-Dichloroethene	1.965	61	120721	19.7521	ug/L	97
11) Carbon Disulfide	1.980	76	217353	16.5697	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	84408	21.6626	ug/L	99
13) Iodomethane	2.066	142	113958	20.5612	ug/L	99
14) Acrolein	2.229	56	35368	90.8971	ug/L	99
15) Methylene Chloride	2.408	84	89241	19.2428	ug/L	98
16) Acetone	2.475	43	16174	20.3305	ug/L	99
17) trans-1,2-Dichloroethene	2.544	96	83132	19.9761	ug/L	99
18) Methyl acetate	2.579	43	47091	22.5786	ug/L #	96
19) Methyl Tert Butyl Ether	2.660	73	217626	20.6057	ug/L	96
20) 1,1-Dichloroethane	3.123	63	151831	20.3129	ug/L	100
21) Acrylonitrile	3.190	53	21450	21.1389	ug/L	99
22) Vinyl Acetate	2.619	86	14188	21.1831	ug/L	87
23) cis-1,2-Dichloroethene	3.737	96	94040	19.9633	ug/L	98
24) 2,2-Dichloropropane	3.867	77	127707	21.7219	ug/L	97
25) Cyclohexane	3.969	56	119087	18.7316	ug/L #	88
26) Bromochloromethane	3.986	130	62515	20.5975	ug/L	99
27) Chloroform	4.119	83	158573	20.3480	ug/L	99
28) Carbon Tetrachloride	4.255	117	126582	20.5405	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	142715	20.8297	ug/L	98
31) 1,1-Dichloropropene	4.510	75	108869	20.2326	ug/L	98
32) 2-Butanone	4.539	43	25094	21.1577	ug/L	97
33) Benzene	4.800	78	336107	19.9426	ug/L	99
35) 1,2-Dichloroethane	5.037	62	106191	20.2351	ug/L	99
36) Methylcyclohexane	5.425	83	131192	19.6957	ug/L	99
37) Trichloroethene	5.448	130	94574	18.6823	ug/L	98
38) Dibromomethane	5.862	93	52948	20.5121	ug/L	99
39) 1,2-Dichloropropane	5.966	63	89345	20.2148	ug/L	100
40) Bromodichloromethane	6.053	83	116205	19.6986	ug/L	100
41) 1,4-Dioxane	6.262	88	3360	152.6294	ug/L	92
42) 2-Chloroethyl Vinyl Ether	6.632	63	46690	23.2898	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	145824	21.9364	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	23440	21.3451	ug/L	97
45) trans-1,3-Dichloropropene	7.243	75	117811	20.8466	ug/L	99
48) Toluene	6.858	91	370398	19.9009	ug/L	100
49) Tetrachloroethene	7.185	166	105214	19.8197	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	70918	19.6584	ug/L	99
51) Dibromochloromethane	7.507	129	95352	19.3643	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

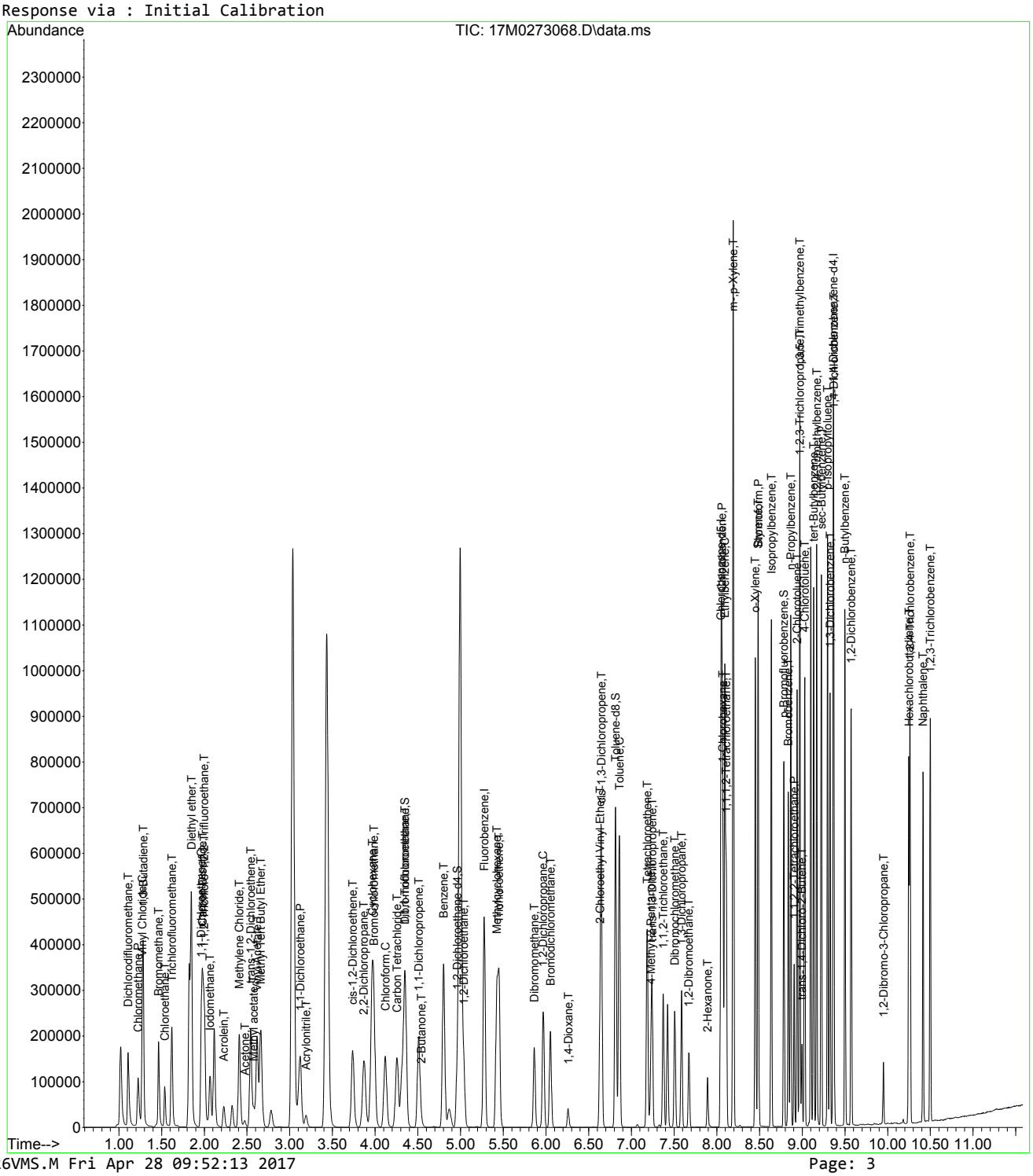
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	118833	20.7265	ug/L		98
53) 1,2-Dibromoethane	7.672	107	72527	19.6226	ug/L		99
54) 2-Hexanone	7.892	43	41953	22.1452	ug/L		98
55) Chlorobenzene	8.060	112	242776	19.4404	ug/L		96
56) 1-Chlorohexane	8.071	69	21596	21.4193	ug/L		96
57) Ethylbenzene	8.095	106	129447	19.9129	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.109	131	93213	19.1745	ug/L		99
59) m-,p-Xylene	8.193	106	313957	40.0178	ug/L		97
60) o-Xylene	8.451	106	154561	19.9949	ug/L		99
61) Styrene	8.482	104	252287	20.3975	ug/L		99
62) Bromoform	8.485	173	67961	19.6200	ug/L		99
63) Isopropylbenzene	8.639	105	392841	19.6335	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	338127	19.9251	ug/L		98
67) Bromobenzene	8.836	156	114040	19.0450	ug/L		99
68) n-Propylbenzene	8.865	91	447750	19.9183	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	86075	21.0209	ug/L		99
70) 2-Chlorotoluene	8.940	91	269257	19.4058	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	24363	20.1265	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.995	53	17268	19.1362	ug/L	#	94
73) 1,2,4-Trimethylbenzene	9.169	105	338169	19.7622	ug/L		100
74) 4-Chlorotoluene	9.030	91	278026	20.0709	ug/L		99
75) tert-Butylbenzene	9.134	134	65446	19.2969	ug/L		98
76) sec-Butylbenzene	9.224	105	416294	19.9124	ug/L		99
77) p-Isopropyltoluene	9.296	119	360953	20.2537	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	199617	19.1227	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	201286	19.0995	ug/L		100
80) n-Butylbenzene	9.499	91	311126	20.6842	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	196375	19.3024	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	15567	20.7230	ug/L		94
83) Hexachlorobutadiene	10.249	225	82183	19.1622	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	150424	19.9035	ug/L		100
85) Naphthalene	10.414	128	291228	19.7608	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	139223	18.9651	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042717\17M0273068.D Vial: 4
Acq On : 27 Apr 2017 13:02 Operator: ADC
Sample : WG611827-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 09:52:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Fri Apr 28 09:52:13 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146769.D Vial: 5
Acq On : 27 Apr 2017 14:05 Operator: TMB
Sample : WG611838-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:27:36 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	646310	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	443423	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	226867	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	168926	25.6036	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.40%			
43) 1,2-Dichloroethane-d4	10.84	65	174376	26.8164	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.28%			
58) Toluene-d8	13.23	98	603834	26.6866	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.76%			
80) p-Bromofluorobenzene	16.63	95	231654	26.8849	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.52%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	222747	21.7069	ug/L	93
3) Chloromethane	4.04	50	263722	21.6154	ug/L	99
4) Vinyl Chloride	4.27	62	203773	17.3794	ug/L	99
5) 1,3-Butadiene	4.32	54	140911	31.1760	ug/L	89
6) Bromomethane	5.23	94	72797	14.3799	ug/L	100
7) Chloroethane	5.40	64	108399	21.4875	ug/L	87
8) Trichlorofluoromethane	5.91	101	238217	19.8231	ug/L	99
9) Diethyl ether	6.44	59	489730	97.7887	ug/L	85
10) Isoprene	6.48	67	186665	18.8849	ug/L	83
11) Acrolein	6.67	56	74251	135.3299	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	144604	21.2574	ug/L	97
13) Acetone	6.77	43	31217	22.3829	ug/L	90
14) 1,1-Dichloroethene	7.01	61	205941	20.9007	ug/L	89
15) Tert-Butyl Alcohol	7.11	59	77127	178.2847	ug/L	92
16) Dimethyl Sulfide	7.28	62	143001	20.3104	ug/L	81
17) Iodomethane	7.54	142	108123	19.2977	ug/L	97
18) Methyl acetate	7.53	43	63227	18.0760	ug/L #	86
19) Methylene Chloride	7.80	84	142227	19.0926	ug/L	66
20) Carbon Disulfide	7.86	76	311523	14.6905	ug/L	100
21) Acrylonitrile	7.97	53	35041	21.6821	ug/L	100
22) Methyl Tert Butyl Ether	8.01	73	330358	20.2233	ug/L	93
23) trans-1,2-Dichloroethene	8.25	96	138366	19.5117	ug/L	84
24) n-Hexane	8.33	57	157057	19.5852	ug/L	87
25) Diisopropyl ether	8.66	45	2041122	111.8073	ug/L #	93
26) Vinyl Acetate	8.83	43	147331	29.0738	ug/L #	91
27) 1,1-Dichloroethane	8.87	63	247578	21.0761	ug/L	99
28) Ethyl-Tert-Butyl ether	9.24	59	1882974	101.7980	ug/L	94
29) 2-Butanone	9.41	43	38042	21.6421	ug/L	85
30) Propionitrile	9.52	54	60405	105.3713	ug/L	100
31) 2,2-Dichloropropane	9.64	77	155963	17.4517	ug/L	80
32) cis-1,2-Dichloroethene	9.71	96	153900	19.7403	ug/L	92
33) Chloroform	9.91	83	253825	18.9675	ug/L	95
34) 1-Bromopropane	10.05	122	34324	24.8266	ug/L	99
35) Bromochloromethane	10.14	130	81682	19.9031	ug/L	98
36) Tetrahydrofuran	10.18	42	125904	108.7675	ug/L #	77
38) 1,1,1-Trichloroethane	10.45	97	225175	20.6968	ug/L	92
39) Cyclohexane	10.49	56	186790	18.5664	ug/L	82
40) 1,1-Dichloropropene	10.64	75	190432	20.7062	ug/L	84
41) Tert-Amyl-Methyl ether	10.75	73	1792824	102.0825	ug/L	94
42) Carbon Tetrachloride	10.80	117	172531	20.1116	ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146769.D 8260BWT.M Thu Apr 27 16:36:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146769.D Vial: 5
Acq On : 27 Apr 2017 14:05 Operator: TMB
Sample : WG611838-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:27:36 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

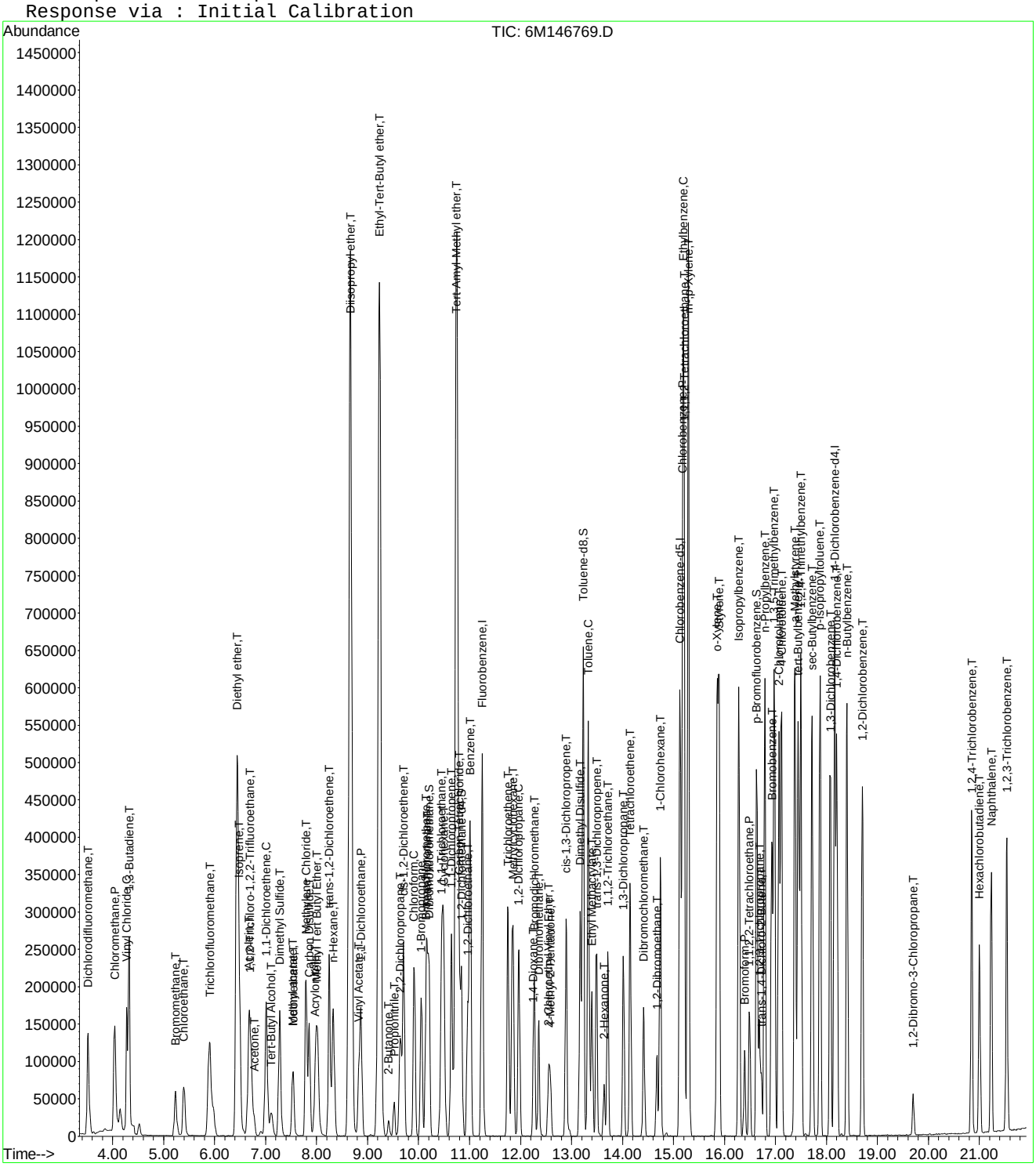
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	172562	20.7280	ug/L		90
46)	Benzene	11.01	78	551156	19.9311	ug/L		89
47)	Trichloroethene	11.76	130	138453	18.3942	ug/L		92
48)	Methylcyclohexane	11.85	83	200372	18.4252	ug/L		85
49)	1,2-Dichloropropane	11.96	63	136036	20.8447	ug/L		96
50)	1,4-Dioxane	12.25	88	10059	211.9793	ug/L		91
51)	Bromodichloromethane	12.27	83	184789	20.0580	ug/L		98
52)	Dibromomethane	12.36	93	77402	20.1377	ug/L		100
53)	2-Chloroethyl Vinyl Ether	12.54	63	46627	18.2145	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	34932	20.8026	ug/L		88
55)	cis-1,3-Dichloropropene	12.89	75	219976	21.6826	ug/L		95
56)	Dimethyl Disulfide	13.17	79	126523	19.7680	ug/L		92
59)	Toluene	13.33	91	558790	20.1562	ug/L		100
60)	Ethyl Methacrylate	13.40	69	150232	22.3935	ug/L		75
62)	trans-1,3-Dichloropropene	13.49	75	176791	20.6819	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	105729	20.2375	ug/L		99
64)	2-Hexanone	13.64	43	57711	23.0040	ug/L		86
65)	1,3-Dichloropropane	14.01	76	185305	21.1303	ug/L		75
66)	Tetrachloroethene	14.15	166	130680	19.4526	ug/L		93
67)	Dibromochloromethane	14.41	129	124531	19.2824	ug/L		98
68)	1,2-Dibromoethane	14.68	107	96567	19.2498	ug/L		99
69)	1-Chlorohexane	14.74	91	186237	20.8031	ug/L		82
70)	Chlorobenzene	15.18	112	367303	19.3579	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.21	131	130436	19.1958	ug/L		98
72)	Ethylbenzene	15.20	106	199383	19.4108	ug/L		99
73)	m-,p-Xylene	15.29	106	484038	39.4244	ug/L		98
74)	o-Xylene	15.85	106	232577	19.6304	ug/L		98
75)	Styrene	15.89	104	399352	20.0785	ug/L		99
76)	Bromoform	16.39	173	71392	18.1399	ug/L		98
77)	Isopropylbenzene	16.28	105	584830	19.7252	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	122148	20.6729	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	35796	20.5152	ug/L		72
82)	trans-1,4-Dichloro-2-Buten	16.72	53	20095	16.0161	ug/L	#	1
83)	n-Propylbenzene	16.79	91	697136	20.2955	ug/L		99
84)	Bromobenzene	16.94	156	148556	19.2514	ug/L		74
85)	1,3,5-Trimethylbenzene	16.98	105	494369	20.3085	ug/L		98
86)	2-Chlorotoluene	17.07	91	432207	18.8974	ug/L		93
87)	4-Chlorotoluene	17.12	91	449635	22.2437	ug/L		93
88)	a-Methylstyrene	17.38	118	272977	20.2784	ug/L		100
89)	tert-Butylbenzene	17.45	134	101404	19.8803	ug/L		75
90)	1,2,4-Trimethylbenzene	17.50	105	509985	20.3993	ug/L		88
91)	sec-Butylbenzene	17.72	105	603474	20.1027	ug/L		96
92)	p-Isopropyltoluene	17.87	119	507021	20.0784	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	273210	18.7478	ug/L		97
94)	1,4-Dichlorobenzene	18.20	146	275024	18.6621	ug/L		95
95)	n-Butylbenzene	18.41	91	473471	20.5333	ug/L		96
96)	1,2-Dichlorobenzene	18.70	146	254466	18.6292	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	20354	19.0182	ug/L		95
98)	1,2,4-Trichlorobenzene	20.86	180	175920	17.6019	ug/L		100
99)	Hexachlorobutadiene	21.00	225	65882	17.2588	ug/L		99
100)	Naphthalene	21.23	128	363706	18.1743	ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	161991	16.7893	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146769.D 8260BWT.M Thu Apr 27 16:36:04 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042717\6M146769.D Vial: 5
Acq On : 27 Apr 2017 14:05 Operator: TMB
Sample : WG611838-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 14:27 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:47:47 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	613920	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	424126	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	224441	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	162918	25.9958	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%				
43) 1,2-Dichloroethane-d4	10.84	65	169608	27.4592	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.84%				
58) Toluene-d8	13.22	98	572812	26.4674	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%				
80) p-Bromofluorobenzene	16.63	95	225901	26.5006	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.00%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	219181	22.4863	ug/L		94
3) Chloromethane	4.03	50	249192	21.4979	ug/L		99
4) Vinyl Chloride	4.28	62	225196	20.2199	ug/L		99
5) 1,3-Butadiene	4.32	54	141487	33.1001	ug/L		89
6) Bromomethane	5.23	94	72271	15.0292	ug/L		98
7) Chloroethane	5.39	64	105685	22.0548	ug/L		86
8) Trichlorofluoromethane	5.89	101	224668	19.6820	ug/L		99
9) Diethyl ether	6.43	59	469821	98.7628	ug/L		85
10) Isoprene	6.47	67	172445	18.3667	ug/L		83
11) Acrolein	6.67	56	74233	142.4353	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	131247	20.3118	ug/L		96
13) Acetone	6.78	43	28254	21.3272	ug/L		94
14) 1,1-Dichloroethene	7.00	61	188467	20.1365	ug/L		89
15) Tert-Butyl Alcohol	7.12	59	95915	233.4121	ug/L		92
16) Dimethyl Sulfide	7.27	62	138518	20.7116	ug/L		79
17) Iodomethane	7.53	142	114152	21.3613	ug/L		97
18) Methyl acetate	7.53	43	65200	19.6235	ug/L	#	87
19) Methylene Chloride	7.79	84	136531	19.2949	ug/L		65
20) Carbon Disulfide	7.85	76	293051	14.5485	ug/L		99
21) Acrylonitrile	7.96	53	34866	22.7120	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	319238	20.5736	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	128136	19.0225	ug/L		84
24) n-Hexane	8.32	57	148097	19.4422	ug/L		85
25) Diisopropyl ether	8.66	45	1910548	110.1763	ug/L	#	93
26) Vinyl Acetate	8.82	43	190642	39.6055	ug/L	#	91
27) 1,1-Dichloroethane	8.86	63	231165	20.7171	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	1770816	100.7854	ug/L		93
29) 2-Butanone	9.41	43	37874	22.6833	ug/L		87
30) Propionitrile	9.52	54	61944	113.7570	ug/L		100
31) 2,2-Dichloropropane	9.64	77	188944	22.2576	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	142227	19.2055	ug/L		97
33) Chloroform	9.91	83	237666	18.6970	ug/L		95
34) 1-Bromopropane	10.06	122	32466	24.7216	ug/L		99
35) Bromochloromethane	10.15	130	81266	20.8465	ug/L		98
36) Tetrahydrofuran	10.17	42	126218	114.7916	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	205982	19.9315	ug/L		93
39) Cyclohexane	10.49	56	170253	17.8155	ug/L		82
40) 1,1-Dichloropropene	10.65	75	171868	19.6736	ug/L		85
41) Tert-Amyl-Methyl ether	10.74	73	1744989	104.6009	ug/L		94
42) Carbon Tetrachloride	10.79	117	165581	20.3198	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146801.D 8260BWT.M Fri Apr 28 10:38:57 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:47:47 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

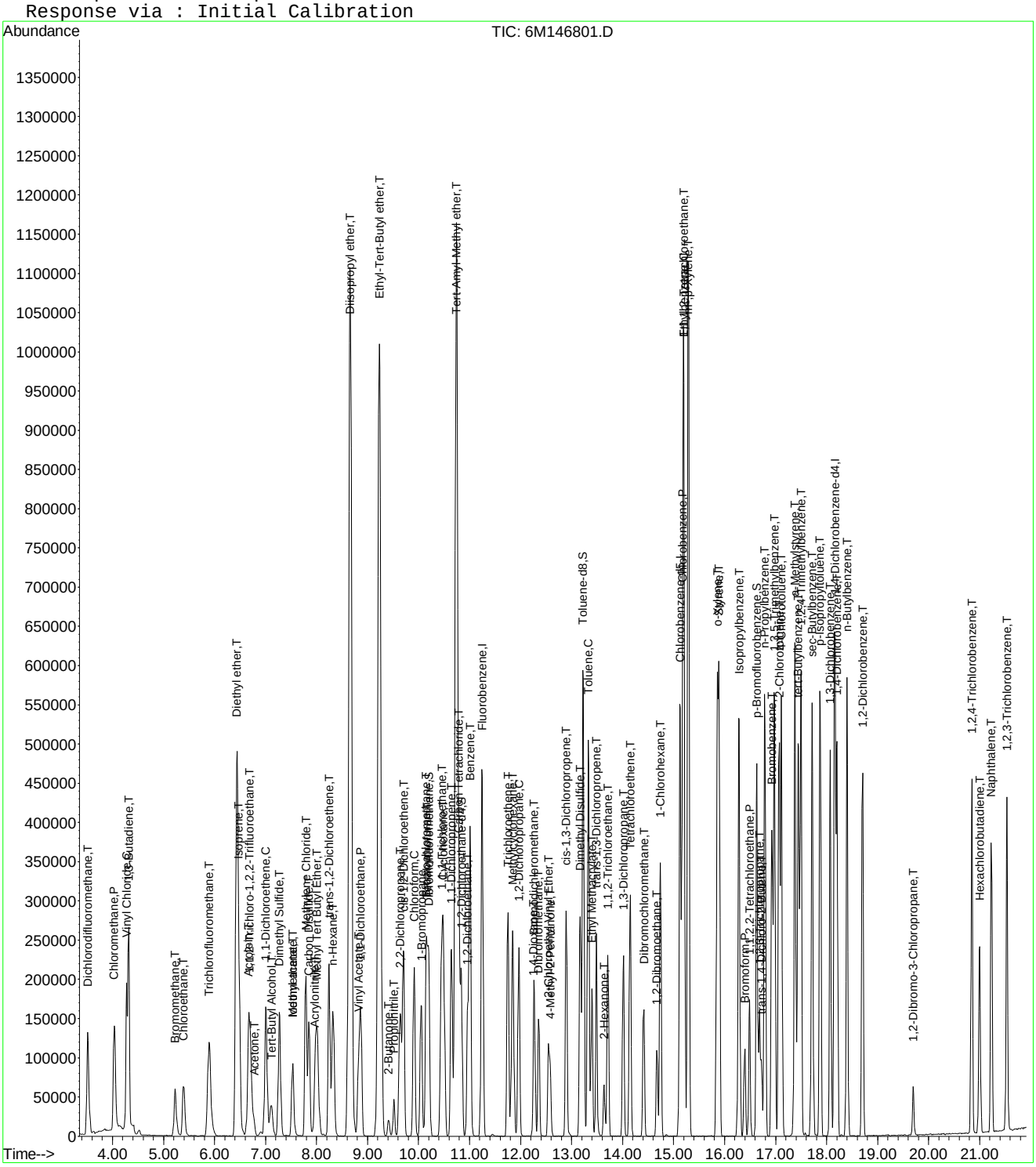
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	166347	21.0357	ug/L		89
46)	Benzene	11.01	78	510984	19.4533	ug/L		89
47)	Trichloroethene	11.75	130	122850	17.1823	ug/L		93
48)	Methylcyclohexane	11.84	83	183895	17.8022	ug/L		85
49)	1,2-Dichloropropane	11.97	63	126305	20.3747	ug/L		94
50)	1,4-Dioxane	12.25	88	9580	212.5364	ug/L		91
51)	Bromodichloromethane	12.26	83	171913	19.6449	ug/L		99
52)	Dibromomethane	12.35	93	74307	20.3524	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	59888	24.6291	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	35146	22.0343	ug/L		89
55)	cis-1,3-Dichloropropene	12.90	75	210992	21.8943	ug/L		95
56)	Dimethyl Disulfide	13.17	79	118331	19.4635	ug/L		91
59)	Toluene	13.32	91	518057	19.5371	ug/L		100
60)	Ethyl Methacrylate	13.40	69	144398	22.5032	ug/L		80
62)	trans-1,3-Dichloropropene	13.49	75	176681	21.6094	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	98650	19.7416	ug/L		98
64)	2-Hexanone	13.64	43	58156	24.2361	ug/L		87
65)	1,3-Dichloropropane	14.02	76	178735	21.3084	ug/L		76
66)	Tetrachloroethene	14.15	166	118806	18.4897	ug/L		92
67)	Dibromochloromethane	14.42	129	116186	18.8087	ug/L		99
68)	1,2-Dibromoethane	14.67	107	93075	19.3979	ug/L		98
69)	1-Chlorohexane	14.74	91	171568	20.0365	ug/L		83
70)	Chlorobenzene	15.17	112	339454	18.7041	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	121042	18.6238	ug/L		96
72)	Ethylbenzene	15.20	106	186150	18.9470	ug/L		99
73)	m-,p-Xylene	15.28	106	448906	38.2265	ug/L		98
74)	o-Xylene	15.86	106	218840	19.3114	ug/L		98
75)	Styrene	15.89	104	376755	19.8043	ug/L		100
76)	Bromoform	16.40	173	69485	18.4586	ug/L		99
77)	Isopropylbenzene	16.29	105	542142	19.1174	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	123953	21.2051	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	35554	20.5968	ug/L	#	56
82)	trans-1,4-Dichloro-2-Buten	16.72	53	25413	20.4736	ug/L	#	1
83)	n-Propylbenzene	16.79	91	661901	19.4780	ug/L		98
84)	Bromobenzene	16.93	156	141497	18.5348	ug/L		74
85)	1,3,5-Trimethylbenzene	16.98	105	471330	19.5714	ug/L		99
86)	2-Chlorotoluene	17.07	91	451337	19.9471	ug/L		98
87)	4-Chlorotoluene	17.11	91	388062	19.4051	ug/L		99
88)	a-Methylstyrene	17.38	118	264107	19.8315	ug/L		99
89)	tert-Butylbenzene	17.44	134	94681	18.7629	ug/L		83
90)	1,2,4-Trimethylbenzene	17.50	105	490467	19.8306	ug/L		88
91)	sec-Butylbenzene	17.72	105	574211	19.3347	ug/L		96
92)	p-Isopropyltoluene	17.87	119	486303	19.4661	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	265803	18.4366	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	268974	18.4489	ug/L		95
95)	n-Butylbenzene	18.40	91	461514	20.2311	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	250100	18.5075	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	22089	20.8624	ug/L		99
98)	1,2,4-Trichlorobenzene	20.85	180	182269	18.4342	ug/L		98
99)	Hexachlorobutadiene	21.00	225	65280	17.2859	ug/L		100
100)	Naphthalene	21.23	128	386339	19.5139	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	169300	17.7365	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146801.D 8260BWT.M Fri Apr 28 10:38:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 8:47 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419204.D Vial: 5
Acq On : 27 Apr 2017 13:25 Operator: TMB
Sample : WG611829-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:51:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	712330	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	586035	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	311188	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	192011	25.6991	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.52	65	167246	25.8929	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.56%			
58) Toluene-d8	12.90	98	704963	26.3272	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.32%			
80) p-Bromofluorobenzene	16.29	95	280004	25.4948	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.96%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	237074	24.5928	ug/L	99
3) Chloromethane	3.81	50	265698	22.0465	ug/L	96
4) Vinyl Chloride	4.04	62	261404	22.9676	ug/L	98
5) 1,3-Butadiene	4.08	54	165106	34.6779	ug/L	94
6) Bromomethane	4.95	94	76149	21.6058	ug/L	98
7) Chloroethane	5.12	64	115929	23.3190	ug/L	96
8) Trichlorofluoromethane	5.60	101	265171	21.4511	ug/L	100
9) Diethyl ether	6.13	59	416361	89.4305	ug/L	90
10) Isoprene	6.17	67	196082	20.0620	ug/L	90
11) Acrolein	6.37	56	52565	81.5249	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	159044	22.5625	ug/L	98
13) Acetone	6.47	43	19148	19.1127	ug/L	93
14) 1,1-Dichloroethene	6.70	61	212240	20.5732	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	57017	175.5705	ug/L	97
16) Dimethyl Sulfide	6.96	62	144612	21.0453	ug/L	89
17) Iodomethane	7.21	142	61985	20.1122	ug/L	91
18) Methyl acetate	7.22	43	55997	20.4115	ug/L	90
19) Methylene Chloride	7.47	84	146405	19.7479	ug/L	82
20) Carbon Disulfide	7.52	76	347100	16.1817	ug/L	100
21) Acrylonitrile	7.66	53	28997	20.8657	ug/L	96
22) Methyl Tert Butyl Ether	7.68	73	283781	19.4271	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	205607	20.4852	ug/L	92
24) n-Hexane	8.00	57	169987	20.2898	ug/L	90
25) Diisopropyl ether	8.34	45	2275825	101.3022	ug/L	95
26) Vinyl Acetate	8.52	43	200464	19.8953	ug/L	93
27) 1,1-Dichloroethane	8.55	63	266106	20.6004	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1781635	93.2513	ug/L	97
29) 2-Butanone	9.10	43	31686	20.1681	ug/L	86
30) Propionitrile	9.21	54	47803	98.1693	ug/L	99
31) 2,2-Dichloropropane	9.32	77	222022	20.3603	ug/L	98
32) cis-1,2-Dichloroethene	9.38	96	165936	20.0021	ug/L	92
33) Chloroform	9.59	83	274128	19.1527	ug/L	98
34) 1-Bromopropane	9.74	122	40409	24.6916	ug/L	98
35) Bromochloromethane	9.83	130	91476	20.4344	ug/L	91
36) Tetrahydrofuran	9.85	42	108310	100.1477	ug/L	85
38) 1,1,1-Trichloroethane	10.13	97	245950	21.2931	ug/L	99
39) Cyclohexane	10.16	56	198139	18.4245	ug/L	90
40) 1,1-Dichloropropene	10.33	75	205812	20.4073	ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1677198	98.0347	ug/L	97
42) Carbon Tetrachloride	10.47	117	226449	21.1435	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419204.D 8260WT.M Thu Apr 27 16:37:54 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419204.D Vial: 5
Acq On : 27 Apr 2017 13:25 Operator: TMB
Sample : WG611829-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:51:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

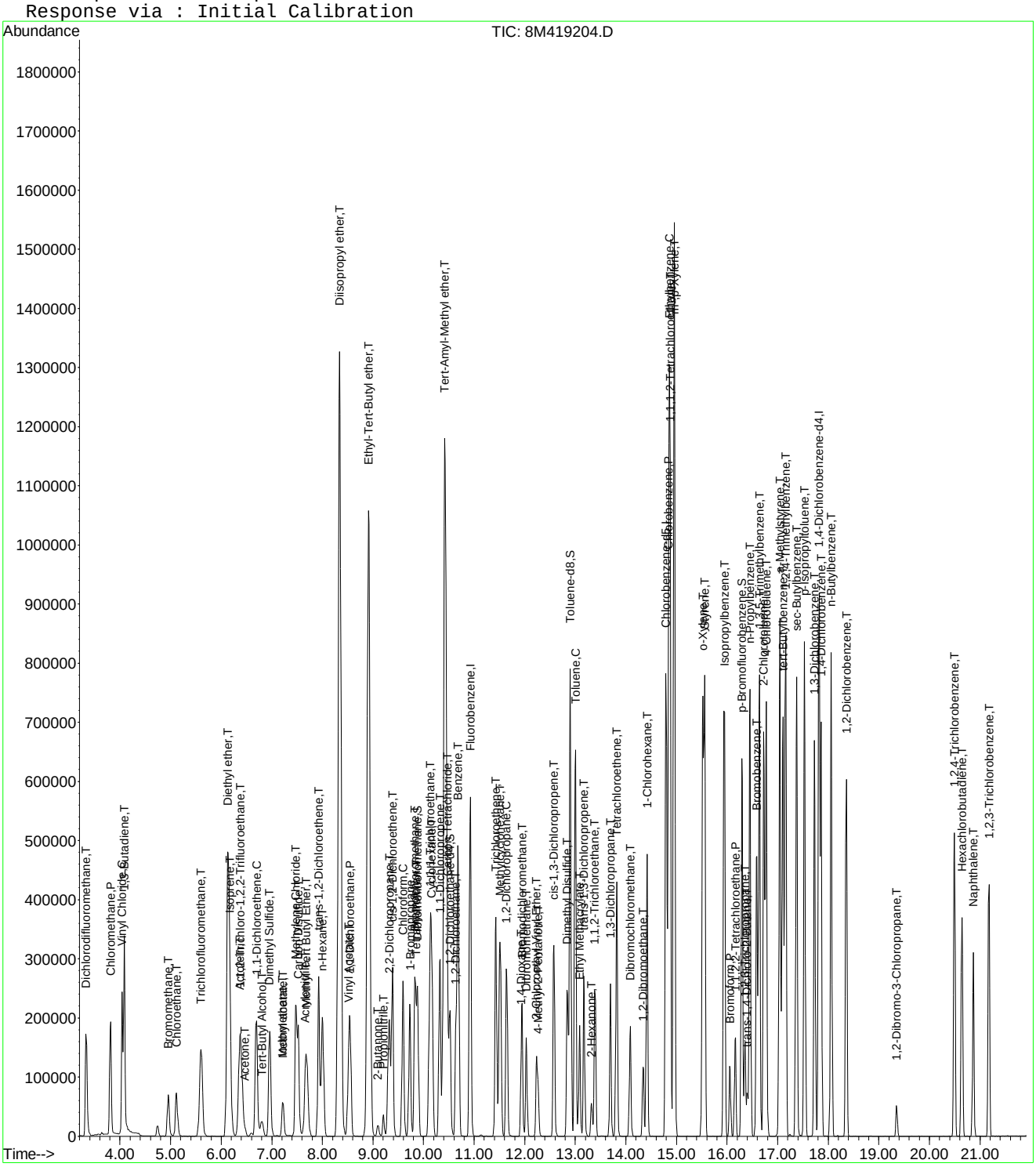
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	166627	20.5880	ug/L	95
46)	Benzene	10.68	78	607063	20.6291	ug/L	96
47)	Trichloroethene	11.43	130	161599	19.5483	ug/L	99
48)	Methylcyclohexane	11.51	83	220239	19.9861	ug/L	94
49)	1,2-Dichloropropane	11.64	63	145968	20.3090	ug/L	94
50)	Bromodichloromethane	11.95	83	187663	19.9517	ug/L	99
51)	1,4-Dioxane	11.93	88	7366	179.7525	ug/L	95
52)	Dibromomethane	12.03	93	75360	20.3742	ug/L	99
53)	2-Chloroethyl Vinyl Ether	12.23	63	64550	20.7566	ug/L	96
54)	4-Methyl-2-Pentanone	12.26	58	28242	20.2746	ug/L	99
55)	cis-1,3-Dichloropropene	12.58	75	234808	21.9204	ug/L	98
56)	Dimethyl Disulfide	12.84	79	99091	18.1431	ug/L	85
59)	Toluene	13.00	91	661830	20.2886	ug/L	98
60)	Ethyl Methacrylate	13.08	69	134893	21.9183	ug/L	86
62)	trans-1,3-Dichloropropene	13.17	75	179977	19.0244	ug/L	99
63)	1,1,2-Trichloroethane	13.38	97	101064	18.8311	ug/L	97
64)	2-Hexanone	13.32	58	25846	19.6234	ug/L	82
65)	1,3-Dichloropropane	13.69	76	182531	20.1186	ug/L	84
66)	Tetrachloroethene	13.82	164	134934	19.6924	ug/L	98
67)	Dibromochloromethane	14.09	129	130153	18.8722	ug/L	98
68)	1,2-Dibromoethane	14.34	107	102010	19.4588	ug/L	98
69)	1-Chlorohexane	14.42	91	219956	21.3123	ug/L	91
70)	Chlorobenzene	14.84	112	433215	18.6567	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	155795	18.9063	ug/L	100
72)	Ethylbenzene	14.86	106	242374	18.6368	ug/L	89
73)	m-,p-Xylene	14.96	106	603668	40.0818	ug/L	95
74)	o-Xylene	15.52	106	288518	19.0543	ug/L	100
75)	Styrene	15.55	104	486571	20.4968	ug/L	97
76)	Bromoform	16.06	173	74562	16.0114	ug/L	100
77)	Isopropylbenzene	15.95	105	723156	19.9461	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	114428	19.4879	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	33193	19.7182	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.39	53	19530	14.1722	ug/L	78
83)	n-Propylbenzene	16.45	91	864378	19.8457	ug/L	100
84)	Bromobenzene	16.59	156	194384	19.0476	ug/L	98
85)	1,3,5-Trimethylbenzene	16.64	105	620312	19.6693	ug/L	99
86)	2-Chlorotoluene	16.72	91	517072	17.3895	ug/L	84
87)	4-Chlorotoluene	16.77	91	558929	20.8582	ug/L	91
88)	a-Methylstyrene	17.04	118	366982	20.7561	ug/L	99
89)	tert-Butylbenzene	17.11	134	132807	18.5996	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	649529	20.1741	ug/L	98
91)	sec-Butylbenzene	17.37	105	786137	19.9022	ug/L	99
92)	p-Isopropyltoluene	17.53	119	668573	20.1009	ug/L	98
93)	1,3-Dichlorobenzene	17.73	146	365246	18.4648	ug/L	99
94)	1,4-Dichlorobenzene	17.86	146	372328	18.5142	ug/L	99
95)	n-Butylbenzene	18.06	91	622339	20.7713	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	327072	18.8222	ug/L	99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	16842	17.6241	ug/L	89
98)	1,2,4-Trichlorobenzene	20.50	180	214215	18.3103	ug/L	99
99)	Hexachlorobutadiene	20.64	225	96478	17.7218	ug/L	98
100)	Naphthalene	20.87	128	313703	18.7638	ug/L	99
101)	1,2,3-Trichlorobenzene	21.18	180	175706	18.0855	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419204.D 8260WT.M Thu Apr 27 16:37:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042717\8M419204.D Vial: 5
Acq On : 27 Apr 2017 13:25 Operator: TMB
Sample : WG611829-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 27 15:51 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419204.D 8260WT.M Thu Apr 27 16:37:55 2017 Page 3

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 26, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BNB – Brandi N. Bentley
BRG – BRENDA R. GREGORY	CAS – Craig A. Smith
CEB – CHAD E. BARNES	CLC – CHRYS L. CRAWFORD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	REK – BOB E. KYER
RLB – BOB BUCHANAN	RNP – RICK N. PETTY
SAV – SARAH A. VANDENBERG	SCA – SUEELLEN C. ADAMS
SCB – SARAH C. BOGOLIN	SCJ – SUE ELLEN C. JOHNSON
SDC – SHALYN D. CONLEY	TB – TODD BOYLE
TMB – TIFFANY M. BAILEY	TMM – TAMMY M. MORRIS
VC – VICKI COLLIER	WTD – WADE T. DELONG
XXX – UNAVAILABLE OR SUBCONTRACT	ZTB – ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 26, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17041110 / Revision: 1 / 804 total pages

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 3
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2O3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - pH 4-5 L - EDA Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
PMW101-02A-LS-25	4/21/17	755	G	W	N		x		
PMW101-02B-LS-25	4/21/17	800	G	W	N		x		
PMW101-04B-LS-25	4/21/17	812	G	W	N		x		
PMW101-04A-LS-25	4/21/17	818	G	W	N		x		
PMW101-03B-LS-25	4/21/17	824	G	W	N		x		
PMW101-03A-LS-25	4/21/17	830	G	W	N		x		
DR1-3-LS-25	4/21/17	845	G	W	N		x		
DUP-1	4/21/17	849	G	W	N		x		
MW-199B-LS-25	4/21/17	922	G	W	N		x		
MW-141-LS-25	4/21/17	940	G	W	N		x		
MW-89-LS-25	4/21/17	950	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	
Relinquished by:	Date/Time: 4/21/17 1700	Company HDR	Receive
Relinquished by:	Date/Time:	Company	Receive
Relinquished by:	Date/Time:	Company	Receive
Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:		Cooler

Microbac OVD
Received: 04/22/2017 11:05
By: BRENDA GREENWALT 221000099883
Brenda Greenwalt

Generated: 07/26/2017 09:52

L17041110 / Revision: 1 / 804 total pages

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Generated: 07/26/2017 09:52

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 2 of 3
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112	PO #:			
Phone: 404-295-3279	WO #:			
Email: thomas.holmes@hdrinc.com	Project #:			
Project Name: LTM 2017	SSOW#:			
Site: DDMT				

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-90-LS-25	4/21/17	956	G	W	N		x		
MW-101B-LS-25	4/21/17	958	G	W	N		x		
MW-101T-LS-25	4/21/17	1003	G	W	N		x		
MW-212-LS-25	4/21/17	1035	G	W	N		x		
DUP-7	4/21/17	1040	G	W	N		x		
MW-62-LS-25	4/21/17	1100	G	W	N		x		
MW-202B-LS-25	4/21/17	1108	G	W	N		x		
DUP-5	4/21/17	1110	G	W	N		x		
MW-202A-LS-25	4/21/17	1115	G	W	N		x		
MW-143-LS-25	4/21/17	1135	G	W	N		x		
MW-262-LS-25	4/21/17	1140	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ Return To Client ☑ Disposal By Lab ☐ Archive For _____ Months

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/21/17 1700	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

Cooler Temperature(s) °C and Other Remarks:

L17041110 / Revision: 1 / 804 total pages

Generated: 07/26/2017 09:52

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 3 of 3
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	8260_SPLP_LIST	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-256-LS-25	4/21/17	1400	G	W	N		x		
MW-140-LS-25	4/21/17	1425	G	W	N		x		
MW-213-LS-25	4/21/17	1602	G	W	N		x		
MW-282-LS-25	4/21/17	1101	G	W	N	x	x		
MW-281-LS-25	4/21/17	827	G	W	N		x		
LTM-TB4-LS-25	4/21/17	1630	G	W	N		x		

Microbac OVD
Received: 04/22/2017 11:05
By: BRENDA GREENWALT
221000099883
Brenda Greenwalt

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:		Date:		Time:	Method of Shipment:	
Relinquished by:	Date/Time: 4/21/17 1700	Company HDR	Received by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company	
Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:		Cooler Temperature(s) °C and Other Remarks:			

MICROBAC

Cooler ID 9883

COOLER TEMP >6° C LOG

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

4-22-17

BRD

pH Lot # N/A

pH Exceptions

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

4/22/17

BRD

PRESERVATIVE EXCEPTIONS

__NONE

✓ AS NOTED

BRD 4/22/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-01	897727	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Samplenum	Container ID	Products
L17041110-02	897728	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-03	897729	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Samplenum	Container ID	Products
L17041110-04	897730	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-05	897731	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Samplenum	Container ID	Products
L17041110-06	897732	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-07	897733	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Samplenum	Container ID	Products
L17041110-08	897734	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:07	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-09	897735	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Samplenum	Container ID	Products
L17041110-10	897736	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:16	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-11	897737	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Samplenum	Container ID	Products
L17041110-12	897738	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-13	897739	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Samplenum	Container ID	Products
L17041110-14	897740	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-15	897741	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Samplenum	Container ID	Products
L17041110-16	897742	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:08	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-17	897743	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:29	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Samplenum	Container ID	Products
L17041110-18	897744	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-19	897745	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Samplenum	Container ID	Products
L17041110-20	897746	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	24-APR-2017 13:02	BRG		
2	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
3	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-21	897747	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Samplenum	Container ID	Products
L17041110-22	897748	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-23	897749	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Samplenum	Container ID	Products
L17041110-24	897750	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:15	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:14	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:30	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:14	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 11:09	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-25	897751	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Samplenum	Container ID	Products
L17041110-26	897752	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-27	897753	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:13	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Samplenum	Container ID	Products
L17041110-28	897754	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:13	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041110
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 05-MAY-2017

Samplenum	Container ID	Products
L17041110-29	897755	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:17	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:13	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:27	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:17	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Samplenum	Container ID	Products
L17041110-30	897756	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:17	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:13	BJO	BJO	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:17	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	24-APR-2017 13:02	BRG		
2	ANALYZ	V1	ORG4	24-APR-2017 13:28	HRF	CLS	
3	STORE	ORG4	A2	08-MAY-2017 07:18	CLS	AWE	
4	DISP	A2	DISP	12-JUL-2017 12:12	BJO	BJO	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17041209 *(Revised)*

Report revised to remove 1,4 Dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 25 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041209
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: DR2-5-LS-25 (4/22 @ 07:45). 2 of 3 voa vials received with headspace >6mm. BRG	Please proceed. MRT

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00113829	H	2.0		1001891733610004575000778978192929	X
00113893	H	1.0		1002826033610004575000778978193340	X
00113761	H	2.0		1002826033610004575000778978193307	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17041209
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-209B-LS-25	L17041209-01	04/22/2017 08:30	04/25/2017 10:39
MW-209A-LS-25	L17041209-02	04/22/2017 08:35	04/25/2017 15:47
MW-273-LS-25	L17041209-03	04/22/2017 09:05	04/25/2017 15:47
MW-219-LS-25	L17041209-04	04/22/2017 09:20	04/25/2017 15:47
MW-269-LS-25	L17041209-05	04/22/2017 09:30	04/25/2017 15:47
DR2-5-LS-25	L17041209-06	04/22/2017 07:45	04/25/2017 15:47
PMW101-02A-LS-25-RE	L17041209-07	04/24/2017 12:15	04/25/2017 15:47
LTM-TB5-LS-25	L17041209-08	04/24/2017 16:00	04/25/2017 15:47
EB1-LS-25	L17041209-09	04/22/2017 14:30	04/25/2017 15:47

Microbac REPORT L17041209
PREPARED FOR CT Laboratories
WORK ID:

1.0 Summary Data ..... ??
1.1 Narratives ..... ??
1.2 Certificate of Analysis ..... ??
2.0 Full Sample Data Package ..... ??
2.1 Volatiles Data ..... ??
2.1.1 Volatiles GCMS Data (8260) ..... ??
2.1.1.1 Summary Data ..... ??
2.1.1.2 QC Summary Data ..... ??
2.1.1.3 Sample Data ..... ??
2.1.1.4 Standards Data ..... ??
2.1.1.5 Raw QC Data ..... ??
3.0 Attachments ..... ??

1.0 Summary Data

1.1 Narratives

Login Number: L17041209
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Chloromethane, Dichlorodifluoromethane exceeded the upper limit in ICV WG611320-12 analyzed 04/24/2017 on HPMS11. Dichlorodifluoromethane exceeded the upper limit and Trichlorofluoromethane was below the lower limit in ICV WG611454-12 analyzed 04/26/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Chloromethane was marginally below the lower limit in CCV WG612121-02 analyzed 04/29/2017 on HPMS11. Acetone was marginally below the lower limit in CCV WG612141-02 analyzed 04/30/2017 on HPMS17. Bromomethane was marginally below the lower limit in CCV WG612249-02 analyzed 05/01/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The MS/MSD results were not associated with this sample delivery group (SDG), due to insufficient volume of sample. The laboratory included an LCS and LCS duplicate in the preparation batch in lieu of the NELAC prescribed MS/MSD. Microbac Laboratories recommends site specific MS/MSD samples to avoid possible data qualifications.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: Recoveries out of range were observed for the following analytes: 4-Bromofluorobenzene. Sample 06 matrix interference is obvious due to dark foamy matrix of sample. Initial analysis of sample 06 foamed and was aborted by the instrument. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
L17041209-06	4-Bromofluorobenzene	2017-05-01 14:08:00	122	76	119	Recovery

Other: Samples 06, 07, were run at a dilution. Sample 07 dilution required due to dark foamy sample matrix.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

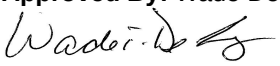
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124840
Approved By: Wade DeLong



1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041209-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209B-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 02:14
Collect Date:	04/22/2017 08:30	**Dilution:**	1	**File ID:**	11M17884
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.30	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.69		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.30		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209A-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 02:43
Collect Date:	04/22/2017 08:35	**Dilution:**	1	**File ID:**	11M17885
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.68	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.53		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.418	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-273-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 03:13
Collect Date:	04/22/2017 09:05	**Dilution:**	1	**File ID:**	11M17886
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 03:42
Collect Date:	04/22/2017 09:20	**Dilution:**	1	**File ID:**	11M17887
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.904		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.79	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.57		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.11		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	88.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-269-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 04:11
Collect Date:	04/22/2017 09:30	**Dilution:**	1	**File ID:**	11M17888
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.49		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.66		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.61		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	64.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DR2-5-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 14:08
Collect Date:	04/22/2017 07:45	**Dilution:**	50	**File ID:**	17M0273209
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	25.0	12.5
1,1,1-Trichloroethane	71-55-6		U	50.0	12.5
1,1,2,2-Tetrachloroethane	79-34-5		U	25.0	10.0
1,1,2-Trichloroethane	79-00-5		U	50.0	12.5
1,1-Dichloroethane	75-34-3		U	50.0	6.25
1,1-Dichloroethene	75-35-4		U	50.0	25.0
1,1-Dichloropropene	563-58-6		U	50.0	12.5
1,2,3-Trichlorobenzene	87-61-6		U	50.0	7.50
1,2,3-Trichloropropane	96-18-4		U	50.0	25.0
1,2,4-Trichlorobenzene	120-82-1		U	50.0	10.0
1,2,4-Trimethylbenzene	95-63-6		U	50.0	12.5
1,2-Dichloroethane	107-06-2		U	25.0	12.5
1,2-Dichlorobenzene	95-50-1		U	50.0	6.25
1,2-Dibromo-3-chloropropane	96-12-8		U	100	50.0
1,2-Dichloropropane	78-87-5		U	50.0	10.0
1,2-Dibromoethane	106-93-4		U	50.0	12.5
1,3,5-Trimethylbenzene	108-67-8		U	50.0	12.5
1,3-Dichlorobenzene	541-73-1		U	50.0	12.5
1,3-Dichloropropane	142-28-9		U	20.0	10.0
1,4-Dichlorobenzene	106-46-7		U	25.0	6.25
1-Chlorohexane	544-10-5		U	50.0	6.25
2,2-Dichloropropane	594-20-7		U	50.0	12.5
2-Hexanone	591-78-6		U	500	125
2-Chlorotoluene	95-49-8		U	50.0	6.25
4-Chlorotoluene	106-43-4		U	50.0	12.5
Acetone	67-64-1	2170	J	500	125
Benzene	71-43-2		U	20.0	6.25
Bromobenzene	108-86-1		U	50.0	6.25
Bromochloromethane	74-97-5		U	50.0	10.0
Bromodichloromethane	75-27-4		U	25.0	12.5
Bromoform	75-25-2		U	50.0	25.0
Bromomethane	74-83-9		Q	50.0	25.0

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	50.0	25.0
Carbon tetrachloride	56-23-5		U	50.0	12.5
Chlorobenzene	108-90-7		U	25.0	6.25
Chloroethane	75-00-3		U	50.0	25.0
Chloroform	67-66-3		U	15.0	6.25
Chloromethane	74-87-3		U	50.0	25.0
cis-1,2-Dichloroethene	156-59-2	21.8	J	50.0	12.5
cis-1,3-Dichloropropene	10061-01-5		U	25.0	12.5
Dibromochloromethane	124-48-1		U	25.0	12.5
Dibromomethane	74-95-3		U	50.0	12.5
Dichlorodifluoromethane	75-71-8		U	50.0	12.5
Ethylbenzene	100-41-4		U	50.0	12.5
Hexachlorobutadiene	87-68-3		U	30.0	12.5
Isopropylbenzene	98-82-8		U	50.0	12.5
Methylene chloride	75-09-2	13.0	J	50.0	12.5
Methyl t-butyl ether (MTBE)	1634-04-4		U	250	25.0
MEK (2-Butanone)	78-93-3	5600	J	500	125
MIBK (methyl isobutyl ketone)	108-10-1		U	500	125
n-Butylbenzene	104-51-8		U	50.0	12.5
n-Propylbenzene	103-65-1		U	50.0	6.25
m-,p-Xylene	179601-23-1		U	100	25.0
Naphthalene	91-20-3		U	50.0	10.0
o-Xylene	95-47-6		U	50.0	12.5
p-Isopropyltoluene	99-87-6		U	50.0	12.5
sec-Butylbenzene	135-98-8		U	50.0	12.5
Styrene	100-42-5		U	50.0	6.25
Trichloroethene	79-01-6		U	50.0	12.5
tert-Butylbenzene	98-06-6		U	50.0	12.5
Tetrachloroethene	127-18-4		U	50.0	12.5
Toluene	108-88-3		U	50.0	12.5
trans-1,2-Dichloroethene	156-60-5		U	50.0	12.5
trans-1,3-Dichloropropene	10061-02-6		U	50.0	25.0
Trichlorofluoromethane	75-69-4		U	50.0	12.5
Vinyl chloride	75-01-4		U	50.0	12.5

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.3	85	115	
1,2-Dichloroethane-d4	99.0	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	122	76	119	*

*	Surrogate or spike compound out of range
J	The analyte was positively identified, but the quantitation is an estimate.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	PMW101-02A-LS-25-RE	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	05/01/2017 00:10
Collect Date:	04/24/2017 12:15	**Dilution:**	5	**File ID:**	17M0273198
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1		Q	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	3.89	F	5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3		U	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6		U	5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4	3.63	F	5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	LTM-TB5-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/29/2017 23:18
Collect Date:	04/24/2017 16:00	**Dilution:**	1	**File ID:**	11M17878
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.54	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041209-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	EB1-LS-25	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/29/2017 23:48
Collect Date:	04/22/2017 14:30	**Dilution:**	1	**File ID:**	11M17879
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7	0.201	F	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.295	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4	0.487	F	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.42		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041209
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Chloromethane, Dichlorodifluoromethane exceeded the upper limit in ICV WG611320-12 analyzed 04/24/2017 on HPMS11. Dichlorodifluoromethane exceeded the upper limit and Trichlorofluoromethane was below the lower limit in ICV WG611454-12 analyzed 04/26/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Chloromethane was marginally below the lower limit in CCV WG612121-02 analyzed 04/29/2017 on HPMS11. Acetone was marginally below the lower limit in CCV WG612141-02 analyzed 04/30/2017 on HPMS17. Bromomethane was marginally below the lower limit in CCV WG612249-02 analyzed 05/01/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The MS/MSD results were not associated with this sample delivery group (SDG), due to insufficient volume of sample. The laboratory included an LCS and LCS duplicate in the preparation batch in lieu of the NELAC prescribed MS/MSD. Microbac Laboratories recommends site specific MS/MSD samples to avoid possible data qualifications.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: Recoveries out of range were observed for the following analytes: 4-Bromofluorobenzene. Sample 06 matrix interference is obvious due to dark foamy matrix of sample. Initial analysis of sample 06 foamed and was aborted by the instrument. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
L17041209-06	4-Bromofluorobenzene	2017-05-01 14:08:00	122	76	119	Recovery

Other: Samples 06, 07, were run at a dilution. Sample 07 dilution required due to dark foamy sample matrix.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

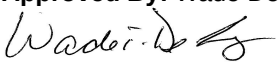
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124840
Approved By: Wade DeLong



Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041209
Work Group: WG612123
Blank File ID: 11M17871
Blank Sample ID: WG612123-01
Prep Date: 04/29/17 19:55
Instrument ID: HPMS11
Analyzed Date: 04/29/17 19:55
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612123-02	11M17872	04/29/17 20:24	01
LTM-TB5-LS-25	L17041209-08	11M17878	04/29/17 23:18	01
EB1-LS-25	L17041209-09	11M17879	04/29/17 23:48	01
MW-209B-LS-25	L17041209-01	11M17884	04/30/17 02:14	01
MW-209A-LS-25	L17041209-02	11M17885	04/30/17 02:43	01
MW-273-LS-25	L17041209-03	11M17886	04/30/17 03:13	01
MW-219-LS-25	L17041209-04	11M17887	04/30/17 03:42	01
MW-269-LS-25	L17041209-05	11M17888	04/30/17 04:11	01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041209	Work Group:	WG612142
Blank File ID:	17M0273175	Blank Sample ID:	WG612142-01
Prep Date:	04/30/17 15:48	Instrument ID:	HPMS17
Analyzed Date:	04/30/17 15:48	Method:	8260B
Analyst:	ADC		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612142-02	17M0273176	04/30/17 16:07	01
PMW101-02A-LS-25-RE	L17041209-07	17M0273198	05/01/17 00:10	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041209	Work Group:	WG612250
Blank File ID:	17M0273205	Blank Sample ID:	WG612250-01
Prep Date:	05/01/17 12:49	Instrument ID:	HPMS17
Analyzed Date:	05/01/17 12:49	Method:	8260B
Analyst:	ADC		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612250-02	17M0273206	05/01/17 13:09	01
LCS2	WG612250-03	17M0273207	05/01/17 13:29	01
DR2-5-LS-25	L17041209-06	17M0273209	05/01/17 14:08	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5272000
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041209 Prep Date: 04/29/17 19:55 Sample ID: WG612123-01
Instrument ID: HPMS11 Run Date: 04/29/17 19:55 Prep Method: 5030B/5030C/503
File ID: 11M17871 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.1	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	100	85	-	115	PASS
1,2-Dichloroethane-d4	103	72	-	119	PASS
Toluene-d8	101	81	-	120	PASS
4-Bromofluorobenzene	105	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
25-JUL-2017 15:28

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.6	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.0	90.2	63 - 128	
1,1,2-Trichloroethane	20.0	18.7	93.3	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.6	98.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.5	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.3	107	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.9	69 - 132	
1,2-Dichlorobenzene	20.0	19.8	98.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.4	50 - 132	
1,2-Dichloropropane	20.0	19.5	97.6	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	103	74 - 131	
1,3-Dichlorobenzene	20.0	20.1	100	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	17.0	85.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.5	92.4	73 - 126	
4-Chlorotoluene	20.0	19.7	98.7	74 - 128	
Acetone	20.0	18.9	94.6	40 - 135	
Benzene	20.0	19.5	97.6	81 - 122	
Bromobenzene	20.0	19.5	97.6	76 - 124	
Bromochloromethane	20.0	19.3	96.3	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	18.2	90.8	69 - 128	
Bromomethane	20.0	20.2	101	30 - 141	
Carbon disulfide	20.0	14.2	70.8	58 - 128	
Carbon tetrachloride	20.0	20.4	102	66 - 138	
Chlorobenzene	20.0	19.5	97.3	81 - 122	
Chloroethane	20.0	21.8	109	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	17.8	89.0	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.6	103	69 - 131	
Dibromochloromethane	20.0	19.3	96.7	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.9	99.6	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	20.1	100	73 - 127	
Hexachlorobutadiene	20.0	19.1	95.7	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	18.7	93.3	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.0	94.9	65 - 123	
MEK (2-Butanone)	20.0	19.3	96.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.6	58 - 134	
n-Butylbenzene	20.0	21.4	107	69 - 137	
n-Propylbenzene	20.0	19.6	97.9	72 - 129	
m-,p-Xylene	40.0	40.6	102	76 - 128	
Naphthalene	20.0	21.2	106	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	19.5	97.3	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	19.0	95.1	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	20.4	102	66 - 128	
Toluene	20.0	19.2	96.1	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	20.7	103	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	93.8	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.2	96.2	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	19.7	98.4	68 - 130	
1,1-Dichloropropene	20.0	19.8	99.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.1	90.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.6	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.7	93.7	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	74 - 132	
1,2-Dichloroethane	20.0	19.5	97.3	69 - 132	
1,2-Dichlorobenzene	20.0	18.9	94.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	19.8	99.1	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.7	98.7	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.3	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	93.8	74 - 123	
1-Chlorohexane	20.0	20.6	103	70 - 125	
2,2-Dichloropropane	20.0	20.9	104	69 - 137	
2-Hexanone	20.0	20.6	103	55 - 130	
2-Chlorotoluene	20.0	19.2	95.8	73 - 126	
4-Chlorotoluene	20.0	19.9	99.7	74 - 128	
Acetone	20.0	19.0	94.9	40 - 135	
Benzene	20.0	19.7	98.4	81 - 122	
Bromobenzene	20.0	18.6	93.2	76 - 124	
Bromochloromethane	20.0	19.9	99.6	65 - 129	
Bromodichloromethane	20.0	19.2	96.1	76 - 121	
Bromoform	20.0	19.1	95.3	69 - 128	
Bromomethane	20.0	17.2	86.0	30 - 141	
Carbon disulfide	20.0	16.2	80.8	58 - 128	
Carbon tetrachloride	20.0	19.6	98.0	66 - 138	
Chlorobenzene	20.0	19.0	95.0	81 - 122	
Chloroethane	20.0	19.0	95.1	58 - 133	
Chloroform	20.0	20.1	101	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	19.3	96.6	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	18.9	94.6	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.7	76 - 125	
Dichlorodifluoromethane	20.0	24.9	124	30 - 153	
Ethylbenzene	20.0	19.9	99.3	73 - 127	
Hexachlorobutadiene	20.0	17.5	87.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.5	75 - 127	
Methylene chloride	20.0	18.9	94.7	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.3	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.7	98.5	58 - 134	
n-Butylbenzene	20.0	20.3	101	69 - 137	
n-Propylbenzene	20.0	19.7	98.4	72 - 129	
m-,p-Xylene	40.0	39.6	99.1	76 - 128	
Naphthalene	20.0	18.1	90.6	54 - 138	
o-Xylene	20.0	19.3	96.5	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.6	73 - 130	
sec-Butylbenzene	20.0	19.6	98.0	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	18.1	90.7	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.3	96.5	66 - 128	
Toluene	20.0	19.9	99.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.7	98.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	20.5	103	57 - 129	
Vinyl chloride	20.0	23.1	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	99.4	81 - 120	PASS
4-Bromofluorobenzene	96.4	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041209 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.9	94.5	20.0	19.4	97.0	2.58	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.3	101	20.0	21.0	105	3.24	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	21.3	106	20.0	22.3	111	4.49	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.3	96.5	20.0	19.9	99.5	3.04	75 - 125	20	
1,1-Dichloroethane	20.0	20.2	101	20.0	20.8	104	2.71	69 - 133	20	
1,1-Dichloroethene	20.0	20.3	102	20.0	20.4	102	0.506	68 - 130	20	
1,1-Dichloropropene	20.0	19.5	97.6	20.0	20.4	102	4.26	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	20.0	19.3	96.4	4.20	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.4	97.1	20.0	20.3	102	4.56	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	95.2	20.0	19.7	98.7	3.56	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.0	100	20.0	20.6	103	2.71	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.2	96.0	20.0	20.7	103	7.46	50 - 132	20	
1,2-Dibromoethane	20.0	19.2	95.8	20.0	19.6	97.9	2.24	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.4	96.8	20.0	19.8	99.2	2.43	71 - 122	20	
1,2-Dichloroethane	20.0	19.8	98.8	20.0	20.3	101	2.66	69 - 132	20	
1,2-Dichloropropane	20.0	19.7	98.7	20.0	20.5	103	3.74	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.9	99.5	20.0	20.5	103	3.22	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.4	97.1	20.0	20.0	99.9	2.92	75 - 124	20	
1,3-Dichloropropane	20.0	20.2	101	20.0	21.0	105	3.78	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.2	95.9	20.0	19.8	99.2	3.42	74 - 123	20	
1-Chlorohexane	20.0	20.7	104	20.0	21.7	108	4.47	70 - 125	20	
2,2-Dichloropropane	20.0	21.1	106	20.0	21.5	108	1.87	69 - 137	20	
MEK (2-Butanone)	20.0	18.5	92.6	20.0	19.6	97.9	5.47	49 - 136	20	
2-Chlorotoluene	20.0	19.5	97.3	20.0	20.0	99.9	2.55	73 - 126	20	
2-Hexanone	20.0	20.2	101	20.0	21.1	105	4.19	55 - 130	20	
4-Chlorotoluene	20.0	20.2	101	20.0	20.8	104	2.90	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	20.0	20.7	104	6.94	58 - 134	20	
Acetone	20.0	16.6	83.0	20.0	17.4	87.1	4.83	40 - 135	20	
Benzene	20.0	19.6	97.8	20.0	20.3	102	3.83	81 - 122	20	
Bromobenzene	20.0	18.9	94.7	20.0	19.4	97.2	2.55	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	20.6	103	2.87	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.0	20.0	19.8	98.9	2.99	76 - 121	20	
Bromoform	20.0	19.1	95.5	20.0	19.7	98.5	3.10	69 - 128	20	
Bromomethane	20.0	17.1	85.6	20.0	17.8	88.9	3.81	30 - 141	20	
Carbon disulfide	20.0	16.7	83.3	20.0	16.8	83.9	0.693	58 - 128	20	
Carbon tetrachloride	20.0	19.8	99.1	20.0	20.5	102	3.34	66 - 138	20	
Chlorobenzene	20.0	19.1	95.4	20.0	19.6	97.9	2.57	81 - 122	20	
Chloroethane	20.0	20.4	102	20.0	19.7	98.3	3.89	58 - 133	20	
Chloroform	20.0	20.1	100	20.0	20.8	104	3.41	69 - 128	20	
Chloromethane	20.0	21.9	109	20.0	22.9	114	4.56	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5272001
Report generated: 07/25/2017 15:29

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041209 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.3	96.4	20.0	20.0	100	3.87	72 - 126	20	
cis-1,3-Dichloropropene	20.0	21.1	105	20.0	21.9	110	3.82	69 - 131	20	
Dibromochloromethane	20.0	18.9	94.7	20.0	19.5	97.4	2.86	66 - 133	20	
Dibromomethane	20.0	19.8	98.8	20.0	20.4	102	3.09	76 - 125	20	
Dichlorodifluoromethane	20.0	24.8	124	20.0	24.6	123	0.901	30 - 153	20	
Ethylbenzene	20.0	19.5	97.7	20.0	20.2	101	3.09	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.5	92.3	1.53	67 - 131	20	
Isopropylbenzene	20.0	19.0	94.9	20.0	19.7	98.7	3.91	75 - 127	20	
m-,p-Xylene	40.0	39.2	98.0	40.0	40.4	101	2.97	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.6	98.1	20.0	20.1	101	2.56	65 - 123	20	
Methylene chloride	20.0	19.6	97.8	20.0	19.7	98.4	0.646	63 - 137	20	
n-Butylbenzene	20.0	20.6	103	20.0	21.2	106	3.05	69 - 137	20	
n-Propylbenzene	20.0	20.0	100	20.0	20.5	103	2.35	72 - 129	20	
Naphthalene	20.0	18.1	90.5	20.0	19.3	96.4	6.35	54 - 138	20	
o-Xylene	20.0	19.2	95.9	20.0	19.8	99.1	3.25	80 - 121	20	
p-Isopropyltoluene	20.0	20.0	99.8	20.0	20.6	103	3.11	73 - 130	20	
sec-Butylbenzene	20.0	19.8	99.0	20.0	20.3	102	2.65	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.8	104	2.70	65 - 134	20	
tert-Butylbenzene	20.0	19.3	96.6	20.0	19.7	98.5	2.03	70 - 129	20	
Tetrachloroethene	20.0	19.3	96.4	20.0	19.9	99.4	3.05	66 - 128	20	
Toluene	20.0	19.8	98.9	20.0	20.4	102	2.98	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.6	98.0	20.0	20.1	100	2.26	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.5	97.7	20.0	20.6	103	5.06	59 - 135	20	
Trichloroethene	20.0	18.1	90.5	20.0	18.7	93.5	3.26	70 - 127	20	
Trichlorofluoromethane	20.0	21.0	105	20.0	21.1	106	0.598	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	23.5	118	1.49	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	103	72 - 119	PASS
Dibromofluoromethane	103	101	85 - 115	PASS
4-Bromofluorobenzene	109	102	76 - 119	PASS
Toluene-d8	105	102	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5272001
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2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041117
Analyst1: FJB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD80956 Surrogate Standard: STD80957
CCV: NA LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609769

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17453	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:40
11M17454	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:59
11M17455	RINSE	NA	1	1		04/11/17 18:23
11M17456	WG609769-02 5ug/L STD A9	NA	1	1	STD81397	04/11/17 18:52
11M17457	WG609769-03 20ug/L STD A9	NA	1	1	STD81397	04/11/17 19:20
11M17458	WG609769-04 50ug/L STD A9	NA	1	1	STD81397	04/11/17 19:50
11M17459	WG609769-05 100ug/L STD A9	NA	1	1	STD81397	04/11/17 20:20
11M17460	WG609769-06 200ug/L STD A9	NA	1	1	STD81397	04/11/17 20:49
11M17461	WG609769-07 300ug/L STD A9	NA	1	1	STD81397	04/11/17 21:18
11M17462	WG609769-08 400ug/L STD A9	NA	1	1	STD81397	04/11/17 21:47
11M17463	WG609769-09 500ug/L STD A9	NA	1	1	STD81397	04/11/17 22:17
11M17464	RINSE	NA	1	1		04/11/17 22:47
11M17465	RINSE	NA	1	1		04/11/17 23:17
11M17466	WG609769-10 100ug/L ICV A9	NA	1	1	STD81404	04/11/17 23:46

Approved: April 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042417
Analyst1: JDS Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54137

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611320

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17701	WG611320-02 50ug/L CCV 8260	NA	1	1	STD81577	04/24/17 14:20
11M17704	RINSE	NA	1	1	STD81491	04/24/17 15:18
11M17705	WG611320-01 BFB 50ng 8260	NA	1	1	STD81491	04/24/17 16:08
11M17706	RINSE	NA	1	1	STD81577	04/24/17 16:32
11M17707	WG611320-02 .3ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:01
11M17708	WG611320-03 .4ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:30
11M17709	WG611320-04 1ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:59
11M17710	WG611320-05 2ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:29
11M17711	WG611320-06 5ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:58
11M17712	WG611320-07 20ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:27
11M17713	WG611320-08 50ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:57
11M17714	WG611320-09 100ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:27
11M17715	WG611320-10 200ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:56
11M17716	WG611320-11 300ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 21:26
11M17717	RINSE	NA	1	1		04/24/17 21:56
11M17718	WG611320-12 50ug/L ICV 8260	NA	1	1	STD81583	04/24/17 22:26

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042517
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611545, WG611456

Comments: MDLS need RR for DCDF

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273002	WG611454-01 BFB 50ng 8260	NA	1	1	STD81491	04/25/17 20:07
17M0273003	RINSE	NA	1	1		04/25/17 20:25
17M0273004	WG611454-02 0.3ug/L STD 8260	NA	1	1	STD81577	04/25/17 20:45
17M0273005	WG611454-03 0.4ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:05
17M0273006	WG611454-04 1ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:24
17M0273007	WG611454-05 2ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:56
17M0273008	WG611454-06 5ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:15
17M0273009	WG611454-07 20ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:46
17M0273010	WG611454-08 50ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:06
17M0273011	WG611454-09 100ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:38
17M0273012	WG611454-10 200ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:58
17M0273013	WG611454-11 300ug/L STD 8260	NA	1	1	STD81577	04/26/17 00:33
17M0273014	RINSE	NA	1	1		04/26/17 00:53
17M0273015	WG611454-12 50ug/L ICV 8260	NA	1	1	STD81596	04/26/17 01:35
17M0273016	RINSE	NA	1	1		04/26/17 02:19
17M0273017	WG611456-01 BLANK 8260	NA	1	1		04/26/17 02:53
17M0273018	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 03:32
17M0273019	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 04:14
17M0273020	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 04:34
17M0273021	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 05:22
17M0273022	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 05:58
17M0273023	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 06:18
17M0273024	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 07:01
17M0273025	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 07:21
17M0273026	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 08:14

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17861	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:42
11M17862	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:54
11M17863	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 16:19
11M17864	RINSE	NA	1	1	STD81577	04/29/17 16:50
11M17865	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 17:20
11M17866	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:45
11M17867	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:57
11M17868	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:21
11M17869	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:53
11M17870	WG612122-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/29/17 19:26
11M17871	WG612123-01 VBLK0429 BLANK STD 826	NA	1	1		04/29/17 19:55
11M17872	WG612123-02 20ug/L LCS STD 8260	NA	1	1	STD81654	04/29/17 20:24
11M17873	L17041203-02 B MS 826-SPE	<2	1	1	STD81654	04/29/17 20:53
11M17874	L17041203-03 B MSD 826-SPE	<2	1	1	STD81654	04/29/17 21:22
11M17875	RINSE	NA	1	1		04/29/17 21:51
11M17876	L17041208-03 A TB 826-SPE	<2	1	1		04/29/17 22:20
11M17877	L17041203-01 A RS 826-SPE	<2	1	1		04/29/17 22:49
11M17878	L17041209-08 A TB 826-SPE	<2	1	1		04/29/17 23:18
11M17879	L17041209-09 A EB 826-SPE	<2	1	1		04/29/17 23:48
11M17880	L17041200-01 B 826-SPE	<2	1	1		04/30/17 00:17
11M17881	L17041203-04 A 826-SPE	<2	1	1		04/30/17 00:46
11M17882	L17041208-01 A 826-SPE	<2	1	1		04/30/17 01:16
11M17883	L17041208-02 A 826-SPE	<2	1	1		04/30/17 01:45
11M17884	L17041209-01 A 826-SPE	<2	1	1		04/30/17 02:14
11M17885	L17041209-02 A 826-SPE	<2	1	1		04/30/17 02:43
11M17886	L17041209-03 A 826-SPE	<2	1	1		04/30/17 03:13
11M17887	L17041209-04 A 826-SPE	<2	1	1		04/30/17 03:42
11M17888	L17041209-05 A 826-SPE	<2	1	1		04/30/17 04:11
11M17889	L17041203-06 A 826-SPE	<2	1	1		04/30/17 04:40
11M17890	L17041203-07 A 826-SPE	<2	1	1		04/30/17 05:10
11M17891	L17041203-08 A 826-SPE	<2	1	1		04/30/17 05:39
11M17892	WG612124-02 20ug/L LCS STD 624	NA	2	1	STD81654	04/30/17 06:08
11M17893	WG612124-03 20ug/L LCS2 STD 624	NA	2	1	STD81654	04/30/17 06:37
11M17894	WG612124-01 VBLK0429 BLANK STD 624	NA	2	1		04/30/17 07:06

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17895	L17041383-07 A TB 624-SPE1	5	2	1		04/30/17 07:35
11M17896	L17041379-03 A 624-SPE1	7	2	1		04/30/17 08:05
11M17897	L17041379-05 A 624-SPE1	7	2	1		04/30/17 08:34
11M17898	L17041379-10 A 624-SPE1	7	2	1		04/30/17 09:04
11M17899	L17041381-01 A 624-SPE1	7	2	1		04/30/17 09:33
11M17900	L17041381-03 A 624-SPE1	7	2	1		04/30/17 10:02
11M17901	L17041381-05 A 624-SPE1	7	2	1		04/30/17 10:31
11M17902	CCV	NA	1	1		04/30/17 11:00
11M17903	RINSE	NA	1	1		04/30/17 11:29

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1				
File ID: 11M17861				
			WG612121-01 fails, RR BFB.	
3	X			
File ID: 11M17863				
			WG612121-02 ISTD high.	
5				
File ID: 11M17865				
			WG612121-02 VC fails high, Drop voltage, RR.	
6				
File ID: 11M17866				
			WG612121-01 Fails, RR.	
8				
File ID: 11M17868				
			WG612121-02 VC fails, high, RR.	

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 043017
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612142

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273172	WG612141-01 BFB 50ng 8260	NA	1	1	STD81491	04/30/17 14:35
17M0273173	WG612141-02 50ug/L CCV 8260	NA	1	1	STD81577	04/30/17 14:54
17M0273174	RINSE	NA	1	1		04/30/17 15:28
17M0273175	WG612142-01 BLANK 8260	NA	1	1		04/30/17 15:48
17M0273176	WG612142-02 20ug/L LCS 8260	NA	1	1	STD81596	04/30/17 16:07
17M0273177	L17041203-20 A MS 826-SPE	<2	1	1	STD81596	04/30/17 16:27
17M0273178	L17041203-21 A MSD 826-SPE	<2	1	1	STD81596	04/30/17 16:47
17M0273179	RINSE	NA	1	1		04/30/17 17:20
17M0273180	L17041244-42 A 826-SPE	<2	1	1		04/30/17 17:40
17M0273181	L17041244-43 A 826-SPE	<2	1	1		04/30/17 18:00
17M0273182	L17041244-38 A 826-SPE	<2	1	1		04/30/17 18:34
17M0273183	L17041244-41 A 826-SPE	<2	1	1		04/30/17 18:54
17M0273184	L17041244-28 B 826-SPE	<2	1	1		04/30/17 19:14
17M0273185	L17041244-36 B 826-SPE	<2	1	1		04/30/17 19:34
17M0273186	L17041244-34 B 20X 826-SPE	3	1	20		04/30/17 19:54
17M0273187	RINSE	NA	1	1		04/30/17 20:13
17M0273188	L17041203-19 A RS 826-SPE	<2	1	1		04/30/17 20:33
17M0273189	L17041203-05 A 826-SPE	<2	1	1		04/30/17 20:53
17M0273190	L17041203-09 A 826-SPE	<2	1	1		04/30/17 21:13
17M0273191	L17041203-13 A 826-SPE	<2	1	1		04/30/17 21:39
17M0273192	L17041203-14 A 826-SPE	<2	1	1		04/30/17 21:59
17M0273193	L17041203-15 A 826-SPE	<2	1	1		04/30/17 22:19
17M0273194	L17041203-16 A 826-SPE	<2	1	1		04/30/17 22:39
17M0273195	L17041203-17 A 826-SPE	<2	1	1		04/30/17 22:59
17M0273196	L17041203-18 A 826-SPE	<2	1	1		04/30/17 23:19
17M0273197	L17041209-09 A 50X 826-SPE	NA	1	50		04/30/17 23:42
17M0273198	L17041209-07 A 5X 826-SPE	NA	1	5		05/01/17 00:10
17M0273199	RINSE	NA	1	1		05/01/17 00:30
17M0273200	RINSE	NA	1	1		05/01/17 00:49
17M0273201	RINSE	NA	1	1		05/01/17 01:09

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 043017
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612142

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
26				
File ID: 17M0273197				
			L17041209-09 sample foamed. Too dark to pH.	
27				
File ID: 17M0273198				
			L17041209-07 sample too dark to pH. Dark and foamy matrix, done at 5x.	

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050117
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612250

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273202	WG612249-01 BFB 50ng 8260	NA	1	1	STD81491	05/01/17 11:49
17M0273203	WG612249-02 50ug/L CCV 8260	NA	1	1	STD81577	05/01/17 12:07
17M0273204	RINSE	NA	1	1		05/01/17 12:29
17M0273205	WG612250-01 BLANK 8260	NA	1	1		05/01/17 12:49
17M0273206	WG612250-02 20ug/L LCS 8260	NA	1	1	STD81596	05/01/17 13:09
17M0273207	WG612250-03 20ug/L LCSDUP 8260	NA	1	1	STD81596	05/01/17 13:29
17M0273208	RINSE	NA	1	1		05/01/17 13:48
17M0273209	L17041209-06 B 50X 826-SPE	<2	1	50		05/01/17 14:08
17M0273210	RINSE	NA	1	1		05/01/17 14:38
17M0273211	L17041203-22 A 826-SPE	<2	1	1		05/01/17 14:58
17M0273212	L17041203-23 A 826-SPE	<2	1	1		05/01/17 15:18
17M0273213	L17041203-24 A 826-SPE	<2	1	1		05/01/17 15:49
17M0273214	L17041203-25 A 826-SPE	<2	1	1		05/01/17 16:09
17M0273215	L17041203-26 A 826-SPE	<2	1	1		05/01/17 16:28
17M0273216	L17041203-27 A 826-SPE	<2	1	1		05/01/17 16:48
17M0273217	L17041203-28 A 826-SPE	<2	1	1		05/01/17 17:17
17M0273218	L17041203-29 A 826-SPE	<2	1	1		05/01/17 17:37
17M0273219	L17041203-30 A 826-SPE	<2	1	1		05/01/17 17:57
17M0273220	L17041203-31 A 826-SPE	<2	1	1		05/01/17 18:16
17M0273221	L17041203-32 A 826-SPE	<2	1	1		05/01/17 18:36
17M0273222	L17041203-33 A 826-SPE	<2	1	1		05/01/17 19:08
17M0273223	L17041203-34 A 826-SPE	<2	1	1		05/01/17 19:27
17M0273224	L17041203-35 A 826-SPE	<2	1	1		05/01/17 19:47
17M0273225	L17041203-36 A 826-SPE	<2	1	1		05/01/17 20:17
17M0273226	L17041203-37 A 826-SPE	<2	1	1		05/01/17 20:36
17M0273227	L17041203-38 A 826-SPE	<2	1	1		05/01/17 20:56
17M0273228	L17041203-39 A 826-SPE	<2	1	1		05/01/17 21:16
17M0273229	L17041203-40 A 826-SPE	<2	1	1		05/01/17 21:44
17M0273230	RINSE	NA	1	1		05/01/17 22:04
17M0273231	RINSE	NA	1	1		05/01/17 22:33
17M0273232	RINSE	NA	1	1		05/01/17 22:53

Comments

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050117
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612250

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
8				
File ID: 17M0273209				
L17041209-06 HIGH SS due to dark and foamy sample matrix. A vial foamed instrument.				

Approved: May 02, 2017

Microbac Laboratories Inc.

Data Checklist

Date: 11-APR-2017
Analyst: FJB
Analyst: NA
Method: 8260B/C/OVAP/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81698
Analytical Workgroups: WG609769

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	NA
Surrogates	NA
LCS (Laboratory Control Sample)	NA
Recoveries	NA
Surrogates	NA
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	NA
Internal Standards Criteria	NA
Library Searches	NA
Calculations & Correct Factors	NA
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	FJB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017

Secondary Reviewer:
24-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:52:25

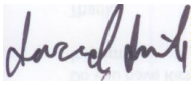
Microbac Laboratories Inc.

Data Checklist

Date: 24-APR-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81779
Analytical Workgroups: WG611320

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	NA
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017



Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 16:39:04

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81782
Analytical Workgroups: WG611454, WG611456

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-31-2017 15:17:00

Microbac Laboratories Inc.

Data Checklist

Date: 29-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81877
Analytical Workgroups: WG612123, WG612124

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
02-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 16:33:36

Microbac Laboratories Inc.

Data Checklist

Date: 30-MAY-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81857
Analytical Workgroups: WG612142

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
01-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 18:29:31

Microbac Laboratories Inc.

Data Checklist

Date: 01-MAY-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81875
Analytical Workgroups: WG612250

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
02-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 18:41:38

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612123

Login Number: L17041209

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-209B-LS-25	01	04/22/17					04/30/2017	7.7	14		04/30/17	7.7	14	
MW-209A-LS-25	02	04/22/17					04/30/2017	7.8	14		04/30/17	7.8	14	
MW-273-LS-25	03	04/22/17					04/30/2017	7.8	14		04/30/17	7.8	14	
MW-219-LS-25	04	04/22/17					04/30/2017	7.8	14		04/30/17	7.8	14	
MW-269-LS-25	05	04/22/17					04/30/2017	7.8	14		04/30/17	7.8	14	
LTM-TB5-LS-25	08	04/24/17					04/29/2017	5.3	14		04/29/17	5.3	14	
EB1-LS-25	09	04/22/17					04/29/2017	7.4	14		04/29/17	7.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5271998
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612142

Login Number: L17041209

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW101-02A-LS-25-RE	07	04/24/17					05/01/2017	6.5	14		05/01/17	6.5	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5271998
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG612250

Login Number: L17041209

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR2-5-LS-25	06	04/22/17					05/01/2017	9.3	14		05/01/17	9.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5271998
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041209
Instrument Id: HPMS17
Workgroup (AAB#): WG612142

Method: 8260
CAL ID: HPMS17-26-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041209-07	5.00	DL01	104	103	108	104
WG612142-01	1.00	01	103	100	105	101
WG612142-02	1.00	01	100	98.4	96.4	99.4

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5272007
Report generated: 05/02/2017 18:46

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041209 **Method:** 8260
Instrument Id: HPMS17 **CAL ID:** HPMS17-26-APR-17
Workgroup (AAB#): WG612250 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041209-06	50.0	DL01	99.0	97.3	122	104
WG612250-01	1.00	01	104	101	106	102
WG612250-02	1.00	01	104	103	109	105
WG612250-03	1.00	01	103	101	102	102

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5272007
Report generated: 05/02/2017 18:46

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041209 **Method:** 8260
Instrument Id: HPMS11 **CAL ID:** HPMS11-24-APR-17
Workgroup (AAB#): WG612123 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041209-01	1.00	01	103	101	110	105
L17041209-02	1.00	01	107	103	110	107
L17041209-03	1.00	01	107	104	105	107
L17041209-04	1.00	01	106	101	106	104
L17041209-05	1.00	01	107	102	106	105
L17041209-08	1.00	01	107	106	114	109
L17041209-09	1.00	01	105	99.7	106	105
WG612123-01	1.00	01	104	99.1	106	106
WG612123-02	1.00	01	105	103	104	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5272007
Report generated: 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041209
Work Group: WG612123
Blank File ID: 11M17871
Blank Sample ID: WG612123-01
Prep Date: 04/29/17 19:55
Instrument ID: HPMS11
Analyzed Date: 04/29/17 19:55
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612123-02	11M17872	04/29/17 20:24	01
LTM-TB5-LS-25	L17041209-08	11M17878	04/29/17 23:18	01
EB1-LS-25	L17041209-09	11M17879	04/29/17 23:48	01
MW-209B-LS-25	L17041209-01	11M17884	04/30/17 02:14	01
MW-209A-LS-25	L17041209-02	11M17885	04/30/17 02:43	01
MW-273-LS-25	L17041209-03	11M17886	04/30/17 03:13	01
MW-219-LS-25	L17041209-04	11M17887	04/30/17 03:42	01
MW-269-LS-25	L17041209-05	11M17888	04/30/17 04:11	01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041209	Work Group:	WG612142
Blank File ID:	17M0273175	Blank Sample ID:	WG612142-01
Prep Date:	04/30/17 15:48	Instrument ID:	HPMS17
Analyzed Date:	04/30/17 15:48	Method:	8260B
Analyst:	ADC		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612142-02	17M0273176	04/30/17 16:07	01
PMW101-02A-LS-25-RE	L17041209-07	17M0273198	05/01/17 00:10	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041209
Work Group: WG612250
Blank File ID: 17M0273205
Blank Sample ID: WG612250-01
Prep Date: 05/01/17 12:49
Instrument ID: HPMS17
Analyzed Date: 05/01/17 12:49
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612250-02	17M0273206	05/01/17 13:09	01
LCS2	WG612250-03	17M0273207	05/01/17 13:29	01
DR2-5-LS-25	L17041209-06	17M0273209	05/01/17 14:08	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5271999
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5272000
25-JUL-2017 15:28

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.1	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
25-JUL-2017 15:28

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	100	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	101	81 - 120	PASS
4-Bromofluorobenzene	105	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
25-JUL-2017 15:28

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041209 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5272000
25-JUL-2017 15:28

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.6	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.0	90.2	63 - 128	
1,1,2-Trichloroethane	20.0	18.7	93.3	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.6	98.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.5	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.3	107	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.9	69 - 132	
1,2-Dichlorobenzene	20.0	19.8	98.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.4	50 - 132	
1,2-Dichloropropane	20.0	19.5	97.6	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	103	74 - 131	
1,3-Dichlorobenzene	20.0	20.1	100	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	17.0	85.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.5	92.4	73 - 126	
4-Chlorotoluene	20.0	19.7	98.7	74 - 128	
Acetone	20.0	18.9	94.6	40 - 135	
Benzene	20.0	19.5	97.6	81 - 122	
Bromobenzene	20.0	19.5	97.6	76 - 124	
Bromochloromethane	20.0	19.3	96.3	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	18.2	90.8	69 - 128	
Bromomethane	20.0	20.2	101	30 - 141	
Carbon disulfide	20.0	14.2	70.8	58 - 128	
Carbon tetrachloride	20.0	20.4	102	66 - 138	
Chlorobenzene	20.0	19.5	97.3	81 - 122	
Chloroethane	20.0	21.8	109	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	17.8	89.0	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.6	103	69 - 131	
Dibromochloromethane	20.0	19.3	96.7	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.9	99.6	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	20.1	100	73 - 127	
Hexachlorobutadiene	20.0	19.1	95.7	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	18.7	93.3	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.0	94.9	65 - 123	
MEK (2-Butanone)	20.0	19.3	96.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.6	58 - 134	
n-Butylbenzene	20.0	21.4	107	69 - 137	
n-Propylbenzene	20.0	19.6	97.9	72 - 129	
m-,p-Xylene	40.0	40.6	102	76 - 128	
Naphthalene	20.0	21.2	106	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	19.5	97.3	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	19.0	95.1	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	20.4	102	66 - 128	
Toluene	20.0	19.2	96.1	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	20.7	103	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	93.8	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.2	96.2	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	19.7	98.4	68 - 130	
1,1-Dichloropropene	20.0	19.8	99.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.1	90.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.6	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.7	93.7	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	74 - 132	
1,2-Dichloroethane	20.0	19.5	97.3	69 - 132	
1,2-Dichlorobenzene	20.0	18.9	94.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	19.8	99.1	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.7	98.7	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.3	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	93.8	74 - 123	
1-Chlorohexane	20.0	20.6	103	70 - 125	
2,2-Dichloropropane	20.0	20.9	104	69 - 137	
2-Hexanone	20.0	20.6	103	55 - 130	
2-Chlorotoluene	20.0	19.2	95.8	73 - 126	
4-Chlorotoluene	20.0	19.9	99.7	74 - 128	
Acetone	20.0	19.0	94.9	40 - 135	
Benzene	20.0	19.7	98.4	81 - 122	
Bromobenzene	20.0	18.6	93.2	76 - 124	
Bromochloromethane	20.0	19.9	99.6	65 - 129	
Bromodichloromethane	20.0	19.2	96.1	76 - 121	
Bromoform	20.0	19.1	95.3	69 - 128	
Bromomethane	20.0	17.2	86.0	30 - 141	
Carbon disulfide	20.0	16.2	80.8	58 - 128	
Carbon tetrachloride	20.0	19.6	98.0	66 - 138	
Chlorobenzene	20.0	19.0	95.0	81 - 122	
Chloroethane	20.0	19.0	95.1	58 - 133	
Chloroform	20.0	20.1	101	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	19.3	96.6	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	18.9	94.6	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.7	76 - 125	
Dichlorodifluoromethane	20.0	24.9	124	30 - 153	
Ethylbenzene	20.0	19.9	99.3	73 - 127	
Hexachlorobutadiene	20.0	17.5	87.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.5	75 - 127	
Methylene chloride	20.0	18.9	94.7	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.3	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.7	98.5	58 - 134	
n-Butylbenzene	20.0	20.3	101	69 - 137	
n-Propylbenzene	20.0	19.7	98.4	72 - 129	
m-,p-Xylene	40.0	39.6	99.1	76 - 128	
Naphthalene	20.0	18.1	90.6	54 - 138	
o-Xylene	20.0	19.3	96.5	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.6	73 - 130	
sec-Butylbenzene	20.0	19.6	98.0	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	18.1	90.7	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.3	96.5	66 - 128	
Toluene	20.0	19.9	99.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.7	98.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	20.5	103	57 - 129	
Vinyl chloride	20.0	23.1	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	99.4	81 - 120	PASS
4-Bromofluorobenzene	96.4	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5272796
Report generated: 07/25/2017 15:29

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041209 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.9	94.5	20.0	19.4	97.0	2.58	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.3	101	20.0	21.0	105	3.24	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	21.3	106	20.0	22.3	111	4.49	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.3	96.5	20.0	19.9	99.5	3.04	75 - 125	20	
1,1-Dichloroethane	20.0	20.2	101	20.0	20.8	104	2.71	69 - 133	20	
1,1-Dichloroethene	20.0	20.3	102	20.0	20.4	102	0.506	68 - 130	20	
1,1-Dichloropropene	20.0	19.5	97.6	20.0	20.4	102	4.26	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	20.0	19.3	96.4	4.20	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.4	97.1	20.0	20.3	102	4.56	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	95.2	20.0	19.7	98.7	3.56	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.0	100	20.0	20.6	103	2.71	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.2	96.0	20.0	20.7	103	7.46	50 - 132	20	
1,2-Dibromoethane	20.0	19.2	95.8	20.0	19.6	97.9	2.24	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.4	96.8	20.0	19.8	99.2	2.43	71 - 122	20	
1,2-Dichloroethane	20.0	19.8	98.8	20.0	20.3	101	2.66	69 - 132	20	
1,2-Dichloropropane	20.0	19.7	98.7	20.0	20.5	103	3.74	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.9	99.5	20.0	20.5	103	3.22	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.4	97.1	20.0	20.0	99.9	2.92	75 - 124	20	
1,3-Dichloropropane	20.0	20.2	101	20.0	21.0	105	3.78	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.2	95.9	20.0	19.8	99.2	3.42	74 - 123	20	
1-Chlorohexane	20.0	20.7	104	20.0	21.7	108	4.47	70 - 125	20	
2,2-Dichloropropane	20.0	21.1	106	20.0	21.5	108	1.87	69 - 137	20	
MEK (2-Butanone)	20.0	18.5	92.6	20.0	19.6	97.9	5.47	49 - 136	20	
2-Chlorotoluene	20.0	19.5	97.3	20.0	20.0	99.9	2.55	73 - 126	20	
2-Hexanone	20.0	20.2	101	20.0	21.1	105	4.19	55 - 130	20	
4-Chlorotoluene	20.0	20.2	101	20.0	20.8	104	2.90	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	20.0	20.7	104	6.94	58 - 134	20	
Acetone	20.0	16.6	83.0	20.0	17.4	87.1	4.83	40 - 135	20	
Benzene	20.0	19.6	97.8	20.0	20.3	102	3.83	81 - 122	20	
Bromobenzene	20.0	18.9	94.7	20.0	19.4	97.2	2.55	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	20.6	103	2.87	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.0	20.0	19.8	98.9	2.99	76 - 121	20	
Bromoform	20.0	19.1	95.5	20.0	19.7	98.5	3.10	69 - 128	20	
Bromomethane	20.0	17.1	85.6	20.0	17.8	88.9	3.81	30 - 141	20	
Carbon disulfide	20.0	16.7	83.3	20.0	16.8	83.9	0.693	58 - 128	20	
Carbon tetrachloride	20.0	19.8	99.1	20.0	20.5	102	3.34	66 - 138	20	
Chlorobenzene	20.0	19.1	95.4	20.0	19.6	97.9	2.57	81 - 122	20	
Chloroethane	20.0	20.4	102	20.0	19.7	98.3	3.89	58 - 133	20	
Chloroform	20.0	20.1	100	20.0	20.8	104	3.41	69 - 128	20	
Chloromethane	20.0	21.9	109	20.0	22.9	114	4.56	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5272001
Report generated: 07/25/2017 15:29

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041209 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.3	96.4	20.0	20.0	100	3.87	72 - 126	20	
cis-1,3-Dichloropropene	20.0	21.1	105	20.0	21.9	110	3.82	69 - 131	20	
Dibromochloromethane	20.0	18.9	94.7	20.0	19.5	97.4	2.86	66 - 133	20	
Dibromomethane	20.0	19.8	98.8	20.0	20.4	102	3.09	76 - 125	20	
Dichlorodifluoromethane	20.0	24.8	124	20.0	24.6	123	0.901	30 - 153	20	
Ethylbenzene	20.0	19.5	97.7	20.0	20.2	101	3.09	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.5	92.3	1.53	67 - 131	20	
Isopropylbenzene	20.0	19.0	94.9	20.0	19.7	98.7	3.91	75 - 127	20	
m-,p-Xylene	40.0	39.2	98.0	40.0	40.4	101	2.97	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.6	98.1	20.0	20.1	101	2.56	65 - 123	20	
Methylene chloride	20.0	19.6	97.8	20.0	19.7	98.4	0.646	63 - 137	20	
n-Butylbenzene	20.0	20.6	103	20.0	21.2	106	3.05	69 - 137	20	
n-Propylbenzene	20.0	20.0	100	20.0	20.5	103	2.35	72 - 129	20	
Naphthalene	20.0	18.1	90.5	20.0	19.3	96.4	6.35	54 - 138	20	
o-Xylene	20.0	19.2	95.9	20.0	19.8	99.1	3.25	80 - 121	20	
p-Isopropyltoluene	20.0	20.0	99.8	20.0	20.6	103	3.11	73 - 130	20	
sec-Butylbenzene	20.0	19.8	99.0	20.0	20.3	102	2.65	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.8	104	2.70	65 - 134	20	
tert-Butylbenzene	20.0	19.3	96.6	20.0	19.7	98.5	2.03	70 - 129	20	
Tetrachloroethene	20.0	19.3	96.4	20.0	19.9	99.4	3.05	66 - 128	20	
Toluene	20.0	19.8	98.9	20.0	20.4	102	2.98	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.6	98.0	20.0	20.1	100	2.26	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.5	97.7	20.0	20.6	103	5.06	59 - 135	20	
Trichloroethene	20.0	18.1	90.5	20.0	18.7	93.5	3.26	70 - 127	20	
Trichlorofluoromethane	20.0	21.0	105	20.0	21.1	106	0.598	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	23.5	118	1.49	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	103	72 - 119	PASS
Dibromofluoromethane	103	101	85 - 115	PASS
4-Bromofluorobenzene	109	102	76 - 119	PASS
Toluene-d8	105	102	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5272001
Report generated: 07/25/2017 15:29

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS11
Analyst: FJB
Workgroup: WG609769

Tune ID: WG609769-01
Run Date: 04/11/2017
Run Time: 17:59
File ID: 11M17454
Cal ID: HPMS11 - 11-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.4	6289	PASS
75.0	95.0	30.0	60.0	45.9	14147	PASS
95.0	95.0	100	100	100	30826	PASS
96.0	95.0	5.00	9.00	7.42	2288	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	86.3	26595	PASS
175	174	5.00	9.00	7.08	1884	PASS
176	174	95.0	101	98.2	26124	PASS
177	176	5.00	9.00	6.96	1818	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609769-02	STD	01	04/11/2017 18:52	
WG609769-03	STD	01	04/11/2017 19:20	
WG609769-04	STD	01	04/11/2017 19:50	
WG609769-05	STD-CCV	01	04/11/2017 20:20	
WG609769-06	STD	01	04/11/2017 20:49	
WG609769-07	STD	01	04/11/2017 21:18	
WG609769-08	STD	01	04/11/2017 21:47	
WG609769-09	STD	01	04/11/2017 22:17	
WG609769-10	SSCV	01	04/11/2017 23:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS11
Analyst: JDS
Workgroup: WG611320

Tune ID: WG611320-01
Run Date: 04/24/2017
Run Time: 16:08
File ID: 11M17705
Cal ID: HPMS11 - 24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.2	9137	PASS
75.0	95.0	30.0	60.0	46.5	20047	PASS
95.0	95.0	100	100	100	43125	PASS
96.0	95.0	5.00	9.00	6.77	2920	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	85.4	36834	PASS
175	174	5.00	9.00	8.08	2976	PASS
176	174	95.0	101	95.7	35256	PASS
177	176	5.00	9.00	6.83	2409	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611320-02	STD	01	04/24/2017 17:01	
WG611320-03	STD	01	04/24/2017 17:30	
WG611320-04	STD	01	04/24/2017 17:59	
WG611320-05	STD	01	04/24/2017 18:29	
WG611320-06	STD	01	04/24/2017 18:58	
WG611320-07	STD	01	04/24/2017 19:27	
WG611320-08	STD-CCV	01	04/24/2017 19:57	
WG611320-09	STD	01	04/24/2017 20:27	
WG611320-10	STD	01	04/24/2017 20:56	
WG611320-11	STD	01	04/24/2017 21:26	
WG611320-12	SSCV	01	04/24/2017 22:26	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS11
Analyst: TMB
Workgroup: WG612121

Tune ID: WG612121-01
Run Date: 04/29/2017
Run Time: 17:57
File ID: 11M17867
Cal ID: HPMS11-24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.6	4932	PASS
75.0	95.0	30.0	60.0	47.7	10389	PASS
95.0	95.0	100	100	100	21797	PASS
96.0	95.0	5.00	9.00	7.06	1539	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	87.4	19054	PASS
175	174	5.00	9.00	7.62	1451	PASS
176	174	95.0	101	97.9	18648	PASS
177	176	5.00	9.00	5.91	1102	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612121-02	CCV	01	04/29/2017 18:53	
WG612123-01	BLANK	01	04/29/2017 19:55	
WG612123-02	LCS	01	04/29/2017 20:24	
L17041209-08	LTM-TB5-LS-25	01	04/29/2017 23:18	
L17041209-09	EB1-LS-25	01	04/29/2017 23:48	
L17041209-01	MW-209B-LS-25	01	04/30/2017 02:14	
L17041209-02	MW-209A-LS-25	01	04/30/2017 02:43	
L17041209-03	MW-273-LS-25	01	04/30/2017 03:13	
L17041209-04	MW-219-LS-25	01	04/30/2017 03:42	
L17041209-05	MW-269-LS-25	01	04/30/2017 04:11	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS17
Analyst: FJB
Workgroup: WG611454

Tune ID: WG611454-01
Run Date: 04/25/2017
Run Time: 20:07
File ID: 17M0273002
Cal ID: HPMS17 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	4824	PASS
75.0	95.0	30.0	60.0	48.1	14022	PASS
95.0	95.0	100	100	100	29152	PASS
96.0	95.0	5.00	9.00	6.70	1953	PASS
173	174	0	2.00	0.808	223	PASS
174	95.0	50.0	100	94.7	27600	PASS
175	174	5.00	9.00	7.26	2004	PASS
176	174	95.0	101	98.5	27192	PASS
177	176	5.00	9.00	6.67	1814	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611454-02	STD	01	04/25/2017 20:45	
WG611454-03	STD	01	04/25/2017 21:05	
WG611454-04	STD	01	04/25/2017 21:24	
WG611454-05	STD	01	04/25/2017 21:56	
WG611454-06	STD	01	04/25/2017 22:15	
WG611454-07	STD	01	04/25/2017 22:46	
WG611454-08	STD-CCV	01	04/25/2017 23:06	
WG611454-09	STD	01	04/25/2017 23:38	
WG611454-10	STD	01	04/25/2017 23:58	
WG611454-11	STD	01	04/26/2017 00:33	
WG611454-12	SSCV	01	04/26/2017 01:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612141

Tune ID: WG612141-01
Run Date: 04/30/2017
Run Time: 14:35
File ID: 17M0273172
Cal ID: HPMS17-26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	5657	PASS
75.0	95.0	30.0	60.0	47.2	16166	PASS
95.0	95.0	100	100	100	34232	PASS
96.0	95.0	5.00	9.00	6.26	2144	PASS
173	174	0	2.00	1.19	398	PASS
174	95.0	50.0	100	97.5	33387	PASS
175	174	5.00	9.00	7.24	2416	PASS
176	174	95.0	101	95.5	31880	PASS
177	176	5.00	9.00	7.03	2241	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612141-02	CCV	01	04/30/2017 14:54	
WG612142-01	BLANK	01	04/30/2017 15:48	
WG612142-02	LCS	01	04/30/2017 16:07	
L17041209-07	PMW101-02A-LS-25-RE	DL01	05/01/2017 00:10	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041209
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612249

Tune ID: WG612249-01
Run Date: 05/01/2017
Run Time: 11:49
File ID: 17M0273202
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.1	6087	PASS
75.0	95.0	30.0	60.0	47.7	16978	PASS
95.0	95.0	100	100	100	35584	PASS
96.0	95.0	5.00	9.00	6.38	2270	PASS
173	174	0	2.00	1.19	402	PASS
174	95.0	50.0	100	94.7	33696	PASS
175	174	5.00	9.00	7.25	2442	PASS
176	174	95.0	101	97.3	32781	PASS
177	176	5.00	9.00	6.95	2279	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612249-02	CCV	01	05/01/2017 12:07	
WG612250-01	BLANK	01	05/01/2017 12:49	
WG612250-02	LCS	01	05/01/2017 13:09	
WG612250-03	LCS2	01	05/01/2017 13:29	
L17041209-06	DR2-5-LS-25	DL01	05/01/2017 14:08	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5272003
Report generated 05/02/2017 18:46

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Calibration: Fri Apr 21 13:34:21 2017
Curve: WG609769
Calibration Files

	Compound	5 11M17456.D	20 11M17457.D	50 11M17458.D	100 11M17459.D	200 11M17460.D	300 11M17461.D	400 11M17462.D	500 11M17463.D	Avg	%RSD	R^2 Linear	R^2 Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile		0.040	0.041	0.040	0.043	0.044	0.044	0.043	0.042	4.036		
T	3-Chloro-1-propene	0.535	0.558	0.577	0.545	0.518	0.476	0.416	0.391	0.502	13.493		
T	2-Chloro-1,3-butadiene	0.424	0.462	0.493	0.468	0.458	0.429	0.381	0.363	0.435	10.276		
T	Methacrylonitrile	0.182	0.207	0.216	0.208	0.213	0.208	0.193	0.186	0.202	6.342		
T	Isobutyl Alcohol		0.013	0.014	0.013	0.015	0.016	0.016	0.016	0.014	9.665		
T	1-Butanol				0.005	0.007	0.008	0.008	0.008	0.007	17.196	0.999	
T	Cyclohexanone			0.008	0.008	0.010	0.012	0.012	0.012	0.010	17.429	0.995	
T	2-Nitropropane			0.069	0.071	0.078	0.081	0.078	0.078	0.076	5.966		
T	Ethyl Acetate	0.255	0.278	0.298	0.283	0.286	0.277	0.253	0.241	0.271	7.209		
T	Methyl methacrylate	0.217	0.250	0.274	0.268	0.272	0.260	0.235	0.224	0.250	8.833		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Apr 21 13:35:57 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Calibration: Tue Apr 25 12:03:16 2017
Curve: WG611320
Calibration Files

	Compound	0.3 11M17707.D	0.4 11M17708.D	1 11M17709.D	2 11M17710.D	5 11M17711.D	20 11M17712.D	50 11M17713.D	100 11M17714.D	200 11M17715.D	300 11M17716.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.225	0.241	0.259	0.343	0.345	0.341	0.307	0.289	0.294	16.393	0.995	
P	Chloromethane			0.495	0.414	0.324	0.377	0.232	0.332	0.304	0.287	0.346	23.621	0.991	
C	Vinyl Chloride		0.242	0.181	0.208	0.205	0.220	0.225	0.222	0.213		0.215	8.319		
T	1,3-Butadiene				0.174	0.159	0.117	0.136	0.108	0.102	0.095	0.127	23.629		0.999
T	Bromomethane			0.239	0.253	0.227	0.209	0.201	0.212	0.209		0.222	8.464		
T	Chloroethane			0.189	0.219	0.215	0.235	0.234	0.236	0.227		0.222	7.585		
T	Trichlorofluoromethane		0.321	0.333	0.366	0.380	0.398	0.401	0.412	0.387		0.375	8.718		
T	Diethyl ether			0.262	0.296	0.291	0.287	0.277	0.271		0.258	0.277	5.316		
T	Isoprene		0.325	0.336	0.361	0.390	0.406	0.433	0.443	0.414		0.388	11.286		
T	Acrolein			0.038	0.043	0.046	0.046	0.045	0.047		0.044	0.044	6.542		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.178	0.210	0.221	0.233	0.234	0.242	0.235		0.222	9.849		
T	Acetone				0.084	0.082	0.087	0.081	0.085	0.085	0.082	0.084	2.520		
C	1,1-Dichloroethene		0.472	0.398	0.434	0.440	0.458	0.470	0.468	0.432		0.446	5.694		
T	Tert-Butyl Alcohol			0.027	0.031	0.032	0.032	0.030	0.031		0.036	0.031	8.078		
T	Dimethyl Sulfide		0.358	0.301	0.361	0.353	0.370	0.363	0.362	0.338		0.351	6.285		
T	Iodomethane				0.123	0.199	0.299	0.331	0.332	0.316	0.299	0.271	29.385	0.998	
T	Methyl acetate				0.259	0.265	0.274	0.265	0.266	0.252		0.264	2.746		
T	Methylene Chloride		0.342	0.277	0.304	0.291	0.297	0.298	0.295	0.279		0.298	6.766		
T	Carbon Disulfide			0.793	0.758	0.774	0.787	0.805	0.770	0.656		0.763	6.538		
T	Acrylonitrile			0.104	0.121	0.121	0.127	0.126	0.128		0.136	0.123	8.087		
T	Methyl Tert Butyl Ether		0.685	0.707	0.776	0.774	0.784	0.782	0.759	0.701		0.746	5.501		
T	trans-1,2-Dichloroethene		0.297	0.266	0.257	0.264	0.276	0.274	0.278	0.262		0.272	4.677		
T	n-Hexane				0.347	0.401	0.418	0.458	0.466	0.438		0.421	10.370		
T	Diisopropyl ether			1.126	1.244	1.208	1.159	1.088	0.954		0.827	1.086	13.603		
T	Vinyl Acetate				0.536	0.487	0.505	0.520	0.563	0.492	0.447	0.507	7.407		
P	1,1-Dichloroethane		0.594	0.561	0.582	0.585	0.589	0.584	0.572	0.514		0.573	4.533		
T	Ethyl-Tert-Butyl ether			0.975	1.085	1.052	1.021	0.960	0.863		0.767	0.960	11.616		
T	2-Butanone				0.126	0.134	0.143	0.138	0.139	0.138	0.138	0.137	3.758		
T	Propionitrile			0.040	0.046	0.046	0.047	0.046	0.047		0.048	0.046	6.042		
T	2,2-Dichloropropane		0.459	0.375	0.385	0.384	0.387	0.381	0.378	0.352		0.388	7.945		
T	cis-1,2-Dichloroethene		0.334	0.249	0.303	0.304	0.317	0.318	0.316	0.298		0.305	8.359		
C	Chloroform	0.665	0.682	0.517	0.510	0.488	0.493	0.482	0.476	0.431		0.527	16.402	0.997	
T	1-Bromopropane			0.027	0.056	0.052	0.058	0.061	0.062	0.061	0.061	0.055	21.722	1.000	
T	Bromochloromethane		0.173	0.179	0.182	0.187	0.195	0.196	0.196	0.189	0.185	0.187	4.391		
T	Tetrahydrofuran			0.146	0.112	0.108	0.108	0.103	0.101		0.100	0.111	14.263		
S	Dibromofluoromethane					0.257	0.229	0.252	0.259	0.242		0.248	4.980		
T	1,1,1-Trichloroethane		0.394	0.361	0.391	0.404	0.424	0.433	0.438	0.408	0.383	0.404	6.212		
T	Cyclohexane		0.585	0.510	0.544	0.580	0.594	0.618	0.610	0.554	0.515	0.568	6.920		
T	1,1-Dichloropropene		0.344	0.338	0.342	0.358	0.369	0.372	0.382	0.349	0.330	0.354	4.923		
T	Carbon Tetrachloride		0.316	0.304	0.313	0.355	0.374	0.380	0.388	0.366	0.346	0.349	8.985		
T	Tert-Amyl-Methyl ether			0.768	0.866	0.838	0.818	0.777	0.710		0.645	0.775	9.920		
S	1,2-Dichloroethane-d4					0.301	0.268	0.294	0.296	0.277		0.287	4.837		
T	1,2-Dichloroethane		0.409	0.397	0.397	0.403	0.416	0.406	0.397	0.361	0.332	0.391	6.899		
T	Benzene		1.312	1.116	1.145	1.151	1.142	1.088	1.000	0.817		1.096	12.984		
T	Trichloroethene		0.335	0.257	0.270	0.285	0.298	0.298	0.297	0.281	0.265	0.287	8.100		
T	Methylcyclohexane		0.413	0.366	0.433	0.447	0.458	0.486	0.488	0.449	0.426	0.441	8.533		
C	1,2-Dichloropropane		0.370	0.341	0.343	0.335	0.344	0.352	0.351	0.327	0.309	0.341	4.980		
T	1,4-Dioxane					0.003	0.003	0.003	0.003		0.004	0.003	12.331		
T	Bromodichloromethane		0.381	0.322	0.344	0.346	0.369	0.379	0.376	0.354	0.333	0.356	6.019		
T	Dibromomethane		0.147	0.135	0.157	0.170	0.171	0.171	0.172	0.167	0.162	0.161	8.034		
T	2-Chloroethyl Vinyl Ether			0.168	0.160	0.168	0.198	0.200	0.204	0.198	0.196	0.186	9.586		
T	4-Methyl-2-Pentanone					0.099	0.124	0.118	0.124	0.127	0.128	0.120	9.057		
T	cis-1,3-Dichloropropene		0.417	0.396	0.403	0.427	0.460	0.463	0.452	0.408	0.374	0.422	7.288		
T	Dimethyl Disulfide					0.220	0.260	0.274	0.286	0.278		0.264	9.922		

I	Chlorobenzene-d5	ISTD											
S	Toluene-d8					1.412	1.270	1.362	1.305	1.142		1.298	7.909
C	Toluene		1.926	1.529	1.603	1.659	1.669	1.560	1.385			1.619	10.245
T	Ethyl Methacrylate			0.349	0.396	0.426	0.488	0.492	0.493	0.473	0.442	0.445	11.806
T	trans-1,3-Dichloropropene			0.442	0.476	0.532	0.563	0.571	0.546	0.503	0.455	0.511	9.689
T	1,1,2-Trichloroethane		0.333	0.328	0.331	0.359	0.369	0.352	0.347	0.335	0.317	0.341	4.855
T	2-Hexanone					0.269	0.291	0.289	0.286	0.289	0.279	0.284	3.043
T	1,3-Dichloropropane		0.565	0.585	0.597	0.600	0.610	0.593	0.564	0.519	0.470	0.567	8.020
T	Tetrachloroethene		0.299	0.263	0.310	0.330	0.344	0.349	0.347	0.334	0.316	0.321	8.642
T	Dibromochloromethane		0.307	0.325	0.361	0.386	0.409	0.420	0.423	0.408	0.386	0.381	10.945
T	1,2-Dibromoethane		0.275	0.268	0.311	0.312	0.325	0.326	0.322	0.320	0.304	0.307	7.007
T	1-Chlorohexane		0.445	0.355	0.419	0.460	0.482	0.518	0.524	0.490	0.457	0.461	11.299
P	Chlorobenzene		1.157	1.038	1.095	1.075	1.077	1.033	0.955	0.805		1.029	10.431
T	1,1,1,2-Tetrachloroethane		0.378	0.343	0.368	0.382	0.405	0.412	0.406	0.388	0.368	0.383	5.842
C	Ethylbenzene			0.492	0.524	0.571	0.588	0.588	0.578	0.532	0.483	0.544	7.832
T	m-,p-Xylene		0.719	0.649	0.671	0.697	0.698	0.670	0.610	0.495		0.651	10.950
T	o-Xylene		0.687	0.601	0.672	0.680	0.706	0.699	0.683	0.622	0.557	0.656	7.778
T	Styrene		0.901	0.859	0.948	1.030	1.135	1.132	1.072	0.903	0.773	0.973	13.004
P	Bromoform			0.222	0.213	0.242	0.285	0.295	0.304	0.315	0.305	0.273	14.879
T	Isopropylbenzene		1.842	1.560	1.650	1.704	1.753	1.647	1.478	1.173		1.601	12.852
I	1,4-Dichlorobenzene-d4	ISTD											
P	1,1,2,2-Tetrachloroethane		0.808	0.773	0.818	0.827	0.835	0.803	0.814	0.729	0.667	0.786	7.026
S	p-Bromofluorobenzene					0.890	0.798	0.908	0.908	0.840		0.869	5.541
T	1,2,3-Trichloropropane			0.185	0.209	0.238	0.253	0.236	0.234	0.227	0.219	0.225	9.257
T	trans-1,4-Dichloro-2-Butene			0.236	0.218	0.234	0.255	0.244	0.257	0.254	0.249	0.243	5.473
T	n-Propylbenzene		3.575	3.273	3.510	3.794	3.868	3.517	2.991			3.504	8.551
T	Bromobenzene	0.829	0.796	0.865	0.891	0.919	0.922	0.905	0.893	0.801	0.706	0.853	8.108
T	1,3,5-Trimethylbenzene		2.411	2.306	2.337	2.716	2.735	2.576	2.322	1.774		2.397	12.751
T	2-Chlorotoluene		2.679	2.417	2.352	2.522	2.434	2.234	2.016			2.379	8.890
T	4-Chlorotoluene		2.400	2.121	2.214	2.375	2.358	2.214	1.987	1.509		2.147	13.668
T	a-Methylstyrene					1.290	1.457	1.486	1.456	1.213	1.025	1.321	13.707
T	tert-Butylbenzene		0.608	0.565	0.561	0.572	0.633	0.611	0.616	0.562	0.516	0.583	6.319
T	1,2,4-Trimethylbenzene			2.433	2.666	2.833	2.840	2.639	2.359	1.780		2.507	14.712
T	sec-Butylbenzene			2.952	3.108	3.409	3.466	3.229	2.831			3.166	7.921
T	p-Isopropyltoluene			2.364	2.500	2.883	2.926	2.806	2.479	1.849		2.544	14.812
T	1,3-Dichlorobenzene		1.711	1.464	1.547	1.683	1.678	1.651	1.563	1.279	1.075	1.517	14.111
T	1,4-Dichlorobenzene		1.926	1.665	1.672	1.648	1.690	1.631	1.552	1.266		1.631	11.187
T	n-Butylbenzene			2.082	2.167	2.365	2.624	2.563	2.334	1.748		2.269	13.252
T	1,2-Dichlorobenzene	1.619	1.678	1.497	1.650	1.690	1.672	1.628	1.543	1.259	1.072	1.531	13.502
T	1,2-Dibromo-3-Chloropropane			0.097	0.124	0.136	0.141	0.146	0.150	0.150	0.159	0.138	14.080
T	1,2,4-Trichlorobenzene		1.009	0.969	1.058	1.142	1.234	1.251	1.225	1.068	0.934	1.099	10.858
T	Hexachlorobutadiene		0.499	0.481	0.533	0.569	0.622	0.632	0.675	0.630	0.605	0.583	11.387
T	Naphthalene		2.456	2.459	2.474	2.603	2.846	2.645	2.323	1.801		2.451	12.488
T	1,2,3-Trichlorobenzene	1.338	1.022	1.038	1.089	1.131	1.218	1.208	1.199	1.066	0.934	1.124	10.516

Thu Apr 27 12:49:03 2017

Response Factor Report HPMS17

Method Path : D:\MassHunter\GCMS\1\methods\
Method File : 826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017
Response Via : Initial Calibration
Curve: WG611454
Calibration Files
0.3 =17M0273004.D 0.4 =17M0273005.D 1 =17M0273006.D 2 =17M0273007.D 5 =17M0273008.D 20 =17M0273009.D
50 =17M0273010.D 100 =17M0273011.D 200 =17M0273012.D 300 =17M0273013.D

		Compound	0.3	0.4	1	2	5	20	50	100	200	300	Avg	%RSD	Linear	
1)	I	Fluorobenzene	----------	----------	ISTD	----------	----------	----------	----------	----------	----------	----------				
2)	T	Dichlorodifluo...			0.260	0.246	0.267	0.322	0.327	0.324	0.332		0.297	12.54		
3)	P	Chloromethane			0.289	0.283	0.279	0.292	0.288	0.306	0.297		0.291	3.11		
4)	C	Vinyl Chloride		0.334	0.306	0.292	0.311	0.331	0.329	0.335	0.334		0.322	5.07#		
5)	T	1,3-Butadiene			0.188	0.192	0.198	0.198	0.204	0.199	0.203		0.198	2.87		
6)	T	Bromomethane			0.262	0.263	0.258	0.240	0.222	0.218	0.212		0.239	9.17		
7)	T	Chloroethane			0.168	0.160	0.171	0.175	0.136	0.132	0.126		0.153	13.55		
8)	T	Trichlorofluor...		0.447	0.424	0.402	0.439	0.444	0.443	0.377	0.326		0.413	10.36		
9)	T	Diethyl ether			0.196	0.198	0.197	0.204	0.205	0.200		0.193	0.199	2.16		
10)	C	1,1-Dichloroet...		0.404	0.386	0.364	0.383	0.390	0.388	0.395	0.380		0.386	3.03#		
11)	T	Carbon Disulfide		0.890	0.818	0.756	0.827	0.821	0.852	0.833	0.834		0.829	4.51		
12)	T	1,1,2-Trichlor...		0.257	0.242	0.225	0.254	0.248	0.254	0.246	0.244		0.246	4.10		
13)	T	Iodomethane				0.121	0.187	0.272	0.364	0.380	0.394		0.286	39.36	0.996	
14)	T	Acrolein			0.024	0.023	0.025	0.025	0.026	0.025		0.024	0.025	4.79		
15)	T	Methylene Chlo...		0.339	0.301	0.285	0.291	0.285	0.280	0.286	0.277		0.293	6.85		
16)	T	Acetone					0.061	0.052	0.049	0.049	0.047	0.045	0.050	11.07		
17)	T	trans-1,2-Dich...		0.268	0.253	0.255	0.262	0.264	0.265	0.272	0.266		0.263	2.40		
18)	T	Methyl acetate		0.108	0.123	0.115	0.131	0.144	0.154	0.148			0.132	13.21		
19)	T	Methyl Tert Bu...		0.648	0.647	0.641	0.679	0.672	0.688	0.695	0.668		0.667	3.02		
20)	P	1,1-Dichloroet...		0.467	0.456	0.453	0.480	0.480	0.477	0.489	0.477		0.472	2.64		
21)	T	Acrylonitrile			0.060	0.062	0.064	0.065	0.067	0.066		0.065	0.064	3.92		
22)	T	Vinyl Acetate					0.040	0.040	0.045	0.041	0.045		0.042	5.97		
23)	T	cis-1,2-Dichlo...		0.300	0.282	0.289	0.302	0.297	0.299	0.308	0.303		0.298	2.74		
24)	T	2,2-Dichloropr...		0.198	0.267	0.290	0.328	0.352	0.378	0.381	0.374		0.321	20.34	1.000	
25)	T	Cyclohexane		0.391	0.387	0.372	0.406	0.398	0.421	0.412	0.427		0.402	4.54		
26)	T	Bromochloromet...			0.167	0.179	0.195	0.196	0.200	0.205	0.201		0.192	7.24		
27)	C	Chloroform	0.476	0.514	0.492	0.492	0.499	0.489	0.489	0.499	0.482		0.492	2.21#		
28)	T	Carbon Tetrach...		0.361	0.362	0.363	0.396	0.400	0.407	0.415	0.411		0.389	6.02		
29)	S	Dibromofluorom...					0.275	0.249	0.278	0.278	0.271		0.270	4.54		
30)	T	1,1,1-Trichlor...		0.429	0.422	0.414	0.435	0.440	0.438	0.448	0.437		0.433	2.51		
31)	T	1,1-Dichloropr...		0.347	0.327	0.312	0.336	0.340	0.352	0.352	0.352		0.340	4.22		
32)	T	2-Butanone					0.076	0.070	0.076	0.076	0.075	0.076	0.075	3.44		
33)	T	Benzene		1.142	1.045	1.024	1.062	1.054	1.058	1.085	1.050		1.065	3.34		
34)	S	1,2-Dichloroet...					0.270	0.237	0.260	0.255	0.243		0.253	5.23		
35)	T	1,2-Dichloroet...		0.343	0.317	0.322	0.341	0.332	0.333	0.336	0.328		0.332	2.70		
36)	T	Methylcyclohexane	0.445	0.432	0.414	0.377	0.420	0.401	0.438	0.416	0.444		0.421	5.28		
37)	T	Trichloroethene		0.341	0.312	0.307	0.316	0.316	0.318	0.327	0.321		0.320	3.24		

38)	T	Dibromomethane		0.152	0.152	0.157	0.169	0.164	0.168	0.172	0.170		0.163	5.00
39)	C	1,2-Dichloropr...		0.266	0.267	0.269	0.285	0.281	0.285	0.293	0.287		0.279	3.71#
40)	T	Bromodichlorom...		0.366	0.349	0.359	0.373	0.376	0.381	0.394	0.384		0.373	3.87
41)	T	1,4-Dioxane				0.001	0.001	0.001	0.001	0.002		0.002	0.001	14.84
42)	T	2-Chloroethyl ...					0.105	0.117	0.128	0.134	0.137	0.139	0.127	10.41
43)	T	cis-1,3-Dichlo...		0.377	0.382	0.390	0.424	0.429	0.445	0.456	0.457		0.420	7.82
44)	T	4-Methyl-2-Pen...					0.067	0.065	0.070	0.070	0.073	0.071	0.069	4.03
45)	T	trans-1,3-Dich...			0.304	0.322	0.360	0.366	0.379	0.384	0.385		0.357	8.95
46)	I	Chlorobenzene-d5	----------				ISTD							
47)	S	Toluene-d8					1.299	1.170	1.283	1.272	1.214		1.248	4.33
48)	C	Toluene		1.663	1.512	1.548	1.591	1.582	1.580	1.566	1.498		1.567	3.27#
49)	T	Tetrachloroethene		0.485	0.430	0.434	0.456	0.441	0.450	0.442	0.439		0.447	3.89
50)	T	1,1,2-Trichlor...		0.311	0.288	0.309	0.315	0.305	0.307	0.303	0.291		0.304	3.07
51)	T	Dibromochlorom...		0.416	0.367	0.402	0.421	0.423	0.432	0.434	0.423		0.415	5.22
52)	T	1,3-Dichloropr...		0.483	0.456	0.486	0.499	0.493	0.490	0.487	0.468		0.483	2.88
53)	T	1,2-Dibromoethane		0.321	0.294	0.307	0.317	0.312	0.319	0.314	0.305		0.311	2.90
54)	T	2-Hexanone				0.148	0.167	0.155	0.162	0.160	0.161	0.165	0.160	3.98
55)	P	Chlorobenzene		1.094	1.016	1.032	1.053	1.049	1.059	1.062	1.047		1.052	2.18
56)	T	1-Chlorohexane			0.079	0.083	0.085	0.082	0.090	0.086	0.090		0.085	4.55
57)	C	Ethylbenzene		0.559	0.502	0.540	0.551	0.549	0.559	0.558	0.562		0.547	3.65#
58)	T	1,1,1,2-Tetrac...		0.410	0.381	0.411	0.416	0.413	0.415	0.418	0.411		0.409	2.94
59)	T	m-,p-Xylene		0.674	0.615	0.631	0.668	0.663	0.683	0.683	0.669		0.661	3.73
60)	T	o-Xylene		0.641	0.608	0.642	0.657	0.652	0.667	0.667	0.673		0.651	3.22
61)	T	Styrene		0.997	0.921	0.974	1.039	1.066	1.104	1.114	1.118		1.042	6.95
62)	P	Bromoform		0.266	0.242	0.266	0.297	0.299	0.320	0.317	0.326		0.292	10.42
63)	T	Isopropylbenzene		1.730	1.595	1.609	1.721	1.707	1.728	1.702	1.688		1.685	3.16
64)	I	1,4-Dichlorobenzen...	----------				ISTD							
65)	T	1,3,5-Trimethy...		2.872	2.652	2.732	2.866	2.834	2.818	2.719	2.803		2.787	2.80
66)	S	p-Bromofluorob...					0.760	0.784	0.849	0.859	0.933		0.837	8.16
67)	T	Bromobenzene	1.037	1.017	0.926	0.992	0.982	0.980	0.965	0.942	1.010		0.983	3.63
68)	T	n-Propylbenzene		3.922	3.496	3.615	3.790	3.761	3.731	3.532	3.687		3.692	3.82
69)	P	1,1,2,2-Tetrac...		0.626	0.622	0.654	0.713	0.686	0.713	0.660	0.705		0.672	5.56
70)	T	2-Chlorotoluene		2.386	2.198	2.292	2.324	2.292	2.254	2.170	2.314		2.279	3.06
71)	T	1,2,3-Trichlor...			0.187	0.210	0.205	0.199	0.200	0.191	0.200		0.199	3.97
72)	T	trans-1,4-Dich...				0.117	0.137	0.162	0.163	0.151	0.160		0.148	12.16
73)	T	1,2,4-Trimethy...		2.943	2.640	2.798	2.903	2.859	2.845	2.747	2.748		2.810	3.47
74)	T	4-Chlorotoluene		2.343	2.198	2.273	2.309	2.286	2.278	2.179	2.332		2.275	2.59
75)	T	tert-Butylbenzene		0.586	0.535	0.564	0.572	0.558	0.549	0.530	0.561		0.557	3.32
76)	T	sec-Butylbenzene		3.659	3.288	3.403	3.563	3.490	3.493	3.283	3.287		3.433	4.13
77)	T	p-Isopropyltol...		3.074	2.747	2.850	3.010	3.003	3.034	2.869	2.827		2.927	4.03
78)	T	1,3-Dichlorobe...		1.858	1.620	1.702	1.733	1.715	1.724	1.659	1.703		1.714	4.03
79)	T	1,4-Dichlorobe...	1.966	1.849	1.636	1.697	1.726	1.676	1.707	1.646	1.674		1.731	6.25
80)	T	n-Butylbenzene		2.652	2.263	2.273	2.525	2.497	2.628	2.473	2.450		2.470	5.81
81)	T	1,2-Dichlorobe...	1.682	1.851	1.580	1.672	1.685	1.675	1.679	1.623	1.591		1.671	4.72
82)	T	1,2-Dibromo-3-...			0.106	0.124	0.124	0.125	0.133	0.131	0.121		0.123	6.94
83)	T	Hexachlorobuta...		0.813	0.679	0.669	0.716	0.682	0.733	0.684	0.658		0.704	7.14
84)	T	1,2,4-Trichlor...		1.286	1.140	1.150	1.242	1.250	1.332	1.289	1.240		1.241	5.39
85)	T	Naphthalene		2.524	2.180	2.327	2.511	2.473	2.606	2.480	2.261		2.420	6.08
86)	T	1,2,3-Trichlor...	1.286	1.267	1.117	1.171	1.220	1.198	1.264	1.182	1.145		1.206	4.84

(#) = Out of Range

826VMS.M Thu Apr 27 10:23:42 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041209 Run Date: 04/24/2017 Sample ID: WG611320-12
Instrument ID: HPMS11 Run Time: 22:26 Method: 8260B
File ID: 11M17718 Analyst: JDS QC Key: AF40
ICal Workgroup: WG611320 Cal ID: HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.8	ug/L	0.427	4.30	25	
1,2-Dichloropropane	CCC	50.0	48.5	ug/L	0.331	3.00	25	
Chloroform	CCC	50.0	52.4	ug/L	0.473	4.80	25	
Ethylbenzene	CCC	50.0	52.9	ug/L	0.576	5.70	25	
Toluene	CCC	50.0	46.9	ug/L	1.52	6.10	25	
Vinyl Chloride	CCC	50.0	52.2	ug/L	0.224	4.30	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.2	ug/L	0.773	1.60	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.548	4.30	25	
Bromoform	SPCC	50.0	50.1	ug/L	0.273	0.200	25	
Chlorobenzene	SPCC	50.0	48.9	ug/L	1.01	2.20	25	
Chloromethane	SPCC	50.0	64.6	ug/L	0.388	29.2	25	*
1,1,1,2-Tetrachloroethane		50.0	49.5	ug/L	0.379	1.00	25	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.423	4.90	25	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.329	3.70	25	
1,1-Dichloropropene		50.0	50.8	ug/L	0.360	1.70	25	
1,2,3-Trichlorobenzene		50.0	56.9	ug/L	1.28	13.8	25	
1,2,3-Trichloropropane		50.0	49.1	ug/L	0.221	1.80	25	
1,2,4-Trichlorobenzene		50.0	59.0	ug/L	1.30	18.0	25	
1,2,4-Trimethylbenzene		50.0	49.7	ug/L	2.49	0.500	25	
1,2-Dichloroethane		50.0	47.0	ug/L	0.368	5.90	25	
1,2-Dichlorobenzene		50.0	51.8	ug/L	1.58	3.50	25	
1,2-Dibromo-3-Chloropropane		50.0	51.8	ug/L	0.143	3.70	25	
1,2-Dibromoethane		50.0	49.6	ug/L	0.304	0.800	25	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.800	25	
1,3-Dichlorobenzene		50.0	51.7	ug/L	1.57	3.40	25	
1,3-Dichloropropane		50.0	50.3	ug/L	0.571	0.700	25	
1,4-Dichlorobenzene		50.0	48.9	ug/L	1.60	2.20	25	
1-Chlorohexane		50.0	58.4	ug/L	0.539	16.7	25	
2,2-Dichloropropane		50.0	43.2	ug/L	0.335	13.6	25	
2-Hexanone		50.0	54.4	ug/L	0.309	8.80	25	
2-Chlorotoluene		50.0	43.1	ug/L	2.05	13.8	25	
4-Chlorotoluene		50.0	49.8	ug/L	2.14	0.400	25	
Acetone		50.0	48.3	ug/L	0.0807	3.40	25	
Benzene		50.0	48.3	ug/L	1.06	3.40	25	
Bromobenzene		50.0	50.1	ug/L	0.854	0.200	25	
Bromochloromethane		50.0	50.2	ug/L	0.188	0.400	25	
Bromodichloromethane		50.0	49.6	ug/L	0.353	0.800	25	
Bromomethane		50.0	51.1	ug/L	0.226	2.10	25	
Carbon Disulfide		50.0	40.1	ug/L	0.612	19.9	25	
Carbon Tetrachloride		50.0	52.3	ug/L	0.366	4.70	25	
Chloroethane		50.0	59.0	ug/L	0.262	18.0	25	
cis-1,2-Dichloroethene		50.0	50.0	ug/L	0.305	0.100	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5272002
Report generated 07/25/2017 15:30

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041209 Run Date: 04/24/2017 Sample ID: WG611320-12
Instrument ID: HPMS11 Run Time: 22:26 Method: 8260B
File ID: 11M17718 Analyst: JDS QC Key: AF40
ICal Workgroup: WG611320 Cal ID: HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	53.7	ug/L	0.453	7.30	25	
Dibromochloromethane		50.0	50.8	ug/L	0.387	1.70	25	
Dibromomethane		50.0	50.6	ug/L	0.163	1.20	25	
Dichlorodifluoromethane		50.0	63.7	ug/L	0.397	27.3	25	*
Hexachlorobutadiene		50.0	55.0	ug/L	0.642	10.1	25	
Isopropylbenzene		50.0	50.0	ug/L	1.60	0	25	
Methylene Chloride		50.0	46.9	ug/L	0.279	6.20	25	
Methyl Tert Butyl Ether		50.0	50.7	ug/L	0.757	1.40	25	
2-Butanone		50.0	50.4	ug/L	0.138	0.800	25	
4-Methyl-2-Pentanone		50.0	52.8	ug/L	0.127	5.60	25	
n-Butylbenzene		50.0	54.1	ug/L	2.46	8.20	25	
n-Propylbenzene		50.0	45.7	ug/L	3.20	8.60	25	
m-,p-Xylene		100	101	ug/L	0.660	1.30	25	
Naphthalene		50.0	55.9	ug/L	2.74	11.8	25	
o-Xylene		50.0	52.2	ug/L	0.685	4.40	25	
p-Isopropyltoluene		50.0	52.5	ug/L	2.67	4.90	25	
sec-Butylbenzene		50.0	47.6	ug/L	3.01	4.80	25	
Styrene		50.0	57.9	ug/L	1.13	15.8	25	
Trichloroethene		50.0	49.2	ug/L	0.283	1.60	25	
tert-Butylbenzene		50.0	48.8	ug/L	0.569	2.40	25	
Tetrachloroethene		50.0	52.6	ug/L	0.338	5.20	25	
trans-1,2-Dichloroethene		50.0	48.9	ug/L	0.266	2.10	25	
trans-1,3-Dichloropropene		50.0	50.2	ug/L	0.513	0.400	25	
Trichlorofluoromethane		50.0	55.2	ug/L	0.414	10.5	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5272002
Report generated 07/25/2017 15:30

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041209 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.1	ug/L	0.333	13.7	25	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.272	2.70	25	
Chloroform	CCC	50.0	48.9	ug/L	0.481	2.20	25	
Ethylbenzene	CCC	50.0	47.5	ug/L	0.521	4.90	25	
Toluene	CCC	50.0	47.2	ug/L	1.48	5.60	25	
Vinyl Chloride	CCC	50.0	60.9	ug/L	0.392	21.9	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.2	ug/L	0.608	9.70	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.452	4.20	25	
Bromoform	SPCC	50.0	49.0	ug/L	0.286	2.00	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.992	5.70	25	
Chloromethane	SPCC	50.0	59.6	ug/L	0.347	19.2	25	
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.384	6.30	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.432	0.100	25	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.282	7.20	25	
1,1-Dichloropropene		50.0	47.9	ug/L	0.326	4.20	25	
1,2,3-Trichlorobenzene		50.0	45.4	ug/L	1.09	9.20	25	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.183	7.90	25	
1,2,4-Trichlorobenzene		50.0	47.7	ug/L	1.19	4.50	25	
1,2,4-Trimethylbenzene		50.0	45.9	ug/L	2.58	8.10	25	
1,2-Dichloroethane		50.0	47.3	ug/L	0.314	5.40	25	
1,2-Dichlorobenzene		50.0	46.1	ug/L	1.54	7.80	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.116	6.10	25	
1,2-Dibromoethane		50.0	46.5	ug/L	0.289	7.00	25	
1,3,5-Trimethylbenzene		50.0	45.9	ug/L	2.56	8.30	25	
1,3-Dichlorobenzene		50.0	44.6	ug/L	1.53	10.8	25	
1,3-Dichloropropane		50.0	48.4	ug/L	0.467	3.20	25	
1,4-Dichlorobenzene		50.0	45.0	ug/L	1.56	9.90	25	
1-Chlorohexane		50.0	51.7	ug/L	0.0879	3.50	25	
2,2-Dichloropropane		50.0	43.4	ug/L	0.325	13.2	25	
2-Hexanone		50.0	53.8	ug/L	0.172	7.60	25	
2-Chlorotoluene		50.0	44.5	ug/L	2.03	11.0	25	
4-Chlorotoluene		50.0	45.9	ug/L	2.09	8.20	25	
Acetone		50.0	49.5	ug/L	0.0498	0.900	25	
Benzene		50.0	47.5	ug/L	1.01	5.00	25	
Bromobenzene		50.0	45.0	ug/L	0.886	9.90	25	
Bromochloromethane		50.0	49.2	ug/L	0.189	1.50	25	
Bromodichloromethane		50.0	47.9	ug/L	0.357	4.20	25	
Bromomethane		50.0	43.3	ug/L	0.207	13.3	25	
Carbon Disulfide		50.0	43.8	ug/L	0.727	12.3	25	
Carbon Tetrachloride		50.0	49.0	ug/L	0.382	1.90	25	
Chloroethane		50.0	41.7	ug/L	0.127	16.5	25	
cis-1,2-Dichloroethene		50.0	48.4	ug/L	0.288	3.30	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041209 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	51.0	ug/L	0.429	2.10	25	
Dibromochloromethane		50.0	47.4	ug/L	0.393	5.20	25	
Dibromomethane		50.0	48.8	ug/L	0.159	2.40	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.398	34.1	25	*
Hexachlorobutadiene		50.0	43.5	ug/L	0.613	13.0	25	
Isopropylbenzene		50.0	46.8	ug/L	1.58	6.30	25	
Methylene Chloride		50.0	44.4	ug/L	0.260	11.2	25	
Methyl Tert Butyl Ether		50.0	51.4	ug/L	0.687	2.90	25	
2-Butanone		50.0	50.4	ug/L	0.0756	0.800	25	
4-Methyl-2-Pentanone		50.0	51.9	ug/L	0.0721	3.90	25	
n-Butylbenzene		50.0	45.9	ug/L	2.27	8.30	25	
n-Propylbenzene		50.0	44.5	ug/L	3.28	11.1	25	
m-,p-Xylene		100	95.8	ug/L	0.633	4.20	25	
Naphthalene		50.0	47.0	ug/L	2.28	6.00	25	
o-Xylene		50.0	48.1	ug/L	0.627	3.70	25	
p-Isopropyltoluene		50.0	45.9	ug/L	2.69	8.20	25	
sec-Butylbenzene		50.0	44.7	ug/L	3.07	10.5	25	
Styrene		50.0	49.9	ug/L	1.04	0.200	25	
Trichloroethene		50.0	48.3	ug/L	0.309	3.30	25	
tert-Butylbenzene		50.0	44.7	ug/L	0.498	10.6	25	
Tetrachloroethene		50.0	46.6	ug/L	0.417	6.70	25	
trans-1,2-Dichloroethene		50.0	47.0	ug/L	0.247	6.00	25	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.345	3.50	25	
Trichlorofluoromethane		50.0	32.0	ug/L	0.264	36.0	25	*

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5272002
Report generated 07/25/2017 15:30

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612121-02

Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B

File ID: 11M17869 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.5	ug/L	0.434	2.91	20	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.323	5.36	20	
Chloroform	CCC	50.0	48.9	ug/L	0.445	2.24	20	
Ethylbenzene	CCC	50.0	49.6	ug/L	0.540	0.807	20	
Toluene	CCC	50.0	44.5	ug/L	1.44	10.9	20	
Vinyl Chloride	CCC	50.0	54.0	ug/L	0.232	7.97	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.5	ug/L	0.716	8.92	20	
1,1-Dichloroethane	SPCC	50.0	47.5	ug/L	0.545	4.92	20	
Bromoform	SPCC	50.0	47.2	ug/L	0.257	5.67	20	
Chlorobenzene	SPCC	50.0	45.9	ug/L	0.944	8.29	20	
Chloromethane	SPCC	50.0	37.7	ug/L	0.228	24.5	20	*
Xylenes		150	144	ug/L	0.629	4.13	20	
1,1,1,2-Tetrachloroethane		50.0	47.6	ug/L	0.365	4.81	20	
1,1,1-Trichloroethane		50.0	48.8	ug/L	0.394	2.39	20	
1,1,2-Trichloroethane		50.0	45.8	ug/L	0.313	8.49	20	
1,1-Dichloropropene		50.0	48.4	ug/L	0.343	3.18	20	
1,2,3-Trichlorobenzene		50.0	49.6	ug/L	1.11	0.870	20	
1,2,3-Trichloropropane		50.0	44.1	ug/L	0.199	11.8	20	
1,2,4-Trichlorobenzene		50.0	53.6	ug/L	1.18	7.13	20	
1,2,4-Trimethylbenzene		50.0	49.5	ug/L	2.48	1.08	20	
1,2-Dichloroethane		50.0	47.6	ug/L	0.372	4.85	20	
1,2-Dichlorobenzene		50.0	48.7	ug/L	1.49	2.61	20	
1,2-Dibromo-3-Chloropropane		50.0	46.4	ug/L	0.128	7.14	20	
1,2-Dibromoethane		50.0	46.7	ug/L	0.287	6.58	20	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.790	20	
1,3-Dichlorobenzene		50.0	50.6	ug/L	1.54	1.23	20	
1,3-Dichloropropane		50.0	46.0	ug/L	0.521	8.09	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.54	5.30	20	
1-Chlorohexane		50.0	55.5	ug/L	0.512	10.9	20	
2,2-Dichloropropane		50.0	50.6	ug/L	0.392	1.21	20	
2-Hexanone		50.0	45.0	ug/L	0.256	9.91	20	
2-Chlorotoluene		50.0	45.3	ug/L	2.16	9.42	20	
4-Chlorotoluene		50.0	48.4	ug/L	2.08	3.25	20	
Acetone		50.0	42.4	ug/L	0.0709	15.2	20	
Benzene		50.0	45.6	ug/L	1.00	8.74	20	
Bromobenzene		50.0	48.7	ug/L	0.831	2.58	20	
Bromochloromethane		50.0	45.8	ug/L	0.171	8.50	20	
Bromodichloromethane		50.0	48.7	ug/L	0.347	2.61	20	
Bromomethane		50.0	44.6	ug/L	0.198	10.9	20	
Carbon Disulfide		50.0	50.3	ug/L	0.768	0.604	20	
Carbon Tetrachloride		50.0	49.1	ug/L	0.343	1.77	20	
Chloroethane		50.0	47.8	ug/L	0.212	4.43	20	

CCV - Modified 03/05/2008

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 04/29/2017 Sample ID: WG612121-02

Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B

File ID: 11M17869 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	47.3	ug/L	0.288	5.48	20	
cis-1,3-Dichloropropene		50.0	50.8	ug/L	0.429	1.52	20	
Dibromochloromethane		50.0	49.4	ug/L	0.376	1.12	20	
Dibromomethane		50.0	46.8	ug/L	0.151	6.43	20	
Dichlorodifluoromethane		50.0	50.7	ug/L	0.311	1.40	20	
Hexachlorobutadiene		50.0	50.9	ug/L	0.593	1.78	20	
Isopropylbenzene		50.0	48.0	ug/L	1.54	4.05	20	
Methylene Chloride		50.0	45.2	ug/L	0.269	9.69	20	
Methyl Tert Butyl Ether		50.0	46.4	ug/L	0.693	7.11	20	
2-Butanone		50.0	45.7	ug/L	0.125	8.56	20	
4-Methyl-2-Pentanone		50.0	44.1	ug/L	0.106	11.7	20	
n-Butylbenzene		50.0	54.3	ug/L	2.47	8.66	20	
n-Propylbenzene		50.0	48.0	ug/L	3.36	3.99	20	
m-,p-Xylene		100	95.1	ug/L	0.619	4.90	20	
Naphthalene		50.0	48.5	ug/L	2.38	3.07	20	
o-Xylene		50.0	48.7	ug/L	0.639	2.59	20	
p-Isopropyltoluene		50.0	51.5	ug/L	2.62	3.00	20	
sec-Butylbenzene		50.0	47.6	ug/L	3.02	4.74	20	
Styrene		50.0	53.7	ug/L	1.05	7.47	20	
Trichloroethene		50.0	45.5	ug/L	0.262	8.98	20	
tert-Butylbenzene		50.0	46.2	ug/L	0.539	7.52	20	
Tetrachloroethene		50.0	49.1	ug/L	0.316	1.76	20	
trans-1,2-Dichloroethene		50.0	45.8	ug/L	0.249	8.49	20	
trans-1,3-Dichloropropene		50.0	51.2	ug/L	0.523	2.34	20	
Trichlorofluoromethane		50.0	49.7	ug/L	0.372	0.670	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5272004
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612141-02

Instrument ID: HPMS17 Run Time: 14:54 Method: 8260B

File ID: 17M0273173 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612142 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.4	ug/L	0.405	4.80	20	
1,2-Dichloropropane	CCC	50.0	50.5	ug/L	0.282	0.947	20	
Chloroform	CCC	50.0	49.7	ug/L	0.489	0.632	20	
Ethylbenzene	CCC	50.0	50.9	ug/L	0.557	1.74	20	
Toluene	CCC	50.0	50.9	ug/L	1.59	1.72	20	
Vinyl Chloride	CCC	50.0	53.2	ug/L	0.342	6.33	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.4	ug/L	0.665	1.15	20	
1,1-Dichloroethane	SPCC	50.0	52.0	ug/L	0.492	4.10	20	
Bromoform	SPCC	50.0	46.0	ug/L	0.268	8.05	20	
Chlorobenzene	SPCC	50.0	49.0	ug/L	1.03	1.93	20	
Chloromethane	SPCC	50.0	51.4	ug/L	0.299	2.81	20	
Xylenes		150	153	ug/L	0.666	2.01	20	
1,1,1,2-Tetrachloroethane		50.0	47.9	ug/L	0.392	4.18	20	
1,1,1-Trichloroethane		50.0	50.4	ug/L	0.436	0.728	20	
1,1,2-Trichloroethane		50.0	45.8	ug/L	0.279	8.30	20	
1,1-Dichloropropene		50.0	52.0	ug/L	0.353	3.92	20	
1,2,3-Trichlorobenzene		50.0	46.0	ug/L	1.11	7.96	20	
1,2,3-Trichloropropane		50.0	45.1	ug/L	0.179	9.88	20	
1,2,4-Trichlorobenzene		50.0	50.6	ug/L	1.26	1.21	20	
1,2,4-Trimethylbenzene		50.0	52.5	ug/L	2.95	5.08	20	
1,2-Dichloroethane		50.0	47.7	ug/L	0.316	4.63	20	
1,2-Dichlorobenzene		50.0	48.9	ug/L	1.64	2.13	20	
1,2-Dibromo-3-Chloropropane		50.0	48.7	ug/L	0.120	2.53	20	
1,2-Dibromoethane		50.0	45.2	ug/L	0.282	9.54	20	
1,3,5-Trimethylbenzene		50.0	53.0	ug/L	2.95	6.02	20	
1,3-Dichlorobenzene		50.0	51.4	ug/L	1.76	2.90	20	
1,3-Dichloropropane		50.0	47.0	ug/L	0.454	5.94	20	
1,4-Dichlorobenzene		50.0	50.0	ug/L	1.73	0.0310	20	
1-Chlorohexane		50.0	53.6	ug/L	0.0911	7.26	20	
2,2-Dichloropropane		50.0	56.3	ug/L	0.422	12.6	20	
2-Hexanone		50.0	44.3	ug/L	0.141	11.4	20	
2-Chlorotoluene		50.0	52.1	ug/L	2.38	4.26	20	
4-Chlorotoluene		50.0	53.0	ug/L	2.41	5.96	20	
Acetone		50.0	39.2	ug/L	0.0394	21.6	20	*
Benzene		50.0	50.3	ug/L	1.07	0.658	20	
Bromobenzene		50.0	48.3	ug/L	0.949	3.47	20	
Bromochloromethane		50.0	48.8	ug/L	0.187	2.50	20	
Bromodichloromethane		50.0	49.5	ug/L	0.369	1.01	20	
Bromomethane		50.0	40.3	ug/L	0.193	19.4	20	
Carbon Disulfide		50.0	50.8	ug/L	0.842	1.52	20	
Carbon Tetrachloride		50.0	51.1	ug/L	0.398	2.28	20	
Chloroethane		50.0	45.5	ug/L	0.139	9.01	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 04/30/2017 Sample ID: WG612141-02

Instrument ID: HPMS17 Run Time: 14:54 Method: 8260B

File ID: 17M0273173 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612142 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.9	ug/L	0.297	0.148	20	
cis-1,3-Dichloropropene		50.0	52.4	ug/L	0.440	4.77	20	
Dibromochloromethane		50.0	46.8	ug/L	0.388	6.37	20	
Dibromomethane		50.0	46.9	ug/L	0.153	6.19	20	
Dichlorodifluoromethane		50.0	57.4	ug/L	0.341	14.8	20	
Hexachlorobutadiene		50.0	48.4	ug/L	0.681	3.26	20	
Isopropylbenzene		50.0	50.8	ug/L	1.71	1.56	20	
Methylene Chloride		50.0	48.0	ug/L	0.282	3.93	20	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.614	7.92	20	
2-Butanone		50.0	44.6	ug/L	0.0668	10.8	20	
4-Methyl-2-Pentanone		50.0	42.8	ug/L	0.0594	14.4	20	
n-Butylbenzene		50.0	56.7	ug/L	2.80	13.4	20	
n-Propylbenzene		50.0	54.2	ug/L	4.00	8.44	20	
m-,p-Xylene		100	103	ug/L	0.681	3.13	20	
Naphthalene		50.0	44.5	ug/L	2.16	10.9	20	
o-Xylene		50.0	49.9	ug/L	0.650	0.215	20	
p-Isopropyltoluene		50.0	53.2	ug/L	3.12	6.45	20	
sec-Butylbenzene		50.0	52.8	ug/L	3.62	5.53	20	
Styrene		50.0	52.1	ug/L	1.09	4.29	20	
Trichloroethene		50.0	47.3	ug/L	0.303	5.44	20	
tert-Butylbenzene		50.0	50.3	ug/L	0.560	0.534	20	
Tetrachloroethene		50.0	49.4	ug/L	0.442	1.17	20	
trans-1,2-Dichloroethene		50.0	50.8	ug/L	0.267	1.68	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.360	0.817	20	
Trichlorofluoromethane		50.0	54.0	ug/L	0.446	7.95	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 05/01/2017 Sample ID: WG612249-02

Instrument ID: HPMS17 Run Time: 12:07 Method: 8260B

File ID: 17M0273203 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612250 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.2	ug/L	0.396	2.45	20	
1,2-Dichloropropane	CCC	50.0	50.3	ug/L	0.281	0.698	20	
Chloroform	CCC	50.0	49.1	ug/L	0.483	1.88	20	
Ethylbenzene	CCC	50.0	50.6	ug/L	0.554	1.20	20	
Toluene	CCC	50.0	50.3	ug/L	1.58	0.684	20	
Vinyl Chloride	CCC	50.0	51.6	ug/L	0.332	3.18	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.4	ug/L	0.665	1.15	20	
1,1-Dichloroethane	SPCC	50.0	51.3	ug/L	0.485	2.65	20	
Bromoform	SPCC	50.0	47.2	ug/L	0.275	5.63	20	
Chlorobenzene	SPCC	50.0	48.9	ug/L	1.03	2.13	20	
Chloromethane	SPCC	50.0	51.6	ug/L	0.300	3.21	20	
Xylenes		150	152	ug/L	0.661	1.28	20	
1,1,1,2-Tetrachloroethane		50.0	48.2	ug/L	0.395	3.58	20	
1,1,1-Trichloroethane		50.0	49.4	ug/L	0.428	1.11	20	
1,1,2-Trichloroethane		50.0	46.2	ug/L	0.281	7.50	20	
1,1-Dichloropropene		50.0	50.8	ug/L	0.346	1.68	20	
1,2,3-Trichlorobenzene		50.0	45.7	ug/L	1.10	8.65	20	
1,2,3-Trichloropropane		50.0	44.6	ug/L	0.177	10.9	20	
1,2,4-Trichlorobenzene		50.0	49.5	ug/L	1.23	0.963	20	
1,2,4-Trimethylbenzene		50.0	50.7	ug/L	2.85	1.31	20	
1,2-Dichloroethane		50.0	47.6	ug/L	0.315	4.87	20	
1,2-Dichlorobenzene		50.0	48.3	ug/L	1.61	3.46	20	
1,2-Dibromo-3-Chloropropane		50.0	47.9	ug/L	0.118	4.20	20	
1,2-Dibromoethane		50.0	45.3	ug/L	0.282	9.46	20	
1,3,5-Trimethylbenzene		50.0	50.6	ug/L	2.82	1.29	20	
1,3-Dichlorobenzene		50.0	49.9	ug/L	1.71	0.259	20	
1,3-Dichloropropane		50.0	47.5	ug/L	0.459	4.96	20	
1,4-Dichlorobenzene		50.0	48.7	ug/L	1.69	2.51	20	
1-Chlorohexane		50.0	53.7	ug/L	0.0912	7.44	20	
2,2-Dichloropropane		50.0	55.0	ug/L	0.412	9.99	20	
2-Hexanone		50.0	42.3	ug/L	0.135	15.4	20	
2-Chlorotoluene		50.0	49.8	ug/L	2.27	0.394	20	
4-Chlorotoluene		50.0	51.0	ug/L	2.32	1.96	20	
Acetone		50.0	40.7	ug/L	0.0409	18.7	20	
Benzene		50.0	49.5	ug/L	1.05	1.09	20	
Bromobenzene		50.0	47.0	ug/L	0.925	5.93	20	
Bromochloromethane		50.0	48.5	ug/L	0.186	2.94	20	
Bromodichloromethane		50.0	49.0	ug/L	0.366	1.93	20	
Bromomethane		50.0	39.4	ug/L	0.188	21.2	20	*
Carbon Disulfide		50.0	51.2	ug/L	0.848	2.35	20	
Carbon Tetrachloride		50.0	50.5	ug/L	0.393	1.01	20	
Chloroethane		50.0	45.1	ug/L	0.138	9.75	20	

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041209 Run Date: 05/01/2017 Sample ID: WG612249-02

Instrument ID: HPMS17 Run Time: 12:07 Method: 8260B

File ID: 17M0273203 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612250 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.0	ug/L	0.291	2.08	20	
cis-1,3-Dichloropropene		50.0	51.7	ug/L	0.434	3.43	20	
Dibromochloromethane		50.0	47.6	ug/L	0.394	4.89	20	
Dibromomethane		50.0	47.0	ug/L	0.153	6.04	20	
Dichlorodifluoromethane		50.0	55.9	ug/L	0.332	11.7	20	
Hexachlorobutadiene		50.0	46.1	ug/L	0.649	7.89	20	
Isopropylbenzene		50.0	50.1	ug/L	1.69	0.289	20	
Methylene Chloride		50.0	48.4	ug/L	0.284	3.20	20	
Methyl Tert Butyl Ether		50.0	45.9	ug/L	0.612	8.24	20	
2-Butanone		50.0	43.9	ug/L	0.0659	12.1	20	
4-Methyl-2-Pentanone		50.0	42.0	ug/L	0.0582	16.1	20	
n-Butylbenzene		50.0	54.3	ug/L	2.68	8.65	20	
n-Propylbenzene		50.0	51.7	ug/L	3.82	3.49	20	
m-,p-Xylene		100	102	ug/L	0.675	2.21	20	
Naphthalene		50.0	44.5	ug/L	2.16	10.9	20	
o-Xylene		50.0	49.7	ug/L	0.647	0.568	20	
p-Isopropyltoluene		50.0	51.0	ug/L	2.98	1.98	20	
sec-Butylbenzene		50.0	50.5	ug/L	3.47	1.01	20	
Styrene		50.0	51.9	ug/L	1.08	3.90	20	
Trichloroethene		50.0	46.7	ug/L	0.299	6.57	20	
tert-Butylbenzene		50.0	48.0	ug/L	0.534	4.05	20	
Tetrachloroethene		50.0	48.8	ug/L	0.437	2.30	20	
trans-1,2-Dichloroethene		50.0	49.9	ug/L	0.262	0.242	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.360	0.704	20	
Trichlorofluoromethane		50.0	53.8	ug/L	0.444	7.61	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209
Instrument ID: HPMS11
Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	178101	320836	445066
Upper Limit	NA	NA	356202	641672	890132
Lower Limit	NA	NA	89051	160418	222533
L17041209-01	1.00	01	125633	249826	348790
L17041209-02	1.00	01	126271	241401	339744
L17041209-03	1.00	01	129522	245534	344008
L17041209-04	1.00	01	130962	249003	343107
L17041209-05	1.00	01	127759	243016	340015
L17041209-08	1.00	01	127699	249519	353695
L17041209-09	1.00	01	131459	249331	354480
WG612123-01	1.00	01	132987	250807	353206
WG612123-02	1.00	01	143146	255038	355789

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5272006
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209
Instrument ID: HPMS17
Workgroup (AAB#): WG612142

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041209-07	5.00	DL01	122347	252121	343757
WG612142-01	1.00	01	124070	260834	354974
WG612142-02	1.00	01	135161	264980	358784

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5272006
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209
Instrument ID: HPMS17
Workgroup (AAB#): WG612250

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041209-06	50.0	DL01	115237	254958	352723
WG612250-01	1.00	01	119647	252656	343255
WG612250-02	1.00	01	132028	263010	354875
WG612250-03	1.00	01	129780	258540	346601

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5272006
Report generated 05/02/2017 18:46

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209

Instrument ID: HPMS11

Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08

CAL ID: HPMS11-24-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	16.96	14.14	10.53
Upper Limit	NA	NA	17.46	14.64	11.03
Lower Limit	NA	NA	16.46	13.64	10.03
L17041209-01	1.00	01	16.96	14.14	10.52
L17041209-02	1.00	01	16.96	14.14	10.53
L17041209-03	1.00	01	16.96	14.14	10.53
L17041209-04	1.00	01	16.96	14.14	10.53
L17041209-05	1.00	01	16.96	14.14	10.53
L17041209-08	1.00	01	16.96	14.14	10.53
L17041209-09	1.00	01	16.96	14.14	10.52
WG612123-01	1.00	01	16.96	14.14	10.53
WG612123-02	1.00	01	16.96	14.14	10.52

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5272008

Report generated: 05/02/2017 18:46

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209
Instrument ID: HPMS17
Workgroup (AAB#): WG612142

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041209-07	5.00	DL01	9.36	8.05	5.28
WG612142-01	1.00	01	9.36	8.05	5.27
WG612142-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5272008
Report generated: 05/02/2017 18:46

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041209
Instrument ID: HPMS17
Workgroup (AAB#): WG612250

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041209-06	50.0	DL01	9.36	8.05	5.28
WG612250-01	1.00	01	9.36	8.05	5.27
WG612250-02	1.00	01	9.36	8.05	5.28
WG612250-03	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5272008
Report generated: 05/02/2017 18:46

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17884.D Vial: 16
Acq On : 30 Apr 2017 2:14 Operator: TMB
Sample : L17041209-01 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

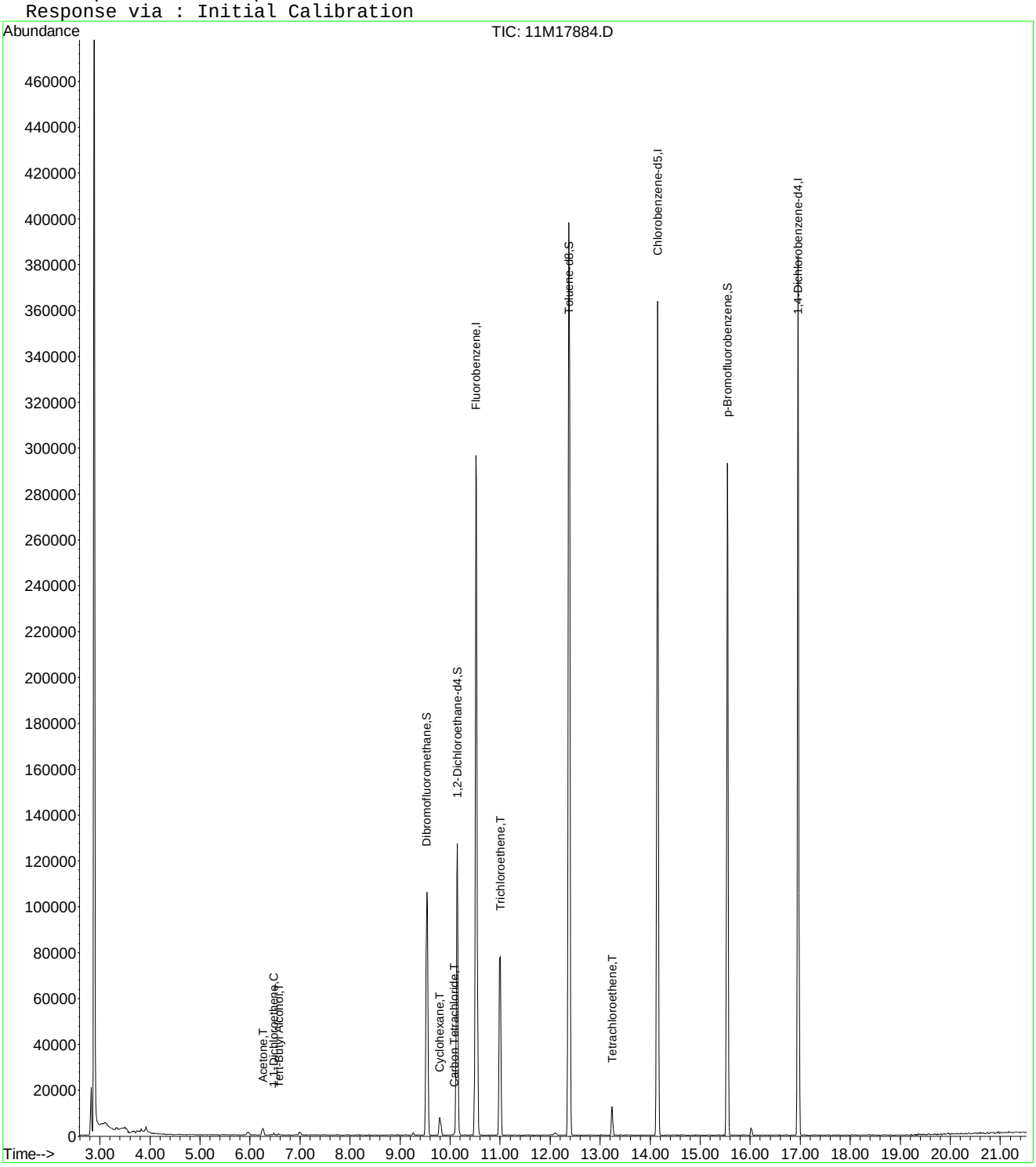
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	348790	25.00 ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	249826	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	125633	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	87589	25.3525 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.40%		
43) 1,2-Dichloroethane-d4	10.14	65	103700	25.8652 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.48%		
57) Toluene-d8	12.38	98	340630	26.2586 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.04%		
78) p-Bromofluorobenzene	15.54	95	120378	27.5674 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.28%		
Target Compounds					Qvalue
3) Chloromethane	3.65	50	414	Below Cal #	40
13) Acetone	6.26	43	6178	5.2975 ug/L	92
14) 1,1-Dichloroethene	6.47	61	1022	0.1641 ug/L #	50
15) Tert-Butyl Alcohol	6.58	59	471	1.0798 ug/L #	60
39) Cyclohexane	9.79	56	6993	0.8828 ug/L	92
41) Carbon Tetrachloride	10.08	117	1004	0.2060 ug/L #	71
46) Trichloroethene	11.00	130	34847	8.6912 ug/L	98
64) Tetrachloroethene	13.25	164	4168	1.2981 ug/L	91

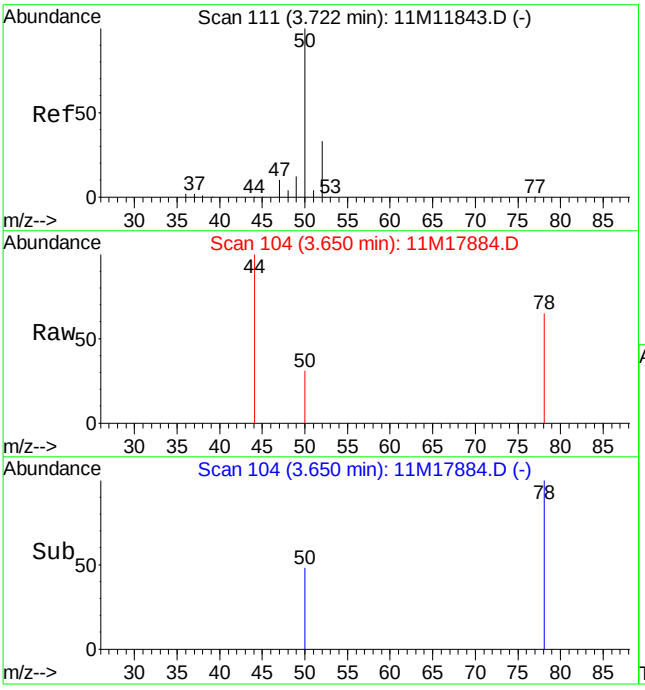
(#) = qualifier out of range (m) = manual integration
11M17884.D 8260WT.M Sun Apr 30 12:52:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17884.D Vial: 16
Acq On : 30 Apr 2017 2:14 Operator: TMB
Sample : L17041209-01 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

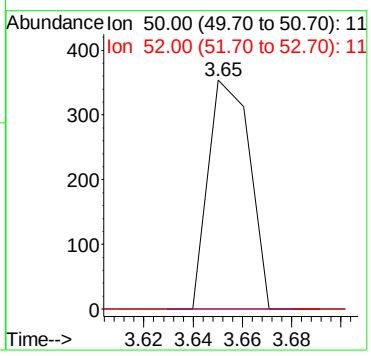


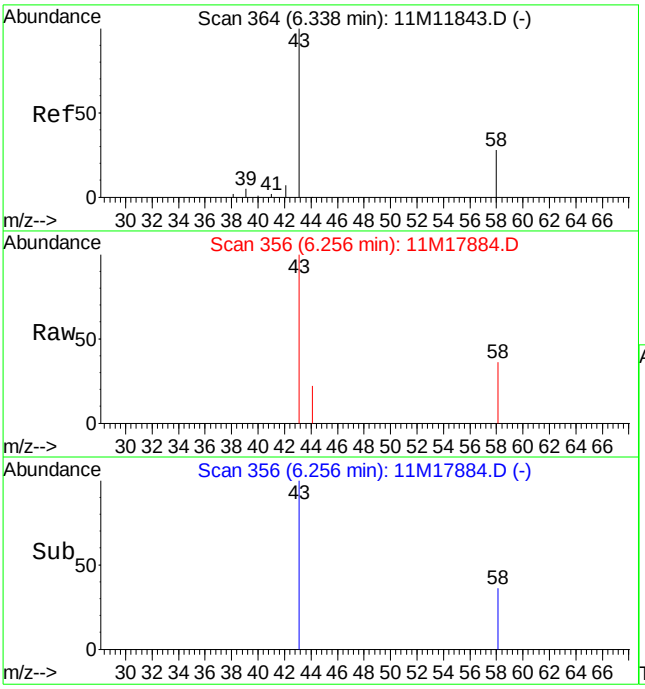


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion: 50 Resp: 414

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

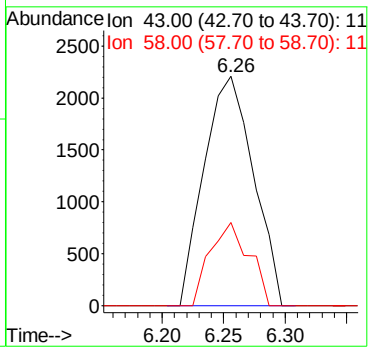


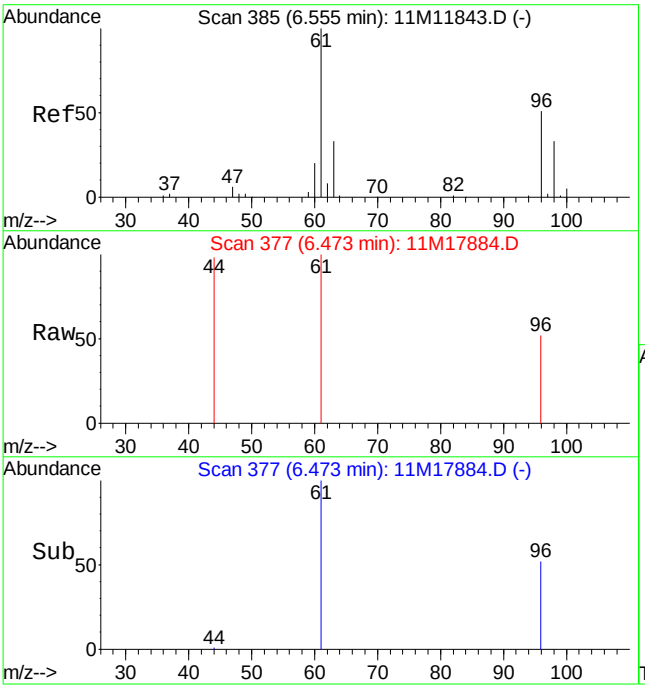


#13
Acetone
Concen: 5.30 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion: 43 Resp: 6178

Ion	Ratio	Lower	Upper
43	100		
58	28.7	20.1	46.9

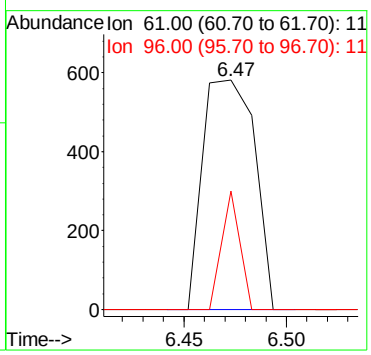


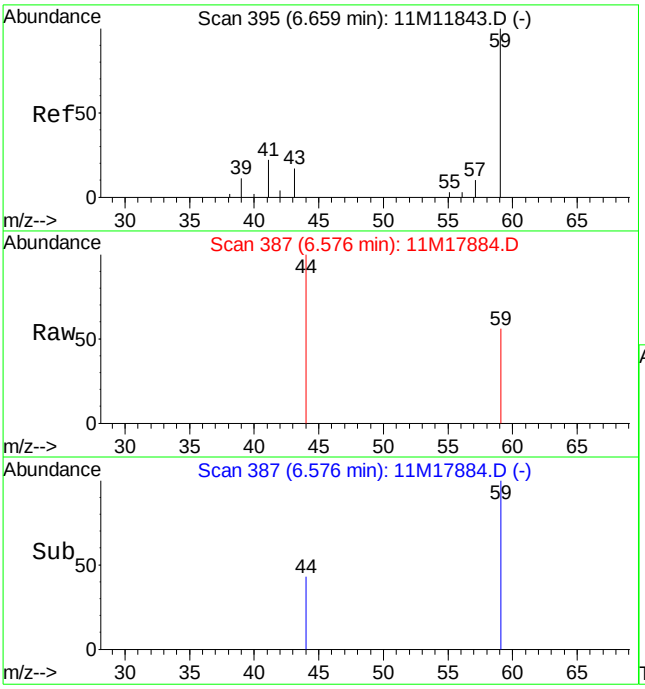


#14
1,1-Dichloroethene
Concen: 0.16 ug/L
RT: 6.47 min Scan# 377
Delta R.T. 0.00 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion: 61 Resp: 1022

Ion	Ratio	Lower	Upper
61	100		
96	18.2	32.2	75.2#

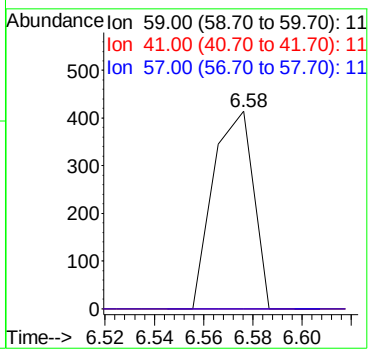


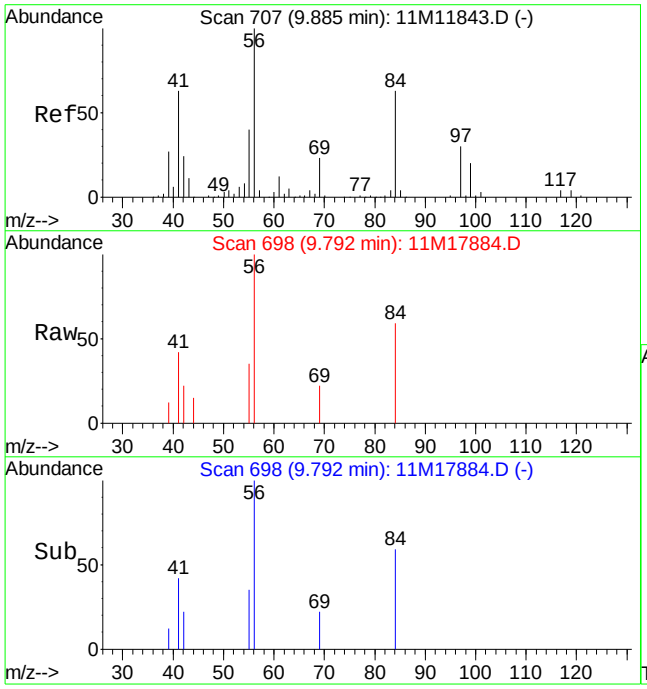


#15
Tert-Butyl Alcohol
Concen: 1.08 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion: 59 Resp: 471

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

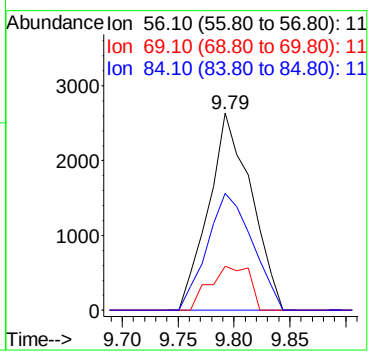


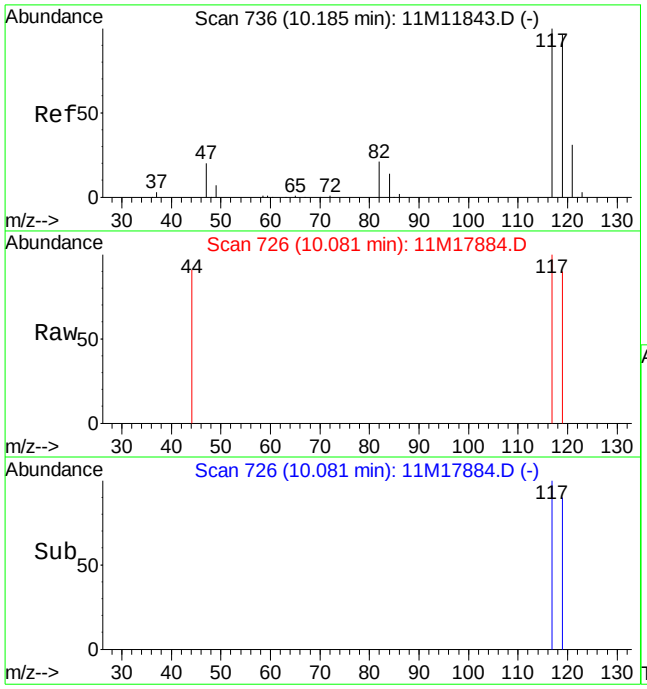


#39
Cyclohexane
Concen: 0.88 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion: 56 Resp: 6993

Ion	Ratio	Lower	Upper
56	100		
69	21.0	15.3	35.7
84	63.0	41.6	97.0

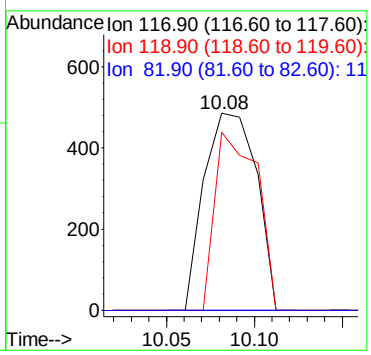


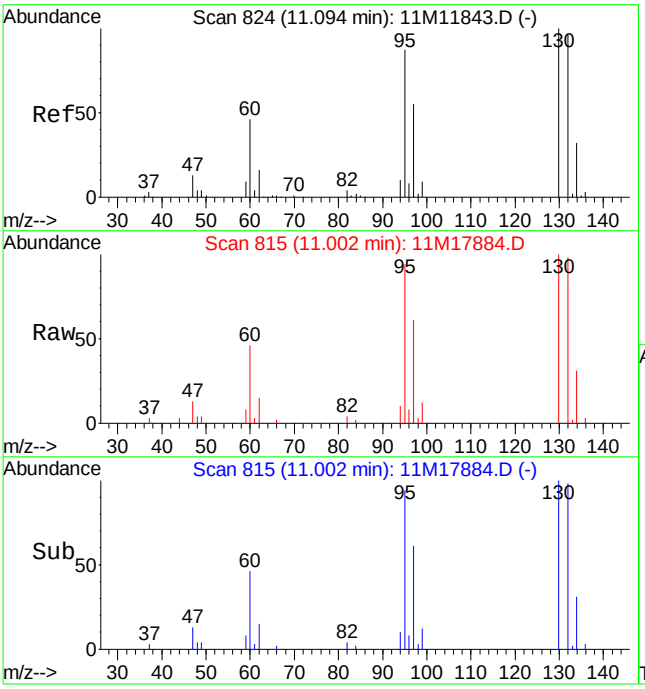


#41
Carbon Tetrachloride
Concen: 0.21 ug/L
RT: 10.08 min Scan# 726
Delta R.T. -0.01 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion:117 Resp: 1004

Ion	Ratio	Lower	Upper
117	100		
119	73.0	58.1	135.7
82	0.0	13.7	32.1#

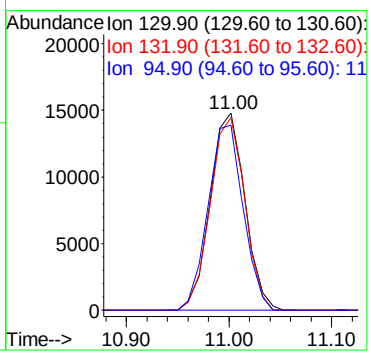


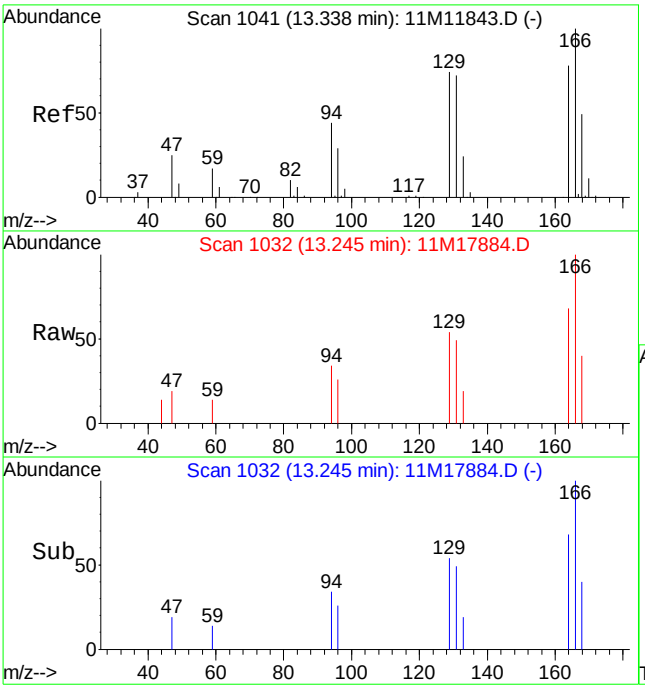


#46
Trichloroethene
Concen: 8.69 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion:130 Resp: 34847

Ion	Ratio	Lower	Upper
130	100		
132	96.4	58.2	135.8
95	95.2	59.0	137.8

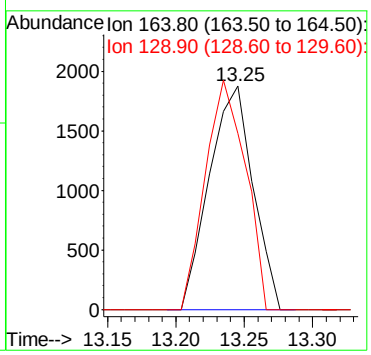




#64
Tetrachloroethene
Concen: 1.30 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17884.D
Acq: 30 Apr 2017 2:14

Tgt Ion:164 Resp: 4168

Ion	Ratio	Lower	Upper
164	100		
129	94.1	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17885.D Vial: 17
Acq On : 30 Apr 2017 2:43 Operator: TMB
Sample : L17041209-02 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

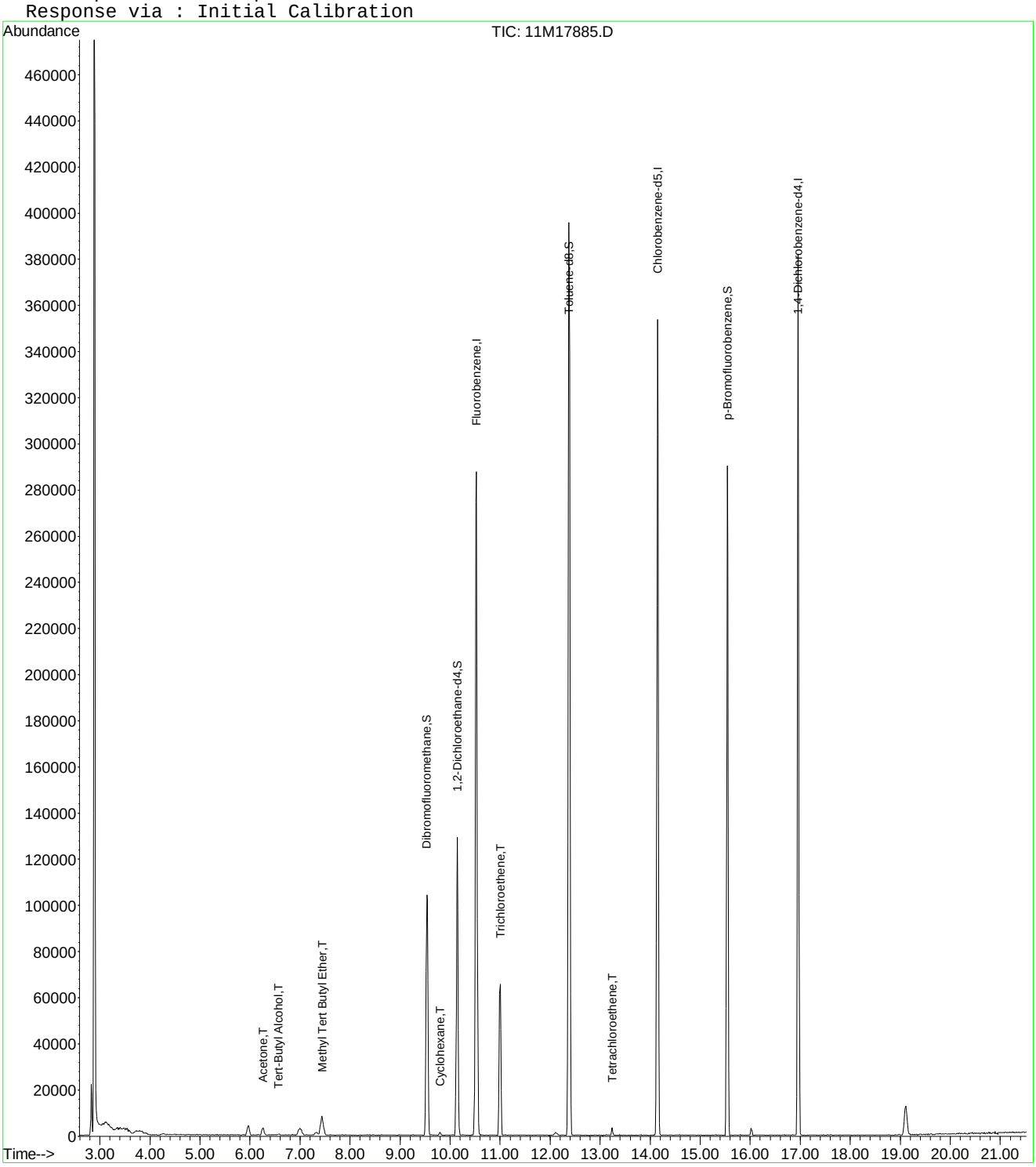
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	339744	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	241401	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126271	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86859	25.8106	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.24%			
43) 1,2-Dichloroethane-d4	10.14	65	104779	26.8302	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.32%			
57) Toluene-d8	12.38	98	336338	26.8326	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.32%			
78) p-Bromofluorobenzene	15.54	95	120883	27.5432	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.16%			
Target Compounds						Qvalue
13) Acetone	6.26	43	6795	5.9817	ug/L	95
15) Tert-Butyl Alcohol	6.57	59	870	2.0476	ug/L #	60
22) Methyl Tert Butyl Ether	7.44	73	17080	1.6848	ug/L	92
33) Chloroform	9.25	83	396	Below Cal	#	17
39) Cyclohexane	9.80	56	1298	0.1682	ug/L #	79
46) Trichloroethene	11.00	130	29423	7.5338	ug/L	99
64) Tetrachloroethene	13.25	164	1296	0.4177	ug/L	80

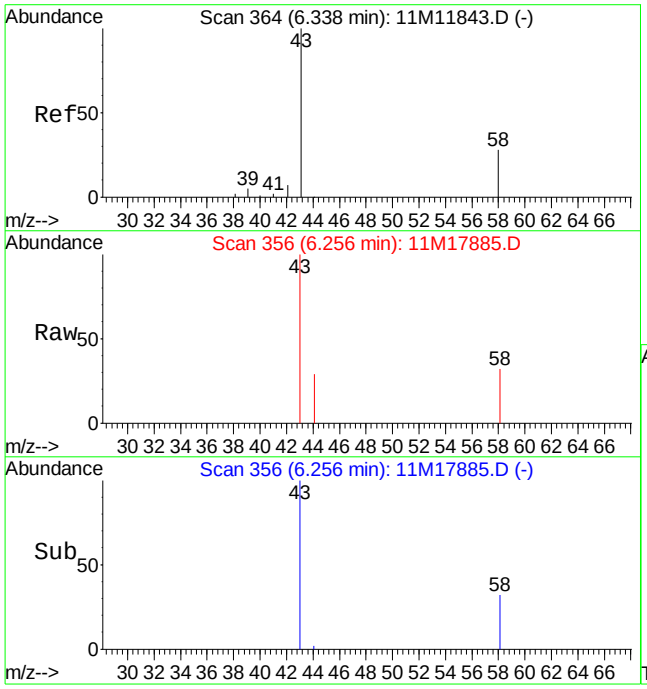
(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17885.D Vial: 17
Acq On : 30 Apr 2017 2:43 Operator: TMB
Sample : L17041209-02 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

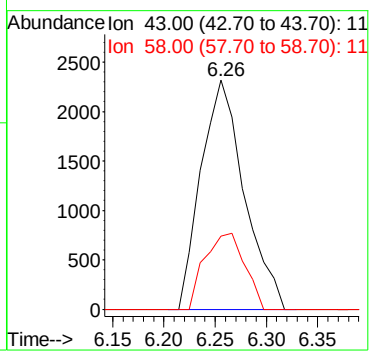


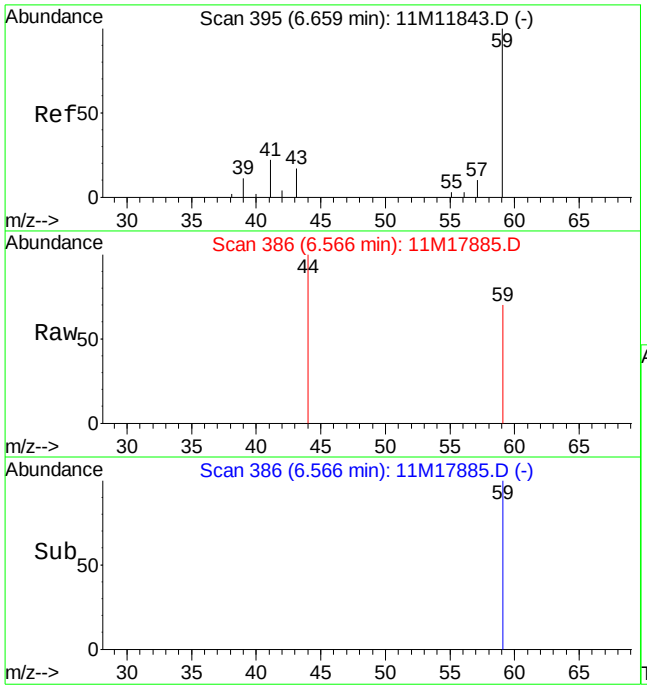


#13
Acetone
Concen: 5.98 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion: 43 Resp: 6795

Ion	Ratio	Lower	Upper
43	100		
58	30.7	20.1	46.9

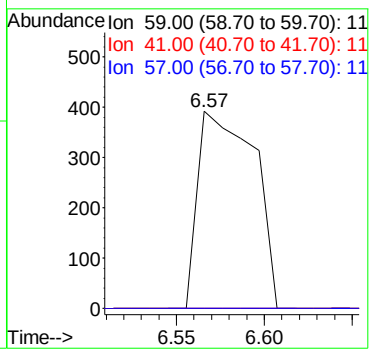


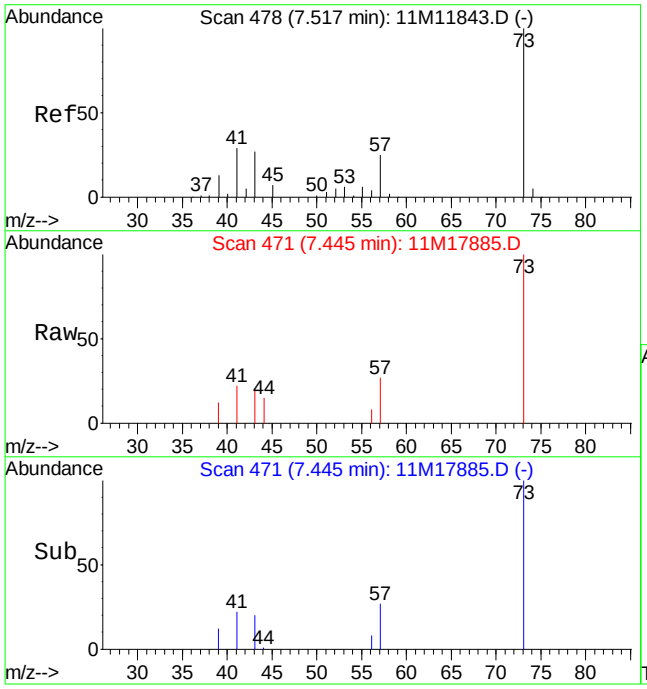


#15
Tert-Butyl Alcohol
Concen: 2.05 ug/L
RT: 6.57 min Scan# 386
Delta R.T. 0.00 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion: 59 Resp: 870

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

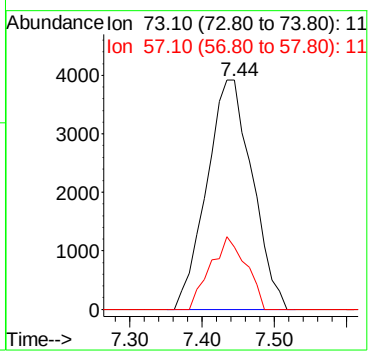


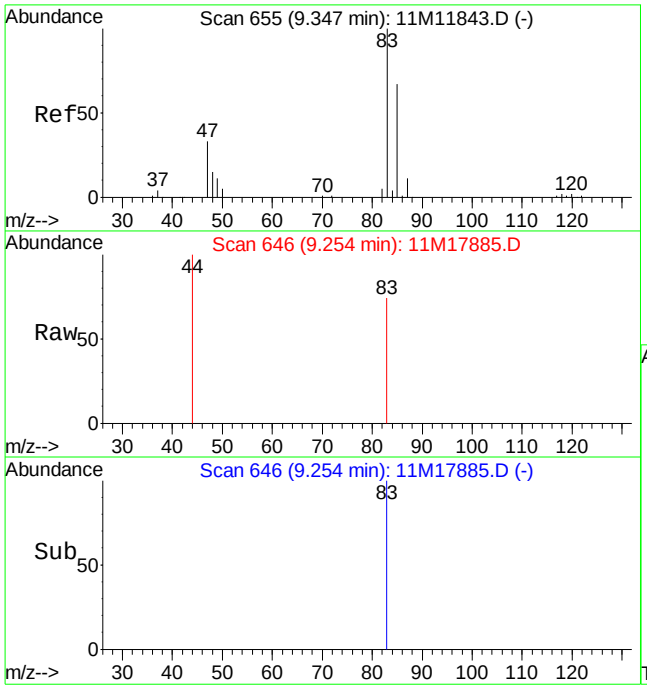


#22
Methyl Tert Butyl Ether
Concen: 1.68 ug/L
RT: 7.44 min Scan# 471
Delta R.T. 0.01 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion: 73 Resp: 17080

Ion	Ratio	Lower	Upper
73	100		
57	24.8	17.3	40.5

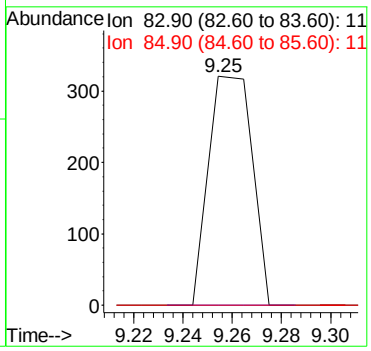


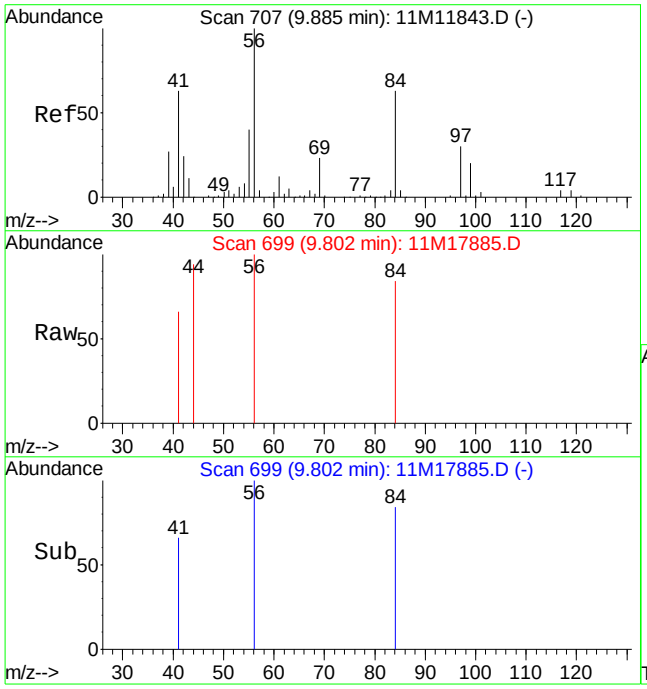


#33
Chloroform
Concen: Below Cal
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion: 83 Resp: 396

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

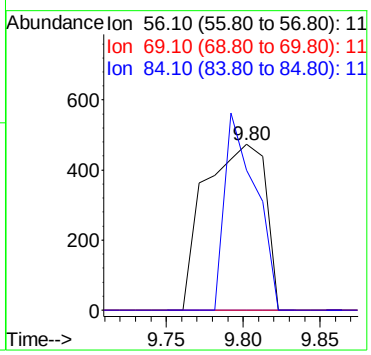


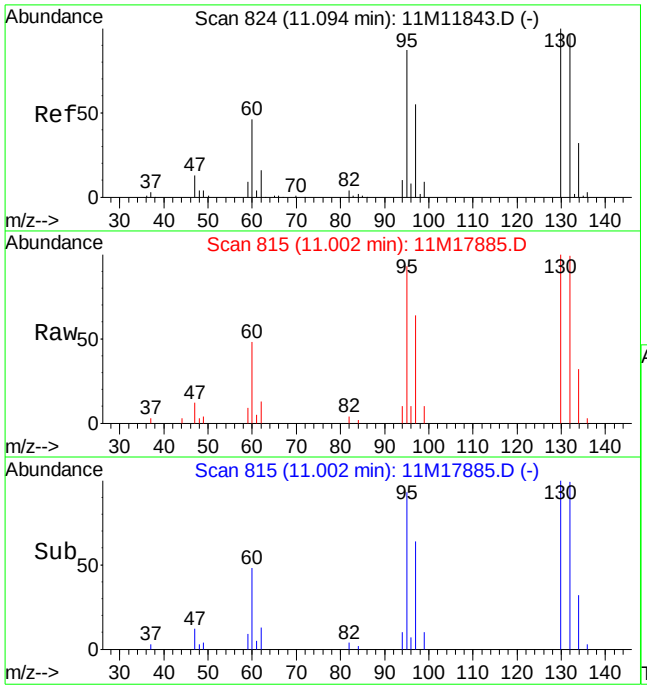


#39
Cyclohexane
Concen: 0.17 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.00 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion: 56 Resp: 1298

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	60.8	41.6	97.0

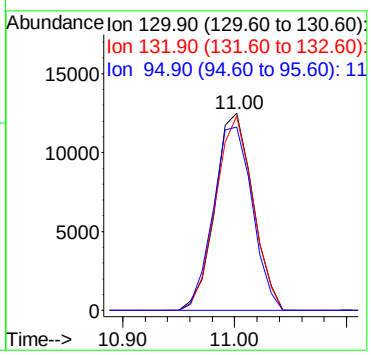


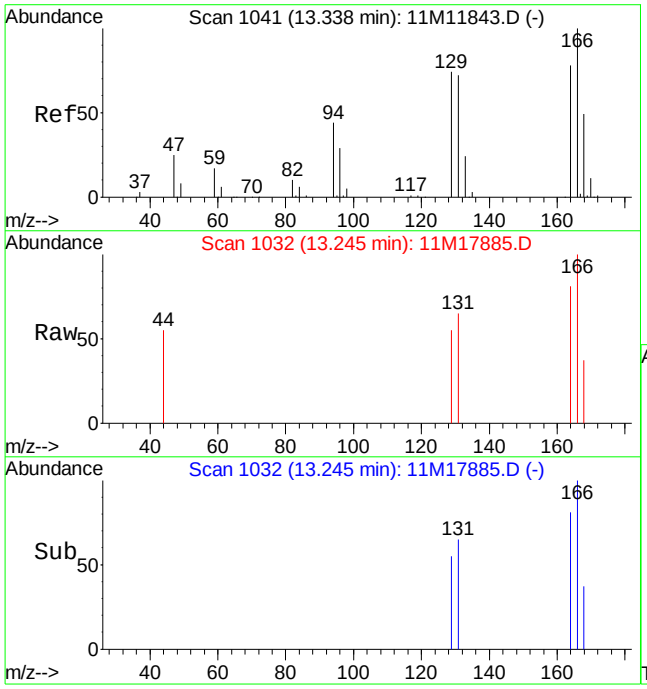


#46
Trichloroethene
Concen: 7.53 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion:130 Resp: 29423

Ion	Ratio	Lower	Upper
130	100		
132	97.4	58.2	135.8
95	96.0	59.0	137.8

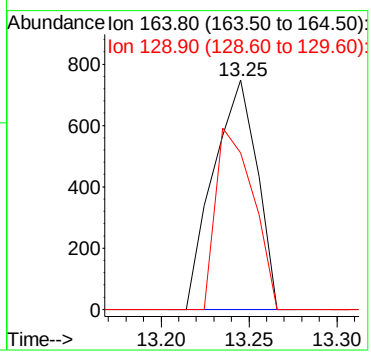




#64
Tetrachloroethene
Concen: 0.42 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17885.D
Acq: 30 Apr 2017 2:43

Tgt Ion:164 Resp: 1296

Ion	Ratio	Lower	Upper
164	100		
129	67.5	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17886.D Vial: 18
Acq On : 30 Apr 2017 3:13 Operator: TMB
Sample : L17041209-03 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

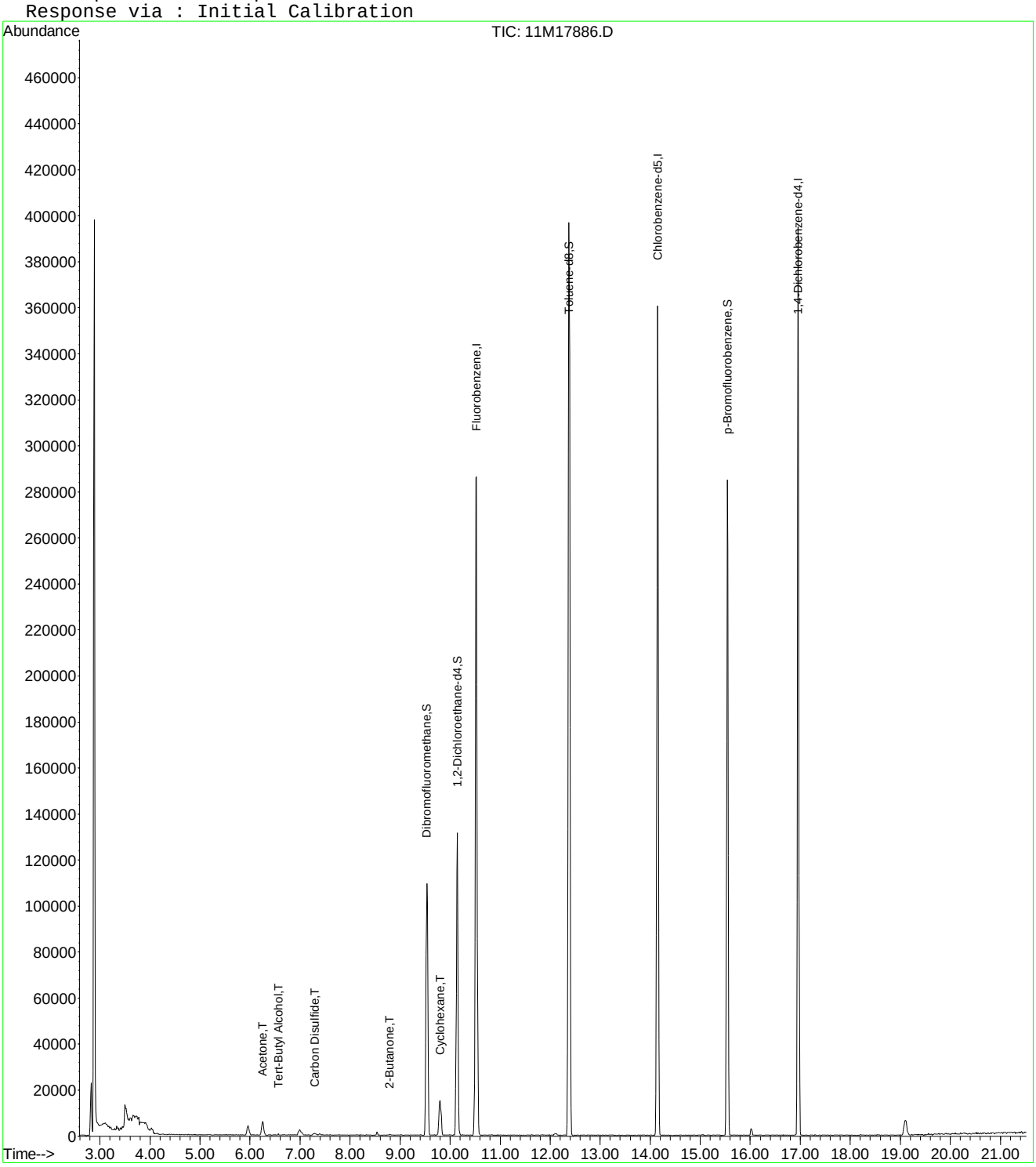
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	344008	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	245534	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	129522	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	88440	25.9547	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.80%			
43) 1,2-Dichloroethane-d4	10.14	65	105964	26.7973	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.20%			
57) Toluene-d8	12.38	98	341893	26.8167	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.28%			
78) p-Bromofluorobenzene	15.54	95	118726	26.3727	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.48%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	874	Below Cal		83
13) Acetone	6.25	43	12097	10.5171	ug/L	94
15) Tert-Butyl Alcohol	6.57	59	252	0.5857	ug/L #	60
20) Carbon Disulfide	7.29	76	1478	0.1407	ug/L #	73
29) 2-Butanone	8.79	43	663	0.3528	ug/L #	56
39) Cyclohexane	9.80	56	13810	1.7676	ug/L	96

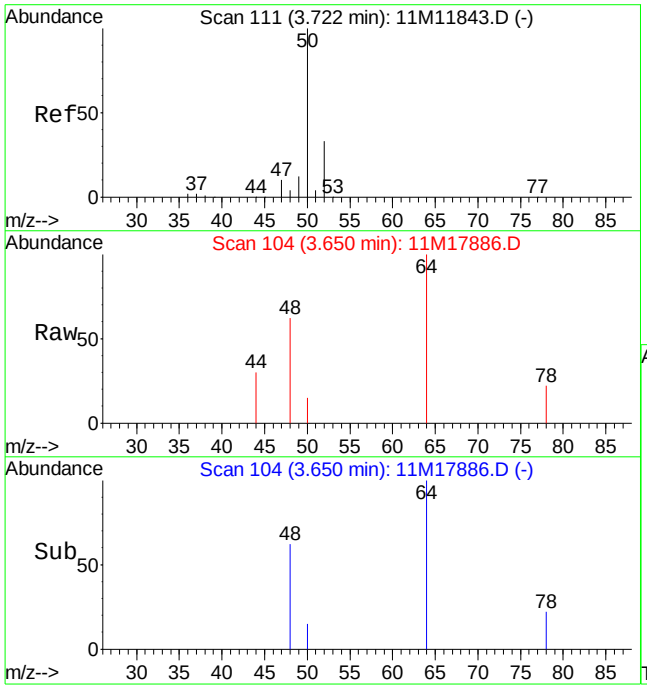
(#) = qualifier out of range (m) = manual integration
11M17886.D 8260WT.M Sun Apr 30 12:52:19 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17886.D Vial: 18
Acq On : 30 Apr 2017 3:13 Operator: TMB
Sample : L17041209-03 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

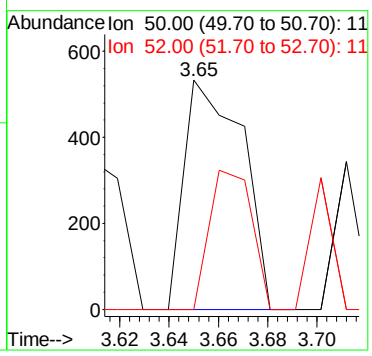


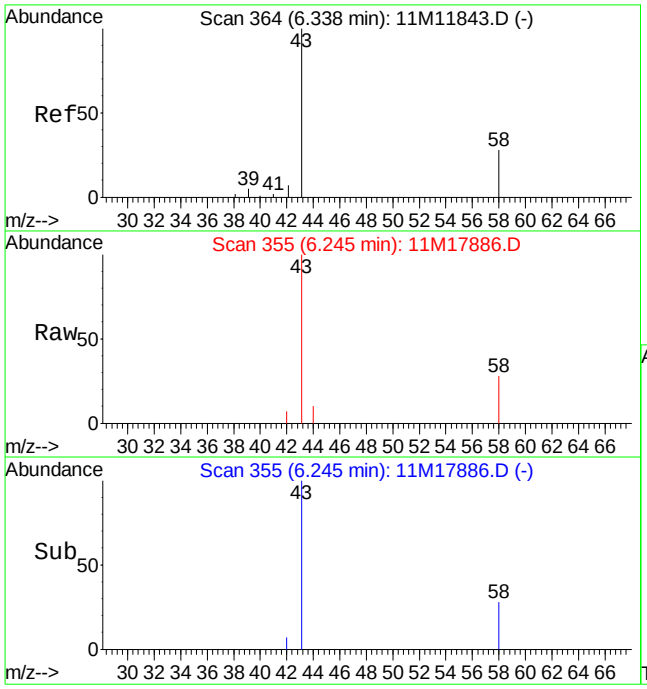


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 50 Resp: 874

Ion	Ratio	Lower	Upper
50	100		
52	44.3	20.8	48.6

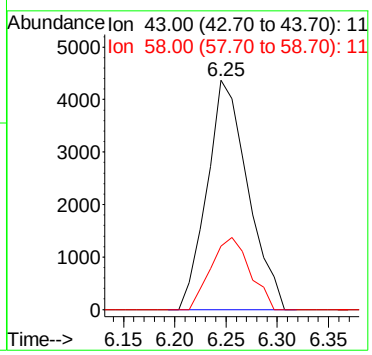


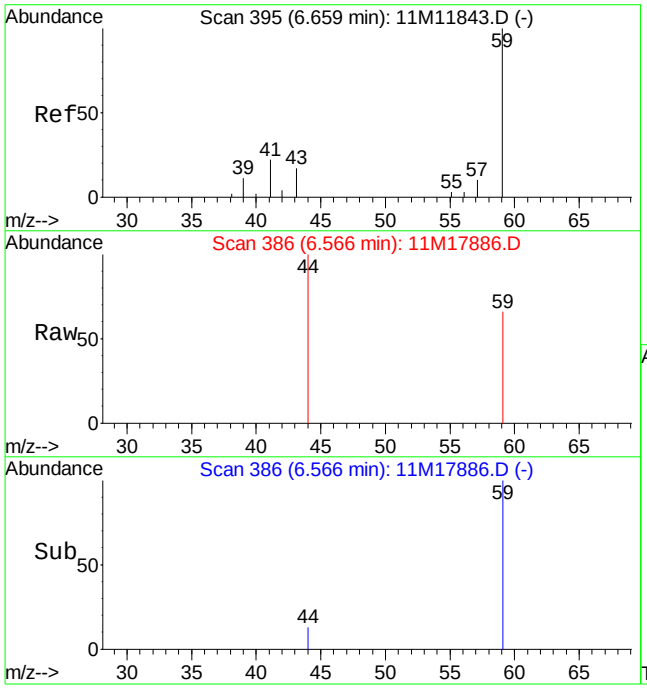


#13
Acetone
Concen: 10.52 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 43 Resp: 12097

Ion	Ratio	Lower	Upper
43	100		
58	30.0	20.1	46.9

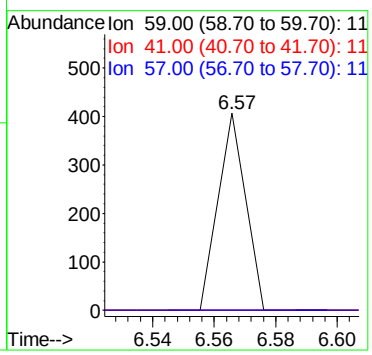


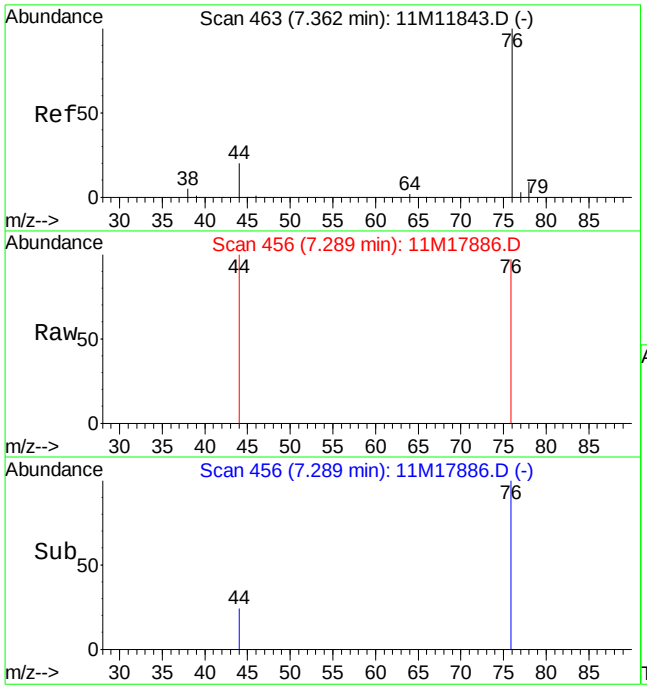


#15
Tert-Butyl Alcohol
Concen: 0.59 ug/L
RT: 6.57 min Scan# 386
Delta R.T. -0.00 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 59 Resp: 252

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

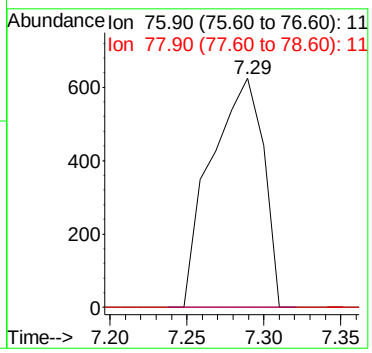


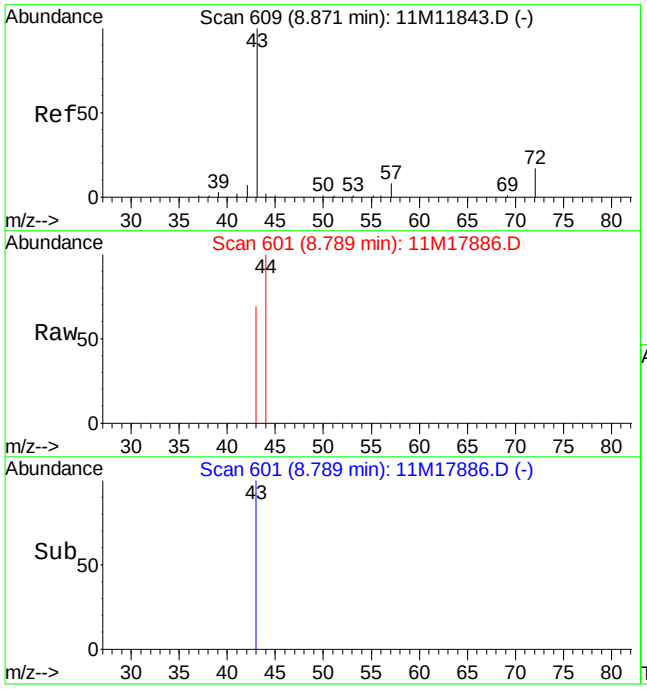


#20
Carbon Disulfide
Concen: 0.14 ug/L
RT: 7.29 min Scan# 456
Delta R.T. 0.01 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 76 Resp: 1478

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

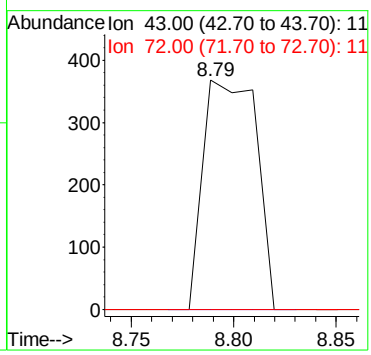


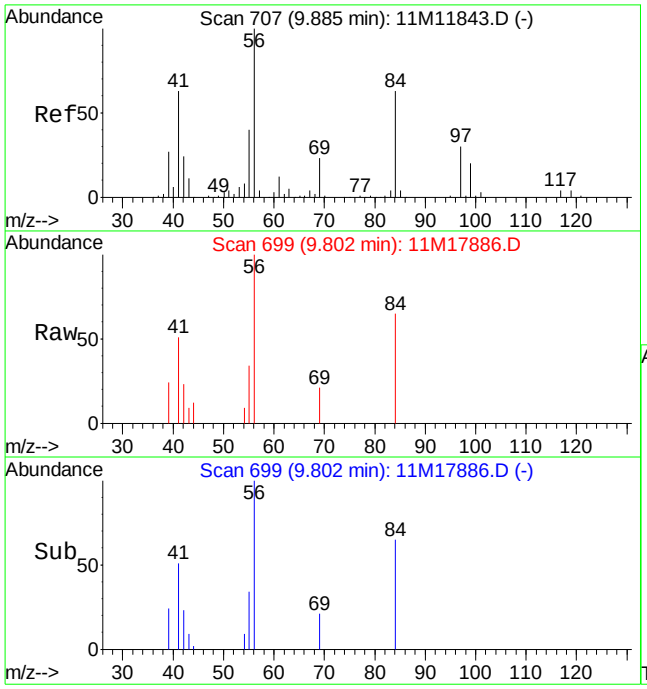


#29
2-Butanone
Concen: 0.35 ug/L
RT: 8.79 min Scan# 601
Delta R.T. -0.00 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 43 Resp: 663

Ion	Ratio	Lower	Upper
43	100		
72	0.0	12.4	28.8#

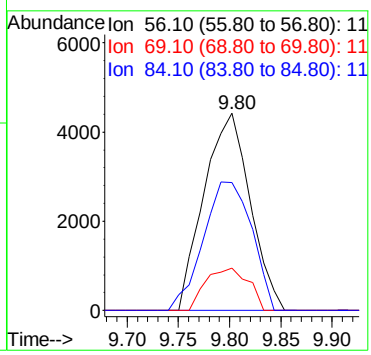




#39
Cyclohexane
Concen: 1.77 ug/L
RT: 9.80 min Scan# 699
Delta R.T. -0.00 min
Lab File: 11M17886.D
Acq: 30 Apr 2017 3:13

Tgt Ion: 56 Resp: 13810

Ion	Ratio	Lower	Upper
56	100		
69	19.9	15.3	35.7
84	68.6	41.6	97.0



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17887.D Vial: 19
Acq On : 30 Apr 2017 3:42 Operator: TMB
Sample : L17041209-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:21 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

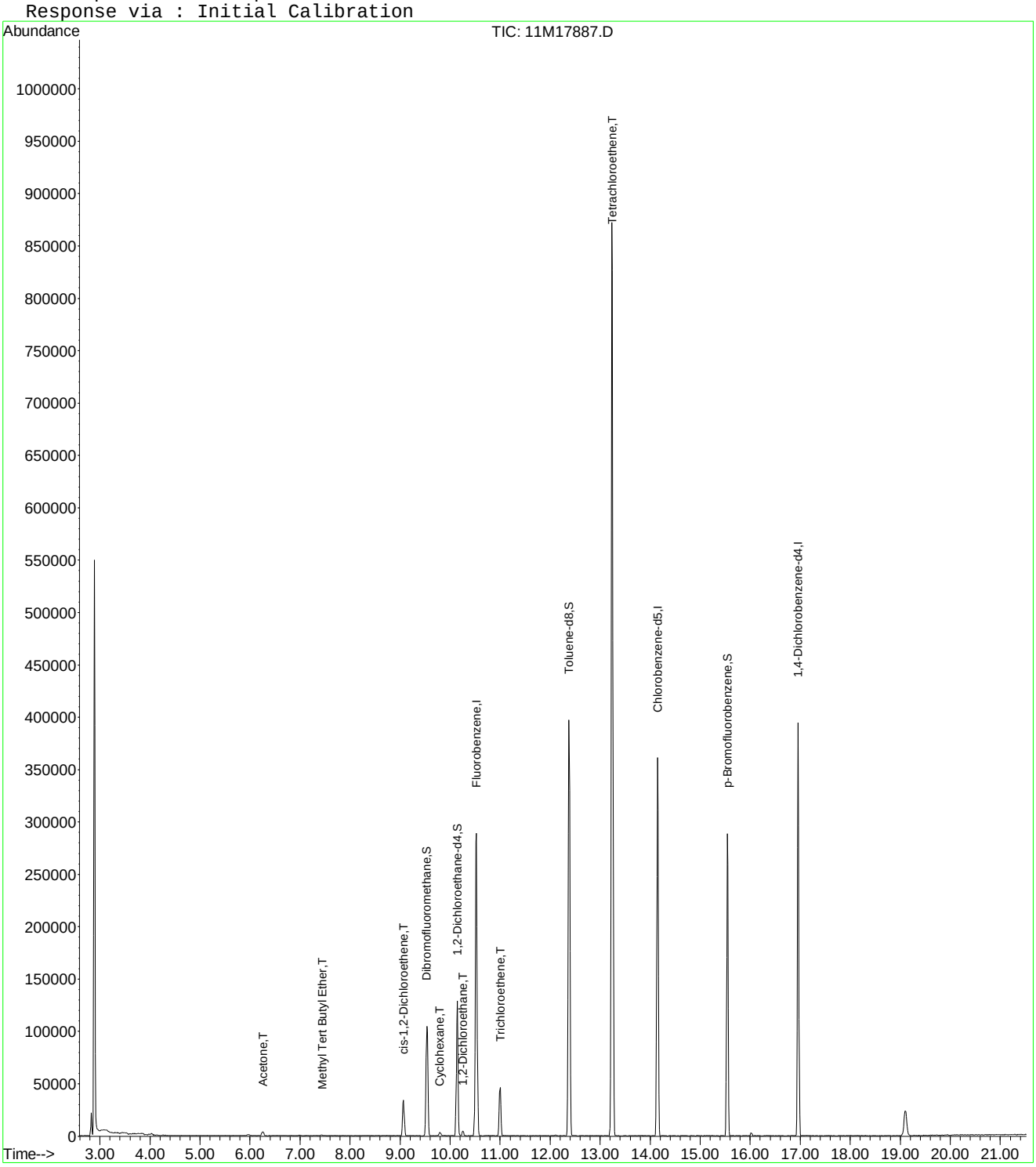
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	343107	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	249003	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	130962	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	86197	25.3628 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.44%		
43) 1,2-Dichloroethane-d4	10.14	65	104919	26.6027 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.40%		
57) Toluene-d8	12.38	98	337056	26.0690 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.28%		
78) p-Bromofluorobenzene	15.54	95	120065	26.3769 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.52%		
Target Compounds					Qvalue
3) Chloromethane	3.66	50	597	Below Cal #	40
13) Acetone	6.26	43	7786	6.7869 ug/L	95
22) Methyl Tert Butyl Ether	7.44	73	1811	0.1769 ug/L #	46
32) cis-1,2-Dichloroethene	9.07	96	19127	4.5712 ug/L	90
33) Chloroform	9.25	83	443	Below Cal #	17
39) Cyclohexane	9.79	56	3004	0.3855 ug/L #	85
44) 1,2-Dichloroethane	10.26	62	4850	0.9043 ug/L	89
46) Trichloroethene	11.00	130	20151	5.1091 ug/L	99
64) Tetrachloroethene	13.25	164	282361	88.2323 ug/L	99

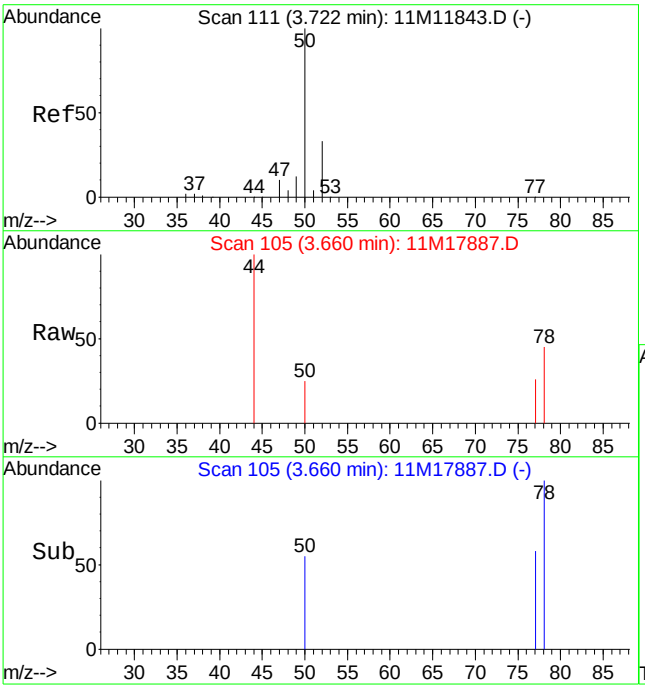
(#) = qualifier out of range (m) = manual integration
11M17887.D 8260WT.M Sun Apr 30 12:52:21 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17887.D Vial: 19
Acq On : 30 Apr 2017 3:42 Operator: TMB
Sample : L17041209-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

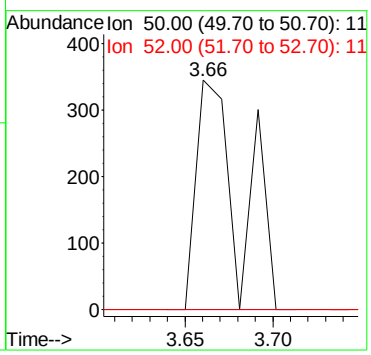


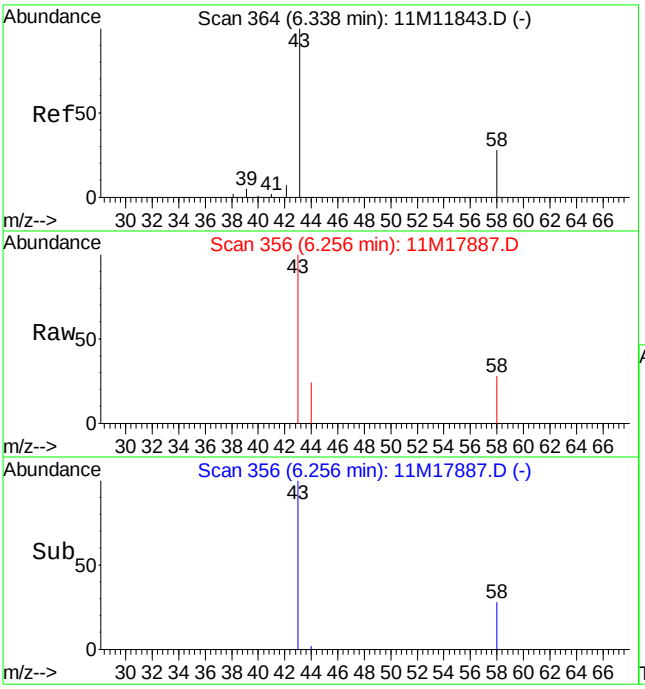


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 50 Resp: 597

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

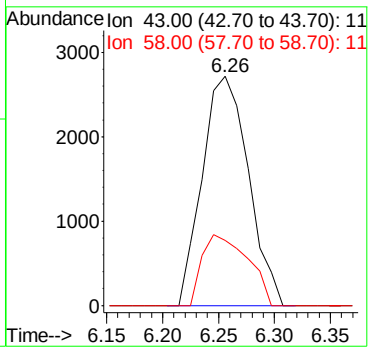


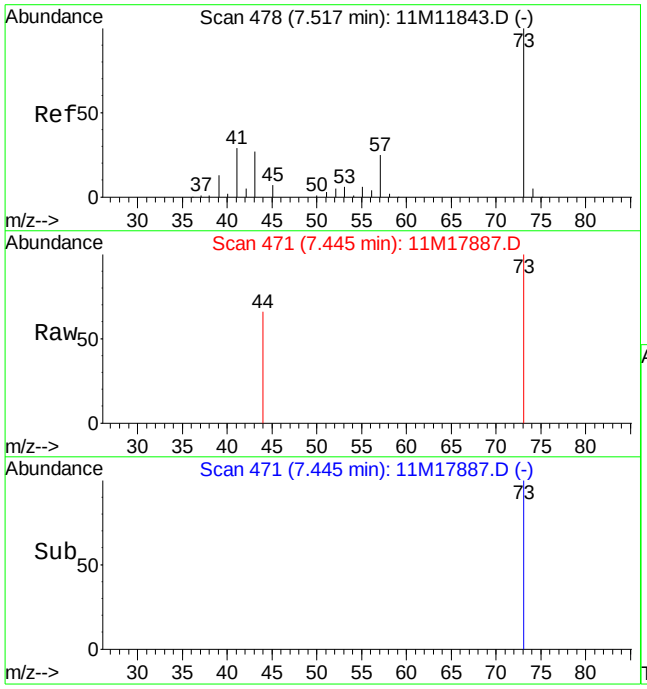


#13
Acetone
Concen: 6.79 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 43 Resp: 7786

Ion	Ratio	Lower	Upper
43	100		
58	30.6	20.1	46.9

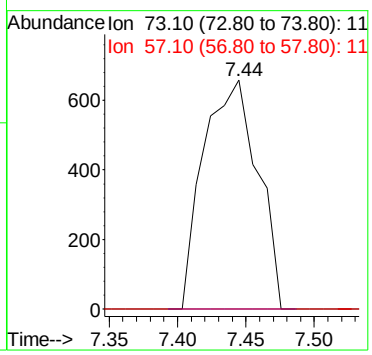


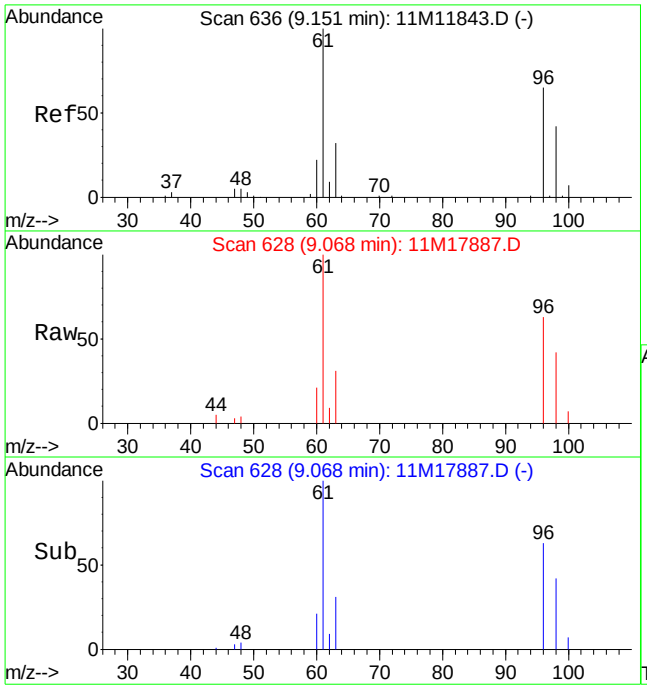


#22
Methyl Tert Butyl Ether
Concen: 0.18 ug/L
RT: 7.44 min Scan# 471
Delta R.T. 0.01 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 73 Resp: 1811

Ion	Ratio	Lower	Upper
73	100		
57	0.0	17.3	40.5#

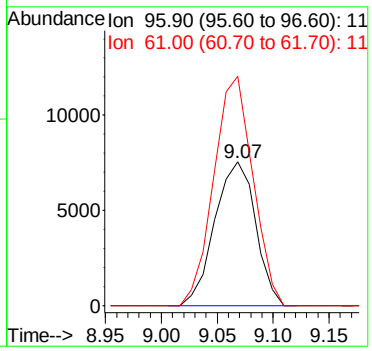


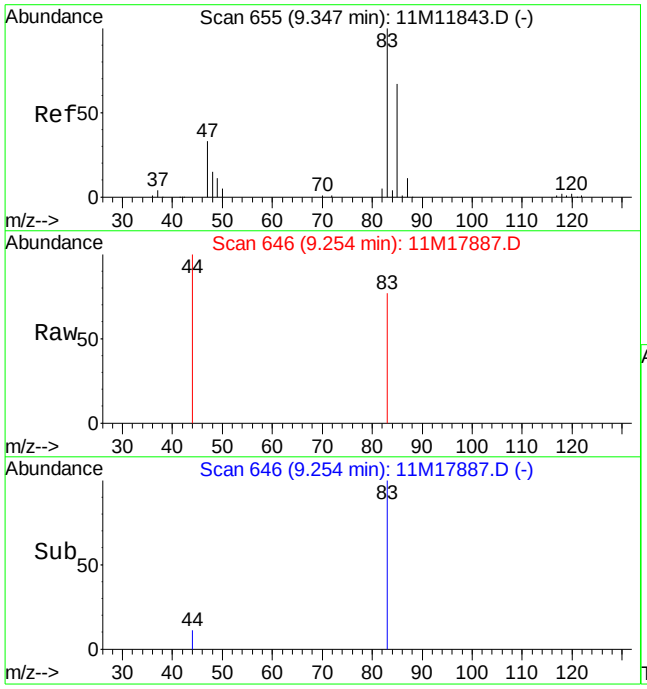


#32
cis-1,2-Dichloroethene
Concen: 4.57 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.00 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 96 Resp: 19127

Ion	Ratio	Lower	Upper
96	100		
61	153.1	100.0	233.4

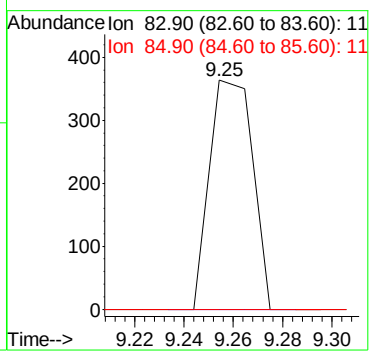


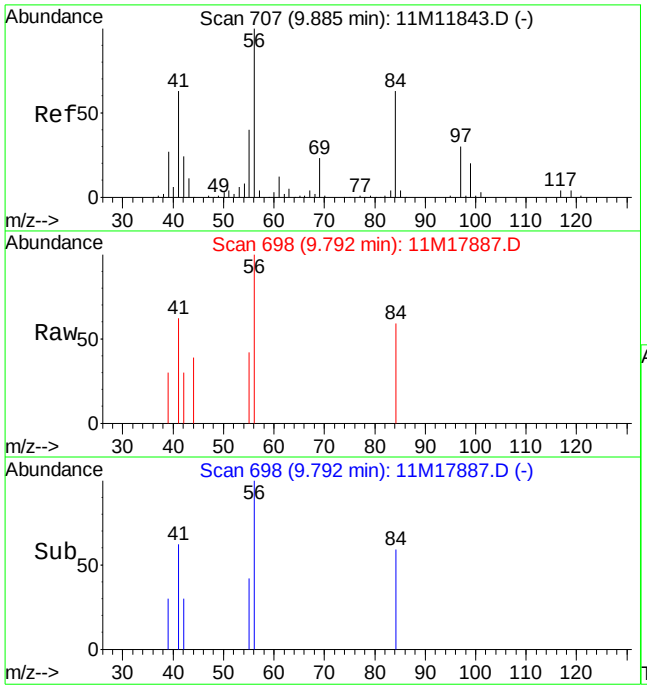


#33
Chloroform
Concen: Below Cal
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 83 Resp: 443

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

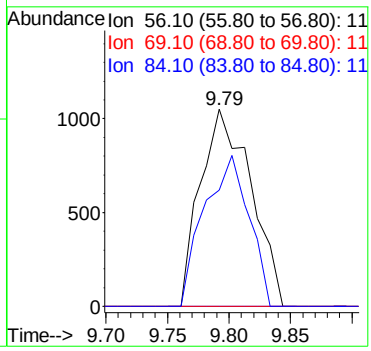


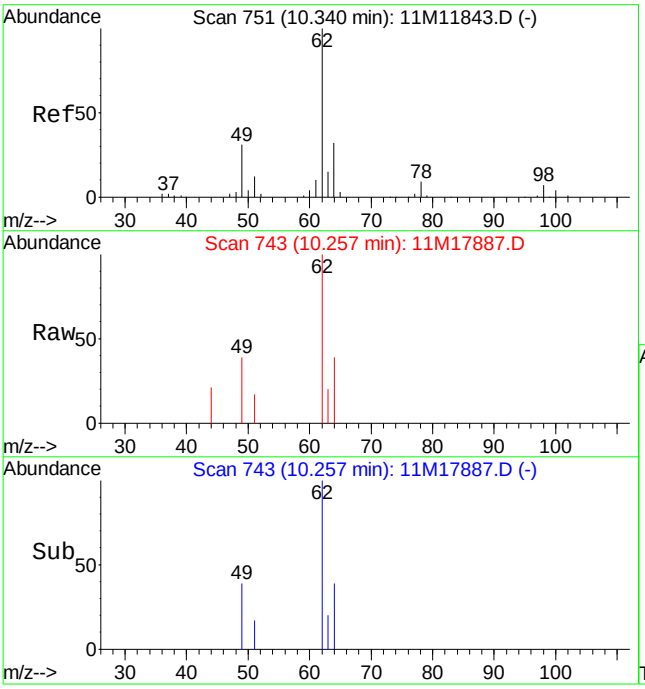


#39
Cyclohexane
Concen: 0.39 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 56 Resp: 3004

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	67.5	41.6	97.0

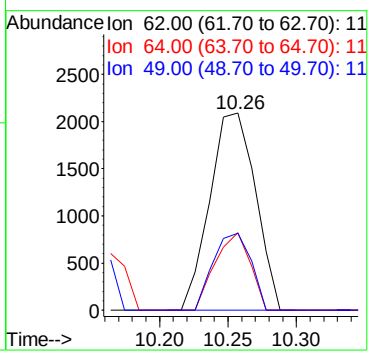


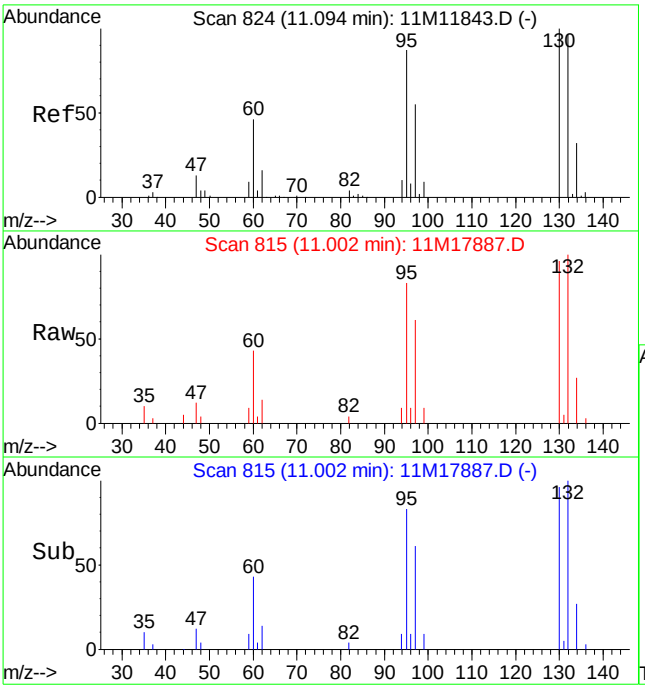


#44
1,2-Dichloroethane
Concen: 0.90 ug/L
RT: 10.26 min Scan# 743
Delta R.T. 0.00 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion: 62 Resp: 4850

Ion	Ratio	Lower	Upper
62	100		
64	30.0	19.3	45.1
49	32.3	25.4	59.2

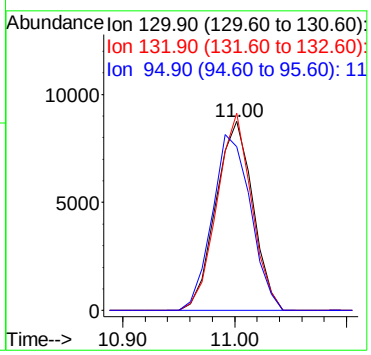


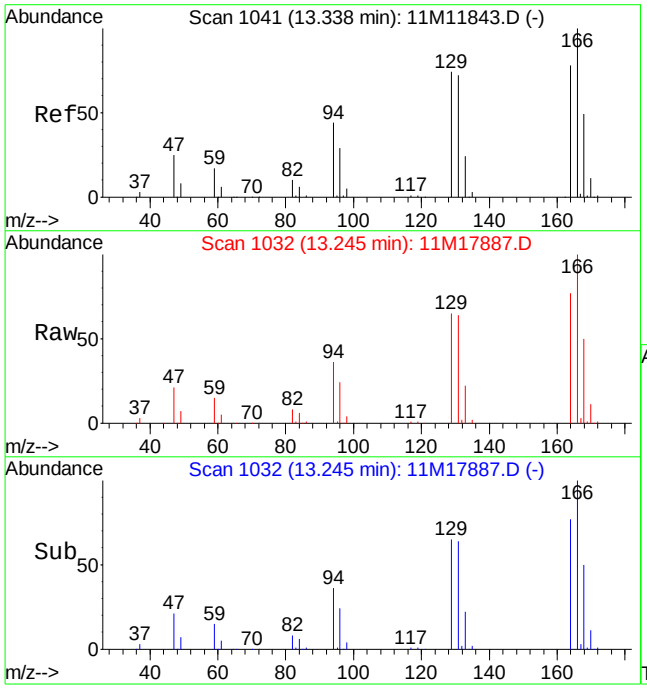


#46
Trichloroethene
Concen: 5.11 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion:130 Resp: 20151

Ion	Ratio	Lower	Upper
130	100		
132	97.3	58.2	135.8
95	96.3	59.0	137.8

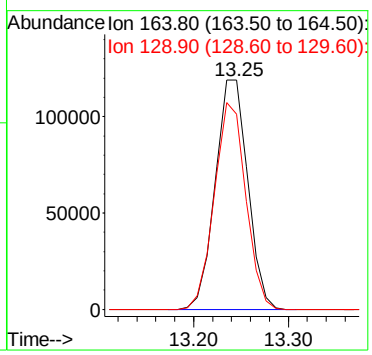




#64
Tetrachloroethene
Concen: 88.23 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17887.D
Acq: 30 Apr 2017 3:42

Tgt Ion:164 Resp: 282361

Ion	Ratio	Lower	Upper
164	100		
129	87.3	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17888.D Vial: 20
Acq On : 30 Apr 2017 4:11 Operator: TMB
Sample : L17041209-05 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:23 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

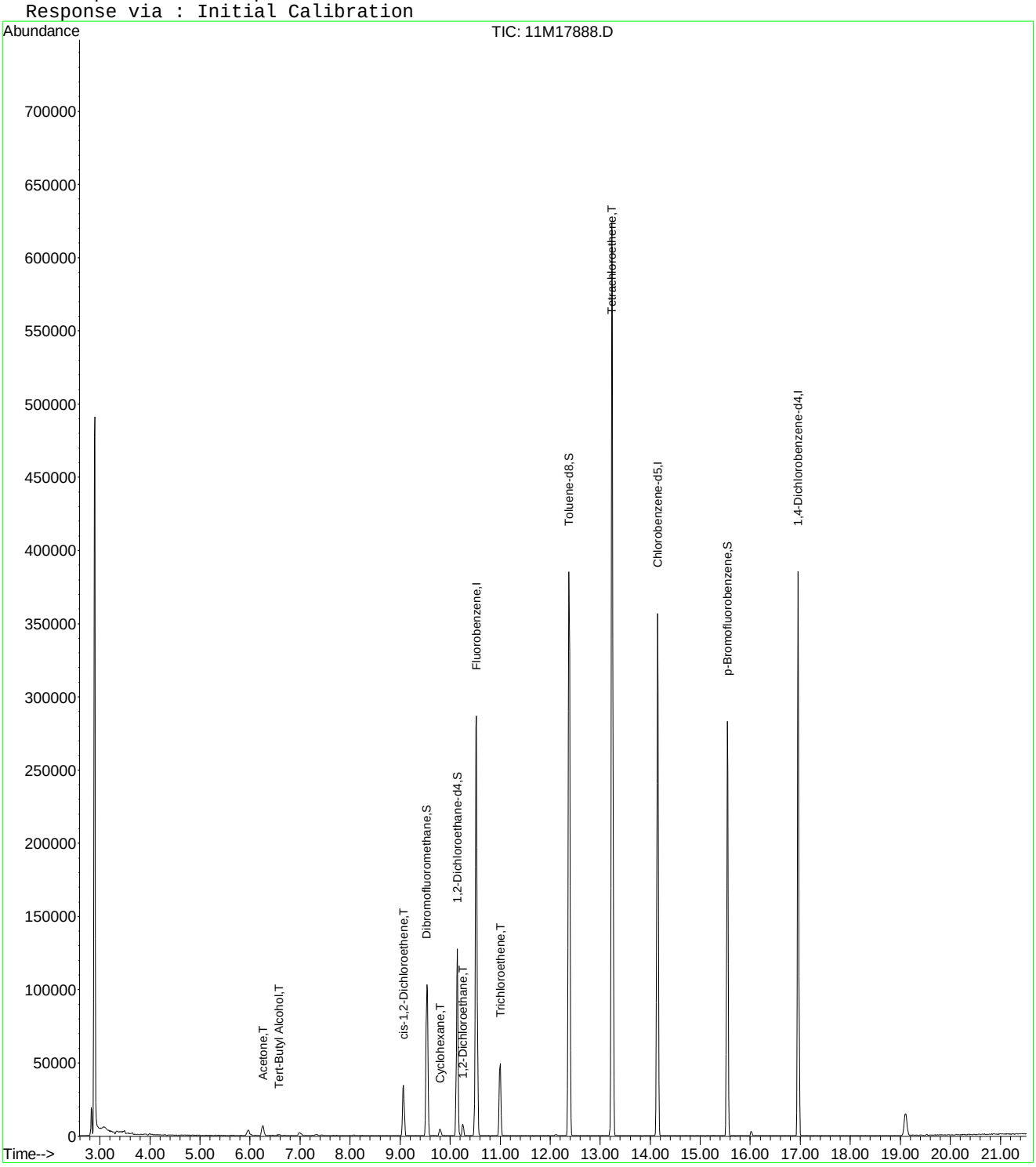
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	340015	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	243016	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	127759	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86127	25.5727	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.28%			
43) 1,2-Dichloroethane-d4	10.14	65	104401	26.7121	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.84%			
57) Toluene-d8	12.38	98	331820	26.2963	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.20%			
78) p-Bromofluorobenzene	15.54	95	117542	26.4700	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
13) Acetone	6.26	43	14869	13.0788	ug/L	94
15) Tert-Butyl Alcohol	6.58	59	1422	3.3441	ug/L #	60
32) cis-1,2-Dichloroethene	9.07	96	19337	4.6634	ug/L	93
39) Cyclohexane	9.80	56	4173	0.5404	ug/L #	90
44) 1,2-Dichloroethane	10.26	62	7937	1.4933	ug/L	93
46) Trichloroethene	11.00	130	21908	5.6051	ug/L	98
64) Tetrachloroethene	13.23	164	202724	64.9079	ug/L	98

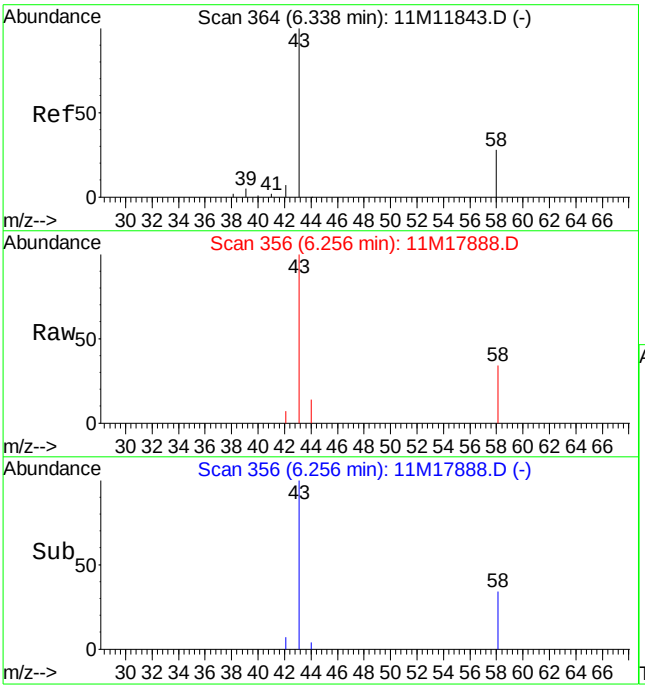
(#) = qualifier out of range (m) = manual integration
11M17888.D 8260WT.M Sun Apr 30 12:52:24 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17888.D Vial: 20
Acq On : 30 Apr 2017 4:11 Operator: TMB
Sample : L17041209-05 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

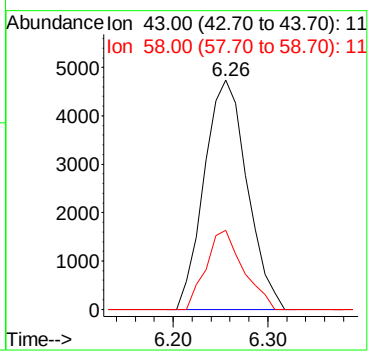


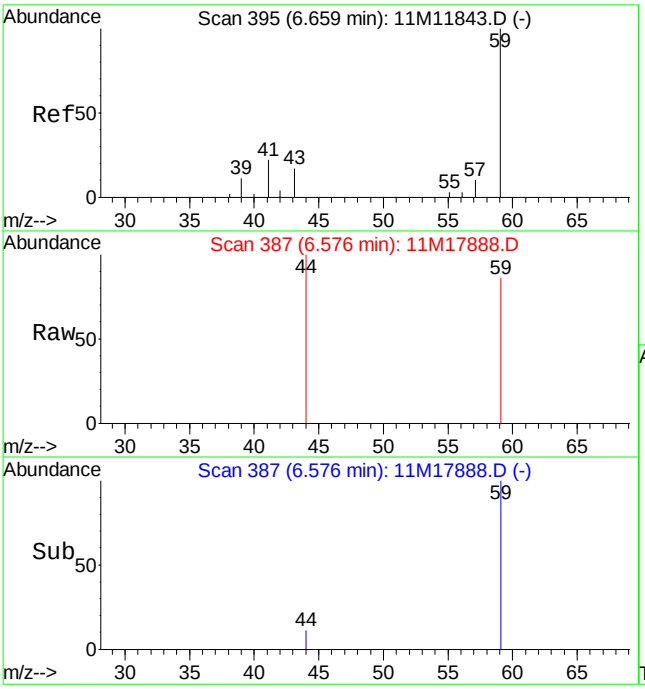


#13
Acetone
Concen: 13.08 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion: 43 Resp: 14869

Ion	Ratio	Lower	Upper
43	100		
58	29.8	20.1	46.9

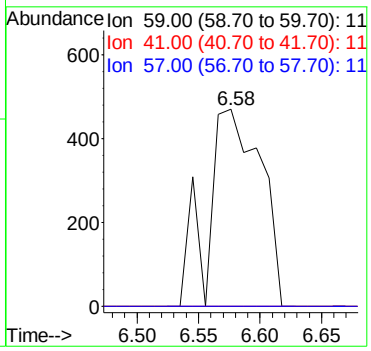


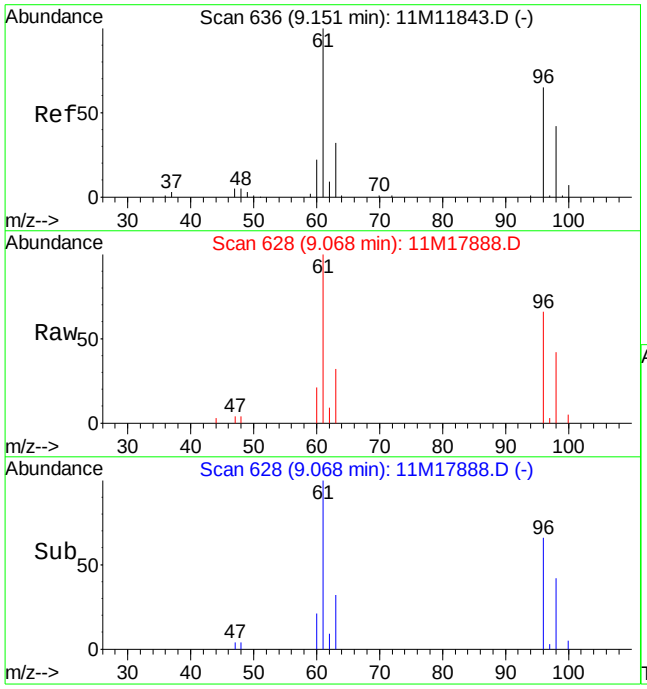


#15
Tert-Butyl Alcohol
Concen: 3.34 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion: 59 Resp: 1422

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

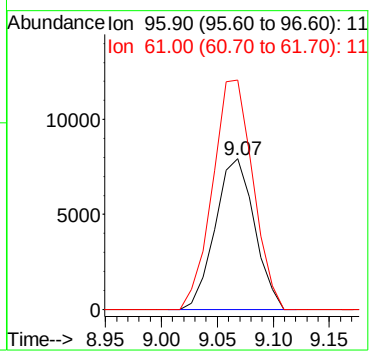


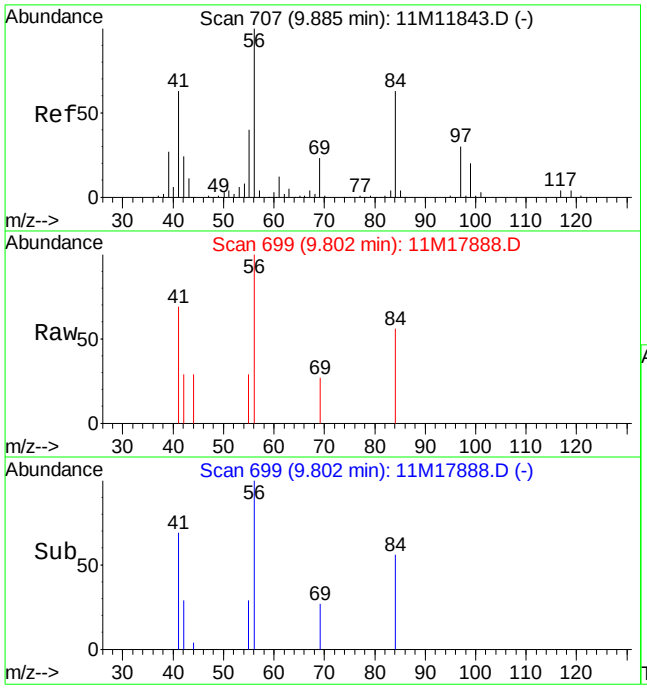


#32
cis-1,2-Dichloroethene
Concen: 4.66 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion: 96 Resp: 19337

Ion	Ratio	Lower	Upper
96	100		
61	156.7	100.0	233.4

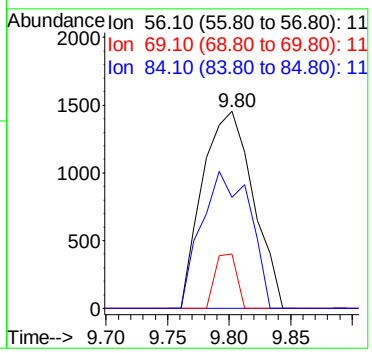


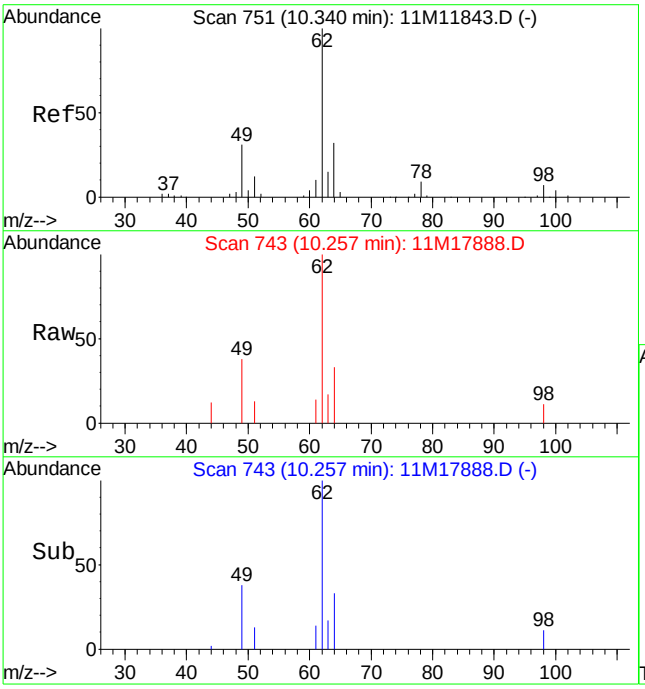


#39
Cyclohexane
Concen: 0.54 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion: 56 Resp: 4173

Ion	Ratio	Lower	Upper
56	100		
69	11.7	15.3	35.7#
84	66.3	41.6	97.0

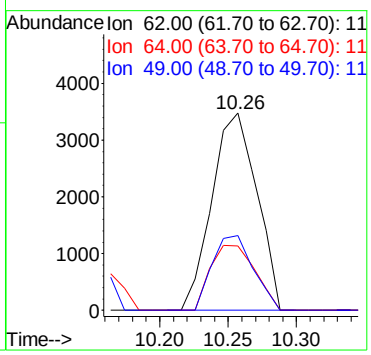


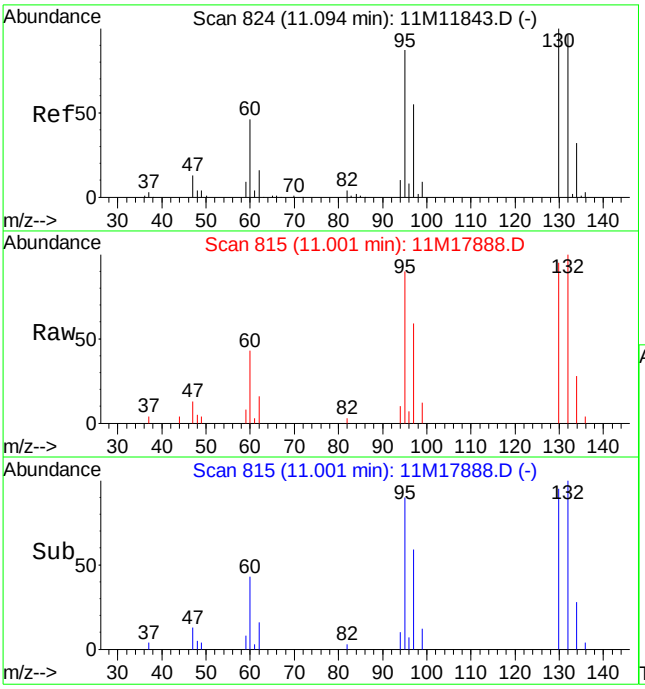


#44
1,2-Dichloroethane
Concen: 1.49 ug/L
RT: 10.26 min Scan# 743
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion: 62 Resp: 7937

Ion	Ratio	Lower	Upper
62	100		
64	32.8	19.3	45.1
49	34.7	25.4	59.2

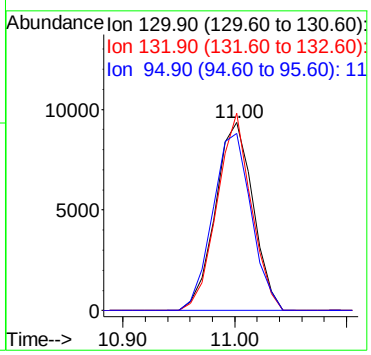


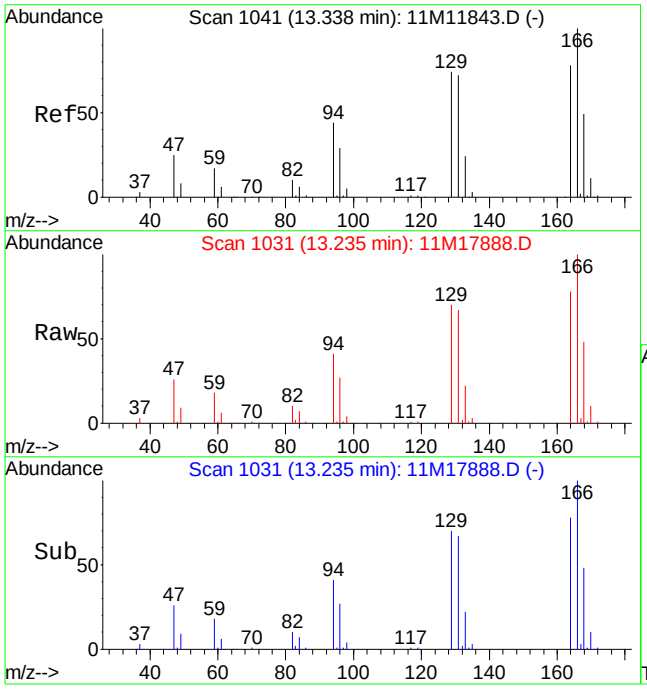


#46
Trichloroethene
Concen: 5.61 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion:130 Resp: 21908

Ion	Ratio	Lower	Upper
130	100		
132	95.0	58.2	135.8
95	96.3	59.0	137.8

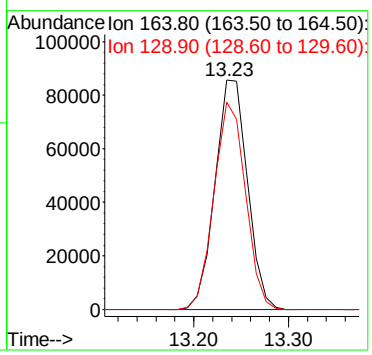




#64
Tetrachloroethene
Concen: 64.91 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17888.D
Acq: 30 Apr 2017 4:11

Tgt Ion:164 Resp: 202724

Ion	Ratio	Lower	Upper
164	100		
129	87.9	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273209.D Vial: 7
Acq On : 01 May 2017 14:08 Operator: ADC
Sample : L17041209-06 B 50X 826-SPE Inst : HPMS17
Misc : 1,50 W/AF (DARK AND FOAMY) Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

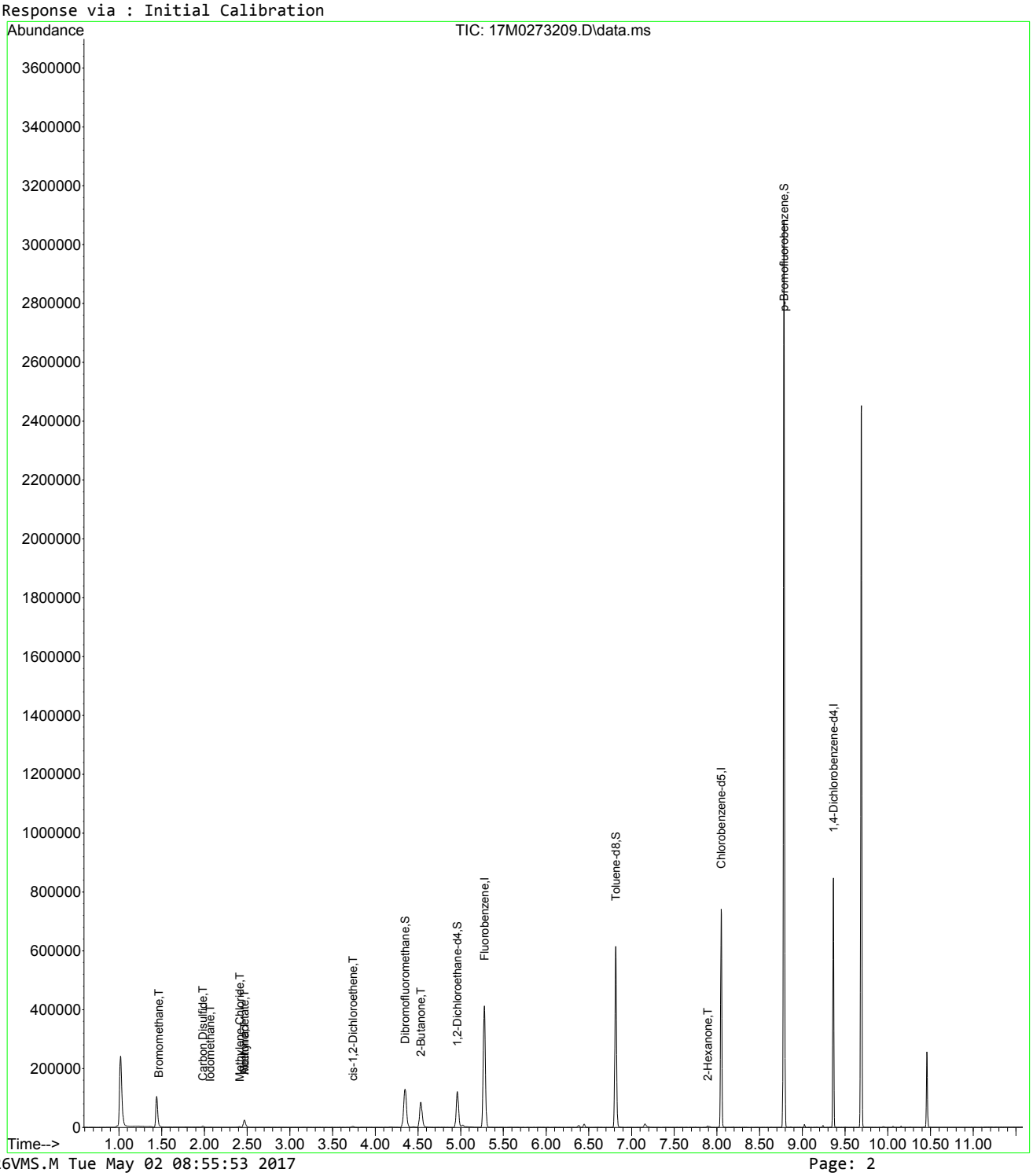
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	352723	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	254958	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	115237	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.351	111	92673	24.3279 ug/L	0.0118
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.312%		
34) 1,2-Dichloroethane-d4	4.962	65	88346	24.7429 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.972%		
47) Toluene-d8	6.815	98	329513	25.8969 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.588%		
66) p-Bromofluorobenzene	8.784	95	117513	30.4560 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 121.824%#		
Target Compounds					Qvalue
6) Bromomethane	1.467	94	416	0.1233 ug/L	85
11) Carbon Disulfide	1.982	76	5076	0.4341 ug/L #	94
13) Iodomethane	2.066	142	539	2.0997 ug/L #	35
15) Methylene Chloride	2.414	84	1075	0.2600 ug/L	98
16) Acetone	2.469	43	30760	43.3726 ug/L	97
18) Methyl acetate	2.469	43	30757	16.5425 ug/L #	57
23) cis-1,2-Dichloroethene	3.737	96	1833	0.4365 ug/L	88
32) 2-Butanone	4.533	43	118424	112.0046 ug/L #	74
54) 2-Hexanone	7.892	43	1693	1.0406 ug/L	86

(#) = qualifier out of range (m) = manual integration (+) = signals summed

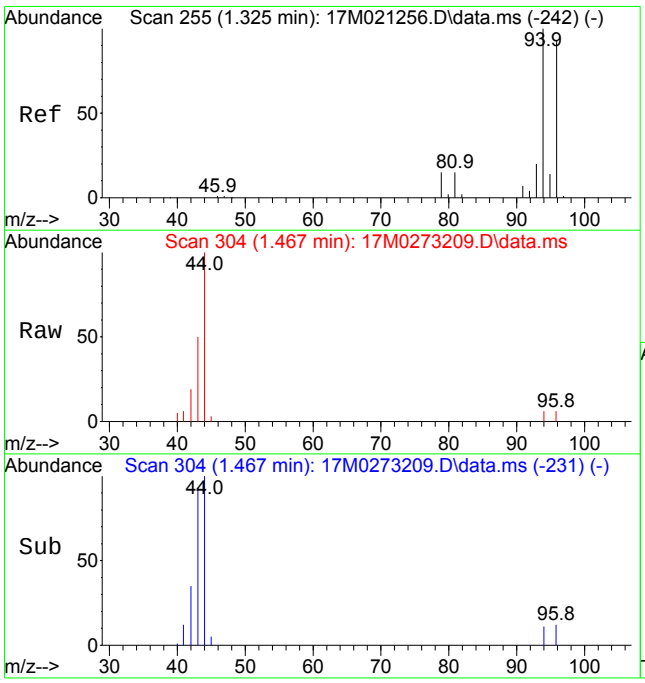
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273209.D Vial: 7
Acq On : 01 May 2017 14:08 Operator: ADC
Sample : L17041209-06 B 50X 826-SPE Inst : HPMS17
Misc : 1,50 W/AF (DARK AND FOAMY) Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



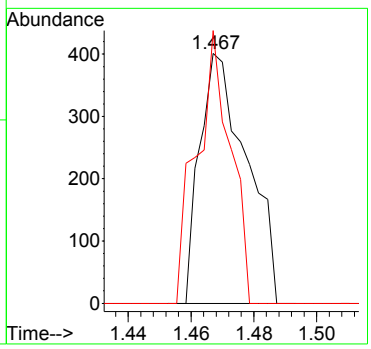
826VMS.M Tue May 02 08:55:53 2017 Page: 2

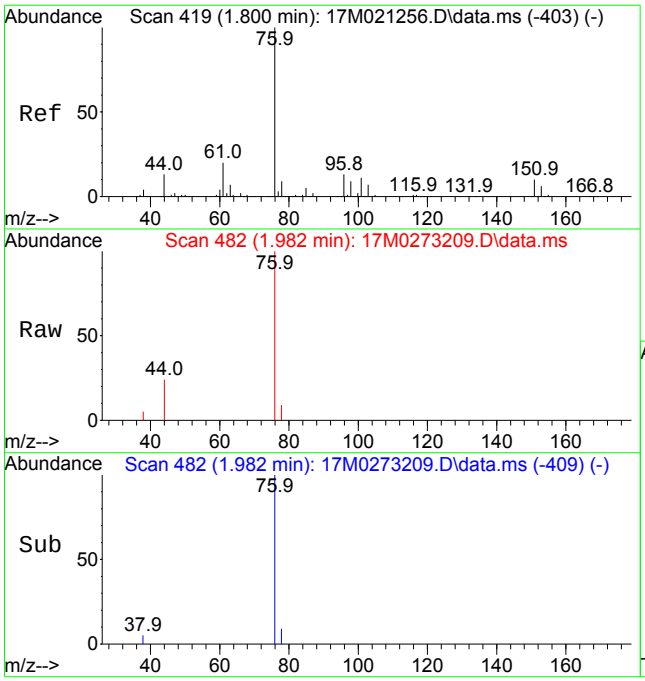


#6
Bromomethane
Concen: 0.1233 ug/L
RT: 1.467 min Scan# 304
Delta R.T. 0.012 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 94 Resp: 416

Ion	Ratio	Lower	Upper
94	100		
96	78.6	56.1	130.9

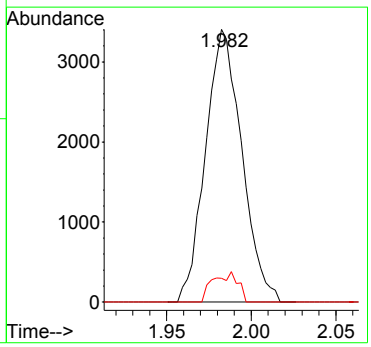


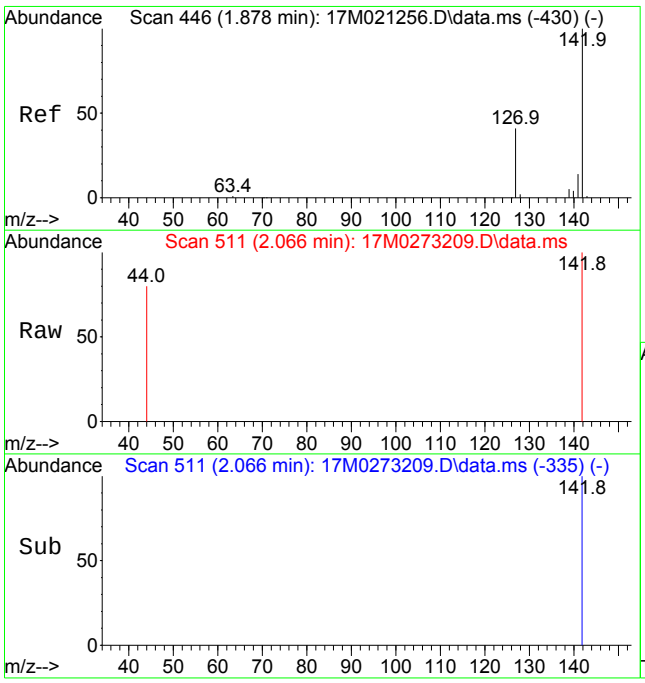


#11
Carbon Disulfide
Concen: 0.4341 ug/L
RT: 1.982 min Scan# 482
Delta R.T. 0.011 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 76 Resp: 5076

Ion	Ratio	Lower	Upper
76	100		
78	7.6	7.8	11.8#

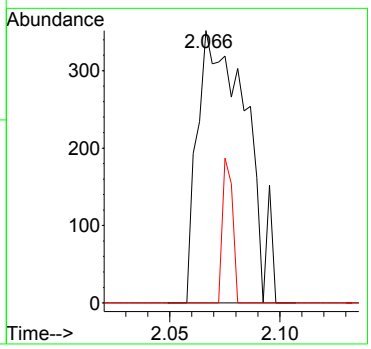


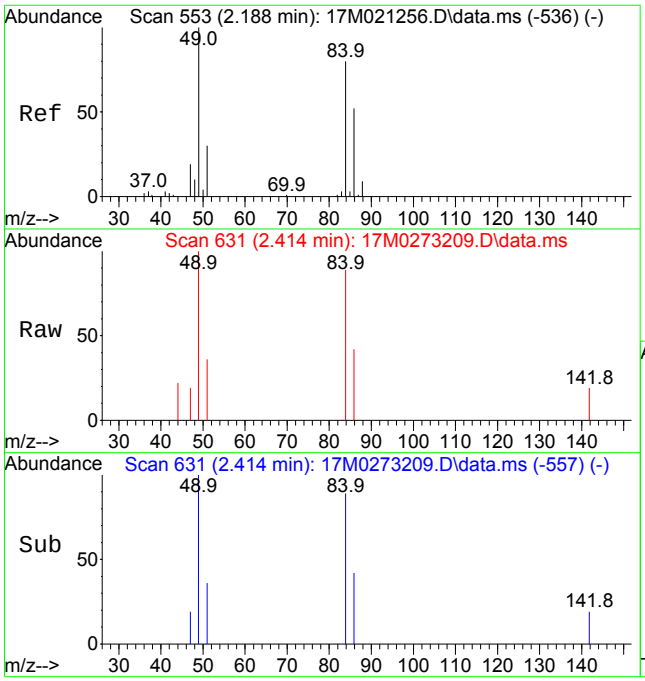


#13
Iodomethane
Concen: 2.0997 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion:142 Resp: 539

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

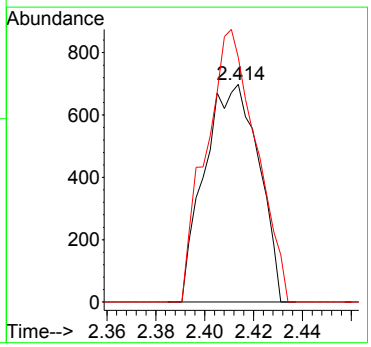


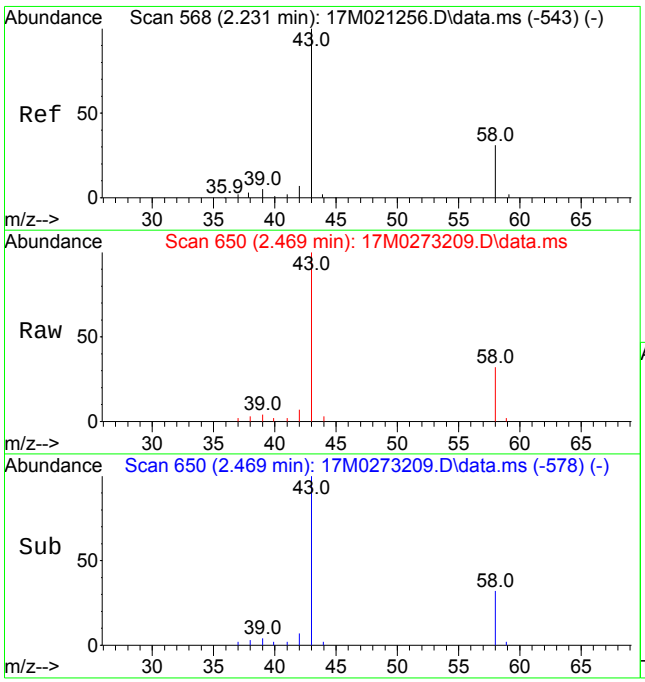


#15
Methylene Chloride
Concen: 0.2600 ug/L
RT: 2.414 min Scan# 631
Delta R.T. 0.015 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 84 Resp: 1075

Ion	Ratio	Lower	Upper
84	100		
49	116.2	91.3	136.9

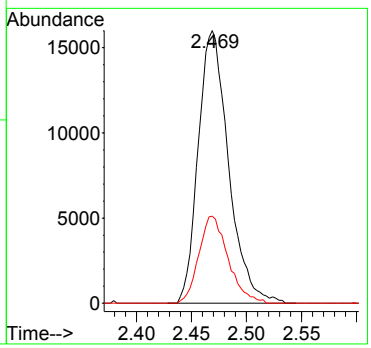


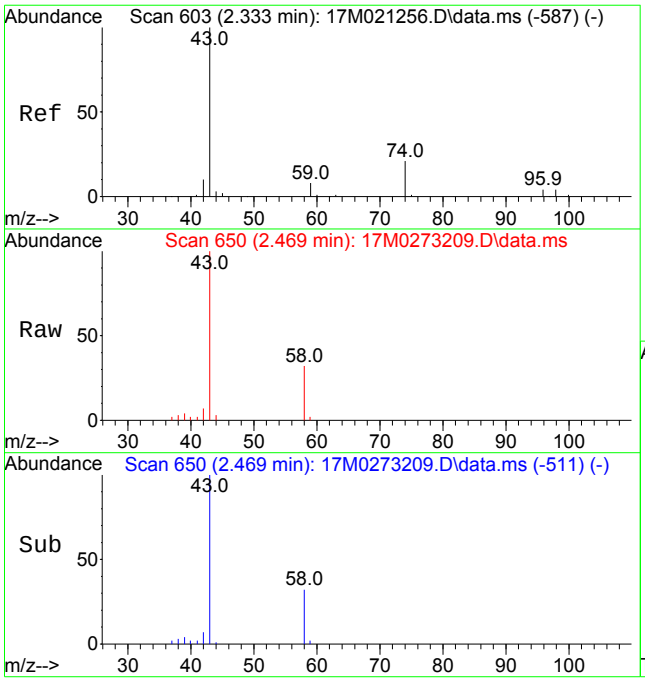


#16
Acetone
Concen: 43.3726 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 43 Resp: 30760

Ion	Ratio	Lower	Upper
43	100		
58	30.8	19.4	45.2

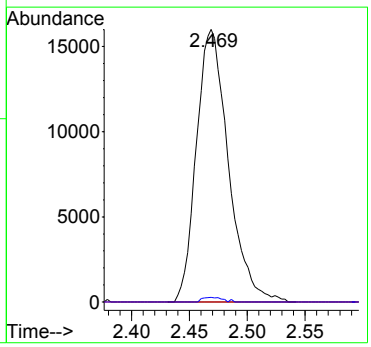


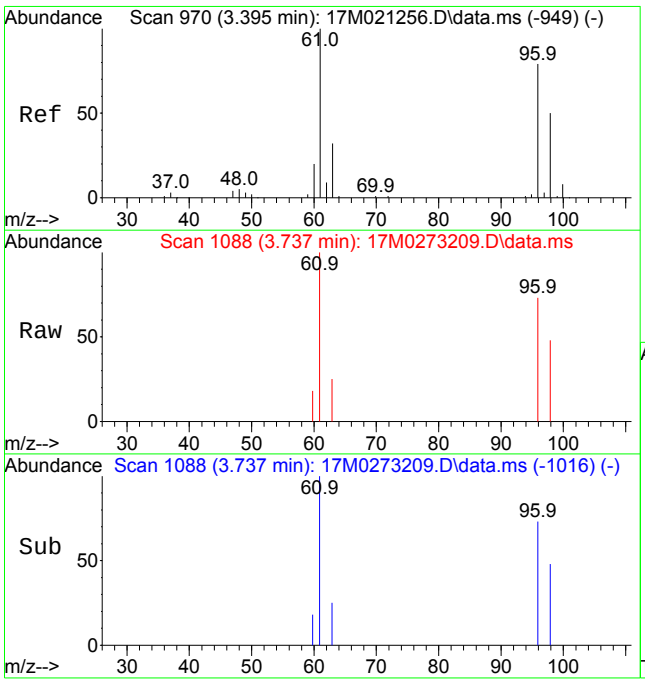


#18
Methyl acetate
Concen: 16.5425 ug/L
RT: 2.469 min Scan# 650
Delta R.T. -0.098 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 43 Resp: 30757

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	1.1	7.6	11.4#

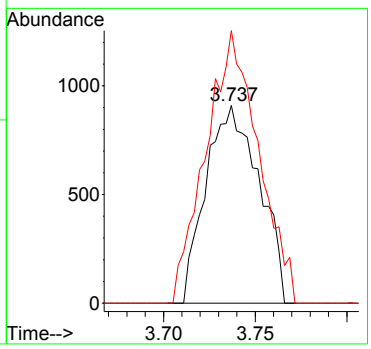


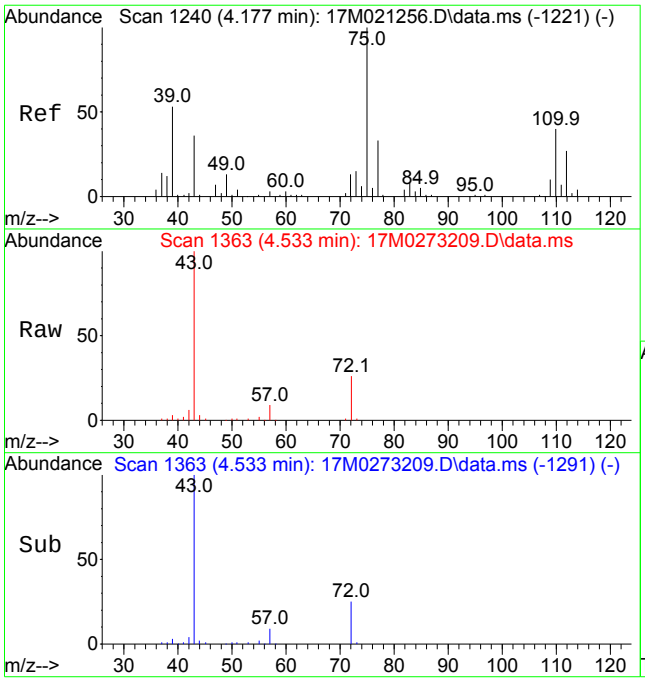


#23
cis-1,2-Dichloroethene
Concen: 0.4365 ug/L
RT: 3.737 min Scan# 1088
Delta R.T. 0.009 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 96 Resp: 1833

Ion	Ratio	Lower	Upper
96	100		
61	136.7	98.1	147.1

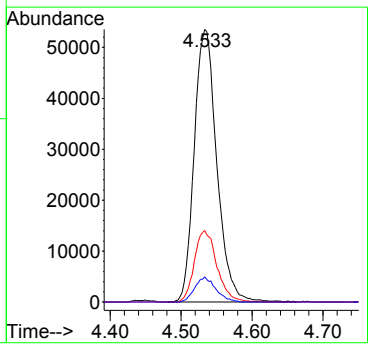


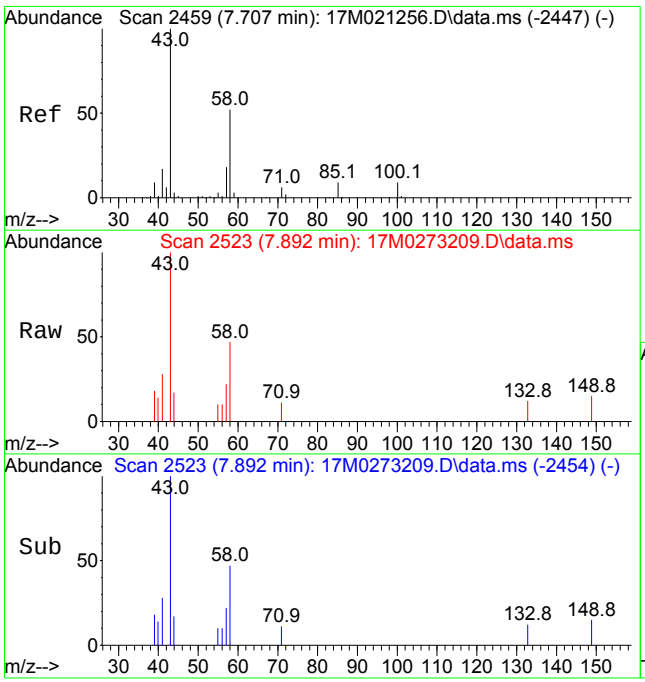


#32
2-Butanone
Concen: 112.0046 ug/L
RT: 4.533 min Scan# 1363
Delta R.T. 0.009 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 43 Resp: 118424

Ion	Ratio	Lower	Upper
43	100		
72	26.1	37.3	55.9#
57	8.5	6.9	10.3

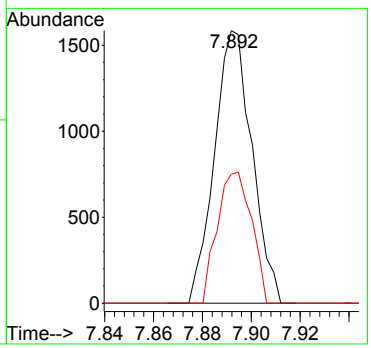




#54
2-Hexanone
Concen: 1.0406 ug/L
RT: 7.892 min Scan# 2523
Delta R.T. -0.000 min
Lab File: 17M0273209.D
Acq: 01 May 2017 14:08

Tgt Ion: 43 Resp: 1693

Ion	Ratio	Lower	Upper
43	100		
58	43.7	43.3	64.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273198.D Vial: 26
Acq On : 01 May 2017 00:10 Operator: ADC
Sample : L17041209-07 A 5X 826-SPE Inst : HPMS17
Misc : 1,5 dark foamy matrix. Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:14:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

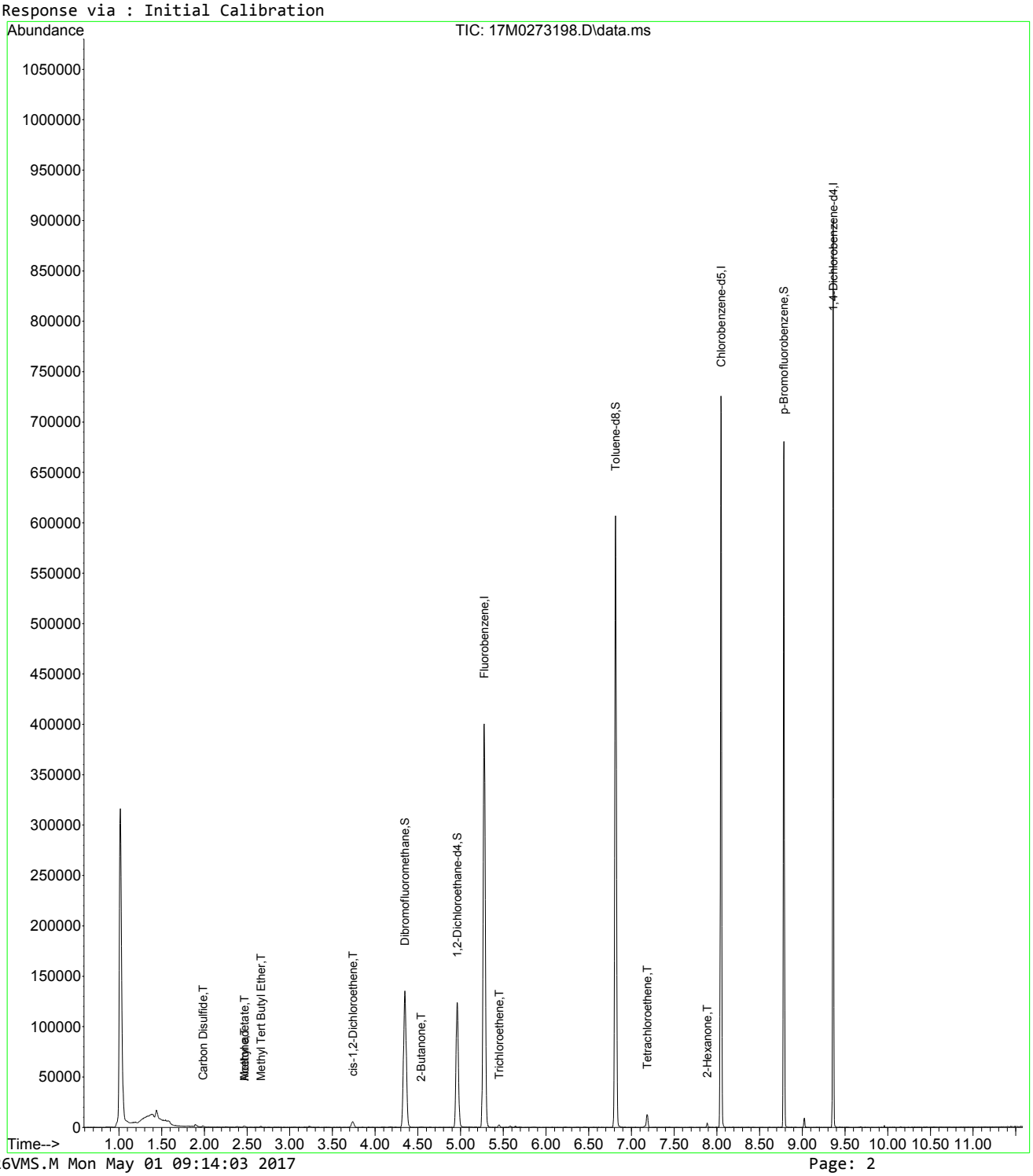
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	343757	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	252121	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	122347	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	95185	25.6390	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.556%			
34) 1,2-Dichloroethane-d4	4.962	65	90199	25.9207	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.683%			
47) Toluene-d8	6.815	98	326190	25.9242	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.697%			
66) p-Bromofluorobenzene	8.783	95	110289	26.9227	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.691%			
Target Compounds						Qvalue
11) Carbon Disulfide	1.985	76	1566	0.1374	ug/L #	73
16) Acetone	2.469	43	1480	2.1413	ug/L	91
18) Methyl acetate	2.469	43	1480	0.8168	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	1130	0.1232	ug/L #	54
23) cis-1,2-Dichloroethene	3.740	96	3188	0.7790	ug/L	96
32) 2-Butanone	4.536	43	441	0.4280	ug/L #	37
37) Trichloroethene	5.451	130	809	0.1839	ug/L #	71
49) Tetrachloroethene	7.185	166	3277	0.7269	ug/L	99
54) 2-Hexanone	7.889	43	511	0.3176	ug/L #	25

(#) = qualifier out of range (m) = manual integration (+) = signals summed

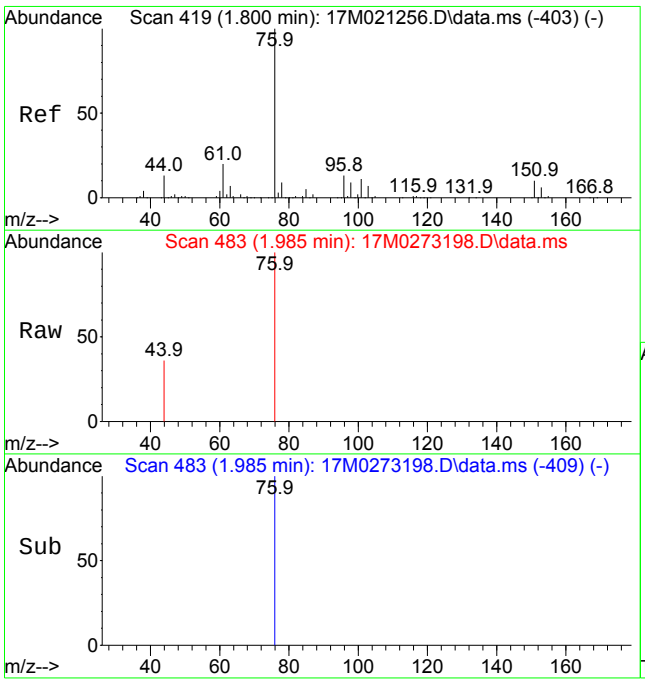
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273198.D Vial: 26
Acq On : 01 May 2017 00:10 Operator: ADC
Sample : L17041209-07 A 5X 826-SPE Inst : HPMS17
Misc : 1,5 dark foamy matrix. Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:14:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



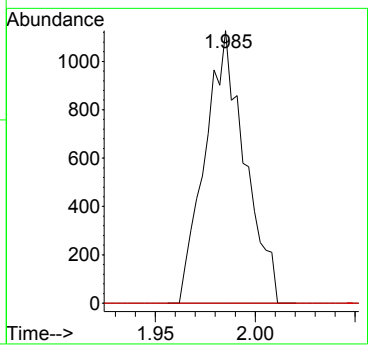
826VMS.M Mon May 01 09:14:03 2017 Page: 2

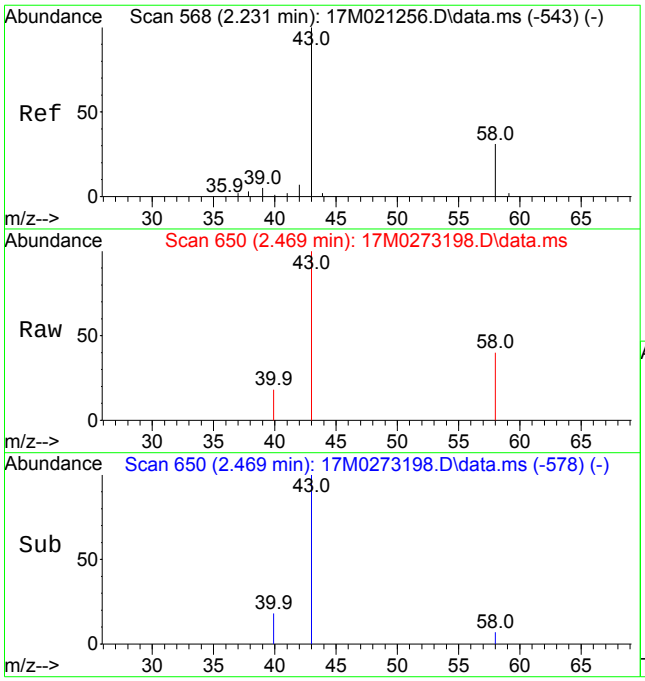


#11
Carbon Disulfide
Concen: 0.1374 ug/L
RT: 1.985 min Scan# 483
Delta R.T. 0.014 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 76 Resp: 1566

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

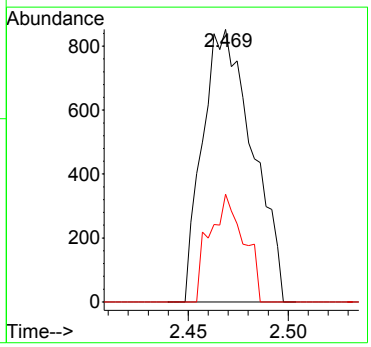


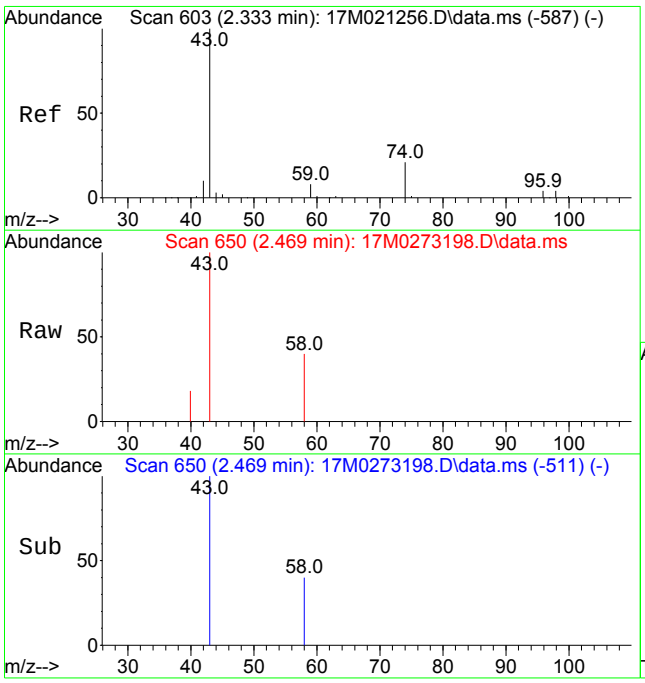


#16
Acetone
Concen: 2.1413 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 43 Resp: 1480

Ion	Ratio	Lower	Upper
43	100		
58	27.0	19.4	45.2

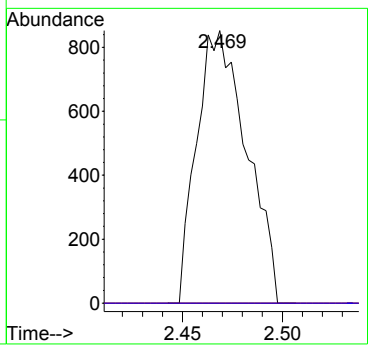


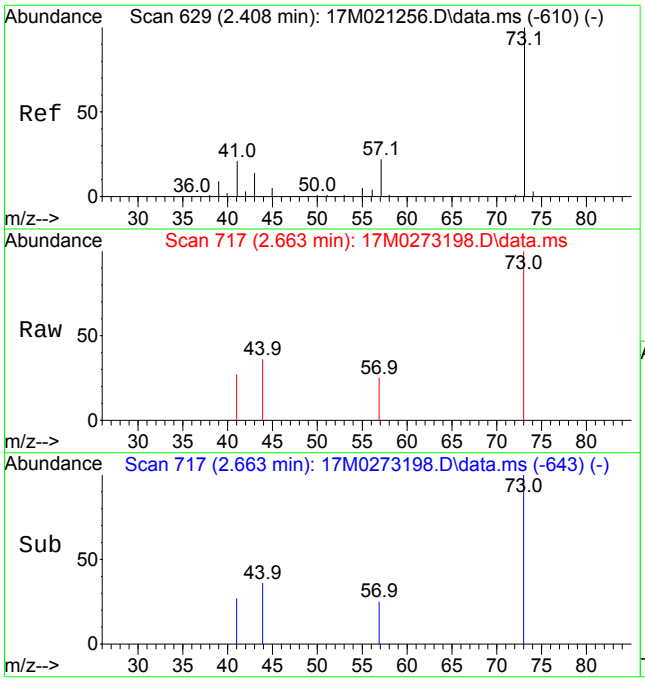


#18
Methyl acetate
Concen: 0.8168 ug/L
RT: 2.469 min Scan# 650
Delta R.T. -0.098 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 43 Resp: 1480

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

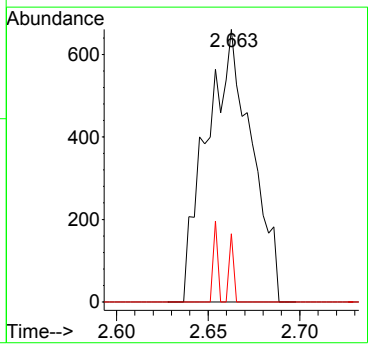


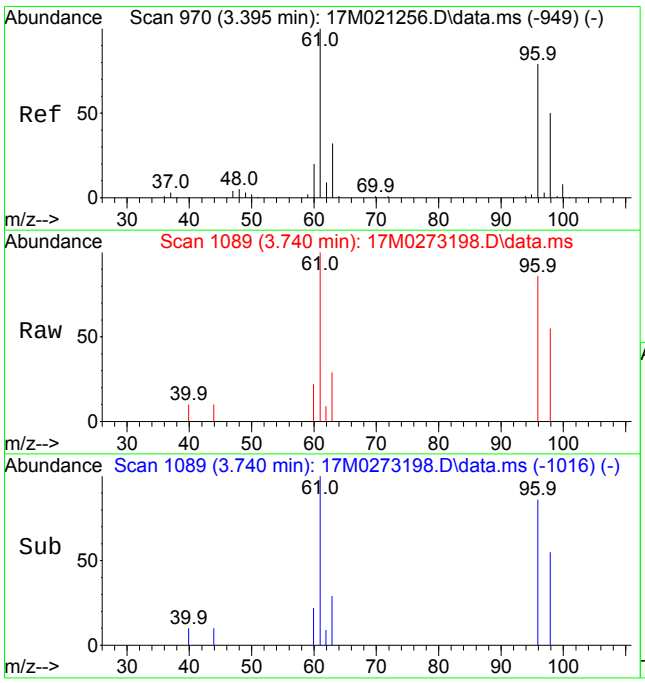


#19
Methyl Tert Butyl Ether
Concen: 0.1232 ug/L
RT: 2.663 min Scan# 717
Delta R.T. 0.015 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 73 Resp: 1130

Ion	Ratio	Lower	Upper
73	100		
57	0.0	17.6	26.4#

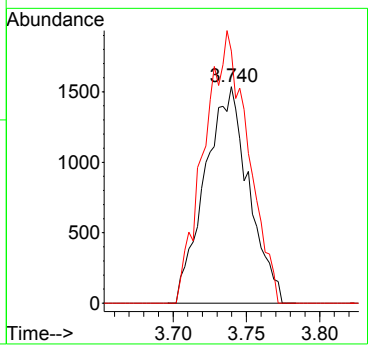


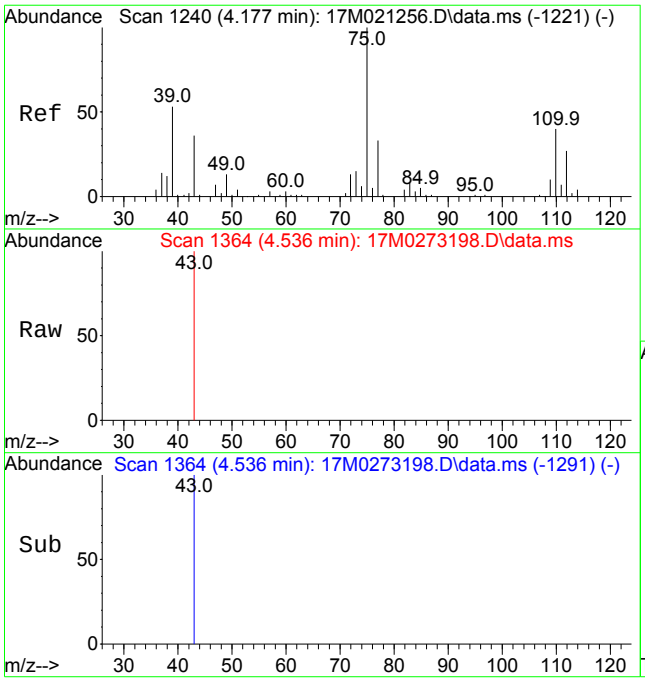


#23
cis-1,2-Dichloroethene
Concen: 0.7790 ug/L
RT: 3.740 min Scan# 1089
Delta R.T. 0.012 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 96 Resp: 3188

Ion	Ratio	Lower	Upper
96	100		
61	126.7	98.1	147.1

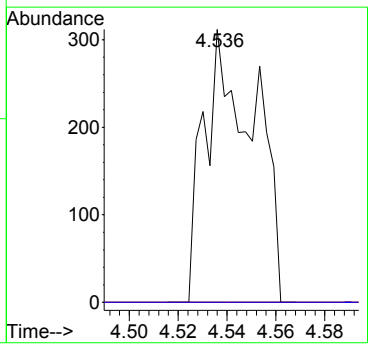


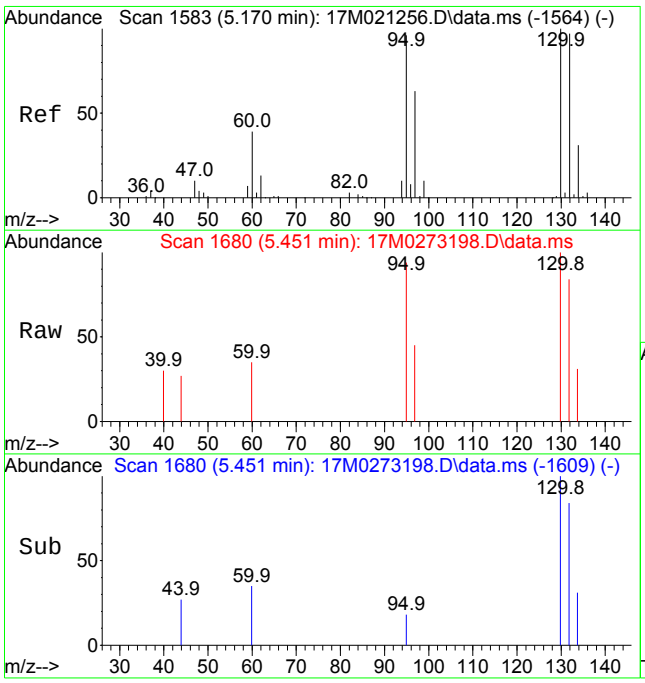


#32
2-Butanone
Concen: 0.4280 ug/L
RT: 4.536 min Scan# 1364
Delta R.T. 0.012 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 43 Resp: 441

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

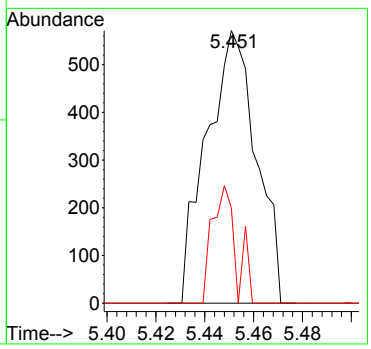


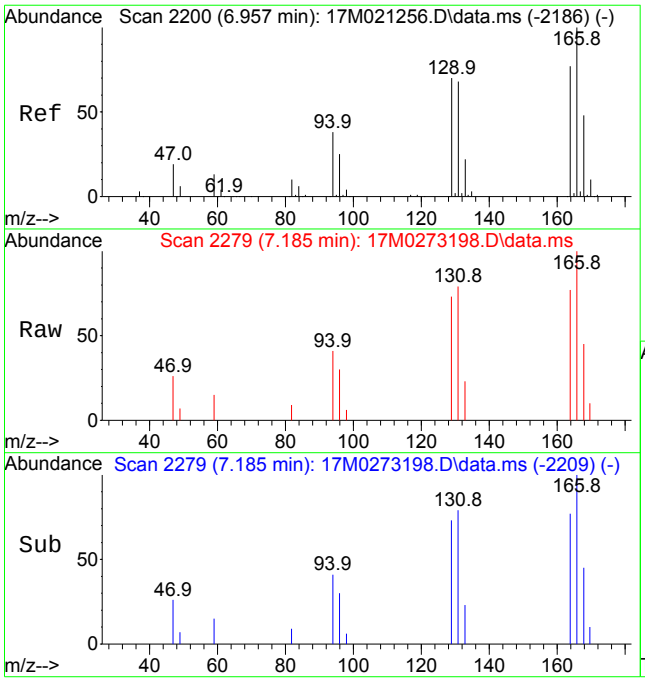


#37
Trichloroethene
Concen: 0.1839 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion:130 Resp: 809

Ion	Ratio	Lower	Upper
130	100		
60	20.8	22.9	53.3#

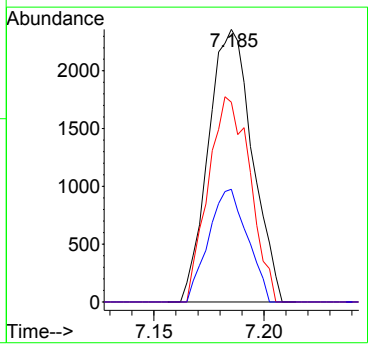


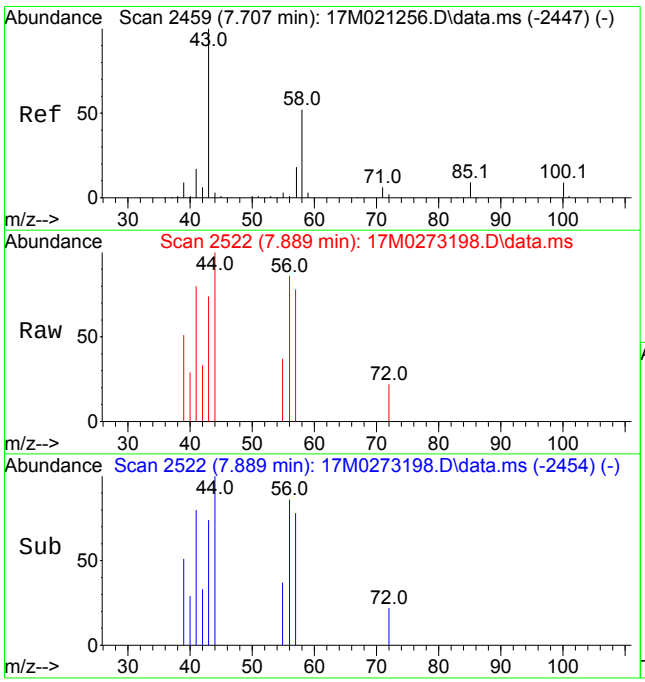


#49
Tetrachloroethene
Concen: 0.7269 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion:166 Resp: 3277

Ion	Ratio	Lower	Upper
166	100		
129	71.6	56.2	84.4
94	36.5	29.7	44.5

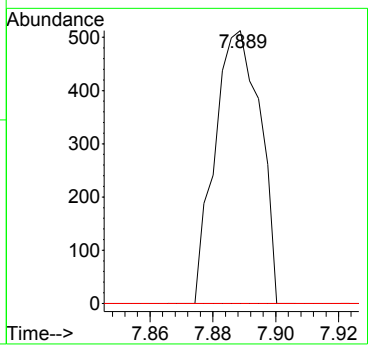




#54
2-Hexanone
Concen: 0.3176 ug/L
RT: 7.889 min Scan# 2522
Delta R.T. -0.003 min
Lab File: 17M0273198.D
Acq: 01 May 2017 00:10

Tgt Ion: 43 Resp: 511

Ion	Ratio	Lower	Upper
43	100		
58	0.0	43.3	64.9#



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17878.D Vial: 10
Acq On : 29 Apr 2017 23:18 Operator: TMB
Sample : L17041209-08 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:01 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

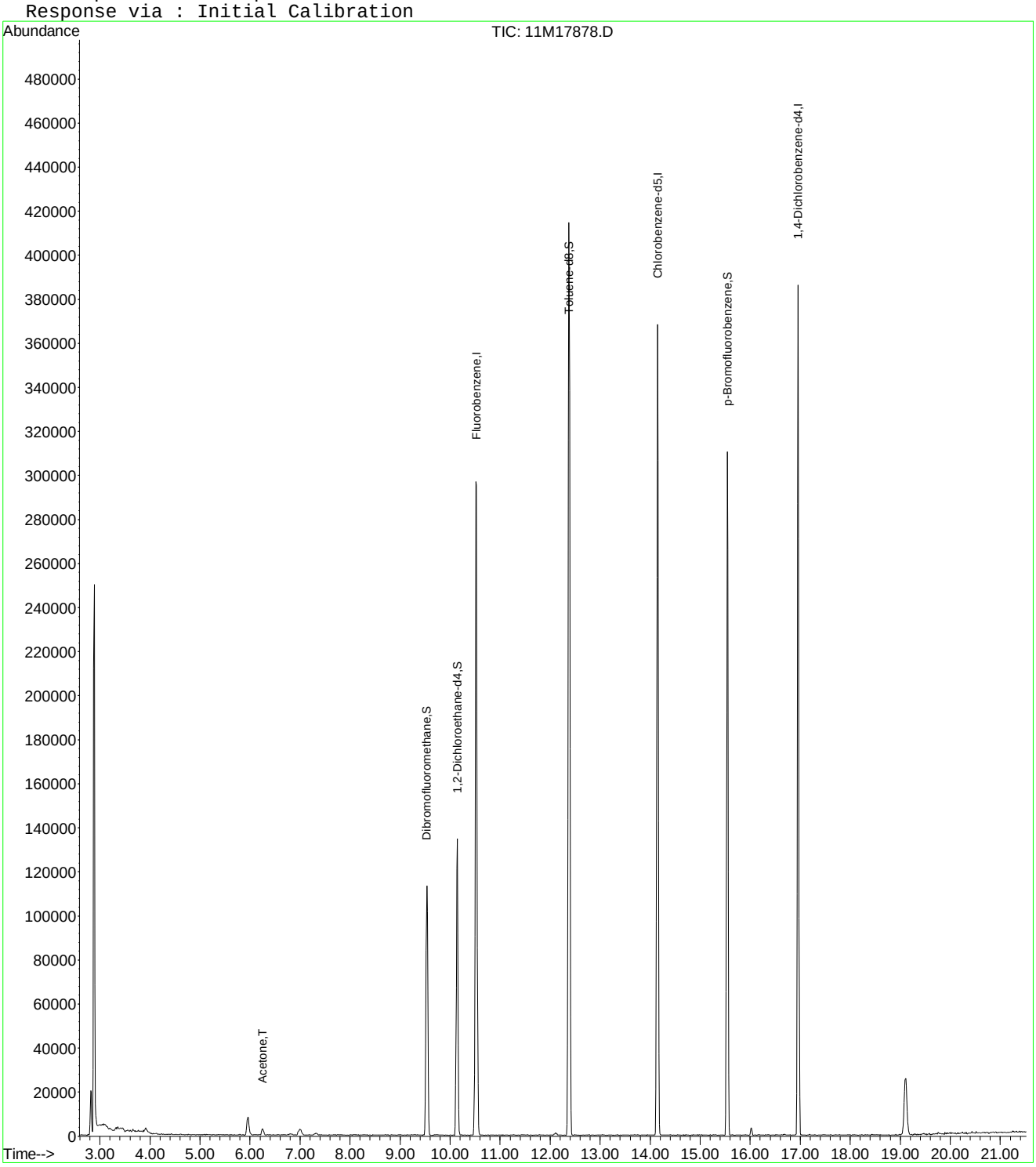
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	353695	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	249519	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	127699	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	92759	26.4766	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.92%			
43) 1,2-Dichloroethane-d4	10.14	65	108473	26.6805	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.72%			
57) Toluene-d8	12.38	98	351697	27.1451	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.60%			
78) p-Bromofluorobenzene	15.54	95	127043	28.6231	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 114.48%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1028	Below Cal		77
13) Acetone	6.25	43	5369	4.5399	ug/L	94

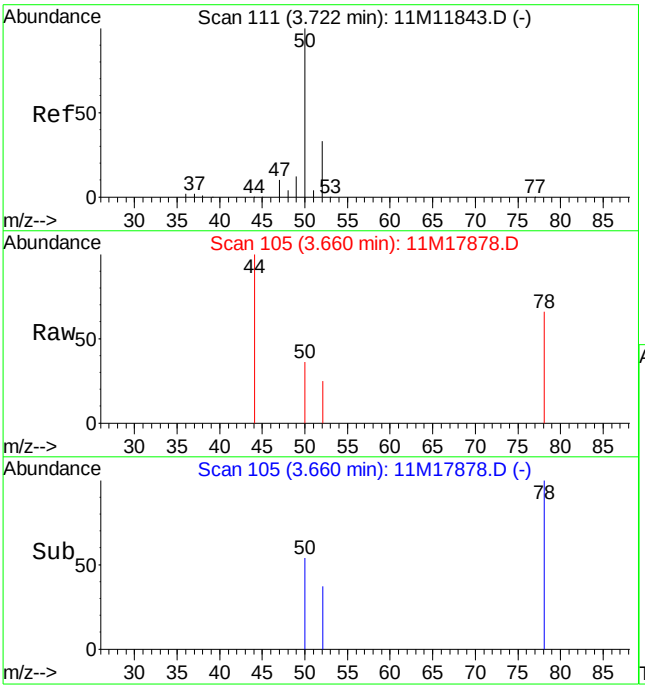
(#) = qualifier out of range (m) = manual integration
11M17878.D 8260WT.M Sun Apr 30 12:52:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17878.D Vial: 10
Acq On : 29 Apr 2017 23:18 Operator: TMB
Sample : L17041209-08 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

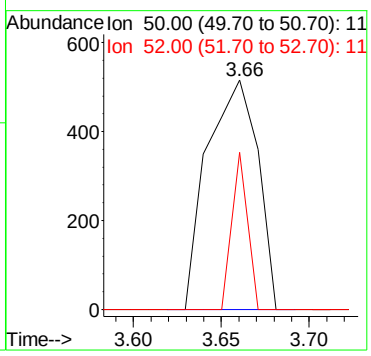


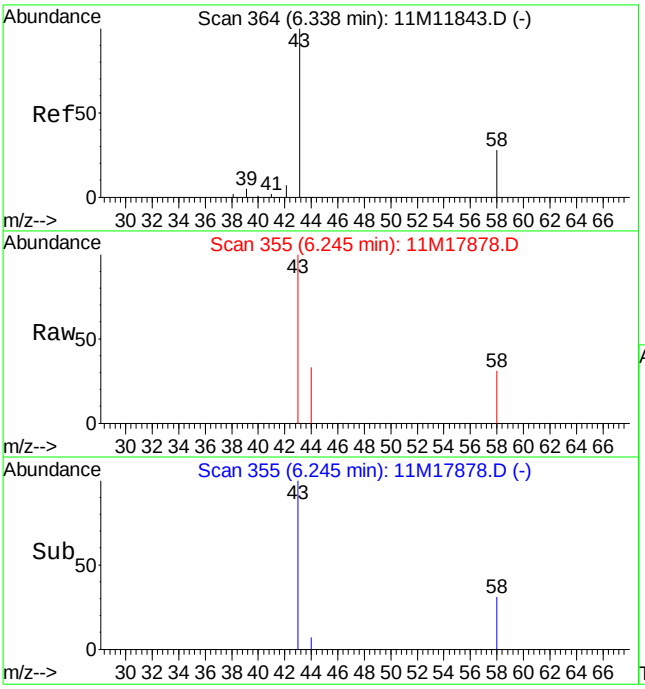


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17878.D
Acq: 29 Apr 2017 23:18

Tgt Ion: 50 Resp: 1028

Ion	Ratio	Lower	Upper
50	100		
52	21.3	20.8	48.6

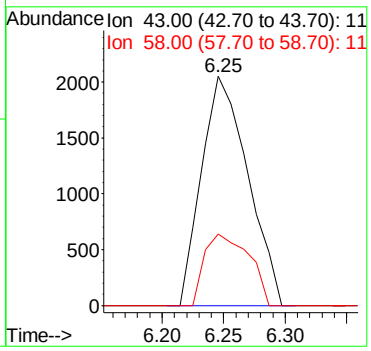




#13
Acetone
Concen: 4.54 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17878.D
Acq: 29 Apr 2017 23:18

Tgt Ion: 43 Resp: 5369

Ion	Ratio	Lower	Upper
43	100		
58	29.9	20.1	46.9



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17879.D Vial: 11
Acq On : 29 Apr 2017 23:48 Operator: TMB
Sample : L17041209-09 A EB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

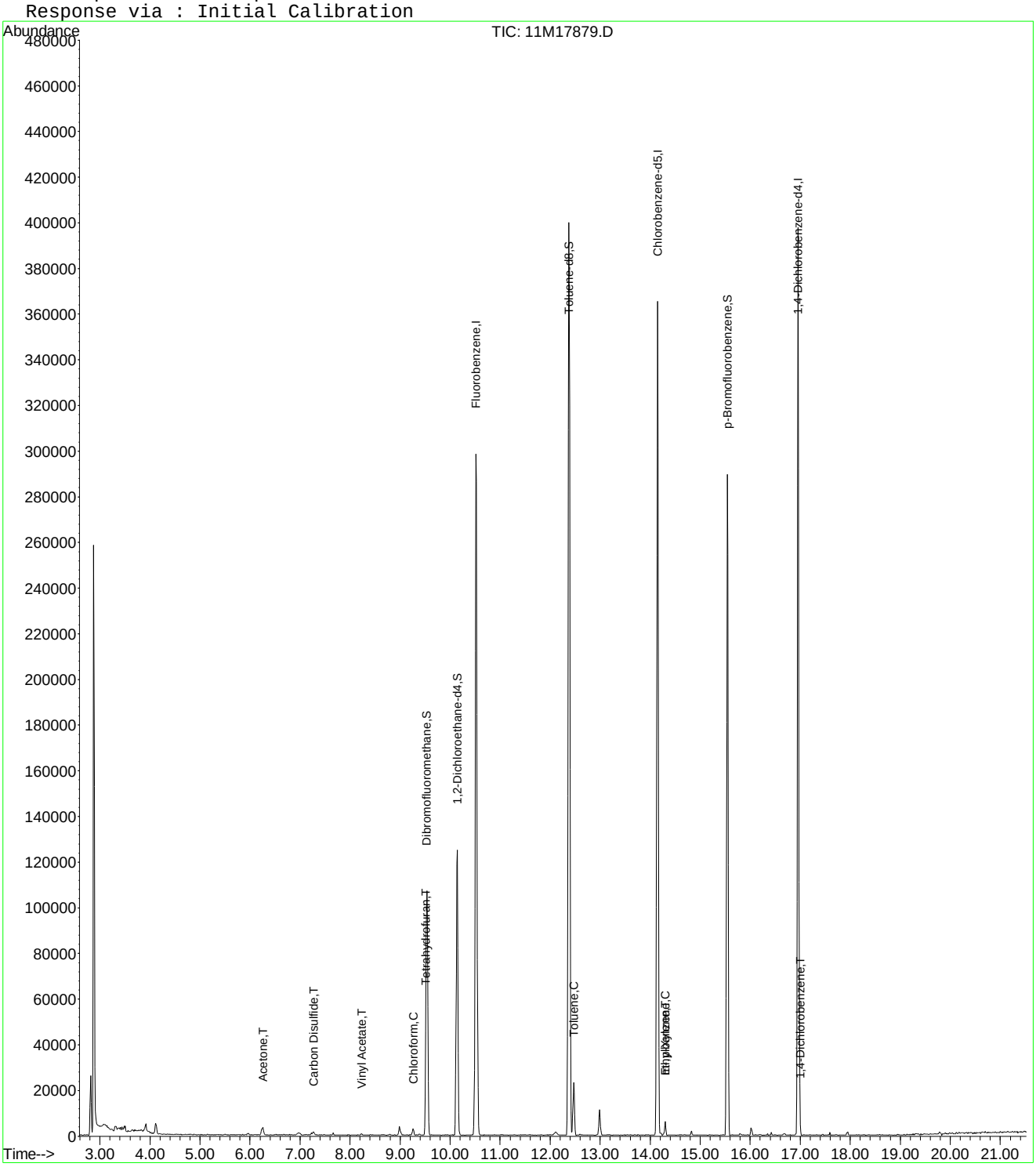
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	354480	25.00 ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	249331	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	131459	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	87518	24.9253 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.72%		
43) 1,2-Dichloroethane-d4	10.14	65	106644	26.1725 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.68%		
57) Toluene-d8	12.38	98	340281	26.2838 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.12%		
78) p-Bromofluorobenzene	15.54	95	120616	26.3978 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.60%		
Target Compounds					Qvalue
3) Chloromethane	3.65	50	936	Below Cal #	75
13) Acetone	6.26	43	6500	5.4841 ug/L	97
20) Carbon Disulfide	7.27	76	2382	0.2201 ug/L #	73
26) Vinyl Acetate	8.23	43	902	0.1254 ug/L #	78
33) Chloroform	9.26	83	3140	0.2952 ug/L	90
36) Tetrahydrofuran	9.51	42	218	0.1382 ug/L #	41
58) Toluene	12.47	91	22973	1.4231 ug/L	96
70) Ethylbenzene	14.30	106	2645	0.4872 ug/L	62
71) m-,p-Xylene	14.30	106	2645	0.4072 ug/L	73
92) 1,4-Dichlorobenzene	17.00	146	1728	0.2014 ug/L #	1

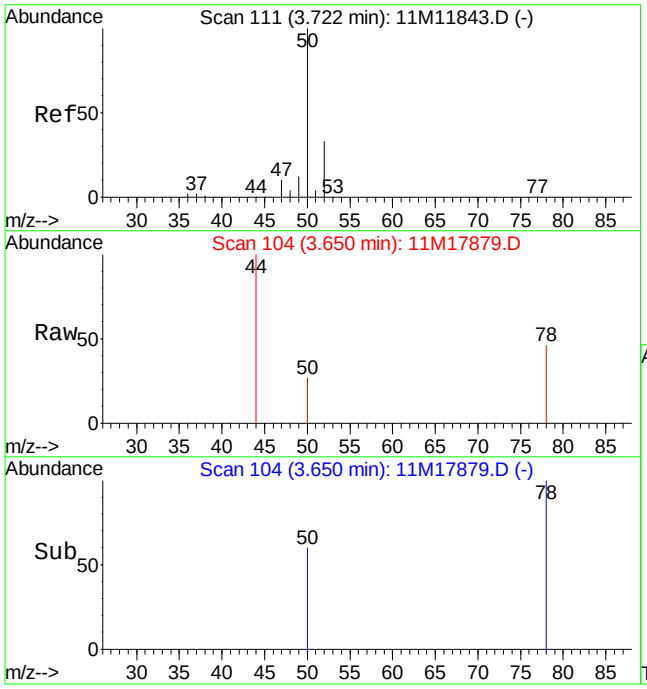
(#) = qualifier out of range (m) = manual integration
11M17879.D 8260WT.M Sun Apr 30 12:52:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17879.D Vial: 11
Acq On : 29 Apr 2017 23:48 Operator: TMB
Sample : L17041209-09 A EB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

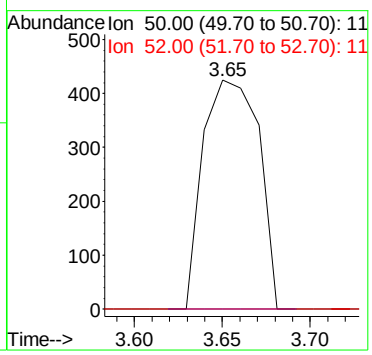


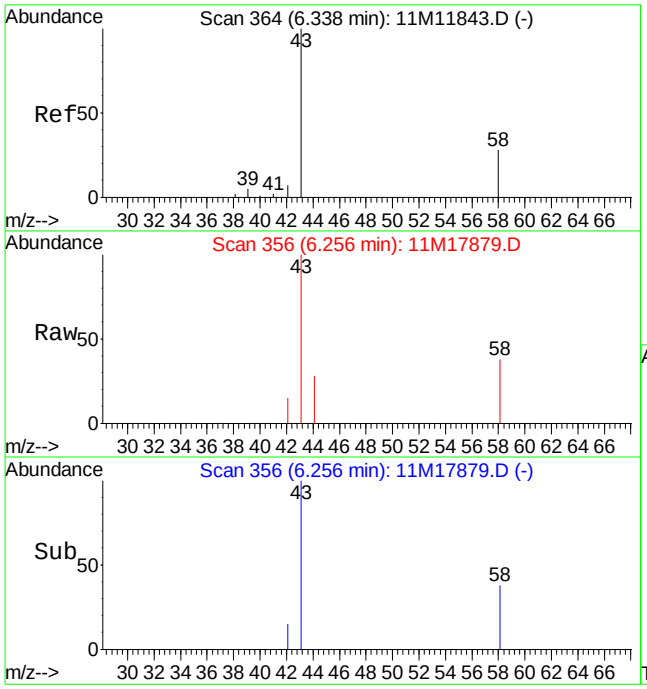


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 50 Resp: 936

Ion	Ratio	Lower	Upper
50	100		
52	20.3	20.8	48.6#

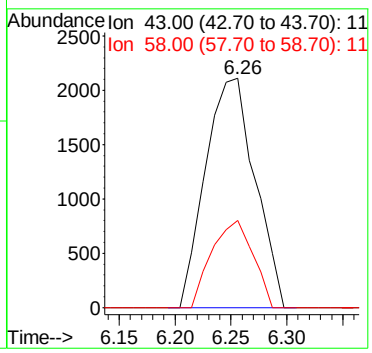


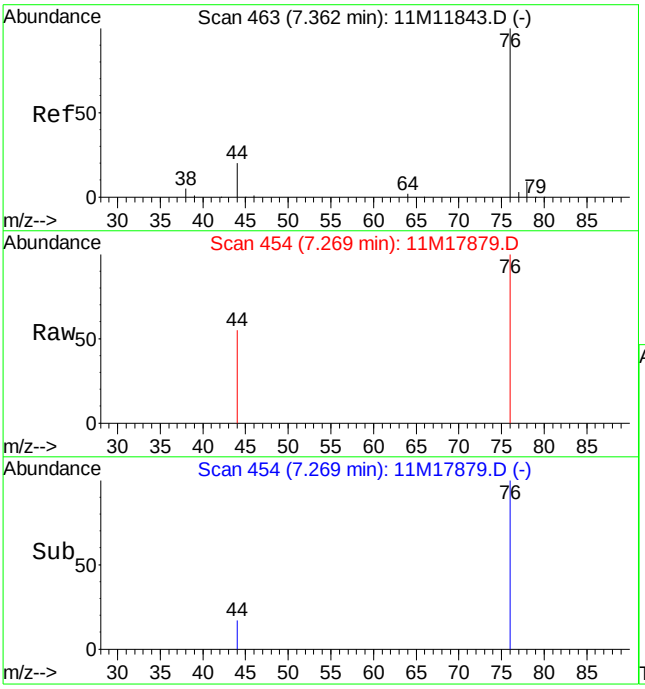


#13
Acetone
Concen: 5.48 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 43 Resp: 6500

Ion	Ratio	Lower	Upper
43	100		
58	31.7	20.1	46.9

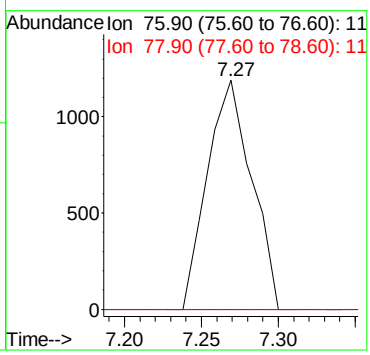


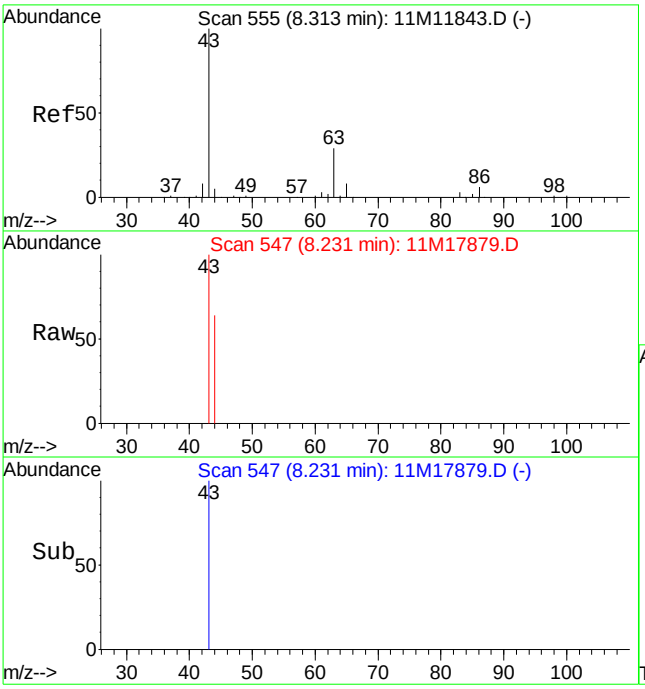


#20
Carbon Disulfide
Concen: 0.22 ug/L
RT: 7.27 min Scan# 454
Delta R.T. -0.01 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 76 Resp: 2382

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

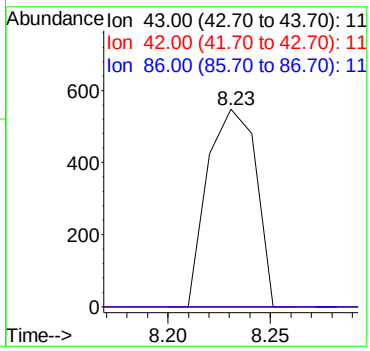


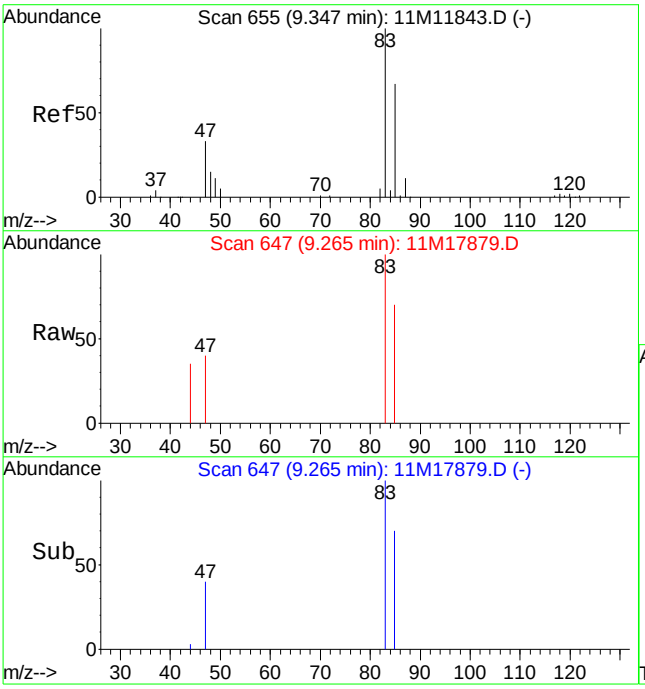


#26
Vinyl Acetate
Concen: 0.13 ug/L
RT: 8.23 min Scan# 547
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 43 Resp: 902

Ion	Ratio	Lower	Upper
43	100		
42	0.0	4.7	10.9#
86	0.0	4.7	10.9#

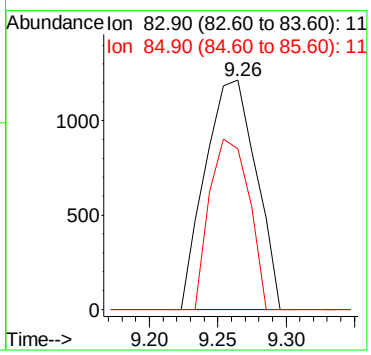


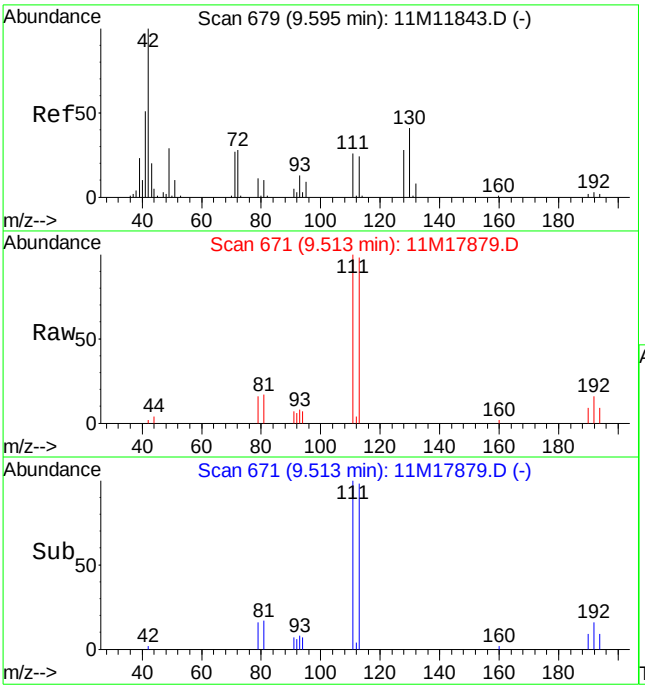


#33
Chloroform
Concen: 0.30 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 83 Resp: 3140

Ion	Ratio	Lower	Upper
83	100		
85	57.8	39.4	92.0

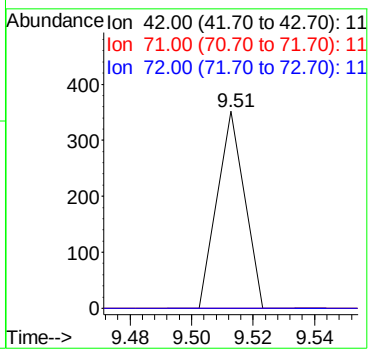


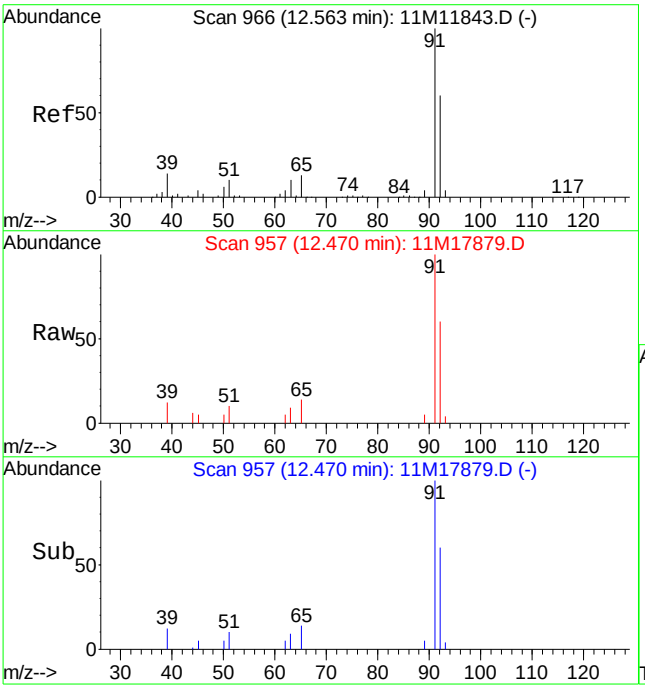


#36
Tetrahydrofuran
Concen: 0.14 ug/L
RT: 9.51 min Scan# 671
Delta R.T. 0.01 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 42 Resp: 218

Ion	Ratio	Lower	Upper
42	100		
71	0.0	19.0	44.2#
72	0.0	20.8	48.4#

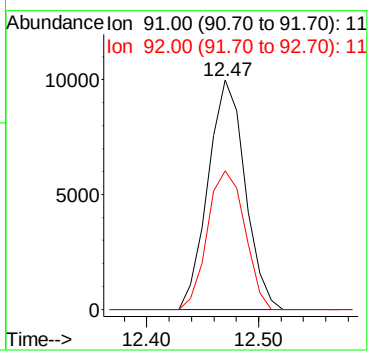


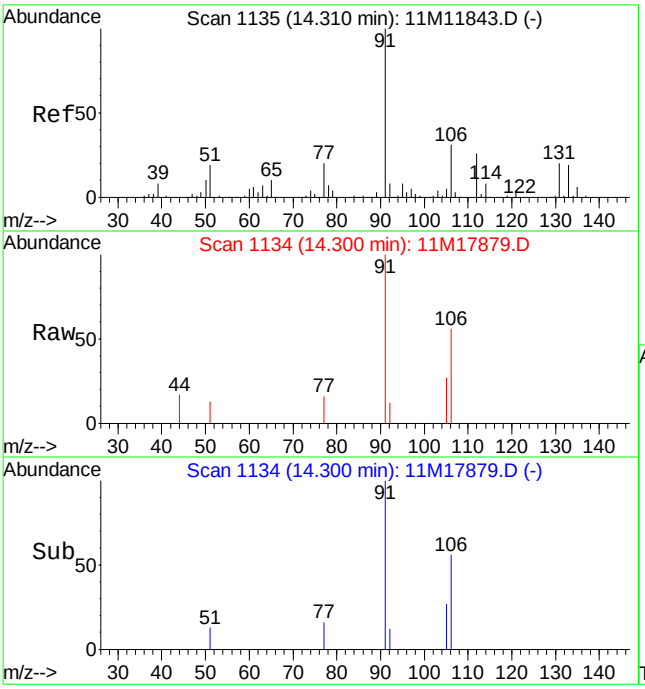


#58
Toluene
Concen: 1.42 ug/L
RT: 12.47 min Scan# 957
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion: 91 Resp: 22973

Ion	Ratio	Lower	Upper
91	100		
92	60.8	38.2	89.2

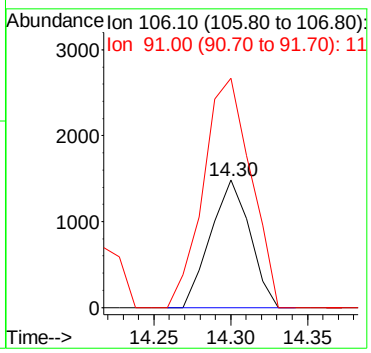


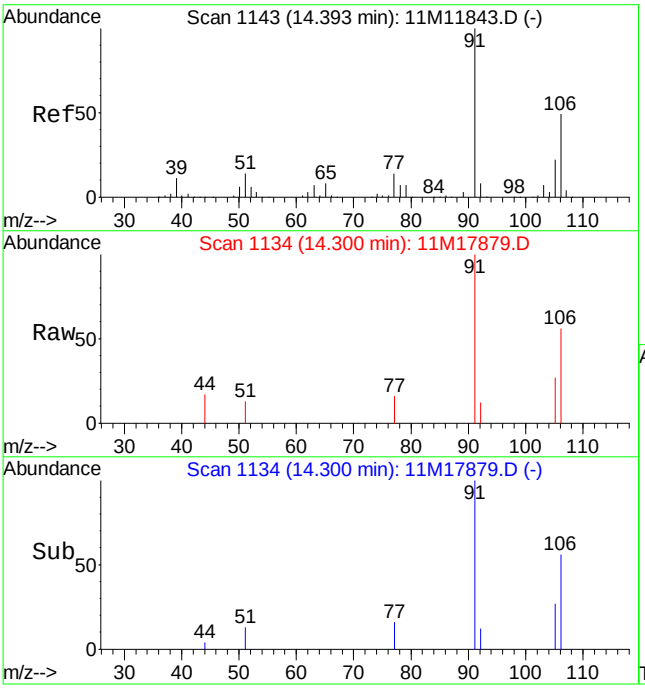


#70
Ethylbenzene
Concen: 0.49 ug/L
RT: 14.30 min Scan# 1134
Delta R.T. 0.08 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion:106 Resp: 2645

Ion	Ratio	Lower	Upper
106	100		
91	217.2	174.7	407.7

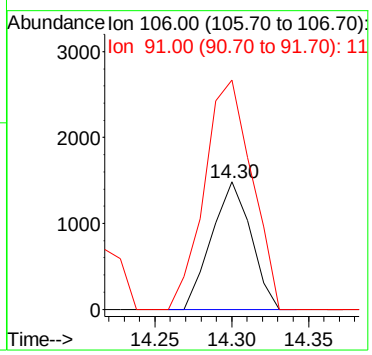


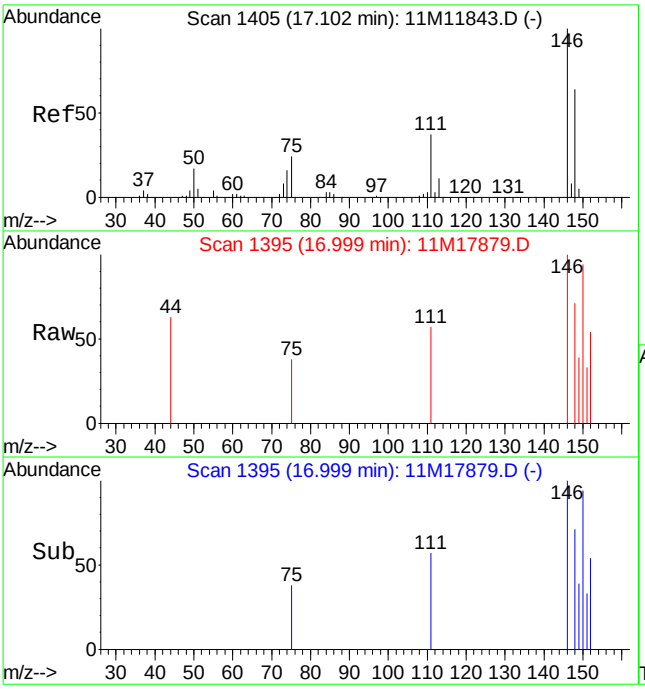


#71
m-,p-Xylene
Concen: 0.41 ug/L
RT: 14.30 min Scan# 1134
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion:106 Resp: 2645

Ion	Ratio	Lower	Upper
106	100		
91	217.2	107.7	251.3

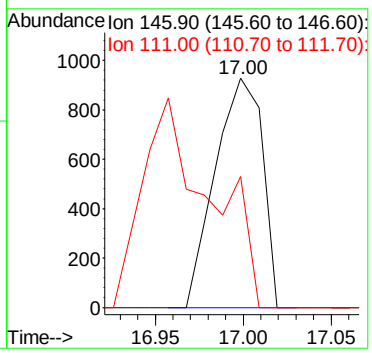




#92
1,4-Dichlorobenzene
Concen: 0.20 ug/L
RT: 17.00 min Scan# 1395
Delta R.T. 0.00 min
Lab File: 11M17879.D
Acq: 29 Apr 2017 23:48

Tgt Ion:146 Resp: 1728

Ion	Ratio	Lower	Upper
146	100		
111	131.0	22.9	53.5#



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

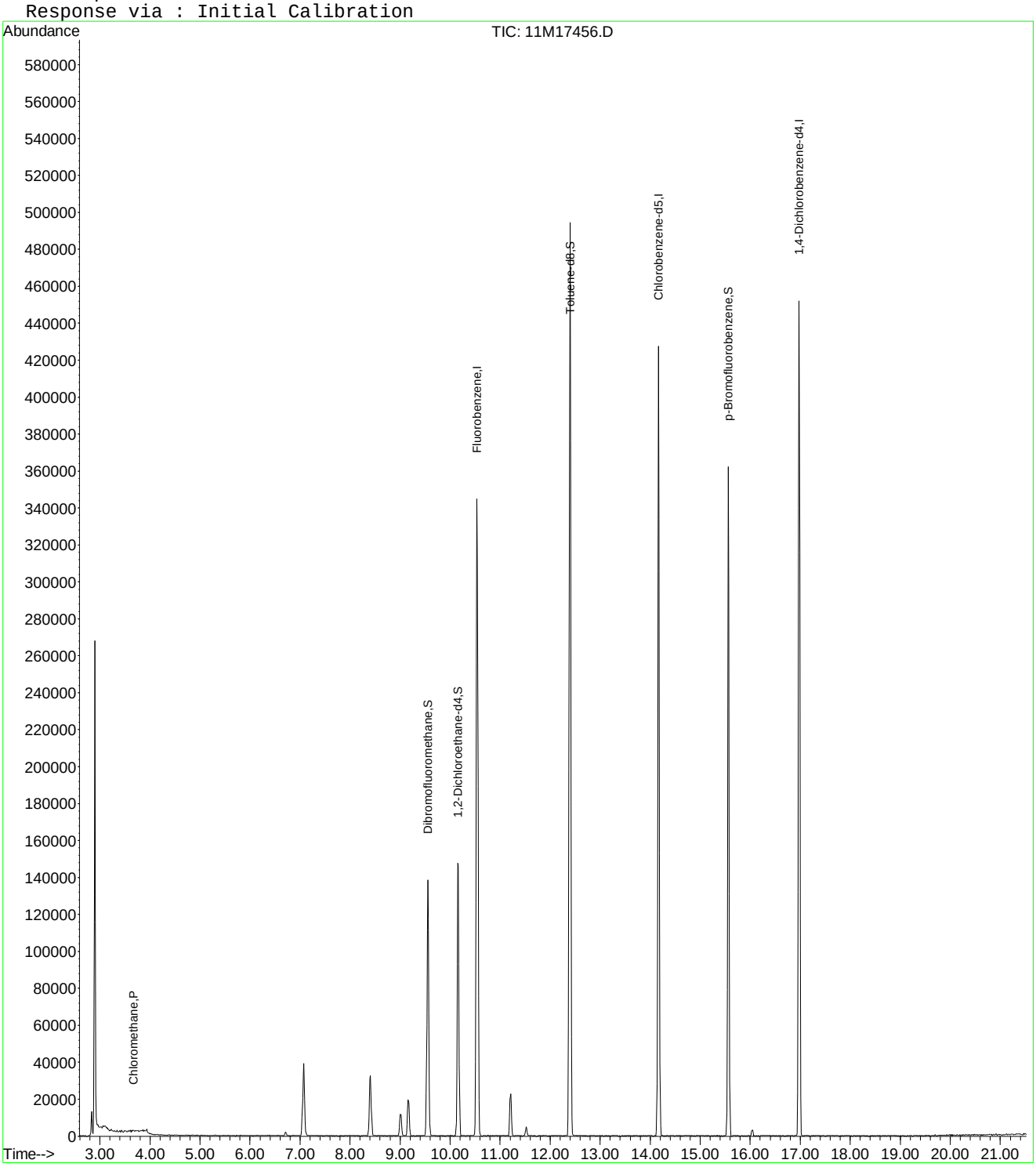
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	109363	26.4089	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.15	65	126342	23.9108	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.64%			
57) Toluene-d8	12.40	98	415624	26.0292	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.12%			
78) p-Bromofluorobenzene	15.56	95	145423	23.2743	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.08%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1126	0.1407	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17456.D 8260WT.M Tue Apr 11 19:13:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:48 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

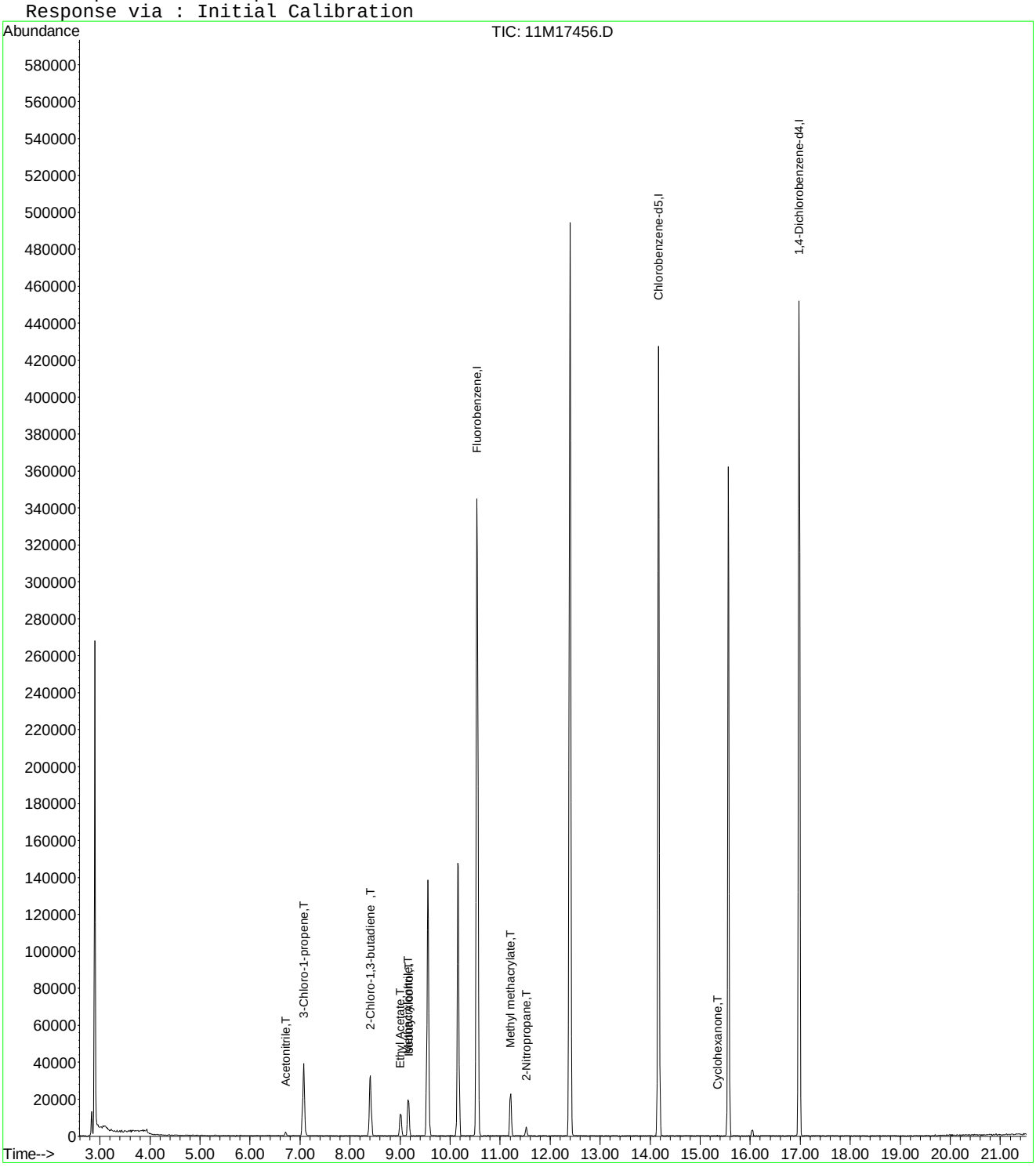
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	2655	3.9469	ug/L	#	57
3) 3-Chloro-1-propene	7.07	41	42597	5.3245	ug/L		83
4) 2-Chloro-1,3-butadiene	8.41	53	33819	4.8784	ug/L		86
5) Methacrylonitrile	9.16	41	14534	4.5257	ug/L		73
6) Isobutyl Alcohol	9.17	43	1353	5.8827	ug/L		86
8) Cyclohexanone	15.34	55	188	24.3163	ug/L	#	19
9) 2-Nitropropane	11.52	43	4060	3.3583	ug/L		100
10) Ethyl Acetate	9.01	43	20309	4.6970	ug/L	#	94
11) Methyl methacrylate	11.21	41	17318	4.3466	ug/L		80

(#) = qualifier out of range (m) = manual integration
11M17456.D A9FOOWT.M Fri Apr 21 13:34:48 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	3.9469	21.1	0	0.00
3	T	3-Chloro-1-propene	5.0000	5.3245	-6.5	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.8784	2.4	100	0.00
5	T	Methacrylonitrile	5.0000	4.5257	9.5	100	0.00
6	T	Isobutyl Alcohol	-1.0000	5.8827	0.0	100	0.00
7	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.04#
8	T	Cyclohexanone	-1.0000	24.3163	0.0	0	0.00
9	T	2-Nitropropane	-1.0000	3.3583	0.0	100	0.00
10	T	Ethyl Acetate	5.0000	4.6970	6.1	100	0.00
11	T	Methyl methacrylate	5.0000	4.3466	13.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17456.D A9FOOWT.M Fri Apr 21 13:37:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42:41 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

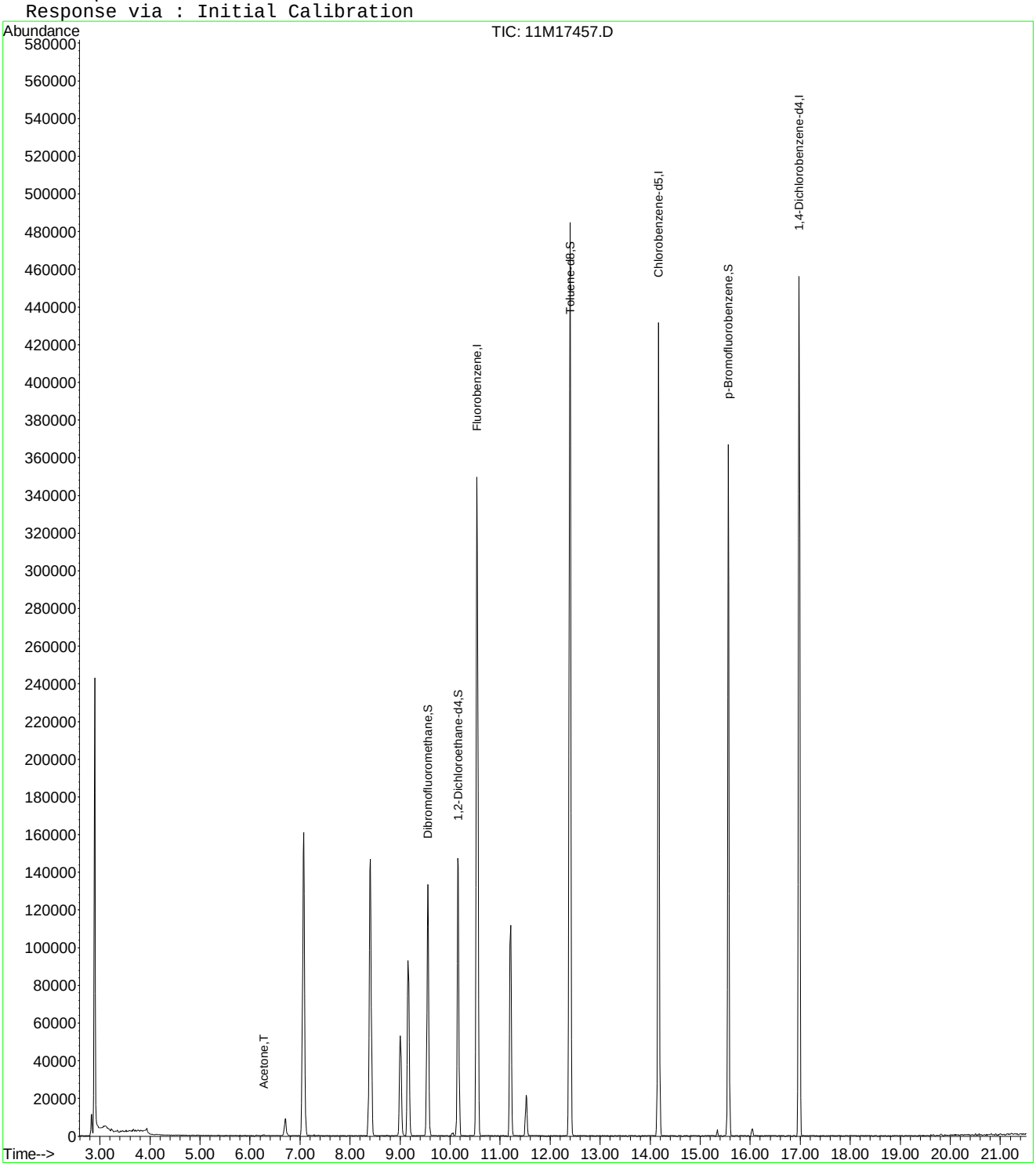
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108479	25.9785	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.92%			
43) 1,2-Dichloroethane-d4	10.16	65	125288	23.5150	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.04%			
57) Toluene-d8	12.40	98	409577	25.2978	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.20%			
78) p-Bromofluorobenzene	15.56	95	144896	23.3830	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.52%			
Target Compounds						Qvalue
13) Acetone	6.28	43	637	0.3936	ug/L #	46

(#) = qualifier out of range (m) = manual integration
11M17457.D 8260WT.M Tue Apr 11 19:42:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:49 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

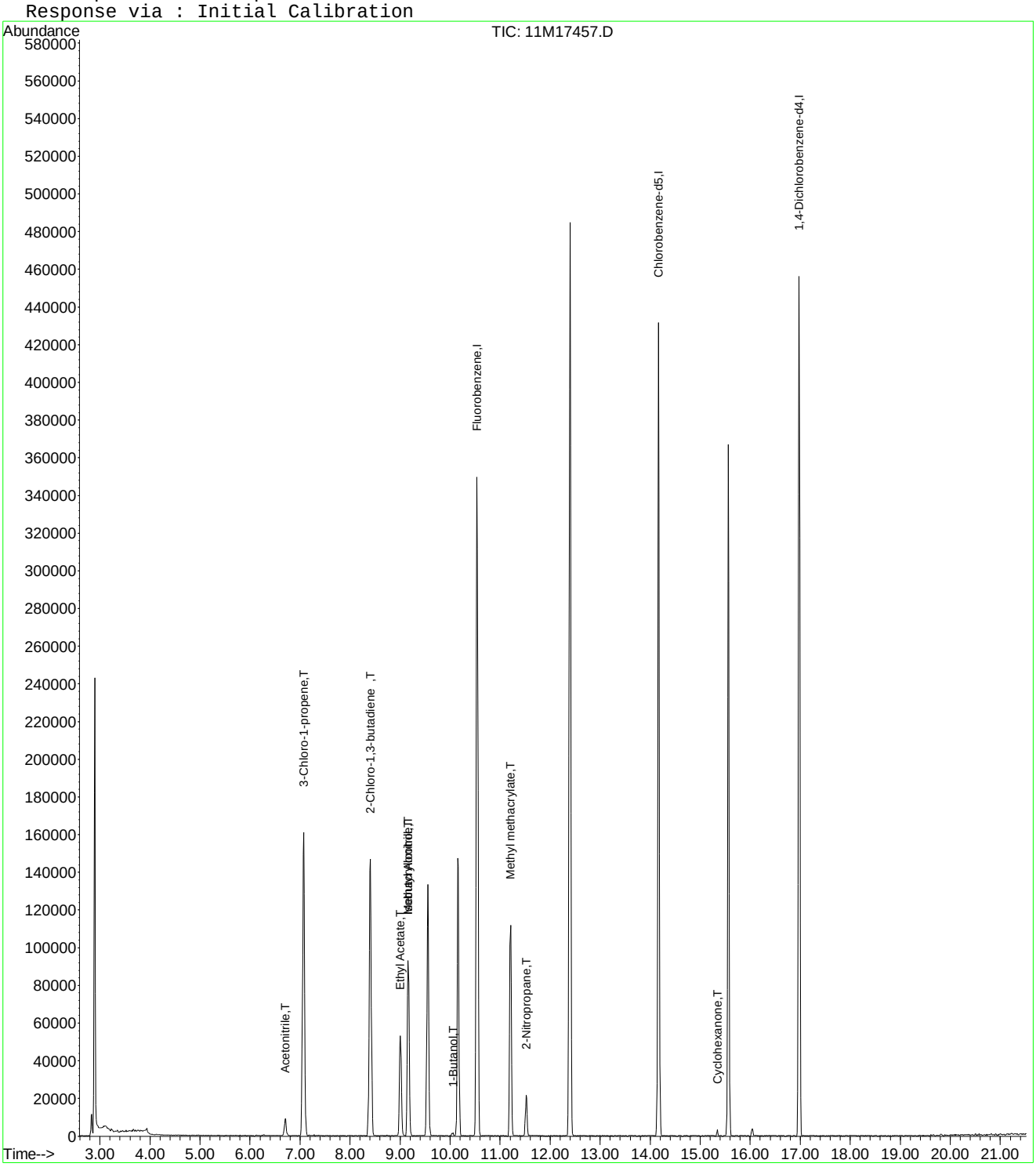
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	12921	19.0493	ug/L		93
3) 3-Chloro-1-propene	7.07	41	179217	22.2162	ug/L		84
4) 2-Chloro-1,3-butadiene	8.41	53	148576	21.2547	ug/L		81
5) Methacrylonitrile	9.16	41	66481	20.5299	ug/L		79
6) Isobutyl Alcohol	9.16	43	8047	34.6980	ug/L		84
7) 1-Butanol	10.06	56	1259	51.3220	ug/L	#	15
8) Cyclohexanone	15.34	55	2341	34.9999	ug/L	#	77
9) 2-Nitropropane	11.52	43	19277	15.8135	ug/L		98
10) Ethyl Acetate	9.01	43	89326	20.4881	ug/L	#	92
11) Methyl methacrylate	11.21	41	80466	20.0289	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17457.D A9FOOWT.M Fri Apr 21 13:34:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.0493	4.8	100	-0.01
3	T	3-Chloro-1-propene	20.0000	22.2162	-11.1	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	21.2547	-6.3	100	0.00
5	T	Methacrylonitrile	20.0000	20.5299	-2.6	100	0.00
6	T	Isobutyl Alcohol	40.0000	34.6980	13.3	100	-0.01
7	T	1-Butanol	-1.0000	51.3220	0.0	100	0.02
8	T	Cyclohexanone	-1.0000	34.9999	0.0	100	0.00
9	T	2-Nitropropane	-1.0000	15.8135	0.0	100	0.00
10	T	Ethyl Acetate	20.0000	20.4881	-2.4	100	0.00
11	T	Methyl methacrylate	20.0000	20.0289	-0.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17457.D A9FOOWT.M Fri Apr 21 13:37:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

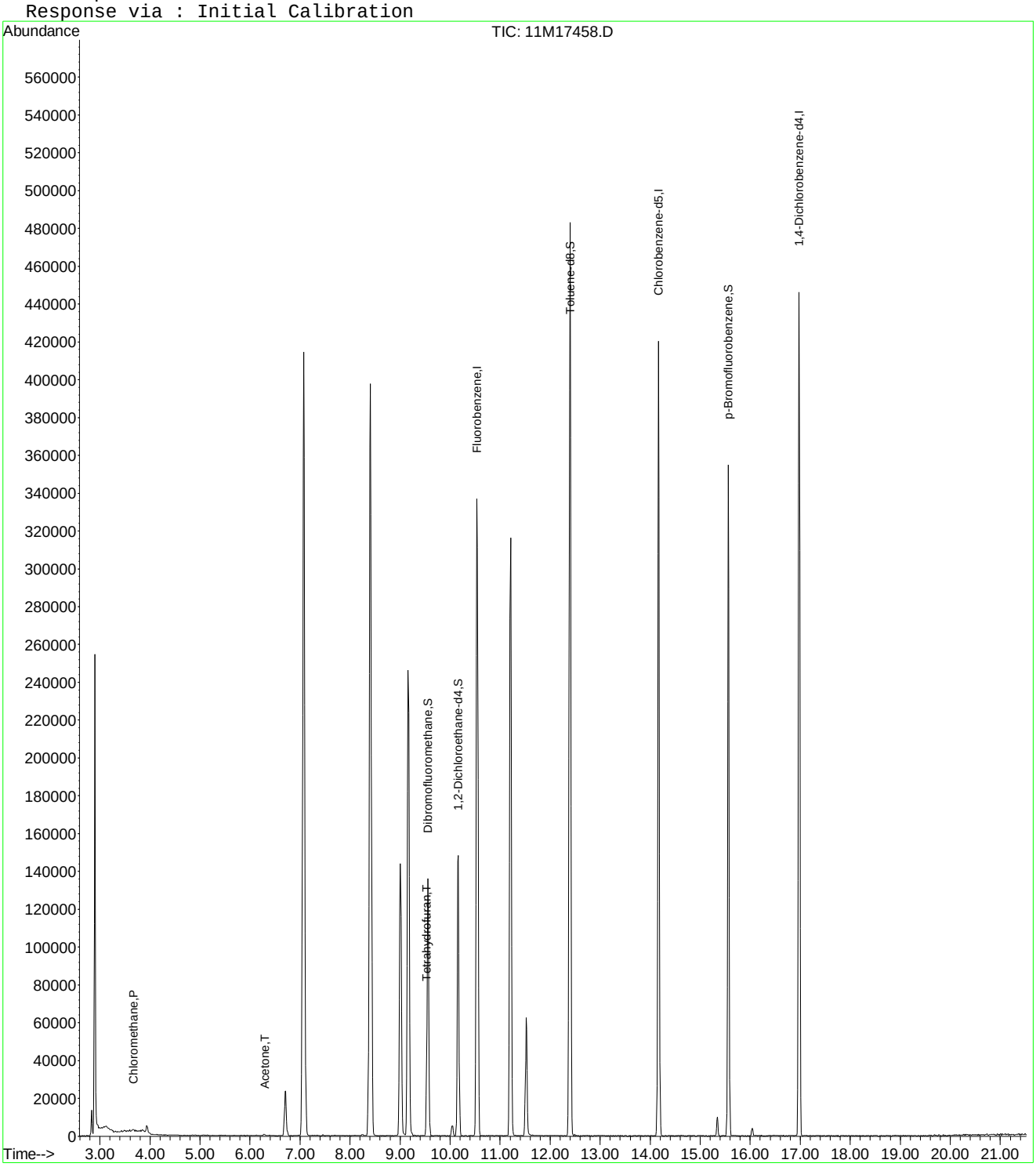
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108362	26.2787	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.12%			
43) 1,2-Dichloroethane-d4	10.16	65	125236	23.8026	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.20%			
57) Toluene-d8	12.40	98	407400	25.6066	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.44%			
78) p-Bromofluorobenzene	15.56	95	144829	23.2872	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.16%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	985	0.1236	ug/L	78
13) Acetone	6.30	43	1193	0.7465	ug/L #	46
36) Tetrahydrofuran	9.53	42	402	0.2227	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17458.D 8260WT.M Tue Apr 11 20:12:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:50 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

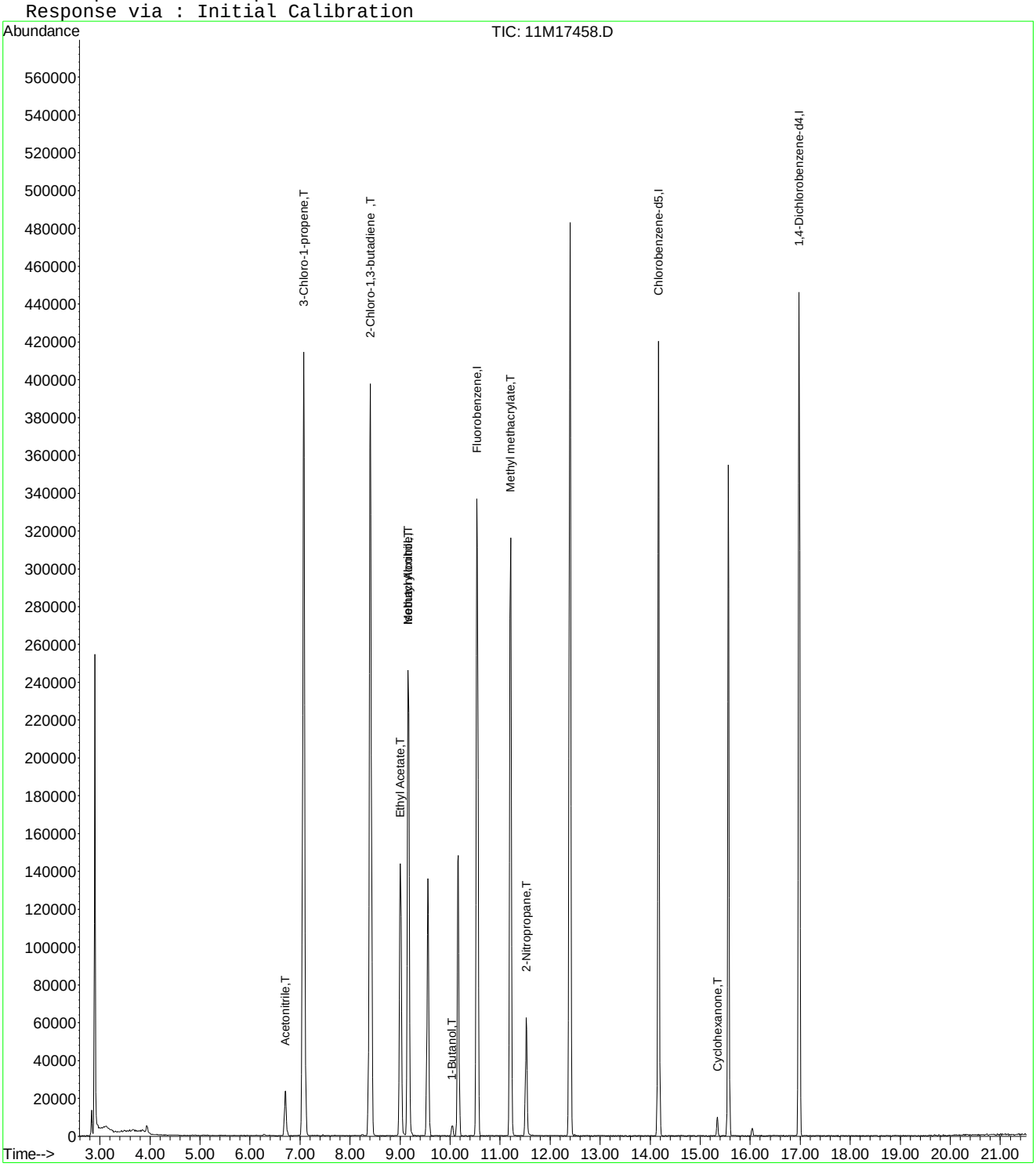
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	32285	48.1995	ug/L		99
3) 3-Chloro-1-propene	7.07	41	457447	57.4238	ug/L		82
4) 2-Chloro-1,3-butadiene	8.41	53	391135	56.6621	ug/L		81
5) Methacrylonitrile	9.16	41	171426	53.6075	ug/L		77
6) Isobutyl Alcohol	9.16	43	21874	95.5120	ug/L		82
7) 1-Butanol	10.04	56	3950	70.2746	ug/L	#	84
8) Cyclohexanone	15.34	55	6611	56.6194	ug/L	#	80
9) 2-Nitropropane	11.52	43	54987	45.6781	ug/L		95
10) Ethyl Acetate	9.01	43	236322	54.8894	ug/L	#	93
11) Methyl methacrylate	11.21	41	217399	54.7977	ug/L		78

(#) = qualifier out of range (m) = manual integration
11M17458.D A9FOOWT.M Fri Apr 21 13:34:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	48.1995	3.6	100	-0.01
3	T	3-Chloro-1-propene	50.0000	57.4238	-14.8	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	56.6621	-13.3	100	0.00
5	T	Methacrylonitrile	50.0000	53.6075	-7.2	100	0.00
6	T	Isobutyl Alcohol	100.0000	95.5120	4.5	100	-0.01
7	T	1-Butanol	-1.0000	70.2746	0.0	100	0.00
8	T	Cyclohexanone	50.0000	56.6194	-13.2	100	0.00
9	T	2-Nitropropane	50.0000	45.6781	8.6	100	0.00
10	T	Ethyl Acetate	50.0000	54.8894	-9.8	100	0.00
11	T	Methyl methacrylate	50.0000	54.7977	-9.6	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17458.D A9FOOWT.M Fri Apr 21 13:37:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

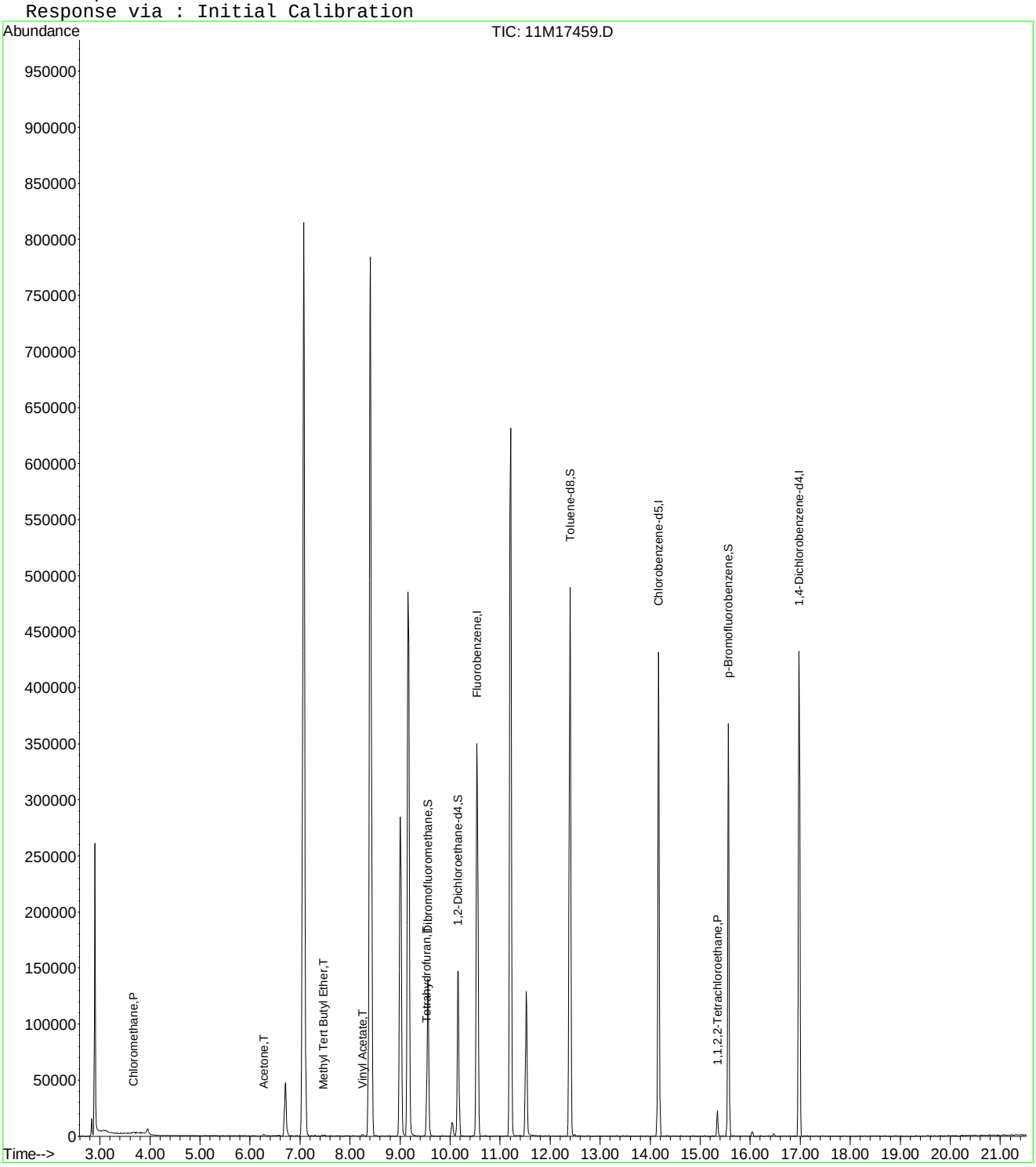
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	111534	26.4487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.80%			
43) 1,2-Dichloroethane-d4	10.15	65	126001	23.4174	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.68%			
57) Toluene-d8	12.40	98	411886	25.4379	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.76%			
78) p-Bromofluorobenzene	15.56	95	149293	25.2500	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1132	0.1389	ug/L	# 55
13) Acetone	6.28	43	2268	1.3877	ug/L	80
22) Methyl Tert Butyl Ether	7.47	73	2104	0.1479	ug/L	# 47
26) Vinyl Acetate	8.25	43	2683	0.2564	ug/L	# 77
36) Tetrahydrofuran	9.53	42	240	0.1300	ug/L	# 41
77) 1,1,2,2-Tetrachloroethane	15.34	83	872	0.1644	ug/L	# 18

(#) = qualifier out of range (m) = manual integration
11M17459.D 8260WT.M Tue Apr 11 20:42:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:51 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

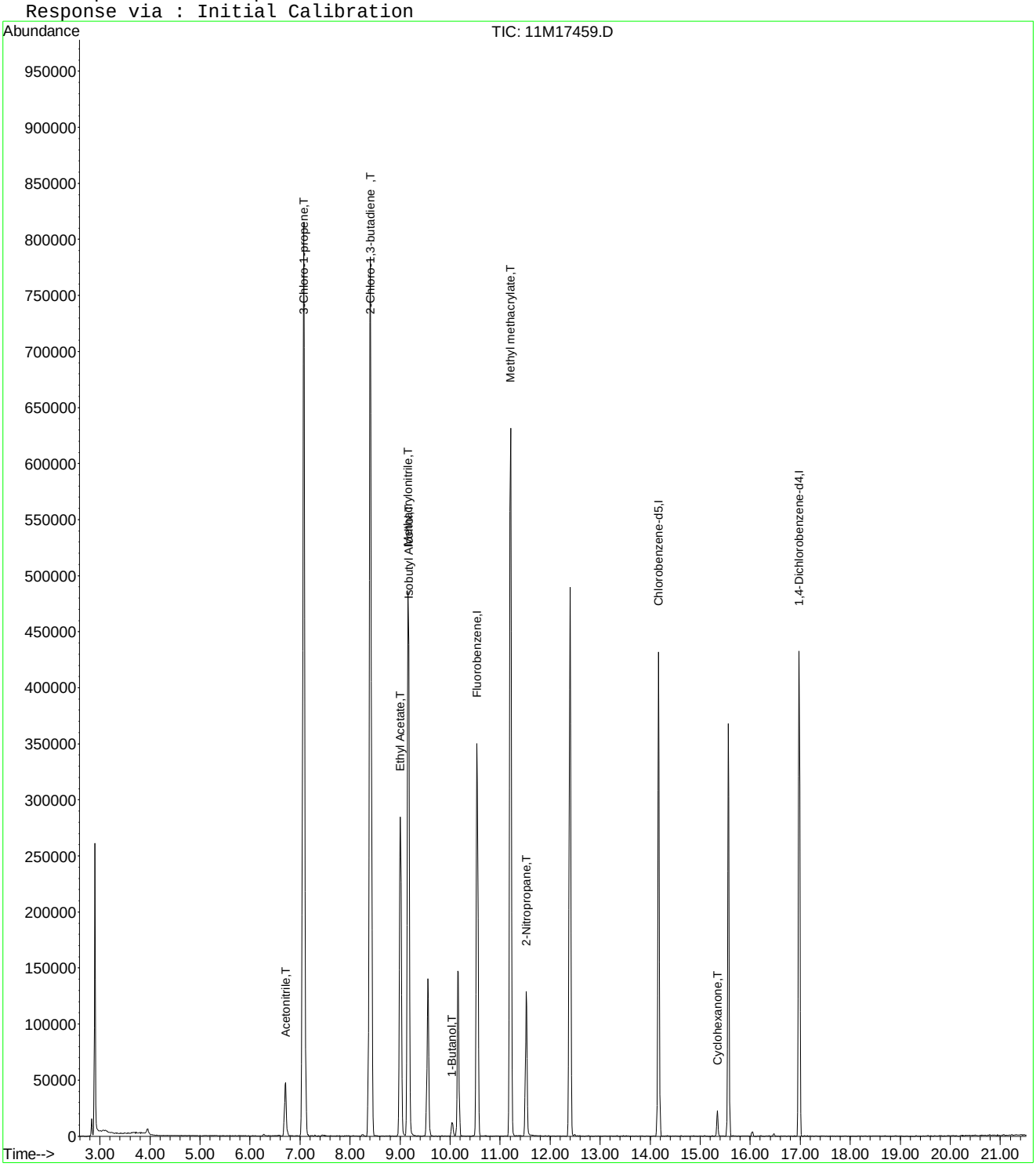
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	65494	95.6122	ug/L		99
3) 3-Chloro-1-propene	7.07	41	885129	108.6494	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	760026	107.6624	ug/L		78
5) Methacrylonitrile	9.16	41	338034	103.3663	ug/L		76
6) Isobutyl Alcohol	9.17	43	41794	178.4487	ug/L		89
7) 1-Butanol	10.04	56	8518	100.9385	ug/L	#	84
8) Cyclohexanone	15.34	55	13236	88.4596	ug/L	#	84
9) 2-Nitropropane	11.52	43	115457	93.7860	ug/L		94
10) Ethyl Acetate	9.01	43	459743	104.4165	ug/L	#	90
11) Methyl methacrylate	11.21	41	434329	107.0516	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17459.D A9FOOWT.M Fri Apr 21 13:34:51 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	95.6122	4.4	100	0.00
3	T	3-Chloro-1-propene	100.0000	108.6494	-8.6	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.6624	-7.7	100	0.00
5	T	Methacrylonitrile	100.0000	103.3663	-3.4	100	0.00
6	T	Isobutyl Alcohol	200.0000	178.4487	10.8	100	0.00
7	T	1-Butanol	100.0000	100.9385	-0.9	100	0.00
8	T	Cyclohexanone	100.0000	88.4596	11.5	100	0.00
9	T	2-Nitropropane	100.0000	93.7860	6.2	100	0.00
10	T	Ethyl Acetate	100.0000	104.4165	-4.4	100	0.00
11	T	Methyl methacrylate	100.0000	107.0516	-7.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17459.D A9FOOWT.M Fri Apr 21 13:39:02 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11:03 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

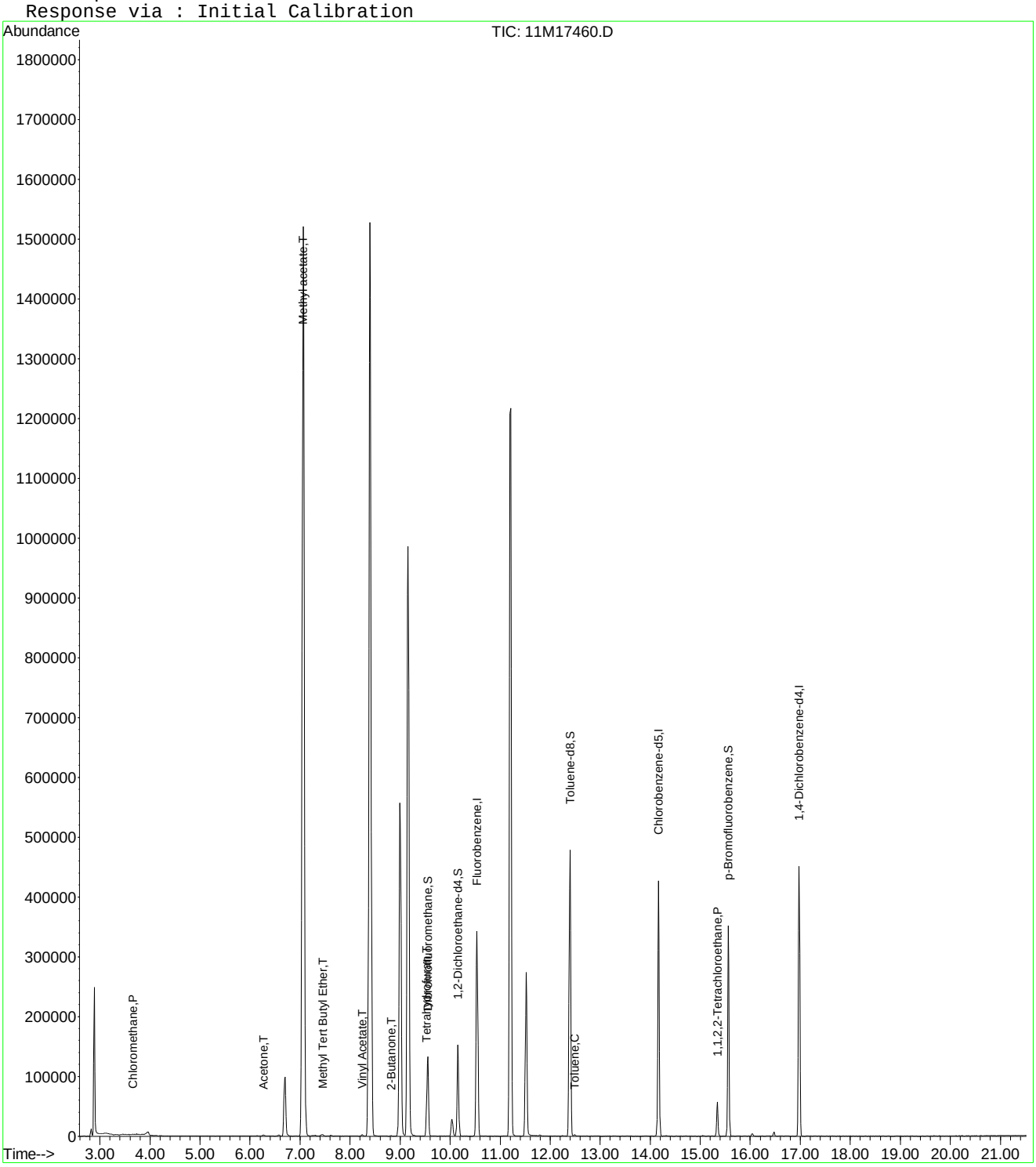
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106964	26.0007	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%			
43) 1,2-Dichloroethane-d4	10.15	65	122550	23.3468	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.40%			
57) Toluene-d8	12.40	98	406174	25.3933	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.56%			
78) p-Bromofluorobenzene	15.56	95	144524	23.5455	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 94.20%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1338	0.1683	ug/L #	67
13) Acetone	6.27	43	4034	2.5301	ug/L	78
18) Methyl acetate	7.05	43	612	0.1369	ug/L #	1
22) Methyl Tert Butyl Ether	7.45	73	4894	0.3527	ug/L	93
26) Vinyl Acetate	8.24	43	5337	0.5228	ug/L #	77
29) 2-Butanone	8.82	43	474	0.1854	ug/L #	55
36) Tetrahydrofuran	9.53	42	385	0.2138	ug/L #	41
58) Toluene	12.49	91	2879	0.1437	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	2354	0.4276	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17460.D 8260WT.M Tue Apr 11 21:11:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:52 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

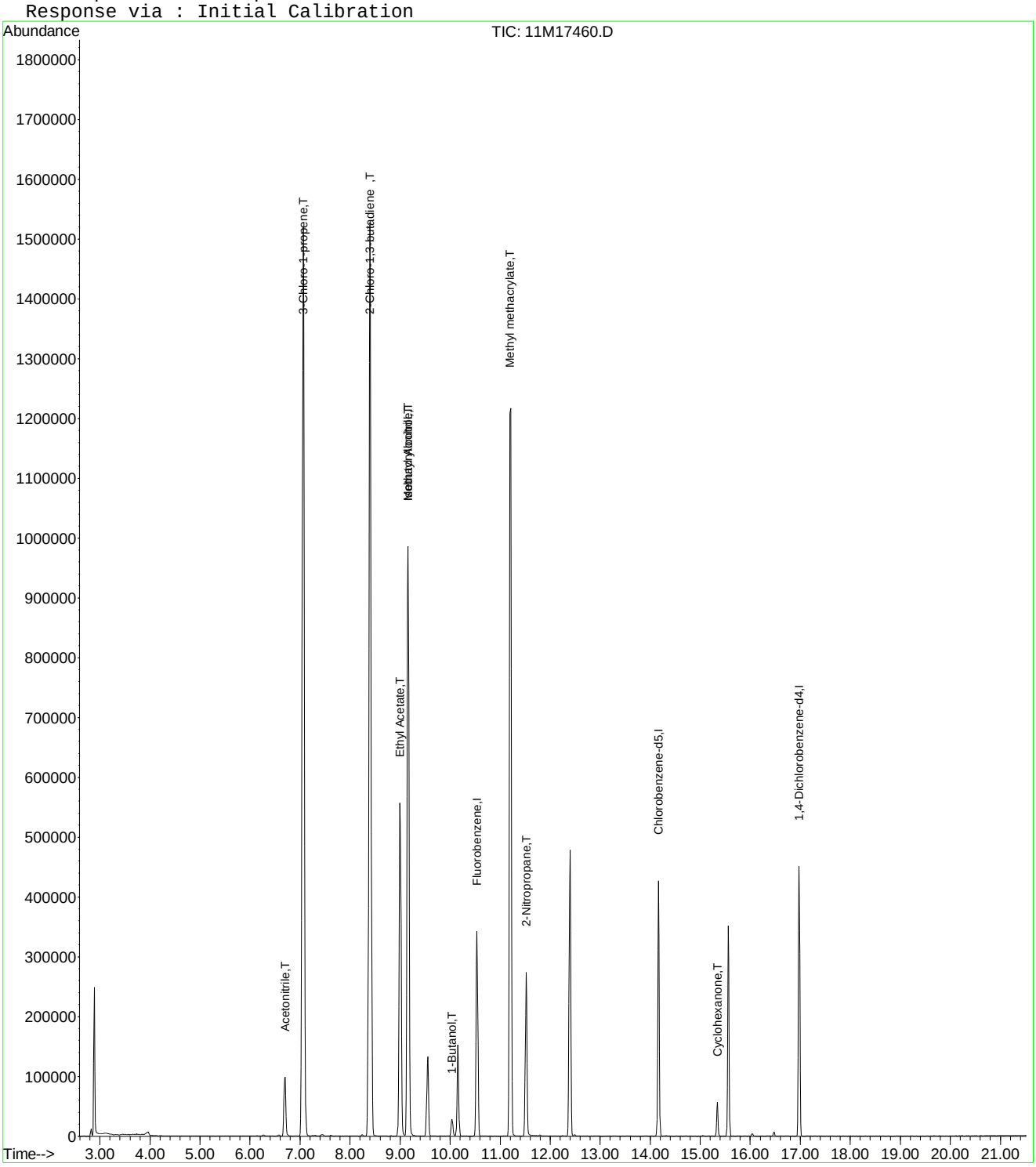
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	136902	204.8671	ug/L		98
3) 3-Chloro-1-propene	7.06	41	1641249	206.5122	ug/L		74
4) 2-Chloro-1,3-butadiene	8.40	53	1451521	210.7703	ug/L		74
5) Methacrylonitrile	9.16	41	673287	211.0422	ug/L		74
6) Isobutyl Alcohol	9.16	43	92763	405.9989	ug/L		87
7) 1-Butanol	10.04	56	21553	193.8864	ug/L	#	82
8) Cyclohexanone	15.34	55	32781	188.6073	ug/L	#	83
9) 2-Nitropropane	11.52	43	245915	204.7638	ug/L		95
10) Ethyl Acetate	9.00	43	905759	210.8712	ug/L	#	89
11) Methyl methacrylate	11.20	41	859855	217.2452	ug/L		74

(#) = qualifier out of range (m) = manual integration
11M17460.D A9FOOWT.M Fri Apr 21 13:34:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

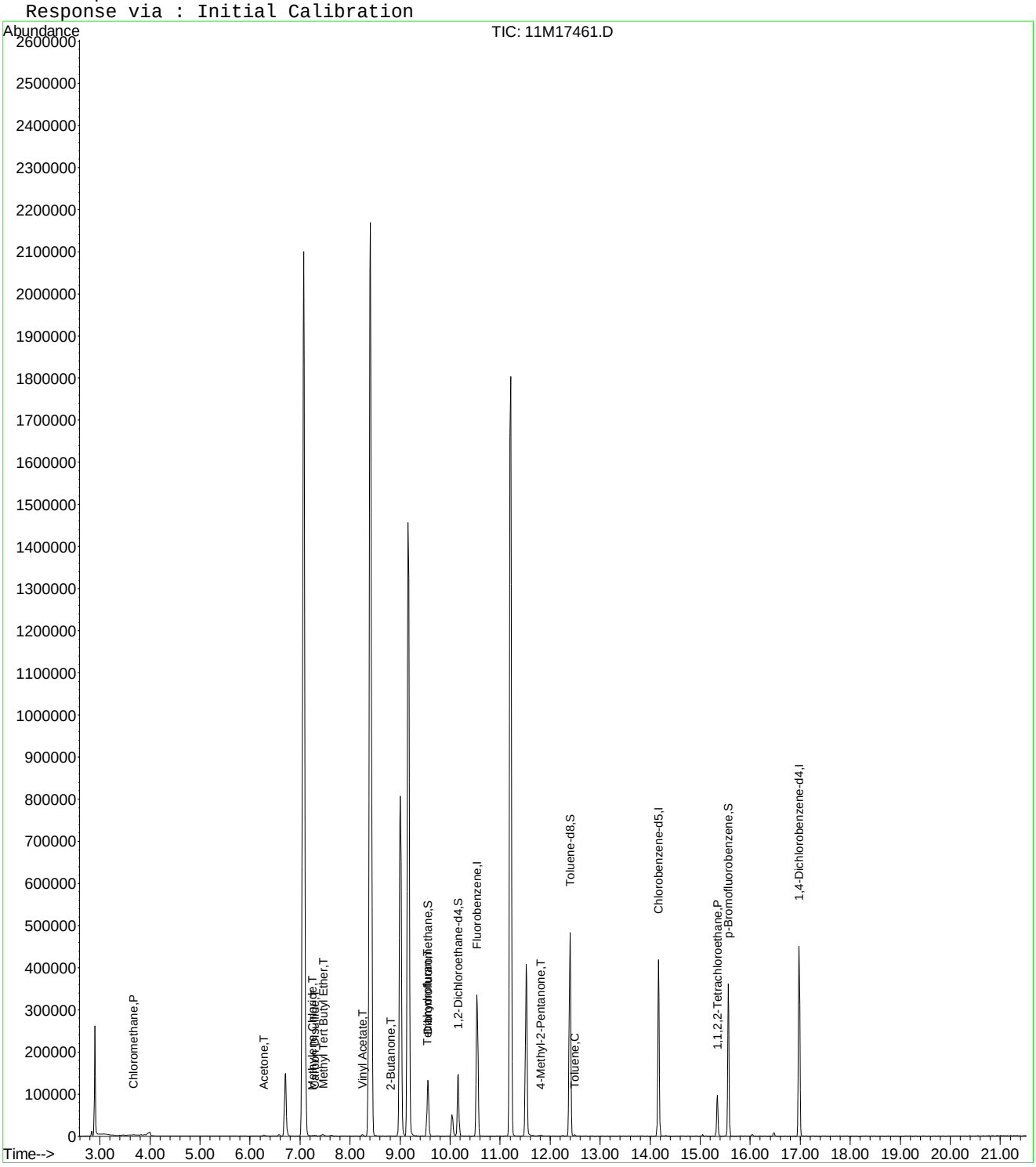
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	107197	26.4141	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.16	65	123580	23.8654	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.48%			
57) Toluene-d8	12.40	98	410662	25.6678	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.68%			
78) p-Bromofluorobenzene	15.56	95	147403	23.4277	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.72%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1060	0.1352	ug/L #	75
13) Acetone	6.28	43	5404	3.4357	ug/L	98
19) Methylene Chloride	7.25	84	697	0.1329	ug/L	66
20) Carbon Disulfide	7.29	76	1636	0.1208	ug/L #	73
22) Methyl Tert Butyl Ether	7.47	73	7202	0.5261	ug/L	85
26) Vinyl Acetate	8.25	43	8317	0.8259	ug/L #	80
29) 2-Butanone	8.81	43	763	0.3025	ug/L #	55
36) Tetrahydrofuran	9.54	42	395	0.2224	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	258	0.1206	ug/L #	40
58) Toluene	12.49	91	4122	0.2057	ug/L	97
77) 1,1,2,2-Tetrachloroethane	15.34	83	4198	0.7439	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17461.D 8260WT.M Tue Apr 11 21:40:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:53 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

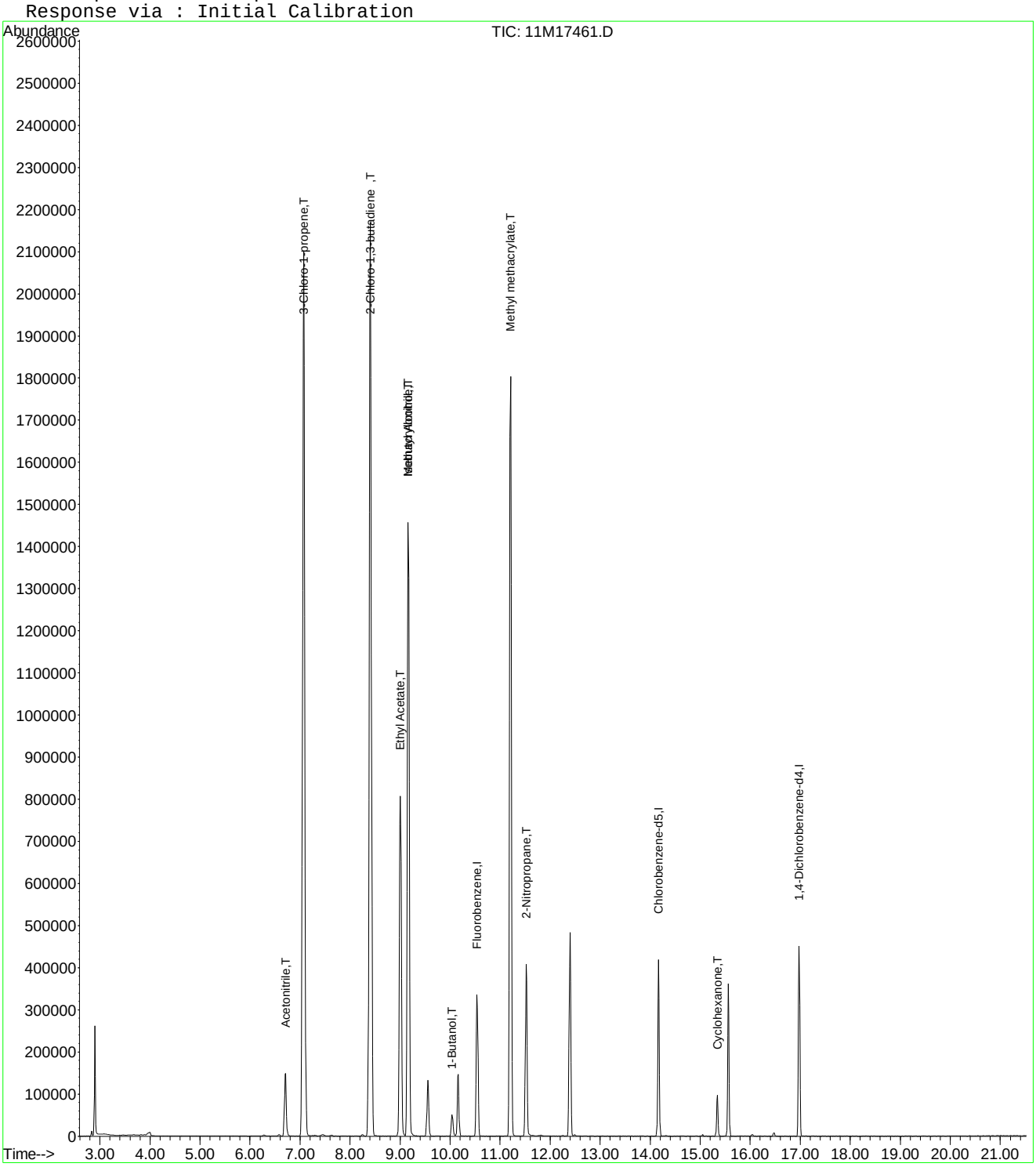
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	206451	313.1737	ug/L		99
3) 3-Chloro-1-propene	7.07	41	2228814	284.2830	ug/L		69
4) 2-Chloro-1,3-butadiene	8.41	53	2012298	296.1995	ug/L		70
5) Methacrylonitrile	9.16	41	972780	309.0933	ug/L		72
6) Isobutyl Alcohol	9.16	43	149280	662.3042	ug/L		87
7) 1-Butanol	10.04	56	37487	309.3216	ug/L	#	79
8) Cyclohexanone	15.34	55	55514	307.0239	ug/L	#	85
9) 2-Nitropropane	11.52	43	377920	318.9877	ug/L		94
10) Ethyl Acetate	9.01	43	1297135	306.1227	ug/L	#	86
11) Methyl methacrylate	11.21	41	1217565	311.8337	ug/L		71

(#) = qualifier out of range (m) = manual integration
11M17461.D A9FOOWT.M Fri Apr 21 13:34:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

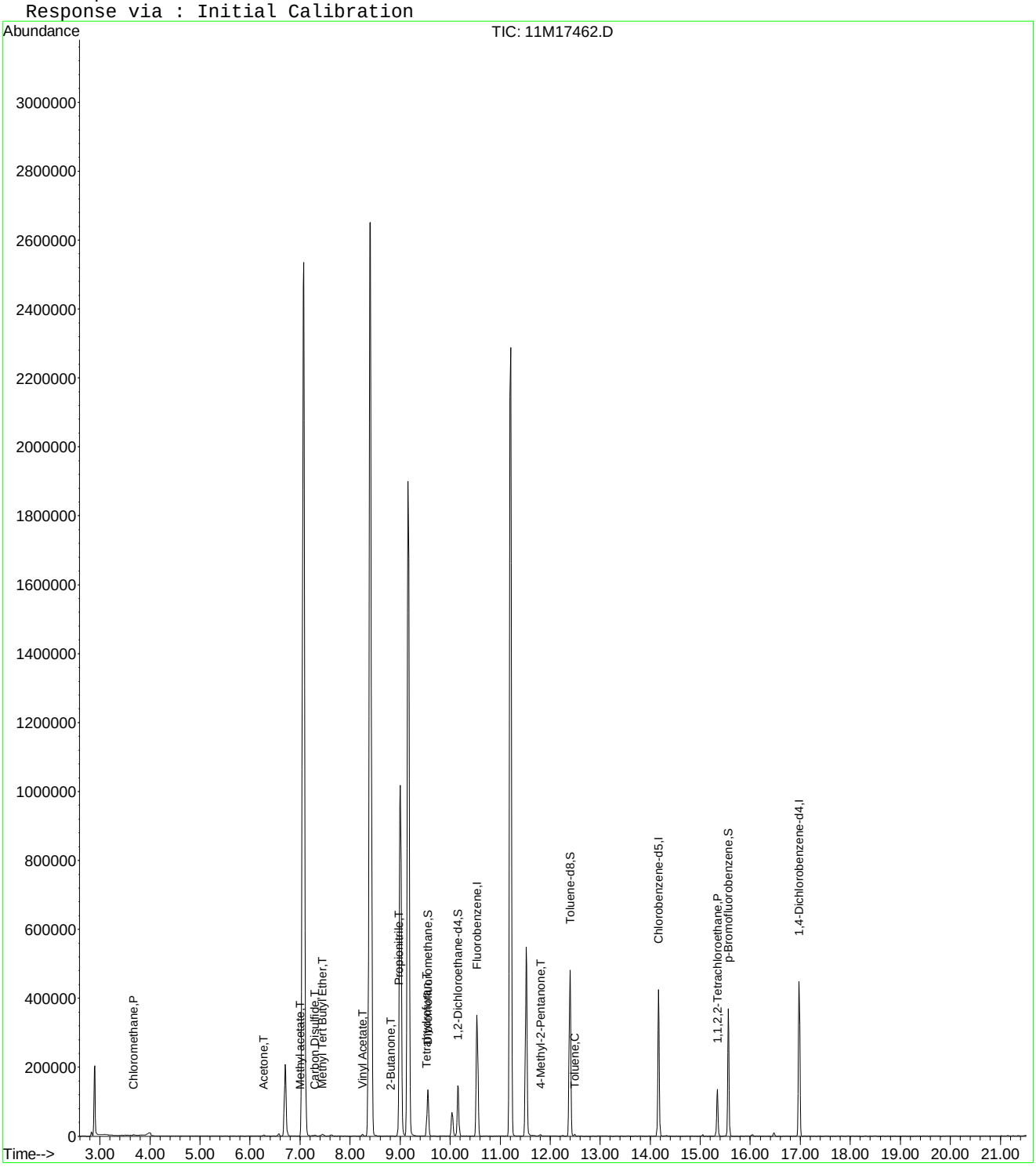
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106259	25.3144	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.15	65	123943	23.1414	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 92.56%			
57) Toluene-d8	12.40	98	411573	25.6539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.60%			
78) p-Bromofluorobenzene	15.56	95	151173	24.3188	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 97.28%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1293	0.1594	ug/L	99
13) Acetone	6.27	43	6921	4.2542	ug/L	90
18) Methyl acetate	7.00	43	726	0.1591	ug/L #	65
20) Carbon Disulfide	7.29	76	2261	0.1614	ug/L #	73
22) Methyl Tert Butyl Ether	7.44	73	9257	0.6538	ug/L	98
26) Vinyl Acetate	8.25	43	10807	1.0376	ug/L #	86
29) 2-Butanone	8.81	43	1338	0.5129	ug/L #	55
30) Propionitrile	8.97	54	189	0.2276	ug/L #	1
36) Tetrahydrofuran	9.53	42	1093	0.5949	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	707	0.3194	ug/L #	40
58) Toluene	12.49	91	6136	0.3054	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	5881	1.0548	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17462.D 8260WT.M Tue Apr 11 22:09:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:54 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

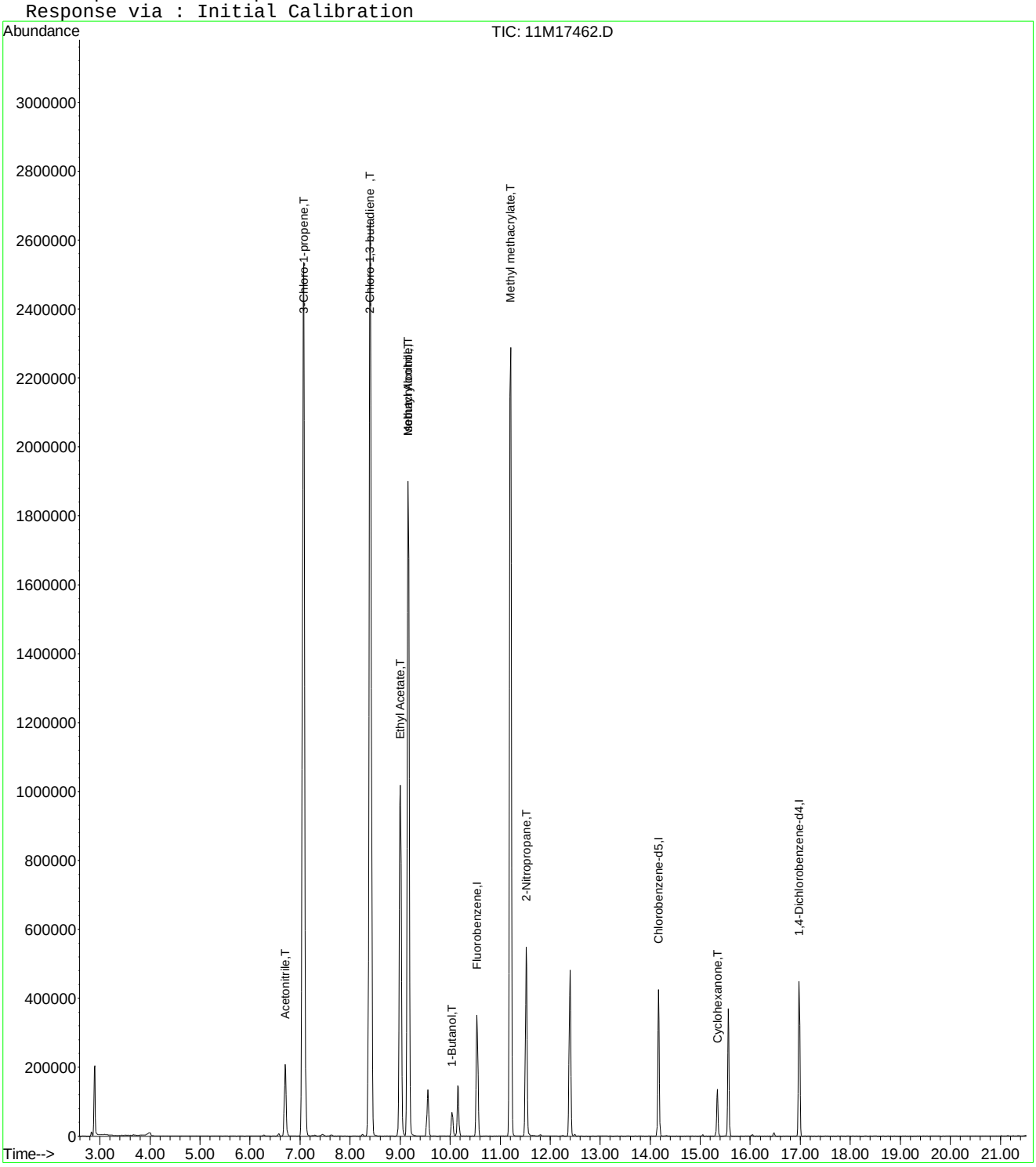
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	281651	413.0735	ug/L		98
3) 3-Chloro-1-propene	7.07	41	2690047	331.7300	ug/L		64
4) 2-Chloro-1,3-butadiene	8.40	53	2460691	350.1845	ug/L		67
5) Methacrylonitrile	9.16	41	1244299	382.2500	ug/L		70
6) Isobutyl Alcohol	9.16	43	201547	864.5299	ug/L		87
7) 1-Butanol	10.04	56	51492	396.8081	ug/L	#	80
8) Cyclohexanone	15.34	55	75425	395.9741	ug/L	#	85
9) 2-Nitropropane	11.52	43	505423	412.4553	ug/L		93
10) Ethyl Acetate	9.01	43	1632644	372.5201	ug/L	#	84
11) Methyl methacrylate	11.21	41	1521562	376.7630	ug/L		68

(#) = qualifier out of range (m) = manual integration
11M17462.D A9FOOWT.M Fri Apr 21 13:34:54 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39:11 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

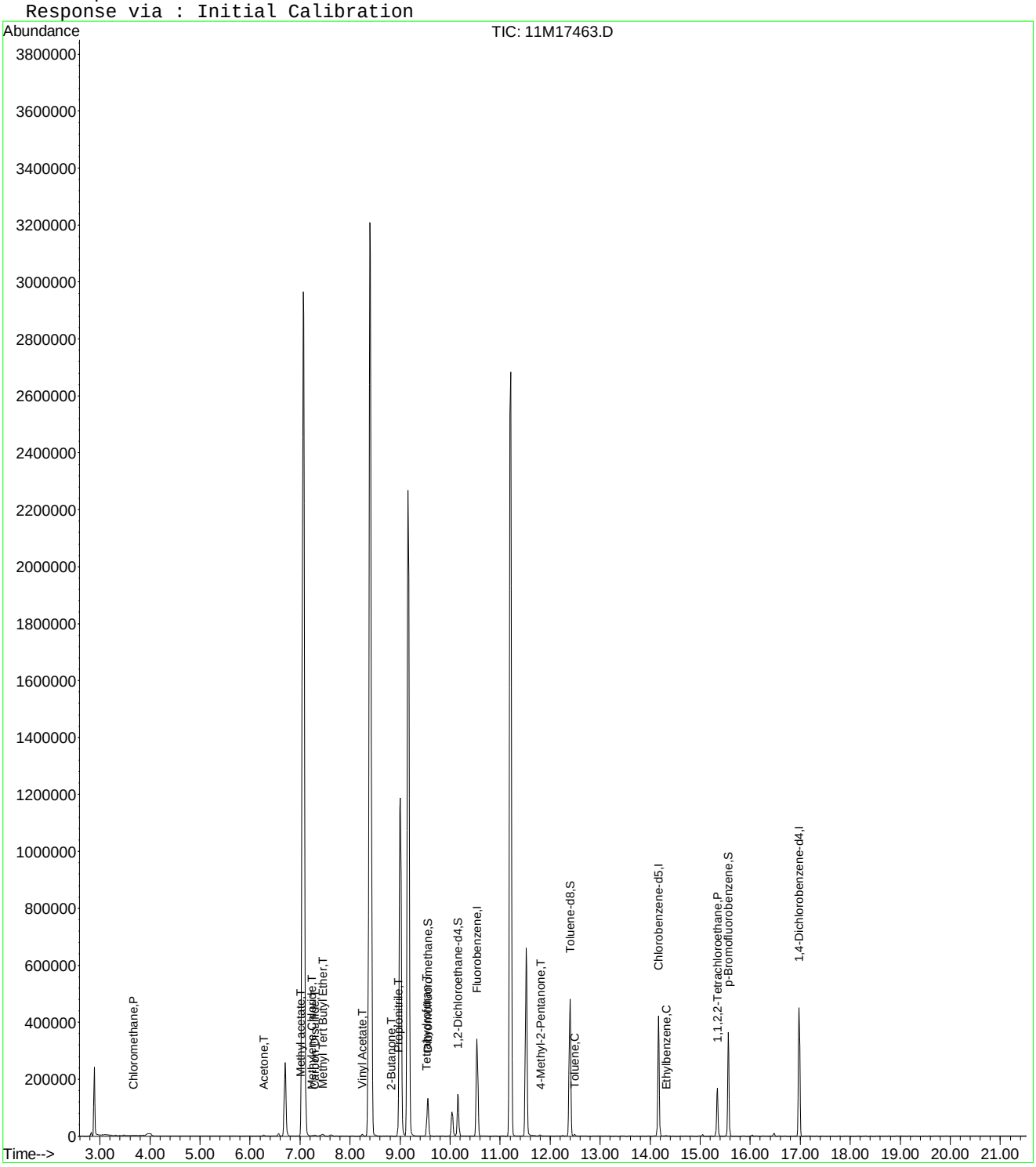
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106074	25.8808	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.52%			
43) 1,2-Dichloroethane-d4	10.15	65	123547	23.6248	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.48%			
57) Toluene-d8	12.40	98	409774	25.8060	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.24%			
78) p-Bromofluorobenzene	15.56	95	148708	23.3407	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.36%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1661	0.2097	ug/L #	74
13) Acetone	6.28	43	7987	5.0280	ug/L	98
18) Methyl acetate	7.01	43	1700	0.3816	ug/L #	65
19) Methylene Chloride	7.24	84	1079	0.2037	ug/L	78
20) Carbon Disulfide	7.29	76	2617	0.1913	ug/L #	73
22) Methyl Tert Butyl Ether	7.46	73	11856	0.8576	ug/L	94
26) Vinyl Acetate	8.24	43	14104	1.3868	ug/L #	91
29) 2-Butanone	8.82	43	1665	0.6537	ug/L #	55
30) Propionitrile	8.96	54	198	0.2442	ug/L #	1
36) Tetrahydrofuran	9.53	42	768	0.4281	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	1108	0.5127	ug/L #	40
58) Toluene	12.49	91	7820	0.3932	ug/L	90
70) Ethylbenzene	14.32	106	907	0.1268	ug/L	92
77) 1,1,2,2-Tetrachloroethane	15.34	83	7437	1.3015	ug/L #	18

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



11M17463.D 8260WT.M Tue Apr 11 22:39:12 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

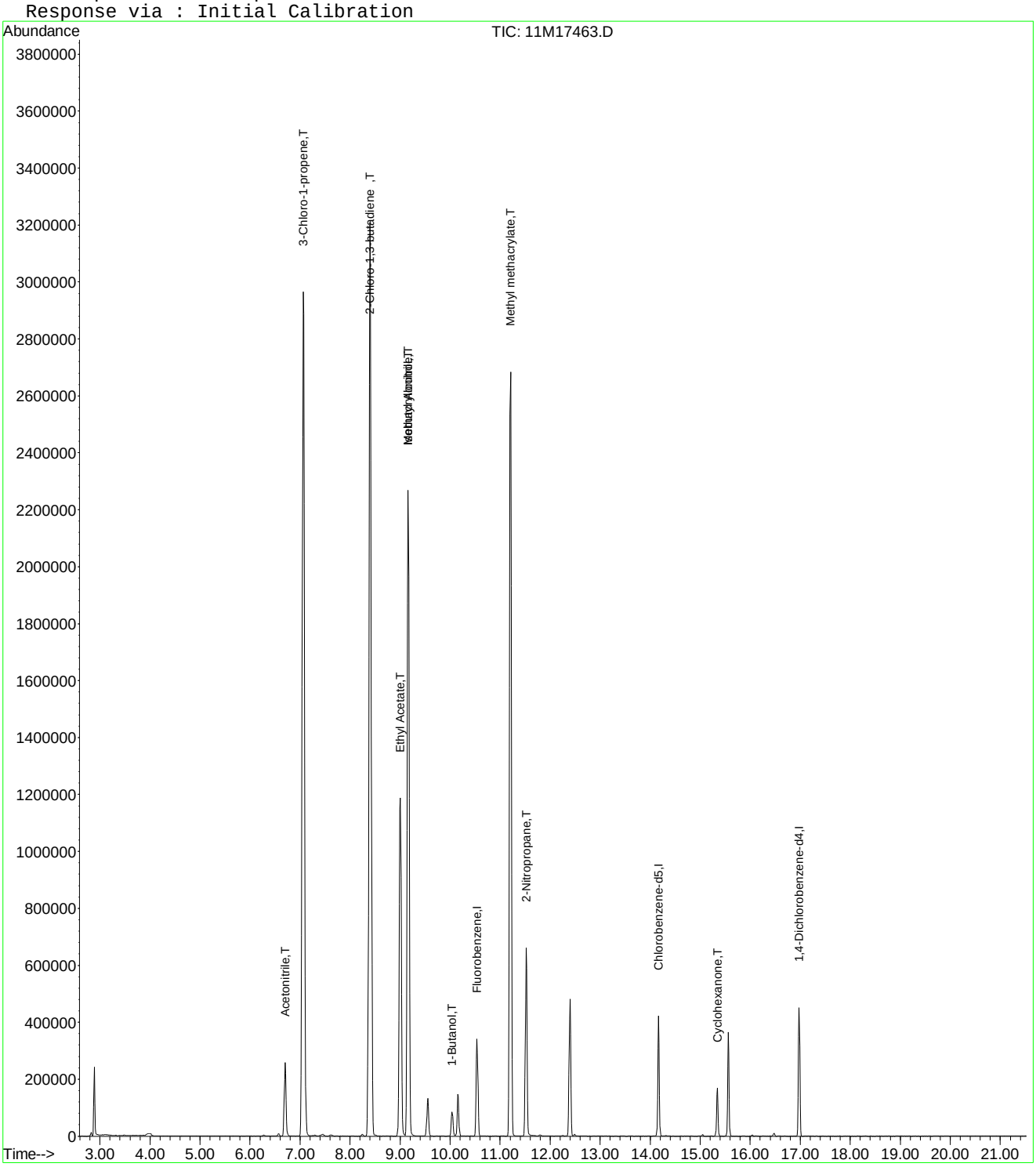
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	341698	513.2456	ug/L		99
3) 3-Chloro-1-propene	7.06	41	3087243	389.9082	ug/L		59
4) 2-Chloro-1,3-butadiene	8.40	53	2864759	417.5367	ug/L		64
5) Methacrylonitrile	9.16	41	1464306	460.7032	ug/L		68
6) Isobutyl Alcohol	9.16	43	247135	1085.6871	ug/L		87
7) 1-Butanol	10.04	56	64790	499.0454	ug/L	#	78
8) Cyclohexanone	15.34	55	96839	513.3157	ug/L	#	84
9) 2-Nitropropane	11.52	43	616392	515.1641	ug/L		94
10) Ethyl Acetate	9.01	43	1900376	444.0833	ug/L	#	82
11) Methyl methacrylate	11.21	41	1764954	447.5883	ug/L		66

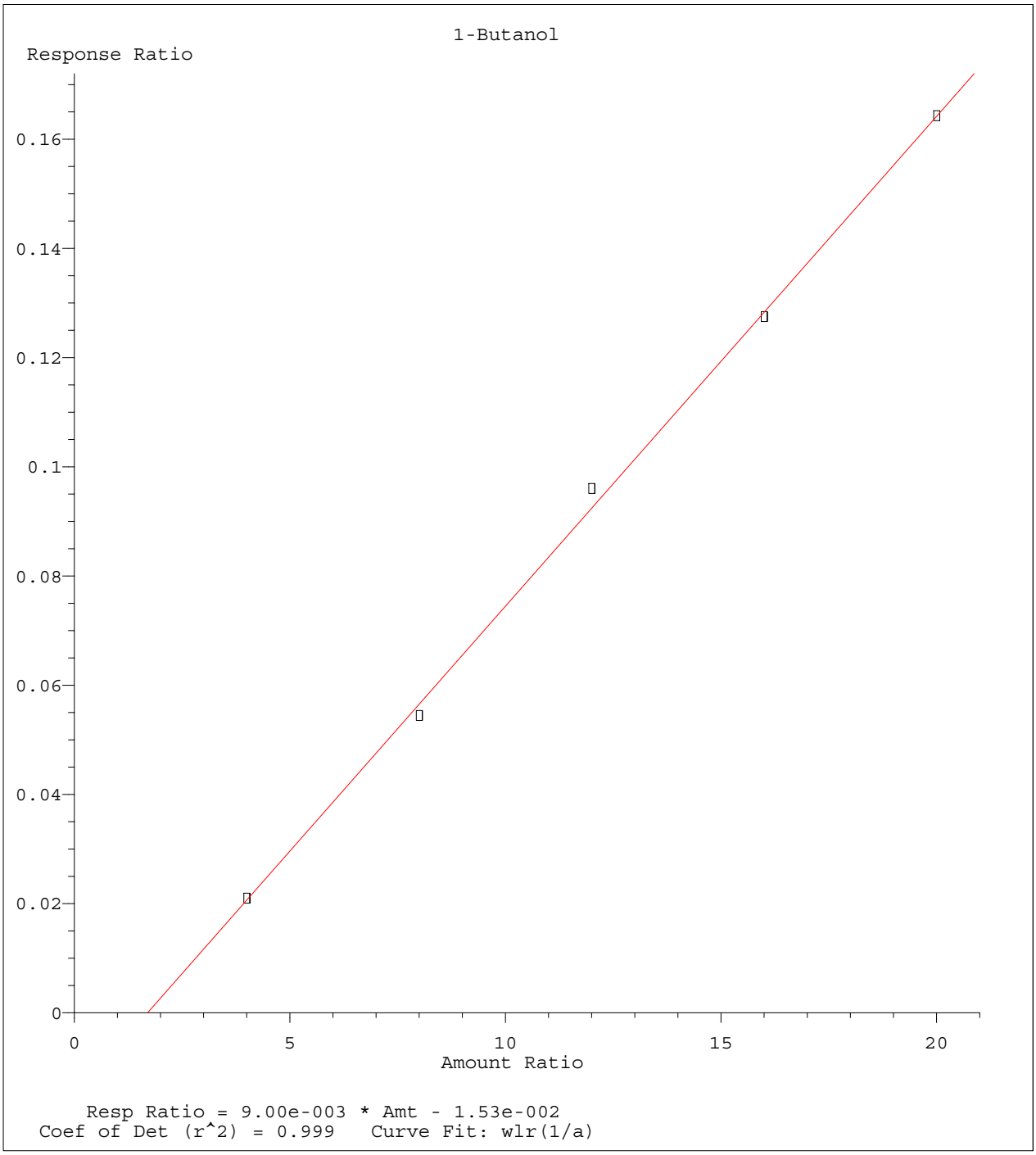
(#) = qualifier out of range (m) = manual integration
11M17463.D A9FOOWT.M Fri Apr 21 13:34:55 2017 Page 1

Quantitation Report (Not Reviewed)

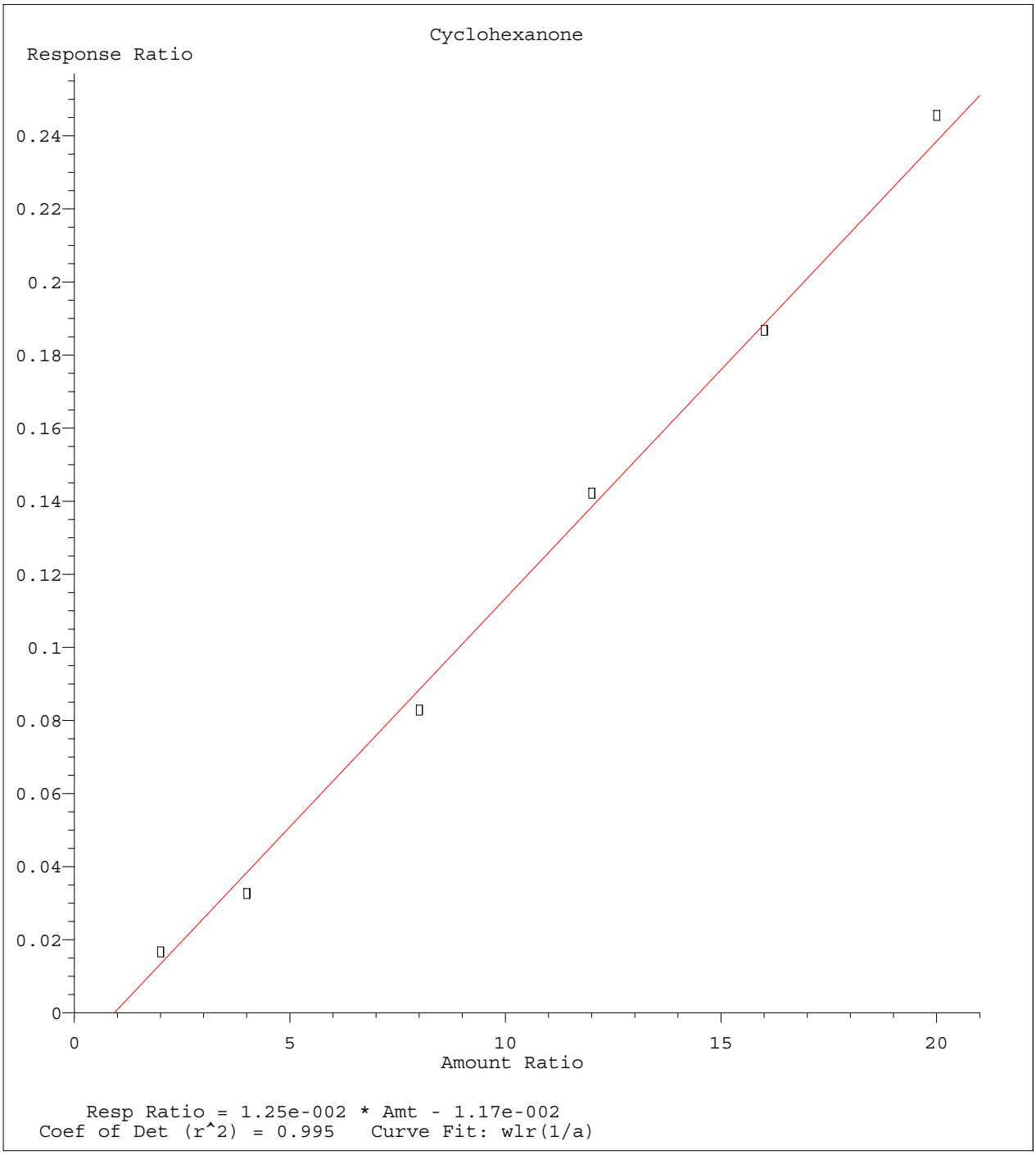
Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration





Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017



Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 00:08:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

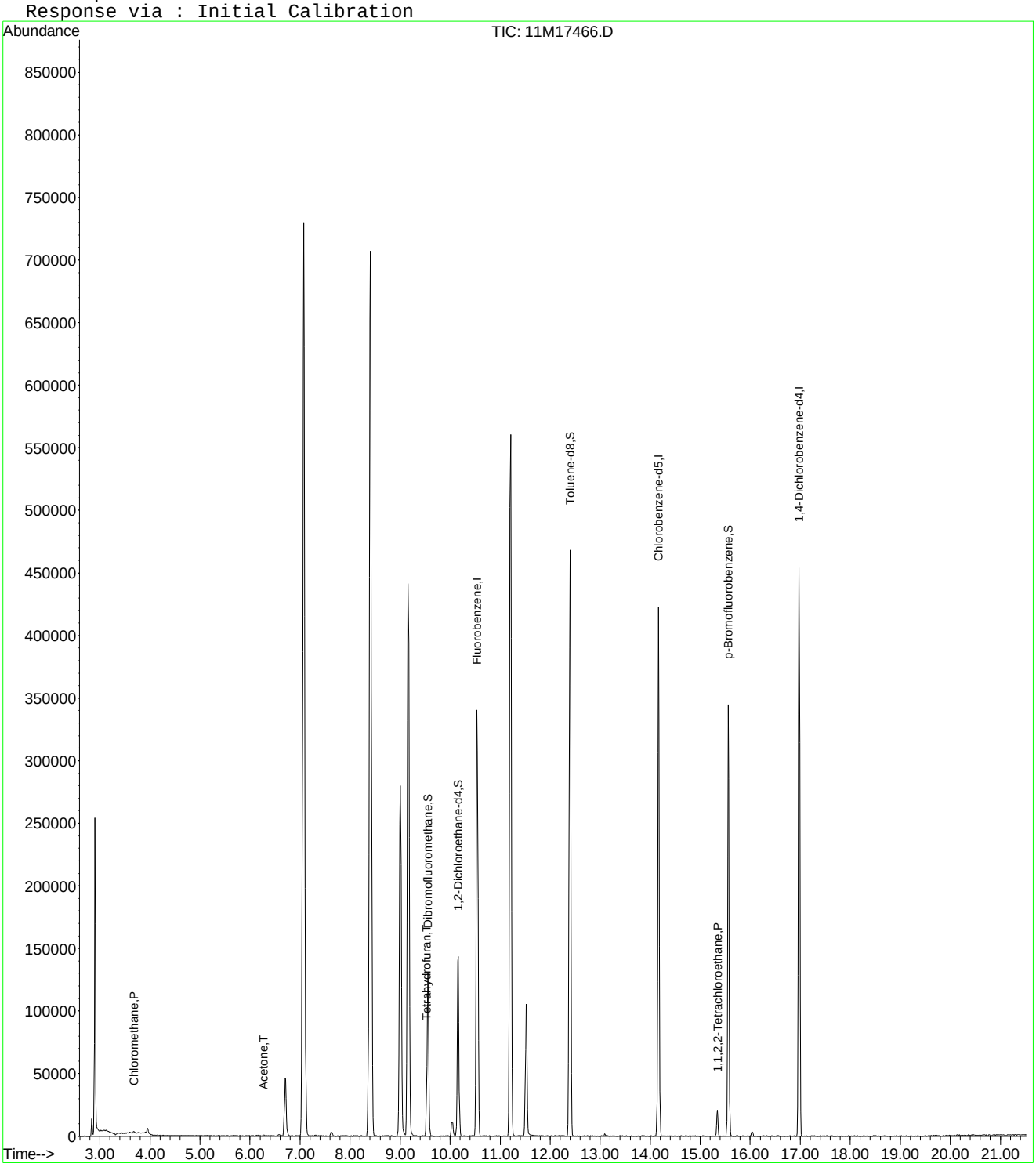
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	104183	25.3905	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.16	65	122221	23.3447	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.36%			
57) Toluene-d8	12.40	98	399954	25.0423	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.16%			
78) p-Bromofluorobenzene	15.56	95	141009	22.5068	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 90.04%			
Target Compounds						Qvalue
3) Chloromethane	3.68	50	1043	0.1316	ug/L	92
13) Acetone	6.27	43	1337	0.8407	ug/L #	46
36) Tetrahydrofuran	9.53	42	231	0.1286	ug/L #	41
77) 1,1,2,2-Tetrachloroethane	15.35	83	776	0.1381	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17466.D 8260WT.M Wed Apr 12 00:08:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 0:08 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:57 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

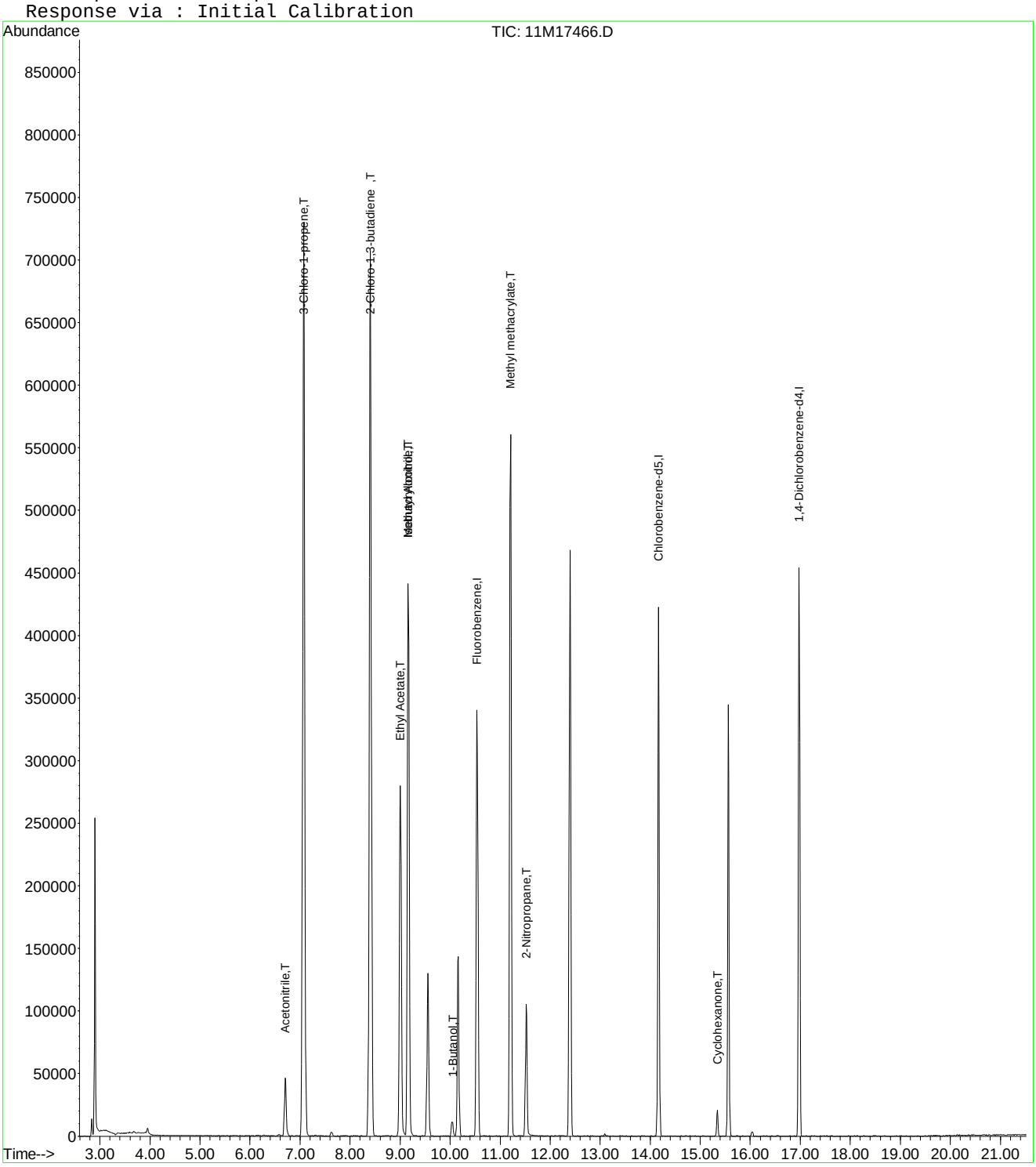
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	63420	95.1516	ug/L		98
3) 3-Chloro-1-propene	7.07	41	795836	100.3973	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	687438	100.0799	ug/L		79
5) Methacrylonitrile	9.16	41	302024	94.9156	ug/L		77
6) Isobutyl Alcohol	9.16	43	44330	194.5248	ug/L		86
7) 1-Butanol	10.05	56	8714	103.9348	ug/L	#	83
8) Cyclohexanone	15.34	55	12464	86.3629	ug/L	#	89
9) 2-Nitropropane	11.52	43	94805	79.1456	ug/L		94
10) Ethyl Acetate	9.01	43	448775	104.7515	ug/L	#	90
11) Methyl methacrylate	11.21	41	388983	98.5333	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	97	0.00
2	T	Acetonitrile	100.0000	95.1516	4.8	97	-0.01
3	T	3-Chloro-1-propene	100.0000	100.3973	-0.4	90	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	100.0799	-0.1	90	0.00
5	T	Methacrylonitrile	100.0000	94.9156	5.1	89	0.00
6	T	Isobutyl Alcohol	200.0000	194.5248	2.7	106	-0.01
7	T	1-Butanol	100.0000	103.9348	-3.9	102	0.01
8	T	Cyclohexanone	100.0000	86.3629	13.6	94	0.00
9	T	2-Nitropropane	100.0000	79.1456	20.9	82	0.00
10	T	Ethyl Acetate	100.0000	104.7515	-4.8	98	0.00
11	T	Methyl methacrylate	100.0000	98.5332	1.5	90	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17466.D A9FOOWT.M Fri Apr 21 13:35:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	407936	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	286002	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	135961	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.22	85	1456	0.4952	ug/L #	68
3) Chloromethane	3.66	50	2818	Below Cal		94
4) Vinyl Chloride	3.89	62	1026	0.2930	ug/L #	43
5) 1,3-Butadiene	3.94	54	1048	Below Cal #		49
6) Bromomethane	4.79	94	1550	0.4288	ug/L	89
7) Chloroethane	4.93	64	452	0.1246	ug/L #	43
8) Trichlorofluoromethane	5.42	101	1600	0.2616	ug/L #	36
10) Isoprene	5.96	67	1639	0.2586	ug/L	74
14) 1,1-Dichloroethene	6.47	61	2095	0.2876	ug/L	85
16) Dimethyl Sulfide	6.73	62	1703	0.2976	ug/L	79
18) Methyl acetate	6.99	43	821	0.1908	ug/L #	66
19) Methylene Chloride	7.23	84	1555	0.3199	ug/L	78
20) Carbon Disulfide	7.28	76	4247	0.3410	ug/L	96
22) Methyl Tert Butyl Ether	7.44	73	3535	0.2904	ug/L #	69
23) trans-1,2-Dichloroethene	7.67	96	1342	0.3027	ug/L	89
24) n-Hexane	7.72	57	1979	0.2878	ug/L #	71
26) Vinyl Acetate	8.24	43	2384	0.2881	ug/L #	78
27) 1,1-Dichloroethane	8.26	63	2770	0.2964	ug/L #	59
31) 2,2-Dichloropropane	9.01	77	1778	0.2811	ug/L #	42
32) cis-1,2-Dichloroethene	9.07	96	1403	0.2820	ug/L	82
33) Chloroform	9.25	83	3255	0.2466	ug/L	94
35) Bromochloromethane	9.48	130	565	0.1852	ug/L #	34
36) Tetrahydrofuran	9.51	42	4820	2.6551	ug/L	94
38) 1,1,1-Trichloroethane	9.76	97	2073	0.3146	ug/L #	49
39) Cyclohexane	9.79	56	2645	0.2855	ug/L #	82
40) 1,1-Dichloropropene	9.96	75	1488	0.2577	ug/L #	38
41) Carbon Tetrachloride	10.08	117	1234	0.2165	ug/L #	68
44) 1,2-Dichloroethane	10.25	62	1821	0.2856	ug/L #	60
45) Benzene	10.29	78	6292	0.3517	ug/L	88
46) Trichloroethene	11.00	130	1256	0.2678	ug/L	89
47) Methylcyclohexane	11.07	83	2187	0.3042	ug/L #	81
48) 1,2-Dichloropropane	11.19	63	1237	0.2222	ug/L #	67
50) Bromodichloromethane	11.48	83	1657	0.2852	ug/L #	73
51) Dibromomethane	11.56	93	446	0.1693	ug/L #	31
52) 2-Chloroethyl Vinyl Ether	11.76	63	514	0.1690	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	1951	0.2831	ug/L #	80
55) Dimethyl Disulfide	12.32	79	694	0.1613	ug/L	59
58) Toluene	12.47	91	6620	0.3575	ug/L	85
59) Ethyl Methacrylate	12.55	69	975	0.1916	ug/L	63
60) trans-1,3-Dichloropropene	12.64	75	1504	0.2573	ug/L #	75

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

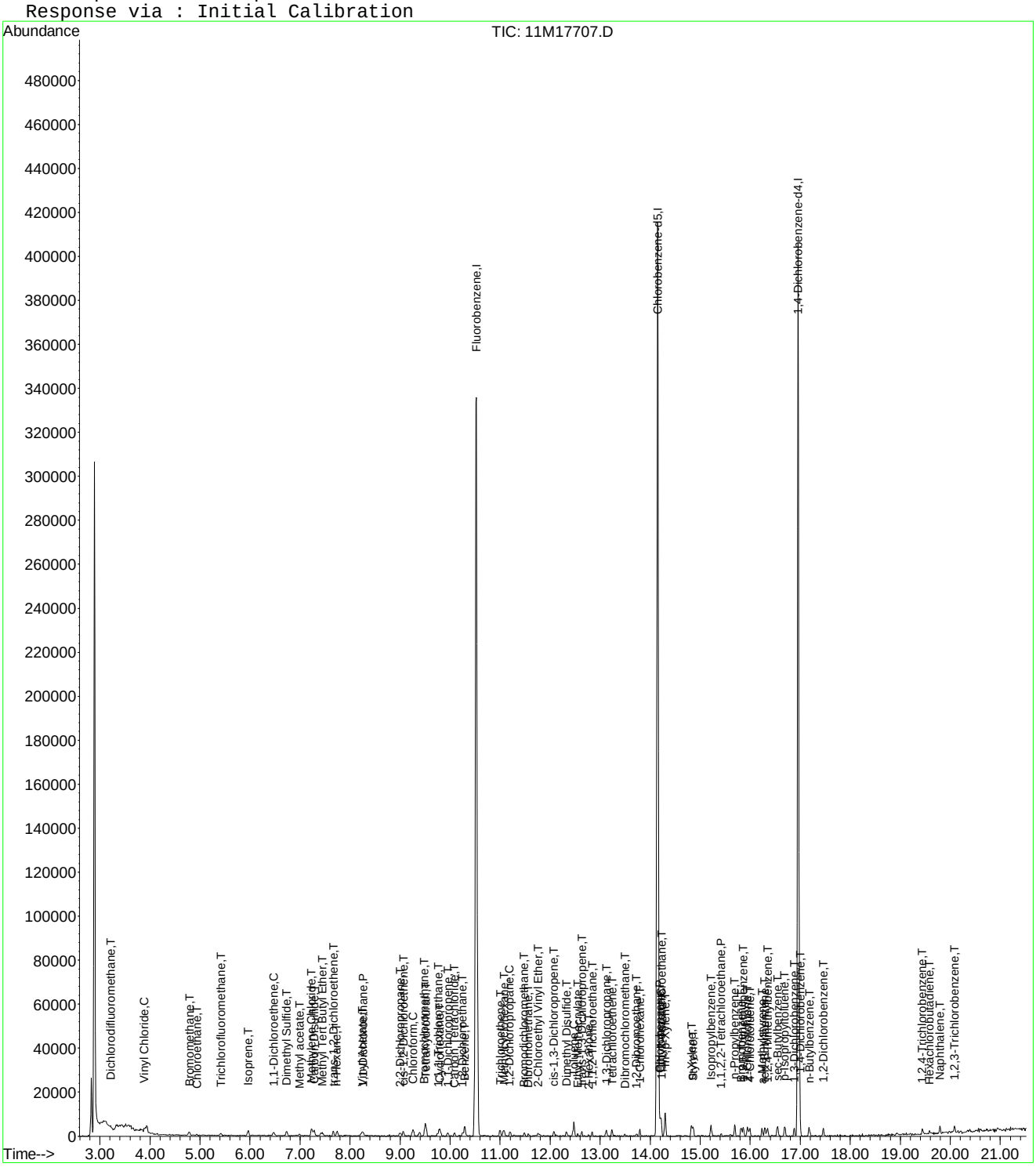
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
61)	1,1,2-Trichloroethane	12.84	97	834	0.2135 ug/L		89
62)	2-Hexanone	12.77	43	717	0.2209 ug/L	#	25
63)	1,3-Dichloropropane	13.12	76	2317	0.3571 ug/L		84
64)	Tetrachloroethene	13.25	164	1130	0.3074 ug/L		70
65)	Dibromochloromethane	13.49	129	1211	0.2781 ug/L	#	55
66)	1,2-Dibromoethane	13.72	107	718	0.2045 ug/L		68
67)	1-Chlorohexane	13.79	91	1457	0.2761 ug/L		89
68)	Chlorobenzene	14.20	112	4403	0.3739 ug/L		89
69)	1,1,1,2-Tetrachloroethane	14.23	131	1170	0.2669 ug/L		77
70)	Ethylbenzene	14.22	106	1776	0.2852 ug/L		61
71)	m-,p-Xylene	14.30	106	4931	0.6618 ug/L		85
72)	o-Xylene	14.83	106	2270	0.3024 ug/L		85
73)	Styrene	14.86	104	2939	0.2641 ug/L		92
75)	Isopropylbenzene	15.22	105	5572	0.3042 ug/L		99
77)	1,1,2,2-Tetrachloroethane	15.42	83	1387	0.3245 ug/L		85
81)	n-Propylbenzene	15.69	91	6224	0.3266 ug/L		99
82)	Bromobenzene	15.82	156	1353	0.2918 ug/L		71
83)	1,3,5-Trimethylbenzene	15.86	105	4376	0.3357 ug/L		99
84)	2-Chlorotoluene	15.94	91	4736	0.3661 ug/L		75
85)	4-Chlorotoluene	16.00	91	4248	0.3638 ug/L		99
86)	a-Methylstyrene	16.24	118	1829	0.2546 ug/L		88
87)	tert-Butylbenzene	16.29	134	845	0.2666 ug/L		62
88)	1,2,4-Trimethylbenzene	16.35	105	4414	0.3237 ug/L		83
89)	sec-Butylbenzene	16.54	105	5762	0.3347 ug/L	#	74
90)	p-Isopropyltoluene	16.69	119	4204	0.3039 ug/L		87
91)	1,3-Dichlorobenzene	16.88	146	3109	0.3769 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	3081	0.3473 ug/L	#	69
93)	n-Butylbenzene	17.18	91	4116	0.3336 ug/L	#	90
94)	1,2-Dichlorobenzene	17.46	146	2641	0.3173 ug/L		96
96)	1,2,4-Trichlorobenzene	19.44	180	1873	0.3134 ug/L	#	45
97)	Hexachlorobutadiene	19.58	225	943	0.2975 ug/L	#	42
98)	Naphthalene	19.79	128	4408	0.3307 ug/L	#	77
99)	1,2,3-Trichlorobenzene	20.08	180	2183	0.3571 ug/L	#	77

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:12:12 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	-3.8239	0.0	0	0.01
3	P	Chloromethane	-1.0000	-1.3371	0.0	0	0.00
4	C	Vinyl Chloride	-1.0000	0.2930	0.0	100	0.00
5	T	1,3-Butadiene	-1.0000	-8.0076	0.0	0	0.01
6	T	Bromomethane	-1.0000	0.4288	0.0	100	0.01
7	T	Chloroethane	-1.0000	0.1246	0.0	100	0.00
8	T	Trichlorofluoromethane	-1.0000	0.2616	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-5.92#
10	T	Isoprene	-1.0000	0.2586	0.0	100	-0.01
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.15#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.0000	0.0	0	-6.16#
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.26#
14	C	1,1-Dichloroethene	-1.0000	0.2876	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.57#
16	T	Dimethyl Sulfide	-1.0000	0.2976	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-6.98#
18	T	Methyl acetate	-1.0000	0.1908	0.0	100	0.01
19	T	Methylene Chloride	-1.0000	0.3199	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3410	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.40#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2904	0.0	100	0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.3027	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.2878	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.06#
26	T	Vinyl Acetate	-1.0000	0.2881	0.0	100	0.01
27	P	1,1-Dichloroethane	-1.0000	0.2964	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.61#
29	T	2-Butanone	-1.0000	0.0974	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-8.89#
31	T	2,2-Dichloropropane	-1.0000	0.2811	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2820	0.0	100	0.00
33	C	Chloroform	0.3000	0.2466	17.8	100	0.00
34	T	1-Bromopropane	-1.0000	0.0000	0.0	0	-9.39#
35	T	Bromochloromethane	-1.0000	0.1852	0.0	0	0.00
36	T	Tetrahydrofuran	-1.0000	2.6551	0.0	100	0.01
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	-1.0000	0.3146	0.0	0	0.00
39	T	Cyclohexane	-1.0000	0.2855	0.0	0	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.2577	0.0	0	0.01
41	T	Carbon Tetrachloride	-1.0000	0.2165	0.0	0	-0.01
42	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.05#
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	-1.0000	0.2856	0.0	0	0.00
45	T	Benzene	-1.0000	0.3517	0.0	0	0.00
46	T	Trichloroethene	-1.0000	0.2678	0.0	0	0.00
47	T	Methylcyclohexane	-1.0000	0.3042	0.0	0	0.00
48	C	1,2-Dichloropropane	-1.0000	0.2222	0.0	0	-0.01
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	-1.0000	0.2852	0.0	0	-0.01
51	T	Dibromomethane	-1.0000	0.1693	0.0	0	-0.01
52	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1690	0.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-11.79#
54	T	cis-1,3-Dichloropropene	-1.0000	0.2831	0.0	0	0.00
55	T	Dimethyl Disulfide	-1.0000	0.1613	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	-1.0000	0.3575	0.0	100	0.00	
59	T	Ethyl Methacrylate	-1.0000	0.1916	0.0	0	0.00	
60	T	trans-1,3-Dichloropropene	-1.0000	0.2573	0.0	0	0.00	
61	T	1,1,2-Trichloroethane	-1.0000	0.2135	0.0	0	0.00	
62	T	2-Hexanone	-1.0000	0.2209	0.0	100	0.00	
63	T	1,3-Dichloropropane	-1.0000	0.3571	0.0	0	0.00	
64	T	Tetrachloroethene	-1.0000	0.3074	0.0	0	0.01	
65	T	Dibromochloromethane	-1.0000	0.2781	0.0	0	0.00	
66	T	1,2-Dibromoethane	-1.0000	0.2045	0.0	0	-0.01	
67	T	1-Chlorohexane	-1.0000	0.2761	0.0	0	0.00	
68	P	Chlorobenzene	-1.0000	0.3739	0.0	0	0.00	
69	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2669	0.0	0	0.01	
70	C	Ethylbenzene	-1.0000	0.2852	0.0	0	0.00	
71	T	m-,p-Xylene	-1.0000	0.6618	0.0	0	0.00	
72	T	o-Xylene	-1.0000	0.3024	0.0	0	0.00	
73	T	Styrene	-1.0000	0.2641	0.0	0	0.00	
74	P	Bromoform	-1.0000	0.0641	0.0	0	0.01	
75	T	Isopropylbenzene	-1.0000	0.3042	0.0	0	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3245	0.0	0	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-15.60#	
80	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-15.63#	
81	T	n-Propylbenzene	-1.0000	0.3266	0.0	0	0.00	
82	T	Bromobenzene	0.3000	0.2918	2.7	100	0.00	
83	T	1,3,5-Trimethylbenzene	-1.0000	0.3357	0.0	0	0.00	
84	T	2-Chlorotoluene	-1.0000	0.3661	0.0	0	0.00	
85	T	4-Chlorotoluene	-1.0000	0.3641	0.0	0	0.01	
86	T	a-Methylstyrene	-1.0000	0.2546	0.0	0	0.01	
87	T	tert-Butylbenzene	-1.0000	0.2666	0.0	0	-0.01	
88	T	1,2,4-Trimethylbenzene	-1.0000	0.3237	0.0	0	0.00	
89	T	sec-Butylbenzene	-1.0000	0.3347	0.0	0	0.00	
90	T	p-Isopropyltoluene	-1.0000	0.3039	0.0	0	0.00	
91	T	1,3-Dichlorobenzene	-1.0000	0.3769	0.0	0	0.01	
92	T	1,4-Dichlorobenzene	-1.0000	0.3473	0.0	0	0.00	
93	T	n-Butylbenzene	-1.0000	0.3326	0.0	0	0.01	
94	T	1,2-Dichlorobenzene	0.3000	0.3173	-5.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-18.38#	
96	T	1,2,4-Trichlorobenzene	-1.0000	0.3134	0.0	0	-0.01	
97	T	Hexachlorobutadiene	-1.0000	0.2975	0.0	0	0.00	
98	T	Naphthalene	-1.0000	0.3307	0.0	0	0.00	
99	T	1,2,3-Trichlorobenzene	0.3000	0.3570	-19.0	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17707.D 8260WT.M Tue Apr 25 11:12:33 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	429611	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	306087	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158073	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1957	0.5753	ug/L #	68
3) Chloromethane	3.65	50	4970	0.2199	ug/L	80
4) Vinyl Chloride	3.89	62	1663	0.4510	ug/L #	67
5) 1,3-Butadiene	3.94	54	1211	Below Cal	#	28
6) Bromomethane	4.78	94	2124	0.5579	ug/L	92
7) Chloroethane	4.92	64	1272	0.3330	ug/L #	43
8) Trichlorofluoromethane	5.41	101	2206	0.3425	ug/L	75
10) Isoprene	5.96	67	2233	0.3346	ug/L	93
12) 1,1,2-Trichloro-1,2,2-Trif	6.18	101	1328	0.3481	ug/L	76
14) 1,1-Dichloroethene	6.47	61	3243	0.4227	ug/L	75
16) Dimethyl Sulfide	6.73	62	2464	0.4088	ug/L	92
18) Methyl acetate	6.98	43	1720	0.3796	ug/L #	66
19) Methylene Chloride	7.23	84	2350	0.4591	ug/L	83
20) Carbon Disulfide	7.28	76	6928	0.5281	ug/L	93
22) Methyl Tert Butyl Ether	7.43	73	4710	0.3674	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	2044	0.4378	ug/L	97
24) n-Hexane	7.72	57	2506	0.3461	ug/L #	71
26) Vinyl Acetate	8.23	43	3174	0.3642	ug/L #	78
27) 1,1-Dichloroethane	8.25	63	4084	0.4150	ug/L #	81
31) 2,2-Dichloropropane	8.99	77	3153	0.4733	ug/L #	65
32) cis-1,2-Dichloroethene	9.06	96	2298	0.4386	ug/L	92
33) Chloroform	9.26	83	4687	0.4084	ug/L	99
35) Bromochloromethane	9.49	130	1188	0.3698	ug/L	82
36) Tetrahydrofuran	9.51	42	4867	2.5457	ug/L	93
38) 1,1,1-Trichloroethane	9.77	97	2706	0.3900	ug/L #	86
39) Cyclohexane	9.80	56	4021	0.4121	ug/L #	88
40) 1,1-Dichloropropene	9.95	75	2367	0.3892	ug/L	84
41) Carbon Tetrachloride	10.09	117	2174	0.3622	ug/L #	83
44) 1,2-Dichloroethane	10.26	62	2810	0.4184	ug/L #	69
45) Benzene	10.29	78	9018	0.4786	ug/L	97
46) Trichloroethene	10.99	130	2302	0.4661	ug/L	85
47) Methylcyclohexane	11.07	83	2842	0.3753	ug/L	95
48) 1,2-Dichloropropane	11.20	63	2544	0.4338	ug/L	89
50) Bromodichloromethane	11.49	83	2617	0.4278	ug/L #	85
51) Dibromomethane	11.56	93	1012	0.3648	ug/L	84
52) 2-Chloroethyl Vinyl Ether	11.76	63	790	0.2466	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	2869	0.3953	ug/L	91
55) Dimethyl Disulfide	12.32	79	1058	0.2335	ug/L	89
58) Toluene	12.47	91	9432	0.4759	ug/L	91
59) Ethyl Methacrylate	12.55	69	1408	0.2585	ug/L	88

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

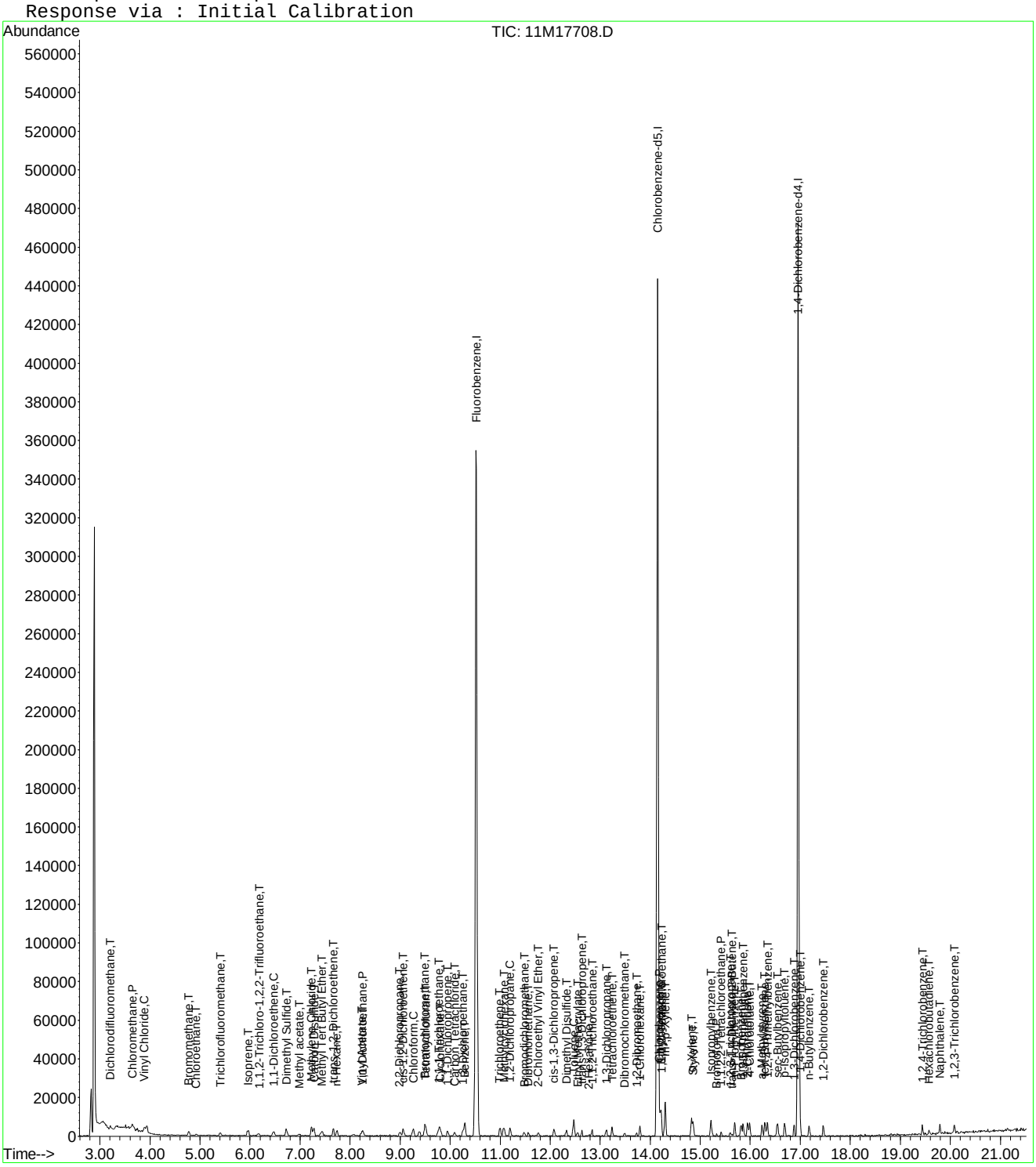
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
60)	trans-1,3-Dichloropropene	12.64	75	2241	0.3582 ug/L	#	76
61)	1,1,2-Trichloroethane	12.84	97	1632	0.3904 ug/L		81
62)	2-Hexanone	12.77	43	804	0.2315 ug/L	#	6
63)	1,3-Dichloropropane	13.12	76	2769	0.3988 ug/L		88
64)	Tetrachloroethene	13.25	164	1464	0.3722 ug/L		96
65)	Dibromochloromethane	13.48	129	1505	0.3229 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1347	0.3584 ug/L		95
67)	1-Chlorohexane	13.79	91	2178	0.3857 ug/L		95
68)	Chlorobenzene	14.19	112	5664	0.4494 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	1850	0.3943 ug/L		95
70)	Ethylbenzene	14.22	106	2675	0.4014 ug/L		59
71)	m-,p-Xylene	14.30	106	7039	0.8827 ug/L		83
72)	o-Xylene	14.83	106	3366	0.4189 ug/L		77
73)	Styrene	14.86	104	4411	0.3704 ug/L		84
74)	Bromoform	15.32	173	846	0.2533 ug/L	#	28
75)	Isopropylbenzene	15.22	105	9020	0.4602 ug/L		87
77)	1,1,2,2-Tetrachloroethane	15.42	83	2043	0.4111 ug/L		84
79)	1,2,3-Trichloropropane	15.60	110	485	0.3408 ug/L	#	30
80)	trans-1,4-Dichloro-2-Buten	15.63	53	454	0.2951 ug/L	#	51
81)	n-Propylbenzene	15.69	91	9041	0.4081 ug/L		94
82)	Bromobenzene	15.82	156	2014	0.3735 ug/L		59
83)	1,3,5-Trimethylbenzene	15.86	105	6098	0.4023 ug/L		97
84)	2-Chlorotoluene	15.94	91	6775	0.4504 ug/L		82
85)	4-Chlorotoluene	15.99	91	6069	0.4470 ug/L		86
86)	a-Methylstyrene	16.23	118	2595	0.3106 ug/L		92
87)	tert-Butylbenzene	16.28	134	1537	0.4171 ug/L		92
88)	1,2,4-Trimethylbenzene	16.35	105	6674	0.4210 ug/L		95
89)	sec-Butylbenzene	16.54	105	8349	0.4171 ug/L		87
90)	p-Isopropyltoluene	16.69	119	6602	0.4104 ug/L		94
91)	1,3-Dichlorobenzene	16.88	146	4328	0.4513 ug/L		91
92)	1,4-Dichlorobenzene	17.00	146	4872	0.4723 ug/L	#	47
93)	n-Butylbenzene	17.17	91	5874	0.4094 ug/L	#	84
94)	1,2-Dichlorobenzene	17.46	146	4243	0.4384 ug/L		83
96)	1,2,4-Trichlorobenzene	19.45	180	2551	0.3671 ug/L	#	64
97)	Hexachlorobutadiene	19.57	225	1261	0.3422 ug/L	#	55
98)	Naphthalene	19.79	128	6212	0.4009 ug/L	#	82
99)	1,2,3-Trichlorobenzene	20.08	180	2584	0.3635 ug/L		93

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	427420	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	301358	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158168	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	12.38	98	215	0.0137	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	3845	0.9358	ug/L #	81
3) Chloromethane	3.65	50	8471	0.9175	ug/L	83
4) Vinyl Chloride	3.88	62	3091	0.8426	ug/L	92
5) 1,3-Butadiene	3.93	54	3188	0.4718	ug/L	79
6) Bromomethane	4.78	94	4082	1.0777	ug/L	82
7) Chloroethane	4.92	64	3226	0.8490	ug/L	98
8) Trichlorofluoromethane	5.39	101	5700	0.8894	ug/L	93
9) Diethyl ether	5.92	59	22406	4.7243	ug/L	97
10) Isoprene	5.96	67	5738	0.8642	ug/L	97
11) Acrolein	6.14	56	1635	2.1674	ug/L	77
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	3050	0.8036	ug/L	90
13) Acetone	6.26	43	1420	0.9936	ug/L #	41
14) 1,1-Dichloroethene	6.46	61	6804	0.8914	ug/L	94
15) Tert-Butyl Alcohol	6.59	59	4610	8.6243	ug/L #	67
16) Dimethyl Sulfide	6.73	62	5154	0.8595	ug/L	99
17) Iodomethane	6.98	142	1485	1.4857	ug/L #	35
18) Methyl acetate	6.98	43	4284	0.9504	ug/L #	75
19) Methylene Chloride	7.23	84	4729	0.9285	ug/L	86
20) Carbon Disulfide	7.27	76	13562	1.0391	ug/L	98
21) Acrylonitrile	7.39	53	4443	2.1049	ug/L	95
22) Methyl Tert Butyl Ether	7.42	73	12080	0.9472	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	4544	0.9782	ug/L	91
24) n-Hexane	7.74	57	5383	0.7472	ug/L #	71
25) Diisopropyl ether	8.07	45	96270	5.1833	ug/L	96
26) Vinyl Acetate	8.23	43	8211	0.9471	ug/L #	81
27) 1,1-Dichloroethane	8.25	63	9588	0.9793	ug/L #	90
28) Ethyl-Tert-Butyl ether	8.61	59	83324	5.0754	ug/L	95
29) 2-Butanone	8.79	43	1733	0.7421	ug/L #	56
30) Propionitrile	8.89	54	3388	4.3491	ug/L #	73
31) 2,2-Dichloropropane	9.00	77	6410	0.9672	ug/L	86
32) cis-1,2-Dichloroethene	9.06	96	4249	0.8152	ug/L	85
33) Chloroform	9.26	83	8839	0.9478	ug/L	98
34) 1-Bromopropane	9.40	122	455	0.7935	ug/L	52
35) Bromochloromethane	9.48	130	3059	0.9571	ug/L	91
36) Tetrahydrofuran	9.50	42	12470	6.5560	ug/L	96
38) 1,1,1-Trichloroethane	9.77	97	6166	0.8931	ug/L #	90
39) Cyclohexane	9.79	56	8715	0.8978	ug/L	98
40) 1,1-Dichloropropene	9.95	75	5779	0.9551	ug/L	87
41) Carbon Tetrachloride	10.08	117	5196	0.8702	ug/L	96
42) Tert-Amyl-Methyl ether	10.05	73	65688	4.9599	ug/L #	98

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

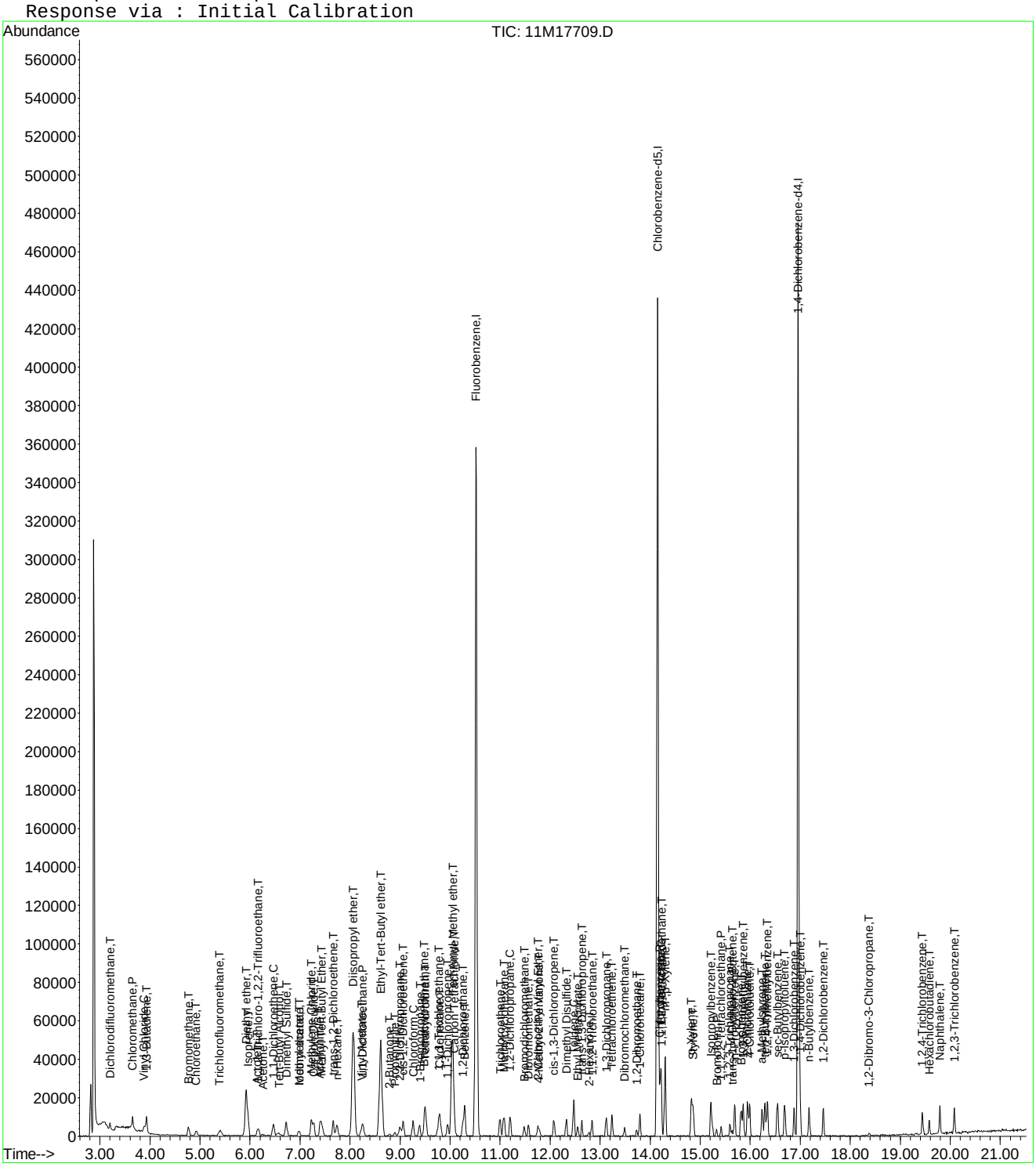
Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	6781	1.0149 ug/L		85
45)	Benzene	10.29	78	19081	1.0179 ug/L		92
46)	Trichloroethene	11.00	130	4396	0.8947 ug/L		96
47)	Methylcyclohexane	11.07	83	6249	0.8295 ug/L		92
48)	1,2-Dichloropropane	11.20	63	5831	0.9995 ug/L		85
50)	Bromodichloromethane	11.49	83	5504	0.9043 ug/L	#	94
51)	Dibromomethane	11.57	93	2305	0.8352 ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	2865	0.8989 ug/L		82
53)	4-Methyl-2-Pentanone	11.78	58	1045	0.5092 ug/L	#	40
54)	cis-1,3-Dichloropropene	12.08	75	6764	0.9367 ug/L		91
55)	Dimethyl Disulfide	12.33	79	3035	0.6734 ug/L		97
58)	Toluene	12.47	91	18436	0.9449 ug/L		99
59)	Ethyl Methacrylate	12.55	69	4204	0.7840 ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	5326	0.8647 ug/L		86
61)	1,1,2-Trichloroethane	12.84	97	3956	0.9612 ug/L		97
62)	2-Hexanone	12.78	43	2630	0.7691 ug/L	#	72
63)	1,3-Dichloropropane	13.12	76	7049	1.0312 ug/L		96
64)	Tetrachloroethene	13.23	164	3174	0.8195 ug/L		78
65)	Dibromochloromethane	13.48	129	3914	0.8530 ug/L		94
66)	1,2-Dibromoethane	13.73	107	3225	0.8716 ug/L		97
67)	1-Chlorohexane	13.79	91	4282	0.7701 ug/L		88
68)	Chlorobenzene	14.20	112	12516	1.0087 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	4130	0.8940 ug/L		99
70)	Ethylbenzene	14.22	106	5925	0.9030 ug/L		65
71)	m-,p-Xylene	14.30	106	15635	1.9915 ug/L		84
72)	o-Xylene	14.82	106	7242	0.9155 ug/L		82
73)	Styrene	14.86	104	10359	0.8835 ug/L		93
74)	Bromoform	15.33	173	2678	0.8145 ug/L		93
75)	Isopropylbenzene	15.22	105	18809	0.9747 ug/L		95
77)	1,1,2,2-Tetrachloroethane	15.42	83	4889	0.9832 ug/L		88
79)	1,2,3-Trichloropropane	15.59	110	1172	0.8231 ug/L		77
80)	trans-1,4-Dichloro-2-Buten	15.64	53	1491	0.9685 ug/L	#	82
81)	n-Propylbenzene	15.69	91	20709	0.9342 ug/L		90
82)	Bromobenzene	15.82	156	5475	1.0148 ug/L		98
83)	1,3,5-Trimethylbenzene	15.86	105	14589	0.9620 ug/L		96
84)	2-Chlorotoluene	15.94	91	15291	1.0159 ug/L		95
85)	4-Chlorotoluene	15.99	91	13421m	0.9879 ug/L		
86)	a-Methylstyrene	16.23	118	6311	0.7550 ug/L		98
87)	tert-Butylbenzene	16.30	134	3577	0.9701 ug/L		91
88)	1,2,4-Trimethylbenzene	16.34	105	15395	0.9706 ug/L		96
89)	sec-Butylbenzene	16.54	105	18675	0.9324 ug/L		96
90)	p-Isopropyltoluene	16.69	119	14956	0.9293 ug/L		92
91)	1,3-Dichlorobenzene	16.87	146	9264	0.9653 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	10534	1.0206 ug/L		83
93)	n-Butylbenzene	17.17	91	13175	0.9178 ug/L	#	86
94)	1,2-Dichlorobenzene	17.46	146	9468	0.9777 ug/L		100
95)	1,2-Dibromo-3-Chloropropan	18.37	75	615	0.7049 ug/L		81
96)	1,2,4-Trichlorobenzene	19.44	180	6133	0.8822 ug/L		97
97)	Hexachlorobutadiene	19.58	225	3043	0.8253 ug/L		86
98)	Naphthalene	19.79	128	15559	1.0034 ug/L	#	90
99)	1,2,3-Trichlorobenzene	20.08	180	6569	0.9236 ug/L		97

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 2

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:15:28 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	1.0000	0.9358	6.4	100	0.00
3	P	Chloromethane	1.0000	0.9175	8.3	100	0.00
4	C	Vinyl Chloride	1.0000	0.8426	15.7	100	-0.01
5	T	1,3-Butadiene	-1.0000	-6.7210	0.0	100	0.00
6	T	Bromomethane	1.0000	1.0777	-7.8	100	0.00
7	T	Chloroethane	1.0000	0.8490	15.1	100	-0.01
8	T	Trichlorofluoromethane	1.0000	0.8894	11.1	100	-0.02
9	T	Diethyl ether	5.0000	4.7243	5.5	100	0.00
10	T	Isoprene	1.0000	0.8642	13.6	100	-0.01
11	T	Acrolein	2.5000	2.1673	13.3	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	0.8036	19.6	100	0.00
13	T	Acetone	-1.0000	0.9936	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.8914	10.9	100	-0.01
15	T	Tert-Butyl Alcohol	10.0000	8.6243	13.8	100	0.02
16	T	Dimethyl Sulfide	1.0000	0.8595	14.0	100	0.00
17	T	Iodomethane	-1.0000	-1.6799	0.0	100	0.00
18	T	Methyl acetate	-1.0000	0.9504	0.0	100	0.00
19	T	Methylene Chloride	1.0000	0.9285	7.1	100	0.00
20	T	Carbon Disulfide	1.0000	1.0391	-3.9	100	-0.01
21	T	Acrylonitrile	2.5000	2.1049	15.8	100	-0.01
22	T	Methyl Tert Butyl Ether	1.0000	0.9472	5.3	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9782	2.2	100	-0.01
24	T	n-Hexane	-1.0000	0.7472	0.0	100	0.01
25	T	Diisopropyl ether	5.0000	5.1833	-3.7	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9471	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9793	2.1	100	-0.01
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0755	-1.5	100	0.00
29	T	2-Butanone	-1.0000	0.7421	0.0	100	0.00
30	T	Propionitrile	5.0000	4.3491	13.0	100	0.00
31	T	2,2-Dichloropropane	1.0000	0.9672	3.3	100	-0.01
32	T	cis-1,2-Dichloroethene	1.0000	0.8152	18.5	100	-0.01
33	C	Chloroform	1.0000	0.9478	5.2	100	0.00
34	T	1-Bromopropane	1.0000	0.7935	20.7	100	0.01
35	T	Bromochloromethane	1.0000	0.9571	4.3	100	0.00
36	T	Tetrahydrofuran	5.0000	6.5560	-31.1#	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	1.0000	0.8932	10.7	100	0.01
39	T	Cyclohexane	1.0000	0.8978	10.2	100	-0.01
40	T	1,1-Dichloropropene	1.0000	0.9551	4.5	100	0.00
41	T	Carbon Tetrachloride	1.0000	0.8702	13.0	100	-0.01
42	T	Tert-Amyl-Methyl ether	5.0000	4.9599	0.8	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	1.0000	1.0149	-1.5	100	0.00
45	T	Benzene	1.0000	1.0179	-1.8	100	0.00
46	T	Trichloroethene	1.0000	0.8947	10.5	100	0.00
47	T	Methylcyclohexane	1.0000	0.8296	17.0	100	0.00
48	C	1,2-Dichloropropane	1.0000	0.9995	0.0	100	0.00
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	1.0000	0.9043	9.6	100	0.00
51	T	Dibromomethane	1.0000	0.8353	16.5	100	0.00
52	T	2-Chloroethyl Vinyl Ether	1.0000	0.8989	10.1	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.5092	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	1.0000	0.9367	6.3	100	0.00
55	T	Dimethyl Disulfide	-1.0000	0.6734	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0137	0.0	100	0.00

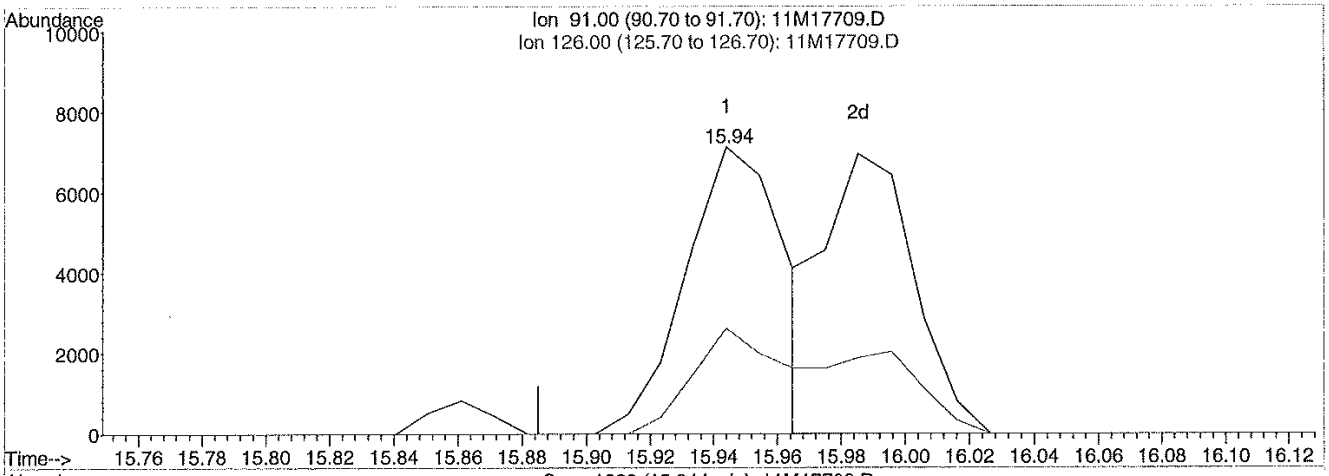
58	C	Toluene	1.0000	0.9449	5.5	100	0.00	
59	T	Ethyl Methacrylate	1.0000	0.7840	21.6	100	0.00	
60	T	trans-1,3-Dichloropropene	1.0000	0.8647	13.5	100	0.00	
61	T	1,1,2-Trichloroethane	1.0000	0.9612	3.9	100	0.00	
62	T	2-Hexanone	-1.0000	0.7691	0.0	100	0.01	
63	T	1,3-Dichloropropane	1.0000	1.0312	-3.1	100	0.00	
64	T	Tetrachloroethene	1.0000	0.8195	18.0	100	0.00	
65	T	Dibromochloromethane	1.0000	0.8530	14.7	100	-0.01	
66	T	1,2-Dibromoethane	1.0000	0.8716	12.8	100	0.00	
67	T	1-Chlorohexane	1.0000	0.7701	23.0	100	0.00	
68	P	Chlorobenzene	1.0000	1.0087	-0.9	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	1.0000	0.8941	10.6	100	0.01	
70	C	Ethylbenzene	1.0000	0.9030	9.7	100	0.00	
71	T	m-,p-Xylene	2.0000	1.9915	0.4	100	0.00	
72	T	o-Xylene	1.0000	0.9155	8.5	100	-0.01	
73	T	Styrene	1.0000	0.8835	11.6	100	0.00	
74	P	Bromoform	1.0000	0.8145	18.6	100	0.01	
75	T	Isopropylbenzene	1.0000	0.9747	2.5	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	1.0000	0.9832	1.7	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	1.0000	0.8231	17.7	100	-0.01	
80	T	trans-1,4-Dichloro-2-Butene	1.0000	0.9685	3.2	100	0.01	
81	T	n-Propylbenzene	1.0000	0.9342	6.6	100	0.00	
82	T	Bromobenzene	1.0000	1.0148	-1.5	100	0.00	
83	T	1,3,5-Trimethylbenzene	1.0000	0.9619	3.8	100	0.00	
84	T	2-Chlorotoluene	1.0000	1.0159	-1.6	100	0.00	
85	T	4-Chlorotoluene	1.0000	1.1267	-12.7	115	-0.04	
86	T	a-Methylstyrene	-1.0000	0.7550	0.0	100	0.00	
87	T	tert-Butylbenzene	1.0000	0.9701	3.0	100	0.00	
88	T	1,2,4-Trimethylbenzene	1.0000	0.9706	2.9	100	-0.01	
89	T	sec-Butylbenzene	1.0000	0.9324	6.8	100	0.00	
90	T	p-Isopropyltoluene	1.0000	0.9293	7.1	100	0.00	
91	T	1,3-Dichlorobenzene	1.0000	0.9653	3.5	100	0.00	
92	T	1,4-Dichlorobenzene	1.0000	1.0207	-2.1	100	0.00	
93	T	n-Butylbenzene	1.0000	0.9151	8.5	100	0.00	
94	T	1,2-Dichlorobenzene	1.0000	0.9777	2.2	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	1.0000	0.7049	29.5#	100	-0.01	
96	T	1,2,4-Trichlorobenzene	1.0000	0.8822	11.8	100	-0.01	
97	T	Hexachlorobutadiene	1.0000	0.8253	17.5	100	0.00	
98	T	Naphthalene	1.0000	1.0034	-0.3	100	0.00	
99	T	1,2,3-Trichlorobenzene	1.0000	0.9236	7.6	100	0.00	

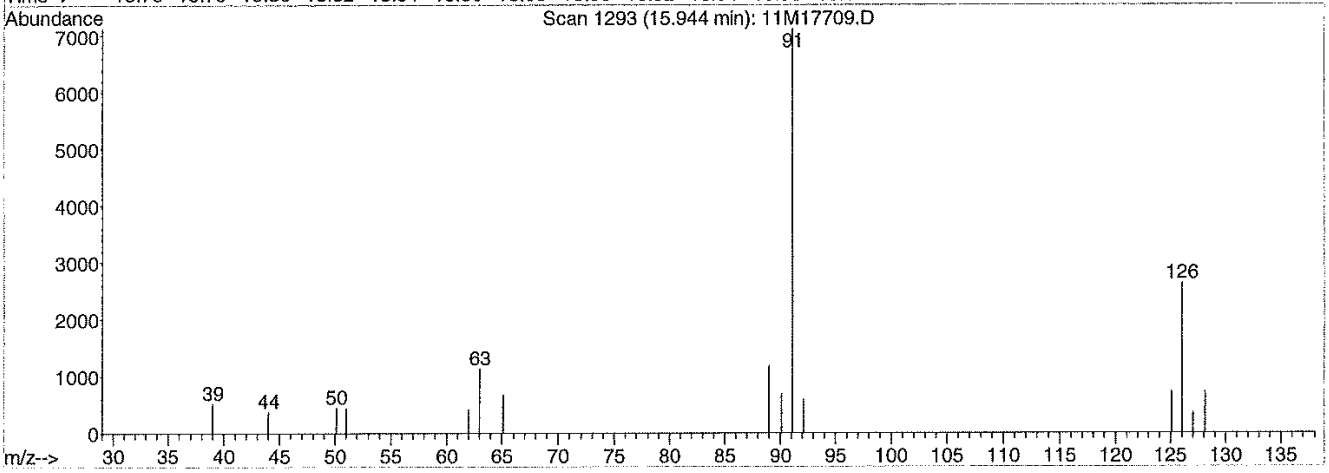
(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17709.D 8260WT.M Tue Apr 25 11:16:29 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:53 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.94min 1.13ug/L

response 15291

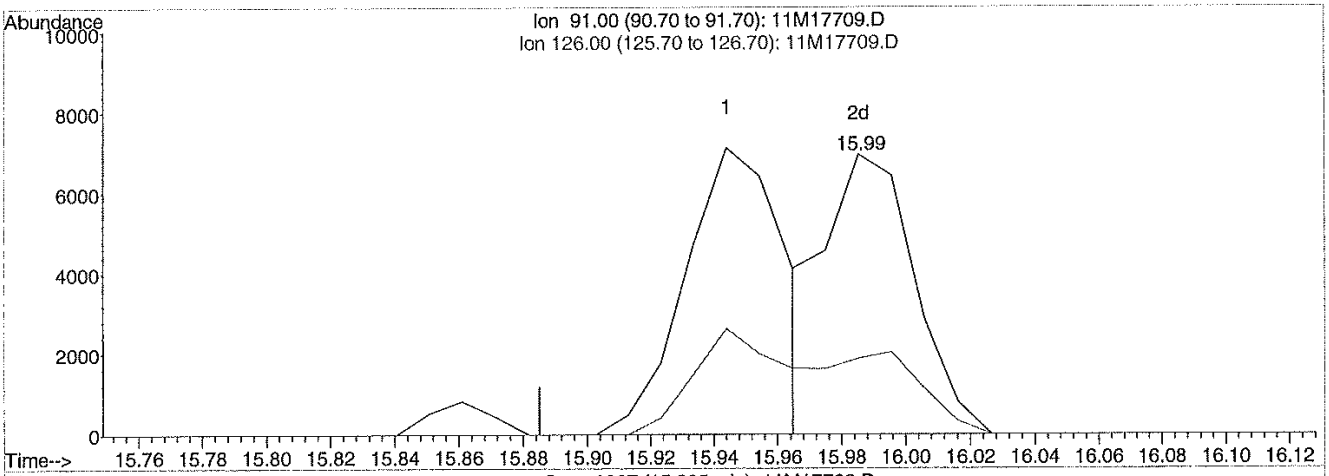
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	39.59
0.00	0.00	0.00
0.00	0.00	0.00

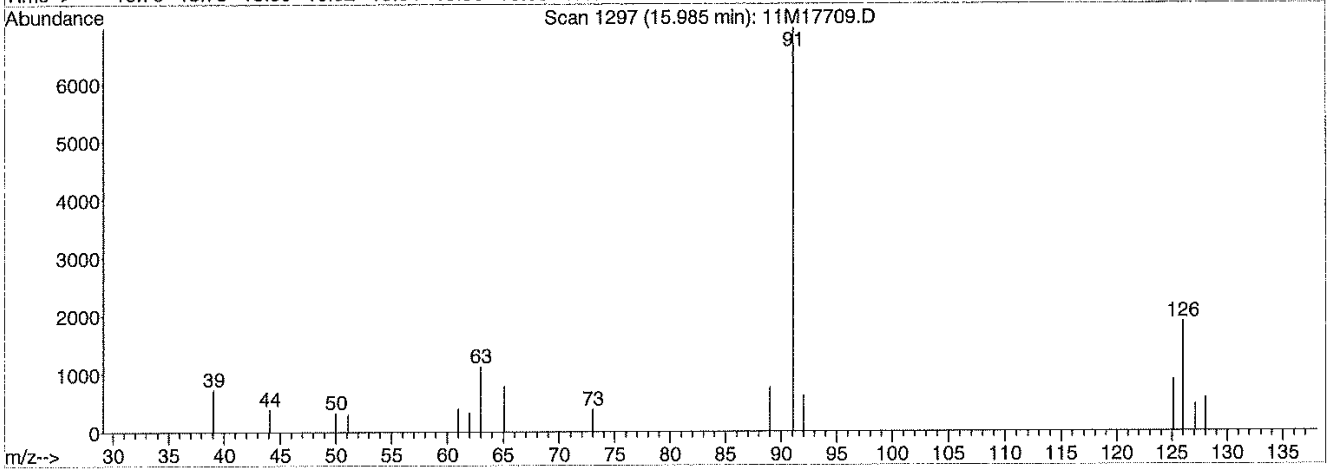
11M17709.D 8260WT.M Tue Apr 25 12:00:08 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:00 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.99min 0.99ug/L mint

response 13421

Ion	Exp%	Act%
91.00	100	100
126.00	29.80	45.11#
0.00	0.00	0.00
0.00	0.00	0.00

#3 JDS 4/28/17

FJB 4-28-17

11M17709.D 8260WT.M Tue Apr 25 12:00:48 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.52	96	423052	25.00	ug/L		-0.01
56) Chlorobenzene-d5	14.14	117	298274	25.00	ug/L		0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158082	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#			
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L		
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#			
57) Toluene-d8	0.00	98	0	0.0000	ug/L		
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#			
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.21	85	8171	1.7736	ug/L		97
3) Chloromethane	3.65	50	14006	2.0410	ug/L		98
4) Vinyl Chloride	3.88	62	7048	1.9411	ug/L		92
5) 1,3-Butadiene	3.94	54	5898	1.8029	ug/L		82
6) Bromomethane	4.77	94	8565	2.2846	ug/L		93
7) Chloroethane	4.92	64	7416	1.9717	ug/L		96
8) Trichlorofluoromethane	5.41	101	12401	1.9549	ug/L		96
9) Diethyl ether	5.91	59	125331	26.6986	ug/L		99
10) Isoprene	5.97	67	12223	1.8599	ug/L		98
11) Acrolein	6.15	56	9083	12.1647	ug/L		87
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	7120	1.8953	ug/L		95
13) Acetone	6.26	43	2853	2.0169	ug/L	#	58
14) 1,1-Dichloroethene	6.46	61	14698	1.9454	ug/L		92
15) Tert-Butyl Alcohol	6.57	59	26412	49.9213	ug/L		98
16) Dimethyl Sulfide	6.73	62	12206	2.0565	ug/L		95
17) Iodomethane	6.97	142	4155	1.9912	ug/L		84
18) Methyl acetate	6.98	43	8771	1.9660	ug/L	#	90
19) Methylene Chloride	7.23	84	10291	2.0415	ug/L		96
20) Carbon Disulfide	7.27	76	25649	1.9855	ug/L		99
21) Acrylonitrile	7.40	53	25609	12.2578	ug/L		98
22) Methyl Tert Butyl Ether	7.43	73	26251	2.0795	ug/L		95
23) trans-1,2-Dichloroethene	7.66	96	8682	1.8884	ug/L		96
24) n-Hexane	7.73	57	11742	1.6467	ug/L	#	90
25) Diisopropyl ether	8.07	45	526087	28.6176	ug/L		96
26) Vinyl Acetate	8.23	43	18149	2.1149	ug/L		94
27) 1,1-Dichloroethane	8.26	63	19706	2.0335	ug/L		93
28) Ethyl-Tert-Butyl ether	8.61	59	458837	28.2373	ug/L		96
29) 2-Butanone	8.79	43	4278	1.8509	ug/L		85
30) Propionitrile	8.89	54	19554	25.3600	ug/L		96
31) 2,2-Dichloropropane	9.00	77	13045	1.9887	ug/L		95
32) cis-1,2-Dichloroethene	9.06	96	10257	1.9881	ug/L		99
33) Chloroform	9.26	83	17270	2.0597	ug/L		97
34) 1-Bromopropane	9.39	122	1887	2.1774	ug/L		87
35) Bromochloromethane	9.48	130	6167	1.9495	ug/L		91
36) Tetrahydrofuran	9.50	42	47591	25.2790	ug/L		99
38) 1,1,1-Trichloroethane	9.76	97	13223	1.9351	ug/L	#	97
39) Cyclohexane	9.80	56	18403	1.9154	ug/L		98
40) 1,1-Dichloropropene	9.95	75	11588	1.9350	ug/L		94
41) Carbon Tetrachloride	10.08	117	10600	1.7935	ug/L		98
42) Tert-Amyl-Methyl ether	10.04	73	366534	27.9618	ug/L		99

(#) = qualifier out of range (m) = manual integration
11M17710.D 8260WT.M Tue Apr 25 14:17:44 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

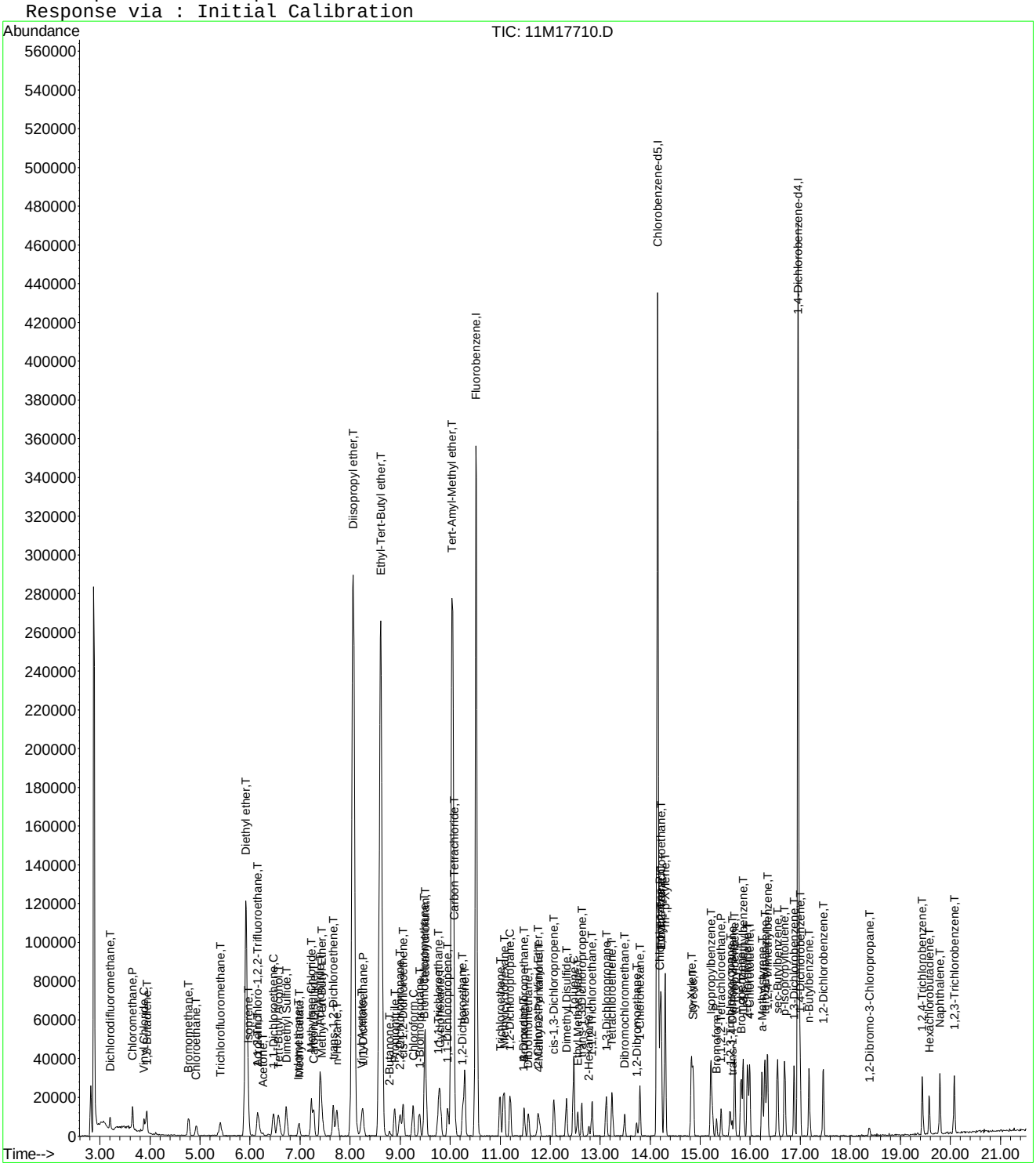
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.25	62	13423	2.0298	ug/L		99
45)	Benzene	10.29	78	38755	2.0889	ug/L		97
46)	Trichloroethene	11.00	130	9148	1.8811	ug/L		95
47)	Methylcyclohexane	11.08	83	14663	1.9666	ug/L		95
48)	1,2-Dichloropropane	11.20	63	11593	2.0077	ug/L		92
49)	1,4-Dioxane	11.47	88	2174	41.6924	ug/L		91
50)	Bromodichloromethane	11.48	83	11628	1.9302	ug/L		96
51)	Dibromomethane	11.56	93	5303	1.9415	ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	5429	1.7209	ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	3489	1.7175	ug/L	#	78
54)	cis-1,3-Dichloropropene	12.08	75	13651	1.9099	ug/L		97
55)	Dimethyl Disulfide	12.32	79	6926	1.5525	ug/L		98
58)	Toluene	12.47	91	38249	1.9806	ug/L		98
59)	Ethyl Methacrylate	12.55	69	9441	1.7788	ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	11353	1.8624	ug/L		97
61)	1,1,2-Trichloroethane	12.83	97	7908	1.9412	ug/L		94
62)	2-Hexanone	12.77	43	5906	1.7450	ug/L	#	69
63)	1,3-Dichloropropane	13.12	76	14255	2.1069	ug/L		99
64)	Tetrachloroethene	13.23	164	7409	1.9327	ug/L		99
65)	Dibromochloromethane	13.48	129	8612	1.8962	ug/L		95
66)	1,2-Dibromoethane	13.73	107	7412	2.0240	ug/L		99
67)	1-Chlorohexane	13.79	91	10002	1.8174	ug/L		97
68)	Chlorobenzene	14.20	112	26139	2.1284	ug/L		99
69)	1,1,1,2-Tetrachloroethane	14.22	131	8771	1.9183	ug/L		95
70)	Ethylbenzene	14.22	106	12495	1.9240	ug/L		75
71)	m-,p-Xylene	14.30	106	32038	4.1230	ug/L		87
72)	o-Xylene	14.83	106	16027	2.0470	ug/L		96
73)	Styrene	14.86	104	22629	1.9500	ug/L		99
74)	Bromoform	15.32	173	5086	1.5628	ug/L		97
75)	Isopropylbenzene	15.22	105	39378	2.0616	ug/L		91
77)	1,1,2,2-Tetrachloroethane	15.42	83	10345	2.0816	ug/L		98
79)	1,2,3-Trichloropropane	15.60	110	2638	1.8538	ug/L		80
80)	trans-1,4-Dichloro-2-Buten	15.64	53	2763	1.7957	ug/L		85
81)	n-Propylbenzene	15.69	91	44389	2.0034	ug/L		93
82)	Bromobenzene	15.82	156	11263	2.0888	ug/L		97
83)	1,3,5-Trimethylbenzene	15.86	105	29561	1.9502	ug/L		99
84)	2-Chlorotoluene	15.94	91	29746	1.9774	ug/L		84
85)	4-Chlorotoluene	15.99	91	27997	2.0620	ug/L		91
86)	a-Methylstyrene	16.24	118	14142	1.6928	ug/L		98
87)	tert-Butylbenzene	16.30	134	7098	1.9260	ug/L		84
88)	1,2,4-Trimethylbenzene	16.35	105	33715	2.1267	ug/L		92
89)	sec-Butylbenzene	16.54	105	39307	1.9635	ug/L		96
90)	p-Isopropyltoluene	16.69	119	31619	1.9656	ug/L		99
91)	1,3-Dichlorobenzene	16.87	146	19564	2.0397	ug/L		100
92)	1,4-Dichlorobenzene	17.00	146	21139	2.0493	ug/L		91
93)	n-Butylbenzene	17.17	91	27403	1.9100	ug/L		93
94)	1,2-Dichlorobenzene	17.46	146	20869	2.1562	ug/L		97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	1569	1.7994	ug/L		89
96)	1,2,4-Trichlorobenzene	19.44	180	13382	1.9259	ug/L		99
97)	Hexachlorobutadiene	19.58	225	6745	1.8303	ug/L		95
98)	Naphthalene	19.79	128	31285	2.0187	ug/L	#	96
99)	1,2,3-Trichlorobenzene	20.08	180	13778	1.9382	ug/L		95

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:24:44 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	2.0000	1.7736	11.3	100	0.00
3	P	Chloromethane	2.0000	2.0410	-2.0	100	0.00
4	C	Vinyl Chloride	2.0000	1.9411	2.9	100	-0.01
5	T	1,3-Butadiene	2.0000	1.8029	9.9	100	0.01
6	T	Bromomethane	2.0000	2.2846	-14.2	100	-0.01
7	T	Chloroethane	2.0000	1.9717	1.4	100	-0.01
8	T	Trichlorofluoromethane	2.0000	1.9550	2.3	100	0.00
9	T	Diethyl ether	25.0000	26.6987	-6.8	100	-0.01
10	T	Isoprene	2.0000	1.8600	7.0	100	0.00
11	T	Acrolein	12.5000	12.1647	2.7	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8953	5.2	100	-0.01
13	T	Acetone	2.0000	2.0169	-0.8	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9454	2.7	100	-0.01
15	T	Tert-Butyl Alcohol	50.0000	49.9213	0.2	100	0.00
16	T	Dimethyl Sulfide	2.0000	2.0565	-2.8	100	0.00
17	T	Iodomethane	2.0000	1.9912	0.4	100	0.00
18	T	Methyl acetate	2.0000	1.9660	1.7	100	0.00
19	T	Methylene Chloride	2.0000	2.0415	-2.1	100	0.00
20	T	Carbon Disulfide	2.0000	1.9855	0.7	100	-0.01
21	T	Acrylonitrile	12.5000	12.2578	1.9	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	2.0795	-4.0	100	0.00
23	T	trans-1,2-Dichloroethene	2.0000	1.8884	5.6	100	-0.01
24	T	n-Hexane	2.0000	1.6467	17.7	100	0.00
25	T	Diisopropyl ether	25.0000	28.6176	-14.5	100	0.00
26	T	Vinyl Acetate	2.0000	2.1149	-5.7	100	0.00
27	P	1,1-Dichloroethane	2.0000	2.0335	-1.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	28.2373	-12.9	100	0.00
29	T	2-Butanone	2.0000	1.8509	7.5	100	0.00
30	T	Propionitrile	25.0000	25.3600	-1.4	100	0.00
31	T	2,2-Dichloropropane	2.0000	1.9887	0.6	100	-0.01
32	T	cis-1,2-Dichloroethene	2.0000	1.9881	0.6	100	-0.01
33	C	Chloroform	2.0000	2.0597	-3.0	100	0.00
34	T	1-Bromopropane	2.0000	2.1774	-8.9	100	0.00
35	T	Bromochloromethane	2.0000	1.9495	2.5	100	0.00
36	T	Tetrahydrofuran	25.0000	25.2790	-1.1	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	2.0000	1.9351	3.2	100	0.00
39	T	Cyclohexane	2.0000	1.9154	4.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9349	3.3	100	0.00
41	T	Carbon Tetrachloride	2.0000	1.7935	10.3	100	-0.01
42	T	Tert-Amyl-Methyl ether	25.0000	27.9618	-11.8	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	2.0000	2.0298	-1.5	100	0.00
45	T	Benzene	2.0000	2.0889	-4.4	100	0.00
46	T	Trichloroethene	2.0000	1.8811	5.9	100	0.00
47	T	Methylcyclohexane	2.0000	1.9666	1.7	100	0.01
48	C	1,2-Dichloropropane	2.0000	2.0077	-0.4	100	0.00
49	T	1,4-Dioxane	-1.0000	41.6924	0.0	100	0.00
50	T	Bromodichloromethane	2.0000	1.9302	3.5	100	-0.01
51	T	Dibromomethane	2.0000	1.9415	2.9	100	-0.01
52	T	2-Chloroethyl Vinyl Ether	2.0000	1.7209	14.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	1.7175	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	2.0000	1.9099	4.5	100	0.00
55	T	Dimethyl Disulfide	-1.0000	1.5525	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	2.0000	1.9806	1.0	100	0.00	
59	T	Ethyl Methacrylate	2.0000	1.7788	11.1	100	0.00	
60	T	trans-1,3-Dichloropropene	2.0000	1.8623	6.9	100	0.00	
61	T	1,1,2-Trichloroethane	2.0000	1.9412	2.9	100	-0.01	
62	T	2-Hexanone	-1.0000	1.7450	0.0	100	0.00	
63	T	1,3-Dichloropropane	2.0000	2.1069	-5.3	100	0.00	
64	T	Tetrachloroethene	2.0000	1.9327	3.4	100	0.00	
65	T	Dibromochloromethane	2.0000	1.8962	5.2	100	-0.01	
66	T	1,2-Dibromoethane	2.0000	2.0240	-1.2	100	0.00	
67	T	1-Chlorohexane	2.0000	1.8174	9.1	100	0.00	
68	P	Chlorobenzene	2.0000	2.1284	-6.4	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	2.0000	1.9184	4.1	100	0.00	
70	C	Ethylbenzene	2.0000	1.9240	3.8	100	0.00	
71	T	m-,p-Xylene	4.0000	4.1230	-3.1	100	0.00	
72	T	o-Xylene	2.0000	2.0470	-2.4	100	0.00	
73	T	Styrene	2.0000	1.9500	2.5	100	0.00	
74	P	Bromoform	2.0000	1.5628	21.9	100	0.00	
75	T	Isopropylbenzene	2.0000	2.0616	-3.1	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	2.0000	2.0816	-4.1	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	2.0000	1.8538	7.3	100	0.00	
80	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7957	10.2	100	0.01	
81	T	n-Propylbenzene	2.0000	2.0034	-0.2	100	0.00	
82	T	Bromobenzene	2.0000	2.0888	-4.4	100	0.00	
83	T	1,3,5-Trimethylbenzene	2.0000	1.9502	2.5	100	0.00	
84	T	2-Chlorotoluene	2.0000	1.9774	1.1	100	0.00	
85	T	4-Chlorotoluene	2.0000	2.0641	-3.2	100	0.00	
86	T	a-Methylstyrene	-1.0000	1.6928	0.0	0	0.01	
87	T	tert-Butylbenzene	2.0000	1.9260	3.7	100	0.00	
88	T	1,2,4-Trimethylbenzene	2.0000	2.1267	-6.3	100	0.00	
89	T	sec-Butylbenzene	2.0000	1.9635	1.8	100	0.00	
90	T	p-Isopropyltoluene	2.0000	1.9656	1.7	100	0.00	
91	T	1,3-Dichlorobenzene	2.0000	2.0398	-2.0	100	0.00	
92	T	1,4-Dichlorobenzene	2.0000	2.0493	-2.5	100	0.00	
93	T	n-Butylbenzene	2.0000	1.9044	4.8	100	0.00	
94	T	1,2-Dichlorobenzene	2.0000	2.1562	-7.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7994	10.0	100	0.00	
96	T	1,2,4-Trichlorobenzene	2.0000	1.9259	3.7	100	-0.01	
97	T	Hexachlorobutadiene	2.0000	1.8303	8.5	100	0.00	
98	T	Naphthalene	2.0000	2.0187	-0.9	100	0.00	
99	T	1,2,3-Trichlorobenzene	2.0000	1.9382	3.1	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0

11M17710.D 8260WT.M Tue Apr 25 11:24:59 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	428779	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	303515	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	159230	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	21997	5.1792	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.72%#			
43) 1,2-Dichloroethane-d4	10.14	65	25817	5.2381	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 20.96%#			
57) Toluene-d8	12.38	98	85704	5.4381	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 21.76%#			
78) p-Bromofluorobenzene	15.54	95	28349	5.1223	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 20.48%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	22183	4.4060	ug/L	96
3) Chloromethane	3.66	50	27821	4.7278	ug/L	95
4) Vinyl Chloride	3.89	62	17550	4.7689	ug/L	99
5) 1,3-Butadiene	3.93	54	13640	5.4863	ug/L	89
6) Bromomethane	4.78	94	19431	5.1137	ug/L	98
7) Chloroethane	4.93	64	18475	4.8465	ug/L	99
8) Trichlorofluoromethane	5.41	101	32605	5.0713	ug/L	99
9) Diethyl ether	5.92	59	249706	52.4832	ug/L	99
10) Isoprene	5.96	67	33440	5.0205	ug/L	96
11) Acrolein	6.15	56	19773	26.1280	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	18985	4.9861	ug/L	96
13) Acetone	6.26	43	6991	4.8763	ug/L	95
14) 1,1-Dichloroethene	6.47	61	37724	4.9264	ug/L	97
15) Tert-Butyl Alcohol	6.58	59	54089	100.8680	ug/L	99
16) Dimethyl Sulfide	6.73	62	30254	5.0292	ug/L	97
17) Iodomethane	6.97	142	17033	4.3725	ug/L	96
18) Methyl acetate	6.99	43	22739	5.0288	ug/L	95
19) Methylene Chloride	7.23	84	24965	4.8863	ug/L	93
20) Carbon Disulfide	7.27	76	66413	5.0725	ug/L	100
21) Acrylonitrile	7.40	53	52004	24.5594	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	66369	5.1874	ug/L	98
23) trans-1,2-Dichloroethene	7.66	96	22656	4.8619	ug/L	99
24) n-Hexane	7.73	57	34418	4.7622	ug/L	97
25) Diisopropyl ether	8.07	45	1035574	55.5799	ug/L	97
26) Vinyl Acetate	8.23	43	41746	4.7998	ug/L	97
27) 1,1-Dichloroethane	8.26	63	50180	5.1091	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	902275	54.7853	ug/L	97
29) 2-Butanone	8.79	43	11494	4.9065	ug/L	88
30) Propionitrile	8.89	54	39167	50.1181	ug/L	99
31) 2,2-Dichloropropane	9.01	77	32896	4.9480	ug/L	96
32) cis-1,2-Dichloroethene	9.06	96	26061	4.9839	ug/L	95
33) Chloroform	9.26	83	41854	5.1947	ug/L	98
34) 1-Bromopropane	9.39	122	4450	4.5889	ug/L	94
35) Bromochloromethane	9.48	130	16004	4.9916	ug/L	95
36) Tetrahydrofuran	9.50	42	92549	48.5028	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	34620	4.9988	ug/L	97
39) Cyclohexane	9.80	56	49732	5.1069	ug/L	98
40) 1,1-Dichloropropene	9.95	75	30690	5.0561	ug/L	97
41) Carbon Tetrachloride	10.09	117	30445	5.0826	ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	718908	54.1108	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17711.D 8260WT.M Tue Apr 25 14:17:57 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

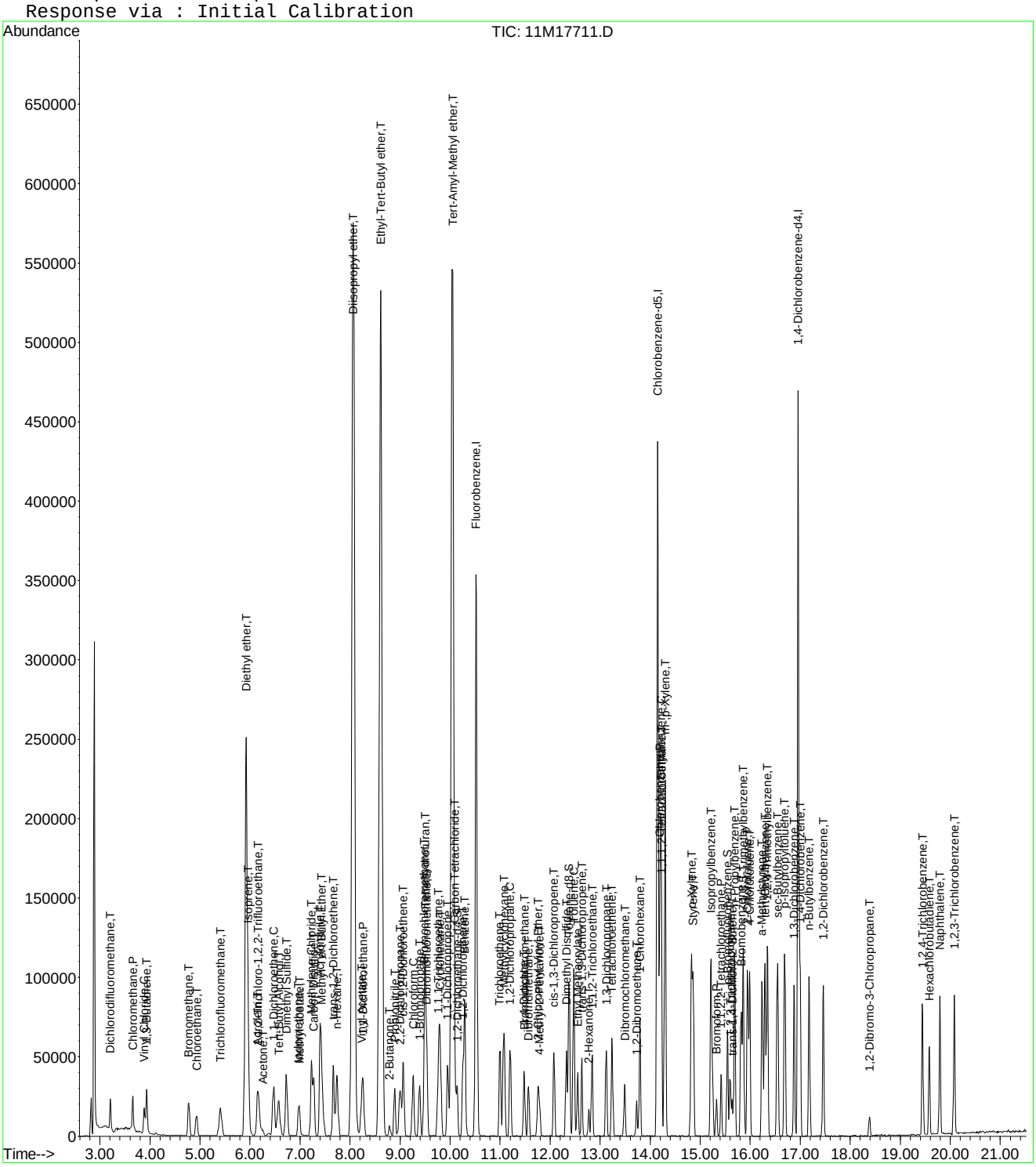
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	34564	5.1568 ug/L	97
45)	Benzene	10.29	78	98721	5.2499 ug/L	97
46)	Trichloroethene	10.99	130	24435	4.9574 ug/L	99
47)	Methylcyclohexane	11.07	83	38311	5.0696 ug/L	96
48)	1,2-Dichloropropane	11.20	63	28756	4.9135 ug/L	96
49)	1,4-Dioxane	11.48	88	4775	90.3507 ug/L	96
50)	Bromodichloromethane	11.49	83	29635	4.8536 ug/L	98
51)	Dibromomethane	11.57	93	14576	5.2651 ug/L	93
52)	2-Chloroethyl Vinyl Ether	11.76	63	14370	4.4942 ug/L	98
53)	4-Methyl-2-Pentanone	11.79	58	8487	4.1220 ug/L	95
54)	cis-1,3-Dichloropropene	12.08	75	36650	5.0591 ug/L	100
55)	Dimethyl Disulfide	12.32	79	18858	4.1706 ug/L	97
58)	Toluene	12.47	91	100679	5.1234 ug/L	95
59)	Ethyl Methacrylate	12.55	69	25852	4.7866 ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	32301	5.2072 ug/L	96
61)	1,1,2-Trichloroethane	12.84	97	21812	5.2618 ug/L	100
62)	2-Hexanone	12.77	43	16299	4.7327 ug/L	94
63)	1,3-Dichloropropane	13.12	76	36430	5.2914 ug/L	99
64)	Tetrachloroethene	13.23	164	20026	5.1338 ug/L	98
65)	Dibromochloromethane	13.49	129	23433	5.0705 ug/L	98
66)	1,2-Dibromoethane	13.73	107	18938	5.0820 ug/L	100
67)	1-Chlorohexane	13.79	91	27949	4.9909 ug/L	97
68)	Chlorobenzene	14.20	112	65228	5.2197 ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.23	131	23202	4.9870 ug/L	99
70)	Ethylbenzene	14.22	106	34657	5.2444 ug/L	85
71)	m-,p-Xylene	14.30	106	84626	10.7026 ug/L	87
72)	o-Xylene	14.83	106	41271	5.1802 ug/L	91
73)	Styrene	14.86	104	62547	5.2968 ug/L	98
74)	Bromoform	15.32	173	14707	4.4411 ug/L	98
75)	Isopropylbenzene	15.22	105	103427	5.3214 ug/L	95
77)	1,1,2,2-Tetrachloroethane	15.42	83	26325	5.2589 ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	7568	5.2799 ug/L	98
80)	trans-1,4-Dichloro-2-Buten	15.64	53	7445	4.8037 ug/L	95
81)	n-Propylbenzene	15.69	91	120808	5.4132 ug/L	94
82)	Bromobenzene	15.82	156	29282	5.3915 ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	86498	5.6654 ug/L	96
84)	2-Chlorotoluene	15.94	91	80304	5.2998 ug/L	94
85)	4-Chlorotoluene	15.99	91	75635	5.5305 ug/L	95
86)	a-Methylstyrene	16.23	118	41076	4.8814 ug/L	98
87)	tert-Butylbenzene	16.30	134	18231	4.9113 ug/L	74
88)	1,2,4-Trimethylbenzene	16.34	105	90217	5.6498 ug/L	94
89)	sec-Butylbenzene	16.54	105	108569	5.3842 ug/L	95
90)	p-Isopropyltoluene	16.69	119	91804	5.6660 ug/L	95
91)	1,3-Dichlorobenzene	16.87	146	53587	5.5467 ug/L	97
92)	1,4-Dichlorobenzene	17.00	146	52478	5.0507 ug/L	99
93)	n-Butylbenzene	17.17	91	75319	5.2119 ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	53808	5.5195 ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	4345	4.9470 ug/L	91
96)	1,2,4-Trichlorobenzene	19.45	180	36374	5.1970 ug/L	99
97)	Hexachlorobutadiene	19.58	225	18114	4.8798 ug/L	98
98)	Naphthalene	19.79	128	82884	5.3097 ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	36011	5.0292 ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17711.D 8260WT.M Tue Apr 25 14:17:57 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	436695	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	310777	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	168187	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	39986	9.2441	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.96%#			
43) 1,2-Dichloroethane-d4	10.14	65	46884	9.3400	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.36%#			
57) Toluene-d8	12.38	98	157855	9.7822	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 39.12%#			
78) p-Bromofluorobenzene	15.54	95	53711	9.1881	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 36.76%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	119907	22.4994	ug/L	100
3) Chloromethane	3.65	50	131720	24.7445	ug/L	98
4) Vinyl Chloride	3.88	62	77026	20.5511	ug/L	99
5) 1,3-Butadiene	3.92	54	40987	18.4416	ug/L	94
6) Bromomethane	4.77	94	73160	18.9046	ug/L	99
7) Chloroethane	4.92	64	82150	21.1595	ug/L	99
8) Trichlorofluoromethane	5.41	101	139146	21.2503	ug/L	100
9) Diethyl ether	5.91	59	401213	82.7983	ug/L	100
10) Isoprene	5.96	67	141743	20.8949	ug/L	98
11) Acrolein	6.14	56	32156	41.7206	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	81406	20.9925	ug/L	99
13) Acetone	6.25	43	30233	20.7056	ug/L	93
14) 1,1-Dichloroethene	6.46	61	159850	20.4966	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	88568	162.1723	ug/L	98
16) Dimethyl Sulfide	6.72	62	129191	21.0867	ug/L	98
17) Iodomethane	6.97	142	104516	20.2684	ug/L	98
18) Methyl acetate	6.98	43	95685	20.7776	ug/L	99
19) Methylene Chloride	7.23	84	103909	19.9691	ug/L	97
20) Carbon Disulfide	7.27	76	274943	20.6190	ug/L	98
21) Acrylonitrile	7.40	53	89042	41.2886	ug/L	98
22) Methyl Tert Butyl Ether	7.42	73	273761	21.0092	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	96267	20.2843	ug/L	99
24) n-Hexane	7.73	57	146088	19.8470	ug/L	99
25) Diisopropyl ether	8.06	45	1618979	85.3165	ug/L	99
26) Vinyl Acetate	8.23	43	176447	19.9194	ug/L	99
27) 1,1-Dichloroethane	8.26	63	205623	20.5559	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1426794	85.0632	ug/L	98
29) 2-Butanone	8.79	43	49794	20.8706	ug/L	98
30) Propionitrile	8.89	54	65774	82.6388	ug/L	99
31) 2,2-Dichloropropane	9.01	77	135298	19.9819	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	110879	20.8200	ug/L	98
33) Chloroform	9.25	83	172198	21.5740	ug/L	100
34) 1-Bromopropane	9.39	122	20252	19.2581	ug/L	99
35) Bromochloromethane	9.48	130	68191	20.8830	ug/L	99
36) Tetrahydrofuran	9.50	42	150814	77.6055	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	148271	21.0209	ug/L	100
39) Cyclohexane	9.79	56	207352	20.9066	ug/L	98
40) 1,1-Dichloropropene	9.95	75	128943	20.8581	ug/L	97
41) Carbon Tetrachloride	10.09	117	130686	21.4216	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	1142684	84.4485	ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

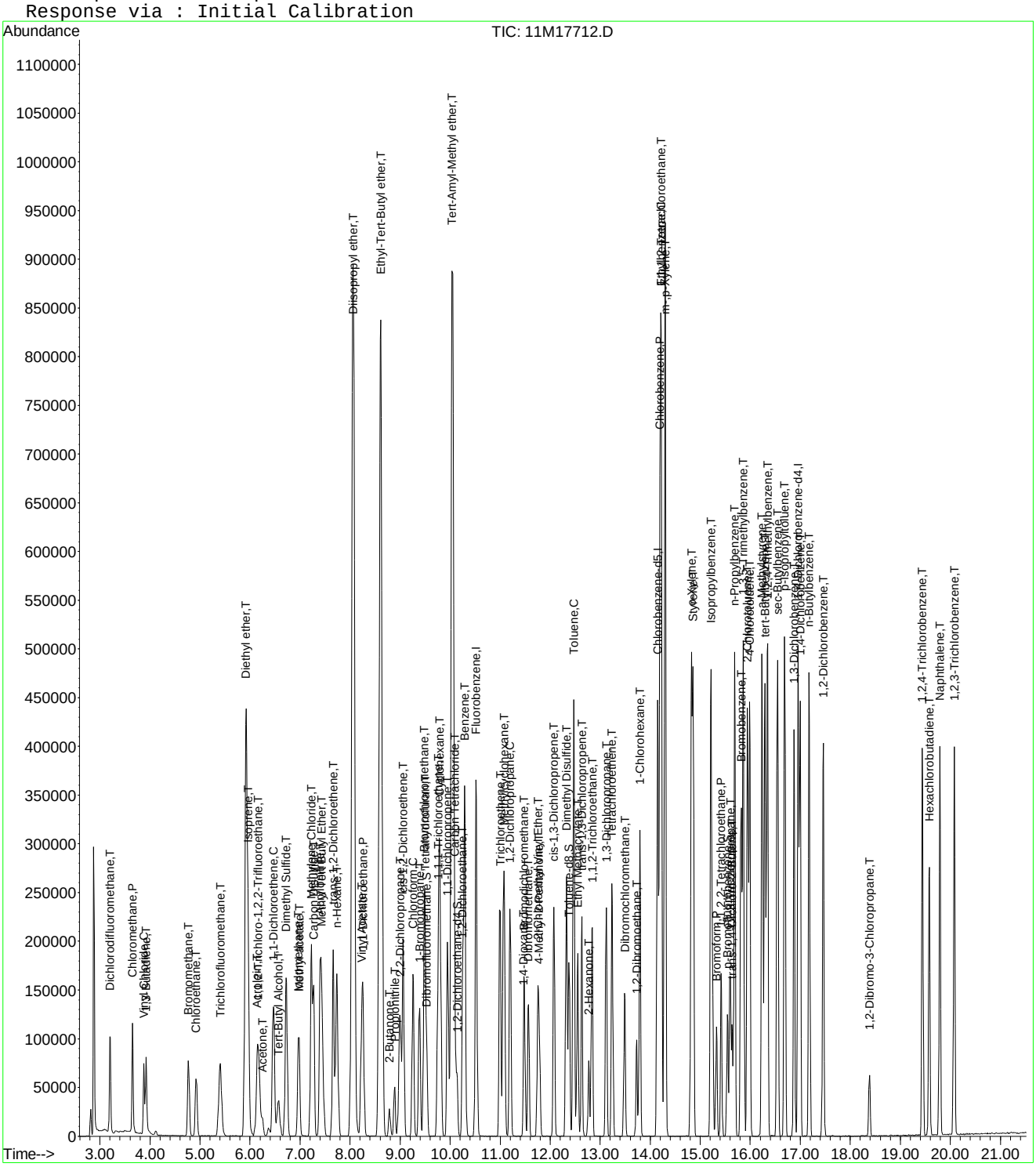
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	145252	21.2783	ug/L	99
45)	Benzene	10.29	78	398956	20.8317	ug/L	97
46)	Trichloroethene	11.00	130	104094	20.7359	ug/L	99
47)	Methylcyclohexane	11.07	83	160115	20.8036	ug/L	99
48)	1,2-Dichloropropane	11.20	63	120072	20.1447	ug/L	98
49)	1,4-Dioxane	11.47	88	7871	146.2322	ug/L	94
50)	Bromodichloromethane	11.48	83	129011	20.7463	ug/L	100
51)	Dibromomethane	11.56	93	59829	21.2194	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	69123	21.2263	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	43246	20.6231	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	160707	21.7817	ug/L	97
55)	Dimethyl Disulfide	12.32	79	90938	19.7473	ug/L	99
58)	Toluene	12.47	91	414902	20.6203	ug/L	97
59)	Ethyl Methacrylate	12.55	69	121437	21.9593	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	139862	22.0200	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	91832	21.6355	ug/L	98
62)	2-Hexanone	12.77	43	72420	20.5371	ug/L	98
63)	1,3-Dichloropropane	13.12	76	151591	21.5037	ug/L	100
64)	Tetrachloroethene	13.23	164	85598	21.4310	ug/L	100
65)	Dibromochloromethane	13.49	129	101802	21.5133	ug/L	99
66)	1,2-Dibromoethane	13.73	107	80818	21.1809	ug/L	97
67)	1-Chlorohexane	13.79	91	119894	20.9092	ug/L	100
68)	Chlorobenzene	14.20	112	267703	20.9215	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	100693	21.1370	ug/L	99
70)	Ethylbenzene	14.22	106	146101	21.5919	ug/L	90
71)	m-,p-Xylene	14.30	106	347301	42.8965	ug/L	89
72)	o-Xylene	14.83	106	175418	21.5033	ug/L	94
73)	Styrene	14.86	104	282121	23.3331	ug/L	97
74)	Bromoform	15.32	173	70896	20.9084	ug/L	99
75)	Isopropylbenzene	15.22	105	435928	21.9046	ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	112391	21.2565	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	33992	22.4518	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	34278	20.9390	ug/L	96
81)	n-Propylbenzene	15.69	91	520501	22.0807	ug/L	96
82)	Bromobenzene	15.82	156	124008	21.6168	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	367954	22.8164	ug/L	97
84)	2-Chlorotoluene	15.94	91	327461	20.4604	ug/L	86
85)	4-Chlorotoluene	15.99	91	317263	21.9631	ug/L	97
86)	a-Methylstyrene	16.23	118	196070	22.0595	ug/L	99
87)	tert-Butylbenzene	16.30	134	85202	21.7304	ug/L	99
88)	1,2,4-Trimethylbenzene	16.35	105	382132	22.6565	ug/L	96
89)	sec-Butylbenzene	16.54	105	466322	21.8946	ug/L	96
90)	p-Isopropyltoluene	16.69	119	393753	23.0076	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	225765	22.1241	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	227443	20.7244	ug/L	98
93)	n-Butylbenzene	17.17	91	353074	23.1308	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	224912	21.8422	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	19018	20.4998	ug/L	98
96)	1,2,4-Trichlorobenzene	19.44	180	165986	22.4528	ug/L	100
97)	Hexachlorobutadiene	19.58	225	83698	21.3469	ug/L	98
98)	Naphthalene	19.79	128	382950	23.2260	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	163857	21.6652	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17712.D 8260WT.M Tue Apr 25 14:18:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	445066	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	320836	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	178101	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	112079	25.4235	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%			
43) 1,2-Dichloroethane-d4	10.14	65	130851	25.5772	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.32%			
57) Toluene-d8	12.38	98	436970	26.2298	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%			
78) p-Bromofluorobenzene	15.54	95	161708	26.1227	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	307006	56.2126	ug/L	100
3) Chloromethane	3.66	50	206853	38.5380	ug/L	100
4) Vinyl Chloride	3.89	62	200431	52.4708	ug/L	100
5) 1,3-Butadiene	3.93	54	121423	57.3894	ug/L	100
6) Bromomethane	4.78	94	179017	45.3881	ug/L	100
7) Chloroethane	4.93	64	208061	52.5825	ug/L	100
8) Trichlorofluoromethane	5.41	101	356930	53.4848	ug/L	100
9) Diethyl ether	5.92	59	492681	99.7622	ug/L	100
10) Isoprene	5.97	67	385229	55.7200	ug/L	100
11) Acrolein	6.15	56	39643	50.4672	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	207994	52.6275	ug/L	100
13) Acetone	6.26	43	72300	48.5847	ug/L	99
14) 1,1-Dichloroethene	6.47	61	418655	52.6721	ug/L	100
15) Tert-Butyl Alcohol	6.57	59	108302	194.5763	ug/L	100
16) Dimethyl Sulfide	6.73	62	323528	51.8133	ug/L	100
17) Iodomethane	6.98	142	294369	53.8800	ug/L	100
18) Methyl acetate	6.98	43	235792	50.2382	ug/L	100
19) Methylene Chloride	7.23	84	265477	50.0596	ug/L	100
20) Carbon Disulfide	7.28	76	716496	52.7221	ug/L	100
21) Acrylonitrile	7.40	53	112383	51.1317	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	696161	52.4207	ug/L	100
23) trans-1,2-Dichloroethene	7.67	96	244230	50.4935	ug/L	100
24) n-Hexane	7.73	57	407356	54.3010	ug/L	100
25) Diisopropyl ether	8.06	45	1936523	100.1309	ug/L	100
26) Vinyl Acetate	8.23	43	462428	51.2223	ug/L	100
27) 1,1-Dichloroethane	8.26	63	520163	51.0221	ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1708288	99.9299	ug/L	100
29) 2-Butanone	8.79	43	122699	50.4606	ug/L	100
30) Propionitrile	8.89	54	81159	100.0507	ug/L	100
31) 2,2-Dichloropropane	9.01	77	339288	49.1664	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	283070	52.1530	ug/L	100
33) Chloroform	9.26	83	429355	53.0609	ug/L	100
34) 1-Bromopropane	9.39	122	54732	50.4729	ug/L	100
35) Bromochloromethane	9.48	130	174716	52.4993	ug/L	100
36) Tetrahydrofuran	9.50	42	183509	92.6535	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	385302	53.5982	ug/L	100
39) Cyclohexane	9.80	56	550451	54.4562	ug/L	100
40) 1,1-Dichloropropene	9.95	75	331140	52.5584	ug/L	100
41) Carbon Tetrachloride	10.09	117	338384	54.4234	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1383285	100.3070	ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

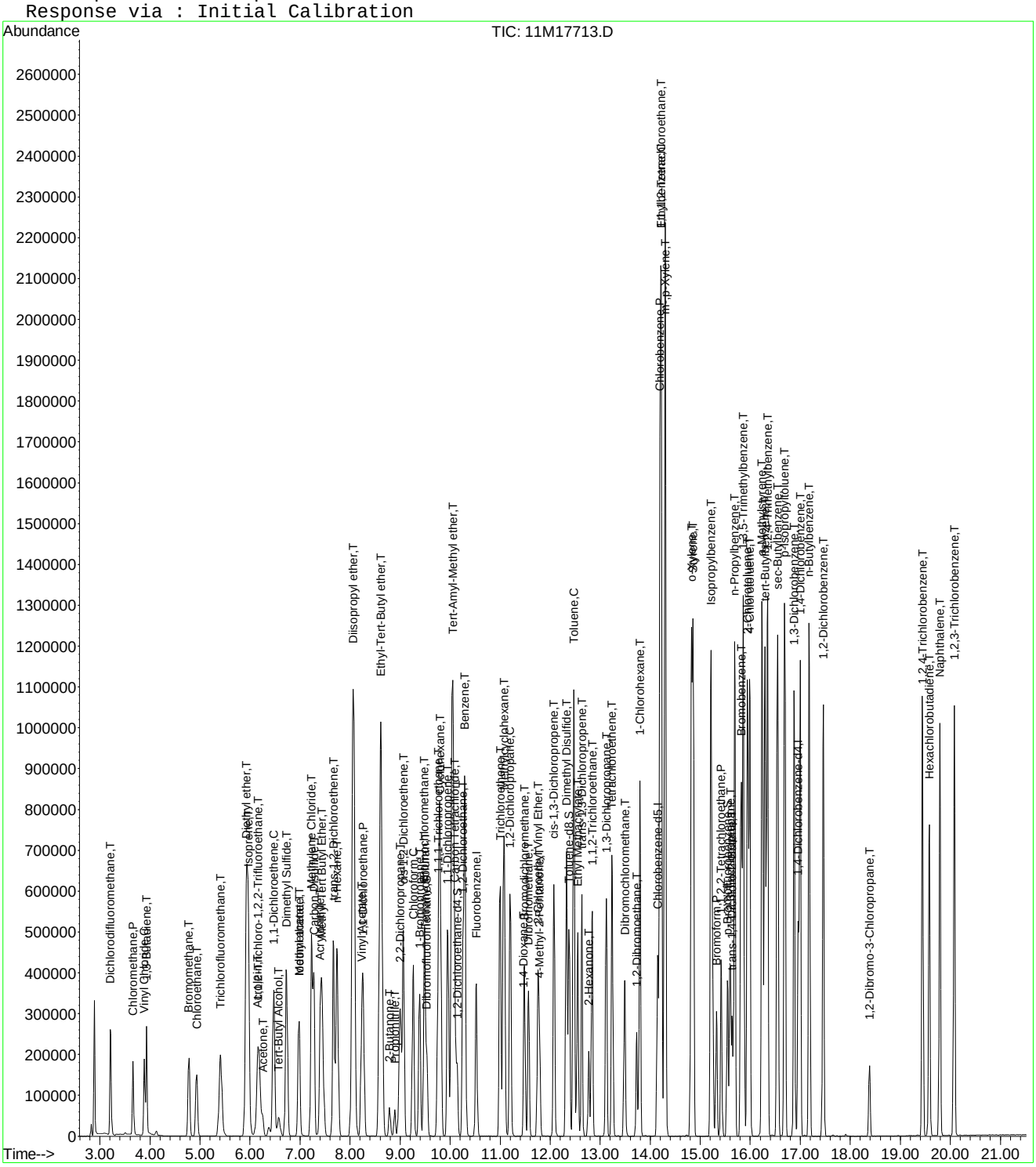
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	361701	51.9898	ug/L	100
45)	Benzene	10.29	78	968426	49.6158	ug/L	100
46)	Trichloroethene	11.00	130	265683	51.9297	ug/L	100
47)	Methylcyclohexane	11.07	83	432180	55.0967	ug/L	100
48)	1,2-Dichloropropane	11.20	63	313159	51.5511	ug/L	100
49)	1,4-Dioxane	11.47	88	10688	194.8334	ug/L	100
50)	Bromodichloromethane	11.49	83	337537	53.2585	ug/L	100
51)	Dibromomethane	11.57	93	152290	52.9965	ug/L	100
52)	2-Chloroethyl Vinyl Ether	11.76	63	178405	53.7542	ug/L	100
53)	4-Methyl-2-Pentanone	11.79	58	105435	49.3340	ug/L	100
54)	cis-1,3-Dichloropropene	12.08	75	412082	54.8017	ug/L	100
55)	Dimethyl Disulfide	12.32	79	244059	52.0010	ug/L	100
58)	Toluene	12.47	91	1001084	48.1931	ug/L	100
59)	Ethyl Methacrylate	12.55	69	315794	55.3143	ug/L	100
60)	trans-1,3-Dichloropropene	12.64	75	366578	55.9049	ug/L	100
61)	1,1,2-Trichloroethane	12.84	97	225750	51.5190	ug/L	100
62)	2-Hexanone	12.77	43	185197	50.8721	ug/L	100
63)	1,3-Dichloropropane	13.12	76	380682	52.3080	ug/L	100
64)	Tetrachloroethene	13.23	164	223637	54.2361	ug/L	100
65)	Dibromochloromethane	13.49	129	269291	55.1237	ug/L	100
66)	1,2-Dibromoethane	13.73	107	209203	53.1091	ug/L	100
67)	1-Chlorohexane	13.79	91	332337	56.1415	ug/L	100
68)	Chlorobenzene	14.20	112	662611	50.1608	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	264376	53.7567	ug/L	100
70)	Ethylbenzene	14.22	106	377411	54.0278	ug/L	100
71)	m-,p-Xylene	14.30	106	860460	102.9467	ug/L	100
72)	o-Xylene	14.83	106	448780	53.2881	ug/L	100
73)	Styrene	14.86	104	726395	58.1938	ug/L	100
74)	Bromoform	15.32	173	189058	54.0081	ug/L	100
75)	Isopropylbenzene	15.22	105	1056621	51.4287	ug/L	100
77)	1,1,2,2-Tetrachloroethane	15.42	83	286055	51.0900	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	84214	52.5272	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	86739	50.0359	ug/L	100
81)	n-Propylbenzene	15.69	91	1252755	50.1862	ug/L	100
82)	Bromobenzene	15.82	156	322294	53.0542	ug/L	100
83)	1,3,5-Trimethylbenzene	15.86	105	917525	53.7277	ug/L	100
84)	2-Chlorotoluene	15.94	91	795808	46.9558	ug/L	100
85)	4-Chlorotoluene	15.99	91	788645	51.5562	ug/L	100
86)	a-Methylstyrene	16.23	118	529141	56.2190	ug/L	100
87)	tert-Butylbenzene	16.30	134	217546	52.3956	ug/L	100
88)	1,2,4-Trimethylbenzene	16.35	105	939986	52.6293	ug/L	100
89)	sec-Butylbenzene	16.54	105	1150332	51.0035	ug/L	100
90)	p-Isopropyltoluene	16.69	119	999581	55.1559	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	587925	54.4073	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	580973	49.9909	ug/L	100
93)	n-Butylbenzene	17.17	91	912776	56.4697	ug/L	100
94)	1,2-Dichlorobenzene	17.46	146	580005	53.1914	ug/L	100
95)	1,2-Dibromo-3-Chloropropan	18.38	75	51998	52.9295	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	445578	56.9178	ug/L	100
97)	Hexachlorobutadiene	19.58	225	224987	54.1880	ug/L	100
98)	Naphthalene	19.79	128	942009	53.9528	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	430160	53.7098	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17713.D 8260WT.M Tue Apr 25 14:18:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	443137	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	325943	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	184790	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	229531	52.2924	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 209.16%#			
43) 1,2-Dichloroethane-d4	10.14	65	262519	51.5376	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 206.16%#			
57) Toluene-d8	12.38	98	850522	50.2539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 201.00%#			
78) p-Bromofluorobenzene	15.54	95	335482	52.2328	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 208.92%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	604893	111.0366	ug/L	98
3) Chloromethane	3.66	50	588818	111.5874	ug/L	99
4) Vinyl Chloride	3.88	62	393311	103.4130	ug/L	99
5) 1,3-Butadiene	3.92	54	190798	93.9693	ug/L	99
6) Bromomethane	4.77	94	376626	95.9057	ug/L	100
7) Chloroethane	4.92	64	418888	106.3250	ug/L	100
8) Trichlorofluoromethane	5.41	101	730248	109.9017	ug/L	100
9) Diethyl ether	5.92	59	959569	195.1474	ug/L	99
10) Isoprene	5.96	67	784840	114.0143	ug/L	98
11) Acrolein	6.15	56	82672	105.7031	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	429066	109.0365	ug/L	99
13) Acetone	6.25	43	151205	102.0502	ug/L	96
14) 1,1-Dichloroethene	6.46	61	828852	104.7339	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	222885	402.1803	ug/L	98
16) Dimethyl Sulfide	6.72	62	640880	103.0843	ug/L	99
17) Iodomethane	6.97	142	588728	107.0077	ug/L	99
18) Methyl acetate	6.98	43	472053	101.0142	ug/L	99
19) Methylene Chloride	7.23	84	522767	99.0045	ug/L	98
20) Carbon Disulfide	7.27	76	1365403	100.9081	ug/L	98
21) Acrylonitrile	7.40	53	226916	103.6910	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	1345867	101.7844	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	492184	102.1998	ug/L	98
24) n-Hexane	7.73	57	826192	110.6117	ug/L	100
25) Diisopropyl ether	8.06	45	3381163	175.5893	ug/L	94
26) Vinyl Acetate	8.23	43	998822	111.1193	ug/L	98
27) 1,1-Dichloroethane	8.26	63	1014407	99.9350	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	3057711	179.6459	ug/L	94
29) 2-Butanone	8.79	43	246500	101.8157	ug/L	100
30) Propionitrile	8.89	54	165540	204.9617	ug/L	100
31) 2,2-Dichloropropane	9.00	77	669887	97.4961	ug/L	99
32) cis-1,2-Dichloroethene	9.07	96	560030	103.6295	ug/L	99
33) Chloroform	9.26	83	843333	104.8637	ug/L	99
34) 1-Bromopropane	9.39	122	109496	101.0518	ug/L	98
35) Bromochloromethane	9.48	130	348028	105.0319	ug/L	99
36) Tetrahydrofuran	9.50	42	358633	181.8616	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	776308	108.4599	ug/L	100
39) Cyclohexane	9.79	56	1081578	107.4665	ug/L	98
40) 1,1-Dichloropropene	9.95	75	677069	107.9320	ug/L	100
41) Carbon Tetrachloride	10.09	117	688454	111.2083	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	2515859	183.2282	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17714.D 8260WT.M Tue Apr 25 14:18:37 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

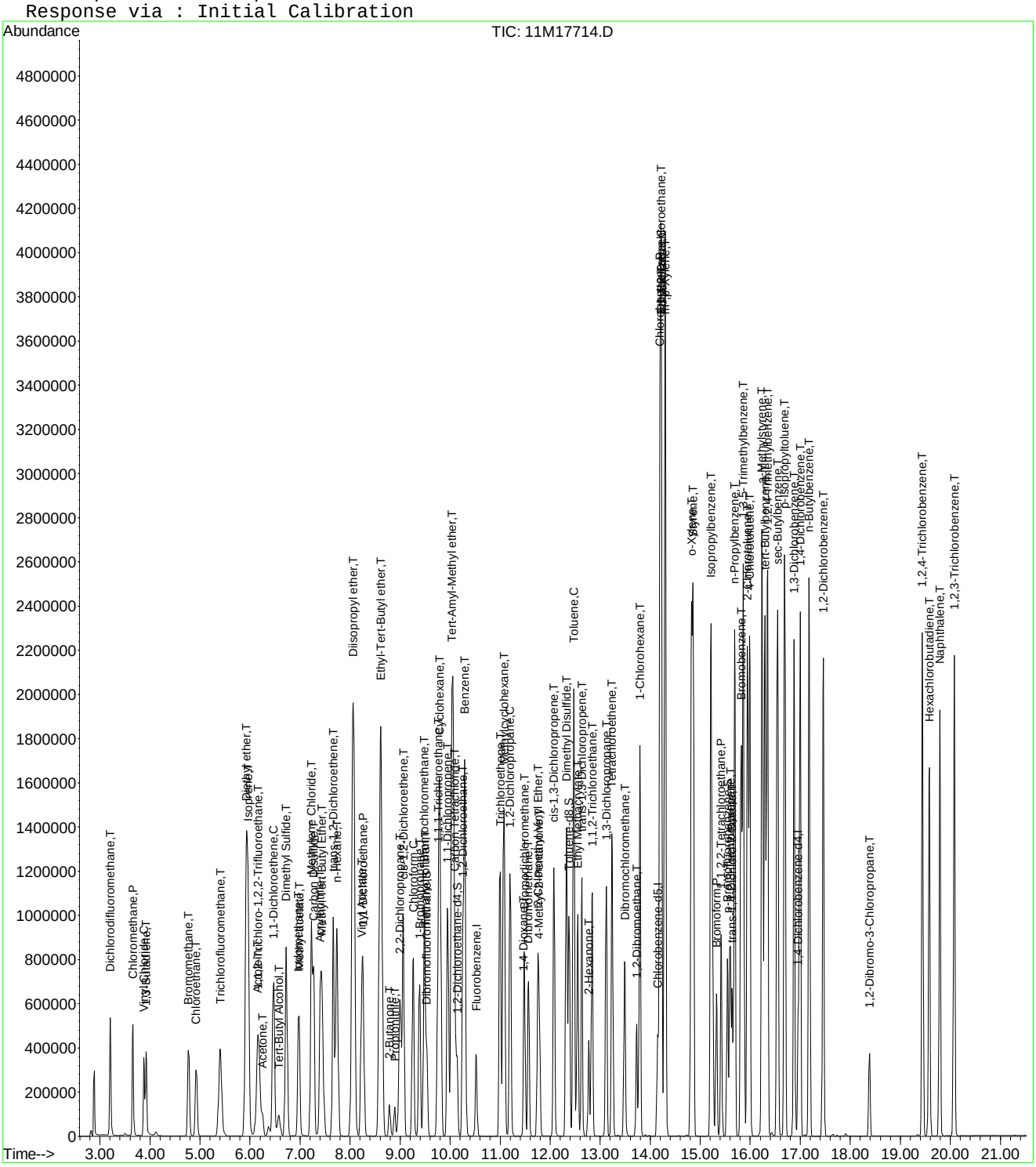
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	703902	101.6171	ug/L	99
45)	Benzene	10.29	78	1772720	91.2179	ug/L	96
46)	Trichloroethene	11.00	130	526193	103.2959	ug/L	99
47)	Methylcyclohexane	11.07	83	864734	110.7210	ug/L	98
48)	1,2-Dichloropropane	11.20	63	621334	102.7270	ug/L	98
49)	1,4-Dioxane	11.47	88	21847	399.9864	ug/L	100
50)	Bromodichloromethane	11.49	83	666763	105.6636	ug/L	98
51)	Dibromomethane	11.56	93	305154	106.6549	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	360720	109.1595	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	219621	103.2101	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	801442	107.0456	ug/L	98
55)	Dimethyl Disulfide	12.32	79	507165	108.5307	ug/L	95
58)	Toluene	12.47	91	1805110	85.5381	ug/L	96
59)	Ethyl Methacrylate	12.55	69	643120	110.8835	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	711444	106.7986	ug/L	97
61)	1,1,2-Trichloroethane	12.84	97	452546	101.6585	ug/L	100
62)	2-Hexanone	12.77	43	372237	100.6483	ug/L	97
63)	1,3-Dichloropropane	13.12	76	735346	99.4578	ug/L	100
64)	Tetrachloroethene	13.23	164	452415	107.9998	ug/L	99
65)	Dibromochloromethane	13.49	129	551761	111.1755	ug/L	100
66)	1,2-Dibromoethane	13.73	107	420061	104.9675	ug/L	99
67)	1-Chlorohexane	13.79	91	683203	113.6048	ug/L	99
68)	Chlorobenzene	14.20	112	1245459	92.8061	ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.22	131	529238	105.9261	ug/L	100
70)	Ethylbenzene	14.22	106	752987	106.1040	ug/L	84
71)	m-,p-Xylene	14.30	106	1591790	187.4601	ug/L	88
72)	o-Xylene	14.83	106	889860	104.0064	ug/L	91
73)	Styrene	14.86	104	1397203	110.1805	ug/L	95
74)	Bromoform	15.32	173	396884	111.6013	ug/L	99
75)	Isopropylbenzene	15.22	105	1927342	92.3393	ug/L	93
77)	1,1,2,2-Tetrachloroethane	15.42	83	602015	103.6290	ug/L	98
79)	1,2,3-Trichloropropane	15.60	110	173318	104.1913	ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	189961	105.6135	ug/L	93
81)	n-Propylbenzene	15.69	91	2210569	85.3513	ug/L	91
82)	Bromobenzene	15.82	156	659931	104.7018	ug/L	97
83)	1,3,5-Trimethylbenzene	15.86	105	1716523	96.8764	ug/L	95
84)	2-Chlorotoluene	15.94	91	1489900	84.7277	ug/L	94
85)	4-Chlorotoluene	15.99	91	1468871	92.5489	ug/L	94
86)	a-Methylstyrene	16.23	118	1076353	110.2184	ug/L	98
87)	tert-Butylbenzene	16.30	134	455630	105.7654	ug/L	90
88)	1,2,4-Trimethylbenzene	16.35	105	1743485	94.0832	ug/L	93
89)	sec-Butylbenzene	16.54	105	2092627	89.4244	ug/L	93
90)	p-Isopropyltoluene	16.69	119	1832480	97.4543	ug/L	92
91)	1,3-Dichlorobenzene	16.87	146	1155639	103.0731	ug/L	96
92)	1,4-Dichlorobenzene	17.00	146	1147317	95.1495	ug/L	96
93)	n-Butylbenzene	17.17	91	1724933	102.8517	ug/L	94
94)	1,2-Dichlorobenzene	17.46	146	1140737	100.8284	ug/L	96
95)	1,2-Dibromo-3-Chloropropan	18.38	75	110832	108.7337	ug/L	100
96)	1,2,4-Trichlorobenzene	19.44	180	905719	111.5079	ug/L	97
97)	Hexachlorobutadiene	19.58	225	498992	115.8317	ug/L	100
98)	Naphthalene	19.79	128	1716856	94.7722	ug/L #	95
99)	1,2,3-Trichlorobenzene	20.08	180	886147	106.6393	ug/L	98

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	441465	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	322306	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	194046	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	427205	97.6956 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 390.80%#		
43) 1,2-Dichloroethane-d4	10.14	65	489457	96.4538 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 385.80%#		
57) Toluene-d8	12.38	98	1472553	87.9891 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 351.96%#		
78) p-Bromofluorobenzene	15.54	95	652310	96.7169 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 386.88%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	1084654	199.6933 ug/L	97
3) Chloromethane	3.66	50	1072612	204.6696 ug/L	95
4) Vinyl Chloride	3.89	62	753560	198.8834 ug/L	94
5) 1,3-Butadiene	3.92	54	359863	195.2817 ug/L	97
6) Bromomethane	4.77	94	739600	189.0484 ug/L	99
7) Chloroethane	4.92	64	803022	204.6004 ug/L	99
8) Trichlorofluoromethane	5.40	101	1365610	206.3015 ug/L	99
9) Diethyl ether	5.91	59	1781	0.3636 ug/L #	1
10) Isoprene	5.96	67	1461947	213.1826 ug/L	99
11) Acrolein	6.16	56	214	0.2747 ug/L #	1
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	830314	211.8030 ug/L	100
13) Acetone	6.26	43	298659	202.3322 ug/L	99
14) 1,1-Dichloroethene	6.47	61	1526824	193.6605 ug/L	94
16) Dimethyl Sulfide	6.72	62	1192801	192.5864 ug/L	99
17) Iodomethane	6.97	142	1114937	202.3300 ug/L	97
18) Methyl acetate	6.98	43	891475	191.4885 ug/L	98
19) Methylene Chloride	7.23	84	984822	187.2173 ug/L	92
20) Carbon Disulfide	7.27	76	2316195	171.8233 ug/L	94
21) Acrylonitrile	7.43	53	29726	13.6350 ug/L #	29
22) Methyl Tert Butyl Ether	7.43	73	2477296	188.0610 ug/L	96
23) trans-1,2-Dichloroethene	7.66	96	925607	192.9261 ug/L	94
24) n-Hexane	7.73	57	1547358	207.9469 ug/L	98
25) Diisopropyl ether	8.07	45	8775	0.4574 ug/L	86
26) Vinyl Acetate	8.23	43	1736893	193.9619 ug/L	96
27) 1,1-Dichloroethane	8.26	63	1814215	179.4055 ug/L	95
28) Ethyl-Tert-Butyl ether	8.60	59	5748	0.3390 ug/L #	44
29) 2-Butanone	8.79	43	488651	202.5994 ug/L	99
31) 2,2-Dichloropropane	9.00	77	1243150	181.6148 ug/L	97
32) cis-1,2-Dichloroethene	9.07	96	1052119	195.4244 ug/L	95
33) Chloroform	9.26	83	1523744	190.3442 ug/L	95
34) 1-Bromopropane	9.39	122	216377	200.0929 ug/L	97
35) Bromochloromethane	9.48	130	668214	202.4251 ug/L	95
36) Tetrahydrofuran	9.51	42	6410	3.2628 ug/L	89
38) 1,1,1-Trichloroethane	9.76	97	1439508	201.8790 ug/L	98
39) Cyclohexane	9.79	56	1957676	195.2531 ug/L	95
40) 1,1-Dichloropropene	9.95	75	1233925	197.4457 ug/L	96
41) Carbon Tetrachloride	10.09	117	1293444	209.7256 ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3290	0.2405 ug/L #	71
44) 1,2-Dichloroethane	10.26	62	1275072	184.7698 ug/L	95
45) Benzene	10.29	78	2884485	148.9876 ug/L	87

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

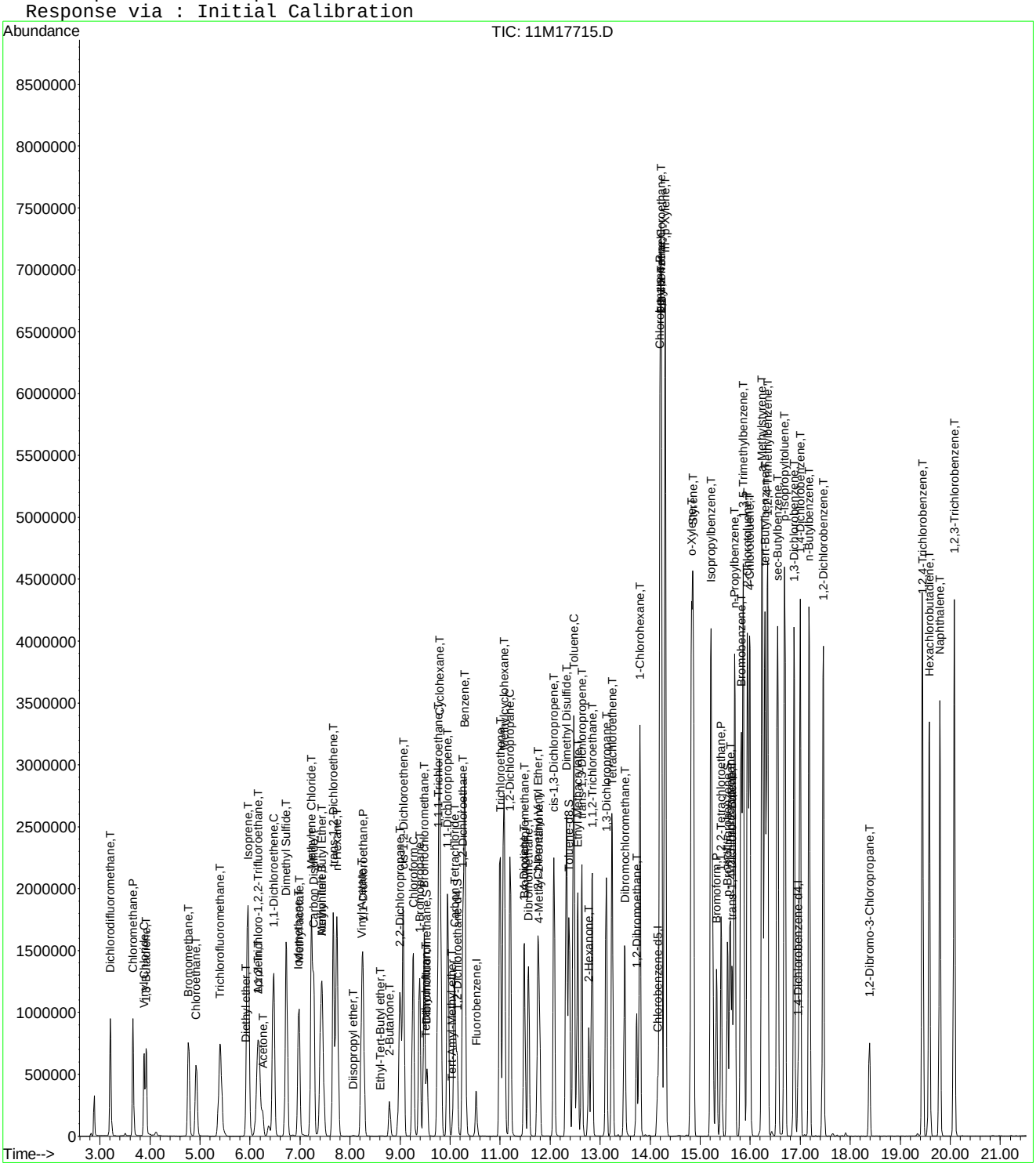
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
46)	Trichloroethene	11.00	130	991682	195.4125	ug/L		99
47)	Methylcyclohexane	11.07	83	1584915	203.7020	ug/L		98
48)	1,2-Dichloropropane	11.20	63	1154133	191.5390	ug/L		95
49)	1,4-Dioxane	11.48	88	1253	23.0275	ug/L	#	12
50)	Bromodichloromethane	11.49	83	1250957	198.9932	ug/L		96
51)	Dibromomethane	11.57	93	590911	207.3126	ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	700959	212.9246	ug/L		97
53)	4-Methyl-2-Pentanone	11.78	58	447607	211.1480	ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1441762	193.3001	ug/L		93
55)	Dimethyl Disulfide	12.33	79	980586	210.6351	ug/L		87
58)	Toluene	12.47	91	2836194	135.9144	ug/L		89
59)	Ethyl Methacrylate	12.55	69	1220047	212.7281	ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1297661	196.9969	ug/L		93
61)	1,1,2-Trichloroethane	12.84	97	863979	196.2716	ug/L		99
62)	2-Hexanone	12.77	43	746111	204.0158	ug/L		96
63)	1,3-Dichloropropane	13.12	76	1337916	182.9992	ug/L		97
64)	Tetrachloroethene	13.25	164	860212	207.6657	ug/L		99
65)	Dibromochloromethane	13.49	129	1052649	214.4940	ug/L		98
66)	1,2-Dibromoethane	13.73	107	824035	208.2388	ug/L		100
67)	1-Chlorohexane	13.79	91	1263938	212.5425	ug/L		100
68)	Chlorobenzene	14.20	112	2075953	156.4364	ug/L		87
69)	1,1,1,2-Tetrachloroethane	14.22	131	1000940	202.5970	ug/L		99
70)	Ethylbenzene	14.22	106	1371668	195.4640	ug/L		64
71)	m-,p-Xylene	14.30	106	2554712	304.2555	ug/L		75
72)	o-Xylene	14.83	106	1603783	189.5646	ug/L		78
73)	Styrene	14.86	104	2329255	185.7528	ug/L		85
74)	Bromoform	15.32	173	812860	231.1504	ug/L		97
75)	Isopropylbenzene	15.22	105	3024104	146.5203	ug/L		82
77)	1,1,2,2-Tetrachloroethane	15.42	83	1131498	185.4819	ug/L		96
79)	1,2,3-Trichloropropane	15.60	110	352057	201.5462	ug/L		94
80)	trans-1,4-Dichloro-2-Buten	15.63	53	395069	209.1712	ug/L		86
81)	n-Propylbenzene	15.69	91	3379886	124.2744	ug/L	#	78
82)	Bromobenzene	15.82	156	1242817	187.7744	ug/L		94
83)	1,3,5-Trimethylbenzene	15.86	105	2753405	147.9831	ug/L		86
84)	2-Chlorotoluene	15.94	91	2376893	128.7217	ug/L		82
85)	4-Chlorotoluene	15.99	91	2342047m	140.5261	ug/L		
86)	a-Methylstyrene	16.23	118	1883116	183.6328	ug/L		90
87)	tert-Butylbenzene	16.30	134	872813	192.9418	ug/L		76
88)	1,2,4-Trimethylbenzene	16.35	105	2762633	141.9681	ug/L		81
89)	sec-Butylbenzene	16.54	105	3225671	131.2678	ug/L	#	80
90)	p-Isopropyltoluene	16.69	119	2869693	145.3352	ug/L		81
91)	1,3-Dichlorobenzene	16.87	146	1985905	168.6768	ug/L		87
92)	1,4-Dichlorobenzene	17.00	146	1965623	155.2376	ug/L		88
93)	n-Butylbenzene	17.17	91	2713386	154.0723	ug/L	#	83
94)	1,2-Dichlorobenzene	17.46	146	1953869	164.4624	ug/L		89
95)	1,2-Dibromo-3-Chloropropan	18.38	75	232153	216.8937	ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	1657477	194.3271	ug/L		89
97)	Hexachlorobutadiene	19.58	225	977238	216.0270	ug/L		99
98)	Naphthalene	19.79	128	2796411	147.0016	ug/L	#	84
99)	1,2,3-Trichlorobenzene	20.08	180	1654465	189.6020	ug/L		90

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

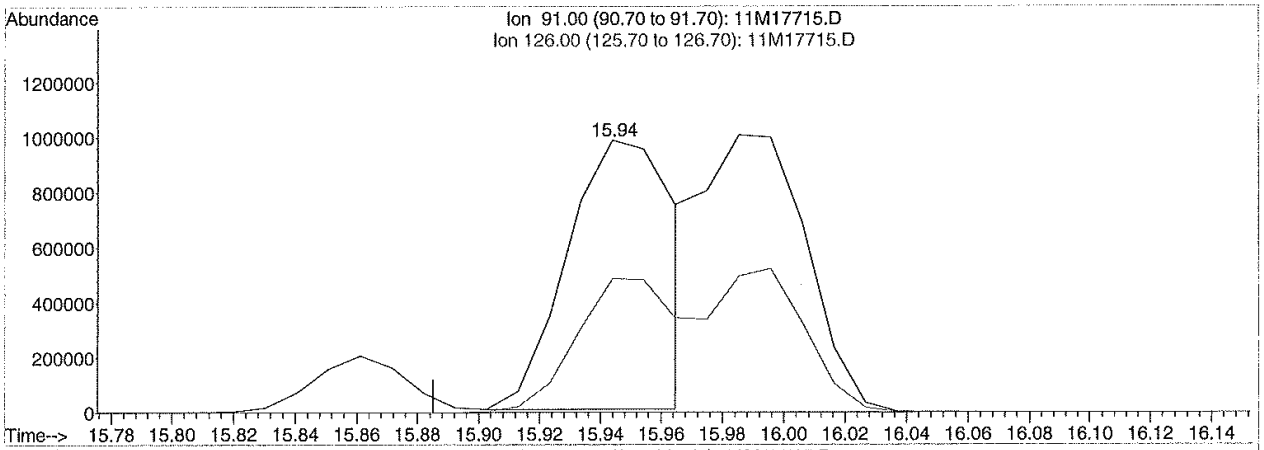
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

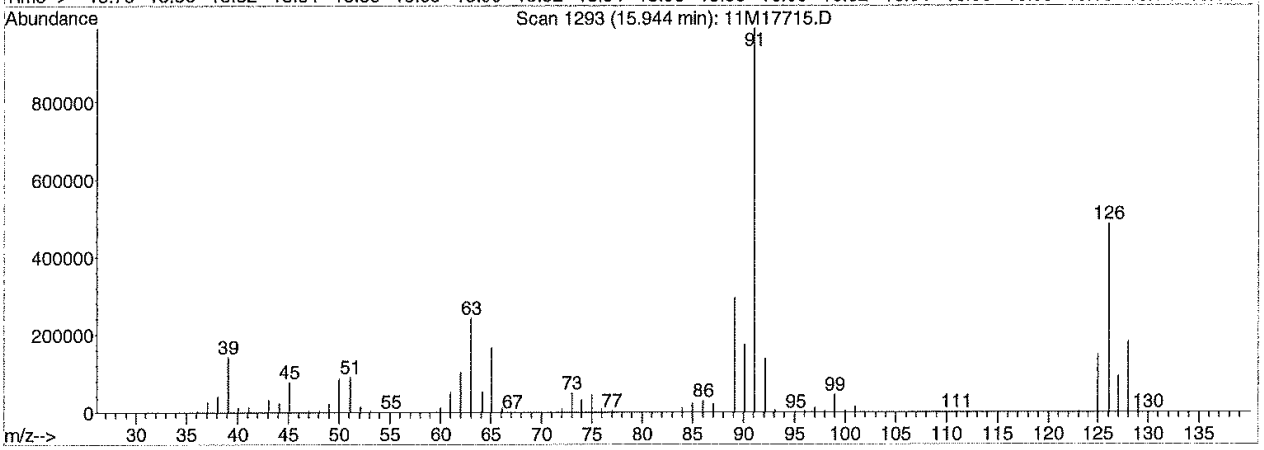


Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:55 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17715.D

(85) 4-Chlorotoluene (T)

15.94min 142.76ug/L

response 2376893

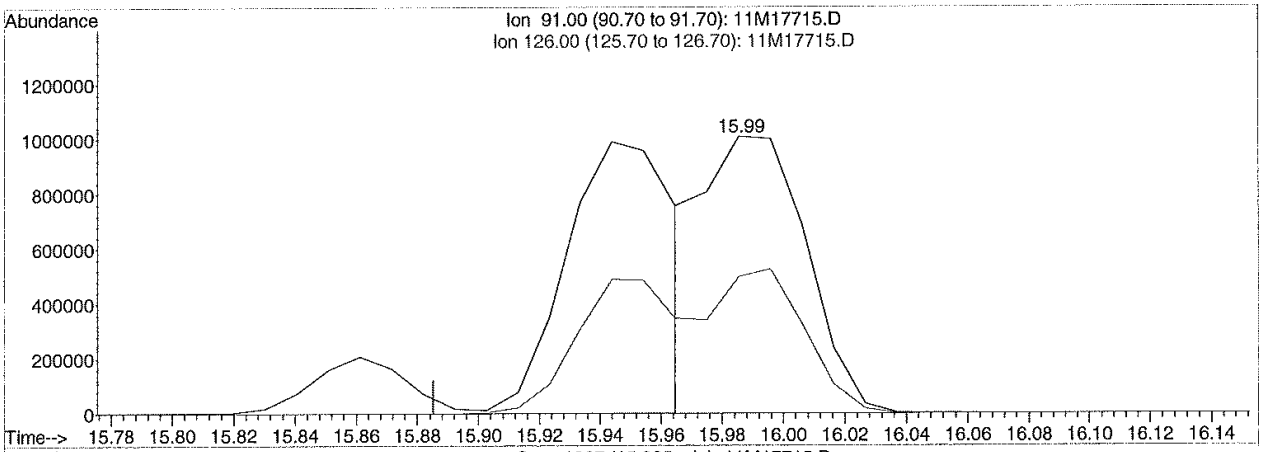
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	54.18#
0.00	0.00	0.00
0.00	0.00	0.00

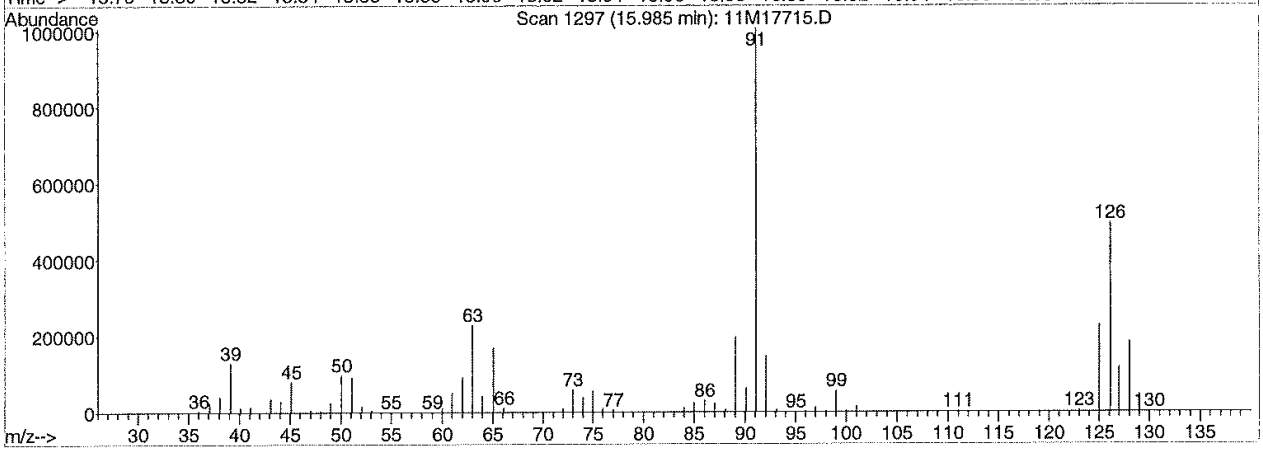
11M17715.D 8260WT.M Tue Apr 25 12:01:28 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:01 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17715.D

(85) 4-Chlorotoluene (T)

15.99min 140.67ug/L mint

response 2342047

Ion	Exp%	Act%
91.00	100	100
126.00	29.80	54.99#
0.00	0.00	0.00
0.00	0.00	0.00

#3

JDS 4/28/17

FJB 4-28-17

11M17715.D 8260WT.M Tue Apr 25 12:01:47 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	429502	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	318865	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	200748	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	10.13	65	920	0.1863	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.76%#		
57) Toluene-d8	12.38	98	3446	0.2081	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.84%#		
78) p-Bromofluorobenzene	15.54	95	4319	0.6190	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.48%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1487704	281.4427	ug/L	94
3) Chloromethane	3.65	50	1480946	290.7743	ug/L	90
4) Vinyl Chloride	3.88	62	935582	253.8011	ug/L	92
5) 1,3-Butadiene	3.92	54	492171	305.3526	ug/L	98
6) Bromomethane	4.76	94	1056026	277.4481	ug/L	99
7) Chloroethane	4.91	64	1133716	296.9029	ug/L	97
8) Trichlorofluoromethane	5.40	101	1922550	298.5276	ug/L	98
9) Diethyl ether	5.91	59	1328532	278.7605	ug/L	98
10) Isoprene	5.96	67	2048327	307.0085	ug/L	100
11) Acrolein	6.15	56	114318	150.8053	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	1203713	315.6049	ug/L	100
13) Acetone	6.25	43	420970	293.1377	ug/L	98
14) 1,1-Dichloroethene	6.46	61	2091321	272.6490	ug/L	91
15) Tert-Butyl Alcohol	6.59	59	366938	683.1333	ug/L	97
16) Dimethyl Sulfide	6.72	62	1656354	274.8792	ug/L	98
17) Iodomethane	6.97	142	1542193	287.1503	ug/L	95
18) Methyl acetate	6.98	43	1256510	277.4153	ug/L	96
19) Methylene Chloride	7.23	84	1370000	267.6948	ug/L	87
20) Carbon Disulfide	7.27	76	3008057	229.3634	ug/L #	89
21) Acrylonitrile	7.40	53	351015	165.4910	ug/L	95
22) Methyl Tert Butyl Ether	7.43	73	3363996	262.4868	ug/L	92
23) trans-1,2-Dichloroethene	7.66	96	1305110	279.6035	ug/L	89
24) n-Hexane	7.73	57	2144691	296.2494	ug/L	96
25) Diisopropyl ether	8.07	45	4262729	228.3981	ug/L	89
26) Vinyl Acetate	8.22	43	2303029	264.3467	ug/L	93
27) 1,1-Dichloroethane	8.26	63	2412009	245.1642	ug/L	91
28) Ethyl-Tert-Butyl ether	8.61	59	3953810	239.6677	ug/L	89
29) 2-Butanone	8.79	43	710548	302.8056	ug/L	97
30) Propionitrile	8.89	54	247789	316.5371	ug/L	98
31) 2,2-Dichloropropane	9.00	77	1720909	258.4143	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	1463102	279.3312	ug/L	92
33) Chloroform	9.25	83	2060764	264.6739	ug/L	93
34) 1-Bromopropane	9.39	122	315354	299.5645	ug/L	96
35) Bromochloromethane	9.48	130	952566	296.6026	ug/L	92
36) Tetrahydrofuran	9.50	42	517016	270.5002	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	1972168	284.2838	ug/L	95
39) Cyclohexane	9.79	56	2655757	272.2554	ug/L	92
40) 1,1-Dichloropropene	9.95	75	1701002	279.7660	ug/L	93
41) Carbon Tetrachloride	10.09	117	1783305	297.2081	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3323784	249.7535	ug/L	93

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

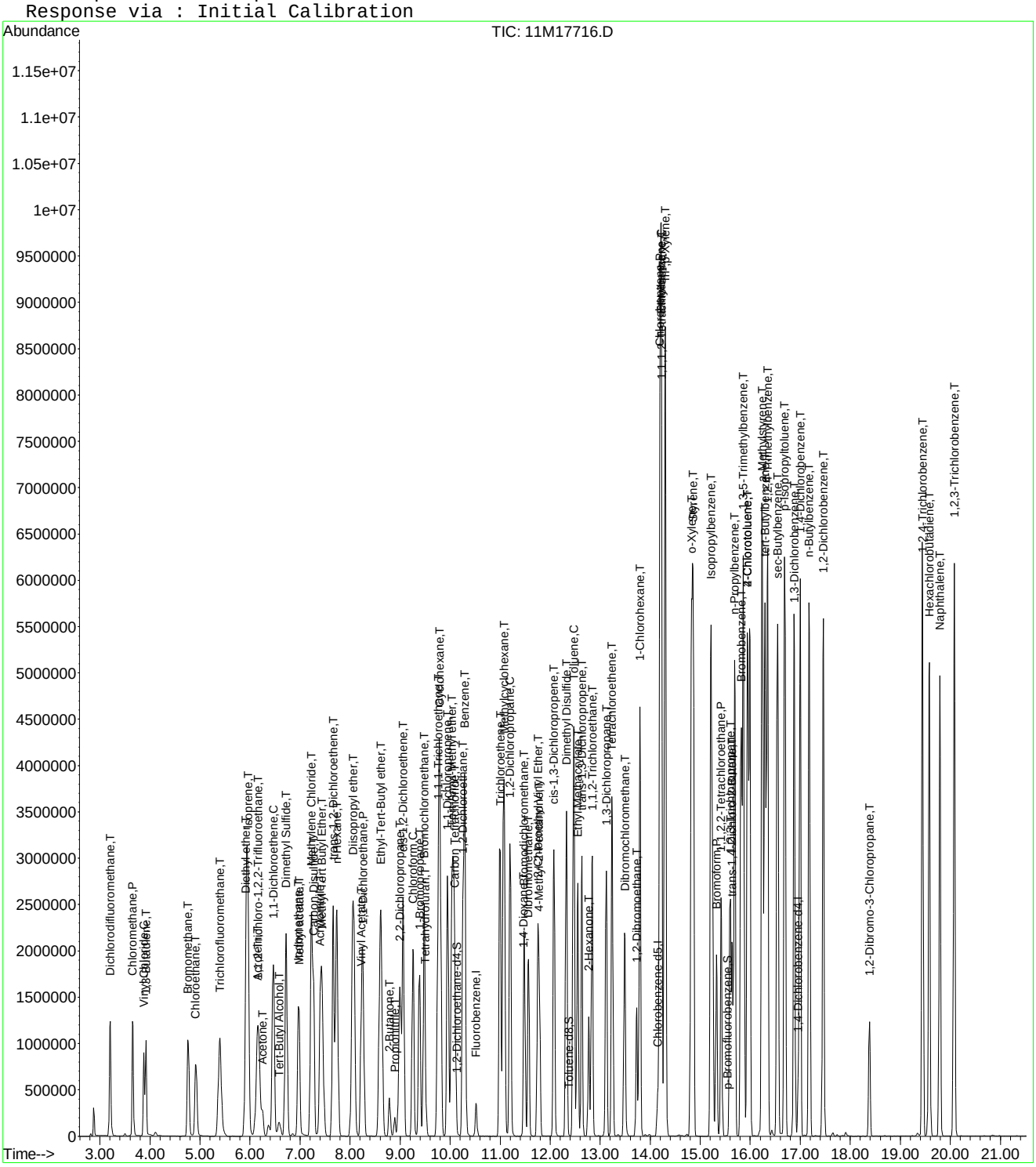
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	1710065	254.7064 ug/L		91
45)	Benzene	10.29	78	3603219	191.2950 ug/L	#	80
46)	Trichloroethene	11.00	130	1366450	276.7609 ug/L		100
47)	Methylcyclohexane	11.07	83	2196028	290.1071 ug/L		97
48)	1,2-Dichloropropane	11.20	63	1593531	271.8272 ug/L		92
49)	1,4-Dioxane	11.47	88	38383	725.0453 ug/L		100
50)	Bromodichloromethane	11.48	83	1718011	280.9007 ug/L		93
51)	Dibromomethane	11.56	93	835997	301.4668 ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	1008145	314.7656 ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	661993	320.9775 ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1929512	265.8993 ug/L	#	88
55)	Dimethyl Disulfide	12.32	79	1370273	302.5404 ug/L		78
58)	Toluene	12.47	91	3489025	169.0032 ug/L		85
59)	Ethyl Methacrylate	12.55	69	1689598	297.7784 ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1741147	267.1745 ug/L		88
61)	1,1,2-Trichloroethane	12.84	97	1214759	278.9368 ug/L		98
62)	2-Hexanone	12.77	43	1066539	294.7804 ug/L		93
63)	1,3-Dichloropropane	13.12	76	1799199	248.7488 ug/L		96
64)	Tetrachloroethene	13.23	164	1207755	294.7132 ug/L		98
65)	Dibromochloromethane	13.49	129	1478641	304.5480 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1164847	297.5407 ug/L		99
67)	1-Chlorohexane	13.79	91	1750520	297.5423 ug/L		99
68)	Chlorobenzene	14.20	112	2641462	201.1992 ug/L		80
69)	1,1,1,2-Tetrachloroethane	14.23	131	1406828	287.8244 ug/L		99
70)	Ethylbenzene	14.22	106	1848656	266.2781 ug/L		53
71)	m-,p-Xylene	14.30	106	3154067	379.6898 ug/L		70
72)	o-Xylene	14.83	106	2131378	254.6441 ug/L		71
73)	Styrene	14.86	104	2958704	238.4962 ug/L		78
74)	Bromoform	15.32	173	1167450	335.5665 ug/L		94
75)	Isopropylbenzene	15.22	105	3705942	181.4936 ug/L	#	73
77)	1,1,2,2-Tetrachloroethane	15.42	83	1605655	254.4213 ug/L		93
79)	1,2,3-Trichloropropane	15.60	110	526530	291.3655 ug/L		92
80)	trans-1,4-Dichloro-2-Buten	15.63	53	599834	306.9824 ug/L		82
81)	n-Propylbenzene	15.69	91	4071066	144.6909 ug/L	#	68
82)	Bromobenzene	15.82	156	1701392	248.4775 ug/L		92
83)	1,3,5-Trimethylbenzene	15.86	105	3402009	176.7384 ug/L		81
84)	2-Chlorotoluene	15.94	91	2879340	150.7262 ug/L	#	70
85)	4-Chlorotoluene	15.94	91	2879340	166.9966 ug/L	#	42
86)	a-Methylstyrene	16.24	118	2469841	232.8068 ug/L		85
87)	tert-Butylbenzene	16.30	134	1242715	265.5401 ug/L		65
88)	1,2,4-Trimethylbenzene	16.35	105	3404948	169.1342 ug/L		72
89)	sec-Butylbenzene	16.54	105	3933155	154.7151 ug/L	#	71
90)	p-Isopropyltoluene	16.69	119	3530046	172.8101 ug/L	#	71
91)	1,3-Dichlorobenzene	16.88	146	2590010	212.6434 ug/L		80
92)	1,4-Dichlorobenzene	17.00	146	2551626	194.7903 ug/L		81
93)	n-Butylbenzene	17.17	91	3379892	185.5108 ug/L	#	74
94)	1,2-Dichlorobenzene	17.46	146	2581451	210.0335 ug/L		81
95)	1,2-Dibromo-3-Chloropropan	18.38	75	382233	345.1869 ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	2249860	254.9734 ug/L		82
97)	Hexachlorobutadiene	19.58	225	1458179	311.5817 ug/L		96
98)	Naphthalene	19.79	128	3489261	177.2997 ug/L	#	73
99)	1,2,3-Trichlorobenzene	20.08	180	2249648	249.2030 ug/L		84

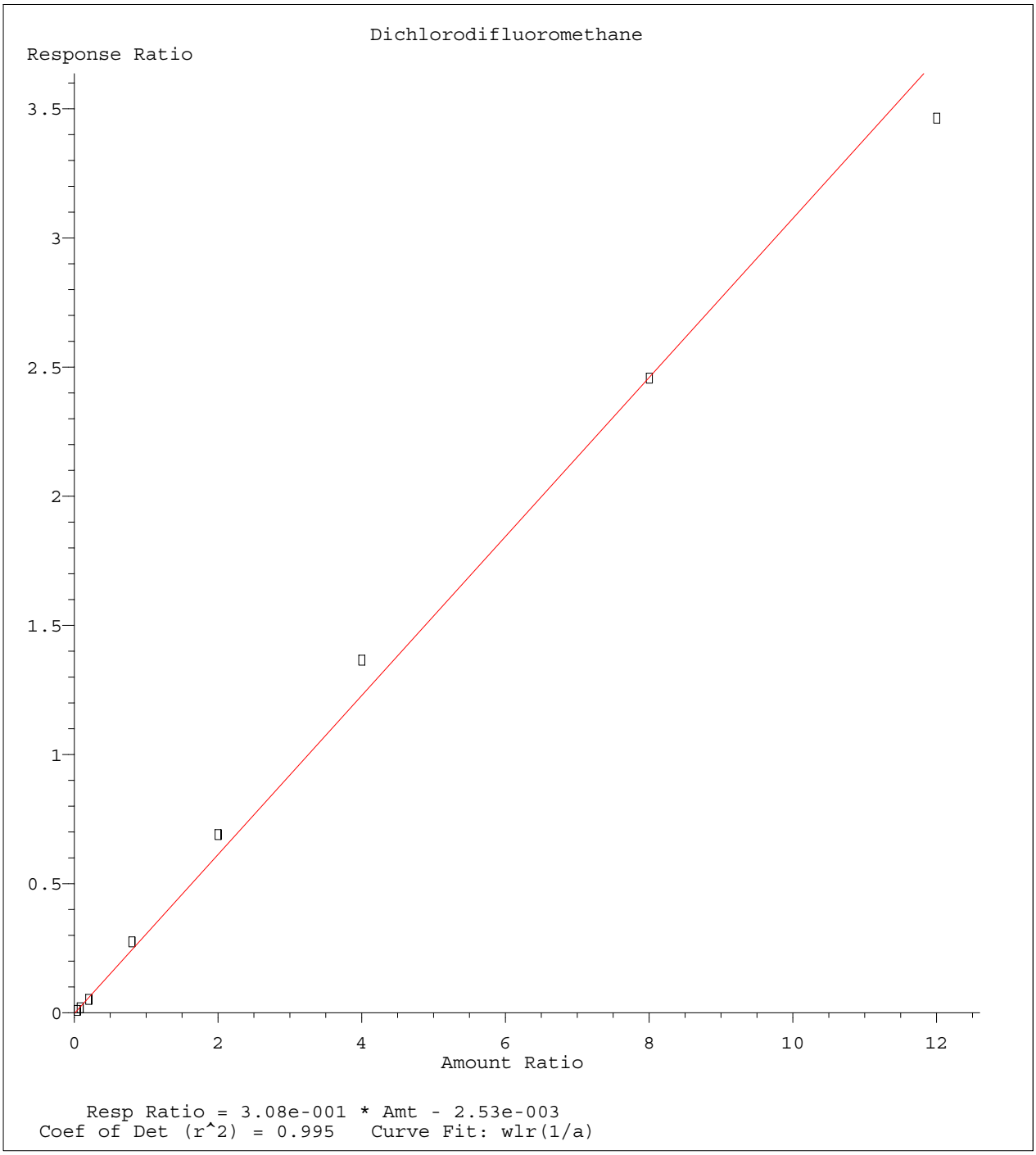
(#) = qualifier out of range (m) = manual integration
11M17716.D 8260WT.M Tue Apr 25 14:19:05 2017 Page 2

Quantitation Report (Not Reviewed)

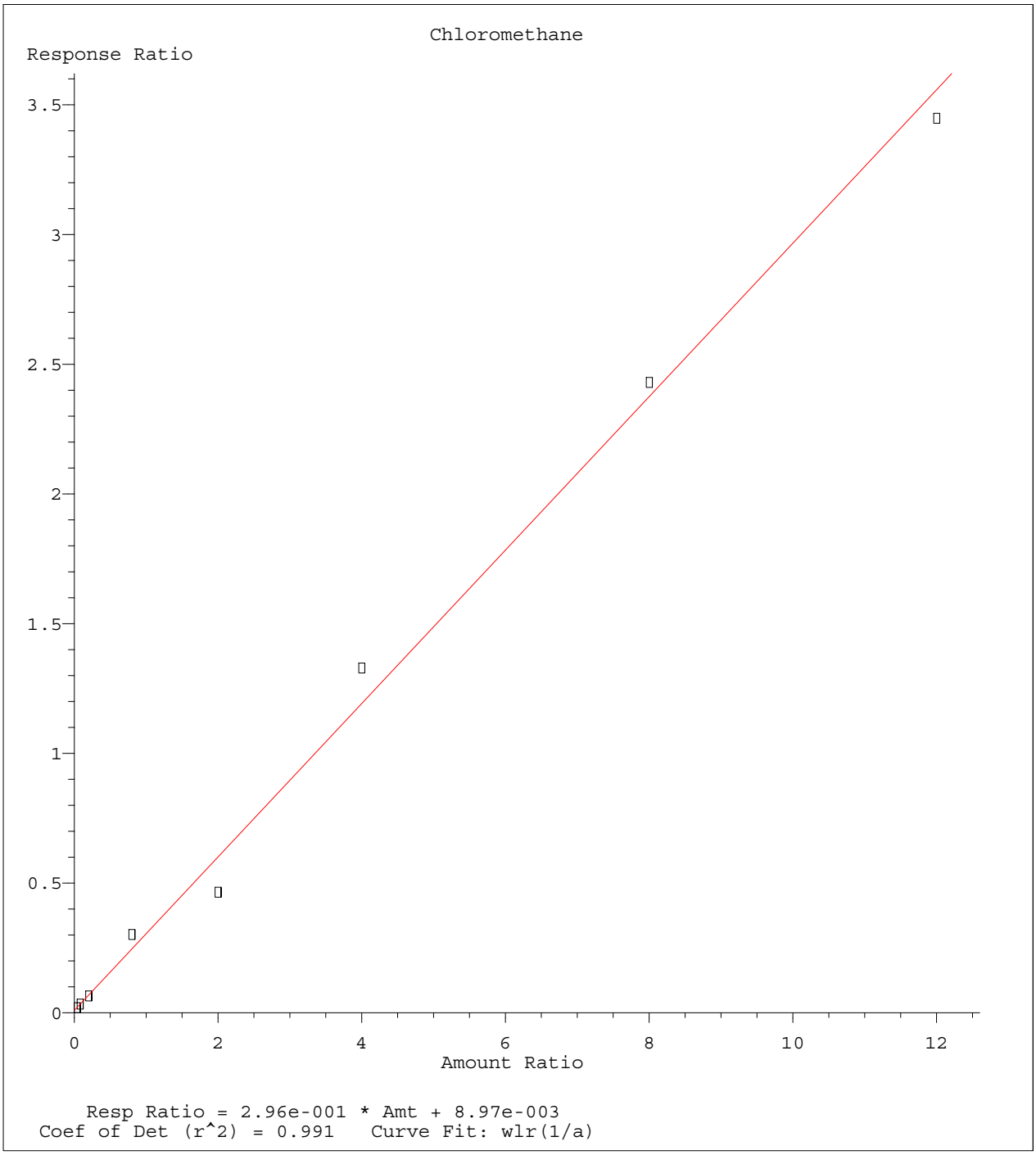
Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

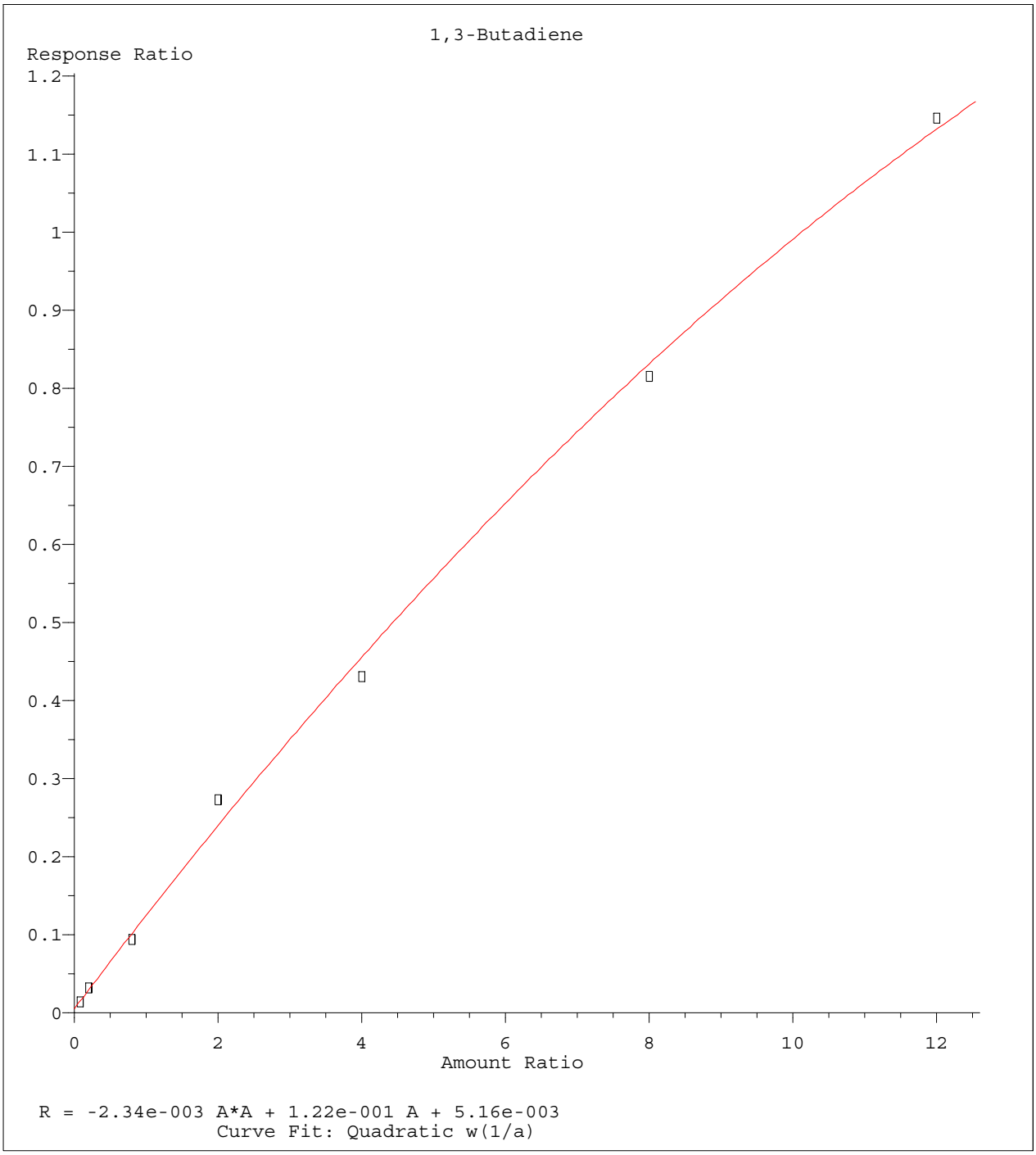




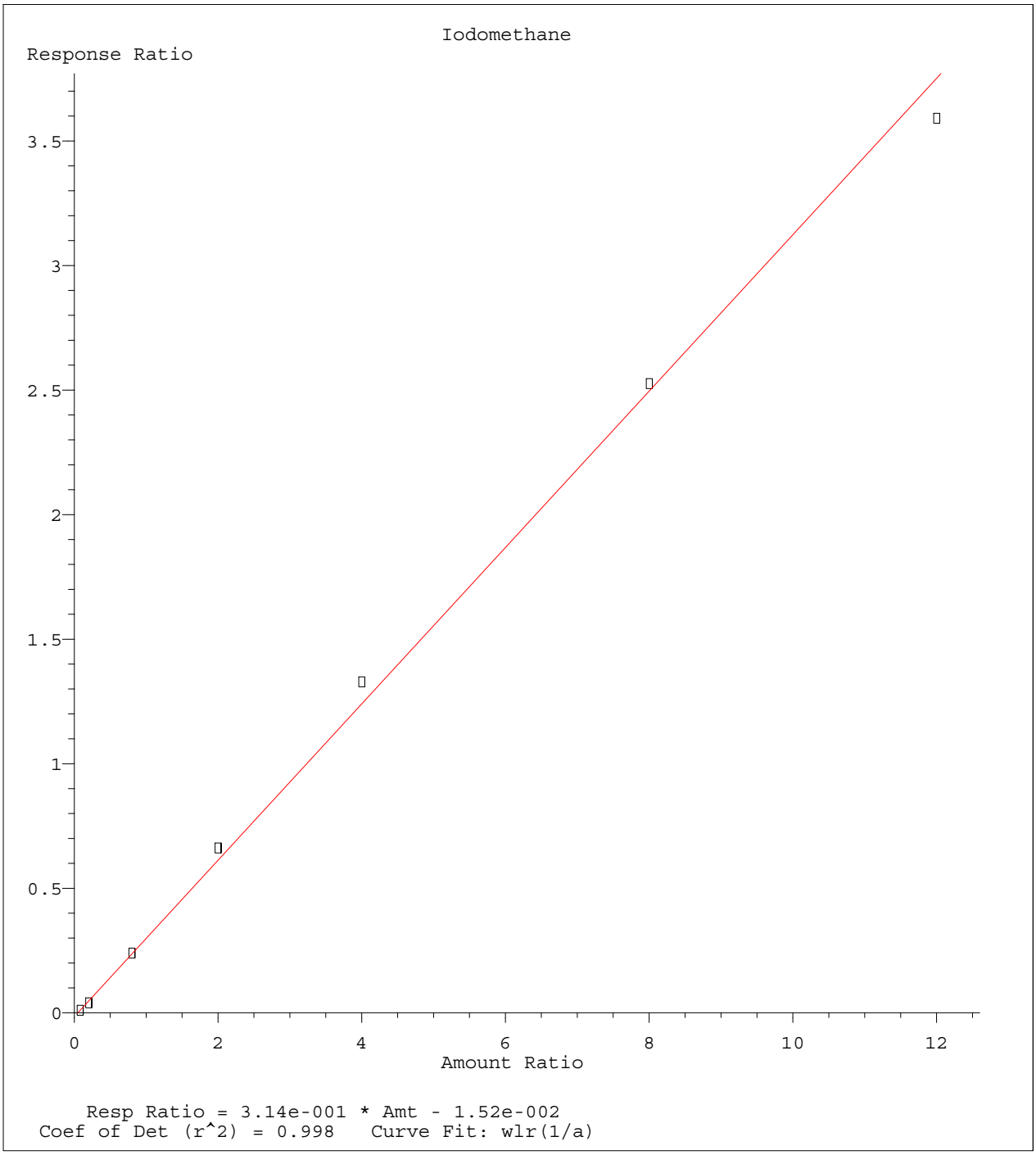
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



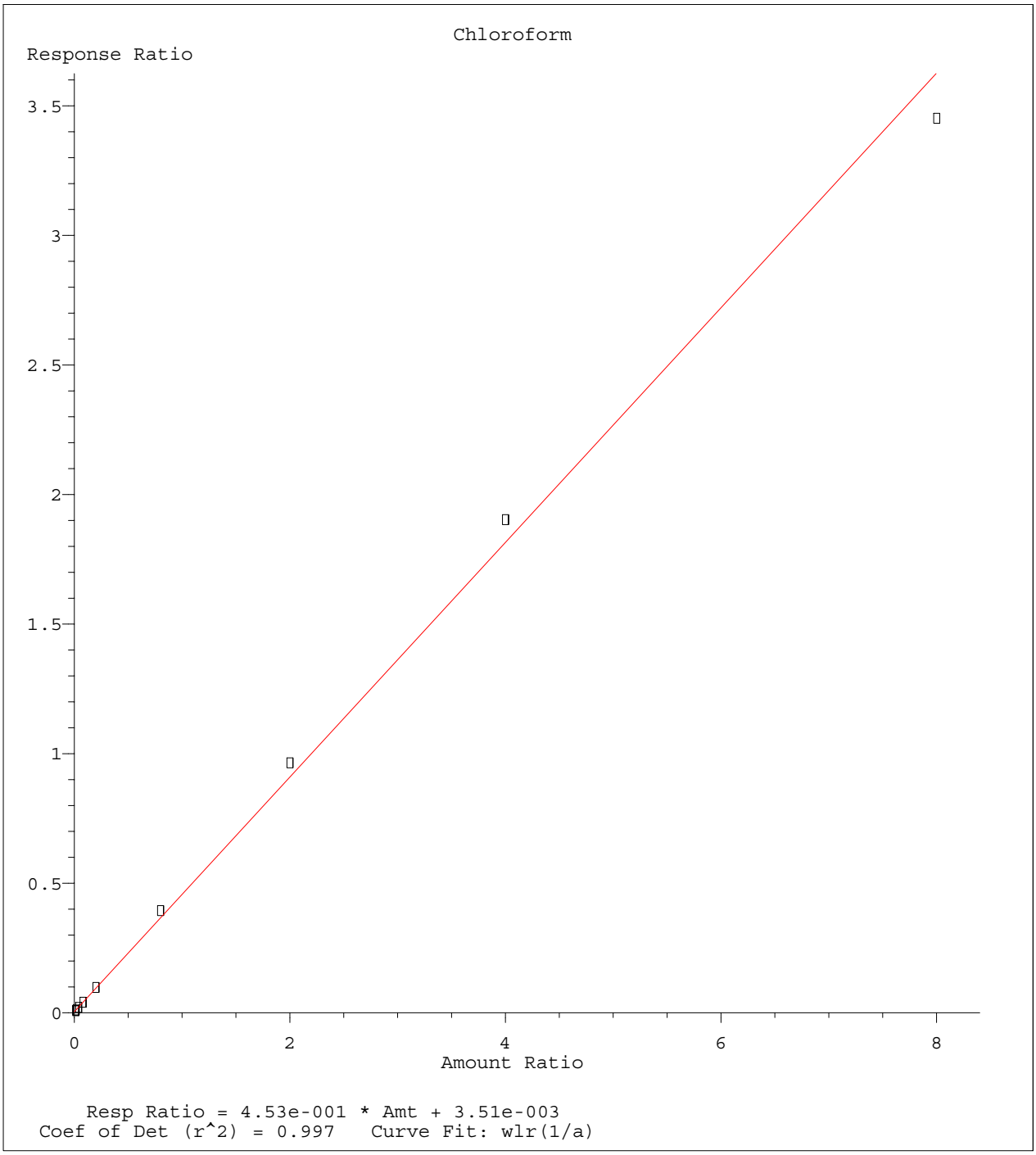
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



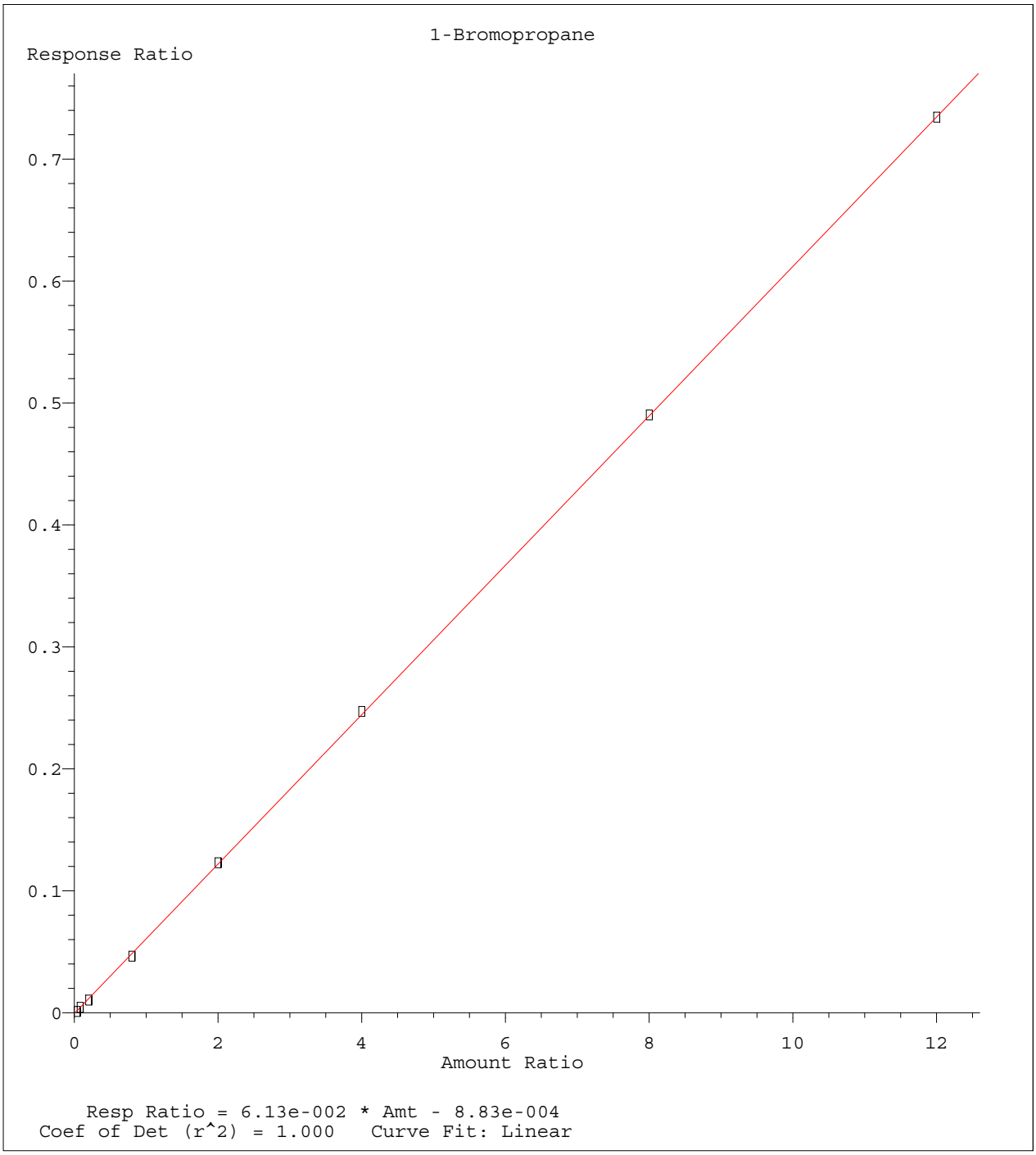
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	404778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	296292	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	174279	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	102600	25.5897	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.36%			
43) 1,2-Dichloroethane-d4	10.14	65	115358	24.7932	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.16%			
57) Toluene-d8	12.38	98	408420	26.5469	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%			
78) p-Bromofluorobenzene	15.54	95	155220	25.6245	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	321438	63.6532	ug/L	100
3) Chloromethane	3.66	50	314119	64.5824	ug/L	99
4) Vinyl Chloride	3.89	62	181213	52.1614	ug/L	100
5) 1,3-Butadiene	3.93	54	123931	71.8739	ug/L	99
6) Bromomethane	4.77	94	183192	51.0695	ug/L	100
7) Chloroethane	4.92	64	212398	59.0213	ug/L	100
8) Trichlorofluoromethane	5.40	101	335310	55.2461	ug/L	100
9) Diethyl ether	5.92	59	429716	95.6729	ug/L	99
10) Isoprene	5.96	67	323465	51.4431	ug/L	97
11) Acrolein	6.16	56	75414	105.5607	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	211256	58.7730	ug/L	99
13) Acetone	6.26	43	65342	48.2793	ug/L	98
14) 1,1-Dichloroethene	6.46	61	345883	47.8477	ug/L	100
15) Tert-Butyl Alcohol	6.59	59	109193	215.7028	ug/L	98
16) Dimethyl Sulfide	6.72	62	288119	50.7351	ug/L	98
17) Iodomethane	6.97	142	222809	43.3262	ug/L	100
18) Methyl acetate	6.99	43	188374	44.1300	ug/L	98
19) Methylene Chloride	7.23	84	226129	46.8839	ug/L	98
20) Carbon Disulfide	7.27	76	495160	40.0619	ug/L	99
21) Acrylonitrile	7.40	53	99809	49.9306	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	612436	50.7062	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	215317	48.9466	ug/L	100
24) n-Hexane	7.73	57	327658	48.0244	ug/L	99
25) Diisopropyl ether	8.07	45	1754893	99.7708	ug/L	98
26) Vinyl Acetate	8.23	43	491772	59.8944	ug/L	100
27) 1,1-Dichloroethane	8.26	63	443691	47.8528	ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1500356	96.5020	ug/L	99
29) 2-Butanone	8.79	43	111441	50.3923	ug/L	99
30) Propionitrile	8.89	54	75625	102.5076	ug/L	100
31) 2,2-Dichloropropane	9.00	77	271137	43.2012	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	246617	49.9593	ug/L	98
33) Chloroform	9.26	83	383109	52.4059	ug/L	100
34) 1-Bromopropane	9.39	122	61677	62.4526	ug/L	99
35) Bromochloromethane	9.48	130	151874	50.1778	ug/L	97
36) Tetrahydrofuran	9.50	42	159523	88.5595	ug/L	98
38) 1,1,1-Trichloroethane	9.77	97	342769	52.4274	ug/L	98
39) Cyclohexane	9.79	56	420990	45.7940	ug/L	98
40) 1,1-Dichloropropene	9.95	75	291345	50.8447	ug/L	99
41) Carbon Tetrachloride	10.09	117	295888	52.3252	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1274020	101.5789	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

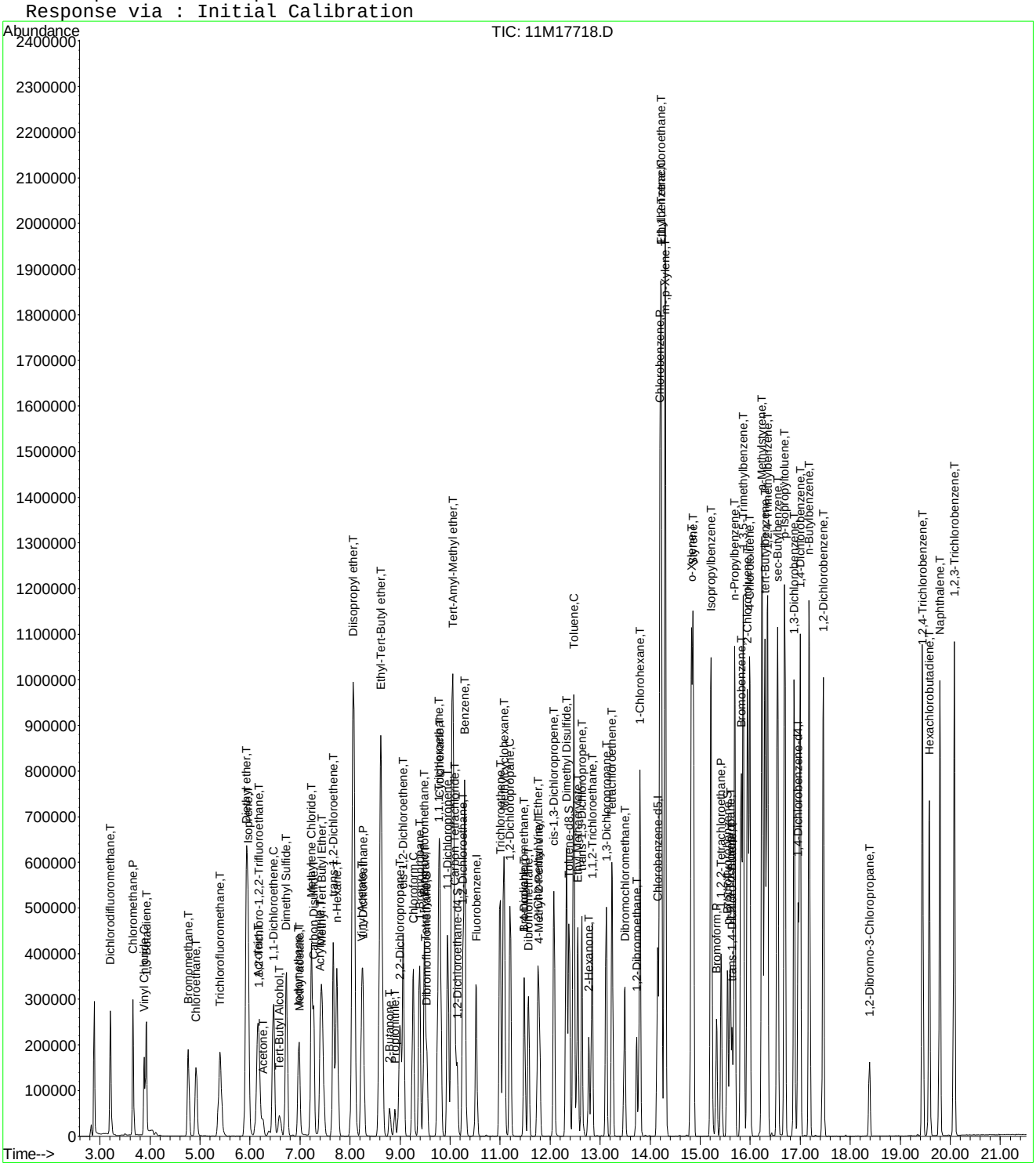
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	297642	47.0403	ug/L	99
45)	Benzene	10.29	78	857754	48.3197	ug/L	99
46)	Trichloroethene	11.00	130	228970	49.2082	ug/L	99
47)	Methylcyclohexane	11.07	83	365405	51.2204	ug/L	98
48)	1,2-Dichloropropane	11.20	63	268004	48.5090	ug/L	100
49)	1,4-Dioxane	11.48	88	11767	235.8524	ug/L	99
50)	Bromodichloromethane	11.48	83	285760	49.5766	ug/L	100
51)	Dibromomethane	11.57	93	132263	50.6083	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	168900	55.9554	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	102676	52.8249	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	366912	53.6513	ug/L	100
55)	Dimethyl Disulfide	12.32	79	227275	53.2447	ug/L	99
58)	Toluene	12.47	91	900488	46.9414	ug/L	98
59)	Ethyl Methacrylate	12.55	69	307663	58.3542	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	303988	50.1999	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	194833	48.1466	ug/L	99
62)	2-Hexanone	12.77	43	182967	54.4229	ug/L	96
63)	1,3-Dichloropropane	13.12	76	338332	50.3398	ug/L	95
64)	Tetrachloroethene	13.23	164	200233	52.5828	ug/L	100
65)	Dibromochloromethane	13.49	129	229367	50.8406	ug/L	100
66)	1,2-Dibromoethane	13.73	107	180409	49.5933	ug/L	100
67)	1-Chlorohexane	13.79	91	319102	58.3711	ug/L	97
68)	Chlorobenzene	14.20	112	596714	48.9142	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	224771	49.4896	ug/L	100
70)	Ethylbenzene	14.22	106	341076	52.8710	ug/L	99
71)	m-,p-Xylene	14.30	106	782076	101.3197	ug/L	99
72)	o-Xylene	14.83	106	405843	52.1817	ug/L	99
73)	Styrene	14.86	104	667618	57.9155	ug/L	100
74)	Bromoform	15.32	173	162013	50.1161	ug/L	99
75)	Isopropylbenzene	15.22	105	948335	49.9817	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	269536	49.1954	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	77024	49.0961	ug/L	99
80)	trans-1,4-Dichloro-2-Buten	15.63	53	68075	40.1306	ug/L	82
81)	n-Propylbenzene	15.69	91	1116620	45.7135	ug/L	100
82)	Bromobenzene	15.82	156	297807	50.0984	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	842028	50.3881	ug/L	99
84)	2-Chlorotoluene	15.94	91	715077	43.1176	ug/L	89
85)	4-Chlorotoluene	15.99	91	744558	49.7920	ug/L	87
86)	a-Methylstyrene	16.23	118	539705	58.5989	ug/L	100
87)	tert-Butylbenzene	16.30	134	198172	48.7761	ug/L	98
88)	1,2,4-Trimethylbenzene	16.35	105	869183	49.7323	ug/L	100
89)	sec-Butylbenzene	16.54	105	1050045	47.5779	ug/L	100
90)	p-Isopropyltoluene	16.69	119	930341	52.4611	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	546568	51.6893	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	556363	48.9232	ug/L	99
93)	n-Butylbenzene	17.17	91	857941	54.0817	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	552370	51.7680	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	49841	51.8465	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	451948	58.9976	ug/L	100
97)	Hexachlorobutadiene	19.58	225	223584	55.0311	ug/L	98
98)	Naphthalene	19.79	128	955305	55.9143	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	445985	56.9069	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	0.2938	0.3971	-35.2#	105	0.00
3	P	Chloromethane	0.3458	0.3880	-12.2	152#	0.00
4	C	Vinyl Chloride	0.2146	0.2238	-4.3	90	0.00
5	T	1,3-Butadiene	0.1274	0.1531	-20.1	102	0.00
6	T	Bromomethane	0.2216	0.2263	-2.1	102	-0.01
7	T	Chloroethane	0.2223	0.2624	-18.0	102	-0.01
8	T	Trichlorofluoromethane	0.3749	0.4142	-10.5	94	-0.01
9	T	Diethyl ether	0.2774	0.2654	4.3	87	0.00
10	T	Isoprene	0.3883	0.3996	-2.9	84	-0.01
11	T	Acrolein	0.0441	0.0931	-111.1#	190#	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2610	-17.5	102	0.01
13	T	Acetone	0.0836	0.0807	3.4	90	0.00
14	C	1,1-Dichloroethene	0.4465	0.4273	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0337	-7.8	101	0.02
16	T	Dimethyl Sulfide	0.3507	0.3559	-1.5	89	-0.01
17	T	Iodomethane	0.2712	0.2752	-1.5	76	0.00
18	T	Methyl acetate	0.2636	0.2327	11.7	80	0.01
19	T	Methylene Chloride	0.2979	0.2793	6.2	85	0.00
20	T	Carbon Disulfide	0.7634	0.6116	19.9	69	-0.01
21	T	Acrylonitrile	0.1235	0.1233	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7565	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	0.2717	0.2660	2.1	88	-0.01
24	T	n-Hexane	0.4214	0.4047	4.0	80	0.00
25	T	Diisopropyl ether	1.0863	1.0839	0.2	91	0.00
26	T	Vinyl Acetate	0.5071	0.6075	-19.8	106	0.00
27	P	1,1-Dichloroethane	0.5727	0.5481	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	88	0.00
29	T	2-Butanone	0.1366	0.1377	-0.8	91	0.00
30	T	Propionitrile	0.0456	0.0467	-2.5	93	0.00
31	T	2,2-Dichloropropane	0.3876	0.3349	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.3046	0.1	87	-0.01
33	C	Chloroform	0.5272	0.4732	10.2	89	0.00
34	T	1-Bromopropane	0.0547	0.0762	-39.2#	113	0.00
35	T	Bromochloromethane	0.1869	0.1876	-0.4	87	0.00
36	T	Tetrahydrofuran	0.1113	0.0985	11.4	87	0.00
37	S	Dibromofluoromethane	0.2476	0.2535	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4234	-4.9	89	0.01
39	T	Cyclohexane	0.5678	0.5200	8.4	76	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3599	-1.7	88	0.00
41	T	Carbon Tetrachloride	0.3493	0.3655	-4.6	87	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7869	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	0.2874	0.2850	0.8	88	0.00
44	T	1,2-Dichloroethane	0.3908	0.3677	5.9	82	0.00
45	T	Benzene	1.0964	1.0595	3.4	89	0.00
46	T	Trichloroethene	0.2874	0.2828	1.6	86	0.00
47	T	Methylcyclohexane	0.4406	0.4514	-2.4	85	0.00
48	C	1,2-Dichloropropane	0.3412	0.3311	3.0	86	0.00
49	T	1,4-Dioxane	0.0031	0.0036	-17.9	110	0.01
50	T	Bromodichloromethane	0.3560	0.3530	0.8	85	-0.01
51	T	Dibromomethane	0.1614	0.1634	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.2086	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1268	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4532	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:52 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2807	-6.5	93	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	92	0.00
57	S	Toluene-d8	1.2981	1.3784	-6.2	93	0.00
58	C	Toluene	1.6186	1.5196	6.1	90	0.00
59	T	Ethyl Methacrylate	0.4449	0.5192	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5130	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3288	3.7	86	0.00
62	T	2-Hexanone	0.2837	0.3088	-8.8	99	0.00
63	T	1,3-Dichloropropane	0.5671	0.5709	-0.7	89	0.00
64	T	Tetrachloroethene	0.3213	0.3379	-5.2	90	0.00
65	T	Dibromochloromethane	0.3807	0.3871	-1.7	85	0.00
66	T	1,2-Dibromoethane	0.3069	0.3044	0.8	86	0.00
67	T	1-Chlorohexane	0.4613	0.5385	-16.7	96	0.00
68	P	Chlorobenzene	1.0293	1.0070	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3793	1.0	85	0.00
70	C	Ethylbenzene	0.5443	0.5756	-5.7	90	0.00
71	T	m-,p-Xylene	0.6513	0.6599	-1.3	91	0.00
72	T	o-Xylene	0.6562	0.6849	-4.4	90	0.00
73	T	Styrene	0.9726	1.1266	-15.8	92	0.00
74	P	Bromoform	0.2728	0.2734	-0.2	86	0.00
75	T	Isopropylbenzene	1.6009	1.6003	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7733	1.6	94	0.00
78	S	p-Bromofluorobenzene	0.8689	0.8906	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2210	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.1953	19.7	78	0.00
81	T	n-Propylbenzene	3.5039	3.2035	8.6	89	0.00
82	T	Bromobenzene	0.8527	0.8544	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4158	-0.8	92	0.00
84	T	2-Chlorotoluene	2.3790	2.0515	13.8	90	0.00
85	T	4-Chlorotoluene	2.1472	2.1361	0.5	94	0.00
86	T	a-Methylstyrene	1.3212	1.5484	-17.2	102	0.00
87	T	tert-Butylbenzene	0.5828	0.5686	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4937	0.5	92	0.00
89	T	sec-Butylbenzene	3.1659	3.0125	4.8	91	0.00
90	T	p-Isopropyltoluene	2.5439	2.6691	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5681	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5962	2.2	96	0.00
93	T	n-Butylbenzene	2.2689	2.4614	-8.5	94	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.5847	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1430	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2966	-18.0	101	0.00
97	T	Hexachlorobutadiene	0.5828	0.6414	-10.1	99	0.00
98	T	Naphthalene	2.4508	2.7407	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.2795	-13.8	104	0.00

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	50.0000	63.6532	-27.3#	105	0.00
3	P	Chloromethane	50.0000	64.5824	-29.2#	152	0.00
4	C	Vinyl Chloride	50.0000	52.1614	-4.3	90	0.00
5	T	1,3-Butadiene	50.0000	71.8739	-43.7#	102	0.00
6	T	Bromomethane	50.0000	51.0695	-2.1	102	-0.01
7	T	Chloroethane	50.0000	59.0213	-18.0	102	-0.01
8	T	Trichlorofluoromethane	50.0000	55.2461	-10.5	94	-0.01
9	T	Diethyl ether	100.0000	95.6729	4.3	87	0.00
10	T	Isoprene	50.0000	51.4430	-2.9	84	-0.01
11	T	Acrolein	50.0000	105.5607	-111.1#	190	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	58.7730	-17.5	102	0.01
13	T	Acetone	50.0000	48.2793	3.4	90	0.00
14	C	1,1-Dichloroethene	50.0000	47.8477	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	200.0000	215.7028	-7.9	101	0.02
16	T	Dimethyl Sulfide	50.0000	50.7351	-1.5	89	-0.01
17	T	Iodomethane	50.0000	43.3262	13.3	76	0.00
18	T	Methyl acetate	50.0000	44.1300	11.7	80	0.01
19	T	Methylene Chloride	50.0000	46.8839	6.2	85	0.00
20	T	Carbon Disulfide	50.0000	40.0619	19.9	69	-0.01
21	T	Acrylonitrile	50.0000	49.9306	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.7062	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	50.0000	48.9466	2.1	88	-0.01
24	T	n-Hexane	50.0000	48.0244	4.0	80	0.00
25	T	Diisopropyl ether	100.0000	99.7708	0.2	91	0.00
26	T	Vinyl Acetate	50.0000	59.8944	-19.8	106	0.00
27	P	1,1-Dichloroethane	50.0000	47.8528	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5020	3.5	88	0.00
29	T	2-Butanone	50.0000	50.3923	-0.8	91	0.00
30	T	Propionitrile	100.0000	102.5076	-2.5	93	0.00
31	T	2,2-Dichloropropane	50.0000	43.2012	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	49.9593	0.1	87	-0.01
33	C	Chloroform	50.0000	52.4059	-4.8	89	0.00
34	T	1-Bromopropane	50.0000	62.4526	-24.9	113	0.00
35	T	Bromochloromethane	50.0000	50.1778	-0.4	87	0.00
36	T	Tetrahydrofuran	100.0000	88.5595	11.4	87	0.00
37	S	Dibromofluoromethane	25.0000	25.5897	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	50.0000	52.4274	-4.9	89	0.01
39	T	Cyclohexane	50.0000	45.7940	8.4	76	-0.01
40	T	1,1-Dichloropropene	50.0000	50.8447	-1.7	88	0.00
41	T	Carbon Tetrachloride	50.0000	52.3252	-4.7	87	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	101.5789	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.7932	0.8	88	0.00
44	T	1,2-Dichloroethane	50.0000	47.0403	5.9	82	0.00
45	T	Benzene	50.0000	48.3197	3.4	89	0.00
46	T	Trichloroethene	50.0000	49.2083	1.6	86	0.00
47	T	Methylcyclohexane	50.0000	51.2204	-2.4	85	0.00
48	C	1,2-Dichloropropane	50.0000	48.5090	3.0	86	0.00
49	T	1,4-Dioxane	200.0000	235.8524	-17.9	110	0.01
50	T	Bromodichloromethane	50.0000	49.5766	0.8	85	-0.01
51	T	Dibromomethane	50.0000	50.6083	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	50.0000	55.9554	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	50.0000	52.8249	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	53.6513	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:54 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	53.2447	-6.5	93	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	92	0.00
57	S	Toluene-d8	25.0000	26.5469	-6.2	93	0.00
58	C	Toluene	50.0000	46.9414	6.1	90	0.00
59	T	Ethyl Methacrylate	50.0000	58.3542	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	50.0000	50.1999	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	50.0000	48.1465	3.7	86	0.00
62	T	2-Hexanone	50.0000	54.4229	-8.8	99	0.00
63	T	1,3-Dichloropropane	50.0000	50.3398	-0.7	89	0.00
64	T	Tetrachloroethene	50.0000	52.5827	-5.2	90	0.00
65	T	Dibromochloromethane	50.0000	50.8406	-1.7	85	0.00
66	T	1,2-Dibromoethane	50.0000	49.5932	0.8	86	0.00
67	T	1-Chlorohexane	50.0000	58.3711	-16.7	96	0.00
68	P	Chlorobenzene	50.0000	48.9142	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	49.4896	1.0	85	0.00
70	C	Ethylbenzene	50.0000	52.8710	-5.7	90	0.00
71	T	m-,p-Xylene	100.0000	101.3197	-1.3	91	0.00
72	T	o-Xylene	50.0000	52.1817	-4.4	90	0.00
73	T	Styrene	50.0000	57.9155	-15.8	92	0.00
74	P	Bromoform	50.0000	50.1161	-0.2	86	0.00
75	T	Isopropylbenzene	50.0000	49.9817	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	49.1954	1.6	94	0.00
78	S	p-Bromofluorobenzene	25.0000	25.6245	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	50.0000	49.0961	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	40.1307	19.7	78	0.00
81	T	n-Propylbenzene	50.0000	45.7135	8.6	89	0.00
82	T	Bromobenzene	50.0000	50.0984	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3881	-0.8	92	0.00
84	T	2-Chlorotoluene	50.0000	43.1176	13.8	90	0.00
85	T	4-Chlorotoluene	50.0000	49.7920	0.4	94	0.00
86	T	a-Methylstyrene	50.0000	58.5989	-17.2	102	0.00
87	T	tert-Butylbenzene	50.0000	48.7761	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.7323	0.5	92	0.00
89	T	sec-Butylbenzene	50.0000	47.5780	4.8	91	0.00
90	T	p-Isopropyltoluene	50.0000	52.4611	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	50.0000	51.6893	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	50.0000	48.9232	2.2	96	0.00
93	T	n-Butylbenzene	50.0000	54.0817	-8.2	94	0.00
94	T	1,2-Dichlorobenzene	50.0000	51.7679	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	51.8465	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	58.9976	-18.0	101	0.00
97	T	Hexachlorobutadiene	50.0000	55.0311	-10.1	99	0.00
98	T	Naphthalene	50.0000	55.9143	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	56.9069	-13.8	104	0.00

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	423656	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311145	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.956	65	238	0.0555	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.222%#		
47) Toluene-d8	6.815	98	3708	0.2388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.955%#		
66) p-Bromofluorobenzene	8.784	95	1270	0.2423	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.969%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	1386	0.2755	ug/L #	71
3) Chloromethane	1.215	50	1742	0.3538	ug/L	88
4) Vinyl Chloride	1.267	62	1689	0.3098	ug/L	88
5) 1,3-Butadiene	1.273	54	1144	0.3417	ug/L	97
6) Bromomethane	1.458	94	1616	0.3986	ug/L	94
7) Chloroethane	1.539	64	848	0.3278	ug/L #	77
8) Trichlorofluoromethane	1.626	101	2195	0.3138	ug/L	96
10) 1,1-Dichloroethene	1.962	61	2150	0.3285	ug/L	100
11) Carbon Disulfide	1.977	76	4627	0.3294	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	1335	0.3200	ug/L	97
13) Iodomethane	2.069	142	665	2.1023	ug/L	88
15) Methylene Chloride	2.405	84	1853	0.3732	ug/L	98
16) Acetone	2.463	43	744	0.8734	ug/L #	42
17) trans-1,2-Dichloroethene	2.544	96	1433	0.3216	ug/L	97
18) Methyl acetate	2.564	43	325	0.1455	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	3236	0.2862	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	2399	0.2998	ug/L #	88
23) cis-1,2-Dichloroethene	3.731	96	1523	0.3020	ug/L	99
24) 2,2-Dichloropropane	3.864	77	1041	0.4368	ug/L #	81
25) Cyclohexane	3.960	56	2117	0.3110	ug/L	93
26) Bromochloromethane	3.992	130	693	0.2132	ug/L	93
27) Chloroform	4.113	83	2418	0.2898	ug/L	97
28) Carbon Tetrachloride	4.252	117	1818	0.2755	ug/L #	92
30) 1,1,1-Trichloroethane	4.339	97	2183	0.2976	ug/L	95
31) 1,1-Dichloropropene	4.499	75	1767	0.3067	ug/L	94
32) 2-Butanone	4.542	43	223	0.1756	ug/L #	37
33) Benzene	4.803	78	5779	0.3202	ug/L	96
35) 1,2-Dichloroethane	5.028	62	1675	0.2981	ug/L #	83
36) Methylcyclohexane	5.422	83	2260	0.3169	ug/L	99
37) Trichloroethene	5.445	130	1637	0.3020	ug/L	99
38) Dibromomethane	5.862	93	745	0.2695	ug/L	97
39) 1,2-Dichloropropane	5.961	63	1450	0.3064	ug/L	87
40) Bromodichloromethane	6.050	83	1785	0.2826	ug/L	93
43) cis-1,3-Dichloropropene	6.647	75	1935	0.2719	ug/L	97
44) 4-Methyl-2-Pentanone	7.229	58	288	0.2449	ug/L #	23
45) trans-1,3-Dichloropropene	7.240	75	1352	0.2234	ug/L #	91
48) Toluene	6.858	91	6302	0.3231	ug/L	100
49) Tetrachloroethene	7.185	166	1930	0.3469	ug/L	91
50) 1,1,2-Trichloroethane	7.371	97	1139	0.3012	ug/L	94
51) Dibromochloromethane	7.504	129	1421	0.2753	ug/L	95
52) 1,3-Dichloropropane	7.585	76	1813	0.3017	ug/L	98
53) 1,2-Dibromoethane	7.672	107	1035	0.2672	ug/L	97
54) 2-Hexanone	7.889	43	602	0.3032	ug/L	97
55) Chlorobenzene	8.057	112	4294	0.3281	ug/L #	18
56) 1-Chlorohexane	8.068	69	297	0.2811	ug/L #	1
57) Ethylbenzene	8.095	106	2178	0.3197	ug/L	88

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

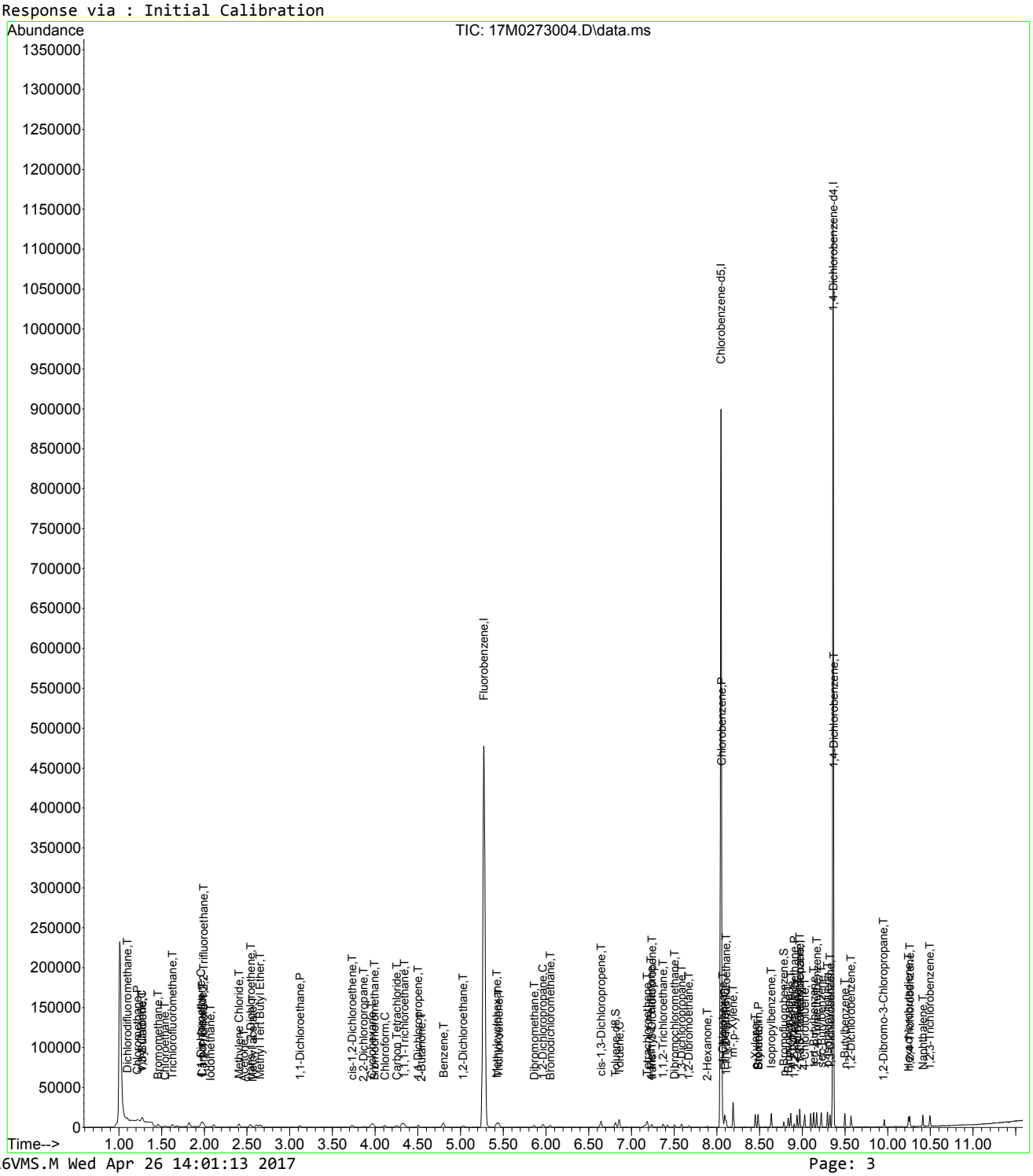
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
58) 1,1,1,2-Tetrachloroethane	8.109	131	1430	0.2807	ug/L	84
59) m-,p-Xylene	8.190	106	5242	0.6375	ug/L	99
60) o-Xylene	8.451	106	2600	0.3209	ug/L	98
61) Styrene	8.483	104	3767	0.2906	ug/L	99
62) Bromoform	8.485	173	950	0.2617	ug/L	94
63) Isopropylbenzene	8.636	105	6492	0.3096	ug/L	95
65) 1,3,5-Trimethylbenzene	8.972	105	5612	0.3216	ug/L	97
67) Bromobenzene	8.836	156	1948	0.3164	ug/L	95
68) n-Propylbenzene	8.865	91	7312	0.3164	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	1172	0.2784	ug/L	97
70) 2-Chlorotoluene	8.940	91	4467	0.3131	ug/L	97
71) 1,2,3-Trichloropropane	8.972	110	337	0.2708	ug/L	78
73) 1,2,4-Trimethylbenzene	9.169	105	5331	0.3030	ug/L	99
74) 4-Chlorotoluene	9.030	91	4520	0.3174	ug/L	99
75) tert-Butylbenzene	9.134	134	1169	0.3352	ug/L	95
76) sec-Butylbenzene	9.224	105	6865	0.3194	ug/L	99
77) p-Isopropyltoluene	9.296	119	5855	0.3195	ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	3604	0.3358	ug/L	97
79) 1,4-Dichlorobenzene	9.368	146	3693	0.3408	ug/L	89
80) n-Butylbenzene	9.499	91	5016	0.3243	ug/L	99
81) 1,2-Dichlorobenzene	9.571	146	3159	0.3020	ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	194	0.2512	ug/L	85
83) Hexachlorobutadiene	10.243	225	1532	0.3474	ug/L	94
84) 1,2,4-Trichlorobenzene	10.260	180	2401	0.3090	ug/L	96
85) Naphthalene	10.411	128	4948	0.3265	ug/L	95
86) 1,2,3-Trichlorobenzene	10.495	180	2415	0.3200	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:13 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.275	0.0	0	0.000
3	P	Chloromethane	-1.000	0.354	0.0	0	0.000
4	C	Vinyl Chloride	-1.000	0.310	0.0	0	0.000
5	T	1,3-Butadiene	-1.000	0.342	0.0	0	0.000
6	T	Bromomethane	-1.000	0.399	0.0	0	0.000
7	T	Chloroethane	-1.000	0.328	0.0	0	0.011
8	T	Trichlorofluoromethane	-1.000	0.314	0.0	0	0.011
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	-1.000	0.329	0.0	0	0.000
11	T	Carbon Disulfide	-1.000	0.329	0.0	0	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.000	0.320	0.0	0	0.000
13	T	Iodomethane	-1.000	2.102	0.0	0	0.011
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	-1.000	0.373	0.0	0	0.000
16	T	Acetone	-1.000	0.873	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	-1.000	0.322	0.0	0	0.012
18	T	Methyl acetate	-1.000	0.146	0.0	0	0.000
19	T	Methyl Tert Butyl Ether	-1.000	0.286	0.0	0	0.000
20	P	1,1-Dichloroethane	-1.000	0.300	0.0	0	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	-1.000	0.302	0.0	0	0.000
24	T	2,2-Dichloropropane	-1.000	0.437	0.0	0	0.000
25	T	Cyclohexane	-1.000	0.311	0.0	0	0.000
26	T	Bromochloromethane	-1.000	0.213	0.0	0	0.018
27	C	Chloroform	0.300	0.290	3.3#	100	0.000
28	T	Carbon Tetrachloride	-1.000	0.276	0.0	0	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	-1.000	0.298	0.0	0	0.000
31	T	1,1-Dichloropropene	-1.000	0.307	0.0	0	0.000
32	T	2-Butanone	-1.000	0.176	0.0	0	0.018
33	T	Benzene	-1.000	0.320	0.0	0	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.055	0.0	0	0.000
35	T	1,2-Dichloroethane	-1.000	0.298	0.0	0	0.000
36	T	Methylcyclohexane	0.300	0.317	-5.7	100	0.000
37	T	Trichloroethene	-1.000	0.302	0.0	0	0.000
38	T	Dibromomethane	-1.000	0.270	0.0	0	0.000
39	C	1,2-Dichloropropane	-1.000	0.306	0.0	0	0.000
40	T	Bromodichloromethane	-1.000	0.283	0.0	0	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.098	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	-1.000	0.272	0.0	0	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.245	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.223	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.239	0.0	0	0.000
48	C	Toluene	-1.000	0.323	0.0	0	0.000
49	T	Tetrachloroethene	-1.000	0.347	0.0	0	0.000
50	T	1,1,2-Trichloroethane	-1.000	0.301	0.0	0	0.000
51	T	Dibromochloromethane	-1.000	0.275	0.0	0	0.000
52	T	1,3-Dichloropropane	-1.000	0.302	0.0	0	0.000
53	T	1,2-Dibromoethane	-1.000	0.267	0.0	0	0.000
54	T	2-Hexanone	-1.000	0.303	0.0	0	0.000
55	P	Chlorobenzene	-1.000	0.328	0.0	0	0.000
56	T	1-Chlorohexane	-1.000	0.281	0.0	0	0.000
57	C	Ethylbenzene	-1.000	0.320	0.0	0	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	-1.000	0.281	0.0	0	0.000
59	T	m-,p-Xylene	-1.000	0.637	0.0	0	0.000
60	T	o-Xylene	-1.000	0.321	0.0	0	0.000
61	T	Styrene	-1.000	0.291	0.0	0	0.000
62	P	Bromoform	-1.000	0.262	0.0	0	0.000
63	T	Isopropylbenzene	-1.000	0.310	0.0	0	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	-1.000	0.322	0.0	0	0.000
66	S	p-Bromofluorobenzene	-1.000	0.242	0.0	0	0.000
67	T	Bromobenzene	0.300	0.316	-5.3	100	0.000
68	T	n-Propylbenzene	-1.000	0.316	0.0	0	0.000
69	P	1,1,2,2-Tetrachloroethane	-1.000	0.278	0.0	0	0.000
70	T	2-Chlorotoluene	-1.000	0.313	0.0	0	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.271	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.110	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	-1.000	0.303	0.0	0	0.000
74	T	4-Chlorotoluene	-1.000	0.317	0.0	0	0.000
75	T	tert-Butylbenzene	-1.000	0.335	0.0	0	0.000
76	T	sec-Butylbenzene	-1.000	0.319	0.0	0	0.000
77	T	p-Isopropyltoluene	-1.000	0.320	0.0	0	0.000
78	T	1,3-Dichlorobenzene	-1.000	0.336	0.0	0	0.000
79	T	1,4-Dichlorobenzene	0.300	0.341	-13.7	100	0.000
80	T	n-Butylbenzene	-1.000	0.324	0.0	0	0.000
81	T	1,2-Dichlorobenzene	0.300	0.302	-0.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.251	0.0	0	0.000
83	T	Hexachlorobutadiene	-1.000	0.347	0.0	0	0.000
84	T	1,2,4-Trichlorobenzene	-1.000	0.309	0.0	0	0.000
85	T	Naphthalene	-1.000	0.327	0.0	0	0.000
86	T	1,2,3-Trichlorobenzene	0.300	0.320	-6.7	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	420908	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307739	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151803	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.968	65	216	0.0507	ug/L	0.0145
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.203%#		
47) Toluene-d8	6.818	98	3149	0.2050	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.820%#		
66) p-Bromofluorobenzene	8.786	95	1018	0.2003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.801%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1833	0.3667	ug/L #	71
3) Chloromethane	1.224	50	2073	0.4237	ug/L	97
4) Vinyl Chloride	1.267	62	2251	0.4155	ug/L	86
5) 1,3-Butadiene	1.276	54	1444	0.4341	ug/L	90
6) Bromomethane	1.467	94	2073	0.5147	ug/L	98
7) Chloroethane	1.545	64	1207	0.4697	ug/L	84
8) Trichlorofluoromethane	1.632	101	3013	0.4336	ug/L	98
10) 1,1-Dichloroethene	1.968	61	2718	0.4180	ug/L	98
11) Carbon Disulfide	1.982	76	5991	0.4293	ug/L	97
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	1729	0.4171	ug/L	96
13) Iodomethane	2.066	142	736	2.1139	ug/L #	78
15) Methylene Chloride	2.411	84	2286	0.4634	ug/L	99
16) Acetone	2.463	43	807	0.9536	ug/L #	77
17) trans-1,2-Dichloroethene	2.541	96	1807	0.4082	ug/L	97
18) Methyl acetate	2.573	43	725	0.3268	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	4361	0.3882	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	3143	0.3953	ug/L	96
23) cis-1,2-Dichloroethene	3.731	96	2019	0.4029	ug/L	97
24) 2,2-Dichloropropane	3.870	77	1332	0.4838	ug/L	99
25) Cyclohexane	3.966	56	2634	0.3895	ug/L	99
26) Bromochloromethane	3.992	130	1100	0.3407	ug/L	90
27) Chloroform	4.113	83	3459	0.4172	ug/L	98
28) Carbon Tetrachloride	4.258	117	2434	0.3713	ug/L #	92
30) 1,1,1-Trichloroethane	4.351	97	2888	0.3962	ug/L	97
31) 1,1-Dichloropropene	4.507	75	2338	0.4084	ug/L	94
32) 2-Butanone	4.539	43	444	0.3519	ug/L #	37
33) Benzene	4.797	78	7693	0.4291	ug/L	98
35) 1,2-Dichloroethane	5.037	62	2311	0.4140	ug/L #	86
36) Methylcyclohexane	5.422	83	2910	0.4107	ug/L	98
37) Trichloroethene	5.454	130	2296	0.4264	ug/L	96
38) Dibromomethane	5.862	93	1026	0.3736	ug/L	94
39) 1,2-Dichloropropane	5.966	63	1791	0.3809	ug/L	98
40) Bromodichloromethane	6.053	83	2463	0.3925	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.632	63	400	0.1876	ug/L #	42
43) cis-1,3-Dichloropropene	6.650	75	2541	0.3593	ug/L	94
44) 4-Methyl-2-Pentanone	7.226	58	368	0.3150	ug/L	79
45) trans-1,3-Dichloropropene	7.237	75	1772	0.2948	ug/L	98
48) Toluene	6.858	91	8187	0.4243	ug/L	97
49) Tetrachloroethene	7.185	166	2388	0.4339	ug/L	97
50) 1,1,2-Trichloroethane	7.376	97	1530	0.4091	ug/L	98
51) Dibromochloromethane	7.507	129	2046	0.4008	ug/L	98
52) 1,3-Dichloropropane	7.588	76	2378	0.4001	ug/L	92
53) 1,2-Dibromoethane	7.672	107	1583	0.4132	ug/L	95
54) 2-Hexanone	7.892	43	744	0.3788	ug/L	96
55) Chlorobenzene	8.060	112	5389	0.4163	ug/L #	31
56) 1-Chlorohexane	8.071	69	449	0.4296	ug/L #	66

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

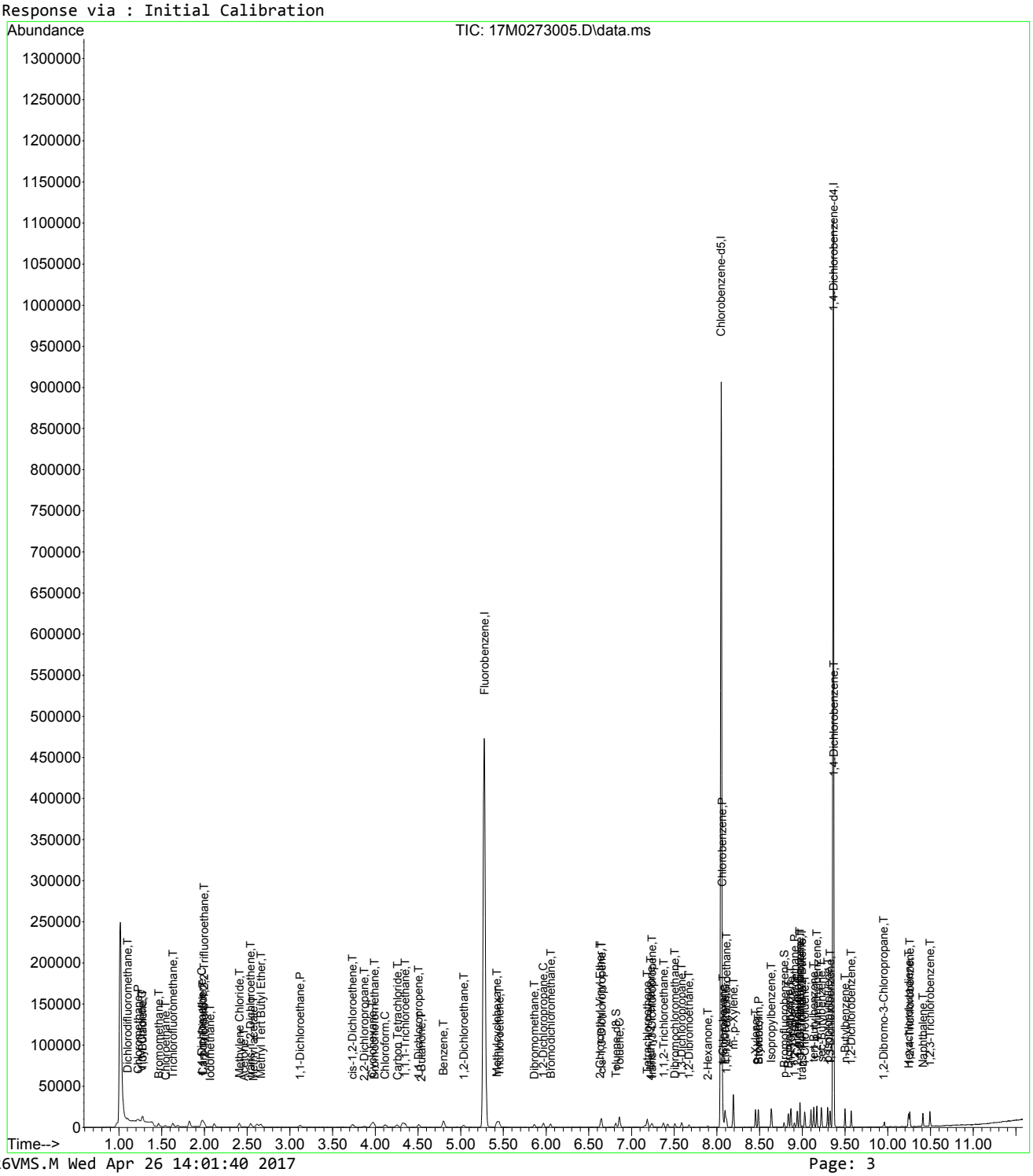
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
57) Ethylbenzene	8.094	106	2751	0.4082	ug/L		85
58) 1,1,1,2-Tetrachloroethane	8.112	131	2018	0.4004	ug/L		92
59) m-,p-Xylene	8.193	106	6639	0.8163	ug/L		98
60) o-Xylene	8.451	106	3154	0.3936	ug/L		95
61) Styrene	8.482	104	4908	0.3828	ug/L		98
62) Bromoform	8.485	173	1308	0.3643	ug/L		88
63) Isopropylbenzene	8.636	105	8520	0.4108	ug/L		99
65) 1,3,5-Trimethylbenzene	8.969	105	6976	0.4122	ug/L		97
67) Bromobenzene	8.836	156	2470	0.4136	ug/L		97
68) n-Propylbenzene	8.865	91	9526	0.4249	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	1521	0.3725	ug/L		100
70) 2-Chlorotoluene	8.940	91	5795	0.4188	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	488	0.4043	ug/L		94
72) trans-1,4-Dichloro-2-B...	8.995	53	204	0.2267	ug/L	#	80
73) 1,2,4-Trimethylbenzene	9.169	105	7147	0.4188	ug/L		97
74) 4-Chlorotoluene	9.027	91	5692	0.4121	ug/L		99
75) tert-Butylbenzene	9.131	134	1424	0.4210	ug/L		97
76) sec-Butylbenzene	9.224	105	8888	0.4263	ug/L		96
77) p-Isopropyltoluene	9.296	119	7466	0.4201	ug/L		99
78) 1,3-Dichlorobenzene	9.322	146	4514	0.4336	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	4491	0.4273	ug/L		85
80) n-Butylbenzene	9.499	91	6442	0.4295	ug/L		95
81) 1,2-Dichlorobenzene	9.571	146	4496	0.4432	ug/L		96
82) 1,2-Dibromo-3-Chloropr...	9.947	75	266	0.3551	ug/L		81
83) Hexachlorobutadiene	10.243	225	1975	0.4618	ug/L		93
84) 1,2,4-Trichlorobenzene	10.257	180	3124	0.4145	ug/L		95
85) Naphthalene	10.411	128	6130	0.4171	ug/L		98
86) 1,2,3-Trichlorobenzene	10.495	180	3077	0.4203	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:40 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.367	0.0	0	0.000
3	P	Chloromethane	-1.000	0.424	0.0	0	0.012
4	C	Vinyl Chloride	0.400	0.416	-4.0#	100	0.000
5	T	1,3-Butadiene	-1.000	0.434	0.0	0	0.000
6	T	Bromomethane	-1.000	0.515	0.0	0	0.012
7	T	Chloroethane	-1.000	0.470	0.0	0	0.017
8	T	Trichlorofluoromethane	0.400	0.434	-8.5	100	0.017
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	0.400	0.418	-4.5#	100	0.012
11	T	Carbon Disulfide	0.400	0.429	-7.2	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.400	0.417	-4.2	100	0.000
13	T	Iodomethane	-1.000	2.114	0.0	0	0.000
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	0.400	0.463	-15.8	100	0.012
16	T	Acetone	-1.000	0.954	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	0.400	0.408	-2.0	100	0.000
18	T	Methyl acetate	0.400	0.327	18.3	100	0.000
19	T	Methyl Tert Butyl Ether	0.400	0.388	3.0	100	0.015
20	P	1,1-Dichloroethane	0.400	0.395	1.3	100	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	0.400	0.403	-0.8	100	0.000
24	T	2,2-Dichloropropane	0.400	0.484	-21.0	100	0.012
25	T	Cyclohexane	0.400	0.389	2.8	100	0.000
26	T	Bromochloromethane	-1.000	0.341	0.0	0	0.018
27	C	Chloroform	0.400	0.417	-4.2#	100	0.000
28	T	Carbon Tetrachloride	0.400	0.371	7.3	100	0.012
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	0.400	0.396	1.0	100	0.000
31	T	1,1-Dichloropropene	0.400	0.408	-2.0	100	0.000
32	T	2-Butanone	-1.000	0.352	0.0	0	0.015
33	T	Benzene	0.400	0.429	-7.2	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.051	0.0	0	0.014
35	T	1,2-Dichloroethane	0.400	0.414	-3.5	100	0.000
36	T	Methylcyclohexane	0.400	0.411	-2.7	100	0.000
37	T	Trichloroethene	0.400	0.426	-6.5	100	0.000
38	T	Dibromomethane	0.400	0.374	6.5	100	0.000
39	C	1,2-Dichloropropane	0.400	0.381	4.8#	100	0.000
40	T	Bromodichloromethane	0.400	0.392	2.0	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.188	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	0.400	0.359	10.3	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.315	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.295	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.205	0.0	0	0.000
48	C	Toluene	0.400	0.424	-6.0#	100	0.000
49	T	Tetrachloroethene	0.400	0.434	-8.5	100	0.000
50	T	1,1,2-Trichloroethane	0.400	0.409	-2.2	100	0.000
51	T	Dibromochloromethane	0.400	0.401	-0.3	100	0.000
52	T	1,3-Dichloropropane	0.400	0.400	0.0	100	0.000
53	T	1,2-Dibromoethane	0.400	0.413	-3.2	100	0.000
54	T	2-Hexanone	-1.000	0.379	0.0	0	0.000
55	P	Chlorobenzene	0.400	0.416	-4.0	100	0.000
56	T	1-Chlorohexane	-1.000	0.430	0.0	0	0.000
57	C	Ethylbenzene	0.400	0.408	-2.0#	100	0.000

826VMS.M Wed Apr 26 14:01:37 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.400	0.400	0.0	100	0.000
59	T	m-,p-Xylene	0.800	0.816	-2.0	100	0.000
60	T	o-Xylene	0.400	0.394	1.5	100	0.000
61	T	Styrene	0.400	0.383	4.3	100	0.000
62	P	Bromoform	0.400	0.364	9.0	100	0.000
63	T	Isopropylbenzene	0.400	0.411	-2.7	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	0.400	0.412	-3.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.200	0.0	0	0.000
67	T	Bromobenzene	0.400	0.414	-3.5	100	0.000
68	T	n-Propylbenzene	0.400	0.425	-6.2	100	0.000
69	P	1,1,2,2-Tetrachloroethane	0.400	0.372	7.0	100	0.000
70	T	2-Chlorotoluene	0.400	0.419	-4.7	100	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.404	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.227	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	0.400	0.419	-4.7	100	0.000
74	T	4-Chlorotoluene	0.400	0.412	-3.0	100	0.000
75	T	tert-Butylbenzene	0.400	0.421	-5.2	100	0.000
76	T	sec-Butylbenzene	0.400	0.426	-6.5	100	0.000
77	T	p-Isopropyltoluene	0.400	0.420	-5.0	100	0.000
78	T	1,3-Dichlorobenzene	0.400	0.434	-8.5	100	0.000
79	T	1,4-Dichlorobenzene	0.400	0.427	-6.7	100	0.000
80	T	n-Butylbenzene	0.400	0.429	-7.2	100	0.000
81	T	1,2-Dichlorobenzene	0.400	0.443	-10.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.355	0.0	0	0.000
83	T	Hexachlorobutadiene	0.400	0.462	-15.5	100	0.000
84	T	1,2,4-Trichlorobenzene	0.400	0.415	-3.7	100	0.000
85	T	Naphthalene	0.400	0.417	-4.2	100	0.000
86	T	1,2,3-Trichlorobenzene	0.400	0.420	-5.0	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	426227	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	321768	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	162525	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.959	65	153	0.0355	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.142%#		
47) Toluene-d8	6.815	98	2654	0.1653	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.661%#		
66) p-Bromofluorobenzene	8.783	95	924	0.1698	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.679%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	4435	0.8761	ug/L	90
3) Chloromethane	1.218	50	4921	0.9933	ug/L	95
4) Vinyl Chloride	1.267	62	5224	0.9523	ug/L	100
5) 1,3-Butadiene	1.276	54	3212	0.9536	ug/L	92
6) Bromomethane	1.461	94	4459	1.0933	ug/L	94
7) Chloroethane	1.539	64	2867	1.1017	ug/L	94
8) Trichlorofluoromethane	1.626	101	7223	1.0265	ug/L	99
9) Diethyl ether	1.837	59	16707	4.9236	ug/L	98
10) 1,1-Dichloroethene	1.965	61	6575	0.9987	ug/L	99
11) Carbon Disulfide	1.976	76	13954	0.9875	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	4132	0.9844	ug/L	99
13) Iodomethane	2.060	142	2054	2.3117	ug/L	97
14) Acrolein	2.217	56	1026	2.4478	ug/L	97
15) Methylene Chloride	2.402	84	5125	1.0259	ug/L	99
16) Acetone	2.460	43	1354	1.5799	ug/L #	71
17) trans-1,2-Dichloroethene	2.538	96	4313	0.9621	ug/L	100
18) Methyl acetate	2.573	43	2105	0.9369	ug/L #	84
19) Methyl Tert Butyl Ether	2.654	73	11029	0.9694	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	7772	0.9652	ug/L	99
21) Acrylonitrile	3.187	53	2537	2.3210	ug/L	98
22) Vinyl Acetate	2.611	86	589	0.8163	ug/L	72
23) cis-1,2-Dichloroethene	3.737	96	4813	0.9485	ug/L	99
24) 2,2-Dichloropropane	3.864	77	4555	0.9837	ug/L	99
25) Cyclohexane	3.966	56	6602	0.9640	ug/L	100
26) Bromochloromethane	3.980	130	2843	0.8696	ug/L	97
27) Chloroform	4.113	83	8392	0.9997	ug/L	98
28) Carbon Tetrachloride	4.252	117	6172	0.9297	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	7196	0.9750	ug/L	99
31) 1,1-Dichloropropene	4.501	75	5583	0.9632	ug/L	97
32) 2-Butanone	4.539	43	1222	0.9564	ug/L #	37
33) Benzene	4.799	78	17817	0.9814	ug/L	99
35) 1,2-Dichloroethane	5.034	62	5412	0.9573	ug/L	96
36) Methylcyclohexane	5.422	83	7060	0.9839	ug/L	95
37) Trichloroethene	5.445	130	5322	0.9759	ug/L	97
38) Dibromomethane	5.862	93	2591	0.9318	ug/L	98
39) 1,2-Dichloropropane	5.963	63	4551	0.9559	ug/L	93
40) Bromodichloromethane	6.050	83	5958	0.9376	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	1303	0.6034	ug/L	88
43) cis-1,3-Dichloropropene	6.650	75	6508	0.9088	ug/L	98
44) 4-Methyl-2-Pentanone	7.232	58	1028	0.8690	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	5180	0.8509	ug/L	98
48) Toluene	6.858	91	19458	0.9645	ug/L	98
49) Tetrachloroethene	7.185	166	5539	0.9627	ug/L	97
50) 1,1,2-Trichloroethane	7.373	97	3713	0.9496	ug/L	99
51) Dibromochloromethane	7.507	129	4726	0.8855	ug/L	97
52) 1,3-Dichloropropane	7.588	76	5873	0.9451	ug/L	96

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

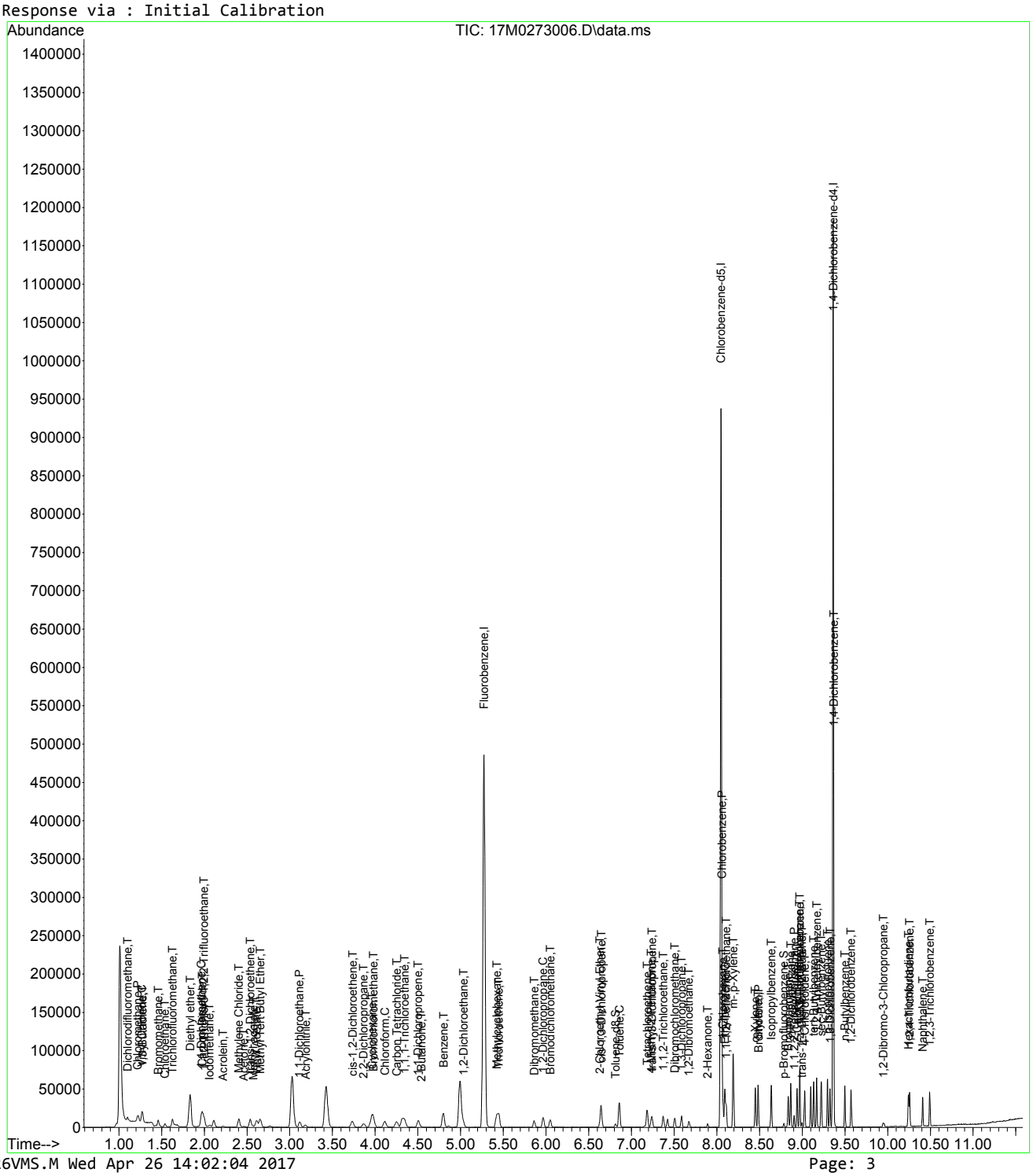
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
53) 1,2-Dibromoethane	7.672	107	3784	0.9445 ug/L	97
54) 2-Hexanone	7.892	43	1881	0.9161 ug/L	97
55) Chlorobenzene	8.060	112	13080	0.9663 ug/L	72
56) 1-Chlorohexane	8.068	69	1019	0.9324 ug/L	78
57) Ethylbenzene	8.094	106	6455	0.9161 ug/L	89
58) 1,1,1,2-Tetrachloroethane	8.109	131	4898	0.9296 ug/L	95
59) m-,p-Xylene	8.193	106	15829	1.8615 ug/L	97
60) o-Xylene	8.450	106	7831	0.9347 ug/L	97
61) Styrene	8.482	104	11851	0.8840 ug/L	99
62) Bromoform	8.488	173	3119	0.8308 ug/L	98
63) Isopropylbenzene	8.636	105	20533	0.9468 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	17243	0.9517 ug/L	98
67) Bromobenzene	8.836	156	6018	0.9413 ug/L	99
68) n-Propylbenzene	8.864	91	22729	0.9470 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	4042	0.9246 ug/L	95
70) 2-Chlorotoluene	8.940	91	14288	0.9645 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	1215	0.9401 ug/L	94
72) trans-1,4-Dichloro-2-B...	8.995	53	570	0.5916 ug/L #	89
73) 1,2,4-Trimethylbenzene	9.168	105	17160	0.9393 ug/L	98
74) 4-Chlorotoluene	9.027	91	14292	0.9664 ug/L	98
75) tert-Butylbenzene	9.134	134	3479	0.9608 ug/L	99
76) sec-Butylbenzene	9.221	105	21376	0.9577 ug/L	99
77) p-Isopropyltoluene	9.296	119	17861	0.9387 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	10532	0.9450 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	10637	0.9454 ug/L	94
80) n-Butylbenzene	9.499	91	14714	0.9162 ug/L	100
81) 1,2-Dichlorobenzene	9.571	146	10274	0.9459 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.947	75	692	0.8628 ug/L	85
83) Hexachlorobutadiene	10.243	225	4412	0.9635 ug/L	97
84) 1,2,4-Trichlorobenzene	10.257	180	7410	0.9183 ug/L	99
85) Naphthalene	10.408	128	14173	0.9007 ug/L	99
86) 1,2,3-Trichlorobenzene	10.492	180	7259	0.9262 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:04 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	1.000	0.876	12.4	100	0.000
3	P	Chloromethane	1.000	0.993	0.7	100	0.000
4	C	Vinyl Chloride	1.000	0.952	4.8#	100	0.000
5	T	1,3-Butadiene	1.000	0.954	4.6	100	0.000
6	T	Bromomethane	1.000	1.093	-9.3	100	0.000
7	T	Chloroethane	1.000	1.102	-10.2	100	0.011
8	T	Trichlorofluoromethane	1.000	1.027	-2.7	100	0.011
9	T	Diethyl ether	5.000	4.924	1.5	100	0.000
10	C	1,1-Dichloroethene	1.000	0.999	0.1#	100	0.000
11	T	Carbon Disulfide	1.000	0.988	1.2	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.000	0.984	1.6	100	0.000
13	T	Iodomethane	-1.000	2.312	0.0	0	0.000
14	T	Acrolein	2.500	2.448	2.1	100	0.000
15	T	Methylene Chloride	1.000	1.026	-2.6	100	0.000
16	T	Acetone	-1.000	1.580	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	1.000	0.962	3.8	100	0.000
18	T	Methyl acetate	1.000	0.937	6.3	100	0.000
19	T	Methyl Tert Butyl Ether	1.000	0.969	3.1	100	0.000
20	P	1,1-Dichloroethane	1.000	0.965	3.5	100	0.000
21	T	Acrylonitrile	2.500	2.321	7.2	100	0.000
22	T	Vinyl Acetate	-1.000	0.816	0.0	0	0.000
23	T	cis-1,2-Dichloroethene	1.000	0.948	5.2	100	0.000
24	T	2,2-Dichloropropane	1.000	0.984	1.6	100	0.000
25	T	Cyclohexane	1.000	0.964	3.6	100	0.000
26	T	Bromochloromethane	1.000	0.870	13.0	100	0.000
27	C	Chloroform	1.000	1.000	0.0	100	0.000
28	T	Carbon Tetrachloride	1.000	0.930	7.0	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	1.000	0.975	2.5	100	0.000
31	T	1,1-Dichloropropene	1.000	0.963	3.7	100	0.000
32	T	2-Butanone	-1.000	0.956	0.0	0	0.015
33	T	Benzene	1.000	0.981	1.9	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.035	0.0	0	0.000
35	T	1,2-Dichloroethane	1.000	0.957	4.3	100	0.000
36	T	Methylcyclohexane	1.000	0.984	1.6	100	0.000
37	T	Trichloroethene	1.000	0.976	2.4	100	0.000
38	T	Dibromomethane	1.000	0.932	6.8	100	0.000
39	C	1,2-Dichloropropane	1.000	0.956	4.4#	100	0.000
40	T	Bromodichloromethane	1.000	0.938	6.2	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.603	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	1.000	0.909	9.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.869	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	1.000	0.851	14.9	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.165	0.0	0	0.000
48	C	Toluene	1.000	0.965	3.5#	100	0.000
49	T	Tetrachloroethene	1.000	0.963	3.7	100	0.000
50	T	1,1,2-Trichloroethane	1.000	0.950	5.0	100	0.000
51	T	Dibromochloromethane	1.000	0.885	11.5	100	0.000
52	T	1,3-Dichloropropane	1.000	0.945	5.5	100	0.000
53	T	1,2-Dibromoethane	1.000	0.945	5.5	100	0.000
54	T	2-Hexanone	-1.000	0.916	0.0	0	0.000
55	P	Chlorobenzene	1.000	0.966	3.4	100	0.000
56	T	1-Chlorohexane	1.000	0.932	6.8	100	0.000
57	C	Ethylbenzene	1.000	0.916	8.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	1.000	0.930	7.0	100	0.000
59	T	m-,p-Xylene	2.000	1.861	7.0	100	0.000
60	T	o-Xylene	1.000	0.935	6.5	100	0.000
61	T	Styrene	1.000	0.884	11.6	100	0.000
62	P	Bromoform	1.000	0.831	16.9	100	0.000
63	T	Isopropylbenzene	1.000	0.947	5.3	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	1.000	0.952	4.8	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.170	0.0	0	0.000
67	T	Bromobenzene	1.000	0.941	5.9	100	0.000
68	T	n-Propylbenzene	1.000	0.947	5.3	100	0.000
69	P	1,1,2,2-Tetrachloroethane	1.000	0.925	7.5	100	0.000
70	T	2-Chlorotoluene	1.000	0.965	3.5	100	0.000
71	T	1,2,3-Trichloropropane	1.000	0.940	6.0	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.592	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	1.000	0.939	6.1	100	0.000
74	T	4-Chlorotoluene	1.000	0.966	3.4	100	0.000
75	T	tert-Butylbenzene	1.000	0.961	3.9	100	0.000
76	T	sec-Butylbenzene	1.000	0.958	4.2	100	0.000
77	T	p-Isopropyltoluene	1.000	0.939	6.1	100	0.000
78	T	1,3-Dichlorobenzene	1.000	0.945	5.5	100	0.000
79	T	1,4-Dichlorobenzene	1.000	0.945	5.5	100	0.000
80	T	n-Butylbenzene	1.000	0.916	8.4	100	0.000
81	T	1,2-Dichlorobenzene	1.000	0.946	5.4	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	1.000	0.863	13.7	100	0.000
83	T	Hexachlorobutadiene	1.000	0.964	3.6	100	0.000
84	T	1,2,4-Trichlorobenzene	1.000	0.918	8.2	100	0.000
85	T	Naphthalene	1.000	0.901	9.9	100	0.000
86	T	1,2,3-Trichlorobenzene	1.000	0.926	7.4	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 5

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	419250	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	301521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148386	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.973	65	410	0.0966	ug/L	0.0203
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.386%#		
47) Toluene-d8	6.812	98	2299	0.1528	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.611%#		
66) p-Bromofluorobenzene	8.786	95	744	0.1497	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.599%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	8266	1.6601	ug/L	96
3) Chloromethane	1.224	50	9490	1.9475	ug/L	97
4) Vinyl Chloride	1.264	62	9802	1.8166	ug/L	100
5) 1,3-Butadiene	1.276	54	6439	1.9436	ug/L	97
6) Bromomethane	1.461	94	8818	2.1981	ug/L	97
7) Chloroethane	1.539	64	5382	2.1025	ug/L	99
8) Trichlorofluoromethane	1.626	101	13476	1.9470	ug/L	99
9) Diethyl ether	1.841	59	82987	24.8636	ug/L	99
10) 1,1-Dichloroethene	1.965	61	12193	1.8828	ug/L	100
11) Carbon Disulfide	1.979	76	25350	1.8238	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	7533	1.8245	ug/L	100
13) Iodomethane	2.066	142	4068	2.6265	ug/L	98
14) Acrolein	2.223	56	4766	11.5599	ug/L	98
15) Methylene Chloride	2.408	84	9550	1.9434	ug/L	98
16) Acetone	2.469	43	2137	2.5351	ug/L	88
17) trans-1,2-Dichloroethene	2.541	96	8550	1.9390	ug/L	99
18) Methyl acetate	2.576	43	3864	1.7485	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	21515	1.9226	ug/L #	100
20) 1,1-Dichloroethane	3.123	63	15207	1.9201	ug/L	98
21) Acrylonitrile	3.184	53	13059	12.1457	ug/L	100
22) Vinyl Acetate	2.619	86	1095	1.5429	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	9709	1.9452	ug/L	99
24) 2,2-Dichloropropane	3.870	77	9712	1.8129	ug/L	95
25) Cyclohexane	3.966	56	12484	1.8532	ug/L	98
26) Bromochloromethane	3.992	130	5989	1.8623	ug/L	99
27) Chloroform	4.113	83	16510	1.9994	ug/L	99
28) Carbon Tetrachloride	4.255	117	12159	1.8621	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	13879	1.9117	ug/L	99
31) 1,1-Dichloropropene	4.507	75	10473	1.8369	ug/L	98
32) 2-Butanone	4.536	43	2256	1.7951	ug/L #	64
33) Benzene	4.800	78	34359	1.9240	ug/L	100
35) 1,2-Dichloroethane	5.037	62	10797	1.9417	ug/L	99
36) Methylcyclohexane	5.425	83	12634	1.7900	ug/L	99
37) Trichloroethene	5.448	130	10311	1.9223	ug/L	99
38) Dibromomethane	5.859	93	5276	1.9290	ug/L	97
39) 1,2-Dichloropropane	5.966	63	9039	1.9301	ug/L	97
40) Bromodichloromethane	6.053	83	12025	1.9238	ug/L	96
41) 1,4-Dioxane	6.265	88	961	41.1985	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.627	63	2988	1.4066	ug/L	98
43) cis-1,3-Dichloropropene	6.647	75	13096	1.8592	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	2026	1.7412	ug/L	95
45) trans-1,3-Dichloropropene	7.243	75	10805	1.8044	ug/L	100
48) Toluene	6.858	91	37329	1.9747	ug/L	100
49) Tetrachloroethene	7.185	166	10472	1.9422	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	7445	2.0319	ug/L	99
51) Dibromochloromethane	7.510	129	9685	1.9365	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

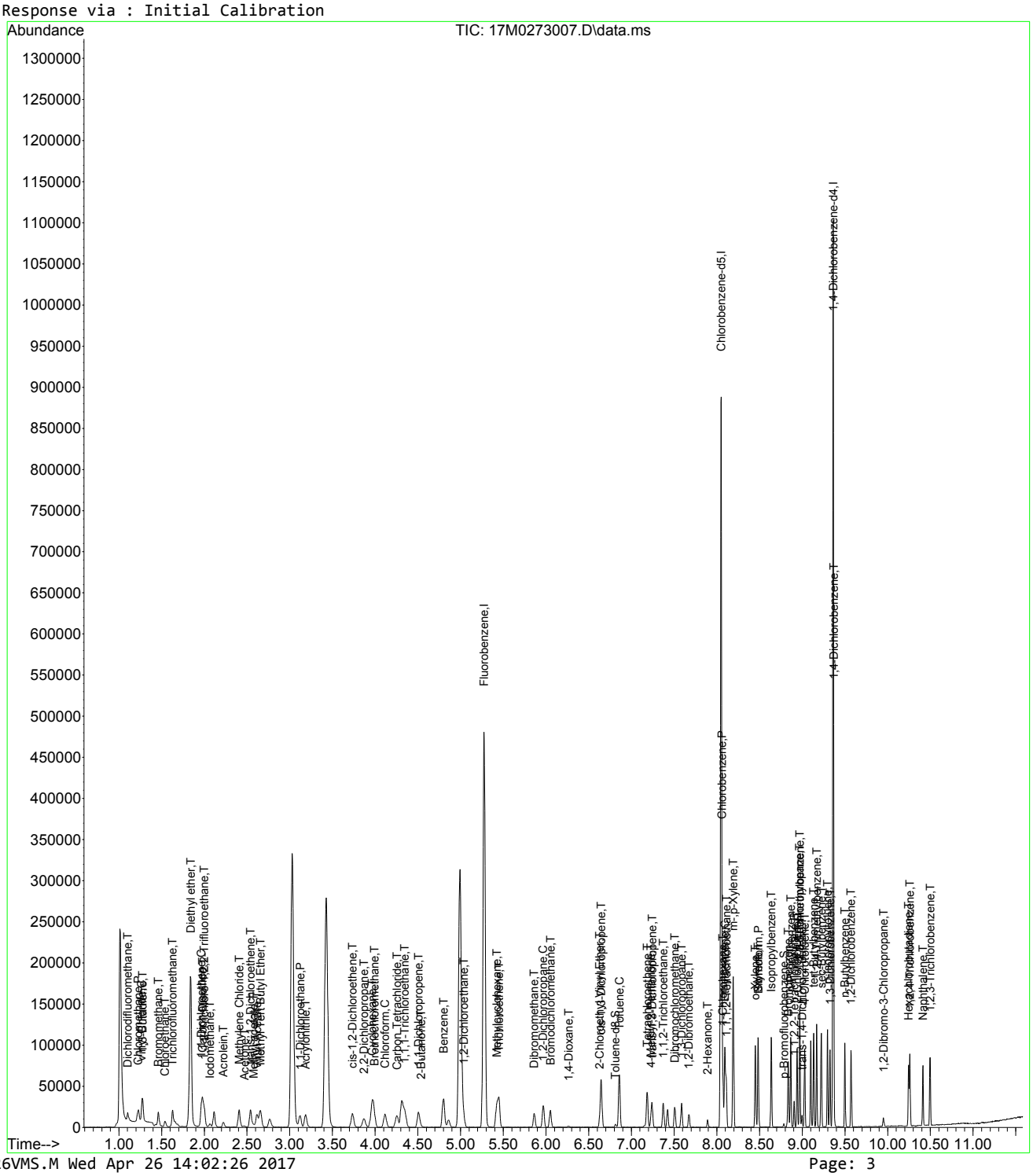
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	11727	2.0138	ug/L		98
53) 1,2-Dibromoethane	7.672	107	7414	1.9749	ug/L		100
54) 2-Hexanone	7.892	43	3567	1.8538	ug/L		100
55) Chlorobenzene	8.060	112	24892	1.9625	ug/L		85
56) 1-Chlorohexane	8.071	69	1995	1.9481	ug/L	#	85
57) Ethylbenzene	8.094	106	13014	1.9710	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	9923	2.0097	ug/L		100
59) m-,p-Xylene	8.193	106	30447	3.8209	ug/L		97
60) o-Xylene	8.451	106	15486	1.9724	ug/L		100
61) Styrene	8.482	104	23501	1.8707	ug/L		99
62) Bromoform	8.485	173	6423	1.8257	ug/L		100
63) Isopropylbenzene	8.636	105	38809	1.9097	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	32427	1.9603	ug/L		99
67) Bromobenzene	8.836	156	11776	2.0175	ug/L		100
68) n-Propylbenzene	8.865	91	42908	1.9582	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	7761	1.9444	ug/L		99
70) 2-Chlorotoluene	8.940	91	27206	2.0115	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	2495	2.1145	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	1392	1.5825	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.169	105	33214	1.9912	ug/L		100
74) 4-Chlorotoluene	9.027	91	26984	1.9984	ug/L		98
75) tert-Butylbenzene	9.134	134	6697	2.0257	ug/L		99
76) sec-Butylbenzene	9.224	105	40402	1.9825	ug/L		99
77) p-Isopropyltoluene	9.296	119	33833	1.9475	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	20210	1.9861	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	20145	1.9610	ug/L		98
80) n-Butylbenzene	9.499	91	26982	1.8402	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	19850	2.0016	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	1468	2.0048	ug/L		87
83) Hexachlorobutadiene	10.243	225	7947	1.9009	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	13652	1.8531	ug/L		97
85) Naphthalene	10.414	128	27628	1.9232	ug/L		99
86) 1,2,3-Trichlorobenzene	10.498	180	13906	1.9433	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:26 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	2.000	1.660	17.0	100	0.000
3	P	Chloromethane	2.000	1.948	2.6	100	0.012
4	C	Vinyl Chloride	2.000	1.817	9.2#	100	0.000
5	T	1,3-Butadiene	2.000	1.944	2.8	100	0.000
6	T	Bromomethane	2.000	2.198	-9.9	100	0.000
7	T	Chloroethane	2.000	2.103	-5.2	100	0.011
8	T	Trichlorofluoromethane	2.000	1.947	2.6	100	0.011
9	T	Diethyl ether	25.000	24.864	0.5	100	0.000
10	C	1,1-Dichloroethene	2.000	1.883	5.8#	100	0.000
11	T	Carbon Disulfide	2.000	1.824	8.8	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.000	1.825	8.8	100	0.000
13	T	Iodomethane	2.000	2.626	-31.3#	100	0.000
14	T	Acrolein	12.500	11.560	7.5	100	0.000
15	T	Methylene Chloride	2.000	1.943	2.8	100	0.000
16	T	Acetone	-1.000	2.535	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	2.000	1.939	3.0	100	0.000
18	T	Methyl acetate	2.000	1.748	12.6	100	0.000
19	T	Methyl Tert Butyl Ether	2.000	1.923	3.8	100	0.000
20	P	1,1-Dichloroethane	2.000	1.920	4.0	100	0.012
21	T	Acrylonitrile	12.500	12.146	2.8	100	0.000
22	T	Vinyl Acetate	-1.000	1.543	0.0	0	0.011
23	T	cis-1,2-Dichloroethene	2.000	1.945	2.7	100	0.000
24	T	2,2-Dichloropropane	2.000	1.813	9.4	100	0.012
25	T	Cyclohexane	2.000	1.853	7.4	100	0.000
26	T	Bromochloromethane	2.000	1.862	6.9	100	0.018
27	C	Chloroform	2.000	1.999	0.0#	100	0.000
28	T	Carbon Tetrachloride	2.000	1.862	6.9	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	2.000	1.912	4.4	100	0.000
31	T	1,1-Dichloropropene	2.000	1.837	8.2	100	0.000
32	T	2-Butanone	-1.000	1.795	0.0	0	0.012
33	T	Benzene	2.000	1.924	3.8	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.097	0.0	0	0.020
35	T	1,2-Dichloroethane	2.000	1.942	2.9	100	0.000
36	T	Methylcyclohexane	2.000	1.790	10.5	100	0.000
37	T	Trichloroethene	2.000	1.922	3.9	100	0.000
38	T	Dibromomethane	2.000	1.929	3.5	100	0.000
39	C	1,2-Dichloropropane	2.000	1.930	3.5#	100	0.000
40	T	Bromodichloromethane	2.000	1.924	3.8	100	0.000
41	T	1,4-Dioxane	50.000	41.198	17.6	100	0.000
42	T	2-Chloroethyl Vinyl Ether	-1.000	1.407	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	2.000	1.859	7.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	1.741	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	2.000	1.804	9.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.153	0.0	0	0.000
48	C	Toluene	2.000	1.975	1.2#	100	0.000
49	T	Tetrachloroethene	2.000	1.942	2.9	100	0.000
50	T	1,1,2-Trichloroethane	2.000	2.032	-1.6	100	0.000
51	T	Dibromochloromethane	2.000	1.936	3.2	100	0.000
52	T	1,3-Dichloropropane	2.000	2.014	-0.7	100	0.000
53	T	1,2-Dibromoethane	2.000	1.975	1.2	100	0.000
54	T	2-Hexanone	2.000	1.854	7.3	100	0.000
55	P	Chlorobenzene	2.000	1.962	1.9	100	0.000
56	T	1-Chlorohexane	2.000	1.948	2.6	100	0.000
57	C	Ethylbenzene	2.000	1.971	1.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	2.000	2.010	-0.5	100	0.000
59	T	m-,p-Xylene	4.000	3.821	4.5	100	0.000
60	T	o-Xylene	2.000	1.972	1.4	100	0.000
61	T	Styrene	2.000	1.871	6.5	100	0.000
62	P	Bromoform	2.000	1.826	8.7	100	0.000
63	T	Isopropylbenzene	2.000	1.910	4.5	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	2.000	1.960	2.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.150	0.0	0	0.000
67	T	Bromobenzene	2.000	2.018	-0.9	100	0.000
68	T	n-Propylbenzene	2.000	1.958	2.1	100	0.000
69	P	1,1,2,2-Tetrachloroethane	2.000	1.944	2.8	100	0.000
70	T	2-Chlorotoluene	2.000	2.012	-0.6	100	0.000
71	T	1,2,3-Trichloropropane	2.000	2.114	-5.7	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	2.000	1.583	20.9	100	0.000
73	T	1,2,4-Trimethylbenzene	2.000	1.991	0.4	100	0.000
74	T	4-Chlorotoluene	2.000	1.998	0.1	100	0.000
75	T	tert-Butylbenzene	2.000	2.026	-1.3	100	0.000
76	T	sec-Butylbenzene	2.000	1.983	0.8	100	0.000
77	T	p-Isopropyltoluene	2.000	1.948	2.6	100	0.000
78	T	1,3-Dichlorobenzene	2.000	1.986	0.7	100	0.000
79	T	1,4-Dichlorobenzene	2.000	1.961	1.9	100	0.000
80	T	n-Butylbenzene	2.000	1.840	8.0	100	0.000
81	T	1,2-Dichlorobenzene	2.000	2.002	-0.1	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	2.000	2.005	-0.2	100	0.000
83	T	Hexachlorobutadiene	2.000	1.901	4.9	100	0.000
84	T	1,2,4-Trichlorobenzene	2.000	1.853	7.4	100	0.000
85	T	Naphthalene	2.000	1.923	3.8	100	0.000
86	T	1,2,3-Trichlorobenzene	2.000	1.943	2.8	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	431262	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	319022	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	163434	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.351	111	23759	5.1012 ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.405%#		
34) 1,2-Dichloroethane-d4	4.964	65	23294	5.3358 ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.343%#		
47) Toluene-d8	6.815	98	82876	5.2054 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 20.822%#		
66) p-Bromofluorobenzene	8.783	95	24857	4.5424 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 18.170%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	1.108	85	23001	4.4908 ug/L	99
3) Chloromethane	1.224	50	24053	4.7986 ug/L	98
4) Vinyl Chloride	1.270	62	26844	4.8364 ug/L	100
5) 1,3-Butadiene	1.282	54	17084	5.0131 ug/L	98
6) Bromomethane	1.464	94	22223	5.3853 ug/L	99
7) Chloroethane	1.539	64	14714	5.5881 ug/L	93
8) Trichlorofluoromethane	1.632	101	37891	5.3221 ug/L	99
9) Diethyl ether	1.843	59	169782	49.4513 ug/L	100
10) 1,1-Dichloroethene	1.971	61	33029	4.9581 ug/L	100
11) Carbon Disulfide	1.982	76	71308	4.9874 ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	21872	5.1500 ug/L	100
13) Iodomethane	2.069	142	16154	4.4150 ug/L	99
14) Acrolein	2.225	56	10883	25.6613 ug/L	100
15) Methylene Chloride	2.411	84	25075	4.9606 ug/L	100
16) Acetone	2.469	43	5224	6.0246 ug/L	95
17) trans-1,2-Dichloroethene	2.544	96	22591	4.9805 ug/L	99
18) Methyl acetate	2.576	43	11275	4.9598 ug/L #	97
19) Methyl Tert Butyl Ether	2.660	73	58542	5.0855 ug/L #	100
20) 1,1-Dichloroethane	3.120	63	41374	5.0784 ug/L	99
21) Acrylonitrile	3.190	53	27474	24.8409 ug/L	97
22) Vinyl Acetate	2.616	86	3460	4.7395 ug/L #	45
23) cis-1,2-Dichloroethene	3.740	96	26009	5.0656 ug/L	98
24) 2,2-Dichloropropane	3.870	77	28316	4.6367 ug/L	100
25) Cyclohexane	3.971	56	35009	5.0522 ug/L	99
26) Bromochloromethane	3.986	130	16786	5.0742 ug/L	98
27) Chloroform	4.116	83	43019	5.0646 ug/L	99
28) Carbon Tetrachloride	4.255	117	34147	5.0837 ug/L	98
30) 1,1,1-Trichloroethane	4.351	97	37529	5.0254 ug/L	99
31) 1,1-Dichloropropene	4.510	75	28981	4.9414 ug/L	98
32) 2-Butanone	4.539	43	6581	5.0907 ug/L #	96
33) Benzene	4.799	78	91557	4.9841 ug/L	100
35) 1,2-Dichloroethane	5.037	62	29435	5.1460 ug/L	99
36) Methylcyclohexane	5.428	83	36223	4.9893 ug/L	99
37) Trichloroethene	5.451	130	27251	4.9389 ug/L	99
38) Dibromomethane	5.862	93	14614	5.1942 ug/L	98
39) 1,2-Dichloropropane	5.969	63	24584	5.1032 ug/L	99
40) Bromodichloromethane	6.053	83	32146	4.9995 ug/L	100
41) 1,4-Dioxane	6.262	88	2257	94.0635 ug/L	90
42) 2-Chloroethyl Vinyl Ether	6.629	63	9083	4.1568 ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	36540	5.0431 ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	5813	4.8566 ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	31049	5.0407 ug/L	100
48) Toluene	6.858	91	101530	5.0762 ug/L	99
49) Tetrachloroethene	7.185	166	29104	5.1017 ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	20117	5.1891 ug/L	99
51) Dibromochloromethane	7.509	129	26886	5.0809 ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

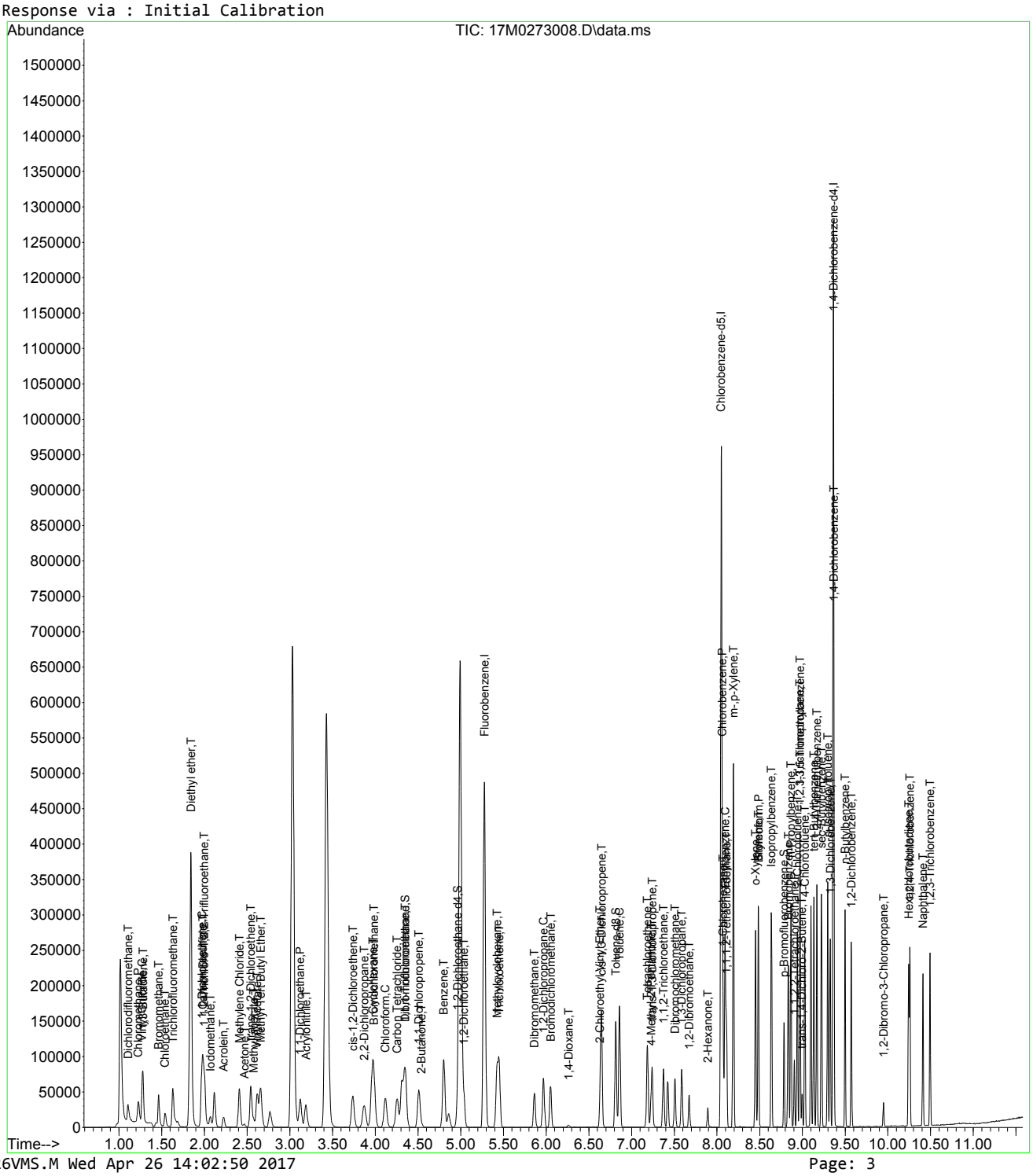
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	31843	5.1682	ug/L		98
53) 1,2-Dibromoethane	7.674	107	20257	5.1000	ug/L		99
54) 2-Hexanone	7.892	43	10630	5.2214	ug/L		100
55) Chlorobenzene	8.060	112	67203	5.0076	ug/L		93
56) 1-Chlorohexane	8.071	69	5432	5.0134	ug/L		83
57) Ethylbenzene	8.094	106	35155	5.0323	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	26571	5.0862	ug/L		99
59) m-,p-Xylene	8.193	106	85229	10.1090	ug/L		97
60) o-Xylene	8.450	106	41928	5.0473	ug/L		97
61) Styrene	8.482	104	66320	4.9896	ug/L		100
62) Bromoform	8.485	173	18946	5.0897	ug/L		99
63) Isopropylbenzene	8.636	105	109791	5.1061	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	93688	5.1422	ug/L		99
67) Bromobenzene	8.835	156	32100	4.9931	ug/L		99
68) n-Propylbenzene	8.864	91	123890	5.1333	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	23301	5.3002	ug/L		100
70) 2-Chlorotoluene	8.940	91	75963	5.0993	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	6702	5.1569	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	4475	4.6190	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.168	105	94879	5.1644	ug/L		99
74) 4-Chlorotoluene	9.029	91	75469	5.0745	ug/L		99
75) tert-Butylbenzene	9.134	134	18683	5.1309	ug/L		99
76) sec-Butylbenzene	9.223	105	116472	5.1891	ug/L		99
77) p-Isopropyltoluene	9.296	119	98419	5.1437	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	56651	5.0548	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	56423	4.9866	ug/L		99
80) n-Butylbenzene	9.499	91	82542	5.1112	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	55072	5.0420	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	4044	5.0142	ug/L		98
83) Hexachlorobutadiene	10.243	225	23413	5.0847	ug/L		99
84) 1,2,4-Trichlorobenzene	10.257	180	40601	5.0037	ug/L		100
85) Naphthalene	10.411	128	82078	5.1873	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	39894	5.0617	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:50 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	5.000	4.491	10.2	100	0.012
3	P	Chloromethane	5.000	4.799	4.0	100	0.012
4	C	Vinyl Chloride	5.000	4.836	3.3#	100	0.000
5	T	1,3-Butadiene	5.000	5.013	-0.3	100	0.012
6	T	Bromomethane	5.000	5.385	-7.7	100	0.000
7	T	Chloroethane	5.000	5.588	-11.8	100	0.011
8	T	Trichlorofluoromethane	5.000	5.322	-6.4	100	0.017
9	T	Diethyl ether	50.000	49.451	1.1	100	0.000
10	C	1,1-Dichloroethene	5.000	4.958	0.8#	100	0.015
11	T	Carbon Disulfide	5.000	4.987	0.3	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.000	5.150	-3.0	100	0.012
13	T	Iodomethane	5.000	4.415	11.7	100	0.011
14	T	Acrolein	25.000	25.661	-2.6	100	0.000
15	T	Methylene Chloride	5.000	4.961	0.8	100	0.012
16	T	Acetone	5.000	6.025	-20.5	100	0.000
17	T	trans-1,2-Dichloroethene	5.000	4.980	0.4	100	0.012
18	T	Methyl acetate	5.000	4.960	0.8	100	0.000
19	T	Methyl Tert Butyl Ether	5.000	5.086	-1.7	100	0.012
20	P	1,1-Dichloroethane	5.000	5.078	-1.6	100	0.000
21	T	Acrylonitrile	25.000	24.841	0.6	100	0.000
22	T	Vinyl Acetate	5.000	4.740	5.2	100	0.000
23	T	cis-1,2-Dichloroethene	5.000	5.066	-1.3	100	0.012
24	T	2,2-Dichloropropane	5.000	4.637	7.3	100	0.012
25	T	Cyclohexane	5.000	5.052	-1.0	100	0.000
26	T	Bromochloromethane	5.000	5.074	-1.5	100	0.012
27	C	Chloroform	5.000	5.065	-1.3#	100	0.000
28	T	Carbon Tetrachloride	5.000	5.084	-1.7	100	0.000
29	S	Dibromofluoromethane	5.000	5.101	-2.0	100	0.012
30	T	1,1,1-Trichloroethane	5.000	5.025	-0.5	100	0.000
31	T	1,1-Dichloropropene	5.000	4.941	1.2	100	0.000
32	T	2-Butanone	5.000	5.091	-1.8	100	0.015
33	T	Benzene	5.000	4.984	0.3	100	0.000
34	S	1,2-Dichloroethane-d4	5.000	5.336	-6.7	100	0.011
35	T	1,2-Dichloroethane	5.000	5.146	-2.9	100	0.000
36	T	Methylcyclohexane	5.000	4.989	0.2	100	0.000
37	T	Trichloroethene	5.000	4.939	1.2	100	0.000
38	T	Dibromomethane	5.000	5.194	-3.9	100	0.000
39	C	1,2-Dichloropropane	5.000	5.103	-2.1#	100	0.000
40	T	Bromodichloromethane	5.000	5.000	0.0	100	0.000
41	T	1,4-Dioxane	100.000	94.064	5.9	100	0.000
42	T	2-Chloroethyl Vinyl Ether	5.000	4.157	16.9	100	0.000
43	T	cis-1,3-Dichloropropene	5.000	5.043	-0.9	100	0.000
44	T	4-Methyl-2-Pentanone	5.000	4.857	2.9	100	0.000
45	T	trans-1,3-Dichloropropene	5.000	5.041	-0.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	5.000	5.205	-4.1	100	0.000
48	C	Toluene	5.000	5.076	-1.5#	100	0.000
49	T	Tetrachloroethene	5.000	5.102	-2.0	100	0.000
50	T	1,1,2-Trichloroethane	5.000	5.189	-3.8	100	0.000
51	T	Dibromochloromethane	5.000	5.081	-1.6	100	0.000
52	T	1,3-Dichloropropane	5.000	5.168	-3.4	100	0.000
53	T	1,2-Dibromoethane	5.000	5.100	-2.0	100	0.000
54	T	2-Hexanone	5.000	5.221	-4.4	100	0.000
55	P	Chlorobenzene	5.000	5.008	-0.2	100	0.000
56	T	1-Chlorohexane	5.000	5.013	-0.3	100	0.000
57	C	Ethylbenzene	5.000	5.032	-0.6#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	5.000	5.086	-1.7	100	0.000
59	T	m-,p-Xylene	10.000	10.109	-1.1	100	0.000
60	T	o-Xylene	5.000	5.047	-0.9	100	0.000
61	T	Styrene	5.000	4.990	0.2	100	0.000
62	P	Bromoform	5.000	5.090	-1.8	100	0.000
63	T	Isopropylbenzene	5.000	5.106	-2.1	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	5.000	5.142	-2.8	100	0.000
66	S	p-Bromofluorobenzene	5.000	4.542	9.2	100	0.000
67	T	Bromobenzene	5.000	4.993	0.1	100	0.000
68	T	n-Propylbenzene	5.000	5.133	-2.7	100	0.000
69	P	1,1,2,2-Tetrachloroethane	5.000	5.300	-6.0	100	0.000
70	T	2-Chlorotoluene	5.000	5.099	-2.0	100	0.000
71	T	1,2,3-Trichloropropane	5.000	5.157	-3.1	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	5.000	4.619	7.6	100	0.000
73	T	1,2,4-Trimethylbenzene	5.000	5.164	-3.3	100	0.000
74	T	4-Chlorotoluene	5.000	5.075	-1.5	100	0.000
75	T	tert-Butylbenzene	5.000	5.131	-2.6	100	0.000
76	T	sec-Butylbenzene	5.000	5.189	-3.8	100	0.000
77	T	p-Isopropyltoluene	5.000	5.144	-2.9	100	0.000
78	T	1,3-Dichlorobenzene	5.000	5.055	-1.1	100	0.000
79	T	1,4-Dichlorobenzene	5.000	4.987	0.3	100	0.000
80	T	n-Butylbenzene	5.000	5.111	-2.2	100	0.000
81	T	1,2-Dichlorobenzene	5.000	5.042	-0.8	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	5.000	5.014	-0.3	100	0.000
83	T	Hexachlorobutadiene	5.000	5.085	-1.7	100	0.000
84	T	1,2,4-Trichlorobenzene	5.000	5.004	-0.1	100	0.000
85	T	Naphthalene	5.000	5.187	-3.7	100	0.000
86	T	1,2,3-Trichlorobenzene	5.000	5.062	-1.2	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	415989	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	308316	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	155966	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	41370	9.2085	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.834%#			
34) 1,2-Dichloroethane-d4	4.956	65	39416	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.441%#			
47) Toluene-d8	6.815	98	144252	9.3749	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 37.500%#			
66) p-Bromofluorobenzene	8.784	95	48881	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 37.441%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	107073	21.6728	ug/L	100
3) Chloromethane	1.218	50	97047	20.0719	ug/L	100
4) Vinyl Chloride	1.264	62	110236	20.5901	ug/L	99
5) 1,3-Butadiene	1.276	54	65854	20.0334	ug/L	99
6) Bromomethane	1.458	94	79989	20.0955	ug/L	100
7) Chloroethane	1.534	64	58403	22.9945	ug/L	100
8) Trichlorofluoromethane	1.626	101	147654	21.5007	ug/L	99
9) Diethyl ether	1.838	59	271363	81.9400	ug/L	100
10) 1,1-Dichloroethene	1.962	61	129870	20.2111	ug/L	100
11) Carbon Disulfide	1.977	76	273076	19.8007	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	82665	20.1789	ug/L	100
13) Iodomethane	2.063	142	90634	16.0415	ug/L	99
14) Acrolein	2.220	56	16470	40.2609	ug/L	100
15) Methylene Chloride	2.405	84	94958	19.4753	ug/L	99
16) Acetone	2.463	43	17323	20.7112	ug/L	97
17) trans-1,2-Dichloroethene	2.538	96	87762	20.0586	ug/L	99
18) Methyl acetate	2.573	43	47763	21.7821	ug/L #	98
19) Methyl Tert Butyl Ether	2.654	73	223741	20.1499	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	159579	20.3066	ug/L	99
21) Acrylonitrile	3.181	53	43518	40.7919	ug/L	100
22) Vinyl Acetate	2.616	86	13399	19.0279	ug/L	87
23) cis-1,2-Dichloroethene	3.731	96	98926	19.9747	ug/L	100
24) 2,2-Dichloropropane	3.867	77	117122	18.9833	ug/L	98
25) Cyclohexane	3.966	56	132299	19.7932	ug/L	99
26) Bromochloromethane	3.983	130	65363	20.4839	ug/L	100
27) Chloroform	4.116	83	162820	19.8724	ug/L	100
28) Carbon Tetrachloride	4.255	117	133209	20.5600	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	146436	20.3288	ug/L	100
31) 1,1-Dichloropropene	4.504	75	113299	20.0273	ug/L	99
32) 2-Butanone	4.530	43	23212	18.6149	ug/L	97
33) Benzene	4.800	78	350607	19.7868	ug/L	100
35) 1,2-Dichloroethane	5.031	62	110449	20.0184	ug/L	100
36) Methylcyclohexane	5.422	83	133533	19.0679	ug/L	100
37) Trichloroethene	5.448	130	105023	19.7330	ug/L	100
38) Dibromomethane	5.859	93	54492	20.0791	ug/L	100
39) 1,2-Dichloropropane	5.966	63	93539	20.1299	ug/L	100
40) Bromodichloromethane	6.050	83	125080	20.1673	ug/L	99
41) 1,4-Dioxane	6.259	88	3291	142.1926	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.629	63	38855	18.4348	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	142778	20.4290	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	21644	18.7468	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	121640	20.4727	ug/L	100
48) Toluene	6.858	91	390265	20.1896	ug/L	100
49) Tetrachloroethene	7.185	166	108682	19.7126	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	75279	20.0923	ug/L	100
51) Dibromochloromethane	7.507	129	104430	20.4202	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

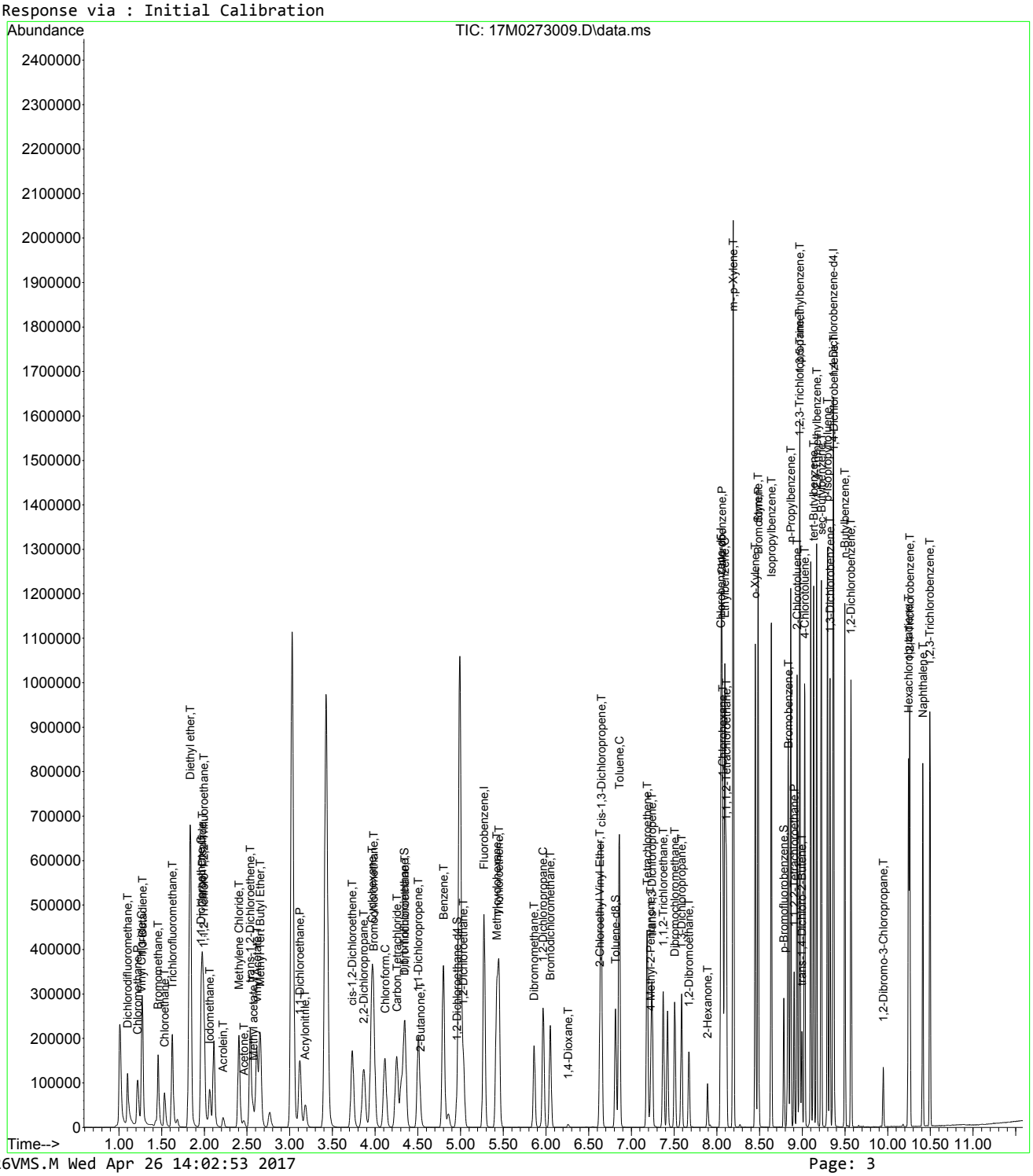
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	121547	20.4125	ug/L		100
53) 1,2-Dibromoethane	7.675	107	76988	20.0559	ug/L		99
54) 2-Hexanone	7.892	43	38232	19.4315	ug/L		100
55) Chlorobenzene	8.060	112	258733	19.9487	ug/L		98
56) 1-Chlorohexane	8.071	69	20340	19.4243	ug/L		84
57) Ethylbenzene	8.095	106	135392	20.0539	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.112	131	101795	20.1621	ug/L		100
59) m-,p-Xylene	8.193	106	327137	40.1491	ug/L		97
60) o-Xylene	8.451	106	160719	20.0193	ug/L		98
61) Styrene	8.482	104	262832	20.4609	ug/L		100
62) Bromoform	8.485	173	73848	20.5278	ug/L		100
63) Isopropylbenzene	8.639	105	420954	20.2572	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	353581	20.3360	ug/L		100
67) Bromobenzene	8.839	156	122250	19.9264	ug/L		99
68) n-Propylbenzene	8.865	91	469314	20.3768	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	85621	20.4085	ug/L		100
70) 2-Chlorotoluene	8.940	91	286030	20.1202	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24779	19.9792	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	20177	21.8236	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	356727	20.3467	ug/L		100
74) 4-Chlorotoluene	9.027	91	285276	20.1003	ug/L		99
75) tert-Butylbenzene	9.134	134	69653	20.0447	ug/L		100
76) sec-Butylbenzene	9.224	105	435489	20.3309	ug/L		100
77) p-Isopropyltoluene	9.296	119	374739	20.5229	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	213997	20.0086	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	209144	19.3691	ug/L		100
80) n-Butylbenzene	9.499	91	311602	20.2190	ug/L		99
81) 1,2-Dichlorobenzene	9.571	146	208933	20.0442	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	15581	20.2441	ug/L		97
83) Hexachlorobutadiene	10.243	225	85120	19.3709	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	156012	20.1477	ug/L		100
85) Naphthalene	10.411	128	308618	20.4385	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	149504	19.8771	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:53 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417906	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	317098	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167026	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115980	25.6974	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.790%			
34) 1,2-Dichloroethane-d4	4.953	65	108720	25.6997	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.799%			
47) Toluene-d8	6.812	98	406817	25.7068	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.827%			
66) p-Bromofluorobenzene	8.783	95	141725	25.3421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.368%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	273383	55.0820	ug/L	100
3) Chloromethane	1.212	50	241081	49.6332	ug/L	100
4) Vinyl Chloride	1.261	62	274798	51.0919	ug/L	100
5) 1,3-Butadiene	1.270	54	170920	51.7569	ug/L	100
6) Bromomethane	1.455	94	185476	46.3830	ug/L	100
7) Chloroethane	1.528	64	113694	44.5585	ug/L	100
8) Trichlorofluoromethane	1.615	101	370004	53.6311	ug/L	100
9) Diethyl ether	1.835	59	343062	103.1148	ug/L	100
10) 1,1-Dichloroethene	1.956	61	324434	50.2586	ug/L	100
11) Carbon Disulfide	1.971	76	711965	51.3878	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	212072	51.5304	ug/L	100
13) Iodomethane	2.058	142	303865	48.8576	ug/L	100
14) Acrolein	2.217	56	22080	53.7270	ug/L	100
15) Methylene Chloride	2.399	84	234342	47.8417	ug/L	100
16) Acetone	2.460	43	40588	48.3039	ug/L	99
17) trans-1,2-Dichloroethene	2.532	96	221078	50.2970	ug/L	100
18) Methyl acetate	2.567	43	128727	58.4362	ug/L #	98
19) Methyl Tert Butyl Ether	2.648	73	575057	51.5516	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	399083	50.5507	ug/L	100
21) Acrylonitrile	3.181	53	55941	52.1961	ug/L	100
22) Vinyl Acetate	2.608	86	37712	53.3092	ug/L	91
23) cis-1,2-Dichloroethene	3.728	96	250294	50.3065	ug/L	100
24) 2,2-Dichloropropane	3.858	77	316045	50.5289	ug/L	100
25) Cyclohexane	3.963	56	351763	52.3857	ug/L	100
26) Bromochloromethane	3.974	130	167162	52.1461	ug/L	100
27) Chloroform	4.110	83	408367	49.6131	ug/L	100
28) Carbon Tetrachloride	4.246	117	339910	52.2223	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	366464	50.6404	ug/L	100
31) 1,1-Dichloropropene	4.501	75	294187	51.7635	ug/L	100
32) 2-Butanone	4.524	43	63238	50.4812	ug/L	100
33) Benzene	4.797	78	884324	49.6787	ug/L	100
35) 1,2-Dichloroethane	5.031	62	277929	50.1424	ug/L	100
36) Methylcyclohexane	5.422	83	366430	52.0844	ug/L	100
37) Trichloroethene	5.445	130	266043	49.7582	ug/L	100
38) Dibromomethane	5.859	93	140437	51.5105	ug/L	100
39) 1,2-Dichloropropane	5.966	63	238320	51.0521	ug/L	100
40) Bromodichloromethane	6.047	83	318787	51.1640	ug/L	100
41) 1,4-Dioxane	6.256	88	4661	200.4617	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	106937	50.5036	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	371992	52.9813	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	58337	50.2965	ug/L	100
45) trans-1,3-Dichloropropene	7.240	75	316603	53.0417	ug/L	100
48) Toluene	6.858	91	1001874	50.3945	ug/L	100
49) Tetrachloroethene	7.182	166	285329	50.3192	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	194901	50.5792	ug/L	100
51) Dibromochloromethane	7.507	129	274126	52.1181	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

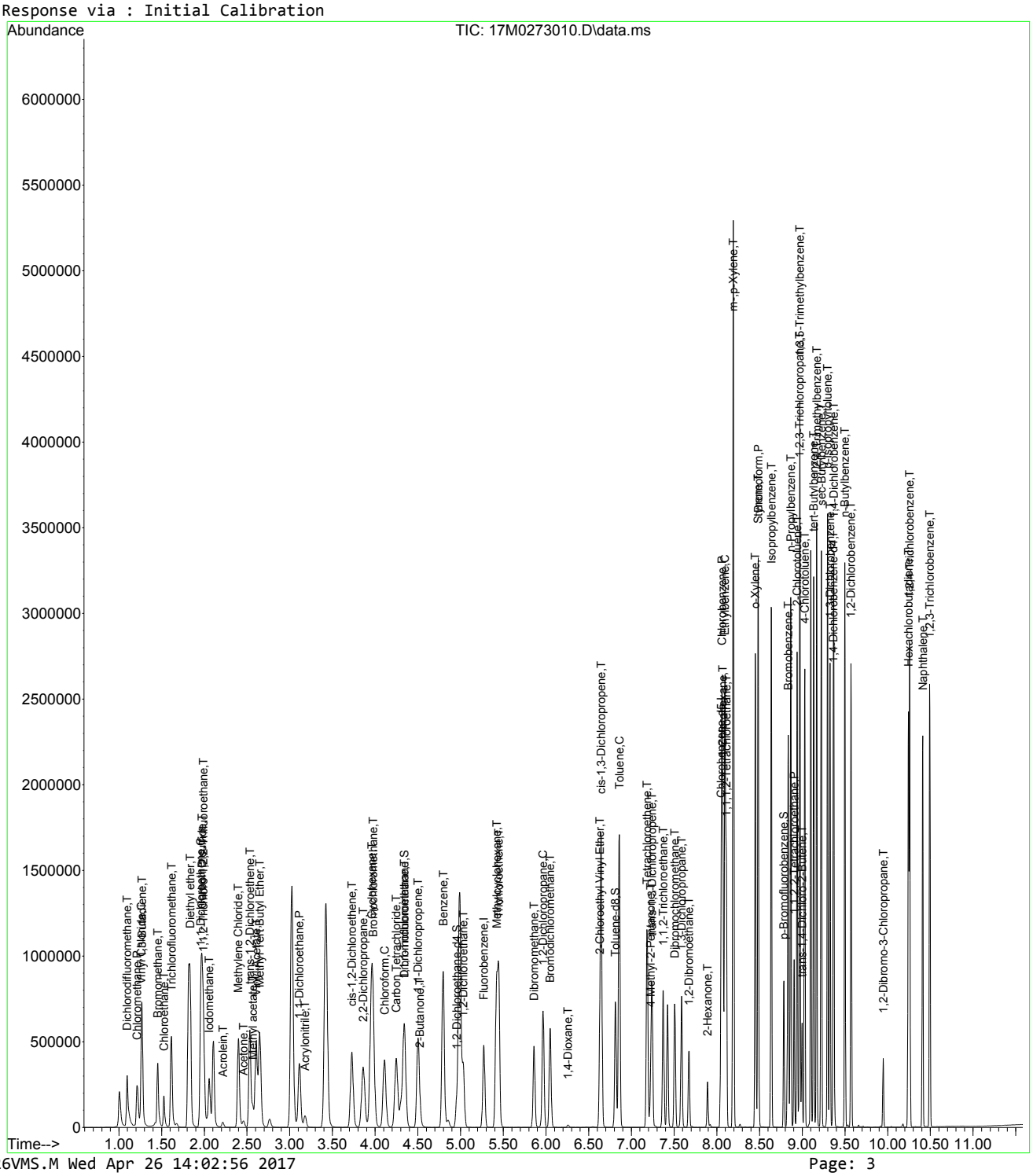
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	310634	50.7227	ug/L		100
53) 1,2-Dibromoethane	7.675	107	202402	51.2669	ug/L		100
54) 2-Hexanone	7.892	43	102578	50.6916	ug/L		100
55) Chlorobenzene	8.060	112	671778	50.3605	ug/L		100
56) 1-Chlorohexane	8.071	69	56830	52.7686	ug/L		100
57) Ethylbenzene	8.094	106	354570	51.0636	ug/L		100
58) 1,1,1,2-Tetrachloroethane	8.112	131	263117	50.6712	ug/L		100
59) m-,p-Xylene	8.193	106	866538	103.4037	ug/L		100
60) o-Xylene	8.450	106	423285	51.2646	ug/L		100
61) Styrene	8.482	104	700211	53.0002	ug/L		100
62) Bromoform	8.485	173	202713	54.7882	ug/L		100
63) Isopropylbenzene	8.639	105	1095961	51.2793	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	941312	50.5541	ug/L		100
67) Bromobenzene	8.836	156	322344	49.0619	ug/L		100
68) n-Propylbenzene	8.864	91	1246315	50.5297	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	238334	53.0473	ug/L		100
70) 2-Chlorotoluene	8.940	91	752979	49.4596	ug/L		100
71) 1,2,3-Trichloropropane	8.969	110	66677	50.2014	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	54428	54.9716	ug/L	#	100
73) 1,2,4-Trimethylbenzene	9.169	105	950457	50.6217	ug/L		100
74) 4-Chlorotoluene	9.030	91	761067	50.0733	ug/L		100
75) tert-Butylbenzene	9.134	134	183420	49.2893	ug/L		100
76) sec-Butylbenzene	9.224	105	1166744	50.8629	ug/L		100
77) p-Isopropyltoluene	9.296	119	1013386	51.8240	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	575762	50.2687	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	570068	49.2988	ug/L		100
80) n-Butylbenzene	9.499	91	877964	53.1964	ug/L		100
81) 1,2-Dichlorobenzene	9.571	146	560761	50.2349	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	44335	53.7892	ug/L		100
83) Hexachlorobutadiene	10.243	225	244851	52.0316	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	445052	53.6691	ug/L		100
85) Naphthalene	10.411	128	870655	53.8418	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	422273	52.4250	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:56 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	416412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	322460	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.366	152	174149	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	231222	51.4151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 205.660%#			
34) 1,2-Dichloroethane-d4	4.959	65	212387	50.3851	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 201.540%#			
47) Toluene-d8	6.815	98	820550	50.9885	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 203.954%#			
66) p-Bromofluorobenzene	8.786	95	299359	51.3394	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 205.358%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	539830	109.1568	ug/L	100
3) Chloromethane	1.215	50	509696	105.3116	ug/L	100
4) Vinyl Chloride	1.261	62	558799	104.2675	ug/L	100
5) 1,3-Butadiene	1.273	54	332020	100.9009	ug/L	99
6) Bromomethane	1.455	94	363546	91.2402	ug/L	99
7) Chloroethane	1.528	64	219087	86.1717	ug/L	99
8) Trichlorofluoromethane	1.606	101	628305	91.3979	ug/L	99
9) Diethyl ether	1.841	59	666542	201.0626	ug/L	100
10) 1,1-Dichloroethene	1.953	61	657831	102.2712	ug/L	100
11) Carbon Disulfide	1.968	76	1388153	100.5527	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	410087	100.0026	ug/L	100
13) Iodomethane	2.058	142	632275	99.8486	ug/L	100
14) Acrolein	2.220	56	41772	102.0079	ug/L	99
15) Methylene Chloride	2.399	84	477038	97.7384	ug/L	100
16) Acetone	2.466	43	81015	96.7621	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	452419	103.2982	ug/L	99
18) Methyl acetate	2.573	43	246307	112.2133	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	1158243	104.2044	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	814580	103.5507	ug/L	100
21) Acrylonitrile	3.184	53	109445	102.4848	ug/L	99
22) Vinyl Acetate	2.605	86	68474	97.1413	ug/L	81
23) cis-1,2-Dichloroethene	3.731	96	513237	103.5255	ug/L	99
24) 2,2-Dichloropropane	3.861	77	635375	101.6691	ug/L	100
25) Cyclohexane	3.963	56	686248	102.5650	ug/L	99
26) Bromochloromethane	3.980	130	340996	106.7552	ug/L	100
27) Chloroform	4.110	83	831165	101.3417	ug/L	100
28) Carbon Tetrachloride	4.249	117	691112	106.5604	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	746228	103.4887	ug/L	100
31) 1,1-Dichloropropene	4.504	75	587037	103.6624	ug/L	100
32) 2-Butanone	4.530	43	127054	101.7877	ug/L	100
33) Benzene	4.797	78	1806588	101.8528	ug/L	100
35) 1,2-Dichloroethane	5.034	62	560473	101.4803	ug/L	100
36) Methylcyclohexane	5.425	83	693665	98.9514	ug/L	100
37) Trichloroethene	5.448	130	544959	102.2898	ug/L	99
38) Dibromomethane	5.862	93	286873	105.5988	ug/L	100
39) 1,2-Dichloropropane	5.966	63	487994	104.9115	ug/L	100
40) Bromodichloromethane	6.050	83	655753	105.6233	ug/L	100
41) 1,4-Dioxane	6.259	88	11272	486.5289	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.632	63	223283	105.8292	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	759853	108.6111	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	117344	101.5337	ug/L	99
45) trans-1,3-Dichloropropene	7.243	75	639506	107.5233	ug/L	100
48) Toluene	6.861	91	2019788	99.9064	ug/L	99
49) Tetrachloroethene	7.185	166	569494	98.7631	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	391353	99.8722	ug/L	100
51) Dibromochloromethane	7.510	129	559220	104.5535	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

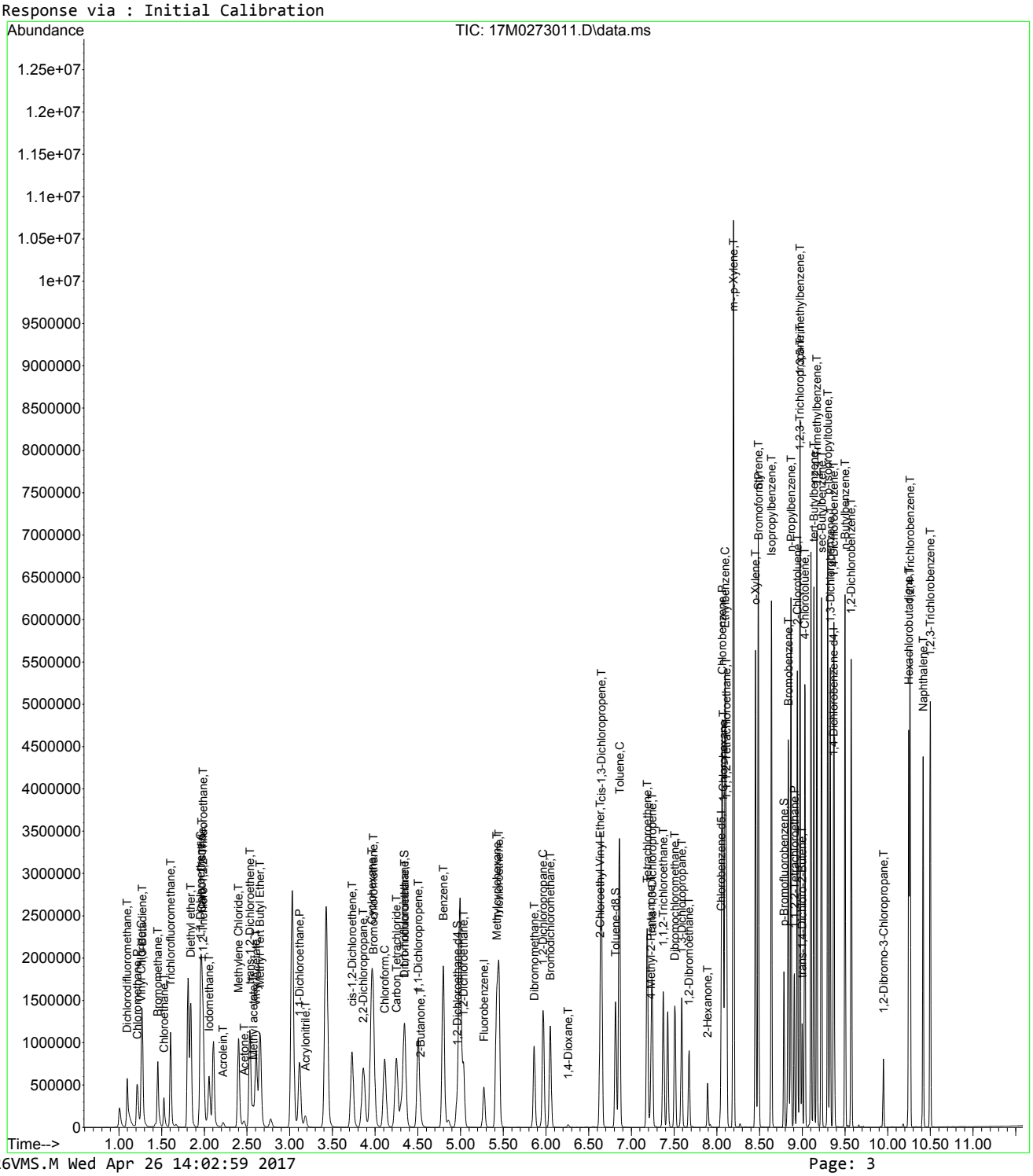
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	628375	100.8998	ug/L		100
53) 1,2-Dibromoethane	7.675	107	404718	100.8074	ug/L		99
54) 2-Hexanone	7.892	43	205809	100.0147	ug/L		100
55) Chlorobenzene	8.063	112	1370148	101.0066	ug/L		100
56) 1-Chlorohexane	8.074	69	110333	100.7444	ug/L		93
57) Ethylbenzene	8.097	106	720227	101.9990	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	539757	102.2182	ug/L		100
59) m-,p-Xylene	8.196	106	1760776	206.6191	ug/L		98
60) o-Xylene	8.453	106	860737	102.5116	ug/L		99
61) Styrene	8.485	104	1437076	106.9660	ug/L		100
62) Bromoform	8.488	173	409507	108.8390	ug/L		100
63) Isopropylbenzene	8.639	105	2195751	101.0295	ug/L		100
65) 1,3,5-Trimethylbenzene	8.975	105	1894143	97.5661	ug/L		100
67) Bromobenzene	8.839	156	656082	95.7737	ug/L		100
68) n-Propylbenzene	8.867	91	2460312	95.6691	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.908	83	459840	98.1628	ug/L		100
70) 2-Chlorotoluene	8.943	91	1511609	95.2292	ug/L		100
71) 1,2,3-Trichloropropane	8.972	110	133032	96.0637	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	104884	101.5987	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.172	105	1913672	97.7541	ug/L		100
74) 4-Chlorotoluene	9.030	91	1517738	95.7730	ug/L		99
75) tert-Butylbenzene	9.137	134	369444	95.2178	ug/L		99
76) sec-Butylbenzene	9.227	105	2287023	95.6223	ug/L		99
77) p-Isopropyltoluene	9.299	119	1998379	98.0160	ug/L		99
78) 1,3-Dichlorobenzene	9.328	146	1155544	96.7618	ug/L		99
79) 1,4-Dichlorobenzene	9.371	146	1146291	95.0753	ug/L		100
80) n-Butylbenzene	9.502	91	1722841	100.1183	ug/L		100
81) 1,2-Dichlorobenzene	9.574	146	1130299	97.1145	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	91272	106.2061	ug/L		99
83) Hexachlorobutadiene	10.246	225	476519	97.1199	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	897981	103.8590	ug/L		100
85) Naphthalene	10.417	128	1727630	102.4678	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	823456	98.0503	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:59 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	422742	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.054	117	336124	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.365	152	172896	25.00000	ug/L	# 0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	457792	100.2715	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 401.086%#			
34) 1,2-Dichloroethane-d4	4.962	65	411299	96.1124	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 384.450%#			
47) Toluene-d8	6.817	98	1632836	97.3388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 389.355%#			
66) p-Bromofluorobenzene	8.789	95	645488	111.5020	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 446.008%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1123418	223.7603	ug/L	100
3) Chloromethane	1.218	50	1006074	204.7589	ug/L	100
4) Vinyl Chloride	1.264	62	1130871	207.8521	ug/L	100
5) 1,3-Butadiene	1.276	54	685580	205.2281	ug/L	100
6) Bromomethane	1.458	94	716567	177.1461	ug/L	99
7) Chloroethane	1.531	64	426821	165.3643	ug/L	97
8) Trichlorofluoromethane	1.606	101	1102484	157.9741	ug/L	99
9) Diethyl ether	1.843	59	3720	1.1053	ug/L	93
10) 1,1-Dichloroethene	1.956	61	1286118	196.9553	ug/L	100
11) Carbon Disulfide	1.971	76	2821100	201.2903	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	825067	198.1856	ug/L	100
13) Iodomethane	2.058	142	1333071	205.2109	ug/L	100
14) Acrolein	2.220	56	2243	5.3954	ug/L	100
15) Methylene Chloride	2.402	84	935406	188.7818	ug/L	100
16) Acetone	2.469	43	158152	186.0640	ug/L	99
17) trans-1,2-Dichloroethene	2.535	96	898207	202.0115	ug/L	100
18) Methyl acetate	2.576	43	529604	237.6658	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	2259635	200.2500	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	1611611	201.8029	ug/L	100
21) Acrylonitrile	3.184	53	143	0.1319	ug/L #	7
22) Vinyl Acetate	2.611	86	152152	212.6197	ug/L	79
23) cis-1,2-Dichloroethene	3.731	96	1025145	203.6866	ug/L	100
24) 2,2-Dichloropropane	3.867	77	1266128	199.3016	ug/L	99
25) Cyclohexane	3.968	56	1443111	212.4544	ug/L	98
26) Bromochloromethane	3.986	130	680841	209.9583	ug/L	100
27) Chloroform	4.116	83	1630953	195.8801	ug/L	100
28) Carbon Tetrachloride	4.252	117	1390908	211.2485	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	1477746	201.8688	ug/L	100
31) 1,1-Dichloropropene	4.507	75	1190890	207.1454	ug/L	100
32) 2-Butanone	4.533	43	254497	200.8340	ug/L	100
33) Benzene	4.799	78	3549706	197.1306	ug/L	100
35) 1,2-Dichloroethane	5.037	62	1109187	197.8242	ug/L	100
36) Methylcyclohexane	5.428	83	1502567	211.1318	ug/L	100
37) Trichloroethene	5.451	130	1086595	200.9018	ug/L	99
38) Dibromomethane	5.862	93	573997	208.1262	ug/L	100
39) 1,2-Dichloropropane	5.969	63	972277	205.8952	ug/L	99
40) Bromodichloromethane	6.053	83	1300334	206.3109	ug/L	100
41) 1,4-Dioxane	6.267	88	427	18.1545	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.635	63	462111	215.7466	ug/L	100
43) cis-1,3-Dichloropropene	6.652	75	1544723	217.4919	ug/L	100
44) 4-Methyl-2-Pentanone	7.231	58	247079	210.5876	ug/L	99
45) trans-1,3-Dichloropropene	7.246	75	1303100	215.8160	ug/L	100
48) Toluene	6.864	91	4027711	191.1271	ug/L	99
49) Tetrachloroethene	7.188	166	1179771	196.2816	ug/L	99
50) 1,1,2-Trichloroethane	7.376	97	783346	191.7811	ug/L	99
51) Dibromochloromethane	7.512	129	1136390	203.8259	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

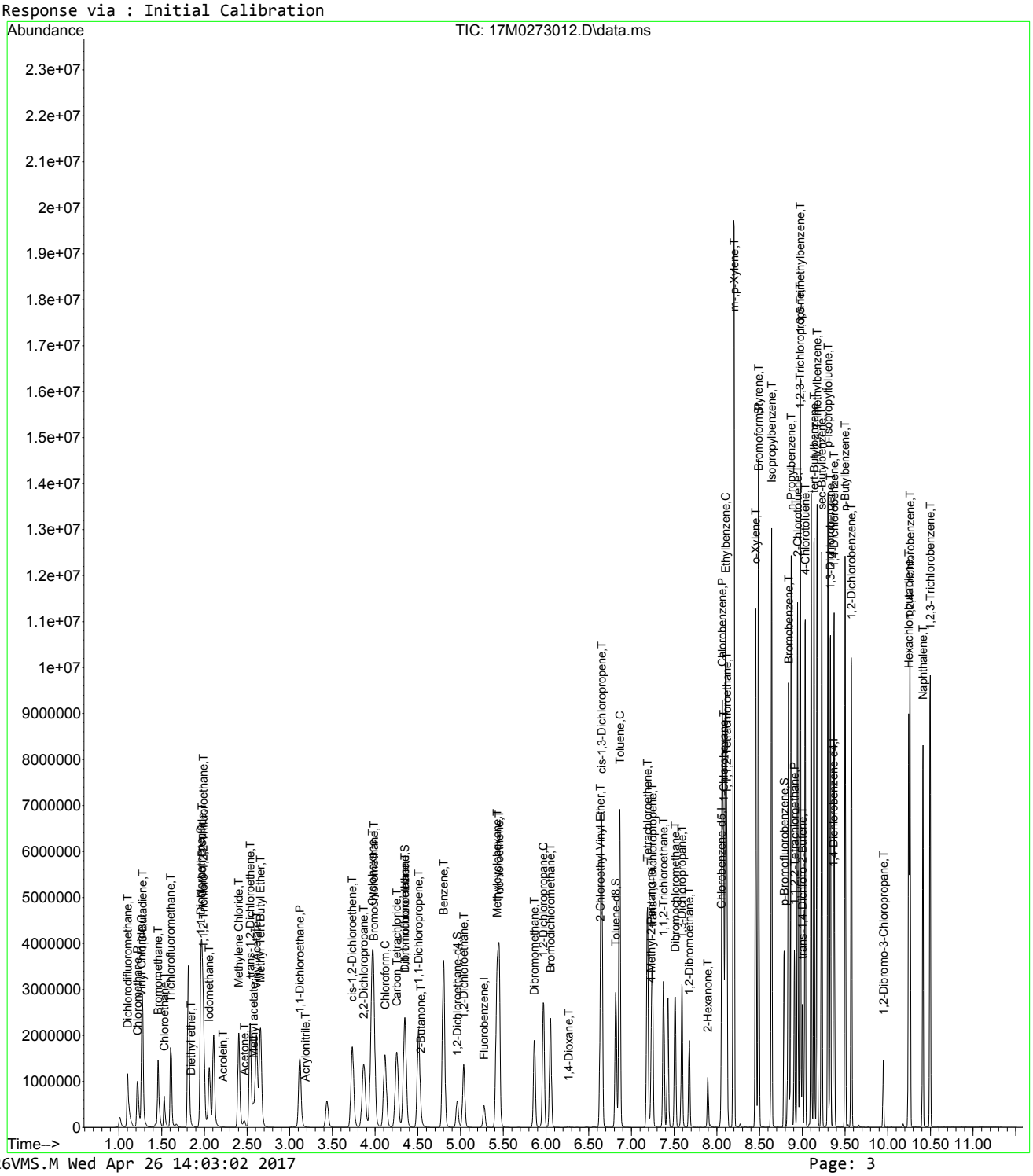
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1259427	194.0084 ug/L	99
53) 1,2-Dibromoethane	7.677	107	819308	195.7778 ug/L	99
54) 2-Hexanone	7.895	43	433472	202.0863 ug/L	99
55) Chlorobenzene	8.062	112	2815311	199.1062 ug/L	99
56) 1-Chlorohexane	8.080	69	241282	211.3571 ug/L	93
57) Ethylbenzene	8.103	106	1512310	205.4678 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.117	131	1104704	200.7023 ug/L	99
59) m-,p-Xylene	8.201	106	3595369	404.7493 ug/L	92
60) o-Xylene	8.456	106	1810464	206.8564 ug/L	97
61) Styrene	8.488	104	3005372	214.6053 ug/L	99
62) Bromoform	8.491	173	876359	223.4506 ug/L	100
63) Isopropylbenzene	8.642	105	4537785	200.3019 ug/L	97
65) 1,3,5-Trimethylbenzene	8.977	105	3876481	201.1221 ug/L	98
67) Bromobenzene	8.841	156	1397197	205.4384 ug/L	100
68) n-Propylbenzene	8.870	91	5099958	199.7489 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.908	83	975708	209.7955 ug/L	100
70) 2-Chlorotoluene	8.946	91	3200183	203.0680 ug/L	99
71) 1,2,3-Trichloropropane	8.975	110	277077	201.5300 ug/L	95
72) trans-1,4-Dichloro-2-B...	9.001	53	221040	215.6681 ug/L #	96
73) 1,2,4-Trimethylbenzene	9.174	105	3801181	195.5789 ug/L	97
74) 4-Chlorotoluene	9.035	91	3225947	205.0404 ug/L	98
75) tert-Butylbenzene	9.140	134	776105	201.4772 ug/L	94
76) sec-Butylbenzene	9.229	105	4546895	191.4871 ug/L	97
77) p-Isopropyltoluene	9.302	119	3910662	193.1992 ug/L	97
78) 1,3-Dichlorobenzene	9.331	146	2355778	198.6954 ug/L	98
79) 1,4-Dichlorobenzene	9.374	146	2315642	193.4552 ug/L	100
80) n-Butylbenzene	9.501	91	3388493	198.3403 ug/L	98
81) 1,2-Dichlorobenzene	9.577	146	2200775	190.4594 ug/L	98
82) 1,2-Dibromo-3-Chloropr...	9.950	75	167553	196.3812 ug/L	100
83) Hexachlorobutadiene	10.246	225	910189	186.8511 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	1714658	199.7517 ug/L	99
85) Naphthalene	10.413	128	3126949	186.8072 ug/L	99
86) 1,2,3-Trichlorobenzene	10.497	180	1583634	189.9325 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	421163	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.051	117	318095	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167190	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.348	111	349	0.0767	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.307%#			
34) 1,2-Dichloroethane-d4	4.994	65	5040	1.1822	ug/L		0.0405
Spiked Amount 25.000	Range 80 - 120		Recovery =	4.729%#			
47) Toluene-d8	6.818	98	3065	0.1931	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.772%#			
66) p-Bromofluorobenzene	8.784	95	2416	0.4316	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.726%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.105	85	6972	1.3939	ug/L		92
3) Chloromethane	1.212	50	17159	3.5053	ug/L		99
4) Vinyl Chloride	1.267	62	3350	0.6180	ug/L		95
5) 1,3-Butadiene	1.276	54	1017883	305.8452	ug/L		100
6) Bromomethane	1.458	94	147661	36.6409	ug/L		99
7) Chloroethane	1.528	64	774	0.3010	ug/L	#	1
8) Trichlorofluoromethane	1.606	101	3390	0.4876	ug/L		94
9) Diethyl ether	1.846	59	976700	291.2984	ug/L		100
10) 1,1-Dichloroethene	1.953	61	4141	0.6365	ug/L		100
11) Carbon Disulfide	1.965	76	4144048	296.7934	ug/L		99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	4030	0.9717	ug/L		99
13) Iodomethane	2.058	142	1505993	232.4313	ug/L		100
14) Acrolein	2.228	56	60168	145.2737	ug/L		99
15) Methylene Chloride	2.405	84	2234	0.4526	ug/L		97
16) Acetone	2.475	43	227499	268.6534	ug/L		100
17) trans-1,2-Dichloroethene	2.538	96	4122	0.9305	ug/L		98
18) Methyl acetate	2.579	43	793361	357.3646	ug/L	#	97
19) Methyl Tert Butyl Ether	2.666	73	1685	0.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	1574	0.1978	ug/L		92
21) Acrylonitrile	3.190	53	164892	152.6638	ug/L		100
22) Vinyl Acetate	2.608	86	202937	284.6507	ug/L		82
23) cis-1,2-Dichloroethene	3.740	96	2225	0.4437	ug/L		93
24) 2,2-Dichloropropane	3.873	77	904	0.4162	ug/L	#	81
25) Cyclohexane	3.969	56	2110437	311.8629	ug/L		99
26) Bromochloromethane	3.986	130	800	0.2476	ug/L		99
27) Chloroform	4.119	83	2791	0.3365	ug/L		95
28) Carbon Tetrachloride	4.258	117	2228	0.3397	ug/L		99
30) 1,1,1-Trichloroethane	4.348	97	1716	0.2353	ug/L		97
31) 1,1-Dichloropropene	4.504	75	5532	0.9659	ug/L	#	1
32) 2-Butanone	4.533	43	386102	305.8312	ug/L	#	75
33) Benzene	4.802	78	6042	0.3368	ug/L		98
35) 1,2-Dichloroethane	5.034	62	890	0.1593	ug/L	#	55
36) Methylcyclohexane	5.428	83	2089398	294.6906	ug/L		99
37) Trichloroethene	5.451	130	4538	0.8422	ug/L		96
38) Dibromomethane	5.862	93	711	0.2588	ug/L		99
39) 1,2-Dichloropropane	5.972	63	809	0.1720	ug/L	#	75
40) Bromodichloromethane	6.050	83	1149	0.1830	ug/L		94
41) 1,4-Dioxane	6.262	88	15860	676.8366	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.635	63	704063	329.9396	ug/L		99
43) cis-1,3-Dichloropropene	6.653	75	3088	0.4364	ug/L		94
44) 4-Methyl-2-Pentanone	7.229	58	356679	305.1404	ug/L		89
45) trans-1,3-Dichloropropene	7.246	75	2608	0.4335	ug/L	#	44
48) Toluene	6.858	91	10685	0.5358	ug/L		100
49) Tetrachloroethene	7.185	166	7101	1.2484	ug/L		99
50) 1,1,2-Trichloroethane	7.373	97	542	0.1402	ug/L	#	65
51) Dibromochloromethane	7.510	129	818	0.1550	ug/L		98

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

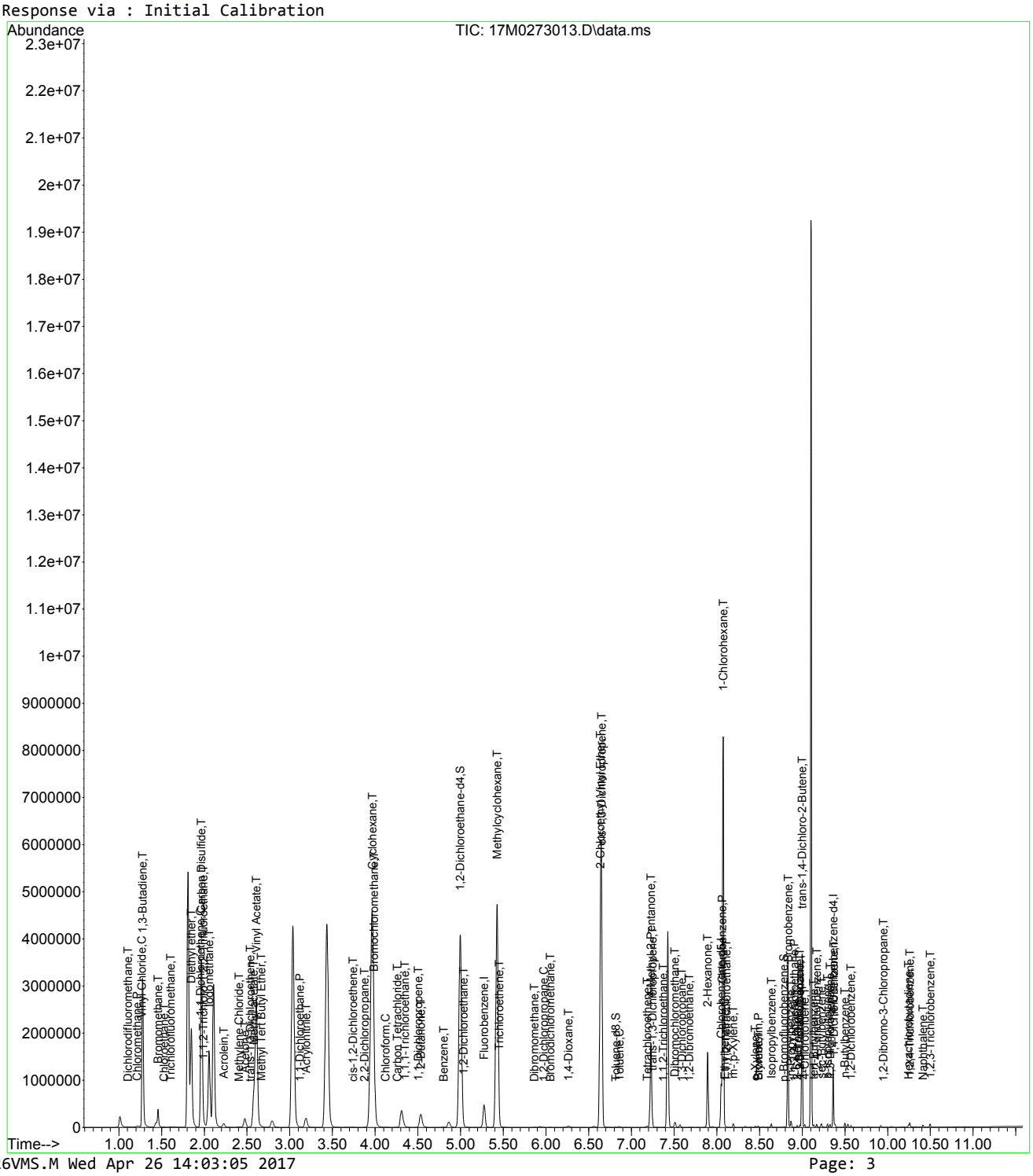
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1557	0.2534	ug/L		96
53) 1,2-Dibromoethane	7.677	107	1315	0.3320	ug/L		83
54) 2-Hexanone	7.892	43	628976	309.8508	ug/L		99
55) Chlorobenzene	8.063	112	8335	0.6229	ug/L	#	1
56) 1-Chlorohexane	8.074	69	332865	308.1078	ug/L	#	1
57) Ethylbenzene	8.094	106	4492	0.6449	ug/L	#	1
58) 1,1,1,2-Tetrachloroethane	8.112	131	902	0.1732	ug/L		85
59) m-,p-Xylene	8.193	106	12446	1.4805	ug/L		92
60) o-Xylene	8.451	106	4066	0.4909	ug/L		99
61) Styrene	8.485	104	8240	0.6217	ug/L		98
62) Bromoform	8.485	173	663	0.1786	ug/L	#	79
63) Isopropylbenzene	8.639	105	23066	1.0759	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	14997	0.8046	ug/L		97
67) Bromobenzene	8.836	156	4020	0.6113	ug/L	#	1
68) n-Propylbenzene	8.865	91	32164	1.3028	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	643	0.1430	ug/L		99
70) 2-Chlorotoluene	8.940	91	11336	0.7439	ug/L		97
71) 1,2,3-Trichloropropane	8.972	110	252	0.1895	ug/L	#	1
72) trans-1,4-Dichloro-2-B...	8.998	53	334602	337.6122	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	15648	0.8326	ug/L		99
74) 4-Chlorotoluene	9.030	91	16738	1.1002	ug/L		100
75) tert-Butylbenzene	9.134	134	2631	0.7063	ug/L		98
76) sec-Butylbenzene	9.224	105	25971	1.1311	ug/L		99
77) p-Isopropyltoluene	9.296	119	20909	1.0682	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	13448	1.1730	ug/L		98
79) 1,4-Dichlorobenzene	9.368	146	14447	1.2481	ug/L		96
80) n-Butylbenzene	9.499	91	25212	1.5261	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	8203	0.7341	ug/L		98
82) 1,2-Dibromo-3-Chloropr...	9.947	75	274	0.3321	ug/L		74
83) Hexachlorobutadiene	10.243	225	5645	1.1984	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	15501	1.8674	ug/L		99
85) Naphthalene	10.414	128	18220	1.1256	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	11288	1.4000	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

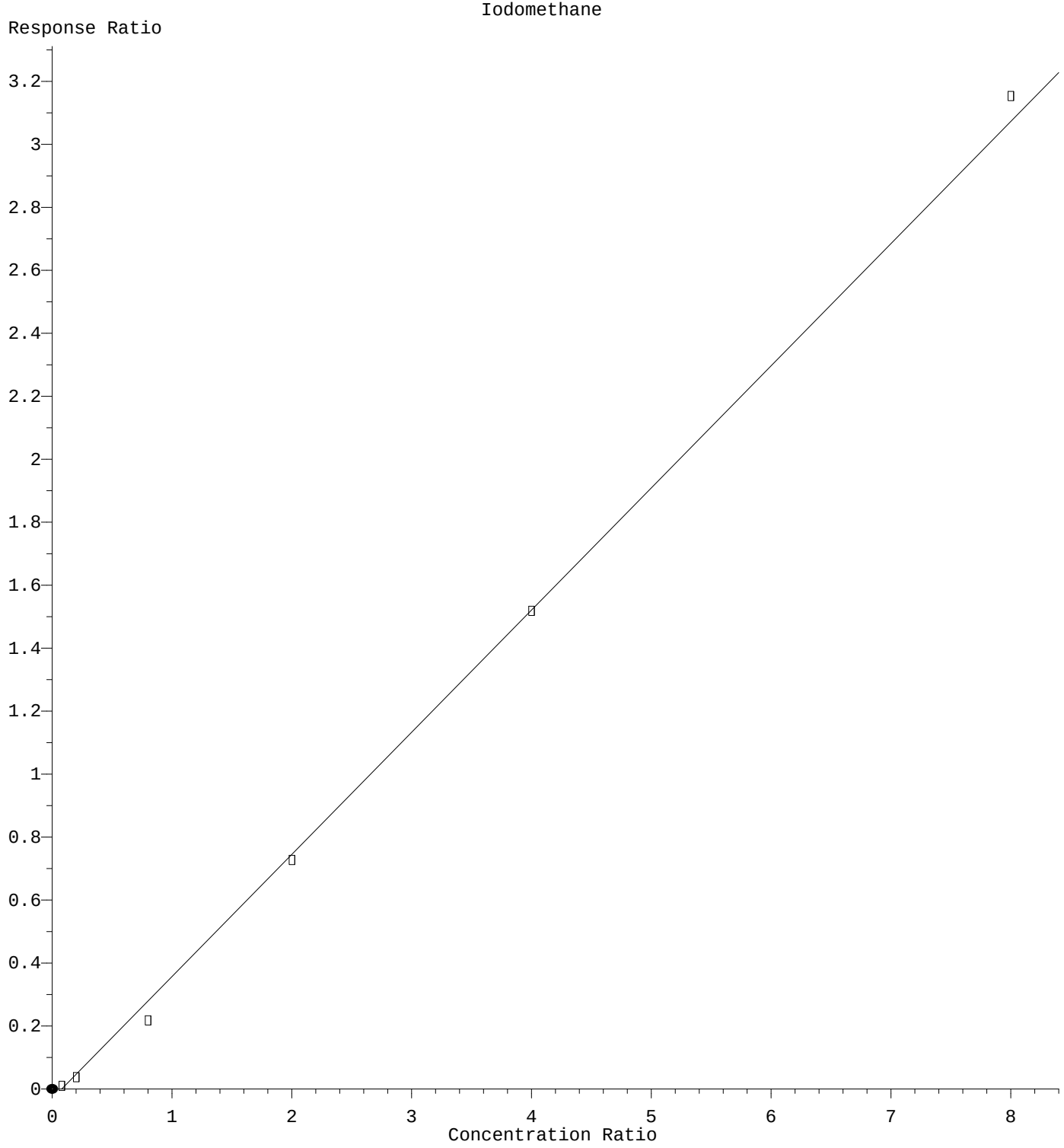
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

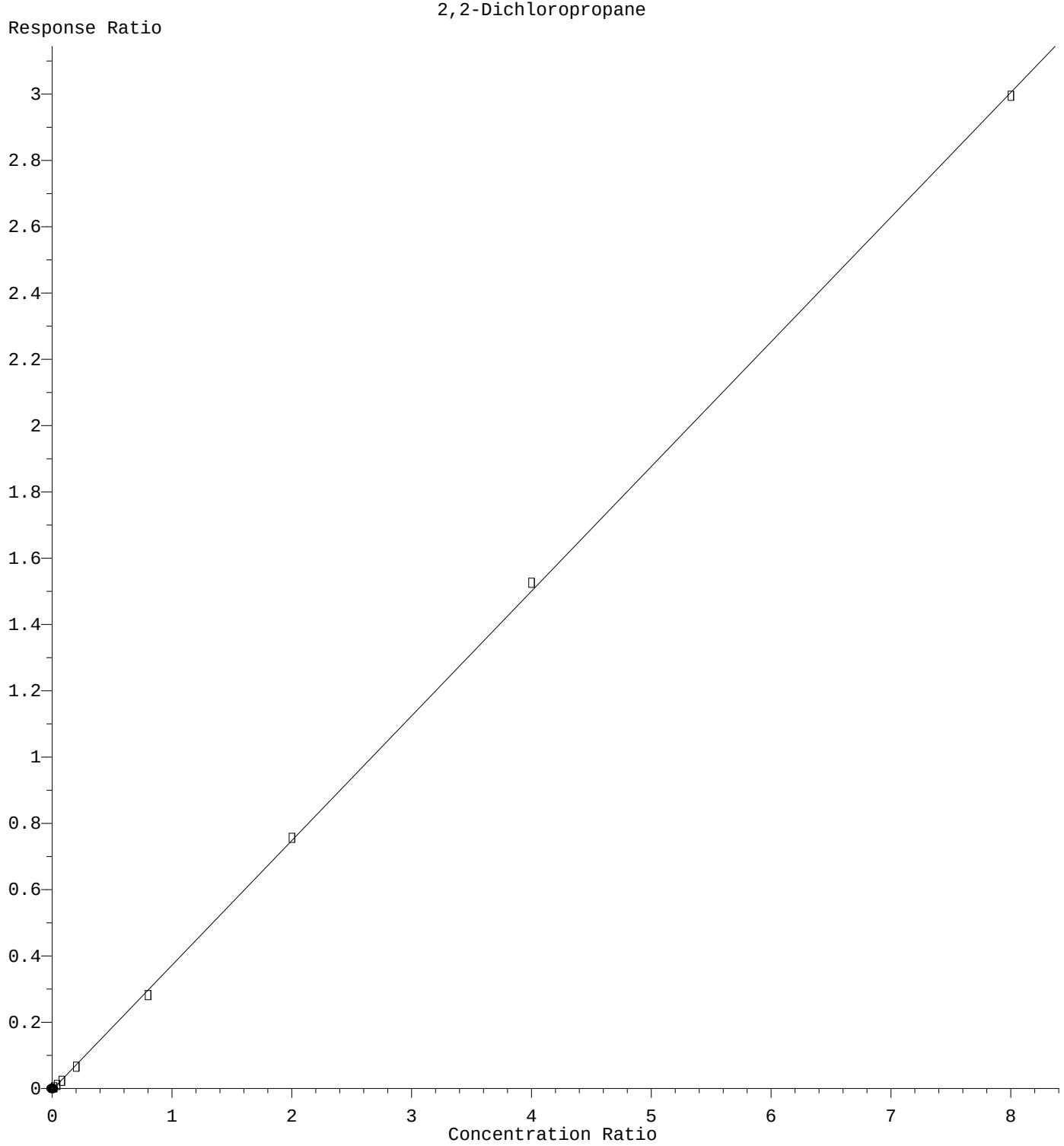
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:05 2017 Page: 3



Response = 3.879e-001 * Amt - 3.105e-002
Coef of Det (r^2) = 0.996358 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017



Response = 3.762e-001 * Amt - 4.116e-003
Coef of Det (r^2) = 0.999589 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	427426	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	325357	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	172416	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115154	24.9461	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.784%			
34) 1,2-Dichloroethane-d4	4.956	65	107614	24.8717	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.487%			
47) Toluene-d8	6.812	98	413254	25.4507	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.803%			
66) p-Bromofluorobenzene	8.786	95	146143	25.3151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.260%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.091	85	340360	67.0494	ug/L	100
3) Chloromethane	1.209	50	296192	59.6212	ug/L	99
4) Vinyl Chloride	1.256	62	335286	60.9497	ug/L	100
5) 1,3-Butadiene	1.267	54	281377	83.3070	ug/L	99
6) Bromomethane	1.450	94	177201	43.3267	ug/L	99
7) Chloroethane	1.519	64	108932	41.7413	ug/L	99
8) Trichlorofluoromethane	1.597	101	225737	31.9912	ug/L	100
9) Diethyl ether	1.841	59	316851	93.1153	ug/L	100
10) 1,1-Dichloroethene	1.939	61	284785	43.1339	ug/L	100
11) Carbon Disulfide	1.951	76	621205	43.8383	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.971	101	212873	50.5729	ug/L	99
13) Iodomethane	2.043	142	436680	67.8380	ug/L	100
14) Acrolein	2.220	56	42666	101.5062	ug/L	100
15) Methylene Chloride	2.394	84	222390	44.3905	ug/L	99
16) Acetone	2.472	43	42575	49.5401	ug/L	99
17) trans-1,2-Dichloroethene	2.524	96	211286	46.9986	ug/L	100
18) Methyl acetate	2.585	43	266388	118.2346	ug/L #	77
19) Methyl Tert Butyl Ether	2.657	73	586859	51.4378	ug/L #	100
20) 1,1-Dichloroethane	3.106	63	386650	47.8850	ug/L	100
21) Acrylonitrile	3.184	53	55958	51.0491	ug/L	100
22) Vinyl Acetate	2.593	86	33146	45.8112	ug/L #	1
23) cis-1,2-Dichloroethene	3.720	96	246047	48.3515	ug/L	100
24) 2,2-Dichloropropane	3.853	77	277540	43.4231	ug/L	100
25) Cyclohexane	3.951	56	319980	46.5911	ug/L	92
26) Bromochloromethane	3.974	130	161439	49.2391	ug/L	100
27) Chloroform	4.108	83	411531	48.8839	ug/L	100
28) Carbon Tetrachloride	4.241	117	326387	49.0278	ug/L	100
30) 1,1,1-Trichloroethane	4.336	97	369604	49.9368	ug/L	100
31) 1,1-Dichloropropene	4.496	75	278322	47.8813	ug/L	100
32) 2-Butanone	4.533	43	64598	50.4183	ug/L #	77
33) Benzene	4.791	78	864999	47.5107	ug/L	100
35) 1,2-Dichloroethane	5.028	62	268041	47.2814	ug/L	100
36) Methylcyclohexane	5.416	83	337902	46.9597	ug/L	99
37) Trichloroethene	5.442	130	264383	48.3464	ug/L	100
38) Dibromomethane	5.859	93	136084	48.8021	ug/L	100
39) 1,2-Dichloropropane	5.964	63	232197	48.6326	ug/L	100
40) Bromodichloromethane	6.047	83	305406	47.9247	ug/L	100
41) 1,4-Dioxane	6.268	88	4924	207.0561	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	119939	55.3825	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	366582	51.0479	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	61610	51.9353	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	294490	48.2382	ug/L	100
48) Toluene	6.855	91	962641	47.1919	ug/L	100
49) Tetrachloroethene	7.182	166	271333	46.6363	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	183455	46.4003	ug/L	100
51) Dibromochloromethane	7.507	129	255775	47.3947	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

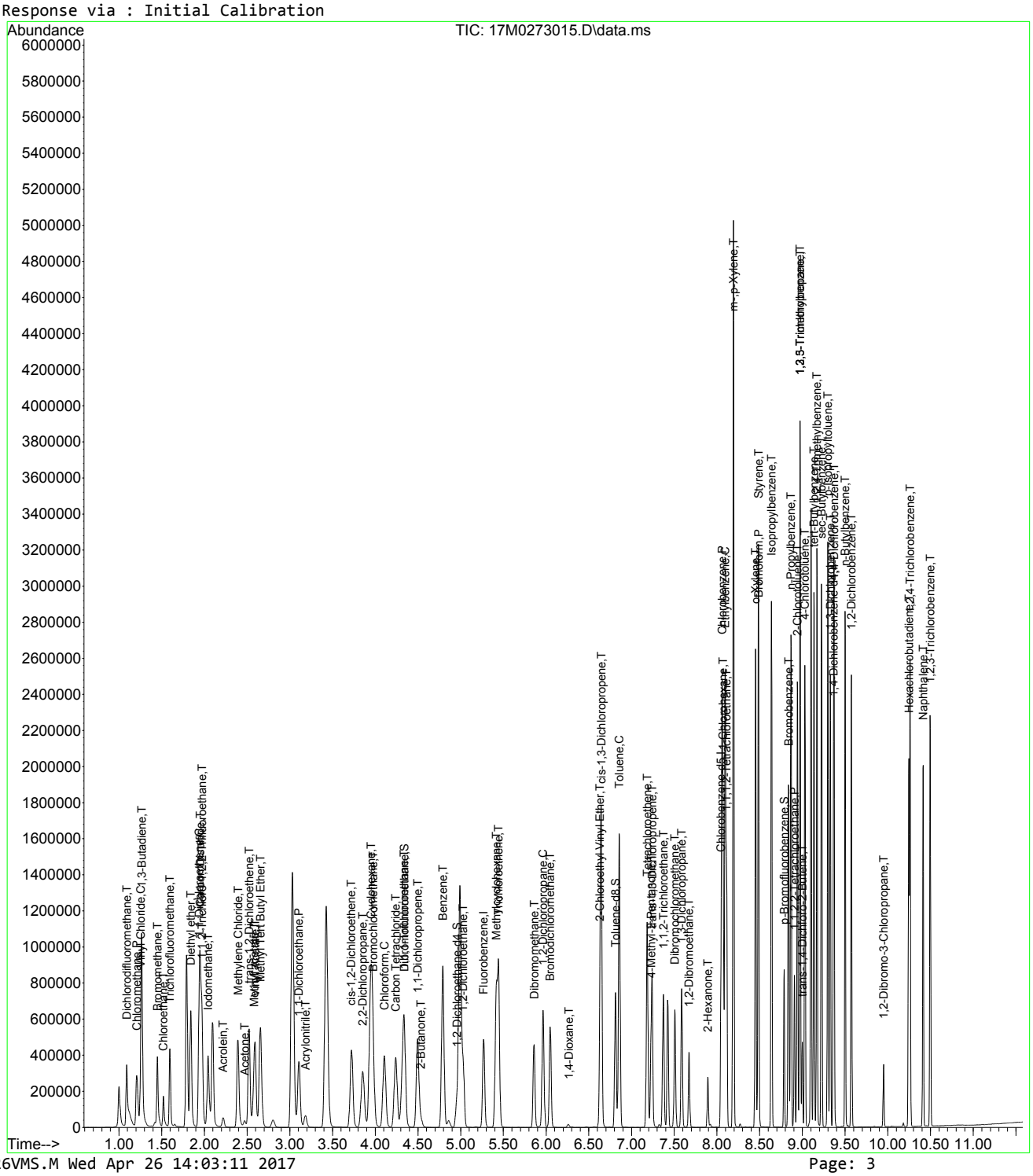
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	304079	48.3920 ug/L	100
53) 1,2-Dibromoethane	7.672	107	188269	46.4766 ug/L	99
54) 2-Hexanone	7.892	43	111735	53.8151 ug/L	99
55) Chlorobenzene	8.060	112	645652	47.1733 ug/L	100
56) 1-Chlorohexane	8.071	69	57184	51.7495 ug/L	92
57) Ethylbenzene	8.094	106	338763	47.5487 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.112	131	249632	46.8539 ug/L	99
59) m-,p-Xylene	8.193	106	824011	95.8330 ug/L	100
60) o-Xylene	8.451	106	407790	48.1343 ug/L	99
61) Styrene	8.485	104	676703	49.9206 ug/L	100
62) Bromoform	8.488	173	186092	49.0192 ug/L	100
63) Isopropylbenzene	8.639	105	1026933	46.8298 ug/L	100
65) 1,3,5-Trimethylbenzene	8.972	105	881437	45.8586 ug/L	100
67) Bromobenzene	8.839	156	305375	45.0262 ug/L	98
68) n-Propylbenzene	8.865	91	1132307	44.4723 ug/L	100
69) 1,1,2,2-Tetrachloroethane	8.905	83	209471	45.1656 ug/L	100
70) 2-Chlorotoluene	8.940	91	699415	44.5050 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	63151	46.0603 ug/L	96
72) trans-1,4-Dichloro-2-B...	8.998	53	41660	40.7607 ug/L #	93
73) 1,2,4-Trimethylbenzene	9.169	105	890512	45.9463 ug/L	100
74) 4-Chlorotoluene	9.030	91	720079	45.8955 ug/L	100
75) tert-Butylbenzene	9.134	134	171753	44.7113 ug/L	99
76) sec-Butylbenzene	9.224	105	1059058	44.7251 ug/L	100
77) p-Isopropyltoluene	9.296	119	926654	45.9071 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	527115	44.5827 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	537479	45.0275 ug/L	100
80) n-Butylbenzene	9.499	91	781454	45.8686 ug/L	99
81) 1,2-Dichlorobenzene	9.574	146	530951	46.0775 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	39964	46.9704 ug/L	96
83) Hexachlorobutadiene	10.246	225	211253	43.4885 ug/L	100
84) 1,2,4-Trichlorobenzene	10.260	180	408655	47.7394 ug/L	100
85) Naphthalene	10.414	128	784767	47.0133 ug/L	100
86) 1,2,3-Trichlorobenzene	10.498	180	377306	45.3780 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:11 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	102	0.000
2	T	Dichlorodifluoromethane	50.000	67.049	-34.1#	124	0.000
3	P	Chloromethane	50.000	59.621	-19.2	123	0.000
4	C	Vinyl Chloride	50.000	60.950	-21.9#	122	0.000
5	T	1,3-Butadiene	50.000	83.307	-66.6#	165	0.000
6	T	Bromomethane	50.000	43.327	13.3	96	0.000
7	T	Chloroethane	50.000	41.741	16.5	96	0.000
8	T	Trichlorofluoromethane	50.000	31.991	36.0#	61	-0.018
9	T	Diethyl ether	100.000	93.115	6.9	92	0.000
10	C	1,1-Dichloroethene	50.000	43.134	13.7#	88	-0.017
11	T	Carbon Disulfide	50.000	43.838	12.3	87	-0.020
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	50.573	-1.1	100	-0.017
13	T	Iodomethane	50.000	67.838	-35.7#	144	-0.015
14	T	Acrolein	50.000	101.506	-103.0#	193	0.000
15	T	Methylene Chloride	50.000	44.390	11.2	95	0.000
16	T	Acetone	50.000	49.540	0.9	105	0.012
17	T	trans-1,2-Dichloroethene	50.000	46.999	6.0	96	0.000
18	T	Methyl acetate	50.000	118.235	-136.5#	207	0.018
19	T	Methyl Tert Butyl Ether	50.000	51.438	-2.9	102	0.000
20	P	1,1-Dichloroethane	50.000	47.885	4.2	97	0.000
21	T	Acrylonitrile	50.000	51.049	-2.1	100	0.000
22	T	Vinyl Acetate	50.000	45.811	8.4	88	-0.015
23	T	cis-1,2-Dichloroethene	50.000	48.351	3.3	98	0.000
24	T	2,2-Dichloropropane	50.000	43.423	13.2	88	0.000
25	T	Cyclohexane	50.000	46.591	6.8	91	-0.012
26	T	Bromochloromethane	50.000	49.239	1.5	97	0.000
27	C	Chloroform	50.000	48.884	2.2#	101	0.000
28	T	Carbon Tetrachloride	50.000	49.028	1.9	96	0.000
29	S	Dibromofluoromethane	25.000	24.946	0.2	99	0.000
30	T	1,1,1-Trichloroethane	50.000	49.937	0.1	101	0.000
31	T	1,1-Dichloropropene	50.000	47.881	4.2	95	0.000
32	T	2-Butanone	50.000	50.418	-0.8	102	0.000
33	T	Benzene	50.000	47.511	5.0	98	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.872	0.5	99	0.000
35	T	1,2-Dichloroethane	50.000	47.281	5.4	96	0.000
36	T	Methylcyclohexane	50.000	46.960	6.1	92	0.000
37	T	Trichloroethene	50.000	48.346	3.3	99	0.000
38	T	Dibromomethane	50.000	48.802	2.4	97	0.000
39	C	1,2-Dichloropropane	50.000	48.633	2.7#	97	0.000
40	T	Bromodichloromethane	50.000	47.925	4.2	96	0.000
41	T	1,4-Dioxane	200.000	207.056	-3.5	106	0.012
42	T	2-Chloroethyl Vinyl Ether	50.000	55.383	-10.8	112	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.048	-2.1	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	51.935	-3.9	106	0.000
45	T	trans-1,3-Dichloropropene	50.000	48.238	3.5	93	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.451	-1.8	102	0.000
48	C	Toluene	50.000	47.192	5.6#	96	0.000
49	T	Tetrachloroethene	50.000	46.636	6.7	95	0.000
50	T	1,1,2-Trichloroethane	50.000	46.400	7.2	94	0.000
51	T	Dibromochloromethane	50.000	47.395	5.2	93	0.000
52	T	1,3-Dichloropropane	50.000	48.392	3.2	98	0.000
53	T	1,2-Dibromoethane	50.000	46.477	7.0	93	0.000
54	T	2-Hexanone	50.000	53.815	-7.6	109	0.000
55	P	Chlorobenzene	50.000	47.173	5.7	96	0.000
56	T	1-Chlorohexane	50.000	51.749	-3.5	101	0.000
57	C	Ethylbenzene	50.000	47.549	4.9#	96	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	46.854	6.3	95	0.000
59	T	m-,p-Xylene	100.000	95.833	4.2	95	0.000
60	T	o-Xylene	50.000	48.134	3.7	96	0.000
61	T	Styrene	50.000	49.921	0.2	97	0.000
62	P	Bromoform	50.000	49.019	2.0	92	0.000
63	T	Isopropylbenzene	50.000	46.830	6.3	94	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	103	0.000
65	T	1,3,5-Trimethylbenzene	50.000	45.859	8.3	94	0.000
66	S	p-Bromofluorobenzene	25.000	25.315	-1.3	103	0.000
67	T	Bromobenzene	50.000	45.026	9.9	95	0.000
68	T	n-Propylbenzene	50.000	44.472	11.1	91	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.166	9.7	88	0.000
70	T	2-Chlorotoluene	50.000	44.505	11.0	93	0.000
71	T	1,2,3-Trichloropropane	50.000	46.060	7.9	95	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	40.761	18.5	77	0.000
73	T	1,2,4-Trimethylbenzene	50.000	45.946	8.1	94	0.000
74	T	4-Chlorotoluene	50.000	45.895	8.2	95	0.000
75	T	tert-Butylbenzene	50.000	44.711	10.6	94	0.000
76	T	sec-Butylbenzene	50.000	44.725	10.5	91	0.000
77	T	p-Isopropyltoluene	50.000	45.907	8.2	91	0.000
78	T	1,3-Dichlorobenzene	50.000	44.583	10.8	92	0.000
79	T	1,4-Dichlorobenzene	50.000	45.027	9.9	94	0.000
80	T	n-Butylbenzene	50.000	45.869	8.3	89	0.000
81	T	1,2-Dichlorobenzene	50.000	46.077	7.8	95	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.970	6.1	90	0.000
83	T	Hexachlorobutadiene	50.000	43.488	13.0	86	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.739	4.5	92	0.000
85	T	Naphthalene	50.000	47.013	6.0	90	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.378	9.2	89	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	377587	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	273493	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	151470	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	98358	26.2983	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.20%			
43) 1,2-Dichloroethane-d4	10.13	65	113244	26.0915	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.36%			
57) Toluene-d8	12.38	98	380659	26.8050	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%			
78) p-Bromofluorobenzene	15.54	95	140530	26.6929	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	234829	50.7013	ug/L	99
3) Chloromethane	3.65	50	171923	37.7391	ug/L	98
4) Vinyl Chloride	3.88	62	174945	53.9835	ug/L	99
5) 1,3-Butadiene	3.92	54	115323	64.7625	ug/L	96
6) Bromomethane	4.77	94	149144	44.5719	ug/L	99
7) Chloroethane	4.92	64	160409	47.7845	ug/L	100
8) Trichlorofluoromethane	5.40	101	281187	49.6650	ug/L	99
9) Diethyl ether	5.91	59	398171	95.0336	ug/L	97
10) Isoprene	5.96	67	312628	53.3000	ug/L	99
11) Acrolein	6.15	56	27281	40.9365	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	165270	49.2905	ug/L	99
13) Acetone	6.25	43	53550	42.4159	ug/L	96
14) 1,1-Dichloroethene	6.46	61	327341	48.5436	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	76883	162.8138	ug/L	99
16) Dimethyl Sulfide	6.72	62	253821	47.9142	ug/L	96
17) Iodomethane	6.97	142	211978	45.9162	ug/L	99
18) Methyl acetate	6.98	43	199442	50.0875	ug/L	98
19) Methylene Chloride	7.22	84	203154	45.1537	ug/L	94
20) Carbon Disulfide	7.27	76	579960	50.3019	ug/L	100
21) Acrylonitrile	7.40	53	87375	46.8580	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	523295	46.4458	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	187750	45.7534	ug/L	96
24) n-Hexane	7.73	57	373840	58.7390	ug/L	98
25) Diisopropyl ether	8.05	45	1664100	101.4220	ug/L	98
26) Vinyl Acetate	8.22	43	375180	48.9849	ug/L	99
27) 1,1-Dichloroethane	8.25	63	411194	47.5415	ug/L	99
28) Ethyl-Tert-Butyl ether	8.60	59	1399566	96.5018	ug/L	98
29) 2-Butanone	8.78	43	94319	45.7212	ug/L	98
30) Propionitrile	8.89	54	60167	87.4277	ug/L	98
31) 2,2-Dichloropropane	9.00	77	296283	50.6074	ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	217610	47.2576	ug/L	94
33) Chloroform	9.25	83	335657	48.8794	ug/L	100
34) 1-Bromopropane	9.39	122	40922	44.5244	ug/L	95
35) Bromochloromethane	9.48	130	129174	45.7513	ug/L	93
36) Tetrahydrofuran	9.50	42	142627	84.8816	ug/L	96
38) 1,1,1-Trichloroethane	9.76	97	297657	48.8059	ug/L	99
39) Cyclohexane	9.79	56	455459	53.1111	ug/L	97
40) 1,1-Dichloropropene	9.95	75	258756	48.4093	ug/L	99
41) Carbon Tetrachloride	10.09	117	259083	49.1159	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1104100	94.3703	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17869.D 8260WT.M Sat Apr 29 19:25:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

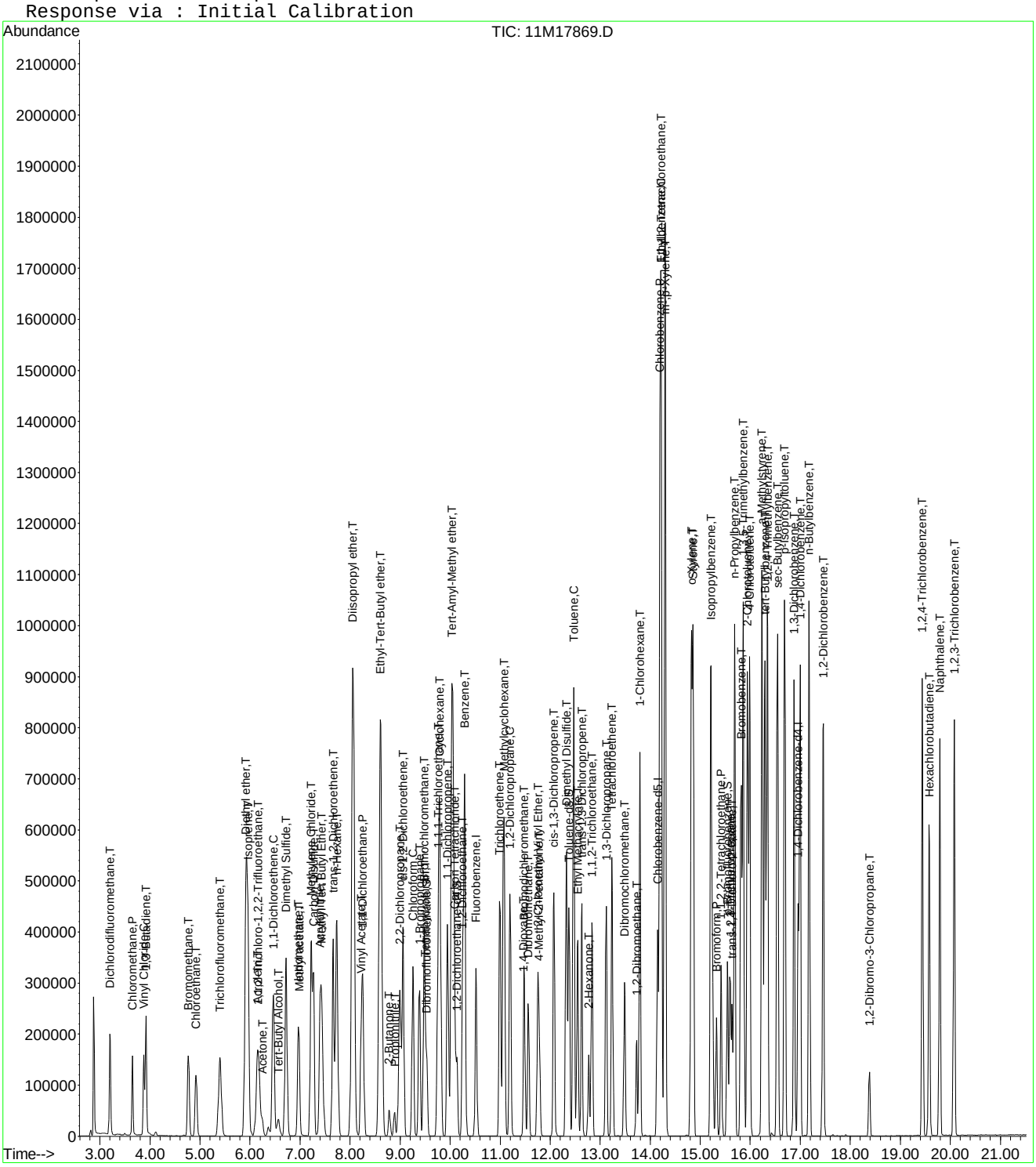
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	280790	47.5726	ug/L	100
45)	Benzene	10.29	78	755591	45.6297	ug/L	99
46)	Trichloroethene	10.99	130	197539	45.5105	ug/L	98
47)	Methylcyclohexane	11.07	83	356832	53.6207	ug/L	98
48)	1,2-Dichloropropane	11.20	63	243886	47.3225	ug/L	99
49)	1,4-Dioxane	11.47	88	7182	154.3191	ug/L	90
50)	Bromodichloromethane	11.48	83	261815	48.6933	ug/L	100
51)	Dibromomethane	11.56	93	114061	46.7864	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	138274	49.1081	ug/L	100
53)	4-Methyl-2-Pentanone	11.78	58	80029	44.1384	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	323822	50.7603	ug/L	99
55)	Dimethyl Disulfide	12.32	79	196311	49.3025	ug/L	99
58)	Toluene	12.47	91	788483	44.5291	ug/L	98
59)	Ethyl Methacrylate	12.55	69	245605	50.4670	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	286013	51.1689	ug/L	98
61)	1,1,2-Trichloroethane	12.83	97	170909	45.7553	ug/L	98
62)	2-Hexanone	12.77	43	139786	45.0450	ug/L	98
63)	1,3-Dichloropropane	13.12	76	285083	45.9530	ug/L	93
64)	Tetrachloroethene	13.23	164	172661	49.1220	ug/L	99
65)	Dibromochloromethane	13.48	129	205885	49.4400	ug/L	99
66)	1,2-Dibromoethane	13.73	107	156839	46.7081	ug/L	99
67)	1-Chlorohexane	13.79	91	279869	55.4622	ug/L	97
68)	Chlorobenzene	14.20	112	516373	45.8570	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	199529	47.5941	ug/L	99
70)	Ethylbenzene	14.22	106	295332	49.5964	ug/L	96
71)	m-,p-Xylene	14.30	106	677561	95.0970	ug/L	96
72)	o-Xylene	14.83	106	349638	48.7026	ug/L	97
73)	Styrene	14.86	104	571749	53.7336	ug/L	100
74)	Bromoform	15.32	173	140741	47.1652	ug/L	99
75)	Isopropylbenzene	15.22	105	840218	47.9750	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	216860	45.5413	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	60125	44.0955	ug/L	97
80)	trans-1,4-Dichloro-2-Buten	15.63	53	74279	50.3817	ug/L	84
81)	n-Propylbenzene	15.69	91	1019169	48.0069	ug/L	98
82)	Bromobenzene	15.82	156	251660	48.7104	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	731926	50.3950	ug/L	98
84)	2-Chlorotoluene	15.94	91	652835	45.2922	ug/L	88
85)	4-Chlorotoluene	15.99	91	629357	48.3767	ug/L	89
86)	a-Methylstyrene	16.23	118	431026	53.8462	ug/L	99
87)	tert-Butylbenzene	16.30	134	163276	46.2387	ug/L	93
88)	1,2,4-Trimethylbenzene	16.35	105	751305	49.4609	ug/L	98
89)	sec-Butylbenzene	16.54	105	913634	47.6309	ug/L	99
90)	p-Isopropyltoluene	16.69	119	793754	51.4991	ug/L	99
91)	1,3-Dichlorobenzene	16.87	146	465150	50.6137	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	467994	47.3495	ug/L	99
93)	n-Butylbenzene	17.17	91	746891	54.3311	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	451560	48.6928	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	38793	46.4306	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	356631	53.5652	ug/L	100
97)	Hexachlorobutadiene	19.58	225	179707	50.8921	ug/L	99
98)	Naphthalene	19.79	128	719637	48.4632	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	337608	49.5651	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17869.D 8260WT.M Sat Apr 29 19:25:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: hpms11
Initial cal date: 24 Mar 2017 18:45
CCV date: 29 Apr 2017 18:53
CCV Filename: 11M17869.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	432286	10.54	305247	14.17	158955	16.98
CCV	377587	10.52	273493	14.14	151470	16.96

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	0.2938	0.3110	-5.9	76	0.00
3	P	Chloromethane	0.3458	0.2277	34.2#	83	0.00
4	C	Vinyl Chloride	0.2146	0.2317	-8.0	87	-0.01
5	T	1,3-Butadiene	0.1274	0.1527	-19.8	95	-0.01
6	T	Bromomethane	0.2216	0.1975	10.9	83	-0.01
7	T	Chloroethane	0.2223	0.2124	4.4	77	-0.01
8	T	Trichlorofluoromethane	0.3749	0.3724	0.7	79	-0.01
9	T	Diethyl ether	0.2774	0.2636	5.0	81	-0.01
10	T	Isoprene	0.3883	0.4140	-6.6	81	-0.01
11	T	Acrolein	0.0441	0.0361	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2188	1.4	79	0.00
13	T	Acetone	0.0836	0.0709	15.2	74	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4335	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0255	18.6	71	0.00
16	T	Dimethyl Sulfide	0.3507	0.3361	4.2	78	-0.01
17	T	Iodomethane	0.2712	0.2807	-3.5	72	0.00
18	T	Methyl acetate	0.2636	0.2641	-0.2	85	0.00
19	T	Methylene Chloride	0.2979	0.2690	9.7	77	-0.01
20	T	Carbon Disulfide	0.7634	0.7680	-0.6	81	-0.01
21	T	Acrylonitrile	0.1235	0.1157	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.6929	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2486	8.5	77	-0.01
24	T	n-Hexane	0.4214	0.4950	-17.5	92	0.00
25	T	Diisopropyl ether	1.0863	1.1018	-1.4	86	-0.01
26	T	Vinyl Acetate	0.5071	0.4968	2.0	81	-0.01
27	P	1,1-Dichloroethane	0.5727	0.5445	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	82	-0.01
29	T	2-Butanone	0.1366	0.1249	8.6	77	-0.01
30	T	Propionitrile	0.0456	0.0398	12.6	74	0.00
31	T	2,2-Dichloropropane	0.3876	0.3923	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.2882	5.5	77	-0.01
33	C	Chloroform	0.5272	0.4445	15.7	78	0.00
34	T	1-Bromopropane	0.0547	0.0542	1.0	75	0.00
35	T	Bromochloromethane	0.1869	0.1711	8.5	74	0.00
36	T	Tetrahydrofuran	0.1113	0.0944	15.1	78	0.00
37	S	Dibromofluoromethane	0.2476	0.2605	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.3942	2.4	77	0.00
39	T	Cyclohexane	0.5678	0.6031	-6.2	83	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3426	3.2	78	0.00
41	T	Carbon Tetrachloride	0.3493	0.3431	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7310	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	0.2874	0.2999	-4.4	87	-0.01
44	T	1,2-Dichloroethane	0.3908	0.3718	4.9	78	0.00
45	T	Benzene	1.0964	1.0006	8.7	78	0.00
46	T	Trichloroethene	0.2874	0.2616	9.0	74	-0.01
47	T	Methylcyclohexane	0.4406	0.4725	-7.2	83	0.00
48	C	1,2-Dichloropropane	0.3412	0.3230	5.4	78	0.00
49	T	1,4-Dioxane	0.0031	0.0024	22.7	67	0.00
50	T	Bromodichloromethane	0.3560	0.3467	2.6	78	-0.01
51	T	Dibromomethane	0.1614	0.1510	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1831	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1060	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4288	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:40 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2600	1.4	80	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	85	0.00
57	S	Toluene-d8	1.2981	1.3918	-7.2	87	0.00
58	C	Toluene	1.6186	1.4415	10.9	79	0.00
59	T	Ethyl Methacrylate	0.4449	0.4490	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5229	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3125	8.5	76	-0.01
62	T	2-Hexanone	0.2837	0.2556	9.9	75	0.00
63	T	1,3-Dichloropropane	0.5671	0.5212	8.1	75	0.00
64	T	Tetrachloroethene	0.3213	0.3157	1.8	77	0.00
65	T	Dibromochloromethane	0.3807	0.3764	1.1	76	-0.01
66	T	1,2-Dibromoethane	0.3069	0.2867	6.6	75	0.00
67	T	1-Chlorohexane	0.4613	0.5117	-10.9	84	0.00
68	P	Chlorobenzene	1.0293	0.9440	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3648	4.8	75	0.00
70	C	Ethylbenzene	0.5443	0.5399	0.8	78	0.00
71	T	m-,p-Xylene	0.6513	0.6194	4.9	79	0.00
72	T	o-Xylene	0.6562	0.6392	2.6	78	0.00
73	T	Styrene	0.9726	1.0453	-7.5	79	0.00
74	P	Bromoform	0.2728	0.2573	5.7	74	0.00
75	T	Isopropylbenzene	1.6009	1.5361	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7158	8.9	76	0.00
78	S	p-Bromofluorobenzene	0.8689	0.9278	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.1985	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2452	-0.8	86	0.00
81	T	n-Propylbenzene	3.5039	3.3643	4.0	81	0.00
82	T	Bromobenzene	0.8527	0.8307	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4161	-0.8	80	0.00
84	T	2-Chlorotoluene	2.3790	2.1550	9.4	82	0.00
85	T	4-Chlorotoluene	2.1472	2.0775	3.2	80	0.00
86	T	a-Methylstyrene	1.3212	1.4228	-7.7	81	0.00
87	T	tert-Butylbenzene	0.5828	0.5390	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4800	1.1	80	0.00
89	T	sec-Butylbenzene	3.1659	3.0159	4.7	79	0.00
90	T	p-Isopropyltoluene	2.5439	2.6202	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5355	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5448	5.3	81	0.00
93	T	n-Butylbenzene	2.2689	2.4655	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.4906	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1281	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.1772	-7.1	80	-0.01
97	T	Hexachlorobutadiene	0.5828	0.5932	-1.8	80	0.00
98	T	Naphthalene	2.4508	2.3755	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1144	0.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17869.D 8260WT.M Sat Apr 29 19:25:40 2017 Page 2

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	50.0000	50.7013	-1.4	76	0.00
3	P	Chloromethane	50.0000	37.7391	24.5	83	0.00
4	C	Vinyl Chloride	50.0000	53.9835	-8.0	87	-0.01
5	T	1,3-Butadiene	50.0000	64.7625	-29.5#	95	-0.01
6	T	Bromomethane	50.0000	44.5719	10.9	83	-0.01
7	T	Chloroethane	50.0000	47.7845	4.4	77	-0.01
8	T	Trichlorofluoromethane	50.0000	49.6650	0.7	79	-0.01
9	T	Diethyl ether	100.0000	95.0336	5.0	81	-0.01
10	T	Isoprene	50.0000	53.3000	-6.6	81	-0.01
11	T	Acrolein	50.0000	40.9365	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	49.2905	1.4	79	0.00
13	T	Acetone	50.0000	42.4158	15.2	74	-0.01
14	C	1,1-Dichloroethene	50.0000	48.5436	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	200.0000	162.8138	18.6	71	0.00
16	T	Dimethyl Sulfide	50.0000	47.9142	4.2	78	-0.01
17	T	Iodomethane	50.0000	45.9162	8.2	72	0.00
18	T	Methyl acetate	50.0000	50.0875	-0.2	85	0.00
19	T	Methylene Chloride	50.0000	45.1537	9.7	77	-0.01
20	T	Carbon Disulfide	50.0000	50.3019	-0.6	81	-0.01
21	T	Acrylonitrile	50.0000	46.8580	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.4458	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	45.7534	8.5	77	-0.01
24	T	n-Hexane	50.0000	58.7390	-17.5	92	0.00
25	T	Diisopropyl ether	100.0000	101.4220	-1.4	86	-0.01
26	T	Vinyl Acetate	50.0000	48.9849	2.0	81	-0.01
27	P	1,1-Dichloroethane	50.0000	47.5415	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5018	3.5	82	-0.01
29	T	2-Butanone	50.0000	45.7212	8.6	77	-0.01
30	T	Propionitrile	100.0000	87.4277	12.6	74	0.00
31	T	2,2-Dichloropropane	50.0000	50.6073	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	47.2576	5.5	77	-0.01
33	C	Chloroform	50.0000	48.8794	2.2	78	0.00
34	T	1-Bromopropane	50.0000	44.5244	11.0	75	0.00
35	T	Bromochloromethane	50.0000	45.7513	8.5	74	0.00
36	T	Tetrahydrofuran	100.0000	84.8816	15.1	78	0.00
37	S	Dibromofluoromethane	25.0000	26.2983	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	50.0000	48.8059	2.4	77	0.00
39	T	Cyclohexane	50.0000	53.1112	-6.2	83	-0.01
40	T	1,1-Dichloropropene	50.0000	48.4093	3.2	78	0.00
41	T	Carbon Tetrachloride	50.0000	49.1159	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	94.3703	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.0915	-4.4	87	-0.01
44	T	1,2-Dichloroethane	50.0000	47.5726	4.9	78	0.00
45	T	Benzene	50.0000	45.6297	8.7	78	0.00
46	T	Trichloroethene	50.0000	45.5105	9.0	74	-0.01
47	T	Methylcyclohexane	50.0000	53.6207	-7.2	83	0.00
48	C	1,2-Dichloropropane	50.0000	47.3225	5.4	78	0.00
49	T	1,4-Dioxane	200.0000	154.3191	22.8	67	0.00
50	T	Bromodichloromethane	50.0000	48.6933	2.6	78	-0.01
51	T	Dibromomethane	50.0000	46.7864	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	49.1081	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	50.0000	44.1384	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	50.7603	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:42 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	49.3025	1.4	80	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	85	0.00
57	S	Toluene-d8	25.0000	26.8050	-7.2	87	0.00
58	C	Toluene	50.0000	44.5291	10.9	79	0.00
59	T	Ethyl Methacrylate	50.0000	50.4670	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	50.0000	51.1689	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	50.0000	45.7553	8.5	76	-0.01
62	T	2-Hexanone	50.0000	45.0450	9.9	75	0.00
63	T	1,3-Dichloropropane	50.0000	45.9530	8.1	75	0.00
64	T	Tetrachloroethene	50.0000	49.1219	1.8	77	0.00
65	T	Dibromochloromethane	50.0000	49.4400	1.1	76	-0.01
66	T	1,2-Dibromoethane	50.0000	46.7081	6.6	75	0.00
67	T	1-Chlorohexane	50.0000	55.4622	-10.9	84	0.00
68	P	Chlorobenzene	50.0000	45.8570	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	47.5941	4.8	75	0.00
70	C	Ethylbenzene	50.0000	49.5964	0.8	78	0.00
71	T	m-,p-Xylene	100.0000	95.0970	4.9	79	0.00
72	T	o-Xylene	50.0000	48.7026	2.6	78	0.00
73	T	Styrene	50.0000	53.7336	-7.5	79	0.00
74	P	Bromoform	50.0000	47.1652	5.7	74	0.00
75	T	Isopropylbenzene	50.0000	47.9750	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	45.5413	8.9	76	0.00
78	S	p-Bromofluorobenzene	25.0000	26.6929	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	50.0000	44.0955	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	50.3817	-0.8	86	0.00
81	T	n-Propylbenzene	50.0000	48.0069	4.0	81	0.00
82	T	Bromobenzene	50.0000	48.7104	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3950	-0.8	80	0.00
84	T	2-Chlorotoluene	50.0000	45.2922	9.4	82	0.00
85	T	4-Chlorotoluene	50.0000	48.3767	3.2	80	0.00
86	T	a-Methylstyrene	50.0000	53.8462	-7.7	81	0.00
87	T	tert-Butylbenzene	50.0000	46.2387	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.4609	1.1	80	0.00
89	T	sec-Butylbenzene	50.0000	47.6309	4.7	79	0.00
90	T	p-Isopropyltoluene	50.0000	51.4991	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	50.0000	50.6137	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	50.0000	47.3495	5.3	81	0.00
93	T	n-Butylbenzene	50.0000	54.3311	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	50.0000	48.6928	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	46.4306	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	53.5652	-7.1	80	-0.01
97	T	Hexachlorobutadiene	50.0000	50.8921	-1.8	80	0.00
98	T	Naphthalene	50.0000	48.4633	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	49.5651	0.9	78	0.00

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	363141	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	272114	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	136451	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	97691	24.9094	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.638%			
34) 1,2-Dichloroethane-d4	4.962	65	89130	24.2463	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.985%			
47) Toluene-d8	6.815	98	344995	25.4042	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.617%			
66) p-Bromofluorobenzene	8.787	95	118708	25.9826	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.930%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	247466	57.3796	ug/L	100
3) Chloromethane	1.224	50	216970	51.4059	ug/L	100
4) Vinyl Chloride	1.270	62	248472	53.1642	ug/L	99
5) 1,3-Butadiene	1.282	54	153629	53.5367	ug/L	99
6) Bromomethane	1.464	94	140052	40.3055	ug/L	100
7) Chloroethane	1.537	64	100874	45.4962	ug/L	98
8) Trichlorofluoromethane	1.621	101	323566	53.9730	ug/L	99
9) Diethyl ether	1.846	59	263021	90.9792	ug/L	97
10) 1,1-Dichloroethene	1.965	61	293938	52.4014	ug/L	98
11) Carbon Disulfide	1.980	76	611134	50.7623	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	194081	54.2708	ug/L	98
13) Iodomethane	2.066	142	259066	47.9741	ug/L	98
14) Acrolein	2.229	56	14575	40.8136	ug/L	99
15) Methylene Chloride	2.408	84	204463	48.0369	ug/L	96
16) Acetone	2.472	43	28629	39.2097	ug/L	100
17) trans-1,2-Dichloroethene	2.541	96	194186	50.8414	ug/L	99
18) Methyl acetate	2.576	43	97248	50.8038	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	446255	46.0381	ug/L #	26
20) 1,1-Dichloroethane	3.120	63	357053	52.0475	ug/L	100
21) Acrylonitrile	3.187	53	41938	45.0318	ug/L	100
22) Vinyl Acetate	2.617	86	35110	57.1159	ug/L	95
23) cis-1,2-Dichloroethene	3.737	96	215849	49.9261	ug/L	98
24) 2,2-Dichloropropane	3.867	77	306201	56.3065	ug/L	97
25) Cyclohexane	3.969	56	308581	52.8853	ug/L	98
26) Bromochloromethane	3.986	130	135801	48.7518	ug/L	99
27) Chloroform	4.116	83	355358	49.6838	ug/L	99
28) Carbon Tetrachloride	4.255	117	289250	51.1409	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	316701	50.3638	ug/L	99
31) 1,1-Dichloropropene	4.507	75	256593	51.9575	ug/L	98
32) 2-Butanone	4.536	43	48538	44.5899	ug/L	98
33) Benzene	4.800	78	778495	50.3289	ug/L	99
35) 1,2-Dichloroethane	5.037	62	229668	47.6843	ug/L	99
36) Methylcyclohexane	5.425	83	313998	51.3626	ug/L	98
37) Trichloroethene	5.451	130	219668	47.2806	ug/L	97
38) Dibromomethane	5.862	93	111128	46.9073	ug/L	100
39) 1,2-Dichloropropane	5.969	63	204742	50.4735	ug/L	100
40) Bromodichloromethane	6.050	83	267979	49.4958	ug/L	100
41) 1,4-Dioxane	6.259	88	4547	225.0508	ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.632	63	85234	46.3245	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	319607	52.3852	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	43157	42.8202	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	261455	50.4084	ug/L	99
48) Toluene	6.858	91	867696	50.8604	ug/L	100
49) Tetrachloroethene	7.185	166	240450	49.4146	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	151611	45.8492	ug/L	99
51) Dibromochloromethane	7.507	129	211312	46.8171	ug/L	99

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

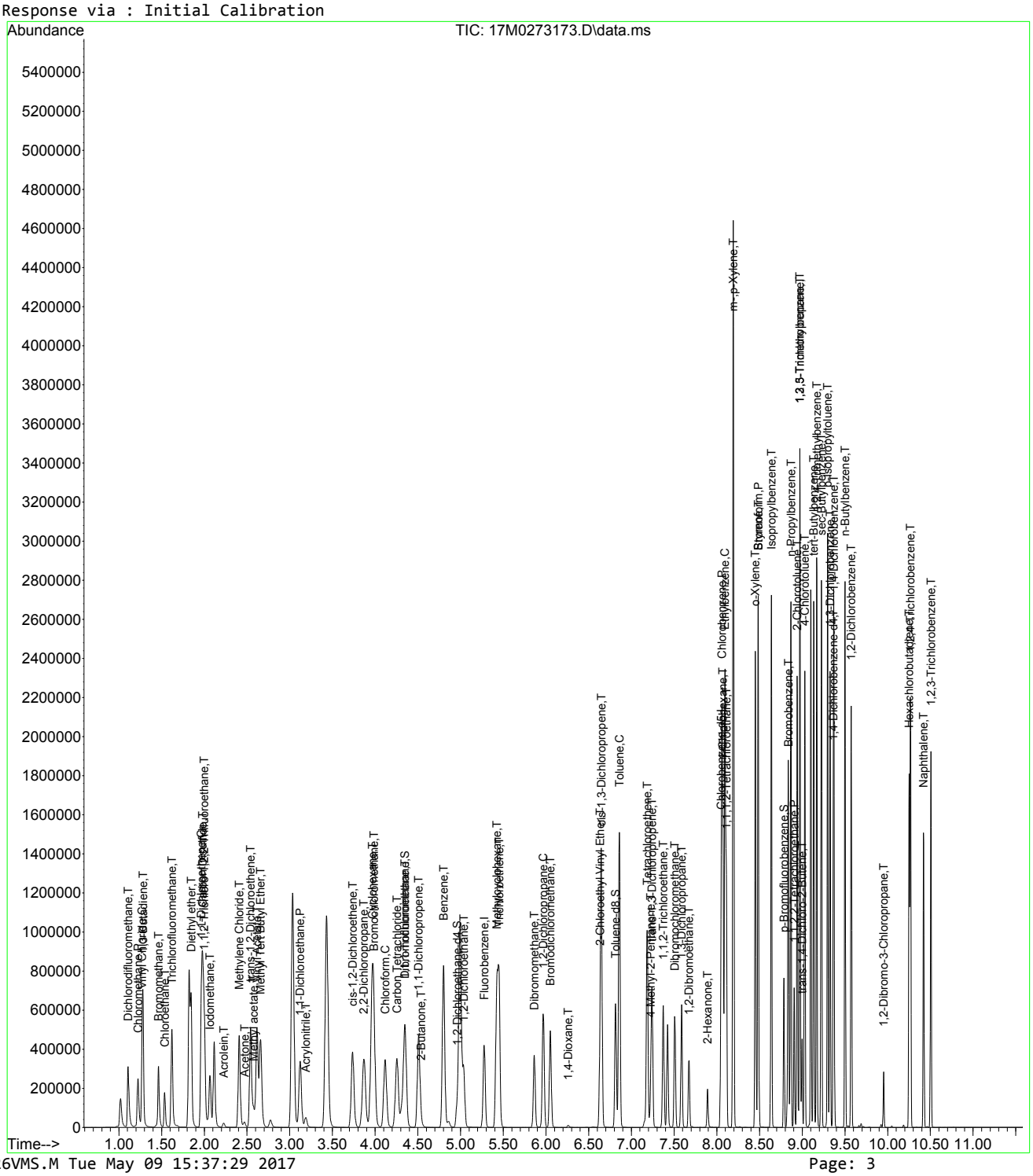
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	247157	47.0294	ug/L		98
53) 1,2-Dibromoethane	7.675	107	153231	45.2284	ug/L		99
54) 2-Hexanone	7.892	43	76910	44.2902	ug/L		97
55) Chlorobenzene	8.060	112	561280	49.0328	ug/L		97
56) 1-Chlorohexane	8.071	69	49565	53.6310	ug/L		99
57) Ethylbenzene	8.095	106	303130	50.8722	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	213477	47.9078	ug/L		99
59) m-,p-Xylene	8.193	106	741624	103.1276	ug/L		98
60) o-Xylene	8.451	106	353516	49.8927	ug/L		97
61) Styrene	8.485	104	591181	52.1448	ug/L		100
62) Bromoform	8.485	173	145973	45.9749	ug/L		100
63) Isopropylbenzene	8.639	105	931347	50.7810	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	806348	53.0094	ug/L		99
67) Bromobenzene	8.839	156	259048	48.2628	ug/L		97
68) n-Propylbenzene	8.868	91	1092488	54.2179	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	181408	49.4243	ug/L		100
70) 2-Chlorotoluene	8.940	91	648360	52.1304	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	48891	45.0585	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	40936	50.6091	ug/L	#	96
73) 1,2,4-Trimethylbenzene	9.169	105	805898	52.5402	ug/L		99
74) 4-Chlorotoluene	9.030	91	657869	52.9822	ug/L		98
75) tert-Butylbenzene	9.134	134	152816	50.2669	ug/L		99
76) sec-Butylbenzene	9.224	105	988788	52.7638	ug/L		99
77) p-Isopropyltoluene	9.296	119	850255	53.2246	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	481408	51.4488	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	472484	50.0155	ug/L		100
80) n-Butylbenzene	9.502	91	764382	56.6922	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	446250	48.9343	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.953	75	32815	48.7336	ug/L		92
83) Hexachlorobutadiene	10.252	225	185946	48.3681	ug/L		99
84) 1,2,4-Trichlorobenzene	10.266	180	342828	50.6055	ug/L		100
85) Naphthalene	10.419	128	588429	44.5426	ug/L		100
86) 1,2,3-Trichlorobenzene	10.506	180	302820	46.0190	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:37:29 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	0.297	0.341	-14.8	91	0.012
3	P	Chloromethane	0.291	0.299	-2.7	90	0.012
4	C	Vinyl Chloride	0.322	0.342	-6.2#	90	0.000
5	T	1,3-Butadiene	0.198	0.212	-7.1	90	0.012
6	T	Bromomethane	0.239	0.193	19.2	76	0.000
7	T	Chloroethane	0.153	0.139	9.2	89	0.000
8	T	Trichlorofluoromethane	0.413	0.446	-8.0	87	0.000
9	T	Diethyl ether	0.199	0.181	9.0	77	0.011
10	C	1,1-Dichloroethene	0.386	0.405	-4.9#	91	0.000
11	T	Carbon Disulfide	0.829	0.841	-1.4	86	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.267	-8.5	92	0.000
13	T	Iodomethane	0.286	0.357	-24.8	85	0.000
14	T	Acrolein	0.025	0.020	20.0	66	0.012
15	T	Methylene Chloride	0.293	0.282	3.8	87	0.000
16	T	Acetone	0.050	0.039	22.0	71	0.012
17	T	trans-1,2-Dichloroethene	0.263	0.267	-1.5	88	0.000
18	T	Methyl acetate	0.132	0.134	-1.5	76	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.614	7.9	78	0.000
20	P	1,1-Dichloroethane	0.472	0.492	-4.2	89	0.000
21	T	Acrylonitrile	0.064	0.058	9.4	75	0.000
22	T	Vinyl Acetate	0.042	0.048	-14.3	93	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.297	0.3	86	0.000
24	T	2,2-Dichloropropane	0.321	0.422	-31.5#	97	0.000
25	T	Cyclohexane	0.402	0.425	-5.7	88	0.000
26	T	Bromochloromethane	0.192	0.187	2.6	81	0.012
27	C	Chloroform	0.492	0.489	0.6#	87	0.000
28	T	Carbon Tetrachloride	0.389	0.398	-2.3	85	0.000
29	S	Dibromofluoromethane	0.270	0.269	0.4	84	0.000
30	T	1,1,1-Trichloroethane	0.433	0.436	-0.7	86	0.000
31	T	1,1-Dichloropropene	0.340	0.353	-3.8	87	0.000
32	T	2-Butanone	0.075	0.067	10.7	77	0.012
33	T	Benzene	1.065	1.072	-0.7	88	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.245	3.2	82	0.000
35	T	1,2-Dichloroethane	0.332	0.316	4.8	83	0.000
36	T	Methylcyclohexane	0.421	0.432	-2.6	86	0.000
37	T	Trichloroethene	0.320	0.302	5.6	83	0.000
38	T	Dibromomethane	0.163	0.153	6.1	79	0.000
39	C	1,2-Dichloropropane	0.279	0.282	-1.1#	86	0.000
40	T	Bromodichloromethane	0.373	0.369	1.1	84	0.000
41	T	1,4-Dioxane	0.001	0.002	-100.0#	98	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.117	7.9	80	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.440	-4.8	86	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.059	14.5	74	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.360	-0.8	83	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	86	0.000
47	S	Toluene-d8	1.248	1.268	-1.6	85	0.000
48	C	Toluene	1.567	1.594	-1.7#	87	0.000
49	T	Tetrachloroethene	0.447	0.442	1.1	84	0.000
50	T	1,1,2-Trichloroethane	0.304	0.279	8.2	78	0.000
51	T	Dibromochloromethane	0.415	0.388	6.5	77	0.000
52	T	1,3-Dichloropropane	0.483	0.454	6.0	80	0.000
53	T	1,2-Dibromoethane	0.311	0.282	9.3	76	0.000
54	T	2-Hexanone	0.160	0.141	11.9	75	0.000
55	P	Chlorobenzene	1.052	1.031	2.0	84	0.000
56	T	1-Chlorohexane	0.085	0.091	-7.1	87	0.000
57	C	Ethylbenzene	0.547	0.557	-1.8#	85	0.000

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.392	4.2	81	0.000
59	T	m-,p-Xylene	0.661	0.681	-3.0	86	0.000
60	T	o-Xylene	0.651	0.650	0.2	84	0.000
61	T	Styrene	1.042	1.086	-4.2	84	0.000
62	P	Bromoform	0.292	0.268	8.2	72	0.000
63	T	Isopropylbenzene	1.685	1.711	-1.5	85	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.955	-6.0	86	0.000
66	S	p-Bromofluorobenzene	0.837	0.870	-3.9	84	0.000
67	T	Bromobenzene	0.983	0.949	3.5	80	0.000
68	T	n-Propylbenzene	3.692	4.003	-8.4	88	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.665	1.0	76	0.000
70	T	2-Chlorotoluene	2.279	2.376	-4.3	86	0.000
71	T	1,2,3-Trichloropropane	0.199	0.179	10.1	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.150	-1.4	75	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.953	-5.1	85	0.000
74	T	4-Chlorotoluene	2.275	2.411	-6.0	86	0.000
75	T	tert-Butylbenzene	0.557	0.560	-0.5	83	0.000
76	T	sec-Butylbenzene	3.433	3.623	-5.5	85	0.000
77	T	p-Isopropyltoluene	2.927	3.116	-6.5	84	0.000
78	T	1,3-Dichlorobenzene	1.714	1.764	-2.9	84	0.000
79	T	1,4-Dichlorobenzene	1.731	1.731	0.0	83	0.000
80	T	n-Butylbenzene	2.470	2.801	-13.4	87	0.000
81	T	1,2-Dichlorobenzene	1.671	1.635	2.2	80	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.120	2.4	74	0.000
83	T	Hexachlorobutadiene	0.704	0.681	3.3	76	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.256	-1.2	77	0.000
85	T	Naphthalene	2.420	2.156	10.9	68	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.110	8.0	72	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	50.000	57.380	-14.8	91	0.012
3	P	Chloromethane	50.000	51.406	-2.8	90	0.012
4	C	Vinyl Chloride	50.000	53.164	-6.3#	90	0.000
5	T	1,3-Butadiene	50.000	53.537	-7.1	90	0.012
6	T	Bromomethane	50.000	40.305	19.4	76	0.000
7	T	Chloroethane	50.000	45.496	9.0	89	0.000
8	T	Trichlorofluoromethane	50.000	53.973	-7.9	87	0.000
9	T	Diethyl ether	100.000	90.979	9.0	77	0.011
10	C	1,1-Dichloroethene	50.000	52.401	-4.8#	91	0.000
11	T	Carbon Disulfide	50.000	50.762	-1.5	86	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	54.271	-8.5	92	0.000
13	T	Iodomethane	50.000	47.974	4.1	85	0.000
14	T	Acrolein	50.000	40.814	18.4	66	0.012
15	T	Methylene Chloride	50.000	48.037	3.9	87	0.000
16	T	Acetone	50.000	39.210	21.6	71	0.012
17	T	trans-1,2-Dichloroethene	50.000	50.841	-1.7	88	0.000
18	T	Methyl acetate	50.000	50.804	-1.6	76	0.000
19	T	Methyl Tert Butyl Ether	50.000	46.038	7.9	78	0.000
20	P	1,1-Dichloroethane	50.000	52.048	-4.1	89	0.000
21	T	Acrylonitrile	50.000	45.032	9.9	75	0.000
22	T	Vinyl Acetate	50.000	57.116	-14.2	93	0.000
23	T	cis-1,2-Dichloroethene	50.000	49.926	0.1	86	0.000
24	T	2,2-Dichloropropane	50.000	56.306	-12.6	97	0.000
25	T	Cyclohexane	50.000	52.885	-5.8	88	0.000
26	T	Bromochloromethane	50.000	48.752	2.5	81	0.012
27	C	Chloroform	50.000	49.684	0.6#	87	0.000
28	T	Carbon Tetrachloride	50.000	51.141	-2.3	85	0.000
29	S	Dibromofluoromethane	25.000	24.909	0.4	84	0.000
30	T	1,1,1-Trichloroethane	50.000	50.364	-0.7	86	0.000
31	T	1,1-Dichloropropene	50.000	51.958	-3.9	87	0.000
32	T	2-Butanone	50.000	44.590	10.8	77	0.012
33	T	Benzene	50.000	50.329	-0.7	88	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.246	3.0	82	0.000
35	T	1,2-Dichloroethane	50.000	47.684	4.6	83	0.000
36	T	Methylcyclohexane	50.000	51.363	-2.7	86	0.000
37	T	Trichloroethene	50.000	47.281	5.4	83	0.000
38	T	Dibromomethane	50.000	46.907	6.2	79	0.000
39	C	1,2-Dichloropropane	50.000	50.473	-0.9#	86	0.000
40	T	Bromodichloromethane	50.000	49.496	1.0	84	0.000
41	T	1,4-Dioxane	200.000	225.051	-12.5	98	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	46.324	7.4	80	0.000
43	T	cis-1,3-Dichloropropene	50.000	52.385	-4.8	86	0.000
44	T	4-Methyl-2-Pentanone	50.000	42.820	14.4	74	0.000
45	T	trans-1,3-Dichloropropene	50.000	50.408	-0.8	83	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	86	0.000
47	S	Toluene-d8	25.000	25.404	-1.6	85	0.000
48	C	Toluene	50.000	50.860	-1.7#	87	0.000
49	T	Tetrachloroethene	50.000	49.415	1.2	84	0.000
50	T	1,1,2-Trichloroethane	50.000	45.849	8.3	78	0.000
51	T	Dibromochloromethane	50.000	46.817	6.4	77	0.000
52	T	1,3-Dichloropropane	50.000	47.029	5.9	80	0.000
53	T	1,2-Dibromoethane	50.000	45.228	9.5	76	0.000
54	T	2-Hexanone	50.000	44.290	11.4	75	0.000
55	P	Chlorobenzene	50.000	49.033	1.9	84	0.000
56	T	1-Chlorohexane	50.000	53.631	-7.3	87	0.000
57	C	Ethylbenzene	50.000	50.872	-1.7#	85	0.000

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	47.908	4.2	81	0.000
59	T	m-,p-Xylene	100.000	103.128	-3.1	86	0.000
60	T	o-Xylene	50.000	49.893	0.2	84	0.000
61	T	Styrene	50.000	52.145	-4.3	84	0.000
62	P	Bromoform	50.000	45.975	8.0	72	0.000
63	T	Isopropylbenzene	50.000	50.781	-1.6	85	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	50.000	53.009	-6.0	86	0.000
66	S	p-Bromofluorobenzene	25.000	25.983	-3.9	84	0.000
67	T	Bromobenzene	50.000	48.263	3.5	80	0.000
68	T	n-Propylbenzene	50.000	54.218	-8.4	88	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	49.424	1.2	76	0.000
70	T	2-Chlorotoluene	50.000	52.130	-4.3	86	0.000
71	T	1,2,3-Trichloropropane	50.000	45.058	9.9	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	50.609	-1.2	75	0.000
73	T	1,2,4-Trimethylbenzene	50.000	52.540	-5.1	85	0.000
74	T	4-Chlorotoluene	50.000	52.982	-6.0	86	0.000
75	T	tert-Butylbenzene	50.000	50.267	-0.5	83	0.000
76	T	sec-Butylbenzene	50.000	52.764	-5.5	85	0.000
77	T	p-Isopropyltoluene	50.000	53.225	-6.5	84	0.000
78	T	1,3-Dichlorobenzene	50.000	51.449	-2.9	84	0.000
79	T	1,4-Dichlorobenzene	50.000	50.015	-0.0	83	0.000
80	T	n-Butylbenzene	50.000	56.692	-13.4	87	0.000
81	T	1,2-Dichlorobenzene	50.000	48.934	2.1	80	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	48.734	2.5	74	0.000
83	T	Hexachlorobutadiene	50.000	48.368	3.3	76	0.000
84	T	1,2,4-Trichlorobenzene	50.000	50.605	-1.2	77	0.000
85	T	Naphthalene	50.000	44.543	10.9	68	0.000
86	T	1,2,3-Trichlorobenzene	50.000	46.019	8.0	72	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	363669	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	270421	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	140313	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	99614	25.3629	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.452%			
34) 1,2-Dichloroethane-d4	4.962	65	90738	24.6479	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.592%			
47) Toluene-d8	6.815	98	350721	25.9875	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.950%			
66) p-Bromofluorobenzene	8.786	95	120937	25.7419	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.968%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	241242	55.8552	ug/L	100
3) Chloromethane	1.224	50	218123	51.6040	ug/L	99
4) Vinyl Chloride	1.270	62	241455	51.5878	ug/L	100
5) 1,3-Butadiene	1.282	54	151602	52.7537	ug/L	98
6) Bromomethane	1.464	94	137056	39.3860	ug/L	99
7) Chloroethane	1.536	64	100196	45.1248	ug/L	98
8) Trichlorofluoromethane	1.623	101	323023	53.8042	ug/L	99
9) Diethyl ether	1.846	59	272538	94.1343	ug/L	97
10) 1,1-Dichloroethene	1.968	61	287753	51.2243	ug/L	97
11) Carbon Disulfide	1.979	76	617019	51.1767	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	191806	53.5568	ug/L	98
13) Iodomethane	2.066	142	248266	45.9936	ug/L	98
14) Acrolein	2.226	56	14606	40.8410	ug/L	99
15) Methylene Chloride	2.408	84	206307	48.3997	ug/L	96
16) Acetone	2.469	43	29727	40.6544	ug/L	98
17) trans-1,2-Dichloroethene	2.544	96	190787	49.8790	ug/L	98
18) Methyl acetate	2.576	43	99329	51.8156	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	445369	45.8800	ug/L #	27
20) 1,1-Dichloroethane	3.123	63	352607	51.3248	ug/L	100
21) Acrylonitrile	3.187	53	42651	45.7309	ug/L	99
22) Vinyl Acetate	2.616	86	35417	57.5316	ug/L	95
23) cis-1,2-Dichloroethene	3.737	96	211975	48.9588	ug/L	97
24) 2,2-Dichloropropane	3.870	77	299473	54.9957	ug/L	96
25) Cyclohexane	3.969	56	307533	52.6292	ug/L	98
26) Bromochloromethane	3.986	130	135382	48.5308	ug/L	99
27) Chloroform	4.116	83	351420	49.0619	ug/L	100
28) Carbon Tetrachloride	4.255	117	286074	50.5060	ug/L	100
30) 1,1,1-Trichloroethane	4.351	97	311384	49.4464	ug/L	99
31) 1,1-Dichloropropene	4.510	75	251446	50.8414	ug/L	98
32) 2-Butanone	4.536	43	47910	43.9491	ug/L	99
33) Benzene	4.802	78	766085	49.4547	ug/L	99
35) 1,2-Dichloroethane	5.037	62	229423	47.5643	ug/L	99
36) Methylcyclohexane	5.428	83	311870	50.9404	ug/L	98
37) Trichloroethene	5.451	130	217357	46.7153	ug/L	98
38) Dibromomethane	5.862	93	111462	46.9800	ug/L	99
39) 1,2-Dichloropropane	5.969	63	204533	50.3488	ug/L	99
40) Bromodichloromethane	6.050	83	265861	49.0333	ug/L	100
41) 1,4-Dioxane	6.265	88	3666	181.1828	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.629	63	79622	43.2116	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	315972	51.7143	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	42360	41.9684	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	261542	50.3520	ug/L	99
48) Toluene	6.858	91	853508	50.3420	ug/L	100
49) Tetrachloroethene	7.185	166	236216	48.8484	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	151981	46.2488	ug/L	99
51) Dibromochloromethane	7.507	129	213307	47.5550	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

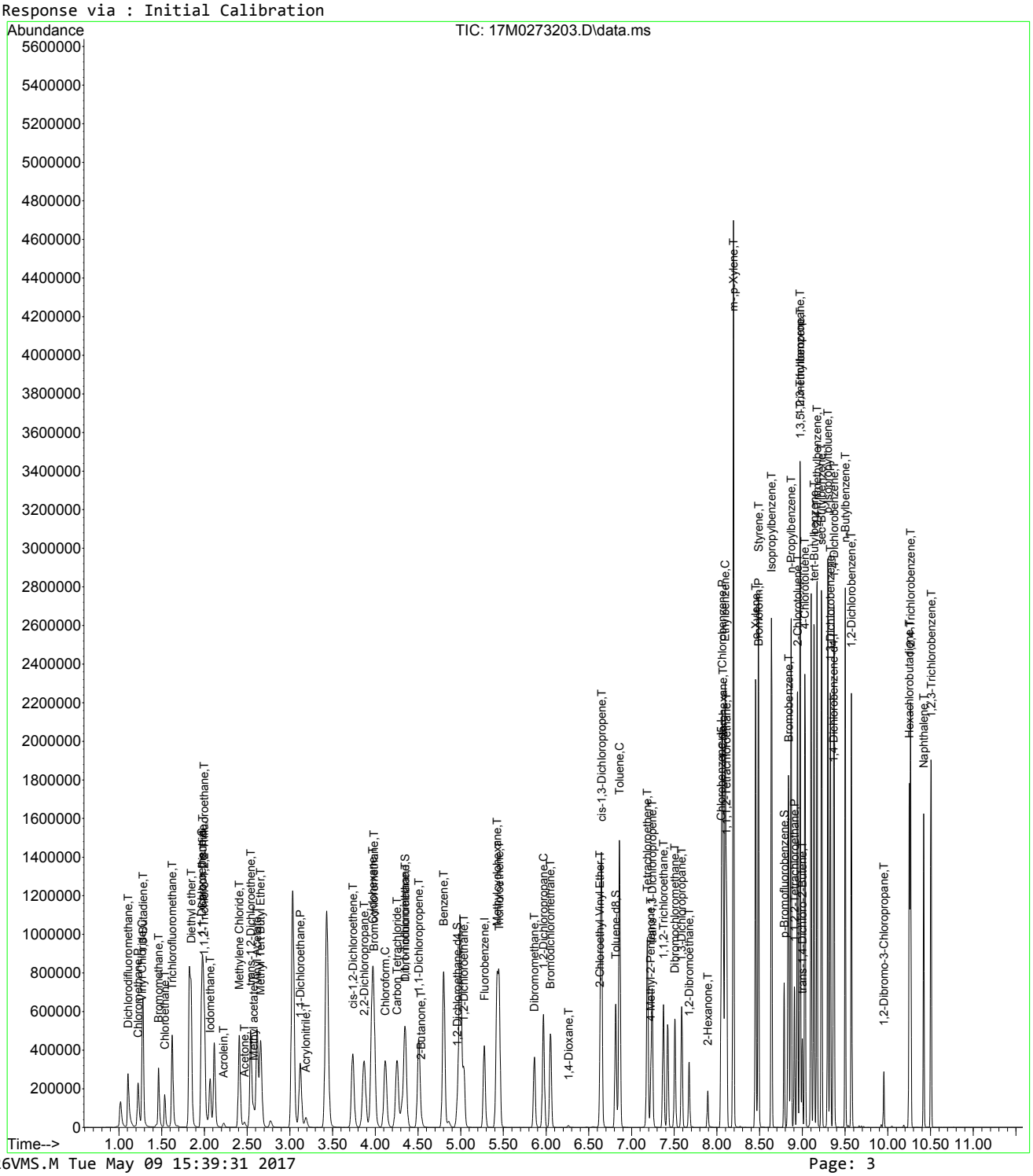
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	248185	47.5206	ug/L		98
53) 1,2-Dibromoethane	7.675	107	152410	45.2677	ug/L		99
54) 2-Hexanone	7.892	43	73017	42.3115	ug/L		98
55) Chlorobenzene	8.060	112	556648	48.9326	ug/L		97
56) 1-Chlorohexane	8.071	69	49340	53.7217	ug/L		96
57) Ethylbenzene	8.094	106	299623	50.5985	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	213485	48.2095	ug/L		99
59) m-,p-Xylene	8.193	106	730437	102.2079	ug/L		98
60) o-Xylene	8.453	106	350074	49.7162	ug/L		97
61) Styrene	8.485	104	585306	51.9498	ug/L		99
62) Bromoform	8.488	173	148880	47.1840	ug/L		99
63) Isopropylbenzene	8.639	105	913948	50.1443	ug/L		99
65) 1,3,5-Trimethylbenzene	8.975	105	792165	50.6436	ug/L		99
67) Bromobenzene	8.838	156	259606	47.0355	ug/L		98
68) n-Propylbenzene	8.867	91	1072155	51.7443	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	186542	49.4242	ug/L		100
70) 2-Chlorotoluene	8.943	91	636946	49.8031	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	49726	44.5666	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	41213	49.5492	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.171	105	798963	50.6544	ug/L		99
74) 4-Chlorotoluene	9.030	91	650954	50.9823	ug/L		99
75) tert-Butylbenzene	9.137	134	149980	47.9762	ug/L		99
76) sec-Butylbenzene	9.224	105	973277	50.5066	ug/L		99
77) p-Isopropyltoluene	9.296	119	837585	50.9883	ug/L		100
78) 1,3-Dichlorobenzene	9.328	146	479848	49.8706	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	473539	48.7474	ug/L		100
80) n-Butylbenzene	9.502	91	753166	54.3228	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	452662	48.2712	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.953	75	33167	47.9006	ug/L		92
83) Hexachlorobutadiene	10.251	225	182066	46.0553	ug/L		100
84) 1,2,4-Trichlorobenzene	10.266	180	344958	49.5184	ug/L		100
85) Naphthalene	10.419	128	605118	44.5451	ug/L		100
86) 1,2,3-Trichlorobenzene	10.506	180	309064	45.6751	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:31 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	0.297	0.332	-11.8	88	0.012
3	P	Chloromethane	0.291	0.300	-3.1	90	0.012
4	C	Vinyl Chloride	0.322	0.332	-3.1#	88	0.000
5	T	1,3-Butadiene	0.198	0.208	-5.1	89	0.012
6	T	Bromomethane	0.239	0.188	21.3	74	0.000
7	T	Chloroethane	0.153	0.138	9.8	88	0.000
8	T	Trichlorofluoromethane	0.413	0.444	-7.5	87	0.000
9	T	Diethyl ether	0.199	0.187	6.0	79	0.011
10	C	1,1-Dichloroethene	0.386	0.396	-2.6#	89	0.012
11	T	Carbon Disulfide	0.829	0.848	-2.3	87	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.264	-7.3	90	0.012
13	T	Iodomethane	0.286	0.341	-19.2	82	0.000
14	T	Acrolein	0.025	0.020	20.0	66	0.000
15	T	Methylene Chloride	0.293	0.284	3.1	88	0.000
16	T	Acetone	0.050	0.041	18.0	73	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.262	0.4	86	0.012
18	T	Methyl acetate	0.132	0.137	-3.8	77	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.612	8.2	77	0.000
20	P	1,1-Dichloroethane	0.472	0.485	-2.8	88	0.012
21	T	Acrylonitrile	0.064	0.059	7.8	76	0.000
22	T	Vinyl Acetate	0.042	0.049	-16.7	94	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.291	2.3	85	0.000
24	T	2,2-Dichloropropane	0.321	0.412	-28.3#	95	0.012
25	T	Cyclohexane	0.402	0.423	-5.2	87	0.000
26	T	Bromochloromethane	0.192	0.186	3.1	81	0.012
27	C	Chloroform	0.492	0.483	1.8#	86	0.000
28	T	Carbon Tetrachloride	0.389	0.393	-1.0	84	0.000
29	S	Dibromofluoromethane	0.270	0.274	-1.5	86	0.012
30	T	1,1,1-Trichloroethane	0.433	0.428	1.2	85	0.000
31	T	1,1-Dichloropropene	0.340	0.346	-1.8	85	0.000
32	T	2-Butanone	0.075	0.066	12.0	76	0.012
33	T	Benzene	1.065	1.053	1.1	87	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.250	1.2	83	0.000
35	T	1,2-Dichloroethane	0.332	0.315	5.1	83	0.000
36	T	Methylcyclohexane	0.421	0.429	-1.9	85	0.000
37	T	Trichloroethene	0.320	0.299	6.6	82	0.000
38	T	Dibromomethane	0.163	0.153	6.1	79	0.000
39	C	1,2-Dichloropropane	0.279	0.281	-0.7#	86	0.000
40	T	Bromodichloromethane	0.373	0.366	1.9	83	0.000
41	T	1,4-Dioxane	0.001	0.001	0.0	79	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.109	14.2	74	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.434	-3.3	85	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.058	15.9	73	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.360	-0.8	83	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	85	0.000
47	S	Toluene-d8	1.248	1.297	-3.9	86	0.000
48	C	Toluene	1.567	1.578	-0.7#	85	0.000
49	T	Tetrachloroethene	0.447	0.437	2.2	83	0.000
50	T	1,1,2-Trichloroethane	0.304	0.281	7.6	78	0.000
51	T	Dibromochloromethane	0.415	0.394	5.1	78	0.000
52	T	1,3-Dichloropropane	0.483	0.459	5.0	80	0.000
53	T	1,2-Dibromoethane	0.311	0.282	9.3	75	0.000
54	T	2-Hexanone	0.160	0.135	15.6	71	0.000
55	P	Chlorobenzene	1.052	1.029	2.2	83	0.000
56	T	1-Chlorohexane	0.085	0.091	-7.1	87	0.000
57	C	Ethylbenzene	0.547	0.554	-1.3#	85	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.395	3.4	81	0.000
59	T	m-,p-Xylene	0.661	0.675	-2.1	84	0.000
60	T	o-Xylene	0.651	0.647	0.6	83	0.000
61	T	Styrene	1.042	1.082	-3.8	84	0.000
62	P	Bromoform	0.292	0.275	5.8	73	0.000
63	T	Isopropylbenzene	1.685	1.690	-0.3	83	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	84	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.823	-1.3	84	0.000
66	S	p-Bromofluorobenzene	0.837	0.862	-3.0	85	0.000
67	T	Bromobenzene	0.983	0.925	5.9	81	0.000
68	T	n-Propylbenzene	3.692	3.821	-3.5	86	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.665	1.0	78	0.000
70	T	2-Chlorotoluene	2.279	2.270	0.4	85	0.000
71	T	1,2,3-Trichloropropane	0.199	0.177	11.1	75	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.147	0.7	76	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.847	-1.3	84	0.000
74	T	4-Chlorotoluene	2.275	2.320	-2.0	86	0.000
75	T	tert-Butylbenzene	0.557	0.534	4.1	82	0.000
76	T	sec-Butylbenzene	3.433	3.468	-1.0	83	0.000
77	T	p-Isopropyltoluene	2.927	2.985	-2.0	83	0.000
78	T	1,3-Dichlorobenzene	1.714	1.710	0.2	83	0.000
79	T	1,4-Dichlorobenzene	1.731	1.687	2.5	83	0.000
80	T	n-Butylbenzene	2.470	2.684	-8.7	86	0.000
81	T	1,2-Dichlorobenzene	1.671	1.613	3.5	81	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.118	4.1	75	0.000
83	T	Hexachlorobutadiene	0.704	0.649	7.8	74	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.229	1.0	78	0.000
85	T	Naphthalene	2.420	2.156	10.9	70	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.101	8.7	73	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	50.000	55.855	-11.7	88	0.012
3	P	Chloromethane	50.000	51.604	-3.2	90	0.012
4	C	Vinyl Chloride	50.000	51.588	-3.2#	88	0.000
5	T	1,3-Butadiene	50.000	52.754	-5.5	89	0.012
6	T	Bromomethane	50.000	39.386	21.2	74	0.000
7	T	Chloroethane	50.000	45.125	9.8	88	0.000
8	T	Trichlorofluoromethane	50.000	53.804	-7.6	87	0.000
9	T	Diethyl ether	100.000	94.134	5.9	79	0.011
10	C	1,1-Dichloroethene	50.000	51.224	-2.4#	89	0.012
11	T	Carbon Disulfide	50.000	51.177	-2.4	87	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	53.557	-7.1	90	0.012
13	T	Iodomethane	50.000	45.994	8.0	82	0.000
14	T	Acrolein	50.000	40.841	18.3	66	0.000
15	T	Methylene Chloride	50.000	48.400	3.2	88	0.000
16	T	Acetone	50.000	40.654	18.7	73	0.000
17	T	trans-1,2-Dichloroethene	50.000	49.879	0.2	86	0.012
18	T	Methyl acetate	50.000	51.816	-3.6	77	0.000
19	T	Methyl Tert Butyl Ether	50.000	45.880	8.2	77	0.000
20	P	1,1-Dichloroethane	50.000	51.325	-2.7	88	0.012
21	T	Acrylonitrile	50.000	45.731	8.5	76	0.000
22	T	Vinyl Acetate	50.000	57.532	-15.1	94	0.000
23	T	cis-1,2-Dichloroethene	50.000	48.959	2.1	85	0.000
24	T	2,2-Dichloropropane	50.000	54.996	-10.0	95	0.012
25	T	Cyclohexane	50.000	52.629	-5.3	87	0.000
26	T	Bromochloromethane	50.000	48.531	2.9	81	0.012
27	C	Chloroform	50.000	49.062	1.9#	86	0.000
28	T	Carbon Tetrachloride	50.000	50.506	-1.0	84	0.000
29	S	Dibromofluoromethane	25.000	25.363	-1.5	86	0.012
30	T	1,1,1-Trichloroethane	50.000	49.446	1.1	85	0.000
31	T	1,1-Dichloropropene	50.000	50.841	-1.7	85	0.000
32	T	2-Butanone	50.000	43.949	12.1	76	0.012
33	T	Benzene	50.000	49.455	1.1	87	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.648	1.4	83	0.000
35	T	1,2-Dichloroethane	50.000	47.564	4.9	83	0.000
36	T	Methylcyclohexane	50.000	50.940	-1.9	85	0.000
37	T	Trichloroethene	50.000	46.715	6.6	82	0.000
38	T	Dibromomethane	50.000	46.980	6.0	79	0.000
39	C	1,2-Dichloropropane	50.000	50.349	-0.7#	86	0.000
40	T	Bromodichloromethane	50.000	49.033	1.9	83	0.000
41	T	1,4-Dioxane	200.000	181.183	9.4	79	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	43.212	13.6	74	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.714	-3.4	85	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.968	16.1	73	0.000
45	T	trans-1,3-Dichloropropene	50.000	50.352	-0.7	83	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	85	0.000
47	S	Toluene-d8	25.000	25.987	-3.9	86	0.000
48	C	Toluene	50.000	50.342	-0.7#	85	0.000
49	T	Tetrachloroethene	50.000	48.848	2.3	83	0.000
50	T	1,1,2-Trichloroethane	50.000	46.249	7.5	78	0.000
51	T	Dibromochloromethane	50.000	47.555	4.9	78	0.000
52	T	1,3-Dichloropropane	50.000	47.521	5.0	80	0.000
53	T	1,2-Dibromoethane	50.000	45.268	9.5	75	0.000
54	T	2-Hexanone	50.000	42.312	15.4	71	0.000
55	P	Chlorobenzene	50.000	48.933	2.1	83	0.000
56	T	1-Chlorohexane	50.000	53.722	-7.4	87	0.000
57	C	Ethylbenzene	50.000	50.598	-1.2#	85	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

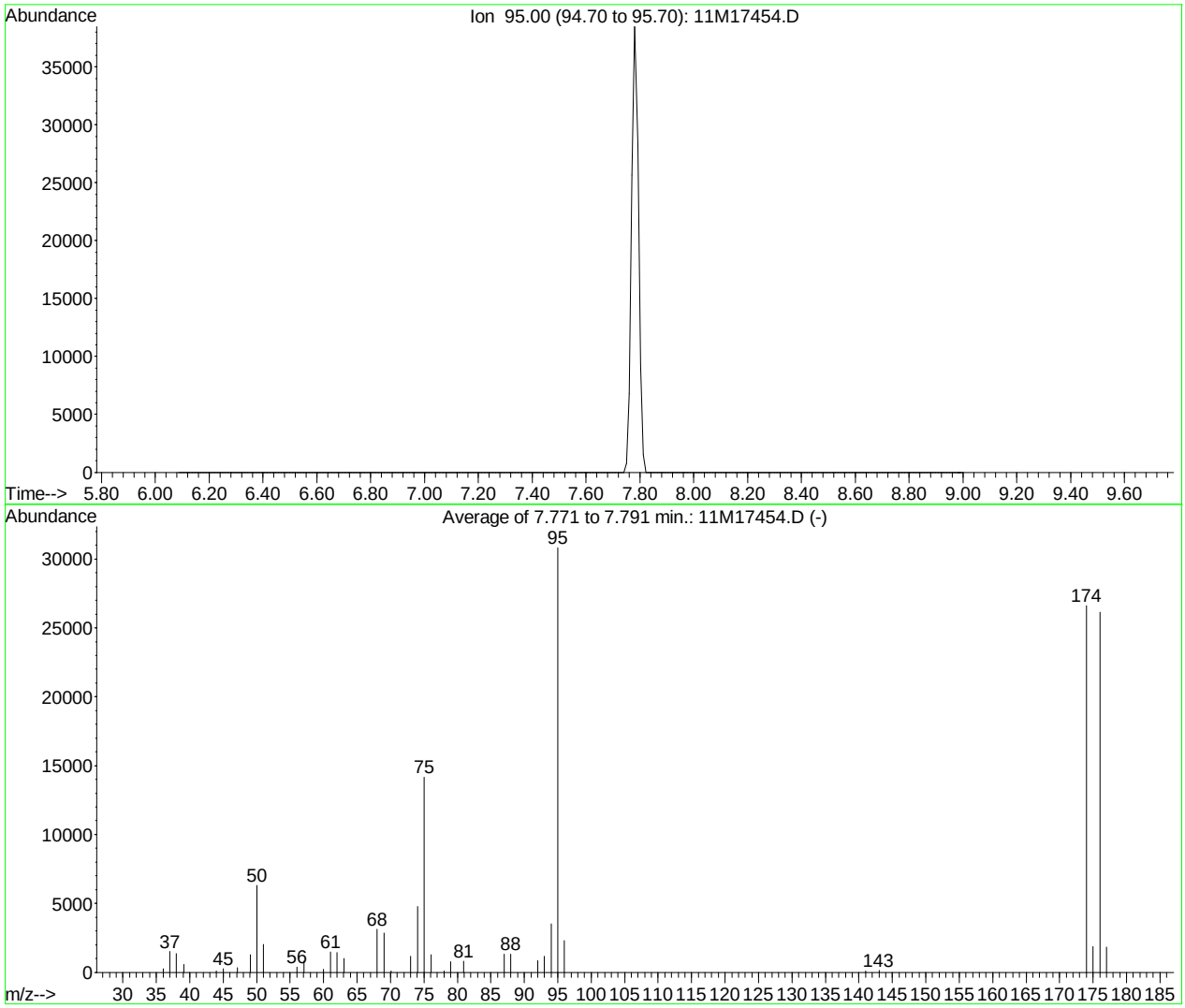
Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	48.210	3.6	81	0.000
59	T	m-,p-Xylene	100.000	102.208	-2.2	84	0.000
60	T	o-Xylene	50.000	49.716	0.6	83	0.000
61	T	Styrene	50.000	51.950	-3.9	84	0.000
62	P	Bromoform	50.000	47.184	5.6	73	0.000
63	T	Isopropylbenzene	50.000	50.144	-0.3	83	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	84	0.000
65	T	1,3,5-Trimethylbenzene	50.000	50.644	-1.3	84	0.000
66	S	p-Bromofluorobenzene	25.000	25.742	-3.0	85	0.000
67	T	Bromobenzene	50.000	47.035	5.9	81	0.000
68	T	n-Propylbenzene	50.000	51.744	-3.5	86	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	49.424	1.2	78	0.000
70	T	2-Chlorotoluene	50.000	49.803	0.4	85	0.000
71	T	1,2,3-Trichloropropane	50.000	44.567	10.9	75	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.549	0.9	76	0.000
73	T	1,2,4-Trimethylbenzene	50.000	50.654	-1.3	84	0.000
74	T	4-Chlorotoluene	50.000	50.982	-2.0	86	0.000
75	T	tert-Butylbenzene	50.000	47.976	4.0	82	0.000
76	T	sec-Butylbenzene	50.000	50.507	-1.0	83	0.000
77	T	p-Isopropyltoluene	50.000	50.988	-2.0	83	0.000
78	T	1,3-Dichlorobenzene	50.000	49.871	0.3	83	0.000
79	T	1,4-Dichlorobenzene	50.000	48.747	2.5	83	0.000
80	T	n-Butylbenzene	50.000	54.323	-8.6	86	0.000
81	T	1,2-Dichlorobenzene	50.000	48.271	3.5	81	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	47.901	4.2	75	0.000
83	T	Hexachlorobutadiene	50.000	46.055	7.9	74	0.000
84	T	1,2,4-Trichlorobenzene	50.000	49.518	1.0	78	0.000
85	T	Naphthalene	50.000	44.545	10.9	70	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.675	8.7	73	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

2.1.1.5 Raw QC Data

```
Data File : C:\MSDCHEM\1\DATA\041117\11M17454.D          Vial: 1
Acq On    : 11 Apr 2017  17:59                       Operator: FJB
Sample    : WG609769-01 BFB 50ng A9                  Inst    : hpms11
Misc      : 1,1 STD80989                             Multiplr: 1.00
MS Integration Params: rteint.p
Method    : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title     : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
```

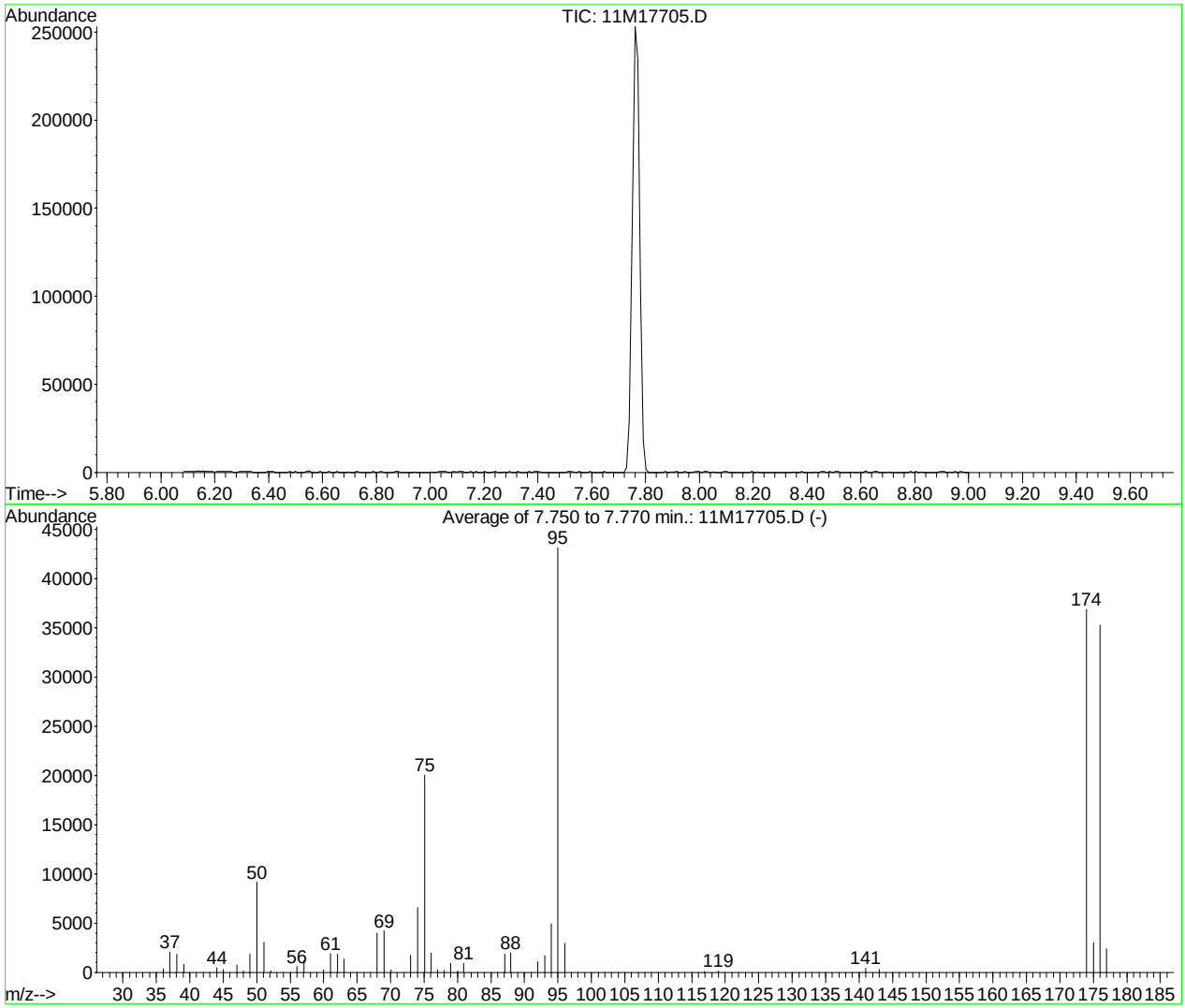


AutoFind: Scans 164, 165, 166; Background Corrected with Scan 159

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	20.4	6289	PASS
75	95	30	60	45.9	14147	PASS
95	95	100	100	100.0	30826	PASS
96	95	5	9	7.4	2288	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	86.3	26595	PASS
175	174	5	9	7.1	1884	PASS
176	174	95	101	98.2	26124	PASS
177	176	5	9	7.0	1818	PASS

11M17454.D A9FOOWT.M Fri Apr 21 13:38:28 2017

Data File : C:\MSDCHEM\1\DATA\042417\11M17705.D Vial: 2
Acq On : 24 Apr 2017 16:08 Operator: JDS
Sample : WG611320-01 BFB 50ng 8260 Inst : hpms11
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

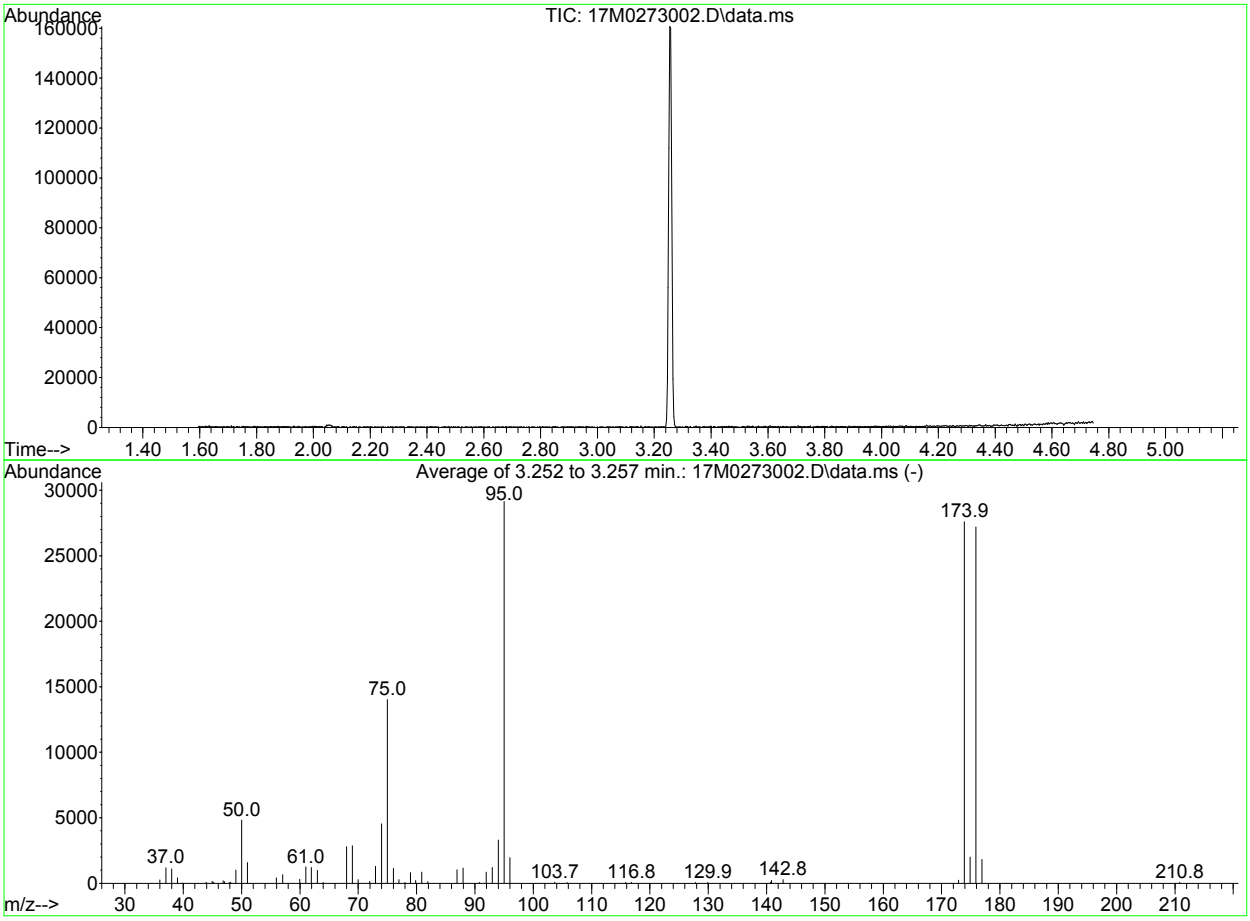
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	21.2	9137	PASS
75	95	30	60	46.5	20047	PASS
95	95	100	100	100.0	43125	PASS
96	95	5	9	6.8	2920	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	85.4	36834	PASS
175	174	5	9	8.1	2976	PASS
176	174	95	101	95.7	35256	PASS
177	176	5	9	6.8	2409	PASS

11M17705.D 8260WT.M Tue Apr 25 14:35:28 2017

Data Path : D:\MassHunter\GCMS\1\data\042517\
Data File : 17M0273002.D
Acq On : 25 Apr 2017 20:07
Operator : FJB
Sample : WG611454-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

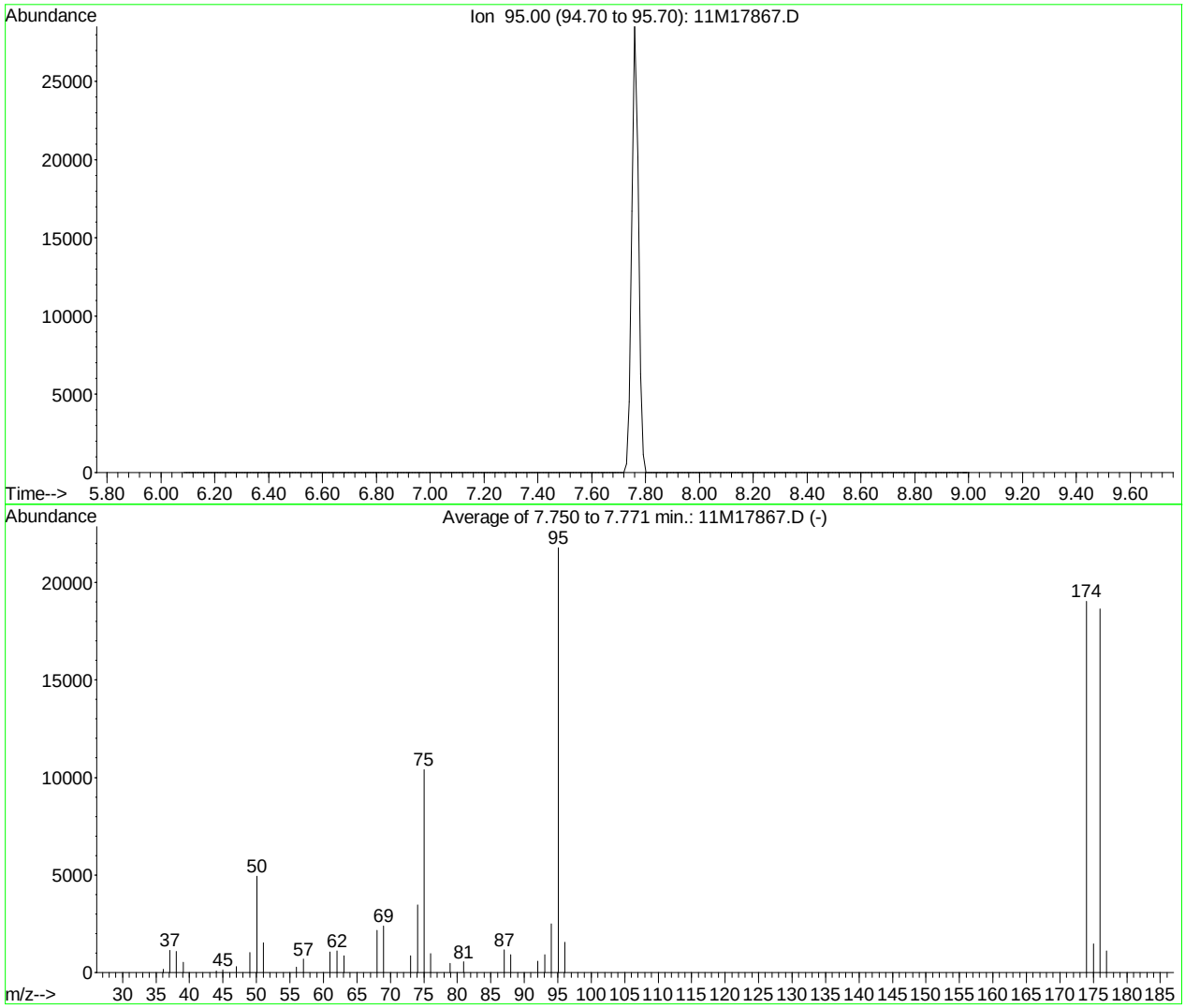
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	4824	PASS
75	95	30	60	48.1	14022	PASS
95	95	100	100	100.0	29152	PASS
96	95	5	9	6.7	1953	PASS
173	174	0.00	2	0.8	223	PASS
174	95	50	100	94.7	27600	PASS
175	174	5	9	7.3	2004	PASS
176	174	95	101	98.5	27192	PASS
177	176	5	9	6.7	1814	PASS

Data File : C:\MSDCHEM\1\DATA\042917\11M17867.D Vial: 2
Acq On : 29 Apr 2017 17:57 Operator: TMB
Sample : WG612121-01 50ng BFB STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

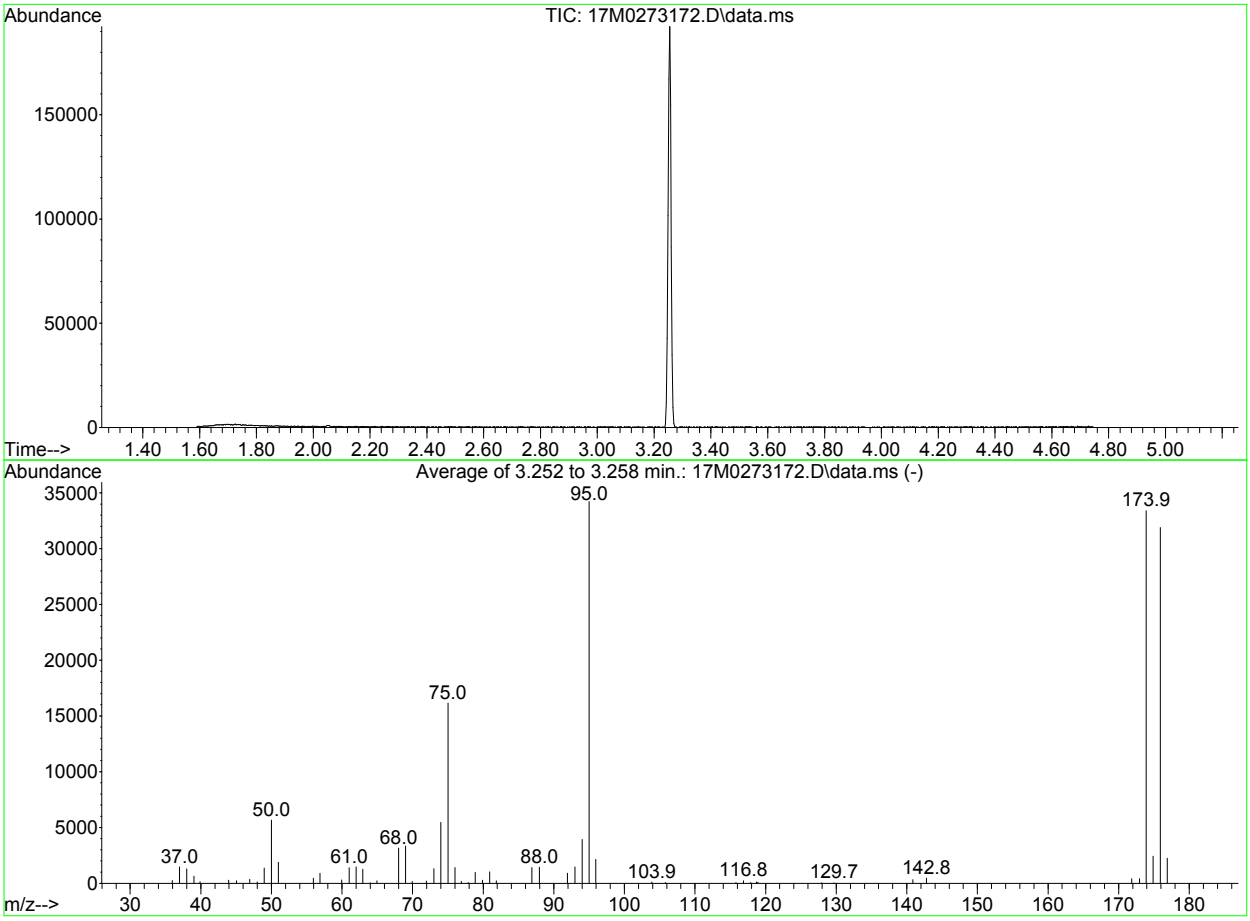
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	22.6	4932	PASS
75	95	30	60	47.7	10389	PASS
95	95	100	100	100.0	21797	PASS
96	95	5	9	7.1	1539	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	87.4	19054	PASS
175	174	5	9	7.6	1451	PASS
176	174	95	101	97.9	18648	PASS
177	176	5	9	5.9	1102	PASS

11M17867.D BFB.M Sat Apr 29 18:08:15 2017

Data Path : D:\MassHunter\GCMS\1\data\043017\
Data File : 17M0273172.D
Acq On : 30 Apr 2017 14:35
Operator : ADC
Sample : WG612141-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

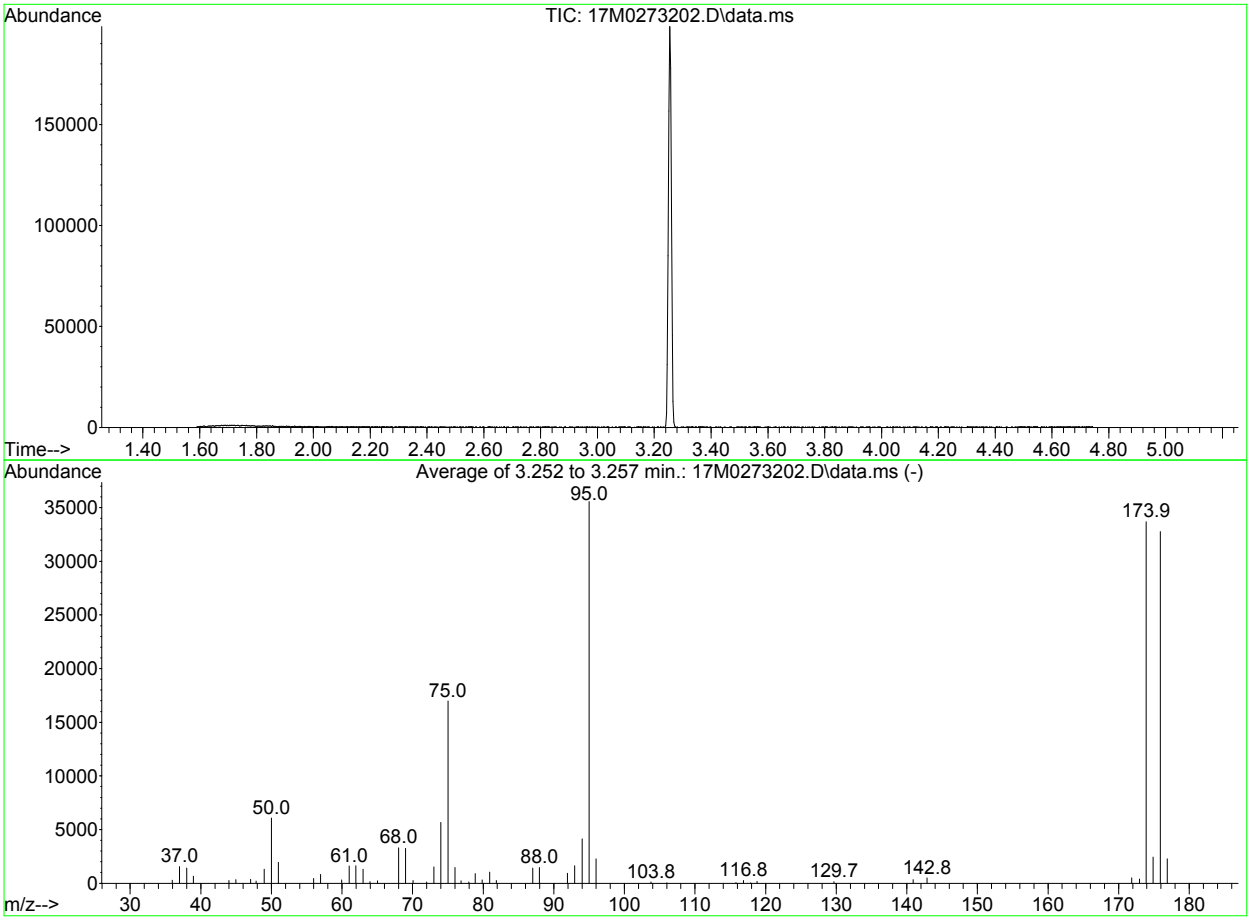
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	5657	PASS
75	95	30	60	47.2	16166	PASS
95	95	100	100	100.0	34232	PASS
96	95	5	9	6.3	2144	PASS
173	174	0.00	2	1.2	398	PASS
174	95	50	100	97.5	33387	PASS
175	174	5	9	7.2	2416	PASS
176	174	95	101	95.5	31880	PASS
177	176	5	9	7.0	2241	PASS

826VMS.M Sun Apr 30 15:34:19 2017 Page: 1

Data Path : D:\MassHunter\GCMS\1\data\050117\
Data File : 17M0273202.D
Acq On : 01 May 2017 11:49
Operator : ADC
Sample : WG612249-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.1	6087	PASS
75	95	30	60	47.7	16978	PASS
95	95	100	100	100.0	35584	PASS
96	95	5	9	6.4	2270	PASS
173	174	0.00	2	1.2	402	PASS
174	95	50	100	94.7	33696	PASS
175	174	5	9	7.2	2442	PASS
176	174	95	101	97.3	32781	PASS
177	176	5	9	7.0	2279	PASS

826VMS.M Mon May 01 12:23:18 2017 Page: 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51:55 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

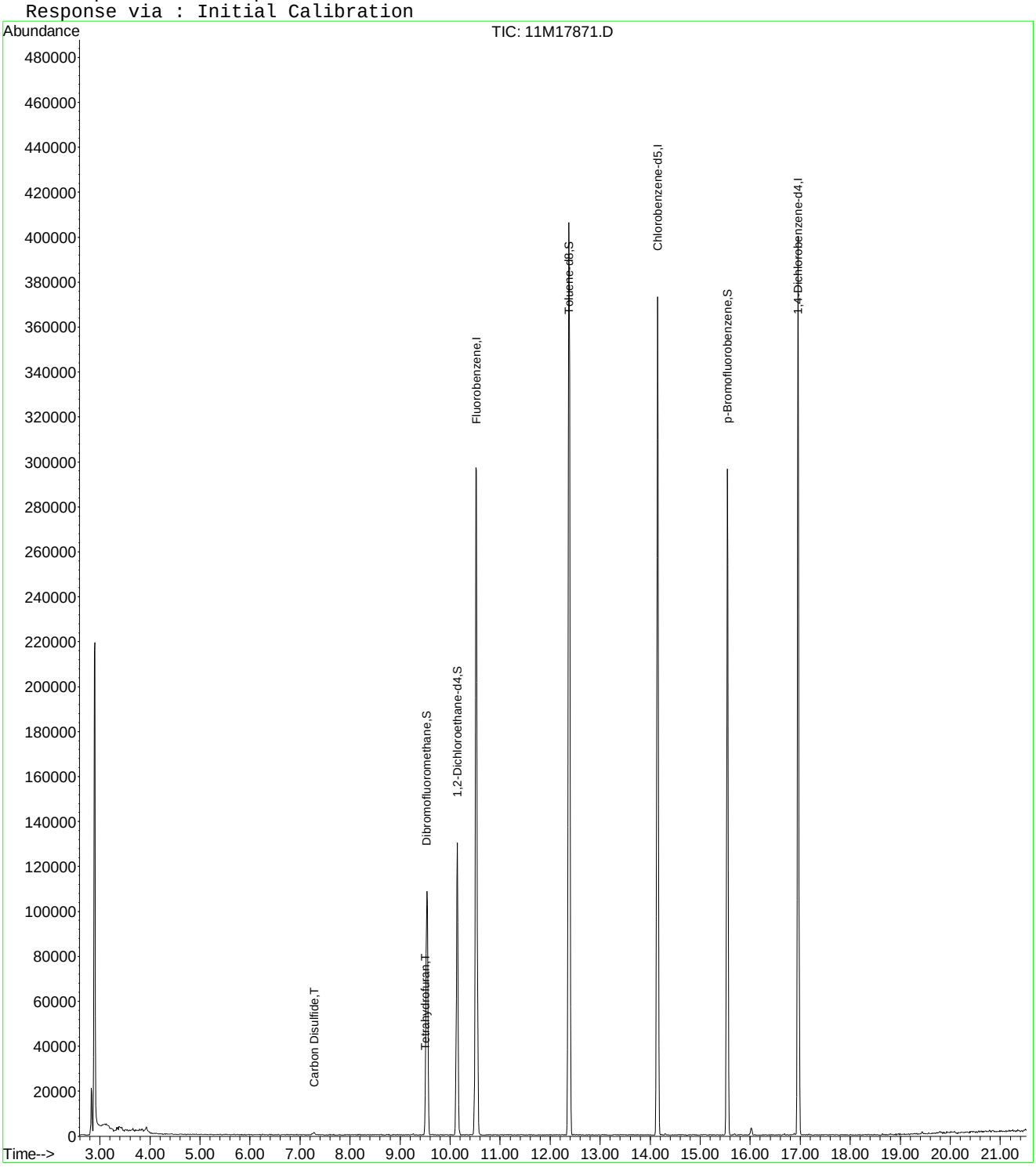
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	353206	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	250807	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	132987	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86657	24.7691	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.08%			
43) 1,2-Dichloroethane-d4	10.14	65	105541	25.9953	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.00%			
57) Toluene-d8	12.38	98	345519	26.5313	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.12%			
78) p-Bromofluorobenzene	15.54	95	122347	26.4690	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	695	Below Cal		95
20) Carbon Disulfide	7.28	76	2034	0.1886	ug/L #	73
33) Chloroform	9.25	83	425	Below Cal	#	17
36) Tetrahydrofuran	9.50	42	5959	3.7912	ug/L	85

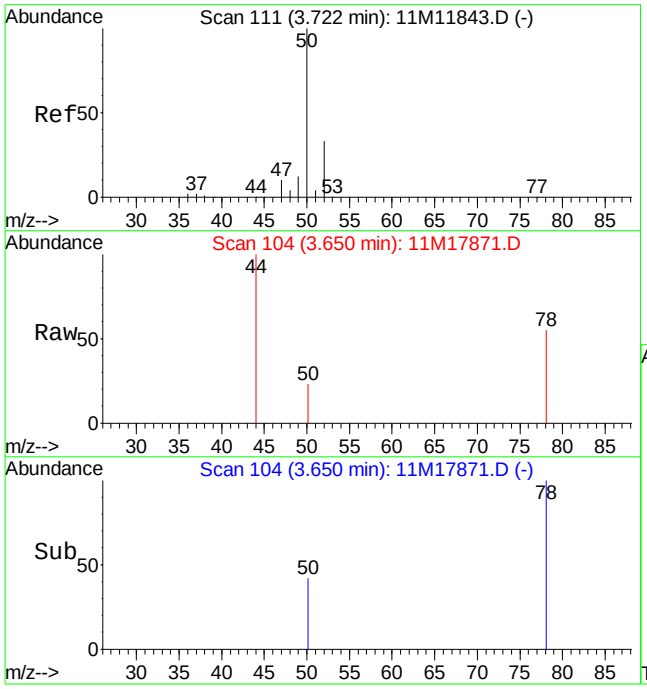
(#) = qualifier out of range (m) = manual integration
11M17871.D 8260WT.M Sun Apr 30 12:51:55 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

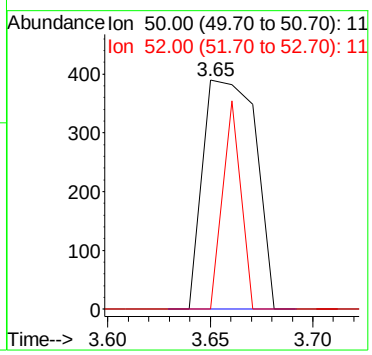


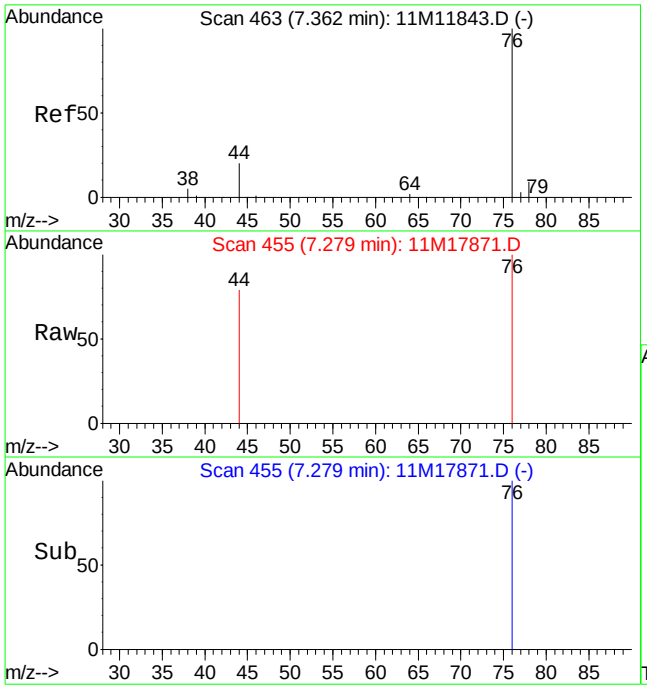


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 50 Resp: 695

Ion	Ratio	Lower	Upper
50	100		
52	31.7	20.8	48.6

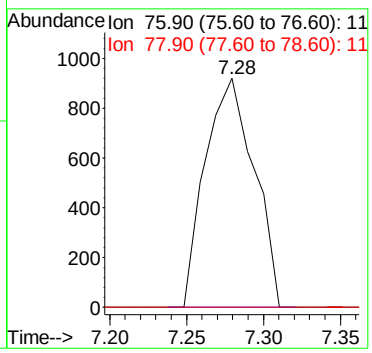


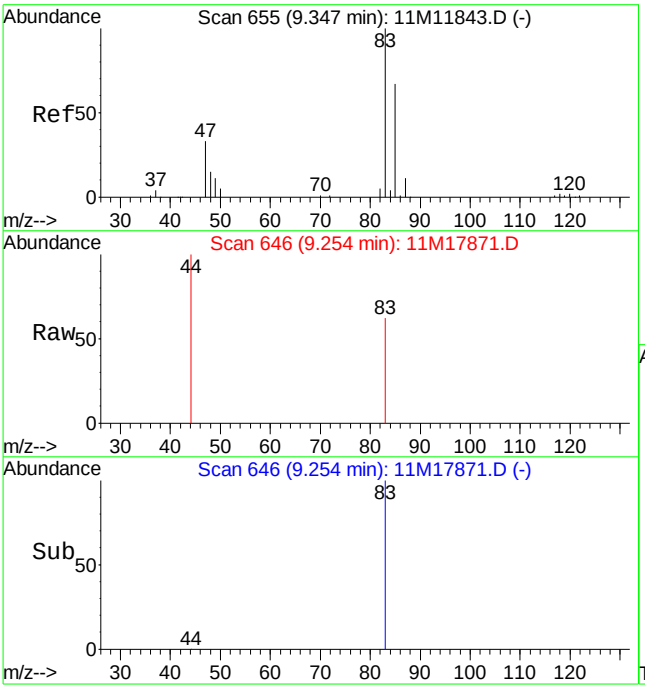


#20
Carbon Disulfide
Concen: 0.19 ug/L
RT: 7.28 min Scan# 455
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 76 Resp: 2034

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

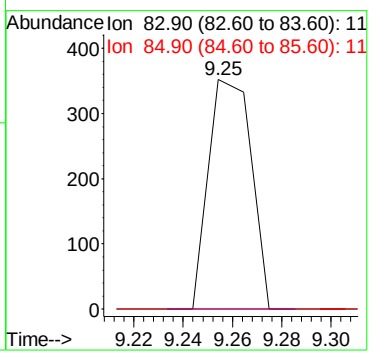


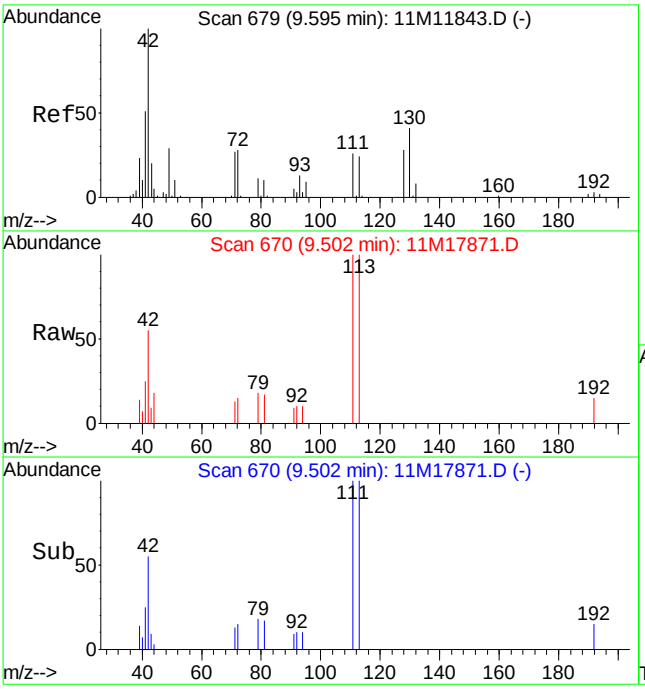


#33
Chloroform
Concen: Below Cal
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 83 Resp: 425

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

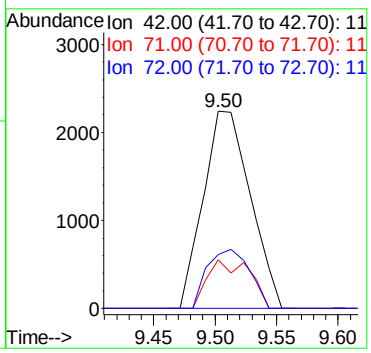




#36
Tetrahydrofuran
Concen: 3.79 ug/L
RT: 9.50 min Scan# 670
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 42 Resp: 5959

Ion	Ratio	Lower	Upper
42	100		
71	22.2	19.0	44.2
72	27.2	20.8	48.4



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273175.D Vial: 3
Acq On : 30 Apr 2017 15:48 Operator: ADC
Sample : WG612142-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

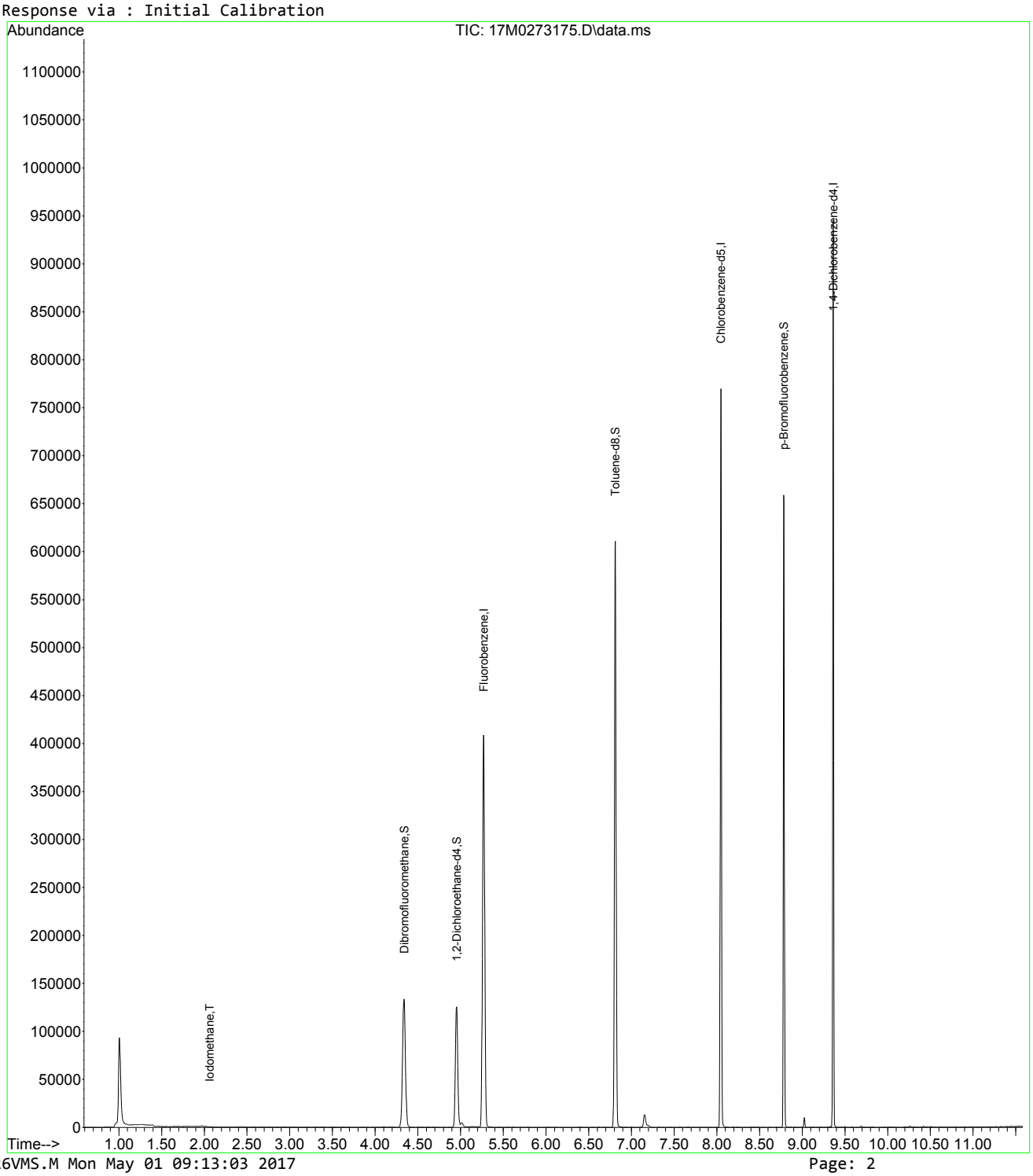
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	354974	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	260834	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	124070	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	95969	25.0334	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.134%			
34) 1,2-Dichloroethane-d4	4.953	65	92343	25.6983	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.793%			
47) Toluene-d8	6.812	98	329429	25.3070	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.228%			
66) p-Bromofluorobenzene	8.784	95	109140	26.2722	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.089%			
Target Compounds						Qvalue
13) Iodomethane	2.064	142	221	2.0413	ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

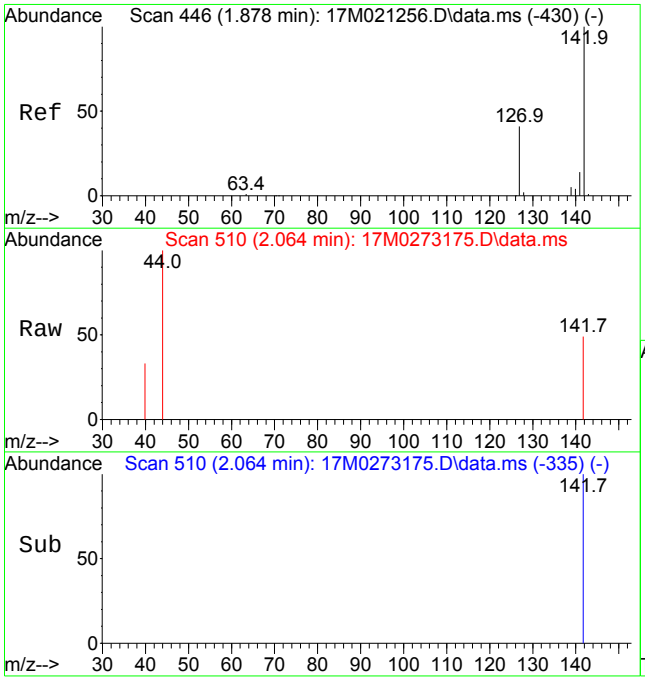
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273175.D Vial: 3
Acq On : 30 Apr 2017 15:48 Operator: ADC
Sample : WG612142-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



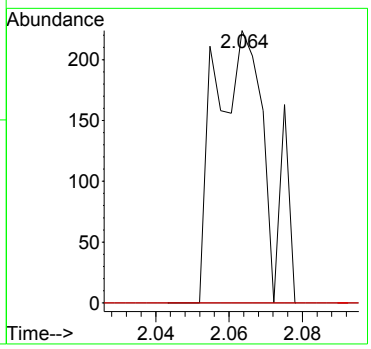
826VMS.M Mon May 01 09:13:03 2017 Page: 2



#13
Iodomethane
Concen: 2.0413 ug/L
RT: 2.064 min Scan# 510
Delta R.T. 0.006 min
Lab File: 17M0273175.D
Acq: 30 Apr 2017 15:48

Tgt Ion:142 Resp: 221

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273205.D Vial: 3
Acq On : 01 May 2017 12:49 Operator: ADC
Sample : WG612250-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

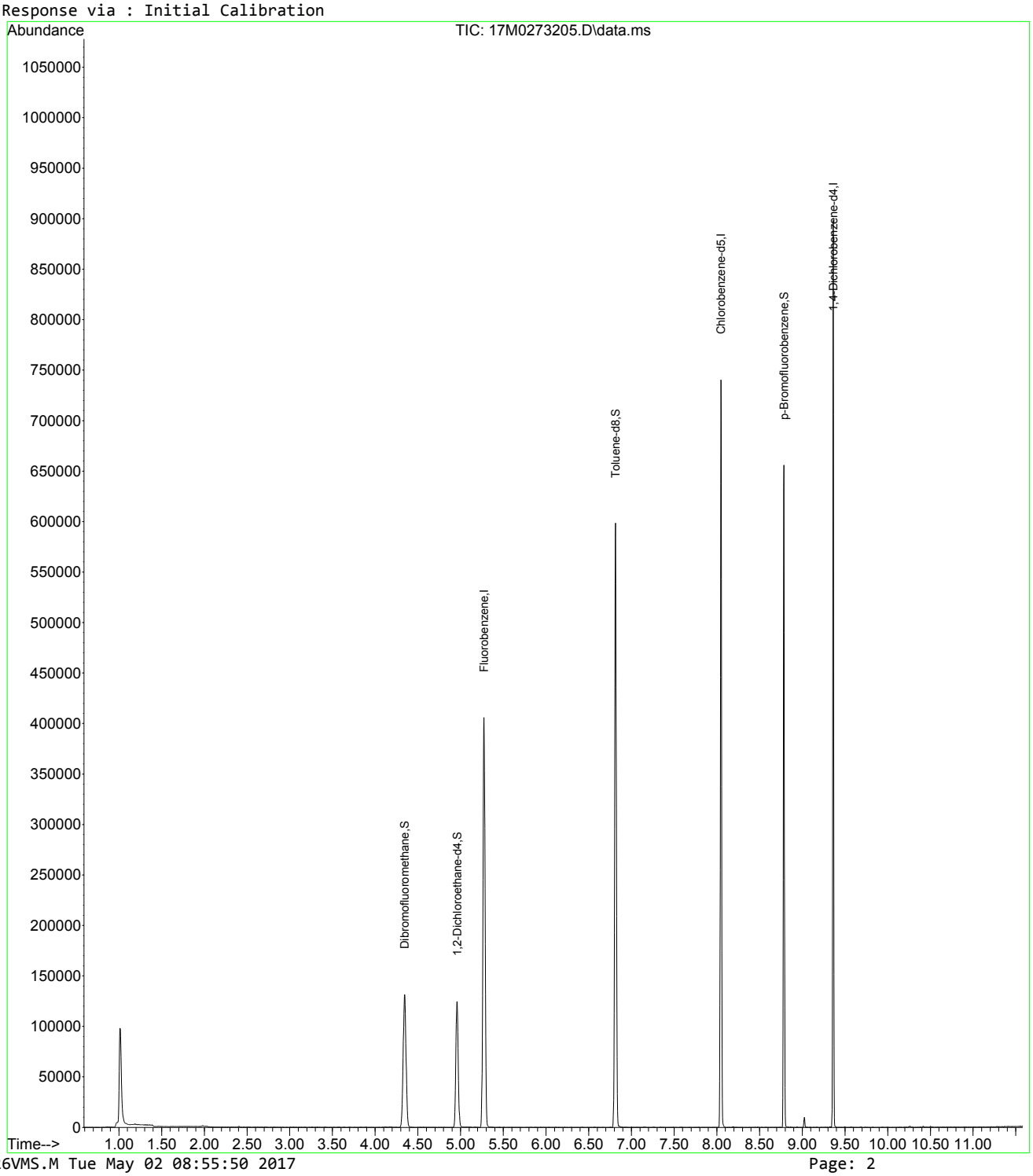
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	343255	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252656	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	119647	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	93704	25.2770	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.108%			
34) 1,2-Dichloroethane-d4	4.959	65	89932	25.8818	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.527%			
47) Toluene-d8	6.815	98	321845	25.5247	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.099%			
66) p-Bromofluorobenzene	8.786	95	106244	26.5205	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.082%			
Target Compounds						Qvalue

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273205.D Vial: 3
Acq On : 01 May 2017 12:49 Operator: ADC
Sample : WG612250-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 02 08:55:50 2017 Page: 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	355789	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	255038	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	143146	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	90834	25.7746	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.08%			
43) 1,2-Dichloroethane-d4	10.14	65	106893	26.1371	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.56%			
57) Toluene-d8	12.38	98	348435	26.3114	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.24%			
78) p-Bromofluorobenzene	15.54	95	129219	25.9717	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	100258	23.0850	ug/L	99
3) Chloromethane	3.66	50	78100	17.8015	ug/L	98
4) Vinyl Chloride	3.88	62	63200	20.6967	ug/L	98
5) 1,3-Butadiene	3.93	54	43411	24.4089	ug/L	98
6) Bromomethane	4.77	94	63617	20.1768	ug/L	98
7) Chloroethane	4.92	64	69051	21.8300	ug/L	99
8) Trichlorofluoromethane	5.41	101	112298	21.0500	ug/L	99
9) Diethyl ether	5.92	59	377474	95.6135	ug/L	97
10) Isoprene	5.96	67	102959	18.6289	ug/L	99
11) Acrolein	6.15	56	71039	113.1283	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	67912	21.4951	ug/L	97
13) Acetone	6.26	43	22499	18.9128	ug/L	94
14) 1,1-Dichloroethene	6.47	61	124824	19.6451	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	81266	182.6393	ug/L	98
16) Dimethyl Sulfide	6.72	62	96108	19.2540	ug/L	98
17) Iodomethane	6.97	142	63409	15.4016	ug/L	100
18) Methyl acetate	6.98	43	72369	19.2881	ug/L	97
19) Methylene Chloride	7.23	84	79132	18.6657	ug/L	92
20) Carbon Disulfide	7.27	76	153765	14.1536	ug/L	99
21) Acrylonitrile	7.40	53	33040	18.8045	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	201513	18.9814	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	72002	18.6214	ug/L	93
24) n-Hexane	7.73	57	102629	17.1134	ug/L	98
25) Diisopropyl ether	8.06	45	1612128	104.2742	ug/L	98
26) Vinyl Acetate	8.23	43	119078	16.4998	ug/L	99
27) 1,1-Dichloroethane	8.26	63	159412	19.5601	ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1306151	95.5784	ug/L	97
29) 2-Butanone	8.79	43	37585	19.3356	ug/L	97
30) Propionitrile	8.89	54	63554	98.0072	ug/L	100
31) 2,2-Dichloropropane	9.01	77	93890	17.0197	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	84785	19.5405	ug/L	99
33) Chloroform	9.26	83	133714	20.5529	ug/L	100
34) 1-Bromopropane	9.39	122	20024	23.2944	ug/L	96
35) Bromochloromethane	9.48	130	51233	19.2576	ug/L	93
36) Tetrahydrofuran	9.50	42	145624	91.9749	ug/L	97
38) 1,1,1-Trichloroethane	9.76	97	118385	20.6005	ug/L	99
39) Cyclohexane	9.79	56	138998	17.2016	ug/L	98
40) 1,1-Dichloropropene	9.95	75	97992	19.4560	ug/L	99
41) Carbon Tetrachloride	10.09	117	101391	20.3989	ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	1071343	97.1807	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17872.D 8260WT.M Sat Apr 29 20:46:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

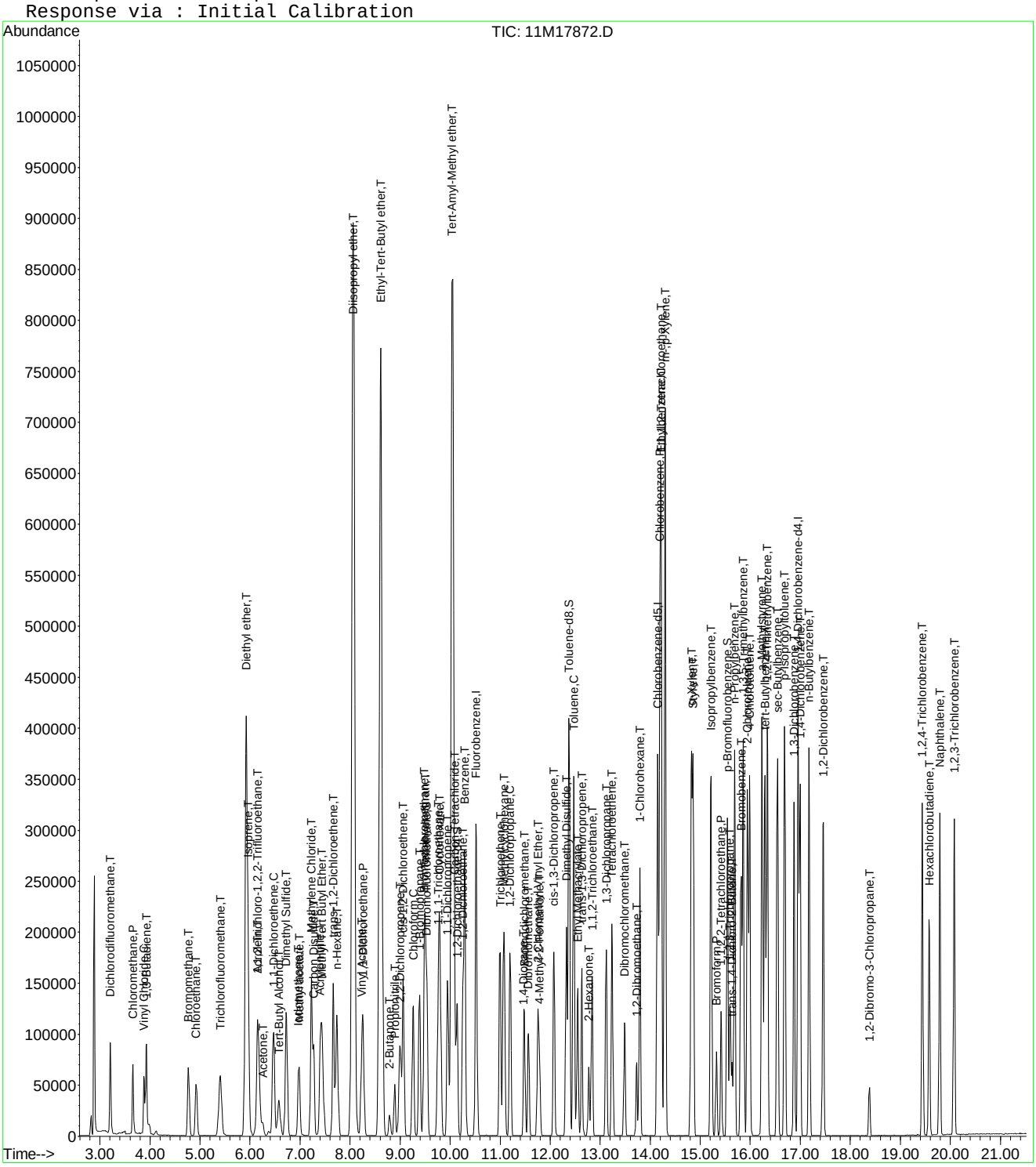
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	110027	19.7833	ug/L	99
45)	Benzene	10.29	78	304649	19.5247	ug/L	97
46)	Trichloroethene	11.00	130	77816	19.0262	ug/L	98
47)	Methylcyclohexane	11.07	83	114907	18.3248	ug/L	97
48)	1,2-Dichloropropane	11.20	63	94758	19.5129	ug/L	100
49)	1,4-Dioxane	11.47	88	7714	175.9051	ug/L	96
50)	Bromodichloromethane	11.49	83	97671	19.2781	ug/L	99
51)	Dibromomethane	11.56	93	45746	19.9141	ug/L	96
52)	2-Chloroethyl Vinyl Ether	11.76	63	55752	21.0135	ug/L	96
53)	4-Methyl-2-Pentanone	11.79	58	31638	18.5184	ug/L	97
54)	cis-1,3-Dichloropropene	12.08	75	123539	20.5516	ug/L	98
55)	Dimethyl Disulfide	12.32	79	69298	18.4701	ug/L	93
58)	Toluene	12.47	91	317224	19.2114	ug/L	97
59)	Ethyl Methacrylate	12.55	69	94980	20.9288	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	102510	19.6665	ug/L	98
61)	1,1,2-Trichloroethane	12.84	97	65002	18.6614	ug/L	98
62)	2-Hexanone	12.77	43	61444	21.2326	ug/L	96
63)	1,3-Dichloropropane	13.12	76	118460	20.4765	ug/L	97
64)	Tetrachloroethene	13.23	164	66863	20.3990	ug/L	100
65)	Dibromochloromethane	13.48	129	75136	19.3483	ug/L	99
66)	1,2-Dibromoethane	13.73	107	60134	19.2043	ug/L	100
67)	1-Chlorohexane	13.79	91	97291	20.6755	ug/L	96
68)	Chlorobenzene	14.20	112	204338	19.4596	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	73648	18.8386	ug/L	99
70)	Ethylbenzene	14.22	106	111484	20.0768	ug/L	85
71)	m-,p-Xylene	14.30	106	269991	40.6358	ug/L	89
72)	o-Xylene	14.83	106	133005	19.8675	ug/L	92
73)	Styrene	14.86	104	220340	22.2062	ug/L	98
74)	Bromoform	15.32	173	50521	18.1558	ug/L	98
75)	Isopropylbenzene	15.22	105	327159	20.0320	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	81150	18.0327	ug/L	100
79)	1,2,3-Trichloropropane	15.59	110	25379	19.6953	ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	21952	15.7554	ug/L	92
81)	n-Propylbenzene	15.69	91	392754	19.5761	ug/L	96
82)	Bromobenzene	15.82	156	95355	19.5298	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	281777	20.5292	ug/L	96
84)	2-Chlorotoluene	15.94	91	251647	18.4739	ug/L	86
85)	4-Chlorotoluene	15.99	91	242577	19.7304	ug/L	90
86)	a-Methylstyrene	16.23	118	160476	21.2133	ug/L	98
87)	tert-Butylbenzene	16.30	134	64162	19.2269	ug/L	96
88)	1,2,4-Trimethylbenzene	16.34	105	293274	20.4299	ug/L	95
89)	sec-Butylbenzene	16.54	105	352893	19.4673	ug/L	96
90)	p-Isopropyltoluene	16.69	119	308603	21.1866	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	174332	20.0724	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	174290	18.6593	ug/L	100
93)	n-Butylbenzene	17.17	91	278422	21.4310	ug/L	95
94)	1,2-Dichlorobenzene	17.46	146	173192	19.7617	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	15217	19.2720	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	134122	21.3163	ug/L	97
97)	Hexachlorobutadiene	19.58	225	63864	19.1377	ug/L	98
98)	Naphthalene	19.79	128	297018	21.1655	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	130077	20.2074	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17872.D 8260WT.M Sat Apr 29 20:46:31 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	358784	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	264980	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	135161	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	95308	24.5969	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.388%			
34) 1,2-Dichloroethane-d4	4.953	65	91014	25.0595	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.238%			
47) Toluene-d8	6.812	98	328495	24.8404	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.362%			
66) p-Bromofluorobenzene	8.783	95	109108	24.1093	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 96.437%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	105989	24.8739	ug/L	99
3) Chloromethane	1.215	50	92244	22.1204	ug/L	99
4) Vinyl Chloride	1.261	62	106504	23.0648	ug/L	100
5) 1,3-Butadiene	1.273	54	96974	34.2040	ug/L	98
6) Bromomethane	1.452	94	59015	17.1901	ug/L	99
7) Chloroethane	1.525	64	41681	19.0273	ug/L	91
8) Trichlorofluoromethane	1.606	101	121539	20.5197	ug/L	100
9) Diethyl ether	1.838	59	283754	99.3427	ug/L	97
10) 1,1-Dichloroethene	1.953	61	109025	19.6723	ug/L	97
11) Carbon Disulfide	1.968	76	192259	16.1634	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	75107	21.2572	ug/L	98
13) Iodomethane	2.055	142	98976	19.7784	ug/L	99
14) Acrolein	2.217	56	48450	137.3196	ug/L	99
15) Methylene Chloride	2.399	84	79629	18.9354	ug/L	96
16) Acetone	2.460	43	13695	18.9842	ug/L	96
17) trans-1,2-Dichloroethene	2.532	96	74381	19.7108	ug/L	98
18) Methyl acetate	2.567	43	39224	20.7400	ug/L #	96
19) Methyl Tert Butyl Ether	2.651	73	184931	19.3102	ug/L	98
20) 1,1-Dichloroethane	3.111	63	136713	20.1706	ug/L	100
21) Acrylonitrile	3.178	53	18296	19.8843	ug/L	100
22) Vinyl Acetate	2.605	86	11973	19.7138	ug/L	86
23) cis-1,2-Dichloroethene	3.728	96	82538	19.3229	ug/L	97
24) 2,2-Dichloropropane	3.858	77	111217	20.8727	ug/L	95
25) Cyclohexane	3.957	56	103331	17.9242	ug/L #	87
26) Bromochloromethane	3.977	130	54806	19.9140	ug/L	99
27) Chloroform	4.105	83	142318	20.1396	ug/L	100
28) Carbon Tetrachloride	4.244	117	109531	19.6008	ug/L	99
30) 1,1,1-Trichloroethane	4.342	97	126616	20.3798	ug/L	99
31) 1,1-Dichloropropene	4.501	75	96689	19.8163	ug/L	98
32) 2-Butanone	4.530	43	21866	20.3314	ug/L	98
33) Benzene	4.794	78	300683	19.6749	ug/L	99
35) 1,2-Dichloroethane	5.031	62	92576	19.4543	ug/L	99
36) Methylcyclohexane	5.422	83	109902	18.1957	ug/L	98
37) Trichloroethene	5.445	130	83290	18.1448	ug/L	98
38) Dibromomethane	5.856	93	46211	19.7426	ug/L	98
39) 1,2-Dichloropropane	5.963	63	79454	19.8251	ug/L	99
40) Bromodichloromethane	6.047	83	102809	19.2194	ug/L	99
41) 1,4-Dioxane	6.262	88	2730	136.7604	ug/L	96
42) 2-Chloroethyl Vinyl Ether	6.629	63	36550	20.1061	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	126327	20.9571	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19618	19.7013	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	100753	19.6610	ug/L	99
48) Toluene	6.855	91	330919	19.9192	ug/L	100
49) Tetrachloroethene	7.182	166	91450	19.2998	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	61972	19.2457	ug/L	99
51) Dibromochloromethane	7.507	129	83193	18.9280	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

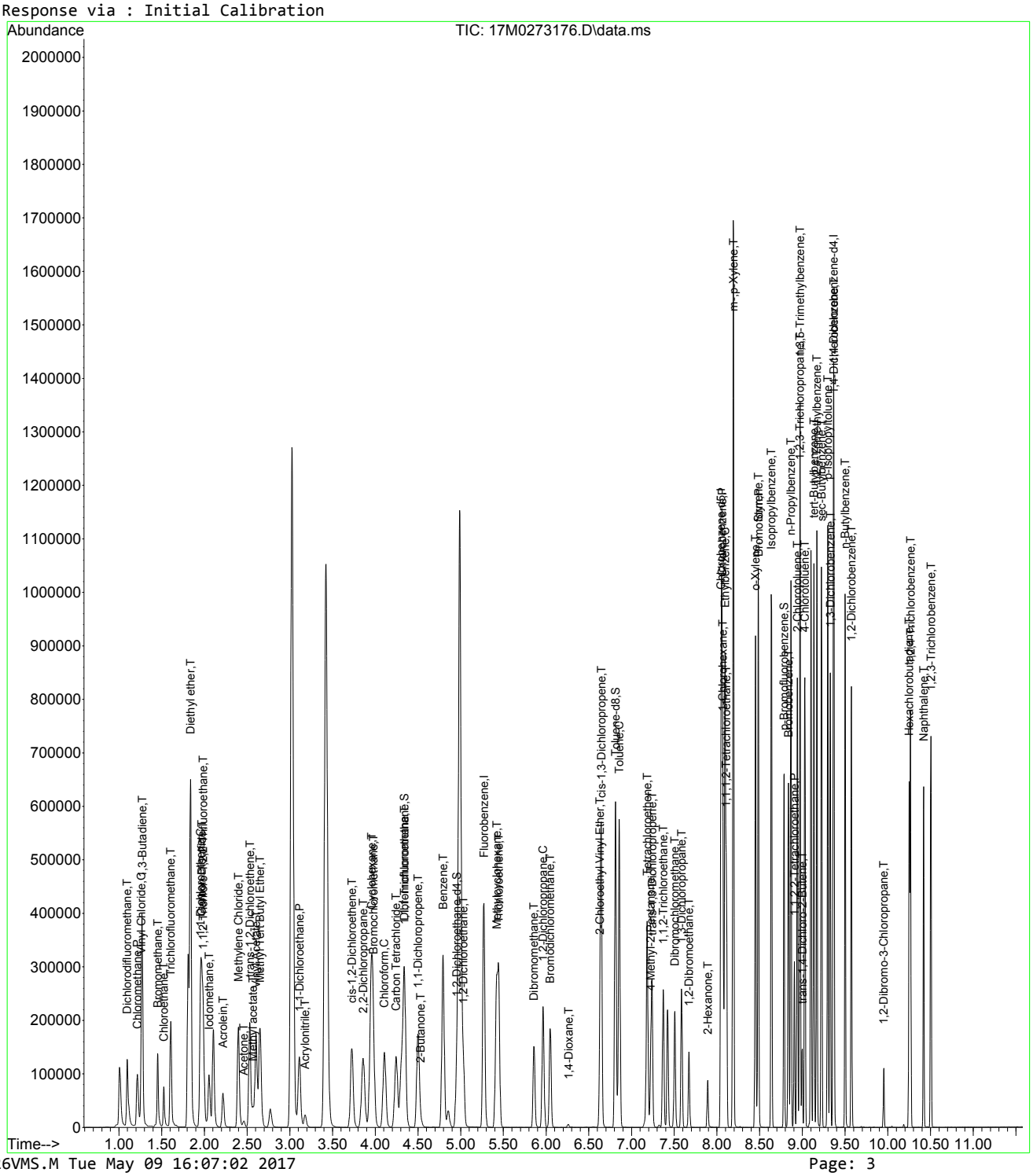
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.585	76	103621	20.2480	ug/L		97
53) 1,2-Dibromoethane	7.672	107	62887	19.0618	ug/L		100
54) 2-Hexanone	7.892	43	34786	20.5715	ug/L		98
55) Chlorobenzene	8.060	112	211839	19.0043	ug/L		96
56) 1-Chlorohexane	8.068	69	18508	20.5654	ug/L		96
57) Ethylbenzene	8.094	106	115210	19.8554	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.109	131	81366	18.7515	ug/L		99
59) m-,p-Xylene	8.193	106	277495	39.6264	ug/L		97
60) o-Xylene	8.451	106	133128	19.2946	ug/L		97
61) Styrene	8.482	104	223332	20.2292	ug/L		99
62) Bromoform	8.485	173	58909	19.0532	ug/L		99
63) Isopropylbenzene	8.636	105	344865	19.3098	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	297315	19.7321	ug/L		98
67) Bromobenzene	8.836	156	99105	18.6403	ug/L		99
68) n-Propylbenzene	8.865	91	392928	19.6863	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	76517	21.0459	ug/L		100
70) 2-Chlorotoluene	8.940	91	235999	19.1562	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20770	19.3245	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	13936	17.3935	ug/L	#	92
73) 1,2,4-Trimethylbenzene	9.169	105	299476	19.7106	ug/L		99
74) 4-Chlorotoluene	9.030	91	245214	19.9371	ug/L		98
75) tert-Butylbenzene	9.134	134	58132	19.3043	ug/L		100
76) sec-Butylbenzene	9.224	105	363896	19.6036	ug/L		99
77) p-Isopropyltoluene	9.296	119	311969	19.7151	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	176679	19.0622	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	175483	18.7533	ug/L		100
80) n-Butylbenzene	9.499	91	270858	20.2805	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	170808	18.9090	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13431	20.1368	ug/L		92
83) Hexachlorobutadiene	10.249	225	66547	17.4754	ug/L		100
84) 1,2,4-Trichlorobenzene	10.266	180	125697	18.7315	ug/L		100
85) Naphthalene	10.419	128	237017	18.1128	ug/L		100
86) 1,2,3-Trichlorobenzene	10.503	180	117996	18.1028	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 16:07:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	354875	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	263010	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	132028	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	98833	25.7876	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.150%			
34) 1,2-Dichloroethane-d4	4.962	65	93168	25.9351	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.740%			
47) Toluene-d8	6.812	98	344447	26.2418	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.967%			
66) p-Bromofluorobenzene	8.786	95	120621	27.2858	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.143%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	104577	24.8129	ug/L	100
3) Chloromethane	1.224	50	90184	21.8646	ug/L	100
4) Vinyl Chloride	1.270	62	105866	23.1792	ug/L	99
5) 1,3-Butadiene	1.282	54	95528	34.0651	ug/L	98
6) Bromomethane	1.464	94	58134	17.1200	ug/L	98
7) Chloroethane	1.536	64	44277	20.4350	ug/L	95
8) Trichlorofluoromethane	1.623	101	123108	21.0136	ug/L	100
9) Diethyl ether	1.843	59	288688	102.1834	ug/L	97
10) 1,1-Dichloroethene	1.968	61	111351	20.3133	ug/L	96
11) Carbon Disulfide	1.979	76	196097	16.6677	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	76779	21.9698	ug/L	98
13) Iodomethane	2.066	142	106711	21.3788	ug/L	99
14) Acrolein	2.223	56	47371	135.7403	ug/L	99
15) Methylene Chloride	2.408	84	81349	19.5574	ug/L	96
16) Acetone	2.469	43	11848	16.6048	ug/L	96
17) trans-1,2-Dichloroethene	2.541	96	73185	19.6075	ug/L	99
18) Methyl acetate	2.576	43	35672	19.0697	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	185778	19.6123	ug/L #	44
20) 1,1-Dichloroethane	3.120	63	135567	20.2219	ug/L	100
21) Acrylonitrile	3.187	53	17650	19.3935	ug/L	97
22) Vinyl Acetate	2.616	86	12292	20.4620	ug/L	91
23) cis-1,2-Dichloroethene	3.734	96	81479	19.2851	ug/L	97
24) 2,2-Dichloropropane	3.867	77	111449	21.1431	ug/L	96
25) Cyclohexane	3.969	56	103292	18.1148	ug/L #	87
26) Bromochloromethane	3.983	130	54494	20.0187	ug/L	100
27) Chloroform	4.116	83	140305	20.0735	ug/L	99
28) Carbon Tetrachloride	4.255	117	109574	19.8245	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	124641	20.2829	ug/L	99
31) 1,1-Dichloropropene	4.507	75	94236	19.5263	ug/L	98
32) 2-Butanone	4.533	43	19710	18.5285	ug/L	100
33) Benzene	4.800	78	295801	19.5687	ug/L	99
35) 1,2-Dichloroethane	5.034	62	92976	19.7536	ug/L	99
36) Methylcyclohexane	5.425	83	110958	18.5728	ug/L	98
37) Trichloroethene	5.448	130	82208	18.1063	ug/L	98
38) Dibromomethane	5.862	93	45743	19.7579	ug/L	98
39) 1,2-Dichloropropane	5.969	63	78284	19.7483	ug/L	100
40) Bromodichloromethane	6.050	83	101549	19.1930	ug/L	100
41) 1,4-Dioxane	6.265	88	1419	71.8684	ug/L	96
42) 2-Chloroethyl Vinyl Ether	6.629	63	33033	18.3715	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	125770	21.0945	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19037	19.3284	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	99069	19.5454	ug/L	100
48) Toluene	6.858	91	326300	19.7883	ug/L	99
49) Tetrachloroethene	7.185	166	90666	19.2776	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	61709	19.3076	ug/L	99
51) Dibromochloromethane	7.507	129	82619	18.9382	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

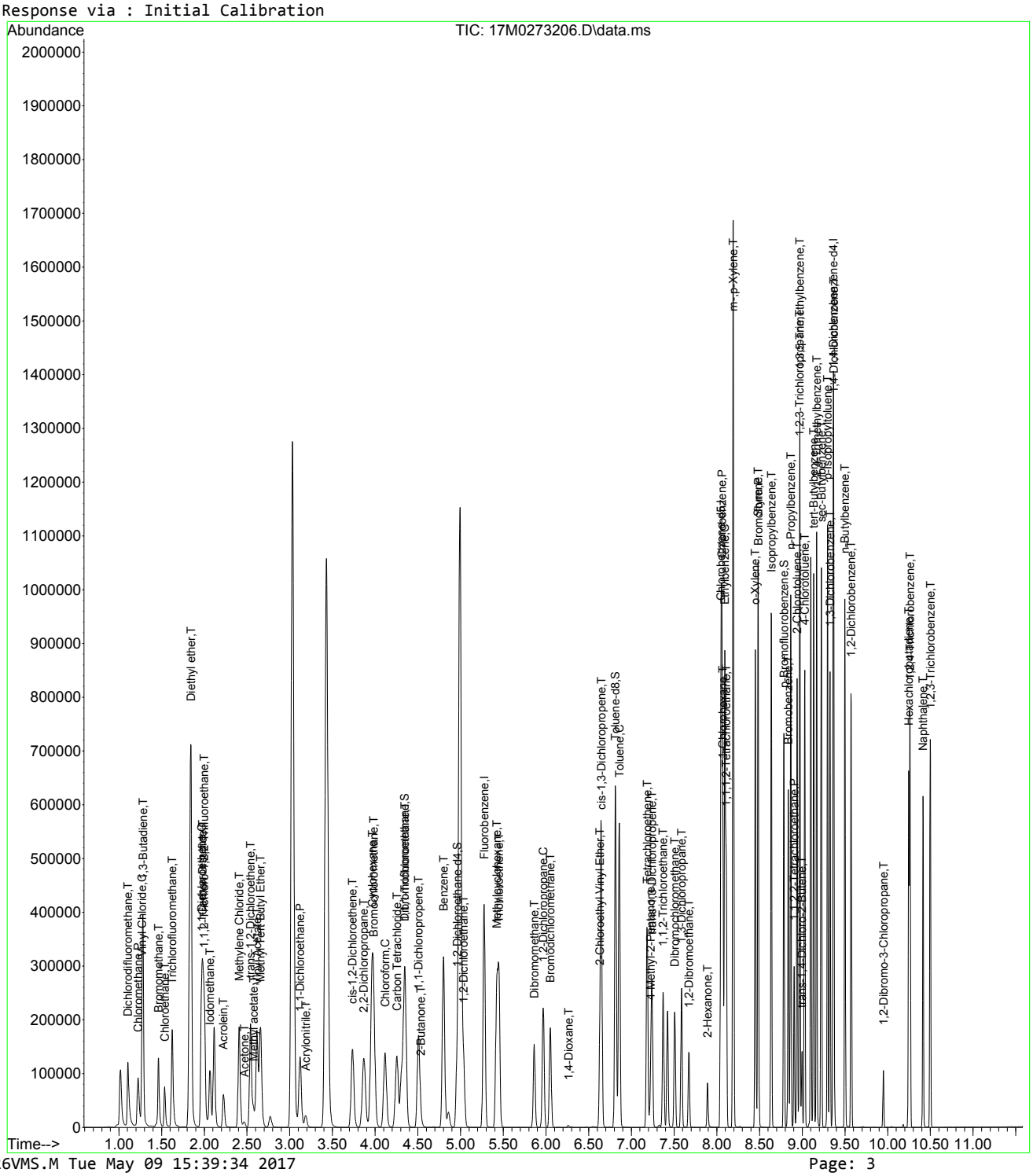
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	102640	20.2065	ug/L		97
53) 1,2-Dibromoethane	7.675	107	62711	19.1508	ug/L		100
54) 2-Hexanone	7.892	43	33888	20.1906	ug/L		96
55) Chlorobenzene	8.060	112	211073	19.0774	ug/L		97
56) 1-Chlorohexane	8.071	69	18525	20.7385	ug/L		98
57) Ethylbenzene	8.094	106	112550	19.5423	ug/L		95
58) 1,1,1,2-Tetrachloroethane	8.109	131	81393	18.8982	ug/L		99
59) m-,p-Xylene	8.193	106	272544	39.2109	ug/L		96
60) o-Xylene	8.451	106	131361	19.1811	ug/L		98
61) Styrene	8.482	104	221760	20.2373	ug/L		99
62) Bromoform	8.485	173	58626	19.1037	ug/L		99
63) Isopropylbenzene	8.639	105	336599	18.9881	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	292810	19.8942	ug/L		99
67) Bromobenzene	8.836	156	98415	18.9498	ug/L		99
68) n-Propylbenzene	8.865	91	390423	20.0250	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	75634	21.2967	ug/L		100
70) 2-Chlorotoluene	8.940	91	234285	19.4684	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20395	19.4259	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	13802	17.6350	ug/L	#	90
73) 1,2,4-Trimethylbenzene	9.169	105	297281	20.0304	ug/L		99
74) 4-Chlorotoluene	9.030	91	243127	20.2365	ug/L		99
75) tert-Butylbenzene	9.134	134	56806	19.3116	ug/L		98
76) sec-Butylbenzene	9.224	105	358908	19.7937	ug/L		99
77) p-Isopropyltoluene	9.296	119	308489	19.9578	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	175741	19.4109	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	175298	19.1781	ug/L		100
80) n-Butylbenzene	9.499	91	268600	20.5887	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	170880	19.3659	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	12506	19.1949	ug/L		95
83) Hexachlorobutadiene	10.246	225	67604	18.1742	ug/L		99
84) 1,2,4-Trichlorobenzene	10.263	180	124860	19.0483	ug/L		100
85) Naphthalene	10.414	128	231309	18.0961	ug/L		99
86) 1,2,3-Trichlorobenzene	10.500	180	117705	18.4866	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:34 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	346601	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	258540	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129780	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	94852	25.3397	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.359%			
34) 1,2-Dichloroethane-d4	4.950	65	90468	25.7847	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.139%			
47) Toluene-d8	6.809	98	328663	25.4722	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.889%			
66) p-Bromofluorobenzene	8.784	95	110409	25.4083	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.633%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.094	85	101223	24.5904	ug/L	100
3) Chloromethane	1.209	50	92191	22.8848	ug/L	99
4) Vinyl Chloride	1.256	62	104947	23.5265	ug/L	100
5) 1,3-Butadiene	1.267	54	94386	34.4613	ug/L	97
6) Bromomethane	1.450	94	58983	17.7847	ug/L	100
7) Chloroethane	1.522	64	41596	19.6559	ug/L	95
8) Trichlorofluoromethane	1.606	101	120959	21.1396	ug/L	99
9) Diethyl ether	1.832	59	287200	104.0835	ug/L	98
10) 1,1-Dichloroethene	1.951	61	109306	20.4163	ug/L	97
11) Carbon Disulfide	1.965	76	192856	16.7835	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.982	101	73598	21.5623	ug/L	99
13) Iodomethane	2.052	142	105222	21.5645	ug/L	100
14) Acrolein	2.214	56	48344	141.8354	ug/L	99
15) Methylene Chloride	2.394	84	79967	19.6841	ug/L	95
16) Acetone	2.454	43	12144	17.4259	ug/L	97
17) trans-1,2-Dichloroethene	2.527	96	73116	20.0566	ug/L	98
18) Methyl acetate	2.564	43	37783	20.6803	ug/L #	96
19) Methyl Tert Butyl Ether	2.646	73	186149	20.1206	ug/L	98
20) 1,1-Dichloroethane	3.106	63	136050	20.7784	ug/L	99
21) Acrylonitrile	3.175	53	18096	20.3582	ug/L	99
22) Vinyl Acetate	2.602	86	11896	20.2755	ug/L	94
23) cis-1,2-Dichloroethene	3.720	96	82719	20.0460	ug/L	98
24) 2,2-Dichloropropane	3.853	77	110932	21.5421	ug/L	96
25) Cyclohexane	3.954	56	103005	18.4957	ug/L #	87
26) Bromochloromethane	3.972	130	54771	20.6008	ug/L	100
27) Chloroform	4.102	83	141783	20.7691	ug/L	100
28) Carbon Tetrachloride	4.241	117	110653	20.4976	ug/L	99
30) 1,1,1-Trichloroethane	4.336	97	125741	20.9504	ug/L	99
31) 1,1-Dichloropropene	4.496	75	96048	20.3769	ug/L	98
32) 2-Butanone	4.525	43	20334	19.5714	ug/L	98
33) Benzene	4.791	78	300186	20.3328	ug/L	100
35) 1,2-Dichloroethane	5.028	62	93258	20.2865	ug/L	99
36) Methylcyclohexane	5.419	83	108894	18.6625	ug/L	97
37) Trichloroethene	5.442	130	82955	18.7070	ug/L	98
38) Dibromomethane	5.856	93	46079	20.3782	ug/L	99
39) 1,2-Dichloropropane	5.964	63	79375	20.5015	ug/L	99
40) Bromodichloromethane	6.045	83	102197	19.7766	ug/L	100
41) 1,4-Dioxane	6.259	88	2152	111.5946	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	34045	19.3864	ug/L	99
43) cis-1,3-Dichloropropene	6.644	75	127621	21.9159	ug/L	99
44) 4-Methyl-2-Pentanone	7.223	58	19930	20.7181	ug/L	96
45) trans-1,3-Dichloropropene	7.238	75	101787	20.5610	ug/L	99
48) Toluene	6.855	91	330447	20.3863	ug/L	100
49) Tetrachloroethene	7.183	166	91889	19.8755	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	62533	19.9037	ug/L	99
51) Dibromochloromethane	7.504	129	83570	19.4874	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

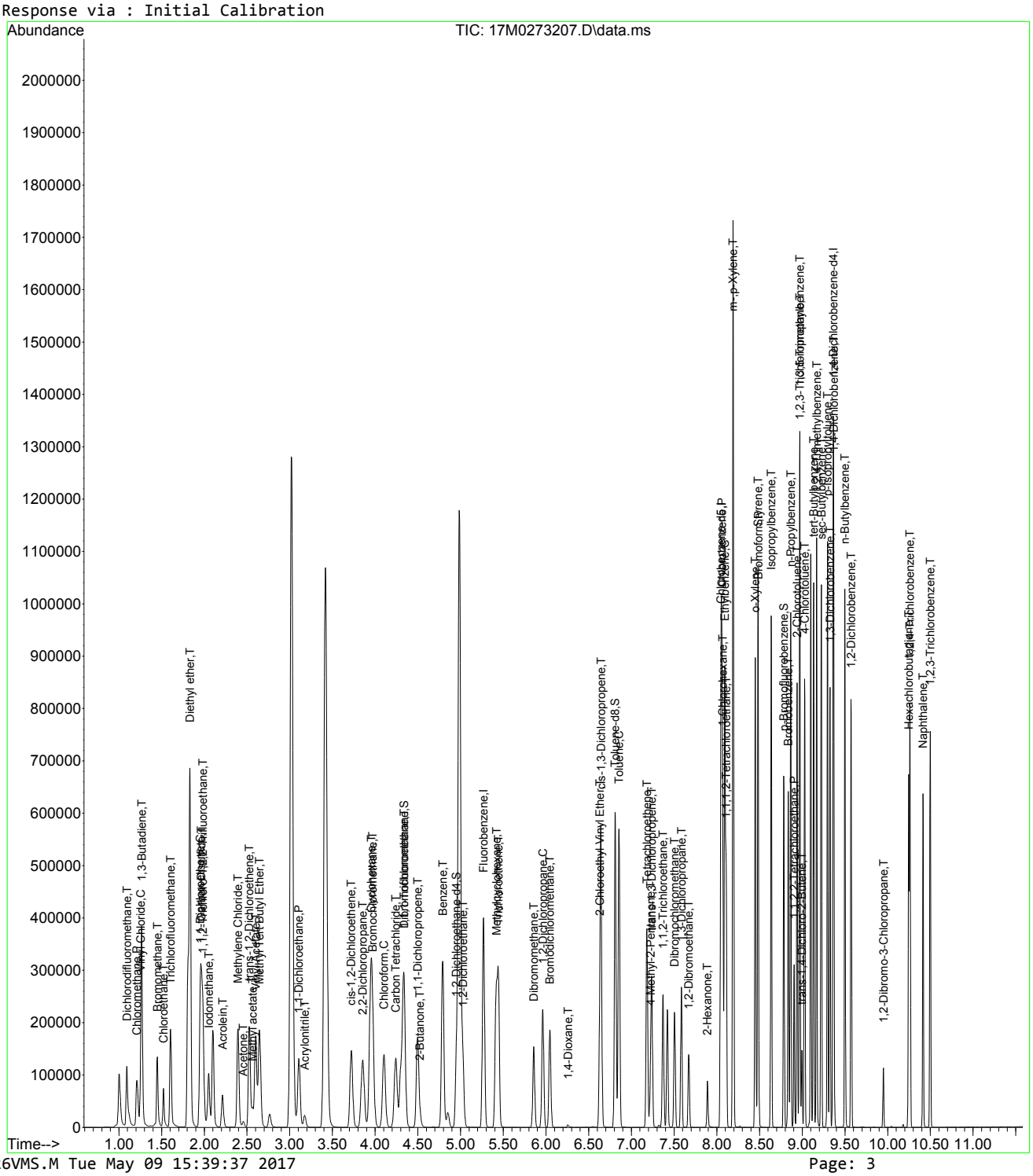
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.585	76	104788	20.9861	ug/L		97
53) 1,2-Dibromoethane	7.672	107	63042	19.5848	ug/L		100
54) 2-Hexanone	7.889	43	34738	21.0549	ug/L		97
55) Chlorobenzene	8.060	112	212878	19.5732	ug/L		96
56) 1-Chlorohexane	8.068	69	19042	21.6858	ug/L		96
57) Ethylbenzene	8.095	106	114113	20.1563	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.109	131	82105	19.3931	ug/L		99
59) m-,p-Xylene	8.190	106	275998	40.3943	ug/L		96
60) o-Xylene	8.451	106	133395	19.8148	ug/L		98
61) Styrene	8.482	104	223947	20.7902	ug/L		99
62) Bromoform	8.485	173	59444	19.7051	ug/L		99
63) Isopropylbenzene	8.636	105	344077	19.7455	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	297248	20.5456	ug/L		99
67) Bromobenzene	8.836	156	99235	19.4386	ug/L		100
68) n-Propylbenzene	8.865	91	392898	20.5010	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	77760	22.2746	ug/L		100
70) 2-Chlorotoluene	8.940	91	236253	19.9720	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20983	20.3322	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	13981	18.1732	ug/L	#	94
73) 1,2,4-Trimethylbenzene	9.169	105	300256	20.5813	ug/L		99
74) 4-Chlorotoluene	9.027	91	246027	20.8325	ug/L		99
75) tert-Butylbenzene	9.134	134	56983	19.7073	ug/L		97
76) sec-Butylbenzene	9.224	105	362281	20.3258	ug/L		99
77) p-Isopropyltoluene	9.296	119	312830	20.5893	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	177861	19.9853	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	178305	19.8449	ug/L		100
80) n-Butylbenzene	9.499	91	272201	21.2262	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	172110	19.8431	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13245	20.6813	ug/L		93
83) Hexachlorobutadiene	10.246	225	67475	18.4537	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	127181	19.7384	ug/L		99
85) Naphthalene	10.414	128	242294	19.2838	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	120665	19.2798	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:37 2017 Page: 3

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 25, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BNB – Brandi N. Bentley
BRG – BRENDA R. GREGORY	CAS – Craig A. Smith
CEB – CHAD E. BARNES	CLC – CHRYS L. CRAWFORD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	REK – BOB E. KYER
RLB – BOB BUCHANAN	RNP – RICK N. PETTY
SAV – SARAH A. VANDENBERG	SCA – SUEELLEN C. ADAMS
SCB – SARAH C. BOGOLIN	SCJ – SUE ELLEN C. JOHNSON
SDC – SHALYN D. CONLEY	TB – TODD BOYLE
TMB – TIFFANY M. BAILEY	TMM – TAMMY M. MORRIS
VC – VICKI COLLIER	WTD – WADE T. DELONG
XXX – UNAVAILABLE OR SUBCONTRACT	ZTB – ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 25, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 1
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112	PO #:			
Phone: 404-295-3279	WO #:			
Email: thomas.holmes@hdrinc.com	Project #:			
Project Name: LTM 2017 Main Installation	SSOW#:			
Site: DDMT				

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-209B-LS-25	4/22/17	0830	G	W	N		x		
✓ MW-209A-LS-25	4/22/17	0835	G	W	N		x		
✓ MW-273-LS-25	4/22/17	0905	G	W	N		x		
✓ MW-219-LS-25	4/22/17	0920	G	W	N		x		
✓ MW-269-LS-25	4/22/17	0930	G	W	N		x		
✓ DR2-5-LS-25	4/22/17	0745	G	W	N		x		
✓ PMW101-02A-LS-24	4/24/17	1215	G	W	N		x		
✓ LTM-TB5-LS-25	4/24/17	1600	G	W	N		x		
✓ EB1-LS-25	4/22/17	~~1630~~ 1430	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For _____ Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:
Relinquished by:	Date/Time: 4/24/17 1610	Company HDR	Received by:
Relinquished by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	

Custody Seals Intact: ∆ Yes ∆ No | Custody Seal No.:

Microbac OVD
Received: 04/25/2017 10:39
By: BRENDA GREGORY 221000099951

Brenda Gregory

MICROBAC

Cooler ID 9951

COOLER TEMP >6° C LOG

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

OAD 4/25/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

OAD 4/25/17

PRESERVATIVE EXCEPTIONS

☑ NONE

☐ AS NOTED

OAD 4/25/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041209
Account: 2694
Project: 2694.011
Samples: 9
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041209-01	898881	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:51	BRG		
2	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Samplenum	Container ID	Products
L17041209-02	898882	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041209
Account: 2694
Project: 2694.011
Samples: 9
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041209-03	898883	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041209-04	898884	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041209
Account: 2694
Project: 2694.011
Samples: 9
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041209-05	898885	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041209-06	898886	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:51	BRG		
2	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041209
Account: 2694
Project: 2694.011
Samples: 9
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041209-07	898887	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041209-08	898888	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041209
Account: 2694
Project: 2694.011
Samples: 9
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041209-09	898889	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:51	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:25	HRF	CLS	
3	STORE	ORG4	A2	10-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100514 *(Revised)*

Revised reports to exclude 1,4-dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 23 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100514
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: MW-163-ODLS-15. Both voa vials were received with the lids cracked but samples are intact. BRG	Client notified, please proceed. ALS
Sample ID: DR1-6A-LA-26. All 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-100B-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-21-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DUP-6-LA-26. All 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-165-ODLS-15. 2 of 3 voa vials received w/headspace >6mm. BRG Sample ID: PMW21-01-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DUP-1-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DR1-5-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: TB-1-ODLS-15. 2 of 3 voa vials received w/headspace >6mm. BRG	Client notified, when possible please proceed with analyzing vials without headspace first. ALS

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
0017448	H	0.0		1001893710910004575000787993011515	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	No
7	Were sample labels intact and match COC?	Yes

8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17100514
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
DR2-1-LA-26	L17100514-01	10/06/2017 12:47	10/07/2017 09:47
PW101-06A-LA-26	L17100514-02	10/06/2017 14:35	10/07/2017 09:47
PMW101-07B-LA-26	L17100514-04	10/06/2017 14:55	10/07/2017 09:47
PMW101-03B-LA-26	L17100514-05	10/06/2017 14:10	10/07/2017 09:47
MW101T-LA-26	L17100514-06	10/06/2017 13:35	10/07/2017 09:47
PMW101-02B-LA-26	L17100514-07	10/06/2017 13:55	10/07/2017 09:47
MW101B-LA-26	L17100514-08	10/06/2017 13:40	10/07/2017 09:47
MW-100B-LA-26	L17100514-09	10/06/2017 15:21	10/07/2017 09:47
PMW21-04-LA-26	L17100514-10	10/06/2017 15:04	10/07/2017 09:47
MW-21-LA-26	L17100514-11	10/06/2017 14:29	10/07/2017 09:47
PMW101-06B-LA-26	L17100514-12	10/06/2017 14:45	10/07/2017 09:47
PMW101-03A-LA-26	L17100514-13	10/06/2017 14:05	10/07/2017 09:47
DR1-6-LA-26	L17100514-14	10/06/2017 15:05	10/07/2017 09:47
DR1-6-LA-26-MS	L17100514-15	10/06/2017 15:05	10/07/2017 09:47
DR1-6-LA-26-MSD	L17100514-16	10/06/2017 15:05	10/07/2017 09:47
DUP-6-LA-26	L17100514-17	10/06/2017 15:26	10/07/2017 09:47
PMW21-02-LA-26	L17100514-18	10/06/2017 12:45	10/07/2017 09:47
DR1-3-LA-26	L17100514-19	10/06/2017 15:20	10/07/2017 09:47
PMW21-03-LA-26	L17100514-20	10/06/2017 14:50	10/07/2017 09:47
DUP-2-LA-26	L17100514-21	10/06/2017 12:57	10/07/2017 09:47
DR1-5A-LA-26	L17100514-22	10/06/2017 12:55	10/07/2017 09:47
PMW21-01-LA-26	L17100514-23	10/06/2017 14:00	10/07/2017 09:47
DUP-1-LA-26	L17100514-24	10/06/2017 13:05	10/07/2017 09:47
DR1-4-LA-26	L17100514-25	10/06/2017 15:15	10/07/2017 09:47
PMW101-07A-LA-26	L17100514-26	10/06/2017 14:50	10/07/2017 09:47
DR1-5-LA-26	L17100514-27	10/06/2017 13:00	10/07/2017 09:47
MW-279-LA-26	L17100514-28	10/06/2017 13:20	10/07/2017 09:47
PMW101-04B-LA-26	L17100514-29	10/06/2017 14:30	10/07/2017 09:47
PMW101-04A-LA-26	L17100514-30	10/06/2017 14:20	10/07/2017 09:47
PMW101-02A-LA-26	L17100514-31	10/06/2017 13:50	10/07/2017 09:47

Login Number: L17100514
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above range were observed for Chloromethane and Dichlorodifluoromethane in the ICV analyzed 10/10/2017 on HPMS6. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recovery below range was observed for Chloromethane in the CCV analyzed 10/12/2017 on HPMS8. Recovery above the range was observed for Dichlorodifluoromethane in the CCV WG634167-02 analyzed 10/17/2017 on HPMS6. Recovery above the range was observed for Dichlorodifluoromethane in the CCV WG634399-02 analyzed 10/17/2017 on HPMS6. Dichlorodifluoromethane was below the RL for all associated samples. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 10 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130590
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100514-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:24
Collect Date:	10/06/2017 12:47	**Dilution:**	1	**File ID:**	8M422131
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	24.5		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.51		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.84		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	150		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	88.3	72	119	
Toluene-d8	95.6	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PW101-06A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 21:21
Collect Date:	10/06/2017 14:35	**Dilution:**	1	**File ID:**	8M422097
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.263	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	22.6		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	93.5	85	115	
1,2-Dichloroethane-d4	91.1	72	119	
Toluene-d8	95.6	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-07B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 22:21
Collect Date:	10/06/2017 14:55	**Dilution:**	1	**File ID:**	8M422099
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.51	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.33		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.853	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.08		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	89.1	85	115	
1,2-Dichloroethane-d4	85.6	72	119	
Toluene-d8	97.4	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-03B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 00:47
Collect Date:	10/06/2017 14:10	**Dilution:**	1	**File ID:**	8M422104
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.139	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.317	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	8.34		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.696	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	43.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.3	85	115	
1,2-Dichloroethane-d4	85.3	72	119	
Toluene-d8	95.7	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW101T-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 01:16
Collect Date:	10/06/2017 13:35	**Dilution:**	1	**File ID:**	8M422105
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.39	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	26.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.0	85	115	
1,2-Dichloroethane-d4	86.2	72	119	
Toluene-d8	95.4	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-02B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 22:50
Collect Date:	10/06/2017 13:55	**Dilution:**	1	**File ID:**	8M422100
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.72	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.88		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.60		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.58		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.7	85	115	
1,2-Dichloroethane-d4	83.3	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW101B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:53
Collect Date:	10/06/2017 13:40	**Dilution:**	1	**File ID:**	8M422132
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.95	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.9	85	115	
1,2-Dichloroethane-d4	86.1	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-100B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 23:19
Collect Date:	10/06/2017 15:21	**Dilution:**	1	**File ID:**	8M422101
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.541	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	3.02		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	46.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.26		1.00	0.250
Toluene	108-88-3	1.36		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.696	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	166		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.7	85	115	
1,2-Dichloroethane-d4	86.9	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-04-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 00:17
Collect Date:	10/06/2017 15:04	**Dilution:**	1	**File ID:**	8M422103
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.79	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.151	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	39.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	73.7		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	146		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	291	J	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	3.90		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	85.9	72	119	
Toluene-d8	96.9	81	120	
4-Bromofluorobenzene	99.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-04-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:23
Collect Date:	10/06/2017 15:04	**Dilution:**	5	**File ID:**	8M422133
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1,4-Dioxane			U	500	250
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1		U	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Bromomethane	74-83-9		U	5.00	2.50
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		Q	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	36.7		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4	72.1		25.0	2.50
MEK (2-Butanone)	78-93-3		U	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	139		5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4	270		5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5	3.49	F	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.8	85	115	
1,2-Dichloroethane-d4	90.0	72	119	
Toluene-d8	96.2	81	120	

Certificate of Analysis

Surrogate	Recovery	Lower Limit	Upper Limit	Q
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-21-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:49
Collect Date:	10/06/2017 14:29	**Dilution:**	1	**File ID:**	8M422140
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.94	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	136		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.49	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.413	F	1.00	0.250
Toluene	108-88-3	5.45		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.265	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.4	85	115	
1,2-Dichloroethane-d4	88.5	72	119	
Toluene-d8	96.4	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-06B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:51
Collect Date:	10/06/2017 14:45	**Dilution:**	1	**File ID:**	8M422134
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.298	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.714	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.22		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	28.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	92.3	85	115	
1,2-Dichloroethane-d4	91.9	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-03A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:21
Collect Date:	10/06/2017 14:05	**Dilution:**	1	**File ID:**	8M422135
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.17		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	16.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.65		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	91.5	85	115	
1,2-Dichloroethane-d4	91.5	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 17:54
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422130
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.79	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.158	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.58		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.3	85	115	
1,2-Dichloroethane-d4	86.4	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 14:30
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422123
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.9		1.00	0.250
1,1-Dichloroethane	75-34-3	16.8		1.00	0.125
1,1-Dichloroethene	75-35-4	17.3		1.00	0.500
1,1-Dichloropropene	563-58-6	22.1		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.6		1.00	0.150
1,2,3-Trichloropropane	96-18-4	22.3		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.4		1.00	0.250
1,2-Dichloroethane	107-06-2	19.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.4		1.00	0.200
1,2-Dibromoethane	106-93-4	22.9		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.9		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.2		0.500	0.125
1-Chlorohexane	544-10-5	19.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	19.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	19.9		1.00	0.250
Acetone	67-64-1	26.4		10.0	2.50
Benzene	71-43-2	21.9		0.400	0.125
Bromobenzene	108-86-1	20.0		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	21.1		0.500	0.250
Bromoform	75-25-2	19.2		1.00	0.500
Bromomethane	74-83-9	15.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.9		1.00	0.500
Carbon tetrachloride	56-23-5	19.8		1.00	0.250
Chlorobenzene	108-90-7	20.7		0.500	0.125
Chloroethane	75-00-3	20.7		1.00	0.500
Chloroform	67-66-3	18.4		0.300	0.125
Chloromethane	74-87-3	19.1	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	17.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.6		0.500	0.250
Dibromochloromethane	124-48-1	20.6		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.7		1.00	0.250
Ethylbenzene	100-41-4	20.8		1.00	0.250
Hexachlorobutadiene	87-68-3	16.9		0.600	0.250
Isopropylbenzene	98-82-8	20.5		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	19.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.8		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	20.3		1.00	0.125
m-,p-Xylene	179601-23-1	42.7		2.00	0.500
Naphthalene	91-20-3	23.4		1.00	0.200
o-Xylene	95-47-6	21.9		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	20.5		1.00	0.250
Styrene	100-42-5	22.4		1.00	0.125
Trichloroethene	79-01-6	22.1		1.00	0.250
tert-Butylbenzene	98-06-6	19.4		1.00	0.250
Tetrachloroethene	127-18-4	26.5		1.00	0.250
Toluene	108-88-3	20.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	16.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	20.2		1.00	0.250
Vinyl chloride	75-01-4	23.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.7	85	115	
1,2-Dichloroethane-d4	84.7	72	119	
Toluene-d8	96.7	81	120	
4-Bromofluorobenzene	100	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100514-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 14:59
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422124
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.9		1.00	0.250
1,1-Dichloroethane	75-34-3	17.5		1.00	0.125
1,1-Dichloroethene	75-35-4	17.3		1.00	0.500
1,1-Dichloropropene	563-58-6	21.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.8		2.00	1.00
1,2-Dichloropropane	78-87-5	20.1		1.00	0.200
1,2-Dibromoethane	106-93-4	21.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.5		1.00	0.250
1,3-Dichloropropane	142-28-9	21.2		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	19.1		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	17.5		10.0	2.50
2-Chlorotoluene	95-49-8	17.5		1.00	0.125
4-Chlorotoluene	106-43-4	22.1		1.00	0.250
Acetone	67-64-1	26.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	19.7		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	20.6		0.500	0.250
Bromoform	75-25-2	18.4		1.00	0.500
Bromomethane	74-83-9	16.0		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.4		1.00	0.500
Carbon tetrachloride	56-23-5	19.7		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	20.1		1.00	0.500
Chloroform	67-66-3	19.3		0.300	0.125
Chloromethane	74-87-3	17.9	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.1		0.500	0.250
Dibromochloromethane	124-48-1	19.6		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.1		1.00	0.250
Ethylbenzene	100-41-4	20.3		1.00	0.250
Hexachlorobutadiene	87-68-3	17.1		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	19.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.6		10.0	2.50
n-Butylbenzene	104-51-8	19.4		1.00	0.250
n-Propylbenzene	103-65-1	19.9		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	22.5		1.00	0.200
o-Xylene	95-47-6	21.0		1.00	0.250
p-Isopropyltoluene	99-87-6	20.1		1.00	0.250
sec-Butylbenzene	135-98-8	20.4		1.00	0.250
Styrene	100-42-5	21.7		1.00	0.125
Trichloroethene	79-01-6	21.5		1.00	0.250
tert-Butylbenzene	98-06-6	19.2		1.00	0.250
Tetrachloroethene	127-18-4	25.5		1.00	0.250
Toluene	108-88-3	19.4		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	17.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.7		1.00	0.500
Trichlorofluoromethane	75-69-4	19.9		1.00	0.250
Vinyl chloride	75-01-4	23.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.2	85	115	
1,2-Dichloroethane-d4	89.2	72	119	
Toluene-d8	96.6	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100514-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:51
Collect Date:	10/06/2017 15:26	**Dilution:**	1	**File ID:**	8M422136
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	4.72		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	44.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.49		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.14		1.00	0.250
Toluene	108-88-3	1.30		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.634	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	149		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	88.3	72	119	
Toluene-d8	96.5	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-02-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:49
Collect Date:	10/06/2017 12:45	**Dilution:**	1	**File ID:**	8M422138
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	56.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	71.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	119		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.99		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.3	85	115	
1,2-Dichloroethane-d4	89.8	72	119	
Toluene-d8	95.3	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:20
Collect Date:	10/06/2017 15:20	**Dilution:**	1	**File ID:**	8M422137
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.69	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.70		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.81		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.06		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.9	85	115	
1,2-Dichloroethane-d4	87.7	72	119	
Toluene-d8	96.0	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-03-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 17:06
Collect Date:	10/06/2017 14:50	**Dilution:**	1	**File ID:**	6M150744
Sample Tag:	03	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	1.28		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	36.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	41.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	92.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.88		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	100	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 23:18
Collect Date:	10/06/2017 12:57	**Dilution:**	1	**File ID:**	8M422141
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	24.7		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.48		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.91		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.45		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	151		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	89.0	85	115	
1,2-Dichloroethane-d4	90.0	72	119	
Toluene-d8	96.7	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-5A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:24
Collect Date:	10/06/2017 12:55	**Dilution:**	1	**File ID:**	6M150607
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.02	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	48.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.905	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.04		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	99.1	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-01-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:54
Collect Date:	10/06/2017 14:00	**Dilution:**	1	**File ID:**	6M150606
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	93.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	12.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.359	F	1.00	0.250
Toluene	108-88-3	2.38		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.64		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:57
Collect Date:	10/06/2017 13:05	**Dilution:**	1	**File ID:**	6M150602
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.390	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.69	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	28.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.76	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.827	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.37		1.00	0.250
Toluene	108-88-3	5.18		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:26
Collect Date:	10/06/2017 15:15	**Dilution:**	1	**File ID:**	6M150603
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.77	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.256	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	15.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.53		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-07A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:55
Collect Date:	10/06/2017 14:50	**Dilution:**	1	**File ID:**	6M150604
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.92	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.378	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.962	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:53
Collect Date:	10/06/2017 13:00	**Dilution:**	1	**File ID:**	6M150608
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.369	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	28.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.58	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.784	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.12		1.00	0.250
Toluene	108-88-3	5.21		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.7	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-279-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:22
Collect Date:	10/06/2017 13:20	**Dilution:**	1	**File ID:**	6M150609
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.286	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	24.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.16		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	58.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-04B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:52
Collect Date:	10/06/2017 14:30	**Dilution:**	1	**File ID:**	6M150610
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.238	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.951	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	50.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.2	72	119	
Toluene-d8	99.0	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-04A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 23:22
Collect Date:	10/06/2017 14:20	**Dilution:**	1	**File ID:**	6M150611
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.10		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.11		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	1.74		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-02A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:25
Collect Date:	10/06/2017 13:50	**Dilution:**	1	**File ID:**	6M150605
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.18		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.501	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	97.2	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100514
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above range were observed for Chloromethane and Dichlorodifluoromethane in the ICV analyzed 10/10/2017 on HPMS6. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recovery below range was observed for Chloromethane in the CCV analyzed 10/12/2017 on HPMS8. Recovery above the range was observed for Dichlorodifluoromethane in the CCV WG634167-02 analyzed 10/17/2017 on HPMS6. Recovery above the range was observed for Dichlorodifluoromethane in the CCV WG634399-02 analyzed 10/17/2017 on HPMS6. Dichlorodifluoromethane was below the RL for all associated samples. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 10 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130590
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Certificate of Analysis

Sample #:	L17100514-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR2-1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:24
Collect Date:	10/06/2017 12:47	**Dilution:**	1	**File ID:**	8M422131
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	24.5		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.51		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.84		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	150		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	88.3	72	119	
Toluene-d8	95.6	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PW101-06A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 21:21
Collect Date:	10/06/2017 14:35	**Dilution:**	1	**File ID:**	8M422097
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.263	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	22.6		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	93.5	85	115	
1,2-Dichloroethane-d4	91.1	72	119	
Toluene-d8	95.6	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-07B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 22:21
Collect Date:	10/06/2017 14:55	**Dilution:**	1	**File ID:**	8M422099
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.51	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.33		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.853	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.08		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	89.1	85	115	
1,2-Dichloroethane-d4	85.6	72	119	
Toluene-d8	97.4	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-03B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 00:47
Collect Date:	10/06/2017 14:10	**Dilution:**	1	**File ID:**	8M422104
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.139	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.317	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	8.34		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.696	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	43.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.3	85	115	
1,2-Dichloroethane-d4	85.3	72	119	
Toluene-d8	95.7	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW101T-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 01:16
Collect Date:	10/06/2017 13:35	**Dilution:**	1	**File ID:**	8M422105
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.39	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	26.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.0	85	115	
1,2-Dichloroethane-d4	86.2	72	119	
Toluene-d8	95.4	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-02B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 22:50
Collect Date:	10/06/2017 13:55	**Dilution:**	1	**File ID:**	8M422100
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.72	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.88		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.60		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.58		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.7	85	115	
1,2-Dichloroethane-d4	83.3	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW101B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:53
Collect Date:	10/06/2017 13:40	**Dilution:**	1	**File ID:**	8M422132
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.95	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.9	85	115	
1,2-Dichloroethane-d4	86.1	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-100B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/11/2017 23:19
Collect Date:	10/06/2017 15:21	**Dilution:**	1	**File ID:**	8M422101
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.541	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	3.02		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	46.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.26		1.00	0.250
Toluene	108-88-3	1.36		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.696	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	166		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.7	85	115	
1,2-Dichloroethane-d4	86.9	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-04-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633473	**Analyst:**	TMB	**Run Date:**	10/12/2017 00:17
Collect Date:	10/06/2017 15:04	**Dilution:**	1	**File ID:**	8M422103
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.79	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.151	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	39.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	73.7		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	146		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	291	J	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	3.90		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	85.9	72	119	
Toluene-d8	96.9	81	120	
4-Bromofluorobenzene	99.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-04-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:23
Collect Date:	10/06/2017 15:04	**Dilution:**	5	**File ID:**	8M422133
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1,4-Dioxane			U	500	250
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		U	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1		U	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Bromomethane	74-83-9		U	5.00	2.50
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		Q	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	36.7		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4	72.1		25.0	2.50
MEK (2-Butanone)	78-93-3		U	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	139		5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4	270		5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5	3.49	F	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.8	85	115	
1,2-Dichloroethane-d4	90.0	72	119	
Toluene-d8	96.2	81	120	

Certificate of Analysis

Surrogate	Recovery	Lower Limit	Upper Limit	Q
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-21-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:49
Collect Date:	10/06/2017 14:29	**Dilution:**	1	**File ID:**	8M422140
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.94	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	136		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.49	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.413	F	1.00	0.250
Toluene	108-88-3	5.45		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.265	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.4	85	115	
1,2-Dichloroethane-d4	88.5	72	119	
Toluene-d8	96.4	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-06B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:51
Collect Date:	10/06/2017 14:45	**Dilution:**	1	**File ID:**	8M422134
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.42	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.298	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.714	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.22		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	28.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	92.3	85	115	
1,2-Dichloroethane-d4	91.9	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW101-03A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:21
Collect Date:	10/06/2017 14:05	**Dilution:**	1	**File ID:**	8M422135
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.17		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	16.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	4.65		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	91.5	85	115	
1,2-Dichloroethane-d4	91.5	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 17:54
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422130
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.79	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.158	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.58		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.3	85	115	
1,2-Dichloroethane-d4	86.4	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 14:30
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422123
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.9		1.00	0.250
1,1-Dichloroethane	75-34-3	16.8		1.00	0.125
1,1-Dichloroethene	75-35-4	17.3		1.00	0.500
1,1-Dichloropropene	563-58-6	22.1		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.6		1.00	0.150
1,2,3-Trichloropropane	96-18-4	22.3		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.4		1.00	0.250
1,2-Dichloroethane	107-06-2	19.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.4		1.00	0.200
1,2-Dibromoethane	106-93-4	22.9		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.9		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.2		0.500	0.125
1-Chlorohexane	544-10-5	19.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.3		1.00	0.250
2-Hexanone	591-78-6	19.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	19.9		1.00	0.250
Acetone	67-64-1	26.4		10.0	2.50
Benzene	71-43-2	21.9		0.400	0.125
Bromobenzene	108-86-1	20.0		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	21.1		0.500	0.250
Bromoform	75-25-2	19.2		1.00	0.500
Bromomethane	74-83-9	15.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.9		1.00	0.500
Carbon tetrachloride	56-23-5	19.8		1.00	0.250
Chlorobenzene	108-90-7	20.7		0.500	0.125
Chloroethane	75-00-3	20.7		1.00	0.500
Chloroform	67-66-3	18.4		0.300	0.125
Chloromethane	74-87-3	19.1	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	17.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.6		0.500	0.250
Dibromochloromethane	124-48-1	20.6		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.7		1.00	0.250
Ethylbenzene	100-41-4	20.8		1.00	0.250
Hexachlorobutadiene	87-68-3	16.9		0.600	0.250
Isopropylbenzene	98-82-8	20.5		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	19.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.8		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	20.3		1.00	0.125
m-,p-Xylene	179601-23-1	42.7		2.00	0.500
Naphthalene	91-20-3	23.4		1.00	0.200
o-Xylene	95-47-6	21.9		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	20.5		1.00	0.250
Styrene	100-42-5	22.4		1.00	0.125
Trichloroethene	79-01-6	22.1		1.00	0.250
tert-Butylbenzene	98-06-6	19.4		1.00	0.250
Tetrachloroethene	127-18-4	26.5		1.00	0.250
Toluene	108-88-3	20.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	16.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	20.2		1.00	0.250
Vinyl chloride	75-01-4	23.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	86.7	85	115	
1,2-Dichloroethane-d4	84.7	72	119	
Toluene-d8	96.7	81	120	
4-Bromofluorobenzene	100	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100514-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-6-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 14:59
Collect Date:	10/06/2017 15:05	**Dilution:**	1	**File ID:**	8M422124
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.9		1.00	0.250
1,1-Dichloroethane	75-34-3	17.5		1.00	0.125
1,1-Dichloroethene	75-35-4	17.3		1.00	0.500
1,1-Dichloropropene	563-58-6	21.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.2		1.00	0.250
1,2-Dichloroethane	107-06-2	19.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.8		2.00	1.00
1,2-Dichloropropane	78-87-5	20.1		1.00	0.200
1,2-Dibromoethane	106-93-4	21.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.5		1.00	0.250
1,3-Dichloropropane	142-28-9	21.2		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	19.1		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	17.5		10.0	2.50
2-Chlorotoluene	95-49-8	17.5		1.00	0.125
4-Chlorotoluene	106-43-4	22.1		1.00	0.250
Acetone	67-64-1	26.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	19.7		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	20.6		0.500	0.250
Bromoform	75-25-2	18.4		1.00	0.500
Bromomethane	74-83-9	16.0		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.4		1.00	0.500
Carbon tetrachloride	56-23-5	19.7		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	20.1		1.00	0.500
Chloroform	67-66-3	19.3		0.300	0.125
Chloromethane	74-87-3	17.9	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.1		0.500	0.250
Dibromochloromethane	124-48-1	19.6		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.1		1.00	0.250
Ethylbenzene	100-41-4	20.3		1.00	0.250
Hexachlorobutadiene	87-68-3	17.1		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	19.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.6		10.0	2.50
n-Butylbenzene	104-51-8	19.4		1.00	0.250
n-Propylbenzene	103-65-1	19.9		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	22.5		1.00	0.200
o-Xylene	95-47-6	21.0		1.00	0.250
p-Isopropyltoluene	99-87-6	20.1		1.00	0.250
sec-Butylbenzene	135-98-8	20.4		1.00	0.250
Styrene	100-42-5	21.7		1.00	0.125
Trichloroethene	79-01-6	21.5		1.00	0.250
tert-Butylbenzene	98-06-6	19.2		1.00	0.250
Tetrachloroethene	127-18-4	25.5		1.00	0.250
Toluene	108-88-3	19.4		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	17.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.7		1.00	0.500
Trichlorofluoromethane	75-69-4	19.9		1.00	0.250
Vinyl chloride	75-01-4	23.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.2	85	115	
1,2-Dichloroethane-d4	89.2	72	119	
Toluene-d8	96.6	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100514-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:51
Collect Date:	10/06/2017 15:26	**Dilution:**	1	**File ID:**	8M422136
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	4.72		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	44.8		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.49		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.14		1.00	0.250
Toluene	108-88-3	1.30		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.634	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	149		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	88.1	85	115	
1,2-Dichloroethane-d4	88.3	72	119	
Toluene-d8	96.5	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	PMW21-02-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:49
Collect Date:	10/06/2017 12:45	**Dilution:**	1	**File ID:**	8M422138
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	14.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	56.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	71.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	119		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.99		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.3	85	115	
1,2-Dichloroethane-d4	89.8	72	119	
Toluene-d8	95.3	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DR1-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:20
Collect Date:	10/06/2017 15:20	**Dilution:**	1	**File ID:**	8M422137
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.69	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.70		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.1		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.81		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.06		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	87.9	85	115	
1,2-Dichloroethane-d4	87.7	72	119	
Toluene-d8	96.0	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-03-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 17:06
Collect Date:	10/06/2017 14:50	**Dilution:**	1	**File ID:**	6M150744
Sample Tag:	03	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	1.28		1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	36.3		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	41.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	92.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.88		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	100	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	09/13/2017 19:41
Workgroup #:	WG633719	**Analyst:**	TMB	**Run Date:**	10/12/2017 23:18
Collect Date:	10/06/2017 12:57	**Dilution:**	1	**File ID:**	8M422141
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	24.7		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.48		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.91		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.45		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	151		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	89.0	85	115	
1,2-Dichloroethane-d4	90.0	72	119	
Toluene-d8	96.7	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-5A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:24
Collect Date:	10/06/2017 12:55	**Dilution:**	1	**File ID:**	6M150607
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.02	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	48.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.905	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	6.04		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	99.1	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-01-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:54
Collect Date:	10/06/2017 14:00	**Dilution:**	1	**File ID:**	6M150606
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	93.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	12.4		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.359	F	1.00	0.250
Toluene	108-88-3	2.38		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	1.64		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 18:57
Collect Date:	10/06/2017 13:05	**Dilution:**	1	**File ID:**	6M150602
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.390	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.69	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	28.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.76	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.827	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.37		1.00	0.250
Toluene	108-88-3	5.18		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:26
Collect Date:	10/06/2017 15:15	**Dilution:**	1	**File ID:**	6M150603
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.77	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.256	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	15.5		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.53		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-07A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 19:55
Collect Date:	10/06/2017 14:50	**Dilution:**	1	**File ID:**	6M150604
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.92	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.378	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.962	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 21:53
Collect Date:	10/06/2017 13:00	**Dilution:**	1	**File ID:**	6M150608
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.369	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.73	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	28.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	3.58	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.784	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.12		1.00	0.250
Toluene	108-88-3	5.21		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.7	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-279-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:22
Collect Date:	10/06/2017 13:20	**Dilution:**	1	**File ID:**	6M150609
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.286	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	24.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.16		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	58.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	99.4	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-04B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 22:52
Collect Date:	10/06/2017 14:30	**Dilution:**	1	**File ID:**	6M150610
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.238	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.9		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.951	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	50.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.2	72	119	
Toluene-d8	99.0	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-04A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 23:22
Collect Date:	10/06/2017 14:20	**Dilution:**	1	**File ID:**	6M150611
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.10		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.11		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	1.74		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100514-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW101-02A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633730	**Analyst:**	TMB	**Run Date:**	10/12/2017 20:25
Collect Date:	10/06/2017 13:50	**Dilution:**	1	**File ID:**	6M150605
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.18		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.501	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	97.2	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): BLB
Date: 10-10-17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: 75
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BLB 10-10-17		BLB 10-11-17	
Time On	Temp On °C	Time Off	Temp Off °C
15:41	23.3	8D8	21.6

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A	10-0510-02	✓	10	10	1311	F,-282	S	100		✓	25.00	500
B	10-0322-01	✓	10	10	1311	〃	〃	〃		✓	25.00	500
C												
D												
E												
F												
G												
H												
I												
J												
K												
L												
M												
N												
O												
P												
Q												
R												
S	10-0510-01	✓	10	10	1311	F,-282	S	100		✓	25.00	500
NA	FBLK-1	NA	NA	NA	〃	〃	NA	NA	NA	NA	40	40

BLB 10-11-17

BLB 10-11-17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NA

Peer Review By:

Analyst(s): BLB | BLR
Date: 10-11-17
Filter Lot #: 94S60030

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BLB | BLR 10-11-17		CPD 10-12-17	
Time On	Temp On °C	Time Off	Temp Off °C
16:25	23.1	0835	21.6

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A						CPD 10/12/17						
B												
C	10-0638-01	✓	10	10	1311	F1-282	S	100		✓	25.00	500
D												
E												
F												
G												
H												
I												
J												
K												
L												
M												
N												
O												
P												
Q												
R												
S												
NA	FBLK-1	NA	NA	NA	1311	F1-282	NA	NA	NA	NA	40	40

CPD 10/12/17

CPD 10/12/17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By: [signature]

TCLP Volatile

Analyst(s): BNB
Date: 10-9-17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BNB 10-9-17		BNB 10-10-17	
Time On	Temp On °C	Time Off	Temp Off °C
15:20	23.1	813	21.4

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A												
B												
C												
D												
E												
F												
G												
H												
I												
J												
K												
L												
M	10-044201	✓	10	10	1311	F_1-282	S	100		✓	25.02	500
N	10-0452-02	✓								✓	25.01	500
O	10-0452-04	✓								✓	25.02	500
P	10-0452-06	✓								✓	25.00	500
Q	10-0452-08	✓								✓	25.01	500
R	10-0452-10	✓								✓	25.03	500
S												
NA	FBLK-1	NA	NA	NA	1311	F_1-282	NA	NA	NA	NA	40	40

BNB 10-10-17

BNB 10-10-17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NA

Peer Review By:

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 083117
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT Rev: 18/1
Maintenance Log ID:

Internal Standard: STD83648 Surrogate Standard: STD83648
CCV: STD83554 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG628027

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M421173	WG628027-01 50ng BFB STD	NA	1	1	STD83478	08/31/17 13:56
8M421174	WG628027-01 50ng BFB STD	NA	1	1	STD83478	08/31/17 14:11
8M421175	RINSE	NA	1	1	STD83388	08/31/17 14:36
8M421176	WG628027-02 5ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 15:06
8M421177	WG628027-03 20ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 15:36
8M421178	WG628027-04 50ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 16:05
8M421179	WG628027-05 100ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 16:35
8M421180	WG628027-06 200ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 17:04
8M421181	WG628027-07 300ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 17:34
8M421182	WG628027-08 400ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 18:04
8M421183	WG628027-09 500ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 18:33
8M421184	RINSE	NA	1	1	STD83554	08/31/17 19:03
8M421185	WG628027-10 100ug/L A9FOO ALT SRC	NA	1	1	STD83193	08/31/17 19:33

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 8M421173				
	Tune failed, DNR.			

Approved: September 05, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 091317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 530B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54316

Internal Standard: STD83648 Surrogate Standard: STD83648
CCV: STD83834 LCS: STD83830 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG629567

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M421377	WG629567-01 50ng BFB STD 8260	NA	1	1	STD83478	09/13/17 14:18
8M421378	RINSE	NA	1	1	STD83478	09/13/17 14:44
8M421379	WG629567-02 0.3ug/L STD 8260	NA	1	1	STD83834	09/13/17 15:15
8M421380	WG629567-03 0.4ug/L STD 8260	NA	1	1	STD83834	09/13/17 15:44
8M421381	WG629567-04 1ug/L STD 8260	NA	1	1	STD83834	09/13/17 16:17
8M421382	WG629567-05 2ug/L STD 8260	NA	1	1	STD83834	09/13/17 16:49
8M421383	WG629567-06 5ug/L STD 8260	NA	1	1	STD83834	09/13/17 17:17
8M421384	WG629567-07 20ug/L STD 8260	NA	1	1	STD83834	09/13/17 17:46
8M421385	WG629567-08 50ug/L STD 8260	NA	1	1	STD83834	09/13/17 18:15
8M421386	WG629567-09 100ug/L STD 8260	NA	1	1	STD83834	09/13/17 18:44
8M421387	WG629567-10 200ug/L STD 8260	NA	1	1	STD83834	09/13/17 19:13
8M421388	WG629567-11 300ug/L STD 8260	NA	1	1	STD83834	09/13/17 19:41
8M421389	RINSE	NA	1	1		09/13/17 20:11
8M421390	RINSE	NA	1	1		09/13/17 20:40
8M421391	WG629567-12 50ug/L ALT SRC STD 8260	NA	1	1	STD83830	09/13/17 21:09
8M421392	CCV CHECK	NA	1	1	STD83834	09/13/17 21:38
8M421393	RINSE	NA	1	1		09/13/17 22:06

Approved: September 14, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
Not needed, DNR.				
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
L17100420-01				

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54352

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274; STD84099 LCS: STD84354 MS/MSD: STD84354

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633473

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422078	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 09:44
8M422079	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 10:00
8M422080	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 11:31
8M422081	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 11:46
8M422082	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 12:16
8M422083	WG633471-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 14:34
8M422084	WG633471-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/11/17 15:01
8M422085	WG633472-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/11/17 15:30
8M422086	WG633473-01 BLK 1011 STD 8260	NA	1	1		10/11/17 15:59
8M422087	L17100053-01 A 8260	<2	1	1		10/11/17 16:29
8M422088	L17100001-01 LOD 826-SPE	NA	1	1	STD84355	10/11/17 16:59
8M422089	L17100003-01 LOQ 826-SPE	NA	1	1	STD84355	10/11/17 17:28
8M422090	WG633473-02 20ug/L LCS STD 8260	NA	1	1	STD84354	10/11/17 17:57
8M422091	WG633473-03 20ug/L LCS2 STD 8260	NA	1	1	STD84354	10/11/17 18:26
8M422092	L17100452-02 A 10X 826-TC	NA	17	10		10/11/17 18:55
8M422093	L17100452-04 A 10X 826-TC	NA	17	10		10/11/17 19:24
8M422094	L17100452-06 A 10X 826-TC	NA	17	10		10/11/17 19:54
8M422095	L17100452-08 A 10X 826-TC	NA	17	10		10/11/17 20:23
8M422096	L17100452-10 A 10X 826-TC	NA	17	10		10/11/17 20:52
8M422097	L17100514-02 A 826-SPE	<2	1	1		10/11/17 21:21
8M422098	L17100514-03 A 826-SPE	<2	1	1		10/11/17 21:51
8M422099	L17100514-04 A 826-SPE	<2	1	1		10/11/17 22:21
8M422100	L17100514-07 A 826-SPE	<2	1	1		10/11/17 22:50
8M422101	L17100514-09 A 826-SPE	<2	1	1		10/11/17 23:19
8M422102	L17100514-01 A 826-SPE	<2	1	1		10/11/17 23:48
8M422103	L17100514-10 A 826-SPE	<2	1	1		10/12/17 00:17
8M422104	L17100514-05 A 826-SPE	<2	1	1		10/12/17 00:47
8M422105	L17100514-06 A 826-SPE	<2	1	1		10/12/17 01:16
8M422106	L17100514-08 A 826-SPE	<2	1	1		10/12/17 01:46
8M422107	RINSE	NA	1	1		10/12/17 02:16
8M422108	WG633473-04 BLK 1011 STD 624	NA	2	1		10/12/17 02:46
8M422109	L17100609-04 A 624-SPE	<2	2	1		10/12/17 03:15
8M422110	L17100609-03 A 624-SPE	7	2	1		10/12/17 03:45
8M422111	L17100609-02 A 624-SPE	7	2	1		10/12/17 04:14

Approved: October 12, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54352

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274; STD84099 LCS: STD84354 MS/MSD: STD84354

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633473

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422112	L17100609-01 A 624-SPE	7	2	1		10/12/17 04:44
8M422113	WG633078-01 10X FBLK 826-TC	NA	17	10		10/12/17 05:14
8M422114	WG633473-05 10X RS 826-TC	NA	17	10		10/12/17 05:43
8M422115	WG633473-06 10X MS 826-TC	NA	17	10	STD84357	10/12/17 06:13
8M422116	CCV	NA	1	1		10/12/17 06:43
8M422117	RINSE	NA	1	1		10/12/17 07:12

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 8M422078				
			Tune failed, DNR.	
2	X			
File ID: 8M422079				
			Tune failed, DNR.	
3	X			
File ID: 8M422080				
			Purged BFB. Tune failed, DNR.	
4	X			
File ID: 8M422081				
			Tune failed, DNR. Changed the septa, liner and o-ring.	
5	X			
File ID: 8M422082				
			Tune failed, DNR. Retuned the MS.	
11	X			
File ID: 8M422088				
			L17100001-01 Rerun for 1,3-butadiene and cyclohexanone.	
12	X			
File ID: 8M422089				
			L1710003-01 Rerun for 1,3-butadiene and cyclohexanone.	
15	X	10		
File ID: 8M422092				
			11-DCE was low in the lcs. DNR.	
16	X	10		
File ID: 8M422093				
			11-DCE was low in the lcs. DNR.	

Approved: October 12, 2017
Sarah Vandenberg

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Instrument Run Log

Instrument: HPMS8 Dataset: 101117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54352

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274; STD84099 LCS: STD84354 MS/MSD: STD84354

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633473

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
17	X	10		
File ID: 8M422094				
	11-DCE was low in the lcs. DNR.			
18	X	10		
File ID: 8M422095				
	11-DCE was low in the lcs. DNR.			
19	X	10		
File ID: 8M422096				
	11-DCE was low in the lcs. DNR.			
21				
File ID: 8M422098				
	Sample was cancelled per the client due to head space.			
25	X	1	Surrogate standard failure	
File ID: 8M422102				
	L17100514-01			
26	X	5	Over Calibration Range	PCE
File ID: 8M422103				
29	X	1	Surrogate standard failure	
File ID: 8M422106				
	L17100514-08			

Approved: October 12, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54355

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633719

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422118	WG633717-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 12:00
8M422119	WG633717-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/12/17 12:25
8M422120	WG633718-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/12/17 13:02
8M422121	WG633719-01 BLK 1012 STD 8260	NA	1	1		10/12/17 13:31
8M422122	WG633719-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/12/17 14:00
8M422123	L17100514-15 A MS 826-SPE	<2	1	1	STD84357	10/12/17 14:30
8M422124	L17100514-16 A MSD 826-SPE	<2	1	1	STD84357	10/12/17 14:59
8M422125	L17100452-02 B 10X 826-TC	NA	17	10		10/12/17 15:28
8M422126	L17100452-04 B 10X 826-TC	NA	17	10		10/12/17 15:56
8M422127	L17100452-06 B 10X 826-TC	NA	17	10		10/12/17 16:26
8M422128	L17100452-08 B 10X 826-TC	NA	17	10		10/12/17 16:55
8M422129	L17100452-10 B 10X 826-TC	NA	17	10		10/12/17 17:24
8M422130	L17100514-14 A RS 826-SPE	<2	1	1		10/12/17 17:54
8M422131	L17100514-01 B 826-SPE	<2	1	1		10/12/17 18:24
8M422132	L17100514-08 B 826-SPE	<2	1	1		10/12/17 18:53
8M422133	L17100514-10 B 5X D1 826-SPE	<2	1	5		10/12/17 19:23
8M422134	L17100514-12 A 826-SPE	<2	1	1		10/12/17 19:51
8M422135	L17100514-13 A 826-SPE	<2	1	1		10/12/17 20:21
8M422136	L17100514-17 A 826-SPE	<2	1	1		10/12/17 20:51
8M422137	L17100514-19 A 826-SPE	<2	1	1		10/12/17 21:20
8M422138	L17100514-18 A 826-SPE	<2	1	1		10/12/17 21:49
8M422139	L17100514-20 A 826-SPE	<2	1	1		10/12/17 22:18
8M422140	L17100514-11 A 826-SPE	<2	1	1		10/12/17 22:49
8M422141	L17100514-21 A 826-SPE	<2	1	1		10/12/17 23:18
8M422142	RINSE	NA	1	1		10/12/17 23:48
8M422143	WG633719-06 BLK 1012 STD 624	NA	2	1		10/13/17 00:18
8M422144	L17100739-02 A 624	6	2	1		10/13/17 00:48
8M422145	CCV	NA	2	1		10/13/17 01:18
8M422146	RINSE	NA	1	1		10/13/17 01:48

Comments

Seq.	Rerun	Dil.	Reason	Analytes
22	X	1	Surrogate standard failure	

Approved: October 16, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS8	Dataset:	101217		
Analyst1:	TMB	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54355				

Internal Standard: STD84119 Surrogate Standard: STD84119

CCV: STD84274 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG633719

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 8M422139				
L17100514-20 one surrogate low.				

Approved: October 16, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54354

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633760

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150590	WG633727-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 12:34
6M150591	WG633727-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/12/17 13:01
6M150592	WG633729-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/12/17 13:30
6M150593	WG633730-01 BLK 1012 STD 8260	NA	1	1		10/12/17 13:59
6M150594	L17100411-15 B RS 826-SPE	<2	1	1		10/12/17 14:29
6M150595	WG633730-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/12/17 14:58
6M150596	L17100411-16 B MS 826-SPE	<2	1	1	STD84357	10/12/17 15:30
6M150597	L17100411-17 B MSD 826-SPE	<2	1	1	STD84357	10/12/17 15:59
6M150598	WG633730-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/12/17 16:29
6M150599	L17100510-01 A 10X 826-TC	NA	17	10		10/12/17 17:29
6M150600	L17100510-02 A 10X 826-TC	NA	17	10		10/12/17 17:58
6M150601	L17100729-02 A 826-BETX	5	1	1		10/12/17 18:28
6M150602	L17100514-24 A 826-SPE	<2	1	1		10/12/17 18:57
6M150603	L17100514-25 A 826-SPE	<2	1	1		10/12/17 19:26
6M150604	L17100514-26 A 826-SPE	<2	1	1		10/12/17 19:55
6M150605	L17100514-31 A 826-SPE	<2	1	1		10/12/17 20:25
6M150606	L17100514-23 A 826-SPE	<2	1	1		10/12/17 20:54
6M150607	L17100514-22 A 826-SPE	<2	1	1		10/12/17 21:24
6M150608	L17100514-27 A 826-SPE	<2	1	1		10/12/17 21:53
6M150609	L17100514-28 A 826-SPE	<2	1	1		10/12/17 22:22
6M150610	L17100514-29 A 826-SPE	<2	1	1		10/12/17 22:52
6M150611	L17100514-30 A 826-SPE	<2	1	1		10/12/17 23:22
6M150612	L17100638-01 A 10X 826-TC	NA	17	10		10/12/17 23:51
6M150613	RINSE	NA	1	1		10/13/17 00:21
6M150614	WG633730-06 BLK 1012 STD 624	NA	2	1		10/13/17 00:50
6M150615	L17100740-02 A 624	6	2	1		10/13/17 01:20
6M150616	CCV	NA	1	1		10/13/17 01:50
6M150617	RINSE	NA	1	1		10/13/17 02:19
6M150618	WG633556-01 A FBLK 10X 826-TC	NA	17	10		10/13/17 02:49
6M150619	WG633317-01 A FBLK 10X 826-TC	NA	17	10		10/13/17 03:19

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 13, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS6	Dataset:	101217		
Analyst1:	TMB	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54354				

Internal Standard:	STD84314	Surrogate Standard:	STD84314		
CCV:	STD84274	LCS:	STD84357	MS/MSD:	STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG633760

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
6	X		Internal standard and surrogate standard failure	
File ID: 6M150595				
Took a snap shot and chem station errored. DNR.				

Approved: October 13, 2017

Page: 2

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150723	WG634167-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 06:51
6M150724	WG634167-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 07:18
6M150725	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 07:47
6M150726	WG634168-01 BLK 1017 STD 8260	NA	1	1		10/17/17 08:16
6M150727	L17100636-24 A RS 826-SPE	<2	1	1		10/17/17 08:45
6M150728	WG634168-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 09:15
6M150729	L17100636-25 A MS 826-SPE	<2	1	1	STD84357	10/17/17 09:44
6M150730	L17100636-26 A MSD 826-SPE	<2	1	1	STD84357	10/17/17 10:13
6M150731	L17100545-17 B 10X 826-SPE	<2	1	10		10/17/17 10:43
6M150732	L17100545-15 B 10X D1 826-SPE	<2	1	10		10/17/17 11:12
6M150733	L17100545-14 B 10X D1 826-SPE	<2	1	10		10/17/17 11:42
6M150734	L17100545-13 B 25X D1 826-SPE	<2	1	25		10/17/17 12:12
6M150735	L17100636-01 B 826-SPE	<2	1	1		10/17/17 12:41
6M150736	L17100636-02 B 826-SPE	<2	1	1		10/17/17 13:11
6M150737	L17100636-03 C 826-SPE	<2	1	1		10/17/17 13:39
6M150738	L17100636-04 C 826-SPE	<2	1	1		10/17/17 14:09
6M150739	L17100636-06 C 826-SPE	<2	1	1		10/17/17 14:38
6M150740	L17100636-07 C 826-SPE	<2	1	1		10/17/17 15:08
6M150741	L17100636-08 C 826-SPE	<2	1	1		10/17/17 15:37
6M150742	L17100636-09 C 826-SPE	<2	1	1		10/17/17 16:07
6M150743	L17100636-13 C 826-SPE	<2	1	1		10/17/17 16:37
6M150744	L17100514-20 C 826-SPE	<2	1	1		10/17/17 17:06
6M150745	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 17:55
6M150746	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 18:20
6M150748	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 19:20
6M150749	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 20:09
6M150750	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 20:44
6M150751	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 21:09
6M150752	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 21:41
6M150753	WG634400-01 BLK 1017 STD 8260	NA	1	1		10/17/17 22:11
6M150754	WG634400-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 22:40
6M150755	WG634400-03 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 23:09
6M150756	L17100545-17 B D1 100X 826-SPE	<2	1	100		10/17/17 23:39
6M150757	L17100704-01 10X AF 826-TC	NA	17	10		10/18/17 00:08

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150758	L17100636-01 C 826-SPE	<2	1	1		10/18/17 00:38
6M150759	L17100636-02 C 826-SPE	<2	1	1		10/18/17 01:07
6M150760	L17100709-16 C 826-SPE	<2	1	1		10/18/17 01:36
6M150761	L17100709-15 C 826-SPE	<2	1	1		10/18/17 02:06
6M150762	L17100709-17 A 826-SPE	<2	1	1		10/18/17 02:35
6M150763	L17100709-18 A 826-SPE	<2	1	1		10/18/17 03:05
6M150764	L17100545-18 A 10X 826-SPE	<2	1	10		10/18/17 03:34
6M150765	L17100545-19 A 10X 826-SPE D1	<2	1	10		10/18/17 04:03
6M150766	L17100545-20 A 10X 826-SPE	<2	1	10		10/18/17 04:33
6M150767	L17100545-21 A 10X 826-SPE D1	<2	1	10		10/18/17 05:02
6M150768	L17100545-22 A 10X 826-SPE	<2	1	10		10/18/17 05:31
6M150769	L17100637-05 A 826-SPE	<2	1	1		10/18/17 06:00
6M150770	L17100637-06 A 826-SPE	<2	1	1		10/18/17 06:30
6M150771	CCV	NA	1	1		10/18/17 06:59
6M150772	RINSE	NA	1	1		10/18/17 07:28
6M150773	RINSE	NA	1	1		10/18/17 07:57
6M150774	WG633712-02 FBLK 826-TC	NA	17	10		10/18/17 08:26

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 6M150725				
Not needed, DNR.				
9	X	100	Over Calibration Range	BENZENE
File ID: 6M150731				
L17100545-17				
13	X	1	Carry-over contamination	
File ID: 6M150735				
14-DCB carry over, DNR.				
14	X	1	Carry-over contamination	
File ID: 6M150736				
14-DCB carry over, DNR.				
29				
File ID: 6M150752				

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS6	Dataset:	101717		
Analyst1:	TMB	Analyst2:	JDS		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54360				

Internal Standard: STD81314 Surrogate Standard: STD84314

CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			Not needed, DNR.	
41	X	1	Analyzed too dilute	
File ID: 6M150764				
	L17100545-18			
42	X	1	Analyzed too dilute	
File ID: 6M150765				
	L17100545-19 D1			
43	X	1	Analyzed too dilute	
File ID: 6M150766				
	L17100545-20			
44	X	2	Analyzed too dilute	
File ID: 6M150767				
	L17100545-21 D1			
45	X	50	Over Calibration Range	1,4-dioxane
File ID: 6M150768				
	L17100545-22			
46	X	1	Carry-over contamination	
File ID: 6M150769				
	L17100637-05 has possible 1,4-dioxane carry over.			

Approved: October 18, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

Microbac Laboratories Inc.

Data Checklist

Date: 31-AUG-2017
Analyst: ADC
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 84380
Analytical Workgroups: WG628027

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
05-SEP-2017
Tiffany Bailey

Secondary Reviewer:
05-SEP-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: SEP-05-2017 17:57:24

Microbac Laboratories Inc.

Data Checklist

Date: 13-SEP-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 84588
Analytical Workgroups: WG629567

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
14-SEP-2017
Tiffany Bailey

Secondary Reviewer:
14-SEP-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: SEP-19-2017 13:02:46

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

Microbac Laboratories Inc.

Data Checklist

Date: 11-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 85219
Analytical Workgroups: WG633473

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
12-OCT-2017
Tiffany Bailey

Secondary Reviewer:
12-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-12-2017 13:36:59

Microbac Laboratories Inc.

Data Checklist

Date: 12-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 85255
Analytical Workgroups: WG633719

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-OCT-2017
Tiffany Bailey

Secondary Reviewer:
16-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-16-2017 13:42:05

Microbac Laboratories Inc.

Data Checklist

Date: 12-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85244
Analytical Workgroups: WG633730

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-OCT-2017

Secondary Reviewer:
13-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-13-2017 12:21:39

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85330
Analytical Workgroups: WG634168; WG634400

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017
Tiffany Bailey

Secondary Reviewer:
18-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-18-2017 13:12:44

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG633473

Login Number: L17100514

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PW101-06A-LA-26	02	10/06/17					10/11/2017	5.3	14		10/11/17	5.3	14	
PMW101-07B-LA-26	04	10/06/17					10/11/2017	5.3	14		10/11/17	5.3	14	
PMW101-03B-LA-26	05	10/06/17					10/12/2017	5.4	14		10/12/17	5.4	14	
MW101T-LA-26	06	10/06/17					10/12/2017	5.5	14		10/12/17	5.5	14	
PMW101-02B-LA-26	07	10/06/17					10/11/2017	5.4	14		10/11/17	5.4	14	
MW-100B-LA-26	09	10/06/17					10/11/2017	5.3	14		10/11/17	5.3	14	
PMW21-04-LA-26	10	10/06/17					10/12/2017	5.4	14		10/12/17	5.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5524664
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG633719

Login Number: L17100514

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR2-1-LA-26	01	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
MW101B-LA-26	08	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
PMW21-04-LA-26	10	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
MW-21-LA-26	11	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	
PMW101-06B-LA-26	12	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
PMW101-03A-LA-26	13	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	
DR1-6-LA-26	14	10/06/17					10/12/2017	6.1	14		10/12/17	6.1	14	
DR1-6-LA-26-MS	15	10/06/17					10/12/2017	6	14		10/12/17	6	14	
DR1-6-LA-26-MSD	16	10/06/17					10/12/2017	6	14		10/12/17	6	14	
DUP-6-LA-26	17	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
PMW21-02-LA-26	18	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	
DR1-3-LA-26	19	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	
DUP-2-LA-26	21	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5524664
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG633730

Login Number: L17100514

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR1-5A-LA-26	22	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	
PMW21-01-LA-26	23	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	
DUP-1-LA-26	24	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
DR1-4-LA-26	25	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
PMW101-07A-LA-26	26	10/06/17					10/12/2017	6.2	14		10/12/17	6.2	14	
DR1-5-LA-26	27	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	
MW-279-LA-26	28	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	
PMW101-04B-LA-26	29	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	
PMW101-04A-LA-26	30	10/06/17					10/12/2017	6.4	14		10/12/17	6.4	14	
PMW101-02A-LA-26	31	10/06/17					10/12/2017	6.3	14		10/12/17	6.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5524664
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634168

Login Number: L17100514

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
PMW21-03-LA-26	20	10/06/17					10/17/2017	11.1	14		10/17/17	11.1	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5524664
Report generated 10/18/2017 15:54

Login Number: L17100514
Instrument Id: HPMS8
Workgroup (AAB#): WG633473

Method: 8260
CAL ID: HPMS8-13-SEP-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100514-02	1.00	01	91.1	93.5	102	95.6
L17100514-04	1.00	01	85.6	89.1	100	97.4
L17100514-05	1.00	01	85.3	87.3	100	95.7
L17100514-06	1.00	01	86.2	88.0	101	95.4
L17100514-07	1.00	01	83.3	86.7	103	96.8
L17100514-09	1.00	01	86.9	87.7	101	96.1
L17100514-10	1.00	01	85.9	88.1	99.7	96.9
WG633473-01	1.00	01	90.5	91.3	100	98.2
WG633473-02	1.00	01	88.3	91.5	101	97.8
WG633473-03	1.00	01	86.8	89.4	99.5	97.0
WG633473-04	1.00	01	87.2	90.2	101	96.9

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5524675
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100514 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-09-OCT-17
Workgroup (AAB#): WG633730 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17100514-22	1.00	01	99.1	101	101	101
L17100514-23	1.00	01	99.4	100	101	99.7
L17100514-24	1.00	01	98.7	98.8	102	100
L17100514-25	1.00	01	100	99.1	102	100
L17100514-26	1.00	01	98.7	99.7	100	99.8
L17100514-27	1.00	01	98.7	98.7	99.6	100
L17100514-28	1.00	01	99.4	99.7	101	100
L17100514-29	1.00	01	99.2	100	100	99.0
L17100514-30	1.00	01	102	101	100	100
L17100514-31	1.00	01	97.2	100	101	100
WG633730-01	1.00	01	98.5	98.3	102	100
WG633730-02	1.00	01	95.9	98.1	98.9	98.7
WG633730-06	1.00	01	100	99.1	103	99.5

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5524675
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100514
Instrument Id: HPMS6
Workgroup (AAB#): WG634168

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100514-20	1.00	03	102	101	100	99.3
WG634168-01	1.00	01	100	99.0	102	98.6
WG634168-02	1.00	01	99.8	99.5	101	98.0

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5524675
Report generated: 10/18/2017 15:55

Login Number: L17100514
Instrument Id: HPMS8
Workgroup (AAB#): WG633719

Method: 8260
CAL ID: HPMS8-13-SEP-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100514-01	1.00	02	88.3	88.1	104	95.6
L17100514-08	1.00	02	86.1	86.9	104	96.8
L17100514-10	5.00	DL01	90.0	88.8	104	96.2
L17100514-11	1.00	01	88.5	90.4	103	96.4
L17100514-12	1.00	01	91.9	92.3	104	96.1
L17100514-13	1.00	01	91.5	91.5	103	96.8
L17100514-14	1.00	01	86.4	86.3	103	96.1
L17100514-15	1.00	01	84.7	86.7	100	96.7
L17100514-16	1.00	01	89.2	90.2	102	96.6
L17100514-17	1.00	01	88.3	88.1	100	96.5
L17100514-18	1.00	01	89.8	90.3	102	95.3
L17100514-19	1.00	01	87.7	87.9	102	96.0
L17100514-21	1.00	01	90.0	89.0	102	96.7
WG633719-01	1.00	01	85.8	85.2	100	95.8
WG633719-02	1.00	01	83.3	85.3	102	95.2
WG633719-06	1.00	01	87.5	84.6	101	95.9

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5524675
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100514
Work Group: WG633730
Blank File ID: 6M150593
Blank Sample ID: WG633730-01
Prep Date: 10/12/17 13:59
Instrument ID: HPMS6
Analyzed Date: 10/12/17 13:59
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633730-02	6M150598	10/12/17 16:29	01
DUP-1-LA-26	L17100514-24	6M150602	10/12/17 18:57	01
DR1-4-LA-26	L17100514-25	6M150603	10/12/17 19:26	01
PMW101-07A-LA-26	L17100514-26	6M150604	10/12/17 19:55	01
PMW101-02A-LA-26	L17100514-31	6M150605	10/12/17 20:25	01
PMW21-01-LA-26	L17100514-23	6M150606	10/12/17 20:54	01
DR1-5A-LA-26	L17100514-22	6M150607	10/12/17 21:24	01
DR1-5-LA-26	L17100514-27	6M150608	10/12/17 21:53	01
MW-279-LA-26	L17100514-28	6M150609	10/12/17 22:22	01
PMW101-04B-LA-26	L17100514-29	6M150610	10/12/17 22:52	01
PMW101-04A-LA-26	L17100514-30	6M150611	10/12/17 23:22	01

Report Name: BLANK_SUMMARY
PDF File ID: 5527360
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100514	**Work Group:**	WG634168
Blank File ID:	6M150726	**Blank Sample ID:**	WG634168-01
Prep Date:	10/17/17 08:16	**Instrument ID:**	HPMS6
Analyzed Date:	10/17/17 08:16	**Method:**	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634168-02	6M150728	10/17/17 09:15	01
PMW21-03-LA-26	L17100514-20	6M150744	10/17/17 17:06	03

Report Name: BLANK_SUMMARY
PDF File ID: 5527360
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100514
Work Group: WG633473
Blank File ID: 8M422086
Blank Sample ID: WG633473-01
Prep Date: 10/11/17 15:59
Instrument ID: HPMS8
Analyzed Date: 10/11/17 15:59
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633473-02	8M422090	10/11/17 17:57	01
LCS2	WG633473-03	8M422091	10/11/17 18:26	01
PW101-06A-LA-26	L17100514-02	8M422097	10/11/17 21:21	01
PMW101-07B-LA-26	L17100514-04	8M422099	10/11/17 22:21	01
PMW101-02B-LA-26	L17100514-07	8M422100	10/11/17 22:50	01
MW-100B-LA-26	L17100514-09	8M422101	10/11/17 23:19	01
PMW21-04-LA-26	L17100514-10	8M422103	10/12/17 00:17	01
PMW101-03B-LA-26	L17100514-05	8M422104	10/12/17 00:47	01
MW101T-LA-26	L17100514-06	8M422105	10/12/17 01:16	01

Report Name: BLANK_SUMMARY
PDF File ID: 5527360
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100514
Work Group: WG633719
Blank File ID: 8M422121
Blank Sample ID: WG633719-01
Prep Date: 10/12/17 13:31
Instrument ID: HPMS8
Analyzed Date: 10/12/17 13:31
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633719-02	8M422122	10/12/17 14:00	01
DR1-6-LA-26-MS	L17100514-15	8M422123	10/12/17 14:30	01
DR1-6-LA-26-MSD	L17100514-16	8M422124	10/12/17 14:59	01
DR1-6-LA-26	L17100514-14	8M422130	10/12/17 17:54	01
DR2-1-LA-26	L17100514-01	8M422131	10/12/17 18:24	02
MW101B-LA-26	L17100514-08	8M422132	10/12/17 18:53	02
PMW21-04-LA-26	L17100514-10	8M422133	10/12/17 19:23	DL01
PMW101-06B-LA-26	L17100514-12	8M422134	10/12/17 19:51	01
PMW101-03A-LA-26	L17100514-13	8M422135	10/12/17 20:21	01
DUP-6-LA-26	L17100514-17	8M422136	10/12/17 20:51	01
DR1-3-LA-26	L17100514-19	8M422137	10/12/17 21:20	01
PMW21-02-LA-26	L17100514-18	8M422138	10/12/17 21:49	01
MW-21-LA-26	L17100514-11	8M422140	10/12/17 22:49	01
DUP-2-LA-26	L17100514-21	8M422141	10/12/17 23:18	01

Report Name: BLANK_SUMMARY
PDF File ID: 5527360
Report generated 10/18/2017 15:54

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100514 Prep Date:10/12/17 13:59 Sample ID:WG633730-01
Instrument ID:HPMS6 Run Date:10/12/17 13:59 Prep Method:5030B/5030C/503
File ID:6M150593 Analyst:TMB Method:8260B
Workgroup (AAB#):WG633730 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5524665
18-OCT-2017 15:54

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100514 Prep Date: 10/12/17 13:59 Sample ID: WG633730-01
Instrument ID: HPMS6 Run Date: 10/12/17 13:59 Prep Method: 5030B/5030C/503
File ID: 6M150593 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633730 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	98.3	85	-	115	PASS
1,2-Dichloroethane-d4	98.5	72	-	119	PASS
Toluene-d8	100	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100514 Prep Date:10/17/17 08:16 Sample ID:WG634168-01
Instrument ID:HPMS6 Run Date:10/17/17 08:16 Prep Method:5030B/5030C/503
File ID:6M150726 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634168 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100514 Prep Date: 10/17/17 08:16 Sample ID: WG634168-01
Instrument ID: HPMS6 Run Date: 10/17/17 08:16 Prep Method: 5030B/5030C/503
File ID: 6M150726 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	99.0	85	-	115	PASS
1,2-Dichloroethane-d4	100	72	-	119	PASS
Toluene-d8	98.6	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100514 Prep Date:10/11/17 15:59 Sample ID:WG633473-01
Instrument ID:HPMS8 Run Date:10/11/17 15:59 Prep Method:5030B/5030C/503
File ID:8M422086 Analyst:TMB Method:8260B
Workgroup (AAB#):WG633473 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-13-SEP-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100514 Prep Date: 10/11/17 15:59 Sample ID: WG633473-01
Instrument ID: HPMS8 Run Date: 10/11/17 15:59 Prep Method: 5030B/5030C/503
File ID: 8M422086 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633473 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-13-SEP-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	91.3	85	-	115	PASS
1,2-Dichloroethane-d4	90.5	72	-	119	PASS
Toluene-d8	98.2	81	-	120	PASS
4-Bromofluorobenzene	100	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100514 Prep Date: 10/12/17 13:31 Sample ID: WG633719-01
Instrument ID: HPMS8 Run Date: 10/12/17 13:31 Prep Method: 5030B/5030C/503
File ID: 8M422121 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633719 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-13-SEP-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100514 Prep Date: 10/12/17 13:31 Sample ID: WG633719-01
Instrument ID: HPMS8 Run Date: 10/12/17 13:31 Prep Method: 5030B/5030C/503
File ID: 8M422121 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633719 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-13-SEP-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	85.2	85	-	115	PASS
1,2-Dichloroethane-d4	85.8	72	-	119	PASS
Toluene-d8	95.8	81	-	120	PASS
4-Bromofluorobenzene	100	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633730-02
Instrument ID: HPMS6 Run Time: 16:29 Prep Method: 5030B/5030C/503
File ID: 6M150598 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633730 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.6	103	81 - 129	
1,1,1-Trichloroethane	20.0	21.0	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.9	99.7	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	19.8	99.0	69 - 133	
1,1-Dichloroethene	20.0	21.2	106	68 - 130	
1,1-Dichloropropene	20.0	21.3	107	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.5	103	67 - 137	
1,2,3-Trichloropropane	20.0	20.4	102	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.0	105	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.2	106	74 - 132	
1,2-Dichloroethane	20.0	20.4	102	69 - 132	
1,2-Dichlorobenzene	20.0	20.4	102	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.0	105	50 - 132	
1,2-Dichloropropane	20.0	20.7	104	75 - 125	
1,2-Dibromoethane	20.0	21.0	105	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.6	108	74 - 131	
1,3-Dichlorobenzene	20.0	20.3	101	75 - 124	
1,3-Dichloropropane	20.0	21.4	107	73 - 126	
1,4-Dichlorobenzene	20.0	19.7	98.6	74 - 123	
1,4-Dioxane	200	186	93.0	60 - 140	
1-Chlorohexane	20.0	21.8	109	70 - 125	
2,2-Dichloropropane	20.0	19.8	98.8	69 - 137	
2-Hexanone	20.0	20.4	102	55 - 130	
2-Chlorotoluene	20.0	21.6	108	73 - 126	
4-Chlorotoluene	20.0	19.4	97.2	74 - 128	
Acetone	20.0	21.8	109	40 - 135	
Benzene	20.0	20.5	103	81 - 122	
Bromobenzene	20.0	20.3	102	76 - 124	
Bromochloromethane	20.0	20.6	103	65 - 129	
Bromodichloromethane	20.0	20.0	99.8	76 - 121	
Bromoform	20.0	19.5	97.5	69 - 128	
Bromomethane	20.0	21.2	106	30 - 141	
Carbon disulfide	20.0	18.3	91.6	58 - 128	
Carbon tetrachloride	20.0	21.0	105	66 - 138	
Chlorobenzene	20.0	20.6	103	81 - 122	
Chloroethane	20.0	24.0	120	58 - 133	
Chloroform	20.0	19.9	99.6	69 - 128	
Chloromethane	20.0	26.2	131	56 - 131	
cis-1,2-Dichloroethene	20.0	20.8	104	72 - 126	
cis-1,3-Dichloropropene	20.0	23.2	116	69 - 131	

LCS - Modified 03/06/2008
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Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633730-02
Instrument ID: HPMS6 Run Time: 16:29 Prep Method: 5030B/5030C/503
File ID: 6M150598 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633730 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.1	101	66 - 133	
Dibromomethane	20.0	21.0	105	76 - 125	
Dichlorodifluoromethane	20.0	27.8	139	30 - 153	
Ethylbenzene	20.0	21.4	107	73 - 127	
Hexachlorobutadiene	20.0	20.9	105	67 - 131	
Isopropylbenzene	20.0	21.3	106	75 - 127	
Methylene chloride	20.0	19.9	99.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.4	102	65 - 123	
MEK (2-Butanone)	20.0	20.2	101	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.0	99.8	58 - 134	
n-Butylbenzene	20.0	21.3	107	69 - 137	
n-Propylbenzene	20.0	22.0	110	72 - 129	
m-,p-Xylene	40.0	42.5	106	76 - 128	
Naphthalene	20.0	21.9	109	54 - 138	
o-Xylene	20.0	21.9	110	80 - 121	
p-Isopropyltoluene	20.0	21.5	107	73 - 130	
sec-Butylbenzene	20.0	21.2	106	72 - 127	
Styrene	20.0	22.4	112	65 - 134	
Trichloroethene	20.0	20.9	104	70 - 127	
tert-Butylbenzene	20.0	20.9	105	70 - 129	
Tetrachloroethene	20.0	20.6	103	66 - 128	
Toluene	20.0	20.8	104	77 - 122	
trans-1,2-Dichloroethene	20.0	21.2	106	63 - 137	
trans-1,3-Dichloropropene	20.0	21.1	105	59 - 135	
Trichlorofluoromethane	20.0	21.7	109	57 - 129	
Vinyl chloride	20.0	26.8	134	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.1	85 - 115	PASS
1,2-Dichloroethane-d4	95.9	72 - 119	PASS
Toluene-d8	98.7	81 - 120	PASS
4-Bromofluorobenzene	98.9	76 - 119	PASS

* EXCEEDS %REC LIMIT

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634168-02
Instrument ID: HPMS6 Run Time: 09:15 Prep Method: 5030B/5030C/503
File ID: 6M150728 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.1	101	81 - 129	
1,1,1-Trichloroethane	20.0	21.0	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.3	96.5	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	21.5	108	68 - 130	
1,1-Dichloropropene	20.0	21.6	108	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.8	93.9	67 - 137	
1,2,3-Trichloropropane	20.0	20.2	101	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.4	97.0	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.5	102	74 - 132	
1,2-Dichloroethane	20.0	21.1	106	69 - 132	
1,2-Dichlorobenzene	20.0	19.6	97.9	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.5	102	50 - 132	
1,2-Dichloropropane	20.0	20.9	105	75 - 125	
1,2-Dibromoethane	20.0	20.4	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.0	105	74 - 131	
1,3-Dichlorobenzene	20.0	19.7	98.5	75 - 124	
1,3-Dichloropropane	20.0	20.9	105	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	94.2	74 - 123	
1,4-Dioxane	200	133	66.6	60 - 140	
1-Chlorohexane	20.0	20.0	99.9	70 - 125	
2,2-Dichloropropane	20.0	19.9	99.7	69 - 137	
2-Hexanone	20.0	19.7	98.3	55 - 130	
2-Chlorotoluene	20.0	21.0	105	73 - 126	
4-Chlorotoluene	20.0	19.3	96.5	74 - 128	
Acetone	20.0	21.7	108	40 - 135	
Benzene	20.0	20.5	103	81 - 122	
Bromobenzene	20.0	19.7	98.7	76 - 124	
Bromochloromethane	20.0	21.1	105	65 - 129	
Bromodichloromethane	20.0	20.4	102	76 - 121	
Bromoform	20.0	19.1	95.5	69 - 128	
Bromomethane	20.0	17.0	84.9	30 - 141	
Carbon disulfide	20.0	17.6	88.0	58 - 128	
Carbon tetrachloride	20.0	20.9	105	66 - 138	
Chlorobenzene	20.0	20.0	100	81 - 122	
Chloroethane	20.0	23.3	116	58 - 133	
Chloroform	20.0	20.3	101	69 - 128	
Chloromethane	20.0	23.6	118	56 - 131	
cis-1,2-Dichloroethene	20.0	21.1	105	72 - 126	
cis-1,3-Dichloropropene	20.0	23.0	115	69 - 131	

LCS - Modified 03/06/2008
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Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634168-02
Instrument ID: HPMS6 Run Time: 09:15 Prep Method: 5030B/5030C/503
File ID: 6M150728 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.8	99.0	66 - 133	
Dibromomethane	20.0	21.3	107	76 - 125	
Dichlorodifluoromethane	20.0	24.4	122	30 - 153	
Ethylbenzene	20.0	20.5	102	73 - 127	
Hexachlorobutadiene	20.0	17.3	86.4	67 - 131	
Isopropylbenzene	20.0	20.2	101	75 - 127	
Methylene chloride	20.0	19.9	99.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.1	100	65 - 123	
MEK (2-Butanone)	20.0	20.6	103	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.9	99.6	58 - 134	
n-Butylbenzene	20.0	19.5	97.7	69 - 137	
n-Propylbenzene	20.0	21.2	106	72 - 129	
m-,p-Xylene	40.0	41.0	103	76 - 128	
Naphthalene	20.0	20.4	102	54 - 138	
o-Xylene	20.0	21.1	106	80 - 121	
p-Isopropyltoluene	20.0	20.2	101	73 - 130	
sec-Butylbenzene	20.0	19.8	99.0	72 - 127	
Styrene	20.0	21.7	109	65 - 134	
Trichloroethene	20.0	21.1	105	70 - 127	
tert-Butylbenzene	20.0	20.1	101	70 - 129	
Tetrachloroethene	20.0	19.6	97.9	66 - 128	
Toluene	20.0	20.3	102	77 - 122	
trans-1,2-Dichloroethene	20.0	21.1	105	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	103	59 - 135	
Trichlorofluoromethane	20.0	21.2	106	57 - 129	
Vinyl chloride	20.0	26.1	130	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.5	85 - 115	PASS
1,2-Dichloroethane-d4	99.8	72 - 119	PASS
Toluene-d8	98.0	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5524668
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Run Date: 10/11/2017 Sample ID: WG633473-02
Instrument ID: HPMS8 Run Time: 17:57 Prep Method: 5030B/5030C/503
File ID: 8M422090 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633473 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84292 Cal ID: HPMS8-13-SEP-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.4	102	81 - 129	
1,1,1-Trichloroethane	20.0	19.5	97.7	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.7	103	63 - 128	
1,1,2-Trichloroethane	20.0	20.0	100	75 - 125	
1,1-Dichloroethane	20.0	17.0	85.2	69 - 133	
1,1-Dichloroethene	20.0	15.7	78.7	68 - 130	
1,1-Dichloropropene	20.0	20.3	101	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.3	96.5	67 - 137	
1,2,3-Trichloropropane	20.0	21.8	109	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.4	91.8	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.6	103	74 - 132	
1,2-Dichloroethane	20.0	18.8	93.8	69 - 132	
1,2-Dichlorobenzene	20.0	19.5	97.4	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.3	101	50 - 132	
1,2-Dichloropropane	20.0	19.6	97.8	75 - 125	
1,2-Dibromoethane	20.0	21.1	106	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.2	101	74 - 131	
1,3-Dichlorobenzene	20.0	19.2	95.9	75 - 124	
1,3-Dichloropropane	20.0	21.1	106	73 - 126	
1,4-Dichlorobenzene	20.0	19.5	97.4	74 - 123	
1,4-Dioxane	200	217	109	60 - 140	
1-Chlorohexane	20.0	19.0	95.0	70 - 125	
2,2-Dichloropropane	20.0	16.9	84.7	69 - 137	
2-Hexanone	20.0	18.5	92.5	55 - 130	
2-Chlorotoluene	20.0	18.7	93.4	73 - 126	
4-Chlorotoluene	20.0	19.1	95.6	74 - 128	
Acetone	20.0	18.1	90.4	40 - 135	
Benzene	20.0	20.6	103	81 - 122	
Bromobenzene	20.0	19.4	97.0	76 - 124	
Bromochloromethane	20.0	18.8	93.8	65 - 129	
Bromodichloromethane	20.0	19.9	99.4	76 - 121	
Bromoform	20.0	18.7	93.6	69 - 128	
Bromomethane	20.0	15.7	78.6	30 - 141	
Carbon disulfide	20.0	17.9	89.4	58 - 128	
Carbon tetrachloride	20.0	18.8	94.0	66 - 138	
Chlorobenzene	20.0	19.5	97.6	81 - 122	
Chloroethane	20.0	20.7	103	58 - 133	
Chloroform	20.0	18.4	92.1	69 - 128	
Chloromethane	20.0	19.1	95.4	56 - 131	
cis-1,2-Dichloroethene	20.0	17.9	89.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.7	109	69 - 131	

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PDF File ID: 5524668
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Login Number: L17100514 Run Date: 10/11/2017 Sample ID: WG633473-02
Instrument ID: HPMS8 Run Time: 17:57 Prep Method: 5030B/5030C/503
File ID: 8M422090 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633473 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84292 Cal ID: HPMS8-13-SEP-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.7	98.3	66 - 133	
Dibromomethane	20.0	18.9	94.4	76 - 125	
Dichlorodifluoromethane	20.0	22.8	114	30 - 153	
Ethylbenzene	20.0	19.7	98.6	73 - 127	
Hexachlorobutadiene	20.0	16.5	82.6	67 - 131	
Isopropylbenzene	20.0	19.7	98.3	75 - 127	
Methylene chloride	20.0	18.7	93.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.9	105	65 - 123	
MEK (2-Butanone)	20.0	19.4	96.8	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.8	99.2	58 - 134	
n-Butylbenzene	20.0	18.6	93.1	69 - 137	
n-Propylbenzene	20.0	19.2	96.2	72 - 129	
m-,p-Xylene	40.0	40.3	101	76 - 128	
Naphthalene	20.0	23.7	119	54 - 138	
o-Xylene	20.0	20.8	104	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.4	73 - 130	
sec-Butylbenzene	20.0	20.1	101	72 - 127	
Styrene	20.0	21.5	107	65 - 134	
Trichloroethene	20.0	20.9	104	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	18.1	90.6	66 - 128	
Toluene	20.0	18.9	94.5	77 - 122	
trans-1,2-Dichloroethene	20.0	16.5	82.7	63 - 137	
trans-1,3-Dichloropropene	20.0	20.0	99.9	59 - 135	
Trichlorofluoromethane	20.0	19.9	99.3	57 - 129	
Vinyl chloride	20.0	23.5	117	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	91.5	85 - 115	PASS
1,2-Dichloroethane-d4	88.3	72 - 119	PASS
Toluene-d8	97.8	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633719-02
Instrument ID: HPMS8 Run Time: 14:00 Prep Method: 5030B/5030C/503
File ID: 8M422122 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633719 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS8-13-SEP-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	21.6	108	81 - 129	
1,1,1-Trichloroethane	20.0	21.3	106	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.9	105	63 - 128	
1,1,2-Trichloroethane	20.0	20.7	103	75 - 125	
1,1-Dichloroethane	20.0	16.8	84.0	69 - 133	
1,1-Dichloroethene	20.0	17.0	85.2	68 - 130	
1,1-Dichloropropene	20.0	22.6	113	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.0	94.8	67 - 137	
1,2,3-Trichloropropane	20.0	22.8	114	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.5	92.7	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.6	108	74 - 132	
1,2-Dichloroethane	20.0	19.4	96.9	69 - 132	
1,2-Dichlorobenzene	20.0	20.3	102	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.8	98.8	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	22.4	112	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.2	106	74 - 131	
1,3-Dichlorobenzene	20.0	19.7	98.3	75 - 124	
1,3-Dichloropropane	20.0	22.0	110	73 - 126	
1,4-Dichlorobenzene	20.0	20.4	102	74 - 123	
1,4-Dioxane	200	225	113	60 - 140	
1-Chlorohexane	20.0	20.1	101	70 - 125	
2,2-Dichloropropane	20.0	20.2	101	69 - 137	
2-Hexanone	20.0	18.0	90.2	55 - 130	
2-Chlorotoluene	20.0	20.1	101	73 - 126	
4-Chlorotoluene	20.0	19.9	99.3	74 - 128	
Acetone	20.0	17.5	87.6	40 - 135	
Benzene	20.0	22.4	112	81 - 122	
Bromobenzene	20.0	20.2	101	76 - 124	
Bromochloromethane	20.0	19.5	97.4	65 - 129	
Bromodichloromethane	20.0	21.3	107	76 - 121	
Bromoform	20.0	19.4	97.0	69 - 128	
Bromomethane	20.0	15.3	76.4	30 - 141	
Carbon disulfide	20.0	18.1	90.4	58 - 128	
Carbon tetrachloride	20.0	20.6	103	66 - 138	
Chlorobenzene	20.0	20.8	104	81 - 122	
Chloroethane	20.0	21.2	106	58 - 133	
Chloroform	20.0	18.2	91.2	69 - 128	
Chloromethane	20.0	20.0	99.8	56 - 131	
cis-1,2-Dichloroethene	20.0	17.9	89.6	72 - 126	
cis-1,3-Dichloropropene	20.0	23.9	119	69 - 131	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633719-02
Instrument ID: HPMS8 Run Time: 14:00 Prep Method: 5030B/5030C/503
File ID: 8M422122 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633719 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS8-13-SEP-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.4	102	66 - 133	
Dibromomethane	20.0	19.4	96.8	76 - 125	
Dichlorodifluoromethane	20.0	23.5	117	30 - 153	
Ethylbenzene	20.0	20.8	104	73 - 127	
Hexachlorobutadiene	20.0	17.2	86.1	67 - 131	
Isopropylbenzene	20.0	20.9	104	75 - 127	
Methylene chloride	20.0	20.1	101	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.7	98.5	65 - 123	
MEK (2-Butanone)	20.0	18.8	93.9	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.7	98.5	58 - 134	
n-Butylbenzene	20.0	19.8	98.9	69 - 137	
n-Propylbenzene	20.0	20.6	103	72 - 129	
m-,p-Xylene	40.0	43.2	108	76 - 128	
Naphthalene	20.0	22.8	114	54 - 138	
o-Xylene	20.0	22.1	110	80 - 121	
p-Isopropyltoluene	20.0	20.5	103	73 - 130	
sec-Butylbenzene	20.0	21.0	105	72 - 127	
Styrene	20.0	22.7	114	65 - 134	
Trichloroethene	20.0	22.5	112	70 - 127	
tert-Butylbenzene	20.0	19.8	98.9	70 - 129	
Tetrachloroethene	20.0	19.5	97.6	66 - 128	
Toluene	20.0	20.3	102	77 - 122	
trans-1,2-Dichloroethene	20.0	16.7	83.5	63 - 137	
trans-1,3-Dichloropropene	20.0	21.6	108	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	23.9	120	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	85.3	85 - 115	PASS
1,2-Dichloroethane-d4	83.3	72 - 119	PASS
Toluene-d8	95.2	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5524668
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG633473 Units: ug/L
QC Key: AF40 Lot #: STD84292

Sample ID: WG633473-02 LCS File ID: 8M422090 Run Date: 10/11/2017 17:57
Sample ID: WG633473-03 LCS2 File ID: 8M422091 Run Date: 10/11/2017 18:26

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.4	102	20.0	20.1	100	1.42	81 - 129	20	
1,1,1-Trichloroethane	20.0	19.5	97.7	20.0	19.7	98.3	0.683	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	20.7	103	20.0	19.7	98.7	4.52	63 - 128	20	
1,1,2-Trichloroethane	20.0	20.0	100	20.0	19.5	97.5	2.67	75 - 125	20	
1,1-Dichloroethane	20.0	17.0	85.2	20.0	16.9	84.4	1.02	69 - 133	20	
1,1-Dichloroethene	20.0	15.7	78.7	20.0	16.3	81.5	3.51	68 - 130	20	
1,1-Dichloropropene	20.0	20.3	101	20.0	20.4	102	0.412	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.3	96.5	20.0	18.6	92.9	3.72	67 - 137	20	
1,2,3-Trichloropropane	20.0	21.8	109	20.0	21.1	106	2.96	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	18.4	91.8	20.0	18.2	91.2	0.671	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.6	103	20.0	20.0	100	2.50	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	20.3	101	20.0	18.6	93.0	8.77	50 - 132	20	
1,2-Dibromoethane	20.0	21.1	106	20.0	20.9	105	1.07	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.5	97.4	20.0	19.3	96.3	1.12	71 - 122	20	
1,2-Dichloroethane	20.0	18.8	93.8	20.0	18.6	92.9	0.969	69 - 132	20	
1,2-Dichloropropane	20.0	19.6	97.8	20.0	19.6	98.0	0.206	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	20.2	101	20.0	19.8	99.1	1.83	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.2	95.9	20.0	18.9	94.7	1.26	75 - 124	20	
1,3-Dichloropropane	20.0	21.1	106	20.0	20.8	104	1.63	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.5	97.4	20.0	19.1	95.6	1.94	74 - 123	20	
1,4-Dioxane	200	217	109	200	188	93.8	14.7	60 - 140	20	
1-Chlorohexane	20.0	19.0	95.0	20.0	20.2	101	6.28	70 - 125	20	
2,2-Dichloropropane	20.0	16.9	84.7	20.0	19.2	96.0	12.5	69 - 137	20	
MEK (2-Butanone)	20.0	19.4	96.8	20.0	18.8	94.0	2.92	49 - 136	20	
2-Chlorotoluene	20.0	18.7	93.4	20.0	18.2	91.0	2.63	73 - 126	20	
2-Hexanone	20.0	18.5	92.5	20.0	18.6	92.9	0.403	55 - 130	20	
4-Chlorotoluene	20.0	19.1	95.6	20.0	19.3	96.3	0.794	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.8	99.2	20.0	20.2	101	1.92	58 - 134	20	
Acetone	20.0	18.1	90.4	20.0	17.6	88.1	2.58	40 - 135	20	
Benzene	20.0	20.6	103	20.0	20.5	102	0.463	81 - 122	20	
Bromobenzene	20.0	19.4	97.0	20.0	19.0	95.0	2.11	76 - 124	20	
Bromochloromethane	20.0	18.8	93.8	20.0	19.0	95.1	1.28	65 - 129	20	
Bromodichloromethane	20.0	19.9	99.4	20.0	19.7	98.7	0.652	76 - 121	20	
Bromoform	20.0	18.7	93.6	20.0	18.3	91.5	2.18	69 - 128	20	
Bromomethane	20.0	15.7	78.6	20.0	17.1	85.7	8.56	30 - 141	20	
Carbon disulfide	20.0	17.9	89.4	20.0	18.1	90.4	1.10	58 - 128	20	
Carbon tetrachloride	20.0	18.8	94.0	20.0	18.8	93.9	0.0730	66 - 138	20	
Chlorobenzene	20.0	19.5	97.6	20.0	19.4	97.1	0.432	81 - 122	20	
Chloroethane	20.0	20.7	103	20.0	21.6	108	4.33	58 - 133	20	
Chloroform	20.0	18.4	92.1	20.0	18.0	90.0	2.39	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5527361
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100514 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG633473 Units: ug/L
QC Key: AF40 Lot #: STD84292

Sample ID: WG633473-02 LCS File ID: 8M422090 Run Date: 10/11/2017 17:57
Sample ID: WG633473-03 LCS2 File ID: 8M422091 Run Date: 10/11/2017 18:26

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	19.1	95.4	20.0	19.6	98.0	2.68	56 - 131	20	
cis-1,2-Dichloroethene	20.0	17.9	89.7	20.0	17.8	88.8	0.927	72 - 126	20	
cis-1,3-Dichloropropene	20.0	21.7	109	20.0	21.8	109	0.570	69 - 131	20	
Dibromochloromethane	20.0	19.7	98.3	20.0	19.2	95.9	2.46	66 - 133	20	
Dibromomethane	20.0	18.9	94.4	20.0	19.1	95.7	1.45	76 - 125	20	
Dichlorodifluoromethane	20.0	22.8	114	20.0	23.4	117	2.65	30 - 153	20	
Ethylbenzene	20.0	19.7	98.6	20.0	19.6	98.0	0.646	73 - 127	20	
Hexachlorobutadiene	20.0	16.5	82.6	20.0	16.6	83.2	0.726	67 - 131	20	
Isopropylbenzene	20.0	19.7	98.3	20.0	19.7	98.6	0.327	75 - 127	20	
m-,p-Xylene	40.0	40.3	101	40.0	40.1	100	0.397	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.9	105	20.0	20.7	104	1.07	65 - 123	20	
Methylene chloride	20.0	18.7	93.4	20.0	19.0	95.1	1.74	63 - 137	20	
n-Butylbenzene	20.0	18.6	93.1	20.0	18.5	92.4	0.693	69 - 137	20	
n-Propylbenzene	20.0	19.2	96.2	20.0	19.2	95.9	0.331	72 - 129	20	
Naphthalene	20.0	23.7	119	20.0	22.9	114	3.66	54 - 138	20	
o-Xylene	20.0	20.8	104	20.0	20.7	104	0.495	80 - 121	20	
p-Isopropyltoluene	20.0	19.7	98.4	20.0	19.3	96.6	1.84	73 - 130	20	
sec-Butylbenzene	20.0	20.1	101	20.0	19.9	99.4	1.33	72 - 127	20	
Styrene	20.0	21.5	107	20.0	21.2	106	1.34	65 - 134	20	
tert-Butylbenzene	20.0	19.2	96.1	20.0	18.4	92.2	4.11	70 - 129	20	
Tetrachloroethene	20.0	18.1	90.6	20.0	18.1	90.7	0.0407	66 - 128	20	
Toluene	20.0	18.9	94.5	20.0	18.9	94.6	0.174	77 - 122	20	
trans-1,2-Dichloroethene	20.0	16.5	82.7	20.0	16.9	84.5	2.08	63 - 137	20	
trans-1,3-Dichloropropene	20.0	20.0	99.9	20.0	20.0	100	0.301	59 - 135	20	
Trichloroethene	20.0	20.9	104	20.0	20.4	102	2.32	70 - 127	20	
Trichlorofluoromethane	20.0	19.9	99.3	20.0	20.4	102	2.86	57 - 129	20	
Vinyl chloride	20.0	23.5	117	20.0	24.2	121	2.97	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	88.3	86.8	72 - 119	PASS
Dibromofluoromethane	91.5	89.4	85 - 115	PASS
4-Bromofluorobenzene	101	99.5	76 - 119	PASS
Toluene-d8	97.8	97.0	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5527361
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100514 Cal ID: HPMS8- 13-SEP-17 Worknum: WG633719

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100514-14 File ID: 8M422130 Dil: 1 Method: 5035A

Sample ID: L17100514-15 MS File ID: 8M422123 Dil: 1 Matrix: 8260B

Sample ID: L17100514-16 MSD File ID: 8M422124 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	21.4	107	20.0	20.6	103	3.64	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.5	103	20.0	20.5	103	0.0836	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.3	107	20.0	20.6	103	3.69	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	20.9	104	20.0	19.9	99.6	4.67	75 - 125	20	
1,1-Dichloroethane	U	20.0	16.8	84	20.0	17.5	87.3	3.76	69 - 133	20	
1,1-Dichloroethene	U	20.0	17.3	86.3	20.0	17.3	86.3	0.0738	68 - 130	20	
1,1-Dichloropropene	U	20.0	22.1	110	20.0	21.3	106	3.69	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.6	97.8	20.0	19.0	95.2	2.61	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	22.3	111	20.0	21.9	110	1.58	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	19.0	95	20.0	18.6	92.8	2.26	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	21.4	107	20.0	21.2	106	0.961	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.2	96	20.0	19.7	98.7	2.85	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.3	101	20.0	19.9	99.5	1.78	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	20.5	103	20.0	18.8	94.2	8.53	50 - 132	20	
1,2-Dichloropropane	U	20.0	20.4	102	20.0	20.1	101	1.41	75 - 125	20	
1,2-Dibromoethane	U	20.0	22.9	115	20.0	21.7	109	5.19	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.9	105	20.0	20.6	103	1.45	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.8	99.1	20.0	19.5	97.3	1.85	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.9	110	20.0	21.2	106	3.38	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.2	101	20.0	19.8	99	1.84	74 - 123	20	
1,4-Dioxane	U	200	235	117	200	212	106	10.1	60 - 140	20	
1-Chlorohexane	U	20.0	19.9	99.5	20.0	19.1	95.7	3.93	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.3	102	20.0	20.2	101	0.854	69 - 137	20	
2-Hexanone	U	20.0	19.0	94.9	20.0	17.5	87.3	8.40	55 - 130	20	
2-Chlorotoluene	U	20.0	19.8	98.8	20.0	17.5	87.4	12.3	73 - 126	20	
4-Chlorotoluene	U	20.0	19.9	99.4	20.0	22.1	110	10.6	74 - 128	20	
Acetone	9.79	20.0	26.4	83.2	20.0	26.5	83.5	0.199	40 - 135	20	
Benzene	U	20.0	21.9	109	20.0	21.4	107	2.10	81 - 122	20	
Bromobenzene	U	20.0	20.0	100	20.0	19.7	98.3	1.85	76 - 124	20	
Bromochloromethane	U	20.0	19.7	98.6	20.0	19.7	98.4	0.248	65 - 129	20	
Bromodichloromethane	U	20.0	21.1	106	20.0	20.6	103	2.32	76 - 121	20	
Bromoform	U	20.0	19.2	95.9	20.0	18.4	92	4.14	69 - 128	20	
Bromomethane	U	20.0	15.8	78.9	20.0	16.0	79.9	1.32	30 - 141	20	
Carbon disulfide	U	20.0	17.9	89.3	20.0	17.4	87.2	2.46	58 - 128	20	
Carbon tetrachloride	U	20.0	19.8	98.8	20.0	19.7	98.5	0.290	66 - 138	20	
Chlorobenzene	U	20.0	20.7	103	20.0	20.0	100	3.24	81 - 122	20	
Chloroethane	U	20.0	20.7	103	20.0	20.1	101	2.78	58 - 133	20	
Chloroform	0.158	20.0	18.4	91.3	20.0	19.3	95.6	4.61	69 - 128	20	
Chloromethane	U	20.0	19.1	95.3	20.0	17.9	89.4	6.36	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	17.6	88.2	20.0	18.5	92.4	4.72	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	23.6	118	20.0	23.1	116	2.27	69 - 131	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5527690

Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100514 Cal ID: HPMS8 13-SEP-17 Worknum: WG633719

Instrument ID: HPMS8 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100514-14 File ID: 8M422130 Dil: 1 Method: 5035A

Sample ID: L17100514-15 MS File ID: 8M422123 Dil: 1 Matrix: 8260B

Sample ID: L17100514-16 MSD File ID: 8M422124 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	20.6	103	20.0	19.6	98.2	4.67	66 - 133	20	
Dibromomethane	U	20.0	19.4	97.2	20.0	20.0	99.8	2.66	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.7	113	20.0	22.1	111	2.51	30 - 153	20	
Ethylbenzene	U	20.0	20.8	104	20.0	20.3	101	2.60	73 - 127	20	
Hexachlorobutadiene	U	20.0	16.9	84.3	20.0	17.1	85.6	1.51	67 - 131	20	
Isopropylbenzene	U	20.0	20.5	102	20.0	19.8	99.2	3.12	75 - 127	20	
Methylene chloride	U	20.0	19.8	98.9	20.0	19.8	99.1	0.223	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.1	100	20.0	20.1	101	0.305	65 - 123	20	
MEK (2-Butanone)	U	20.0	19.7	98.5	20.0	19.0	95.1	3.43	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	18.8	93.8	20.0	17.6	87.8	6.63	58 - 134	20	
n-Butylbenzene	U	20.0	19.5	97.3	20.0	19.4	96.8	0.492	69 - 137	20	
n-Propylbenzene	U	20.0	20.3	101	20.0	19.9	99.3	2.06	72 - 129	20	
m-,p-Xylene	U	40.0	42.7	107	40.0	40.9	102	4.36	76 - 128	20	
Naphthalene	U	20.0	23.4	117	20.0	22.5	112	4.12	54 - 138	20	
o-Xylene	U	20.0	21.9	109	20.0	21.0	105	3.89	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.4	102	20.0	20.1	100	1.42	73 - 130	20	
sec-Butylbenzene	U	20.0	20.5	102	20.0	20.4	102	0.0461	72 - 127	20	
Styrene	U	20.0	22.4	112	20.0	21.7	108	3.36	65 - 134	20	
Trichloroethene	U	20.0	22.1	110	20.0	21.5	108	2.45	70 - 127	20	
tert-Butylbenzene	U	20.0	19.4	97	20.0	19.2	95.9	1.19	70 - 129	20	
Tetrachloroethene	8.58	20.0	26.5	89.6	20.0	25.5	84.5	3.89	66 - 128	20	
Toluene	U	20.0	20.2	101	20.0	19.4	97.2	4.00	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	16.8	84.2	20.0	17.6	87.9	4.35	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	21.9	109	20.0	20.7	104	5.47	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.2	101	20.0	19.9	99.7	1.52	57 - 129	20	
Vinyl chloride	U	20.0	23.5	118	20.0	23.0	115	2.35	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5527690

Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633727

Tune ID: WG633727-01
Run Date: 10/12/2017
Run Time: 12:34
File ID: 6M150590
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.6	7725	PASS
75.0	95.0	30.0	60.0	48.7	16660	PASS
95.0	95.0	100	100	100	34237	PASS
96.0	95.0	5.00	9.00	6.97	2387	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.3	27152	PASS
175	174	5.00	9.00	7.55	2051	PASS
176	174	95.0	101	98.6	26762	PASS
177	176	5.00	9.00	6.68	1787	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633727-02	CCV	01	10/12/2017 13:01	
WG633730-01	BLANK	01	10/12/2017 13:59	
WG633730-02	LCS	01	10/12/2017 16:29	
L17100514-24	DUP-1-LA-26	01	10/12/2017 18:57	
L17100514-25	DR1-4-LA-26	01	10/12/2017 19:26	
L17100514-26	PMW101-07A-LA-26	01	10/12/2017 19:55	
L17100514-31	PMW101-02A-LA-26	01	10/12/2017 20:25	
L17100514-23	PMW21-01-LA-26	01	10/12/2017 20:54	
L17100514-22	DR1-5A-LA-26	01	10/12/2017 21:24	
L17100514-27	DR1-5-LA-26	01	10/12/2017 21:53	
L17100514-28	MW-279-LA-26	01	10/12/2017 22:22	
L17100514-29	PMW101-04B-LA-26	01	10/12/2017 22:52	
L17100514-30	PMW101-04A-LA-26	01	10/12/2017 23:22	
WG633730-06	BLANK2	01	10/13/2017 00:50	*
WG633556-01	FBLK1	DL01	10/13/2017 02:49	*
WG633317-01	FBLK1	DL01	10/13/2017 03:19	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: TMB
Workgroup: WG634167

Tune ID: WG634167-01
Run Date: 10/17/2017
Run Time: 06:51
File ID: 6M150723
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.7	7680	PASS
75.0	95.0	30.0	60.0	48.9	17299	PASS
95.0	95.0	100	100	100	35400	PASS
96.0	95.0	5.00	9.00	6.49	2297	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	81.2	28749	PASS
175	174	5.00	9.00	7.59	2183	PASS
176	174	95.0	101	100	28872	PASS
177	176	5.00	9.00	6.62	1912	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634167-02	CCV	01	10/17/2017 07:18	
WG634168-01	BLANK	01	10/17/2017 08:16	
WG634168-02	LCS	01	10/17/2017 09:15	
L17100514-20	PMW21-03-LA-26	03	10/17/2017 17:06	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS6
Analyst: JDS
Workgroup: WG634399

Tune ID: WG634399-01
Run Date: 10/17/2017
Run Time: 20:44
File ID: 6M150750
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.2	10353	PASS
75.0	95.0	30.0	60.0	48.5	22583	PASS
95.0	95.0	100	100	100	46597	PASS
96.0	95.0	5.00	9.00	6.73	3138	PASS
173	174	0	2.00	0.353	133	PASS
174	95.0	50.0	100	80.8	37656	PASS
175	174	5.00	9.00	7.20	2710	PASS
176	174	95.0	101	98.8	37218	PASS
177	176	5.00	9.00	6.86	2553	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634399-02	CCV	01	10/17/2017 21:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS8
Analyst: ADC
Workgroup: WG628027

Tune ID: WG628027-01
Run Date: 08/31/2017
Run Time: 14:11
File ID: 8M421174
Cal ID: HPMS8 - 31-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	28.5	8248	PASS
75.0	95.0	30.0	60.0	48.8	14111	PASS
95.0	95.0	100	100	100	28896	PASS
96.0	95.0	5.00	9.00	5.97	1726	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	84.1	24314	PASS
175	174	5.00	9.00	7.59	1845	PASS
176	174	95.0	101	95.2	23149	PASS
177	176	5.00	9.00	6.57	1520	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG628027-02	STD	01	08/31/2017 15:06	
WG628027-03	STD	01	08/31/2017 15:36	
WG628027-04	STD	01	08/31/2017 16:05	
WG628027-05	STD-CCV	01	08/31/2017 16:35	
WG628027-06	STD	01	08/31/2017 17:04	
WG628027-07	STD	01	08/31/2017 17:34	
WG628027-08	STD	01	08/31/2017 18:04	
WG628027-09	STD	01	08/31/2017 18:33	
WG628027-10	SSCV	01	08/31/2017 19:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS8
Analyst: TMB
Workgroup: WG629567

Tune ID: WG629567-01
Run Date: 09/13/2017
Run Time: 14:18
File ID: 8M421377
Cal ID: HPMS8-13-SEP-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	28.0	11358	PASS
75.0	95.0	30.0	60.0	47.1	19109	PASS
95.0	95.0	100	100	100	40581	PASS
96.0	95.0	5.00	9.00	6.53	2650	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	82.9	33634	PASS
175	174	5.00	9.00	7.97	2681	PASS
176	174	95.0	101	99.2	33368	PASS
177	176	5.00	9.00	7.07	2359	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG629567-02	STD	01	09/13/2017 15:15	
WG629567-03	STD	01	09/13/2017 15:44	
WG629567-04	STD	01	09/13/2017 16:17	
WG629567-05	STD	01	09/13/2017 16:49	
WG629567-06	STD	01	09/13/2017 17:17	
WG629567-07	STD	01	09/13/2017 17:46	
WG629567-08	STD-CCV	01	09/13/2017 18:15	
WG629567-09	STD	01	09/13/2017 18:44	
WG629567-10	STD	01	09/13/2017 19:13	
WG629567-11	STD	01	09/13/2017 19:41	
WG629567-12	SSCV	01	09/13/2017 21:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS8
Analyst: TMB
Workgroup: WG633471

Tune ID: WG633471-01
Run Date: 10/11/2017
Run Time: 14:34
File ID: 8M422083
Cal ID: HPMS8-13-SEP-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	31.2	11311	PASS
75.0	95.0	30.0	60.0	55.3	20061	PASS
95.0	95.0	100	100	100	36277	PASS
96.0	95.0	5.00	9.00	5.24	1901	PASS
173	174	0	2.00	1.26	405	PASS
174	95.0	50.0	100	88.4	32061	PASS
175	174	5.00	9.00	8.56	2745	PASS
176	174	95.0	101	95.8	30722	PASS
177	176	5.00	9.00	6.89	2116	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633471-02	CCV	01	10/11/2017 15:01	
WG633472-01	CCV	01	10/11/2017 15:30	
WG633473-01	BLANK	01	10/11/2017 15:59	
WG633473-02	LCS	01	10/11/2017 17:57	
WG633473-03	LCS2	01	10/11/2017 18:26	
L17100514-02	PW101-06A-LA-26	01	10/11/2017 21:21	
L17100514-04	PMW101-07B-LA-26	01	10/11/2017 22:21	
L17100514-07	PMW101-02B-LA-26	01	10/11/2017 22:50	
L17100514-09	MW-100B-LA-26	01	10/11/2017 23:19	
L17100514-10	PMW21-04-LA-26	01	10/12/2017 00:17	
L17100514-05	PMW101-03B-LA-26	01	10/12/2017 00:47	
L17100514-06	MW101T-LA-26	01	10/12/2017 01:16	
WG633473-04	BLANK2	01	10/12/2017 02:46	*
WG633078-01	FBLK1	DL01	10/12/2017 05:14	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100514
Instrument: HPMS8
Analyst: TMB
Workgroup: WG633717

Tune ID: WG633717-01
Run Date: 10/12/2017
Run Time: 12:00
File ID: 8M422118
Cal ID: HPMS8 - 13-SEP-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	30.1	12856	PASS
75.0	95.0	30.0	60.0	51.0	21729	PASS
95.0	95.0	100	100	100	42642	PASS
96.0	95.0	5.00	9.00	5.72	2441	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	84.9	36202	PASS
175	174	5.00	9.00	7.93	2872	PASS
176	174	95.0	101	97.5	35304	PASS
177	176	5.00	9.00	6.49	2291	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633717-02	CCV	01	10/12/2017 12:25	
WG633719-01	BLANK	01	10/12/2017 13:31	
WG633719-02	LCS	01	10/12/2017 14:00	
L17100514-15	DR1-6-LA-26-MS	01	10/12/2017 14:30	
L17100514-16	DR1-6-LA-26-MSD	01	10/12/2017 14:59	
L17100514-14	DR1-6-LA-26	01	10/12/2017 17:54	
L17100514-01	DR2-1-LA-26	02	10/12/2017 18:24	
L17100514-08	MW101B-LA-26	02	10/12/2017 18:53	
L17100514-10	PMW21-04-LA-26	DL01	10/12/2017 19:23	
L17100514-12	PMW101-06B-LA-26	01	10/12/2017 19:51	
L17100514-13	PMW101-03A-LA-26	01	10/12/2017 20:21	
L17100514-17	DUP-6-LA-26	01	10/12/2017 20:51	
L17100514-19	DR1-3-LA-26	01	10/12/2017 21:20	
L17100514-18	PMW21-02-LA-26	01	10/12/2017 21:49	
L17100514-11	MW-21-LA-26	01	10/12/2017 22:49	
L17100514-21	DUP-2-LA-26	01	10/12/2017 23:18	
WG633719-06	BLANK	01	10/13/2017 00:18	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5524672
Report generated 10/18/2017 15:55

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Calibration Table Report
Method: A9FOOWTR.M
Title: A9-FOO Water SOP:MSV01 08-31-17 HPMS8
Last Calibration: Tue Sep 05 14:28:41 2017
Curve: WG628027
Calibration Files

Compound	5 8M421176.D	20 8M421177.D	50 8M421178.D	100 8M421179.D	200 8M421180.D	300 8M421181.D	400 8M421182.D	500 8M421183.D	Avg	%RSD
Fluorobenzene	ISTD									
Acetonitrile		0.029	0.031	0.029	0.028	0.030	0.030	0.031	0.030	3.362
3-Chloro-1-propene	0.776	0.836	0.870	0.863	0.874	0.840	0.807	0.773	0.830	4.885
2-Chloro-1,3-butadiene	0.670	0.740	0.785	0.794	0.804	0.769	0.737	0.700	0.750	6.291
Ethyl Acetate		0.260	0.283	0.285	0.280	0.285	0.281	0.280	0.279	3.184
Methacrylonitrile	0.069	0.078	0.083	0.085	0.083	0.085	0.085	0.086	0.082	6.972
Isobutyl Alcohol			0.009	0.009	0.009	0.010	0.010	0.011	0.010	8.810
1-Butanol									0.000	0.000
Methyl methacrylate	0.282	0.290	0.314	0.318	0.318	0.319	0.311	0.310	0.308	4.536
2-Nitropropane		0.092	0.099	0.101	0.101	0.103	0.101	0.103	0.100	3.821
Chlorobenzene-d5	ISTD									
1,4-Dichlorobenzene-d4	ISTD									
Cyclohexanone			0.012	0.013	0.012	0.013	0.014	0.015	0.013	9.192

Tue Sep 05 14:30:32 2017

Calibration Table Report
Method: 8260WT.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 09-13-17 HPMS8
Last Calibration: Thu Sep 14 08:56:14 2017
Curve: WG629567
Calibration Files

	Compound	0.3 (8M421379.D)	0.4 (8M421380.D)	1 (8M421381.D)	2 (8M421382.D)	5 (8M421383.D)	20 (8M421384.D)	50 (8M421385.D)	100 (8M421386.D)	200 (8M421387.D)	300 (8M421388.D)	Avg	%RSD	r^2 Linear	r^2 Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.376	0.401	0.408	0.474	0.467	0.424	0.438		0.427	8.334		
P	Chloromethane			0.839	0.710	0.706	0.717	0.693	0.638	0.623		0.704	9.986		
C	Vinyl Chloride		0.363	0.340	0.345	0.340	0.345	0.336	0.314	0.327		0.339	4.229		
T	1,3-Butadiene				0.390	0.370	0.354	0.299	0.241	0.247	0.230	0.304	22.045		0.999
T	Bromomethane			0.213	0.231	0.246	0.238	0.244	0.241	0.256		0.238	5.729		
T	Chloroethane		0.237	0.223	0.241	0.250	0.250	0.258	0.241	0.252		0.244	4.484		
T	Trichlorofluoromethane		0.517	0.457	0.493	0.538	0.516	0.528	0.488	0.520		0.507	5.191		
T	Diethyl ether			0.272	0.282	0.278	0.277	0.275	0.280		0.268	0.276	1.732		
T	Isoprene					0.432	0.418	0.425	0.392	0.409	0.386	0.410	4.486		
T	Acrolein			0.035	0.039	0.040	0.040	0.041	0.044		0.044	0.040	7.806		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.225	0.254	0.273	0.265	0.268	0.249	0.262		0.257	6.203		
T	Acetone					0.116	0.084	0.080	0.087	0.090	0.082	0.090	14.764		
C	1,1-Dichloroethene		0.579	0.527	0.533	0.562	0.565	0.571	0.529	0.546		0.551	3.702		
T	Tert-Butyl Alcohol				0.018	0.017	0.017	0.018	0.019		0.020	0.018	7.921		
T	Dimethyl Sulfide					0.350	0.353	0.372	0.357	0.364	0.352	0.358	2.344		
T	Iodomethane			0.253	0.258	0.297	0.297	0.309	0.295	0.307	0.279	0.287	7.504		
T	Methyl acetate					0.271	0.266	0.269	0.277	0.277	0.266	0.271	1.772		
T	Methylene Chloride			0.273	0.280	0.287	0.273	0.278	0.261	0.265		0.274	3.218		
T	Carbon Disulfide			0.847	0.895	0.897	0.884	0.896	0.828	0.831	0.771	0.856	5.278		
T	Acrylonitrile			0.105	0.112	0.111	0.117	0.122	0.129		0.119	0.116	6.683		
T	Methyl Tert Butyl Ether			0.549	0.546	0.589	0.585	0.597	0.584	0.594		0.578	3.658		
T	trans-1,2-Dichloroethene		0.543	0.495	0.501	0.538	0.537	0.538	0.507	0.513		0.521	3.715		
T	n-Hexane					0.640	0.596	0.616	0.570	0.608	0.584	0.602	4.092		
T	Diisopropyl ether			1.728	1.782	1.754	1.754	1.718	1.624		1.441	1.686	7.060		
T	Vinyl Acetate					0.759	0.641	0.712	0.692	0.681	0.663	0.692	5.936		
P	1,1-Dichloroethane		0.613	0.610	0.630	0.653	0.643	0.642	0.601	0.602		0.624	3.263		
T	Ethyl-Tert-Butyl ether			1.069	1.105	1.087	1.100	1.085	1.085		1.015	1.078	2.793		
T	2-Butanone					0.141	0.139	0.139	0.147	0.145	0.143	0.142	2.331		
T	Propionitrile			0.036	0.039	0.038	0.039	0.040	0.042		0.043	0.040	6.030		
T	2,2-Dichloropropane		0.423	0.425	0.437	0.461	0.434	0.438	0.413	0.426		0.432	3.314		
T	cis-1,2-Dichloroethene		0.343	0.306	0.285	0.315	0.308	0.313	0.293	0.296		0.307	5.757		
C	Chloroform	0.568	0.572	0.499	0.526	0.525	0.505	0.513	0.477	0.474		0.518	6.741		
T	1-Bromopropane				0.050	0.058	0.057	0.061	0.058	0.058	0.058	0.057	5.742		
T	Bromochloromethane		0.185	0.160	0.180	0.181	0.184	0.186	0.179	0.180		0.179	4.637		
T	Tetrahydrofuran			0.097	0.093	0.089	0.093	0.093	0.099		0.094	0.094	3.181		
S	Dibromofluoromethane				0.324	0.311	0.298	0.291	0.291	0.283	0.281	0.297	5.251		
T	1,1,1-Trichloroethane		0.449	0.413	0.431	0.476	0.473	0.476	0.444	0.450		0.452	5.112		
T	Cyclohexane			0.687	0.721	0.772	0.748	0.771	0.718	0.754	0.699	0.734	4.403		
T	1,1-Dichloropropene			0.352	0.369	0.386	0.393	0.395	0.371	0.380		0.378	4.111		
T	Tert-Amyl-Methyl ether			0.604	0.645	0.639	0.650	0.641	0.652		0.616	0.635	2.869		
T	Carbon Tetrachloride		0.466	0.401	0.429	0.469	0.462	0.466	0.43	0.443		0.4457	5.44121		
S	1,2-Dichloroethane-d4				0.368	0.347	0.335	0.324	0.329	0.318	0.31	0.3329	5.83484		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.465	0.412	0.453	0.476	0.459	0.465	0.441	0.441		0.4514	4.46079		
T	Benzene		1.136	1.054	1.105	1.121	1.103	1.1	1.014	0.969		1.0753	5.39779		
T	Trichloroethene		0.279	0.262	0.302	0.301	0.312	0.32	0.303	0.31		0.2987	6.35845		
T	Methylcyclohexane					0.458	0.438	0.451	0.423	0.445	0.421	0.4394	3.44851		
C	1,2-Dichloropropane		0.315	0.322	0.355	0.365	0.362	0.366	0.347	0.356		0.3484	5.65905		
T	Bromodichloromethane		0.352	0.371	0.359	0.377	0.386	0.398	0.38	0.382		0.3755	3.88984		
T	1,4-Dioxane				0.001	0.001	0.001	0.002	0.002		0.002	0.0015	13.7848		
T	Dibromomethane		0.165	0.149	0.146	0.156	0.158	0.164	0.156	0.158		0.1565	4.1959		
T	2-Chloroethyl Vinyl Ether			0.126	0.142	0.154	0.173	0.174	0.177	0.181	0.174	0.1628	12.2292		
T	4-Methyl-2-Pentanone					0.08	0.093	0.094	0.1	0.103	0.1	0.0951	8.75964		
T	cis-1,3-Dichloropropene		0.403	0.384	0.428	0.442	0.446	0.463	0.44	0.444		0.4314	5.97072		

T	Dimethyl Disulfide					0.212	0.235	0.254	0.252	0.26	0.246	0.2429	7.21488
I	Chlorobenzene-d5	ISTD											
S	Toluene-d8				1.315	1.259	1.242	1.208	1.176	1.139	1.103	1.2059	6.04694
C	Toluene		1.506	1.416	1.422	1.502	1.462	1.466	1.313	1.23		1.4146	6.84092
T	Ethyl Methacrylate			0.227	0.262	0.29	0.307	0.322	0.323	0.327	0.321	0.2975	12.085
T	Paraldehyde											0	0
T	trans-1,3-Dichloropropene			0.43	0.427	0.466	0.466	0.479	0.46	0.464		0.4559	4.36352
T	1,1,2-Trichloroethane		0.241	0.236	0.231	0.247	0.25	0.254	0.242	0.246		0.2433	3.08076
T	2-Hexanone					0.091	0.099	0.104	0.11	0.113	0.114	0.1052	8.79897
T	1,3-Dichloropropane		0.418	0.424	0.439	0.445	0.44	0.443	0.42	0.424		0.4317	2.5632
T	Tetrachloroethene		0.296	0.292	0.31	0.329	0.319	0.326	0.304	0.316		0.3115	4.28753
T	Dibromochloromethane		0.331	0.303	0.304	0.344	0.348	0.36	0.35	0.361		0.3376	6.78962
T	1,2-Dibromoethane		0.215	0.224	0.23	0.251	0.254	0.258	0.249	0.257		0.2423	6.81501
T	1-Chlorohexane		0.408	0.441	0.44	0.48	0.483	0.502	0.465	0.479	0.451	0.4611	6.23991
P	Chlorobenzene		1.067	0.998	0.994	1.045	1.022	1.026	0.942	0.899		0.9992	5.54231
T	1,1,1,2-Tetrachloroethane		0.309	0.313	0.356	0.381	0.383	0.387	0.366	0.362		0.357	8.54005
C	Ethylbenzene		0.53	0.515	0.505	0.54	0.537	0.544	0.497	0.496		0.5204	3.8086
T	m-,p-Xylene		0.659	0.612	0.62	0.666	0.654	0.655	0.592	0.545		0.6252	6.69883
T	o-Xylene			0.58	0.582	0.63	0.632	0.652	0.602	0.598		0.6108	4.5136
T	Styrene		0.898	0.942	0.928	1.049	1.078	1.092	1.002	0.951		0.9924	7.40772
P	Bromoform			0.163	0.182	0.207	0.217	0.23	0.227	0.236		0.209	13.0818
T	Isopropylbenzene		1.642	1.479	1.52	1.689	1.633	1.652	1.473	1.365		1.5568	7.31337
I	1,4-Dichlorobenzene-d4	ISTD											
P	1,1,2,2-Tetrachloroethane		0.451	0.445	0.473	0.498	0.499	0.501	0.493	0.502		0.4825	4.8626
S	p-Bromofluorobenzene				0.895	0.909	0.935	0.903	0.905	0.892	0.868	0.9011	2.22137
T	1,2,3-Trichloropropane			0.112	0.147	0.153	0.15	0.149	0.148	0.152		0.1444	10.0859
T	trans-1,4-Dichloro-2-Butene			0.191	0.24	0.261	0.262	0.271	0.28	0.287	0.246	0.2547	11.8469
T	n-Propylbenzene		3.708	3.33	3.494	3.824	3.738	3.615	3.211	2.811		3.4663	9.72764
T	Bromobenzene	0.766	0.779	0.729	0.786	0.8	0.798	0.795	0.759	0.766		0.7752	2.97971
T	1,3,5-Trimethylbenzene		2.484	2.27	2.367	2.576	2.587	2.529	2.342	2.171		2.4157	6.27806
T	2-Chlorotoluene		2.23	2.293	2.42	2.66	2.545	2.508	2.016	2.057		2.3413	9.93156
T	4-Chlorotoluene		2.217	2.006	2.056	2.115	2.088	1.993	2.046	1.76		2.0351	6.45972
T	a-Methylstyrene					1.351	1.435	1.471	1.389	1.37	1.213	1.3715	6.49608
T	tert-Butylbenzene			0.519	0.538	0.579	0.583	0.572	0.537	0.543		0.5531	4.46813
T	1,2,4-Trimethylbenzene		2.517	2.447	2.447	2.737	2.662	2.604	2.366	2.175		2.4944	7.15122
T	sec-Butylbenzene			2.911	2.968	3.279	3.226	3.12	2.828	2.558		2.9842	8.39029
T	p-Isopropyltoluene			2.459	2.557	2.814	2.824	2.778	2.525	2.308		2.6093	7.65785
T	1,3-Dichlorobenzene		1.616	1.485	1.556	1.627	1.597	1.583	1.479	1.442		1.5482	4.53513
T	1,4-Dichlorobenzene	1.683	1.627	1.507	1.533	1.626	1.584	1.56	1.462	1.416		1.5554	5.48999
T	n-Butylbenzene			2.382	2.431	2.692	2.626	2.538	2.286	2.098		2.436	8.40297
T	1,2-Dichlorobenzene	1.543	1.467	1.369	1.399	1.451	1.446	1.437	1.346	1.326		1.4205	4.77171
T	1,2-Dibromo-3-Chloropropane				0.077	0.097	0.094	0.095	0.098	0.101		0.0936	8.93058
T	1,2,4-Trichlorobenzene		1.129	0.997	1.028	1.062	1.067	1.074	1.008	1.012		1.0472	4.23768
T	Hexachlorobutadiene		0.469	0.419	0.455	0.457	0.47	0.472	0.454	0.459		0.457	3.74962
T	Naphthalene		1.489	1.352	1.515	1.682	1.727	1.723	1.547	1.589		1.5781	8.24736
T	1,2,3-Trichlorobenzene	0.826	0.919	0.883	0.899	0.95	0.952	0.947	0.885	0.893		0.906	4.53779

Thu Sep 14 09:01:55 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100514 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100514 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100514 Run Date: 09/13/2017 Sample ID: WG629567-12
Instrument ID: HPMS8 Run Time: 21:09 Method: 8260B
File ID: 8M421391 Analyst: TMB QC Key: AF40
ICal Workgroup: WG629567 Cal ID: HPMS8 - 13-SEP-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.1	ug/L	0.531	3.70	25	
1,2-Dichloropropane	CCC	50.0	51.2	ug/L	0.357	2.40	25	
Chloroform	CCC	50.0	47.5	ug/L	0.492	5.00	25	
Ethylbenzene	CCC	50.0	50.8	ug/L	0.529	1.60	25	
Toluene	CCC	50.0	49.5	ug/L	1.40	1.10	25	
Vinyl Chloride	CCC	50.0	46.1	ug/L	0.312	7.80	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	51.2	ug/L	0.494	2.40	25	
1,1-Dichloroethane	SPCC	50.0	48.1	ug/L	0.600	3.80	25	
Bromoform	SPCC	50.0	51.8	ug/L	0.217	3.60	25	
Chlorobenzene	SPCC	50.0	50.7	ug/L	1.01	1.30	25	
Chloromethane	SPCC	50.0	42.7	ug/L	0.601	14.6	25	
1,1,1,2-Tetrachloroethane		50.0	52.4	ug/L	0.374	4.70	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.450	0.300	25	
1,1,2-Trichloroethane		50.0	50.8	ug/L	0.247	1.70	25	
1,1-Dichloropropene		50.0	50.4	ug/L	0.382	0.900	25	
1,2,3-Trichlorobenzene		50.0	51.8	ug/L	0.938	3.50	25	
1,2,3-Trichloropropane		50.0	53.2	ug/L	0.154	6.40	25	
1,2,4-Trichlorobenzene		50.0	51.3	ug/L	1.07	2.60	25	
1,2,4-Trimethylbenzene		50.0	52.2	ug/L	2.61	4.50	25	
1,2-Dichloroethane		50.0	50.1	ug/L	0.452	0.200	25	
1,2-Dichlorobenzene		50.0	51.3	ug/L	1.46	2.60	25	
1,2-Dibromo-3-Chloropropane		50.0	51.2	ug/L	0.0958	2.30	25	
1,2-Dibromoethane		50.0	52.5	ug/L	0.254	5.00	25	
1,3,5-Trimethylbenzene		50.0	51.4	ug/L	2.48	2.80	25	
1,3-Dichlorobenzene		50.0	50.1	ug/L	1.55	0.200	25	
1,3-Dichloropropane		50.0	51.8	ug/L	0.447	3.60	25	
1,4-Dichlorobenzene		50.0	51.0	ug/L	1.59	1.90	25	
1,4-Dioxane		200	209	ug/L	0.00160	4.40	25	
1-Chlorohexane		50.0	52.4	ug/L	0.483	4.80	25	
2,2-Dichloropropane		50.0	46.4	ug/L	0.401	7.10	25	
2-Hexanone		50.0	53.8	ug/L	0.113	7.50	25	
2-Chlorotoluene		50.0	52.9	ug/L	2.48	5.80	25	
4-Chlorotoluene		50.0	48.0	ug/L	1.95	4.00	25	
Acetone		50.0	49.3	ug/L	0.0888	1.40	25	
Benzene		50.0	50.0	ug/L	1.07	0.100	25	
Bromobenzene		50.0	50.1	ug/L	0.776	0.200	25	
Bromochloromethane		50.0	49.6	ug/L	0.178	0.900	25	
Bromodichloromethane		50.0	49.5	ug/L	0.372	1.00	25	
Bromomethane		50.0	43.0	ug/L	0.205	13.9	25	
Carbon Disulfide		50.0	47.3	ug/L	0.810	5.40	25	
Carbon Tetrachloride		50.0	48.5	ug/L	0.432	3.00	25	
Chloroethane		50.0	52.0	ug/L	0.254	3.90	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100514 Run Date: 09/13/2017 Sample ID: WG629567-12
Instrument ID: HPMS8 Run Time: 21:09 Method: 8260B
File ID: 8M421391 Analyst: TMB QC Key: AF40
ICal Workgroup: WG629567 Cal ID: HPMS8 - 13-SEP-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.1	ug/L	0.302	1.80	25	
cis-1,3-Dichloropropene		50.0	55.1	ug/L	0.475	10.1	25	
Dibromochloromethane		50.0	50.3	ug/L	0.340	0.600	25	
Dibromomethane		50.0	49.2	ug/L	0.154	1.60	25	
Dichlorodifluoromethane		50.0	43.8	ug/L	0.374	12.5	25	
Hexachlorobutadiene		50.0	51.2	ug/L	0.468	2.40	25	
Isopropylbenzene		50.0	50.1	ug/L	1.56	0.200	25	
Methylene Chloride		50.0	48.9	ug/L	0.268	2.20	25	
Methyl Tert Butyl Ether		50.0	51.8	ug/L	0.599	3.70	25	
2-Butanone		50.0	51.6	ug/L	0.147	3.30	25	
4-Methyl-2-Pentanone		50.0	52.9	ug/L	0.101	5.90	25	
n-Butylbenzene		50.0	50.3	ug/L	2.45	0.600	25	
n-Propylbenzene		50.0	51.4	ug/L	3.56	2.80	25	
m-,p-Xylene		100	103	ug/L	0.643	2.80	25	
Naphthalene		50.0	53.6	ug/L	1.69	7.10	25	
o-Xylene		50.0	53.7	ug/L	0.656	7.30	25	
p-Isopropyltoluene		50.0	52.2	ug/L	2.72	4.40	25	
sec-Butylbenzene		50.0	51.5	ug/L	3.07	3.00	25	
Styrene		50.0	54.3	ug/L	1.08	8.70	25	
Trichloroethene		50.0	51.5	ug/L	0.308	3.00	25	
tert-Butylbenzene		50.0	51.8	ug/L	0.573	3.50	25	
Tetrachloroethene		50.0	50.0	ug/L	0.312	0	25	
trans-1,2-Dichloroethene		50.0	50.3	ug/L	0.524	0.500	25	
trans-1,3-Dichloropropene		50.0	51.4	ug/L	0.469	2.80	25	
Trichlorofluoromethane		50.0	47.5	ug/L	0.482	4.90	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/11/2017 Sample ID: WG633471-02

Instrument ID: HPMS8 Run Time: 15:01 Method: 8260B

File ID: 8M422084 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG633473 Cal ID: HPMS8 - 13-SEP-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.4	ug/L	0.523	5.17	20	
1,2-Dichloropropane	CCC	50.0	50.2	ug/L	0.350	0.341	20	
Chloroform	CCC	50.0	49.5	ug/L	0.513	0.922	20	
Ethylbenzene	CCC	50.0	50.7	ug/L	0.528	1.36	20	
Toluene	CCC	50.0	48.7	ug/L	1.38	2.61	20	
Vinyl Chloride	CCC	50.0	47.8	ug/L	0.324	4.35	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.2	ug/L	0.484	0.308	20	
1,1-Dichloroethane	SPCC	50.0	48.6	ug/L	0.607	2.84	20	
Bromoform	SPCC	50.0	48.5	ug/L	0.203	3.06	20	
Chlorobenzene	SPCC	50.0	49.0	ug/L	0.979	2.04	20	
Chloromethane	SPCC	50.0	41.0	ug/L	0.577	18.1	20	
Xylenes		150	154	ug/L	0.638	2.97	20	
1,1,1,2-Tetrachloroethane		50.0	51.9	ug/L	0.371	3.89	20	
1,1,1-Trichloroethane		50.0	51.8	ug/L	0.467	3.52	20	
1,1,2-Trichloroethane		50.0	48.2	ug/L	0.235	3.54	20	
1,1-Dichloropropene		50.0	53.4	ug/L	0.404	6.89	20	
1,2,3-Trichlorobenzene		50.0	48.0	ug/L	0.869	4.06	20	
1,2,3-Trichloropropane		50.0	50.3	ug/L	0.145	0.552	20	
1,2,4-Trichlorobenzene		50.0	46.8	ug/L	0.981	6.36	20	
1,2,4-Trimethylbenzene		50.0	52.3	ug/L	2.61	4.68	20	
1,2-Dichloroethane		50.0	48.5	ug/L	0.438	3.03	20	
1,2-Dichlorobenzene		50.0	48.4	ug/L	1.37	3.25	20	
1,2-Dibromo-3-Chloropropane		50.0	48.4	ug/L	0.0906	3.13	20	
1,2-Dibromoethane		50.0	52.9	ug/L	0.256	5.80	20	
1,3,5-Trimethylbenzene		50.0	52.4	ug/L	2.53	4.89	20	
1,3-Dichlorobenzene		50.0	49.2	ug/L	1.52	1.54	20	
1,3-Dichloropropane		50.0	49.1	ug/L	0.424	1.86	20	
1,4-Dichlorobenzene		50.0	48.6	ug/L	1.51	2.90	20	
1,4-Dioxane		200	215	ug/L	0.00170	7.35	20	
1-Chlorohexane		50.0	52.1	ug/L	0.481	4.29	20	
2,2-Dichloropropane		50.0	49.6	ug/L	0.428	0.885	20	
2-Hexanone		50.0	43.9	ug/L	0.0923	12.2	20	
2-Chlorotoluene		50.0	47.6	ug/L	2.23	4.86	20	
4-Chlorotoluene		50.0	50.0	ug/L	2.03	0.0548	20	
Acetone		50.0	41.0	ug/L	0.0739	17.9	20	
Benzene		50.0	52.5	ug/L	1.13	4.97	20	
Bromobenzene		50.0	49.4	ug/L	0.766	1.17	20	
Bromochloromethane		50.0	50.0	ug/L	0.179	0.0206	20	
Bromodichloromethane		50.0	54.1	ug/L	0.406	8.12	20	
Bromomethane		50.0	40.9	ug/L	0.195	18.2	20	
Carbon Disulfide		50.0	54.7	ug/L	0.937	9.47	20	
Carbon Tetrachloride		50.0	51.5	ug/L	0.459	2.90	20	

CCV - Modified 03/05/2008

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/11/2017 Sample ID: WG633471-02

Instrument ID: HPMS8 Run Time: 15:01 Method: 8260B

File ID: 8M422084 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG633473 Cal ID: HPMS8 - 13-SEP-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	46.5	ug/L	0.227	6.95	20	
cis-1,2-Dichloroethene		50.0	49.3	ug/L	0.303	1.31	20	
cis-1,3-Dichloropropene		50.0	53.8	ug/L	0.464	7.59	20	
Dibromochloromethane		50.0	50.8	ug/L	0.343	1.63	20	
Dibromomethane		50.0	48.7	ug/L	0.153	2.55	20	
Dichlorodifluoromethane		50.0	48.0	ug/L	0.410	4.06	20	
Hexachlorobutadiene		50.0	44.3	ug/L	0.405	11.3	20	
Isopropylbenzene		50.0	52.2	ug/L	1.63	4.40	20	
Methylene Chloride		50.0	50.2	ug/L	0.275	0.376	20	
Methyl Tert Butyl Ether		50.0	51.5	ug/L	0.595	3.04	20	
2-Butanone		50.0	43.7	ug/L	0.124	12.5	20	
4-Methyl-2-Pentanone		50.0	45.7	ug/L	0.0869	8.62	20	
n-Butylbenzene		50.0	49.3	ug/L	2.40	1.36	20	
n-Propylbenzene		50.0	49.3	ug/L	3.42	1.38	20	
m-,p-Xylene		100	102	ug/L	0.641	2.48	20	
Naphthalene		50.0	56.3	ug/L	1.78	12.6	20	
o-Xylene		50.0	52.0	ug/L	0.635	3.95	20	
p-Isopropyltoluene		50.0	50.8	ug/L	2.65	1.59	20	
sec-Butylbenzene		50.0	52.0	ug/L	3.10	3.99	20	
Styrene		50.0	54.0	ug/L	1.07	7.92	20	
Trichloroethene		50.0	53.4	ug/L	0.319	6.86	20	
tert-Butylbenzene		50.0	48.3	ug/L	0.534	3.39	20	
Tetrachloroethene		50.0	47.2	ug/L	0.294	5.64	20	
trans-1,2-Dichloroethene		50.0	48.3	ug/L	0.504	3.42	20	
trans-1,3-Dichloropropene		50.0	50.5	ug/L	0.460	0.956	20	
Trichlorofluoromethane		50.0	51.0	ug/L	0.517	1.98	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633717-02
Instrument ID: HPMS8 Run Time: 12:25 Method: 8260B
File ID: 8M422119 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG633719 Cal ID: HPMS8 - 13-SEP-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	44.5	ug/L	0.490	11.1	20	
1,2-Dichloropropane	CCC	50.0	49.9	ug/L	0.347	0.290	20	
Chloroform	CCC	50.0	47.1	ug/L	0.487	5.88	20	
Ethylbenzene	CCC	50.0	49.8	ug/L	0.518	0.385	20	
Toluene	CCC	50.0	48.2	ug/L	1.36	3.70	20	
Vinyl Chloride	CCC	50.0	45.0	ug/L	0.305	10.0	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.4	ug/L	0.487	0.850	20	
1,1-Dichloroethane	SPCC	50.0	45.5	ug/L	0.569	8.90	20	
Bromoform	SPCC	50.0	48.7	ug/L	0.204	2.55	20	
Chlorobenzene	SPCC	50.0	48.2	ug/L	0.964	3.54	20	
Chloromethane	SPCC	50.0	39.9	ug/L	0.562	20.2	20	*
Xylenes		150	152	ug/L	0.629	1.32	20	
1,1,1,2-Tetrachloroethane		50.0	51.8	ug/L	0.370	3.70	20	
1,1,1-Trichloroethane		50.0	50.6	ug/L	0.457	1.27	20	
1,1,2-Trichloroethane		50.0	48.2	ug/L	0.234	3.66	20	
1,1-Dichloropropene		50.0	54.0	ug/L	0.408	7.95	20	
1,2,3-Trichlorobenzene		50.0	45.5	ug/L	0.824	9.02	20	
1,2,3-Trichloropropane		50.0	50.3	ug/L	0.145	0.582	20	
1,2,4-Trichlorobenzene		50.0	45.8	ug/L	0.959	8.46	20	
1,2,4-Trimethylbenzene		50.0	50.8	ug/L	2.54	1.67	20	
1,2-Dichloroethane		50.0	47.5	ug/L	0.429	4.93	20	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.36	4.54	20	
1,2-Dibromo-3-Chloropropane		50.0	47.4	ug/L	0.0886	5.27	20	
1,2-Dibromoethane		50.0	52.5	ug/L	0.254	4.94	20	
1,3,5-Trimethylbenzene		50.0	51.1	ug/L	2.47	2.25	20	
1,3-Dichlorobenzene		50.0	48.0	ug/L	1.49	3.92	20	
1,3-Dichloropropane		50.0	49.4	ug/L	0.427	1.16	20	
1,4-Dichlorobenzene		50.0	47.7	ug/L	1.48	4.60	20	
1,4-Dioxane		200	234	ug/L	0.00180	16.8	20	
1-Chlorohexane		50.0	52.2	ug/L	0.482	4.43	20	
2,2-Dichloropropane		50.0	54.5	ug/L	0.471	8.92	20	
2-Hexanone		50.0	43.5	ug/L	0.0916	12.9	20	
2-Chlorotoluene		50.0	49.1	ug/L	2.30	1.74	20	
4-Chlorotoluene		50.0	46.3	ug/L	1.89	7.33	20	
Acetone		50.0	41.9	ug/L	0.0755	16.1	20	
Benzene		50.0	52.1	ug/L	1.12	4.25	20	
Bromobenzene		50.0	48.6	ug/L	0.754	2.77	20	
Bromochloromethane		50.0	48.4	ug/L	0.174	3.12	20	
Bromodichloromethane		50.0	53.0	ug/L	0.398	6.06	20	
Bromomethane		50.0	40.1	ug/L	0.191	19.8	20	
Carbon Disulfide		50.0	53.4	ug/L	0.914	6.77	20	
Carbon Tetrachloride		50.0	51.5	ug/L	0.459	2.93	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633717-02
Instrument ID: HPMS8 Run Time: 12:25 Method: 8260B
File ID: 8M422119 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG633719 Cal ID: HPMS8 - 13-SEP-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	44.2	ug/L	0.216	11.7	20	
cis-1,2-Dichloroethene		50.0	46.7	ug/L	0.287	6.66	20	
cis-1,3-Dichloropropene		50.0	53.9	ug/L	0.465	7.75	20	
Dibromochloromethane		50.0	50.5	ug/L	0.341	1.03	20	
Dibromomethane		50.0	48.1	ug/L	0.151	3.74	20	
Dichlorodifluoromethane		50.0	46.6	ug/L	0.398	6.84	20	
Hexachlorobutadiene		50.0	43.7	ug/L	0.400	12.6	20	
Isopropylbenzene		50.0	50.9	ug/L	1.58	1.78	20	
Methylene Chloride		50.0	49.3	ug/L	0.270	1.43	20	
Methyl Tert Butyl Ether		50.0	50.3	ug/L	0.581	0.513	20	
2-Butanone		50.0	43.0	ug/L	0.122	14.1	20	
4-Methyl-2-Pentanone		50.0	45.4	ug/L	0.0864	9.14	20	
n-Butylbenzene		50.0	49.0	ug/L	2.39	2.00	20	
n-Propylbenzene		50.0	48.1	ug/L	3.33	3.87	20	
m-,p-Xylene		100	100	ug/L	0.628	0.498	20	
Naphthalene		50.0	53.3	ug/L	1.68	6.50	20	
o-Xylene		50.0	51.5	ug/L	0.629	2.98	20	
p-Isopropyltoluene		50.0	50.0	ug/L	2.61	0.0810	20	
sec-Butylbenzene		50.0	51.1	ug/L	3.05	2.18	20	
Styrene		50.0	53.1	ug/L	1.05	6.30	20	
Trichloroethene		50.0	53.0	ug/L	0.317	5.97	20	
tert-Butylbenzene		50.0	47.5	ug/L	0.525	5.06	20	
Tetrachloroethene		50.0	47.3	ug/L	0.295	5.48	20	
trans-1,2-Dichloroethene		50.0	44.9	ug/L	0.468	10.2	20	
trans-1,3-Dichloropropene		50.0	51.5	ug/L	0.470	3.06	20	
Trichlorofluoromethane		50.0	49.6	ug/L	0.504	0.704	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633727-02

Instrument ID: HPMS6 Run Time: 13:01 Method: 8260B

File ID: 6M150591 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG633730 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.9	ug/L	0.480	0.262	20	
1,2-Dichloropropane	CCC	50.0	49.4	ug/L	0.316	1.19	20	
Chloroform	CCC	50.0	47.7	ug/L	0.508	4.67	20	
Ethylbenzene	CCC	50.0	49.6	ug/L	0.527	0.741	20	
Toluene	CCC	50.0	49.3	ug/L	1.47	1.42	20	
Vinyl Chloride	CCC	50.0	45.9	ug/L	0.239	8.10	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.6	ug/L	0.615	4.73	20	
1,1-Dichloroethane	SPCC	50.0	48.2	ug/L	0.559	3.53	20	
Bromoform	SPCC	50.0	49.6	ug/L	0.228	0.750	20	
Chlorobenzene	SPCC	50.0	47.4	ug/L	0.967	5.28	20	
Chloromethane	SPCC	50.0	44.1	ug/L	0.282	11.8	20	
Xylenes		150	150	ug/L	0.638	0.0110	20	
1,1,1,2-Tetrachloroethane		50.0	49.8	ug/L	0.377	0.391	20	
1,1,1-Trichloroethane		50.0	49.6	ug/L	0.462	0.778	20	
1,1,2-Trichloroethane		50.0	47.3	ug/L	0.277	5.41	20	
1,1-Dichloropropene		50.0	50.2	ug/L	0.379	0.386	20	
1,2,3-Trichlorobenzene		50.0	47.3	ug/L	0.934	5.33	20	
1,2,3-Trichloropropane		50.0	47.2	ug/L	0.185	5.60	20	
1,2,4-Trichlorobenzene		50.0	48.8	ug/L	1.03	2.33	20	
1,2,4-Trimethylbenzene		50.0	50.4	ug/L	2.67	0.743	20	
1,2-Dichloroethane		50.0	48.6	ug/L	0.395	2.74	20	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.51	20	
1,2-Dibromo-3-Chloropropane		50.0	47.9	ug/L	0.117	4.15	20	
1,2-Dibromoethane		50.0	48.0	ug/L	0.267	4.05	20	
1,3,5-Trimethylbenzene		50.0	53.0	ug/L	2.59	5.94	20	
1,3-Dichlorobenzene		50.0	49.7	ug/L	1.56	0.604	20	
1,3-Dichloropropane		50.0	47.8	ug/L	0.489	4.38	20	
1,4-Dichlorobenzene		50.0	46.0	ug/L	1.55	7.93	20	
1,4-Dioxane		200	190	ug/L	0.00200	5.22	20	
1-Chlorohexane		50.0	53.1	ug/L	0.489	6.16	20	
2,2-Dichloropropane		50.0	48.8	ug/L	0.438	2.39	20	
2-Hexanone		50.0	45.2	ug/L	0.221	9.60	20	
2-Chlorotoluene		50.0	50.1	ug/L	2.46	0.293	20	
4-Chlorotoluene		50.0	50.3	ug/L	2.13	0.659	20	
Acetone		50.0	51.6	ug/L	0.0809	3.22	20	
Benzene		50.0	48.1	ug/L	1.06	3.72	20	
Bromobenzene		50.0	49.7	ug/L	0.803	0.557	20	
Bromochloromethane		50.0	50.4	ug/L	0.172	0.728	20	
Bromodichloromethane		50.0	49.6	ug/L	0.392	0.778	20	
Bromomethane		50.0	48.2	ug/L	0.164	3.55	20	
Carbon Disulfide		50.0	48.8	ug/L	0.879	2.42	20	
Carbon Tetrachloride		50.0	51.1	ug/L	0.425	2.24	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/12/2017 Sample ID: WG633727-02
Instrument ID: HPMS6 Run Time: 13:01 Method: 8260B
File ID: 6M150591 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG633730 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	48.4	ug/L	0.216	3.14	20	
cis-1,2-Dichloroethene		50.0	50.4	ug/L	0.297	0.859	20	
cis-1,3-Dichloropropene		50.0	52.6	ug/L	0.448	5.26	20	
Dibromochloromethane		50.0	50.4	ug/L	0.378	0.709	20	
Dibromomethane		50.0	49.9	ug/L	0.148	0.147	20	
Dichlorodifluoromethane		50.0	51.4	ug/L	0.427	2.73	20	
Hexachlorobutadiene		50.0	49.2	ug/L	0.444	1.68	20	
Isopropylbenzene		50.0	51.2	ug/L	1.62	2.31	20	
Methylene Chloride		50.0	47.4	ug/L	0.282	5.10	20	
Methyl Tert Butyl Ether		50.0	48.7	ug/L	0.670	2.60	20	
2-Butanone		50.0	45.4	ug/L	0.111	9.18	20	
4-Methyl-2-Pentanone		50.0	46.2	ug/L	0.0891	7.68	20	
n-Butylbenzene		50.0	51.4	ug/L	2.47	2.89	20	
n-Propylbenzene		50.0	52.4	ug/L	3.63	4.86	20	
m-,p-Xylene		100	99.3	ug/L	0.638	0.688	20	
Naphthalene		50.0	50.2	ug/L	2.11	0.480	20	
o-Xylene		50.0	50.7	ug/L	0.638	1.34	20	
p-Isopropyltoluene		50.0	52.0	ug/L	2.76	4.09	20	
sec-Butylbenzene		50.0	51.0	ug/L	3.08	2.10	20	
Styrene		50.0	52.7	ug/L	1.09	5.37	20	
Trichloroethene		50.0	49.6	ug/L	0.282	0.775	20	
tert-Butylbenzene		50.0	51.4	ug/L	0.540	2.72	20	
Tetrachloroethene		50.0	49.2	ug/L	0.386	1.66	20	
trans-1,2-Dichloroethene		50.0	49.9	ug/L	0.269	0.137	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.527	0.738	20	
Trichlorofluoromethane		50.0	49.2	ug/L	0.475	1.55	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634167-02

Instrument ID: HPMS6 Run Time: 07:18 Method: 8260B

File ID: 6M150724 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.32	20	
1,2-Dichloropropane	CCC	50.0	53.3	ug/L	0.340	6.61	20	
Chloroform	CCC	50.0	51.6	ug/L	0.550	3.21	20	
Ethylbenzene	CCC	50.0	53.7	ug/L	0.570	7.32	20	
Toluene	CCC	50.0	53.5	ug/L	1.60	7.10	20	
Vinyl Chloride	CCC	50.0	54.0	ug/L	0.281	8.04	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.5	ug/L	0.601	6.93	20	
1,1-Dichloroethane	SPCC	50.0	52.3	ug/L	0.607	4.65	20	
Bromoform	SPCC	50.0	49.9	ug/L	0.230	0.120	20	
Chlorobenzene	SPCC	50.0	50.9	ug/L	1.04	1.89	20	
Chloromethane	SPCC	50.0	50.0	ug/L	0.319	0.0350	20	
Xylenes		150	160	ug/L	0.681	6.52	20	
1,1,1,2-Tetrachloroethane		50.0	53.3	ug/L	0.404	6.58	20	
1,1,1-Trichloroethane		50.0	54.5	ug/L	0.508	8.93	20	
1,1,2-Trichloroethane		50.0	49.6	ug/L	0.290	0.790	20	
1,1-Dichloropropene		50.0	54.9	ug/L	0.415	9.72	20	
1,2,3-Trichlorobenzene		50.0	46.4	ug/L	0.915	7.22	20	
1,2,3-Trichloropropane		50.0	45.9	ug/L	0.179	8.25	20	
1,2,4-Trichlorobenzene		50.0	48.8	ug/L	1.03	2.47	20	
1,2,4-Trimethylbenzene		50.0	52.3	ug/L	2.78	4.64	20	
1,2-Dichloroethane		50.0	51.9	ug/L	0.422	3.76	20	
1,2-Dichlorobenzene		50.0	48.6	ug/L	1.47	2.85	20	
1,2-Dibromo-3-Chloropropane		50.0	45.8	ug/L	0.112	8.31	20	
1,2-Dibromoethane		50.0	51.0	ug/L	0.284	2.08	20	
1,3,5-Trimethylbenzene		50.0	55.2	ug/L	2.70	10.4	20	
1,3-Dichlorobenzene		50.0	51.1	ug/L	1.61	2.23	20	
1,3-Dichloropropane		50.0	49.9	ug/L	0.510	0.220	20	
1,4-Dichlorobenzene		50.0	47.5	ug/L	1.60	5.01	20	
1,4-Dioxane		200	173	ug/L	0.00180	13.5	20	
1-Chlorohexane		50.0	54.1	ug/L	0.498	8.13	20	
2,2-Dichloropropane		50.0	53.1	ug/L	0.477	6.29	20	
2-Hexanone		50.0	44.1	ug/L	0.215	11.8	20	
2-Chlorotoluene		50.0	47.2	ug/L	2.31	5.68	20	
4-Chlorotoluene		50.0	58.2	ug/L	2.47	16.4	20	
Acetone		50.0	46.3	ug/L	0.0726	7.34	20	
Benzene		50.0	52.7	ug/L	1.16	5.44	20	
Bromobenzene		50.0	51.6	ug/L	0.832	3.12	20	
Bromochloromethane		50.0	52.9	ug/L	0.181	5.89	20	
Bromodichloromethane		50.0	53.6	ug/L	0.424	7.26	20	
Bromomethane		50.0	47.7	ug/L	0.162	4.50	20	
Carbon Disulfide		50.0	50.5	ug/L	0.909	0.923	20	
Carbon Tetrachloride		50.0	55.2	ug/L	0.459	10.4	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634167-02

Instrument ID: HPMS6 Run Time: 07:18 Method: 8260B

File ID: 6M150724 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	56.0	ug/L	0.250	11.9	20	
cis-1,2-Dichloroethene		50.0	55.2	ug/L	0.325	10.5	20	
cis-1,3-Dichloropropene		50.0	56.7	ug/L	0.483	13.4	20	
Dibromochloromethane		50.0	53.0	ug/L	0.398	5.96	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.83	20	
Dichlorodifluoromethane		50.0	61.4	ug/L	0.510	22.8	20	*
Hexachlorobutadiene		50.0	48.4	ug/L	0.437	3.13	20	
Isopropylbenzene		50.0	54.4	ug/L	1.72	8.76	20	
Methylene Chloride		50.0	50.2	ug/L	0.299	0.477	20	
Methyl Tert Butyl Ether		50.0	49.7	ug/L	0.683	0.684	20	
2-Butanone		50.0	43.5	ug/L	0.106	13.0	20	
4-Methyl-2-Pentanone		50.0	43.6	ug/L	0.0842	12.8	20	
n-Butylbenzene		50.0	53.5	ug/L	2.57	7.08	20	
n-Propylbenzene		50.0	54.6	ug/L	3.78	9.17	20	
m-,p-Xylene		100	105	ug/L	0.676	5.29	20	
Naphthalene		50.0	48.4	ug/L	2.03	3.26	20	
o-Xylene		50.0	54.5	ug/L	0.686	8.98	20	
p-Isopropyltoluene		50.0	53.8	ug/L	2.86	7.61	20	
sec-Butylbenzene		50.0	52.1	ug/L	3.15	4.29	20	
Styrene		50.0	56.3	ug/L	1.16	12.7	20	
Trichloroethene		50.0	54.1	ug/L	0.307	8.13	20	
tert-Butylbenzene		50.0	52.5	ug/L	0.552	5.00	20	
Tetrachloroethene		50.0	53.1	ug/L	0.417	6.13	20	
trans-1,2-Dichloroethene		50.0	54.5	ug/L	0.293	8.92	20	
trans-1,3-Dichloropropene		50.0	52.9	ug/L	0.554	5.89	20	
Trichlorofluoromethane		50.0	56.7	ug/L	0.547	13.4	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.38	20	
1,2-Dichloropropane	CCC	50.0	52.8	ug/L	0.337	5.56	20	
Chloroform	CCC	50.0	50.6	ug/L	0.539	1.24	20	
Ethylbenzene	CCC	50.0	52.3	ug/L	0.556	4.68	20	
Toluene	CCC	50.0	51.8	ug/L	1.54	3.56	20	
Vinyl Chloride	CCC	50.0	55.3	ug/L	0.288	10.6	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.1	ug/L	0.608	5.74	20	
1,1-Dichloroethane	SPCC	50.0	51.4	ug/L	0.596	2.89	20	
Bromoform	SPCC	50.0	49.2	ug/L	0.226	1.54	20	
Chlorobenzene	SPCC	50.0	49.4	ug/L	1.01	1.21	20	
Chloromethane	SPCC	50.0	52.7	ug/L	0.336	5.30	20	
Xylenes		150	157	ug/L	0.667	4.39	20	
1,1,1,2-Tetrachloroethane		50.0	51.7	ug/L	0.392	3.47	20	
1,1,1-Trichloroethane		50.0	53.7	ug/L	0.501	7.49	20	
1,1,2-Trichloroethane		50.0	48.9	ug/L	0.286	2.27	20	
1,1-Dichloropropene		50.0	54.6	ug/L	0.413	9.27	20	
1,2,3-Trichlorobenzene		50.0	47.8	ug/L	0.943	4.35	20	
1,2,3-Trichloropropane		50.0	46.7	ug/L	0.183	6.54	20	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.0804	20	
1,2,4-Trimethylbenzene		50.0	51.8	ug/L	2.75	3.66	20	
1,2-Dichloroethane		50.0	51.5	ug/L	0.418	2.92	20	
1,2-Dichlorobenzene		50.0	48.4	ug/L	1.46	3.13	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.115	5.49	20	
1,2-Dibromoethane		50.0	50.8	ug/L	0.283	1.58	20	
1,3,5-Trimethylbenzene		50.0	55.1	ug/L	2.70	10.2	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.59	0.979	20	
1,3-Dichloropropane		50.0	49.2	ug/L	0.503	1.62	20	
1,4-Dichlorobenzene		50.0	46.9	ug/L	1.58	6.24	20	
1,4-Dioxane		200	183	ug/L	0.00200	8.35	20	
1-Chlorohexane		50.0	53.0	ug/L	0.488	5.98	20	
2,2-Dichloropropane		50.0	52.8	ug/L	0.474	5.61	20	
2-Hexanone		50.0	45.5	ug/L	0.222	9.06	20	
2-Chlorotoluene		50.0	46.2	ug/L	2.26	7.66	20	
4-Chlorotoluene		50.0	58.1	ug/L	2.47	16.3	20	
Acetone		50.0	49.1	ug/L	0.0770	1.75	20	
Benzene		50.0	51.7	ug/L	1.14	3.33	20	
Bromobenzene		50.0	50.6	ug/L	0.816	1.11	20	
Bromochloromethane		50.0	52.7	ug/L	0.181	5.48	20	
Bromodichloromethane		50.0	52.6	ug/L	0.416	5.21	20	
Bromomethane		50.0	50.0	ug/L	0.170	0.0230	20	
Carbon Disulfide		50.0	48.9	ug/L	0.881	2.27	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.454	9.09	20	

CCV - Modified 03/05/2008

PDF File ID: 5524673

Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100514 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	55.9	ug/L	0.249	11.7	20	
cis-1,2-Dichloroethene		50.0	53.8	ug/L	0.317	7.57	20	
cis-1,3-Dichloropropene		50.0	56.3	ug/L	0.480	12.6	20	
Dibromochloromethane		50.0	51.5	ug/L	0.387	3.00	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.75	20	
Dichlorodifluoromethane		50.0	62.9	ug/L	0.523	25.9	20	*
Hexachlorobutadiene		50.0	50.1	ug/L	0.452	0.172	20	
Isopropylbenzene		50.0	54.2	ug/L	1.72	8.38	20	
Methylene Chloride		50.0	50.0	ug/L	0.297	0.0366	20	
Methyl Tert Butyl Ether		50.0	50.8	ug/L	0.699	1.56	20	
2-Butanone		50.0	46.3	ug/L	0.113	7.38	20	
4-Methyl-2-Pentanone		50.0	46.7	ug/L	0.0900	6.69	20	
n-Butylbenzene		50.0	55.2	ug/L	2.65	10.4	20	
n-Propylbenzene		50.0	54.8	ug/L	3.80	9.57	20	
m-,p-Xylene		100	103	ug/L	0.663	3.26	20	
Naphthalene		50.0	49.5	ug/L	2.08	1.07	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.65	20	
p-Isopropyltoluene		50.0	54.8	ug/L	2.91	9.60	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.22	6.75	20	
Styrene		50.0	55.2	ug/L	1.14	10.3	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.62	20	
tert-Butylbenzene		50.0	53.2	ug/L	0.559	6.30	20	
Tetrachloroethene		50.0	52.0	ug/L	0.409	4.09	20	
trans-1,2-Dichloroethene		50.0	54.2	ug/L	0.291	8.35	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	4.10	20	
Trichlorofluoromethane		50.0	57.1	ug/L	0.551	14.1	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5524673
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS8
Workgroup (AAB#): WG633473

ICAL CCV Number: WG629567-08
CAL ID: HPMS8-13-SEP-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG629567-08	NA	NA	362138	640126	767485
Upper Limit	NA	NA	724276	1280252	1534970
Lower Limit	NA	NA	181069	320063	383743
L17100514-02	1.00	01	271997	493830	574668
L17100514-04	1.00	01	275751	496881	576307
L17100514-05	1.00	01	276772	500611	579396
L17100514-06	1.00	01	276765	497151	575260
L17100514-07	1.00	01	287997	519707	601889
L17100514-09	1.00	01	286564	515630	587675
L17100514-10	1.00	01	284279	508456	596213
WG633473-01	1.00	01	284812	500655	587826
WG633473-02	1.00	01	306032	542007	627627
WG633473-03	1.00	01	303428	530698	612742

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5527362
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS8
Workgroup (AAB#): WG633719

ICAL CCV Number: WG629567-08
CAL ID: HPMS8-13-SEP-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG629567-08	NA	NA	362138	640126	767485
Upper Limit	NA	NA	724276	1280252	1534970
Lower Limit	NA	NA	181069	320063	383743
L17100514-01	1.00	02	279257	516426	593365
L17100514-08	1.00	02	276253	509856	594082
L17100514-10	5.00	DL01	278205	509114	588387
L17100514-11	1.00	01	269373	485892	564732
L17100514-12	1.00	01	273731	505197	581750
L17100514-13	1.00	01	274335	495243	572888
L17100514-14	1.00	01	282558	515067	597071
L17100514-15	1.00	01	317290	556843	643562
L17100514-16	1.00	01	314552	566625	648500
L17100514-17	1.00	01	280304	500351	579125
L17100514-18	1.00	01	275907	504012	570637
L17100514-19	1.00	01	276014	495239	578479
L17100514-21	1.00	01	270169	488059	560384
WG633719-01	1.00	01	307667	541642	626742
WG633719-02	1.00	01	312057	551108	631407
WG633719-06	1.00	01	270555	480354	554521

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5527362
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS6
Workgroup (AAB#): WG633730

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100514-22	1.00	01	285111	522647	724907
L17100514-23	1.00	01	285126	528061	730857
L17100514-24	1.00	01	293184	543212	750087
L17100514-25	1.00	01	286091	534332	742312
L17100514-26	1.00	01	284814	531400	734014
L17100514-27	1.00	01	292281	531849	731978
L17100514-28	1.00	01	285470	533686	735504
L17100514-29	1.00	01	280555	518976	715007
L17100514-30	1.00	01	278972	513102	711609
L17100514-31	1.00	01	285669	533870	733186
WG633730-01	1.00	01	300986	553275	767238
WG633730-02	1.00	01	325660	574783	775717

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5527362
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS6
Workgroup (AAB#): WG634168

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100514-20	1.00	03	267157	494937	659824
WG634168-01	1.00	01	278110	513790	698722
WG634168-02	1.00	01	297801	534454	701958

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5527362
Report generated 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS8
Workgroup (AAB#): WG633473

ICAL CCV Number: WG629567-08
CAL ID: HPMS8-13-SEP-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG629567-08	NA	NA	17.79	14.76	10.89
Upper Limit	NA	NA	18.29	15.26	11.39
Lower Limit	NA	NA	17.29	14.26	10.39
L17100514-02	1.00	01	17.73	14.71	10.85
L17100514-04	1.00	01	17.73	14.72	10.85
L17100514-05	1.00	01	17.73	14.71	10.85
L17100514-06	1.00	01	17.74	14.72	10.84
L17100514-07	1.00	01	17.74	14.72	10.85
L17100514-09	1.00	01	17.74	14.71	10.84
L17100514-10	1.00	01	17.74	14.72	10.85
WG633473-01	1.00	01	17.74	14.72	10.85
WG633473-02	1.00	01	17.73	14.72	10.85
WG633473-03	1.00	01	17.73	14.72	10.85

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5527363
Report generated: 10/18/2017 15:55

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS8
Workgroup (AAB#): WG633719

ICAL CCV Number: WG629567-08
CAL ID: HPMS8-13-SEP-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG629567-08	NA	NA	17.79	14.76	10.89
Upper Limit	NA	NA	18.29	15.26	11.39
Lower Limit	NA	NA	17.29	14.26	10.39
L17100514-01	1.00	02	17.74	14.72	10.85
L17100514-08	1.00	02	17.73	14.72	10.85
L17100514-10	5.00	DL01	17.74	14.71	10.84
L17100514-11	1.00	01	17.73	14.72	10.85
L17100514-12	1.00	01	17.73	14.72	10.85
L17100514-13	1.00	01	17.74	14.71	10.85
L17100514-14	1.00	01	17.74	14.71	10.84
L17100514-15	1.00	01	17.74	14.72	10.85
L17100514-16	1.00	01	17.74	14.71	10.84
L17100514-17	1.00	01	17.74	14.71	10.84
L17100514-18	1.00	01	17.73	14.71	10.85
L17100514-19	1.00	01	17.74	14.72	10.85
L17100514-21	1.00	01	17.74	14.72	10.85
WG633719-01	1.00	01	17.74	14.72	10.84
WG633719-02	1.00	01	17.74	14.72	10.85
WG633719-06	1.00	01	17.73	14.71	10.85

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS6
Workgroup (AAB#): WG633730

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100514-22	1.00	01	18.13	15.1	11.22
L17100514-23	1.00	01	18.13	15.1	11.22
L17100514-24	1.00	01	18.12	15.09	11.22
L17100514-25	1.00	01	18.13	15.1	11.22
L17100514-26	1.00	01	18.12	15.1	11.22
L17100514-27	1.00	01	18.12	15.09	11.21
L17100514-28	1.00	01	18.12	15.09	11.22
L17100514-29	1.00	01	18.13	15.1	11.22
L17100514-30	1.00	01	18.13	15.1	11.22
L17100514-31	1.00	01	18.12	15.09	11.22
WG633730-01	1.00	01	18.12	15.1	11.22
WG633730-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5527363
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100514
Instrument ID: HPMS6
Workgroup (AAB#): WG634168

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100514-20	1.00	03	18.12	15.09	11.22
WG634168-01	1.00	01	18.12	15.1	11.22
WG634168-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5527363
Report generated: 10/18/2017 15:55

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 23, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 23, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17100514 / Revision: 1 / 324 total pages

COC No. A 55408

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720 633 2380

Turn Around Requirements:

Location: Memphis (Project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (TOTAL)	Hold	VOC 8260B
DR2-1-LA-26		X	10/6/17	1247	GW	3		3
PW101-06A-LA-26		X	10/6/17	1435	GW	3		3
DR1-6A-LA-26		X	10/6/17	1550	GW	3		3
PMW101-07B-LA-26		X	10/6/17	1455	GW	3		3
PMW101-03B-LA-26		X	10/6/17	1410	GW	3		3
MW101T-LA-26		X	10/6/17	1335	GW	3		3
PMW101-02B-LA-26		X	10/6/17	1355	GW	3		3
MW101B-LA-26		X	10/6/17	1340	GW	3		3
MW-100B-LA-26		X	10/6/17	1521	GW	3		3
PMW21-04-LA-26		X	10/6/17	1504	GW	3		3
MW-21-LA-26		X	10/6/17	1429	GW	3		3
PMW101-06B-LA-26		X	10/6/17	1445	GW	3		3
PMW101-03A-LA-26		X	10/6/17	1405	GW	3		3
DR1-6-LA-26		X	10/6/17	1505	GW	2		2
DR1-6-LA-26-MSD		X	10/6/17	1505	GW	2		2
DR1-6-LA-26-MS		X	10/6/17	1505	GW	2		2
DUP-6-LA-26		X	10/6/17	1526	GW	3		3
PMW21-02-LA-26		X	10/6/17	1245	GW	3		3
DR1-3-LA-26		X	10/6/17	1520	GW	3		3
PMW21-03-LA-26		X	10/6/17	1450	GW	3		3

TOTAL # (LAB USE)

Program
- ☐ CWA
- ☐ RCRA
- ☐ DOD
- ☐ AFCEE
- ☐ Other

ADDITIONAL REQUIREMENTS

Microbac OVD
Received: 10/07/2017 09:47
By: BRENDA GREENWALT
221000107214
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10/6/17	1620	
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)

Relinquished by: (Signature) | Date | Time | Received by: (Signature)

Date | Time | Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 09:40

L17100514 / Revision: 1 / 324 total pages

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COC No. A 55407

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720 633 2380

Turn Around Requirements:

Location: Memphis (Project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-166-ODLS-15		X	10/5/17	1658	GW	3		3		
MW-249-ODLS-15		X	10/5/17	1640	GW	3		3		
MW-246-ODLS-15		X	10/5/17	1627	GW	3		3		
MW-166A-ODLS-15		X	10/5/17	1644	GW	3		3		
MW-150-ODLS-15		X	10/5/17	1530	GW	3		3		
MW-159-ODLS-15		X	10/5/17	1551	GW	3		3		
MW-149-ODLS-15		X	10/5/17	1634	GW	3		3		
DUP2-ODLS-15		X	10/5/17	1736	GW	3		3		
MW-163-ODLS-15		X	10/5/17	1558	GW	2		2		
MW-163-ODLS-15-MSD			10/5/17	1558	GW	2		2		
MW-70-ODLS-15		X	10/6/17	1035	GW	3		3		
MW-57-ODLS-15		X	10/6/17	0950	GW	3		3		
DUP-1-ODLS-15		X	10/6/17	1026	GW	3		3		
MW-144-ODLS-15		X	10/6/17	1100	GW	3		3		
MW-165-ODLS-15		X	10/6/17	1050	GW	3		3		
MW-190-ODLS-15		X	10/6/17	1110	GW	3		3		
MW-87-ODLS-15		X	10/6/17	1015	GW	3		3		
MW-77-ODLS-15		X	10/6/17	1120	GW	3		3		
MW-06-ODLS-15		X	10/6/17	1000	GW	3		3		
DUP-2-LA-26		X	10/6/17	1257	GW	3		3		

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10/6/17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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L17100514 / Revision: 1 / 324 total pages

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COC No. A 47721

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720 1633 2880

Turn Around Requirements:

Location: Memphis (Project Site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: T Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	VOC 8260R	TOTAL # (LAB USE)
DR1-5A-LA-26		X	10/6/17	1255	GW	3		3	
PMW21-01-LA-26		X	10/6/17	1400	GW	3		3	
DUP1-LA-26		X	10/6/17	1305	GW	3		3	
DR1-4-LA-26		X	10/6/17	1515	GW	3		3	
PMW101-07A-LA-26		X	10/6/17	1450	GW	3		3	
DR1-5-LA-26		X	10/6/17	1300	GW	3		3	
MW-279-2A-26		X	10/6/17	1320	GW	3		3	
PMW101-04B-LA-26		X	10/6/17	1430	GW	3		3	
PMW101-04A-LA-26		X	10/6/17	1420	GW	3		3	
PMW101-02A-LA-26		X	10/6/17	1350	GW	3		3	
MW-163-ODLS-15-MS			10/5/17	1558	GW	1		1	
TB-1-ODLS-15		X	10/6/17	1620	GW	3		3	

Microbac OVD
Received: 10/07/2017 09:47
By: BRENDA GREENWALT
221000107214

Brenda Greenwalt

T Redmond 1620 10-6-17

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
T Redmond	10/6/17	1620					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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Generated: 10/23/2017 09:40

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7214

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

BG 10/7/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

BG 10/7/17

PRESERVATIVE EXCEPTIONS

✓ NONE

__ AS NOTED

BG 10/7/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-01	977816	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Samplenum	Container ID	Products
L17100514-02	977817	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-03	977818	

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	

Samplenum	Container ID	Products
L17100514-04	977819	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	09-OCT-2017 15:03	CLS		
2	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-05	977820	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	

Samplenum	Container ID	Products
L17100514-06	977821	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-07	977822	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Samplenum	Container ID	Products
L17100514-08	977823	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-09	977824	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Samplenum	Container ID	Products
L17100514-10	977825	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-11	977826	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Samplenum	Container ID	Products
L17100514-12	977827	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-13	977828	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Samplenum	Container ID	Products
L17100514-14	977829	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		09-OCT-2017 15:03	CLS		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-15	977830	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		09-OCT-2017 15:03	CLS		

Samplenum	Container ID	Products
L17100514-16	977831	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		09-OCT-2017 15:03	CLS		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-17	977832	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Samplenum	Container ID	Products
L17100514-18	977833	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-19	977834	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:26	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Samplenum	Container ID	Products
L17100514-20	977835	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-21	977836	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Samplenum	Container ID	Products
L17100514-22	977837	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-23	977838	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Samplenum	Container ID	Products
L17100514-24	977839	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:18	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-25	977840	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17100514-26	977841	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-27	977842	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100514-28	977843	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-29	977844	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100514-30	977845	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100514
Account: 2694
Project: 2694.011
Samples: 30
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100514-31	977846	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:03	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100636 *(Revised)*

Revised report to exclude 1,4-dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 23 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100636
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: DUP-4-LA-26. 1 of 3 vials received broken. BRG Sample ID: MW-209A-LA-26. 1 of 3 vials received broken. BRG Sample ID: MW-218-LA-26. 1 of 3 vials received broken. BRG	Please proceed with analysis on remaining two vials. ALS
Sample ID: LTM-TB2-LA-26. Time on COC reads: 13:44. Time on labels read: 18:24. BRG	Please log per COC. ALS
Sample ID: MW-203A-LA-26. All 3 vials received w/headspace >6mm. BRG Sample ID: MW-209B-LA-26. 1 of 3 vials received w/headspace >6mm.. BRG Sample ID: MW-208B-LA-26. 1 of 3 vials received w/headspace >6mm. BRG Sample ID: MW-207A-LA-26. 1 of 3 vials received w/headspace >6mm. BRG Sample ID: LTM-TB3-LA-26. All 3 vials received w/headspace >6mm. BRG Sample ID: LTM-TB1-LA-26. 2 of 3 vials received w/headspace >6mm. BRG **Sample ID: DUP-8-LA-26. All 3 vials headspace >6mm. BRG	Client notified, please analyze vials without headspace first when available. ALS **Please proceed per MRT/BRG

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00115199	H	2.0		100189171136000457500078801824576 5	X
00110549	H	1.0		100282601136000457500078801824577 6	X
0019900	H	2.0		100282601136000457500078801824578 7	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	No

7	Were sample labels intact and match COC?	No
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17100636
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
LTM-RB1-LA-26	L17100636-01	10/09/2017 16:49	10/10/2017 11:31
MW-204B-LA-26	L17100636-02	10/07/2017 11:08	10/10/2017 11:31
MW-205A-LA-26	L17100636-03	10/07/2017 09:53	10/10/2017 11:31
MW-205B-LA-26	L17100636-04	10/07/2017 10:03	10/10/2017 11:31
MW-210B-LA-26	L17100636-06	10/07/2017 09:34	10/10/2017 11:31
MW-197B-LA-26	L17100636-07	10/07/2017 10:22	10/10/2017 11:31
MW-210A-LA-26	L17100636-08	10/07/2017 09:19	10/10/2017 11:31
PMW21-05-LA-26	L17100636-09	10/07/2017 08:31	10/10/2017 11:31
MW-219-LA-26	L17100636-10	10/07/2017 11:47	10/10/2017 11:31
MW-219-LA-26-MS	L17100636-11	10/07/2017 11:47	10/10/2017 11:31
MW-219-LA-26-MSD	L17100636-12	10/07/2017 11:47	10/10/2017 11:31
PMW-85-05-LA-26	L17100636-13	10/07/2017 13:50	10/10/2017 11:31
MW-85-LA-26	L17100636-14	10/07/2017 13:38	10/10/2017 11:31
MW-197A-LA-26	L17100636-15	10/07/2017 10:53	10/10/2017 11:31
DR2-4-LA-26	L17100636-16	10/07/2017 12:30	10/10/2017 11:31
PMW-85-01-LA-26	L17100636-17	10/07/2017 11:10	10/10/2017 11:31
MW-266-LA-26	L17100636-18	10/07/2017 13:05	10/10/2017 11:31
MW-204A-LA-26	L17100636-20	10/07/2017 11:22	10/10/2017 11:31
MW-88-LA-26	L17100636-21	10/07/2017 13:10	10/10/2017 11:31
DR2-2-LA-26	L17100636-22	10/07/2017 12:55	10/10/2017 11:31
MW-92-LA-26	L17100636-23	10/07/2017 16:30	10/10/2017 11:31
PMW92-03-LA-26	L17100636-24	10/07/2017 16:11	10/10/2017 11:31
PMW92-03-LA-26-MS	L17100636-25	10/07/2017 16:11	10/10/2017 11:31
PMW92-03-LA-26-MSD	L17100636-26	10/07/2017 16:11	10/10/2017 11:31
MW-113-LA	L17100636-27	10/07/2017 15:34	10/10/2017 11:31
PMW92-02-LA-26	L17100636-28	10/07/2017 15:57	10/10/2017 11:31
MW-64-LA-26	L17100636-29	10/08/2017 09:00	10/10/2017 11:31
MW-217-LA-26	L17100636-30	10/08/2017 08:45	10/10/2017 11:31
MW-26-LA-26	L17100636-31	10/08/2017 08:30	10/10/2017 11:31
DUP-4-LA-26	L17100636-32	10/08/2017 09:10	10/10/2017 11:31
MW-209B-LA-26	L17100636-33	10/07/2017 16:34	10/10/2017 11:31
MW-200-LA-26	L17100636-34	10/07/2017 15:05	10/10/2017 11:31
MW-94A-LA-26	L17100636-35	10/07/2017 16:14	10/10/2017 11:31
DUP-5-LA-26	L17100636-36	10/07/2017 16:30	10/10/2017 11:31
MW-207B-LA-26	L17100636-37	10/07/2017 13:22	10/10/2017 11:31
MW-208B-LA-26	L17100636-38	10/07/2017 14:48	10/10/2017 11:31
MW-206A-LA-26	L17100636-39	10/07/2017 15:11	10/10/2017 11:31

MW-208A-LA-26	L17100636-40	10/07/2017 14:10	10/10/2017 11:31
MW-208A-LA-26-MS	L17100636-41	10/07/2017 14:10	10/10/2017 11:31
MW-208A-LA-26-MSD	L17100636-42	10/07/2017 14:10	10/10/2017 11:31

Login Number: L17100636
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was above the UCL for the following analytes on HPMS6: Chloromethane, dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries out of range were observed for the following analytes: Dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: Recoveries out of range were observed for the following analytes: Tetrachloroethene. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type

L17100636-11	Tetrachloroethene	2017-10-14 16:39:00	9.30	66	128	Recovery

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130604
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100636-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-RB1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 00:38
Collect Date:	10/09/2017 16:49	**Dilution:**	1	**File ID:**	6M150758
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.332		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.256	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.3	85	115	
1,2-Dichloroethane-d4	97.2	72	119	
Toluene-d8	98.0	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-204B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 01:07
Collect Date:	10/07/2017 11:08	**Dilution:**	1	**File ID:**	6M150759
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.522		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.165	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.4	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 13:39
Collect Date:	10/07/2017 09:53	**Dilution:**	1	**File ID:**	6M150737
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.61		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.35	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.32		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 14:09
Collect Date:	10/07/2017 10:03	**Dilution:**	1	**File ID:**	6M150738
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.07		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.54	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.75		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.19		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-210B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 14:38
Collect Date:	10/07/2017 09:34	**Dilution:**	1	**File ID:**	6M150739
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.89	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.973	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.47		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	99.5	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-197B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 15:08
Collect Date:	10/07/2017 10:22	**Dilution:**	1	**File ID:**	6M150740
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.31		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.38	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	14.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	12.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-210A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 15:37
Collect Date:	10/07/2017 09:19	**Dilution:**	1	**File ID:**	6M150741
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.142	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.46		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.16	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.53		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.93		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-05-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 16:07
Collect Date:	10/07/2017 08:31	**Dilution:**	1	**File ID:**	6M150742
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.368	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 18:08
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22371
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.06		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.78		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	113		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 16:39
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22368
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.0		1.00	0.250
1,1-Dichloroethane	75-34-3	20.1		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	20.6		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.9		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.3		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.5		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.7		2.00	1.00
1,2-Dichloropropane	78-87-5	21.0		1.00	0.200
1,2-Dibromoethane	106-93-4	21.3		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.6		1.00	0.250
1,3-Dichloropropane	142-28-9	21.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.2		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	19.5		1.00	0.250
2-Hexanone	591-78-6	20.4		10.0	2.50
2-Chlorotoluene	95-49-8	20.6		1.00	0.125
4-Chlorotoluene	106-43-4	21.5		1.00	0.250
Acetone	67-64-1	26.1		10.0	2.50
Benzene	71-43-2	20.3		0.400	0.125
Bromobenzene	108-86-1	20.5		1.00	0.125
Bromochloromethane	74-97-5	20.2		1.00	0.200
Bromodichloromethane	75-27-4	20.1		0.500	0.250
Bromoform	75-25-2	17.7		1.00	0.500
Bromomethane	74-83-9	19.9		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.6		1.00	0.250
Chlorobenzene	108-90-7	20.3		0.500	0.125
Chloroethane	75-00-3	22.0		1.00	0.500
Chloroform	67-66-3	20.0		0.300	0.125
Chloromethane	74-87-3	21.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.8		0.500	0.250
Dibromochloromethane	124-48-1	20.1		0.500	0.250
Dibromomethane	74-95-3	20.1		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.2		1.00	0.250
Ethylbenzene	100-41-4	20.8		1.00	0.250
Hexachlorobutadiene	87-68-3	20.4		0.600	0.250
Isopropylbenzene	98-82-8	21.8		1.00	0.250
Methylene chloride	75-09-2	19.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.4		5.00	0.500
MEK (2-Butanone)	78-93-3	20.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	22.0		1.00	0.250
n-Propylbenzene	103-65-1	22.5		1.00	0.125
m-,p-Xylene	179601-23-1	43.7		2.00	0.500
Naphthalene	91-20-3	23.7		1.00	0.200
o-Xylene	95-47-6	22.3		1.00	0.250
p-Isopropyltoluene	99-87-6	21.3		1.00	0.250
sec-Butylbenzene	135-98-8	20.8		1.00	0.250
Styrene	100-42-5	20.8		1.00	0.125
Trichloroethene	79-01-6	24.7		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	115		1.00	0.250
Toluene	108-88-3	20.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.9		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	19.1		1.00	0.250
Vinyl chloride	75-01-4	20.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.5	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Sample #:	L17100636-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 17:09
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22369
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	21.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	22.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.8		1.00	0.250
1,1-Dichloroethane	75-34-3	21.0		1.00	0.125
1,1-Dichloroethene	75-35-4	21.4		1.00	0.500
1,1-Dichloropropene	563-58-6	22.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	23.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	24.1		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	22.9		1.00	0.250
1,2-Dichloroethane	107-06-2	22.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.6		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	23.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	22.6		1.00	0.250
1,3-Dichloropropane	142-28-9	22.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	21.9		0.500	0.125
1-Chlorohexane	544-10-5	22.5		1.00	0.125
2,2-Dichloropropane	594-20-7	20.8		1.00	0.250
2-Hexanone	591-78-6	22.2		10.0	2.50
2-Chlorotoluene	95-49-8	22.3		1.00	0.125
4-Chlorotoluene	106-43-4	22.9		1.00	0.250
Acetone	67-64-1	28.4		10.0	2.50
Benzene	71-43-2	21.6		0.400	0.125
Bromobenzene	108-86-1	21.8		1.00	0.125
Bromochloromethane	74-97-5	22.1		1.00	0.200
Bromodichloromethane	75-27-4	21.6		0.500	0.250
Bromoform	75-25-2	18.4		1.00	0.500
Bromomethane	74-83-9	21.4		1.00	0.500
Carbon disulfide	75-15-0	19.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	21.2		1.00	0.250
Chlorobenzene	108-90-7	21.6		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	21.3		0.300	0.125
Chloromethane	74-87-3	22.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	26.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.5		0.500	0.250
Dibromochloromethane	124-48-1	21.7		0.500	0.250
Dibromomethane	74-95-3	21.8		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.0		1.00	0.250
Ethylbenzene	100-41-4	22.0		1.00	0.250
Hexachlorobutadiene	87-68-3	20.9		0.600	0.250
Isopropylbenzene	98-82-8	22.8		1.00	0.250
Methylene chloride	75-09-2	20.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.4		5.00	0.500
MEK (2-Butanone)	78-93-3	22.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.0		10.0	2.50
n-Butylbenzene	104-51-8	23.7		1.00	0.250
n-Propylbenzene	103-65-1	24.2		1.00	0.125
m-,p-Xylene	179601-23-1	46.5		2.00	0.500
Naphthalene	91-20-3	25.1		1.00	0.200
o-Xylene	95-47-6	23.2		1.00	0.250
p-Isopropyltoluene	99-87-6	22.8		1.00	0.250
sec-Butylbenzene	135-98-8	22.4		1.00	0.250
Styrene	100-42-5	21.9		1.00	0.125
Trichloroethene	79-01-6	25.7		1.00	0.250
tert-Butylbenzene	98-06-6	22.4		1.00	0.250
Tetrachloroethene	127-18-4	120		1.00	0.250
Toluene	108-88-3	22.0		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.7		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	20.5		1.00	0.250
Vinyl chloride	75-01-4	20.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Sample #:	L17100636-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW-85-05-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 16:37
Collect Date:	10/07/2017 13:50	**Dilution:**	1	**File ID:**	6M150743
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	14.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.313	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7	0.154	F	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.31	F	10.0	2.50
Benzene	71-43-2	0.142	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.198	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.971		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	123		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.99		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.90		1.00	0.250
Toluene	108-88-3	0.592	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-85-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 00:33
Collect Date:	10/07/2017 13:38	**Dilution:**	1	**File ID:**	11M22384
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	9.72		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.271	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2	0.241	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	11.2		1.00	0.250
Chlorobenzene	108-90-7	0.276	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	5.41		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	40.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	60.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.755	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-197A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 01:02
Collect Date:	10/07/2017 10:53	**Dilution:**	1	**File ID:**	11M22385
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.131	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.638	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.845	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 21:05
Collect Date:	10/07/2017 12:30	**Dilution:**	1	**File ID:**	11M22377
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.91		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.296	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.517	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.72		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	PMW-85-01-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 23:04
Collect Date:	10/07/2017 11:10	**Dilution:**	1	**File ID:**	11M22381
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.488	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9	0.263	F	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.49	F	10.0	2.50
Benzene	71-43-2	0.167	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.320	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.74		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	36.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-266-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 18:37
Collect Date:	10/07/2017 13:05	**Dilution:**	1	**File ID:**	11M22372
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.60	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.437	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.183	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.505	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.33		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 19:36
Collect Date:	10/07/2017 11:22	**Dilution:**	1	**File ID:**	11M22374
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.09		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.571	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.819	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	30.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-88-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 19:07
Collect Date:	10/07/2017 13:10	**Dilution:**	1	**File ID:**	11M22373
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	3.16		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.302		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.266	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 22:04
Collect Date:	10/07/2017 12:55	**Dilution:**	1	**File ID:**	11M22379
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.242	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.51		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.771	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.26		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-92-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 20:05
Collect Date:	10/07/2017 16:30	**Dilution:**	1	**File ID:**	11M22375
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.86		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.94		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	78.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.19		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	109	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 08:45
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150727
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.328	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6	7.37	F	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.265	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3	5.69	F	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	6.89	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.463	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.535	F	1.00	0.250
Toluene	108-88-3	2.10		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	7.76		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	98.9	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 09:44
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150729
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.3		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	21.1		1.00	0.500
1,1-Dichloropropene	563-58-6	21.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.6		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.0		1.00	0.250
1,2-Dichloroethane	107-06-2	21.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.2		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.4		2.00	1.00
1,2-Dichloropropane	78-87-5	21.5		1.00	0.200
1,2-Dibromoethane	106-93-4	21.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	19.3		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	27.8		10.0	2.50
2-Chlorotoluene	95-49-8	18.4		1.00	0.125
4-Chlorotoluene	106-43-4	22.4		1.00	0.250
Acetone	67-64-1	34.4		10.0	2.50
Benzene	71-43-2	20.7		0.400	0.125
Bromobenzene	108-86-1	20.1		1.00	0.125
Bromochloromethane	74-97-5	21.3		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	19.5		1.00	0.500
Bromomethane	74-83-9	16.6		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.1		1.00	0.500
Carbon tetrachloride	56-23-5	20.8		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	22.3		1.00	0.500
Chloroform	67-66-3	20.3		0.300	0.125
Chloromethane	74-87-3	23.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	42.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.9		0.500	0.250
Dibromochloromethane	124-48-1	20.3		0.500	0.250
Dibromomethane	74-95-3	22.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.5	Q	1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	17.0		0.600	0.250
Isopropylbenzene	98-82-8	20.2		1.00	0.250
Methylene chloride	75-09-2	20.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.5		5.00	0.500
MEK (2-Butanone)	78-93-3	26.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	27.3		10.0	2.50
n-Butylbenzene	104-51-8	19.6		1.00	0.250
n-Propylbenzene	103-65-1	21.3		1.00	0.125
m-,p-Xylene	179601-23-1	40.7		2.00	0.500
Naphthalene	91-20-3	21.6		1.00	0.200
o-Xylene	95-47-6	21.3		1.00	0.250
p-Isopropyltoluene	99-87-6	20.3		1.00	0.250
sec-Butylbenzene	135-98-8	19.8		1.00	0.250
Styrene	100-42-5	21.9		1.00	0.125
Trichloroethene	79-01-6	20.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	20.0		1.00	0.250
Toluene	108-88-3	21.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.0		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	29.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.8	72	119	
Toluene-d8	96.2	81	120	
4-Bromofluorobenzene	100	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100636-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 10:13
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150730
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.6		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.1		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	20.6		1.00	0.500
1,1-Dichloropropene	563-58-6	20.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.8		1.00	0.250
1,2-Dichloroethane	107-06-2	21.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.0		2.00	1.00
1,2-Dichloropropane	78-87-5	21.1		1.00	0.200
1,2-Dibromoethane	106-93-4	20.8		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.1		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.0		0.500	0.125
1-Chlorohexane	544-10-5	20.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.6		1.00	0.250
2-Hexanone	591-78-6	28.4		10.0	2.50
2-Chlorotoluene	95-49-8	20.7		1.00	0.125
4-Chlorotoluene	106-43-4	19.6		1.00	0.250
Acetone	67-64-1	33.6		10.0	2.50
Benzene	71-43-2	20.5		0.400	0.125
Bromobenzene	108-86-1	19.9		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.4		0.500	0.250
Bromoform	75-25-2	19.4		1.00	0.500
Bromomethane	74-83-9	16.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.2		1.00	0.500
Carbon tetrachloride	56-23-5	20.3		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	20.1		0.300	0.125
Chloromethane	74-87-3	23.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	41.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.5		0.500	0.250
Dibromochloromethane	124-48-1	19.9		0.500	0.250
Dibromomethane	74-95-3	21.5		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.4	Q	1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	16.9		0.600	0.250
Isopropylbenzene	98-82-8	20.1		1.00	0.250
Methylene chloride	75-09-2	20.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.3		5.00	0.500
MEK (2-Butanone)	78-93-3	26.3		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	27.0		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	21.1		1.00	0.125
m-,p-Xylene	179601-23-1	40.7		2.00	0.500
Naphthalene	91-20-3	21.4		1.00	0.200
o-Xylene	95-47-6	21.4		1.00	0.250
p-Isopropyltoluene	99-87-6	20.1		1.00	0.250
sec-Butylbenzene	135-98-8	19.6		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	20.5		1.00	0.250
tert-Butylbenzene	98-06-6	20.1		1.00	0.250
Tetrachloroethene	127-18-4	19.9		1.00	0.250
Toluene	108-88-3	21.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.6		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	29.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.1	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	99.7	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100636-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-113-LA	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 22:34
Collect Date:	10/07/2017 15:34	**Dilution:**	1	**File ID:**	11M22380
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	0.591	F	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3	0.572	F	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	40.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4	0.517	F	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.663	F	1.00	0.250
Toluene	108-88-3	8.60		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.951	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	28.3		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	PMW92-02-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 20:35
Collect Date:	10/07/2017 15:57	**Dilution:**	1	**File ID:**	11M22376
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.30		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4	0.306	F	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	2.32		2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	2.34		1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.790	F	1.00	0.250
Toluene	108-88-3	0.363	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	72.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-64-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 23:33
Collect Date:	10/08/2017 09:00	**Dilution:**	1	**File ID:**	11M22382
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.392	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.03		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.87		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.41		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.440	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	26.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-217-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 21:34
Collect Date:	10/08/2017 08:45	**Dilution:**	1	**File ID:**	11M22378
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.236	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	18.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	73.1		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.99		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.17		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	28.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	31.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.25		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-26-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 00:03
Collect Date:	10/08/2017 08:30	**Dilution:**	1	**File ID:**	11M22383
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.26		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.442		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.739	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.25		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 17:37
Collect Date:	10/08/2017 09:10	**Dilution:**	1	**File ID:**	11M22410
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.379	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.723	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.24		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.22		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.442	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 18:06
Collect Date:	10/07/2017 16:34	**Dilution:**	1	**File ID:**	11M22411
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.169	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.36		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.65		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-200-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 18:35
Collect Date:	10/07/2017 15:05	**Dilution:**	1	**File ID:**	11M22412
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.42		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.33	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.50		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.88		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-94A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 19:04
Collect Date:	10/07/2017 16:14	**Dilution:**	1	**File ID:**	11M22413
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.64	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.48	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.08		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 19:33
Collect Date:	10/07/2017 16:30	**Dilution:**	1	**File ID:**	11M22414
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.30		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.41	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-207B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 20:03
Collect Date:	10/07/2017 13:22	**Dilution:**	1	**File ID:**	11M22415
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.290	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.591	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.11		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.56		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.467	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 20:33
Collect Date:	10/07/2017 14:48	**Dilution:**	1	**File ID:**	11M22416
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.30	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.05		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.10		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-206A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 21:02
Collect Date:	10/07/2017 15:11	**Dilution:**	1	**File ID:**	11M22417
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.71	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	12.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.20		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	6.71		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 21:31
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22418
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.29	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 15:09
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22405
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.4		1.00	0.250
1,1-Dichloroethane	75-34-3	21.1		1.00	0.125
1,1-Dichloroethene	75-35-4	21.0		1.00	0.500
1,1-Dichloropropene	563-58-6	22.0		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	22.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.7		1.00	0.250
1,2-Dichloroethane	107-06-2	21.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.2		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.2		1.00	0.250
1,3-Dichloropropane	142-28-9	22.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.9		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.7		1.00	0.250
2-Hexanone	591-78-6	21.6		10.0	2.50
2-Chlorotoluene	95-49-8	21.5		1.00	0.125
4-Chlorotoluene	106-43-4	20.6		1.00	0.250
Acetone	67-64-1	32.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	21.0		1.00	0.125
Bromochloromethane	74-97-5	21.4		1.00	0.200
Bromodichloromethane	75-27-4	21.4		0.500	0.250
Bromoform	75-25-2	18.9		1.00	0.500
Bromomethane	74-83-9	23.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.1		1.00	0.500
Carbon tetrachloride	56-23-5	20.4		1.00	0.250
Chlorobenzene	108-90-7	21.4		0.500	0.125
Chloroethane	75-00-3	22.3		1.00	0.500
Chloroform	67-66-3	29.1		0.300	0.125
Chloromethane	74-87-3	21.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	29.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.4		0.500	0.250
Dibromochloromethane	124-48-1	21.1		0.500	0.250
Dibromomethane	74-95-3	21.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.7		1.00	0.250
Ethylbenzene	100-41-4	22.0		1.00	0.250
Hexachlorobutadiene	87-68-3	19.4		0.600	0.250
Isopropylbenzene	98-82-8	22.6		1.00	0.250
Methylene chloride	75-09-2	20.9		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	23.8		5.00	0.500
MEK (2-Butanone)	78-93-3	22.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.8		10.0	2.50
n-Butylbenzene	104-51-8	21.5		1.00	0.250
n-Propylbenzene	103-65-1	22.5		1.00	0.125
m-,p-Xylene	179601-23-1	45.4		2.00	0.500
Naphthalene	91-20-3	24.2		1.00	0.200
o-Xylene	95-47-6	22.8		1.00	0.250
p-Isopropyltoluene	99-87-6	20.8		1.00	0.250
sec-Butylbenzene	135-98-8	20.5		1.00	0.250
Styrene	100-42-5	21.7		1.00	0.125
Trichloroethene	79-01-6	26.4		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	27.1		1.00	0.250
Toluene	108-88-3	21.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	22.1		1.00	0.500
Trichlorofluoromethane	75-69-4	18.7		1.00	0.250
Vinyl chloride	75-01-4	23.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Sample #:	L17100636-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 15:39
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22406
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.3		1.00	0.250
1,1-Dichloroethane	75-34-3	20.4		1.00	0.125
1,1-Dichloroethene	75-35-4	20.5		1.00	0.500
1,1-Dichloropropene	563-58-6	21.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.1		1.00	0.250
1,2-Dichloroethane	107-06-2	20.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.6		2.00	1.00
1,2-Dichloropropane	78-87-5	21.5		1.00	0.200
1,2-Dibromoethane	106-93-4	21.6		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.7		1.00	0.250
1,3-Dichloropropane	142-28-9	22.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.7		0.500	0.125
1-Chlorohexane	544-10-5	19.9		1.00	0.125
2,2-Dichloropropane	594-20-7	19.8		1.00	0.250
2-Hexanone	591-78-6	21.2		10.0	2.50
2-Chlorotoluene	95-49-8	21.0		1.00	0.125
4-Chlorotoluene	106-43-4	20.9		1.00	0.250
Acetone	67-64-1	33.0		10.0	2.50
Benzene	71-43-2	20.8		0.400	0.125
Bromobenzene	108-86-1	20.2		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	22.0		1.00	0.500
Carbon disulfide	75-15-0	17.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	20.5		0.500	0.125
Chloroethane	75-00-3	21.2		1.00	0.500
Chloroform	67-66-3	24.8		0.300	0.125
Chloromethane	74-87-3	20.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	30.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.7		0.500	0.250
Dibromochloromethane	124-48-1	20.6		0.500	0.250
Dibromomethane	74-95-3	20.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.0		1.00	0.250
Ethylbenzene	100-41-4	20.7		1.00	0.250
Hexachlorobutadiene	87-68-3	19.3		0.600	0.250
Isopropylbenzene	98-82-8	21.6		1.00	0.250
Methylene chloride	75-09-2	19.9		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	23.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.9		10.0	2.50
n-Butylbenzene	104-51-8	21.1		1.00	0.250
n-Propylbenzene	103-65-1	22.1		1.00	0.125
m-,p-Xylene	179601-23-1	43.7		2.00	0.500
Naphthalene	91-20-3	23.7		1.00	0.200
o-Xylene	95-47-6	22.1		1.00	0.250
p-Isopropyltoluene	99-87-6	20.8		1.00	0.250
sec-Butylbenzene	135-98-8	20.4		1.00	0.250
Styrene	100-42-5	20.9		1.00	0.125
Trichloroethene	79-01-6	26.7		1.00	0.250
tert-Butylbenzene	98-06-6	20.0		1.00	0.250
Tetrachloroethene	127-18-4	26.9		1.00	0.250
Toluene	108-88-3	20.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.5		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.4		1.00	0.500
Trichlorofluoromethane	75-69-4	18.3		1.00	0.250
Vinyl chloride	75-01-4	22.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100636
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was above the UCL for the following analytes on HPMS6: Chloromethane, dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries out of range were observed for the following analytes: Dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: Recoveries out of range were observed for the following analytes: Tetrachloroethene. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type

L17100636-11	Tetrachloroethene	2017-10-14 16:39:00	9.30	66	128	Recovery

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130604
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100636-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-RB1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 00:38
Collect Date:	10/09/2017 16:49	**Dilution:**	1	**File ID:**	6M150758
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.332		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.256	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.3	85	115	
1,2-Dichloroethane-d4	97.2	72	119	
Toluene-d8	98.0	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-204B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 01:07
Collect Date:	10/07/2017 11:08	**Dilution:**	1	**File ID:**	6M150759
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.522		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.165	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.4	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 13:39
Collect Date:	10/07/2017 09:53	**Dilution:**	1	**File ID:**	6M150737
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.61		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.35	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.32		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-205B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 14:09
Collect Date:	10/07/2017 10:03	**Dilution:**	1	**File ID:**	6M150738
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.07		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.54	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.75		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.19		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-210B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 14:38
Collect Date:	10/07/2017 09:34	**Dilution:**	1	**File ID:**	6M150739
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.89	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.973	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.47		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	99.5	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-197B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 15:08
Collect Date:	10/07/2017 10:22	**Dilution:**	1	**File ID:**	6M150740
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.31		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.38	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	14.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	12.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	98.8	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-210A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 15:37
Collect Date:	10/07/2017 09:19	**Dilution:**	1	**File ID:**	6M150741
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.142	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	4.46		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.16	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.53		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.93		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW21-05-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 16:07
Collect Date:	10/07/2017 08:31	**Dilution:**	1	**File ID:**	6M150742
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.368	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 18:08
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22371
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.06		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.78		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	113		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 16:39
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22368
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.0		1.00	0.250
1,1-Dichloroethane	75-34-3	20.1		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	20.6		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.9		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.3		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.5		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.7		2.00	1.00
1,2-Dichloropropane	78-87-5	21.0		1.00	0.200
1,2-Dibromoethane	106-93-4	21.3		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.6		1.00	0.250
1,3-Dichloropropane	142-28-9	21.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.2		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	19.5		1.00	0.250
2-Hexanone	591-78-6	20.4		10.0	2.50
2-Chlorotoluene	95-49-8	20.6		1.00	0.125
4-Chlorotoluene	106-43-4	21.5		1.00	0.250
Acetone	67-64-1	26.1		10.0	2.50
Benzene	71-43-2	20.3		0.400	0.125
Bromobenzene	108-86-1	20.5		1.00	0.125
Bromochloromethane	74-97-5	20.2		1.00	0.200
Bromodichloromethane	75-27-4	20.1		0.500	0.250
Bromoform	75-25-2	17.7		1.00	0.500
Bromomethane	74-83-9	19.9		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.6		1.00	0.250
Chlorobenzene	108-90-7	20.3		0.500	0.125
Chloroethane	75-00-3	22.0		1.00	0.500
Chloroform	67-66-3	20.0		0.300	0.125
Chloromethane	74-87-3	21.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.8		0.500	0.250
Dibromochloromethane	124-48-1	20.1		0.500	0.250
Dibromomethane	74-95-3	20.1		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.2		1.00	0.250
Ethylbenzene	100-41-4	20.8		1.00	0.250
Hexachlorobutadiene	87-68-3	20.4		0.600	0.250
Isopropylbenzene	98-82-8	21.8		1.00	0.250
Methylene chloride	75-09-2	19.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.4		5.00	0.500
MEK (2-Butanone)	78-93-3	20.9		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	22.0		1.00	0.250
n-Propylbenzene	103-65-1	22.5		1.00	0.125
m-,p-Xylene	179601-23-1	43.7		2.00	0.500
Naphthalene	91-20-3	23.7		1.00	0.200
o-Xylene	95-47-6	22.3		1.00	0.250
p-Isopropyltoluene	99-87-6	21.3		1.00	0.250
sec-Butylbenzene	135-98-8	20.8		1.00	0.250
Styrene	100-42-5	20.8		1.00	0.125
Trichloroethene	79-01-6	24.7		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	115		1.00	0.250
Toluene	108-88-3	20.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.9		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	19.1		1.00	0.250
Vinyl chloride	75-01-4	20.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.5	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Sample #:	L17100636-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-219-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 17:09
Collect Date:	10/07/2017 11:47	**Dilution:**	1	**File ID:**	11M22369
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	21.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	22.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.8		1.00	0.250
1,1-Dichloroethane	75-34-3	21.0		1.00	0.125
1,1-Dichloroethene	75-35-4	21.4		1.00	0.500
1,1-Dichloropropene	563-58-6	22.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	23.7		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	24.1		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	22.9		1.00	0.250
1,2-Dichloroethane	107-06-2	22.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.6		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	23.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	22.6		1.00	0.250
1,3-Dichloropropane	142-28-9	22.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	21.9		0.500	0.125
1-Chlorohexane	544-10-5	22.5		1.00	0.125
2,2-Dichloropropane	594-20-7	20.8		1.00	0.250
2-Hexanone	591-78-6	22.2		10.0	2.50
2-Chlorotoluene	95-49-8	22.3		1.00	0.125
4-Chlorotoluene	106-43-4	22.9		1.00	0.250
Acetone	67-64-1	28.4		10.0	2.50
Benzene	71-43-2	21.6		0.400	0.125
Bromobenzene	108-86-1	21.8		1.00	0.125
Bromochloromethane	74-97-5	22.1		1.00	0.200
Bromodichloromethane	75-27-4	21.6		0.500	0.250
Bromoform	75-25-2	18.4		1.00	0.500
Bromomethane	74-83-9	21.4		1.00	0.500
Carbon disulfide	75-15-0	19.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	21.2		1.00	0.250
Chlorobenzene	108-90-7	21.6		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	21.3		0.300	0.125
Chloromethane	74-87-3	22.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	26.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.5		0.500	0.250
Dibromochloromethane	124-48-1	21.7		0.500	0.250
Dibromomethane	74-95-3	21.8		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.0		1.00	0.250
Ethylbenzene	100-41-4	22.0		1.00	0.250
Hexachlorobutadiene	87-68-3	20.9		0.600	0.250
Isopropylbenzene	98-82-8	22.8		1.00	0.250
Methylene chloride	75-09-2	20.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.4		5.00	0.500
MEK (2-Butanone)	78-93-3	22.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.0		10.0	2.50
n-Butylbenzene	104-51-8	23.7		1.00	0.250
n-Propylbenzene	103-65-1	24.2		1.00	0.125
m-,p-Xylene	179601-23-1	46.5		2.00	0.500
Naphthalene	91-20-3	25.1		1.00	0.200
o-Xylene	95-47-6	23.2		1.00	0.250
p-Isopropyltoluene	99-87-6	22.8		1.00	0.250
sec-Butylbenzene	135-98-8	22.4		1.00	0.250
Styrene	100-42-5	21.9		1.00	0.125
Trichloroethene	79-01-6	25.7		1.00	0.250
tert-Butylbenzene	98-06-6	22.4		1.00	0.250
Tetrachloroethene	127-18-4	120		1.00	0.250
Toluene	108-88-3	22.0		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.7		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	20.5		1.00	0.250
Vinyl chloride	75-01-4	20.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Sample #:	L17100636-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW-85-05-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 16:37
Collect Date:	10/07/2017 13:50	**Dilution:**	1	**File ID:**	6M150743
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	14.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.313	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7	0.154	F	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.31	F	10.0	2.50
Benzene	71-43-2	0.142	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.198	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.971		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	123		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.99		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.90		1.00	0.250
Toluene	108-88-3	0.592	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-85-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 00:33
Collect Date:	10/07/2017 13:38	**Dilution:**	1	**File ID:**	11M22384
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	9.72		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.271	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.48	F	10.0	2.50
Benzene	71-43-2	0.241	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	11.2		1.00	0.250
Chlorobenzene	108-90-7	0.276	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	5.41		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	40.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	60.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.755	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-197A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 01:02
Collect Date:	10/07/2017 10:53	**Dilution:**	1	**File ID:**	11M22385
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.131	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.638	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.845	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 21:05
Collect Date:	10/07/2017 12:30	**Dilution:**	1	**File ID:**	11M22377
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.91		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.296	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.517	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.72		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	PMW-85-01-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 23:04
Collect Date:	10/07/2017 11:10	**Dilution:**	1	**File ID:**	11M22381
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.488	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9	0.263	F	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.49	F	10.0	2.50
Benzene	71-43-2	0.167	F	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.320	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	13.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.74		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	36.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-266-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 18:37
Collect Date:	10/07/2017 13:05	**Dilution:**	1	**File ID:**	11M22372
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.60	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.437	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.183	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.505	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.33		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-204A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 19:36
Collect Date:	10/07/2017 11:22	**Dilution:**	1	**File ID:**	11M22374
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.09		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.571	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.819	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	30.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-88-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 19:07
Collect Date:	10/07/2017 13:10	**Dilution:**	1	**File ID:**	11M22373
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	3.16		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.302		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.266	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 22:04
Collect Date:	10/07/2017 12:55	**Dilution:**	1	**File ID:**	11M22379
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.242	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.51		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.771	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.26		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-92-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 20:05
Collect Date:	10/07/2017 16:30	**Dilution:**	1	**File ID:**	11M22375
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.86		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.94		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	78.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.19		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	109	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 08:45
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150727
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	0.328	F	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6	7.37	F	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.265	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3	5.69	F	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	6.89	F	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.463	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.535	F	1.00	0.250
Toluene	108-88-3	2.10		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	7.76		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	98.9	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 09:44
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150729
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.3		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	21.1		1.00	0.500
1,1-Dichloropropene	563-58-6	21.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.6		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.0		1.00	0.250
1,2-Dichloroethane	107-06-2	21.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.2		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.4		2.00	1.00
1,2-Dichloropropane	78-87-5	21.5		1.00	0.200
1,2-Dibromoethane	106-93-4	21.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	19.3		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	27.8		10.0	2.50
2-Chlorotoluene	95-49-8	18.4		1.00	0.125
4-Chlorotoluene	106-43-4	22.4		1.00	0.250
Acetone	67-64-1	34.4		10.0	2.50
Benzene	71-43-2	20.7		0.400	0.125
Bromobenzene	108-86-1	20.1		1.00	0.125
Bromochloromethane	74-97-5	21.3		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	19.5		1.00	0.500
Bromomethane	74-83-9	16.6		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.1		1.00	0.500
Carbon tetrachloride	56-23-5	20.8		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	22.3		1.00	0.500
Chloroform	67-66-3	20.3		0.300	0.125
Chloromethane	74-87-3	23.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	42.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.9		0.500	0.250
Dibromochloromethane	124-48-1	20.3		0.500	0.250
Dibromomethane	74-95-3	22.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.5	Q	1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	17.0		0.600	0.250
Isopropylbenzene	98-82-8	20.2		1.00	0.250
Methylene chloride	75-09-2	20.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.5		5.00	0.500
MEK (2-Butanone)	78-93-3	26.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	27.3		10.0	2.50
n-Butylbenzene	104-51-8	19.6		1.00	0.250
n-Propylbenzene	103-65-1	21.3		1.00	0.125
m-,p-Xylene	179601-23-1	40.7		2.00	0.500
Naphthalene	91-20-3	21.6		1.00	0.200
o-Xylene	95-47-6	21.3		1.00	0.250
p-Isopropyltoluene	99-87-6	20.3		1.00	0.250
sec-Butylbenzene	135-98-8	19.8		1.00	0.250
Styrene	100-42-5	21.9		1.00	0.125
Trichloroethene	79-01-6	20.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	20.0		1.00	0.250
Toluene	108-88-3	21.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.0		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	29.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.8	72	119	
Toluene-d8	96.2	81	120	
4-Bromofluorobenzene	100	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100636-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	PMW92-03-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634168	**Analyst:**	TMB	**Run Date:**	10/17/2017 10:13
Collect Date:	10/07/2017 16:11	**Dilution:**	1	**File ID:**	6M150730
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.6		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.1		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	20.6		1.00	0.500
1,1-Dichloropropene	563-58-6	20.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.8		1.00	0.250
1,2-Dichloroethane	107-06-2	21.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.0		2.00	1.00
1,2-Dichloropropane	78-87-5	21.1		1.00	0.200
1,2-Dibromoethane	106-93-4	20.8		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.1		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.0		0.500	0.125
1-Chlorohexane	544-10-5	20.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.6		1.00	0.250
2-Hexanone	591-78-6	28.4		10.0	2.50
2-Chlorotoluene	95-49-8	20.7		1.00	0.125
4-Chlorotoluene	106-43-4	19.6		1.00	0.250
Acetone	67-64-1	33.6		10.0	2.50
Benzene	71-43-2	20.5		0.400	0.125
Bromobenzene	108-86-1	19.9		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.4		0.500	0.250
Bromoform	75-25-2	19.4		1.00	0.500
Bromomethane	74-83-9	16.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.2		1.00	0.500
Carbon tetrachloride	56-23-5	20.3		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	22.8		1.00	0.500
Chloroform	67-66-3	20.1		0.300	0.125
Chloromethane	74-87-3	23.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	41.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.5		0.500	0.250
Dibromochloromethane	124-48-1	19.9		0.500	0.250
Dibromomethane	74-95-3	21.5		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.4	Q	1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	16.9		0.600	0.250
Isopropylbenzene	98-82-8	20.1		1.00	0.250
Methylene chloride	75-09-2	20.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.3		5.00	0.500
MEK (2-Butanone)	78-93-3	26.3		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	27.0		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	21.1		1.00	0.125
m-,p-Xylene	179601-23-1	40.7		2.00	0.500
Naphthalene	91-20-3	21.4		1.00	0.200
o-Xylene	95-47-6	21.4		1.00	0.250
p-Isopropyltoluene	99-87-6	20.1		1.00	0.250
sec-Butylbenzene	135-98-8	19.6		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	20.5		1.00	0.250
tert-Butylbenzene	98-06-6	20.1		1.00	0.250
Tetrachloroethene	127-18-4	19.9		1.00	0.250
Toluene	108-88-3	21.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.8		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.6		1.00	0.500
Trichlorofluoromethane	75-69-4	19.7		1.00	0.250
Vinyl chloride	75-01-4	29.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.1	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	99.7	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100636-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-113-LA	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 22:34
Collect Date:	10/07/2017 15:34	**Dilution:**	1	**File ID:**	11M22380
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	0.591	F	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3	0.572	F	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	40.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4	0.517	F	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.663	F	1.00	0.250
Toluene	108-88-3	8.60		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.951	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	28.3		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	PMW92-02-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 20:35
Collect Date:	10/07/2017 15:57	**Dilution:**	1	**File ID:**	11M22376
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.30		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4	0.306	F	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	2.32		2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	2.34		1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.790	F	1.00	0.250
Toluene	108-88-3	0.363	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	72.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	99.9	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-64-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 23:33
Collect Date:	10/08/2017 09:00	**Dilution:**	1	**File ID:**	11M22382
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.392	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.03		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.87		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.41		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.440	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	26.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-217-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/14/2017 21:34
Collect Date:	10/08/2017 08:45	**Dilution:**	1	**File ID:**	11M22378
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.236	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	18.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	73.1		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.99		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.17		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	28.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	31.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.25		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-26-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG633791	**Analyst:**	JDS	**Run Date:**	10/15/2017 00:03
Collect Date:	10/08/2017 08:30	**Dilution:**	1	**File ID:**	11M22383
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.26		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.442		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.739	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.25		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 17:37
Collect Date:	10/08/2017 09:10	**Dilution:**	1	**File ID:**	11M22410
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.379	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.723	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.24		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.22		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.442	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	22.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.9		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 18:06
Collect Date:	10/07/2017 16:34	**Dilution:**	1	**File ID:**	11M22411
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.169	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.36		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.65		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-200-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 18:35
Collect Date:	10/07/2017 15:05	**Dilution:**	1	**File ID:**	11M22412
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.42		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.33	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.50		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.88		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-94A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 19:04
Collect Date:	10/07/2017 16:14	**Dilution:**	1	**File ID:**	11M22413
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.64	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.48	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.08		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	18.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 19:33
Collect Date:	10/07/2017 16:30	**Dilution:**	1	**File ID:**	11M22414
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.30		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.41	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-207B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 20:03
Collect Date:	10/07/2017 13:22	**Dilution:**	1	**File ID:**	11M22415
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.290	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.591	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	2.11		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.56		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.467	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 20:33
Collect Date:	10/07/2017 14:48	**Dilution:**	1	**File ID:**	11M22416
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.30	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.05		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.10		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-206A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 21:02
Collect Date:	10/07/2017 15:11	**Dilution:**	1	**File ID:**	11M22417
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.71	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	12.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.20		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	6.71		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 21:31
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22418
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.29	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100636-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 15:09
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22405
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.4		1.00	0.250
1,1-Dichloroethane	75-34-3	21.1		1.00	0.125
1,1-Dichloroethene	75-35-4	21.0		1.00	0.500
1,1-Dichloropropene	563-58-6	22.0		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	22.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.7		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.7		1.00	0.250
1,2-Dichloroethane	107-06-2	21.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.2		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.0		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.2		1.00	0.250
1,3-Dichloropropane	142-28-9	22.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.9		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	20.7		1.00	0.250
2-Hexanone	591-78-6	21.6		10.0	2.50
2-Chlorotoluene	95-49-8	21.5		1.00	0.125
4-Chlorotoluene	106-43-4	20.6		1.00	0.250
Acetone	67-64-1	32.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	21.0		1.00	0.125
Bromochloromethane	74-97-5	21.4		1.00	0.200
Bromodichloromethane	75-27-4	21.4		0.500	0.250
Bromoform	75-25-2	18.9		1.00	0.500
Bromomethane	74-83-9	23.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.1		1.00	0.500
Carbon tetrachloride	56-23-5	20.4		1.00	0.250
Chlorobenzene	108-90-7	21.4		0.500	0.125
Chloroethane	75-00-3	22.3		1.00	0.500
Chloroform	67-66-3	29.1		0.300	0.125
Chloromethane	74-87-3	21.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	29.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.4		0.500	0.250
Dibromochloromethane	124-48-1	21.1		0.500	0.250
Dibromomethane	74-95-3	21.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.7		1.00	0.250
Ethylbenzene	100-41-4	22.0		1.00	0.250
Hexachlorobutadiene	87-68-3	19.4		0.600	0.250
Isopropylbenzene	98-82-8	22.6		1.00	0.250
Methylene chloride	75-09-2	20.9		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	23.8		5.00	0.500
MEK (2-Butanone)	78-93-3	22.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.8		10.0	2.50
n-Butylbenzene	104-51-8	21.5		1.00	0.250
n-Propylbenzene	103-65-1	22.5		1.00	0.125
m-,p-Xylene	179601-23-1	45.4		2.00	0.500
Naphthalene	91-20-3	24.2		1.00	0.200
o-Xylene	95-47-6	22.8		1.00	0.250
p-Isopropyltoluene	99-87-6	20.8		1.00	0.250
sec-Butylbenzene	135-98-8	20.5		1.00	0.250
Styrene	100-42-5	21.7		1.00	0.125
Trichloroethene	79-01-6	26.4		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	27.1		1.00	0.250
Toluene	108-88-3	21.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	22.1		1.00	0.500
Trichlorofluoromethane	75-69-4	18.7		1.00	0.250
Vinyl chloride	75-01-4	23.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Sample #:	L17100636-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-208A-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 15:39
Collect Date:	10/07/2017 14:10	**Dilution:**	1	**File ID:**	11M22406
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.3		1.00	0.250
1,1-Dichloroethane	75-34-3	20.4		1.00	0.125
1,1-Dichloroethene	75-35-4	20.5		1.00	0.500
1,1-Dichloropropene	563-58-6	21.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.1		1.00	0.250
1,2-Dichloroethane	107-06-2	20.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.6		2.00	1.00
1,2-Dichloropropane	78-87-5	21.5		1.00	0.200
1,2-Dibromoethane	106-93-4	21.6		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.7		1.00	0.250
1,3-Dichloropropane	142-28-9	22.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.7		0.500	0.125
1-Chlorohexane	544-10-5	19.9		1.00	0.125
2,2-Dichloropropane	594-20-7	19.8		1.00	0.250
2-Hexanone	591-78-6	21.2		10.0	2.50
2-Chlorotoluene	95-49-8	21.0		1.00	0.125
4-Chlorotoluene	106-43-4	20.9		1.00	0.250
Acetone	67-64-1	33.0		10.0	2.50
Benzene	71-43-2	20.8		0.400	0.125
Bromobenzene	108-86-1	20.2		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	22.0		1.00	0.500
Carbon disulfide	75-15-0	17.7		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.1		1.00	0.250
Chlorobenzene	108-90-7	20.5		0.500	0.125
Chloroethane	75-00-3	21.2		1.00	0.500
Chloroform	67-66-3	24.8		0.300	0.125
Chloromethane	74-87-3	20.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	30.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.7		0.500	0.250
Dibromochloromethane	124-48-1	20.6		0.500	0.250
Dibromomethane	74-95-3	20.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.0		1.00	0.250
Ethylbenzene	100-41-4	20.7		1.00	0.250
Hexachlorobutadiene	87-68-3	19.3		0.600	0.250
Isopropylbenzene	98-82-8	21.6		1.00	0.250
Methylene chloride	75-09-2	19.9		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	23.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.9		10.0	2.50
n-Butylbenzene	104-51-8	21.1		1.00	0.250
n-Propylbenzene	103-65-1	22.1		1.00	0.125
m-,p-Xylene	179601-23-1	43.7		2.00	0.500
Naphthalene	91-20-3	23.7		1.00	0.200
o-Xylene	95-47-6	22.1		1.00	0.250
p-Isopropyltoluene	99-87-6	20.8		1.00	0.250
sec-Butylbenzene	135-98-8	20.4		1.00	0.250
Styrene	100-42-5	20.9		1.00	0.125
Trichloroethene	79-01-6	26.7		1.00	0.250
tert-Butylbenzene	98-06-6	20.0		1.00	0.250
Tetrachloroethene	127-18-4	26.9		1.00	0.250
Toluene	108-88-3	20.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.5		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.4		1.00	0.500
Trichlorofluoromethane	75-69-4	18.3		1.00	0.250
Vinyl chloride	75-01-4	22.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): CPD
Date: 10/12/17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
CPD	10/12/17	CPD	10/13/17
Time On	Temp On °C	Time Off	Temp Off °C
1505	22.3	0812	22.7

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A												
B					CPD	10/13/17						
C												
✓ D	10-0704-01	✓	10	10	1311	FI-283	S	100		✓	25.01	500
✓ E	10-0750-01	✓	10	10	〃	〃	〃	〃		✓	25.01	500
F												
G												
H												
I												
J												
K												
L					CPD	10/13/17						
M												
N												
O												
P												
Q												
R												
S												
NA	FBIK1	NA	NA	NA	1311	FI-283	NA	NA	NA	NA	40	40
					CPD	10/13/17						

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By: [signature]

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19216	WG618910-01 BFB 50ng 8260	NA	1	1	STD82467	06/22/17 11:03
11M19217	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 11:27
11M19218	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 12:03
11M19219	WG618912-01 5ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 12:32
11M19220	WG618912-02 20ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:02
11M19221	WG618912-03 50ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:31
11M19222	WG618912-04 100ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:01
11M19223	WG618912-05 200ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:31
11M19224	WG618912-06 300ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:59
11M19225	WG618912-07 400ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:29
11M19226	WG618912-08 500ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:58
11M19227	RINSE	NA	1	1		06/22/17 16:27
11M19228	WG618912-09 100ug/L ICV/ALT 826-A9	NA	1	1	STD82415	06/22/17 16:57
11M19229	WG618911-01 BLANK 8260	NA	1	1		06/22/17 17:27
11M19230	WG618911-02 20ug/L LCS 8260	NA	1	1	STD82448	06/22/17 17:56
11M19231	WG618911-03 20ug/L LCS2 8260	NA	1	1	STD82448	06/22/17 18:26
11M19232	L17061104-01 A 826-BETX	<2	1	1		06/22/17 18:55
11M19233	L17061103-12 A TB 826-SPE	<2	1	1		06/22/17 19:25
11M19234	L17061103-01 A 826-SPE	<2	1	1		06/22/17 19:54
11M19235	L17061103-03 A 826-SPE	<2	1	1		06/22/17 20:23
11M19236	L17061103-05 A 826-SPE	<2	1	1		06/22/17 20:53
11M19237	L17061103-07 A 826-SPE	<2	1	1		06/22/17 21:22
11M19238	L17061103-09 A 826-SPE	<2	1	1		06/22/17 21:51
11M19239	L17061103-11 A 826-SPE	<2	1	1		06/22/17 22:20
11M19240	RINSE	NA	1	1		06/22/17 22:49
11M19241	WG618911-04 BLANK2 624	NA	2	1		06/22/17 23:18
11M19242	L17061150-01 A 624	<2	2	1		06/22/17 23:48
11M19243	L17061154-01 A 624-SPE	7	2	1		06/23/17 00:17
11M19244	L17061152-01 A 624-SPE2	6	2	1		06/23/17 00:46
11M19245	CCV	NA	2	1		06/23/17 01:15
11M19246	RINSE	NA	2	1		06/23/17 01:45
11M19247	RINSE	NA	2	1		06/23/17 02:14

Approved: June 23, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X		Check Standard Failure	
File ID: 11M19217				
WG618910-02 CCV multiple cmpds. failed low. RR				

Approved: June 23, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0

Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: STD82448

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG619415(ICAL), WG619505, WG619576

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19368	WG619415-01 BFB 50ng 8260	NA	7	1	STD82467	06/27/17 06:47
11M19369	RINSE	NA	7	1	STD82561	06/27/17 07:12
11M19370	WG619415-02 0.5ug/kg STD 8260	NA	7	1	STD82561	06/27/17 07:41
11M19371	WG619415-03 1.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 08:10
11M19372	WG619415-04 2.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 08:40
11M19373	WG619415-05 5.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 09:09
11M19374	WG619415-06 20.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 09:38
11M19375	WG619415-07 50.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 10:08
11M19376	WG619415-08 100.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 10:37
11M19377	WG619415-09 200.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 11:06
11M19378	WG619415-10 300.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 11:36
11M19379	RINSE	NA	7	1		06/27/17 12:05
11M19380	WG619415-11 50.0ug/kg ALTSRC 8260	NA	7	1	STD82561	06/27/17 12:34
11M19381	RINSE	NA	7	1		06/27/17 13:03
11M19382	WG619505-01 BLK 8260	NA	7	1		06/27/17 13:33
11M19383	WG619505-02 20ug/kg LCS 8260	NA	7	1	STD82448	06/27/17 14:02
11M19384	WG619505-03 20ug/kg LCSDUP 8260	NA	7	1	STD82448	06/27/17 14:31
11M19385	L17061243-07 A 8260	NA	7	1		06/27/17 15:00
11M19386	L17061243-08 A 8260	NA	7	1		06/27/17 15:29
11M19387	L17061243-09 A 8260	NA	7	1		06/27/17 15:59
11M19388	L17061243-10 A 8260	NA	7	1		06/27/17 16:28
11M19389	L17061243-11 A 8260	NA	7	1		06/27/17 16:57
11M19390	L17061243-12 A 8260	NA	7	1		06/27/17 17:26
11M19391	L17061243-13 A 8260	NA	7	1		06/27/17 17:55
11M19392	L17061243-14 A 8260	NA	7	1		06/27/17 18:24
11M19394	WG619575-01 50ng BFB	NA	7	1	STD824678	06/27/17 19:14
11M19395	WG619575-02 50ug/kg CCV 8260	NA	7	1	STD82561	06/27/17 19:39
11M19396	WG619575-02	NA	7	1		06/27/17 20:08
11M19397	RINSE	NA	7	1		06/27/17 20:38
11M19398	WG619576-01 BLANK 8260	NA	7	1		06/27/17 21:07
11M19399	WG619576-02 20ug/kg LCS 8260	NA	7	1	STD82448	06/27/17 21:35
11M19400	L17061218-09 A MS 8260	NA	7	1	STD82448	06/27/17 22:05
11M19401	L17061218-10 A MSD 8260	NA	7	1	STD82448	06/27/17 22:34
11M19402	L17061243-15 A 8260	NA	7	1		06/27/17 23:03

Approved: June 29, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0

Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: STD82448

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG619415(ICAL), WG619505, WG619576

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19403	L17061243-16 A 8260	NA	7	1		06/27/17 23:33
11M19404	L17061243-17 A 8260	NA	7	1		06/28/17 00:02
11M19405	L17061243-18 A 8260	NA	7	1		06/28/17 00:31
11M19406	L17061243-19 A 8260	NA	7	1		06/28/17 01:01
11M19407	L17061243-20 A 8260	NA	7	1		06/28/17 01:30
11M19408	L17061243-21 A 8260	NA	7	1		06/28/17 01:59
11M19409	L17061243-22 A 8260	NA	7	1		06/28/17 02:29
11M19410	L17061218-08 A RS 8260	NA	7	1		06/28/17 02:59
11M19411	L17061218-01 A 8260	NA	7	1		06/28/17 03:29
11M19412	L17061218-02 A 8260	NA	7	1		06/28/17 03:59
11M19413	L17061218-03 A 8260	NA	7	1		06/28/17 04:29
11M19414	L17061218-04 A 8260	NA	7	1		06/28/17 04:59
11M19415	L17061218-05 A 8260	NA	7	1		06/28/17 05:29
11M19416	L17061218-06 A 8260	NA	7	1		06/28/17 05:58
11M19417	L17061218-07 A 8260	NA	7	1		06/28/17 06:28
11M19418	L17061218-11 A 8260	NA	7	1		06/28/17 06:58
11M19419	RINSE	NA	7	1		06/28/17 07:28

Comments

Seq.	Rerun	Dil.	Reason	Analytes
41	X	5	Over Calibration Range	TCE
File ID: 11M19409				
L17061243-22				

Approved: June 29, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 082417
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01/OVAP MSV Rev: 25/0
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1

Maintenance Log ID:

Internal Standard: STD83390 Surrogate Standard: STD83391
CCV: STD83554 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG627119 (ICAL) WG627121

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M20992	WG627119-01 50ng BFB STD 8260	NA	1	1	STD83478	08/24/17 14:57
11M20993	RINSE	NA	7	1		08/24/17 15:23
11M20994	WG627119-02 5ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 15:52
11M20995	WG627119-03 20ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 16:21
11M20996	WG627119-04 50ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 16:51
11M20997	WG627119-05 100ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 17:21
11M20998	WG627119-06 200ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 17:50
11M20999	WG627119-07 300ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 18:19
11M21000	WG627119-08 400ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 18:49
11M21001	WG627119-09 500ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 19:18
11M21002	RINSE	NA	7	1		08/24/17 19:47
11M21003	WG627119-10 100ug/kG ICV 826-A9	NA	7	1	STD83193	08/24/17 20:17
11M21004	RINSE	NA	7	1		08/24/17 20:46
11M21005	WG627121-01 BLANK 826-A9	NA	7	1		08/24/17 21:15
11M21006	L17070002-01 Xug/kg LOD A9	NA	7	1	STD83193	08/24/17 21:44
11M21007	L17070004-01 Xug/kg LOQ A9	NA	7	1	STD83193	08/24/17 22:14
11M21008	L17070002-01 25ug/kg LOD A9	NA	7	1	STD83193	08/24/17 22:44
11M21009	L17070004-01 50ug/kg LOQ A9	NA	7	1	STD83193	08/24/17 23:13
11M21010	RINSE	NA	7	1		08/24/17 23:43
11M21011	RINSE	NA	7	1		08/25/17 00:13
11M21012	RINSE	NA	7	1		08/25/17 00:43

Approved: September 04, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
Not needed, DNR.				
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
L17100420-01				

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22279	WG633647-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 10:07
11M22280	RINSE	NA	1	1		10/12/17 11:10
11M22281	RINSE	NA	1	1		10/12/17 11:40
11M22282	WG633647-02 .3ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 12:10
11M22283	WG633647-03 .4ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:05
11M22284	WG633647-04 1ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:34
11M22285	WG633647-05 2ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:04
11M22286	WG633647-06 5ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:47
11M22287	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 15:17
11M22288	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:01
11M22289	WG633647-08 50ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:30
11M22290	WG633647-09 100ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:00
11M22291	WG633647-10 200ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:29
11M22292	WG633647-11 300ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:59
11M22293	RINSE	NA	1	1		10/12/17 18:28
11M22294	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 18:57
11M22295	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 19:54
11M22296	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 20:07
11M22297	WG633790-02 50ug/L CCV 8260	NA	1	1	STD84376	10/12/17 20:33
11M22298	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 21:02
11M22299	WG000000-01 100ug/L CCV 8260	NA	1	1	STD00000	10/12/17 21:56
11M22300	WG633791-01 BLANK 8260	NA	1	1		10/12/17 22:26
11M22301	WG633791-02 20ug/L LCS 8260	NA	1	1	STD84357	10/12/17 22:55
11M22302	WG633791-03 20ug/L LCS2 8260	NA	1	1	STD84357	10/12/17 23:25
11M22303	RINSE	NA	1	1		10/12/17 23:55
11M22304	L17100636-03 A 826-SPE	NA	1	1		10/13/17 00:24
11M22305	L17100636-04 A 826-SPE	NA	1	1		10/13/17 00:54
11M22306	L17100636-06 A 826-SPE	NA	1	1		10/13/17 01:24
11M22307	L17100636-07 A 826-SPE	NA	1	1		10/13/17 01:54
11M22308	L17100636-08 A 826-SPE	NA	1	1		10/13/17 02:24
11M22309	L17100636-09 A 826-SPE	NA	1	1		10/13/17 02:53
11M22310	L17100532-15 A 826-SPE	NA	1	1		10/13/17 03:23
11M22311	L17100636-13 A 826-SPE	NA	1	1		10/13/17 03:52
11M22312	L17100636-14 A 826-SPE	NA	1	1		10/13/17 04:21

Approved: October 16, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22313	L17100532-14 A 826-SPE	NA	1	1		10/13/17 04:51
11M22314	L17100532-16 A 826-SPE	NA	1	1		10/13/17 05:20
11M22315	L17100532-18 A 826-SPE	NA	1	1		10/13/17 05:50
11M22316	L17100532-19 A 826-SPE	NA	1	1		10/13/17 06:20
11M22317	L17100532-17 A 826-SPE	NA	1	1		10/13/17 06:50
11M22318	L17100755-02 A 100X 8260	NA	12	100		10/13/17 07:20
11M22319	L17100755-17 A 1000X 8260	NA	12	1000		10/13/17 07:49
11M22320	RINSE	NA	2	1		10/13/17 08:19
11M22321	WG633791-04 BLANK2 624	NA	2	1		10/13/17 08:49

Approved: October 16, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101417
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633791

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22363	WG633980-01 50ng BFB 8260	NA	1	1	STD84001	10/14/17 14:18
11M22364	WG633980-02 50ug/L CCV 8260	NA	1	1	STD84376	10/14/17 14:42
11M22365	WG000000-01 100ug/L CCV 8260	NA	1	1	STD00000	10/14/17 15:11
11M22366	WG633791-01 BLANK 8260	NA	1	1		10/14/17 15:40
11M22367	WG633791-02 20ug/L LCS 8260	NA	1	1	STD84357	10/14/17 16:10
11M22368	L17100636-11 A MS 826-SPE	<2	1	1	STD84357	10/14/17 16:39
11M22369	L17100636-12 A MSD 826-SPE	<2	1	1	STD84357	10/14/17 17:09
11M22370	L17100634-02 B D1 5X 826-BETX	<2	1	5		10/14/17 17:38
11M22371	L17100636-10 A REF 826-SPE	<2	1	1		10/14/17 18:08
11M22372	L17100636-18 A 826-SPE	<2	1	1		10/14/17 18:37
11M22373	L17100636-21 A 826-SPE	<2	1	1		10/14/17 19:07
11M22374	L17100636-20 A 826-SPE	<2	1	1		10/14/17 19:36
11M22375	L17100636-23 A 826-SPE	<2	1	1		10/14/17 20:05
11M22376	L17100636-28 A 826-SPE	<2	1	1		10/14/17 20:35
11M22377	L17100636-16 A 826-SPE	<2	1	1		10/14/17 21:05
11M22378	L17100636-30 A 826-SPE	<2	1	1		10/14/17 21:34
11M22379	L17100636-22 A 826-SPE	<2	1	1		10/14/17 22:04
11M22380	L17100636-27 A 826-SPE	<2	1	1		10/14/17 22:34
11M22381	L17100636-17 A 826-SPE	<2	1	1		10/14/17 23:04
11M22382	L17100636-29 A 826-SPE	<2	1	1		10/14/17 23:33
11M22383	L17100636-31 A 826-SPE	<2	1	1		10/15/17 00:03
11M22384	L17100636-14 B 826-SPE	<2	1	1		10/15/17 00:33
11M22385	L17100636-15 A 826-SPE	<2	1	1		10/15/17 01:02
11M22386	L17100755-02 10,000X 8260	NA	12	10000		10/15/17 01:32
11M22387	L17100755-17 10,000X 8260	NA	12	10000		10/15/17 02:02
11M22388	CCV	NA	1	1		10/15/17 02:32
11M22389	RINSE	NA	1	1		10/15/17 03:02
11M22390	RINSE	NA	1	1		10/15/17 03:32

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2				
File ID: 11M22364				

Approved: October 16, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101417
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633791

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			WG633980-02 CCV failed low for VA	
24	X	1000000	Over Calibration Range	benz, tetrahydra.
File ID: 11M22386				
			L17100755-02 sample had one low failing surr. OOH by 1.5 days	
25	X	1000	Analyzed too dilute	
File ID: 11M22387				
			L17100755-17 OOH by 1.5 days	

Approved: October 16, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150723	WG634167-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 06:51
6M150724	WG634167-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 07:18
6M150725	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 07:47
6M150726	WG634168-01 BLK 1017 STD 8260	NA	1	1		10/17/17 08:16
6M150727	L17100636-24 A RS 826-SPE	<2	1	1		10/17/17 08:45
6M150728	WG634168-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 09:15
6M150729	L17100636-25 A MS 826-SPE	<2	1	1	STD84357	10/17/17 09:44
6M150730	L17100636-26 A MSD 826-SPE	<2	1	1	STD84357	10/17/17 10:13
6M150731	L17100545-17 B 10X 826-SPE	<2	1	10		10/17/17 10:43
6M150732	L17100545-15 B 10X D1 826-SPE	<2	1	10		10/17/17 11:12
6M150733	L17100545-14 B 10X D1 826-SPE	<2	1	10		10/17/17 11:42
6M150734	L17100545-13 B 25X D1 826-SPE	<2	1	25		10/17/17 12:12
6M150735	L17100636-01 B 826-SPE	<2	1	1		10/17/17 12:41
6M150736	L17100636-02 B 826-SPE	<2	1	1		10/17/17 13:11
6M150737	L17100636-03 C 826-SPE	<2	1	1		10/17/17 13:39
6M150738	L17100636-04 C 826-SPE	<2	1	1		10/17/17 14:09
6M150739	L17100636-06 C 826-SPE	<2	1	1		10/17/17 14:38
6M150740	L17100636-07 C 826-SPE	<2	1	1		10/17/17 15:08
6M150741	L17100636-08 C 826-SPE	<2	1	1		10/17/17 15:37
6M150742	L17100636-09 C 826-SPE	<2	1	1		10/17/17 16:07
6M150743	L17100636-13 C 826-SPE	<2	1	1		10/17/17 16:37
6M150744	L17100514-20 C 826-SPE	<2	1	1		10/17/17 17:06
6M150745	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 17:55
6M150746	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 18:20
6M150748	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 19:20
6M150749	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 20:09
6M150750	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 20:44
6M150751	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 21:09
6M150752	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 21:41
6M150753	WG634400-01 BLK 1017 STD 8260	NA	1	1		10/17/17 22:11
6M150754	WG634400-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 22:40
6M150755	WG634400-03 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 23:09
6M150756	L17100545-17 B D1 100X 826-SPE	<2	1	100		10/17/17 23:39
6M150757	L17100704-01 10X AF 826-TC	NA	17	10		10/18/17 00:08

Approved: October 18, 2017
Sarah Vandenberg

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150758	L17100636-01 C 826-SPE	<2	1	1		10/18/17 00:38
6M150759	L17100636-02 C 826-SPE	<2	1	1		10/18/17 01:07
6M150760	L17100709-16 C 826-SPE	<2	1	1		10/18/17 01:36
6M150761	L17100709-15 C 826-SPE	<2	1	1		10/18/17 02:06
6M150762	L17100709-17 A 826-SPE	<2	1	1		10/18/17 02:35
6M150763	L17100709-18 A 826-SPE	<2	1	1		10/18/17 03:05
6M150764	L17100545-18 A 10X 826-SPE	<2	1	10		10/18/17 03:34
6M150765	L17100545-19 A 10X 826-SPE D1	<2	1	10		10/18/17 04:03
6M150766	L17100545-20 A 10X 826-SPE	<2	1	10		10/18/17 04:33
6M150767	L17100545-21 A 10X 826-SPE D1	<2	1	10		10/18/17 05:02
6M150768	L17100545-22 A 10X 826-SPE	<2	1	10		10/18/17 05:31
6M150769	L17100637-05 A 826-SPE	<2	1	1		10/18/17 06:00
6M150770	L17100637-06 A 826-SPE	<2	1	1		10/18/17 06:30
6M150771	CCV	NA	1	1		10/18/17 06:59
6M150772	RINSE	NA	1	1		10/18/17 07:28
6M150773	RINSE	NA	1	1		10/18/17 07:57
6M150774	WG633712-02 FBLK 826-TC	NA	17	10		10/18/17 08:26

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 6M150725				
Not needed, DNR.				
9	X	100	Over Calibration Range	BENZENE
File ID: 6M150731				
L17100545-17				
13	X	1	Carry-over contamination	
File ID: 6M150735				
14-DCB carry over, DNR.				
14	X	1	Carry-over contamination	
File ID: 6M150736				
14-DCB carry over, DNR.				
29				
File ID: 6M150752				

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			Not needed, DNR.	
41	X	1	Analyzed too dilute	
File ID: 6M150764				
	L17100545-18			
42	X	1	Analyzed too dilute	
File ID: 6M150765				
	L17100545-19 D1			
43	X	1	Analyzed too dilute	
File ID: 6M150766				
	L17100545-20			
44	X	2	Analyzed too dilute	
File ID: 6M150767				
	L17100545-21 D1			
45	X	50	Over Calibration Range	1,4-dioxane
File ID: 6M150768				
	L17100545-22			
46	X	1	Carry-over contamination	
File ID: 6M150769				
	L17100637-05 has possible 1,4-dioxane carry over.			

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101717
Analyst1: HRF Analyst2: ADC
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634316 WG634377

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22399	WG634315-01 50ng BFB 8260	NA	1	1	STD84001	10/17/17 12:35
11M22400	WG634315-01 50ng BFB 8260	NA	1	1	STD84001	10/17/17 12:46
11M22401	WG634315-02 50ug/L CCV 8260	NA	1	1	STD84376	10/17/17 13:10
11M22402	WG634314-01 100ug/L CCV A9 8260	NA	1	1	STD00000	10/17/17 13:41
11M22403	WG634316-01 BLANK 8260	NA	1	1		10/17/17 14:11
11M22404	WG634316-02 20ug/L LCS 8260	NA	1	1	STD84357	10/17/17 14:40
11M22405	L17100636-41 A 20ug/L MS 826-SPE	NA	1	1	STD84357	10/17/17 15:09
11M22406	L17100636-42 A 20ug/L MSD 826-SPE	NA	1	1	STD84357	10/17/17 15:39
11M22407	L17100840-03 A 826-SPE3	<2	1	1		10/17/17 16:09
11M22408	L17100840-02 A 826-SPE3	<2	1	1		10/17/17 16:38
11M22409	L17100840-01 A 826-SPE3	<2	1	1		10/17/17 17:08
11M22410	L17100636-32 A 826-SPE	<2	1	1		10/17/17 17:37
11M22411	L17100636-33 A 826-SPE	<2	1	1		10/17/17 18:06
11M22412	L17100636-34 A 826-SPE	<2	1	1		10/17/17 18:35
11M22413	L17100636-35 A 826-SPE	<2	1	1		10/17/17 19:04
11M22414	L17100636-36 A 826-SPE	<2	1	1		10/17/17 19:33
11M22415	L17100636-37 A 826-SPE	<2	1	1		10/17/17 20:03
11M22416	L17100636-38 A 826-SPE	<2	1	1		10/17/17 20:33
11M22417	L17100636-39 A 826-SPE	<2	1	1		10/17/17 21:02
11M22418	L17100636-40 A REF 826-SPE	NA	1	1		10/17/17 21:31
11M22419	L17100637-01 A 826-SPE	<2	1	1		10/17/17 22:00
11M22420	L17100637-02 A 826-SPE	<2	1	1		10/17/17 22:29
11M22421	L17100637-03 A 826-SPE	<2	1	1		10/17/17 22:58
11M22422	L17100755-17 C 1000X 8260	<2	12	1000		10/17/17 23:28
11M22423	L17100755-02 C 1000000X D2 8260	<2	12	1000000		10/17/17 23:57
11M22424	WG634377-01 LCS 624-SPE	NA	2	1	STD84357	10/18/17 00:26
11M22425	WG634377-02 LCS2 624-SPE	NA	2	1	STD84357	10/18/17 00:55
11M22426	RINSE W/AF	NA	1	1		10/18/17 01:24
11M22427	WG634377-03 BLANK 624-SPE	NA	2	1		10/18/17 01:53
11M22428	L17101048-02 A 624-SPE	5	2	1		10/18/17 02:22
11M22430	L17101048-01 A 624-SPE	6	2	1		10/18/17 02:51
11M22431	L17100791-01 B 5X W/AF 624-SPE	<2	2	5		10/18/17 03:20
11M22432	L17101049-01 A 624-SPE	<2	2	1		10/18/17 03:49
11M22433	L17100945-01 A 624-SPE	7	2	1		10/18/17 04:17

Approved: October 19, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101717
Analyst1: HRF Analyst2: ADC
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634316 WG634377

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22434	L17100945-02 A 624-SPE	7	2	1		10/18/17 04:46
11M22435	L17100945-03 A 624-SPE	7	2	1		10/18/17 05:15
11M22436	L17100945-04 A 624-SPE	7	2	1		10/18/17 05:44
11M22437	L17101064-01 A 624-SPE	<2	2	1		10/18/17 06:13
11M22438	L17101064-02 A 624-SPE	<2	2	1		10/18/17 06:42
11M22439	L17101064-03 A 624-SPE	<2	2	1		10/18/17 07:11
11M22440	L17101064-04 A 624-SPE	<2	2	1		10/18/17 07:40
11M22441	L17101064-05 A 624-SPE	<2	2	1		10/18/17 08:09
11M22442	L17101064-06 A 624-SPE	<2	2	1		10/18/17 08:38
11M22443	L17101064-07 A 624-SPE	<2	2	1		10/18/17 09:06
11M22444	CCV	NA	2	1		10/18/17 09:36
11M22445	RINSE	NA	2	1		10/18/17 10:05

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 11M22399				
WG634315-01 RERUN BFB				
24				
File ID: 11M22422				
L17100755-17 OUT OF HOLD				
25	X	10000000	Over Calibration Range	TETRAHYDROFURAN
File ID: 11M22423				
L17100755-02 OUT OF HOLD, RERUN AT 10,000,000X				

Approved: October 19, 2017

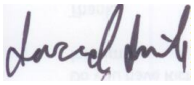
Microbac Laboratories Inc.

Data Checklist

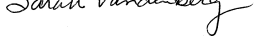
Date: 22-JUN-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 82939
Analytical Workgroups: WG618911

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
23-JUN-2017



Secondary Reviewer:
23-JUN-2017



CHECKLIST1 - Modified 03/05/2008
Generated: JUN-23-2017 13:08:29

Microbac Laboratories Inc.

Data Checklist

Date: 27-JUN-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: WG619415
Runlog ID: 83047
Analytical Workgroups: WG619505, WG619576

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-JUN-2017

Secondary Reviewer:
29-JUN-2017

CHECKLIST1 - Modified 03/05/2008
Generated: JUN-29-2017 09:22:06

Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

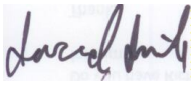
Microbac Laboratories Inc.

Data Checklist

Date: 24-AUG-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 84200
Analytical Workgroups: WG627119 (ICAL) WG627121

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	NA
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
26-AUG-2017



Secondary Reviewer:
04-SEP-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-20-2017 12:21:02

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017

Secondary Reviewer:
11-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

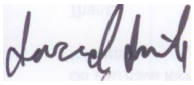
Microbac Laboratories Inc.

Data Checklist

Date: 12-OCT-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85262
Analytical Workgroups: WG633647

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
14-OCT-2017



Secondary Reviewer:
16-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-16-2017 11:32:33

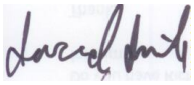
Microbac Laboratories Inc.

Data Checklist

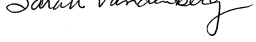
Date: 14-OCT-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85281
Analytical Workgroups: WG633791

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
16-OCT-2017



Secondary Reviewer:
16-OCT-2017



CHECKLIST1 - Modified 03/05/2008
Generated: OCT-16-2017 17:04:26

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85330
Analytical Workgroups: WG634168; WG634400

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017
Tiffany Bailey

Secondary Reviewer:
18-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-18-2017 13:12:44

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85335
Analytical Workgroups: WG634316 WG634377

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
19-OCT-2017

Cathy Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-19-2017 13:44:17

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG633791

Login Number: L17100636

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-219-LA-26	10	10/07/17					10/14/2017	7.3	14		10/14/17	7.3	14	
MW-219-LA-26-MS	11	10/07/17					10/14/2017	7.2	14		10/14/17	7.2	14	
MW-219-LA-26-MSD	12	10/07/17					10/14/2017	7.2	14		10/14/17	7.2	14	
MW-85-LA-26	14	10/07/17					10/15/2017	7.5	14		10/15/17	7.5	14	
MW-197A-LA-26	15	10/07/17					10/15/2017	7.6	14		10/15/17	7.6	14	
DR2-4-LA-26	16	10/07/17					10/14/2017	7.4	14		10/14/17	7.4	14	
PMW-85-01-LA-26	17	10/07/17					10/14/2017	7.5	14		10/14/17	7.5	14	
MW-266-LA-26	18	10/07/17					10/14/2017	7.2	14		10/14/17	7.2	14	
MW-204A-LA-26	20	10/07/17					10/14/2017	7.3	14		10/14/17	7.3	14	
MW-88-LA-26	21	10/07/17					10/14/2017	7.2	14		10/14/17	7.2	14	
DR2-2-LA-26	22	10/07/17					10/14/2017	7.4	14		10/14/17	7.4	14	
MW-92-LA-26	23	10/07/17					10/14/2017	7.1	14		10/14/17	7.1	14	
MW-113-LA	27	10/07/17					10/14/2017	7.3	14		10/14/17	7.3	14	
PMW92-02-LA-26	28	10/07/17					10/14/2017	7.2	14		10/14/17	7.2	14	
MW-64-LA-26	29	10/08/17					10/14/2017	6.6	14		10/14/17	6.6	14	
MW-217-LA-26	30	10/08/17					10/14/2017	6.5	14		10/14/17	6.5	14	
MW-26-LA-26	31	10/08/17					10/15/2017	6.6	14		10/15/17	6.6	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5529616
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634168

Login Number: L17100636

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-205A-LA-26	03	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-205B-LA-26	04	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-210B-LA-26	06	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-197B-LA-26	07	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-210A-LA-26	08	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
PMW21-05-LA-26	09	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
PMW-85-05-LA-26	13	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	
PMW92-03-LA-26	24	10/07/17					10/17/2017	9.7	14		10/17/17	9.7	14	
PMW92-03-LA-26-MS	25	10/07/17					10/17/2017	9.7	14		10/17/17	9.7	14	
PMW92-03-LA-26-MSD	26	10/07/17					10/17/2017	9.8	14		10/17/17	9.8	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5529616
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634316

Login Number: L17100636

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DUP-4-LA-26	32	10/08/17					10/17/2017	9.4	14		10/17/17	9.4	14	
MW-209B-LA-26	33	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	
MW-200-LA-26	34	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	
MW-94A-LA-26	35	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	
DUP-5-LA-26	36	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	
MW-207B-LA-26	37	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
MW-208B-LA-26	38	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-206A-LA-26	39	10/07/17					10/17/2017	10.2	14		10/17/17	10.2	14	
MW-208A-LA-26	40	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
MW-208A-LA-26-MS	41	10/07/17					10/17/2017	10	14		10/17/17	10	14	
MW-208A-LA-26-MSD	42	10/07/17					10/17/2017	10.1	14		10/17/17	10.1	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5529616
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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634400

Login Number: L17100636

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
LTM-RB1-LA-26	01	10/09/17					10/18/2017	8.3	14		10/18/17	8.3	14	
MW-204B-LA-26	02	10/07/17					10/18/2017	10.6	14		10/18/17	10.6	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5529616
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100636
Instrument Id: HPMS6
Workgroup (AAB#): WG634400

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100636-01	1.00	02	97.2	98.3	101	98.0
L17100636-02	1.00	02	98.4	98.8	102	98.8
WG634400-01	1.00	01	97.3	98.8	102	99.3
WG634400-02	1.00	01	96.9	97.8	101	97.9
WG634400-03	1.00	01	98.3	98.9	100	96.8

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5529639
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100636 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-09-OCT-17
Workgroup (AAB#): WG634168 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17100636-03	1.00	02	101	100	101	99.3
L17100636-04	1.00	02	98.9	99.6	101	99.2
L17100636-06	1.00	02	100	100	102	99.5
L17100636-07	1.00	02	102	101	100	98.8
L17100636-08	1.00	02	101	99.7	100	99.3
L17100636-09	1.00	02	101	100	101	99.3
L17100636-13	1.00	02	101	101	100	99.7
L17100636-24	1.00	01	98.6	98.9	101	98.9
L17100636-25	1.00	01	98.8	98.8	100	96.2
L17100636-26	1.00	01	97.1	98.6	99.7	97.3
WG634168-01	1.00	01	100	99.0	102	98.6
WG634168-02	1.00	01	99.8	99.5	101	98.0

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5529639
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100636 **Method:** 8260
Instrument Id: HPMS11 **CAL ID:** HPMS11-12-OCT-17
Workgroup (AAB#): WG634316 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17100636-32	1.00	01	102	104	104	106
L17100636-33	1.00	01	104	105	110	105
L17100636-34	1.00	01	104	104	110	107
L17100636-35	1.00	01	103	104	112	107
L17100636-36	1.00	01	101	106	107	105
L17100636-37	1.00	01	101	104	103	105
L17100636-38	1.00	01	104	103	107	105
L17100636-39	1.00	01	103	106	112	107
L17100636-40	1.00	01	104	106	114	107
L17100636-41	1.00	01	101	104	102	104
L17100636-42	1.00	01	104	107	106	105
WG634316-01	1.00	01	105	107	112	107
WG634316-02	1.00	01	101	105	106	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5529639
Report generated: 10/19/2017 16:26

Login Number: L17100636
Instrument Id: HPMS11
Workgroup (AAB#): WG633791

Method: 8260
CAL ID: HPMS11-12-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100636-10	1.00	01	103	102	114	103
L17100636-11	1.00	01	98.6	98.5	104	102
L17100636-12	1.00	01	100	99.1	105	102
L17100636-14	1.00	01	102	104	103	104
L17100636-15	1.00	01	103	104	106	101
L17100636-16	1.00	01	101	103	107	104
L17100636-17	1.00	01	97.8	99.5	107	103
L17100636-18	1.00	01	100	99.7	105	105
L17100636-20	1.00	01	102	101	110	107
L17100636-21	1.00	01	103	105	106	105
L17100636-22	1.00	01	103	105	109	105
L17100636-23	1.00	01	101	101	109	102
L17100636-27	1.00	01	102	102	108	105
L17100636-28	1.00	01	99.9	102	114	104
L17100636-29	1.00	01	102	102	104	104
L17100636-30	1.00	01	103	102	113	107
L17100636-31	1.00	01	102	102	101	103
WG633791-01	1.00	01	98.6	98.7	102	103
WG633791-02	1.00	01	103	103	103	104

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5529639
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100636
Work Group: WG633791
Blank File ID: 11M22366
Blank Sample ID: WG633791-01
Prep Date: 10/14/17 15:40
Instrument ID: HPMS11
Analyzed Date: 10/14/17 15:40
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633791-02	11M22367	10/14/17 16:10	01
MW-219-LA-26-MS	L17100636-11	11M22368	10/14/17 16:39	01
MW-219-LA-26-MSD	L17100636-12	11M22369	10/14/17 17:09	01
MW-219-LA-26	L17100636-10	11M22371	10/14/17 18:08	01
MW-266-LA-26	L17100636-18	11M22372	10/14/17 18:37	01
MW-88-LA-26	L17100636-21	11M22373	10/14/17 19:07	01
MW-204A-LA-26	L17100636-20	11M22374	10/14/17 19:36	01
MW-92-LA-26	L17100636-23	11M22375	10/14/17 20:05	01
PMW92-02-LA-26	L17100636-28	11M22376	10/14/17 20:35	01
DR2-4-LA-26	L17100636-16	11M22377	10/14/17 21:05	01
MW-217-LA-26	L17100636-30	11M22378	10/14/17 21:34	01
DR2-2-LA-26	L17100636-22	11M22379	10/14/17 22:04	01
MW-113-LA	L17100636-27	11M22380	10/14/17 22:34	01
PMW-85-01-LA-26	L17100636-17	11M22381	10/14/17 23:04	01
MW-64-LA-26	L17100636-29	11M22382	10/14/17 23:33	01
MW-26-LA-26	L17100636-31	11M22383	10/15/17 00:03	01
MW-85-LA-26	L17100636-14	11M22384	10/15/17 00:33	01
MW-197A-LA-26	L17100636-15	11M22385	10/15/17 01:02	01

Report Name: BLANK_SUMMARY
PDF File ID: 5529760
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100636
Blank File ID: 11M22403
Prep Date: 10/17/17 14:11
Analyzed Date: 10/17/17 14:11
Analyst: ADC

Work Group: WG634316
Blank Sample ID: WG634316-01
Instrument ID: HPMS11
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634316-02	11M22404	10/17/17 14:40	01
MW-208A-LA-26-MS	L17100636-41	11M22405	10/17/17 15:09	01
MW-208A-LA-26-MSD	L17100636-42	11M22406	10/17/17 15:39	01
DUP-4-LA-26	L17100636-32	11M22410	10/17/17 17:37	01
MW-209B-LA-26	L17100636-33	11M22411	10/17/17 18:06	01
MW-200-LA-26	L17100636-34	11M22412	10/17/17 18:35	01
MW-94A-LA-26	L17100636-35	11M22413	10/17/17 19:04	01
DUP-5-LA-26	L17100636-36	11M22414	10/17/17 19:33	01
MW-207B-LA-26	L17100636-37	11M22415	10/17/17 20:03	01
MW-208B-LA-26	L17100636-38	11M22416	10/17/17 20:33	01
MW-206A-LA-26	L17100636-39	11M22417	10/17/17 21:02	01
MW-208A-LA-26	L17100636-40	11M22418	10/17/17 21:31	01

Report Name: BLANK_SUMMARY
PDF File ID: 5529760
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100636
Work Group: WG634168
Blank File ID: 6M150726
Blank Sample ID: WG634168-01
Prep Date: 10/17/17 08:16
Instrument ID: HPMS6
Analyzed Date: 10/17/17 08:16
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
PMW92-03-LA-26	L17100636-24	6M150727	10/17/17 08:45	01
LCS	WG634168-02	6M150728	10/17/17 09:15	01
PMW92-03-LA-26-MS	L17100636-25	6M150729	10/17/17 09:44	01
PMW92-03-LA-26-MSD	L17100636-26	6M150730	10/17/17 10:13	01
MW-205A-LA-26	L17100636-03	6M150737	10/17/17 13:39	02
MW-205B-LA-26	L17100636-04	6M150738	10/17/17 14:09	02
MW-210B-LA-26	L17100636-06	6M150739	10/17/17 14:38	02
MW-197B-LA-26	L17100636-07	6M150740	10/17/17 15:08	02
MW-210A-LA-26	L17100636-08	6M150741	10/17/17 15:37	02
PMW21-05-LA-26	L17100636-09	6M150742	10/17/17 16:07	02
PMW-85-05-LA-26	L17100636-13	6M150743	10/17/17 16:37	02

Report Name: BLANK_SUMMARY
PDF File ID: 5529760
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100636	Work Group:	WG634400
Blank File ID:	6M150753	Blank Sample ID:	WG634400-01
Prep Date:	10/17/17 22:11	Instrument ID:	HPMS6
Analyzed Date:	10/17/17 22:11	Method:	8260B
Analyst:	JDS		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634400-02	6M150754	10/17/17 22:40	01
LCS2	WG634400-03	6M150755	10/17/17 23:09	01
LTM-RB1-LA-26	L17100636-01	6M150758	10/18/17 00:38	02
MW-204B-LA-26	L17100636-02	6M150759	10/18/17 01:07	02

Report Name: BLANK_SUMMARY
PDF File ID: 5529760
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/14/17 15:40 Sample ID:WG633791-01
Instrument ID:HPMS11 Run Date:10/14/17 15:40 Prep Method:5030B/5030C/503
File ID:11M22366 Analyst:JDS Method:8260B
Workgroup (AAB#):WG633791 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5529617
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/14/17 15:40 Sample ID:WG633791-01
Instrument ID:HPMS11 Run Date:10/14/17 15:40 Prep Method:5030B/5030C/503
File ID:11M22366 Analyst:JDS Method:8260B
Workgroup (AAB#):WG633791 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	98.7	85	-	115	PASS
1,2-Dichloroethane-d4	98.6	72	-	119	PASS
Toluene-d8	103	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5529617
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/17/17 14:11 Sample ID:WG634316-01
Instrument ID:HPMS11 Run Date:10/17/17 14:11 Prep Method:5030B/5030C/503
File ID:11M22403 Analyst:ADC Method:8260B
Workgroup (AAB#):WG634316 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-27-JUN-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/17/17 14:11 Sample ID:WG634316-01
Instrument ID:HPMS11 Run Date:10/17/17 14:11 Prep Method:5030B/5030C/503
File ID:11M22403 Analyst:ADC Method:8260B
Workgroup (AAB#):WG634316 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-27-JUN-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	107	85	-	115	PASS
1,2-Dichloroethane-d4	105	72	-	119	PASS
Toluene-d8	107	81	-	120	PASS
4-Bromofluorobenzene	112	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5529617
19-OCT-2017 16:26

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/17/17 08:16 Sample ID:WG634168-01
Instrument ID:HPMS6 Run Date:10/17/17 08:16 Prep Method:5030B/5030C/503
File ID:6M150726 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634168 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100636 Prep Date: 10/17/17 08:16 Sample ID: WG634168-01
Instrument ID: HPMS6 Run Date: 10/17/17 08:16 Prep Method: 5030B/5030C/503
File ID: 6M150726 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	99.0	85	-	115	PASS
1,2-Dichloroethane-d4	100	72	-	119	PASS
Toluene-d8	98.6	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5529617
19-OCT-2017 16:26

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100636 Prep Date:10/17/17 22:11 Sample ID:WG634400-01
Instrument ID:HPMS6 Run Date:10/17/17 22:11 Prep Method:5030B/5030C/503
File ID:6M150753 Analyst:JDS Method:8260B
Workgroup (AAB#):WG634400 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5529617
19-OCT-2017 16:26

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100636 Prep Date: 10/17/17 22:11 Sample ID: WG634400-01
Instrument ID: HPMS6 Run Date: 10/17/17 22:11 Prep Method: 5030B/5030C/503
File ID: 6M150753 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG634400 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	98.8	85	-	115	PASS
1,2-Dichloroethane-d4	97.3	72	-	119	PASS
Toluene-d8	99.3	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5529617
19-OCT-2017 16:26

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number:L17100636 Run Date:10/14/2017 Sample ID:WG633791-02
Instrument ID:HPMS11 Run Time:16:10 Prep Method:5030B/5030C/503
File ID:11M22367 Analyst:JDS Method:8260B
Workgroup (AAB#):WG633791 Matrix:Water Units:ug/L
QC Key:AF40 Lot#:STD84357 Cal ID:HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	21.4	107	81 - 129	
1,1,1-Trichloroethane	20.0	22.4	112	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	22.5	113	63 - 128	
1,1,2-Trichloroethane	20.0	22.6	113	75 - 125	
1,1-Dichloroethane	20.0	22.1	110	69 - 133	
1,1-Dichloroethene	20.0	22.7	114	68 - 130	
1,1-Dichloropropene	20.0	23.4	117	73 - 132	
1,2,3-Trichlorobenzene	20.0	23.0	115	67 - 137	
1,2,3-Trichloropropane	20.0	22.9	114	73 - 124	
1,2,4-Trichlorobenzene	20.0	23.3	117	66 - 134	
1,2,4-Trimethylbenzene	20.0	22.9	115	74 - 132	
1,2-Dichloroethane	20.0	22.1	110	69 - 132	
1,2-Dichlorobenzene	20.0	22.6	113	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.9	109	50 - 132	
1,2-Dichloropropane	20.0	23.0	115	75 - 125	
1,2-Dibromoethane	20.0	22.4	112	80 - 121	
1,3,5-Trimethylbenzene	20.0	23.7	118	74 - 131	
1,3-Dichlorobenzene	20.0	22.2	111	75 - 124	
1,3-Dichloropropane	20.0	22.9	114	73 - 126	
1,4-Dichlorobenzene	20.0	21.8	109	74 - 123	
1,4-Dioxane	200	235	118	60 - 140	
1-Chlorohexane	20.0	23.2	116	70 - 125	
2,2-Dichloropropane	20.0	21.2	106	69 - 137	
2-Hexanone	20.0	22.1	110	55 - 130	
2-Chlorotoluene	20.0	22.1	111	73 - 126	
4-Chlorotoluene	20.0	22.9	115	74 - 128	
Acetone	20.0	22.2	111	40 - 135	
Benzene	20.0	22.6	113	81 - 122	
Bromobenzene	20.0	22.1	111	76 - 124	
Bromochloromethane	20.0	22.7	113	65 - 129	
Bromodichloromethane	20.0	22.0	110	76 - 121	
Bromoform	20.0	18.3	91.5	69 - 128	
Bromomethane	20.0	21.4	107	30 - 141	
Carbon disulfide	20.0	19.7	98.4	58 - 128	
Carbon tetrachloride	20.0	22.4	112	66 - 138	
Chlorobenzene	20.0	21.8	109	81 - 122	
Chloroethane	20.0	23.3	117	58 - 133	
Chloroform	20.0	22.2	111	69 - 128	
Chloromethane	20.0	24.5	122	56 - 131	
cis-1,2-Dichloroethene	20.0	21.9	109	72 - 126	
cis-1,3-Dichloropropene	20.0	25.0	125	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5530423
Report generated: 10/19/2017 16:26

Login Number: L17100636 Run Date: 10/14/2017 Sample ID: WG633791-02
Instrument ID: HPMS11 Run Time: 16:10 Prep Method: 5030B/5030C/503
File ID: 11M22367 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG633791 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	21.3	107	66 - 133	
Dibromomethane	20.0	22.0	110	76 - 125	
Dichlorodifluoromethane	20.0	25.1	125	30 - 153	
Ethylbenzene	20.0	22.5	112	73 - 127	
Hexachlorobutadiene	20.0	21.1	106	67 - 131	
Isopropylbenzene	20.0	23.7	118	75 - 127	
Methylene chloride	20.0	21.1	106	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	21.5	107	65 - 123	
MEK (2-Butanone)	20.0	22.2	111	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.3	107	58 - 134	
n-Butylbenzene	20.0	23.2	116	69 - 137	
n-Propylbenzene	20.0	24.3	121	72 - 129	
m-,p-Xylene	40.0	46.9	117	76 - 128	
Naphthalene	20.0	24.4	122	54 - 138	
o-Xylene	20.0	24.0	120	80 - 121	
p-Isopropyltoluene	20.0	22.6	113	73 - 130	
sec-Butylbenzene	20.0	22.8	114	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	21.2	106	70 - 127	
tert-Butylbenzene	20.0	23.0	115	70 - 129	
Tetrachloroethene	20.0	21.9	110	66 - 128	
Toluene	20.0	22.4	112	77 - 122	
trans-1,2-Dichloroethene	20.0	22.4	112	63 - 137	
trans-1,3-Dichloropropene	20.0	22.4	112	59 - 135	
Trichlorofluoromethane	20.0	21.3	107	57 - 129	
Vinyl chloride	20.0	22.3	111	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	103	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5530423
Report generated: 10/19/2017 16:26

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634316-02
Instrument ID: HPMS11 Run Time: 14:40 Prep Method: 5030B/5030C/503
File ID: 11M22404 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG634316 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84356 Cal ID: HPMS11-27-JUN-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.9	99.3	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	21.1	105	75 - 125	
1,1-Dichloroethane	20.0	19.9	99.3	69 - 133	
1,1-Dichloroethene	20.0	20.3	101	68 - 130	
1,1-Dichloropropene	20.0	21.2	106	73 - 132	
1,2,3-Trichlorobenzene	20.0	22.7	114	67 - 137	
1,2,3-Trichloropropane	20.0	21.9	109	73 - 124	
1,2,4-Trichlorobenzene	20.0	22.6	113	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.6	108	74 - 132	
1,2-Dichloroethane	20.0	20.2	101	69 - 132	
1,2-Dichlorobenzene	20.0	22.0	110	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.9	110	50 - 132	
1,2-Dichloropropane	20.0	21.0	105	75 - 125	
1,2-Dibromoethane	20.0	20.9	104	80 - 121	
1,3,5-Trimethylbenzene	20.0	22.0	110	74 - 131	
1,3-Dichlorobenzene	20.0	21.1	105	75 - 124	
1,3-Dichloropropane	20.0	22.0	110	73 - 126	
1,4-Dichlorobenzene	20.0	20.7	104	74 - 123	
2,2-Dichloropropane	20.0	19.5	97.7	69 - 137	
2-Chlorotoluene	20.0	21.3	107	73 - 126	
4-Chlorotoluene	20.0	20.2	101	74 - 128	
Benzene	20.0	20.4	102	81 - 122	
Bromobenzene	20.0	20.4	102	76 - 124	
Bromochloromethane	20.0	20.9	104	65 - 129	
Bromodichloromethane	20.0	20.2	101	76 - 121	
Bromoform	20.0	18.1	90.5	69 - 128	
Carbon tetrachloride	20.0	19.9	99.7	66 - 138	
Chlorobenzene	20.0	20.3	102	81 - 122	
Chloroform	20.0	20.3	101	69 - 128	
cis-1,2-Dichloroethene	20.0	20.2	101	72 - 126	
cis-1,3-Dichloropropene	20.0	23.1	115	69 - 131	
Dibromochloromethane	20.0	20.2	101	66 - 133	
Dibromomethane	20.0	20.8	104	76 - 125	
Ethylbenzene	20.0	21.0	105	73 - 127	
Hexachlorobutadiene	20.0	20.1	100	67 - 131	
Isopropylbenzene	20.0	22.2	111	75 - 127	
Methylene chloride	20.0	19.9	99.3	63 - 137	
n-Butylbenzene	20.0	21.6	108	69 - 137	
n-Propylbenzene	20.0	22.5	112	72 - 129	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634316-02
Instrument ID: HPMS11 Run Time: 14:40 Prep Method: 5030B/5030C/503
File ID: 11M22404 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG634316 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84356 Cal ID: HPMS11-27-JUN-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
m-,p-Xylene	40.0	43.5	109	76 - 128	
Naphthalene	20.0	23.6	118	54 - 138	
o-Xylene	20.0	21.8	109	80 - 121	
p-Isopropyltoluene	20.0	21.3	106	73 - 130	
sec-Butylbenzene	20.0	21.0	105	72 - 127	
Styrene	20.0	20.8	104	65 - 134	
Trichloroethene	20.0	18.9	94.6	70 - 127	
tert-Butylbenzene	20.0	21.1	105	70 - 129	
Tetrachloroethene	20.0	20.8	104	66 - 128	
Toluene	20.0	20.7	103	77 - 122	
trans-1,2-Dichloroethene	20.0	19.8	99.1	63 - 137	
trans-1,3-Dichloropropene	20.0	21.3	106	59 - 135	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	105	85 - 115	PASS
1,2-Dichloroethane-d4	101	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5530423
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634168-02
Instrument ID: HPMS6 Run Time: 09:15 Prep Method: 5030B/5030C/503
File ID: 6M150728 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.1	101	81 - 129	
1,1,1-Trichloroethane	20.0	21.0	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.3	96.5	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	21.5	108	68 - 130	
1,1-Dichloropropene	20.0	21.6	108	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.8	93.9	67 - 137	
1,2,3-Trichloropropane	20.0	20.2	101	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.4	97.0	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.5	102	74 - 132	
1,2-Dichloroethane	20.0	21.1	106	69 - 132	
1,2-Dichlorobenzene	20.0	19.6	97.9	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.5	102	50 - 132	
1,2-Dichloropropane	20.0	20.9	105	75 - 125	
1,2-Dibromoethane	20.0	20.4	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.0	105	74 - 131	
1,3-Dichlorobenzene	20.0	19.7	98.5	75 - 124	
1,3-Dichloropropane	20.0	20.9	105	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	94.2	74 - 123	
1,4-Dioxane	200	133	66.6	60 - 140	
1-Chlorohexane	20.0	20.0	99.9	70 - 125	
2,2-Dichloropropane	20.0	19.9	99.7	69 - 137	
2-Hexanone	20.0	19.7	98.3	55 - 130	
2-Chlorotoluene	20.0	21.0	105	73 - 126	
4-Chlorotoluene	20.0	19.3	96.5	74 - 128	
Acetone	20.0	21.7	108	40 - 135	
Benzene	20.0	20.5	103	81 - 122	
Bromobenzene	20.0	19.7	98.7	76 - 124	
Bromochloromethane	20.0	21.1	105	65 - 129	
Bromodichloromethane	20.0	20.4	102	76 - 121	
Bromoform	20.0	19.1	95.5	69 - 128	
Bromomethane	20.0	17.0	84.9	30 - 141	
Carbon disulfide	20.0	17.6	88.0	58 - 128	
Carbon tetrachloride	20.0	20.9	105	66 - 138	
Chlorobenzene	20.0	20.0	100	81 - 122	
Chloroethane	20.0	23.3	116	58 - 133	
Chloroform	20.0	20.3	101	69 - 128	
Chloromethane	20.0	23.6	118	56 - 131	
cis-1,2-Dichloroethene	20.0	21.1	105	72 - 126	
cis-1,3-Dichloropropene	20.0	23.0	115	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5530423
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634168-02
Instrument ID: HPMS6 Run Time: 09:15 Prep Method: 5030B/5030C/503
File ID: 6M150728 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634168 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.8	99.0	66 - 133	
Dibromomethane	20.0	21.3	107	76 - 125	
Dichlorodifluoromethane	20.0	24.4	122	30 - 153	
Ethylbenzene	20.0	20.5	102	73 - 127	
Hexachlorobutadiene	20.0	17.3	86.4	67 - 131	
Isopropylbenzene	20.0	20.2	101	75 - 127	
Methylene chloride	20.0	19.9	99.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.1	100	65 - 123	
MEK (2-Butanone)	20.0	20.6	103	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.9	99.6	58 - 134	
n-Butylbenzene	20.0	19.5	97.7	69 - 137	
n-Propylbenzene	20.0	21.2	106	72 - 129	
m-,p-Xylene	40.0	41.0	103	76 - 128	
Naphthalene	20.0	20.4	102	54 - 138	
o-Xylene	20.0	21.1	106	80 - 121	
p-Isopropyltoluene	20.0	20.2	101	73 - 130	
sec-Butylbenzene	20.0	19.8	99.0	72 - 127	
Styrene	20.0	21.7	109	65 - 134	
Trichloroethene	20.0	21.1	105	70 - 127	
tert-Butylbenzene	20.0	20.1	101	70 - 129	
Tetrachloroethene	20.0	19.6	97.9	66 - 128	
Toluene	20.0	20.3	102	77 - 122	
trans-1,2-Dichloroethene	20.0	21.1	105	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	103	59 - 135	
Trichlorofluoromethane	20.0	21.2	106	57 - 129	
Vinyl chloride	20.0	26.1	130	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.5	85 - 115	PASS
1,2-Dichloroethane-d4	99.8	72 - 119	PASS
Toluene-d8	98.0	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5530423
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100636 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634400 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634400-02 LCS File ID: 6M150754 Run Date: 10/17/2017 22:40
Sample ID: WG634400-03 LCS2 File ID: 6M150755 Run Date: 10/17/2017 23:09

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.8	104	20.0	20.2	101	2.59	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.8	109	20.0	21.3	106	2.32	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.3	96.6	20.0	19.1	95.6	1.03	63 - 128	20	
1,1,2-Trichloroethane	20.0	20.1	101	20.0	19.7	98.4	2.28	75 - 125	20	
1,1-Dichloroethane	20.0	20.7	103	20.0	20.2	101	2.51	69 - 133	20	
1,1-Dichloroethene	20.0	21.6	108	20.0	21.5	107	0.652	68 - 130	20	
1,1-Dichloropropene	20.0	22.3	111	20.0	21.9	110	1.70	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.8	99.0	20.0	19.2	95.9	3.13	67 - 137	20	
1,2,3-Trichloropropane	20.0	20.2	101	20.0	19.7	98.4	2.75	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	20.2	101	20.0	19.7	98.5	2.74	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	21.5	107	20.0	20.7	104	3.56	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.3	20.0	19.3	96.4	0.0234	50 - 132	20	
1,2-Dibromoethane	20.0	20.7	104	20.0	20.3	102	1.89	80 - 121	20	
1,2-Dichlorobenzene	20.0	20.5	102	20.0	19.6	97.9	4.55	71 - 122	20	
1,2-Dichloroethane	20.0	21.2	106	20.0	20.9	105	1.34	69 - 132	20	
1,2-Dichloropropane	20.0	21.4	107	20.0	21.1	106	1.37	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	22.1	110	20.0	21.3	106	3.67	74 - 131	20	
1,3-Dichlorobenzene	20.0	20.6	103	20.0	19.7	98.3	4.61	75 - 124	20	
1,3-Dichloropropane	20.0	21.3	107	20.0	21.1	105	1.19	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.7	98.3	20.0	18.8	93.9	4.63	74 - 123	20	
1,4-Dioxane	200	177	88.7	200	196	97.9	9.86	60 - 140	20	
1-Chlorohexane	20.0	21.8	109	20.0	21.5	107	1.39	70 - 125	20	
2,2-Dichloropropane	20.0	19.7	98.6	20.0	19.2	96.0	2.66	69 - 137	20	
MEK (2-Butanone)	20.0	20.7	103	20.0	21.2	106	2.48	49 - 136	20	
2-Chlorotoluene	20.0	21.6	108	20.0	21.0	105	2.40	73 - 126	20	
2-Hexanone	20.0	19.5	97.7	20.0	20.0	99.8	2.09	55 - 130	20	
4-Chlorotoluene	20.0	21.0	105	20.0	19.8	98.9	5.92	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.6	98.2	20.0	20.3	102	3.46	58 - 134	20	
Acetone	20.0	20.8	104	20.0	21.1	106	1.47	40 - 135	20	
Benzene	20.0	21.1	106	20.0	20.8	104	1.67	81 - 122	20	
Bromobenzene	20.0	20.5	103	20.0	19.9	99.7	2.93	76 - 124	20	
Bromochloromethane	20.0	21.2	106	20.0	20.6	103	3.27	65 - 129	20	
Bromodichloromethane	20.0	20.8	104	20.0	20.4	102	1.99	76 - 121	20	
Bromoform	20.0	19.2	96.0	20.0	18.9	94.6	1.48	69 - 128	20	
Bromomethane	20.0	17.2	86.2	20.0	16.6	82.9	3.89	30 - 141	20	
Carbon disulfide	20.0	18.8	94.1	20.0	18.7	93.5	0.631	58 - 128	20	
Carbon tetrachloride	20.0	21.5	108	20.0	21.2	106	1.29	66 - 138	20	
Chlorobenzene	20.0	20.6	103	20.0	20.2	101	2.32	81 - 122	20	
Chloroethane	20.0	24.2	121	20.0	24.3	121	0.244	58 - 133	20	
Chloroform	20.0	20.8	104	20.0	20.5	102	1.45	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5529619
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100636 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634400 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634400-02 LCS File ID: 6M150754 Run Date: 10/17/2017 22:40
Sample ID: WG634400-03 LCS2 File ID: 6M150755 Run Date: 10/17/2017 23:09

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	23.9	120	20.0	25.1	126	4.78	56 - 131	20	
cis-1,2-Dichloroethene	20.0	21.6	108	20.0	21.3	107	1.52	72 - 126	20	
cis-1,3-Dichloropropene	20.0	23.5	117	20.0	22.8	114	2.69	69 - 131	20	
Dibromochloromethane	20.0	20.2	101	20.0	19.6	98.0	3.15	66 - 133	20	
Dibromomethane	20.0	21.6	108	20.0	21.1	105	2.35	76 - 125	20	
Dichlorodifluoromethane	20.0	28.3	142	20.0	28.2	141	0.569	30 - 153	20	
Ethylbenzene	20.0	21.3	106	20.0	21.0	105	1.26	73 - 127	20	
Hexachlorobutadiene	20.0	19.4	97.2	20.0	18.7	93.3	4.15	67 - 131	20	
Isopropylbenzene	20.0	21.5	107	20.0	20.9	104	2.84	75 - 127	20	
m-,p-Xylene	40.0	42.7	107	40.0	41.7	104	2.33	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.3	102	20.0	20.4	102	0.463	65 - 123	20	
Methylene chloride	20.0	20.4	102	20.0	20.1	100	1.78	63 - 137	20	
n-Butylbenzene	20.0	21.2	106	20.0	20.4	102	3.91	69 - 137	20	
n-Propylbenzene	20.0	22.5	113	20.0	21.7	109	3.50	72 - 129	20	
Naphthalene	20.0	20.7	103	20.0	20.2	101	2.16	54 - 138	20	
o-Xylene	20.0	22.1	110	20.0	21.4	107	3.06	80 - 121	20	
p-Isopropyltoluene	20.0	21.7	108	20.0	20.9	104	3.78	73 - 130	20	
sec-Butylbenzene	20.0	21.4	107	20.0	20.8	104	2.42	72 - 127	20	
Styrene	20.0	22.4	112	20.0	21.9	109	2.31	65 - 134	20	
tert-Butylbenzene	20.0	21.9	110	20.0	21.0	105	4.15	70 - 129	20	
Tetrachloroethene	20.0	20.7	104	20.0	20.3	102	2.11	66 - 128	20	
Toluene	20.0	21.1	106	20.0	20.6	103	2.43	77 - 122	20	
trans-1,2-Dichloroethene	20.0	21.7	108	20.0	21.4	107	1.13	63 - 137	20	
trans-1,3-Dichloropropene	20.0	20.8	104	20.0	20.1	101	3.35	59 - 135	20	
Trichloroethene	20.0	21.3	107	20.0	21.1	106	1.03	70 - 127	20	
Trichlorofluoromethane	20.0	21.8	109	20.0	21.8	109	0.402	57 - 129	20	
Vinyl chloride	20.0	26.0	130	20.0	26.0	130	0.109	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	96.9	98.3	72 - 119	PASS
Dibromofluoromethane	97.8	98.9	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	97.9	96.8	81 - 120	PASS

* EXCEEDS %REC LIMIT

EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS11- 12-OCT-17 Worknum: WG633791

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-10 File ID: 11M22371 Dil: 1 Method: 5035A

Sample ID: L17100636-11 MS File ID: 11M22368 Dil: 1 Matrix: 8260B

Sample ID: L17100636-12 MSD File ID: 11M22369 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.2	101	20.0	21.2	106	4.93	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.4	96.9	20.0	21.1	106	8.53	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.9	105	20.0	22.7	113	8.13	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	21.0	105	20.0	22.8	114	8.13	75 - 125	20	
1,1-Dichloroethane	U	20.0	20.1	100	20.0	21.0	105	4.66	69 - 133	20	
1,1-Dichloroethene	U	20.0	19.8	98.9	20.0	21.4	107	7.85	68 - 130	20	
1,1-Dichloropropene	U	20.0	20.6	103	20.0	22.5	112	8.85	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.9	109	20.0	23.7	118	7.99	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	21.3	107	20.0	23.1	115	7.77	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	22.2	111	20.0	24.1	120	7.94	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	21.5	107	20.0	22.9	115	6.57	74 - 132	20	
1,2-Dichloroethane	1.06	20.0	20.9	99	20.0	22.7	108	8.46	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	21.7	109	20.0	22.7	114	4.34	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	20.7	104	20.0	22.6	113	8.67	50 - 132	20	
1,2-Dichloropropane	U	20.0	21.0	105	20.0	22.1	111	5.02	75 - 125	20	
1,2-Dibromoethane	U	20.0	21.3	106	20.0	22.4	112	4.90	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	22.0	110	20.0	23.6	118	6.75	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.6	103	20.0	22.6	113	8.98	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.8	109	20.0	22.8	114	4.37	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.2	101	20.0	21.9	110	8.11	74 - 123	20	
1,4-Dioxane	U	200	219	109	200	231	115	5.49	60 - 140	20	
1-Chlorohexane	U	20.0	20.9	105	20.0	22.5	113	7.29	70 - 125	20	
2,2-Dichloropropane	U	20.0	19.5	97.6	20.0	20.8	104	6.57	69 - 137	20	
2-Hexanone	U	20.0	20.4	102	20.0	22.2	111	8.31	55 - 130	20	
2-Chlorotoluene	U	20.0	20.6	103	20.0	22.3	112	7.94	73 - 126	20	
4-Chlorotoluene	U	20.0	21.5	108	20.0	22.9	115	6.36	74 - 128	20	
Acetone	5.15	20.0	26.1	105	20.0	28.4	116	8.57	40 - 135	20	
Benzene	U	20.0	20.3	101	20.0	21.6	108	6.23	81 - 122	20	
Bromobenzene	U	20.0	20.5	102	20.0	21.8	109	6.10	76 - 124	20	
Bromochloromethane	U	20.0	20.2	101	20.0	22.1	110	8.78	65 - 129	20	
Bromodichloromethane	U	20.0	20.1	101	20.0	21.6	108	7.03	76 - 121	20	
Bromoform	U	20.0	17.7	88.7	20.0	18.4	91.8	3.45	69 - 128	20	
Bromomethane	U	20.0	19.9	99.5	20.0	21.4	107	7.16	30 - 141	20	
Carbon disulfide	U	20.0	18.0	89.8	20.0	19.1	95.4	6.08	58 - 128	20	
Carbon tetrachloride	U	20.0	19.6	97.9	20.0	21.2	106	7.85	66 - 138	20	
Chlorobenzene	U	20.0	20.3	101	20.0	21.6	108	6.31	81 - 122	20	
Chloroethane	U	20.0	22.0	110	20.0	22.8	114	3.52	58 - 133	20	
Chloroform	U	20.0	20.0	99.8	20.0	21.3	107	6.51	69 - 128	20	
Chloromethane	U	20.0	21.9	109	20.0	22.9	114	4.49	56 - 131	20	
cis-1,2-Dichloroethene	5.78	20.0	24.9	95.7	20.0	26.9	106	7.62	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.8	114	20.0	24.5	123	7.39	69 - 131	20	

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS11 12-OCT-17 Worknum: WG633791

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-10 File ID: 11M22371 Dil: 1 Method: 5035A

Sample ID: L17100636-11 MS File ID: 11M22368 Dil: 1 Matrix: 8260B

Sample ID: L17100636-12 MSD File ID: 11M22369 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	20.1	100	20.0	21.7	109	7.95	66 - 133	20	
Dibromomethane	U	20.0	20.1	101	20.0	21.8	109	7.85	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.2	111	20.0	23.0	115	3.81	30 - 153	20	
Ethylbenzene	U	20.0	20.8	104	20.0	22.0	110	5.86	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.4	102	20.0	20.9	105	2.66	67 - 131	20	
Isopropylbenzene	U	20.0	21.8	109	20.0	22.8	114	4.45	75 - 127	20	
Methylene chloride	U	20.0	19.3	96.4	20.0	20.6	103	6.36	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.4	102	20.0	21.4	107	4.83	65 - 123	20	
MEK (2-Butanone)	U	20.0	20.9	104	20.0	22.4	112	6.94	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.3	96.7	20.0	20.0	99.8	3.18	58 - 134	20	
n-Butylbenzene	U	20.0	22.0	110	20.0	23.7	119	7.73	69 - 137	20	
n-Propylbenzene	U	20.0	22.5	113	20.0	24.2	121	7.22	72 - 129	20	
m-,p-Xylene	U	40.0	43.7	109	40.0	46.5	116	6.23	76 - 128	20	
Naphthalene	U	20.0	23.7	118	20.0	25.1	126	5.95	54 - 138	20	
o-Xylene	U	20.0	22.3	112	20.0	23.2	116	3.92	80 - 121	20	
p-Isopropyltoluene	U	20.0	21.3	106	20.0	22.8	114	6.96	73 - 130	20	
sec-Butylbenzene	U	20.0	20.8	104	20.0	22.4	112	7.32	72 - 127	20	
Styrene	U	20.0	20.8	104	20.0	21.9	110	5.51	65 - 134	20	
Trichloroethene	6.40	20.0	24.7	91.3	20.0	25.7	96.6	4.25	70 - 127	20	
tert-Butylbenzene	U	20.0	20.5	102	20.0	22.4	112	8.71	70 - 129	20	
Tetrachloroethene	113	20.0	115	9.3	20.0	120	35.6	4.49	66 - 128	20	*
Toluene	U	20.0	20.6	103	20.0	22.0	110	6.51	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.9	99.3	20.0	21.7	109	8.94	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	21.9	109	4.92	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.1	95.3	20.0	20.5	102	7.16	57 - 129	20	
Vinyl chloride	U	20.0	20.2	101	20.0	20.5	102	1.10	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS6- 09-OCT-17 Worknum: WG634168

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-24 File ID: 6M150727 Dil: 1 Method: 5035A

Sample ID: L17100636-25 MS File ID: 6M150729 Dil: 1 Matrix: 8260B

Sample ID: L17100636-26 MSD File ID: 6M150730 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.4	102	20.0	20.1	100	1.57	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.9	104	20.0	20.6	103	1.49	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.3	102	20.0	19.7	98.7	2.76	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	20.3	101	20.0	20.1	101	0.554	75 - 125	20	
1,1-Dichloroethane	U	20.0	20.0	100	20.0	19.9	99.4	0.657	69 - 133	20	
1,1-Dichloroethene	U	20.0	21.1	106	20.0	20.6	103	2.30	68 - 130	20	
1,1-Dichloropropene	U	20.0	21.3	107	20.0	20.7	104	2.66	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.5	97.6	20.0	19.3	96.4	1.20	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.6	103	20.0	20.4	102	0.656	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	19.9	99.3	20.0	19.9	99.3	0.0396	66 - 134	20	
1,2,4-Trimethylbenzene	0.328	20.0	21.0	103	20.0	20.8	102	0.880	74 - 132	20	
1,2-Dichloroethane	U	20.0	21.4	107	20.0	21.1	106	1.16	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.2	101	20.0	19.8	99	1.92	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	21.4	107	20.0	21.0	105	1.78	50 - 132	20	
1,2-Dichloropropane	U	20.0	21.5	107	20.0	21.1	106	1.64	75 - 125	20	
1,2-Dibromoethane	U	20.0	21.1	105	20.0	20.8	104	1.23	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	21.2	106	20.0	21.1	105	0.676	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.8	99.2	20.0	19.7	98.7	0.475	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.3	107	20.0	21.3	106	0.179	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.1	95.4	20.0	19.0	95	0.504	74 - 123	20	
1,4-Dioxane	U	200	193	96.4	200	188	94.1	2.42	60 - 140	20	
1-Chlorohexane	U	20.0	19.3	96.6	20.0	20.0	100	3.46	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.2	101	20.0	19.6	97.8	3.06	69 - 137	20	
2-Hexanone	7.37	20.0	27.8	102	20.0	28.4	105	2.00	55 - 130	20	
2-Chlorotoluene	U	20.0	18.4	92.1	20.0	20.7	103	11.5	73 - 126	20	
4-Chlorotoluene	U	20.0	22.4	112	20.0	19.6	98.2	13.2	74 - 128	20	
Acetone	13.1	20.0	34.4	107	20.0	33.6	102	2.48	40 - 135	20	
Benzene	U	20.0	20.7	104	20.0	20.5	102	1.23	81 - 122	20	
Bromobenzene	U	20.0	20.1	101	20.0	19.9	99.7	0.996	76 - 124	20	
Bromochloromethane	U	20.0	21.3	106	20.0	20.9	104	1.86	65 - 129	20	
Bromodichloromethane	U	20.0	20.8	104	20.0	20.4	102	2.00	76 - 121	20	
Bromoform	U	20.0	19.5	97.7	20.0	19.4	96.8	0.920	69 - 128	20	
Bromomethane	U	20.0	16.6	82.8	20.0	16.1	80.3	3.06	30 - 141	20	
Carbon disulfide	U	20.0	17.1	85.7	20.0	17.2	85.8	0.118	58 - 128	20	
Carbon tetrachloride	U	20.0	20.8	104	20.0	20.3	101	2.43	66 - 138	20	
Chlorobenzene	U	20.0	20.0	100	20.0	20.0	99.8	0.344	81 - 122	20	
Chloroethane	U	20.0	22.3	111	20.0	22.8	114	2.45	58 - 133	20	
Chloroform	U	20.0	20.3	101	20.0	20.1	100	0.946	69 - 128	20	
Chloromethane	U	20.0	23.5	118	20.0	23.7	118	0.620	56 - 131	20	
cis-1,2-Dichloroethene	24.6	20.0	42.3	88.7	20.0	41.5	84.8	1.84	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	23.9	119	20.0	23.5	117	1.67	69 - 131	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS6 09-OCT-17 Worknum: WG634168

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-24 File ID: 6M150727 Dil: 1 Method: 5035A

Sample ID: L17100636-25 MS File ID: 6M150729 Dil: 1 Matrix: 8260B

Sample ID: L17100636-26 MSD File ID: 6M150730 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	20.3	101	20.0	19.9	99.3	2.13	66 - 133	20	
Dibromomethane	U	20.0	22.0	110	20.0	21.5	107	2.40	76 - 125	20	
Dichlorodifluoromethane	U	20.0	22.5	113	20.0	22.4	112	0.493	30 - 153	20	
Ethylbenzene	U	20.0	20.6	103	20.0	20.6	103	0.0121	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.0	85	20.0	16.9	84.7	0.352	67 - 131	20	
Isopropylbenzene	U	20.0	20.2	101	20.0	20.1	101	0.172	75 - 127	20	
Methylene chloride	0.265	20.0	20.4	101	20.0	20.3	100	0.665	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.5	102	20.0	20.3	102	0.636	65 - 123	20	
MEK (2-Butanone)	5.69	20.0	26.8	105	20.0	26.3	103	1.62	49 - 136	20	
MIBK (methyl isobutyl ketone)	6.89	20.0	27.3	102	20.0	27.0	101	0.986	58 - 134	20	
n-Butylbenzene	U	20.0	19.6	98	20.0	19.5	97.3	0.801	69 - 137	20	
n-Propylbenzene	U	20.0	21.3	107	20.0	21.1	106	1.01	72 - 129	20	
m-,p-Xylene	U	40.0	40.7	102	40.0	40.7	102	0.0802	76 - 128	20	
Naphthalene	U	20.0	21.6	108	20.0	21.4	107	1.17	54 - 138	20	
o-Xylene	U	20.0	21.3	106	20.0	21.4	107	0.394	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.3	102	20.0	20.1	100	1.13	73 - 130	20	
sec-Butylbenzene	U	20.0	19.8	98.9	20.0	19.6	98.2	0.631	72 - 127	20	
Styrene	U	20.0	21.9	109	20.0	21.8	109	0.244	65 - 134	20	
Trichloroethene	0.463	20.0	20.8	102	20.0	20.5	100	1.58	70 - 127	20	
tert-Butylbenzene	U	20.0	20.3	101	20.0	20.1	101	0.685	70 - 129	20	
Tetrachloroethene	0.535	20.0	20.0	97.3	20.0	19.9	96.6	0.746	66 - 128	20	
Toluene	2.10	20.0	21.8	98.3	20.0	21.7	98.1	0.229	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	21.1	105	20.0	20.8	104	1.18	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	21.0	105	20.0	20.6	103	1.70	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.7	98.7	20.0	19.7	98.5	0.176	57 - 129	20	
Vinyl chloride	7.76	20.0	29.9	111	20.0	29.9	111	0.224	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5535069

Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS11- 27-JUN-17 Worknum: WG634316

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-40 File ID: 11M22418 Dil: 1 Method: 5035A

Sample ID: L17100636-41 MS File ID: 11M22405 Dil: 1 Matrix: 8260B

Sample ID: L17100636-42 MSD File ID: 11M22406 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	21.0	105	20.0	19.7	98.3	6.78	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.9	105	20.0	20.5	103	2.05	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.6	108	20.0	21.5	108	0.560	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	22.4	112	20.0	21.3	107	4.86	75 - 125	20	
1,1-Dichloroethane	U	20.0	21.1	105	20.0	20.4	102	3.16	69 - 133	20	
1,1-Dichloroethene	U	20.0	21.0	105	20.0	20.5	103	2.41	68 - 130	20	
1,1-Dichloropropene	U	20.0	22.0	110	20.0	21.4	107	2.74	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	22.5	113	20.0	22.3	112	0.982	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	22.1	110	20.0	21.5	107	2.84	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	22.7	113	20.0	22.0	110	2.85	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	21.7	108	20.0	21.1	106	2.47	74 - 132	20	
1,2-Dichloroethane	U	20.0	21.2	106	20.0	20.8	104	1.79	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	22.0	110	20.0	21.9	110	0.268	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.2	111	20.0	21.6	108	2.49	50 - 132	20	
1,2-Dichloropropane	U	20.0	22.1	111	20.0	21.5	107	2.93	75 - 125	20	
1,2-Dibromoethane	U	20.0	22.5	112	20.0	21.6	108	4.06	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	22.0	110	20.0	21.7	109	1.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	21.2	106	20.0	20.7	103	2.66	75 - 124	20	
1,3-Dichloropropane	U	20.0	22.6	113	20.0	22.0	110	2.92	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.9	104	20.0	20.7	103	0.853	74 - 123	20	
2,2-Dichloropropane	U	20.0	20.7	104	20.0	19.8	98.8	4.69	69 - 137	20	
2-Chlorotoluene	U	20.0	21.5	108	20.0	21.0	105	2.23	73 - 126	20	
4-Chlorotoluene	U	20.0	20.6	103	20.0	20.9	104	1.51	74 - 128	20	
Benzene	U	20.0	21.4	107	20.0	20.8	104	2.84	81 - 122	20	
Bromobenzene	U	20.0	21.0	105	20.0	20.2	101	3.86	76 - 124	20	
Bromochloromethane	U	20.0	21.4	107	20.0	20.9	105	2.52	65 - 129	20	
Bromodichloromethane	U	20.0	21.4	107	20.0	20.8	104	2.80	76 - 121	20	
Bromoform	U	20.0	18.9	94.3	20.0	18.5	92.3	2.13	69 - 128	20	
Carbon tetrachloride	U	20.0	20.4	102	20.0	20.1	101	1.33	66 - 138	20	
Chlorobenzene	U	20.0	21.4	107	20.0	20.5	102	4.31	81 - 122	20	
Chloroform	U	20.0	29.1	146	20.0	24.8	124	16.2	69 - 128	20	*
cis-1,2-Dichloroethene	11.1	20.0	29.1	89.8	20.0	30.0	94.3	3.03	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	24.4	122	20.0	23.7	118	2.90	69 - 131	20	
Dibromochloromethane	U	20.0	21.1	106	20.0	20.6	103	2.73	66 - 133	20	
Dibromomethane	U	20.0	21.9	110	20.0	20.9	105	4.75	76 - 125	20	
Ethylbenzene	U	20.0	22.0	110	20.0	20.7	104	5.75	73 - 127	20	
Hexachlorobutadiene	U	20.0	19.4	96.8	20.0	19.3	96.3	0.453	67 - 131	20	
Isopropylbenzene	U	20.0	22.6	113	20.0	21.6	108	4.50	75 - 127	20	
Methylene chloride	U	20.0	20.9	104	20.0	19.9	99.7	4.50	63 - 137	20	
n-Butylbenzene	U	20.0	21.5	108	20.0	21.1	106	1.90	69 - 137	20	
n-Propylbenzene	U	20.0	22.5	112	20.0	22.1	111	1.52	72 - 129	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5535069

Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100636 Cal ID: HPMS11 27-JUN-17 Worknum: WG634316

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100636-40 File ID: 11M22418 Dil: 1 Method: 5035A

Sample ID: L17100636-41 MS File ID: 11M22405 Dil: 1 Matrix: 8260B

Sample ID: L17100636-42 MSD File ID: 11M22406 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
m-,p-Xylene	U	40.0	45.4	114	40.0	43.7	109	3.81	76 - 128	20	
Naphthalene	U	20.0	24.2	121	20.0	23.7	119	2.06	54 - 138	20	
o-Xylene	U	20.0	22.8	114	20.0	22.1	110	3.46	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.8	104	20.0	20.8	104	0.0887	73 - 130	20	
sec-Butylbenzene	U	20.0	20.5	102	20.0	20.4	102	0.497	72 - 127	20	
Styrene	U	20.0	21.7	108	20.0	20.9	105	3.44	65 - 134	20	
Trichloroethene	9.42	20.0	26.4	84.8	20.0	26.7	86.5	1.26	70 - 127	20	
tert-Butylbenzene	U	20.0	20.5	102	20.0	20.0	99.8	2.45	70 - 129	20	
Tetrachloroethene	10.1	20.0	27.1	84.9	20.0	26.9	83.7	0.937	66 - 128	20	
Toluene	U	20.0	21.6	108	20.0	20.6	103	4.45	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	21.1	105	20.0	20.5	102	2.88	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	22.1	111	20.0	21.4	107	3.20	59 - 135	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5535069

Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: JDS
Workgroup: WG618910

Tune ID: WG618910-01
Run Date: 06/22/2017
Run Time: 11:03
File ID: 11M19216
Cal ID: HPMS11-20-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.6	11528	PASS
75.0	95.0	30.0	60.0	50.7	31472	PASS
95.0	95.0	100	100	100	62029	PASS
96.0	95.0	5.00	9.00	6.75	4187	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	47690	PASS
175	174	5.00	9.00	7.92	3778	PASS
176	174	95.0	101	96.2	45858	PASS
177	176	5.00	9.00	6.64	3043	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG618912-01	STD	01	06/22/2017 12:32	
WG618912-02	STD	01	06/22/2017 13:02	
WG618912-03	STD	01	06/22/2017 13:31	
WG618912-04	STD-CCV	01	06/22/2017 14:01	
WG618912-05	STD	01	06/22/2017 14:31	
WG618912-06	STD	01	06/22/2017 14:59	
WG618912-07	STD	01	06/22/2017 15:29	
WG618912-08	STD	01	06/22/2017 15:58	
WG618912-09	STD	01	06/22/2017 16:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: ADC
Workgroup: WG619415

Tune ID: WG619415-01
Run Date: 06/27/2017
Run Time: 06:47
File ID: 11M19368
Cal ID: HPMS11-27-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.9	9994	PASS
75.0	95.0	30.0	60.0	51.0	26965	PASS
95.0	95.0	100	100	100	52832	PASS
96.0	95.0	5.00	9.00	6.65	3513	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	67.1	35442	PASS
175	174	5.00	9.00	8.02	2844	PASS
176	174	95.0	101	95.8	33962	PASS
177	176	5.00	9.00	7.10	2411	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG619415-02	STD-S	01	06/27/2017 07:41	
WG619415-03	STD-S	01	06/27/2017 08:10	
WG619415-04	STD-S	01	06/27/2017 08:40	
WG619415-05	STD-S	01	06/27/2017 09:09	
WG619415-06	STD-S	01	06/27/2017 09:38	
WG619415-07	STD-CCV-S	01	06/27/2017 10:08	
WG619415-08	STD-S	01	06/27/2017 10:37	
WG619415-09	STD-S	01	06/27/2017 11:06	
WG619415-10	STD-S	01	06/27/2017 11:36	
WG619415-11	SSCV-S	01	06/27/2017 12:34	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633647

Tune ID: WG633647-01
Run Date: 10/12/2017
Run Time: 10:07
File ID: 11M22279
Cal ID: HPMS11 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.1	12000	PASS
75.0	95.0	30.0	60.0	53.8	26765	PASS
95.0	95.0	100	100	100	49773	PASS
96.0	95.0	5.00	9.00	7.07	3518	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	74.3	37000	PASS
175	174	5.00	9.00	8.24	3049	PASS
176	174	95.0	101	96.2	35589	PASS
177	176	5.00	9.00	6.24	2222	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-02	STD	01	10/12/2017 12:10	
WG633647-03	STD	01	10/12/2017 13:05	
WG633647-04	STD	01	10/12/2017 13:34	
WG633647-05	STD	01	10/12/2017 14:04	
WG633647-06	STD	01	10/12/2017 14:47	
WG633647-07	STD	01	10/12/2017 16:01	
WG633647-08	STD-CCV	01	10/12/2017 16:30	
WG633647-09	STD	01	10/12/2017 17:00	
WG633647-10	STD	01	10/12/2017 17:29	
WG633647-11	STD	01	10/12/2017 17:59	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633790

Tune ID: WG633790-01
Run Date: 10/12/2017
Run Time: 20:07
File ID: 11M22296
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.2	10304	PASS
75.0	95.0	30.0	60.0	54.8	24378	PASS
95.0	95.0	100	100	100	44501	PASS
96.0	95.0	5.00	9.00	7.00	3115	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	73.8	32848	PASS
175	174	5.00	9.00	8.77	2882	PASS
176	174	95.0	101	97.7	32106	PASS
177	176	5.00	9.00	6.22	1998	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-12	SSCV	01	10/12/2017 21:02	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633980

Tune ID: WG633980-01
Run Date: 10/14/2017
Run Time: 14:18
File ID: 11M22363
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.6	10305	PASS
75.0	95.0	30.0	60.0	53.7	23386	PASS
95.0	95.0	100	100	100	43578	PASS
96.0	95.0	5.00	9.00	7.31	3187	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	72.1	31408	PASS
175	174	5.00	9.00	7.82	2457	PASS
176	174	95.0	101	95.2	29891	PASS
177	176	5.00	9.00	6.85	2048	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633980-02	CCV	01	10/14/2017 14:42	
WG633791-01	BLANK	01	10/14/2017 15:40	
WG633791-02	LCS	01	10/14/2017 16:10	
L17100636-11	MW-219-LA-26-MS	01	10/14/2017 16:39	
L17100636-12	MW-219-LA-26-MSD	01	10/14/2017 17:09	
L17100636-10	MW-219-LA-26	01	10/14/2017 18:08	
L17100636-18	MW-266-LA-26	01	10/14/2017 18:37	
L17100636-21	MW-88-LA-26	01	10/14/2017 19:07	
L17100636-20	MW-204A-LA-26	01	10/14/2017 19:36	
L17100636-23	MW-92-LA-26	01	10/14/2017 20:05	
L17100636-28	PMW92-02-LA-26	01	10/14/2017 20:35	
L17100636-16	DR2-4-LA-26	01	10/14/2017 21:05	
L17100636-30	MW-217-LA-26	01	10/14/2017 21:34	
L17100636-22	DR2-2-LA-26	01	10/14/2017 22:04	
L17100636-27	MW-113-LA	01	10/14/2017 22:34	
L17100636-17	PMW-85-01-LA-26	01	10/14/2017 23:04	
L17100636-29	MW-64-LA-26	01	10/14/2017 23:33	
L17100636-31	MW-26-LA-26	01	10/15/2017 00:03	
L17100636-14	MW-85-LA-26	01	10/15/2017 00:33	
L17100636-15	MW-197A-LA-26	01	10/15/2017 01:02	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS11
Analyst: ADC
Workgroup: WG634315

Tune ID: WG634315-01
Run Date: 10/17/2017
Run Time: 12:46
File ID: 11M22400
Cal ID: HPMS11-27-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.2	11702	PASS
75.0	95.0	30.0	60.0	56.4	27234	PASS
95.0	95.0	100	100	100	48264	PASS
96.0	95.0	5.00	9.00	6.54	3155	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	80.4	38826	PASS
175	174	5.00	9.00	8.05	3127	PASS
176	174	95.0	101	97.8	37954	PASS
177	176	5.00	9.00	6.38	2423	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634315-02	CCV	01	10/17/2017 13:10	
WG634316-01	BLANK	01	10/17/2017 14:11	
WG634316-02	LCS	01	10/17/2017 14:40	
L17100636-41	MW-208A-LA-26-MS	01	10/17/2017 15:09	
L17100636-42	MW-208A-LA-26-MSD	01	10/17/2017 15:39	
L17100636-32	DUP-4-LA-26	01	10/17/2017 17:37	
L17100636-33	MW-209B-LA-26	01	10/17/2017 18:06	
L17100636-34	MW-200-LA-26	01	10/17/2017 18:35	
L17100636-35	MW-94A-LA-26	01	10/17/2017 19:04	
L17100636-36	DUP-5-LA-26	01	10/17/2017 19:33	
L17100636-37	MW-207B-LA-26	01	10/17/2017 20:03	
L17100636-38	MW-208B-LA-26	01	10/17/2017 20:33	
L17100636-39	MW-206A-LA-26	01	10/17/2017 21:02	
L17100636-40	MW-208A-LA-26	01	10/17/2017 21:31	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS6
Analyst: TMB
Workgroup: WG634167

Tune ID: WG634167-01
Run Date: 10/17/2017
Run Time: 06:51
File ID: 6M150723
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.7	7680	PASS
75.0	95.0	30.0	60.0	48.9	17299	PASS
95.0	95.0	100	100	100	35400	PASS
96.0	95.0	5.00	9.00	6.49	2297	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	81.2	28749	PASS
175	174	5.00	9.00	7.59	2183	PASS
176	174	95.0	101	100	28872	PASS
177	176	5.00	9.00	6.62	1912	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634167-02	CCV	01	10/17/2017 07:18	
WG634168-01	BLANK	01	10/17/2017 08:16	
L17100636-24	PMW92-03-LA-26	01	10/17/2017 08:45	
WG634168-02	LCS	01	10/17/2017 09:15	
L17100636-25	PMW92-03-LA-26-MS	01	10/17/2017 09:44	
L17100636-26	PMW92-03-LA-26-MSD	01	10/17/2017 10:13	
L17100636-03	MW-205A-LA-26	02	10/17/2017 13:39	
L17100636-04	MW-205B-LA-26	02	10/17/2017 14:09	
L17100636-06	MW-210B-LA-26	02	10/17/2017 14:38	
L17100636-07	MW-197B-LA-26	02	10/17/2017 15:08	
L17100636-08	MW-210A-LA-26	02	10/17/2017 15:37	
L17100636-09	PMW21-05-LA-26	02	10/17/2017 16:07	
L17100636-13	PMW-85-05-LA-26	02	10/17/2017 16:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100636
Instrument: HPMS6
Analyst: JDS
Workgroup: WG634399

Tune ID: WG634399-01
Run Date: 10/17/2017
Run Time: 20:44
File ID: 6M150750
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.2	10353	PASS
75.0	95.0	30.0	60.0	48.5	22583	PASS
95.0	95.0	100	100	100	46597	PASS
96.0	95.0	5.00	9.00	6.73	3138	PASS
173	174	0	2.00	0.353	133	PASS
174	95.0	50.0	100	80.8	37656	PASS
175	174	5.00	9.00	7.20	2710	PASS
176	174	95.0	101	98.8	37218	PASS
177	176	5.00	9.00	6.86	2553	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634399-02	CCV	01	10/17/2017 21:09	
WG634400-01	BLANK	01	10/17/2017 22:11	
WG634400-02	LCS	01	10/17/2017 22:40	
WG634400-03	LCS2	01	10/17/2017 23:09	
L17100636-01	LTM-RB1-LA-26	02	10/18/2017 00:38	
L17100636-02	MW-204B-LA-26	02	10/18/2017 01:07	
WG633712-02	FBLK1	DL01	10/18/2017 08:26	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5529637
Report generated 10/19/2017 16:26

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 062217 HPMS11
Last Calibration: Fri Jun 23 09:50:47 2017
Curve: WG618912
Calibration Files

	Compound	5 11M19219.D	20 11M19220.D	50 11M19221.D	100 11M19222.D	200 11M19223.D	300 11M19224.D	400 11M19225.D	500 11M19226.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile	0.036	0.036	0.034	0.036	0.037	0.037	0.035	0.035	0.036	3.083		
T	3-Chloro-1-propene	0.486	0.499	0.493	0.472	0.427	0.395	0.358		0.447	12.268		
T	2-Chloro-1,3-butadiene	0.394	0.417	0.416	0.399	0.375	0.350	0.322	0.294	0.371	12.213		
T	Methacrylonitrile	0.171	0.182	0.179	0.183	0.177	0.170	0.155	0.149	0.171	7.403		
T	Isobutyl Alcohol		0.006	0.006	0.008	0.010	0.011	0.011	0.012	0.009	25.809	0.993	
T	1-Butanol			0.001	0.003	0.004	0.005	0.005	0.005	0.004	42.424	0.996	
T	Cyclohexanone			0.009	0.010	0.011	0.011	0.010	0.010	0.010	6.640		
T	2-Nitropropane			0.074	0.078	0.081	0.080	0.075	0.075	0.077	3.841		
T	Ethyl Acetate	0.239	0.260	0.249	0.254	0.242	0.225	0.203	0.193	0.233	10.353		
T	Methyl methacrylate	0.230	0.251	0.246	0.247	0.236	0.221	0.200	0.188	0.227	10.105		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Jun 23 10:01:47 2017

Calibration Table Report
Method: 8260_SL.M
Title: 8260(B)(C) SOP: OVL MSV01 SOIL 062717 HPMS11
Last Calibration: Tue Jun 27 12:03:43 2017
Curve: WG619415
Calibration Files

Compound	0.5 11M19370.D	1 11M19371.D	2 11M19372.D	5 11M19373.D	20 11M19374.D	50 11M19375.D	100 11M19376.D	200 11M19377.D	300 11M19378.D	Avg	%RSD	R^2 Linear	R^2 Quadratic
Fluorobenzene	ISTD												
Dichlorodifluoromethane			0.310	0.296	0.311	0.296	0.323	0.267		0.301	6.343		
Chloromethane			0.330	0.274	0.252	0.244	0.262	0.222		0.264	13.939		
Vinyl Chloride			0.246	0.241	0.244	0.227	0.235	0.203		0.233	6.846		
1,3-Butadiene			0.184	0.194	0.169	0.157	0.155			0.172	9.843		
Bromomethane			0.215	0.175	0.177	0.174	0.189	0.173		0.184	9.000		
Chloroethane			0.180	0.195	0.206	0.200	0.217	0.185		0.197	6.913		
Trichlorofluoromethane			0.391	0.373	0.394	0.373	0.397	0.338		0.378	5.869		
Diethyl ether		0.227	0.240	0.227	0.242	0.216	0.255		0.232	0.234	5.436		
Isoprene			0.351	0.354	0.370	0.363	0.384	0.325	0.357	0.358	5.060		
Acrolein			0.035	0.032	0.034	0.031	0.037		0.033	0.034	7.029		
1,1,2-Trichloro-1,2,2-Trifluoroet				0.196	0.224	0.210	0.225	0.191		0.209	7.463		
Acetone				0.107	0.094	0.094	0.092	0.084	0.087	0.093	8.721		
1,1-Dichloroethene		0.382	0.359	0.415	0.403	0.392	0.421	0.350		0.389	6.945		
Tert-Butyl Alcohol		0.035	0.040	0.040	0.040	0.038	0.047		0.043	0.040	9.089		
Dimethyl Sulfide		0.306	0.290	0.265	0.278	0.273	0.295	0.255	0.272	0.279	6.040		
Iodomethane				0.085	0.131	0.157	0.180	0.164		0.143	25.769	0.997	
Methyl acetate		0.265	0.253	0.272	0.252	0.264	0.277	0.237	0.254	0.259	4.942		
Methylene Chloride				0.288	0.288	0.279	0.296	0.252		0.280	6.057		
Carbon Disulfide		0.861	0.828	0.800	0.783	0.728	0.768	0.627	0.644	0.755	11.082		
Acrylonitrile		0.100	0.102	0.099	0.110	0.107	0.121		0.107	0.107	7.316		
Methyl Tert Butyl Ether			0.872	0.836	0.835	0.839	0.871	0.725		0.830	6.537		
trans-1,2-Dichloroethene			0.238	0.247	0.256	0.245	0.266	0.224		0.246	5.878		
n-Hexane			0.436	0.362	0.394	0.386	0.402	0.341	0.364	0.384	8.148		
Diisopropyl ether		0.921	0.966	0.885	0.941	0.815	0.921		0.804	0.893	6.952		
Vinyl Acetate				0.451	0.448	0.467	0.480	0.407	0.407	0.443	6.832		
1,1-Dichloroethane		0.503	0.520	0.512	0.525	0.493	0.526	0.438		0.503	6.157		
Ethyl-Tert-Butyl ether		0.831	0.877	0.818	0.863	0.758	0.855		0.754	0.822	6.010		
2-Butanone				0.148	0.147	0.153	0.158	0.138	0.152	0.149	4.525		
Propionitrile		0.033	0.043	0.041	0.043	0.042	0.048		0.045	0.042	11.002		
2,2-Dichloropropane			0.397	0.411	0.408	0.392	0.415	0.349		0.395	6.195		
cis-1,2-Dichloroethene		0.324	0.293	0.274	0.293	0.289	0.307	0.257		0.291	7.384		
Chloroform		0.499	0.508	0.465	0.484	0.465	0.486	0.405		0.473	7.223		
1-Bromopropane			0.021	0.042	0.044	0.043	0.048	0.041	0.045	0.041	21.691	0.997	
Bromochloromethane			0.149	0.163	0.166	0.162	0.178	0.149		0.161	6.907		
Tetrahydrofuran			0.108	0.101	0.103	0.097	0.112		0.105	0.104	5.099		
Dibromofluoromethane			0.249	0.240	0.260	0.231	0.256	0.221	0.227	0.241	6.206		
1,1,1-Trichloroethane		0.424	0.334	0.394	0.402	0.384	0.422	0.350		0.387	8.831		
Cyclohexane		0.555	0.456	0.467	0.469	0.437	0.469	0.386	0.418	0.457	10.738		
1,1-Dichloropropene		0.360	0.375	0.350	0.384	0.355	0.378	0.317		0.360	6.290		
Carbon Tetrachloride		0.357	0.334	0.314	0.346	0.323	0.353	0.297		0.332	6.588		
Tert-Amyl-Methyl ether		0.759	0.852	0.79	0.829	0.736	0.823		0.72	0.78709	6.3919		
1,2-Dichloroethane-d4			0.336	0.324	0.36	0.308	0.346	0.293	0.301	0.32396	7.5906		
1,2-Dichloroethane		0.402	0.423	0.413	0.408	0.403	0.423	0.352		0.40336	6.03111		
Benzene		1.253	1.164	1.095	1.097	1.02	1.032	0.821		1.06883	12.6679		
Trichloroethene		0.257	0.284	0.245	0.262	0.245	0.264	0.217		0.25363	8.271		
Methylcyclohexane		0.5	0.45	0.415	0.459	0.44	0.461	0.385	0.402	0.439	8.37617		
1,2-Dichloropropane		0.307	0.277	0.301	0.298	0.3	0.324	0.269		0.2965	6.17188		
1,4-Dioxane				0.004	0.004	0.004	0.005		0.005	0.00436	14.9147		
Bromodichloromethane		0.363	0.342	0.337	0.363	0.365	0.392	0.33		0.35588	6.0314		
Dibromomethane			0.174	0.165	0.175	0.173	0.186	0.164		0.17287	4.61022		
2-Chloroethyl Vinyl Ether				0.176	0.194	0.203	0.22	0.191	0.2	0.19727	7.48843		
4-Methyl-2-Pentanone				0.104	0.109	0.12	0.133	0.116	0.125	0.11796	8.88833		
cis-1,3-Dichloropropene		0.437	0.398	0.428	0.443	0.445	0.479	0.399		0.43272	6.45649		
Dimethyl Disulfide				0.174	0.218	0.239	0.27	0.239	0.255	0.23268	14.4696		
Chlorobenzene-d5	ISTD												
Toluene-d8			1.532	1.449	1.447	1.207	1.277			1.38252	9.74621		
Toluene			1.716	1.712	1.617	1.485	1.496	1.155		1.53009	13.6835		
Ethyl Methacrylate				0.475	0.497	0.522	0.552	0.472	0.51	0.5045	5.99234		
trans-1,3-Dichloropropene			0.535	0.553	0.578	0.588	0.621	0.52		0.56576	6.57454		
1,1,2-Trichloroethane			0.276	0.36	0.358	0.347	0.369	0.312		0.33713	10.5947		
2-Hexanone			0.265	0.289	0.308	0.314	0.35	0.305	0.327	0.30827	8.74768		
1,3-Dichloropropane		0.594	0.628	0.613	0.646	0.614	0.64	0.531		0.60934	6.35916		
Tetrachloroethene			0.249	0.274	0.279	0.256	0.274	0.23		0.26033	7.29493		
Dibromochloromethane		0.277	0.317	0.326	0.365	0.363	0.397	0.344		0.34138	11.353		
1,2-Dibromoethane		0.329	0.316	0.316	0.325	0.32	0.346	0.298		0.32135	4.52004		
1-Chlorohexane		0.615	0.498	0.507	0.508	0.461	0.496	0.412	0.44	0.49208	12.2904		
Chlorobenzene		1.088	1.05	1.066	0.988	0.922	0.95	0.759		0.97472	11.6073		
1,1,1,2-Tetrachloroethane		0.35	0.28	0.309	0.346	0.334	0.363	0.309		0.32721	8.90354		
Ethylbenzene		0.581	0.532	0.512	0.548	0.505	0.541	0.442		0.52305	8.32226		
m-,p-Xylene	0.76	0.672	0.621	0.643	0.658	0.596	0.608	0.481		0.62997	12.5376		
o-Xylene		0.672	0.64	0.666	0.647	0.602	0.646	0.532		0.62946	7.68681		
Styrene		1.049	1.025	1.039	1.093	1.021	1.073	0.873		1.02483	6.98034		
Bromoform				0.208	0.22	0.236	0.263	0.235		0.2324	8.8473		
Isopropylbenzene		1.653	1.663	1.66	1.648	1.488	1.505	1.165		1.54028	11.8045		
1,4-Dichlorobenzene-d4	ISTD												
1,1,2,2-Tetrachloroethane		1.005	1.046	1.015	0.962	0.938	0.998	0.839		0.97186	7.03366		
p-Bromofluorobenzene			1.435	1.281	1.181	0.984	1.059			1.18807	15.065	0.997	
1,2,3-Trichloropropane			0.246	0.258	0.266	0.261	0.28	0.241		0.25866	5.49635		
trans-1,4-Dichloro-2-Butene			0.196	0.219	0.256	0.255	0.28	0.244	0.252	0.24327	11.2657		

n-Propylbenzene	4.605	4.131	4.358	4.303	3.734	3.641			4.12886	9.08001
Bromobenzene	0.878	0.737	0.849	0.836	0.778	0.807	0.664		0.79281	9.2818
1,3,5-Trimethylbenzene	2.972	2.78	2.735	2.909	2.523	2.561	1.93		2.6299	13.297
2-Chlorotoluene	3.118	2.873	3.007	2.95	2.614	2.593	1.958		2.73034	14.3723
4-Chlorotoluene		2.331	2.443	2.41	2.103	2.092	1.603		2.16366	14.4574
a-Methylstyrene	1.227	1.196	1.273	1.338	1.292	1.36	1.101	1.195	1.24755	6.82787
tert-Butylbenzene		0.553	0.598	0.602	0.513	0.556	0.451		0.54541	10.4201
1,2,4-Trimethylbenzene	3.082	2.934	2.954	2.95	2.611	2.61	1.982		2.73171	13.7943
sec-Butylbenzene	3.861	3.585	3.703	3.74	3.187	3.179			3.54262	8.25059
p-Isopropyltoluene	3.264	3.09	2.929	2.969	2.65	2.657	1.994		2.79329	14.8736
1,3-Dichlorobenzene	1.676	1.569	1.561	1.599	1.428	1.497	1.197		1.50384	10.3853
1,4-Dichlorobenzene	1.962	1.68	1.692	1.611	1.45	1.505	1.209		1.58712	14.7661
n-Butylbenzene	3.409	3.023	3.129	3.164	2.755	2.791	2.095		2.90923	14.5633
1,2-Dichlorobenzene	1.631	1.607	1.627	1.519	1.414	1.501	1.204		1.50054	10.1931
1,2-Dibromo-3-Chloropropane			0.158	0.198	0.197	0.225	0.199		0.19541	12.1697
1,2,4-Trichlorobenzene	1.085	0.994	1.074	1.074	0.998	1.133	0.9		1.03675	7.51317
Hexachlorobutadiene		0.557	0.522	0.56	0.492	0.578	0.464		0.52873	8.43134
Naphthalene	2.843	2.68	3.049	2.942	2.801	2.923	2.161		2.77129	10.5786
1,2,3-Trichlorobenzene		1.041	1.021	1.061	1.008	1.142	0.888		1.02677	8.04629

Wed Jun 28 16:01:31 2017

Calibration Table Report
Method: A9FOOS.M
Title: Appendix IX (SOP:OVL MSV01) Soil 082417 HPMS11
Last Calibration: Fri Aug 25 11:26:24 2017
Curve: WG627119
Calibration Files

	Compound	5 11M20994.D	20 11M20995.D	50 11M20996.D	100 11M20997.D	200 11M20998.D	300 11M20999.D	400 11M21000.D	500 11M21001.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile	0.021	0.023	0.023	0.023	0.024	0.023	0.022	0.023	0.023	3.946		
T	3-Chloro-1-propene	0.230	0.251	0.256	0.283	0.259	0.248	0.233	0.224	0.248	7.716		
T	2-Chloro-1,3-butadiene	0.201	0.215	0.219	0.257	0.234	0.225	0.212	0.205	0.221	8.130		
T	Methacrylonitrile	0.101	0.112	0.122	0.118	0.119	0.117	0.112	0.112	0.114	5.727		
T	Isobutyl Alcohol		0.007	0.008	0.008	0.009	0.009	0.009	0.009	0.008	9.142		
T	1-Butanol			0.004	0.004	0.004	0.004	0.004	0.005	0.004	6.396		
T	Cyclohexanone		0.006	0.006	0.006	0.006	0.006	0.006	0.006	0.006	4.411		
T	2-Nitropropane			0.045	0.044	0.048	0.049	0.048	0.049	0.047	4.566		
T	Ethyl Acetate	0.203	0.176	0.169	0.163	0.163	0.155	0.147	0.146	0.165	11.228		
T	Methyl methacrylate	0.121	0.131	0.141	0.141	0.146	0.141	0.134	0.133	0.136	5.859		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Sat Aug 26 13:55:32 2017

Calibration Table Report
Method: 8260_W.M
Title: 8260B/624 (SOP: OVL MSV01) Water 101217 HPMS11
Last Calibration: Thu Oct 12 18:32:44 2017
Curve: WG633647
Calibration Files

	Compound	0.3 11M22282.D	0.4 11M22283.D	1 11M22284.D	2 11M22285.D	5 11M22286.D	20 11M22288.D	50 11M22289.D	100 11M22290.D	200 11M22291.D	300 11M22292.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.389	0.443	0.443	0.504	0.499	0.464	0.425		0.453	8.969		
P	Chloromethane			0.476	0.437	0.418	0.424	0.396	0.362			0.419	9.240		
C	Vinyl Chloride		0.407	0.398	0.436	0.406	0.406	0.411	0.344	0.323		0.391	9.661		
T	1,3-Butadiene				0.353	0.322	0.304	0.303	0.286	0.259		0.305	10.442		
T	Bromomethane			0.199	0.192	0.184	0.207	0.226	0.228	0.232		0.210	9.166		
T	Chloroethane			0.244	0.268	0.263	0.270	0.282	0.272	0.264		0.266	4.303		
T	Trichlorofluoromethane		0.443	0.485	0.541	0.540	0.528	0.543	0.526	0.504		0.514	6.830		
T	Diethyl ether			0.270	0.285	0.306	0.274	0.286	0.266		0.263	0.279	5.347		
T	Isoprene		0.349	0.411	0.453	0.456	0.469	0.493	0.478	0.446		0.445	10.217		
T	Acrolein			0.031	0.042	0.047	0.039	0.047	0.045		0.046	0.042	14.006		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.184	0.247	0.262	0.252	0.262	0.255	0.256		0.246	11.203		
T	Acetone					0.105	0.088	0.093	0.097	0.095	0.093	0.095	5.841		
C	1,1-Dichloroethene		0.430	0.441	0.514	0.512	0.500	0.519	0.499	0.475		0.486	6.979		
T	Tert-Butyl Alcohol				0.028	0.032	0.026	0.028	0.030		0.035	0.030	10.998		
T	Dimethyl Sulfide		0.328	0.316	0.332	0.358	0.376	0.372	0.360	0.340		0.348	6.305		
T	Iodomethane			0.136	0.163	0.156	0.197	0.230	0.234	0.226		0.192	20.874	0.998	
T	Methyl acetate				0.294	0.309	0.267	0.291	0.278	0.269		0.285	5.781		
T	Methylene Chloride			0.327	0.354	0.343	0.317	0.329	0.310	0.295		0.325	6.143		
T	Carbon Disulfide			0.867	0.928	0.881	0.918	0.872	0.799	0.691		0.851	9.630		
T	Acrylonitrile			0.109	0.109	0.121	0.111	0.130	0.124		0.122	0.118	6.980		
T	Methyl Tert Butyl Ether			0.784	0.772	0.863	0.796	0.868	0.818	0.761		0.809	5.291		
T	trans-1,2-Dichloroethene		0.156	0.252	0.279	0.287	0.281	0.287	0.282	0.271		0.262	16.964	0.999	
T	n-Hexane				0.404	0.414	0.465	0.478	0.464	0.431		0.443	6.882		
T	Diisopropyl ether			1.203	1.277	1.295	1.161	1.170	0.984		0.904	1.142	12.775		
T	Vinyl Acetate				0.574	0.605	0.636	0.666	0.609	0.543		0.606	7.186		
P	1,1-Dichloroethane		0.566	0.629	0.634	0.661	0.628	0.643	0.596	0.549		0.613	6.384		
T	Ethyl-Tert-Butyl ether			0.955	1.048	1.076	0.967	0.987	0.853		0.802	0.955	10.319		
T	2-Butanone				0.137	0.152	0.134	0.158	0.153	0.153	0.155	0.149	6.166		
T	Propionitrile				0.041	0.047	0.041	0.045	0.045		0.049	0.045	6.693		
T	2,2-Dichloropropane			0.417	0.449	0.491	0.493	0.522	0.492	0.466		0.476	7.312		
T	cis-1,2-Dichloroethene		0.308	0.296	0.326	0.343	0.313	0.336	0.315	0.301		0.317	5.242		
C	Chloroform	0.536	0.620	0.567	0.567	0.597	0.558	0.577	0.535	0.491		0.561	6.713		
T	1-Bromopropane				0.029	0.047	0.054	0.054	0.053	0.053	0.052	0.049	18.551	0.999	
T	Bromochloromethane		0.148	0.165	0.178	0.180	0.174	0.187	0.179	0.175		0.173	6.852		
T	Tetrahydrofuran			0.088	0.095	0.105	0.094	0.104	0.099		0.104	0.098	6.367		
S	Dibromofluoromethane						0.302	0.250	0.281	0.283	0.264	0.276	7.096		
T	1,1,1-Trichloroethane		0.445	0.454	0.475	0.517	0.485	0.510	0.491	0.463		0.480	5.326		
T	Cyclohexane		0.451	0.460	0.590	0.562	0.552	0.590	0.570	0.526		0.538	10.217		
T	1,1-Dichloropropene		0.338	0.356	0.383	0.418	0.409	0.431	0.414	0.391		0.392	8.227		
T	Carbon Tetrachloride		0.353	0.371	0.410	0.435	0.416	0.443	0.428	0.411		0.409	7.644		
T	Tert-Amyl-Methyl ether			0.763	0.830	0.881	0.772	0.809	0.703		0.666	0.775	9.539		
S	1,2-Dichloroethane-d4						0.418	0.351	0.385	0.386	0.356	0.379	7.101		
T	1,2-Dichloroethane		0.448	0.481	0.478	0.500	0.474	0.491	0.455	0.424		0.469	5.331		
T	Benzene		1.122	1.254	1.302	1.325	1.216	1.195	1.036			1.207	8.408		
T	Trichloroethene		0.335	0.304	0.300	0.290	0.269	0.285	0.276	0.270		0.291	7.565		
T	Methylcyclohexane		0.372	0.358	0.449	0.437	0.451	0.482	0.466	0.433		0.431	10.150		
C	1,2-Dichloropropane		0.302	0.340	0.348	0.362	0.352	0.376	0.356	0.341		0.347	6.309		
T	1,4-Dioxane				0.003	0.003	0.002	0.003	0.003		0.003	0.003	13.552		
T	Bromodichloromethane		0.312	0.385	0.420	0.425	0.419	0.452	0.430	0.404		0.406	10.525		
T	Dibromomethane		0.159	0.179	0.160	0.187	0.180	0.194	0.187	0.184		0.179	7.148		
T	2-Chloroethyl Vinyl Ether				0.145	0.167	0.186	0.210	0.204	0.202	0.192	0.186	12.467		
T	4-Methyl-2-Pentanone					0.094	0.106	0.122	0.123	0.128	0.123	0.116	11.232		
T	cis-1,3-Dichloropropene		0.342	0.366	0.457	0.479	0.485	0.530	0.495	0.455		0.451	14.326		
T	Dimethyl Disulfide				0.170	0.177	0.254	0.283	0.290	0.283	0.262	0.245	20.741	0.998	

I	Chlorobenzene-d5	ISTD												
S	Toluene-d8						1.523	1.295	1.400	1.316	1.164	1.340	9.921	
C	Toluene		1.489	1.587	1.744	1.831	1.645	1.637	1.424			1.622	8.630	
T	Ethyl Methacrylate			0.337	0.421	0.479	0.480	0.550	0.539	0.508	0.469	0.473	14.446	
T	trans-1,3-Dichloropropene			0.544	0.548	0.627	0.606	0.676	0.630	0.568		0.600	8.103	
T	1,1,2-Trichloroethane		0.223	0.335	0.354	0.379	0.340	0.364	0.347	0.327		0.333	14.268	
T	2-Hexanone					0.284	0.271	0.326	0.330	0.327	0.318	0.309	8.253	
T	1,3-Dichloropropane		0.562	0.654	0.647	0.693	0.593	0.658	0.609	0.552		0.621	8.033	
T	Tetrachloroethene		0.262	0.318	0.319	0.307	0.313	0.325	0.315	0.295		0.307	6.590	
T	Dibromochloromethane		0.303	0.362	0.402	0.399	0.384	0.426	0.414	0.393		0.385	9.912	
T	1,2-Dibromoethane		0.240	0.327	0.338	0.341	0.323	0.361	0.348	0.332		0.326	11.342	
T	1-Chlorohexane		0.244	0.319	0.428	0.462	0.514	0.545	0.545	0.490	0.447	0.444	23.061	0.994
P	Chlorobenzene		1.093	1.127	1.157	1.158	1.029	1.048	0.954	0.808		1.047	11.344	
T	1,1,1,2-Tetrachloroethane		0.343	0.394	0.400	0.424	0.391	0.428	0.412	0.383		0.397	6.736	
C	Ethylbenzene			0.528	0.530	0.598	0.561	0.595	0.564	0.514		0.556	5.960	
T	m-,p-Xylene		0.597	0.636	0.67	0.727	0.678	0.673	0.599	0.494		0.63424	11.2093	
T	o-Xylene		0.552	0.560	0.649	0.685	0.687	0.728	0.675	0.608		0.643	9.926	
T	Styrene		0.691	0.868	0.979	1.134	1.135	1.187	1.080			1.011	17.623	0.998
P	Bromoform			0.201	0.196	0.252	0.241	0.280	0.283	0.286		0.248	15.276	0.999
T	Isopropylbenzene		1.289	1.465	1.695	1.814	1.709	1.715	1.509	1.223		1.552	13.922	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.840	0.911	1.010	0.946	0.912	0.947	0.891	0.859		0.915	5.905	
S	p-Bromofluorobenzene						1.163	0.989	1.141	1.153	1.035	1.096	7.178	
T	1,2,3-Trichloropropane			0.259	0.237	0.260	0.251	0.270	0.262	0.263		0.257	4.107	
T	trans-1,4-Dichloro-2-Butene			0.175	0.198	0.285	0.306	0.325	0.336	0.349	0.307	0.285	22.521	0.996
T	n-Propylbenzene		3.119	3.771	4.330	4.634	4.661	4.213	3.496			4.032	14.563	
T	Bromobenzene	0.930	0.799	0.856	0.994	0.987	0.944	0.942	0.869	0.822		0.905	7.826	
T	1,3,5-Trimethylbenzene		1.786	2.515	2.997	3.245	3.227	3.036	2.611			2.774	18.705	0.991
T	2-Chlorotoluene		2.547	2.931	3.317	3.352	3.117	2.934	2.519			2.960	11.307	
T	4-Chlorotoluene		1.944	2.159	2.633	2.826	2.655	2.387	2.067			2.382	14.089	
T	a-Methylstyrene					1.390	1.652	1.562	1.479	1.306		1.478	9.251	
T	tert-Butylbenzene			0.519	0.597	0.646	0.646	0.658	0.631	0.604		0.615	7.781	
T	1,2,4-Trimethylbenzene			2.705	3.112	3.341	3.366	3.107	2.656			3.048	10.015	
T	sec-Butylbenzene			3.176	4.004	4.060	3.974	3.715	3.134			3.677	11.469	
T	p-Isopropyltoluene			2.442	3.062	3.170	3.307	3.084	2.684			2.958	11.055	
T	1,3-Dichlorobenzene		1.513	1.698	1.713	1.764	1.760	1.681	1.540	1.352		1.628	8.944	
T	1,4-Dichlorobenzene		1.827	1.838	1.904	1.800	1.758	1.682	1.529	1.339		1.710	11.024	
T	n-Butylbenzene			2.305	2.884	3.065	3.327	3.143	2.727	2.228		2.811	14.878	
T	1,2-Dichlorobenzene	1.495	1.569	1.731	1.744	1.757	1.680	1.656	1.494	1.309		1.604	9.354	
T	1,2-Dibromo-3-Chloropropane				0.133	0.171	0.166	0.195	0.192	0.204		0.177	14.602	
T	1,2,4-Trichlorobenzene			0.949	1.015	1.118	1.205	1.231	1.147	1.109		1.111	9.017	
T	Hexachlorobutadiene		0.377	0.449	0.589	0.556	0.622	0.634	0.637	0.619		0.560	17.268	1.000
T	Naphthalene		1.656	1.966	2.145	2.445	2.569	2.625	2.282			2.241	15.517	0.995
T	1,2,3-Trichlorobenzene			1.036	1.034	1.147	1.162	1.159	1.100	1.063		1.100	5.179	

Fri Oct 13 15:45:54 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number:L17100636 Run Date:06/27/2017 Sample ID:WG619415-11
Instrument ID:HPMS11 Run Time:12:34 Method:8260B
File ID:11M19380 Analyst:ADC QC Key:AF40
ICal Workgroup:WG619415 Cal ID:HPMS11 - 27-JUN-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.9	ug/kg	0.396	1.80	25	
1,2-Dichloropropane	CCC	50.0	51.4	ug/kg	0.305	2.90	25	
Chloroform	CCC	50.0	49.3	ug/kg	0.467	1.30	25	
Ethylbenzene	CCC	50.0	49.0	ug/kg	0.513	1.90	25	
Toluene	CCC	50.0	50.0	ug/kg	1.53	0	25	
Vinyl Chloride	CCC	50.0	53.8	ug/kg	0.251	7.70	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.6	ug/kg	0.887	8.80	25	
1,1-Dichloroethane	SPCC	50.0	49.1	ug/kg	0.494	1.80	25	
Bromoform	SPCC	50.0	46.3	ug/kg	0.215	7.30	25	
Chlorobenzene	SPCC	50.0	49.8	ug/kg	0.971	0.400	25	
Chloromethane	SPCC	50.0	50.9	ug/kg	0.269	1.90	25	
1,1,1,2-Tetrachloroethane		50.0	51.9	ug/kg	0.339	3.70	25	
1,1,1-Trichloroethane		50.0	50.2	ug/kg	0.389	0.500	25	
1,1,2-Trichloroethane		50.0	51.3	ug/kg	0.346	2.60	25	
1,1-Dichloropropene		50.0	50.1	ug/kg	0.361	0.300	25	
1,2,3-Trichlorobenzene		50.0	48.2	ug/kg	0.989	3.60	25	
1,2,3-Trichloropropane		50.0	50.7	ug/kg	0.262	1.30	25	
1,2,4-Trichlorobenzene		50.0	47.8	ug/kg	0.990	4.50	25	
1,2,4-Trimethylbenzene		50.0	48.4	ug/kg	2.64	3.30	25	
1,2-Dichloroethane		50.0	49.5	ug/kg	0.399	1.00	25	
1,2-Dichlorobenzene		50.0	47.2	ug/kg	1.42	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	49.3	ug/kg	0.193	1.40	25	
1,2-Dibromoethane		50.0	51.5	ug/kg	0.331	2.90	25	
1,3,5-Trimethylbenzene		50.0	47.7	ug/kg	2.51	4.50	25	
1,3-Dichlorobenzene		50.0	47.0	ug/kg	1.41	6.10	25	
1,3-Dichloropropane		50.0	53.4	ug/kg	0.651	6.80	25	
1,4-Dichlorobenzene		50.0	45.4	ug/kg	1.44	9.20	25	
1,4-Dioxane		200	213	ug/kg	0.00470	6.60	25	
1-Chlorohexane		50.0	52.5	ug/kg	0.517	5.00	25	
2,2-Dichloropropane		50.0	48.5	ug/kg	0.384	2.90	25	
2-Hexanone		50.0	51.5	ug/kg	0.318	3.00	25	
2-Chlorotoluene		50.0	47.5	ug/kg	2.59	5.00	25	
4-Chlorotoluene		50.0	49.3	ug/kg	2.13	1.50	25	
Acetone		50.0	47.1	ug/kg	0.0877	5.80	25	
Benzene		50.0	48.7	ug/kg	1.04	2.50	25	
Bromobenzene		50.0	48.7	ug/kg	0.772	2.70	25	
Bromochloromethane		50.0	50.2	ug/kg	0.162	0.300	25	
Bromodichloromethane		50.0	50.3	ug/kg	0.358	0.600	25	
Bromomethane		50.0	46.3	ug/kg	0.170	7.40	25	
Carbon Disulfide		50.0	41.9	ug/kg	0.632	16.2	25	
Carbon Tetrachloride		50.0	48.6	ug/kg	0.323	2.80	25	
Chloroethane		50.0	52.8	ug/kg	0.208	5.60	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100636 Run Date: 06/27/2017 Sample ID: WG619415-11
Instrument ID: HPMS11 Run Time: 12:34 Method: 8260B
File ID: 11M19380 Analyst: ADC QC Key: AF40
ICal Workgroup: WG619415 Cal ID: HPMS11 - 27-JUN-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.6	ug/kg	0.288	0.900	25	
cis-1,3-Dichloropropene		50.0	54.1	ug/kg	0.468	8.20	25	
Dibromochloromethane		50.0	53.0	ug/kg	0.362	6.00	25	
Dibromomethane		50.0	49.4	ug/kg	0.171	1.20	25	
Dichlorodifluoromethane		50.0	51.0	ug/kg	0.306	2.00	25	
Hexachlorobutadiene		50.0	47.4	ug/kg	0.501	5.20	25	
Isopropylbenzene		50.0	47.6	ug/kg	1.47	4.70	25	
Methylene Chloride		50.0	50.1	ug/kg	0.281	0.100	25	
Methyl Tert Butyl Ether		50.0	49.9	ug/kg	0.827	0.300	25	
2-Butanone		50.0	48.4	ug/kg	0.144	3.20	25	
4-Methyl-2-Pentanone		50.0	49.5	ug/kg	0.117	1.00	25	
n-Butylbenzene		50.0	45.7	ug/kg	2.66	8.60	25	
n-Propylbenzene		50.0	45.9	ug/kg	3.79	8.30	25	
m-,p-Xylene		100	97.6	ug/kg	0.615	2.40	25	
Naphthalene		50.0	49.3	ug/kg	2.73	1.40	25	
o-Xylene		50.0	50.8	ug/kg	0.640	1.60	25	
p-Isopropyltoluene		50.0	46.2	ug/kg	2.58	7.60	25	
sec-Butylbenzene		50.0	44.6	ug/kg	3.16	10.7	25	
Styrene		50.0	51.8	ug/kg	1.06	3.60	25	
Trichloroethene		50.0	48.6	ug/kg	0.247	2.70	25	
tert-Butylbenzene		50.0	48.9	ug/kg	0.534	2.20	25	
Tetrachloroethene		50.0	49.0	ug/kg	0.255	1.90	25	
trans-1,2-Dichloroethene		50.0	50.3	ug/kg	0.247	0.600	25	
trans-1,3-Dichloropropene		50.0	51.6	ug/kg	0.584	3.20	25	
Trichlorofluoromethane		50.0	48.0	ug/kg	0.363	4.00	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100636 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	30.0	30.9	ug/L	0.300	2.90	25	
1,2-Dichloropropane	CCC	30.0	31.0	ug/L	0.215	3.20	25	
Chloroform	CCC	30.0	29.5	ug/L	0.331	1.70	25	
Ethylbenzene	CCC	30.0	31.6	ug/L	0.352	5.50	25	
Toluene	CCC	30.0	30.6	ug/L	0.994	2.10	25	
Vinyl Chloride	CCC	50.0	49.7	ug/L	0.389	0.600	25	
1,1,2,2-Tetrachloroethane	SPCC	30.0	28.5	ug/L	0.521	5.10	25	
1,1-Dichloroethane	SPCC	30.0	29.6	ug/L	0.364	1.20	25	
Bromoform	SPCC	30.0	25.8	ug/L	0.144	13.9	25	
Chlorobenzene	SPCC	30.0	30.4	ug/L	0.635	1.20	25	
Chloromethane	SPCC	50.0	49.8	ug/L	0.417	0.400	25	
1,1,1,2-Tetrachloroethane		30.0	30.0	ug/L	0.238	0	25	
1,1,1-Trichloroethane		30.0	30.7	ug/L	0.295	2.30	25	
1,1,2-Trichloroethane		30.0	30.7	ug/L	0.205	2.30	25	
1,1-Dichloropropene		30.0	32.5	ug/L	0.255	8.30	25	
1,2,3-Trichlorobenzene		30.0	34.3	ug/L	0.754	14.2	25	
1,2,3-Trichloropropane		30.0	29.3	ug/L	0.151	2.40	25	
1,2,4-Trichlorobenzene		30.0	35.5	ug/L	0.789	18.3	25	
1,2,4-Trimethylbenzene		30.0	31.5	ug/L	1.92	4.90	25	
1,2-Dichloroethane		30.0	29.7	ug/L	0.278	1.20	25	
1,2-Dichlorobenzene		30.0	31.5	ug/L	1.01	4.80	25	
1,2-Dibromo-3-Chloropropane		30.0	29.6	ug/L	0.105	1.30	25	
1,2-Dibromoethane		30.0	30.2	ug/L	0.197	0.600	25	
1,3,5-Trimethylbenzene		30.0	32.4	ug/L	1.83	8.10	25	
1,3-Dichlorobenzene		30.0	30.8	ug/L	1.00	2.60	25	
1,3-Dichloropropane		30.0	31.1	ug/L	0.386	3.60	25	
1,4-Dichlorobenzene		30.0	30.3	ug/L	1.04	1.00	25	
1,4-Dioxane		200	210	ug/L	0.00290	5.00	25	
1-Chlorohexane		50.0	56.9	ug/L	0.549	13.8	25	
2,2-Dichloropropane		30.0	31.0	ug/L	0.295	3.30	25	
2-Hexanone		50.0	50.9	ug/L	0.315	1.90	25	
2-Chlorotoluene		30.0	30.5	ug/L	1.80	1.60	25	
4-Chlorotoluene		30.0	30.9	ug/L	1.47	2.80	25	
Acetone		50.0	46.2	ug/L	0.0878	7.60	25	
Benzene		30.0	29.8	ug/L	0.720	0.600	25	
Bromobenzene		30.0	29.6	ug/L	0.535	1.50	25	
Bromochloromethane		30.0	29.2	ug/L	0.101	2.70	25	
Bromodichloromethane		30.0	30.0	ug/L	0.244	0	25	
Bromomethane		50.0	50.3	ug/L	0.211	0.600	25	
Carbon Disulfide		50.0	44.8	ug/L	0.762	10.4	25	
Carbon Tetrachloride		30.0	30.3	ug/L	0.248	1.20	25	
Chloroethane		50.0	55.1	ug/L	0.294	10.2	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100636 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		30.0	29.8	ug/L	0.189	0.600	25	
cis-1,3-Dichloropropene		30.0	34.7	ug/L	0.313	15.5	25	
Dibromochloromethane		30.0	29.4	ug/L	0.226	2.20	25	
Dibromomethane		30.0	29.5	ug/L	0.105	1.70	25	
Dichlorodifluoromethane		50.0	58.2	ug/L	0.526	16.3	25	
Hexachlorobutadiene		30.0	32.6	ug/L	0.407	8.80	25	
Isopropylbenzene		30.0	33.4	ug/L	1.04	11.3	25	
Methylene Chloride		30.0	28.5	ug/L	0.186	4.90	25	
Methyl Tert Butyl Ether		50.0	47.5	ug/L	0.769	5.00	25	
2-Butanone		50.0	48.2	ug/L	0.144	3.60	25	
4-Methyl-2-Pentanone		50.0	47.8	ug/L	0.111	4.40	25	
n-Butylbenzene		30.0	34.0	ug/L	1.91	13.4	25	
n-Propylbenzene		30.0	32.9	ug/L	2.65	9.70	25	
m-,p-Xylene		60.0	65.1	ug/L	0.413	8.40	25	
Naphthalene		30.0	34.5	ug/L	1.66	15.0	25	
o-Xylene		30.0	32.8	ug/L	0.422	9.50	25	
p-Isopropyltoluene		30.0	31.5	ug/L	1.87	5.10	25	
sec-Butylbenzene		30.0	30.9	ug/L	2.27	3.00	25	
Styrene		30.0	31.4	ug/L	0.702	4.80	25	
Trichloroethene		30.0	28.5	ug/L	0.166	4.90	25	
tert-Butylbenzene		30.0	30.8	ug/L	0.379	2.80	25	
Tetrachloroethene		30.0	30.8	ug/L	0.189	2.60	25	
trans-1,2-Dichloroethene		30.0	30.2	ug/L	0.167	0.700	25	
trans-1,3-Dichloropropene		30.0	31.7	ug/L	0.380	5.60	25	
Trichlorofluoromethane		50.0	49.4	ug/L	0.508	1.10	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Report generated 10/19/2017 16:26

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100636 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100636 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/14/2017 Sample ID: WG633980-02

Instrument ID: HPMS11 Run Time: 14:42 Method: 8260B

File ID: 11M22364 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG633791 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.0	ug/L	0.506	4.06	20	
1,2-Dichloropropane	CCC	50.0	50.8	ug/L	0.353	1.65	20	
Chloroform	CCC	50.0	48.5	ug/L	0.544	2.98	20	
Ethylbenzene	CCC	50.0	50.8	ug/L	0.564	1.54	20	
Toluene	CCC	50.0	47.5	ug/L	1.54	5.04	20	
Vinyl Chloride	CCC	50.0	48.6	ug/L	0.380	2.90	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.4	ug/L	0.866	5.30	20	
1,1-Dichloroethane	SPCC	50.0	49.7	ug/L	0.610	0.534	20	
Bromoform	SPCC	50.0	46.2	ug/L	0.259	7.52	20	
Chlorobenzene	SPCC	50.0	46.9	ug/L	0.981	6.28	20	
Chloromethane	SPCC	50.0	48.6	ug/L	0.407	2.73	20	
Xylenes		150	154	ug/L	0.658	2.43	20	
1,1,1,2-Tetrachloroethane		50.0	49.4	ug/L	0.392	1.23	20	
1,1,1-Trichloroethane		50.0	50.1	ug/L	0.481	0.179	20	
1,1,2-Trichloroethane		50.0	50.7	ug/L	0.338	1.41	20	
1,1-Dichloropropene		50.0	52.6	ug/L	0.413	5.19	20	
1,2,3-Trichlorobenzene		50.0	49.8	ug/L	1.10	0.381	20	
1,2,3-Trichloropropane		50.0	46.6	ug/L	0.240	6.86	20	
1,2,4-Trichlorobenzene		50.0	52.4	ug/L	1.16	4.87	20	
1,2,4-Trimethylbenzene		50.0	47.6	ug/L	2.90	4.81	20	
1,2-Dichloroethane		50.0	47.9	ug/L	0.450	4.11	20	
1,2-Dichlorobenzene		50.0	48.0	ug/L	1.54	3.99	20	
1,2-Dibromo-3-Chloropropane		50.0	47.5	ug/L	0.168	5.05	20	
1,2-Dibromoethane		50.0	49.7	ug/L	0.324	0.670	20	
1,3,5-Trimethylbenzene		50.0	50.6	ug/L	2.86	1.24	20	
1,3-Dichlorobenzene		50.0	49.7	ug/L	1.62	0.668	20	
1,3-Dichloropropane		50.0	48.3	ug/L	0.600	3.34	20	
1,4-Dichlorobenzene		50.0	46.7	ug/L	1.60	6.57	20	
1,4-Dioxane		200	185	ug/L	0.00260	7.40	20	
1-Chlorohexane		50.0	52.6	ug/L	0.508	5.12	20	
2,2-Dichloropropane		50.0	51.8	ug/L	0.493	3.57	20	
2-Hexanone		50.0	46.7	ug/L	0.289	6.58	20	
2-Chlorotoluene		50.0	45.8	ug/L	2.71	8.34	20	
4-Chlorotoluene		50.0	48.5	ug/L	2.31	3.04	20	
Acetone		50.0	45.4	ug/L	0.0862	9.28	20	
Benzene		50.0	47.5	ug/L	1.15	5.00	20	
Bromobenzene		50.0	48.2	ug/L	0.873	3.55	20	
Bromochloromethane		50.0	51.0	ug/L	0.177	1.98	20	
Bromodichloromethane		50.0	51.9	ug/L	0.421	3.76	20	
Bromomethane		50.0	51.7	ug/L	0.217	3.40	20	
Carbon Disulfide		50.0	47.4	ug/L	0.807	5.16	20	
Carbon Tetrachloride		50.0	51.5	ug/L	0.421	3.06	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/14/2017 Sample ID: WG633980-02

Instrument ID: HPMS11 Run Time: 14:42 Method: 8260B

File ID: 11M22364 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG633791 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	51.4	ug/L	0.274	2.76	20	
cis-1,2-Dichloroethene		50.0	51.0	ug/L	0.324	1.96	20	
cis-1,3-Dichloropropene		50.0	54.9	ug/L	0.495	9.81	20	
Dibromochloromethane		50.0	51.0	ug/L	0.393	2.05	20	
Dibromomethane		50.0	49.5	ug/L	0.177	0.936	20	
Dichlorodifluoromethane		50.0	54.7	ug/L	0.495	9.32	20	
Hexachlorobutadiene		50.0	48.3	ug/L	0.603	3.49	20	
Isopropylbenzene		50.0	51.9	ug/L	1.61	3.78	20	
Methylene Chloride		50.0	48.0	ug/L	0.312	3.94	20	
Methyl Tert Butyl Ether		50.0	48.2	ug/L	0.779	3.63	20	
2-Butanone		50.0	44.7	ug/L	0.133	10.5	20	
4-Methyl-2-Pentanone		50.0	45.5	ug/L	0.106	9.02	20	
n-Butylbenzene		50.0	53.7	ug/L	3.02	7.33	20	
n-Propylbenzene		50.0	49.5	ug/L	3.99	1.03	20	
m-,p-Xylene		100	101	ug/L	0.642	1.21	20	
Naphthalene		50.0	49.4	ug/L	2.39	1.11	20	
o-Xylene		50.0	52.4	ug/L	0.674	4.88	20	
p-Isopropyltoluene		50.0	49.9	ug/L	2.95	0.206	20	
sec-Butylbenzene		50.0	47.8	ug/L	3.52	4.37	20	
Styrene		50.0	49.6	ug/L	1.11	0.828	20	
Trichloroethene		50.0	47.3	ug/L	0.276	5.34	20	
tert-Butylbenzene		50.0	50.4	ug/L	0.620	0.813	20	
Tetrachloroethene		50.0	50.9	ug/L	0.312	1.87	20	
trans-1,2-Dichloroethene		50.0	51.3	ug/L	0.284	2.60	20	
trans-1,3-Dichloropropene		50.0	51.0	ug/L	0.612	1.99	20	
Trichlorofluoromethane		50.0	51.6	ug/L	0.531	3.28	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634167-02

Instrument ID: HPMS6 Run Time: 07:18 Method: 8260B

File ID: 6M150724 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.32	20	
1,2-Dichloropropane	CCC	50.0	53.3	ug/L	0.340	6.61	20	
Chloroform	CCC	50.0	51.6	ug/L	0.550	3.21	20	
Ethylbenzene	CCC	50.0	53.7	ug/L	0.570	7.32	20	
Toluene	CCC	50.0	53.5	ug/L	1.60	7.10	20	
Vinyl Chloride	CCC	50.0	54.0	ug/L	0.281	8.04	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.5	ug/L	0.601	6.93	20	
1,1-Dichloroethane	SPCC	50.0	52.3	ug/L	0.607	4.65	20	
Bromoform	SPCC	50.0	49.9	ug/L	0.230	0.120	20	
Chlorobenzene	SPCC	50.0	50.9	ug/L	1.04	1.89	20	
Chloromethane	SPCC	50.0	50.0	ug/L	0.319	0.0350	20	
Xylenes		150	160	ug/L	0.681	6.52	20	
1,1,1,2-Tetrachloroethane		50.0	53.3	ug/L	0.404	6.58	20	
1,1,1-Trichloroethane		50.0	54.5	ug/L	0.508	8.93	20	
1,1,2-Trichloroethane		50.0	49.6	ug/L	0.290	0.790	20	
1,1-Dichloropropene		50.0	54.9	ug/L	0.415	9.72	20	
1,2,3-Trichlorobenzene		50.0	46.4	ug/L	0.915	7.22	20	
1,2,3-Trichloropropane		50.0	45.9	ug/L	0.179	8.25	20	
1,2,4-Trichlorobenzene		50.0	48.8	ug/L	1.03	2.47	20	
1,2,4-Trimethylbenzene		50.0	52.3	ug/L	2.78	4.64	20	
1,2-Dichloroethane		50.0	51.9	ug/L	0.422	3.76	20	
1,2-Dichlorobenzene		50.0	48.6	ug/L	1.47	2.85	20	
1,2-Dibromo-3-Chloropropane		50.0	45.8	ug/L	0.112	8.31	20	
1,2-Dibromoethane		50.0	51.0	ug/L	0.284	2.08	20	
1,3,5-Trimethylbenzene		50.0	55.2	ug/L	2.70	10.4	20	
1,3-Dichlorobenzene		50.0	51.1	ug/L	1.61	2.23	20	
1,3-Dichloropropane		50.0	49.9	ug/L	0.510	0.220	20	
1,4-Dichlorobenzene		50.0	47.5	ug/L	1.60	5.01	20	
1,4-Dioxane		200	173	ug/L	0.00180	13.5	20	
1-Chlorohexane		50.0	54.1	ug/L	0.498	8.13	20	
2,2-Dichloropropane		50.0	53.1	ug/L	0.477	6.29	20	
2-Hexanone		50.0	44.1	ug/L	0.215	11.8	20	
2-Chlorotoluene		50.0	47.2	ug/L	2.31	5.68	20	
4-Chlorotoluene		50.0	58.2	ug/L	2.47	16.4	20	
Acetone		50.0	46.3	ug/L	0.0726	7.34	20	
Benzene		50.0	52.7	ug/L	1.16	5.44	20	
Bromobenzene		50.0	51.6	ug/L	0.832	3.12	20	
Bromochloromethane		50.0	52.9	ug/L	0.181	5.89	20	
Bromodichloromethane		50.0	53.6	ug/L	0.424	7.26	20	
Bromomethane		50.0	47.7	ug/L	0.162	4.50	20	
Carbon Disulfide		50.0	50.5	ug/L	0.909	0.923	20	
Carbon Tetrachloride		50.0	55.2	ug/L	0.459	10.4	20	

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634167-02

Instrument ID: HPMS6 Run Time: 07:18 Method: 8260B

File ID: 6M150724 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	56.0	ug/L	0.250	11.9	20	
cis-1,2-Dichloroethene		50.0	55.2	ug/L	0.325	10.5	20	
cis-1,3-Dichloropropene		50.0	56.7	ug/L	0.483	13.4	20	
Dibromochloromethane		50.0	53.0	ug/L	0.398	5.96	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.83	20	
Dichlorodifluoromethane		50.0	61.4	ug/L	0.510	22.8	20	*
Hexachlorobutadiene		50.0	48.4	ug/L	0.437	3.13	20	
Isopropylbenzene		50.0	54.4	ug/L	1.72	8.76	20	
Methylene Chloride		50.0	50.2	ug/L	0.299	0.477	20	
Methyl Tert Butyl Ether		50.0	49.7	ug/L	0.683	0.684	20	
2-Butanone		50.0	43.5	ug/L	0.106	13.0	20	
4-Methyl-2-Pentanone		50.0	43.6	ug/L	0.0842	12.8	20	
n-Butylbenzene		50.0	53.5	ug/L	2.57	7.08	20	
n-Propylbenzene		50.0	54.6	ug/L	3.78	9.17	20	
m-,p-Xylene		100	105	ug/L	0.676	5.29	20	
Naphthalene		50.0	48.4	ug/L	2.03	3.26	20	
o-Xylene		50.0	54.5	ug/L	0.686	8.98	20	
p-Isopropyltoluene		50.0	53.8	ug/L	2.86	7.61	20	
sec-Butylbenzene		50.0	52.1	ug/L	3.15	4.29	20	
Styrene		50.0	56.3	ug/L	1.16	12.7	20	
Trichloroethene		50.0	54.1	ug/L	0.307	8.13	20	
tert-Butylbenzene		50.0	52.5	ug/L	0.552	5.00	20	
Tetrachloroethene		50.0	53.1	ug/L	0.417	6.13	20	
trans-1,2-Dichloroethene		50.0	54.5	ug/L	0.293	8.92	20	
trans-1,3-Dichloropropene		50.0	52.9	ug/L	0.554	5.89	20	
Trichlorofluoromethane		50.0	56.7	ug/L	0.547	13.4	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.38	20	
1,2-Dichloropropane	CCC	50.0	52.8	ug/L	0.337	5.56	20	
Chloroform	CCC	50.0	50.6	ug/L	0.539	1.24	20	
Ethylbenzene	CCC	50.0	52.3	ug/L	0.556	4.68	20	
Toluene	CCC	50.0	51.8	ug/L	1.54	3.56	20	
Vinyl Chloride	CCC	50.0	55.3	ug/L	0.288	10.6	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.1	ug/L	0.608	5.74	20	
1,1-Dichloroethane	SPCC	50.0	51.4	ug/L	0.596	2.89	20	
Bromoform	SPCC	50.0	49.2	ug/L	0.226	1.54	20	
Chlorobenzene	SPCC	50.0	49.4	ug/L	1.01	1.21	20	
Chloromethane	SPCC	50.0	52.7	ug/L	0.336	5.30	20	
Xylenes		150	157	ug/L	0.667	4.39	20	
1,1,1,2-Tetrachloroethane		50.0	51.7	ug/L	0.392	3.47	20	
1,1,1-Trichloroethane		50.0	53.7	ug/L	0.501	7.49	20	
1,1,2-Trichloroethane		50.0	48.9	ug/L	0.286	2.27	20	
1,1-Dichloropropene		50.0	54.6	ug/L	0.413	9.27	20	
1,2,3-Trichlorobenzene		50.0	47.8	ug/L	0.943	4.35	20	
1,2,3-Trichloropropane		50.0	46.7	ug/L	0.183	6.54	20	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.0804	20	
1,2,4-Trimethylbenzene		50.0	51.8	ug/L	2.75	3.66	20	
1,2-Dichloroethane		50.0	51.5	ug/L	0.418	2.92	20	
1,2-Dichlorobenzene		50.0	48.4	ug/L	1.46	3.13	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.115	5.49	20	
1,2-Dibromoethane		50.0	50.8	ug/L	0.283	1.58	20	
1,3,5-Trimethylbenzene		50.0	55.1	ug/L	2.70	10.2	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.59	0.979	20	
1,3-Dichloropropane		50.0	49.2	ug/L	0.503	1.62	20	
1,4-Dichlorobenzene		50.0	46.9	ug/L	1.58	6.24	20	
1,4-Dioxane		200	183	ug/L	0.00200	8.35	20	
1-Chlorohexane		50.0	53.0	ug/L	0.488	5.98	20	
2,2-Dichloropropane		50.0	52.8	ug/L	0.474	5.61	20	
2-Hexanone		50.0	45.5	ug/L	0.222	9.06	20	
2-Chlorotoluene		50.0	46.2	ug/L	2.26	7.66	20	
4-Chlorotoluene		50.0	58.1	ug/L	2.47	16.3	20	
Acetone		50.0	49.1	ug/L	0.0770	1.75	20	
Benzene		50.0	51.7	ug/L	1.14	3.33	20	
Bromobenzene		50.0	50.6	ug/L	0.816	1.11	20	
Bromochloromethane		50.0	52.7	ug/L	0.181	5.48	20	
Bromodichloromethane		50.0	52.6	ug/L	0.416	5.21	20	
Bromomethane		50.0	50.0	ug/L	0.170	0.0230	20	
Carbon Disulfide		50.0	48.9	ug/L	0.881	2.27	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.454	9.09	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634168 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	55.9	ug/L	0.249	11.7	20	
cis-1,2-Dichloroethene		50.0	53.8	ug/L	0.317	7.57	20	
cis-1,3-Dichloropropene		50.0	56.3	ug/L	0.480	12.6	20	
Dibromochloromethane		50.0	51.5	ug/L	0.387	3.00	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.75	20	
Dichlorodifluoromethane		50.0	62.9	ug/L	0.523	25.9	20	*
Hexachlorobutadiene		50.0	50.1	ug/L	0.452	0.172	20	
Isopropylbenzene		50.0	54.2	ug/L	1.72	8.38	20	
Methylene Chloride		50.0	50.0	ug/L	0.297	0.0366	20	
Methyl Tert Butyl Ether		50.0	50.8	ug/L	0.699	1.56	20	
2-Butanone		50.0	46.3	ug/L	0.113	7.38	20	
4-Methyl-2-Pentanone		50.0	46.7	ug/L	0.0900	6.69	20	
n-Butylbenzene		50.0	55.2	ug/L	2.65	10.4	20	
n-Propylbenzene		50.0	54.8	ug/L	3.80	9.57	20	
m-,p-Xylene		100	103	ug/L	0.663	3.26	20	
Naphthalene		50.0	49.5	ug/L	2.08	1.07	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.65	20	
p-Isopropyltoluene		50.0	54.8	ug/L	2.91	9.60	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.22	6.75	20	
Styrene		50.0	55.2	ug/L	1.14	10.3	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.62	20	
tert-Butylbenzene		50.0	53.2	ug/L	0.559	6.30	20	
Tetrachloroethene		50.0	52.0	ug/L	0.409	4.09	20	
trans-1,2-Dichloroethene		50.0	54.2	ug/L	0.291	8.35	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	4.10	20	
Trichlorofluoromethane		50.0	57.1	ug/L	0.551	14.1	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634315-02

Instrument ID: HPMS11 Run Time: 13:10 Method: 8260B

File ID: 11M22401 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG634316 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.3	ug/L	0.479	1.47	20	
1,2-Dichloropropane	CCC	50.0	49.1	ug/L	0.341	1.72	20	
Chloroform	CCC	50.0	46.4	ug/L	0.521	7.10	20	
Ethylbenzene	CCC	50.0	50.1	ug/L	0.557	0.239	20	
Toluene	CCC	50.0	46.2	ug/L	1.50	7.70	20	
Vinyl Chloride	CCC	50.0	51.7	ug/L	0.405	3.39	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.0	ug/L	0.897	1.91	20	
1,1-Dichloroethane	SPCC	50.0	47.8	ug/L	0.586	4.38	20	
Bromoform	SPCC	50.0	46.7	ug/L	0.262	6.57	20	
Chlorobenzene	SPCC	50.0	46.2	ug/L	0.968	7.53	20	
Chloromethane	SPCC	50.0	45.0	ug/L	0.377	9.98	20	
Xylenes		150	151	ug/L	0.646	0.426	20	
1,1,1,2-Tetrachloroethane		50.0	48.9	ug/L	0.388	2.23	20	
1,1,1-Trichloroethane		50.0	48.0	ug/L	0.461	4.03	20	
1,1,2-Trichloroethane		50.0	50.5	ug/L	0.337	0.982	20	
1,1-Dichloropropene		50.0	49.5	ug/L	0.389	0.920	20	
1,2,3-Trichlorobenzene		50.0	52.7	ug/L	1.16	5.32	20	
1,2,3-Trichloropropane		50.0	48.1	ug/L	0.248	3.81	20	
1,2,4-Trichlorobenzene		50.0	55.0	ug/L	1.22	10.0	20	
1,2,4-Trimethylbenzene		50.0	47.9	ug/L	2.92	4.27	20	
1,2-Dichloroethane		50.0	46.4	ug/L	0.435	7.16	20	
1,2-Dichlorobenzene		50.0	49.3	ug/L	1.58	1.34	20	
1,2-Dibromo-3-Chloropropane		50.0	51.2	ug/L	0.181	2.40	20	
1,2-Dibromoethane		50.0	50.6	ug/L	0.330	1.18	20	
1,3,5-Trimethylbenzene		50.0	50.3	ug/L	2.84	0.521	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.62	0.338	20	
1,3-Dichloropropane		50.0	47.7	ug/L	0.593	4.58	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.62	5.35	20	
1,4-Dioxane		200	203	ug/L	0.00280	1.68	20	
1-Chlorohexane		50.0	50.4	ug/L	0.487	0.820	20	
2,2-Dichloropropane		50.0	49.9	ug/L	0.475	0.121	20	
2-Hexanone		50.0	48.2	ug/L	0.298	3.63	20	
2-Chlorotoluene		50.0	47.3	ug/L	2.80	5.33	20	
4-Chlorotoluene		50.0	46.8	ug/L	2.23	6.48	20	
Acetone		50.0	45.0	ug/L	0.0856	9.98	20	
Benzene		50.0	45.2	ug/L	1.09	9.69	20	
Bromobenzene		50.0	48.6	ug/L	0.879	2.86	20	
Bromochloromethane		50.0	49.2	ug/L	0.171	1.56	20	
Bromodichloromethane		50.0	49.8	ug/L	0.405	0.321	20	
Bromomethane		50.0	56.1	ug/L	0.236	12.3	20	
Carbon Disulfide		50.0	43.7	ug/L	0.743	12.6	20	
Carbon Tetrachloride		50.0	48.6	ug/L	0.397	2.81	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634315-02

Instrument ID: HPMS11 Run Time: 13:10 Method: 8260B

File ID: 11M22401 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG634316 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	48.7	ug/L	0.260	2.55	20	
cis-1,2-Dichloroethene		50.0	48.6	ug/L	0.309	2.76	20	
cis-1,3-Dichloropropene		50.0	53.6	ug/L	0.484	7.25	20	
Dibromochloromethane		50.0	50.3	ug/L	0.388	0.619	20	
Dibromomethane		50.0	49.1	ug/L	0.176	1.78	20	
Dichlorodifluoromethane		50.0	51.9	ug/L	0.470	3.81	20	
Hexachlorobutadiene		50.0	52.2	ug/L	0.653	4.50	20	
Isopropylbenzene		50.0	51.2	ug/L	1.59	2.49	20	
Methylene Chloride		50.0	46.8	ug/L	0.304	6.42	20	
Methyl Tert Butyl Ether		50.0	48.8	ug/L	0.789	2.44	20	
2-Butanone		50.0	45.8	ug/L	0.136	8.48	20	
4-Methyl-2-Pentanone		50.0	47.0	ug/L	0.109	5.95	20	
n-Butylbenzene		50.0	53.4	ug/L	3.00	6.83	20	
n-Propylbenzene		50.0	49.0	ug/L	3.95	2.08	20	
m-,p-Xylene		100	98.9	ug/L	0.627	1.09	20	
Naphthalene		50.0	51.2	ug/L	2.48	2.45	20	
o-Xylene		50.0	51.7	ug/L	0.665	3.46	20	
p-Isopropyltoluene		50.0	49.7	ug/L	2.94	0.601	20	
sec-Butylbenzene		50.0	47.5	ug/L	3.50	4.93	20	
Styrene		50.0	48.6	ug/L	1.09	2.83	20	
Trichloroethene		50.0	45.2	ug/L	0.263	9.66	20	
tert-Butylbenzene		50.0	51.1	ug/L	0.628	2.23	20	
Tetrachloroethene		50.0	48.8	ug/L	0.299	2.41	20	
trans-1,2-Dichloroethene		50.0	48.4	ug/L	0.268	3.12	20	
trans-1,3-Dichloropropene		50.0	50.3	ug/L	0.603	0.527	20	
Trichlorofluoromethane		50.0	49.1	ug/L	0.505	1.74	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634400 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.38	20	
1,2-Dichloropropane	CCC	50.0	52.8	ug/L	0.337	5.56	20	
Chloroform	CCC	50.0	50.6	ug/L	0.539	1.24	20	
Ethylbenzene	CCC	50.0	52.3	ug/L	0.556	4.68	20	
Toluene	CCC	50.0	51.8	ug/L	1.54	3.56	20	
Vinyl Chloride	CCC	50.0	55.3	ug/L	0.288	10.6	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.1	ug/L	0.608	5.74	20	
1,1-Dichloroethane	SPCC	50.0	51.4	ug/L	0.596	2.89	20	
Bromoform	SPCC	50.0	49.2	ug/L	0.226	1.54	20	
Chlorobenzene	SPCC	50.0	49.4	ug/L	1.01	1.21	20	
Chloromethane	SPCC	50.0	52.7	ug/L	0.336	5.30	20	
Xylenes		150	157	ug/L	0.667	4.39	20	
1,1,1,2-Tetrachloroethane		50.0	51.7	ug/L	0.392	3.47	20	
1,1,1-Trichloroethane		50.0	53.7	ug/L	0.501	7.49	20	
1,1,2-Trichloroethane		50.0	48.9	ug/L	0.286	2.27	20	
1,1-Dichloropropene		50.0	54.6	ug/L	0.413	9.27	20	
1,2,3-Trichlorobenzene		50.0	47.8	ug/L	0.943	4.35	20	
1,2,3-Trichloropropane		50.0	46.7	ug/L	0.183	6.54	20	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.0804	20	
1,2,4-Trimethylbenzene		50.0	51.8	ug/L	2.75	3.66	20	
1,2-Dichloroethane		50.0	51.5	ug/L	0.418	2.92	20	
1,2-Dichlorobenzene		50.0	48.4	ug/L	1.46	3.13	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.115	5.49	20	
1,2-Dibromoethane		50.0	50.8	ug/L	0.283	1.58	20	
1,3,5-Trimethylbenzene		50.0	55.1	ug/L	2.70	10.2	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.59	0.979	20	
1,3-Dichloropropane		50.0	49.2	ug/L	0.503	1.62	20	
1,4-Dichlorobenzene		50.0	46.9	ug/L	1.58	6.24	20	
1,4-Dioxane		200	183	ug/L	0.00200	8.35	20	
1-Chlorohexane		50.0	53.0	ug/L	0.488	5.98	20	
2,2-Dichloropropane		50.0	52.8	ug/L	0.474	5.61	20	
2-Hexanone		50.0	45.5	ug/L	0.222	9.06	20	
2-Chlorotoluene		50.0	46.2	ug/L	2.26	7.66	20	
4-Chlorotoluene		50.0	58.1	ug/L	2.47	16.3	20	
Acetone		50.0	49.1	ug/L	0.0770	1.75	20	
Benzene		50.0	51.7	ug/L	1.14	3.33	20	
Bromobenzene		50.0	50.6	ug/L	0.816	1.11	20	
Bromochloromethane		50.0	52.7	ug/L	0.181	5.48	20	
Bromodichloromethane		50.0	52.6	ug/L	0.416	5.21	20	
Bromomethane		50.0	50.0	ug/L	0.170	0.0230	20	
Carbon Disulfide		50.0	48.9	ug/L	0.881	2.27	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.454	9.09	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100636 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634400 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	55.9	ug/L	0.249	11.7	20	
cis-1,2-Dichloroethene		50.0	53.8	ug/L	0.317	7.57	20	
cis-1,3-Dichloropropene		50.0	56.3	ug/L	0.480	12.6	20	
Dibromochloromethane		50.0	51.5	ug/L	0.387	3.00	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.75	20	
Dichlorodifluoromethane		50.0	62.9	ug/L	0.523	25.9	20	*
Hexachlorobutadiene		50.0	50.1	ug/L	0.452	0.172	20	
Isopropylbenzene		50.0	54.2	ug/L	1.72	8.38	20	
Methylene Chloride		50.0	50.0	ug/L	0.297	0.0366	20	
Methyl Tert Butyl Ether		50.0	50.8	ug/L	0.699	1.56	20	
2-Butanone		50.0	46.3	ug/L	0.113	7.38	20	
4-Methyl-2-Pentanone		50.0	46.7	ug/L	0.0900	6.69	20	
n-Butylbenzene		50.0	55.2	ug/L	2.65	10.4	20	
n-Propylbenzene		50.0	54.8	ug/L	3.80	9.57	20	
m-,p-Xylene		100	103	ug/L	0.663	3.26	20	
Naphthalene		50.0	49.5	ug/L	2.08	1.07	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.65	20	
p-Isopropyltoluene		50.0	54.8	ug/L	2.91	9.60	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.22	6.75	20	
Styrene		50.0	55.2	ug/L	1.14	10.3	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.62	20	
tert-Butylbenzene		50.0	53.2	ug/L	0.559	6.30	20	
Tetrachloroethene		50.0	52.0	ug/L	0.409	4.09	20	
trans-1,2-Dichloroethene		50.0	54.2	ug/L	0.291	8.35	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	4.10	20	
Trichlorofluoromethane		50.0	57.1	ug/L	0.551	14.1	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS11
Workgroup (AAB#): WG633791

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	134803	271293	383066
Upper Limit	NA	NA	269606	542586	766132
Lower Limit	NA	NA	67402	135647	191533
L17100636-10	1.00	01	110612	249584	352286
L17100636-11	1.00	01	123328	255892	360857
L17100636-12	1.00	01	117104	244548	342085
L17100636-14	1.00	01	105664	228910	324511
L17100636-15	1.00	01	101972	230309	321821
L17100636-16	1.00	01	105181	232078	329849
L17100636-17	1.00	01	101262	227819	327679
L17100636-18	1.00	01	106581	232201	338525
L17100636-20	1.00	01	104015	230625	335585
L17100636-21	1.00	01	107845	235426	334780
L17100636-22	1.00	01	102016	226064	319946
L17100636-23	1.00	01	104598	235945	335386
L17100636-27	1.00	01	99701	224542	324811
L17100636-28	1.00	01	98753	225995	328369
L17100636-29	1.00	01	102185	224205	321230
L17100636-30	1.00	01	96845	223316	323086
L17100636-31	1.00	01	106704	229313	323851
WG633791-01	1.00	01	110927	240387	347199
WG633791-02	1.00	01	117136	241822	334747

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5529761
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS6
Workgroup (AAB#): WG634168

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100636-03	1.00	02	279991	519911	699964
L17100636-04	1.00	02	275220	507317	685009
L17100636-06	1.00	02	278445	515363	689502
L17100636-07	1.00	02	277093	504281	677213
L17100636-08	1.00	02	276177	499825	670982
L17100636-09	1.00	02	271132	493638	663243
L17100636-13	1.00	02	270238	495580	668028
L17100636-24	1.00	01	280268	511878	686196
L17100636-25	1.00	01	309120	557288	718386
L17100636-26	1.00	01	306227	549300	720844
WG634168-01	1.00	01	278110	513790	698722
WG634168-02	1.00	01	297801	534454	701958

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5529761
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS11
Workgroup (AAB#): WG634316

ICAL CCV Number: WG619415-07
CAL ID: HPMS11-27-JUN-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG619415-07	NA	NA	170545	337493	473393
Upper Limit	NA	NA	341090	674986	946786
Lower Limit	NA	NA	85273	168747	236697
L17100636-32	1.00	01	106853	231974	329104
L17100636-33	1.00	01	112554	248718	351656
L17100636-34	1.00	01	103919	227602	328184
L17100636-35	1.00	01	99465	224416	319157
L17100636-36	1.00	01	104488	228902	322761
L17100636-37	1.00	01	105425	229045	327067
L17100636-38	1.00	01	108554	239723	337104
L17100636-39	1.00	01	99281	224428	321592
L17100636-40	1.00	01	98398	222741	319417
L17100636-41	1.00	01	118573	237494	330008
L17100636-42	1.00	01	120403	247693	341118
WG634316-01	1.00	01	111685	246254	352785
WG634316-02	1.00	01	124374	253081	355623

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5529761
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS6
Workgroup (AAB#): WG634400

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100636-01	1.00	02	277814	514375	673472
L17100636-02	1.00	02	284652	523200	698893
WG634400-01	1.00	01	280850	519580	704819
WG634400-02	1.00	01	302413	547289	723965
WG634400-03	1.00	01	311370	557303	730931

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5529761
Report generated 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS11
Workgroup (AAB#): WG634316

ICAL CCV Number: WG619415-07
CAL ID: HPMS11-27-JUN-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG619415-07	NA	NA	16.9	14.08	10.45
Upper Limit	NA	NA	17.4	14.58	10.95
Lower Limit	NA	NA	16.4	13.58	9.95
L17100636-32	1.00	01	16.92	14.1	10.46
L17100636-33	1.00	01	16.92	14.1	10.46
L17100636-34	1.00	01	16.92	14.1	10.47
L17100636-35	1.00	01	16.92	14.1	10.46
L17100636-36	1.00	01	16.92	14.1	10.46
L17100636-37	1.00	01	16.92	14.1	10.46
L17100636-38	1.00	01	16.92	14.1	10.46
L17100636-39	1.00	01	16.92	14.1	10.46
L17100636-40	1.00	01	16.92	14.1	10.46
L17100636-41	1.00	01	16.92	14.1	10.46
L17100636-42	1.00	01	16.92	14.1	10.46
WG634316-01	1.00	01	16.92	14.1	10.47
WG634316-02	1.00	01	16.92	14.1	10.46

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5529762
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636

Instrument ID: HPMS6

Workgroup (AAB#): WG634168

ICAL CCV Number: WG633150-08

CAL ID: HPMS6-09-OCT-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100636-03	1.00	02	18.12	15.1	11.22
L17100636-04	1.00	02	18.12	15.1	11.22
L17100636-06	1.00	02	18.12	15.1	11.22
L17100636-07	1.00	02	18.12	15.1	11.22
L17100636-08	1.00	02	18.12	15.09	11.22
L17100636-09	1.00	02	18.12	15.09	11.22
L17100636-13	1.00	02	18.12	15.09	11.21
L17100636-24	1.00	01	18.12	15.09	11.22
L17100636-25	1.00	01	18.12	15.09	11.21
L17100636-26	1.00	01	18.12	15.1	11.22
WG634168-01	1.00	01	18.12	15.1	11.22
WG634168-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5529762

Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS6
Workgroup (AAB#): WG634400

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100636-01	1.00	02	18.12	15.09	11.22
L17100636-02	1.00	02	18.12	15.09	11.22
WG634400-01	1.00	01	18.12	15.09	11.22
WG634400-02	1.00	01	18.12	15.1	11.22
WG634400-03	1.00	01	18.12	15.1	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5529762
Report generated: 10/19/2017 16:26

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100636
Instrument ID: HPMS11
Workgroup (AAB#): WG633791

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100636-10	1.00	01	16.92	14.1	10.47
L17100636-11	1.00	01	16.92	14.1	10.47
L17100636-12	1.00	01	16.92	14.1	10.47
L17100636-14	1.00	01	16.92	14.1	10.47
L17100636-15	1.00	01	16.92	14.1	10.47
L17100636-16	1.00	01	16.92	14.1	10.47
L17100636-17	1.00	01	16.92	14.1	10.47
L17100636-18	1.00	01	16.92	14.1	10.46
L17100636-20	1.00	01	16.92	14.1	10.46
L17100636-21	1.00	01	16.92	14.1	10.47
L17100636-22	1.00	01	16.92	14.1	10.47
L17100636-23	1.00	01	16.92	14.1	10.47
L17100636-27	1.00	01	16.92	14.1	10.47
L17100636-28	1.00	01	16.92	14.1	10.47
L17100636-29	1.00	01	16.92	14.1	10.47
L17100636-30	1.00	01	16.92	14.1	10.47
L17100636-31	1.00	01	16.92	14.1	10.47
WG633791-01	1.00	01	16.92	14.1	10.46
WG633791-02	1.00	01	16.92	14.1	10.47

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5529762
Report generated: 10/19/2017 16:26

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 23, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 23, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17100636 / Revision: 1 / 383 total pages

COC No. A 47722

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz | Contact Phone #: 720-633-2380

Turn Around Requirements: | Location:

Project ID:

Sampler (print): Taylor Redmond | Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
LTM-RBI-LA-26		X	10/9/17	1649	GW	3		3		
MW-204B-LA-26		X	10/7/17	1108	GW	3		3		
MW-205A-LA-26		X	10/7/17	0953	GW	3		3		
MW-205B-LA-26		X	10/7/17	1003	GW	3		3		
MW-203A-LA-26		X	10/7/17	0900	GW	3		3		
MW-210B-LA-26		X	10/7/17	0934	GW	3		3		
MW-197B-LA-26		X	10/7/17	1022	GW	3		3		
MW-210A-LA-26		X	10/7/17	0919	GW	3		3		
PMW21-05-LA-26		X	10/7/17	0831	GW	3		3		
MW-219-LA-26		X	10/7/17	1147	GW	3		3		
PMW-85-05-LA-26		X	10/7/17	1350	GW	3		3		
MW-85-LA-26		X	10/7/17	1338	GW	3		3		
MW-197A-LA-26		X	10/7/17	1053	GW	3		3		
DR-2-4-LA-26		X	10/7/17	1230	GW	3		3		
PMW-85-01-LA-26		X	10/7/17	1110	GW	3		3		
MW-206-LA-26		X	10/7/17	1305	GW	3		3		
DUP-8-LA-26		X	10/7/17	0905	GW	3		3		
MW-204A-LA-26		X	10/7/17	1122	GW	3		3		
MW-219-LA-26-MSD		X	10/7/17	1147	GW	2		2		
MW-219-LA-26-MS		X	10/7/17	1147	GW	2		2		

Microbac OVD
Received: 10/10/2017 11:31
By: BRENDA GREENWALT
221000107280
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1800					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 17:00

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COC No. A 55405

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720-163-2380

Turn Around Requirements:

Location: memphis (project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-88-LA-26		X	10/7/17	1310	GW	3		3		
DR2-2-LA-26		X	10/7/17	1255	GW	3		3		
MW-92-LA-26		X	10/7/17	1630	GW	3		3		
PMW92-03-LA-26	MSD		10/7/17	1611	GW	2		2		
MW-113-LA		X	10/7/17	1534	GW	3		3		
PMW92-02-LA-26		X	10/7/17	1557	GW	3		3		
PMW92-03-LA-26-MS			10/7/17	1611	GW	2		2		
PMW92-03-LA-26		X	10/7/17	1611	GW	2		2		
MW-64-LA-26		X	10/8/17	0900	GW	3		3		
MW-217-LA-26		X	10/8/17	0845	GW	3		3		
MW-26-LA-26		X	10/8/17	0830	GW	3		3		
DUP-4-LA-26		X	10/8/17	0910	GW	3		3		
MW-209B-LA-26		X	10/[illegible]/17	1634	GW	3		3		
MW-200-LA-26		X	10/7/17	1505	GW	3		3		
MW-94A-LA-26		X	10/7/17	1614	GW	3		3		
DUP-5-LA-26		X	10/7/17	1630	GW	3		3		
MW-207[illegible]-LA-26		X	10/7/17	1322	GW	3		3		
MW-208B-LA-26		X	10/7/17	1448	GW	3		3		
MW-206A-LA-26		X	10/7/17	1511	GW	3		3		
MW-208A-LA-26-MS			10/7/17	1410	GW	2		2		

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10/9/17	1600					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 49939

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720-633-2380

Turn Around Requirements:

Location: memphis (project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature:

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-208A-LA-26		X	10/7/17	1410	GW	2		2		
MW-208A-LA-26-MSD			10/7/17	1410	GW	2		2		
MW-39-LA-26		X	10/7/17	1541	GW	3		3		
MW-206B-LA-26		X	10/7/17	1529	GW	3		3		
MW-108-LA-26		X	10/7/17	1356	GW	3		3		
MW-209A-LA-26		X	10/7/17	1646	GW	3		3		
MW-98-LA-26		X	10/7/17	1600	GW	3		3		
MW-218-LA-26		X	10/8/17	0916	GW	3		3		
MW-207A-LA-26		X	10/7/17	1336	GW	3		3		
DR2-6-LA-26		X	10/8/17	0835	GW	3		3		
MW-275-LA-26		X	10/8/17	1530	GW	3		3		
MW-280-LA-26		X	10/8/17	1440	GW	3		3		
MW-269-LA-26		X	10/8/17	1546	GW	3		3		
MW-90-LA-26-MS		X	10/8/17	0908	GW	2		2		
MW-214A-LA-26		X	10/8/17	1347	GW	3		3		
MW-141-LA-26		X	10/8/17	0922	GW	3		3		
MW-276-LA-26		X	10/8/17	1643	GW	3		3		
MW-199B-LA-26		X	10/8/17	0830	GW	3		3		
MW-268-LA-26		X	10/8/17	1432	GW	3		3		
MW-90-LA-26		X	10/8/17	0900	GW	3		3		

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
	10/9/17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

L17100636 / Revision: 1 / 383 total pages

COC No. A 49934

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lyra Lutz

Contact Phone #: [redacted] 633-2380

Turn Around Requirements:

Location: Memphis (Project Site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260 B	TOTAL # (LAB USE)
MW-273-LA-26		X	10/8/17	1612	GW	3		3	
MW-107B-LA-26		X	10/8/17	0942	GW	3		3	
MW-260-LA-26		X	10/8/17	1425	GW	3		3	
MW-215B-LA-26		X	10/8/17	1405	GW	3		3	
MW-264-LA-26		X	10/8/17	1415	GW	3		3	
MW-89-LA-26		X	10/8/17	0858	GW	3		3	
MW-214B-LA-26		X	10/8/17	1336	GW	3		3	
MW-107T-LA-26		X	10/8/17	0942	GW	3		3	
MW-34-LA-26		X	10/8/17	1630	GW	3		3	
MW-90-LA-26-MSD		X	10/8/17	0908	GW	2		2	
MW-199A-LA-26		X	10/8/17	0845	GW	3		3	
MW-63B-LA-26		X	10/8/17	1055	GW	3		3	
MW-50-LA-26		X	10/8/17	1520	GW	3		3	
DUP-12-LA-26		X	10/8/17	1620	GW	3		3	
MW-103-LA-26		X	10/8/17	1036	GW	3		3	
MW-104-LA-26		X	10/8/17	1030	GW	3		3	
MW-281-LA-26		X	10/8/17	1111	GW	3		3	
MW-215A-LA-26		X	10/8/17	1400	GW	3		3	
MW-262-LA-26		X	10/8/17	1031	GW	3		3	
MW-263-LA-26		X	10/8/17	1020	GW	3		3	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 17:00

L17100636 / Revision: 1 / 383 total pages

COC No. A 49937

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lyan Lutz

Contact Phone #: 720-633-1380

Turn Around Requirements:

Location: Memphis (Project) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)
DUP-11-LA-26			10/8/17	1040	GW	3		3	
DUP-9-LA-26			10/8/17	1430	GW	3		3	
MW-140-LA-26			10/8/17	1119	GW	3		3	
MW-258-LA-26			10/8/17	1105	GW	3		3	
MW-265-LA-26			10/8/17	1120	GW	3		3	
MW-278-LA-26			10/8/17	1600	GW	3		3	
MW-254-LA-26			10/8/17	1055	GW	3		3	
MW-282-LA-26			10/8/17	1045	GW	3		3	
LTM-TB3-LA-26			10/9/17	0823	GW	3		3	
MW-267-LA-26			10/8/17	1145	GW	3		3	
MW-256-LA-26			10/8/17	1057	GW	3		3	
MW-202B-LA-26			10/8/17	1230	GW	3		3	
MW-212-LA-26			10/8/17	~~1130~~ TR 1145	GW	3		3	
MW-255-LA-26			10/8/17	~~1225~~ 1235	GW	3		3	
LTM-TB2-LA-26			10/9/17	~~1324~~ TR 1344	GW	3		3	
MW-202A-LA-26			10/8/17	1304	GW	3		3	
DUP-3-LA-26			10/8/17	~~1314~~ TR 1410	MW	3		3	
MW-198-LA-26			10/8/17	1430	GW	3		3	
MW-62-LA-26			10/8/17	1400	GW	3		3	
MW-142-LA-26			10/8/17	1419	GW	3		3	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
	10/9/17	1527					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 17:00

COC No. A 49936

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz | Contact Phone #: 720 633-2380

Turn Around Requirements: | Location: Memphis (proj. site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond | Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-270-LA-26		X	10/9/17	0642	GW	3		3	
MW-272-LA-26		X	10/9/17	0659	GW	3		3	
MW-271-LA-26-MSD		X	10/9/17	0716	GW	3		3	
MW-213-LA-26		X	10/9/17	1630	GW	3		3	
MW-271-LA-26-MS		X	10/9/17	0716	GW	2		2	
LTM-TB1-LA-26		X	10/9/17	1819	GW	3		3	
MW-271-LA-26		X	10/9/17	0716	GW	3		3	

Microbac OVD
Received: 10/10/2017 11:31
By: BRENDA GREENWALT 221000107280
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1800					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 17:00

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7280

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

KBG 10/10/17

pH Exceptions

pH Lot # N/A

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

KBG 10/10/17

PRESERVATIVE EXCEPTIONS

__NONE

__AS NOTED

KBG 10/10/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-01	978810	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-02	978811	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-03	978812	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-04	978813	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-05	978814	

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		

Samplenum	Container ID	Products
L17100636-06	978815	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-07	978816	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-08	978817	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-09	978818	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-10	978819	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-11	978820	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-12	978821	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-13	978822	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-14	978823	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-15	978824	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-16	978825	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-17	978826	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-18	978827	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Samplenum	Container ID	Products
L17100636-19	978828	

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-20	978829	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Samplenum	Container ID	Products
L17100636-21	978830	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-22	978831	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Samplenum	Container ID	Products
L17100636-23	978832	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:39	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-24	978833	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		11-OCT-2017 09:21	BRG		

Samplenum	Container ID	Products
L17100636-25	978834	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Samplenum	Container ID	Products
L17100636-26	978835	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:38	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-27	978836	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-28	978837	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-29	978838	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-30	978839	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-31	978840	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-32	978841	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-33	978842	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-34	978843	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-35	978844	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-36	978845	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-37	978846	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		11-OCT-2017 09:21	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-38	978847	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-39	978848	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-40	978849	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100636
Account: 2694
Project: 2694.011
Samples: 40
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100636-41	978850	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Samplenum	Container ID	Products
L17100636-42	978851	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:37	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100637

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 24 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100637
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: DUP-4-LA-26. 1 of 3 vials received broken. BRG Sample ID: MW-209A-LA-26. 1 of 3 vials received broken. BRG Sample ID: MW-218-LA-26. 1 of 3 vials received broken. BRG	Please proceed with analysis on remaining two vials. ALS
Sample ID: LTM-TB2-LA-26. Time on COC reads: 13:44. Time on labels read: 18:24. BRG	Please log per COC. ALS
Sample ID: MW-203A-LA-26. All 3 vials received w/headspace >6mm. BRG Sample ID: MW-209B-LA-26. 1 of 3 vials received w/headspace >6mm.. BRG Sample ID: MW-208B-LA-26. 1 of 3 vials received w/headspace >6mm. BRG Sample ID: MW-207A-LA-26. 1 of 3 vials received w/headspace >6mm. BRG Sample ID: LTM-TB3-LA-26. All 3 vials received w/headspace >6mm. BRG Sample ID: LTM-TB1-LA-26. 2 of 3 vials received w/headspace >6mm. BRG **Sample ID: DUP-8-LA-26. All 3 vials headspace >6mm. BRG	Client notified, please analyze vials without headspace first when available. ALS **Please proceed per MRT/BRG

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00115199	H	2.0		100189171136000457500078801824576 5	X
00110549	H	1.0		100282601136000457500078801824577 6	X
0019900	H	2.0		100282601136000457500078801824578 7	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	No

7	Were sample labels intact and match COC?	No
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17100637
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-39-LA-26	L17100637-01	10/07/2017 15:41	10/10/2017 11:31
MW-206B-LA-26	L17100637-02	10/07/2017 15:29	10/10/2017 11:31
MW-108-LA-26	L17100637-03	10/07/2017 13:56	10/10/2017 11:31
MW-209A-LA-26	L17100637-04	10/07/2017 16:46	10/10/2017 11:31
MW-98-LA-26	L17100637-05	10/07/2017 16:00	10/10/2017 11:31
MW-218-LA-26	L17100637-06	10/08/2017 09:16	10/10/2017 11:31
MW-207A-LA-26	L17100637-07	10/07/2017 13:36	10/10/2017 11:31
DR2-6-LA-26	L17100637-08	10/08/2017 08:35	10/10/2017 11:31
MW-275-LA-26	L17100637-09	10/08/2017 15:30	10/10/2017 11:31
MW-280-LA-26	L17100637-10	10/08/2017 14:40	10/10/2017 11:31
MW-269-LA-26	L17100637-11	10/08/2017 15:46	10/10/2017 11:31
MW-90-LA-26	L17100637-12	10/08/2017 09:08	10/10/2017 11:31
MW-90-LA-26-MS	L17100637-13	10/08/2017 09:08	10/10/2017 11:31
MW-90-LA-26-MSD	L17100637-14	10/08/2017 09:08	10/10/2017 11:31
MW-214A-LA-26	L17100637-15	10/08/2017 13:47	10/10/2017 11:31
MW-141-LA-26	L17100637-16	10/08/2017 09:22	10/10/2017 11:31
MW-276-LA-26	L17100637-17	10/08/2017 16:43	10/10/2017 11:31
MW-199B-LA-26	L17100637-18	10/08/2017 08:30	10/10/2017 11:31
MW-268-LA-26	L17100637-19	10/08/2017 14:32	10/10/2017 11:31
MW-273-LA-26	L17100637-20	10/08/2017 16:12	10/10/2017 11:31
MW-107B-LA-26	L17100637-21	10/08/2017 09:42	10/10/2017 11:31
MW-260-LA-26	L17100637-22	10/08/2017 14:25	10/10/2017 11:31
MW-215B-LA-26	L17100637-23	10/08/2017 14:05	10/10/2017 11:31
MW-264-LA-26	L17100637-24	10/08/2017 14:15	10/10/2017 11:31
MW-89-LA-26	L17100637-25	10/08/2017 08:58	10/10/2017 11:31
MW-214B-LA-26	L17100637-26	10/08/2017 13:36	10/10/2017 11:31
MW-107T-LA-26	L17100637-27	10/08/2017 09:42	10/10/2017 11:31
MW-34-LA-26	L17100637-28	10/08/2017 16:30	10/10/2017 11:31
MW-199A-LA-26	L17100637-29	10/08/2017 08:45	10/10/2017 11:31
MW-63B-LA-26	L17100637-30	10/08/2017 10:55	10/10/2017 11:31
MW-50-LA-26	L17100637-31	10/08/2017 15:20	10/10/2017 11:31
DUP-12-LA-26	L17100637-32	10/08/2017 16:20	10/10/2017 11:31
MW-103-LA-26	L17100637-33	10/08/2017 10:36	10/10/2017 11:31
MW-104-LA-26	L17100637-34	10/08/2017 10:30	10/10/2017 11:31
MW-281-LA-26	L17100637-35	10/08/2017 11:11	10/10/2017 11:31
MW-215A-LA-26	L17100637-36	10/08/2017 14:00	10/10/2017 11:31
MW-262-LA-26	L17100637-37	10/08/2017 10:31	10/10/2017 11:31

MW-263-LA-26	L17100637-38	10/08/2017 10:20	10/10/2017 11:31
DUP-11-LA-26	L17100637-39	10/08/2017 10:40	10/10/2017 11:31
DUP-9-LA-26	L17100637-40	10/08/2017 14:30	10/10/2017 11:31
MW-140-LA-26	L17100637-41	10/08/2017 11:19	10/10/2017 11:31
MW-258-LA-26	L17100637-42	10/08/2017 11:05	10/10/2017 11:31
MW-265-LA-26	L17100637-43	10/08/2017 11:20	10/10/2017 11:31
MW-278-LA-26	L17100637-44	10/08/2017 16:00	10/10/2017 11:31
MW-254-LA-26	L17100637-45	10/08/2017 10:55	10/10/2017 11:31
MW-282-LA-26	L17100637-46	10/08/2017 10:45	10/10/2017 11:31
LTM-TB3-LA-26	L17100637-47	10/09/2017 08:22	10/10/2017 11:31
MW-267-LA-26	L17100637-48	10/08/2017 11:45	10/10/2017 11:31
MW-256-LA-26	L17100637-49	10/08/2017 10:57	10/10/2017 11:31
MW-202B-LA-26	L17100637-50	10/08/2017 12:30	10/10/2017 11:31
MW-212-LA-26	L17100637-51	10/08/2017 14:45	10/10/2017 11:31
MW-255-LA-26	L17100637-52	10/08/2017 18:25	10/10/2017 11:31
LTM-TB2-LA-26	L17100637-53	10/09/2017 13:44	10/10/2017 11:31
MW-202A-LA-26	L17100637-54	10/08/2017 13:14	10/10/2017 11:31
DUP-3-LA-26	L17100637-55	10/08/2017 14:10	10/10/2017 11:31
MW-198-LA-26	L17100637-56	10/08/2017 14:30	10/10/2017 11:31
MW-62-LA-26	L17100637-57	10/08/2017 14:00	10/10/2017 11:31
MW-142-LA-26	L17100637-58	10/08/2017 14:19	10/10/2017 11:31
MW-270-LA-26	L17100637-59	10/09/2017 06:42	10/10/2017 11:31
MW-272-LA-26	L17100637-60	10/09/2017 06:59	10/10/2017 11:31
MW-271-LA-26	L17100637-61	10/09/2017 07:16	10/10/2017 11:31
MW-271-LA-26-MS	L17100637-62	10/09/2017 07:16	10/10/2017 11:31
MW-271-LA-26-MSD	L17100637-63	10/09/2017 07:16	10/10/2017 11:31
MW-213-LA-26	L17100637-64	10/09/2017 16:30	10/10/2017 11:31
LTM-TB1-LA-26	L17100637-65	10/09/2017 18:19	10/10/2017 11:31

Login Number: L17100637
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was above the UCL for the following analytes: Chloromethane, dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures. Outliers were non detected above the RL in associated analyses.

Continuing Calibration and Tune: Recoveries marginally above the UCL were observed for the following analytes: Dichlorodifluoromethane, 2,2-Dichloropropane, Hexachlorobutadiene. Outliers were not detected above the RLs in the associated analyses. Recoveries marginally below the LCL were observed for the following analytes: Acetone. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: Recoveries above the UCL were observed for the following analytes: 1,1-Dichloroethene, cis-1,2-Dichloroethene, Vinyl Chloride, Dibromofluoromethane, Chloromethane. Outliers were not detected above the RLs in the associated analyses. %RPD exceeded the UCL for Bromomethane and chloroethane in the LCS/LCSdup pair for

WG634505, however all recovery acceptance criteria were met for both compounds. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
WG634436-02	1,1-Dichloroethene	2017-10-18 11:48:00	132	68	130	Recovery
WG634436-02	cis-1,2-Dichloroethene	2017-10-18 11:48:00	127	72	126	Recovery
WG634436-02	Vinyl Chloride	2017-10-18 11:48:00	138	50	134	Recovery
WG634436-02	Dibromofluoromethane	2017-10-18 11:48:00	123	85	115	Recovery
WG634436-03	1,1-Dichloroethene	2017-10-18 12:17:00	136	68	130	Recovery
WG634436-03	Vinyl Chloride	2017-10-18 12:17:00	144	50	134	Recovery
WG634436-03	Dibromofluoromethane	2017-10-18 12:17:00	119	85	115	Recovery
WG634505-02	Chloromethane	2017-10-18 13:33:00	138	56	131	Recovery
WG634505-03	Chloromethane	2017-10-18 14:03:00	133	56	131	Recovery
WG634505-03	Vinyl Chloride	2017-10-18 14:03:00	135	50	134	Recovery

Matrix Spikes: Recoveries out of range were observed for the following analytes: Chloroform. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
L17100637-13	Chloroform	2017-10-18 12:59:00	134	69	128	Recovery

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: LCS/LCS dup in WG634436 yielded recoveries for dibromofluoromethane above the UCL, however all reported samples associated with the QC met all surrogate acceptance criteria.

Other: Sample 64 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130691
Approved By: Anthony Canter

Certificate of Analysis

Sample #:	L17100637-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-39-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:00
Collect Date:	10/07/2017 15:41	**Dilution:**	1	**File ID:**	11M22419
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.83	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.58	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.56		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.62		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-206B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:29
Collect Date:	10/07/2017 15:29	**Dilution:**	1	**File ID:**	11M22420
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.24		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.17	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.69		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-108-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:58
Collect Date:	10/07/2017 13:56	**Dilution:**	1	**File ID:**	11M22421
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.42		1.00	0.125
1,1-Dichloroethene	75-35-4	1.63		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.89		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.369	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.76		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.30		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 15:26
Collect Date:	10/07/2017 16:46	**Dilution:**	1	**File ID:**	11M22456
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.97	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.18		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.507	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-98-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 15:56
Collect Date:	10/07/2017 16:00	**Dilution:**	1	**File ID:**	11M22457
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.65		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.98		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.71		1.00	0.250
Toluene	108-88-3	0.883	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-218-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 06:30
Collect Date:	10/08/2017 09:16	**Dilution:**	1	**File ID:**	6M150770
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.36		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.34		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.552		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.374	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	6.47		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.07		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	2.23		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	98.4	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-207A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 16:26
Collect Date:	10/07/2017 13:36	**Dilution:**	1	**File ID:**	11M22458
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.20		1.00	0.125
1,1-Dichloroethene	75-35-4	1.61		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.58		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.607	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 16:55
Collect Date:	10/08/2017 08:35	**Dilution:**	1	**File ID:**	11M22459
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	15.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.364	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.178	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	48.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.59		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	19.6		1.00	0.250
Toluene	108-88-3	0.586	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	21.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-275-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 17:24
Collect Date:	10/08/2017 15:30	**Dilution:**	1	**File ID:**	11M22460
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.487	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-280-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 17:53
Collect Date:	10/08/2017 14:40	**Dilution:**	1	**File ID:**	11M22461
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.331	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.15		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-269-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 18:22
Collect Date:	10/08/2017 15:46	**Dilution:**	1	**File ID:**	11M22462
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.96		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.88	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.19		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.25		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	70.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 14:57
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22455
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.861	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.788	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.04		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.279	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 12:59
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22451
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.7		1.00	0.250
1,1-Dichloroethane	75-34-3	21.2		1.00	0.125
1,1-Dichloroethene	75-35-4	21.0		1.00	0.500
1,1-Dichloropropene	563-58-6	20.9		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.4		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	21.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.9		1.00	0.250
1,2-Dichloroethane	107-06-2	21.0		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.1		2.00	1.00
1,2-Dichloropropane	78-87-5	21.7		1.00	0.200
1,2-Dibromoethane	106-93-4	22.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.2		1.00	0.250
1,3-Dichloropropane	142-28-9	22.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.7		0.500	0.125
1-Chlorohexane	544-10-5	21.1		1.00	0.125
2,2-Dichloropropane	594-20-7	19.5		1.00	0.250
2-Hexanone	591-78-6	22.4		10.0	2.50
2-Chlorotoluene	95-49-8	21.3		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	25.2		10.0	2.50
Benzene	71-43-2	20.7		0.400	0.125
Bromobenzene	108-86-1	20.5		1.00	0.125
Bromochloromethane	74-97-5	21.3		1.00	0.200
Bromodichloromethane	75-27-4	20.9		0.500	0.250
Bromoform	75-25-2	19.0		1.00	0.500
Bromomethane	74-83-9	23.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.2		1.00	0.500
Carbon tetrachloride	56-23-5	19.9		1.00	0.250
Chlorobenzene	108-90-7	21.1		0.500	0.125
Chloroethane	75-00-3	21.8		1.00	0.500
Chloroform	67-66-3	27.8		0.300	0.125
Chloromethane	74-87-3	22.1		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.6		0.500	0.250
Dibromochloromethane	124-48-1	20.2		0.500	0.250
Dibromomethane	74-95-3	21.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.1		1.00	0.250
Ethylbenzene	100-41-4	21.5		1.00	0.250
Hexachlorobutadiene	87-68-3	17.6		0.600	0.250
Isopropylbenzene	98-82-8	22.0		1.00	0.250
Methylene chloride	75-09-2	20.2		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.1		5.00	0.500
MEK (2-Butanone)	78-93-3	22.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.7		10.0	2.50
n-Butylbenzene	104-51-8	20.6		1.00	0.250
n-Propylbenzene	103-65-1	22.2		1.00	0.125
m-,p-Xylene	179601-23-1	44.2		2.00	0.500
Naphthalene	91-20-3	23.4		1.00	0.200
o-Xylene	95-47-6	22.4		1.00	0.250
p-Isopropyltoluene	99-87-6	20.3		1.00	0.250
sec-Butylbenzene	135-98-8	20.2		1.00	0.250
Styrene	100-42-5	21.6		1.00	0.125
Trichloroethene	79-01-6	22.3		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	31.2		1.00	0.250
Toluene	108-88-3	21.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	18.8		1.00	0.250
Vinyl chloride	75-01-4	22.1		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Sample #:	L17100637-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 13:29
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22452
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.2		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	22.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.2		1.00	0.250
1,1-Dichloroethane	75-34-3	21.9		1.00	0.125
1,1-Dichloroethene	75-35-4	21.6		1.00	0.500
1,1-Dichloropropene	563-58-6	21.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.2		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	22.1		1.00	0.250
1,2-Dichloroethane	107-06-2	21.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.5		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.0		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.7		1.00	0.250
1,3-Dichloropropane	142-28-9	23.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	21.1		0.500	0.125
1-Chlorohexane	544-10-5	21.4		1.00	0.125
2,2-Dichloropropane	594-20-7	19.7		1.00	0.250
2-Hexanone	591-78-6	23.6		10.0	2.50
2-Chlorotoluene	95-49-8	22.1		1.00	0.125
4-Chlorotoluene	106-43-4	21.4		1.00	0.250
Acetone	67-64-1	25.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	21.7		1.00	0.125
Bromochloromethane	74-97-5	21.6		1.00	0.200
Bromodichloromethane	75-27-4	21.7		0.500	0.250
Bromoform	75-25-2	19.1		1.00	0.500
Bromomethane	74-83-9	24.8		1.00	0.500
Carbon disulfide	75-15-0	19.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.5		1.00	0.250
Chlorobenzene	108-90-7	21.6		0.500	0.125
Chloroethane	75-00-3	23.6		1.00	0.500
Chloroform	67-66-3	24.4		0.300	0.125
Chloromethane	74-87-3	22.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.5		0.500	0.250
Dibromochloromethane	124-48-1	21.6		0.500	0.250
Dibromomethane	74-95-3	22.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.4		1.00	0.250
Ethylbenzene	100-41-4	21.6		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	22.4		1.00	0.250
Methylene chloride	75-09-2	21.0		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	22.6		5.00	0.500
MEK (2-Butanone)	78-93-3	23.1		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.7		10.0	2.50
n-Butylbenzene	104-51-8	21.7		1.00	0.250
n-Propylbenzene	103-65-1	22.9		1.00	0.125
m-,p-Xylene	179601-23-1	45.8		2.00	0.500
Naphthalene	91-20-3	24.0		1.00	0.200
o-Xylene	95-47-6	22.6		1.00	0.250
p-Isopropyltoluene	99-87-6	21.1		1.00	0.250
sec-Butylbenzene	135-98-8	21.0		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	22.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.8		1.00	0.250
Tetrachloroethene	127-18-4	31.6		1.00	0.250
Toluene	108-88-3	21.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	22.6		1.00	0.500
Trichlorofluoromethane	75-69-4	19.1		1.00	0.250
Vinyl chloride	75-01-4	21.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

Certificate of Analysis

Sample #:	L17100637-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-214A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 18:52
Collect Date:	10/08/2017 13:47	**Dilution:**	1	**File ID:**	11M22463
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

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Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	0.613	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.83		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.887	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.23		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.25		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-141-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 19:21
Collect Date:	10/08/2017 09:22	**Dilution:**	1	**File ID:**	11M22464
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.518	F	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.86		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	27.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-276-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 19:51
Collect Date:	10/08/2017 16:43	**Dilution:**	1	**File ID:**	11M22465
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.145	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-199B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 20:20
Collect Date:	10/08/2017 08:30	**Dilution:**	1	**File ID:**	11M22466
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.242	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.737	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	51.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.295	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-268-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 20:50
Collect Date:	10/08/2017 14:32	**Dilution:**	1	**File ID:**	11M22467
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-273-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 21:19
Collect Date:	10/08/2017 16:12	**Dilution:**	1	**File ID:**	11M22468
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-107B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 21:49
Collect Date:	10/08/2017 09:42	**Dilution:**	1	**File ID:**	11M22469
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	16.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.562		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.43		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-260-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 04:46
Collect Date:	10/08/2017 14:25	**Dilution:**	1	**File ID:**	6M150848
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.41		1.00	0.125
1,1-Dichloroethene	75-35-4	1.71		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.737		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.607	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.03		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.492	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-215B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 04:17
Collect Date:	10/08/2017 14:05	**Dilution:**	1	**File ID:**	6M150847
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.510	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.54		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.825		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.07	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.45		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.5	81	120	
4-Bromofluorobenzene	99.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-264-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 00:22
Collect Date:	10/08/2017 14:15	**Dilution:**	1	**File ID:**	6M150839
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-89-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 14:40
Collect Date:	10/08/2017 08:58	**Dilution:**	1	**File ID:**	6M150860
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.181	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.784	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.11		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-214B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 12:40
Collect Date:	10/08/2017 13:36	**Dilution:**	1	**File ID:**	8M422273
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.264	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.765	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.46		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.807	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.96		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.10		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.3	85	115	
1,2-Dichloroethane-d4	94.9	72	119	
Toluene-d8	96.6	81	120	
4-Bromofluorobenzene	93.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107T-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 21:09
Collect Date:	10/08/2017 09:42	**Dilution:**	1	**File ID:**	8M422255
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.5	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.607		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.80		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	114	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	99.6	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-34-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 13:09
Collect Date:	10/08/2017 16:30	**Dilution:**	1	**File ID:**	8M422274
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.62	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.525	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.33		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.95		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.16		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	94.1	85	115	
1,2-Dichloroethane-d4	94.9	72	119	
Toluene-d8	95.5	81	120	
4-Bromofluorobenzene	92.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-199A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 13:40
Collect Date:	10/08/2017 08:45	**Dilution:**	1	**File ID:**	8M422275
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.07	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.08		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.0	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	97.0	81	120	
4-Bromofluorobenzene	93.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-63B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 14:09
Collect Date:	10/08/2017 10:55	**Dilution:**	1	**File ID:**	8M422276
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.17		1.00	0.125
1,1-Dichloroethene	75-35-4	0.736	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.549		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.358	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.23		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	91.8	85	115	
1,2-Dichloroethane-d4	91.2	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	94.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-50-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 14:38
Collect Date:	10/08/2017 15:20	**Dilution:**	1	**File ID:**	8M422277
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.854	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.12		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.27		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.7	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	94.4	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-12-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 15:08
Collect Date:	10/08/2017 16:20	**Dilution:**	1	**File ID:**	8M422278
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.436	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.1	85	115	
1,2-Dichloroethane-d4	95.4	72	119	
Toluene-d8	97.2	81	120	
4-Bromofluorobenzene	93.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-103-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 05:16
Collect Date:	10/08/2017 10:36	**Dilution:**	1	**File ID:**	6M150849
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	2.22		1.00	0.125
1,1-Dichloroethene	75-35-4	2.60		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	5.58		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.418	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.257	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-104-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 15:38
Collect Date:	10/08/2017 10:30	**Dilution:**	1	**File ID:**	8M422279
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.41		1.00	0.125
1,1-Dichloroethene	75-35-4	3.79		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.495		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.881	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	97.8	81	120	
4-Bromofluorobenzene	96.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-281-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 01:21
Collect Date:	10/08/2017 11:11	**Dilution:**	1	**File ID:**	6M150841
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.584	F	1.00	0.125
1,1-Dichloroethene	75-35-4	3.78		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.91		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.12		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.14	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	66.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-215A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 17:42
Collect Date:	10/08/2017 14:00	**Dilution:**	1	**File ID:**	8M422248
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.06		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.03	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.29		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.23		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	113	85	115	
1,2-Dichloroethane-d4	111	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-262-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 18:11
Collect Date:	10/08/2017 10:31	**Dilution:**	1	**File ID:**	8M422249
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.0	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	109	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	96.0	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-263-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 02:19
Collect Date:	10/08/2017 10:20	**Dilution:**	1	**File ID:**	6M150843
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	2.23		1.00	0.125
1,1-Dichloroethene	75-35-4	12.8		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.386	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.29		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	8.99		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.78		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-11-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 18:40
Collect Date:	10/08/2017 10:40	**Dilution:**	1	**File ID:**	8M422250
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.2	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-9-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 19:11
Collect Date:	10/08/2017 14:30	**Dilution:**	1	**File ID:**	8M422251
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.222	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.50	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.734	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.48		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.13	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.90		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	113	85	115	
1,2-Dichloroethane-d4	113	72	119	
Toluene-d8	95.7	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-140-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 03:18
Collect Date:	10/08/2017 11:19	**Dilution:**	1	**File ID:**	6M150845
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.302	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.185	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.12		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-258-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 01:50
Collect Date:	10/08/2017 11:05	**Dilution:**	1	**File ID:**	6M150842
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.419	F	1.00	0.125
1,1-Dichloroethene	75-35-4	2.92		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.97		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.96		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.32		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	55.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-265-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 02:49
Collect Date:	10/08/2017 11:20	**Dilution:**	1	**File ID:**	6M150844
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.35	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	7.36		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.266	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.82	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.42		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-278-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 00:52
Collect Date:	10/08/2017 16:00	**Dilution:**	1	**File ID:**	6M150840
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.31		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.27	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.971	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.94		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.26		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-254-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 16:01
Collect Date:	10/08/2017 10:55	**Dilution:**	1	**File ID:**	6M150784
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.02	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.26		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.277	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.359	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.22		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.83		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-282-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 15:31
Collect Date:	10/08/2017 10:45	**Dilution:**	1	**File ID:**	6M150783
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.66	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	97.6	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 15:02
Collect Date:	10/09/2017 08:22	**Dilution:**	1	**File ID:**	6M150782
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	97.9	81	120	
4-Bromofluorobenzene	101	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-267-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 19:41
Collect Date:	10/08/2017 11:45	**Dilution:**	1	**File ID:**	11M22502
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.854		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.13		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	21.3		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.581		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.361	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	16.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	37.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-256-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 20:10
Collect Date:	10/08/2017 10:57	**Dilution:**	1	**File ID:**	11M22503
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.628	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.611	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.627	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.46		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-50	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-202B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 20:39
Collect Date:	10/08/2017 12:30	**Dilution:**	1	**File ID:**	11M22504
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.458	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.392		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.37		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	36.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-51	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-212-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 21:08
Collect Date:	10/08/2017 14:45	**Dilution:**	1	**File ID:**	11M22505
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	40.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.64		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-52	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-255-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 21:38
Collect Date:	10/08/2017 18:25	**Dilution:**	1	**File ID:**	11M22506
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.665	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.335	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-53	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	LTM-TB2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 18:12
Collect Date:	10/09/2017 13:44	**Dilution:**	1	**File ID:**	11M22499
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-54	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-202A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 03:47
Collect Date:	10/08/2017 13:14	**Dilution:**	1	**File ID:**	6M150846
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.187	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.903	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.00		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-55	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 22:07
Collect Date:	10/08/2017 14:10	**Dilution:**	1	**File ID:**	11M22507
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.559	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.290	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.290	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	10.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	15.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-56	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-198-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 22:36
Collect Date:	10/08/2017 14:30	**Dilution:**	1	**File ID:**	11M22508
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.16	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-57	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-62-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 23:06
Collect Date:	10/08/2017 14:00	**Dilution:**	1	**File ID:**	11M22509
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.303	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.278	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	10.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	15.3		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-58	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-142-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 23:35
Collect Date:	10/08/2017 14:19	**Dilution:**	1	**File ID:**	11M22510
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.539	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.24		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	99.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-59	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-270-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 00:04
Collect Date:	10/09/2017 06:42	**Dilution:**	1	**File ID:**	11M22511
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.186	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	25.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.254	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.920	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-60	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-272-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 00:33
Collect Date:	10/09/2017 06:59	**Dilution:**	1	**File ID:**	11M22512
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.72	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8	4.69		1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-61	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 19:11
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22501
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.99	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.84		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-62	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 16:45
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22496
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.9		0.500	0.250
1,1,1-Trichloroethane	71-55-6	17.0		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.1		1.00	0.250
1,1-Dichloroethane	75-34-3	19.1		1.00	0.125
1,1-Dichloroethene	75-35-4	16.8		1.00	0.500
1,1-Dichloropropene	563-58-6	17.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.9		1.00	0.250
1,2-Dichloroethane	107-06-2	20.6		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	21.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.3		1.00	0.250
1,3-Dichloropropane	142-28-9	21.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	18.0		1.00	0.125
2,2-Dichloropropane	594-20-7	17.0	Q	1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	19.3		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	29.0		10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	19.6		1.00	0.125
Bromochloromethane	74-97-5	20.5		1.00	0.200
Bromodichloromethane	75-27-4	20.2		0.500	0.250
Bromoform	75-25-2	17.9		1.00	0.500
Bromomethane	74-83-9	20.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.8		1.00	0.500
Carbon tetrachloride	56-23-5	16.0		1.00	0.250
Chlorobenzene	108-90-7	19.6		0.500	0.125
Chloroethane	75-00-3	19.5		1.00	0.500
Chloroform	67-66-3	19.6		0.300	0.125
Chloromethane	74-87-3	19.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.1		0.500	0.250
Dibromochloromethane	124-48-1	19.8		0.500	0.250
Dibromomethane	74-95-3	21.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	18.1		1.00	0.250
Ethylbenzene	100-41-4	18.8		1.00	0.250
Hexachlorobutadiene	87-68-3	17.3		0.600	0.250
Isopropylbenzene	98-82-8	19.2		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.8		10.0	2.50
n-Butylbenzene	104-51-8	19.3		1.00	0.250
n-Propylbenzene	103-65-1	19.8		1.00	0.125
m-,p-Xylene	179601-23-1	39.8		2.00	0.500
Naphthalene	91-20-3	23.8		1.00	0.200
o-Xylene	95-47-6	20.5		1.00	0.250
p-Isopropyltoluene	99-87-6	18.5		1.00	0.250
sec-Butylbenzene	135-98-8	17.8		1.00	0.250
Styrene	100-42-5	20.2		1.00	0.125
Trichloroethene	79-01-6	21.0		1.00	0.250
tert-Butylbenzene	98-06-6	17.5		1.00	0.250
Tetrachloroethene	127-18-4	16.8		1.00	0.250
Toluene	108-88-3	18.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.4		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.9		1.00	0.500
Trichlorofluoromethane	75-69-4	15.3		1.00	0.250
Vinyl chloride	75-01-4	21.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100637-63	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 17:14
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22497
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.6		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	20.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.5		1.00	0.250
1,2-Dichloroethane	107-06-2	20.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.1		2.00	1.00
1,2-Dichloropropane	78-87-5	20.9		1.00	0.200
1,2-Dibromoethane	106-93-4	20.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.1		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.5		0.500	0.125
1-Chlorohexane	544-10-5	21.7		1.00	0.125
2,2-Dichloropropane	594-20-7	19.1	Q	1.00	0.250
2-Hexanone	591-78-6	21.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	21.0		1.00	0.250
Acetone	67-64-1	27.1		10.0	2.50
Benzene	71-43-2	20.2		0.400	0.125
Bromobenzene	108-86-1	19.4		1.00	0.125
Bromochloromethane	74-97-5	20.3		1.00	0.200
Bromodichloromethane	75-27-4	20.4		0.500	0.250
Bromoform	75-25-2	17.4		1.00	0.500
Bromomethane	74-83-9	22.2		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.0		1.00	0.250
Chlorobenzene	108-90-7	20.1		0.500	0.125
Chloroethane	75-00-3	21.0		1.00	0.500
Chloroform	67-66-3	20.3		0.300	0.125
Chloromethane	74-87-3	20.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.0		0.500	0.250
Dibromochloromethane	124-48-1	19.6		0.500	0.250
Dibromomethane	74-95-3	20.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.5		1.00	0.250
Ethylbenzene	100-41-4	20.5		1.00	0.250
Hexachlorobutadiene	87-68-3	19.6		0.600	0.250
Isopropylbenzene	98-82-8	21.4		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.5		5.00	0.500
MEK (2-Butanone)	78-93-3	21.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.2		10.0	2.50
n-Butylbenzene	104-51-8	21.3		1.00	0.250
n-Propylbenzene	103-65-1	21.5		1.00	0.125
m-,p-Xylene	179601-23-1	42.6		2.00	0.500
Naphthalene	91-20-3	23.2		1.00	0.200
o-Xylene	95-47-6	21.6		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	20.0		1.00	0.250
Styrene	100-42-5	20.7		1.00	0.125
Trichloroethene	79-01-6	22.1		1.00	0.250
tert-Butylbenzene	98-06-6	19.7		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	20.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.7		1.00	0.500
Trichlorofluoromethane	75-69-4	18.1		1.00	0.250
Vinyl chloride	75-01-4	23.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100637-64	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-213-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 01:02
Collect Date:	10/09/2017 16:30	**Dilution:**	5	**File ID:**	11M22513
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		Q	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1	32.1	F	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	7.46		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3	33.1	F	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	13.1		5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4		U	5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-65	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	LTM-TB1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 18:41
Collect Date:	10/09/2017 18:19	**Dilution:**	1	**File ID:**	11M22500
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100637
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: The percent difference was above the UCL for the following analytes: Chloromethane, dichlorodifluoromethane. Please see the applicable QC report for a detailed presentation of the failures. Outliers were non detected above the RL in associated analyses.

Continuing Calibration and Tune: Recoveries marginally above the UCL were observed for the following analytes: Dichlorodifluoromethane, 2,2-Dichloropropane, Hexachlorobutadiene. Outliers were not detected above the RLs in the associated analyses. Recoveries marginally below the LCL were observed for the following analytes: Acetone. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: Recoveries above the UCL were observed for the following analytes: 1,1-Dichloroethene, cis-1,2-Dichloroethene, Vinyl Chloride, Dibromofluoromethane, Chloromethane. Outliers were not detected above the RLs in the associated analyses. %RPD exceeded the UCL for Bromomethane and chloroethane in the LCS/LCSdup pair for

WG634505, however all recovery acceptance criteria were met for both compounds. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
WG634436-02	1,1-Dichloroethene	2017-10-18 11:48:00	132	68	130	Recovery
WG634436-02	cis-1,2-Dichloroethene	2017-10-18 11:48:00	127	72	126	Recovery
WG634436-02	Vinyl Chloride	2017-10-18 11:48:00	138	50	134	Recovery
WG634436-02	Dibromofluoromethane	2017-10-18 11:48:00	123	85	115	Recovery
WG634436-03	1,1-Dichloroethene	2017-10-18 12:17:00	136	68	130	Recovery
WG634436-03	Vinyl Chloride	2017-10-18 12:17:00	144	50	134	Recovery
WG634436-03	Dibromofluoromethane	2017-10-18 12:17:00	119	85	115	Recovery
WG634505-02	Chloromethane	2017-10-18 13:33:00	138	56	131	Recovery
WG634505-03	Chloromethane	2017-10-18 14:03:00	133	56	131	Recovery
WG634505-03	Vinyl Chloride	2017-10-18 14:03:00	135	50	134	Recovery

Matrix Spikes: Recoveries out of range were observed for the following analytes: Chloroform. Please see the applicable QC report for a detailed presentation of the failures.

Sample #	Analyte	Date	Result	Lower	Upper	Type
L17100637-13	Chloroform	2017-10-18 12:59:00	134	69	128	Recovery

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: LCS/LCS dup in WG634436 yielded recoveries for dibromofluoromethane above the UCL, however all reported samples associated with the QC met all surrogate acceptance criteria.

Other: Sample 64 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130691
Approved By: Anthony Canter

Certificate of Analysis

Certificate of Analysis

Sample #:	L17100637-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-39-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:00
Collect Date:	10/07/2017 15:41	**Dilution:**	1	**File ID:**	11M22419
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.83	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.58	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.56		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.62		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-206B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:29
Collect Date:	10/07/2017 15:29	**Dilution:**	1	**File ID:**	11M22420
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.24		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.17	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.69		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-108-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	06/27/2017 11:36
Workgroup #:	WG634316	**Analyst:**	ADC	**Run Date:**	10/17/2017 22:58
Collect Date:	10/07/2017 13:56	**Dilution:**	1	**File ID:**	11M22421
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.42		1.00	0.125
1,1-Dichloroethene	75-35-4	1.63		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.89		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.369	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	9.76		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.30		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-209A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 15:26
Collect Date:	10/07/2017 16:46	**Dilution:**	1	**File ID:**	11M22456
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.97	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.53	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.18		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.507	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-98-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 15:56
Collect Date:	10/07/2017 16:00	**Dilution:**	1	**File ID:**	11M22457
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.65		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.98		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.71		1.00	0.250
Toluene	108-88-3	0.883	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-218-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634400	**Analyst:**	JDS	**Run Date:**	10/18/2017 06:30
Collect Date:	10/08/2017 09:16	**Dilution:**	1	**File ID:**	6M150770
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.36		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.34		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.552		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.374	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	6.47		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.07		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	17.6		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	2.23		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	98.4	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-207A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 16:26
Collect Date:	10/07/2017 13:36	**Dilution:**	1	**File ID:**	11M22458
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.20		1.00	0.125
1,1-Dichloroethene	75-35-4	1.61		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.58		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.607	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	10.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-6-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 16:55
Collect Date:	10/08/2017 08:35	**Dilution:**	1	**File ID:**	11M22459
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4	15.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.364	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7	0.178	F	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	48.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.59		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	19.6		1.00	0.250
Toluene	108-88-3	0.586	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	21.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-275-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 17:24
Collect Date:	10/08/2017 15:30	**Dilution:**	1	**File ID:**	11M22460
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.487	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-280-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 17:53
Collect Date:	10/08/2017 14:40	**Dilution:**	1	**File ID:**	11M22461
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.331	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.15		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-269-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 18:22
Collect Date:	10/08/2017 15:46	**Dilution:**	1	**File ID:**	11M22462
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.96		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.88	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	5.19		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.25		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	70.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 14:57
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22455
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.861	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.788	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.04		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.279	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 12:59
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22451
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.4		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.7		1.00	0.250
1,1-Dichloroethane	75-34-3	21.2		1.00	0.125
1,1-Dichloroethene	75-35-4	21.0		1.00	0.500
1,1-Dichloropropene	563-58-6	20.9		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.4		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	21.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.9		1.00	0.250
1,2-Dichloroethane	107-06-2	21.0		0.500	0.250
1,2-Dichlorobenzene	95-50-1	21.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.1		2.00	1.00
1,2-Dichloropropane	78-87-5	21.7		1.00	0.200
1,2-Dibromoethane	106-93-4	22.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.2		1.00	0.250
1,3-Dichloropropane	142-28-9	22.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.7		0.500	0.125
1-Chlorohexane	544-10-5	21.1		1.00	0.125
2,2-Dichloropropane	594-20-7	19.5		1.00	0.250
2-Hexanone	591-78-6	22.4		10.0	2.50
2-Chlorotoluene	95-49-8	21.3		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	25.2		10.0	2.50
Benzene	71-43-2	20.7		0.400	0.125
Bromobenzene	108-86-1	20.5		1.00	0.125
Bromochloromethane	74-97-5	21.3		1.00	0.200
Bromodichloromethane	75-27-4	20.9		0.500	0.250
Bromoform	75-25-2	19.0		1.00	0.500
Bromomethane	74-83-9	23.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.2		1.00	0.500
Carbon tetrachloride	56-23-5	19.9		1.00	0.250
Chlorobenzene	108-90-7	21.1		0.500	0.125
Chloroethane	75-00-3	21.8		1.00	0.500
Chloroform	67-66-3	27.8		0.300	0.125
Chloromethane	74-87-3	22.1		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.6		0.500	0.250
Dibromochloromethane	124-48-1	20.2		0.500	0.250
Dibromomethane	74-95-3	21.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.1		1.00	0.250
Ethylbenzene	100-41-4	21.5		1.00	0.250
Hexachlorobutadiene	87-68-3	17.6		0.600	0.250
Isopropylbenzene	98-82-8	22.0		1.00	0.250
Methylene chloride	75-09-2	20.2		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.1		5.00	0.500
MEK (2-Butanone)	78-93-3	22.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.7		10.0	2.50
n-Butylbenzene	104-51-8	20.6		1.00	0.250
n-Propylbenzene	103-65-1	22.2		1.00	0.125
m-,p-Xylene	179601-23-1	44.2		2.00	0.500
Naphthalene	91-20-3	23.4		1.00	0.200
o-Xylene	95-47-6	22.4		1.00	0.250
p-Isopropyltoluene	99-87-6	20.3		1.00	0.250
sec-Butylbenzene	135-98-8	20.2		1.00	0.250
Styrene	100-42-5	21.6		1.00	0.125
Trichloroethene	79-01-6	22.3		1.00	0.250
tert-Butylbenzene	98-06-6	20.5		1.00	0.250
Tetrachloroethene	127-18-4	31.2		1.00	0.250
Toluene	108-88-3	21.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	21.9		1.00	0.500
Trichlorofluoromethane	75-69-4	18.8		1.00	0.250
Vinyl chloride	75-01-4	22.1		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Sample #:	L17100637-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-90-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 13:29
Collect Date:	10/08/2017 09:08	**Dilution:**	1	**File ID:**	11M22452
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	21.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.2		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	22.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	22.2		1.00	0.250
1,1-Dichloroethane	75-34-3	21.9		1.00	0.125
1,1-Dichloroethene	75-35-4	21.6		1.00	0.500
1,1-Dichloropropene	563-58-6	21.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.2		1.00	0.150
1,2,3-Trichloropropane	96-18-4	23.4		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	22.1		1.00	0.250
1,2-Dichloroethane	107-06-2	21.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	22.5		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.0		2.00	1.00
1,2-Dichloropropane	78-87-5	22.1		1.00	0.200
1,2-Dibromoethane	106-93-4	22.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	22.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	21.7		1.00	0.250
1,3-Dichloropropane	142-28-9	23.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	21.1		0.500	0.125
1-Chlorohexane	544-10-5	21.4		1.00	0.125
2,2-Dichloropropane	594-20-7	19.7		1.00	0.250
2-Hexanone	591-78-6	23.6		10.0	2.50
2-Chlorotoluene	95-49-8	22.1		1.00	0.125
4-Chlorotoluene	106-43-4	21.4		1.00	0.250
Acetone	67-64-1	25.5		10.0	2.50
Benzene	71-43-2	21.4		0.400	0.125
Bromobenzene	108-86-1	21.7		1.00	0.125
Bromochloromethane	74-97-5	21.6		1.00	0.200
Bromodichloromethane	75-27-4	21.7		0.500	0.250
Bromoform	75-25-2	19.1		1.00	0.500
Bromomethane	74-83-9	24.8		1.00	0.500
Carbon disulfide	75-15-0	19.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	20.5		1.00	0.250
Chlorobenzene	108-90-7	21.6		0.500	0.125
Chloroethane	75-00-3	23.6		1.00	0.500
Chloroform	67-66-3	24.4		0.300	0.125
Chloromethane	74-87-3	22.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	24.5		0.500	0.250
Dibromochloromethane	124-48-1	21.6		0.500	0.250
Dibromomethane	74-95-3	22.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.4		1.00	0.250
Ethylbenzene	100-41-4	21.6		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	22.4		1.00	0.250
Methylene chloride	75-09-2	21.0		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	22.6		5.00	0.500
MEK (2-Butanone)	78-93-3	23.1		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.7		10.0	2.50
n-Butylbenzene	104-51-8	21.7		1.00	0.250
n-Propylbenzene	103-65-1	22.9		1.00	0.125
m-,p-Xylene	179601-23-1	45.8		2.00	0.500
Naphthalene	91-20-3	24.0		1.00	0.200
o-Xylene	95-47-6	22.6		1.00	0.250
p-Isopropyltoluene	99-87-6	21.1		1.00	0.250
sec-Butylbenzene	135-98-8	21.0		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	22.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.8		1.00	0.250
Tetrachloroethene	127-18-4	31.6		1.00	0.250
Toluene	108-88-3	21.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	21.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	22.6		1.00	0.500
Trichlorofluoromethane	75-69-4	19.1		1.00	0.250
Vinyl chloride	75-01-4	21.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

Certificate of Analysis

Sample #:	L17100637-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-214A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 18:52
Collect Date:	10/08/2017 13:47	**Dilution:**	1	**File ID:**	11M22463
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

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Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	0.613	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.83		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.887	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.23		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.25		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-141-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 19:21
Collect Date:	10/08/2017 09:22	**Dilution:**	1	**File ID:**	11M22464
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.518	F	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.86		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	27.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-276-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 19:51
Collect Date:	10/08/2017 16:43	**Dilution:**	1	**File ID:**	11M22465
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.145	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-199B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 20:20
Collect Date:	10/08/2017 08:30	**Dilution:**	1	**File ID:**	11M22466
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.242	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.737	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	51.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.295	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-268-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 20:50
Collect Date:	10/08/2017 14:32	**Dilution:**	1	**File ID:**	11M22467
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-273-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 21:19
Collect Date:	10/08/2017 16:12	**Dilution:**	1	**File ID:**	11M22468
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-107B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634456	**Analyst:**	HRF/TMB	**Run Date:**	10/18/2017 21:49
Collect Date:	10/08/2017 09:42	**Dilution:**	1	**File ID:**	11M22469
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	16.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.562		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.43		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-260-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 04:46
Collect Date:	10/08/2017 14:25	**Dilution:**	1	**File ID:**	6M150848
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.41		1.00	0.125
1,1-Dichloroethene	75-35-4	1.71		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.737		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.607	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.03		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.492	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-215B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 04:17
Collect Date:	10/08/2017 14:05	**Dilution:**	1	**File ID:**	6M150847
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	0.510	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.54		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.825		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.07	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.45		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.5	81	120	
4-Bromofluorobenzene	99.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-264-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 00:22
Collect Date:	10/08/2017 14:15	**Dilution:**	1	**File ID:**	6M150839
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-89-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 14:40
Collect Date:	10/08/2017 08:58	**Dilution:**	1	**File ID:**	6M150860
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.181	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.784	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.11		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-214B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 12:40
Collect Date:	10/08/2017 13:36	**Dilution:**	1	**File ID:**	8M422273
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.264	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.49	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.765	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.46		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.807	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.96		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.10		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.3	85	115	
1,2-Dichloroethane-d4	94.9	72	119	
Toluene-d8	96.6	81	120	
4-Bromofluorobenzene	93.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-107T-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 21:09
Collect Date:	10/08/2017 09:42	**Dilution:**	1	**File ID:**	8M422255
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.5	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.607		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.80		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	114	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	99.6	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-34-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 13:09
Collect Date:	10/08/2017 16:30	**Dilution:**	1	**File ID:**	8M422274
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.62	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.525	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.33		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.95		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.16		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	94.1	85	115	
1,2-Dichloroethane-d4	94.9	72	119	
Toluene-d8	95.5	81	120	
4-Bromofluorobenzene	92.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-199A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 13:40
Collect Date:	10/08/2017 08:45	**Dilution:**	1	**File ID:**	8M422275
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	4.07	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.08		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.0	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	97.0	81	120	
4-Bromofluorobenzene	93.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-63B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 14:09
Collect Date:	10/08/2017 10:55	**Dilution:**	1	**File ID:**	8M422276
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.17		1.00	0.125
1,1-Dichloroethene	75-35-4	0.736	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.549		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.358	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.23		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.12		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	91.8	85	115	
1,2-Dichloroethane-d4	91.2	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	94.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-50-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 14:38
Collect Date:	10/08/2017 15:20	**Dilution:**	1	**File ID:**	8M422277
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.854	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.12		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.27		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.7	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	94.4	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-12-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 15:08
Collect Date:	10/08/2017 16:20	**Dilution:**	1	**File ID:**	8M422278
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.436	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.1	85	115	
1,2-Dichloroethane-d4	95.4	72	119	
Toluene-d8	97.2	81	120	
4-Bromofluorobenzene	93.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-103-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 05:16
Collect Date:	10/08/2017 10:36	**Dilution:**	1	**File ID:**	6M150849
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	2.22		1.00	0.125
1,1-Dichloroethene	75-35-4	2.60		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	5.58		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.418	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.257	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-104-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634606	**Analyst:**	TMB	**Run Date:**	10/19/2017 15:38
Collect Date:	10/08/2017 10:30	**Dilution:**	1	**File ID:**	8M422279
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	1.41		1.00	0.125
1,1-Dichloroethene	75-35-4	3.79		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.495		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.881	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		Q	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	19.3		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	97.8	81	120	
4-Bromofluorobenzene	96.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-281-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 01:21
Collect Date:	10/08/2017 11:11	**Dilution:**	1	**File ID:**	6M150841
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.584	F	1.00	0.125
1,1-Dichloroethene	75-35-4	3.78		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.91		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.12		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.14	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	66.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	15.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-215A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 17:42
Collect Date:	10/08/2017 14:00	**Dilution:**	1	**File ID:**	8M422248
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.06		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.03	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.29		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	5.23		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	113	85	115	
1,2-Dichloroethane-d4	111	72	119	
Toluene-d8	96.8	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-262-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 18:11
Collect Date:	10/08/2017 10:31	**Dilution:**	1	**File ID:**	8M422249
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.0	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	109	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	96.0	81	120	
4-Bromofluorobenzene	102	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-263-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 02:19
Collect Date:	10/08/2017 10:20	**Dilution:**	1	**File ID:**	6M150843
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	2.23		1.00	0.125
1,1-Dichloroethene	75-35-4	12.8		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.386	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.74	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.87		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.29		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	8.99		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.8		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.78		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-11-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 18:40
Collect Date:	10/08/2017 10:40	**Dilution:**	1	**File ID:**	8M422250
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.2	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	96.1	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-9-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/17/2017 19:44
Workgroup #:	WG634436	**Analyst:**	TMB	**Run Date:**	10/18/2017 19:11
Collect Date:	10/08/2017 14:30	**Dilution:**	1	**File ID:**	8M422251
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.222	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.50	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.734	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.48		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.13	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.43		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.90		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	113	85	115	
1,2-Dichloroethane-d4	113	72	119	
Toluene-d8	95.7	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-140-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 03:18
Collect Date:	10/08/2017 11:19	**Dilution:**	1	**File ID:**	6M150845
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.302	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.185	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.12		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	11.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-258-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 01:50
Collect Date:	10/08/2017 11:05	**Dilution:**	1	**File ID:**	6M150842
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.419	F	1.00	0.125
1,1-Dichloroethene	75-35-4	2.92		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.97		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.96		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	7.32		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	55.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.4		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-265-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 02:49
Collect Date:	10/08/2017 11:20	**Dilution:**	1	**File ID:**	6M150844
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.35	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	7.36		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.266	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.82	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	8.42		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-278-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 00:52
Collect Date:	10/08/2017 16:00	**Dilution:**	1	**File ID:**	6M150840
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.31		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.27	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.971	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.94		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.26		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-254-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 16:01
Collect Date:	10/08/2017 10:55	**Dilution:**	1	**File ID:**	6M150784
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.02	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	1.26		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.277	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.359	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.22		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.83		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	97.3	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-282-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 15:31
Collect Date:	10/08/2017 10:45	**Dilution:**	1	**File ID:**	6M150783
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.66	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	97.6	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634505	**Analyst:**	TMB	**Run Date:**	10/18/2017 15:02
Collect Date:	10/09/2017 08:22	**Dilution:**	1	**File ID:**	6M150782
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	97.9	81	120	
4-Bromofluorobenzene	101	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-267-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 19:41
Collect Date:	10/08/2017 11:45	**Dilution:**	1	**File ID:**	11M22502
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.854		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.13		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	21.3		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.581		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.361	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	16.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	37.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-256-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 20:10
Collect Date:	10/08/2017 10:57	**Dilution:**	1	**File ID:**	11M22503
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.628	F	1.00	0.125
1,1-Dichloroethene	75-35-4	0.611	F	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.627	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.46		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	24.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-50	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-202B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 20:39
Collect Date:	10/08/2017 12:30	**Dilution:**	1	**File ID:**	11M22504
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.458	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.392		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.37		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	36.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-51	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-212-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 21:08
Collect Date:	10/08/2017 14:45	**Dilution:**	1	**File ID:**	11M22505
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	40.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.64		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-52	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-255-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 21:38
Collect Date:	10/08/2017 18:25	**Dilution:**	1	**File ID:**	11M22506
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.665	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.335	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-53	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	LTM-TB2-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 18:12
Collect Date:	10/09/2017 13:44	**Dilution:**	1	**File ID:**	11M22499
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-54	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-202A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634775	**Analyst:**	JDS	**Run Date:**	10/20/2017 03:47
Collect Date:	10/08/2017 13:14	**Dilution:**	1	**File ID:**	6M150846
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.187	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.903	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.00		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-55	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 22:07
Collect Date:	10/08/2017 14:10	**Dilution:**	1	**File ID:**	11M22507
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1	0.559	F	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.290	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.290	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	10.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	15.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-56	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-198-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 22:36
Collect Date:	10/08/2017 14:30	**Dilution:**	1	**File ID:**	11M22508
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.16	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.65		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-57	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-62-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 23:06
Collect Date:	10/08/2017 14:00	**Dilution:**	1	**File ID:**	11M22509
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	11.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6	0.303	F	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.278	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	10.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	15.3		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-58	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-142-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 23:35
Collect Date:	10/08/2017 14:19	**Dilution:**	1	**File ID:**	11M22510
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.15	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.539	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.24		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	99.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-59	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-270-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 00:04
Collect Date:	10/09/2017 06:42	**Dilution:**	1	**File ID:**	11M22511
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	15.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.186	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	6.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	25.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.254	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.920	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-60	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-272-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 00:33
Collect Date:	10/09/2017 06:59	**Dilution:**	1	**File ID:**	11M22512
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.72	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8	4.69		1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-61	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 19:11
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22501
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.99	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.84		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-62	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 16:45
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22496
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.9		0.500	0.250
1,1,1-Trichloroethane	71-55-6	17.0		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	21.1		1.00	0.250
1,1-Dichloroethane	75-34-3	19.1		1.00	0.125
1,1-Dichloroethene	75-35-4	16.8		1.00	0.500
1,1-Dichloropropene	563-58-6	17.8		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.9		1.00	0.250
1,2-Dichloroethane	107-06-2	20.6		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	21.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.3		1.00	0.250
1,3-Dichloropropane	142-28-9	21.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	18.0		1.00	0.125
2,2-Dichloropropane	594-20-7	17.0	Q	1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	19.3		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	29.0		10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	19.6		1.00	0.125
Bromochloromethane	74-97-5	20.5		1.00	0.200
Bromodichloromethane	75-27-4	20.2		0.500	0.250
Bromoform	75-25-2	17.9		1.00	0.500
Bromomethane	74-83-9	20.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	15.8		1.00	0.500
Carbon tetrachloride	56-23-5	16.0		1.00	0.250
Chlorobenzene	108-90-7	19.6		0.500	0.125
Chloroethane	75-00-3	19.5		1.00	0.500
Chloroform	67-66-3	19.6		0.300	0.125
Chloromethane	74-87-3	19.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.1		0.500	0.250
Dibromochloromethane	124-48-1	19.8		0.500	0.250
Dibromomethane	74-95-3	21.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	18.1		1.00	0.250
Ethylbenzene	100-41-4	18.8		1.00	0.250
Hexachlorobutadiene	87-68-3	17.3		0.600	0.250
Isopropylbenzene	98-82-8	19.2		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.8		10.0	2.50
n-Butylbenzene	104-51-8	19.3		1.00	0.250
n-Propylbenzene	103-65-1	19.8		1.00	0.125
m-,p-Xylene	179601-23-1	39.8		2.00	0.500
Naphthalene	91-20-3	23.8		1.00	0.200
o-Xylene	95-47-6	20.5		1.00	0.250
p-Isopropyltoluene	99-87-6	18.5		1.00	0.250
sec-Butylbenzene	135-98-8	17.8		1.00	0.250
Styrene	100-42-5	20.2		1.00	0.125
Trichloroethene	79-01-6	21.0		1.00	0.250
tert-Butylbenzene	98-06-6	17.5		1.00	0.250
Tetrachloroethene	127-18-4	16.8		1.00	0.250
Toluene	108-88-3	18.8		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.4		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.9		1.00	0.500
Trichlorofluoromethane	75-69-4	15.3		1.00	0.250
Vinyl chloride	75-01-4	21.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100637-63	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-271-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 17:14
Collect Date:	10/09/2017 07:16	**Dilution:**	1	**File ID:**	11M22497
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.6		1.00	0.250
1,1-Dichloroethane	75-34-3	20.0		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	20.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	22.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	21.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.5		1.00	0.250
1,2-Dichloroethane	107-06-2	20.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.1		2.00	1.00
1,2-Dichloropropane	78-87-5	20.9		1.00	0.200
1,2-Dibromoethane	106-93-4	20.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.1		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	20.5		0.500	0.125
1-Chlorohexane	544-10-5	21.7		1.00	0.125
2,2-Dichloropropane	594-20-7	19.1	Q	1.00	0.250
2-Hexanone	591-78-6	21.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	21.0		1.00	0.250
Acetone	67-64-1	27.1		10.0	2.50
Benzene	71-43-2	20.2		0.400	0.125
Bromobenzene	108-86-1	19.4		1.00	0.125
Bromochloromethane	74-97-5	20.3		1.00	0.200
Bromodichloromethane	75-27-4	20.4		0.500	0.250
Bromoform	75-25-2	17.4		1.00	0.500
Bromomethane	74-83-9	22.2		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	18.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.0		1.00	0.250
Chlorobenzene	108-90-7	20.1		0.500	0.125
Chloroethane	75-00-3	21.0		1.00	0.500
Chloroform	67-66-3	20.3		0.300	0.125
Chloromethane	74-87-3	20.9		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.9		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	23.0		0.500	0.250
Dibromochloromethane	124-48-1	19.6		0.500	0.250
Dibromomethane	74-95-3	20.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.5		1.00	0.250
Ethylbenzene	100-41-4	20.5		1.00	0.250
Hexachlorobutadiene	87-68-3	19.6		0.600	0.250
Isopropylbenzene	98-82-8	21.4		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.5		5.00	0.500
MEK (2-Butanone)	78-93-3	21.7		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.2		10.0	2.50
n-Butylbenzene	104-51-8	21.3		1.00	0.250
n-Propylbenzene	103-65-1	21.5		1.00	0.125
m-,p-Xylene	179601-23-1	42.6		2.00	0.500
Naphthalene	91-20-3	23.2		1.00	0.200
o-Xylene	95-47-6	21.6		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	20.0		1.00	0.250
Styrene	100-42-5	20.7		1.00	0.125
Trichloroethene	79-01-6	22.1		1.00	0.250
tert-Butylbenzene	98-06-6	19.7		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	20.1		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.7		1.00	0.500
Trichlorofluoromethane	75-69-4	18.1		1.00	0.250
Vinyl chloride	75-01-4	23.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17100637-64	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-213-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 01:02
Collect Date:	10/09/2017 16:30	**Dilution:**	5	**File ID:**	11M22513
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	2.50	1.25
1,1,1-Trichloroethane	71-55-6		U	5.00	1.25
1,1,2,2-Tetrachloroethane	79-34-5		U	2.50	1.00
1,1,2-Trichloroethane	79-00-5		U	5.00	1.25
1,1-Dichloroethane	75-34-3		U	5.00	0.625
1,1-Dichloroethene	75-35-4		U	5.00	2.50
1,1-Dichloropropene	563-58-6		U	5.00	1.25
1,2,3-Trichlorobenzene	87-61-6		U	5.00	0.750
1,2,3-Trichloropropane	96-18-4		U	5.00	2.50
1,2,4-Trichlorobenzene	120-82-1		U	5.00	1.00
1,2,4-Trimethylbenzene	95-63-6		U	5.00	1.25
1,2-Dichloroethane	107-06-2		U	2.50	1.25
1,2-Dichlorobenzene	95-50-1		U	5.00	0.625
1,2-Dibromo-3-chloropropane	96-12-8		U	10.0	5.00
1,2-Dichloropropane	78-87-5		U	5.00	1.00
1,2-Dibromoethane	106-93-4		U	5.00	1.25
1,3,5-Trimethylbenzene	108-67-8		U	5.00	1.25
1,3-Dichlorobenzene	541-73-1		U	5.00	1.25
1,3-Dichloropropane	142-28-9		U	2.00	1.00
1,4-Dichlorobenzene	106-46-7		U	2.50	0.625
1-Chlorohexane	544-10-5		U	5.00	0.625
2,2-Dichloropropane	594-20-7		Q	5.00	1.25
2-Hexanone	591-78-6		U	50.0	12.5
2-Chlorotoluene	95-49-8		U	5.00	0.625
4-Chlorotoluene	106-43-4		U	5.00	1.25
Acetone	67-64-1	32.1	F	50.0	12.5
Benzene	71-43-2		U	2.00	0.625
Bromobenzene	108-86-1		U	5.00	0.625
Bromochloromethane	74-97-5		U	5.00	1.00
Bromodichloromethane	75-27-4		U	2.50	1.25
Bromoform	75-25-2		U	5.00	2.50
Bromomethane	74-83-9		U	5.00	2.50

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	5.00	2.50
Carbon tetrachloride	56-23-5		U	5.00	1.25
Chlorobenzene	108-90-7		U	2.50	0.625
Chloroethane	75-00-3		U	5.00	2.50
Chloroform	67-66-3		U	1.50	0.625
Chloromethane	74-87-3		U	5.00	2.50
cis-1,2-Dichloroethene	156-59-2	7.46		5.00	1.25
cis-1,3-Dichloropropene	10061-01-5		U	2.50	1.25
Dibromochloromethane	124-48-1		U	2.50	1.25
Dibromomethane	74-95-3		U	5.00	1.25
Dichlorodifluoromethane	75-71-8		U	5.00	1.25
Ethylbenzene	100-41-4		U	5.00	1.25
Hexachlorobutadiene	87-68-3		U	3.00	1.25
Isopropylbenzene	98-82-8		U	5.00	1.25
Methylene chloride	75-09-2		U	5.00	1.25
Methyl t-butyl ether (MTBE)	1634-04-4		U	25.0	2.50
MEK (2-Butanone)	78-93-3	33.1	F	50.0	12.5
MIBK (methyl isobutyl ketone)	108-10-1		U	50.0	12.5
n-Butylbenzene	104-51-8		U	5.00	1.25
n-Propylbenzene	103-65-1		U	5.00	0.625
m-,p-Xylene	179601-23-1		U	10.0	2.50
Naphthalene	91-20-3		U	5.00	1.00
o-Xylene	95-47-6		U	5.00	1.25
p-Isopropyltoluene	99-87-6		U	5.00	1.25
sec-Butylbenzene	135-98-8		U	5.00	1.25
Styrene	100-42-5		U	5.00	0.625
Trichloroethene	79-01-6	13.1		5.00	1.25
tert-Butylbenzene	98-06-6		U	5.00	1.25
Tetrachloroethene	127-18-4		U	5.00	1.25
Toluene	108-88-3		U	5.00	1.25
trans-1,2-Dichloroethene	156-60-5		U	5.00	1.25
trans-1,3-Dichloropropene	10061-02-6		U	5.00	2.50
Trichlorofluoromethane	75-69-4		U	5.00	1.25
Vinyl chloride	75-01-4		U	5.00	1.25

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100637-65	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	LTM-TB1-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634645	**Analyst:**	HRF/TMB	**Run Date:**	10/19/2017 18:41
Collect Date:	10/09/2017 18:19	**Dilution:**	1	**File ID:**	11M22500
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		Q	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): CPD
Date: 10/12/17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
CPD	10/12/17	CPD	10/13/17
Time On	Temp On °C	Time Off	Temp Off °C
1505	22.3	0812	22.7

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A					CPD 10/13/17							
B												
C												
✓ D	10-0704-01	✓	10	10	1311	FI-283	S	100		✓	25.01	500
✓ E	10-0750-01	✓	10	10	〃	〃	〃	〃		✓	25.01	500
F												
G												
H												
I												
J												
K												
L												
M					CPD 10/13/17							
N												
O												
P												
Q												
R												
S												
NA	FBIK1	NA	NA	NA	1311	FI-283	NA	NA	NA	NA	40	40
					CPD 10/13/17							

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By: [signature]

Analyst(s): BLR

Date: 10-17-17

Filter Lot #: 98/H092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020

pH Probe ID: T5

Temp probe ID: ☑ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BLR 10-17-17		CPD	10/18/17
Time On	Temp On °C	Time Off	Temp Off °C
2130	22.3	1353	22.3

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A	10-933-12	✓	10	10	1311	F1(283)	S	100		✓	25.01	500
B	10-933-14	✓	10	10			S	100		✓	25.02	500
C	10-933-16	✓					S	100		✓	25.00	500
D	10-933-18	✓					S	100		✓	25.00	500
E	10-933-20	✓					S	100		✓	25.00	500
F	10-933-22	✓					S	100		✓	25.00	500
G	10-952-02	✓					S	100		✓	25.02	500
H	10-947-01	✓					S	100		✓	25.00	500
~~I~~	~~10-1035-01~~			BLR 10/7/2017								
J												
K												
L												
M												
N												
O	10-933-02	✓	10	10	1311	F1(283)	S	100		✓	25.01	500
P	10-933-04	✓					S	100		✓	25.02	500
Q	10-933-06	✓					S	100		✓	25.00	500
R	10-933-08	✓					S	100		✓	25.00	500
S	10-933-10	✓					S	100		✓	25.01	500
NA	FLBLK	NA	NA	NA	1311	F1(283)	NA	NA	NA	NA	40	40
NA	FLBLK	NA	NA	NA	1311	F1(284)	NA	NA	NA	NA	40	40
~~NA~~	~~10-1004-01~~					NA	W	BLR 10/7/2017	NA	NA	40	40
~~NA~~	~~10-1005-01~~						W				40	40
~~NA~~	~~10-1006-01~~						O				40	40
~~NA~~	~~10-1007-01~~						O				40	40

CPD 10/18/17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: NIA

Peer Review By:

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19216	WG618910-01 BFB 50ng 8260	NA	1	1	STD82467	06/22/17 11:03
11M19217	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 11:27
11M19218	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 12:03
11M19219	WG618912-01 5ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 12:32
11M19220	WG618912-02 20ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:02
11M19221	WG618912-03 50ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:31
11M19222	WG618912-04 100ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:01
11M19223	WG618912-05 200ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:31
11M19224	WG618912-06 300ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:59
11M19225	WG618912-07 400ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:29
11M19226	WG618912-08 500ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:58
11M19227	RINSE	NA	1	1		06/22/17 16:27
11M19228	WG618912-09 100ug/L ICV/ALT 826-A9	NA	1	1	STD82415	06/22/17 16:57
11M19229	WG618911-01 BLANK 8260	NA	1	1		06/22/17 17:27
11M19230	WG618911-02 20ug/L LCS 8260	NA	1	1	STD82448	06/22/17 17:56
11M19231	WG618911-03 20ug/L LCS2 8260	NA	1	1	STD82448	06/22/17 18:26
11M19232	L17061104-01 A 826-BETX	<2	1	1		06/22/17 18:55
11M19233	L17061103-12 A TB 826-SPE	<2	1	1		06/22/17 19:25
11M19234	L17061103-01 A 826-SPE	<2	1	1		06/22/17 19:54
11M19235	L17061103-03 A 826-SPE	<2	1	1		06/22/17 20:23
11M19236	L17061103-05 A 826-SPE	<2	1	1		06/22/17 20:53
11M19237	L17061103-07 A 826-SPE	<2	1	1		06/22/17 21:22
11M19238	L17061103-09 A 826-SPE	<2	1	1		06/22/17 21:51
11M19239	L17061103-11 A 826-SPE	<2	1	1		06/22/17 22:20
11M19240	RINSE	NA	1	1		06/22/17 22:49
11M19241	WG618911-04 BLANK2 624	NA	2	1		06/22/17 23:18
11M19242	L17061150-01 A 624	<2	2	1		06/22/17 23:48
11M19243	L17061154-01 A 624-SPE	7	2	1		06/23/17 00:17
11M19244	L17061152-01 A 624-SPE2	6	2	1		06/23/17 00:46
11M19245	CCV	NA	2	1		06/23/17 01:15
11M19246	RINSE	NA	2	1		06/23/17 01:45
11M19247	RINSE	NA	2	1		06/23/17 02:14

Approved: June 23, 2017
Sarah Vandenberg

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X		Check Standard Failure	
File ID: 11M19217				
WG618910-02 CCV multiple cmpds. failed low. RR				

Approved: June 23, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0

Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: STD82448

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG619415(ICAL), WG619505, WG619576

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19368	WG619415-01 BFB 50ng 8260	NA	7	1	STD82467	06/27/17 06:47
11M19369	RINSE	NA	7	1	STD82561	06/27/17 07:12
11M19370	WG619415-02 0.5ug/kg STD 8260	NA	7	1	STD82561	06/27/17 07:41
11M19371	WG619415-03 1.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 08:10
11M19372	WG619415-04 2.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 08:40
11M19373	WG619415-05 5.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 09:09
11M19374	WG619415-06 20.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 09:38
11M19375	WG619415-07 50.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 10:08
11M19376	WG619415-08 100.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 10:37
11M19377	WG619415-09 200.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 11:06
11M19378	WG619415-10 300.0ug/kg STD 8260	NA	7	1	STD82561	06/27/17 11:36
11M19379	RINSE	NA	7	1		06/27/17 12:05
11M19380	WG619415-11 50.0ug/kg ALTSRC 8260	NA	7	1	STD82561	06/27/17 12:34
11M19381	RINSE	NA	7	1		06/27/17 13:03
11M19382	WG619505-01 BLK 8260	NA	7	1		06/27/17 13:33
11M19383	WG619505-02 20ug/kg LCS 8260	NA	7	1	STD82448	06/27/17 14:02
11M19384	WG619505-03 20ug/kg LCSDUP 8260	NA	7	1	STD82448	06/27/17 14:31
11M19385	L17061243-07 A 8260	NA	7	1		06/27/17 15:00
11M19386	L17061243-08 A 8260	NA	7	1		06/27/17 15:29
11M19387	L17061243-09 A 8260	NA	7	1		06/27/17 15:59
11M19388	L17061243-10 A 8260	NA	7	1		06/27/17 16:28
11M19389	L17061243-11 A 8260	NA	7	1		06/27/17 16:57
11M19390	L17061243-12 A 8260	NA	7	1		06/27/17 17:26
11M19391	L17061243-13 A 8260	NA	7	1		06/27/17 17:55
11M19392	L17061243-14 A 8260	NA	7	1		06/27/17 18:24
11M19394	WG619575-01 50ng BFB	NA	7	1	STD824678	06/27/17 19:14
11M19395	WG619575-02 50ug/kg CCV 8260	NA	7	1	STD82561	06/27/17 19:39
11M19396	WG619575-02	NA	7	1		06/27/17 20:08
11M19397	RINSE	NA	7	1		06/27/17 20:38
11M19398	WG619576-01 BLANK 8260	NA	7	1		06/27/17 21:07
11M19399	WG619576-02 20ug/kg LCS 8260	NA	7	1	STD82448	06/27/17 21:35
11M19400	L17061218-09 A MS 8260	NA	7	1	STD82448	06/27/17 22:05
11M19401	L17061218-10 A MSD 8260	NA	7	1	STD82448	06/27/17 22:34
11M19402	L17061243-15 A 8260	NA	7	1		06/27/17 23:03

Approved: June 29, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062717
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0

Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: STD82448

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG619415(ICAL), WG619505, WG619576

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19403	L17061243-16 A 8260	NA	7	1		06/27/17 23:33
11M19404	L17061243-17 A 8260	NA	7	1		06/28/17 00:02
11M19405	L17061243-18 A 8260	NA	7	1		06/28/17 00:31
11M19406	L17061243-19 A 8260	NA	7	1		06/28/17 01:01
11M19407	L17061243-20 A 8260	NA	7	1		06/28/17 01:30
11M19408	L17061243-21 A 8260	NA	7	1		06/28/17 01:59
11M19409	L17061243-22 A 8260	NA	7	1		06/28/17 02:29
11M19410	L17061218-08 A RS 8260	NA	7	1		06/28/17 02:59
11M19411	L17061218-01 A 8260	NA	7	1		06/28/17 03:29
11M19412	L17061218-02 A 8260	NA	7	1		06/28/17 03:59
11M19413	L17061218-03 A 8260	NA	7	1		06/28/17 04:29
11M19414	L17061218-04 A 8260	NA	7	1		06/28/17 04:59
11M19415	L17061218-05 A 8260	NA	7	1		06/28/17 05:29
11M19416	L17061218-06 A 8260	NA	7	1		06/28/17 05:58
11M19417	L17061218-07 A 8260	NA	7	1		06/28/17 06:28
11M19418	L17061218-11 A 8260	NA	7	1		06/28/17 06:58
11M19419	RINSE	NA	7	1		06/28/17 07:28

Comments

Seq.	Rerun	Dil.	Reason	Analytes
41	X	5	Over Calibration Range	TCE
File ID: 11M19409				
L17061243-22				

Approved: June 29, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 082417
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01/OVAP MSV Rev: 25/0
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1

Maintenance Log ID:

Internal Standard: STD83390 Surrogate Standard: STD83391
CCV: STD83554 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG627119 (ICAL) WG627121

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M20992	WG627119-01 50ng BFB STD 8260	NA	1	1	STD83478	08/24/17 14:57
11M20993	RINSE	NA	7	1		08/24/17 15:23
11M20994	WG627119-02 5ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 15:52
11M20995	WG627119-03 20ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 16:21
11M20996	WG627119-04 50ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 16:51
11M20997	WG627119-05 100ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 17:21
11M20998	WG627119-06 200ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 17:50
11M20999	WG627119-07 300ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 18:19
11M21000	WG627119-08 400ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 18:49
11M21001	WG627119-09 500ug/kG ICAL 826-A9	NA	7	1	STD83554	08/24/17 19:18
11M21002	RINSE	NA	7	1		08/24/17 19:47
11M21003	WG627119-10 100ug/kG ICV 826-A9	NA	7	1	STD83193	08/24/17 20:17
11M21004	RINSE	NA	7	1		08/24/17 20:46
11M21005	WG627121-01 BLANK 826-A9	NA	7	1		08/24/17 21:15
11M21006	L17070002-01 Xug/kg LOD A9	NA	7	1	STD83193	08/24/17 21:44
11M21007	L17070004-01 Xug/kg LOQ A9	NA	7	1	STD83193	08/24/17 22:14
11M21008	L17070002-01 25ug/kg LOD A9	NA	7	1	STD83193	08/24/17 22:44
11M21009	L17070004-01 50ug/kg LOQ A9	NA	7	1	STD83193	08/24/17 23:13
11M21010	RINSE	NA	7	1		08/24/17 23:43
11M21011	RINSE	NA	7	1		08/25/17 00:13
11M21012	RINSE	NA	7	1		08/25/17 00:43

Approved: September 04, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 083117
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT Rev: 18/1
Maintenance Log ID:

Internal Standard: STD83648 Surrogate Standard: STD83648
CCV: STD83554 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG628027

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M421173	WG628027-01 50ng BFB STD	NA	1	1	STD83478	08/31/17 13:56
8M421174	WG628027-01 50ng BFB STD	NA	1	1	STD83478	08/31/17 14:11
8M421175	RINSE	NA	1	1	STD83388	08/31/17 14:36
8M421176	WG628027-02 5ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 15:06
8M421177	WG628027-03 20ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 15:36
8M421178	WG628027-04 50ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 16:05
8M421179	WG628027-05 100ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 16:35
8M421180	WG628027-06 200ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 17:04
8M421181	WG628027-07 300ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 17:34
8M421182	WG628027-08 400ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 18:04
8M421183	WG628027-09 500ug/L A9FOO STD	NA	1	1	STD83554	08/31/17 18:33
8M421184	RINSE	NA	1	1	STD83554	08/31/17 19:03
8M421185	WG628027-10 100ug/L A9FOO ALT SRC	NA	1	1	STD83193	08/31/17 19:33

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 8M421173				
	Tune failed, DNR.			

Approved: September 05, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
Not needed, DNR.				
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
L17100420-01				

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22279	WG633647-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 10:07
11M22280	RINSE	NA	1	1		10/12/17 11:10
11M22281	RINSE	NA	1	1		10/12/17 11:40
11M22282	WG633647-02 .3ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 12:10
11M22283	WG633647-03 .4ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:05
11M22284	WG633647-04 1ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:34
11M22285	WG633647-05 2ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:04
11M22286	WG633647-06 5ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:47
11M22287	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 15:17
11M22288	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:01
11M22289	WG633647-08 50ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:30
11M22290	WG633647-09 100ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:00
11M22291	WG633647-10 200ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:29
11M22292	WG633647-11 300ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:59
11M22293	RINSE	NA	1	1		10/12/17 18:28
11M22294	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 18:57
11M22295	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 19:54
11M22296	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 20:07
11M22297	WG633790-02 50ug/L CCV 8260	NA	1	1	STD84376	10/12/17 20:33
11M22298	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 21:02
11M22299	WG000000-01 100ug/L CCV 8260	NA	1	1	STD00000	10/12/17 21:56
11M22300	WG633791-01 BLANK 8260	NA	1	1		10/12/17 22:26
11M22301	WG633791-02 20ug/L LCS 8260	NA	1	1	STD84357	10/12/17 22:55
11M22302	WG633791-03 20ug/L LCS2 8260	NA	1	1	STD84357	10/12/17 23:25
11M22303	RINSE	NA	1	1		10/12/17 23:55
11M22304	L17100636-03 A 826-SPE	NA	1	1		10/13/17 00:24
11M22305	L17100636-04 A 826-SPE	NA	1	1		10/13/17 00:54
11M22306	L17100636-06 A 826-SPE	NA	1	1		10/13/17 01:24
11M22307	L17100636-07 A 826-SPE	NA	1	1		10/13/17 01:54
11M22308	L17100636-08 A 826-SPE	NA	1	1		10/13/17 02:24
11M22309	L17100636-09 A 826-SPE	NA	1	1		10/13/17 02:53
11M22310	L17100532-15 A 826-SPE	NA	1	1		10/13/17 03:23
11M22311	L17100636-13 A 826-SPE	NA	1	1		10/13/17 03:52
11M22312	L17100636-14 A 826-SPE	NA	1	1		10/13/17 04:21

Approved: October 16, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22313	L17100532-14 A 826-SPE	NA	1	1		10/13/17 04:51
11M22314	L17100532-16 A 826-SPE	NA	1	1		10/13/17 05:20
11M22315	L17100532-18 A 826-SPE	NA	1	1		10/13/17 05:50
11M22316	L17100532-19 A 826-SPE	NA	1	1		10/13/17 06:20
11M22317	L17100532-17 A 826-SPE	NA	1	1		10/13/17 06:50
11M22318	L17100755-02 A 100X 8260	NA	12	100		10/13/17 07:20
11M22319	L17100755-17 A 1000X 8260	NA	12	1000		10/13/17 07:49
11M22320	RINSE	NA	2	1		10/13/17 08:19
11M22321	WG633791-04 BLANK2 624	NA	2	1		10/13/17 08:49

Approved: October 16, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101717
Analyst1: HRF Analyst2: ADC
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634316 WG634377

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22399	WG634315-01 50ng BFB 8260	NA	1	1	STD84001	10/17/17 12:35
11M22400	WG634315-01 50ng BFB 8260	NA	1	1	STD84001	10/17/17 12:46
11M22401	WG634315-02 50ug/L CCV 8260	NA	1	1	STD84376	10/17/17 13:10
11M22402	WG634314-01 100ug/L CCV A9 8260	NA	1	1	STD00000	10/17/17 13:41
11M22403	WG634316-01 BLANK 8260	NA	1	1		10/17/17 14:11
11M22404	WG634316-02 20ug/L LCS 8260	NA	1	1	STD84357	10/17/17 14:40
11M22405	L17100636-41 A 20ug/L MS 826-SPE	NA	1	1	STD84357	10/17/17 15:09
11M22406	L17100636-42 A 20ug/L MSD 826-SPE	NA	1	1	STD84357	10/17/17 15:39
11M22407	L17100840-03 A 826-SPE3	<2	1	1		10/17/17 16:09
11M22408	L17100840-02 A 826-SPE3	<2	1	1		10/17/17 16:38
11M22409	L17100840-01 A 826-SPE3	<2	1	1		10/17/17 17:08
11M22410	L17100636-32 A 826-SPE	<2	1	1		10/17/17 17:37
11M22411	L17100636-33 A 826-SPE	<2	1	1		10/17/17 18:06
11M22412	L17100636-34 A 826-SPE	<2	1	1		10/17/17 18:35
11M22413	L17100636-35 A 826-SPE	<2	1	1		10/17/17 19:04
11M22414	L17100636-36 A 826-SPE	<2	1	1		10/17/17 19:33
11M22415	L17100636-37 A 826-SPE	<2	1	1		10/17/17 20:03
11M22416	L17100636-38 A 826-SPE	<2	1	1		10/17/17 20:33
11M22417	L17100636-39 A 826-SPE	<2	1	1		10/17/17 21:02
11M22418	L17100636-40 A REF 826-SPE	NA	1	1		10/17/17 21:31
11M22419	L17100637-01 A 826-SPE	<2	1	1		10/17/17 22:00
11M22420	L17100637-02 A 826-SPE	<2	1	1		10/17/17 22:29
11M22421	L17100637-03 A 826-SPE	<2	1	1		10/17/17 22:58
11M22422	L17100755-17 C 1000X 8260	<2	12	1000		10/17/17 23:28
11M22423	L17100755-02 C 1000000X D2 8260	<2	12	1000000		10/17/17 23:57
11M22424	WG634377-01 LCS 624-SPE	NA	2	1	STD84357	10/18/17 00:26
11M22425	WG634377-02 LCS2 624-SPE	NA	2	1	STD84357	10/18/17 00:55
11M22426	RINSE W/AF	NA	1	1		10/18/17 01:24
11M22427	WG634377-03 BLANK 624-SPE	NA	2	1		10/18/17 01:53
11M22428	L17101048-02 A 624-SPE	5	2	1		10/18/17 02:22
11M22430	L17101048-01 A 624-SPE	6	2	1		10/18/17 02:51
11M22431	L17100791-01 B 5X W/AF 624-SPE	<2	2	5		10/18/17 03:20
11M22432	L17101049-01 A 624-SPE	<2	2	1		10/18/17 03:49
11M22433	L17100945-01 A 624-SPE	7	2	1		10/18/17 04:17

Approved: October 19, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101717
Analyst1: HRF Analyst2: ADC
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634316 WG634377

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22434	L17100945-02 A 624-SPE	7	2	1		10/18/17 04:46
11M22435	L17100945-03 A 624-SPE	7	2	1		10/18/17 05:15
11M22436	L17100945-04 A 624-SPE	7	2	1		10/18/17 05:44
11M22437	L17101064-01 A 624-SPE	<2	2	1		10/18/17 06:13
11M22438	L17101064-02 A 624-SPE	<2	2	1		10/18/17 06:42
11M22439	L17101064-03 A 624-SPE	<2	2	1		10/18/17 07:11
11M22440	L17101064-04 A 624-SPE	<2	2	1		10/18/17 07:40
11M22441	L17101064-05 A 624-SPE	<2	2	1		10/18/17 08:09
11M22442	L17101064-06 A 624-SPE	<2	2	1		10/18/17 08:38
11M22443	L17101064-07 A 624-SPE	<2	2	1		10/18/17 09:06
11M22444	CCV	NA	2	1		10/18/17 09:36
11M22445	RINSE	NA	2	1		10/18/17 10:05

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 11M22399				
WG634315-01 RERUN BFB				
24				
File ID: 11M22422				
L17100755-17 OUT OF HOLD				
25	X	10000000	Over Calibration Range	TETRAHYDROFURAN
File ID: 11M22423				
L17100755-02 OUT OF HOLD, RERUN AT 10,000,000X				

Approved: October 19, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54361

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84376; STD84099 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634047; WG634380

Comments: New Source. Instrument tuning.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422192	BFB CHECK	NA	1	1	STD84001	10/17/17 07:14
8M422193	BFB CHECK	NA	1	1	STD84001	10/17/17 07:29
8M422194	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 07:43
8M422195	BFB CHECK	NA	1	1	STD84001	10/17/17 08:12
8M422196	BFB CHECK	NA	1	1	STD84001	10/17/17 08:42
8M422197	BFB CHECK	NA	1	1	STD84001	10/17/17 08:56
8M422198	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 09:17
8M422199	BFB CHECK	NA	1	1	STD84001	10/17/17 09:50
8M422200	BFB CHECK	NA	1	1	STD84001	10/17/17 10:07
8M422201	BFB CHECK	NA	1	1	STD84001	10/17/17 10:21
8M422202	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 10:36
8M422203	RINSE	NA	1	1		10/17/17 11:02
8M422204	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 11:30
8M422205	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 12:32
8M422206	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 12:47
8M422207	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 13:44
8M422208	WG634047-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 14:22
8M422209	RINSE	NA	1	1		10/17/17 14:49
8M422210	WG634047-02 0.3ug/L STD 8260	NA	1	1	STD84376	10/17/17 15:18
8M422211	WG634047-03 0.4ug/L STD 8260	NA	1	1	STD84376	10/17/17 15:48
8M422212	WG634047-04 1ug/L STD 8260	NA	1	1	STD84376	10/17/17 16:17
8M422213	WG634047-05 2ug/L STD 8260	NA	1	1	STD84376	10/17/17 16:47
8M422214	WG634047-06 5ug/L STD 8260	NA	1	1	STD84376	10/17/17 17:16
8M422215	WG634047-07 20ug/L STD 8260	NA	1	1	STD84376	10/17/17 17:46
8M422216	WG634047-08 50ug/L STD 8260	NA	1	1	STD84376	10/17/17 18:15
8M422217	WG634047-09 100ug/L STD 8260	NA	1	1	STD84376	10/17/17 18:45
8M422218	WG634047-10 200ug/L STD 8260	NA	1	1	STD84376	10/17/17 19:14
8M422219	WG634047-11 300ug/L STD 8260	NA	1	1	STD84376	10/17/17 19:44
8M422220	RINSE	NA	1	1		10/17/17 20:13
8M422221	RINSE	NA	1	1		10/17/17 20:43
8M422222	WG634047-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84456	10/17/17 21:12
8M422223	WG6340381-01 100ug/L A9 CCV STD 826	NA	1	1	STD84099	10/17/17 21:42
8M422224	RINSE	NA	1	1		10/17/17 22:11
8M422225	WG634380-01 BLK 1017 STD 8260	NA	1	1		10/17/17 22:40

Approved: October 19, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54361

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84376; STD84099 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634047; WG634380

Comments: New Source. Instrument tuning.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422226	L17100001-01 LOD 826-SPE	NA	1	1	STD84455	10/17/17 23:10
8M422227	L17100003-01 LOQ 826-SPE	NA	1	1	STD84455	10/17/17 23:40
8M422228	RINSE	NA	1	1		10/18/17 00:09
8M422229	RINSE	NA	1	1		10/18/17 00:38
8M422230	RINSE	NA	1	1		10/18/17 01:07
8M422231	RINSE	NA	1	1		10/18/17 01:37

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150723	WG634167-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 06:51
6M150724	WG634167-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 07:18
6M150725	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 07:47
6M150726	WG634168-01 BLK 1017 STD 8260	NA	1	1		10/17/17 08:16
6M150727	L17100636-24 A RS 826-SPE	<2	1	1		10/17/17 08:45
6M150728	WG634168-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 09:15
6M150729	L17100636-25 A MS 826-SPE	<2	1	1	STD84357	10/17/17 09:44
6M150730	L17100636-26 A MSD 826-SPE	<2	1	1	STD84357	10/17/17 10:13
6M150731	L17100545-17 B 10X 826-SPE	<2	1	10		10/17/17 10:43
6M150732	L17100545-15 B 10X D1 826-SPE	<2	1	10		10/17/17 11:12
6M150733	L17100545-14 B 10X D1 826-SPE	<2	1	10		10/17/17 11:42
6M150734	L17100545-13 B 25X D1 826-SPE	<2	1	25		10/17/17 12:12
6M150735	L17100636-01 B 826-SPE	<2	1	1		10/17/17 12:41
6M150736	L17100636-02 B 826-SPE	<2	1	1		10/17/17 13:11
6M150737	L17100636-03 C 826-SPE	<2	1	1		10/17/17 13:39
6M150738	L17100636-04 C 826-SPE	<2	1	1		10/17/17 14:09
6M150739	L17100636-06 C 826-SPE	<2	1	1		10/17/17 14:38
6M150740	L17100636-07 C 826-SPE	<2	1	1		10/17/17 15:08
6M150741	L17100636-08 C 826-SPE	<2	1	1		10/17/17 15:37
6M150742	L17100636-09 C 826-SPE	<2	1	1		10/17/17 16:07
6M150743	L17100636-13 C 826-SPE	<2	1	1		10/17/17 16:37
6M150744	L17100514-20 C 826-SPE	<2	1	1		10/17/17 17:06
6M150745	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 17:55
6M150746	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 18:20
6M150748	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 19:20
6M150749	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 20:09
6M150750	WG634399-01 50ng BFB STD 8260	NA	1	1	STD84001	10/17/17 20:44
6M150751	WG634399-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/17/17 21:09
6M150752	WG000000-01 100ug/L a9 CCV STD 8260	NA	1	1	STD84099	10/17/17 21:41
6M150753	WG634400-01 BLK 1017 STD 8260	NA	1	1		10/17/17 22:11
6M150754	WG634400-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 22:40
6M150755	WG634400-03 20ug/L LCS STD 8260	NA	1	1	STD84357	10/17/17 23:09
6M150756	L17100545-17 B D1 100X 826-SPE	<2	1	100		10/17/17 23:39
6M150757	L17100704-01 10X AF 826-TC	NA	17	10		10/18/17 00:08

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101717
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54360

Internal Standard: STD81314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150758	L17100636-01 C 826-SPE	<2	1	1		10/18/17 00:38
6M150759	L17100636-02 C 826-SPE	<2	1	1		10/18/17 01:07
6M150760	L17100709-16 C 826-SPE	<2	1	1		10/18/17 01:36
6M150761	L17100709-15 C 826-SPE	<2	1	1		10/18/17 02:06
6M150762	L17100709-17 A 826-SPE	<2	1	1		10/18/17 02:35
6M150763	L17100709-18 A 826-SPE	<2	1	1		10/18/17 03:05
6M150764	L17100545-18 A 10X 826-SPE	<2	1	10		10/18/17 03:34
6M150765	L17100545-19 A 10X 826-SPE D1	<2	1	10		10/18/17 04:03
6M150766	L17100545-20 A 10X 826-SPE	<2	1	10		10/18/17 04:33
6M150767	L17100545-21 A 10X 826-SPE D1	<2	1	10		10/18/17 05:02
6M150768	L17100545-22 A 10X 826-SPE	<2	1	10		10/18/17 05:31
6M150769	L17100637-05 A 826-SPE	<2	1	1		10/18/17 06:00
6M150770	L17100637-06 A 826-SPE	<2	1	1		10/18/17 06:30
6M150771	CCV	NA	1	1		10/18/17 06:59
6M150772	RINSE	NA	1	1		10/18/17 07:28
6M150773	RINSE	NA	1	1		10/18/17 07:57
6M150774	WG633712-02 FBLK 826-TC	NA	17	10		10/18/17 08:26

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 6M150725				
Not needed, DNR.				
9	X	100	Over Calibration Range	BENZENE
File ID: 6M150731				
L17100545-17				
13	X	1	Carry-over contamination	
File ID: 6M150735				
14-DCB carry over, DNR.				
14	X	1	Carry-over contamination	
File ID: 6M150736				
14-DCB carry over, DNR.				
29				
File ID: 6M150752				

Approved: October 18, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS6	Dataset:	101717		
Analyst1:	TMB	Analyst2:	JDS		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54360				

Internal Standard: STD81314 Surrogate Standard: STD84314

CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG634168; WG634400

Comments: File 6m150747 was not used.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			Not needed, DNR.	
41	X	1	Analyzed too dilute	
File ID: 6M150764				
	L17100545-18			
42	X	1	Analyzed too dilute	
File ID: 6M150765				
	L17100545-19 D1			
43	X	1	Analyzed too dilute	
File ID: 6M150766				
	L17100545-20			
44	X	2	Analyzed too dilute	
File ID: 6M150767				
	L17100545-21 D1			
45	X	50	Over Calibration Range	1,4-dioxane
File ID: 6M150768				
	L17100545-22			
46	X	1	Carry-over contamination	
File ID: 6M150769				
	L17100637-05 has possible 1,4-dioxane carry over.			

Approved: October 18, 2017

Sarah Vandenberg

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Instrument Run Log

Instrument: HPMS8 Dataset: 101817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634436

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422232	WG634435-01 50ng BFB STD 8260	NA	1	1	STD84001	10/18/17 09:53
8M422233	WG634435-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/18/17 10:19
8M422234	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/18/17 10:48
8M422235	WG634436-01 BLK 1018 STD 8260	NA	1	1		10/18/17 11:18
8M422236	WG634436-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/18/17 11:48
8M422237	WG634436-03 20ug/L LCS2 STD 8260	NA	1	1	STD84456	10/18/17 12:17
8M422238	L17100750-01 A 10X 826-TC-SPE	NA	17	10		10/18/17 12:47
8M422239	L17100637-25 A 826-SPE	<2	1	1		10/18/17 13:16
8M422240	L17100637-26 A 826-SPE	<2	1	1		10/18/17 13:46
8M422241	L17100637-28 A 826-SPE	<2	1	1		10/18/17 14:16
8M422242	L17100637-29 A 826-SPE	<2	1	1		10/18/17 14:45
8M422243	L17100637-30 A 826-SPE	<2	1	1		10/18/17 15:15
8M422244	L17100637-31 A 826-SPE	<2	1	1		10/18/17 15:44
8M422245	L17100637-32 A 826-SPE	<2	1	1		10/18/17 16:14
8M422246	L17100637-33 A 826-SPE	<2	1	1		10/18/17 16:43
8M422247	L17100637-34 A 826-SPE	<2	1	1		10/18/17 17:13
8M422248	L17100637-36 A 826-SPE	<2	1	1		10/18/17 17:42
8M422249	L17100637-37 A 826-SPE	<2	1	1		10/18/17 18:11
8M422250	L17100637-39 A 826-SPE	<2	1	1		10/18/17 18:40
8M422251	L17100637-40 A 826-SPE	<2	1	1		10/18/17 19:11
8M422252	L17100637-42 A 826-SPE	<2	1	1		10/18/17 19:41
8M422253	L17100637-35 A 826-SPE	<2	1	1		10/18/17 20:10
8M422254	L17100637-38 A 826-SPE	<2	1	1		10/18/17 20:39
8M422255	L17100637-27 A 826-SPE	<2	1	1		10/18/17 21:09
8M422256	L17100637-43 A 826-SPE	<2	1	1		10/18/17 21:39
8M422257	CCV	NA	1	1		10/18/17 22:08
8M422258	RINSE	NA	1	1		10/18/17 22:36
8M422259	L17100549-01 A 8260	<2	1	1		10/18/17 23:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 8M422234				

Approved: October 19, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634436

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			Not needed, DNR.	
5				
File ID: 8M422236				
			First surrgate is high.	
6				
File ID: 8M422237				
			First surrgate is high.	
8	X	1	Surrogate standard failure	
File ID: 8M422239				
9	X	1	Surrogate standard failure	
File ID: 8M422240				
10	X	1	Surrogate standard failure	
File ID: 8M422241				
11	X	1	Surrogate standard failure	
File ID: 8M422242				
12	X	1	Surrogate standard failure	
File ID: 8M422243				
13	X	1	Surrogate standard failure	
File ID: 8M422244				
16	X	1	Surrogate standard failure	
File ID: 8M422247				
19	X	1	Surrogate standard failure	
File ID: 8M422250				
20	X	1	Surrogate standard failure	
File ID: 8M422251				

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Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634436

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
21	X	1	Surrogate standard failure	
File ID: 8M422252				
22	X	1	Surrogate standard failure	
File ID: 8M422253				
23	X	1	Surrogate standard failure	
File ID: 8M422254				
25	X	1	Surrogate standard failure	
File ID: 8M422256				

Approved: October 19, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101817
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634456 WG634457

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22446	WG634454-01 50ng BFB 8260	NA	1	1	STD84001	10/18/17 10:35
11M22447	WG634454-02 50ug/L CCV 8260	NA	1	1	STD84376	10/18/17 10:59
11M22448	WG634459-01 100ug/L CCV A9 8260	NA	1	1	STD00000	10/18/17 11:30
11M22449	WG634456-01 BLANK 8260	NA	1	1		10/18/17 12:00
11M22450	WG634456-02 20ug/L LCS 8260	NA	1	1	STD84357	10/18/17 12:29
11M22451	L17100637-13 A 20ug/L MS 8260	<2	12	1	STD84357	10/18/17 12:59
11M22452	L17100637-14 A 20ug/L MSD 8260	<2	12	1	STD84357	10/18/17 13:29
11M22453	L17100755-02 D 10,000,000X 8260	<2	12	10000000		10/18/17 13:58
11M22454	L17100755-17 D 100,000X 826	NA	12	10000		10/18/17 14:28
11M22455	L17100637-12 A REF 826-SPE	<2	12	1		10/18/17 14:57
11M22456	L17100637-04 A 826-SPE	<2	1	1		10/18/17 15:26
11M22457	L17100637-05 A 826-SPE	<2	1	1		10/18/17 15:56
11M22458	L17100637-07 A 826-SPE	<2	1	1		10/18/17 16:26
11M22459	L17100637-08 A 826-SPE	<2	1	1		10/18/17 16:55
11M22460	L17100637-09 A 826-SPE	<2	1	1		10/18/17 17:24
11M22461	L17100637-10 A 826-SPE	<2	1	1		10/18/17 17:53
11M22462	L17100637-11 A 826-SPE	<2	1	1		10/18/17 18:22
11M22463	L17100637-15 A 826-SPE	<2	1	1		10/18/17 18:52
11M22464	L17100637-16 A 826-SPE	<2	1	1		10/18/17 19:21
11M22465	L17100637-17 A 826-SPE	<2	1	1		10/18/17 19:51
11M22466	L17100637-18 A 826-SPE	<2	1	1		10/18/17 20:20
11M22467	L17100637-19 A 826-SPE	<2	1	1		10/18/17 20:50
11M22468	L17100637-20 A 826-SPE	<2	1	1		10/18/17 21:19
11M22469	L17100637-21 A 826-SPE	<2	1	1		10/18/17 21:49
11M22470	WG634457-01 20ug/mL LCS 624-SPE	NA	2	1	STD84357	10/18/17 22:18
11M22471	WG634457-02 20ug/mL LCS2 624-SPE	NA	2	1	STD84357	10/18/17 22:47
11M22472	RINSE	NA	2	1	STD84357	10/18/17 23:16
11M22473	WG634457-03 BLANK 624-SPE	NA	2	1		10/18/17 23:46
11M22474	L17101119-07 A TB 624-SPE	<2	2	1		10/19/17 00:14
11M22475	L17101111-02 A TB 624-SPE	5	2	1		10/19/17 00:44
11M22476	L17101111-01 A 624-SPE	5	2	1		10/19/17 01:13
11M22477	L17101087-02 A 624-SPE	<2	2	1		10/19/17 01:42
11M22478	L17101119-01 A 624-SPE	<2	2	1		10/19/17 02:11
11M22479	L17101119-03 A 624-SPE	<2	2	1		10/19/17 02:39

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Instrument Run Log

Instrument: HPMS11 Dataset: 101817
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54359

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634456 WG634457

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22480	L17101119-05 A 624-SPE	<2	2	1		10/19/17 03:08
11M22481	CCV	NA	2	1		10/19/17 03:37
11M22482	RINSE	NA	2	1		10/19/17 04:06
11M22483	RINSE	NA	2	1		10/19/17 04:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes
9	X	10000000	Over Calibration Range	TETRAHYDROFURAN
File ID: 11M22454				
L17100755-17 RERUN AT 10,000,000X				

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54362

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634505

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150775	WG634503-01 50ng BFB STD 8260	NA	1	1	STD84001	10/18/17 11:39
6M150776	WG634503-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/18/17 12:05
6M150777	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/18/17 12:34
6M150778	WG634505-01 BLK 1018 STD 8260	NA	1	1		10/18/17 13:04
6M150779	WG634505-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/18/17 13:33
6M150780	WG634505-03 20ug/L LCS2 STD 8260	NA	1	1	STD84456	10/18/17 14:03
6M150781	L17100815-01 A 10X 826-TC	NA	17	10		10/18/17 14:32
6M150782	L17100637-47 A TB 826-SPE	<2	1	1		10/18/17 15:02
6M150783	L17100637-46 A 826-SPE	<2	1	1		10/18/17 15:31
6M150784	L17100637-45 A 826-SPE	<2	1	1		10/18/17 16:01
6M150785	L17100707-01 A 8260	<2	1	1		10/18/17 16:31
6M150786	L17100707-02 A 8260	<2	1	1		10/18/17 17:01
6M150787	L17100707-03 A 8260	<2	1	1		10/18/17 17:29
6M150788	L17100707-04 A 8260	<2	1	1		10/18/17 17:59
6M150789	L17100707-05 A 8260	<2	1	1		10/18/17 18:28
6M150790	L17100545-20 B 826-SPE	<2	1	1		10/18/17 18:58
6M150791	L17100545-19 B 826-SPE	<2	1	1		10/18/17 19:27
6M150792	L17100545-18 B 826-SPE	<2	1	1		10/18/17 19:57
6M150793	L17100545-22 B 50X D1 826-SPE	<2	1	50		10/18/17 20:26
6M150794	L17100441-01 B 5X D1 826-SPE	<2	1	5		10/18/17 20:56
6M150795	L17100441-09 B 20X D1 826-SPE	<2	1	20		10/18/17 21:25
6M150796	L17100441-10 B 20X D1 826-SPE	<2	1	20		10/18/17 21:55
6M150797	L17100441-12 B 10X D1 826-SPE	<2	1	10		10/18/17 22:24
6M150798	L17100545-21 B 2X 00 826-SPE	<2	1	2		10/18/17 22:53
6M150799	L17100441-18 A 826-SPE	<2	1	1		10/18/17 23:22
6M150800	CCV	NA	1	1		10/18/17 23:51
6M150801	RINSE	NA	1	1		10/19/17 00:21
6M150802	RINSE	NA	1	1		10/19/17 00:50
6M150803	L17100548-01 A 8260	<2	1	1		10/19/17 01:19

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				

Approved: October 19, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS6	Dataset:	101817		
Analyst1:	TMB	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54362				

Internal Standard: STD84314 Surrogate Standard: STD84314

CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG634505

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M150777				
Not needed, DNR.				
24	X	10	Over Calibration Range	1,4-DIOXANE
File ID: 6M150798				

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Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 101917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54366

Internal Standard: STD84472 Surrogate Standard: STD84472
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634606

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M422260	WG634605-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 06:35
8M422261	WG634605-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 07:02
8M422262	WG634605-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 07:31
8M422263	WG634605-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 08:05
8M422264	WG634605-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 08:18
8M422265	WG634605-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 08:43
8M422266	WG634605-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 09:13
8M422267	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/19/17 09:43
8M422268	WG634606-01 BLK 1019 STD 8260	NA	1	1		10/19/17 10:11
8M422269	WG634606-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/19/17 10:41
8M422270	WG634606-03 20ug/L LCS2 STD 8260	NA	1	1	STD84456	10/19/17 11:11
8M422271	L17100933-02 A 10X 826-TC	NA	17	10		10/19/17 11:41
8M422272	L17100637-25 B 826-SPE	<2	1	1		10/19/17 12:11
8M422273	L17100637-26 B 826-SPE	<2	1	1		10/19/17 12:40
8M422274	L17100637-28 B 826-SPE	<2	1	1		10/19/17 13:09
8M422275	L17100637-29 B 826-SPE	<2	1	1		10/19/17 13:40
8M422276	L17100637-30 B 826-SPE	<2	1	1		10/19/17 14:09
8M422277	L17100637-31 B 826-SPE	<2	1	1		10/19/17 14:38
8M422278	L17100637-32 B 826-SPE	<2	1	1		10/19/17 15:08
8M422279	L17100637-34 B 826-SPE	<2	1	1		10/19/17 15:38
8M422280	L17100933-04 A 10X 826-TC	NA	17	10		10/19/17 16:07
8M422281	L17100933-06 A 10X 826-TC	NA	17	10		10/19/17 16:36
8M422282	L17100933-08 A 10X 826-TC	NA	17	10		10/19/17 17:06
8M422283	L17100933-10 A 10X 826-TC	NA	17	10		10/19/17 17:36
8M422284	L17100933-12 A 10X 826-TC	NA	17	10		10/19/17 18:05
8M422285	L17100933-14 A 10X 826-TC	NA	17	10		10/19/17 18:35
8M422286	L17100933-16 A 10X 826-TC	NA	17	10		10/19/17 19:04
8M422287	L17100933-18 A 10X 826-TC	NA	17	10		10/19/17 19:33
8M422288	L17100933-20 A 10X 826-TC	NA	17	10		10/19/17 20:03
8M422289	L17100933-22 A 10X 826-TC	NA	17	10		10/19/17 20:32
8M422290	CCV	NA	1	1		10/19/17 21:02
8M422291	RINSE	NA	1	1		10/19/17 21:32
8M422292	WG634271-01 A FBLK 10X 826-TC	NA	17	10		10/19/17 22:02
8M422293	FBLK \# 284 A 10X 826-TC	NA	17	10		10/19/17 22:31

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Instrument Run Log

Instrument: HPMS8 Dataset: 101917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54366

Internal Standard: STD84472 Surrogate Standard: STD84472
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634606

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 8M422261				
	11-DCE was high, DNR.			
3	X			
File ID: 8M422262				
	11-DCE was high, DNR.			
4	X			
File ID: 8M422263				
	Tune failed, DNR. Made a new is/ss mix.			
5	X			
File ID: 8M422264				
	Tune failed, DNR.			
6				
File ID: 8M422265				
	Purged the BFB.			
8				
File ID: 8M422267				
	Not needed, DNR.			
13	X	1	Carry-over contamination	
File ID: 8M422272				
	L17100637-25 possible naph carry over.			

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101917
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54365

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634645 WG634647

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22484	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 09:25
11M22485	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 09:39
11M22486	WG634644-02 50ug/L CCV 8260	NA	1	1	STD84376	10/19/17 10:04
11M22487	WG634644-02 50ug/L CCV 8260	NA	1	1	STD84376	10/19/17 10:39
11M22488	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 11:24
11M22489	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 12:11
11M22490	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 12:52
11M22491	WG634644-01 50ng BFB 8260	NA	1	1	STD84001	10/19/17 13:54
11M22492	WG634644-02 50ug/L CCV 8260	NA	1	1	STD84376	10/19/17 14:47
11M22493	WG634648-01 100ug/mL A	NA	1	1		10/19/17 15:16
11M22494	WG634645-01 BLANK 8260	NA	1	1		10/19/17 15:46
11M22495	WG634645-02 20ug/L LCS 8260	NA	1	1	STD84357	10/19/17 16:15
11M22496	L17100637-62 A 20ug/L MS 826-SPE	<2	12	1	STD84357	10/19/17 16:45
11M22497	L17100637-63 A 20ug/L MSD 826-SPE	<2	12	1	STD84357	10/19/17 17:14
11M22498	L17100755-17 D3 10,000,000X 8260	<2	12	10000000		10/19/17 17:43
11M22499	L17100637-53 A TB 826-SPE	<2	1	1		10/19/17 18:12
11M22500	L17100637-65 A TB 826-SPE	<2	1	1		10/19/17 18:41
11M22501	L17100637-61 A REF 826-SPE	<2	12	1		10/19/17 19:11
11M22502	L17100637-48 A 826-SPE	<2	1	1		10/19/17 19:41
11M22503	L17100637-49 A 826-SPE	<2	1	1		10/19/17 20:10
11M22504	L17100637-50 A 826-SPE	<2	1	1		10/19/17 20:39
11M22505	L17100637-51 A 826-SPE	<2	1	1		10/19/17 21:08
11M22506	L17100637-52 A 826-SPE	<2	1	1		10/19/17 21:38
11M22507	L17100637-55 A 826-SPE	<2	1	1		10/19/17 22:07
11M22508	L17100637-56 A 826-SPE	<2	1	1		10/19/17 22:36
11M22509	L17100637-57 A 826-SPE	<2	1	1		10/19/17 23:06
11M22510	L17100637-58 A 826-SPE	<2	1	1		10/19/17 23:35
11M22511	L17100637-59 A 826-SPE	<2	1	1		10/20/17 00:04
11M22512	L17100637-60 A 826-SPE	<2	1	1		10/20/17 00:33
11M22513	L17100637-64 A 5X 826-SPE	3	1	5		10/20/17 01:02
11M22514	WG634647-01 20ug/mL LCS 624-SPE	NA	2	1		10/20/17 01:31
11M22515	WG634647-02 20ug/mL LCS2 624-SPE	NA	2	1		10/20/17 02:01
11M22516	RINSE	NA	2	1		10/20/17 02:30
11M22517	WG634647-03 BLANK 624-SPE	NA	2	1		10/20/17 02:59

Approved: October 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101917
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54365

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634645 WG634647

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22518	L17101165-07 A TB 624-SPE	<2	2	1		10/20/17 03:28
11M22519	L17101154-02 A 624-SPE	7	2	1		10/20/17 03:57
11M22520	L17101154-01 A 200X 624-SPE	6	2	200		10/20/17 04:26
11M22521	L17101164-01 A 624-SPE	3	2	1		10/20/17 04:56
11M22522	L17101164-02 A 624-SPE	7	2	1		10/20/17 05:25
11M22523	L17101164-03 A 624-SPE	6	2	1		10/20/17 05:54
11M22524	L17101159-02 A 624-SPE	6	2	1		10/20/17 06:23
11M22525	L17101159-03 A 624-SPE	6	2	1		10/20/17 06:52
11M22526	L17101165-01 A 624-SPE	<2	2	1		10/20/17 07:21
11M22527	L17101165-03 A 624-SPE	<2	2	1		10/20/17 07:50
11M22528	L17101169-01 A 624-SPE	6	2	1		10/20/17 08:19
11M22529	L17101165-05 A 624-SPE	7	2	1		10/20/17 08:48
11M22530	L17101167-01 A 624-SPE	9	2	1		10/20/17 09:17
11M22531	L17101168-01 A 624-SPE	9	2	1		10/20/17 09:46
11M22532	CCV	NA	2	1		10/20/17 10:16
11M22533	RINSE	NA	2	1		10/20/17 10:45
11M22534	RINSE	NA	2	1		10/20/17 11:15

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 11M22484				
			WG634644-01 RERUN BFB.	
3				
File ID: 11M22486				
			WG634644-02 SLIGHTLY LOW RERUN CCV FOR KETONES.	
4				
File ID: 11M22487				
			WG634644-02 DIOXANE LOW. CHANGE SPARGE TUBE.	
5				
File ID: 11M22488				
			WG634644-01 RERUN BFB	
6	X			
File ID: 11M22489				

Approved: October 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101917
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID: 54365

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634645 WG634647

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			WG634644-01 BFB FAILED. RUN PURGE BFB.	
7	X			
File ID: 11M22490				
			WG634644-01 PURGE BFB FAILED. CHANGE SEPTA, LINER, ORING AND GOLD SEAL.	
39	X	5	Check Standard Failure	TCE
File ID: 11M22522				
			L17101164-02 RERUN 5X FOR TCE	
40	X	1		
File ID: 11M22523				
			L17101164-03 RERUN 1X FOR CARRYOVER	
41	X	1		
File ID: 11M22524				
			L17101159-02 RERUN 1X FOR CARRYOVER.	
42	X	1		
File ID: 11M22525				
			L17101159-03 RERUN 1X FOR CARRYOVER	
			L17101159-03 RERUN 1X FOR CARRYOVER	
43	X			
File ID: 11M22526				
			L17101165-01 RERUN 1X FOR CARRYOVER	
44	X			
File ID: 11M22527				
			L17101165-03 RERUN 1X FOR CARRYOVER	
45	X			
File ID: 11M22528				
			L17101169-01 RERUN 1X FOR CARYOVER	

Approved: October 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101917
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634603; WG634775

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150804	WG634601-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 06:39
6M150805	WG634601-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 07:05
6M150806	WG634601-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 07:37
6M150807	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/19/17 08:07
6M150808	WG634603-01 BLK 1019 STD 8260	NA	1	1		10/19/17 08:37
6M150809	WG634603-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/19/17 09:04
6M150810	WG634603-03 20ug/L LCS2 STD 8260	NA	1	1	STD84456	10/19/17 09:33
6M150811	WG634023-01 A FBLK 10X 826-TC	NA	17	10		10/19/17 10:02
6M150812	L17100825-01 A 826-SPE	<2	1	1		10/19/17 10:32
6M150813	L17100897-01 A 10X 826-TC	NA	17	10		10/19/17 11:02
6M150814	L17100897-03 A 10X 826-TC	NA	17	10		10/19/17 11:32
6M150815	L17100897-05 A 10X 826-TC	NA	17	10		10/19/17 12:02
6M150816	L17100897-07 A 10X 826-TC	NA	17	10		10/19/17 12:32
6M150817	L17100897-09 A 10X 826-TC	NA	17	10		10/19/17 13:01
6M150818	L17100897-11 A 10X 826-TC	NA	17	10		10/19/17 13:31
6M150819	L17100897-13 A 10X 826-TC	NA	17	10		10/19/17 14:01
6M150820	L17100897-15 A 10X 826-TC	NA	17	10		10/19/17 14:30
6M150821	L17100897-17 A 10X 826-TC	NA	17	10		10/19/17 15:00
6M150822	L17100952-02 A 10X 826-TC	NA	17	10		10/19/17 15:29
6M150823	L17100947-01 A 10X 826-TC	NA	17	10		10/19/17 15:58
6M150824	L17101157-01 A 826-SPE2	3	1	1		10/19/17 16:28
6M150825	L17101157-02 A 826-SPE2	<2	1	1		10/19/17 16:57
6M150826	WG634774-01 50ng BFB STD 8260	NA	1	1	STD84001	10/19/17 17:56
6M150827	WG634774-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 18:21
6M150828	WG634774-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/19/17 19:00
6M150829	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/19/17 19:29
6M150830	WG634775-01 BLK 1019 STD 8260	NA	1	1		10/19/17 19:59
6M150831	WG634775-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/19/17 20:28
6M150832	WG634775-03 20ug/L LCS2 STD 8260	NA	1	1	STD84456	10/19/17 20:57
6M150833	RINSE	NA	1	1		10/19/17 21:26
6M150834	L17100896-04 A TB 826-LOW	<2	1	1		10/19/17 21:55
6M150835	L17100896-01 A 826-LOW	<2	1	1		10/19/17 22:25
6M150836	L17100896-02 A 826-LOW	<2	1	1		10/19/17 22:54
6M150837	L17100896-03 A 826-LOW	<2	1	1		10/19/17 23:24

Approved: October 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101917
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634603; WG634775

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150838	L17100896-05 A 826-LOW	<2	1	1		10/19/17 23:53
6M150839	L17100637-24 A 826-SPE	<2	1	1		10/20/17 00:22
6M150840	L17100637-44 A 826-SPE	<2	1	1		10/20/17 00:52
6M150841	L17100637-35 B 826-SPE	<2	1	1		10/20/17 01:21
6M150842	L17100637-42 B 826-SPE	<2	1	1		10/20/17 01:50
6M150843	L17100637-38 B 826-SPE	<2	1	1		10/20/17 02:19
6M150844	L17100637-43 B 826-SPE	<2	1	1		10/20/17 02:49
6M150845	L17100637-41 A 826-SPE	<2	1	1		10/20/17 03:18
6M150846	L17100637-54 A 826-SPE	<2	1	1		10/20/17 03:47
6M150847	L17100637-23 A 826-SPE	<2	1	1		10/20/17 04:17
6M150848	L17100637-22 A 826-SPE	<2	1	1		10/20/17 04:46
6M150849	L17100637-33 B 826-SPE	<2	1	1		10/20/17 05:16
6M150850	CCV	NA	1	1		10/20/17 05:45
6M150851	RINSE	NA	1	1		10/20/17 06:14
6M150852	RINSE	NA	1	1		10/20/17 06:43

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 6M150805				
			Bromomethane was low, DNR.	
4				
File ID: 6M150807				
			Not needed, DNR.	
24	X			
File ID: 6M150827				
			Bromomethane was low, DNR.	
26				
File ID: 6M150829				
			Not needed, DNR.	

Approved: October 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: STD84456

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634867

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150853	WG634866-01 50ng BFB STD 8260	NA	1	1	STD84001	10/20/17 11:17
6M150854	WG634866-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/20/17 11:42
6M150855	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/20/17 12:12
6M150856	WG634867-01 BLK 1020 STD 8260	NA	1	1		10/20/17 12:41
6M150857	WG634867-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/20/17 13:11
6M150858	L17100670-05 A TB 8260	<2	1	1		10/20/17 13:41
6M150859	L17100839-04 A TB 826-SPE	<2	1	1		10/20/17 14:10
6M150860	L17100637-25 C 826-SPE	<2	1	1		10/20/17 14:40
6M150861	L17100670-04 A 8260	<2	1	1		10/20/17 15:10
6M150862	L17100891-21 A RS 2X 826-SPE	<2	1	2		10/20/17 15:39
6M150863	L17100891-18 A 2.5X 826-SPE	<2	1	2.5		10/20/17 16:09
6M150864	L17100891-19 A 20X 826-SPE	<2	1	20		10/20/17 16:39
6M150865	L17100891-20 A 500X 826-SPE	<2	1	500		10/20/17 17:08
6M150866	L17100891-24 A 5X 826-SPE	<2	1	5		10/20/17 17:37
6M150867	L17101162-01 A 826-SPE	<2	1	1		10/20/17 18:07
6M150868	L17100839-01 A 826-SPE	4	1	1		10/20/17 18:36
6M150869	L17100839-02 A 826-SPE	<2	1	1		10/20/17 19:06
6M150870	L17100839-03 A 826-SPE	<2	1	1		10/20/17 19:36
6M150871	L17101004-01 A 10X 826-TC	NA	17	10		10/20/17 20:06
6M150872	L17100891-21 B 826-SPE	<2	1	1		10/20/17 20:36
6M150873	L17100891-22 B MS 826-SPE	<2	1	1	STD84456	10/20/17 21:06
6M150874	L17100891-23 A MSD 826-SPE	<2	1	1	STD84456	10/20/17 21:36
6M150875	L17100670-01 A 200X 8260	<2	1	200		10/20/17 22:06
6M150876	L17100670-02 A 500X 8260	<2	1	500		10/20/17 22:35
6M150877	L17100670-03 A 2000X 8260	<2	1	2000		10/20/17 23:05
6M150878	CCV	NA	1	1		10/20/17 23:35
6M150879	RINSE	NA	1	1		10/21/17 00:05
6M150880	RINSE	NA	1	1		10/21/17 00:34
6M150881	RINSE	NA	1	1		10/21/17 01:04

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				

Approved: October 23, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: STD84456

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634867

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M150855				
	Not needed, DNR.			
10	X	1	Analyzed too dilute	
File ID: 6M150862				
	L17100891-21 DNR.			
13	X	2500	Over Calibration Range	cis12-dce
File ID: 6M150865				
	L17100891-20			
14	X	20	Over Calibration Range	vc, cis12-dce
File ID: 6M150866				
	L17100891-24			
16	X	1	Carry-over contamination	
File ID: 6M150868				
	L17100839-01 has possible naph carry over.			
23	X	100	Analyzed too dilute	
File ID: 6M150875				
	L17100670-01			

Approved: October 23, 2017

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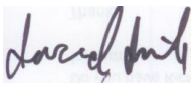
Microbac Laboratories Inc.

Data Checklist

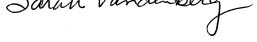
Date: 22-JUN-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 82939
Analytical Workgroups: WG618911

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
23-JUN-2017



Secondary Reviewer:
23-JUN-2017



CHECKLIST1 - Modified 03/05/2008
Generated: JUN-23-2017 13:08:29

Microbac Laboratories Inc.

Data Checklist

Date: 27-JUN-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: WG619415
Runlog ID: 83047
Analytical Workgroups: WG619505, WG619576

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-JUN-2017

Secondary Reviewer:
29-JUN-2017

CHECKLIST1 - Modified 03/05/2008
Generated: JUN-29-2017 09:22:06

Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

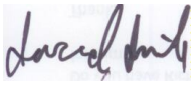
Microbac Laboratories Inc.

Data Checklist

Date: 24-AUG-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 84200
Analytical Workgroups: WG627119 (ICAL) WG627121

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	NA
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
26-AUG-2017



Secondary Reviewer:
04-SEP-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-20-2017 12:21:02

Microbac Laboratories Inc.

Data Checklist

Date: 31-AUG-2017
Analyst: ADC
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 84380
Analytical Workgroups: WG628027

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
05-SEP-2017
Tiffany Bailey

Secondary Reviewer:
05-SEP-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: SEP-05-2017 17:57:24

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

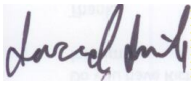
Microbac Laboratories Inc.

Data Checklist

Date: 12-OCT-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85262
Analytical Workgroups: WG633647

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
14-OCT-2017



Secondary Reviewer:
16-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-16-2017 11:32:33

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85335
Analytical Workgroups: WG634316 WG634377

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
19-OCT-2017

Cathy Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-19-2017 13:44:17

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 85345
Analytical Workgroups: WG634047; WG634380

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017
Tiffany Bailey

Secondary Reviewer:
19-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-19-2017 14:27:20

Microbac Laboratories Inc.

Data Checklist

Date: 17-OCT-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85330
Analytical Workgroups: WG634168; WG634400

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-OCT-2017
Tiffany Bailey

Secondary Reviewer:
18-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-18-2017 13:12:44

Microbac Laboratories Inc.

Data Checklist

Date: 18-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 85365
Analytical Workgroups: WG634436

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
19-OCT-2017
Tiffany Bailey

Secondary Reviewer:
19-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-19-2017 14:48:50

Microbac Laboratories Inc.

Data Checklist

Date: 18-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85371
Analytical Workgroups: WG634456 WG634457

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
19-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
20-OCT-2017

Cathy Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-20-2017 14:26:14

Microbac Laboratories Inc.

Data Checklist

Date: 18-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85351
Analytical Workgroups: WG634505

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
19-OCT-2017
Tiffany Bailey

Secondary Reviewer:
19-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-19-2017 13:44:16

Microbac Laboratories Inc.

Data Checklist

Date: 19-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 85394
Analytical Workgroups: WG634606

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
20-OCT-2017

Secondary Reviewer:
20-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-20-2017 16:11:16

Microbac Laboratories Inc.

Data Checklist

Date: 19-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85395
Analytical Workgroups: WG634645 WG634647

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
20-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
24-OCT-2017

Cathy Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-24-2017 09:06:06

Microbac Laboratories Inc.

Data Checklist

Date: 19-OCT-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85382
Analytical Workgroups: WG634603; WG634775

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
20-OCT-2017
Tiffany Bailey

Secondary Reviewer:
20-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-20-2017 11:56:27

Microbac Laboratories Inc.

Data Checklist

Date: 20-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85417
Analytical Workgroups: WG634867

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
23-OCT-2017
Tiffany Bailey

Secondary Reviewer:
23-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-23-2017 14:12:38

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634316

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-39-LA-26	01	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
MW-206B-LA-26	02	10/07/17					10/17/2017	10.3	14		10/17/17	10.3	14	
MW-108-LA-26	03	10/07/17					10/17/2017	10.4	14		10/17/17	10.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5534627
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634400

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-218-LA-26	06	10/08/17					10/18/2017	9.9	14		10/18/17	9.9	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5534627
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634436

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-107T-LA-26	27	10/08/17					10/18/2017	10.5	14		10/18/17	10.5	14	
MW-215A-LA-26	36	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-262-LA-26	37	10/08/17					10/18/2017	10.3	14		10/18/17	10.3	14	
DUP-11-LA-26	39	10/08/17					10/18/2017	10.3	14		10/18/17	10.3	14	
DUP-9-LA-26	40	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5534627
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG634456

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-209A-LA-26	04	10/07/17					10/18/2017	10.9	14		10/18/17	10.9	14	
MW-98-LA-26	05	10/07/17					10/18/2017	11	14		10/18/17	11	14	
MW-207A-LA-26	07	10/07/17					10/18/2017	11.1	14		10/18/17	11.1	14	
DR2-6-LA-26	08	10/08/17					10/18/2017	10.3	14		10/18/17	10.3	14	
MW-275-LA-26	09	10/08/17					10/18/2017	10.1	14		10/18/17	10.1	14	
MW-280-LA-26	10	10/08/17					10/18/2017	10.1	14		10/18/17	10.1	14	
MW-269-LA-26	11	10/08/17					10/18/2017	10.1	14		10/18/17	10.1	14	
MW-90-LA-26	12	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-90-LA-26-MS	13	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-90-LA-26-MSD	14	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-214A-LA-26	15	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-141-LA-26	16	10/08/17					10/18/2017	10.4	14		10/18/17	10.4	14	
MW-276-LA-26	17	10/08/17					10/18/2017	10.1	14		10/18/17	10.1	14	
MW-199B-LA-26	18	10/08/17					10/18/2017	10.5	14		10/18/17	10.5	14	
MW-268-LA-26	19	10/08/17					10/18/2017	10.3	14		10/18/17	10.3	14	
MW-273-LA-26	20	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-107B-LA-26	21	10/08/17					10/18/2017	10.5	14		10/18/17	10.5	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634505

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-254-LA-26	45	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
MW-282-LA-26	46	10/08/17					10/18/2017	10.2	14		10/18/17	10.2	14	
LTM-TB3-LA-26	47	10/09/17					10/18/2017	9.3	14		10/18/17	9.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5534627
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634606

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-214B-LA-26	26	10/08/17					10/19/2017	11	14		10/19/17	11	14	
MW-34-LA-26	28	10/08/17					10/19/2017	10.9	14		10/19/17	10.9	14	
MW-199A-LA-26	29	10/08/17					10/19/2017	11.2	14		10/19/17	11.2	14	
MW-63B-LA-26	30	10/08/17					10/19/2017	11.1	14		10/19/17	11.1	14	
MW-50-LA-26	31	10/08/17					10/19/2017	11	14		10/19/17	11	14	
DUP-12-LA-26	32	10/08/17					10/19/2017	11	14		10/19/17	11	14	
MW-104-LA-26	34	10/08/17					10/19/2017	11.2	14		10/19/17	11.2	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG634645

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-267-LA-26	48	10/08/17					10/19/2017	11.3	14		10/19/17	11.3	14	
MW-256-LA-26	49	10/08/17					10/19/2017	11.4	14		10/19/17	11.4	14	
MW-202B-LA-26	50	10/08/17					10/19/2017	11.3	14		10/19/17	11.3	14	
MW-212-LA-26	51	10/08/17					10/19/2017	11.3	14		10/19/17	11.3	14	
MW-255-LA-26	52	10/08/17					10/19/2017	11.1	14		10/19/17	11.1	14	
LTM-TB2-LA-26	53	10/09/17					10/19/2017	10.2	14		10/19/17	10.2	14	
DUP-3-LA-26	55	10/08/17					10/19/2017	11.3	14		10/19/17	11.3	14	
MW-198-LA-26	56	10/08/17					10/19/2017	11.3	14		10/19/17	11.3	14	
MW-62-LA-26	57	10/08/17					10/19/2017	11.4	14		10/19/17	11.4	14	
MW-142-LA-26	58	10/08/17					10/19/2017	11.4	14		10/19/17	11.4	14	
MW-270-LA-26	59	10/09/17					10/20/2017	10.7	14		10/20/17	10.7	14	
MW-272-LA-26	60	10/09/17					10/20/2017	10.7	14		10/20/17	10.7	14	
MW-271-LA-26	61	10/09/17					10/19/2017	10.5	14		10/19/17	10.5	14	
MW-271-LA-26-MS	62	10/09/17					10/19/2017	10.4	14		10/19/17	10.4	14	
MW-271-LA-26-MSD	63	10/09/17					10/19/2017	10.4	14		10/19/17	10.4	14	
MW-213-LA-26	64	10/09/17					10/20/2017	10.4	14		10/20/17	10.4	14	
LTM-TB1-LA-26	65	10/09/17					10/19/2017	10	14		10/19/17	10	14	

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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG634775

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-260-LA-26	22	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	
MW-215B-LA-26	23	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	
MW-264-LA-26	24	10/08/17					10/20/2017	11.4	14		10/20/17	11.4	14	
MW-103-LA-26	33	10/08/17					10/20/2017	11.8	14		10/20/17	11.8	14	
MW-281-LA-26	35	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	
MW-263-LA-26	38	10/08/17					10/20/2017	11.7	14		10/20/17	11.7	14	
MW-140-LA-26	41	10/08/17					10/20/2017	11.7	14		10/20/17	11.7	14	
MW-258-LA-26	42	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	
MW-265-LA-26	43	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	
MW-278-LA-26	44	10/08/17					10/20/2017	11.4	14		10/20/17	11.4	14	
MW-202A-LA-26	54	10/08/17					10/20/2017	11.6	14		10/20/17	11.6	14	

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Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634867

Login Number: L17100637

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-89-LA-26	25	10/08/17					10/20/2017	12.2	14		10/20/17	12.2	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5534627
Report generated 10/23/2017 17:17

Login Number: L17100637
Instrument Id: HPMS6
Workgroup (AAB#): WG634505

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-45	1.00	01	103	103	100	97.3
L17100637-46	1.00	01	104	103	100	97.6
L17100637-47	1.00	01	104	102	101	97.9
WG634505-01	1.00	01	105	102	101	97.4
WG634505-02	1.00	01	101	101	98.9	96.9
WG634505-03	1.00	01	101	101	97.9	96.5

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Login Number: L17100637
Instrument Id: HPMS6
Workgroup (AAB#): WG634400

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-06	1.00	01	103	101	101	98.4
WG634400-01	1.00	01	97.3	98.8	102	99.3
WG634400-02	1.00	01	96.9	97.8	101	97.9
WG634400-03	1.00	01	98.3	98.9	100	96.8

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100637
Instrument Id: HPMS6
Workgroup (AAB#): WG634867

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-25	1.00	01	110	105	100	101
WG634867-01	1.00	01	108	104	99.8	100
WG634867-02	1.00	01	106	104	97.2	99.0

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Login Number: L17100637
Instrument Id: HPMS8
Workgroup (AAB#): WG634606

Method: 8260
CAL ID: HPMS8-17-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-26	1.00	01	94.9	95.3	93.8	96.6
L17100637-28	1.00	01	94.9	94.1	92.8	95.5
L17100637-29	1.00	01	96.2	96.0	93.5	97.0
L17100637-30	1.00	01	91.2	91.8	94.0	96.8
L17100637-31	1.00	01	96.2	96.7	94.4	97.3
L17100637-32	1.00	01	95.4	96.1	93.7	97.2
L17100637-34	1.00	01	102	102	96.0	97.8
WG634606-01	1.00	01	97.4	101	91.8	96.4
WG634606-02	1.00	01	95.8	98.4	89.6	96.5
WG634606-03	1.00	01	95.1	96.5	91.7	96.2

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Login Number: L17100637
Instrument Id: HPMS6
Workgroup (AAB#): WG634775

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-22	1.00	01	108	106	101	100
L17100637-23	1.00	01	110	105	99.5	99.5
L17100637-24	1.00	01	108	104	102	100
L17100637-33	1.00	02	109	106	99.7	101
L17100637-35	1.00	01	109	105	100	100
L17100637-38	1.00	01	108	103	99.6	99.6
L17100637-41	1.00	01	110	105	101	101
L17100637-42	1.00	01	108	104	101	99.9
L17100637-43	1.00	01	109	103	101	101
L17100637-44	1.00	01	109	104	101	101
L17100637-54	1.00	01	110	105	100	100
WG634775-01	1.00	01	107	104	101	99.7
WG634775-02	1.00	01	105	102	97.7	98.9
WG634775-03	1.00	01	106	103	99.9	99.3

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100637
Instrument Id: HPMS11
Workgroup (AAB#): WG634316

Method: 8260
CAL ID: HPMS11-12-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-01	1.00	01	103	103	109	103
L17100637-02	1.00	01	105	104	108	107
L17100637-03	1.00	01	105	106	112	109
WG634316-01	1.00	01	105	107	112	107
WG634316-02	1.00	01	101	105	106	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Login Number: L17100637
Instrument Id: HPMS11
Workgroup (AAB#): WG634645

Method: 8260
CAL ID: HPMS11-12-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-48	1.00	01	103	103	103	104
L17100637-49	1.00	01	104	104	105	106
L17100637-50	1.00	01	104	101	107	104
L17100637-51	1.00	01	104	106	106	106
L17100637-52	1.00	01	103	103	104	103
L17100637-53	1.00	01	104	103	104	106
L17100637-55	1.00	01	105	104	101	105
L17100637-56	1.00	01	106	103	104	106
L17100637-57	1.00	01	104	105	105	107
L17100637-58	1.00	01	105	104	99.8	102
L17100637-59	1.00	01	104	104	99.0	104
L17100637-60	1.00	01	107	104	103	104
L17100637-61	1.00	01	104	104	105	105
L17100637-62	1.00	01	105	107	105	105
L17100637-63	1.00	01	101	104	104	103
L17100637-64	5.00	DL01	105	103	103	101
L17100637-65	1.00	01	103	102	104	104
WG634645-01	1.00	01	108	108	111	107
WG634645-02	1.00	01	103	104	101	104

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100637
Instrument Id: HPMS8
Workgroup (AAB#): WG634436

Method: 8260
CAL ID: HPMS8-17-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-27	1.00	01	112	114	99.6	96.8
L17100637-36	1.00	01	111	113	102	96.8
L17100637-37	1.00	01	108	109	102	96.0
L17100637-39	1.00	01	105	106	101	96.1
L17100637-40	1.00	01	113	113	104	95.7
WG634436-01	1.00	01	95.7	95.1	97.0	94.0
WG634436-02	1.00	01	116	123	97.2	95.0
WG634436-03	1.00	01	113	119	94.5	93.6

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Login Number: L17100637
Instrument Id: HPMS11
Workgroup (AAB#): WG634456

Method: 8260
CAL ID: HPMS11-12-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100637-04	1.00	01	104	106	112	107
L17100637-05	1.00	01	103	105	108	106
L17100637-07	1.00	01	101	102	104	103
L17100637-08	1.00	01	104	105	110	105
L17100637-09	1.00	01	104	105	112	106
L17100637-10	1.00	01	104	107	110	105
L17100637-11	1.00	01	101	103	109	104
L17100637-12	1.00	01	104	105	113	107
L17100637-13	1.00	01	106	104	104	107
L17100637-14	1.00	01	103	106	107	107
L17100637-15	1.00	01	103	104	109	104
L17100637-16	1.00	01	105	106	108	106
L17100637-17	1.00	01	104	102	107	103
L17100637-18	1.00	01	104	103	107	106
L17100637-19	1.00	01	102	103	107	104
L17100637-20	1.00	01	106	107	110	107
L17100637-21	1.00	01	107	106	108	108
WG634456-01	1.00	01	99.8	100	106	105
WG634456-02	1.00	01	103	103	109	108

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5534633
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100637	Work Group:	WG634316
Blank File ID:	11M22403	Blank Sample ID:	WG634316-01
Prep Date:	10/17/17 14:11	Instrument ID:	HPMS11
Analyzed Date:	10/17/17 14:11	Method:	8260B
Analyst:	ADC		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634316-02	11M22404	10/17/17 14:40	01
MW-39-LA-26	L17100637-01	11M22419	10/17/17 22:00	01
MW-206B-LA-26	L17100637-02	11M22420	10/17/17 22:29	01
MW-108-LA-26	L17100637-03	11M22421	10/17/17 22:58	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100637
Blank File ID: 11M22449
Prep Date: 10/18/17 12:00
Analyzed Date: 10/18/17 12:00
Analyst: HRF/TMB

Work Group: WG634456
Blank Sample ID: WG634456-01
Instrument ID: HPMS11
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634456-02	11M22450	10/18/17 12:29	01
MW-90-LA-26-MS	L17100637-13	11M22451	10/18/17 12:59	01
MW-90-LA-26-MSD	L17100637-14	11M22452	10/18/17 13:29	01
MW-90-LA-26	L17100637-12	11M22455	10/18/17 14:57	01
MW-209A-LA-26	L17100637-04	11M22456	10/18/17 15:26	01
MW-98-LA-26	L17100637-05	11M22457	10/18/17 15:56	01
MW-207A-LA-26	L17100637-07	11M22458	10/18/17 16:26	01
DR2-6-LA-26	L17100637-08	11M22459	10/18/17 16:55	01
MW-275-LA-26	L17100637-09	11M22460	10/18/17 17:24	01
MW-280-LA-26	L17100637-10	11M22461	10/18/17 17:53	01
MW-269-LA-26	L17100637-11	11M22462	10/18/17 18:22	01
MW-214A-LA-26	L17100637-15	11M22463	10/18/17 18:52	01
MW-141-LA-26	L17100637-16	11M22464	10/18/17 19:21	01
MW-276-LA-26	L17100637-17	11M22465	10/18/17 19:51	01
MW-199B-LA-26	L17100637-18	11M22466	10/18/17 20:20	01
MW-268-LA-26	L17100637-19	11M22467	10/18/17 20:50	01
MW-273-LA-26	L17100637-20	11M22468	10/18/17 21:19	01
MW-107B-LA-26	L17100637-21	11M22469	10/18/17 21:49	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100637
Work Group: WG634645
Blank File ID: 11M22494
Blank Sample ID: WG634645-01
Prep Date: 10/19/17 15:46
Instrument ID: HPMS11
Analyzed Date: 10/19/17 15:46
Method: 8260B
Analyst: HRF/TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634645-02	11M22495	10/19/17 16:15	01
MW-271-LA-26-MS	L17100637-62	11M22496	10/19/17 16:45	01
MW-271-LA-26-MSD	L17100637-63	11M22497	10/19/17 17:14	01
LTM-TB2-LA-26	L17100637-53	11M22499	10/19/17 18:12	01
LTM-TB1-LA-26	L17100637-65	11M22500	10/19/17 18:41	01
MW-271-LA-26	L17100637-61	11M22501	10/19/17 19:11	01
MW-267-LA-26	L17100637-48	11M22502	10/19/17 19:41	01
MW-256-LA-26	L17100637-49	11M22503	10/19/17 20:10	01
MW-202B-LA-26	L17100637-50	11M22504	10/19/17 20:39	01
MW-212-LA-26	L17100637-51	11M22505	10/19/17 21:08	01
MW-255-LA-26	L17100637-52	11M22506	10/19/17 21:38	01
DUP-3-LA-26	L17100637-55	11M22507	10/19/17 22:07	01
MW-198-LA-26	L17100637-56	11M22508	10/19/17 22:36	01
MW-62-LA-26	L17100637-57	11M22509	10/19/17 23:06	01
MW-142-LA-26	L17100637-58	11M22510	10/19/17 23:35	01
MW-270-LA-26	L17100637-59	11M22511	10/20/17 00:04	01
MW-272-LA-26	L17100637-60	11M22512	10/20/17 00:33	01
MW-213-LA-26	L17100637-64	11M22513	10/20/17 01:02	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100637	Work Group:	WG634400
Blank File ID:	6M150753	Blank Sample ID:	WG634400-01
Prep Date:	10/17/17 22:11	Instrument ID:	HPMS6
Analyzed Date:	10/17/17 22:11	Method:	8260B
Analyst:	JDS		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634400-02	6M150754	10/17/17 22:40	01
LCS2	WG634400-03	6M150755	10/17/17 23:09	01
MW-218-LA-26	L17100637-06	6M150770	10/18/17 06:30	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100637	Work Group:	WG634505
Blank File ID:	6M150778	Blank Sample ID:	WG634505-01
Prep Date:	10/18/17 13:04	Instrument ID:	HPMS6
Analyzed Date:	10/18/17 13:04	Method:	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634505-02	6M150779	10/18/17 13:33	01
LCS2	WG634505-03	6M150780	10/18/17 14:03	01
LTM-TB3-LA-26	L17100637-47	6M150782	10/18/17 15:02	01
MW-282-LA-26	L17100637-46	6M150783	10/18/17 15:31	01
MW-254-LA-26	L17100637-45	6M150784	10/18/17 16:01	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100637
Work Group: WG634775
Blank File ID: 6M150830
Blank Sample ID: WG634775-01
Prep Date: 10/19/17 19:59
Instrument ID: HPMS6
Analyzed Date: 10/19/17 19:59
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634775-02	6M150831	10/19/17 20:28	01
LCS2	WG634775-03	6M150832	10/19/17 20:57	01
MW-264-LA-26	L17100637-24	6M150839	10/20/17 00:22	01
MW-278-LA-26	L17100637-44	6M150840	10/20/17 00:52	01
MW-281-LA-26	L17100637-35	6M150841	10/20/17 01:21	01
MW-258-LA-26	L17100637-42	6M150842	10/20/17 01:50	01
MW-263-LA-26	L17100637-38	6M150843	10/20/17 02:19	01
MW-265-LA-26	L17100637-43	6M150844	10/20/17 02:49	01
MW-140-LA-26	L17100637-41	6M150845	10/20/17 03:18	01
MW-202A-LA-26	L17100637-54	6M150846	10/20/17 03:47	01
MW-215B-LA-26	L17100637-23	6M150847	10/20/17 04:17	01
MW-260-LA-26	L17100637-22	6M150848	10/20/17 04:46	01
MW-103-LA-26	L17100637-33	6M150849	10/20/17 05:16	02

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100637	**Work Group:**	WG634867
Blank File ID:	6M150856	**Blank Sample ID:**	WG634867-01
Prep Date:	10/20/17 12:41	**Instrument ID:**	HPMS6
Analyzed Date:	10/20/17 12:41	**Method:**	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634867-02	6M150857	10/20/17 13:11	01
MW-89-LA-26	L17100637-25	6M150860	10/20/17 14:40	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100637
Work Group: WG634436
Blank File ID: 8M422235
Blank Sample ID: WG634436-01
Prep Date: 10/18/17 11:18
Instrument ID: HPMS8
Analyzed Date: 10/18/17 11:18
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634436-02	8M422236	10/18/17 11:48	01
LCS2	WG634436-03	8M422237	10/18/17 12:17	01
MW-215A-LA-26	L17100637-36	8M422248	10/18/17 17:42	01
MW-262-LA-26	L17100637-37	8M422249	10/18/17 18:11	01
DUP-11-LA-26	L17100637-39	8M422250	10/18/17 18:40	01
DUP-9-LA-26	L17100637-40	8M422251	10/18/17 19:11	01
MW-107T-LA-26	L17100637-27	8M422255	10/18/17 21:09	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100637
Work Group: WG634606
Blank File ID: 8M422268
Blank Sample ID: WG634606-01
Prep Date: 10/19/17 10:11
Instrument ID: HPMS8
Analyzed Date: 10/19/17 10:11
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634606-02	8M422269	10/19/17 10:41	01
LCS2	WG634606-03	8M422270	10/19/17 11:11	01
MW-214B-LA-26	L17100637-26	8M422273	10/19/17 12:40	01
MW-34-LA-26	L17100637-28	8M422274	10/19/17 13:09	01
MW-199A-LA-26	L17100637-29	8M422275	10/19/17 13:40	01
MW-63B-LA-26	L17100637-30	8M422276	10/19/17 14:09	01
MW-50-LA-26	L17100637-31	8M422277	10/19/17 14:38	01
DUP-12-LA-26	L17100637-32	8M422278	10/19/17 15:08	01
MW-104-LA-26	L17100637-34	8M422279	10/19/17 15:38	01

Report Name: BLANK_SUMMARY
PDF File ID: 5535203
Report generated 10/23/2017 17:17

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/17/17 14:11 Sample ID:WG634316-01
Instrument ID:HPMS11 Run Date:10/17/17 14:11 Prep Method:5030B/5030C/503
File ID:11M22403 Analyst:ADC Method:8260B
Workgroup (AAB#):WG634316 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-27-JUN-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/17/17 14:11 Sample ID:WG634316-01
Instrument ID:HPMS11 Run Date:10/17/17 14:11 Prep Method:5030B/5030C/503
File ID:11M22403 Analyst:ADC Method:8260B
Workgroup (AAB#):WG634316 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-27-JUN-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	107	85	-	115	PASS
1,2-Dichloroethane-d4	105	72	-	119	PASS
Toluene-d8	107	81	-	120	PASS
4-Bromofluorobenzene	112	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/18/17 12:00 Sample ID:WG634456-01
Instrument ID:HPMS11 Run Date:10/18/17 12:00 Prep Method:5030B/5030C/503
File ID:11M22449 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG634456 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/18/17 12:00 Sample ID: WG634456-01
Instrument ID: HPMS11 Run Date: 10/18/17 12:00 Prep Method: 5030B/5030C/503
File ID: 11M22449 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634456 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	100	85	-	115	PASS
1,2-Dichloroethane-d4	99.8	72	-	119	PASS
Toluene-d8	105	81	-	120	PASS
4-Bromofluorobenzene	106	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5534628
23-OCT-2017 17:17

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/19/17 15:46 Sample ID:WG634645-01
Instrument ID:HPMS11 Run Date:10/19/17 15:46 Prep Method:5030B/5030C/503
File ID:11M22494 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG634645 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/19/17 15:46 Sample ID:WG634645-01
Instrument ID:HPMS11 Run Date:10/19/17 15:46 Prep Method:5030B/5030C/503
File ID:11M22494 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG634645 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	108	85	-	115	PASS
1,2-Dichloroethane-d4	108	72	-	119	PASS
Toluene-d8	107	81	-	120	PASS
4-Bromofluorobenzene	111	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/17/17 22:11 Sample ID:WG634400-01
Instrument ID:HPMS6 Run Date:10/17/17 22:11 Prep Method:5030B/5030C/503
File ID:6M150753 Analyst:JDS Method:8260B
Workgroup (AAB#):WG634400 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

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METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/17/17 22:11 Sample ID: WG634400-01
Instrument ID: HPMS6 Run Date: 10/17/17 22:11 Prep Method: 5030B/5030C/503
File ID: 6M150753 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG634400 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	98.8	85	-	115	PASS
1,2-Dichloroethane-d4	97.3	72	-	119	PASS
Toluene-d8	99.3	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/18/17 13:04 Sample ID:WG634505-01
Instrument ID:HPMS6 Run Date:10/18/17 13:04 Prep Method:5030B/5030C/503
File ID:6M150778 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634505 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/18/17 13:04 Sample ID: WG634505-01
Instrument ID: HPMS6 Run Date: 10/18/17 13:04 Prep Method: 5030B/5030C/503
File ID: 6M150778 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634505 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	102	85	-	115	PASS
1,2-Dichloroethane-d4	105	72	-	119	PASS
Toluene-d8	97.4	81	-	120	PASS
4-Bromofluorobenzene	101	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/19/17 19:59 Sample ID:WG634775-01
Instrument ID:HPMS6 Run Date:10/19/17 19:59 Prep Method:5030B/5030C/503
File ID:6M150830 Analyst:JDS Method:8260B
Workgroup (AAB#):WG634775 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/19/17 19:59 Sample ID: WG634775-01
Instrument ID: HPMS6 Run Date: 10/19/17 19:59 Prep Method: 5030B/5030C/503
File ID: 6M150830 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG634775 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	107	72	-	119	PASS
Toluene-d8	99.7	81	-	120	PASS
4-Bromofluorobenzene	101	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5534628
23-OCT-2017 17:17

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/20/17 12:41 Sample ID:WG634867-01
Instrument ID:HPMS6 Run Date:10/20/17 12:41 Prep Method:5030B/5030C/503
File ID:6M150856 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634867 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/20/17 12:41 Sample ID: WG634867-01
Instrument ID: HPMS6 Run Date: 10/20/17 12:41 Prep Method: 5030B/5030C/503
File ID: 6M150856 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	108	72	-	119	PASS
Toluene-d8	100	81	-	120	PASS
4-Bromofluorobenzene	99.8	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5534628
23-OCT-2017 17:17

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/18/17 11:18 Sample ID:WG634436-01
Instrument ID:HPMS8 Run Date:10/18/17 11:18 Prep Method:5030B/5030C/503
File ID:8M422235 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634436 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5534628
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/18/17 11:18 Sample ID: WG634436-01
Instrument ID: HPMS8 Run Date: 10/18/17 11:18 Prep Method: 5030B/5030C/503
File ID: 8M422235 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634436 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	95.1	85	-	115	PASS
1,2-Dichloroethane-d4	95.7	72	-	119	PASS
Toluene-d8	94.0	81	-	120	PASS
4-Bromofluorobenzene	97.0	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5534628
23-OCT-2017 17:17

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100637 Prep Date:10/19/17 10:11 Sample ID:WG634606-01
Instrument ID:HPMS8 Run Date:10/19/17 10:11 Prep Method:5030B/5030C/503
File ID:8M422268 Analyst:TMB Method:8260B
Workgroup (AAB#):WG634606 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100637 Prep Date: 10/19/17 10:11 Sample ID: WG634606-01
Instrument ID: HPMS8 Run Date: 10/19/17 10:11 Prep Method: 5030B/5030C/503
File ID: 8M422268 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634606 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS8-17-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	101	85	-	115	PASS
1,2-Dichloroethane-d4	97.4	72	-	119	PASS
Toluene-d8	96.4	81	-	120	PASS
4-Bromofluorobenzene	91.8	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5534628
23-OCT-2017 17:17

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number:L17100637 Run Date:10/17/2017 Sample ID:WG634316-02
Instrument ID:HPMS11 Run Time:14:40 Prep Method:5030B/5030C/503
File ID:11M22404 Analyst:ADC Method:8260B
Workgroup (AAB#):WG634316 Matrix:Water Units:ug/L
QC Key:AF40 Lot#:STD84356 Cal ID:HPMS11-27-JUN-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.9	99.3	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	21.1	105	75 - 125	
1,1-Dichloroethane	20.0	19.9	99.3	69 - 133	
1,1-Dichloroethene	20.0	20.3	101	68 - 130	
1,1-Dichloropropene	20.0	21.2	106	73 - 132	
1,2,3-Trichlorobenzene	20.0	22.7	114	67 - 137	
1,2,3-Trichloropropane	20.0	21.9	109	73 - 124	
1,2,4-Trichlorobenzene	20.0	22.6	113	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.6	108	74 - 132	
1,2-Dichloroethane	20.0	20.2	101	69 - 132	
1,2-Dichlorobenzene	20.0	22.0	110	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	21.9	110	50 - 132	
1,2-Dichloropropane	20.0	21.0	105	75 - 125	
1,2-Dibromoethane	20.0	20.9	104	80 - 121	
1,3,5-Trimethylbenzene	20.0	22.0	110	74 - 131	
1,3-Dichlorobenzene	20.0	21.1	105	75 - 124	
1,3-Dichloropropane	20.0	22.0	110	73 - 126	
1,4-Dichlorobenzene	20.0	20.7	104	74 - 123	
2,2-Dichloropropane	20.0	19.5	97.7	69 - 137	
2-Chlorotoluene	20.0	21.3	107	73 - 126	
4-Chlorotoluene	20.0	20.2	101	74 - 128	
Benzene	20.0	20.4	102	81 - 122	
Bromobenzene	20.0	20.4	102	76 - 124	
Bromochloromethane	20.0	20.9	104	65 - 129	
Bromodichloromethane	20.0	20.2	101	76 - 121	
Bromoform	20.0	18.1	90.5	69 - 128	
Carbon tetrachloride	20.0	19.9	99.7	66 - 138	
Chlorobenzene	20.0	20.3	102	81 - 122	
Chloroform	20.0	20.3	101	69 - 128	
cis-1,2-Dichloroethene	20.0	20.2	101	72 - 126	
cis-1,3-Dichloropropene	20.0	23.1	115	69 - 131	
Dibromochloromethane	20.0	20.2	101	66 - 133	
Dibromomethane	20.0	20.8	104	76 - 125	
Ethylbenzene	20.0	21.0	105	73 - 127	
Hexachlorobutadiene	20.0	20.1	100	67 - 131	
Isopropylbenzene	20.0	22.2	111	75 - 127	
Methylene chloride	20.0	19.9	99.3	63 - 137	
n-Butylbenzene	20.0	21.6	108	69 - 137	
n-Propylbenzene	20.0	22.5	112	72 - 129	

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634316-02
Instrument ID: HPMS11 Run Time: 14:40 Prep Method: 5030B/5030C/503
File ID: 11M22404 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG634316 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84356 Cal ID: HPMS11-27-JUN-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
m-,p-Xylene	40.0	43.5	109	76 - 128	
Naphthalene	20.0	23.6	118	54 - 138	
o-Xylene	20.0	21.8	109	80 - 121	
p-Isopropyltoluene	20.0	21.3	106	73 - 130	
sec-Butylbenzene	20.0	21.0	105	72 - 127	
Styrene	20.0	20.8	104	65 - 134	
Trichloroethene	20.0	18.9	94.6	70 - 127	
tert-Butylbenzene	20.0	21.1	105	70 - 129	
Tetrachloroethene	20.0	20.8	104	66 - 128	
Toluene	20.0	20.7	103	77 - 122	
trans-1,2-Dichloroethene	20.0	19.8	99.1	63 - 137	
trans-1,3-Dichloropropene	20.0	21.3	106	59 - 135	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	105	85 - 115	PASS
1,2-Dichloroethane-d4	101	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634456-02
Instrument ID: HPMS11 Run Time: 12:29 Prep Method: 5030B/5030C/503
File ID: 11M22450 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634456 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.0	100	81 - 129	
1,1,1-Trichloroethane	20.0	19.5	97.5	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	21.0	105	75 - 125	
1,1-Dichloroethane	20.0	19.4	96.8	69 - 133	
1,1-Dichloroethene	20.0	20.1	101	68 - 130	
1,1-Dichloropropene	20.0	20.9	104	73 - 132	
1,2,3-Trichlorobenzene	20.0	21.0	105	67 - 137	
1,2,3-Trichloropropane	20.0	21.8	109	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.1	105	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.0	105	74 - 132	
1,2-Dichloroethane	20.0	19.8	99.2	69 - 132	
1,2-Dichlorobenzene	20.0	21.3	106	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.4	102	50 - 132	
1,2-Dichloropropane	20.0	20.3	101	75 - 125	
1,2-Dibromoethane	20.0	21.4	107	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.7	108	74 - 131	
1,3-Dichlorobenzene	20.0	20.6	103	75 - 124	
1,3-Dichloropropane	20.0	21.7	108	73 - 126	
1,4-Dichlorobenzene	20.0	20.3	102	74 - 123	
1,4-Dioxane	200	163	81.5	60 - 140	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	19.0	95.0	69 - 137	
2-Hexanone	20.0	21.5	107	55 - 130	
2-Chlorotoluene	20.0	21.5	108	73 - 126	
4-Chlorotoluene	20.0	20.1	101	74 - 128	
Acetone	20.0	20.9	105	40 - 135	
Benzene	20.0	20.0	100	81 - 122	
Bromobenzene	20.0	20.1	101	76 - 124	
Bromochloromethane	20.0	20.2	101	65 - 129	
Bromodichloromethane	20.0	20.3	101	76 - 121	
Bromoform	20.0	17.7	88.3	69 - 128	
Bromomethane	20.0	23.2	116	30 - 141	
Carbon disulfide	20.0	17.8	89.1	58 - 128	
Carbon tetrachloride	20.0	19.8	98.9	66 - 138	
Chlorobenzene	20.0	20.4	102	81 - 122	
Chloroethane	20.0	21.4	107	58 - 133	
Chloroform	20.0	19.8	99.2	69 - 128	
Chloromethane	20.0	20.8	104	56 - 131	
cis-1,2-Dichloroethene	20.0	19.4	97.0	72 - 126	
cis-1,3-Dichloropropene	20.0	22.6	113	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634456-02
Instrument ID: HPMS11 Run Time: 12:29 Prep Method: 5030B/5030C/503
File ID: 11M22450 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634456 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.6	97.8	66 - 133	
Dibromomethane	20.0	20.3	102	76 - 125	
Dichlorodifluoromethane	20.0	22.4	112	30 - 153	
Ethylbenzene	20.0	20.7	103	73 - 127	
Hexachlorobutadiene	20.0	18.3	91.3	67 - 131	
Isopropylbenzene	20.0	21.9	109	75 - 127	
Methylene chloride	20.0	19.2	95.9	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.6	97.8	65 - 123	
MEK (2-Butanone)	20.0	20.9	105	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.4	102	58 - 134	
n-Butylbenzene	20.0	21.0	105	69 - 137	
n-Propylbenzene	20.0	22.3	112	72 - 129	
m-,p-Xylene	40.0	43.5	109	76 - 128	
Naphthalene	20.0	22.3	112	54 - 138	
o-Xylene	20.0	21.9	109	80 - 121	
p-Isopropyltoluene	20.0	20.8	104	73 - 130	
sec-Butylbenzene	20.0	20.6	103	72 - 127	
Styrene	20.0	21.0	105	65 - 134	
Trichloroethene	20.0	18.5	92.3	70 - 127	
tert-Butylbenzene	20.0	20.9	105	70 - 129	
Tetrachloroethene	20.0	19.7	98.7	66 - 128	
Toluene	20.0	20.6	103	77 - 122	
trans-1,2-Dichloroethene	20.0	19.3	96.7	63 - 137	
trans-1,3-Dichloropropene	20.0	20.5	102	59 - 135	
Trichlorofluoromethane	20.0	18.7	93.4	57 - 129	
Vinyl chloride	20.0	22.3	112	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	109	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634645-02
Instrument ID: HPMS11 Run Time: 16:15 Prep Method: 5030B/5030C/503
File ID: 11M22495 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634645 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84356 Cal ID: HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.5	97.3	81 - 129	
1,1,1-Trichloroethane	20.0	19.7	98.7	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.6	93.0	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.5	75 - 125	
1,1-Dichloroethane	20.0	19.3	96.6	69 - 133	
1,1-Dichloroethene	20.0	20.0	100	68 - 130	
1,1-Dichloropropene	20.0	20.4	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.7	103	67 - 137	
1,2,3-Trichloropropane	20.0	19.2	96.0	73 - 124	
1,2,4-Trichlorobenzene	20.0	20.4	102	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.4	97.1	74 - 132	
1,2-Dichloroethane	20.0	19.6	98.0	69 - 132	
1,2-Dichlorobenzene	20.0	19.7	98.4	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.8	98.9	50 - 132	
1,2-Dichloropropane	20.0	20.5	102	75 - 125	
1,2-Dibromoethane	20.0	20.4	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.8	99.1	74 - 131	
1,3-Dichlorobenzene	20.0	19.0	95.0	75 - 124	
1,3-Dichloropropane	20.0	20.9	105	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	94.0	74 - 123	
2,2-Dichloropropane	20.0	16.0	80.0	69 - 137	
2-Chlorotoluene	20.0	18.6	93.1	73 - 126	
4-Chlorotoluene	20.0	19.6	98.1	74 - 128	
Benzene	20.0	19.8	98.9	81 - 122	
Bromobenzene	20.0	18.3	91.3	76 - 124	
Bromochloromethane	20.0	20.3	101	65 - 129	
Bromodichloromethane	20.0	19.9	99.5	76 - 121	
Bromoform	20.0	17.2	85.9	69 - 128	
Carbon tetrachloride	20.0	19.1	95.5	66 - 138	
Chlorobenzene	20.0	19.5	97.7	81 - 122	
Chloroform	20.0	22.2	111	69 - 128	
cis-1,2-Dichloroethene	20.0	19.2	95.9	72 - 126	
cis-1,3-Dichloropropene	20.0	22.1	111	69 - 131	
Dibromochloromethane	20.0	19.1	95.5	66 - 133	
Dibromomethane	20.0	19.8	99.2	76 - 125	
Ethylbenzene	20.0	20.0	99.8	73 - 127	
Hexachlorobutadiene	20.0	17.2	85.8	67 - 131	
Isopropylbenzene	20.0	20.7	104	75 - 127	
Methylene chloride	20.0	19.1	95.6	63 - 137	
n-Butylbenzene	20.0	19.3	96.7	69 - 137	
n-Propylbenzene	20.0	20.3	102	72 - 129	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634645-02
Instrument ID: HPMS11 Run Time: 16:15 Prep Method: 5030B/5030C/503
File ID: 11M22495 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634645 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84356 Cal ID: HPMS11-12-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
m-,p-Xylene	40.0	41.3	103	76 - 128	
Naphthalene	20.0	21.7	109	54 - 138	
o-Xylene	20.0	20.6	103	80 - 121	
p-Isopropyltoluene	20.0	19.2	95.8	73 - 130	
sec-Butylbenzene	20.0	19.0	95.1	72 - 127	
Styrene	20.0	20.1	101	65 - 134	
Trichloroethene	20.0	19.3	96.3	70 - 127	
tert-Butylbenzene	20.0	19.0	95.2	70 - 129	
Tetrachloroethene	20.0	18.3	91.4	66 - 128	
Toluene	20.0	19.6	98.1	77 - 122	
trans-1,2-Dichloroethene	20.0	19.7	98.3	63 - 137	
trans-1,3-Dichloropropene	20.0	19.4	97.0	59 - 135	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	101	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Login Number: L17100637 Run Date: 10/20/2017 Sample ID: WG634867-02
Instrument ID: HPMS6 Run Time: 13:11 Prep Method: 5030B/5030C/503
File ID: 6M150857 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84456 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.6	103	81 - 129	
1,1,1-Trichloroethane	20.0	22.1	110	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.6	92.8	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.6	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	21.3	106	68 - 130	
1,1-Dichloropropene	20.0	21.5	107	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.6	98.0	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.8	98.8	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	22.2	111	69 - 132	
1,2-Dichlorobenzene	20.0	19.7	98.7	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.8	104	50 - 132	
1,2-Dichloropropane	20.0	20.5	103	75 - 125	
1,2-Dibromoethane	20.0	20.5	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.7	104	74 - 131	
1,3-Dichlorobenzene	20.0	19.6	97.8	75 - 124	
1,3-Dichloropropane	20.0	20.8	104	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	94.2	74 - 123	
1,4-Dioxane	200	193	96.7	60 - 140	
1-Chlorohexane	20.0	20.0	100	70 - 125	
2,2-Dichloropropane	20.0	20.2	101	69 - 137	
2-Hexanone	20.0	20.2	101	55 - 130	
2-Chlorotoluene	20.0	17.7	88.3	73 - 126	
4-Chlorotoluene	20.0	22.5	113	74 - 128	
Acetone	20.0	22.6	113	40 - 135	
Benzene	20.0	20.2	101	81 - 122	
Bromobenzene	20.0	19.3	96.4	76 - 124	
Bromochloromethane	20.0	20.9	105	65 - 129	
Bromodichloromethane	20.0	20.9	105	76 - 121	
Bromoform	20.0	19.7	98.3	69 - 128	
Bromomethane	20.0	15.9	79.3	30 - 141	
Carbon disulfide	20.0	17.2	85.9	58 - 128	
Carbon tetrachloride	20.0	22.4	112	66 - 138	
Chlorobenzene	20.0	20.2	101	81 - 122	
Chloroethane	20.0	22.3	111	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	24.1	120	56 - 131	
cis-1,2-Dichloroethene	20.0	20.5	103	72 - 126	
cis-1,3-Dichloropropene	20.0	22.7	113	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Login Number: L17100637 Run Date: 10/20/2017 Sample ID: WG634867-02
Instrument ID: HPMS6 Run Time: 13:11 Prep Method: 5030B/5030C/503
File ID: 6M150857 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84456 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.1	101	66 - 133	
Dibromomethane	20.0	21.6	108	76 - 125	
Dichlorodifluoromethane	20.0	26.6	133	30 - 153	
Ethylbenzene	20.0	20.4	102	73 - 127	
Hexachlorobutadiene	20.0	18.3	91.5	67 - 131	
Isopropylbenzene	20.0	20.5	102	75 - 127	
Methylene chloride	20.0	19.3	96.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.0	99.9	65 - 123	
MEK (2-Butanone)	20.0	21.6	108	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	20.8	104	72 - 129	
m-,p-Xylene	40.0	40.9	102	76 - 128	
Naphthalene	20.0	20.4	102	54 - 138	
o-Xylene	20.0	20.9	104	80 - 121	
p-Isopropyltoluene	20.0	20.4	102	73 - 130	
sec-Butylbenzene	20.0	20.0	100	72 - 127	
Styrene	20.0	21.4	107	65 - 134	
Trichloroethene	20.0	20.6	103	70 - 127	
tert-Butylbenzene	20.0	20.3	102	70 - 129	
Tetrachloroethene	20.0	20.0	100	66 - 128	
Toluene	20.0	20.0	100	77 - 122	
trans-1,2-Dichloroethene	20.0	20.6	103	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	104	59 - 135	
Trichlorofluoromethane	20.0	21.9	110	57 - 129	
Vinyl chloride	20.0	26.2	131	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	99.0	81 - 120	PASS
4-Bromofluorobenzene	97.2	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5536299
Report generated: 10/23/2017 17:18

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634606 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634606-02 LCS File ID: 8M422269 Run Date: 10/19/2017 10:41
Sample ID: WG634606-03 LCS2 File ID: 8M422270 Run Date: 10/19/2017 11:11

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	19.9	99.5	20.0	19.6	97.9	1.66	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.2	101	20.0	19.5	97.7	3.06	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.5	92.3	20.0	18.2	91.2	1.25	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.2	96.1	20.0	18.7	93.3	3.02	75 - 125	20	
1,1-Dichloroethane	20.0	18.5	92.7	20.0	18.4	92.2	0.529	69 - 133	20	
1,1-Dichloroethene	20.0	19.6	98.2	20.0	19.8	98.9	0.738	68 - 130	20	
1,1-Dichloropropene	20.0	19.5	97.7	20.0	19.2	95.9	1.86	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.9	94.5	20.0	19.0	94.9	0.483	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.2	96.0	20.0	19.6	98.0	2.02	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.7	98.5	20.0	19.8	98.9	0.447	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	19.9	99.5	20.0	19.6	97.8	1.71	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.9	89.7	20.0	17.6	88.0	1.88	50 - 132	20	
1,2-Dibromoethane	20.0	19.4	96.8	20.0	19.0	95.2	1.70	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.9	99.5	20.0	19.8	99.0	0.575	71 - 122	20	
1,2-Dichloroethane	20.0	20.5	102	20.0	20.0	99.8	2.44	69 - 132	20	
1,2-Dichloropropane	20.0	19.9	99.4	20.0	19.4	97.2	2.22	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.6	98.0	20.0	19.6	98.0	0.0418	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.6	97.8	20.0	19.4	96.9	0.948	75 - 124	20	
1,3-Dichloropropane	20.0	20.1	101	20.0	19.5	97.6	2.97	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.9	99.4	20.0	19.7	98.5	0.942	74 - 123	20	
1,4-Dioxane	200	207	104	200	215	108	3.76	60 - 140	20	
1-Chlorohexane	20.0	20.8	104	20.0	20.4	102	2.20	70 - 125	20	
2,2-Dichloropropane	20.0	21.6	108	20.0	21.2	106	2.11	69 - 137	20	
MEK (2-Butanone)	20.0	20.9	105	20.0	20.7	103	1.13	49 - 136	20	
2-Chlorotoluene	20.0	17.6	88.1	20.0	19.3	96.3	8.83	73 - 126	20	
2-Hexanone	20.0	19.9	99.6	20.0	19.5	97.6	2.01	55 - 130	20	
4-Chlorotoluene	20.0	20.9	104	20.0	18.5	92.3	12.2	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	20.0	100	20.0	19.7	98.3	1.81	58 - 134	20	
Acetone	20.0	17.5	87.6	20.0	18.2	91.0	3.76	40 - 135	20	
Benzene	20.0	19.2	96.0	20.0	18.7	93.7	2.49	81 - 122	20	
Bromobenzene	20.0	19.4	96.8	20.0	19.2	95.9	0.929	76 - 124	20	
Bromochloromethane	20.0	19.8	98.8	20.0	20.1	100	1.54	65 - 129	20	
Bromodichloromethane	20.0	18.5	92.7	20.0	18.2	91.2	1.64	76 - 121	20	
Bromoform	20.0	19.8	99.0	20.0	19.9	99.3	0.268	69 - 128	20	
Bromomethane	20.0	16.2	80.9	20.0	16.6	83.2	2.77	30 - 141	20	
Carbon disulfide	20.0	17.2	86.1	20.0	17.3	86.5	0.466	58 - 128	20	
Carbon tetrachloride	20.0	19.9	99.4	20.0	19.4	96.8	2.62	66 - 138	20	
Chlorobenzene	20.0	20.0	99.8	20.0	19.3	96.5	3.40	81 - 122	20	
Chloroethane	20.0	21.3	106	20.0	21.3	106	0.0992	58 - 133	20	
Chloroform	20.0	19.1	95.4	20.0	18.9	94.5	0.988	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634606 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634606-02 LCS File ID: 8M422269 Run Date: 10/19/2017 10:41
Sample ID: WG634606-03 LCS2 File ID: 8M422270 Run Date: 10/19/2017 11:11

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	20.8	104	20.0	20.2	101	2.94	56 - 131	20	
cis-1,2-Dichloroethene	20.0	18.7	93.3	20.0	18.5	92.4	0.968	72 - 126	20	
cis-1,3-Dichloropropene	20.0	20.6	103	20.0	20.1	100	2.52	69 - 131	20	
Dibromochloromethane	20.0	20.1	101	20.0	19.4	97.2	3.51	66 - 133	20	
Dibromomethane	20.0	19.5	97.5	20.0	19.3	96.6	0.939	76 - 125	20	
Dichlorodifluoromethane	20.0	23.4	117	20.0	23.6	118	0.907	30 - 153	20	
Ethylbenzene	20.0	20.2	101	20.0	19.5	97.3	3.50	73 - 127	20	
Hexachlorobutadiene	20.0	22.1	111	20.0	22.1	111	0.0396	67 - 131	20	
Isopropylbenzene	20.0	19.8	99.2	20.0	19.3	96.6	2.63	75 - 127	20	
m-,p-Xylene	40.0	40.6	102	40.0	40.0	100	1.59	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	18.3	91.4	20.0	18.2	90.8	0.701	65 - 123	20	
Methylene chloride	20.0	18.9	94.4	20.0	18.9	94.5	0.0665	63 - 137	20	
n-Butylbenzene	20.0	19.5	97.6	20.0	19.4	97.0	0.629	69 - 137	20	
n-Propylbenzene	20.0	20.0	99.9	20.0	19.7	98.4	1.56	72 - 129	20	
Naphthalene	20.0	18.7	93.5	20.0	18.7	93.4	0.158	54 - 138	20	
o-Xylene	20.0	20.2	101	20.0	19.7	98.6	2.49	80 - 121	20	
p-Isopropyltoluene	20.0	20.3	102	20.0	20.2	101	0.778	73 - 130	20	
sec-Butylbenzene	20.0	20.5	102	20.0	20.0	100	2.33	72 - 127	20	
Styrene	20.0	20.5	102	20.0	20.2	101	1.50	65 - 134	20	
tert-Butylbenzene	20.0	20.4	102	20.0	20.4	102	0.0112	70 - 129	20	
Tetrachloroethene	20.0	20.7	103	20.0	20.5	103	0.787	66 - 128	20	
Toluene	20.0	19.9	99.3	20.0	19.3	96.3	3.07	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.6	97.9	20.0	19.3	96.4	1.57	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.6	98.2	20.0	19.2	96.2	2.15	59 - 135	20	
Trichloroethene	20.0	19.2	96.1	20.0	19.0	95.0	1.12	70 - 127	20	
Trichlorofluoromethane	20.0	18.8	93.9	20.0	19.0	95.0	1.21	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	22.8	114	1.39	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	95.8	95.1	72 - 119	PASS
Dibromofluoromethane	98.4	96.5	85 - 115	PASS
4-Bromofluorobenzene	89.6	91.7	76 - 119	PASS
Toluene-d8	96.5	96.2	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634505 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634505-02 LCS File ID: 6M150779 Run Date: 10/18/2017 13:33
Sample ID: WG634505-03 LCS2 File ID: 6M150780 Run Date: 10/18/2017 14:03

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.1	101	20.0	20.2	101	0.153	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.9	109	20.0	22.1	111	1.10	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.7	93.5	20.0	18.7	93.7	0.194	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.2	96.0	20.0	19.6	97.8	1.85	75 - 125	20	
1,1-Dichloroethane	20.0	20.3	101	20.0	20.6	103	1.46	69 - 133	20	
1,1-Dichloroethene	20.0	21.5	107	20.0	22.2	111	3.11	68 - 130	20	
1,1-Dichloropropene	20.0	21.7	109	20.0	22.1	111	1.76	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.0	94.9	20.0	19.7	98.4	3.56	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.4	97.0	20.0	19.8	99.0	2.03	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.3	96.3	20.0	20.0	99.9	3.66	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.0	100	20.0	20.7	104	3.26	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.5	97.4	20.0	20.2	101	3.43	50 - 132	20	
1,2-Dibromoethane	20.0	19.7	98.3	20.0	20.0	100	1.79	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.5	97.5	20.0	19.8	99.1	1.60	71 - 122	20	
1,2-Dichloroethane	20.0	21.4	107	20.0	21.7	109	1.80	69 - 132	20	
1,2-Dichloropropane	20.0	20.8	104	20.0	21.3	106	2.17	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	20.5	102	20.0	21.0	105	2.63	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.3	96.7	20.0	19.7	98.7	2.03	75 - 124	20	
1,3-Dichloropropane	20.0	20.6	103	20.0	20.8	104	0.873	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.6	93.1	20.0	19.0	95.1	2.10	74 - 123	20	
1,4-Dioxane	200	180	90.0	200	208	104	14.6	60 - 140	20	
1-Chlorohexane	20.0	20.7	104	20.0	20.8	104	0.192	70 - 125	20	
2,2-Dichloropropane	20.0	20.4	102	20.0	21.0	105	3.12	69 - 137	20	
MEK (2-Butanone)	20.0	20.9	104	20.0	21.8	109	4.16	49 - 136	20	
2-Chlorotoluene	20.0	17.5	87.5	20.0	18.1	90.4	3.29	73 - 126	20	
2-Hexanone	20.0	19.3	96.5	20.0	19.5	97.6	1.15	55 - 130	20	
4-Chlorotoluene	20.0	22.3	112	20.0	22.6	113	1.29	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.5	20.0	20.0	100	3.64	58 - 134	20	
Acetone	20.0	22.2	111	20.0	21.9	110	1.37	40 - 135	20	
Benzene	20.0	20.5	102	20.0	21.0	105	2.73	81 - 122	20	
Bromobenzene	20.0	19.2	95.9	20.0	19.7	98.3	2.50	76 - 124	20	
Bromochloromethane	20.0	20.8	104	20.0	21.1	105	1.30	65 - 129	20	
Bromodichloromethane	20.0	20.4	102	20.0	20.9	105	2.22	76 - 121	20	
Bromoform	20.0	18.5	92.7	20.0	18.8	94.0	1.46	69 - 128	20	
Bromomethane	20.0	12.2	61.1	20.0	17.6	88.2	36.3	30 - 141	20	#
Carbon disulfide	20.0	18.1	90.6	20.0	18.1	90.3	0.427	58 - 128	20	
Carbon tetrachloride	20.0	21.9	109	20.0	22.2	111	1.33	66 - 138	20	
Chlorobenzene	20.0	19.8	98.8	20.0	20.0	100	1.25	81 - 122	20	
Chloroethane	20.0	16.2	80.8	20.0	23.6	118	37.3	58 - 133	20	#
Chloroform	20.0	20.6	103	20.0	20.9	105	1.63	69 - 128	20	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634505 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634505-02 LCS File ID: 6M150779 Run Date: 10/18/2017 13:33
Sample ID: WG634505-03 LCS2 File ID: 6M150780 Run Date: 10/18/2017 14:03

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	27.7	138	20.0	26.7	133	3.77	56 - 131	20	*
cis-1,2-Dichloroethene	20.0	21.1	106	20.0	21.4	107	1.32	72 - 126	20	
cis-1,3-Dichloropropene	20.0	22.6	113	20.0	23.3	117	2.97	69 - 131	20	
Dibromochloromethane	20.0	19.5	97.7	20.0	19.8	99.0	1.37	66 - 133	20	
Dibromomethane	20.0	21.1	106	20.0	21.6	108	1.94	76 - 125	20	
Dichlorodifluoromethane	20.0	26.9	134	20.0	28.1	141	4.55	30 - 153	20	
Ethylbenzene	20.0	20.2	101	20.0	20.7	104	2.78	73 - 127	20	
Hexachlorobutadiene	20.0	17.8	88.9	20.0	18.5	92.6	4.14	67 - 131	20	
Isopropylbenzene	20.0	20.0	100	20.0	20.6	103	2.65	75 - 127	20	
m-,p-Xylene	40.0	40.1	100	40.0	41.0	103	2.37	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.4	102	20.0	20.5	103	0.492	65 - 123	20	
Methylene chloride	20.0	19.8	99.1	20.0	20.4	102	3.08	63 - 137	20	
n-Butylbenzene	20.0	19.6	97.9	20.0	20.3	101	3.59	69 - 137	20	
n-Propylbenzene	20.0	20.8	104	20.0	21.4	107	2.75	72 - 129	20	
Naphthalene	20.0	20.1	101	20.0	20.7	104	3.02	54 - 138	20	
o-Xylene	20.0	20.9	104	20.0	21.1	106	1.31	80 - 121	20	
p-Isopropyltoluene	20.0	20.0	100	20.0	20.6	103	2.87	73 - 130	20	
sec-Butylbenzene	20.0	19.7	98.4	20.0	20.4	102	3.69	72 - 127	20	
Styrene	20.0	21.2	106	20.0	21.6	108	2.11	65 - 134	20	
tert-Butylbenzene	20.0	20.4	102	20.0	20.8	104	1.93	70 - 129	20	
Tetrachloroethene	20.0	19.8	99.2	20.0	19.9	99.7	0.496	66 - 128	20	
Toluene	20.0	20.0	100	20.0	20.2	101	0.947	77 - 122	20	
trans-1,2-Dichloroethene	20.0	21.0	105	20.0	21.6	108	2.82	63 - 137	20	
trans-1,3-Dichloropropene	20.0	20.1	101	20.0	20.3	102	1.01	59 - 135	20	
Trichloroethene	20.0	20.6	103	20.0	21.4	107	3.76	70 - 127	20	
Trichlorofluoromethane	20.0	22.2	111	20.0	22.2	111	0.174	57 - 129	20	
Vinyl chloride	20.0	26.3	131	20.0	27.0	135	2.68	50 - 134	20	*

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	101	101	72 - 119	PASS
Dibromofluoromethane	101	101	85 - 115	PASS
4-Bromofluorobenzene	98.9	97.9	76 - 119	PASS
Toluene-d8	96.9	96.5	81 - 120	PASS

* EXCEEDS %REC LIMIT

EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634775 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634775-02 LCS File ID: 6M150831 Run Date: 10/19/2017 20:28
Sample ID: WG634775-03 LCS2 File ID: 6M150832 Run Date: 10/19/2017 20:57

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	21.2	106	20.0	20.8	104	1.82	81 - 129	20	
1,1,1-Trichloroethane	20.0	22.4	112	20.0	22.0	110	1.83	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.8	94.2	20.0	20.1	101	6.56	63 - 128	20	
1,1,2-Trichloroethane	20.0	20.2	101	20.0	20.6	103	1.98	75 - 125	20	
1,1-Dichloroethane	20.0	20.5	103	20.0	20.3	101	1.35	69 - 133	20	
1,1-Dichloroethene	20.0	21.7	108	20.0	21.3	107	1.77	68 - 130	20	
1,1-Dichloropropene	20.0	21.8	109	20.0	21.8	109	0.246	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.3	96.4	20.0	20.0	99.8	3.44	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.5	97.5	20.0	21.5	107	9.62	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	20.0	99.9	20.0	20.4	102	2.10	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	21.0	105	20.0	20.9	104	0.507	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.8	99.1	20.0	21.6	108	8.41	50 - 132	20	
1,2-Dibromoethane	20.0	20.5	102	20.0	21.0	105	2.52	80 - 121	20	
1,2-Dichlorobenzene	20.0	20.0	99.9	20.0	20.3	102	1.67	71 - 122	20	
1,2-Dichloroethane	20.0	22.2	111	20.0	22.5	113	1.40	69 - 132	20	
1,2-Dichloropropane	20.0	21.0	105	20.0	21.0	105	0.153	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	21.2	106	20.0	21.1	106	0.291	74 - 131	20	
1,3-Dichlorobenzene	20.0	20.0	100	20.0	20.2	101	0.829	75 - 124	20	
1,3-Dichloropropane	20.0	20.8	104	20.0	21.5	108	3.35	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.2	96.1	20.0	19.3	96.6	0.503	74 - 123	20	
1,4-Dioxane	200	178	88.8	200	212	106	17.8	60 - 140	20	
1-Chlorohexane	20.0	21.3	106	20.0	21.1	105	0.897	70 - 125	20	
2,2-Dichloropropane	20.0	21.1	105	20.0	20.9	104	1.15	69 - 137	20	
MEK (2-Butanone)	20.0	20.8	104	20.0	22.8	114	9.18	49 - 136	20	
2-Chlorotoluene	20.0	18.2	91.1	20.0	21.5	107	16.2	73 - 126	20	
2-Hexanone	20.0	19.8	99.2	20.0	21.7	108	8.75	55 - 130	20	
4-Chlorotoluene	20.0	22.9	114	20.0	19.4	96.8	16.6	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.6	98.1	20.0	21.3	106	8.20	58 - 134	20	
Acetone	20.0	21.8	109	20.0	23.4	117	6.89	40 - 135	20	
Benzene	20.0	20.6	103	20.0	20.3	102	1.46	81 - 122	20	
Bromobenzene	20.0	19.9	99.5	20.0	20.0	100	0.642	76 - 124	20	
Bromochloromethane	20.0	21.2	106	20.0	21.1	106	0.398	65 - 129	20	
Bromodichloromethane	20.0	21.2	106	20.0	21.0	105	0.902	76 - 121	20	
Bromoform	20.0	19.3	96.6	20.0	20.2	101	4.34	69 - 128	20	
Bromomethane	20.0	15.6	78.0	20.0	15.3	76.4	2.16	30 - 141	20	
Carbon disulfide	20.0	17.9	89.5	20.0	17.7	88.5	1.17	58 - 128	20	
Carbon tetrachloride	20.0	22.3	112	20.0	22.1	111	0.922	66 - 138	20	
Chlorobenzene	20.0	20.4	102	20.0	20.1	101	1.43	81 - 122	20	
Chloroethane	20.0	23.3	117	20.0	22.4	112	4.06	58 - 133	20	
Chloroform	20.0	21.1	106	20.0	21.0	105	0.666	69 - 128	20	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634775 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634775-02 LCS File ID: 6M150831 Run Date: 10/19/2017 20:28
Sample ID: WG634775-03 LCS2 File ID: 6M150832 Run Date: 10/19/2017 20:57

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	24.5	122	20.0	24.6	123	0.353	56 - 131	20	
cis-1,2-Dichloroethene	20.0	21.2	106	20.0	20.8	104	2.11	72 - 126	20	
cis-1,3-Dichloropropene	20.0	23.0	115	20.0	23.2	116	0.490	69 - 131	20	
Dibromochloromethane	20.0	20.4	102	20.0	20.7	104	1.85	66 - 133	20	
Dibromomethane	20.0	21.4	107	20.0	22.1	110	3.04	76 - 125	20	
Dichlorodifluoromethane	20.0	28.1	141	20.0	27.7	138	1.65	30 - 153	20	
Ethylbenzene	20.0	21.1	106	20.0	20.5	103	2.69	73 - 127	20	
Hexachlorobutadiene	20.0	18.7	93.3	20.0	18.7	93.7	0.479	67 - 131	20	
Isopropylbenzene	20.0	21.1	106	20.0	20.7	103	2.01	75 - 127	20	
m-,p-Xylene	40.0	42.4	106	40.0	41.4	103	2.37	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.0	100	20.0	21.0	105	4.88	65 - 123	20	
Methylene chloride	20.0	19.9	99.5	20.0	19.8	98.9	0.524	63 - 137	20	
n-Butylbenzene	20.0	20.5	102	20.0	20.4	102	0.400	69 - 137	20	
n-Propylbenzene	20.0	21.5	107	20.0	21.6	108	0.418	72 - 129	20	
Naphthalene	20.0	19.8	99.2	20.0	21.5	107	7.77	54 - 138	20	
o-Xylene	20.0	21.5	108	20.0	21.2	106	1.52	80 - 121	20	
p-Isopropyltoluene	20.0	21.0	105	20.0	20.9	105	0.491	73 - 130	20	
sec-Butylbenzene	20.0	20.5	102	20.0	20.5	103	0.280	72 - 127	20	
Styrene	20.0	22.2	111	20.0	21.7	109	2.12	65 - 134	20	
tert-Butylbenzene	20.0	20.8	104	20.0	20.8	104	0.399	70 - 129	20	
Tetrachloroethene	20.0	20.6	103	20.0	20.2	101	1.70	66 - 128	20	
Toluene	20.0	20.6	103	20.0	20.4	102	0.744	77 - 122	20	
trans-1,2-Dichloroethene	20.0	21.2	106	20.0	20.8	104	1.61	63 - 137	20	
trans-1,3-Dichloropropene	20.0	21.0	105	20.0	21.5	108	2.47	59 - 135	20	
Trichloroethene	20.0	21.0	105	20.0	20.7	104	1.24	70 - 127	20	
Trichlorofluoromethane	20.0	22.7	114	20.0	22.1	111	2.64	57 - 129	20	
Vinyl chloride	20.0	26.8	134	20.0	26.5	132	1.38	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	105	106	72 - 119	PASS
Dibromofluoromethane	102	103	85 - 115	PASS
4-Bromofluorobenzene	97.7	99.9	76 - 119	PASS
Toluene-d8	98.9	99.3	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5534629
Report generated: 10/23/2017 17:18

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634436 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634436-02 LCS File ID: 8M422236 Run Date: 10/18/2017 11:48
Sample ID: WG634436-03 LCS2 File ID: 8M422237 Run Date: 10/18/2017 12:17

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.5	92.3	20.0	18.5	92.7	0.447	81 - 129	20	
1,1,1-Trichloroethane	20.0	23.2	116	20.0	23.6	118	1.48	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	18.5	92.3	20.0	18.2	91.0	1.43	63 - 128	20	
1,1,2-Trichloroethane	20.0	18.5	92.7	20.0	18.7	93.3	0.630	75 - 125	20	
1,1-Dichloroethane	20.0	25.1	125	20.0	25.4	127	1.45	69 - 133	20	
1,1-Dichloroethene	20.0	26.4	132	20.0	27.2	136	2.80	68 - 130	20	*
1,1-Dichloropropene	20.0	21.3	106	20.0	21.9	109	2.80	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	17.4	87.2	20.0	18.4	91.8	5.14	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.0	95.1	20.0	18.6	93.2	2.06	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	17.8	89.2	20.0	18.9	94.5	5.80	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	18.5	92.5	20.0	19.1	95.4	3.07	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.8	89.0	20.0	17.6	88.2	0.930	50 - 132	20	
1,2-Dibromoethane	20.0	18.7	93.3	20.0	18.6	93.0	0.388	80 - 121	20	
1,2-Dichlorobenzene	20.0	18.4	92.1	20.0	19.0	94.8	2.87	71 - 122	20	
1,2-Dichloroethane	20.0	25.3	127	20.0	25.7	129	1.56	69 - 132	20	
1,2-Dichloropropane	20.0	21.6	108	20.0	21.5	107	0.691	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	18.2	90.9	20.0	18.7	93.3	2.55	74 - 131	20	
1,3-Dichlorobenzene	20.0	18.0	90.0	20.0	18.5	92.3	2.59	75 - 124	20	
1,3-Dichloropropane	20.0	19.9	99.4	20.0	19.6	97.8	1.60	73 - 126	20	
1,4-Dichlorobenzene	20.0	18.3	91.3	20.0	18.9	94.3	3.24	74 - 123	20	
1,4-Dioxane	200	208	104	200	241	121	14.9	60 - 140	20	
1-Chlorohexane	20.0	19.6	98.0	20.0	20.1	100	2.34	70 - 125	20	
2,2-Dichloropropane	20.0	25.8	129	20.0	26.5	133	2.68	69 - 137	20	
MEK (2-Butanone)	20.0	24.3	121	20.0	24.4	122	0.564	49 - 136	20	
2-Chlorotoluene	20.0	18.3	91.5	20.0	18.5	92.5	0.987	73 - 126	20	
2-Hexanone	20.0	19.9	99.3	20.0	19.8	98.9	0.382	55 - 130	20	
4-Chlorotoluene	20.0	17.7	88.3	20.0	17.8	89.1	0.988	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	22.2	111	20.0	22.4	112	1.14	58 - 134	20	
Acetone	20.0	23.3	116	20.0	25.1	125	7.60	40 - 135	20	
Benzene	20.0	20.7	103	20.0	21.0	105	1.48	81 - 122	20	
Bromobenzene	20.0	17.7	88.7	20.0	17.8	88.8	0.0708	76 - 124	20	
Bromochloromethane	20.0	23.3	117	20.0	23.8	119	1.91	65 - 129	20	
Bromodichloromethane	20.0	21.1	105	20.0	21.3	106	0.843	76 - 121	20	
Bromoform	20.0	18.5	92.6	20.0	18.7	93.6	1.04	69 - 128	20	
Bromomethane	20.0	18.6	92.9	20.0	19.6	98.0	5.34	30 - 141	20	
Carbon disulfide	20.0	20.6	103	20.0	21.5	108	4.44	58 - 128	20	
Carbon tetrachloride	20.0	22.5	112	20.0	22.9	114	1.67	66 - 138	20	
Chlorobenzene	20.0	18.6	93.2	20.0	18.8	93.8	0.674	81 - 122	20	
Chloroethane	20.0	24.8	124	20.0	26.4	132	6.28	58 - 133	20	
Chloroform	20.0	25.5	128	20.0	25.0	125	2.22	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634436 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634436-02 LCS File ID: 8M422236 Run Date: 10/18/2017 11:48
Sample ID: WG634436-03 LCS2 File ID: 8M422237 Run Date: 10/18/2017 12:17

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	21.7	108	20.0	24.4	122	11.8	56 - 131	20	
cis-1,2-Dichloroethene	20.0	25.4	127	20.0	25.2	126	0.584	72 - 126	20	*
cis-1,3-Dichloropropene	20.0	22.5	112	20.0	23.1	115	2.73	69 - 131	20	
Dibromochloromethane	20.0	19.3	96.3	20.0	19.0	95.2	1.15	66 - 133	20	
Dibromomethane	20.0	24.1	121	20.0	24.2	121	0.423	76 - 125	20	
Dichlorodifluoromethane	20.0	28.0	140	20.0	30.1	150	7.13	30 - 153	20	
Ethylbenzene	20.0	18.6	93.2	20.0	19.4	97.0	4.03	73 - 127	20	
Hexachlorobutadiene	20.0	18.7	93.7	20.0	19.9	99.3	5.78	67 - 131	20	
Isopropylbenzene	20.0	18.2	91.2	20.0	19.0	95.0	4.00	75 - 127	20	
m-,p-Xylene	40.0	38.1	95.3	40.0	39.1	97.7	2.51	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	23.6	118	20.0	23.8	119	0.873	65 - 123	20	
Methylene chloride	20.0	22.4	112	20.0	23.5	118	5.06	63 - 137	20	
n-Butylbenzene	20.0	17.7	88.6	20.0	18.7	93.7	5.56	69 - 137	20	
n-Propylbenzene	20.0	18.7	93.4	20.0	18.9	94.5	1.24	72 - 129	20	
Naphthalene	20.0	18.4	92.0	20.0	18.9	94.4	2.52	54 - 138	20	
o-Xylene	20.0	18.7	93.6	20.0	19.6	98.0	4.57	80 - 121	20	
p-Isopropyltoluene	20.0	18.3	91.5	20.0	18.9	94.5	3.31	73 - 130	20	
sec-Butylbenzene	20.0	18.7	93.4	20.0	18.9	94.7	1.47	72 - 127	20	
Styrene	20.0	19.4	97.1	20.0	19.7	98.3	1.26	65 - 134	20	
tert-Butylbenzene	20.0	18.6	92.9	20.0	18.7	93.3	0.405	70 - 129	20	
Tetrachloroethene	20.0	18.6	93.2	20.0	18.8	94.0	0.815	66 - 128	20	
Toluene	20.0	19.1	95.4	20.0	19.2	96.0	0.585	77 - 122	20	
trans-1,2-Dichloroethene	20.0	26.5	132	20.0	27.2	136	2.52	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.6	98.0	20.0	19.5	97.4	0.559	59 - 135	20	
Trichloroethene	20.0	20.2	101	20.0	20.3	102	0.548	70 - 127	20	
Trichlorofluoromethane	20.0	22.2	111	20.0	23.6	118	6.38	57 - 129	20	
Vinyl chloride	20.0	27.7	138	20.0	28.9	144	4.25	50 - 134	20	*

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	116	113	72 - 119	PASS
Dibromofluoromethane	123	119	85 - 115	FAIL
4-Bromofluorobenzene	97.2	94.5	76 - 119	PASS
Toluene-d8	95.0	93.6	81 - 120	PASS

* EXCEEDS %REC LIMIT

EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634400 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634400-02 LCS File ID: 6M150754 Run Date: 10/17/2017 22:40
Sample ID: WG634400-03 LCS2 File ID: 6M150755 Run Date: 10/17/2017 23:09

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.8	104	20.0	20.2	101	2.59	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.8	109	20.0	21.3	106	2.32	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.3	96.6	20.0	19.1	95.6	1.03	63 - 128	20	
1,1,2-Trichloroethane	20.0	20.1	101	20.0	19.7	98.4	2.28	75 - 125	20	
1,1-Dichloroethane	20.0	20.7	103	20.0	20.2	101	2.51	69 - 133	20	
1,1-Dichloroethene	20.0	21.6	108	20.0	21.5	107	0.652	68 - 130	20	
1,1-Dichloropropene	20.0	22.3	111	20.0	21.9	110	1.70	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	19.8	99.0	20.0	19.2	95.9	3.13	67 - 137	20	
1,2,3-Trichloropropane	20.0	20.2	101	20.0	19.7	98.4	2.75	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	20.2	101	20.0	19.7	98.5	2.74	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	21.5	107	20.0	20.7	104	3.56	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.3	20.0	19.3	96.4	0.0234	50 - 132	20	
1,2-Dibromoethane	20.0	20.7	104	20.0	20.3	102	1.89	80 - 121	20	
1,2-Dichlorobenzene	20.0	20.5	102	20.0	19.6	97.9	4.55	71 - 122	20	
1,2-Dichloroethane	20.0	21.2	106	20.0	20.9	105	1.34	69 - 132	20	
1,2-Dichloropropane	20.0	21.4	107	20.0	21.1	106	1.37	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	22.1	110	20.0	21.3	106	3.67	74 - 131	20	
1,3-Dichlorobenzene	20.0	20.6	103	20.0	19.7	98.3	4.61	75 - 124	20	
1,3-Dichloropropane	20.0	21.3	107	20.0	21.1	105	1.19	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.7	98.3	20.0	18.8	93.9	4.63	74 - 123	20	
1,4-Dioxane	200	177	88.7	200	196	97.9	9.86	60 - 140	20	
1-Chlorohexane	20.0	21.8	109	20.0	21.5	107	1.39	70 - 125	20	
2,2-Dichloropropane	20.0	19.7	98.6	20.0	19.2	96.0	2.66	69 - 137	20	
MEK (2-Butanone)	20.0	20.7	103	20.0	21.2	106	2.48	49 - 136	20	
2-Chlorotoluene	20.0	21.6	108	20.0	21.0	105	2.40	73 - 126	20	
2-Hexanone	20.0	19.5	97.7	20.0	20.0	99.8	2.09	55 - 130	20	
4-Chlorotoluene	20.0	21.0	105	20.0	19.8	98.9	5.92	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.6	98.2	20.0	20.3	102	3.46	58 - 134	20	
Acetone	20.0	20.8	104	20.0	21.1	106	1.47	40 - 135	20	
Benzene	20.0	21.1	106	20.0	20.8	104	1.67	81 - 122	20	
Bromobenzene	20.0	20.5	103	20.0	19.9	99.7	2.93	76 - 124	20	
Bromochloromethane	20.0	21.2	106	20.0	20.6	103	3.27	65 - 129	20	
Bromodichloromethane	20.0	20.8	104	20.0	20.4	102	1.99	76 - 121	20	
Bromoform	20.0	19.2	96.0	20.0	18.9	94.6	1.48	69 - 128	20	
Bromomethane	20.0	17.2	86.2	20.0	16.6	82.9	3.89	30 - 141	20	
Carbon disulfide	20.0	18.8	94.1	20.0	18.7	93.5	0.631	58 - 128	20	
Carbon tetrachloride	20.0	21.5	108	20.0	21.2	106	1.29	66 - 138	20	
Chlorobenzene	20.0	20.6	103	20.0	20.2	101	2.32	81 - 122	20	
Chloroethane	20.0	24.2	121	20.0	24.3	121	0.244	58 - 133	20	
Chloroform	20.0	20.8	104	20.0	20.5	102	1.45	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100637 Analyst: JDS Prep Method: 5030B/5030C/503
Instrument ID: HPMS6 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634400 Units: ug/L
QC Key: AF40 Lot #: STD84456

Sample ID: WG634400-02 LCS File ID: 6M150754 Run Date: 10/17/2017 22:40
Sample ID: WG634400-03 LCS2 File ID: 6M150755 Run Date: 10/17/2017 23:09

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	23.9	120	20.0	25.1	126	4.78	56 - 131	20	
cis-1,2-Dichloroethene	20.0	21.6	108	20.0	21.3	107	1.52	72 - 126	20	
cis-1,3-Dichloropropene	20.0	23.5	117	20.0	22.8	114	2.69	69 - 131	20	
Dibromochloromethane	20.0	20.2	101	20.0	19.6	98.0	3.15	66 - 133	20	
Dibromomethane	20.0	21.6	108	20.0	21.1	105	2.35	76 - 125	20	
Dichlorodifluoromethane	20.0	28.3	142	20.0	28.2	141	0.569	30 - 153	20	
Ethylbenzene	20.0	21.3	106	20.0	21.0	105	1.26	73 - 127	20	
Hexachlorobutadiene	20.0	19.4	97.2	20.0	18.7	93.3	4.15	67 - 131	20	
Isopropylbenzene	20.0	21.5	107	20.0	20.9	104	2.84	75 - 127	20	
m-,p-Xylene	40.0	42.7	107	40.0	41.7	104	2.33	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	20.3	102	20.0	20.4	102	0.463	65 - 123	20	
Methylene chloride	20.0	20.4	102	20.0	20.1	100	1.78	63 - 137	20	
n-Butylbenzene	20.0	21.2	106	20.0	20.4	102	3.91	69 - 137	20	
n-Propylbenzene	20.0	22.5	113	20.0	21.7	109	3.50	72 - 129	20	
Naphthalene	20.0	20.7	103	20.0	20.2	101	2.16	54 - 138	20	
o-Xylene	20.0	22.1	110	20.0	21.4	107	3.06	80 - 121	20	
p-Isopropyltoluene	20.0	21.7	108	20.0	20.9	104	3.78	73 - 130	20	
sec-Butylbenzene	20.0	21.4	107	20.0	20.8	104	2.42	72 - 127	20	
Styrene	20.0	22.4	112	20.0	21.9	109	2.31	65 - 134	20	
tert-Butylbenzene	20.0	21.9	110	20.0	21.0	105	4.15	70 - 129	20	
Tetrachloroethene	20.0	20.7	104	20.0	20.3	102	2.11	66 - 128	20	
Toluene	20.0	21.1	106	20.0	20.6	103	2.43	77 - 122	20	
trans-1,2-Dichloroethene	20.0	21.7	108	20.0	21.4	107	1.13	63 - 137	20	
trans-1,3-Dichloropropene	20.0	20.8	104	20.0	20.1	101	3.35	59 - 135	20	
Trichloroethene	20.0	21.3	107	20.0	21.1	106	1.03	70 - 127	20	
Trichlorofluoromethane	20.0	21.8	109	20.0	21.8	109	0.402	57 - 129	20	
Vinyl chloride	20.0	26.0	130	20.0	26.0	130	0.109	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	96.9	98.3	72 - 119	PASS
Dibromofluoromethane	97.8	98.9	85 - 115	PASS
4-Bromofluorobenzene	101	100	76 - 119	PASS
Toluene-d8	97.9	96.8	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Report generated: 10/23/2017 17:18

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100637 Cal ID: HPMS11- 12-OCT-17 Worknum: WG634456

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100637-12 File ID: 11M22455 Dil: 1 Method: 5035A

Sample ID: L17100637-13 MS File ID: 11M22451 Dil: 1 Matrix: 8260B

Sample ID: L17100637-14 MSD File ID: 11M22452 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.4	102	20.0	21.1	106	3.69	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.1	101	20.0	20.2	101	0.408	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.4	107	20.0	22.8	114	6.24	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	21.7	109	20.0	22.2	111	1.96	75 - 125	20	
1,1-Dichloroethane	0.861	20.0	21.2	102	20.0	21.9	105	3.17	69 - 133	20	
1,1-Dichloroethene	0.788	20.0	21.0	101	20.0	21.6	104	2.62	68 - 130	20	
1,1-Dichloropropene	U	20.0	20.9	105	20.0	21.7	108	3.57	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.4	107	20.0	22.2	111	3.99	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	23.0	115	20.0	23.4	117	1.52	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	21.4	107	20.0	22.6	113	5.58	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.9	105	20.0	22.1	111	5.37	74 - 132	20	
1,2-Dichloroethane	U	20.0	21.0	105	20.0	21.9	109	3.98	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	21.8	109	20.0	22.5	113	3.20	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.1	110	20.0	22.0	110	0.145	50 - 132	20	
1,2-Dichloropropane	U	20.0	21.7	108	20.0	22.1	110	1.79	75 - 125	20	
1,2-Dibromoethane	U	20.0	22.5	112	20.0	22.4	112	0.284	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	21.5	107	20.0	22.5	113	4.77	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	21.2	106	20.0	21.7	108	2.26	75 - 124	20	
1,3-Dichloropropane	U	20.0	22.6	113	20.0	23.9	120	5.51	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	20.7	104	20.0	21.1	106	2.08	74 - 123	20	
1,4-Dioxane	U	200	165	82.4	200	146	73	12.1	60 - 140	20	
1-Chlorohexane	U	20.0	21.1	105	20.0	21.4	107	1.64	70 - 125	20	
2,2-Dichloropropane	U	20.0	19.5	97.5	20.0	19.7	98.6	1.09	69 - 137	20	
2-Hexanone	U	20.0	22.4	112	20.0	23.6	118	5.23	55 - 130	20	
2-Chlorotoluene	U	20.0	21.3	106	20.0	22.1	110	3.76	73 - 126	20	
4-Chlorotoluene	U	20.0	20.4	102	20.0	21.4	107	4.58	74 - 128	20	
Acetone	U	20.0	25.2	126	20.0	25.5	127	1.33	40 - 135	20	
Benzene	U	20.0	20.7	103	20.0	21.4	107	3.23	81 - 122	20	
Bromobenzene	U	20.0	20.5	103	20.0	21.7	109	5.72	76 - 124	20	
Bromochloromethane	U	20.0	21.3	107	20.0	21.6	108	1.13	65 - 129	20	
Bromodichloromethane	U	20.0	20.9	104	20.0	21.7	108	3.77	76 - 121	20	
Bromoform	U	20.0	19.0	94.8	20.0	19.1	95.4	0.586	69 - 128	20	
Bromomethane	U	20.0	23.5	118	20.0	24.8	124	5.22	30 - 141	20	
Carbon disulfide	U	20.0	18.2	90.8	20.0	19.3	96.4	5.97	58 - 128	20	
Carbon tetrachloride	U	20.0	19.9	99.7	20.0	20.5	102	2.59	66 - 138	20	
Chlorobenzene	U	20.0	21.1	106	20.0	21.6	108	2.21	81 - 122	20	
Chloroethane	U	20.0	21.8	109	20.0	23.6	118	7.93	58 - 133	20	
Chloroform	1.04	20.0	27.8	134	20.0	24.4	117	13.0	69 - 128	20	*
Chloromethane	U	20.0	22.1	110	20.0	22.7	113	2.62	56 - 131	20	
cis-1,2-Dichloroethene	0.279	20.0	20.6	102	20.0	21.4	105	3.37	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	23.6	118	20.0	24.5	123	4.14	69 - 131	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5537908

Report generated 10/23/2017 17:18

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100637 Cal ID: HPMS11 12-OCT-17 Worknum: WG634456

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100637-12 File ID: 11M22455 Dil: 1 Method: 5035A

Sample ID: L17100637-13 MS File ID: 11M22451 Dil: 1 Matrix: 8260B

Sample ID: L17100637-14 MSD File ID: 11M22452 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	20.2	101	20.0	21.6	108	6.68	66 - 133	20	
Dibromomethane	U	20.0	21.3	106	20.0	22.0	110	3.52	76 - 125	20	
Dichlorodifluoromethane	U	20.0	23.1	116	20.0	23.4	117	1.00	30 - 153	20	
Ethylbenzene	U	20.0	21.5	107	20.0	21.6	108	0.549	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.6	87.8	20.0	18.0	90.1	2.55	67 - 131	20	
Isopropylbenzene	U	20.0	22.0	110	20.0	22.4	112	1.57	75 - 127	20	
Methylene chloride	U	20.0	20.2	101	20.0	21.0	105	3.99	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	21.1	106	20.0	22.6	113	6.67	65 - 123	20	
MEK (2-Butanone)	U	20.0	22.5	112	20.0	23.1	115	2.61	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.7	98.4	20.0	20.7	103	4.90	58 - 134	20	
n-Butylbenzene	U	20.0	20.6	103	20.0	21.7	108	5.12	69 - 137	20	
n-Propylbenzene	U	20.0	22.2	111	20.0	22.9	115	3.38	72 - 129	20	
m-,p-Xylene	U	40.0	44.2	110	40.0	45.8	114	3.55	76 - 128	20	
Naphthalene	U	20.0	23.4	117	20.0	24.0	120	2.21	54 - 138	20	
o-Xylene	U	20.0	22.4	112	20.0	22.6	113	0.685	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.3	101	20.0	21.1	106	3.92	73 - 130	20	
sec-Butylbenzene	U	20.0	20.2	101	20.0	21.0	105	4.18	72 - 127	20	
Styrene	U	20.0	21.6	108	20.0	21.8	109	1.15	65 - 134	20	
Trichloroethene	3.82	20.0	22.3	92.4	20.0	22.8	95	2.34	70 - 127	20	
tert-Butylbenzene	U	20.0	20.5	103	20.0	20.8	104	1.27	70 - 129	20	
Tetrachloroethene	13.5	20.0	31.2	88.2	20.0	31.6	90.3	1.32	66 - 128	20	
Toluene	U	20.0	21.1	105	20.0	21.7	109	3.05	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	20.2	101	20.0	21.0	105	4.19	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	21.9	110	20.0	22.6	113	2.94	59 - 135	20	
Trichlorofluoromethane	U	20.0	18.8	94	20.0	19.1	95.6	1.66	57 - 129	20	
Vinyl chloride	U	20.0	22.1	111	20.0	21.4	107	3.57	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5537908

Report generated 10/23/2017 17:18

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100637 Cal ID: HPMS11- 12-OCT-17 Worknum: WG634645

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100637-61 File ID: 11M22501 Dil: 1 Method: 5035A

Sample ID: L17100637-62 MS File ID: 11M22496 Dil: 1 Matrix: 8260B

Sample ID: L17100637-63 MSD File ID: 11M22497 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.9	94.6	20.0	19.6	97.9	3.37	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	17.0	85	20.0	19.5	97.7	13.8	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.2	106	20.0	20.2	101	4.58	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	21.1	105	20.0	20.6	103	2.31	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.1	95.3	20.0	20.0	99.9	4.71	69 - 133	20	
1,1-Dichloroethene	U	20.0	16.8	83.8	20.0	19.8	99.2	16.8	68 - 130	20	
1,1-Dichloropropene	U	20.0	17.8	88.8	20.0	20.7	104	15.4	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	22.3	111	20.0	22.0	110	1.20	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.8	104	20.0	21.5	107	3.39	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	22.2	111	20.0	22.4	112	0.840	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.9	99.6	20.0	20.5	103	2.90	74 - 132	20	
1,2-Dichloroethane	U	20.0	20.6	103	20.0	20.1	101	2.24	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.9	105	20.0	20.7	104	0.763	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	21.5	107	20.0	21.1	105	1.90	50 - 132	20	
1,2-Dichloropropane	U	20.0	20.7	103	20.0	20.9	104	0.895	75 - 125	20	
1,2-Dibromoethane	U	20.0	21.1	106	20.0	20.7	104	2.04	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.7	98.4	20.0	21.1	105	6.87	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.3	101	20.0	20.8	104	2.80	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.8	109	20.0	21.6	108	1.07	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.8	99.1	20.0	20.5	103	3.37	74 - 123	20	
2,2-Dichloropropane	U	20.0	17.0	85.1	20.0	19.1	95.7	11.7	69 - 137	20	
2-Chlorotoluene	U	20.0	19.3	96.4	20.0	19.8	98.9	2.51	73 - 126	20	
4-Chlorotoluene	U	20.0	20.4	102	20.0	21.0	105	2.81	74 - 128	20	
Benzene	U	20.0	19.2	96.1	20.0	20.2	101	5.08	81 - 122	20	
Bromobenzene	U	20.0	19.6	98.2	20.0	19.4	96.8	1.39	76 - 124	20	
Bromochloromethane	U	20.0	20.5	103	20.0	20.3	101	1.24	65 - 129	20	
Bromodichloromethane	U	20.0	20.2	101	20.0	20.4	102	0.862	76 - 121	20	
Bromoform	U	20.0	17.9	89.6	20.0	17.4	87.2	2.69	69 - 128	20	
Carbon tetrachloride	U	20.0	16.0	79.9	20.0	19.0	95	17.2	66 - 138	20	
Chlorobenzene	U	20.0	19.6	97.8	20.0	20.1	100	2.71	81 - 122	20	
Chloroform	U	20.0	19.6	97.8	20.0	20.3	102	3.88	69 - 128	20	
cis-1,2-Dichloroethene	U	20.0	19.2	96.1	20.0	19.9	99.5	3.55	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	23.1	115	20.0	23.0	115	0.321	69 - 131	20	
Dibromochloromethane	U	20.0	19.8	98.9	20.0	19.6	98.2	0.759	66 - 133	20	
Dibromomethane	U	20.0	21.0	105	20.0	20.4	102	3.19	76 - 125	20	
Ethylbenzene	U	20.0	18.8	94.2	20.0	20.5	102	8.40	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.3	86.4	20.0	19.6	97.8	12.3	67 - 131	20	
Isopropylbenzene	U	20.0	19.2	96.2	20.0	21.4	107	10.9	75 - 127	20	
Methylene chloride	U	20.0	19.4	97.2	20.0	19.6	97.9	0.790	63 - 137	20	
n-Butylbenzene	U	20.0	19.3	96.6	20.0	21.3	107	9.88	69 - 137	20	
n-Propylbenzene	U	20.0	19.8	98.9	20.0	21.5	108	8.49	72 - 129	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5537908

Report generated 10/23/2017 17:18

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100637 Cal ID: HPMS11 12-OCT-17 Worknum: WG634645

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100637-61 File ID: 11M22501 Dil: 1 Method: 5035A

Sample ID: L17100637-62 MS File ID: 11M22496 Dil: 1 Matrix: 8260B

Sample ID: L17100637-63 MSD File ID: 11M22497 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
m-,p-Xylene	U	40.0	39.8	99.4	40.0	42.6	106	6.77	76 - 128	20	
Naphthalene	U	20.0	23.8	119	20.0	23.2	116	2.42	54 - 138	20	
o-Xylene	U	20.0	20.5	103	20.0	21.6	108	4.99	80 - 121	20	
p-Isopropyltoluene	U	20.0	18.5	92.7	20.0	20.4	102	9.62	73 - 130	20	
sec-Butylbenzene	U	20.0	17.8	89.1	20.0	20.0	99.9	11.3	72 - 127	20	
Styrene	U	20.0	20.2	101	20.0	20.7	104	2.49	65 - 134	20	
Trichloroethene	4.84	20.0	21.0	80.6	20.0	22.1	86.4	5.43	70 - 127	20	
tert-Butylbenzene	U	20.0	17.5	87.4	20.0	19.7	98.7	12.1	70 - 129	20	
Tetrachloroethene	U	20.0	16.8	83.9	20.0	19.2	96.2	13.7	66 - 128	20	
Toluene	U	20.0	18.8	94	20.0	20.1	101	6.68	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.4	91.8	20.0	20.2	101	9.71	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.9	105	20.0	20.7	103	1.24	59 - 135	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5537908

Report generated 10/23/2017 17:18

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: JDS
Workgroup: WG618910

Tune ID: WG618910-01
Run Date: 06/22/2017
Run Time: 11:03
File ID: 11M19216
Cal ID: HPMS11-20-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.6	11528	PASS
75.0	95.0	30.0	60.0	50.7	31472	PASS
95.0	95.0	100	100	100	62029	PASS
96.0	95.0	5.00	9.00	6.75	4187	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	47690	PASS
175	174	5.00	9.00	7.92	3778	PASS
176	174	95.0	101	96.2	45858	PASS
177	176	5.00	9.00	6.64	3043	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG618912-01	STD	01	06/22/2017 12:32	
WG618912-02	STD	01	06/22/2017 13:02	
WG618912-03	STD	01	06/22/2017 13:31	
WG618912-04	STD-CCV	01	06/22/2017 14:01	
WG618912-05	STD	01	06/22/2017 14:31	
WG618912-06	STD	01	06/22/2017 14:59	
WG618912-07	STD	01	06/22/2017 15:29	
WG618912-08	STD	01	06/22/2017 15:58	
WG618912-09	STD	01	06/22/2017 16:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: ADC
Workgroup: WG619415

Tune ID: WG619415-01
Run Date: 06/27/2017
Run Time: 06:47
File ID: 11M19368
Cal ID: HPMS11-27-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.9	9994	PASS
75.0	95.0	30.0	60.0	51.0	26965	PASS
95.0	95.0	100	100	100	52832	PASS
96.0	95.0	5.00	9.00	6.65	3513	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	67.1	35442	PASS
175	174	5.00	9.00	8.02	2844	PASS
176	174	95.0	101	95.8	33962	PASS
177	176	5.00	9.00	7.10	2411	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG619415-02	STD-S	01	06/27/2017 07:41	
WG619415-03	STD-S	01	06/27/2017 08:10	
WG619415-04	STD-S	01	06/27/2017 08:40	
WG619415-05	STD-S	01	06/27/2017 09:09	
WG619415-06	STD-S	01	06/27/2017 09:38	
WG619415-07	STD-CCV-S	01	06/27/2017 10:08	
WG619415-08	STD-S	01	06/27/2017 10:37	
WG619415-09	STD-S	01	06/27/2017 11:06	
WG619415-10	STD-S	01	06/27/2017 11:36	
WG619415-11	SSCV-S	01	06/27/2017 12:34	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633647

Tune ID: WG633647-01
Run Date: 10/12/2017
Run Time: 10:07
File ID: 11M22279
Cal ID: HPMS11 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.1	12000	PASS
75.0	95.0	30.0	60.0	53.8	26765	PASS
95.0	95.0	100	100	100	49773	PASS
96.0	95.0	5.00	9.00	7.07	3518	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	74.3	37000	PASS
175	174	5.00	9.00	8.24	3049	PASS
176	174	95.0	101	96.2	35589	PASS
177	176	5.00	9.00	6.24	2222	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-02	STD	01	10/12/2017 12:10	
WG633647-03	STD	01	10/12/2017 13:05	
WG633647-04	STD	01	10/12/2017 13:34	
WG633647-05	STD	01	10/12/2017 14:04	
WG633647-06	STD	01	10/12/2017 14:47	
WG633647-07	STD	01	10/12/2017 16:01	
WG633647-08	STD-CCV	01	10/12/2017 16:30	
WG633647-09	STD	01	10/12/2017 17:00	
WG633647-10	STD	01	10/12/2017 17:29	
WG633647-11	STD	01	10/12/2017 17:59	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633790

Tune ID: WG633790-01
Run Date: 10/12/2017
Run Time: 20:07
File ID: 11M22296
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.2	10304	PASS
75.0	95.0	30.0	60.0	54.8	24378	PASS
95.0	95.0	100	100	100	44501	PASS
96.0	95.0	5.00	9.00	7.00	3115	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	73.8	32848	PASS
175	174	5.00	9.00	8.77	2882	PASS
176	174	95.0	101	97.7	32106	PASS
177	176	5.00	9.00	6.22	1998	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-12	SSCV	01	10/12/2017 21:02	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: ADC
Workgroup: WG634315

Tune ID: WG634315-01
Run Date: 10/17/2017
Run Time: 12:46
File ID: 11M22400
Cal ID: HPMS11-27-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.2	11702	PASS
75.0	95.0	30.0	60.0	56.4	27234	PASS
95.0	95.0	100	100	100	48264	PASS
96.0	95.0	5.00	9.00	6.54	3155	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	80.4	38826	PASS
175	174	5.00	9.00	8.05	3127	PASS
176	174	95.0	101	97.8	37954	PASS
177	176	5.00	9.00	6.38	2423	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634315-02	CCV	01	10/17/2017 13:10	
WG634316-01	BLANK	01	10/17/2017 14:11	
WG634316-02	LCS	01	10/17/2017 14:40	
L17100637-01	MW-39-LA-26	01	10/17/2017 22:00	
L17100637-02	MW-206B-LA-26	01	10/17/2017 22:29	
L17100637-03	MW-108-LA-26	01	10/17/2017 22:58	

* Sample past 12 hour tune limit

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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: HRF/TMB
Workgroup: WG634454

Tune ID: WG634454-01
Run Date: 10/18/2017
Run Time: 10:35
File ID: 11M22446
Cal ID: HPMS11 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.6	6784	PASS
75.0	95.0	30.0	60.0	53.9	16178	PASS
95.0	95.0	100	100	100	30042	PASS
96.0	95.0	5.00	9.00	6.78	2037	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	74.1	22260	PASS
175	174	5.00	9.00	6.41	1427	PASS
176	174	95.0	101	97.1	21604	PASS
177	176	5.00	9.00	7.19	1554	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634454-02	CCV	01	10/18/2017 10:59	
WG634456-01	BLANK	01	10/18/2017 12:00	
WG634456-02	LCS	01	10/18/2017 12:29	
L17100637-13	MW-90-LA-26-MS	01	10/18/2017 12:59	
L17100637-14	MW-90-LA-26-MSD	01	10/18/2017 13:29	
L17100637-12	MW-90-LA-26	01	10/18/2017 14:57	
L17100637-04	MW-209A-LA-26	01	10/18/2017 15:26	
L17100637-05	MW-98-LA-26	01	10/18/2017 15:56	
L17100637-07	MW-207A-LA-26	01	10/18/2017 16:26	
L17100637-08	DR2-6-LA-26	01	10/18/2017 16:55	
L17100637-09	MW-275-LA-26	01	10/18/2017 17:24	
L17100637-10	MW-280-LA-26	01	10/18/2017 17:53	
L17100637-11	MW-269-LA-26	01	10/18/2017 18:22	
L17100637-15	MW-214A-LA-26	01	10/18/2017 18:52	
L17100637-16	MW-141-LA-26	01	10/18/2017 19:21	
L17100637-17	MW-276-LA-26	01	10/18/2017 19:51	
L17100637-18	MW-199B-LA-26	01	10/18/2017 20:20	
L17100637-19	MW-268-LA-26	01	10/18/2017 20:50	
L17100637-20	MW-273-LA-26	01	10/18/2017 21:19	
L17100637-21	MW-107B-LA-26	01	10/18/2017 21:49	

* Sample past 12 hour tune limit

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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS11
Analyst: HRF/TMB
Workgroup: WG634644

Tune ID: WG634644-01
Run Date: 10/19/2017
Run Time: 13:54
File ID: 11M22491
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	25.3	13194	PASS
75.0	95.0	30.0	60.0	56.1	29202	PASS
95.0	95.0	100	100	100	52053	PASS
96.0	95.0	5.00	9.00	6.74	3509	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.1	39610	PASS
175	174	5.00	9.00	8.37	3315	PASS
176	174	95.0	101	97.7	38706	PASS
177	176	5.00	9.00	6.96	2695	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634644-02	CCV	01	10/19/2017 14:47	
WG634645-01	BLANK	01	10/19/2017 15:46	
WG634645-02	LCS	01	10/19/2017 16:15	
L17100637-62	MW-271-LA-26-MS	01	10/19/2017 16:45	
L17100637-63	MW-271-LA-26-MSD	01	10/19/2017 17:14	
L17100637-53	LTM-TB2-LA-26	01	10/19/2017 18:12	
L17100637-65	LTM-TB1-LA-26	01	10/19/2017 18:41	
L17100637-61	MW-271-LA-26	01	10/19/2017 19:11	
L17100637-48	MW-267-LA-26	01	10/19/2017 19:41	
L17100637-49	MW-256-LA-26	01	10/19/2017 20:10	
L17100637-50	MW-202B-LA-26	01	10/19/2017 20:39	
L17100637-51	MW-212-LA-26	01	10/19/2017 21:08	
L17100637-52	MW-255-LA-26	01	10/19/2017 21:38	
L17100637-55	DUP-3-LA-26	01	10/19/2017 22:07	
L17100637-56	MW-198-LA-26	01	10/19/2017 22:36	
L17100637-57	MW-62-LA-26	01	10/19/2017 23:06	
L17100637-58	MW-142-LA-26	01	10/19/2017 23:35	
L17100637-59	MW-270-LA-26	01	10/20/2017 00:04	
L17100637-60	MW-272-LA-26	01	10/20/2017 00:33	
L17100637-64	MW-213-LA-26	DL01	10/20/2017 01:02	

* Sample past 12 hour tune limit

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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

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PDF File ID: 5534631
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: JDS
Workgroup: WG634399

Tune ID: WG634399-01
Run Date: 10/17/2017
Run Time: 20:44
File ID: 6M150750
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.2	10353	PASS
75.0	95.0	30.0	60.0	48.5	22583	PASS
95.0	95.0	100	100	100	46597	PASS
96.0	95.0	5.00	9.00	6.73	3138	PASS
173	174	0	2.00	0.353	133	PASS
174	95.0	50.0	100	80.8	37656	PASS
175	174	5.00	9.00	7.20	2710	PASS
176	174	95.0	101	98.8	37218	PASS
177	176	5.00	9.00	6.86	2553	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634399-02	CCV	01	10/17/2017 21:09	
WG634400-01	BLANK	01	10/17/2017 22:11	
WG634400-02	LCS	01	10/17/2017 22:40	
WG634400-03	LCS2	01	10/17/2017 23:09	
L17100637-06	MW-218-LA-26	01	10/18/2017 06:30	
WG633712-02	FBLK1	DL01	10/18/2017 08:26	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: TMB
Workgroup: WG634503

Tune ID: WG634503-01
Run Date: 10/18/2017
Run Time: 11:39
File ID: 6M150775
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.3	5380	PASS
75.0	95.0	30.0	60.0	49.9	12046	PASS
95.0	95.0	100	100	100	24153	PASS
96.0	95.0	5.00	9.00	7.30	1762	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	81.6	19708	PASS
175	174	5.00	9.00	7.57	1491	PASS
176	174	95.0	101	97.1	19135	PASS
177	176	5.00	9.00	6.62	1266	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634503-02	CCV	01	10/18/2017 12:05	
WG634505-01	BLANK	01	10/18/2017 13:04	
WG634505-02	LCS	01	10/18/2017 13:33	
WG634505-03	LCS2	01	10/18/2017 14:03	
L17100637-47	LTM-TB3-LA-26	01	10/18/2017 15:02	
L17100637-46	MW-282-LA-26	01	10/18/2017 15:31	
L17100637-45	MW-254-LA-26	01	10/18/2017 16:01	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: JDS
Workgroup: WG634774

Tune ID: WG634774-01
Run Date: 10/19/2017
Run Time: 17:56
File ID: 6M150826
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.5	8421	PASS
75.0	95.0	30.0	60.0	51.1	18285	PASS
95.0	95.0	100	100	100	35808	PASS
96.0	95.0	5.00	9.00	6.45	2310	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	83.5	29890	PASS
175	174	5.00	9.00	7.87	2351	PASS
176	174	95.0	101	96.4	28800	PASS
177	176	5.00	9.00	7.19	2070	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634774-02	CCV	01	10/19/2017 19:00	
WG634775-01	BLANK	01	10/19/2017 19:59	
WG634775-02	LCS	01	10/19/2017 20:28	
WG634775-03	LCS2	01	10/19/2017 20:57	
L17100637-24	MW-264-LA-26	01	10/20/2017 00:22	
L17100637-44	MW-278-LA-26	01	10/20/2017 00:52	
L17100637-35	MW-281-LA-26	01	10/20/2017 01:21	
L17100637-42	MW-258-LA-26	01	10/20/2017 01:50	
L17100637-38	MW-263-LA-26	01	10/20/2017 02:19	
L17100637-43	MW-265-LA-26	01	10/20/2017 02:49	
L17100637-41	MW-140-LA-26	01	10/20/2017 03:18	
L17100637-54	MW-202A-LA-26	01	10/20/2017 03:47	
L17100637-23	MW-215B-LA-26	01	10/20/2017 04:17	
L17100637-22	MW-260-LA-26	01	10/20/2017 04:46	
L17100637-33	MW-103-LA-26	02	10/20/2017 05:16	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS6
Analyst: TMB
Workgroup: WG634866

Tune ID: WG634866-01
Run Date: 10/20/2017
Run Time: 11:17
File ID: 6M150853
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.9	8664	PASS
75.0	95.0	30.0	60.0	52.4	18257	PASS
95.0	95.0	100	100	100	34821	PASS
96.0	95.0	5.00	9.00	7.18	2499	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	73.3	25536	PASS
175	174	5.00	9.00	6.95	1776	PASS
176	174	95.0	101	98.4	25124	PASS
177	176	5.00	9.00	7.38	1854	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634866-02	CCV	01	10/20/2017 11:42	
WG634867-01	BLANK	01	10/20/2017 12:41	
WG634867-02	LCS	01	10/20/2017 13:11	
L17100637-25	MW-89-LA-26	01	10/20/2017 14:40	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS8
Analyst: ADC
Workgroup: WG628027

Tune ID: WG628027-01
Run Date: 08/31/2017
Run Time: 14:11
File ID: 8M421174
Cal ID: HPMS8 - 31-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	28.5	8248	PASS
75.0	95.0	30.0	60.0	48.8	14111	PASS
95.0	95.0	100	100	100	28896	PASS
96.0	95.0	5.00	9.00	5.97	1726	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	84.1	24314	PASS
175	174	5.00	9.00	7.59	1845	PASS
176	174	95.0	101	95.2	23149	PASS
177	176	5.00	9.00	6.57	1520	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG628027-02	STD	01	08/31/2017 15:06	
WG628027-03	STD	01	08/31/2017 15:36	
WG628027-04	STD	01	08/31/2017 16:05	
WG628027-05	STD-CCV	01	08/31/2017 16:35	
WG628027-06	STD	01	08/31/2017 17:04	
WG628027-07	STD	01	08/31/2017 17:34	
WG628027-08	STD	01	08/31/2017 18:04	
WG628027-09	STD	01	08/31/2017 18:33	
WG628027-10	SSCV	01	08/31/2017 19:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS8
Analyst: TMB
Workgroup: WG634047

Tune ID: WG634047-01
Run Date: 10/17/2017
Run Time: 14:22
File ID: 8M422208
Cal ID: HPMS8 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	30.2	11226	PASS
75.0	95.0	30.0	60.0	54.8	20354	PASS
95.0	95.0	100	100	100	37173	PASS
96.0	95.0	5.00	9.00	6.86	2549	PASS
173	174	0	2.00	0.323	97	PASS
174	95.0	50.0	100	80.9	30058	PASS
175	174	5.00	9.00	7.81	2348	PASS
176	174	95.0	101	99.5	29913	PASS
177	176	5.00	9.00	6.93	2073	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634047-02	STD	01	10/17/2017 15:18	
WG634047-03	STD	01	10/17/2017 15:48	
WG634047-04	STD	01	10/17/2017 16:17	
WG634047-05	STD	01	10/17/2017 16:47	
WG634047-06	STD	01	10/17/2017 17:16	
WG634047-07	STD	01	10/17/2017 17:46	
WG634047-08	STD-CCV	01	10/17/2017 18:15	
WG634047-09	STD	01	10/17/2017 18:45	
WG634047-10	STD	01	10/17/2017 19:14	
WG634047-11	STD	01	10/17/2017 19:44	
WG634047-12	SSCV	01	10/17/2017 21:12	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS8
Analyst: TMB
Workgroup: WG634435

Tune ID: WG634435-01
Run Date: 10/18/2017
Run Time: 09:53
File ID: 8M422232
Cal ID: HPMS8-17-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	29.5	12679	PASS
75.0	95.0	30.0	60.0	48.5	20872	PASS
95.0	95.0	100	100	100	43050	PASS
96.0	95.0	5.00	9.00	6.61	2847	PASS
173	174	0	2.00	0.293	96	PASS
174	95.0	50.0	100	76.0	32738	PASS
175	174	5.00	9.00	7.50	2456	PASS
176	174	95.0	101	95.9	31408	PASS
177	176	5.00	9.00	6.39	2008	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634435-02	CCV	01	10/18/2017 10:19	
WG634436-01	BLANK	01	10/18/2017 11:18	
WG634436-02	LCS	01	10/18/2017 11:48	
WG634436-03	LCS2	01	10/18/2017 12:17	
L17100637-36	MW-215A-LA-26	01	10/18/2017 17:42	
L17100637-37	MW-262-LA-26	01	10/18/2017 18:11	
L17100637-39	DUP-11-LA-26	01	10/18/2017 18:40	
L17100637-40	DUP-9-LA-26	01	10/18/2017 19:11	
L17100637-27	MW-107T-LA-26	01	10/18/2017 21:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100637
Instrument: HPMS8
Analyst: TMB
Workgroup: WG634605

Tune ID: WG634605-01
Run Date: 10/19/2017
Run Time: 08:43
File ID: 8M422265
Cal ID: HPMS8-17-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	32.1	10672	PASS
75.0	95.0	30.0	60.0	52.1	17301	PASS
95.0	95.0	100	100	100	33202	PASS
96.0	95.0	5.00	9.00	7.74	2570	PASS
173	174	0	2.00	0.250	59	PASS
174	95.0	50.0	100	71.0	23573	PASS
175	174	5.00	9.00	8.18	1929	PASS
176	174	95.0	101	100	23664	PASS
177	176	5.00	9.00	8.45	2000	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634605-02	CCV	01	10/19/2017 09:13	
WG634606-01	BLANK	01	10/19/2017 10:11	
WG634606-02	LCS	01	10/19/2017 10:41	
WG634606-03	LCS2	01	10/19/2017 11:11	
L17100637-26	MW-214B-LA-26	01	10/19/2017 12:40	
L17100637-28	MW-34-LA-26	01	10/19/2017 13:09	
L17100637-29	MW-199A-LA-26	01	10/19/2017 13:40	
L17100637-30	MW-63B-LA-26	01	10/19/2017 14:09	
L17100637-31	MW-50-LA-26	01	10/19/2017 14:38	
L17100637-32	DUP-12-LA-26	01	10/19/2017 15:08	
L17100637-34	MW-104-LA-26	01	10/19/2017 15:38	
WG634271-01	FBLK1	DL01	10/19/2017 22:02	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5534631
Report generated 10/23/2017 17:19

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 062217 HPMS11
Last Calibration: Fri Jun 23 09:50:47 2017
Curve: WG618912
Calibration Files

	Compound	5 11M19219.D	20 11M19220.D	50 11M19221.D	100 11M19222.D	200 11M19223.D	300 11M19224.D	400 11M19225.D	500 11M19226.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile	0.036	0.036	0.034	0.036	0.037	0.037	0.035	0.035	0.036	3.083		
T	3-Chloro-1-propene	0.486	0.499	0.493	0.472	0.427	0.395	0.358		0.447	12.268		
T	2-Chloro-1,3-butadiene	0.394	0.417	0.416	0.399	0.375	0.350	0.322	0.294	0.371	12.213		
T	Methacrylonitrile	0.171	0.182	0.179	0.183	0.177	0.170	0.155	0.149	0.171	7.403		
T	Isobutyl Alcohol		0.006	0.006	0.008	0.010	0.011	0.011	0.012	0.009	25.809	0.993	
T	1-Butanol			0.001	0.003	0.004	0.005	0.005	0.005	0.004	42.424	0.996	
T	Cyclohexanone			0.009	0.010	0.011	0.011	0.010	0.010	0.010	6.640		
T	2-Nitropropane			0.074	0.078	0.081	0.080	0.075	0.075	0.077	3.841		
T	Ethyl Acetate	0.239	0.260	0.249	0.254	0.242	0.225	0.203	0.193	0.233	10.353		
T	Methyl methacrylate	0.230	0.251	0.246	0.247	0.236	0.221	0.200	0.188	0.227	10.105		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Jun 23 10:01:47 2017

Calibration Table Report
Method: 8260_SL.M
Title: 8260(B)(C) SOP: OVL MSV01 SOIL 062717 HPMS11
Last Calibration: Tue Jun 27 12:03:43 2017
Curve: WG619415
Calibration Files

Compound	0.5 11M19370.D	1 11M19371.D	2 11M19372.D	5 11M19373.D	20 11M19374.D	50 11M19375.D	100 11M19376.D	200 11M19377.D	300 11M19378.D	Avg	%RSD	R^2 Linear	Quadratic
Fluorobenzene	ISTD												
Dichlorodifluoromethane			0.310	0.296	0.311	0.296	0.323	0.267		0.301	6.343		
Chloromethane			0.330	0.274	0.252	0.244	0.262	0.222		0.264	13.939		
Vinyl Chloride			0.246	0.241	0.244	0.227	0.235	0.203		0.233	6.846		
1,3-Butadiene			0.184	0.194	0.169	0.157	0.155			0.172	9.843		
Bromomethane			0.215	0.175	0.177	0.174	0.189	0.173		0.184	9.000		
Chloroethane			0.180	0.195	0.206	0.200	0.217	0.185		0.197	6.913		
Trichlorofluoromethane			0.391	0.373	0.394	0.373	0.397	0.338		0.378	5.869		
Diethyl ether		0.227	0.240	0.227	0.242	0.216	0.255		0.232	0.234	5.436		
Isoprene			0.351	0.354	0.370	0.363	0.384	0.325	0.357	0.358	5.060		
Acrolein			0.035	0.032	0.034	0.031	0.037		0.033	0.034	7.029		
1,1,2-Trichloro-1,2,2-Trifluoroet				0.196	0.224	0.210	0.225	0.191		0.209	7.463		
Acetone				0.107	0.094	0.094	0.092	0.084	0.087	0.093	8.721		
1,1-Dichloroethene		0.382	0.359	0.415	0.403	0.392	0.421	0.350		0.389	6.945		
Tert-Butyl Alcohol		0.035	0.040	0.040	0.040	0.038	0.047		0.043	0.040	9.089		
Dimethyl Sulfide		0.306	0.290	0.265	0.278	0.273	0.295	0.255	0.272	0.279	6.040		
Iodomethane				0.085	0.131	0.157	0.180	0.164		0.143	25.769	0.997	
Methyl acetate		0.265	0.253	0.272	0.252	0.264	0.277	0.237	0.254	0.259	4.942		
Methylene Chloride				0.288	0.288	0.279	0.296	0.252		0.280	6.057		
Carbon Disulfide		0.861	0.828	0.800	0.783	0.728	0.768	0.627	0.644	0.755	11.082		
Acrylonitrile		0.100	0.102	0.099	0.110	0.107	0.121		0.107	0.107	7.316		
Methyl Tert Butyl Ether			0.872	0.836	0.835	0.839	0.871	0.725		0.830	6.537		
trans-1,2-Dichloroethene			0.238	0.247	0.256	0.245	0.266	0.224		0.246	5.878		
n-Hexane			0.436	0.362	0.394	0.386	0.402	0.341	0.364	0.384	8.148		
Diisopropyl ether		0.921	0.966	0.885	0.941	0.815	0.921		0.804	0.893	6.952		
Vinyl Acetate				0.451	0.448	0.467	0.480	0.407	0.407	0.443	6.832		
1,1-Dichloroethane		0.503	0.520	0.512	0.525	0.493	0.526	0.438		0.503	6.157		
Ethyl-Tert-Butyl ether		0.831	0.877	0.818	0.863	0.758	0.855		0.754	0.822	6.010		
2-Butanone				0.148	0.147	0.153	0.158	0.138	0.152	0.149	4.525		
Propionitrile		0.033	0.043	0.041	0.043	0.042	0.048		0.045	0.042	11.002		
2,2-Dichloropropane			0.397	0.411	0.408	0.392	0.415	0.349		0.395	6.195		
cis-1,2-Dichloroethene		0.324	0.293	0.274	0.293	0.289	0.307	0.257		0.291	7.384		
Chloroform		0.499	0.508	0.465	0.484	0.465	0.486	0.405		0.473	7.223		
1-Bromopropane			0.021	0.042	0.044	0.043	0.048	0.041	0.045	0.041	21.691	0.997	
Bromochloromethane			0.149	0.163	0.166	0.162	0.178	0.149		0.161	6.907		
Tetrahydrofuran			0.108	0.101	0.103	0.097	0.112		0.105	0.104	5.099		
Dibromofluoromethane			0.249	0.240	0.260	0.231	0.256	0.221	0.227	0.241	6.206		
1,1,1-Trichloroethane		0.424	0.334	0.394	0.402	0.384	0.422	0.350		0.387	8.831		
Cyclohexane		0.555	0.456	0.467	0.469	0.437	0.469	0.386	0.418	0.457	10.738		
1,1-Dichloropropene		0.360	0.375	0.350	0.384	0.355	0.378	0.317		0.360	6.290		
Carbon Tetrachloride		0.357	0.334	0.314	0.346	0.323	0.353	0.297		0.332	6.588		
Tert-Amyl-Methyl ether		0.759	0.852	0.79	0.829	0.736	0.823		0.72	0.78709	6.3919		
1,2-Dichloroethane-d4			0.336	0.324	0.36	0.308	0.346	0.293	0.301	0.32396	7.5906		
1,2-Dichloroethane		0.402	0.423	0.413	0.408	0.403	0.423	0.352		0.40336	6.03111		
Benzene		1.253	1.164	1.095	1.097	1.02	1.032	0.821		1.06883	12.6679		
Trichloroethene		0.257	0.284	0.245	0.262	0.245	0.264	0.217		0.25363	8.271		
Methylcyclohexane		0.5	0.45	0.415	0.459	0.44	0.461	0.385	0.402	0.439	8.37617		
1,2-Dichloropropane		0.307	0.277	0.301	0.298	0.3	0.324	0.269		0.2965	6.17188		
1,4-Dioxane				0.004	0.004	0.004	0.005		0.005	0.00436	14.9147		
Bromodichloromethane		0.363	0.342	0.337	0.363	0.365	0.392	0.33		0.35588	6.0314		
Dibromomethane			0.174	0.165	0.175	0.173	0.186	0.164		0.17287	4.61022		
2-Chloroethyl Vinyl Ether				0.176	0.194	0.203	0.22	0.191	0.2	0.19727	7.48843		
4-Methyl-2-Pentanone				0.104	0.109	0.12	0.133	0.116	0.125	0.11796	8.88833		
cis-1,3-Dichloropropene		0.437	0.398	0.428	0.443	0.445	0.479	0.399		0.43272	6.45649		
Dimethyl Disulfide				0.174	0.218	0.239	0.27	0.239	0.255	0.23268	14.4696		
Chlorobenzene-d5	ISTD												
Toluene-d8			1.532	1.449	1.447	1.207	1.277			1.38252	9.74621		
Toluene			1.716	1.712	1.617	1.485	1.496	1.155		1.53009	13.6835		
Ethyl Methacrylate				0.475	0.497	0.522	0.552	0.472	0.51	0.5045	5.99234		
trans-1,3-Dichloropropene			0.535	0.553	0.578	0.588	0.621	0.52		0.56576	6.57454		
1,1,2-Trichloroethane			0.276	0.36	0.358	0.347	0.369	0.312		0.33713	10.5947		
2-Hexanone			0.265	0.289	0.308	0.314	0.35	0.305	0.327	0.30827	8.74768		
1,3-Dichloropropane		0.594	0.628	0.613	0.646	0.614	0.64	0.531		0.60934	6.35916		
Tetrachloroethene			0.249	0.274	0.279	0.256	0.274	0.23		0.26033	7.29493		
Dibromochloromethane		0.277	0.317	0.326	0.365	0.363	0.397	0.344		0.34138	11.353		
1,2-Dibromoethane		0.329	0.316	0.316	0.325	0.32	0.346	0.298		0.32135	4.52004		
1-Chlorohexane		0.615	0.498	0.507	0.508	0.461	0.496	0.412	0.44	0.49208	12.2904		
Chlorobenzene		1.088	1.05	1.066	0.988	0.922	0.95	0.759		0.97472	11.6073		
1,1,1,2-Tetrachloroethane		0.35	0.28	0.309	0.346	0.334	0.363	0.309		0.32721	8.90354		
Ethylbenzene		0.581	0.532	0.512	0.548	0.505	0.541	0.442		0.52305	8.32226		
m-,p-Xylene	0.76	0.672	0.621	0.643	0.658	0.596	0.608	0.481		0.62997	12.5376		
o-Xylene		0.672	0.64	0.666	0.647	0.602	0.646	0.532		0.62946	7.68681		
Styrene		1.049	1.025	1.039	1.093	1.021	1.073	0.873		1.02483	6.98034		
Bromoform				0.208	0.22	0.236	0.263	0.235		0.2324	8.8473		
Isopropylbenzene		1.653	1.663	1.66	1.648	1.488	1.505	1.165		1.54028	11.8045		
1,4-Dichlorobenzene-d4	ISTD												
1,1,2,2-Tetrachloroethane		1.005	1.046	1.015	0.962	0.938	0.998	0.839		0.97186	7.03366		
p-Bromofluorobenzene			1.435	1.281	1.181	0.984	1.059			1.18807	15.065	0.997	
1,2,3-Trichloropropane			0.246	0.258	0.266	0.261	0.28	0.241		0.25866	5.49635		
trans-1,4-Dichloro-2-Butene			0.196	0.219	0.256	0.255	0.28	0.244	0.252	0.24327	11.2657		

n-Propylbenzene	4.605	4.131	4.358	4.303	3.734	3.641			4.12886	9.08001
Bromobenzene	0.878	0.737	0.849	0.836	0.778	0.807	0.664		0.79281	9.2818
1,3,5-Trimethylbenzene	2.972	2.78	2.735	2.909	2.523	2.561	1.93		2.6299	13.297
2-Chlorotoluene	3.118	2.873	3.007	2.95	2.614	2.593	1.958		2.73034	14.3723
4-Chlorotoluene		2.331	2.443	2.41	2.103	2.092	1.603		2.16366	14.4574
a-Methylstyrene	1.227	1.196	1.273	1.338	1.292	1.36	1.101	1.195	1.24755	6.82787
tert-Butylbenzene		0.553	0.598	0.602	0.513	0.556	0.451		0.54541	10.4201
1,2,4-Trimethylbenzene	3.082	2.934	2.954	2.95	2.611	2.61	1.982		2.73171	13.7943
sec-Butylbenzene	3.861	3.585	3.703	3.74	3.187	3.179			3.54262	8.25059
p-Isopropyltoluene	3.264	3.09	2.929	2.969	2.65	2.657	1.994		2.79329	14.8736
1,3-Dichlorobenzene	1.676	1.569	1.561	1.599	1.428	1.497	1.197		1.50384	10.3853
1,4-Dichlorobenzene	1.962	1.68	1.692	1.611	1.45	1.505	1.209		1.58712	14.7661
n-Butylbenzene	3.409	3.023	3.129	3.164	2.755	2.791	2.095		2.90923	14.5633
1,2-Dichlorobenzene	1.631	1.607	1.627	1.519	1.414	1.501	1.204		1.50054	10.1931
1,2-Dibromo-3-Chloropropane			0.158	0.198	0.197	0.225	0.199		0.19541	12.1697
1,2,4-Trichlorobenzene	1.085	0.994	1.074	1.074	0.998	1.133	0.9		1.03675	7.51317
Hexachlorobutadiene		0.557	0.522	0.56	0.492	0.578	0.464		0.52873	8.43134
Naphthalene	2.843	2.68	3.049	2.942	2.801	2.923	2.161		2.77129	10.5786
1,2,3-Trichlorobenzene		1.041	1.021	1.061	1.008	1.142	0.888		1.02677	8.04629

Wed Jun 28 16:01:31 2017

Calibration Table Report
Method: A9FOOS.M
Title: Appendix IX (SOP:OVL MSV01) Soil 082417 HPMS11
Last Calibration: Fri Aug 25 11:26:24 2017
Curve: WG627119
Calibration Files

	Compound	5 11M20994.D	20 11M20995.D	50 11M20996.D	100 11M20997.D	200 11M20998.D	300 11M20999.D	400 11M21000.D	500 11M21001.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile	0.021	0.023	0.023	0.023	0.024	0.023	0.022	0.023	0.023	3.946		
T	3-Chloro-1-propene	0.230	0.251	0.256	0.283	0.259	0.248	0.233	0.224	0.248	7.716		
T	2-Chloro-1,3-butadiene	0.201	0.215	0.219	0.257	0.234	0.225	0.212	0.205	0.221	8.130		
T	Methacrylonitrile	0.101	0.112	0.122	0.118	0.119	0.117	0.112	0.112	0.114	5.727		
T	Isobutyl Alcohol		0.007	0.008	0.008	0.009	0.009	0.009	0.009	0.008	9.142		
T	1-Butanol			0.004	0.004	0.004	0.004	0.004	0.005	0.004	6.396		
T	Cyclohexanone		0.006	0.006	0.006	0.006	0.006	0.006	0.006	0.006	4.411		
T	2-Nitropropane			0.045	0.044	0.048	0.049	0.048	0.049	0.047	4.566		
T	Ethyl Acetate	0.203	0.176	0.169	0.163	0.163	0.155	0.147	0.146	0.165	11.228		
T	Methyl methacrylate	0.121	0.131	0.141	0.141	0.146	0.141	0.134	0.133	0.136	5.859		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Sat Aug 26 13:55:32 2017

Calibration Table Report
Method: 8260_W.M
Title: 8260B/624 (SOP: OVL MSV01) Water 101217 HPMS11
Last Calibration: Thu Oct 12 18:32:44 2017
Curve: WG633647
Calibration Files

	Compound	0.3 11M22282.D	0.4 11M22283.D	1 11M22284.D	2 11M22285.D	5 11M22286.D	20 11M22288.D	50 11M22289.D	100 11M22290.D	200 11M22291.D	300 11M22292.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.389	0.443	0.443	0.504	0.499	0.464	0.425		0.453	8.969		
P	Chloromethane			0.476	0.437	0.418	0.424	0.396	0.362			0.419	9.240		
C	Vinyl Chloride		0.407	0.398	0.436	0.406	0.406	0.411	0.344	0.323		0.391	9.661		
T	1,3-Butadiene				0.353	0.322	0.304	0.303	0.286	0.259		0.305	10.442		
T	Bromomethane			0.199	0.192	0.184	0.207	0.226	0.228	0.232		0.210	9.166		
T	Chloroethane			0.244	0.268	0.263	0.270	0.282	0.272	0.264		0.266	4.303		
T	Trichlorofluoromethane		0.443	0.485	0.541	0.540	0.528	0.543	0.526	0.504		0.514	6.830		
T	Diethyl ether			0.270	0.285	0.306	0.274	0.286	0.266		0.263	0.279	5.347		
T	Isoprene		0.349	0.411	0.453	0.456	0.469	0.493	0.478	0.446		0.445	10.217		
T	Acrolein			0.031	0.042	0.047	0.039	0.047	0.045		0.046	0.042	14.006		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.184	0.247	0.262	0.252	0.262	0.255	0.256		0.246	11.203		
T	Acetone					0.105	0.088	0.093	0.097	0.095	0.093	0.095	5.841		
C	1,1-Dichloroethene		0.430	0.441	0.514	0.512	0.500	0.519	0.499	0.475		0.486	6.979		
T	Tert-Butyl Alcohol				0.028	0.032	0.026	0.028	0.030		0.035	0.030	10.998		
T	Dimethyl Sulfide		0.328	0.316	0.332	0.358	0.376	0.372	0.360	0.340		0.348	6.305		
T	Iodomethane			0.136	0.163	0.156	0.197	0.230	0.234	0.226		0.192	20.874	0.998	
T	Methyl acetate				0.294	0.309	0.267	0.291	0.278	0.269		0.285	5.781		
T	Methylene Chloride			0.327	0.354	0.343	0.317	0.329	0.310	0.295		0.325	6.143		
T	Carbon Disulfide			0.867	0.928	0.881	0.918	0.872	0.799	0.691		0.851	9.630		
T	Acrylonitrile			0.109	0.109	0.121	0.111	0.130	0.124		0.122	0.118	6.980		
T	Methyl Tert Butyl Ether			0.784	0.772	0.863	0.796	0.868	0.818	0.761		0.809	5.291		
T	trans-1,2-Dichloroethene		0.156	0.252	0.279	0.287	0.281	0.287	0.282	0.271		0.262	16.964	0.999	
T	n-Hexane				0.404	0.414	0.465	0.478	0.464	0.431		0.443	6.882		
T	Diisopropyl ether			1.203	1.277	1.295	1.161	1.170	0.984		0.904	1.142	12.775		
T	Vinyl Acetate				0.574	0.605	0.636	0.666	0.609	0.543		0.606	7.186		
P	1,1-Dichloroethane		0.566	0.629	0.634	0.661	0.628	0.643	0.596	0.549		0.613	6.384		
T	Ethyl-Tert-Butyl ether			0.955	1.048	1.076	0.967	0.987	0.853		0.802	0.955	10.319		
T	2-Butanone				0.137	0.152	0.134	0.158	0.153	0.153	0.155	0.149	6.166		
T	Propionitrile				0.041	0.047	0.041	0.045	0.045		0.049	0.045	6.693		
T	2,2-Dichloropropane			0.417	0.449	0.491	0.493	0.522	0.492	0.466		0.476	7.312		
T	cis-1,2-Dichloroethene		0.308	0.296	0.326	0.343	0.313	0.336	0.315	0.301		0.317	5.242		
C	Chloroform	0.536	0.620	0.567	0.567	0.597	0.558	0.577	0.535	0.491		0.561	6.713		
T	1-Bromopropane				0.029	0.047	0.054	0.054	0.053	0.053	0.052	0.049	18.551	0.999	
T	Bromochloromethane		0.148	0.165	0.178	0.180	0.174	0.187	0.179	0.175		0.173	6.852		
T	Tetrahydrofuran			0.088	0.095	0.105	0.094	0.104	0.099		0.104	0.098	6.367		
S	Dibromofluoromethane						0.302	0.250	0.281	0.283	0.264	0.276	7.096		
T	1,1,1-Trichloroethane		0.445	0.454	0.475	0.517	0.485	0.510	0.491	0.463		0.480	5.326		
T	Cyclohexane		0.451	0.460	0.590	0.562	0.552	0.590	0.570	0.526		0.538	10.217		
T	1,1-Dichloropropene		0.338	0.356	0.383	0.418	0.409	0.431	0.414	0.391		0.392	8.227		
T	Carbon Tetrachloride		0.353	0.371	0.410	0.435	0.416	0.443	0.428	0.411		0.409	7.644		
T	Tert-Amyl-Methyl ether			0.763	0.830	0.881	0.772	0.809	0.703		0.666	0.775	9.539		
S	1,2-Dichloroethane-d4						0.418	0.351	0.385	0.386	0.356	0.379	7.101		
T	1,2-Dichloroethane		0.448	0.481	0.478	0.500	0.474	0.491	0.455	0.424		0.469	5.331		
T	Benzene		1.122	1.254	1.302	1.325	1.216	1.195	1.036			1.207	8.408		
T	Trichloroethene		0.335	0.304	0.300	0.290	0.269	0.285	0.276	0.270		0.291	7.565		
T	Methylcyclohexane		0.372	0.358	0.449	0.437	0.451	0.482	0.466	0.433		0.431	10.150		
C	1,2-Dichloropropane		0.302	0.340	0.348	0.362	0.352	0.376	0.356	0.341		0.347	6.309		
T	1,4-Dioxane				0.003	0.003	0.002	0.003	0.003		0.003	0.003	13.552		
T	Bromodichloromethane		0.312	0.385	0.420	0.425	0.419	0.452	0.430	0.404		0.406	10.525		
T	Dibromomethane		0.159	0.179	0.160	0.187	0.180	0.194	0.187	0.184		0.179	7.148		
T	2-Chloroethyl Vinyl Ether				0.145	0.167	0.186	0.210	0.204	0.202	0.192	0.186	12.467		
T	4-Methyl-2-Pentanone					0.094	0.106	0.122	0.123	0.128	0.123	0.116	11.232		
T	cis-1,3-Dichloropropene		0.342	0.366	0.457	0.479	0.485	0.530	0.495	0.455		0.451	14.326		
T	Dimethyl Disulfide				0.170	0.177	0.254	0.283	0.290	0.283	0.262	0.245	20.741	0.998	

I	Chlorobenzene-d5	ISTD												
S	Toluene-d8						1.523	1.295	1.400	1.316	1.164	1.340	9.921	
C	Toluene		1.489	1.587	1.744	1.831	1.645	1.637	1.424			1.622	8.630	
T	Ethyl Methacrylate			0.337	0.421	0.479	0.480	0.550	0.539	0.508	0.469	0.473	14.446	
T	trans-1,3-Dichloropropene			0.544	0.548	0.627	0.606	0.676	0.630	0.568		0.600	8.103	
T	1,1,2-Trichloroethane		0.223	0.335	0.354	0.379	0.340	0.364	0.347	0.327		0.333	14.268	
T	2-Hexanone					0.284	0.271	0.326	0.330	0.327	0.318	0.309	8.253	
T	1,3-Dichloropropane		0.562	0.654	0.647	0.693	0.593	0.658	0.609	0.552		0.621	8.033	
T	Tetrachloroethene		0.262	0.318	0.319	0.307	0.313	0.325	0.315	0.295		0.307	6.590	
T	Dibromochloromethane		0.303	0.362	0.402	0.399	0.384	0.426	0.414	0.393		0.385	9.912	
T	1,2-Dibromoethane		0.240	0.327	0.338	0.341	0.323	0.361	0.348	0.332		0.326	11.342	
T	1-Chlorohexane		0.244	0.319	0.428	0.462	0.514	0.545	0.545	0.490	0.447	0.444	23.061	0.994
P	Chlorobenzene		1.093	1.127	1.157	1.158	1.029	1.048	0.954	0.808		1.047	11.344	
T	1,1,1,2-Tetrachloroethane		0.343	0.394	0.400	0.424	0.391	0.428	0.412	0.383		0.397	6.736	
C	Ethylbenzene			0.528	0.530	0.598	0.561	0.595	0.564	0.514		0.556	5.960	
T	m-,p-Xylene		0.597	0.636	0.67	0.727	0.678	0.673	0.599	0.494		0.63424	11.2093	
T	o-Xylene		0.552	0.560	0.649	0.685	0.687	0.728	0.675	0.608		0.643	9.926	
T	Styrene		0.691	0.868	0.979	1.134	1.135	1.187	1.080			1.011	17.623	0.998
P	Bromoform			0.201	0.196	0.252	0.241	0.280	0.283	0.286		0.248	15.276	0.999
T	Isopropylbenzene		1.289	1.465	1.695	1.814	1.709	1.715	1.509	1.223		1.552	13.922	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.840	0.911	1.010	0.946	0.912	0.947	0.891	0.859		0.915	5.905	
S	p-Bromofluorobenzene						1.163	0.989	1.141	1.153	1.035	1.096	7.178	
T	1,2,3-Trichloropropane			0.259	0.237	0.260	0.251	0.270	0.262	0.263		0.257	4.107	
T	trans-1,4-Dichloro-2-Butene			0.175	0.198	0.285	0.306	0.325	0.336	0.349	0.307	0.285	22.521	0.996
T	n-Propylbenzene		3.119	3.771	4.330	4.634	4.661	4.213	3.496			4.032	14.563	
T	Bromobenzene	0.930	0.799	0.856	0.994	0.987	0.944	0.942	0.869	0.822		0.905	7.826	
T	1,3,5-Trimethylbenzene		1.786	2.515	2.997	3.245	3.227	3.036	2.611			2.774	18.705	0.991
T	2-Chlorotoluene		2.547	2.931	3.317	3.352	3.117	2.934	2.519			2.960	11.307	
T	4-Chlorotoluene		1.944	2.159	2.633	2.826	2.655	2.387	2.067			2.382	14.089	
T	a-Methylstyrene					1.390	1.652	1.562	1.479	1.306		1.478	9.251	
T	tert-Butylbenzene			0.519	0.597	0.646	0.646	0.658	0.631	0.604		0.615	7.781	
T	1,2,4-Trimethylbenzene			2.705	3.112	3.341	3.366	3.107	2.656			3.048	10.015	
T	sec-Butylbenzene			3.176	4.004	4.060	3.974	3.715	3.134			3.677	11.469	
T	p-Isopropyltoluene			2.442	3.062	3.170	3.307	3.084	2.684			2.958	11.055	
T	1,3-Dichlorobenzene		1.513	1.698	1.713	1.764	1.760	1.681	1.540	1.352		1.628	8.944	
T	1,4-Dichlorobenzene		1.827	1.838	1.904	1.800	1.758	1.682	1.529	1.339		1.710	11.024	
T	n-Butylbenzene			2.305	2.884	3.065	3.327	3.143	2.727	2.228		2.811	14.878	
T	1,2-Dichlorobenzene	1.495	1.569	1.731	1.744	1.757	1.680	1.656	1.494	1.309		1.604	9.354	
T	1,2-Dibromo-3-Chloropropane				0.133	0.171	0.166	0.195	0.192	0.204		0.177	14.602	
T	1,2,4-Trichlorobenzene			0.949	1.015	1.118	1.205	1.231	1.147	1.109		1.111	9.017	
T	Hexachlorobutadiene		0.377	0.449	0.589	0.556	0.622	0.634	0.637	0.619		0.560	17.268	1.000
T	Naphthalene		1.656	1.966	2.145	2.445	2.569	2.625	2.282			2.241	15.517	0.995
T	1,2,3-Trichlorobenzene			1.036	1.034	1.147	1.162	1.159	1.100	1.063		1.100	5.179	

Fri Oct 13 15:45:54 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Calibration Table Report
Method: A9FOOWTR.M
Title: A9-FOO Water SOP:MSV01 08-31-17 HPMS8
Last Calibration: Tue Sep 05 14:28:41 2017
Curve: WG628027
Calibration Files

Compound	5 8M421176.D	20 8M421177.D	50 8M421178.D	100 8M421179.D	200 8M421180.D	300 8M421181.D	400 8M421182.D	500 8M421183.D	Avg	%RSD
Fluorobenzene	ISTD									
Acetonitrile		0.029	0.031	0.029	0.028	0.030	0.030	0.031	0.030	3.362
3-Chloro-1-propene	0.776	0.836	0.870	0.863	0.874	0.840	0.807	0.773	0.830	4.885
2-Chloro-1,3-butadiene	0.670	0.740	0.785	0.794	0.804	0.769	0.737	0.700	0.750	6.291
Ethyl Acetate		0.260	0.283	0.285	0.280	0.285	0.281	0.280	0.279	3.184
Methacrylonitrile	0.069	0.078	0.083	0.085	0.083	0.085	0.085	0.086	0.082	6.972
Isobutyl Alcohol			0.009	0.009	0.009	0.010	0.010	0.011	0.010	8.810
1-Butanol									0.000	0.000
Methyl methacrylate	0.282	0.290	0.314	0.318	0.318	0.319	0.311	0.310	0.308	4.536
2-Nitropropane		0.092	0.099	0.101	0.101	0.103	0.101	0.103	0.100	3.821
Chlorobenzene-d5	ISTD									
1,4-Dichlorobenzene-d4	ISTD									
Cyclohexanone			0.012	0.013	0.012	0.013	0.014	0.015	0.013	9.192

Tue Sep 05 14:30:32 2017

Calibration Table Report
Method: 8260WTR.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 10-17-17 HPMS8
Last Calibration: Wed Oct 18 08:46:39 2017
Curve: WG634047
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		8M422210.D	8M422211.D	8M422212.D	8M422213.D	8M422214.D	8M422215.D	8M422216.D	8M422217.D	8M422218.D	8M422219.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.346	0.387	0.402	0.496	0.471	0.423	0.440		0.423	12.058		
P	Chloromethane			0.679	0.699	0.679	0.697	0.667	0.605	0.636		0.666	5.136		
C	Vinyl Chloride		0.336	0.309	0.333	0.303	0.330	0.313	0.283	0.297		0.313	6.099		
T	1,3-Butadiene				0.353	0.312	0.312	0.230	0.147	0.149	0.144	0.235	38.464		0.993
T	Bromomethane			0.142	0.155	0.170	0.197	0.219	0.210	0.237		0.190	18.456	0.996	
T	Chloroethane		0.218	0.230	0.245	0.239	0.244	0.240	0.221	0.239		0.234	4.388		
T	Trichlorofluoromethane		0.455	0.472	0.515	0.512	0.555	0.563	0.514	0.551		0.517	7.553		
T	Diethyl ether			0.218	0.234	0.221	0.210	0.199	0.205		0.215	0.215	5.336		
T	Isoprene					0.404	0.406	0.410	0.376	0.390	0.382	0.395	3.574		
T	Acrolein			0.032	0.029	0.027	0.026	0.026	0.027		0.028	0.028	8.046		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.202	0.213	0.219	0.222	0.218	0.196	0.213		0.212	4.548		
T	Acetone					0.095	0.076	0.069	0.082	0.079	0.075	0.079	11.057		
C	1,1-Dichloroethene		0.390	0.443	0.473	0.481	0.485	0.508	0.503	0.554		0.480	10.089		
T	Tert-Butyl Alcohol				0.022	0.020	0.020	0.020	0.023		0.024	0.022	9.051		
T	Dimethyl Sulfide					0.327	0.330	0.331	0.321	0.331	0.330	0.328	1.147		
T	Iodomethane			0.113	0.148	0.159	0.196	0.193	0.191	0.209	0.201	0.176	18.807	0.999	
T	Methyl acetate					0.241	0.201	0.195	0.215	0.220	0.220	0.215	7.451		
T	Methylene Chloride			0.293	0.279	0.271	0.265	0.264	0.239	0.248		0.266	6.813		
T	Carbon Disulfide			0.849	0.902	0.845	0.872	0.852	0.784	0.790	0.760	0.832	5.848		
T	Acrylonitrile			0.091	0.095	0.085	0.091	0.093	0.101		0.099	0.094	5.862		
T	Methyl Tert Butyl Ether			0.623	0.679	0.640	0.642	0.630	0.607	0.615		0.634	3.755		
T	trans-1,2-Dichloroethene		0.436	0.471	0.471	0.447	0.454	0.444	0.406	0.445		0.447	4.638		
T	n-Hexane					0.481	0.507	0.508	0.487	0.511	0.497	0.499	2.518		
T	Diisopropyl ether			1.584	1.610	1.557	1.543	1.480	1.465		1.395	1.519	4.988		
T	Vinyl Acetate					0.485	0.420	0.464	0.478	0.473	0.420	0.457	6.398		
P	1,1-Dichloroethane		0.593	0.552	0.555	0.568	0.548	0.533	0.493	0.592		0.554	5.841		
T	Ethyl-Tert-Butyl ether			1.134	1.177	1.126	1.129	1.083	1.088		1.056	1.113	3.631		
T	2-Butanone					0.121	0.118	0.113	0.127	0.127	0.130	0.123	5.477		
T	Propionitrile			0.031	0.034	0.032	0.033	0.033	0.037		0.038	0.034	8.008		
T	2,2-Dichloropropane		0.451	0.475	0.417	0.442	0.413	0.407	0.370	0.394		0.421	7.938		
T	cis-1,2-Dichloroethene		0.268	0.261	0.269	0.263	0.258	0.251	0.235	0.268		0.259	4.367		
C	Chloroform	0.447	0.485	0.474	0.488	0.474	0.463	0.445	0.412	0.429		0.457	5.683		
T	1-Bromopropane				0.052	0.050	0.046	0.047	0.045	0.049	0.049	0.048	4.780		
T	Bromochloromethane		0.117	0.158	0.164	0.156	0.157	0.158	0.150	0.159		0.152	9.626		
T	Tetrahydrofuran			0.097	0.081	0.073	0.072	0.069	0.079		0.082	0.079	11.838		
S	Dibromofluoromethane				0.238	0.248	0.233	0.228	0.225	0.238	0.230	0.234	3.313		
T	1,1,1-Trichloroethane		0.429	0.444	0.487	0.489	0.485	0.480	0.434	0.452		0.462	5.468		
T	Cyclohexane			0.647	0.629	0.656	0.659	0.670	0.639	0.678	0.653	0.654	2.422		
T	1,1-Dichloropropene			0.421	0.429	0.458	0.455	0.447	0.402	0.412		0.432	5.058		
T	Tert-Amyl-Methyl ether			0.792	0.810	0.768	0.751	0.715	0.713		0.693	0.749	5.872		
T	Carbon Tetrachloride		0.41	0.43	0.443	0.474	0.461	0.459	0.417	0.447		0.4426	5.03391		
S	1,2-Dichloroethane-d4				0.345	0.337	0.317	0.306	0.301	0.307	0.303	0.3164	5.53082		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.388	0.477	0.48	0.467	0.459	0.447	0.425	0.441		0.4481	6.81104		
T	Benzene		1.233	1.202	1.194	1.204	1.222	1.188	1.063	1.039		1.168	6.33504		
T	Trichloroethene		0.284	0.299	0.31	0.311	0.321	0.312	0.289	0.301		0.3035	4.07642		
T	Methylcyclohexane					0.441	0.46	0.453	0.425	0.43	0.414	0.4372	3.99259		
C	1,2-Dichloropropane		0.324	0.363	0.362	0.378	0.383	0.388	0.357	0.372		0.3659	5.46151		
T	Bromodichloromethane		0.432	0.4	0.444	0.425	0.422	0.422	0.391	0.401		0.4171	4.2929		
T	1,4-Dioxane				0.002	0.002	0.002	0.002	0.002		0.002	0.0017	7.58897		
T	Dibromomethane		0.129	0.148	0.152	0.154	0.151	0.149	0.144	0.15		0.1471	5.45636		
T	2-Chloroethyl Vinyl Ether			0.189	0.198	0.182	0.195	0.188	0.192	0.191	0.193	0.191	2.45763		
T	4-Methyl-2-Pentanone					0.089	0.097	0.097	0.102	0.101	0.104	0.0985	5.30513		
T	cis-1,3-Dichloropropene		0.5	0.537	0.518	0.515	0.528	0.521	0.476	0.474		0.5087	4.58857		

T	Dimethyl Disulfide					0.259	0.275	0.279	0.269	0.266	0.258	0.2676	3.20002
I	Chlorobenzene-d5	ISTD											
S	Toluene-d8				1.342	1.318	1.285	1.226	1.169	1.128	1.096	1.2232	7.83569
C	Toluene		1.606	1.575	1.61	1.619	1.602	1.531	1.406	1.327		1.5345	7.13
T	Ethyl Methacrylate			0.353	0.378	0.389	0.406	0.39	0.395	0.368	0.366	0.3804	4.60355
T	Paraldehyde											0	0
T	trans-1,3-Dichloropropene			0.601	0.591	0.572	0.603	0.576	0.55	0.522		0.5737	5.09026
T	1,1,2-Trichloroethane		0.292	0.299	0.285	0.281	0.291	0.275	0.269	0.264		0.2821	4.29026
T	2-Hexanone					0.106	0.122	0.115	0.128	0.117	0.122	0.1184	6.33982
T	1,3-Dichloropropane		0.552	0.524	0.559	0.534	0.549	0.526	0.502	0.474		0.5273	5.35304
T	Tetrachloroethene		0.293	0.3	0.29	0.293	0.308	0.298	0.286	0.299		0.2958	2.26691
T	Dibromochloromethane		0.295	0.367	0.361	0.373	0.395	0.387	0.378	0.373		0.366	8.39943
T	1,2-Dibromoethane		0.303	0.318	0.295	0.293	0.301	0.294	0.284	0.278		0.2961	4.1281
T	1-Chlorohexane		0.489	0.514	0.507	0.516	0.526	0.504	0.482	0.469	0.462	0.4966	4.48312
P	Chlorobenzene		1.185	1.081	1.04	1.054	1.044	1.005	0.949	0.922		1.0349	7.85174
T	1,1,1,2-Tetrachloroethane		0.412	0.396	0.413	0.405	0.415	0.399	0.385	0.379		0.4007	3.31662
C	Ethylbenzene		0.567	0.569	0.571	0.592	0.582	0.567	0.542	0.552		0.5679	2.71642
T	m-,p-Xylene		0.712	0.717	0.725	0.695	0.715	0.683	0.645	0.61		0.6876	5.92359
T	o-Xylene			0.736	0.707	0.708	0.72	0.692	0.656	0.664		0.6976	4.1608
T	Styrene		1.083	1.176	1.16	1.16	1.201	1.166	1.097	1.064		1.1384	4.3774
P	Bromoform			0.202	0.214	0.212	0.236	0.233	0.234	0.231		0.2232	5.95467
T	Isopropylbenzene		1.841	1.848	1.803	1.796	1.814	1.722	1.579	1.473		1.7347	7.89848
I	1,4-Dichlorobenzene-d4	ISTD											
P	1,1,2,2-Tetrachloroethane		0.629	0.61	0.633	0.584	0.618	0.606	0.584	0.556		0.6027	4.31561
S	p-Bromofluorobenzene				1.16	1.095	1.105	1.046	0.985	0.962	0.914	1.0382	8.48786
T	1,2,3-Trichloropropane			0.155	0.201	0.181	0.193	0.183	0.179	0.175		0.1811	8.04154
T	trans-1,4-Dichloro-2-Butene			0.244	0.253	0.266	0.293	0.293	0.295	0.289	0.254	0.2735	7.82362
T	n-Propylbenzene		4.443	4.155	4.243	4.26	4.308	3.99	3.512	3.156		4.0084	11.1235
T	Bromobenzene	0.904	0.799	0.793	0.865	0.809	0.861	0.833	0.794	0.818		0.8307	4.63518
T	1,3,5-Trimethylbenzene		2.899	2.985	2.945	2.966	3.009	2.849	2.582	2.463		2.8374	7.15871
T	2-Chlorotoluene		3.088	2.944	3.001	2.627	2.935	2.786	2.391	2.369		2.7676	10.0084
T	4-Chlorotoluene		2.667	2.511	2.513	2.766	2.514	2.338	2.152	1.927		2.4235	11.3309
T	a-Methylstyrene					1.559	1.578	1.547	1.488	1.484	1.349	1.5008	5.57017
T	tert-Butylbenzene			0.543	0.578	0.57	0.61	0.585	0.548	0.576		0.5727	3.94793
T	1,2,4-Trimethylbenzene		3.062	3.098	3.158	3.04	3.109	2.919	2.634	2.486		2.9382	8.39082
T	sec-Butylbenzene			3.61	3.476	3.517	3.652	3.437	3.077	2.892		3.38	8.44255
T	p-Isopropyltoluene			2.969	2.925	3.028	3.083	2.937	2.674	2.549		2.8807	6.77137
T	1,3-Dichlorobenzene		1.606	1.605	1.594	1.586	1.616	1.585	1.47	1.487		1.5687	3.61008
T	1,4-Dichlorobenzene	1.591	1.572	1.609	1.637	1.578	1.624	1.571	1.47	1.476		1.5698	3.79223
T	n-Butylbenzene			3.192	3.004	2.949	3.025	2.815	2.514	2.373		2.8388	10.3955
T	1,2-Dichlorobenzene	1.428	1.447	1.474	1.448	1.426	1.49	1.454	1.364	1.369		1.4331	2.98373
T	1,2-Dibromo-3-Chloropropane				0.136	0.142	0.152	0.143	0.14	0.137		0.1416	4.15255
T	1,2,4-Trichlorobenzene		1.142	1.081	1.078	1.046	1.119	1.078	1.018	1.031		1.0739	3.94443
T	Hexachlorobutadiene		0.38	0.438	0.414	0.454	0.471	0.453	0.432	0.468		0.4387	6.91754
T	Naphthalene		2.156	2.119	2.202	2.048	2.18	2.079	1.951	1.813		2.0685	6.32725
T	1,2,3-Trichlorobenzene	1.141	1.064	1.026	0.973	0.925	0.985	0.968	0.916	0.916		0.9904	7.61726

Wed Oct 18 15:47:45 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 06/27/2017 Sample ID: WG619415-11
Instrument ID: HPMS11 Run Time: 12:34 Method: 8260B
File ID: 11M19380 Analyst: ADC QC Key: AF40
ICal Workgroup: WG619415 Cal ID: HPMS11 - 27-JUN-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.9	ug/kg	0.396	1.80	25	
1,2-Dichloropropane	CCC	50.0	51.4	ug/kg	0.305	2.90	25	
Chloroform	CCC	50.0	49.3	ug/kg	0.467	1.30	25	
Ethylbenzene	CCC	50.0	49.0	ug/kg	0.513	1.90	25	
Toluene	CCC	50.0	50.0	ug/kg	1.53	0	25	
Vinyl Chloride	CCC	50.0	53.8	ug/kg	0.251	7.70	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.6	ug/kg	0.887	8.80	25	
1,1-Dichloroethane	SPCC	50.0	49.1	ug/kg	0.494	1.80	25	
Bromoform	SPCC	50.0	46.3	ug/kg	0.215	7.30	25	
Chlorobenzene	SPCC	50.0	49.8	ug/kg	0.971	0.400	25	
Chloromethane	SPCC	50.0	50.9	ug/kg	0.269	1.90	25	
1,1,1,2-Tetrachloroethane		50.0	51.9	ug/kg	0.339	3.70	25	
1,1,1-Trichloroethane		50.0	50.2	ug/kg	0.389	0.500	25	
1,1,2-Trichloroethane		50.0	51.3	ug/kg	0.346	2.60	25	
1,1-Dichloropropene		50.0	50.1	ug/kg	0.361	0.300	25	
1,2,3-Trichlorobenzene		50.0	48.2	ug/kg	0.989	3.60	25	
1,2,3-Trichloropropane		50.0	50.7	ug/kg	0.262	1.30	25	
1,2,4-Trichlorobenzene		50.0	47.8	ug/kg	0.990	4.50	25	
1,2,4-Trimethylbenzene		50.0	48.4	ug/kg	2.64	3.30	25	
1,2-Dichloroethane		50.0	49.5	ug/kg	0.399	1.00	25	
1,2-Dichlorobenzene		50.0	47.2	ug/kg	1.42	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	49.3	ug/kg	0.193	1.40	25	
1,2-Dibromoethane		50.0	51.5	ug/kg	0.331	2.90	25	
1,3,5-Trimethylbenzene		50.0	47.7	ug/kg	2.51	4.50	25	
1,3-Dichlorobenzene		50.0	47.0	ug/kg	1.41	6.10	25	
1,3-Dichloropropane		50.0	53.4	ug/kg	0.651	6.80	25	
1,4-Dichlorobenzene		50.0	45.4	ug/kg	1.44	9.20	25	
1,4-Dioxane		200	213	ug/kg	0.00470	6.60	25	
1-Chlorohexane		50.0	52.5	ug/kg	0.517	5.00	25	
2,2-Dichloropropane		50.0	48.5	ug/kg	0.384	2.90	25	
2-Hexanone		50.0	51.5	ug/kg	0.318	3.00	25	
2-Chlorotoluene		50.0	47.5	ug/kg	2.59	5.00	25	
4-Chlorotoluene		50.0	49.3	ug/kg	2.13	1.50	25	
Acetone		50.0	47.1	ug/kg	0.0877	5.80	25	
Benzene		50.0	48.7	ug/kg	1.04	2.50	25	
Bromobenzene		50.0	48.7	ug/kg	0.772	2.70	25	
Bromochloromethane		50.0	50.2	ug/kg	0.162	0.300	25	
Bromodichloromethane		50.0	50.3	ug/kg	0.358	0.600	25	
Bromomethane		50.0	46.3	ug/kg	0.170	7.40	25	
Carbon Disulfide		50.0	41.9	ug/kg	0.632	16.2	25	
Carbon Tetrachloride		50.0	48.6	ug/kg	0.323	2.80	25	
Chloroethane		50.0	52.8	ug/kg	0.208	5.60	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 06/27/2017 Sample ID: WG619415-11
Instrument ID: HPMS11 Run Time: 12:34 Method: 8260B
File ID: 11M19380 Analyst: ADC QC Key: AF40
ICal Workgroup: WG619415 Cal ID: HPMS11 - 27-JUN-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.6	ug/kg	0.288	0.900	25	
cis-1,3-Dichloropropene		50.0	54.1	ug/kg	0.468	8.20	25	
Dibromochloromethane		50.0	53.0	ug/kg	0.362	6.00	25	
Dibromomethane		50.0	49.4	ug/kg	0.171	1.20	25	
Dichlorodifluoromethane		50.0	51.0	ug/kg	0.306	2.00	25	
Hexachlorobutadiene		50.0	47.4	ug/kg	0.501	5.20	25	
Isopropylbenzene		50.0	47.6	ug/kg	1.47	4.70	25	
Methylene Chloride		50.0	50.1	ug/kg	0.281	0.100	25	
Methyl Tert Butyl Ether		50.0	49.9	ug/kg	0.827	0.300	25	
2-Butanone		50.0	48.4	ug/kg	0.144	3.20	25	
4-Methyl-2-Pentanone		50.0	49.5	ug/kg	0.117	1.00	25	
n-Butylbenzene		50.0	45.7	ug/kg	2.66	8.60	25	
n-Propylbenzene		50.0	45.9	ug/kg	3.79	8.30	25	
m-,p-Xylene		100	97.6	ug/kg	0.615	2.40	25	
Naphthalene		50.0	49.3	ug/kg	2.73	1.40	25	
o-Xylene		50.0	50.8	ug/kg	0.640	1.60	25	
p-Isopropyltoluene		50.0	46.2	ug/kg	2.58	7.60	25	
sec-Butylbenzene		50.0	44.6	ug/kg	3.16	10.7	25	
Styrene		50.0	51.8	ug/kg	1.06	3.60	25	
Trichloroethene		50.0	48.6	ug/kg	0.247	2.70	25	
tert-Butylbenzene		50.0	48.9	ug/kg	0.534	2.20	25	
Tetrachloroethene		50.0	49.0	ug/kg	0.255	1.90	25	
trans-1,2-Dichloroethene		50.0	50.3	ug/kg	0.247	0.600	25	
trans-1,3-Dichloropropene		50.0	51.6	ug/kg	0.584	3.20	25	
Trichlorofluoromethane		50.0	48.0	ug/kg	0.363	4.00	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	30.0	30.9	ug/L	0.300	2.90	25	
1,2-Dichloropropane	CCC	30.0	31.0	ug/L	0.215	3.20	25	
Chloroform	CCC	30.0	29.5	ug/L	0.331	1.70	25	
Ethylbenzene	CCC	30.0	31.6	ug/L	0.352	5.50	25	
Toluene	CCC	30.0	30.6	ug/L	0.994	2.10	25	
Vinyl Chloride	CCC	50.0	49.7	ug/L	0.389	0.600	25	
1,1,2,2-Tetrachloroethane	SPCC	30.0	28.5	ug/L	0.521	5.10	25	
1,1-Dichloroethane	SPCC	30.0	29.6	ug/L	0.364	1.20	25	
Bromoform	SPCC	30.0	25.8	ug/L	0.144	13.9	25	
Chlorobenzene	SPCC	30.0	30.4	ug/L	0.635	1.20	25	
Chloromethane	SPCC	50.0	49.8	ug/L	0.417	0.400	25	
1,1,1,2-Tetrachloroethane		30.0	30.0	ug/L	0.238	0	25	
1,1,1-Trichloroethane		30.0	30.7	ug/L	0.295	2.30	25	
1,1,2-Trichloroethane		30.0	30.7	ug/L	0.205	2.30	25	
1,1-Dichloropropene		30.0	32.5	ug/L	0.255	8.30	25	
1,2,3-Trichlorobenzene		30.0	34.3	ug/L	0.754	14.2	25	
1,2,3-Trichloropropane		30.0	29.3	ug/L	0.151	2.40	25	
1,2,4-Trichlorobenzene		30.0	35.5	ug/L	0.789	18.3	25	
1,2,4-Trimethylbenzene		30.0	31.5	ug/L	1.92	4.90	25	
1,2-Dichloroethane		30.0	29.7	ug/L	0.278	1.20	25	
1,2-Dichlorobenzene		30.0	31.5	ug/L	1.01	4.80	25	
1,2-Dibromo-3-Chloropropane		30.0	29.6	ug/L	0.105	1.30	25	
1,2-Dibromoethane		30.0	30.2	ug/L	0.197	0.600	25	
1,3,5-Trimethylbenzene		30.0	32.4	ug/L	1.83	8.10	25	
1,3-Dichlorobenzene		30.0	30.8	ug/L	1.00	2.60	25	
1,3-Dichloropropane		30.0	31.1	ug/L	0.386	3.60	25	
1,4-Dichlorobenzene		30.0	30.3	ug/L	1.04	1.00	25	
1,4-Dioxane		200	210	ug/L	0.00290	5.00	25	
1-Chlorohexane		50.0	56.9	ug/L	0.549	13.8	25	
2,2-Dichloropropane		30.0	31.0	ug/L	0.295	3.30	25	
2-Hexanone		50.0	50.9	ug/L	0.315	1.90	25	
2-Chlorotoluene		30.0	30.5	ug/L	1.80	1.60	25	
4-Chlorotoluene		30.0	30.9	ug/L	1.47	2.80	25	
Acetone		50.0	46.2	ug/L	0.0878	7.60	25	
Benzene		30.0	29.8	ug/L	0.720	0.600	25	
Bromobenzene		30.0	29.6	ug/L	0.535	1.50	25	
Bromochloromethane		30.0	29.2	ug/L	0.101	2.70	25	
Bromodichloromethane		30.0	30.0	ug/L	0.244	0	25	
Bromomethane		50.0	50.3	ug/L	0.211	0.600	25	
Carbon Disulfide		50.0	44.8	ug/L	0.762	10.4	25	
Carbon Tetrachloride		30.0	30.3	ug/L	0.248	1.20	25	
Chloroethane		50.0	55.1	ug/L	0.294	10.2	25	

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ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		30.0	29.8	ug/L	0.189	0.600	25	
cis-1,3-Dichloropropene		30.0	34.7	ug/L	0.313	15.5	25	
Dibromochloromethane		30.0	29.4	ug/L	0.226	2.20	25	
Dibromomethane		30.0	29.5	ug/L	0.105	1.70	25	
Dichlorodifluoromethane		50.0	58.2	ug/L	0.526	16.3	25	
Hexachlorobutadiene		30.0	32.6	ug/L	0.407	8.80	25	
Isopropylbenzene		30.0	33.4	ug/L	1.04	11.3	25	
Methylene Chloride		30.0	28.5	ug/L	0.186	4.90	25	
Methyl Tert Butyl Ether		50.0	47.5	ug/L	0.769	5.00	25	
2-Butanone		50.0	48.2	ug/L	0.144	3.60	25	
4-Methyl-2-Pentanone		50.0	47.8	ug/L	0.111	4.40	25	
n-Butylbenzene		30.0	34.0	ug/L	1.91	13.4	25	
n-Propylbenzene		30.0	32.9	ug/L	2.65	9.70	25	
m-,p-Xylene		60.0	65.1	ug/L	0.413	8.40	25	
Naphthalene		30.0	34.5	ug/L	1.66	15.0	25	
o-Xylene		30.0	32.8	ug/L	0.422	9.50	25	
p-Isopropyltoluene		30.0	31.5	ug/L	1.87	5.10	25	
sec-Butylbenzene		30.0	30.9	ug/L	2.27	3.00	25	
Styrene		30.0	31.4	ug/L	0.702	4.80	25	
Trichloroethene		30.0	28.5	ug/L	0.166	4.90	25	
tert-Butylbenzene		30.0	30.8	ug/L	0.379	2.80	25	
Tetrachloroethene		30.0	30.8	ug/L	0.189	2.60	25	
trans-1,2-Dichloroethene		30.0	30.2	ug/L	0.167	0.700	25	
trans-1,3-Dichloropropene		30.0	31.7	ug/L	0.380	5.60	25	
Trichlorofluoromethane		50.0	49.4	ug/L	0.508	1.10	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634047-12
Instrument ID: HPMS8 Run Time: 21:12 Method: 8260B
File ID: 8M422222 Analyst: TMB QC Key: AF40
ICal Workgroup: WG634047 Cal ID: HPMS8 - 17-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.6	ug/L	0.523	9.10	25	
1,2-Dichloropropane	CCC	50.0	51.4	ug/L	0.376	2.80	25	
Chloroform	CCC	50.0	51.0	ug/L	0.466	1.90	25	
Ethylbenzene	CCC	50.0	49.4	ug/L	0.561	1.20	25	
Toluene	CCC	50.0	48.5	ug/L	1.49	3.10	25	
Vinyl Chloride	CCC	50.0	59.1	ug/L	0.370	18.2	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.2	ug/L	0.557	7.70	25	
1,1-Dichloroethane	SPCC	50.0	48.6	ug/L	0.539	2.70	25	
Bromoform	SPCC	50.0	49.7	ug/L	0.222	0.600	25	
Chlorobenzene	SPCC	50.0	48.6	ug/L	1.01	2.90	25	
Chloromethane	SPCC	50.0	50.2	ug/L	0.669	0.500	25	
1,1,1,2-Tetrachloroethane		50.0	48.7	ug/L	0.390	2.60	25	
1,1,1-Trichloroethane		50.0	50.6	ug/L	0.468	1.20	25	
1,1,2-Trichloroethane		50.0	47.4	ug/L	0.268	5.10	25	
1,1-Dichloropropene		50.0	50.0	ug/L	0.432	0.100	25	
1,2,3-Trichlorobenzene		50.0	46.9	ug/L	0.930	6.10	25	
1,2,3-Trichloropropane		50.0	50.7	ug/L	0.184	1.40	25	
1,2,4-Trichlorobenzene		50.0	48.8	ug/L	1.05	2.50	25	
1,2,4-Trimethylbenzene		50.0	49.2	ug/L	2.89	1.60	25	
1,2-Dichloroethane		50.0	52.5	ug/L	0.470	4.90	25	
1,2-Dichlorobenzene		50.0	50.1	ug/L	1.44	0.200	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.133	6.00	25	
1,2-Dibromoethane		50.0	47.8	ug/L	0.283	4.40	25	
1,3,5-Trimethylbenzene		50.0	48.8	ug/L	2.77	2.40	25	
1,3-Dichlorobenzene		50.0	49.1	ug/L	1.54	1.70	25	
1,3-Dichloropropane		50.0	50.1	ug/L	0.528	0.200	25	
1,4-Dichlorobenzene		50.0	49.8	ug/L	1.56	0.500	25	
1,4-Dioxane		200	203	ug/L	0.00170	1.50	25	
1-Chlorohexane		50.0	50.8	ug/L	0.505	1.60	25	
2,2-Dichloropropane		50.0	49.0	ug/L	0.413	1.90	25	
2-Hexanone		50.0	50.3	ug/L	0.119	0.500	25	
2-Chlorotoluene		50.0	48.1	ug/L	2.66	3.80	25	
4-Chlorotoluene		50.0	47.7	ug/L	2.31	4.50	25	
Acetone		50.0	56.3	ug/L	0.0895	12.6	25	
Benzene		50.0	49.0	ug/L	1.14	2.00	25	
Bromobenzene		50.0	48.5	ug/L	0.805	3.00	25	
Bromochloromethane		50.0	51.7	ug/L	0.158	3.50	25	
Bromodichloromethane		50.0	48.6	ug/L	0.406	2.70	25	
Bromomethane		50.0	44.1	ug/L	0.197	11.8	25	
Carbon Disulfide		50.0	46.6	ug/L	0.775	6.80	25	
Carbon Tetrachloride		50.0	50.3	ug/L	0.445	0.500	25	
Chloroethane		50.0	57.7	ug/L	0.271	15.5	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5534630
Report generated 10/23/2017 17:18

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634047-12
Instrument ID: HPMS8 Run Time: 21:12 Method: 8260B
File ID: 8M422222 Analyst: TMB QC Key: AF40
ICal Workgroup: WG634047 Cal ID: HPMS8 - 17-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.5	ug/L	0.256	1.10	25	
cis-1,3-Dichloropropene		50.0	52.2	ug/L	0.531	4.30	25	
Dibromochloromethane		50.0	49.9	ug/L	0.365	0.300	25	
Dibromomethane		50.0	52.1	ug/L	0.153	4.10	25	
Dichlorodifluoromethane		50.0	59.6	ug/L	0.505	19.2	25	
Hexachlorobutadiene		50.0	51.8	ug/L	0.454	3.50	25	
Isopropylbenzene		50.0	47.4	ug/L	1.64	5.30	25	
Methylene Chloride		50.0	50.0	ug/L	0.266	0	25	
Methyl Tert Butyl Ether		50.0	49.8	ug/L	0.632	0.400	25	
2-Butanone		50.0	55.9	ug/L	0.137	11.7	25	
4-Methyl-2-Pentanone		50.0	52.3	ug/L	0.103	4.60	25	
n-Butylbenzene		50.0	47.0	ug/L	2.67	6.00	25	
n-Propylbenzene		50.0	48.6	ug/L	3.89	2.90	25	
m-,p-Xylene		100	99.6	ug/L	0.685	0.400	25	
Naphthalene		50.0	47.6	ug/L	1.97	4.80	25	
o-Xylene		50.0	49.7	ug/L	0.694	0.600	25	
p-Isopropyltoluene		50.0	49.2	ug/L	2.83	1.70	25	
sec-Butylbenzene		50.0	49.2	ug/L	3.33	1.60	25	
Styrene		50.0	51.0	ug/L	1.16	2.00	25	
Trichloroethene		50.0	49.6	ug/L	0.301	0.800	25	
tert-Butylbenzene		50.0	50.6	ug/L	0.580	1.30	25	
Tetrachloroethene		50.0	49.7	ug/L	0.294	0.600	25	
trans-1,2-Dichloroethene		50.0	50.6	ug/L	0.452	1.10	25	
trans-1,3-Dichloropropene		50.0	48.7	ug/L	0.559	2.60	25	
Trichlorofluoromethane		50.0	51.1	ug/L	0.528	2.20	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5534630
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634315-02

Instrument ID: HPMS11 Run Time: 13:10 Method: 8260B

File ID: 11M22401 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG634316 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.3	ug/L	0.479	1.47	20	
1,2-Dichloropropane	CCC	50.0	49.1	ug/L	0.341	1.72	20	
Chloroform	CCC	50.0	46.4	ug/L	0.521	7.10	20	
Ethylbenzene	CCC	50.0	50.1	ug/L	0.557	0.239	20	
Toluene	CCC	50.0	46.2	ug/L	1.50	7.70	20	
Vinyl Chloride	CCC	50.0	51.7	ug/L	0.405	3.39	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.0	ug/L	0.897	1.91	20	
1,1-Dichloroethane	SPCC	50.0	47.8	ug/L	0.586	4.38	20	
Bromoform	SPCC	50.0	46.7	ug/L	0.262	6.57	20	
Chlorobenzene	SPCC	50.0	46.2	ug/L	0.968	7.53	20	
Chloromethane	SPCC	50.0	45.0	ug/L	0.377	9.98	20	
Xylenes		150	151	ug/L	0.646	0.426	20	
1,1,1,2-Tetrachloroethane		50.0	48.9	ug/L	0.388	2.23	20	
1,1,1-Trichloroethane		50.0	48.0	ug/L	0.461	4.03	20	
1,1,2-Trichloroethane		50.0	50.5	ug/L	0.337	0.982	20	
1,1-Dichloropropene		50.0	49.5	ug/L	0.389	0.920	20	
1,2,3-Trichlorobenzene		50.0	52.7	ug/L	1.16	5.32	20	
1,2,3-Trichloropropane		50.0	48.1	ug/L	0.248	3.81	20	
1,2,4-Trichlorobenzene		50.0	55.0	ug/L	1.22	10.0	20	
1,2,4-Trimethylbenzene		50.0	47.9	ug/L	2.92	4.27	20	
1,2-Dichloroethane		50.0	46.4	ug/L	0.435	7.16	20	
1,2-Dichlorobenzene		50.0	49.3	ug/L	1.58	1.34	20	
1,2-Dibromo-3-Chloropropane		50.0	51.2	ug/L	0.181	2.40	20	
1,2-Dibromoethane		50.0	50.6	ug/L	0.330	1.18	20	
1,3,5-Trimethylbenzene		50.0	50.3	ug/L	2.84	0.521	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.62	0.338	20	
1,3-Dichloropropane		50.0	47.7	ug/L	0.593	4.58	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.62	5.35	20	
1,4-Dioxane		200	203	ug/L	0.00280	1.68	20	
1-Chlorohexane		50.0	50.4	ug/L	0.487	0.820	20	
2,2-Dichloropropane		50.0	49.9	ug/L	0.475	0.121	20	
2-Hexanone		50.0	48.2	ug/L	0.298	3.63	20	
2-Chlorotoluene		50.0	47.3	ug/L	2.80	5.33	20	
4-Chlorotoluene		50.0	46.8	ug/L	2.23	6.48	20	
Acetone		50.0	45.0	ug/L	0.0856	9.98	20	
Benzene		50.0	45.2	ug/L	1.09	9.69	20	
Bromobenzene		50.0	48.6	ug/L	0.879	2.86	20	
Bromochloromethane		50.0	49.2	ug/L	0.171	1.56	20	
Bromodichloromethane		50.0	49.8	ug/L	0.405	0.321	20	
Bromomethane		50.0	56.1	ug/L	0.236	12.3	20	
Carbon Disulfide		50.0	43.7	ug/L	0.743	12.6	20	
Carbon Tetrachloride		50.0	48.6	ug/L	0.397	2.81	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634315-02

Instrument ID: HPMS11 Run Time: 13:10 Method: 8260B

File ID: 11M22401 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG634316 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	48.7	ug/L	0.260	2.55	20	
cis-1,2-Dichloroethene		50.0	48.6	ug/L	0.309	2.76	20	
cis-1,3-Dichloropropene		50.0	53.6	ug/L	0.484	7.25	20	
Dibromochloromethane		50.0	50.3	ug/L	0.388	0.619	20	
Dibromomethane		50.0	49.1	ug/L	0.176	1.78	20	
Dichlorodifluoromethane		50.0	51.9	ug/L	0.470	3.81	20	
Hexachlorobutadiene		50.0	52.2	ug/L	0.653	4.50	20	
Isopropylbenzene		50.0	51.2	ug/L	1.59	2.49	20	
Methylene Chloride		50.0	46.8	ug/L	0.304	6.42	20	
Methyl Tert Butyl Ether		50.0	48.8	ug/L	0.789	2.44	20	
2-Butanone		50.0	45.8	ug/L	0.136	8.48	20	
4-Methyl-2-Pentanone		50.0	47.0	ug/L	0.109	5.95	20	
n-Butylbenzene		50.0	53.4	ug/L	3.00	6.83	20	
n-Propylbenzene		50.0	49.0	ug/L	3.95	2.08	20	
m-,p-Xylene		100	98.9	ug/L	0.627	1.09	20	
Naphthalene		50.0	51.2	ug/L	2.48	2.45	20	
o-Xylene		50.0	51.7	ug/L	0.665	3.46	20	
p-Isopropyltoluene		50.0	49.7	ug/L	2.94	0.601	20	
sec-Butylbenzene		50.0	47.5	ug/L	3.50	4.93	20	
Styrene		50.0	48.6	ug/L	1.09	2.83	20	
Trichloroethene		50.0	45.2	ug/L	0.263	9.66	20	
tert-Butylbenzene		50.0	51.1	ug/L	0.628	2.23	20	
Tetrachloroethene		50.0	48.8	ug/L	0.299	2.41	20	
trans-1,2-Dichloroethene		50.0	48.4	ug/L	0.268	3.12	20	
trans-1,3-Dichloropropene		50.0	50.3	ug/L	0.603	0.527	20	
Trichlorofluoromethane		50.0	49.1	ug/L	0.505	1.74	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634399-02

Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B

File ID: 6M150751 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634400 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.2	ug/L	0.521	8.38	20	
1,2-Dichloropropane	CCC	50.0	52.8	ug/L	0.337	5.56	20	
Chloroform	CCC	50.0	50.6	ug/L	0.539	1.24	20	
Ethylbenzene	CCC	50.0	52.3	ug/L	0.556	4.68	20	
Toluene	CCC	50.0	51.8	ug/L	1.54	3.56	20	
Vinyl Chloride	CCC	50.0	55.3	ug/L	0.288	10.6	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.1	ug/L	0.608	5.74	20	
1,1-Dichloroethane	SPCC	50.0	51.4	ug/L	0.596	2.89	20	
Bromoform	SPCC	50.0	49.2	ug/L	0.226	1.54	20	
Chlorobenzene	SPCC	50.0	49.4	ug/L	1.01	1.21	20	
Chloromethane	SPCC	50.0	52.7	ug/L	0.336	5.30	20	
Xylenes		150	157	ug/L	0.667	4.39	20	
1,1,1,2-Tetrachloroethane		50.0	51.7	ug/L	0.392	3.47	20	
1,1,1-Trichloroethane		50.0	53.7	ug/L	0.501	7.49	20	
1,1,2-Trichloroethane		50.0	48.9	ug/L	0.286	2.27	20	
1,1-Dichloropropene		50.0	54.6	ug/L	0.413	9.27	20	
1,2,3-Trichlorobenzene		50.0	47.8	ug/L	0.943	4.35	20	
1,2,3-Trichloropropane		50.0	46.7	ug/L	0.183	6.54	20	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.0804	20	
1,2,4-Trimethylbenzene		50.0	51.8	ug/L	2.75	3.66	20	
1,2-Dichloroethane		50.0	51.5	ug/L	0.418	2.92	20	
1,2-Dichlorobenzene		50.0	48.4	ug/L	1.46	3.13	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.115	5.49	20	
1,2-Dibromoethane		50.0	50.8	ug/L	0.283	1.58	20	
1,3,5-Trimethylbenzene		50.0	55.1	ug/L	2.70	10.2	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.59	0.979	20	
1,3-Dichloropropane		50.0	49.2	ug/L	0.503	1.62	20	
1,4-Dichlorobenzene		50.0	46.9	ug/L	1.58	6.24	20	
1,4-Dioxane		200	183	ug/L	0.00200	8.35	20	
1-Chlorohexane		50.0	53.0	ug/L	0.488	5.98	20	
2,2-Dichloropropane		50.0	52.8	ug/L	0.474	5.61	20	
2-Hexanone		50.0	45.5	ug/L	0.222	9.06	20	
2-Chlorotoluene		50.0	46.2	ug/L	2.26	7.66	20	
4-Chlorotoluene		50.0	58.1	ug/L	2.47	16.3	20	
Acetone		50.0	49.1	ug/L	0.0770	1.75	20	
Benzene		50.0	51.7	ug/L	1.14	3.33	20	
Bromobenzene		50.0	50.6	ug/L	0.816	1.11	20	
Bromochloromethane		50.0	52.7	ug/L	0.181	5.48	20	
Bromodichloromethane		50.0	52.6	ug/L	0.416	5.21	20	
Bromomethane		50.0	50.0	ug/L	0.170	0.0230	20	
Carbon Disulfide		50.0	48.9	ug/L	0.881	2.27	20	
Carbon Tetrachloride		50.0	54.5	ug/L	0.454	9.09	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/17/2017 Sample ID: WG634399-02
Instrument ID: HPMS6 Run Time: 21:09 Method: 8260B
File ID: 6M150751 Analyst: JDS QC Key: AF40
Workgroup (AAB#): WG634400 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	55.9	ug/L	0.249	11.7	20	
cis-1,2-Dichloroethene		50.0	53.8	ug/L	0.317	7.57	20	
cis-1,3-Dichloropropene		50.0	56.3	ug/L	0.480	12.6	20	
Dibromochloromethane		50.0	51.5	ug/L	0.387	3.00	20	
Dibromomethane		50.0	51.9	ug/L	0.153	3.75	20	
Dichlorodifluoromethane		50.0	62.9	ug/L	0.523	25.9	20	*
Hexachlorobutadiene		50.0	50.1	ug/L	0.452	0.172	20	
Isopropylbenzene		50.0	54.2	ug/L	1.72	8.38	20	
Methylene Chloride		50.0	50.0	ug/L	0.297	0.0366	20	
Methyl Tert Butyl Ether		50.0	50.8	ug/L	0.699	1.56	20	
2-Butanone		50.0	46.3	ug/L	0.113	7.38	20	
4-Methyl-2-Pentanone		50.0	46.7	ug/L	0.0900	6.69	20	
n-Butylbenzene		50.0	55.2	ug/L	2.65	10.4	20	
n-Propylbenzene		50.0	54.8	ug/L	3.80	9.57	20	
m-,p-Xylene		100	103	ug/L	0.663	3.26	20	
Naphthalene		50.0	49.5	ug/L	2.08	1.07	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.65	20	
p-Isopropyltoluene		50.0	54.8	ug/L	2.91	9.60	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.22	6.75	20	
Styrene		50.0	55.2	ug/L	1.14	10.3	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.62	20	
tert-Butylbenzene		50.0	53.2	ug/L	0.559	6.30	20	
Tetrachloroethene		50.0	52.0	ug/L	0.409	4.09	20	
trans-1,2-Dichloroethene		50.0	54.2	ug/L	0.291	8.35	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	4.10	20	
Trichlorofluoromethane		50.0	57.1	ug/L	0.551	14.1	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634435-02

Instrument ID: HPMS8 Run Time: 10:19 Method: 8260B

File ID: 8M422233 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634436 Cal ID: HPMS8 - 17-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	56.8	ug/L	0.545	13.7	20	
1,2-Dichloropropane	CCC	50.0	55.7	ug/L	0.408	11.5	20	
Chloroform	CCC	50.0	54.2	ug/L	0.496	8.44	20	
Ethylbenzene	CCC	50.0	50.2	ug/L	0.571	0.489	20	
Toluene	CCC	50.0	49.3	ug/L	1.51	1.48	20	
Vinyl Chloride	CCC	50.0	56.2	ug/L	0.352	12.4	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	42.7	ug/L	0.515	14.5	20	
1,1-Dichloroethane	SPCC	50.0	54.8	ug/L	0.608	9.65	20	
Bromoform	SPCC	50.0	48.4	ug/L	0.216	3.11	20	
Chlorobenzene	SPCC	50.0	48.2	ug/L	0.997	3.66	20	
Chloromethane	SPCC	50.0	56.3	ug/L	0.750	12.6	20	
Xylenes		150	150	ug/L	0.689	0.300	20	
1,1,1,2-Tetrachloroethane		50.0	48.9	ug/L	0.392	2.29	20	
1,1,1-Trichloroethane		50.0	57.7	ug/L	0.534	15.5	20	
1,1,2-Trichloroethane		50.0	45.1	ug/L	0.255	9.74	20	
1,1-Dichloropropene		50.0	55.4	ug/L	0.479	10.7	20	
1,2,3-Trichlorobenzene		50.0	43.8	ug/L	0.867	12.5	20	
1,2,3-Trichloropropane		50.0	41.5	ug/L	0.150	17.0	20	
1,2,4-Trichlorobenzene		50.0	47.0	ug/L	1.01	6.00	20	
1,2,4-Trimethylbenzene		50.0	46.9	ug/L	2.75	6.26	20	
1,2-Dichloroethane		50.0	54.0	ug/L	0.484	7.92	20	
1,2-Dichlorobenzene		50.0	46.4	ug/L	1.33	7.28	20	
1,2-Dibromo-3-Chloropropane		50.0	41.2	ug/L	0.117	17.6	20	
1,2-Dibromoethane		50.0	45.8	ug/L	0.271	8.39	20	
1,3,5-Trimethylbenzene		50.0	47.4	ug/L	2.69	5.26	20	
1,3-Dichlorobenzene		50.0	47.6	ug/L	1.49	4.83	20	
1,3-Dichloropropane		50.0	45.8	ug/L	0.483	8.33	20	
1,4-Dichlorobenzene		50.0	46.8	ug/L	1.47	6.32	20	
1,4-Dioxane		200	213	ug/L	0.00180	6.28	20	
1-Chlorohexane		50.0	50.6	ug/L	0.502	1.13	20	
2,2-Dichloropropane		50.0	66.0	ug/L	0.556	32.1	20	*
2-Hexanone		50.0	43.1	ug/L	0.102	13.7	20	
2-Chlorotoluene		50.0	44.6	ug/L	2.47	10.8	20	
4-Chlorotoluene		50.0	46.7	ug/L	2.27	6.51	20	
Acetone		50.0	39.2	ug/L	0.0623	21.6	20	*
Benzene		50.0	53.4	ug/L	1.25	6.86	20	
Bromobenzene		50.0	46.2	ug/L	0.768	7.55	20	
Bromochloromethane		50.0	54.0	ug/L	0.165	7.97	20	
Bromodichloromethane		50.0	53.2	ug/L	0.444	6.35	20	
Bromomethane		50.0	53.3	ug/L	0.239	6.65	20	
Carbon Disulfide		50.0	55.3	ug/L	0.920	10.6	20	
Carbon Tetrachloride		50.0	58.3	ug/L	0.516	16.7	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634435-02

Instrument ID: HPMS8 Run Time: 10:19 Method: 8260B

File ID: 8M422233 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634436 Cal ID: HPMS8 - 17-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	56.4	ug/L	0.265	12.9	20	
cis-1,2-Dichloroethene		50.0	54.3	ug/L	0.281	8.57	20	
cis-1,3-Dichloropropene		50.0	54.3	ug/L	0.553	8.62	20	
Dibromochloromethane		50.0	50.0	ug/L	0.366	0.00520	20	
Dibromomethane		50.0	52.5	ug/L	0.155	5.07	20	
Dichlorodifluoromethane		50.0	61.5	ug/L	0.521	23.1	20	*
Hexachlorobutadiene		50.0	53.5	ug/L	0.469	6.90	20	
Isopropylbenzene		50.0	49.5	ug/L	1.72	0.918	20	
Methylene Chloride		50.0	52.4	ug/L	0.278	4.75	20	
Methyl Tert Butyl Ether		50.0	50.9	ug/L	0.645	1.80	20	
2-Butanone		50.0	45.9	ug/L	0.112	8.30	20	
4-Methyl-2-Pentanone		50.0	47.3	ug/L	0.0932	5.38	20	
n-Butylbenzene		50.0	48.0	ug/L	2.73	3.92	20	
n-Propylbenzene		50.0	46.7	ug/L	3.74	6.68	20	
m-,p-Xylene		100	100	ug/L	0.688	0.0485	20	
Naphthalene		50.0	41.9	ug/L	1.73	16.1	20	
o-Xylene		50.0	49.5	ug/L	0.691	0.998	20	
p-Isopropyltoluene		50.0	48.8	ug/L	2.81	2.45	20	
sec-Butylbenzene		50.0	48.2	ug/L	3.26	3.69	20	
Styrene		50.0	50.7	ug/L	1.15	1.30	20	
Trichloroethene		50.0	54.1	ug/L	0.328	8.13	20	
tert-Butylbenzene		50.0	48.5	ug/L	0.556	2.97	20	
Tetrachloroethene		50.0	52.3	ug/L	0.309	4.54	20	
trans-1,2-Dichloroethene		50.0	57.3	ug/L	0.512	14.6	20	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.553	3.55	20	
Trichlorofluoromethane		50.0	59.1	ug/L	0.612	18.3	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634454-02
Instrument ID: HPMS11 Run Time: 10:59 Method: 8260B
File ID: 11M22447 Analyst: HRF/TMB QC Key: AF40
Workgroup (AAB#): WG634456 Cal ID: HPMS11 - 12-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.8	ug/L	0.484	0.382	20	
1,2-Dichloropropane	CCC	50.0	49.7	ug/L	0.345	0.637	20	
Chloroform	CCC	50.0	47.7	ug/L	0.535	4.66	20	
Ethylbenzene	CCC	50.0	49.0	ug/L	0.545	1.99	20	
Toluene	CCC	50.0	45.6	ug/L	1.48	8.76	20	
Vinyl Chloride	CCC	50.0	52.7	ug/L	0.413	5.42	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.7	ug/L	0.854	6.62	20	
1,1-Dichloroethane	SPCC	50.0	48.3	ug/L	0.593	3.34	20	
Bromoform	SPCC	50.0	43.7	ug/L	0.245	12.6	20	
Chlorobenzene	SPCC	50.0	45.7	ug/L	0.957	8.62	20	
Chloromethane	SPCC	50.0	46.4	ug/L	0.388	7.28	20	
Xylenes		150	148	ug/L	0.636	1.03	20	
1,1,1,2-Tetrachloroethane		50.0	48.4	ug/L	0.384	3.26	20	
1,1,1-Trichloroethane		50.0	48.7	ug/L	0.467	2.68	20	
1,1,2-Trichloroethane		50.0	48.2	ug/L	0.322	3.52	20	
1,1-Dichloropropene		50.0	51.1	ug/L	0.401	2.20	20	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	1.04	5.16	20	
1,2,3-Trichloropropane		50.0	45.4	ug/L	0.234	9.16	20	
1,2,4-Trichlorobenzene		50.0	51.2	ug/L	1.14	2.34	20	
1,2,4-Trimethylbenzene		50.0	47.0	ug/L	2.86	6.06	20	
1,2-Dichloroethane		50.0	47.4	ug/L	0.445	5.13	20	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.53	4.56	20	
1,2-Dibromo-3-Chloropropane		50.0	46.1	ug/L	0.163	7.75	20	
1,2-Dibromoethane		50.0	48.7	ug/L	0.318	2.51	20	
1,3,5-Trimethylbenzene		50.0	49.4	ug/L	2.78	1.26	20	
1,3-Dichlorobenzene		50.0	49.1	ug/L	1.60	1.89	20	
1,3-Dichloropropane		50.0	46.2	ug/L	0.574	7.57	20	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.58	7.35	20	
1,4-Dioxane		200	164	ug/L	0.00230	18.0	20	
1-Chlorohexane		50.0	51.8	ug/L	0.500	3.65	20	
2,2-Dichloropropane		50.0	50.4	ug/L	0.480	0.883	20	
2-Hexanone		50.0	44.4	ug/L	0.275	11.1	20	
2-Chlorotoluene		50.0	46.9	ug/L	2.78	6.23	20	
4-Chlorotoluene		50.0	46.1	ug/L	2.20	7.79	20	
Acetone		50.0	41.5	ug/L	0.0789	17.0	20	
Benzene		50.0	45.9	ug/L	1.11	8.12	20	
Bromobenzene		50.0	48.0	ug/L	0.869	3.96	20	
Bromochloromethane		50.0	50.5	ug/L	0.175	0.965	20	
Bromodichloromethane		50.0	50.5	ug/L	0.410	1.08	20	
Bromomethane		50.0	56.4	ug/L	0.237	12.8	20	
Carbon Disulfide		50.0	45.9	ug/L	0.782	8.11	20	
Carbon Tetrachloride		50.0	50.1	ug/L	0.409	0.223	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634454-02
Instrument ID: HPMS11 Run Time: 10:59 Method: 8260B
File ID: 11M22447 Analyst: HRF/TMB QC Key: AF40
Workgroup (AAB#): WG634456 Cal ID: HPMS11 - 12-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	49.0	ug/L	0.261	2.00	20	
cis-1,2-Dichloroethene		50.0	48.0	ug/L	0.305	4.04	20	
cis-1,3-Dichloropropene		50.0	53.3	ug/L	0.481	6.55	20	
Dibromochloromethane		50.0	49.0	ug/L	0.378	1.99	20	
Dibromomethane		50.0	48.4	ug/L	0.173	3.11	20	
Dichlorodifluoromethane		50.0	52.3	ug/L	0.474	4.66	20	
Hexachlorobutadiene		50.0	44.5	ug/L	0.555	11.0	20	
Isopropylbenzene		50.0	50.5	ug/L	1.57	1.08	20	
Methylene Chloride		50.0	46.8	ug/L	0.304	6.42	20	
Methyl Tert Butyl Ether		50.0	47.6	ug/L	0.770	4.82	20	
2-Butanone		50.0	44.2	ug/L	0.132	11.6	20	
4-Methyl-2-Pentanone		50.0	44.3	ug/L	0.103	11.3	20	
n-Butylbenzene		50.0	51.8	ug/L	2.91	3.53	20	
n-Propylbenzene		50.0	48.5	ug/L	3.91	3.08	20	
m-,p-Xylene		100	97.7	ug/L	0.619	2.34	20	
Naphthalene		50.0	47.7	ug/L	2.31	4.59	20	
o-Xylene		50.0	50.8	ug/L	0.653	1.61	20	
p-Isopropyltoluene		50.0	48.5	ug/L	2.87	3.04	20	
sec-Butylbenzene		50.0	46.4	ug/L	3.41	7.17	20	
Styrene		50.0	48.0	ug/L	1.07	3.95	20	
Trichloroethene		50.0	46.5	ug/L	0.270	7.07	20	
tert-Butylbenzene		50.0	48.7	ug/L	0.599	2.54	20	
Tetrachloroethene		50.0	48.8	ug/L	0.299	2.49	20	
trans-1,2-Dichloroethene		50.0	48.8	ug/L	0.270	2.35	20	
trans-1,3-Dichloropropene		50.0	49.5	ug/L	0.593	1.10	20	
Trichlorofluoromethane		50.0	50.2	ug/L	0.516	0.439	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634503-02

Instrument ID: HPMS6 Run Time: 12:05 Method: 8260B

File ID: 6M150776 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634505 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.5	ug/L	0.515	6.99	20	
1,2-Dichloropropane	CCC	50.0	52.2	ug/L	0.333	4.39	20	
Chloroform	CCC	50.0	51.2	ug/L	0.545	2.44	20	
Ethylbenzene	CCC	50.0	51.9	ug/L	0.551	3.81	20	
Toluene	CCC	50.0	51.3	ug/L	1.53	2.64	20	
Vinyl Chloride	CCC	50.0	52.2	ug/L	0.272	4.44	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.6	ug/L	0.602	6.78	20	
1,1-Dichloroethane	SPCC	50.0	51.1	ug/L	0.592	2.19	20	
Bromoform	SPCC	50.0	51.6	ug/L	0.237	3.21	20	
Chlorobenzene	SPCC	50.0	49.3	ug/L	1.01	1.47	20	
Chloromethane	SPCC	50.0	51.9	ug/L	0.331	3.71	20	
Xylenes		150	156	ug/L	0.666	4.24	20	
1,1,1,2-Tetrachloroethane		50.0	52.3	ug/L	0.396	4.61	20	
1,1,1-Trichloroethane		50.0	54.6	ug/L	0.509	9.22	20	
1,1,2-Trichloroethane		50.0	49.3	ug/L	0.288	1.47	20	
1,1-Dichloropropene		50.0	54.2	ug/L	0.410	8.42	20	
1,2,3-Trichlorobenzene		50.0	47.8	ug/L	0.942	4.47	20	
1,2,3-Trichloropropane		50.0	46.6	ug/L	0.182	6.83	20	
1,2,4-Trichlorobenzene		50.0	49.7	ug/L	1.05	0.688	20	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.72	2.27	20	
1,2-Dichloroethane		50.0	52.8	ug/L	0.430	5.65	20	
1,2-Dichlorobenzene		50.0	48.0	ug/L	1.45	3.97	20	
1,2-Dibromo-3-Chloropropane		50.0	48.8	ug/L	0.119	2.38	20	
1,2-Dibromoethane		50.0	50.5	ug/L	0.281	1.02	20	
1,3,5-Trimethylbenzene		50.0	53.9	ug/L	2.64	7.73	20	
1,3-Dichlorobenzene		50.0	50.0	ug/L	1.58	0.0946	20	
1,3-Dichloropropane		50.0	49.1	ug/L	0.502	1.74	20	
1,4-Dichlorobenzene		50.0	46.5	ug/L	1.57	7.06	20	
1,4-Dioxane		200	178	ug/L	0.00190	10.9	20	
1-Chlorohexane		50.0	52.2	ug/L	0.481	4.47	20	
2,2-Dichloropropane		50.0	51.9	ug/L	0.466	3.85	20	
2-Hexanone		50.0	46.3	ug/L	0.226	7.35	20	
2-Chlorotoluene		50.0	51.5	ug/L	2.52	3.01	20	
4-Chlorotoluene		50.0	49.6	ug/L	2.10	0.825	20	
Acetone		50.0	51.0	ug/L	0.0800	2.05	20	
Benzene		50.0	51.4	ug/L	1.13	2.72	20	
Bromobenzene		50.0	49.8	ug/L	0.804	0.430	20	
Bromochloromethane		50.0	53.2	ug/L	0.182	6.44	20	
Bromodichloromethane		50.0	53.6	ug/L	0.424	7.14	20	
Bromomethane		50.0	48.2	ug/L	0.164	3.63	20	
Carbon Disulfide		50.0	48.1	ug/L	0.867	3.82	20	
Carbon Tetrachloride		50.0	55.6	ug/L	0.462	11.2	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/18/2017 Sample ID: WG634503-02
Instrument ID: HPMS6 Run Time: 12:05 Method: 8260B
File ID: 6M150776 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG634505 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	54.3	ug/L	0.242	8.63	20	
cis-1,2-Dichloroethene		50.0	53.4	ug/L	0.315	6.82	20	
cis-1,3-Dichloropropene		50.0	56.3	ug/L	0.479	12.5	20	
Dibromochloromethane		50.0	52.4	ug/L	0.393	4.70	20	
Dibromomethane		50.0	52.9	ug/L	0.156	5.83	20	
Dichlorodifluoromethane		50.0	60.7	ug/L	0.504	21.4	20	*
Hexachlorobutadiene		50.0	47.2	ug/L	0.426	5.56	20	
Isopropylbenzene		50.0	54.1	ug/L	1.71	8.15	20	
Methylene Chloride		50.0	49.4	ug/L	0.294	1.23	20	
Methyl Tert Butyl Ether		50.0	50.5	ug/L	0.695	1.08	20	
2-Butanone		50.0	46.0	ug/L	0.112	8.03	20	
4-Methyl-2-Pentanone		50.0	46.9	ug/L	0.0905	6.23	20	
n-Butylbenzene		50.0	52.7	ug/L	2.53	5.45	20	
n-Propylbenzene		50.0	53.2	ug/L	3.68	6.32	20	
m-,p-Xylene		100	103	ug/L	0.662	3.15	20	
Naphthalene		50.0	50.3	ug/L	2.11	0.501	20	
o-Xylene		50.0	53.2	ug/L	0.670	6.42	20	
p-Isopropyltoluene		50.0	53.2	ug/L	2.82	6.31	20	
sec-Butylbenzene		50.0	51.3	ug/L	3.10	2.52	20	
Styrene		50.0	55.1	ug/L	1.14	10.1	20	
Trichloroethene		50.0	52.9	ug/L	0.301	5.84	20	
tert-Butylbenzene		50.0	51.6	ug/L	0.542	3.16	20	
Tetrachloroethene		50.0	51.7	ug/L	0.405	3.30	20	
trans-1,2-Dichloroethene		50.0	53.0	ug/L	0.285	6.01	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	4.01	20	
Trichlorofluoromethane		50.0	57.3	ug/L	0.553	14.6	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634605-02

Instrument ID: HPMS8 Run Time: 09:13 Method: 8260B

File ID: 8M422266 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634606 Cal ID: HPMS8 - 17-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	54.7	ug/L	0.525	9.42	20	
1,2-Dichloropropane	CCC	50.0	49.8	ug/L	0.365	0.320	20	
Chloroform	CCC	50.0	52.2	ug/L	0.477	4.34	20	
Ethylbenzene	CCC	50.0	50.4	ug/L	0.573	0.821	20	
Toluene	CCC	50.0	49.0	ug/L	1.51	1.92	20	
Vinyl Chloride	CCC	50.0	50.2	ug/L	0.314	0.435	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.2	ug/L	0.557	7.62	20	
1,1-Dichloroethane	SPCC	50.0	53.9	ug/L	0.598	7.88	20	
Bromoform	SPCC	50.0	50.8	ug/L	0.227	1.52	20	
Chlorobenzene	SPCC	50.0	48.0	ug/L	0.993	4.07	20	
Chloromethane	SPCC	50.0	47.3	ug/L	0.630	5.42	20	
Xylenes		150	149	ug/L	0.688	0.370	20	
1,1,1,2-Tetrachloroethane		50.0	50.4	ug/L	0.404	0.758	20	
1,1,1-Trichloroethane		50.0	52.8	ug/L	0.489	5.65	20	
1,1,2-Trichloroethane		50.0	46.3	ug/L	0.261	7.40	20	
1,1-Dichloropropene		50.0	48.2	ug/L	0.417	3.59	20	
1,2,3-Trichlorobenzene		50.0	49.0	ug/L	0.971	1.95	20	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.167	7.75	20	
1,2,4-Trichlorobenzene		50.0	51.5	ug/L	1.11	3.04	20	
1,2,4-Trimethylbenzene		50.0	48.9	ug/L	2.88	2.13	20	
1,2-Dichloroethane		50.0	53.2	ug/L	0.477	6.45	20	
1,2-Dichlorobenzene		50.0	49.9	ug/L	1.43	0.159	20	
1,2-Dibromo-3-Chloropropane		50.0	44.9	ug/L	0.127	10.2	20	
1,2-Dibromoethane		50.0	46.6	ug/L	0.276	6.80	20	
1,3,5-Trimethylbenzene		50.0	49.8	ug/L	2.82	0.484	20	
1,3-Dichlorobenzene		50.0	50.6	ug/L	1.59	1.13	20	
1,3-Dichloropropane		50.0	45.7	ug/L	0.482	8.65	20	
1,4-Dichlorobenzene		50.0	50.1	ug/L	1.57	0.125	20	
1,4-Dioxane		200	204	ug/L	0.00180	2.05	20	
1-Chlorohexane		50.0	51.3	ug/L	0.509	2.52	20	
2,2-Dichloropropane		50.0	58.8	ug/L	0.495	17.5	20	
2-Hexanone		50.0	46.8	ug/L	0.111	6.48	20	
2-Chlorotoluene		50.0	47.6	ug/L	2.64	4.75	20	
4-Chlorotoluene		50.0	46.7	ug/L	2.26	6.65	20	
Acetone		50.0	40.4	ug/L	0.0643	19.1	20	
Benzene		50.0	47.4	ug/L	1.11	5.26	20	
Bromobenzene		50.0	50.0	ug/L	0.831	0.0618	20	
Bromochloromethane		50.0	52.6	ug/L	0.160	5.25	20	
Bromodichloromethane		50.0	48.4	ug/L	0.403	3.27	20	
Bromomethane		50.0	47.1	ug/L	0.210	5.76	20	
Carbon Disulfide		50.0	49.5	ug/L	0.824	0.989	20	
Carbon Tetrachloride		50.0	53.3	ug/L	0.472	6.63	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634605-02
Instrument ID: HPMS8 Run Time: 09:13 Method: 8260B
File ID: 8M422266 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG634606 Cal ID: HPMS8 - 17-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	51.1	ug/L	0.239	2.12	20	
cis-1,2-Dichloroethene		50.0	53.8	ug/L	0.279	7.59	20	
cis-1,3-Dichloropropene		50.0	49.0	ug/L	0.499	1.94	20	
Dibromochloromethane		50.0	51.4	ug/L	0.377	2.88	20	
Dibromomethane		50.0	51.3	ug/L	0.151	2.59	20	
Dichlorodifluoromethane		50.0	53.6	ug/L	0.454	7.12	20	
Hexachlorobutadiene		50.0	60.2	ug/L	0.528	20.4	20	*
Isopropylbenzene		50.0	49.8	ug/L	1.73	0.351	20	
Methylene Chloride		50.0	48.5	ug/L	0.258	2.94	20	
Methyl Tert Butyl Ether		50.0	50.9	ug/L	0.645	1.74	20	
2-Butanone		50.0	47.1	ug/L	0.116	5.74	20	
4-Methyl-2-Pentanone		50.0	46.9	ug/L	0.0925	6.19	20	
n-Butylbenzene		50.0	50.4	ug/L	2.86	0.805	20	
n-Propylbenzene		50.0	48.6	ug/L	3.90	2.78	20	
m-,p-Xylene		100	100	ug/L	0.689	0.138	20	
Naphthalene		50.0	47.3	ug/L	1.96	5.46	20	
o-Xylene		50.0	49.3	ug/L	0.688	1.39	20	
p-Isopropyltoluene		50.0	52.2	ug/L	3.01	4.34	20	
sec-Butylbenzene		50.0	51.1	ug/L	3.45	2.18	20	
Styrene		50.0	51.0	ug/L	1.16	1.97	20	
Trichloroethene		50.0	48.9	ug/L	0.297	2.26	20	
tert-Butylbenzene		50.0	52.7	ug/L	0.603	5.37	20	
Tetrachloroethene		50.0	52.6	ug/L	0.311	5.14	20	
trans-1,2-Dichloroethene		50.0	56.4	ug/L	0.504	12.8	20	
trans-1,3-Dichloropropene		50.0	48.0	ug/L	0.551	3.92	20	
Trichlorofluoromethane		50.0	52.1	ug/L	0.538	4.11	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634644-02

Instrument ID: HPMS11 Run Time: 14:47 Method: 8260B

File ID: 11M22492 Analyst: HRF/TMB QC Key: AF40

Workgroup (AAB#): WG634645 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.4	ug/L	0.500	2.80	20	
1,2-Dichloropropane	CCC	50.0	51.2	ug/L	0.355	2.39	20	
Chloroform	CCC	50.0	48.4	ug/L	0.543	3.25	20	
Ethylbenzene	CCC	50.0	51.2	ug/L	0.570	2.45	20	
Toluene	CCC	50.0	47.1	ug/L	1.53	5.75	20	
Vinyl Chloride	CCC	50.0	53.7	ug/L	0.421	7.46	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.3	ug/L	0.902	1.36	20	
1,1-Dichloroethane	SPCC	50.0	49.6	ug/L	0.608	0.839	20	
Bromoform	SPCC	50.0	48.6	ug/L	0.273	2.88	20	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.989	5.50	20	
Chloromethane	SPCC	50.0	46.2	ug/L	0.387	7.59	20	
Xylenes		150	154	ug/L	0.660	2.63	20	
1,1,1,2-Tetrachloroethane		50.0	50.2	ug/L	0.399	0.473	20	
1,1,1-Trichloroethane		50.0	51.8	ug/L	0.497	3.55	20	
1,1,2-Trichloroethane		50.0	50.9	ug/L	0.339	1.75	20	
1,1-Dichloropropene		50.0	59.1	ug/L	0.464	18.2	20	
1,2,3-Trichlorobenzene		50.0	52.0	ug/L	1.14	3.95	20	
1,2,3-Trichloropropane		50.0	49.1	ug/L	0.253	1.71	20	
1,2,4-Trichlorobenzene		50.0	55.5	ug/L	1.23	10.9	20	
1,2,4-Trimethylbenzene		50.0	47.5	ug/L	2.89	5.09	20	
1,2-Dichloroethane		50.0	50.3	ug/L	0.472	0.658	20	
1,2-Dichlorobenzene		50.0	48.9	ug/L	1.57	2.21	20	
1,2-Dibromo-3-Chloropropane		50.0	53.2	ug/L	0.188	6.45	20	
1,2-Dibromoethane		50.0	52.2	ug/L	0.341	4.40	20	
1,3,5-Trimethylbenzene		50.0	50.1	ug/L	2.83	0.169	20	
1,3-Dichlorobenzene		50.0	49.3	ug/L	1.61	1.30	20	
1,3-Dichloropropane		50.0	49.1	ug/L	0.611	1.71	20	
1,4-Dichlorobenzene		50.0	46.9	ug/L	1.60	6.17	20	
1,4-Dioxane		200	192	ug/L	0.00270	3.77	20	
1-Chlorohexane		50.0	53.5	ug/L	0.516	6.91	20	
2,2-Dichloropropane		50.0	77.5	ug/L	0.738	55.1	20	*
2-Hexanone		50.0	48.8	ug/L	0.302	2.43	20	
2-Chlorotoluene		50.0	44.9	ug/L	2.66	10.2	20	
4-Chlorotoluene		50.0	49.4	ug/L	2.35	1.25	20	
Acetone		50.0	45.6	ug/L	0.0867	8.76	20	
Benzene		50.0	53.7	ug/L	1.30	7.30	20	
Bromobenzene		50.0	48.3	ug/L	0.875	3.34	20	
Bromochloromethane		50.0	51.4	ug/L	0.178	2.79	20	
Bromodichloromethane		50.0	52.9	ug/L	0.430	5.89	20	
Bromomethane		50.0	57.1	ug/L	0.240	14.2	20	
Carbon Disulfide		50.0	47.0	ug/L	0.799	6.08	20	
Carbon Tetrachloride		50.0	51.4	ug/L	0.420	2.85	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634644-02
Instrument ID: HPMS11 Run Time: 14:47 Method: 8260B
File ID: 11M22492 Analyst: HRF/TMB QC Key: AF40
Workgroup (AAB#): WG634645 Cal ID: HPMS11 - 12-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	50.4	ug/L	0.268	0.759	20	
cis-1,2-Dichloroethene		50.0	49.3	ug/L	0.313	1.47	20	
cis-1,3-Dichloropropene		50.0	55.6	ug/L	0.502	11.2	20	
Dibromochloromethane		50.0	52.2	ug/L	0.402	4.30	20	
Dibromomethane		50.0	53.9	ug/L	0.193	7.81	20	
Dichlorodifluoromethane		50.0	52.9	ug/L	0.479	5.81	20	
Hexachlorobutadiene		50.0	52.2	ug/L	0.652	4.46	20	
Isopropylbenzene		50.0	52.4	ug/L	1.63	4.90	20	
Methylene Chloride		50.0	47.8	ug/L	0.311	4.32	20	
Methyl Tert Butyl Ether		50.0	50.4	ug/L	0.815	0.740	20	
2-Butanone		50.0	48.2	ug/L	0.144	3.61	20	
4-Methyl-2-Pentanone		50.0	48.6	ug/L	0.113	2.73	20	
n-Butylbenzene		50.0	56.3	ug/L	3.17	12.7	20	
n-Propylbenzene		50.0	49.0	ug/L	3.95	1.95	20	
m-,p-Xylene		100	101	ug/L	0.641	1.10	20	
Naphthalene		50.0	52.0	ug/L	2.51	3.98	20	
o-Xylene		50.0	52.8	ug/L	0.680	5.70	20	
p-Isopropyltoluene		50.0	49.8	ug/L	2.94	0.496	20	
sec-Butylbenzene		50.0	47.3	ug/L	3.48	5.34	20	
Styrene		50.0	50.0	ug/L	1.12	0.0664	20	
Trichloroethene		50.0	47.6	ug/L	0.277	4.72	20	
tert-Butylbenzene		50.0	49.9	ug/L	0.613	0.251	20	
Tetrachloroethene		50.0	50.5	ug/L	0.310	1.02	20	
trans-1,2-Dichloroethene		50.0	50.8	ug/L	0.281	1.59	20	
trans-1,3-Dichloropropene		50.0	52.7	ug/L	0.633	5.48	20	
Trichlorofluoromethane		50.0	51.5	ug/L	0.530	3.07	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634774-02

Instrument ID: HPMS6 Run Time: 19:00 Method: 8260B

File ID: 6M150828 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG634775 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.0	ug/L	0.510	6.09	20	
1,2-Dichloropropane	CCC	50.0	51.5	ug/L	0.329	3.07	20	
Chloroform	CCC	50.0	50.7	ug/L	0.540	1.43	20	
Ethylbenzene	CCC	50.0	51.9	ug/L	0.551	3.84	20	
Toluene	CCC	50.0	50.8	ug/L	1.51	1.51	20	
Vinyl Chloride	CCC	50.0	55.8	ug/L	0.290	11.5	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.2	ug/L	0.636	1.53	20	
1,1-Dichloroethane	SPCC	50.0	50.4	ug/L	0.585	0.863	20	
Bromoform	SPCC	50.0	54.6	ug/L	0.251	9.11	20	
Chlorobenzene	SPCC	50.0	49.2	ug/L	1.00	1.66	20	
Chloromethane	SPCC	50.0	53.1	ug/L	0.339	6.20	20	
Xylenes		150	155	ug/L	0.661	3.51	20	
1,1,1,2-Tetrachloroethane		50.0	53.6	ug/L	0.406	7.14	20	
1,1,1-Trichloroethane		50.0	54.3	ug/L	0.506	8.64	20	
1,1,2-Trichloroethane		50.0	50.7	ug/L	0.297	1.35	20	
1,1-Dichloropropene		50.0	52.9	ug/L	0.400	5.78	20	
1,2,3-Trichlorobenzene		50.0	48.4	ug/L	0.955	3.21	20	
1,2,3-Trichloropropane		50.0	49.5	ug/L	0.193	1.10	20	
1,2,4-Trichlorobenzene		50.0	50.6	ug/L	1.07	1.18	20	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.25	20	
1,2-Dichloroethane		50.0	54.3	ug/L	0.441	8.55	20	
1,2-Dichlorobenzene		50.0	48.8	ug/L	1.47	2.46	20	
1,2-Dibromo-3-Chloropropane		50.0	52.5	ug/L	0.128	5.08	20	
1,2-Dibromoethane		50.0	52.3	ug/L	0.291	4.54	20	
1,3,5-Trimethylbenzene		50.0	53.7	ug/L	2.63	7.49	20	
1,3-Dichlorobenzene		50.0	50.2	ug/L	1.58	0.301	20	
1,3-Dichloropropane		50.0	50.5	ug/L	0.516	1.02	20	
1,4-Dichlorobenzene		50.0	47.1	ug/L	1.59	5.71	20	
1,4-Dioxane		200	191	ug/L	0.00200	4.28	20	
1-Chlorohexane		50.0	52.4	ug/L	0.482	4.71	20	
2,2-Dichloropropane		50.0	52.5	ug/L	0.472	5.04	20	
2-Hexanone		50.0	50.3	ug/L	0.246	0.519	20	
2-Chlorotoluene		50.0	45.7	ug/L	2.24	8.67	20	
4-Chlorotoluene		50.0	56.7	ug/L	2.41	13.4	20	
Acetone		50.0	53.8	ug/L	0.0843	7.61	20	
Benzene		50.0	49.7	ug/L	1.10	0.503	20	
Bromobenzene		50.0	50.3	ug/L	0.812	0.617	20	
Bromochloromethane		50.0	52.5	ug/L	0.180	4.92	20	
Bromodichloromethane		50.0	53.6	ug/L	0.424	7.17	20	
Bromomethane		50.0	40.0	ug/L	0.136	19.9	20	
Carbon Disulfide		50.0	47.2	ug/L	0.850	5.65	20	
Carbon Tetrachloride		50.0	55.6	ug/L	0.463	11.3	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/19/2017 Sample ID: WG634774-02
Instrument ID: HPMS6 Run Time: 19:00 Method: 8260B
File ID: 6M150828 Analyst: JDS QC Key: AF40
Workgroup (AAB#): WG634775 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	53.6	ug/L	0.240	7.30	20	
cis-1,2-Dichloroethene		50.0	52.5	ug/L	0.309	4.99	20	
cis-1,3-Dichloropropene		50.0	55.8	ug/L	0.475	11.6	20	
Dibromochloromethane		50.0	54.1	ug/L	0.407	8.26	20	
Dibromomethane		50.0	53.3	ug/L	0.158	6.69	20	
Dichlorodifluoromethane		50.0	63.4	ug/L	0.527	26.8	20	*
Hexachlorobutadiene		50.0	47.9	ug/L	0.433	4.22	20	
Isopropylbenzene		50.0	54.1	ug/L	1.71	8.25	20	
Methylene Chloride		50.0	48.1	ug/L	0.286	3.79	20	
Methyl Tert Butyl Ether		50.0	52.6	ug/L	0.723	5.11	20	
2-Butanone		50.0	50.1	ug/L	0.122	0.157	20	
4-Methyl-2-Pentanone		50.0	48.9	ug/L	0.0944	2.13	20	
n-Butylbenzene		50.0	53.2	ug/L	2.55	6.39	20	
n-Propylbenzene		50.0	53.4	ug/L	3.70	6.73	20	
m-,p-Xylene		100	103	ug/L	0.658	2.51	20	
Naphthalene		50.0	51.6	ug/L	2.17	3.21	20	
o-Xylene		50.0	52.8	ug/L	0.664	5.53	20	
p-Isopropyltoluene		50.0	53.7	ug/L	2.85	7.35	20	
sec-Butylbenzene		50.0	51.8	ug/L	3.13	3.65	20	
Styrene		50.0	55.1	ug/L	1.14	10.1	20	
Trichloroethene		50.0	51.3	ug/L	0.292	2.58	20	
tert-Butylbenzene		50.0	51.8	ug/L	0.544	3.61	20	
Tetrachloroethene		50.0	51.3	ug/L	0.402	2.51	20	
trans-1,2-Dichloroethene		50.0	52.2	ug/L	0.281	4.39	20	
trans-1,3-Dichloropropene		50.0	54.3	ug/L	0.568	8.59	20	
Trichlorofluoromethane		50.0	58.0	ug/L	0.560	16.0	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/20/2017 Sample ID: WG634866-02

Instrument ID: HPMS6 Run Time: 11:42 Method: 8260B

File ID: 6M150854 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634867 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.4	ug/L	0.504	4.71	20	
1,2-Dichloropropane	CCC	50.0	52.0	ug/L	0.332	3.94	20	
Chloroform	CCC	50.0	51.9	ug/L	0.552	3.72	20	
Ethylbenzene	CCC	50.0	51.7	ug/L	0.549	3.34	20	
Toluene	CCC	50.0	51.2	ug/L	1.53	2.35	20	
Vinyl Chloride	CCC	50.0	52.7	ug/L	0.275	5.42	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.6	ug/L	0.601	6.88	20	
1,1-Dichloroethane	SPCC	50.0	51.0	ug/L	0.592	2.09	20	
Bromoform	SPCC	50.0	53.1	ug/L	0.244	6.12	20	
Chlorobenzene	SPCC	50.0	50.1	ug/L	1.02	0.140	20	
Chloromethane	SPCC	50.0	49.0	ug/L	0.313	2.04	20	
Xylenes		150	157	ug/L	0.670	4.95	20	
1,1,1,2-Tetrachloroethane		50.0	54.2	ug/L	0.411	8.42	20	
1,1,1-Trichloroethane		50.0	55.3	ug/L	0.515	10.5	20	
1,1,2-Trichloroethane		50.0	49.7	ug/L	0.291	0.636	20	
1,1-Dichloropropene		50.0	53.2	ug/L	0.402	6.31	20	
1,2,3-Trichlorobenzene		50.0	48.8	ug/L	0.962	2.43	20	
1,2,3-Trichloropropane		50.0	47.6	ug/L	0.186	4.80	20	
1,2,4-Trichlorobenzene		50.0	51.1	ug/L	1.08	2.22	20	
1,2,4-Trimethylbenzene		50.0	52.1	ug/L	2.76	4.11	20	
1,2-Dichloroethane		50.0	55.0	ug/L	0.447	9.96	20	
1,2-Dichlorobenzene		50.0	49.4	ug/L	1.49	1.25	20	
1,2-Dibromo-3-Chloropropane		50.0	49.6	ug/L	0.121	0.759	20	
1,2-Dibromoethane		50.0	51.2	ug/L	0.285	2.32	20	
1,3,5-Trimethylbenzene		50.0	54.5	ug/L	2.67	8.96	20	
1,3-Dichlorobenzene		50.0	51.1	ug/L	1.61	2.11	20	
1,3-Dichloropropane		50.0	48.9	ug/L	0.500	2.18	20	
1,4-Dichlorobenzene		50.0	47.9	ug/L	1.61	4.26	20	
1,4-Dioxane		200	178	ug/L	0.00190	10.8	20	
1-Chlorohexane		50.0	51.1	ug/L	0.471	2.19	20	
2,2-Dichloropropane		50.0	51.7	ug/L	0.465	3.45	20	
2-Hexanone		50.0	46.6	ug/L	0.228	6.70	20	
2-Chlorotoluene		50.0	47.2	ug/L	2.31	5.51	20	
4-Chlorotoluene		50.0	56.1	ug/L	2.38	12.3	20	
Acetone		50.0	50.6	ug/L	0.0793	1.23	20	
Benzene		50.0	50.7	ug/L	1.12	1.34	20	
Bromobenzene		50.0	50.9	ug/L	0.821	1.76	20	
Bromochloromethane		50.0	53.0	ug/L	0.182	6.10	20	
Bromodichloromethane		50.0	54.6	ug/L	0.432	9.29	20	
Bromomethane		50.0	46.3	ug/L	0.157	7.40	20	
Carbon Disulfide		50.0	46.1	ug/L	0.830	7.88	20	
Carbon Tetrachloride		50.0	56.5	ug/L	0.470	13.0	20	

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100637 Run Date: 10/20/2017 Sample ID: WG634866-02

Instrument ID: HPMS6 Run Time: 11:42 Method: 8260B

File ID: 6M150854 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634867 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	51.9	ug/L	0.232	3.75	20	
cis-1,2-Dichloroethene		50.0	53.2	ug/L	0.313	6.40	20	
cis-1,3-Dichloropropene		50.0	56.2	ug/L	0.479	12.4	20	
Dibromochloromethane		50.0	54.1	ug/L	0.406	8.19	20	
Dibromomethane		50.0	53.1	ug/L	0.157	6.25	20	
Dichlorodifluoromethane		50.0	58.0	ug/L	0.482	16.0	20	
Hexachlorobutadiene		50.0	48.0	ug/L	0.433	4.10	20	
Isopropylbenzene		50.0	54.3	ug/L	1.72	8.64	20	
Methylene Chloride		50.0	48.8	ug/L	0.290	2.36	20	
Methyl Tert Butyl Ether		50.0	50.3	ug/L	0.692	0.522	20	
2-Butanone		50.0	46.1	ug/L	0.112	7.84	20	
4-Methyl-2-Pentanone		50.0	46.1	ug/L	0.0890	7.72	20	
n-Butylbenzene		50.0	53.6	ug/L	2.58	7.28	20	
n-Propylbenzene		50.0	53.5	ug/L	3.71	6.99	20	
m-,p-Xylene		100	104	ug/L	0.668	4.08	20	
Naphthalene		50.0	50.7	ug/L	2.13	1.50	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.70	20	
p-Isopropyltoluene		50.0	54.4	ug/L	2.89	8.81	20	
sec-Butylbenzene		50.0	52.0	ug/L	3.14	3.97	20	
Styrene		50.0	55.5	ug/L	1.15	11.0	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.66	20	
tert-Butylbenzene		50.0	53.1	ug/L	0.558	6.11	20	
Tetrachloroethene		50.0	51.5	ug/L	0.404	2.94	20	
trans-1,2-Dichloroethene		50.0	52.2	ug/L	0.281	4.40	20	
trans-1,3-Dichloropropene		50.0	52.9	ug/L	0.553	5.86	20	
Trichlorofluoromethane		50.0	56.2	ug/L	0.542	12.4	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Report generated 10/23/2017 17:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634316

ICAL CCV Number: WG619415-07
CAL ID: HPMS11-27-JUN-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG619415-07	NA	NA	170545	337493	473393
Upper Limit	NA	NA	341090	674986	946786
Lower Limit	NA	NA	85273	168747	236697
L17100637-01	1.00	01	97269	219425	311722
L17100637-02	1.00	01	99511	220070	313391
L17100637-03	1.00	01	104208	231175	333254
WG634316-01	1.00	01	111685	246254	352785
WG634316-02	1.00	01	124374	253081	355623

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634400

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100637-06	1.00	01	257274	473602	631925
WG634400-01	1.00	01	280850	519580	704819
WG634400-02	1.00	01	302413	547289	723965
WG634400-03	1.00	01	311370	557303	730931

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS8
Workgroup (AAB#): WG634436

ICAL CCV Number: WG634047-08
CAL ID: HPMS8-17-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634047-08	NA	NA	276675	526721	663331
Upper Limit	NA	NA	553350	1053442	1326662
Lower Limit	NA	NA	138338	263361	331666
L17100637-27	1.00	01	256910	474813	564495
L17100637-36	1.00	01	249051	467477	558635
L17100637-37	1.00	01	247407	469140	558429
L17100637-39	1.00	01	250352	462164	550270
L17100637-40	1.00	01	248460	471763	557760
WG634436-01	1.00	01	279433	509186	593217
WG634436-02	1.00	01	290498	526405	613685
WG634436-03	1.00	01	283344	495479	565999

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634456

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	134803	271293	383066
Upper Limit	NA	NA	269606	542586	766132
Lower Limit	NA	NA	67402	135647	191533
L17100637-04	1.00	01	99340	223378	318761
L17100637-05	1.00	01	104666	227639	327331
L17100637-07	1.00	01	103014	224689	319893
L17100637-08	1.00	01	99035	223912	318758
L17100637-09	1.00	01	96418	214223	304173
L17100637-10	1.00	01	96393	221785	309454
L17100637-11	1.00	01	99792	222115	315156
L17100637-12	1.00	01	102118	231982	332381
L17100637-13	1.00	01	114554	229830	326683
L17100637-14	1.00	01	112013	229241	324374
L17100637-15	1.00	01	100554	226659	319334
L17100637-16	1.00	01	99300	218180	311287
L17100637-17	1.00	01	95440	213799	303999
L17100637-18	1.00	01	98815	220751	316990
L17100637-19	1.00	01	98425	218854	316022
L17100637-20	1.00	01	100754	225139	323026
L17100637-21	1.00	01	98235	213703	306649
WG634456-01	1.00	01	109912	240503	347185
WG634456-02	1.00	01	116915	239821	341857

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634505

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100637-45	1.00	01	250498	459842	604498
L17100637-46	1.00	01	256822	468218	616041
L17100637-47	1.00	01	256602	471540	621150
WG634505-01	1.00	01	261889	477090	629467
WG634505-02	1.00	01	278381	495027	642218
WG634505-03	1.00	01	282269	500621	639444

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17100637
Instrument ID:HPMS8
Workgroup (AAB#):WG634606

ICAL CCV Number:WG634047-08
CAL ID: HPMS8-17-OCT-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634047-08	NA	NA	276675	526721	663331
Upper Limit	NA	NA	553350	1053442	1326662
Lower Limit	NA	NA	138338	263361	331666
L17100637-26	1.00	01	327468	604511	790606
L17100637-28	1.00	01	328226	603380	779304
L17100637-29	1.00	01	321451	603773	786754
L17100637-30	1.00	01	321586	598076	776415
L17100637-31	1.00	01	320463	591383	769568
L17100637-32	1.00	01	320077	590694	766872
L17100637-34	1.00	01	315425	594198	780317
WG634606-01	1.00	01	339662	631516	819816
WG634606-02	1.00	01	351583	636455	825833
WG634606-03	1.00	01	350434	643222	833663

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634645

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	134803	271293	383066
Upper Limit	NA	NA	269606	542586	766132
Lower Limit	NA	NA	67402	135647	191533
L17100637-48	1.00	01	120840	252335	353583
L17100637-49	1.00	01	119103	247099	345357
L17100637-50	1.00	01	116573	247119	349767
L17100637-51	1.00	01	115654	244238	345140
L17100637-52	1.00	01	117406	246462	346236
L17100637-53	1.00	01	120889	252705	360737
L17100637-55	1.00	01	120994	245730	345191
L17100637-56	1.00	01	113669	238324	336291
L17100637-57	1.00	01	114694	236649	339351
L17100637-58	1.00	01	120010	246065	339744
L17100637-59	1.00	01	118945	239722	337627
L17100637-60	1.00	01	116594	244148	340670
L17100637-61	1.00	01	124232	258741	360385
L17100637-62	1.00	01	128417	260276	354603
L17100637-63	1.00	01	131023	261779	358488
L17100637-64	5.00	DL01	115540	242779	337299
L17100637-65	1.00	01	121642	252817	358933
WG634645-01	1.00	01	121213	265135	377481
WG634645-02	1.00	01	135187	266014	366238

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634775

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100637-22	1.00	01	240953	445733	596751
L17100637-23	1.00	01	243427	444816	598637
L17100637-24	1.00	01	248090	456659	618579
L17100637-33	1.00	02	238123	435662	590490
L17100637-35	1.00	01	249052	455408	609849
L17100637-38	1.00	01	246890	451156	606312
L17100637-41	1.00	01	238684	442608	598305
L17100637-42	1.00	01	245252	453544	610516
L17100637-43	1.00	01	241382	443281	599288
L17100637-44	1.00	01	242977	447633	607426
L17100637-54	1.00	01	240392	441460	596225
WG634775-01	1.00	01	262595	482459	653561
WG634775-02	1.00	01	287917	499078	660073
WG634775-03	1.00	01	287447	514305	681938

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634867

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100637-25	1.00	01	246656	445053	598909
WG634867-01	1.00	01	250659	457928	619366
WG634867-02	1.00	01	280566	486081	637198

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634316

ICAL CCV Number: WG619415-07
CAL ID: HPMS11-27-JUN-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG619415-07	NA	NA	16.9	14.08	10.45
Upper Limit	NA	NA	17.4	14.58	10.95
Lower Limit	NA	NA	16.4	13.58	9.95
L17100637-01	1.00	01	16.92	14.1	10.46
L17100637-02	1.00	01	16.92	14.1	10.47
L17100637-03	1.00	01	16.92	14.1	10.46
WG634316-01	1.00	01	16.92	14.1	10.47
WG634316-02	1.00	01	16.92	14.1	10.46

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634400

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100637-06	1.00	01	18.12	15.1	11.22
WG634400-01	1.00	01	18.12	15.09	11.22
WG634400-02	1.00	01	18.12	15.1	11.22
WG634400-03	1.00	01	18.12	15.1	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634505

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100637-45	1.00	01	18.12	15.09	11.22
L17100637-46	1.00	01	18.13	15.1	11.22
L17100637-47	1.00	01	18.12	15.09	11.22
WG634505-01	1.00	01	18.12	15.09	11.22
WG634505-02	1.00	01	18.12	15.09	11.22
WG634505-03	1.00	01	18.12	15.09	11.21

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634775

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100637-22	1.00	01	18.12	15.09	11.22
L17100637-23	1.00	01	18.12	15.1	11.22
L17100637-24	1.00	01	18.12	15.1	11.22
L17100637-33	1.00	02	18.12	15.09	11.22
L17100637-35	1.00	01	18.12	15.09	11.22
L17100637-38	1.00	01	18.12	15.09	11.21
L17100637-41	1.00	01	18.12	15.09	11.22
L17100637-42	1.00	01	18.12	15.09	11.22
L17100637-43	1.00	01	18.12	15.09	11.22
L17100637-44	1.00	01	18.12	15.1	11.22
L17100637-54	1.00	01	18.12	15.09	11.22
WG634775-01	1.00	01	18.12	15.1	11.22
WG634775-02	1.00	01	18.12	15.09	11.22
WG634775-03	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS6
Workgroup (AAB#): WG634867

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100637-25	1.00	01	18.12	15.09	11.21
WG634867-01	1.00	01	18.12	15.09	11.22
WG634867-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634456

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100637-04	1.00	01	16.92	14.1	10.46
L17100637-05	1.00	01	16.92	14.1	10.47
L17100637-07	1.00	01	16.92	14.1	10.46
L17100637-08	1.00	01	16.92	14.1	10.46
L17100637-09	1.00	01	16.92	14.1	10.46
L17100637-10	1.00	01	16.92	14.1	10.46
L17100637-11	1.00	01	16.92	14.1	10.47
L17100637-12	1.00	01	16.92	14.1	10.47
L17100637-13	1.00	01	16.92	14.1	10.46
L17100637-14	1.00	01	16.92	14.1	10.46
L17100637-15	1.00	01	16.92	14.1	10.46
L17100637-16	1.00	01	16.92	14.1	10.46
L17100637-17	1.00	01	16.92	14.1	10.46
L17100637-18	1.00	01	16.92	14.1	10.46
L17100637-19	1.00	01	16.92	14.1	10.46
L17100637-20	1.00	01	16.92	14.1	10.46
L17100637-21	1.00	01	16.92	14.1	10.46
WG634456-01	1.00	01	16.92	14.1	10.46
WG634456-02	1.00	01	16.91	14.09	10.46

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5536301
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS11
Workgroup (AAB#): WG634645

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100637-48	1.00	01	16.92	14.1	10.47
L17100637-49	1.00	01	16.92	14.1	10.46
L17100637-50	1.00	01	16.92	14.1	10.46
L17100637-51	1.00	01	16.92	14.1	10.46
L17100637-52	1.00	01	16.92	14.1	10.47
L17100637-53	1.00	01	16.92	14.1	10.47
L17100637-55	1.00	01	16.92	14.1	10.47
L17100637-56	1.00	01	16.92	14.1	10.47
L17100637-57	1.00	01	16.92	14.1	10.46
L17100637-58	1.00	01	16.92	14.1	10.46
L17100637-59	1.00	01	16.92	14.1	10.46
L17100637-60	1.00	01	16.92	14.1	10.46
L17100637-61	1.00	01	16.92	14.1	10.47
L17100637-62	1.00	01	16.92	14.1	10.47
L17100637-63	1.00	01	16.92	14.1	10.46
L17100637-64	5.00	DL01	16.92	14.1	10.47
L17100637-65	1.00	01	16.92	14.1	10.47
WG634645-01	1.00	01	16.92	14.1	10.46
WG634645-02	1.00	01	16.92	14.1	10.47

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5536301
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS8
Workgroup (AAB#): WG634436

ICAL CCV Number: WG634047-08
CAL ID: HPMS8-17-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634047-08	NA	NA	17.74	14.72	10.85
Upper Limit	NA	NA	18.24	15.22	11.35
Lower Limit	NA	NA	17.24	14.22	10.35
L17100637-27	1.00	01	17.74	14.72	10.85
L17100637-36	1.00	01	17.73	14.72	10.85
L17100637-37	1.00	01	17.73	14.72	10.85
L17100637-39	1.00	01	17.73	14.72	10.85
L17100637-40	1.00	01	17.74	14.71	10.85
WG634436-01	1.00	01	17.74	14.71	10.84
WG634436-02	1.00	01	17.74	14.72	10.85
WG634436-03	1.00	01	17.74	14.72	10.85

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5536301
Report generated: 10/23/2017 17:20

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100637
Instrument ID: HPMS8
Workgroup (AAB#): WG634606

ICAL CCV Number: WG634047-08
CAL ID: HPMS8-17-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634047-08	NA	NA	17.74	14.72	10.85
Upper Limit	NA	NA	18.24	15.22	11.35
Lower Limit	NA	NA	17.24	14.22	10.35
L17100637-26	1.00	01	17.73	14.72	10.85
L17100637-28	1.00	01	17.74	14.71	10.84
L17100637-29	1.00	01	17.73	14.71	10.85
L17100637-30	1.00	01	17.74	14.71	10.84
L17100637-31	1.00	01	17.74	14.71	10.84
L17100637-32	1.00	01	17.73	14.72	10.85
L17100637-34	1.00	01	17.73	14.72	10.85
WG634606-01	1.00	01	17.73	14.72	10.85
WG634606-02	1.00	01	17.73	14.71	10.84
WG634606-03	1.00	01	17.74	14.72	10.85

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5536301
Report generated: 10/23/2017 17:20

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 24, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 24, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

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COC No. A 47722

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz | Contact Phone #: 720-633-2380

Turn Around Requirements: | Location:

Project ID:

Sampler (print): Taylor Redmond | Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
LTM-RBI-LA-26		X	10/9/17	1649	GW	3		3		
MW-204B-LA-26		X	10/7/17	1108	GW	3		3		
MW-205A-LA-26		X	10/7/17	0953	GW	3		3		
MW-205B-LA-26		X	10/7/17	1003	GW	3		3		
MW-203A-LA-26		X	10/7/17	0900	GW	3		3		
MW-210B-LA-26		X	10/7/17	0934	GW	3		3		
MW-197B-LA-26		X	10/7/17	1022	GW	3		3		
MW-210A-LA-26		X	10/7/17	0919	GW	3		3		
PMW21-05-LA-26		X	10/7/17	0831	GW	3		3		
MW-219-LA-26		X	10/7/17	1147	GW	3		3		
PMW-85-05-LA-26		X	10/7/17	1350	GW	3		3		
MW-85-LA-26		X	10/7/17	1338	GW	3		3		
MW-197A-LA-26		X	10/7/17	1053	GW	3		3		
DR-2-4-LA-26		X	10/7/17	1230	GW	3		3		
PMW-85-01-LA-26		X	10/7/17	1110	GW	3		3		
MW-206-LA-26		X	10/7/17	1305	GW	3		3		
DUP-8-LA-26		X	10/7/17	0905	GW	3		3		
MW-204A-LA-26		X	10/7/17	1122	GW	3		3		
MW-219-LA-26-MSD			10/7/17	1147	GW	2		2		
MW-219-LA-26-MS			10/7/17	1147	GW	2		2		

Microbac OVD
Received: 10/10/2017 11:31
By: BRENDA GREENWALT
221000107280
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1800					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 55405

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720-163-2380

Turn Around Requirements:

Location: memphis (project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)
MW-88-LA-26		X	10/7/17	1310	GW	3		3	
DR2-2-LA-26		X	10/7/17	1255	GW	3		3	
MW-92-LA-26		X	10/7/17	1630	GW	3		3	
PMW92-03-LA-26	MSD		10/7/17	1611	GW	2		2	
MW-113-LA		X	10/7/17	1534	GW	3		3	
PMW92-02-LA-26		X	10/7/17	1557	GW	3		3	
PMW92-03-LA-26-MS			10/7/17	1611	GW	2		2	
PMW92-03-LA-26		X	10/7/17	1611	GW	2		2	
MW-64-LA-26		X	10/8/17	0900	GW	3		3	
MW-217-LA-26		X	10/8/17	0845	GW	3		3	
MW-26-LA-26		X	10/8/17	0830	GW	3		3	
DUP-4-LA-26		X	10/8/17	0910	GW	3		3	
MW-209B-LA-26		X	10/[illegible]/17	1634	GW	3		3	
MW-200-LA-26		X	10/7/17	1505	GW	3		3	
MW-94A-LA-26		X	10/7/17	1614	GW	3		3	
DUP-5-LA-26		X	10/7/17	1630	GW	3		3	
MW-207[illegible]-LA-26		X	10/7/17	1322	GW	3		3	
MW-208B-LA-26		X	10/7/17	1448	GW	3		3	
MW-206A-LA-26		X	10/7/17	1511	GW	3		3	
MW-208A-LA-26-MS			10/7/17	1410	GW	2		2	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10/9/17	1600					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 49939

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720-633-2380

Turn Around Requirements:

Location: memphis (project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature:

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-208A-LA-26		X	10/7/17	1410	GW	2		2		
MW-208A-LA-26-MSD			10/7/17	1410	GW	2		2		
MW-39-LA-26		X	10/7/17	1541	GW	3		3		
MW-206B-LA-26		X	10/7/17	1529	GW	3		3		
MW-108-LA-26		X	10/7/17	1356	GW	3		3		
MW-209A-LA-26		X	10/7/17	1646	GW	3		3		
MW-98-LA-26		X	10/7/17	1600	GW	3		3		
MW-218-LA-26		X	10/8/17	0916	GW	3		3		
MW-207A-LA-26		X	10/7/17	1336	GW	3		3		
DR2-6-LA-26		X	10/8/17	0835	GW	3		3		
MW-275-LA-26		X	10/8/17	1530	GW	3		3		
MW-280-LA-26		X	10/8/17	1440	GW	3		3		
MW-269-LA-26		X	10/8/17	1546	GW	3		3		
MW-90-LA-26-MS		X	10/8/17	0908	GW	2		2		
MW-214A-LA-26		X	10/8/17	1347	GW	3		3		
MW-141-LA-26		X	10/8/17	0922	GW	3		3		
MW-276-LA-26		X	10/8/17	1643	GW	3		3		
MW-199B-LA-26		X	10/8/17	0830	GW	3		3		
MW-268-LA-26		X	10/8/17	1432	GW	3		3		
MW-90-LA-26		X	10/8/17	0900	GW	3		3		

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
	10/9/17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 49934

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lyra Lutz

Contact Phone #: [redacted] 633-2380

Turn Around Requirements:

Location: Memphis (Project Site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260 B	TOTAL # (LAB USE)
MW-273-LA-26		X	10/8/17	1612	GW	3		3	
MW-107B-LA-26		X	10/8/17	0942	GW	3		3	
MW-260-LA-26		X	10/8/17	1425	GW	3		3	
MW-215B-LA-26		X	10/8/17	1405	GW	3		3	
MW-264-LA-26		X	10/8/17	1415	GW	3		3	
MW-89-LA-26		X	10/8/17	0858	GW	3		3	
MW-214B-LA-26		X	10/8/17	1336	GW	3		3	
MW-107T-LA-26		X	10/8/17	0942	GW	3		3	
MW-34-LA-26		X	10/8/17	1630	GW	3		3	
MW-90-LA-26-MSD			10/8/17	0908	GW	2		2	
MW-199A-LA-26		X	10/8/17	0845	GW	3		3	
MW-63B-LA-26		X	10/8/17	1055	GW	3		3	
MW-50-LA-26		X	10/8/17	1520	GW	3		3	
DUP-12-LA-26		X	10/8/17	1620	GW	3		3	
MW-103-LA-26		X	10/8/17	1036	GW	3		3	
MW-104-LA-26		X	10/8/17	1030	GW	3		3	
MW-281-LA-26		X	10/8/17	1111	GW	3		3	
MW-215A-LA-26		X	10/8/17	1400	GW	3		3	
MW-262-LA-26		X	10/8/17	1031	GW	3		3	
MW-263-LA-26		X	10/8/17	1020	GW	3		3	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 49937

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lyan Lutz

Contact Phone #: 720-633-1380

Turn Around Requirements:

Location: Memphis (Project) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)
DUP-11-LA-26			10/8/17	1040	GW	2		3	
DUP-9-LA-26			10/8/17	1430	GW	3		3	
MW-140-LA-26			10/8/17	1119	GW	3		3	
MW-258-LA-26			10/8/17	1105	GW	3		3	
MW-265-LA-26			10/8/17	1120	GW	3		3	
MW-278-LA-26			10/8/17	1600	GW	3		3	
MW-254-LA-26			10/8/17	1055	GW	3		3	
MW-282-LA-26			10/8/17	1045	GW	3		3	
LTM-TB3-LA-26			10/9/17	0823	GW	3		3	
MW-267-LA-26			10/8/17	1145	GW	3		3	
MW-256-LA-26			10/8/17	1057	GW	3		3	
MW-202B-LA-26			10/8/17	1230	GW	3		3	
MW-212-LA-26			10/8/17	~~1230~~ TR 1445	GW	3		3	
MW-255-LA-26			10/8/17	1335	GW	3		3	
LTM-TB2-LA-26			10/9/17	~~1324~~ TR 1344	GW	3		3	
MW-202A-LA-26			10/8/17	1304	GW	3		3	
DUP-3-LA-26			10/8/17	~~1314~~ TR 1410	MW	3		3	
MW-198-LA-26			10/8/17	1436	GW	3		3	
MW-62-LA-26			10/8/17	1400	GW	3		3	
MW-142-LA-26			10/8/17	1419	GW	3		3	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
	10/9/17	1527					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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COC No. A 49936

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz | Contact Phone #: 720 633-2380

Turn Around Requirements: | Location: Memphis (proj. site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond | Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other _____

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	TOTAL # (LAB USE)
MW-270-LA-26		X	10/9/17	0642	GW	3		3
MW-272-LA-26		X	10/9/17	0659	GW	3		3
MW-271-LA-26-MSD			10/9/17	0716	GW	3		3
MW-213-LA-26		X	10/9/17	1630	GW	3		3
MW-271-LA-26-MS			10/9/17	0716	GW	2		2
LTM-TB1-LA-26		X	10/9/17	1819	GW	3		3
MW-271-LA-26		X	10/9/17	0716	GW	3		3

Microbac OVD
Received: 10/10/2017 11:31
By: BRENDA GREENWALT
221000107280
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10-9-17	1800					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/24/2017 16:49

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7280

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

KBG 10/10/17

pH Exceptions

pH Lot # N/A

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

KBG 10/10/17

PRESERVATIVE EXCEPTIONS

~~NONE~~

AS NOTED

KBG 10/10/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-01	978852	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

Samplenum	Container ID	Products
L17100637-02	978853	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:30	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-03	978854	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-04	978855	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-05	978856	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-06	978857	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-07	978858	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-08	978859	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-09	978860	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-10	978861	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-11	978862	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-12	978863	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-13	978864	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-14	978865	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-15	978866	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-16	978867	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-17	978868	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-18	978869	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-19	978870	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Samplenum	Container ID	Products
L17100637-20	978871	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-21	978872	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:33	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 09:21	BRG		
2	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-22	978873	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:29	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-23	978874	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-24	978875	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-25	978876	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	

Samplenum	Container ID	Products
L17100637-26	978877	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-27	978878	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-28	978879	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-29	978880	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 09:21	BRG		
2	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-30	978881	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-31	978882	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-32	978883	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:35	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-33	978884	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-34	978885	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-35	978886	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Samplenum	Container ID	Products
L17100637-36	978887	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:28	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-37	978888	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-38	978889	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-39	978890	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-40	978891	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-41	978892	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-42	978893	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-43	978894	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-44	978895	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-45	978896	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-46	978897	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-47	978898	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Samplenum	Container ID	Products
L17100637-48	978899	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:34	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:27	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-49	978900	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	

Samplenum	Container ID	Products
L17100637-50	978901	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-51	978902	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-52	978903	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-53	978904	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-54	978905	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-55	978906	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-56	978907	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 09:21	BRG		
2	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-57	978908	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-58	978909	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-59	978910	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-60	978911	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-61	978912	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		11-OCT-2017 09:21	BRG		

Samplenum	Container ID	Products
L17100637-62	978913	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-63	978914	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100637
Account: 2694
Project: 2694.011
Samples: 65
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100637-64	978915	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 09:21	BRG		
2	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:32	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Samplenum	Container ID	Products
L17100637-65	978916	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:31	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 09:21	BRG		
2	ANALYZ	V1	ORG4	12-OCT-2017 07:31	AWE	CLS	
3	STORE	ORG4	A2	24-OCT-2017 07:26	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100710

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 26 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100710
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: LTM-TB4-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG	Please proceed. MRT

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00114035	H	0.0		1001891711510004575000788034630060	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
DR2-3-LA-26	L17100710-01	10/10/2017 16:47	10/11/2017 11:03
DUP-10-LA-26	L17100710-02	10/10/2017 17:45	10/11/2017 11:03
DUP-14-LA-26	L17100710-03	10/10/2017 17:31	10/11/2017 11:03
LTM-TB4-LA-26	L17100710-04	10/10/2017 17:52	10/11/2017 11:03
MW-25A-LA-26	L17100710-05	10/10/2017 17:29	10/11/2017 11:03
MW-39A-LA-26	L17100710-06	10/10/2017 18:53	10/11/2017 11:03
MW-52-LA-26	L17100710-07	10/10/2017 17:09	10/11/2017 11:03
MW-96-LA-26	L17100710-08	10/10/2017 17:19	10/11/2017 11:03
MW-97-LA-26	L17100710-09	10/10/2017 17:52	10/11/2017 11:03
MW-203B-LA-26	L17100710-10	10/10/2017 15:45	10/11/2017 11:03
MW-259-LA-26	L17100710-11	10/10/2017 18:29	10/11/2017 11:03
MW-261-LA-26	L17100710-12	10/10/2017 18:03	10/11/2017 11:03
MW-274-LA-26	L17100710-13	10/10/2017 16:05	10/11/2017 11:03
MW-277-LA-26	L17100710-14	10/10/2017 18:42	10/11/2017 11:03
DUP-7-LA-26	L17100710-15	10/10/2017 18:50	10/11/2017 11:03
MW-253-LA-26	L17100710-16	10/10/2017 19:00	10/11/2017 11:03
MW-283-LA-26	L17100710-17	10/10/2017 19:41	10/11/2017 11:03
DUP-13-LA-26	L17100710-18	10/10/2017 19:46	10/11/2017 11:03
MW-143-LA-26	L17100710-19	10/10/2017 19:30	10/11/2017 11:03
MW-143-LA-26-MS	L17100710-20	10/10/2017 19:30	10/11/2017 11:03
MW-143-LA-26-MSD	L17100710-21	10/10/2017 19:30	10/11/2017 11:03
DR2-5-LA-26	L17100710-22	10/10/2017 19:10	10/11/2017 11:03

Login Number: L17100710
Department: Volatiles
Analyst: Heather Fairchild

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above the UCL were observed for the following analytes on HPMS6: chloromethane, dichlorodifluoromethane. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries marginally below the LCL were observed for the following analytes: 2-Chlorotoluene. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The RPD results for chloroethane exceeded the control limits.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 22 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130785
Approved By: Anthony Canter

Certificate of Analysis

Sample #:	L17100710-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG635230	**Analyst:**	HRF/TMB	**Run Date:**	10/24/2017 13:19
Collect Date:	10/10/2017 16:47	**Dilution:**	1	**File ID:**	11M22623
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		Q	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	1.95		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.410		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.922	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.77		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-10-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 18:55
Collect Date:	10/10/2017 17:45	**Dilution:**	1	**File ID:**	11M22548
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.92		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-14-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 19:25
Collect Date:	10/10/2017 17:31	**Dilution:**	1	**File ID:**	11M22549
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.741	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.193	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.283	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.35		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 14:18
Collect Date:	10/10/2017 17:52	**Dilution:**	1	**File ID:**	6M150890
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.87	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	98.4	81	120	
4-Bromofluorobenzene	99.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-25A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 19:54
Collect Date:	10/10/2017 17:29	**Dilution:**	1	**File ID:**	11M22550
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.863	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.470	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.37		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	0.653	F	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-39A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 20:24
Collect Date:	10/10/2017 18:53	**Dilution:**	1	**File ID:**	11M22551
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	15.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.40		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.64		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.93		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.01		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-52-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 20:53
Collect Date:	10/10/2017 17:09	**Dilution:**	1	**File ID:**	11M22552
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.731		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.701	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.54		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-96-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 21:23
Collect Date:	10/10/2017 17:19	**Dilution:**	1	**File ID:**	11M22553
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.657	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.189	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.367	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.28		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-97-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 21:52
Collect Date:	10/10/2017 17:52	**Dilution:**	1	**File ID:**	11M22554
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.215	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	71.7		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	108	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-203B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 22:22
Collect Date:	10/10/2017 15:45	**Dilution:**	1	**File ID:**	11M22555
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.332	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.54	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	11.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.05		1.00	0.250
Toluene	108-88-3	0.742	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	5.91		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-259-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 22:51
Collect Date:	10/10/2017 18:29	**Dilution:**	1	**File ID:**	11M22556
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.262	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.74		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.484	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	4.11		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.33		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	18.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-261-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 23:20
Collect Date:	10/10/2017 18:03	**Dilution:**	1	**File ID:**	11M22557
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.73		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.308	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-274-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 23:49
Collect Date:	10/10/2017 16:05	**Dilution:**	1	**File ID:**	11M22558
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.889		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.01		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.17		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-277-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/21/2017 00:19
Collect Date:	10/10/2017 18:42	**Dilution:**	1	**File ID:**	11M22559
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-7-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 14:47
Collect Date:	10/10/2017 18:50	**Dilution:**	1	**File ID:**	6M150891
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.681	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.4	81	120	
4-Bromofluorobenzene	96.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-253-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 15:17
Collect Date:	10/10/2017 19:00	**Dilution:**	1	**File ID:**	6M150892
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.677	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	97.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-283-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 15:47
Collect Date:	10/10/2017 19:41	**Dilution:**	1	**File ID:**	6M150893
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	98.9	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-13-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 16:17
Collect Date:	10/10/2017 19:46	**Dilution:**	1	**File ID:**	6M150894
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 16:47
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150895
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.399	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	111	72	119	
Toluene-d8	98.7	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 17:16
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150896
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.8		0.500	0.250
1,1,1-Trichloroethane	71-55-6	22.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.1		1.00	0.250
1,1-Dichloroethane	75-34-3	20.4		1.00	0.125
1,1-Dichloroethene	75-35-4	20.8		1.00	0.500
1,1-Dichloropropene	563-58-6	21.0		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	23.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	20.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	21.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.9		0.500	0.125
1-Chlorohexane	544-10-5	19.1		1.00	0.125
2,2-Dichloropropane	594-20-7	19.9		1.00	0.250
2-Hexanone	591-78-6	19.9		10.0	2.50
2-Chlorotoluene	95-49-8	19.7		1.00	0.125
4-Chlorotoluene	106-43-4	19.4		1.00	0.250
Acetone	67-64-1	29.3		10.0	2.50
Benzene	71-43-2	20.2		0.400	0.125
Bromobenzene	108-86-1	19.1		1.00	0.125
Bromochloromethane	74-97-5	21.5		1.00	0.200
Bromodichloromethane	75-27-4	21.3		0.500	0.250
Bromoform	75-25-2	19.8		1.00	0.500
Bromomethane	74-83-9	8.66		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.0		1.00	0.500
Carbon tetrachloride	56-23-5	22.4		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	15.3		1.00	0.500
Chloroform	67-66-3	21.3		0.300	0.125
Chloromethane	74-87-3	23.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.4		0.500	0.250
Dibromochloromethane	124-48-1	20.4		0.500	0.250
Dibromomethane	74-95-3	22.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.0		1.00	0.250
Ethylbenzene	100-41-4	20.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	20.2		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.2		5.00	0.500
MEK (2-Butanone)	78-93-3	21.3		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.7		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	20.5		1.00	0.200
o-Xylene	95-47-6	20.9		1.00	0.250
p-Isopropyltoluene	99-87-6	20.2		1.00	0.250
sec-Butylbenzene	135-98-8	19.5		1.00	0.250
Styrene	100-42-5	21.6		1.00	0.125
Trichloroethene	79-01-6	25.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.1		1.00	0.250
Tetrachloroethene	127-18-4	20.1		1.00	0.250
Toluene	108-88-3	19.9		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.3		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	21.3		1.00	0.250
Vinyl chloride	75-01-4	23.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	95.7	76	119	

Certificate of Analysis

Sample #:	L17100710-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 17:45
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150897
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	21.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	20.1		1.00	0.500
1,1-Dichloropropene	563-58-6	20.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.9		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.5		1.00	0.250
1,2-Dichloroethane	107-06-2	22.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.4		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.2		1.00	0.200
1,2-Dibromoethane	106-93-4	20.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.0		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.3		0.500	0.125
1-Chlorohexane	544-10-5	19.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.1		1.00	0.250
2-Hexanone	591-78-6	20.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.3		1.00	0.125
4-Chlorotoluene	106-43-4	18.5		1.00	0.250
Acetone	67-64-1	28.4		10.0	2.50
Benzene	71-43-2	19.7		0.400	0.125
Bromobenzene	108-86-1	18.8		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	19.4		1.00	0.500
Bromomethane	74-83-9	9.76		1.00	0.500
Carbon disulfide	75-15-0	16.4		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	21.7		1.00	0.250
Chlorobenzene	108-90-7	19.7		0.500	0.125
Chloroethane	75-00-3	18.9		1.00	0.500
Chloroform	67-66-3	20.6		0.300	0.125
Chloromethane	74-87-3	24.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.3		0.500	0.250
Dibromochloromethane	124-48-1	20.3		0.500	0.250
Dibromomethane	74-95-3	21.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.3		1.00	0.250
Ethylbenzene	100-41-4	19.7		1.00	0.250
Hexachlorobutadiene	87-68-3	17.6		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.9		5.00	0.500
MEK (2-Butanone)	78-93-3	21.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.7		10.0	2.50
n-Butylbenzene	104-51-8	18.8		1.00	0.250
n-Propylbenzene	103-65-1	19.6		1.00	0.125
m-,p-Xylene	179601-23-1	39.5		2.00	0.500
Naphthalene	91-20-3	20.5		1.00	0.200
o-Xylene	95-47-6	20.3		1.00	0.250
p-Isopropyltoluene	99-87-6	19.4		1.00	0.250
sec-Butylbenzene	135-98-8	18.6		1.00	0.250
Styrene	100-42-5	21.0		1.00	0.125
Trichloroethene	79-01-6	25.2		1.00	0.250
tert-Butylbenzene	98-06-6	19.2		1.00	0.250
Tetrachloroethene	127-18-4	19.6		1.00	0.250
Toluene	108-88-3	19.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	24.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	98.7	81	120	
4-Bromofluorobenzene	95.6	76	119	

Certificate of Analysis

Sample #:	L17100710-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR2-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 22:13
Collect Date:	10/10/2017 19:10	**Dilution:**	50	**File ID:**	6M150906
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	25.0	12.5
1,1,1-Trichloroethane	71-55-6		U	50.0	12.5
1,1,2,2-Tetrachloroethane	79-34-5		U	25.0	10.0
1,1,2-Trichloroethane	79-00-5		U	50.0	12.5
1,1-Dichloroethane	75-34-3		U	50.0	6.25
1,1-Dichloroethene	75-35-4		U	50.0	25.0
1,1-Dichloropropene	563-58-6		U	50.0	12.5
1,2,3-Trichlorobenzene	87-61-6		U	50.0	7.50
1,2,3-Trichloropropane	96-18-4		U	50.0	25.0
1,2,4-Trichlorobenzene	120-82-1		U	50.0	10.0
1,2,4-Trimethylbenzene	95-63-6		U	50.0	12.5
1,2-Dichloroethane	107-06-2		U	25.0	12.5
1,2-Dichlorobenzene	95-50-1		U	50.0	6.25
1,2-Dibromo-3-chloropropane	96-12-8		U	100	50.0
1,2-Dichloropropane	78-87-5		U	50.0	10.0
1,2-Dibromoethane	106-93-4		U	50.0	12.5
1,3,5-Trimethylbenzene	108-67-8		U	50.0	12.5
1,3-Dichlorobenzene	541-73-1		U	50.0	12.5
1,3-Dichloropropane	142-28-9		U	20.0	10.0
1,4-Dichlorobenzene	106-46-7		U	25.0	6.25
1-Chlorohexane	544-10-5		U	50.0	6.25
2,2-Dichloropropane	594-20-7		U	50.0	12.5
2-Hexanone	591-78-6		U	500	125
2-Chlorotoluene	95-49-8		U	50.0	6.25
4-Chlorotoluene	106-43-4		U	50.0	12.5
Acetone	67-64-1	2450		500	125
Benzene	71-43-2		U	20.0	6.25
Bromobenzene	108-86-1		U	50.0	6.25
Bromochloromethane	74-97-5		U	50.0	10.0
Bromodichloromethane	75-27-4		U	25.0	12.5
Bromoform	75-25-2		U	50.0	25.0
Bromomethane	74-83-9		U	50.0	25.0
Carbon disulfide	75-15-0		U	50.0	25.0

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	50.0	12.5
Chlorobenzene	108-90-7		U	25.0	6.25
Chloroethane	75-00-3		U	50.0	25.0
Chloroform	67-66-3		U	15.0	6.25
Chloromethane	74-87-3		U	50.0	25.0
cis-1,2-Dichloroethene	156-59-2	28.0	F	50.0	12.5
cis-1,3-Dichloropropene	10061-01-5		U	25.0	12.5
Dibromochloromethane	124-48-1		U	25.0	12.5
Dibromomethane	74-95-3		U	50.0	12.5
Dichlorodifluoromethane	75-71-8		U	50.0	12.5
Ethylbenzene	100-41-4		U	50.0	12.5
Hexachlorobutadiene	87-68-3		U	30.0	12.5
Isopropylbenzene	98-82-8		U	50.0	12.5
Methylene chloride	75-09-2	15.1	F	50.0	12.5
Methyl t-butyl ether (MTBE)	1634-04-4		U	250	25.0
MEK (2-Butanone)	78-93-3	5080		500	125
MIBK (methyl isobutyl ketone)	108-10-1		U	500	125
n-Butylbenzene	104-51-8		U	50.0	12.5
n-Propylbenzene	103-65-1		U	50.0	6.25
m-,p-Xylene	179601-23-1		U	100	25.0
Naphthalene	91-20-3		U	50.0	10.0
o-Xylene	95-47-6		U	50.0	12.5
p-Isopropyltoluene	99-87-6		U	50.0	12.5
sec-Butylbenzene	135-98-8		U	50.0	12.5
Styrene	100-42-5		U	50.0	6.25
Trichloroethene	79-01-6		U	50.0	12.5
tert-Butylbenzene	98-06-6		U	50.0	12.5
Tetrachloroethene	127-18-4		U	50.0	12.5
Toluene	108-88-3		U	50.0	12.5
trans-1,2-Dichloroethene	156-60-5		U	50.0	12.5
trans-1,3-Dichloropropene	10061-02-6		U	50.0	25.0
Trichlorofluoromethane	75-69-4		U	50.0	12.5
Vinyl chloride	75-01-4		U	50.0	12.5

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	98.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100710
Department: Volatiles
Analyst: Heather Fairchild

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above the UCL were observed for the following analytes on HPMS6: chloromethane, dichlorodifluoromethane. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recoveries marginally below the LCL were observed for the following analytes: 2-Chlorotoluene. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The RPD results for chloroethane exceeded the control limits.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 22 was run at a dilution.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130785
Approved By: Anthony Canter

Certificate of Analysis

Sample #:	L17100710-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DR2-3-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG635230	**Analyst:**	HRF/TMB	**Run Date:**	10/24/2017 13:19
Collect Date:	10/10/2017 16:47	**Dilution:**	1	**File ID:**	11M22623
Sample Tag:	02	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		Q	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	1.95		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.410		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.922	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.77		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-10-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 18:55
Collect Date:	10/10/2017 17:45	**Dilution:**	1	**File ID:**	11M22548
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.91	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.92		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	113	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-14-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 19:25
Collect Date:	10/10/2017 17:31	**Dilution:**	1	**File ID:**	11M22549
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.741	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.193	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.283	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.35		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB4-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 14:18
Collect Date:	10/10/2017 17:52	**Dilution:**	1	**File ID:**	6M150890
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.87	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	98.4	81	120	
4-Bromofluorobenzene	99.8	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-25A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 19:54
Collect Date:	10/10/2017 17:29	**Dilution:**	1	**File ID:**	11M22550
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.863	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.470	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	1.37		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	0.653	F	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-39A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 20:24
Collect Date:	10/10/2017 18:53	**Dilution:**	1	**File ID:**	11M22551
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.9		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	15.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	6.40		5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.64		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.93		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	2.01		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-52-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 20:53
Collect Date:	10/10/2017 17:09	**Dilution:**	1	**File ID:**	11M22552
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.731		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.701	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	9.54		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-96-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 21:23
Collect Date:	10/10/2017 17:19	**Dilution:**	1	**File ID:**	11M22553
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.657	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.189	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.367	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4	1.28		1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-97-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 21:52
Collect Date:	10/10/2017 17:52	**Dilution:**	1	**File ID:**	11M22554
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	14.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.215	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	71.7		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	108	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-203B-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 22:22
Collect Date:	10/10/2017 15:45	**Dilution:**	1	**File ID:**	11M22555
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.332	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.2		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	3.54	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	11.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.05		1.00	0.250
Toluene	108-88-3	0.742	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	5.91		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-259-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 22:51
Collect Date:	10/10/2017 18:29	**Dilution:**	1	**File ID:**	11M22556
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.262	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	1.74		0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5	0.484	F	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	13.1		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	4.11		1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.33		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	18.6		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.7		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-261-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 23:20
Collect Date:	10/10/2017 18:03	**Dilution:**	1	**File ID:**	11M22557
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.73		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.308	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-274-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/20/2017 23:49
Collect Date:	10/10/2017 16:05	**Dilution:**	1	**File ID:**	11M22558
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.889		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.01		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.46		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	3.17		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-277-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/12/2017 17:59
Workgroup #:	WG634877	**Analyst:**	HRF/TMB	**Run Date:**	10/21/2017 00:19
Collect Date:	10/10/2017 18:42	**Dilution:**	1	**File ID:**	11M22559
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.18	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-7-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 14:47
Collect Date:	10/10/2017 18:50	**Dilution:**	1	**File ID:**	6M150891
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.98	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.681	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.4	81	120	
4-Bromofluorobenzene	96.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-253-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 15:17
Collect Date:	10/10/2017 19:00	**Dilution:**	1	**File ID:**	6M150892
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.08	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.677	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	97.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-283-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 15:47
Collect Date:	10/10/2017 19:41	**Dilution:**	1	**File ID:**	6M150893
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	112	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	98.9	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-13-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 16:17
Collect Date:	10/10/2017 19:46	**Dilution:**	1	**File ID:**	6M150894
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.6	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 16:47
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150895
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.399	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	111	72	119	
Toluene-d8	98.7	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100710-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 17:16
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150896
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.8		0.500	0.250
1,1,1-Trichloroethane	71-55-6	22.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.8		0.500	0.200
1,1,2-Trichloroethane	79-00-5	20.1		1.00	0.250
1,1-Dichloroethane	75-34-3	20.4		1.00	0.125
1,1-Dichloroethene	75-35-4	20.8		1.00	0.500
1,1-Dichloropropene	563-58-6	21.0		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.1		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	23.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	20.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	21.0		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.9		0.500	0.125
1-Chlorohexane	544-10-5	19.1		1.00	0.125
2,2-Dichloropropane	594-20-7	19.9		1.00	0.250
2-Hexanone	591-78-6	19.9		10.0	2.50
2-Chlorotoluene	95-49-8	19.7		1.00	0.125
4-Chlorotoluene	106-43-4	19.4		1.00	0.250
Acetone	67-64-1	29.3		10.0	2.50
Benzene	71-43-2	20.2		0.400	0.125
Bromobenzene	108-86-1	19.1		1.00	0.125
Bromochloromethane	74-97-5	21.5		1.00	0.200
Bromodichloromethane	75-27-4	21.3		0.500	0.250
Bromoform	75-25-2	19.8		1.00	0.500
Bromomethane	74-83-9	8.66		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.0		1.00	0.500
Carbon tetrachloride	56-23-5	22.4		1.00	0.250
Chlorobenzene	108-90-7	20.0		0.500	0.125
Chloroethane	75-00-3	15.3		1.00	0.500
Chloroform	67-66-3	21.3		0.300	0.125
Chloromethane	74-87-3	23.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.4		0.500	0.250
Dibromochloromethane	124-48-1	20.4		0.500	0.250
Dibromomethane	74-95-3	22.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.0		1.00	0.250
Ethylbenzene	100-41-4	20.3		1.00	0.250
Hexachlorobutadiene	87-68-3	18.0		0.600	0.250
Isopropylbenzene	98-82-8	20.2		1.00	0.250
Methylene chloride	75-09-2	19.8		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.2		5.00	0.500
MEK (2-Butanone)	78-93-3	21.3		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.7		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	20.5		1.00	0.200
o-Xylene	95-47-6	20.9		1.00	0.250
p-Isopropyltoluene	99-87-6	20.2		1.00	0.250
sec-Butylbenzene	135-98-8	19.5		1.00	0.250
Styrene	100-42-5	21.6		1.00	0.125
Trichloroethene	79-01-6	25.8		1.00	0.250
tert-Butylbenzene	98-06-6	20.1		1.00	0.250
Tetrachloroethene	127-18-4	20.1		1.00	0.250
Toluene	108-88-3	19.9		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.3		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	21.3		1.00	0.250
Vinyl chloride	75-01-4	23.2		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	99.2	81	120	
4-Bromofluorobenzene	95.7	76	119	

Certificate of Analysis

Sample #:	L17100710-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-143-LA-26-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 17:45
Collect Date:	10/10/2017 19:30	**Dilution:**	1	**File ID:**	6M150897
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	20.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	21.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	18.6		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.7		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	20.1		1.00	0.500
1,1-Dichloropropene	563-58-6	20.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.9		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	19.4		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.5		1.00	0.250
1,2-Dichloroethane	107-06-2	22.8		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.4		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.2		1.00	0.200
1,2-Dibromoethane	106-93-4	20.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.6		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.0		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.3		0.500	0.125
1-Chlorohexane	544-10-5	19.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.1		1.00	0.250
2-Hexanone	591-78-6	20.0		10.0	2.50
2-Chlorotoluene	95-49-8	19.3		1.00	0.125
4-Chlorotoluene	106-43-4	18.5		1.00	0.250
Acetone	67-64-1	28.4		10.0	2.50
Benzene	71-43-2	19.7		0.400	0.125
Bromobenzene	108-86-1	18.8		1.00	0.125
Bromochloromethane	74-97-5	20.9		1.00	0.200
Bromodichloromethane	75-27-4	20.8		0.500	0.250
Bromoform	75-25-2	19.4		1.00	0.500
Bromomethane	74-83-9	9.76		1.00	0.500
Carbon disulfide	75-15-0	16.4		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	21.7		1.00	0.250
Chlorobenzene	108-90-7	19.7		0.500	0.125
Chloroethane	75-00-3	18.9		1.00	0.500
Chloroform	67-66-3	20.6		0.300	0.125
Chloromethane	74-87-3	24.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	20.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.3		0.500	0.250
Dibromochloromethane	124-48-1	20.3		0.500	0.250
Dibromomethane	74-95-3	21.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.3		1.00	0.250
Ethylbenzene	100-41-4	19.7		1.00	0.250
Hexachlorobutadiene	87-68-3	17.6		0.600	0.250
Isopropylbenzene	98-82-8	19.8		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.9		5.00	0.500
MEK (2-Butanone)	78-93-3	21.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	17.7		10.0	2.50
n-Butylbenzene	104-51-8	18.8		1.00	0.250
n-Propylbenzene	103-65-1	19.6		1.00	0.125
m-,p-Xylene	179601-23-1	39.5		2.00	0.500
Naphthalene	91-20-3	20.5		1.00	0.200
o-Xylene	95-47-6	20.3		1.00	0.250
p-Isopropyltoluene	99-87-6	19.4		1.00	0.250
sec-Butylbenzene	135-98-8	18.6		1.00	0.250
Styrene	100-42-5	21.0		1.00	0.125
Trichloroethene	79-01-6	25.2		1.00	0.250
tert-Butylbenzene	98-06-6	19.2		1.00	0.250
Tetrachloroethene	127-18-4	19.6		1.00	0.250
Toluene	108-88-3	19.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	20.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.5		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	24.4		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	98.7	81	120	
4-Bromofluorobenzene	95.6	76	119	

Certificate of Analysis

Sample #:	L17100710-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR2-5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 22:13
Collect Date:	10/10/2017 19:10	**Dilution:**	50	**File ID:**	6M150906
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	25.0	12.5
1,1,1-Trichloroethane	71-55-6		U	50.0	12.5
1,1,2,2-Tetrachloroethane	79-34-5		U	25.0	10.0
1,1,2-Trichloroethane	79-00-5		U	50.0	12.5
1,1-Dichloroethane	75-34-3		U	50.0	6.25
1,1-Dichloroethene	75-35-4		U	50.0	25.0
1,1-Dichloropropene	563-58-6		U	50.0	12.5
1,2,3-Trichlorobenzene	87-61-6		U	50.0	7.50
1,2,3-Trichloropropane	96-18-4		U	50.0	25.0
1,2,4-Trichlorobenzene	120-82-1		U	50.0	10.0
1,2,4-Trimethylbenzene	95-63-6		U	50.0	12.5
1,2-Dichloroethane	107-06-2		U	25.0	12.5
1,2-Dichlorobenzene	95-50-1		U	50.0	6.25
1,2-Dibromo-3-chloropropane	96-12-8		U	100	50.0
1,2-Dichloropropane	78-87-5		U	50.0	10.0
1,2-Dibromoethane	106-93-4		U	50.0	12.5
1,3,5-Trimethylbenzene	108-67-8		U	50.0	12.5
1,3-Dichlorobenzene	541-73-1		U	50.0	12.5
1,3-Dichloropropane	142-28-9		U	20.0	10.0
1,4-Dichlorobenzene	106-46-7		U	25.0	6.25
1-Chlorohexane	544-10-5		U	50.0	6.25
2,2-Dichloropropane	594-20-7		U	50.0	12.5
2-Hexanone	591-78-6		U	500	125
2-Chlorotoluene	95-49-8		U	50.0	6.25
4-Chlorotoluene	106-43-4		U	50.0	12.5
Acetone	67-64-1	2450		500	125
Benzene	71-43-2		U	20.0	6.25
Bromobenzene	108-86-1		U	50.0	6.25
Bromochloromethane	74-97-5		U	50.0	10.0
Bromodichloromethane	75-27-4		U	25.0	12.5
Bromoform	75-25-2		U	50.0	25.0
Bromomethane	74-83-9		U	50.0	25.0
Carbon disulfide	75-15-0		U	50.0	25.0

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	50.0	12.5
Chlorobenzene	108-90-7		U	25.0	6.25
Chloroethane	75-00-3		U	50.0	25.0
Chloroform	67-66-3		U	15.0	6.25
Chloromethane	74-87-3		U	50.0	25.0
cis-1,2-Dichloroethene	156-59-2	28.0	F	50.0	12.5
cis-1,3-Dichloropropene	10061-01-5		U	25.0	12.5
Dibromochloromethane	124-48-1		U	25.0	12.5
Dibromomethane	74-95-3		U	50.0	12.5
Dichlorodifluoromethane	75-71-8		U	50.0	12.5
Ethylbenzene	100-41-4		U	50.0	12.5
Hexachlorobutadiene	87-68-3		U	30.0	12.5
Isopropylbenzene	98-82-8		U	50.0	12.5
Methylene chloride	75-09-2	15.1	F	50.0	12.5
Methyl t-butyl ether (MTBE)	1634-04-4		U	250	25.0
MEK (2-Butanone)	78-93-3	5080		500	125
MIBK (methyl isobutyl ketone)	108-10-1		U	500	125
n-Butylbenzene	104-51-8		U	50.0	12.5
n-Propylbenzene	103-65-1		U	50.0	6.25
m-,p-Xylene	179601-23-1		U	100	25.0
Naphthalene	91-20-3		U	50.0	10.0
o-Xylene	95-47-6		U	50.0	12.5
p-Isopropyltoluene	99-87-6		U	50.0	12.5
sec-Butylbenzene	135-98-8		U	50.0	12.5
Styrene	100-42-5		U	50.0	6.25
Trichloroethene	79-01-6		U	50.0	12.5
tert-Butylbenzene	98-06-6		U	50.0	12.5
Tetrachloroethene	127-18-4		U	50.0	12.5
Toluene	108-88-3		U	50.0	12.5
trans-1,2-Dichloroethene	156-60-5		U	50.0	12.5
trans-1,3-Dichloropropene	10061-02-6		U	50.0	25.0
Trichlorofluoromethane	75-69-4		U	50.0	12.5
Vinyl chloride	75-01-4		U	50.0	12.5

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	98.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): BLR

Date: 10-23-2017

Filter Lot #: 9486030

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020

pH Probe ID: TS

Temp probe ID: ☑ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
BLR 10-23-2017		BLR 10-24-17	
Time On	Temp On °C	Time Off	Temp Off °C
1500	21.9	0800	22.5

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A	~~10-1253-01~~										~~25.00~~	
B	-02										~~25.00~~	
C	-03											
D												
E												
F												
G												
H												
I												
J												
K												
L												
M												
N												
O												
P	10-1253-01	✓	10	10	1311	F-284	S	100		✓	25.00	500
Q	10-1253-02	✓	10	10	↓	↓	S	100		✓	25.00	500
R	10-1253-03	✓	10	10			S	100		✓	25.00	500
S												

BLR 10-23-2017

BLR 10-23-2017

BLR 10-23-2017

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By:

Analyst(s): CPD
Date: 10/18/17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
CPD	10/18/17	CPD	10/19/17
Time On	Temp On °C	Time Off	Temp Off °C
1603	22.8	0828	22.3

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A												
B												
C												
D												
E												
F												
G												
H												
I												
J	10-1072-02	✓	10	10	1311	F1-284	S	100		✓	25.01	500
K												
L												
M												
N												
O												
P												
Q												
R												
S												
NA	10-1004-01	NA	NA	NA	1311	FIL	W	<0.5	NA	NA	40	40
↓	10-1005-01	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓
↓	10-1006-01	↓	↓	↓	↓	↓	O	<0.5	↓	↓	↓	↓
↓	10-1007-01	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓
NA	FBLK1(ZHE)	NA	NA	NA	1311	F1-284	NA	NA	NA	NA	40	40

CPD 10/19/17
CPD 10/19/17
CPD 10/19/17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By: Brandon Richards

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M19216	WG618910-01 BFB 50ng 8260	NA	1	1	STD82467	06/22/17 11:03
11M19217	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 11:27
11M19218	WG618910-02 50ug/L CCV 8260	NA	1	1	STD82436	06/22/17 12:03
11M19219	WG618912-01 5ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 12:32
11M19220	WG618912-02 20ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:02
11M19221	WG618912-03 50ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 13:31
11M19222	WG618912-04 100ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:01
11M19223	WG618912-05 200ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:31
11M19224	WG618912-06 300ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 14:59
11M19225	WG618912-07 400ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:29
11M19226	WG618912-08 500ug/L ICAL 826-A9	NA	1	1	STD82519	06/22/17 15:58
11M19227	RINSE	NA	1	1		06/22/17 16:27
11M19228	WG618912-09 100ug/L ICV/ALT 826-A9	NA	1	1	STD82415	06/22/17 16:57
11M19229	WG618911-01 BLANK 8260	NA	1	1		06/22/17 17:27
11M19230	WG618911-02 20ug/L LCS 8260	NA	1	1	STD82448	06/22/17 17:56
11M19231	WG618911-03 20ug/L LCS2 8260	NA	1	1	STD82448	06/22/17 18:26
11M19232	L17061104-01 A 826-BETX	<2	1	1		06/22/17 18:55
11M19233	L17061103-12 A TB 826-SPE	<2	1	1		06/22/17 19:25
11M19234	L17061103-01 A 826-SPE	<2	1	1		06/22/17 19:54
11M19235	L17061103-03 A 826-SPE	<2	1	1		06/22/17 20:23
11M19236	L17061103-05 A 826-SPE	<2	1	1		06/22/17 20:53
11M19237	L17061103-07 A 826-SPE	<2	1	1		06/22/17 21:22
11M19238	L17061103-09 A 826-SPE	<2	1	1		06/22/17 21:51
11M19239	L17061103-11 A 826-SPE	<2	1	1		06/22/17 22:20
11M19240	RINSE	NA	1	1		06/22/17 22:49
11M19241	WG618911-04 BLANK2 624	NA	2	1		06/22/17 23:18
11M19242	L17061150-01 A 624	<2	2	1		06/22/17 23:48
11M19243	L17061154-01 A 624-SPE	7	2	1		06/23/17 00:17
11M19244	L17061152-01 A 624-SPE2	6	2	1		06/23/17 00:46
11M19245	CCV	NA	2	1		06/23/17 01:15
11M19246	RINSE	NA	2	1		06/23/17 01:45
11M19247	RINSE	NA	2	1		06/23/17 02:14

Approved: June 23, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 062217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,0
Method: 624 SOP: MSV10 Rev: 15
Maintenance Log ID:

Internal Standard: STD82340 Surrogate Standard: STD82339
CCV: STD82436 LCS: STD82448 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG618911 WG618912

Comments: Alt. Src. failed high for Acrolein. All reported samples requiring Acrolein were ND.

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X		Check Standard Failure	
File ID: 11M19217				
WG618910-02 CCV multiple cmpds. failed low. RR				

Approved: June 23, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
	Not needed, DNR.			
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
	L17100420-01			

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22279	WG633647-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 10:07
11M22280	RINSE	NA	1	1		10/12/17 11:10
11M22281	RINSE	NA	1	1		10/12/17 11:40
11M22282	WG633647-02 .3ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 12:10
11M22283	WG633647-03 .4ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:05
11M22284	WG633647-04 1ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 13:34
11M22285	WG633647-05 2ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:04
11M22286	WG633647-06 5ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 14:47
11M22287	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 15:17
11M22288	WG633647-07 20ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:01
11M22289	WG633647-08 50ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 16:30
11M22290	WG633647-09 100ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:00
11M22291	WG633647-10 200ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:29
11M22292	WG633647-11 300ug/L ICAL 8260	NA	1	1	STD84376	10/12/17 17:59
11M22293	RINSE	NA	1	1		10/12/17 18:28
11M22294	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 18:57
11M22295	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 19:54
11M22296	WG633790-01 50ng BFB STD 8260	NA	1	1	STD84001	10/12/17 20:07
11M22297	WG633790-02 50ug/L CCV 8260	NA	1	1	STD84376	10/12/17 20:33
11M22298	WG633647-12 50ug/L ICV 8260	NA	1	1	STD84357	10/12/17 21:02
11M22299	WG000000-01 100ug/L CCV 8260	NA	1	1	STD00000	10/12/17 21:56
11M22300	WG633791-01 BLANK 8260	NA	1	1		10/12/17 22:26
11M22301	WG633791-02 20ug/L LCS 8260	NA	1	1	STD84357	10/12/17 22:55
11M22302	WG633791-03 20ug/L LCS2 8260	NA	1	1	STD84357	10/12/17 23:25
11M22303	RINSE	NA	1	1		10/12/17 23:55
11M22304	L17100636-03 A 826-SPE	NA	1	1		10/13/17 00:24
11M22305	L17100636-04 A 826-SPE	NA	1	1		10/13/17 00:54
11M22306	L17100636-06 A 826-SPE	NA	1	1		10/13/17 01:24
11M22307	L17100636-07 A 826-SPE	NA	1	1		10/13/17 01:54
11M22308	L17100636-08 A 826-SPE	NA	1	1		10/13/17 02:24
11M22309	L17100636-09 A 826-SPE	NA	1	1		10/13/17 02:53
11M22310	L17100532-15 A 826-SPE	NA	1	1		10/13/17 03:23
11M22311	L17100636-13 A 826-SPE	NA	1	1		10/13/17 03:52
11M22312	L17100636-14 A 826-SPE	NA	1	1		10/13/17 04:21

Approved: October 16, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 101217
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633647 (ICAL)

Comments: Samples not reported due to workgroup error.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22313	L17100532-14 A 826-SPE	NA	1	1		10/13/17 04:51
11M22314	L17100532-16 A 826-SPE	NA	1	1		10/13/17 05:20
11M22315	L17100532-18 A 826-SPE	NA	1	1		10/13/17 05:50
11M22316	L17100532-19 A 826-SPE	NA	1	1		10/13/17 06:20
11M22317	L17100532-17 A 826-SPE	NA	1	1		10/13/17 06:50
11M22318	L17100755-02 A 100X 8260	NA	12	100		10/13/17 07:20
11M22319	L17100755-17 A 1000X 8260	NA	12	1000		10/13/17 07:49
11M22320	RINSE	NA	2	1		10/13/17 08:19
11M22321	WG633791-04 BLANK2 624	NA	2	1		10/13/17 08:49

Approved: October 16, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 102017
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634877

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22535	WG634876-01 50ng BFB 8260	NA	1	1	STD84001	10/20/17 12:35
11M22536	WG634876-02 50ug/L CCV 8260	NA	1	1	STD84376	10/20/17 12:59
11M22537	WG634876-02 50ug/L CCV 8260	NA	1	1	STD84376	10/20/17 13:32
11M22538	WG000000-01 100ug/L A9 CCV 8260	NA	1	1	STDXXXXX	10/20/17 14:01
11M22539	WG634877-01 BLANK 1020 8260	NA	1	1		10/20/17 14:31
11M22540	L17100386-01 A 826-REF-BLK	<2	1	1		10/20/17 15:01
11M22541	L17100386-02 A 826-REF-BLK	NA	1	1		10/20/17 15:32
11M22542	L17100386-03 A 826-REF-BLK	<2	1	1		10/20/17 16:03
11M22543	L17100386-04 A 826-REF-BLK	<2	1	1		10/20/17 16:32
11M22544	L17100386-05 A 826-REF-BLK	NA	1	1		10/20/17 16:58
11M22545	WG634877-02 20ug/L LCS 8260	NA	1	1	STD84357	10/20/17 17:28
11M22546	WG634877-03 20ug/L LCS2 8260	NA	1	1	STD84357	10/20/17 17:57
11M22547	L17100710-01 A 826-SPE	<2	1	1		10/20/17 18:26
11M22548	L17100710-02 A 826-SPE	<2	1	1		10/20/17 18:55
11M22549	L17100710-03 A 826-SPE	<2	1	1		10/20/17 19:25
11M22550	L17100710-05 A 826-SPE	<2	1	1		10/20/17 19:54
11M22551	L17100710-06 A 826-SPE	<2	1	1		10/20/17 20:24
11M22552	L17100710-07 A 826-SPE	<2	1	1		10/20/17 20:53
11M22553	L17100710-08 A 826-SPE	<2	1	1		10/20/17 21:23
11M22554	L17100710-09 A 826-SPE	<2	1	1		10/20/17 21:52
11M22555	L17100710-10 A 826-SPE	<2	1	1		10/20/17 22:22
11M22556	L17100710-11 A 826-SPE	<2	1	1		10/20/17 22:51
11M22557	L17100710-12 A 826-SPE	<2	1	1		10/20/17 23:20
11M22558	L17100710-13 A 826-SPE	<2	1	1		10/20/17 23:49
11M22559	L17100710-14 A 826-SPE	<2	1	1		10/21/17 00:19
11M22560	RINSE	NA	1	1		10/21/17 00:48
11M22561	WG634877-04 BLK 2 624-SPE	NA	1	1		10/21/17 01:18
11M22562	L17101164-01 B 624-SPE	7	2	1		10/21/17 01:47
11M22563	L17101164-02 B 5X 624-SPE	6	2	5		10/21/17 02:16
11M22564	L17101205-01 A 624-SPE	<2	2	1		10/21/17 02:45
11M22565	L17101220-01 A 624-SPE	<2	2	1		10/21/17 03:15
11M22566	L17101233-01 A 624-SPE2	<2	2	1		10/21/17 03:44
11M22567	L17101251-02 A 624-SPE2	11	2	1		10/21/17 04:13
11M22568	L17101252-02 A 624-SPE2	6	2	1		10/21/17 04:42

Approved: October 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 102017
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634877

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22569	CCV	NA	2	1		10/21/17 05:11
11M22570	RINSE	NA	2	1		10/21/17 05:40
11M22571	RINSE	NA	2	1		10/21/17 06:09

Comments

Seq.	Rerun	Dil.	Reason	Analytes
13	X	1		
File ID: 11M22547				
L17100710-01 RERUN AT 1X FOR C/O.				
33	X	100	Over Calibration Range	11 CMPDS
File ID: 11M22567				
L17101251-02 RERUN AT 10X FOR 11 COMPOUNDS INCLUDING TOLUENE.				
34	X	1	Carry-over contamination	
File ID: 11M22568				
L17101252-02 RERUN FOR CARRYOVER.				

Approved: October 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54368

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84517 MS/MSD: STD84517

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635011; WG635053

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150882	WG635010-01 50ng BFB STD 8260	NA	1	1	STD84515	10/23/17 10:25
6M150883	WG635010-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/23/17 10:50
6M150884	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/23/17 11:22
6M150885	WG635011-01 BLK 1023 STD 8260	NA	1	1		10/23/17 11:52
6M150886	WG635011-02 20ug/L LCS STD 8260	NA	1	1	STD84517	10/23/17 12:21
6M150887	L17101282-02 A TB 826-BETX	<2	1	1		10/23/17 12:49
6M150888	L17100891-01 B TB 826-SPE	<2	1	1		10/23/17 13:19
6M150889	L17100891-03 B 826-SPE	<2	1	1		10/23/17 13:49
6M150890	L17100710-04 TB A 826-SPE	<2	1	1		10/23/17 14:18
6M150891	L17100710-15 A 826-SPE	<2	1	1		10/23/17 14:47
6M150892	L17100710-16 A 826-SPE	<2	1	1		10/23/17 15:17
6M150893	L17100710-17 A 826-SPE	<2	1	1		10/23/17 15:47
6M150894	L17100710-18 A 826-SPE	<2	1	1		10/23/17 16:17
6M150895	L17100710-19 A RS 826-SPE	<2	1	1		10/23/17 16:47
6M150896	L17100710-20 A MS 826-SPE	<2	1	1	STD84517	10/23/17 17:16
6M150897	L17100710-21 A MSD 826-SPE	<2	1	1	STD84517	10/23/17 17:45
6M150898	L17101005-01 A 10X 826-TC	<2	17	10		10/23/17 18:15
6M150899	L17100670-01 B 100X 8260	<2	1	100		10/23/17 18:45
6M150900	L17100891-20 B 2500X D1 826-SPE	<2	1	2500		10/23/17 19:15
6M150901	L17100891-24 B 20X D1 826-SPE	<2	1	20		10/23/17 19:45
6M150902	L17101282-01 A 826-BETX	<2	1	1		10/23/17 20:14
6M150903	L17101064-20 A 826-LOW	<2	2	1		10/23/17 20:44
6M150904	L17101208-01 A 826-SPE	<2	1	1		10/23/17 21:14
6M150905	L17100839-01 2.5X C 826-SPE	4	1	2.5		10/23/17 21:44
6M150906	L17100710-22 A 50X 826-SPE	<2	1	50		10/23/17 22:13
6M150907	WG635053-02 20ug/L LCS STD 624	NA	2	1	STD84517	10/23/17 22:43
6M150908	WG635053-03 20ug/L LCS2 STD 624	NA	2	1	STD84517	10/23/17 23:13
6M150909	RINSE	NA	2	1		10/23/17 23:43
6M150910	WG635053-01 BLK 1023 STD 624	NA	2	1		10/24/17 00:12
6M150911	L17101267-15 A TB 624-SPE1	5	2	1		10/24/17 00:42
6M150912	L17101267-13 A EB 624-SPE1	5	2	1		10/24/17 01:12
6M150913	L17101269-05 A TB 624-SPE1	5	2	1		10/24/17 01:42
6M150914	L17101252-02 B 624-SPE	6	2	1		10/24/17 02:12
6M150915	L17101269-03 A 624-SPE1	7	2	1		10/24/17 02:42

Approved: October 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54368

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84517 MS/MSD: STD84517

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635011; WG635053

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150916	L17101267-07 A RS 624-SPE1	7	2	1		10/24/17 03:11
6M150917	L17101267-09 A MS 624-SPE1	7	2	1	STD84517	10/24/17 03:41
6M150918	L17101267-11 A MSD 624-SPE1	7	2	1	STD84517	10/24/17 04:11
6M150919	L17101269-01 A 5X 624-SPE1	6	2	5		10/24/17 04:41
6M150920	CCV	NA	1	1		10/24/17 05:11
6M150921	RINSE	NA	1	1		10/24/17 05:41
6M150922	WG634509-01 A FBLK 10X 826-TC-SPE	NA	17	10		10/24/17 06:11

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 6M150884				
	Not needed, DNR.			
24				
File ID: 6M150905				
	L17100839-01 had brown sediment. Vial got cracked and volume was lost.			

Approved: October 24, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 102417
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635230 WG635278

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22619	WG635229-01 50ng BFB 8260	NA	1	1	STD84515	10/24/17 11:26
11M22620	WG635229-02 50ug/L CCV 8260	NA	1	1	STD84376	10/24/17 11:50
11M22621	WG000000-01 100ug/L A9 CCV 8260	NA	1	1	STDXXXXX	10/24/17 12:20
11M22622	WG635230-01 BLANK 1024 8260	NA	1	1		10/24/17 12:50
11M22623	L17100710-01 B 826-SPE	<2	1	1		10/24/17 13:19
11M22624	WG635230-02 20ug/L LCS 8260	NA	1	1	STD84517	10/24/17 13:50
11M22625	WG635230-03 20ug/L LCS2 8260	NA	1	1	STD84517	10/24/17 14:19
11M22626	L17101253-01 A 10X W/AF 826-TC	<2	17	10		10/24/17 14:49
11M22627	L17101253-02 A 10X W/AF 826-TC	<2	17	10		10/24/17 15:19
11M22628	L17101253-03 A 10X W/AF 826-TC	<2	17	10		10/24/17 15:49
11M22629	L17101038-03 B 826-SPE	<2	1	1		10/24/17 16:19
11M22630	L17101038-04 B 826-SPE	<2	1	1		10/24/17 16:49
11M22631	RINSE	NA	1	1		10/24/17 17:18
11M22632	WG634955-01 FB 826-TC	<2	17	10		10/24/17 17:48
11M22633	RINSE	NA	17	10		10/24/17 18:18
11M22634	WG635278-01 BLANK 50X 826-TC	NA	17	50		10/24/17 18:48
11M22635	WG635278-02 LCS 50X 20ug/mL 826-TC	NA	17	50		10/24/17 19:18
11M22636	RINSE	NA	17	1		10/24/17 19:47
11M22637	L17101006-01 REF 5000X 826-TC	NA	17	500		10/24/17 20:17
11M22638	WG635278-04 DUP 5000X 826-TC	NA	17	5000		10/24/17 20:46
11M22639	L17101007-01 500X 826-TC	NA	17	500		10/24/17 21:16
11M22640	L17101102-01 500X 826-TC	NA	17	500		10/24/17 21:46
11M22641	L17101102-02 500X 826-TC	NA	17	500		10/24/17 22:15
11M22642	RINSE	NA	17	500		10/24/17 22:44
11M22643	WG635230-04 BLANK 2 624-SPE	NA	2	1		10/24/17 23:13
11M22644	L17101380-07 TB 624-SPE	<2	2	1		10/24/17 23:43
11M22645	L17101389-04 TB 624-SPE	<2	2	1		10/25/17 00:12
11M22646	L17101251-02 500X 2 624-SPE	11	2	500		10/25/17 00:41
11M22647	L17101351-01 A 624-SPE	6	2	1		10/25/17 01:10
11M22648	L17101351-02 A 624-SPE	6	2	1		10/25/17 01:40
11M22649	L17101351-03 A 624-SPE	6	2	1		10/25/17 02:09
11M22650	L17101351-04 A 624-SPE	6	2	1		10/25/17 02:39
11M22651	L17101389-01 A 624-SPE	<2	2	1		10/25/17 03:08
11M22652	L17101389-02 A 624-SPE	<2	2	1		10/25/17 03:37

Approved: October 26, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 102417
Analyst1: HRF Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 25,0
Method: 5035, 5030B, 5030C SOP: PAT01, OVAP PAT01 Rev: 19,1

Maintenance Log ID:

Internal Standard: STD84372 Surrogate Standard: STD84374
CCV: STD84376 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635230 WG635278

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M22653	L17101389-03 A 624-SPE	<2	2	1		10/25/17 04:07
11M22654	L17101380-01 A 624-SPE	<2	2	1		10/25/17 04:36
11M22655	L17101380-03 A 624-SPE	<2	2	1		10/25/17 05:05
11M22656	L17101380-05 A 624-SPE	<2	2	1		10/25/17 05:35
11M22657	CCV	NA	2	1		10/25/17 06:04
11M22658	RINSE	NA	2	1		10/25/17 06:33
11M22659	RINSE	NA	2	1		10/25/17 07:03

Comments

Seq.	Rerun	Dil.	Reason	Analytes
22	X	1000	Over Calibration Range	124 TMB, NAPH
File ID: 11M22640				
L17101102-01 RERUN AT 1000X				
28	X	1000	Over Calibration Range	TOLUENE
File ID: 11M22646				
L17101251-02 RERUN AT 1000X				

Approved: October 26, 2017

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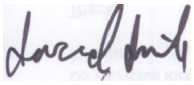
Microbac Laboratories Inc.

Data Checklist

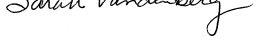
Date: 22-JUN-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 82939
Analytical Workgroups: WG618911

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
23-JUN-2017



Secondary Reviewer:
23-JUN-2017



CHECKLIST1 - Modified 03/05/2008
Generated: JUN-23-2017 13:08:29

Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017

Secondary Reviewer:
11-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

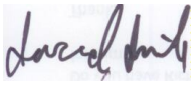
Microbac Laboratories Inc.

Data Checklist

Date: 12-OCT-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85262
Analytical Workgroups: WG633647

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
14-OCT-2017



Secondary Reviewer:
16-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-16-2017 11:32:33

Microbac Laboratories Inc.

Data Checklist

Date: 20-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85418
Analytical Workgroups: WG634877

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
25-OCT-2017

Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-25-2017 13:14:03

Microbac Laboratories Inc.

Data Checklist

Date: 23-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85446
Analytical Workgroups: WG635011; WG635053

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-OCT-2017
Tiffany Bailey

Secondary Reviewer:
24-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-24-2017 15:00:47

Microbac Laboratories Inc.

Data Checklist

Date: 25-OCT-2017
Analyst: HRF
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 85481
Analytical Workgroups: WG635230 WG635278

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	HRF
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	HRF
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
25-OCT-2017

Heather R. Fairchild

Secondary Reviewer:
26-OCT-2017

Cathy Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-26-2017 12:54:55

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG634877

Login Number: L17100710

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DUP-10-LA-26	02	10/10/17					10/20/2017	10	14		10/20/17	10	14	
DUP-14-LA-26	03	10/10/17					10/20/2017	10.1	14		10/20/17	10.1	14	
MW-25A-LA-26	05	10/10/17					10/20/2017	10.1	14		10/20/17	10.1	14	
MW-39A-LA-26	06	10/10/17					10/20/2017	10.1	14		10/20/17	10.1	14	
MW-52-LA-26	07	10/10/17					10/20/2017	10.2	14		10/20/17	10.2	14	
MW-96-LA-26	08	10/10/17					10/20/2017	10.2	14		10/20/17	10.2	14	
MW-97-LA-26	09	10/10/17					10/20/2017	10.2	14		10/20/17	10.2	14	
MW-203B-LA-26	10	10/10/17					10/20/2017	10.3	14		10/20/17	10.3	14	
MW-259-LA-26	11	10/10/17					10/20/2017	10.2	14		10/20/17	10.2	14	
MW-261-LA-26	12	10/10/17					10/20/2017	10.2	14		10/20/17	10.2	14	
MW-274-LA-26	13	10/10/17					10/20/2017	10.3	14		10/20/17	10.3	14	
MW-277-LA-26	14	10/10/17					10/21/2017	10.2	14		10/21/17	10.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5541634
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG635011

Login Number: L17100710

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
LTM-TB4-LA-26	04	10/10/17					10/23/2017	12.9	14		10/23/17	12.9	14	
DUP-7-LA-26	15	10/10/17					10/23/2017	12.8	14		10/23/17	12.8	14	
MW-253-LA-26	16	10/10/17					10/23/2017	12.8	14		10/23/17	12.8	14	
MW-283-LA-26	17	10/10/17					10/23/2017	12.8	14		10/23/17	12.8	14	
DUP-13-LA-26	18	10/10/17					10/23/2017	12.9	14		10/23/17	12.9	14	
MW-143-LA-26	19	10/10/17					10/23/2017	12.9	14		10/23/17	12.9	14	
MW-143-LA-26-MS	20	10/10/17					10/23/2017	12.9	14		10/23/17	12.9	14	
MW-143-LA-26-MSD	21	10/10/17					10/23/2017	12.9	14		10/23/17	12.9	14	
DR2-5-LA-26	22	10/10/17					10/23/2017	13.1	14		10/23/17	13.1	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5541634
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG635230

Login Number: L17100710

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR2-3-LA-26	01	10/10/17					10/24/2017	13.9	14		10/24/17	13.9	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5541634
Report generated 10/26/2017 12:50

Login Number: L17100710
Instrument Id: HPMS11
Workgroup (AAB#): WG634877

Method: 8260
CAL ID: HPMS11-12-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100710-02	1.00	01	109	106	113	109
L17100710-03	1.00	01	104	104	107	105
L17100710-05	1.00	01	107	106	105	105
L17100710-06	1.00	01	104	101	108	105
L17100710-07	1.00	01	105	106	110	105
L17100710-08	1.00	01	105	104	106	104
L17100710-09	1.00	01	107	108	105	105
L17100710-10	1.00	01	105	105	107	105
L17100710-11	1.00	01	105	105	111	105
L17100710-12	1.00	01	105	105	105	105
L17100710-13	1.00	01	107	107	106	105
L17100710-14	1.00	01	108	106	106	104
WG634877-01	1.00	01	104	104	105	105
WG634877-02	1.00	01	103	106	107	107
WG634877-03	1.00	01	102	103	106	105
WG634877-04	1.00	01	106	105	108	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5541643
Report generated: 10/26/2017 12:51

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100710 **Method:** 8260
Instrument Id: HPMS11 **CAL ID:** HPMS11-12-OCT-17
Workgroup (AAB#): WG635230 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17100710-01	1.00	02	107	106	112	106
WG635230-01	1.00	01	106	102	110	105
WG635230-02	1.00	01	108	108	107	108
WG635230-03	1.00	01	105	105	104	105
WG635230-04	1.00	01	104	102	109	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5541643
Report generated: 10/26/2017 12:51

Login Number: L17100710
Instrument Id: HPMS6
Workgroup (AAB#): WG635011

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100710-04	1.00	01	112	106	99.8	98.4
L17100710-15	1.00	01	112	106	96.7	99.4
L17100710-16	1.00	01	112	105	97.7	99.2
L17100710-17	1.00	01	112	106	98.9	99.3
L17100710-18	1.00	01	110	105	101	99.6
L17100710-19	1.00	01	111	106	99.0	98.7
L17100710-20	1.00	01	109	105	95.7	99.2
L17100710-21	1.00	01	108	104	95.6	98.7
L17100710-22	50.0	DL01	110	107	98.0	100
WG635011-01	1.00	01	111	104	101	98.1
WG635011-02	1.00	01	109	104	99.1	99.8

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5541643
Report generated: 10/26/2017 12:51

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100710
Work Group: WG634877
Blank File ID: 11M22539
Blank Sample ID: WG634877-01
Prep Date: 10/20/17 14:31
Instrument ID: HPMS11
Analyzed Date: 10/20/17 14:31
Method: 8260B
Analyst: HRF/TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634877-02	11M22545	10/20/17 17:28	01
LCS2	WG634877-03	11M22546	10/20/17 17:57	01
DUP-10-LA-26	L17100710-02	11M22548	10/20/17 18:55	01
DUP-14-LA-26	L17100710-03	11M22549	10/20/17 19:25	01
MW-25A-LA-26	L17100710-05	11M22550	10/20/17 19:54	01
MW-39A-LA-26	L17100710-06	11M22551	10/20/17 20:24	01
MW-52-LA-26	L17100710-07	11M22552	10/20/17 20:53	01
MW-96-LA-26	L17100710-08	11M22553	10/20/17 21:23	01
MW-97-LA-26	L17100710-09	11M22554	10/20/17 21:52	01
MW-203B-LA-26	L17100710-10	11M22555	10/20/17 22:22	01
MW-259-LA-26	L17100710-11	11M22556	10/20/17 22:51	01
MW-261-LA-26	L17100710-12	11M22557	10/20/17 23:20	01
MW-274-LA-26	L17100710-13	11M22558	10/20/17 23:49	01
MW-277-LA-26	L17100710-14	11M22559	10/21/17 00:19	01

Report Name: BLANK_SUMMARY
PDF File ID: 5541635
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100710	**Work Group:**	WG635230
Blank File ID:	11M22622	**Blank Sample ID:**	WG635230-01
Prep Date:	10/24/17 12:50	**Instrument ID:**	HPMS11
Analyzed Date:	10/24/17 12:50	**Method:**	8260B
Analyst:	HRF/TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
DR2-3-LA-26	L17100710-01	11M22623	10/24/17 13:19	02
LCS	WG635230-02	11M22624	10/24/17 13:50	01
LCS2	WG635230-03	11M22625	10/24/17 14:19	01

Report Name: BLANK_SUMMARY
PDF File ID: 5541635
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100710
Work Group: WG635011
Blank File ID: 6M150885
Blank Sample ID: WG635011-01
Prep Date: 10/23/17 11:52
Instrument ID: HPMS6
Analyzed Date: 10/23/17 11:52
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG635011-02	6M150886	10/23/17 12:21	01
LTM-TB4-LA-26	L17100710-04	6M150890	10/23/17 14:18	01
DUP-7-LA-26	L17100710-15	6M150891	10/23/17 14:47	01
MW-253-LA-26	L17100710-16	6M150892	10/23/17 15:17	01
MW-283-LA-26	L17100710-17	6M150893	10/23/17 15:47	01
DUP-13-LA-26	L17100710-18	6M150894	10/23/17 16:17	01
MW-143-LA-26	L17100710-19	6M150895	10/23/17 16:47	01
MW-143-LA-26-MS	L17100710-20	6M150896	10/23/17 17:16	01
MW-143-LA-26-MSD	L17100710-21	6M150897	10/23/17 17:45	01
DR2-5-LA-26	L17100710-22	6M150906	10/23/17 22:13	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5541635
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100710 Prep Date:10/20/17 14:31 Sample ID:WG634877-01
Instrument ID:HPMS11 Run Date:10/20/17 14:31 Prep Method:5030B/5030C/503
File ID:11M22539 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG634877 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5541636
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100710 Prep Date: 10/20/17 14:31 Sample ID: WG634877-01
Instrument ID: HPMS11 Run Date: 10/20/17 14:31 Prep Method: 5030B/5030C/503
File ID: 11M22539 Analyst: HRF/TMB Method: 8260B
Workgroup (AAB#): WG634877 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	104	72	-	119	PASS
Toluene-d8	105	81	-	120	PASS
4-Bromofluorobenzene	105	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5541636
26-OCT-2017 12:50

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100710 Prep Date:10/24/17 12:50 Sample ID:WG635230-01
Instrument ID:HPMS11 Run Date:10/24/17 12:50 Prep Method:5030B/5030C/503
File ID:11M22622 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG635230 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100710 Prep Date:10/24/17 12:50 Sample ID:WG635230-01
Instrument ID:HPMS11 Run Date:10/24/17 12:50 Prep Method:5030B/5030C/503
File ID:11M22622 Analyst:HRF/TMB Method:8260B
Workgroup (AAB#):WG635230 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-12-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	102	85	-	115	PASS
1,2-Dichloroethane-d4	106	72	-	119	PASS
Toluene-d8	105	81	-	120	PASS
4-Bromofluorobenzene	110	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5541636
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100710 Prep Date:10/23/17 11:52 Sample ID:WG635011-01
Instrument ID:HPMS6 Run Date:10/23/17 11:52 Prep Method:5030B/5030C/503
File ID:6M150885 Analyst:TMB Method:8260B
Workgroup (AAB#):WG635011 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5541636
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100710 Prep Date: 10/23/17 11:52 Sample ID: WG635011-01
Instrument ID: HPMS6 Run Date: 10/23/17 11:52 Prep Method: 5030B/5030C/503
File ID: 6M150885 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	111	72	-	119	PASS
Toluene-d8	98.1	81	-	120	PASS
4-Bromofluorobenzene	101	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5541636
26-OCT-2017 12:50

Login Number: L17100710 Run Date: 10/23/2017 Sample ID: WG635011-02
Instrument ID: HPMS6 Run Time: 12:21 Prep Method: 5030B/5030C/503
File ID: 6M150886 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84517 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.6	103	81 - 129	
1,1,1-Trichloroethane	20.0	22.3	111	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.7	93.7	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	21.4	107	68 - 130	
1,1-Dichloropropene	20.0	21.3	107	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.3	96.3	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.3	96.3	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.0	100	74 - 132	
1,2-Dichloroethane	20.0	22.8	114	69 - 132	
1,2-Dichlorobenzene	20.0	19.5	97.4	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	20.5	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.1	100	74 - 131	
1,3-Dichlorobenzene	20.0	19.3	96.4	75 - 124	
1,3-Dichloropropane	20.0	20.8	104	73 - 126	
1,4-Dichlorobenzene	20.0	18.5	92.5	74 - 123	
1,4-Dioxane	200	174	87.1	60 - 140	
1-Chlorohexane	20.0	19.3	96.5	70 - 125	
2,2-Dichloropropane	20.0	20.7	103	69 - 137	
2-Hexanone	20.0	20.5	102	55 - 130	
2-Chlorotoluene	20.0	19.9	99.7	73 - 126	
4-Chlorotoluene	20.0	19.0	95.1	74 - 128	
Acetone	20.0	23.3	117	40 - 135	
Benzene	20.0	20.0	100	81 - 122	
Bromobenzene	20.0	19.2	96.2	76 - 124	
Bromochloromethane	20.0	21.3	107	65 - 129	
Bromodichloromethane	20.0	20.8	104	76 - 121	
Bromoform	20.0	18.9	94.4	69 - 128	
Bromomethane	20.0	10.9	54.4	30 - 141	
Carbon disulfide	20.0	17.2	86.2	58 - 128	
Carbon tetrachloride	20.0	22.5	112	66 - 138	
Chlorobenzene	20.0	19.9	99.4	81 - 122	
Chloroethane	20.0	14.8	74.0	58 - 133	
Chloroform	20.0	20.9	105	69 - 128	
Chloromethane	20.0	23.2	116	56 - 131	
cis-1,2-Dichloroethene	20.0	20.7	103	72 - 126	
cis-1,3-Dichloropropene	20.0	22.7	114	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5543371
Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100710 Run Date: 10/23/2017 Sample ID: WG635011-02
Instrument ID: HPMS6 Run Time: 12:21 Prep Method: 5030B/5030C/503
File ID: 6M150886 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84517 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.0	99.8	66 - 133	
Dibromomethane	20.0	21.9	110	76 - 125	
Dichlorodifluoromethane	20.0	24.4	122	30 - 153	
Ethylbenzene	20.0	20.1	101	73 - 127	
Hexachlorobutadiene	20.0	17.1	85.5	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	19.5	97.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.4	102	65 - 123	
MEK (2-Butanone)	20.0	21.7	108	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.1	100	58 - 134	
n-Butylbenzene	20.0	18.7	93.6	69 - 137	
n-Propylbenzene	20.0	20.3	101	72 - 129	
m-,p-Xylene	40.0	39.9	99.7	76 - 128	
Naphthalene	20.0	20.8	104	54 - 138	
o-Xylene	20.0	20.5	102	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.4	73 - 130	
sec-Butylbenzene	20.0	19.1	95.7	72 - 127	
Styrene	20.0	21.1	105	65 - 134	
Trichloroethene	20.0	20.7	104	70 - 127	
tert-Butylbenzene	20.0	19.7	98.7	70 - 129	
Tetrachloroethene	20.0	19.9	99.3	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	20.8	104	63 - 137	
trans-1,3-Dichloropropene	20.0	20.8	104	59 - 135	
Trichlorofluoromethane	20.0	21.5	107	57 - 129	
Vinyl chloride	20.0	24.1	120	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	109	72 - 119	PASS
Toluene-d8	99.8	81 - 120	PASS
4-Bromofluorobenzene	99.1	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5543371
Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100710 Analyst: HRF/TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS11 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634877 Units: ug/L
QC Key: AF40 Lot #: STD84357

Sample ID: WG634877-02 LCS File ID: 11M22545 Run Date: 10/20/2017 17:28
Sample ID: WG634877-03 LCS2 File ID: 11M22546 Run Date: 10/20/2017 17:57

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.5	103	20.0	19.4	96.9	5.76	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.3	106	20.0	19.8	99.1	7.07	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	20.0	20.2	101	3.93	63 - 128	20	
1,1,2-Trichloroethane	20.0	21.8	109	20.0	20.5	102	6.11	75 - 125	20	
1,1-Dichloroethane	20.0	21.4	107	20.0	20.1	100	6.35	69 - 133	20	
1,1-Dichloroethene	20.0	21.6	108	20.0	20.0	100	7.59	68 - 130	20	
1,1-Dichloropropene	20.0	22.9	114	20.0	20.8	104	9.57	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	23.6	118	20.0	21.0	105	11.7	67 - 137	20	
1,2,3-Trichloropropane	20.0	22.2	111	20.0	20.9	105	6.19	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	23.5	118	20.0	21.6	108	8.65	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	22.6	113	20.0	20.6	103	9.07	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	22.7	114	20.0	20.4	102	10.8	50 - 132	20	
1,2-Dibromoethane	20.0	21.8	109	20.0	20.3	101	7.55	80 - 121	20	
1,2-Dichlorobenzene	20.0	23.1	115	20.0	20.7	103	11.0	71 - 122	20	
1,2-Dichloroethane	20.0	21.6	108	20.0	19.6	98.2	9.41	69 - 132	20	
1,2-Dichloropropane	20.0	22.4	112	20.0	20.5	102	8.83	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	23.0	115	20.0	20.8	104	9.98	74 - 131	20	
1,3-Dichlorobenzene	20.0	22.3	111	20.0	20.6	103	7.75	75 - 124	20	
1,3-Dichloropropane	20.0	23.0	115	20.0	21.3	106	7.82	73 - 126	20	
1,4-Dichlorobenzene	20.0	21.4	107	20.0	19.8	99.2	7.83	74 - 123	20	
1,4-Dioxane	200	193	96.4	200	180	90.1	6.71	60 - 140	20	
1-Chlorohexane	20.0	22.5	112	20.0	21.6	108	3.83	70 - 125	20	
2,2-Dichloropropane	20.0	18.1	90.4	20.0	19.5	97.6	7.72	69 - 137	20	
MEK (2-Butanone)	20.0	22.4	112	20.0	20.9	104	7.10	49 - 136	20	
2-Chlorotoluene	20.0	21.9	109	20.0	20.3	102	7.35	73 - 126	20	
2-Hexanone	20.0	22.5	113	20.0	20.9	104	7.44	55 - 130	20	
4-Chlorotoluene	20.0	22.5	112	20.0	20.5	103	9.15	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	21.9	109	20.0	20.2	101	8.11	58 - 134	20	
Acetone	20.0	23.6	118	20.0	20.7	104	13.3	40 - 135	20	
Benzene	20.0	21.6	108	20.0	20.0	99.9	7.82	81 - 122	20	
Bromobenzene	20.0	21.4	107	20.0	19.5	97.7	9.09	76 - 124	20	
Bromochloromethane	20.0	21.4	107	20.0	20.1	101	6.12	65 - 129	20	
Bromodichloromethane	20.0	21.2	106	20.0	20.0	100	5.79	76 - 121	20	
Bromoform	20.0	18.3	91.3	20.0	17.3	86.5	5.44	69 - 128	20	
Bromomethane	20.0	24.4	122	20.0	23.1	116	5.52	30 - 141	20	
Carbon disulfide	20.0	19.5	97.6	20.0	18.2	91.2	6.76	58 - 128	20	
Carbon tetrachloride	20.0	21.0	105	20.0	19.7	98.4	6.62	66 - 138	20	
Chlorobenzene	20.0	21.7	108	20.0	20.3	102	6.51	81 - 122	20	
Chloroethane	20.0	23.3	116	20.0	22.1	111	5.15	58 - 133	20	
Chloroform	20.0	22.9	115	20.0	20.0	99.8	13.9	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
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Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100710 Analyst: HRF/TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS11 Matrix: Water Method: 8260B
Workgroup (AAB#): WG634877 Units: ug/L
QC Key: AF40 Lot #: STD84357

Sample ID: WG634877-02 LCS File ID: 11M22545 Run Date: 10/20/2017 17:28
Sample ID: WG634877-03 LCS2 File ID: 11M22546 Run Date: 10/20/2017 17:57

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	22.3	111	20.0	21.1	105	5.47	56 - 131	20	
cis-1,2-Dichloroethene	20.0	20.7	103	20.0	19.3	96.6	6.83	72 - 126	20	
cis-1,3-Dichloropropene	20.0	23.5	117	20.0	22.7	114	3.40	69 - 131	20	
Dibromochloromethane	20.0	21.0	105	20.0	19.3	96.6	8.44	66 - 133	20	
Dibromomethane	20.0	21.8	109	20.0	20.1	100	8.29	76 - 125	20	
Dichlorodifluoromethane	20.0	24.6	123	20.0	22.6	113	8.46	30 - 153	20	
Ethylbenzene	20.0	22.3	112	20.0	20.5	102	8.69	73 - 127	20	
Hexachlorobutadiene	20.0	20.5	103	20.0	19.0	94.8	7.98	67 - 131	20	
Isopropylbenzene	20.0	23.0	115	20.0	21.3	106	7.59	75 - 127	20	
m-,p-Xylene	40.0	45.8	114	40.0	42.8	107	6.87	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	21.2	106	20.0	20.0	99.9	5.78	65 - 123	20	
Methylene chloride	20.0	21.4	107	20.0	19.0	95.2	11.9	63 - 137	20	
n-Butylbenzene	20.0	22.9	115	20.0	21.2	106	7.74	69 - 137	20	
n-Propylbenzene	20.0	23.9	120	20.0	21.8	109	9.27	72 - 129	20	
Naphthalene	20.0	24.6	123	20.0	22.1	111	10.5	54 - 138	20	
o-Xylene	20.0	23.2	116	20.0	21.7	108	6.90	80 - 121	20	
p-Isopropyltoluene	20.0	22.1	110	20.0	20.3	101	8.57	73 - 130	20	
sec-Butylbenzene	20.0	22.2	111	20.0	20.1	101	9.66	72 - 127	20	
Styrene	20.0	21.9	110	20.0	20.5	103	6.56	65 - 134	20	
tert-Butylbenzene	20.0	21.7	109	20.0	20.2	101	7.57	70 - 129	20	
Tetrachloroethene	20.0	20.9	104	20.0	19.5	97.5	6.80	66 - 128	20	
Toluene	20.0	21.7	108	20.0	20.4	102	6.30	77 - 122	20	
trans-1,2-Dichloroethene	20.0	20.9	105	20.0	19.6	98.1	6.30	63 - 137	20	
trans-1,3-Dichloropropene	20.0	21.4	107	20.0	20.3	102	5.01	59 - 135	20	
Trichloroethene	20.0	20.7	104	20.0	18.6	93.1	10.7	70 - 127	20	
Trichlorofluoromethane	20.0	19.9	99.5	20.0	19.1	95.4	4.20	57 - 129	20	
Vinyl chloride	20.0	23.6	118	20.0	24.5	122	3.54	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	103	102	72 - 119	PASS
Dibromofluoromethane	106	103	85 - 115	PASS
4-Bromofluorobenzene	107	106	76 - 119	PASS
Toluene-d8	107	105	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5541637
Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100710 Analyst: HRF/TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS11 Matrix: Water Method: 8260B
Workgroup (AAB#): WG635230 Units: ug/L
QC Key: AF40 Lot #: STD84517

Sample ID: WG635230-02 LCS File ID: 11M22624 Run Date: 10/24/2017 13:50
Sample ID: WG635230-03 LCS2 File ID: 11M22625 Run Date: 10/24/2017 14:19

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	20.7	103	20.0	20.1	101	2.84	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.9	109	20.0	20.9	105	4.55	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	23.0	115	20.0	22.0	110	4.41	63 - 128	20	
1,1,2-Trichloroethane	20.0	22.7	113	20.0	21.6	108	4.67	75 - 125	20	
1,1-Dichloroethane	20.0	21.6	108	20.0	20.9	105	3.07	69 - 133	20	
1,1-Dichloroethene	20.0	22.3	112	20.0	21.8	109	2.30	68 - 130	20	
1,1-Dichloropropene	20.0	23.2	116	20.0	22.1	110	4.94	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	23.7	119	20.0	23.0	115	3.25	67 - 137	20	
1,2,3-Trichloropropane	20.0	24.4	122	20.0	22.5	112	8.29	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	24.2	121	20.0	22.8	114	5.89	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	22.8	114	20.0	22.3	111	2.11	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	23.2	116	20.0	22.6	113	2.95	50 - 132	20	
1,2-Dibromoethane	20.0	22.7	113	20.0	21.9	110	3.37	80 - 121	20	
1,2-Dichlorobenzene	20.0	23.2	116	20.0	22.6	113	2.87	71 - 122	20	
1,2-Dichloroethane	20.0	22.5	112	20.0	21.2	106	5.56	69 - 132	20	
1,2-Dichloropropane	20.0	22.5	113	20.0	21.6	108	3.90	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	23.7	118	20.0	22.7	114	4.05	74 - 131	20	
1,3-Dichlorobenzene	20.0	22.7	114	20.0	21.9	109	3.82	75 - 124	20	
1,3-Dichloropropane	20.0	23.0	115	20.0	22.4	112	2.84	73 - 126	20	
1,4-Dichlorobenzene	20.0	21.9	109	20.0	21.2	106	3.22	74 - 123	20	
1,4-Dioxane	200	209	105	200	200	100	4.58	60 - 140	20	
1-Chlorohexane	20.0	22.8	114	20.0	21.3	107	6.46	70 - 125	20	
2,2-Dichloropropane	20.0	20.3	102	20.0	18.0	90.1	12.0	69 - 137	20	
MEK (2-Butanone)	20.0	23.3	116	20.0	23.2	116	0.424	49 - 136	20	
2-Chlorotoluene	20.0	20.9	104	20.0	19.9	99.7	4.56	73 - 126	20	
2-Hexanone	20.0	23.6	118	20.0	22.2	111	6.30	55 - 130	20	
4-Chlorotoluene	20.0	24.5	122	20.0	23.5	118	3.88	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	21.4	107	20.0	22.0	110	3.19	58 - 134	20	
Acetone	20.0	23.6	118	20.0	23.0	115	2.64	40 - 135	20	
Benzene	20.0	22.4	112	20.0	21.2	106	5.41	81 - 122	20	
Bromobenzene	20.0	21.7	109	20.0	21.2	106	2.31	76 - 124	20	
Bromochloromethane	20.0	22.6	113	20.0	21.3	106	6.01	65 - 129	20	
Bromodichloromethane	20.0	21.8	109	20.0	20.7	104	4.93	76 - 121	20	
Bromoform	20.0	19.5	97.5	20.0	18.3	91.4	6.46	69 - 128	20	
Bromomethane	20.0	25.5	128	20.0	23.9	120	6.38	30 - 141	20	
Carbon disulfide	20.0	19.3	96.6	20.0	19.1	95.4	1.29	58 - 128	20	
Carbon tetrachloride	20.0	21.6	108	20.0	20.9	104	3.68	66 - 138	20	
Chlorobenzene	20.0	22.0	110	20.0	20.8	104	5.59	81 - 122	20	
Chloroethane	20.0	23.3	116	20.0	22.4	112	3.82	58 - 133	20	
Chloroform	20.0	22.5	112	20.0	21.4	107	5.05	69 - 128	20	

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5541637
Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100710 Analyst: HRF/TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS11 Matrix: Water Method: 8260B
Workgroup (AAB#): WG635230 Units: ug/L
QC Key: AF40 Lot #: STD84517

Sample ID: WG635230-02 LCS File ID: 11M22624 Run Date: 10/24/2017 13:50
Sample ID: WG635230-03 LCS2 File ID: 11M22625 Run Date: 10/24/2017 14:19

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
Chloromethane	20.0	22.3	112	20.0	21.2	106	5.22	56 - 131	20	
cis-1,2-Dichloroethene	20.0	21.5	108	20.0	20.4	102	5.23	72 - 126	20	
cis-1,3-Dichloropropene	20.0	24.3	122	20.0	23.4	117	3.94	69 - 131	20	
Dibromochloromethane	20.0	21.6	108	20.0	20.5	102	5.45	66 - 133	20	
Dibromomethane	20.0	23.0	115	20.0	21.8	109	5.28	76 - 125	20	
Dichlorodifluoromethane	20.0	24.3	121	20.0	22.7	113	6.86	30 - 153	20	
Ethylbenzene	20.0	22.4	112	20.0	21.1	106	5.63	73 - 127	20	
Hexachlorobutadiene	20.0	20.9	105	20.0	20.5	103	1.86	67 - 131	20	
Isopropylbenzene	20.0	23.8	119	20.0	22.4	112	6.19	75 - 127	20	
m-,p-Xylene	40.0	47.2	118	40.0	45.2	113	4.25	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	21.4	107	20.0	21.2	106	1.13	65 - 123	20	
Methylene chloride	20.0	21.3	107	20.0	20.4	102	4.67	63 - 137	20	
n-Butylbenzene	20.0	23.5	118	20.0	22.4	112	4.73	69 - 137	20	
n-Propylbenzene	20.0	24.4	122	20.0	23.1	115	5.49	72 - 129	20	
Naphthalene	20.0	25.4	127	20.0	24.7	124	2.66	54 - 138	20	
o-Xylene	20.0	23.8	119	20.0	22.3	112	6.50	80 - 121	20	
p-Isopropyltoluene	20.0	23.0	115	20.0	21.8	109	5.06	73 - 130	20	
sec-Butylbenzene	20.0	22.7	114	20.0	21.6	108	5.10	72 - 127	20	
Styrene	20.0	22.4	112	20.0	21.5	107	4.45	65 - 134	20	
tert-Butylbenzene	20.0	22.9	114	20.0	21.2	106	7.43	70 - 129	20	
Tetrachloroethene	20.0	22.2	111	20.0	20.4	102	8.39	66 - 128	20	
Toluene	20.0	22.4	112	20.0	21.3	107	4.77	77 - 122	20	
trans-1,2-Dichloroethene	20.0	21.7	108	20.0	20.9	105	3.62	63 - 137	20	
trans-1,3-Dichloropropene	20.0	22.1	110	20.0	21.5	107	2.70	59 - 135	20	
Trichloroethene	20.0	20.9	105	20.0	20.1	101	3.82	70 - 127	20	
Trichlorofluoromethane	20.0	20.6	103	20.0	19.9	99.5	3.48	57 - 129	20	
Vinyl chloride	20.0	21.6	108	20.0	20.5	102	5.19	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	108	105	72 - 119	PASS
Dibromofluoromethane	108	105	85 - 115	PASS
4-Bromofluorobenzene	107	104	76 - 119	PASS
Toluene-d8	108	105	81 - 120	PASS

* EXCEEDS %REC LIMIT

EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
PDF File ID: 5541637
Report generated: 10/26/2017 12:50

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100710 Cal ID: HPMS6- 09-OCT-17 Worknum: WG635011

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100710-19 File ID: 6M150895 Dil: 1 Method: 5035A

Sample ID: L17100710-20 MS File ID: 6M150896 Dil: 1 Matrix: 8260B

Sample ID: L17100710-21 MSD File ID: 6M150897 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	20.8	104	20.0	20.6	103	1.19	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	22.1	111	20.0	21.5	108	2.79	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	18.8	94.2	20.0	18.6	93	1.25	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	20.1	101	20.0	19.7	98.4	2.17	75 - 125	20	
1,1-Dichloroethane	U	20.0	20.4	102	20.0	19.9	99.4	2.55	69 - 133	20	
1,1-Dichloroethene	U	20.0	20.8	104	20.0	20.1	101	3.44	68 - 130	20	
1,1-Dichloropropene	U	20.0	21.0	105	20.0	20.5	102	2.38	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	19.3	96.6	20.0	18.9	94.6	2.09	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.1	101	20.0	19.9	99.6	1.11	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	19.6	97.8	20.0	19.4	97.2	0.610	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	101	20.0	19.5	97.6	3.76	74 - 132	20	
1,2-Dichloroethane	U	20.0	23.1	115	20.0	22.8	114	1.24	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	19.9	99.5	20.0	19.4	96.9	2.66	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	20.0	100	20.0	20.5	103	2.64	50 - 132	20	
1,2-Dichloropropane	U	20.0	20.7	104	20.0	20.2	101	2.41	75 - 125	20	
1,2-Dibromoethane	U	20.0	20.5	103	20.0	20.4	102	0.538	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.2	101	20.0	19.6	98.1	3.04	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.7	98.7	20.0	19.0	95.1	3.72	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.0	105	20.0	20.5	103	2.10	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.9	94.4	20.0	18.3	91.3	3.28	74 - 123	20	
1,4-Dioxane	U	200	168	83.8	200	192	95.8	13.3	60 - 140	20	
1-Chlorohexane	U	20.0	19.1	95.4	20.0	19.0	95.1	0.262	70 - 125	20	
2,2-Dichloropropane	U	20.0	19.9	99.7	20.0	19.1	95.7	4.12	69 - 137	20	
2-Hexanone	U	20.0	19.9	99.4	20.0	20.0	100	0.827	55 - 130	20	
2-Chlorotoluene	U	20.0	19.7	98.6	20.0	19.3	96.4	2.19	73 - 126	20	
4-Chlorotoluene	U	20.0	19.4	96.8	20.0	18.5	92.4	4.70	74 - 128	20	
Acetone	6.85	20.0	29.3	112	20.0	28.4	108	3.13	40 - 135	20	
Benzene	U	20.0	20.2	101	20.0	19.7	98.4	2.62	81 - 122	20	
Bromobenzene	U	20.0	19.1	95.6	20.0	18.8	94.2	1.48	76 - 124	20	
Bromochloromethane	U	20.0	21.5	107	20.0	20.9	104	2.92	65 - 129	20	
Bromodichloromethane	U	20.0	21.3	107	20.0	20.8	104	2.39	76 - 121	20	
Bromoform	U	20.0	19.8	99.2	20.0	19.4	96.9	2.36	69 - 128	20	
Bromomethane	U	20.0	8.66	43.3	20.0	9.76	48.8	11.9	30 - 141	20	
Carbon disulfide	U	20.0	17.0	85.2	20.0	16.4	82.2	3.50	58 - 128	20	
Carbon tetrachloride	U	20.0	22.4	112	20.0	21.7	109	3.35	66 - 138	20	
Chlorobenzene	U	20.0	20.0	100	20.0	19.7	98.3	1.97	81 - 122	20	
Chloroethane	U	20.0	15.3	76.4	20.0	18.9	94.7	21.4	58 - 133	20	#
Chloroform	U	20.0	21.3	107	20.0	20.6	103	3.64	69 - 128	20	
Chloromethane	U	20.0	23.2	116	20.0	24.3	121	4.41	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	20.8	104	20.0	20.4	102	1.54	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.4	112	20.0	22.3	111	0.391	69 - 131	20	

MS_MSD - Modified 03/06/2008
PDF File ID: 5543372
Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100710 Cal ID: HPMS6 09-OCT-17 Worknum: WG635011

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100710-19 File ID: 6M150895 Dil: 1 Method: 5035A

Sample ID: L17100710-20 MS File ID: 6M150896 Dil: 1 Matrix: 8260B

Sample ID: L17100710-21 MSD File ID: 6M150897 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	20.4	102	20.0	20.3	101	0.412	66 - 133	20	
Dibromomethane	U	20.0	22.2	111	20.0	21.9	110	1.23	76 - 125	20	
Dichlorodifluoromethane	U	20.0	24.0	120	20.0	24.3	122	1.19	30 - 153	20	
Ethylbenzene	U	20.0	20.3	101	20.0	19.7	98.5	2.84	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.0	89.8	20.0	17.6	87.8	2.32	67 - 131	20	
Isopropylbenzene	U	20.0	20.2	101	20.0	19.8	99	2.22	75 - 127	20	
Methylene chloride	U	20.0	19.8	98.9	20.0	19.6	98	1.01	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.2	101	20.0	20.9	104	2.96	65 - 123	20	
MEK (2-Butanone)	U	20.0	21.3	106	20.0	21.5	107	0.995	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	17.7	88.4	20.0	17.7	88.7	0.343	58 - 134	20	
n-Butylbenzene	U	20.0	19.7	98.4	20.0	18.8	94.1	4.49	69 - 137	20	
n-Propylbenzene	U	20.0	20.2	101	20.0	19.6	97.9	3.22	72 - 129	20	
m-,p-Xylene	U	40.0	40.9	102	40.0	39.5	98.9	3.31	76 - 128	20	
Naphthalene	U	20.0	20.5	102	20.0	20.5	103	0.284	54 - 138	20	
o-Xylene	U	20.0	20.9	104	20.0	20.3	102	2.70	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.2	101	20.0	19.4	97.2	3.74	73 - 130	20	
sec-Butylbenzene	U	20.0	19.5	97.3	20.0	18.6	93	4.57	72 - 127	20	
Styrene	U	20.0	21.6	108	20.0	21.0	105	2.69	65 - 134	20	
Trichloroethene	6.71	20.0	25.8	95.4	20.0	25.2	92.2	2.48	70 - 127	20	
tert-Butylbenzene	U	20.0	20.1	101	20.0	19.2	96.2	4.62	70 - 129	20	
Tetrachloroethene	0.399	20.0	20.1	98.5	20.0	19.6	95.9	2.57	66 - 128	20	
Toluene	U	20.0	19.9	99.5	20.0	19.6	98.1	1.44	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	20.3	102	20.0	20.0	100	1.73	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.5	102	1.71	59 - 135	20	
Trichlorofluoromethane	U	20.0	21.3	106	20.0	20.6	103	3.19	57 - 129	20	
Vinyl chloride	U	20.0	23.2	116	20.0	24.4	122	4.96	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5543372

Report generated 10/26/2017 12:50

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS11
Analyst: JDS
Workgroup: WG618910

Tune ID: WG618910-01
Run Date: 06/22/2017
Run Time: 11:03
File ID: 11M19216
Cal ID: HPMS11-20-JUN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.6	11528	PASS
75.0	95.0	30.0	60.0	50.7	31472	PASS
95.0	95.0	100	100	100	62029	PASS
96.0	95.0	5.00	9.00	6.75	4187	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	47690	PASS
175	174	5.00	9.00	7.92	3778	PASS
176	174	95.0	101	96.2	45858	PASS
177	176	5.00	9.00	6.64	3043	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG618912-01	STD	01	06/22/2017 12:32	
WG618912-02	STD	01	06/22/2017 13:02	
WG618912-03	STD	01	06/22/2017 13:31	
WG618912-04	STD-CCV	01	06/22/2017 14:01	
WG618912-05	STD	01	06/22/2017 14:31	
WG618912-06	STD	01	06/22/2017 14:59	
WG618912-07	STD	01	06/22/2017 15:29	
WG618912-08	STD	01	06/22/2017 15:58	
WG618912-09	STD	01	06/22/2017 16:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633647

Tune ID: WG633647-01
Run Date: 10/12/2017
Run Time: 10:07
File ID: 11M22279
Cal ID: HPMS11 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.1	12000	PASS
75.0	95.0	30.0	60.0	53.8	26765	PASS
95.0	95.0	100	100	100	49773	PASS
96.0	95.0	5.00	9.00	7.07	3518	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	74.3	37000	PASS
175	174	5.00	9.00	8.24	3049	PASS
176	174	95.0	101	96.2	35589	PASS
177	176	5.00	9.00	6.24	2222	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-02	STD	01	10/12/2017 12:10	
WG633647-03	STD	01	10/12/2017 13:05	
WG633647-04	STD	01	10/12/2017 13:34	
WG633647-05	STD	01	10/12/2017 14:04	
WG633647-06	STD	01	10/12/2017 14:47	
WG633647-07	STD	01	10/12/2017 16:01	
WG633647-08	STD-CCV	01	10/12/2017 16:30	
WG633647-09	STD	01	10/12/2017 17:00	
WG633647-10	STD	01	10/12/2017 17:29	
WG633647-11	STD	01	10/12/2017 17:59	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS11
Analyst: JDS
Workgroup: WG633790

Tune ID: WG633790-01
Run Date: 10/12/2017
Run Time: 20:07
File ID: 11M22296
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.2	10304	PASS
75.0	95.0	30.0	60.0	54.8	24378	PASS
95.0	95.0	100	100	100	44501	PASS
96.0	95.0	5.00	9.00	7.00	3115	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	73.8	32848	PASS
175	174	5.00	9.00	8.77	2882	PASS
176	174	95.0	101	97.7	32106	PASS
177	176	5.00	9.00	6.22	1998	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633647-12	SSCV	01	10/12/2017 21:02	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS11
Analyst: HRF/TMB
Workgroup: WG634876

Tune ID: WG634876-01
Run Date: 10/20/2017
Run Time: 12:35
File ID: 11M22535
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	25.0	9522	PASS
75.0	95.0	30.0	60.0	56.5	21522	PASS
95.0	95.0	100	100	100	38120	PASS
96.0	95.0	5.00	9.00	6.83	2605	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	75.3	28718	PASS
175	174	5.00	9.00	8.44	2424	PASS
176	174	95.0	101	97.4	27957	PASS
177	176	5.00	9.00	6.40	1789	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634876-02	CCV	01	10/20/2017 13:32	
WG634877-01	BLANK	01	10/20/2017 14:31	
WG634877-02	LCS	01	10/20/2017 17:28	
WG634877-03	LCS2	01	10/20/2017 17:57	
L17100710-02	DUP-10-LA-26	01	10/20/2017 18:55	
L17100710-03	DUP-14-LA-26	01	10/20/2017 19:25	
L17100710-05	MW-25A-LA-26	01	10/20/2017 19:54	
L17100710-06	MW-39A-LA-26	01	10/20/2017 20:24	
L17100710-07	MW-52-LA-26	01	10/20/2017 20:53	
L17100710-08	MW-96-LA-26	01	10/20/2017 21:23	
L17100710-09	MW-97-LA-26	01	10/20/2017 21:52	
L17100710-10	MW-203B-LA-26	01	10/20/2017 22:22	
L17100710-11	MW-259-LA-26	01	10/20/2017 22:51	
L17100710-12	MW-261-LA-26	01	10/20/2017 23:20	
L17100710-13	MW-274-LA-26	01	10/20/2017 23:49	
L17100710-14	MW-277-LA-26	01	10/21/2017 00:19	
WG634877-04	BLANK2	01	10/21/2017 01:18	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS11
Analyst: HRF/TMB
Workgroup: WG635229

Tune ID: WG635229-01
Run Date: 10/24/2017
Run Time: 11:26
File ID: 11M22619
Cal ID: HPMS11-12-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	25.0	9993	PASS
75.0	95.0	30.0	60.0	55.9	22313	PASS
95.0	95.0	100	100	100	39912	PASS
96.0	95.0	5.00	9.00	7.51	2996	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	71.5	28521	PASS
175	174	5.00	9.00	5.56	1587	PASS
176	174	95.0	101	96.8	27604	PASS
177	176	5.00	9.00	6.76	1867	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG635229-02	CCV	01	10/24/2017 11:50	
WG635230-01	BLANK	01	10/24/2017 12:50	
L17100710-01	DR2-3-LA-26	02	10/24/2017 13:19	
WG635230-02	LCS	01	10/24/2017 13:50	
WG635230-03	LCS2	01	10/24/2017 14:19	
WG634955-01	FBLK1	DL01	10/24/2017 17:48	
WG635230-04	BLANK2	01	10/24/2017 23:13	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100710
Instrument: HPMS6
Analyst: TMB
Workgroup: WG635010

Tune ID: WG635010-01
Run Date: 10/23/2017
Run Time: 10:25
File ID: 6M150882
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.2	6271	PASS
75.0	95.0	30.0	60.0	51.3	13835	PASS
95.0	95.0	100	100	100	26989	PASS
96.0	95.0	5.00	9.00	6.51	1756	PASS
173	174	0	2.00	0.446	100	PASS
174	95.0	50.0	100	83.0	22408	PASS
175	174	5.00	9.00	7.19	1612	PASS
176	174	95.0	101	97.0	21738	PASS
177	176	5.00	9.00	6.21	1351	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG635010-02	CCV	01	10/23/2017 10:50	
WG635011-01	BLANK	01	10/23/2017 11:52	
WG635011-02	LCS	01	10/23/2017 12:21	
L17100710-04	LTM-TB4-LA-26	01	10/23/2017 14:18	
L17100710-15	DUP-7-LA-26	01	10/23/2017 14:47	
L17100710-16	MW-253-LA-26	01	10/23/2017 15:17	
L17100710-17	MW-283-LA-26	01	10/23/2017 15:47	
L17100710-18	DUP-13-LA-26	01	10/23/2017 16:17	
L17100710-19	MW-143-LA-26	01	10/23/2017 16:47	
L17100710-20	MW-143-LA-26-MS	01	10/23/2017 17:16	
L17100710-21	MW-143-LA-26-MSD	01	10/23/2017 17:45	
L17100710-22	DR2-5-LA-26	DL01	10/23/2017 22:13	
WG634509-01	FBLK1	DL01	10/24/2017 06:11	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541639
Report generated 10/26/2017 13:07

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 062217 HPMS11
Last Calibration: Fri Jun 23 09:50:47 2017
Curve: WG618912
Calibration Files

	Compound	5 11M19219.D	20 11M19220.D	50 11M19221.D	100 11M19222.D	200 11M19223.D	300 11M19224.D	400 11M19225.D	500 11M19226.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile	0.036	0.036	0.034	0.036	0.037	0.037	0.035	0.035	0.036	3.083		
T	3-Chloro-1-propene	0.486	0.499	0.493	0.472	0.427	0.395	0.358		0.447	12.268		
T	2-Chloro-1,3-butadiene	0.394	0.417	0.416	0.399	0.375	0.350	0.322	0.294	0.371	12.213		
T	Methacrylonitrile	0.171	0.182	0.179	0.183	0.177	0.170	0.155	0.149	0.171	7.403		
T	Isobutyl Alcohol		0.006	0.006	0.008	0.010	0.011	0.011	0.012	0.009	25.809	0.993	
T	1-Butanol			0.001	0.003	0.004	0.005	0.005	0.005	0.004	42.424	0.996	
T	Cyclohexanone			0.009	0.010	0.011	0.011	0.010	0.010	0.010	6.640		
T	2-Nitropropane			0.074	0.078	0.081	0.080	0.075	0.075	0.077	3.841		
T	Ethyl Acetate	0.239	0.260	0.249	0.254	0.242	0.225	0.203	0.193	0.233	10.353		
T	Methyl methacrylate	0.230	0.251	0.246	0.247	0.236	0.221	0.200	0.188	0.227	10.105		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Jun 23 10:01:47 2017

Calibration Table Report
Method: 8260_W.M
Title: 8260B/624 (SOP: OVL MSV01) Water 101217 HPMS11
Last Calibration: Thu Oct 12 18:32:44 2017
Curve: WG633647
Calibration Files

	Compound	0.3 11M22282.D	0.4 11M22283.D	1 11M22284.D	2 11M22285.D	5 11M22286.D	20 11M22288.D	50 11M22289.D	100 11M22290.D	200 11M22291.D	300 11M22292.D	Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.389	0.443	0.443	0.504	0.499	0.464	0.425		0.453	8.969		
P	Chloromethane			0.476	0.437	0.418	0.424	0.396	0.362			0.419	9.240		
C	Vinyl Chloride		0.407	0.398	0.436	0.406	0.406	0.411	0.344	0.323		0.391	9.661		
T	1,3-Butadiene				0.353	0.322	0.304	0.303	0.286	0.259		0.305	10.442		
T	Bromomethane			0.199	0.192	0.184	0.207	0.226	0.228	0.232		0.210	9.166		
T	Chloroethane			0.244	0.268	0.263	0.270	0.282	0.272	0.264		0.266	4.303		
T	Trichlorofluoromethane		0.443	0.485	0.541	0.540	0.528	0.543	0.526	0.504		0.514	6.830		
T	Diethyl ether			0.270	0.285	0.306	0.274	0.286	0.266		0.263	0.279	5.347		
T	Isoprene		0.349	0.411	0.453	0.456	0.469	0.493	0.478	0.446		0.445	10.217		
T	Acrolein			0.031	0.042	0.047	0.039	0.047	0.045		0.046	0.042	14.006		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.184	0.247	0.262	0.252	0.262	0.255	0.256		0.246	11.203		
T	Acetone					0.105	0.088	0.093	0.097	0.095	0.093	0.095	5.841		
C	1,1-Dichloroethene		0.430	0.441	0.514	0.512	0.500	0.519	0.499	0.475		0.486	6.979		
T	Tert-Butyl Alcohol				0.028	0.032	0.026	0.028	0.030		0.035	0.030	10.998		
T	Dimethyl Sulfide		0.328	0.316	0.332	0.358	0.376	0.372	0.360	0.340		0.348	6.305		
T	Iodomethane			0.136	0.163	0.156	0.197	0.230	0.234	0.226		0.192	20.874	0.998	
T	Methyl acetate				0.294	0.309	0.267	0.291	0.278	0.269		0.285	5.781		
T	Methylene Chloride			0.327	0.354	0.343	0.317	0.329	0.310	0.295		0.325	6.143		
T	Carbon Disulfide			0.867	0.928	0.881	0.918	0.872	0.799	0.691		0.851	9.630		
T	Acrylonitrile			0.109	0.109	0.121	0.111	0.130	0.124		0.122	0.118	6.980		
T	Methyl Tert Butyl Ether			0.784	0.772	0.863	0.796	0.868	0.818	0.761		0.809	5.291		
T	trans-1,2-Dichloroethene		0.156	0.252	0.279	0.287	0.281	0.287	0.282	0.271		0.262	16.964	0.999	
T	n-Hexane				0.404	0.414	0.465	0.478	0.464	0.431		0.443	6.882		
T	Diisopropyl ether			1.203	1.277	1.295	1.161	1.170	0.984		0.904	1.142	12.775		
T	Vinyl Acetate				0.574	0.605	0.636	0.666	0.609	0.543		0.606	7.186		
P	1,1-Dichloroethane		0.566	0.629	0.634	0.661	0.628	0.643	0.596	0.549		0.613	6.384		
T	Ethyl-Tert-Butyl ether			0.955	1.048	1.076	0.967	0.987	0.853		0.802	0.955	10.319		
T	2-Butanone				0.137	0.152	0.134	0.158	0.153	0.153	0.155	0.149	6.166		
T	Propionitrile				0.041	0.047	0.041	0.045	0.045		0.049	0.045	6.693		
T	2,2-Dichloropropane			0.417	0.449	0.491	0.493	0.522	0.492	0.466		0.476	7.312		
T	cis-1,2-Dichloroethene		0.308	0.296	0.326	0.343	0.313	0.336	0.315	0.301		0.317	5.242		
C	Chloroform	0.536	0.620	0.567	0.567	0.597	0.558	0.577	0.535	0.491		0.561	6.713		
T	1-Bromopropane				0.029	0.047	0.054	0.054	0.053	0.053	0.052	0.049	18.551	0.999	
T	Bromochloromethane		0.148	0.165	0.178	0.180	0.174	0.187	0.179	0.175		0.173	6.852		
T	Tetrahydrofuran			0.088	0.095	0.105	0.094	0.104	0.099		0.104	0.098	6.367		
S	Dibromofluoromethane						0.302	0.250	0.281	0.283	0.264	0.276	7.096		
T	1,1,1-Trichloroethane		0.445	0.454	0.475	0.517	0.485	0.510	0.491	0.463		0.480	5.326		
T	Cyclohexane		0.451	0.460	0.590	0.562	0.552	0.590	0.570	0.526		0.538	10.217		
T	1,1-Dichloropropene		0.338	0.356	0.383	0.418	0.409	0.431	0.414	0.391		0.392	8.227		
T	Carbon Tetrachloride		0.353	0.371	0.410	0.435	0.416	0.443	0.428	0.411		0.409	7.644		
T	Tert-Amyl-Methyl ether			0.763	0.830	0.881	0.772	0.809	0.703		0.666	0.775	9.539		
S	1,2-Dichloroethane-d4						0.418	0.351	0.385	0.386	0.356	0.379	7.101		
T	1,2-Dichloroethane		0.448	0.481	0.478	0.500	0.474	0.491	0.455	0.424		0.469	5.331		
T	Benzene		1.122	1.254	1.302	1.325	1.216	1.195	1.036			1.207	8.408		
T	Trichloroethene		0.335	0.304	0.300	0.290	0.269	0.285	0.276	0.270		0.291	7.565		
T	Methylcyclohexane		0.372	0.358	0.449	0.437	0.451	0.482	0.466	0.433		0.431	10.150		
C	1,2-Dichloropropane		0.302	0.340	0.348	0.362	0.352	0.376	0.356	0.341		0.347	6.309		
T	1,4-Dioxane				0.003	0.003	0.002	0.003	0.003		0.003	0.003	13.552		
T	Bromodichloromethane		0.312	0.385	0.420	0.425	0.419	0.452	0.430	0.404		0.406	10.525		
T	Dibromomethane		0.159	0.179	0.160	0.187	0.180	0.194	0.187	0.184		0.179	7.148		
T	2-Chloroethyl Vinyl Ether				0.145	0.167	0.186	0.210	0.204	0.202	0.192	0.186	12.467		
T	4-Methyl-2-Pentanone					0.094	0.106	0.122	0.123	0.128	0.123	0.116	11.232		
T	cis-1,3-Dichloropropene		0.342	0.366	0.457	0.479	0.485	0.530	0.495	0.455		0.451	14.326		
T	Dimethyl Disulfide				0.170	0.177	0.254	0.283	0.290	0.283	0.262	0.245	20.741	0.998	

I	Chlorobenzene-d5	ISTD												
S	Toluene-d8						1.523	1.295	1.400	1.316	1.164	1.340	9.921	
C	Toluene		1.489	1.587	1.744	1.831	1.645	1.637	1.424			1.622	8.630	
T	Ethyl Methacrylate			0.337	0.421	0.479	0.480	0.550	0.539	0.508	0.469	0.473	14.446	
T	trans-1,3-Dichloropropene			0.544	0.548	0.627	0.606	0.676	0.630	0.568		0.600	8.103	
T	1,1,2-Trichloroethane		0.223	0.335	0.354	0.379	0.340	0.364	0.347	0.327		0.333	14.268	
T	2-Hexanone					0.284	0.271	0.326	0.330	0.327	0.318	0.309	8.253	
T	1,3-Dichloropropane		0.562	0.654	0.647	0.693	0.593	0.658	0.609	0.552		0.621	8.033	
T	Tetrachloroethene		0.262	0.318	0.319	0.307	0.313	0.325	0.315	0.295		0.307	6.590	
T	Dibromochloromethane		0.303	0.362	0.402	0.399	0.384	0.426	0.414	0.393		0.385	9.912	
T	1,2-Dibromoethane		0.240	0.327	0.338	0.341	0.323	0.361	0.348	0.332		0.326	11.342	
T	1-Chlorohexane		0.244	0.319	0.428	0.462	0.514	0.545	0.545	0.490	0.447	0.444	23.061	0.994
P	Chlorobenzene		1.093	1.127	1.157	1.158	1.029	1.048	0.954	0.808		1.047	11.344	
T	1,1,1,2-Tetrachloroethane		0.343	0.394	0.400	0.424	0.391	0.428	0.412	0.383		0.397	6.736	
C	Ethylbenzene			0.528	0.530	0.598	0.561	0.595	0.564	0.514		0.556	5.960	
T	m-,p-Xylene		0.597	0.636	0.67	0.727	0.678	0.673	0.599	0.494		0.63424	11.2093	
T	o-Xylene		0.552	0.560	0.649	0.685	0.687	0.728	0.675	0.608		0.643	9.926	
T	Styrene		0.691	0.868	0.979	1.134	1.135	1.187	1.080			1.011	17.623	0.998
P	Bromoform			0.201	0.196	0.252	0.241	0.280	0.283	0.286		0.248	15.276	0.999
T	Isopropylbenzene		1.289	1.465	1.695	1.814	1.709	1.715	1.509	1.223		1.552	13.922	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.840	0.911	1.010	0.946	0.912	0.947	0.891	0.859		0.915	5.905	
S	p-Bromofluorobenzene						1.163	0.989	1.141	1.153	1.035	1.096	7.178	
T	1,2,3-Trichloropropane			0.259	0.237	0.260	0.251	0.270	0.262	0.263		0.257	4.107	
T	trans-1,4-Dichloro-2-Butene			0.175	0.198	0.285	0.306	0.325	0.336	0.349	0.307	0.285	22.521	0.996
T	n-Propylbenzene		3.119	3.771	4.330	4.634	4.661	4.213	3.496			4.032	14.563	
T	Bromobenzene	0.930	0.799	0.856	0.994	0.987	0.944	0.942	0.869	0.822		0.905	7.826	
T	1,3,5-Trimethylbenzene		1.786	2.515	2.997	3.245	3.227	3.036	2.611			2.774	18.705	0.991
T	2-Chlorotoluene		2.547	2.931	3.317	3.352	3.117	2.934	2.519			2.960	11.307	
T	4-Chlorotoluene		1.944	2.159	2.633	2.826	2.655	2.387	2.067			2.382	14.089	
T	a-Methylstyrene					1.390	1.652	1.562	1.479	1.306		1.478	9.251	
T	tert-Butylbenzene			0.519	0.597	0.646	0.646	0.658	0.631	0.604		0.615	7.781	
T	1,2,4-Trimethylbenzene			2.705	3.112	3.341	3.366	3.107	2.656			3.048	10.015	
T	sec-Butylbenzene			3.176	4.004	4.060	3.974	3.715	3.134			3.677	11.469	
T	p-Isopropyltoluene			2.442	3.062	3.170	3.307	3.084	2.684			2.958	11.055	
T	1,3-Dichlorobenzene		1.513	1.698	1.713	1.764	1.760	1.681	1.540	1.352		1.628	8.944	
T	1,4-Dichlorobenzene		1.827	1.838	1.904	1.800	1.758	1.682	1.529	1.339		1.710	11.024	
T	n-Butylbenzene			2.305	2.884	3.065	3.327	3.143	2.727	2.228		2.811	14.878	
T	1,2-Dichlorobenzene	1.495	1.569	1.731	1.744	1.757	1.680	1.656	1.494	1.309		1.604	9.354	
T	1,2-Dibromo-3-Chloropropane				0.133	0.171	0.166	0.195	0.192	0.204		0.177	14.602	
T	1,2,4-Trichlorobenzene			0.949	1.015	1.118	1.205	1.231	1.147	1.109		1.111	9.017	
T	Hexachlorobutadiene		0.377	0.449	0.589	0.556	0.622	0.634	0.637	0.619		0.560	17.268	1.000
T	Naphthalene		1.656	1.966	2.145	2.445	2.569	2.625	2.282			2.241	15.517	0.995
T	1,2,3-Trichlorobenzene			1.036	1.034	1.147	1.162	1.159	1.100	1.063		1.100	5.179	

Fri Oct 13 15:45:54 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100710 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	30.0	30.9	ug/L	0.300	2.90	25	
1,2-Dichloropropane	CCC	30.0	31.0	ug/L	0.215	3.20	25	
Chloroform	CCC	30.0	29.5	ug/L	0.331	1.70	25	
Ethylbenzene	CCC	30.0	31.6	ug/L	0.352	5.50	25	
Toluene	CCC	30.0	30.6	ug/L	0.994	2.10	25	
Vinyl Chloride	CCC	50.0	49.7	ug/L	0.389	0.600	25	
1,1,2,2-Tetrachloroethane	SPCC	30.0	28.5	ug/L	0.521	5.10	25	
1,1-Dichloroethane	SPCC	30.0	29.6	ug/L	0.364	1.20	25	
Bromoform	SPCC	30.0	25.8	ug/L	0.144	13.9	25	
Chlorobenzene	SPCC	30.0	30.4	ug/L	0.635	1.20	25	
Chloromethane	SPCC	50.0	49.8	ug/L	0.417	0.400	25	
1,1,1,2-Tetrachloroethane		30.0	30.0	ug/L	0.238	0	25	
1,1,1-Trichloroethane		30.0	30.7	ug/L	0.295	2.30	25	
1,1,2-Trichloroethane		30.0	30.7	ug/L	0.205	2.30	25	
1,1-Dichloropropene		30.0	32.5	ug/L	0.255	8.30	25	
1,2,3-Trichlorobenzene		30.0	34.3	ug/L	0.754	14.2	25	
1,2,3-Trichloropropane		30.0	29.3	ug/L	0.151	2.40	25	
1,2,4-Trichlorobenzene		30.0	35.5	ug/L	0.789	18.3	25	
1,2,4-Trimethylbenzene		30.0	31.5	ug/L	1.92	4.90	25	
1,2-Dichloroethane		30.0	29.7	ug/L	0.278	1.20	25	
1,2-Dichlorobenzene		30.0	31.5	ug/L	1.01	4.80	25	
1,2-Dibromo-3-Chloropropane		30.0	29.6	ug/L	0.105	1.30	25	
1,2-Dibromoethane		30.0	30.2	ug/L	0.197	0.600	25	
1,3,5-Trimethylbenzene		30.0	32.4	ug/L	1.83	8.10	25	
1,3-Dichlorobenzene		30.0	30.8	ug/L	1.00	2.60	25	
1,3-Dichloropropane		30.0	31.1	ug/L	0.386	3.60	25	
1,4-Dichlorobenzene		30.0	30.3	ug/L	1.04	1.00	25	
1,4-Dioxane		200	210	ug/L	0.00290	5.00	25	
1-Chlorohexane		50.0	56.9	ug/L	0.549	13.8	25	
2,2-Dichloropropane		30.0	31.0	ug/L	0.295	3.30	25	
2-Hexanone		50.0	50.9	ug/L	0.315	1.90	25	
2-Chlorotoluene		30.0	30.5	ug/L	1.80	1.60	25	
4-Chlorotoluene		30.0	30.9	ug/L	1.47	2.80	25	
Acetone		50.0	46.2	ug/L	0.0878	7.60	25	
Benzene		30.0	29.8	ug/L	0.720	0.600	25	
Bromobenzene		30.0	29.6	ug/L	0.535	1.50	25	
Bromochloromethane		30.0	29.2	ug/L	0.101	2.70	25	
Bromodichloromethane		30.0	30.0	ug/L	0.244	0	25	
Bromomethane		50.0	50.3	ug/L	0.211	0.600	25	
Carbon Disulfide		50.0	44.8	ug/L	0.762	10.4	25	
Carbon Tetrachloride		30.0	30.3	ug/L	0.248	1.20	25	
Chloroethane		50.0	55.1	ug/L	0.294	10.2	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100710 Run Date: 10/12/2017 Sample ID: WG633647-12
Instrument ID: HPMS11 Run Time: 21:02 Method: 8260B
File ID: 11M22298 Analyst: JDS QC Key: AF40
ICal Workgroup: WG633647 Cal ID: HPMS11 - 12-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		30.0	29.8	ug/L	0.189	0.600	25	
cis-1,3-Dichloropropene		30.0	34.7	ug/L	0.313	15.5	25	
Dibromochloromethane		30.0	29.4	ug/L	0.226	2.20	25	
Dibromomethane		30.0	29.5	ug/L	0.105	1.70	25	
Dichlorodifluoromethane		50.0	58.2	ug/L	0.526	16.3	25	
Hexachlorobutadiene		30.0	32.6	ug/L	0.407	8.80	25	
Isopropylbenzene		30.0	33.4	ug/L	1.04	11.3	25	
Methylene Chloride		30.0	28.5	ug/L	0.186	4.90	25	
Methyl Tert Butyl Ether		50.0	47.5	ug/L	0.769	5.00	25	
2-Butanone		50.0	48.2	ug/L	0.144	3.60	25	
4-Methyl-2-Pentanone		50.0	47.8	ug/L	0.111	4.40	25	
n-Butylbenzene		30.0	34.0	ug/L	1.91	13.4	25	
n-Propylbenzene		30.0	32.9	ug/L	2.65	9.70	25	
m-,p-Xylene		60.0	65.1	ug/L	0.413	8.40	25	
Naphthalene		30.0	34.5	ug/L	1.66	15.0	25	
o-Xylene		30.0	32.8	ug/L	0.422	9.50	25	
p-Isopropyltoluene		30.0	31.5	ug/L	1.87	5.10	25	
sec-Butylbenzene		30.0	30.9	ug/L	2.27	3.00	25	
Styrene		30.0	31.4	ug/L	0.702	4.80	25	
Trichloroethene		30.0	28.5	ug/L	0.166	4.90	25	
tert-Butylbenzene		30.0	30.8	ug/L	0.379	2.80	25	
Tetrachloroethene		30.0	30.8	ug/L	0.189	2.60	25	
trans-1,2-Dichloroethene		30.0	30.2	ug/L	0.167	0.700	25	
trans-1,3-Dichloropropene		30.0	31.7	ug/L	0.380	5.60	25	
Trichlorofluoromethane		50.0	49.4	ug/L	0.508	1.10	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5541638
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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100710 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100710 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Report generated 10/26/2017 12:50

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/20/2017 Sample ID: WG634876-02

Instrument ID: HPMS11 Run Time: 13:32 Method: 8260B

File ID: 11M22537 Analyst: HRF/TMB QC Key: AF40

Workgroup (AAB#): WG634877 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.2	ug/L	0.469	3.56	20	
1,2-Dichloropropane	CCC	50.0	48.5	ug/L	0.337	3.01	20	
Chloroform	CCC	50.0	46.0	ug/L	0.516	8.02	20	
Ethylbenzene	CCC	50.0	48.1	ug/L	0.535	3.84	20	
Toluene	CCC	50.0	44.5	ug/L	1.44	11.0	20	
Vinyl Chloride	CCC	50.0	49.4	ug/L	0.387	1.15	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.4	ug/L	0.831	9.11	20	
1,1-Dichloroethane	SPCC	50.0	47.0	ug/L	0.576	5.98	20	
Bromoform	SPCC	50.0	44.9	ug/L	0.252	10.1	20	
Chlorobenzene	SPCC	50.0	44.5	ug/L	0.933	10.9	20	
Chloromethane	SPCC	50.0	43.6	ug/L	0.365	12.8	20	
Xylenes		150	144	ug/L	0.617	4.20	20	
1,1,1,2-Tetrachloroethane		50.0	47.1	ug/L	0.374	5.86	20	
1,1,1-Trichloroethane		50.0	47.2	ug/L	0.453	5.68	20	
1,1,2-Trichloroethane		50.0	48.0	ug/L	0.320	4.05	20	
1,1-Dichloropropene		50.0	50.1	ug/L	0.394	0.261	20	
1,2,3-Trichlorobenzene		50.0	48.2	ug/L	1.06	3.61	20	
1,2,3-Trichloropropane		50.0	44.3	ug/L	0.228	11.4	20	
1,2,4-Trichlorobenzene		50.0	50.9	ug/L	1.13	1.87	20	
1,2,4-Trimethylbenzene		50.0	44.2	ug/L	2.70	11.5	20	
1,2-Dichloroethane		50.0	46.8	ug/L	0.439	6.33	20	
1,2-Dichlorobenzene		50.0	45.6	ug/L	1.46	8.82	20	
1,2-Dibromo-3-Chloropropane		50.0	47.1	ug/L	0.167	5.75	20	
1,2-Dibromoethane		50.0	48.6	ug/L	0.317	2.85	20	
1,3,5-Trimethylbenzene		50.0	46.8	ug/L	2.64	6.47	20	
1,3-Dichlorobenzene		50.0	46.7	ug/L	1.52	6.65	20	
1,3-Dichloropropane		50.0	46.3	ug/L	0.575	7.36	20	
1,4-Dichlorobenzene		50.0	44.5	ug/L	1.52	11.0	20	
1,4-Dioxane		200	184	ug/L	0.00250	8.01	20	
1-Chlorohexane		50.0	50.5	ug/L	0.488	1.08	20	
2,2-Dichloropropane		50.0	49.1	ug/L	0.467	1.73	20	
2-Hexanone		50.0	46.1	ug/L	0.285	7.73	20	
2-Chlorotoluene		50.0	43.8	ug/L	2.60	12.3	20	
4-Chlorotoluene		50.0	44.5	ug/L	2.12	11.1	20	
Acetone		50.0	42.2	ug/L	0.0803	15.5	20	
Benzene		50.0	44.5	ug/L	1.08	10.9	20	
Bromobenzene		50.0	45.4	ug/L	0.821	9.23	20	
Bromochloromethane		50.0	48.1	ug/L	0.167	3.72	20	
Bromodichloromethane		50.0	50.1	ug/L	0.406	0.102	20	
Bromomethane		50.0	55.1	ug/L	0.231	10.1	20	
Carbon Disulfide		50.0	43.9	ug/L	0.747	12.2	20	
Carbon Tetrachloride		50.0	47.7	ug/L	0.389	4.68	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/20/2017 Sample ID: WG634876-02

Instrument ID: HPMS11 Run Time: 13:32 Method: 8260B

File ID: 11M22537 Analyst: HRF/TMB QC Key: AF40

Workgroup (AAB#): WG634877 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	46.6	ug/L	0.248	6.71	20	
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.297	6.40	20	
cis-1,3-Dichloropropene		50.0	52.7	ug/L	0.475	5.31	20	
Dibromochloromethane		50.0	48.5	ug/L	0.374	3.03	20	
Dibromomethane		50.0	48.9	ug/L	0.175	2.22	20	
Dichlorodifluoromethane		50.0	48.4	ug/L	0.439	3.12	20	
Hexachlorobutadiene		50.0	46.5	ug/L	0.580	7.06	20	
Isopropylbenzene		50.0	48.9	ug/L	1.52	2.18	20	
Methylene Chloride		50.0	45.2	ug/L	0.294	9.65	20	
Methyl Tert Butyl Ether		50.0	47.2	ug/L	0.763	5.63	20	
2-Butanone		50.0	44.7	ug/L	0.133	10.7	20	
4-Methyl-2-Pentanone		50.0	46.6	ug/L	0.108	6.87	20	
n-Butylbenzene		50.0	49.3	ug/L	2.77	1.32	20	
n-Propylbenzene		50.0	45.7	ug/L	3.69	8.52	20	
m-,p-Xylene		100	94.3	ug/L	0.598	5.71	20	
Naphthalene		50.0	48.4	ug/L	2.34	3.29	20	
o-Xylene		50.0	49.4	ug/L	0.636	1.17	20	
p-Isopropyltoluene		50.0	46.1	ug/L	2.73	7.88	20	
sec-Butylbenzene		50.0	43.8	ug/L	3.22	12.4	20	
Styrene		50.0	47.0	ug/L	1.05	5.91	20	
Trichloroethene		50.0	44.9	ug/L	0.262	10.1	20	
tert-Butylbenzene		50.0	46.5	ug/L	0.572	6.92	20	
Tetrachloroethene		50.0	47.0	ug/L	0.288	6.03	20	
trans-1,2-Dichloroethene		50.0	47.9	ug/L	0.265	4.26	20	
trans-1,3-Dichloropropene		50.0	49.4	ug/L	0.593	1.13	20	
Trichlorofluoromethane		50.0	47.9	ug/L	0.492	4.26	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/23/2017 Sample ID: WG635010-02

Instrument ID: HPMS6 Run Time: 10:50 Method: 8260B

File ID: 6M150883 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG635011 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.2	ug/L	0.503	4.46	20	
1,2-Dichloropropane	CCC	50.0	50.7	ug/L	0.324	1.37	20	
Chloroform	CCC	50.0	50.8	ug/L	0.541	1.62	20	
Ethylbenzene	CCC	50.0	51.6	ug/L	0.547	3.11	20	
Toluene	CCC	50.0	50.4	ug/L	1.50	0.738	20	
Vinyl Chloride	CCC	50.0	50.5	ug/L	0.263	0.953	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.6	20	
1,1-Dichloroethane	SPCC	50.0	50.2	ug/L	0.582	0.340	20	
Bromoform	SPCC	50.0	50.7	ug/L	0.233	1.32	20	
Chlorobenzene	SPCC	50.0	49.5	ug/L	1.01	0.954	20	
Chloromethane	SPCC	50.0	43.4	ug/L	0.278	13.2	20	
Xylenes		150	156	ug/L	0.664	3.82	20	
1,1,1,2-Tetrachloroethane		50.0	52.9	ug/L	0.401	5.84	20	
1,1,1-Trichloroethane		50.0	55.9	ug/L	0.521	11.7	20	
1,1,2-Trichloroethane		50.0	48.0	ug/L	0.281	3.95	20	
1,1-Dichloropropene		50.0	53.4	ug/L	0.403	6.70	20	
1,2,3-Trichlorobenzene		50.0	47.2	ug/L	0.931	5.60	20	
1,2,3-Trichloropropane		50.0	45.2	ug/L	0.177	9.68	20	
1,2,4-Trichlorobenzene		50.0	48.9	ug/L	1.03	2.19	20	
1,2,4-Trimethylbenzene		50.0	50.6	ug/L	2.69	1.17	20	
1,2-Dichloroethane		50.0	54.3	ug/L	0.442	8.64	20	
1,2-Dichlorobenzene		50.0	47.3	ug/L	1.43	5.33	20	
1,2-Dibromo-3-Chloropropane		50.0	46.9	ug/L	0.114	6.27	20	
1,2-Dibromoethane		50.0	49.2	ug/L	0.274	1.66	20	
1,3,5-Trimethylbenzene		50.0	53.2	ug/L	2.60	6.33	20	
1,3-Dichlorobenzene		50.0	49.6	ug/L	1.56	0.815	20	
1,3-Dichloropropane		50.0	48.1	ug/L	0.491	3.88	20	
1,4-Dichlorobenzene		50.0	46.4	ug/L	1.56	7.20	20	
1,4-Dioxane		200	169	ug/L	0.00180	15.3	20	
1-Chlorohexane		50.0	50.5	ug/L	0.465	1.00	20	
2,2-Dichloropropane		50.0	53.3	ug/L	0.479	6.58	20	
2-Hexanone		50.0	44.8	ug/L	0.219	10.4	20	
2-Chlorotoluene		50.0	51.2	ug/L	2.51	2.39	20	
4-Chlorotoluene		50.0	48.5	ug/L	2.06	3.02	20	
Acetone		50.0	52.0	ug/L	0.0815	3.93	20	
Benzene		50.0	50.0	ug/L	1.10	0.0368	20	
Bromobenzene		50.0	49.3	ug/L	0.796	1.43	20	
Bromochloromethane		50.0	52.3	ug/L	0.179	4.50	20	
Bromodichloromethane		50.0	54.1	ug/L	0.428	8.22	20	
Bromomethane		50.0	50.6	ug/L	0.172	1.12	20	
Carbon Disulfide		50.0	45.7	ug/L	0.823	8.62	20	
Carbon Tetrachloride		50.0	57.8	ug/L	0.481	15.6	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/23/2017 Sample ID: WG635010-02

Instrument ID: HPMS6 Run Time: 10:50 Method: 8260B

File ID: 6M150883 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG635011 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	49.4	ug/L	0.220	1.26	20	
cis-1,2-Dichloroethene		50.0	52.3	ug/L	0.308	4.54	20	
cis-1,3-Dichloropropene		50.0	55.7	ug/L	0.474	11.4	20	
Dibromochloromethane		50.0	52.5	ug/L	0.395	5.08	20	
Dibromomethane		50.0	52.3	ug/L	0.155	4.59	20	
Dichlorodifluoromethane		50.0	57.5	ug/L	0.478	15.0	20	
Hexachlorobutadiene		50.0	45.5	ug/L	0.411	9.09	20	
Isopropylbenzene		50.0	54.3	ug/L	1.72	8.54	20	
Methylene Chloride		50.0	46.9	ug/L	0.279	6.24	20	
Methyl Tert Butyl Ether		50.0	49.0	ug/L	0.674	1.97	20	
2-Butanone		50.0	43.9	ug/L	0.107	12.2	20	
4-Methyl-2-Pentanone		50.0	44.5	ug/L	0.0858	11.1	20	
n-Butylbenzene		50.0	51.1	ug/L	2.45	2.27	20	
n-Propylbenzene		50.0	51.9	ug/L	3.59	3.70	20	
m-,p-Xylene		100	103	ug/L	0.659	2.60	20	
Naphthalene		50.0	48.7	ug/L	2.04	2.68	20	
o-Xylene		50.0	53.1	ug/L	0.669	6.27	20	
p-Isopropyltoluene		50.0	52.3	ug/L	2.78	4.53	20	
sec-Butylbenzene		50.0	50.2	ug/L	3.03	0.348	20	
Styrene		50.0	55.0	ug/L	1.14	10.0	20	
Trichloroethene		50.0	52.9	ug/L	0.301	5.72	20	
tert-Butylbenzene		50.0	51.0	ug/L	0.536	2.04	20	
Tetrachloroethene		50.0	52.4	ug/L	0.411	4.76	20	
trans-1,2-Dichloroethene		50.0	51.6	ug/L	0.277	3.13	20	
trans-1,3-Dichloropropene		50.0	51.7	ug/L	0.541	3.42	20	
Trichlorofluoromethane		50.0	57.0	ug/L	0.550	14.0	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/24/2017 Sample ID: WG635229-02

Instrument ID: HPMS11 Run Time: 11:50 Method: 8260B

File ID: 11M22620 Analyst: HRF/TMB QC Key: AF40

Workgroup (AAB#): WG635230 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.6	ug/L	0.473	2.77	20	
1,2-Dichloropropane	CCC	50.0	48.3	ug/L	0.335	3.40	20	
Chloroform	CCC	50.0	46.1	ug/L	0.517	7.80	20	
Ethylbenzene	CCC	50.0	46.9	ug/L	0.521	6.23	20	
Toluene	CCC	50.0	44.4	ug/L	1.44	11.2	20	
Vinyl Chloride	CCC	50.0	46.5	ug/L	0.364	7.01	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.3	ug/L	0.811	11.4	20	
1,1-Dichloroethane	SPCC	50.0	46.9	ug/L	0.575	6.18	20	
Bromoform	SPCC	50.0	43.6	ug/L	0.245	12.7	20	
Chlorobenzene	SPCC	50.0	43.7	ug/L	0.914	12.7	20	
Chloromethane	SPCC	50.0	44.8	ug/L	0.375	10.5	20	
Xylenes		150	142	ug/L	0.609	5.22	20	
1,1,1,2-Tetrachloroethane		50.0	46.0	ug/L	0.365	8.07	20	
1,1,1-Trichloroethane		50.0	47.3	ug/L	0.454	5.34	20	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.309	7.26	20	
1,1-Dichloropropene		50.0	49.5	ug/L	0.388	1.05	20	
1,2,3-Trichlorobenzene		50.0	47.3	ug/L	1.04	5.38	20	
1,2,3-Trichloropropane		50.0	44.5	ug/L	0.229	11.0	20	
1,2,4-Trichlorobenzene		50.0	50.6	ug/L	1.12	1.29	20	
1,2,4-Trimethylbenzene		50.0	43.9	ug/L	2.68	12.2	20	
1,2-Dichloroethane		50.0	46.4	ug/L	0.435	7.23	20	
1,2-Dichlorobenzene		50.0	44.8	ug/L	1.44	10.4	20	
1,2-Dibromo-3-Chloropropane		50.0	45.3	ug/L	0.160	9.33	20	
1,2-Dibromoethane		50.0	47.3	ug/L	0.308	5.48	20	
1,3,5-Trimethylbenzene		50.0	46.6	ug/L	2.63	6.72	20	
1,3-Dichlorobenzene		50.0	45.6	ug/L	1.49	8.75	20	
1,3-Dichloropropane		50.0	45.1	ug/L	0.560	9.77	20	
1,4-Dichlorobenzene		50.0	43.8	ug/L	1.50	12.4	20	
1,4-Dioxane		200	193	ug/L	0.00270	3.55	20	
1-Chlorohexane		50.0	50.2	ug/L	0.484	0.311	20	
2,2-Dichloropropane		50.0	49.0	ug/L	0.466	2.07	20	
2-Hexanone		50.0	44.8	ug/L	0.277	10.4	20	
2-Chlorotoluene		50.0	39.7	ug/L	2.35	20.7	20	*
4-Chlorotoluene		50.0	47.6	ug/L	2.27	4.85	20	
Acetone		50.0	44.9	ug/L	0.0854	10.1	20	
Benzene		50.0	44.5	ug/L	1.07	11.0	20	
Bromobenzene		50.0	44.5	ug/L	0.805	11.1	20	
Bromochloromethane		50.0	48.1	ug/L	0.167	3.84	20	
Bromodichloromethane		50.0	49.5	ug/L	0.402	1.00	20	
Bromomethane		50.0	55.8	ug/L	0.234	11.6	20	
Carbon Disulfide		50.0	45.2	ug/L	0.769	9.66	20	
Carbon Tetrachloride		50.0	47.3	ug/L	0.387	5.40	20	

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100710 Run Date: 10/24/2017 Sample ID: WG635229-02

Instrument ID: HPMS11 Run Time: 11:50 Method: 8260B

File ID: 11M22620 Analyst: HRF/TMB QC Key: AF40

Workgroup (AAB#): WG635230 Cal ID: HPMS11 - 12-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	47.1	ug/L	0.251	5.85	20	
cis-1,2-Dichloroethene		50.0	47.1	ug/L	0.299	5.76	20	
cis-1,3-Dichloropropene		50.0	51.8	ug/L	0.468	3.65	20	
Dibromochloromethane		50.0	47.6	ug/L	0.367	4.75	20	
Dibromomethane		50.0	48.0	ug/L	0.172	4.10	20	
Dichlorodifluoromethane		50.0	52.0	ug/L	0.470	3.91	20	
Hexachlorobutadiene		50.0	44.5	ug/L	0.555	11.0	20	
Isopropylbenzene		50.0	48.3	ug/L	1.50	3.32	20	
Methylene Chloride		50.0	45.8	ug/L	0.298	8.49	20	
Methyl Tert Butyl Ether		50.0	47.4	ug/L	0.766	5.30	20	
2-Butanone		50.0	45.0	ug/L	0.134	9.96	20	
4-Methyl-2-Pentanone		50.0	46.4	ug/L	0.108	7.20	20	
n-Butylbenzene		50.0	48.7	ug/L	2.74	2.64	20	
n-Propylbenzene		50.0	45.2	ug/L	3.65	9.51	20	
m-,p-Xylene		100	93.8	ug/L	0.595	6.24	20	
Naphthalene		50.0	47.2	ug/L	2.28	5.65	20	
o-Xylene		50.0	48.4	ug/L	0.622	3.19	20	
p-Isopropyltoluene		50.0	45.7	ug/L	2.70	8.69	20	
sec-Butylbenzene		50.0	43.2	ug/L	3.18	13.6	20	
Styrene		50.0	46.2	ug/L	1.03	7.61	20	
Trichloroethene		50.0	44.6	ug/L	0.260	10.8	20	
tert-Butylbenzene		50.0	45.5	ug/L	0.560	8.94	20	
Tetrachloroethene		50.0	46.5	ug/L	0.285	7.06	20	
trans-1,2-Dichloroethene		50.0	48.0	ug/L	0.266	3.91	20	
trans-1,3-Dichloropropene		50.0	48.0	ug/L	0.576	3.95	20	
Trichlorofluoromethane		50.0	47.9	ug/L	0.492	4.18	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO CCV)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG634877

CCV Number: WG634876-02
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634876-02	NA	NA	142864	281376	389146
Upper Limit	NA	NA	285728	562752	778292
Lower Limit	NA	NA	71432	140688	194573
L17100710-01	1.00	01	109084	240625	341825
L17100710-02	1.00	01	102652	228525	329008
L17100710-03	1.00	01	103414	228343	323205
L17100710-05	1.00	01	107086	232478	329638
L17100710-06	1.00	01	102274	228730	326052
L17100710-07	1.00	01	103168	233208	325675
L17100710-08	1.00	01	103318	231611	325628
L17100710-09	1.00	01	110984	242381	341889
L17100710-10	1.00	01	103497	230566	324864
L17100710-11	1.00	01	106931	236890	337974
L17100710-12	1.00	01	105680	229137	322003
L17100710-13	1.00	01	104024	227064	322105
L17100710-14	1.00	01	100257	224150	311642
WG634877-01	1.00	01	112044	243002	346420
WG634877-02	1.00	01	111486	228867	318606
WG634877-03	1.00	01	124220	249235	350488
WG634877-04	1.00	01	105062	233035	333820

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD - Modified 03/06/2008
PDF File ID: 5541642
Report generated 10/23/2017 12:23

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG634877

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	134803	271293	383066
Upper Limit	NA	NA	269606	542586	766132
Lower Limit	NA	NA	67402	135647	191533
L17100710-02	1.00	01	102652	228525	329008
L17100710-03	1.00	01	103414	228343	323205
L17100710-05	1.00	01	107086	232478	329638
L17100710-06	1.00	01	102274	228730	326052
L17100710-07	1.00	01	103168	233208	325675
L17100710-08	1.00	01	103318	231611	325628
L17100710-09	1.00	01	110984	242381	341889
L17100710-10	1.00	01	103497	230566	324864
L17100710-11	1.00	01	106931	236890	337974
L17100710-12	1.00	01	105680	229137	322003
L17100710-13	1.00	01	104024	227064	322105
L17100710-14	1.00	01	100257	224150	311642
WG634877-01	1.00	01	112044	243002	346420
WG634877-02	1.00	01	111486	228867	318606
WG634877-03	1.00	01	124220	249235	350488

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5544074
Report generated 10/26/2017 12:51

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS6
Workgroup (AAB#): WG635011

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100710-04	1.00	01	244961	443111	584876
L17100710-15	1.00	01	253413	437583	579470
L17100710-16	1.00	01	251275	434979	580138
L17100710-17	1.00	01	248387	448229	588484
L17100710-18	1.00	01	243995	446304	594513
L17100710-19	1.00	01	242658	433409	572245
L17100710-20	1.00	01	275438	466045	606809
L17100710-21	1.00	01	280623	475549	619590
L17100710-22	50.0	DL01	253493	422986	562247
WG635011-01	1.00	01	249926	456505	606681
WG635011-02	1.00	01	274375	480514	630509

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5544074
Report generated 10/26/2017 12:51

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG635230

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	134803	271293	383066
Upper Limit	NA	NA	269606	542586	766132
Lower Limit	NA	NA	67402	135647	191533
L17100710-01	1.00	02	104664	233447	331451
WG635230-01	1.00	01	105196	234222	336466
WG635230-02	1.00	01	109606	224354	312499
WG635230-03	1.00	01	112414	232769	319426

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5544074
Report generated 10/26/2017 12:51

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO CCV)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG634877

CCV Number: WG634876-02
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG634876-02	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100710-01	1.00	01	16.92	14.1	10.47
L17100710-02	1.00	01	16.92	14.1	10.46
L17100710-03	1.00	01	16.92	14.1	10.47
L17100710-05	1.00	01	16.92	14.1	10.46
L17100710-06	1.00	01	16.92	14.1	10.47
L17100710-07	1.00	01	16.92	14.1	10.46
L17100710-08	1.00	01	16.92	14.1	10.47
L17100710-09	1.00	01	16.92	14.1	10.46
L17100710-10	1.00	01	16.92	14.1	10.46
L17100710-11	1.00	01	16.92	14.1	10.46
L17100710-12	1.00	01	16.92	14.1	10.47
L17100710-13	1.00	01	16.92	14.1	10.46
L17100710-14	1.00	01	16.92	14.1	10.46
WG634877-01	1.00	01	16.92	14.1	10.47
WG634877-02	1.00	01	16.92	14.1	10.46
WG634877-03	1.00	01	16.92	14.1	10.46
WG634877-04	1.00	01	16.92	14.1	10.46

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT - Modified 03/06/2008
PDF File ID: 5541644
Report generated 10/23/2017 12:23

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS6
Workgroup (AAB#): WG635011

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100710-04	1.00	01	18.12	15.1	11.22
L17100710-15	1.00	01	18.13	15.1	11.22
L17100710-16	1.00	01	18.13	15.1	11.22
L17100710-17	1.00	01	18.12	15.09	11.22
L17100710-18	1.00	01	18.12	15.1	11.22
L17100710-19	1.00	01	18.13	15.1	11.22
L17100710-20	1.00	01	18.12	15.1	11.22
L17100710-21	1.00	01	18.12	15.1	11.22
L17100710-22	50.0	DL01	18.12	15.1	11.22
WG635011-01	1.00	01	18.12	15.1	11.22
WG635011-02	1.00	01	18.12	15.1	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5544075
Report generated: 10/26/2017 12:51

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG634877

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100710-02	1.00	01	16.92	14.1	10.46
L17100710-03	1.00	01	16.92	14.1	10.47
L17100710-05	1.00	01	16.92	14.1	10.46
L17100710-06	1.00	01	16.92	14.1	10.47
L17100710-07	1.00	01	16.92	14.1	10.46
L17100710-08	1.00	01	16.92	14.1	10.47
L17100710-09	1.00	01	16.92	14.1	10.46
L17100710-10	1.00	01	16.92	14.1	10.46
L17100710-11	1.00	01	16.92	14.1	10.46
L17100710-12	1.00	01	16.92	14.1	10.47
L17100710-13	1.00	01	16.92	14.1	10.46
L17100710-14	1.00	01	16.92	14.1	10.46
WG634877-01	1.00	01	16.92	14.1	10.47
WG634877-02	1.00	01	16.92	14.1	10.46
WG634877-03	1.00	01	16.92	14.1	10.46

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5544075
Report generated: 10/26/2017 12:51

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100710
Instrument ID: HPMS11
Workgroup (AAB#): WG635230

ICAL CCV Number: WG633647-08
CAL ID: HPMS11-12-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633647-08	NA	NA	16.92	14.1	10.46
Upper Limit	NA	NA	17.42	14.6	10.96
Lower Limit	NA	NA	16.42	13.6	9.96
L17100710-01	1.00	02	16.92	14.1	10.47
WG635230-01	1.00	01	16.92	14.1	10.47
WG635230-02	1.00	01	16.92	14.1	10.47
WG635230-03	1.00	01	16.92	14.1	10.47

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5544075
Report generated: 10/26/2017 12:51

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 26, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 26, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17100710 / Revision: 0 / 242 total pages

COC No. A 49932

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz | Contact Phone #: 9143740003

Turn Around Requirements: | Location: Nashville, Tenn.

Project ID:

Sampler (print): Taylor Reed | Signature: T Reed

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	VOC	TOTAL # (LAB USE)
DR2-3-LA-26		X	10/10/17	1647	GW	4		4	
DUP-10-LA-26		X	10/10/17	1745	GW	3		3	
DUP-14-LA-26		X	10/10/17	1731	GW	3		3	
LTM-TB4-LA-26		X	10/10/17	1752	GW	3		3	
MW-25A-LA-26		X	10/10/17	1729	GW	4		4	
MW-37A-LA-26		X	10/10/17	1853	GW	4		4	
MW-52-LA-26		X	10/10/17	1709	GW	4		4	
MW-96-LA-26		X	10/10/17	1719	GW	3		3	
MW-97-LA-26		X	10/10/17	1752	GW	4		4	
MW-203B-LA-26		X	10/10/17	1545	GW	3		3	
MW-250-LA-26		X	10/10/17	1829	GW	4		4	
MW-261-LA-26		X	10/10/17	1803	GW	3		3	
MW-274-LA-26		X	10/10/17	1605	GW	3		3	
MW-277-LA-26		X	10/10/17	1842	GW	4		4	
DUP-7-LA-26		X	10/10/17	1850	GW	3		3	
MW-253-LA-26		X	10/10/17	1900	GW	3		3	
MW-283-LA-26		X	10/10/17	1941	GW	3		3	
DUP-13-LA-26		X	10/10/17	1946	GW	3		3	
MW-143-LA-26		X	10/10/17	1930	GW	2		2	
MW-143-LA-26-MS		X	10/10/17	1930	GW	2		2	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)
T Reed	10/10/17	2000	
Relinquished by: (Signature)	Date	Time	Received by: (Signature)

Relinquished by: | Date | Time | Received by: (Signature)

Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Microbac OVD
Received: 10/11/2017 11:03
By: BRENDA GREGORY
221000107358

Brenda Gregory

Generated: 10/26/2017 14:07

L17100710 / Revision: 0 / 242 total pages

COC No. A 49931

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lotz

Contact Phone #: 9143740003

Turn Around Requirements:

Location: New Texas

Project ID:

Sampler (print): Taylor Redmond

Signature:

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	VOC	TOTAL # (LAB USE)	ADDITIONAL REQUIREMENTS
MW-143-LA-26-MSD			10/10/17	1930	GW	2		2		
DR2-5-LA26		X	10/10/17	1910	GW	3		3		

10/10/17

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
	10/10/17	2020					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/26/2017 14:07

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7358

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

10/11/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

10/11/17

PRESERVATIVE EXCEPTIONS

✓ NONE

AS NOTED

10/11/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-01	979375	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	26-OCT-2017 07:19	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-02	979376	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 18:03	BRG		
2	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-03	979377	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-04	979378	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-05	979379	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-06	979380	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-07	979381	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17100710-08	979382	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:52	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-09	979383	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Samplenum	Container ID	Products
L17100710-10	979384	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-11	979385	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:23	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 18:03	BRG		
2	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100710-12	979386	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-13	979387	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100710-14	979388	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

Bottle: 4

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:51	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-15	979389	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-16	979390	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	11-OCT-2017 18:03	BRG		
2	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-17	979391	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-18	979392	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-19	979393	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-20	979394	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17100710-21	979395	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100710
Account: 2694
Project: 2694.011
Samples: 22
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100710-22	979396	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	11-OCT-2017 18:03	BRG		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	
3	STORE	ORG4	A2	25-OCT-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100839 *(Revised)*

Revised report to include an updated narrative for 8260.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 27 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100839
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

There were no discrepancies.

Discrepancy	Resolution

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00113200	I	1.0		100189171181000457500078806256513 2	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	Yes

Microbac

Lab Report #: L17100839
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
DR1-6A-LA-26	L17100839-01	10/11/2017 15:55	10/13/2017 10:32
DUP-8-LA-26	L17100839-02	10/12/2017 11:39	10/13/2017 10:32
MW-203A-LA-26	L17100839-03	10/12/2017 11:31	10/13/2017 10:32
LTM-TB5-LA-26	L17100839-04	10/12/2017 18:00	10/13/2017 10:32

Login Number: L17100839
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above range were observed for Chloromethane and Dichlorodifluormethane in the ICV WG633150-12 analyzed 10/10/2017 on HPMS6. All associated samples were non-detect for these analytes. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: All acceptance criteria were met.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The MS/MSD results were not associated with this sample delivery group (SDG), due to insufficient volume of sample. The laboratory included an LCS and LCS duplicate in the preparation batch in lieu of the NELAC prescribed MS/MSD. Microbac Laboratories recommends site specific MS/MSD samples to avoid possible data

qualifications.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 01 was run at a dilution. Straight analysis for sample 01 had naphthalene carry over. Because the B and C vials of this fraction had more sediment than the A vial, a 2.5x dilution analysis was the most concentrated run that could be used to confirm the absence of naphthalene in sample 01.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130731
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100839-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-6A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 18:36
Collect Date:	10/11/2017 15:55	**Dilution:**	1	**File ID:**	6M150868
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0	0.927	F	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	33.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3	6.71	F	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3	0.998	F	1.00	0.200
o-Xylene	95-47-6	0.452	F	1.00	0.250
p-Isopropyltoluene	99-87-6	0.920	F	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.45		1.00	0.250
Toluene	108-88-3	0.291	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	97.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-6A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 21:44
Collect Date:	10/11/2017 15:55	**Dilution:**	2.5	**File ID:**	6M150905
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	1.25	0.625
1,1,1-Trichloroethane	71-55-6		U	2.50	0.625
1,1,2,2-Tetrachloroethane	79-34-5		U	1.25	0.500
1,1,2-Trichloroethane	79-00-5		U	2.50	0.625
1,1-Dichloroethane	75-34-3		U	2.50	0.313
1,1-Dichloroethene	75-35-4		U	2.50	1.25
1,1-Dichloropropene	563-58-6		U	2.50	0.625
1,2,3-Trichlorobenzene	87-61-6		U	2.50	0.375
1,2,3-Trichloropropane	96-18-4		U	2.50	1.25
1,2,4-Trichlorobenzene	120-82-1		U	2.50	0.500
1,2,4-Trimethylbenzene	95-63-6		U	2.50	0.625
1,2-Dichloroethane	107-06-2		U	1.25	0.625
1,2-Dichlorobenzene	95-50-1		U	2.50	0.313
1,2-Dibromo-3-chloropropane	96-12-8		U	5.00	2.50
1,2-Dichloropropane	78-87-5		U	2.50	0.500
1,2-Dibromoethane	106-93-4		U	2.50	0.625
1,3,5-Trimethylbenzene	108-67-8		U	2.50	0.625
1,3-Dichlorobenzene	541-73-1		U	2.50	0.625
1,3-Dichloropropane	142-28-9		U	1.00	0.500
1,4-Dichlorobenzene	106-46-7		U	1.25	0.313
1-Chlorohexane	544-10-5		U	2.50	0.313
2,2-Dichloropropane	594-20-7		U	2.50	0.625
2-Hexanone	591-78-6		U	25.0	6.25
2-Chlorotoluene	95-49-8		U	2.50	0.313
4-Chlorotoluene	106-43-4		U	2.50	0.625
Acetone	67-64-1	44.5		25.0	6.25
Benzene	71-43-2		U	1.00	0.313
Bromobenzene	108-86-1		U	2.50	0.313
Bromochloromethane	74-97-5		U	2.50	0.500
Bromodichloromethane	75-27-4		U	1.25	0.625
Bromoform	75-25-2		U	2.50	1.25
Bromomethane	74-83-9		U	2.50	1.25

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	2.50	1.25
Carbon tetrachloride	56-23-5		U	2.50	0.625
Chlorobenzene	108-90-7		U	1.25	0.313
Chloroethane	75-00-3		U	2.50	1.25
Chloroform	67-66-3		U	0.750	0.313
Chloromethane	74-87-3		U	2.50	1.25
cis-1,2-Dichloroethene	156-59-2	25.9		2.50	0.625
cis-1,3-Dichloropropene	10061-01-5		U	1.25	0.625
Dibromochloromethane	124-48-1		U	1.25	0.625
Dibromomethane	74-95-3		U	2.50	0.625
Dichlorodifluoromethane	75-71-8		U	2.50	0.625
Ethylbenzene	100-41-4		U	2.50	0.625
Hexachlorobutadiene	87-68-3		U	1.50	0.625
Isopropylbenzene	98-82-8		U	2.50	0.625
Methylene chloride	75-09-2	21.3		2.50	0.625
Methyl t-butyl ether (MTBE)	1634-04-4		U	12.5	1.25
MEK (2-Butanone)	78-93-3	7.08	F	25.0	6.25
MIBK (methyl isobutyl ketone)	108-10-1		U	25.0	6.25
n-Butylbenzene	104-51-8		U	2.50	0.625
n-Propylbenzene	103-65-1		U	2.50	0.313
m-,p-Xylene	179601-23-1		U	5.00	1.25
Naphthalene	91-20-3		U	2.50	0.500
o-Xylene	95-47-6		U	2.50	0.625
p-Isopropyltoluene	99-87-6		U	2.50	0.625
sec-Butylbenzene	135-98-8		U	2.50	0.625
Styrene	100-42-5		U	2.50	0.313
Trichloroethene	79-01-6	7.67		2.50	0.625
tert-Butylbenzene	98-06-6		U	2.50	0.625
Tetrachloroethene	127-18-4	1.61	F	2.50	0.625
Toluene	108-88-3		U	2.50	0.625
trans-1,2-Dichloroethene	156-60-5		U	2.50	0.625
trans-1,3-Dichloropropene	10061-02-6		U	2.50	1.25
Trichlorofluoromethane	75-69-4		U	2.50	0.625
Vinyl chloride	75-01-4		U	2.50	0.625

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	97.9	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-8-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 19:06
Collect Date:	10/12/2017 11:39	**Dilution:**	1	**File ID:**	6M150869
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.18	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.771	F	1.00	0.250
Toluene	108-88-3	0.737	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-203A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 19:36
Collect Date:	10/12/2017 11:31	**Dilution:**	1	**File ID:**	6M150870
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.25	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.884	F	1.00	0.250
Toluene	108-88-3	0.776	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 14:10
Collect Date:	10/12/2017 18:00	**Dilution:**	1	**File ID:**	6M150859
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100839
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recoveries above range were observed for Chloromethane and Dichlorodifluormethane in the ICV WG633150-12 analyzed 10/10/2017 on HPMS6. All associated samples were non-detect for these analytes. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: All acceptance criteria were met.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: The MS/MSD results were not associated with this sample delivery group (SDG), due to insufficient volume of sample. The laboratory included an LCS and LCS duplicate in the preparation batch in lieu of the NELAC prescribed MS/MSD. Microbac Laboratories recommends site specific MS/MSD samples to avoid possible data

qualifications.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Sample 01 was run at a dilution. Straight analysis for sample 01 had naphthalene carry over. Because the B and C vials of this fraction had more sediment than the A vial, a 2.5x dilution analysis was the most concentrated run that could be used to confirm the absence of naphthalene in sample 01.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130731
Approved By: Sarah Vandenberg
Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100839-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-6A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 18:36
Collect Date:	10/11/2017 15:55	**Dilution:**	1	**File ID:**	6M150868
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0	0.927	F	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	33.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3	6.71	F	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3	0.998	F	1.00	0.200
o-Xylene	95-47-6	0.452	F	1.00	0.250
p-Isopropyltoluene	99-87-6	0.920	F	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	10.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.45		1.00	0.250
Toluene	108-88-3	0.291	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	97.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DR1-6A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG635011	**Analyst:**	TMB	**Run Date:**	10/23/2017 21:44
Collect Date:	10/11/2017 15:55	**Dilution:**	2.5	**File ID:**	6M150905
Sample Tag:	DL01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	1.25	0.625
1,1,1-Trichloroethane	71-55-6		U	2.50	0.625
1,1,2,2-Tetrachloroethane	79-34-5		U	1.25	0.500
1,1,2-Trichloroethane	79-00-5		U	2.50	0.625
1,1-Dichloroethane	75-34-3		U	2.50	0.313
1,1-Dichloroethene	75-35-4		U	2.50	1.25
1,1-Dichloropropene	563-58-6		U	2.50	0.625
1,2,3-Trichlorobenzene	87-61-6		U	2.50	0.375
1,2,3-Trichloropropane	96-18-4		U	2.50	1.25
1,2,4-Trichlorobenzene	120-82-1		U	2.50	0.500
1,2,4-Trimethylbenzene	95-63-6		U	2.50	0.625
1,2-Dichloroethane	107-06-2		U	1.25	0.625
1,2-Dichlorobenzene	95-50-1		U	2.50	0.313
1,2-Dibromo-3-chloropropane	96-12-8		U	5.00	2.50
1,2-Dichloropropane	78-87-5		U	2.50	0.500
1,2-Dibromoethane	106-93-4		U	2.50	0.625
1,3,5-Trimethylbenzene	108-67-8		U	2.50	0.625
1,3-Dichlorobenzene	541-73-1		U	2.50	0.625
1,3-Dichloropropane	142-28-9		U	1.00	0.500
1,4-Dichlorobenzene	106-46-7		U	1.25	0.313
1-Chlorohexane	544-10-5		U	2.50	0.313
2,2-Dichloropropane	594-20-7		U	2.50	0.625
2-Hexanone	591-78-6		U	25.0	6.25
2-Chlorotoluene	95-49-8		U	2.50	0.313
4-Chlorotoluene	106-43-4		U	2.50	0.625
Acetone	67-64-1	44.5		25.0	6.25
Benzene	71-43-2		U	1.00	0.313
Bromobenzene	108-86-1		U	2.50	0.313
Bromochloromethane	74-97-5		U	2.50	0.500
Bromodichloromethane	75-27-4		U	1.25	0.625
Bromoform	75-25-2		U	2.50	1.25
Bromomethane	74-83-9		U	2.50	1.25

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	2.50	1.25
Carbon tetrachloride	56-23-5		U	2.50	0.625
Chlorobenzene	108-90-7		U	1.25	0.313
Chloroethane	75-00-3		U	2.50	1.25
Chloroform	67-66-3		U	0.750	0.313
Chloromethane	74-87-3		U	2.50	1.25
cis-1,2-Dichloroethene	156-59-2	25.9		2.50	0.625
cis-1,3-Dichloropropene	10061-01-5		U	1.25	0.625
Dibromochloromethane	124-48-1		U	1.25	0.625
Dibromomethane	74-95-3		U	2.50	0.625
Dichlorodifluoromethane	75-71-8		U	2.50	0.625
Ethylbenzene	100-41-4		U	2.50	0.625
Hexachlorobutadiene	87-68-3		U	1.50	0.625
Isopropylbenzene	98-82-8		U	2.50	0.625
Methylene chloride	75-09-2	21.3		2.50	0.625
Methyl t-butyl ether (MTBE)	1634-04-4		U	12.5	1.25
MEK (2-Butanone)	78-93-3	7.08	F	25.0	6.25
MIBK (methyl isobutyl ketone)	108-10-1		U	25.0	6.25
n-Butylbenzene	104-51-8		U	2.50	0.625
n-Propylbenzene	103-65-1		U	2.50	0.313
m-,p-Xylene	179601-23-1		U	5.00	1.25
Naphthalene	91-20-3		U	2.50	0.500
o-Xylene	95-47-6		U	2.50	0.625
p-Isopropyltoluene	99-87-6		U	2.50	0.625
sec-Butylbenzene	135-98-8		U	2.50	0.625
Styrene	100-42-5		U	2.50	0.313
Trichloroethene	79-01-6	7.67		2.50	0.625
tert-Butylbenzene	98-06-6		U	2.50	0.625
Tetrachloroethene	127-18-4	1.61	F	2.50	0.625
Toluene	108-88-3		U	2.50	0.625
trans-1,2-Dichloroethene	156-60-5		U	2.50	0.625
trans-1,3-Dichloropropene	10061-02-6		U	2.50	1.25
Trichlorofluoromethane	75-69-4		U	2.50	0.625
Vinyl chloride	75-01-4		U	2.50	0.625

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	106	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	97.9	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-8-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 19:06
Collect Date:	10/12/2017 11:39	**Dilution:**	1	**File ID:**	6M150869
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.0		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

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Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.0		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.18	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.39		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.771	F	1.00	0.250
Toluene	108-88-3	0.737	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	99.0	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-203A-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 19:36
Collect Date:	10/12/2017 11:31	**Dilution:**	1	**File ID:**	6M150870
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

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Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	24.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	2.25	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.42		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.884	F	1.00	0.250
Toluene	108-88-3	0.776	F	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100839-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	LTM-TB5-LA-26	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG634867	**Analyst:**	TMB	**Run Date:**	10/20/2017 14:10
Collect Date:	10/12/2017 18:00	**Dilution:**	1	**File ID:**	6M150859
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

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Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Analyst(s): CPD
Date: 10/18/17
Filter Lot #: 9814092

Agitator Speed 30 ± 2 rpm ☑

Balance ID: BAL020
pH Probe ID: T5
Temp probe ID: ☒ 1025 ☐ 1023

Analyst / Date		Analyst / Date	
CPD	10/18/17	CPD	10/19/17
Time On	Temp On °C	Time Off	Temp Off °C
1603	22.8	0828	22.3

ZHE	Sample #	Pressure √	PSI ON	PSI OFF	Method	Fluid #	Matrix*	%Solid	Size Reduction Yes	Size Reduction No	Int. Wt. (g)	Fluid Vol. (mL)
A												
B												
C												
D												
E												
F												
G												
H												
I												
J	10-1072-02	✓	10	10	1311	F1-284	S	100		✓	25.01	500
K												
L												
M												
N												
O												
P												
Q												
R												
S												
NA	10-1004-01	NA	NA	NA	1311	FIL	W	<0.5	NA	NA	40	40
↓	10-1005-01	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓
↓	10-1006-01	↓	↓	↓	↓	↓	O	<0.5	↓	↓	↓	↓
↓	10-1007-01	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓	↓
NA	FBLK1(ZHE)	NA	NA	NA	1311	F1-284	NA	NA	NA	NA	40	40

CPD 10/19/17
CPD 10/19/17
CPD 10/19/17

*Matrix Code = (S-solid) (SS-sand, soil or sludge) (P-paint) (O-organic) (W-water or waste)

Comments: N/A

Peer Review By: Brandon Richards

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
	Not needed, DNR.			
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
	L17100420-01			

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: STD84456

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634867

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150853	WG634866-01 50ng BFB STD 8260	NA	1	1	STD84001	10/20/17 11:17
6M150854	WG634866-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/20/17 11:42
6M150855	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/20/17 12:12
6M150856	WG634867-01 BLK 1020 STD 8260	NA	1	1		10/20/17 12:41
6M150857	WG634867-02 20ug/L LCS STD 8260	NA	1	1	STD84456	10/20/17 13:11
6M150858	L17100670-05 A TB 8260	<2	1	1		10/20/17 13:41
6M150859	L17100839-04 A TB 826-SPE	<2	1	1		10/20/17 14:10
6M150860	L17100637-25 C 826-SPE	<2	1	1		10/20/17 14:40
6M150861	L17100670-04 A 8260	<2	1	1		10/20/17 15:10
6M150862	L17100891-21 A RS 2X 826-SPE	<2	1	2		10/20/17 15:39
6M150863	L17100891-18 A 2.5X 826-SPE	<2	1	2.5		10/20/17 16:09
6M150864	L17100891-19 A 20X 826-SPE	<2	1	20		10/20/17 16:39
6M150865	L17100891-20 A 500X 826-SPE	<2	1	500		10/20/17 17:08
6M150866	L17100891-24 A 5X 826-SPE	<2	1	5		10/20/17 17:37
6M150867	L17101162-01 A 826-SPE	<2	1	1		10/20/17 18:07
6M150868	L17100839-01 A 826-SPE	4	1	1		10/20/17 18:36
6M150869	L17100839-02 A 826-SPE	<2	1	1		10/20/17 19:06
6M150870	L17100839-03 A 826-SPE	<2	1	1		10/20/17 19:36
6M150871	L17101004-01 A 10X 826-TC	NA	17	10		10/20/17 20:06
6M150872	L17100891-21 B 826-SPE	<2	1	1		10/20/17 20:36
6M150873	L17100891-22 B MS 826-SPE	<2	1	1	STD84456	10/20/17 21:06
6M150874	L17100891-23 A MSD 826-SPE	<2	1	1	STD84456	10/20/17 21:36
6M150875	L17100670-01 A 200X 8260	<2	1	200		10/20/17 22:06
6M150876	L17100670-02 A 500X 8260	<2	1	500		10/20/17 22:35
6M150877	L17100670-03 A 2000X 8260	<2	1	2000		10/20/17 23:05
6M150878	CCV	NA	1	1		10/20/17 23:35
6M150879	RINSE	NA	1	1		10/21/17 00:05
6M150880	RINSE	NA	1	1		10/21/17 00:34
6M150881	RINSE	NA	1	1		10/21/17 01:04

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				

Approved: October 23, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84456 MS/MSD: STD84456

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG634867

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M150855				
	Not needed, DNR.			
10	X	1	Analyzed too dilute	
File ID: 6M150862				
	L17100891-21 DNR.			
13	X	2500	Over Calibration Range	cis12-dce
File ID: 6M150865				
	L17100891-20			
14	X	20	Over Calibration Range	vc, cis12-dce
File ID: 6M150866				
	L17100891-24			
16	X	1	Carry-over contamination	
File ID: 6M150868				
	L17100839-01 has possible naph carry over.			
23	X	100	Analyzed too dilute	
File ID: 6M150875				
	L17100670-01			

Approved: October 23, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54368

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84517 MS/MSD: STD84517

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635011; WG635053

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150882	WG635010-01 50ng BFB STD 8260	NA	1	1	STD84515	10/23/17 10:25
6M150883	WG635010-02 50ug/L CCV STD 8260	NA	1	1	STD84376	10/23/17 10:50
6M150884	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/23/17 11:22
6M150885	WG635011-01 BLK 1023 STD 8260	NA	1	1		10/23/17 11:52
6M150886	WG635011-02 20ug/L LCS STD 8260	NA	1	1	STD84517	10/23/17 12:21
6M150887	L17101282-02 A TB 826-BETX	<2	1	1		10/23/17 12:49
6M150888	L17100891-01 B TB 826-SPE	<2	1	1		10/23/17 13:19
6M150889	L17100891-03 B 826-SPE	<2	1	1		10/23/17 13:49
6M150890	L17100710-04 TB A 826-SPE	<2	1	1		10/23/17 14:18
6M150891	L17100710-15 A 826-SPE	<2	1	1		10/23/17 14:47
6M150892	L17100710-16 A 826-SPE	<2	1	1		10/23/17 15:17
6M150893	L17100710-17 A 826-SPE	<2	1	1		10/23/17 15:47
6M150894	L17100710-18 A 826-SPE	<2	1	1		10/23/17 16:17
6M150895	L17100710-19 A RS 826-SPE	<2	1	1		10/23/17 16:47
6M150896	L17100710-20 A MS 826-SPE	<2	1	1	STD84517	10/23/17 17:16
6M150897	L17100710-21 A MSD 826-SPE	<2	1	1	STD84517	10/23/17 17:45
6M150898	L17101005-01 A 10X 826-TC	<2	17	10		10/23/17 18:15
6M150899	L17100670-01 B 100X 8260	<2	1	100		10/23/17 18:45
6M150900	L17100891-20 B 2500X D1 826-SPE	<2	1	2500		10/23/17 19:15
6M150901	L17100891-24 B 20X D1 826-SPE	<2	1	20		10/23/17 19:45
6M150902	L17101282-01 A 826-BETX	<2	1	1		10/23/17 20:14
6M150903	L17101064-20 A 826-LOW	<2	2	1		10/23/17 20:44
6M150904	L17101208-01 A 826-SPE	<2	1	1		10/23/17 21:14
6M150905	L17100839-01 2.5X C 826-SPE	4	1	2.5		10/23/17 21:44
6M150906	L17100710-22 A 50X 826-SPE	<2	1	50		10/23/17 22:13
6M150907	WG635053-02 20ug/L LCS STD 624	NA	2	1	STD84517	10/23/17 22:43
6M150908	WG635053-03 20ug/L LCS2 STD 624	NA	2	1	STD84517	10/23/17 23:13
6M150909	RINSE	NA	2	1		10/23/17 23:43
6M150910	WG635053-01 BLK 1023 STD 624	NA	2	1		10/24/17 00:12
6M150911	L17101267-15 A TB 624-SPE1	5	2	1		10/24/17 00:42
6M150912	L17101267-13 A EB 624-SPE1	5	2	1		10/24/17 01:12
6M150913	L17101269-05 A TB 624-SPE1	5	2	1		10/24/17 01:42
6M150914	L17101252-02 B 624-SPE	6	2	1		10/24/17 02:12
6M150915	L17101269-03 A 624-SPE1	7	2	1		10/24/17 02:42

Approved: October 24, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 102317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54368

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84376 LCS: STD84517 MS/MSD: STD84517

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG635011; WG635053

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150916	L17101267-07 A RS 624-SPE1	7	2	1		10/24/17 03:11
6M150917	L17101267-09 A MS 624-SPE1	7	2	1	STD84517	10/24/17 03:41
6M150918	L17101267-11 A MSD 624-SPE1	7	2	1	STD84517	10/24/17 04:11
6M150919	L17101269-01 A 5X 624-SPE1	6	2	5		10/24/17 04:41
6M150920	CCV	NA	1	1		10/24/17 05:11
6M150921	RINSE	NA	1	1		10/24/17 05:41
6M150922	WG634509-01 A FBLK 10X 826-TC-SPE	NA	17	10		10/24/17 06:11

Comments

Seq.	Rerun	Dil.	Reason	Analytes
3				
File ID: 6M150884				
	Not needed, DNR.			
24				
File ID: 6M150905				
	L17100839-01 had brown sediment. Vial got cracked and volume was lost.			

Approved: October 24, 2017

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Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

Microbac Laboratories Inc.

Data Checklist

Date: 20-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85417
Analytical Workgroups: WG634867

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
23-OCT-2017

Secondary Reviewer:
23-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-23-2017 14:12:38

Microbac Laboratories Inc.

Data Checklist

Date: 23-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85446
Analytical Workgroups: WG635011; WG635053

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-OCT-2017
Tiffany Bailey

Secondary Reviewer:
24-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-24-2017 15:00:47

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG634867

Login Number: L17100839

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR1-6A-LA-26	01	10/11/17					10/20/2017	9.1	14		10/20/17	9.1	14	
DUP-8-LA-26	02	10/12/17					10/20/2017	8.3	14		10/20/17	8.3	14	
MW-203A-LA-26	03	10/12/17					10/20/2017	8.3	14		10/20/17	8.3	14	
LTM-TB5-LA-26	04	10/12/17					10/20/2017	7.8	14		10/20/17	7.8	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5541465
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG635011

Login Number: L17100839

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
DR1-6A-LA-26	01	10/11/17					10/23/2017	12.2	14		10/23/17	12.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5541465
Report generated 10/25/2017 13:36

Login Number: L17100839
Instrument Id: HPMS6
Workgroup (AAB#): WG634867

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100839-01	1.00	01	109	104	97.0	99.1
L17100839-02	1.00	01	108	103	99.0	99.1
L17100839-03	1.00	01	109	104	100	100
L17100839-04	1.00	01	110	104	101	99.9
WG634867-01	1.00	01	108	104	99.8	100
WG634867-02	1.00	01	106	104	97.2	99.0

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5541472
Report generated: 10/25/2017 13:37

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100839
Instrument Id: HPMS6
Workgroup (AAB#): WG635011

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100839-01	2.50	DL01	110	106	97.9	100
WG635011-01	1.00	01	111	104	101	98.1
WG635011-02	1.00	01	109	104	99.1	99.8

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5541472
Report generated: 10/25/2017 13:37

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100839	**Work Group:**	WG634867
Blank File ID:	6M150856	**Blank Sample ID:**	WG634867-01
Prep Date:	10/20/17 12:41	**Instrument ID:**	HPMS6
Analyzed Date:	10/20/17 12:41	**Method:**	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG634867-02	6M150857	10/20/17 13:11	01
LTM-TB5-LA-26	L17100839-04	6M150859	10/20/17 14:10	01
DR1-6A-LA-26	L17100839-01	6M150868	10/20/17 18:36	01
DUP-8-LA-26	L17100839-02	6M150869	10/20/17 19:06	01
MW-203A-LA-26	L17100839-03	6M150870	10/20/17 19:36	01

Report Name: BLANK_SUMMARY
PDF File ID: 5541990
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17100839	**Work Group:**	WG635011
Blank File ID:	6M150885	**Blank Sample ID:**	WG635011-01
Prep Date:	10/23/17 11:52	**Instrument ID:**	HPMS6
Analyzed Date:	10/23/17 11:52	**Method:**	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG635011-02	6M150886	10/23/17 12:21	01
DR1-6A-LA-26	L17100839-01	6M150905	10/23/17 21:44	DL01

Report Name: BLANK_SUMMARY
PDF File ID: 5541990
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100839 Prep Date: 10/20/17 12:41 Sample ID: WG634867-01
Instrument ID: HPMS6 Run Date: 10/20/17 12:41 Prep Method: 5030B/5030C/503
File ID: 6M150856 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5541466
25-OCT-2017 13:36

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100839 Prep Date: 10/20/17 12:41 Sample ID: WG634867-01
Instrument ID: HPMS6 Run Date: 10/20/17 12:41 Prep Method: 5030B/5030C/503
File ID: 6M150856 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	108	72	-	119	PASS
Toluene-d8	100	81	-	120	PASS
4-Bromofluorobenzene	99.8	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5541466
25-OCT-2017 13:36

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100839 Prep Date:10/23/17 11:52 Sample ID:WG635011-01
Instrument ID:HPMS6 Run Date:10/23/17 11:52 Prep Method:5030B/5030C/503
File ID:6M150885 Analyst:TMB Method:8260B
Workgroup (AAB#):WG635011 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5541466
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Microbac Laboratories Inc.
METHOD BLANK REPORT

Login Number: L17100839 Prep Date: 10/23/17 11:52 Sample ID: WG635011-01
Instrument ID: HPMS6 Run Date: 10/23/17 11:52 Prep Method: 5030B/5030C/503
File ID: 6M150885 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	104	85	-	115	PASS
1,2-Dichloroethane-d4	111	72	-	119	PASS
Toluene-d8	98.1	81	-	120	PASS
4-Bromofluorobenzene	101	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5541466
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Login Number: L17100839 Run Date: 10/20/2017 Sample ID: WG634867-02
Instrument ID: HPMS6 Run Time: 13:11 Prep Method: 5030B/5030C/503
File ID: 6M150857 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84456 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.6	103	81 - 129	
1,1,1-Trichloroethane	20.0	22.1	110	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.6	92.8	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.6	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	21.3	106	68 - 130	
1,1-Dichloropropene	20.0	21.5	107	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.6	98.0	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.8	98.8	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	22.2	111	69 - 132	
1,2-Dichlorobenzene	20.0	19.7	98.7	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.8	104	50 - 132	
1,2-Dichloropropane	20.0	20.5	103	75 - 125	
1,2-Dibromoethane	20.0	20.5	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.7	104	74 - 131	
1,3-Dichlorobenzene	20.0	19.6	97.8	75 - 124	
1,3-Dichloropropane	20.0	20.8	104	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	94.2	74 - 123	
1,4-Dioxane	200	193	96.7	60 - 140	
1-Chlorohexane	20.0	20.0	100	70 - 125	
2,2-Dichloropropane	20.0	20.2	101	69 - 137	
2-Hexanone	20.0	20.2	101	55 - 130	
2-Chlorotoluene	20.0	17.7	88.3	73 - 126	
4-Chlorotoluene	20.0	22.5	113	74 - 128	
Acetone	20.0	22.6	113	40 - 135	
Benzene	20.0	20.2	101	81 - 122	
Bromobenzene	20.0	19.3	96.4	76 - 124	
Bromochloromethane	20.0	20.9	105	65 - 129	
Bromodichloromethane	20.0	20.9	105	76 - 121	
Bromoform	20.0	19.7	98.3	69 - 128	
Bromomethane	20.0	15.9	79.3	30 - 141	
Carbon disulfide	20.0	17.2	85.9	58 - 128	
Carbon tetrachloride	20.0	22.4	112	66 - 138	
Chlorobenzene	20.0	20.2	101	81 - 122	
Chloroethane	20.0	22.3	111	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	24.1	120	56 - 131	
cis-1,2-Dichloroethene	20.0	20.5	103	72 - 126	
cis-1,3-Dichloropropene	20.0	22.7	113	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5541467
Report generated: 10/25/2017 13:36

Login Number: L17100839 Run Date: 10/20/2017 Sample ID: WG634867-02
Instrument ID: HPMS6 Run Time: 13:11 Prep Method: 5030B/5030C/503
File ID: 6M150857 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG634867 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84456 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.1	101	66 - 133	
Dibromomethane	20.0	21.6	108	76 - 125	
Dichlorodifluoromethane	20.0	26.6	133	30 - 153	
Ethylbenzene	20.0	20.4	102	73 - 127	
Hexachlorobutadiene	20.0	18.3	91.5	67 - 131	
Isopropylbenzene	20.0	20.5	102	75 - 127	
Methylene chloride	20.0	19.3	96.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.0	99.9	65 - 123	
MEK (2-Butanone)	20.0	21.6	108	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	20.8	104	72 - 129	
m-,p-Xylene	40.0	40.9	102	76 - 128	
Naphthalene	20.0	20.4	102	54 - 138	
o-Xylene	20.0	20.9	104	80 - 121	
p-Isopropyltoluene	20.0	20.4	102	73 - 130	
sec-Butylbenzene	20.0	20.0	100	72 - 127	
Styrene	20.0	21.4	107	65 - 134	
Trichloroethene	20.0	20.6	103	70 - 127	
tert-Butylbenzene	20.0	20.3	102	70 - 129	
Tetrachloroethene	20.0	20.0	100	66 - 128	
Toluene	20.0	20.0	100	77 - 122	
trans-1,2-Dichloroethene	20.0	20.6	103	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	104	59 - 135	
Trichlorofluoromethane	20.0	21.9	110	57 - 129	
Vinyl chloride	20.0	26.2	131	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	99.0	81 - 120	PASS
4-Bromofluorobenzene	97.2	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5541467
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Login Number: L17100839 Run Date: 10/23/2017 Sample ID: WG635011-02
Instrument ID: HPMS6 Run Time: 12:21 Prep Method: 5030B/5030C/503
File ID: 6M150886 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84517 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.6	103	81 - 129	
1,1,1-Trichloroethane	20.0	22.3	111	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.7	93.7	63 - 128	
1,1,2-Trichloroethane	20.0	20.2	101	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	21.4	107	68 - 130	
1,1-Dichloropropene	20.0	21.3	107	73 - 132	
1,2,3-Trichlorobenzene	20.0	19.3	96.3	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	19.3	96.3	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.0	100	74 - 132	
1,2-Dichloroethane	20.0	22.8	114	69 - 132	
1,2-Dichlorobenzene	20.0	19.5	97.4	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	20.8	104	75 - 125	
1,2-Dibromoethane	20.0	20.5	102	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.1	100	74 - 131	
1,3-Dichlorobenzene	20.0	19.3	96.4	75 - 124	
1,3-Dichloropropane	20.0	20.8	104	73 - 126	
1,4-Dichlorobenzene	20.0	18.5	92.5	74 - 123	
1,4-Dioxane	200	174	87.1	60 - 140	
1-Chlorohexane	20.0	19.3	96.5	70 - 125	
2,2-Dichloropropane	20.0	20.7	103	69 - 137	
2-Hexanone	20.0	20.5	102	55 - 130	
2-Chlorotoluene	20.0	19.9	99.7	73 - 126	
4-Chlorotoluene	20.0	19.0	95.1	74 - 128	
Acetone	20.0	23.3	117	40 - 135	
Benzene	20.0	20.0	100	81 - 122	
Bromobenzene	20.0	19.2	96.2	76 - 124	
Bromochloromethane	20.0	21.3	107	65 - 129	
Bromodichloromethane	20.0	20.8	104	76 - 121	
Bromoform	20.0	18.9	94.4	69 - 128	
Bromomethane	20.0	10.9	54.4	30 - 141	
Carbon disulfide	20.0	17.2	86.2	58 - 128	
Carbon tetrachloride	20.0	22.5	112	66 - 138	
Chlorobenzene	20.0	19.9	99.4	81 - 122	
Chloroethane	20.0	14.8	74.0	58 - 133	
Chloroform	20.0	20.9	105	69 - 128	
Chloromethane	20.0	23.2	116	56 - 131	
cis-1,2-Dichloroethene	20.0	20.7	103	72 - 126	
cis-1,3-Dichloropropene	20.0	22.7	114	69 - 131	

LCS - Modified 03/06/2008
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Login Number: L17100839 Run Date: 10/23/2017 Sample ID: WG635011-02
Instrument ID: HPMS6 Run Time: 12:21 Prep Method: 5030B/5030C/503
File ID: 6M150886 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG635011 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84517 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	20.0	99.8	66 - 133	
Dibromomethane	20.0	21.9	110	76 - 125	
Dichlorodifluoromethane	20.0	24.4	122	30 - 153	
Ethylbenzene	20.0	20.1	101	73 - 127	
Hexachlorobutadiene	20.0	17.1	85.5	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	19.5	97.4	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.4	102	65 - 123	
MEK (2-Butanone)	20.0	21.7	108	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	20.1	100	58 - 134	
n-Butylbenzene	20.0	18.7	93.6	69 - 137	
n-Propylbenzene	20.0	20.3	101	72 - 129	
m-,p-Xylene	40.0	39.9	99.7	76 - 128	
Naphthalene	20.0	20.8	104	54 - 138	
o-Xylene	20.0	20.5	102	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.4	73 - 130	
sec-Butylbenzene	20.0	19.1	95.7	72 - 127	
Styrene	20.0	21.1	105	65 - 134	
Trichloroethene	20.0	20.7	104	70 - 127	
tert-Butylbenzene	20.0	19.7	98.7	70 - 129	
Tetrachloroethene	20.0	19.9	99.3	66 - 128	
Toluene	20.0	19.9	99.5	77 - 122	
trans-1,2-Dichloroethene	20.0	20.8	104	63 - 137	
trans-1,3-Dichloropropene	20.0	20.8	104	59 - 135	
Trichlorofluoromethane	20.0	21.5	107	57 - 129	
Vinyl chloride	20.0	24.1	120	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	109	72 - 119	PASS
Toluene-d8	99.8	81 - 120	PASS
4-Bromofluorobenzene	99.1	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5541467
Report generated: 10/25/2017 13:36

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100839
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541469
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100839
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541469
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100839
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541469
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100839
Instrument: HPMS6
Analyst: TMB
Workgroup: WG634866

Tune ID: WG634866-01
Run Date: 10/20/2017
Run Time: 11:17
File ID: 6M150853
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	24.9	8664	PASS
75.0	95.0	30.0	60.0	52.4	18257	PASS
95.0	95.0	100	100	100	34821	PASS
96.0	95.0	5.00	9.00	7.18	2499	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	73.3	25536	PASS
175	174	5.00	9.00	6.95	1776	PASS
176	174	95.0	101	98.4	25124	PASS
177	176	5.00	9.00	7.38	1854	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG634866-02	CCV	01	10/20/2017 11:42	
WG634867-01	BLANK	01	10/20/2017 12:41	
WG634867-02	LCS	01	10/20/2017 13:11	
L17100839-04	LTM-TB5-LA-26	01	10/20/2017 14:10	
L17100839-01	DR1-6A-LA-26	01	10/20/2017 18:36	
L17100839-02	DUP-8-LA-26	01	10/20/2017 19:06	
L17100839-03	MW-203A-LA-26	01	10/20/2017 19:36	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541469
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100839
Instrument: HPMS6
Analyst: TMB
Workgroup: WG635010

Tune ID: WG635010-01
Run Date: 10/23/2017
Run Time: 10:25
File ID: 6M150882
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.2	6271	PASS
75.0	95.0	30.0	60.0	51.3	13835	PASS
95.0	95.0	100	100	100	26989	PASS
96.0	95.0	5.00	9.00	6.51	1756	PASS
173	174	0	2.00	0.446	100	PASS
174	95.0	50.0	100	83.0	22408	PASS
175	174	5.00	9.00	7.19	1612	PASS
176	174	95.0	101	97.0	21738	PASS
177	176	5.00	9.00	6.21	1351	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG635010-02	CCV	01	10/23/2017 10:50	
WG635011-01	BLANK	01	10/23/2017 11:52	
WG635011-02	LCS	01	10/23/2017 12:21	
L17100839-01	DR1-6A-LA-26	DL01	10/23/2017 21:44	
WG634509-01	FBLK1	DL01	10/24/2017 06:11	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5541469
Report generated 10/25/2017 13:36

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100839 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5541468
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100839 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5541468
Report generated 10/25/2017 13:36

Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100839 Run Date: 10/20/2017 Sample ID: WG634866-02
Instrument ID: HPMS6 Run Time: 11:42 Method: 8260B
File ID: 6M150854 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG634867 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.4	ug/L	0.504	4.71	20	
1,2-Dichloropropane	CCC	50.0	52.0	ug/L	0.332	3.94	20	
Chloroform	CCC	50.0	51.9	ug/L	0.552	3.72	20	
Ethylbenzene	CCC	50.0	51.7	ug/L	0.549	3.34	20	
Toluene	CCC	50.0	51.2	ug/L	1.53	2.35	20	
Vinyl Chloride	CCC	50.0	52.7	ug/L	0.275	5.42	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	46.6	ug/L	0.601	6.88	20	
1,1-Dichloroethane	SPCC	50.0	51.0	ug/L	0.592	2.09	20	
Bromoform	SPCC	50.0	53.1	ug/L	0.244	6.12	20	
Chlorobenzene	SPCC	50.0	50.1	ug/L	1.02	0.140	20	
Chloromethane	SPCC	50.0	49.0	ug/L	0.313	2.04	20	
Xylenes		150	157	ug/L	0.670	4.95	20	
1,1,1,2-Tetrachloroethane		50.0	54.2	ug/L	0.411	8.42	20	
1,1,1-Trichloroethane		50.0	55.3	ug/L	0.515	10.5	20	
1,1,2-Trichloroethane		50.0	49.7	ug/L	0.291	0.636	20	
1,1-Dichloropropene		50.0	53.2	ug/L	0.402	6.31	20	
1,2,3-Trichlorobenzene		50.0	48.8	ug/L	0.962	2.43	20	
1,2,3-Trichloropropane		50.0	47.6	ug/L	0.186	4.80	20	
1,2,4-Trichlorobenzene		50.0	51.1	ug/L	1.08	2.22	20	
1,2,4-Trimethylbenzene		50.0	52.1	ug/L	2.76	4.11	20	
1,2-Dichloroethane		50.0	55.0	ug/L	0.447	9.96	20	
1,2-Dichlorobenzene		50.0	49.4	ug/L	1.49	1.25	20	
1,2-Dibromo-3-Chloropropane		50.0	49.6	ug/L	0.121	0.759	20	
1,2-Dibromoethane		50.0	51.2	ug/L	0.285	2.32	20	
1,3,5-Trimethylbenzene		50.0	54.5	ug/L	2.67	8.96	20	
1,3-Dichlorobenzene		50.0	51.1	ug/L	1.61	2.11	20	
1,3-Dichloropropane		50.0	48.9	ug/L	0.500	2.18	20	
1,4-Dichlorobenzene		50.0	47.9	ug/L	1.61	4.26	20	
1,4-Dioxane		200	178	ug/L	0.00190	10.8	20	
1-Chlorohexane		50.0	51.1	ug/L	0.471	2.19	20	
2,2-Dichloropropane		50.0	51.7	ug/L	0.465	3.45	20	
2-Hexanone		50.0	46.6	ug/L	0.228	6.70	20	
2-Chlorotoluene		50.0	47.2	ug/L	2.31	5.51	20	
4-Chlorotoluene		50.0	56.1	ug/L	2.38	12.3	20	
Acetone		50.0	50.6	ug/L	0.0793	1.23	20	
Benzene		50.0	50.7	ug/L	1.12	1.34	20	
Bromobenzene		50.0	50.9	ug/L	0.821	1.76	20	
Bromochloromethane		50.0	53.0	ug/L	0.182	6.10	20	
Bromodichloromethane		50.0	54.6	ug/L	0.432	9.29	20	
Bromomethane		50.0	46.3	ug/L	0.157	7.40	20	
Carbon Disulfide		50.0	46.1	ug/L	0.830	7.88	20	
Carbon Tetrachloride		50.0	56.5	ug/L	0.470	13.0	20	

CCV - Modified 03/05/2008
PDF File ID: 5541470
Report generated 10/25/2017 13:37

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100839 Run Date: 10/20/2017 Sample ID: WG634866-02

Instrument ID: HPMS6 Run Time: 11:42 Method: 8260B

File ID: 6M150854 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG634867 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	51.9	ug/L	0.232	3.75	20	
cis-1,2-Dichloroethene		50.0	53.2	ug/L	0.313	6.40	20	
cis-1,3-Dichloropropene		50.0	56.2	ug/L	0.479	12.4	20	
Dibromochloromethane		50.0	54.1	ug/L	0.406	8.19	20	
Dibromomethane		50.0	53.1	ug/L	0.157	6.25	20	
Dichlorodifluoromethane		50.0	58.0	ug/L	0.482	16.0	20	
Hexachlorobutadiene		50.0	48.0	ug/L	0.433	4.10	20	
Isopropylbenzene		50.0	54.3	ug/L	1.72	8.64	20	
Methylene Chloride		50.0	48.8	ug/L	0.290	2.36	20	
Methyl Tert Butyl Ether		50.0	50.3	ug/L	0.692	0.522	20	
2-Butanone		50.0	46.1	ug/L	0.112	7.84	20	
4-Methyl-2-Pentanone		50.0	46.1	ug/L	0.0890	7.72	20	
n-Butylbenzene		50.0	53.6	ug/L	2.58	7.28	20	
n-Propylbenzene		50.0	53.5	ug/L	3.71	6.99	20	
m-,p-Xylene		100	104	ug/L	0.668	4.08	20	
Naphthalene		50.0	50.7	ug/L	2.13	1.50	20	
o-Xylene		50.0	53.3	ug/L	0.671	6.70	20	
p-Isopropyltoluene		50.0	54.4	ug/L	2.89	8.81	20	
sec-Butylbenzene		50.0	52.0	ug/L	3.14	3.97	20	
Styrene		50.0	55.5	ug/L	1.15	11.0	20	
Trichloroethene		50.0	52.8	ug/L	0.300	5.66	20	
tert-Butylbenzene		50.0	53.1	ug/L	0.558	6.11	20	
Tetrachloroethene		50.0	51.5	ug/L	0.404	2.94	20	
trans-1,2-Dichloroethene		50.0	52.2	ug/L	0.281	4.40	20	
trans-1,3-Dichloropropene		50.0	52.9	ug/L	0.553	5.86	20	
Trichlorofluoromethane		50.0	56.2	ug/L	0.542	12.4	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5541470
Report generated 10/25/2017 13:37

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100839 Run Date: 10/23/2017 Sample ID: WG635010-02

Instrument ID: HPMS6 Run Time: 10:50 Method: 8260B

File ID: 6M150883 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG635011 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.2	ug/L	0.503	4.46	20	
1,2-Dichloropropane	CCC	50.0	50.7	ug/L	0.324	1.37	20	
Chloroform	CCC	50.0	50.8	ug/L	0.541	1.62	20	
Ethylbenzene	CCC	50.0	51.6	ug/L	0.547	3.11	20	
Toluene	CCC	50.0	50.4	ug/L	1.50	0.738	20	
Vinyl Chloride	CCC	50.0	50.5	ug/L	0.263	0.953	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.6	20	
1,1-Dichloroethane	SPCC	50.0	50.2	ug/L	0.582	0.340	20	
Bromoform	SPCC	50.0	50.7	ug/L	0.233	1.32	20	
Chlorobenzene	SPCC	50.0	49.5	ug/L	1.01	0.954	20	
Chloromethane	SPCC	50.0	43.4	ug/L	0.278	13.2	20	
Naphthalene		50.0	48.7	ug/L	2.04	2.68	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5541470
Report generated 10/25/2017 13:37

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100839
Instrument ID: HPMS6
Workgroup (AAB#): WG634867

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100839-01	1.00	01	272244	466109	603563
L17100839-02	1.00	01	270842	461447	612855
L17100839-03	1.00	01	259029	448526	603002
L17100839-04	1.00	01	249809	454211	607809
WG634867-01	1.00	01	250659	457928	619366
WG634867-02	1.00	01	280566	486081	637198

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5541995
Report generated 10/25/2017 13:37

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100839
Instrument ID: HPMS6
Workgroup (AAB#): WG635011

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100839-01	2.50	DL01	258815	424689	565110
WG635011-01	1.00	01	249926	456505	606681
WG635011-02	1.00	01	274375	480514	630509

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5541995
Report generated 10/25/2017 13:37

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100839
Instrument ID: HPMS6
Workgroup (AAB#): WG634867

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100839-01	1.00	01	18.12	15.09	11.22
L17100839-02	1.00	01	18.12	15.09	11.22
L17100839-03	1.00	01	18.12	15.1	11.22
L17100839-04	1.00	01	18.12	15.09	11.22
WG634867-01	1.00	01	18.12	15.09	11.22
WG634867-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5541997
Report generated: 10/25/2017 13:37

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100839
Instrument ID: HPMS6
Workgroup (AAB#): WG635011

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100839-01	2.50	DL01	18.13	15.1	11.22
WG635011-01	1.00	01	18.12	15.1	11.22
WG635011-02	1.00	01	18.12	15.1	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5541997
Report generated: 10/25/2017 13:37

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 27, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 27, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17100839 / Revision: 1 / 98 total pages

COC No. A 38992

158 Starlite Drive
Marietta, OH 45750

Microbac

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Fax: 740-373-4835

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 9143740003

Turn Around Requirements: 14 day

Location: mem. tenn

Project ID:

Sampler (print): Taylor Redmond

Signature: [signature]

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	VOC	TOTAL # (LAB USE)
DRI-6A-LA-26		X	10/11/17	1555	GW	3		3	
DUP-8-LA-26		X	10/12/17	1139	GW	3		3	
MW-203A-LA-26		X	10/12/17	1131	GW	3		3	
LTM-TBS-LA-26		X	10/12/17	1800	GW	3		3	

10/12/17

Microbac OVD
Received: 10/13/2017 10:32
By: CARA GREENWOOD
221000107501

Cara A. Greenwood

Relinquished by: (Signature)	Date	Time	Received: (Signature)
[signature]	10/12/17	1830	
Relinquished by: (Signature)	Date	Time	Received: (Signature)

Date | Time | Received by: (Signature)

Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Page _____ of _____

Generated: 10/27/2017 12:20

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7501

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

CMS 10/13/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

CMS 10/13/17

PRESERVATIVE EXCEPTIONS

✓ NONE

__ AS NOTED

CMS 10/13/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Internal Chain of Custody Report

Login: L17100839
Account: 2694
Project: 2694.011
Samples: 4
Due Date: 24-OCT-2017

Samplenum	Container ID	Products
L17100839-01	980448	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Samplenum	Container ID	Products
L17100839-02	980449	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100839
Account: 2694
Project: 2694.011
Samples: 4
Due Date: 24-OCT-2017

Samplenum	Container ID	Products
L17100839-03	980450	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Samplenum	Container ID	Products
L17100839-04	980451	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	13-OCT-2017 13:14	CLS		
2	ANALYZ	V1	ORG4	16-OCT-2017 07:53	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Appendix E-2
Dunn Field Laboratory
Analytical Reports

Microbac

Laboratory Report Number: L17041200 *(Revised)*

Report revised to remove 1,4 Dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 25 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041200
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

There were no discrepancies.

Discrepancy	Resolution

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00113829	H	2.0		1001891733610004575000778978192929	X
00113893	H	1.0		1002826033610004575000778978193340	X
00113761	H	2.0		1002826033610004575000778978193307	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	Yes

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Lab Report #: L17041200
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-57-ODLB-14	L17041200-01	04/22/2017 09:57	04/25/2017 10:39
MW-227-ODLB-14	L17041200-02	04/22/2017 10:04	04/25/2017 10:39
MW-228-ODLB-14	L17041200-03	04/22/2017 10:10	04/25/2017 10:39
MW-174-ODLB-14	L17041200-04	04/22/2017 10:16	04/25/2017 10:39
MW-15-ODLB-14	L17041200-05	04/22/2017 10:23	04/25/2017 10:39
MW-91-ODLB-14	L17041200-06	04/22/2017 10:30	04/25/2017 10:39
DUP-3	L17041200-07	04/22/2017 10:32	04/25/2017 10:39
MW-06-ODLB-14	L17041200-08	04/22/2017 10:40	04/25/2017 10:39
MW-87-ODLB-14	L17041200-09	04/22/2017 10:45	04/25/2017 10:39
MW-176-ODLB-14	L17041200-10	04/22/2017 10:53	04/25/2017 10:39
MW-225-ODLB-14	L17041200-11	04/22/2017 11:10	04/25/2017 10:39
MW-225-ODLB-14	L17041200-12	04/22/2017 11:10	04/25/2017 10:39
MW-225-ODLB-14	L17041200-13	04/22/2017 11:10	04/25/2017 10:39
MW-223-ODLB-14	L17041200-14	04/22/2017 11:20	04/25/2017 10:39
MW-226-ODLB-14	L17041200-15	04/22/2017 11:25	04/25/2017 10:39
MW-222-ODLB-14	L17041200-16	04/22/2017 11:30	04/25/2017 10:39
DUP-7	L17041200-17	04/22/2017 11:33	04/25/2017 10:39
MW-224-ODLB-14	L17041200-18	04/22/2017 11:39	04/25/2017 10:39
MW-134-ODLB-14	L17041200-19	04/22/2017 11:44	04/25/2017 10:39
MW-187-ODLB-14	L17041200-20	04/22/2017 13:46	04/25/2017 10:39
DUP-6	L17041200-21	04/22/2017 13:50	04/25/2017 10:39
MW-13-ODLB-14	L17041200-22	04/22/2017 13:53	04/25/2017 10:39
MW-04-ODLB-14	L17041200-23	04/22/2017 13:59	04/25/2017 10:39
MW-221-ODLB-14	L17041200-24	04/22/2017 14:05	04/25/2017 10:39
MW-180-ODLB-14	L17041200-25	04/22/2017 14:12	04/25/2017 10:39
MW-03-ODLB-14	L17041200-26	04/22/2017 14:20	04/25/2017 10:39
MW-220-ODLB-14	L17041200-27	04/22/2017 14:28	04/25/2017 10:39
MW-07-ODLB-14	L17041200-28	04/22/2017 14:32	04/25/2017 10:39
MW-230-ODLB-14	L17041200-29	04/22/2017 14:40	04/25/2017 10:39
MW-31-ODLB-14	L17041200-30	04/22/2017 15:14	04/25/2017 10:39
MW-147-ODLB-14	L17041200-31	04/22/2017 15:23	04/25/2017 10:39
MW-148-ODLB-14	L17041200-32	04/22/2017 15:30	04/25/2017 10:39
MW-241-ODLB-14	L17041200-33	04/22/2017 15:37	04/25/2017 10:39
MW-160-ODLB-14	L17041200-34	04/22/2017 15:45	04/25/2017 10:39
MW-242-ODLB-14	L17041200-35	04/22/2017 15:52	04/25/2017 10:39
MW-150-ODLB-14	L17041200-36	04/22/2017 16:01	04/25/2017 10:39
DUP-4	L17041200-37	04/22/2017 16:05	04/25/2017 10:39

MW-54-ODLB-14	L17041200-38	04/22/2017 16:10	04/25/2017 10:39
MW-155-ODLB-14	L17041200-39	04/22/2017 16:16	04/25/2017 10:39
MW-243-ODLB-14	L17041200-40	04/22/2017 16:24	04/25/2017 10:39
MW-245-ODLB-14	L17041200-41	04/22/2017 16:33	04/25/2017 10:39
MW-159-ODLB-14	L17041200-42	04/22/2017 16:40	04/25/2017 10:39
MW-149-ODLB-14	L17041200-43	04/22/2017 16:46	04/25/2017 10:39
MW-244-ODLB-14	L17041200-44	04/23/2017 08:17	04/25/2017 10:39
MW-251-ODLB-14	L17041200-45	04/23/2017 08:25	04/25/2017 10:39
MW-250-ODLB-14	L17041200-46	04/23/2017 08:38	04/25/2017 10:39
DUP-9	L17041200-47	04/23/2017 08:42	04/25/2017 10:39
MW-158-ODLB-14	L17041200-48	04/23/2017 08:51	04/25/2017 10:39
MW-158A-ODLB-14	L17041200-49	04/23/2017 08:56	04/25/2017 10:39
MW-246-ODLB-14	L17041200-50	04/23/2017 09:02	04/25/2017 10:39
DUP-8	L17041200-51	04/23/2017 09:05	04/25/2017 10:39
MW-237-ODLB-14	L17041200-52	04/23/2017 09:16	04/25/2017 10:39
MW-166-ODLB-14	L17041200-53	04/23/2017 09:25	04/25/2017 10:39
MW-166A-ODLB-14	L17041200-54	04/23/2017 09:30	04/25/2017 10:39
MW-151-ODLB-14	L17041200-55	04/23/2017 09:42	04/25/2017 10:39
MW-247-ODLB-14	L17041200-56	04/23/2017 09:48	04/25/2017 10:39
MW-247-ODLB-14	L17041200-57	04/23/2017 09:48	04/25/2017 10:39
MW-247-ODLB-14	L17041200-58	04/23/2017 09:48	04/25/2017 10:39
MW-165A-ODLB-14	L17041200-59	04/23/2017 10:01	04/25/2017 10:39

Microbac REPORT L17041200
PREPARED FOR CT Laboratories
WORK ID:

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1.0 Summary Data

1.1 Narratives

Login Number: L17041200
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Chloromethane, Dichlorodifluoromethane exceeded the upper limit in ICV WG611320-12 analyzed 04/24/2017 on HPMS11. Dichlorodifluoromethane exceeded the upper limit and Trichlorofluoromethane was below the lower limit in ICV WG611454-12 analyzed 04/26/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Chloromethane was marginally below the lower limit in CCV WG612121-02 analyzed 04/29/2017 on HPMS11. Chloromethane was marginally below the lower limit in CCV WG611924-02 analyzed 04/28/2017 on HPMS11. Bromomethane was below the lower limit in CCV WG612029-02 analyzed 04/28/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: 2,2-Dichloropropane was below the lower limit in MS/MSD samples 57/58, and also had RPD results outside control limits. Chloromethane had RPD results outside control limits in MS/MSD samples 12/13, but results were within range. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

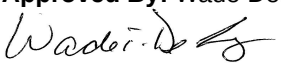
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124837
Approved By: Wade DeLong



1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041200-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-57-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 00:17
Collect Date:	04/22/2017 09:57	**Dilution:**	1	**File ID:**	11M17880
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.53	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	0.272	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.324		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.61		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	113	81	120	
4-Bromofluorobenzene	119	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-227-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:15
Collect Date:	04/22/2017 10:04	**Dilution:**	1	**File ID:**	11M17846
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-228-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:46
Collect Date:	04/22/2017 10:10	**Dilution:**	1	**File ID:**	11M17845
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.343	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-174-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:16
Collect Date:	04/22/2017 10:16	**Dilution:**	1	**File ID:**	11M17844
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-15-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:47
Collect Date:	04/22/2017 10:23	**Dilution:**	1	**File ID:**	11M17843
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.311		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.293	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-91-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:18
Collect Date:	04/22/2017 10:30	**Dilution:**	1	**File ID:**	11M17842
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.19	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-3	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:49
Collect Date:	04/22/2017 10:32	**Dilution:**	1	**File ID:**	11M17841
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-06-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:20
Collect Date:	04/22/2017 10:40	**Dilution:**	1	**File ID:**	11M17840
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	15.3		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.40		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.876	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-87-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:51
Collect Date:	04/22/2017 10:45	**Dilution:**	1	**File ID:**	11M17839
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.18		0.500	0.200
1,1,2-Trichloroethane	79-00-5	1.55		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	100		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	7.57		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.463	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.293	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-176-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:22
Collect Date:	04/22/2017 10:53	**Dilution:**	1	**File ID:**	11M17838
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.273	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:52
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17837
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.82	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.516	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:25
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17832
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.0		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.8		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	19.2		1.00	0.500
1,1-Dichloropropene	563-58-6	19.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.6		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.3		2.00	1.00
1,2-Dichloropropane	78-87-5	19.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.2		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	21.1		1.00	0.125
2,2-Dichloropropane	594-20-7	20.5		1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	18.6		1.00	0.125
4-Chlorotoluene	106-43-4	20.3		1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	20.4		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	19.0		0.500	0.250
Bromoform	75-25-2	17.8		1.00	0.500
Bromomethane	74-83-9	19.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	14.3		1.00	0.500
Carbon tetrachloride	56-23-5	20.3		1.00	0.250
Chlorobenzene	108-90-7	19.4		0.500	0.125
Chloroethane	75-00-3	21.4		1.00	0.500
Chloroform	67-66-3	20.8		0.300	0.125
Chloromethane	74-87-3	24.4	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	19.8		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.3		1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	20.5		0.600	0.250
Isopropylbenzene	98-82-8	20.6		1.00	0.250
Methylene chloride	75-09-2	18.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.4		5.00	0.500
MEK (2-Butanone)	78-93-3	20.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.8		10.0	2.50
n-Butylbenzene	104-51-8	22.1		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	22.2		1.00	0.200
o-Xylene	95-47-6	20.3		1.00	0.250
p-Isopropyltoluene	99-87-6	22.0		1.00	0.250
sec-Butylbenzene	135-98-8	20.1		1.00	0.250
Styrene	100-42-5	22.2		1.00	0.125
Trichloroethene	79-01-6	18.9		1.00	0.250
tert-Butylbenzene	98-06-6	19.6		1.00	0.250
Tetrachloroethene	127-18-4	20.9		1.00	0.250
Toluene	108-88-3	19.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	21.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041200-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:55
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17833
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.2		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.2		1.00	0.250
1,1-Dichloroethane	75-34-3	19.1		1.00	0.125
1,1-Dichloroethene	75-35-4	18.5		1.00	0.500
1,1-Dichloropropene	563-58-6	19.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.1		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.6		1.00	0.250
1,2-Dichloroethane	107-06-2	19.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	19.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.6		1.00	0.250
2-Hexanone	591-78-6	21.4		10.0	2.50
2-Chlorotoluene	95-49-8	18.2		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	27.7		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	20.1		1.00	0.125
Bromochloromethane	74-97-5	19.5		1.00	0.200
Bromodichloromethane	75-27-4	19.2		0.500	0.250
Bromoform	75-25-2	18.1		1.00	0.500
Bromomethane	74-83-9	19.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	13.8		1.00	0.500
Carbon tetrachloride	56-23-5	19.9		1.00	0.250
Chlorobenzene	108-90-7	19.2		0.500	0.125
Chloroethane	75-00-3	20.9		1.00	0.500
Chloroform	67-66-3	20.8		0.300	0.125
Chloromethane	74-87-3	19.6	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.0		0.500	0.250
Dibromochloromethane	124-48-1	19.1		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.5		1.00	0.250
Ethylbenzene	100-41-4	19.9		1.00	0.250
Hexachlorobutadiene	87-68-3	19.8		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.5		5.00	0.500
MEK (2-Butanone)	78-93-3	20.1		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.7		10.0	2.50
n-Butylbenzene	104-51-8	21.6		1.00	0.250
n-Propylbenzene	103-65-1	19.4		1.00	0.125
m-,p-Xylene	179601-23-1	39.4		2.00	0.500
Naphthalene	91-20-3	22.4		1.00	0.200
o-Xylene	95-47-6	19.8		1.00	0.250
p-Isopropyltoluene	99-87-6	21.2		1.00	0.250
sec-Butylbenzene	135-98-8	19.4		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	18.5		1.00	0.250
tert-Butylbenzene	98-06-6	18.9		1.00	0.250
Tetrachloroethene	127-18-4	20.2		1.00	0.250
Toluene	108-88-3	18.9		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.9		1.00	0.500
Trichlorofluoromethane	75-69-4	19.5		1.00	0.250
Vinyl chloride	75-01-4	19.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041200-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-223-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:16
Collect Date:	04/22/2017 11:20	**Dilution:**	1	**File ID:**	11M17848
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.47	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.327		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-226-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:46
Collect Date:	04/22/2017 11:25	**Dilution:**	1	**File ID:**	11M17849
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.169	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-222-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:03
Collect Date:	04/22/2017 11:30	**Dilution:**	1	**File ID:**	8M419230
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.13	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-7	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:32
Collect Date:	04/22/2017 11:33	**Dilution:**	1	**File ID:**	8M419231
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.67	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-224-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:03
Collect Date:	04/22/2017 11:39	**Dilution:**	1	**File ID:**	8M419232
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.462		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-134-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:33
Collect Date:	04/22/2017 11:44	**Dilution:**	1	**File ID:**	8M419233
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.162	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-187-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:03
Collect Date:	04/22/2017 13:46	**Dilution:**	1	**File ID:**	8M419234
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-6	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:33
Collect Date:	04/22/2017 13:50	**Dilution:**	1	**File ID:**	8M419235
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-13-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:02
Collect Date:	04/22/2017 13:53	**Dilution:**	1	**File ID:**	8M419236
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.177	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-04-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:32
Collect Date:	04/22/2017 13:59	**Dilution:**	1	**File ID:**	8M419237
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.52	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.688		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-221-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:02
Collect Date:	04/22/2017 14:05	**Dilution:**	1	**File ID:**	8M419238
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.12	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-180-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:32
Collect Date:	04/22/2017 14:12	**Dilution:**	1	**File ID:**	8M419239
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.948	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-03-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:02
Collect Date:	04/22/2017 14:20	**Dilution:**	1	**File ID:**	8M419240
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.05		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.66		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.38		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-220-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:32
Collect Date:	04/22/2017 14:28	**Dilution:**	1	**File ID:**	8M419241
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.399	F	1.00	0.125
1,1-Dichloroethene	75-35-4	7.66		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	27.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.203	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	17.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-07-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 17:02
Collect Date:	04/22/2017 14:32	**Dilution:**	1	**File ID:**	8M419242
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.760	F	1.00	0.125
1,1-Dichloroethene	75-35-4	12.9		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.252	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.320	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	32.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.9	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-230-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 17:31
Collect Date:	04/22/2017 14:40	**Dilution:**	1	**File ID:**	8M419243
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.528	F	1.00	0.125
1,1-Dichloroethene	75-35-4	7.70		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.94	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.264	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.286	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	28.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	22.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-31-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 18:01
Collect Date:	04/22/2017 15:14	**Dilution:**	1	**File ID:**	8M419244
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.888	F	1.00	0.125
1,1-Dichloroethene	75-35-4	16.2		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.01	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.203	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.350	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-147-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 18:31
Collect Date:	04/22/2017 15:23	**Dilution:**	1	**File ID:**	8M419245
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.144	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-148-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 19:01
Collect Date:	04/22/2017 15:30	**Dilution:**	1	**File ID:**	8M419246
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.26	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.136	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-241-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 19:31
Collect Date:	04/22/2017 15:37	**Dilution:**	1	**File ID:**	8M419247
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.147	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.470	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-160-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 15:13
Collect Date:	04/22/2017 15:45	**Dilution:**	1	**File ID:**	17M0273112
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.407	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-242-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 15:33
Collect Date:	04/22/2017 15:52	**Dilution:**	1	**File ID:**	17M0273113
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-150-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:03
Collect Date:	04/22/2017 16:01	**Dilution:**	1	**File ID:**	17M0273114
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.214	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.563		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.936	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-4	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:23
Collect Date:	04/22/2017 16:05	**Dilution:**	1	**File ID:**	17M0273115
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.205	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.529		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.841	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-54-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:43
Collect Date:	04/22/2017 16:10	**Dilution:**	1	**File ID:**	17M0273116
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.448	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.50	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.321		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.74		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.282	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-155-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:10
Collect Date:	04/22/2017 16:16	**Dilution:**	1	**File ID:**	17M0273117
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.60	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.217	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.261	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.4	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-243-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:30
Collect Date:	04/22/2017 16:24	**Dilution:**	1	**File ID:**	17M0273118
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.68		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.24	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.20		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-245-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:50
Collect Date:	04/22/2017 16:33	**Dilution:**	1	**File ID:**	17M0273119
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.248	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.585	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-159-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:09
Collect Date:	04/22/2017 16:40	**Dilution:**	1	**File ID:**	17M0273120
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	10.1		0.500	0.200
1,1,2-Trichloroethane	79-00-5	3.27		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.58		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.127	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	22.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	141		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.515	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.76		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	6.32		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-149-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:29
Collect Date:	04/22/2017 16:46	**Dilution:**	1	**File ID:**	17M0273121
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.242	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.05	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.85		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.25		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.260	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-244-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:49
Collect Date:	04/23/2017 08:17	**Dilution:**	1	**File ID:**	17M0273122
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.330	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.96	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.256	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.738	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-251-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:17
Collect Date:	04/23/2017 08:25	**Dilution:**	1	**File ID:**	17M0273123
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.813	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.73		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.491		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.970	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.533	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.0	81	120	
4-Bromofluorobenzene	98.4	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-250-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:37
Collect Date:	04/23/2017 08:38	**Dilution:**	1	**File ID:**	17M0273124
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-9	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:57
Collect Date:	04/23/2017 08:42	**Dilution:**	1	**File ID:**	17M0273125
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-158-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 20:17
Collect Date:	04/23/2017 08:51	**Dilution:**	1	**File ID:**	17M0273126
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.02		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-158A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 20:47
Collect Date:	04/23/2017 08:56	**Dilution:**	1	**File ID:**	17M0273127
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-50	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-246-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:00
Collect Date:	04/23/2017 09:02	**Dilution:**	1	**File ID:**	6M146806
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	4.78		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.849	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.2	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-51	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-8	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:30
Collect Date:	04/23/2017 09:05	**Dilution:**	1	**File ID:**	6M146807
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	5.60		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.621	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-52	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-237-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:02
Collect Date:	04/23/2017 09:16	**Dilution:**	1	**File ID:**	6M146808
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.437	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.03		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.25	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.349	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-53	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:32
Collect Date:	04/23/2017 09:25	**Dilution:**	1	**File ID:**	6M146809
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.73		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.853	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.03		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-54	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:03
Collect Date:	04/23/2017 09:30	**Dilution:**	1	**File ID:**	6M146810
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.54	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.15		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.4	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-55	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-151-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:34
Collect Date:	04/23/2017 09:42	**Dilution:**	1	**File ID:**	6M146811
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.78		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.772	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-56	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:03
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146812
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.206	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.308		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.448	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.666	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.2	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-57	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:04
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146814
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.3		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	19.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	16.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	17.3		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.6		1.00	0.250
1,2-Dichloroethane	107-06-2	20.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.1		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	18.2		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.3		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.1		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.1		0.500	0.125
1-Chlorohexane	544-10-5	18.9		1.00	0.125
2,2-Dichloropropane	594-20-7	8.65		1.00	0.250
2-Hexanone	591-78-6	22.0		10.0	2.50
2-Chlorotoluene	95-49-8	18.7		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	29.9		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.3		1.00	0.125
Bromochloromethane	74-97-5	19.6		1.00	0.200
Bromodichloromethane	75-27-4	19.5		0.500	0.250
Bromoform	75-25-2	17.2		1.00	0.500
Bromomethane	74-83-9	14.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	14.1		1.00	0.500
Carbon tetrachloride	56-23-5	17.5		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	21.7		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	21.0		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	19.4		0.500	0.250
Dibromochloromethane	124-48-1	18.2		0.500	0.250
Dibromomethane	74-95-3	19.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.3		1.00	0.250
Ethylbenzene	100-41-4	18.5		1.00	0.250
Hexachlorobutadiene	87-68-3	16.6		0.600	0.250
Isopropylbenzene	98-82-8	18.7		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.7		5.00	0.500
MEK (2-Butanone)	78-93-3	20.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	19.0		1.00	0.125
m-,p-Xylene	179601-23-1	37.8		2.00	0.500
Naphthalene	91-20-3	17.8		1.00	0.200
o-Xylene	95-47-6	19.2		1.00	0.250
p-Isopropyltoluene	99-87-6	18.9		1.00	0.250
sec-Butylbenzene	135-98-8	18.8		1.00	0.250
Styrene	100-42-5	19.6		1.00	0.125
Trichloroethene	79-01-6	17.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.6		1.00	0.250
Tetrachloroethene	127-18-4	18.0		1.00	0.250
Toluene	108-88-3	19.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	17.9		1.00	0.500
Trichlorofluoromethane	75-69-4	17.5		1.00	0.250
Vinyl chloride	75-01-4	19.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

Certificate of Analysis

Sample #:	L17041200-58	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:35
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146816
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.8		1.00	0.250
1,1-Dichloroethane	75-34-3	20.8		1.00	0.125
1,1-Dichloroethene	75-35-4	19.9		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	17.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.8		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.4		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.8		2.00	1.00
1,2-Dichloropropane	78-87-5	21.0		1.00	0.200
1,2-Dibromoethane	106-93-4	19.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.4		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.3		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.5		0.500	0.125
1-Chlorohexane	544-10-5	19.2		1.00	0.125
2,2-Dichloropropane	594-20-7	13.7		1.00	0.250
2-Hexanone	591-78-6	24.2		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	31.5		10.0	2.50
Benzene	71-43-2	19.6		0.400	0.125
Bromobenzene	108-86-1	19.0		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	19.9		0.500	0.250
Bromoform	75-25-2	17.9		1.00	0.500
Bromomethane	74-83-9	16.7		1.00	0.500
Carbon disulfide	75-15-0	14.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	18.8		1.00	0.250
Chlorobenzene	108-90-7	18.5		0.500	0.125
Chloroethane	75-00-3	21.3		1.00	0.500
Chloroform	67-66-3	19.1		0.300	0.125
Chloromethane	74-87-3	20.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	19.0		0.500	0.250
Dibromomethane	74-95-3	20.5		1.00	0.250
Dichlorodifluoromethane	75-71-8	18.6		1.00	0.250
Ethylbenzene	100-41-4	18.7		1.00	0.250
Hexachlorobutadiene	87-68-3	16.0		0.600	0.250
Isopropylbenzene	98-82-8	18.7		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	22.1		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	19.5		1.00	0.125
m-,p-Xylene	179601-23-1	37.7		2.00	0.500
Naphthalene	91-20-3	18.7		1.00	0.200
o-Xylene	95-47-6	19.1		1.00	0.250
p-Isopropyltoluene	99-87-6	19.1		1.00	0.250
sec-Butylbenzene	135-98-8	19.0		1.00	0.250
Styrene	100-42-5	19.4		1.00	0.125
Trichloroethene	79-01-6	17.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.7		1.00	0.250
Tetrachloroethene	127-18-4	18.2		1.00	0.250
Toluene	108-88-3	19.4		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.0		1.00	0.500
Trichlorofluoromethane	75-69-4	17.7		1.00	0.250
Vinyl chloride	75-01-4	18.7		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	109	76	119	

Certificate of Analysis

Sample #:	L17041200-59	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-165A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:33
Collect Date:	04/23/2017 10:01	**Dilution:**	1	**File ID:**	6M146813
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.251	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.339	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041200
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Chloromethane, Dichlorodifluoromethane exceeded the upper limit in ICV WG611320-12 analyzed 04/24/2017 on HPMS11. Dichlorodifluoromethane exceeded the upper limit and Trichlorofluoromethane was below the lower limit in ICV WG611454-12 analyzed 04/26/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Chloromethane was marginally below the lower limit in CCV WG612121-02 analyzed 04/29/2017 on HPMS11. Chloromethane was marginally below the lower limit in CCV WG611924-02 analyzed 04/28/2017 on HPMS11. Bromomethane was below the lower limit in CCV WG612029-02 analyzed 04/28/2017 on HPMS17. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: 2,2-Dichloropropane was below the lower limit in MS/MSD samples 57/58, and also had RPD results outside control limits. Chloromethane had RPD results outside control limits in MS/MSD samples 12/13, but results were within range. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

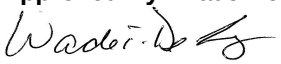
Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 124837
Approved By: Wade DeLong



Certificate of Analysis

Sample #:	L17041200-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-57-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 00:17
Collect Date:	04/22/2017 09:57	**Dilution:**	1	**File ID:**	11M17880
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.53	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	0.272	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.324		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.61		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	107	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	113	81	120	
4-Bromofluorobenzene	119	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-227-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:15
Collect Date:	04/22/2017 10:04	**Dilution:**	1	**File ID:**	11M17846
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-228-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:46
Collect Date:	04/22/2017 10:10	**Dilution:**	1	**File ID:**	11M17845
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.343	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-174-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:16
Collect Date:	04/22/2017 10:16	**Dilution:**	1	**File ID:**	11M17844
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-15-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:47
Collect Date:	04/22/2017 10:23	**Dilution:**	1	**File ID:**	11M17843
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.311		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.293	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-91-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:18
Collect Date:	04/22/2017 10:30	**Dilution:**	1	**File ID:**	11M17842
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.19	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	DUP-3	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:49
Collect Date:	04/22/2017 10:32	**Dilution:**	1	**File ID:**	11M17841
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-06-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:20
Collect Date:	04/22/2017 10:40	**Dilution:**	1	**File ID:**	11M17840
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	15.3		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.40		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.876	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-87-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:51
Collect Date:	04/22/2017 10:45	**Dilution:**	1	**File ID:**	11M17839
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.18		0.500	0.200
1,1,2-Trichloroethane	79-00-5	1.55		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	100		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	7.57		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.32		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.463	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.293	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-176-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:22
Collect Date:	04/22/2017 10:53	**Dilution:**	1	**File ID:**	11M17838
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.273	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	114	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:52
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17837
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.82	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.516	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:25
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17832
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.0		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.8		1.00	0.250
1,1-Dichloroethane	75-34-3	19.4		1.00	0.125
1,1-Dichloroethene	75-35-4	19.2		1.00	0.500
1,1-Dichloropropene	563-58-6	19.5		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.2		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	21.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.6		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.3		2.00	1.00
1,2-Dichloropropane	78-87-5	19.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	21.2		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.2		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.8		0.500	0.125
1-Chlorohexane	544-10-5	21.1		1.00	0.125
2,2-Dichloropropane	594-20-7	20.5		1.00	0.250
2-Hexanone	591-78-6	21.3		10.0	2.50
2-Chlorotoluene	95-49-8	18.6		1.00	0.125
4-Chlorotoluene	106-43-4	20.3		1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	20.4		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	19.0		0.500	0.250
Bromoform	75-25-2	17.8		1.00	0.500
Bromomethane	74-83-9	19.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	14.3		1.00	0.500
Carbon tetrachloride	56-23-5	20.3		1.00	0.250
Chlorobenzene	108-90-7	19.4		0.500	0.125
Chloroethane	75-00-3	21.4		1.00	0.500
Chloroform	67-66-3	20.8		0.300	0.125
Chloromethane	74-87-3	24.4	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	19.4		0.500	0.250
Dibromomethane	74-95-3	19.8		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.3		1.00	0.250
Ethylbenzene	100-41-4	20.6		1.00	0.250
Hexachlorobutadiene	87-68-3	20.5		0.600	0.250
Isopropylbenzene	98-82-8	20.6		1.00	0.250
Methylene chloride	75-09-2	18.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.4		5.00	0.500
MEK (2-Butanone)	78-93-3	20.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.8		10.0	2.50
n-Butylbenzene	104-51-8	22.1		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	40.9		2.00	0.500
Naphthalene	91-20-3	22.2		1.00	0.200
o-Xylene	95-47-6	20.3		1.00	0.250
p-Isopropyltoluene	99-87-6	22.0		1.00	0.250
sec-Butylbenzene	135-98-8	20.1		1.00	0.250
Styrene	100-42-5	22.2		1.00	0.125
Trichloroethene	79-01-6	18.9		1.00	0.250
tert-Butylbenzene	98-06-6	19.6		1.00	0.250
Tetrachloroethene	127-18-4	20.9		1.00	0.250
Toluene	108-88-3	19.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	21.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	104	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041200-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-225-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	TMB	**Run Date:**	04/28/2017 09:55
Collect Date:	04/22/2017 11:10	**Dilution:**	1	**File ID:**	11M17833
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.2		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.2		1.00	0.250
1,1-Dichloroethane	75-34-3	19.1		1.00	0.125
1,1-Dichloroethene	75-35-4	18.5		1.00	0.500
1,1-Dichloropropene	563-58-6	19.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.8		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	22.1		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.6		1.00	0.250
1,2-Dichloroethane	107-06-2	19.7		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.5		2.00	1.00
1,2-Dichloropropane	78-87-5	19.1		1.00	0.200
1,2-Dibromoethane	106-93-4	19.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.8		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.0		1.00	0.125
2,2-Dichloropropane	594-20-7	19.6		1.00	0.250
2-Hexanone	591-78-6	21.4		10.0	2.50
2-Chlorotoluene	95-49-8	18.2		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	27.7		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	20.1		1.00	0.125
Bromochloromethane	74-97-5	19.5		1.00	0.200
Bromodichloromethane	75-27-4	19.2		0.500	0.250
Bromoform	75-25-2	18.1		1.00	0.500
Bromomethane	74-83-9	19.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	13.8		1.00	0.500
Carbon tetrachloride	56-23-5	19.9		1.00	0.250
Chlorobenzene	108-90-7	19.2		0.500	0.125
Chloroethane	75-00-3	20.9		1.00	0.500
Chloroform	67-66-3	20.8		0.300	0.125
Chloromethane	74-87-3	19.6	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.0		0.500	0.250
Dibromochloromethane	124-48-1	19.1		0.500	0.250
Dibromomethane	74-95-3	20.0		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.5		1.00	0.250
Ethylbenzene	100-41-4	19.9		1.00	0.250
Hexachlorobutadiene	87-68-3	19.8		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.5		5.00	0.500
MEK (2-Butanone)	78-93-3	20.1		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.7		10.0	2.50
n-Butylbenzene	104-51-8	21.6		1.00	0.250
n-Propylbenzene	103-65-1	19.4		1.00	0.125
m-,p-Xylene	179601-23-1	39.4		2.00	0.500
Naphthalene	91-20-3	22.4		1.00	0.200
o-Xylene	95-47-6	19.8		1.00	0.250
p-Isopropyltoluene	99-87-6	21.2		1.00	0.250
sec-Butylbenzene	135-98-8	19.4		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	18.5		1.00	0.250
tert-Butylbenzene	98-06-6	18.9		1.00	0.250
Tetrachloroethene	127-18-4	20.2		1.00	0.250
Toluene	108-88-3	18.9		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.9		1.00	0.500
Trichlorofluoromethane	75-69-4	19.5		1.00	0.250
Vinyl chloride	75-01-4	19.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	105	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041200-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-223-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:16
Collect Date:	04/22/2017 11:20	**Dilution:**	1	**File ID:**	11M17848
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.47	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.327		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-226-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG611925	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:46
Collect Date:	04/22/2017 11:25	**Dilution:**	1	**File ID:**	11M17849
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.169	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-222-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:03
Collect Date:	04/22/2017 11:30	**Dilution:**	1	**File ID:**	8M419230
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.13	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-7	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:32
Collect Date:	04/22/2017 11:33	**Dilution:**	1	**File ID:**	8M419231
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.67	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-224-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:03
Collect Date:	04/22/2017 11:39	**Dilution:**	1	**File ID:**	8M419232
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.462		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-134-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:33
Collect Date:	04/22/2017 11:44	**Dilution:**	1	**File ID:**	8M419233
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.58	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.162	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-187-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:03
Collect Date:	04/22/2017 13:46	**Dilution:**	1	**File ID:**	8M419234
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	DUP-6	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:33
Collect Date:	04/22/2017 13:50	**Dilution:**	1	**File ID:**	8M419235
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	109	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-13-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:02
Collect Date:	04/22/2017 13:53	**Dilution:**	1	**File ID:**	8M419236
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.177	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-04-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:32
Collect Date:	04/22/2017 13:59	**Dilution:**	1	**File ID:**	8M419237
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.52	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.688		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-221-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:02
Collect Date:	04/22/2017 14:05	**Dilution:**	1	**File ID:**	8M419238
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.12	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-180-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:32
Collect Date:	04/22/2017 14:12	**Dilution:**	1	**File ID:**	8M419239
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.948	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-03-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:02
Collect Date:	04/22/2017 14:20	**Dilution:**	1	**File ID:**	8M419240
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	1.05		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.66		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	2.38		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-220-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 16:32
Collect Date:	04/22/2017 14:28	**Dilution:**	1	**File ID:**	8M419241
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.399	F	1.00	0.125
1,1-Dichloroethene	75-35-4	7.66		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	27.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.203	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	17.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	14.8		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-07-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 17:02
Collect Date:	04/22/2017 14:32	**Dilution:**	1	**File ID:**	8M419242
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.760	F	1.00	0.125
1,1-Dichloroethene	75-35-4	12.9		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.81	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.252	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.320	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.9		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	32.2		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.9	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-230-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 17:31
Collect Date:	04/22/2017 14:40	**Dilution:**	1	**File ID:**	8M419243
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.528	F	1.00	0.125
1,1-Dichloroethene	75-35-4	7.70		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.94	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.264	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.286	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	28.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	22.0		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-31-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 18:01
Collect Date:	04/22/2017 15:14	**Dilution:**	1	**File ID:**	8M419244
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.888	F	1.00	0.125
1,1-Dichloroethene	75-35-4	16.2		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.01	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.203	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.350	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	32.4		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	25.1		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-147-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 18:31
Collect Date:	04/22/2017 15:23	**Dilution:**	1	**File ID:**	8M419245
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.144	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-148-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 19:01
Collect Date:	04/22/2017 15:30	**Dilution:**	1	**File ID:**	8M419246
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.26	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.136	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS8
Client ID:	MW-241-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/17/2017 18:24
Workgroup #:	WG611929	**Analyst:**	TMB	**Run Date:**	04/28/2017 19:31
Collect Date:	04/22/2017 15:37	**Dilution:**	1	**File ID:**	8M419247
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.14	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.147	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.470	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-160-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 15:13
Collect Date:	04/22/2017 15:45	**Dilution:**	1	**File ID:**	17M0273112
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.407	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-242-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 15:33
Collect Date:	04/22/2017 15:52	**Dilution:**	1	**File ID:**	17M0273113
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-150-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:03
Collect Date:	04/22/2017 16:01	**Dilution:**	1	**File ID:**	17M0273114
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.214	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.48	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.563		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.936	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-4	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:23
Collect Date:	04/22/2017 16:05	**Dilution:**	1	**File ID:**	17M0273115
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.205	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.529		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.841	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-54-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 16:43
Collect Date:	04/22/2017 16:10	**Dilution:**	1	**File ID:**	17M0273116
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.448	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.50	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.321		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.74		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.282	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.1	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-155-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:10
Collect Date:	04/22/2017 16:16	**Dilution:**	1	**File ID:**	17M0273117
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.60	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.217	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.261	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.4	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-243-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:30
Collect Date:	04/22/2017 16:24	**Dilution:**	1	**File ID:**	17M0273118
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.68		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.24	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.20		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-245-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 17:50
Collect Date:	04/22/2017 16:33	**Dilution:**	1	**File ID:**	17M0273119
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.248	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.585	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-159-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:09
Collect Date:	04/22/2017 16:40	**Dilution:**	1	**File ID:**	17M0273120
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	10.1		0.500	0.200
1,1,2-Trichloroethane	79-00-5	3.27		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.58		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.37	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.127	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	22.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	141		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.515	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.76		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	6.32		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-149-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:29
Collect Date:	04/22/2017 16:46	**Dilution:**	1	**File ID:**	17M0273121
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.242	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.05	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.85		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.25		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.58		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.260	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-244-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 18:49
Collect Date:	04/23/2017 08:17	**Dilution:**	1	**File ID:**	17M0273122
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.330	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.96	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.256	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.738	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-251-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:17
Collect Date:	04/23/2017 08:25	**Dilution:**	1	**File ID:**	17M0273123
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.813	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.73		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.491		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.970	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.533	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.0	81	120	
4-Bromofluorobenzene	98.4	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-250-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:37
Collect Date:	04/23/2017 08:38	**Dilution:**	1	**File ID:**	17M0273124
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-9	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 19:57
Collect Date:	04/23/2017 08:42	**Dilution:**	1	**File ID:**	17M0273125
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.92	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	99.7	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-158-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 20:17
Collect Date:	04/23/2017 08:51	**Dilution:**	1	**File ID:**	17M0273126
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.02		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.8		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.35		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

Certificate of Analysis

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-158A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612030	**Analyst:**	ADC	**Run Date:**	04/28/2017 20:47
Collect Date:	04/23/2017 08:56	**Dilution:**	1	**File ID:**	17M0273127
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.56	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-50	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-246-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:00
Collect Date:	04/23/2017 09:02	**Dilution:**	1	**File ID:**	6M146806
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	4.78		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.849	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	90.2	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-51	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-8	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 11:30
Collect Date:	04/23/2017 09:05	**Dilution:**	1	**File ID:**	6M146807
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	5.60		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.4		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.621	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-52	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-237-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:02
Collect Date:	04/23/2017 09:16	**Dilution:**	1	**File ID:**	6M146808
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.437	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.03		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.25	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.349	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-53	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 12:32
Collect Date:	04/23/2017 09:25	**Dilution:**	1	**File ID:**	6M146809
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.73		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.853	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.03		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-54	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:03
Collect Date:	04/23/2017 09:30	**Dilution:**	1	**File ID:**	6M146810
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.54	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	4.15		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	10.1		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.30		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.4	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-55	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-151-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 13:34
Collect Date:	04/23/2017 09:42	**Dilution:**	1	**File ID:**	6M146811
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.63	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.78		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.772	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.7	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-56	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:03
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146812
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.206	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.07	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.308		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.448	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.666	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.2	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041200-57	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:04
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146814
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.1		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.3		1.00	0.250
1,1-Dichloroethane	75-34-3	19.9		1.00	0.125
1,1-Dichloroethene	75-35-4	19.8		1.00	0.500
1,1-Dichloropropene	563-58-6	19.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	16.5		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	17.3		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.6		1.00	0.250
1,2-Dichloroethane	107-06-2	20.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.1		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.0		2.00	1.00
1,2-Dichloropropane	78-87-5	20.7		1.00	0.200
1,2-Dibromoethane	106-93-4	18.2		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.3		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.1		1.00	0.250
1,3-Dichloropropane	142-28-9	20.5		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.1		0.500	0.125
1-Chlorohexane	544-10-5	18.9		1.00	0.125
2,2-Dichloropropane	594-20-7	8.65		1.00	0.250
2-Hexanone	591-78-6	22.0		10.0	2.50
2-Chlorotoluene	95-49-8	18.7		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	29.9		10.0	2.50
Benzene	71-43-2	19.4		0.400	0.125
Bromobenzene	108-86-1	18.3		1.00	0.125
Bromochloromethane	74-97-5	19.6		1.00	0.200
Bromodichloromethane	75-27-4	19.5		0.500	0.250
Bromoform	75-25-2	17.2		1.00	0.500
Bromomethane	74-83-9	14.3		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	14.1		1.00	0.500
Carbon tetrachloride	56-23-5	17.5		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	21.7		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	21.0		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	19.4		0.500	0.250
Dibromochloromethane	124-48-1	18.2		0.500	0.250
Dibromomethane	74-95-3	19.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	19.3		1.00	0.250
Ethylbenzene	100-41-4	18.5		1.00	0.250
Hexachlorobutadiene	87-68-3	16.6		0.600	0.250
Isopropylbenzene	98-82-8	18.7		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.7		5.00	0.500
MEK (2-Butanone)	78-93-3	20.2		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	19.5		1.00	0.250
n-Propylbenzene	103-65-1	19.0		1.00	0.125
m-,p-Xylene	179601-23-1	37.8		2.00	0.500
Naphthalene	91-20-3	17.8		1.00	0.200
o-Xylene	95-47-6	19.2		1.00	0.250
p-Isopropyltoluene	99-87-6	18.9		1.00	0.250
sec-Butylbenzene	135-98-8	18.8		1.00	0.250
Styrene	100-42-5	19.6		1.00	0.125
Trichloroethene	79-01-6	17.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.6		1.00	0.250
Tetrachloroethene	127-18-4	18.0		1.00	0.250
Toluene	108-88-3	19.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	18.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	17.9		1.00	0.500
Trichlorofluoromethane	75-69-4	17.5		1.00	0.250
Vinyl chloride	75-01-4	19.6		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	106	76	119	

Certificate of Analysis

Sample #:	L17041200-58	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-247-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 15:35
Collect Date:	04/23/2017 09:48	**Dilution:**	1	**File ID:**	6M146816
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.6		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.5		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.7		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.8		1.00	0.250
1,1-Dichloroethane	75-34-3	20.8		1.00	0.125
1,1-Dichloroethene	75-35-4	19.9		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.0		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	17.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.8		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.4		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.8		2.00	1.00
1,2-Dichloropropane	78-87-5	21.0		1.00	0.200
1,2-Dibromoethane	106-93-4	19.4		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.4		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.3		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.5		0.500	0.125
1-Chlorohexane	544-10-5	19.2		1.00	0.125
2,2-Dichloropropane	594-20-7	13.7		1.00	0.250
2-Hexanone	591-78-6	24.2		10.0	2.50
2-Chlorotoluene	95-49-8	19.8		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	31.5		10.0	2.50
Benzene	71-43-2	19.6		0.400	0.125
Bromobenzene	108-86-1	19.0		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	19.9		0.500	0.250
Bromoform	75-25-2	17.9		1.00	0.500
Bromomethane	74-83-9	16.7		1.00	0.500
Carbon disulfide	75-15-0	14.1		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	18.8		1.00	0.250
Chlorobenzene	108-90-7	18.5		0.500	0.125
Chloroethane	75-00-3	21.3		1.00	0.500
Chloroform	67-66-3	19.1		0.300	0.125
Chloromethane	74-87-3	20.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	19.0		0.500	0.250
Dibromomethane	74-95-3	20.5		1.00	0.250
Dichlorodifluoromethane	75-71-8	18.6		1.00	0.250
Ethylbenzene	100-41-4	18.7		1.00	0.250
Hexachlorobutadiene	87-68-3	16.0		0.600	0.250
Isopropylbenzene	98-82-8	18.7		1.00	0.250
Methylene chloride	75-09-2	19.4		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.6		5.00	0.500
MEK (2-Butanone)	78-93-3	22.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	22.1		10.0	2.50
n-Butylbenzene	104-51-8	19.7		1.00	0.250
n-Propylbenzene	103-65-1	19.5		1.00	0.125
m-,p-Xylene	179601-23-1	37.7		2.00	0.500
Naphthalene	91-20-3	18.7		1.00	0.200
o-Xylene	95-47-6	19.1		1.00	0.250
p-Isopropyltoluene	99-87-6	19.1		1.00	0.250
sec-Butylbenzene	135-98-8	19.0		1.00	0.250
Styrene	100-42-5	19.4		1.00	0.125
Trichloroethene	79-01-6	17.9		1.00	0.250
tert-Butylbenzene	98-06-6	18.7		1.00	0.250
Tetrachloroethene	127-18-4	18.2		1.00	0.250
Toluene	108-88-3	19.4		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.0		1.00	0.500
Trichlorofluoromethane	75-69-4	17.7		1.00	0.250
Vinyl chloride	75-01-4	18.7		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	110	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	109	76	119	

Certificate of Analysis

Sample #:	L17041200-59	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-165A-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG611922	**Analyst:**	TMB	**Run Date:**	04/28/2017 14:33
Collect Date:	04/23/2017 10:01	**Dilution:**	1	**File ID:**	6M146813
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.251	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.339	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.6	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144707	WG598323-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 08:36
6M144708	WG598323-02 5ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:02
6M144709	WG598323-03 20ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:37
6M144710	WG598323-04 50ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:10
6M144711	WG598323-05 100ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:42
6M144712	WG598323-06 200ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:14
6M144713	WG598323-07 300ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:47
6M144714	WG598323-08 400ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:19
6M144715	WG598323-09 500ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:52
6M144716	rinse	NA	1	1		01/12/17 13:25
6M144717	WG598323-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD79496	01/12/17 13:56
6M144718	WG598430-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 14:27
6M144719	WG598430-02 50ug/L CCV STD 8260	NA	1	1	STD79829	01/12/17 14:52
6M144720	WG598452-01 100ug/L A9 CCV STD 8260	NA	1	1	STD79571	01/12/17 15:27
6M144721	WG598431-01 VBLK0112 BLANK STD 826	NA	1	1		01/12/17 15:59
6M144722	WG598431-02 20ug/L LCS STD 8260	NA	1	1	STD79908	01/12/17 16:32
6M144723	L16120615-05 B MS 826-A9-SPE	7	1	1	STD79909	01/12/17 17:04
6M144724	L16120615-06 B MSD 826-A9-SPE	7	1	1	STD79909	01/12/17 17:37
6M144725	WG598431-03 100ug/L A9/FOO LCS	NA	1	1	STD79496	01/12/17 18:09
6M144726	L16120718-01 B TB 826-AP-SPE	<2	1	1		01/12/17 18:42
6M144727	L16120973-01 B TB 826-AP-SPE	<2	1	1		01/12/17 19:14
6M144728	L16120615-01 B 826-AP-SPE	7	1	1		01/12/17 19:46
6M144729	L16120615-02 B 826-AP-SPE	7	1	1		01/12/17 20:19
6M144730	L16120615-03 B EB 826-AP-SPE	4	1	1		01/12/17 20:51
6M144731	L16120615-04 B RS 826-AP-SPE	7	1	1		01/12/17 21:23
6M144732	L16120615-07 B 826-AP-SPE	4	1	1		01/12/17 21:55
6M144733	L16120615-08 B 826-AP-SPE	7	1	1		01/12/17 22:27
6M144734	L16120615-09 B 826-AP-SPE	7	1	1		01/12/17 22:59
6M144735	L16120718-02 B 826-AP-SPE	7	1	1		01/12/17 23:31
6M144736	L16120718-03 B 826-AP-SPE	7	1	1		01/13/17 00:03
6M144737	L16120718-04 B 826-AP-SPE	4	1	1		01/13/17 00:36
6M144738	L16120718-05 B 826-AP-SPE	4	1	1		01/13/17 01:08
6M144739	L16120718-06 B 826-AP-SPE	7	1	1		01/13/17 01:40
6M144740	L16120718-07 B 826-AP-SPE	7	1	1		01/13/17 02:12

Approved: January 13, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144741	RINSE	NA	1	1		01/13/17 02:44
6M144742	WG598431-07 VBLK0112 BLANK STD 624	NA	2	1		01/13/17 03:16
6M144743	L17010300-04 A 624	7	2	1		01/13/17 03:47
6M144744	L17010466-03 A 624-SPE	7	2	1		01/13/17 04:20
6M144745	L17010446-02 A 624-SPE1	7	2	1		01/13/17 04:52
6M144746	CCV	NA	1	1		01/13/17 05:24
6M144747	RINSE	NA	1	1		01/13/17 05:56
6M144748	RINSE	NA	1	1		01/13/17 06:28

Approved: January 13, 2017
Sarah Vandenberg

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040517
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54116

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194 LCS: STD81257 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608938

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146219	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:24
6M146220	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:38
6M146221	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 16:29
6M146222	RINSE	NA	1	1	STD80989	04/05/17 16:54
6M146223	WG608938-02 0.3ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:25
6M146224	WG608938-03 0.4ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:57
6M146225	WG608938-04 1ug/L STD 8260	NA	1	1	STD81194	04/05/17 18:28
6M146226	WG608938-05 2ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:00
6M146227	WG608938-06 5ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:31
6M146228	WG608938-07 20ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:02
6M146229	WG608938-08 50ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:34
6M146230	WG608938-09 100ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:06
6M146231	WG608938-10 200ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:37
6M146232	WG608938-11 300ug/L STD 8260	NA	1	1	STD81194	04/05/17 22:09
6M146233	RINSE	NA	1	1		04/05/17 22:40

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 6M146219				
	Tune failed, DNR.			
2	X			
File ID: 6M146220				
	Tune failed, DNR. Clipped the column and repalced the ferrule on the column.			

Approved: April 07, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146234	RINSE	NA	1	1		04/06/17 12:16
6M146235	RINSE	NA	1	1		04/06/17 13:19
6M146236	WG609128-01 50ng BFB STD 8260	NA	1	1	STD80989	04/06/17 13:59
6M146237	WG609128-02 50ug/L CCV STD 8260	NA	1	1	STD81194	04/06/17 14:24
6M146238	WG608979-01 100ug/L A9 CCV STD 8260	NA	1	1	STD80642	04/06/17 14:54
6M146239	WG608987-01 VBLK0406 BLANK STD 826	NA	1	1		04/06/17 15:26
6M146240	WG608938-12 20ug/L ALT SRC STD 8260	NA	1	1	STD81257	04/06/17 15:57
6M146241	WG608987-02 20ug/L LCS STD 8260	NA	1	1	STD81257	04/06/17 16:28
6M146242	L17040128-01 B 1000X 826-SPE D1	<2	1	1000		04/06/17 16:59
6M146243	L17031533-15 A 826-SPE	<2	1	1		04/06/17 17:30
6M146244	L17031574-17 A RS 826-SPE	NA	1	1		04/06/17 18:01
6M146245	L17031574-18 A MS 826-SPE	NA	1	1	STD81257	04/06/17 18:32
6M146246	L17031574-19 A MSD 826-SPE	NA	1	1	STD81257	04/06/17 19:02
6M146247	L17040128-02 B 200X 826-SPE D1	10	1	200		04/06/17 19:32
6M146248	L17031574-28 TB A 826-SPE	<2	1	1		04/06/17 20:03
6M146249	L17031690-02 TB A 826-SPE	<2	1	1		04/06/17 20:33
6M146250	L17040002-01 LOQ 826-SPE	NA	1	1	STD81310	04/06/17 21:03
6M146251	L17040004-01 LOD 826-SPE	NA	1	1	STD81310	04/06/17 21:33
6M146252	L17031690-01 A 826-SPE	<2	1	1		04/06/17 22:04
6M146253	L17031574-25 A 826-SPE	<2	1	1		04/06/17 22:34
6M146254	L17031574-24 A 826-SPE	<2	1	1		04/06/17 23:04
6M146255	L17031574-27 A 2.5X 826-SPE	<2	1	2.5		04/06/17 23:35
6M146256	L17031574-26 A 826-SPE	<2	1	1		04/07/17 00:05
6M146257	L17031574-23 A 826-SPE	<2	1	1		04/07/17 00:35
6M146258	L17040173-01 A 10X 826-TC	5	17	10		04/07/17 01:06
6M146259	ccv	NA	1	1		04/07/17 01:36
6M146260	rinse	NA	1	1		04/07/17 02:06
6M146261	rinse	NA	1	1		04/07/17 02:36
6M146262	WG608867-01 A FBLK 10X 826-TC	NA	17	10		04/07/17 03:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes
14	X	1000	Over Calibration Range	D.ETHER

Approved: April 07, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M146247				
20	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146253				
21	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146254				

Approved: April 07, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041117
Analyst1: FJB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD80956 Surrogate Standard: STD80957
CCV: NA LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609769

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17453	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:40
11M17454	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:59
11M17455	RINSE	NA	1	1		04/11/17 18:23
11M17456	WG609769-02 5ug/L STD A9	NA	1	1	STD81397	04/11/17 18:52
11M17457	WG609769-03 20ug/L STD A9	NA	1	1	STD81397	04/11/17 19:20
11M17458	WG609769-04 50ug/L STD A9	NA	1	1	STD81397	04/11/17 19:50
11M17459	WG609769-05 100ug/L STD A9	NA	1	1	STD81397	04/11/17 20:20
11M17460	WG609769-06 200ug/L STD A9	NA	1	1	STD81397	04/11/17 20:49
11M17461	WG609769-07 300ug/L STD A9	NA	1	1	STD81397	04/11/17 21:18
11M17462	WG609769-08 400ug/L STD A9	NA	1	1	STD81397	04/11/17 21:47
11M17463	WG609769-09 500ug/L STD A9	NA	1	1	STD81397	04/11/17 22:17
11M17464	RINSE	NA	1	1		04/11/17 22:47
11M17465	RINSE	NA	1	1		04/11/17 23:17
11M17466	WG609769-10 100ug/L ICV A9	NA	1	1	STD81404	04/11/17 23:46

Approved: April 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54128

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81397 LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609829

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418914	WG609829-01 50ng BFB STD 8260	NA	1	1	STD80989	04/12/17 10:17
8M418915	RINSE	NA	1	1	STD80989	04/12/17 10:42
8M418916	WG609829-02 5ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:11
8M418917	WG609829-03 20ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 11:40
8M418918	WG609829-04 50ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:10
8M418919	WG609829-05 100ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 12:41
8M418920	WG609829-06 200ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:10
8M418921	WG609829-07 300ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 13:40
8M418922	WG609829-08 400ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:10
8M418923	WG609829-09 500ug/L STD A9/FOO	NA	1	1	STD81397	04/12/17 14:39
8M418924	RINSE	NA	1	1		04/12/17 15:09
8M418925	RINSE	NA	1	1		04/12/17 15:39
8M418926	WG609829-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD81404	04/12/17 16:10
8M418927	WG609948-01 50ug/L CCV STD 8260	NA	1	1	STD81377	04/12/17 16:39
8M418928	RINSE	NA	1	1		04/12/17 17:09

Approved: April 18, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 041717
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18/1
Maintenance Log ID: 54132

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81447 LCS: STD81461 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG610410

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M418996	WG610373-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 09:44
8M418997	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:10
8M418998	WG610373-02 50ug/L CCV STD 8260	NA	1	1	STD81375	04/17/17 10:42
8M418999	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/17/17 11:13
8M419000	WG610410-01 50ng BFB STD 8260	NA	1	1	STD80989	04/17/17 12:58
8M419001	RINSE	NA	1	1		04/17/17 13:21
8M419002	WG610410-02 0.3ug/L STD 8260	NA	1	1	STD81447	04/17/17 13:51
8M419003	WG610410-03 0.4ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:25
8M419004	WG610410-04 1ug/L STD 8260	NA	1	1	STD81447	04/17/17 14:55
8M419005	WG610410-05 2ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:25
8M419006	WG610410-06 5ug/L STD 8260	NA	1	1	STD81447	04/17/17 15:54
8M419007	WG610410-07 20ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:24
8M419008	WG610410-08 50ug/L STD 8260	NA	1	1	STD81447	04/17/17 16:54
8M419009	WG610410-09 100ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:23
8M419010	WG610410-10 200ug/L STD 8260	NA	1	1	STD81447	04/17/17 17:54
8M419011	WG610410-11 300ug/L STD 8260	NA	1	1	STD81447	04/17/17 18:24
8M419012	RINSE	NA	1	1		04/17/17 18:53
8M419013	RINSE	NA	1	1		04/17/17 19:23
8M419014	WG610410-12 50ug/L ALT SRC STD 8260	NA	1	1	STD81461	04/17/17 19:53
8M419015	RINSE	NA	1	1		04/17/17 20:23

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 8M418997				
			Bromomethane was low, DNR.	
3	X			
File ID: 8M418998				
			Bromomethane and iodomethane were low, DNR.	
4				
File ID: 8M418999				
			Not needed, DNR.	

Approved: April 20, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042417
Analyst1: JDS Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54137

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611320

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17701	WG611320-02 50ug/L CCV 8260	NA	1	1	STD81577	04/24/17 14:20
11M17704	RINSE	NA	1	1	STD81491	04/24/17 15:18
11M17705	WG611320-01 BFB 50ng 8260	NA	1	1	STD81491	04/24/17 16:08
11M17706	RINSE	NA	1	1	STD81577	04/24/17 16:32
11M17707	WG611320-02 .3ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:01
11M17708	WG611320-03 .4ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:30
11M17709	WG611320-04 1ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:59
11M17710	WG611320-05 2ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:29
11M17711	WG611320-06 5ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:58
11M17712	WG611320-07 20ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:27
11M17713	WG611320-08 50ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:57
11M17714	WG611320-09 100ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:27
11M17715	WG611320-10 200ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:56
11M17716	WG611320-11 300ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 21:26
11M17717	RINSE	NA	1	1		04/24/17 21:56
11M17718	WG611320-12 50ug/L ICV 8260	NA	1	1	STD81583	04/24/17 22:26

Approved: April 28, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042517
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611545, WG611456

Comments: MDLS need RR for DCDF

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273002	WG611454-01 BFB 50ng 8260	NA	1	1	STD81491	04/25/17 20:07
17M0273003	RINSE	NA	1	1		04/25/17 20:25
17M0273004	WG611454-02 0.3ug/L STD 8260	NA	1	1	STD81577	04/25/17 20:45
17M0273005	WG611454-03 0.4ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:05
17M0273006	WG611454-04 1ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:24
17M0273007	WG611454-05 2ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:56
17M0273008	WG611454-06 5ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:15
17M0273009	WG611454-07 20ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:46
17M0273010	WG611454-08 50ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:06
17M0273011	WG611454-09 100ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:38
17M0273012	WG611454-10 200ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:58
17M0273013	WG611454-11 300ug/L STD 8260	NA	1	1	STD81577	04/26/17 00:33
17M0273014	RINSE	NA	1	1		04/26/17 00:53
17M0273015	WG611454-12 50ug/L ICV 8260	NA	1	1	STD81596	04/26/17 01:35
17M0273016	RINSE	NA	1	1		04/26/17 02:19
17M0273017	WG611456-01 BLANK 8260	NA	1	1		04/26/17 02:53
17M0273018	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 03:32
17M0273019	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 04:14
17M0273020	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 04:34
17M0273021	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 05:22
17M0273022	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 05:58
17M0273023	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 06:18
17M0273024	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 07:01
17M0273025	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 07:21
17M0273026	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 08:14

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146797	WG611920-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 06:27
6M146798	WG611920-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 06:52
6M146799	WG611923-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 07:23
6M146800	WG611922-01 VBLK0428 BLANK STD 826	NA	1	1		04/28/17 07:54
6M146801	WG611922-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 08:25
6M146802	WG611922-03 100ug/L A9 LCS STD 8260	NA	1	1	STD81640	04/28/17 08:57
6M146803	L17041110-09 B 826-SPE	<2	1	1		04/28/17 09:28
6M146804	L17041110-12 A 826-SPE	<2	1	1		04/28/17 09:59
6M146805	L17041110-17 A 826-SPE	<2	1	1		04/28/17 10:29
6M146806	L17041200-50 A 826-SPE	<2	1	1		04/28/17 11:00
6M146807	L17041200-51 A 826-SPE	<2	1	1		04/28/17 11:30
6M146808	L17041200-52 A 826-SPE	<2	1	1		04/28/17 12:02
6M146809	L17041200-53 A 826-SPE	<2	1	1		04/28/17 12:32
6M146810	L17041200-54 A 826-SPE	<2	1	1		04/28/17 13:03
6M146811	L17041200-55 A 826-SPE	<2	1	1		04/28/17 13:34
6M146812	L17041200-56 RS A 826-SPE	<2	1	1		04/28/17 14:03
6M146813	L17041200-59 A 826-SPE	<2	1	1		04/28/17 14:33
6M146814	L17041200-57 A MS 826-SPE	<2	1	1	STD8	04/28/17 15:04
6M146816	L17041200-58 A MSD 826-SPE	<2	1	1	STD81634	04/28/17 15:35
6M146817	L17041314-04 B 5X 826-A9-SPE D1	6	1	5		04/28/17 16:05
6M146818	L17041110-25 B 5X 826-SPE 00	6	1	5		04/28/17 16:36
6M146819	L17041314-02 B 5X 826-SPE 00	3	1	5		04/28/17 17:06
6M146820	WG612082-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 18:32
6M146821	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 18:57
6M146822	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 19:35
6M146823	WG612110-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 20:07
6M146824	WG612085-01 BLANK STD 8260	NA	1	1		04/28/17 20:38
6M146825	WG612085-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 21:09
6M146826	L17041203-11 A MS 826-SPE	NA	1	1	STD81634	04/28/17 21:40
6M146827	L17041203-12 A MSD 826-SPE	NA	1	1	STD81634	04/28/17 22:10
6M146828	WG612085-06 100ug/L LCS STD 826-A9	NA	1	1	STD81640	04/28/17 22:41
6M146829	L17041431-05 A EB 826-A9-SPE	5	1	1		04/28/17 23:11
6M146830	L17041203-10 A REF 826-SPE	NA	1	1		04/28/17 23:42

Approved: May 03, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146831	L17041431-07 A 826-A9-SPE	6	1	1		04/29/17 00:12

Comments

Seq.	Rerun	Dil.	Reason	Analytes
21				
File ID: 6M146818				
			L17041110-25 B 5X 826-SPE 00 antifoam added. Sample is dark and foamy-unable to run more concentrated.	
22				
File ID: 6M146819				
			L17041314-02 B 5X 826-SPE 00 analyzed at a dilution based on sample history.	
24				
File ID: 6M146821				
			WG612082-02 50ug/L CCV STD 8260 rerun CCV, vinyl chloride is low.	
43				
File ID: 6M146830				
			L17041203-10 A REF 826-SPE F flag hits present in the blank. The sample is non-detect for all analytes.	

Approved: May 03, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611925 WG612021

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17826	WG611924-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 06:28
11M17827	WG611924-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 06:53
11M17828	WG611924-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 07:26
11M17829	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 07:56
11M17830	WG611925-01 VBLK0428 BLANK STD 826	NA	1	1		04/28/17 08:26
11M17831	WG611925-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 08:56
11M17832	L17041200-12 A MS 826-SPE	<2	1	1	STD81634	04/28/17 09:25
11M17833	L17041200-13 A MSD 826-SPE	<2	1	1	STD81634	04/28/17 09:55
11M17834	L17041318-03 A 826-SPE3	<2	1	1		04/28/17 10:25
11M17835	L17041318-02 A 826-SPE3	<2	1	1		04/28/17 10:54
11M17836	L17041318-01 A 826-SPE3	<2	1	1		04/28/17 11:23
11M17837	L17041200-11 A RS 826-SPE	<2	1	1		04/28/17 11:52
11M17838	L17041200-10 A 826-SPE	<2	1	1		04/28/17 12:22
11M17839	L17041200-09 A 826-SPE	<2	1	1		04/28/17 12:51
11M17840	L17041200-08 A 826-SPE	<2	1	1		04/28/17 13:20
11M17841	L17041200-07 A 826-SPE	<2	1	1		04/28/17 13:49
11M17842	L17041200-06 A 826-SPE	<2	1	1		04/28/17 14:18
11M17843	L17041200-05 A 826-SPE	<2	1	1		04/28/17 14:47
11M17844	L17041200-04 A 826-SPE	<2	1	1		04/28/17 15:16
11M17845	L17041200-03 A 826-SPE	<2	1	1		04/28/17 15:46
11M17846	L17041200-02 A 826-SPE	<2	1	1		04/28/17 16:15
11M17847	L17041200-01 A 826-SPE	<2	1	1		04/28/17 16:44
11M17848	L17041200-14 A 826-SPE	<2	1	1		04/28/17 17:16
11M17849	L17041200-15 A 826-SPE	<2	1	1		04/28/17 17:46
11M17850	WG612020-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 18:59
11M17851	WG612020-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 19:23
11M17852	WG612022-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 19:58
11M17853	WG612021-01 BLANK STD 8260	NA	1	1		04/28/17 20:27
11M17854	WG612021-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 20:55
11M17855	L17041203-02 A MS 826-SPE	<2	1	1	STD81634	04/28/17 21:24
11M17856	L17041203-03 A MSD 826-SPE	<2	1	1	STD81634	04/28/17 21:54
11M17857	L17041314-01 B 5X 826-A9-SPE 00	7	1	5		04/28/17 22:23
11M17858	L17041314-03 B D1 100X 826-A9-SPE	7	1	100		04/28/17 22:52
11M17859	L17041316-02 B 00 2X 826-A9-SPE	7	1	2		04/28/17 23:21

Approved: May 01, 2017

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Instrument Run Log

Instrument: HPMS11 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611925 WG612021

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17860	L17041316-03 B 00 50X 826-A9-SPE	7	1	50		04/28/17 23:51

Approved: May 01, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54146

Internal Standard: STD81412 Surrogate Standard: STD81412
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611929; WG612027

Comments: Power outage stopped the sequence.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419222	WG611928-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 07:22
8M419223	WG611928-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 07:37
8M419224	WG611928-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 08:01
8M419225	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 08:32
8M419226	WG611929-01 VBLK0428 BLANK STD 826	NA	1	1		04/28/17 09:02
8M419227	WG611929-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 09:33
8M419228	WG611929-03 20ug/L LCS2 STD 8260	NA	1	1	STD81634	04/28/17 10:02
8M419229	L17041086-01 C 50X 826-SPE D1	<2	1	50		04/28/17 10:33
8M419230	L17041200-16 A 826-SPE	<2	1	1		04/28/17 11:03
8M419231	L17041200-17 A 826-SPE	<2	1	1		04/28/17 11:32
8M419232	L17041200-18 A 826-SPE	<2	1	1		04/28/17 12:03
8M419233	L17041200-19 A 826-SPE	<2	1	1		04/28/17 12:33
8M419234	L17041200-20 A 826-SPE	<2	1	1		04/28/17 13:03
8M419235	L17041200-21 A 826-SPE	<2	1	1		04/28/17 13:33
8M419236	L17041200-22 A 826-SPE	<2	1	1		04/28/17 14:02
8M419237	L17041200-23 A 826-SPE	<2	1	1		04/28/17 14:32
8M419238	L17041200-24 A 826-SPE	<2	1	1		04/28/17 15:02
8M419239	L17041200-25 A 826-SPE	<2	1	1		04/28/17 15:32
8M419240	L17041200-26 A 826-SPE	<2	1	1		04/28/17 16:02
8M419241	L17041200-27 A 826-SPE	<2	1	1		04/28/17 16:32
8M419242	L17041200-28 A 826-SPE	<2	1	1		04/28/17 17:02
8M419243	L17041200-29 A 826-SPE	<2	1	1		04/28/17 17:31
8M419244	L17041200-30 A 826-SPE	<2	1	1		04/28/17 18:01
8M419245	L17041200-31 A 826-SPE	<2	1	1		04/28/17 18:31
8M419246	L17041200-32 A 826-SPE	<2	1	1		04/28/17 19:01
8M419247	L17041200-33 A 826-SPE	<2	1	1		04/28/17 19:31
8M419248	WG612027-02 20ug/L LCS STD 624	NA	2	1	STD81634	04/28/17 20:00
8M419249	WG612027-01 VBLK0428 BLANK STD 624	NA	2	1		04/28/17 20:30
8M419250	L17041226-02 B 624-SPE2	7	2	1		04/28/17 21:00
8M419251	L17041379-14 TB A 624-SPE1	5	2	1		04/28/17 21:30
8M419252	L17041381-09 TB A 624-SPE1	5	2	1		04/28/17 22:01
8M419253	L17041382-15 TB A 624-SPE1	5	2	1		04/28/17 22:31
8M419254	L17041381-07 EB A 624-SPE1	5	2	1		04/28/17 23:01
8M419255	L17041382-13 EB A 624-SPE1	5	2	1		04/28/17 23:31

Approved: May 01, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS8 Dataset: 042817
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54146

Internal Standard: STD81412 Surrogate Standard: STD81412
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611929; WG612027

Comments: Power outage stopped the sequence.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
8M419256	L17041382-07 RS A 624-SPE1	7	2	1		04/29/17 00:01
8M419257	L17041382-09 MS A 624-SPE1	7	2	1	STD81634	04/29/17 00:31

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 8M419222				
			Tune failed, DNR.	
4				
File ID: 8M419225				
			Not needed, DNR.	

Approved: May 01, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042817
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612030, WG612088

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273103	WG612029-01 BFB 50ng 8260	NA	1	1	STD81491	04/28/17 12:01
17M0273104	WG612029-02 50ug/L CCV 8260	NA	1	1	STD81577	04/28/17 12:19
17M0273105	RINSE	NA	1	1		04/28/17 12:41
17M0273106	WG612030-01 BLANK 8260	NA	1	1		04/28/17 13:01
17M0273107	WG612030-02 20ug/L LCS 8260	NA	1	1	STD81596	04/28/17 13:21
17M0273108	L17041075-29 B MS 826-SPE	<2	1	1	STD81596	04/28/17 13:40
17M0273109	L17041075-30 B MSD 826-SPE	<2	1	1	STD81596	04/28/17 14:00
17M0273110	RINSE	NA	1	1		04/28/17 14:33
17M0273111	L17041075-28 B 826-SPE	<2	1	1		04/28/17 14:53
17M0273112	L17041200-34 A 826-SPE	<2	1	1		04/28/17 15:13
17M0273113	L17041200-35 A 826-SPE	<2	1	1		04/28/17 15:33
17M0273114	L17041200-36 A 826-SPE	<2	1	1		04/28/17 16:03
17M0273115	L17041200-37 A 826-SPE	<2	1	1		04/28/17 16:23
17M0273116	L17041200-38 A 826-SPE	<2	1	1		04/28/17 16:43
17M0273117	L17041200-39 A 826-SPE	<2	1	1		04/28/17 17:10
17M0273118	L17041200-40 A 826-SPE	<2	1	1		04/28/17 17:30
17M0273119	L17041200-41 A 826-SPE	<2	1	1		04/28/17 17:50
17M0273120	L17041200-42 A 826-SPE	<2	1	1		04/28/17 18:09
17M0273121	L17041200-43 A 826-SPE	<2	1	1		04/28/17 18:29
17M0273122	L17041200-44 A 826-SPE	<2	1	1		04/28/17 18:49
17M0273123	L17041200-45 A 826-SPE	<2	1	1		04/28/17 19:17
17M0273124	L17041200-46 A 826-SPE	<2	1	1		04/28/17 19:37
17M0273125	L17041200-47 A 826-SPE	<2	1	1		04/28/17 19:57
17M0273126	L17041200-48 A 826-SPE	<2	1	1		04/28/17 20:17
17M0273127	L17041200-49 A 826-SPE	<2	1	1		04/28/17 20:47
17M0273128	WG612088-01 BLANK 8260	NA	1	1		04/28/17 21:06
17M0273129	WG612088-02 20ug/L LCS 8260	NA	1	1		04/28/17 21:26
17M0273130	WG612088-03 20ug/L LCSDUP 8260	NA	1	1		04/28/17 21:46
17M0273131	RINSE	NA	1	1		04/28/17 22:18
17M0273132	L17041244-08 B 826-SPE	<2	1	1		04/28/17 22:38
17M0273133	L17041244-09 B 826-SPE	3	1	1		04/28/17 22:53
17M0273134	L17041244-10 A 826-SPE	<2	1	1		04/28/17 23:23
17M0273135	L17041244-12 A 826-SPE	<2	1	1		04/28/17 23:43
17M0273136	L17041244-13 A 826-SPE	<2	1	1		04/29/17 00:12

Approved: May 01, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042817
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612030, WG612088

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
31				
File ID: 17M0273133				
			L17041244-09 ERROR? ISTD FAILURE.	
34				
File ID: 17M0273136				
			L17041244-13 MT DNR	

Approved: May 01, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17861	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:42
11M17862	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:54
11M17863	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 16:19
11M17864	RINSE	NA	1	1	STD81577	04/29/17 16:50
11M17865	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 17:20
11M17866	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:45
11M17867	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:57
11M17868	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:21
11M17869	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:53
11M17870	WG612122-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/29/17 19:26
11M17871	WG612123-01 VBLK0429 BLANK STD 826	NA	1	1		04/29/17 19:55
11M17872	WG612123-02 20ug/L LCS STD 8260	NA	1	1	STD81654	04/29/17 20:24
11M17873	L17041203-02 B MS 826-SPE	<2	1	1	STD81654	04/29/17 20:53
11M17874	L17041203-03 B MSD 826-SPE	<2	1	1	STD81654	04/29/17 21:22
11M17875	RINSE	NA	1	1		04/29/17 21:51
11M17876	L17041208-03 A TB 826-SPE	<2	1	1		04/29/17 22:20
11M17877	L17041203-01 A RS 826-SPE	<2	1	1		04/29/17 22:49
11M17878	L17041209-08 A TB 826-SPE	<2	1	1		04/29/17 23:18
11M17879	L17041209-09 A EB 826-SPE	<2	1	1		04/29/17 23:48
11M17880	L17041200-01 B 826-SPE	<2	1	1		04/30/17 00:17
11M17881	L17041203-04 A 826-SPE	<2	1	1		04/30/17 00:46
11M17882	L17041208-01 A 826-SPE	<2	1	1		04/30/17 01:16
11M17883	L17041208-02 A 826-SPE	<2	1	1		04/30/17 01:45
11M17884	L17041209-01 A 826-SPE	<2	1	1		04/30/17 02:14
11M17885	L17041209-02 A 826-SPE	<2	1	1		04/30/17 02:43
11M17886	L17041209-03 A 826-SPE	<2	1	1		04/30/17 03:13
11M17887	L17041209-04 A 826-SPE	<2	1	1		04/30/17 03:42
11M17888	L17041209-05 A 826-SPE	<2	1	1		04/30/17 04:11
11M17889	L17041203-06 A 826-SPE	<2	1	1		04/30/17 04:40
11M17890	L17041203-07 A 826-SPE	<2	1	1		04/30/17 05:10
11M17891	L17041203-08 A 826-SPE	<2	1	1		04/30/17 05:39
11M17892	WG612124-02 20ug/L LCS STD 624	NA	2	1	STD81654	04/30/17 06:08
11M17893	WG612124-03 20ug/L LCS2 STD 624	NA	2	1	STD81654	04/30/17 06:37
11M17894	WG612124-01 VBLK0429 BLANK STD 624	NA	2	1		04/30/17 07:06

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17895	L17041383-07 A TB 624-SPE1	5	2	1		04/30/17 07:35
11M17896	L17041379-03 A 624-SPE1	7	2	1		04/30/17 08:05
11M17897	L17041379-05 A 624-SPE1	7	2	1		04/30/17 08:34
11M17898	L17041379-10 A 624-SPE1	7	2	1		04/30/17 09:04
11M17899	L17041381-01 A 624-SPE1	7	2	1		04/30/17 09:33
11M17900	L17041381-03 A 624-SPE1	7	2	1		04/30/17 10:02
11M17901	L17041381-05 A 624-SPE1	7	2	1		04/30/17 10:31
11M17902	CCV	NA	1	1		04/30/17 11:00
11M17903	RINSE	NA	1	1		04/30/17 11:29

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1				
File ID: 11M17861				
			WG612121-01 fails, RR BFB.	
3	X			
File ID: 11M17863				
			WG612121-02 ISTD high.	
5				
File ID: 11M17865				
			WG612121-02 VC fails high, Drop voltage, RR.	
6				
File ID: 11M17866				
			WG612121-01 Fails, RR.	
8				
File ID: 11M17868				
			WG612121-02 VC fails, high, RR.	

Approved: May 02, 2017

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Microbac Laboratories Inc.

Data Checklist

Date: 12-JAN-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 79799
Analytical Workgroups: WG598323; WG598431

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-JAN-2017
Tiffany Bailey

Secondary Reviewer:
13-JAN-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: JAN-13-2017 13:54:15

Microbac Laboratories Inc.

Data Checklist

Date: 05-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81399
Analytical Workgroups: WG608938

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
06-APR-2017

Tiffany Bailey

Secondary Reviewer:
07-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:59:30

Microbac Laboratories Inc.

Data Checklist

Date: 06-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81412
Analytical Workgroups: WG608987

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
07-APR-2017
Tiffany Bailey

Secondary Reviewer:
07-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:09:55

Microbac Laboratories Inc.

Data Checklist

Date: 11-APR-2017
Analyst: FJB
Analyst: NA
Method: 8260B/C/OVAP/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81698
Analytical Workgroups: WG609769

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	NA
Surrogates	NA
LCS (Laboratory Control Sample)	NA
Recoveries	NA
Surrogates	NA
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	NA
Internal Standards Criteria	NA
Library Searches	NA
Calculations & Correct Factors	NA
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	FJB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017

Secondary Reviewer:
24-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:52:25

Microbac Laboratories Inc.

Data Checklist

Date: 12-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81580
Analytical Workgroups: WG609829

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
17-APR-2017

Tiffany Bailey

Secondary Reviewer:
18-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-18-2017 13:13:22

Microbac Laboratories Inc.

Data Checklist

Date: 17-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81593
Analytical Workgroups: WG610410

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	TMB
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
18-APR-2017

Tiffany Bailey

Secondary Reviewer:
20-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-20-2017 13:10:53

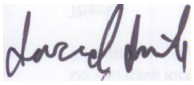
Microbac Laboratories Inc.

Data Checklist

Date: 24-APR-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81779
Analytical Workgroups: WG611320

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	NA
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017



Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 16:39:04

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81782
Analytical Workgroups: WG611454, WG611456

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-31-2017 15:17:00

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81824
Analytical Workgroups: WG611922; WG612085

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
29-APR-2017
Tiffany Bailey

Secondary Reviewer:
03-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-03-2017 09:32:40

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: TMB
Analyst: JDS
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81828
Analytical Workgroups: WG611925 WG612021

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	WTD
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
30-APR-2017

Secondary Reviewer:
01-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-01-2017 13:19:02

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS8
Curve Workgroup: NA
Runlog ID: 81816
Analytical Workgroups: WG611929

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
28-APR-2017
Tiffany Bailey

Secondary Reviewer:
01-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-01-2017 17:37:04

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81825
Analytical Workgroups: WG612030, WG612088

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
29-APR-2017

Secondary Reviewer:
01-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-01-2017 13:34:09

Microbac Laboratories Inc.

Data Checklist

Date: 29-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81877
Analytical Workgroups: WG612123, WG612124

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
02-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 16:33:36

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611922

Login Number: L17041200

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-246-ODLB-14	50	04/23/17					04/28/2017	5.1	14		04/28/17	5.1	14	
DUP-8	51	04/23/17					04/28/2017	5.1	14		04/28/17	5.1	14	
MW-237-ODLB-14	52	04/23/17					04/28/2017	5.1	14		04/28/17	5.1	14	
MW-166-ODLB-14	53	04/23/17					04/28/2017	5.1	14		04/28/17	5.1	14	
MW-166A-ODLB-14	54	04/23/17					04/28/2017	5.1	14		04/28/17	5.1	14	
MW-151-ODLB-14	55	04/23/17					04/28/2017	5.2	14		04/28/17	5.2	14	
MW-247-ODLB-14	56	04/23/17					04/28/2017	5.2	14		04/28/17	5.2	14	
MW-247-ODLB-14	57	04/23/17					04/28/2017	5.2	14		04/28/17	5.2	14	
MW-247-ODLB-14	58	04/23/17					04/28/2017	5.2	14		04/28/17	5.2	14	
MW-165A-ODLB-14	59	04/23/17					04/28/2017	5.2	14		04/28/17	5.2	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268562
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG611925

Login Number: L17041200

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-227-ODLB-14	02	04/22/17					04/28/2017	6.3	14		04/28/17	6.3	14	
MW-228-ODLB-14	03	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	
MW-174-ODLB-14	04	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	
MW-15-ODLB-14	05	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	
MW-91-ODLB-14	06	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	
DUP-3	07	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-06-ODLB-14	08	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-87-ODLB-14	09	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-176-ODLB-14	10	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-225-ODLB-14	11	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-225-ODLB-14	12	04/22/17					04/28/2017	5.9	14		04/28/17	5.9	14	
MW-225-ODLB-14	13	04/22/17					04/28/2017	5.9	14		04/28/17	5.9	14	
MW-223-ODLB-14	14	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	
MW-226-ODLB-14	15	04/22/17					04/28/2017	6.3	14		04/28/17	6.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

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Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG611929

Login Number: L17041200

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-222-ODLB-14	16	04/22/17					04/28/2017	6	14		04/28/17	6	14	
DUP-7	17	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-224-ODLB-14	18	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-134-ODLB-14	19	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-187-ODLB-14	20	04/22/17					04/28/2017	6	14		04/28/17	6	14	
DUP-6	21	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-13-ODLB-14	22	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-04-ODLB-14	23	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-221-ODLB-14	24	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-180-ODLB-14	25	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-03-ODLB-14	26	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-220-ODLB-14	27	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-07-ODLB-14	28	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-230-ODLB-14	29	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-31-ODLB-14	30	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-147-ODLB-14	31	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-148-ODLB-14	32	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-241-ODLB-14	33	04/22/17					04/28/2017	6.2	14		04/28/17	6.2	14	

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PDF File ID: 5268562
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG612030

Login Number: L17041200

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-160-ODLB-14	34	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-242-ODLB-14	35	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-150-ODLB-14	36	04/22/17					04/28/2017	6	14		04/28/17	6	14	
DUP-4	37	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-54-ODLB-14	38	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-155-ODLB-14	39	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-243-ODLB-14	40	04/22/17					04/28/2017	6	14		04/28/17	6	14	
MW-245-ODLB-14	41	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-159-ODLB-14	42	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-149-ODLB-14	43	04/22/17					04/28/2017	6.1	14		04/28/17	6.1	14	
MW-244-ODLB-14	44	04/23/17					04/28/2017	5.4	14		04/28/17	5.4	14	
MW-251-ODLB-14	45	04/23/17					04/28/2017	5.5	14		04/28/17	5.5	14	
MW-250-ODLB-14	46	04/23/17					04/28/2017	5.5	14		04/28/17	5.5	14	
DUP-9	47	04/23/17					04/28/2017	5.5	14		04/28/17	5.5	14	
MW-158-ODLB-14	48	04/23/17					04/28/2017	5.5	14		04/28/17	5.5	14	
MW-158A-ODLB-14	49	04/23/17					04/28/2017	5.5	14		04/28/17	5.5	14	

* = SEE PROJECT QAPP REQUIREMENTS

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PDF File ID: 5268562
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612123

Login Number: L17041200

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-57-ODLB-14	01	04/22/17					04/30/2017	7.6	14		04/30/17	7.6	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268562
Report generated 05/02/2017 16:41

Login Number: L17041200
Instrument Id: HPMS17
Workgroup (AAB#): WG612030

Method: 8260
CAL ID: HPMS17-26-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041200-34	1.00	01	102	101	107	102
L17041200-35	1.00	01	103	99.5	107	100
L17041200-36	1.00	01	101	99.6	109	103
L17041200-37	1.00	01	102	100	107	103
L17041200-38	1.00	01	102	98.6	102	99.1
L17041200-39	1.00	01	101	98.4	107	103
L17041200-40	1.00	01	104	102	111	105
L17041200-41	1.00	01	102	101	112	105
L17041200-42	1.00	01	104	102	112	105
L17041200-43	1.00	01	103	101	106	103
L17041200-44	1.00	01	104	101	110	103
L17041200-45	1.00	01	102	99.5	98.4	99.0
L17041200-46	1.00	01	102	101	109	104
L17041200-47	1.00	01	102	100	102	99.7
L17041200-48	1.00	01	104	102	108	105
L17041200-49	1.00	01	102	100	112	104
WG612030-01	1.00	01	103	101	108	104
WG612030-02	1.00	01	104	102	106	104

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268569
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041200
Instrument Id: HPMS8
Workgroup (AAB#): WG611929

Method: 8260
CAL ID: HPMS8-17-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041200-16	1.00	01	102	99.6	104	106
L17041200-17	1.00	01	104	101	105	107
L17041200-18	1.00	01	102	100	105	107
L17041200-19	1.00	01	104	101	104	107
L17041200-20	1.00	01	102	101	107	109
L17041200-21	1.00	01	102	100	108	109
L17041200-22	1.00	01	104	102	106	108
L17041200-23	1.00	01	105	101	106	107
L17041200-24	1.00	01	105	101	106	108
L17041200-25	1.00	01	105	102	106	108
L17041200-26	1.00	01	105	102	106	108
L17041200-27	1.00	01	102	99.6	106	107
L17041200-28	1.00	01	106	99.9	106	108
L17041200-29	1.00	01	103	103	107	107
L17041200-30	1.00	01	102	101	107	108
L17041200-31	1.00	01	106	102	106	107
L17041200-32	1.00	01	106	100	105	107
L17041200-33	1.00	01	104	101	108	107
WG611929-01	1.00	01	104	102	106	107
WG611929-02	1.00	01	103	103	101	105
WG611929-03	1.00	01	104	102	101	106

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268569
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041200
Instrument Id: HPMS6
Workgroup (AAB#): WG611922

Method: 8260
CAL ID: HPMS6-05-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041200-50	1.00	01	106	90.2	110	106
L17041200-51	1.00	01	109	102	110	107
L17041200-52	1.00	01	108	102	108	106
L17041200-53	1.00	01	109	99.6	110	106
L17041200-54	1.00	01	105	97.4	109	106
L17041200-55	1.00	01	109	99.7	110	106
L17041200-56	1.00	01	107	99.2	110	106
L17041200-57	1.00	01	107	102	106	107
L17041200-58	1.00	01	110	104	109	107
L17041200-59	1.00	01	108	99.6	109	107
WG611922-01	1.00	01	110	102	109	106
WG611922-02	1.00	01	110	104	106	106
WG611922-03	1.00	01	110	105	112	108

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268569
Report generated: 05/02/2017 16:42

Login Number: L17041200
Instrument Id: HPMS11
Workgroup (AAB#): WG611925

Method: 8260
CAL ID: HPMS11-24-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041200-02	1.00	01	108	102	106	106
L17041200-03	1.00	01	107	101	104	106
L17041200-04	1.00	01	103	98.9	108	105
L17041200-05	1.00	01	104	100	103	105
L17041200-06	1.00	01	105	101	106	106
L17041200-07	1.00	01	109	104	105	106
L17041200-08	1.00	01	107	104	105	106
L17041200-09	1.00	01	107	104	105	107
L17041200-10	1.00	01	106	101	114	106
L17041200-11	1.00	01	106	99.8	107	105
L17041200-12	1.00	01	104	103	104	105
L17041200-13	1.00	01	104	104	105	105
L17041200-14	1.00	01	110	103	106	108
L17041200-15	1.00	01	108	102	104	106
WG611925-01	1.00	01	105	103	106	106
WG611925-02	1.00	01	106	104	102	107

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268569
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041200
Instrument Id: HPMS11
Workgroup (AAB#): WG612123

Method: 8260
CAL ID: HPMS11-24-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041200-01	1.00	01	109	107	119	113
WG612123-01	1.00	01	104	99.1	106	106
WG612123-02	1.00	01	105	103	104	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268569
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041200
Work Group: WG611925
Blank File ID: 11M17830
Blank Sample ID: WG611925-01
Prep Date: 04/28/17 08:26
Instrument ID: HPMS11
Analyzed Date: 04/28/17 08:26
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611925-02	11M17831	04/28/17 08:56	01
MW-225-ODLB-14	L17041200-12	11M17832	04/28/17 09:25	01
MW-225-ODLB-14	L17041200-13	11M17833	04/28/17 09:55	01
MW-225-ODLB-14	L17041200-11	11M17837	04/28/17 11:52	01
MW-176-ODLB-14	L17041200-10	11M17838	04/28/17 12:22	01
MW-87-ODLB-14	L17041200-09	11M17839	04/28/17 12:51	01
MW-06-ODLB-14	L17041200-08	11M17840	04/28/17 13:20	01
DUP-3	L17041200-07	11M17841	04/28/17 13:49	01
MW-91-ODLB-14	L17041200-06	11M17842	04/28/17 14:18	01
MW-15-ODLB-14	L17041200-05	11M17843	04/28/17 14:47	01
MW-174-ODLB-14	L17041200-04	11M17844	04/28/17 15:16	01
MW-228-ODLB-14	L17041200-03	11M17845	04/28/17 15:46	01
MW-227-ODLB-14	L17041200-02	11M17846	04/28/17 16:15	01
MW-223-ODLB-14	L17041200-14	11M17848	04/28/17 17:16	01
MW-226-ODLB-14	L17041200-15	11M17849	04/28/17 17:46	01

Report Name: BLANK_SUMMARY
PDF File ID: 5268570
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041200	Work Group:	WG612123
Blank File ID:	11M17871	Blank Sample ID:	WG612123-01
Prep Date:	04/29/17 19:55	Instrument ID:	HPMS11
Analyzed Date:	04/29/17 19:55	Method:	8260B
Analyst:	TMB		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612123-02	11M17872	04/29/17 20:24	01
MW-57-ODLB-14	L17041200-01	11M17880	04/30/17 00:17	01

Report Name: BLANK_SUMMARY
PDF File ID: 5268570
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041200
Work Group: WG612030
Blank File ID: 17M0273106
Blank Sample ID: WG612030-01
Prep Date: 04/28/17 13:01
Instrument ID: HPMS17
Analyzed Date: 04/28/17 13:01
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612030-02	17M0273107	04/28/17 13:21	01
MW-160-ODLB-14	L17041200-34	17M0273112	04/28/17 15:13	01
MW-242-ODLB-14	L17041200-35	17M0273113	04/28/17 15:33	01
MW-150-ODLB-14	L17041200-36	17M0273114	04/28/17 16:03	01
DUP-4	L17041200-37	17M0273115	04/28/17 16:23	01
MW-54-ODLB-14	L17041200-38	17M0273116	04/28/17 16:43	01
MW-155-ODLB-14	L17041200-39	17M0273117	04/28/17 17:10	01
MW-243-ODLB-14	L17041200-40	17M0273118	04/28/17 17:30	01
MW-245-ODLB-14	L17041200-41	17M0273119	04/28/17 17:50	01
MW-159-ODLB-14	L17041200-42	17M0273120	04/28/17 18:09	01
MW-149-ODLB-14	L17041200-43	17M0273121	04/28/17 18:29	01
MW-244-ODLB-14	L17041200-44	17M0273122	04/28/17 18:49	01
MW-251-ODLB-14	L17041200-45	17M0273123	04/28/17 19:17	01
MW-250-ODLB-14	L17041200-46	17M0273124	04/28/17 19:37	01
DUP-9	L17041200-47	17M0273125	04/28/17 19:57	01
MW-158-ODLB-14	L17041200-48	17M0273126	04/28/17 20:17	01
MW-158A-ODLB-14	L17041200-49	17M0273127	04/28/17 20:47	01

Report Name: BLANK_SUMMARY
PDF File ID: 5268570
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041200
Work Group: WG611922
Blank File ID: 6M146800
Blank Sample ID: WG611922-01
Prep Date: 04/28/17 07:54
Instrument ID: HPMS6
Analyzed Date: 04/28/17 07:54
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611922-02	6M146801	04/28/17 08:25	01
LCS	WG611922-03	6M146802	04/28/17 08:57	01
MW-246-ODLB-14	L17041200-50	6M146806	04/28/17 11:00	01
DUP-8	L17041200-51	6M146807	04/28/17 11:30	01
MW-237-ODLB-14	L17041200-52	6M146808	04/28/17 12:02	01
MW-166-ODLB-14	L17041200-53	6M146809	04/28/17 12:32	01
MW-166A-ODLB-14	L17041200-54	6M146810	04/28/17 13:03	01
MW-151-ODLB-14	L17041200-55	6M146811	04/28/17 13:34	01
MW-247-ODLB-14	L17041200-56	6M146812	04/28/17 14:03	01
MW-165A-ODLB-14	L17041200-59	6M146813	04/28/17 14:33	01
MW-247-ODLB-14	L17041200-57	6M146814	04/28/17 15:04	01
MW-247-ODLB-14	L17041200-58	6M146816	04/28/17 15:35	01

Report Name: BLANK_SUMMARY
PDF File ID: 5268570
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041200
Work Group: WG611929
Blank File ID: 8M419226
Blank Sample ID: WG611929-01
Prep Date: 04/28/17 09:02
Instrument ID: HPMS8
Analyzed Date: 04/28/17 09:02
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG611929-02	8M419227	04/28/17 09:33	01
LCS2	WG611929-03	8M419228	04/28/17 10:02	01
MW-222-ODLB-14	L17041200-16	8M419230	04/28/17 11:03	01
DUP-7	L17041200-17	8M419231	04/28/17 11:32	01
MW-224-ODLB-14	L17041200-18	8M419232	04/28/17 12:03	01
MW-134-ODLB-14	L17041200-19	8M419233	04/28/17 12:33	01
MW-187-ODLB-14	L17041200-20	8M419234	04/28/17 13:03	01
DUP-6	L17041200-21	8M419235	04/28/17 13:33	01
MW-13-ODLB-14	L17041200-22	8M419236	04/28/17 14:02	01
MW-04-ODLB-14	L17041200-23	8M419237	04/28/17 14:32	01
MW-221-ODLB-14	L17041200-24	8M419238	04/28/17 15:02	01
MW-180-ODLB-14	L17041200-25	8M419239	04/28/17 15:32	01
MW-03-ODLB-14	L17041200-26	8M419240	04/28/17 16:02	01
MW-220-ODLB-14	L17041200-27	8M419241	04/28/17 16:32	01
MW-07-ODLB-14	L17041200-28	8M419242	04/28/17 17:02	01
MW-230-ODLB-14	L17041200-29	8M419243	04/28/17 17:31	01
MW-31-ODLB-14	L17041200-30	8M419244	04/28/17 18:01	01
MW-147-ODLB-14	L17041200-31	8M419245	04/28/17 18:31	01
MW-148-ODLB-14	L17041200-32	8M419246	04/28/17 19:01	01
MW-241-ODLB-14	L17041200-33	8M419247	04/28/17 19:31	01

Report Name: BLANK_SUMMARY
PDF File ID: 5268570
Report generated 05/02/2017 16:41

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 08:26 Sample ID:WG611925-01
Instrument ID:HPMS11 Run Date:04/28/17 08:26 Prep Method:5030B/5030C/503
File ID:11M17830 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611925 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 08:26 Sample ID:WG611925-01
Instrument ID:HPMS11 Run Date:04/28/17 08:26 Prep Method:5030B/5030C/503
File ID:11M17830 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611925 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268563
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.1	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268563
25-JUL-2017 14:42

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 13:01 Sample ID:WG612030-01
Instrument ID:HPMS17 Run Date:04/28/17 13:01 Prep Method:5030B/5030C/503
File ID:17M0273106 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612030 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 13:01 Sample ID:WG612030-01
Instrument ID:HPMS17 Run Date:04/28/17 13:01 Prep Method:5030B/5030C/503
File ID:17M0273106 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612030 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	108	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041200 Prep Date: 04/28/17 07:54 Sample ID: WG611922-01
Instrument ID: HPMS6 Run Date: 04/28/17 07:54 Prep Method: 5030B/5030C/503
File ID: 6M146800 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041200 Prep Date: 04/28/17 07:54 Sample ID: WG611922-01
Instrument ID: HPMS6 Run Date: 04/28/17 07:54 Prep Method: 5030B/5030C/503
File ID: 6M146800 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	110	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	109	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 09:02 Sample ID:WG611929-01
Instrument ID:HPMS8 Run Date:04/28/17 09:02 Prep Method:5030B/5030C/503
File ID:8M419226 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611929 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041200 Prep Date:04/28/17 09:02 Sample ID:WG611929-01
Instrument ID:HPMS8 Run Date:04/28/17 09:02 Prep Method:5030B/5030C/503
File ID:8M419226 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611929 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS8-17-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268563
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Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611925-02
Instrument ID: HPMS11 Run Time: 08:56 Prep Method: 5030B/5030C/503
File ID: 11M17831 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611925 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.3	96.6	81 - 129	
1,1,1-Trichloroethane	20.0	21.6	108	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.2	101	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.5	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	20.7	103	68 - 130	
1,1-Dichloropropene	20.0	21.0	105	73 - 132	
1,2,3-Trichlorobenzene	20.0	21.2	106	67 - 137	
1,2,3-Trichloropropane	20.0	20.0	100	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.9	109	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.0	105	74 - 132	
1,2-Dichloroethane	20.0	20.3	102	69 - 132	
1,2-Dichlorobenzene	20.0	21.0	105	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.8	98.9	50 - 132	
1,2-Dichloropropane	20.0	20.1	100	75 - 125	
1,2-Dibromoethane	20.0	20.2	101	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.0	105	74 - 131	
1,3-Dichlorobenzene	20.0	20.5	103	75 - 124	
1,3-Dichloropropane	20.0	20.8	104	73 - 126	
1,4-Dichlorobenzene	20.0	19.6	97.8	74 - 123	
1-Chlorohexane	20.0	22.0	110	70 - 125	
2,2-Dichloropropane	20.0	20.0	100	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.7	93.5	73 - 126	
4-Chlorotoluene	20.0	20.3	101	74 - 128	
Acetone	20.0	18.7	93.6	40 - 135	
Benzene	20.0	20.7	103	81 - 122	
Bromobenzene	20.0	20.0	99.9	76 - 124	
Bromochloromethane	20.0	20.5	103	65 - 129	
Bromodichloromethane	20.0	19.9	99.5	76 - 121	
Bromoform	20.0	18.6	93.1	69 - 128	
Bromomethane	20.0	21.3	107	30 - 141	
Carbon disulfide	20.0	14.7	73.4	58 - 128	
Carbon tetrachloride	20.0	21.5	108	66 - 138	
Chlorobenzene	20.0	20.2	101	81 - 122	
Chloroethane	20.0	23.1	116	58 - 133	
Chloroform	20.0	21.4	107	69 - 128	
Chloromethane	20.0	19.8	99.0	56 - 131	
cis-1,2-Dichloroethene	20.0	20.4	102	72 - 126	
cis-1,3-Dichloropropene	20.0	21.7	109	69 - 131	
Dibromochloromethane	20.0	19.5	97.7	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5268564
Report generated: 07/25/2017 14:42

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611925-02
Instrument ID: HPMS11 Run Time: 08:56 Prep Method: 5030B/5030C/503
File ID: 11M17831 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611925 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	25.2	126	30 - 153	
Ethylbenzene	20.0	21.1	106	73 - 127	
Hexachlorobutadiene	20.0	20.3	101	67 - 131	
Isopropylbenzene	20.0	21.2	106	75 - 127	
Methylene chloride	20.0	19.5	97.6	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.9	99.3	65 - 123	
MEK (2-Butanone)	20.0	20.2	101	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.5	97.4	58 - 134	
n-Butylbenzene	20.0	22.1	111	69 - 137	
n-Propylbenzene	20.0	20.2	101	72 - 129	
m-,p-Xylene	40.0	42.5	106	76 - 128	
Naphthalene	20.0	22.2	111	54 - 138	
o-Xylene	20.0	20.7	104	80 - 121	
p-Isopropyltoluene	20.0	21.8	109	73 - 130	
sec-Butylbenzene	20.0	20.3	102	72 - 127	
Styrene	20.0	22.9	115	65 - 134	
Trichloroethene	20.0	20.0	100	70 - 127	
tert-Butylbenzene	20.0	20.0	100	70 - 129	
Tetrachloroethene	20.0	21.4	107	66 - 128	
Toluene	20.0	20.2	101	77 - 122	
trans-1,2-Dichloroethene	20.0	19.8	98.8	63 - 137	
trans-1,3-Dichloropropene	20.0	20.7	103	59 - 135	
Trichlorofluoromethane	20.0	22.0	110	57 - 129	
Vinyl chloride	20.0	20.9	104	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	106	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Login Number: L17041200 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.6	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.0	90.2	63 - 128	
1,1,2-Trichloroethane	20.0	18.7	93.3	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.6	98.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.5	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.3	107	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.9	69 - 132	
1,2-Dichlorobenzene	20.0	19.8	98.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.4	50 - 132	
1,2-Dichloropropane	20.0	19.5	97.6	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	103	74 - 131	
1,3-Dichlorobenzene	20.0	20.1	100	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	17.0	85.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.5	92.4	73 - 126	
4-Chlorotoluene	20.0	19.7	98.7	74 - 128	
Acetone	20.0	18.9	94.6	40 - 135	
Benzene	20.0	19.5	97.6	81 - 122	
Bromobenzene	20.0	19.5	97.6	76 - 124	
Bromochloromethane	20.0	19.3	96.3	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	18.2	90.8	69 - 128	
Bromomethane	20.0	20.2	101	30 - 141	
Carbon disulfide	20.0	14.2	70.8	58 - 128	
Carbon tetrachloride	20.0	20.4	102	66 - 138	
Chlorobenzene	20.0	19.5	97.3	81 - 122	
Chloroethane	20.0	21.8	109	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	17.8	89.0	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.6	103	69 - 131	
Dibromochloromethane	20.0	19.3	96.7	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041200 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.9	99.6	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	20.1	100	73 - 127	
Hexachlorobutadiene	20.0	19.1	95.7	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	18.7	93.3	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.0	94.9	65 - 123	
MEK (2-Butanone)	20.0	19.3	96.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.6	58 - 134	
n-Butylbenzene	20.0	21.4	107	69 - 137	
n-Propylbenzene	20.0	19.6	97.9	72 - 129	
m-,p-Xylene	40.0	40.6	102	76 - 128	
Naphthalene	20.0	21.2	106	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	19.5	97.3	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	19.0	95.1	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	20.4	102	66 - 128	
Toluene	20.0	19.2	96.1	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	20.7	103	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268564
Report generated: 07/25/2017 14:42

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612030-02
Instrument ID: HPMS17 Run Time: 13:21 Prep Method: 5030B/5030C/503
File ID: 17M0273107 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612030 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.5	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.3	96.5	75 - 125	
1,1-Dichloroethane	20.0	20.1	101	69 - 133	
1,1-Dichloroethene	20.0	20.0	100	68 - 130	
1,1-Dichloropropene	20.0	19.9	99.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.7	93.4	67 - 137	
1,2,3-Trichloropropane	20.0	19.2	95.9	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	94.1	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.0	100	74 - 132	
1,2-Dichloroethane	20.0	19.4	97.1	69 - 132	
1,2-Dichlorobenzene	20.0	19.3	96.3	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.6	98.2	50 - 132	
1,2-Dichloropropane	20.0	19.6	97.9	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.6	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.8	99.2	74 - 131	
1,3-Dichlorobenzene	20.0	19.2	95.9	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	19.0	94.8	74 - 123	
1-Chlorohexane	20.0	20.8	104	70 - 125	
2,2-Dichloropropane	20.0	21.2	106	69 - 137	
2-Hexanone	20.0	19.0	95.1	55 - 130	
2-Chlorotoluene	20.0	19.3	96.5	73 - 126	
4-Chlorotoluene	20.0	20.0	100	74 - 128	
Acetone	20.0	15.3	76.7	40 - 135	
Benzene	20.0	19.6	98.2	81 - 122	
Bromobenzene	20.0	18.9	94.6	76 - 124	
Bromochloromethane	20.0	20.1	101	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	19.3	96.3	69 - 128	
Bromomethane	20.0	17.3	86.3	30 - 141	
Carbon disulfide	20.0	16.4	82.2	58 - 128	
Carbon tetrachloride	20.0	20.2	101	66 - 138	
Chlorobenzene	20.0	19.1	95.5	81 - 122	
Chloroethane	20.0	20.9	105	58 - 133	
Chloroform	20.0	20.1	100	69 - 128	
Chloromethane	20.0	20.6	103	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	19.1	95.3	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5268564
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Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612030-02
Instrument ID: HPMS17 Run Time: 13:21 Prep Method: 5030B/5030C/503
File ID: 17M0273107 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612030 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.8	99.0	76 - 125	
Dichlorodifluoromethane	20.0	26.0	130	30 - 153	
Ethylbenzene	20.0	19.7	98.4	73 - 127	
Hexachlorobutadiene	20.0	18.9	94.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.4	75 - 127	
Methylene chloride	20.0	19.0	95.2	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.4	96.9	65 - 123	
MEK (2-Butanone)	20.0	17.0	85.2	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.8	94.1	58 - 134	
n-Butylbenzene	20.0	20.6	103	69 - 137	
n-Propylbenzene	20.0	19.9	99.5	72 - 129	
m-,p-Xylene	40.0	39.5	98.8	76 - 128	
Naphthalene	20.0	18.5	92.3	54 - 138	
o-Xylene	20.0	19.4	96.9	80 - 121	
p-Isopropyltoluene	20.0	20.2	101	73 - 130	
sec-Butylbenzene	20.0	20.0	99.8	72 - 127	
Styrene	20.0	19.9	99.7	65 - 134	
Trichloroethene	20.0	18.3	91.7	70 - 127	
tert-Butylbenzene	20.0	19.6	98.1	70 - 129	
Tetrachloroethene	20.0	19.6	97.8	66 - 128	
Toluene	20.0	19.9	99.3	77 - 122	
trans-1,2-Dichloroethene	20.0	19.3	96.7	63 - 137	
trans-1,3-Dichloropropene	20.0	19.8	99.0	59 - 135	
Trichlorofluoromethane	20.0	21.6	108	57 - 129	
Vinyl chloride	20.0	23.6	118	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	104	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number:L17041200 Run Date:04/28/2017 Sample ID:WG611922-02
Instrument ID:HPMS6 Run Time:08:25 Prep Method:5030B/5030C/503
File ID:6M146801 Analyst:TMB Method:8260B
Workgroup (AAB#):WG611922 Matrix:Water Units:ug/L
QC Key:AF40 Lot#:STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.6	93.1	81 - 129	
1,1,1-Trichloroethane	20.0	19.9	99.7	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.2	106	63 - 128	
1,1,2-Trichloroethane	20.0	19.7	98.7	75 - 125	
1,1-Dichloroethane	20.0	20.7	104	69 - 133	
1,1-Dichloroethene	20.0	20.1	101	68 - 130	
1,1-Dichloropropene	20.0	19.7	98.4	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.7	88.7	67 - 137	
1,2,3-Trichloropropane	20.0	20.6	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.4	92.2	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.8	99.2	74 - 132	
1,2-Dichloroethane	20.0	21.0	105	69 - 132	
1,2-Dichlorobenzene	20.0	18.5	92.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.9	104	50 - 132	
1,2-Dichloropropane	20.0	20.4	102	75 - 125	
1,2-Dibromoethane	20.0	19.4	97.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.6	97.9	74 - 131	
1,3-Dichlorobenzene	20.0	18.4	92.2	75 - 124	
1,3-Dichloropropane	20.0	21.3	107	73 - 126	
1,4-Dichlorobenzene	20.0	18.4	92.2	74 - 123	
1-Chlorohexane	20.0	20.0	100	70 - 125	
2,2-Dichloropropane	20.0	22.3	111	69 - 137	
2-Hexanone	20.0	24.2	121	55 - 130	
2-Chlorotoluene	20.0	19.9	99.7	73 - 126	
4-Chlorotoluene	20.0	19.4	97.0	74 - 128	
Acetone	20.0	21.3	107	40 - 135	
Benzene	20.0	19.5	97.3	81 - 122	
Bromobenzene	20.0	18.5	92.7	76 - 124	
Bromochloromethane	20.0	20.8	104	65 - 129	
Bromodichloromethane	20.0	19.6	98.2	76 - 121	
Bromoform	20.0	18.5	92.3	69 - 128	
Bromomethane	20.0	15.0	75.1	30 - 141	
Carbon disulfide	20.0	14.5	72.7	58 - 128	
Carbon tetrachloride	20.0	20.3	102	66 - 138	
Chlorobenzene	20.0	18.7	93.5	81 - 122	
Chloroethane	20.0	22.1	110	58 - 133	
Chloroform	20.0	18.7	93.5	69 - 128	
Chloromethane	20.0	21.5	107	56 - 131	
cis-1,2-Dichloroethene	20.0	19.2	96.0	72 - 126	
cis-1,3-Dichloropropene	20.0	21.9	109	69 - 131	
Dibromochloromethane	20.0	18.8	94.0	66 - 133	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611922-02
Instrument ID: HPMS6 Run Time: 08:25 Prep Method: 5030B/5030C/503
File ID: 6M146801 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG611922 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81634 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	20.4	102	76 - 125	
Dichlorodifluoromethane	20.0	22.5	112	30 - 153	
Ethylbenzene	20.0	18.9	94.7	73 - 127	
Hexachlorobutadiene	20.0	17.3	86.4	67 - 131	
Isopropylbenzene	20.0	19.1	95.6	75 - 127	
Methylene chloride	20.0	19.3	96.5	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.6	103	65 - 123	
MEK (2-Butanone)	20.0	22.7	113	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	22.0	110	58 - 134	
n-Butylbenzene	20.0	20.2	101	69 - 137	
n-Propylbenzene	20.0	19.5	97.4	72 - 129	
m-,p-Xylene	40.0	38.2	95.6	76 - 128	
Naphthalene	20.0	19.5	97.6	54 - 138	
o-Xylene	20.0	19.3	96.6	80 - 121	
p-Isopropyltoluene	20.0	19.5	97.3	73 - 130	
sec-Butylbenzene	20.0	19.3	96.7	72 - 127	
Styrene	20.0	19.8	99.0	65 - 134	
Trichloroethene	20.0	17.2	85.9	70 - 127	
tert-Butylbenzene	20.0	18.8	93.8	70 - 129	
Tetrachloroethene	20.0	18.5	92.4	66 - 128	
Toluene	20.0	19.5	97.7	77 - 122	
trans-1,2-Dichloroethene	20.0	19.0	95.1	63 - 137	
trans-1,3-Dichloropropene	20.0	21.6	108	59 - 135	
Trichlorofluoromethane	20.0	19.7	98.4	57 - 129	
Vinyl chloride	20.0	20.2	101	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	104	85 - 115	PASS
1,2-Dichloroethane-d4	110	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268564
Report generated: 07/25/2017 14:42

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number:L17041200 Analyst:TMB Prep Method:5030B/5030C/503
Instrument ID:HPMS8 Matrix:Water Method:8260B
Workgroup (AAB#):WG611929 Units:ug/L
QC Key:AF40 Lot #:STD81634

Sample ID:WG611929-02 LCS File ID:8M419227 Run Date:04/28/2017 09:33
Sample ID:WG611929-03 LCS2 File ID:8M419228 Run Date:04/28/2017 10:02

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	19.6	97.9	20.0	19.3	96.4	1.55	81 - 129	20	
1,1,1-Trichloroethane	20.0	21.6	108	20.0	21.2	106	1.64	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	19.4	97.2	20.0	19.6	97.8	0.592	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.0	94.8	20.0	19.6	97.8	3.07	75 - 125	20	
1,1-Dichloroethane	20.0	21.2	106	20.0	20.7	103	2.59	69 - 133	20	
1,1-Dichloroethene	20.0	20.9	105	20.0	20.4	102	2.78	68 - 130	20	
1,1-Dichloropropene	20.0	20.7	104	20.0	20.2	101	2.67	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.5	92.7	20.0	18.3	91.7	1.17	67 - 137	20	
1,2,3-Trichloropropane	20.0	20.1	101	20.0	19.5	97.3	3.44	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	18.7	93.7	20.0	18.5	92.3	1.52	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.7	103	20.0	20.0	99.8	3.42	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	17.9	89.3	20.0	17.6	88.2	1.26	50 - 132	20	
1,2-Dibromoethane	20.0	19.8	98.9	20.0	19.9	99.7	0.781	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.4	97.0	20.0	18.8	93.9	3.31	71 - 122	20	
1,2-Dichloroethane	20.0	20.7	104	20.0	20.5	102	1.02	69 - 132	20	
1,2-Dichloropropane	20.0	20.7	103	20.0	20.1	101	2.64	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	20.2	101	20.0	19.6	97.8	3.44	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.2	96.1	20.0	18.6	93.0	3.33	75 - 124	20	
1,3-Dichloropropane	20.0	20.5	102	20.0	20.5	102	0.120	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.0	95.1	20.0	18.3	91.6	3.81	74 - 123	20	
1-Chlorohexane	20.0	21.6	108	20.0	21.5	107	0.832	70 - 125	20	
2,2-Dichloropropane	20.0	21.0	105	20.0	21.0	105	0.234	69 - 137	20	
MEK (2-Butanone)	20.0	20.3	101	20.0	20.1	101	0.708	49 - 136	20	
2-Chlorotoluene	20.0	18.2	91.0	20.0	18.3	91.6	0.601	73 - 126	20	
2-Hexanone	20.0	19.4	97.2	20.0	20.6	103	5.74	55 - 130	20	
4-Chlorotoluene	20.0	21.1	105	20.0	19.6	97.8	7.54	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.6	97.9	20.0	19.8	99.1	1.19	58 - 134	20	
Acetone	20.0	19.3	96.5	20.0	20.4	102	5.28	40 - 135	20	
Benzene	20.0	21.0	105	20.0	20.5	102	2.68	81 - 122	20	
Bromobenzene	20.0	19.0	95.1	20.0	18.9	94.3	0.859	76 - 124	20	
Bromochloromethane	20.0	20.6	103	20.0	20.7	104	0.647	65 - 129	20	
Bromodichloromethane	20.0	20.2	101	20.0	20.1	101	0.304	76 - 121	20	
Bromoform	20.0	16.6	82.9	20.0	16.4	82.0	1.08	69 - 128	20	
Bromomethane	20.0	21.5	108	20.0	22.7	113	5.13	30 - 141	20	
Carbon disulfide	20.0	16.3	81.3	20.0	16.0	80.0	1.65	58 - 128	20	
Carbon tetrachloride	20.0	21.7	108	20.0	21.1	105	2.81	66 - 138	20	
Chlorobenzene	20.0	19.2	95.8	20.0	18.7	93.7	2.19	81 - 122	20	
Chloroethane	20.0	23.9	119	20.0	23.2	116	3.07	58 - 133	20	
Chloroform	20.0	19.5	97.6	20.0	19.2	96.0	1.64	69 - 128	20	
Chloromethane	20.0	22.6	113	20.0	22.0	110	2.60	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041200 Analyst: TMB Prep Method: 5030B/5030C/503
Instrument ID: HPMS8 Matrix: Water Method: 8260B
Workgroup (AAB#): WG611929 Units: ug/L
QC Key: AF40 Lot #: STD81634

Sample ID: WG611929-02 LCS File ID: 8M419227 Run Date: 04/28/2017 09:33
Sample ID: WG611929-03 LCS2 File ID: 8M419228 Run Date: 04/28/2017 10:02

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	20.7	103	20.0	20.2	101	2.23	72 - 126	20	
cis-1,3-Dichloropropene	20.0	22.1	111	20.0	21.7	108	1.99	69 - 131	20	
Dibromochloromethane	20.0	19.5	97.5	20.0	19.5	97.4	0.117	66 - 133	20	
Dibromomethane	20.0	20.9	104	20.0	21.0	105	0.626	76 - 125	20	
Dichlorodifluoromethane	20.0	24.5	122	20.0	24.0	120	1.75	30 - 153	20	
Ethylbenzene	20.0	19.7	98.3	20.0	19.0	94.8	3.62	73 - 127	20	
Hexachlorobutadiene	20.0	18.1	90.6	20.0	17.8	88.8	2.07	67 - 131	20	
Isopropylbenzene	20.0	20.6	103	20.0	20.1	101	2.28	75 - 127	20	
m-,p-Xylene	40.0	41.5	104	40.0	40.0	99.9	3.65	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.4	97.0	20.0	20.0	99.9	2.92	65 - 123	20	
Methylene chloride	20.0	20.2	101	20.0	19.7	98.6	2.32	63 - 137	20	
n-Butylbenzene	20.0	21.3	106	20.0	20.2	101	4.93	69 - 137	20	
n-Propylbenzene	20.0	20.4	102	20.0	19.7	98.3	3.96	72 - 129	20	
Naphthalene	20.0	19.0	95.2	20.0	19.4	97.0	1.84	54 - 138	20	
o-Xylene	20.0	19.7	98.5	20.0	19.0	95.1	3.50	80 - 121	20	
p-Isopropyltoluene	20.0	20.7	103	20.0	19.8	98.9	4.37	73 - 130	20	
sec-Butylbenzene	20.0	20.4	102	20.0	19.5	97.7	4.07	72 - 127	20	
Styrene	20.0	21.1	105	20.0	20.6	103	2.17	65 - 134	20	
tert-Butylbenzene	20.0	18.8	94.0	20.0	18.4	92.1	2.06	70 - 129	20	
Tetrachloroethene	20.0	20.2	101	20.0	20.1	101	0.361	66 - 128	20	
Toluene	20.0	20.9	104	20.0	20.3	102	2.64	77 - 122	20	
trans-1,2-Dichloroethene	20.0	20.9	105	20.0	20.5	102	2.09	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.7	98.3	20.0	19.5	97.3	0.965	59 - 135	20	
Trichloroethene	20.0	20.0	100	20.0	19.4	96.9	3.27	70 - 127	20	
Trichlorofluoromethane	20.0	21.5	107	20.0	21.1	106	1.60	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	22.2	111	4.56	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	103	104	72 - 119	PASS
Dibromofluoromethane	103	102	85 - 115	PASS
4-Bromofluorobenzene	101	101	76 - 119	PASS
Toluene-d8	105	106	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041200 Cal ID: HPMS6- 05-APR-17 Worknum: WG611922

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041200-56 File ID: 6M146812 Dil: 1 Method: 5035A

Sample ID: L17041200-57 MS File ID: 6M146814 Dil: 1 Matrix: 8260B

Sample ID: L17041200-58 MSD File ID: 6M146816 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.1	90.6	20.0	18.6	92.9	2.53	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.3	96.7	20.0	19.5	97.6	0.909	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.206	20.0	19.4	96.2	20.0	21.7	108	11.1	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.3	96.7	20.0	19.8	98.9	2.25	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.9	99.5	20.0	20.8	104	4.17	69 - 133	20	
1,1-Dichloroethene	U	20.0	19.8	99.1	20.0	19.9	99.6	0.495	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.2	96.1	20.0	19.4	96.9	0.865	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	16.5	82.6	20.0	17.0	84.8	2.60	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	95.9	20.0	20.9	105	8.77	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	17.3	86.4	20.0	17.5	87.5	1.30	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.6	98.2	20.0	19.8	99.2	1.02	74 - 132	20	
1,2-Dibromo-3-chloropropane	U	20.0	18.0	89.8	20.0	19.8	99.1	9.88	50 - 132	20	
1,2-Dibromoethane	U	20.0	18.2	91.1	20.0	19.4	97	6.27	80 - 121	20	
1,2-Dichlorobenzene	U	20.0	18.1	90.4	20.0	18.4	92.1	1.91	71 - 122	20	
1,2-Dichloroethane	U	20.0	20.4	102	20.0	20.9	105	2.53	69 - 132	20	
1,2-Dichloropropane	U	20.0	20.7	103	20.0	21.0	105	1.54	75 - 125	20	
1,3,5-Trimethylbenzene	U	20.0	19.3	96.5	20.0	19.4	97.1	0.666	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.1	90.7	20.0	18.3	91.6	0.975	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.5	102	20.0	21.3	107	4.11	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.1	90.7	20.0	18.5	92.7	2.17	74 - 123	20	
1,4-Dioxane	U	200	208	104	200	226	113	8.38	60 - 140	20	
1-Chlorohexane	U	20.0	18.9	94.7	20.0	19.2	96	1.31	70 - 125	20	
2,2-Dichloropropane	U	20.0	8.65	43.2	20.0	13.7	68.5	45.2	69 - 137	20	*#
MEK (2-Butanone)	U	20.0	20.2	101	20.0	22.8	114	11.9	49 - 136	20	
2-Chlorotoluene	U	20.0	18.7	93.7	20.0	19.8	99.2	5.73	73 - 126	20	
2-Hexanone	U	20.0	22.0	110	20.0	24.2	121	9.43	55 - 130	20	
4-Chlorotoluene	U	20.0	20.4	102	20.0	19.8	99	2.97	74 - 128	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.3	96.5	20.0	22.1	111	13.6	58 - 134	20	
Acetone	9.07	20.0	29.9	104	20.0	31.5	112	5.05	40 - 135	20	
Benzene	U	20.0	19.4	97	20.0	19.6	98.1	1.14	81 - 122	20	
Bromobenzene	U	20.0	18.3	91.5	20.0	19.0	95	3.81	76 - 124	20	
Bromochloromethane	U	20.0	19.6	98	20.0	19.7	98.5	0.553	65 - 129	20	
Bromodichloromethane	U	20.0	19.5	97.5	20.0	19.9	99.6	2.13	76 - 121	20	
Bromoform	U	20.0	17.2	86.2	20.0	17.9	89.5	3.74	69 - 128	20	
Bromomethane	U	20.0	14.3	71.6	20.0	16.7	83.4	15.2	30 - 141	20	
Carbon disulfide	U	20.0	14.1	70.6	20.0	14.1	70.7	0.0585	58 - 128	20	
Carbon tetrachloride	U	20.0	17.5	87.7	20.0	18.8	94.2	7.24	66 - 138	20	
Chlorobenzene	U	20.0	18.6	93.1	20.0	18.5	92.4	0.779	81 - 122	20	
Chloroethane	U	20.0	21.7	109	20.0	21.3	106	2.19	58 - 133	20	
Chloroform	0.308	20.0	18.7	92.2	20.0	19.1	94	1.89	69 - 128	20	
Chloromethane	U	20.0	21.0	105	20.0	20.5	102	2.42	56 - 131	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041200 Cal ID: HPMS6 05-APR-17 Worknum: WG611922

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041200-56 File ID: 6M146812 Dil: 1 Method: 5035A

Sample ID: L17041200-57 MS File ID: 6M146814 Dil: 1 Matrix: 8260B

Sample ID: L17041200-58 MSD File ID: 6M146816 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
cis-1,2-Dichloroethene	0.448	20.0	19.3	94.5	20.0	19.7	96.2	1.74	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	19.4	97.1	20.0	21.1	106	8.40	69 - 131	20	
Dibromochloromethane	U	20.0	18.2	91.2	20.0	19.0	94.8	3.91	66 - 133	20	
Dibromomethane	U	20.0	19.3	96.6	20.0	20.5	102	5.67	76 - 125	20	
Dichlorodifluoromethane	U	20.0	19.3	96.5	20.0	18.6	93	3.65	30 - 153	20	
Ethylbenzene	U	20.0	18.5	92.7	20.0	18.7	93.7	1.01	73 - 127	20	
Hexachlorobutadiene	U	20.0	16.6	82.9	20.0	16.0	80.1	3.44	67 - 131	20	
Isopropylbenzene	U	20.0	18.7	93.7	20.0	18.7	93.6	0.118	75 - 127	20	
m-,p-Xylene	U	40.0	37.8	94.5	40.0	37.7	94.2	0.315	76 - 128	20	
Methylene chloride	U	20.0	19.6	98.2	20.0	19.4	97	1.29	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	18.7	93.5	20.0	20.6	103	9.71	65 - 123	20	
n-Butylbenzene	U	20.0	19.5	97.5	20.0	19.7	98.3	0.792	69 - 137	20	
n-Propylbenzene	U	20.0	19.0	95.1	20.0	19.5	97.5	2.50	72 - 129	20	
Naphthalene	U	20.0	17.8	89.1	20.0	18.7	93.5	4.82	54 - 138	20	
o-Xylene	U	20.0	19.2	96.1	20.0	19.1	95.3	0.853	80 - 121	20	
p-Isopropyltoluene	U	20.0	18.9	94.4	20.0	19.1	95.3	0.986	73 - 130	20	
sec-Butylbenzene	U	20.0	18.8	94.1	20.0	19.0	95	1.00	72 - 127	20	
Styrene	U	20.0	19.6	98.2	20.0	19.4	97.1	1.19	65 - 134	20	
tert-Butylbenzene	U	20.0	18.6	92.9	20.0	18.7	93.3	0.436	70 - 129	20	
Tetrachloroethene	U	20.0	18.0	89.8	20.0	18.2	90.9	1.25	66 - 128	20	
Toluene	U	20.0	19.5	97.3	20.0	19.4	97.2	0.0946	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.6	93	20.0	19.1	95.6	2.67	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	17.9	89.5	20.0	20.0	99.8	10.9	59 - 135	20	
Trichloroethene	0.666	20.0	17.9	85.9	20.0	17.9	86.3	0.425	70 - 127	20	
Trichlorofluoromethane	U	20.0	17.5	87.7	20.0	17.7	88.5	0.876	57 - 129	20	
Vinyl chloride	U	20.0	19.6	98.2	20.0	18.7	93.3	5.09	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041200 Cal ID: HPMS11- 24-APR-17 Worknum: WG611925

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041200-11 File ID: 11M17837 Dil: 1 Method: 5035A

Sample ID: L17041200-12 MS File ID: 11M17832 Dil: 1 Matrix: 8260B

Sample ID: L17041200-13 MSD File ID: 11M17833 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.1	95.3	20.0	18.7	93.6	1.74	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.5	103	20.0	20.2	101	1.75	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.0	99.9	20.0	20.3	101	1.40	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.8	93.8	20.0	19.2	96.2	2.49	75 - 125	20	
1,1-Dichloroethane	U	20.0	19.4	97.1	20.0	19.1	95.7	1.55	69 - 133	20	
1,1-Dichloroethene	U	20.0	19.2	96.2	20.0	18.5	92.3	4.20	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.5	97.4	20.0	19.2	95.8	1.71	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.1	106	20.0	21.0	105	0.602	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	95.8	20.0	19.8	98.8	3.13	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	22.2	111	20.0	22.1	110	0.398	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	21.1	105	20.0	20.6	103	2.34	74 - 132	20	
1,2-Dibromo-3-chloropropane	U	20.0	19.3	96.3	20.0	20.5	103	6.34	50 - 132	20	
1,2-Dibromoethane	U	20.0	19.1	95.5	20.0	19.5	97.5	2.07	80 - 121	20	
1,2-Dichlorobenzene	U	20.0	20.7	104	20.0	20.3	101	2.02	71 - 122	20	
1,2-Dichloroethane	U	20.0	19.6	97.9	20.0	19.7	98.4	0.595	69 - 132	20	
1,2-Dichloropropane	U	20.0	19.1	95.4	20.0	19.1	95.6	0.208	75 - 125	20	
1,3,5-Trimethylbenzene	U	20.0	21.2	106	20.0	20.7	103	2.37	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.7	104	20.0	20.3	102	1.82	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.2	101	20.0	19.8	99.1	1.85	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.8	99.1	20.0	19.1	95.6	3.52	74 - 123	20	
1,4-Dioxane	U	200	192	95.8	200	198	99.1	3.39	60 - 140	20	
1-Chlorohexane	U	20.0	21.1	106	20.0	20.0	100	5.37	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.5	103	20.0	19.6	98.2	4.37	69 - 137	20	
MEK (2-Butanone)	U	20.0	20.0	100	20.0	20.1	100	0.0813	49 - 136	20	
2-Chlorotoluene	U	20.0	18.6	93.2	20.0	18.2	91	2.32	73 - 126	20	
2-Hexanone	U	20.0	21.3	106	20.0	21.4	107	0.427	55 - 130	20	
4-Chlorotoluene	U	20.0	20.3	101	20.0	19.8	98.8	2.55	74 - 128	20	
MIBK (methyl isobutyl ketone)	U	20.0	18.8	93.9	20.0	18.7	93.5	0.399	58 - 134	20	
Acetone	8.82	20.0	26.7	89.5	20.0	27.7	94.5	3.70	40 - 135	20	
Benzene	U	20.0	19.4	97	20.0	19.4	97.1	0.100	81 - 122	20	
Bromobenzene	U	20.0	20.4	102	20.0	20.1	101	1.58	76 - 124	20	
Bromochloromethane	U	20.0	19.7	98.5	20.0	19.5	97.6	0.831	65 - 129	20	
Bromodichloromethane	U	20.0	19.0	94.9	20.0	19.2	96	1.21	76 - 121	20	
Bromoform	U	20.0	17.8	88.9	20.0	18.1	90.4	1.64	69 - 128	20	
Bromomethane	U	20.0	19.8	98.8	20.0	19.3	96.4	2.46	30 - 141	20	
Carbon disulfide	U	20.0	14.3	71.5	20.0	13.8	69.1	3.47	58 - 128	20	
Carbon tetrachloride	U	20.0	20.3	102	20.0	19.9	99.3	2.37	66 - 138	20	
Chlorobenzene	U	20.0	19.4	97	20.0	19.2	96.2	0.814	81 - 122	20	
Chloroethane	U	20.0	21.4	107	20.0	20.9	104	2.29	58 - 133	20	
Chloroform	U	20.0	20.8	104	20.0	20.8	104	0.237	69 - 128	20	
Chloromethane	U	20.0	24.4	122	20.0	19.6	98.1	21.9	56 - 131	20	#

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041200 Cal ID: HPMS11 24-APR-17 Worknum: WG611925

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041200-11 File ID: 11M17837 Dil: 1 Method: 5035A

Sample ID: L17041200-12 MS File ID: 11M17832 Dil: 1 Matrix: 8260B

Sample ID: L17041200-13 MSD File ID: 11M17833 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
cis-1,2-Dichloroethene	U	20.0	19.4	96.9	20.0	19.2	96.1	0.796	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	21.1	105	20.0	21.0	105	0.197	69 - 131	20	
Dibromochloromethane	U	20.0	19.4	97.1	20.0	19.1	95.7	1.48	66 - 133	20	
Dibromomethane	U	20.0	19.8	98.8	20.0	20.0	99.8	0.912	76 - 125	20	
Dichlorodifluoromethane	U	20.0	23.3	116	20.0	22.5	112	3.50	30 - 153	20	
Ethylbenzene	U	20.0	20.6	103	20.0	19.9	99.7	2.97	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.5	103	20.0	19.8	99.2	3.49	67 - 131	20	
Isopropylbenzene	U	20.0	20.6	103	20.0	19.7	98.7	4.14	75 - 127	20	
m-,p-Xylene	U	40.0	40.9	102	40.0	39.4	98.6	3.57	76 - 128	20	
Methylene chloride	U	20.0	18.6	92.8	20.0	18.7	93.5	0.761	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.4	96.8	20.0	19.5	97.4	0.600	65 - 123	20	
n-Butylbenzene	U	20.0	22.1	110	20.0	21.6	108	2.03	69 - 137	20	
n-Propylbenzene	U	20.0	20.2	101	20.0	19.4	96.8	4.46	72 - 129	20	
Naphthalene	U	20.0	22.2	111	20.0	22.4	112	1.03	54 - 138	20	
o-Xylene	U	20.0	20.3	101	20.0	19.8	99.1	2.27	80 - 121	20	
p-Isopropyltoluene	U	20.0	22.0	110	20.0	21.2	106	3.69	73 - 130	20	
sec-Butylbenzene	U	20.0	20.1	101	20.0	19.4	96.9	3.80	72 - 127	20	
Styrene	U	20.0	22.2	111	20.0	21.8	109	1.65	65 - 134	20	
tert-Butylbenzene	U	20.0	19.6	98.1	20.0	18.9	94.7	3.44	70 - 129	20	
Tetrachloroethene	0.516	20.0	20.9	102	20.0	20.2	98.6	3.15	66 - 128	20	
Toluene	U	20.0	19.2	95.9	20.0	18.9	94.4	1.56	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	18.6	93.2	20.0	18.6	93.1	0.191	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.8	98.8	20.0	19.9	99.6	0.750	59 - 135	20	
Trichloroethene	U	20.0	18.9	94.7	20.0	18.5	92.4	2.52	70 - 127	20	
Trichlorofluoromethane	U	20.0	20.6	103	20.0	19.5	97.3	5.69	57 - 129	20	
Vinyl chloride	U	20.0	21.9	110	20.0	19.6	98.1	11.0	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5268565

Report generated 05/02/2017 16:41

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS11
Analyst: FJB
Workgroup: WG609769

Tune ID: WG609769-01
Run Date: 04/11/2017
Run Time: 17:59
File ID: 11M17454
Cal ID: HPMS11 - 11-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.4	6289	PASS
75.0	95.0	30.0	60.0	45.9	14147	PASS
95.0	95.0	100	100	100	30826	PASS
96.0	95.0	5.00	9.00	7.42	2288	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	86.3	26595	PASS
175	174	5.00	9.00	7.08	1884	PASS
176	174	95.0	101	98.2	26124	PASS
177	176	5.00	9.00	6.96	1818	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609769-02	STD	01	04/11/2017 18:52	
WG609769-03	STD	01	04/11/2017 19:20	
WG609769-04	STD	01	04/11/2017 19:50	
WG609769-05	STD-CCV	01	04/11/2017 20:20	
WG609769-06	STD	01	04/11/2017 20:49	
WG609769-07	STD	01	04/11/2017 21:18	
WG609769-08	STD	01	04/11/2017 21:47	
WG609769-09	STD	01	04/11/2017 22:17	
WG609769-10	SSCV	01	04/11/2017 23:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS11
Analyst: JDS
Workgroup: WG611320

Tune ID: WG611320-01
Run Date: 04/24/2017
Run Time: 16:08
File ID: 11M17705
Cal ID: HPMS11 - 24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.2	9137	PASS
75.0	95.0	30.0	60.0	46.5	20047	PASS
95.0	95.0	100	100	100	43125	PASS
96.0	95.0	5.00	9.00	6.77	2920	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	85.4	36834	PASS
175	174	5.00	9.00	8.08	2976	PASS
176	174	95.0	101	95.7	35256	PASS
177	176	5.00	9.00	6.83	2409	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611320-02	STD	01	04/24/2017 17:01	
WG611320-03	STD	01	04/24/2017 17:30	
WG611320-04	STD	01	04/24/2017 17:59	
WG611320-05	STD	01	04/24/2017 18:29	
WG611320-06	STD	01	04/24/2017 18:58	
WG611320-07	STD	01	04/24/2017 19:27	
WG611320-08	STD-CCV	01	04/24/2017 19:57	
WG611320-09	STD	01	04/24/2017 20:27	
WG611320-10	STD	01	04/24/2017 20:56	
WG611320-11	STD	01	04/24/2017 21:26	
WG611320-12	SSCV	01	04/24/2017 22:26	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS11
Analyst: TMB
Workgroup: WG611924

Tune ID: WG611924-01
Run Date: 04/28/2017
Run Time: 06:28
File ID: 11M17826
Cal ID: HPMS11 - 24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	23.6	5959	PASS
75.0	95.0	30.0	60.0	47.8	12082	PASS
95.0	95.0	100	100	100	25282	PASS
96.0	95.0	5.00	9.00	7.10	1795	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	87.7	22162	PASS
175	174	5.00	9.00	7.60	1685	PASS
176	174	95.0	101	101	22366	PASS
177	176	5.00	9.00	6.79	1519	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611924-02	CCV	01	04/28/2017 07:26	
WG611925-01	BLANK	01	04/28/2017 08:26	
WG611925-02	LCS	01	04/28/2017 08:56	
L17041200-12	MW-225-ODLB-14	01	04/28/2017 09:25	
L17041200-13	MW-225-ODLB-14	01	04/28/2017 09:55	
L17041200-11	MW-225-ODLB-14	01	04/28/2017 11:52	
L17041200-10	MW-176-ODLB-14	01	04/28/2017 12:22	
L17041200-09	MW-87-ODLB-14	01	04/28/2017 12:51	
L17041200-08	MW-06-ODLB-14	01	04/28/2017 13:20	
L17041200-07	DUP-3	01	04/28/2017 13:49	
L17041200-06	MW-91-ODLB-14	01	04/28/2017 14:18	
L17041200-05	MW-15-ODLB-14	01	04/28/2017 14:47	
L17041200-04	MW-174-ODLB-14	01	04/28/2017 15:16	
L17041200-03	MW-228-ODLB-14	01	04/28/2017 15:46	
L17041200-02	MW-227-ODLB-14	01	04/28/2017 16:15	
L17041200-14	MW-223-ODLB-14	01	04/28/2017 17:16	
L17041200-15	MW-226-ODLB-14	01	04/28/2017 17:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS11
Analyst: JDS
Workgroup: WG612020

Tune ID: WG612020-01
Run Date: 04/28/2017
Run Time: 18:59
File ID: 11M17850
Cal ID: HPMS11-24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.4	5941	PASS
75.0	95.0	30.0	60.0	46.9	12448	PASS
95.0	95.0	100	100	100	26525	PASS
96.0	95.0	5.00	9.00	6.59	1749	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	86.1	22825	PASS
175	174	5.00	9.00	7.47	1705	PASS
176	174	95.0	101	98.9	22577	PASS
177	176	5.00	9.00	6.69	1511	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612020-02	CCV	01	04/28/2017 19:23	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS11
Analyst: TMB
Workgroup: WG612121

Tune ID: WG612121-01
Run Date: 04/29/2017
Run Time: 17:57
File ID: 11M17867
Cal ID: HPMS11-24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.6	4932	PASS
75.0	95.0	30.0	60.0	47.7	10389	PASS
95.0	95.0	100	100	100	21797	PASS
96.0	95.0	5.00	9.00	7.06	1539	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	87.4	19054	PASS
175	174	5.00	9.00	7.62	1451	PASS
176	174	95.0	101	97.9	18648	PASS
177	176	5.00	9.00	5.91	1102	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612121-02	CCV	01	04/29/2017 18:53	
WG612123-01	BLANK	01	04/29/2017 19:55	
WG612123-02	LCS	01	04/29/2017 20:24	
L17041200-01	MW-57-ODLB-14	01	04/30/2017 00:17	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS17
Analyst: FJB
Workgroup: WG611454

Tune ID: WG611454-01
Run Date: 04/25/2017
Run Time: 20:07
File ID: 17M0273002
Cal ID: HPMS17 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	4824	PASS
75.0	95.0	30.0	60.0	48.1	14022	PASS
95.0	95.0	100	100	100	29152	PASS
96.0	95.0	5.00	9.00	6.70	1953	PASS
173	174	0	2.00	0.808	223	PASS
174	95.0	50.0	100	94.7	27600	PASS
175	174	5.00	9.00	7.26	2004	PASS
176	174	95.0	101	98.5	27192	PASS
177	176	5.00	9.00	6.67	1814	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611454-02	STD	01	04/25/2017 20:45	
WG611454-03	STD	01	04/25/2017 21:05	
WG611454-04	STD	01	04/25/2017 21:24	
WG611454-05	STD	01	04/25/2017 21:56	
WG611454-06	STD	01	04/25/2017 22:15	
WG611454-07	STD	01	04/25/2017 22:46	
WG611454-08	STD-CCV	01	04/25/2017 23:06	
WG611454-09	STD	01	04/25/2017 23:38	
WG611454-10	STD	01	04/25/2017 23:58	
WG611454-11	STD	01	04/26/2017 00:33	
WG611454-12	SSCV	01	04/26/2017 01:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Report generated 05/02/2017 16:42

BFB

Login Number: L17041200
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612029

Tune ID: WG612029-01
Run Date: 04/28/2017
Run Time: 12:01
File ID: 17M0273103
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.8	6101	PASS
75.0	95.0	30.0	60.0	47.7	17307	PASS
95.0	95.0	100	100	100	36315	PASS
96.0	95.0	5.00	9.00	6.51	2365	PASS
173	174	0	2.00	0.931	322	PASS
174	95.0	50.0	100	95.2	34571	PASS
175	174	5.00	9.00	7.23	2501	PASS
176	174	95.0	101	95.6	33064	PASS
177	176	5.00	9.00	6.38	2111	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612029-02	CCV	01	04/28/2017 12:19	
WG612030-01	BLANK	01	04/28/2017 13:01	
WG612030-02	LCS	01	04/28/2017 13:21	
L17041200-34	MW-160-ODLB-14	01	04/28/2017 15:13	
L17041200-35	MW-242-ODLB-14	01	04/28/2017 15:33	
L17041200-36	MW-150-ODLB-14	01	04/28/2017 16:03	
L17041200-37	DUP-4	01	04/28/2017 16:23	
L17041200-38	MW-54-ODLB-14	01	04/28/2017 16:43	
L17041200-39	MW-155-ODLB-14	01	04/28/2017 17:10	
L17041200-40	MW-243-ODLB-14	01	04/28/2017 17:30	
L17041200-41	MW-245-ODLB-14	01	04/28/2017 17:50	
L17041200-42	MW-159-ODLB-14	01	04/28/2017 18:09	
L17041200-43	MW-149-ODLB-14	01	04/28/2017 18:29	
L17041200-44	MW-244-ODLB-14	01	04/28/2017 18:49	
L17041200-45	MW-251-ODLB-14	01	04/28/2017 19:17	
L17041200-46	MW-250-ODLB-14	01	04/28/2017 19:37	
L17041200-47	DUP-9	01	04/28/2017 19:57	
L17041200-48	MW-158-ODLB-14	01	04/28/2017 20:17	
L17041200-49	MW-158A-ODLB-14	01	04/28/2017 20:47	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS6
Analyst: TMB
Workgroup: WG598323

Tune ID: WG598323-01
Run Date: 01/12/2017
Run Time: 08:36
File ID: 6M144707
Cal ID: HPMS6-12-JAN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.2	7923	PASS
75.0	95.0	30.0	60.0	54.8	22651	PASS
95.0	95.0	100	100	100	41304	PASS
96.0	95.0	5.00	9.00	7.28	3007	PASS
173	174	0	2.00	0.352	116	PASS
174	95.0	50.0	100	79.8	32963	PASS
175	174	5.00	9.00	8.22	2709	PASS
176	174	95.0	101	97.3	32071	PASS
177	176	5.00	9.00	6.69	2147	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG598323-02	STD	01	01/12/2017 09:02	
WG598323-03	STD	01	01/12/2017 09:37	
WG598323-04	STD	01	01/12/2017 10:10	
WG598323-05	STD-CCV	01	01/12/2017 10:42	
WG598323-06	STD	01	01/12/2017 11:14	
WG598323-07	STD	01	01/12/2017 11:47	
WG598323-08	STD	01	01/12/2017 12:19	
WG598323-09	STD	01	01/12/2017 12:52	
WG598323-10	SSCV	01	01/12/2017 13:56	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS6
Analyst: TMB
Workgroup: WG608938

Tune ID: WG608938-01
Run Date: 04/05/2017
Run Time: 16:29
File ID: 6M146221
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.3	4043	PASS
75.0	95.0	30.0	60.0	46.5	10875	PASS
95.0	95.0	100	100	100	23389	PASS
96.0	95.0	5.00	9.00	7.16	1674	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.5	17883	PASS
175	174	5.00	9.00	7.58	1356	PASS
176	174	95.0	101	96.1	17186	PASS
177	176	5.00	9.00	7.35	1263	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-02	STD	01	04/05/2017 17:25	
WG608938-03	STD	01	04/05/2017 17:57	
WG608938-04	STD	01	04/05/2017 18:28	
WG608938-05	STD	01	04/05/2017 19:00	
WG608938-06	STD	01	04/05/2017 19:31	
WG608938-07	STD	01	04/05/2017 20:02	
WG608938-08	STD-CCV	01	04/05/2017 20:34	
WG608938-09	STD	01	04/05/2017 21:06	
WG608938-10	STD	01	04/05/2017 21:37	
WG608938-11	STD	01	04/05/2017 22:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS6
Analyst: TMB
Workgroup: WG609128

Tune ID: WG609128-01
Run Date: 04/06/2017
Run Time: 13:59
File ID: 6M146236
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	6056	PASS
75.0	95.0	30.0	60.0	47.8	16465	PASS
95.0	95.0	100	100	100	34464	PASS
96.0	95.0	5.00	9.00	7.14	2460	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	26498	PASS
175	174	5.00	9.00	7.37	1953	PASS
176	174	95.0	101	98.9	26205	PASS
177	176	5.00	9.00	6.88	1804	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-12	SSCV	01	04/06/2017 15:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS6
Analyst: TMB
Workgroup: WG611920

Tune ID: WG611920-01
Run Date: 04/28/2017
Run Time: 06:27
File ID: 6M146797
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.9	5780	PASS
75.0	95.0	30.0	60.0	49.3	15935	PASS
95.0	95.0	100	100	100	32354	PASS
96.0	95.0	5.00	9.00	6.78	2194	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	69.1	22363	PASS
175	174	5.00	9.00	7.22	1614	PASS
176	174	95.0	101	97.3	21763	PASS
177	176	5.00	9.00	7.25	1577	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611920-02	CCV	01	04/28/2017 06:52	
WG611923-01	CCV	01	04/28/2017 07:23	
WG611922-01	BLANK	01	04/28/2017 07:54	
WG611922-02	LCS	01	04/28/2017 08:25	
L17041200-50	MW-246-ODLB-14	01	04/28/2017 11:00	
L17041200-51	DUP-8	01	04/28/2017 11:30	
L17041200-52	MW-237-ODLB-14	01	04/28/2017 12:02	
L17041200-53	MW-166-ODLB-14	01	04/28/2017 12:32	
L17041200-54	MW-166A-ODLB-14	01	04/28/2017 13:03	
L17041200-55	MW-151-ODLB-14	01	04/28/2017 13:34	
L17041200-56	MW-247-ODLB-14	01	04/28/2017 14:03	
L17041200-59	MW-165A-ODLB-14	01	04/28/2017 14:33	
L17041200-57	MW-247-ODLB-14	01	04/28/2017 15:04	
L17041200-58	MW-247-ODLB-14	01	04/28/2017 15:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS6
Analyst: JDS
Workgroup: WG612082

Tune ID: WG612082-01
Run Date: 04/28/2017
Run Time: 18:32
File ID: 6M146820
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.7	6497	PASS
75.0	95.0	30.0	60.0	49.8	17276	PASS
95.0	95.0	100	100	100	34696	PASS
96.0	95.0	5.00	9.00	7.04	2444	PASS
173	174	0	2.00	0.506	121	PASS
174	95.0	50.0	100	68.9	23908	PASS
175	174	5.00	9.00	7.43	1777	PASS
176	174	95.0	101	98.5	23552	PASS
177	176	5.00	9.00	6.99	1647	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612082-02	CCV	01	04/28/2017 19:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

BFB

Login Number: L17041200
Instrument: HPMS8
Analyst: TMB
Workgroup: WG609829

Tune ID: WG609829-01
Run Date: 04/12/2017
Run Time: 10:17
File ID: 8M418914
Cal ID: HPMS8-12-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.0	6807	PASS
75.0	95.0	30.0	60.0	45.8	20724	PASS
95.0	95.0	100	100	100	45280	PASS
96.0	95.0	5.00	9.00	6.80	3077	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	94.7	42898	PASS
175	174	5.00	9.00	8.05	3453	PASS
176	174	95.0	101	100	42994	PASS
177	176	5.00	9.00	6.69	2876	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609829-02	STD	01	04/12/2017 11:11	
WG609829-03	STD	01	04/12/2017 11:40	
WG609829-04	STD	01	04/12/2017 12:10	
WG609829-05	STD-CCV	01	04/12/2017 12:41	
WG609829-06	STD	01	04/12/2017 13:10	
WG609829-07	STD	01	04/12/2017 13:40	
WG609829-08	STD	01	04/12/2017 14:10	
WG609829-09	STD	01	04/12/2017 14:39	
WG609829-10	SSCV	01	04/12/2017 16:10	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS8
Analyst: TMB
Workgroup: WG610410

Tune ID: WG610410-01
Run Date: 04/17/2017
Run Time: 12:58
File ID: 8M419000
Cal ID: HPMS8 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.1	8216	PASS
75.0	95.0	30.0	60.0	47.8	21655	PASS
95.0	95.0	100	100	100	45349	PASS
96.0	95.0	5.00	9.00	6.40	2901	PASS
173	174	0	2.00	0.273	110	PASS
174	95.0	50.0	100	89.0	40349	PASS
175	174	5.00	9.00	7.54	3042	PASS
176	174	95.0	101	99.8	40256	PASS
177	176	5.00	9.00	6.96	2800	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG610410-02	STD	01	04/17/2017 13:51	
WG610410-03	STD	01	04/17/2017 14:25	
WG610410-04	STD	01	04/17/2017 14:55	
WG610410-05	STD	01	04/17/2017 15:25	
WG610410-06	STD	01	04/17/2017 15:54	
WG610410-07	STD	01	04/17/2017 16:24	
WG610410-08	STD-CCV	01	04/17/2017 16:54	
WG610410-09	STD	01	04/17/2017 17:23	
WG610410-10	STD	01	04/17/2017 17:54	
WG610410-11	STD	01	04/17/2017 18:24	
WG610410-12	SSCV	01	04/17/2017 19:53	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041200
Instrument: HPMS8
Analyst: TMB
Workgroup: WG611928

Tune ID: WG611928-01
Run Date: 04/28/2017
Run Time: 07:37
File ID: 8M419223
Cal ID: HPMS8-17-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.1	6392	PASS
75.0	95.0	30.0	60.0	47.4	16752	PASS
95.0	95.0	100	100	100	35314	PASS
96.0	95.0	5.00	9.00	6.73	2375	PASS
173	174	0	2.00	0.364	107	PASS
174	95.0	50.0	100	83.2	29365	PASS
175	174	5.00	9.00	7.57	2222	PASS
176	174	95.0	101	98.3	28858	PASS
177	176	5.00	9.00	6.29	1815	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611928-02	CCV	01	04/28/2017 08:01	
WG611929-01	BLANK	01	04/28/2017 09:02	
WG611929-02	LCS	01	04/28/2017 09:33	
WG611929-03	LCS2	01	04/28/2017 10:02	
L17041200-16	MW-222-ODLB-14	01	04/28/2017 11:03	
L17041200-17	DUP-7	01	04/28/2017 11:32	
L17041200-18	MW-224-ODLB-14	01	04/28/2017 12:03	
L17041200-19	MW-134-ODLB-14	01	04/28/2017 12:33	
L17041200-20	MW-187-ODLB-14	01	04/28/2017 13:03	
L17041200-21	DUP-6	01	04/28/2017 13:33	
L17041200-22	MW-13-ODLB-14	01	04/28/2017 14:02	
L17041200-23	MW-04-ODLB-14	01	04/28/2017 14:32	
L17041200-24	MW-221-ODLB-14	01	04/28/2017 15:02	
L17041200-25	MW-180-ODLB-14	01	04/28/2017 15:32	
L17041200-26	MW-03-ODLB-14	01	04/28/2017 16:02	
L17041200-27	MW-220-ODLB-14	01	04/28/2017 16:32	
L17041200-28	MW-07-ODLB-14	01	04/28/2017 17:02	
L17041200-29	MW-230-ODLB-14	01	04/28/2017 17:31	
L17041200-30	MW-31-ODLB-14	01	04/28/2017 18:01	
L17041200-31	MW-147-ODLB-14	01	04/28/2017 18:31	
L17041200-32	MW-148-ODLB-14	01	04/28/2017 19:01	
L17041200-33	MW-241-ODLB-14	01	04/28/2017 19:31	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268567
Report generated 05/02/2017 16:42

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Calibration: Fri Apr 21 13:34:21 2017
Curve: WG609769
Calibration Files

	Compound	5 11M17456.D	20 11M17457.D	50 11M17458.D	100 11M17459.D	200 11M17460.D	300 11M17461.D	400 11M17462.D	500 11M17463.D	Avg	%RSD	R^2 Linear	R^2 Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile		0.040	0.041	0.040	0.043	0.044	0.044	0.043	0.042	4.036		
T	3-Chloro-1-propene	0.535	0.558	0.577	0.545	0.518	0.476	0.416	0.391	0.502	13.493		
T	2-Chloro-1,3-butadiene	0.424	0.462	0.493	0.468	0.458	0.429	0.381	0.363	0.435	10.276		
T	Methacrylonitrile	0.182	0.207	0.216	0.208	0.213	0.208	0.193	0.186	0.202	6.342		
T	Isobutyl Alcohol		0.013	0.014	0.013	0.015	0.016	0.016	0.016	0.014	9.665		
T	1-Butanol				0.005	0.007	0.008	0.008	0.008	0.007	17.196	0.999	
T	Cyclohexanone			0.008	0.008	0.010	0.012	0.012	0.012	0.010	17.429	0.995	
T	2-Nitropropane			0.069	0.071	0.078	0.081	0.078	0.078	0.076	5.966		
T	Ethyl Acetate	0.255	0.278	0.298	0.283	0.286	0.277	0.253	0.241	0.271	7.209		
T	Methyl methacrylate	0.217	0.250	0.274	0.268	0.272	0.260	0.235	0.224	0.250	8.833		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Apr 21 13:35:57 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Calibration: Tue Apr 25 12:03:16 2017
Curve: WG611320
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
		11M17707.D	11M17708.D	11M17709.D	11M17710.D	11M17711.D	11M17712.D	11M17713.D	11M17714.D	11M17715.D	11M17716.D				
	Compound											Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.225	0.241	0.259	0.343	0.345	0.341	0.307	0.289	0.294	16.393	0.995	
P	Chloromethane			0.495	0.414	0.324	0.377	0.232	0.332	0.304	0.287	0.346	23.621	0.991	
C	Vinyl Chloride		0.242	0.181	0.208	0.205	0.220	0.225	0.222	0.213		0.215	8.319		
T	1,3-Butadiene				0.174	0.159	0.117	0.136	0.108	0.102	0.095	0.127	23.629		0.999
T	Bromomethane			0.239	0.253	0.227	0.209	0.201	0.212	0.209		0.222	8.464		
T	Chloroethane			0.189	0.219	0.215	0.235	0.234	0.236	0.227		0.222	7.585		
T	Trichlorofluoromethane		0.321	0.333	0.366	0.380	0.398	0.401	0.412	0.387		0.375	8.718		
T	Diethyl ether			0.262	0.296	0.291	0.287	0.277	0.271		0.258	0.277	5.316		
T	Isoprene		0.325	0.336	0.361	0.390	0.406	0.433	0.443	0.414		0.388	11.286		
T	Acrolein			0.038	0.043	0.046	0.046	0.045	0.047		0.044	0.044	6.542		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.178	0.210	0.221	0.233	0.234	0.242	0.235		0.222	9.849		
T	Acetone				0.084	0.082	0.087	0.081	0.085	0.085	0.082	0.084	2.520		
C	1,1-Dichloroethene		0.472	0.398	0.434	0.440	0.458	0.470	0.468	0.432		0.446	5.694		
T	Tert-Butyl Alcohol			0.027	0.031	0.032	0.032	0.030	0.031		0.036	0.031	8.078		
T	Dimethyl Sulfide		0.358	0.301	0.361	0.353	0.370	0.363	0.362	0.338		0.351	6.285		
T	Iodomethane				0.123	0.199	0.299	0.331	0.332	0.316	0.299	0.271	29.385	0.998	
T	Methyl acetate				0.259	0.265	0.274	0.265	0.266	0.252		0.264	2.746		
T	Methylene Chloride		0.342	0.277	0.304	0.291	0.297	0.298	0.295	0.279		0.298	6.766		
T	Carbon Disulfide			0.793	0.758	0.774	0.787	0.805	0.770	0.656		0.763	6.538		
T	Acrylonitrile			0.104	0.121	0.121	0.127	0.126	0.128		0.136	0.123	8.087		
T	Methyl Tert Butyl Ether		0.685	0.707	0.776	0.774	0.784	0.782	0.759	0.701		0.746	5.501		
T	trans-1,2-Dichloroethene		0.297	0.266	0.257	0.264	0.276	0.274	0.278	0.262		0.272	4.677		
T	n-Hexane				0.347	0.401	0.418	0.458	0.466	0.438		0.421	10.370		
T	Diisopropyl ether			1.126	1.244	1.208	1.159	1.088	0.954		0.827	1.086	13.603		
T	Vinyl Acetate				0.536	0.487	0.505	0.520	0.563	0.492	0.447	0.507	7.407		
P	1,1-Dichloroethane		0.594	0.561	0.582	0.585	0.589	0.584	0.572	0.514		0.573	4.533		
T	Ethyl-Tert-Butyl ether			0.975	1.085	1.052	1.021	0.960	0.863		0.767	0.960	11.616		
T	2-Butanone				0.126	0.134	0.143	0.138	0.139	0.138	0.138	0.137	3.758		
T	Propionitrile			0.040	0.046	0.046	0.047	0.046	0.047		0.048	0.046	6.042		
T	2,2-Dichloropropane		0.459	0.375	0.385	0.384	0.387	0.381	0.378	0.352		0.388	7.945		
T	cis-1,2-Dichloroethene		0.334	0.249	0.303	0.304	0.317	0.318	0.316	0.298		0.305	8.359		
C	Chloroform	0.665	0.682	0.517	0.510	0.488	0.493	0.482	0.476	0.431		0.527	16.402	0.997	
T	1-Bromopropane			0.027	0.056	0.052	0.058	0.061	0.062	0.061	0.061	0.055	21.722	1.000	
T	Bromochloromethane		0.173	0.179	0.182	0.187	0.195	0.196	0.196	0.189	0.185	0.187	4.391		
T	Tetrahydrofuran			0.146	0.112	0.108	0.108	0.103	0.101		0.100	0.111	14.263		
S	Dibromofluoromethane					0.257	0.229	0.252	0.259	0.242		0.248	4.980		
T	1,1,1-Trichloroethane		0.394	0.361	0.391	0.404	0.424	0.433	0.438	0.408	0.383	0.404	6.212		
T	Cyclohexane		0.585	0.510	0.544	0.580	0.594	0.618	0.610	0.554	0.515	0.568	6.920		
T	1,1-Dichloropropene		0.344	0.338	0.342	0.358	0.369	0.372	0.382	0.349	0.330	0.354	4.923		
T	Carbon Tetrachloride		0.316	0.304	0.313	0.355	0.374	0.380	0.388	0.366	0.346	0.349	8.985		
T	Tert-Amyl-Methyl ether			0.768	0.866	0.838	0.818	0.777	0.710		0.645	0.775	9.920		
S	1,2-Dichloroethane-d4					0.301	0.268	0.294	0.296	0.277		0.287	4.837		
T	1,2-Dichloroethane		0.409	0.397	0.397	0.403	0.416	0.406	0.397	0.361	0.332	0.391	6.899		
T	Benzene		1.312	1.116	1.145	1.151	1.142	1.088	1.000	0.817		1.096	12.984		
T	Trichloroethene		0.335	0.257	0.270	0.285	0.298	0.298	0.297	0.281	0.265	0.287	8.100		
T	Methylcyclohexane		0.413	0.366	0.433	0.447	0.458	0.486	0.488	0.449	0.426	0.441	8.533		
C	1,2-Dichloropropane		0.370	0.341	0.343	0.335	0.344	0.352	0.351	0.327	0.309	0.341	4.980		
T	1,4-Dioxane					0.003	0.003	0.003	0.003		0.004	0.003	12.331		
T	Bromodichloromethane		0.381	0.322	0.344	0.346	0.369	0.379	0.376	0.354	0.333	0.356	6.019		
T	Dibromomethane		0.147	0.135	0.157	0.170	0.171	0.171	0.172	0.167	0.162	0.161	8.034		
T	2-Chloroethyl Vinyl Ether			0.168	0.160	0.168	0.198	0.200	0.204	0.198	0.196	0.186	9.586		
T	4-Methyl-2-Pentanone					0.099	0.124	0.118	0.124	0.127	0.128	0.120	9.057		
T	cis-1,3-Dichloropropene		0.417	0.396	0.403	0.427	0.460	0.463	0.452	0.408	0.374	0.422	7.288		
T	Dimethyl Disulfide					0.220	0.260	0.274	0.286	0.278		0.264	9.922		

I	Chlorobenzene-d5	ISTD											
S	Toluene-d8					1.412	1.270	1.362	1.305	1.142		1.298	7.909
C	Toluene		1.926	1.529	1.603	1.659	1.669	1.560	1.385			1.619	10.245
T	Ethyl Methacrylate			0.349	0.396	0.426	0.488	0.492	0.493	0.473	0.442	0.445	11.806
T	trans-1,3-Dichloropropene			0.442	0.476	0.532	0.563	0.571	0.546	0.503	0.455	0.511	9.689
T	1,1,2-Trichloroethane		0.333	0.328	0.331	0.359	0.369	0.352	0.347	0.335	0.317	0.341	4.855
T	2-Hexanone					0.269	0.291	0.289	0.286	0.289	0.279	0.284	3.043
T	1,3-Dichloropropane		0.565	0.585	0.597	0.600	0.610	0.593	0.564	0.519	0.470	0.567	8.020
T	Tetrachloroethene		0.299	0.263	0.310	0.330	0.344	0.349	0.347	0.334	0.316	0.321	8.642
T	Dibromochloromethane		0.307	0.325	0.361	0.386	0.409	0.420	0.423	0.408	0.386	0.381	10.945
T	1,2-Dibromoethane		0.275	0.268	0.311	0.312	0.325	0.326	0.322	0.320	0.304	0.307	7.007
T	1-Chlorohexane		0.445	0.355	0.419	0.460	0.482	0.518	0.524	0.490	0.457	0.461	11.299
P	Chlorobenzene		1.157	1.038	1.095	1.075	1.077	1.033	0.955	0.805		1.029	10.431
T	1,1,1,2-Tetrachloroethane		0.378	0.343	0.368	0.382	0.405	0.412	0.406	0.388	0.368	0.383	5.842
C	Ethylbenzene			0.492	0.524	0.571	0.588	0.588	0.578	0.532	0.483	0.544	7.832
T	m-,p-Xylene		0.719	0.649	0.671	0.697	0.698	0.670	0.610	0.495		0.651	10.950
T	o-Xylene		0.687	0.601	0.672	0.680	0.706	0.699	0.683	0.622	0.557	0.656	7.778
T	Styrene		0.901	0.859	0.948	1.030	1.135	1.132	1.072	0.903	0.773	0.973	13.004
P	Bromoform			0.222	0.213	0.242	0.285	0.295	0.304	0.315	0.305	0.273	14.879
T	Isopropylbenzene		1.842	1.560	1.650	1.704	1.753	1.647	1.478	1.173		1.601	12.852
I	1,4-Dichlorobenzene-d4	ISTD											
P	1,1,2,2-Tetrachloroethane		0.808	0.773	0.818	0.827	0.835	0.803	0.814	0.729	0.667	0.786	7.026
S	p-Bromofluorobenzene					0.890	0.798	0.908	0.908	0.840		0.869	5.541
T	1,2,3-Trichloropropane			0.185	0.209	0.238	0.253	0.236	0.234	0.227	0.219	0.225	9.257
T	trans-1,4-Dichloro-2-Butene			0.236	0.218	0.234	0.255	0.244	0.257	0.254	0.249	0.243	5.473
T	n-Propylbenzene		3.575	3.273	3.510	3.794	3.868	3.517	2.991			3.504	8.551
T	Bromobenzene	0.829	0.796	0.865	0.891	0.919	0.922	0.905	0.893	0.801	0.706	0.853	8.108
T	1,3,5-Trimethylbenzene		2.411	2.306	2.337	2.716	2.735	2.576	2.322	1.774		2.397	12.751
T	2-Chlorotoluene		2.679	2.417	2.352	2.522	2.434	2.234	2.016			2.379	8.890
T	4-Chlorotoluene		2.400	2.121	2.214	2.375	2.358	2.214	1.987	1.509		2.147	13.668
T	a-Methylstyrene					1.290	1.457	1.486	1.456	1.213	1.025	1.321	13.707
T	tert-Butylbenzene		0.608	0.565	0.561	0.572	0.633	0.611	0.616	0.562	0.516	0.583	6.319
T	1,2,4-Trimethylbenzene			2.433	2.666	2.833	2.840	2.639	2.359	1.780		2.507	14.712
T	sec-Butylbenzene			2.952	3.108	3.409	3.466	3.229	2.831			3.166	7.921
T	p-Isopropyltoluene			2.364	2.500	2.883	2.926	2.806	2.479	1.849		2.544	14.812
T	1,3-Dichlorobenzene		1.711	1.464	1.547	1.683	1.678	1.651	1.563	1.279	1.075	1.517	14.111
T	1,4-Dichlorobenzene		1.926	1.665	1.672	1.648	1.690	1.631	1.552	1.266		1.631	11.187
T	n-Butylbenzene			2.082	2.167	2.365	2.624	2.563	2.334	1.748		2.269	13.252
T	1,2-Dichlorobenzene	1.619	1.678	1.497	1.650	1.690	1.672	1.628	1.543	1.259	1.072	1.531	13.502
T	1,2-Dibromo-3-Chloropropane			0.097	0.124	0.136	0.141	0.146	0.150	0.150	0.159	0.138	14.080
T	1,2,4-Trichlorobenzene		1.009	0.969	1.058	1.142	1.234	1.251	1.225	1.068	0.934	1.099	10.858
T	Hexachlorobutadiene		0.499	0.481	0.533	0.569	0.622	0.632	0.675	0.630	0.605	0.583	11.387
T	Naphthalene		2.456	2.459	2.474	2.603	2.846	2.645	2.323	1.801		2.451	12.488
T	1,2,3-Trichlorobenzene	1.338	1.022	1.038	1.089	1.131	1.218	1.208	1.199	1.066	0.934	1.124	10.516

Thu Apr 27 12:49:03 2017

Response Factor Report HPMS17

Method Path : D:\MassHunter\GCMS\1\methods\
Method File : 826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017
Response Via : Initial Calibration
Curve: WG611454
Calibration Files
0.3 =17M0273004.D 0.4 =17M0273005.D 1 =17M0273006.D 2 =17M0273007.D 5 =17M0273008.D 20 =17M0273009.D
50 =17M0273010.D 100 =17M0273011.D 200 =17M0273012.D 300 =17M0273013.D

		Compound	0.3	0.4	1	2	5	20	50	100	200	300	Avg	%RSD	Linear	
1)	I	Fluorobenzene	----------	----------	ISTD	----------	----------	----------	----------	----------	----------	----------				
2)	T	Dichlorodifluo...			0.260	0.246	0.267	0.322	0.327	0.324	0.332		0.297	12.54		
3)	P	Chloromethane			0.289	0.283	0.279	0.292	0.288	0.306	0.297		0.291	3.11		
4)	C	Vinyl Chloride		0.334	0.306	0.292	0.311	0.331	0.329	0.335	0.334		0.322	5.07#		
5)	T	1,3-Butadiene			0.188	0.192	0.198	0.198	0.204	0.199	0.203		0.198	2.87		
6)	T	Bromomethane			0.262	0.263	0.258	0.240	0.222	0.218	0.212		0.239	9.17		
7)	T	Chloroethane			0.168	0.160	0.171	0.175	0.136	0.132	0.126		0.153	13.55		
8)	T	Trichlorofluor...		0.447	0.424	0.402	0.439	0.444	0.443	0.377	0.326		0.413	10.36		
9)	T	Diethyl ether			0.196	0.198	0.197	0.204	0.205	0.200		0.193	0.199	2.16		
10)	C	1,1-Dichloroet...		0.404	0.386	0.364	0.383	0.390	0.388	0.395	0.380		0.386	3.03#		
11)	T	Carbon Disulfide		0.890	0.818	0.756	0.827	0.821	0.852	0.833	0.834		0.829	4.51		
12)	T	1,1,2-Trichlor...		0.257	0.242	0.225	0.254	0.248	0.254	0.246	0.244		0.246	4.10		
13)	T	Iodomethane				0.121	0.187	0.272	0.364	0.380	0.394		0.286	39.36	0.996	
14)	T	Acrolein			0.024	0.023	0.025	0.025	0.026	0.025		0.024	0.025	4.79		
15)	T	Methylene Chlo...		0.339	0.301	0.285	0.291	0.285	0.280	0.286	0.277		0.293	6.85		
16)	T	Acetone					0.061	0.052	0.049	0.049	0.047	0.045	0.050	11.07		
17)	T	trans-1,2-Dich...		0.268	0.253	0.255	0.262	0.264	0.265	0.272	0.266		0.263	2.40		
18)	T	Methyl acetate		0.108	0.123	0.115	0.131	0.144	0.154	0.148			0.132	13.21		
19)	T	Methyl Tert Bu...		0.648	0.647	0.641	0.679	0.672	0.688	0.695	0.668		0.667	3.02		
20)	P	1,1-Dichloroet...		0.467	0.456	0.453	0.480	0.480	0.477	0.489	0.477		0.472	2.64		
21)	T	Acrylonitrile			0.060	0.062	0.064	0.065	0.067	0.066		0.065	0.064	3.92		
22)	T	Vinyl Acetate					0.040	0.040	0.045	0.041	0.045		0.042	5.97		
23)	T	cis-1,2-Dichlo...		0.300	0.282	0.289	0.302	0.297	0.299	0.308	0.303		0.298	2.74		
24)	T	2,2-Dichloropr...		0.198	0.267	0.290	0.328	0.352	0.378	0.381	0.374		0.321	20.34	1.000	
25)	T	Cyclohexane		0.391	0.387	0.372	0.406	0.398	0.421	0.412	0.427		0.402	4.54		
26)	T	Bromochloromet...			0.167	0.179	0.195	0.196	0.200	0.205	0.201		0.192	7.24		
27)	C	Chloroform	0.476	0.514	0.492	0.492	0.499	0.489	0.489	0.499	0.482		0.492	2.21#		
28)	T	Carbon Tetrach...		0.361	0.362	0.363	0.396	0.400	0.407	0.415	0.411		0.389	6.02		
29)	S	Dibromofluorom...					0.275	0.249	0.278	0.278	0.271		0.270	4.54		
30)	T	1,1,1-Trichlor...		0.429	0.422	0.414	0.435	0.440	0.438	0.448	0.437		0.433	2.51		
31)	T	1,1-Dichloropr...		0.347	0.327	0.312	0.336	0.340	0.352	0.352	0.352		0.340	4.22		
32)	T	2-Butanone					0.076	0.070	0.076	0.076	0.075	0.076	0.075	3.44		
33)	T	Benzene		1.142	1.045	1.024	1.062	1.054	1.058	1.085	1.050		1.065	3.34		
34)	S	1,2-Dichloroet...					0.270	0.237	0.260	0.255	0.243		0.253	5.23		
35)	T	1,2-Dichloroet...		0.343	0.317	0.322	0.341	0.332	0.333	0.336	0.328		0.332	2.70		
36)	T	Methylcyclohexane	0.445	0.432	0.414	0.377	0.420	0.401	0.438	0.416	0.444		0.421	5.28		
37)	T	Trichloroethene		0.341	0.312	0.307	0.316	0.316	0.318	0.327	0.321		0.320	3.24		

38)	T	Dibromomethane		0.152	0.152	0.157	0.169	0.164	0.168	0.172	0.170		0.163	5.00
39)	C	1,2-Dichloropr...		0.266	0.267	0.269	0.285	0.281	0.285	0.293	0.287		0.279	3.71#
40)	T	Bromodichlorom...		0.366	0.349	0.359	0.373	0.376	0.381	0.394	0.384		0.373	3.87
41)	T	1,4-Dioxane				0.001	0.001	0.001	0.001	0.002		0.002	0.001	14.84
42)	T	2-Chloroethyl ...					0.105	0.117	0.128	0.134	0.137	0.139	0.127	10.41
43)	T	cis-1,3-Dichlo...		0.377	0.382	0.390	0.424	0.429	0.445	0.456	0.457		0.420	7.82
44)	T	4-Methyl-2-Pen...					0.067	0.065	0.070	0.070	0.073	0.071	0.069	4.03
45)	T	trans-1,3-Dich...			0.304	0.322	0.360	0.366	0.379	0.384	0.385		0.357	8.95
46)	I	Chlorobenzene-d5	----------				ISTD							
47)	S	Toluene-d8					1.299	1.170	1.283	1.272	1.214		1.248	4.33
48)	C	Toluene		1.663	1.512	1.548	1.591	1.582	1.580	1.566	1.498		1.567	3.27#
49)	T	Tetrachloroethene		0.485	0.430	0.434	0.456	0.441	0.450	0.442	0.439		0.447	3.89
50)	T	1,1,2-Trichlor...		0.311	0.288	0.309	0.315	0.305	0.307	0.303	0.291		0.304	3.07
51)	T	Dibromochlorom...		0.416	0.367	0.402	0.421	0.423	0.432	0.434	0.423		0.415	5.22
52)	T	1,3-Dichloropr...		0.483	0.456	0.486	0.499	0.493	0.490	0.487	0.468		0.483	2.88
53)	T	1,2-Dibromoethane		0.321	0.294	0.307	0.317	0.312	0.319	0.314	0.305		0.311	2.90
54)	T	2-Hexanone				0.148	0.167	0.155	0.162	0.160	0.161	0.165	0.160	3.98
55)	P	Chlorobenzene		1.094	1.016	1.032	1.053	1.049	1.059	1.062	1.047		1.052	2.18
56)	T	1-Chlorohexane			0.079	0.083	0.085	0.082	0.090	0.086	0.090		0.085	4.55
57)	C	Ethylbenzene		0.559	0.502	0.540	0.551	0.549	0.559	0.558	0.562		0.547	3.65#
58)	T	1,1,1,2-Tetrac...		0.410	0.381	0.411	0.416	0.413	0.415	0.418	0.411		0.409	2.94
59)	T	m-,p-Xylene		0.674	0.615	0.631	0.668	0.663	0.683	0.683	0.669		0.661	3.73
60)	T	o-Xylene		0.641	0.608	0.642	0.657	0.652	0.667	0.667	0.673		0.651	3.22
61)	T	Styrene		0.997	0.921	0.974	1.039	1.066	1.104	1.114	1.118		1.042	6.95
62)	P	Bromoform		0.266	0.242	0.266	0.297	0.299	0.320	0.317	0.326		0.292	10.42
63)	T	Isopropylbenzene		1.730	1.595	1.609	1.721	1.707	1.728	1.702	1.688		1.685	3.16
64)	I	1,4-Dichlorobenzen...	----------				ISTD							
65)	T	1,3,5-Trimethy...		2.872	2.652	2.732	2.866	2.834	2.818	2.719	2.803		2.787	2.80
66)	S	p-Bromofluorob...					0.760	0.784	0.849	0.859	0.933		0.837	8.16
67)	T	Bromobenzene	1.037	1.017	0.926	0.992	0.982	0.980	0.965	0.942	1.010		0.983	3.63
68)	T	n-Propylbenzene		3.922	3.496	3.615	3.790	3.761	3.731	3.532	3.687		3.692	3.82
69)	P	1,1,2,2-Tetrac...		0.626	0.622	0.654	0.713	0.686	0.713	0.660	0.705		0.672	5.56
70)	T	2-Chlorotoluene		2.386	2.198	2.292	2.324	2.292	2.254	2.170	2.314		2.279	3.06
71)	T	1,2,3-Trichlor...			0.187	0.210	0.205	0.199	0.200	0.191	0.200		0.199	3.97
72)	T	trans-1,4-Dich...				0.117	0.137	0.162	0.163	0.151	0.160		0.148	12.16
73)	T	1,2,4-Trimethy...		2.943	2.640	2.798	2.903	2.859	2.845	2.747	2.748		2.810	3.47
74)	T	4-Chlorotoluene		2.343	2.198	2.273	2.309	2.286	2.278	2.179	2.332		2.275	2.59
75)	T	tert-Butylbenzene		0.586	0.535	0.564	0.572	0.558	0.549	0.530	0.561		0.557	3.32
76)	T	sec-Butylbenzene		3.659	3.288	3.403	3.563	3.490	3.493	3.283	3.287		3.433	4.13
77)	T	p-Isopropyltol...		3.074	2.747	2.850	3.010	3.003	3.034	2.869	2.827		2.927	4.03
78)	T	1,3-Dichlorobe...		1.858	1.620	1.702	1.733	1.715	1.724	1.659	1.703		1.714	4.03
79)	T	1,4-Dichlorobe...	1.966	1.849	1.636	1.697	1.726	1.676	1.707	1.646	1.674		1.731	6.25
80)	T	n-Butylbenzene		2.652	2.263	2.273	2.525	2.497	2.628	2.473	2.450		2.470	5.81
81)	T	1,2-Dichlorobe...	1.682	1.851	1.580	1.672	1.685	1.675	1.679	1.623	1.591		1.671	4.72
82)	T	1,2-Dibromo-3-...			0.106	0.124	0.124	0.125	0.133	0.131	0.121		0.123	6.94
83)	T	Hexachlorobuta...		0.813	0.679	0.669	0.716	0.682	0.733	0.684	0.658		0.704	7.14
84)	T	1,2,4-Trichlor...		1.286	1.140	1.150	1.242	1.250	1.332	1.289	1.240		1.241	5.39
85)	T	Naphthalene		2.524	2.180	2.327	2.511	2.473	2.606	2.480	2.261		2.420	6.08
86)	T	1,2,3-Trichlor...	1.286	1.267	1.117	1.171	1.220	1.198	1.264	1.182	1.145		1.206	4.84

(#) = Out of Range

826VMS.M Thu Apr 27 10:23:42 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water - IC: 011217 - HPMS6
Last Calibration: Thu Jan 12 13:53:06 2017
Curve: WG598323
Calibration Files

	Compound	5 6M144708.D	20 6M144709.D	50 6M144710.D	100 6M144711.D	200 6M144712.D	300 6M144713.D	400 6M144714.D	500 6M144715.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile	0.021	0.019	0.018	0.017	0.018	0.016	0.017	0.017	0.018	8.729
T	3-Chloro-1-propene	0.301	0.305	0.307	0.308	0.306	0.295	0.287	0.289	0.300	2.763
T	2-Chloro-1,3-butadiene	0.348	0.368	0.380	0.385	0.382	0.371	0.361	0.364	0.370	3.335
T	Ethyl Acetate	0.144	0.163	0.169	0.166	0.171	0.152	0.159	0.159	0.160	5.700
T	Methacrylonitrile	0.076	0.087	0.089	0.088	0.089	0.080	0.083	0.083	0.084	5.535
T	Isobutyl Alcohol	0.004	0.006	0.006	0.005	0.005	0.004	0.005	0.006	0.005	13.176
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.146	0.173	0.185	0.185	0.188	0.171	0.177	0.178	0.175	7.640
T	2-Nitropropane		0.063	0.071	0.071	0.076	0.070	0.075	0.074	0.071	6.228
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.008	0.009	0.008	0.010	0.009	0.011	0.012	0.009	14.808

Fri Jan 13 10:37:15 2017

Calibration Table Report
Method: 8260BWT.M
Title: 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Calibration: Thu Apr 06 09:55:03 2017
Curve: WG608938
Calibration Files

			0.3	0.4	1	2	5	20	50	100	200	300				
			6M146223.D	6M146224.D	6M146225.D	6M146226.D	6M146227.D	6M146228.D	6M146229.D	6M146230.D	6M146231.D	6M146232.D				
	Compound												Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD														
T	Dichlorodifluoromethane				0.381	0.345	0.365	0.434	0.430	0.411	0.412		0.397	8.516		
P	Chloromethane				0.725	0.639	0.561	0.528	0.467	0.463	0.448		0.547	18.885	0.999	
C	Vinyl Chloride			0.564	0.506	0.438	0.420	0.464	0.451	0.364	0.420		0.454	13.323		
T	1,3-Butadiene						0.220	0.212	0.176	0.135	0.148	0.118	0.168	24.710		0.990
T	Bromomethane				0.176	0.159	0.179	0.196	0.221	0.211	0.228		0.196	13.055		
T	Chloroethane				0.192	0.183	0.199	0.207	0.203	0.189	0.193		0.195	4.273		
T	Trichlorofluoromethane			0.432	0.460	0.431	0.458	0.479	0.482	0.482	0.492		0.465	5.013		
T	Diethyl ether				0.191	0.192	0.193	0.189	0.192	0.197		0.202	0.194	2.274		
T	Isoprene						0.366	0.355	0.386	0.387	0.385	0.414	0.382	5.221		
T	Acrolein					0.021	0.021	0.020	0.021	0.023		0.021	0.021	4.175		
T	1,1,2-Trichloro-1,2,2-Trifluoroet				0.269	0.247	0.261	0.264	0.264	0.265	0.271		0.263	2.932		
T	Acetone						0.057	0.058	0.055	0.053	0.056	0.045	0.054	8.929		
C	1,1-Dichloroethene			0.380	0.369	0.368	0.387	0.390	0.386	0.377	0.392		0.381	2.398		
T	Tert-Butyl Alcohol					0.017	0.018	0.016	0.014	0.018		0.017	0.017	8.130		
T	Dimethyl Sulfide						0.267	0.261	0.276	0.270	0.280	0.281	0.272	2.955		
T	Iodomethane				0.108	0.126	0.150	0.197	0.214	0.251	0.224	0.221	0.186	27.720	0.997	
T	Methyl acetate						0.129	0.125	0.134	0.140	0.141	0.143	0.135	5.216		
T	Methylene Chloride				0.311	0.287	0.287	0.286	0.285	0.274	0.287		0.288	3.813		
T	Carbon Disulfide				0.835	0.817	0.814	0.779	0.841	0.818	0.842	0.816	0.820	2.481		
T	Acrylonitrile				0.058	0.059	0.063	0.063	0.066	0.067		0.060	0.063	5.597		
T	Methyl Tert Butyl Ether				0.650	0.621	0.661	0.659	0.631	0.620	0.582		0.632	4.438		
T	trans-1,2-Dichloroethene			0.269	0.274	0.273	0.272	0.276	0.276	0.271	0.283		0.274	1.519		
T	n-Hexane						0.313	0.290	0.312	0.311	0.316	0.319	0.310	3.309		
T	Diisopropyl ether				0.719	0.724	0.709	0.699	0.694	0.699		0.699	0.706	1.627		
T	Vinyl Acetate						0.192	0.169	0.166	0.232	0.223	0.194	0.196	13.694		
P	1,1-Dichloroethane			0.460	0.450	0.445	0.457	0.465	0.452	0.444	0.462		0.454	1.740		
T	Ethyl-Tert-Butyl ether				0.716	0.722	0.718	0.705	0.702	0.724		0.720	0.715	1.185		
T	2-Butanone						0.068	0.068	0.066	0.071	0.069	0.067	0.068	2.393		
T	Propionitrile				0.020	0.022	0.023	0.022	0.023	0.023		0.023	0.022	5.579		
T	2,2-Dichloropropane			0.387	0.403	0.350	0.359	0.297	0.277	0.350	0.342		0.346	12.129		
T	cis-1,2-Dichloroethene			0.303	0.299	0.296	0.301	0.302	0.301	0.298	0.312		0.302	1.628		
C	Chloroform		0.658	0.590	0.542	0.485	0.482	0.482	0.476	0.463	0.481		0.518	12.803		
T	1-Bromopropane				0.041	0.052	0.052	0.056	0.057	0.058	0.053	0.060	0.053	11.075		
T	Bromochloromethane			0.132	0.144	0.150	0.165	0.170	0.168	0.171	0.170		0.159	9.183		
T	Tetrahydrofuran				0.050	0.044	0.045	0.043	0.043	0.045		0.043	0.045	5.367		
S	Dibromofluoromethane				0.245	0.236	0.256	0.262	0.259	0.257	0.262	0.265	0.255	3.868		
T	1,1,1-Trichloroethane			0.405	0.424	0.407	0.410	0.424	0.424	0.425	0.447		0.421	3.239		
T	Cyclohexane				0.387	0.368	0.384	0.366	0.397	0.394	0.411	0.406	0.389	4.204		
T	1,1-Dichloropropene				0.357	0.349	0.355	0.358	0.357	0.352	0.362		0.356	1.233		
T	Tert-Amyl-Methyl ether				0.684	0.674	0.681	0.663	0.669	0.698		0.685	0.679	1.728		
T	Carbon Tetrachloride				0.282	0.274	0.323	0.351	0.366	0.377	0.35		0.33183	12.2386		
S	1,2-Dichloroethane-d4					0.244	0.246	0.257	0.253	0.252	0.254	0.254	0.25153	1.86029		
T	Heptane												0	0		
T	1,2-Dichloroethane			0.327	0.326	0.306	0.328	0.323	0.321	0.32	0.325		0.32202	2.174		
T	Benzene			1.21	1.101	1.077	1.063	1.054	1.025	1.007	1.019		1.06965	6.04095		
T	Trichloroethene			0.288	0.284	0.274	0.29	0.299	0.302	0.292	0.3		0.29115	3.19828		
T	Methylcyclohexane						0.413	0.393	0.422	0.423	0.432	0.44	0.42065	3.83804		
C	1,2-Dichloropropane			0.232	0.251	0.254	0.257	0.263	0.256	0.249	0.258		0.25244	3.71187		
T	1,4-Dioxane						0.002	0.002	0.002	0.002		0.002	0.00184	6.16966		
T	Bromodichloromethane			0.334	0.34	0.341	0.358	0.37	0.369	0.364	0.376		0.35636	4.47459		
T	Dibromomethane			0.122	0.155	0.145	0.155	0.154	0.153	0.153	0.153		0.14868	7.44253		
T	2-Chloroethyl Vinyl Ether					0.076	0.1	0.106	0.106	0.109	0.088	0.107	0.09902	12.5245		
T	4-Methyl-2-Pentanone						0.063	0.064	0.064	0.068	0.065	0.065	0.06495	2.52742		
T	cis-1,3-Dichloropropene			0.346	0.382	0.37	0.401	0.412	0.407	0.409	0.413		0.39243	6.25845		
T	Dimethyl Disulfide						0.227	0.225	0.247	0.252	0.264	0.27	0.24758	7.53484		
I	Chlorobenzene-d5	ISTD														
S	Toluene-d8				1.282	1.288	1.306	1.276	1.265	1.243	1.262	1.283	1.27569	1.48449		
C	Toluene			1.652	1.626	1.556	1.57	1.551	1.537	1.51	1.503		1.56301	3.34424		
T	Ethyl Methacrylate				0.354	0.349	0.379	0.362	0.386	0.4	0.394	0.402	0.37824	5.56152		
T	Paraldehyde												0	0		
T	trans-1,3-Dichloropropene				0.466	0.427	0.489	0.494	0.497	0.503	0.498		0.48194	5.63896		
T	1,1,2-Trichloroethane			0.273	0.296	0.289	0.303	0.3	0.298	0.298	0.3		0.29455	3.27325		
T	2-Hexanone						0.142	0.14	0.14	0.146	0.139	0.141	0.14144	1.87214		
T	1,3-Dichloropropane			0.484	0.508	0.475	0.504	0.5	0.497	0.495	0.494		0.49443	2.17868		
T	Tetrachloroethene			0.355	0.38	0.375	0.383	0.381	0.385	0.382	0.389		0.37875	2.7685		
T	Dibromochloromethane			0.322	0.345	0.344	0.362	0.378	0.381	0.388	0.394		0.36412	6.97018		
T	1,2-Dibromoethane			0.284	0.282	0.277	0.28	0.281	0.286	0.29	0.283		0.28283	1.39806		
T	1-Chlorohexane			0.501	0.501	0.486	0.499	0.469	0.513	0.509	0.521	0.544	0.50473	4.18396		
P	Chlorobenzene			1.095	1.077	1.019	1.044	1.045	1.064	1.071	1.141		1.06977	3.47515		
T	1,1,1,2-Tetrachloroethane			0.348	0.357	0.345	0.371	0.385	0.4	0.413	0.446		0.3831	9.19348		
C	Ethylbenzene			0.6	0.536	0.538	0.559	0.564	0.581	0.595	0.659		0.57912	6.92495		
T	m-,p-Xylene			0.711	0.677	0.667	0.681	0.673	0.697	0.701	0.731		0.69221	3.13862		
T	o-Xylene				0.671	0.642	0.655	0.669	0.678	0.657	0.704		0.66797	2.95161		
T	Styrene			1.073	1.059	1.076	1.12	1.133	1.168	1.147	1.193		1.12136	4.31921		
P	Bromoform				0.2	0.2	0.214	0.226	0.238	0.239	0.237		0.22189	7.90635		
T	Isopropylbenzene			1.776	1.697	1.623	1.674	1.668	1.699	1.625	1.612		1.67159	3.22323		
I	1,4-Dichlorobenzene-d4	ISTD														
P	1,1,2,2-Tetrachloroethane			0.698	0.661	0.65	0.674	0.635	0.606	0.637	0.648		0.65111	4.24655		
S	p-Bromofluorobenzene				0.963	0.993	0.912	0.973	0.934	0.902	0.947	0.972	0.94951	3.31848		

T	1,2,3-Trichloropropane			0.195	0.177	0.197	0.197	0.19	0.193	0.197		0.19228	3.72212
T	trans-1,4-Dichloro-2-Butene			0.124	0.117	0.135	0.132	0.142	0.151	0.15	0.155	0.13826	10.0162
T	n-Propylbenzene		4.071	3.929	3.827	3.847	3.789	3.738	3.585	3.496		3.78518	4.83282
T	Bromobenzene	0.861	0.852	0.867	0.84	0.843	0.856	0.84	0.822	0.872		0.85035	1.84632
T	1,3,5-Trimethylbenzene		2.773	2.744	2.708	2.654	2.661	2.647	2.591	2.682		2.68251	2.16658
T	2-Chlorotoluene		2.733	2.689	2.575	2.498	2.579	2.388	2.346	2.355		2.52034	5.92259
T	4-Chlorotoluene		2.395	2.337	2.248	2.223	2.051	2.189	2.093	2.284		2.22752	5.21159
T	a-Methylstyrene					1.445	1.366	1.463	1.473	1.542	1.611	1.48341	5.66686
T	tert-Butylbenzene			0.551	0.564	0.544	0.568	0.565	0.555	0.589		0.56208	2.558
T	1,2,4-Trimethylbenzene			2.798	2.729	2.745	2.76	2.745	2.714	2.793		2.75494	1.13121
T	sec-Butylbenzene			3.56	3.327	3.322	3.297	3.276	3.197	3.178		3.30805	3.79322
T	p-Isopropyltoluene			2.879	2.746	2.749	2.779	2.779	2.76	2.787		2.78269	1.6223
T	1,3-Dichlorobenzene		1.745	1.595	1.607	1.558	1.601	1.574	1.559	1.608		1.60589	3.7263
T	1,4-Dichlorobenzene	1.858	1.642	1.613	1.574	1.578	1.594	1.578	1.564	1.615		1.62397	5.60487
T	n-Butylbenzene			2.643	2.479	2.524	2.512	2.536	2.56	2.533		2.54099	2.02916
T	1,2-Dichlorobenzene	1.566	1.589	1.537	1.453	1.471	1.497	1.472	1.477	1.484		1.50524	3.15458
T	1,2-Dibromo-3-Chloropropane				0.103	0.12	0.121	0.119	0.128	0.117		0.11794	7.07341
T	1,2,4-Trichlorobenzene		1.219	1.11	1.06	1.059	1.082	1.083	1.092	1.105		1.10135	4.63701
T	Hexachlorobutadiene		0.476	0.446	0.394	0.418	0.403	0.409	0.409	0.41		0.42065	6.42356
T	Naphthalene		2.283	2.179	2.049	2.212	2.236	2.219	2.289	2.175		2.20527	3.4468
T	1,2,3-Trichlorobenzene	1.267	1.197	1.116	1.005	0.999	0.994	0.992	1.004	0.995		1.06323	9.83782

Thu Apr 06 14:39:00 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Calibration: Thu Apr 13 16:40:13 2017
Curve: WG609829
Calibration Files

	Compound	5 8M418916.D	20 8M418917.D	50 8M418918.D	100 8M418919.D	200 8M418920.D	300 8M418921.D	400 8M418922.D	500 8M418923.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile		0.013	0.012	0.013	0.013	0.012	0.013	0.013	0.013	3.572
T	3-Chloro-1-propene	0.312	0.315	0.327	0.337	0.346	0.341	0.344	0.341	0.333	3.984
T	2-Chloro-1,3-butadiene	0.285	0.299	0.317	0.330	0.340	0.336	0.337	0.336	0.322	6.267
T	Ethyl Acetate	0.099	0.101	0.098	0.101	0.108	0.103	0.106	0.109	0.103	4.045
T	Methacrylonitrile	0.052	0.059	0.057	0.059	0.064	0.061	0.063	0.065	0.060	7.025
T	Isobutyl Alcohol			0.003	0.004	0.004	0.004	0.005	0.005	0.004	12.096
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.096	0.101	0.103	0.107	0.116	0.112	0.116	0.121	0.109	7.922
T	2-Nitropropane		0.027	0.028	0.031	0.034	0.034	0.035	0.037	0.032	11.358
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.006	0.006	0.007	0.008	0.007	0.008	0.009	0.007	13.841

Mon Apr 17 15:45:45 2017

Calibration Table Report
Method: 8260WT.M
Title: Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Calibration: Tue Apr 18 08:45:38 2017
Curve: WG610410
Calibration Files

	Compound	0.3 8M419002.D	0.4 8M419003.D	1 8M419004.D	2 8M419005.D	5 8M419006.D	20 8M419007.D	50 8M419008.D	100 8M419009.D	200 8M419010.D	300 8M419011.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.313	0.289	0.277	0.384	0.370	0.362	0.373		0.338	13.019		
P	Chloromethane			0.456	0.440	0.417	0.437	0.403	0.401	0.407		0.423	5.087		
C	Vinyl Chloride		0.426	0.430	0.414	0.394	0.429	0.389	0.367	0.347		0.399	7.750		
T	1,3-Butadiene					0.273	0.246	0.164	0.130	0.118	0.112	0.174	39.828		1.000
T	Bromomethane			0.064	0.068	0.074	0.124	0.149	0.181			0.110	44.154		1.001
T	Chloroethane		0.162	0.163	0.173	0.171	0.183	0.177	0.180	0.186		0.174	5.074		
T	Trichlorofluoromethane		0.393	0.462	0.411	0.420	0.452	0.436	0.437	0.459		0.434	5.614		
T	Diethyl ether			0.159	0.160	0.163	0.158	0.160	0.167		0.176	0.163	3.861		
T	Isoprene					0.316	0.325	0.346	0.353	0.353	0.366	0.343	5.533		
T	Acrolein				0.022	0.023	0.021	0.022	0.024		0.024	0.023	4.706		
T	1,1,2-Trichloro-1,2,2-Trifluoroethane			0.251	0.228	0.237	0.253	0.250	0.252	0.261		0.247	4.440		
T	Acetone					0.036	0.033	0.036	0.037	0.034	0.035	0.035	4.082		
C	1,1-Dichloroethene		0.331	0.366	0.344	0.349	0.377	0.371	0.376	0.383		0.362	5.154		
T	Tert-Butyl Alcohol				0.010	0.012	0.011	0.011	0.011		0.013	0.011	10.980		
T	Dimethyl Sulfide					0.232	0.226	0.240	0.246	0.249	0.255	0.241	4.476		
T	Iodomethane					0.026	0.067	0.121	0.154	0.164	0.116	0.108	48.714	NO CAL	
T	Methyl acetate					0.099	0.091	0.097	0.098	0.093	0.100	0.096	3.655		
T	Methylene Chloride			0.271	0.245	0.249	0.263	0.258	0.264	0.272		0.260	3.943		
T	Carbon Disulfide			0.794	0.744	0.746	0.729	0.763	0.767	0.766	0.713	0.753	3.339		
T	Acrylonitrile			0.043	0.045	0.049	0.049	0.053	0.054		0.049	0.049	8.214		
T	Methyl Tert Butyl Ether			0.495	0.474	0.502	0.530	0.528	0.543	0.517		0.513	4.642		
T	trans-1,2-Dichloroethene		0.342	0.345	0.349	0.334	0.360	0.353	0.363	0.373		0.352	3.537		
T	n-Hexane					0.301	0.278	0.290	0.295	0.300	0.301	0.294	2.997		
T	Diisopropyl ether			0.776	0.794	0.805	0.792	0.783	0.801		0.768	0.788	1.708		
T	Vinyl Acetate					0.353	0.350	0.359	0.366	0.348	0.345	0.354	2.233		
P	1,1-Dichloroethane		0.405	0.460	0.437	0.441	0.474	0.462	0.473	0.476		0.453	5.418		
T	Ethyl-Tert-Butyl ether			0.651	0.652	0.684	0.667	0.669	0.693		0.679	0.671	2.398		
T	2-Butanone					0.053	0.052	0.056	0.058	0.053	0.059	0.055	5.073		
T	Propionitrile			0.015	0.016	0.018	0.017	0.017	0.018		0.019	0.017	7.523		
T	2,2-Dichloropropane		0.336	0.387	0.384	0.373	0.399	0.387	0.396	0.399		0.383	5.430		
T	cis-1,2-Dichloroethene		0.263	0.287	0.282	0.286	0.300	0.296	0.305	0.311		0.291	5.182		
C	Chloroform	0.619	0.539	0.514	0.499	0.459	0.479	0.467	0.473	0.471		0.502	10.092		
T	1-Bromopropane			0.057	0.053	0.055	0.056	0.057	0.059	0.061	0.061	0.057	5.096		
T	Bromochloromethane		0.118	0.150	0.156	0.160	0.167	0.167	0.170	0.168		0.157	11.011		
T	Tetrahydrofuran			0.039	0.035	0.038	0.036	0.038	0.040		0.039	0.038	4.497		
S	Dibromofluoromethane				0.251	0.244	0.261	0.272	0.265	0.269	0.273	0.262	4.105		
T	1,1,1-Trichloroethane		0.337	0.406	0.380	0.394	0.426	0.420	0.431	0.450		0.405	8.684		
T	Cyclohexane			0.371	0.358	0.372	0.358	0.379	0.389	0.403	0.391	0.377	4.255		
T	1,1-Dichloropropene			0.354	0.340	0.337	0.363	0.353	0.359	0.371		0.354	3.449		
T	Tert-Amyl-Methyl ether			0.568	0.579	0.618	0.598	0.602	0.629		0.609	0.600	3.552		
T	Carbon Tetrachloride		0.288	0.38	0.359	0.363	0.404	0.394	0.41	0.411		0.3759	10.8547		
S	1,2-Dichloroethane-d4				0.215	0.219	0.227	0.237	0.23	0.224	0.235	0.2267	3.56551		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.247	0.28	0.273	0.279	0.298	0.293	0.305	0.299		0.284	6.56007		
T	Benzene		1.013	1.058	1.034	1.013	1.082	1.044	1.045	0.975		1.0328	3.16185		
T	Trichloroethene		0.28	0.291	0.275	0.274	0.294	0.29	0.302	0.315		0.2901	4.79714		
T	Methylcyclohexane					0.371	0.369	0.386	0.392	0.4	0.402	0.3867	3.65443		
C	1,2-Dichloropropane		0.235	0.244	0.249	0.243	0.257	0.256	0.264	0.269		0.2522	4.51345		
T	Bromodichloromethane		0.273	0.313	0.319	0.319	0.35	0.347	0.359	0.361		0.3301	9.09766		
T	1,4-Dioxane					0.001	0.001	0.002	0.002		0.002	0.0014	8.93532		
T	Dibromomethane		0.101	0.125	0.129	0.129	0.138	0.136	0.14	0.14		0.1298	9.96462		
T	2-Chloroethyl Vinyl Ether				0.091	0.101	0.106	0.114	0.116	0.114	0.122	0.1091	9.65313		
T	4-Methyl-2-Pentanone					0.042	0.045	0.05	0.051	0.049	0.055	0.0489	9.48763		
T	cis-1,3-Dichloropropene		0.303	0.354	0.349	0.364	0.401	0.404	0.417	0.416		0.3759	10.7244		

T	Dimethyl Disulfide					0.133	0.169	0.201	0.215	0.226	0.237	0.1968	19.8258	0.998
I	Chlorobenzene-d5	ISTD												
S	Toluene-d8				1.126	1.107	1.183	1.185	1.136	1.123	1.136	1.1423	2.63592	
C	Toluene		1.276	1.435	1.421	1.416	1.507	1.432	1.412	1.234		1.3916	6.46773	
T	Ethyl Methacrylate			0.208	0.222	0.252	0.262	0.287	0.29	0.277	0.303	0.2625	12.7656	
T	Paraldehyde											0	0	
T	trans-1,3-Dichloropropene			0.367	0.363	0.389	0.421	0.422	0.44	0.423		0.4036	7.59969	
T	1,1,2-Trichloroethane		0.21	0.235	0.224	0.228	0.239	0.229	0.237	0.23		0.2289	4.06629	
T	2-Hexanone					0.048	0.053	0.058	0.06	0.054	0.063	0.0562	9.63322	
T	1,3-Dichloropropane		0.353	0.405	0.372	0.373	0.41	0.397	0.403	0.383		0.387	5.15702	
T	Tetrachloroethene		0.245	0.284	0.279	0.285	0.31	0.295	0.312	0.328		0.2923	8.65757	
T	Dibromochloromethane		0.232	0.267	0.271	0.289	0.315	0.318	0.333	0.328		0.2942	12.052	
T	1,2-Dibromoethane		0.188	0.209	0.218	0.222	0.242	0.236	0.241	0.233		0.2236	8.21869	
T	1-Chlorohexane		0.385	0.44	0.423	0.428	0.44	0.451	0.457	0.466	0.472	0.4403	5.99946	
P	Chlorobenzene		1.008	0.965	0.972	0.936	1.008	0.988	1.042	1.006		0.9906	3.29062	
T	1,1,1,2-Tetrachloroethane		0.303	0.316	0.32	0.335	0.379	0.385	0.423			0.3515	12.6454	
C	Ethylbenzene		0.467	0.5	0.532	0.513	0.574	0.568	0.62	0.665		0.5548	11.7603	
T	m-,p-Xylene		0.572	0.637	0.62	0.627	0.689	0.677	0.694	0.623		0.6425	6.46237	
T	o-Xylene			0.611	0.592	0.623	0.665	0.648	0.68	0.703		0.6459	6.13337	
T	Styrene		0.814	0.93	0.929	0.995	1.114	1.111	1.142	1.067		1.0127	11.3997	
P	Bromoform			0.125	0.142	0.163	0.191	0.196	0.207	0.207		0.176	18.66	0.999
T	Isopropylbenzene		1.463	1.551	1.54	1.592	1.678	1.613	1.576	1.361		1.5466	6.28276	
I	1,4-Dichlorobenzene-d4	ISTD												
P	1,1,2,2-Tetrachloroethane		0.385	0.493	0.455	0.465	0.508	0.494	0.502	0.472		0.4717	8.42371	
S	p-Bromofluorobenzene				0.897	0.839	0.876	0.891	0.86	0.878	0.935	0.8823	3.42248	
T	1,2,3-Trichloropropane			0.117	0.127	0.131	0.143	0.144	0.146	0.138		0.1352	7.82469	
T	trans-1,4-Dichloro-2-Butene			0.058	0.065	0.085	0.109	0.122	0.115	0.114	0.116	0.0978	25.7933	1.000
T	n-Propylbenzene		3.478	3.723	3.692	3.608	3.807	3.577	3.383	2.726		3.4991	9.72861	
T	Bromobenzene	0.752	0.696	0.839	0.81	0.813	0.857	0.845	0.872	0.896		0.8199	7.58093	
T	1,3,5-Trimethylbenzene		2.467	2.514	2.525	2.506	2.737	2.623	2.589	2.306		2.5336	4.94471	
T	2-Chlorotoluene		2.674	2.623	2.305	2.553	2.347	2.198	2.2	2.21		2.3888	8.30021	
T	4-Chlorotoluene		1.995	2.135	2.439	1.867	2.369	2.326	2.308	1.784		2.1528	11.4607	
T	a-Methylstyrene					1.296	1.355	1.455	1.517	1.498	1.401	1.4204	6.02416	
T	tert-Butylbenzene			0.52	0.555	0.528	0.588	0.571	0.601	0.653		0.5736	7.96677	
T	1,2,4-Trimethylbenzene		2.284	2.607	2.62	2.578	2.817	2.742	2.701	2.343		2.5866	7.19751	
T	sec-Butylbenzene			3.278	3.292	3.183	3.429	3.252	3.145	2.633		3.1733	8.03336	
T	p-Isopropyltoluene			2.64	2.605	2.626	2.913	2.796	2.737	2.387		2.6721	6.23483	
T	1,3-Dichlorobenzene		1.502	1.596	1.568	1.535	1.665	1.625	1.642	1.581		1.5891	3.4371	
T	1,4-Dichlorobenzene	1.772	1.622	1.643	1.594	1.517	1.637	1.592	1.618	1.545		1.6156	4.45875	
T	n-Butylbenzene			2.426	2.337	2.245	2.632	2.542	2.483	2.184		2.407	6.69686	
T	1,2-Dichlorobenzene	1.368	1.185	1.488	1.397	1.379	1.46	1.438	1.454	1.396		1.396	6.36818	
T	1,2-Dibromo-3-Chloropropane				0.073	0.072	0.076	0.079	0.083	0.077		0.0768	5.09915	
T	1,2,4-Trichlorobenzene		0.864	0.92	0.882	0.852	0.952	0.983	1.022	1.044		0.9399	7.72424	
T	Hexachlorobutadiene		0.405	0.427	0.426	0.402	0.449	0.44	0.456	0.493		0.4374	6.74711	
T	Naphthalene		1.353	1.273	1.232	1.251	1.396	1.436	1.465	1.339		1.3431	6.41915	
T	1,2,3-Trichlorobenzene	0.796	0.766	0.75	0.705	0.691	0.802	0.821	0.847	0.847		0.7805	7.29917	

Tue Apr 18 12:15:24 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number:L17041200 Run Date:04/24/2017 Sample ID:WG611320-12
Instrument ID:HPMS11 Run Time:22:26 Method:8260B
File ID:11M17718 Analyst:JDS QC Key:AF40
ICal Workgroup:WG611320 Cal ID:HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.8	ug/L	0.427	4.30	25	
1,2-Dichloropropane	CCC	50.0	48.5	ug/L	0.331	3.00	25	
Chloroform	CCC	50.0	52.4	ug/L	0.473	4.80	25	
Ethylbenzene	CCC	50.0	52.9	ug/L	0.576	5.70	25	
Toluene	CCC	50.0	46.9	ug/L	1.52	6.10	25	
Vinyl Chloride	CCC	50.0	52.2	ug/L	0.224	4.30	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.2	ug/L	0.773	1.60	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.548	4.30	25	
Bromoform	SPCC	50.0	50.1	ug/L	0.273	0.200	25	
Chlorobenzene	SPCC	50.0	48.9	ug/L	1.01	2.20	25	
Chloromethane	SPCC	50.0	64.6	ug/L	0.388	29.2	25	*
1,1,1,2-Tetrachloroethane		50.0	49.5	ug/L	0.379	1.00	25	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.423	4.90	25	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.329	3.70	25	
1,1-Dichloropropene		50.0	50.8	ug/L	0.360	1.70	25	
1,2,3-Trichlorobenzene		50.0	56.9	ug/L	1.28	13.8	25	
1,2,3-Trichloropropane		50.0	49.1	ug/L	0.221	1.80	25	
1,2,4-Trichlorobenzene		50.0	59.0	ug/L	1.30	18.0	25	
1,2,4-Trimethylbenzene		50.0	49.7	ug/L	2.49	0.500	25	
1,2-Dichloroethane		50.0	47.0	ug/L	0.368	5.90	25	
1,2-Dichlorobenzene		50.0	51.8	ug/L	1.58	3.50	25	
1,2-Dibromo-3-Chloropropane		50.0	51.8	ug/L	0.143	3.70	25	
1,2-Dibromoethane		50.0	49.6	ug/L	0.304	0.800	25	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.800	25	
1,3-Dichlorobenzene		50.0	51.7	ug/L	1.57	3.40	25	
1,3-Dichloropropane		50.0	50.3	ug/L	0.571	0.700	25	
1,4-Dichlorobenzene		50.0	48.9	ug/L	1.60	2.20	25	
1-Chlorohexane		50.0	58.4	ug/L	0.539	16.7	25	
2,2-Dichloropropane		50.0	43.2	ug/L	0.335	13.6	25	
2-Hexanone		50.0	54.4	ug/L	0.309	8.80	25	
2-Chlorotoluene		50.0	43.1	ug/L	2.05	13.8	25	
4-Chlorotoluene		50.0	49.8	ug/L	2.14	0.400	25	
Acetone		50.0	48.3	ug/L	0.0807	3.40	25	
Benzene		50.0	48.3	ug/L	1.06	3.40	25	
Bromobenzene		50.0	50.1	ug/L	0.854	0.200	25	
Bromochloromethane		50.0	50.2	ug/L	0.188	0.400	25	
Bromodichloromethane		50.0	49.6	ug/L	0.353	0.800	25	
Bromomethane		50.0	51.1	ug/L	0.226	2.10	25	
Carbon Disulfide		50.0	40.1	ug/L	0.612	19.9	25	
Carbon Tetrachloride		50.0	52.3	ug/L	0.366	4.70	25	
Chloroethane		50.0	59.0	ug/L	0.262	18.0	25	
cis-1,2-Dichloroethene		50.0	50.0	ug/L	0.305	0.100	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/24/2017 Sample ID: WG611320-12
Instrument ID: HPMS11 Run Time: 22:26 Method: 8260B
File ID: 11M17718 Analyst: JDS QC Key: AF40
ICal Workgroup: WG611320 Cal ID: HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	53.7	ug/L	0.453	7.30	25	
Dibromochloromethane		50.0	50.8	ug/L	0.387	1.70	25	
Dibromomethane		50.0	50.6	ug/L	0.163	1.20	25	
Dichlorodifluoromethane		50.0	63.7	ug/L	0.397	27.3	25	*
Hexachlorobutadiene		50.0	55.0	ug/L	0.642	10.1	25	
Isopropylbenzene		50.0	50.0	ug/L	1.60	0	25	
Methylene Chloride		50.0	46.9	ug/L	0.279	6.20	25	
Methyl Tert Butyl Ether		50.0	50.7	ug/L	0.757	1.40	25	
2-Butanone		50.0	50.4	ug/L	0.138	0.800	25	
4-Methyl-2-Pentanone		50.0	52.8	ug/L	0.127	5.60	25	
n-Butylbenzene		50.0	54.1	ug/L	2.46	8.20	25	
n-Propylbenzene		50.0	45.7	ug/L	3.20	8.60	25	
m-,p-Xylene		100	101	ug/L	0.660	1.30	25	
Naphthalene		50.0	55.9	ug/L	2.74	11.8	25	
o-Xylene		50.0	52.2	ug/L	0.685	4.40	25	
p-Isopropyltoluene		50.0	52.5	ug/L	2.67	4.90	25	
sec-Butylbenzene		50.0	47.6	ug/L	3.01	4.80	25	
Styrene		50.0	57.9	ug/L	1.13	15.8	25	
Trichloroethene		50.0	49.2	ug/L	0.283	1.60	25	
tert-Butylbenzene		50.0	48.8	ug/L	0.569	2.40	25	
Tetrachloroethene		50.0	52.6	ug/L	0.338	5.20	25	
trans-1,2-Dichloroethene		50.0	48.9	ug/L	0.266	2.10	25	
trans-1,3-Dichloropropene		50.0	50.2	ug/L	0.513	0.400	25	
Trichlorofluoromethane		50.0	55.2	ug/L	0.414	10.5	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number:L17041200 Run Date:04/26/2017 Sample ID:WG611454-12
Instrument ID:HPMS17 Run Time:01:35 Method:8260B
File ID:17M0273015 Analyst:FJB QC Key:AF40
ICal Workgroup:WG611454 Cal ID:HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.1	ug/L	0.333	13.7	25	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.272	2.70	25	
Chloroform	CCC	50.0	48.9	ug/L	0.481	2.20	25	
Ethylbenzene	CCC	50.0	47.5	ug/L	0.521	4.90	25	
Toluene	CCC	50.0	47.2	ug/L	1.48	5.60	25	
Vinyl Chloride	CCC	50.0	60.9	ug/L	0.392	21.9	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.2	ug/L	0.608	9.70	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.452	4.20	25	
Bromoform	SPCC	50.0	49.0	ug/L	0.286	2.00	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.992	5.70	25	
Chloromethane	SPCC	50.0	59.6	ug/L	0.347	19.2	25	
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.384	6.30	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.432	0.100	25	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.282	7.20	25	
1,1-Dichloropropene		50.0	47.9	ug/L	0.326	4.20	25	
1,2,3-Trichlorobenzene		50.0	45.4	ug/L	1.09	9.20	25	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.183	7.90	25	
1,2,4-Trichlorobenzene		50.0	47.7	ug/L	1.19	4.50	25	
1,2,4-Trimethylbenzene		50.0	45.9	ug/L	2.58	8.10	25	
1,2-Dichloroethane		50.0	47.3	ug/L	0.314	5.40	25	
1,2-Dichlorobenzene		50.0	46.1	ug/L	1.54	7.80	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.116	6.10	25	
1,2-Dibromoethane		50.0	46.5	ug/L	0.289	7.00	25	
1,3,5-Trimethylbenzene		50.0	45.9	ug/L	2.56	8.30	25	
1,3-Dichlorobenzene		50.0	44.6	ug/L	1.53	10.8	25	
1,3-Dichloropropane		50.0	48.4	ug/L	0.467	3.20	25	
1,4-Dichlorobenzene		50.0	45.0	ug/L	1.56	9.90	25	
1-Chlorohexane		50.0	51.7	ug/L	0.0879	3.50	25	
2,2-Dichloropropane		50.0	43.4	ug/L	0.325	13.2	25	
2-Hexanone		50.0	53.8	ug/L	0.172	7.60	25	
2-Chlorotoluene		50.0	44.5	ug/L	2.03	11.0	25	
4-Chlorotoluene		50.0	45.9	ug/L	2.09	8.20	25	
Acetone		50.0	49.5	ug/L	0.0498	0.900	25	
Benzene		50.0	47.5	ug/L	1.01	5.00	25	
Bromobenzene		50.0	45.0	ug/L	0.886	9.90	25	
Bromochloromethane		50.0	49.2	ug/L	0.189	1.50	25	
Bromodichloromethane		50.0	47.9	ug/L	0.357	4.20	25	
Bromomethane		50.0	43.3	ug/L	0.207	13.3	25	
Carbon Disulfide		50.0	43.8	ug/L	0.727	12.3	25	
Carbon Tetrachloride		50.0	49.0	ug/L	0.382	1.90	25	
Chloroethane		50.0	41.7	ug/L	0.127	16.5	25	
cis-1,2-Dichloroethene		50.0	48.4	ug/L	0.288	3.30	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	51.0	ug/L	0.429	2.10	25	
Dibromochloromethane		50.0	47.4	ug/L	0.393	5.20	25	
Dibromomethane		50.0	48.8	ug/L	0.159	2.40	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.398	34.1	25	*
Hexachlorobutadiene		50.0	43.5	ug/L	0.613	13.0	25	
Isopropylbenzene		50.0	46.8	ug/L	1.58	6.30	25	
Methylene Chloride		50.0	44.4	ug/L	0.260	11.2	25	
Methyl Tert Butyl Ether		50.0	51.4	ug/L	0.687	2.90	25	
2-Butanone		50.0	50.4	ug/L	0.0756	0.800	25	
4-Methyl-2-Pentanone		50.0	51.9	ug/L	0.0721	3.90	25	
n-Butylbenzene		50.0	45.9	ug/L	2.27	8.30	25	
n-Propylbenzene		50.0	44.5	ug/L	3.28	11.1	25	
m-,p-Xylene		100	95.8	ug/L	0.633	4.20	25	
Naphthalene		50.0	47.0	ug/L	2.28	6.00	25	
o-Xylene		50.0	48.1	ug/L	0.627	3.70	25	
p-Isopropyltoluene		50.0	45.9	ug/L	2.69	8.20	25	
sec-Butylbenzene		50.0	44.7	ug/L	3.07	10.5	25	
Styrene		50.0	49.9	ug/L	1.04	0.200	25	
Trichloroethene		50.0	48.3	ug/L	0.309	3.30	25	
tert-Butylbenzene		50.0	44.7	ug/L	0.498	10.6	25	
Tetrachloroethene		50.0	46.6	ug/L	0.417	6.70	25	
trans-1,2-Dichloroethene		50.0	47.0	ug/L	0.247	6.00	25	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.345	3.50	25	
Trichlorofluoromethane		50.0	32.0	ug/L	0.264	36.0	25	*

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	20.0	20.0	ug/L	0.381	0.100	25	
1,2-Dichloropropane	CCC	20.0	19.6	ug/L	0.248	1.90	25	
Chloroform	CCC	20.0	18.5	ug/L	0.479	7.50	25	
Ethylbenzene	CCC	20.0	18.6	ug/L	0.538	7.10	25	
Toluene	CCC	20.0	18.5	ug/L	1.45	7.30	25	
Vinyl Chloride	CCC	20.0	22.0	ug/L	0.499	10.0	25	
1,1,2,2-Tetrachloroethane	SPCC	20.0	19.6	ug/L	0.638	2.00	25	
1,1-Dichloroethane	SPCC	20.0	19.7	ug/L	0.448	1.50	25	
Bromoform	SPCC	20.0	18.7	ug/L	0.208	6.30	25	
Chlorobenzene	SPCC	20.0	18.3	ug/L	0.981	8.30	25	
Chloromethane	SPCC	20.0	22.5	ug/L	0.529	12.3	25	
1,1,1,2-Tetrachloroethane		20.0	18.6	ug/L	0.356	7.10	25	
1,1,1-Trichloroethane		20.0	20.1	ug/L	0.423	0.600	25	
1,1,2-Trichloroethane		20.0	18.9	ug/L	0.278	5.50	25	
1,1-Dichloropropene		20.0	19.6	ug/L	0.349	1.90	25	
1,2,3-Trichlorobenzene		20.0	18.2	ug/L	0.968	9.00	25	
1,2,3-Trichloropropane		20.0	19.5	ug/L	0.188	2.40	25	
1,2,4-Trichlorobenzene		20.0	18.7	ug/L	1.03	6.40	25	
1,2,4-Trimethylbenzene		20.0	18.7	ug/L	2.58	6.50	25	
1,2-Dichloroethane		20.0	19.5	ug/L	0.314	2.60	25	
1,2-Dichlorobenzene		20.0	18.5	ug/L	1.39	7.30	25	
1,2-Dibromo-3-Chloropropane		20.0	19.4	ug/L	0.114	3.00	25	
1,2-Dibromoethane		20.0	19.5	ug/L	0.276	2.50	25	
1,3,5-Trimethylbenzene		20.0	18.5	ug/L	2.49	7.30	25	
1,3-Dichlorobenzene		20.0	18.4	ug/L	1.48	7.90	25	
1,3-Dichloropropane		20.0	20.1	ug/L	0.498	0.700	25	
1,4-Dichlorobenzene		20.0	18.4	ug/L	1.50	7.80	25	
1-Chlorohexane		20.0	20.5	ug/L	0.517	2.40	25	
2,2-Dichloropropane		20.0	22.0	ug/L	0.381	10.1	25	
2-Hexanone		20.0	21.4	ug/L	0.151	7.00	25	
2-Chlorotoluene		20.0	17.4	ug/L	2.19	13.2	25	
4-Chlorotoluene		20.0	18.9	ug/L	2.10	5.70	25	
Acetone		20.0	19.0	ug/L	0.0513	4.90	25	
Benzene		20.0	18.8	ug/L	1.01	5.90	25	
Bromobenzene		20.0	18.5	ug/L	0.788	7.30	25	
Bromochloromethane		20.0	21.4	ug/L	0.170	7.00	25	
Bromodichloromethane		20.0	19.4	ug/L	0.346	2.80	25	
Bromomethane		20.0	17.7	ug/L	0.173	11.5	25	
Carbon Disulfide		20.0	16.1	ug/L	0.662	19.3	25	
Carbon Tetrachloride		20.0	20.6	ug/L	0.342	3.10	25	
Chloroethane		20.0	22.9	ug/L	0.223	14.3	25	
cis-1,2-Dichloroethene		20.0	19.5	ug/L	0.294	2.60	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		20.0	21.6	ug/L	0.424	8.00	25	
Dibromochloromethane		20.0	19.4	ug/L	0.352	3.20	25	
Dibromomethane		20.0	20.5	ug/L	0.152	2.50	25	
Dichlorodifluoromethane		20.0	24.5	ug/L	0.487	22.7	25	
Hexachlorobutadiene		20.0	18.6	ug/L	0.391	7.00	25	
Isopropylbenzene		20.0	18.7	ug/L	1.56	6.40	25	
Methylene Chloride		20.0	19.4	ug/L	0.280	3.00	25	
Methyl Tert Butyl Ether		20.0	20.8	ug/L	0.658	4.10	25	
2-Butanone		20.0	20.3	ug/L	0.0689	1.30	25	
4-Methyl-2-Pentanone		20.0	20.8	ug/L	0.0677	4.20	25	
n-Butylbenzene		20.0	18.9	ug/L	2.40	5.50	25	
n-Propylbenzene		20.0	18.3	ug/L	3.47	8.30	25	
m-,p-Xylene		40.0	37.4	ug/L	0.646	6.60	25	
Naphthalene		20.0	18.7	ug/L	2.07	6.30	25	
o-Xylene		20.0	18.9	ug/L	0.631	5.50	25	
p-Isopropyltoluene		20.0	19.0	ug/L	2.64	5.20	25	
sec-Butylbenzene		20.0	18.3	ug/L	3.02	8.60	25	
Styrene		20.0	19.3	ug/L	1.08	3.50	25	
Trichloroethene		20.0	18.6	ug/L	0.271	6.80	25	
tert-Butylbenzene		20.0	19.0	ug/L	0.535	4.80	25	
Tetrachloroethene		20.0	19.4	ug/L	0.367	3.00	25	
trans-1,2-Dichloroethene		20.0	19.6	ug/L	0.268	2.20	25	
trans-1,3-Dichloropropene		20.0	19.9	ug/L	0.479	0.700	25	
Trichlorofluoromethane		20.0	21.0	ug/L	0.489	5.20	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.0	ug/L	0.340	6.00	25	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.239	5.40	25	
Chloroform	CCC	50.0	44.7	ug/L	0.449	10.6	25	
Ethylbenzene	CCC	50.0	48.9	ug/L	0.543	2.20	25	
Toluene	CCC	50.0	48.5	ug/L	1.35	2.90	25	
Vinyl Chloride	CCC	50.0	45.4	ug/L	0.363	9.20	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.7	ug/L	0.431	8.60	25	
1,1-Dichloroethane	SPCC	50.0	47.6	ug/L	0.432	4.80	25	
Bromoform	SPCC	50.0	42.9	ug/L	0.175	14.2	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.934	5.70	25	
Chloromethane	SPCC	50.0	48.6	ug/L	0.411	2.80	25	
1,1,1,2-Tetrachloroethane		50.0	50.3	ug/L	0.354	0.600	25	
1,1,1-Trichloroethane		50.0	50.8	ug/L	0.412	1.60	25	
1,1,2-Trichloroethane		50.0	45.3	ug/L	0.208	9.40	25	
1,1-Dichloropropene		50.0	47.3	ug/L	0.335	5.50	25	
1,2,3-Trichlorobenzene		50.0	48.7	ug/L	0.761	2.50	25	
1,2,3-Trichloropropane		50.0	47.0	ug/L	0.127	6.10	25	
1,2,4-Trichlorobenzene		50.0	49.0	ug/L	0.922	1.90	25	
1,2,4-Trimethylbenzene		50.0	49.9	ug/L	2.58	0.100	25	
1,2-Dichloroethane		50.0	47.2	ug/L	0.268	5.50	25	
1,2-Dichlorobenzene		50.0	47.2	ug/L	1.32	5.50	25	
1,2-Dibromo-3-Chloropropane		50.0	44.0	ug/L	0.0676	12.0	25	
1,2-Dibromoethane		50.0	47.1	ug/L	0.211	5.80	25	
1,3,5-Trimethylbenzene		50.0	48.9	ug/L	2.48	2.10	25	
1,3-Dichlorobenzene		50.0	47.4	ug/L	1.51	5.30	25	
1,3-Dichloropropane		50.0	47.2	ug/L	0.365	5.60	25	
1,4-Dichlorobenzene		50.0	46.2	ug/L	1.49	7.70	25	
1-Chlorohexane		50.0	52.1	ug/L	0.459	4.20	25	
2,2-Dichloropropane		50.0	46.7	ug/L	0.357	6.60	25	
2-Hexanone		50.0	48.3	ug/L	0.0543	3.40	25	
2-Chlorotoluene		50.0	44.1	ug/L	2.11	11.7	25	
4-Chlorotoluene		50.0	49.6	ug/L	2.14	0.800	25	
Acetone		50.0	43.2	ug/L	0.0304	13.6	25	
Benzene		50.0	47.6	ug/L	0.983	4.90	25	
Bromobenzene		50.0	48.1	ug/L	0.789	3.70	25	
Bromochloromethane		50.0	49.4	ug/L	0.155	1.20	25	
Bromodichloromethane		50.0	48.0	ug/L	0.317	4.00	25	
Bromomethane		50.0	43.6	ug/L	0.123	12.7	25	
Carbon Disulfide		50.0	43.4	ug/L	0.653	13.2	25	
Carbon Tetrachloride		50.0	50.2	ug/L	0.377	0.300	25	
Chloroethane		50.0	53.1	ug/L	0.185	6.10	25	
cis-1,2-Dichloroethene		50.0	48.0	ug/L	0.279	4.00	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041200 Run Date: 04/17/2017 Sample ID: WG610410-12
Instrument ID: HPMS8 Run Time: 19:53 Method: 8260B
File ID: 8M419014 Analyst: TMB QC Key: AF40
ICal Workgroup: WG610410 Cal ID: HPMS8 - 17-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	50.6	ug/L	0.380	1.10	25	
Dibromochloromethane		50.0	48.3	ug/L	0.284	3.40	25	
Dibromomethane		50.0	47.4	ug/L	0.123	5.20	25	
Dichlorodifluoromethane		50.0	56.3	ug/L	0.381	12.6	25	
Hexachlorobutadiene		50.0	48.6	ug/L	0.425	2.90	25	
Isopropylbenzene		50.0	49.5	ug/L	1.53	1.10	25	
Methylene Chloride		50.0	46.7	ug/L	0.243	6.60	25	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.472	7.90	25	
2-Butanone		50.0	43.5	ug/L	0.0479	13.1	25	
4-Methyl-2-Pentanone		50.0	45.4	ug/L	0.0444	9.20	25	
n-Butylbenzene		50.0	49.9	ug/L	2.40	0.200	25	
n-Propylbenzene		50.0	47.3	ug/L	3.31	5.40	25	
m-,p-Xylene		100	102	ug/L	0.654	1.70	25	
Naphthalene		50.0	48.1	ug/L	1.29	3.90	25	
o-Xylene		50.0	48.1	ug/L	0.622	3.70	25	
p-Isopropyltoluene		50.0	50.0	ug/L	2.67	0	25	
sec-Butylbenzene		50.0	47.9	ug/L	3.04	4.30	25	
Styrene		50.0	52.7	ug/L	1.07	5.40	25	
Trichloroethene		50.0	47.5	ug/L	0.276	5.00	25	
tert-Butylbenzene		50.0	48.1	ug/L	0.552	3.80	25	
Tetrachloroethene		50.0	50.6	ug/L	0.296	1.20	25	
trans-1,2-Dichloroethene		50.0	47.3	ug/L	0.333	5.40	25	
trans-1,3-Dichloropropene		50.0	46.6	ug/L	0.376	6.90	25	
Trichlorofluoromethane		50.0	48.6	ug/L	0.421	2.90	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611920-02

Instrument ID: HPMS6 Run Time: 06:52 Method: 8260B

File ID: 6M146798 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	57.4	ug/L	0.438	14.9	20	
1,2-Dichloropropane	CCC	50.0	54.8	ug/L	0.277	9.55	20	
Chloroform	CCC	50.0	48.8	ug/L	0.505	2.37	20	
Ethylbenzene	CCC	50.0	52.9	ug/L	0.612	5.73	20	
Toluene	CCC	50.0	53.2	ug/L	1.66	6.41	20	
Vinyl Chloride	CCC	50.0	50.6	ug/L	0.459	1.26	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.1	ug/L	0.639	1.82	20	
1,1-Dichloroethane	SPCC	50.0	56.9	ug/L	0.517	13.8	20	
Bromoform	SPCC	50.0	48.0	ug/L	0.213	4.06	20	
Chlorobenzene	SPCC	50.0	51.4	ug/L	1.10	2.74	20	
Chloromethane	SPCC	50.0	48.8	ug/L	0.452	2.39	20	
Xylenes		150	159	ug/L	0.721	5.97	20	
1,1,1,2-Tetrachloroethane		50.0	52.6	ug/L	0.403	5.17	20	
1,1,1-Trichloroethane		50.0	53.3	ug/L	0.448	6.56	20	
1,1,2-Trichloroethane		50.0	49.8	ug/L	0.293	0.431	20	
1,1-Dichloropropene		50.0	54.2	ug/L	0.386	8.47	20	
1,2,3-Trichlorobenzene		50.0	41.3	ug/L	0.879	17.4	20	
1,2,3-Trichloropropane		50.0	46.0	ug/L	0.177	8.02	20	
1,2,4-Trichlorobenzene		50.0	45.2	ug/L	0.995	9.69	20	
1,2,4-Trimethylbenzene		50.0	53.7	ug/L	2.96	7.31	20	
1,2-Dichloroethane		50.0	52.7	ug/L	0.339	5.35	20	
1,2-Dichlorobenzene		50.0	47.5	ug/L	1.43	5.04	20	
1,2-Dibromo-3-Chloropropane		50.0	46.4	ug/L	0.110	7.10	20	
1,2-Dibromoethane		50.0	48.6	ug/L	0.275	2.88	20	
1,3,5-Trimethylbenzene		50.0	52.5	ug/L	2.81	4.90	20	
1,3-Dichlorobenzene		50.0	49.8	ug/L	1.60	0.326	20	
1,3-Dichloropropane		50.0	52.1	ug/L	0.515	4.15	20	
1,4-Dichlorobenzene		50.0	49.2	ug/L	1.60	1.52	20	
1-Chlorohexane		50.0	53.3	ug/L	0.538	6.57	20	
2,2-Dichloropropane		50.0	54.2	ug/L	0.375	8.50	20	
2-Hexanone		50.0	49.2	ug/L	0.139	1.63	20	
2-Chlorotoluene		50.0	53.6	ug/L	2.70	7.19	20	
4-Chlorotoluene		50.0	51.6	ug/L	2.30	3.24	20	
Acetone		50.0	50.8	ug/L	0.0548	1.63	20	
Benzene		50.0	51.9	ug/L	1.11	3.82	20	
Bromobenzene		50.0	48.1	ug/L	0.819	3.70	20	
Bromochloromethane		50.0	52.2	ug/L	0.166	4.50	20	
Bromodichloromethane		50.0	53.3	ug/L	0.380	6.53	20	
Bromomethane		50.0	46.6	ug/L	0.183	6.82	20	
Carbon Disulfide		50.0	55.4	ug/L	0.908	10.7	20	
Carbon Tetrachloride		50.0	56.3	ug/L	0.374	12.7	20	
Chloroethane		50.0	56.1	ug/L	0.219	12.1	20	

CCV - Modified 03/05/2008

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611920-02

Instrument ID: HPMS6 Run Time: 06:52 Method: 8260B

File ID: 6M146798 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	52.3	ug/L	0.315	4.55	20	
cis-1,3-Dichloropropene		50.0	56.2	ug/L	0.441	12.4	20	
Dibromochloromethane		50.0	50.0	ug/L	0.364	0.0562	20	
Dibromomethane		50.0	50.4	ug/L	0.150	0.836	20	
Dichlorodifluoromethane		50.0	57.4	ug/L	0.456	14.9	20	
Hexachlorobutadiene		50.0	45.6	ug/L	0.384	8.71	20	
Isopropylbenzene		50.0	54.0	ug/L	1.80	7.96	20	
Methylene Chloride		50.0	51.8	ug/L	0.298	3.52	20	
Methyl Tert Butyl Ether		50.0	50.9	ug/L	0.643	1.70	20	
2-Butanone		50.0	48.6	ug/L	0.0661	2.84	20	
4-Methyl-2-Pentanone		50.0	46.3	ug/L	0.0601	7.48	20	
n-Butylbenzene		50.0	55.7	ug/L	2.83	11.3	20	
n-Propylbenzene		50.0	53.3	ug/L	4.04	6.67	20	
m-,p-Xylene		100	106	ug/L	0.733	5.87	20	
Naphthalene		50.0	43.8	ug/L	1.93	12.4	20	
o-Xylene		50.0	53.1	ug/L	0.709	6.16	20	
p-Isopropyltoluene		50.0	52.9	ug/L	2.94	5.77	20	
sec-Butylbenzene		50.0	53.4	ug/L	3.54	6.89	20	
Styrene		50.0	54.8	ug/L	1.23	9.57	20	
Trichloroethene		50.0	48.2	ug/L	0.281	3.54	20	
tert-Butylbenzene		50.0	51.0	ug/L	0.574	2.04	20	
Tetrachloroethene		50.0	49.6	ug/L	0.376	0.727	20	
trans-1,2-Dichloroethene		50.0	52.4	ug/L	0.288	4.86	20	
trans-1,3-Dichloropropene		50.0	56.6	ug/L	0.546	13.3	20	
Trichlorofluoromethane		50.0	53.9	ug/L	0.501	7.87	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	56.2	ug/L	0.429	12.5	20	
1,2-Dichloropropane	CCC	50.0	54.5	ug/L	0.275	9.10	20	
Chloroform	CCC	50.0	47.5	ug/L	0.492	4.97	20	
Ethylbenzene	CCC	50.0	50.6	ug/L	0.586	1.14	20	
Toluene	CCC	50.0	51.2	ug/L	1.60	2.48	20	
Vinyl Chloride	CCC	50.0	48.2	ug/L	0.437	3.67	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.8	ug/L	0.662	1.61	20	
1,1-Dichloroethane	SPCC	50.0	55.6	ug/L	0.505	11.2	20	
Bromoform	SPCC	50.0	46.6	ug/L	0.207	6.70	20	
Chlorobenzene	SPCC	50.0	49.5	ug/L	1.06	0.967	20	
Chloromethane	SPCC	50.0	50.6	ug/L	0.468	1.22	20	
Xylenes		150	153	ug/L	0.694	1.87	20	
1,1,1,2-Tetrachloroethane		50.0	50.0	ug/L	0.384	0.0966	20	
1,1,1-Trichloroethane		50.0	51.6	ug/L	0.434	3.22	20	
1,1,2-Trichloroethane		50.0	50.6	ug/L	0.298	1.16	20	
1,1-Dichloropropene		50.0	52.9	ug/L	0.377	5.86	20	
1,2,3-Trichlorobenzene		50.0	44.3	ug/L	0.942	11.4	20	
1,2,3-Trichloropropane		50.0	49.0	ug/L	0.188	1.99	20	
1,2,4-Trichlorobenzene		50.0	47.3	ug/L	1.04	5.40	20	
1,2,4-Trimethylbenzene		50.0	53.4	ug/L	2.94	6.87	20	
1,2-Dichloroethane		50.0	52.2	ug/L	0.336	4.46	20	
1,2-Dichlorobenzene		50.0	48.1	ug/L	1.45	3.80	20	
1,2-Dibromo-3-Chloropropane		50.0	51.7	ug/L	0.122	3.32	20	
1,2-Dibromoethane		50.0	49.5	ug/L	0.280	1.06	20	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.83	5.41	20	
1,3-Dichlorobenzene		50.0	49.1	ug/L	1.58	1.90	20	
1,3-Dichloropropane		50.0	52.4	ug/L	0.518	4.75	20	
1,4-Dichlorobenzene		50.0	48.2	ug/L	1.57	3.54	20	
1-Chlorohexane		50.0	54.3	ug/L	0.548	8.66	20	
2,2-Dichloropropane		50.0	55.1	ug/L	0.381	10.2	20	
2-Hexanone		50.0	52.7	ug/L	0.149	5.40	20	
2-Chlorotoluene		50.0	53.4	ug/L	2.69	6.71	20	
4-Chlorotoluene		50.0	52.0	ug/L	2.32	4.02	20	
Acetone		50.0	55.6	ug/L	0.0600	11.2	20	
Benzene		50.0	50.3	ug/L	1.08	0.583	20	
Bromobenzene		50.0	48.2	ug/L	0.819	3.64	20	
Bromochloromethane		50.0	50.6	ug/L	0.161	1.15	20	
Bromodichloromethane		50.0	52.1	ug/L	0.371	4.10	20	
Bromomethane		50.0	47.4	ug/L	0.186	5.28	20	
Carbon Disulfide		50.0	55.8	ug/L	0.915	11.6	20	
Carbon Tetrachloride		50.0	52.1	ug/L	0.346	4.16	20	
Chloroethane		50.0	55.1	ug/L	0.215	10.3	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611922 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	51.1	ug/L	0.308	2.12	20	
cis-1,3-Dichloropropene		50.0	55.2	ug/L	0.433	10.3	20	
Dibromochloromethane		50.0	48.9	ug/L	0.356	2.18	20	
Dibromomethane		50.0	50.2	ug/L	0.149	0.376	20	
Dichlorodifluoromethane		50.0	53.8	ug/L	0.427	7.59	20	
Hexachlorobutadiene		50.0	49.3	ug/L	0.415	1.42	20	
Isopropylbenzene		50.0	52.3	ug/L	1.75	4.59	20	
Methylene Chloride		50.0	51.3	ug/L	0.296	2.54	20	
Methyl Tert Butyl Ether		50.0	52.9	ug/L	0.668	5.77	20	
2-Butanone		50.0	52.8	ug/L	0.0718	5.61	20	
4-Methyl-2-Pentanone		50.0	50.3	ug/L	0.0653	0.596	20	
n-Butylbenzene		50.0	55.7	ug/L	2.83	11.5	20	
n-Propylbenzene		50.0	53.6	ug/L	4.06	7.17	20	
m-,p-Xylene		100	101	ug/L	0.702	1.47	20	
Naphthalene		50.0	48.0	ug/L	2.12	3.96	20	
o-Xylene		50.0	51.3	ug/L	0.686	2.67	20	
p-Isopropyltoluene		50.0	52.7	ug/L	2.94	5.49	20	
sec-Butylbenzene		50.0	53.3	ug/L	3.52	6.51	20	
Styrene		50.0	52.8	ug/L	1.18	5.61	20	
Trichloroethene		50.0	47.1	ug/L	0.274	5.75	20	
tert-Butylbenzene		50.0	51.3	ug/L	0.577	2.66	20	
Tetrachloroethene		50.0	48.2	ug/L	0.365	3.69	20	
trans-1,2-Dichloroethene		50.0	51.2	ug/L	0.281	2.30	20	
trans-1,3-Dichloropropene		50.0	56.1	ug/L	0.541	12.3	20	
Trichlorofluoromethane		50.0	51.4	ug/L	0.478	2.86	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611924-02

Instrument ID: HPMS11 Run Time: 07:26 Method: 8260B

File ID: 11M17828 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611925 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.5	ug/L	0.451	1.01	20	
1,2-Dichloropropane	CCC	50.0	49.7	ug/L	0.339	0.587	20	
Chloroform	CCC	50.0	51.5	ug/L	0.468	2.98	20	
Ethylbenzene	CCC	50.0	52.4	ug/L	0.570	4.76	20	
Toluene	CCC	50.0	47.2	ug/L	1.53	5.52	20	
Vinyl Chloride	CCC	50.0	52.5	ug/L	0.226	5.09	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.4	ug/L	0.745	5.27	20	
1,1-Dichloroethane	SPCC	50.0	49.2	ug/L	0.564	1.58	20	
Bromoform	SPCC	50.0	49.1	ug/L	0.268	1.80	20	
Chlorobenzene	SPCC	50.0	49.2	ug/L	1.01	1.65	20	
Chloromethane	SPCC	50.0	39.1	ug/L	0.236	21.7	20	*
Xylenes		150	153	ug/L	0.667	1.73	20	
1,1,1,2-Tetrachloroethane		50.0	51.0	ug/L	0.391	1.95	20	
1,1,1-Trichloroethane		50.0	51.8	ug/L	0.418	3.59	20	
1,1,2-Trichloroethane		50.0	47.7	ug/L	0.326	4.61	20	
1,1-Dichloropropene		50.0	51.3	ug/L	0.363	2.65	20	
1,2,3-Trichlorobenzene		50.0	52.4	ug/L	1.18	4.78	20	
1,2,3-Trichloropropane		50.0	47.1	ug/L	0.212	5.74	20	
1,2,4-Trichlorobenzene		50.0	56.7	ug/L	1.25	13.5	20	
1,2,4-Trimethylbenzene		50.0	52.2	ug/L	2.62	4.47	20	
1,2-Dichloroethane		50.0	49.1	ug/L	0.384	1.80	20	
1,2-Dichlorobenzene		50.0	51.6	ug/L	1.58	3.26	20	
1,2-Dibromo-3-Chloropropane		50.0	47.2	ug/L	0.130	5.51	20	
1,2-Dibromoethane		50.0	48.0	ug/L	0.295	4.00	20	
1,3,5-Trimethylbenzene		50.0	53.1	ug/L	2.55	6.17	20	
1,3-Dichlorobenzene		50.0	53.9	ug/L	1.63	7.71	20	
1,3-Dichloropropane		50.0	48.0	ug/L	0.544	4.09	20	
1,4-Dichlorobenzene		50.0	50.2	ug/L	1.64	0.346	20	
1-Chlorohexane		50.0	57.3	ug/L	0.529	14.6	20	
2,2-Dichloropropane		50.0	53.5	ug/L	0.415	7.09	20	
2-Hexanone		50.0	44.0	ug/L	0.250	12.1	20	
2-Chlorotoluene		50.0	47.1	ug/L	2.24	5.78	20	
4-Chlorotoluene		50.0	51.0	ug/L	2.19	2.00	20	
Acetone		50.0	41.5	ug/L	0.0694	16.9	20	
Benzene		50.0	48.4	ug/L	1.06	3.14	20	
Bromobenzene		50.0	52.2	ug/L	0.890	4.38	20	
Bromochloromethane		50.0	48.2	ug/L	0.180	3.67	20	
Bromodichloromethane		50.0	50.8	ug/L	0.362	1.57	20	
Bromomethane		50.0	47.3	ug/L	0.210	5.40	20	
Carbon Disulfide		50.0	52.1	ug/L	0.795	4.19	20	
Carbon Tetrachloride		50.0	53.1	ug/L	0.371	6.12	20	
Chloroethane		50.0	51.0	ug/L	0.227	1.95	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611924-02
Instrument ID: HPMS11 Run Time: 07:26 Method: 8260B
File ID: 11M17828 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG611925 Cal ID: HPMS11 - 24-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	50.0	ug/L	0.305	0.0316	20	
cis-1,3-Dichloropropene		50.0	53.1	ug/L	0.448	6.14	20	
Dibromochloromethane		50.0	51.5	ug/L	0.392	2.97	20	
Dibromomethane		50.0	50.0	ug/L	0.162	0.0838	20	
Dichlorodifluoromethane		50.0	54.7	ug/L	0.336	9.38	20	
Hexachlorobutadiene		50.0	55.0	ug/L	0.641	10.1	20	
Isopropylbenzene		50.0	50.9	ug/L	1.63	1.88	20	
Methylene Chloride		50.0	47.4	ug/L	0.283	5.12	20	
Methyl Tert Butyl Ether		50.0	47.5	ug/L	0.709	5.02	20	
2-Butanone		50.0	43.7	ug/L	0.119	12.6	20	
4-Methyl-2-Pentanone		50.0	42.9	ug/L	0.103	14.1	20	
n-Butylbenzene		50.0	57.4	ug/L	2.61	14.8	20	
n-Propylbenzene		50.0	50.4	ug/L	3.53	0.851	20	
m-,p-Xylene		100	101	ug/L	0.659	1.19	20	
Naphthalene		50.0	50.6	ug/L	2.48	1.28	20	
o-Xylene		50.0	51.4	ug/L	0.675	2.82	20	
p-Isopropyltoluene		50.0	54.5	ug/L	2.77	9.01	20	
sec-Butylbenzene		50.0	50.3	ug/L	3.18	0.569	20	
Styrene		50.0	56.7	ug/L	1.10	13.4	20	
Trichloroethene		50.0	49.8	ug/L	0.286	0.447	20	
tert-Butylbenzene		50.0	50.5	ug/L	0.589	1.07	20	
Tetrachloroethene		50.0	53.0	ug/L	0.341	6.04	20	
trans-1,2-Dichloroethene		50.0	49.1	ug/L	0.267	1.88	20	
trans-1,3-Dichloropropene		50.0	53.0	ug/L	0.541	5.91	20	
Trichlorofluoromethane		50.0	52.3	ug/L	0.392	4.61	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612020-02

Instrument ID: HPMS11 Run Time: 19:23 Method: 8260B

File ID: 11M17851 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG611925 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.0	ug/L	0.464	3.94	20	
1,2-Dichloropropane	CCC	50.0	49.7	ug/L	0.339	0.697	20	
Chloroform	CCC	50.0	51.5	ug/L	0.468	3.01	20	
Ethylbenzene	CCC	50.0	53.6	ug/L	0.584	7.20	20	
Toluene	CCC	50.0	47.8	ug/L	1.55	4.49	20	
Vinyl Chloride	CCC	50.0	52.3	ug/L	0.224	4.53	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.7	ug/L	0.750	4.54	20	
1,1-Dichloroethane	SPCC	50.0	49.6	ug/L	0.568	0.745	20	
Bromoform	SPCC	50.0	51.1	ug/L	0.279	2.19	20	
Chlorobenzene	SPCC	50.0	49.7	ug/L	1.02	0.519	20	
Chloromethane	SPCC	50.0	42.6	ug/L	0.256	14.8	20	
Xylenes		150	155	ug/L	0.677	3.04	20	
1,1,1,2-Tetrachloroethane		50.0	51.9	ug/L	0.398	3.79	20	
1,1,1-Trichloroethane		50.0	52.2	ug/L	0.421	4.35	20	
1,1,2-Trichloroethane		50.0	49.2	ug/L	0.336	1.62	20	
1,1-Dichloropropene		50.0	51.9	ug/L	0.367	3.73	20	
1,2,3-Trichlorobenzene		50.0	52.9	ug/L	1.19	5.76	20	
1,2,3-Trichloropropane		50.0	47.5	ug/L	0.214	4.93	20	
1,2,4-Trichlorobenzene		50.0	56.2	ug/L	1.23	12.3	20	
1,2,4-Trimethylbenzene		50.0	52.5	ug/L	2.63	4.97	20	
1,2-Dichloroethane		50.0	50.4	ug/L	0.394	0.792	20	
1,2-Dichlorobenzene		50.0	51.6	ug/L	1.58	3.21	20	
1,2-Dibromo-3-Chloropropane		50.0	48.7	ug/L	0.134	2.56	20	
1,2-Dibromoethane		50.0	50.7	ug/L	0.312	1.48	20	
1,3,5-Trimethylbenzene		50.0	53.5	ug/L	2.57	7.06	20	
1,3-Dichlorobenzene		50.0	53.7	ug/L	1.63	7.45	20	
1,3-Dichloropropane		50.0	49.4	ug/L	0.560	1.30	20	
1,4-Dichlorobenzene		50.0	49.7	ug/L	1.62	0.700	20	
1-Chlorohexane		50.0	55.4	ug/L	0.511	10.8	20	
2,2-Dichloropropane		50.0	52.7	ug/L	0.409	5.49	20	
2-Hexanone		50.0	46.4	ug/L	0.263	7.27	20	
2-Chlorotoluene		50.0	46.8	ug/L	2.23	6.31	20	
4-Chlorotoluene		50.0	51.5	ug/L	2.21	3.06	20	
Acetone		50.0	44.6	ug/L	0.0746	10.7	20	
Benzene		50.0	48.4	ug/L	1.06	3.25	20	
Bromobenzene		50.0	51.4	ug/L	0.877	2.87	20	
Bromochloromethane		50.0	49.8	ug/L	0.186	0.310	20	
Bromodichloromethane		50.0	50.7	ug/L	0.361	1.44	20	
Bromomethane		50.0	46.3	ug/L	0.205	7.45	20	
Carbon Disulfide		50.0	49.9	ug/L	0.761	0.265	20	
Carbon Tetrachloride		50.0	53.8	ug/L	0.376	7.57	20	
Chloroethane		50.0	51.4	ug/L	0.229	2.82	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612020-02
Instrument ID: HPMS11 Run Time: 19:23 Method: 8260B
File ID: 11M17851 Analyst: JDS QC Key: AF40
Workgroup (AAB#): WG611925 Cal ID: HPMS11 - 24-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.6	ug/L	0.302	0.856	20	
cis-1,3-Dichloropropene		50.0	52.5	ug/L	0.444	5.02	20	
Dibromochloromethane		50.0	53.2	ug/L	0.405	6.38	20	
Dibromomethane		50.0	49.5	ug/L	0.160	1.10	20	
Dichlorodifluoromethane		50.0	56.6	ug/L	0.347	13.2	20	
Hexachlorobutadiene		50.0	56.7	ug/L	0.661	13.4	20	
Isopropylbenzene		50.0	52.4	ug/L	1.68	4.88	20	
Methylene Chloride		50.0	47.7	ug/L	0.284	4.57	20	
Methyl Tert Butyl Ether		50.0	48.6	ug/L	0.725	2.85	20	
2-Butanone		50.0	46.1	ug/L	0.126	7.79	20	
4-Methyl-2-Pentanone		50.0	44.5	ug/L	0.107	11.0	20	
n-Butylbenzene		50.0	57.8	ug/L	2.63	15.7	20	
n-Propylbenzene		50.0	51.0	ug/L	3.57	1.91	20	
m-,p-Xylene		100	102	ug/L	0.664	1.98	20	
Naphthalene		50.0	51.4	ug/L	2.52	2.70	20	
o-Xylene		50.0	52.6	ug/L	0.690	5.15	20	
p-Isopropyltoluene		50.0	55.4	ug/L	2.82	10.7	20	
sec-Butylbenzene		50.0	51.0	ug/L	3.23	2.09	20	
Styrene		50.0	58.3	ug/L	1.13	16.6	20	
Trichloroethene		50.0	49.5	ug/L	0.284	1.09	20	
tert-Butylbenzene		50.0	50.9	ug/L	0.593	1.71	20	
Tetrachloroethene		50.0	54.2	ug/L	0.348	8.38	20	
trans-1,2-Dichloroethene		50.0	49.0	ug/L	0.267	1.90	20	
trans-1,3-Dichloropropene		50.0	54.2	ug/L	0.553	8.30	20	
Trichlorofluoromethane		50.0	54.0	ug/L	0.405	7.90	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611928-02

Instrument ID: HPMS8 Run Time: 08:01 Method: 8260B

File ID: 8M419224 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG611929 Cal ID: HPMS8 - 17-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.7	ug/L	0.389	7.44	20	
1,2-Dichloropropane	CCC	50.0	55.5	ug/L	0.280	11.0	20	
Chloroform	CCC	50.0	50.3	ug/L	0.506	0.665	20	
Ethylbenzene	CCC	50.0	54.5	ug/L	0.605	9.06	20	
Toluene	CCC	50.0	55.0	ug/L	1.53	10.0	20	
Vinyl Chloride	CCC	50.0	56.5	ug/L	0.452	13.1	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	57.0	ug/L	0.538	14.0	20	
1,1-Dichloroethane	SPCC	50.0	55.3	ug/L	0.501	10.6	20	
Bromoform	SPCC	50.0	51.8	ug/L	0.211	3.55	20	
Chlorobenzene	SPCC	50.0	53.6	ug/L	1.06	7.26	20	
Chloromethane	SPCC	50.0	50.8	ug/L	0.430	1.55	20	
Xylenes		150	168	ug/L	0.714	11.8	20	
1,1,1,2-Tetrachloroethane		50.0	58.2	ug/L	0.409	16.4	20	
1,1,1-Trichloroethane		50.0	54.6	ug/L	0.443	9.15	20	
1,1,2-Trichloroethane		50.0	54.5	ug/L	0.250	8.99	20	
1,1-Dichloropropene		50.0	53.3	ug/L	0.377	6.55	20	
1,2,3-Trichlorobenzene		50.0	52.3	ug/L	0.817	4.68	20	
1,2,3-Trichloropropane		50.0	55.1	ug/L	0.149	10.2	20	
1,2,4-Trichlorobenzene		50.0	52.9	ug/L	0.995	5.88	20	
1,2,4-Trimethylbenzene		50.0	56.3	ug/L	2.92	12.7	20	
1,2-Dichloroethane		50.0	55.2	ug/L	0.313	10.3	20	
1,2-Dichlorobenzene		50.0	53.9	ug/L	1.51	7.81	20	
1,2-Dibromo-3-Chloropropane		50.0	54.7	ug/L	0.0840	9.36	20	
1,2-Dibromoethane		50.0	54.6	ug/L	0.244	9.24	20	
1,3,5-Trimethylbenzene		50.0	54.3	ug/L	2.75	8.68	20	
1,3-Dichlorobenzene		50.0	54.1	ug/L	1.72	8.24	20	
1,3-Dichloropropane		50.0	54.9	ug/L	0.425	9.78	20	
1,4-Dichlorobenzene		50.0	52.6	ug/L	1.70	5.16	20	
1-Chlorohexane		50.0	55.0	ug/L	0.484	9.99	20	
2,2-Dichloropropane		50.0	56.9	ug/L	0.435	13.7	20	
2-Hexanone		50.0	48.1	ug/L	0.0540	3.85	20	
2-Chlorotoluene		50.0	50.0	ug/L	2.39	0.0608	20	
4-Chlorotoluene		50.0	57.7	ug/L	2.49	15.5	20	
Acetone		50.0	52.9	ug/L	0.0372	5.70	20	
Benzene		50.0	54.6	ug/L	1.13	9.21	20	
Bromobenzene		50.0	53.7	ug/L	0.881	7.42	20	
Bromochloromethane		50.0	54.6	ug/L	0.172	9.15	20	
Bromodichloromethane		50.0	57.6	ug/L	0.380	15.2	20	
Bromomethane		50.0	54.1	ug/L	0.161	8.13	20	
Carbon Disulfide		50.0	58.5	ug/L	0.881	17.1	20	
Carbon Tetrachloride		50.0	54.7	ug/L	0.411	9.31	20	
Chloroethane		50.0	53.6	ug/L	0.187	7.10	20	

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Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG611928-02
Instrument ID: HPMS8 Run Time: 08:01 Method: 8260B
File ID: 8M419224 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG611929 Cal ID: HPMS8 - 17-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	54.6	ug/L	0.318	9.17	20	
cis-1,3-Dichloropropene		50.0	59.3	ug/L	0.446	18.6	20	
Dibromochloromethane		50.0	57.6	ug/L	0.339	15.3	20	
Dibromomethane		50.0	56.1	ug/L	0.146	12.1	20	
Dichlorodifluoromethane		50.0	55.0	ug/L	0.372	10.0	20	
Hexachlorobutadiene		50.0	50.0	ug/L	0.437	0.0972	20	
Isopropylbenzene		50.0	55.5	ug/L	1.72	11.1	20	
Methylene Chloride		50.0	52.3	ug/L	0.272	4.55	20	
Methyl Tert Butyl Ether		50.0	53.5	ug/L	0.548	6.93	20	
2-Butanone		50.0	51.1	ug/L	0.0563	2.18	20	
4-Methyl-2-Pentanone		50.0	49.4	ug/L	0.0483	1.25	20	
n-Butylbenzene		50.0	56.1	ug/L	2.70	12.2	20	
n-Propylbenzene		50.0	54.4	ug/L	3.81	8.89	20	
m-,p-Xylene		100	114	ug/L	0.730	13.7	20	
Naphthalene		50.0	55.7	ug/L	1.50	11.5	20	
o-Xylene		50.0	54.0	ug/L	0.698	8.03	20	
p-Isopropyltoluene		50.0	54.5	ug/L	2.91	9.06	20	
sec-Butylbenzene		50.0	53.0	ug/L	3.36	6.00	20	
Styrene		50.0	59.4	ug/L	1.20	18.8	20	
Trichloroethene		50.0	52.5	ug/L	0.305	5.09	20	
tert-Butylbenzene		50.0	51.5	ug/L	0.591	3.05	20	
Tetrachloroethene		50.0	51.4	ug/L	0.300	2.78	20	
trans-1,2-Dichloroethene		50.0	53.1	ug/L	0.374	6.13	20	
trans-1,3-Dichloropropene		50.0	56.8	ug/L	0.459	13.6	20	
Trichlorofluoromethane		50.0	51.6	ug/L	0.448	3.27	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612029-02

Instrument ID: HPMS17 Run Time: 12:19 Method: 8260B

File ID: 17M0273104 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612030 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.2	ug/L	0.388	0.463	20	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.271	2.84	20	
Chloroform	CCC	50.0	48.1	ug/L	0.474	3.84	20	
Ethylbenzene	CCC	50.0	49.4	ug/L	0.541	1.21	20	
Toluene	CCC	50.0	49.4	ug/L	1.55	1.17	20	
Vinyl Chloride	CCC	50.0	51.1	ug/L	0.329	2.25	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	48.3	ug/L	0.649	3.48	20	
1,1-Dichloroethane	SPCC	50.0	49.8	ug/L	0.470	0.486	20	
Bromoform	SPCC	50.0	46.4	ug/L	0.271	7.19	20	
Chlorobenzene	SPCC	50.0	48.5	ug/L	1.02	2.98	20	
Chloromethane	SPCC	50.0	46.9	ug/L	0.273	6.17	20	
Xylenes		150	149	ug/L	0.648	0.638	20	
1,1,1,2-Tetrachloroethane		50.0	47.7	ug/L	0.390	4.65	20	
1,1,1-Trichloroethane		50.0	49.2	ug/L	0.426	1.58	20	
1,1,2-Trichloroethane		50.0	45.2	ug/L	0.275	9.63	20	
1,1-Dichloropropene		50.0	49.7	ug/L	0.338	0.618	20	
1,2,3-Trichlorobenzene		50.0	45.3	ug/L	1.09	9.41	20	
1,2,3-Trichloropropane		50.0	44.1	ug/L	0.176	11.7	20	
1,2,4-Trichlorobenzene		50.0	48.9	ug/L	1.21	2.15	20	
1,2,4-Trimethylbenzene		50.0	51.0	ug/L	2.87	1.95	20	
1,2-Dichloroethane		50.0	46.3	ug/L	0.307	7.32	20	
1,2-Dichlorobenzene		50.0	47.8	ug/L	1.60	4.33	20	
1,2-Dibromo-3-Chloropropane		50.0	47.3	ug/L	0.117	5.44	20	
1,2-Dibromoethane		50.0	44.6	ug/L	0.278	10.8	20	
1,3,5-Trimethylbenzene		50.0	51.1	ug/L	2.85	2.24	20	
1,3-Dichlorobenzene		50.0	49.9	ug/L	1.71	0.132	20	
1,3-Dichloropropane		50.0	46.2	ug/L	0.446	7.62	20	
1,4-Dichlorobenzene		50.0	48.5	ug/L	1.68	3.02	20	
1-Chlorohexane		50.0	52.8	ug/L	0.0897	5.65	20	
2,2-Dichloropropane		50.0	54.7	ug/L	0.410	9.41	20	
2-Hexanone		50.0	41.5	ug/L	0.132	17.1	20	
2-Chlorotoluene		50.0	50.1	ug/L	2.28	0.142	20	
4-Chlorotoluene		50.0	51.0	ug/L	2.32	2.10	20	
Acetone		50.0	41.4	ug/L	0.0417	17.1	20	
Benzene		50.0	48.3	ug/L	1.03	3.35	20	
Bromobenzene		50.0	47.5	ug/L	0.935	4.96	20	
Bromochloromethane		50.0	47.8	ug/L	0.183	4.44	20	
Bromodichloromethane		50.0	48.0	ug/L	0.358	3.94	20	
Bromomethane		50.0	37.3	ug/L	0.178	25.5	20	*
Carbon Disulfide		50.0	50.5	ug/L	0.837	0.928	20	
Carbon Tetrachloride		50.0	50.1	ug/L	0.390	0.217	20	
Chloroethane		50.0	46.5	ug/L	0.142	6.93	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/28/2017 Sample ID: WG612029-02

Instrument ID: HPMS17 Run Time: 12:19 Method: 8260B

File ID: 17M0273104 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612030 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	48.1	ug/L	0.286	3.86	20	
cis-1,3-Dichloropropene		50.0	50.8	ug/L	0.427	1.63	20	
Dibromochloromethane		50.0	46.7	ug/L	0.387	6.61	20	
Dibromomethane		50.0	45.8	ug/L	0.150	8.32	20	
Dichlorodifluoromethane		50.0	55.5	ug/L	0.330	11.1	20	
Hexachlorobutadiene		50.0	47.3	ug/L	0.667	5.31	20	
Isopropylbenzene		50.0	49.6	ug/L	1.67	0.856	20	
Methylene Chloride		50.0	46.2	ug/L	0.271	7.63	20	
Methyl Tert Butyl Ether		50.0	44.7	ug/L	0.596	10.7	20	
2-Butanone		50.0	42.9	ug/L	0.0643	14.2	20	
4-Methyl-2-Pentanone		50.0	41.3	ug/L	0.0573	17.5	20	
n-Butylbenzene		50.0	54.6	ug/L	2.70	9.15	20	
n-Propylbenzene		50.0	52.1	ug/L	3.85	4.24	20	
m-,p-Xylene		100	101	ug/L	0.664	0.548	20	
Naphthalene		50.0	43.7	ug/L	2.12	12.5	20	
o-Xylene		50.0	48.5	ug/L	0.631	3.01	20	
p-Isopropyltoluene		50.0	52.0	ug/L	3.04	3.96	20	
sec-Butylbenzene		50.0	51.1	ug/L	3.51	2.18	20	
Styrene		50.0	50.8	ug/L	1.06	1.69	20	
Trichloroethene		50.0	46.1	ug/L	0.295	7.78	20	
tert-Butylbenzene		50.0	48.9	ug/L	0.545	2.15	20	
Tetrachloroethene		50.0	48.8	ug/L	0.436	2.45	20	
trans-1,2-Dichloroethene		50.0	49.0	ug/L	0.258	1.95	20	
trans-1,3-Dichloropropene		50.0	49.0	ug/L	0.350	2.00	20	
Trichlorofluoromethane		50.0	54.3	ug/L	0.448	8.58	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/29/2017 Sample ID: WG612121-02

Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B

File ID: 11M17869 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.5	ug/L	0.434	2.91	20	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.323	5.36	20	
Chloroform	CCC	50.0	48.9	ug/L	0.445	2.24	20	
Ethylbenzene	CCC	50.0	49.6	ug/L	0.540	0.807	20	
Toluene	CCC	50.0	44.5	ug/L	1.44	10.9	20	
Vinyl Chloride	CCC	50.0	54.0	ug/L	0.232	7.97	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.5	ug/L	0.716	8.92	20	
1,1-Dichloroethane	SPCC	50.0	47.5	ug/L	0.545	4.92	20	
Bromoform	SPCC	50.0	47.2	ug/L	0.257	5.67	20	
Chlorobenzene	SPCC	50.0	45.9	ug/L	0.944	8.29	20	
Chloromethane	SPCC	50.0	37.7	ug/L	0.228	24.5	20	*
Xylenes		150	144	ug/L	0.629	4.13	20	
1,1,1,2-Tetrachloroethane		50.0	47.6	ug/L	0.365	4.81	20	
1,1,1-Trichloroethane		50.0	48.8	ug/L	0.394	2.39	20	
1,1,2-Trichloroethane		50.0	45.8	ug/L	0.313	8.49	20	
1,1-Dichloropropene		50.0	48.4	ug/L	0.343	3.18	20	
1,2,3-Trichlorobenzene		50.0	49.6	ug/L	1.11	0.870	20	
1,2,3-Trichloropropane		50.0	44.1	ug/L	0.199	11.8	20	
1,2,4-Trichlorobenzene		50.0	53.6	ug/L	1.18	7.13	20	
1,2,4-Trimethylbenzene		50.0	49.5	ug/L	2.48	1.08	20	
1,2-Dichloroethane		50.0	47.6	ug/L	0.372	4.85	20	
1,2-Dichlorobenzene		50.0	48.7	ug/L	1.49	2.61	20	
1,2-Dibromo-3-Chloropropane		50.0	46.4	ug/L	0.128	7.14	20	
1,2-Dibromoethane		50.0	46.7	ug/L	0.287	6.58	20	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.790	20	
1,3-Dichlorobenzene		50.0	50.6	ug/L	1.54	1.23	20	
1,3-Dichloropropane		50.0	46.0	ug/L	0.521	8.09	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.54	5.30	20	
1-Chlorohexane		50.0	55.5	ug/L	0.512	10.9	20	
2,2-Dichloropropane		50.0	50.6	ug/L	0.392	1.21	20	
2-Hexanone		50.0	45.0	ug/L	0.256	9.91	20	
2-Chlorotoluene		50.0	45.3	ug/L	2.16	9.42	20	
4-Chlorotoluene		50.0	48.4	ug/L	2.08	3.25	20	
Acetone		50.0	42.4	ug/L	0.0709	15.2	20	
Benzene		50.0	45.6	ug/L	1.00	8.74	20	
Bromobenzene		50.0	48.7	ug/L	0.831	2.58	20	
Bromochloromethane		50.0	45.8	ug/L	0.171	8.50	20	
Bromodichloromethane		50.0	48.7	ug/L	0.347	2.61	20	
Bromomethane		50.0	44.6	ug/L	0.198	10.9	20	
Carbon Disulfide		50.0	50.3	ug/L	0.768	0.604	20	
Carbon Tetrachloride		50.0	49.1	ug/L	0.343	1.77	20	
Chloroethane		50.0	47.8	ug/L	0.212	4.43	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041200 Run Date: 04/29/2017 Sample ID: WG612121-02
Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B
File ID: 11M17869 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	47.3	ug/L	0.288	5.48	20	
cis-1,3-Dichloropropene		50.0	50.8	ug/L	0.429	1.52	20	
Dibromochloromethane		50.0	49.4	ug/L	0.376	1.12	20	
Dibromomethane		50.0	46.8	ug/L	0.151	6.43	20	
Dichlorodifluoromethane		50.0	50.7	ug/L	0.311	1.40	20	
Hexachlorobutadiene		50.0	50.9	ug/L	0.593	1.78	20	
Isopropylbenzene		50.0	48.0	ug/L	1.54	4.05	20	
Methylene Chloride		50.0	45.2	ug/L	0.269	9.69	20	
Methyl Tert Butyl Ether		50.0	46.4	ug/L	0.693	7.11	20	
2-Butanone		50.0	45.7	ug/L	0.125	8.56	20	
4-Methyl-2-Pentanone		50.0	44.1	ug/L	0.106	11.7	20	
n-Butylbenzene		50.0	54.3	ug/L	2.47	8.66	20	
n-Propylbenzene		50.0	48.0	ug/L	3.36	3.99	20	
m-,p-Xylene		100	95.1	ug/L	0.619	4.90	20	
Naphthalene		50.0	48.5	ug/L	2.38	3.07	20	
o-Xylene		50.0	48.7	ug/L	0.639	2.59	20	
p-Isopropyltoluene		50.0	51.5	ug/L	2.62	3.00	20	
sec-Butylbenzene		50.0	47.6	ug/L	3.02	4.74	20	
Styrene		50.0	53.7	ug/L	1.05	7.47	20	
Trichloroethene		50.0	45.5	ug/L	0.262	8.98	20	
tert-Butylbenzene		50.0	46.2	ug/L	0.539	7.52	20	
Tetrachloroethene		50.0	49.1	ug/L	0.316	1.76	20	
trans-1,2-Dichloroethene		50.0	45.8	ug/L	0.249	8.49	20	
trans-1,3-Dichloropropene		50.0	51.2	ug/L	0.523	2.34	20	
Trichlorofluoromethane		50.0	49.7	ug/L	0.372	0.670	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS6
Workgroup (AAB#): WG611922

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041200-50	1.00	01	195637	397763	576587
L17041200-51	1.00	01	193223	392537	567154
L17041200-52	1.00	01	190664	385997	561744
L17041200-53	1.00	01	191480	389847	563548
L17041200-54	1.00	01	190302	389704	564620
L17041200-55	1.00	01	189769	386751	557181
L17041200-56	1.00	01	191240	389848	563918
L17041200-57	1.00	01	216697	409437	593344
L17041200-58	1.00	01	222831	437059	630993
L17041200-59	1.00	01	188035	381477	554487
WG611922-01	1.00	01	201980	403127	587274
WG611922-02	1.00	01	224441	424126	613920
WG611922-03	1.00	01	207516	417470	613072

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5268571
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS11
Workgroup (AAB#): WG611925

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	178101	320836	445066
Upper Limit	NA	NA	356202	641672	890132
Lower Limit	NA	NA	89051	160418	222533
L17041200-02	1.00	01	123719	232928	327307
L17041200-03	1.00	01	126237	236268	332412
L17041200-04	1.00	01	122106	238929	339430
L17041200-05	1.00	01	126559	236249	332494
L17041200-06	1.00	01	126982	237739	336064
L17041200-07	1.00	01	126882	239563	334325
L17041200-08	1.00	01	124375	235649	333771
L17041200-09	1.00	01	127671	240537	340437
L17041200-10	1.00	01	121132	240758	340903
L17041200-11	1.00	01	125928	237792	336003
L17041200-12	1.00	01	139142	249745	346745
L17041200-13	1.00	01	141809	255869	350112
L17041200-14	1.00	01	119422	227503	319084
L17041200-15	1.00	01	124350	232005	326250
WG611925-01	1.00	01	128681	243342	340536
WG611925-02	1.00	01	138352	242025	334861

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5268571
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17041200
Instrument ID:HPMS8
Workgroup (AAB#):WG611929

ICAL CCV Number:WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	355416	667165	830845
Upper Limit	NA	NA	710832	1334330	1661690
Lower Limit	NA	NA	177708	333583	415423
L17041200-16	1.00	01	304564	600983	742600
L17041200-17	1.00	01	301434	587690	725194
L17041200-18	1.00	01	287989	568132	705811
L17041200-19	1.00	01	291562	566714	699973
L17041200-20	1.00	01	278704	554641	691765
L17041200-21	1.00	01	277113	551603	694248
L17041200-22	1.00	01	275486	545447	679291
L17041200-23	1.00	01	271206	536474	665435
L17041200-24	1.00	01	267068	534282	664910
L17041200-25	1.00	01	268945	529693	661982
L17041200-26	1.00	01	264898	519915	651814
L17041200-27	1.00	01	260689	528740	658087
L17041200-28	1.00	01	266489	524672	653564
L17041200-29	1.00	01	258567	520456	647174
L17041200-30	1.00	01	257165	515775	645156
L17041200-31	1.00	01	260213	519404	634849
L17041200-32	1.00	01	254141	504199	629231
L17041200-33	1.00	01	249796	506719	626005
WG611929-01	1.00	01	299428	586669	724893
WG611929-02	1.00	01	335593	622640	757341
WG611929-03	1.00	01	348410	644046	796613

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5268571
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS17
Workgroup (AAB#): WG612030

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041200-34	1.00	01	132615	280333	378640
L17041200-35	1.00	01	131610	277835	375767
L17041200-36	1.00	01	126736	265715	363336
L17041200-37	1.00	01	132290	273123	372663
L17041200-38	1.00	01	133483	278196	373368
L17041200-39	1.00	01	130209	272724	371071
L17041200-40	1.00	01	125926	265932	365542
L17041200-41	1.00	01	126866	271244	370445
L17041200-42	1.00	01	129185	268976	368594
L17041200-43	1.00	01	133540	274266	371688
L17041200-44	1.00	01	127945	265716	361885
L17041200-45	1.00	01	135548	275028	367201
L17041200-46	1.00	01	128130	270084	366945
L17041200-47	1.00	01	129470	270798	365352
L17041200-48	1.00	01	127940	266008	363818
L17041200-49	1.00	01	128136	268216	366146
WG612030-01	1.00	01	129762	271660	372168
WG612030-02	1.00	01	138671	276134	372242

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5268571
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS11
Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08
CAL ID: HPMS11 - 24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	178101	320836	445066
Upper Limit	NA	NA	356202	641672	890132
Lower Limit	NA	NA	89051	160418	222533
L17041200-01	1.00	01	122428	239321	344749
WG612123-01	1.00	01	132987	250807	353206
WG612123-02	1.00	01	143146	255038	355789

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5268571
Report generated 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS6
Workgroup (AAB#): WG611922

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041200-50	1.00	01	18.16	15.13	11.25
L17041200-51	1.00	01	18.16	15.13	11.25
L17041200-52	1.00	01	18.16	15.13	11.25
L17041200-53	1.00	01	18.16	15.13	11.25
L17041200-54	1.00	01	18.16	15.13	11.25
L17041200-55	1.00	01	18.16	15.13	11.25
L17041200-56	1.00	01	18.16	15.13	11.25
L17041200-57	1.00	01	18.16	15.13	11.25
L17041200-58	1.00	01	18.16	15.13	11.25
L17041200-59	1.00	01	18.16	15.13	11.25
WG611922-01	1.00	01	18.16	15.13	11.25
WG611922-02	1.00	01	18.16	15.13	11.25
WG611922-03	1.00	01	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5268572
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17041200
Instrument ID:HPMS8
Workgroup (AAB#):WG611929

ICAL CCV Number:WG610410-08
CAL ID: HPMS8-17-APR-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG610410-08	NA	NA	17.83	14.8	10.93
Upper Limit	NA	NA	18.33	15.3	11.43
Lower Limit	NA	NA	17.33	14.3	10.43
L17041200-16	1.00	01	17.81	14.79	10.92
L17041200-17	1.00	01	17.81	14.79	10.92
L17041200-18	1.00	01	17.81	14.79	10.92
L17041200-19	1.00	01	17.81	14.79	10.92
L17041200-20	1.00	01	17.82	14.79	10.92
L17041200-21	1.00	01	17.82	14.79	10.93
L17041200-22	1.00	01	17.82	14.79	10.92
L17041200-23	1.00	01	17.81	14.79	10.92
L17041200-24	1.00	01	17.82	14.79	10.92
L17041200-25	1.00	01	17.82	14.79	10.92
L17041200-26	1.00	01	17.82	14.79	10.92
L17041200-27	1.00	01	17.81	14.79	10.92
L17041200-28	1.00	01	17.82	14.79	10.93
L17041200-29	1.00	01	17.81	14.79	10.92
L17041200-30	1.00	01	17.81	14.79	10.92
L17041200-31	1.00	01	17.82	14.79	10.92
L17041200-32	1.00	01	17.82	14.79	10.92
L17041200-33	1.00	01	17.81	14.79	10.92
WG611929-01	1.00	01	17.82	14.79	10.92
WG611929-02	1.00	01	17.82	14.79	10.92
WG611929-03	1.00	01	17.81	14.79	10.92

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
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Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS11
Workgroup (AAB#): WG611925

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	16.96	14.14	10.53
Upper Limit	NA	NA	17.46	14.64	11.03
Lower Limit	NA	NA	16.46	13.64	10.03
L17041200-02	1.00	01	16.96	14.14	10.52
L17041200-03	1.00	01	16.96	14.14	10.52
L17041200-04	1.00	01	16.96	14.14	10.52
L17041200-05	1.00	01	16.96	14.14	10.52
L17041200-06	1.00	01	16.96	14.14	10.52
L17041200-07	1.00	01	16.96	14.14	10.52
L17041200-08	1.00	01	16.96	14.14	10.52
L17041200-09	1.00	01	16.96	14.14	10.52
L17041200-10	1.00	01	16.96	14.14	10.53
L17041200-11	1.00	01	16.96	14.14	10.53
L17041200-12	1.00	01	16.96	14.14	10.52
L17041200-13	1.00	01	16.96	14.14	10.52
L17041200-14	1.00	01	16.96	14.14	10.52
L17041200-15	1.00	01	16.96	14.14	10.52
WG611925-01	1.00	01	16.96	14.14	10.52
WG611925-02	1.00	01	16.96	14.14	10.53

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5268572
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS11
Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	16.96	14.14	10.53
Upper Limit	NA	NA	17.46	14.64	11.03
Lower Limit	NA	NA	16.46	13.64	10.03
L17041200-01	1.00	01	16.96	14.14	10.52
WG612123-01	1.00	01	16.96	14.14	10.53
WG612123-02	1.00	01	16.96	14.14	10.52

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5268572
Report generated: 05/02/2017 16:42

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041200
Instrument ID: HPMS17
Workgroup (AAB#): WG612030

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041200-34	1.00	01	9.36	8.05	5.27
L17041200-35	1.00	01	9.36	8.05	5.28
L17041200-36	1.00	01	9.36	8.05	5.27
L17041200-37	1.00	01	9.36	8.05	5.27
L17041200-38	1.00	01	9.36	8.05	5.27
L17041200-39	1.00	01	9.36	8.05	5.28
L17041200-40	1.00	01	9.36	8.05	5.28
L17041200-41	1.00	01	9.36	8.05	5.27
L17041200-42	1.00	01	9.36	8.05	5.28
L17041200-43	1.00	01	9.36	8.05	5.27
L17041200-44	1.00	01	9.36	8.05	5.27
L17041200-45	1.00	01	9.36	8.05	5.27
L17041200-46	1.00	01	9.36	8.05	5.27
L17041200-47	1.00	01	9.36	8.05	5.27
L17041200-48	1.00	01	9.36	8.05	5.27
L17041200-49	1.00	01	9.36	8.05	5.28
WG612030-01	1.00	01	9.36	8.05	5.27
WG612030-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5268572
Report generated: 05/02/2017 16:42

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17880.D Vial: 12
Acq On : 30 Apr 2017 00:17 Operator: TMB
Sample : L17041200-01 B 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

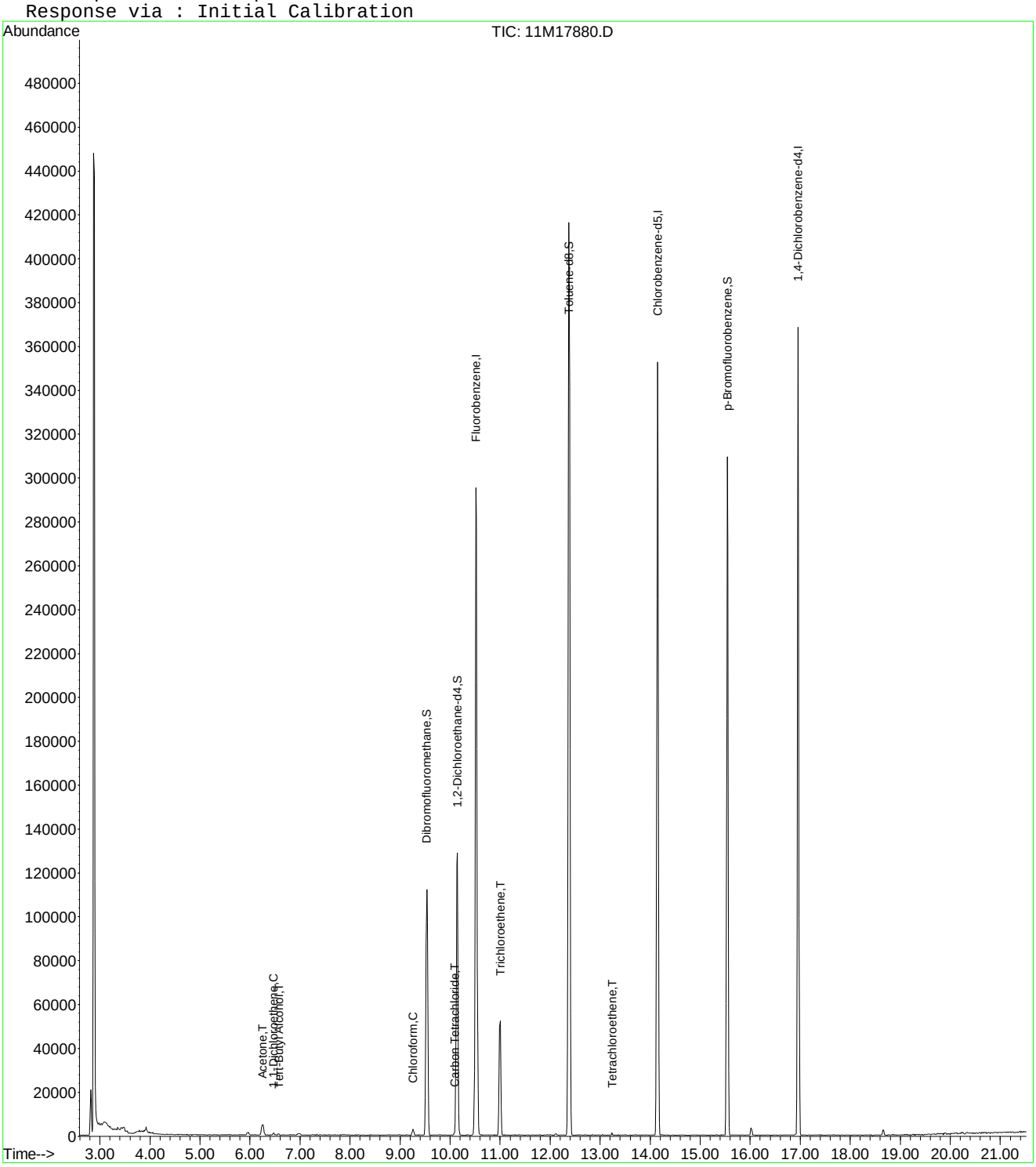
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	344749	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	239321	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	122428	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	91668	26.8442	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 107.36%			
43) 1,2-Dichloroethane-d4	10.14	65	107906	27.2298	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.92%			
57) Toluene-d8	12.38	98	352526	28.3685	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 113.48%#			
78) p-Bromofluorobenzene	15.54	95	126286	29.6775	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 118.72%#			
Target Compounds						Qvalue
13) Acetone	6.25	43	10983	9.5280	ug/L	91
14) 1,1-Dichloroethene	6.46	61	1249	0.2029	ug/L #	48
15) Tert-Butyl Alcohol	6.58	59	1050	2.4354	ug/L #	60
33) Chloroform	9.25	83	3231	0.3235	ug/L	97
41) Carbon Tetrachloride	10.09	117	1310	0.2720	ug/L #	85
46) Trichloroethene	11.00	130	22222	5.6073	ug/L	98
64) Tetrachloroethene	13.25	164	502	0.1632	ug/L #	59

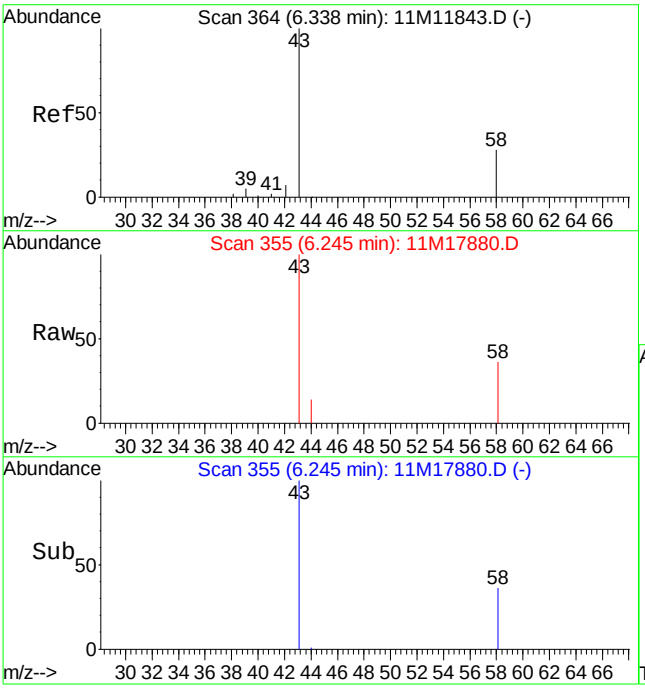
(#) = qualifier out of range (m) = manual integration
11M17880.D 8260WT.M Sun Apr 30 12:52:06 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17880.D Vial: 12
Acq On : 30 Apr 2017 00:17 Operator: TMB
Sample : L17041200-01 B 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

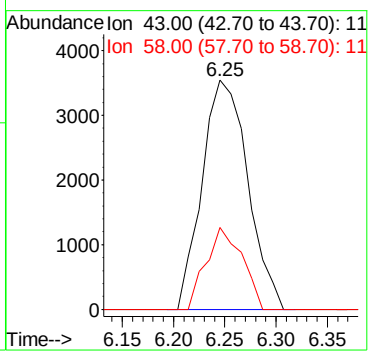


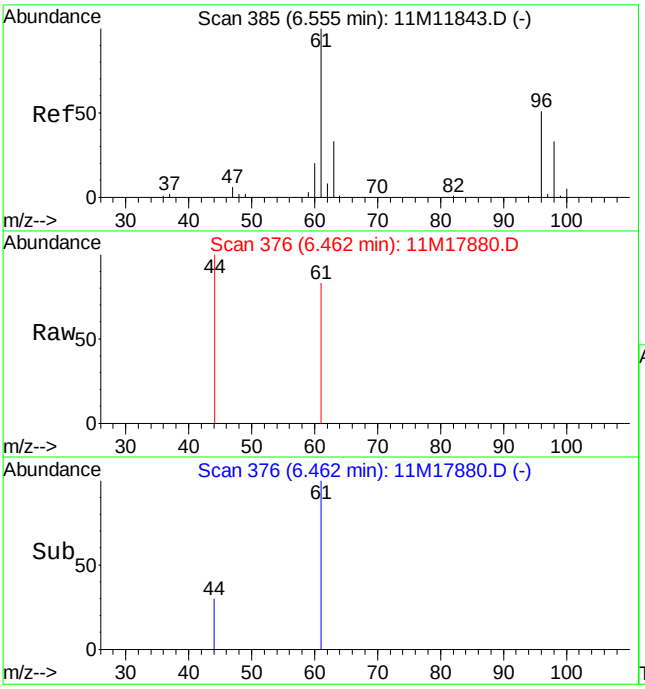


#13
Acetone
Concen: 9.53 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion: 43 Resp: 10983

Ion	Ratio	Lower	Upper
43	100		
58	28.2	20.1	46.9

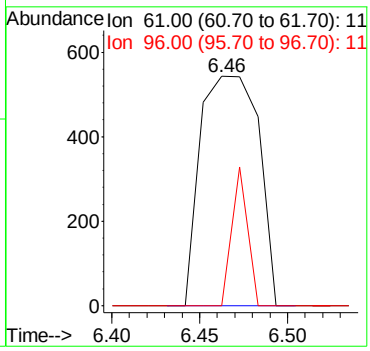


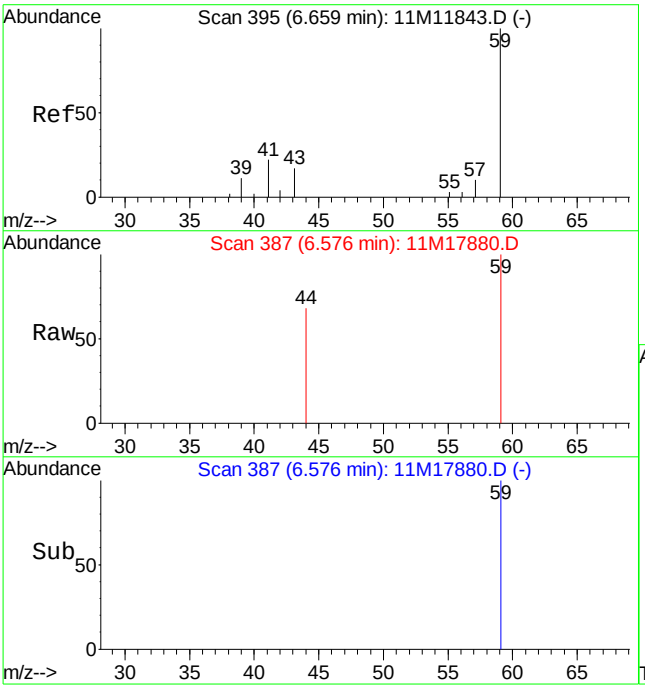


#14
1,1-Dichloroethene
Concen: 0.20 ug/L
RT: 6.46 min Scan# 376
Delta R.T. -0.01 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion: 61 Resp: 1249

Ion	Ratio	Lower	Upper
61	100		
96	16.3	32.2	75.2#

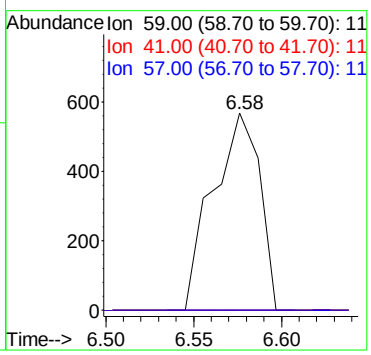


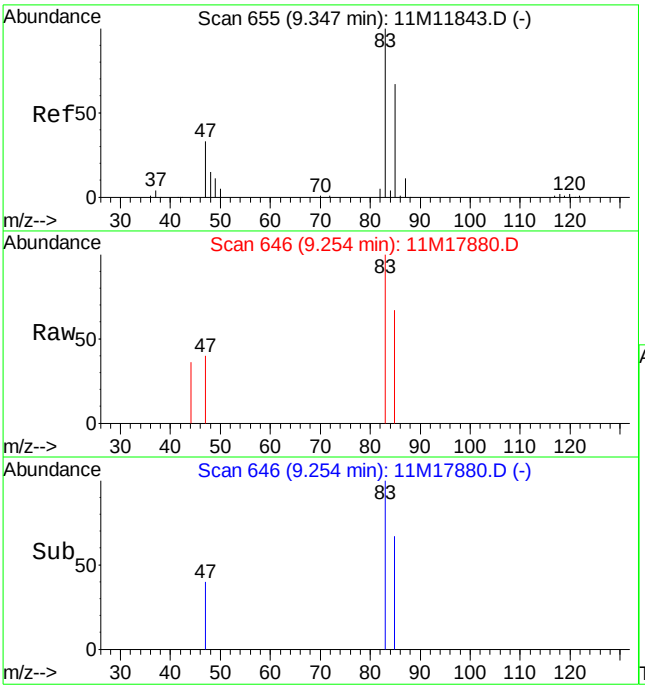


#15
Tert-Butyl Alcohol
Concen: 2.44 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion: 59 Resp: 1050

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

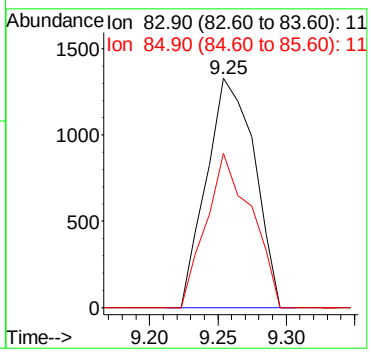


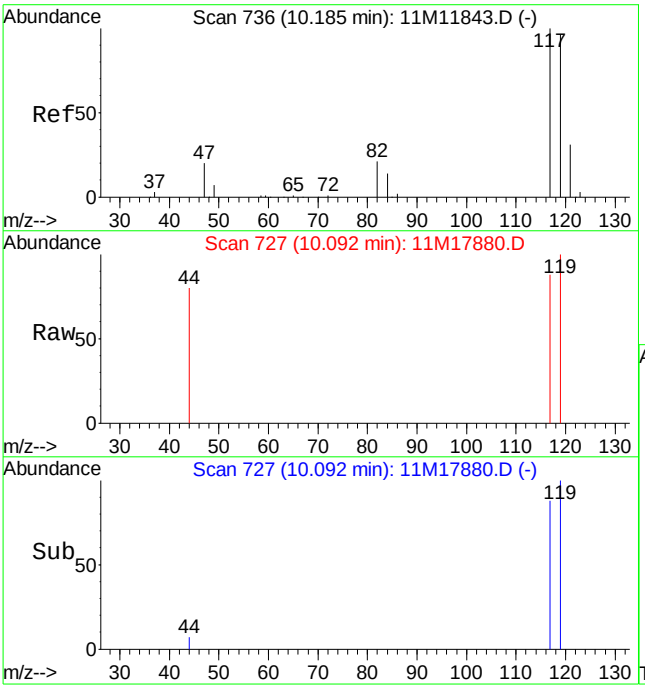


#33
Chloroform
Concen: 0.32 ug/L
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion: 83 Resp: 3231

Ion	Ratio	Lower	Upper
83	100		
85	63.6	39.4	92.0

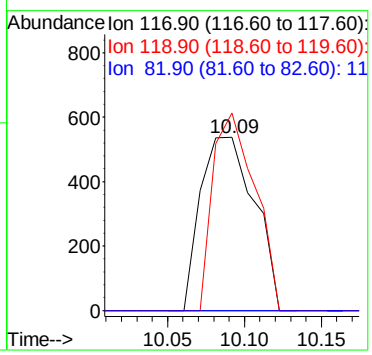


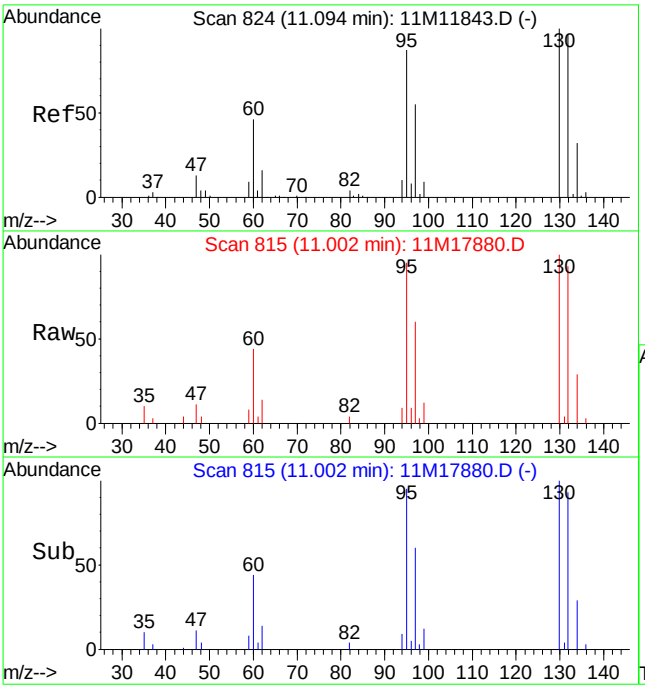


#41
Carbon Tetrachloride
Concen: 0.27 ug/L
RT: 10.09 min Scan# 727
Delta R.T. 0.00 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion:117 Resp: 1310

Ion	Ratio	Lower	Upper
117	100		
119	89.4	58.1	135.7
82	0.0	13.7	32.1#

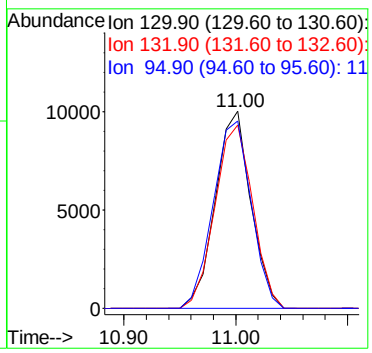


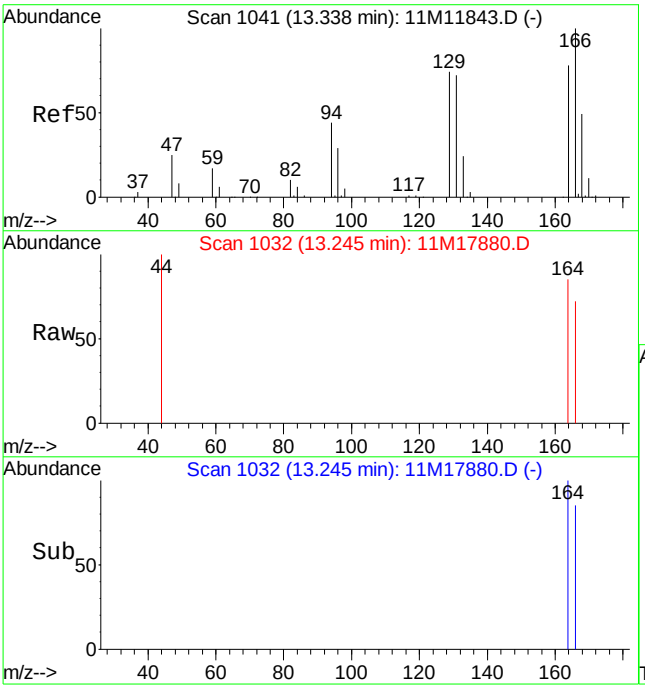


#46
Trichloroethene
Concen: 5.61 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion:130 Resp: 22222

Ion	Ratio	Lower	Upper
130	100		
132	98.4	58.2	135.8
95	101.0	59.0	137.8

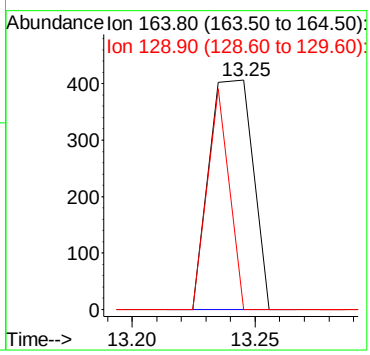




#64
Tetrachloroethene
Concen: 0.16 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17880.D
Acq: 30 Apr 2017 00:17

Tgt Ion:164 Resp: 502

Ion	Ratio	Lower	Upper
164	100		
129	48.4	51.8	120.8#



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17846.D Vial: 19
Acq On : 28 Apr 2017 16:15 Operator: TMB
Sample : L17041200-02 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

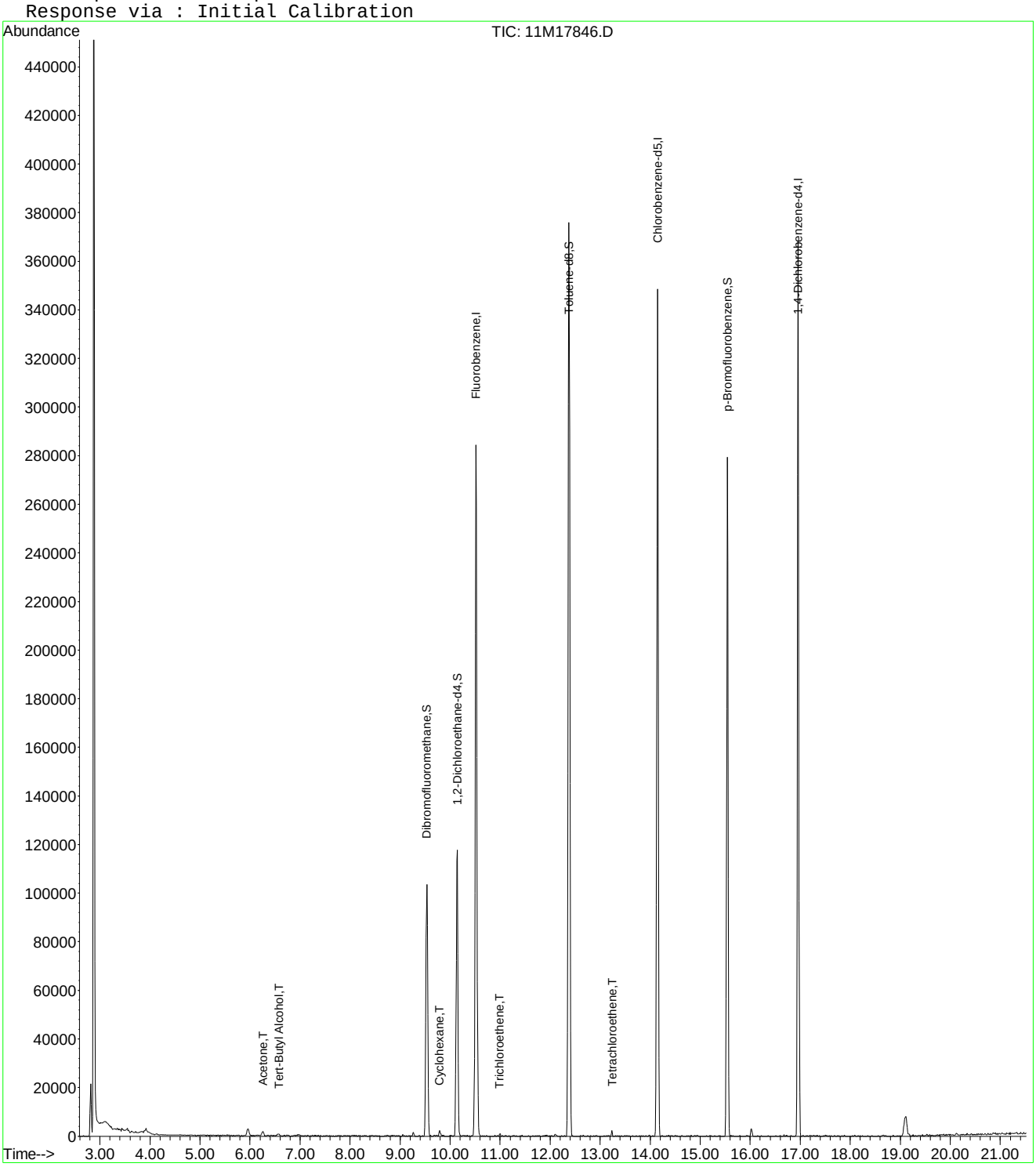
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	327307	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	232928	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	123719	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82914	25.5745	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.28%			
43) 1,2-Dichloroethane-d4	10.14	65	101635	27.0140	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.04%			
57) Toluene-d8	12.38	98	319918	26.4511	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.80%			
78) p-Bromofluorobenzene	15.54	95	113734	26.4488	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.80%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	189	Below Cal	#	40
13) Acetone	6.26	43	3075	2.8098	ug/L	77
15) Tert-Butyl Alcohol	6.58	59	1376	3.3616	ug/L #	60
39) Cyclohexane	9.78	56	2204	0.2965	ug/L #	74
46) Trichloroethene	10.99	130	482	0.1281	ug/L #	46
64) Tetrachloroethene	13.25	164	623	0.2081	ug/L	88

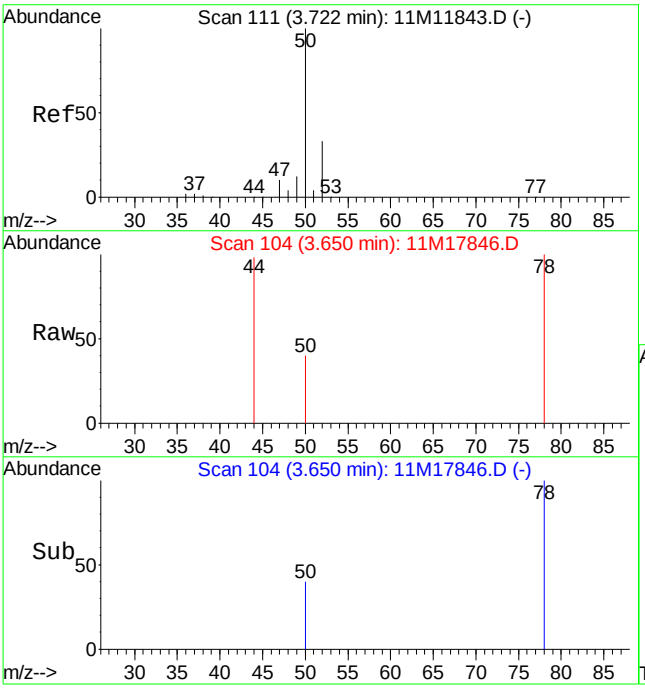
(#) = qualifier out of range (m) = manual integration
11M17846.D 8260WT.M Sun Apr 30 15:39:59 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17846.D Vial: 19
Acq On : 28 Apr 2017 16:15 Operator: TMB
Sample : L17041200-02 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

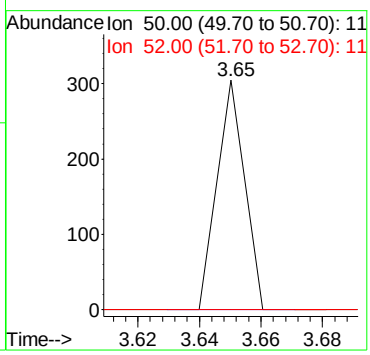


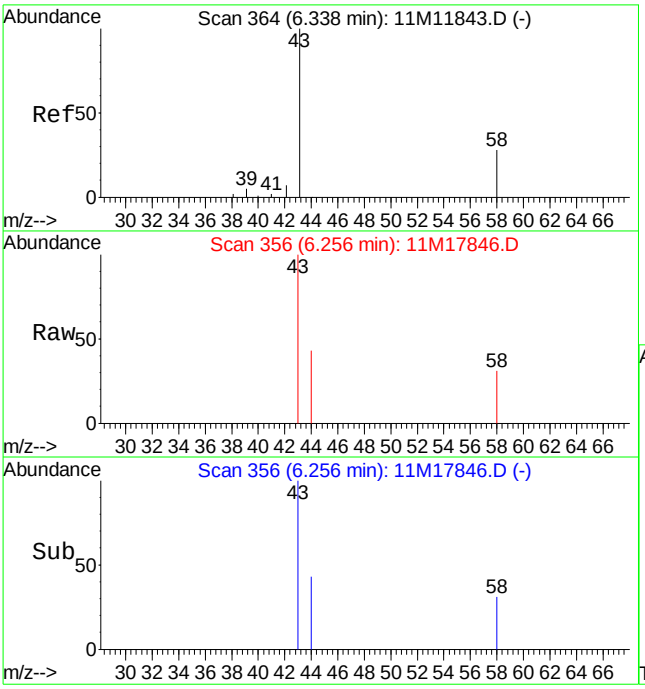


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion: 50 Resp: 189

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

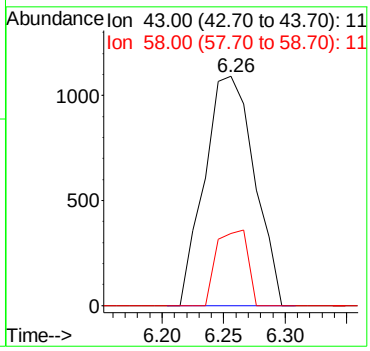


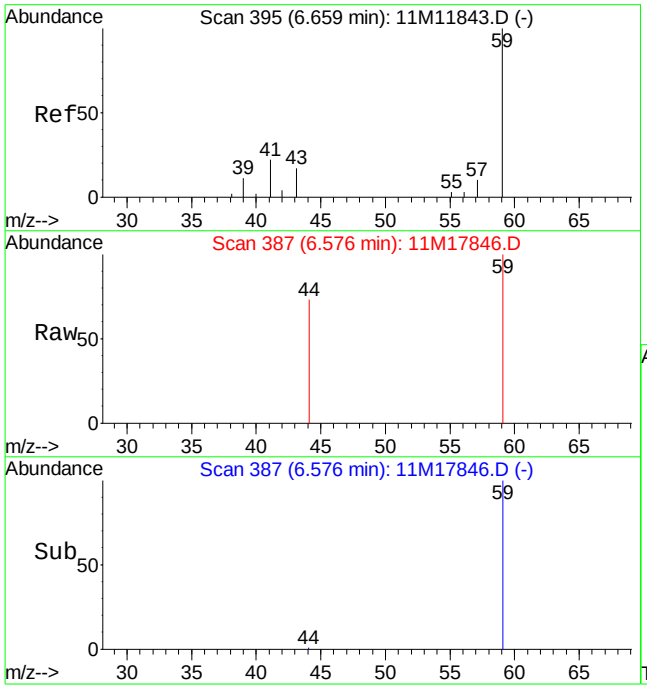


#13
Acetone
Concen: 2.81 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion: 43 Resp: 3075

Ion	Ratio	Lower	Upper
43	100		
58	20.5	20.1	46.9

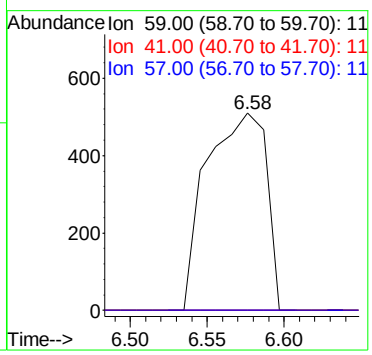


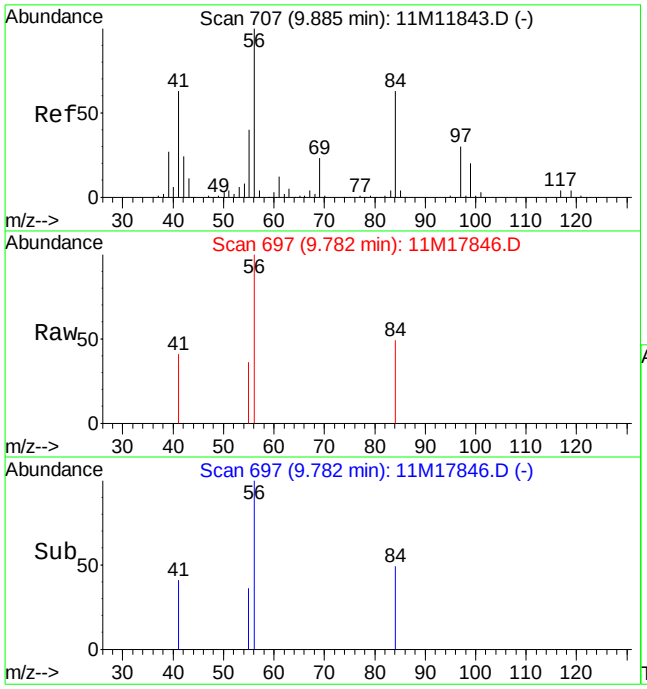


#15
Tert-Butyl Alcohol
Concen: 3.36 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion: 59 Resp: 1376

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

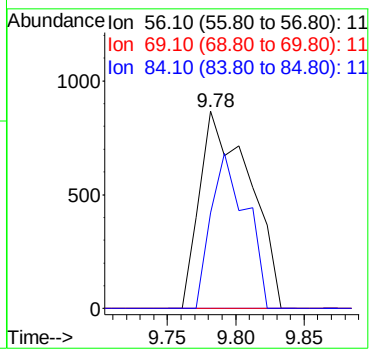


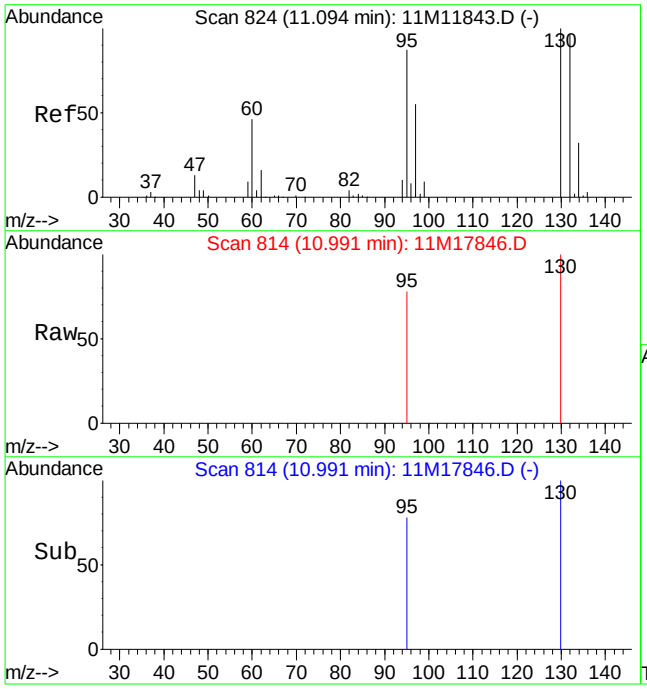


#39
Cyclohexane
Concen: 0.30 ug/L
RT: 9.78 min Scan# 697
Delta R.T. -0.02 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion: 56 Resp: 2204

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	55.6	41.6	97.0

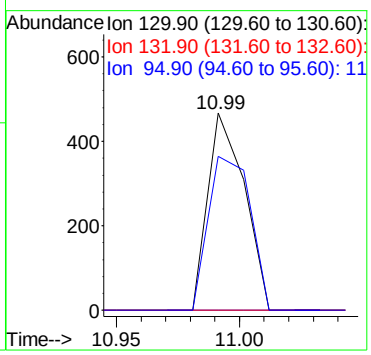


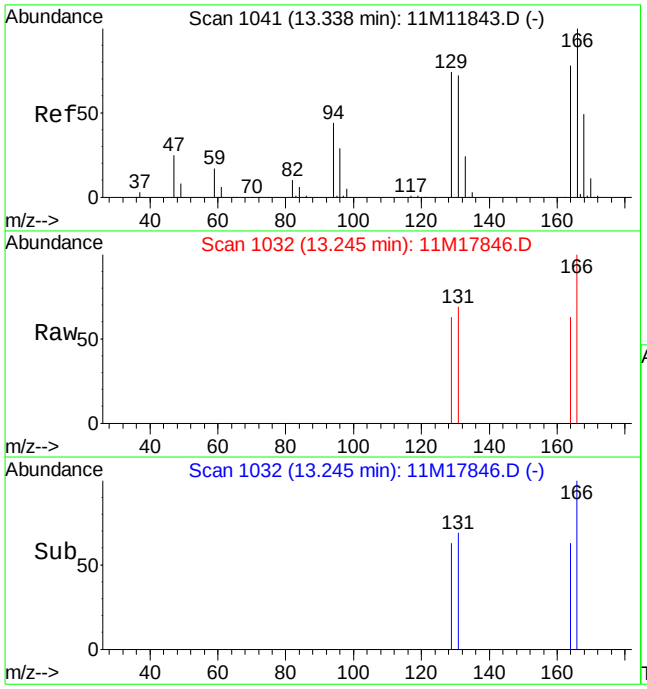


#46
Trichloroethene
Concen: 0.13 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.01 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion:130 Resp: 482

Ion	Ratio	Lower	Upper
130	100		
132	0.0	58.2	135.8#
95	89.4	59.0	137.8

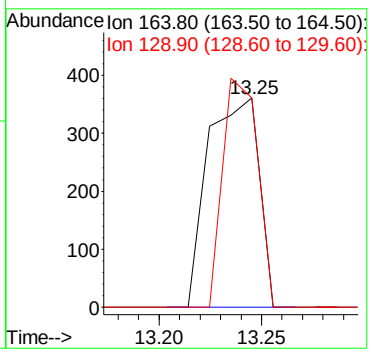




#64
Tetrachloroethene
Concen: 0.21 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17846.D
Acq: 28 Apr 2017 16:15

Tgt Ion:164 Resp: 623

Ion	Ratio	Lower	Upper
164	100		
129	75.3	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17845.D Vial: 18
Acq On : 28 Apr 2017 15:46 Operator: TMB
Sample : L17041200-03 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

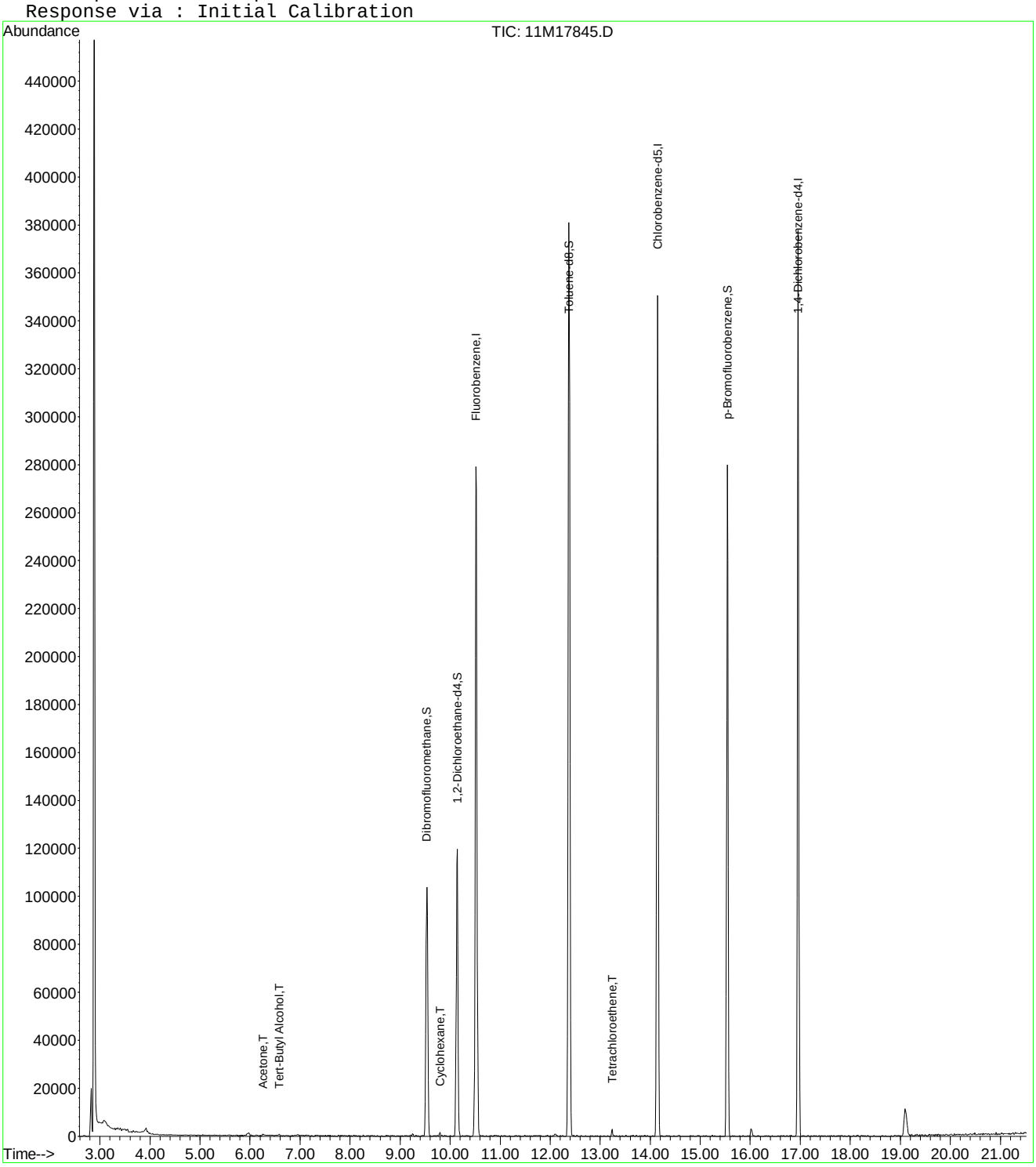
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	332412	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	236268	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126237	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83187	25.2647	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.04%			
43) 1,2-Dichloroethane-d4	10.14	65	102058	26.7099	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.84%			
57) Toluene-d8	12.38	98	324445	26.4462	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.80%			
78) p-Bromofluorobenzene	15.54	95	114370	26.0662	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.28%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	430	Below Cal	#	40
13) Acetone	6.26	43	1237	1.1130	ug/L #	41
15) Tert-Butyl Alcohol	6.59	59	1407	3.3845	ug/L #	60
33) Chloroform	9.26	83	707	Below Cal	#	65
39) Cyclohexane	9.80	56	1125	0.1490	ug/L #	80
64) Tetrachloroethene	13.25	164	1042	0.3432	ug/L	85

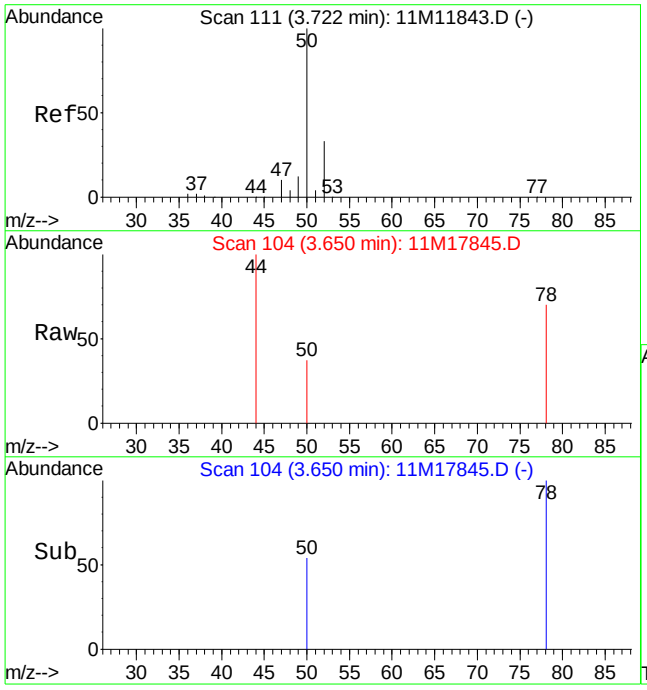
(#) = qualifier out of range (m) = manual integration
11M17845.D 8260WT.M Sun Apr 30 15:39:57 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17845.D Vial: 18
Acq On : 28 Apr 2017 15:46 Operator: TMB
Sample : L17041200-03 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

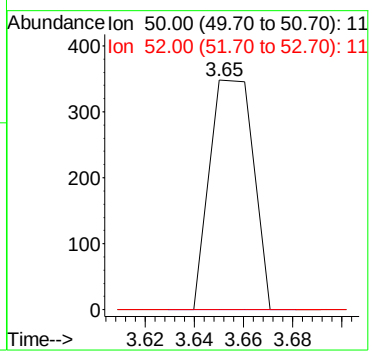


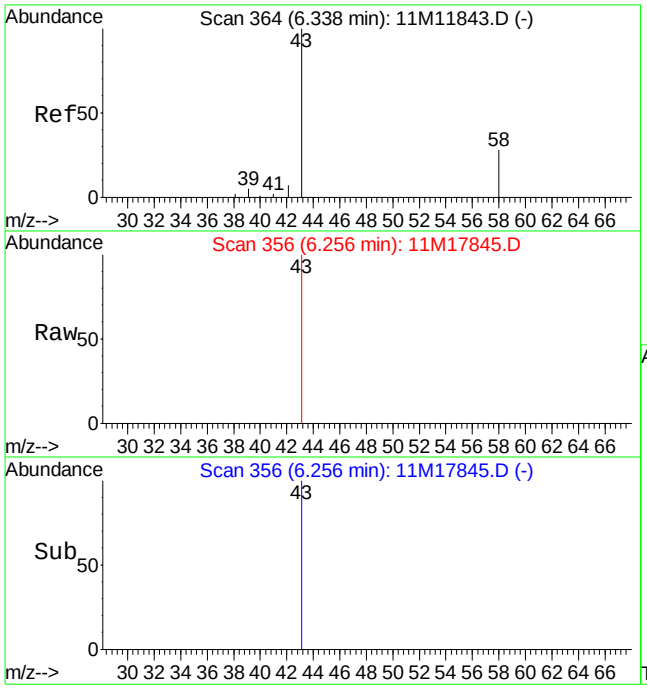


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17845.D
Acq: 28 Apr 2017 15:46

Tgt Ion: 50 Resp: 430

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

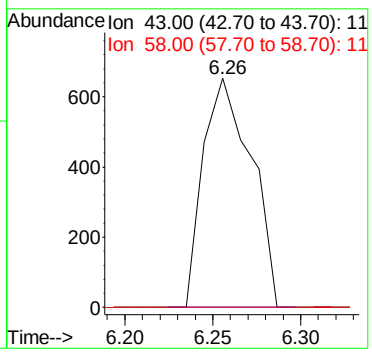


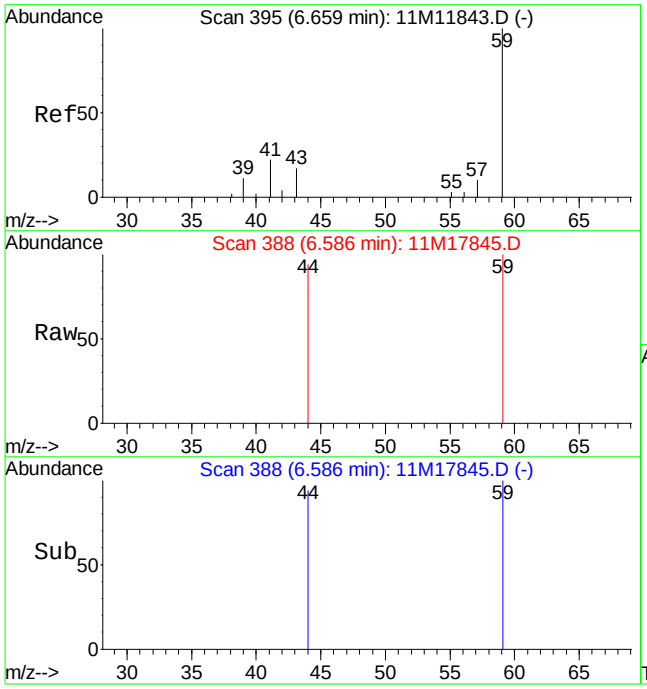


#13
Acetone
Concen: 1.11 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17845.D
Acq: 28 Apr 2017 15:46

Tgt Ion: 43 Resp: 1237

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

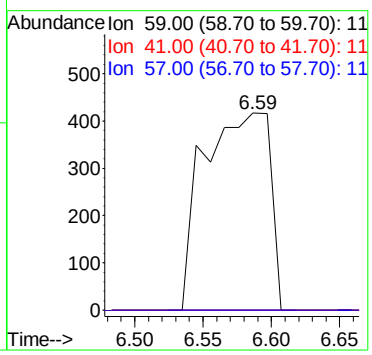


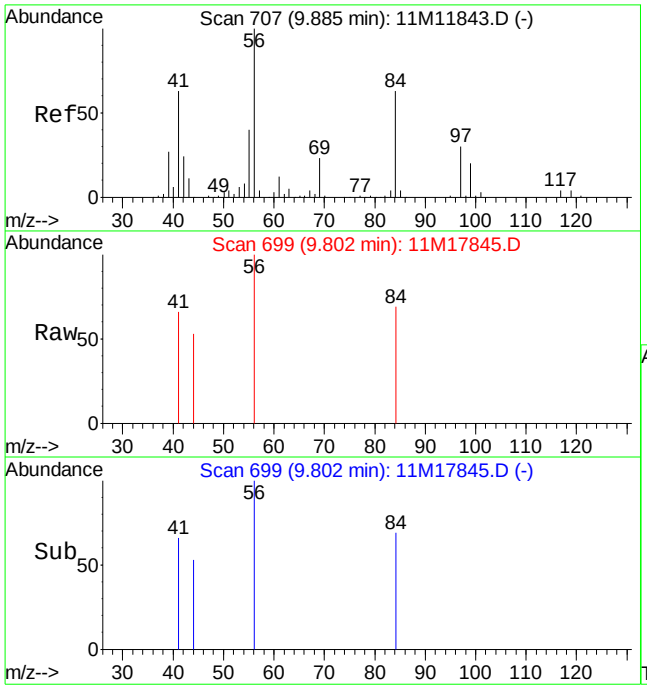


#15
Tert-Butyl Alcohol
Concen: 3.38 ug/L
RT: 6.59 min Scan# 388
Delta R.T. 0.02 min
Lab File: 11M17845.D
Acq: 28 Apr 2017 15:46

Tgt Ion: 59 Resp: 1407

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

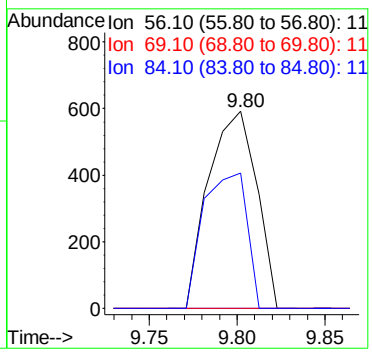


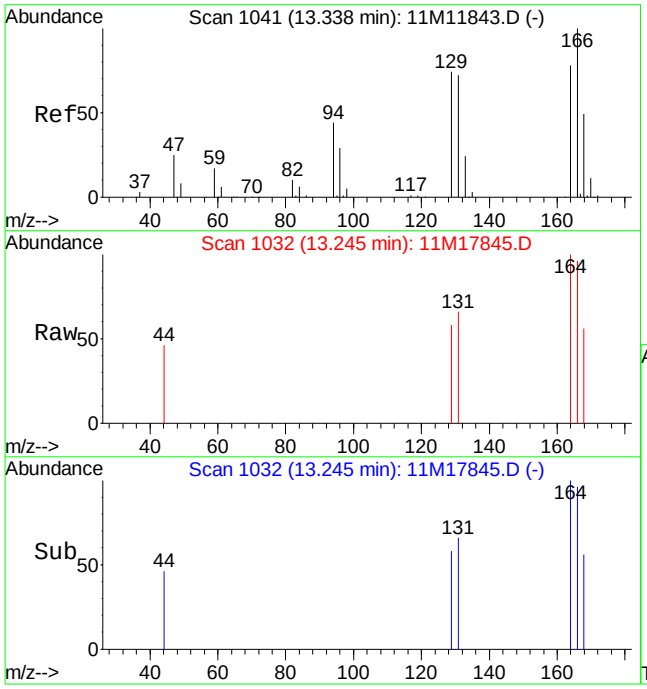


#39
Cyclohexane
Concen: 0.15 ug/L
RT: 9.80 min Scan# 699
Delta R.T. 0.00 min
Lab File: 11M17845.D
Acq: 28 Apr 2017 15:46

Tgt Ion: 56 Resp: 1125

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	62.0	41.6	97.0

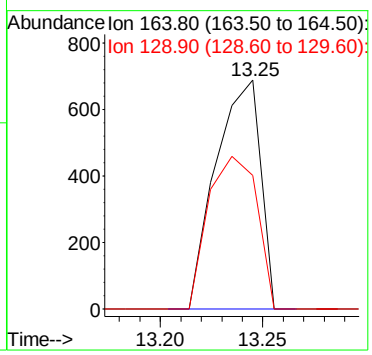




#64
Tetrachloroethene
Concen: 0.34 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17845.D
Acq: 28 Apr 2017 15:46

Tgt Ion:164 Resp: 1042

Ion	Ratio	Lower	Upper
164	100		
129	72.6	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17844.D Vial: 17
Acq On : 28 Apr 2017 15:16 Operator: TMB
Sample : L17041200-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

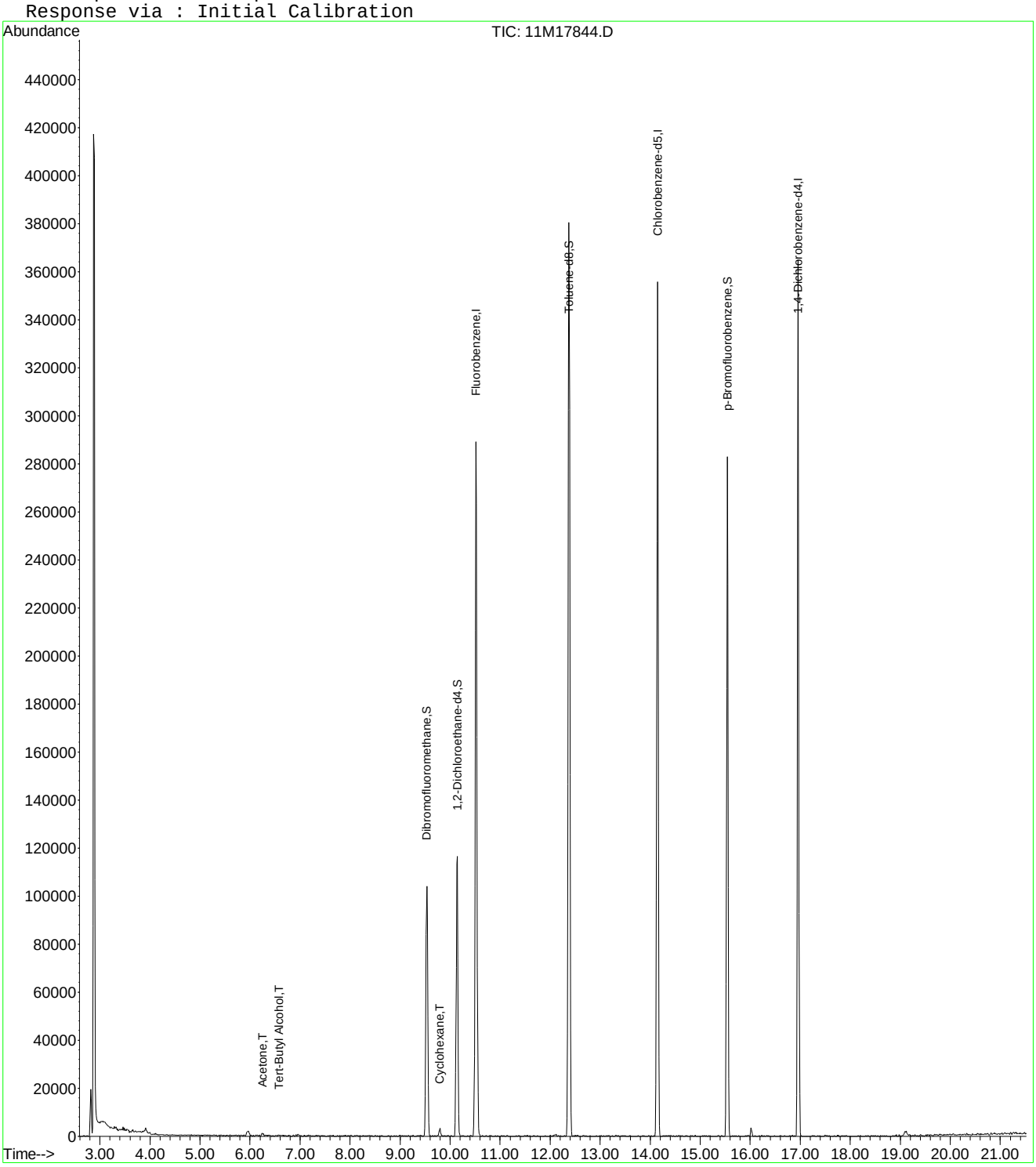
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	339430	25.00 ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	238929	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	122106	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	83142	24.7289 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.92%		
43) 1,2-Dichloroethane-d4	10.14	65	100084	25.6517 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.60%		
57) Toluene-d8	12.38	98	326122	26.2868 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.16%		
78) p-Bromofluorobenzene	15.54	95	114520	26.9834 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.92%		
Target Compounds					Qvalue
3) Chloromethane	3.66	50	648	Below Cal	92
13) Acetone	6.25	43	1931	1.7014 ug/L #	59
15) Tert-Butyl Alcohol	6.58	59	438	1.0318 ug/L #	60
33) Chloroform	9.25	83	473	Below Cal #	17
39) Cyclohexane	9.79	56	2812	0.3648 ug/L #	78

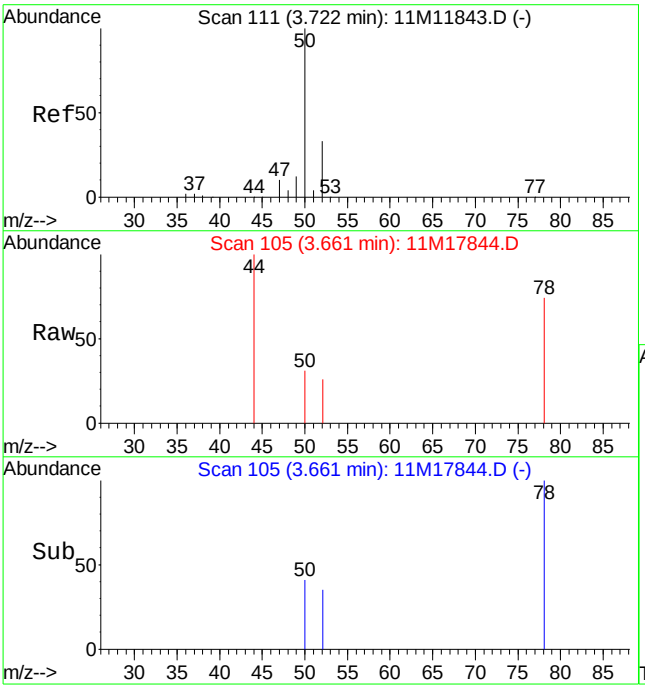
(#) = qualifier out of range (m) = manual integration
11M17844.D 8260WT.M Sun Apr 30 15:39:55 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17844.D Vial: 17
Acq On : 28 Apr 2017 15:16 Operator: TMB
Sample : L17041200-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

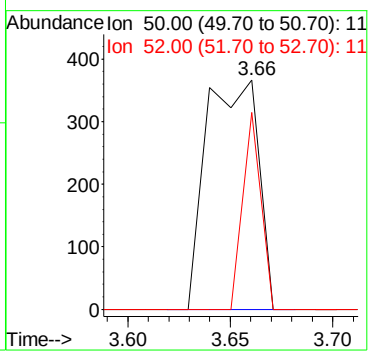


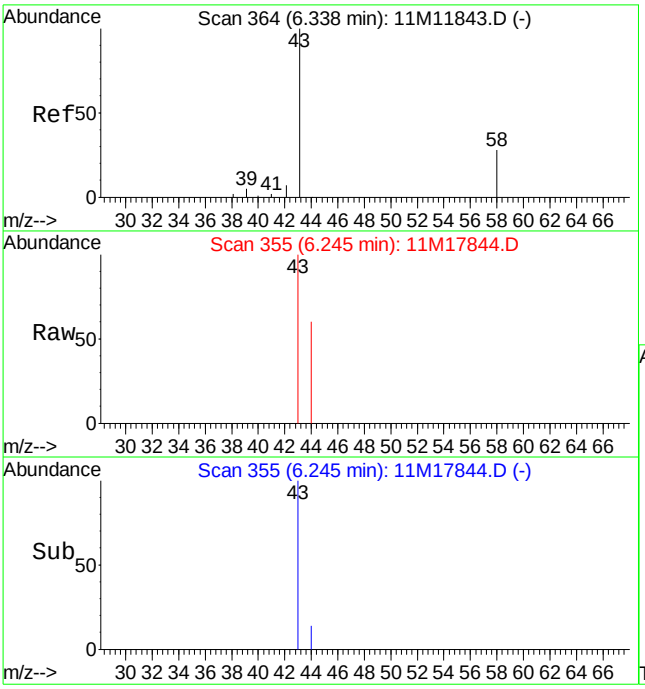


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17844.D
Acq: 28 Apr 2017 15:16

Tgt Ion: 50 Resp: 648

Ion	Ratio	Lower	Upper
50	100		
52	30.1	20.8	48.6

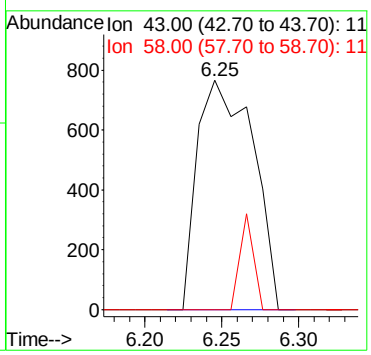


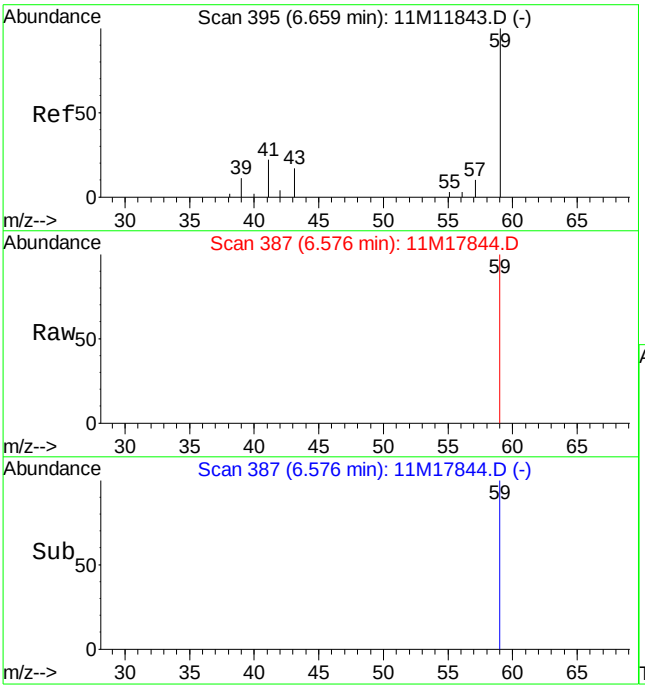


#13
Acetone
Concen: 1.70 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17844.D
Acq: 28 Apr 2017 15:16

Tgt Ion: 43 Resp: 1931

Ion	Ratio	Lower	Upper
43	100		
58	10.3	20.1	46.9#

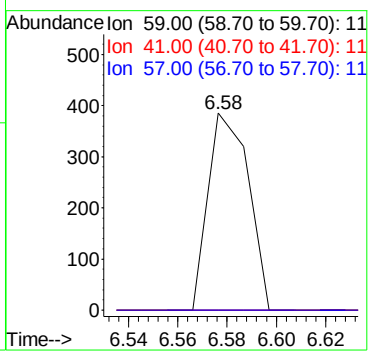


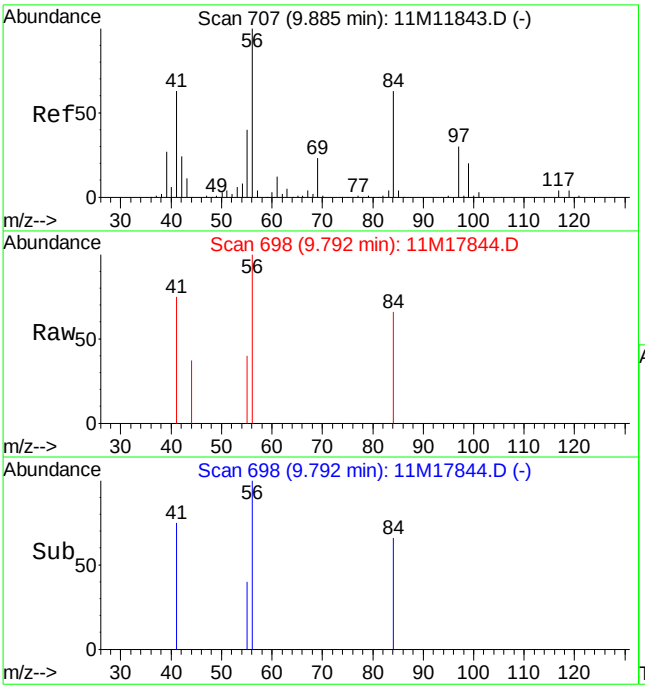


#15
Tert-Butyl Alcohol
Concen: 1.03 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17844.D
Acq: 28 Apr 2017 15:16

Tgt Ion: 59 Resp: 438

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

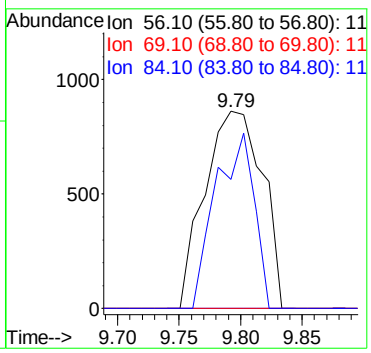




#39
Cyclohexane
Concen: 0.36 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17844.D
Acq: 28 Apr 2017 15:16

Tgt Ion: 56 Resp: 2812

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	59.4	41.6	97.0



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17843.D Vial: 16
Acq On : 28 Apr 2017 14:47 Operator: TMB
Sample : L17041200-05 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:52 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

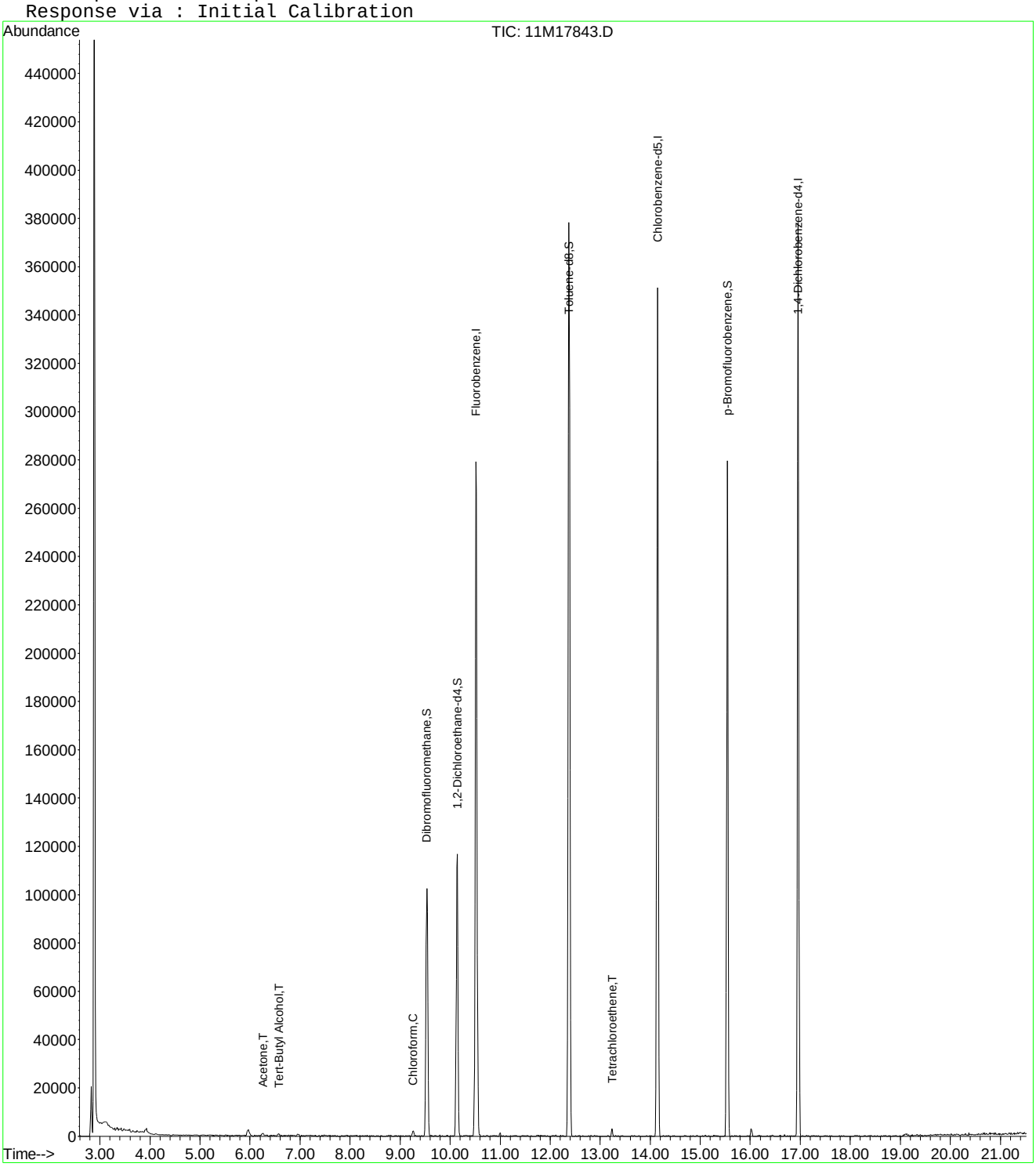
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	332494	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	236249	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126559	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82519	25.0556	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.24%			
43) 1,2-Dichloroethane-d4	10.14	65	99610	26.0628	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.24%			
57) Toluene-d8	12.38	98	321129	26.1780	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.72%			
78) p-Bromofluorobenzene	15.54	95	113057	25.7014	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.80%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	239	Below Cal	#	40
13) Acetone	6.26	43	2112	1.8997	ug/L #	41
15) Tert-Butyl Alcohol	6.58	59	1705	4.1003	ug/L #	60
33) Chloroform	9.25	83	3040	0.3109	ug/L	82
64) Tetrachloroethene	13.25	164	889	0.2928	ug/L	87

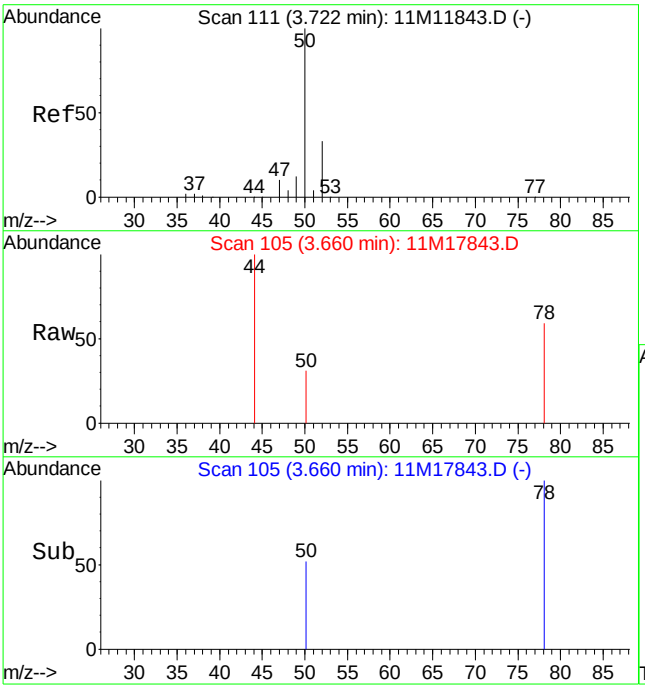
(#) = qualifier out of range (m) = manual integration
11M17843.D 8260WT.M Sun Apr 30 15:39:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17843.D Vial: 16
Acq On : 28 Apr 2017 14:47 Operator: TMB
Sample : L17041200-05 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

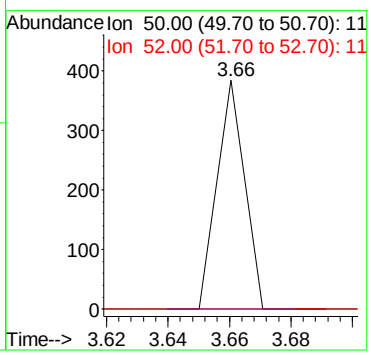


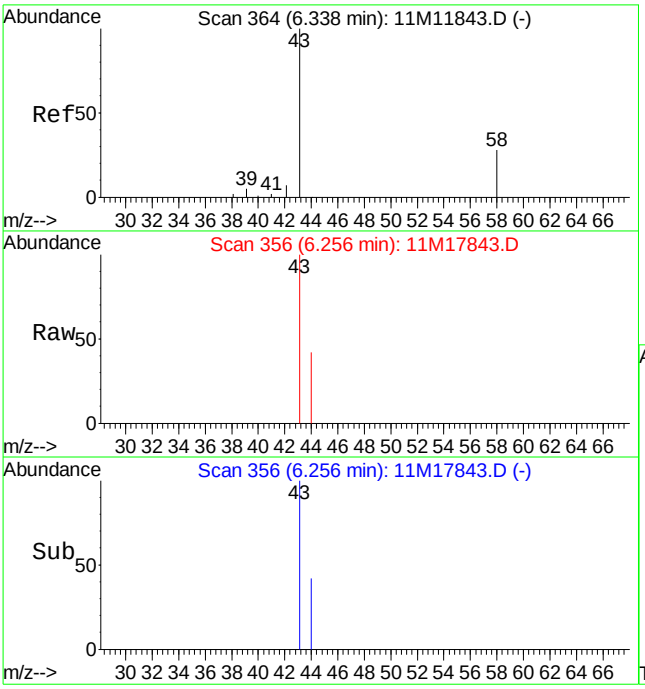


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17843.D
Acq: 28 Apr 2017 14:47

Tgt Ion: 50 Resp: 239

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

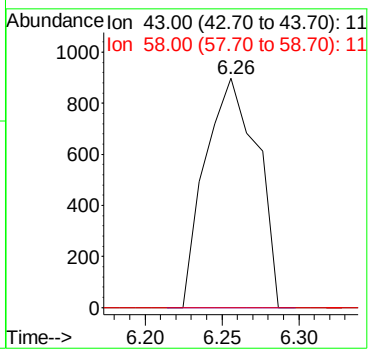


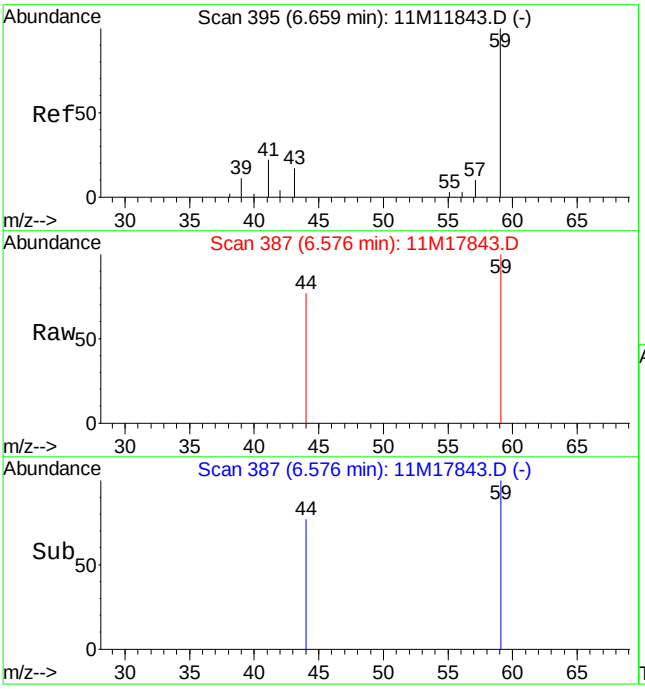


#13
Acetone
Concen: 1.90 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17843.D
Acq: 28 Apr 2017 14:47

Tgt Ion: 43 Resp: 2112

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

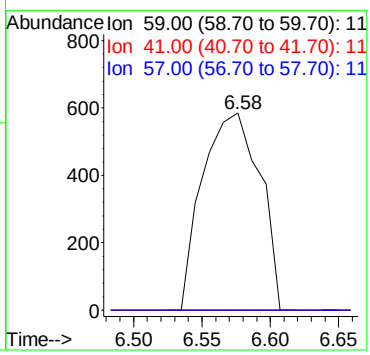


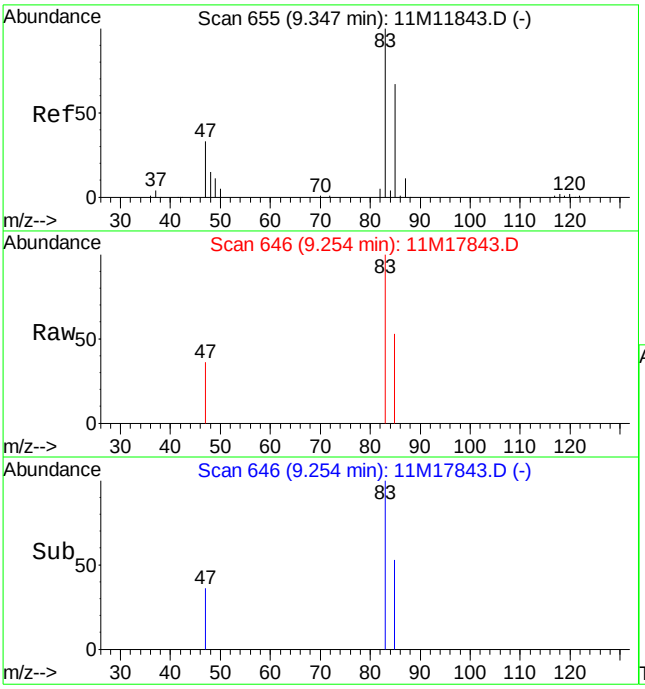


#15
Tert-Butyl Alcohol
Concen: 4.10 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17843.D
Acq: 28 Apr 2017 14:47

Tgt Ion: 59 Resp: 1705

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

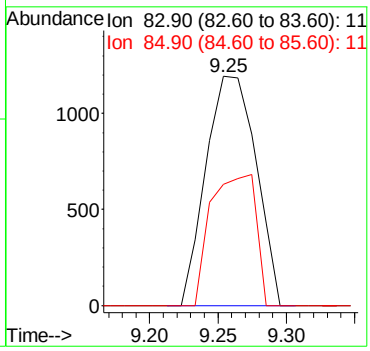


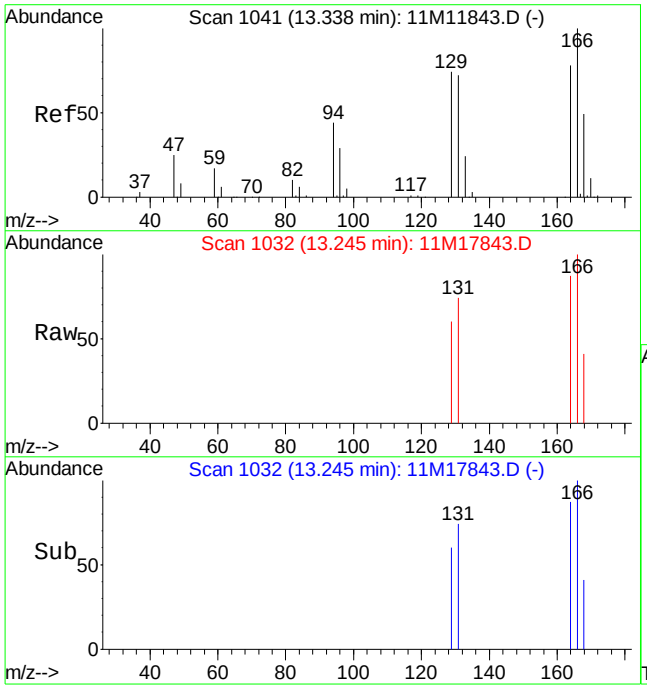


#33
Chloroform
Concen: 0.31 ug/L
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17843.D
Acq: 28 Apr 2017 14:47

Tgt Ion: 83 Resp: 3040

Ion	Ratio	Lower	Upper
83	100		
85	51.2	39.4	92.0

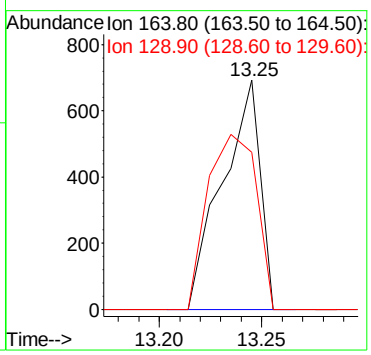




#64
Tetrachloroethene
Concen: 0.29 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17843.D
Acq: 28 Apr 2017 14:47

Tgt Ion:164 Resp: 889

Ion	Ratio	Lower	Upper
164	100		
129	98.2	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17842.D Vial: 15
Acq On : 28 Apr 2017 14:18 Operator: TMB
Sample : L17041200-06 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

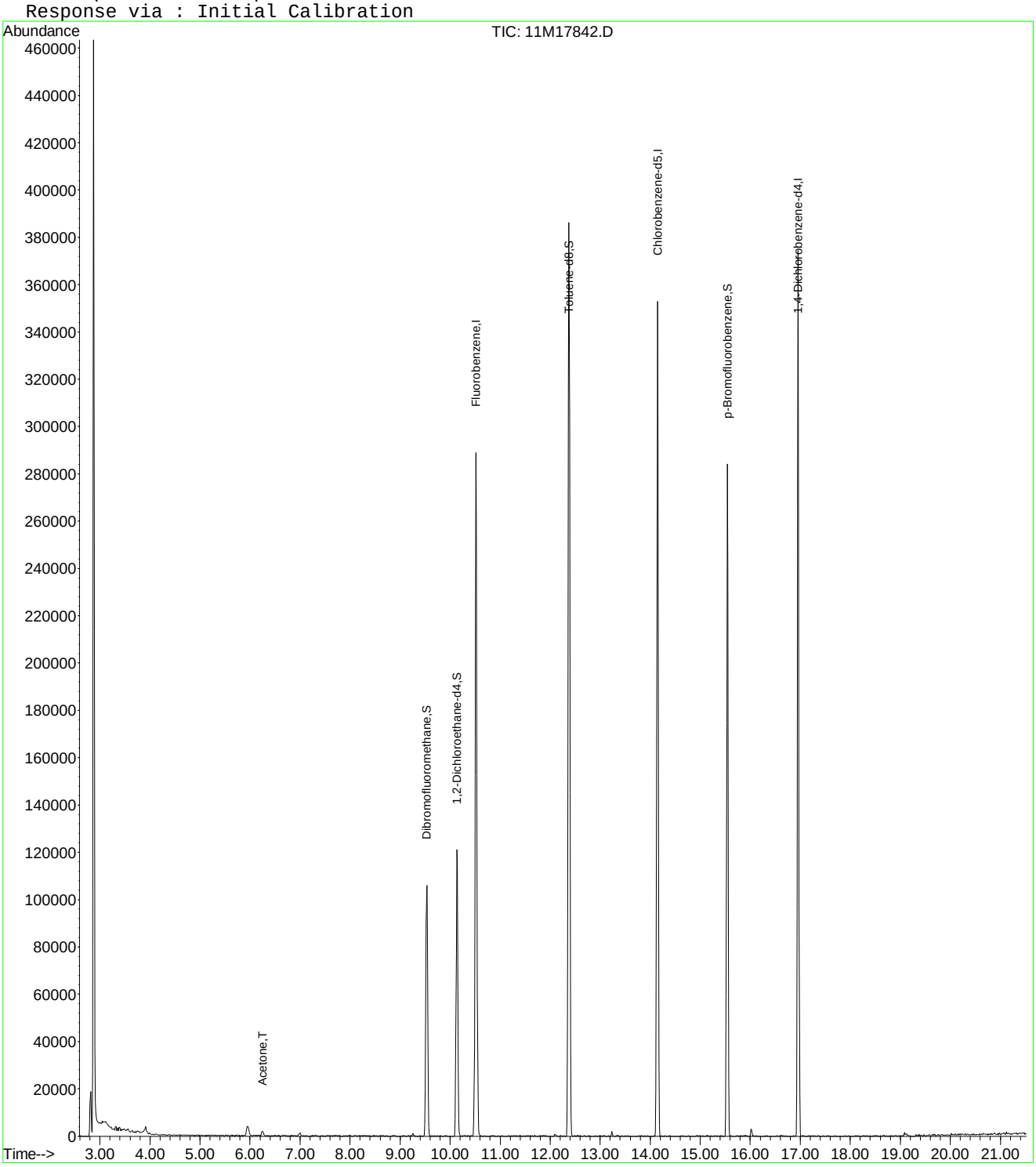
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	336064	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	237739	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126982	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84189	25.2911	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%			
43) 1,2-Dichloroethane-d4	10.13	65	101765	26.3438	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.36%			
57) Toluene-d8	12.38	98	327124	26.4995	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%			
78) p-Bromofluorobenzene	15.54	95	116837	26.4723	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
3) Chloromethane	3.64	50	666	Below Cal	#	40
13) Acetone	6.25	43	3581	3.1869	ug/L	85
33) Chloroform	9.25	83	1099	Below Cal	#	43

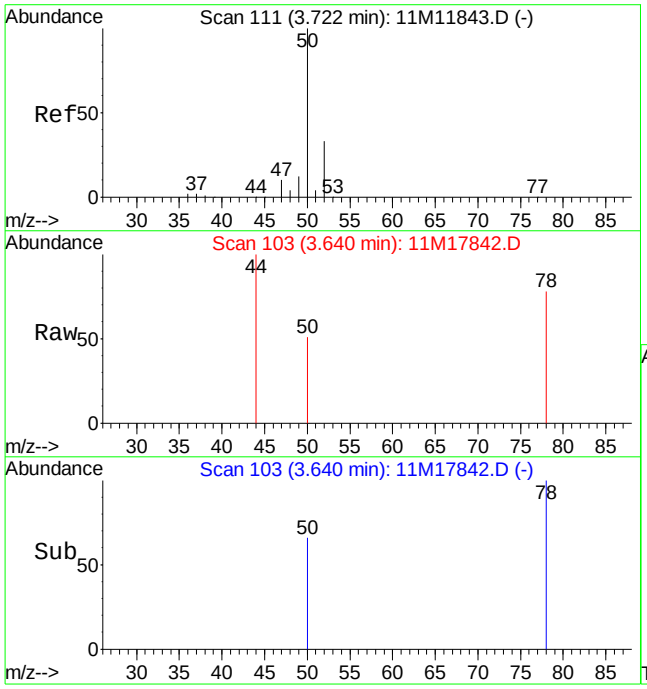
(#) = qualifier out of range (m) = manual integration
11M17842.D 8260WT.M Sun Apr 30 15:39:51 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17842.D Vial: 15
Acq On : 28 Apr 2017 14:18 Operator: TMB
Sample : L17041200-06 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

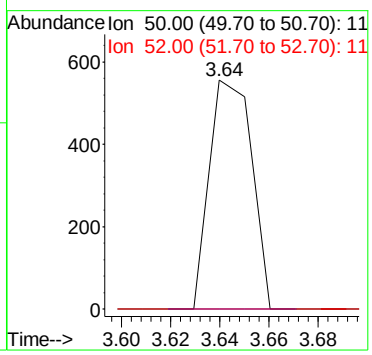


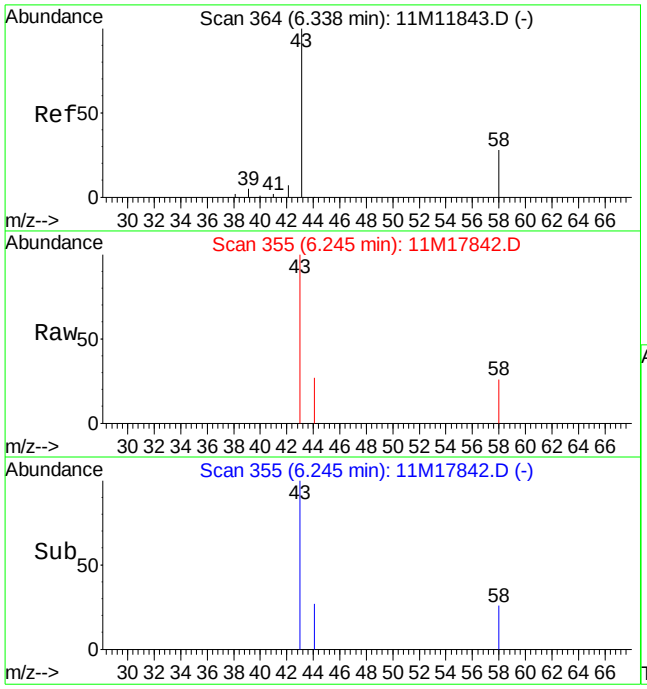


#3
Chloromethane
Concen: Below Cal
RT: 3.64 min Scan# 103
Delta R.T. -0.02 min
Lab File: 11M17842.D
Acq: 28 Apr 2017 14:18

Tgt Ion: 50 Resp: 666

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

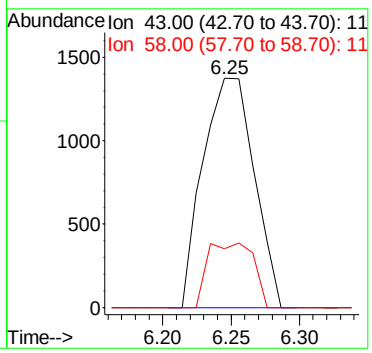




#13
Acetone
Concen: 3.19 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17842.D
Acq: 28 Apr 2017 14:18

Tgt Ion: 43 Resp: 3581

Ion	Ratio	Lower	Upper
43	100		
58	25.1	20.1	46.9



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17841.D Vial: 14
Acq On : 28 Apr 2017 13:49 Operator: TMB
Sample : L17041200-07 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

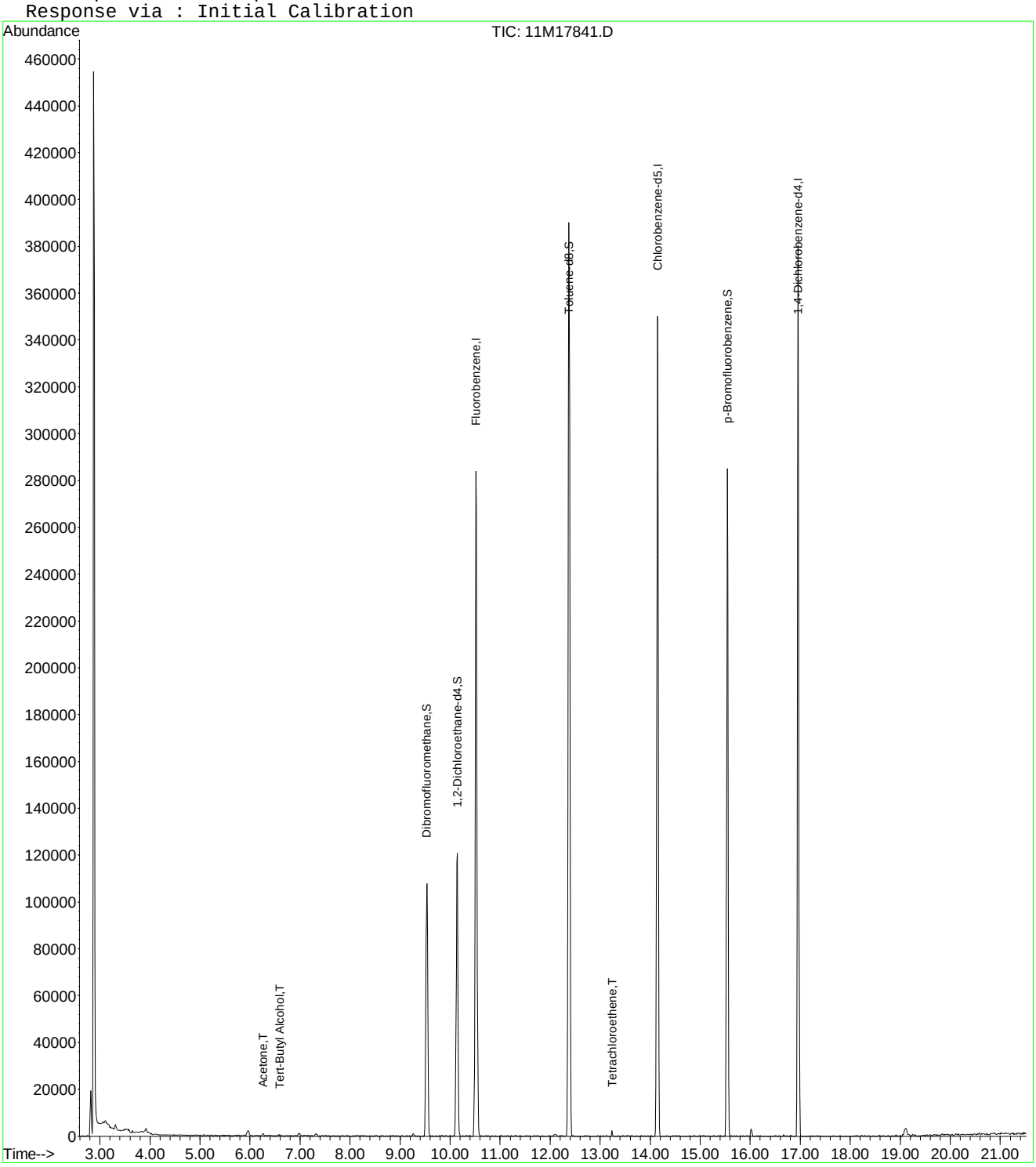
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	334325	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	239563	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	126882	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86284	26.0553	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.24%			
43) 1,2-Dichloroethane-d4	10.14	65	104396	27.1654	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.68%			
57) Toluene-d8	12.38	98	330670	26.5828	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.32%			
78) p-Bromofluorobenzene	15.54	95	115605	26.2138	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.84%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	427	Below Cal		78
13) Acetone	6.26	43	1517	1.3571	ug/L #	41
15) Tert-Butyl Alcohol	6.60	59	645	1.5427	ug/L #	60
33) Chloroform	9.26	83	1142	Below Cal		88
64) Tetrachloroethene	13.25	164	532	0.1728	ug/L	80

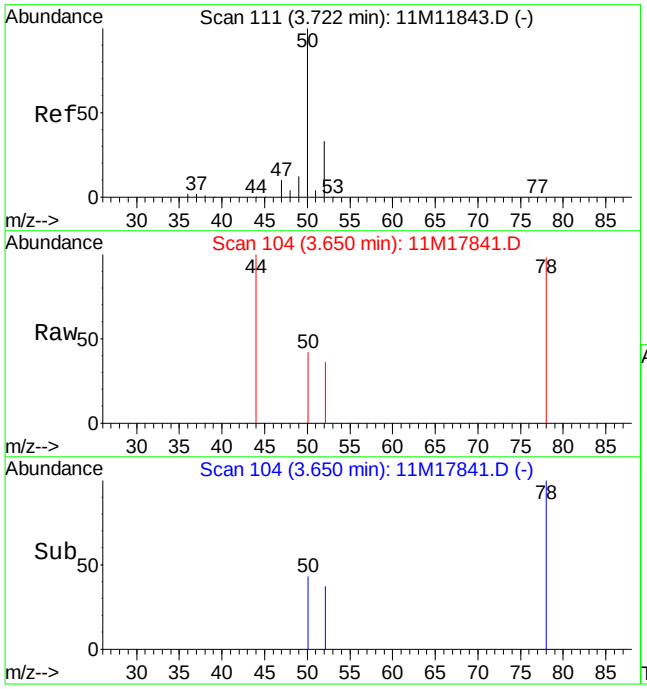
(#) = qualifier out of range (m) = manual integration
11M17841.D 8260WT.M Sun Apr 30 15:39:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17841.D Vial: 14
Acq On : 28 Apr 2017 13:49 Operator: TMB
Sample : L17041200-07 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

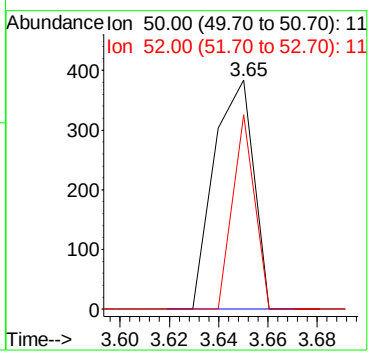


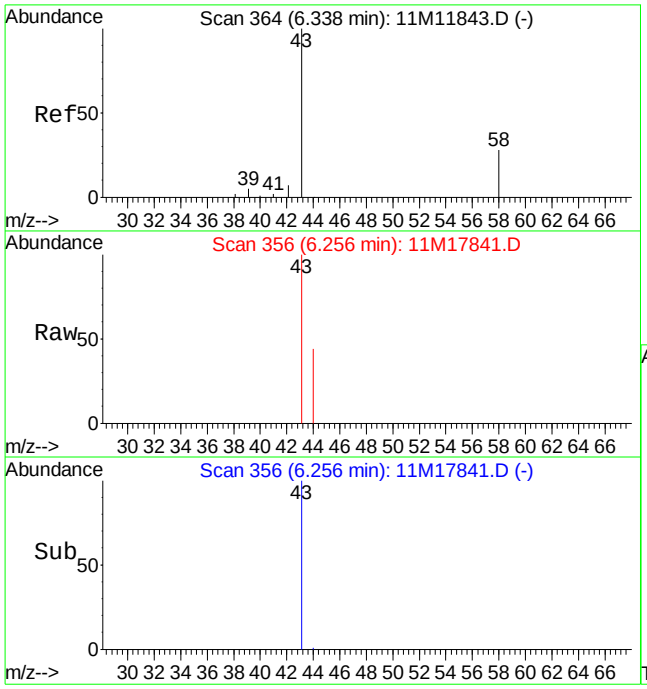


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17841.D
Acq: 28 Apr 2017 13:49

Tgt Ion: 50 Resp: 427

Ion	Ratio	Lower	Upper
50	100		
52	47.3	20.8	48.6

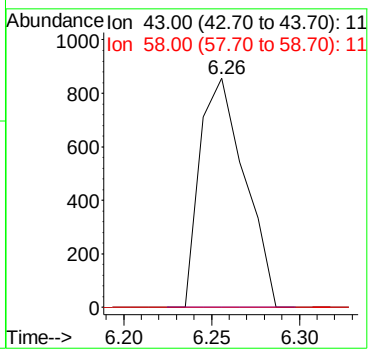


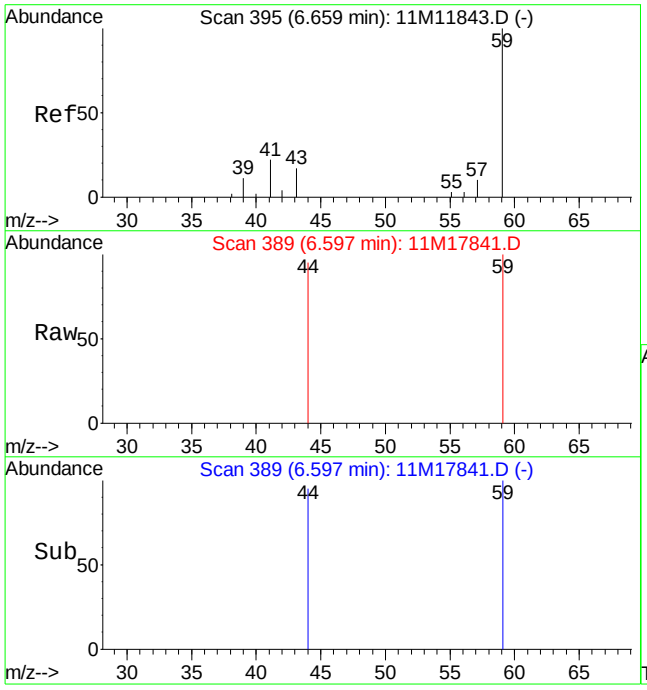


#13
Acetone
Concen: 1.36 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17841.D
Acq: 28 Apr 2017 13:49

Tgt Ion: 43 Resp: 1517

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

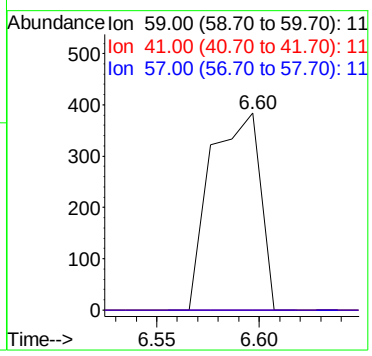


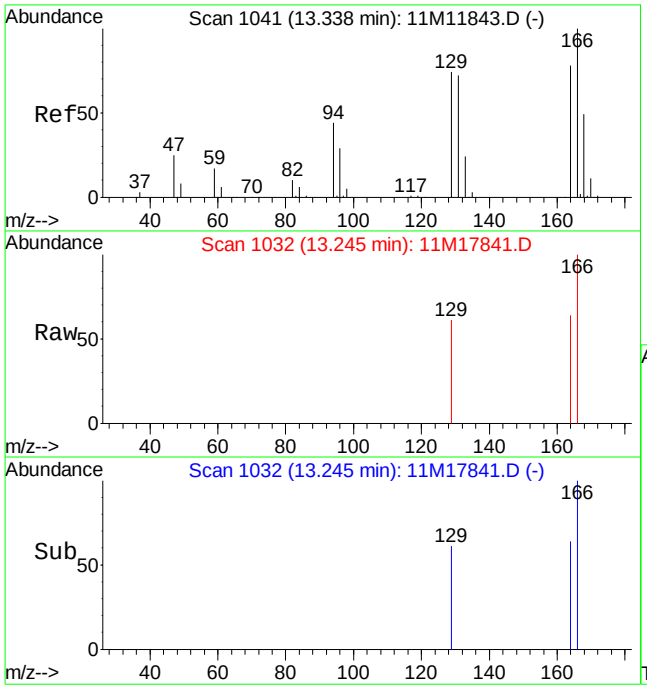


#15
Tert-Butyl Alcohol
Concen: 1.54 ug/L
RT: 6.60 min Scan# 389
Delta R.T. 0.03 min
Lab File: 11M17841.D
Acq: 28 Apr 2017 13:49

Tgt Ion: 59 Resp: 645

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

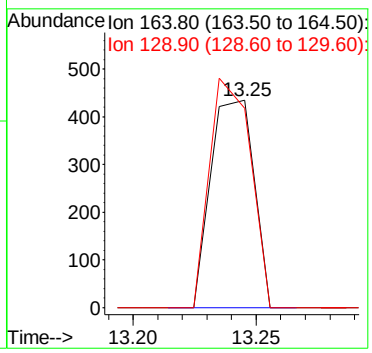




#64
Tetrachloroethene
Concen: 0.17 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17841.D
Acq: 28 Apr 2017 13:49

Tgt Ion:164 Resp: 532

Ion	Ratio	Lower	Upper
164	100		
129	104.9	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17840.D Vial: 13
Acq On : 28 Apr 2017 13:20 Operator: TMB
Sample : L17041200-08 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:45 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

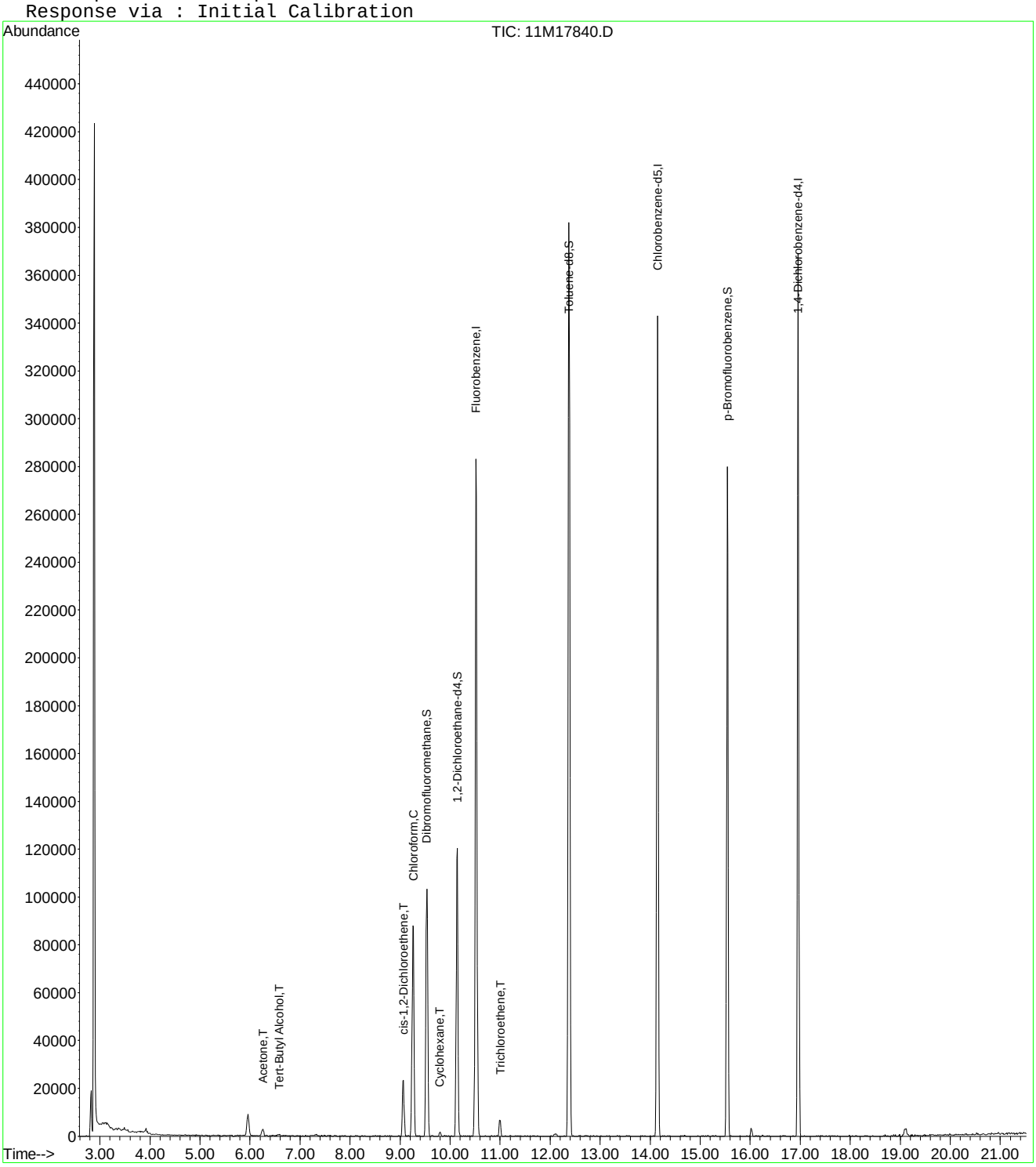
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	333771	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	235649	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	124375	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86227	26.0813	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.32%			
43) 1,2-Dichloroethane-d4	10.14	65	102367	26.6816	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.72%			
57) Toluene-d8	12.38	98	322809	26.3819	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.52%			
78) p-Bromofluorobenzene	15.54	95	113194	26.1844	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.72%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	552	Below Cal	#	40
13) Acetone	6.26	43	5317	4.7644	ug/L	92
15) Tert-Butyl Alcohol	6.59	59	1414	3.3875	ug/L #	60
32) cis-1,2-Dichloroethene	9.07	96	13849	3.4024	ug/L	89
33) Chloroform	9.26	83	93589	15.2851	ug/L	99
39) Cyclohexane	9.79	56	1677	0.2212	ug/L #	72
46) Trichloroethene	11.00	130	3362	0.8762	ug/L	92

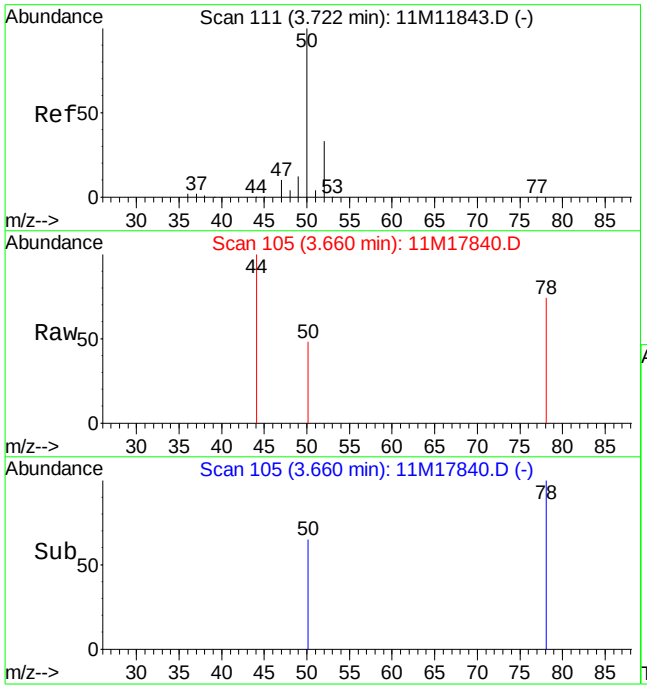
(#) = qualifier out of range (m) = manual integration
11M17840.D 8260WT.M Sun Apr 30 15:39:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17840.D Vial: 13
Acq On : 28 Apr 2017 13:20 Operator: TMB
Sample : L17041200-08 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

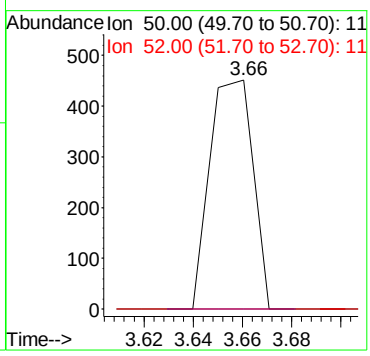


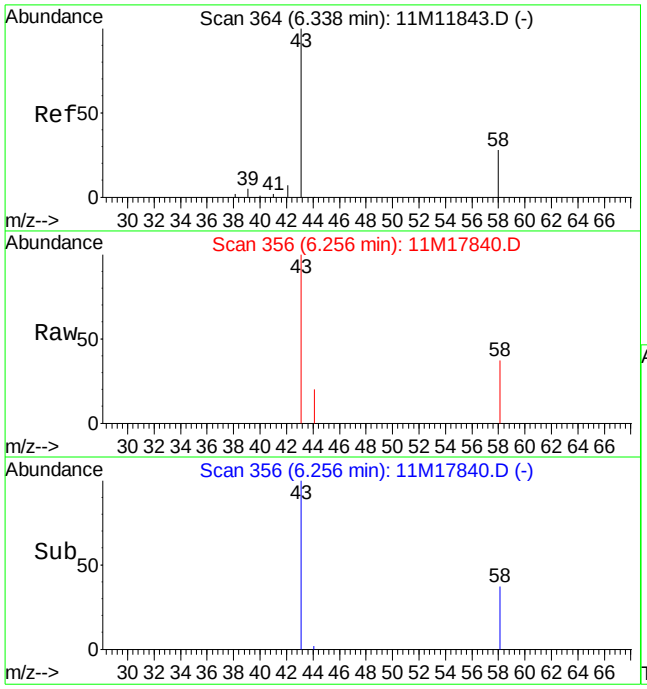


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 50 Resp: 552

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

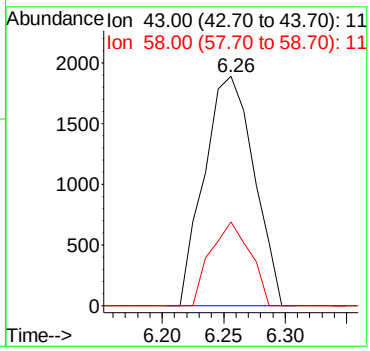


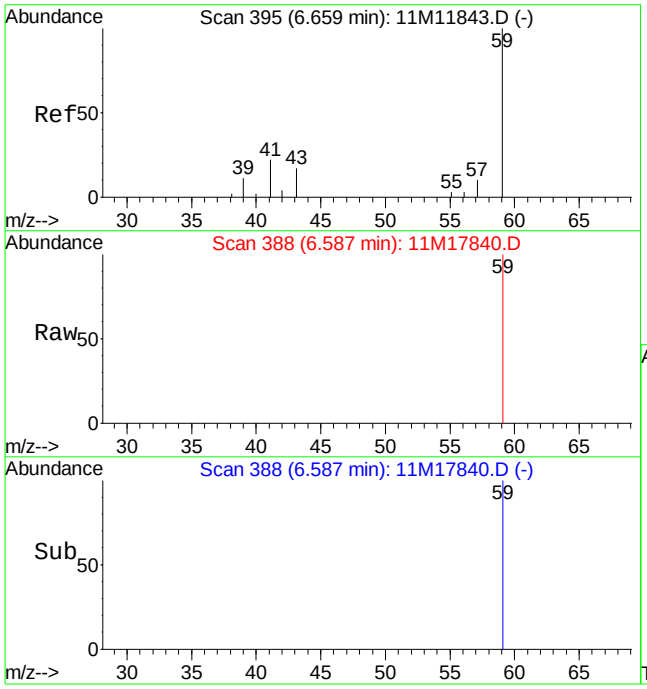


#13
Acetone
Concen: 4.76 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 43 Resp: 5317

Ion	Ratio	Lower	Upper
43	100		
58	29.1	20.1	46.9

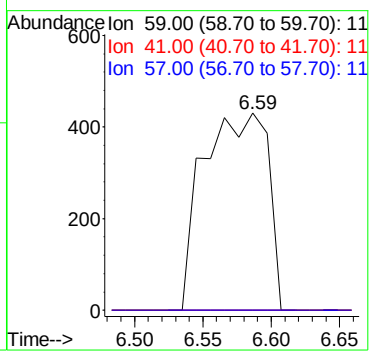


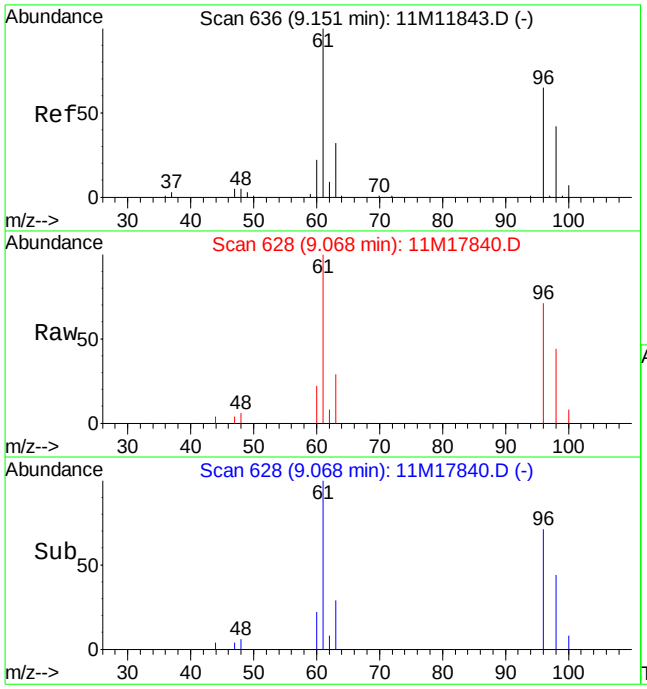


#15
Tert-Butyl Alcohol
Concen: 3.39 ug/L
RT: 6.59 min Scan# 388
Delta R.T. 0.02 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 59 Resp: 1414

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

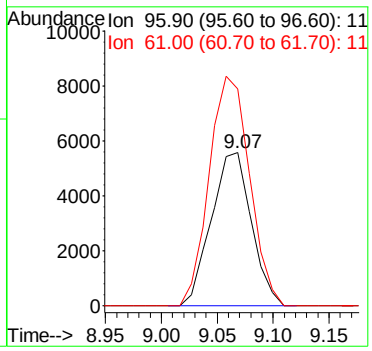


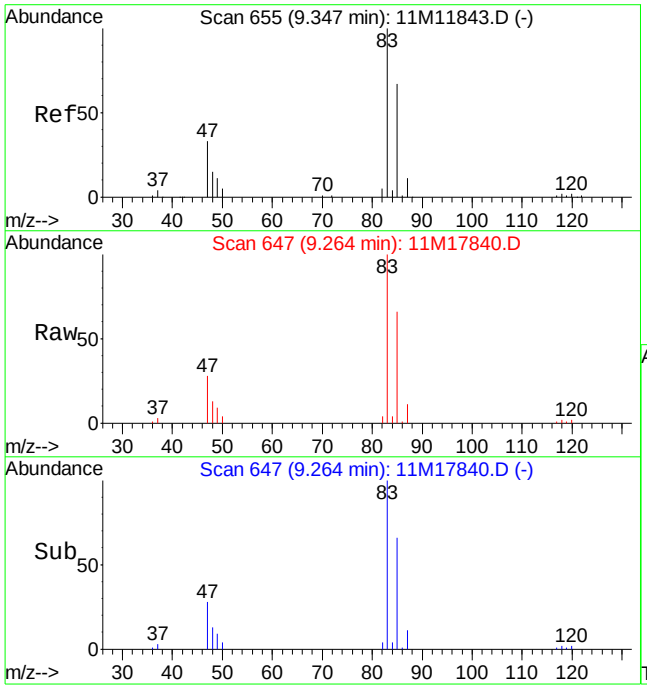


#32
cis-1,2-Dichloroethene
Concen: 3.40 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.00 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 96 Resp: 13849

Ion	Ratio	Lower	Upper
96	100		
61	151.4	100.0	233.4

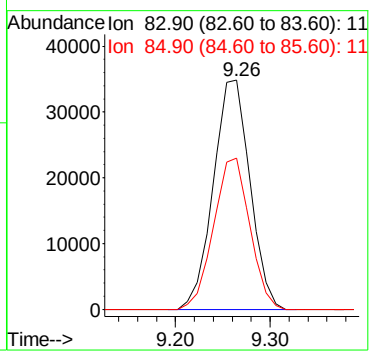


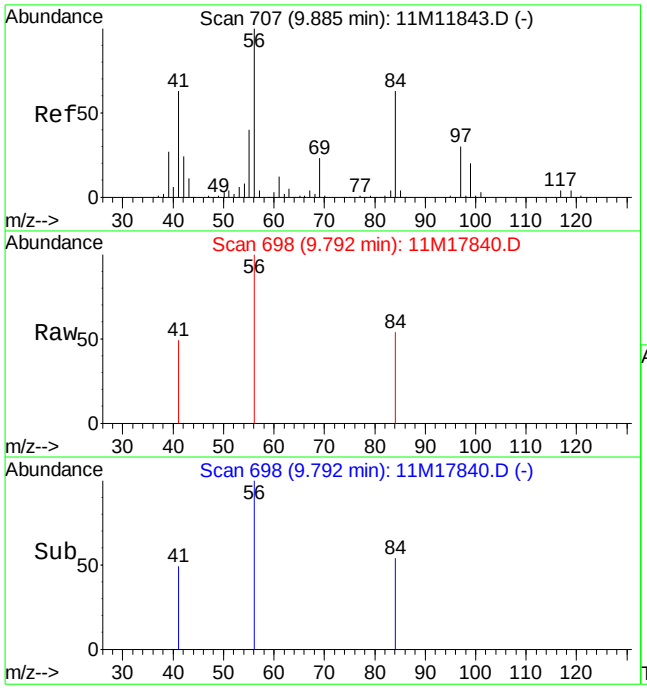


#33
Chloroform
Concen: 15.29 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.00 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 83 Resp: 93589

Ion	Ratio	Lower	Upper
83	100		
85	65.0	39.4	92.0

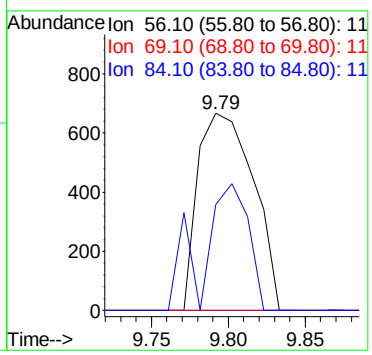


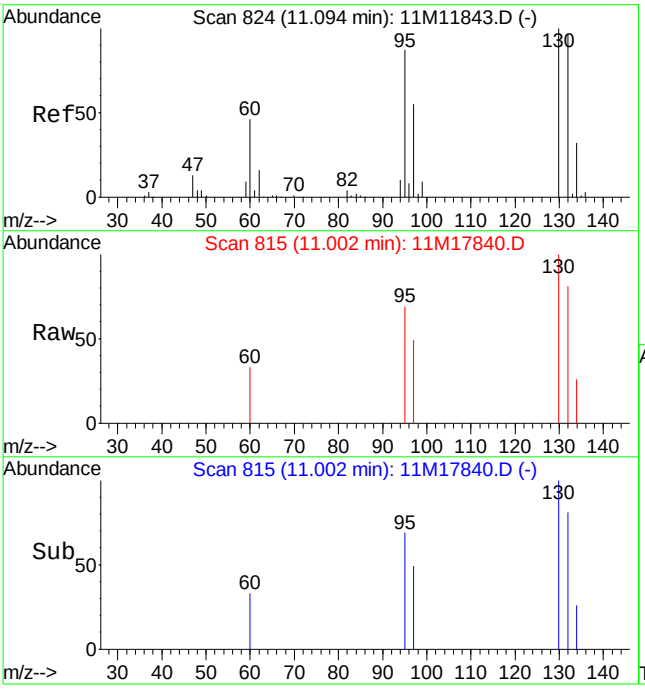


#39
Cyclohexane
Concen: 0.22 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion: 56 Resp: 1677

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	53.1	41.6	97.0

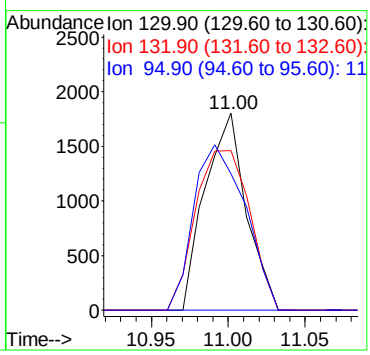




#46
Trichloroethene
Concen: 0.88 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17840.D
Acq: 28 Apr 2017 13:20

Tgt Ion:130 Resp: 3362

Ion	Ratio	Lower	Upper
130	100		
132	106.7	58.2	135.8
95	104.7	59.0	137.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17839.D Vial: 12
Acq On : 28 Apr 2017 12:51 Operator: TMB
Sample : L17041200-09 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:42 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

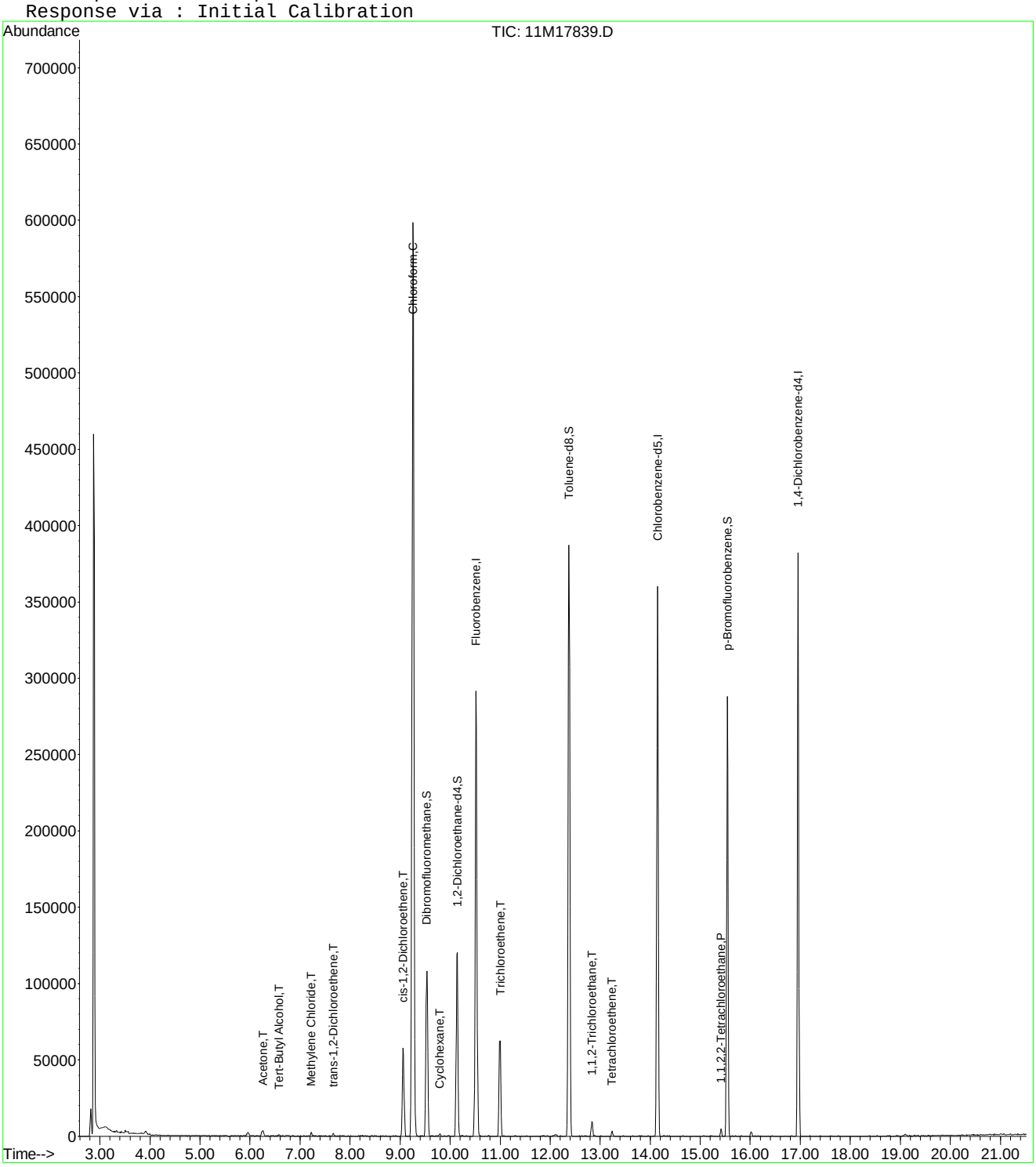
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	340437	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	240537	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	127671	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	87789	26.0339	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.12%			
43) 1,2-Dichloroethane-d4	10.14	65	104199	26.6274	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.52%			
57) Toluene-d8	12.38	98	335328	26.8481	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.40%			
78) p-Bromofluorobenzene	15.54	95	116186	26.1827	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.72%			
Target Compounds						Qvalue
3) Chloromethane	3.63	50	210	Below Cal	#	40
13) Acetone	6.26	43	7495	6.5845	ug/L	86
15) Tert-Butyl Alcohol	6.58	59	1367	3.2108	ug/L #	60
19) Methylene Chloride	7.22	84	892	0.2199	ug/L #	32
23) trans-1,2-Dichloroethene	7.66	96	1085	0.2933	ug/L	97
32) cis-1,2-Dichloroethene	9.06	96	31445	7.5740	ug/L	90
33) Chloroform	9.25	83	619708	100.2947	ug/L	100
39) Cyclohexane	9.79	56	1635	0.2115	ug/L #	63
46) Trichloroethene	11.00	130	28648	7.3204	ug/L	98
61) 1,1,2-Trichloroethane	12.83	97	5100	1.5524	ug/L	91
64) Tetrachloroethene	13.23	164	1430	0.4626	ug/L	89
77) 1,1,2,2-Tetrachloroethane	15.42	83	4740	1.1810	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17839.D 8260WT.M Sun Apr 30 15:39:43 2017 Page 1

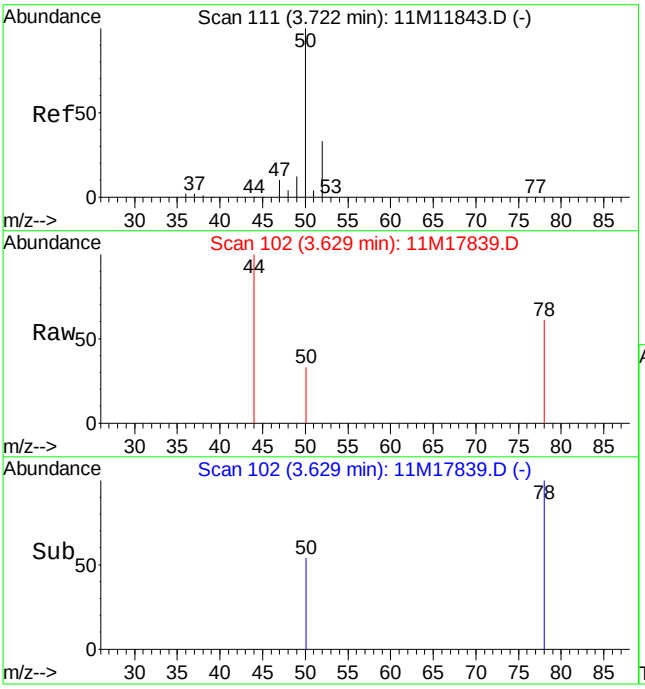
Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17839.D Vial: 12
Acq On : 28 Apr 2017 12:51 Operator: TMB
Sample : L17041200-09 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



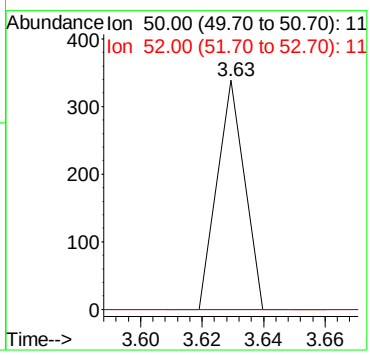
11M17839.D 8260WT.M Sun Apr 30 15:39:43 2017 Page 2

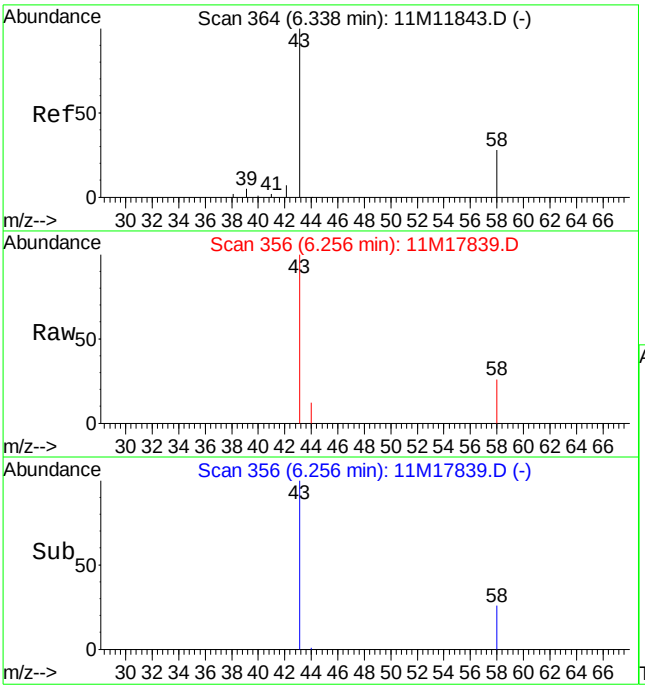


#3
Chloromethane
Concen: Below Cal
RT: 3.63 min Scan# 102
Delta R.T. -0.03 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 50 Resp: 210

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

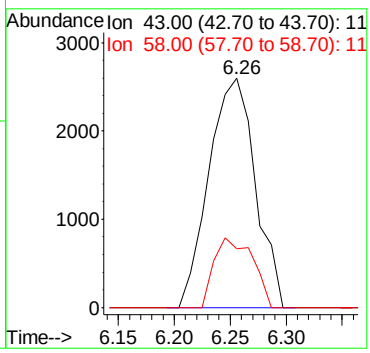


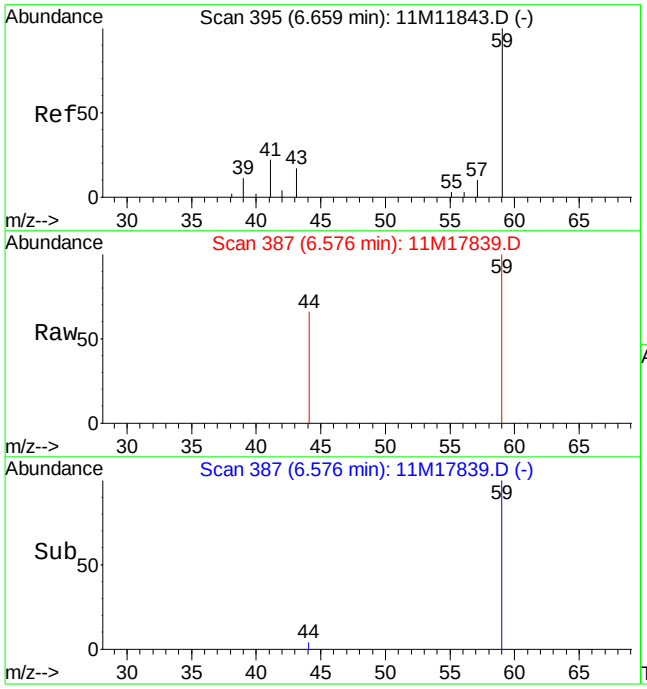


#13
Acetone
Concen: 6.58 ug/L
RT: 6.26 min Scan# 356
Delta R.T. -0.00 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 43 Resp: 7495

Ion	Ratio	Lower	Upper
43	100		
58	25.3	20.1	46.9

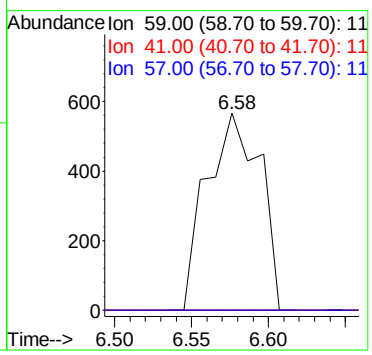


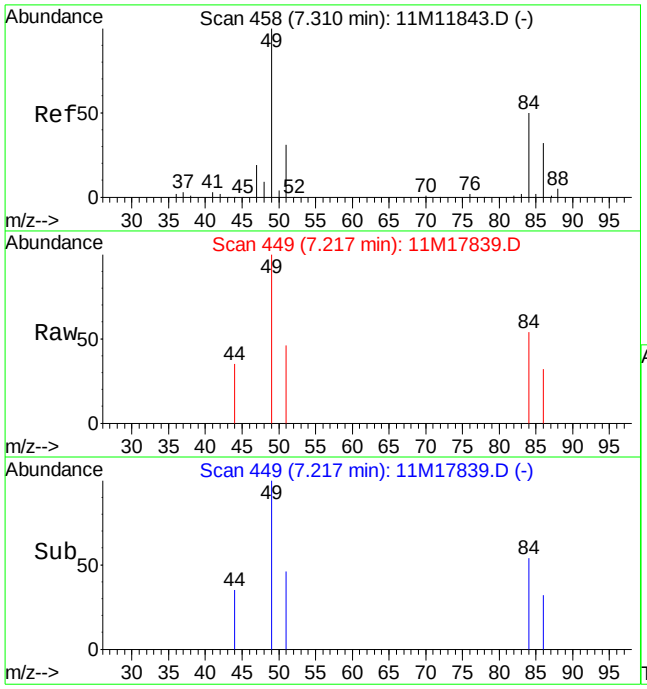


#15
Tert-Butyl Alcohol
Concen: 3.21 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 59 Resp: 1367

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

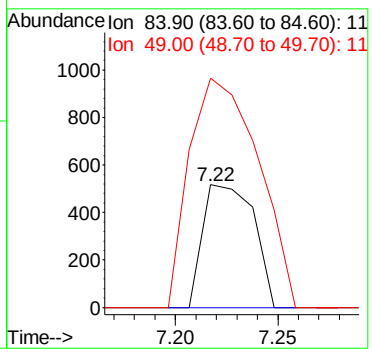


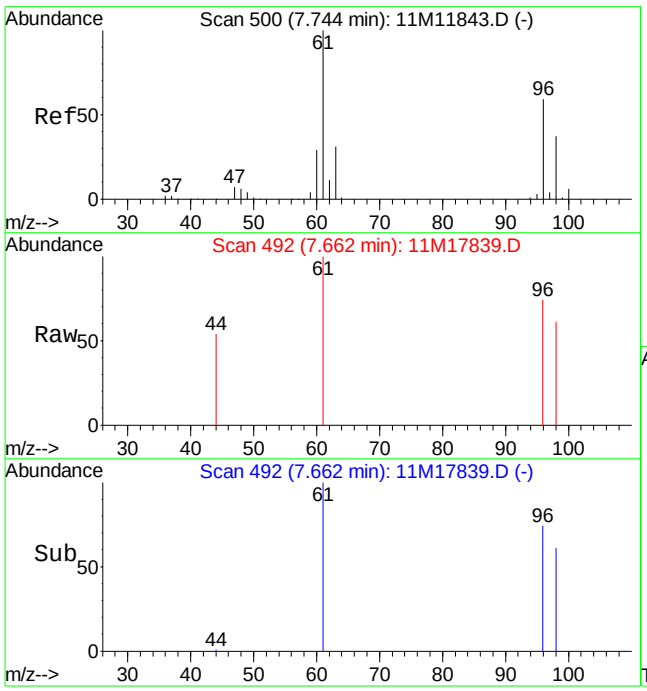


#19
Methylene Chloride
Concen: 0.22 ug/L
RT: 7.22 min Scan# 449
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 84 Resp: 892

Ion	Ratio	Lower	Upper
84	100		
49	253.3	97.7	227.9#

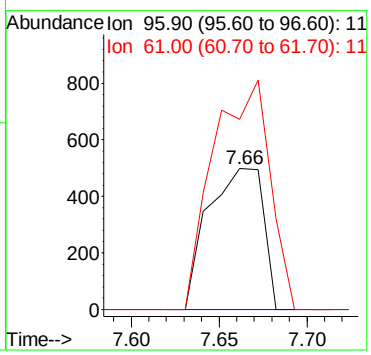


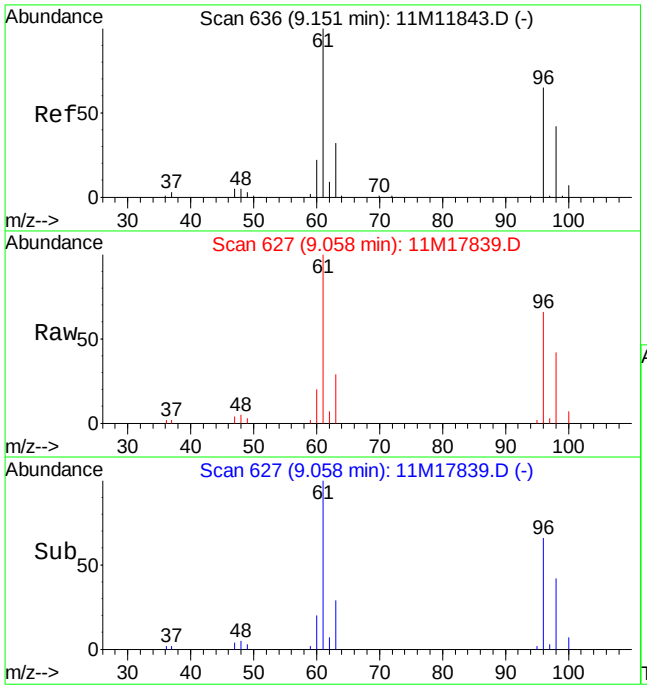


#23
trans-1,2-Dichloroethene
Concen: 0.29 ug/L
RT: 7.66 min Scan# 492
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 96 Resp: 1085

Ion	Ratio	Lower	Upper
96	100		
61	167.2	97.8	228.2

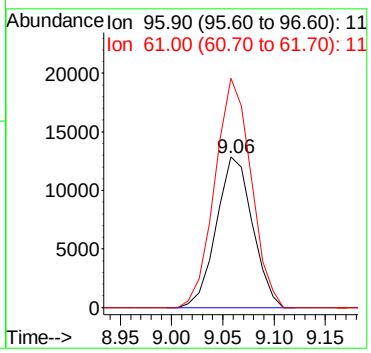


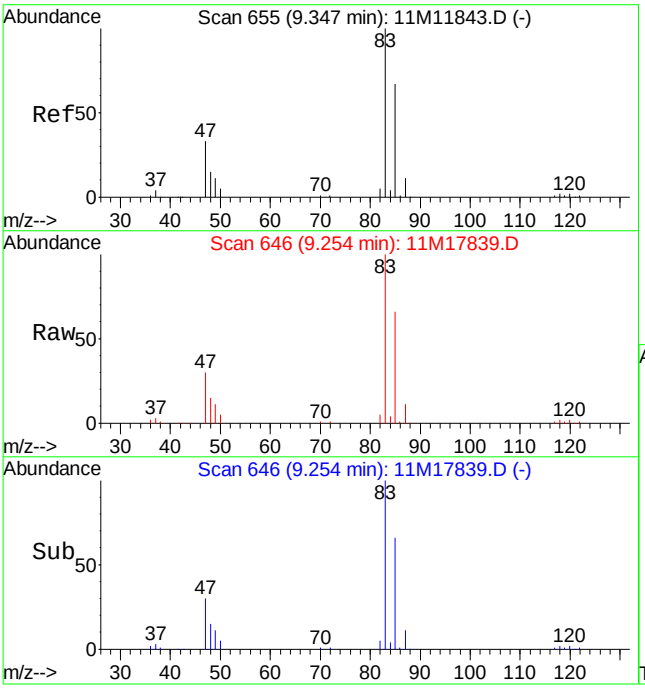


#32
cis-1,2-Dichloroethene
Concen: 7.57 ug/L
RT: 9.06 min Scan# 627
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 96 Resp: 31445

Ion	Ratio	Lower	Upper
96	100		
61	152.9	100.0	233.4

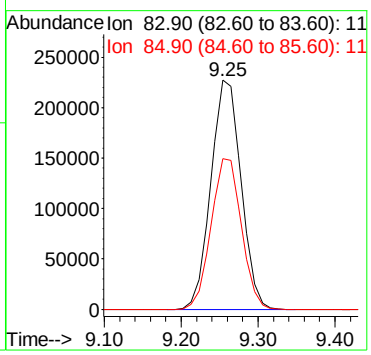


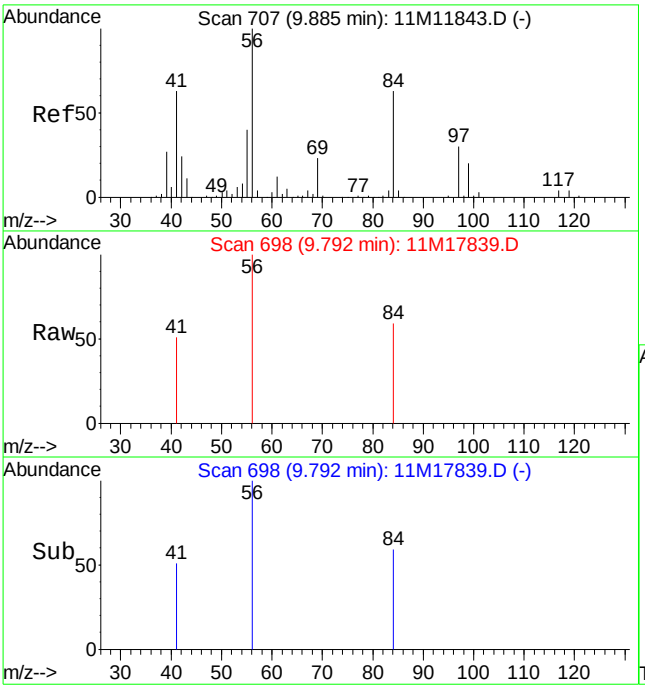


#33
Chloroform
Concen: 100.29 ug/L
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 83 Resp: 619708

Ion	Ratio	Lower	Upper
83	100		
85	65.9	39.4	92.0

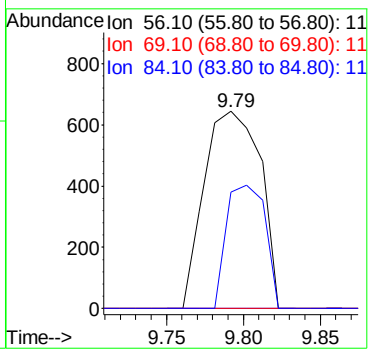


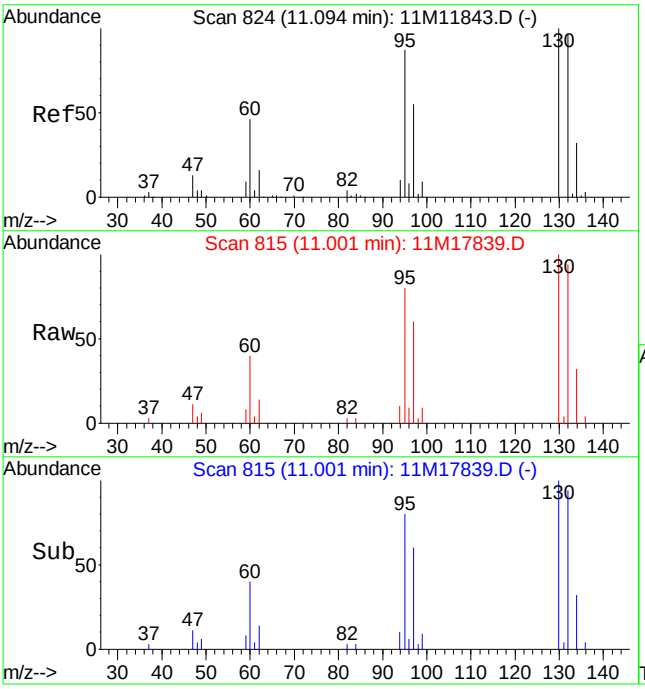


#39
Cyclohexane
Concen: 0.21 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 56 Resp: 1635

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	43.1	41.6	97.0

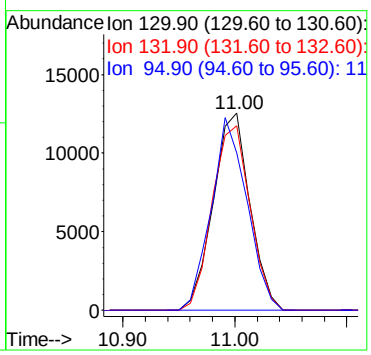


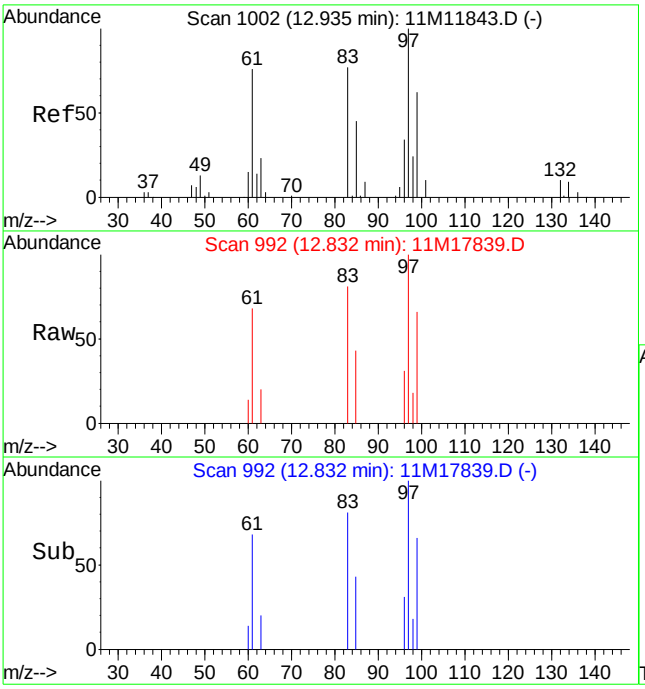


#46
Trichloroethene
Concen: 7.32 ug/L
RT: 11.00 min Scan# 815
Delta R.T. -0.00 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion:130 Resp: 28648

Ion	Ratio	Lower	Upper
130	100		
132	96.7	58.2	135.8
95	94.7	59.0	137.8

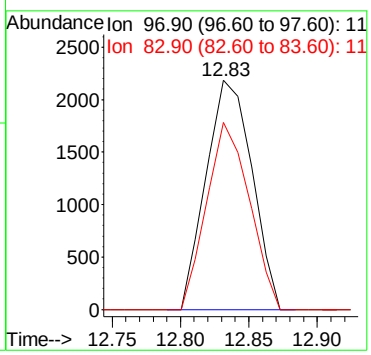


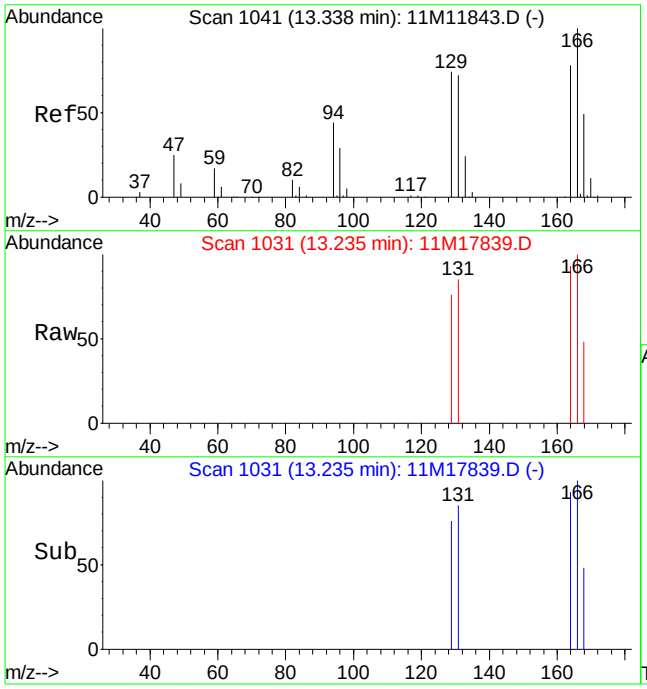


#61
1,1,2-Trichloroethane
Concen: 1.55 ug/L
RT: 12.83 min Scan# 992
Delta R.T. -0.01 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 97 Resp: 5100

Ion	Ratio	Lower	Upper
97	100		
83	75.9	50.3	117.3

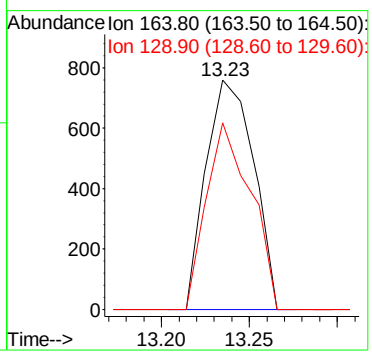


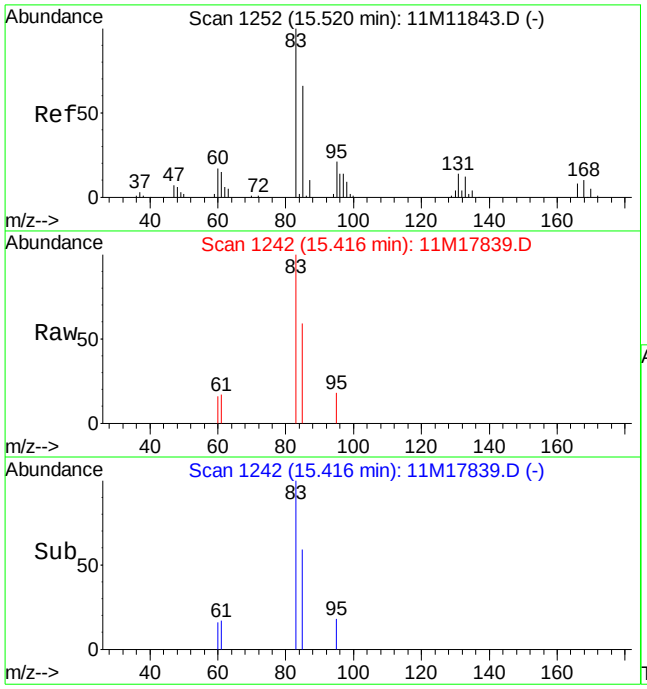


#64
Tetrachloroethene
Concen: 0.46 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. -0.00 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion:164 Resp: 1430

Ion	Ratio	Lower	Upper
164	100		
129	75.7	51.8	120.8

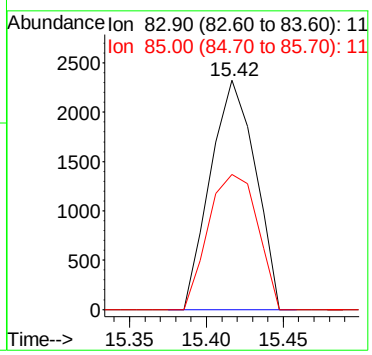




#77
1,1,2,2-Tetrachloroethane
Concen: 1.18 ug/L
RT: 15.42 min Scan# 1242
Delta R.T. 0.00 min
Lab File: 11M17839.D
Acq: 28 Apr 2017 12:51

Tgt Ion: 83 Resp: 4740

Ion	Ratio	Lower	Upper
83	100		
85	64.6	38.6	90.2



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17838.D Vial: 11
Acq On : 28 Apr 2017 12:22 Operator: TMB
Sample : L17041200-10 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:40 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

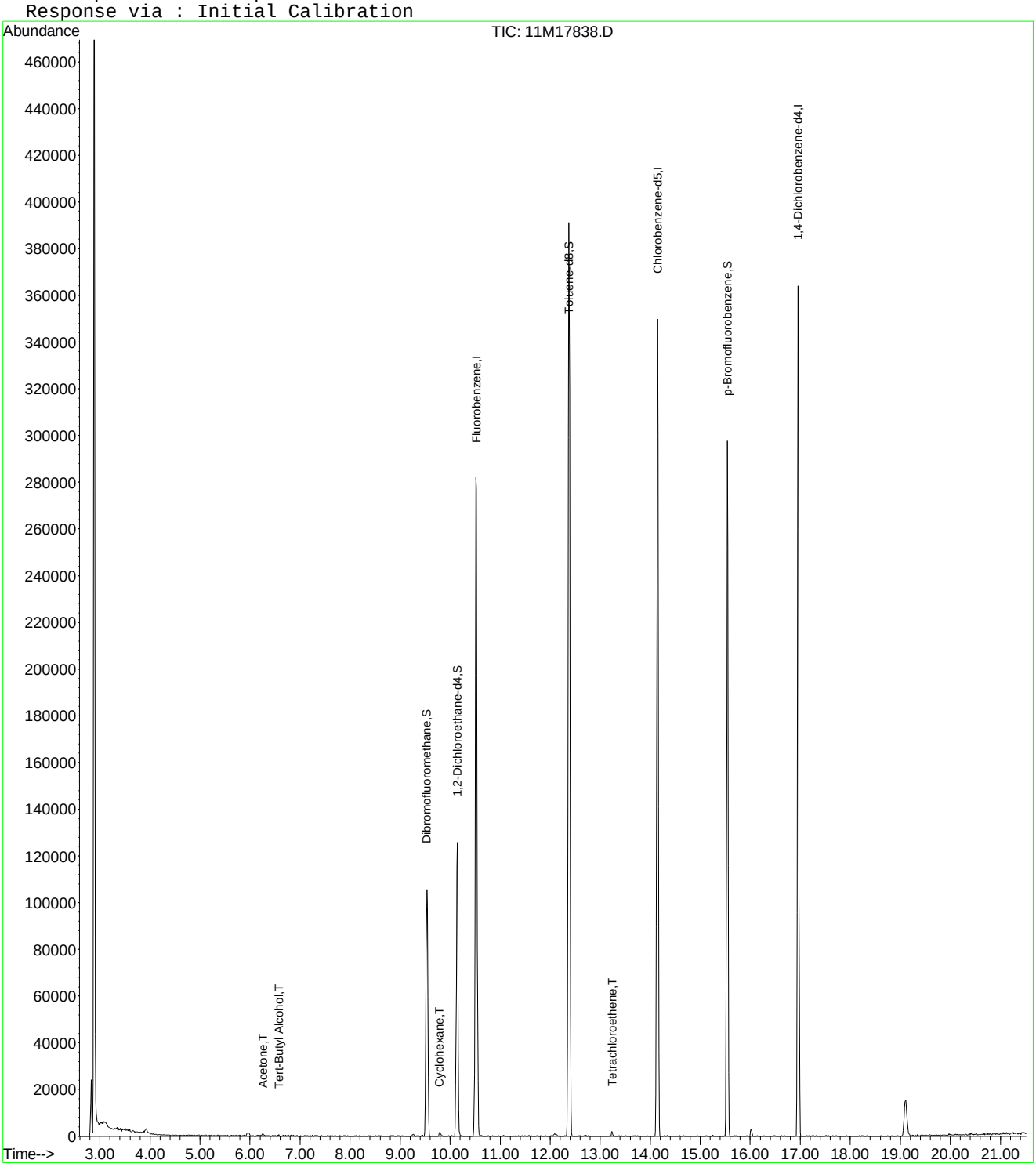
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	340903	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	240758	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	121132	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84984	25.1676	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.68%			
43) 1,2-Dichloroethane-d4	10.14	65	103748	26.4759	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.92%			
57) Toluene-d8	12.38	98	330662	26.4503	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.80%			
78) p-Bromofluorobenzene	15.54	95	119937	28.4870	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 113.96%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	489	Below Cal		93
13) Acetone	6.26	43	1941	1.7029	ug/L #	41
15) Tert-Butyl Alcohol	6.58	59	414	0.9711	ug/L #	60
33) Chloroform	9.26	83	1026	Below Cal	#	43
39) Cyclohexane	9.78	56	1950	0.2519	ug/L #	75
64) Tetrachloroethene	13.25	164	844	0.2728	ug/L	97

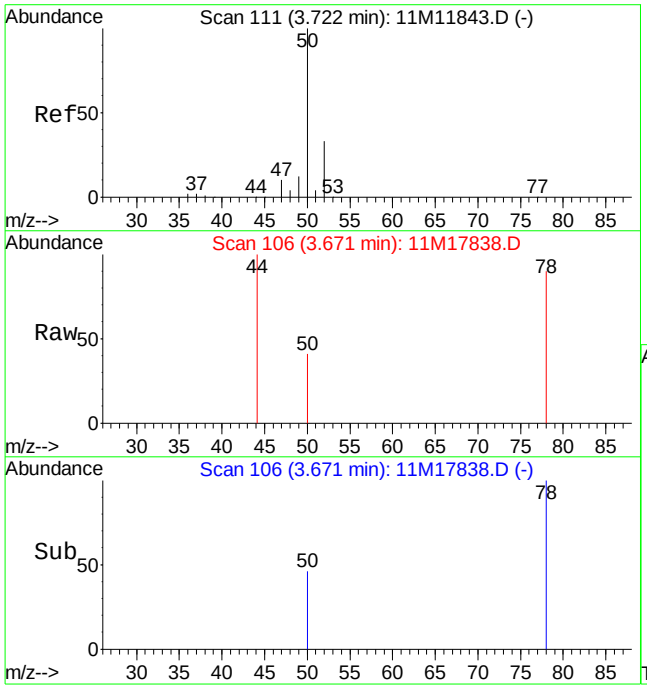
(#) = qualifier out of range (m) = manual integration
11M17838.D 8260WT.M Sun Apr 30 15:39:41 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17838.D Vial: 11
Acq On : 28 Apr 2017 12:22 Operator: TMB
Sample : L17041200-10 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

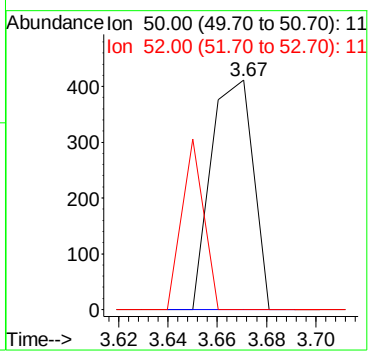


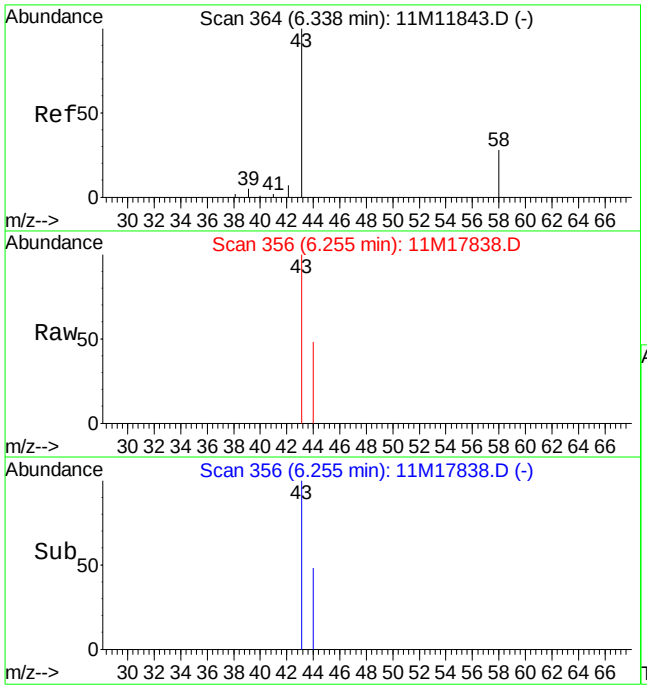


#3
Chloromethane
Concen: Below Cal
RT: 3.67 min Scan# 106
Delta R.T. 0.01 min
Lab File: 11M17838.D
Acq: 28 Apr 2017 12:22

Tgt Ion: 50 Resp: 489

Ion	Ratio	Lower	Upper
50	100		
52	38.9	20.8	48.6

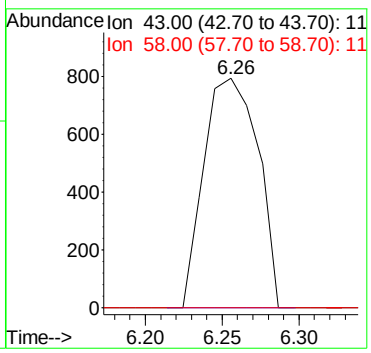


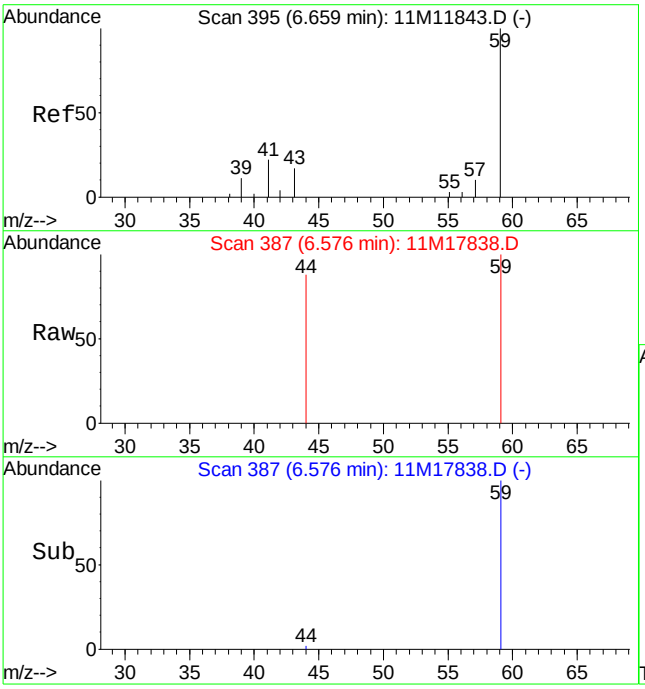


#13
Acetone
Concen: 1.70 ug/L
RT: 6.26 min Scan# 356
Delta R.T. -0.00 min
Lab File: 11M17838.D
Acq: 28 Apr 2017 12:22

Tgt Ion: 43 Resp: 1941

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

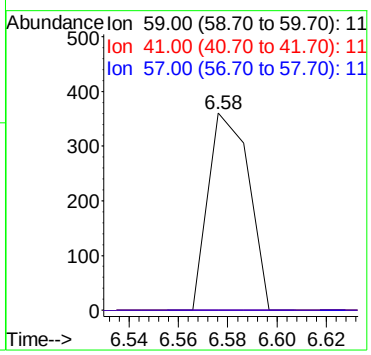


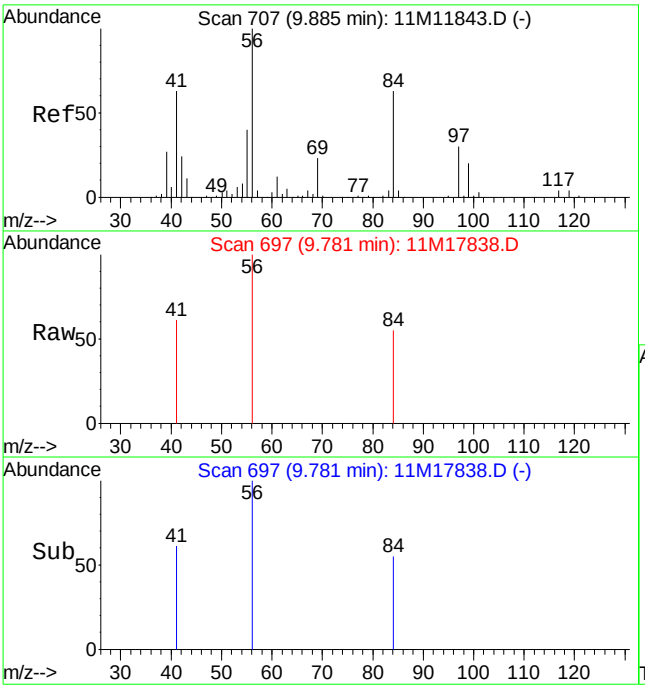


#15
Tert-Butyl Alcohol
Concen: 0.97 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17838.D
Acq: 28 Apr 2017 12:22

Tgt Ion: 59 Resp: 414

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

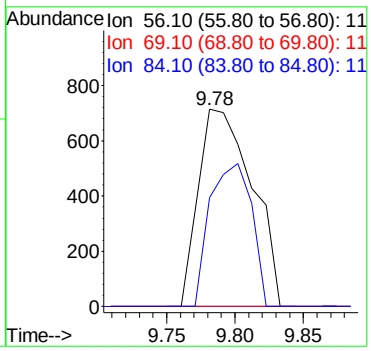


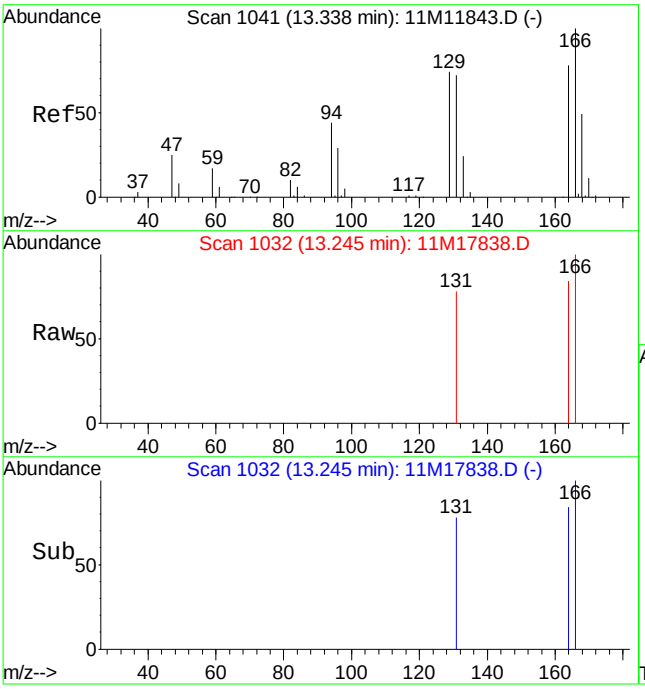


#39
Cyclohexane
Concen: 0.25 ug/L
RT: 9.78 min Scan# 697
Delta R.T. -0.02 min
Lab File: 11M17838.D
Acq: 28 Apr 2017 12:22

Tgt Ion: 56 Resp: 1950

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	56.2	41.6	97.0

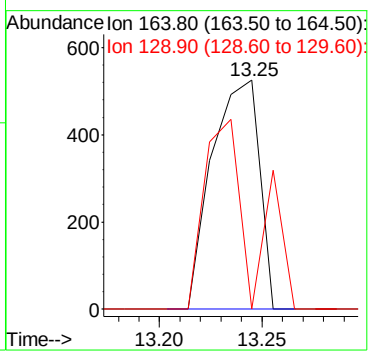




#64
Tetrachloroethene
Concen: 0.27 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17838.D
Acq: 28 Apr 2017 12:22

Tgt Ion:164 Resp: 844

Ion	Ratio	Lower	Upper
164	100		
129	83.8	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17837.D Vial: 10
Acq On : 28 Apr 2017 11:52 Operator: TMB
Sample : L17041200-11 A RS 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:38 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

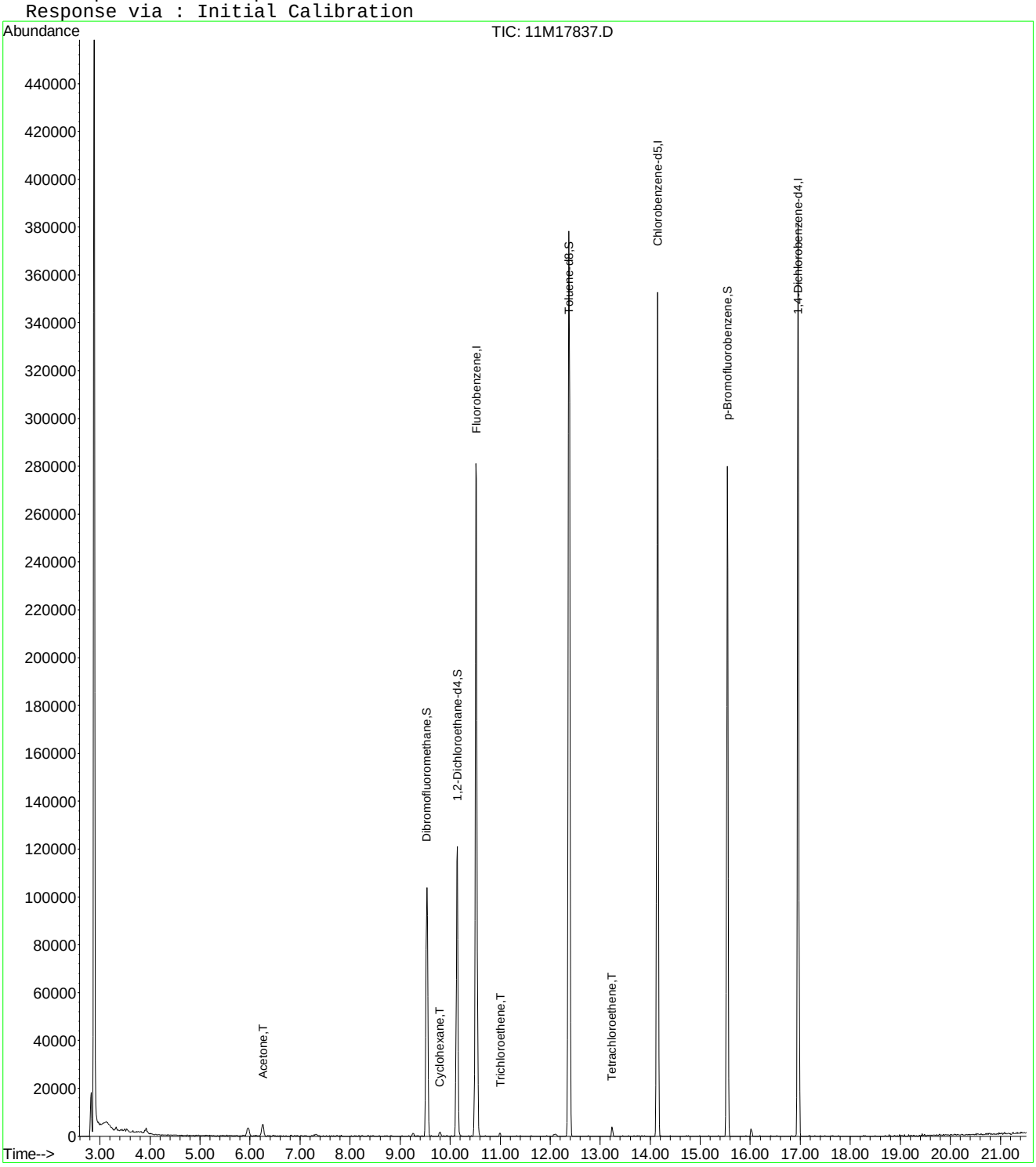
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	336003	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	237792	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	125928	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83061	24.9568	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.84%			
43) 1,2-Dichloroethane-d4	10.14	65	101983	26.4050	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.60%			
57) Toluene-d8	12.38	98	325089	26.3288	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.32%			
78) p-Bromofluorobenzene	15.54	95	116788	26.6826	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.72%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	236	Below Cal	#	40
13) Acetone	6.26	43	9913	8.8236	ug/L	91
39) Cyclohexane	9.79	56	1893	0.2481	ug/L #	81
46) Trichloroethene	11.00	130	558	0.1445	ug/L	68
64) Tetrachloroethene	13.23	164	1577	0.5160	ug/L	94

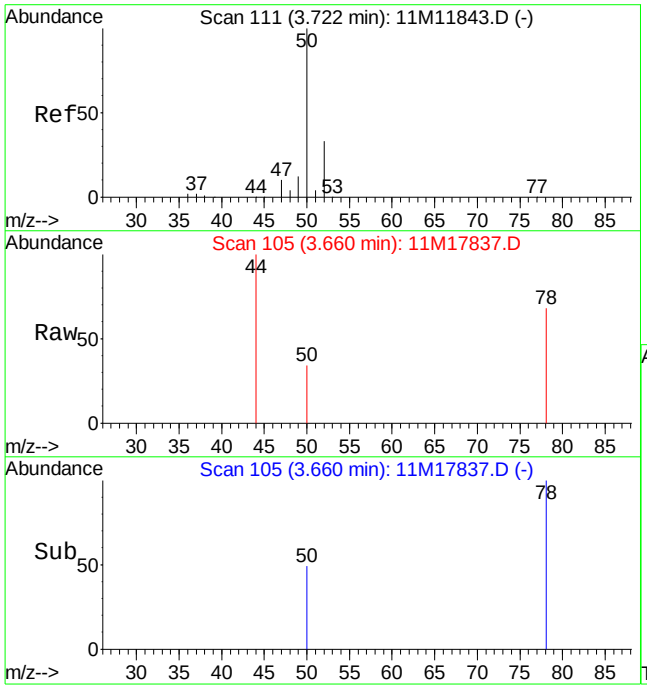
(#) = qualifier out of range (m) = manual integration
11M17837.D 8260WT.M Sun Apr 30 15:39:39 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17837.D Vial: 10
Acq On : 28 Apr 2017 11:52 Operator: TMB
Sample : L17041200-11 A RS 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

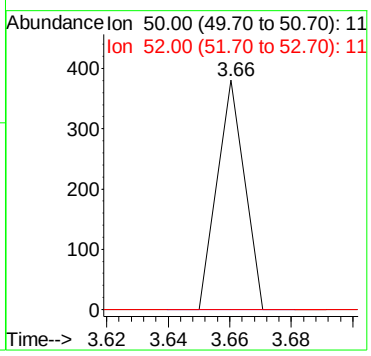


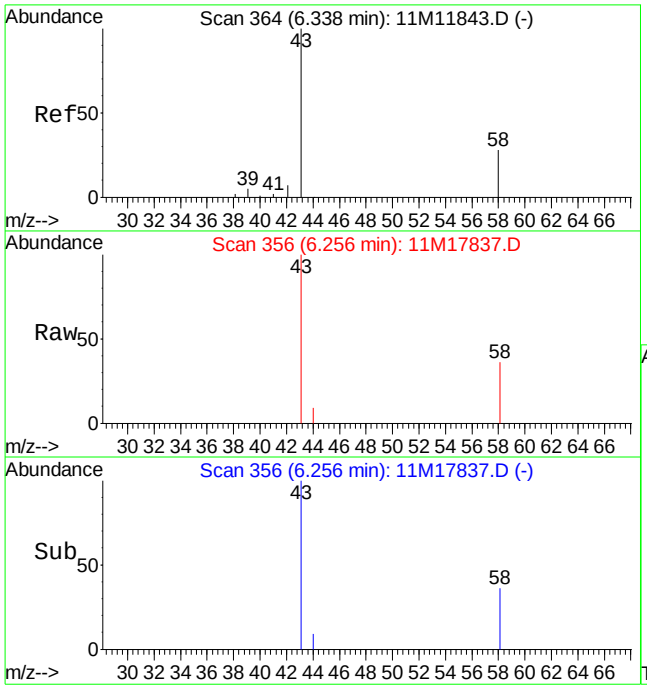


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17837.D
Acq: 28 Apr 2017 11:52

Tgt Ion: 50 Resp: 236

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

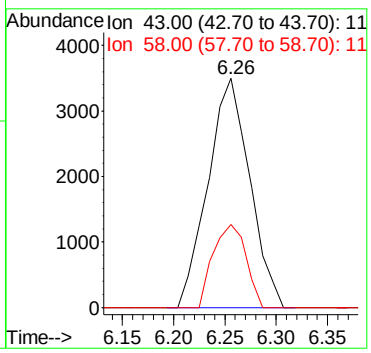


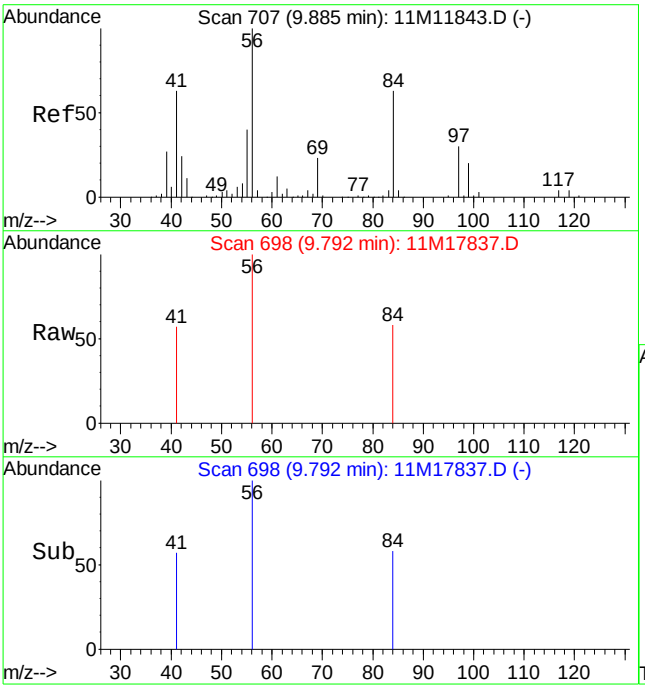


#13
Acetone
Concen: 8.82 ug/L
RT: 6.26 min Scan# 356
Delta R.T. -0.00 min
Lab File: 11M17837.D
Acq: 28 Apr 2017 11:52

Tgt Ion: 43 Resp: 9913

Ion	Ratio	Lower	Upper
43	100		
58	28.4	20.1	46.9

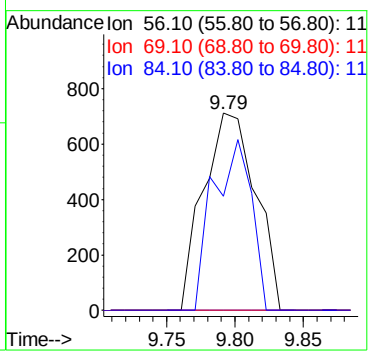


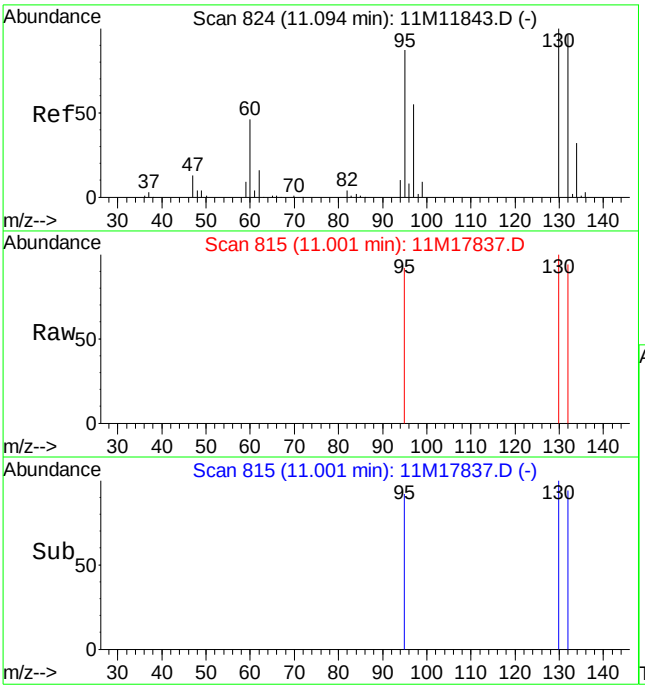


#39
Cyclohexane
Concen: 0.25 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17837.D
Acq: 28 Apr 2017 11:52

Tgt Ion: 56 Resp: 1893

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	63.3	41.6	97.0

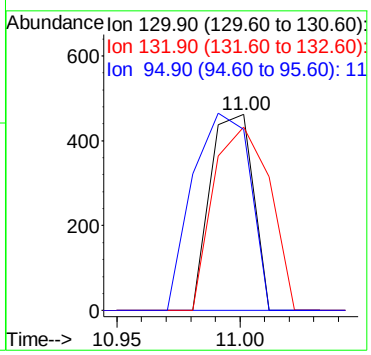


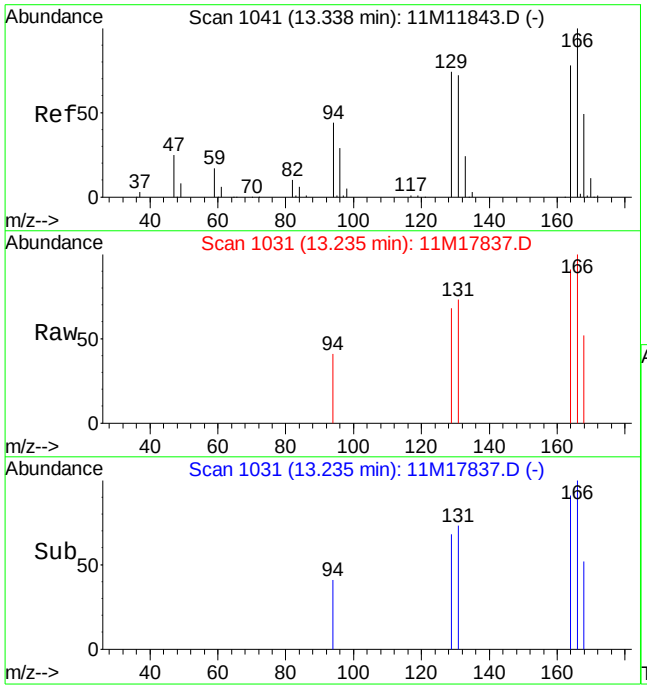


#46
Trichloroethene
Concen: 0.14 ug/L
RT: 11.00 min Scan# 815
Delta R.T. -0.00 min
Lab File: 11M17837.D
Acq: 28 Apr 2017 11:52

Tgt Ion:130 Resp: 558

Ion	Ratio	Lower	Upper
130	100		
132	123.5	58.2	135.8
95	134.9	59.0	137.8

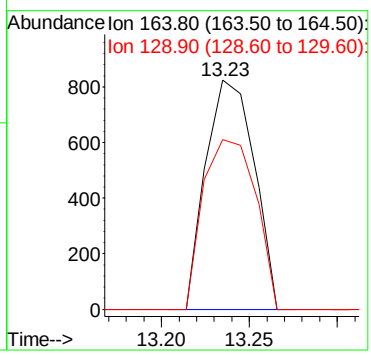




#64
Tetrachloroethene
Concen: 0.52 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. -0.00 min
Lab File: 11M17837.D
Acq: 28 Apr 2017 11:52

Tgt Ion:164 Resp: 1577

Ion	Ratio	Lower	Upper
164	100		
129	80.5	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17832.D Vial: 5
Acq On : 28 Apr 2017 9:25 Operator: TMB
Sample : L17041200-12 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 09:47:36 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	346745	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	249745	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	139142	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	88198	25.6793	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.72%			
43) 1,2-Dichloroethane-d4	10.14	65	103546	25.9791	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.92%			
57) Toluene-d8	12.38	98	340209	26.2347	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%			
78) p-Bromofluorobenzene	15.54	95	125785	26.0090	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.04%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	98617	23.2975	ug/L	99
3) Chloromethane	3.65	50	103364	24.4460	ug/L	97
4) Vinyl Chloride	3.87	62	65211	21.9123	ug/L	100
5) 1,3-Butadiene	3.91	54	43489	25.1349	ug/L	97
6) Bromomethane	4.76	94	60736	19.7655	ug/L	98
7) Chloroethane	4.92	64	65900	21.3772	ug/L	100
8) Trichlorofluoromethane	5.39	101	107125	20.6041	ug/L	99
9) Diethyl ether	5.91	59	336506	87.4595	ug/L	97
10) Isoprene	5.95	67	96877	17.9857	ug/L	100
11) Acrolein	6.14	56	57736	94.3417	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	65411	21.2435	ug/L	97
13) Acetone	6.25	43	30979	26.7204	ug/L	97
14) 1,1-Dichloroethene	6.46	61	119196	19.2486	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	86515	199.5075	ug/L	98
16) Dimethyl Sulfide	6.72	62	93927	19.3079	ug/L	100
17) Iodomethane	6.97	142	76519	18.7827	ug/L	99
18) Methyl acetate	6.98	43	62044	16.9676	ug/L	97
19) Methylene Chloride	7.22	84	76696	18.5630	ug/L	94
20) Carbon Disulfide	7.27	76	151384	14.2979	ug/L	98
21) Acrylonitrile	7.40	53	33421	19.5175	ug/L	97
22) Methyl Tert Butyl Ether	7.42	73	200334	19.3625	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	70270	18.6475	ug/L	98
24) n-Hexane	7.72	57	108639	18.5880	ug/L	98
25) Diisopropyl ether	8.05	45	1470740	97.6103	ug/L	98
26) Vinyl Acetate	8.22	43	180929	25.7239	ug/L	99
27) 1,1-Dichloroethane	8.25	63	154315	19.4286	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1208209	90.7174	ug/L	98
29) 2-Butanone	8.79	43	37982	20.0495	ug/L	96
30) Propionitrile	8.89	54	59938	94.8418	ug/L	98
31) 2,2-Dichloropropane	9.00	77	110330	20.5214	ug/L	98
32) cis-1,2-Dichloroethene	9.06	96	81909	19.3701	ug/L	95
33) Chloroform	9.25	83	131688	20.7715	ug/L	99
34) 1-Bromopropane	9.39	122	19325	23.0711	ug/L	97
35) Bromochloromethane	9.48	130	51058	19.6924	ug/L	97
36) Tetrahydrofuran	9.50	42	127551	82.6614	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	115045	20.5414	ug/L	99
39) Cyclohexane	9.79	56	137072	17.4057	ug/L	97
40) 1,1-Dichloropropene	9.95	75	95663	19.4890	ug/L	99
41) Carbon Tetrachloride	10.08	117	98498	20.3337	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	1011037	94.1024	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17832.D 8260WT.M Fri Apr 28 09:47:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17832.D Vial: 5
Acq On : 28 Apr 2017 9:25 Operator: TMB
Sample : L17041200-12 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 09:47:36 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

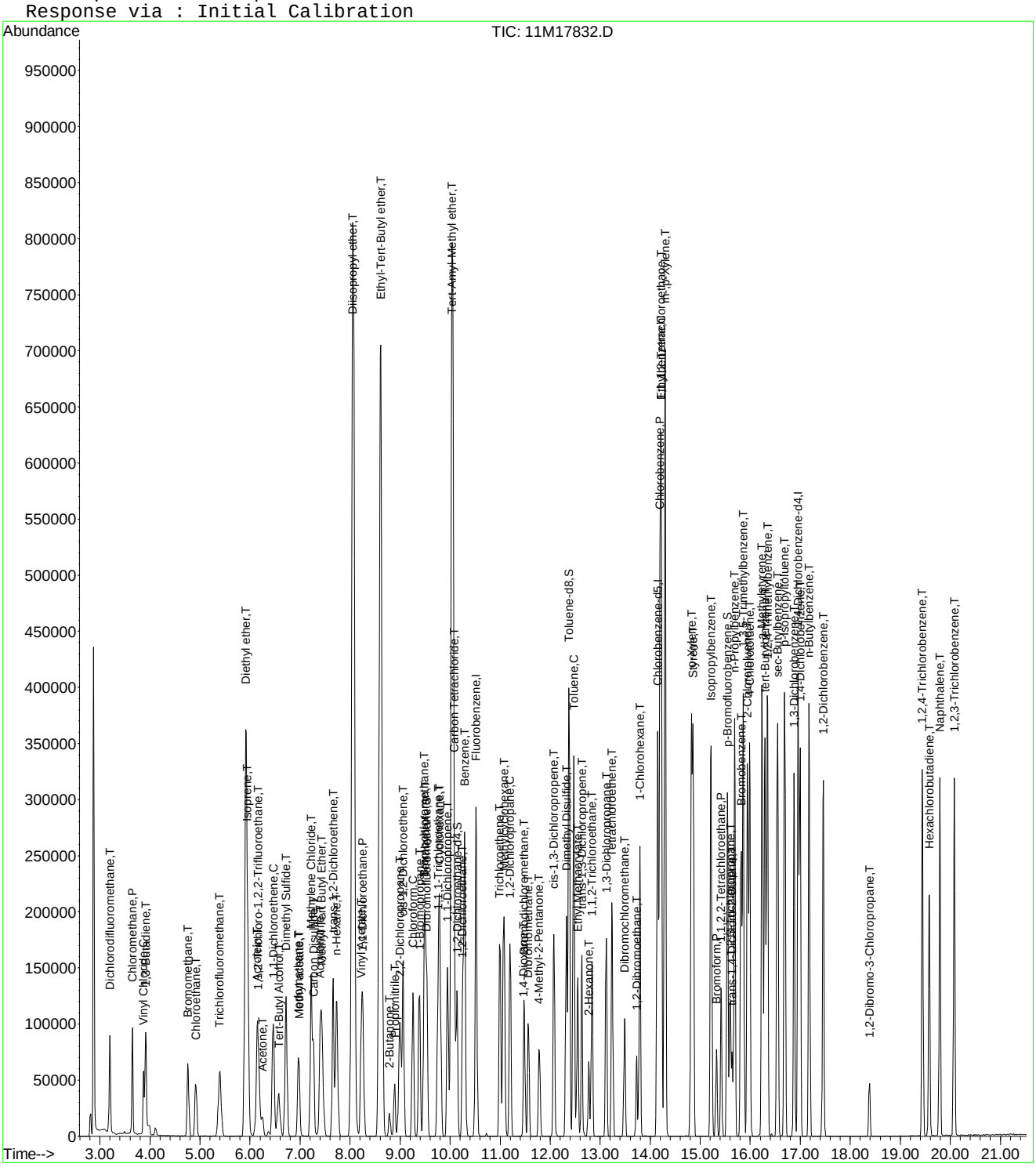
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	106090	19.5730	ug/L	98
45)	Benzene	10.29	78	295117	19.4072	ug/L	97
46)	Trichloroethene	10.99	130	75504	18.9424	ug/L	98
47)	Methylcyclohexane	11.07	83	114438	18.7260	ug/L	99
48)	1,2-Dichloropropane	11.20	63	90292	19.0782	ug/L	99
49)	1,4-Dioxane	11.47	88	8191	191.6541	ug/L	94
50)	Bromodichloromethane	11.48	83	93679	18.9725	ug/L	100
51)	Dibromomethane	11.56	93	44259	19.7693	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	31272	18.7816	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	123401	21.0641	ug/L	99
55)	Dimethyl Disulfide	12.32	79	67364	18.4229	ug/L	96
58)	Toluene	12.47	91	310000	19.1718	ug/L	96
59)	Ethyl Methacrylate	12.55	69	93321	20.9990	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	100869	19.7618	ug/L	100
61)	1,1,2-Trichloroethane	12.83	97	63984	18.7585	ug/L	99
62)	2-Hexanone	12.77	43	60261	21.2651	ug/L	98
63)	1,3-Dichloropropane	13.12	76	114347	20.1844	ug/L	99
64)	Tetrachloroethene	13.23	164	67035	20.8849	ug/L	97
65)	Dibromochloromethane	13.48	129	73843	19.4184	ug/L	99
66)	1,2-Dibromoethane	13.73	107	58550	19.0948	ug/L	98
67)	1-Chlorohexane	13.79	91	97457	21.1497	ug/L	97
68)	Chlorobenzene	14.20	112	199552	19.4065	ug/L	97
69)	1,1,1,2-Tetrachloroethane	14.22	131	72949	19.0553	ug/L	99
70)	Ethylbenzene	14.22	106	111750	20.5512	ug/L	89
71)	m-,p-Xylene	14.30	106	265847	40.8601	ug/L	89
72)	o-Xylene	14.83	106	132849	20.2648	ug/L	93
73)	Styrene	14.86	104	215601	22.1892	ug/L	99
74)	Bromoform	15.32	173	48465	17.7860	ug/L	98
75)	Isopropylbenzene	15.22	105	329138	20.5803	ug/L	95
77)	1,1,2,2-Tetrachloroethane	15.42	83	87362	19.9718	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	23988	19.1515	ug/L	96
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22665	16.7352	ug/L	96
81)	n-Propylbenzene	15.69	91	394752	20.2419	ug/L	96
82)	Bromobenzene	15.82	156	96948	20.4275	ug/L	97
83)	1,3,5-Trimethylbenzene	15.86	105	282726	21.1911	ug/L	97
84)	2-Chlorotoluene	15.94	91	246777	18.6377	ug/L	86
85)	4-Chlorotoluene	15.99	91	242204	20.2670	ug/L	90
86)	a-Methylstyrene	16.23	118	162575	22.1092	ug/L	99
87)	tert-Butylbenzene	16.30	134	63611	19.6103	ug/L	96
88)	1,2,4-Trimethylbenzene	16.35	105	294125	21.0788	ug/L	95
89)	sec-Butylbenzene	16.54	105	354803	20.1359	ug/L	97
90)	p-Isopropyltoluene	16.69	119	310932	21.9608	ug/L	96
91)	1,3-Dichlorobenzene	16.87	146	174810	20.7066	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	179873	19.8111	ug/L	99
93)	n-Butylbenzene	17.17	91	278687	22.0687	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	176416	20.7088	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	14781	19.2585	ug/L	97
96)	1,2,4-Trichlorobenzene	19.44	180	135558	22.1645	ug/L	98
97)	Hexachlorobutadiene	19.58	225	66615	20.5365	ug/L	98
98)	Naphthalene	19.79	128	302896	22.2055	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	132325	21.1482	ug/L	98

(#) = qualifier out of range (m) = manual integration
11M17832.D 8260WT.M Fri Apr 28 09:47:37 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17832.D Vial: 5
Acq On : 28 Apr 2017 9:25 Operator: TMB
Sample : L17041200-12 A MS 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 9:47 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17833.D Vial: 6
Acq On : 28 Apr 2017 9:55 Operator: TMB
Sample : L17041200-13 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 10:17:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	350112	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	255869	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	141809	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	89907	25.9252	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.72%			
43) 1,2-Dichloroethane-d4	10.13	65	104181	25.8871	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.56%			
57) Toluene-d8	12.38	98	347226	26.1349	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.52%			
78) p-Bromofluorobenzene	15.54	95	129036	26.1794	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.72%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	96119	22.4961	ug/L	99
3) Chloromethane	3.65	50	84397	19.6232	ug/L	99
4) Vinyl Chloride	3.88	62	58950	19.6180	ug/L	99
5) 1,3-Butadiene	3.92	54	39514	22.4630	ug/L	97
6) Bromomethane	4.76	94	59835	19.2850	ug/L	100
7) Chloroethane	4.91	64	65032	20.8927	ug/L	98
8) Trichlorofluoromethane	5.40	101	102176	19.4632	ug/L	98
9) Diethyl ether	5.91	59	340971	87.7677	ug/L	97
10) Isoprene	5.95	67	93922	17.2694	ug/L	99
11) Acrolein	6.14	56	59636	96.5092	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	64151	20.6340	ug/L	100
13) Acetone	6.25	43	32460	27.7286	ug/L	93
14) 1,1-Dichloroethene	6.46	61	115400	18.4564	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	91427	208.8072	ug/L	100
16) Dimethyl Sulfide	6.72	62	92155	18.7614	ug/L	97
17) Iodomethane	6.97	142	74190	18.0840	ug/L	98
18) Methyl acetate	6.98	43	65195	17.6578	ug/L	98
19) Methylene Chloride	7.23	84	78032	18.7047	ug/L	96
20) Carbon Disulfide	7.27	76	147641	13.8103	ug/L	99
21) Acrylonitrile	7.40	53	33179	19.1898	ug/L	100
22) Methyl Tert Butyl Ether	7.42	73	203497	19.4791	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	70817	18.6119	ug/L	99
24) n-Hexane	7.73	57	105453	17.8694	ug/L	98
25) Diisopropyl ether	8.07	45	1469255	96.5740	ug/L	98
26) Vinyl Acetate	8.22	43	181785	25.5971	ug/L	99
27) 1,1-Dichloroethane	8.25	63	153422	19.1304	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1223701	90.9970	ug/L	98
29) 2-Butanone	8.79	43	38382	20.0658	ug/L	96
30) Propionitrile	8.89	54	63847	100.0556	ug/L	100
31) 2,2-Dichloropropane	9.00	77	106633	19.6430	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	82049	19.2166	ug/L	95
33) Chloroform	9.25	83	133279	20.8207	ug/L	99
34) 1-Bromopropane	9.39	122	19163	22.6642	ug/L	95
35) Bromochloromethane	9.48	130	51127	19.5294	ug/L	96
36) Tetrahydrofuran	9.50	42	134984	86.6371	ug/L	97
38) 1,1,1-Trichloroethane	9.76	97	114143	20.1844	ug/L	99
39) Cyclohexane	9.79	56	129878	16.3336	ug/L	99
40) 1,1-Dichloropropene	9.95	75	94957	19.1591	ug/L	98
41) Carbon Tetrachloride	10.08	117	97121	19.8567	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1028586	94.8151	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17833.D 8260WT.M Fri Apr 28 10:17:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17833.D Vial: 6
Acq On : 28 Apr 2017 9:55 Operator: TMB
Sample : L17041200-13 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 10:17:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

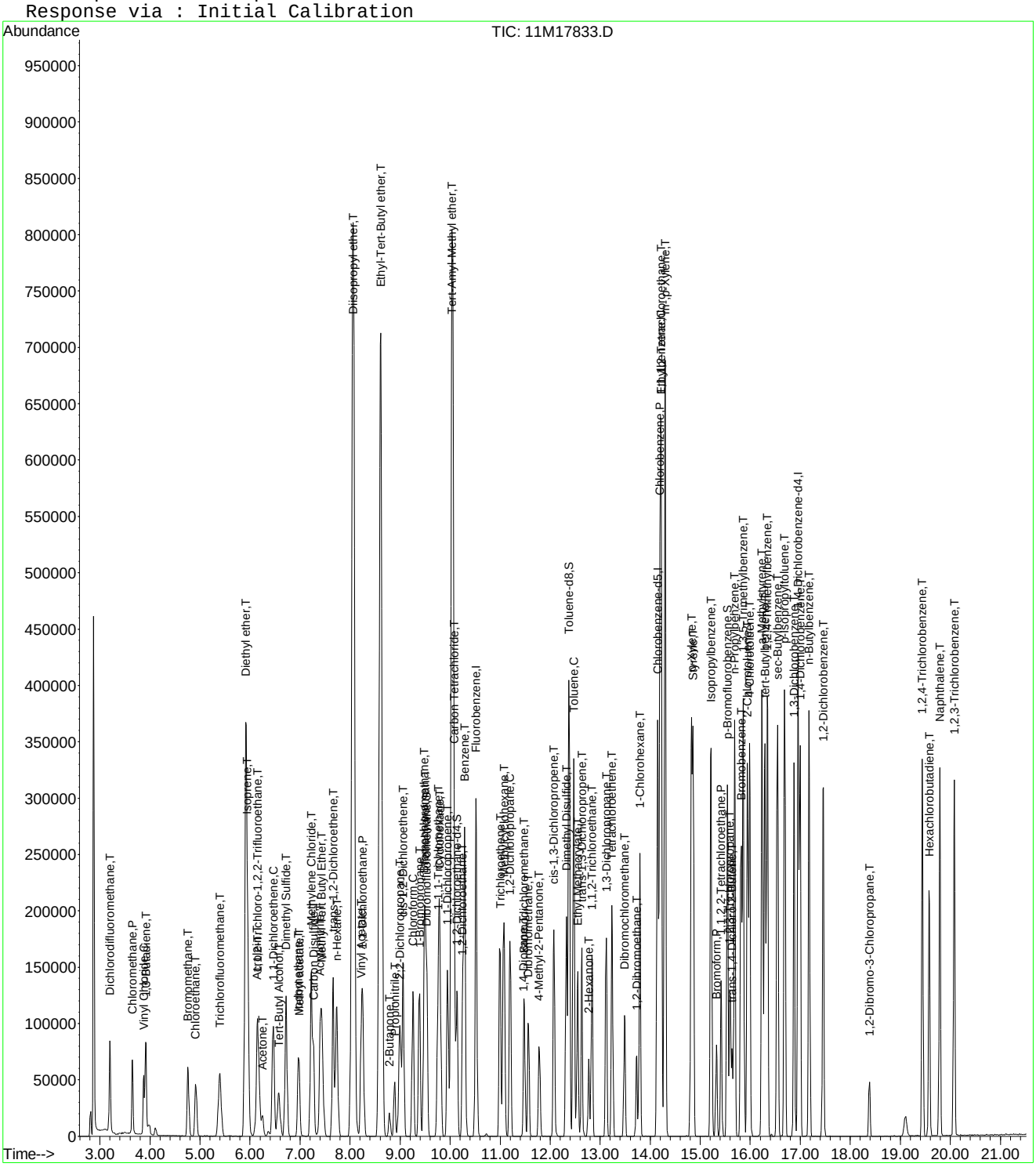
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.25	62	107759	19.6897	ug/L		99
45)	Benzene	10.29	78	298281	19.4266	ug/L		96
46)	Trichloroethene	11.00	130	74339	18.4708	ug/L		99
47)	Methylcyclohexane	11.07	83	109538	17.7518	ug/L		99
48)	1,2-Dichloropropane	11.20	63	91359	19.1180	ug/L		100
49)	1,4-Dioxane	11.47	88	8556	198.2692	ug/L		90
50)	Bromodichloromethane	11.48	83	95739	19.2032	ug/L		99
51)	Dibromomethane	11.56	93	45098	19.9503	ug/L		98
53)	4-Methyl-2-Pentanone	11.78	58	31450	18.7068	ug/L		97
54)	cis-1,3-Dichloropropene	12.08	75	124354	21.0227	ug/L		100
55)	Dimethyl Disulfide	12.32	79	67315	18.2325	ug/L		95
58)	Toluene	12.47	91	312673	18.8743	ug/L		95
59)	Ethyl Methacrylate	12.55	69	94575	20.7719	ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	104120	19.9105	ug/L		98
61)	1,1,2-Trichloroethane	12.83	97	67205	19.2312	ug/L		98
62)	2-Hexanone	12.77	43	62003	21.3562	ug/L		95
63)	1,3-Dichloropropane	13.12	76	115005	19.8147	ug/L		97
64)	Tetrachloroethene	13.23	164	66546	20.2363	ug/L		100
65)	Dibromochloromethane	13.48	129	74542	19.1330	ug/L		99
66)	1,2-Dibromoethane	13.73	107	61240	19.4940	ug/L		99
67)	1-Chlorohexane	13.79	91	94625	20.0436	ug/L		99
68)	Chlorobenzene	14.20	112	202787	19.2491	ug/L		99
69)	1,1,1,2-Tetrachloroethane	14.22	131	73446	18.7260	ug/L		100
70)	Ethylbenzene	14.22	106	111139	19.9496	ug/L		88
71)	m-,p-Xylene	14.30	106	262823	39.4285	ug/L		88
72)	o-Xylene	14.83	106	133058	19.8109	ug/L		95
73)	Styrene	14.86	104	217272	21.8259	ug/L		98
74)	Bromoform	15.32	173	50475	18.0803	ug/L		99
75)	Isopropylbenzene	15.22	105	323517	19.7446	ug/L		96
77)	1,1,2,2-Tetrachloroethane	15.42	83	90293	20.2536	ug/L		100
79)	1,2,3-Trichloropropane	15.59	110	25225	19.7603	ug/L		94
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22702	16.4473	ug/L		91
81)	n-Propylbenzene	15.69	91	384755	19.3582	ug/L		95
82)	Bromobenzene	15.82	156	97255	20.1068	ug/L		97
83)	1,3,5-Trimethylbenzene	15.86	105	281408	20.6957	ug/L		96
84)	2-Chlorotoluene	15.94	91	245734	18.2099	ug/L		86
85)	4-Chlorotoluene	15.99	91	240623	19.7560	ug/L		91
86)	a-Methylstyrene	16.23	118	159227	21.2467	ug/L		99
87)	tert-Butylbenzene	16.30	134	62636	18.9465	ug/L		93
88)	1,2,4-Trimethylbenzene	16.34	105	292829	20.5912	ug/L		96
89)	sec-Butylbenzene	16.54	105	348118	19.3850	ug/L		96
90)	p-Isopropyltoluene	16.69	119	305419	21.1657	ug/L		97
91)	1,3-Dichlorobenzene	16.87	146	174940	20.3323	ug/L		98
92)	1,4-Dichlorobenzene	17.00	146	176971	19.1249	ug/L		100
93)	n-Butylbenzene	17.17	91	278315	21.6247	ug/L		96
94)	1,2-Dichlorobenzene	17.46	146	176209	20.2955	ug/L		98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	16051	20.5199	ug/L		91
96)	1,2,4-Trichlorobenzene	19.44	180	137607	22.0764	ug/L		99
97)	Hexachlorobutadiene	19.58	225	65566	19.8329	ug/L		99
98)	Naphthalene	19.79	128	311897	22.4354	ug/L	#	97
99)	1,2,3-Trichlorobenzene	20.08	180	134052	21.0213	ug/L		98

(#) = qualifier out of range (m) = manual integration
11M17833.D 8260WT.M Fri Apr 28 10:17:28 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17833.D Vial: 6
Acq On : 28 Apr 2017 9:55 Operator: TMB
Sample : L17041200-13 A MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 10:17 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17848.D Vial: 21
Acq On : 28 Apr 2017 17:16 Operator: ADC
Sample : L17041200-14 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:40:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

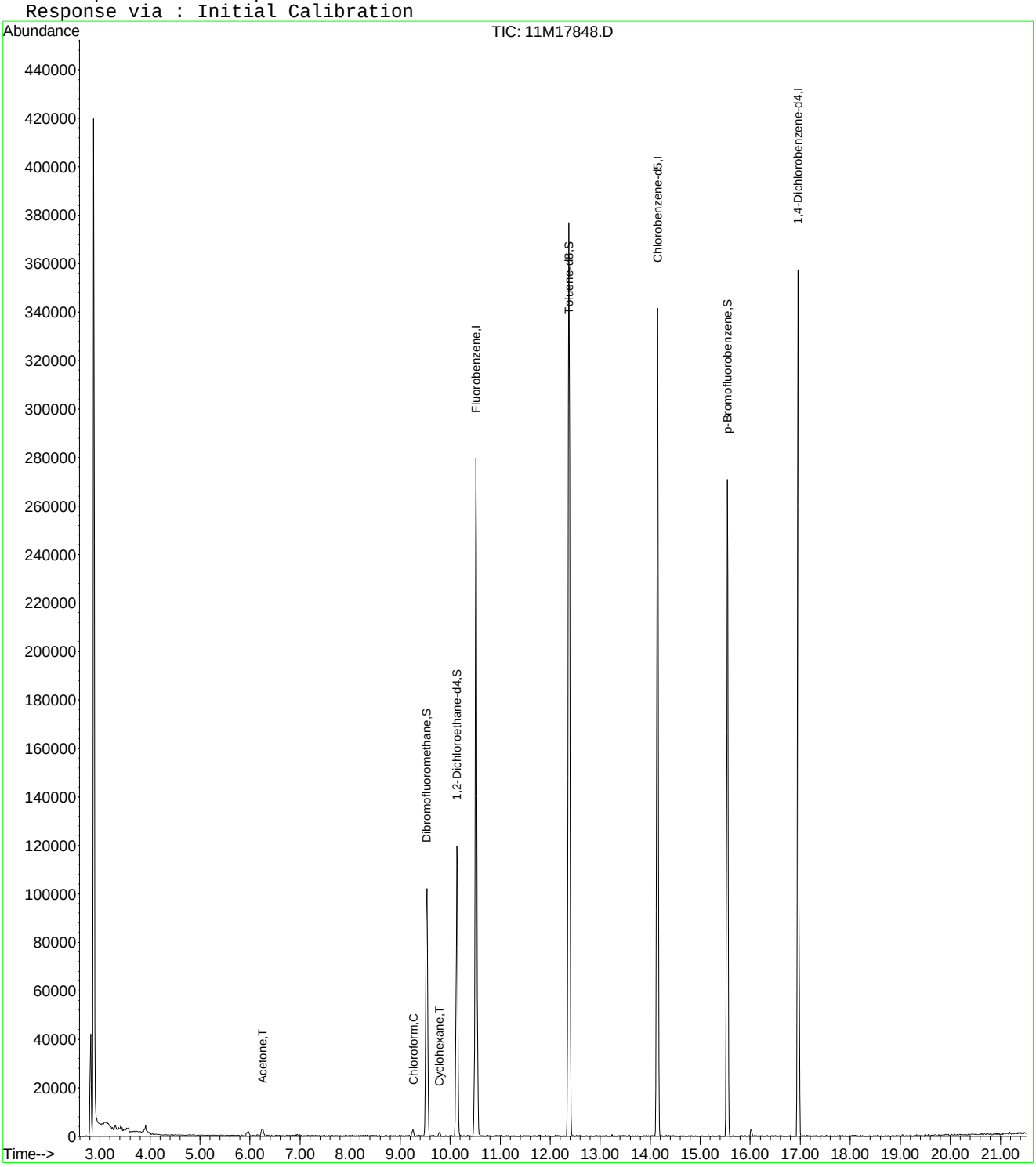
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	319084	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	227503	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	119422	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	81094	25.6578	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.64%			
43) 1,2-Dichloroethane-d4	10.13	65	100458	27.3893	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.56%			
57) Toluene-d8	12.38	98	318194	26.9359	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.76%			
78) p-Bromofluorobenzene	15.54	95	110248	26.5607	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.24%			
Target Compounds						Qvalue
13) Acetone	6.25	43	5831	5.4654	ug/L	93
33) Chloroform	9.26	83	3009	0.3267	ug/L	95
39) Cyclohexane	9.78	56	1825	0.2518	ug/L #	80

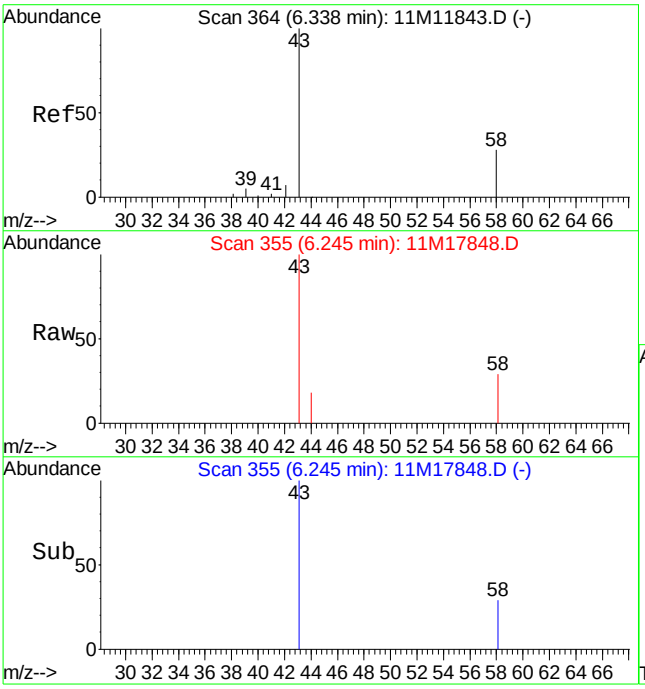
(#) = qualifier out of range (m) = manual integration
11M17848.D 8260WT.M Sun Apr 30 15:40:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17848.D Vial: 21
Acq On : 28 Apr 2017 17:16 Operator: ADC
Sample : L17041200-14 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

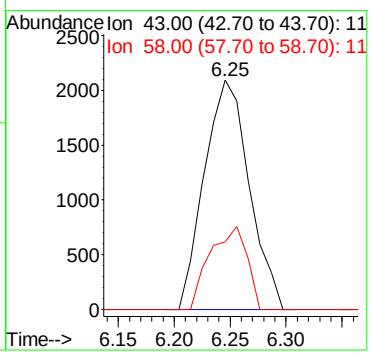


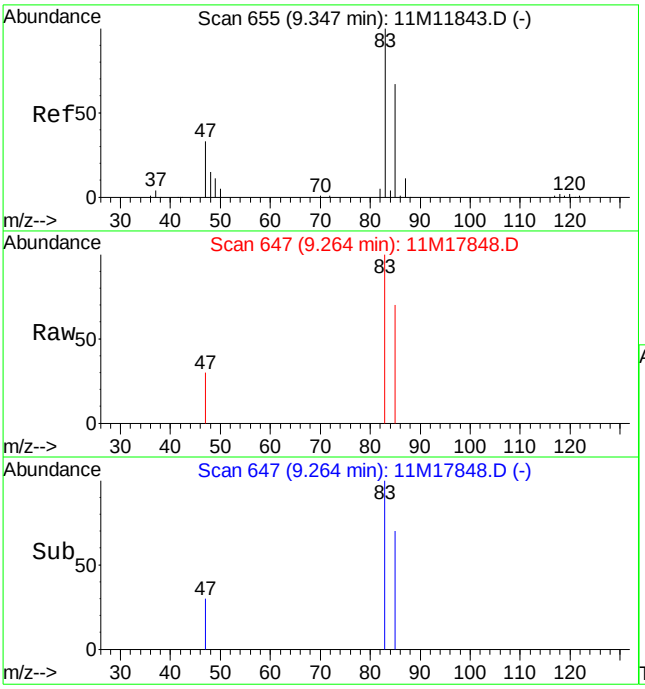


#13
Acetone
Concen: 5.47 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17848.D
Acq: 28 Apr 2017 17:16

Tgt Ion: 43 Resp: 5831

Ion	Ratio	Lower	Upper
43	100		
58	29.7	20.1	46.9

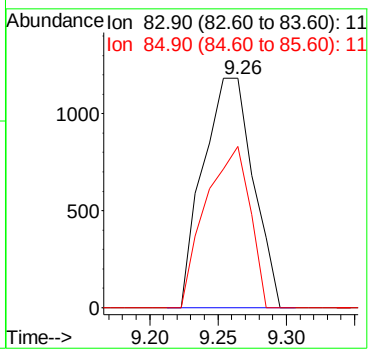


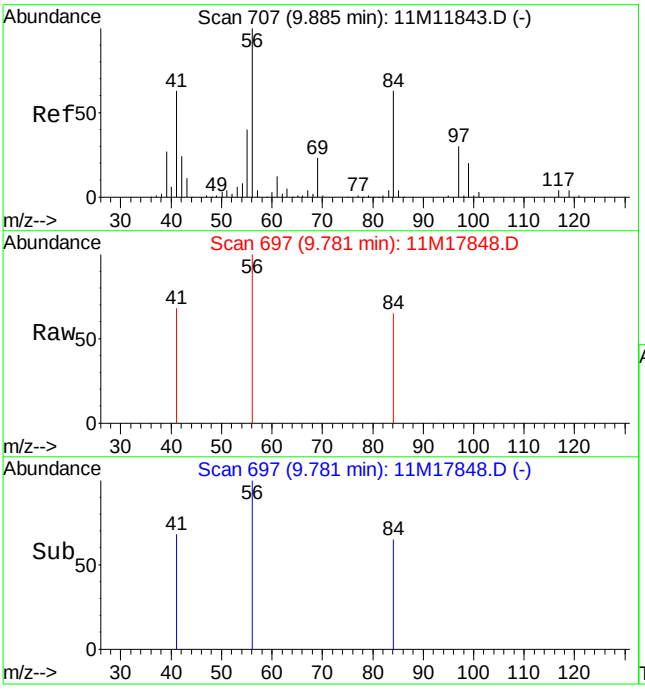


#33
Chloroform
Concen: 0.33 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.00 min
Lab File: 11M17848.D
Acq: 28 Apr 2017 17:16

Tgt Ion: 83 Resp: 3009

Ion	Ratio	Lower	Upper
83	100		
85	62.0	39.4	92.0

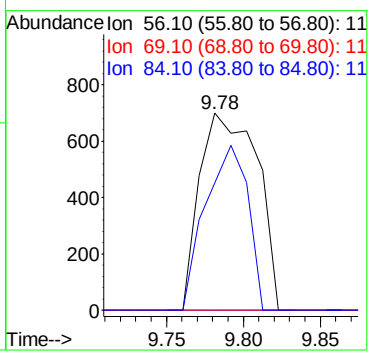




#39
Cyclohexane
Concen: 0.25 ug/L
RT: 9.78 min Scan# 697
Delta R.T. -0.02 min
Lab File: 11M17848.D
Acq: 28 Apr 2017 17:16

Tgt Ion: 56 Resp: 1825

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	61.6	41.6	97.0



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17849.D Vial: 22
Acq On : 28 Apr 2017 17:46 Operator: ADC
Sample : L17041200-15 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:40:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

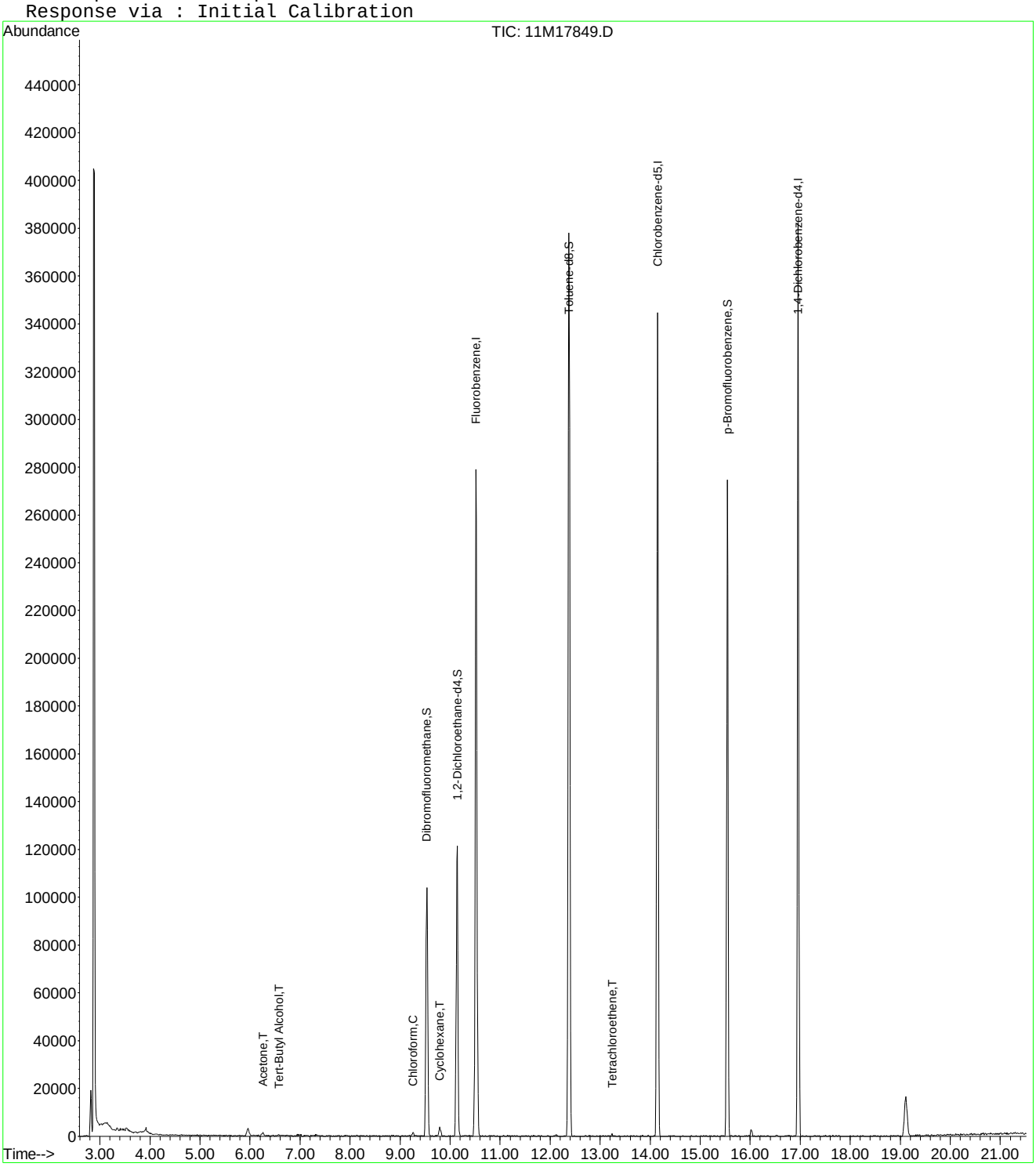
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	326250	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	232005	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	124350	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	82256	25.4538	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.80%			
43) 1,2-Dichloroethane-d4	10.14	65	101071	26.9511	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.80%			
57) Toluene-d8	12.38	98	318313	26.4231	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.68%			
78) p-Bromofluorobenzene	15.54	95	112465	26.0210	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.08%			
Target Compounds						Qvalue
3) Chloromethane	3.57	50	205	Below Cal	#	40
13) Acetone	6.26	43	2439	2.2359	ug/L #	56
15) Tert-Butyl Alcohol	6.58	59	388	0.9510	ug/L #	60
33) Chloroform	9.25	83	2146	0.1693	ug/L	96
39) Cyclohexane	9.79	56	3708	0.5004	ug/L #	90
64) Tetrachloroethene	13.25	164	406	0.1362	ug/L #	6

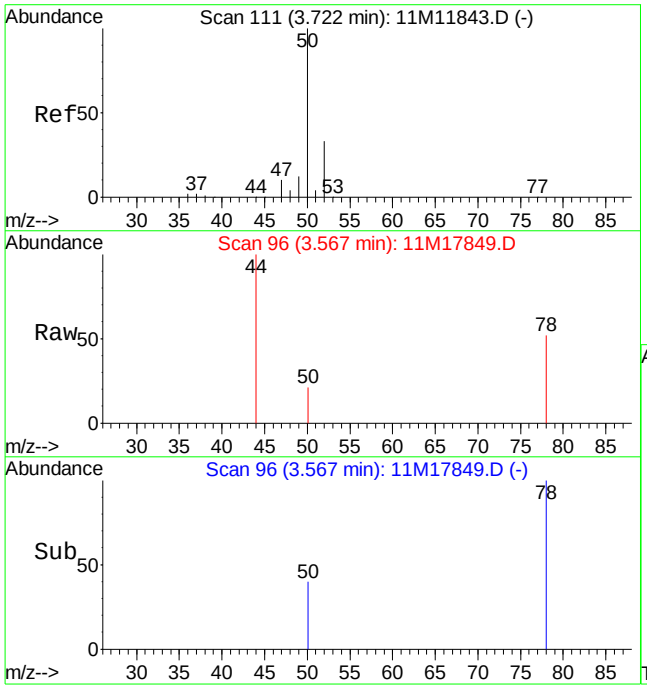
(#) = qualifier out of range (m) = manual integration
11M17849.D 8260WT.M Sun Apr 30 15:40:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17849.D Vial: 22
Acq On : 28 Apr 2017 17:46 Operator: ADC
Sample : L17041200-15 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

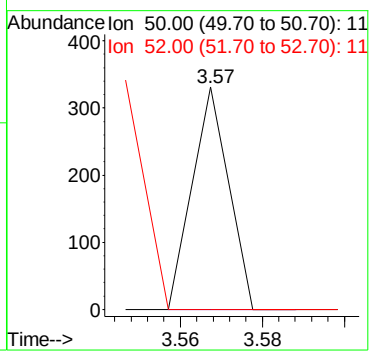


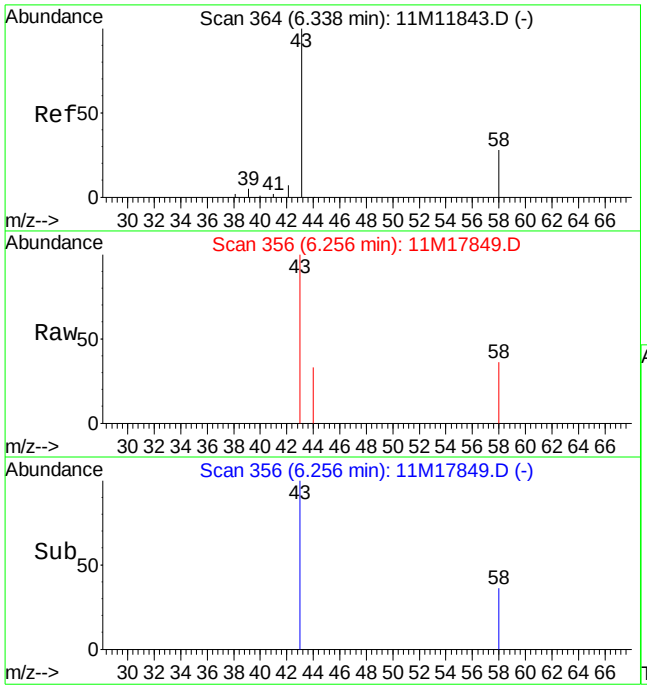


#3
Chloromethane
Concen: Below Cal
RT: 3.57 min Scan# 96
Delta R.T. -0.09 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion: 50 Resp: 205

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

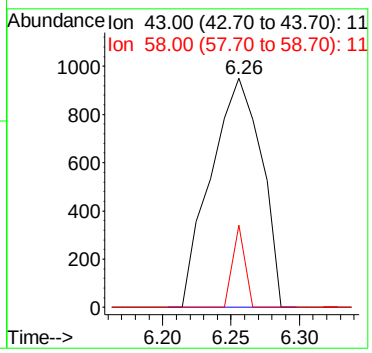


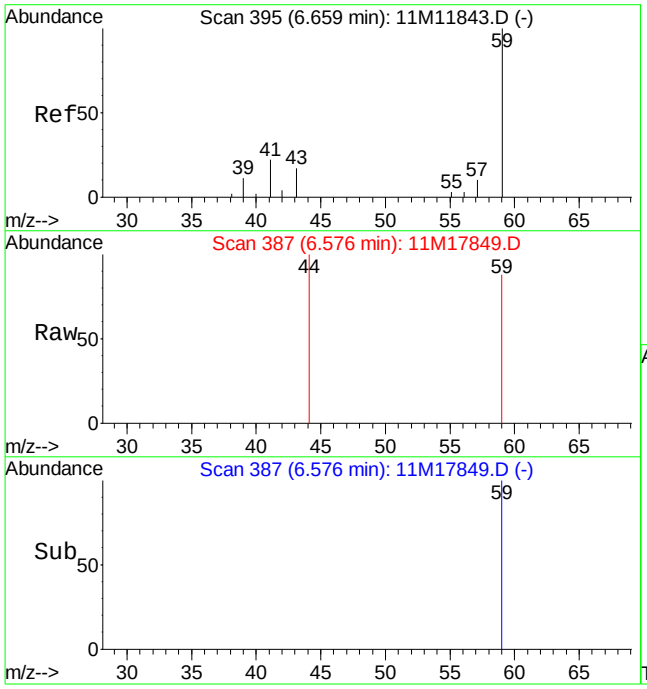


#13
Acetone
Concen: 2.24 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion: 43 Resp: 2439

Ion	Ratio	Lower	Upper
43	100		
58	8.7	20.1	46.9#

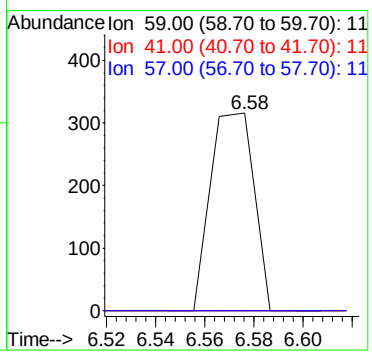


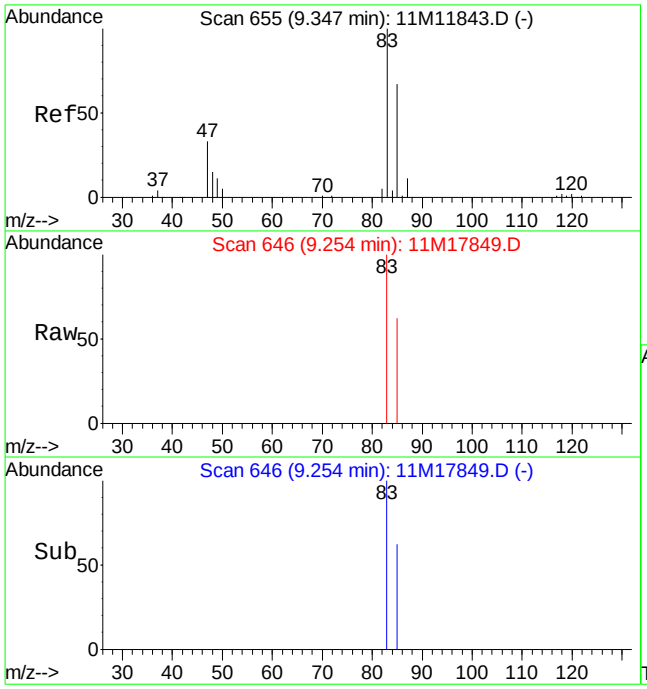


#15
Tert-Butyl Alcohol
Concen: 0.95 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion: 59 Resp: 388

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

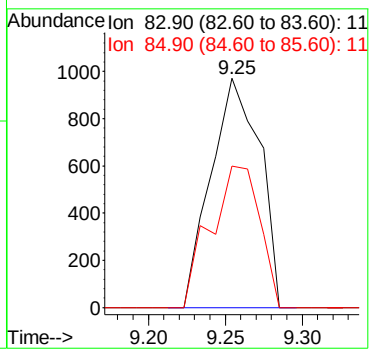


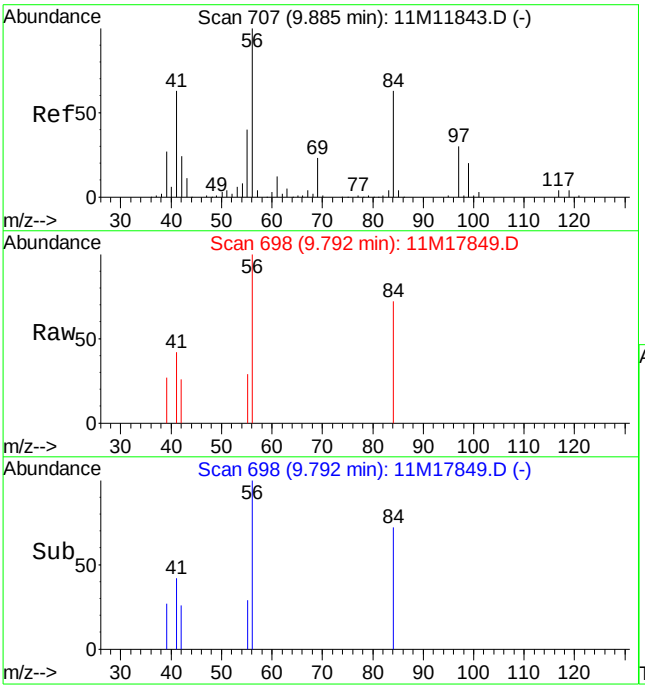


#33
Chloroform
Concen: 0.17 ug/L
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion: 83 Resp: 2146

Ion	Ratio	Lower	Upper
83	100		
85	62.2	39.4	92.0

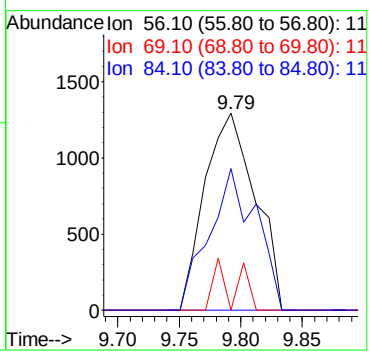


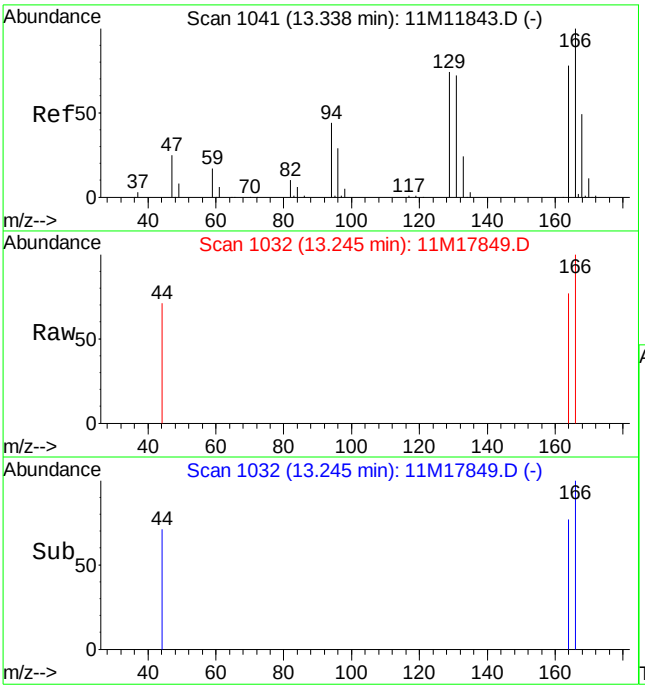


#39
Cyclohexane
Concen: 0.50 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion: 56 Resp: 3708

Ion	Ratio	Lower	Upper
56	100		
69	10.9	15.3	35.7#
84	66.3	41.6	97.0

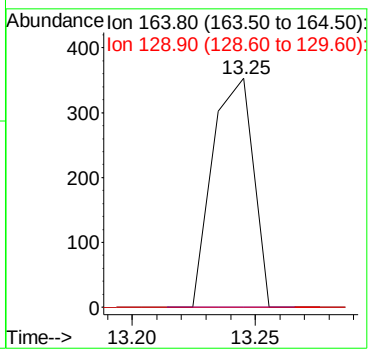




#64
Tetrachloroethene
Concen: 0.14 ug/L
RT: 13.25 min Scan# 1032
Delta R.T. 0.01 min
Lab File: 11M17849.D
Acq: 28 Apr 2017 17:46

Tgt Ion:164 Resp: 406

Ion	Ratio	Lower	Upper
164	100		
129	0.0	51.8	120.8#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419230.D Vial: 8
Acq On : 28 Apr 2017 11:03 Operator: TMB
Sample : L17041200-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 11:25:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

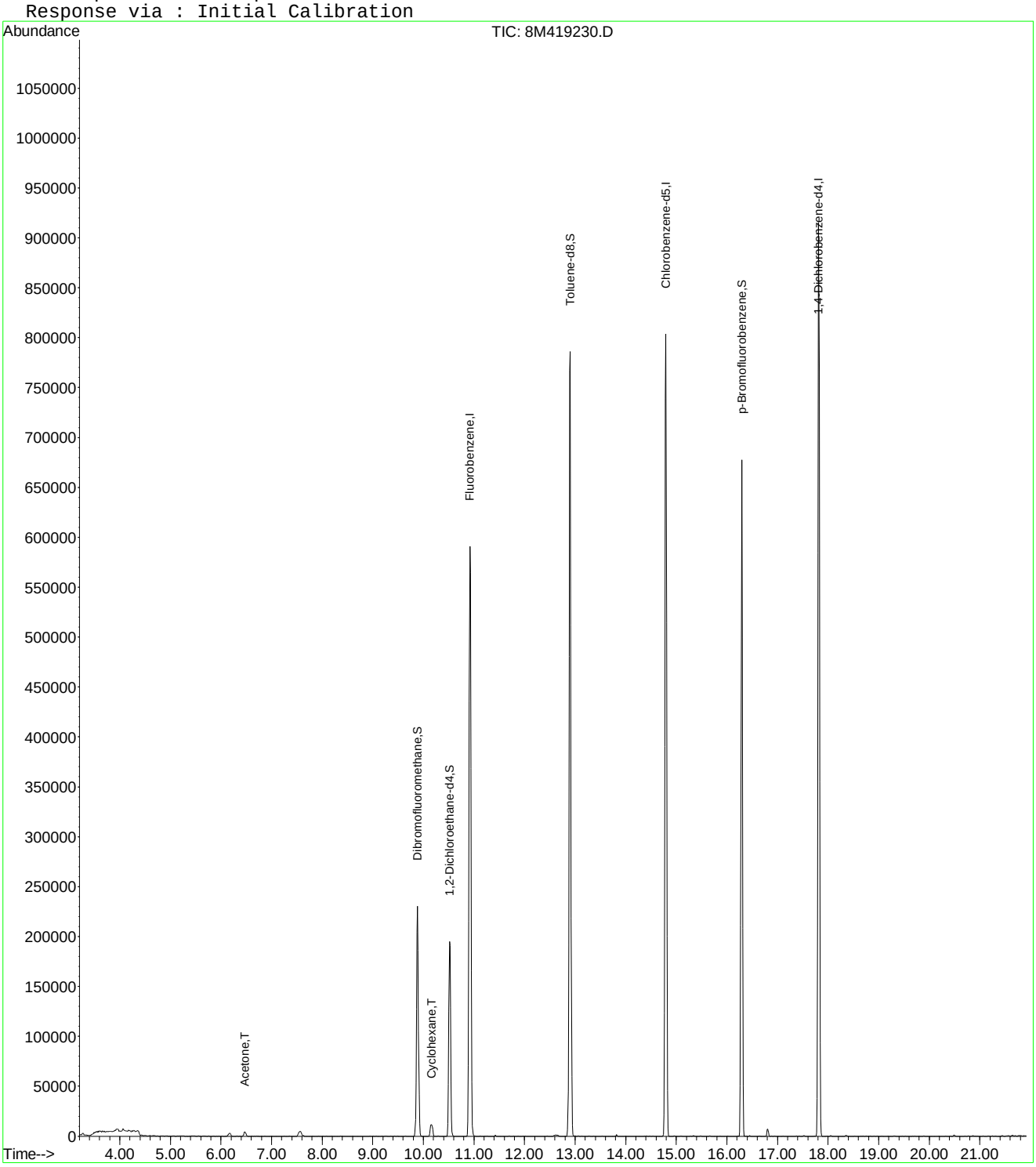
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	742600	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	600983	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	304564	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	193902	24.8944	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.56%			
43) 1,2-Dichloroethane-d4	10.51	65	172460	25.6117	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.44%			
58) Toluene-d8	12.90	98	727622	26.4975	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%			
80) p-Bromofluorobenzene	16.29	95	280658	26.1102	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.44%			
Target Compounds						Qvalue
13) Acetone	6.47	43	8488	8.1270	ug/L	91
39) Cyclohexane	10.16	56	10379	0.9258	ug/L	86

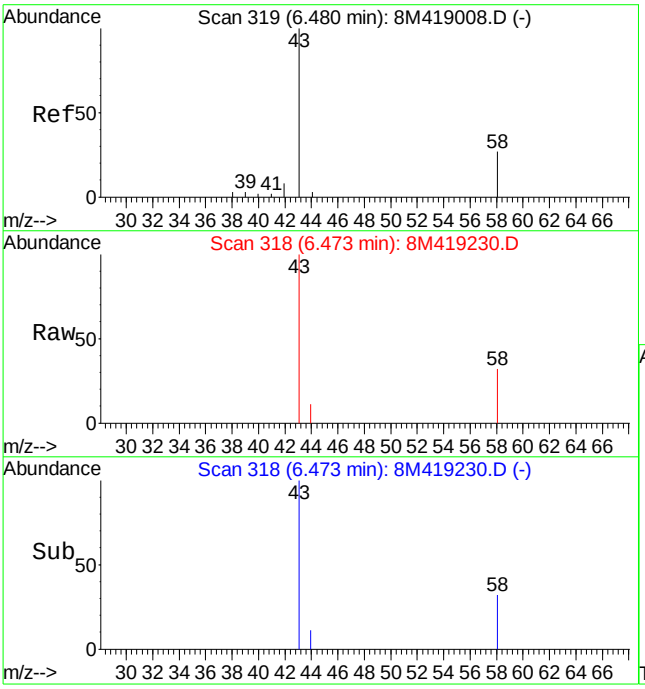
(#) = qualifier out of range (m) = manual integration
8M419230.D 8260WT.M Mon May 01 08:30:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419230.D Vial: 8
Acq On : 28 Apr 2017 11:03 Operator: TMB
Sample : L17041200-16 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 11:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

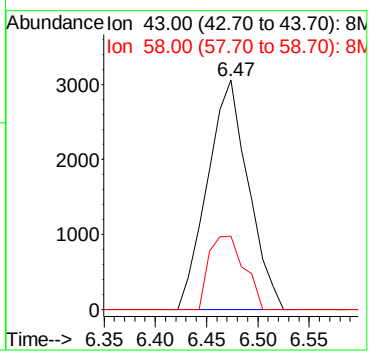


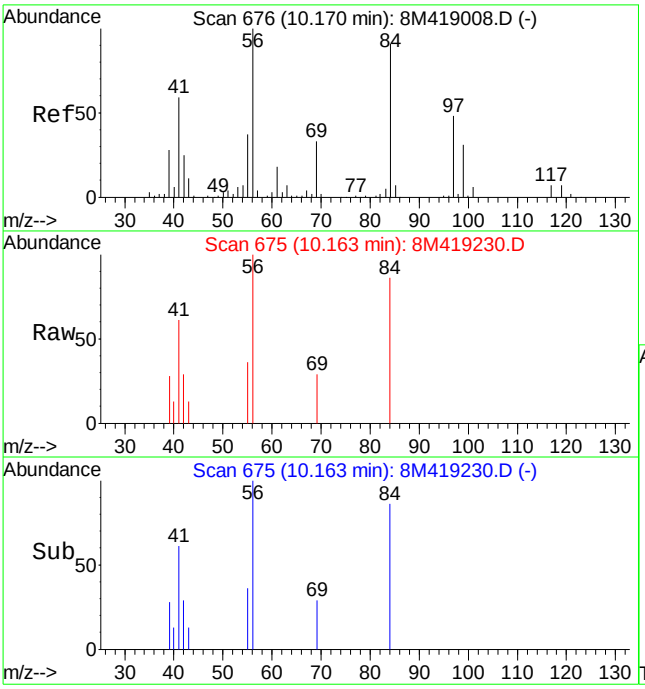


#13
Acetone
Concen: 8.13 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419230.D
Acq: 28 Apr 2017 11:03

Tgt Ion: 43 Resp: 8488

Ion	Ratio	Lower	Upper
43	100		
58	27.5	19.4	45.4

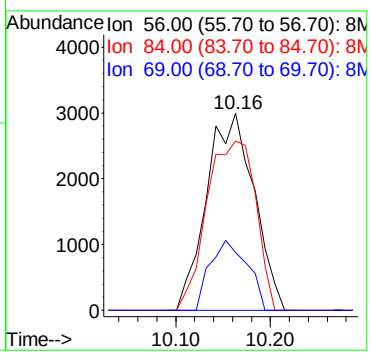




#39
Cyclohexane
Concen: 0.93 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419230.D
Acq: 28 Apr 2017 11:03

Tgt Ion: 56 Resp: 10379

Ion	Ratio	Lower	Upper
56	100		
84	88.7	61.6	143.8
69	28.0	21.4	50.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419231.D Vial: 9
Acq On : 28 Apr 2017 11:32 Operator: TMB
Sample : L17041200-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 11:55:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

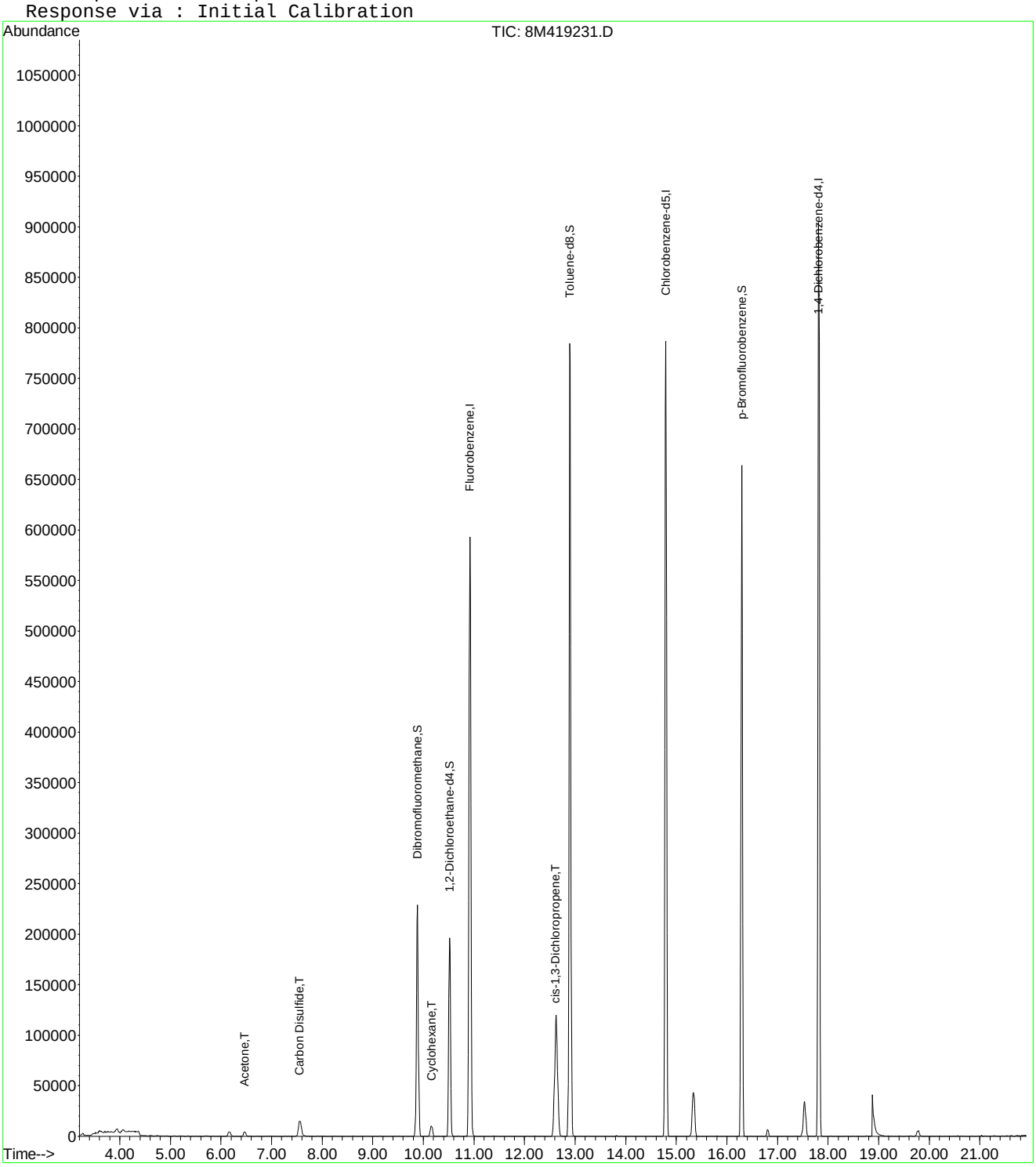
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	725194	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	587690	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	301434	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	192143	25.2606	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.04%			
43) 1,2-Dichloroethane-d4	10.51	65	170634	25.9488	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.80%			
58) Toluene-d8	12.89	98	720432	26.8291	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.32%			
80) p-Bromofluorobenzene	16.29	95	278763	26.2032	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.80%			
Target Compounds						Qvalue
13) Acetone	6.46	43	9867	9.6741	ug/L	93
20) Carbon Disulfide	7.55	76	3779	0.1731	ug/L #	74
39) Cyclohexane	10.16	56	9008	0.8228	ug/L	84
55) cis-1,3-Dichloropropene	12.60	75	3187	0.2922	ug/L #	42

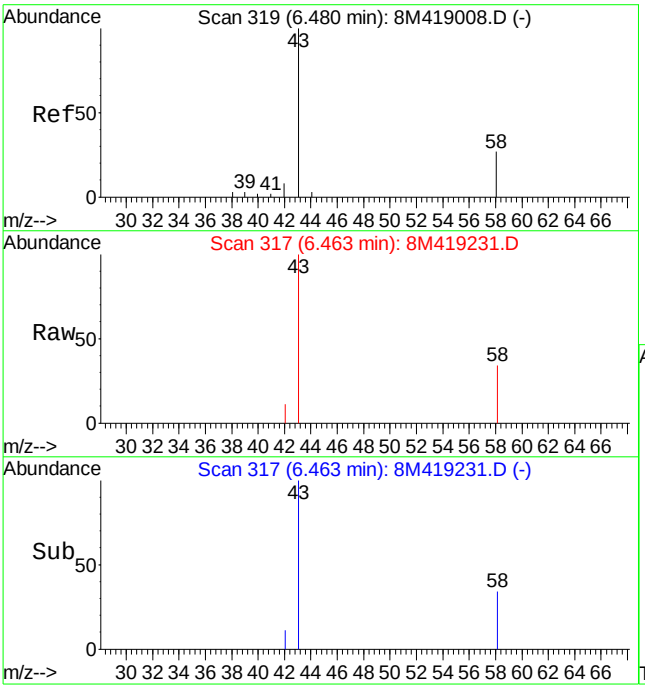
(#) = qualifier out of range (m) = manual integration
8M419231.D 8260WT.M Mon May 01 08:30:18 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419231.D Vial: 9
Acq On : 28 Apr 2017 11:32 Operator: TMB
Sample : L17041200-17 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 11:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

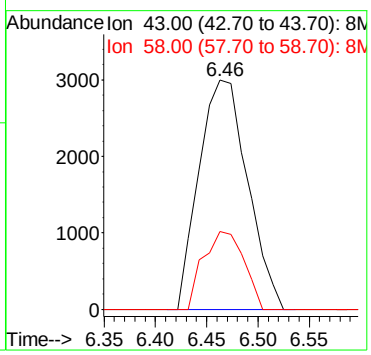


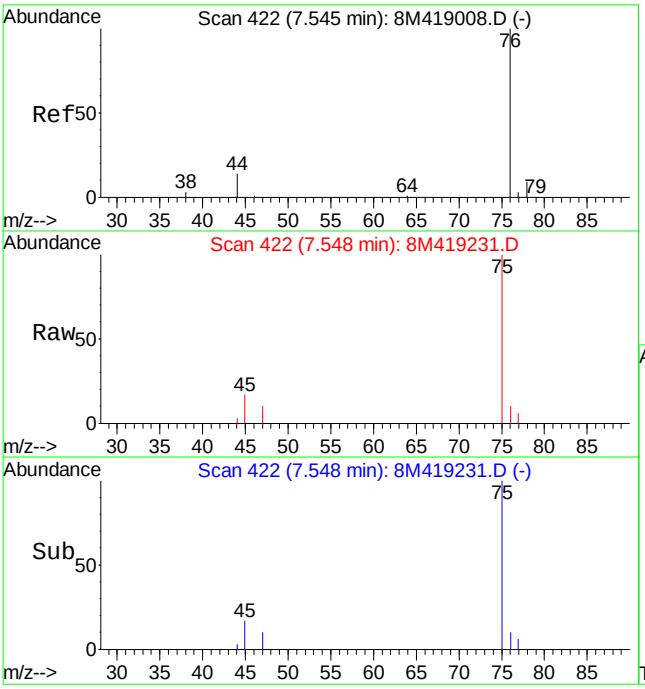


#13
Acetone
Concen: 9.67 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419231.D
Acq: 28 Apr 2017 11:32

Tgt Ion: 43 Resp: 9867

Ion	Ratio	Lower	Upper
43	100		
58	28.3	19.4	45.4

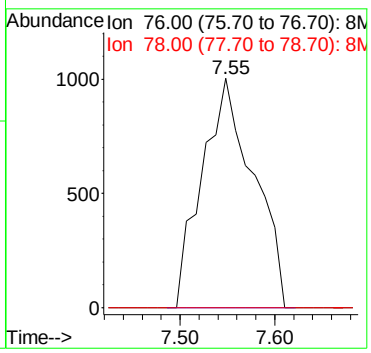


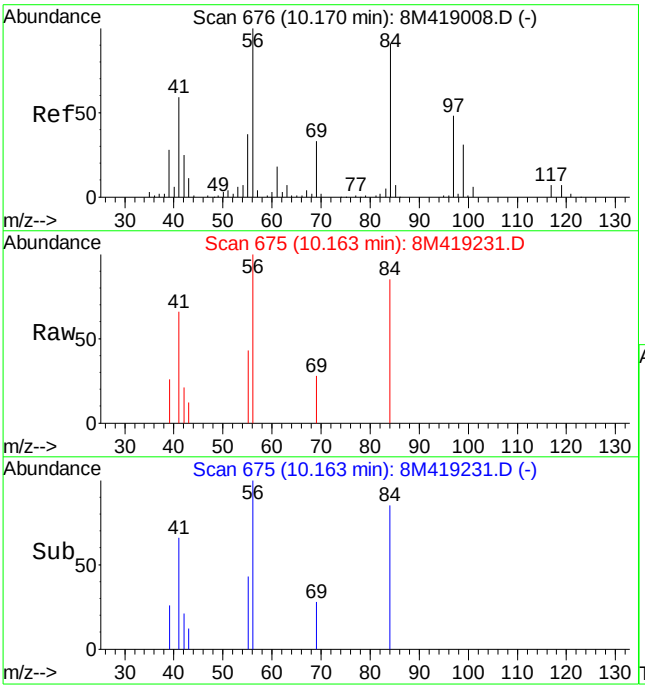


#20
Carbon Disulfide
Concen: 0.17 ug/L
RT: 7.55 min Scan# 422
Delta R.T. 0.00 min
Lab File: 8M419231.D
Acq: 28 Apr 2017 11:32

Tgt Ion: 76 Resp: 3779

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.6	13.0#

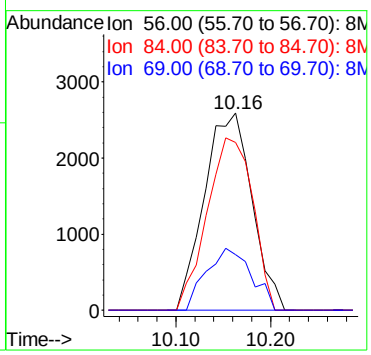


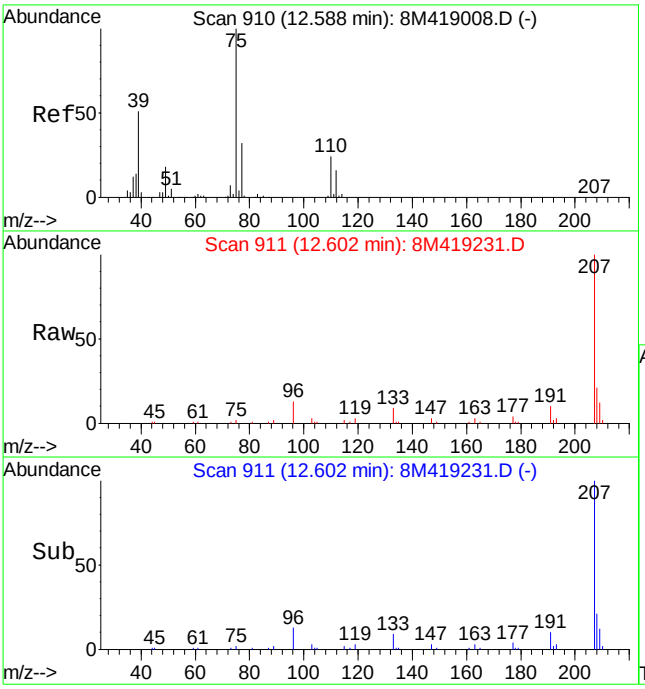


#39
Cyclohexane
Concen: 0.82 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419231.D
Acq: 28 Apr 2017 11:32

Tgt Ion: 56 Resp: 9008

Ion	Ratio	Lower	Upper
56	100		
84	83.9	61.6	143.8
69	29.8	21.4	50.0

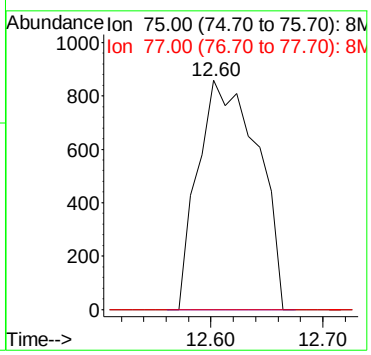




#55
cis-1,3-Dichloropropene
Concen: 0.29 ug/L
RT: 12.60 min Scan# 911
Delta R.T. 0.01 min
Lab File: 8M419231.D
Acq: 28 Apr 2017 11:32

Tgt Ion: 75 Resp: 3187

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419232.D Vial: 10
Acq On : 28 Apr 2017 12:03 Operator: TMB
Sample : L17041200-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 12:25:10 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

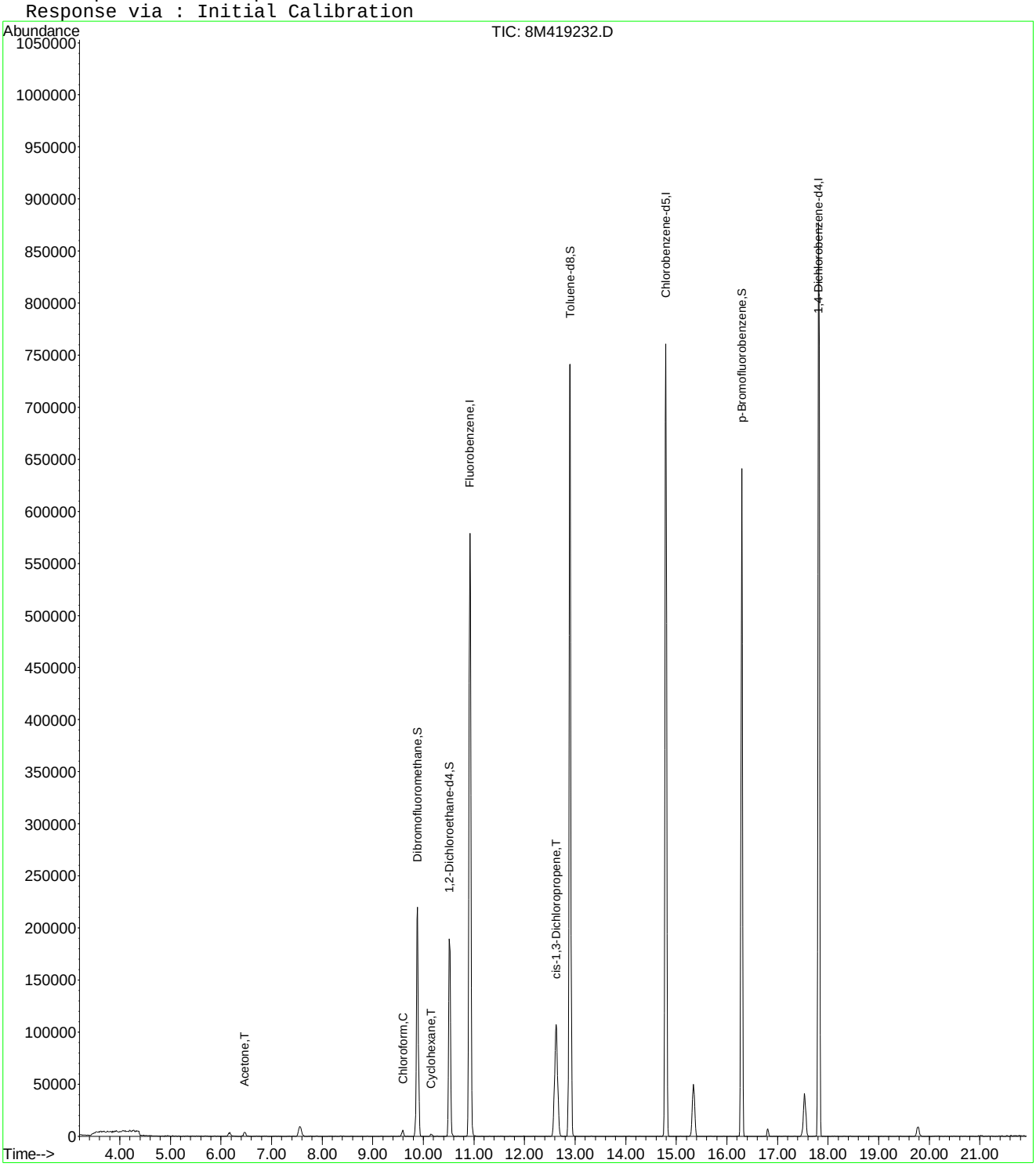
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	705811	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	568132	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	287989	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	185992	25.1235 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.48%		
43) 1,2-Dichloroethane-d4	10.51	65	163617	25.5650 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.24%		
58) Toluene-d8	12.90	98	692974	26.6950 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.76%		
80) p-Bromofluorobenzene	16.29	95	266054	26.1761 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.72%		
Target Compounds					Qvalue
13) Acetone	6.46	43	7528	7.5835 ug/L	100
33) Chloroform	9.59	83	6553	0.4621 ug/L	96
39) Cyclohexane	10.15	56	2115	0.1985 ug/L #	74
55) cis-1,3-Dichloropropene	12.62	75	2990	0.2817 ug/L #	42

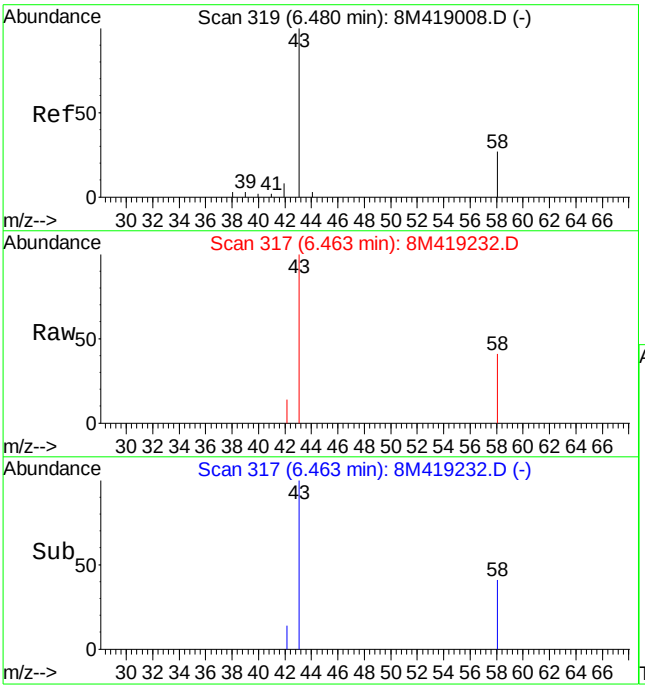
(#) = qualifier out of range (m) = manual integration
8M419232.D 8260WT.M Mon May 01 08:30:21 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419232.D Vial: 10
Acq On : 28 Apr 2017 12:03 Operator: TMB
Sample : L17041200-18 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 12:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

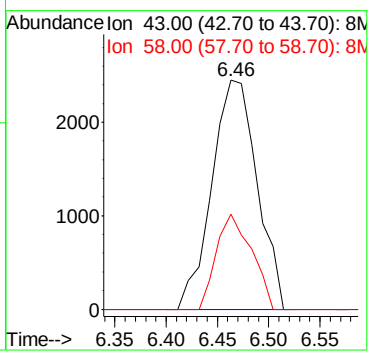


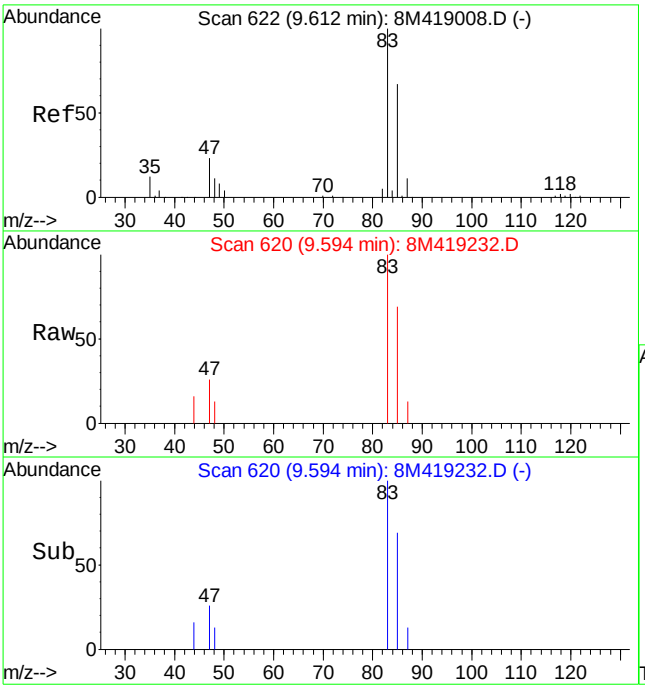


#13
Acetone
Concen: 7.58 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419232.D
Acq: 28 Apr 2017 12:03

Tgt Ion: 43 Resp: 7528

Ion	Ratio	Lower	Upper
43	100		
58	32.3	19.4	45.4

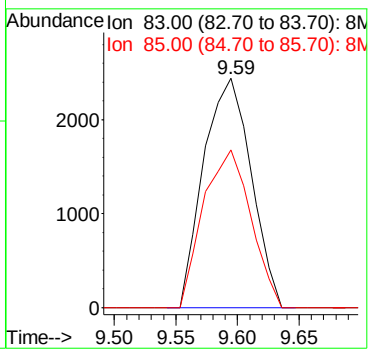


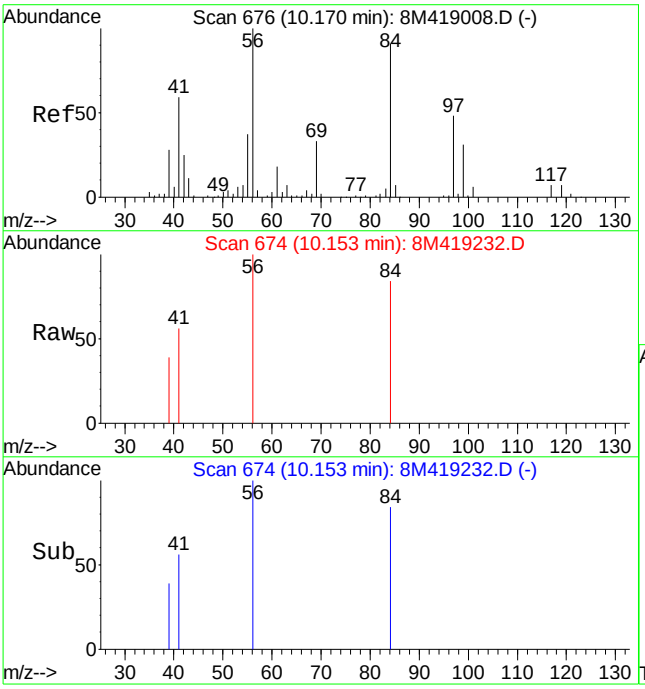


#33
Chloroform
Concen: 0.46 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419232.D
Acq: 28 Apr 2017 12:03

Tgt Ion: 83 Resp: 6553

Ion	Ratio	Lower	Upper
83	100		
85	68.5	39.1	91.3

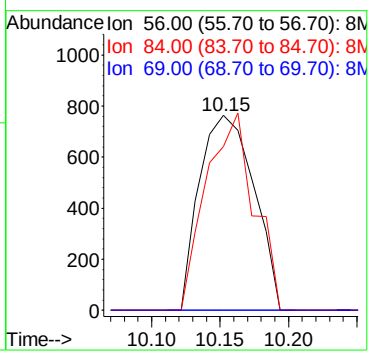


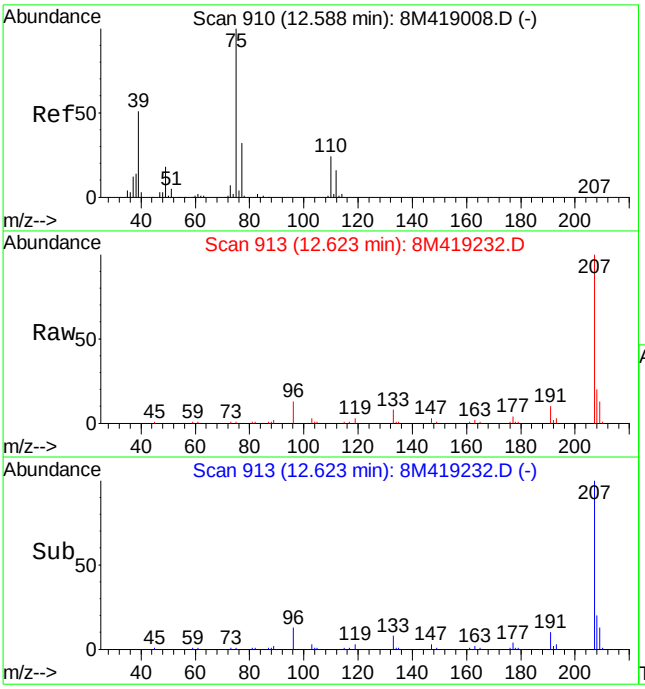


#39
Cyclohexane
Concen: 0.20 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419232.D
Acq: 28 Apr 2017 12:03

Tgt Ion: 56 Resp: 2115

Ion	Ratio	Lower	Upper
56	100		
84	89.1	61.6	143.8
69	0.0	21.4	50.0#

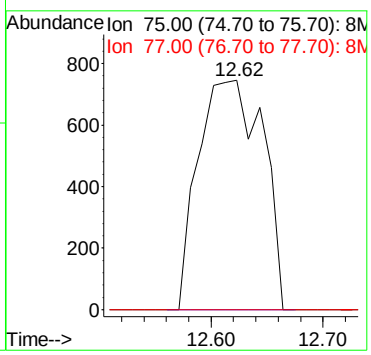




#55
cis-1,3-Dichloropropene
Concen: 0.28 ug/L
RT: 12.62 min Scan# 913
Delta R.T. 0.03 min
Lab File: 8M419232.D
Acq: 28 Apr 2017 12:03

Tgt Ion: 75 Resp: 2990

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419233.D Vial: 11
Acq On : 28 Apr 2017 12:33 Operator: TMB
Sample : L17041200-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 12:55:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

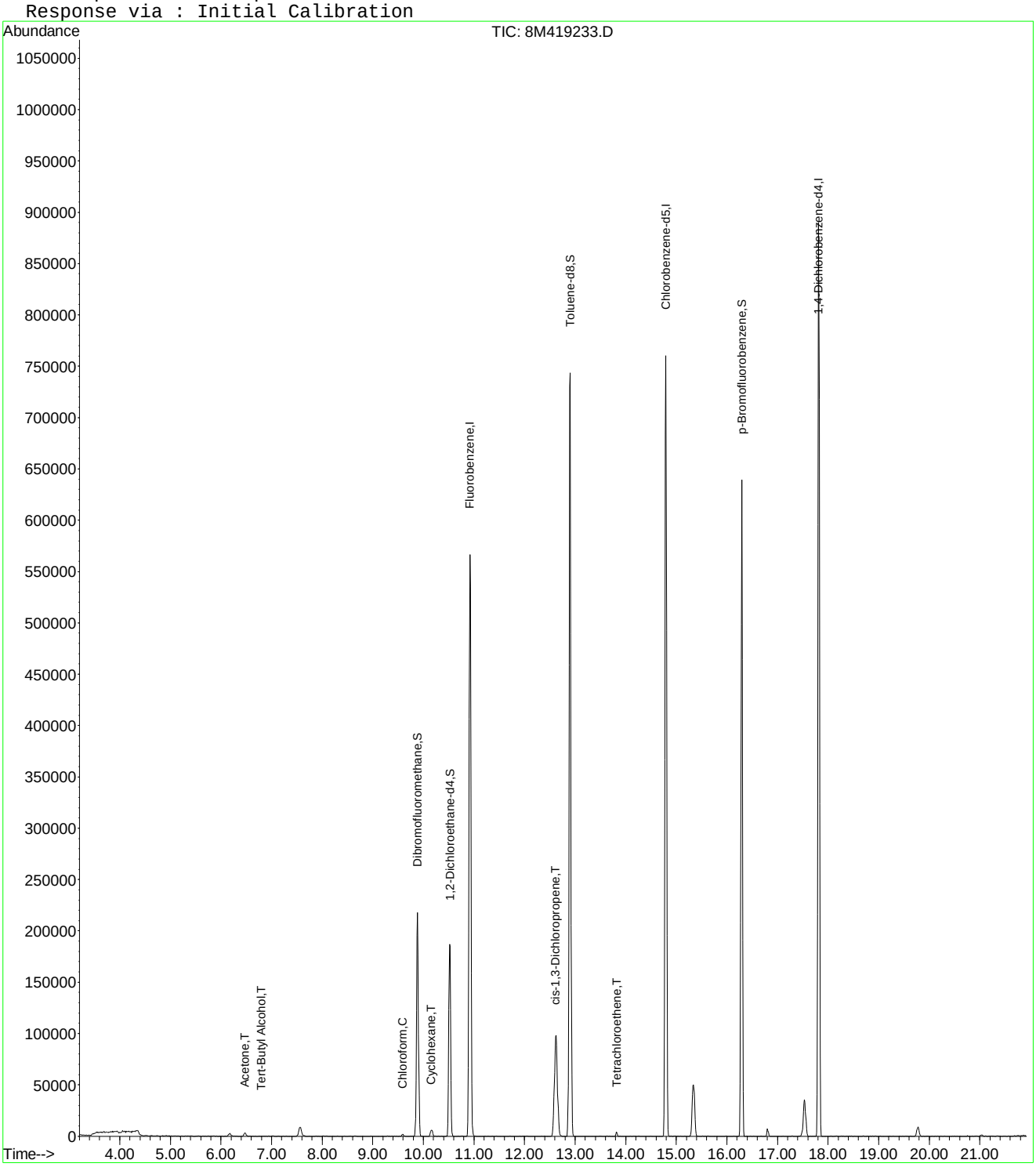
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	699973	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	566714	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	291562	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	185298	25.2385 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.96%		
43) 1,2-Dichloroethane-d4	10.52	65	165460	26.0686 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.28%		
58) Toluene-d8	12.90	98	691599	26.7087 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.84%		
80) p-Bromofluorobenzene	16.29	95	267255	25.9720 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%		
Target Compounds					Qvalue
13) Acetone	6.47	43	6476	6.5782 ug/L	79
15) Tert-Butyl Alcohol	6.79	59	200	0.6267 ug/L #	59
33) Chloroform	9.58	83	2272	0.1615 ug/L	98
39) Cyclohexane	10.15	56	5262	0.4979 ug/L #	79
55) cis-1,3-Dichloropropene	12.60	75	2708	0.2573 ug/L #	42
66) Tetrachloroethene	13.82	164	1570	0.2369 ug/L	91

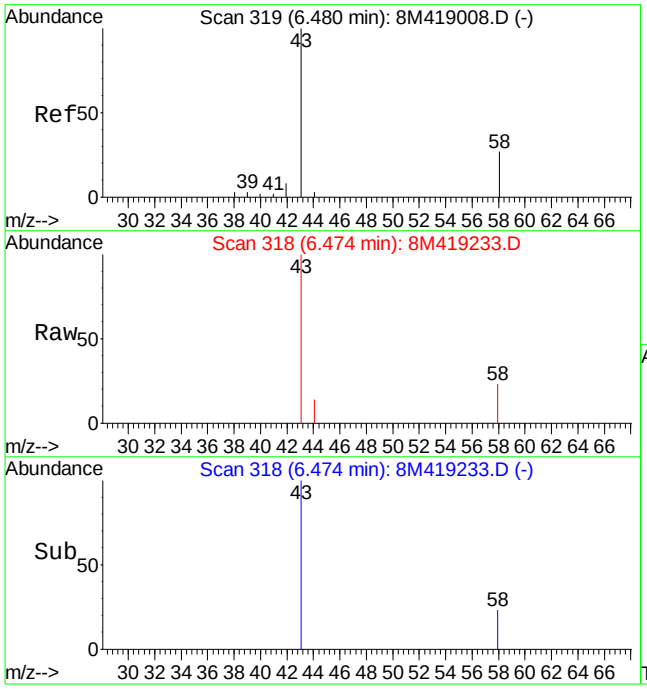
(#) = qualifier out of range (m) = manual integration
8M419233.D 8260WT.M Mon May 01 08:30:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419233.D Vial: 11
Acq On : 28 Apr 2017 12:33 Operator: TMB
Sample : L17041200-19 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 12:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

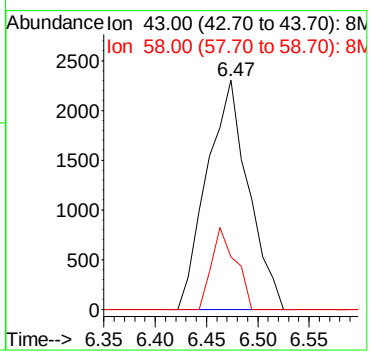


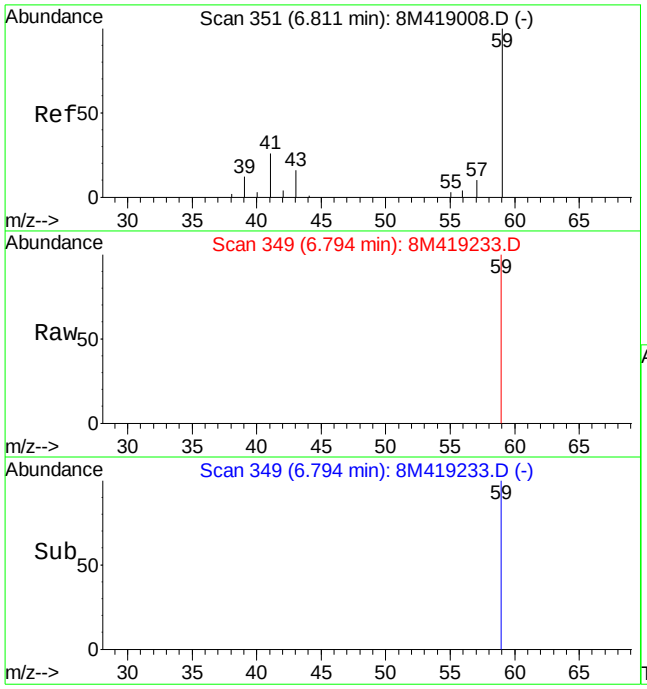


#13
Acetone
Concen: 6.58 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion: 43 Resp: 6476

Ion	Ratio	Lower	Upper
43	100		
58	20.7	19.4	45.4

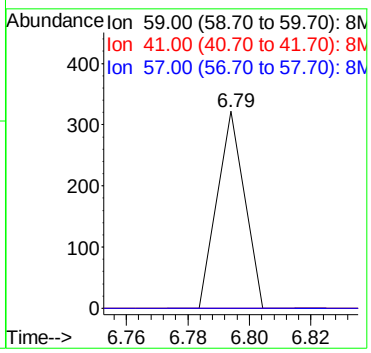


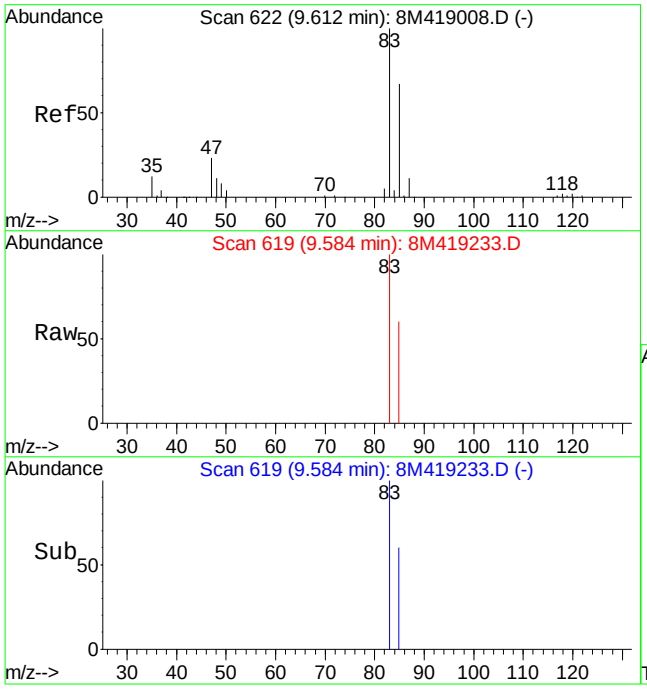


#15
Tert-Butyl Alcohol
Concen: 0.63 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion: 59 Resp: 200

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

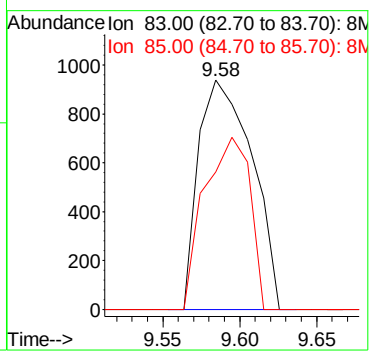


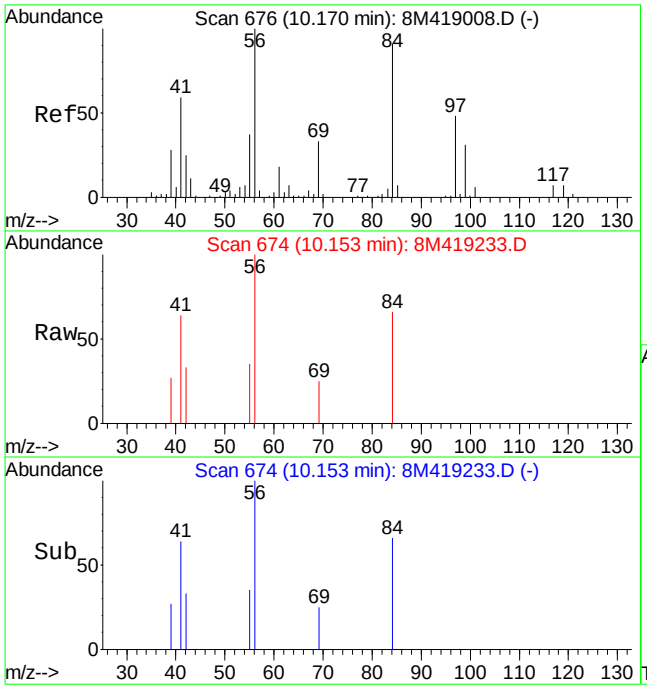


#33
Chloroform
Concen: 0.16 ug/L
RT: 9.58 min Scan# 619
Delta R.T. -0.02 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion: 83 Resp: 2272

Ion	Ratio	Lower	Upper
83	100		
85	64.0	39.1	91.3

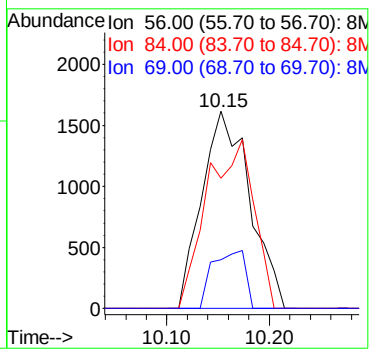


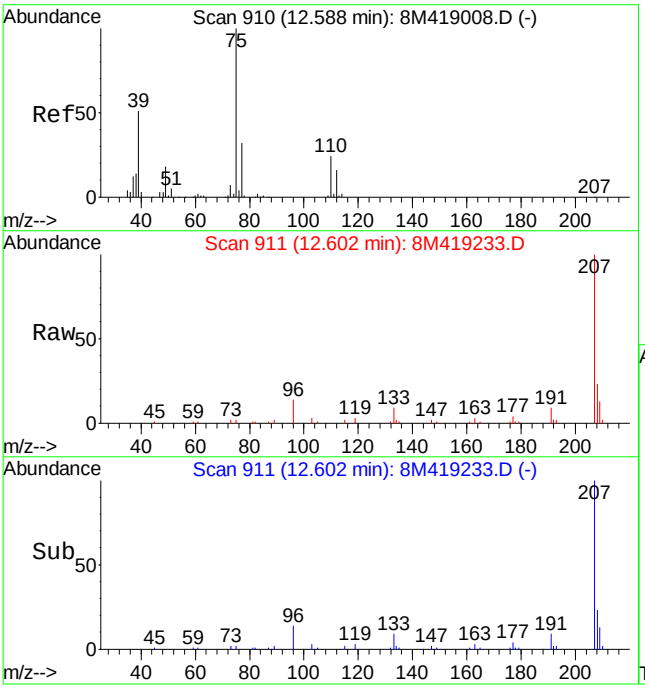


#39
Cyclohexane
Concen: 0.50 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion: 56 Resp: 5262

Ion	Ratio	Lower	Upper
56	100		
84	84.0	61.6	143.8
69	20.0	21.4	50.0#

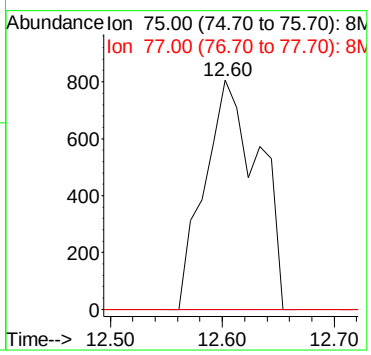


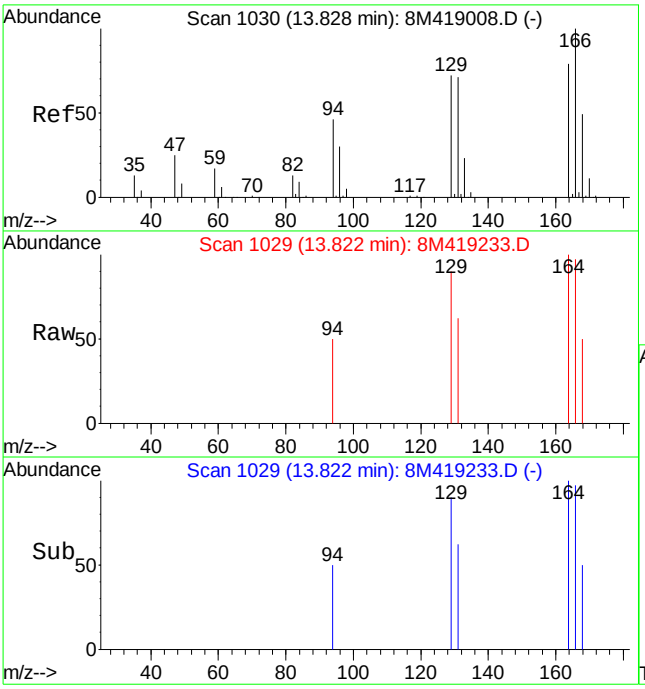


#55
cis-1,3-Dichloropropene
Concen: 0.26 ug/L
RT: 12.60 min Scan# 911
Delta R.T. 0.01 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion: 75 Resp: 2708

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#

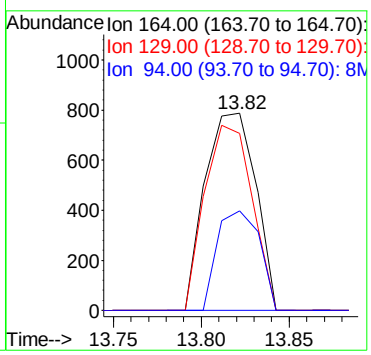




#66
Tetrachloroethene
Concen: 0.24 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419233.D
Acq: 28 Apr 2017 12:33

Tgt Ion:164 Resp: 1570

Ion	Ratio	Lower	Upper
164	100		
129	88.1	53.4	124.6
94	42.3	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419234.D Vial: 12
Acq On : 28 Apr 2017 13:03 Operator: TMB
Sample : L17041200-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 13:25:26 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

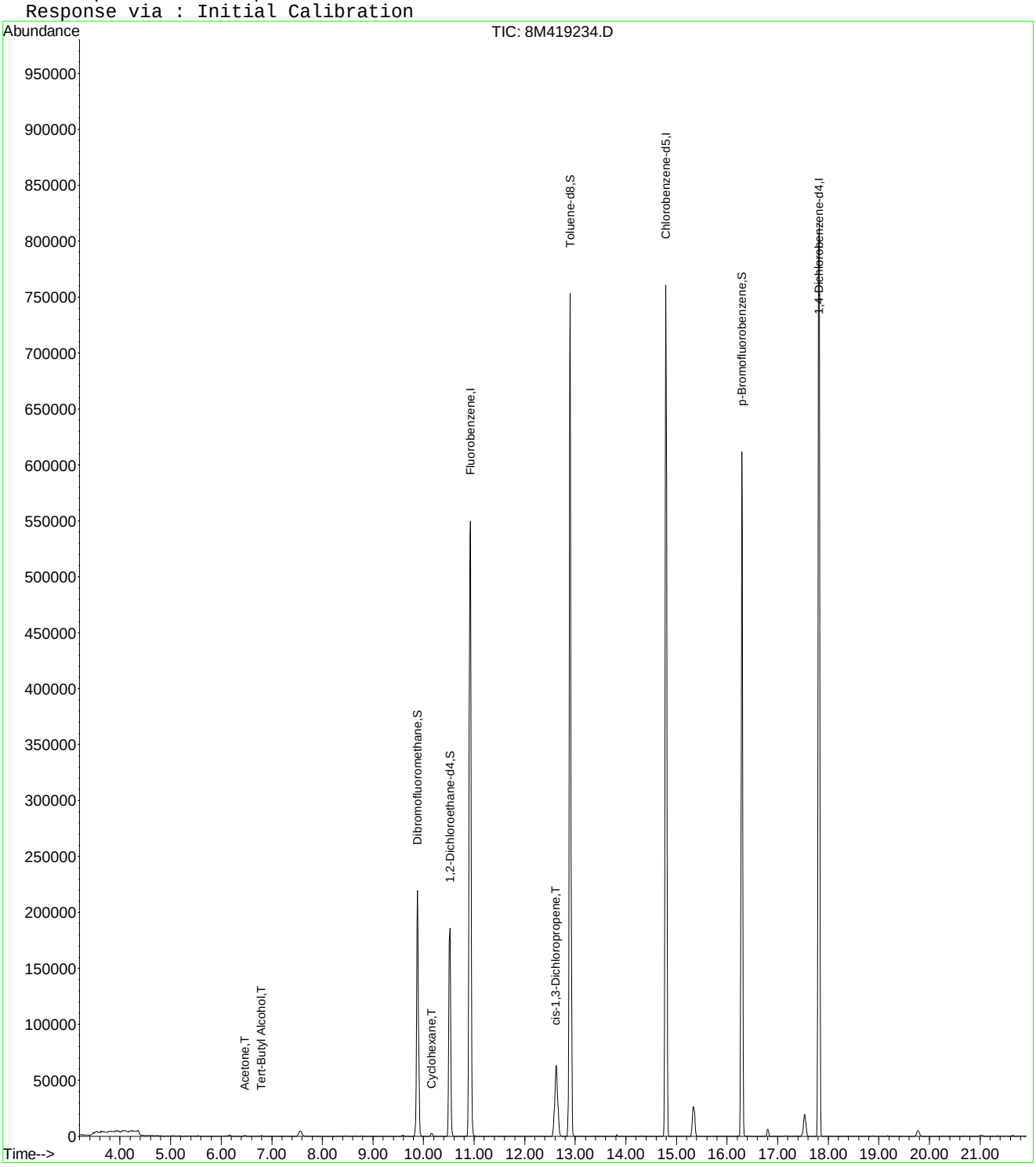
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	691765	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	554641	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	278704	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	182319	25.1274 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.52%		
43) 1,2-Dichloroethane-d4	10.52	65	159537	25.4336 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.72%		
58) Toluene-d8	12.90	98	690657	27.2529 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 109.00%		
80) p-Bromofluorobenzene	16.29	95	262210	26.6574 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.64%		
Target Compounds					Qvalue
13) Acetone	6.47	43	716	0.7359 ug/L	# 42
15) Tert-Butyl Alcohol	6.79	59	1079	3.4213 ug/L	# 59
39) Cyclohexane	10.16	56	1871	0.1792 ug/L	# 79
55) cis-1,3-Dichloropropene	12.61	75	1473	0.1416 ug/L	# 42

(#) = qualifier out of range (m) = manual integration
8M419234.D 8260WT.M Mon May 01 08:30:29 2017 Page 1

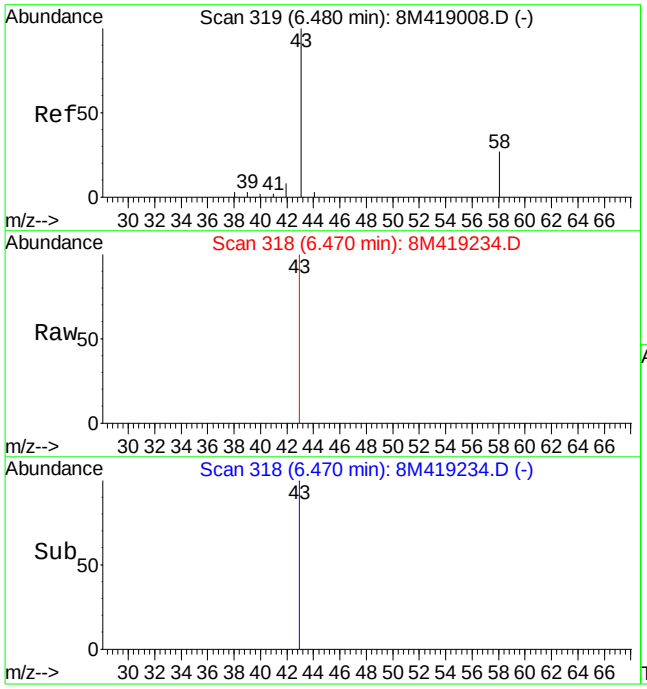
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419234.D Vial: 12
Acq On : 28 Apr 2017 13:03 Operator: TMB
Sample : L17041200-20 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 13:25 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



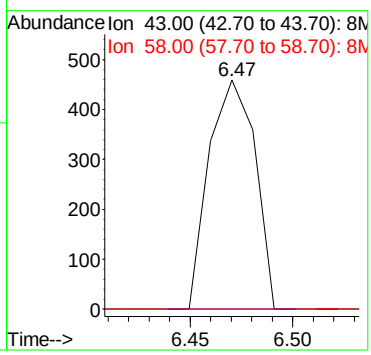
8M419234.D 8260WT.M Mon May 01 08:30:30 2017 Page 2

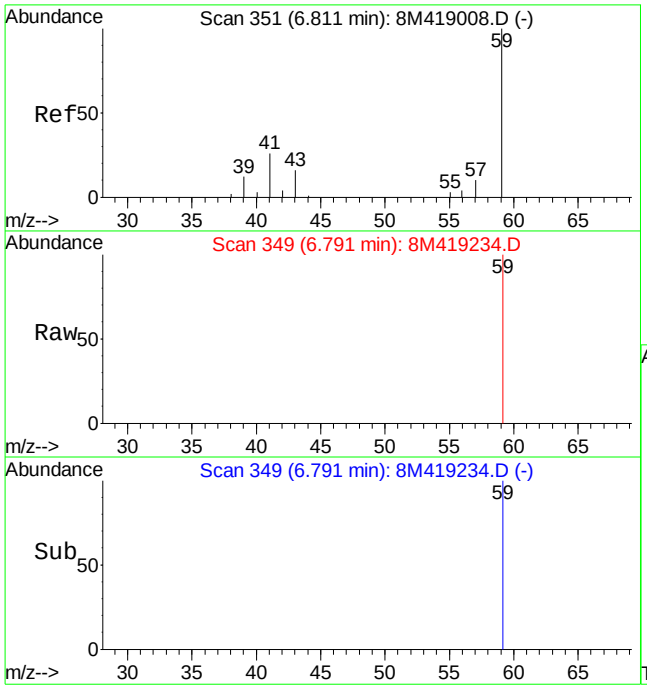


#13
Acetone
Concen: 0.74 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419234.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 43 Resp: 716

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

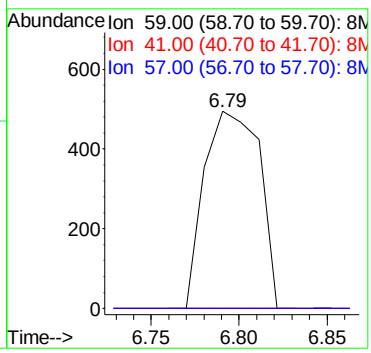


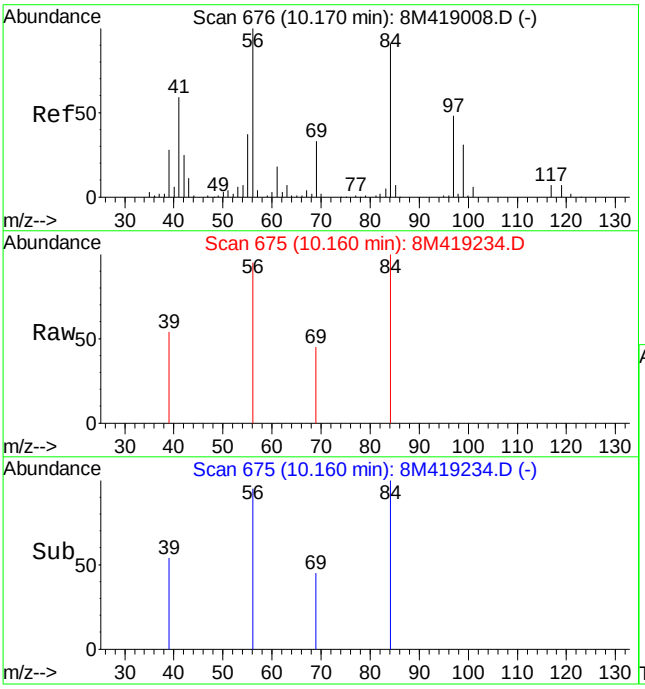


#15
Tert-Butyl Alcohol
Concen: 3.42 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419234.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 59 Resp: 1079

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

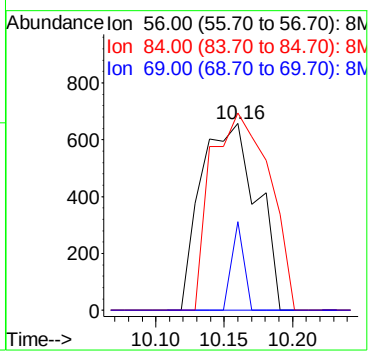


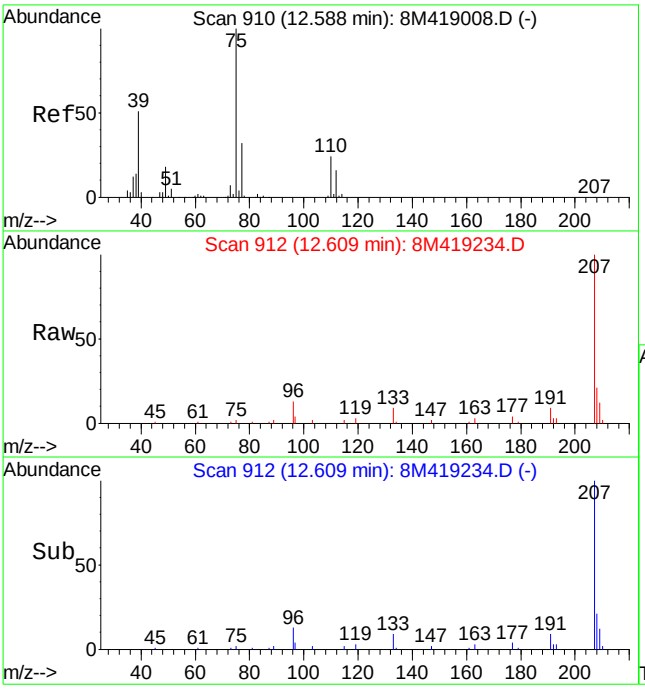


#39
Cyclohexane
Concen: 0.18 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419234.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 56 Resp: 1871

Ion	Ratio	Lower	Upper
56	100		
84	110.0	61.6	143.8
69	0.0	21.4	50.0#

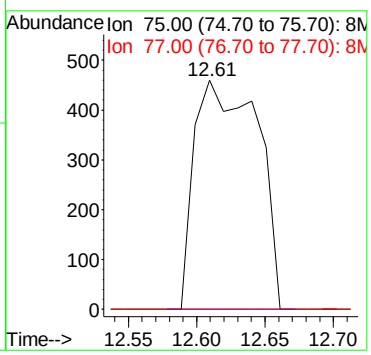




#55
cis-1,3-Dichloropropene
Concen: 0.14 ug/L
RT: 12.61 min Scan# 912
Delta R.T. 0.02 min
Lab File: 8M419234.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 75 Resp: 1473

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419235.D Vial: 13
Acq On : 28 Apr 2017 13:33 Operator: TMB
Sample : L17041200-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 13:55:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

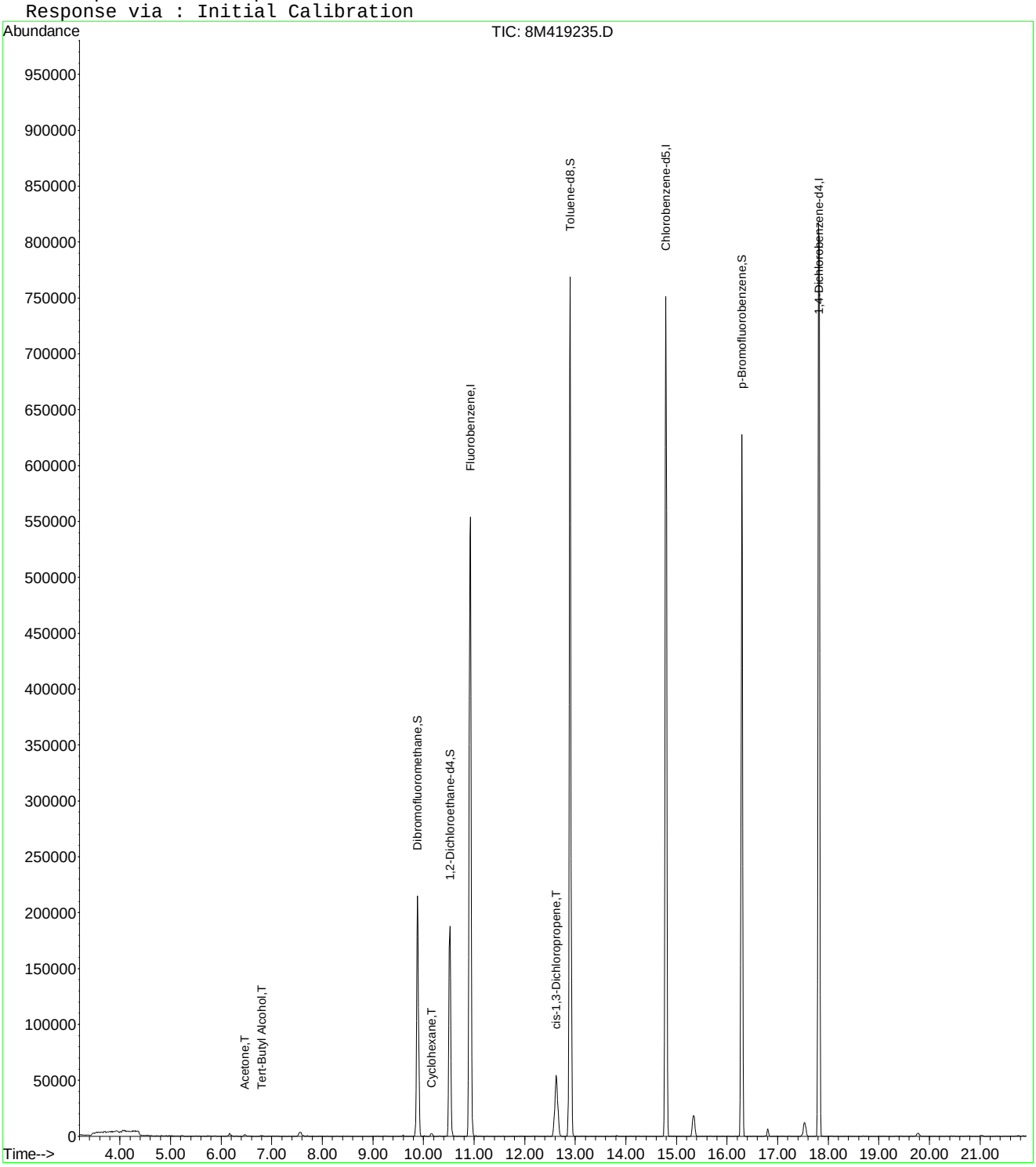
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	694248	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	551603	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	277113	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	182391	25.0474	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.20%			
43) 1,2-Dichloroethane-d4	10.52	65	160653	25.5199	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.08%			
58) Toluene-d8	12.90	98	683862	27.1334	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.52%			
80) p-Bromofluorobenzene	16.29	95	263428	26.9349	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.72%			
Target Compounds						Qvalue
13) Acetone	6.47	43	2572	2.6341	ug/L	# 42
15) Tert-Butyl Alcohol	6.80	59	1092	3.4501	ug/L	# 59
39) Cyclohexane	10.16	56	2098	0.2002	ug/L	# 67
55) cis-1,3-Dichloropropene	12.62	75	1410	0.1351	ug/L	# 42

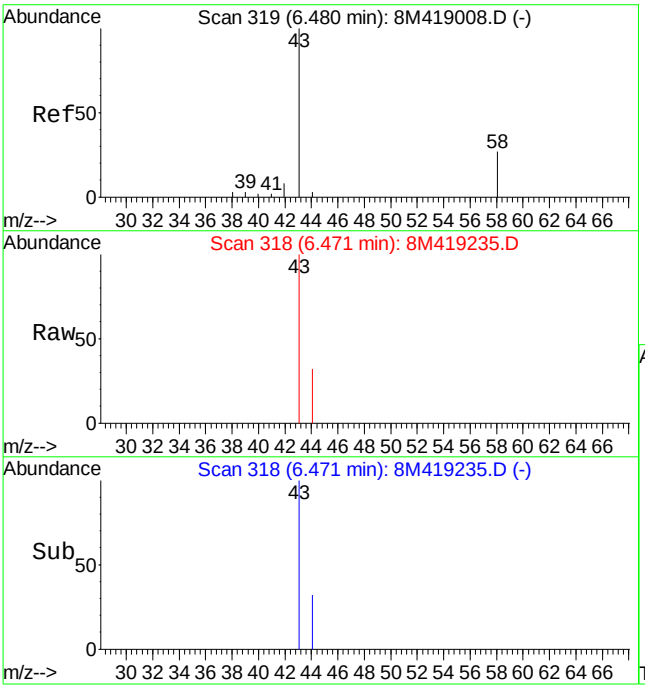
(#) = qualifier out of range (m) = manual integration
8M419235.D 8260WT.M Mon May 01 08:30:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419235.D Vial: 13
Acq On : 28 Apr 2017 13:33 Operator: TMB
Sample : L17041200-21 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 13:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

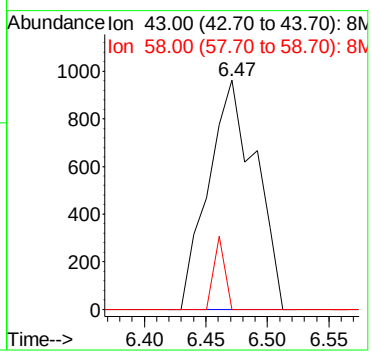


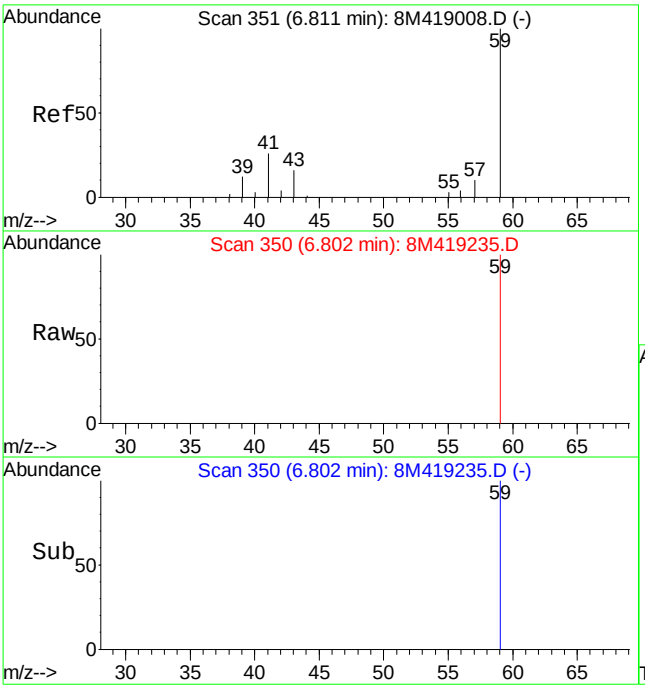


#13
Acetone
Concen: 2.63 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419235.D
Acq: 28 Apr 2017 13:33

Tgt Ion: 43 Resp: 2572

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

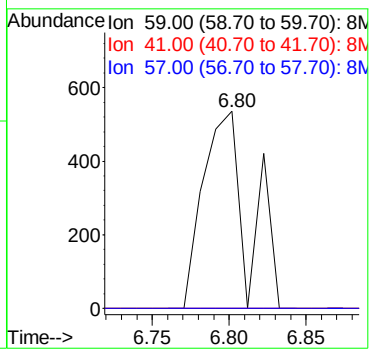


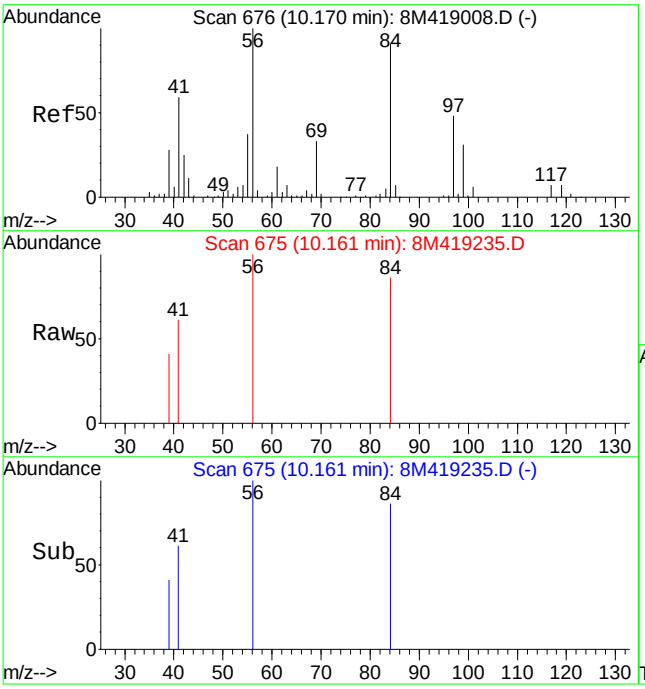


#15
Tert-Butyl Alcohol
Concen: 3.45 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419235.D
Acq: 28 Apr 2017 13:33

Tgt Ion: 59 Resp: 1092

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

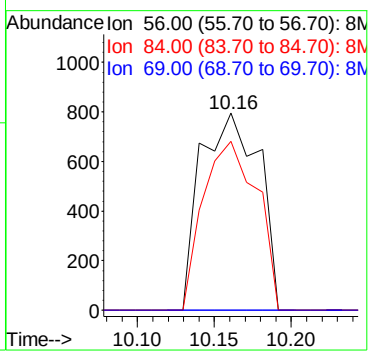


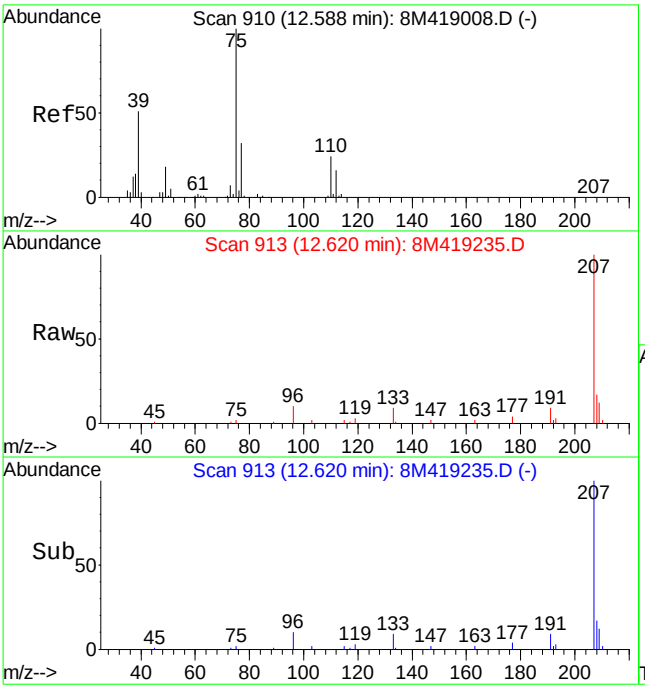


#39
Cyclohexane
Concen: 0.20 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419235.D
Acq: 28 Apr 2017 13:33

Tgt Ion: 56 Resp: 2098

Ion	Ratio	Lower	Upper
56	100		
84	79.2	61.6	143.8
69	0.0	21.4	50.0#

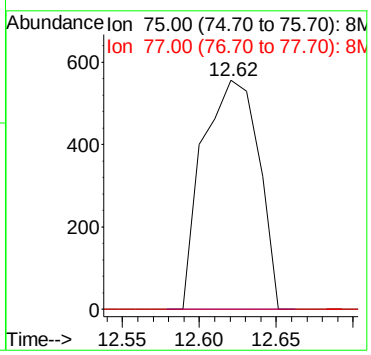




#55
cis-1,3-Dichloropropene
Concen: 0.14 ug/L
RT: 12.62 min Scan# 913
Delta R.T. 0.03 min
Lab File: 8M419235.D
Acq: 28 Apr 2017 13:33

Tgt Ion: 75 Resp: 1410

Ion	Ratio	Lower	Upper
75	100		
77	0.0	19.5	45.5#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419236.D Vial: 14
Acq On : 28 Apr 2017 14:02 Operator: TMB
Sample : L17041200-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 14:24:40 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

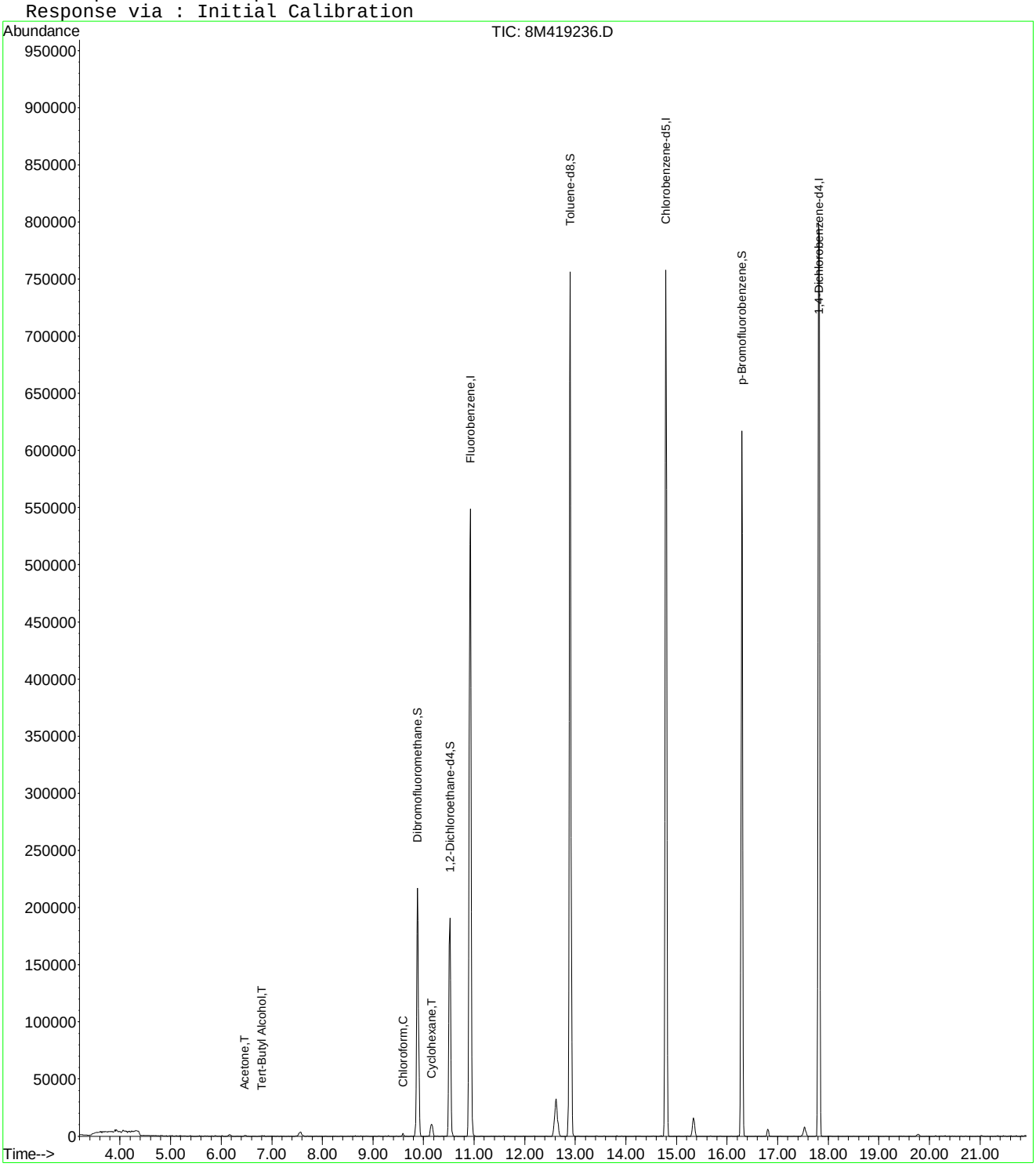
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	679291	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	545447	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	275486	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	181874	25.5263	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.12%			
43) 1,2-Dichloroethane-d4	10.52	65	160696	26.0888	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.36%			
58) Toluene-d8	12.90	98	670155	26.8896	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.56%			
80) p-Bromofluorobenzene	16.29	95	258151	26.5513	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.20%			
Target Compounds						Qvalue
13) Acetone	6.46	43	1571	1.6444	ug/L #	42
15) Tert-Butyl Alcohol	6.80	59	459	1.4821	ug/L #	59
33) Chloroform	9.59	83	2416	0.1770	ug/L	94
39) Cyclohexane	10.16	56	9158	0.8930	ug/L	86

(#) = qualifier out of range (m) = manual integration
8M419236.D 8260WT.M Mon May 01 08:30:36 2017 Page 1

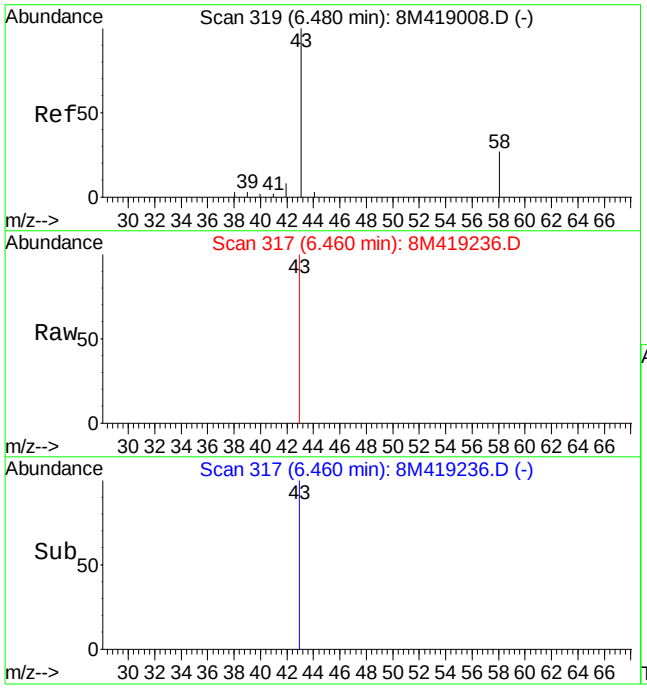
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419236.D Vial: 14
Acq On : 28 Apr 2017 14:02 Operator: TMB
Sample : L17041200-22 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 14:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



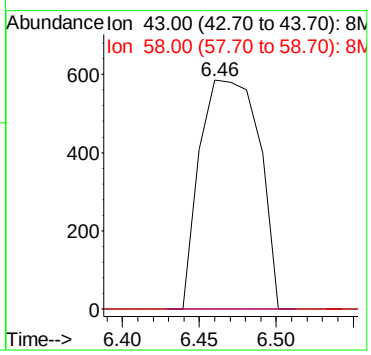
8M419236.D 8260WT.M Mon May 01 08:30:37 2017 Page 2

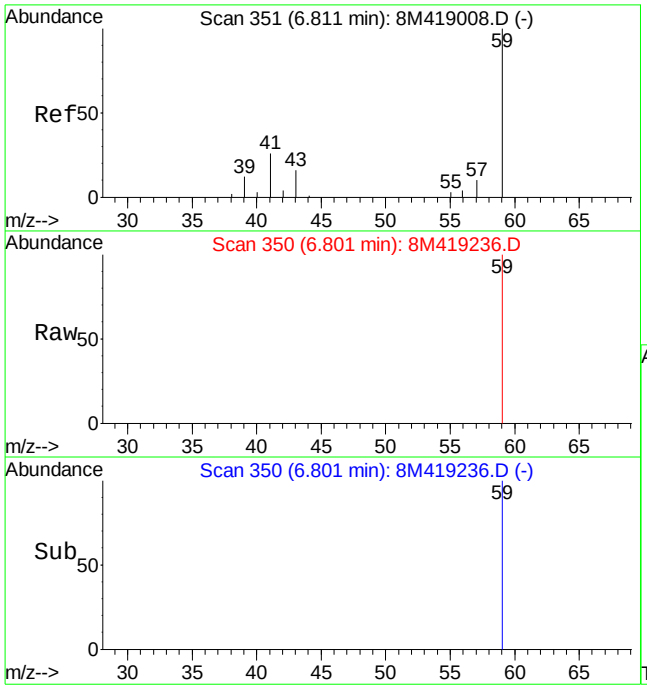


#13
Acetone
Concen: 1.64 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419236.D
Acq: 28 Apr 2017 14:02

Tgt Ion: 43 Resp: 1571

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

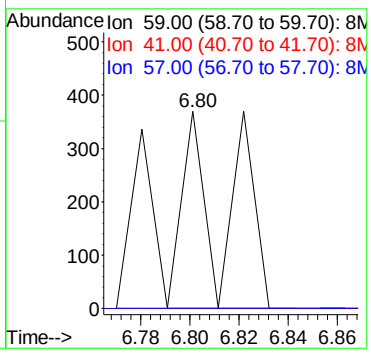


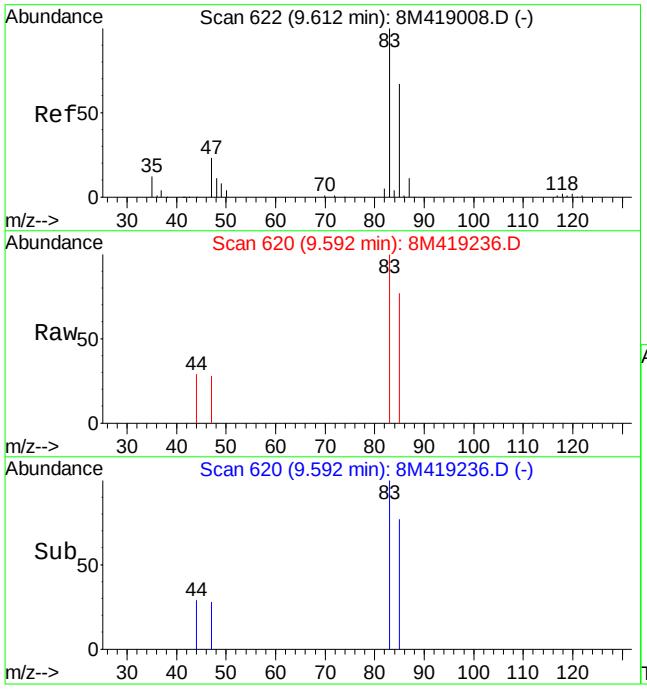


#15
Tert-Butyl Alcohol
Concen: 1.48 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419236.D
Acq: 28 Apr 2017 14:02

Tgt Ion: 59 Resp: 459

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

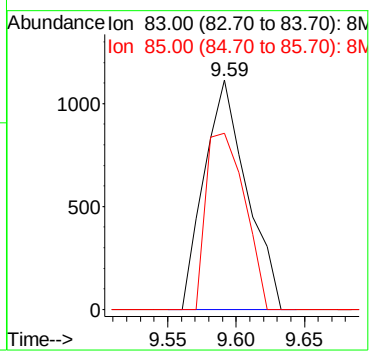


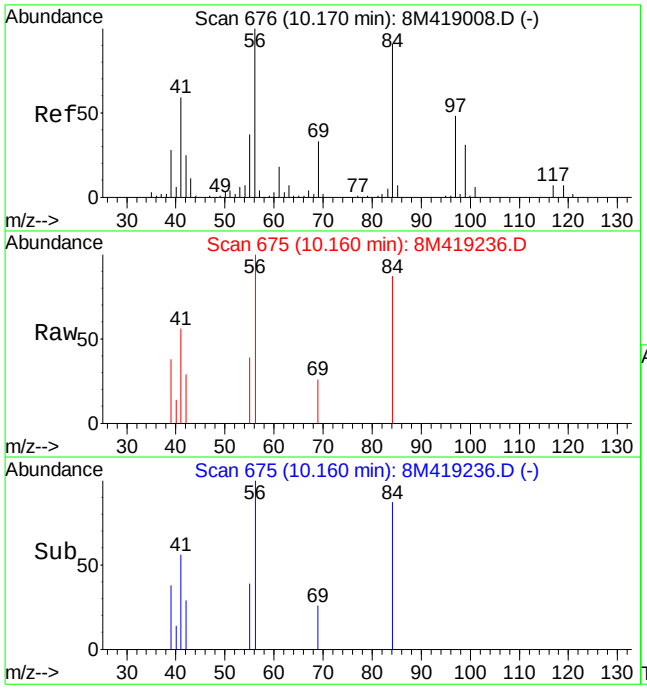


#33
Chloroform
Concen: 0.18 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419236.D
Acq: 28 Apr 2017 14:02

Tgt Ion: 83 Resp: 2416

Ion	Ratio	Lower	Upper
83	100		
85	69.8	39.1	91.3

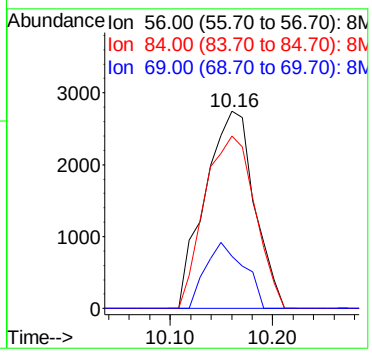




#39
Cyclohexane
Concen: 0.89 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419236.D
Acq: 28 Apr 2017 14:02

Tgt Ion: 56 Resp: 9158

Ion	Ratio	Lower	Upper
56	100		
84	89.4	61.6	143.8
69	26.3	21.4	50.0



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419237.D Vial: 15
Acq On : 28 Apr 2017 14:32 Operator: TMB
Sample : L17041200-23 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 14:54:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

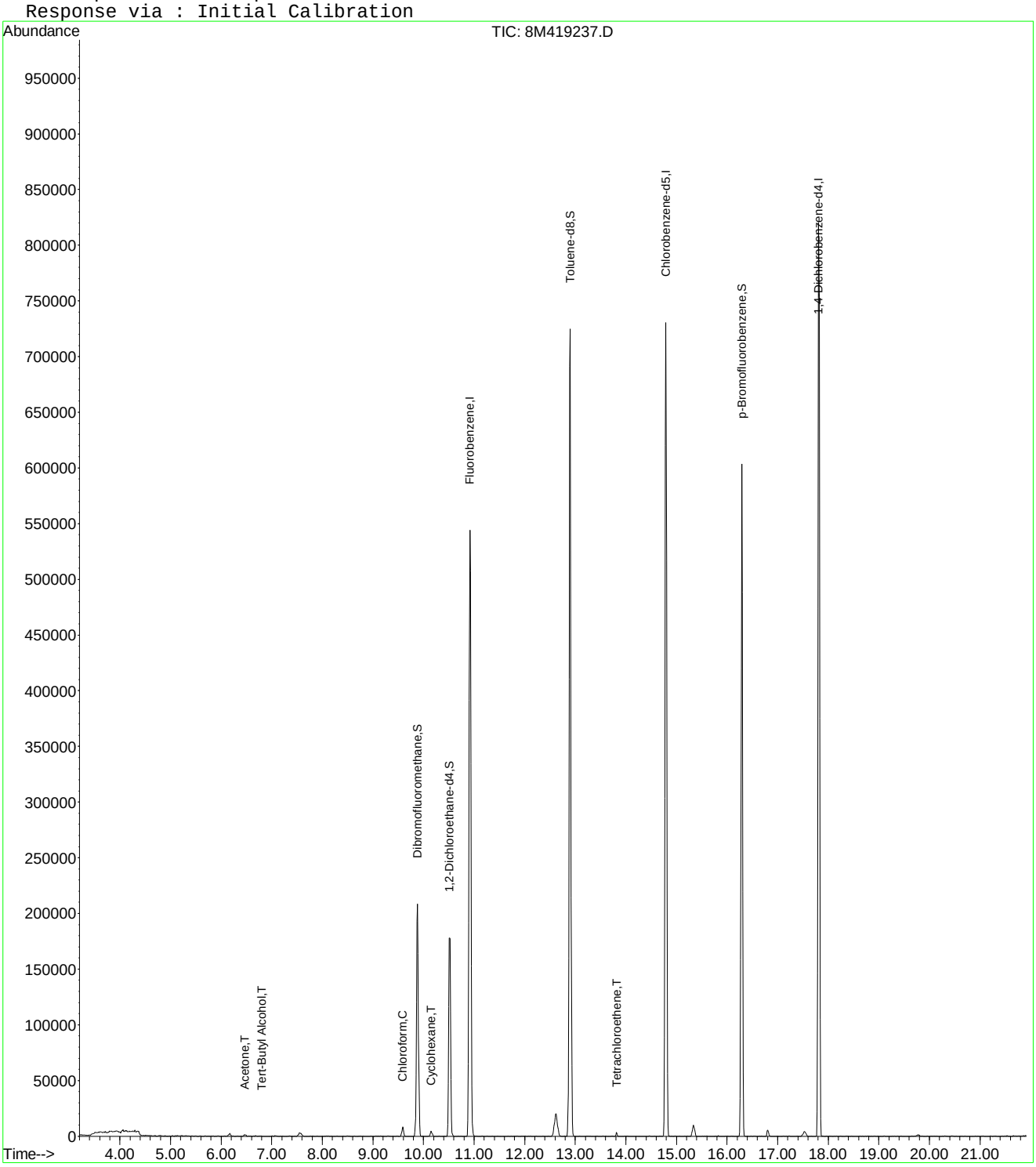
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	665435	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	536474	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	271206	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	176874	25.3415 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.36%		
43) 1,2-Dichloroethane-d4	10.51	65	158086	26.1995 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.80%		
58) Toluene-d8	12.90	98	657934	26.8408 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.36%		
80) p-Bromofluorobenzene	16.29	95	253073	26.4398 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.76%		
Target Compounds					Qvalue
13) Acetone	6.47	43	2355	2.5163 ug/L #	58
15) Tert-Butyl Alcohol	6.80	59	430	1.4174 ug/L #	59
33) Chloroform	9.58	83	9195	0.6877 ug/L	94
39) Cyclohexane	10.15	56	3783	0.3766 ug/L #	69
66) Tetrachloroethene	13.82	164	945	0.1507 ug/L	79

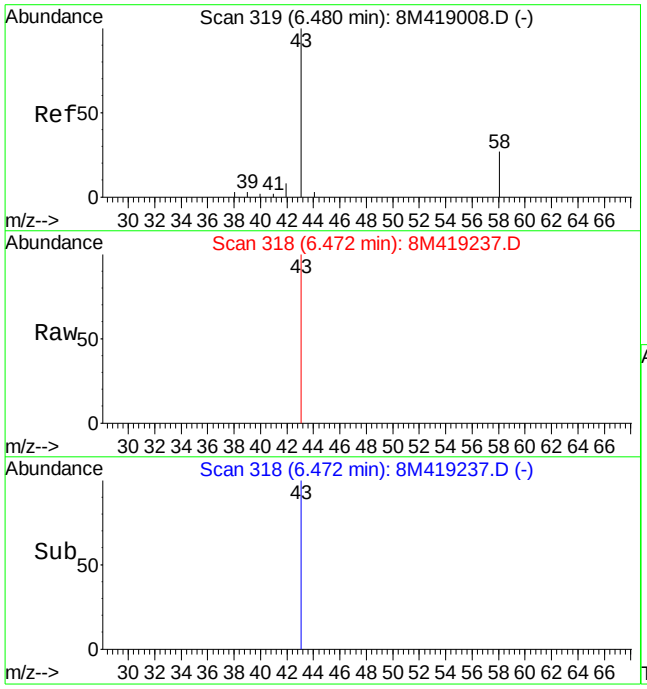
(#) = qualifier out of range (m) = manual integration
8M419237.D 8260WT.M Mon May 01 08:30:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419237.D Vial: 15
Acq On : 28 Apr 2017 14:32 Operator: TMB
Sample : L17041200-23 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 14:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

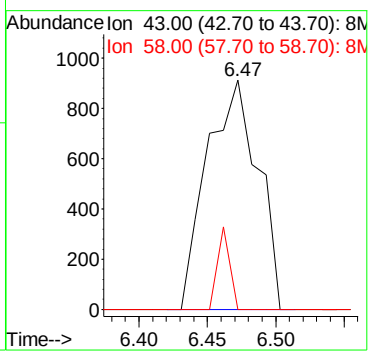


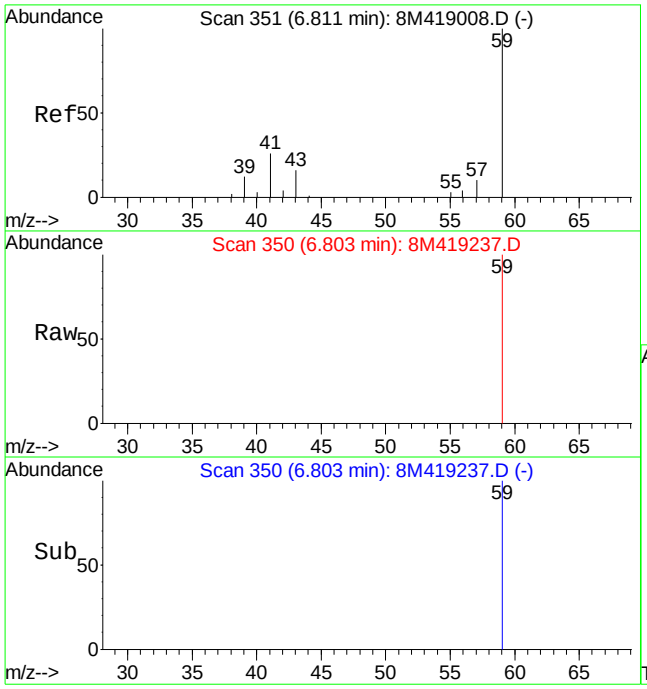


#13
Acetone
Concen: 2.52 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419237.D
Acq: 28 Apr 2017 14:32

Tgt Ion: 43 Resp: 2355

Ion	Ratio	Lower	Upper
43	100		
58	8.7	19.4	45.4#

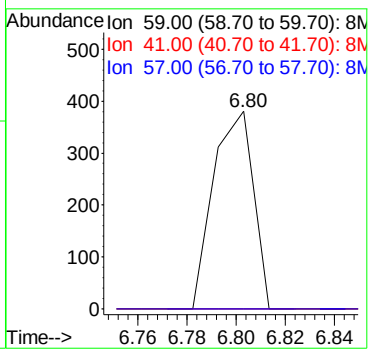


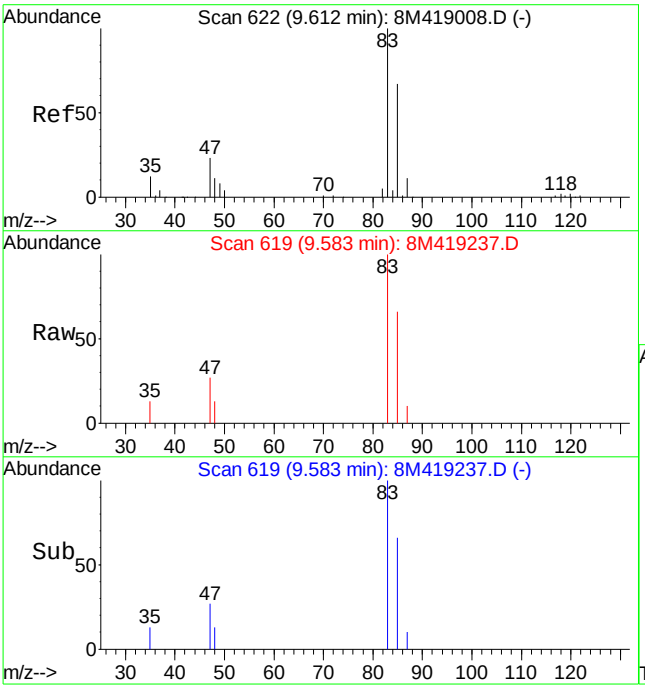


#15
Tert-Butyl Alcohol
Concen: 1.42 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419237.D
Acq: 28 Apr 2017 14:32

Tgt Ion: 59 Resp: 430

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

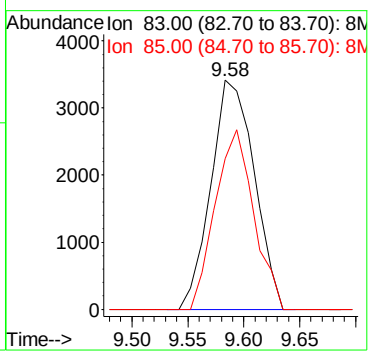


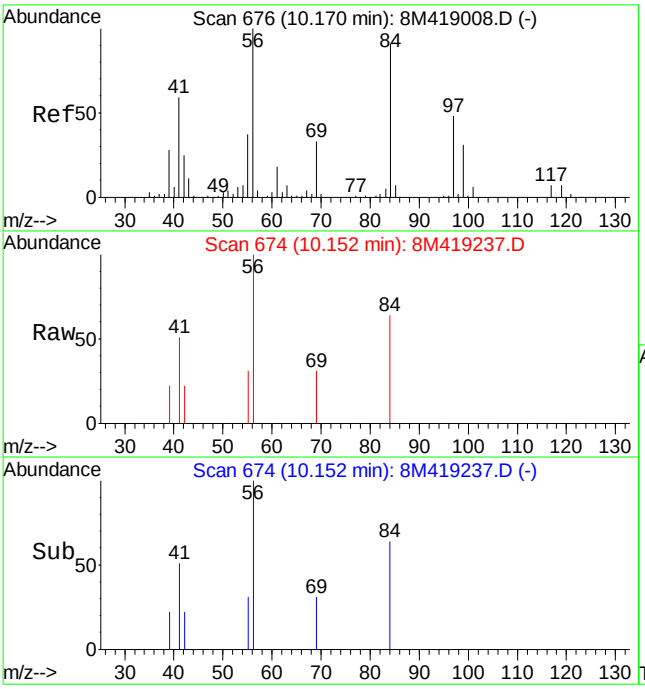


#33
Chloroform
Concen: 0.69 ug/L
RT: 9.58 min Scan# 619
Delta R.T. -0.02 min
Lab File: 8M419237.D
Acq: 28 Apr 2017 14:32

Tgt Ion: 83 Resp: 9195

Ion	Ratio	Lower	Upper
83	100		
85	69.6	39.1	91.3

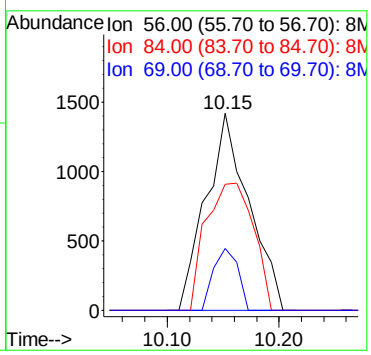


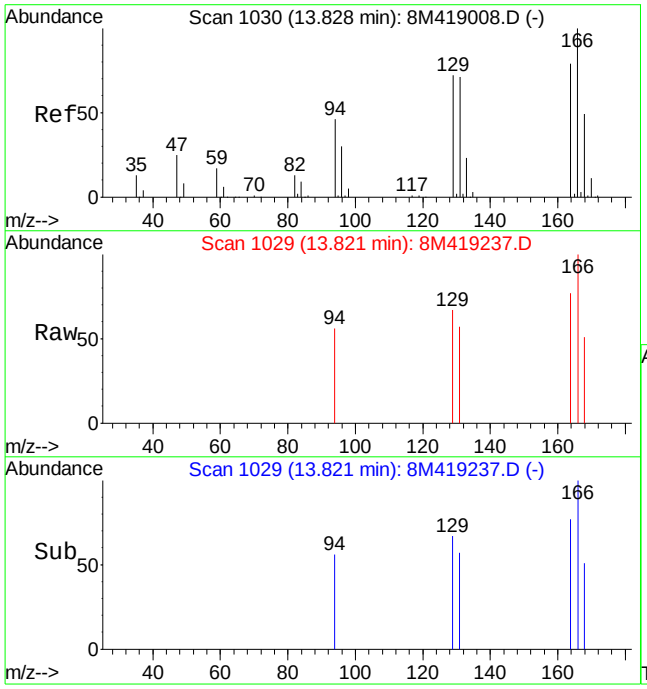


#39
Cyclohexane
Concen: 0.38 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419237.D
Acq: 28 Apr 2017 14:32

Tgt Ion: 56 Resp: 3783

Ion	Ratio	Lower	Upper
56	100		
84	71.2	61.6	143.8
69	18.0	21.4	50.0#

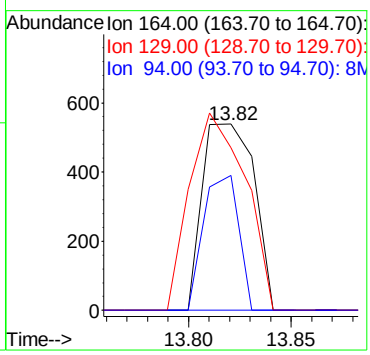




#66
Tetrachloroethene
Concen: 0.15 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419237.D
Acq: 28 Apr 2017 14:32

Tgt Ion:164 Resp: 945

Ion	Ratio	Lower	Upper
164	100		
129	114.1	53.4	124.6
94	49.1	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419238.D Vial: 16
Acq On : 28 Apr 2017 15:02 Operator: TMB
Sample : L17041200-24 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 15:24:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

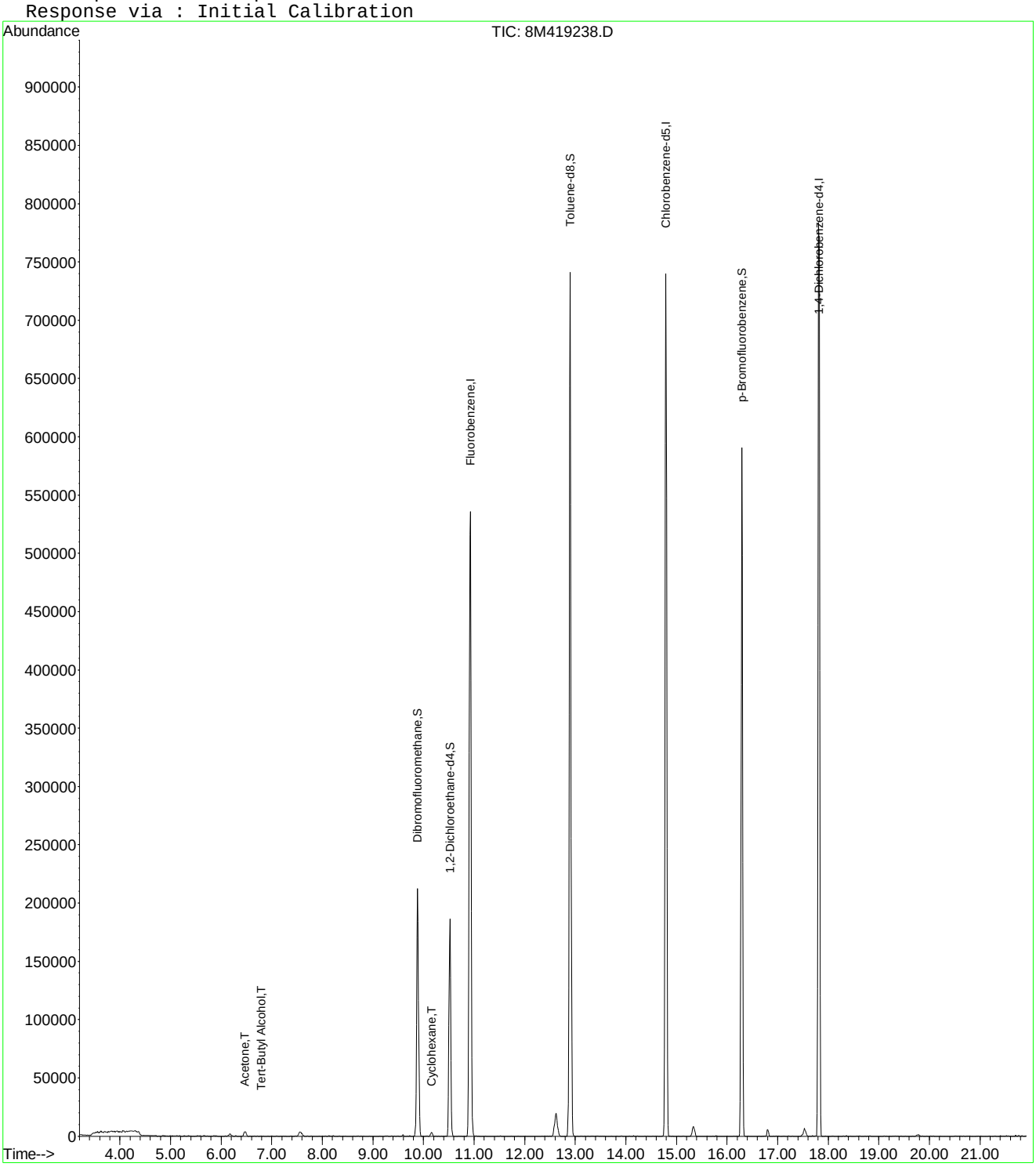
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	664910	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	534282	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	267068	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176519	25.3106	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.52	65	158607	26.3066	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.24%			
58) Toluene-d8	12.90	98	658717	26.9830	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.92%			
80) p-Bromofluorobenzene	16.29	95	249078	26.4256	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.72%			
Target Compounds						Qvalue
13) Acetone	6.47	43	8529	9.1204	ug/L	83
15) Tert-Butyl Alcohol	6.79	59	202	0.6664	ug/L #	59
39) Cyclohexane	10.16	56	2599	0.2589	ug/L #	76

(#) = qualifier out of range (m) = manual integration
8M419238.D 8260WT.M Mon May 01 08:30:44 2017 Page 1

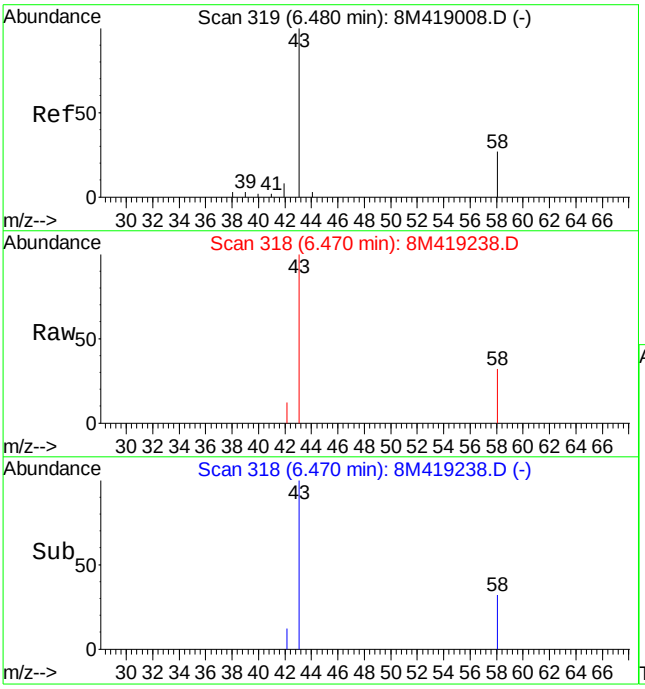
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419238.D Vial: 16
Acq On : 28 Apr 2017 15:02 Operator: TMB
Sample : L17041200-24 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 15:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



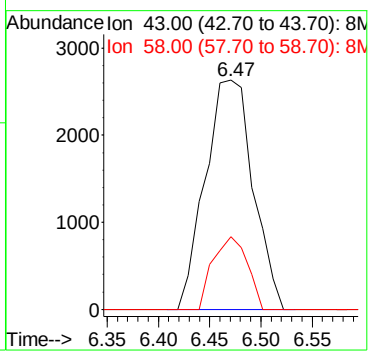
8M419238.D 8260WT.M Mon May 01 08:30:44 2017 Page 2

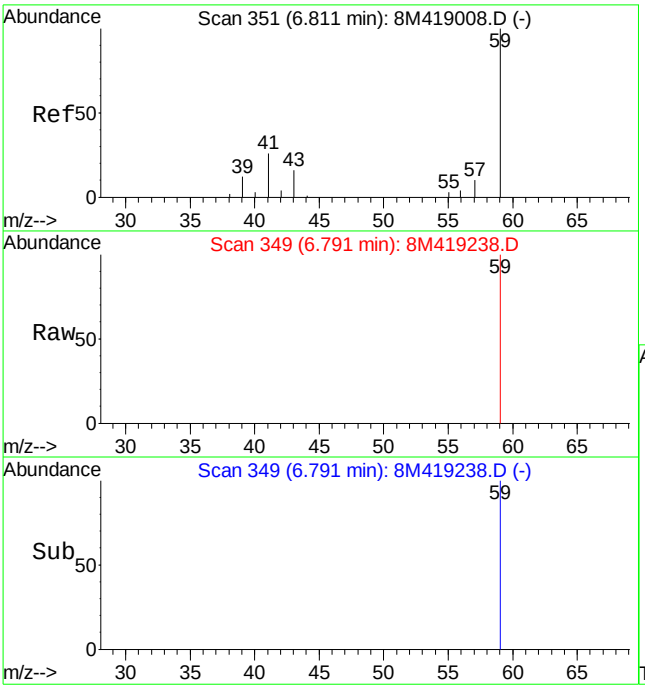


#13
Acetone
Concen: 9.12 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419238.D
Acq: 28 Apr 2017 15:02

Tgt Ion: 43 Resp: 8529

Ion	Ratio	Lower	Upper
43	100		
58	22.8	19.4	45.4

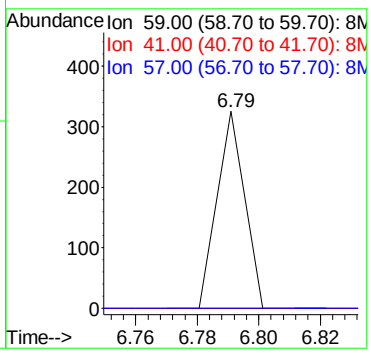


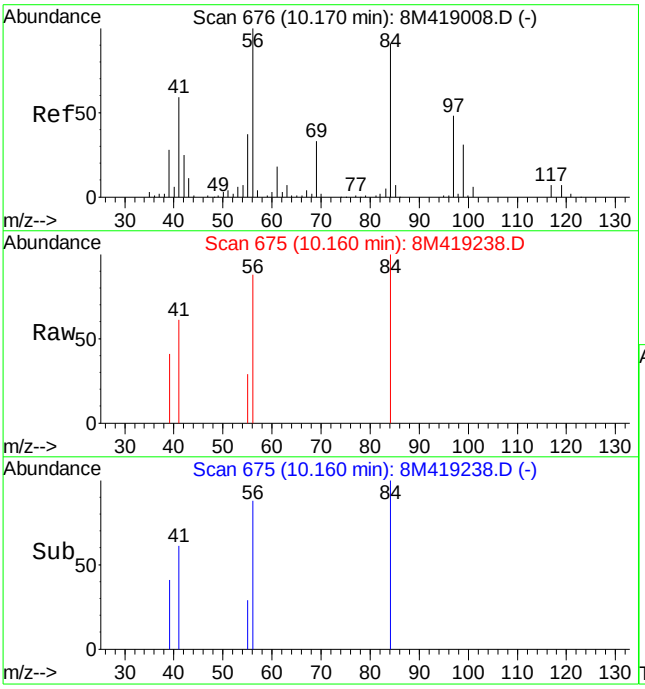


#15
Tert-Butyl Alcohol
Concen: 0.67 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419238.D
Acq: 28 Apr 2017 15:02

Tgt Ion: 59 Resp: 202

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

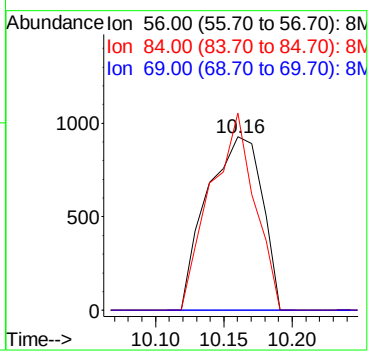




#39
Cyclohexane
Concen: 0.26 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419238.D
Acq: 28 Apr 2017 15:02

Tgt Ion: 56 Resp: 2599

Ion	Ratio	Lower	Upper
56	100		
84	90.7	61.6	143.8
69	0.0	21.4	50.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419239.D Vial: 17
Acq On : 28 Apr 2017 15:32 Operator: TMB
Sample : L17041200-25 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 15:54:01 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

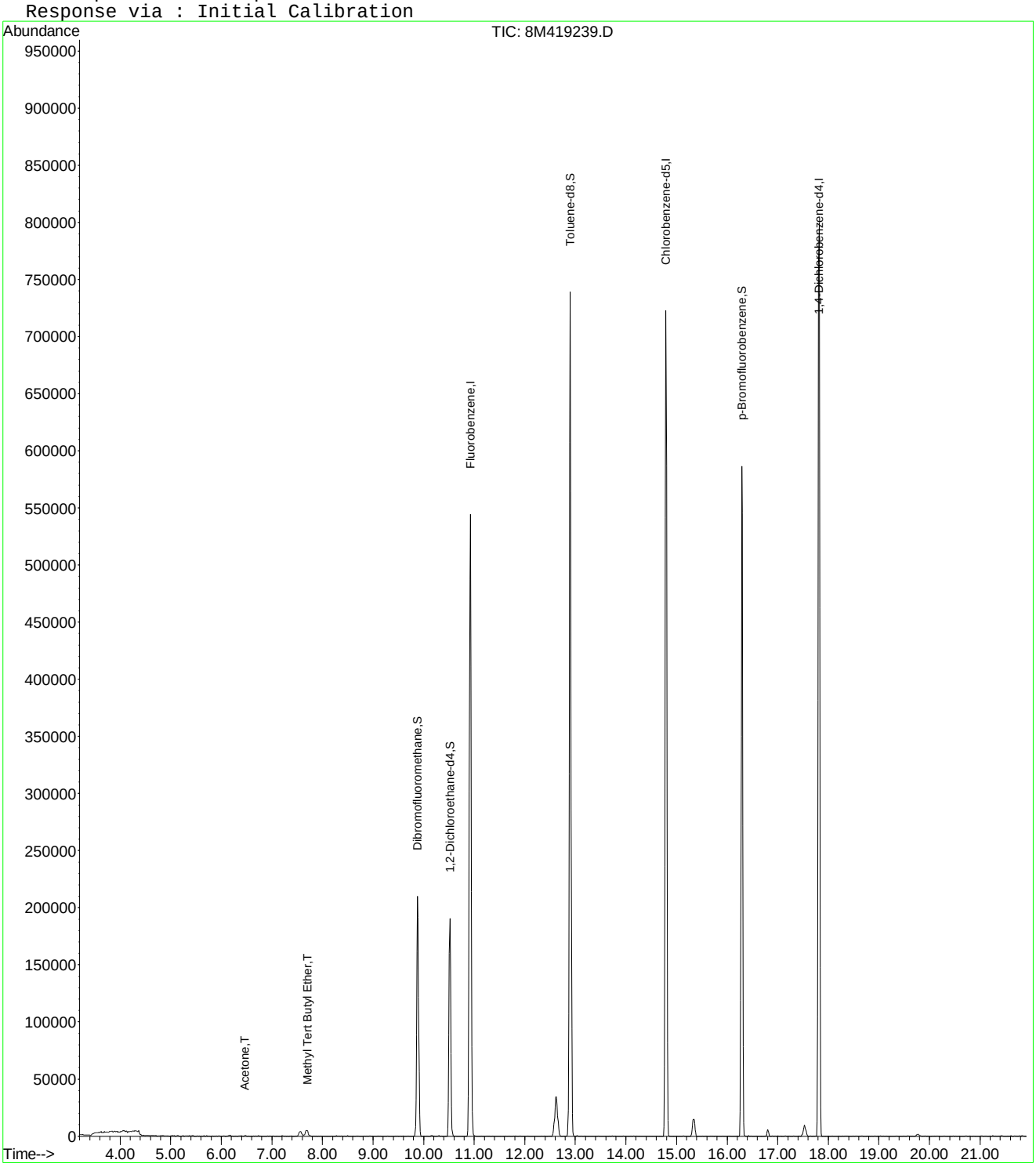
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	661982	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	529693	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	268945	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	176545	25.4263	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.72%			
43) 1,2-Dichloroethane-d4	10.52	65	157618	26.2582	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.04%			
58) Toluene-d8	12.90	98	651117	26.9027	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.60%			
80) p-Bromofluorobenzene	16.29	95	252352	26.5861	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.36%			
Target Compounds						Qvalue
13) Acetone	6.47	43	491	0.5274	ug/L #	42
22) Methyl Tert Butyl Ether	7.70	73	12868	0.9479	ug/L	86

(#) = qualifier out of range (m) = manual integration
8M419239.D 8260WT.M Mon May 01 08:30:47 2017 Page 1

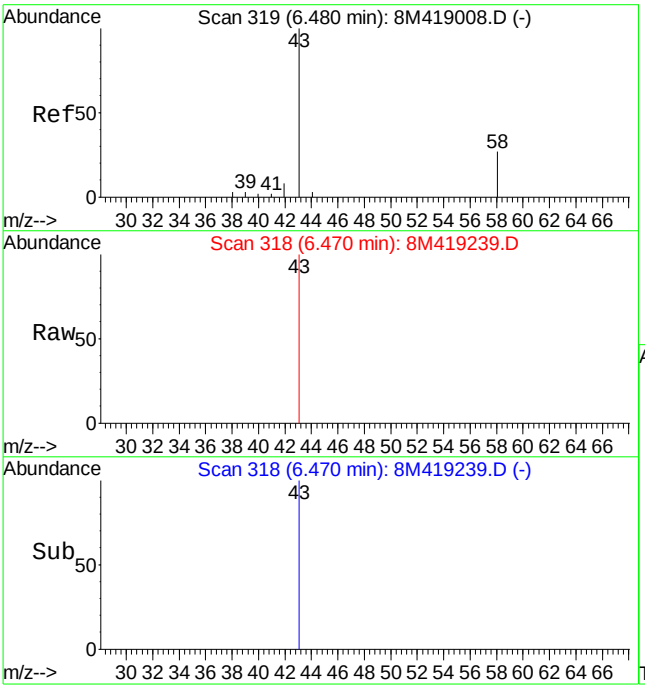
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419239.D Vial: 17
Acq On : 28 Apr 2017 15:32 Operator: TMB
Sample : L17041200-25 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 15:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



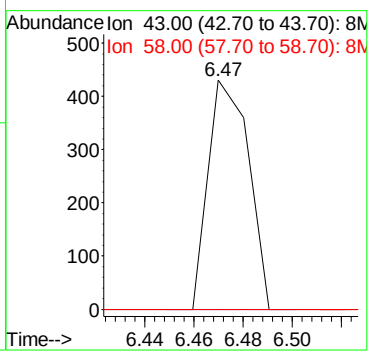
8M419239.D 8260WT.M Mon May 01 08:30:47 2017 Page 2

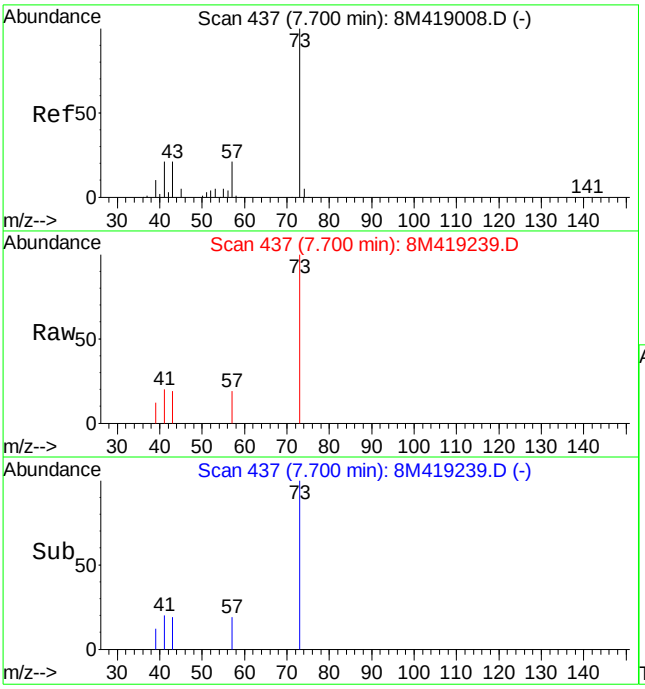


#13
Acetone
Concen: 0.53 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419239.D
Acq: 28 Apr 2017 15:32

Tgt Ion: 43 Resp: 491

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

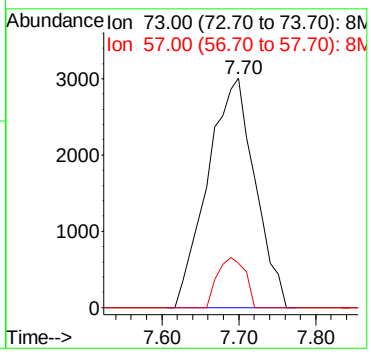




#22
Methyl Tert Butyl Ether
Concen: 0.95 ug/L
RT: 7.70 min Scan# 437
Delta R.T. -0.01 min
Lab File: 8M419239.D
Acq: 28 Apr 2017 15:32

Tgt Ion: 73 Resp: 12868

Ion	Ratio	Lower	Upper
73	100		
57	12.7	11.4	26.6



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419240.D Vial: 18
Acq On : 28 Apr 2017 16:02 Operator: TMB
Sample : L17041200-26 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:24:07 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

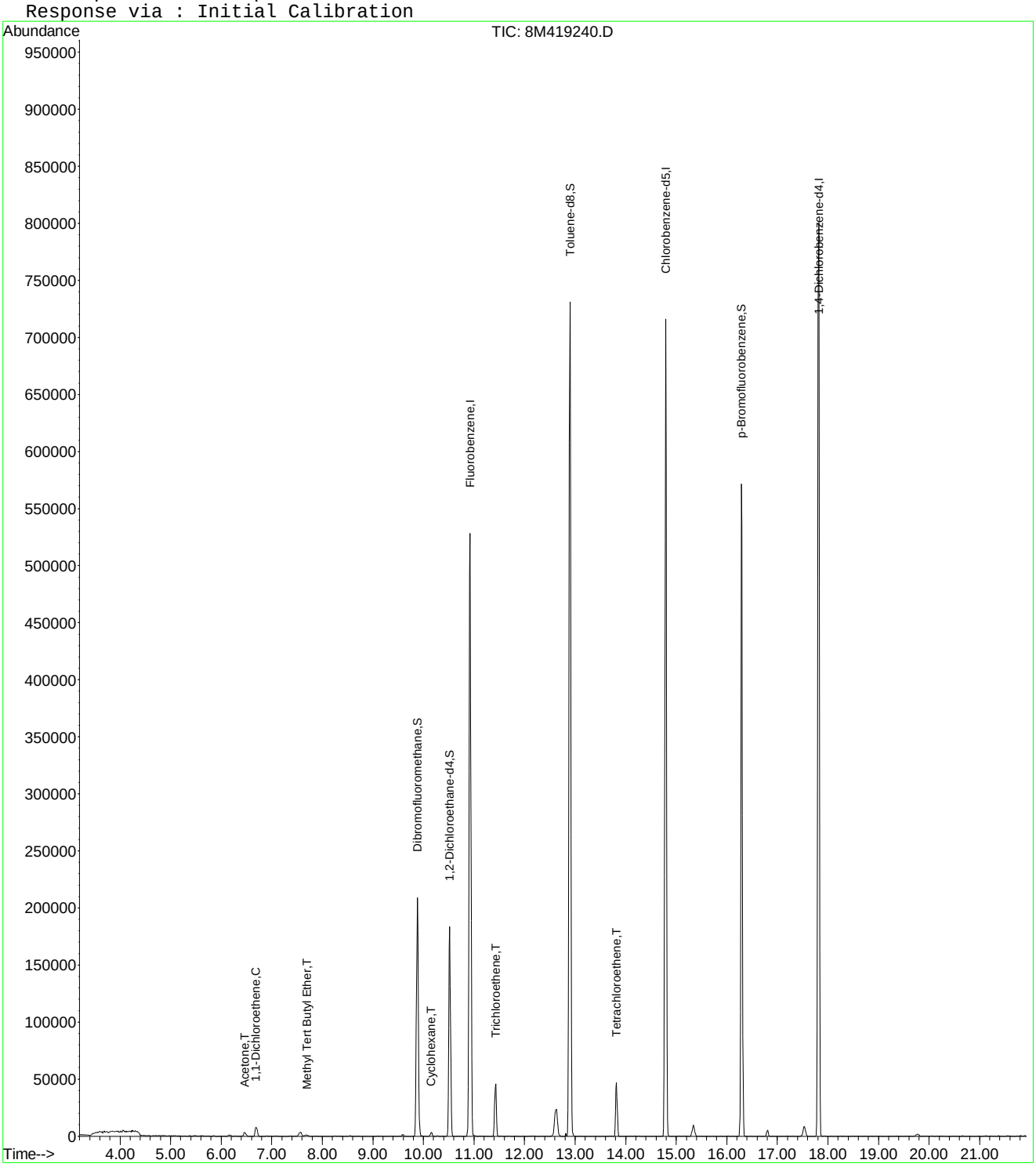
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	651814	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	519915	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	264898	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	173565	25.3871	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.52	65	154471	26.1354	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.56%			
58) Toluene-d8	12.90	98	640523	26.9627	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.84%			
80) p-Bromofluorobenzene	16.29	95	247385	26.4610	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.84%			
Target Compounds						Qvalue
13) Acetone	6.47	43	7262	7.9216	ug/L	98
14) 1,1-Dichloroethene	6.69	61	9892	1.0479	ug/L	87
22) Methyl Tert Butyl Ether	7.70	73	3508	0.2624	ug/L #	58
39) Cyclohexane	10.15	56	3035	0.3084	ug/L #	63
47) Trichloroethene	11.43	130	20089	2.6557	ug/L	100
66) Tetrachloroethene	13.82	164	14464	2.3793	ug/L	96

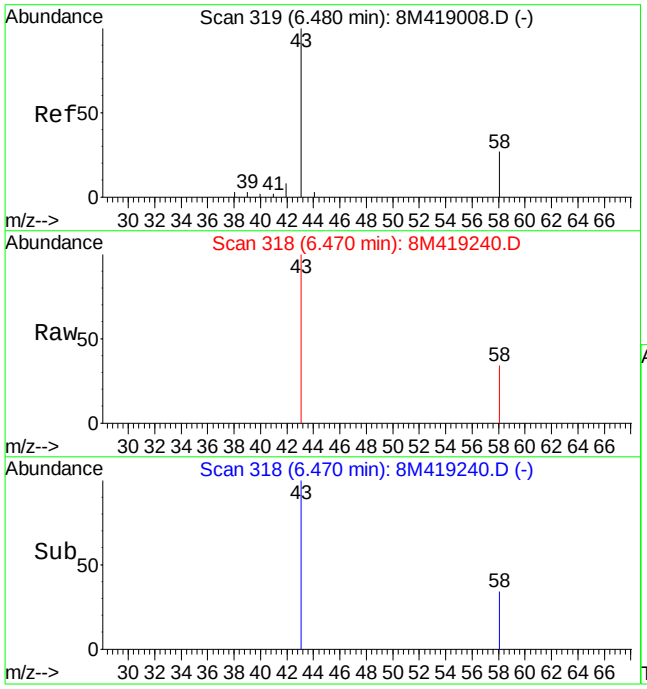
(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419240.D Vial: 18
Acq On : 28 Apr 2017 16:02 Operator: TMB
Sample : L17041200-26 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

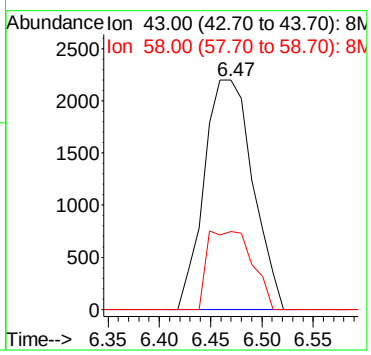


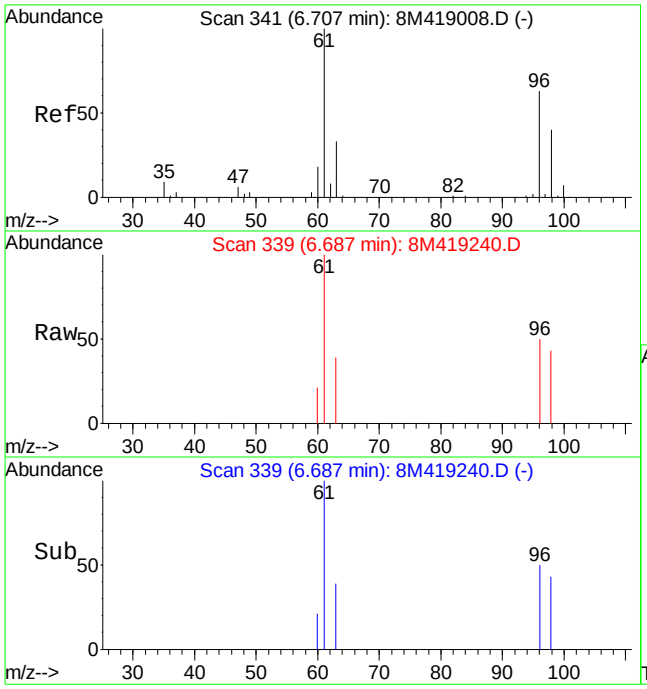


#13
Acetone
Concen: 7.92 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion: 43 Resp: 7262

Ion	Ratio	Lower	Upper
43	100		
58	31.5	19.4	45.4

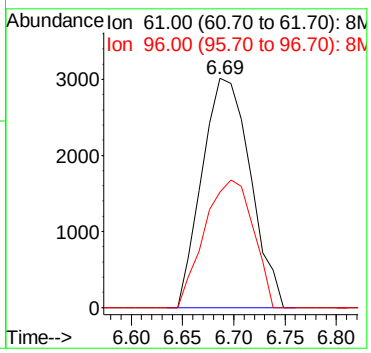


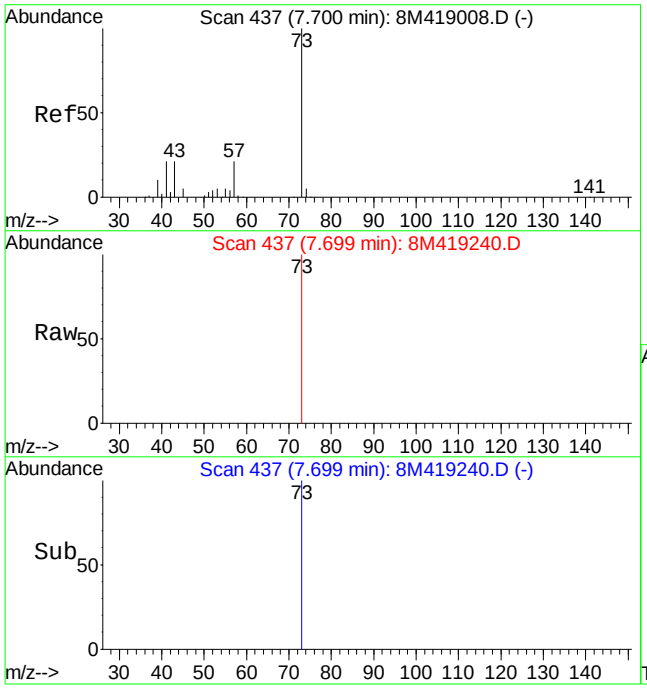


#14
1,1-Dichloroethene
Concen: 1.05 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion: 61 Resp: 9892

Ion	Ratio	Lower	Upper
61	100		
96	56.0	40.0	93.4

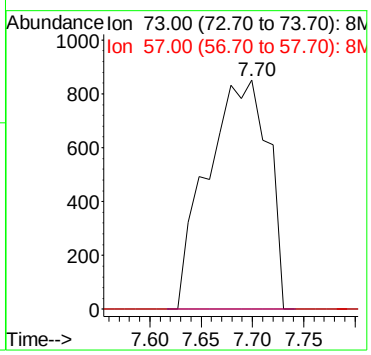


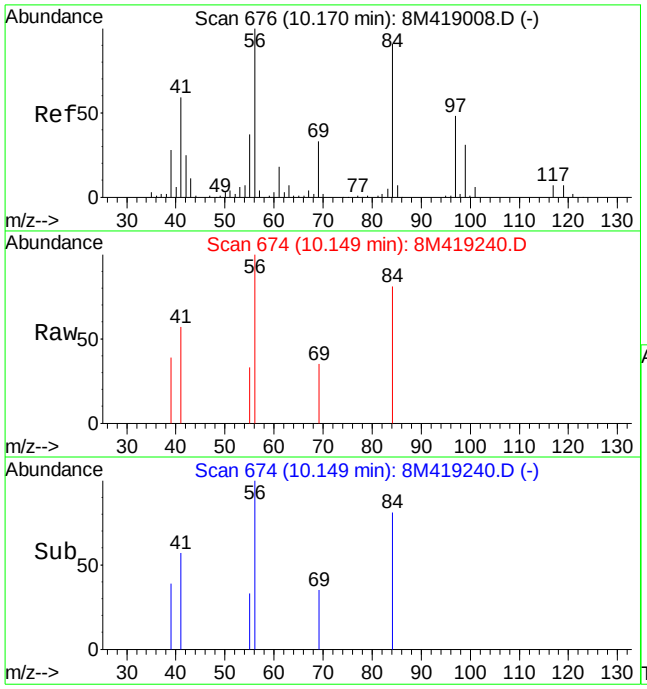


#22
Methyl Tert Butyl Ether
Concen: 0.26 ug/L
RT: 7.70 min Scan# 437
Delta R.T. -0.01 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion: 73 Resp: 3508

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

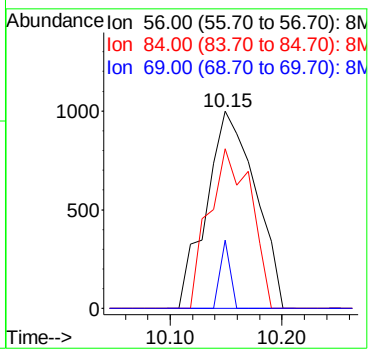


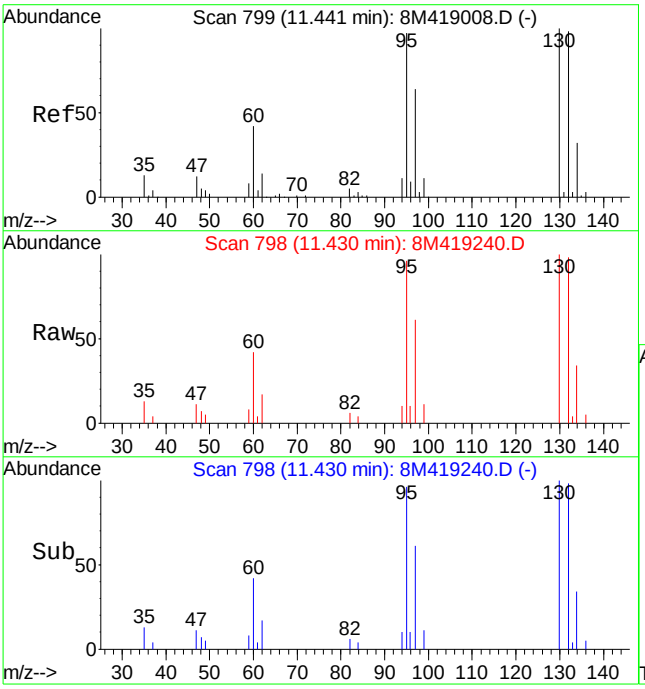


#39
Cyclohexane
Concen: 0.31 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion: 56 Resp: 3035

Ion	Ratio	Lower	Upper
56	100		
84	69.7	61.6	143.8
69	7.1	21.4	50.0#

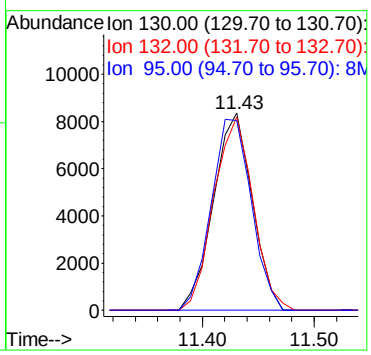


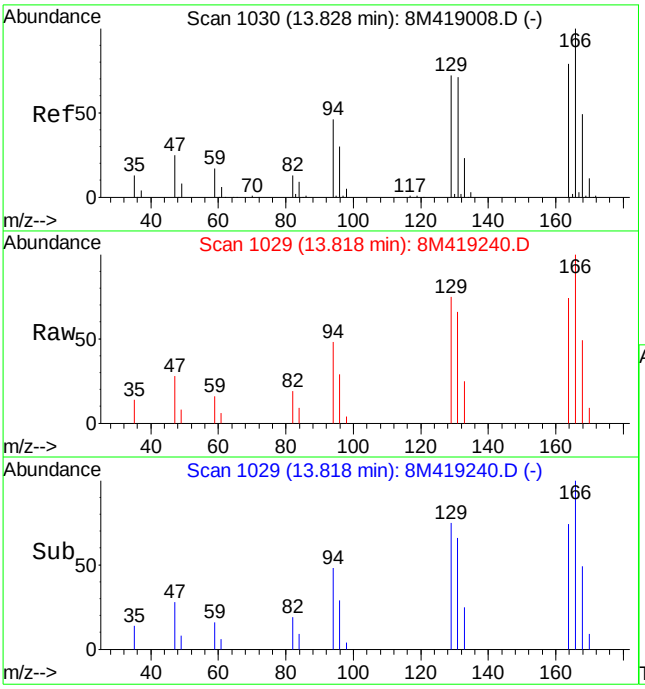


#47
Trichloroethene
Concen: 2.66 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion:130 Resp: 20089

Ion	Ratio	Lower	Upper
130	100		
132	99.3	59.4	138.6
95	100.6	60.1	140.3

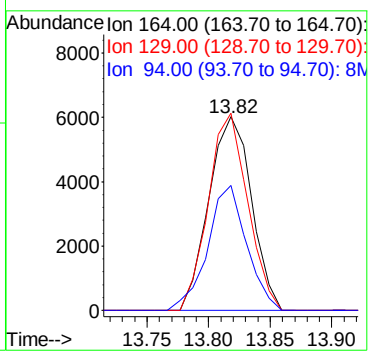




#66
Tetrachloroethene
Concen: 2.38 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419240.D
Acq: 28 Apr 2017 16:02

Tgt Ion:164 Resp: 14464

Ion	Ratio	Lower	Upper
164	100		
129	94.1	53.4	124.6
94	59.3	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419241.D Vial: 19
Acq On : 28 Apr 2017 16:32 Operator: TMB
Sample : L17041200-27 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:54:44 2017 Quant Results File: 8260WT.RES

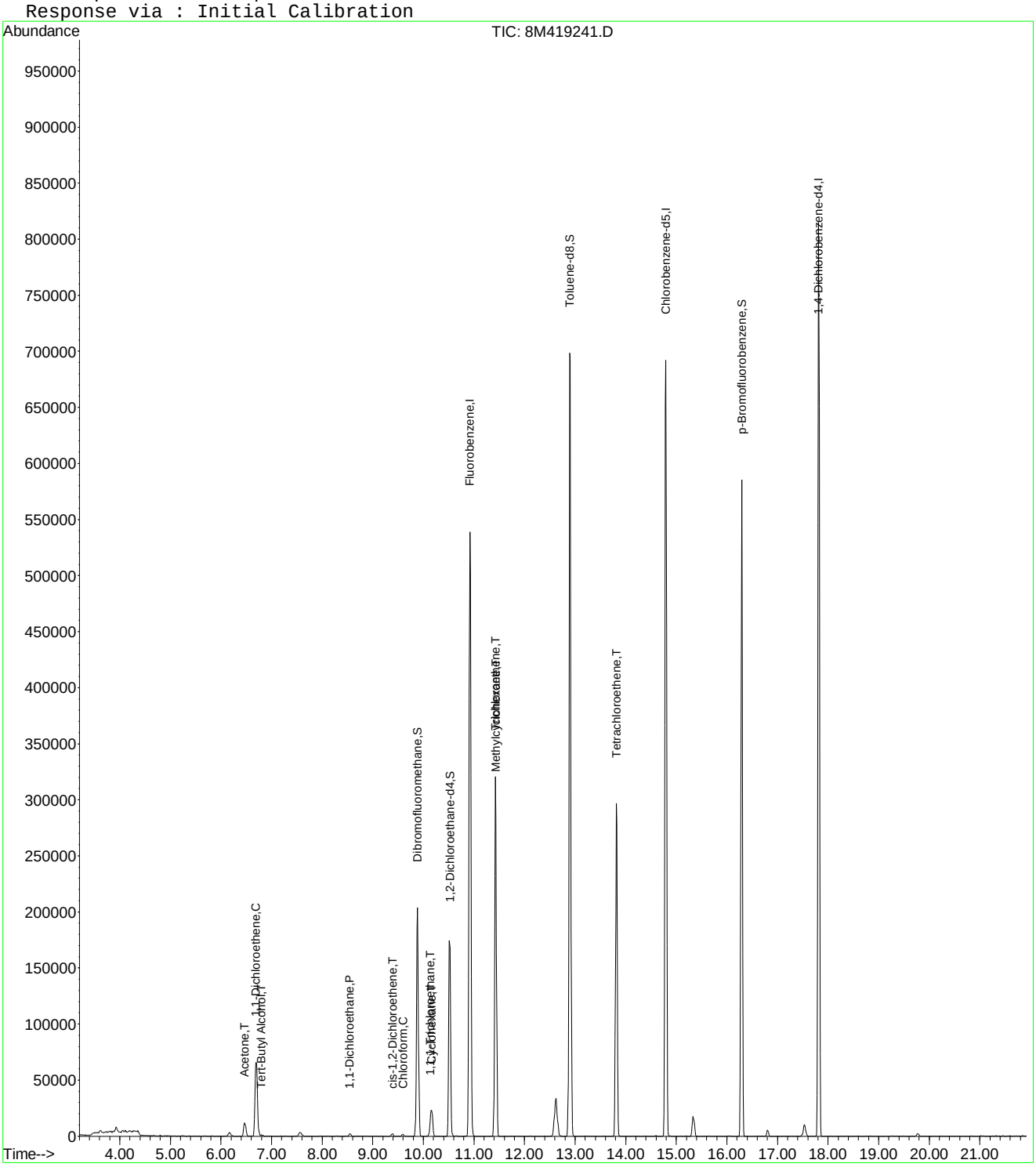
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

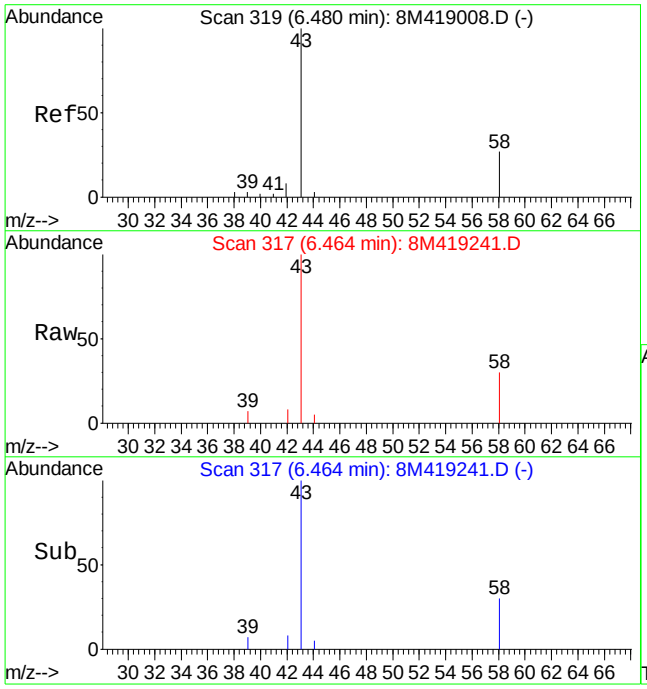
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	658087	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	528740	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	260689	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	171794	24.8885 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.56%		
43) 1,2-Dichloroethane-d4	10.53	65	152384	25.5365 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.16%		
58) Toluene-d8	12.89	98	647652	26.8078 ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%		
80) p-Bromofluorobenzene	16.29	95	243933	26.5130 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.04%		
Target Compounds					Qvalue
13) Acetone	6.46	43	25256	27.2874 ug/L	93
14) 1,1-Dichloroethene	6.69	61	72971	7.6564 ug/L	94
15) Tert-Butyl Alcohol	6.79	59	2743	9.1426 ug/L #	70
27) 1,1-Dichloroethane	8.54	63	4760	0.3989 ug/L #	79
32) cis-1,2-Dichloroethene	9.39	96	1750	0.2283 ug/L	75
33) Chloroform	9.60	83	2686	0.2031 ug/L	89
38) 1,1,1-Trichloroethane	10.13	97	1361	0.1275 ug/L #	54
39) Cyclohexane	10.16	56	18679	1.8801 ug/L	84
47) Trichloroethene	11.42	130	132587	17.3608 ug/L	99
48) Methylcyclohexane	11.43	83	1474	0.1448 ug/L #	1
66) Tetrachloroethene	13.81	164	91512	14.8025 ug/L	98

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419241.D Vial: 19
Acq On : 28 Apr 2017 16:32 Operator: TMB
Sample : L17041200-27 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:54 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

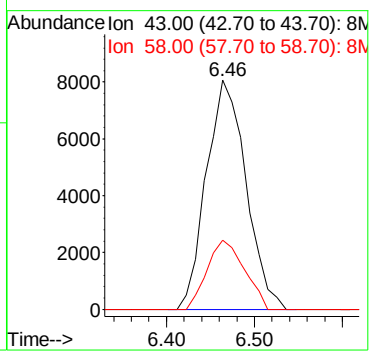


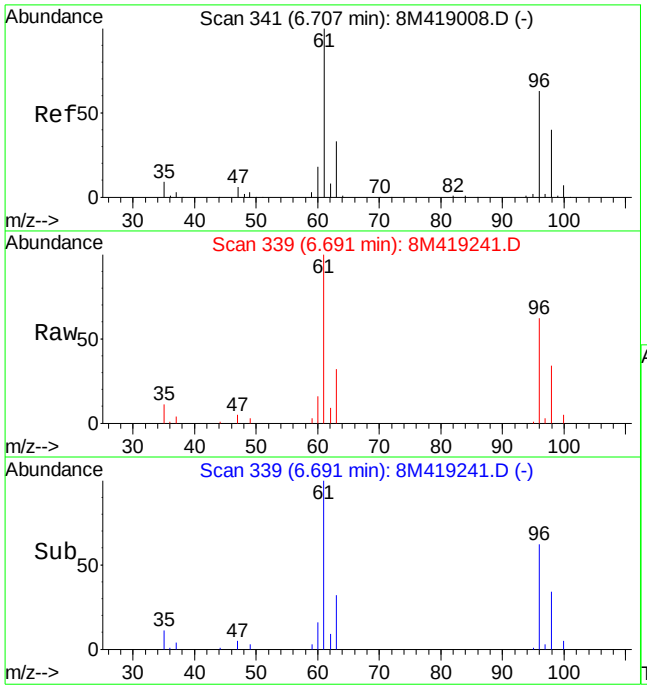


#13
Acetone
Concen: 27.29 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 43 Resp: 25256

Ion	Ratio	Lower	Upper
43	100		
58	28.4	19.4	45.4

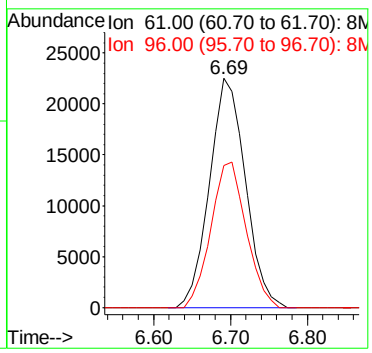


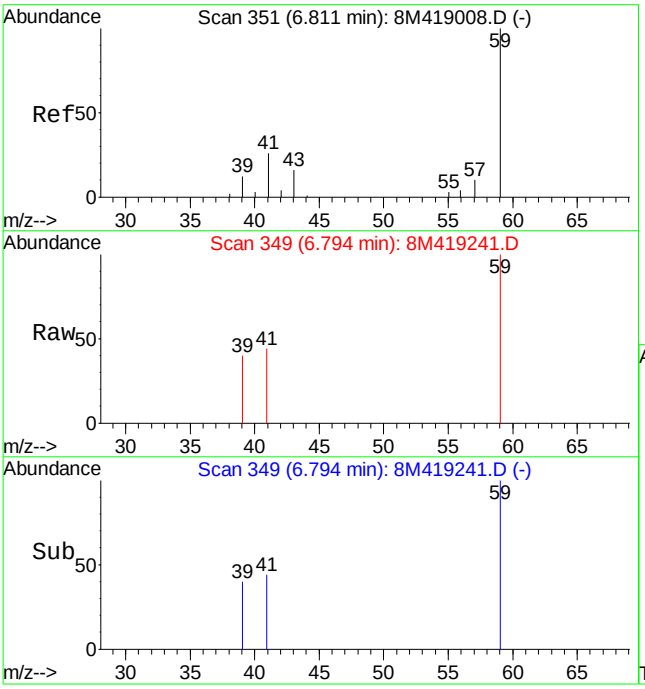


#14
1,1-Dichloroethene
Concen: 7.66 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 61 Resp: 72971

Ion	Ratio	Lower	Upper
61	100		
96	62.2	40.0	93.4

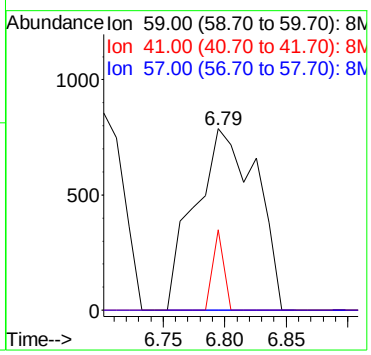


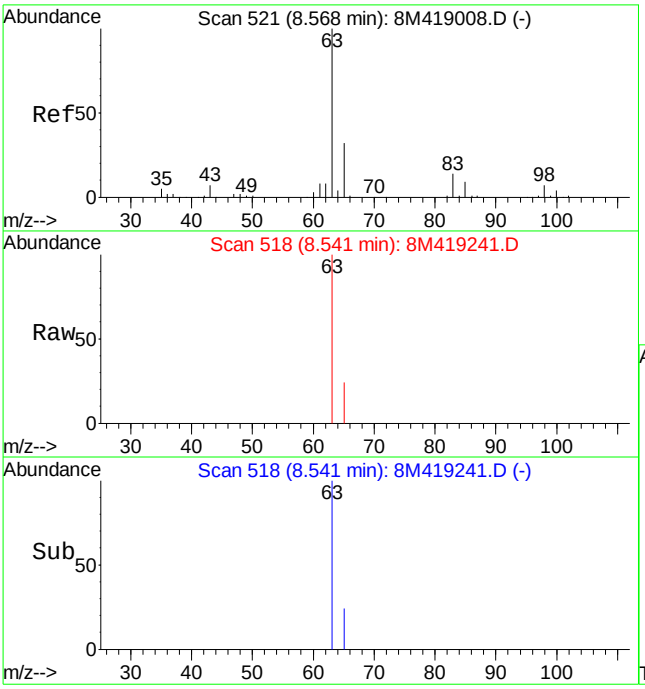


#15
Tert-Butyl Alcohol
Concen: 9.14 ug/L
RT: 6.79 min Scan# 349
Delta R.T. -0.04 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 59 Resp: 2743

Ion	Ratio	Lower	Upper
59	100		
41	7.9	14.0	32.6#
57	0.0	5.8	13.4#

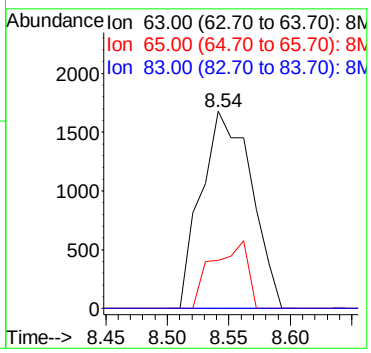


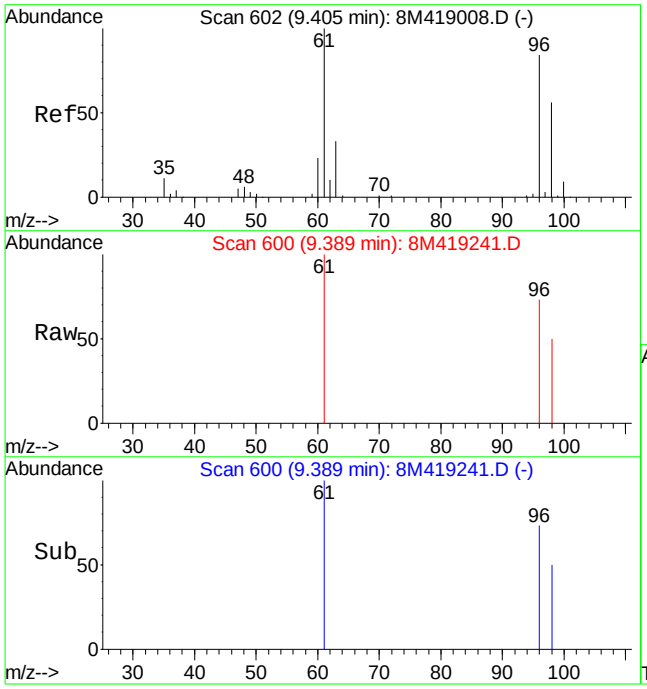


#27
1,1-Dichloroethane
Concen: 0.40 ug/L
RT: 8.54 min Scan# 518
Delta R.T. -0.02 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 63 Resp: 4760

Ion	Ratio	Lower	Upper
63	100		
65	23.8	19.1	44.7
83	0.0	9.0	21.0#

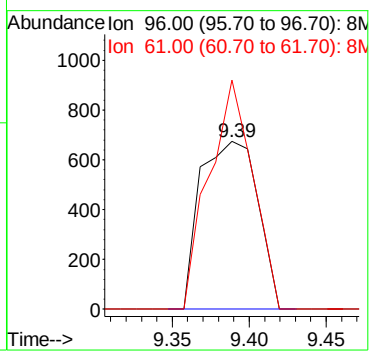


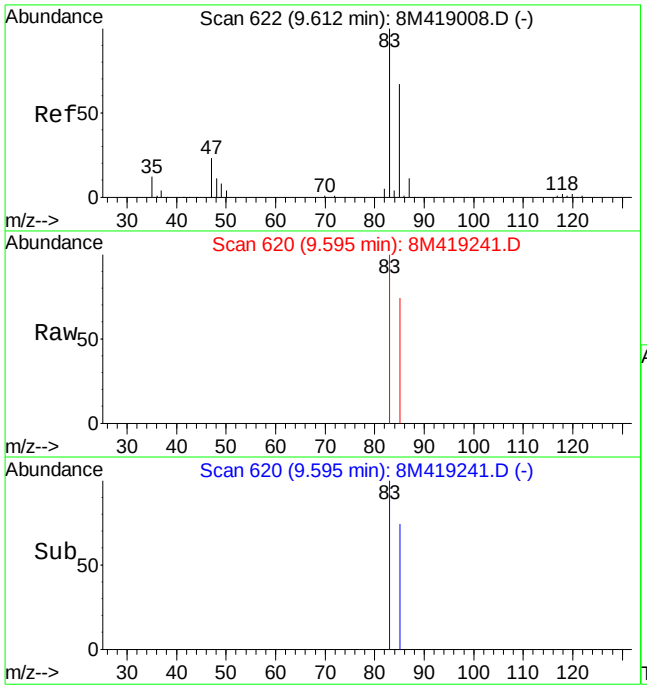


#32
cis-1,2-Dichloroethene
Concen: 0.23 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 96 Resp: 1750

Ion	Ratio	Lower	Upper
96	100		
61	104.1	80.3	187.3

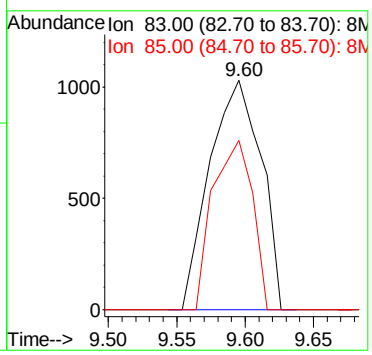


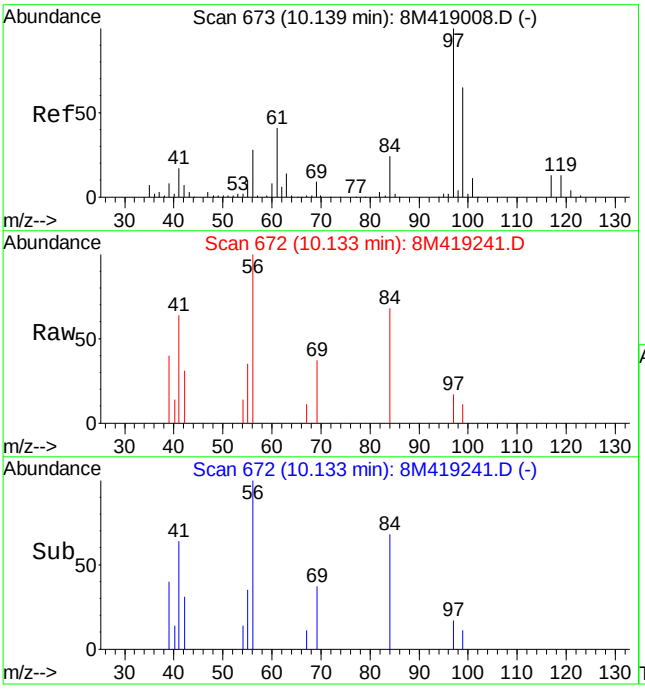


#33
Chloroform
Concen: 0.20 ug/L
RT: 9.60 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 83 Resp: 2686

Ion	Ratio	Lower	Upper
83	100		
85	56.8	39.1	91.3

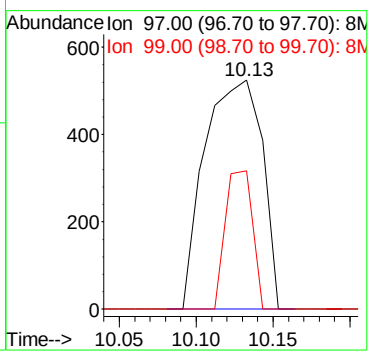


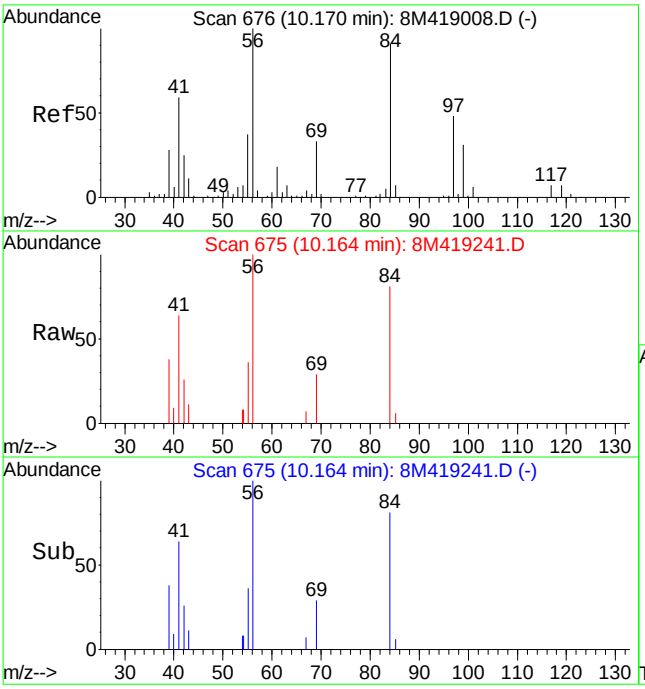


#38
1,1,1-Trichloroethane
Concen: 0.13 ug/L
RT: 10.13 min Scan# 672
Delta R.T. -0.01 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 97 Resp: 1361

Ion	Ratio	Lower	Upper
97	100		
99	28.6	39.0	91.0#

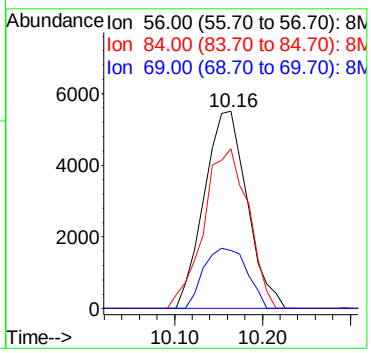


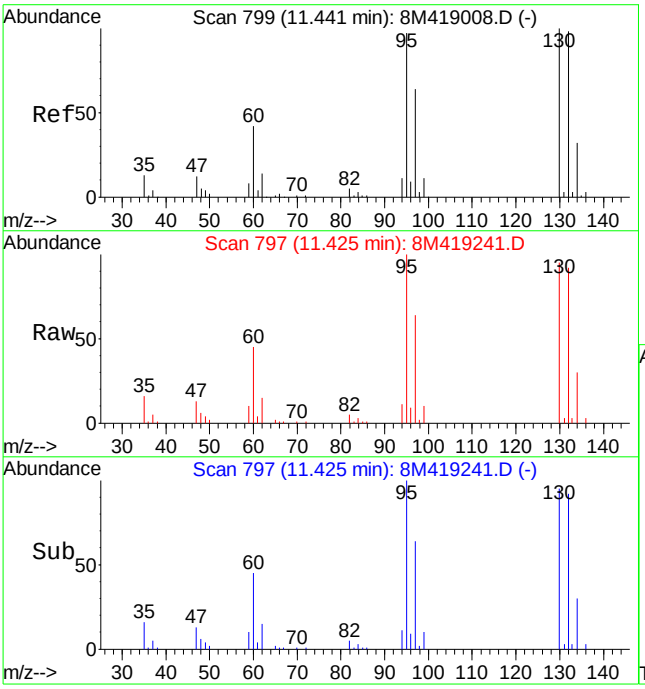


#39
Cyclohexane
Concen: 1.88 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 56 Resp: 18679

Ion	Ratio	Lower	Upper
56	100		
84	84.1	61.6	143.8
69	30.9	21.4	50.0

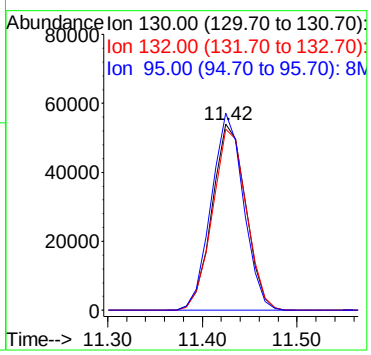


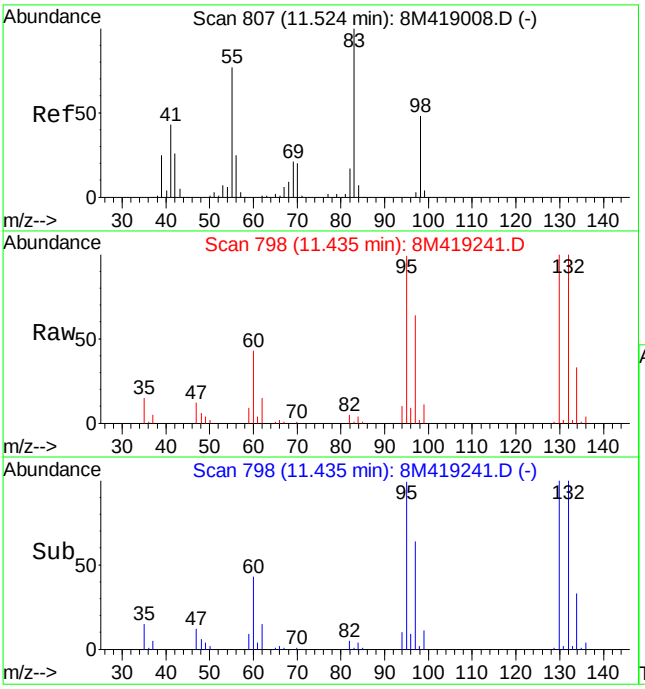


#47
Trichloroethene
Concen: 17.36 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion:130 Resp: 132587

Ion	Ratio	Lower	Upper
130	100		
132	97.9	59.4	138.6
95	101.9	60.1	140.3

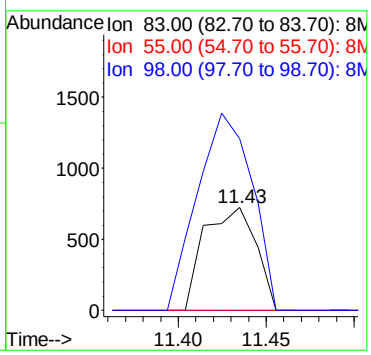


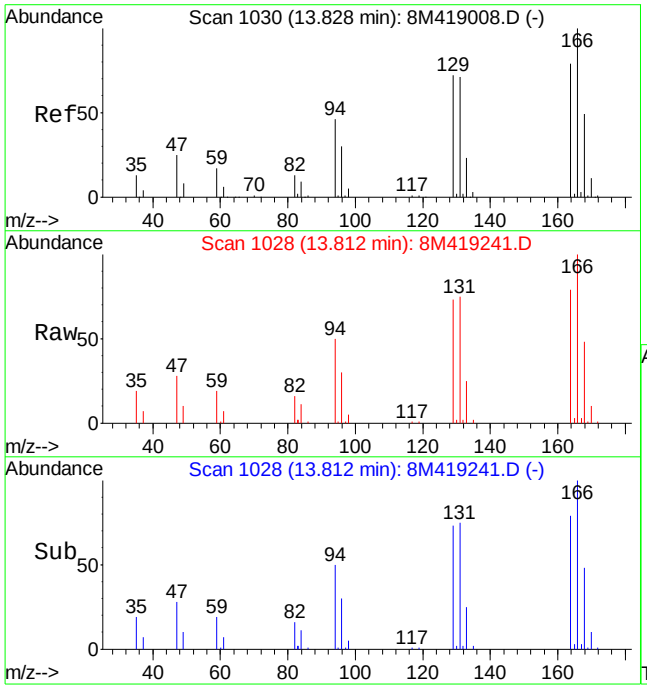


#48
Methylcyclohexane
Concen: 0.14 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.09 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion: 83 Resp: 1474

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	203.6	28.4	66.2#

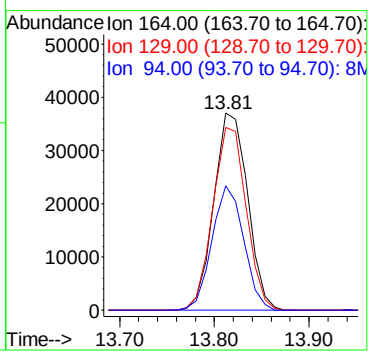




#66
Tetrachloroethene
Concen: 14.80 ug/L
RT: 13.81 min Scan# 1028
Delta R.T. -0.02 min
Lab File: 8M419241.D
Acq: 28 Apr 2017 16:32

Tgt Ion:164 Resp: 91512

Ion	Ratio	Lower	Upper
164	100		
129	91.7	53.4	124.6
94	59.3	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419242.D Vial: 20
Acq On : 28 Apr 2017 17:02 Operator: TMB
Sample : L17041200-28 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 17:24:10 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

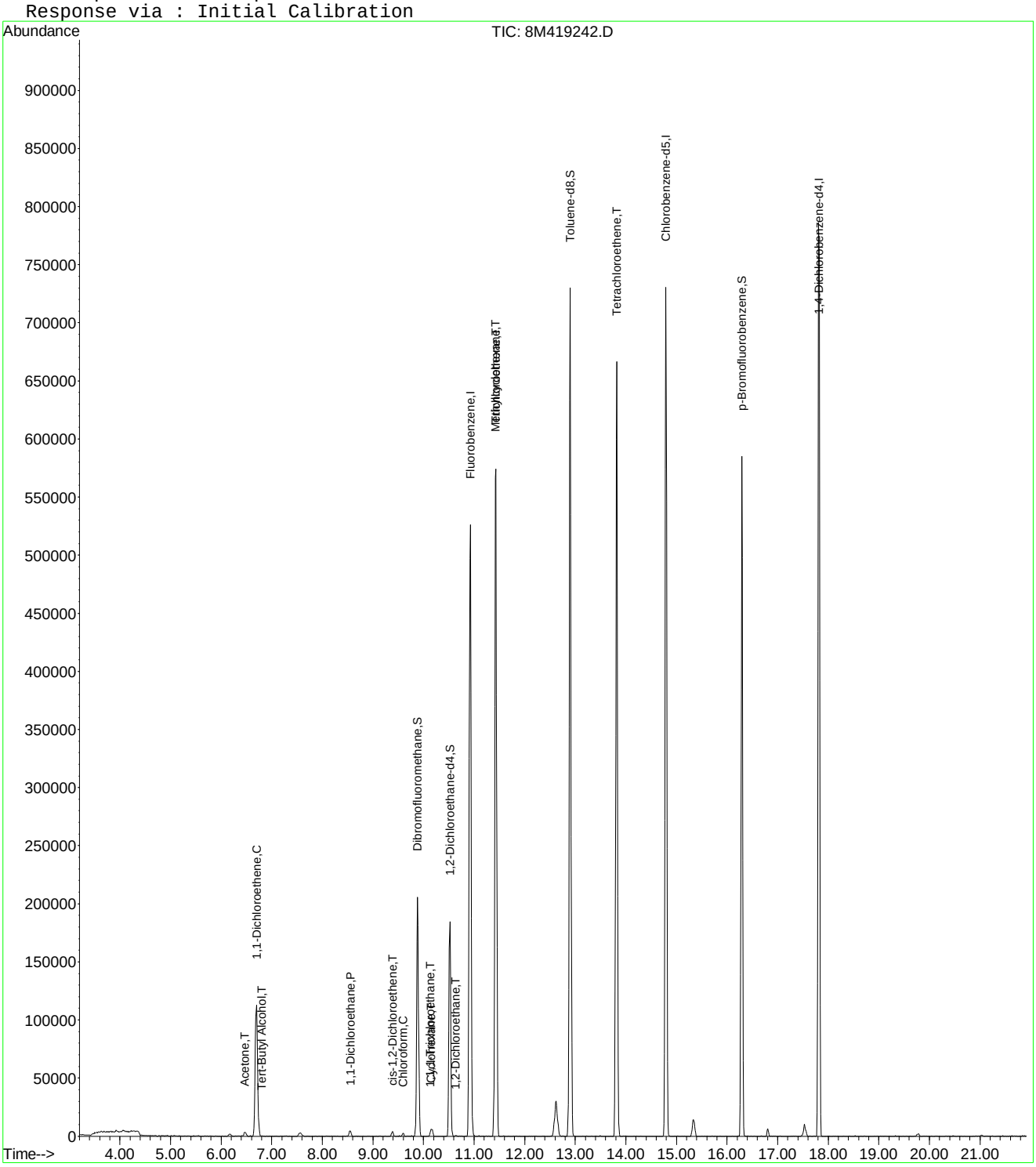
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	653564	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	524672	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	266489	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	171274	24.9849 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.92%		
43) 1,2-Dichloroethane-d4	10.52	65	156950	26.4837 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.92%		
58) Toluene-d8	12.90	98	647757	27.0200 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.08%		
80) p-Bromofluorobenzene	16.29	95	249974	26.5783 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.32%		
Target Compounds					Qvalue
13) Acetone	6.47	43	7177	7.8079 ug/L	90
14) 1,1-Dichloroethene	6.70	61	122401	12.9316 ug/L	93
15) Tert-Butyl Alcohol	6.80	59	390	1.3089 ug/L #	59
27) 1,1-Dichloroethane	8.56	63	9003	0.7596 ug/L	92
32) cis-1,2-Dichloroethene	9.39	96	2439	0.3204 ug/L	100
33) Chloroform	9.59	83	3313	0.2523 ug/L	99
38) 1,1,1-Trichloroethane	10.13	97	1633	0.1541 ug/L #	65
39) Cyclohexane	10.15	56	5051	0.5119 ug/L	81
45) 1,2-Dichloroethane	10.64	62	1107	0.1491 ug/L #	42
47) Trichloroethene	11.43	130	249329	32.8727 ug/L	99
48) Methylcyclohexane	11.42	83	3099	0.3065 ug/L #	1
66) Tetrachloroethene	13.82	164	197720	32.2302 ug/L	97

(#) = qualifier out of range (m) = manual integration

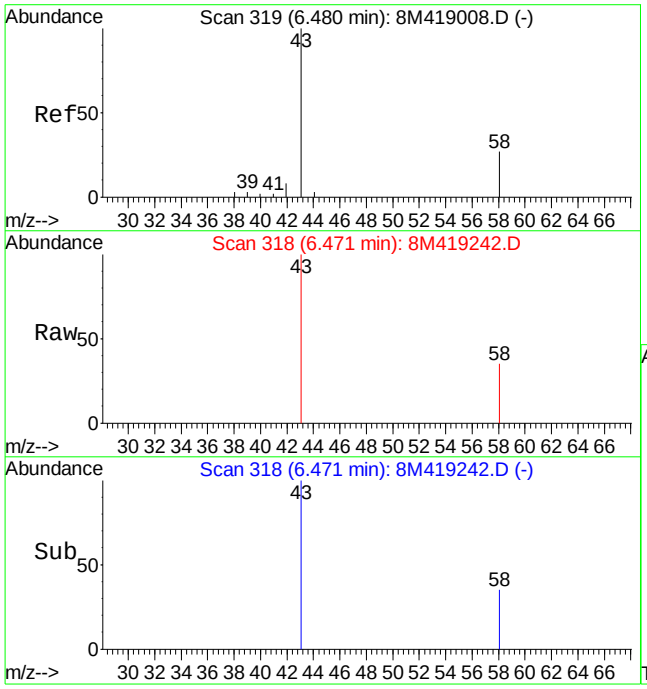
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419242.D Vial: 20
Acq On : 28 Apr 2017 17:02 Operator: TMB
Sample : L17041200-28 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 17:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



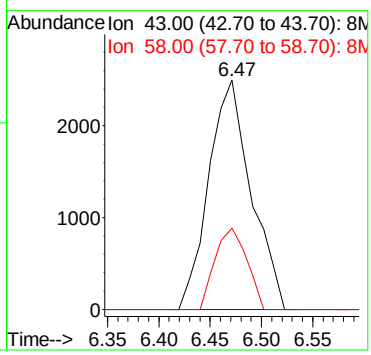
8M419242.D 8260WT.M Mon May 01 08:30:59 2017 Page 2

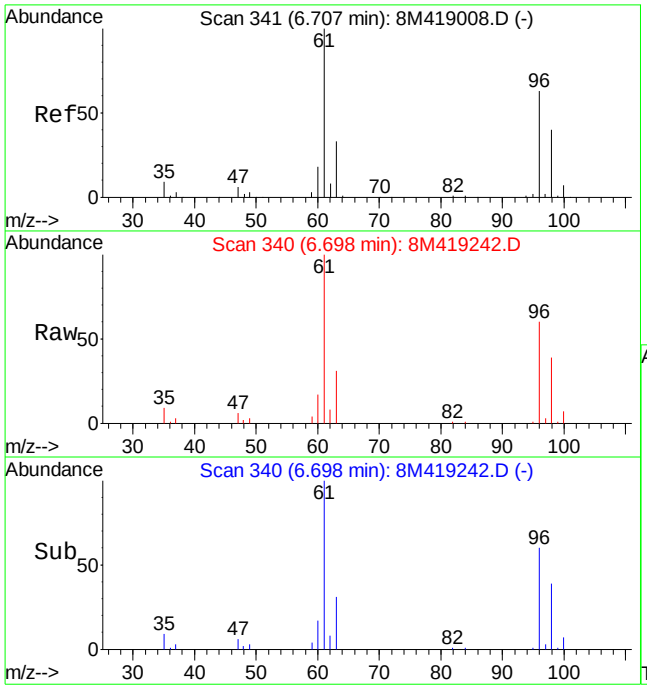


#13
Acetone
Concen: 7.81 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 43 Resp: 7177

Ion	Ratio	Lower	Upper
43	100		
58	26.6	19.4	45.4

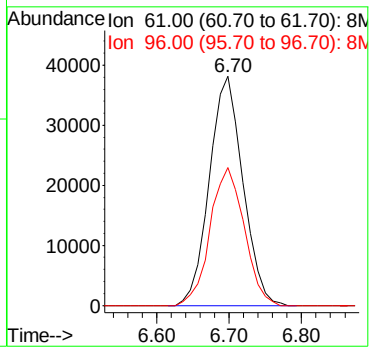


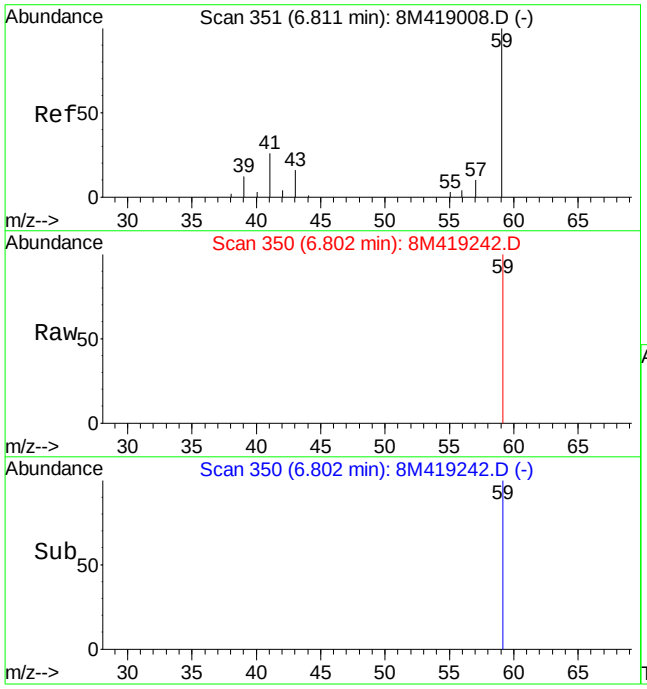


#14
1,1-Dichloroethene
Concen: 12.93 ug/L
RT: 6.70 min Scan# 340
Delta R.T. -0.00 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 61 Resp: 122401

Ion	Ratio	Lower	Upper
61	100		
96	61.1	40.0	93.4

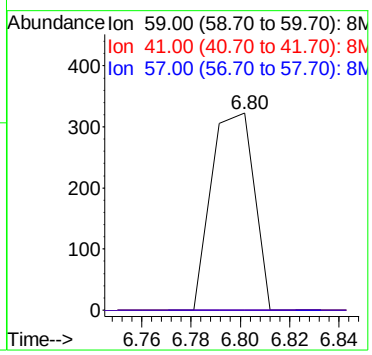


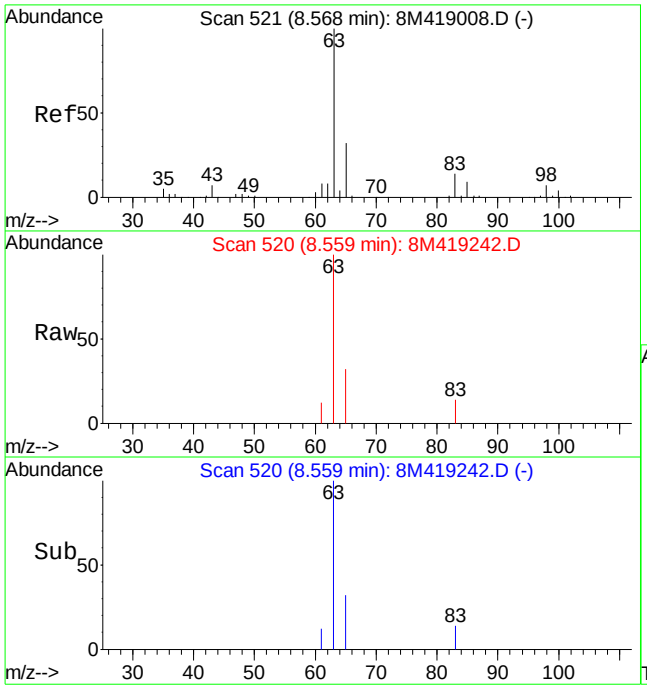


#15
Tert-Butyl Alcohol
Concen: 1.31 ug/L
RT: 6.80 min Scan# 350
Delta R.T. -0.03 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 59 Resp: 390

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.0	32.6#
57	0.0	5.8	13.4#

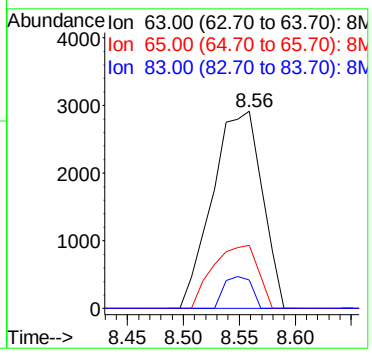


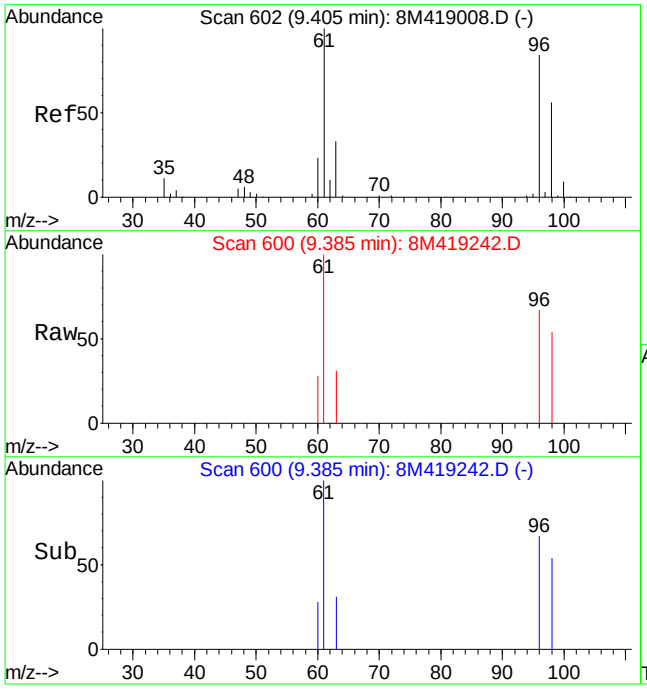


#27
1,1-Dichloroethane
Concen: 0.76 ug/L
RT: 8.56 min Scan# 520
Delta R.T. -0.00 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 63 Resp: 9003

Ion	Ratio	Lower	Upper
63	100		
65	29.0	19.1	44.7
83	9.0	9.0	21.0

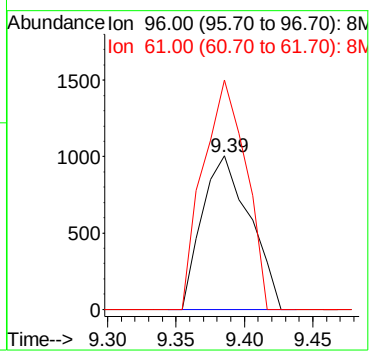


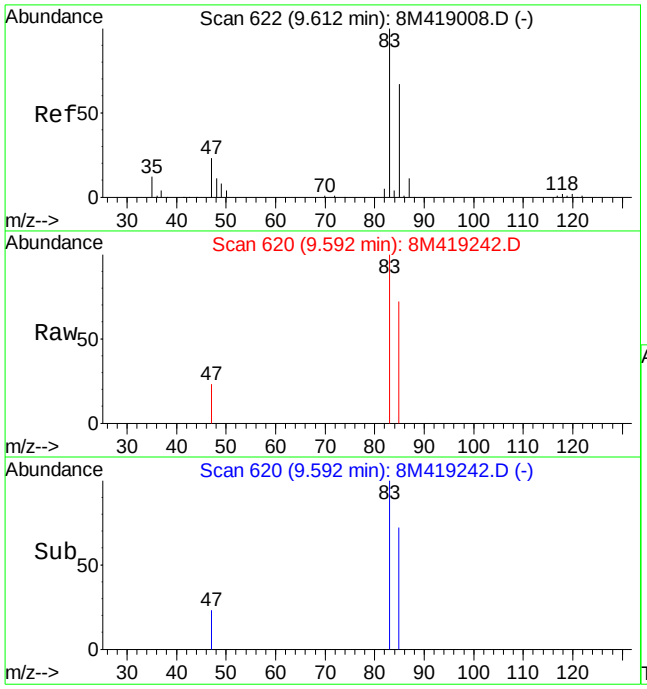


#32
cis-1,2-Dichloroethene
Concen: 0.32 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 96 Resp: 2439

Ion	Ratio	Lower	Upper
96	100		
61	134.4	80.3	187.3

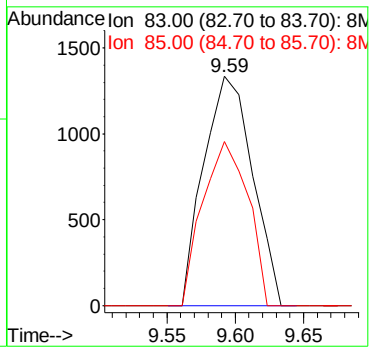


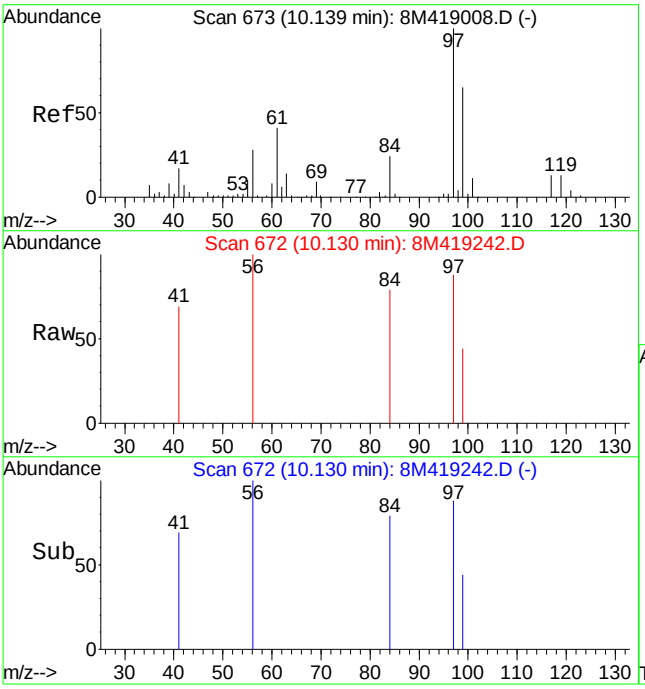


#33
Chloroform
Concen: 0.25 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 83 Resp: 3313

Ion	Ratio	Lower	Upper
83	100		
85	66.3	39.1	91.3

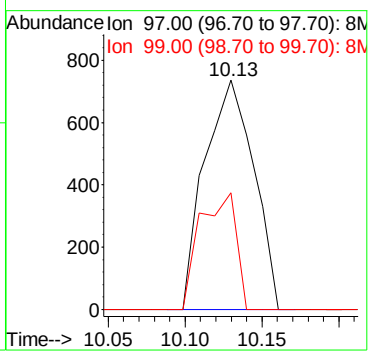


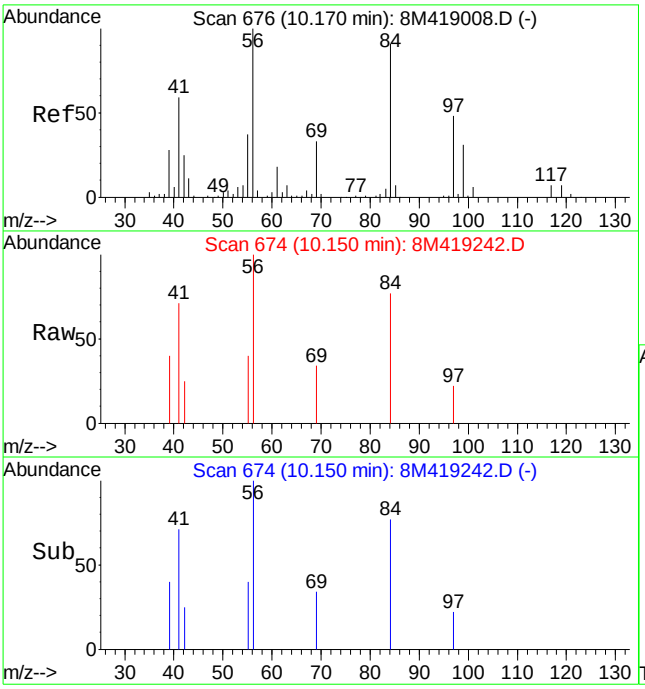


#38
1,1,1-Trichloroethane
Concen: 0.15 ug/L
RT: 10.13 min Scan# 672
Delta R.T. -0.01 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 97 Resp: 1633

Ion	Ratio	Lower	Upper
97	100		
99	37.4	39.0	91.0#

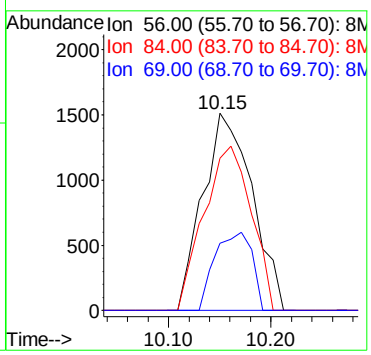


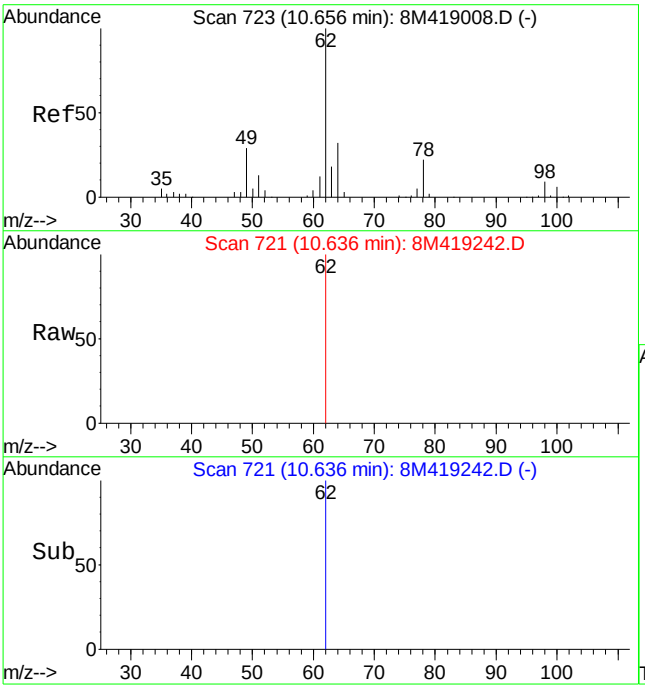


#39
Cyclohexane
Concen: 0.51 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 56 Resp: 5051

Ion	Ratio	Lower	Upper
56	100		
84	80.0	61.6	143.8
69	30.0	21.4	50.0

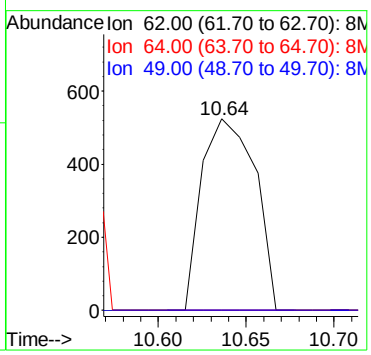


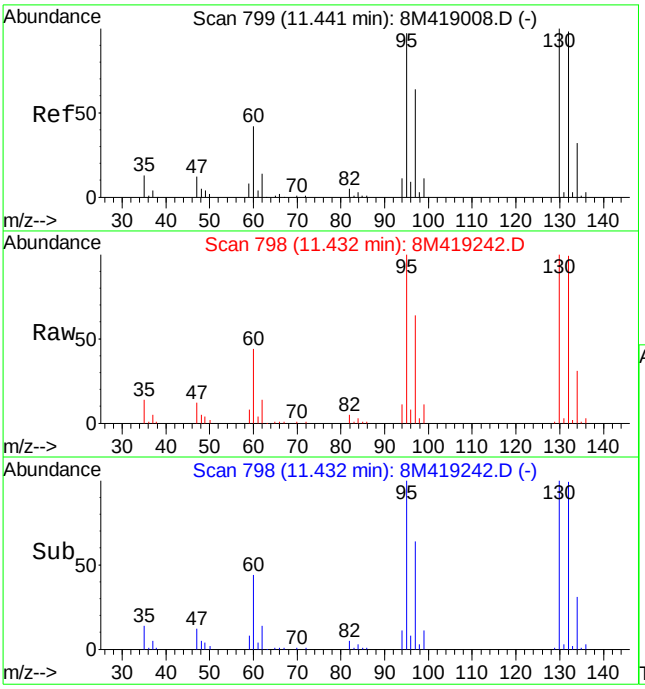


#45
1,2-Dichloroethane
Concen: 0.15 ug/L
RT: 10.64 min Scan# 721
Delta R.T. -0.02 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 62 Resp: 1107

Ion	Ratio	Lower	Upper
62	100		
64	0.0	19.6	45.8#
49	0.0	19.4	45.4#

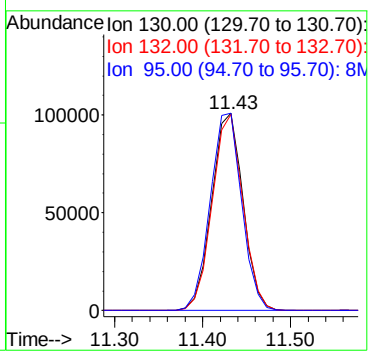


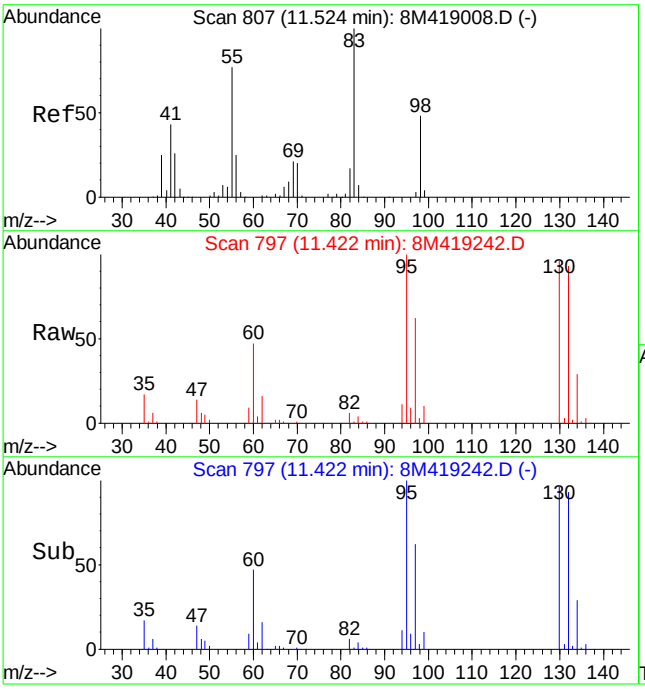


#47
Trichloroethene
Concen: 32.87 ug/L
RT: 11.43 min Scan# 798
Delta R.T. -0.01 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion:130 Resp: 249329

Ion	Ratio	Lower	Upper
130	100		
132	97.1	59.4	138.6
95	100.5	60.1	140.3

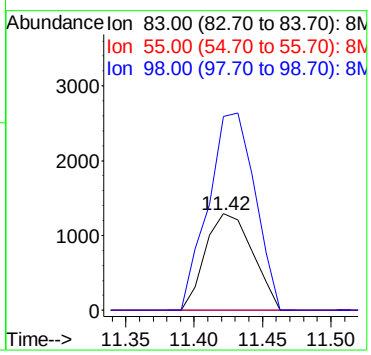


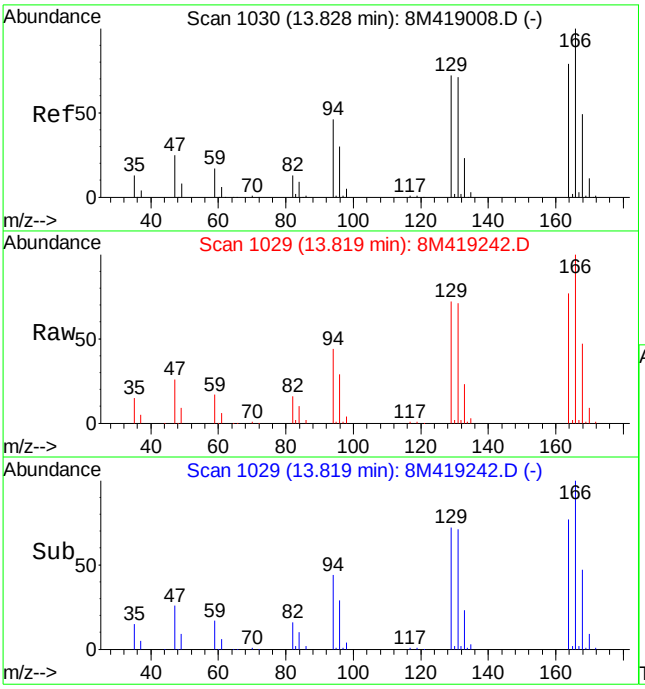


#48
Methylcyclohexane
Concen: 0.31 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.10 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion: 83 Resp: 3099

Ion	Ratio	Lower	Upper
83	100		
55	0.0	40.6	94.6#
98	201.3	28.4	66.2#

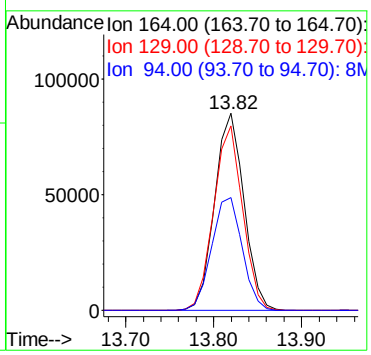




#66
Tetrachloroethene
Concen: 32.23 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419242.D
Acq: 28 Apr 2017 17:02

Tgt Ion:164 Resp: 197720

Ion	Ratio	Lower	Upper
164	100		
129	92.3	53.4	124.6
94	59.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419243.D Vial: 21
Acq On : 28 Apr 2017 17:31 Operator: TMB
Sample : L17041200-29 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 17:53:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

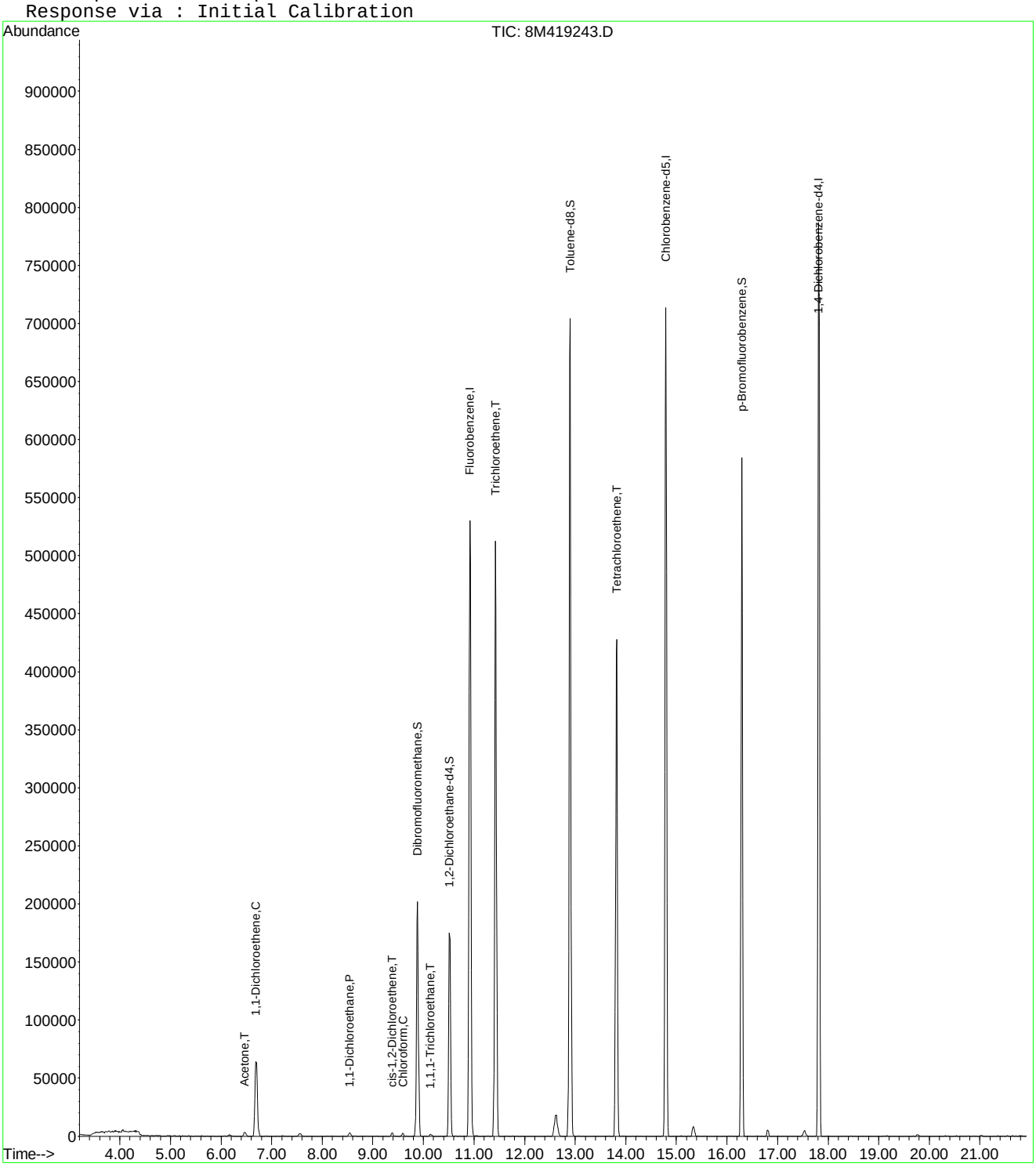
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	647174	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	520456	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	258567	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	174824	25.7545	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.00%			
43) 1,2-Dichloroethane-d4	10.51	65	150648	25.6713	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.68%			
58) Toluene-d8	12.90	98	638335	26.8427	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.36%			
80) p-Bromofluorobenzene	16.29	95	244011	26.7391	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.96%			
Target Compounds						Qvalue
13) Acetone	6.46	43	7226	7.9388	ug/L	87
14) 1,1-Dichloroethene	6.69	61	72171	7.7001	ug/L	95
27) 1,1-Dichloroethane	8.54	63	6194	0.5278	ug/L #	84
32) cis-1,2-Dichloroethene	9.38	96	2153	0.2857	ug/L	80
33) Chloroform	9.59	83	3437	0.2643	ug/L	100
38) 1,1,1-Trichloroethane	10.13	97	1366	0.1302	ug/L #	41
47) Trichloroethene	11.42	130	212031	28.2312	ug/L	99
66) Tetrachloroethene	13.82	164	133676	21.9669	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419243.D 8260WT.M Mon May 01 08:31:04 2017 Page 1

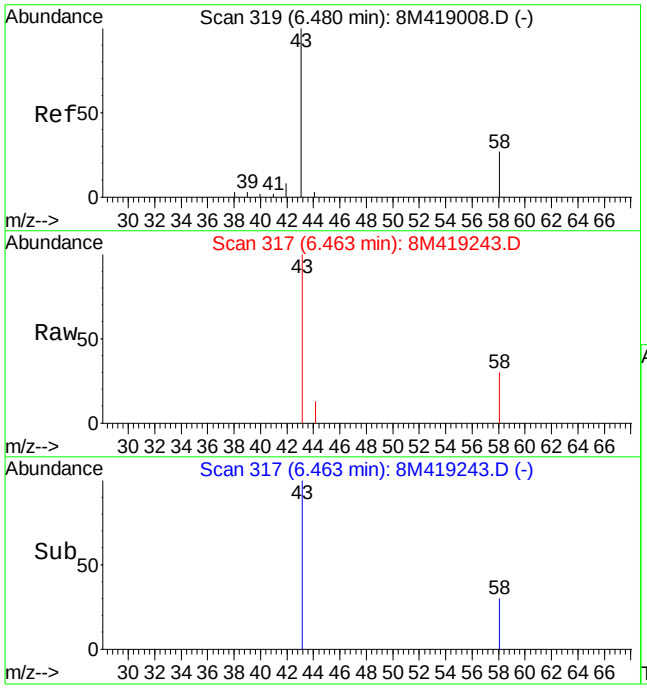
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419243.D Vial: 21
Acq On : 28 Apr 2017 17:31 Operator: TMB
Sample : L17041200-29 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 17:53 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



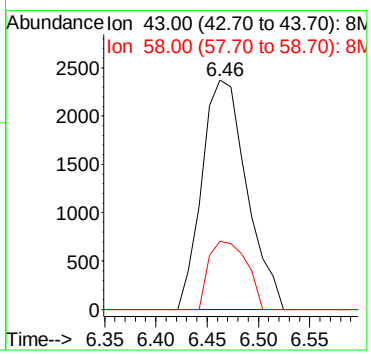
8M419243.D 8260WT.M Mon May 01 08:31:04 2017 Page 2

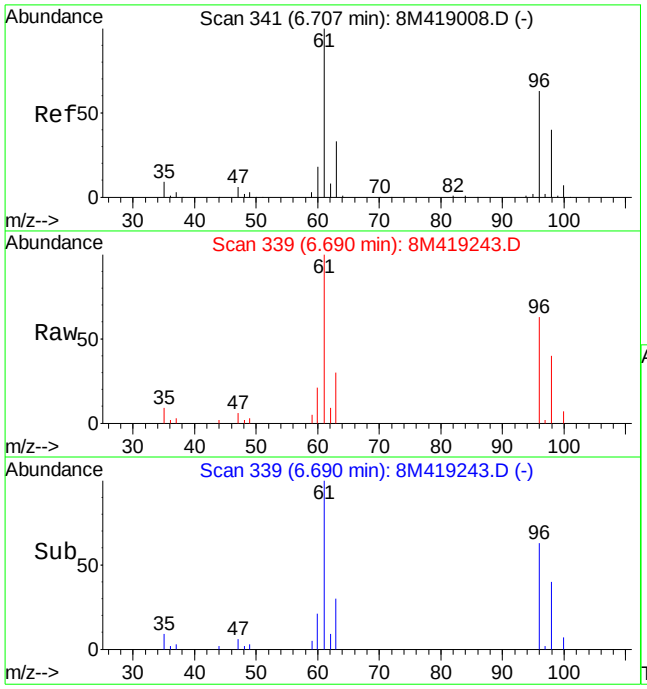


#13
Acetone
Concen: 7.94 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 43 Resp: 7226

Ion	Ratio	Lower	Upper
43	100		
58	25.1	19.4	45.4

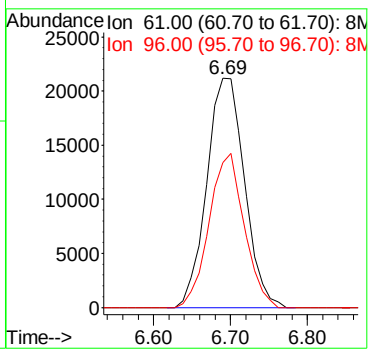


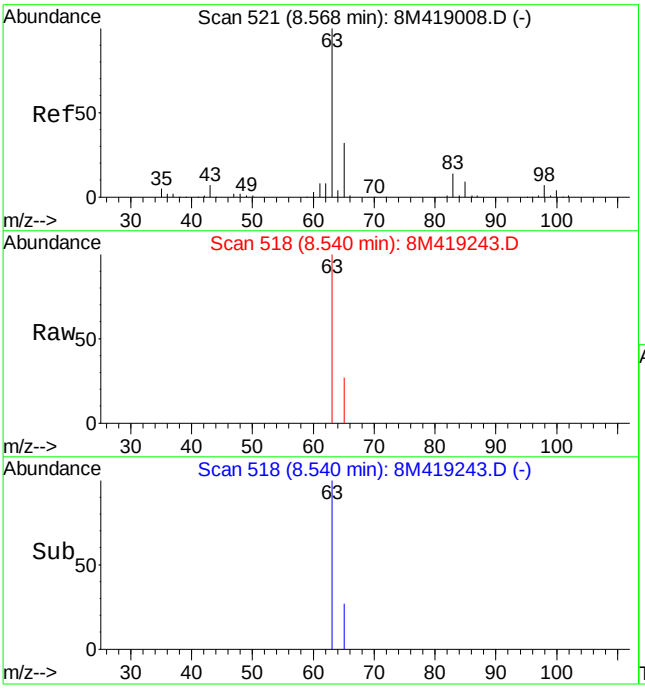


#14
1,1-Dichloroethene
Concen: 7.70 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 61 Resp: 72171

Ion	Ratio	Lower	Upper
61	100		
96	62.4	40.0	93.4

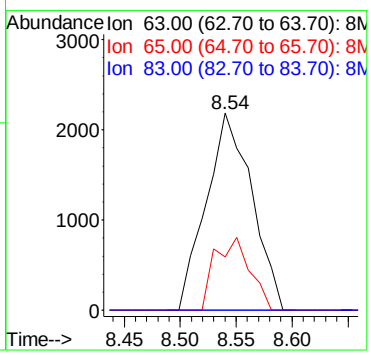


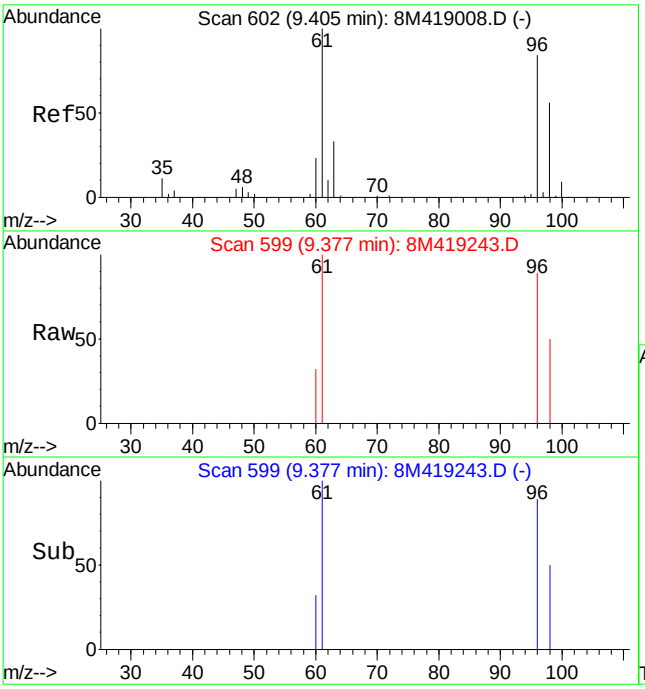


#27
1,1-Dichloroethane
Concen: 0.53 ug/L
RT: 8.54 min Scan# 518
Delta R.T. -0.02 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 63 Resp: 6194

Ion	Ratio	Lower	Upper
63	100		
65	28.3	19.1	44.7
83	0.0	9.0	21.0#

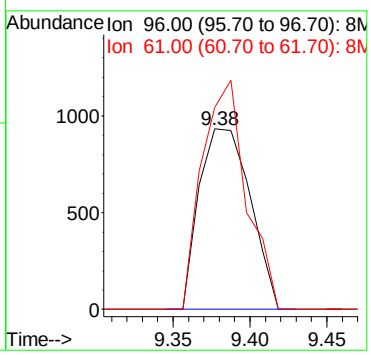


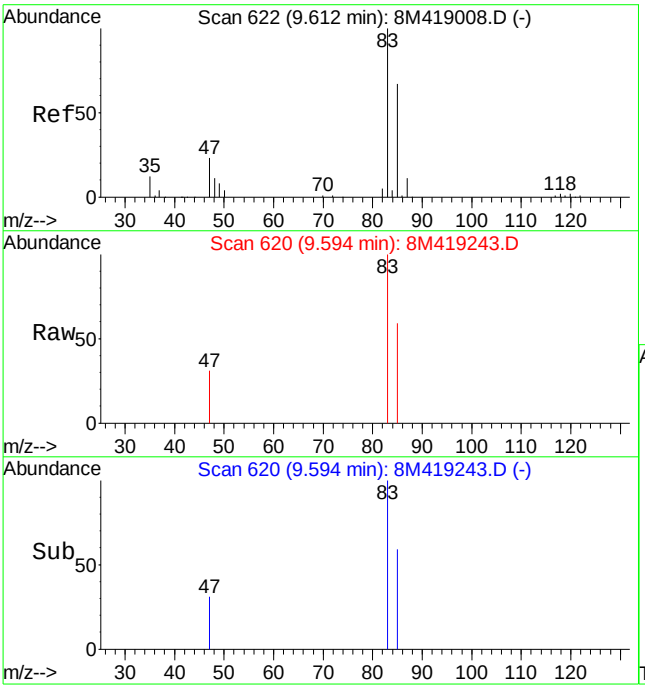


#32
cis-1,2-Dichloroethene
Concen: 0.29 ug/L
RT: 9.38 min Scan# 599
Delta R.T. -0.03 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 96 Resp: 2153

Ion	Ratio	Lower	Upper
96	100		
61	109.8	80.3	187.3

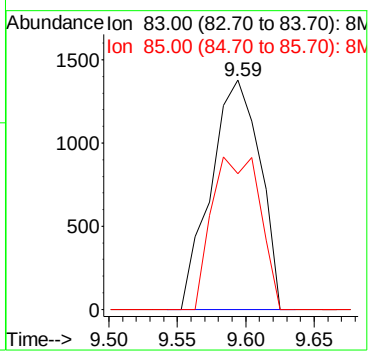


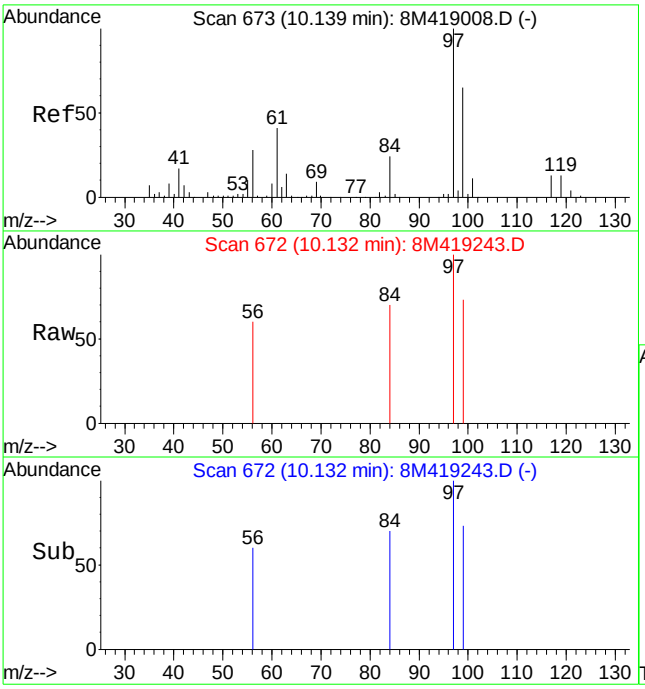


#33
Chloroform
Concen: 0.26 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 83 Resp: 3437

Ion	Ratio	Lower	Upper
83	100		
85	65.4	39.1	91.3

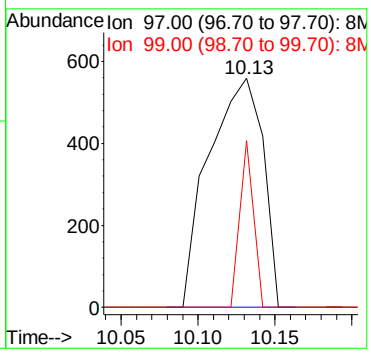


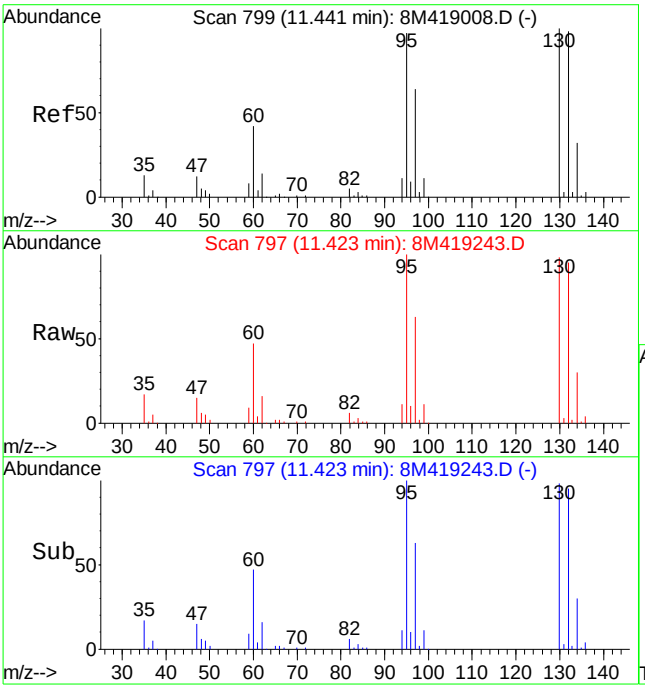


#38
1,1,1-Trichloroethane
Concen: 0.13 ug/L
RT: 10.13 min Scan# 672
Delta R.T. -0.01 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion: 97 Resp: 1366

Ion	Ratio	Lower	Upper
97	100		
99	18.4	39.0	91.0#

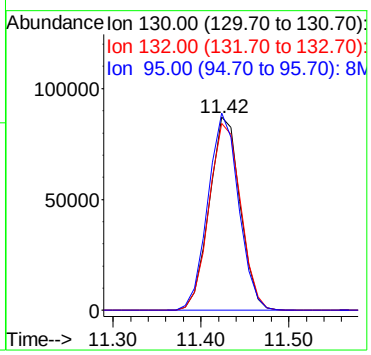


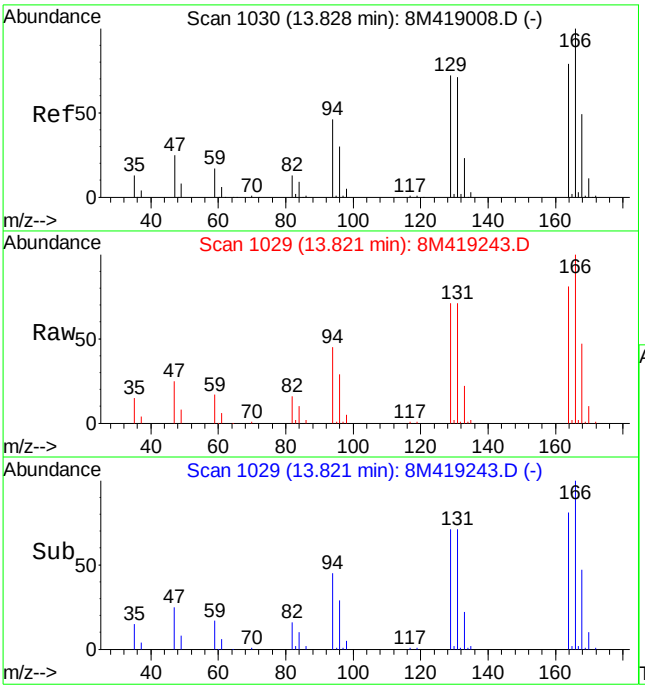


#47
Trichloroethene
Concen: 28.23 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion:130 Resp: 212031

Ion	Ratio	Lower	Upper
130	100		
132	99.3	59.4	138.6
95	101.5	60.1	140.3

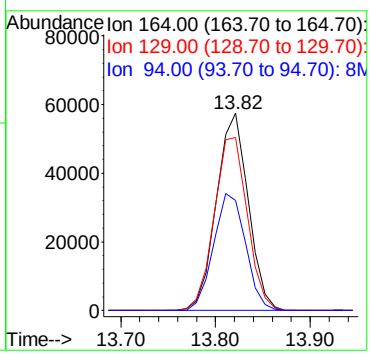




#66
Tetrachloroethene
Concen: 21.97 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419243.D
Acq: 28 Apr 2017 17:31

Tgt Ion:164 Resp: 133676

Ion	Ratio	Lower	Upper
164	100		
129	91.2	53.4	124.6
94	59.7	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419244.D Vial: 22
Acq On : 28 Apr 2017 18:01 Operator: TMB
Sample : L17041200-30 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:23:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

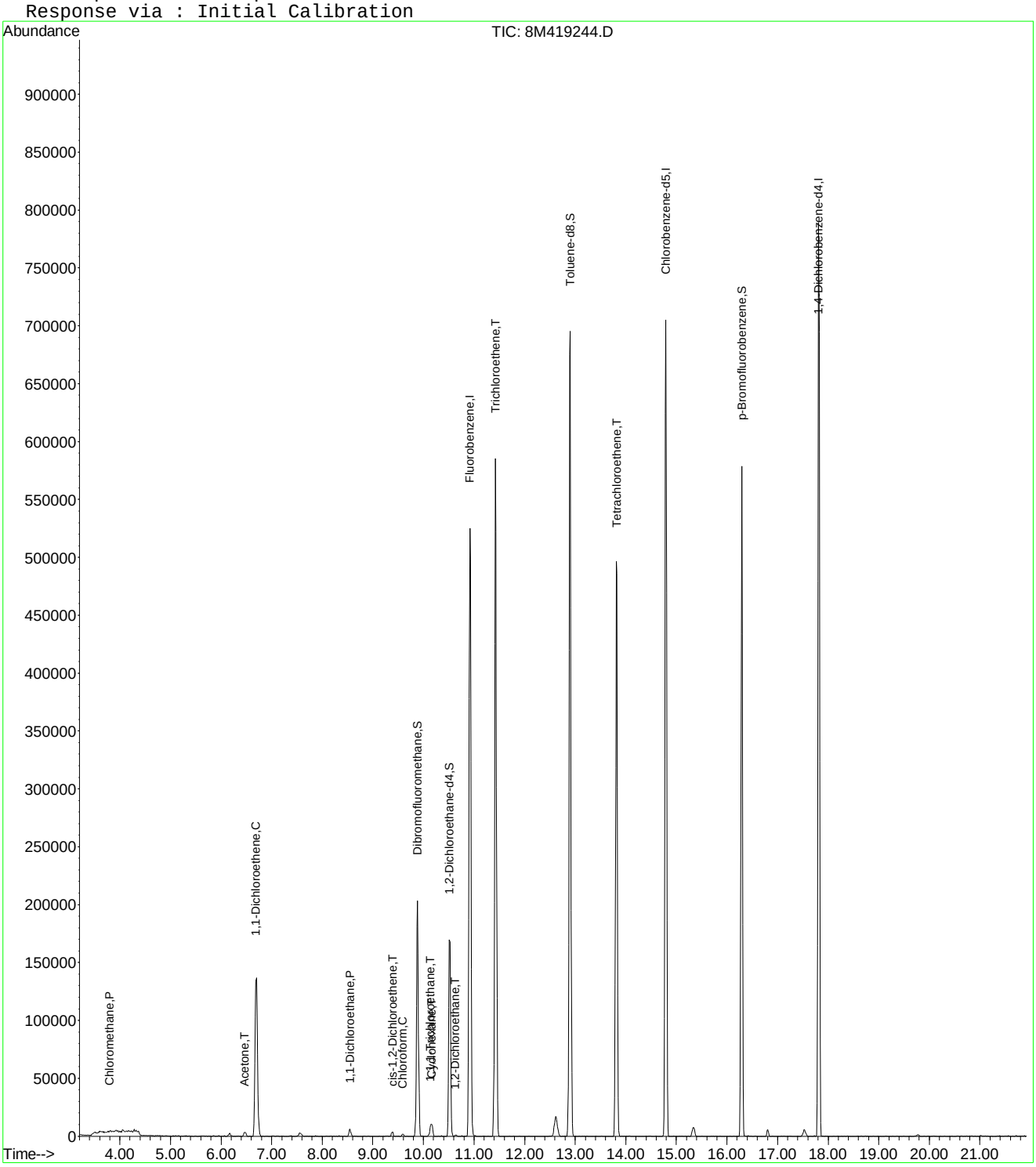
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	645156	25.00 ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	515775	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	257165	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	170663	25.2202 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.88%		
43) 1,2-Dichloroethane-d4	10.51	65	149313	25.5234 ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.08%		
58) Toluene-d8	12.90	98	639229	27.1243 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.48%		
80) p-Bromofluorobenzene	16.29	95	243883	26.8708 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.48%		
Target Compounds					Qvalue
3) Chloromethane	3.80	50	1344	0.1231 ug/L #	41
13) Acetone	6.46	43	7272	8.0144 ug/L	90
14) 1,1-Dichloroethene	6.69	61	151331	16.1964 ug/L	93
27) 1,1-Dichloroethane	8.55	63	10394	0.8884 ug/L	89
32) cis-1,2-Dichloroethene	9.39	96	2633	0.3504 ug/L	92
33) Chloroform	9.58	83	2627	0.2027 ug/L	95
38) 1,1,1-Trichloroethane	10.13	97	1957	0.1871 ug/L	100
39) Cyclohexane	10.16	56	8857	0.9093 ug/L	87
45) 1,2-Dichloroethane	10.63	62	1791	0.2443 ug/L #	42
47) Trichloroethene	11.42	130	242922	32.4454 ug/L	100
66) Tetrachloroethene	13.82	164	151269	25.0836 ug/L	95

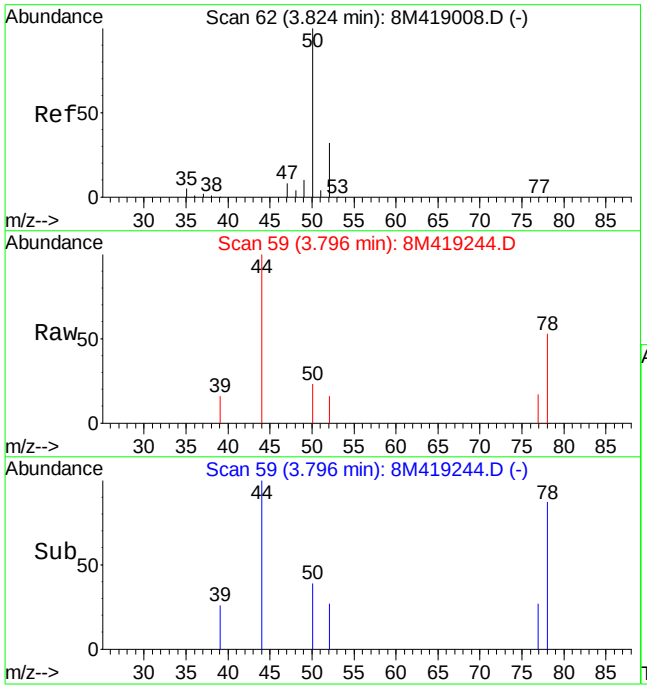
(#) = qualifier out of range (m) = manual integration
8M419244.D 8260WT.M Mon May 01 08:31:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419244.D Vial: 22
Acq On : 28 Apr 2017 18:01 Operator: TMB
Sample : L17041200-30 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:23 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

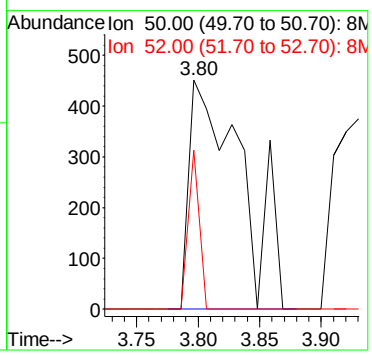


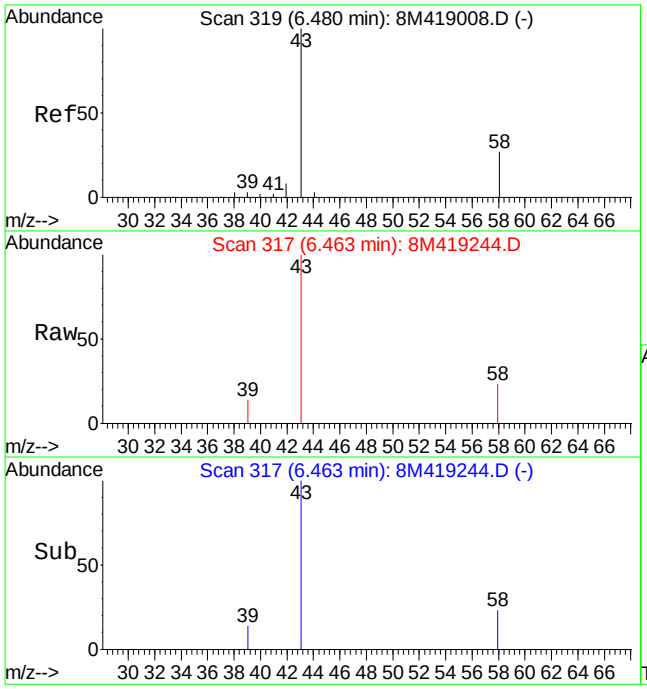


#3
Chloromethane
Concen: 0.12 ug/L
RT: 3.80 min Scan# 59
Delta R.T. -0.02 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 50 Resp: 1344

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.4	47.6#

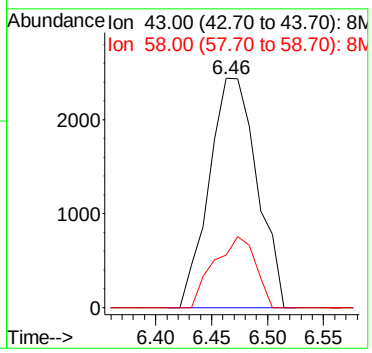


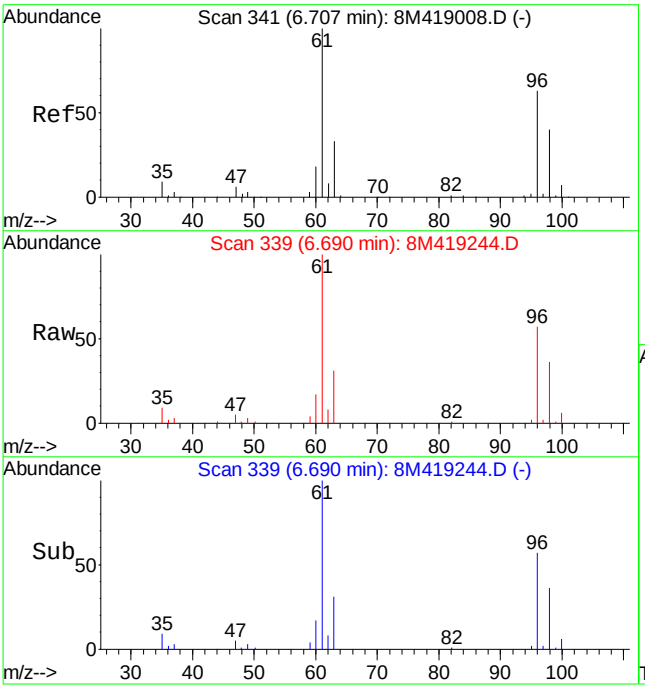


#13
Acetone
Concen: 8.01 ug/L
RT: 6.46 min Scan# 317
Delta R.T. -0.02 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 43 Resp: 7272

Ion	Ratio	Lower	Upper
43	100		
58	26.6	19.4	45.4

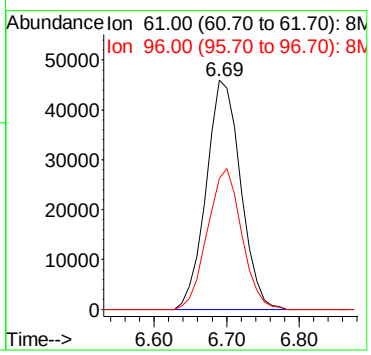


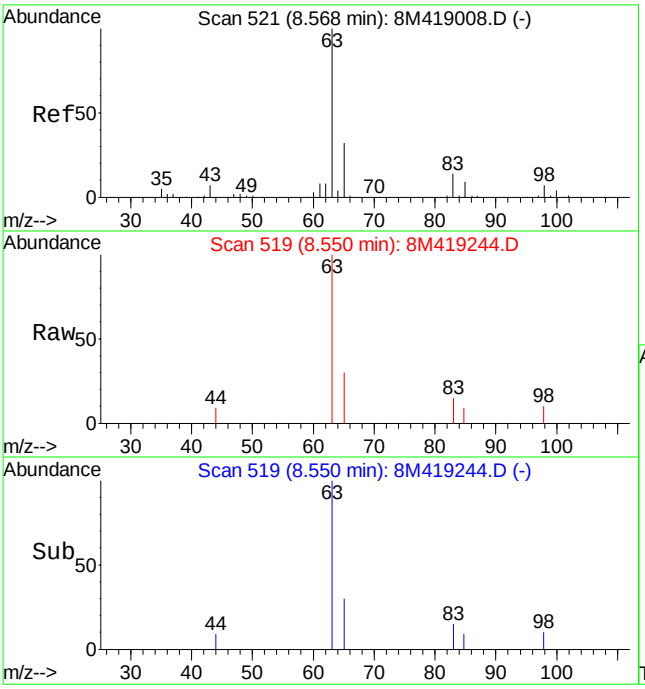


#14
1,1-Dichloroethene
Concen: 16.20 ug/L
RT: 6.69 min Scan# 339
Delta R.T. -0.01 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 61 Resp: 151331

Ion	Ratio	Lower	Upper
61	100		
96	60.9	40.0	93.4

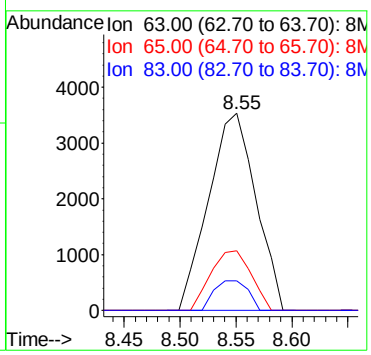


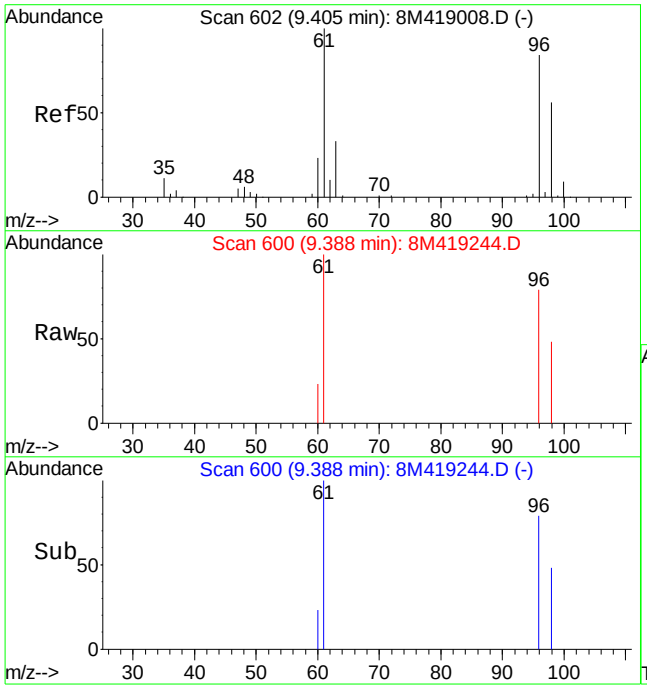


#27
1,1-Dichloroethane
Concen: 0.89 ug/L
RT: 8.55 min Scan# 519
Delta R.T. -0.01 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 63 Resp: 10394

Ion	Ratio	Lower	Upper
63	100		
65	25.9	19.1	44.7
83	10.8	9.0	21.0

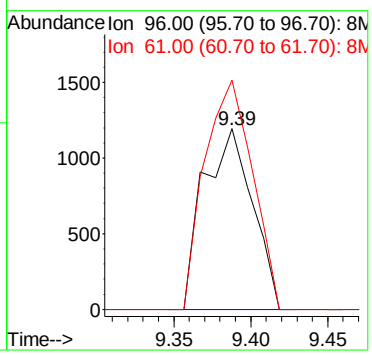


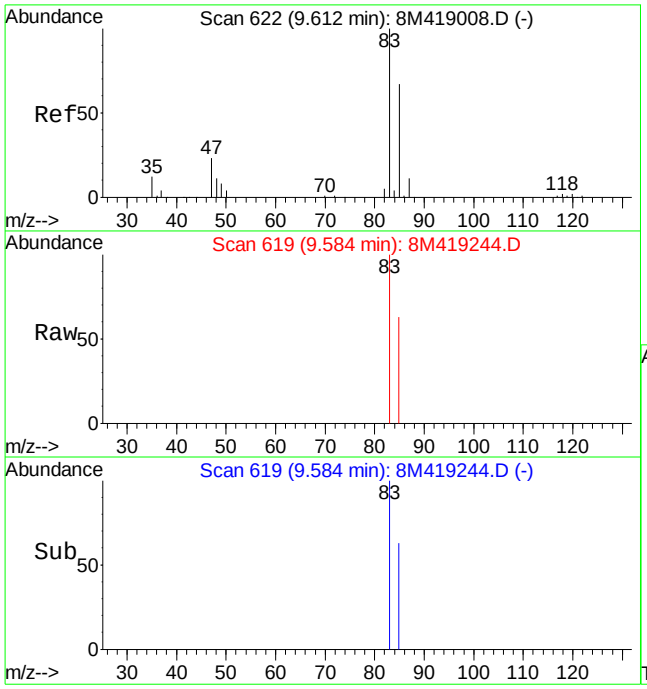


#32
cis-1,2-Dichloroethene
Concen: 0.35 ug/L
RT: 9.39 min Scan# 600
Delta R.T. -0.02 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 96 Resp: 2633

Ion	Ratio	Lower	Upper
96	100		
61	124.4	80.3	187.3

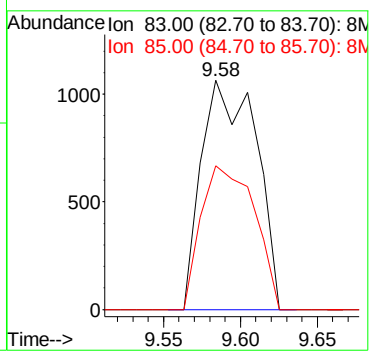


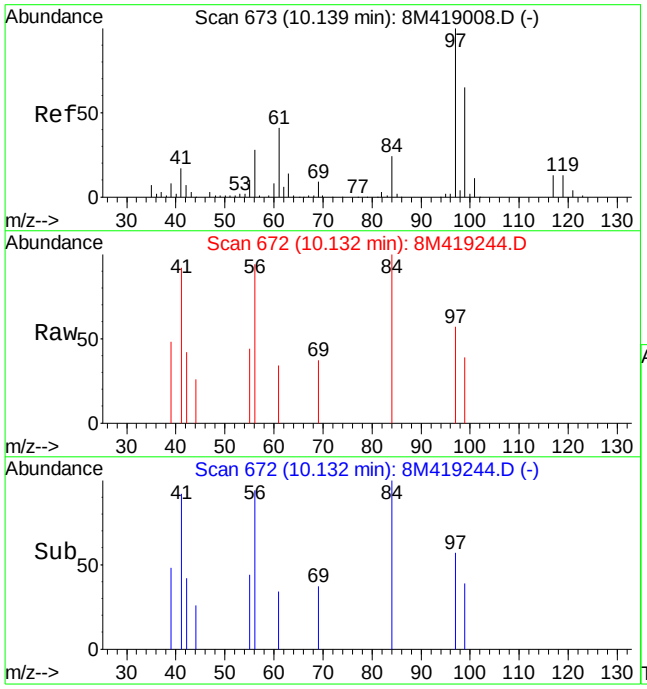


#33
Chloroform
Concen: 0.20 ug/L
RT: 9.58 min Scan# 619
Delta R.T. -0.02 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 83 Resp: 2627

Ion	Ratio	Lower	Upper
83	100		
85	61.3	39.1	91.3

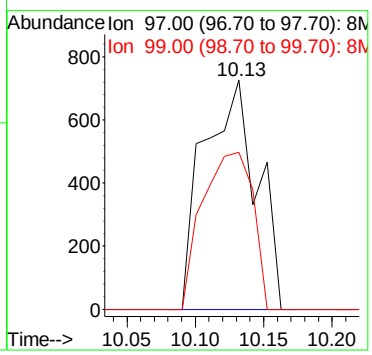


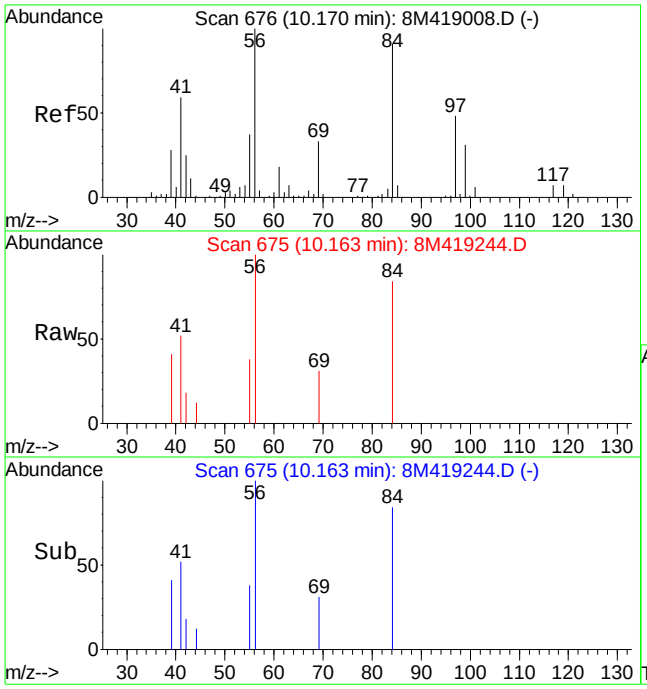


#38
1,1,1-Trichloroethane
Concen: 0.19 ug/L
RT: 10.13 min Scan# 672
Delta R.T. -0.01 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 97 Resp: 1957

Ion	Ratio	Lower	Upper
97	100		
99	65.3	39.0	91.0

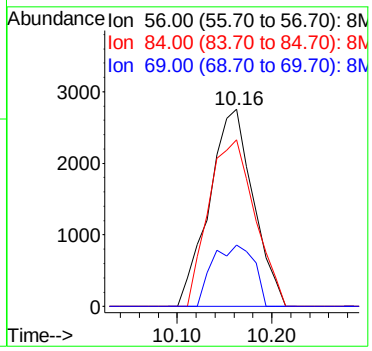


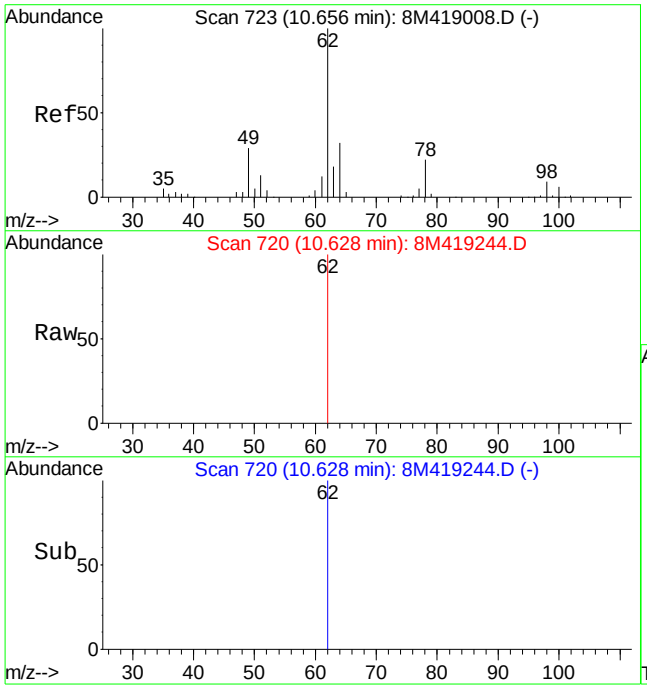


#39
Cyclohexane
Concen: 0.91 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 56 Resp: 8857

Ion	Ratio	Lower	Upper
56	100		
84	88.8	61.6	143.8
69	29.4	21.4	50.0

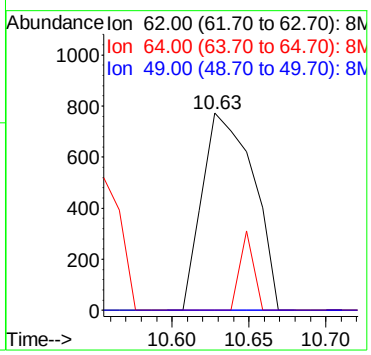


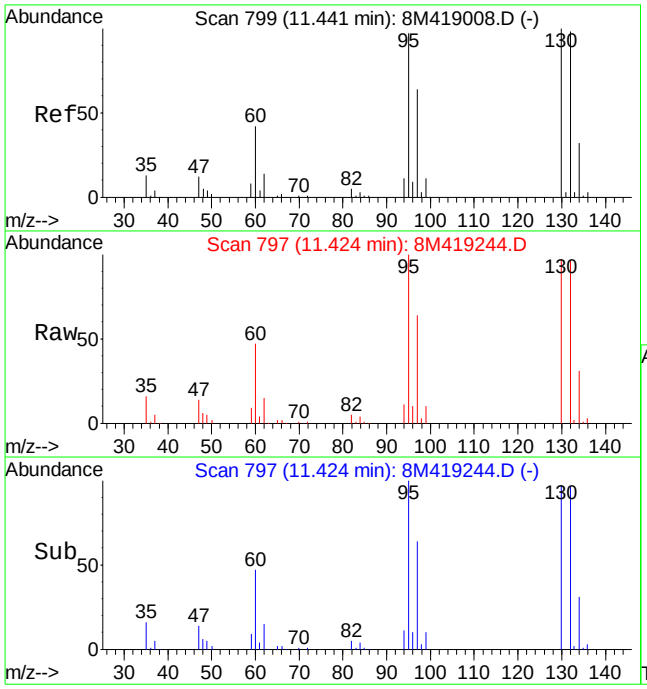


#45
1,2-Dichloroethane
Concen: 0.24 ug/L
RT: 10.63 min Scan# 720
Delta R.T. -0.03 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion: 62 Resp: 1791

Ion	Ratio	Lower	Upper
62	100		
64	0.0	19.6	45.8#
49	0.0	19.4	45.4#

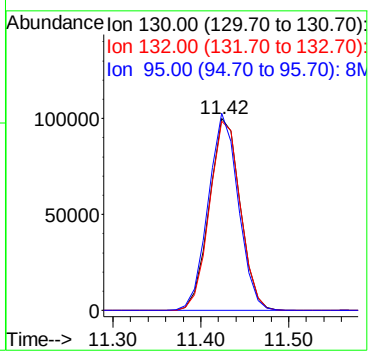


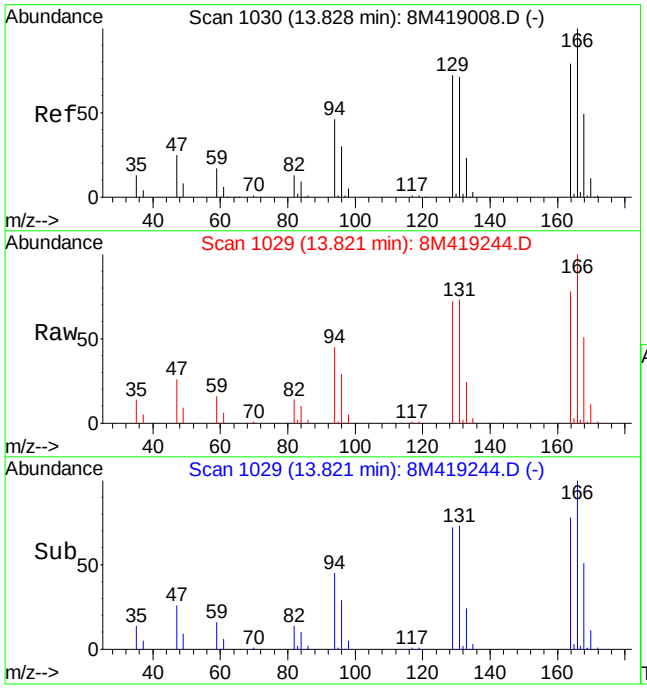


#47
Trichloroethene
Concen: 32.45 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion:130 Resp: 242922

Ion	Ratio	Lower	Upper
130	100		
132	98.7	59.4	138.6
95	100.2	60.1	140.3

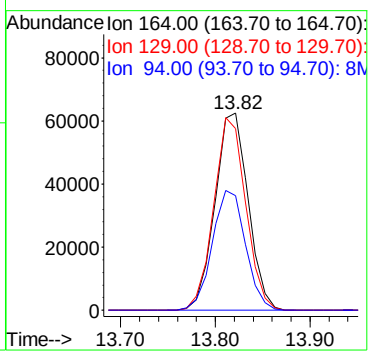




#66
Tetrachloroethene
Concen: 25.08 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419244.D
Acq: 28 Apr 2017 18:01

Tgt Ion:164 Resp: 151269

Ion	Ratio	Lower	Upper
164	100		
129	94.4	53.4	124.6
94	60.9	34.7	81.1



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419245.D Vial: 23
Acq On : 28 Apr 2017 18:31 Operator: TMB
Sample : L17041200-31 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:53:18 2017 Quant Results File: 8260WT.RES

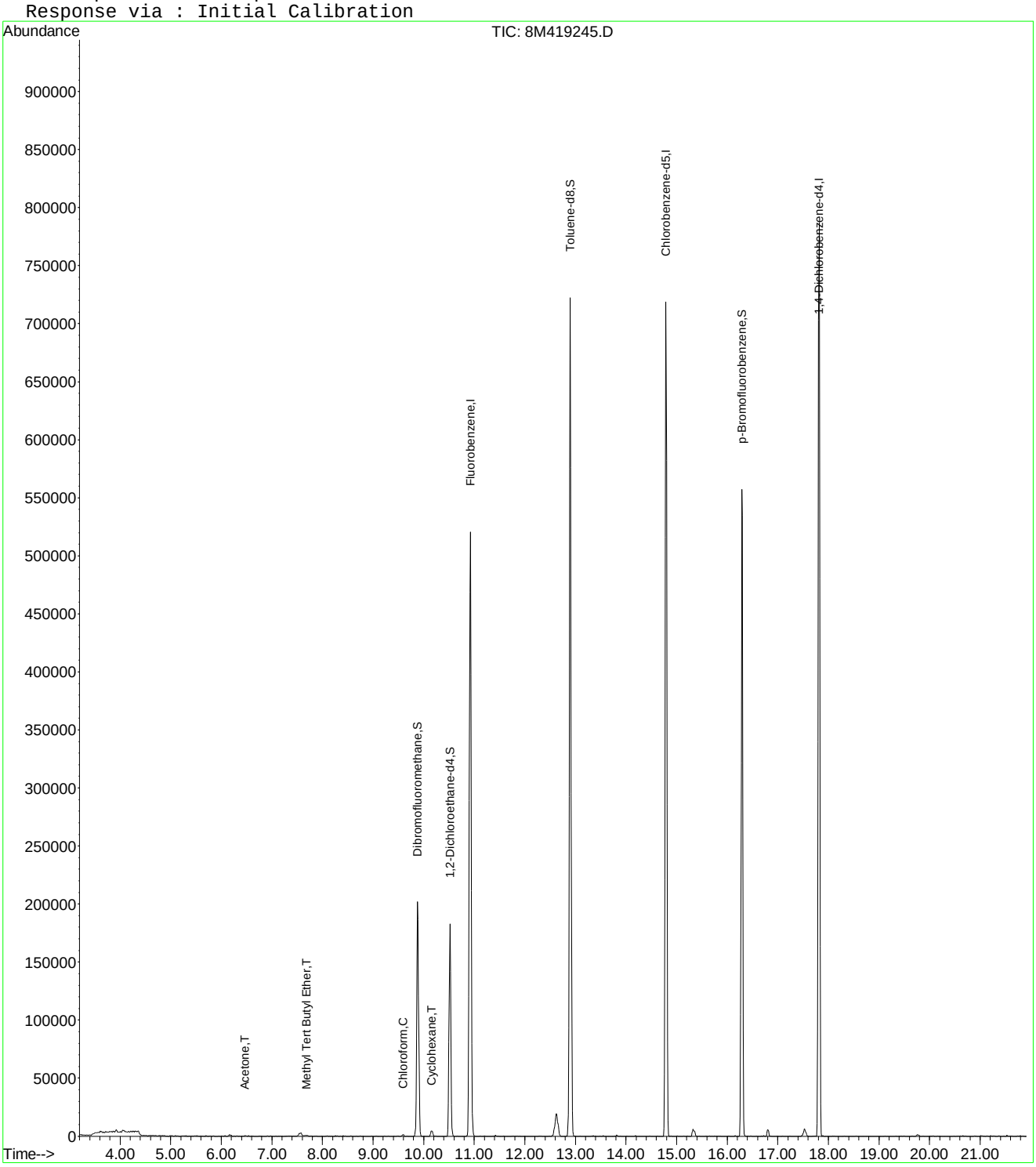
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

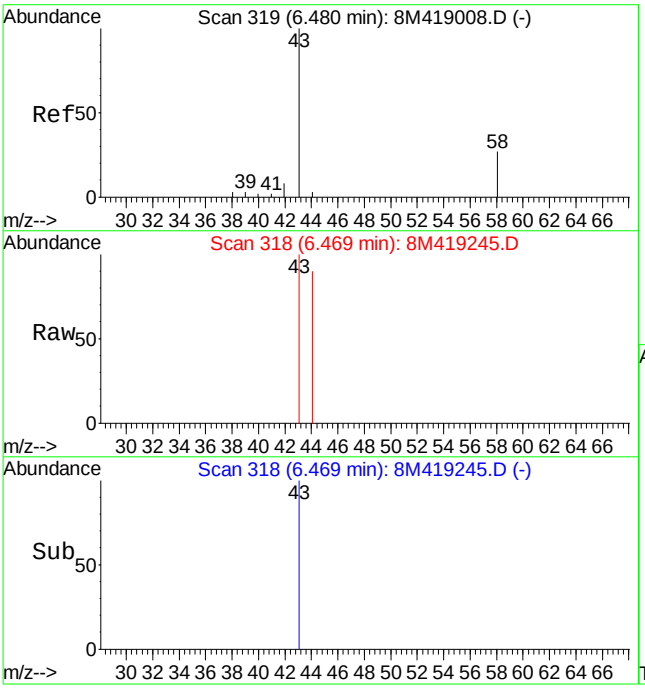
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	634849	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	519404	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	260213	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	169837	25.5056 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.04%		
43) 1,2-Dichloroethane-d4	10.52	65	153219	26.6163 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.48%		
58) Toluene-d8	12.90	98	634056	26.7168 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.88%		
80) p-Bromofluorobenzene	16.29	95	243483	26.5125 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.04%		
Target Compounds					Qvalue
13) Acetone	6.47	43	688	0.7705 ug/L #	42
22) Methyl Tert Butyl Ether	7.69	73	2590	0.1989 ug/L #	58
33) Chloroform	9.59	83	1836	0.1439 ug/L	86
39) Cyclohexane	10.16	56	3457	0.3607 ug/L #	88

(#) = qualifier out of range (m) = manual integration
8M419245.D 8260WT.M Mon May 01 08:31:13 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419245.D Vial: 23
Acq On : 28 Apr 2017 18:31 Operator: TMB
Sample : L17041200-31 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 18:53 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

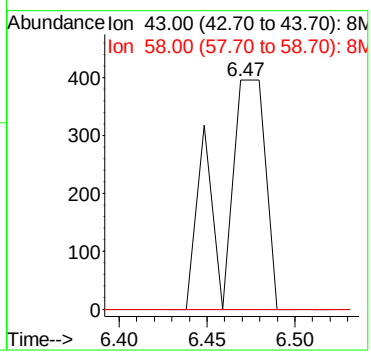


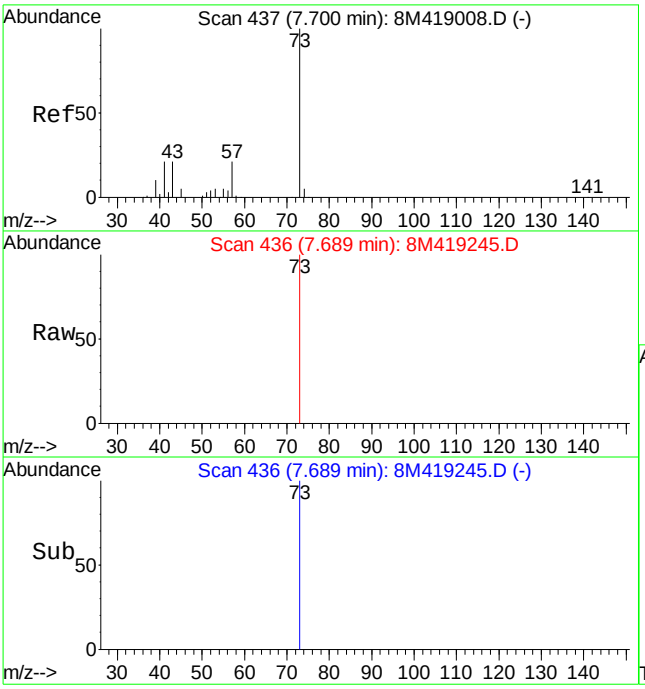


#13
Acetone
Concen: 0.77 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419245.D
Acq: 28 Apr 2017 18:31

Tgt Ion: 43 Resp: 688

Ion	Ratio	Lower	Upper
43	100		
58	0.0	19.4	45.4#

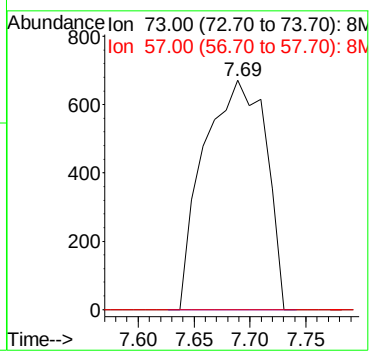


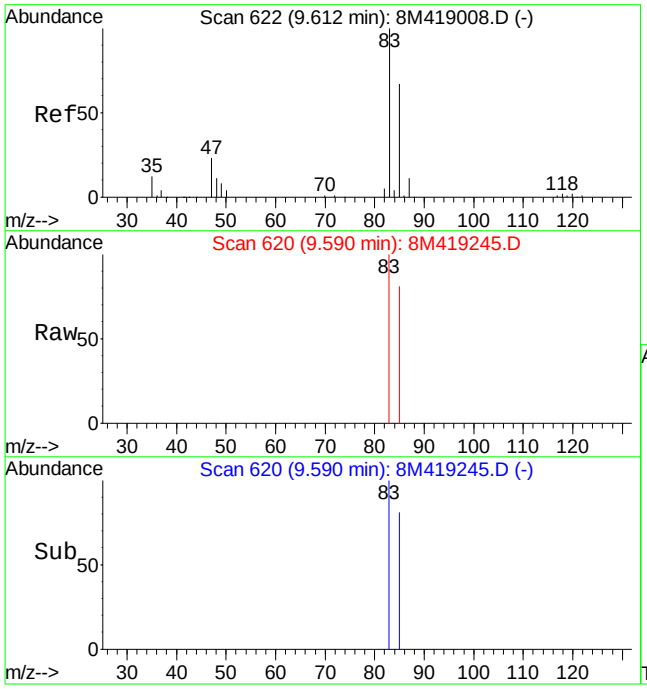


#22
Methyl Tert Butyl Ether
Concen: 0.20 ug/L
RT: 7.69 min Scan# 436
Delta R.T. -0.02 min
Lab File: 8M419245.D
Acq: 28 Apr 2017 18:31

Tgt Ion: 73 Resp: 2590

Ion	Ratio	Lower	Upper
73	100		
57	0.0	11.4	26.6#

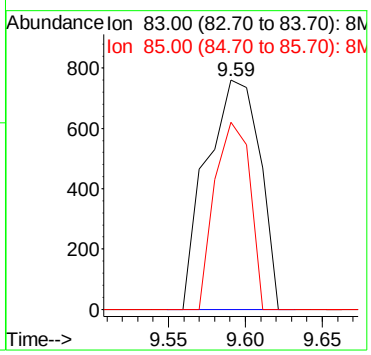


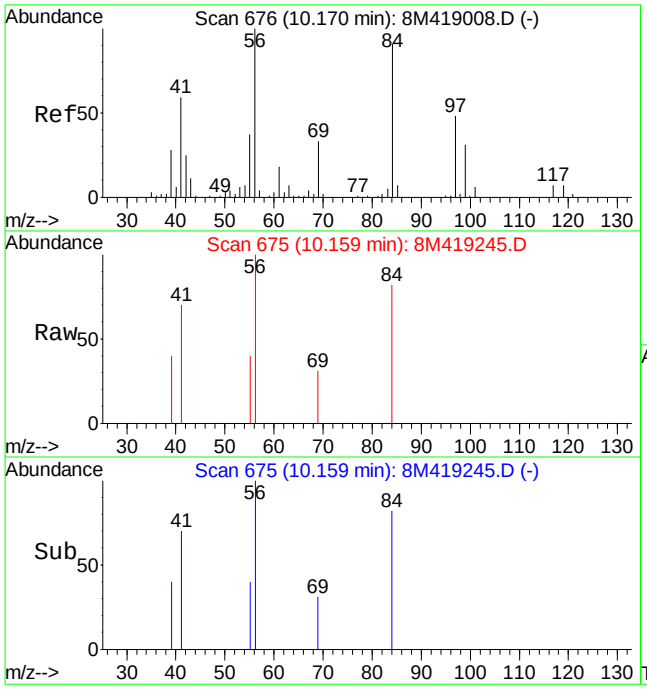


#33
Chloroform
Concen: 0.14 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419245.D
Acq: 28 Apr 2017 18:31

Tgt Ion: 83 Resp: 1836

Ion	Ratio	Lower	Upper
83	100		
85	53.9	39.1	91.3

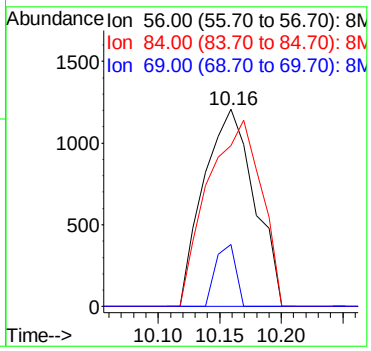




#39
Cyclohexane
Concen: 0.36 ug/L
RT: 10.16 min Scan# 675
Delta R.T. -0.01 min
Lab File: 8M419245.D
Acq: 28 Apr 2017 18:31

Tgt Ion: 56 Resp: 3457

Ion	Ratio	Lower	Upper
56	100		
84	99.7	61.6	143.8
69	12.5	21.4	50.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419246.D Vial: 24
Acq On : 28 Apr 2017 19:01 Operator: TMB
Sample : L17041200-32 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 19:23:07 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

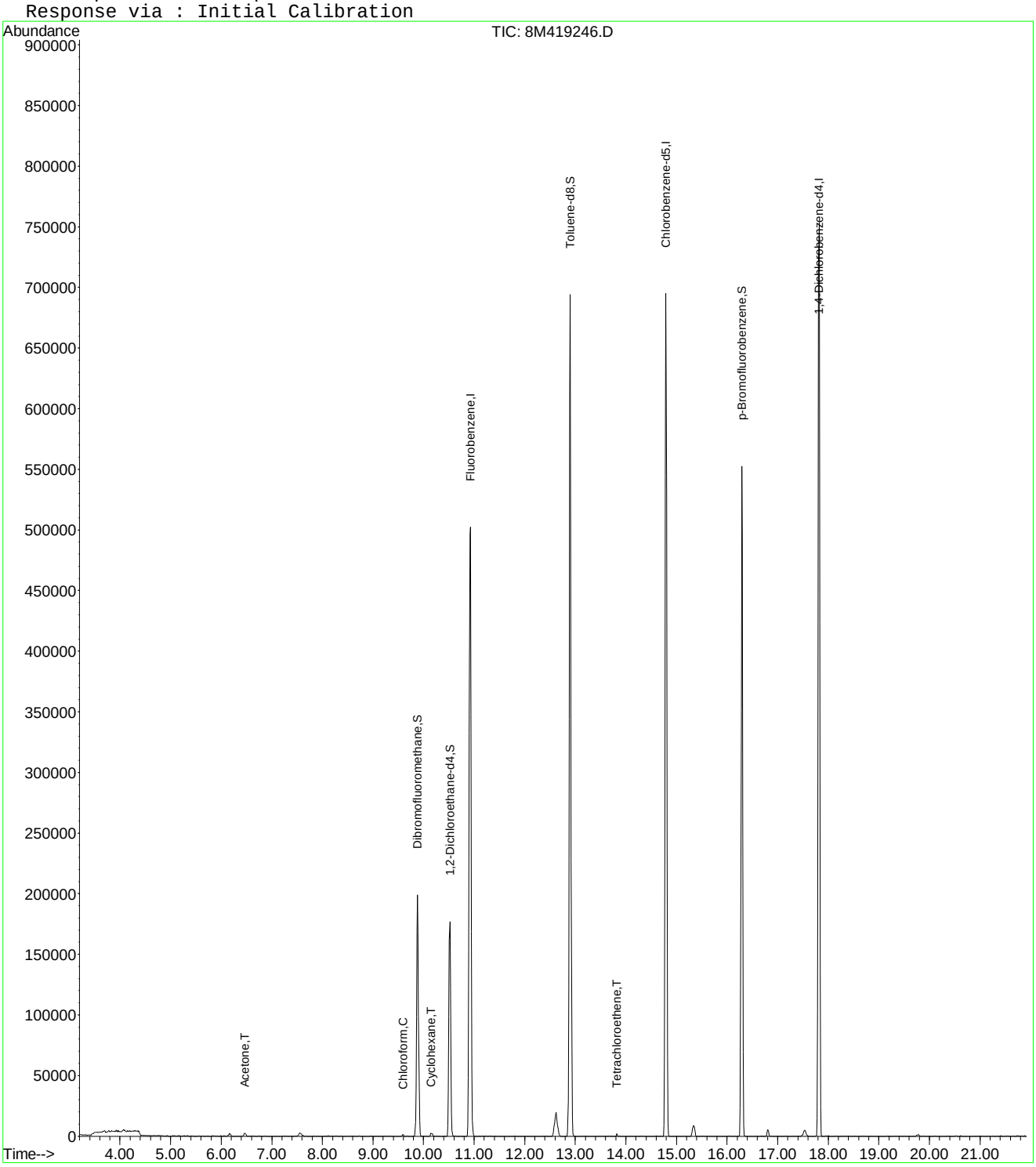
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	629231	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	504199	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	254141	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	165496	25.0756	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.32%			
43) 1,2-Dichloroethane-d4	10.52	65	150576	26.3907	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.56%			
58) Toluene-d8	12.90	98	616540	26.7622	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.04%			
80) p-Bromofluorobenzene	16.29	95	235227	26.2255	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.92%			
Target Compounds						Qvalue
13) Acetone	6.47	43	4653	5.2578	ug/L	92
33) Chloroform	9.59	83	1717	0.1358	ug/L	80
39) Cyclohexane	10.15	56	2252	0.2371	ug/L #	62
66) Tetrachloroethene	13.82	164	770	0.1306	ug/L #	48

(#) = qualifier out of range (m) = manual integration
8M419246.D 8260WT.M Mon May 01 08:31:16 2017 Page 1

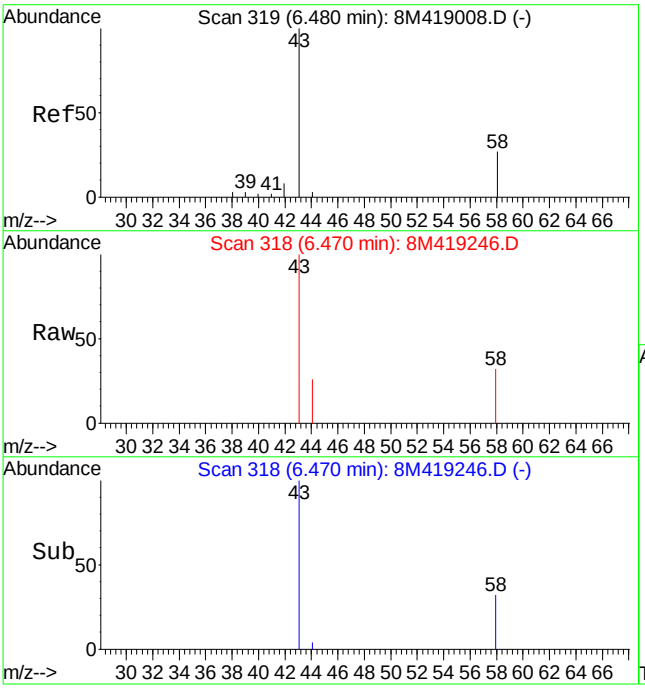
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419246.D Vial: 24
Acq On : 28 Apr 2017 19:01 Operator: TMB
Sample : L17041200-32 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 19:23 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



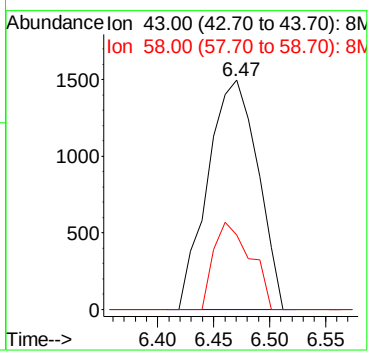
8M419246.D 8260WT.M Mon May 01 08:31:17 2017 Page 2

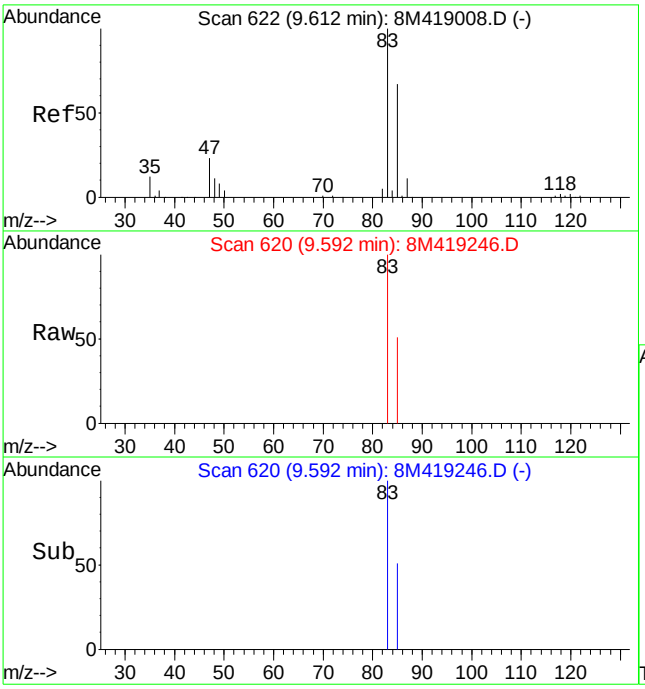


#13
Acetone
Concen: 5.26 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419246.D
Acq: 28 Apr 2017 19:01

Tgt Ion: 43 Resp: 4653

Ion	Ratio	Lower	Upper
43	100		
58	28.0	19.4	45.4

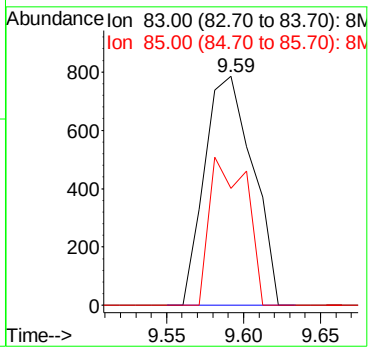


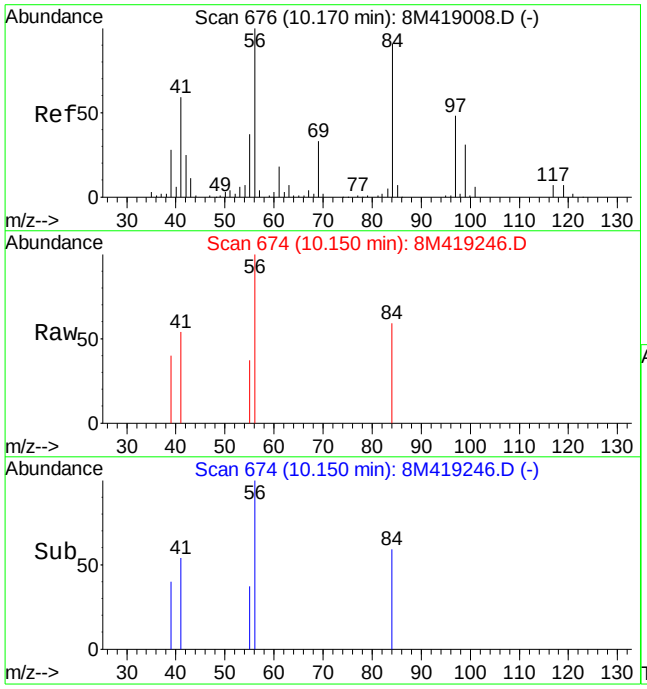


#33
Chloroform
Concen: 0.14 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419246.D
Acq: 28 Apr 2017 19:01

Tgt Ion: 83 Resp: 1717

Ion	Ratio	Lower	Upper
83	100		
85	49.4	39.1	91.3

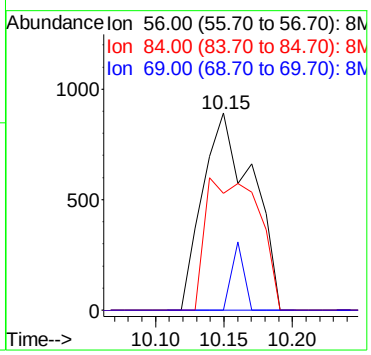


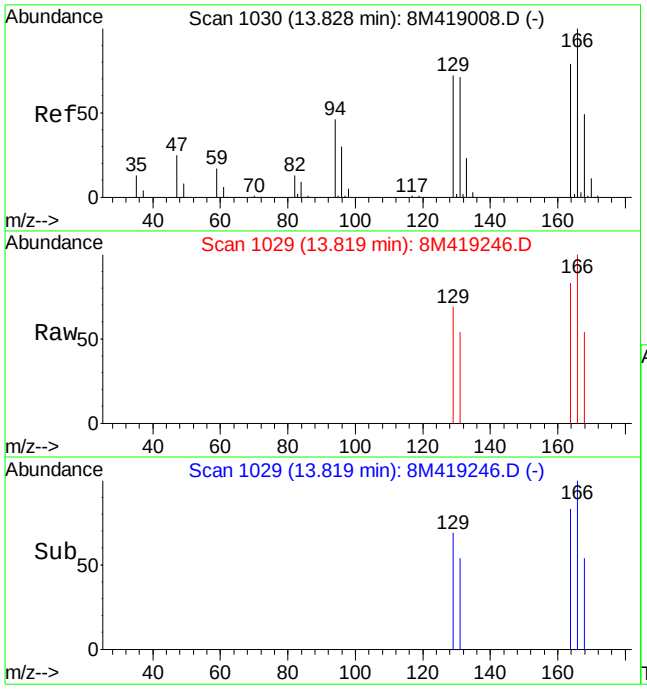


#39
Cyclohexane
Concen: 0.24 ug/L
RT: 10.15 min Scan# 674
Delta R.T. -0.02 min
Lab File: 8M419246.D
Acq: 28 Apr 2017 19:01

Tgt Ion: 56 Resp: 2252

Ion	Ratio	Lower	Upper
56	100		
84	71.7	61.6	143.8
69	0.0	21.4	50.0#

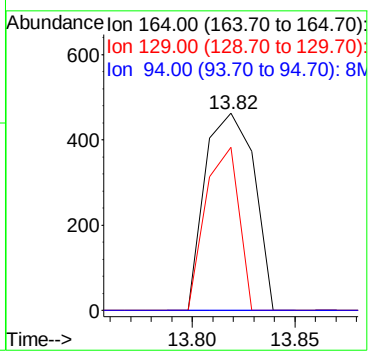




#66
Tetrachloroethene
Concen: 0.13 ug/L
RT: 13.82 min Scan# 1029
Delta R.T. -0.01 min
Lab File: 8M419246.D
Acq: 28 Apr 2017 19:01

Tgt Ion:164 Resp: 770

Ion	Ratio	Lower	Upper
164	100		
129	56.1	53.4	124.6
94	0.0	34.7	81.1#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419247.D Vial: 25
Acq On : 28 Apr 2017 19:31 Operator: TMB
Sample : L17041200-33 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 19:53:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

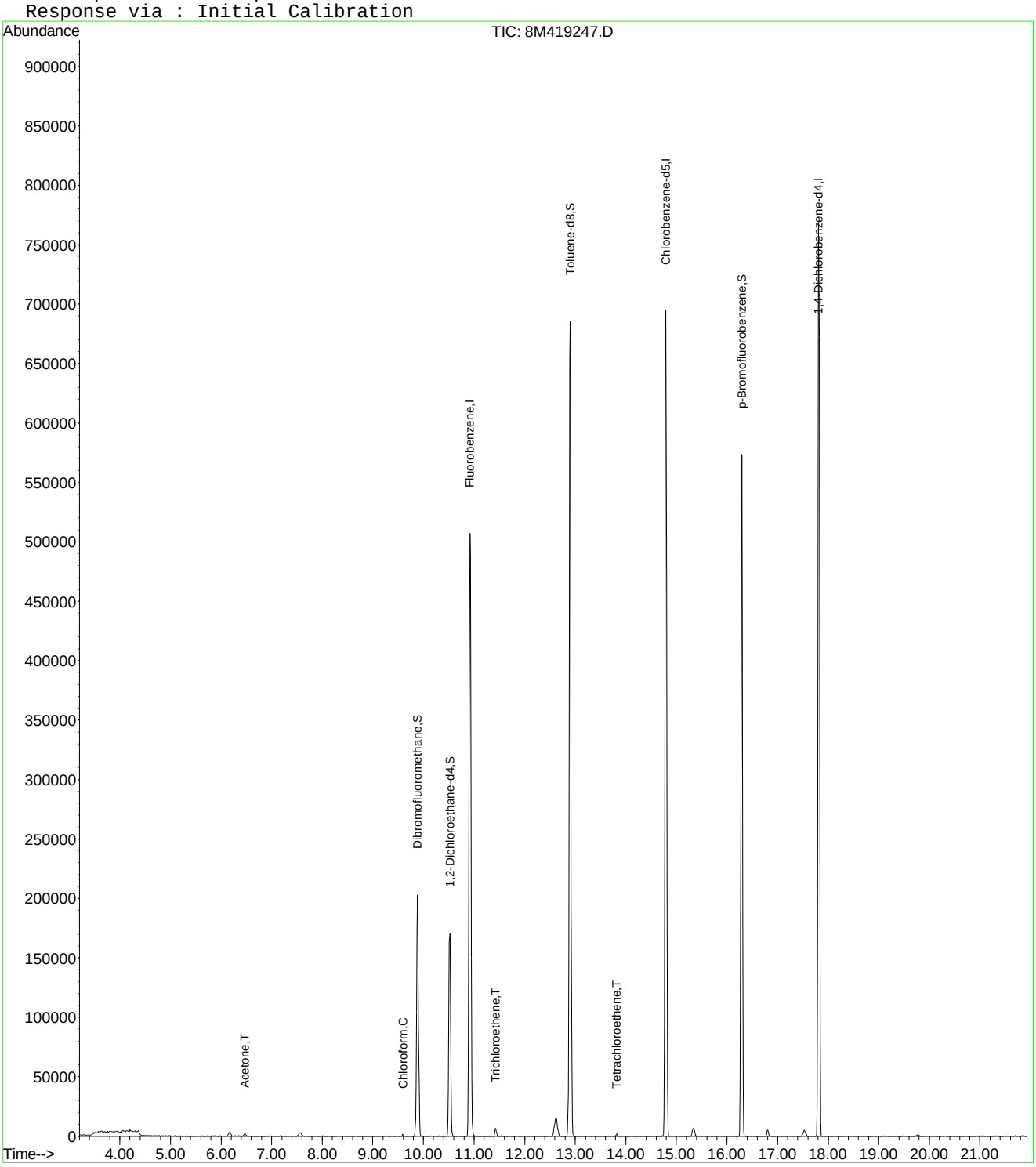
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	626005	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	506719	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	249796	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	166066	25.2916	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.16%			
43) 1,2-Dichloroethane-d4	10.52	65	147345	25.9575	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.84%			
58) Toluene-d8	12.90	98	618153	26.6987	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%			
80) p-Bromofluorobenzene	16.29	95	239097	27.1206	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.48%			
Target Compounds						Qvalue
13) Acetone	6.47	43	3649	4.1445	ug/L #	68
33) Chloroform	9.59	83	1847	0.1468	ug/L	90
47) Trichloroethene	11.42	130	3414	0.4699	ug/L	95
66) Tetrachloroethene	13.81	164	816	0.1377	ug/L #	51

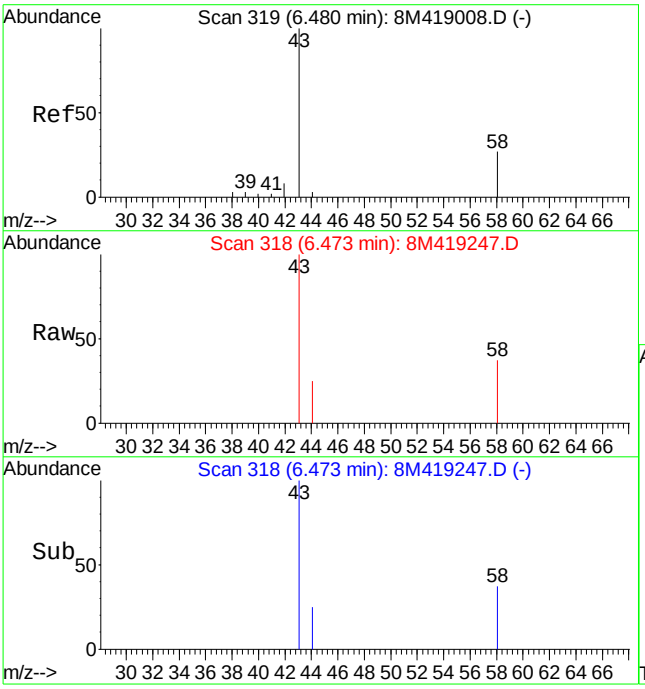
(#) = qualifier out of range (m) = manual integration
8M419247.D 8260WT.M Mon May 01 08:31:20 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419247.D Vial: 25
Acq On : 28 Apr 2017 19:31 Operator: TMB
Sample : L17041200-33 A 826-SPE Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 19:53 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

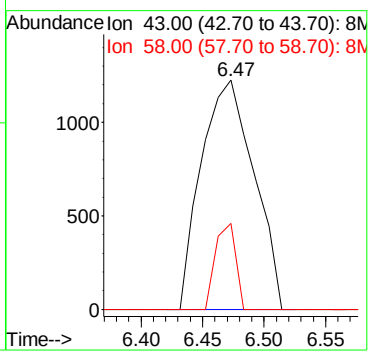


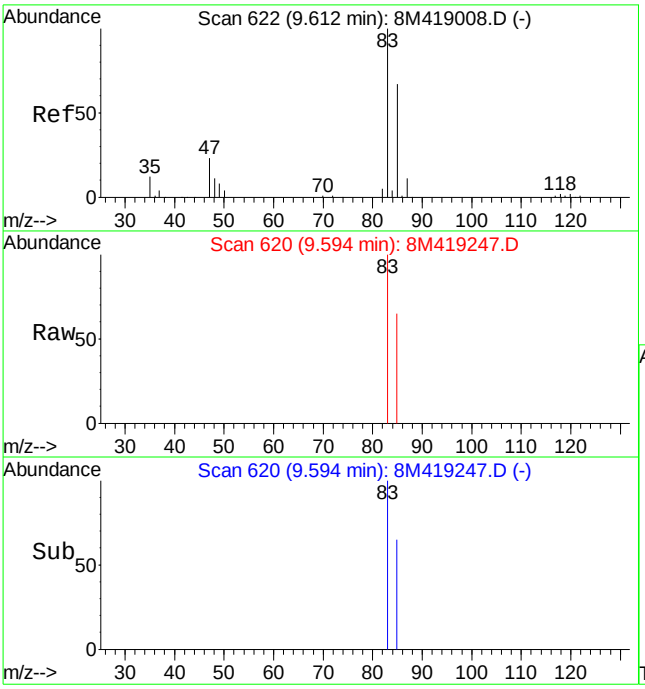


#13
Acetone
Concen: 4.14 ug/L
RT: 6.47 min Scan# 318
Delta R.T. -0.01 min
Lab File: 8M419247.D
Acq: 28 Apr 2017 19:31

Tgt Ion: 43 Resp: 3649

Ion	Ratio	Lower	Upper
43	100		
58	14.5	19.4	45.4#

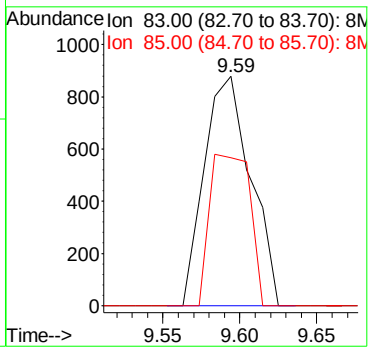


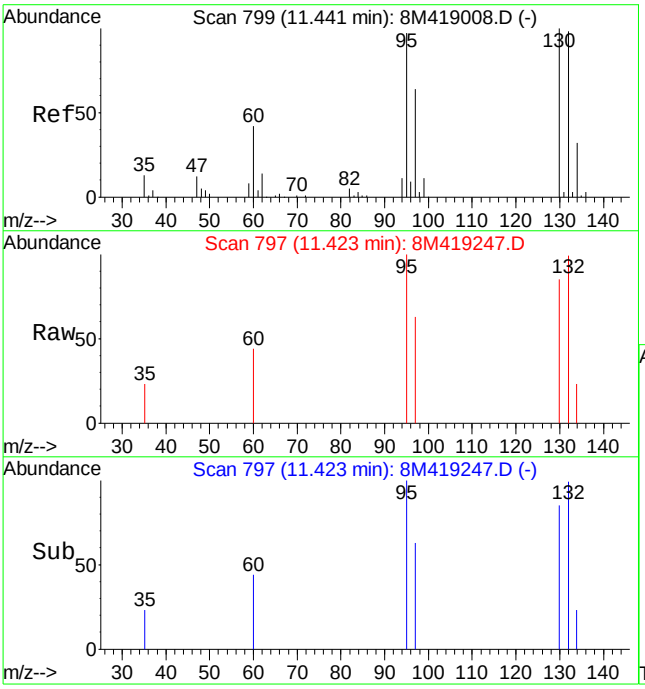


#33
Chloroform
Concen: 0.15 ug/L
RT: 9.59 min Scan# 620
Delta R.T. -0.01 min
Lab File: 8M419247.D
Acq: 28 Apr 2017 19:31

Tgt Ion: 83 Resp: 1847

Ion	Ratio	Lower	Upper
83	100		
85	57.1	39.1	91.3

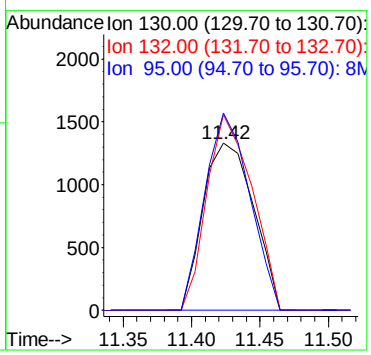


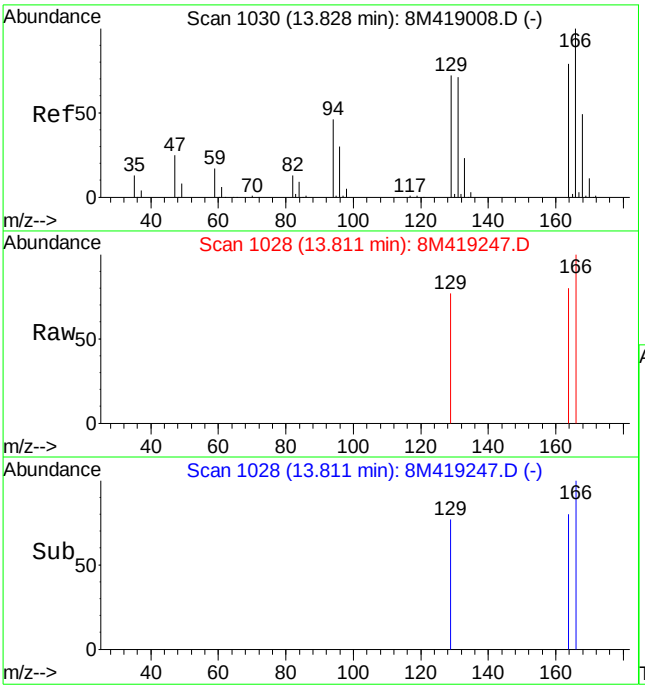


#47
Trichloroethene
Concen: 0.47 ug/L
RT: 11.42 min Scan# 797
Delta R.T. -0.02 min
Lab File: 8M419247.D
Acq: 28 Apr 2017 19:31

Tgt Ion:130 Resp: 3414

Ion	Ratio	Lower	Upper
130	100		
132	104.9	59.4	138.6
95	104.7	60.1	140.3

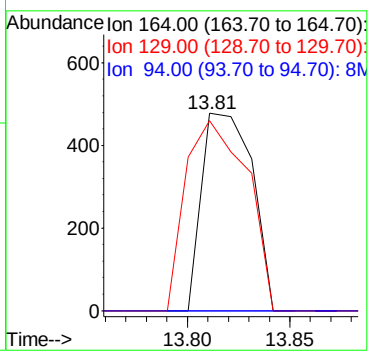




#66
Tetrachloroethene
Concen: 0.14 ug/L
RT: 13.81 min Scan# 1028
Delta R.T. -0.02 min
Lab File: 8M419247.D
Acq: 28 Apr 2017 19:31

Tgt Ion:164 Resp: 816

Ion	Ratio	Lower	Upper
164	100		
129	117.6	53.4	124.6
94	0.0	34.7	81.1#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273112.D Vial: 9
Acq On : 28 Apr 2017 15:13 Operator: ADC
Sample : L17041200-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:37 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

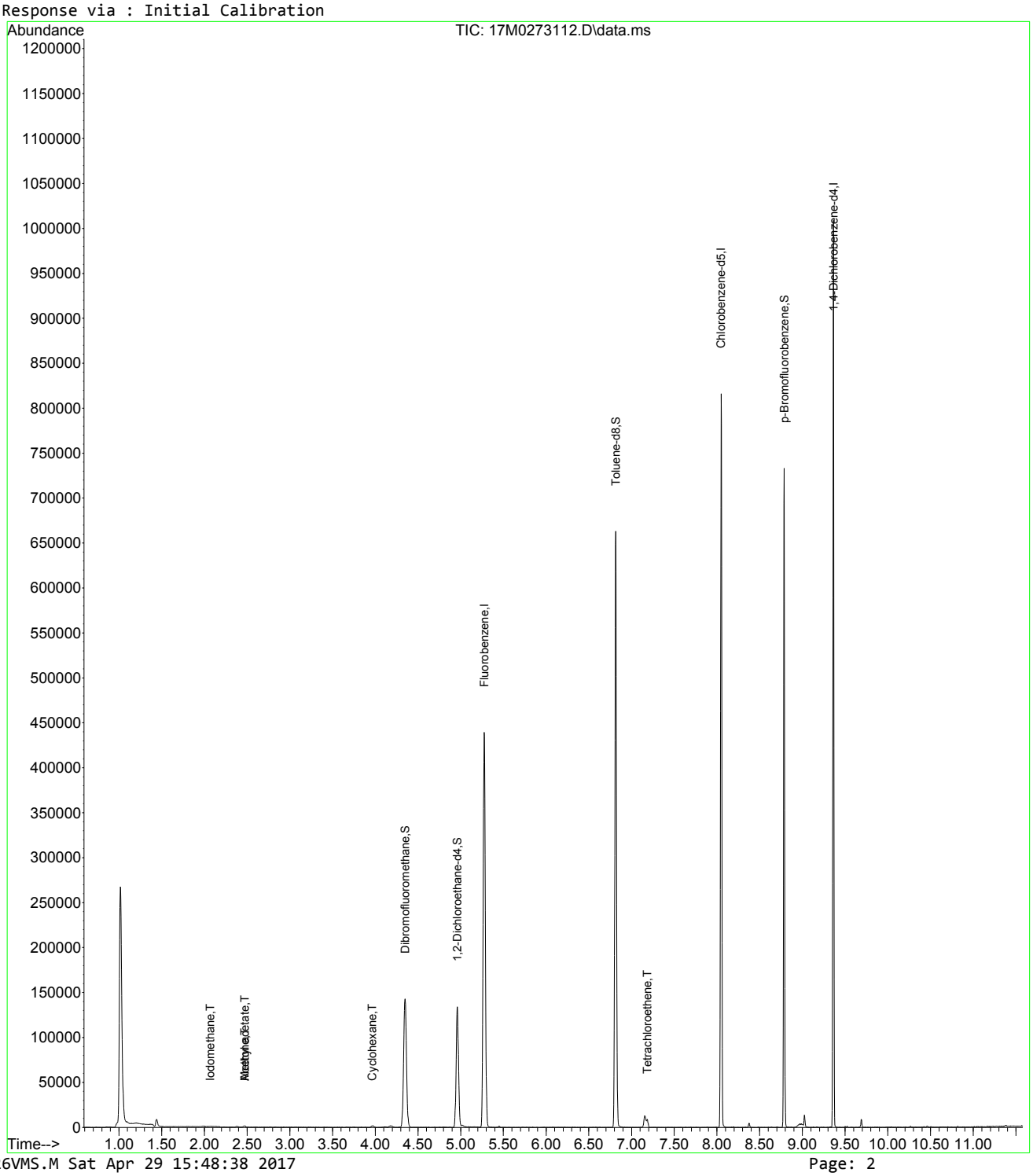
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	378640	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	280333	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	132615	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	103355	25.2749	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.100%			
34) 1,2-Dichloroethane-d4	4.962	65	97431	25.4195	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.678%			
47) Toluene-d8	6.815	98	355221	25.3903	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.561%			
66) p-Bromofluorobenzene	8.786	95	119230	26.8517	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.407%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	284	2.0495	ug/L #	35
16) Acetone	2.472	43	1678	2.2041	ug/L	87
18) Methyl acetate	2.472	43	1678	0.8407	ug/L #	56
25) Cyclohexane	3.963	56	1115	0.1833	ug/L #	76
49) Tetrachloroethene	7.185	166	2041	0.4071	ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

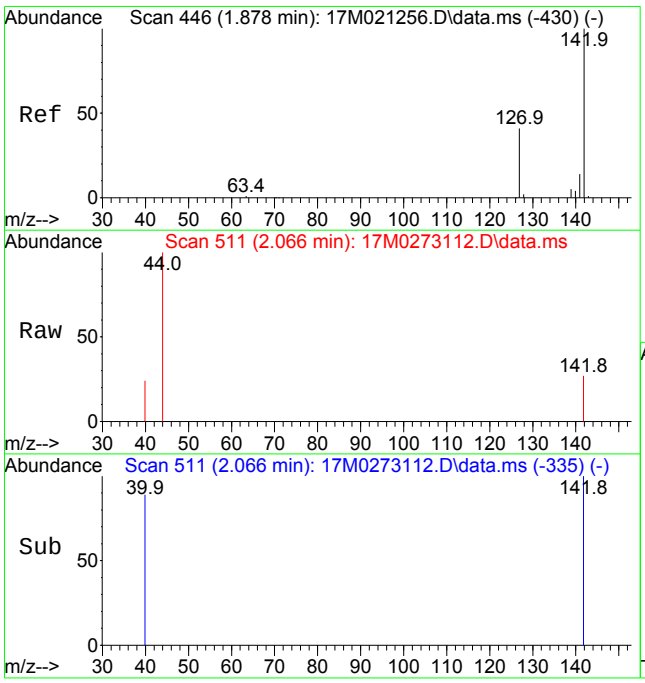
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273112.D Vial: 9
Acq On : 28 Apr 2017 15:13 Operator: ADC
Sample : L17041200-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:37 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



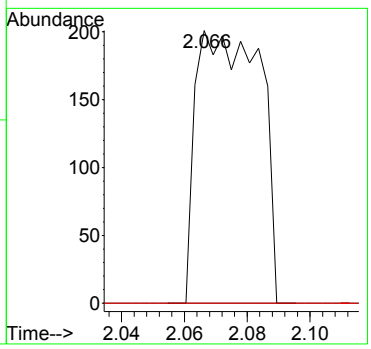
826VMS.M Sat Apr 29 15:48:38 2017 Page: 2

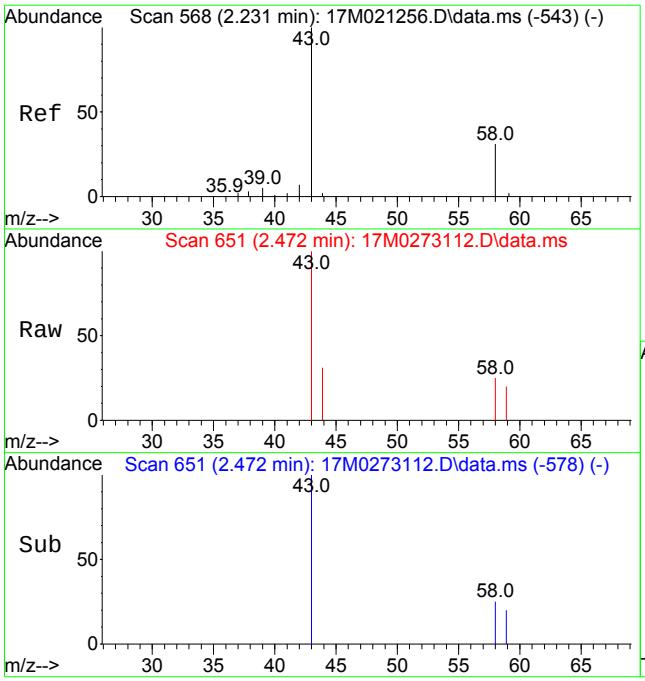


#13
Iodomethane
Concen: 2.0495 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273112.D
Acq: 28 Apr 2017 15:13

Tgt Ion:142 Resp: 284

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

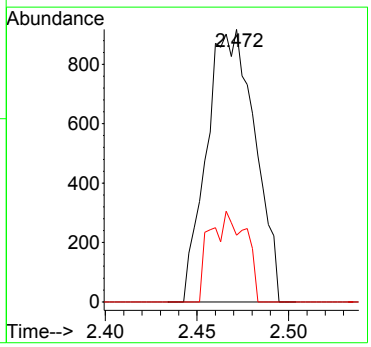


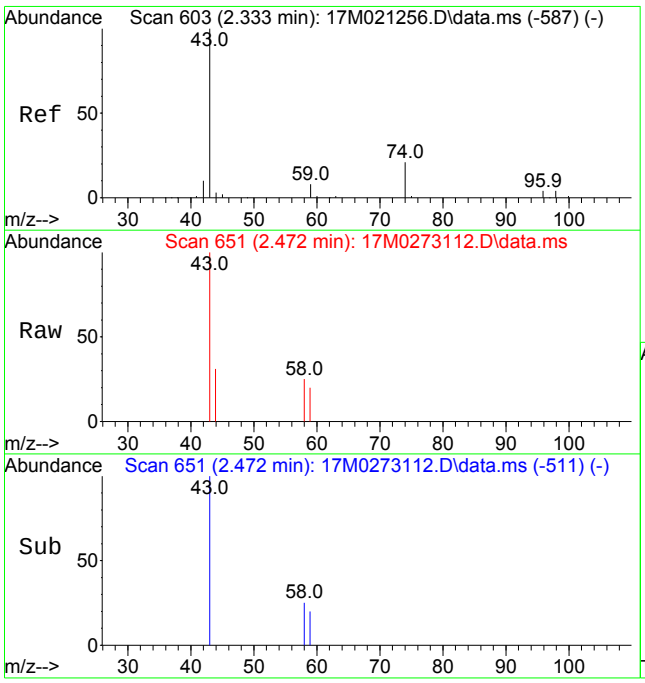


#16
Acetone
Concen: 2.2041 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273112.D
Acq: 28 Apr 2017 15:13

Tgt Ion: 43 Resp: 1678

Ion	Ratio	Lower	Upper
43	100		
58	24.8	19.4	45.2

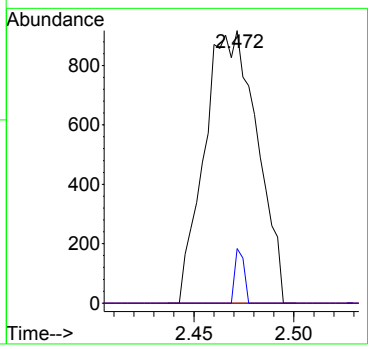


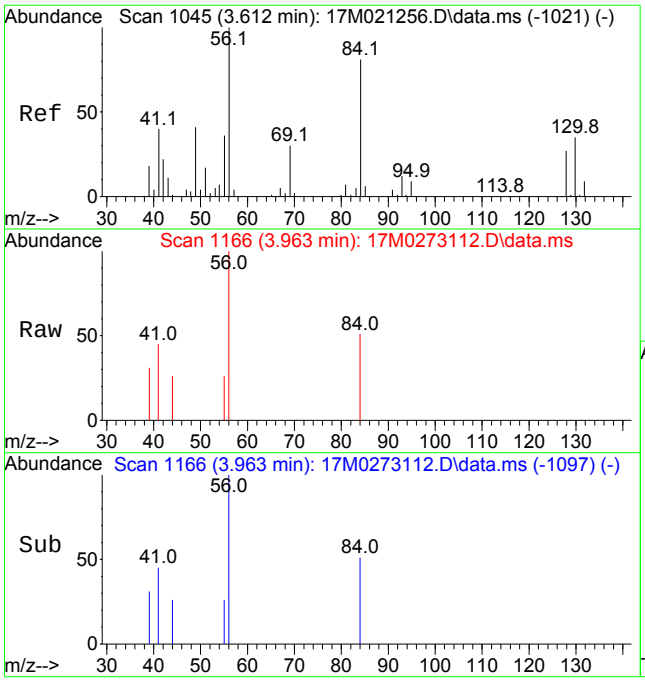


#18
Methyl acetate
Concen: 0.8407 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273112.D
Acq: 28 Apr 2017 15:13

Tgt Ion: 43 Resp: 1678

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

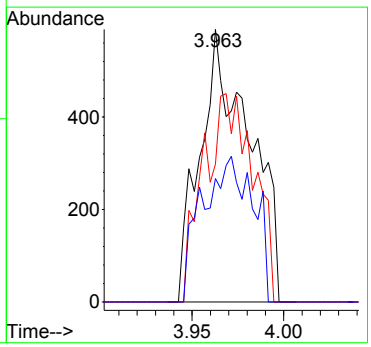


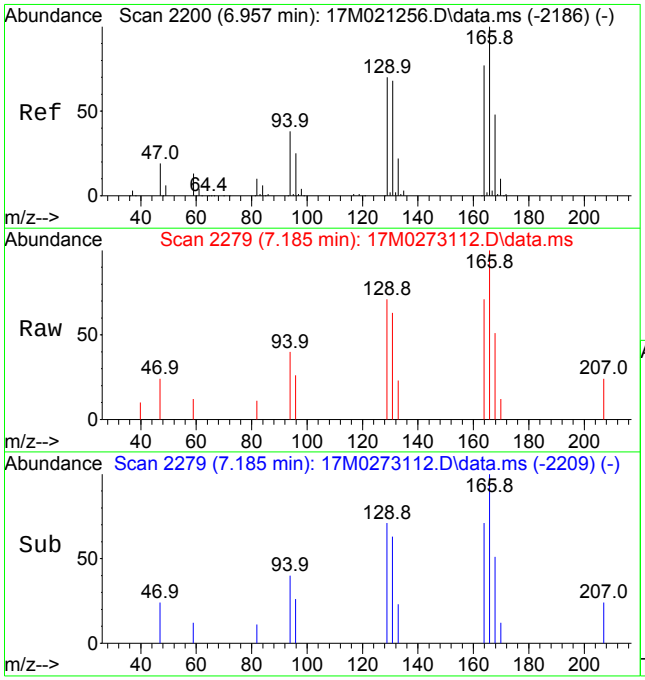


#25
Cyclohexane
Concen: 0.1833 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273112.D
Acq: 28 Apr 2017 15:13

Tgt Ion: 56 Resp: 1115

Ion	Ratio	Lower	Upper
56	100		
84	77.0	69.4	104.0
41	54.5	72.2	108.2#

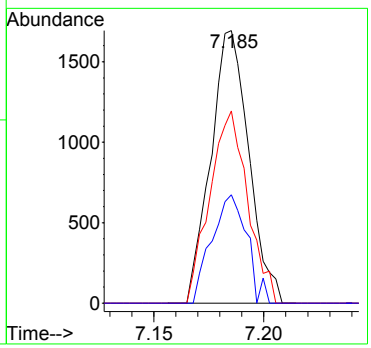




#49
Tetrachloroethene
Concen: 0.4071 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273112.D
Acq: 28 Apr 2017 15:13

Tgt Ion:166 Resp: 2041

Ion	Ratio	Lower	Upper
166	100		
129	70.1	56.2	84.4
94	36.6	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273113.D Vial: 10
Acq On : 28 Apr 2017 15:33 Operator: ADC
Sample : L17041200-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:41 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

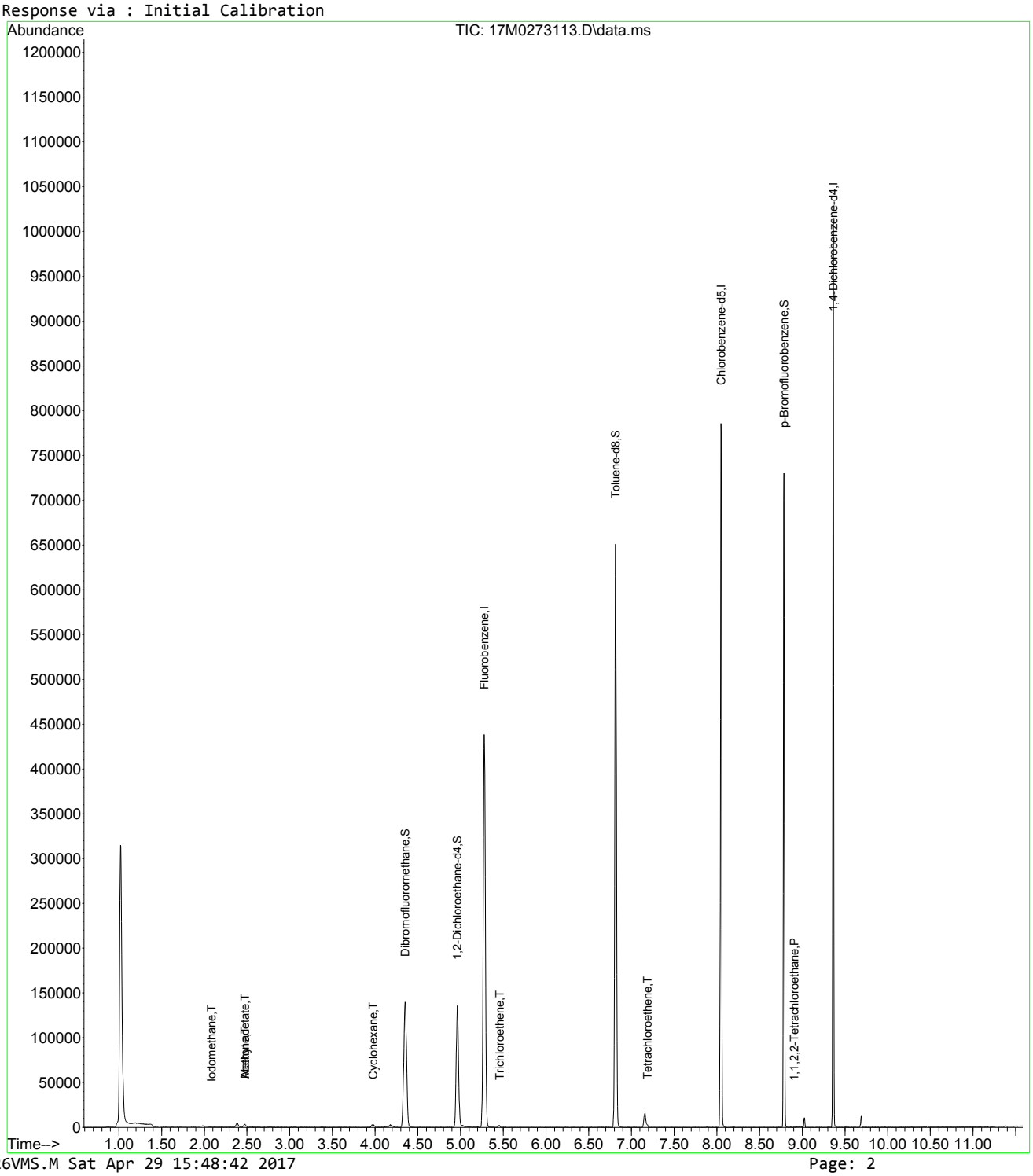
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	375767	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	277835	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	131610	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	100905	24.8644	ug/L	0.0118
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.458%			
34) 1,2-Dichloroethane-d4	4.962	65	97586	25.6546	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.618%			
47) Toluene-d8	6.815	98	346510	24.9903	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.961%			
66) p-Bromofluorobenzene	8.786	95	117399	26.6413	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.565%			
Target Compounds						Qvalue
13) Iodomethane	2.084	142	193	2.0343	ug/L #	35
16) Acetone	2.475	43	3469	4.5914	ug/L	92
18) Methyl acetate	2.475	43	3469	1.7514	ug/L #	63
25) Cyclohexane	3.974	56	1886	0.3124	ug/L #	83
37) Trichloroethene	5.457	130	789	0.1641	ug/L #	37
49) Tetrachloroethene	7.188	166	717	0.1443	ug/L #	83
69) 1,1,2,2-Tetrachloroethane	8.905	83	532	0.1503	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

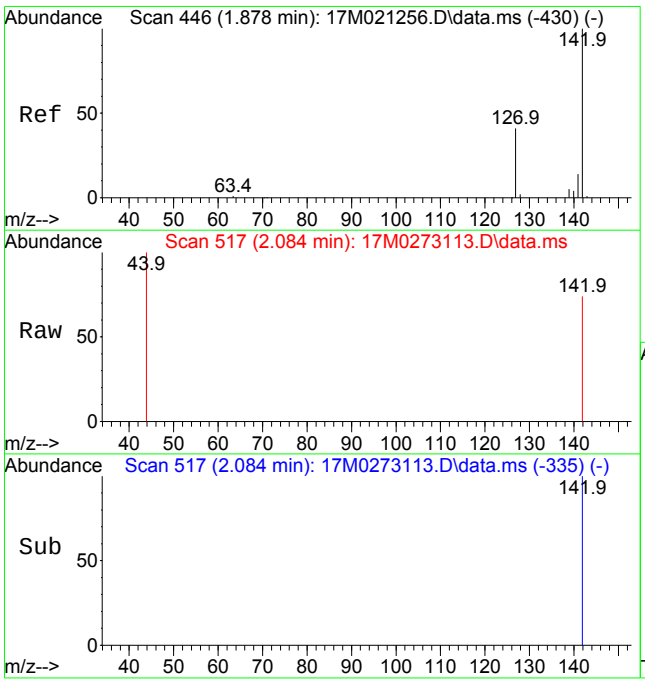
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273113.D Vial: 10
Acq On : 28 Apr 2017 15:33 Operator: ADC
Sample : L17041200-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:41 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



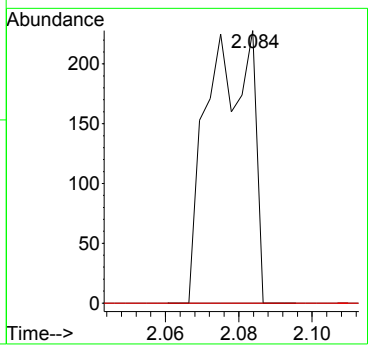
826VMS.M Sat Apr 29 15:48:42 2017 Page: 2

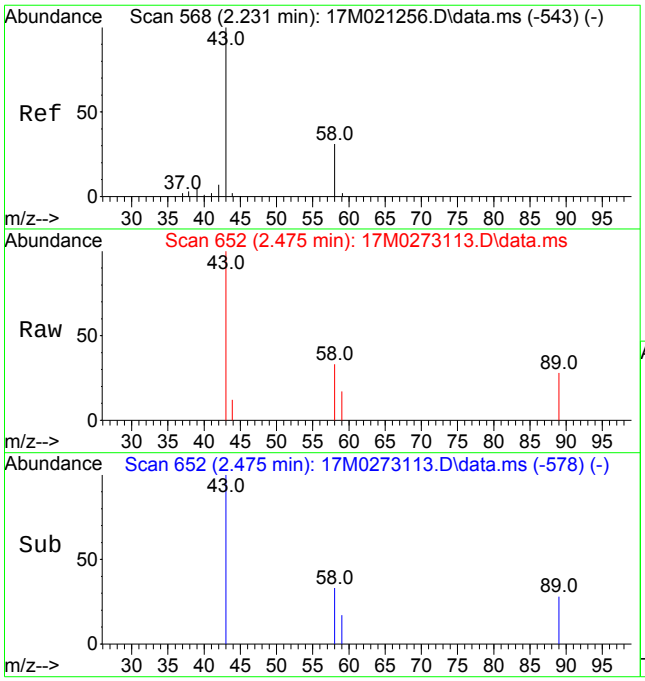


#13
Iodomethane
Concen: 2.0343 ug/L
RT: 2.084 min Scan# 517
Delta R.T. 0.026 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion:142 Resp: 193

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

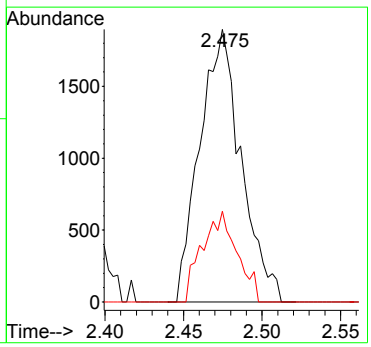


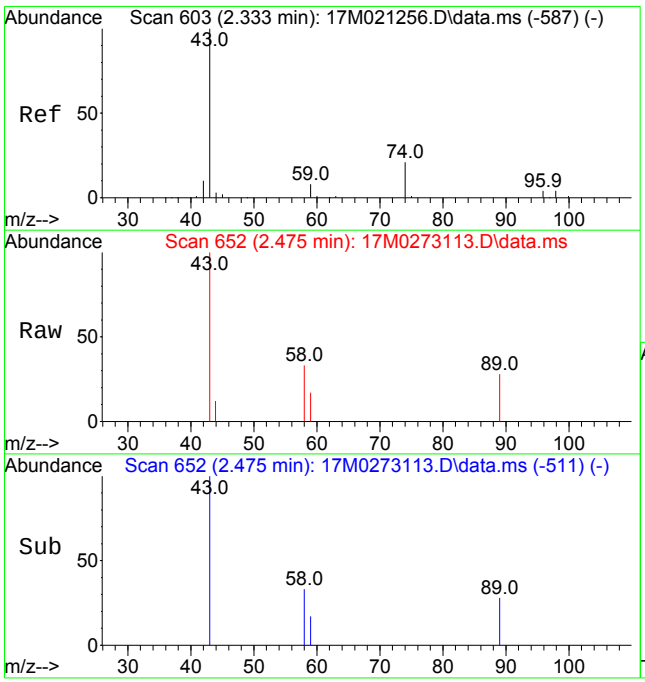


#16
Acetone
Concen: 4.5914 ug/L
RT: 2.475 min Scan# 652
Delta R.T. 0.015 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion: 43 Resp: 3469

Ion	Ratio	Lower	Upper
43	100		
58	28.0	19.4	45.2

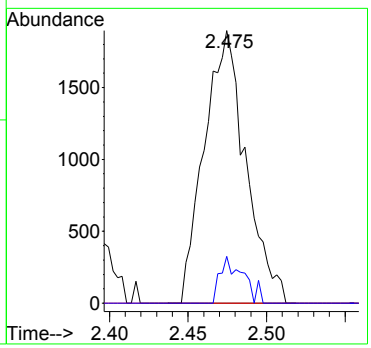


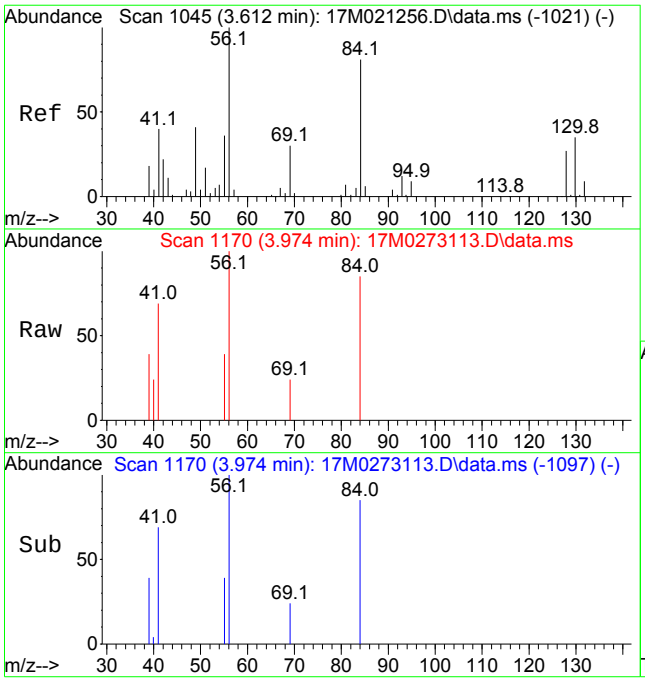


#18
Methyl acetate
Concen: 1.7514 ug/L
RT: 2.475 min Scan# 652
Delta R.T. -0.092 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion: 43 Resp: 3469

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	9.6	7.6	11.4

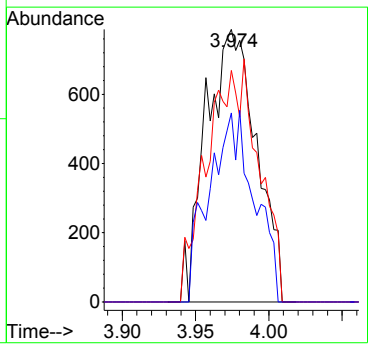


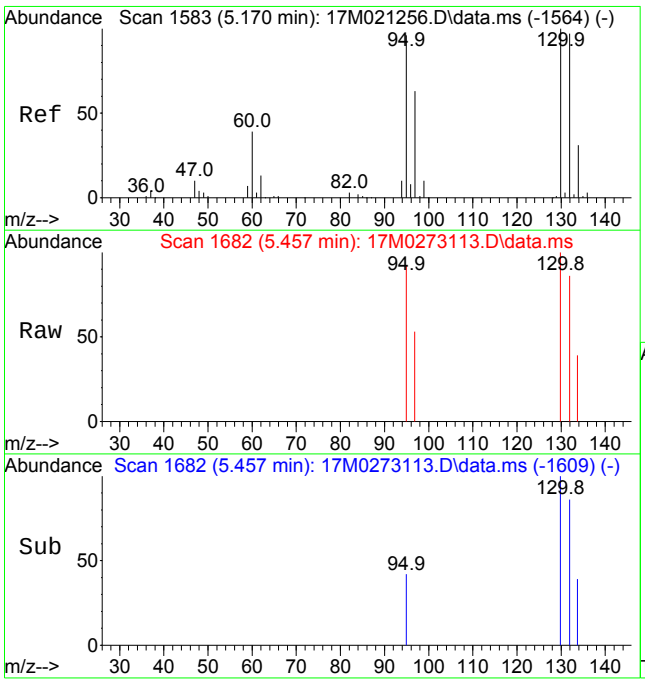


#25
Cyclohexane
Concen: 0.3124 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion: 56 Resp: 1886

Ion	Ratio	Lower	Upper
56	100		
84	89.6	69.4	104.0
41	62.5	72.2	108.2#

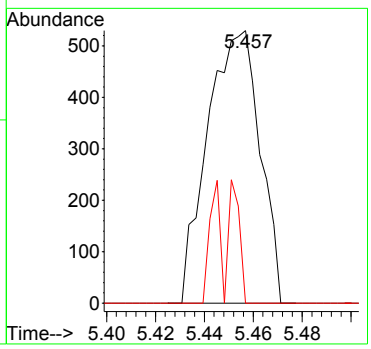


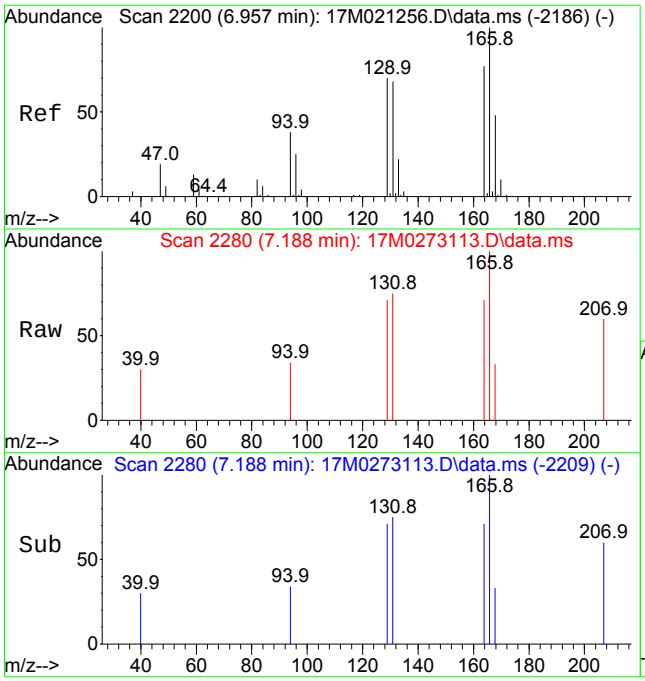


#37
Trichloroethene
Concen: 0.1641 ug/L
RT: 5.457 min Scan# 1682
Delta R.T. 0.012 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion:130 Resp: 789

Ion	Ratio	Lower	Upper
130	100		
60	0.0	22.9	53.3#

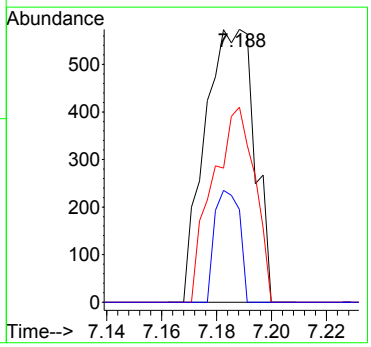


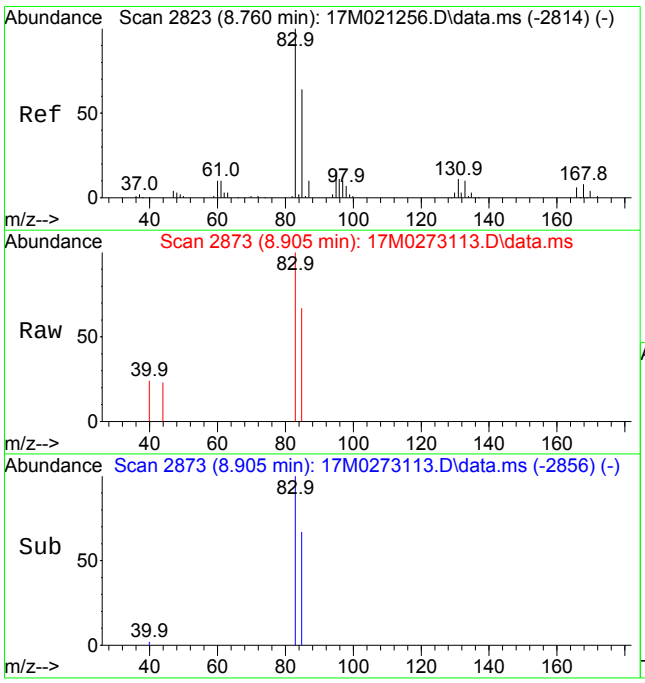


#49
Tetrachloroethene
Concen: 0.1443 ug/L
RT: 7.188 min Scan# 2280
Delta R.T. 0.006 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion:166 Resp: 717

Ion	Ratio	Lower	Upper
166	100		
129	60.8	56.2	84.4
94	20.5	29.7	44.5#

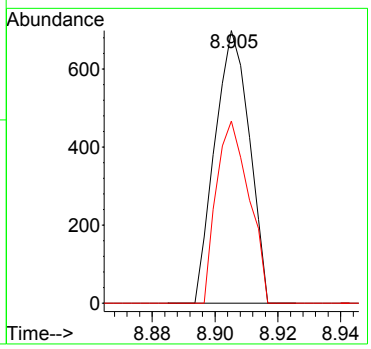




#69
1,1,2,2-Tetrachloroethane
Concen: 0.1503 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273113.D
Acq: 28 Apr 2017 15:33

Tgt Ion: 83 Resp: 532

Ion	Ratio	Lower	Upper
83	100		
85	63.3	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273114.D Vial: 11
Acq On : 28 Apr 2017 16:03 Operator: ADC
Sample : L17041200-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

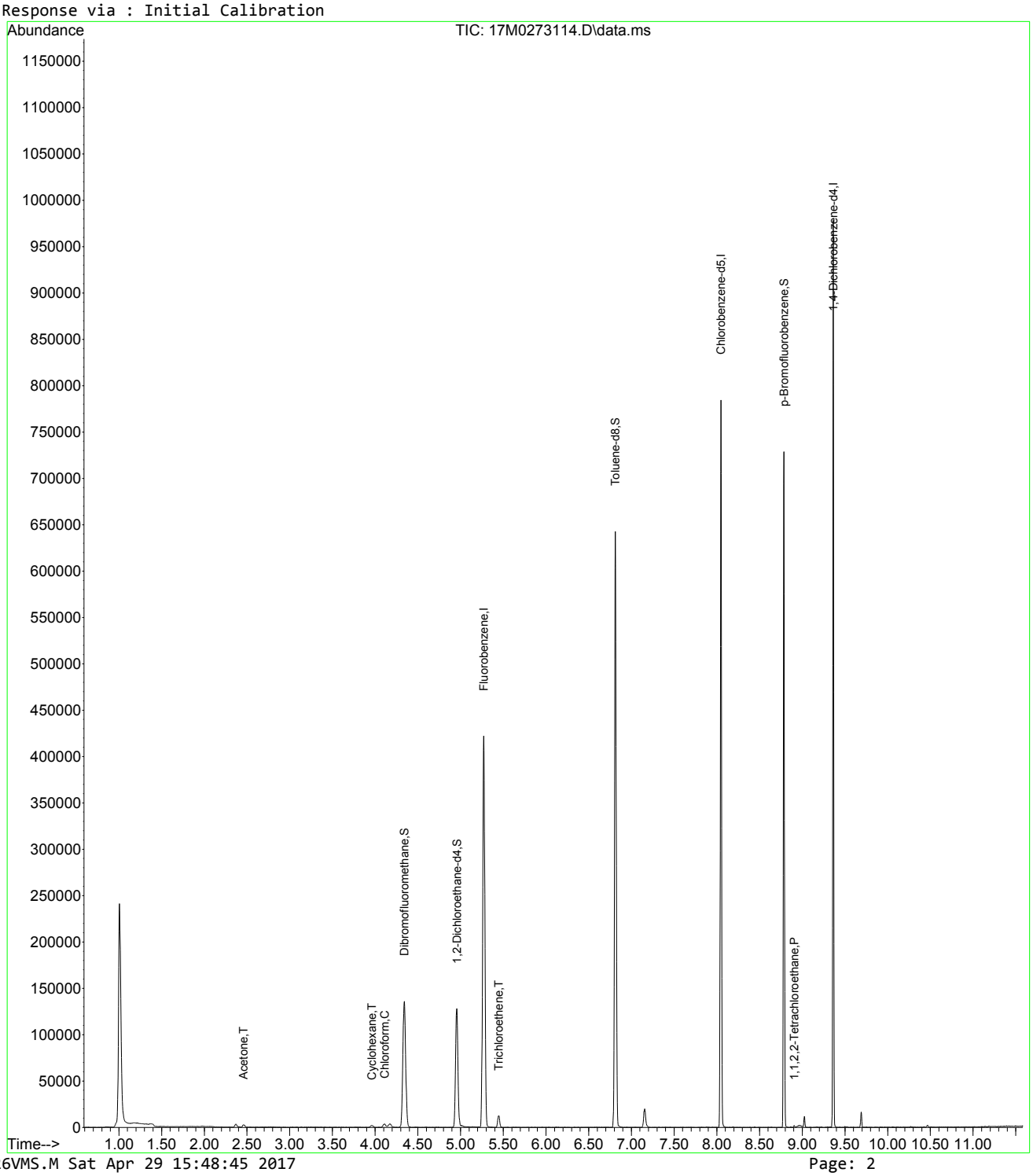
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.272	96	363336	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	265715	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	126736	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	97680	24.8933 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.573%		
34) 1,2-Dichloroethane-d4	4.956	65	92772	25.2235 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.894%		
47) Toluene-d8	6.812	98	342930	25.8602 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.441%		
66) p-Bromofluorobenzene	8.786	95	115296	27.1703 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.681%		
Target Compounds					Qvalue
16) Acetone	2.460	43	2540	3.4769 ug/L	96
25) Cyclohexane	3.963	56	1365	0.2338 ug/L #	77
27) Chloroform	4.110	83	4031	0.5633 ug/L	97
37) Trichloroethene	5.445	130	4351	0.9360 ug/L	98
69) 1,1,2,2-Tetrachloroethane	8.905	83	729	0.2138 ug/L	91

(#) = qualifier out of range (m) = manual integration (+) = signals summed

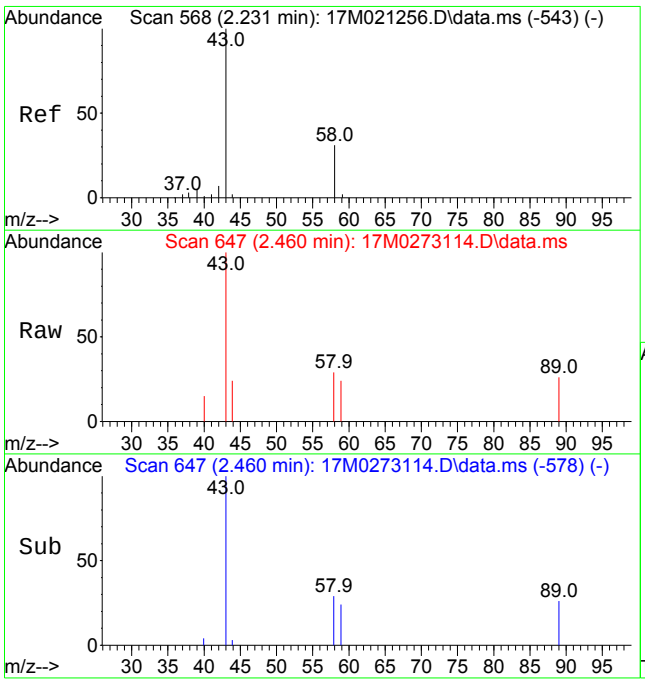
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273114.D Vial: 11
Acq On : 28 Apr 2017 16:03 Operator: ADC
Sample : L17041200-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



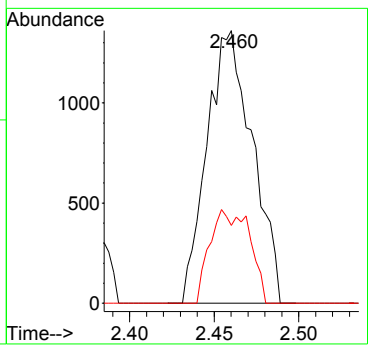
826VMS.M Sat Apr 29 15:48:45 2017 Page: 2

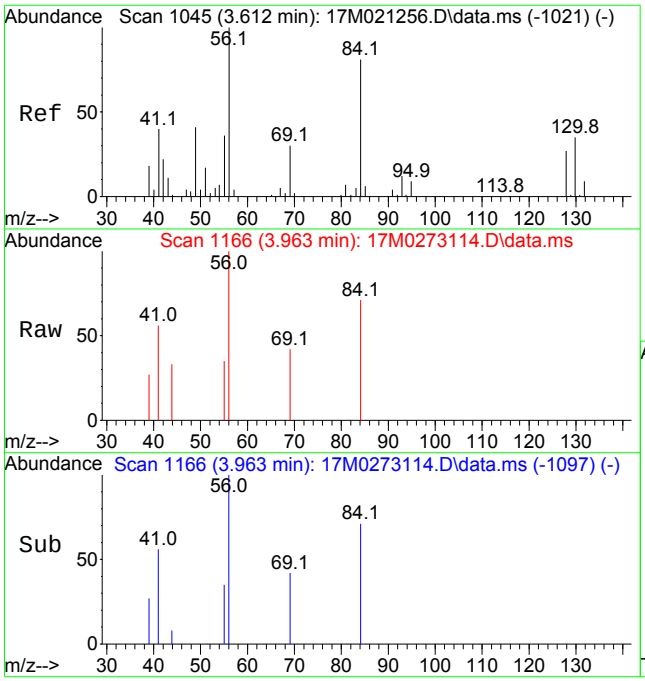


#16
Acetone
Concen: 3.4769 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273114.D
Acq: 28 Apr 2017 16:03

Tgt Ion: 43 Resp: 2540

Ion	Ratio	Lower	Upper
43	100		
58	29.9	19.4	45.2

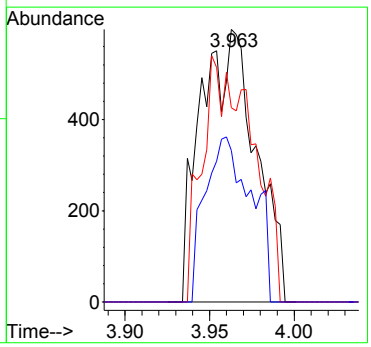


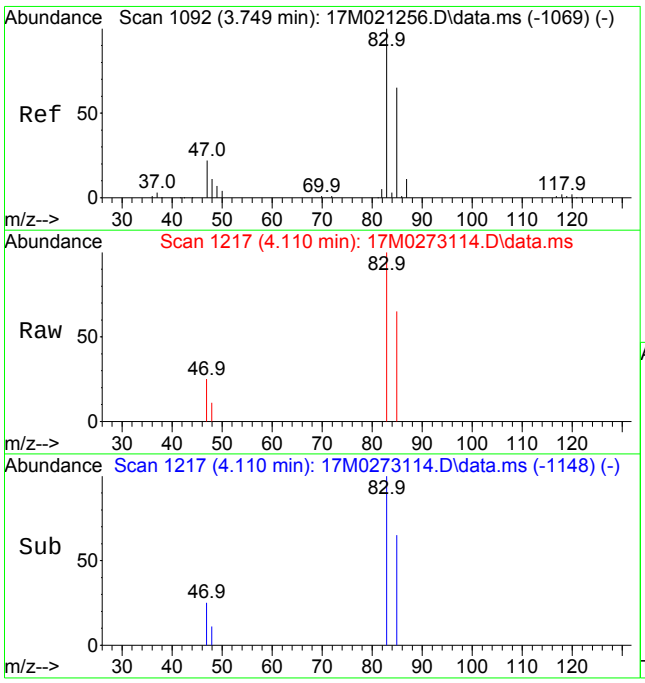


#25
Cyclohexane
Concen: 0.2338 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273114.D
Acq: 28 Apr 2017 16:03

Tgt Ion: 56 Resp: 1365

Ion	Ratio	Lower	Upper
56	100		
84	83.5	69.4	104.0
41	50.9	72.2	108.2#

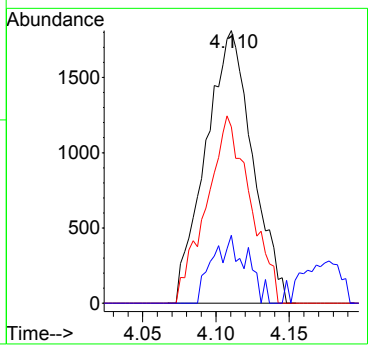


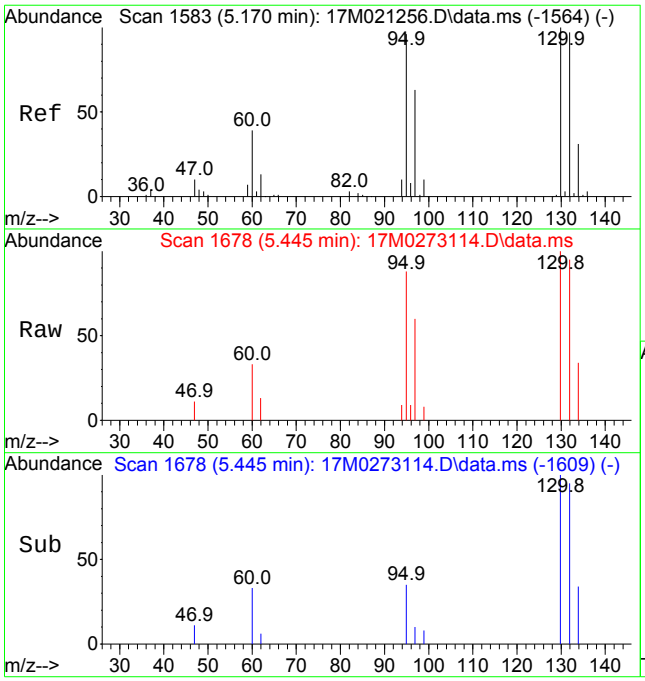


#27
Chloroform
Concen: 0.5633 ug/L
RT: 4.110 min Scan# 1217
Delta R.T. 0.000 min
Lab File: 17M0273114.D
Acq: 28 Apr 2017 16:03

Tgt Ion: 83 Resp: 4031

Ion	Ratio	Lower	Upper
83	100		
85	63.8	39.2	91.4
47	18.1	12.9	30.1

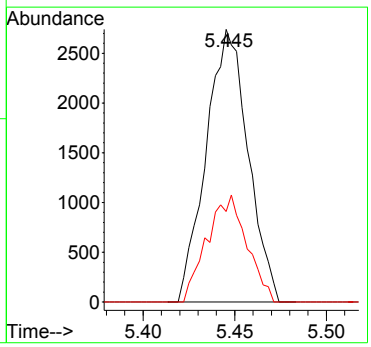


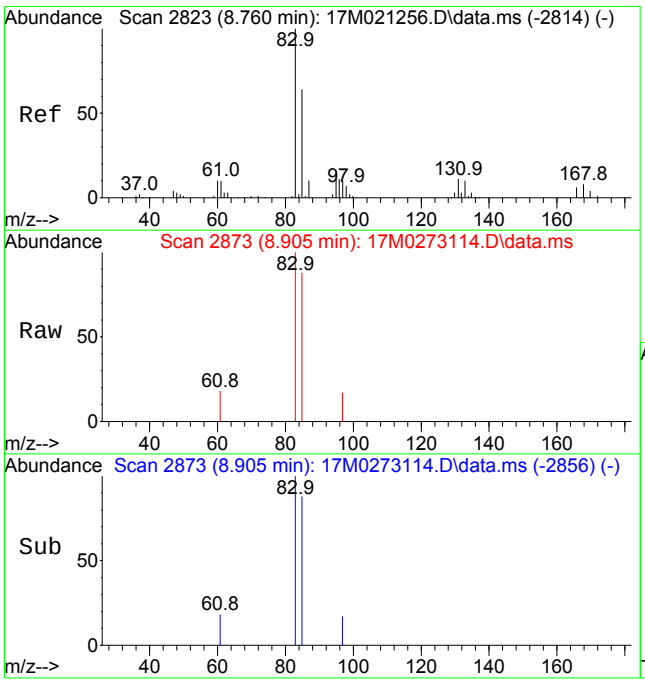


#37
Trichloroethene
Concen: 0.9360 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273114.D
Acq: 28 Apr 2017 16:03

Tgt Ion:130 Resp: 4351

Ion	Ratio	Lower	Upper
130	100		
60	37.1	22.9	53.3

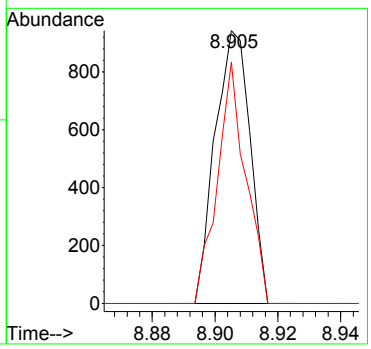




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2138 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273114.D
Acq: 28 Apr 2017 16:03

Tgt Ion: 83 Resp: 729

Ion	Ratio	Lower	Upper
83	100		
85	72.0	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273115.D Vial: 12
Acq On : 28 Apr 2017 16:23 Operator: ADC
Sample : L17041200-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

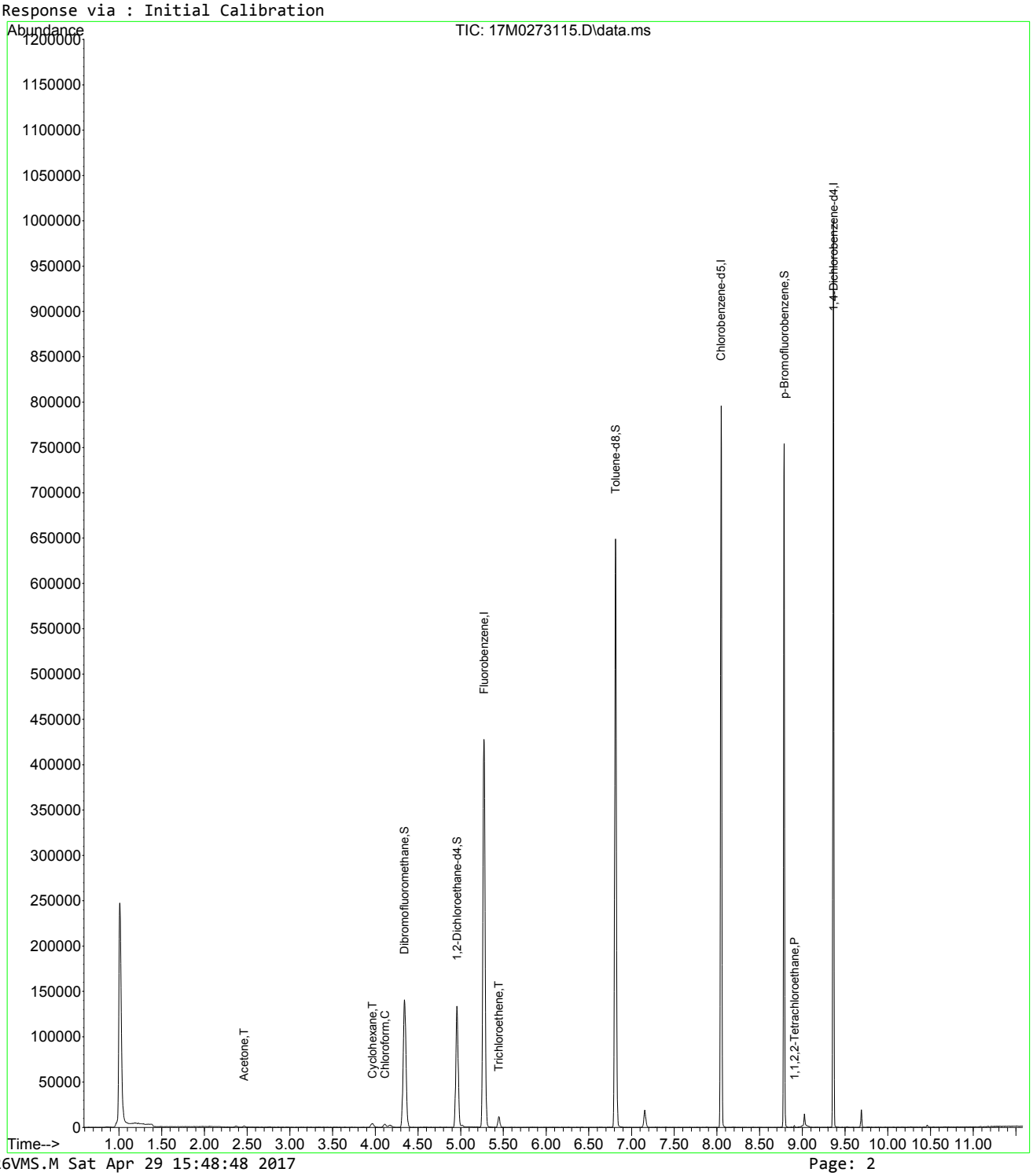
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	372663	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	273123	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	132290	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	100823	25.0512	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.205%			
34) 1,2-Dichloroethane-d4	4.956	65	96311	25.5303	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.121%			
47) Toluene-d8	6.812	98	352500	25.8609	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.444%			
66) p-Bromofluorobenzene	8.786	95	118274	26.7019	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.808%			
Target Compounds						Qvalue
16) Acetone	2.463	43	1020	1.3613	ug/L #	69
25) Cyclohexane	3.966	56	2731	0.4561	ug/L #	81
27) Chloroform	4.113	83	3883	0.5290	ug/L	97
37) Trichloroethene	5.445	130	4012	0.8415	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	728	0.2046	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

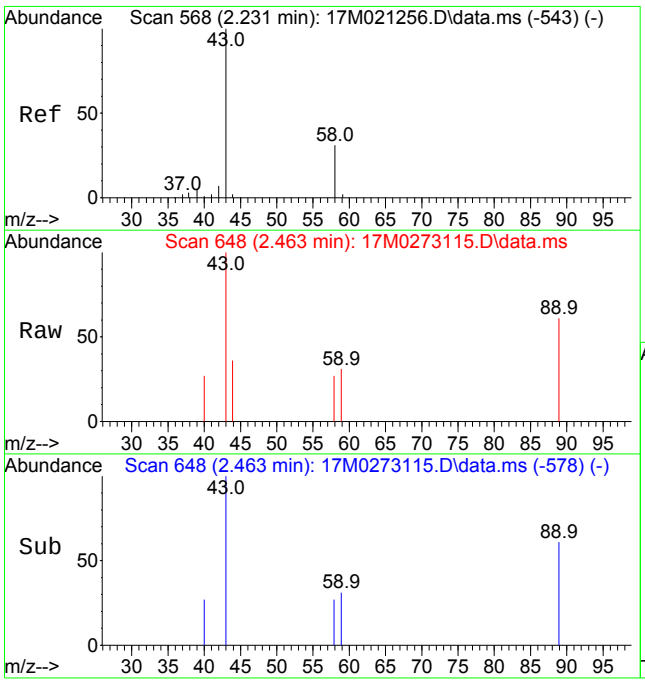
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273115.D Vial: 12
Acq On : 28 Apr 2017 16:23 Operator: ADC
Sample : L17041200-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



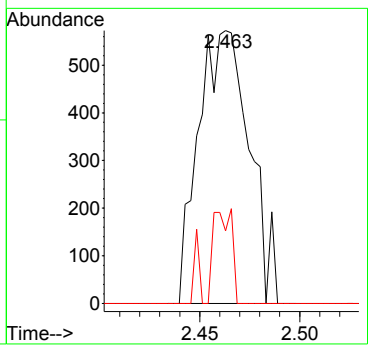
826VMS.M Sat Apr 29 15:48:48 2017 Page: 2

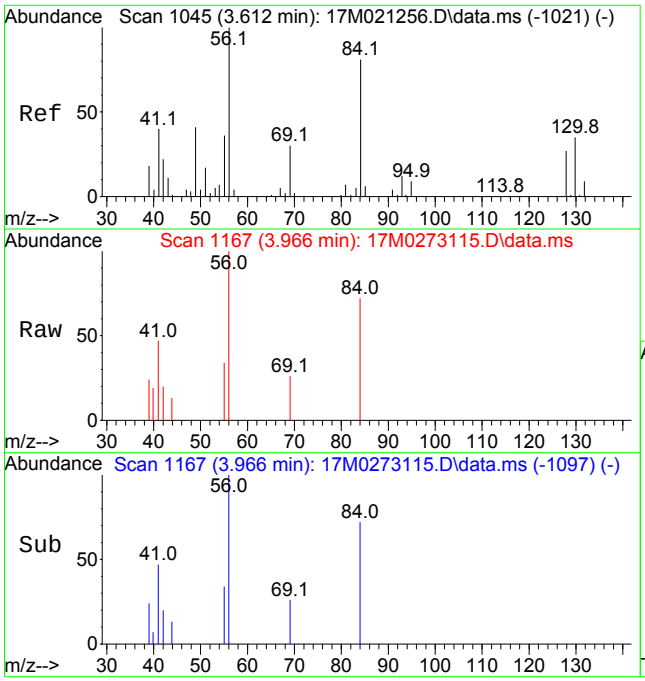


#16
Acetone
Concen: 1.3613 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273115.D
Acq: 28 Apr 2017 16:23

Tgt Ion: 43 Resp: 1020

Ion	Ratio	Lower	Upper
43	100		
58	15.2	19.4	45.2#

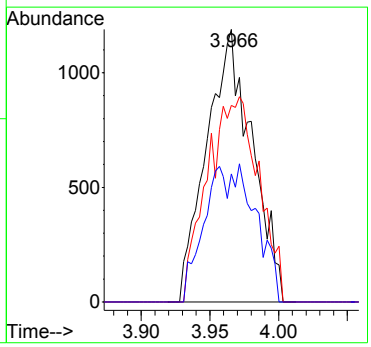


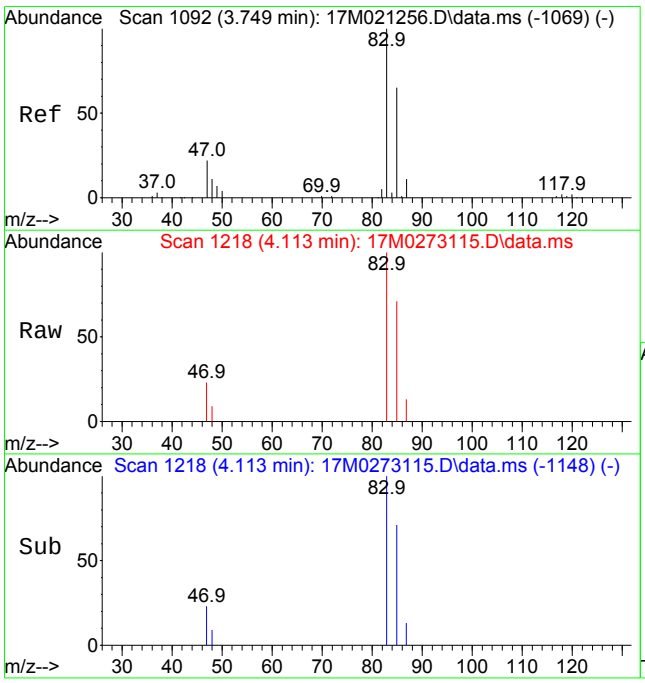


#25
Cyclohexane
Concen: 0.4561 ug/L
RT: 3.966 min Scan# 1167
Delta R.T. 0.003 min
Lab File: 17M0273115.D
Acq: 28 Apr 2017 16:23

Tgt Ion: 56 Resp: 2731

Ion	Ratio	Lower	Upper
56	100		
84	85.2	69.4	104.0
41	56.4	72.2	108.2#

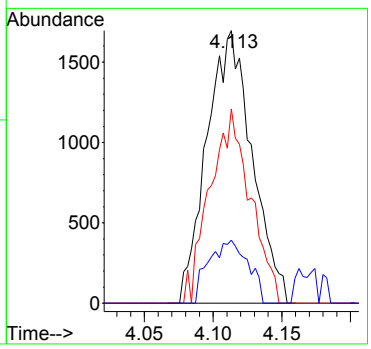


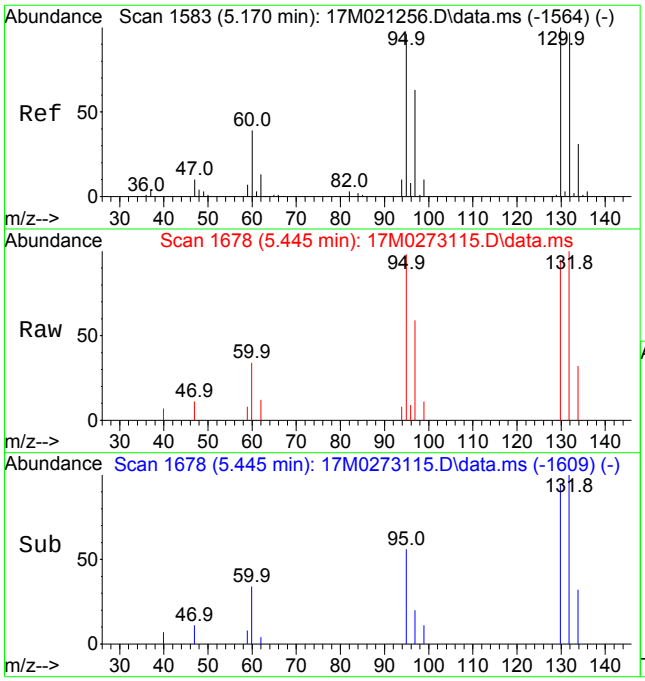


#27
Chloroform
Concen: 0.5290 ug/L
RT: 4.113 min Scan# 1218
Delta R.T. 0.003 min
Lab File: 17M0273115.D
Acq: 28 Apr 2017 16:23

Tgt Ion: 83 Resp: 3883

Ion	Ratio	Lower	Upper
83	100		
85	63.4	39.2	91.4
47	20.0	12.9	30.1

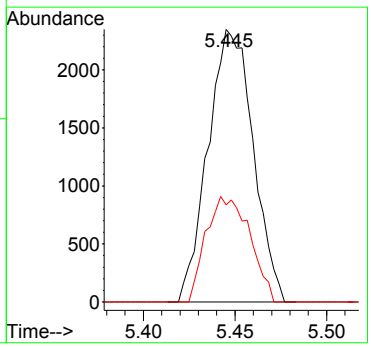


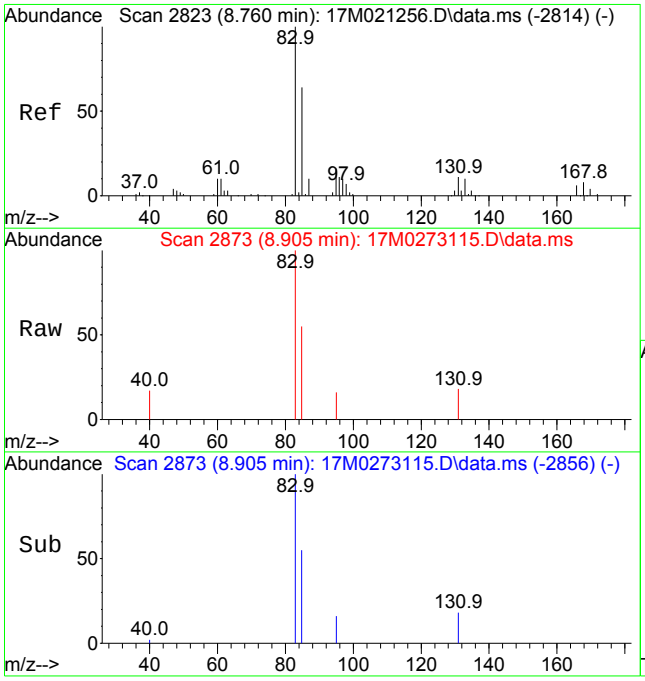


#37
Trichloroethene
Concen: 0.8415 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273115.D
Acq: 28 Apr 2017 16:23

Tgt Ion:130 Resp: 4012

Ion	Ratio	Lower	Upper
130	100		
60	37.4	22.9	53.3

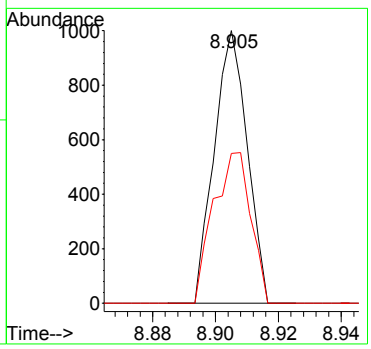




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2046 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273115.D
Acq: 28 Apr 2017 16:23

Tgt Ion: 83 Resp: 728

Ion	Ratio	Lower	Upper
83	100		
85	62.5	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273116.D Vial: 13
Acq On : 28 Apr 2017 16:43 Operator: ADC
Sample : L17041200-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:50 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

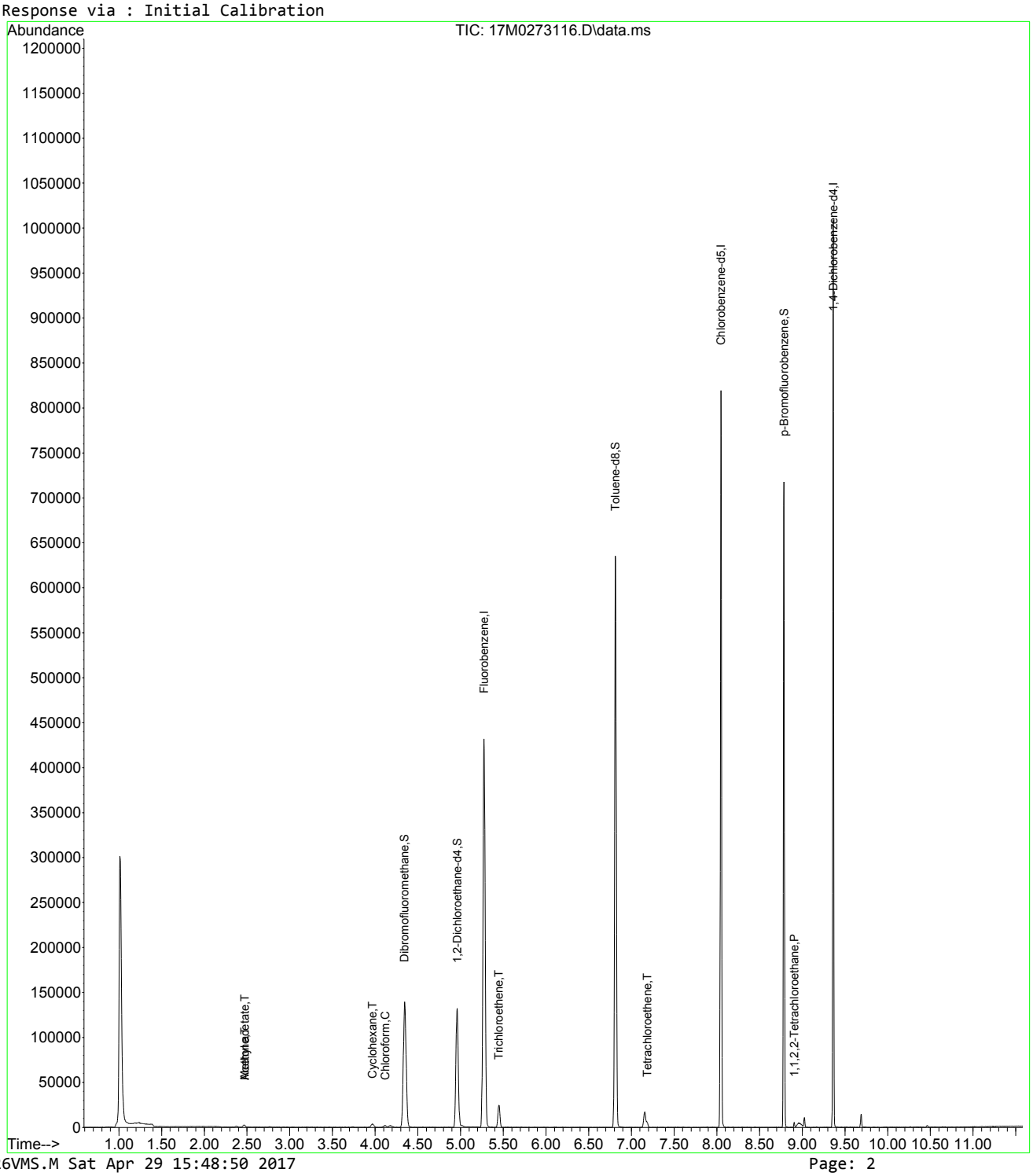
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	373368	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	278196	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	133483	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	99367	24.6428	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.571%			
34) 1,2-Dichloroethane-d4	4.959	65	95974	25.3930	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.572%			
47) Toluene-d8	6.812	98	343932	24.7722	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.089%			
66) p-Bromofluorobenzene	8.786	95	113951	25.4960	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.984%			
Target Compounds						Qvalue
16) Acetone	2.472	43	2630	3.5033	ug/L	92
18) Methyl acetate	2.472	43	2630	1.3363	ug/L #	63
25) Cyclohexane	3.969	56	2370	0.3951	ug/L #	79
27) Chloroform	4.116	83	2359	0.3208	ug/L	97
37) Trichloroethene	5.445	130	8316	1.7409	ug/L	100
49) Tetrachloroethene	7.185	166	1401	0.2816	ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.905	83	1609	0.4481	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

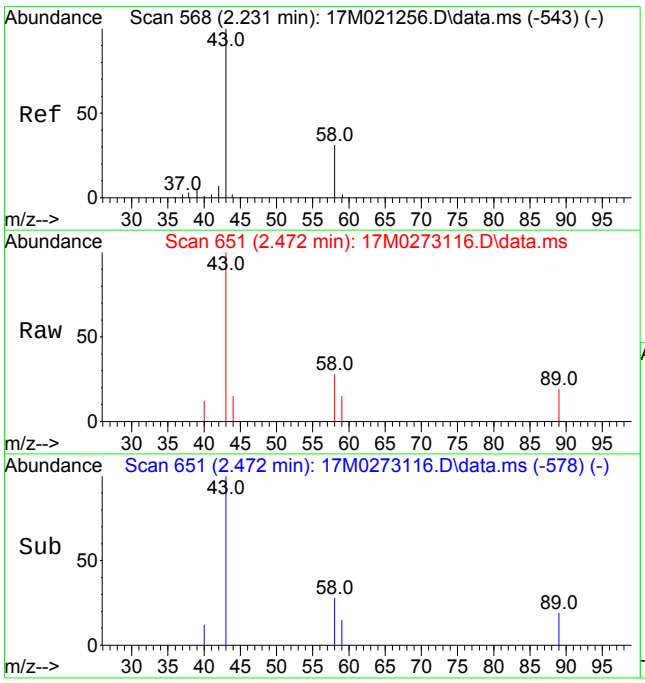
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273116.D Vial: 13
Acq On : 28 Apr 2017 16:43 Operator: ADC
Sample : L17041200-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:50 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



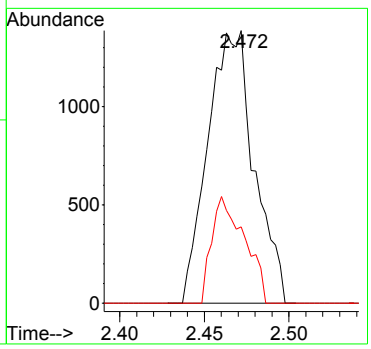
826VMS.M Sat Apr 29 15:48:50 2017 Page: 2

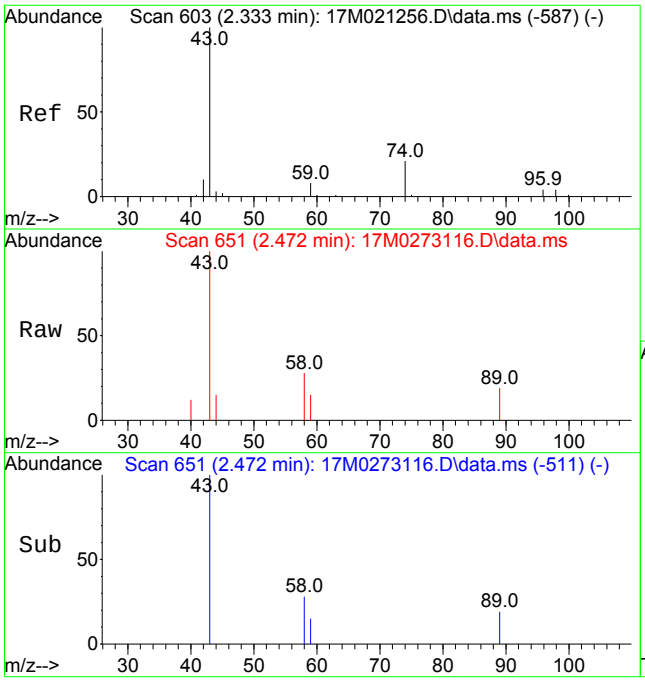


#16
Acetone
Concen: 3.5033 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion: 43 Resp: 2630

Ion	Ratio	Lower	Upper
43	100		
58	27.7	19.4	45.2

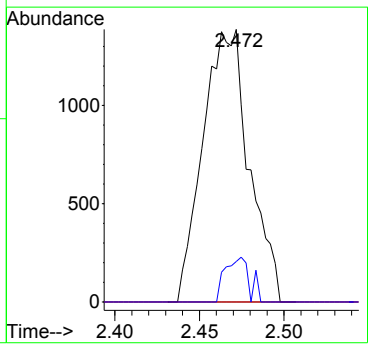


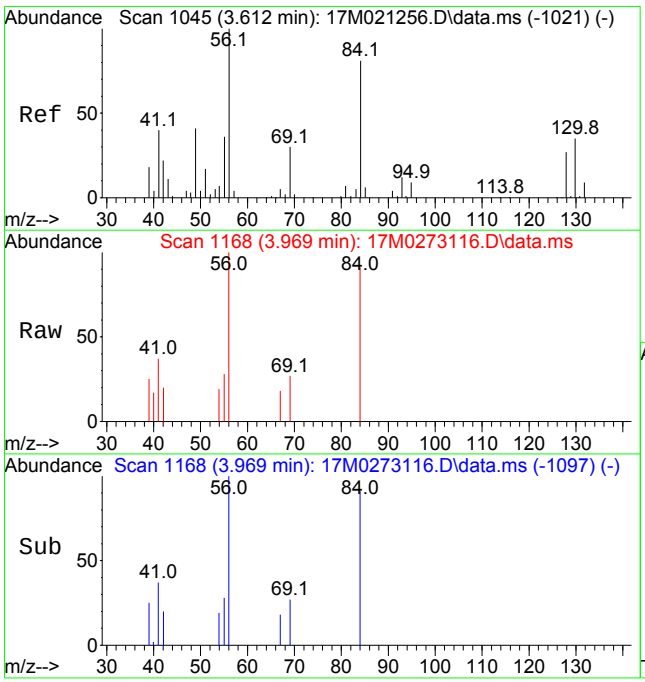


#18
Methyl acetate
Concen: 1.3363 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion: 43 Resp: 2630

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	8.6	7.6	11.4

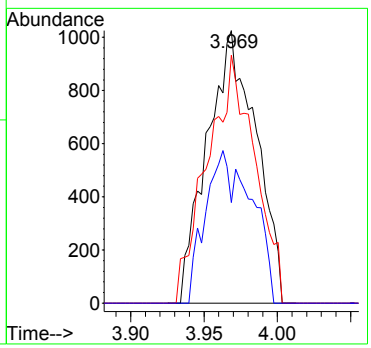


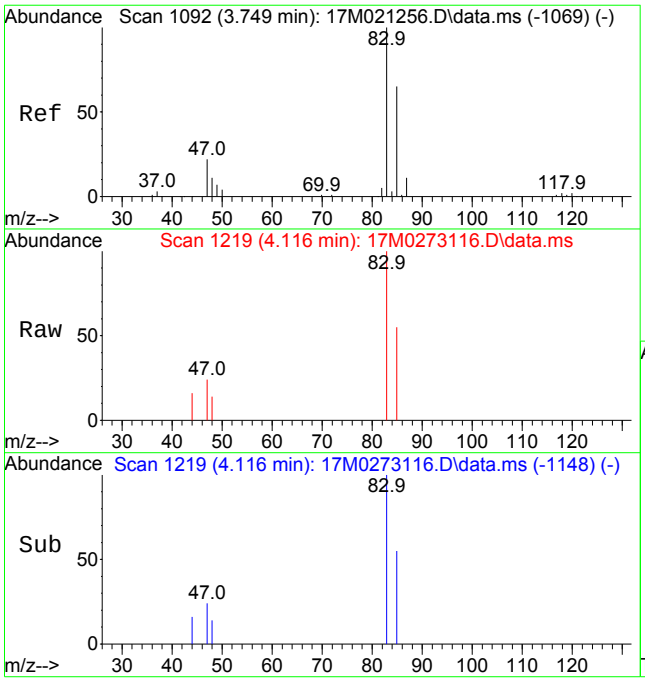


#25
Cyclohexane
Concen: 0.3951 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion: 56 Resp: 2370

Ion	Ratio	Lower	Upper
56	100		
84	88.6	69.4	104.0
41	53.2	72.2	108.2#

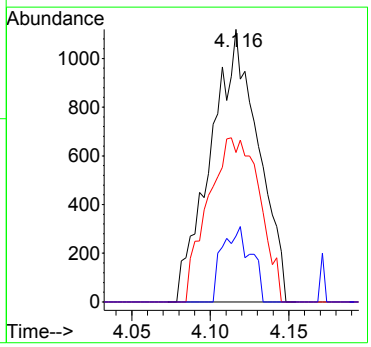


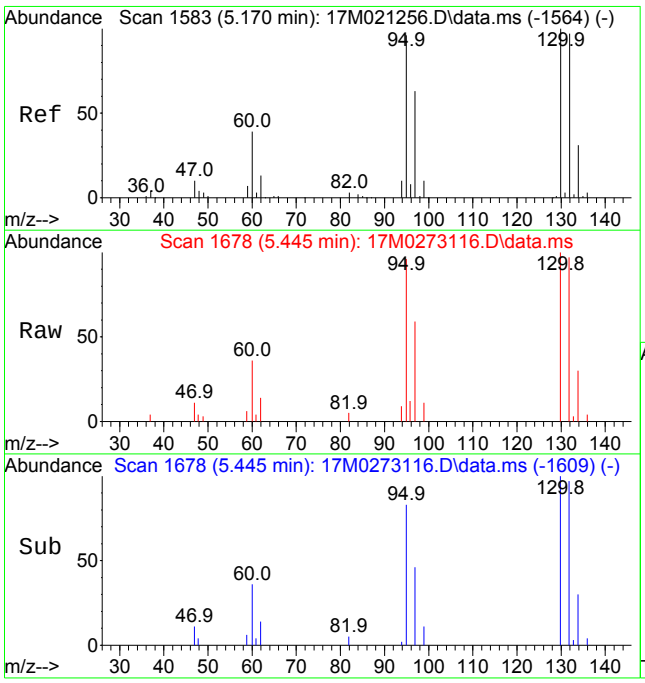


#27
Chloroform
Concen: 0.3208 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion: 83 Resp: 2359

Ion	Ratio	Lower	Upper
83	100		
85	65.2	39.2	91.4
47	16.6	12.9	30.1

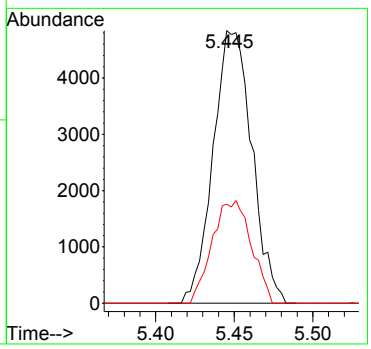


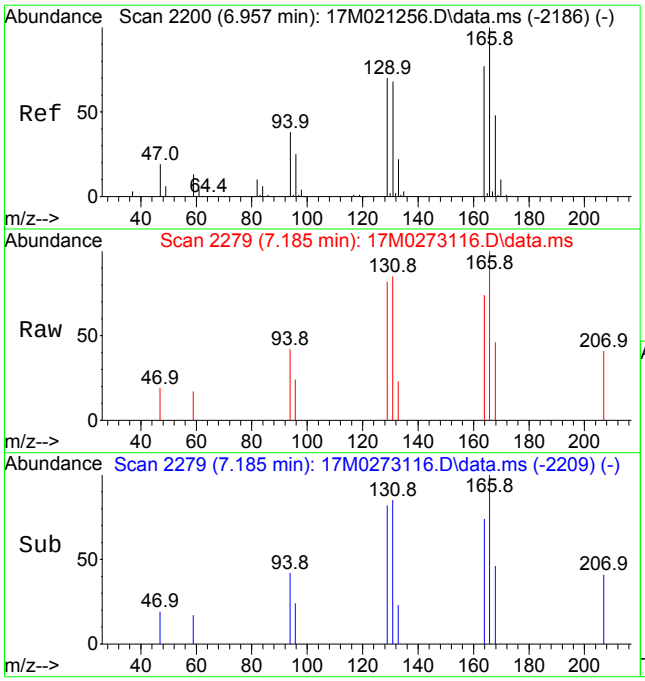


#37
Trichloroethene
Concen: 1.7409 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion:130 Resp: 8316

Ion	Ratio	Lower	Upper
130	100		
60	37.9	22.9	53.3

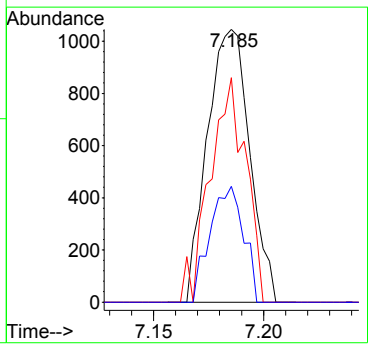


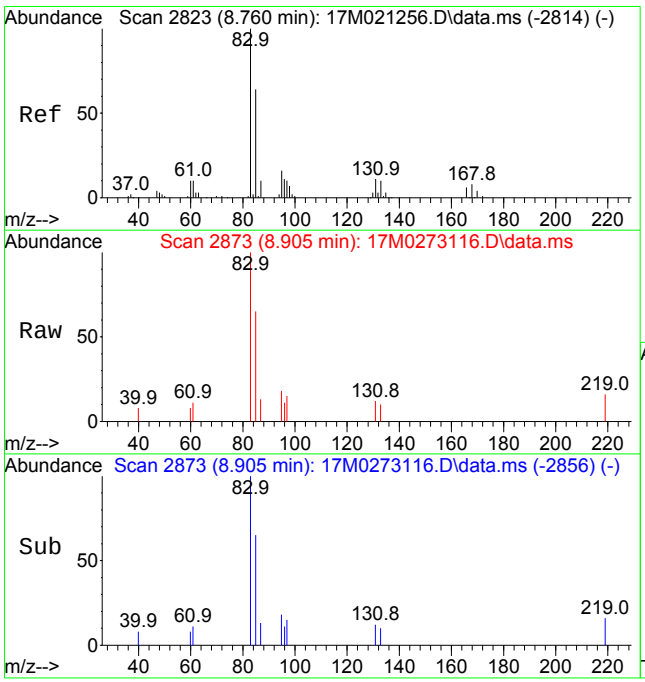


#49
Tetrachloroethene
Concen: 0.2816 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion:166 Resp: 1401

Ion	Ratio	Lower	Upper
166	100		
129	69.6	56.2	84.4
94	33.7	29.7	44.5

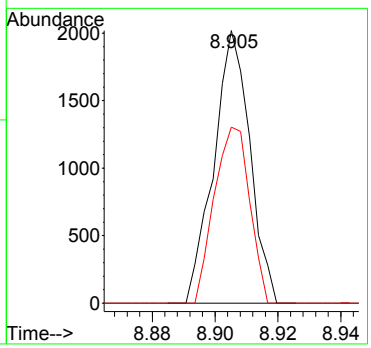




#69
1,1,2,2-Tetrachloroethane
Concen: 0.4481 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273116.D
Acq: 28 Apr 2017 16:43

Tgt Ion: 83 Resp: 1609

Ion	Ratio	Lower	Upper
83	100		
85	63.3	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273117.D Vial: 14
Acq On : 28 Apr 2017 17:10 Operator: ADC
Sample : L17041200-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:53 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

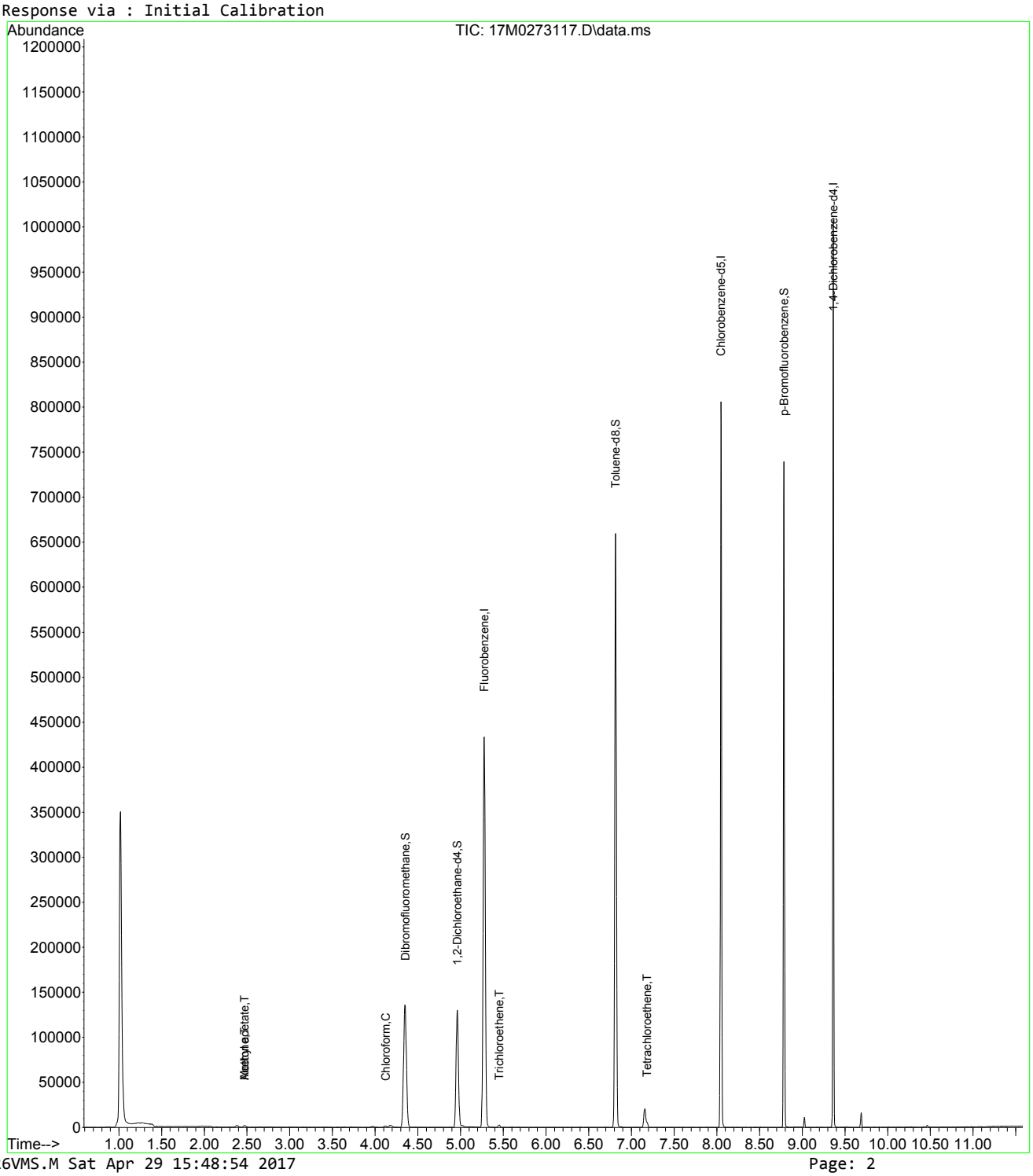
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	371071	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	272724	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	130209	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.354	111	98599	24.6037	ug/L	0.0146
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.415%			
34) 1,2-Dichloroethane-d4	4.962	65	95199	25.3438	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.375%			
47) Toluene-d8	6.815	98	349841	25.7034	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.814%			
66) p-Bromofluorobenzene	8.786	95	116853	26.8027	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.211%			
Target Compounds						Qvalue
16) Acetone	2.469	43	1943	2.6042	ug/L	90
18) Methyl acetate	2.469	43	1943	0.9934	ug/L #	60
27) Chloroform	4.125	83	1585	0.2169	ug/L #	83
37) Trichloroethene	5.451	130	915	0.1927	ug/L	81
49) Tetrachloroethene	7.182	166	1272	0.2608	ug/L	95

(#) = qualifier out of range (m) = manual integration (+) = signals summed

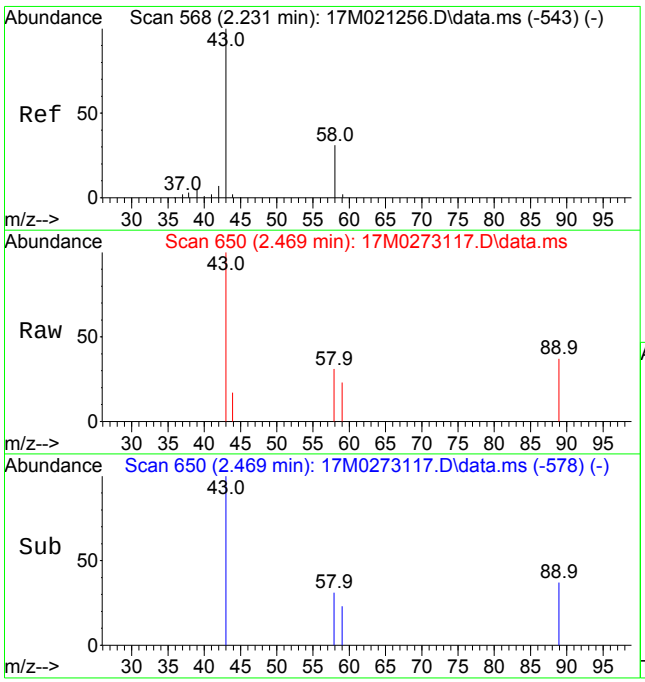
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273117.D Vial: 14
Acq On : 28 Apr 2017 17:10 Operator: ADC
Sample : L17041200-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:53 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



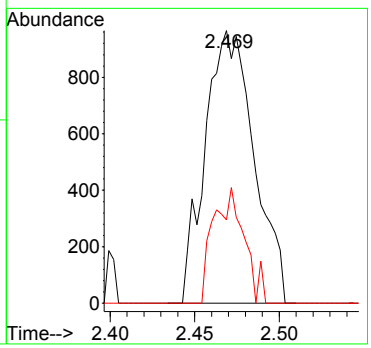
826VMS.M Sat Apr 29 15:48:54 2017 Page: 2

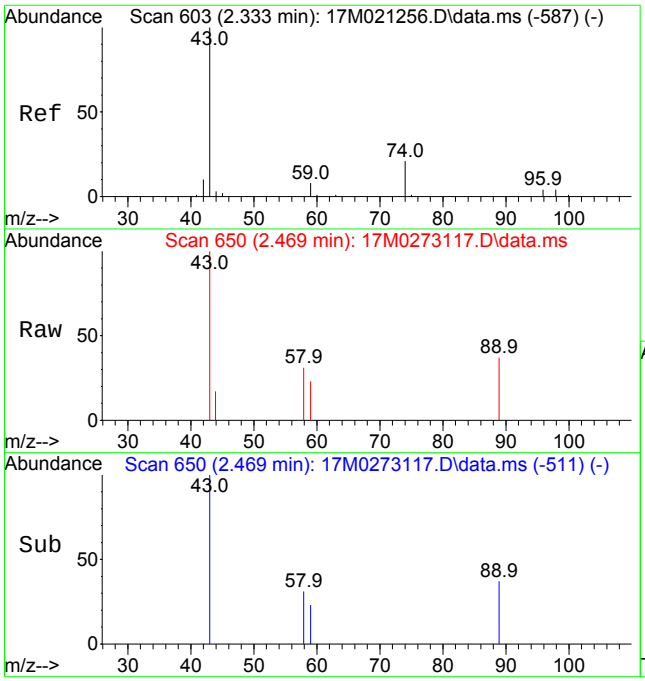


#16
Acetone
Concen: 2.6042 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273117.D
Acq: 28 Apr 2017 17:10

Tgt Ion: 43 Resp: 1943

Ion	Ratio	Lower	Upper
43	100		
58	26.6	19.4	45.2

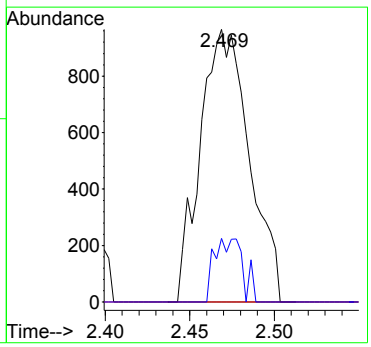


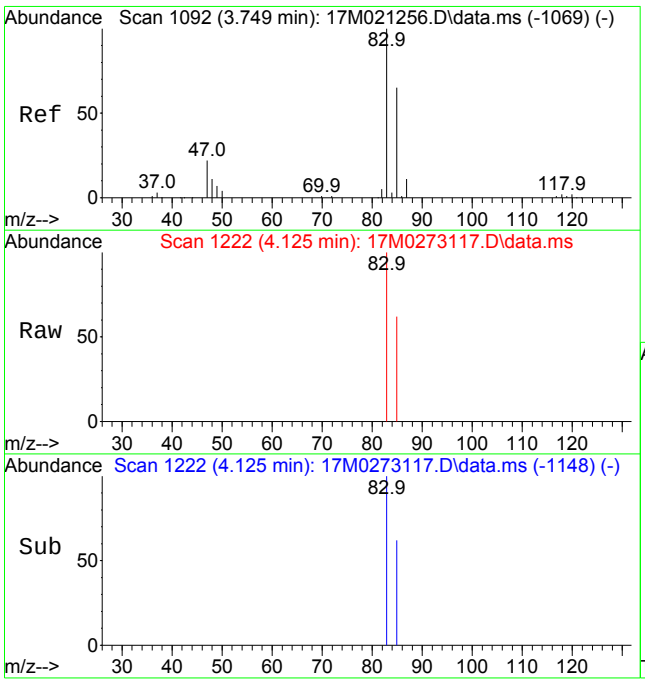


#18
Methyl acetate
Concen: 0.9934 ug/L
RT: 2.469 min Scan# 650
Delta R.T. -0.098 min
Lab File: 17M0273117.D
Acq: 28 Apr 2017 17:10

Tgt Ion: 43 Resp: 1943

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	13.5	7.6	11.4#

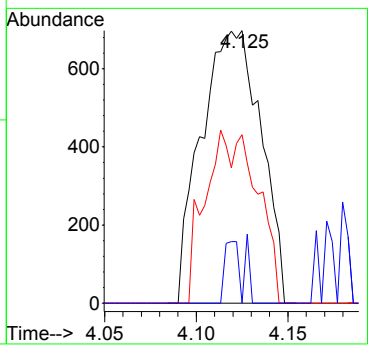


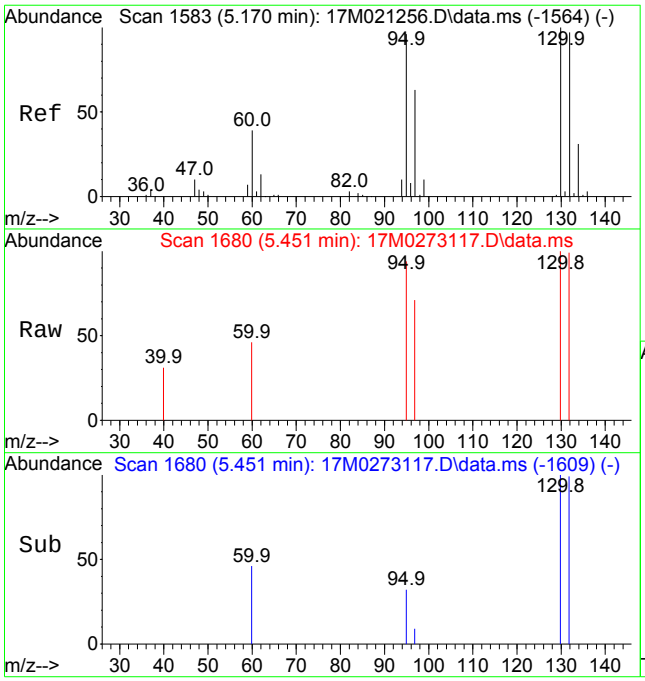


#27
Chloroform
Concen: 0.2169 ug/L
RT: 4.125 min Scan# 1222
Delta R.T. 0.015 min
Lab File: 17M0273117.D
Acq: 28 Apr 2017 17:10

Tgt Ion: 83 Resp: 1585

Ion	Ratio	Lower	Upper
83	100		
85	55.0	39.2	91.4
47	7.1	12.9	30.1#

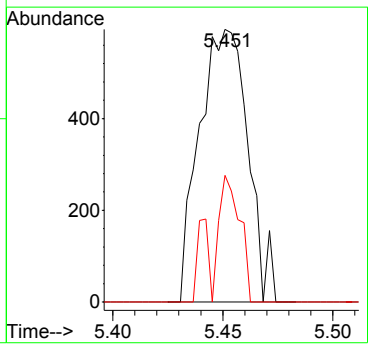


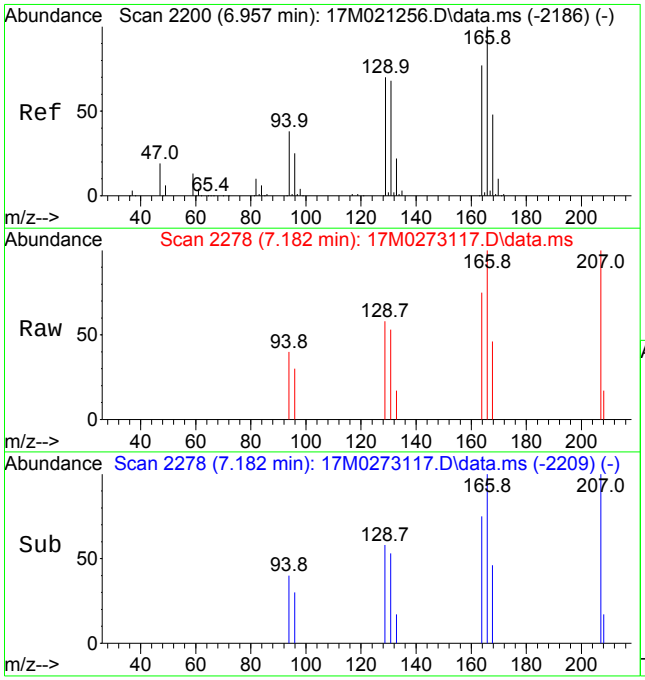


#37
Trichloroethene
Concen: 0.1927 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273117.D
Acq: 28 Apr 2017 17:10

Tgt Ion:130 Resp: 915

Ion	Ratio	Lower	Upper
130	100		
60	26.8	22.9	53.3

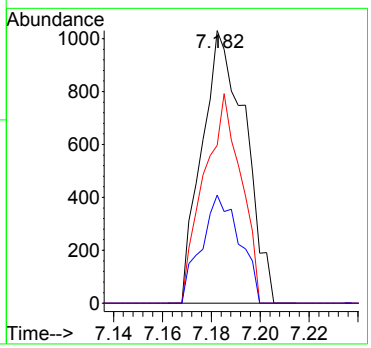




#49
Tetrachloroethene
Concen: 0.2608 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273117.D
Acq: 28 Apr 2017 17:10

Tgt Ion:166 Resp: 1272

Ion	Ratio	Lower	Upper
166	100		
129	65.6	56.2	84.4
94	35.1	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273118.D Vial: 15
Acq On : 28 Apr 2017 17:30 Operator: ADC
Sample : L17041200-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

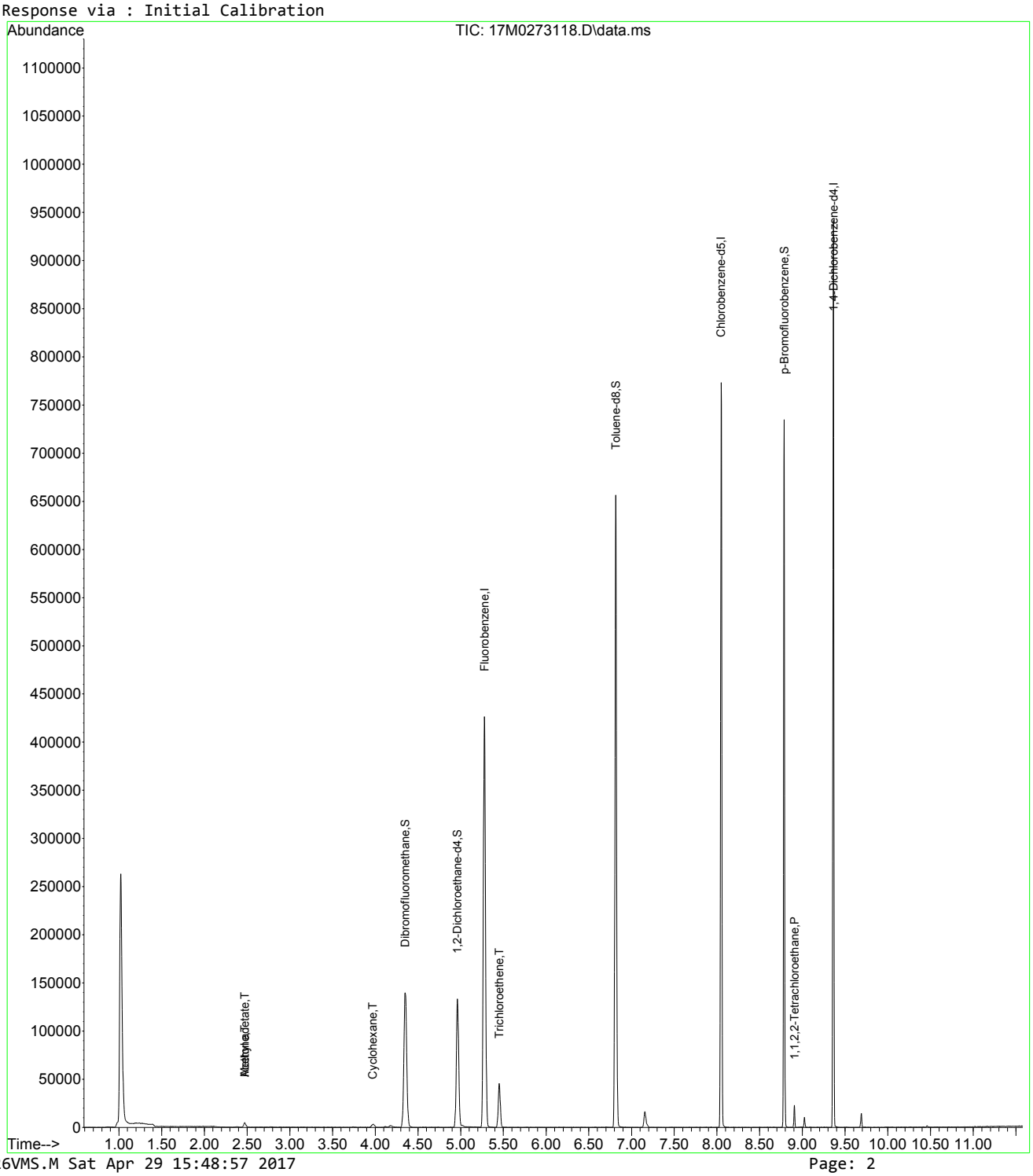
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	365542	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	265932	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	125926	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	100569	25.4748	ug/L	0.0118
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.899%			
34) 1,2-Dichloroethane-d4	4.962	65	95845	25.9018	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.607%			
47) Toluene-d8	6.815	98	349415	26.3278	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.311%			
66) p-Bromofluorobenzene	8.787	95	116686	27.6747	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.699%			
Target Compounds						Qvalue
16) Acetone	2.472	43	5323	7.2424	ug/L	93
18) Methyl acetate	2.472	43	5322	2.7620	ug/L #	60
25) Cyclohexane	3.969	56	921	0.1568	ug/L #	24
37) Trichloroethene	5.451	130	14974	3.2018	ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.905	83	5702	1.6833	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

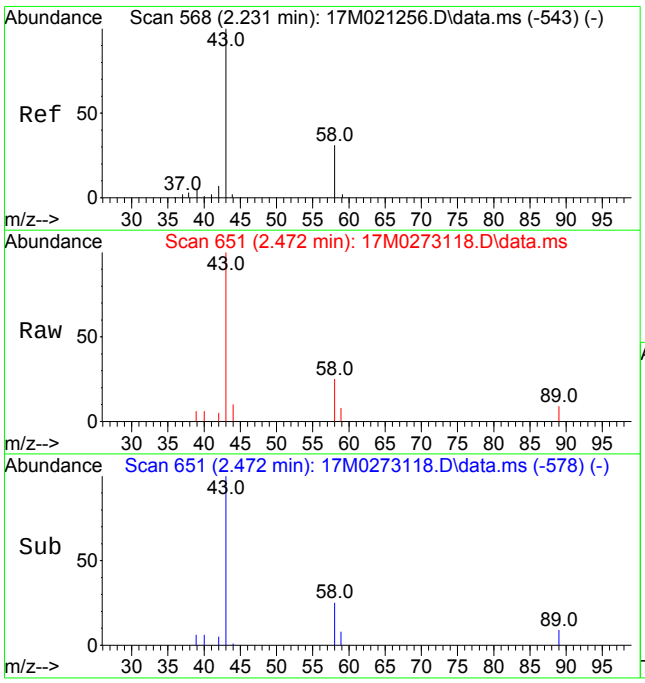
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273118.D Vial: 15
Acq On : 28 Apr 2017 17:30 Operator: ADC
Sample : L17041200-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



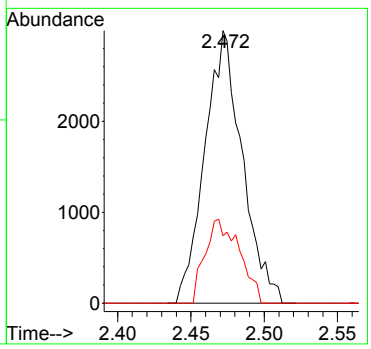
826VMS.M Sat Apr 29 15:48:57 2017 Page: 2

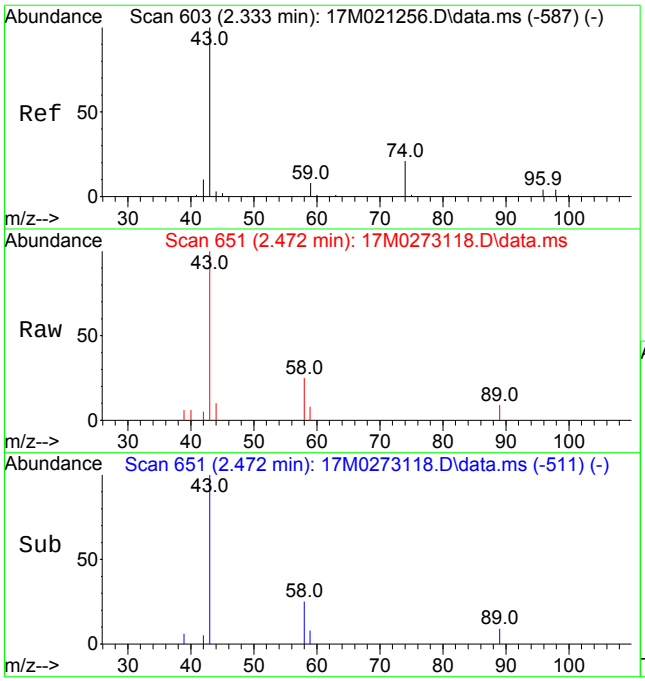


#16
Acetone
Concen: 7.2424 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273118.D
Acq: 28 Apr 2017 17:30

Tgt Ion: 43 Resp: 5323

Ion	Ratio	Lower	Upper
43	100		
58	28.3	19.4	45.2

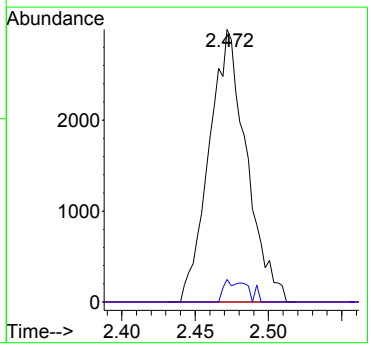


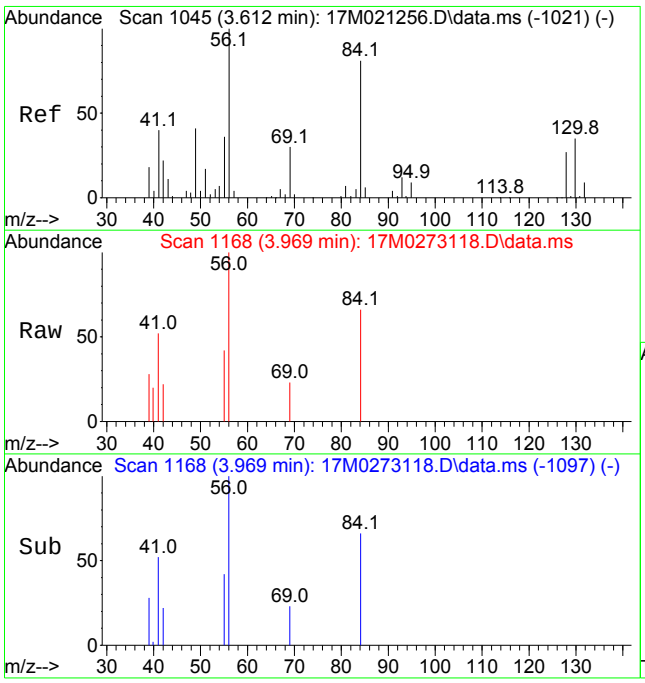


#18
Methyl acetate
Concen: 2.7620 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273118.D
Acq: 28 Apr 2017 17:30

Tgt Ion: 43 Resp: 5322

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	5.1	7.6	11.4#

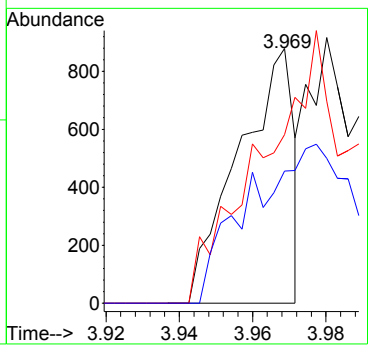


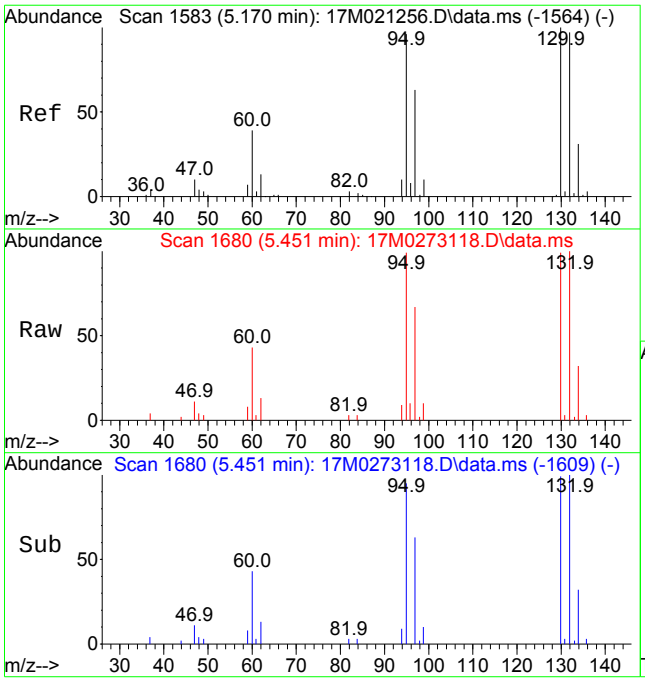


#25
Cyclohexane
Concen: 0.1568 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273118.D
Acq: 28 Apr 2017 17:30

Tgt Ion: 56 Resp: 921

Ion	Ratio	Lower	Upper
56	100		
84	194.0	69.4	104.0#
41	124.9	72.2	108.2#

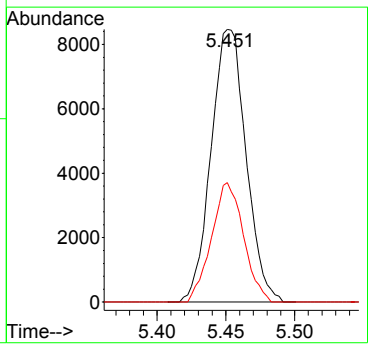


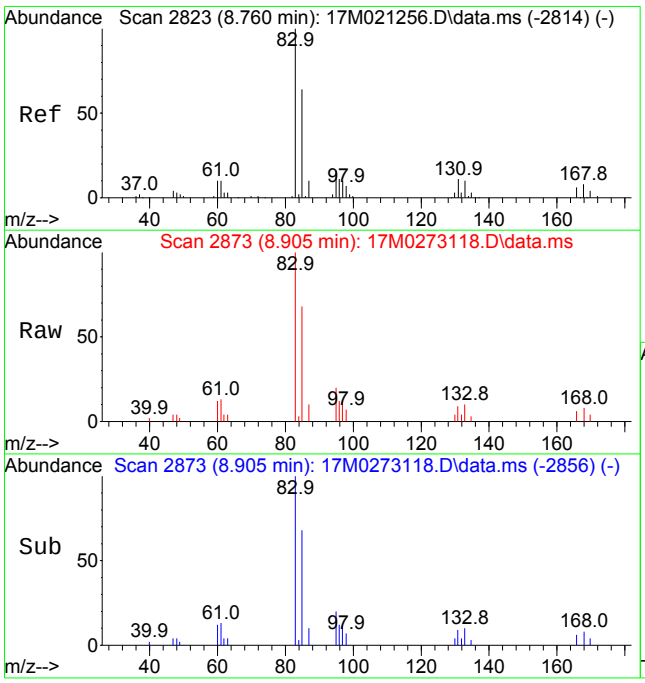


#37
Trichloroethene
Concen: 3.2018 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273118.D
Acq: 28 Apr 2017 17:30

Tgt Ion:130 Resp: 14974

Ion	Ratio	Lower	Upper
130	100		
60	40.0	22.9	53.3

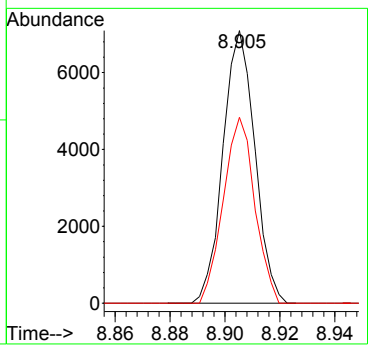




#69
1,1,2,2-Tetrachloroethane
Concen: 1.6833 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273118.D
Acq: 28 Apr 2017 17:30

Tgt Ion: 83 Resp: 5702

Ion	Ratio	Lower	Upper
83	100		
85	67.2	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273119.D Vial: 16
Acq On : 28 Apr 2017 17:50 Operator: ADC
Sample : L17041200-41 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:59 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

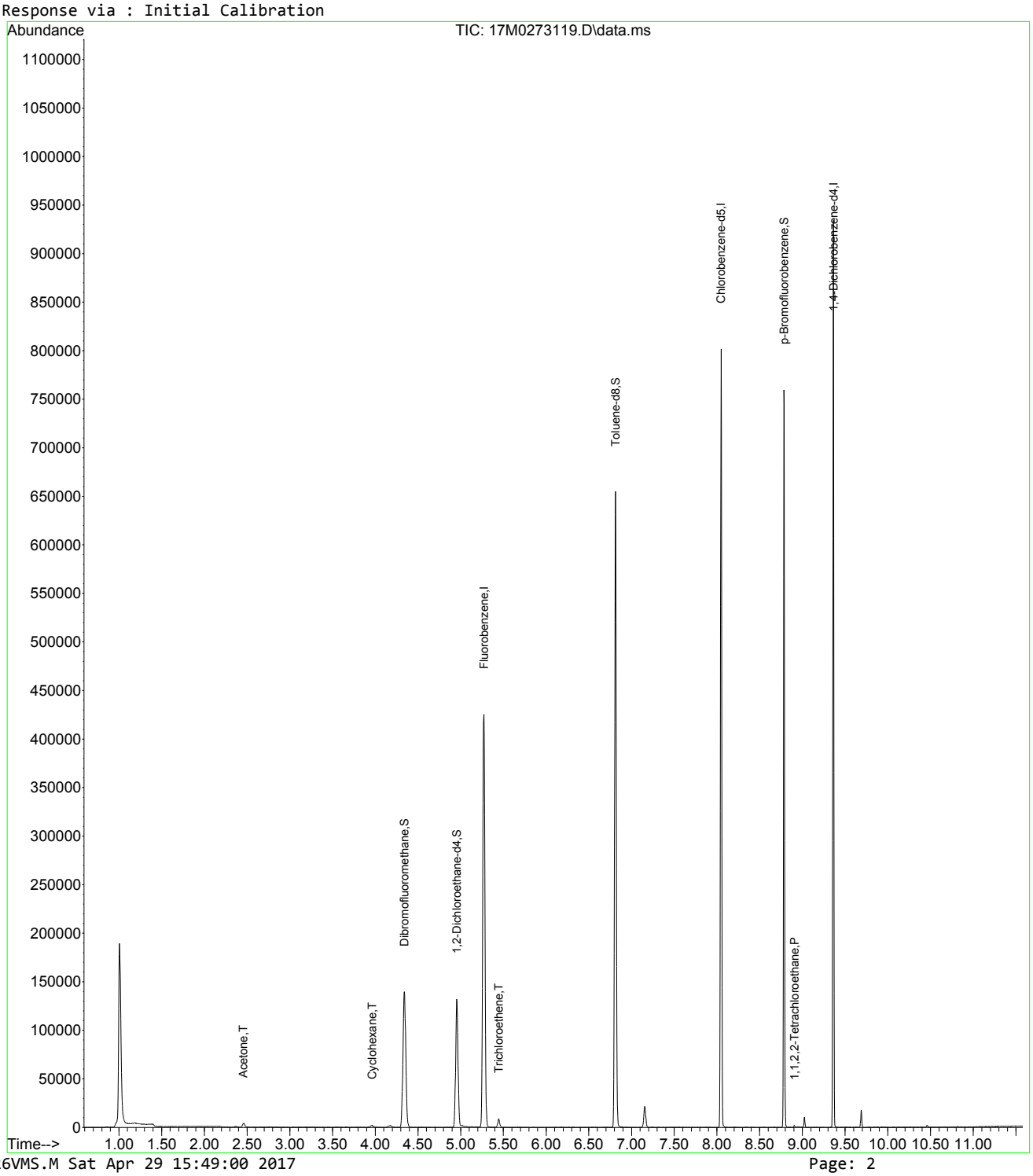
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	370445	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	271244	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	126866	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	101047	25.2572	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.029%			
34) 1,2-Dichloroethane-d4	4.953	65	96017	25.6048	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.419%			
47) Toluene-d8	6.812	98	354568	26.1928	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.771%			
66) p-Bromofluorobenzene	8.783	95	119045	28.0250	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 112.100%			
Target Compounds						Qvalue
16) Acetone	2.454	43	4909	6.5907	ug/L	96
25) Cyclohexane	3.963	56	1396	0.2345	ug/L #	81
37) Trichloroethene	5.445	130	2773	0.5851	ug/L	98
69) 1,1,2,2-Tetrachloroethane	8.905	83	845	0.2476	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

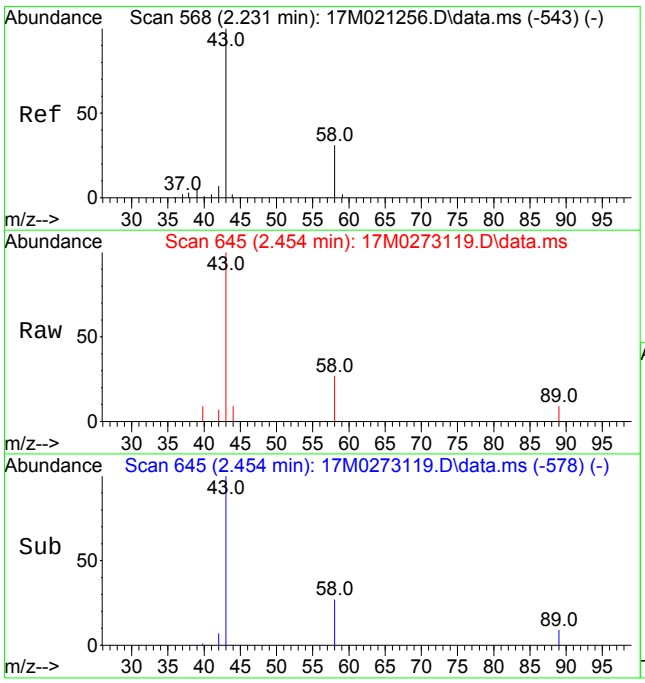
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273119.D Vial: 16
Acq On : 28 Apr 2017 17:50 Operator: ADC
Sample : L17041200-41 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:48:59 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



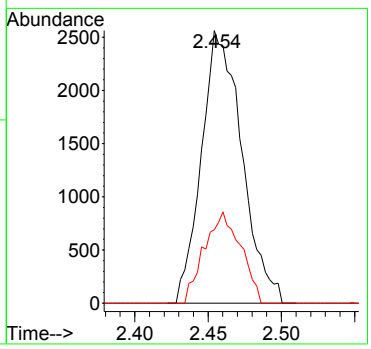
826VMS.M Sat Apr 29 15:49:00 2017 Page: 2

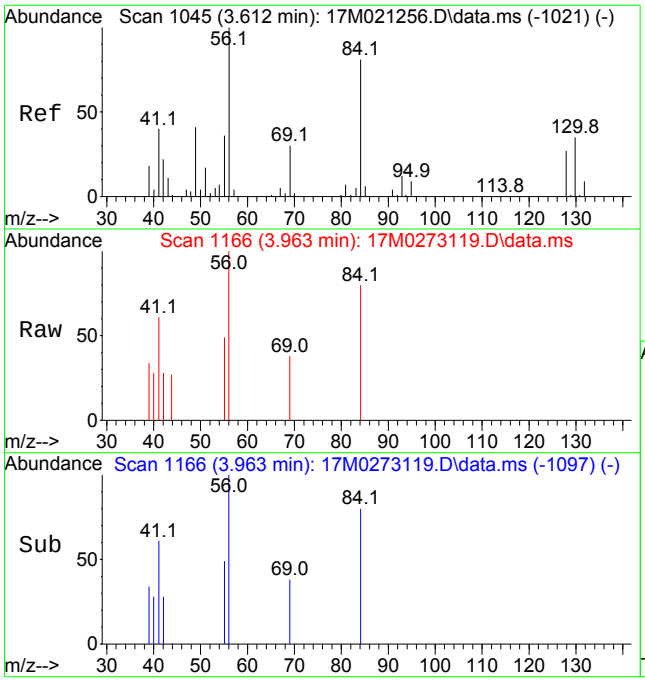


#16
Acetone
Concen: 6.5907 ug/L
RT: 2.454 min Scan# 645
Delta R.T. -0.006 min
Lab File: 17M0273119.D
Acq: 28 Apr 2017 17:50

Tgt Ion: 43 Resp: 4909

Ion	Ratio	Lower	Upper
43	100		
58	30.1	19.4	45.2

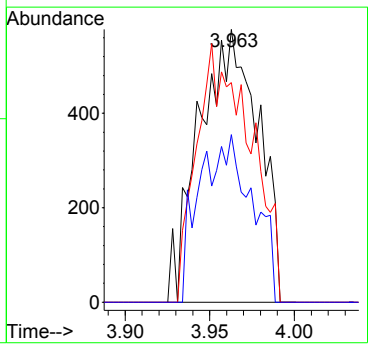


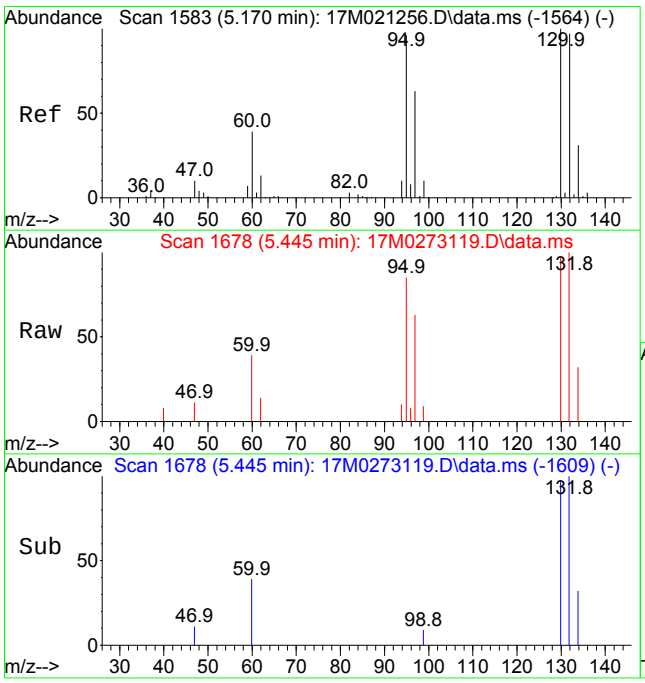


#25
Cyclohexane
Concen: 0.2345 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273119.D
Acq: 28 Apr 2017 17:50

Tgt Ion: 56 Resp: 1396

Ion	Ratio	Lower	Upper
56	100		
84	86.5	69.4	104.0
41	55.0	72.2	108.2#

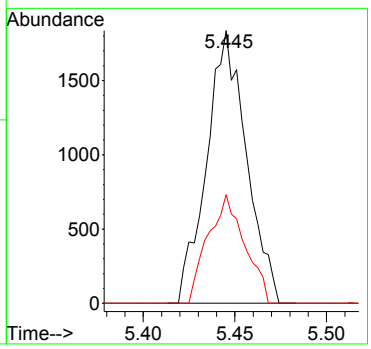


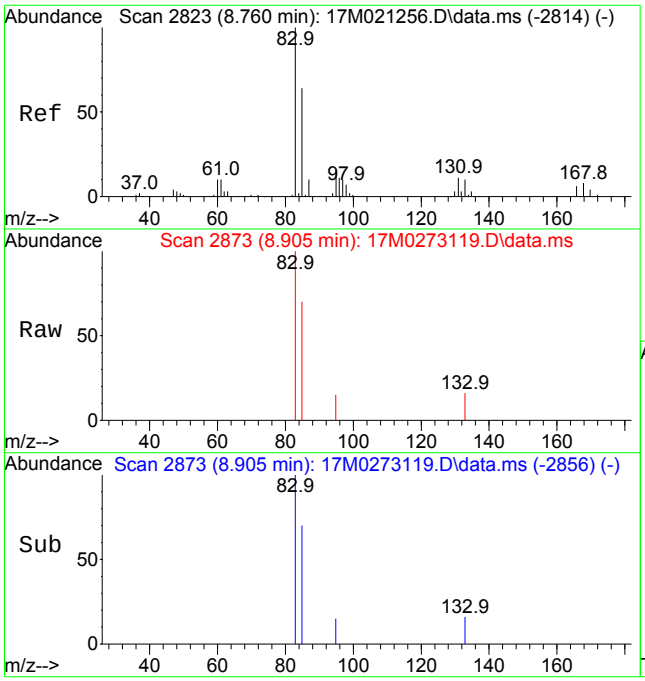


#37
Trichloroethene
Concen: 0.5851 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273119.D
Acq: 28 Apr 2017 17:50

Tgt Ion:130 Resp: 2773

Ion	Ratio	Lower	Upper
130	100		
60	36.7	22.9	53.3

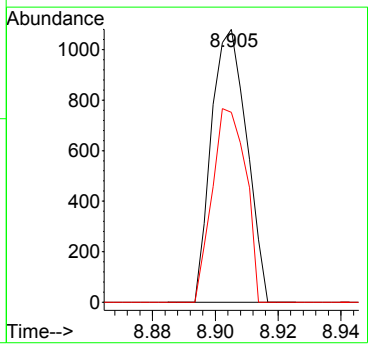




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2476 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273119.D
Acq: 28 Apr 2017 17:50

Tgt Ion: 83 Resp: 845

Ion	Ratio	Lower	Upper
83	100		
85	67.6	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273120.D Vial: 17
Acq On : 28 Apr 2017 18:09 Operator: ADC
Sample : L17041200-42 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

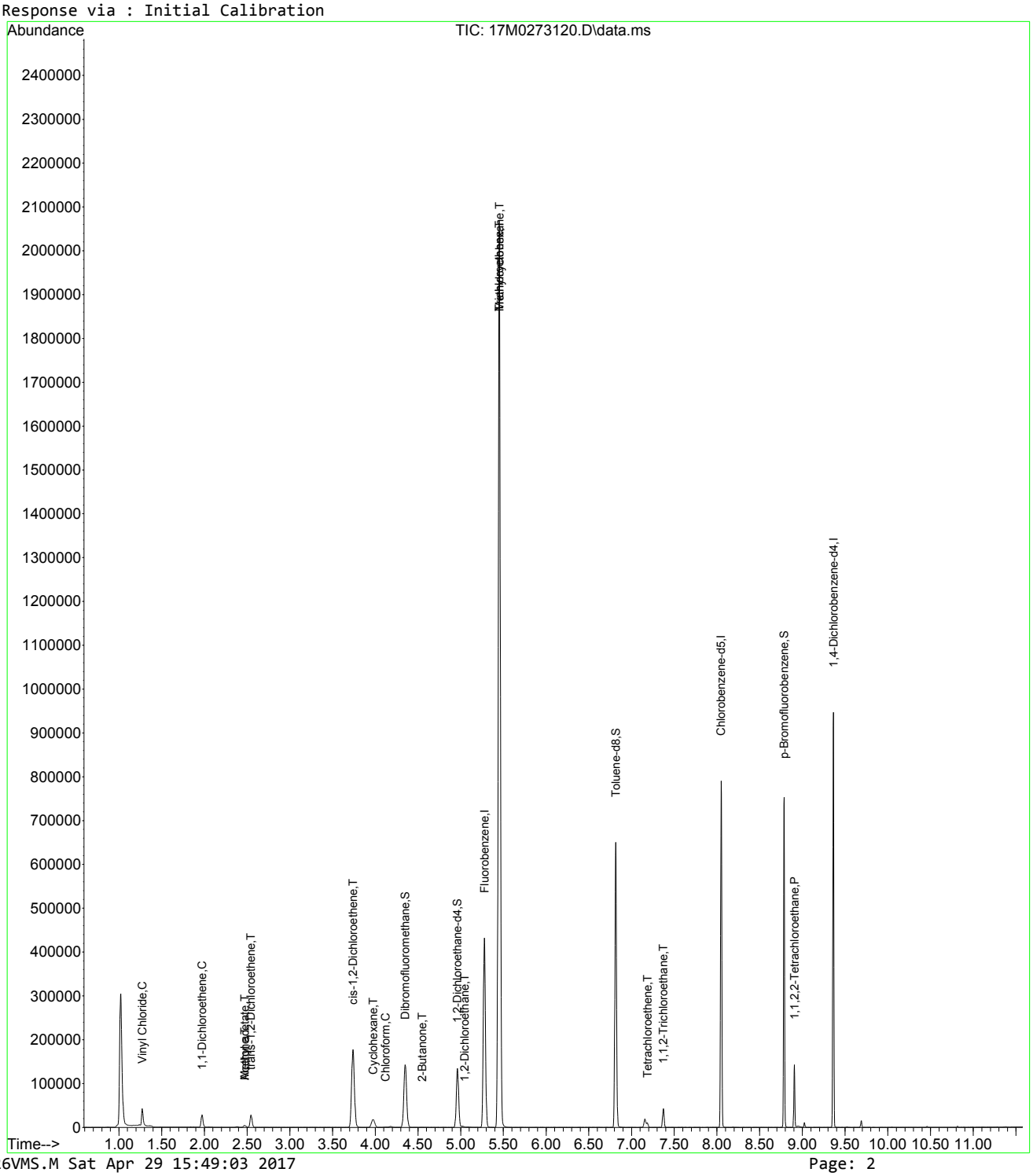
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.277	96	368594	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	268976	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129185	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.351	111	101634	25.5314 ug/L	0.0118
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.126%		
34) 1,2-Dichloroethane-d4	4.962	65	96831	25.9515 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.806%		
47) Toluene-d8	6.815	98	352291	26.2441 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.976%		
66) p-Bromofluorobenzene	8.784	95	121029	27.9806 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.922%		
Target Compounds					Qvalue
4) Vinyl Chloride	1.273	62	29980	6.3198 ug/L	99
10) 1,1-Dichloroethene	1.971	61	14675	2.5775 ug/L	98
16) Acetone	2.472	43	5459	7.3659 ug/L	99
17) trans-1,2-Dichloroethene	2.544	96	10695	2.7587 ug/L	100
18) Methyl acetate	2.472	43	5459	2.8097 ug/L #	60
23) cis-1,2-Dichloroethene	3.740	96	99355	22.6409 ug/L	99
25) Cyclohexane	3.974	56	11658	1.9684 ug/L #	81
27) Chloroform	4.119	83	923	0.1271 ug/L	91
32) 2-Butanone	4.548	43	202	0.1828 ug/L #	37
35) 1,2-Dichloroethane	5.046	62	652	0.1334 ug/L #	1
36) Methylcyclohexane	5.454	83	7203	1.1608 ug/L #	1
37) Trichloroethene	5.451	130	665148	141.0463 ug/L	99
49) Tetrachloroethene	7.188	166	2476	0.5148 ug/L	98
50) 1,1,2-Trichloroethane	7.371	97	10696	3.2723 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	35163	10.1189 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

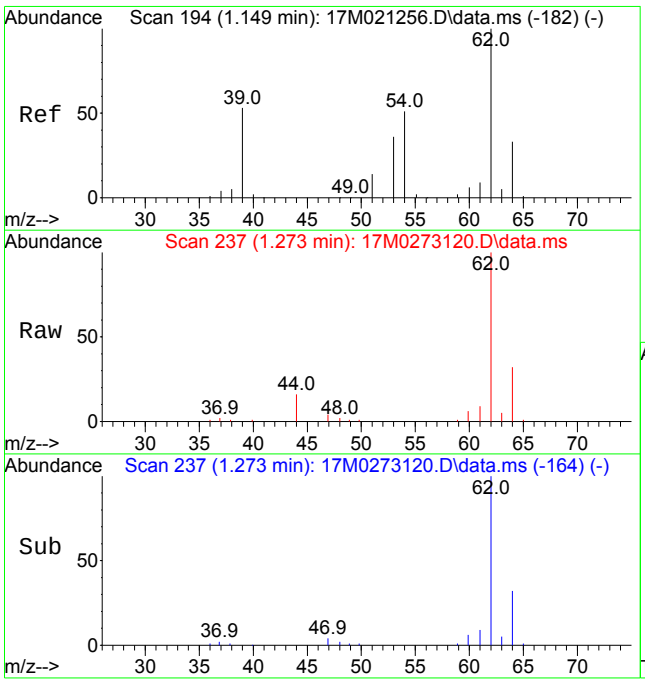
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273120.D Vial: 17
Acq On : 28 Apr 2017 18:09 Operator: ADC
Sample : L17041200-42 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



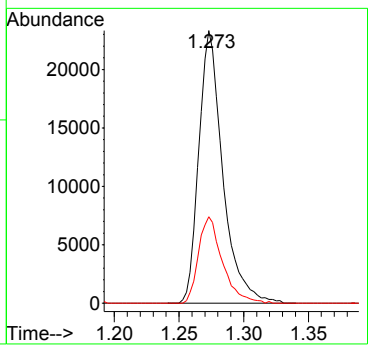
826VMS.M Sat Apr 29 15:49:03 2017 Page: 2

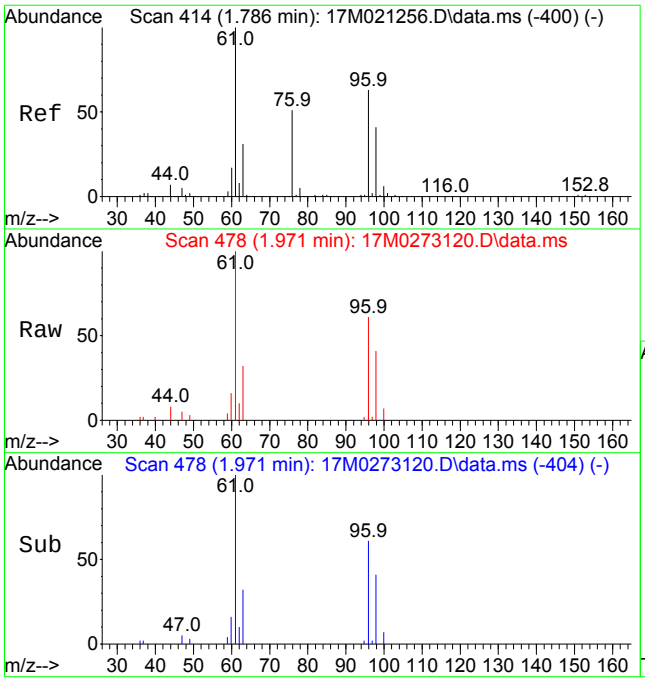


#4
Vinyl Chloride
Concen: 6.3198 ug/L
RT: 1.273 min Scan# 237
Delta R.T. 0.012 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 62 Resp: 29980

Ion	Ratio	Lower	Upper
62	100		
64	31.7	19.2	44.8

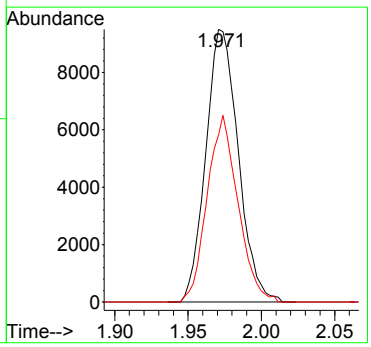


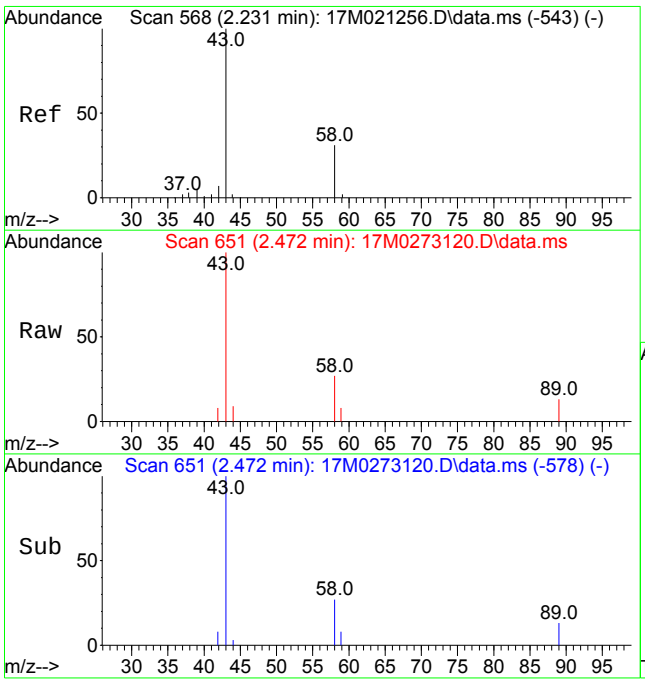


#10
1,1-Dichloroethene
Concen: 2.5775 ug/L
RT: 1.971 min Scan# 478
Delta R.T. 0.015 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 61 Resp: 14675

Ion	Ratio	Lower	Upper
61	100		
96	64.7	52.9	79.3

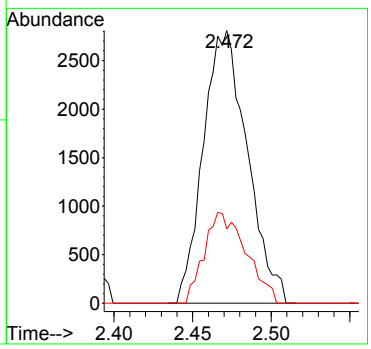


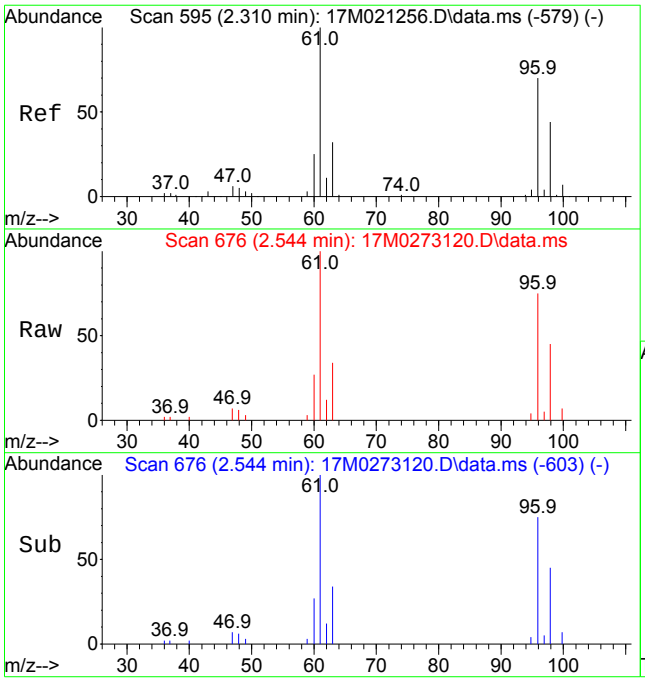


#16
Acetone
Concen: 7.3659 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 43 Resp: 5459

Ion	Ratio	Lower	Upper
43	100		
58	31.7	19.4	45.2

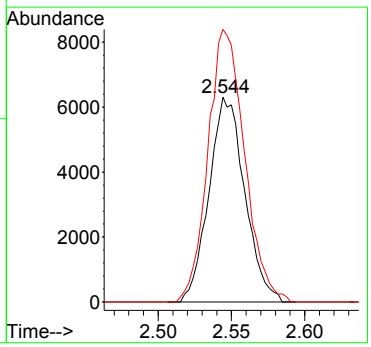


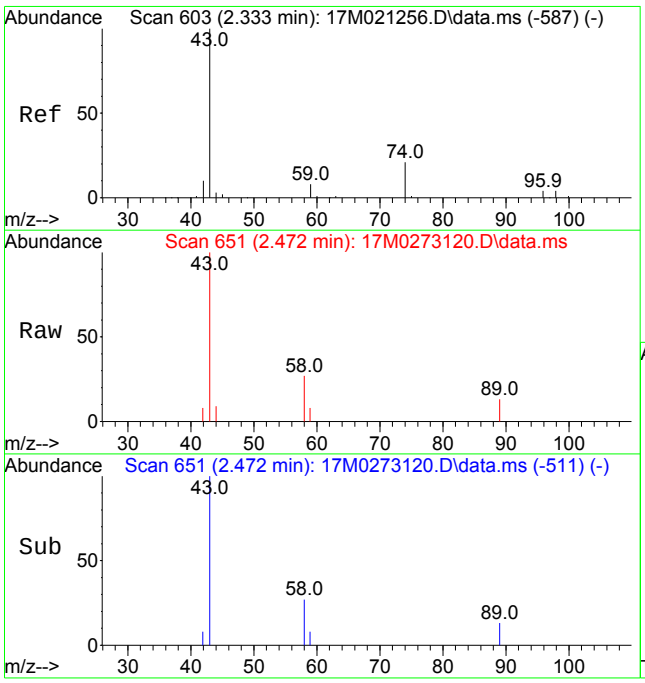


#17
trans-1,2-Dichloroethene
Concen: 2.7587 ug/L
RT: 2.544 min Scan# 676
Delta R.T. 0.012 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 96 Resp: 10695

Ion	Ratio	Lower	Upper
96	100		
61	136.6	109.4	164.0

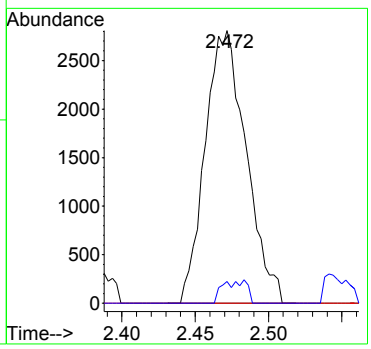


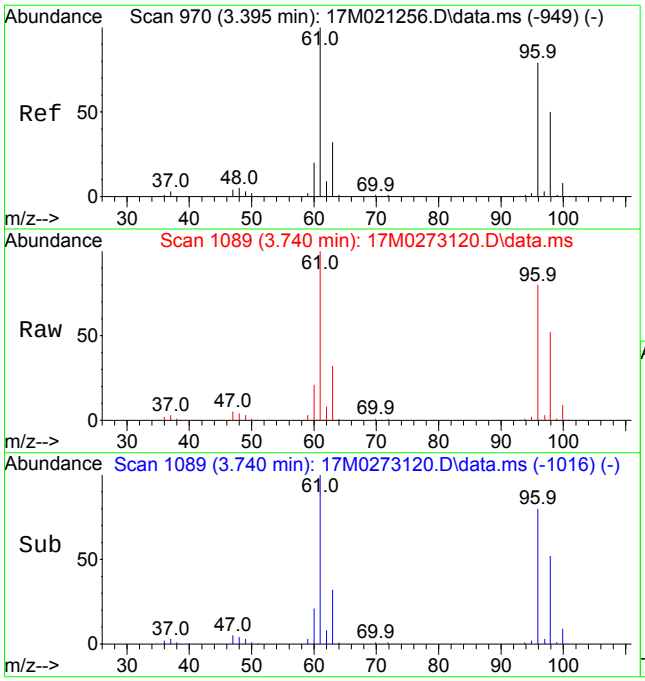


#18
Methyl acetate
Concen: 2.8097 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 43 Resp: 5459

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	5.0	7.6	11.4#

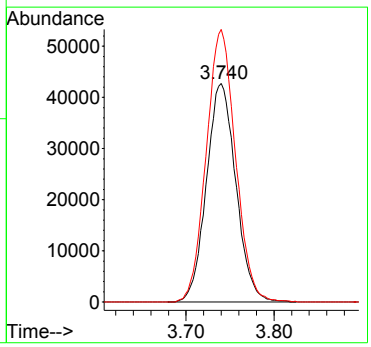


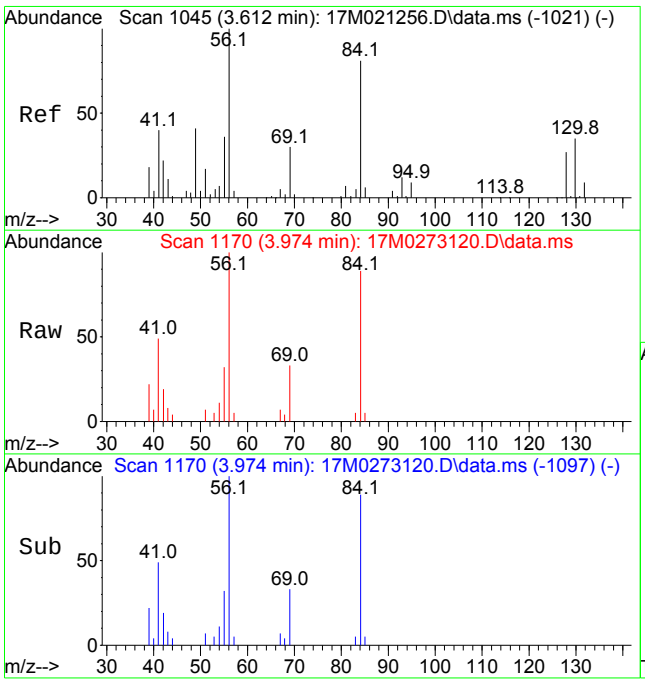


#23
cis-1,2-Dichloroethene
Concen: 22.6409 ug/L
RT: 3.740 min Scan# 1089
Delta R.T. 0.012 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 96 Resp: 99355

Ion	Ratio	Lower	Upper
96	100		
61	124.1	98.1	147.1

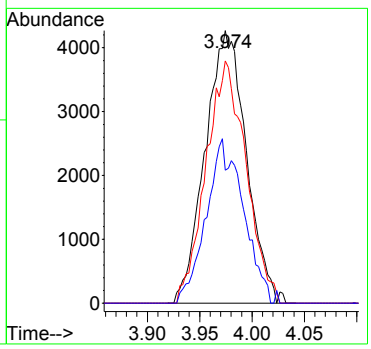


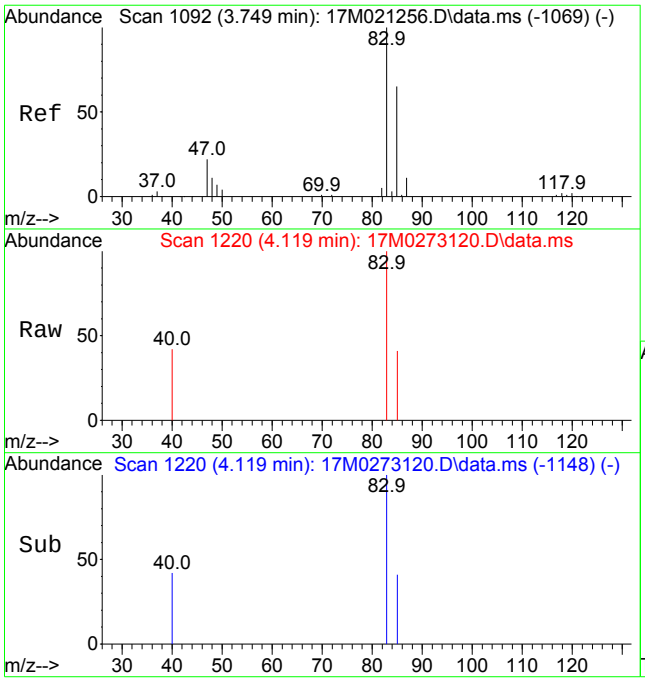


#25
Cyclohexane
Concen: 1.9684 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 56 Resp: 11658

Ion	Ratio	Lower	Upper
56	100		
84	86.5	69.4	104.0
41	54.8	72.2	108.2#

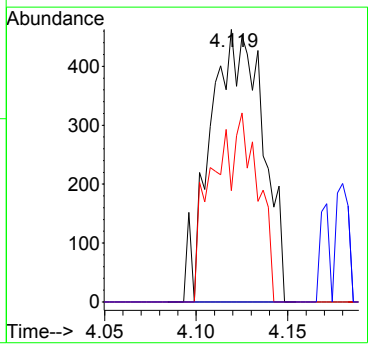


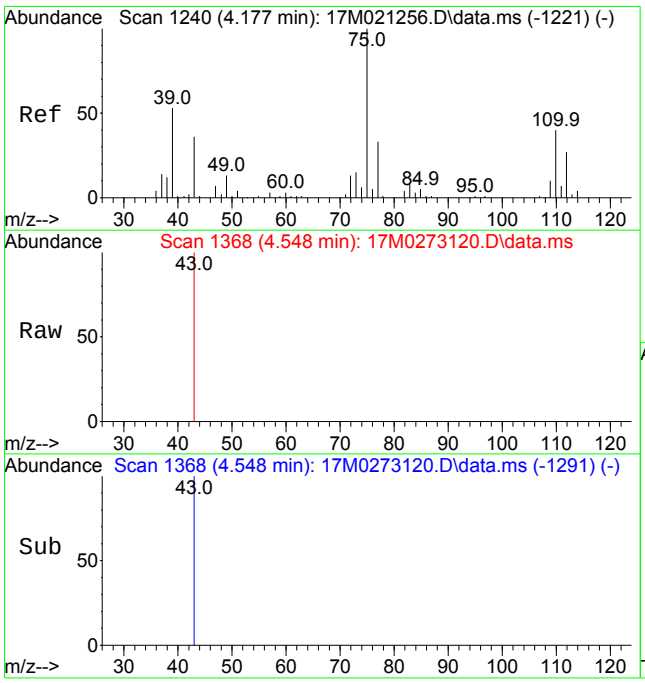


#27
Chloroform
Concen: 0.1271 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 83 Resp: 923

Ion	Ratio	Lower	Upper
83	100		
85	59.2	39.2	91.4
47	16.4	12.9	30.1

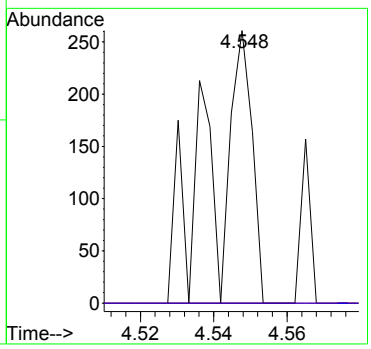


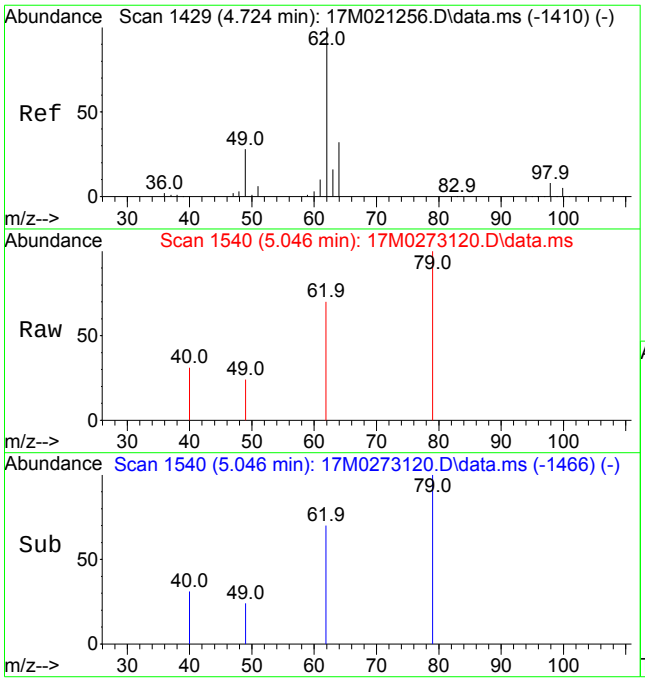


#32
2-Butanone
Concen: 0.1828 ug/L
RT: 4.548 min Scan# 1368
Delta R.T. 0.024 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 43 Resp: 202

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

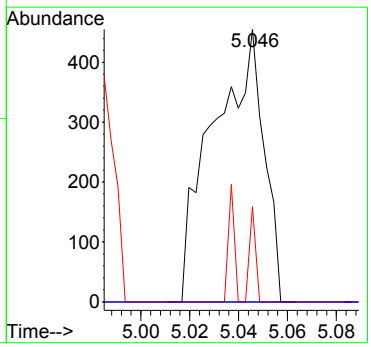


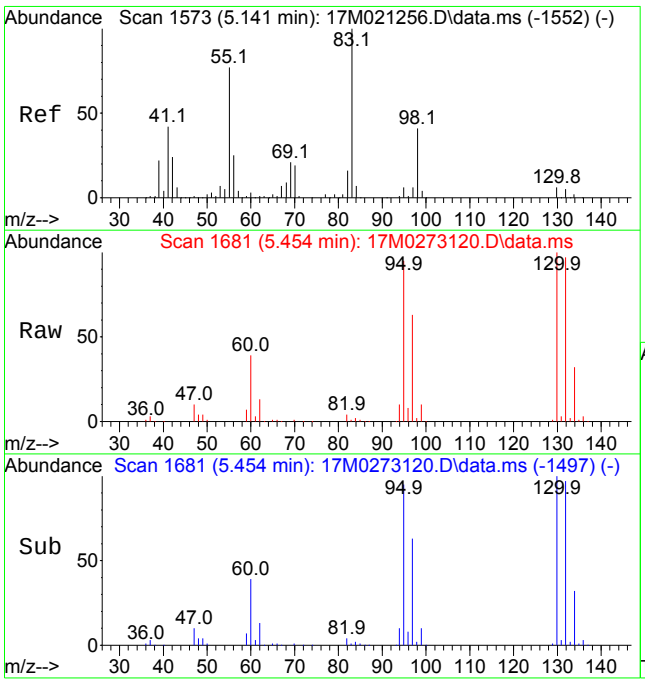


#35
1,2-Dichloroethane
Concen: 0.1334 ug/L
RT: 5.046 min Scan# 1540
Delta R.T. 0.015 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 62 Resp: 652

Ion	Ratio	Lower	Upper
62	100		
49	536.5	15.9	37.1#
98	0.0	5.2	12.0#

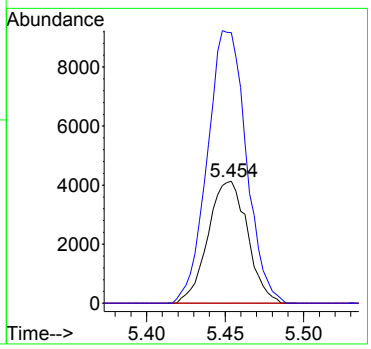


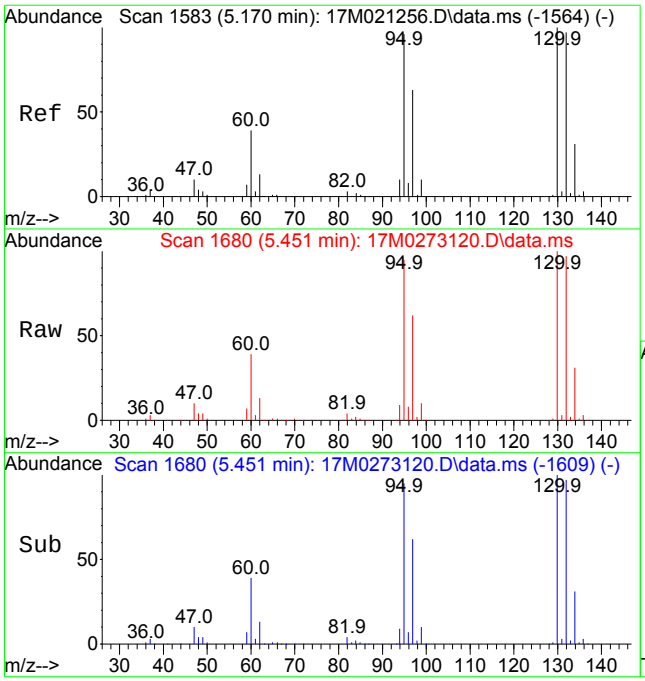


#36
Methylcyclohexane
Concen: 1.1608 ug/L
RT: 5.454 min Scan# 1681
Delta R.T. 0.032 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 83 Resp: 7203

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	220.2	34.4	51.6#

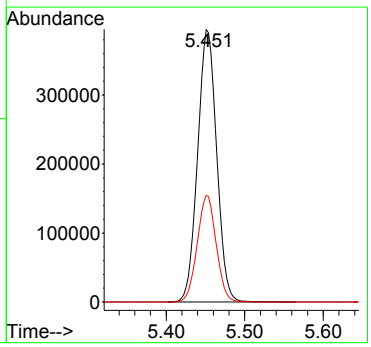


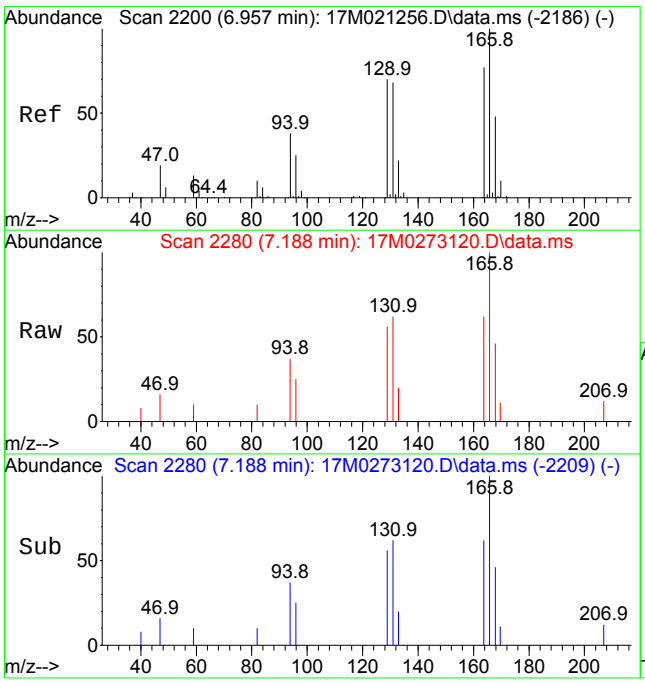


#37
Trichloroethene
Concen: 141.0463 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion:130 Resp: 665148

Ion	Ratio	Lower	Upper
130	100		
60	38.9	22.9	53.3

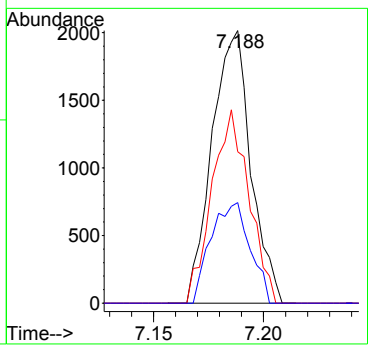


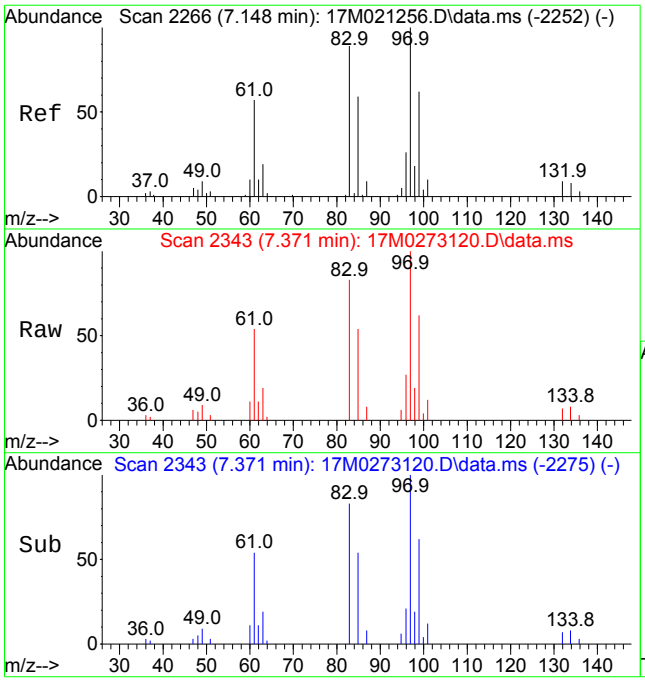


#49
Tetrachloroethene
Concen: 0.5148 ug/L
RT: 7.188 min Scan# 2280
Delta R.T. 0.006 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion:166 Resp: 2476

Ion	Ratio	Lower	Upper
166	100		
129	67.6	56.2	84.4
94	37.2	29.7	44.5

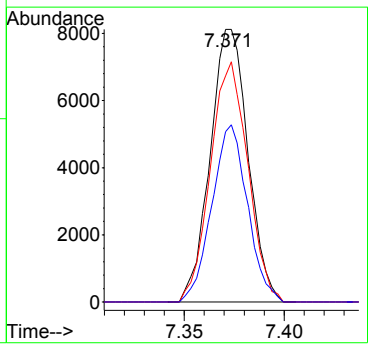


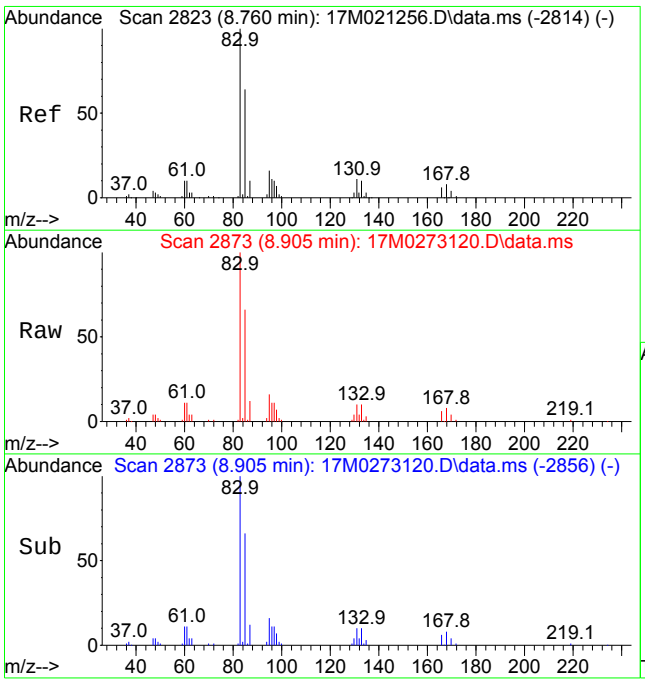


#50
1,1,2-Trichloroethane
Concen: 3.2723 ug/L
RT: 7.371 min Scan# 2343
Delta R.T. -0.002 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 97 Resp: 10696

Ion	Ratio	Lower	Upper
97	100		
83	87.2	52.1	121.7
99	61.3	37.8	88.2

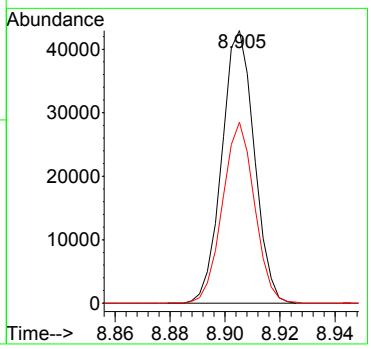




#69
1,1,2,2-Tetrachloroethane
Concen: 10.1189 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273120.D
Acq: 28 Apr 2017 18:09

Tgt Ion: 83 Resp: 35163

Ion	Ratio	Lower	Upper
83	100		
85	65.5	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273121.D Vial: 18
Acq On : 28 Apr 2017 18:29 Operator: ADC
Sample : L17041200-43 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

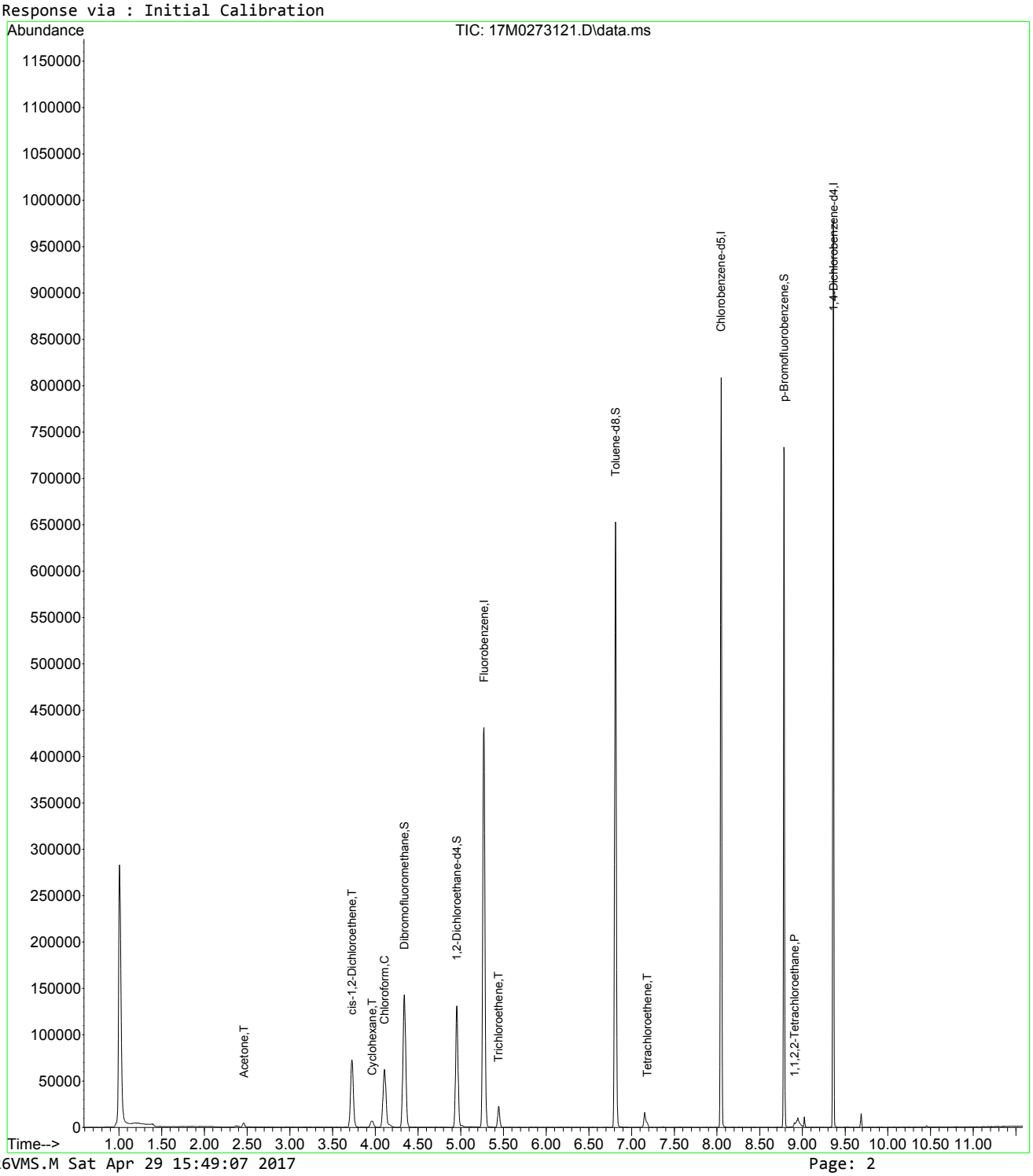
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	371688	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	274266	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	133540	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	101601	25.3107 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.243%		
34) 1,2-Dichloroethane-d4	4.953	65	96536	25.6571 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.628%		
47) Toluene-d8	6.812	98	354093	25.8695 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.478%		
66) p-Bromofluorobenzene	8.783	95	118088	26.4103 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.641%		
Target Compounds					Qvalue
16) Acetone	2.463	43	5270	7.0517 ug/L	97
23) cis-1,2-Dichloroethene	3.728	96	40923	9.2479 ug/L	99
25) Cyclohexane	3.963	56	4709	0.7885 ug/L #	82
27) Chloroform	4.107	83	64768	8.8472 ug/L	98
37) Trichloroethene	5.442	130	7526	1.5826 ug/L	99
49) Tetrachloroethene	7.182	166	1277	0.2604 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.905	83	868	0.2416 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

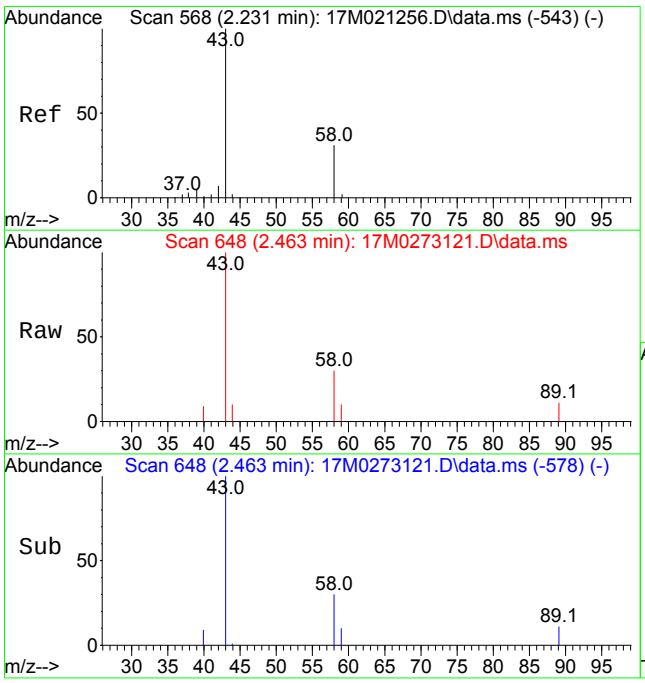
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273121.D Vial: 18
Acq On : 28 Apr 2017 18:29 Operator: ADC
Sample : L17041200-43 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:06 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



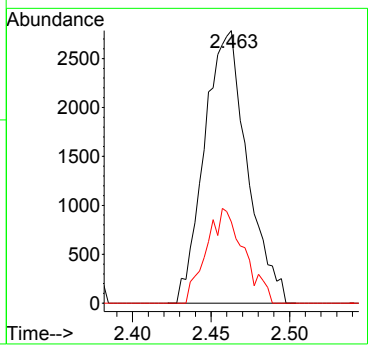
826VMS.M Sat Apr 29 15:49:07 2017 Page: 2

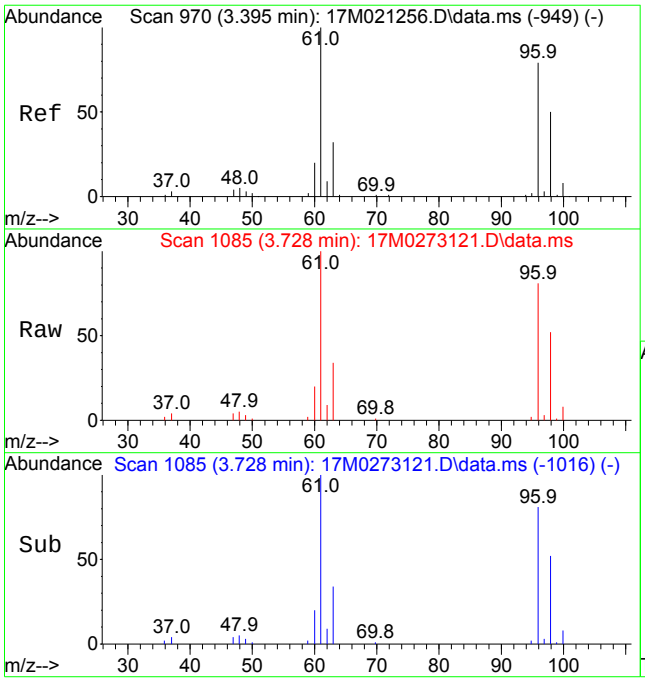


#16
Acetone
Concen: 7.0517 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion: 43 Resp: 5270

Ion	Ratio	Lower	Upper
43	100		
58	30.7	19.4	45.2

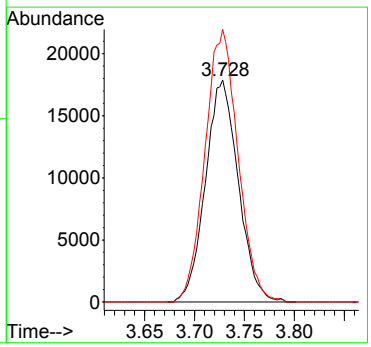


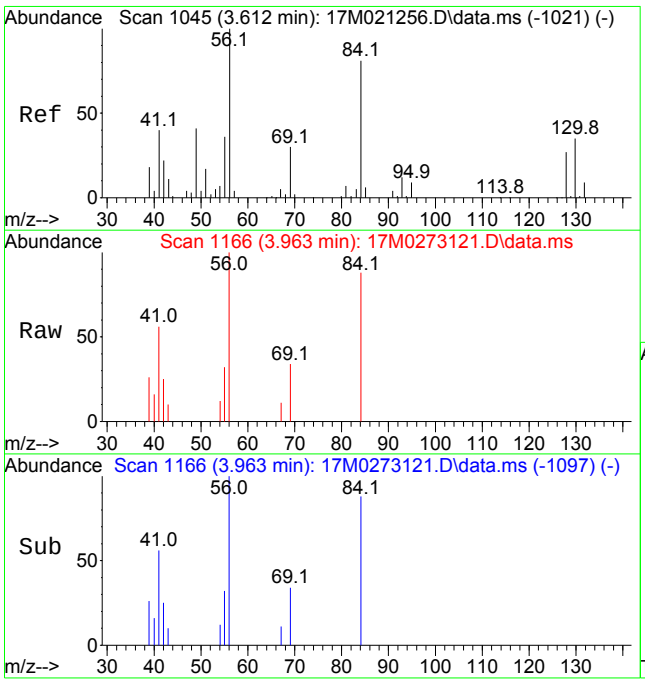


#23
cis-1,2-Dichloroethene
Concen: 9.2479 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion: 96 Resp: 40923

Ion	Ratio	Lower	Upper
96	100		
61	123.6	98.1	147.1

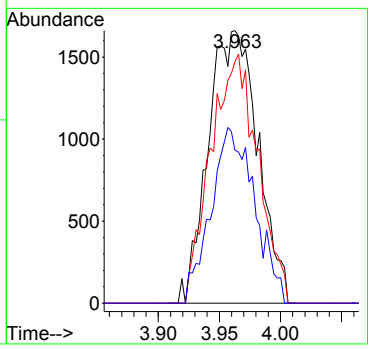


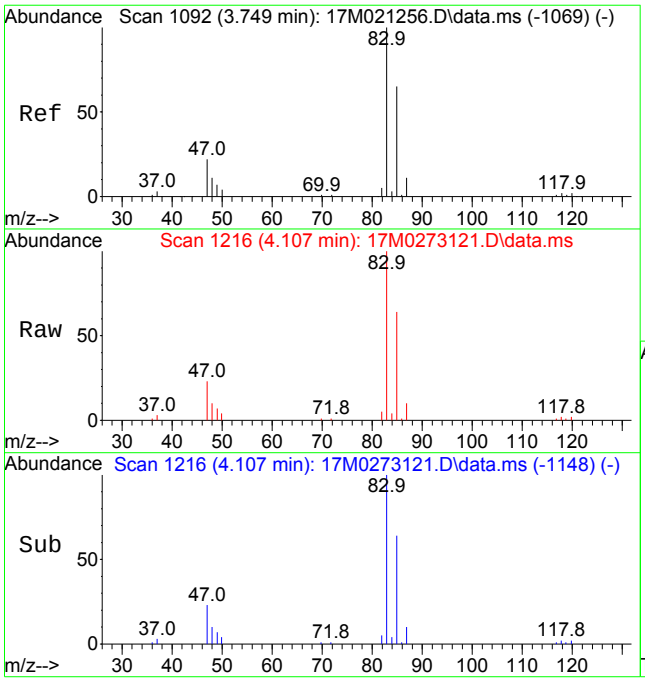


#25
Cyclohexane
Concen: 0.7885 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion: 56 Resp: 4709

Ion	Ratio	Lower	Upper
56	100		
84	86.3	69.4	104.0
41	56.6	72.2	108.2#

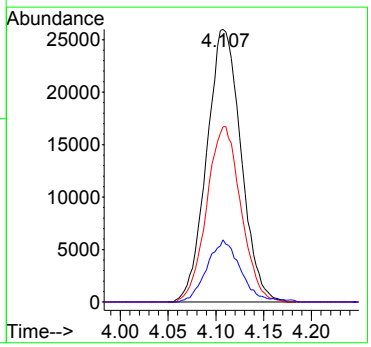


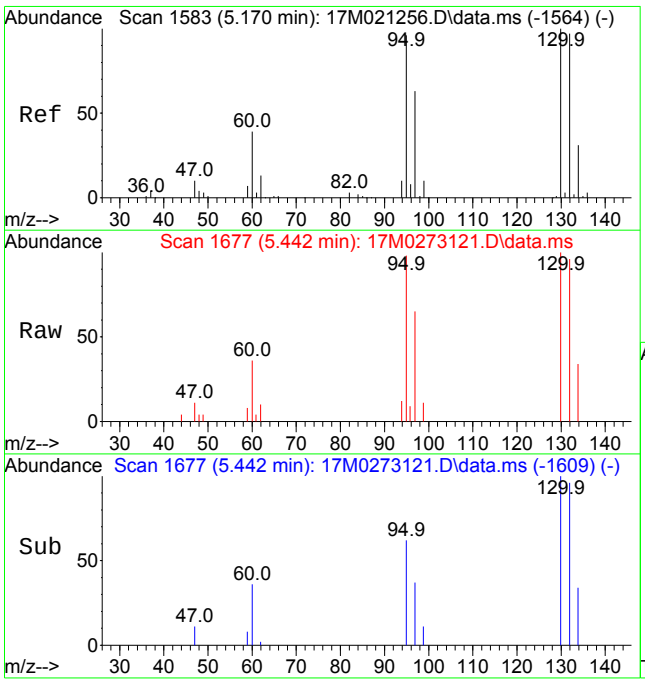


#27
Chloroform
Concen: 8.8472 ug/L
RT: 4.107 min Scan# 1216
Delta R.T. -0.003 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion: 83 Resp: 64768

Ion	Ratio	Lower	Upper
83	100		
85	64.1	39.2	91.4
47	22.4	12.9	30.1

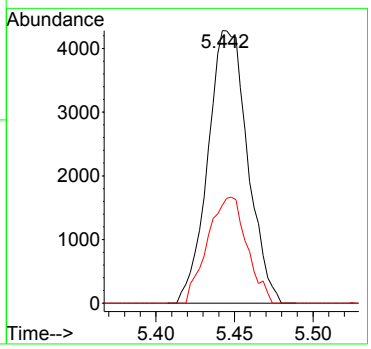


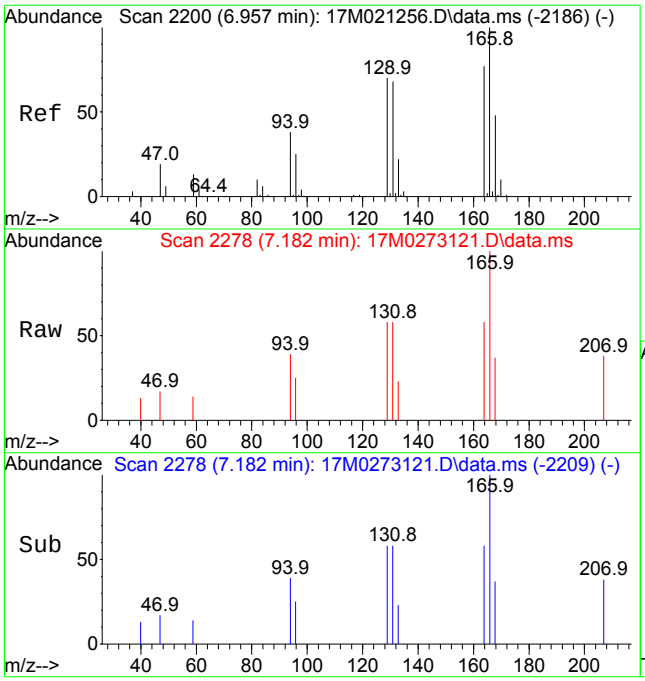


#37
Trichloroethene
Concen: 1.5826 ug/L
RT: 5.442 min Scan# 1677
Delta R.T. -0.003 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion:130 Resp: 7526

Ion	Ratio	Lower	Upper
130	100		
60	38.5	22.9	53.3

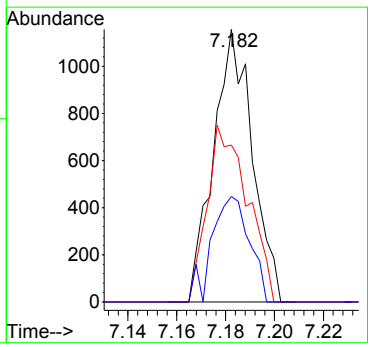


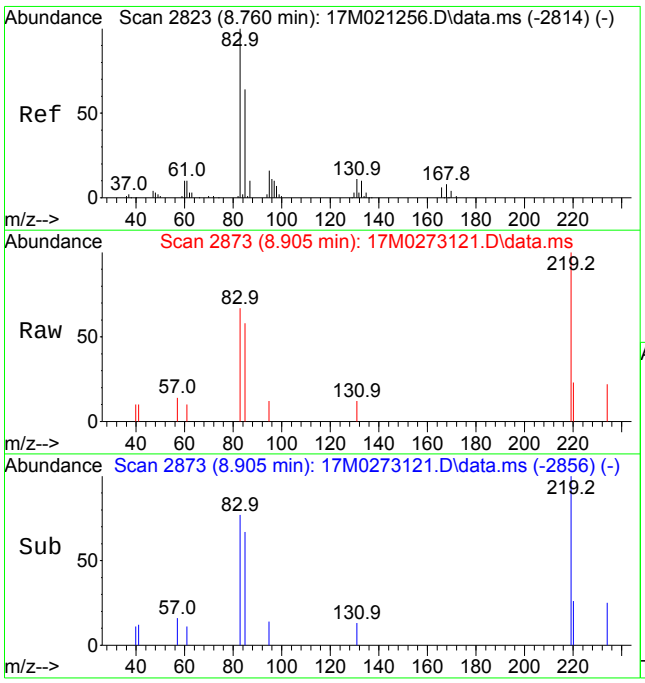


#49
Tetrachloroethene
Concen: 0.2604 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion:166 Resp: 1277

Ion	Ratio	Lower	Upper
166	100		
129	67.1	56.2	84.4
94	37.2	29.7	44.5

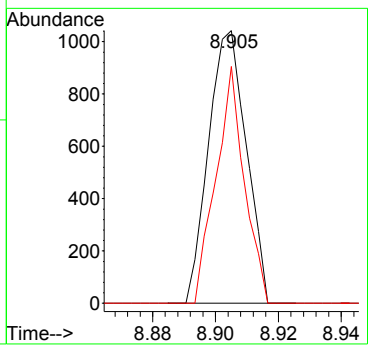




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2416 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273121.D
Acq: 28 Apr 2017 18:29

Tgt Ion: 83 Resp: 868

Ion	Ratio	Lower	Upper
83	100		
85	65.4	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273122.D Vial: 19
Acq On : 28 Apr 2017 18:49 Operator: ADC
Sample : L17041200-44 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:09 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

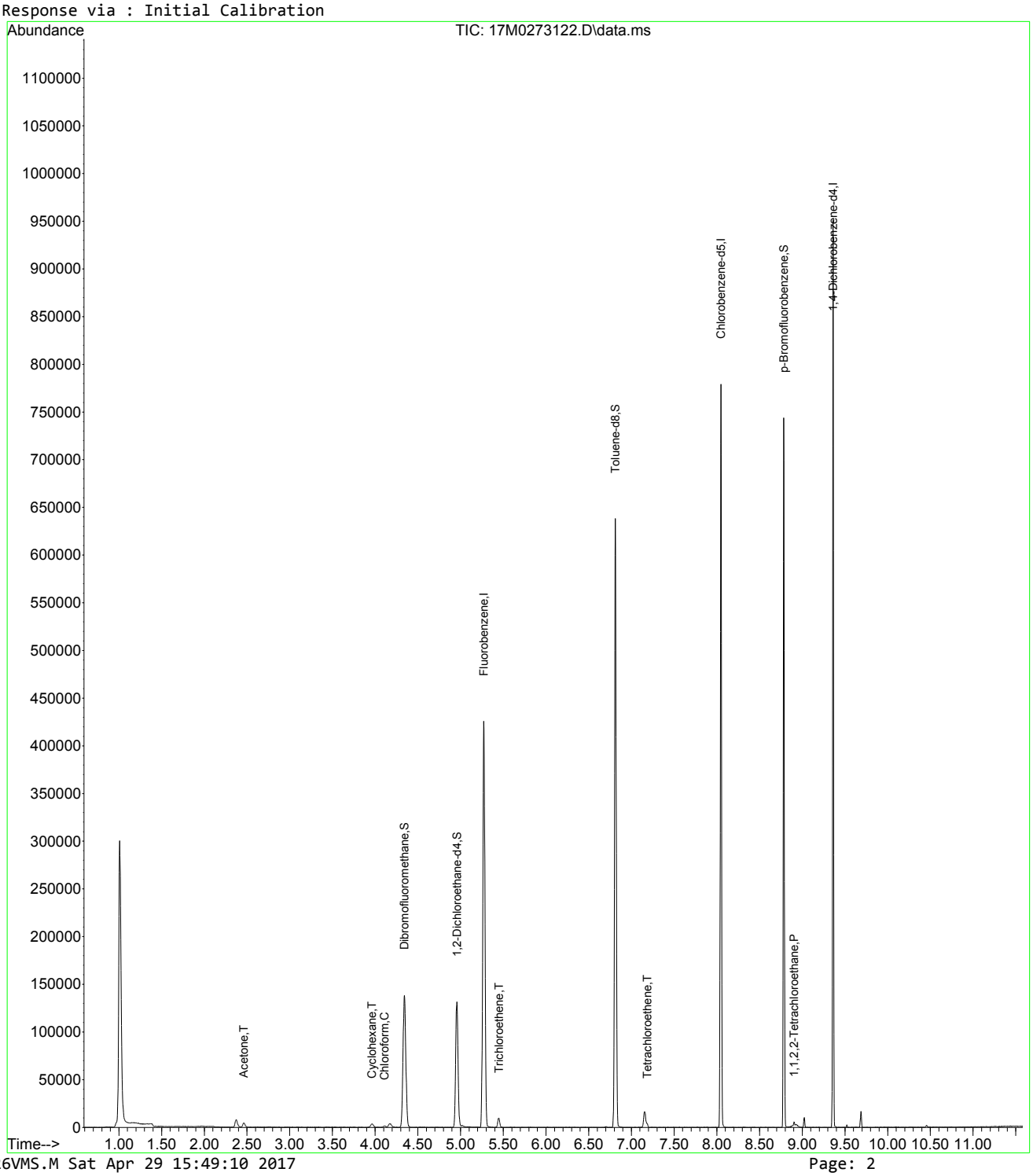
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	361885	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	265716	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	127945	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	98560	25.2182 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.873%		
34) 1,2-Dichloroethane-d4	4.956	65	95288	26.0115 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.046%		
47) Toluene-d8	6.812	98	342787	25.8494 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.398%		
66) p-Bromofluorobenzene	8.784	95	118146	27.5788 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.315%		
Target Compounds					Qvalue
16) Acetone	2.460	43	4337	5.9605 ug/L	97
25) Cyclohexane	3.963	56	2262	0.3890 ug/L #	80
27) Chloroform	4.108	83	1823	0.2558 ug/L	92
37) Trichloroethene	5.448	130	3419	0.7384 ug/L	96
49) Tetrachloroethene	7.185	166	967	0.2035 ug/L	95
69) 1,1,2,2-Tetrachloroethane	8.902	83	1136	0.3301 ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

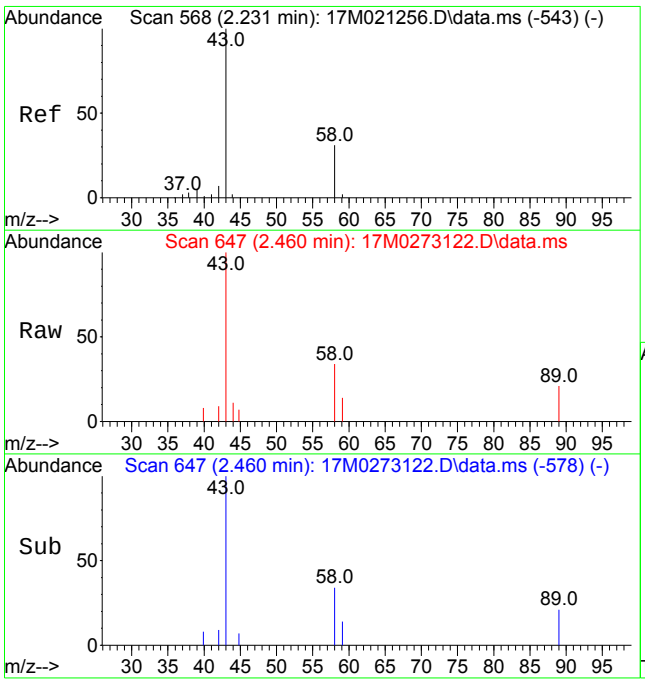
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273122.D Vial: 19
Acq On : 28 Apr 2017 18:49 Operator: ADC
Sample : L17041200-44 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:09 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



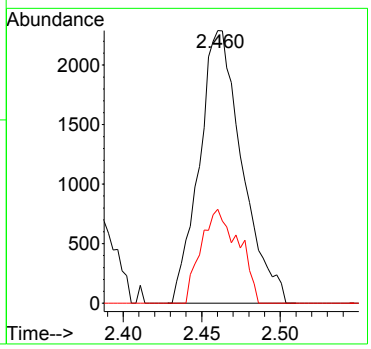
826VMS.M Sat Apr 29 15:49:10 2017 Page: 2

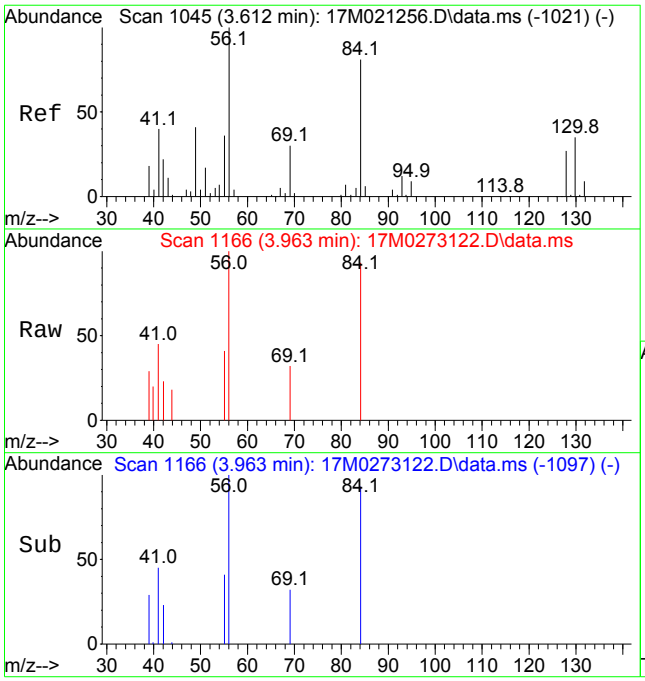


#16
Acetone
Concen: 5.9605 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion: 43 Resp: 4337

Ion	Ratio	Lower	Upper
43	100		
58	30.4	19.4	45.2

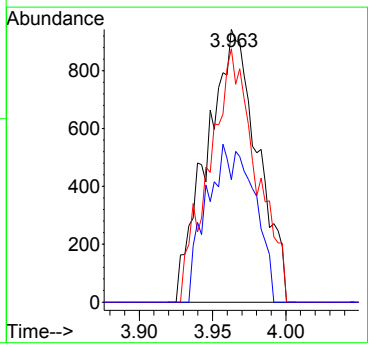


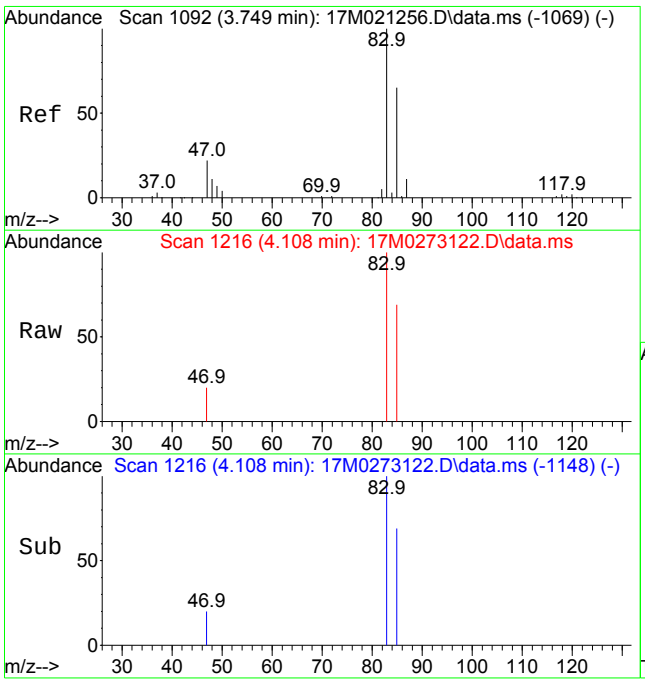


#25
Cyclohexane
Concen: 0.3890 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion: 56 Resp: 2262

Ion	Ratio	Lower	Upper
56	100		
84	86.1	69.4	104.0
41	53.9	72.2	108.2#

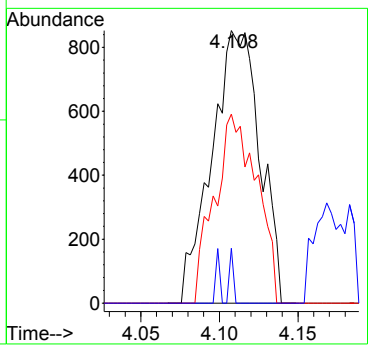


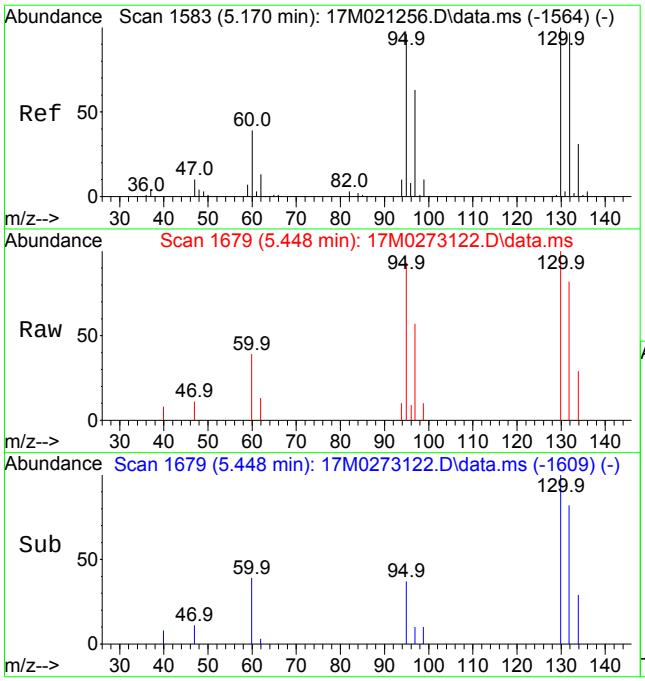


#27
Chloroform
Concen: 0.2558 ug/L
RT: 4.108 min Scan# 1216
Delta R.T. -0.002 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion: 83 Resp: 1823

Ion	Ratio	Lower	Upper
83	100		
85	60.8	39.2	91.4
47	27.8	12.9	30.1

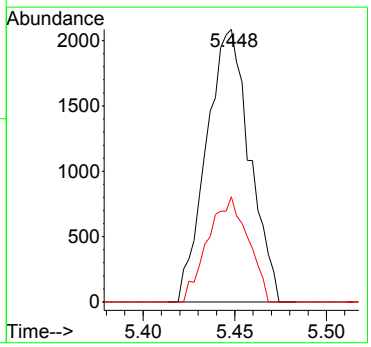


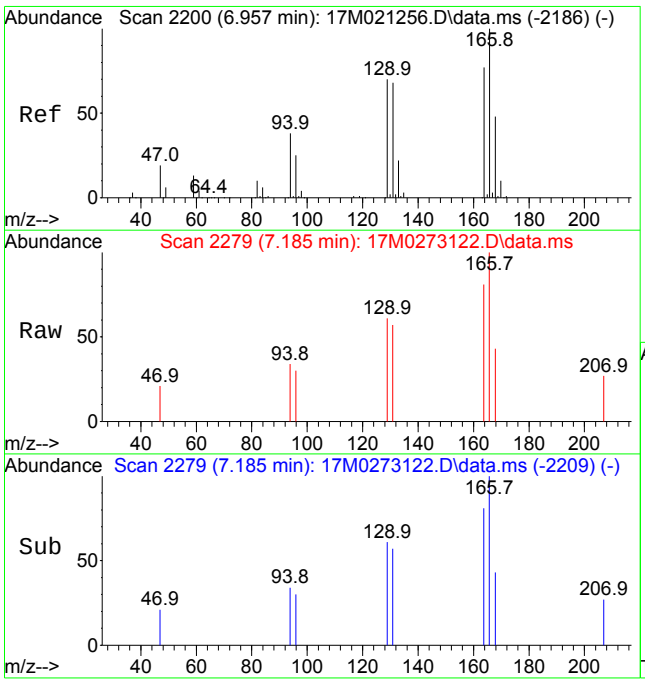


#37
Trichloroethene
Concen: 0.7384 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion:130 Resp: 3419

Ion	Ratio	Lower	Upper
130	100		
60	35.7	22.9	53.3

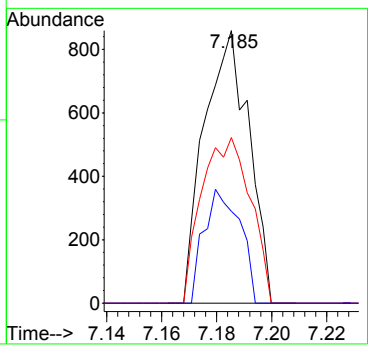


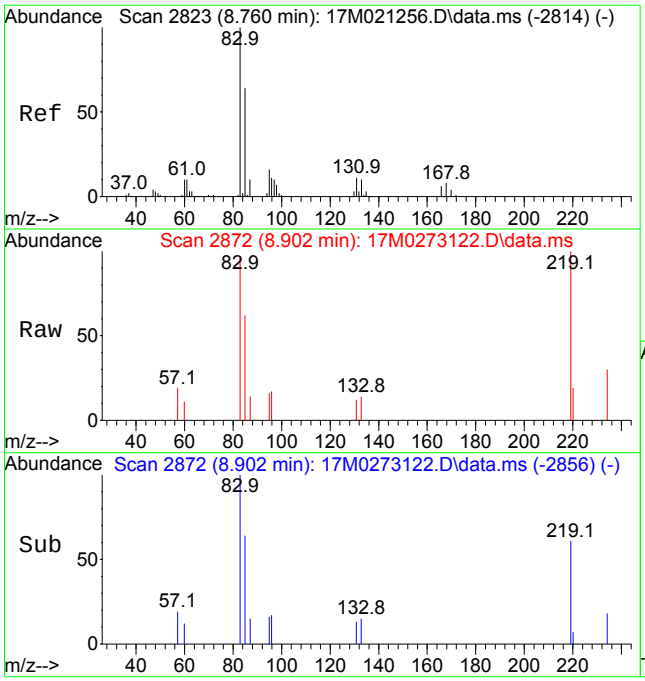


#49
Tetrachloroethene
Concen: 0.2035 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion:166 Resp: 967

Ion	Ratio	Lower	Upper
166	100		
129	66.4	56.2	84.4
94	33.8	29.7	44.5

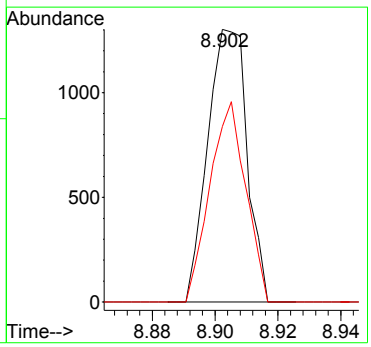




#69
1,1,2,2-Tetrachloroethane
Concen: 0.3301 ug/L
RT: 8.902 min Scan# 2872
Delta R.T. -0.003 min
Lab File: 17M0273122.D
Acq: 28 Apr 2017 18:49

Tgt Ion: 83 Resp: 1136

Ion	Ratio	Lower	Upper
83	100		
85	67.0	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273123.D Vial: 20
Acq On : 28 Apr 2017 19:17 Operator: ADC
Sample : L17041200-45 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

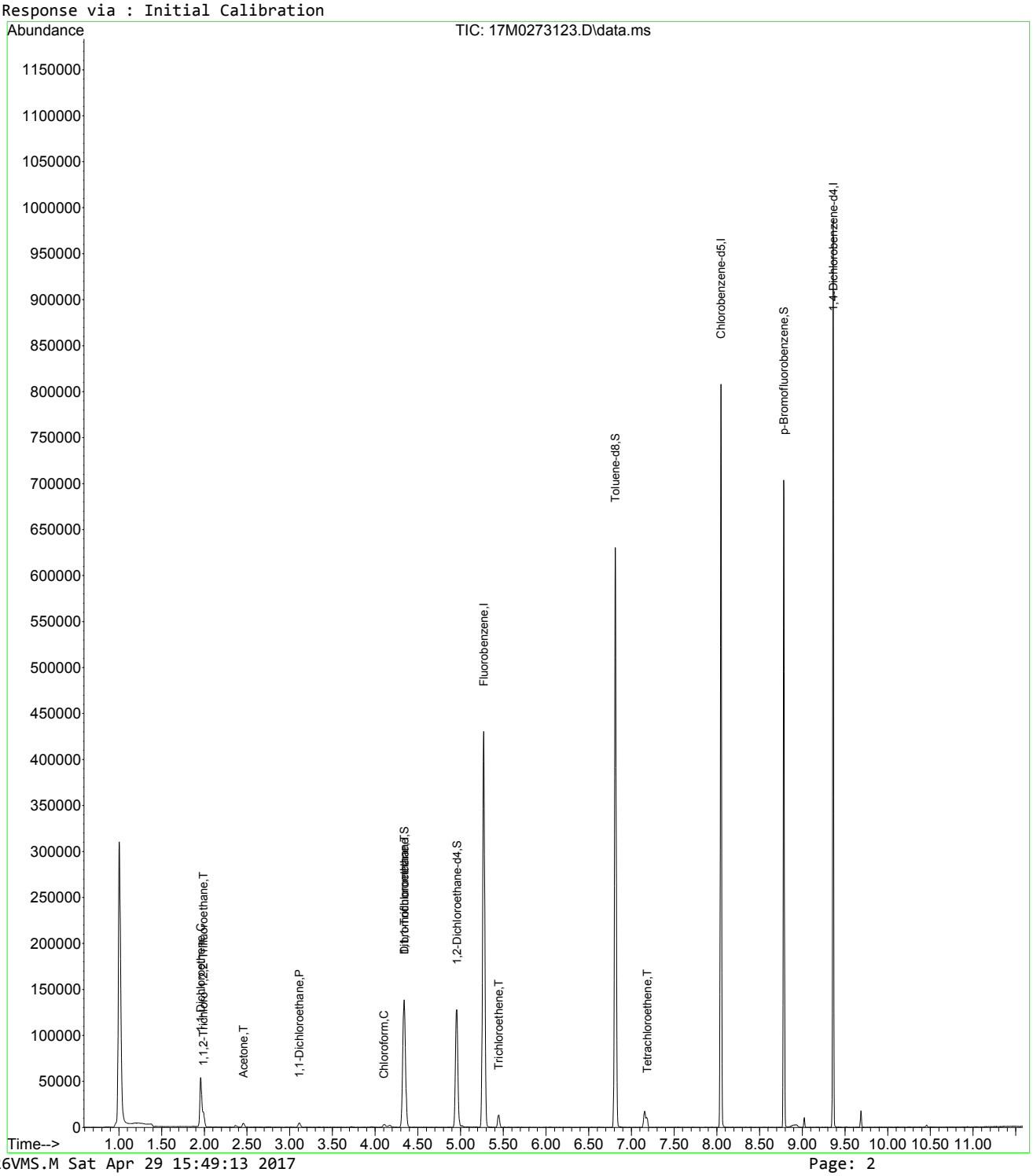
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	367201	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	275028	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	135548	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	98598	24.8627	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.451%			
34) 1,2-Dichloroethane-d4	4.956	65	94705	25.4780	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.912%			
47) Toluene-d8	6.812	98	339567	24.7395	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 98.958%			
66) p-Bromofluorobenzene	8.784	95	111656	24.6019	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.408%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.956	61	26826	4.7295	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	5448	1.5066	ug/L	97
16) Acetone	2.457	43	4912	6.6530	ug/L	96
20) 1,1-Dichloroethane	3.112	63	5637	0.8126	ug/L	97
27) Chloroform	4.102	83	3553	0.4913	ug/L	99
30) 1,1,1-Trichloroethane	4.339	97	783	0.1231	ug/L #	70
37) Trichloroethene	5.445	130	4555	0.9696	ug/L	97
49) Tetrachloroethene	7.185	166	2620	0.5327	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

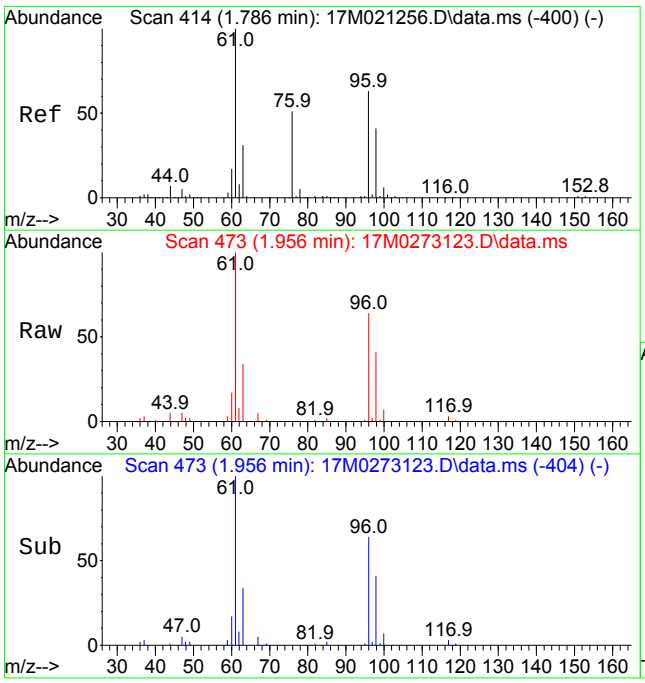
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273123.D Vial: 20
Acq On : 28 Apr 2017 19:17 Operator: ADC
Sample : L17041200-45 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



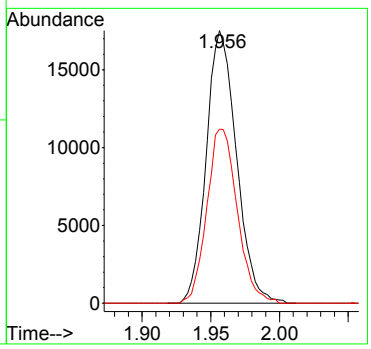
826VMS.M Sat Apr 29 15:49:13 2017 Page: 2

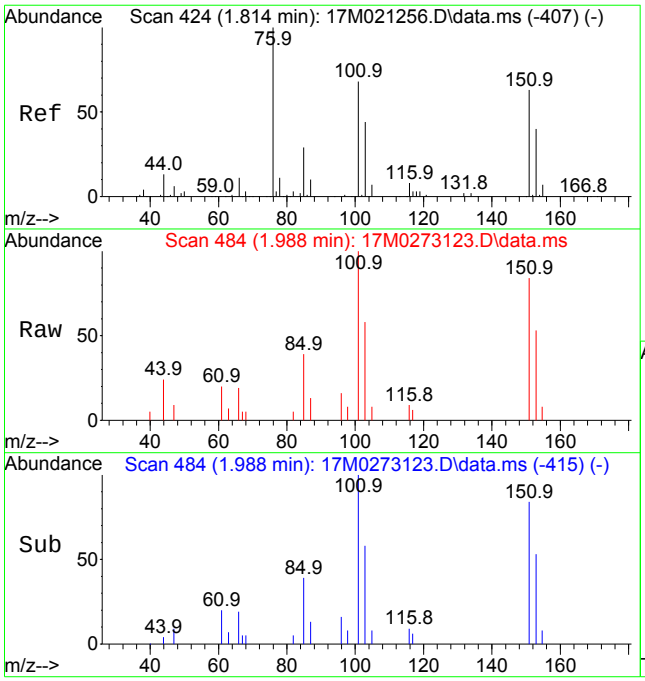


#10
1,1-Dichloroethene
Concen: 4.7295 ug/L
RT: 1.956 min Scan# 473
Delta R.T. 0.000 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion: 61 Resp: 26826

Ion	Ratio	Lower	Upper
61	100		
96	64.3	52.9	79.3

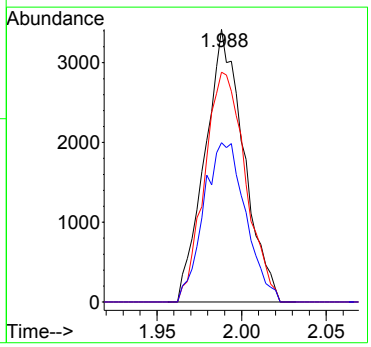


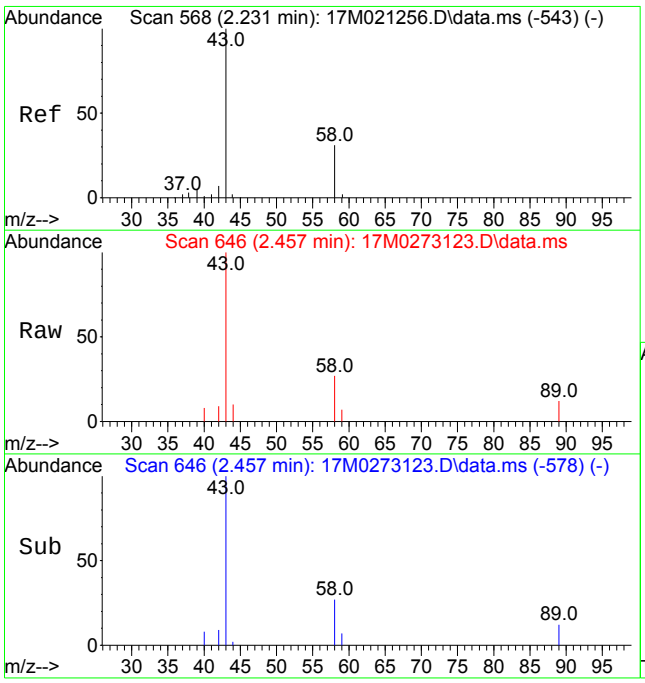


#12
1,1,2-Trichloro-1,2,2-Trifluoroethane
Concen: 1.5066 ug/L
RT: 1.988 min Scan# 484
Delta R.T. 0.000 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion:101 Resp: 5448

Ion	Ratio	Lower	Upper
101	100		
151	88.6	74.5	111.7
103	63.4	51.7	77.5

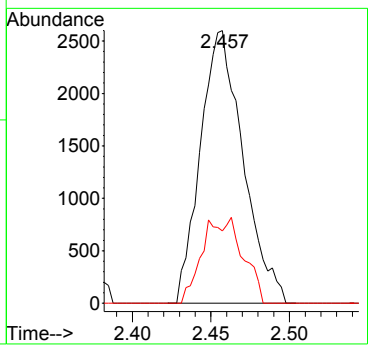


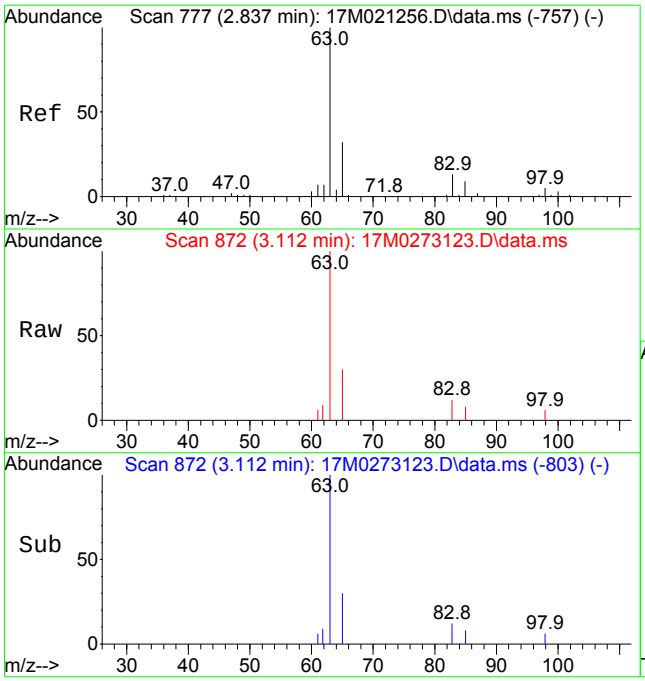


#16
Acetone
Concen: 6.6530 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion: 43 Resp: 4912

Ion	Ratio	Lower	Upper
43	100		
58	29.8	19.4	45.2

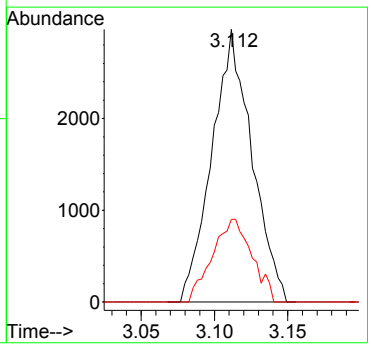


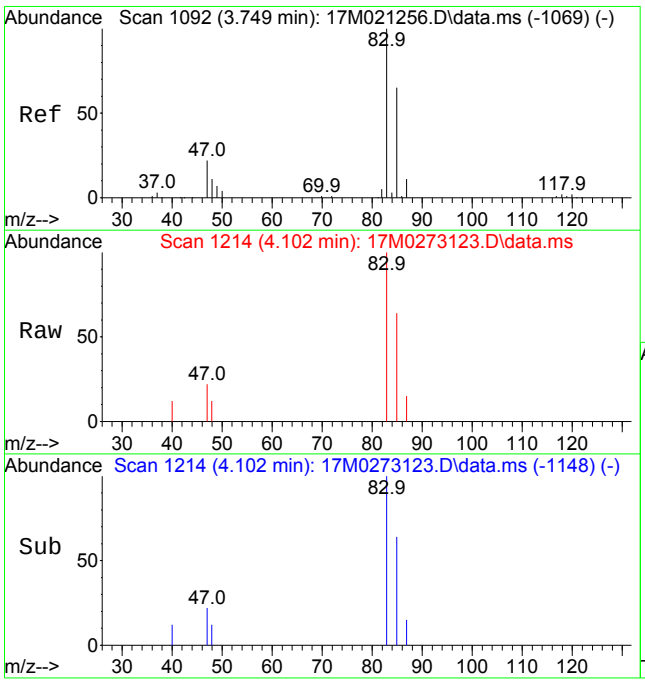


#20
1,1-Dichloroethane
Concen: 0.8126 ug/L
RT: 3.112 min Scan# 872
Delta R.T. 0.001 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion: 63 Resp: 5637

Ion	Ratio	Lower	Upper
63	100		
65	30.1	25.4	38.2

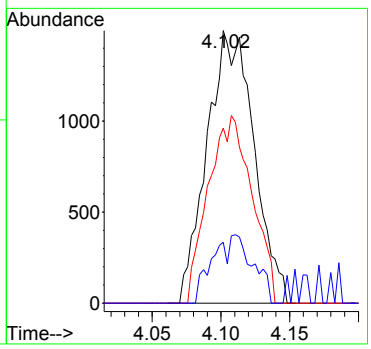


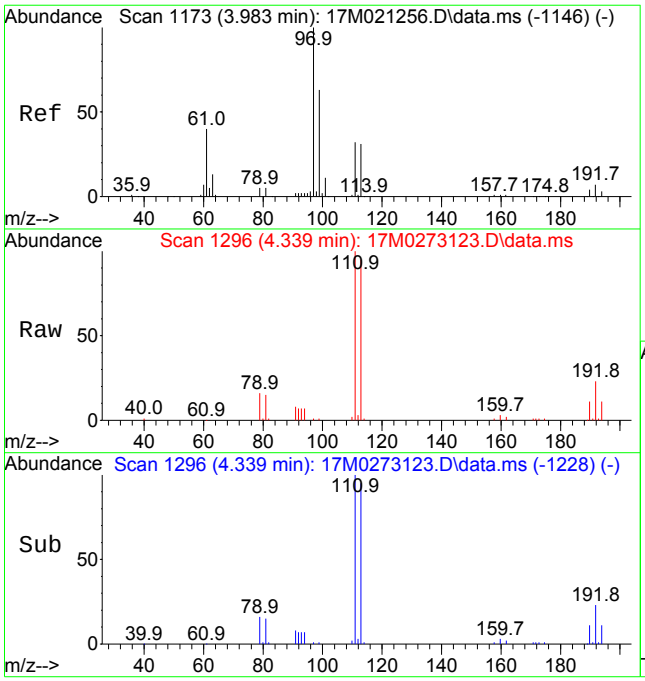


#27
Chloroform
Concen: 0.4913 ug/L
RT: 4.102 min Scan# 1214
Delta R.T. -0.008 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion: 83 Resp: 3553

Ion	Ratio	Lower	Upper
83	100		
85	64.3	39.2	91.4
47	21.6	12.9	30.1

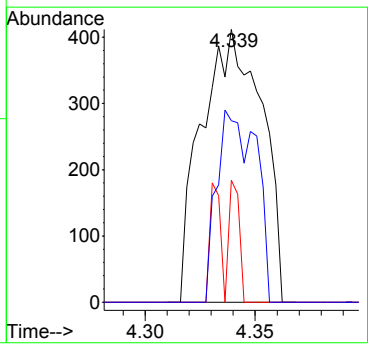


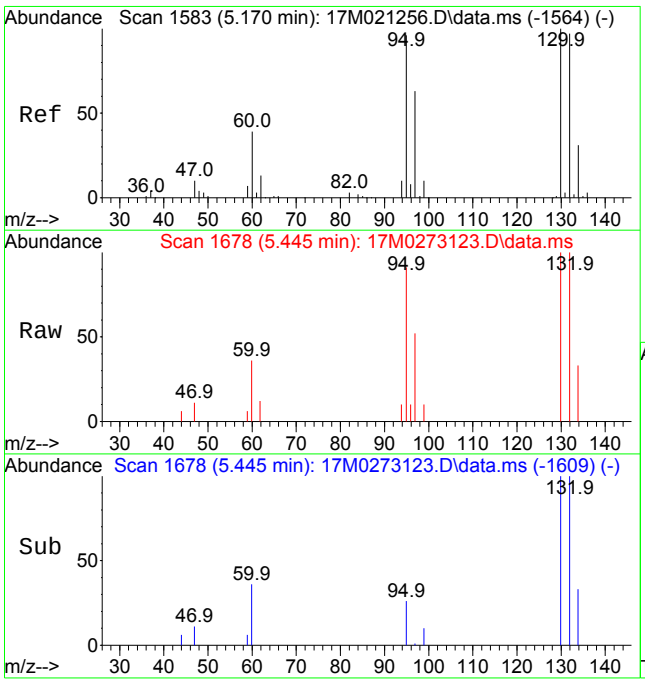


#30
1,1,1-Trichloroethane
Concen: 0.1231 ug/L
RT: 4.339 min Scan# 1296
Delta R.T. -0.003 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion: 97 Resp: 783

Ion	Ratio	Lower	Upper
97	100		
61	15.3	24.1	56.3#
99	45.8	51.8	77.6#

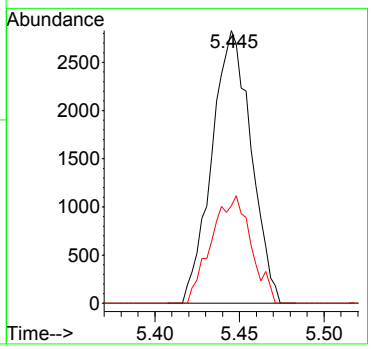


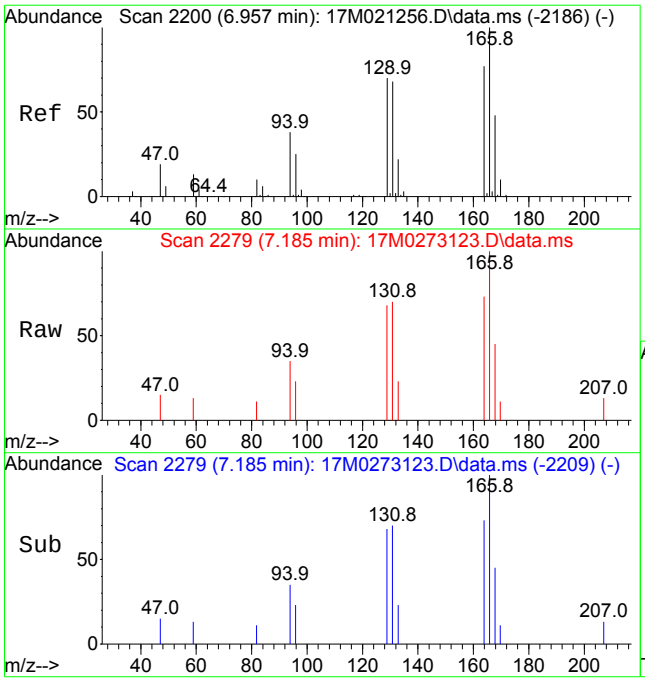


#37
Trichloroethene
Concen: 0.9696 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion:130 Resp: 4555

Ion	Ratio	Lower	Upper
130	100		
60	39.9	22.9	53.3

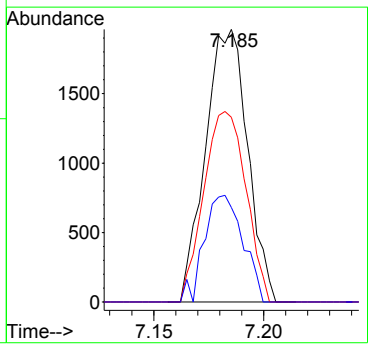




#49
Tetrachloroethene
Concen: 0.5327 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273123.D
Acq: 28 Apr 2017 19:17

Tgt Ion:166 Resp: 2620

Ion	Ratio	Lower	Upper
166	100		
129	69.8	56.2	84.4
94	35.9	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273124.D Vial: 21
Acq On : 28 Apr 2017 19:37 Operator: ADC
Sample : L17041200-46 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:15 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

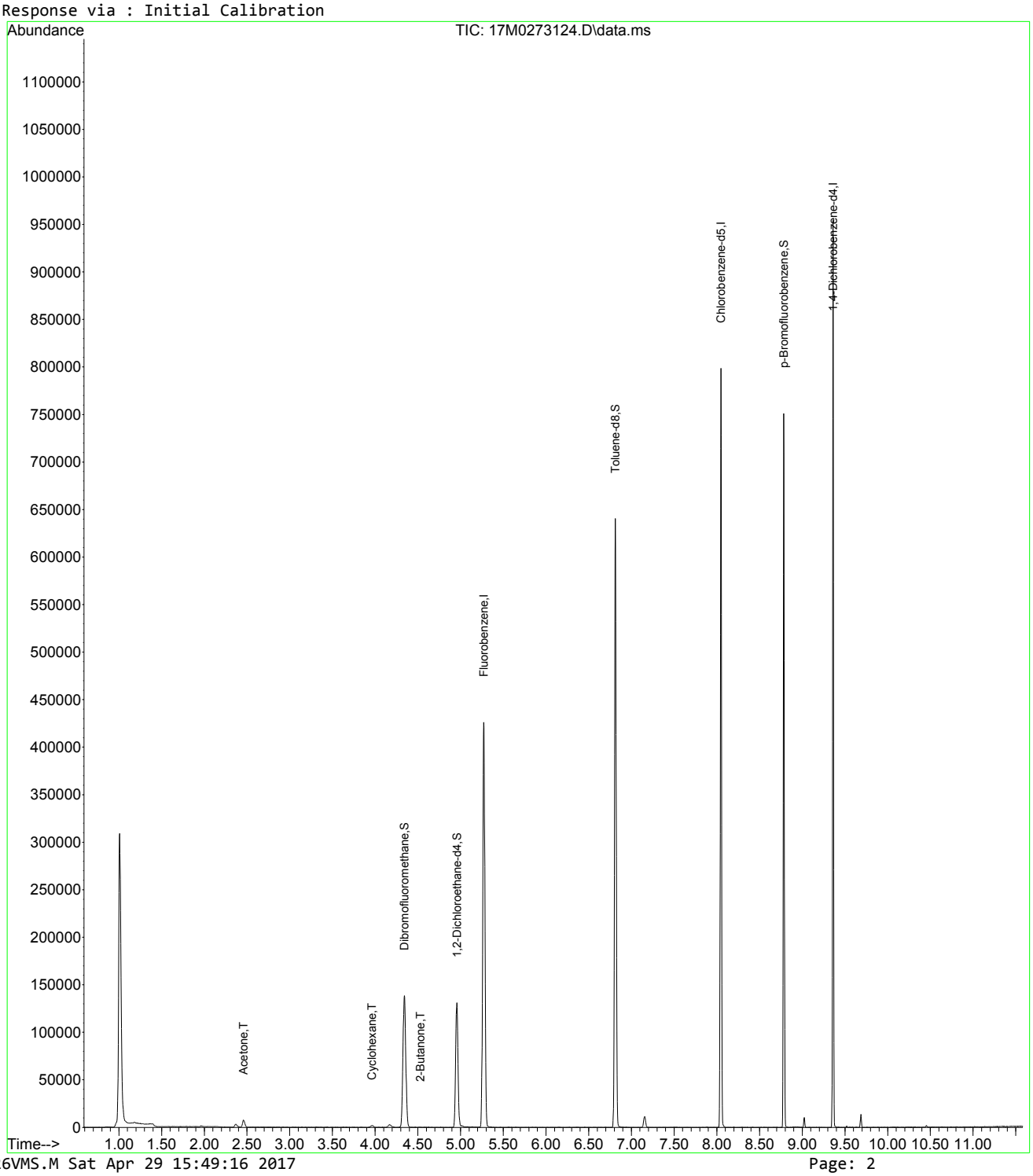
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	366945	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	270084	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	128130	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	99847	25.1953	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.781%			
34) 1,2-Dichloroethane-d4	4.956	65	94416	25.4180	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.672%			
47) Toluene-d8	6.812	98	349892	25.9584	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.834%			
66) p-Bromofluorobenzene	8.784	95	116997	27.2711	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.084%			
Target Compounds						Qvalue
16) Acetone	2.457	43	8539	11.5736	ug/L	97
25) Cyclohexane	3.963	56	1390	0.2358	ug/L #	77
32) 2-Butanone	4.527	43	224	0.2036	ug/L #	37

(#) = qualifier out of range (m) = manual integration (+) = signals summed

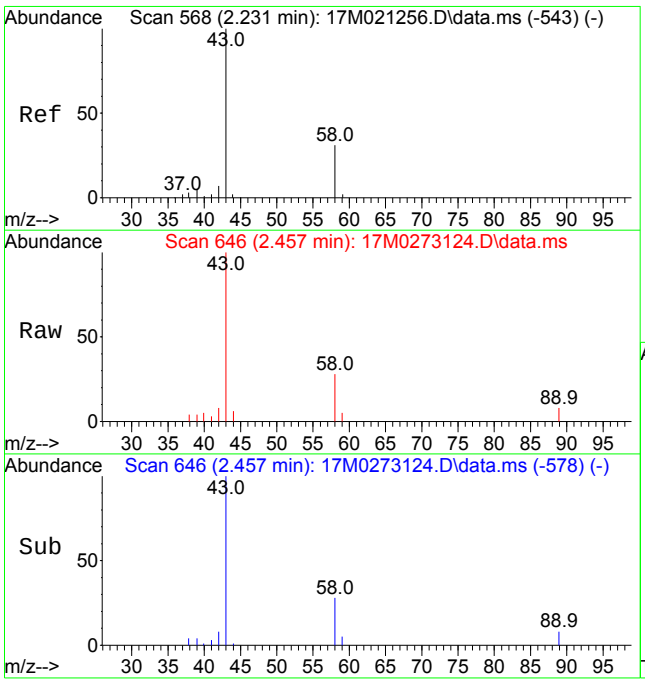
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273124.D Vial: 21
Acq On : 28 Apr 2017 19:37 Operator: ADC
Sample : L17041200-46 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:15 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



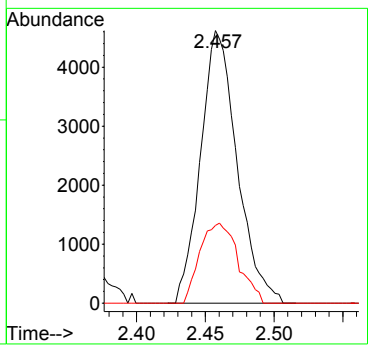
826VMS.M Sat Apr 29 15:49:16 2017 Page: 2

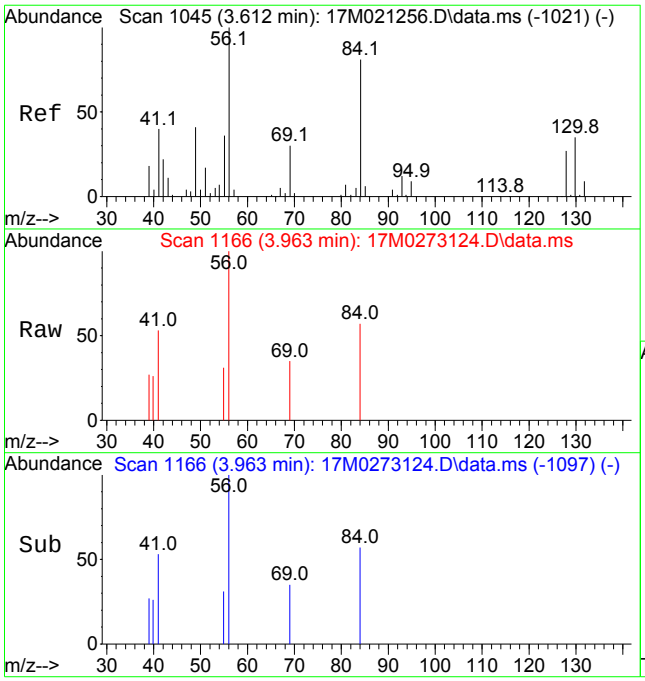


#16
Acetone
Concen: 11.5736 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273124.D
Acq: 28 Apr 2017 19:37

Tgt Ion: 43 Resp: 8539

Ion	Ratio	Lower	Upper
43	100		
58	30.7	19.4	45.2

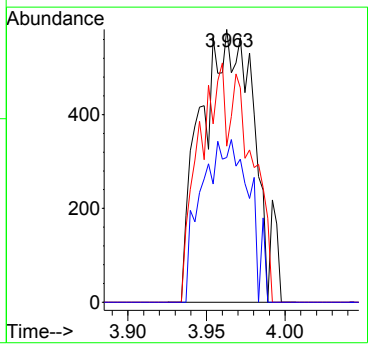


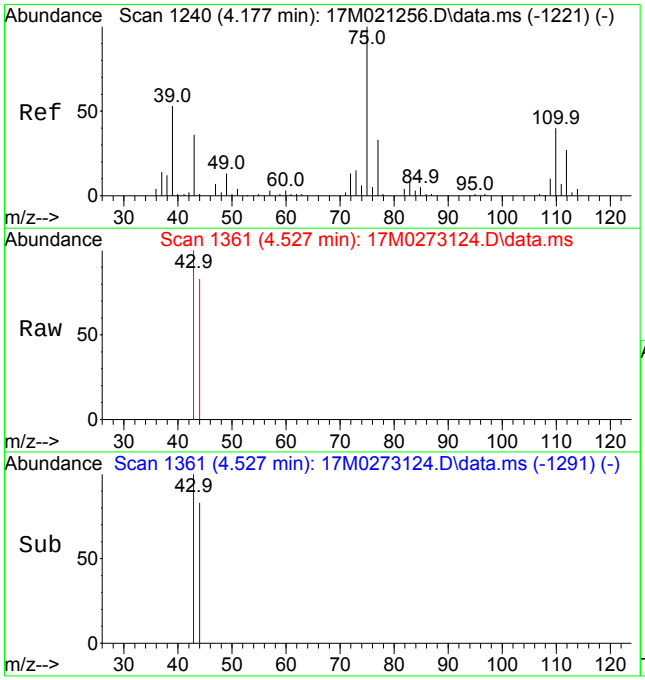


#25
Cyclohexane
Concen: 0.2358 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273124.D
Acq: 28 Apr 2017 19:37

Tgt Ion: 56 Resp: 1390

Ion	Ratio	Lower	Upper
56	100		
84	81.6	69.4	104.0
41	52.9	72.2	108.2#

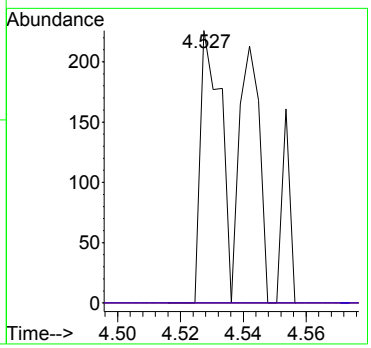




#32
2-Butanone
Concen: 0.2036 ug/L
RT: 4.527 min Scan# 1361
Delta R.T. 0.003 min
Lab File: 17M0273124.D
Acq: 28 Apr 2017 19:37

Tgt Ion: 43 Resp: 224

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273125.D Vial: 22
Acq On : 28 Apr 2017 19:57 Operator: ADC
Sample : L17041200-47 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:18 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

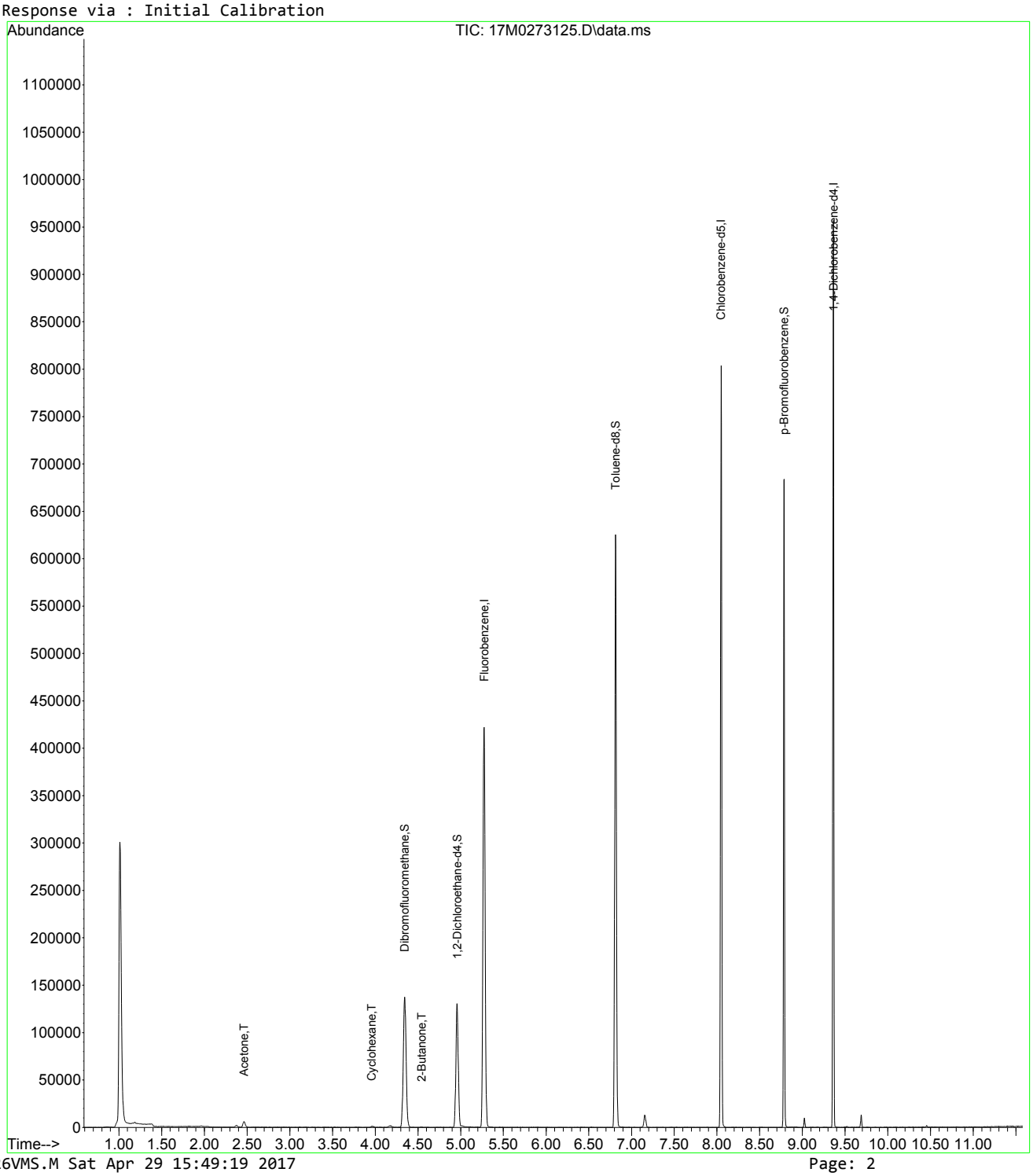
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	365352	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	270798	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129470	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	98881	25.0603 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.241%		
34) 1,2-Dichloroethane-d4	4.959	65	94617	25.5832 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.333%		
47) Toluene-d8	6.812	98	336750	24.9175 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.670%		
66) p-Bromofluorobenzene	8.783	95	110302	25.4445 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.778%		
Target Compounds					Qvalue
16) Acetone	2.463	43	7284	9.9157 ug/L	97
25) Cyclohexane	3.957	56	862	0.1468 ug/L #	55
32) 2-Butanone	4.545	43	185	0.1689 ug/L #	37

(#) = qualifier out of range (m) = manual integration (+) = signals summed

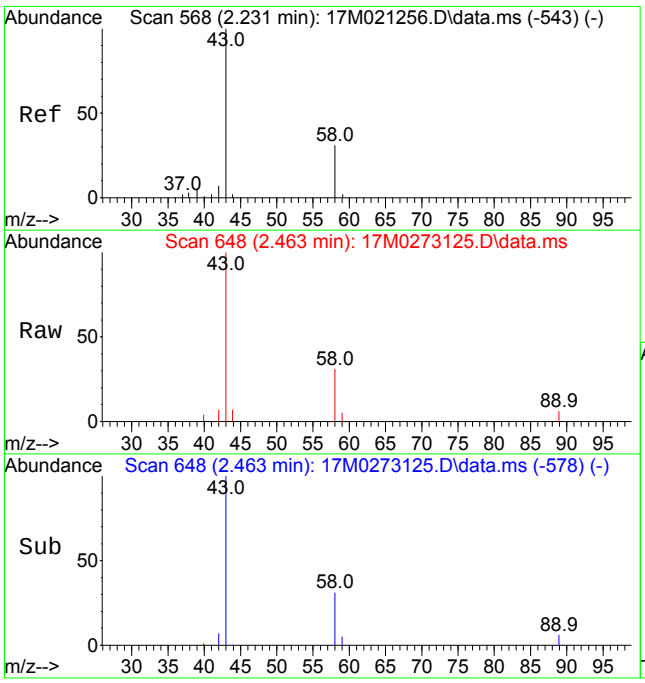
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273125.D Vial: 22
Acq On : 28 Apr 2017 19:57 Operator: ADC
Sample : L17041200-47 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:18 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



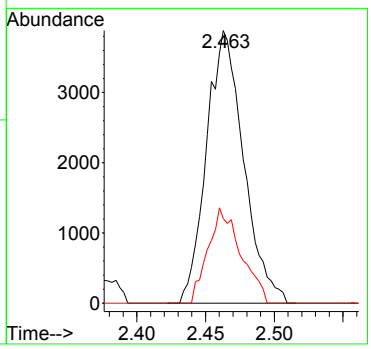
826VMS.M Sat Apr 29 15:49:19 2017 Page: 2

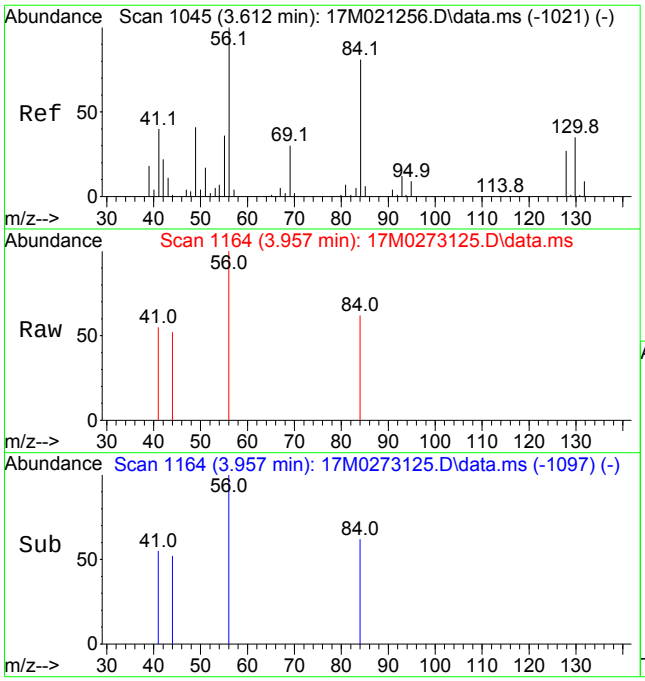


#16
Acetone
Concen: 9.9157 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273125.D
Acq: 28 Apr 2017 19:57

Tgt Ion: 43 Resp: 7284

Ion	Ratio	Lower	Upper
43	100		
58	30.8	19.4	45.2

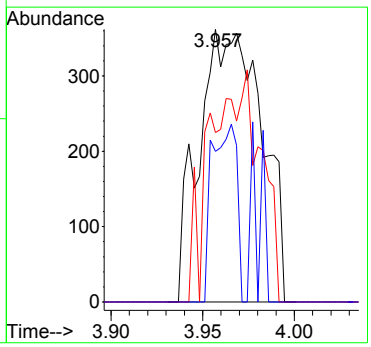


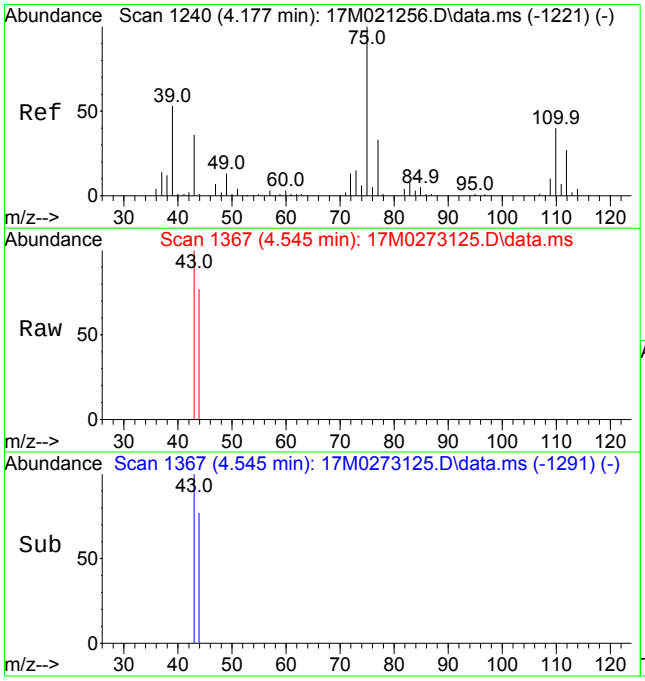


#25
Cyclohexane
Concen: 0.1468 ug/L
RT: 3.957 min Scan# 1164
Delta R.T. -0.006 min
Lab File: 17M0273125.D
Acq: 28 Apr 2017 19:57

Tgt Ion: 56 Resp: 862

Ion	Ratio	Lower	Upper
56	100		
84	67.9	69.4	104.0#
41	25.8	72.2	108.2#

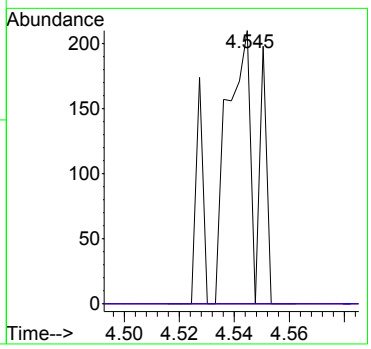




#32
2-Butanone
Concen: 0.1689 ug/L
RT: 4.545 min Scan# 1367
Delta R.T. 0.021 min
Lab File: 17M0273125.D
Acq: 28 Apr 2017 19:57

Tgt Ion: 43 Resp: 185

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273126.D Vial: 23
Acq On : 28 Apr 2017 20:17 Operator: ADC
Sample : L17041200-48 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

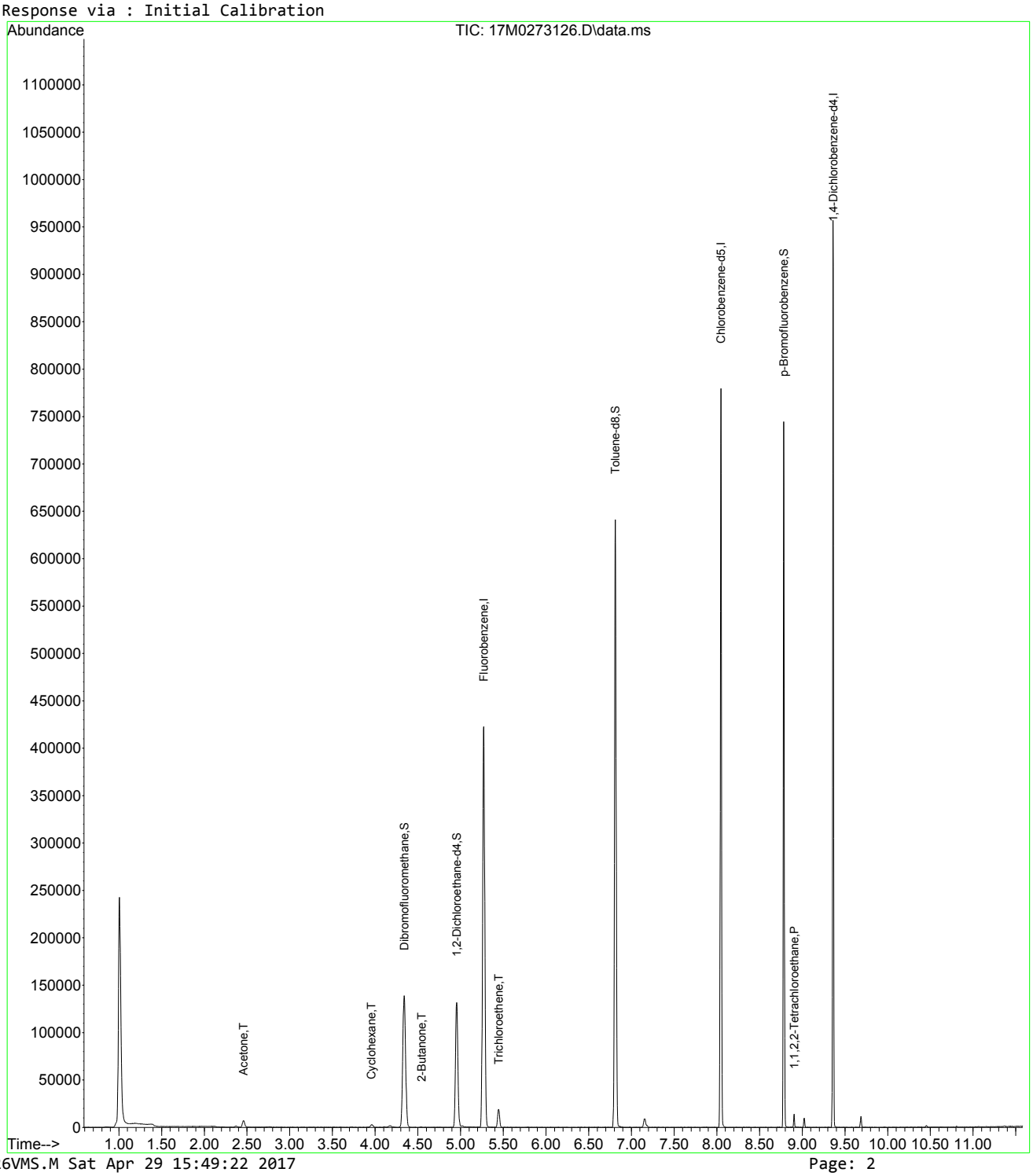
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	363818	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	266008	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	127940	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	100240	25.5118	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.047%			
34) 1,2-Dichloroethane-d4	4.953	65	95871	26.0316	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.126%			
47) Toluene-d8	6.812	98	348089	26.2204	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.882%			
66) p-Bromofluorobenzene	8.784	95	115349	26.9269	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.708%			
Target Compounds						Qvalue
16) Acetone	2.457	43	8662	11.8412	ug/L	95
25) Cyclohexane	3.954	56	1738	0.2973	ug/L #	76
32) 2-Butanone	4.545	43	315	0.2888	ug/L #	37
37) Trichloroethene	5.445	130	6293	1.3520	ug/L	96
69) 1,1,2,2-Tetrachloroethane	8.905	83	3517	1.0219	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

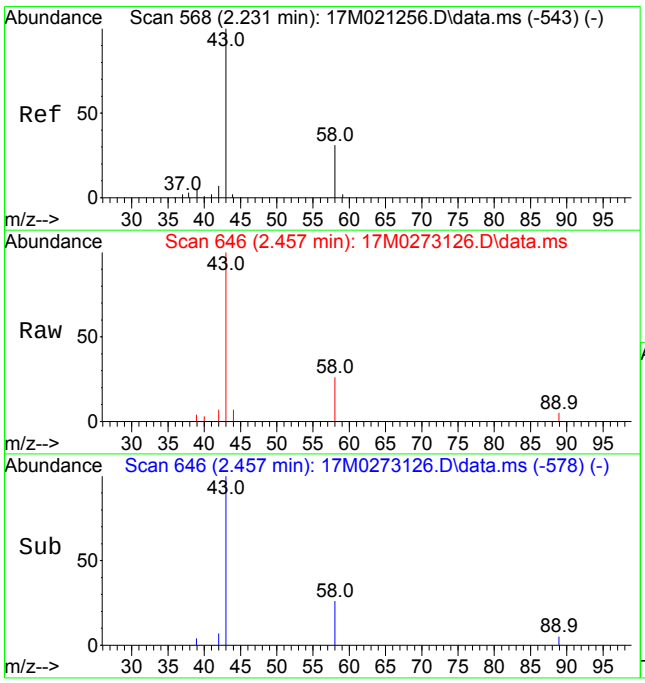
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273126.D Vial: 23
Acq On : 28 Apr 2017 20:17 Operator: ADC
Sample : L17041200-48 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



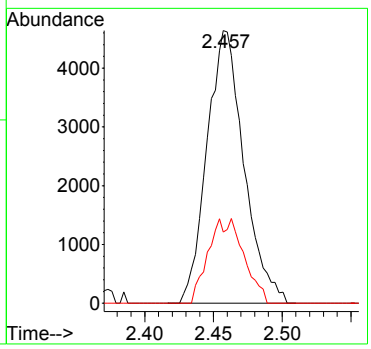
826VMS.M Sat Apr 29 15:49:22 2017 Page: 2

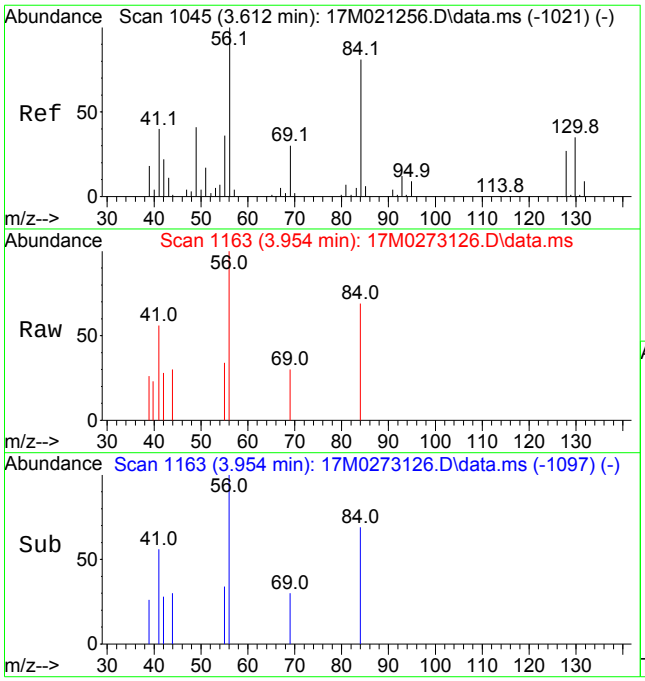


#16
Acetone
Concen: 11.8412 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273126.D
Acq: 28 Apr 2017 20:17

Tgt Ion: 43 Resp: 8662

Ion	Ratio	Lower	Upper
43	100		
58	29.7	19.4	45.2

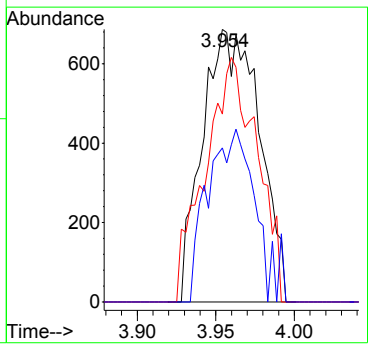


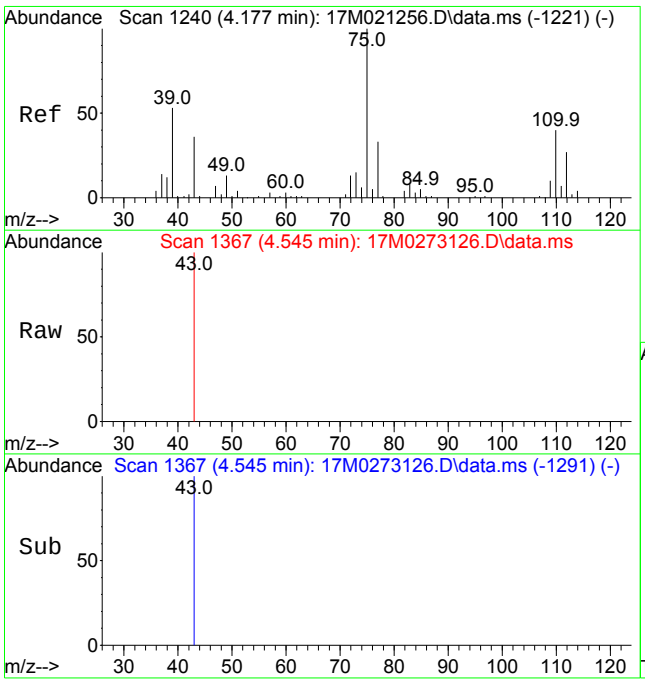


#25
Cyclohexane
Concen: 0.2973 ug/L
RT: 3.954 min Scan# 1163
Delta R.T. -0.009 min
Lab File: 17M0273126.D
Acq: 28 Apr 2017 20:17

Tgt Ion: 56 Resp: 1738

Ion	Ratio	Lower	Upper
56	100		
84	81.6	69.4	104.0
41	51.3	72.2	108.2#

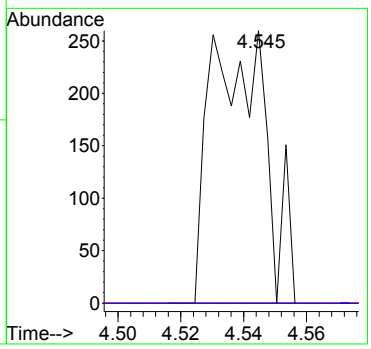


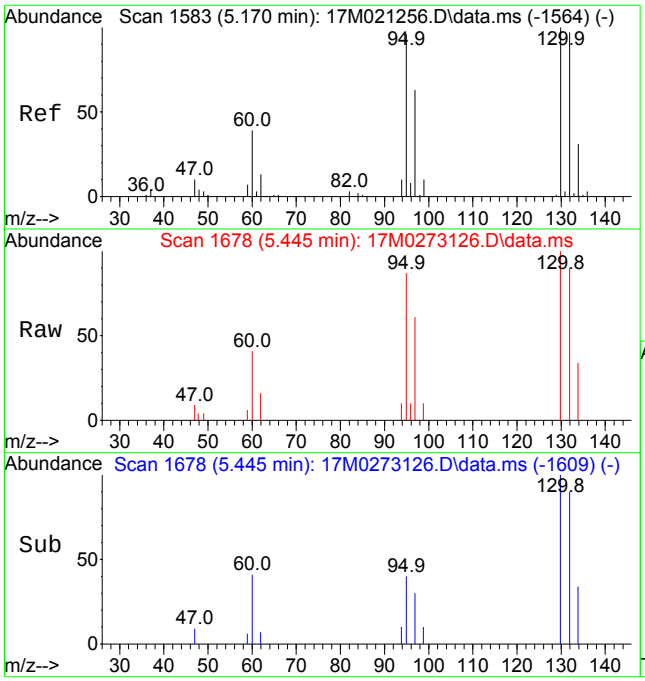


#32
2-Butanone
Concen: 0.2888 ug/L
RT: 4.545 min Scan# 1367
Delta R.T. 0.021 min
Lab File: 17M0273126.D
Acq: 28 Apr 2017 20:17

Tgt Ion: 43 Resp: 315

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

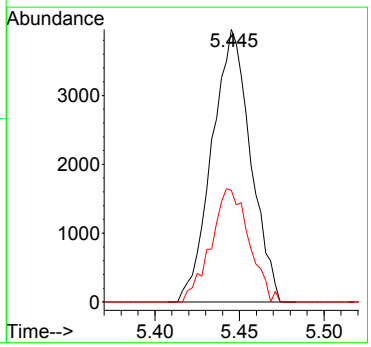


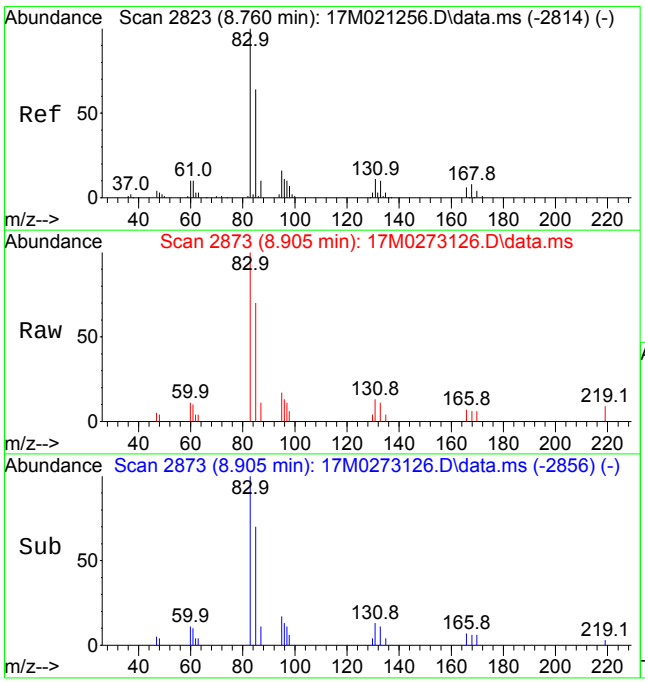


#37
Trichloroethene
Concen: 1.3520 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273126.D
Acq: 28 Apr 2017 20:17

Tgt Ion:130 Resp: 6293

Ion	Ratio	Lower	Upper
130	100		
60	40.7	22.9	53.3

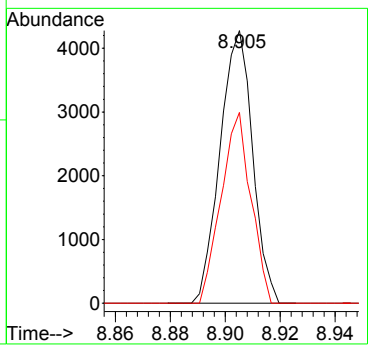




#69
1,1,2,2-Tetrachloroethane
Concen: 1.0219 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273126.D
Acq: 28 Apr 2017 20:17

Tgt Ion: 83 Resp: 3517

Ion	Ratio	Lower	Upper
83	100		
85	64.0	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273127.D Vial: 24
Acq On : 28 Apr 2017 20:47 Operator: ADC
Sample : L17041200-49 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:24 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

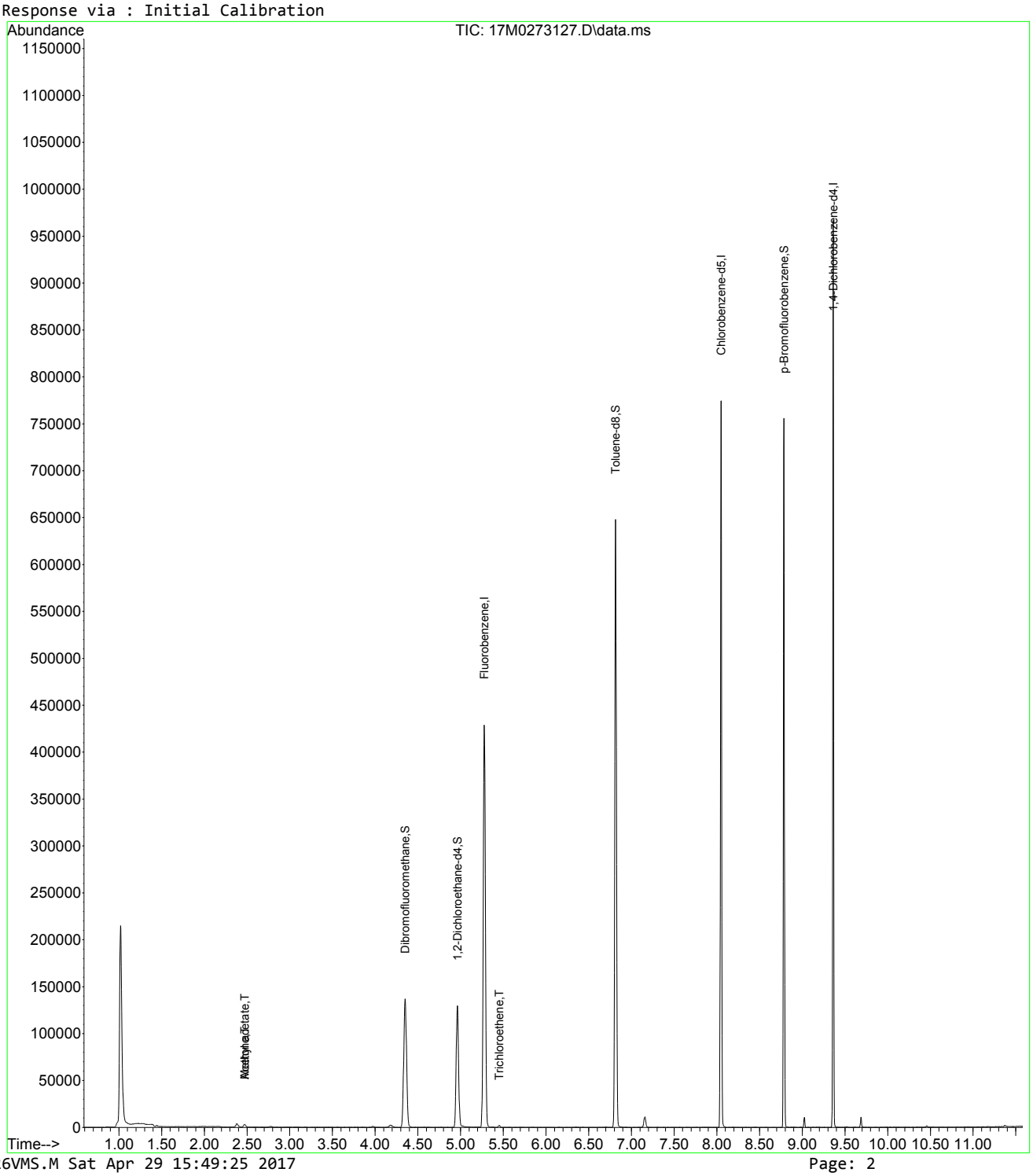
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	366146	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	268216	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	128136	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	98898	25.0102	ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.041%			
34) 1,2-Dichloroethane-d4	4.964	65	94711	25.5531	ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.212%			
47) Toluene-d8	6.815	98	347759	25.9799	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.920%			
66) p-Bromofluorobenzene	8.786	95	120024	27.9754	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.902%			
Target Compounds						Qvalue
16) Acetone	2.472	43	3360	4.5640	ug/L	99
18) Methyl acetate	2.472	43	3360	1.7409	ug/L #	62
37) Trichloroethene	5.451	130	697	0.1488	ug/L #	69

(#) = qualifier out of range (m) = manual integration (+) = signals summed

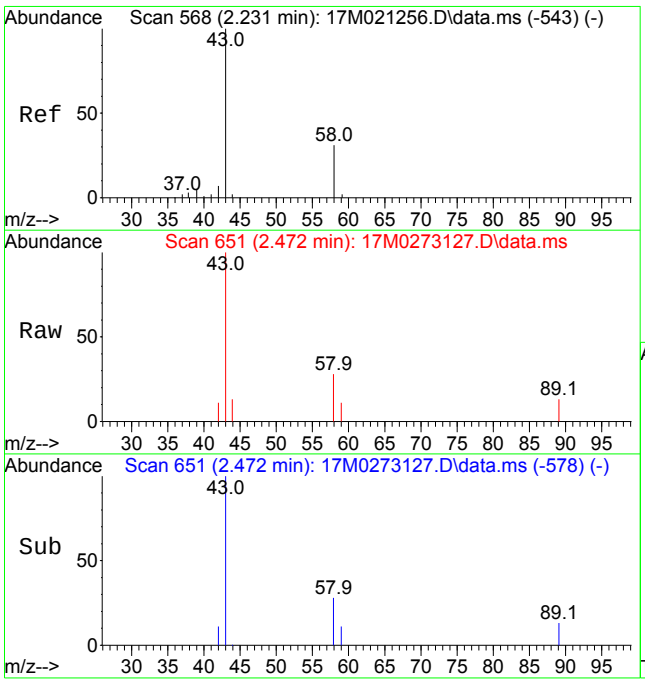
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273127.D Vial: 24
Acq On : 28 Apr 2017 20:47 Operator: ADC
Sample : L17041200-49 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 15:49:24 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



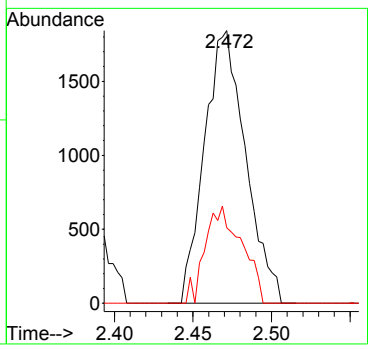
826VMS.M Sat Apr 29 15:49:25 2017 Page: 2

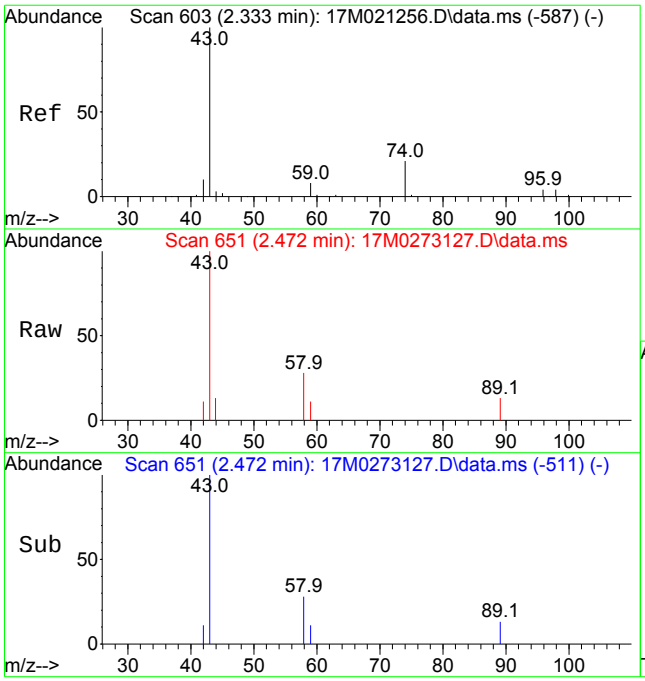


#16
Acetone
Concen: 4.5640 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273127.D
Acq: 28 Apr 2017 20:47

Tgt Ion: 43 Resp: 3360

Ion	Ratio	Lower	Upper
43	100		
58	31.7	19.4	45.2

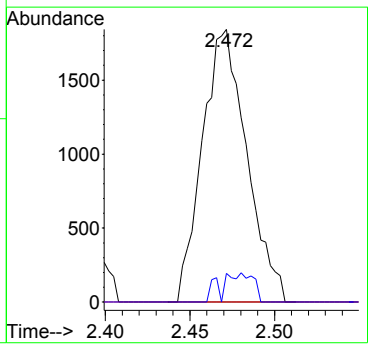


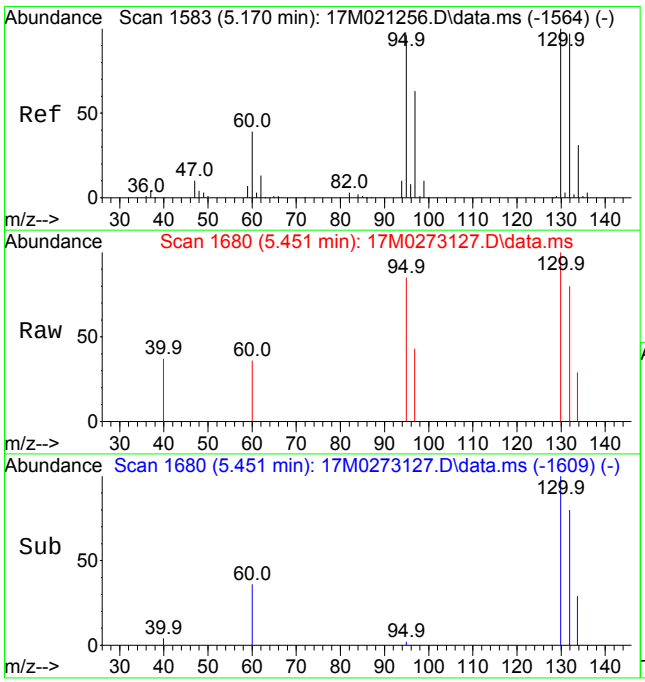


#18
Methyl acetate
Concen: 1.7409 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273127.D
Acq: 28 Apr 2017 20:47

Tgt Ion: 43 Resp: 3360

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	7.9	7.6	11.4

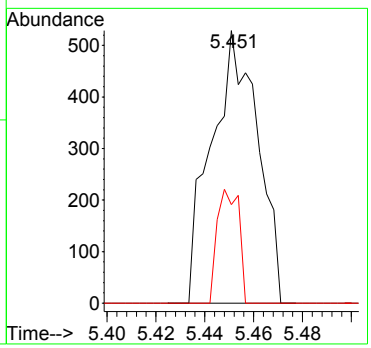




#37
Trichloroethene
Concen: 0.1488 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273127.D
Acq: 28 Apr 2017 20:47

Tgt Ion:130 Resp: 697

Ion	Ratio	Lower	Upper
130	100		
60	19.5	22.9	53.3#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146806.D Vial: 10
Acq On : 28 Apr 2017 11:00 Operator: TMB
Sample : L17041200-50 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:20 2017 Quant Results File: 8260BWT.RES

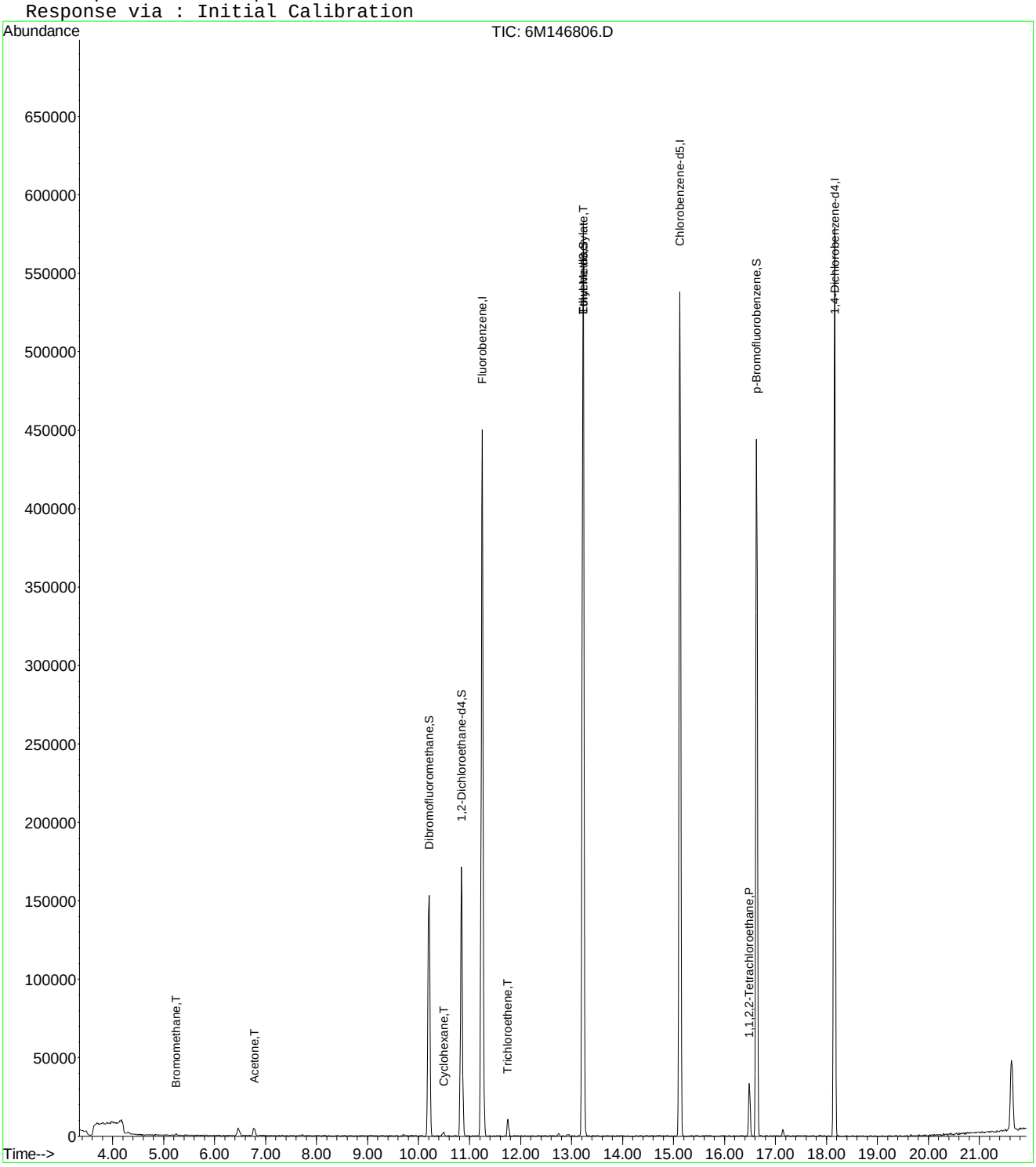
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

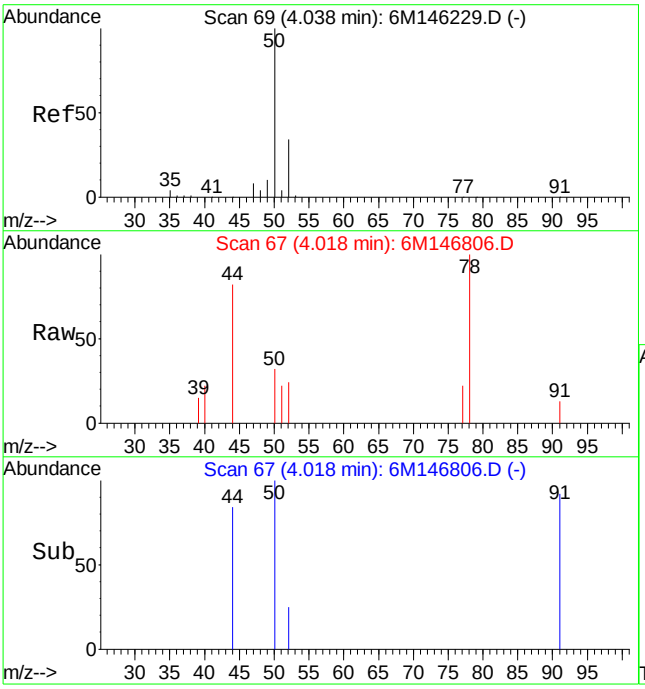
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	576587	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	397763	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	195637	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	132742	22.5522 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 90.20%		
43) 1,2-Dichloroethane-d4	10.84	65	154105	26.5648 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.24%		
58) Toluene-d8	13.23	98	538045	26.5087 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.04%		
80) p-Bromofluorobenzene	16.63	95	205250	27.6231 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.48%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	1600	Below Cal #	42
6) Bromomethane	5.24	94	906	0.2006 ug/L	96
13) Acetone	6.77	43	10040	8.0693 ug/L	94
39) Cyclohexane	10.49	56	2181	0.2430 ug/L	79
47) Trichloroethene	11.75	130	5698	0.8485 ug/L	89
60) Ethyl Methacrylate	13.23	69	863	0.1434 ug/L	74
79) 1,1,2,2-Tetrachloroethane	16.49	83	24380	4.7848 ug/L	97

(#) = qualifier out of range (m) = manual integration
6M146806.D 8260BWT.M Sat Apr 29 12:16:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146806.D Vial: 10
Acq On : 28 Apr 2017 11:00 Operator: TMB
Sample : L17041200-50 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

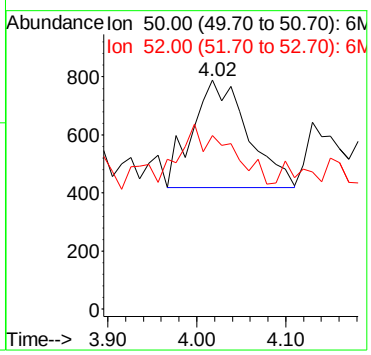


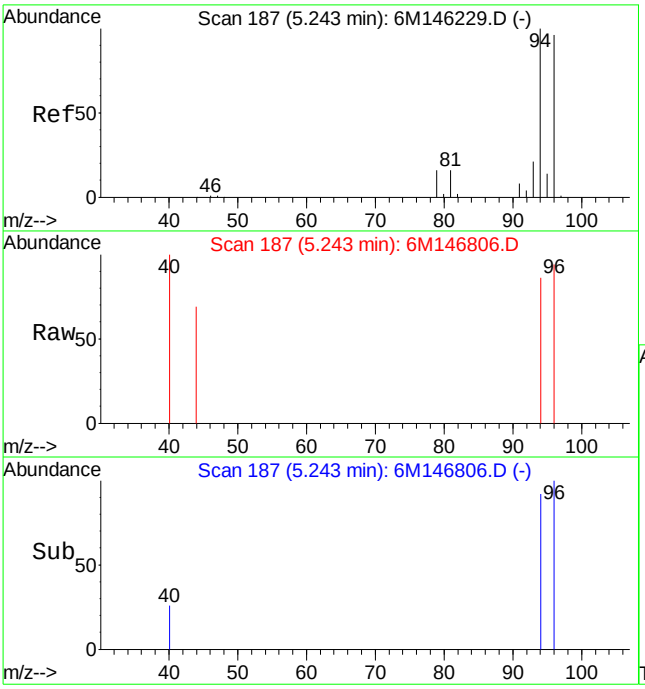


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. -0.00 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 50 Resp: 1600

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

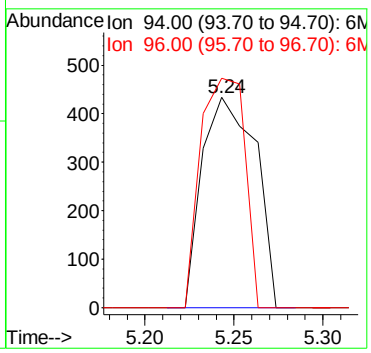


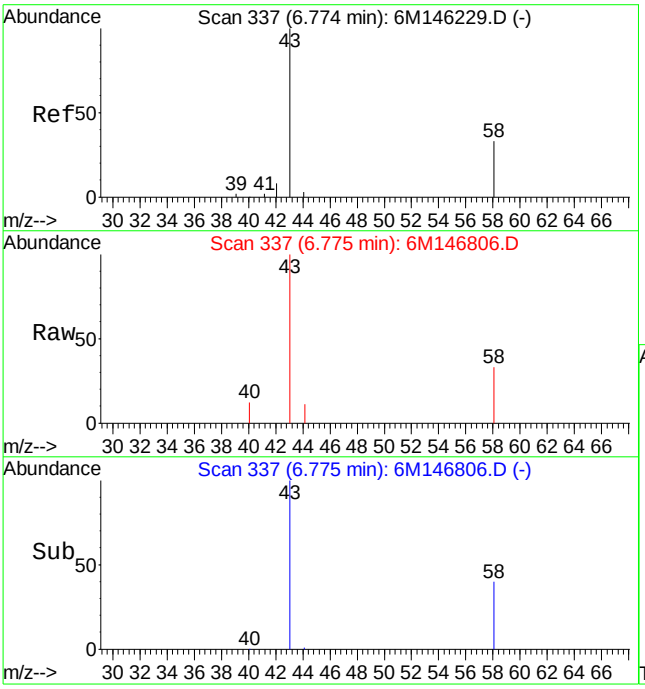


#6
Bromomethane
Concen: 0.20 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 94 Resp: 906

Ion	Ratio	Lower	Upper
94	100		
96	90.3	56.7	132.3

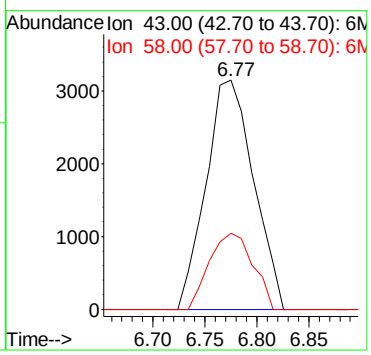


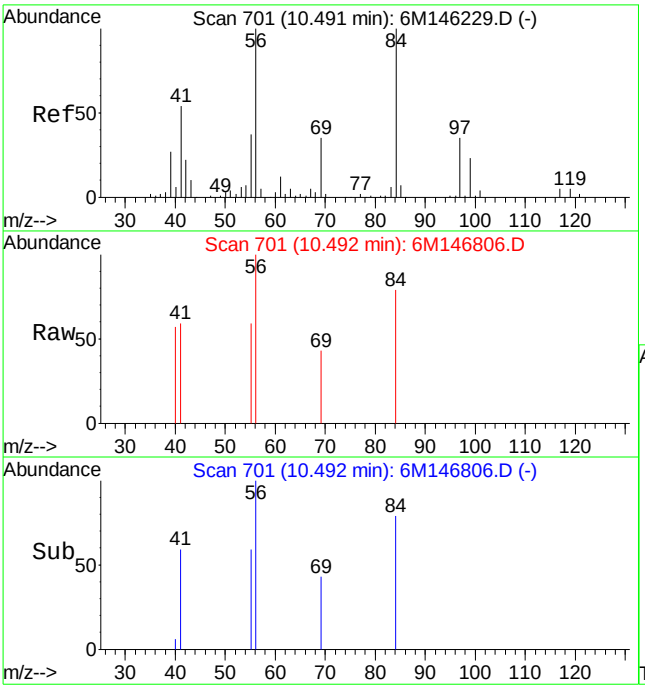


#13
Acetone
Concen: 8.07 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 43 Resp: 10040

Ion	Ratio	Lower	Upper
43	100		
58	30.3	16.4	38.2

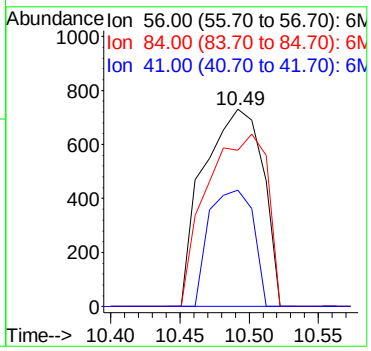


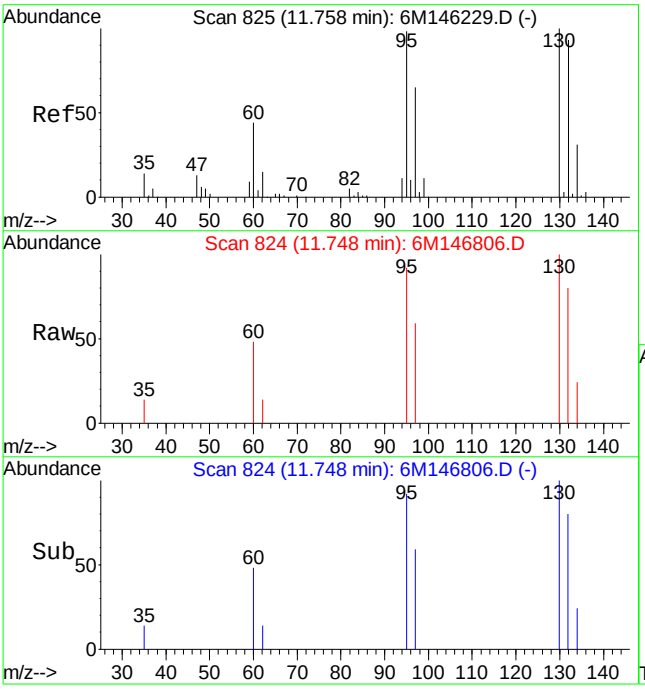


#39
Cyclohexane
Concen: 0.24 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 56 Resp: 2181

Ion	Ratio	Lower	Upper
56	100		
84	88.9	43.6	101.6
41	43.9	37.1	86.5

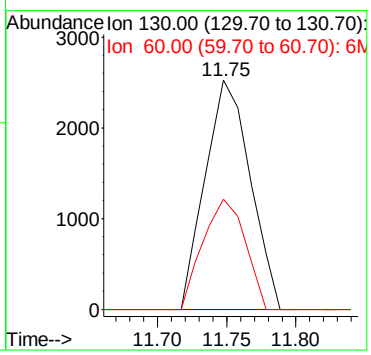


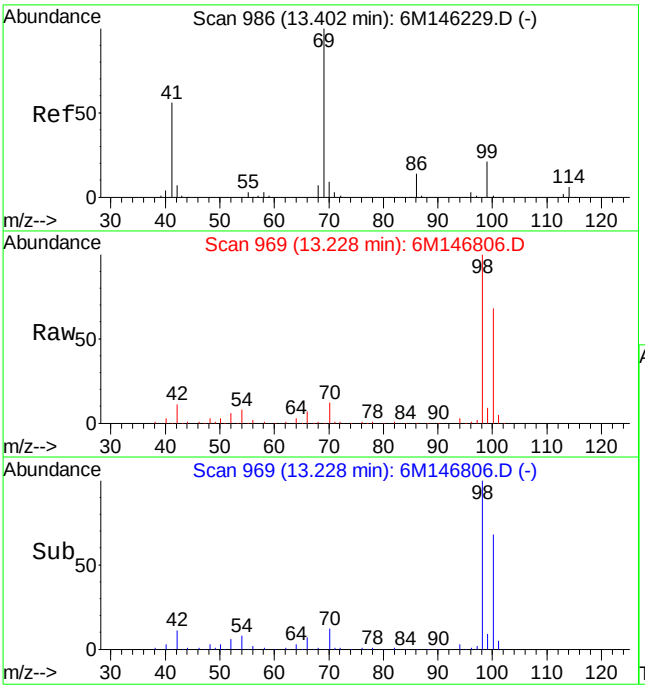


#47
Trichloroethene
Concen: 0.85 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion:130 Resp: 5698

Ion	Ratio	Lower	Upper
130	100		
60	45.1	32.0	74.6

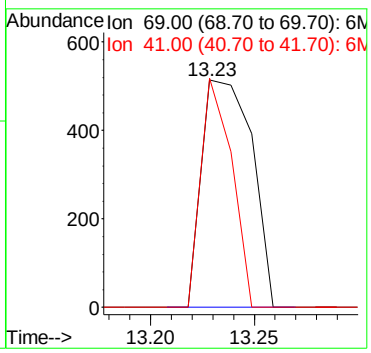


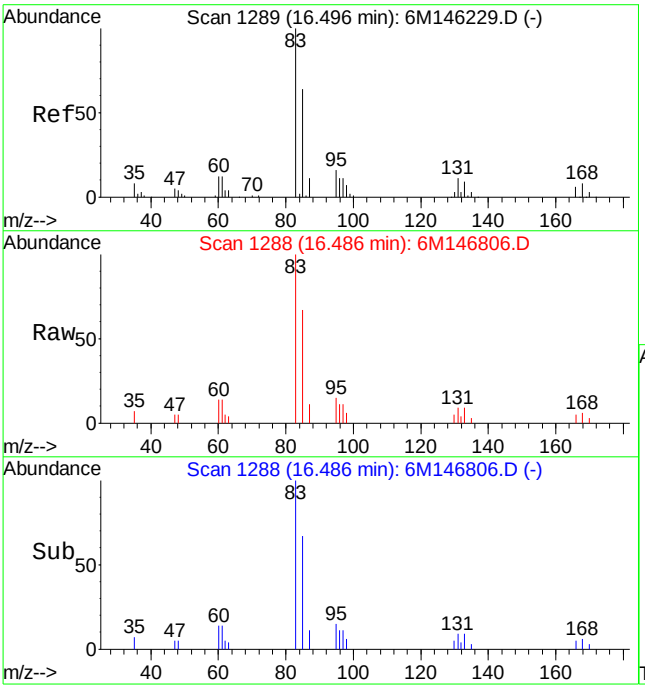


#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 69 Resp: 863

Ion	Ratio	Lower	Upper
69	100		
41	61.8	51.4	120.0

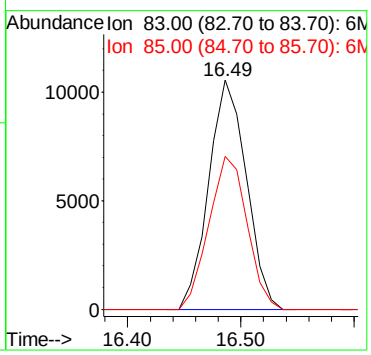




#79
1,1,2,2-Tetrachloroethane
Concen: 4.78 ug/L
RT: 16.49 min Scan# 1288
Delta R.T. -0.01 min
Lab File: 6M146806.D
Acq: 28 Apr 2017 11:00

Tgt Ion: 83 Resp: 24380

Ion	Ratio	Lower	Upper
83	100		
85	67.6	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146807.D Vial: 11
Acq On : 28 Apr 2017 11:30 Operator: TMB
Sample : L17041200-51 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:25 2017 Quant Results File: 8260BWT.RES

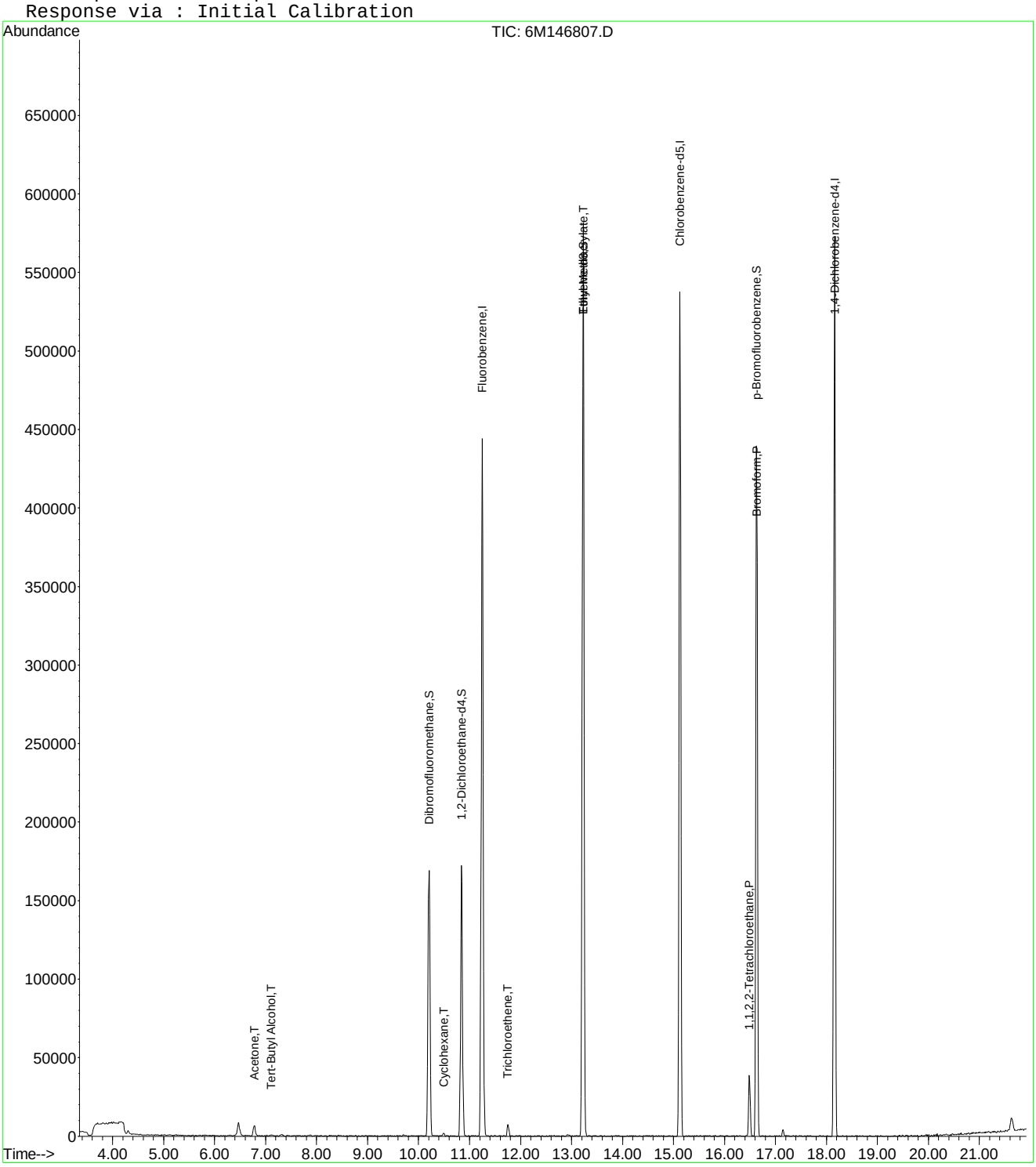
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

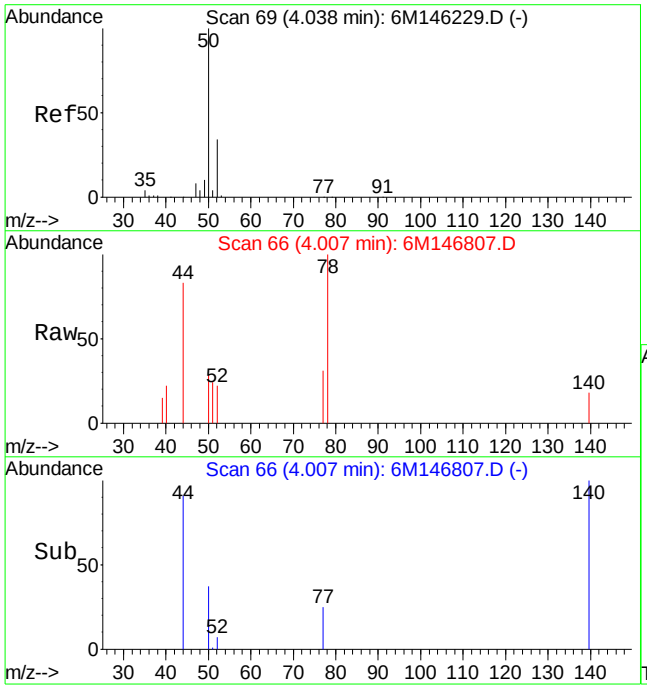
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	567154	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	392537	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	193223	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	147132	25.4128 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.64%		
43) 1,2-Dichloroethane-d4	10.84	65	155480	27.2475 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.00%		
58) Toluene-d8	13.23	98	536419	26.7804 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.12%		
80) p-Bromofluorobenzene	16.63	95	202686	27.6188 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.48%		
Target Compounds					Qvalue
3) Chloromethane	4.01	50	1105	Below Cal #	52
13) Acetone	6.77	43	12753	10.4202 ug/L	93
15) Tert-Butyl Alcohol	7.11	59	885	2.3313 ug/L #	57
39) Cyclohexane	10.49	56	1688	0.1912 ug/L	73
47) Trichloroethene	11.75	130	4100	0.6207 ug/L	81
60) Ethyl Methacrylate	13.23	69	753	0.1268 ug/L	74
76) Bromoform	16.64	173	765	0.2196 ug/L #	1
79) 1,1,2,2-Tetrachloroethane	16.49	83	28201	5.6039 ug/L	97

(#) = qualifier out of range (m) = manual integration
6M146807.D 8260BWT.M Sat Apr 29 12:16:27 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146807.D Vial: 11
Acq On : 28 Apr 2017 11:30 Operator: TMB
Sample : L17041200-51 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

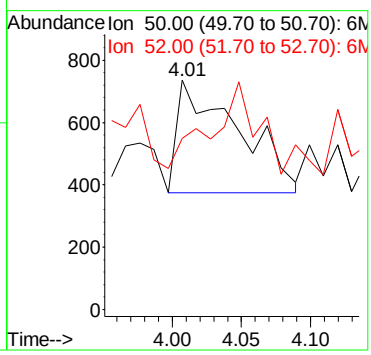


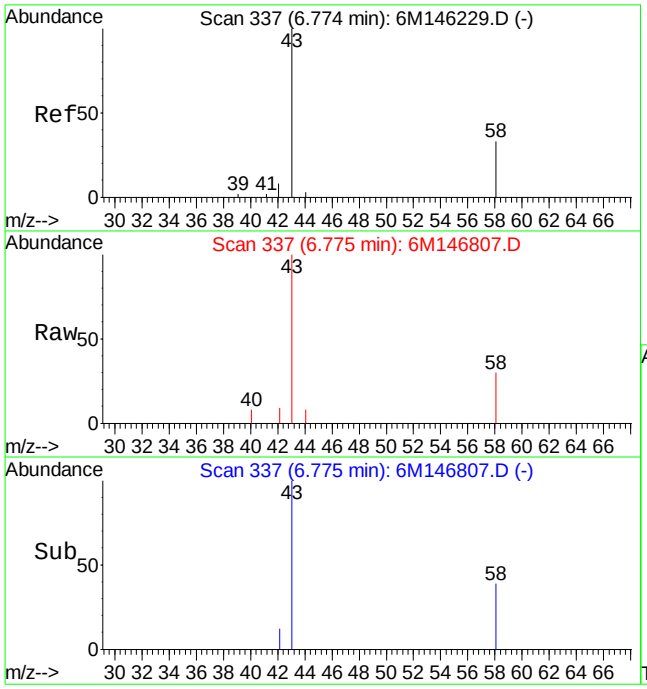


#3
Chloromethane
Concen: Below Cal
RT: 4.01 min Scan# 66
Delta R.T. -0.01 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 50 Resp: 1105

Ion	Ratio	Lower	Upper
50	100		
52	60.2	19.8	46.2#

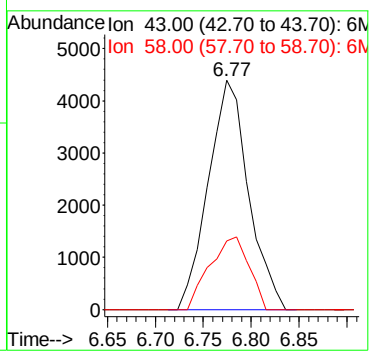


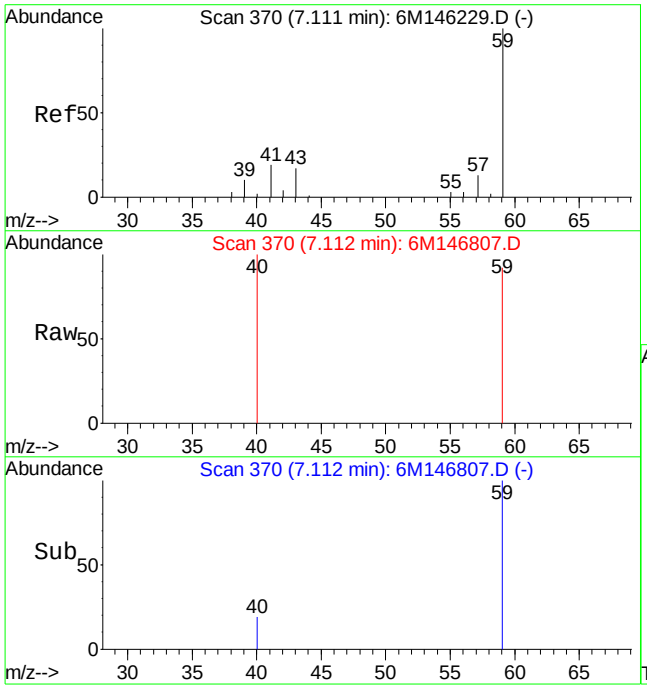


#13
Acetone
Concen: 10.42 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 43 Resp: 12753

Ion	Ratio	Lower	Upper
43	100		
58	30.9	16.4	38.2

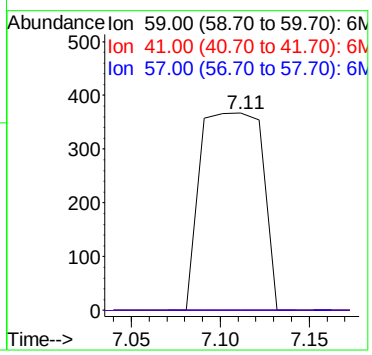


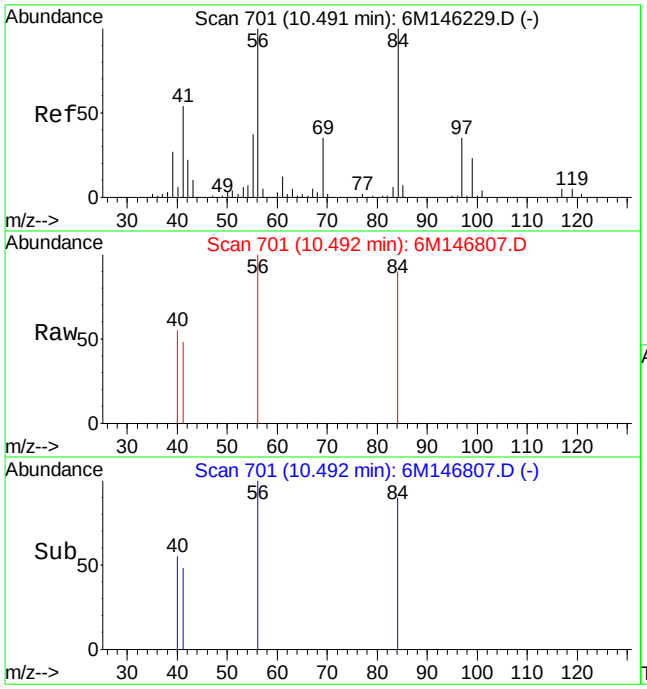


#15
Tert-Butyl Alcohol
Concen: 2.33 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 59 Resp: 885

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

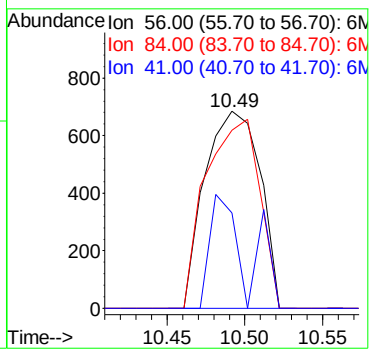


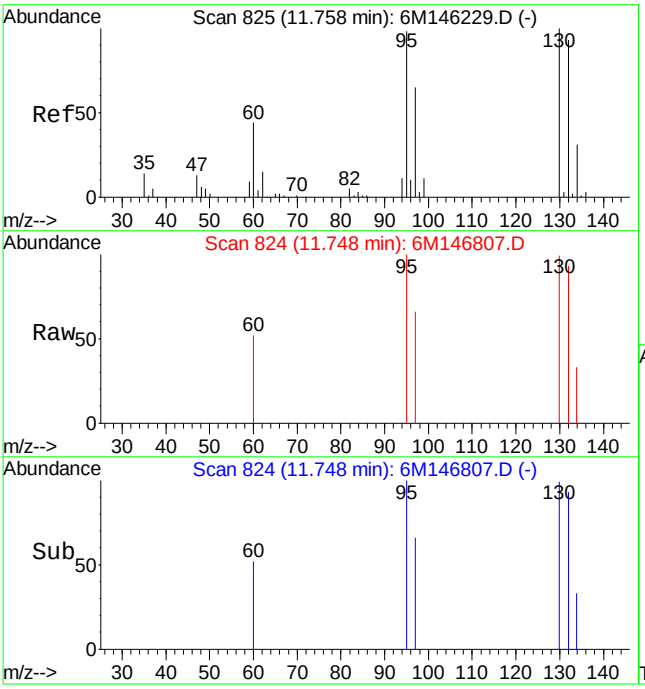


#39
Cyclohexane
Concen: 0.19 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 56 Resp: 1688

Ion	Ratio	Lower	Upper
56	100		
84	93.2	43.6	101.6
41	38.9	37.1	86.5

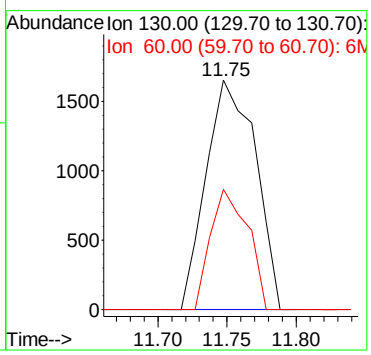


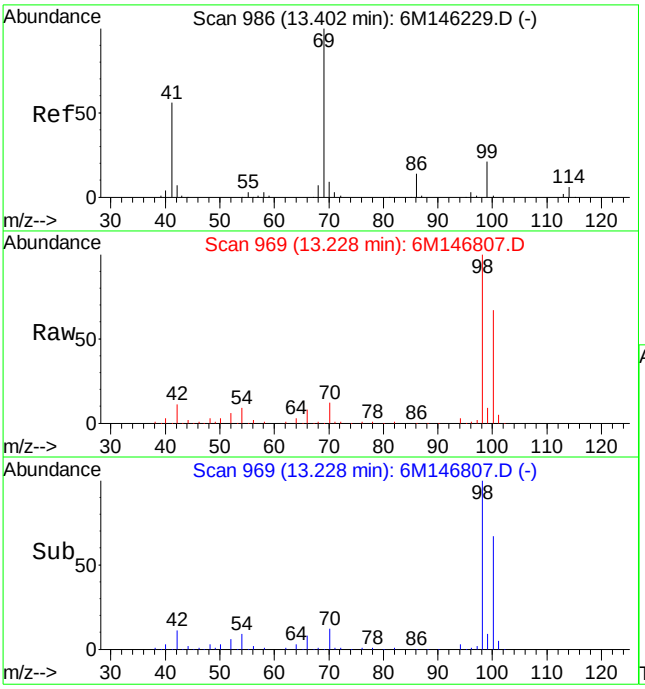


#47
Trichloroethene
Concen: 0.62 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion:130 Resp: 4100

Ion	Ratio	Lower	Upper
130	100		
60	39.5	32.0	74.6

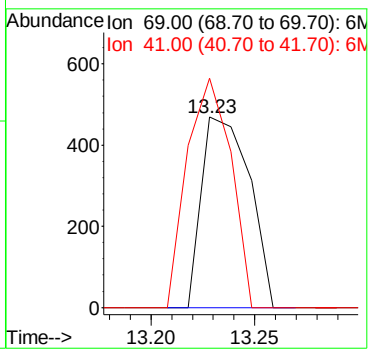


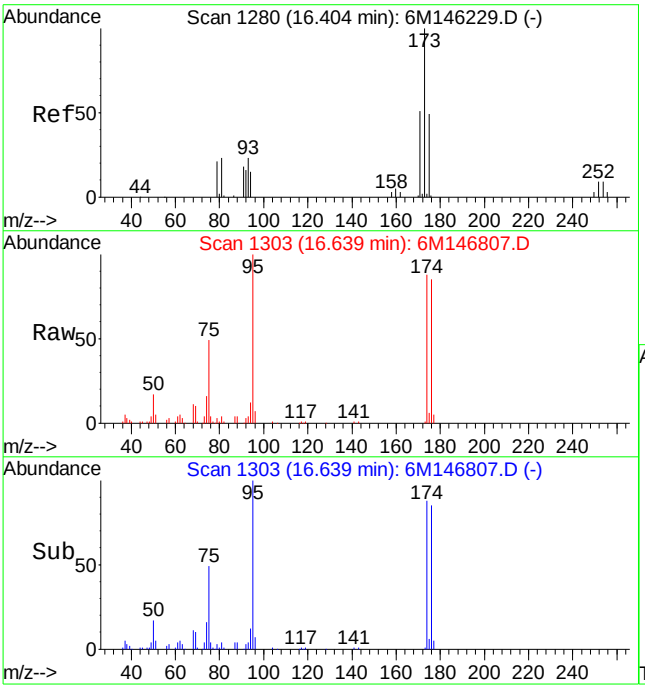


#60
Ethyl Methacrylate
Concen: 0.13 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 69 Resp: 753

Ion	Ratio	Lower	Upper
69	100		
41	109.7	51.4	120.0

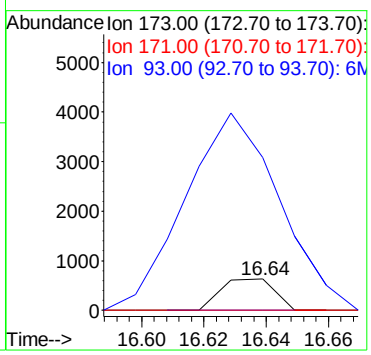


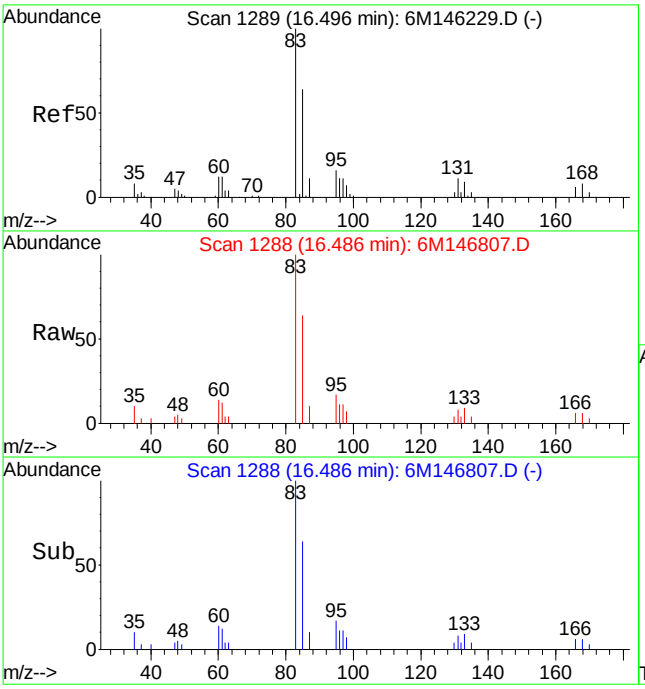


#76
Bromoform
Concen: 0.22 ug/L
RT: 16.64 min Scan# 1303
Delta R.T. 0.23 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion:173 Resp: 765

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1099.7	13.7	31.9#

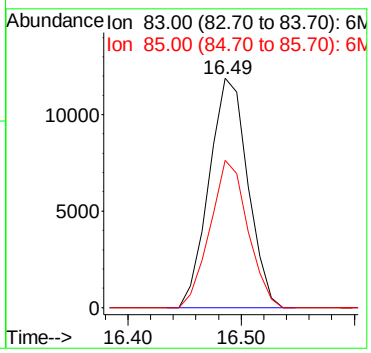




#79
1,1,2,2-Tetrachloroethane
Concen: 5.60 ug/L
RT: 16.49 min Scan# 1288
Delta R.T. -0.01 min
Lab File: 6M146807.D
Acq: 28 Apr 2017 11:30

Tgt Ion: 83 Resp: 28201

Ion	Ratio	Lower	Upper
83	100		
85	62.5	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146808.D Vial: 12
Acq On : 28 Apr 2017 12:02 Operator: TMB
Sample : L17041200-52 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:30 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

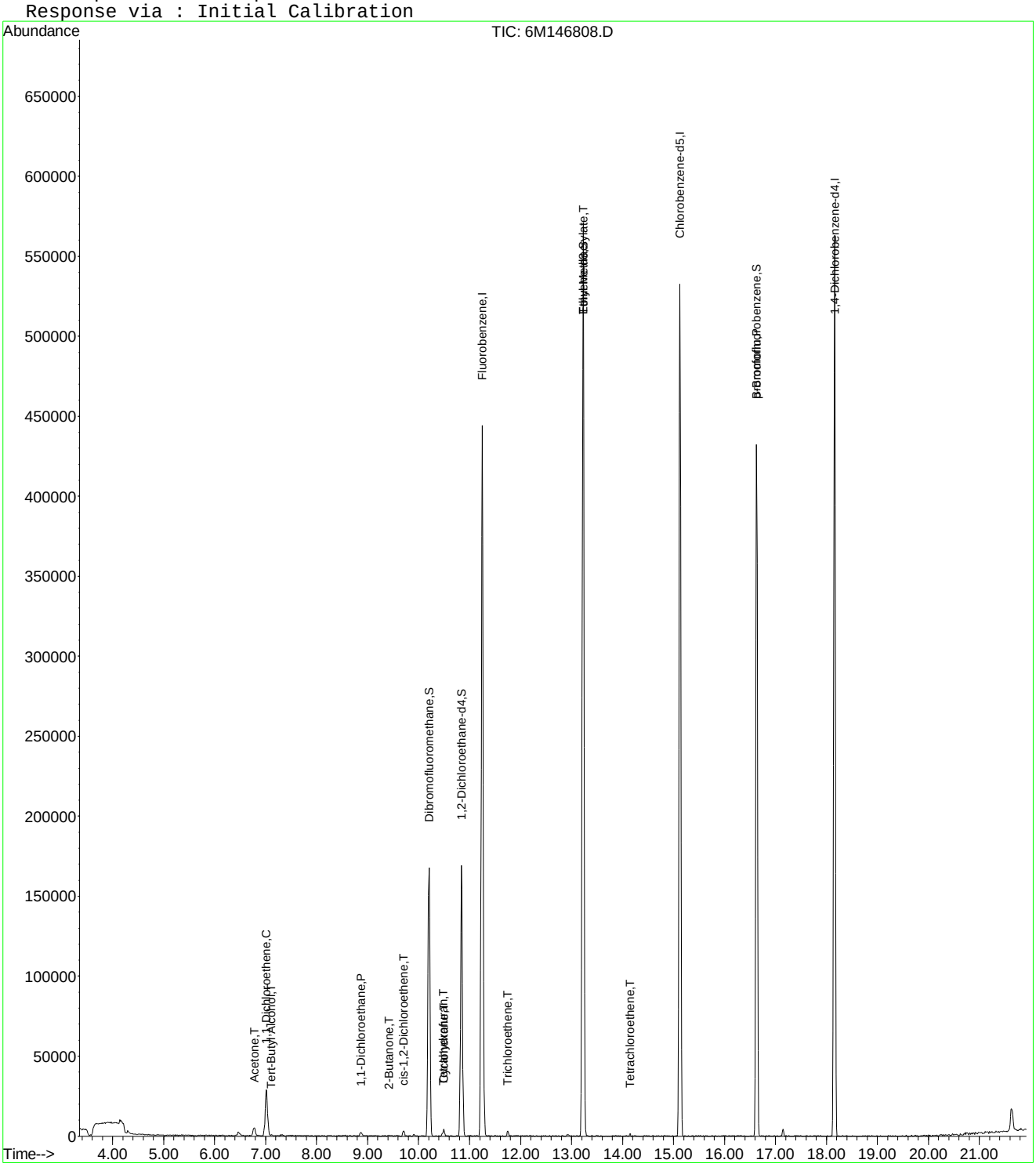
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	561744	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	385997	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	190664	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	146000	25.4601	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.84%			
43) 1,2-Dichloroethane-d4	10.84	65	152781	27.0324	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.12%			
58) Toluene-d8	13.23	98	524405	26.6242	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%			
80) p-Bromofluorobenzene	16.63	95	196285	27.1056	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.44%			

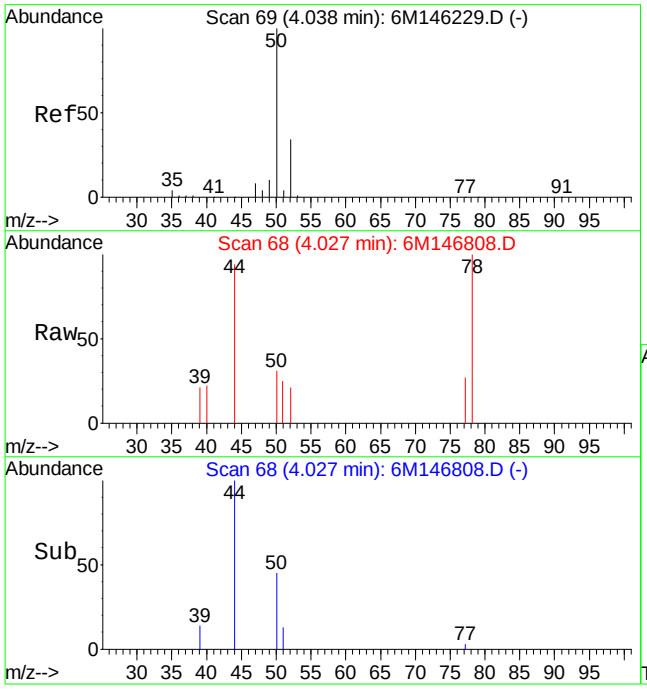
Target Compounds						Qvalue
3) Chloromethane	4.03	50	1233	Below Cal	#	42
13) Acetone	6.77	43	11215	9.2518	ug/L	96
14) 1,1-Dichloroethene	7.01	61	34485	4.0267	ug/L	86
15) Tert-Butyl Alcohol	7.11	59	1646	4.3776	ug/L #	57
27) 1,1-Dichloroethane	8.87	63	4457	0.4365	ug/L	90
29) 2-Butanone	9.42	43	190	0.1244	ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	2365	0.3490	ug/L	73
36) Tetrahydrofuran	10.48	42	197	0.1958	ug/L #	41
39) Cyclohexane	10.49	56	3470	0.3968	ug/L	86
47) Trichloroethene	11.75	130	1489	0.2276	ug/L	88
60) Ethyl Methacrylate	13.23	69	950	0.1627	ug/L	72
66) Tetrachloroethene	14.15	166	745	0.1274	ug/L #	67
76) Bromoform	16.63	173	725	0.2116	ug/L #	1

(#) = qualifier out of range (m) = manual integration
6M146808.D 8260BWT.M Sat Apr 29 12:16:31 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146808.D Vial: 12
Acq On : 28 Apr 2017 12:02 Operator: TMB
Sample : L17041200-52 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

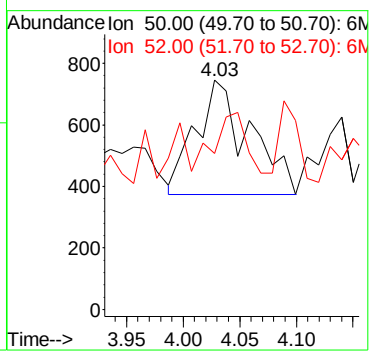


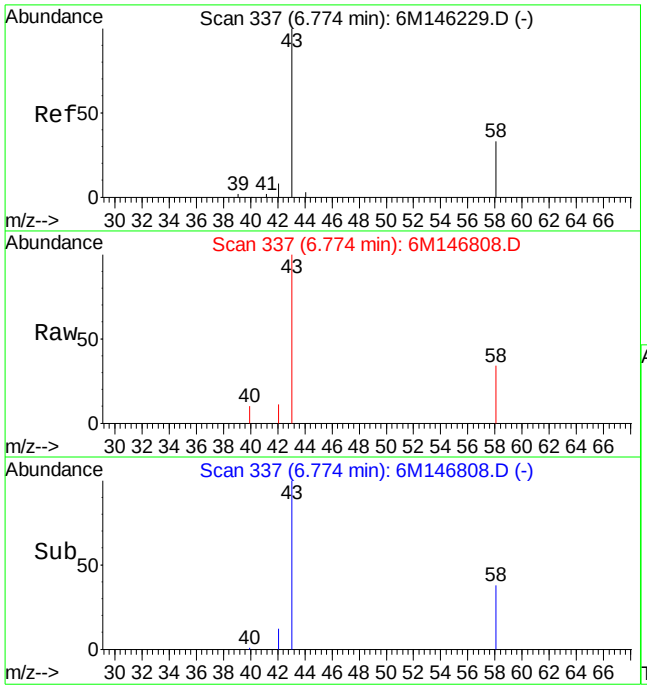


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 50 Resp: 1233

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

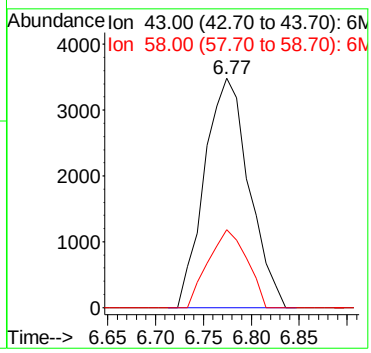


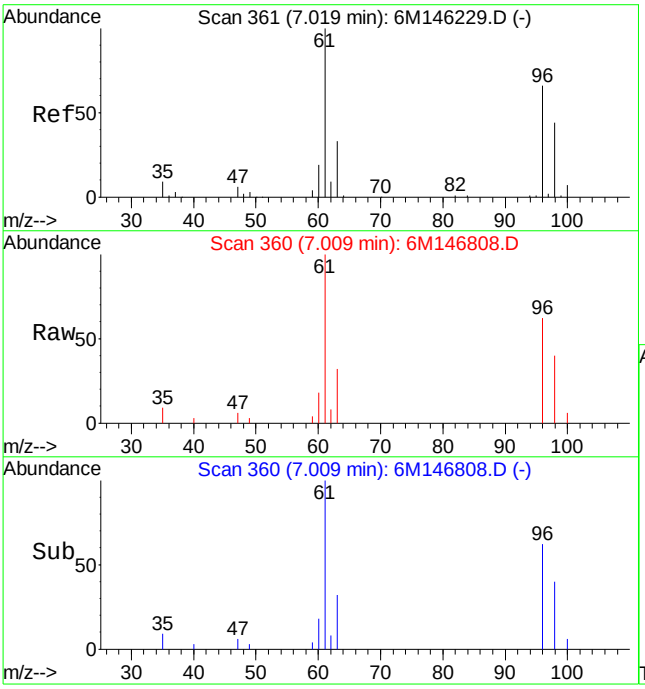


#13
Acetone
Concen: 9.25 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 43 Resp: 11215

Ion	Ratio	Lower	Upper
43	100		
58	29.5	16.4	38.2

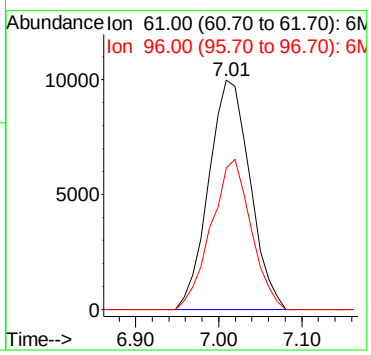


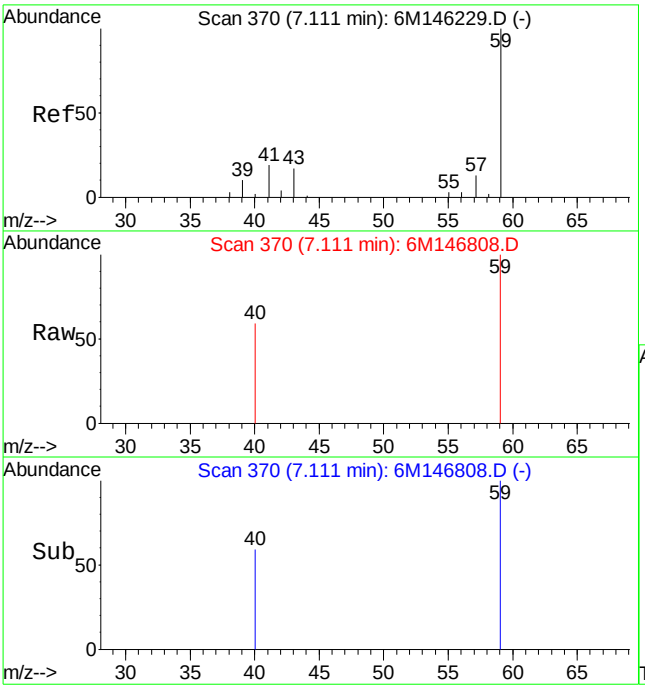


#14
1,1-Dichloroethene
Concen: 4.03 ug/L
RT: 7.01 min Scan# 360
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 61 Resp: 34485

Ion	Ratio	Lower	Upper
61	100		
96	63.1	32.0	74.6

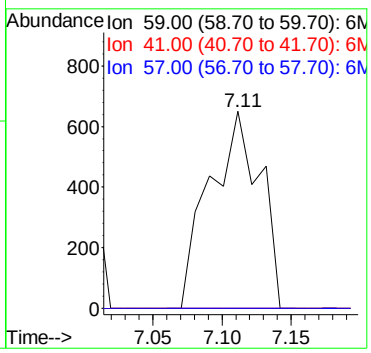


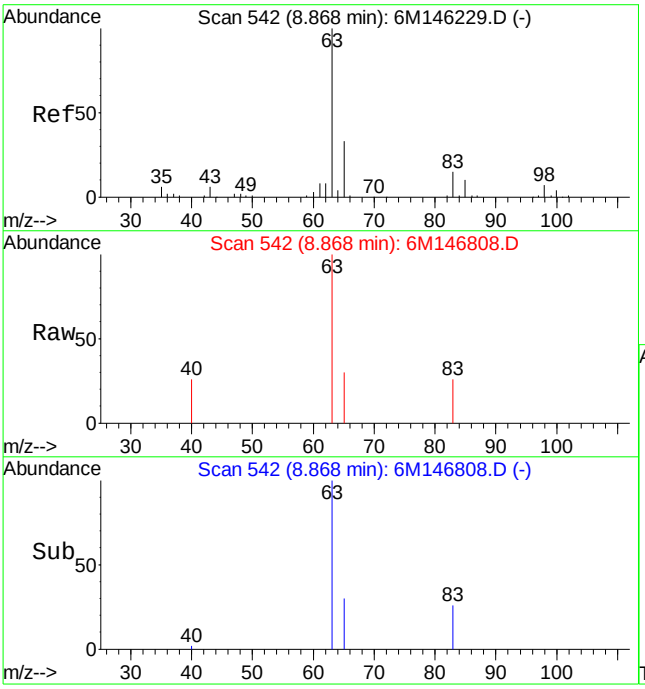


#15
Tert-Butyl Alcohol
Concen: 4.38 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 59 Resp: 1646

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

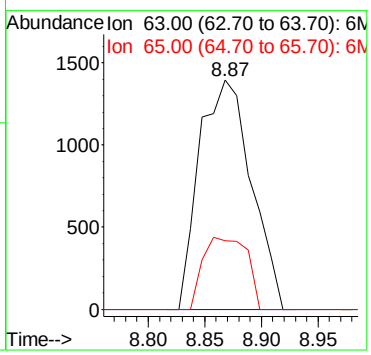


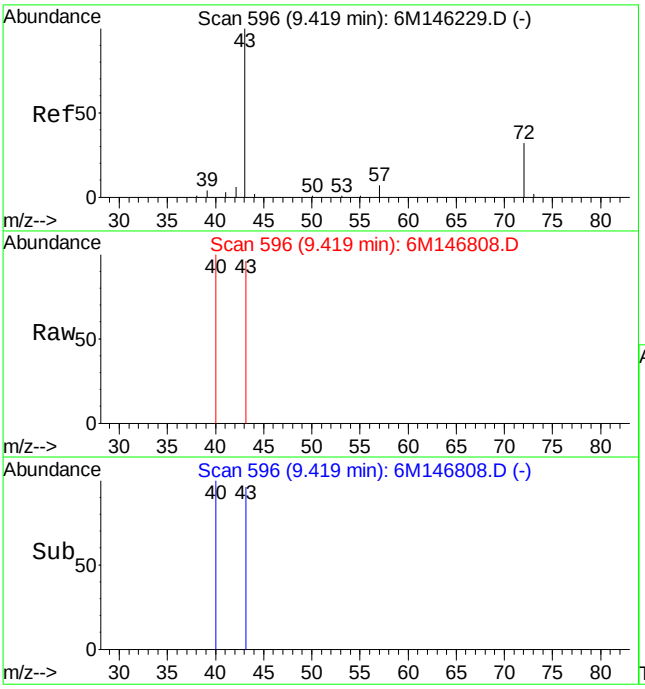


#27
1,1-Dichloroethane
Concen: 0.44 ug/L
RT: 8.87 min Scan# 542
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 63 Resp: 4457

Ion	Ratio	Lower	Upper
63	100		
65	26.6	19.3	44.9

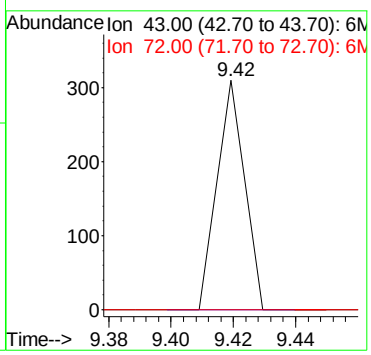


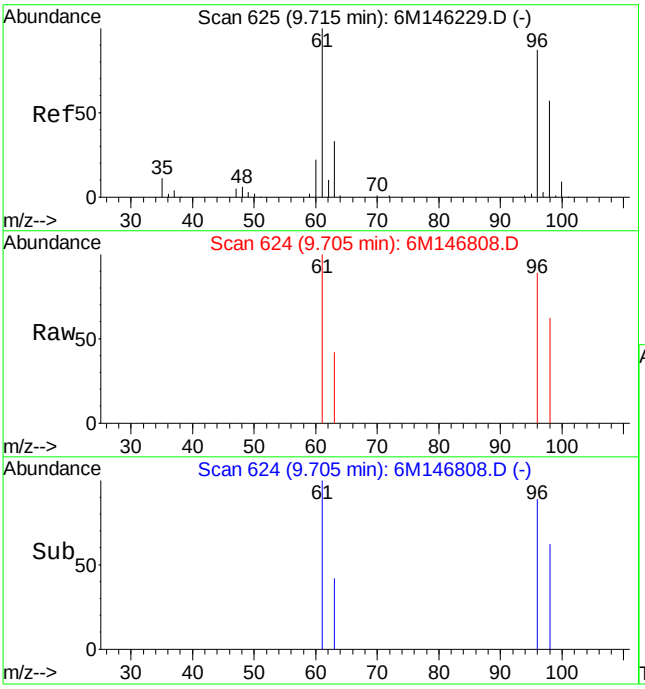


#29
2-Butanone
Concen: 0.12 ug/L
RT: 9.42 min Scan# 596
Delta R.T. 0.01 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 43 Resp: 190

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

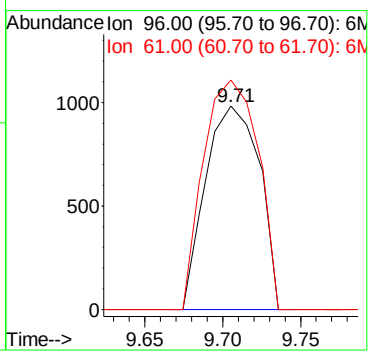


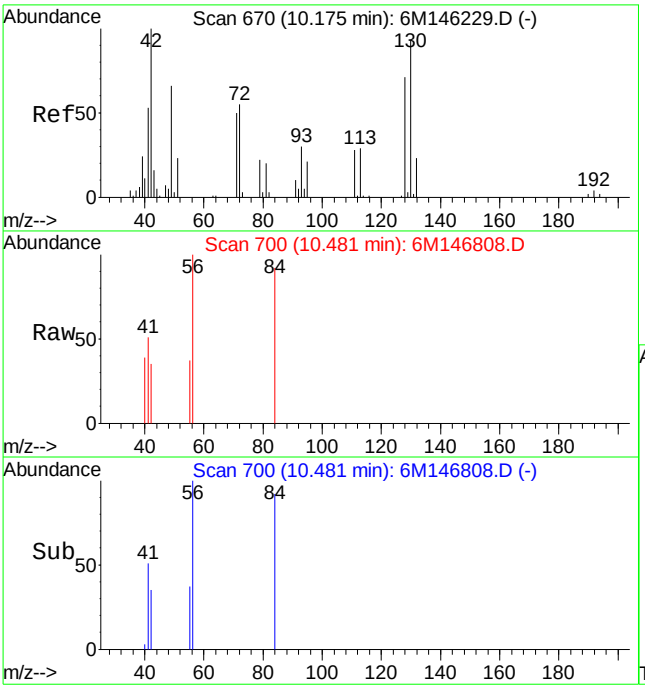


#32
cis-1,2-Dichloroethene
Concen: 0.35 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 96 Resp: 2365

Ion	Ratio	Lower	Upper
96	100		
61	114.7	89.2	208.2

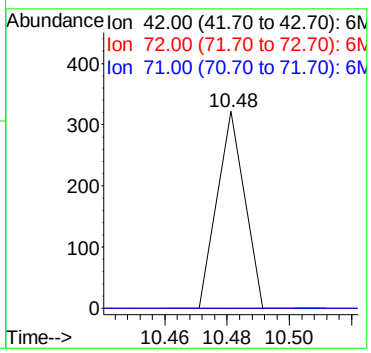


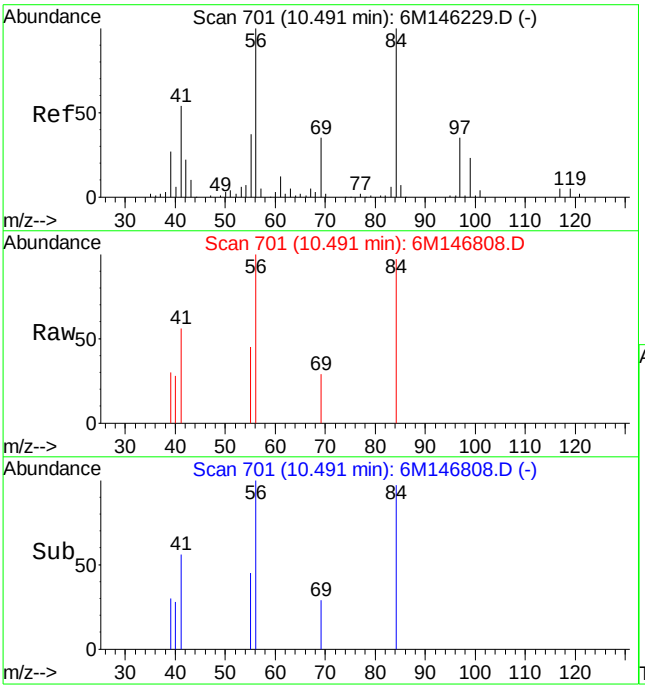


#36
Tetrahydrofuran
Concen: 0.20 ug/L
RT: 10.48 min Scan# 700
Delta R.T. 0.31 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 42 Resp: 197

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

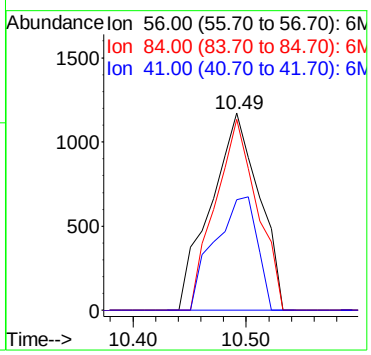


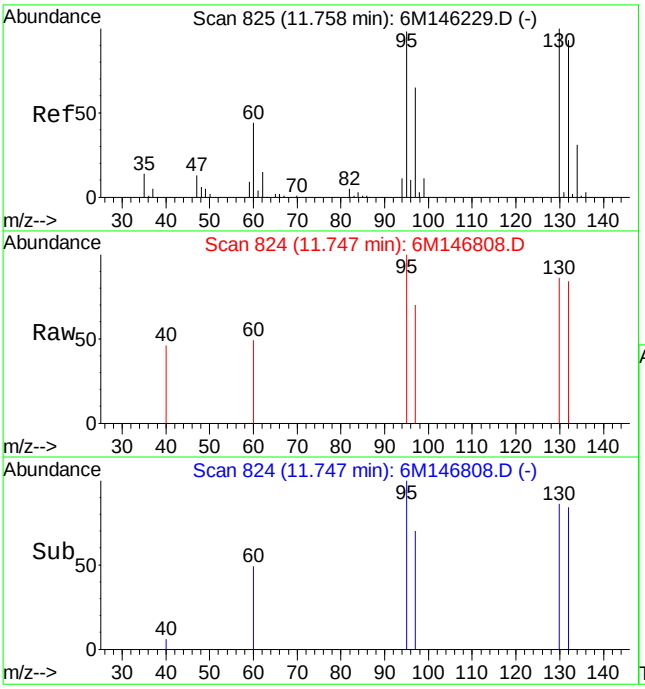


#39
Cyclohexane
Concen: 0.40 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 56 Resp: 3470

Ion	Ratio	Lower	Upper
56	100		
84	83.9	43.6	101.6
41	50.9	37.1	86.5

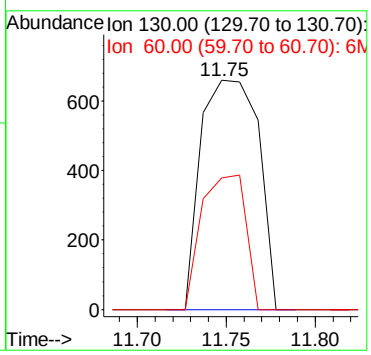


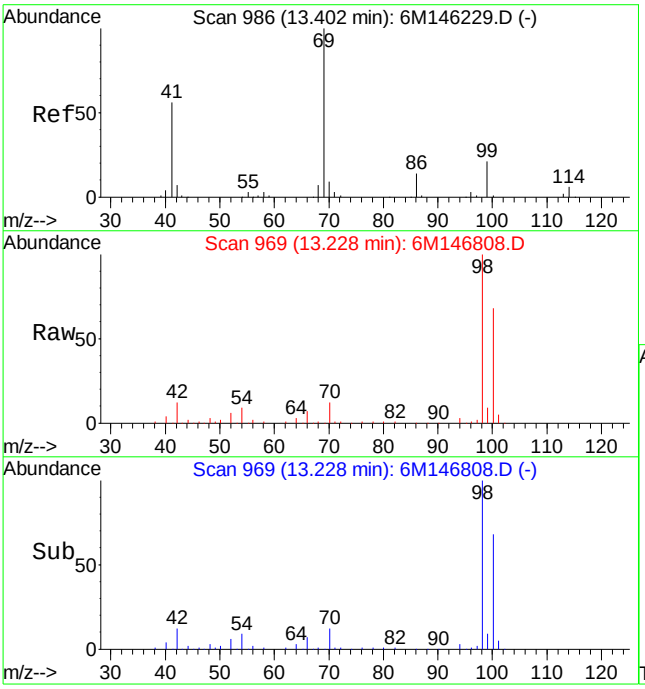


#47
Trichloroethene
Concen: 0.23 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion:130 Resp: 1489

Ion	Ratio	Lower	Upper
130	100		
60	44.7	32.0	74.6

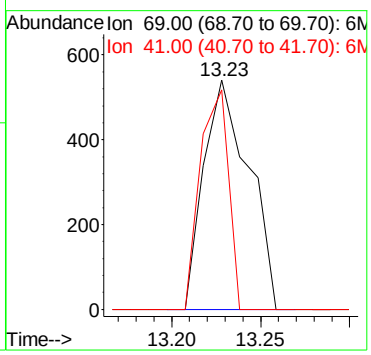


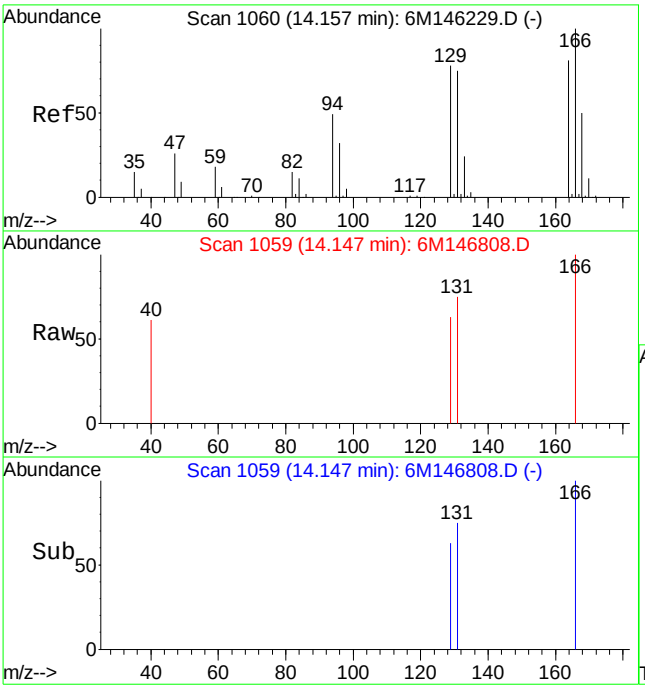


#60
Ethyl Methacrylate
Concen: 0.16 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion: 69 Resp: 950

Ion	Ratio	Lower	Upper
69	100		
41	60.1	51.4	120.0

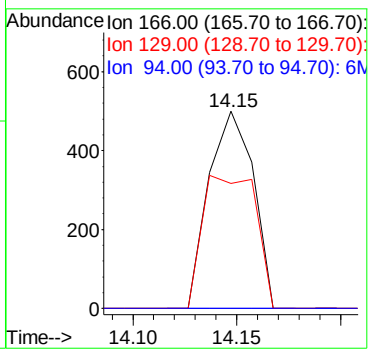


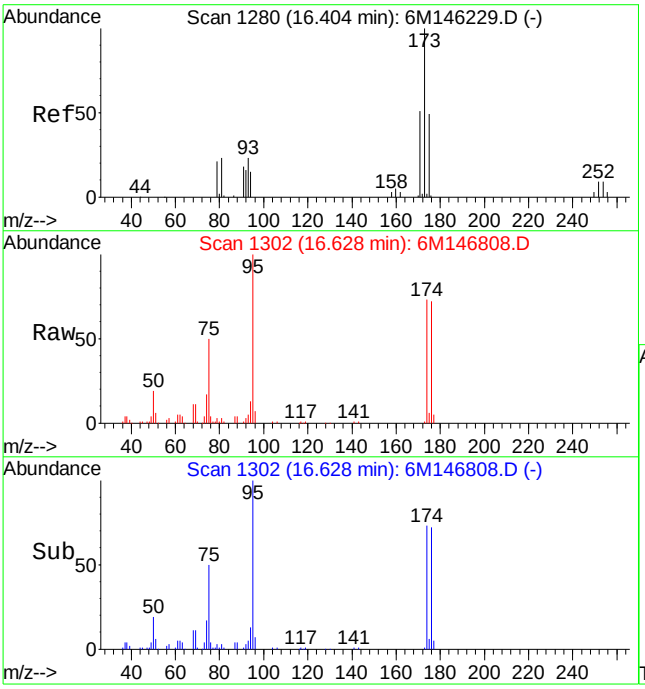


#66
Tetrachloroethene
Concen: 0.13 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion:166 Resp: 745

Ion	Ratio	Lower	Upper
166	100		
129	80.8	43.5	101.5
94	0.0	27.8	64.8#

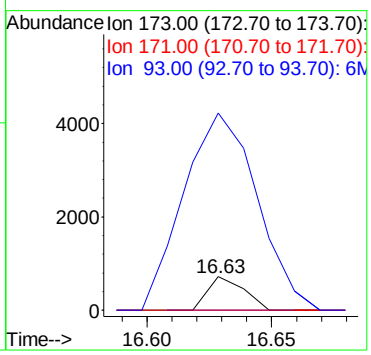




#76
Bromoform
Concen: 0.21 ug/L
RT: 16.63 min Scan# 1302
Delta R.T. 0.22 min
Lab File: 6M146808.D
Acq: 28 Apr 2017 12:02

Tgt Ion:173 Resp: 725

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1199.6	13.7	31.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146809.D Vial: 13
Acq On : 28 Apr 2017 12:32 Operator: TMB
Sample : L17041200-53 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:35 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

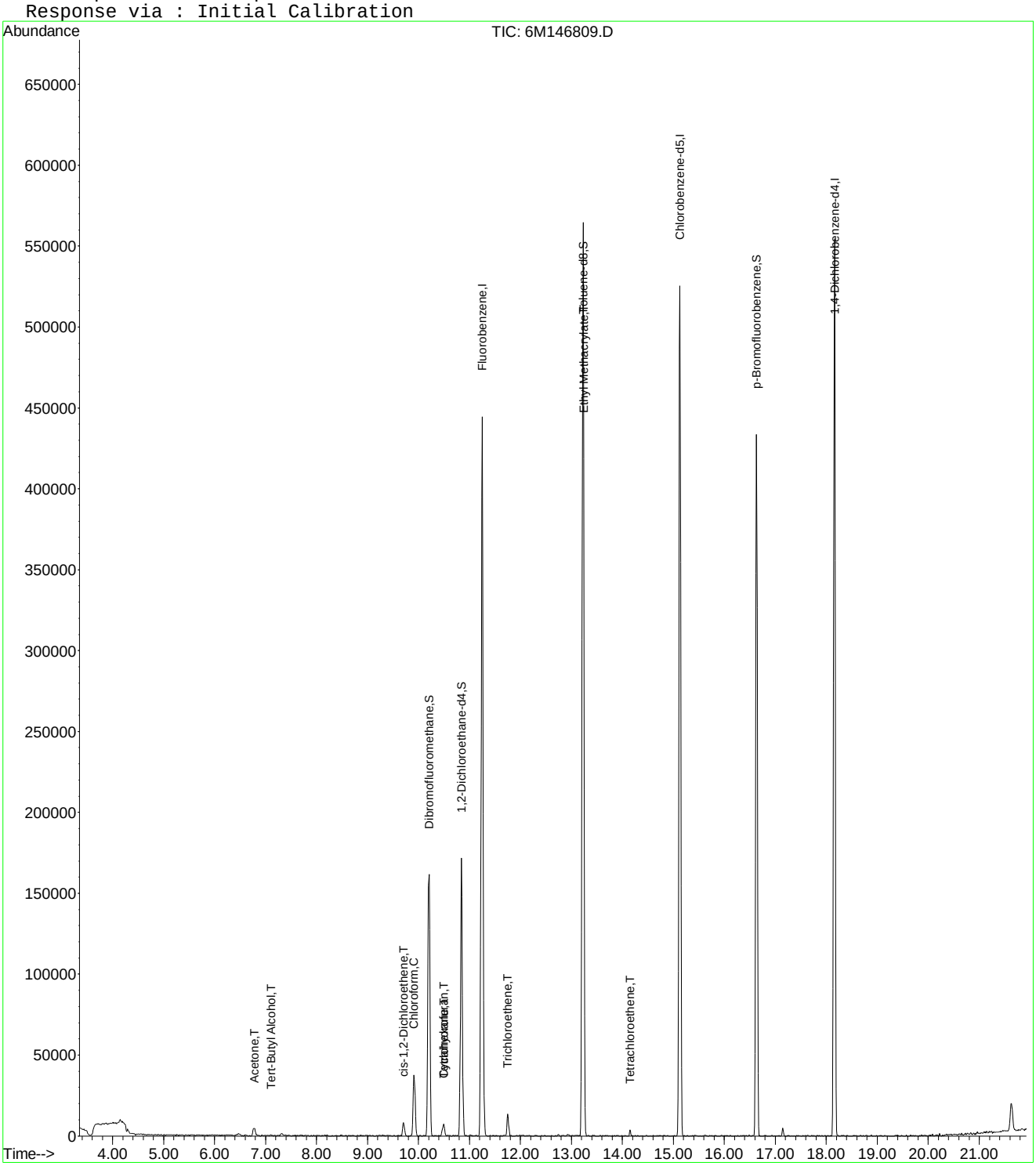
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	563548	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	389847	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	191480	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	143304	24.9100	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.64%			
43) 1,2-Dichloroethane-d4	10.84	65	154099	27.1783	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.72%			
58) Toluene-d8	13.23	98	527920	26.5380	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.16%			
80) p-Bromofluorobenzene	16.63	95	200077	27.5115	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.04%			
Target Compounds						Qvalue
3) Chloromethane	4.03	50	505	Below Cal	#	42
13) Acetone	6.78	43	10271	8.4459	ug/L	92
15) Tert-Butyl Alcohol	7.11	59	679	1.8001	ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	5801	0.8533	ug/L	79
33) Chloroform	9.91	83	43560	3.7331	ug/L	94
36) Tetrahydrofuran	10.49	42	733	0.7262	ug/L #	41
39) Cyclohexane	10.49	56	6056	0.6904	ug/L	80
47) Trichloroethene	11.75	130	6758	1.0297	ug/L	90
60) Ethyl Methacrylate	13.24	69	1132	0.1919	ug/L #	59
66) Tetrachloroethene	14.15	166	1429	0.2419	ug/L	92

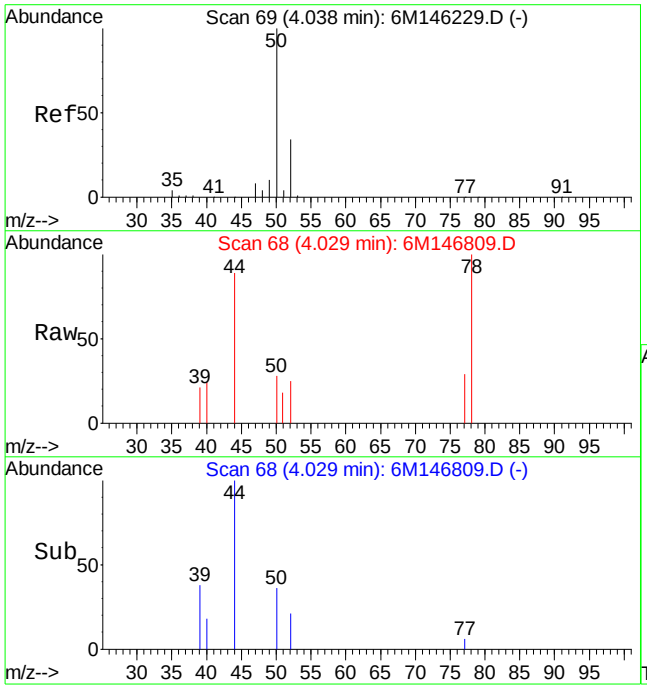
(#) = qualifier out of range (m) = manual integration
6M146809.D 8260BWT.M Sat Apr 29 12:16:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146809.D Vial: 13
Acq On : 28 Apr 2017 12:32 Operator: TMB
Sample : L17041200-53 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

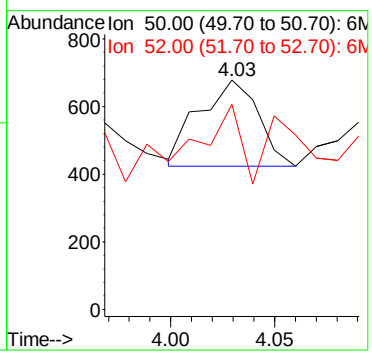


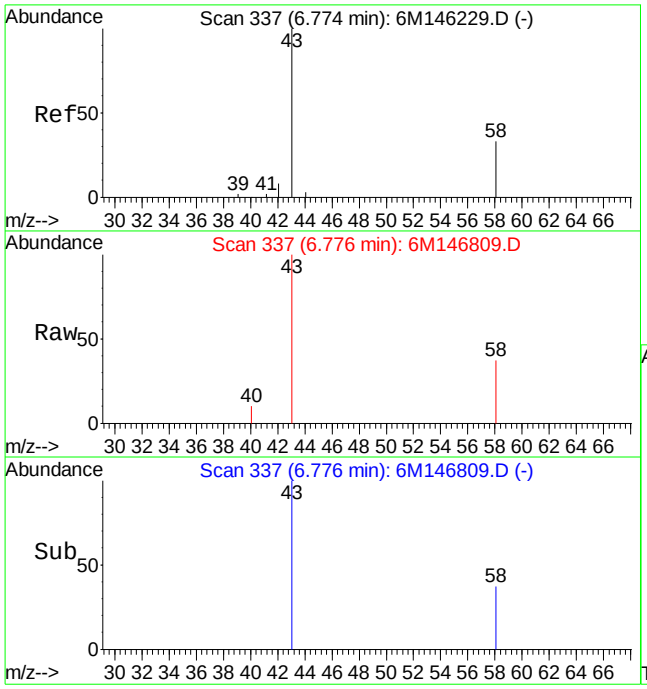


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 50 Resp: 505

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

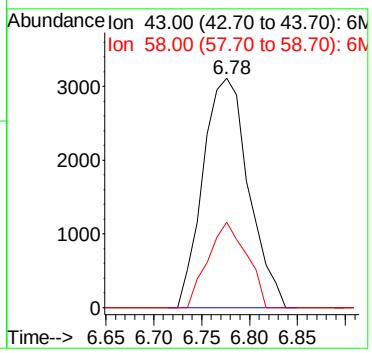


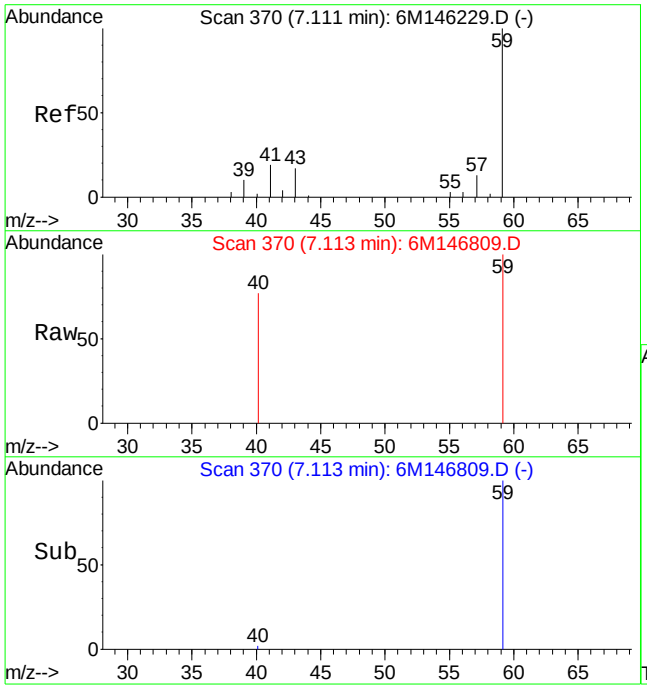


#13
Acetone
Concen: 8.45 ug/L
RT: 6.78 min Scan# 337
Delta R.T. 0.00 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 43 Resp: 10271

Ion	Ratio	Lower	Upper
43	100		
58	31.4	16.4	38.2

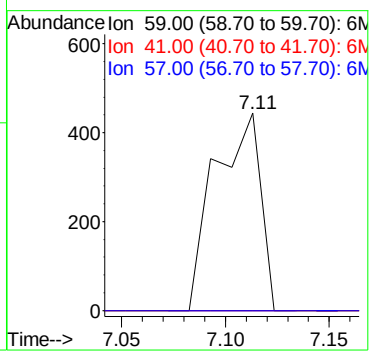


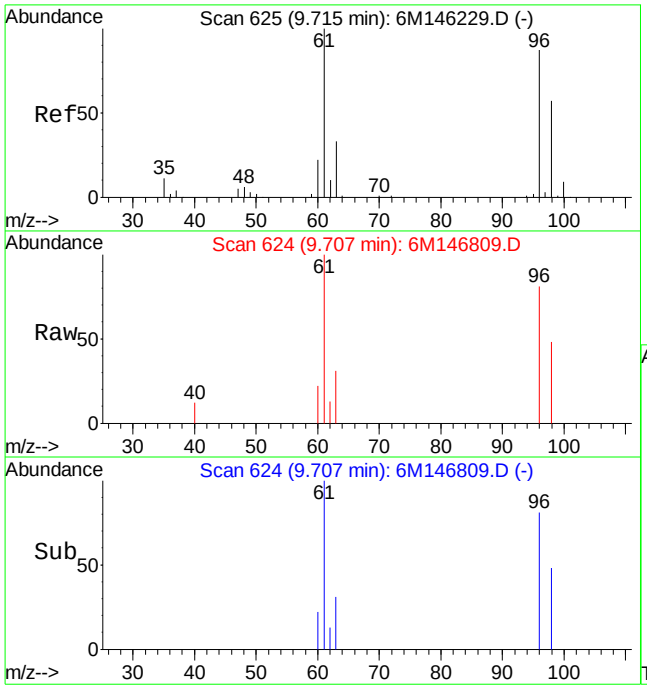


#15
Tert-Butyl Alcohol
Concen: 1.80 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 59 Resp: 679

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

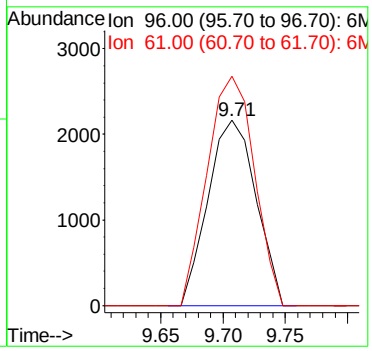


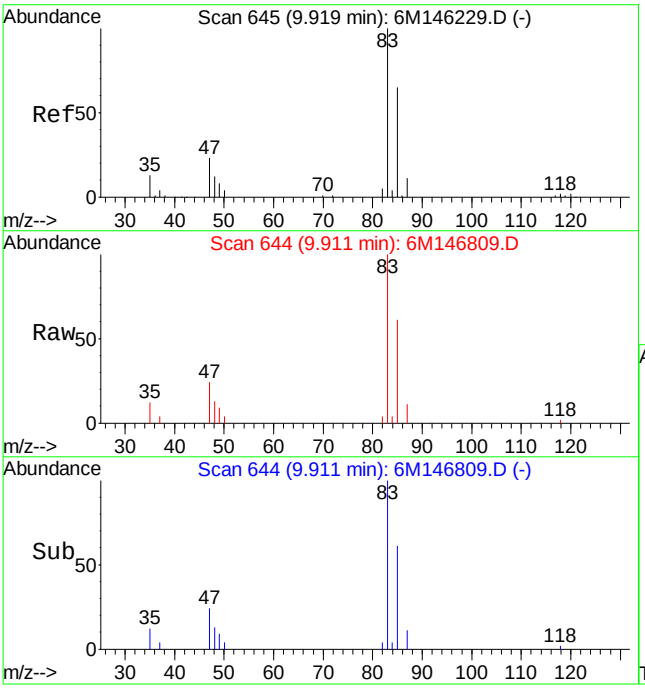


#32
cis-1,2-Dichloroethene
Concen: 0.85 ug/L
RT: 9.71 min Scan# 624
Delta R.T. 0.00 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 96 Resp: 5801

Ion	Ratio	Lower	Upper
96	100		
61	121.7	89.2	208.2

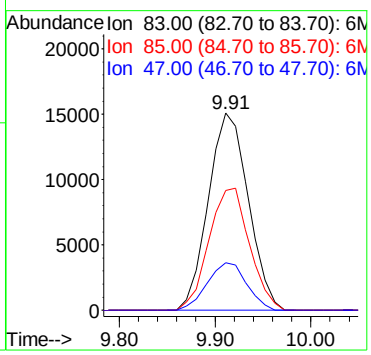


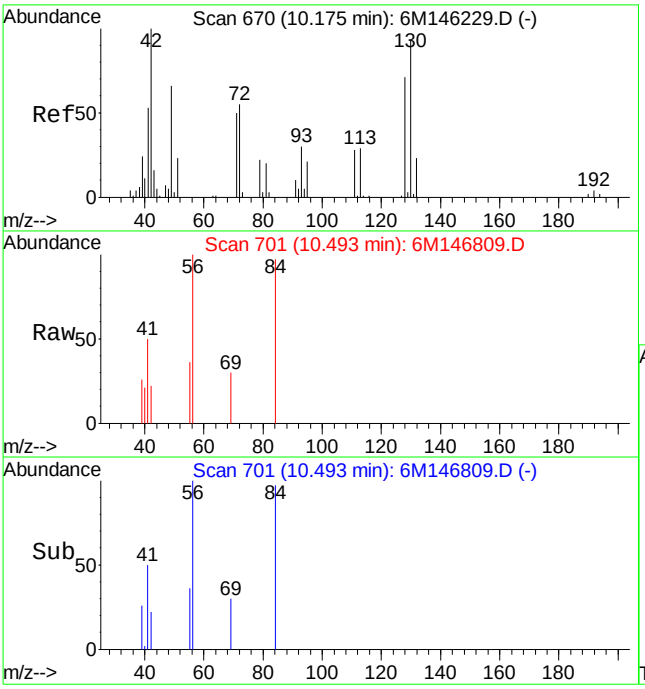


#33
Chloroform
Concen: 3.73 ug/L
RT: 9.91 min Scan# 644
Delta R.T. 0.00 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 83 Resp: 43560

Ion	Ratio	Lower	Upper
83	100		
85	62.7	39.0	91.0
47	23.7	18.5	43.1

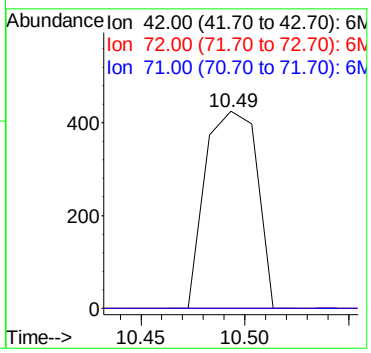


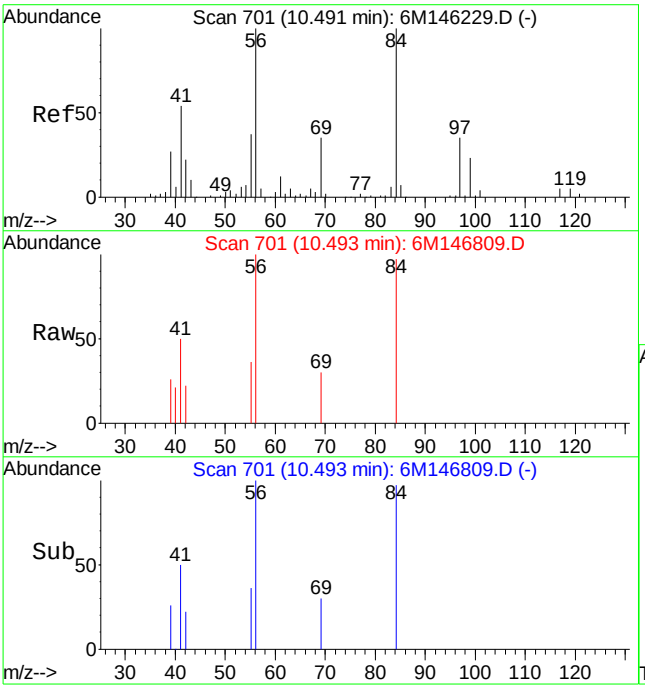


#36
Tetrahydrofuran
Concen: 0.73 ug/L
RT: 10.49 min Scan# 701
Delta R.T. 0.32 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 42 Resp: 733

Ion	Ratio	Lower	Upper
42	100		
72	0.0	20.8	48.4#
71	0.0	19.9	46.5#

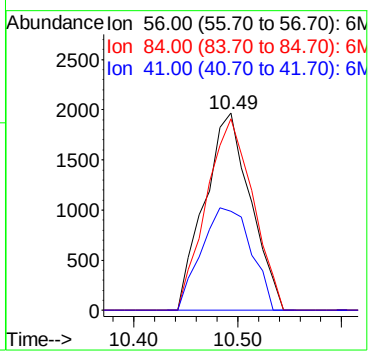


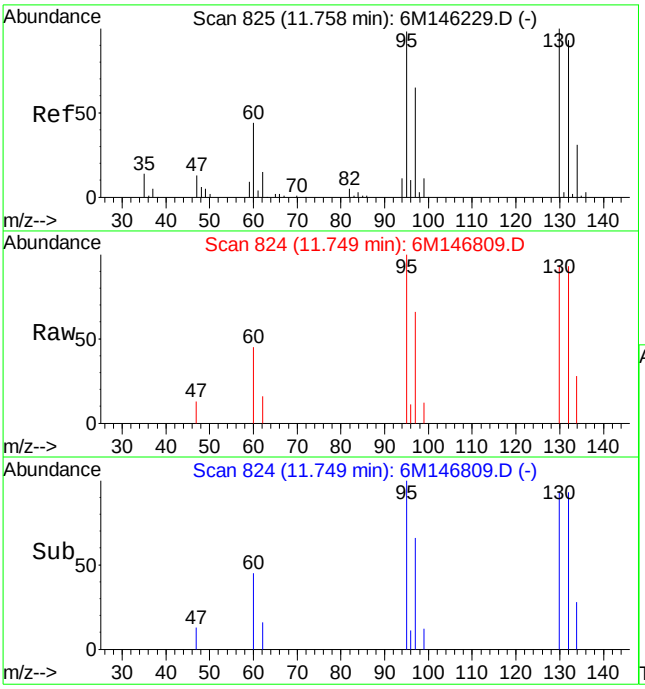


#39
Cyclohexane
Concen: 0.69 ug/L
RT: 10.49 min Scan# 701
Delta R.T. 0.00 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 56 Resp: 6056

Ion	Ratio	Lower	Upper
56	100		
84	98.2	43.6	101.6
41	56.1	37.1	86.5

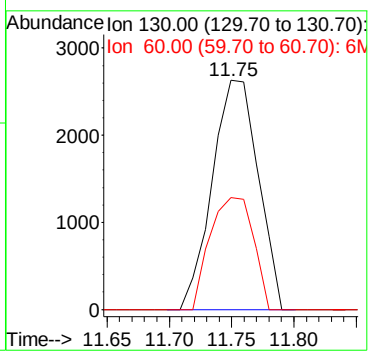


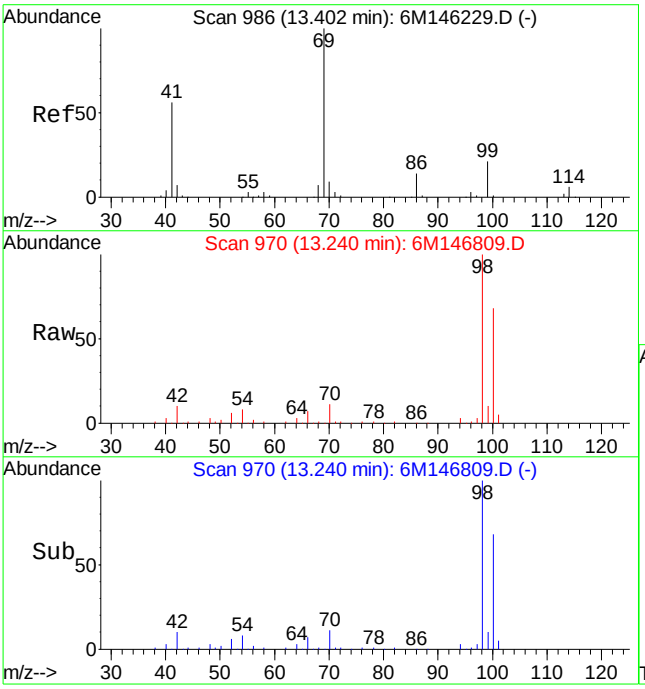


#47
Trichloroethene
Concen: 1.03 ug/L
RT: 11.75 min Scan# 824
Delta R.T. 0.00 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion:130 Resp: 6758

Ion	Ratio	Lower	Upper
130	100		
60	45.9	32.0	74.6

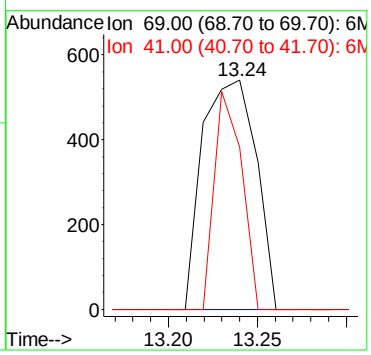


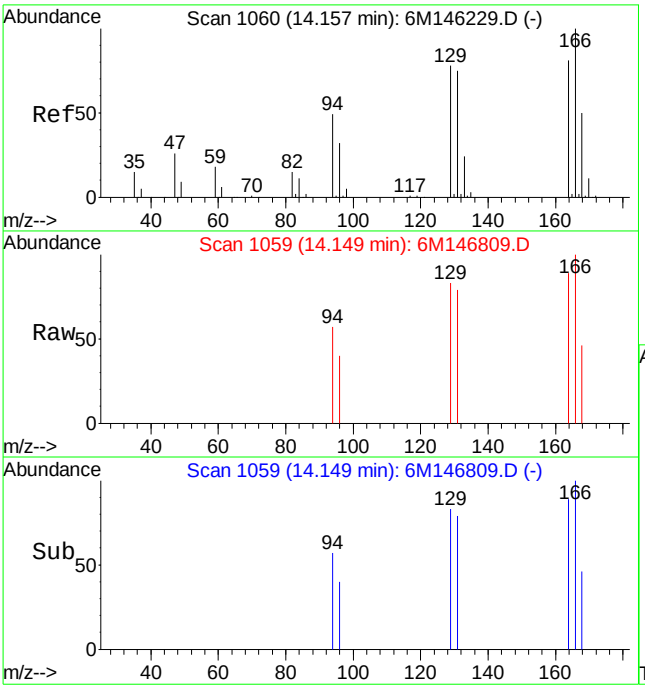


#60
Ethyl Methacrylate
Concen: 0.19 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion: 69 Resp: 1132

Ion	Ratio	Lower	Upper
69	100		
41	48.5	51.4	120.0#

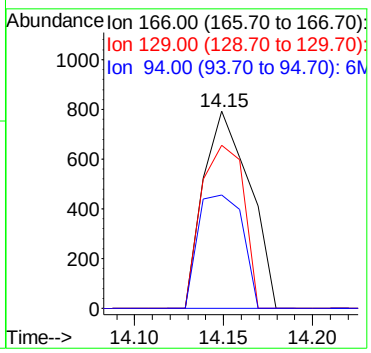




#66
Tetrachloroethene
Concen: 0.24 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146809.D
Acq: 28 Apr 2017 12:32

Tgt Ion:166 Resp: 1429

Ion	Ratio	Lower	Upper
166	100		
129	75.9	43.5	101.5
94	55.4	27.8	64.8



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146810.D Vial: 14
Acq On : 28 Apr 2017 13:03 Operator: TMB
Sample : L17041200-54 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:40 2017 Quant Results File: 8260BWT.RES

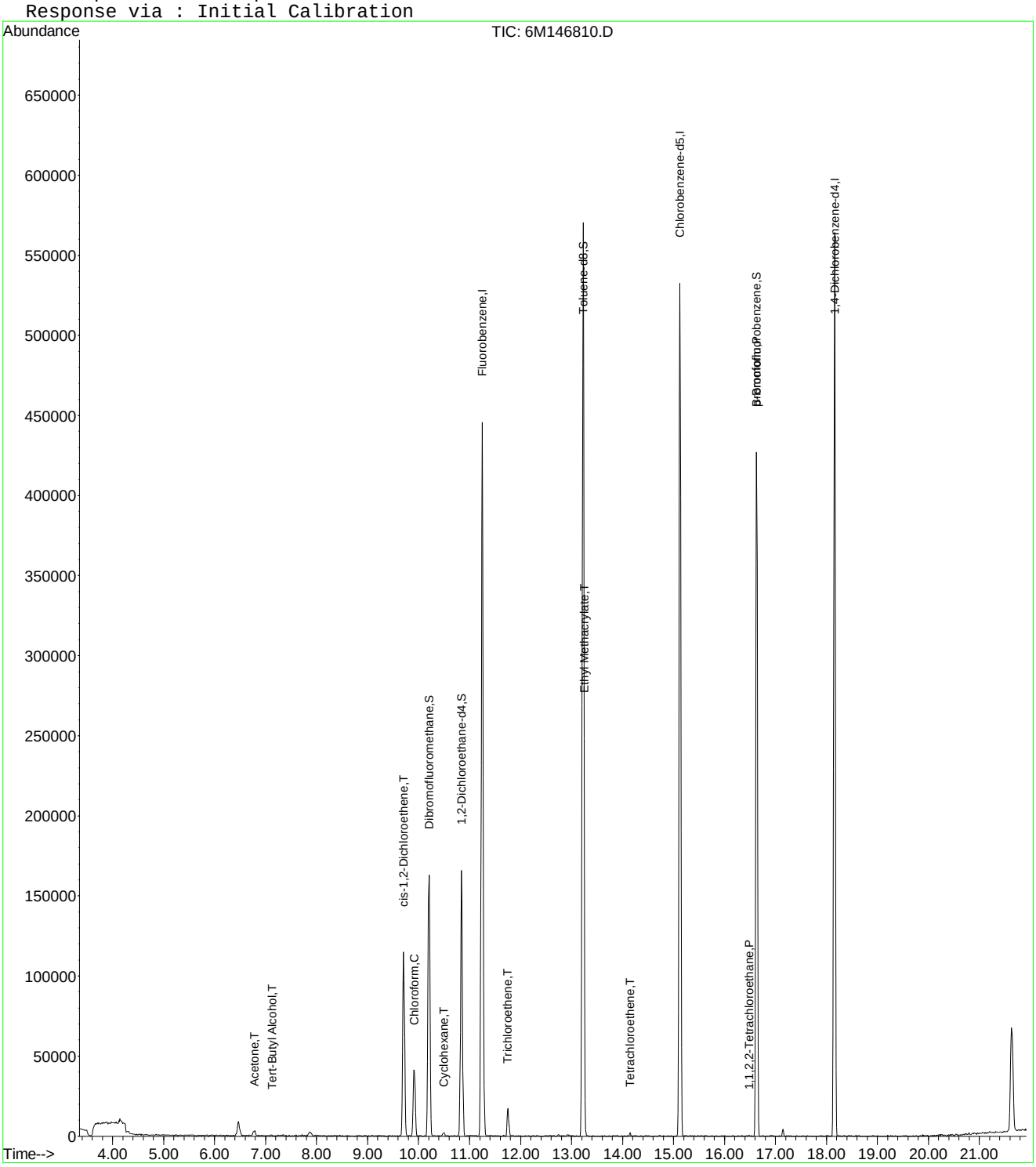
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

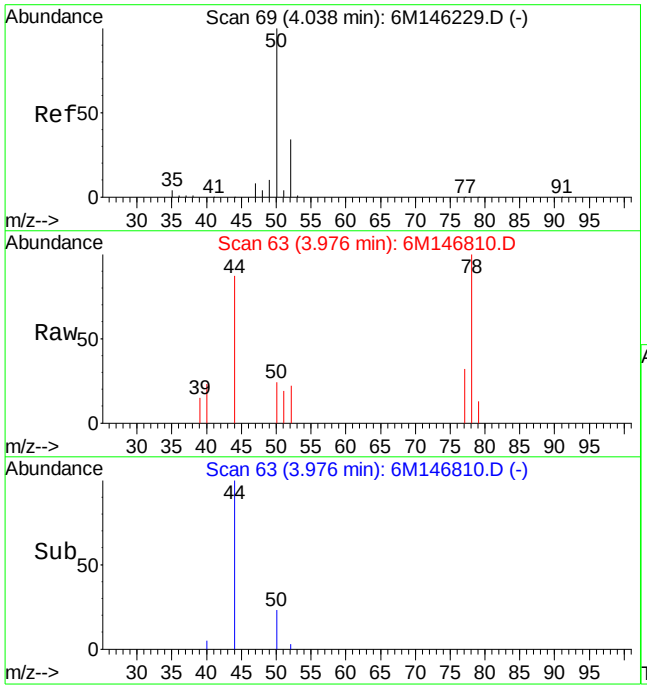
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	564620	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	389704	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	190302	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	140363	24.3524 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.40%		
43) 1,2-Dichloroethane-d4	10.84	65	149088	26.2446 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.96%		
58) Toluene-d8	13.23	98	527362	26.5197 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%		
80) p-Bromofluorobenzene	16.63	95	197165	27.2789 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.12%		
Target Compounds					Qvalue
3) Chloromethane	3.98	50	303	Below Cal	# 42
13) Acetone	6.77	43	6752	5.5417 ug/L	98
15) Tert-Butyl Alcohol	7.12	59	911	2.4105 ug/L	# 57
32) cis-1,2-Dichloroethene	9.71	96	68786	10.0995 ug/L	84
33) Chloroform	9.92	83	48489	4.1477 ug/L	93
39) Cyclohexane	10.49	56	2059	0.2343 ug/L	72
47) Trichloroethene	11.75	130	8572	1.3036 ug/L	90
60) Ethyl Methacrylate	13.25	69	1048	0.1777 ug/L	67
66) Tetrachloroethene	14.15	166	1017	0.1723 ug/L	# 66
76) Bromoform	16.63	173	752	0.2174 ug/L	# 1
79) 1,1,2,2-Tetrachloroethane	16.49	83	732	0.1477 ug/L	# 17

(#) = qualifier out of range (m) = manual integration
6M146810.D 8260BWT.M Sat Apr 29 12:16:40 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146810.D Vial: 14
Acq On : 28 Apr 2017 13:03 Operator: TMB
Sample : L17041200-54 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

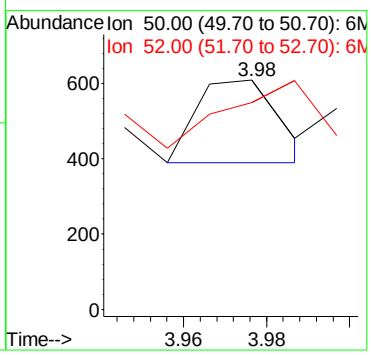


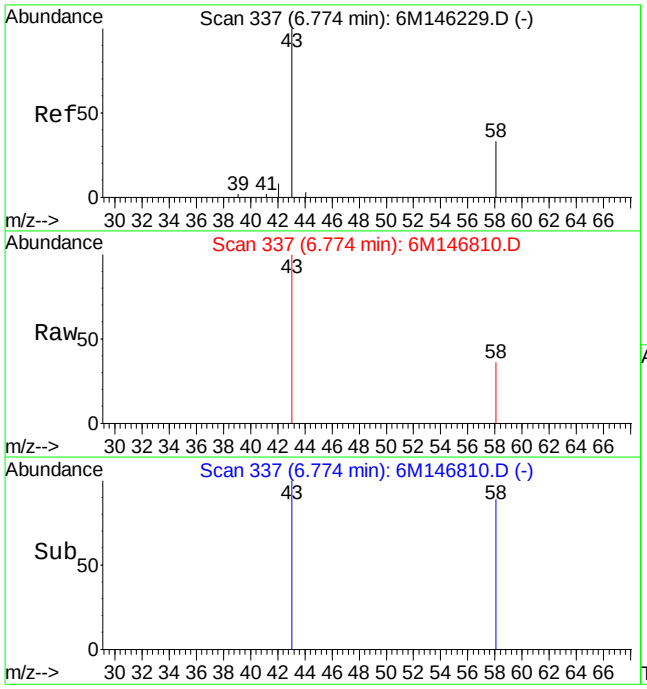


#3
Chloromethane
Concen: Below Cal
RT: 3.98 min Scan# 63
Delta R.T. -0.04 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 50 Resp: 303

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

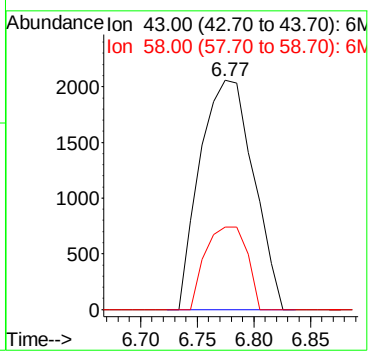


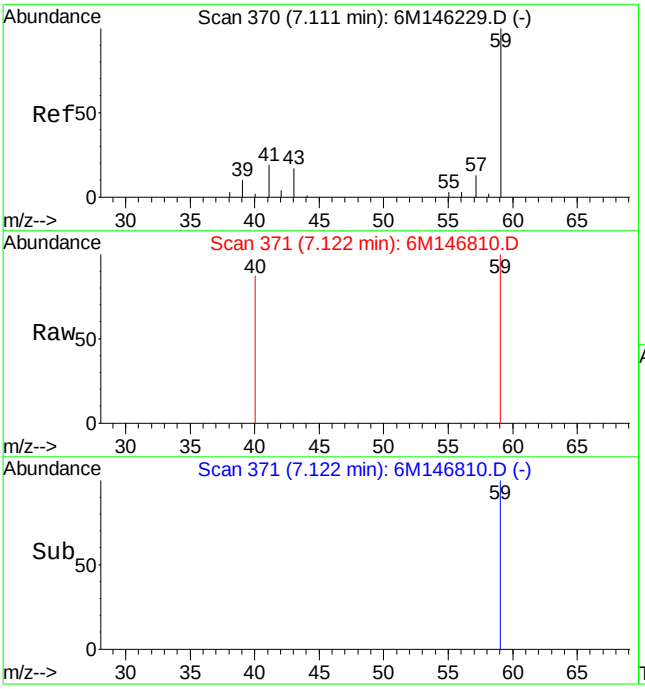


#13
Acetone
Concen: 5.54 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 43 Resp: 6752

Ion	Ratio	Lower	Upper
43	100		
58	28.1	16.4	38.2

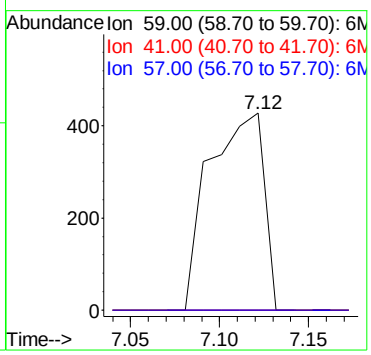


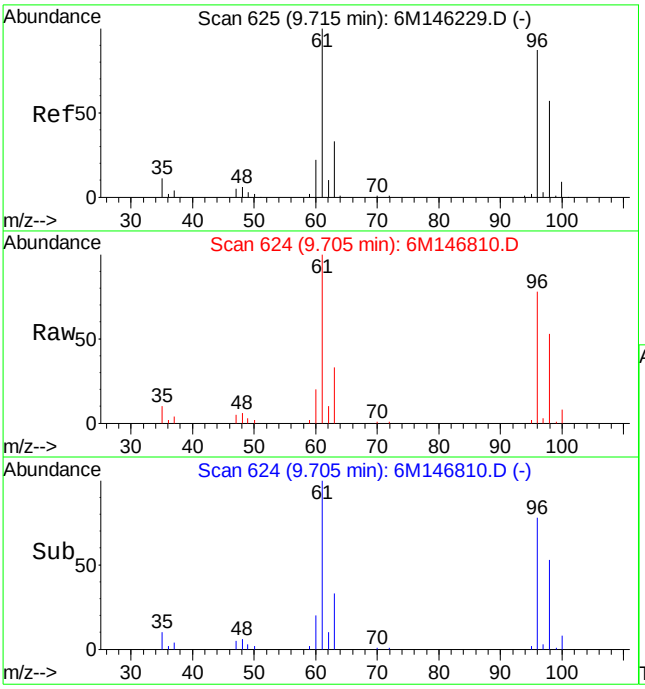


#15
Tert-Butyl Alcohol
Concen: 2.41 ug/L
RT: 7.12 min Scan# 371
Delta R.T. -0.00 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 59 Resp: 911

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

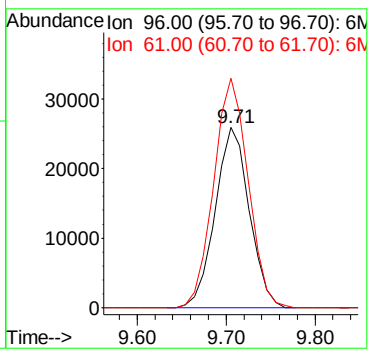


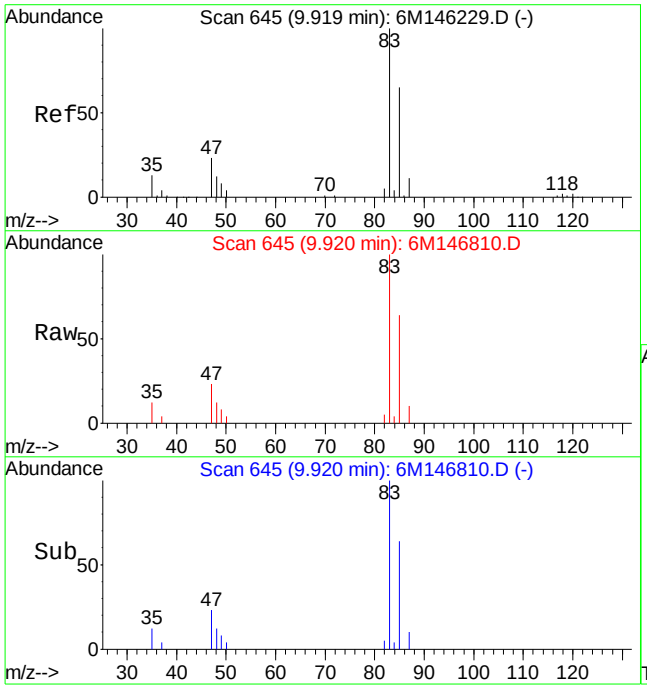


#32
cis-1,2-Dichloroethene
Concen: 10.10 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 96 Resp: 68786

Ion	Ratio	Lower	Upper
96	100		
61	128.6	89.2	208.2

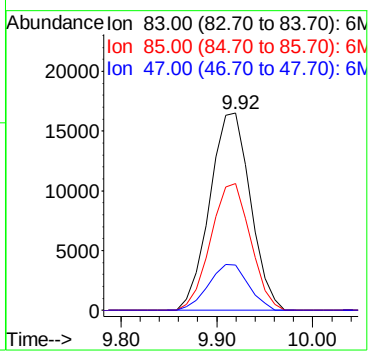


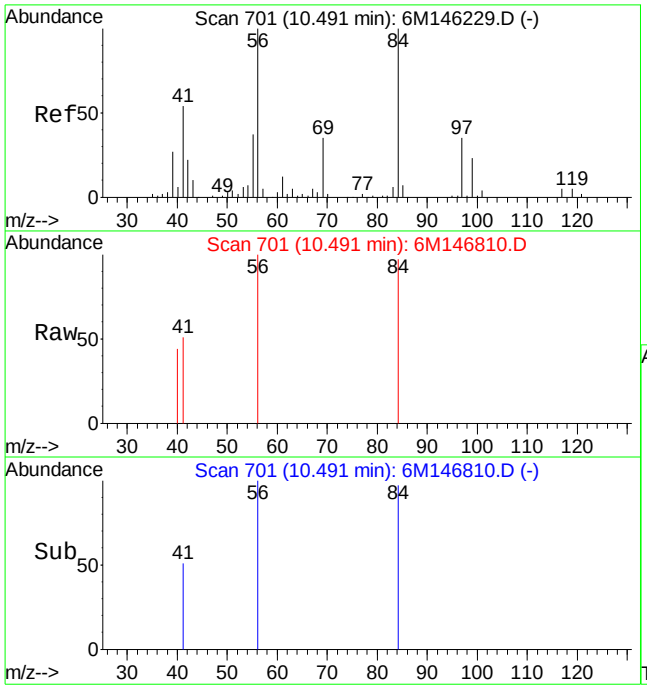


#33
Chloroform
Concen: 4.15 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 83 Resp: 48489

Ion	Ratio	Lower	Upper
83	100		
85	62.8	39.0	91.0
47	22.9	18.5	43.1

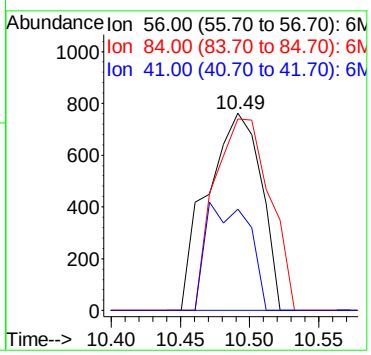


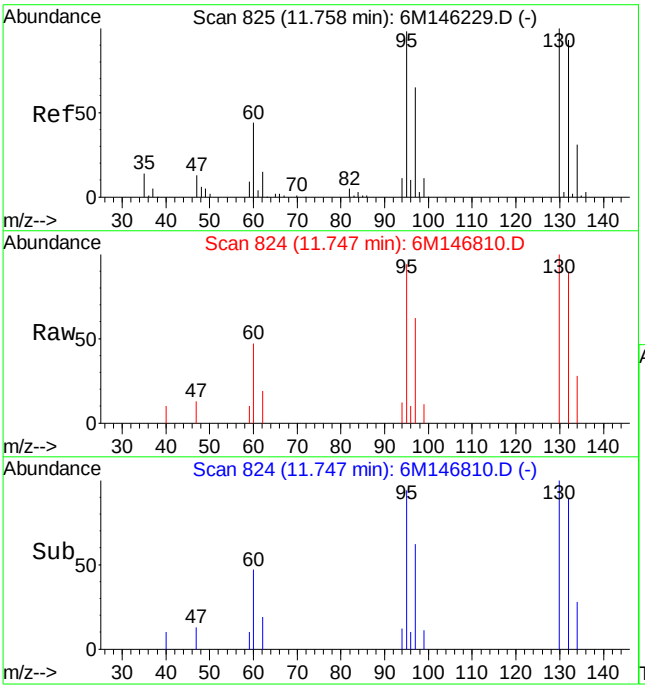


#39
Cyclohexane
Concen: 0.23 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 56 Resp: 2059

Ion	Ratio	Lower	Upper
56	100		
84	99.5	43.6	101.6
41	43.7	37.1	86.5

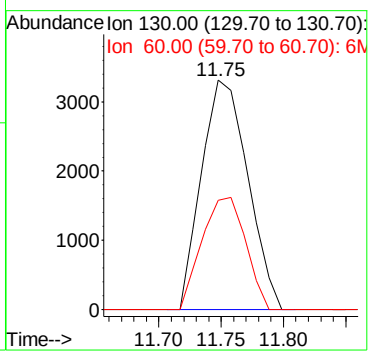


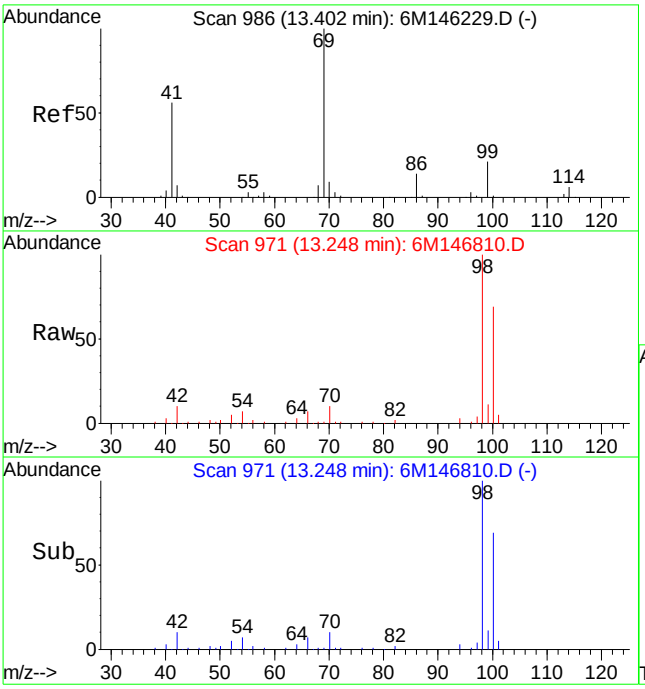


#47
Trichloroethene
Concen: 1.30 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion:130 Resp: 8572

Ion	Ratio	Lower	Upper
130	100		
60	46.0	32.0	74.6

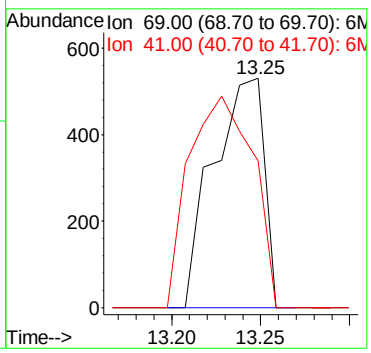


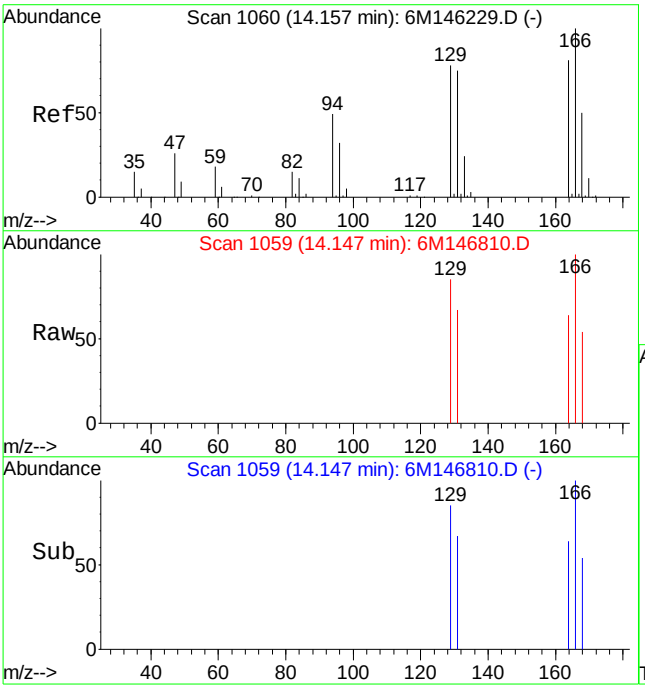


#60
Ethyl Methacrylate
Concen: 0.18 ug/L
RT: 13.25 min Scan# 971
Delta R.T. -0.15 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 69 Resp: 1048

Ion	Ratio	Lower	Upper
69	100		
41	116.3	51.4	120.0

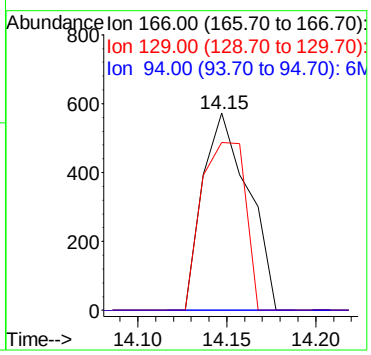


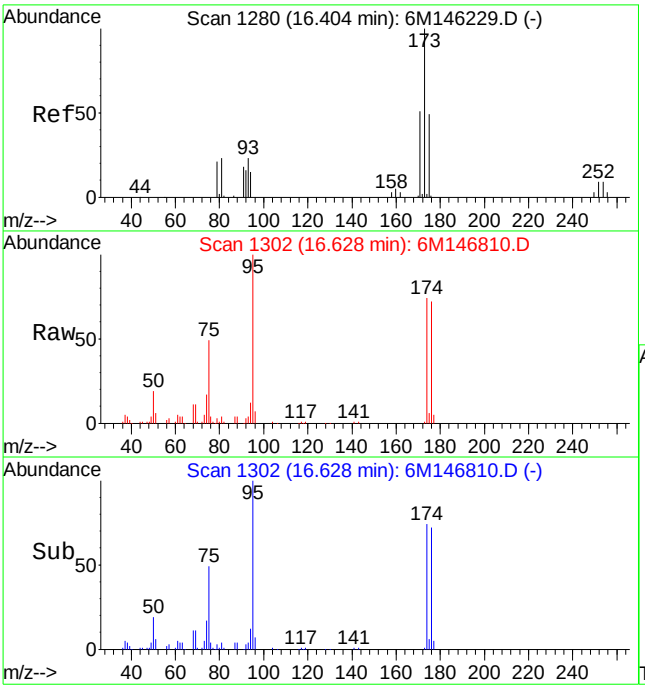


#66
Tetrachloroethene
Concen: 0.17 ug/L
RT: 14.15 min Scan# 1059
Delta R.T. -0.01 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion:166 Resp: 1017

Ion	Ratio	Lower	Upper
166	100		
129	82.0	43.5	101.5
94	0.0	27.8	64.8#

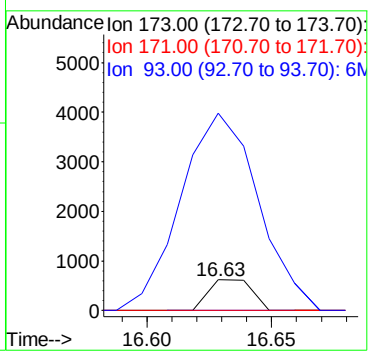


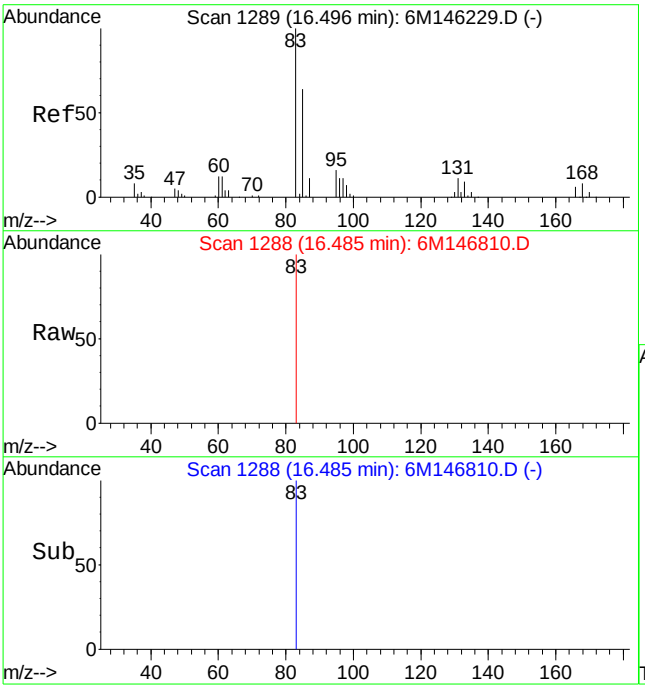


#76
Bromoform
Concen: 0.22 ug/L
RT: 16.63 min Scan# 1302
Delta R.T. 0.22 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion:173 Resp: 752

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1151.3	13.7	31.9#

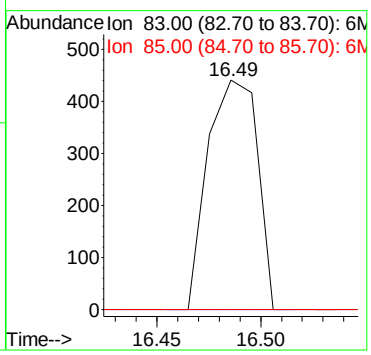




#79
1,1,2,2-Tetrachloroethane
Concen: 0.15 ug/L
RT: 16.49 min Scan# 1288
Delta R.T. -0.01 min
Lab File: 6M146810.D
Acq: 28 Apr 2017 13:03

Tgt Ion: 83 Resp: 732

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.1	91.3#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146811.D Vial: 15
Acq On : 28 Apr 2017 13:34 Operator: TMB
Sample : L17041200-55 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:45 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

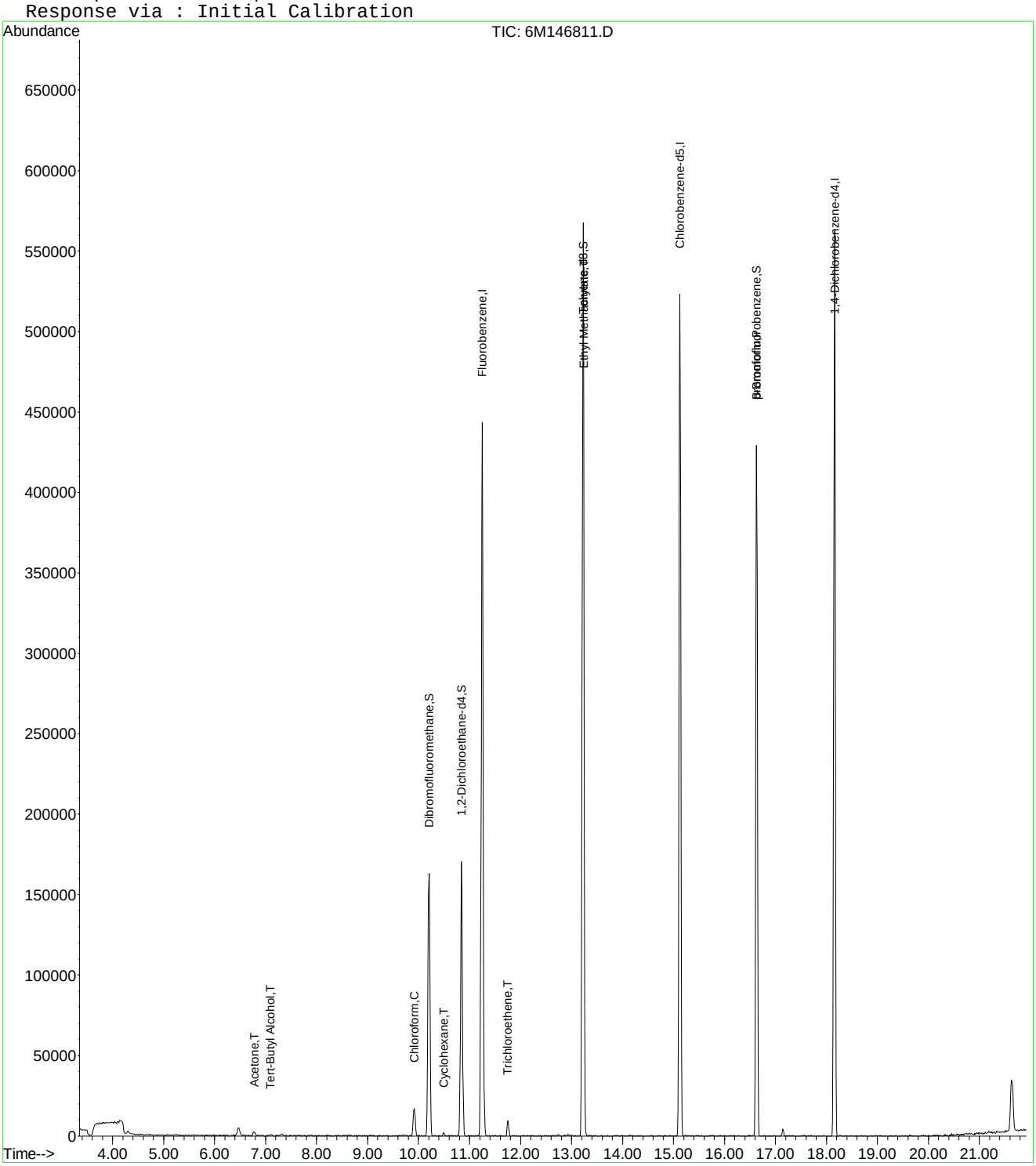
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	557181	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	386751	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	189769	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	141819	24.9336 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.72%		
43) 1,2-Dichloroethane-d4	10.84	65	152419	27.1892 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.76%		
58) Toluene-d8	13.23	98	525275	26.6164 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.48%		
80) p-Bromofluorobenzene	16.63	95	197676	27.4264 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.72%		
Target Compounds					Qvalue
3) Chloromethane	4.11	50	396	Below Cal	# 42
13) Acetone	6.77	43	4360	3.6262 ug/L	96
15) Tert-Butyl Alcohol	7.09	59	851	2.2818 ug/L	# 57
33) Chloroform	9.92	83	20514	1.7782 ug/L	95
39) Cyclohexane	10.49	56	1555	0.1793 ug/L	# 64
47) Trichloroethene	11.75	130	5007	0.7716 ug/L	87
60) Ethyl Methacrylate	13.24	69	825	0.1410 ug/L	80
76) Bromoform	16.63	173	435	0.1267 ug/L	# 1

(#) = qualifier out of range (m) = manual integration
6M146811.D 8260BWT.M Sat Apr 29 12:16:44 2017 Page 1

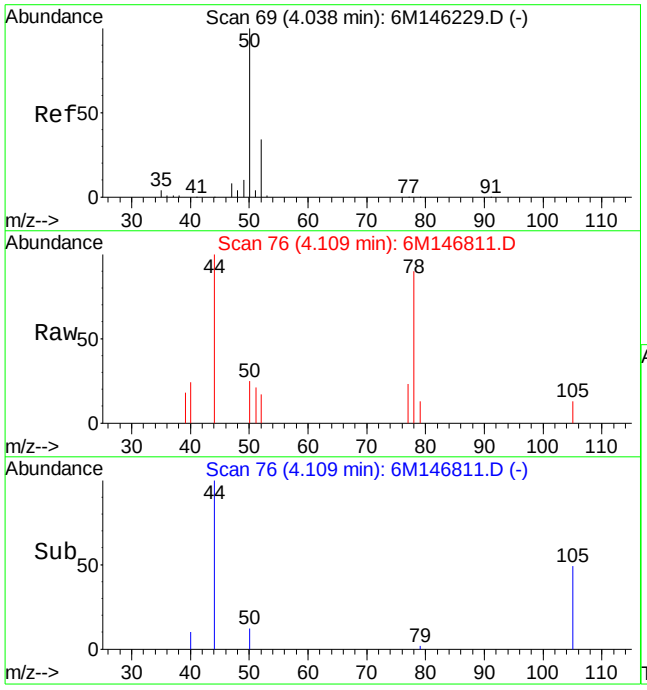
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146811.D Vial: 15
Acq On : 28 Apr 2017 13:34 Operator: TMB
Sample : L17041200-55 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



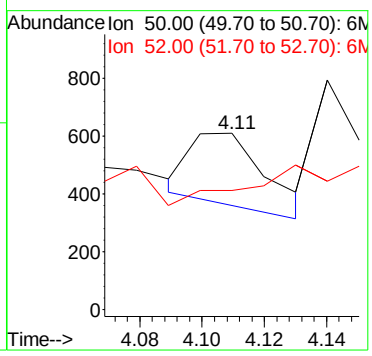
6M146811.D 8260BWT.M Sat Apr 29 12:16:45 2017 Page 2

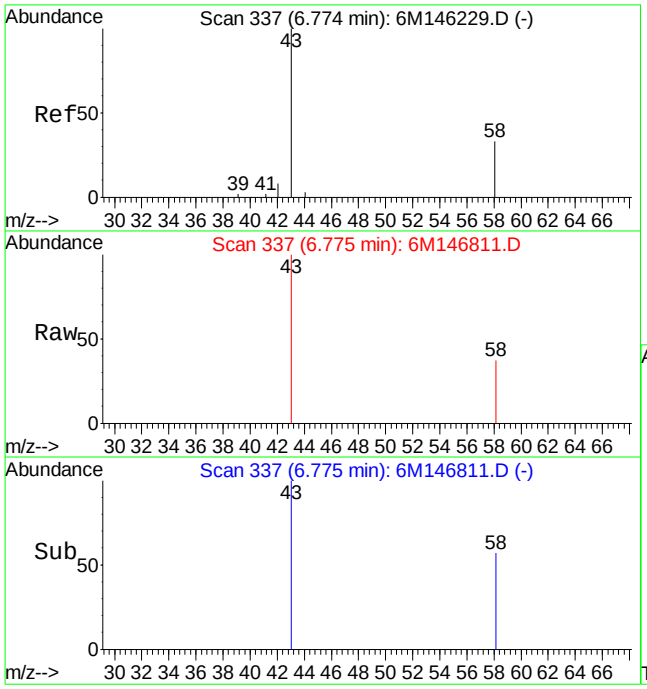


#3
Chloromethane
Concen: Below Cal
RT: 4.11 min Scan# 76
Delta R.T. 0.09 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 50 Resp: 396

Ion	Ratio	Lower	Upper
50	100		
52	0.0	19.8	46.2#

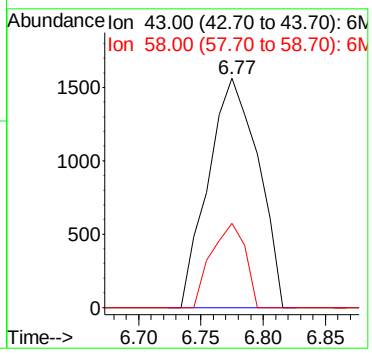


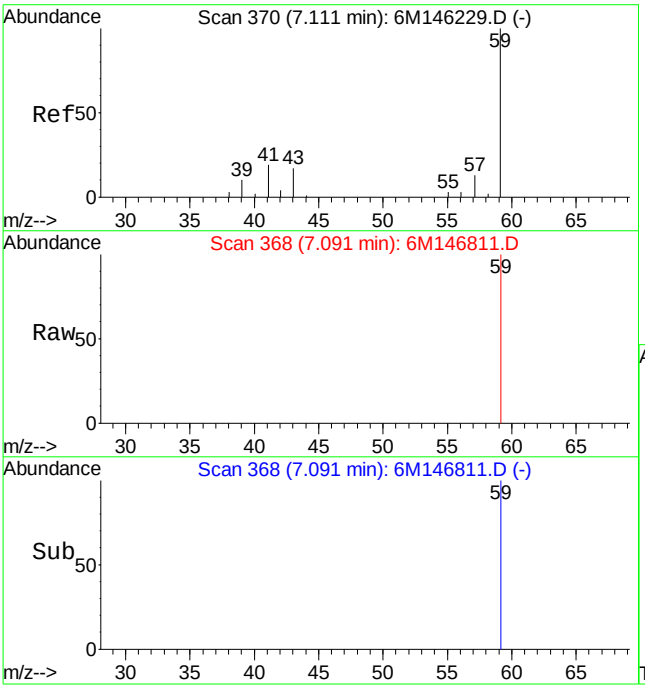


#13
Acetone
Concen: 3.63 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 43 Resp: 4360

Ion	Ratio	Lower	Upper
43	100		
58	25.0	16.4	38.2

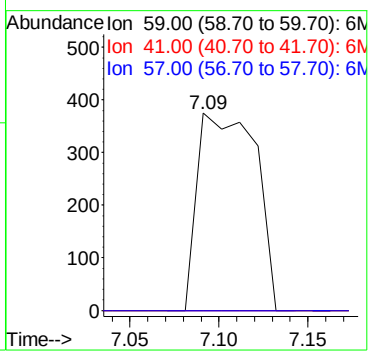


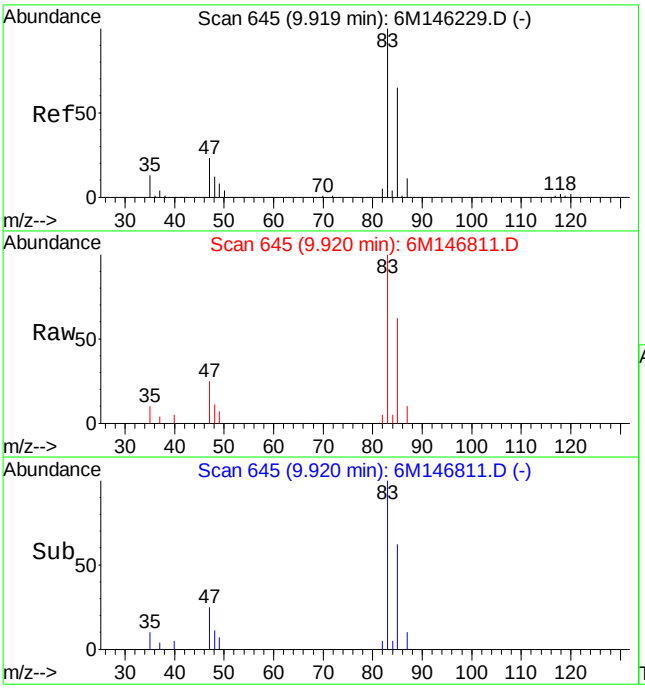


#15
Tert-Butyl Alcohol
Concen: 2.28 ug/L
RT: 7.09 min Scan# 368
Delta R.T. -0.03 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 59 Resp: 851

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

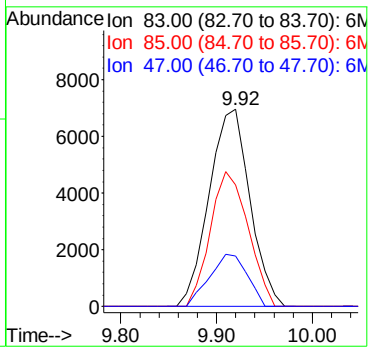


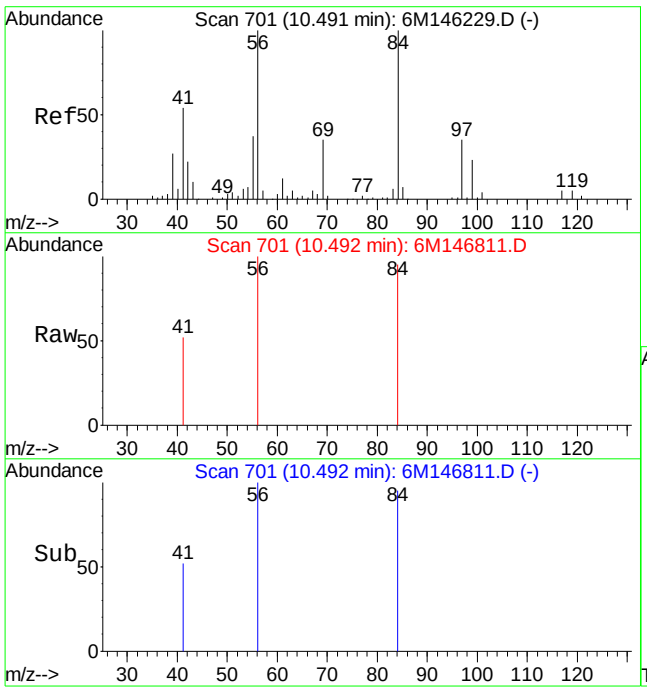


#33
Chloroform
Concen: 1.78 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 83 Resp: 20514

Ion	Ratio	Lower	Upper
83	100		
85	63.4	39.0	91.0
47	24.3	18.5	43.1

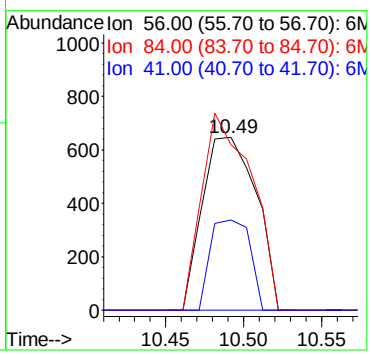


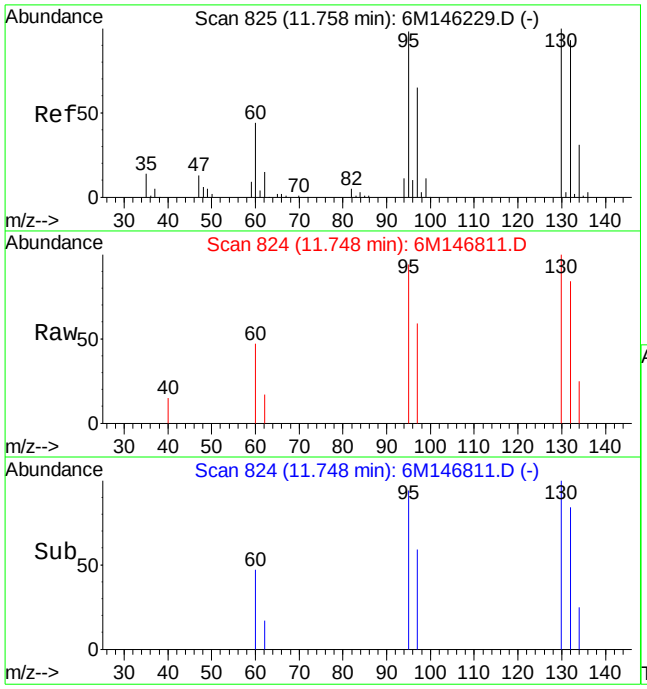


#39
Cyclohexane
Concen: 0.18 ug/L
RT: 10.49 min Scan# 701
Delta R.T. -0.00 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 56 Resp: 1555

Ion	Ratio	Lower	Upper
56	100		
84	105.9	43.6	101.6#
41	38.3	37.1	86.5

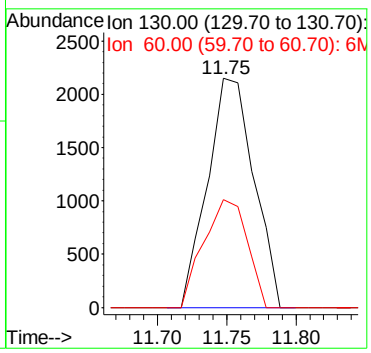


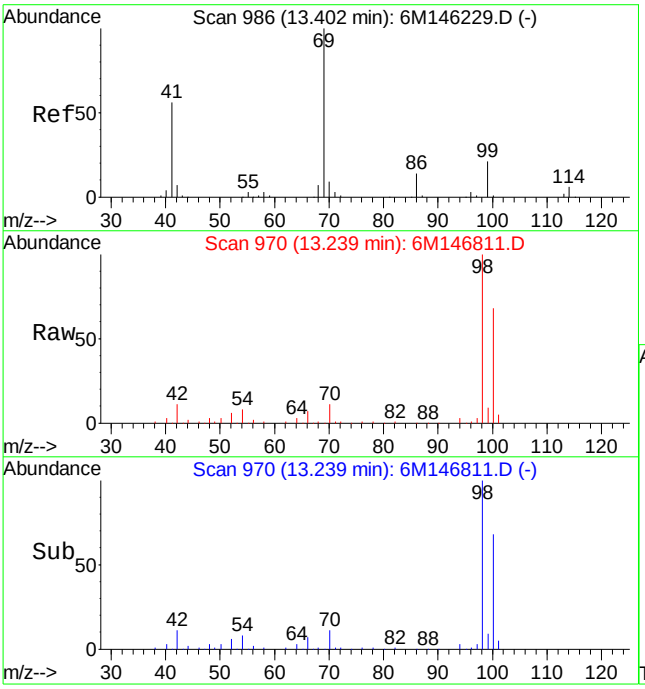


#47
Trichloroethene
Concen: 0.77 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion:130 Resp: 5007

Ion	Ratio	Lower	Upper
130	100		
60	44.2	32.0	74.6

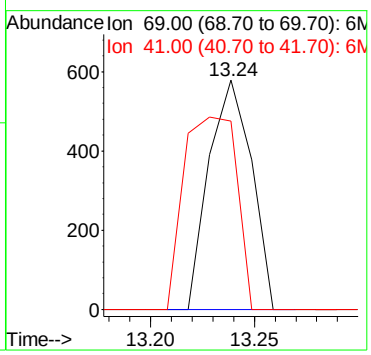


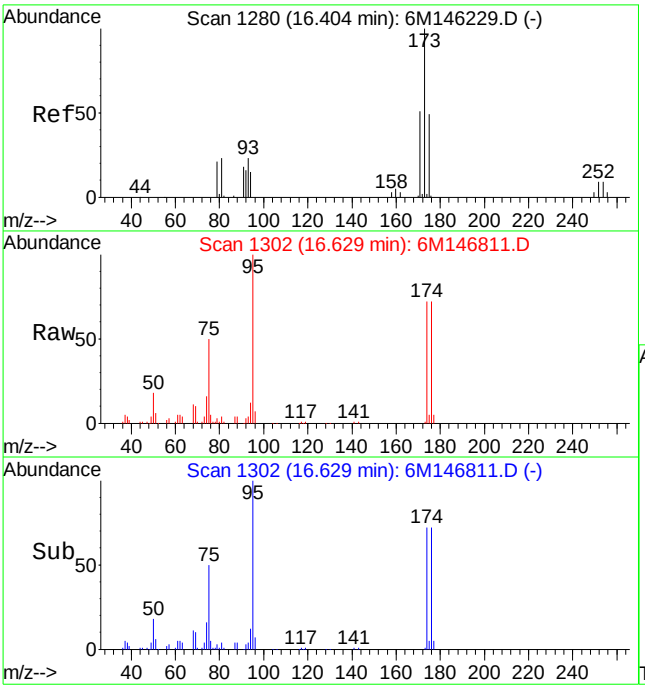


#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion: 69 Resp: 825

Ion	Ratio	Lower	Upper
69	100		
41	104.4	51.4	120.0

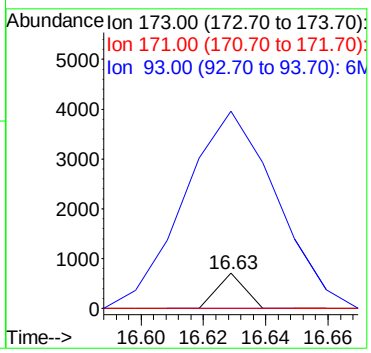




#76
Bromoform
Concen: 0.13 ug/L
RT: 16.63 min Scan# 1302
Delta R.T. 0.22 min
Lab File: 6M146811.D
Acq: 28 Apr 2017 13:34

Tgt Ion:173 Resp: 435

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1888.5	13.7	31.9#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146812.D Vial: 16
Acq On : 28 Apr 2017 14:03 Operator: TMB
Sample : L17041200-56 RS A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:49 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

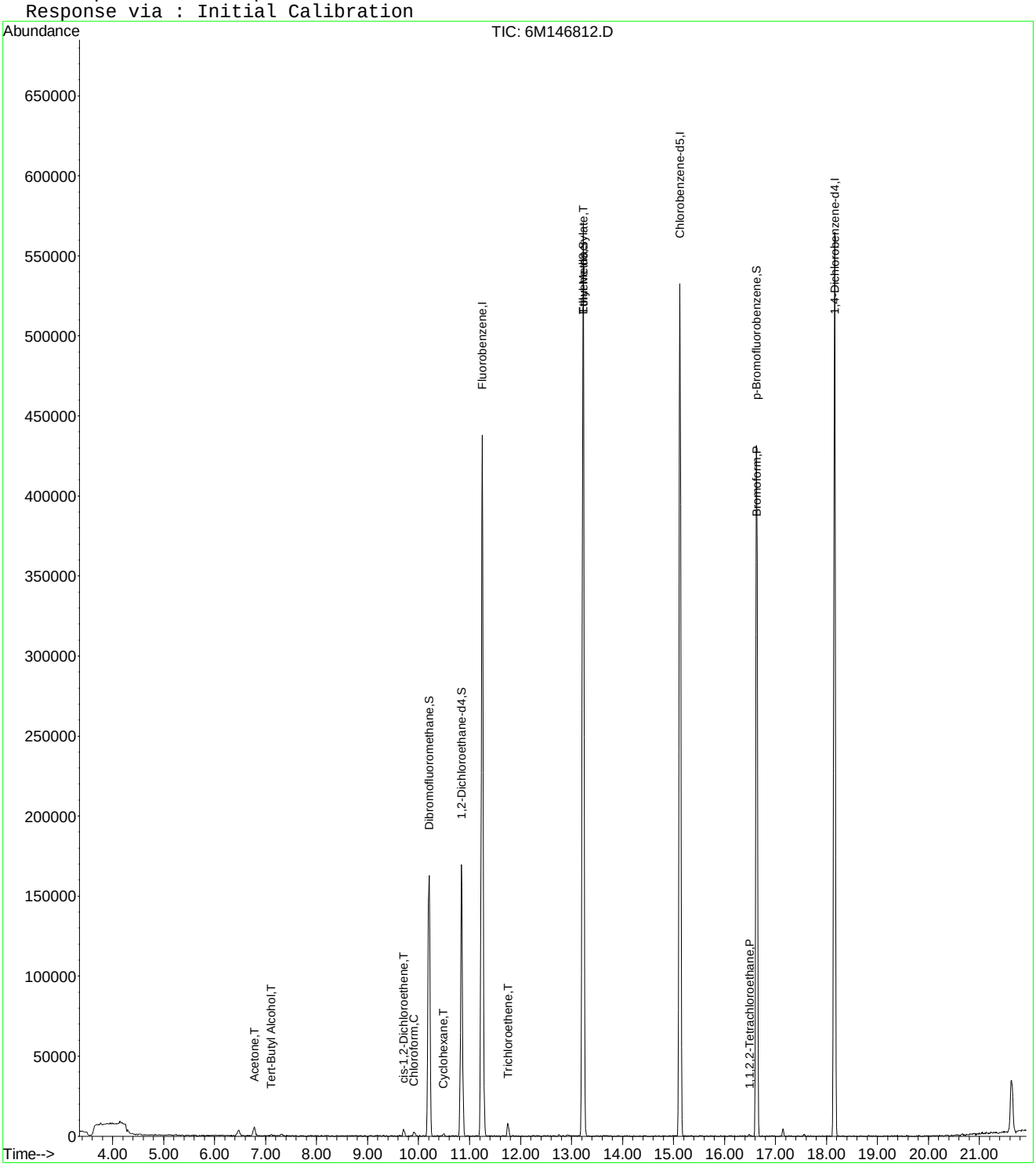
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	563918	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	389848	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	191240	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	142792	24.8047 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.20%		
43) 1,2-Dichloroethane-d4	10.84	65	152430	26.8663 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.48%		
58) Toluene-d8	13.23	98	525808	26.4318 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.72%		
80) p-Bromofluorobenzene	16.63	95	198895	27.3833 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.52%		
Target Compounds					Qvalue
3) Chloromethane	4.02	50	483	Below Cal #	1
13) Acetone	6.77	43	11038	9.0707 ug/L	97
15) Tert-Butyl Alcohol	7.11	59	594	1.5737 ug/L #	57
32) cis-1,2-Dichloroethene	9.71	96	3049	0.4482 ug/L	76
33) Chloroform	9.91	83	3591	0.3075 ug/L #	84
39) Cyclohexane	10.48	56	1343	0.1530 ug/L #	59
47) Trichloroethene	11.76	130	4377	0.6665 ug/L	87
60) Ethyl Methacrylate	13.23	69	747	0.1266 ug/L #	48
76) Bromoform	16.64	173	718	0.2075 ug/L #	1
79) 1,1,2,2-Tetrachloroethane	16.50	83	1024	0.2056 ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146812.D 8260BWT.M Sat Apr 29 12:16:49 2017 Page 1

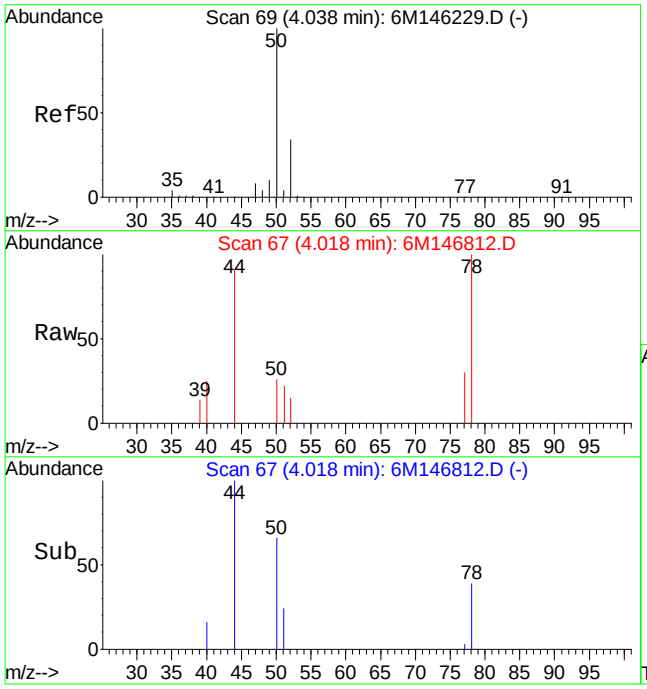
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146812.D Vial: 16
Acq On : 28 Apr 2017 14:03 Operator: TMB
Sample : L17041200-56 RS A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



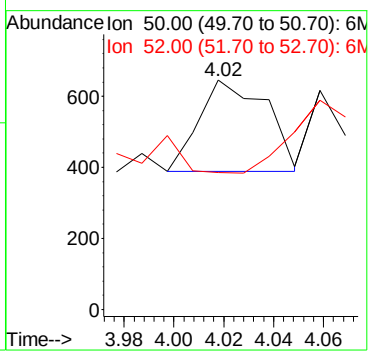
6M146812.D 8260BWT.M Sat Apr 29 12:16:49 2017 Page 2

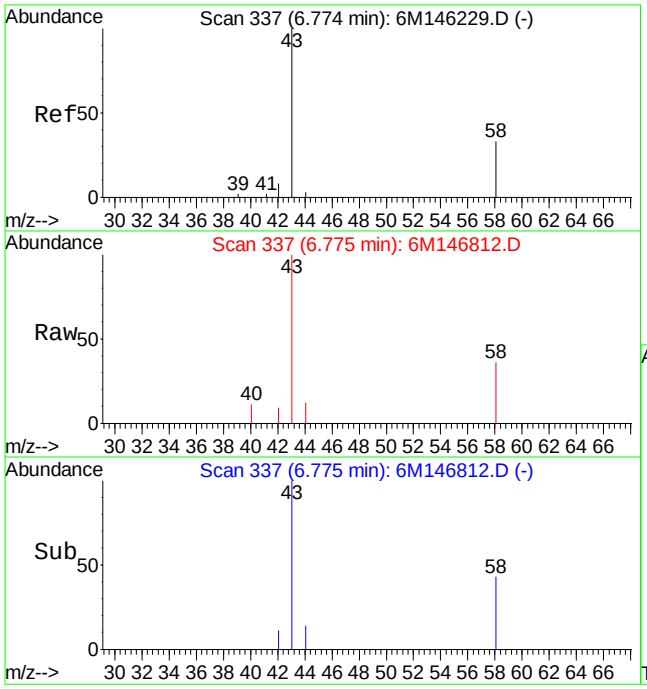


#3
Chloromethane
Concen: Below Cal
RT: 4.02 min Scan# 67
Delta R.T. -0.00 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 50 Resp: 483

Ion	Ratio	Lower	Upper
50	100		
52	111.2	19.8	46.2#

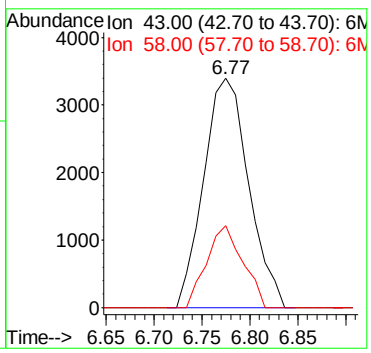


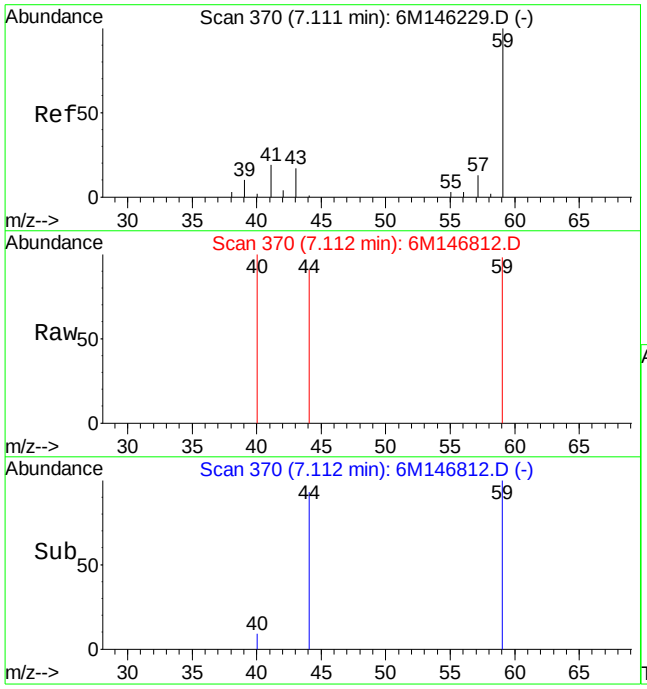


#13
Acetone
Concen: 9.07 ug/L
RT: 6.77 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 43 Resp: 11038

Ion	Ratio	Lower	Upper
43	100		
58	28.7	16.4	38.2

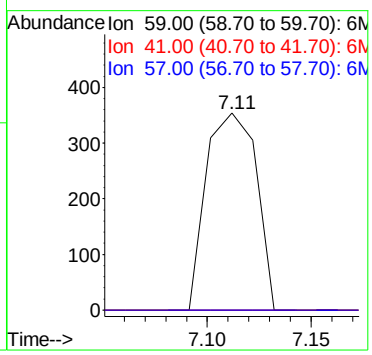


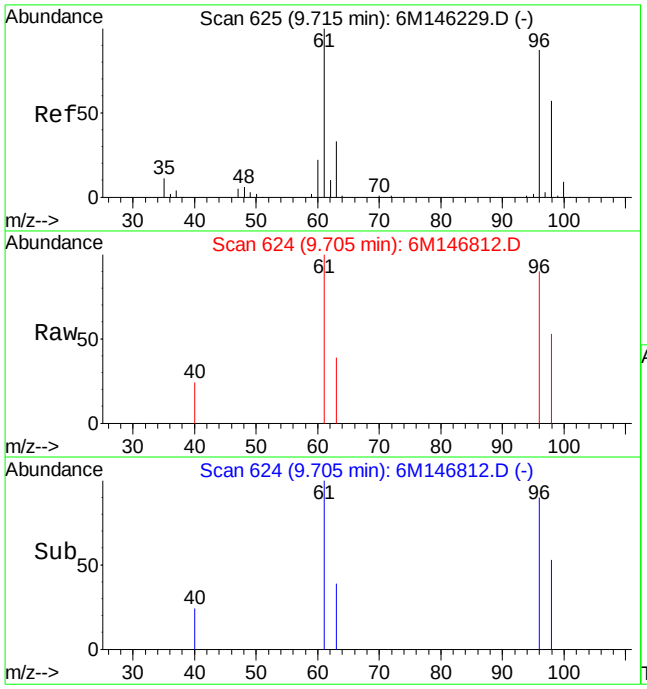


#15
Tert-Butyl Alcohol
Concen: 1.57 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 59 Resp: 594

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

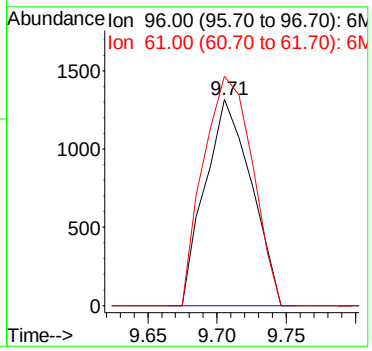


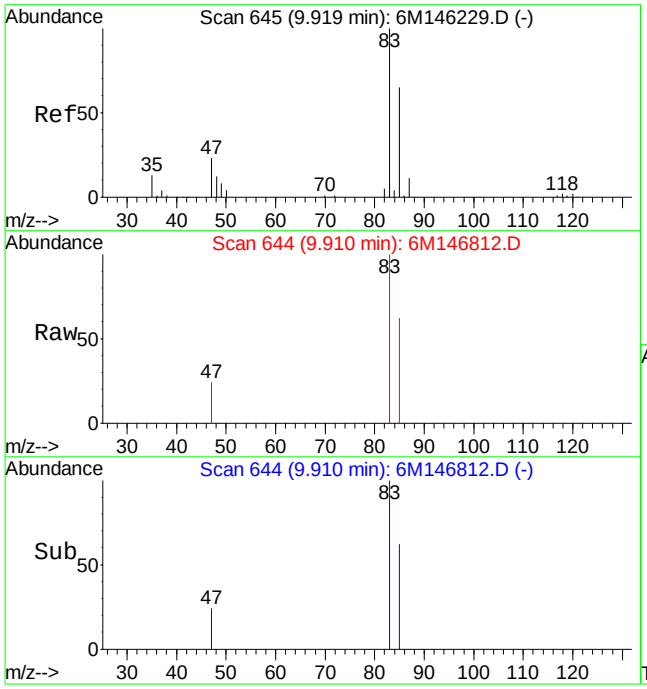


#32
cis-1,2-Dichloroethene
Concen: 0.45 ug/L
RT: 9.71 min Scan# 624
Delta R.T. -0.00 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 96 Resp: 3049

Ion	Ratio	Lower	Upper
96	100		
61	118.6	89.2	208.2

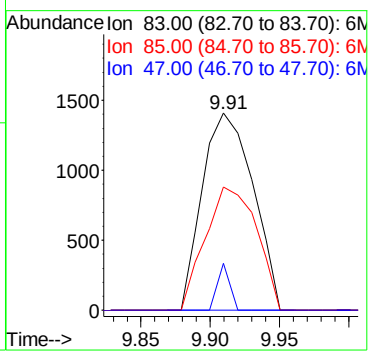


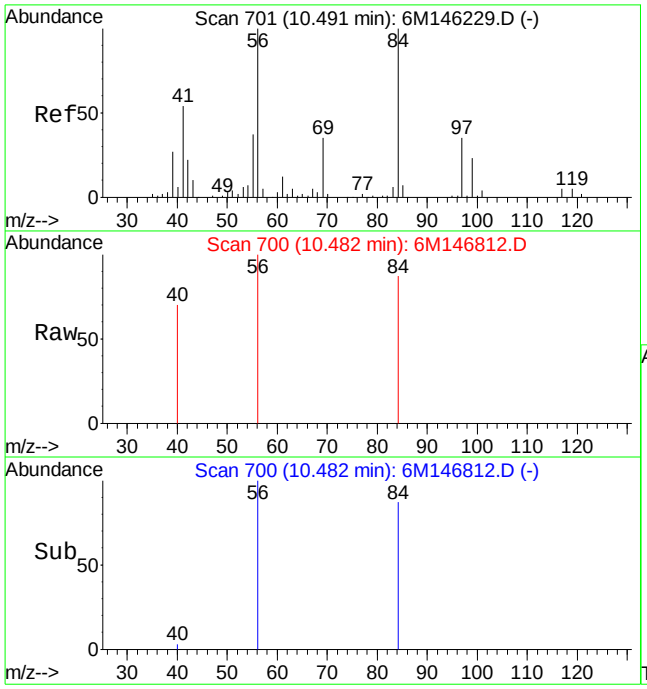


#33
Chloroform
Concen: 0.31 ug/L
RT: 9.91 min Scan# 644
Delta R.T. -0.00 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 83 Resp: 3591

Ion	Ratio	Lower	Upper
83	100		
85	63.1	39.0	91.0
47	5.7	18.5	43.1#

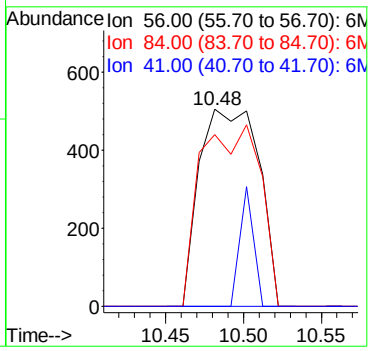


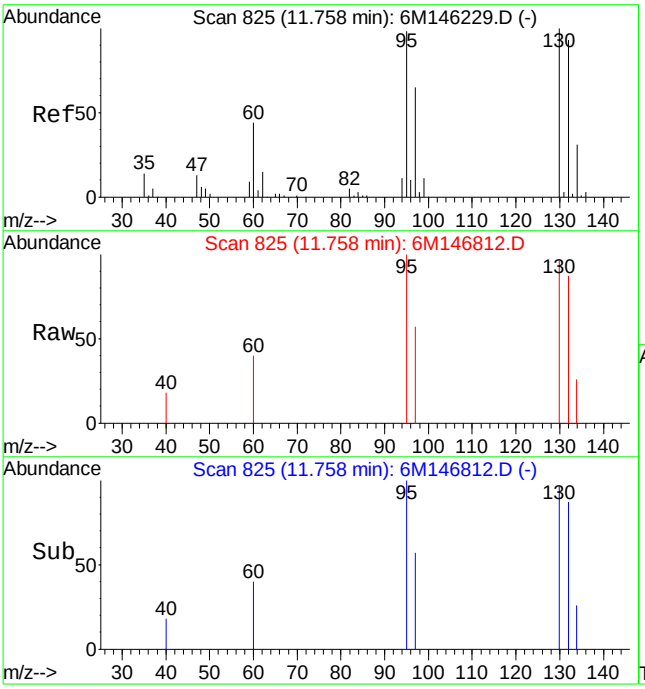


#39
Cyclohexane
Concen: 0.15 ug/L
RT: 10.48 min Scan# 700
Delta R.T. -0.01 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 56 Resp: 1343

Ion	Ratio	Lower	Upper
56	100		
84	92.3	43.6	101.6
41	14.1	37.1	86.5#

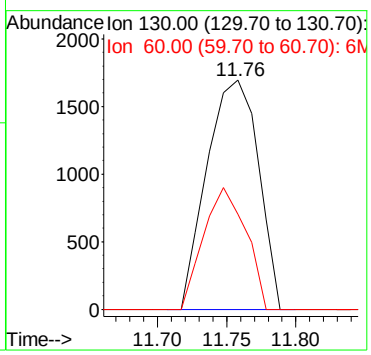


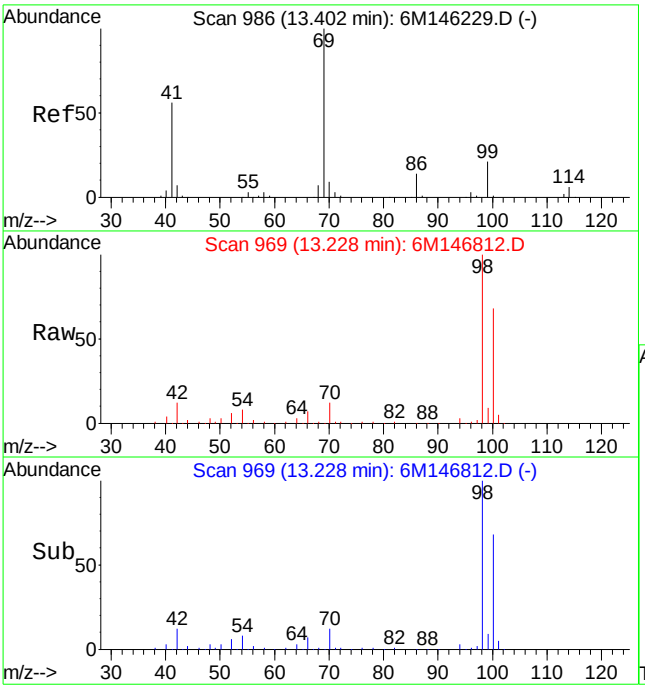


#47
Trichloroethene
Concen: 0.67 ug/L
RT: 11.76 min Scan# 825
Delta R.T. 0.01 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion:130 Resp: 4377

Ion	Ratio	Lower	Upper
130	100		
60	43.8	32.0	74.6

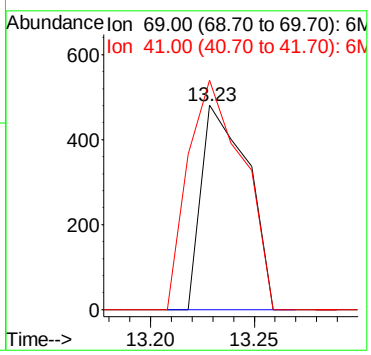


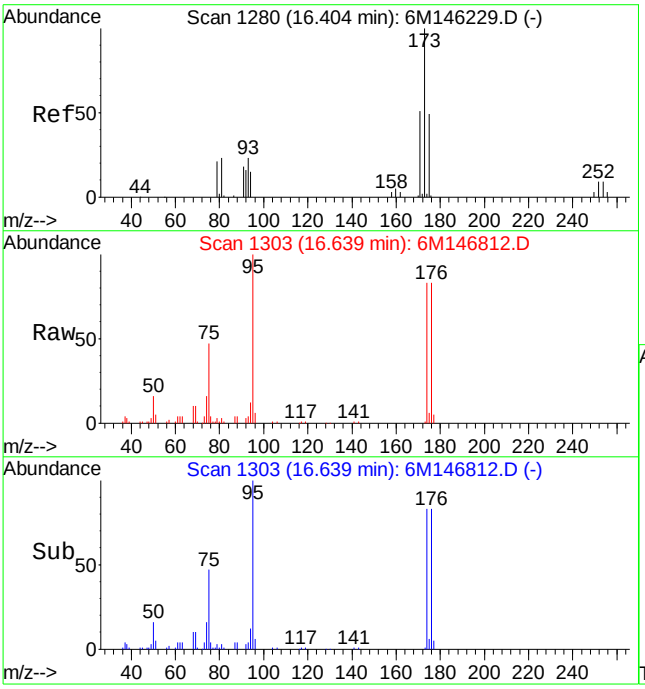


#60
Ethyl Methacrylate
Concen: 0.13 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 69 Resp: 747

Ion	Ratio	Lower	Upper
69	100		
41	133.2	51.4	120.0#

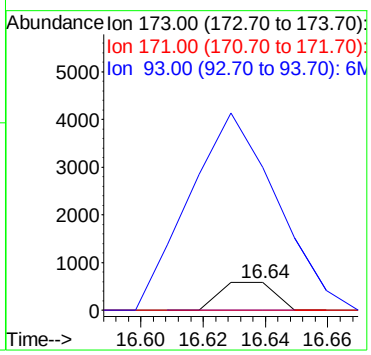


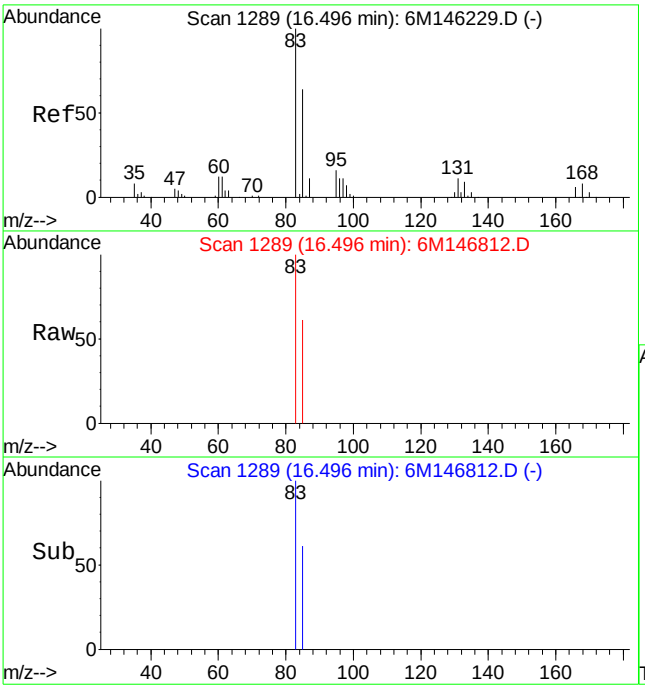


#76
Bromoform
Concen: 0.21 ug/L
RT: 16.64 min Scan# 1303
Delta R.T. 0.23 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion:173 Resp: 718

Ion	Ratio	Lower	Upper
173	100		
171	0.0	30.7	71.5#
93	1134.3	13.7	31.9#

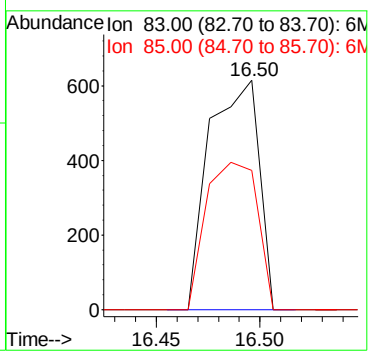




#79
1,1,2,2-Tetrachloroethane
Concen: 0.21 ug/L
RT: 16.50 min Scan# 1289
Delta R.T. -0.00 min
Lab File: 6M146812.D
Acq: 28 Apr 2017 14:03

Tgt Ion: 83 Resp: 1024

Ion	Ratio	Lower	Upper
83	100		
85	66.1	39.1	91.3



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146814.D Vial: 18
Acq On : 28 Apr 2017 15:04 Operator: TMB
Sample : L17041200-57 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	593344	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	409437	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	216697	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	153951	25.4169	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%			
43) 1,2-Dichloroethane-d4	10.84	65	158973	26.6300	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.52%			
58) Toluene-d8	13.23	98	556687	26.6451	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.60%			
80) p-Bromofluorobenzene	16.63	95	218696	26.5722	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.28%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.51	85	181750	19.2928	ug/L	93
3) Chloromethane	4.04	50	235165	20.9726	ug/L	99
4) Vinyl Chloride	4.27	62	211413	19.6406	ug/L	99
5) 1,3-Butadiene	4.31	54	111165	26.4669	ug/L	91
6) Bromomethane	5.23	94	66547	14.3188	ug/L	99
7) Chloroethane	5.40	64	100626	21.7272	ug/L	87
8) Trichlorofluoromethane	5.90	101	193541	17.5431	ug/L	99
9) Diethyl ether	6.44	59	425513	92.5505	ug/L	87
10) Isoprene	6.48	67	147058	16.2059	ug/L	86
11) Acrolein	6.67	56	65909	130.8490	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	116023	18.5784	ug/L	97
13) Acetone	6.78	43	38325	29.9324	ug/L	92
14) 1,1-Dichloroethene	7.01	61	179331	19.8248	ug/L	89
15) Tert-Butyl Alcohol	7.11	59	43608	109.8015	ug/L	93
16) Dimethyl Sulfide	7.28	62	130402	20.1742	ug/L	80
17) Iodomethane	7.53	142	91797	17.9054	ug/L	96
18) Methyl acetate	7.53	43	52569	16.3706	ug/L #	86
19) Methylene Chloride	7.79	84	134359	19.6464	ug/L	65
20) Carbon Disulfide	7.86	76	275025	14.1271	ug/L	100
21) Acrylonitrile	7.97	53	31748	21.3981	ug/L	99
22) Methyl Tert Butyl Ether	8.01	73	280576	18.7090	ug/L	93
23) trans-1,2-Dichloroethene	8.25	96	121154	18.6097	ug/L	86
24) n-Hexane	8.33	57	129066	17.5314	ug/L	86
25) Diisopropyl ether	8.65	45	1806878	107.8113	ug/L #	93
26) Vinyl Acetate	8.83	43	86785	18.6546	ug/L	92
27) 1,1-Dichloroethane	8.87	63	214706	19.9093	ug/L	99
28) Ethyl-Tert-Butyl ether	9.24	59	1573907	92.6848	ug/L	93
29) 2-Butanone	9.41	43	32588	20.1942	ug/L #	80
30) Propionitrile	9.52	54	54870	104.2603	ug/L	100
31) 2,2-Dichloropropane	9.64	77	70930	8.6453	ug/L	80
32) cis-1,2-Dichloroethene	9.71	96	138447	19.3434	ug/L	89
33) Chloroform	9.91	83	230280	18.7441	ug/L	95
34) 1-Bromopropane	10.05	122	29066	22.9002	ug/L	99
35) Bromochloromethane	10.15	130	73832	19.5963	ug/L	99
36) Tetrahydrofuran	10.18	42	106325	100.0528	ug/L	78
38) 1,1,1-Trichloroethane	10.45	97	193266	19.3496	ug/L	93
39) Cyclohexane	10.49	56	154323	16.7086	ug/L	82
40) 1,1-Dichloropropene	10.65	75	162293	19.2218	ug/L	85
41) Tert-Amyl-Methyl ether	10.75	73	1503136	93.2280	ug/L	95
42) Carbon Tetrachloride	10.80	117	138069	17.5312	ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146814.D 8260BWT.M Fri Apr 28 16:32:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146814.D Vial: 18
Acq On : 28 Apr 2017 15:04 Operator: TMB
Sample : L17041200-57 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

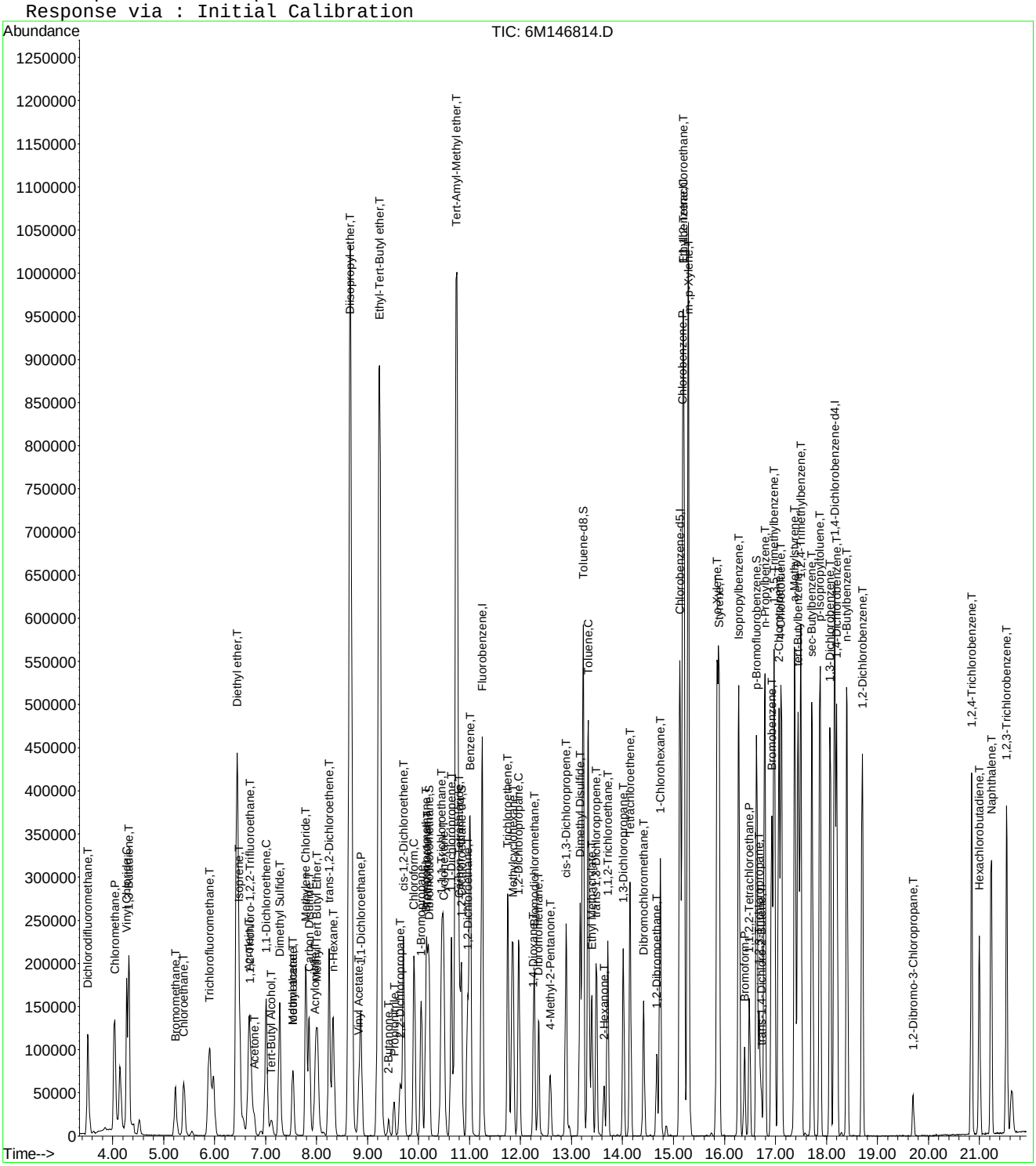
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	155762	20.3802 ug/L		90
46)	Benzene	11.01	78	492315	19.3925 ug/L		89
47)	Trichloroethene	11.75	130	123382	17.8552 ug/L		94
48)	Methylcyclohexane	11.85	83	163847	16.4115 ug/L		84
49)	1,2-Dichloropropane	11.96	63	123869	20.6747 ug/L		96
50)	1,4-Dioxane	12.25	88	9040	207.5111 ug/L		86
51)	Bromodichloromethane	12.27	83	164937	19.5013 ug/L		99
52)	Dibromomethane	12.35	93	68195	19.3261 ug/L		98
54)	4-Methyl-2-Pentanone	12.59	58	29762	19.3059 ug/L		87
55)	cis-1,3-Dichloropropene	12.89	75	180964	19.4296 ug/L		95
56)	Dimethyl Disulfide	13.17	79	110822	18.8605 ug/L		93
59)	Toluene	13.33	91	498175	19.4614 ug/L		100
60)	Ethyl Methacrylate	13.40	69	131757	21.2698 ug/L		74
62)	trans-1,3-Dichloropropene	13.48	75	141310	17.9033 ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	93330	19.3471 ug/L		98
64)	2-Hexanone	13.64	43	51005	22.0186 ug/L		89
65)	1,3-Dichloropropane	14.02	76	165699	20.4630 ug/L		76
66)	Tetrachloroethene	14.15	166	111420	17.9623 ug/L		92
67)	Dibromochloromethane	14.41	129	108739	18.2347 ug/L		100
68)	1,2-Dibromoethane	14.67	107	84425	18.2263 ug/L		99
69)	1-Chlorohexane	14.74	91	156602	18.9448 ug/L		82
70)	Chlorobenzene	15.18	112	326373	18.6285 ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	113629	18.1104 ug/L		97
72)	Ethylbenzene	15.20	106	175874	18.5433 ug/L		100
73)	m-,p-Xylene	15.29	106	428530	37.8005 ug/L		98
74)	o-Xylene	15.85	106	210334	19.2266 ug/L		98
75)	Styrene	15.89	104	360751	19.6433 ug/L		99
76)	Bromoform	16.39	173	62653	17.2408 ug/L		99
77)	Isopropylbenzene	16.28	105	513262	18.7483 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	109730	19.4428 ug/L		99
81)	1,2,3-Trichloropropane	16.68	110	31978	19.1872 ug/L		84
82)	trans-1,4-Dichloro-2-Buten	16.72	53	13107	10.9368 ug/L	#	1
83)	n-Propylbenzene	16.79	91	624080	19.0213 ug/L		99
84)	Bromobenzene	16.93	156	134860	18.2968 ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	448571	19.2920 ug/L		99
86)	2-Chlorotoluene	17.07	91	409176	18.7300 ug/L		98
87)	4-Chlorotoluene	17.11	91	393871	20.3995 ug/L		99
88)	a-Methylstyrene	17.37	118	239391	18.6180 ug/L		100
89)	tert-Butylbenzene	17.45	134	90557	18.5870 ug/L		73
90)	1,2,4-Trimethylbenzene	17.50	105	468928	19.6373 ug/L		89
91)	sec-Butylbenzene	17.71	105	539420	18.8123 ug/L		96
92)	p-Isopropyltoluene	17.88	119	455172	18.8711 ug/L		97
93)	1,3-Dichlorobenzene	18.07	146	252527	18.1418 ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	255266	18.1344 ug/L		95
95)	n-Butylbenzene	18.40	91	429647	19.5072 ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	235788	18.0719 ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	18357	17.9572 ug/L		90
98)	1,2,4-Trichlorobenzene	20.85	180	164890	17.2725 ug/L		100
99)	Hexachlorobutadiene	21.00	225	60421	16.5711 ug/L		99
100)	Naphthalene	21.23	128	340716	17.8245 ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	152260	16.5214 ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146814.D 8260BWT.M Fri Apr 28 16:32:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146814.D Vial: 18
Acq On : 28 Apr 2017 15:04 Operator: TMB
Sample : L17041200-57 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146816.D Vial: 19
Acq On : 28 Apr 2017 15:35 Operator: TMB
Sample : L17041200-58 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:32:04 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	630993	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	437059	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	222831	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	167132	25.9466	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.80%				
43) 1,2-Dichloroethane-d4	10.84	65	173811	27.3783	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.52%				
58) Toluene-d8	13.23	98	595389	26.6965	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.80%				
80) p-Bromofluorobenzene	16.63	95	230745	27.2644	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.04%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	186349	18.6007	ug/L		92
3) Chloromethane	4.04	50	244327	20.4713	ug/L		93
4) Vinyl Chloride	4.28	62	213678	18.6666	ug/L		98
5) 1,3-Butadiene	4.32	54	114661	25.6065	ug/L		92
6) Bromomethane	5.23	94	82408	16.6736	ug/L		98
7) Chloroethane	5.40	64	104691	21.2562	ug/L		86
8) Trichlorofluoromethane	5.90	101	207632	17.6974	ug/L		99
9) Diethyl ether	6.43	59	475369	97.2252	ug/L		87
10) Isoprene	6.47	67	162403	16.8291	ug/L		83
11) Acrolein	6.68	56	74900	139.8265	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	125444	18.8884	ug/L		96
13) Acetone	6.78	43	42867	31.4822	ug/L		92
14) 1,1-Dichloroethene	7.01	61	191656	19.9231	ug/L		89
15) Tert-Butyl Alcohol	7.10	59	73827	174.7991	ug/L		92
16) Dimethyl Sulfide	7.28	62	142516	20.7328	ug/L		80
17) Iodomethane	7.53	142	93861	17.2459	ug/L		95
18) Methyl acetate	7.53	43	65989	19.3236	ug/L	#	86
19) Methylene Chloride	7.79	84	141050	19.3942	ug/L		66
20) Carbon Disulfide	7.85	76	292647	14.1353	ug/L		99
21) Acrylonitrile	7.97	53	36052	22.8491	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	328845	20.6193	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	132326	19.1130	ug/L		84
24) n-Hexane	8.32	57	140364	17.9284	ug/L		85
25) Diisopropyl ether	8.66	45	1960209	109.9816	ug/L	#	93
26) Vinyl Acetate	8.83	43	140263	28.3509	ug/L	#	91
27) 1,1-Dichloroethane	8.87	63	238048	20.7567	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	1781271	98.6373	ug/L		94
29) 2-Butanone	9.41	43	39046	22.7525	ug/L		85
30) Propionitrile	9.51	54	62333	111.3740	ug/L		100
31) 2,2-Dichloropropane	9.65	77	119475	13.6933	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	149817	19.6830	ug/L		92
33) Chloroform	9.91	83	249555	19.1011	ug/L		95
34) 1-Bromopropane	10.06	122	32709	24.2327	ug/L		99
35) Bromochloromethane	10.15	130	78952	19.7049	ug/L		99
36) Tetrahydrofuran	10.17	42	123648	109.4116	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	207405	19.5262	ug/L		93
39) Cyclohexane	10.48	56	168065	17.1107	ug/L		83
40) 1,1-Dichloropropene	10.65	75	174091	19.3889	ug/L		86
41) Tert-Amyl-Methyl ether	10.74	73	1734167	101.1396	ug/L		94
42) Carbon Tetrachloride	10.80	117	157853	18.8473	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146816.D 8260BWT.M Fri Apr 28 16:32:06 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146816.D Vial: 19
Acq On : 28 Apr 2017 15:35 Operator: TMB
Sample : L17041200-58 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:32:04 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

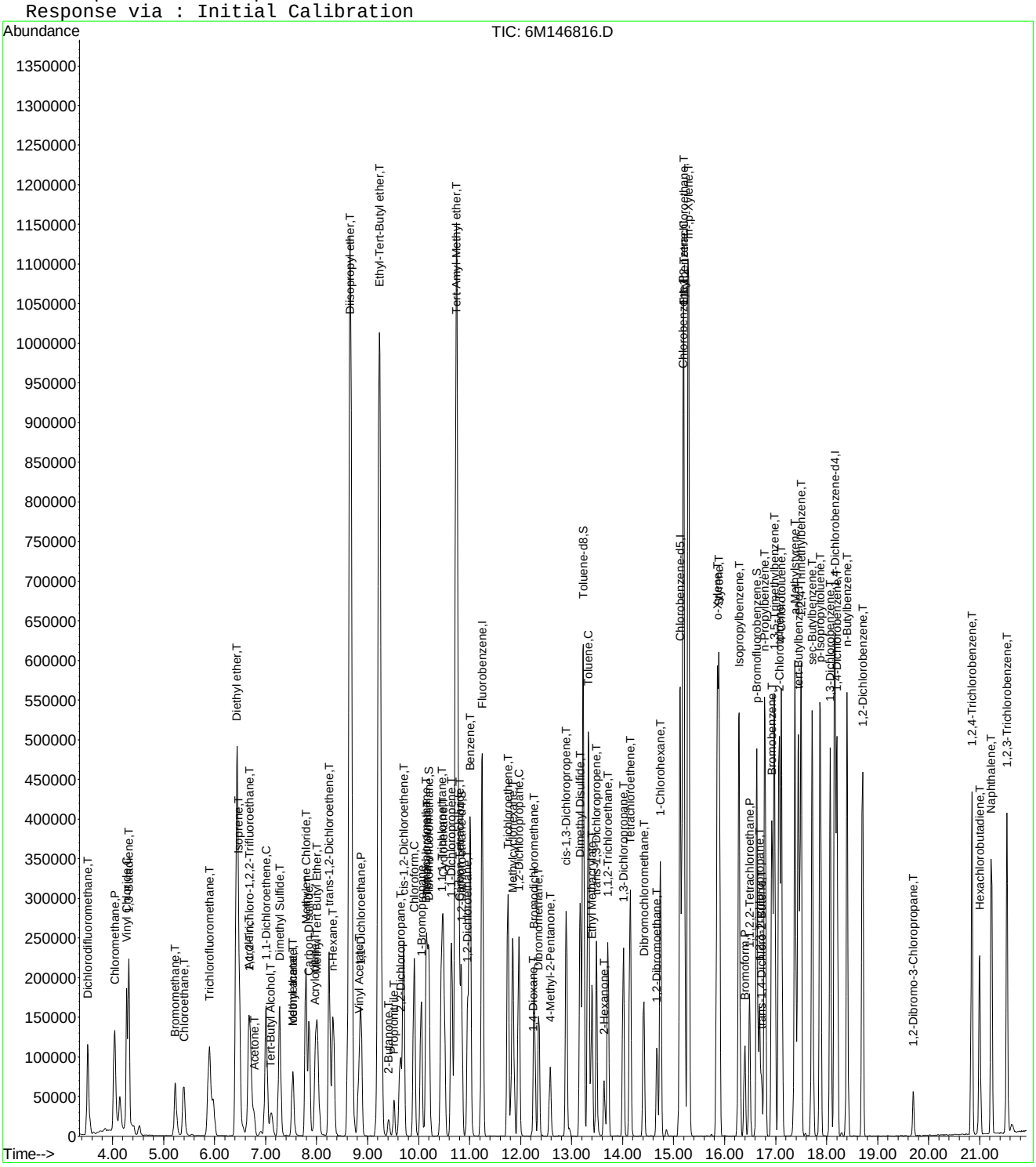
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.95	62	169888	20.9022 ug/L		90
46)	Benzene	11.01	78	529575	19.6156 ug/L		89
47)	Trichloroethene	11.75	130	131770	17.9313 ug/L		92
48)	Methylcyclohexane	11.84	83	173846	16.3741 ug/L		86
49)	1,2-Dichloropropane	11.97	63	133776	20.9960 ug/L		96
50)	1,4-Dioxane	12.24	88	10454	225.6511 ug/L		91
51)	Bromodichloromethane	12.26	83	179177	19.9209 ug/L		99
52)	Dibromomethane	12.35	93	76757	20.4546 ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	36268	22.1225 ug/L		88
55)	cis-1,3-Dichloropropene	12.89	75	209320	21.1331 ug/L		97
56)	Dimethyl Disulfide	13.17	79	123122	19.7036 ug/L		92
59)	Toluene	13.32	91	531281	19.4430 ug/L		100
60)	Ethyl Methacrylate	13.40	69	150665	22.7850 ug/L		79
62)	trans-1,3-Dichloropropene	13.49	75	168255	19.9699 ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	101893	19.7872 ug/L		99
64)	2-Hexanone	13.64	43	59833	24.1971 ug/L		89
65)	1,3-Dichloropropane	14.02	76	184303	21.3221 ug/L		76
66)	Tetrachloroethene	14.15	166	120428	18.1875 ug/L		93
67)	Dibromochloromethane	14.42	129	120707	18.9624 ug/L		99
68)	1,2-Dibromoethane	14.67	107	95958	19.4069 ug/L		99
69)	1-Chlorohexane	14.74	91	169371	19.1946 ug/L		83
70)	Chlorobenzene	15.18	112	345687	18.4839 ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	124408	18.5753 ug/L		96
72)	Ethylbenzene	15.20	106	189653	18.7323 ug/L		98
73)	m-,p-Xylene	15.29	106	456001	37.6816 ug/L		98
74)	o-Xylene	15.86	106	222616	19.0633 ug/L		99
75)	Styrene	15.89	104	380548	19.4117 ug/L		99
76)	Bromoform	16.40	173	69432	17.8988 ug/L		97
77)	Isopropylbenzene	16.29	105	547242	18.7262 ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.49	83	126074	21.7238 ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	35901	20.9481 ug/L		64
82)	trans-1,4-Dichloro-2-Buten	16.72	53	19564	15.8753 ug/L	#	1
83)	n-Propylbenzene	16.79	91	657989	19.5028 ug/L		98
84)	Bromobenzene	16.93	156	144070	19.0082 ug/L		75
85)	1,3,5-Trimethylbenzene	16.98	105	464349	19.4208 ug/L		99
86)	2-Chlorotoluene	17.07	91	445577	19.8348 ug/L		98
87)	4-Chlorotoluene	17.11	91	393186	19.8034 ug/L		99
88)	a-Methylstyrene	17.38	118	253222	19.1516 ug/L		99
89)	tert-Butylbenzene	17.45	134	93527	18.6681 ug/L		70
90)	1,2,4-Trimethylbenzene	17.50	105	487161	19.8393 ug/L		89
91)	sec-Butylbenzene	17.71	105	560285	19.0021 ug/L		96
92)	p-Isopropyltoluene	17.88	119	472693	19.0581 ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	262220	18.3195 ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	268251	18.5322 ug/L		96
95)	n-Butylbenzene	18.40	91	445324	19.6624 ug/L		95
96)	1,2-Dichlorobenzene	18.71	146	247149	18.4212 ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	20838	19.8231 ug/L		95
98)	1,2,4-Trichlorobenzene	20.85	180	171779	17.4988 ug/L		99
99)	Hexachlorobutadiene	21.00	225	60028	16.0101 ug/L		99
100)	Naphthalene	21.23	128	367667	18.7050 ug/L		99
101)	1,2,3-Trichlorobenzene	21.53	180	160694	16.9566 ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146816.D 8260BWT.M Fri Apr 28 16:32:07 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146816.D Vial: 19
Acq On : 28 Apr 2017 15:35 Operator: TMB
Sample : L17041200-58 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:32 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



6M146816.D 8260BWT.M Fri Apr 28 16:32:07 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146813.D Vial: 17
Acq On : 28 Apr 2017 14:33 Operator: TMB
Sample : L17041200-59 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31:54 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

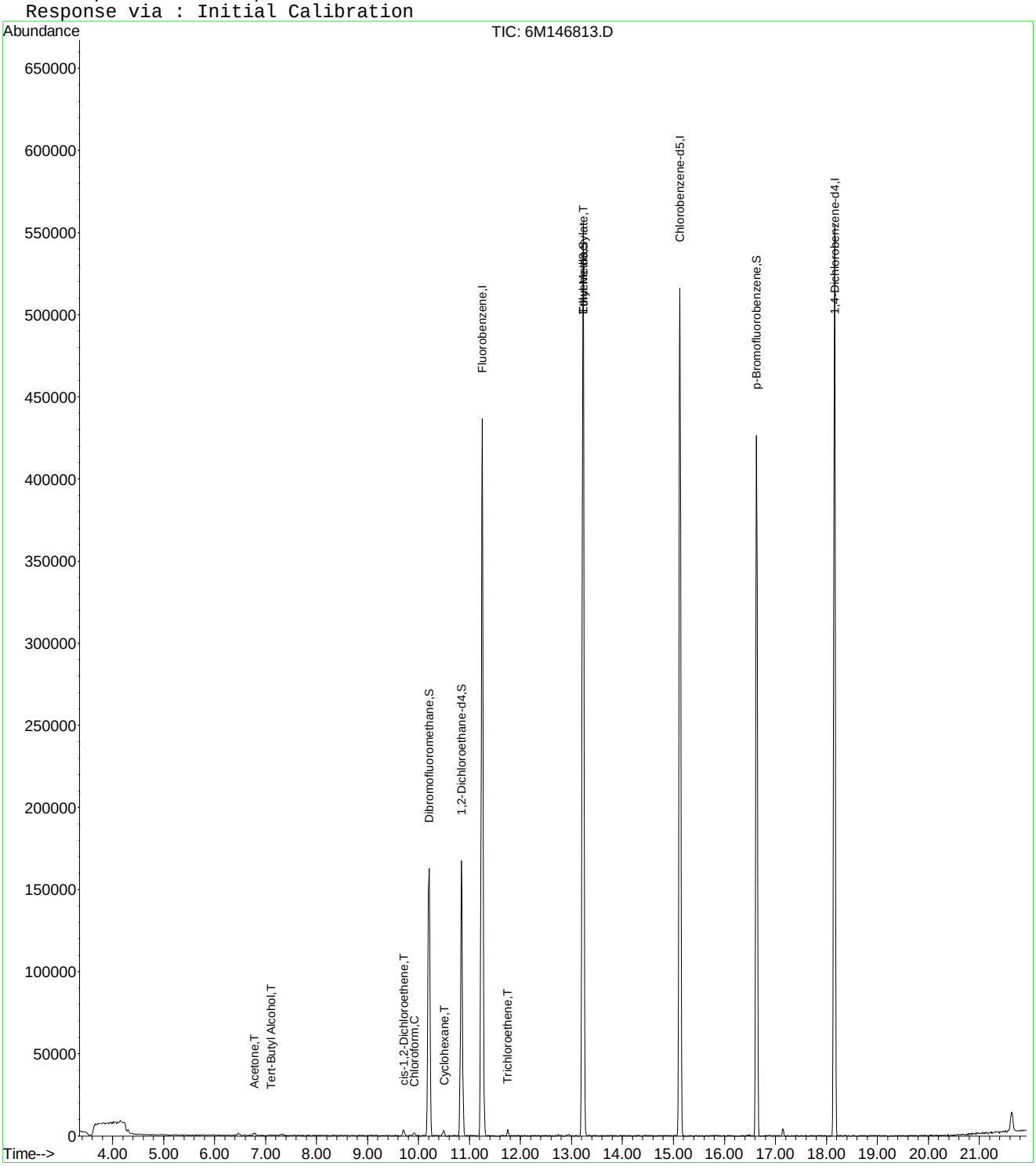
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	554487	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	381477	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	188035	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	140904	24.8930 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.56%		
43) 1,2-Dichloroethane-d4	10.84	65	151167	27.0969 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.40%		
58) Toluene-d8	13.23	98	521371	26.7838 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.12%		
80) p-Bromofluorobenzene	16.63	95	194818	27.2791 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.12%		
Target Compounds					Qvalue
3) Chloromethane	4.03	50	547	Below Cal #	69
13) Acetone	6.78	43	3299	2.7571 ug/L	94
15) Tert-Butyl Alcohol	7.11	59	640	1.7244 ug/L #	57
32) cis-1,2-Dichloroethene	9.72	96	2268	0.3391 ug/L	100
33) Chloroform	9.92	83	2880	0.2509 ug/L #	78
39) Cyclohexane	10.50	56	2919	0.3382 ug/L	73
47) Trichloroethene	11.75	130	1539	0.2383 ug/L #	60
60) Ethyl Methacrylate	13.23	69	755	0.1308 ug/L	78

(#) = qualifier out of range (m) = manual integration
6M146813.D 8260BWT.M Sat Apr 29 12:16:53 2017 Page 1

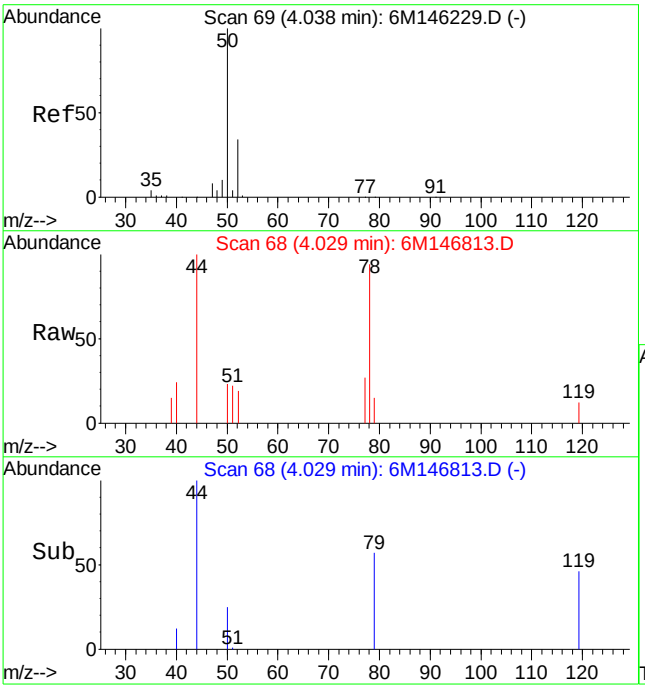
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146813.D Vial: 17
Acq On : 28 Apr 2017 14:33 Operator: TMB
Sample : L17041200-59 A 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 16:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



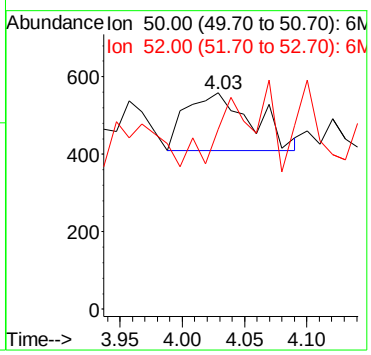
6M146813.D 8260BWT.M Sat Apr 29 12:16:53 2017 Page 2

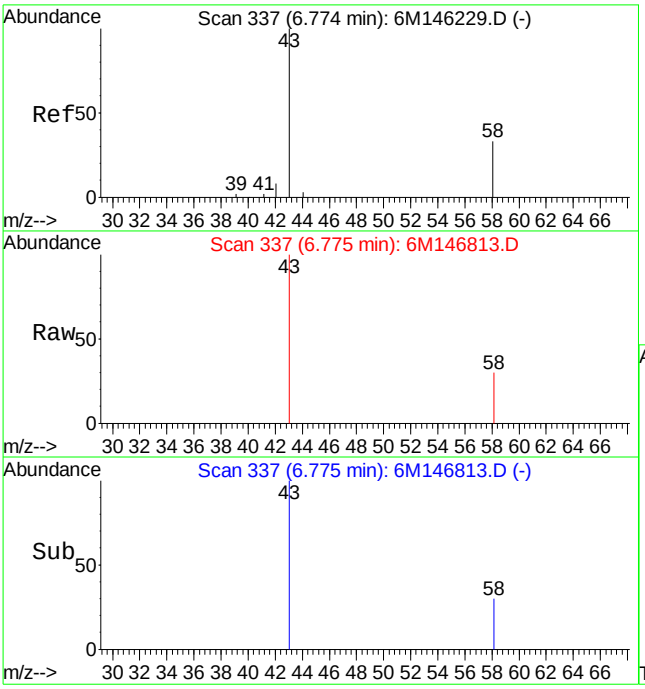


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 50 Resp: 547

Ion	Ratio	Lower	Upper
50	100		
52	50.5	19.8	46.2#

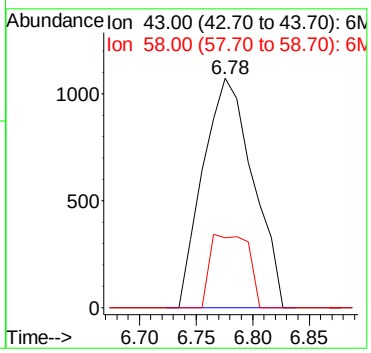


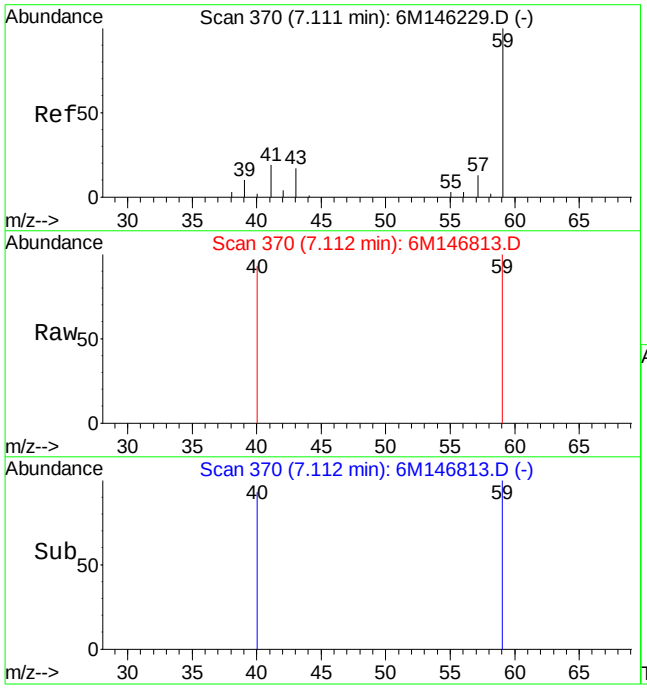


#13
Acetone
Concen: 2.76 ug/L
RT: 6.78 min Scan# 337
Delta R.T. -0.00 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 43 Resp: 3299

Ion	Ratio	Lower	Upper
43	100		
58	24.3	16.4	38.2

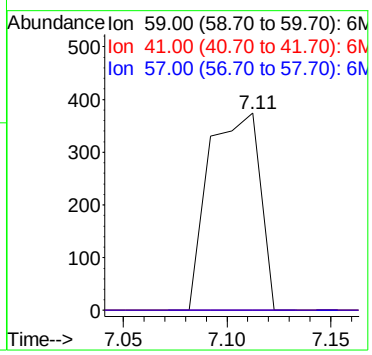


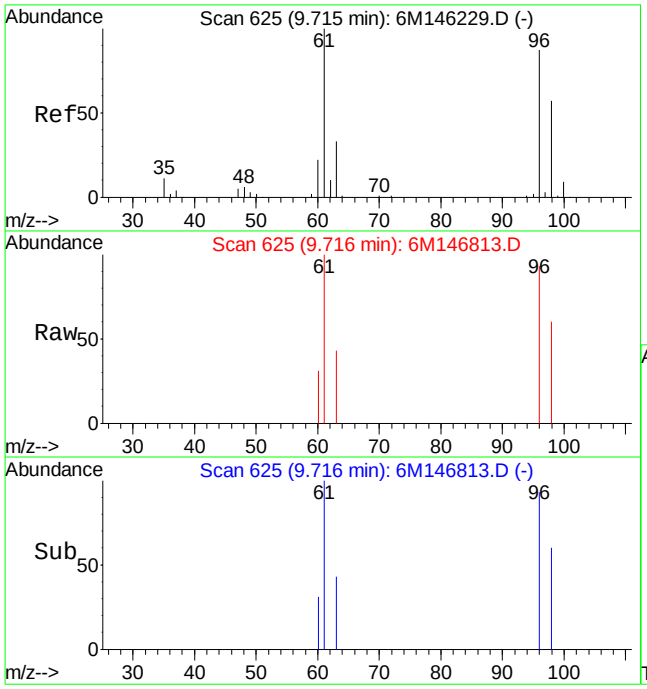


#15
Tert-Butyl Alcohol
Concen: 1.72 ug/L
RT: 7.11 min Scan# 370
Delta R.T. -0.01 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 59 Resp: 640

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

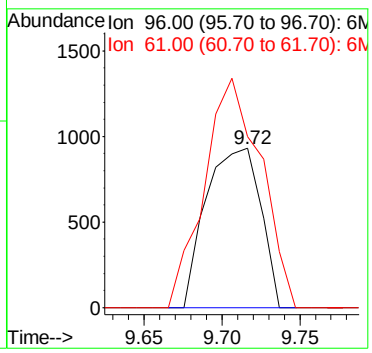


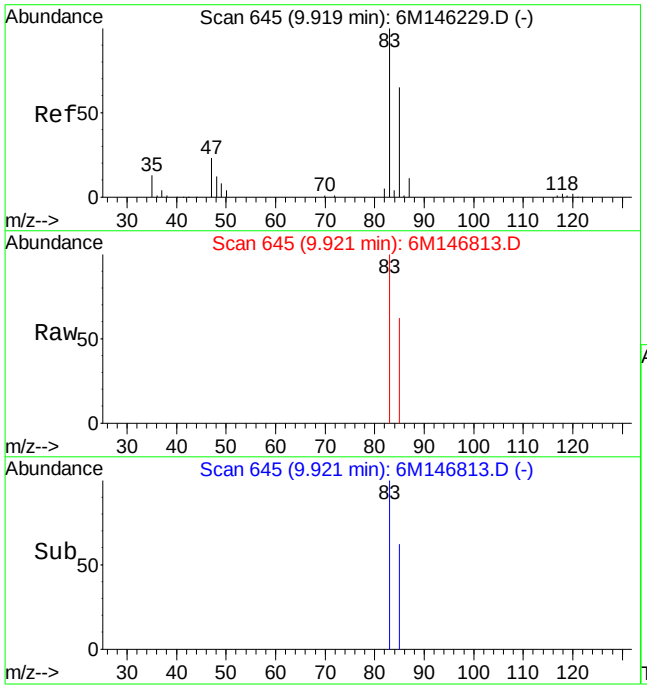


#32
cis-1,2-Dichloroethene
Concen: 0.34 ug/L
RT: 9.72 min Scan# 625
Delta R.T. 0.01 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 96 Resp: 2268

Ion	Ratio	Lower	Upper
96	100		
61	149.3	89.2	208.2

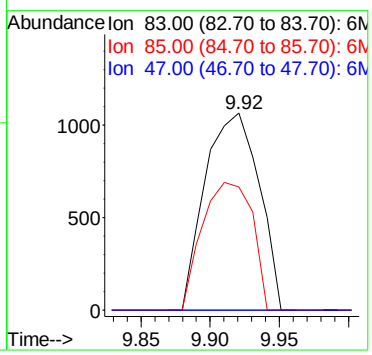


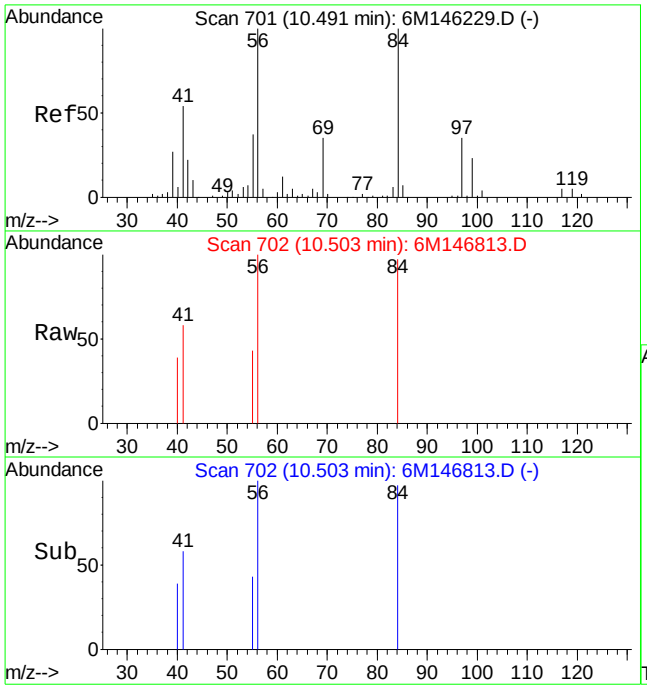


#33
Chloroform
Concen: 0.25 ug/L
RT: 9.92 min Scan# 645
Delta R.T. 0.01 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 83 Resp: 2880

Ion	Ratio	Lower	Upper
83	100		
85	60.2	39.0	91.0
47	0.0	18.5	43.1#

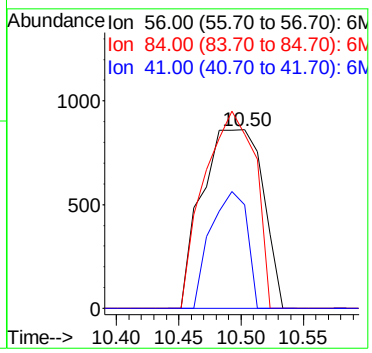


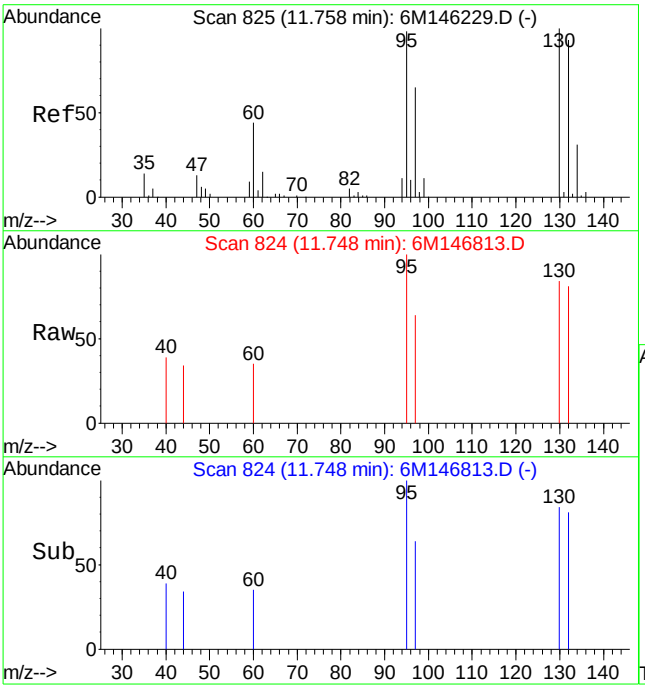


#39
Cyclohexane
Concen: 0.34 ug/L
RT: 10.50 min Scan# 702
Delta R.T. 0.01 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 56 Resp: 2919

Ion	Ratio	Lower	Upper
56	100		
84	93.5	43.6	101.6
41	39.4	37.1	86.5

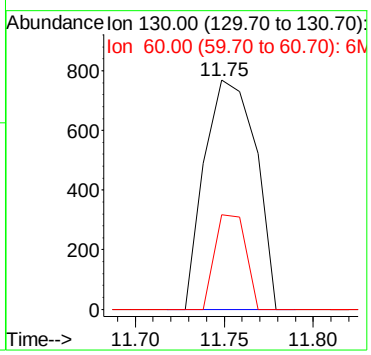


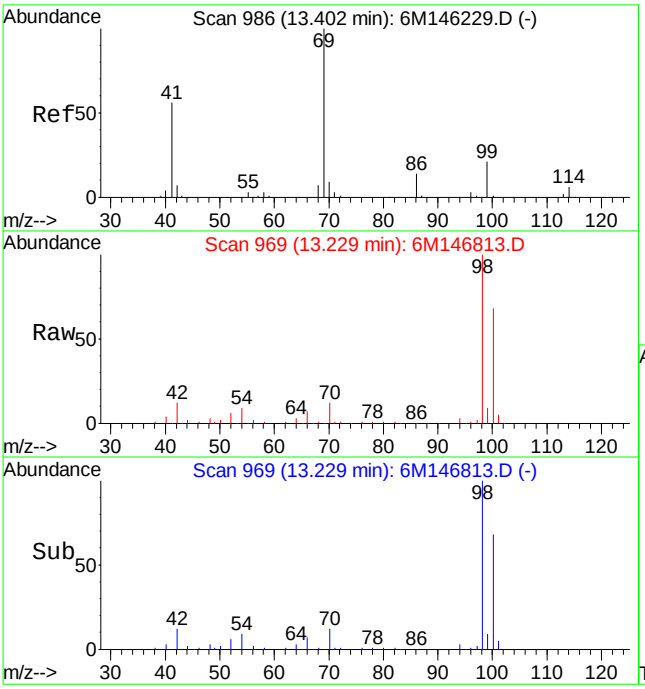


#47
Trichloroethene
Concen: 0.24 ug/L
RT: 11.75 min Scan# 824
Delta R.T. -0.00 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion:130 Resp: 1539

Ion	Ratio	Lower	Upper
130	100		
60	25.0	32.0	74.6#

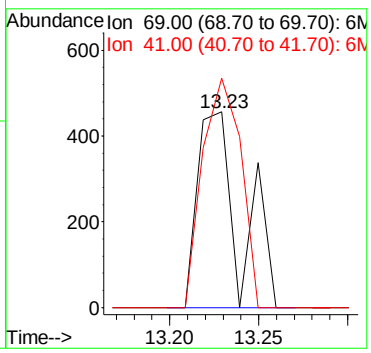




#60
Ethyl Methacrylate
Concen: 0.13 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146813.D
Acq: 28 Apr 2017 14:33

Tgt Ion: 69 Resp: 755

Ion	Ratio	Lower	Upper
69	100		
41	106.1	51.4	120.0



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

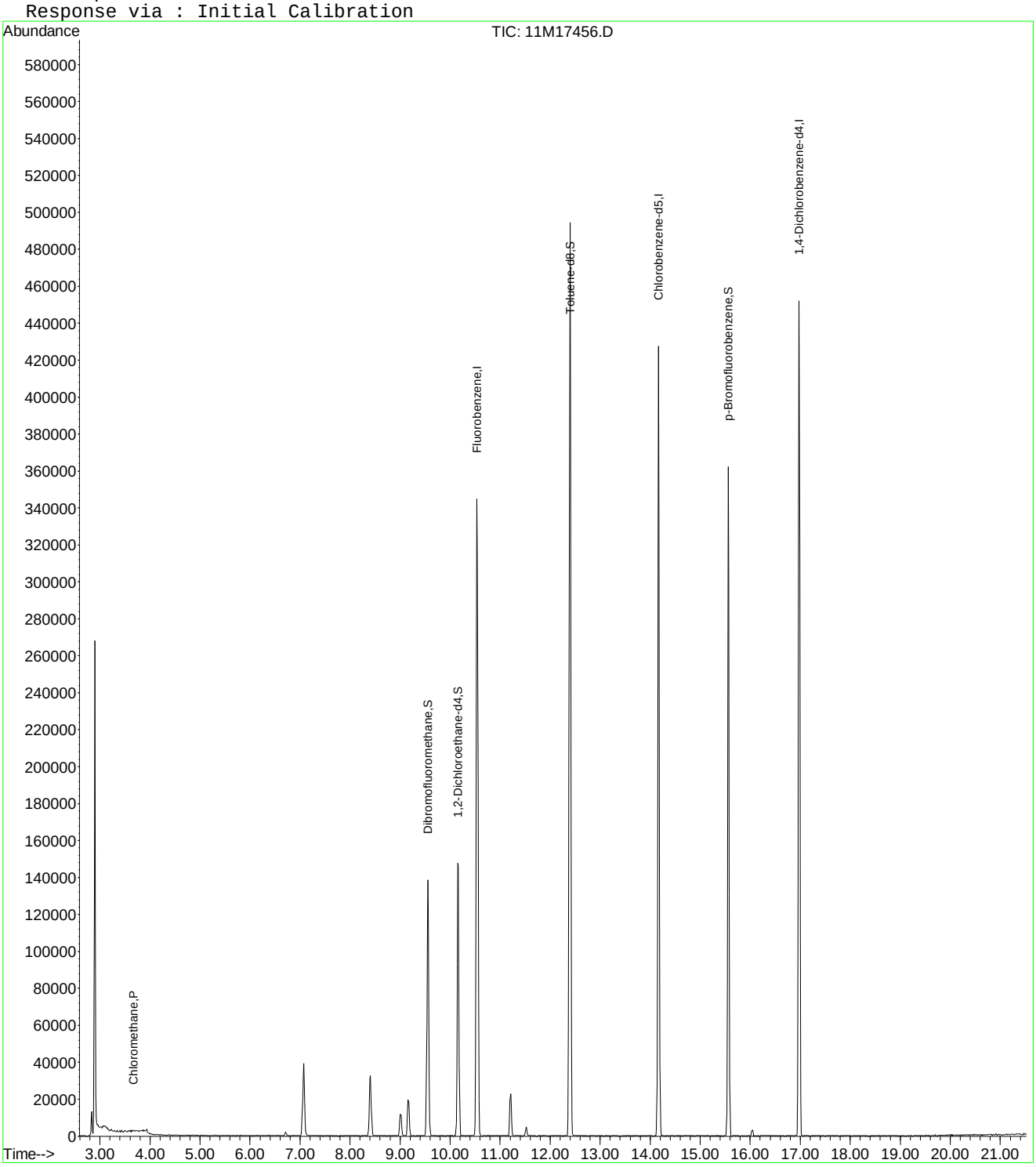
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	109363	26.4089	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.15	65	126342	23.9108	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.64%			
57) Toluene-d8	12.40	98	415624	26.0292	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.12%			
78) p-Bromofluorobenzene	15.56	95	145423	23.2743	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.08%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1126	0.1407	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17456.D 8260WT.M Tue Apr 11 19:13:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:48 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

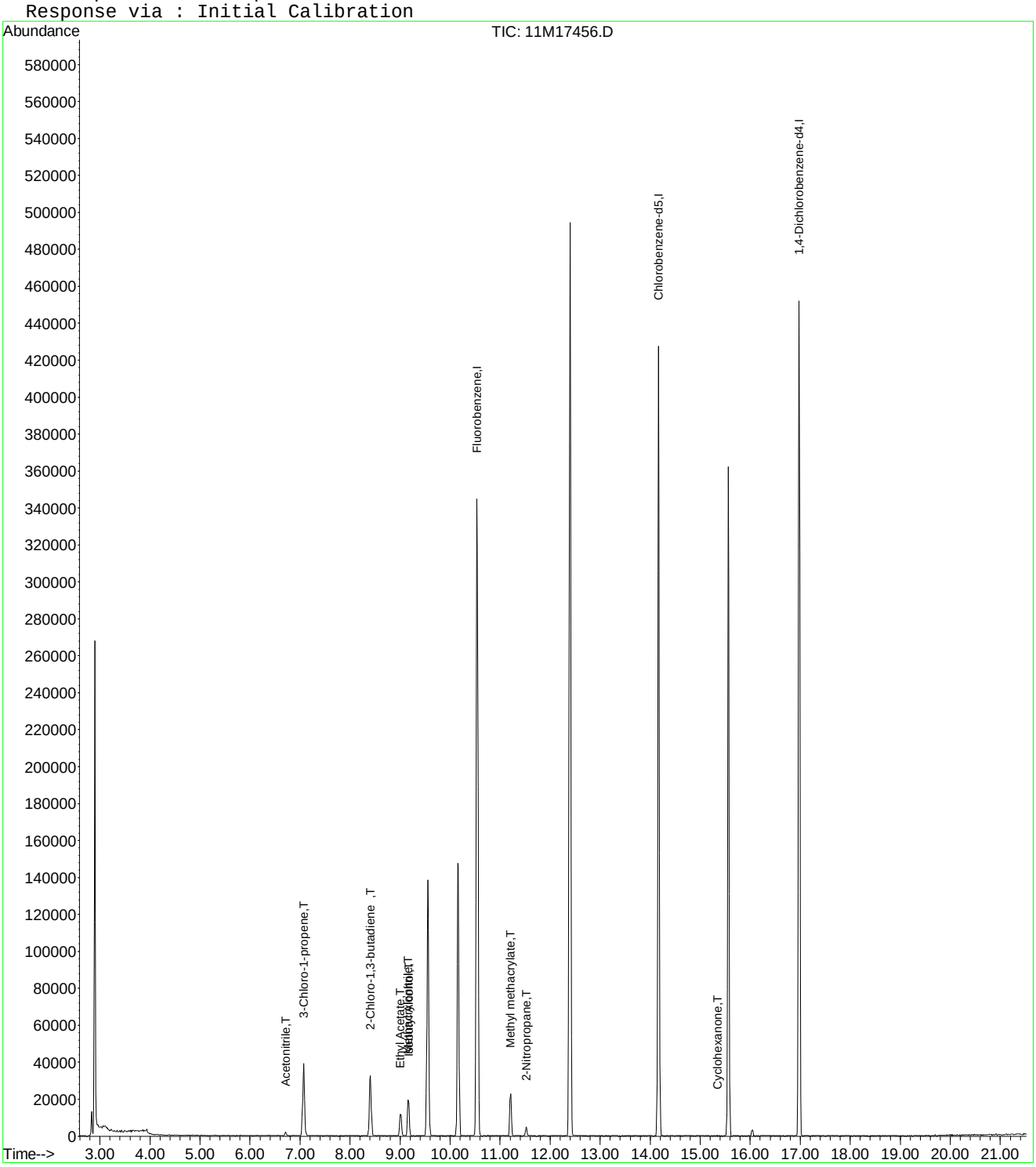
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	2655	3.9469	ug/L	#	57
3) 3-Chloro-1-propene	7.07	41	42597	5.3245	ug/L		83
4) 2-Chloro-1,3-butadiene	8.41	53	33819	4.8784	ug/L		86
5) Methacrylonitrile	9.16	41	14534	4.5257	ug/L		73
6) Isobutyl Alcohol	9.17	43	1353	5.8827	ug/L		86
8) Cyclohexanone	15.34	55	188	24.3163	ug/L	#	19
9) 2-Nitropropane	11.52	43	4060	3.3583	ug/L		100
10) Ethyl Acetate	9.01	43	20309	4.6970	ug/L	#	94
11) Methyl methacrylate	11.21	41	17318	4.3466	ug/L		80

(#) = qualifier out of range (m) = manual integration
11M17456.D A9FOOWT.M Fri Apr 21 13:34:48 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	3.9469	21.1	0	0.00
3	T	3-Chloro-1-propene	5.0000	5.3245	-6.5	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.8784	2.4	100	0.00
5	T	Methacrylonitrile	5.0000	4.5257	9.5	100	0.00
6	T	Isobutyl Alcohol	-1.0000	5.8827	0.0	100	0.00
7	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.04#
8	T	Cyclohexanone	-1.0000	24.3163	0.0	0	0.00
9	T	2-Nitropropane	-1.0000	3.3583	0.0	100	0.00
10	T	Ethyl Acetate	5.0000	4.6970	6.1	100	0.00
11	T	Methyl methacrylate	5.0000	4.3466	13.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17456.D A9FOOWT.M Fri Apr 21 13:37:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42:41 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

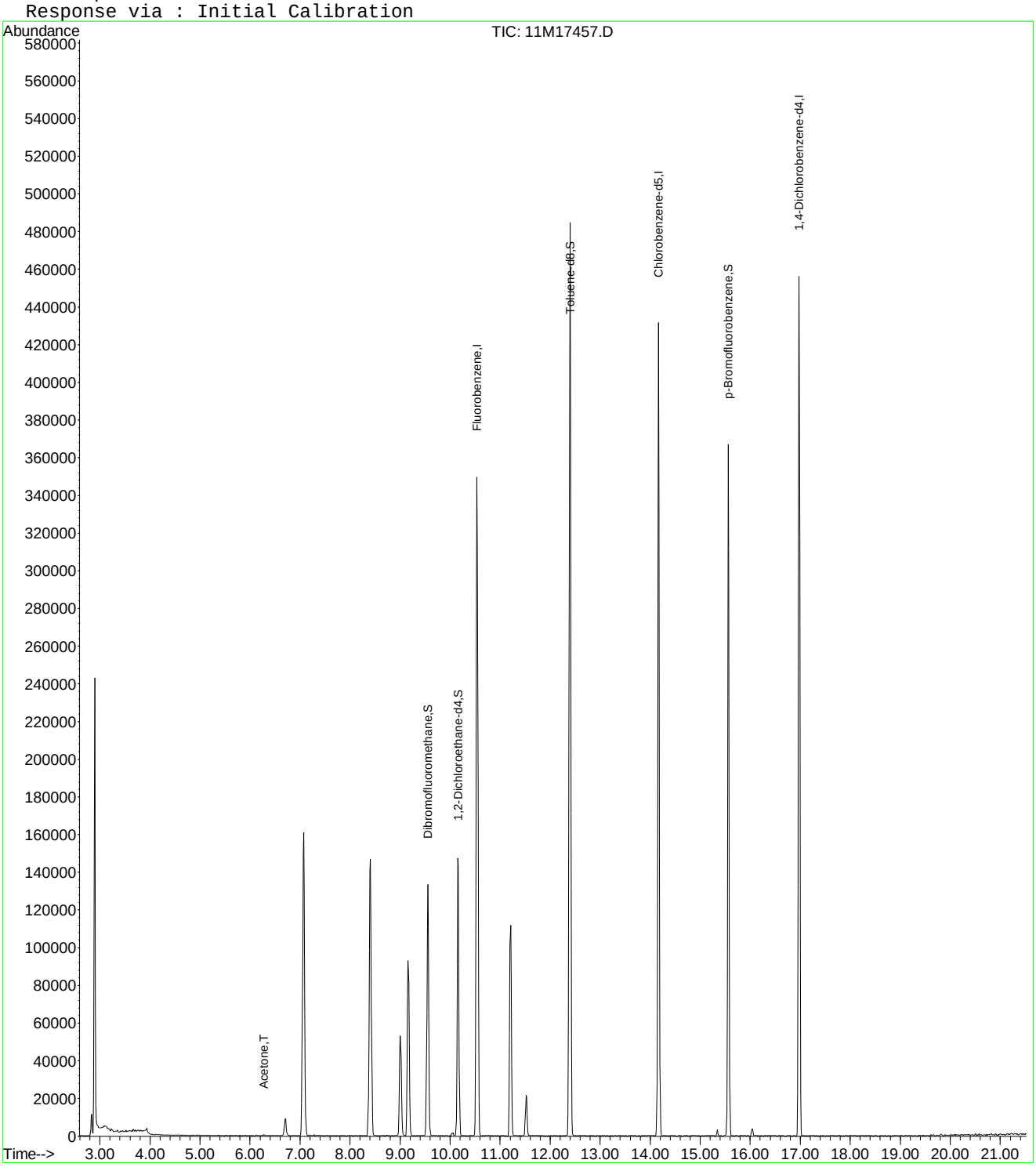
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108479	25.9785	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.92%			
43) 1,2-Dichloroethane-d4	10.16	65	125288	23.5150	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.04%			
57) Toluene-d8	12.40	98	409577	25.2978	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.20%			
78) p-Bromofluorobenzene	15.56	95	144896	23.3830	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.52%			
Target Compounds						Qvalue
13) Acetone	6.28	43	637	0.3936	ug/L #	46

(#) = qualifier out of range (m) = manual integration
11M17457.D 8260WT.M Tue Apr 11 19:42:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:49 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

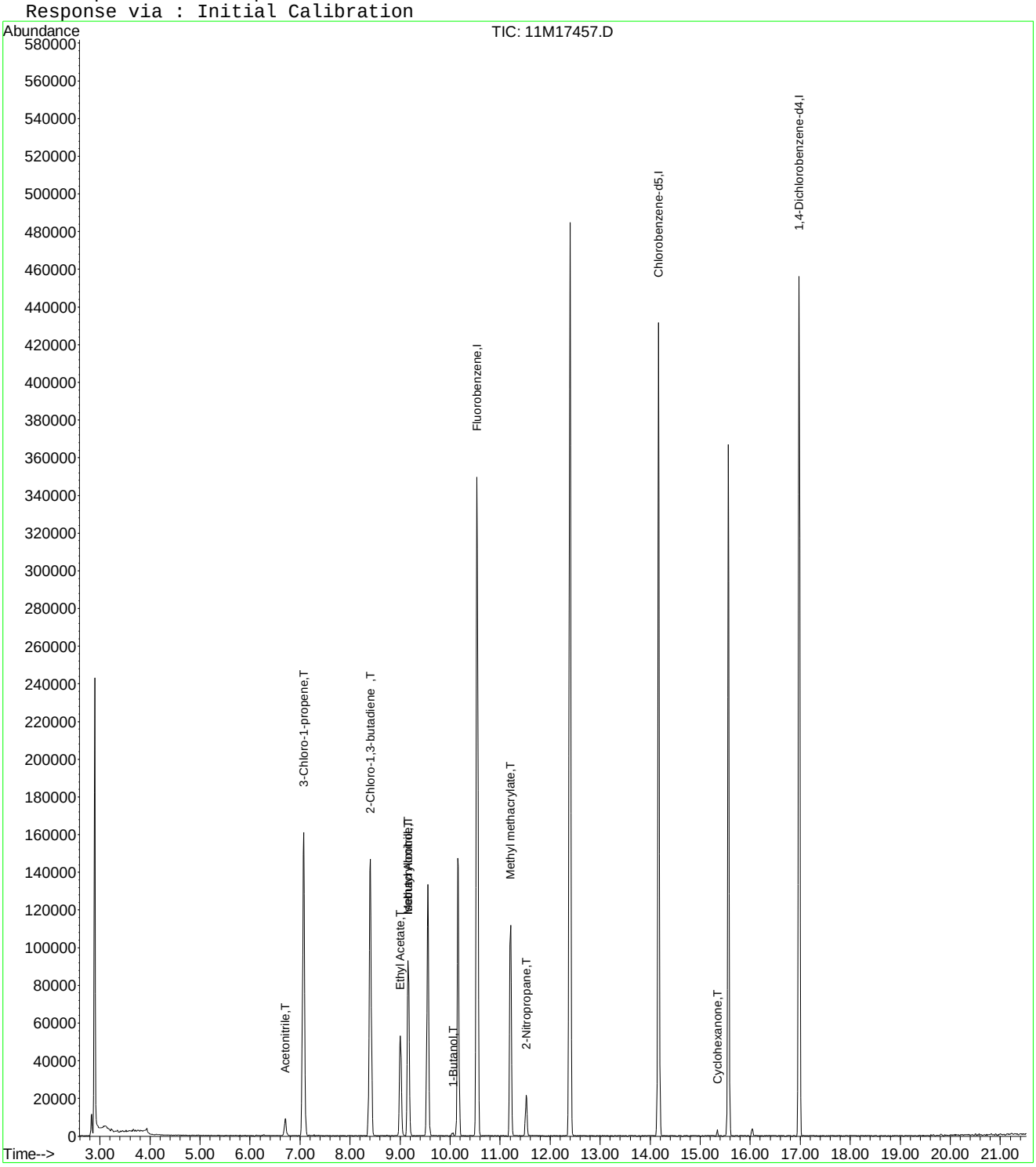
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	12921	19.0493	ug/L		93
3) 3-Chloro-1-propene	7.07	41	179217	22.2162	ug/L		84
4) 2-Chloro-1,3-butadiene	8.41	53	148576	21.2547	ug/L		81
5) Methacrylonitrile	9.16	41	66481	20.5299	ug/L		79
6) Isobutyl Alcohol	9.16	43	8047	34.6980	ug/L		84
7) 1-Butanol	10.06	56	1259	51.3220	ug/L	#	15
8) Cyclohexanone	15.34	55	2341	34.9999	ug/L	#	77
9) 2-Nitropropane	11.52	43	19277	15.8135	ug/L		98
10) Ethyl Acetate	9.01	43	89326	20.4881	ug/L	#	92
11) Methyl methacrylate	11.21	41	80466	20.0289	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17457.D A9FOOWT.M Fri Apr 21 13:34:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.0493	4.8	100	-0.01
3	T	3-Chloro-1-propene	20.0000	22.2162	-11.1	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	21.2547	-6.3	100	0.00
5	T	Methacrylonitrile	20.0000	20.5299	-2.6	100	0.00
6	T	Isobutyl Alcohol	40.0000	34.6980	13.3	100	-0.01
7	T	1-Butanol	-1.0000	51.3220	0.0	100	0.02
8	T	Cyclohexanone	-1.0000	34.9999	0.0	100	0.00
9	T	2-Nitropropane	-1.0000	15.8135	0.0	100	0.00
10	T	Ethyl Acetate	20.0000	20.4881	-2.4	100	0.00
11	T	Methyl methacrylate	20.0000	20.0289	-0.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17457.D A9FOOWT.M Fri Apr 21 13:37:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

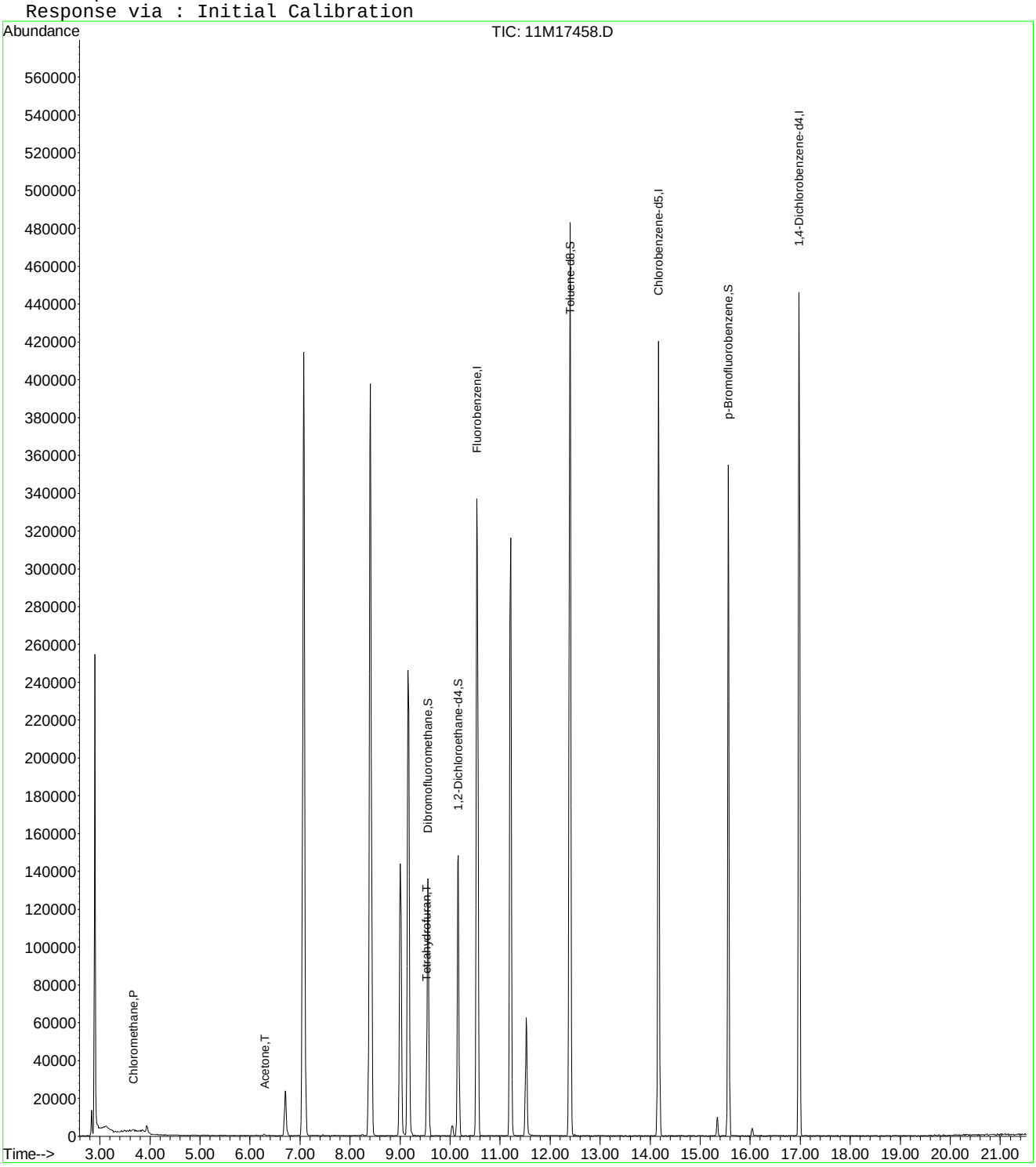
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108362	26.2787	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.12%			
43) 1,2-Dichloroethane-d4	10.16	65	125236	23.8026	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.20%			
57) Toluene-d8	12.40	98	407400	25.6066	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.44%			
78) p-Bromofluorobenzene	15.56	95	144829	23.2872	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.16%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	985	0.1236	ug/L	78
13) Acetone	6.30	43	1193	0.7465	ug/L #	46
36) Tetrahydrofuran	9.53	42	402	0.2227	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17458.D 8260WT.M Tue Apr 11 20:12:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:50 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

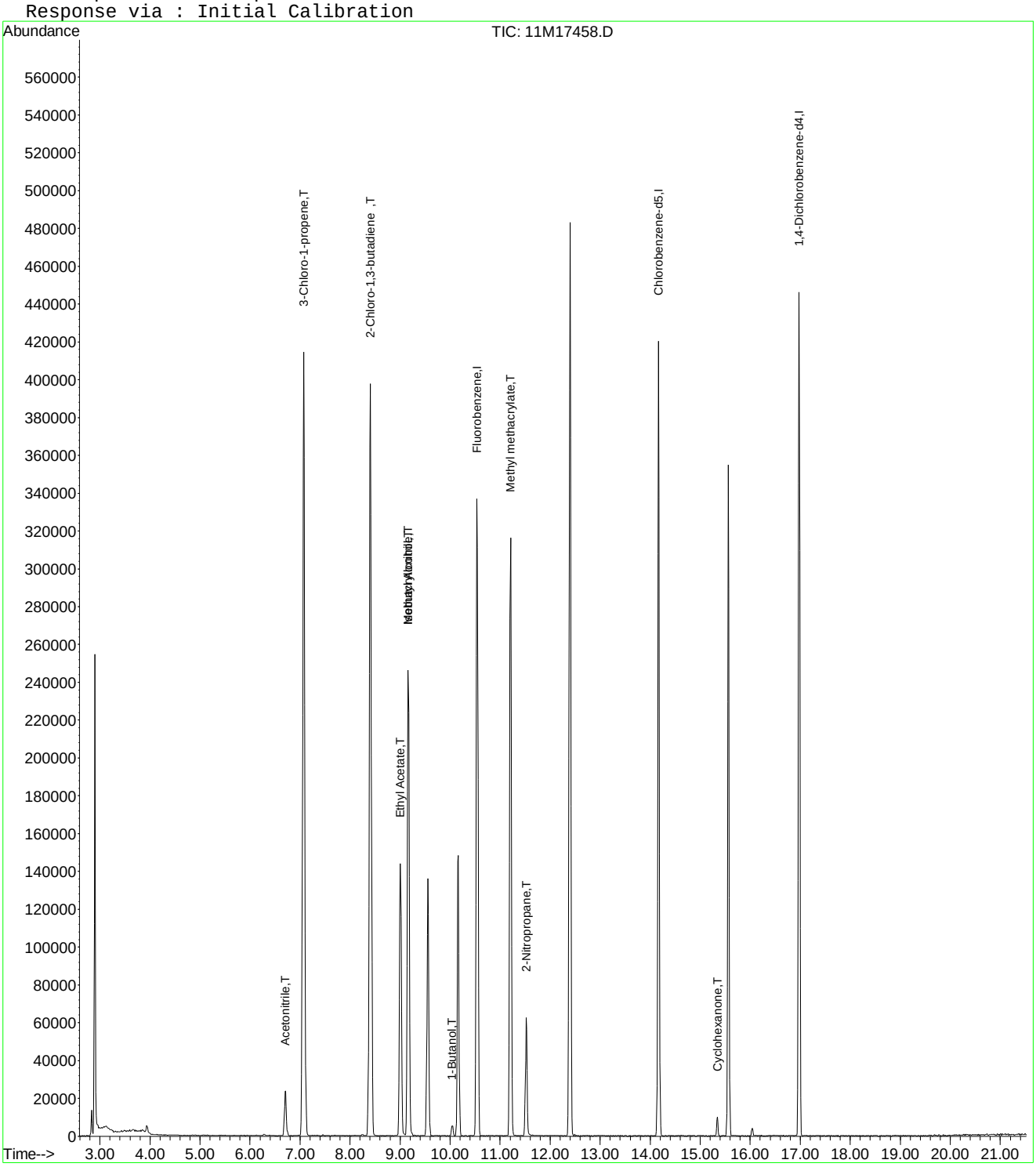
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	32285	48.1995	ug/L		99
3) 3-Chloro-1-propene	7.07	41	457447	57.4238	ug/L		82
4) 2-Chloro-1,3-butadiene	8.41	53	391135	56.6621	ug/L		81
5) Methacrylonitrile	9.16	41	171426	53.6075	ug/L		77
6) Isobutyl Alcohol	9.16	43	21874	95.5120	ug/L		82
7) 1-Butanol	10.04	56	3950	70.2746	ug/L	#	84
8) Cyclohexanone	15.34	55	6611	56.6194	ug/L	#	80
9) 2-Nitropropane	11.52	43	54987	45.6781	ug/L		95
10) Ethyl Acetate	9.01	43	236322	54.8894	ug/L	#	93
11) Methyl methacrylate	11.21	41	217399	54.7977	ug/L		78

(#) = qualifier out of range (m) = manual integration
11M17458.D A9FOOWT.M Fri Apr 21 13:34:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	48.1995	3.6	100	-0.01
3	T	3-Chloro-1-propene	50.0000	57.4238	-14.8	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	56.6621	-13.3	100	0.00
5	T	Methacrylonitrile	50.0000	53.6075	-7.2	100	0.00
6	T	Isobutyl Alcohol	100.0000	95.5120	4.5	100	-0.01
7	T	1-Butanol	-1.0000	70.2746	0.0	100	0.00
8	T	Cyclohexanone	50.0000	56.6194	-13.2	100	0.00
9	T	2-Nitropropane	50.0000	45.6781	8.6	100	0.00
10	T	Ethyl Acetate	50.0000	54.8894	-9.8	100	0.00
11	T	Methyl methacrylate	50.0000	54.7977	-9.6	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17458.D A9FOOWT.M Fri Apr 21 13:37:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

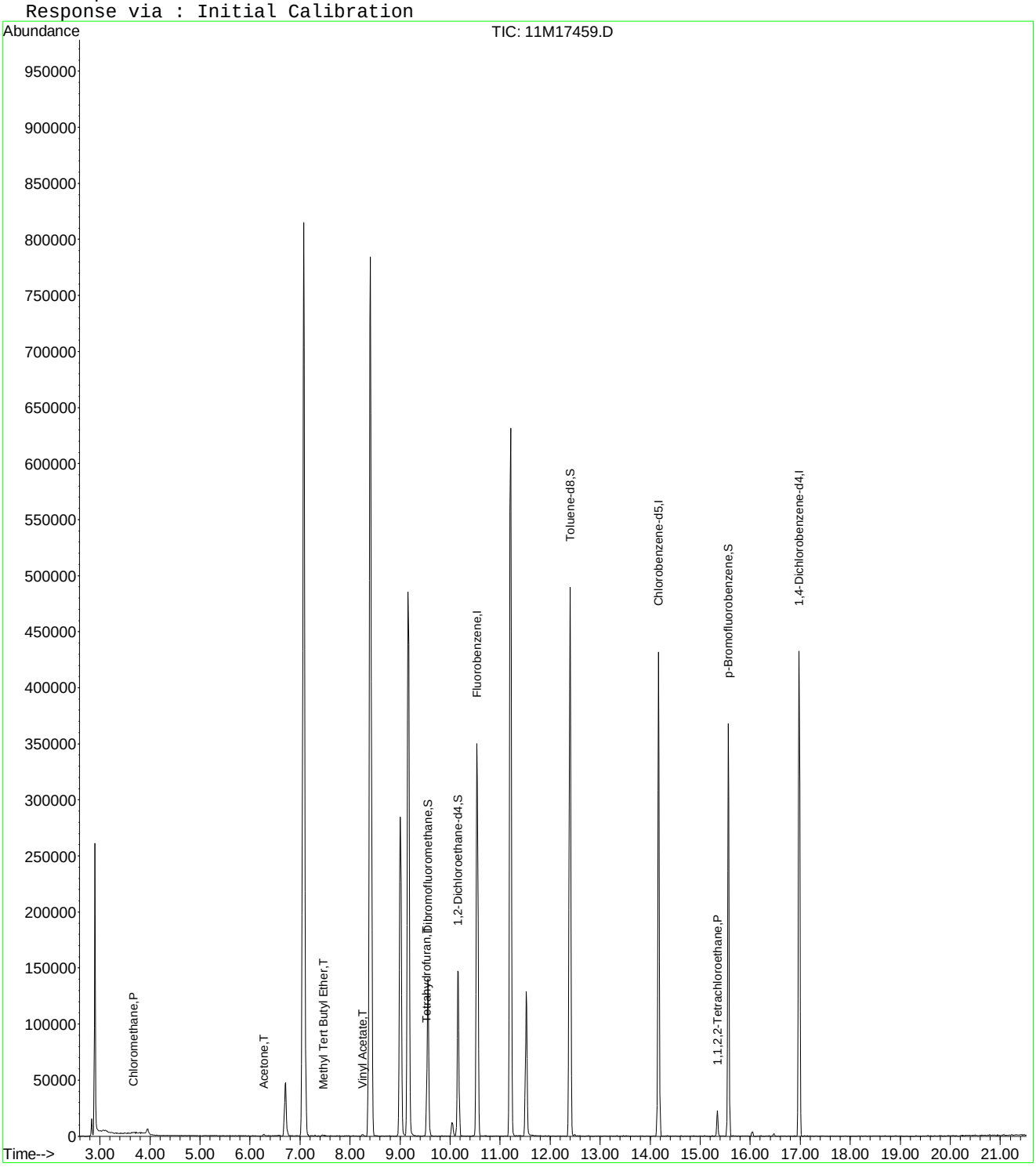
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	111534	26.4487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.80%			
43) 1,2-Dichloroethane-d4	10.15	65	126001	23.4174	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.68%			
57) Toluene-d8	12.40	98	411886	25.4379	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.76%			
78) p-Bromofluorobenzene	15.56	95	149293	25.2500	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1132	0.1389	ug/L	# 55
13) Acetone	6.28	43	2268	1.3877	ug/L	80
22) Methyl Tert Butyl Ether	7.47	73	2104	0.1479	ug/L	# 47
26) Vinyl Acetate	8.25	43	2683	0.2564	ug/L	# 77
36) Tetrahydrofuran	9.53	42	240	0.1300	ug/L	# 41
77) 1,1,2,2-Tetrachloroethane	15.34	83	872	0.1644	ug/L	# 18

(#) = qualifier out of range (m) = manual integration
11M17459.D 8260WT.M Tue Apr 11 20:42:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:51 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

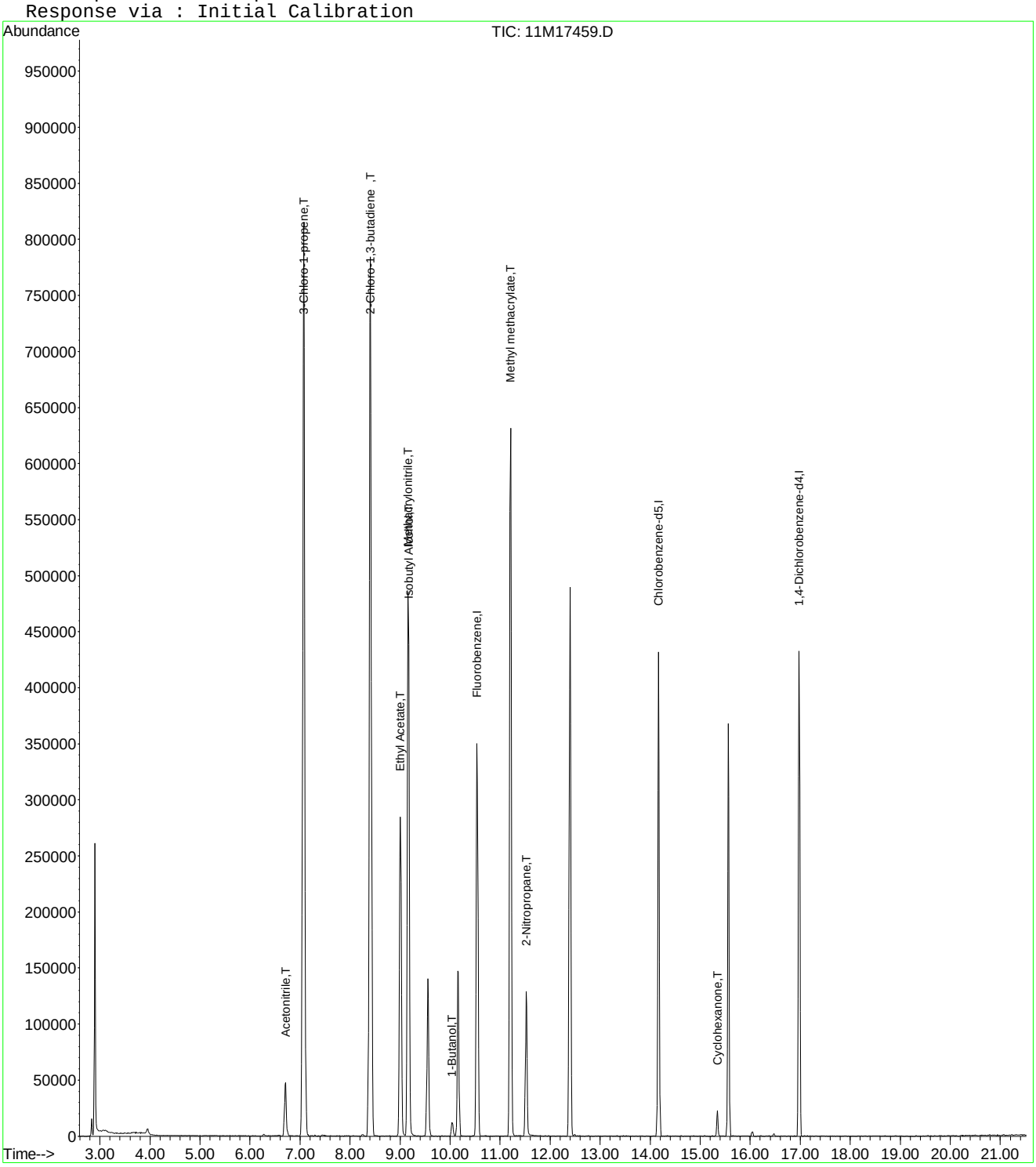
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	65494	95.6122	ug/L		99
3) 3-Chloro-1-propene	7.07	41	885129	108.6494	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	760026	107.6624	ug/L		78
5) Methacrylonitrile	9.16	41	338034	103.3663	ug/L		76
6) Isobutyl Alcohol	9.17	43	41794	178.4487	ug/L		89
7) 1-Butanol	10.04	56	8518	100.9385	ug/L	#	84
8) Cyclohexanone	15.34	55	13236	88.4596	ug/L	#	84
9) 2-Nitropropane	11.52	43	115457	93.7860	ug/L		94
10) Ethyl Acetate	9.01	43	459743	104.4165	ug/L	#	90
11) Methyl methacrylate	11.21	41	434329	107.0516	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17459.D A9FOOWT.M Fri Apr 21 13:34:51 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	95.6122	4.4	100	0.00
3	T	3-Chloro-1-propene	100.0000	108.6494	-8.6	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.6624	-7.7	100	0.00
5	T	Methacrylonitrile	100.0000	103.3663	-3.4	100	0.00
6	T	Isobutyl Alcohol	200.0000	178.4487	10.8	100	0.00
7	T	1-Butanol	100.0000	100.9385	-0.9	100	0.00
8	T	Cyclohexanone	100.0000	88.4596	11.5	100	0.00
9	T	2-Nitropropane	100.0000	93.7860	6.2	100	0.00
10	T	Ethyl Acetate	100.0000	104.4165	-4.4	100	0.00
11	T	Methyl methacrylate	100.0000	107.0516	-7.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17459.D A9FOOWT.M Fri Apr 21 13:39:02 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11:03 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

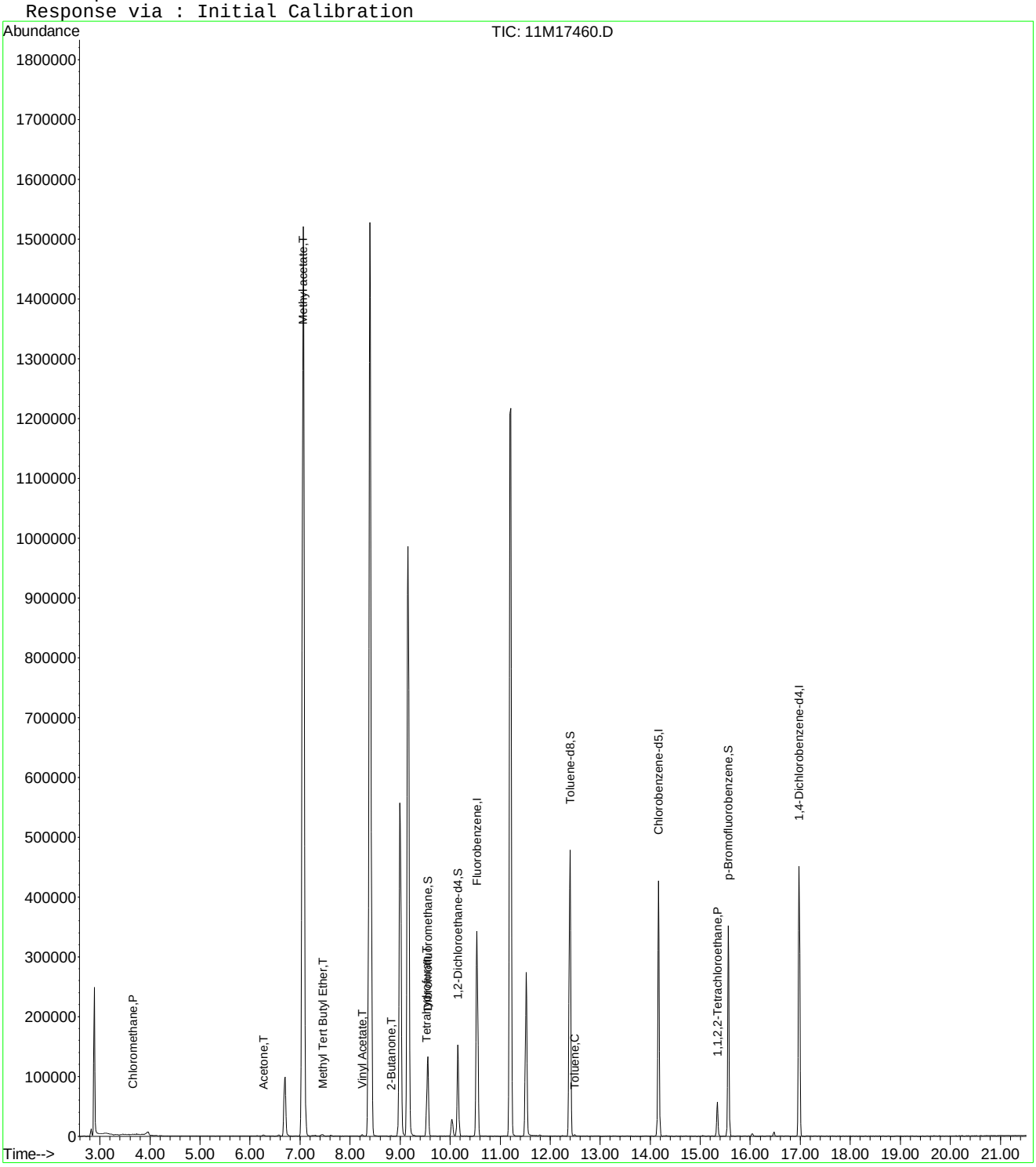
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106964	26.0007	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%			
43) 1,2-Dichloroethane-d4	10.15	65	122550	23.3468	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.40%			
57) Toluene-d8	12.40	98	406174	25.3933	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.56%			
78) p-Bromofluorobenzene	15.56	95	144524	23.5455	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 94.20%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1338	0.1683	ug/L #	67
13) Acetone	6.27	43	4034	2.5301	ug/L	78
18) Methyl acetate	7.05	43	612	0.1369	ug/L #	1
22) Methyl Tert Butyl Ether	7.45	73	4894	0.3527	ug/L	93
26) Vinyl Acetate	8.24	43	5337	0.5228	ug/L #	77
29) 2-Butanone	8.82	43	474	0.1854	ug/L #	55
36) Tetrahydrofuran	9.53	42	385	0.2138	ug/L #	41
58) Toluene	12.49	91	2879	0.1437	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	2354	0.4276	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17460.D 8260WT.M Tue Apr 11 21:11:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:52 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

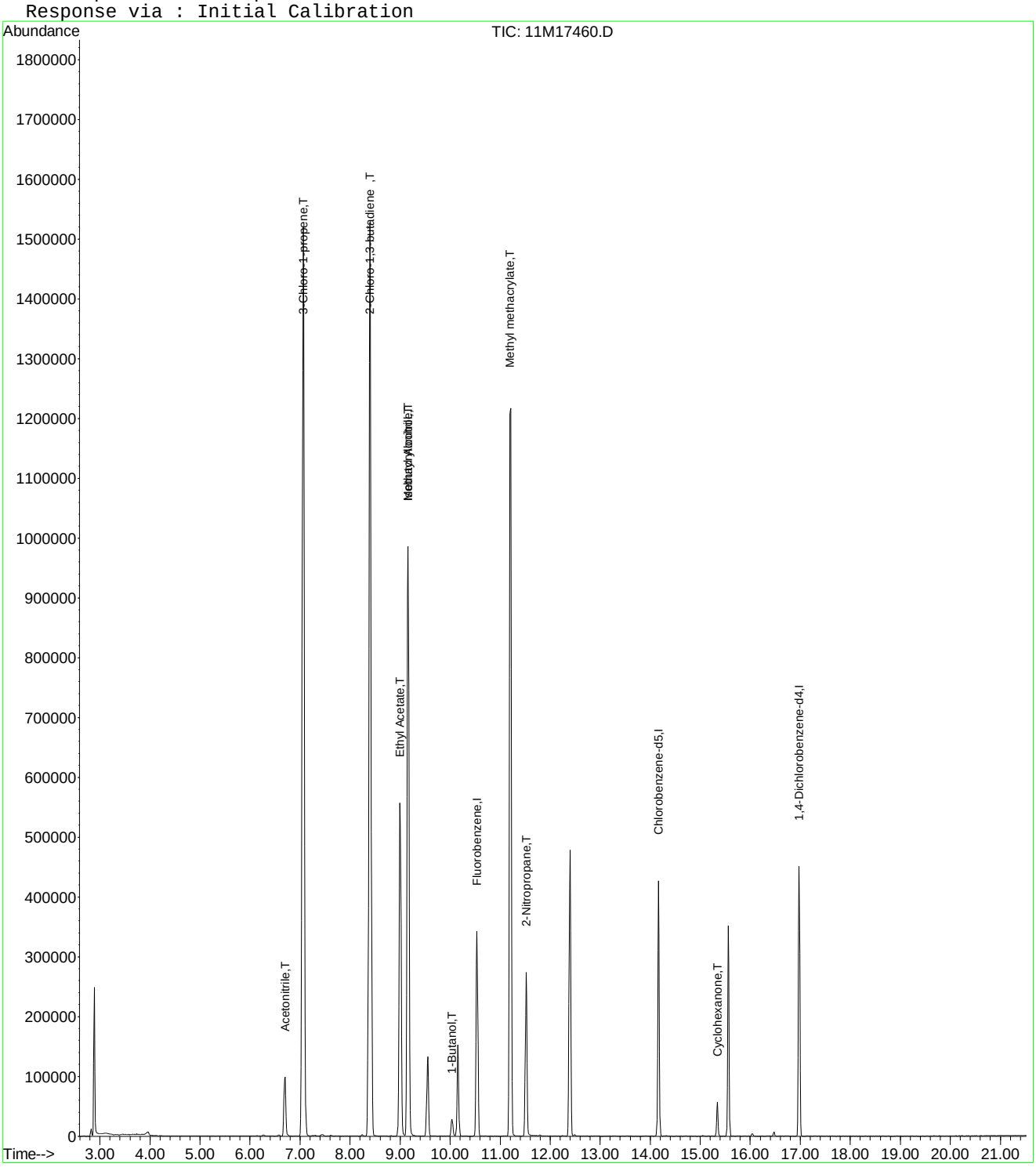
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	136902	204.8671	ug/L		98
3) 3-Chloro-1-propene	7.06	41	1641249	206.5122	ug/L		74
4) 2-Chloro-1,3-butadiene	8.40	53	1451521	210.7703	ug/L		74
5) Methacrylonitrile	9.16	41	673287	211.0422	ug/L		74
6) Isobutyl Alcohol	9.16	43	92763	405.9989	ug/L		87
7) 1-Butanol	10.04	56	21553	193.8864	ug/L	#	82
8) Cyclohexanone	15.34	55	32781	188.6073	ug/L	#	83
9) 2-Nitropropane	11.52	43	245915	204.7638	ug/L		95
10) Ethyl Acetate	9.00	43	905759	210.8712	ug/L	#	89
11) Methyl methacrylate	11.20	41	859855	217.2452	ug/L		74

(#) = qualifier out of range (m) = manual integration
11M17460.D A9FOOWT.M Fri Apr 21 13:34:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

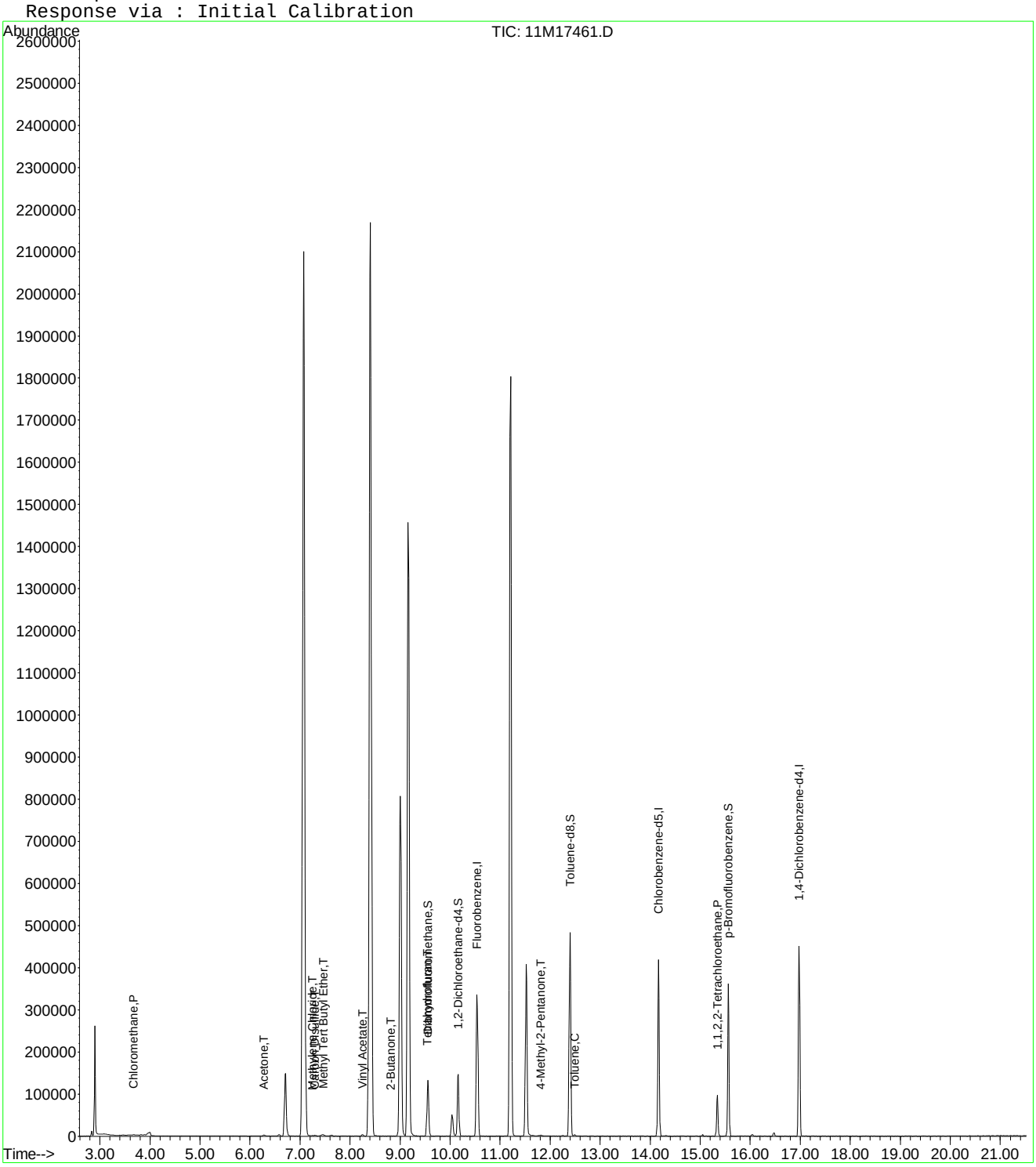
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	107197	26.4141	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.16	65	123580	23.8654	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.48%			
57) Toluene-d8	12.40	98	410662	25.6678	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.68%			
78) p-Bromofluorobenzene	15.56	95	147403	23.4277	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.72%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1060	0.1352	ug/L #	75
13) Acetone	6.28	43	5404	3.4357	ug/L	98
19) Methylene Chloride	7.25	84	697	0.1329	ug/L	66
20) Carbon Disulfide	7.29	76	1636	0.1208	ug/L #	73
22) Methyl Tert Butyl Ether	7.47	73	7202	0.5261	ug/L	85
26) Vinyl Acetate	8.25	43	8317	0.8259	ug/L #	80
29) 2-Butanone	8.81	43	763	0.3025	ug/L #	55
36) Tetrahydrofuran	9.54	42	395	0.2224	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	258	0.1206	ug/L #	40
58) Toluene	12.49	91	4122	0.2057	ug/L	97
77) 1,1,2,2-Tetrachloroethane	15.34	83	4198	0.7439	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17461.D 8260WT.M Tue Apr 11 21:40:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:53 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

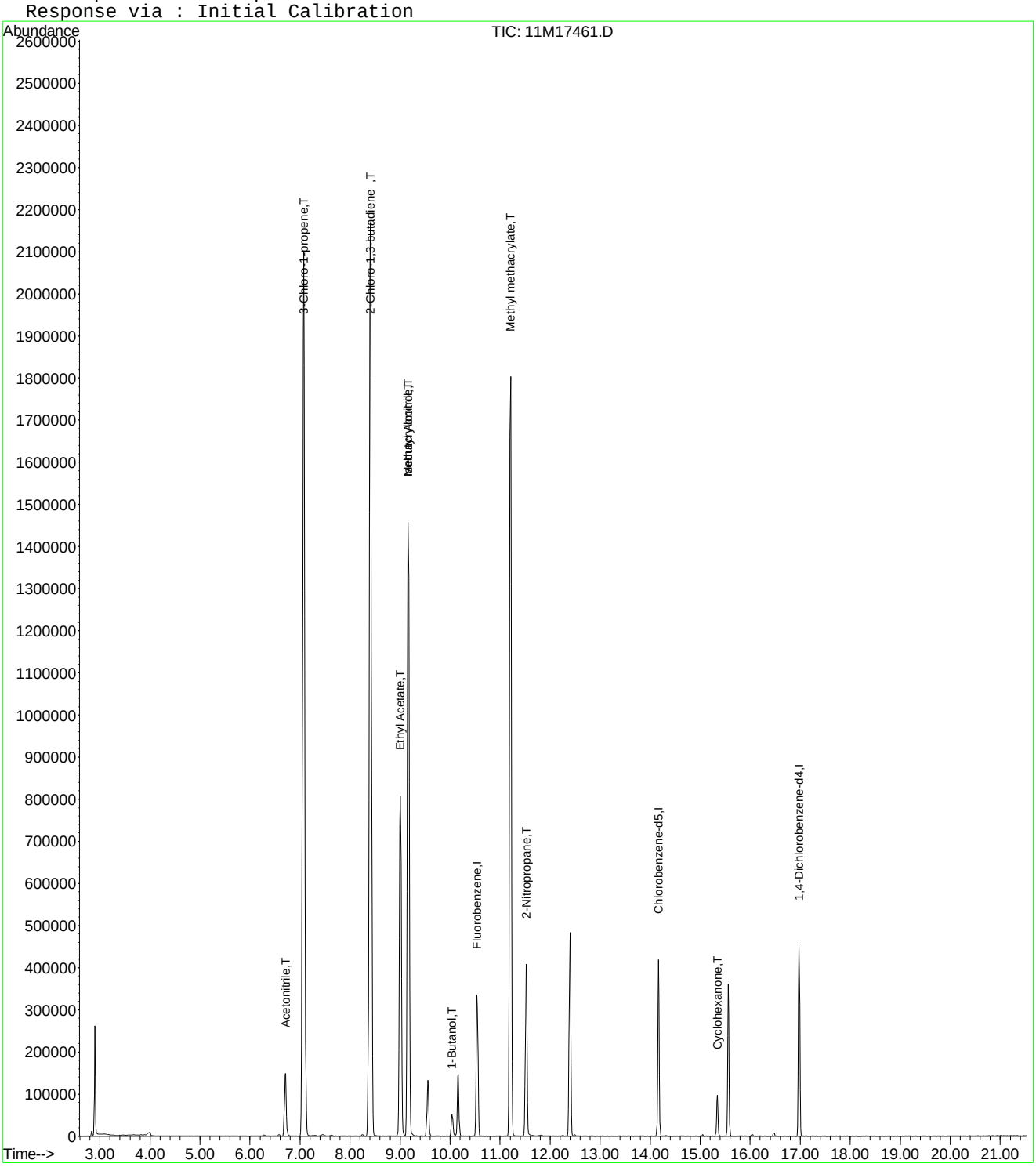
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	206451	313.1737	ug/L		99
3) 3-Chloro-1-propene	7.07	41	2228814	284.2830	ug/L		69
4) 2-Chloro-1,3-butadiene	8.41	53	2012298	296.1995	ug/L		70
5) Methacrylonitrile	9.16	41	972780	309.0933	ug/L		72
6) Isobutyl Alcohol	9.16	43	149280	662.3042	ug/L		87
7) 1-Butanol	10.04	56	37487	309.3216	ug/L	#	79
8) Cyclohexanone	15.34	55	55514	307.0239	ug/L	#	85
9) 2-Nitropropane	11.52	43	377920	318.9877	ug/L		94
10) Ethyl Acetate	9.01	43	1297135	306.1227	ug/L	#	86
11) Methyl methacrylate	11.21	41	1217565	311.8337	ug/L		71

(#) = qualifier out of range (m) = manual integration
11M17461.D A9FOOWT.M Fri Apr 21 13:34:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17461.D A9FOOWT.M Fri Apr 21 13:34:53 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

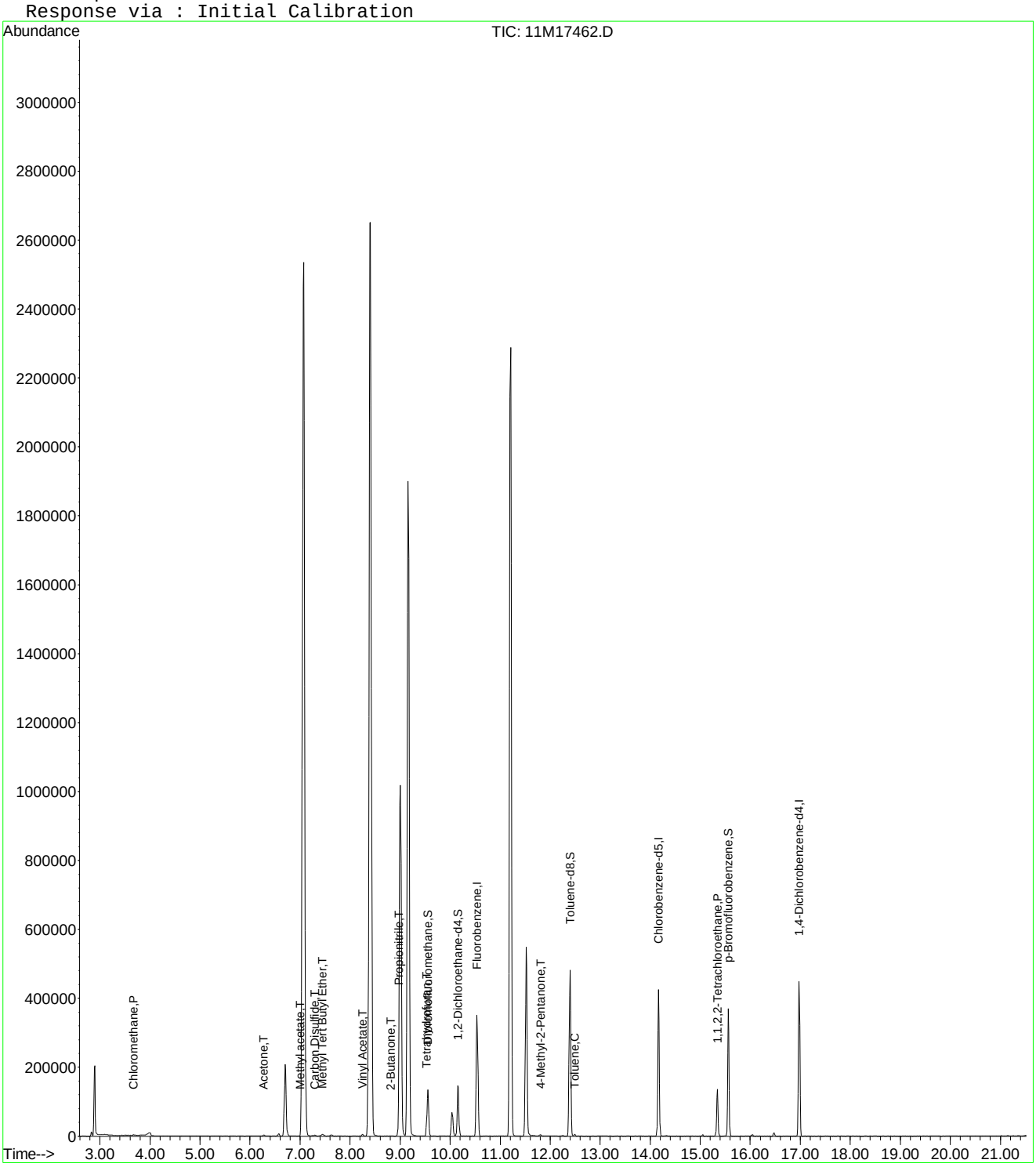
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106259	25.3144	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.15	65	123943	23.1414	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 92.56%			
57) Toluene-d8	12.40	98	411573	25.6539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.60%			
78) p-Bromofluorobenzene	15.56	95	151173	24.3188	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 97.28%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1293	0.1594	ug/L	99
13) Acetone	6.27	43	6921	4.2542	ug/L	90
18) Methyl acetate	7.00	43	726	0.1591	ug/L #	65
20) Carbon Disulfide	7.29	76	2261	0.1614	ug/L #	73
22) Methyl Tert Butyl Ether	7.44	73	9257	0.6538	ug/L	98
26) Vinyl Acetate	8.25	43	10807	1.0376	ug/L #	86
29) 2-Butanone	8.81	43	1338	0.5129	ug/L #	55
30) Propionitrile	8.97	54	189	0.2276	ug/L #	1
36) Tetrahydrofuran	9.53	42	1093	0.5949	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	707	0.3194	ug/L #	40
58) Toluene	12.49	91	6136	0.3054	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	5881	1.0548	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17462.D 8260WT.M Tue Apr 11 22:09:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:54 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

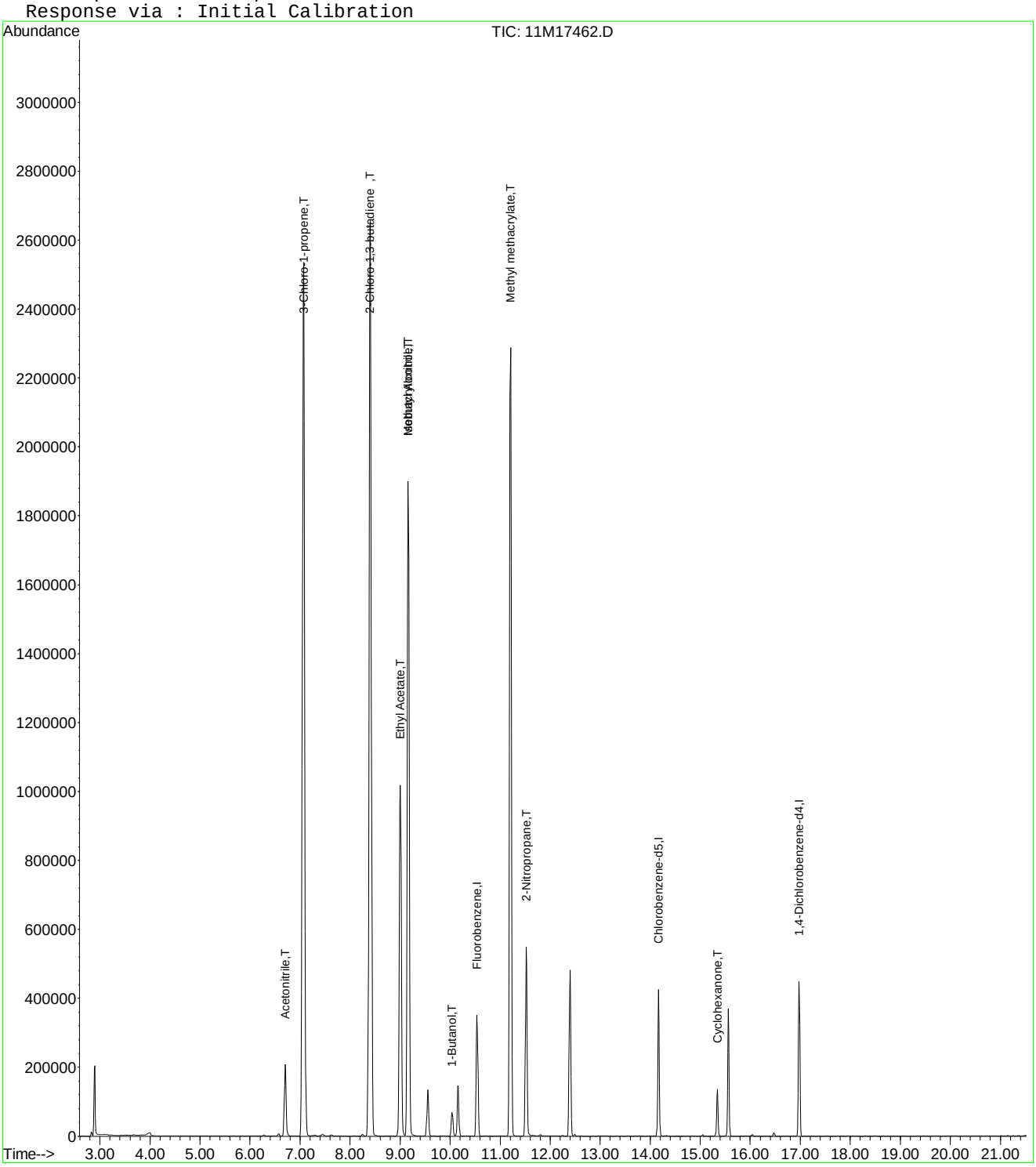
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	281651	413.0735	ug/L		98
3) 3-Chloro-1-propene	7.07	41	2690047	331.7300	ug/L		64
4) 2-Chloro-1,3-butadiene	8.40	53	2460691	350.1845	ug/L		67
5) Methacrylonitrile	9.16	41	1244299	382.2500	ug/L		70
6) Isobutyl Alcohol	9.16	43	201547	864.5299	ug/L		87
7) 1-Butanol	10.04	56	51492	396.8081	ug/L	#	80
8) Cyclohexanone	15.34	55	75425	395.9741	ug/L	#	85
9) 2-Nitropropane	11.52	43	505423	412.4553	ug/L		93
10) Ethyl Acetate	9.01	43	1632644	372.5201	ug/L	#	84
11) Methyl methacrylate	11.21	41	1521562	376.7630	ug/L		68

(#) = qualifier out of range (m) = manual integration
11M17462.D A9FOOWT.M Fri Apr 21 13:34:54 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39:11 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

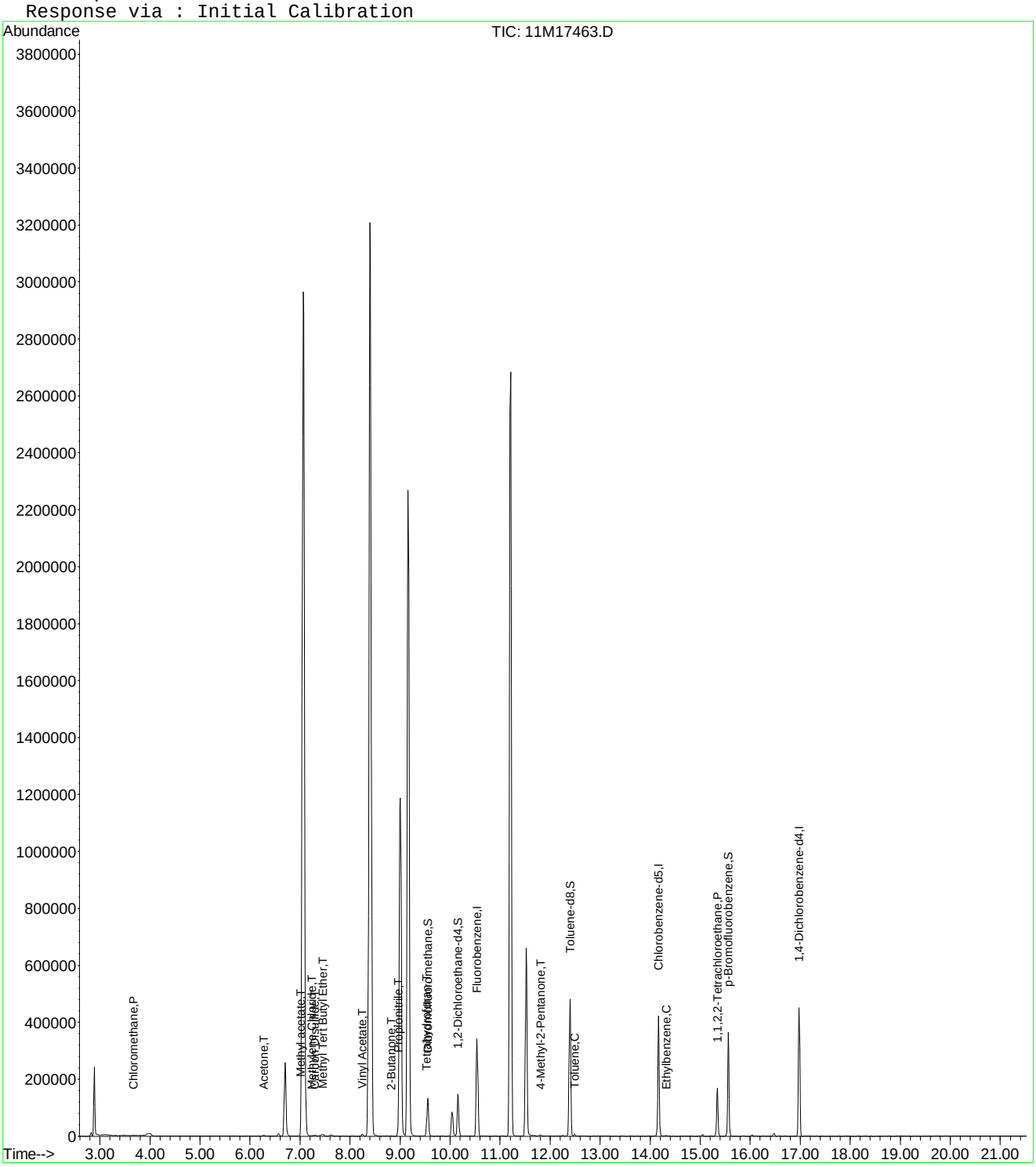
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106074	25.8808	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.52%			
43) 1,2-Dichloroethane-d4	10.15	65	123547	23.6248	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.48%			
57) Toluene-d8	12.40	98	409774	25.8060	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.24%			
78) p-Bromofluorobenzene	15.56	95	148708	23.3407	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.36%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1661	0.2097	ug/L #	74
13) Acetone	6.28	43	7987	5.0280	ug/L	98
18) Methyl acetate	7.01	43	1700	0.3816	ug/L #	65
19) Methylene Chloride	7.24	84	1079	0.2037	ug/L	78
20) Carbon Disulfide	7.29	76	2617	0.1913	ug/L #	73
22) Methyl Tert Butyl Ether	7.46	73	11856	0.8576	ug/L	94
26) Vinyl Acetate	8.24	43	14104	1.3868	ug/L #	91
29) 2-Butanone	8.82	43	1665	0.6537	ug/L #	55
30) Propionitrile	8.96	54	198	0.2442	ug/L #	1
36) Tetrahydrofuran	9.53	42	768	0.4281	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	1108	0.5127	ug/L #	40
58) Toluene	12.49	91	7820	0.3932	ug/L	90
70) Ethylbenzene	14.32	106	907	0.1268	ug/L	92
77) 1,1,2,2-Tetrachloroethane	15.34	83	7437	1.3015	ug/L #	18

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

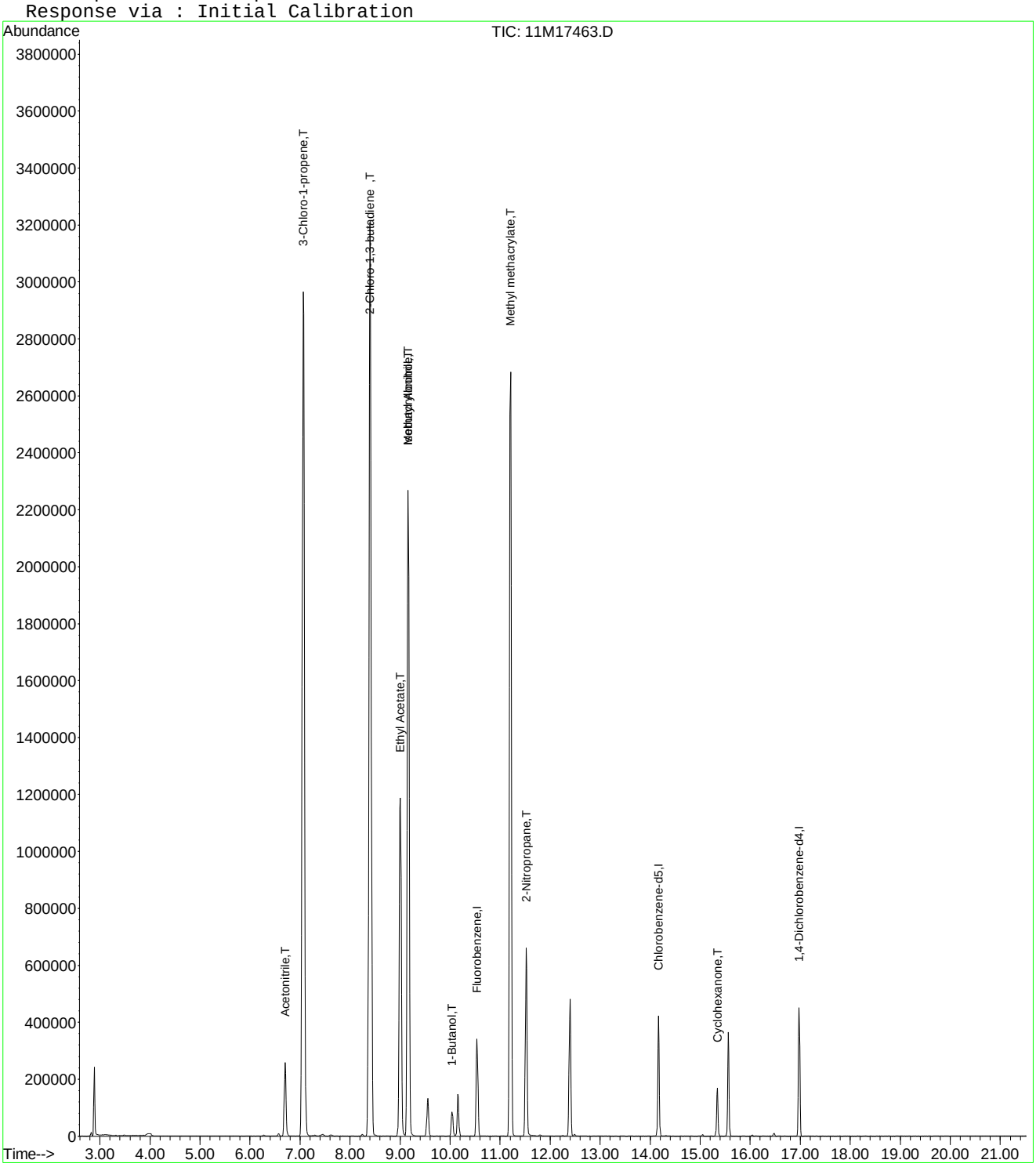
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	341698	513.2456	ug/L		99
3) 3-Chloro-1-propene	7.06	41	3087243	389.9082	ug/L		59
4) 2-Chloro-1,3-butadiene	8.40	53	2864759	417.5367	ug/L		64
5) Methacrylonitrile	9.16	41	1464306	460.7032	ug/L		68
6) Isobutyl Alcohol	9.16	43	247135	1085.6871	ug/L		87
7) 1-Butanol	10.04	56	64790	499.0454	ug/L	#	78
8) Cyclohexanone	15.34	55	96839	513.3157	ug/L	#	84
9) 2-Nitropropane	11.52	43	616392	515.1641	ug/L		94
10) Ethyl Acetate	9.01	43	1900376	444.0833	ug/L	#	82
11) Methyl methacrylate	11.21	41	1764954	447.5883	ug/L		66

(#) = qualifier out of range (m) = manual integration
11M17463.D A9FOOWT.M Fri Apr 21 13:34:55 2017 Page 1

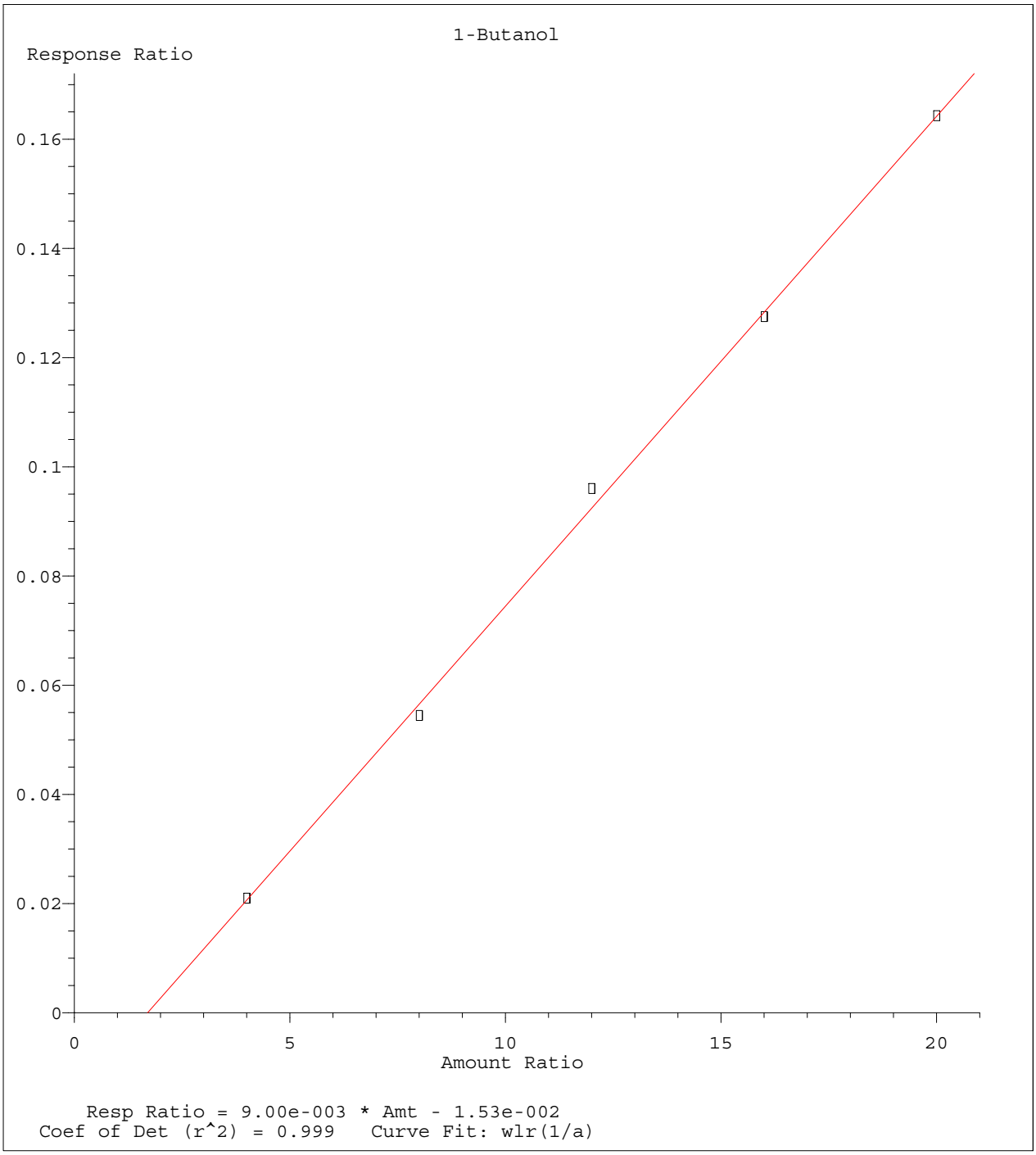
Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

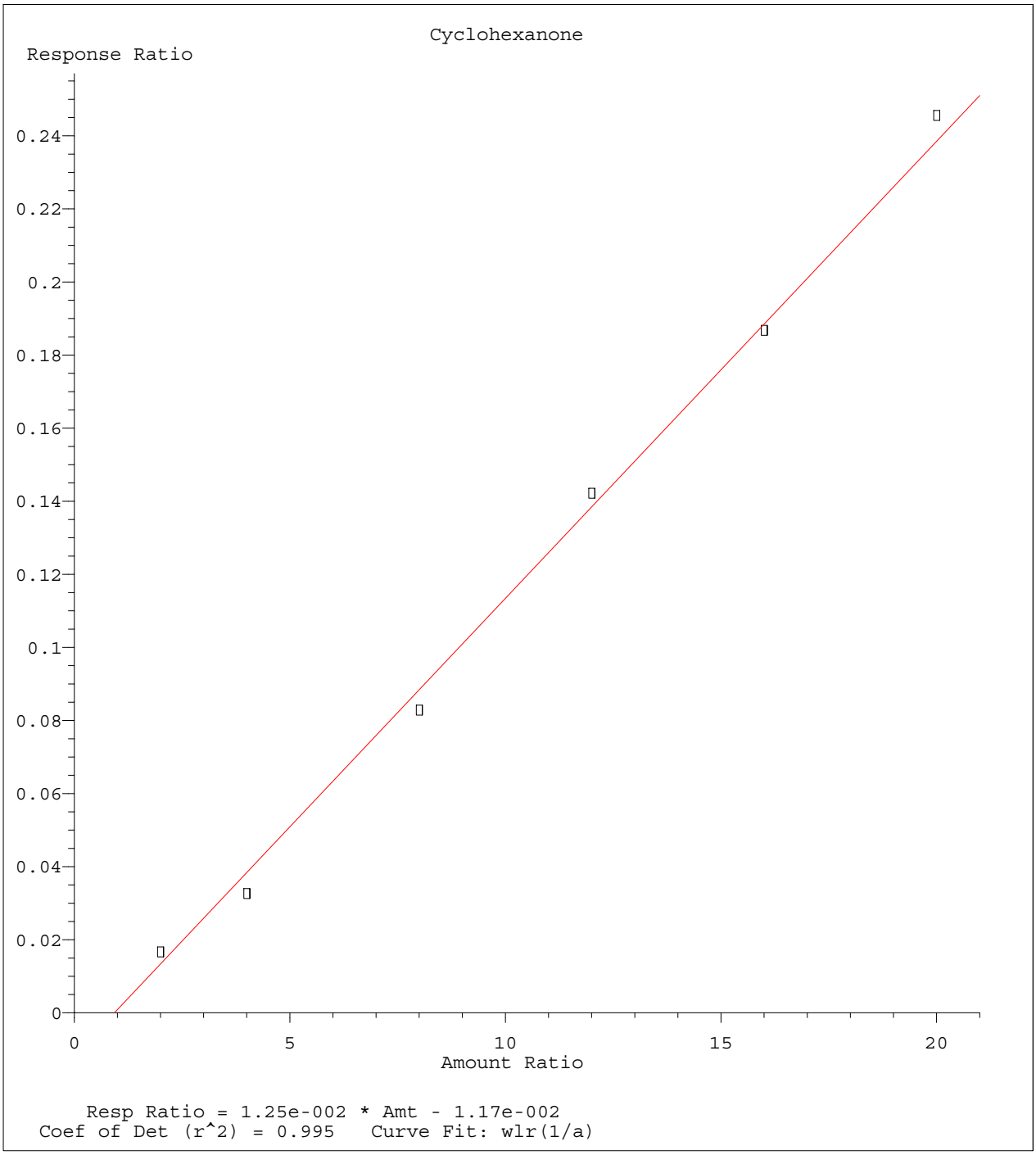
Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17463.D A9FOOWT.M Fri Apr 21 13:34:55 2017 Page 2



Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017



Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 00:08:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

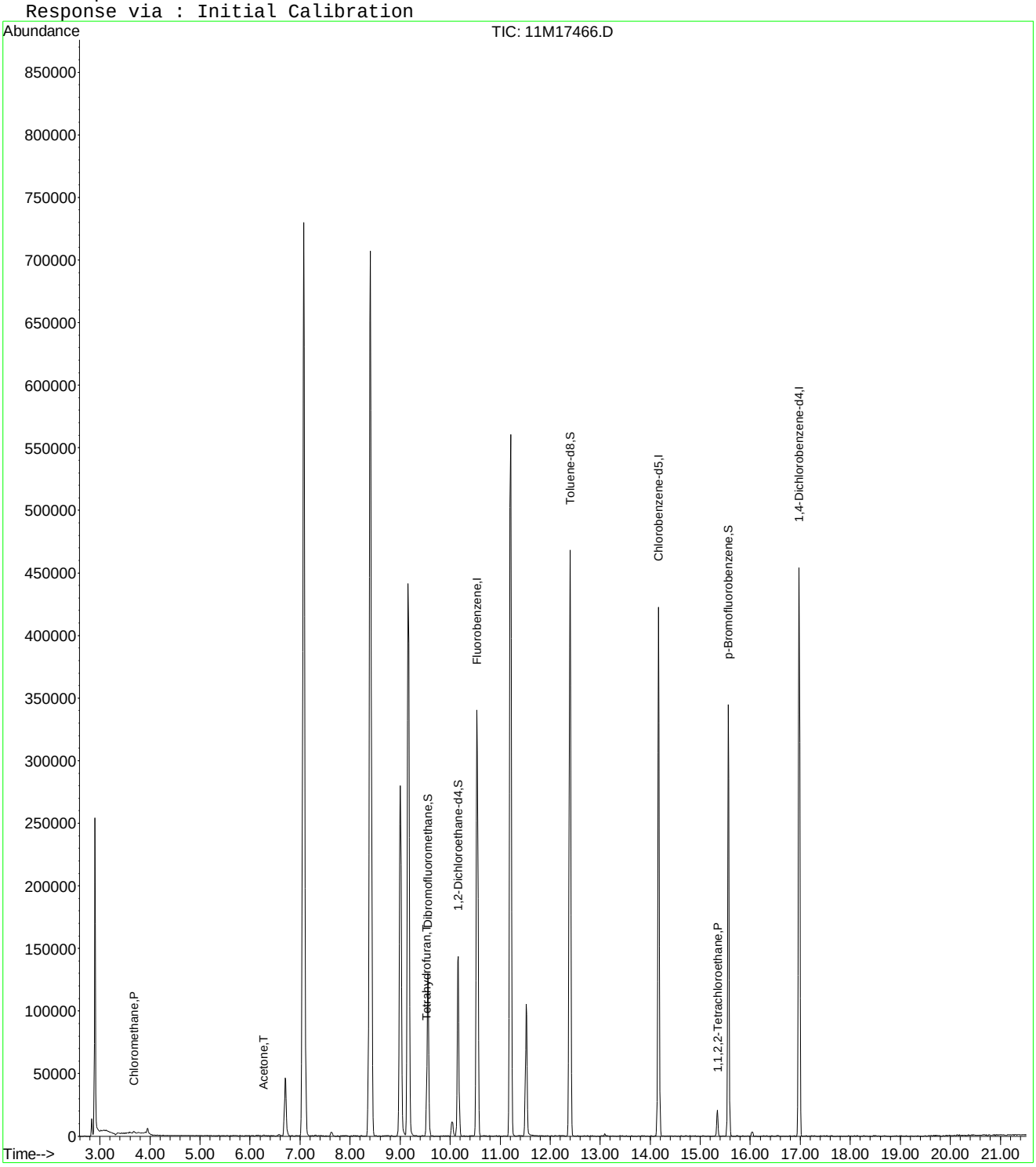
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	104183	25.3905	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.16	65	122221	23.3447	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.36%			
57) Toluene-d8	12.40	98	399954	25.0423	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.16%			
78) p-Bromofluorobenzene	15.56	95	141009	22.5068	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 90.04%			
Target Compounds						Qvalue
3) Chloromethane	3.68	50	1043	0.1316	ug/L	92
13) Acetone	6.27	43	1337	0.8407	ug/L #	46
36) Tetrahydrofuran	9.53	42	231	0.1286	ug/L #	41
77) 1,1,2,2-Tetrachloroethane	15.35	83	776	0.1381	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17466.D 8260WT.M Wed Apr 12 00:08:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 0:08 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:57 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

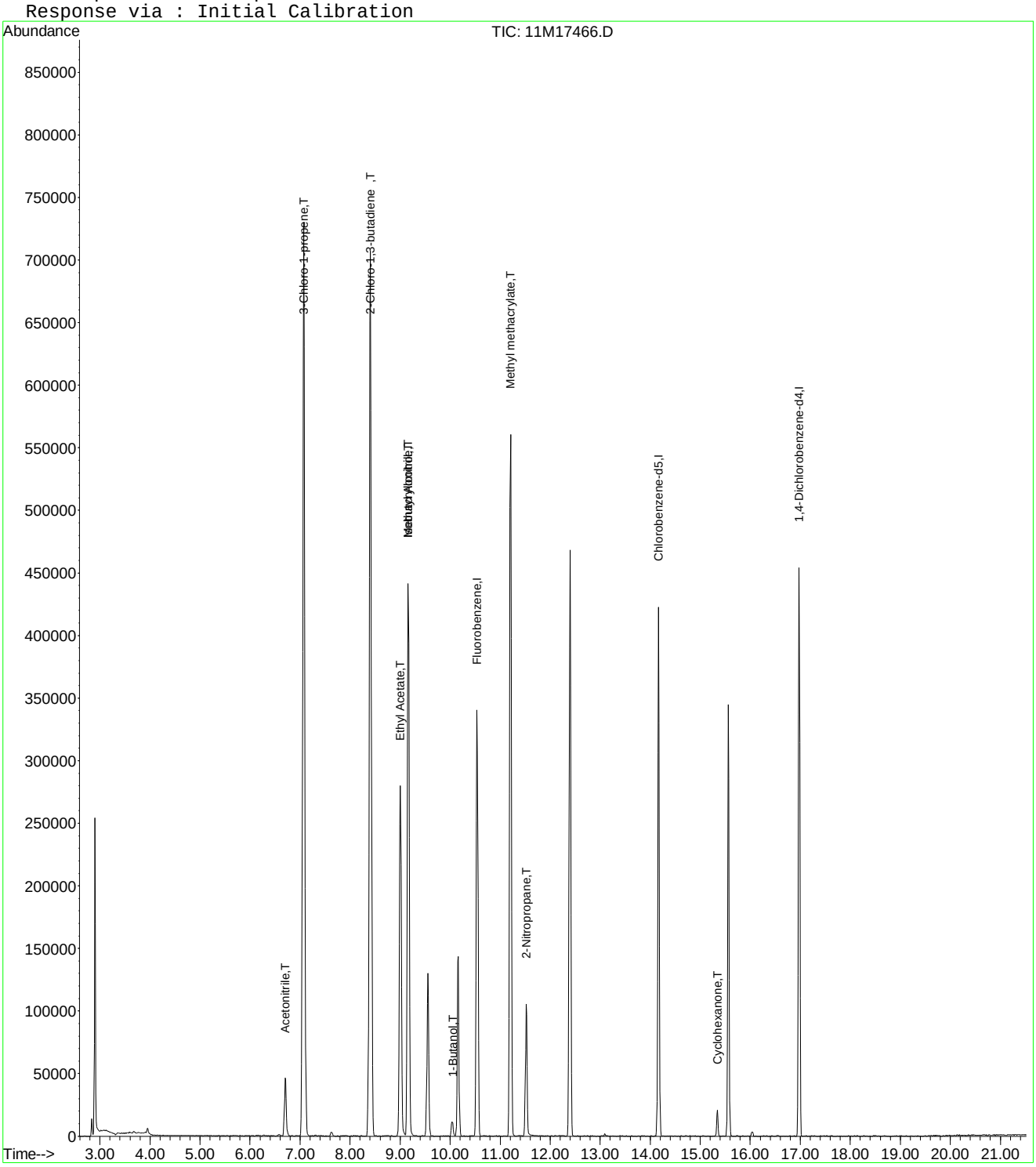
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	63420	95.1516	ug/L		98
3) 3-Chloro-1-propene	7.07	41	795836	100.3973	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	687438	100.0799	ug/L		79
5) Methacrylonitrile	9.16	41	302024	94.9156	ug/L		77
6) Isobutyl Alcohol	9.16	43	44330	194.5248	ug/L		86
7) 1-Butanol	10.05	56	8714	103.9348	ug/L	#	83
8) Cyclohexanone	15.34	55	12464	86.3629	ug/L	#	89
9) 2-Nitropropane	11.52	43	94805	79.1456	ug/L		94
10) Ethyl Acetate	9.01	43	448775	104.7515	ug/L	#	90
11) Methyl methacrylate	11.21	41	388983	98.5333	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	97	0.00
2	T	Acetonitrile	100.0000	95.1516	4.8	97	-0.01
3	T	3-Chloro-1-propene	100.0000	100.3973	-0.4	90	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	100.0799	-0.1	90	0.00
5	T	Methacrylonitrile	100.0000	94.9156	5.1	89	0.00
6	T	Isobutyl Alcohol	200.0000	194.5248	2.7	106	-0.01
7	T	1-Butanol	100.0000	103.9348	-3.9	102	0.01
8	T	Cyclohexanone	100.0000	86.3629	13.6	94	0.00
9	T	2-Nitropropane	100.0000	79.1456	20.9	82	0.00
10	T	Ethyl Acetate	100.0000	104.7515	-4.8	98	0.00
11	T	Methyl methacrylate	100.0000	98.5332	1.5	90	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17466.D A9FOOWT.M Fri Apr 21 13:35:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	407936	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	286002	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	135961	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.22	85	1456	0.4952	ug/L #	68
3) Chloromethane	3.66	50	2818	Below Cal		94
4) Vinyl Chloride	3.89	62	1026	0.2930	ug/L #	43
5) 1,3-Butadiene	3.94	54	1048	Below Cal #		49
6) Bromomethane	4.79	94	1550	0.4288	ug/L	89
7) Chloroethane	4.93	64	452	0.1246	ug/L #	43
8) Trichlorofluoromethane	5.42	101	1600	0.2616	ug/L #	36
10) Isoprene	5.96	67	1639	0.2586	ug/L	74
14) 1,1-Dichloroethene	6.47	61	2095	0.2876	ug/L	85
16) Dimethyl Sulfide	6.73	62	1703	0.2976	ug/L	79
18) Methyl acetate	6.99	43	821	0.1908	ug/L #	66
19) Methylene Chloride	7.23	84	1555	0.3199	ug/L	78
20) Carbon Disulfide	7.28	76	4247	0.3410	ug/L	96
22) Methyl Tert Butyl Ether	7.44	73	3535	0.2904	ug/L #	69
23) trans-1,2-Dichloroethene	7.67	96	1342	0.3027	ug/L	89
24) n-Hexane	7.72	57	1979	0.2878	ug/L #	71
26) Vinyl Acetate	8.24	43	2384	0.2881	ug/L #	78
27) 1,1-Dichloroethane	8.26	63	2770	0.2964	ug/L #	59
31) 2,2-Dichloropropane	9.01	77	1778	0.2811	ug/L #	42
32) cis-1,2-Dichloroethene	9.07	96	1403	0.2820	ug/L	82
33) Chloroform	9.25	83	3255	0.2466	ug/L	94
35) Bromochloromethane	9.48	130	565	0.1852	ug/L #	34
36) Tetrahydrofuran	9.51	42	4820	2.6551	ug/L	94
38) 1,1,1-Trichloroethane	9.76	97	2073	0.3146	ug/L #	49
39) Cyclohexane	9.79	56	2645	0.2855	ug/L #	82
40) 1,1-Dichloropropene	9.96	75	1488	0.2577	ug/L #	38
41) Carbon Tetrachloride	10.08	117	1234	0.2165	ug/L #	68
44) 1,2-Dichloroethane	10.25	62	1821	0.2856	ug/L #	60
45) Benzene	10.29	78	6292	0.3517	ug/L	88
46) Trichloroethene	11.00	130	1256	0.2678	ug/L	89
47) Methylcyclohexane	11.07	83	2187	0.3042	ug/L #	81
48) 1,2-Dichloropropane	11.19	63	1237	0.2222	ug/L #	67
50) Bromodichloromethane	11.48	83	1657	0.2852	ug/L #	73
51) Dibromomethane	11.56	93	446	0.1693	ug/L #	31
52) 2-Chloroethyl Vinyl Ether	11.76	63	514	0.1690	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	1951	0.2831	ug/L #	80
55) Dimethyl Disulfide	12.32	79	694	0.1613	ug/L	59
58) Toluene	12.47	91	6620	0.3575	ug/L	85
59) Ethyl Methacrylate	12.55	69	975	0.1916	ug/L	63
60) trans-1,3-Dichloropropene	12.64	75	1504	0.2573	ug/L #	75

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

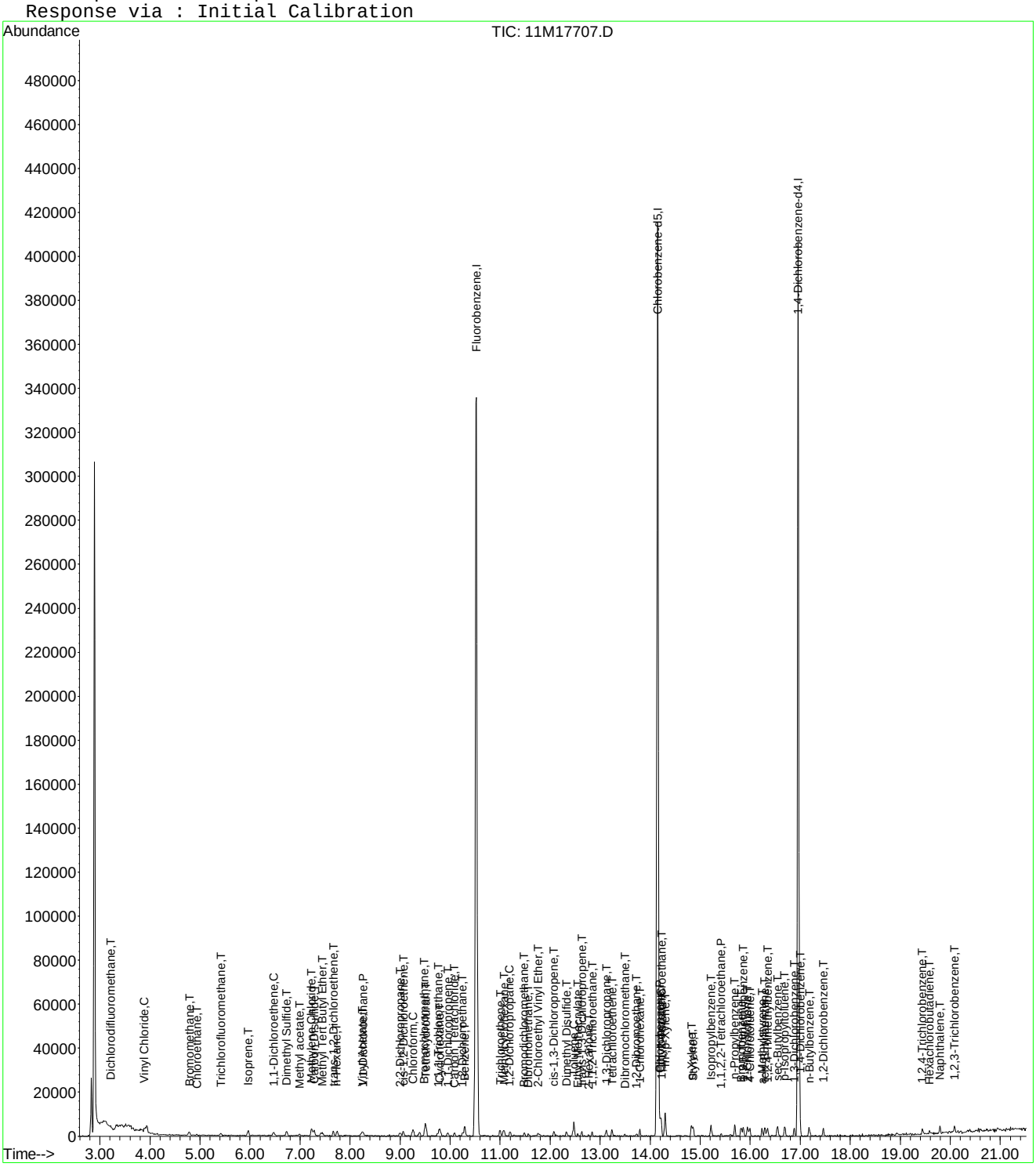
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
61)	1,1,2-Trichloroethane	12.84	97	834	0.2135 ug/L		89
62)	2-Hexanone	12.77	43	717	0.2209 ug/L	#	25
63)	1,3-Dichloropropane	13.12	76	2317	0.3571 ug/L		84
64)	Tetrachloroethene	13.25	164	1130	0.3074 ug/L		70
65)	Dibromochloromethane	13.49	129	1211	0.2781 ug/L	#	55
66)	1,2-Dibromoethane	13.72	107	718	0.2045 ug/L		68
67)	1-Chlorohexane	13.79	91	1457	0.2761 ug/L		89
68)	Chlorobenzene	14.20	112	4403	0.3739 ug/L		89
69)	1,1,1,2-Tetrachloroethane	14.23	131	1170	0.2669 ug/L		77
70)	Ethylbenzene	14.22	106	1776	0.2852 ug/L		61
71)	m-,p-Xylene	14.30	106	4931	0.6618 ug/L		85
72)	o-Xylene	14.83	106	2270	0.3024 ug/L		85
73)	Styrene	14.86	104	2939	0.2641 ug/L		92
75)	Isopropylbenzene	15.22	105	5572	0.3042 ug/L		99
77)	1,1,2,2-Tetrachloroethane	15.42	83	1387	0.3245 ug/L		85
81)	n-Propylbenzene	15.69	91	6224	0.3266 ug/L		99
82)	Bromobenzene	15.82	156	1353	0.2918 ug/L		71
83)	1,3,5-Trimethylbenzene	15.86	105	4376	0.3357 ug/L		99
84)	2-Chlorotoluene	15.94	91	4736	0.3661 ug/L		75
85)	4-Chlorotoluene	16.00	91	4248	0.3638 ug/L		99
86)	a-Methylstyrene	16.24	118	1829	0.2546 ug/L		88
87)	tert-Butylbenzene	16.29	134	845	0.2666 ug/L		62
88)	1,2,4-Trimethylbenzene	16.35	105	4414	0.3237 ug/L		83
89)	sec-Butylbenzene	16.54	105	5762	0.3347 ug/L	#	74
90)	p-Isopropyltoluene	16.69	119	4204	0.3039 ug/L		87
91)	1,3-Dichlorobenzene	16.88	146	3109	0.3769 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	3081	0.3473 ug/L	#	69
93)	n-Butylbenzene	17.18	91	4116	0.3336 ug/L	#	90
94)	1,2-Dichlorobenzene	17.46	146	2641	0.3173 ug/L		96
96)	1,2,4-Trichlorobenzene	19.44	180	1873	0.3134 ug/L	#	45
97)	Hexachlorobutadiene	19.58	225	943	0.2975 ug/L	#	42
98)	Naphthalene	19.79	128	4408	0.3307 ug/L	#	77
99)	1,2,3-Trichlorobenzene	20.08	180	2183	0.3571 ug/L	#	77

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:12:12 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	-3.8239	0.0	0	0.01
3	P	Chloromethane	-1.0000	-1.3371	0.0	0	0.00
4	C	Vinyl Chloride	-1.0000	0.2930	0.0	100	0.00
5	T	1,3-Butadiene	-1.0000	-8.0076	0.0	0	0.01
6	T	Bromomethane	-1.0000	0.4288	0.0	100	0.01
7	T	Chloroethane	-1.0000	0.1246	0.0	100	0.00
8	T	Trichlorofluoromethane	-1.0000	0.2616	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-5.92#
10	T	Isoprene	-1.0000	0.2586	0.0	100	-0.01
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.15#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.0000	0.0	0	-6.16#
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.26#
14	C	1,1-Dichloroethene	-1.0000	0.2876	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.57#
16	T	Dimethyl Sulfide	-1.0000	0.2976	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-6.98#
18	T	Methyl acetate	-1.0000	0.1908	0.0	100	0.01
19	T	Methylene Chloride	-1.0000	0.3199	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3410	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.40#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2904	0.0	100	0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.3027	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.2878	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.06#
26	T	Vinyl Acetate	-1.0000	0.2881	0.0	100	0.01
27	P	1,1-Dichloroethane	-1.0000	0.2964	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.61#
29	T	2-Butanone	-1.0000	0.0974	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-8.89#
31	T	2,2-Dichloropropane	-1.0000	0.2811	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2820	0.0	100	0.00
33	C	Chloroform	0.3000	0.2466	17.8	100	0.00
34	T	1-Bromopropane	-1.0000	0.0000	0.0	0	-9.39#
35	T	Bromochloromethane	-1.0000	0.1852	0.0	0	0.00
36	T	Tetrahydrofuran	-1.0000	2.6551	0.0	100	0.01
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	-1.0000	0.3146	0.0	0	0.00
39	T	Cyclohexane	-1.0000	0.2855	0.0	0	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.2577	0.0	0	0.01
41	T	Carbon Tetrachloride	-1.0000	0.2165	0.0	0	-0.01
42	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.05#
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	-1.0000	0.2856	0.0	0	0.00
45	T	Benzene	-1.0000	0.3517	0.0	0	0.00
46	T	Trichloroethene	-1.0000	0.2678	0.0	0	0.00
47	T	Methylcyclohexane	-1.0000	0.3042	0.0	0	0.00
48	C	1,2-Dichloropropane	-1.0000	0.2222	0.0	0	-0.01
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	-1.0000	0.2852	0.0	0	-0.01
51	T	Dibromomethane	-1.0000	0.1693	0.0	0	-0.01
52	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1690	0.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-11.79#
54	T	cis-1,3-Dichloropropene	-1.0000	0.2831	0.0	0	0.00
55	T	Dimethyl Disulfide	-1.0000	0.1613	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	-1.0000	0.3575	0.0	100	0.00	
59	T	Ethyl Methacrylate	-1.0000	0.1916	0.0	0	0.00	
60	T	trans-1,3-Dichloropropene	-1.0000	0.2573	0.0	0	0.00	
61	T	1,1,2-Trichloroethane	-1.0000	0.2135	0.0	0	0.00	
62	T	2-Hexanone	-1.0000	0.2209	0.0	100	0.00	
63	T	1,3-Dichloropropane	-1.0000	0.3571	0.0	0	0.00	
64	T	Tetrachloroethene	-1.0000	0.3074	0.0	0	0.01	
65	T	Dibromochloromethane	-1.0000	0.2781	0.0	0	0.00	
66	T	1,2-Dibromoethane	-1.0000	0.2045	0.0	0	-0.01	
67	T	1-Chlorohexane	-1.0000	0.2761	0.0	0	0.00	
68	P	Chlorobenzene	-1.0000	0.3739	0.0	0	0.00	
69	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2669	0.0	0	0.01	
70	C	Ethylbenzene	-1.0000	0.2852	0.0	0	0.00	
71	T	m-,p-Xylene	-1.0000	0.6618	0.0	0	0.00	
72	T	o-Xylene	-1.0000	0.3024	0.0	0	0.00	
73	T	Styrene	-1.0000	0.2641	0.0	0	0.00	
74	P	Bromoform	-1.0000	0.0641	0.0	0	0.01	
75	T	Isopropylbenzene	-1.0000	0.3042	0.0	0	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3245	0.0	0	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-15.60#	
80	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-15.63#	
81	T	n-Propylbenzene	-1.0000	0.3266	0.0	0	0.00	
82	T	Bromobenzene	0.3000	0.2918	2.7	100	0.00	
83	T	1,3,5-Trimethylbenzene	-1.0000	0.3357	0.0	0	0.00	
84	T	2-Chlorotoluene	-1.0000	0.3661	0.0	0	0.00	
85	T	4-Chlorotoluene	-1.0000	0.3641	0.0	0	0.01	
86	T	a-Methylstyrene	-1.0000	0.2546	0.0	0	0.01	
87	T	tert-Butylbenzene	-1.0000	0.2666	0.0	0	-0.01	
88	T	1,2,4-Trimethylbenzene	-1.0000	0.3237	0.0	0	0.00	
89	T	sec-Butylbenzene	-1.0000	0.3347	0.0	0	0.00	
90	T	p-Isopropyltoluene	-1.0000	0.3039	0.0	0	0.00	
91	T	1,3-Dichlorobenzene	-1.0000	0.3769	0.0	0	0.01	
92	T	1,4-Dichlorobenzene	-1.0000	0.3473	0.0	0	0.00	
93	T	n-Butylbenzene	-1.0000	0.3326	0.0	0	0.01	
94	T	1,2-Dichlorobenzene	0.3000	0.3173	-5.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-18.38#	
96	T	1,2,4-Trichlorobenzene	-1.0000	0.3134	0.0	0	-0.01	
97	T	Hexachlorobutadiene	-1.0000	0.2975	0.0	0	0.00	
98	T	Naphthalene	-1.0000	0.3307	0.0	0	0.00	
99	T	1,2,3-Trichlorobenzene	0.3000	0.3570	-19.0	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17707.D 8260WT.M Tue Apr 25 11:12:33 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	429611	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	306087	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158073	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1957	0.5753	ug/L #	68
3) Chloromethane	3.65	50	4970	0.2199	ug/L	80
4) Vinyl Chloride	3.89	62	1663	0.4510	ug/L #	67
5) 1,3-Butadiene	3.94	54	1211	Below Cal	#	28
6) Bromomethane	4.78	94	2124	0.5579	ug/L	92
7) Chloroethane	4.92	64	1272	0.3330	ug/L #	43
8) Trichlorofluoromethane	5.41	101	2206	0.3425	ug/L	75
10) Isoprene	5.96	67	2233	0.3346	ug/L	93
12) 1,1,2-Trichloro-1,2,2-Trif	6.18	101	1328	0.3481	ug/L	76
14) 1,1-Dichloroethene	6.47	61	3243	0.4227	ug/L	75
16) Dimethyl Sulfide	6.73	62	2464	0.4088	ug/L	92
18) Methyl acetate	6.98	43	1720	0.3796	ug/L #	66
19) Methylene Chloride	7.23	84	2350	0.4591	ug/L	83
20) Carbon Disulfide	7.28	76	6928	0.5281	ug/L	93
22) Methyl Tert Butyl Ether	7.43	73	4710	0.3674	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	2044	0.4378	ug/L	97
24) n-Hexane	7.72	57	2506	0.3461	ug/L #	71
26) Vinyl Acetate	8.23	43	3174	0.3642	ug/L #	78
27) 1,1-Dichloroethane	8.25	63	4084	0.4150	ug/L #	81
31) 2,2-Dichloropropane	8.99	77	3153	0.4733	ug/L #	65
32) cis-1,2-Dichloroethene	9.06	96	2298	0.4386	ug/L	92
33) Chloroform	9.26	83	4687	0.4084	ug/L	99
35) Bromochloromethane	9.49	130	1188	0.3698	ug/L	82
36) Tetrahydrofuran	9.51	42	4867	2.5457	ug/L	93
38) 1,1,1-Trichloroethane	9.77	97	2706	0.3900	ug/L #	86
39) Cyclohexane	9.80	56	4021	0.4121	ug/L #	88
40) 1,1-Dichloropropene	9.95	75	2367	0.3892	ug/L	84
41) Carbon Tetrachloride	10.09	117	2174	0.3622	ug/L #	83
44) 1,2-Dichloroethane	10.26	62	2810	0.4184	ug/L #	69
45) Benzene	10.29	78	9018	0.4786	ug/L	97
46) Trichloroethene	10.99	130	2302	0.4661	ug/L	85
47) Methylcyclohexane	11.07	83	2842	0.3753	ug/L	95
48) 1,2-Dichloropropane	11.20	63	2544	0.4338	ug/L	89
50) Bromodichloromethane	11.49	83	2617	0.4278	ug/L #	85
51) Dibromomethane	11.56	93	1012	0.3648	ug/L	84
52) 2-Chloroethyl Vinyl Ether	11.76	63	790	0.2466	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	2869	0.3953	ug/L	91
55) Dimethyl Disulfide	12.32	79	1058	0.2335	ug/L	89
58) Toluene	12.47	91	9432	0.4759	ug/L	91
59) Ethyl Methacrylate	12.55	69	1408	0.2585	ug/L	88

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

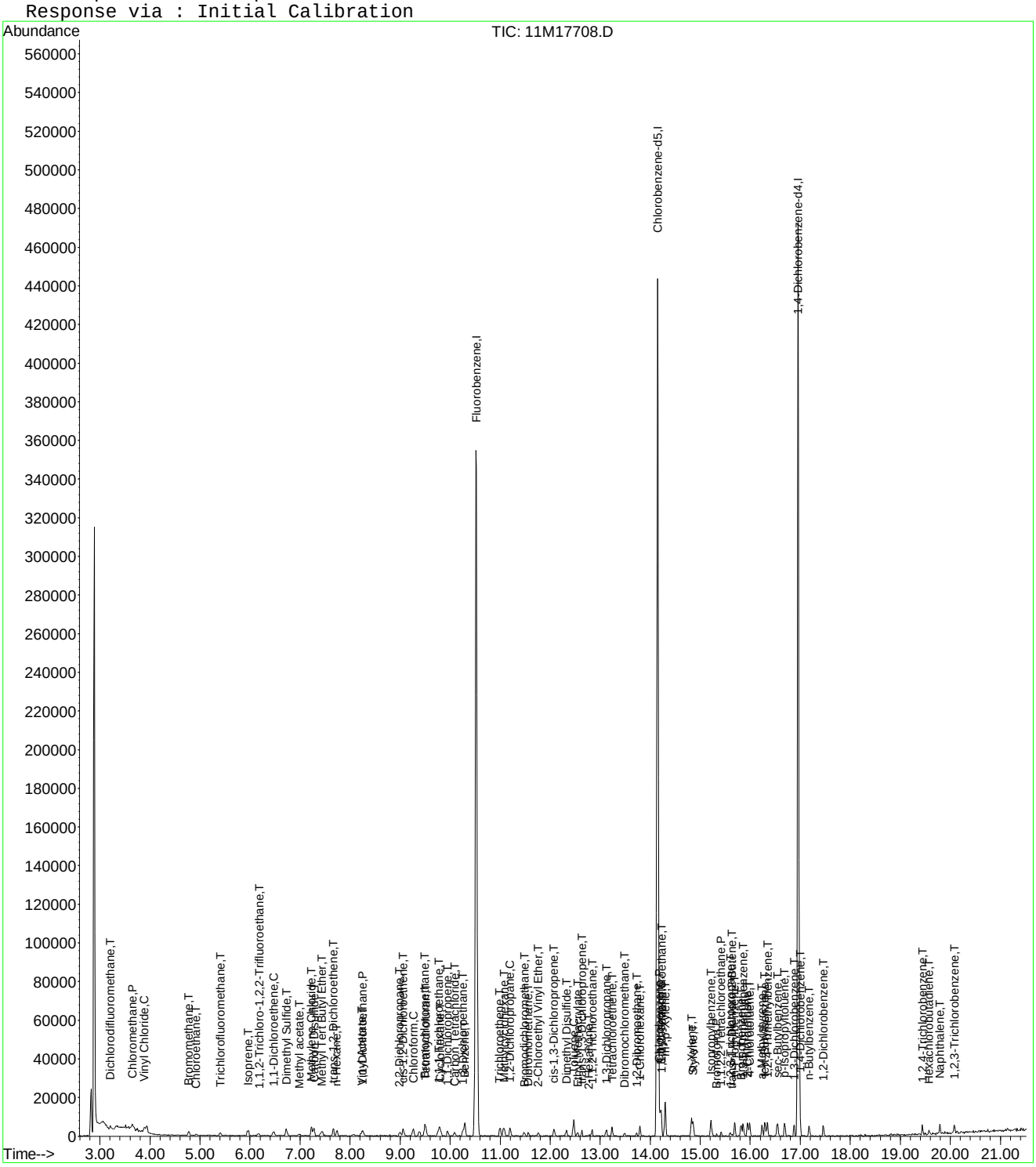
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
60)	trans-1,3-Dichloropropene	12.64	75	2241	0.3582 ug/L	#	76
61)	1,1,2-Trichloroethane	12.84	97	1632	0.3904 ug/L		81
62)	2-Hexanone	12.77	43	804	0.2315 ug/L	#	6
63)	1,3-Dichloropropane	13.12	76	2769	0.3988 ug/L		88
64)	Tetrachloroethene	13.25	164	1464	0.3722 ug/L		96
65)	Dibromochloromethane	13.48	129	1505	0.3229 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1347	0.3584 ug/L		95
67)	1-Chlorohexane	13.79	91	2178	0.3857 ug/L		95
68)	Chlorobenzene	14.19	112	5664	0.4494 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	1850	0.3943 ug/L		95
70)	Ethylbenzene	14.22	106	2675	0.4014 ug/L		59
71)	m-,p-Xylene	14.30	106	7039	0.8827 ug/L		83
72)	o-Xylene	14.83	106	3366	0.4189 ug/L		77
73)	Styrene	14.86	104	4411	0.3704 ug/L		84
74)	Bromoform	15.32	173	846	0.2533 ug/L	#	28
75)	Isopropylbenzene	15.22	105	9020	0.4602 ug/L		87
77)	1,1,2,2-Tetrachloroethane	15.42	83	2043	0.4111 ug/L		84
79)	1,2,3-Trichloropropane	15.60	110	485	0.3408 ug/L	#	30
80)	trans-1,4-Dichloro-2-Buten	15.63	53	454	0.2951 ug/L	#	51
81)	n-Propylbenzene	15.69	91	9041	0.4081 ug/L		94
82)	Bromobenzene	15.82	156	2014	0.3735 ug/L		59
83)	1,3,5-Trimethylbenzene	15.86	105	6098	0.4023 ug/L		97
84)	2-Chlorotoluene	15.94	91	6775	0.4504 ug/L		82
85)	4-Chlorotoluene	15.99	91	6069	0.4470 ug/L		86
86)	a-Methylstyrene	16.23	118	2595	0.3106 ug/L		92
87)	tert-Butylbenzene	16.28	134	1537	0.4171 ug/L		92
88)	1,2,4-Trimethylbenzene	16.35	105	6674	0.4210 ug/L		95
89)	sec-Butylbenzene	16.54	105	8349	0.4171 ug/L		87
90)	p-Isopropyltoluene	16.69	119	6602	0.4104 ug/L		94
91)	1,3-Dichlorobenzene	16.88	146	4328	0.4513 ug/L		91
92)	1,4-Dichlorobenzene	17.00	146	4872	0.4723 ug/L	#	47
93)	n-Butylbenzene	17.17	91	5874	0.4094 ug/L	#	84
94)	1,2-Dichlorobenzene	17.46	146	4243	0.4384 ug/L		83
96)	1,2,4-Trichlorobenzene	19.45	180	2551	0.3671 ug/L	#	64
97)	Hexachlorobutadiene	19.57	225	1261	0.3422 ug/L	#	55
98)	Naphthalene	19.79	128	6212	0.4009 ug/L	#	82
99)	1,2,3-Trichlorobenzene	20.08	180	2584	0.3635 ug/L		93

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	427420	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	301358	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158168	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	12.38	98	215	0.0137	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	3845	0.9358	ug/L #	81
3) Chloromethane	3.65	50	8471	0.9175	ug/L	83
4) Vinyl Chloride	3.88	62	3091	0.8426	ug/L	92
5) 1,3-Butadiene	3.93	54	3188	0.4718	ug/L	79
6) Bromomethane	4.78	94	4082	1.0777	ug/L	82
7) Chloroethane	4.92	64	3226	0.8490	ug/L	98
8) Trichlorofluoromethane	5.39	101	5700	0.8894	ug/L	93
9) Diethyl ether	5.92	59	22406	4.7243	ug/L	97
10) Isoprene	5.96	67	5738	0.8642	ug/L	97
11) Acrolein	6.14	56	1635	2.1674	ug/L	77
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	3050	0.8036	ug/L	90
13) Acetone	6.26	43	1420	0.9936	ug/L #	41
14) 1,1-Dichloroethene	6.46	61	6804	0.8914	ug/L	94
15) Tert-Butyl Alcohol	6.59	59	4610	8.6243	ug/L #	67
16) Dimethyl Sulfide	6.73	62	5154	0.8595	ug/L	99
17) Iodomethane	6.98	142	1485	1.4857	ug/L #	35
18) Methyl acetate	6.98	43	4284	0.9504	ug/L #	75
19) Methylene Chloride	7.23	84	4729	0.9285	ug/L	86
20) Carbon Disulfide	7.27	76	13562	1.0391	ug/L	98
21) Acrylonitrile	7.39	53	4443	2.1049	ug/L	95
22) Methyl Tert Butyl Ether	7.42	73	12080	0.9472	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	4544	0.9782	ug/L	91
24) n-Hexane	7.74	57	5383	0.7472	ug/L #	71
25) Diisopropyl ether	8.07	45	96270	5.1833	ug/L	96
26) Vinyl Acetate	8.23	43	8211	0.9471	ug/L #	81
27) 1,1-Dichloroethane	8.25	63	9588	0.9793	ug/L #	90
28) Ethyl-Tert-Butyl ether	8.61	59	83324	5.0754	ug/L	95
29) 2-Butanone	8.79	43	1733	0.7421	ug/L #	56
30) Propionitrile	8.89	54	3388	4.3491	ug/L #	73
31) 2,2-Dichloropropane	9.00	77	6410	0.9672	ug/L	86
32) cis-1,2-Dichloroethene	9.06	96	4249	0.8152	ug/L	85
33) Chloroform	9.26	83	8839	0.9478	ug/L	98
34) 1-Bromopropane	9.40	122	455	0.7935	ug/L	52
35) Bromochloromethane	9.48	130	3059	0.9571	ug/L	91
36) Tetrahydrofuran	9.50	42	12470	6.5560	ug/L	96
38) 1,1,1-Trichloroethane	9.77	97	6166	0.8931	ug/L #	90
39) Cyclohexane	9.79	56	8715	0.8978	ug/L	98
40) 1,1-Dichloropropene	9.95	75	5779	0.9551	ug/L	87
41) Carbon Tetrachloride	10.08	117	5196	0.8702	ug/L	96
42) Tert-Amyl-Methyl ether	10.05	73	65688	4.9599	ug/L #	98

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

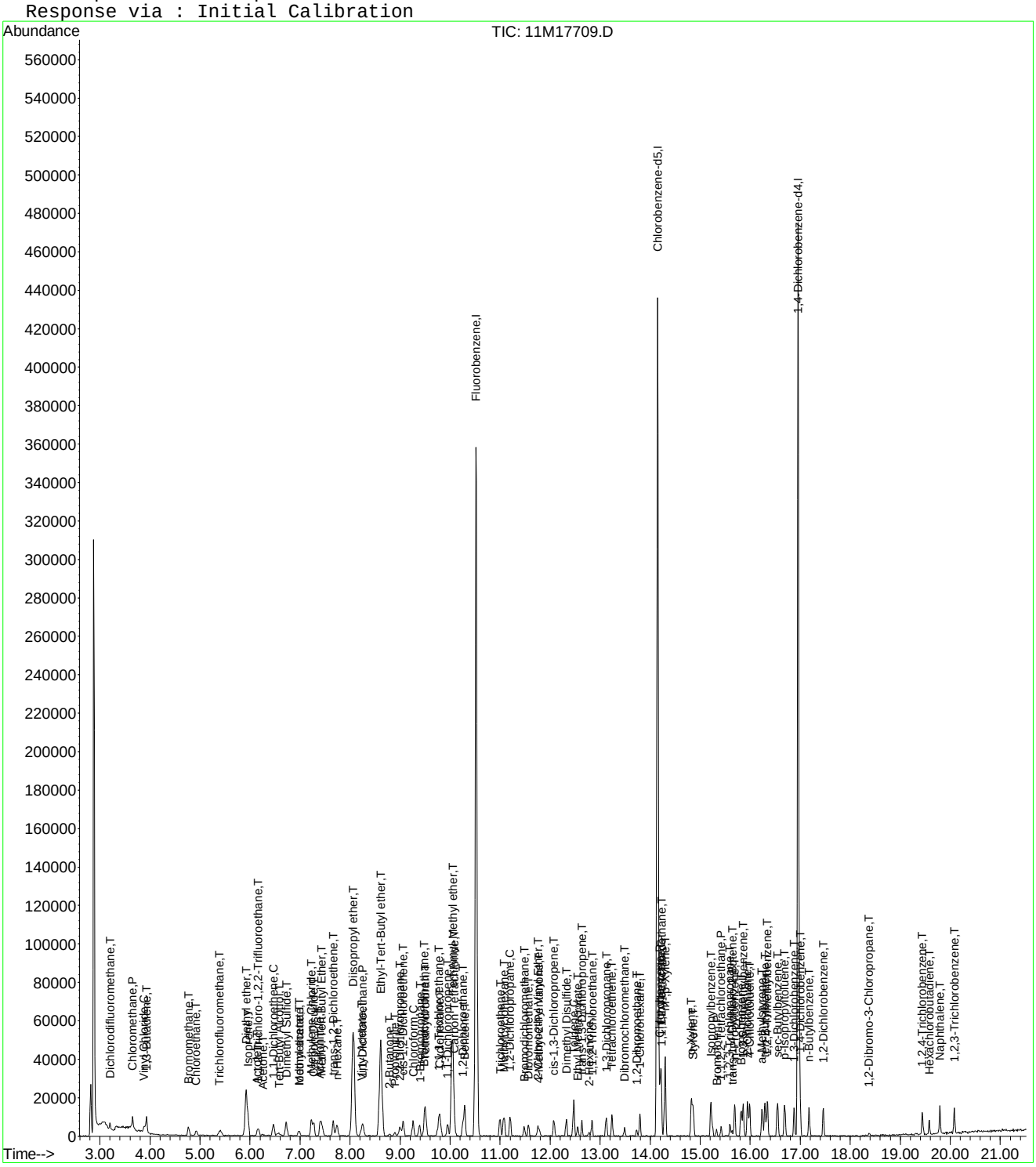
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	6781	1.0149 ug/L		85
45)	Benzene	10.29	78	19081	1.0179 ug/L		92
46)	Trichloroethene	11.00	130	4396	0.8947 ug/L		96
47)	Methylcyclohexane	11.07	83	6249	0.8295 ug/L		92
48)	1,2-Dichloropropane	11.20	63	5831	0.9995 ug/L		85
50)	Bromodichloromethane	11.49	83	5504	0.9043 ug/L	#	94
51)	Dibromomethane	11.57	93	2305	0.8352 ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	2865	0.8989 ug/L		82
53)	4-Methyl-2-Pentanone	11.78	58	1045	0.5092 ug/L	#	40
54)	cis-1,3-Dichloropropene	12.08	75	6764	0.9367 ug/L		91
55)	Dimethyl Disulfide	12.33	79	3035	0.6734 ug/L		97
58)	Toluene	12.47	91	18436	0.9449 ug/L		99
59)	Ethyl Methacrylate	12.55	69	4204	0.7840 ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	5326	0.8647 ug/L		86
61)	1,1,2-Trichloroethane	12.84	97	3956	0.9612 ug/L		97
62)	2-Hexanone	12.78	43	2630	0.7691 ug/L	#	72
63)	1,3-Dichloropropane	13.12	76	7049	1.0312 ug/L		96
64)	Tetrachloroethene	13.23	164	3174	0.8195 ug/L		78
65)	Dibromochloromethane	13.48	129	3914	0.8530 ug/L		94
66)	1,2-Dibromoethane	13.73	107	3225	0.8716 ug/L		97
67)	1-Chlorohexane	13.79	91	4282	0.7701 ug/L		88
68)	Chlorobenzene	14.20	112	12516	1.0087 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	4130	0.8940 ug/L		99
70)	Ethylbenzene	14.22	106	5925	0.9030 ug/L		65
71)	m-,p-Xylene	14.30	106	15635	1.9915 ug/L		84
72)	o-Xylene	14.82	106	7242	0.9155 ug/L		82
73)	Styrene	14.86	104	10359	0.8835 ug/L		93
74)	Bromoform	15.33	173	2678	0.8145 ug/L		93
75)	Isopropylbenzene	15.22	105	18809	0.9747 ug/L		95
77)	1,1,2,2-Tetrachloroethane	15.42	83	4889	0.9832 ug/L		88
79)	1,2,3-Trichloropropane	15.59	110	1172	0.8231 ug/L		77
80)	trans-1,4-Dichloro-2-Buten	15.64	53	1491	0.9685 ug/L	#	82
81)	n-Propylbenzene	15.69	91	20709	0.9342 ug/L		90
82)	Bromobenzene	15.82	156	5475	1.0148 ug/L		98
83)	1,3,5-Trimethylbenzene	15.86	105	14589	0.9620 ug/L		96
84)	2-Chlorotoluene	15.94	91	15291	1.0159 ug/L		95
85)	4-Chlorotoluene	15.99	91	13421m	0.9879 ug/L		
86)	a-Methylstyrene	16.23	118	6311	0.7550 ug/L		98
87)	tert-Butylbenzene	16.30	134	3577	0.9701 ug/L		91
88)	1,2,4-Trimethylbenzene	16.34	105	15395	0.9706 ug/L		96
89)	sec-Butylbenzene	16.54	105	18675	0.9324 ug/L		96
90)	p-Isopropyltoluene	16.69	119	14956	0.9293 ug/L		92
91)	1,3-Dichlorobenzene	16.87	146	9264	0.9653 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	10534	1.0206 ug/L		83
93)	n-Butylbenzene	17.17	91	13175	0.9178 ug/L	#	86
94)	1,2-Dichlorobenzene	17.46	146	9468	0.9777 ug/L		100
95)	1,2-Dibromo-3-Chloropropan	18.37	75	615	0.7049 ug/L		81
96)	1,2,4-Trichlorobenzene	19.44	180	6133	0.8822 ug/L		97
97)	Hexachlorobutadiene	19.58	225	3043	0.8253 ug/L		86
98)	Naphthalene	19.79	128	15559	1.0034 ug/L	#	90
99)	1,2,3-Trichlorobenzene	20.08	180	6569	0.9236 ug/L		97

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:15:28 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	1.0000	0.9358	6.4	100	0.00
3	P	Chloromethane	1.0000	0.9175	8.3	100	0.00
4	C	Vinyl Chloride	1.0000	0.8426	15.7	100	-0.01
5	T	1,3-Butadiene	-1.0000	-6.7210	0.0	100	0.00
6	T	Bromomethane	1.0000	1.0777	-7.8	100	0.00
7	T	Chloroethane	1.0000	0.8490	15.1	100	-0.01
8	T	Trichlorofluoromethane	1.0000	0.8894	11.1	100	-0.02
9	T	Diethyl ether	5.0000	4.7243	5.5	100	0.00
10	T	Isoprene	1.0000	0.8642	13.6	100	-0.01
11	T	Acrolein	2.5000	2.1673	13.3	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	0.8036	19.6	100	0.00
13	T	Acetone	-1.0000	0.9936	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.8914	10.9	100	-0.01
15	T	Tert-Butyl Alcohol	10.0000	8.6243	13.8	100	0.02
16	T	Dimethyl Sulfide	1.0000	0.8595	14.0	100	0.00
17	T	Iodomethane	-1.0000	-1.6799	0.0	100	0.00
18	T	Methyl acetate	-1.0000	0.9504	0.0	100	0.00
19	T	Methylene Chloride	1.0000	0.9285	7.1	100	0.00
20	T	Carbon Disulfide	1.0000	1.0391	-3.9	100	-0.01
21	T	Acrylonitrile	2.5000	2.1049	15.8	100	-0.01
22	T	Methyl Tert Butyl Ether	1.0000	0.9472	5.3	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9782	2.2	100	-0.01
24	T	n-Hexane	-1.0000	0.7472	0.0	100	0.01
25	T	Diisopropyl ether	5.0000	5.1833	-3.7	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9471	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9793	2.1	100	-0.01
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0755	-1.5	100	0.00
29	T	2-Butanone	-1.0000	0.7421	0.0	100	0.00
30	T	Propionitrile	5.0000	4.3491	13.0	100	0.00
31	T	2,2-Dichloropropane	1.0000	0.9672	3.3	100	-0.01
32	T	cis-1,2-Dichloroethene	1.0000	0.8152	18.5	100	-0.01
33	C	Chloroform	1.0000	0.9478	5.2	100	0.00
34	T	1-Bromopropane	1.0000	0.7935	20.7	100	0.01
35	T	Bromochloromethane	1.0000	0.9571	4.3	100	0.00
36	T	Tetrahydrofuran	5.0000	6.5560	-31.1#	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	1.0000	0.8932	10.7	100	0.01
39	T	Cyclohexane	1.0000	0.8978	10.2	100	-0.01
40	T	1,1-Dichloropropene	1.0000	0.9551	4.5	100	0.00
41	T	Carbon Tetrachloride	1.0000	0.8702	13.0	100	-0.01
42	T	Tert-Amyl-Methyl ether	5.0000	4.9599	0.8	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	1.0000	1.0149	-1.5	100	0.00
45	T	Benzene	1.0000	1.0179	-1.8	100	0.00
46	T	Trichloroethene	1.0000	0.8947	10.5	100	0.00
47	T	Methylcyclohexane	1.0000	0.8296	17.0	100	0.00
48	C	1,2-Dichloropropane	1.0000	0.9995	0.0	100	0.00
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	1.0000	0.9043	9.6	100	0.00
51	T	Dibromomethane	1.0000	0.8353	16.5	100	0.00
52	T	2-Chloroethyl Vinyl Ether	1.0000	0.8989	10.1	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.5092	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	1.0000	0.9367	6.3	100	0.00
55	T	Dimethyl Disulfide	-1.0000	0.6734	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0137	0.0	100	0.00

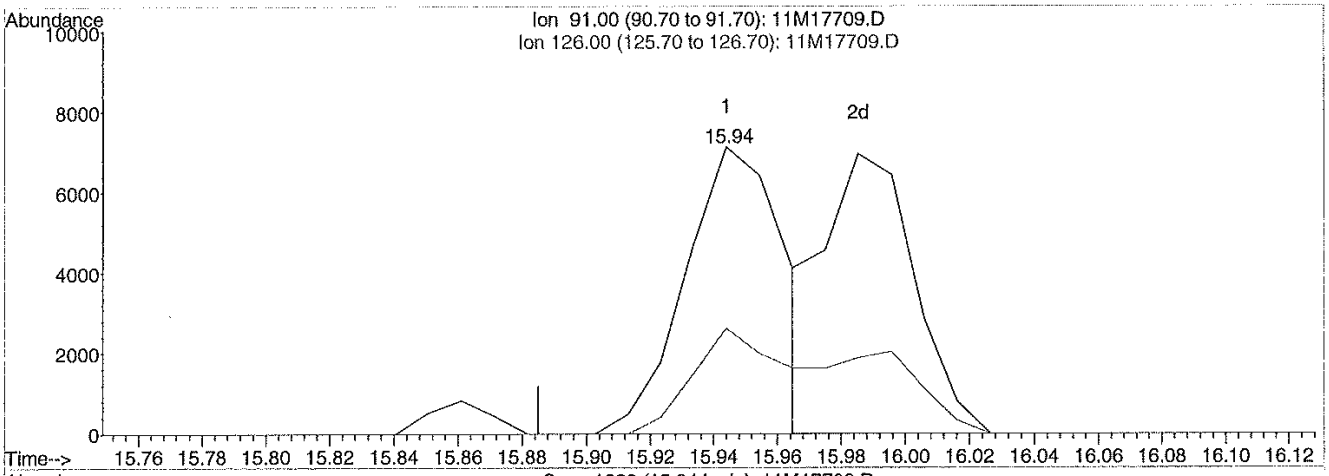
58	C	Toluene	1.0000	0.9449	5.5	100	0.00	
59	T	Ethyl Methacrylate	1.0000	0.7840	21.6	100	0.00	
60	T	trans-1,3-Dichloropropene	1.0000	0.8647	13.5	100	0.00	
61	T	1,1,2-Trichloroethane	1.0000	0.9612	3.9	100	0.00	
62	T	2-Hexanone	-1.0000	0.7691	0.0	100	0.01	
63	T	1,3-Dichloropropane	1.0000	1.0312	-3.1	100	0.00	
64	T	Tetrachloroethene	1.0000	0.8195	18.0	100	0.00	
65	T	Dibromochloromethane	1.0000	0.8530	14.7	100	-0.01	
66	T	1,2-Dibromoethane	1.0000	0.8716	12.8	100	0.00	
67	T	1-Chlorohexane	1.0000	0.7701	23.0	100	0.00	
68	P	Chlorobenzene	1.0000	1.0087	-0.9	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	1.0000	0.8941	10.6	100	0.01	
70	C	Ethylbenzene	1.0000	0.9030	9.7	100	0.00	
71	T	m-,p-Xylene	2.0000	1.9915	0.4	100	0.00	
72	T	o-Xylene	1.0000	0.9155	8.5	100	-0.01	
73	T	Styrene	1.0000	0.8835	11.6	100	0.00	
74	P	Bromoform	1.0000	0.8145	18.6	100	0.01	
75	T	Isopropylbenzene	1.0000	0.9747	2.5	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	1.0000	0.9832	1.7	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	1.0000	0.8231	17.7	100	-0.01	
80	T	trans-1,4-Dichloro-2-Butene	1.0000	0.9685	3.2	100	0.01	
81	T	n-Propylbenzene	1.0000	0.9342	6.6	100	0.00	
82	T	Bromobenzene	1.0000	1.0148	-1.5	100	0.00	
83	T	1,3,5-Trimethylbenzene	1.0000	0.9619	3.8	100	0.00	
84	T	2-Chlorotoluene	1.0000	1.0159	-1.6	100	0.00	
85	T	4-Chlorotoluene	1.0000	1.1267	-12.7	115	-0.04	
86	T	a-Methylstyrene	-1.0000	0.7550	0.0	100	0.00	
87	T	tert-Butylbenzene	1.0000	0.9701	3.0	100	0.00	
88	T	1,2,4-Trimethylbenzene	1.0000	0.9706	2.9	100	-0.01	
89	T	sec-Butylbenzene	1.0000	0.9324	6.8	100	0.00	
90	T	p-Isopropyltoluene	1.0000	0.9293	7.1	100	0.00	
91	T	1,3-Dichlorobenzene	1.0000	0.9653	3.5	100	0.00	
92	T	1,4-Dichlorobenzene	1.0000	1.0207	-2.1	100	0.00	
93	T	n-Butylbenzene	1.0000	0.9151	8.5	100	0.00	
94	T	1,2-Dichlorobenzene	1.0000	0.9777	2.2	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	1.0000	0.7049	29.5#	100	-0.01	
96	T	1,2,4-Trichlorobenzene	1.0000	0.8822	11.8	100	-0.01	
97	T	Hexachlorobutadiene	1.0000	0.8253	17.5	100	0.00	
98	T	Naphthalene	1.0000	1.0034	-0.3	100	0.00	
99	T	1,2,3-Trichlorobenzene	1.0000	0.9236	7.6	100	0.00	

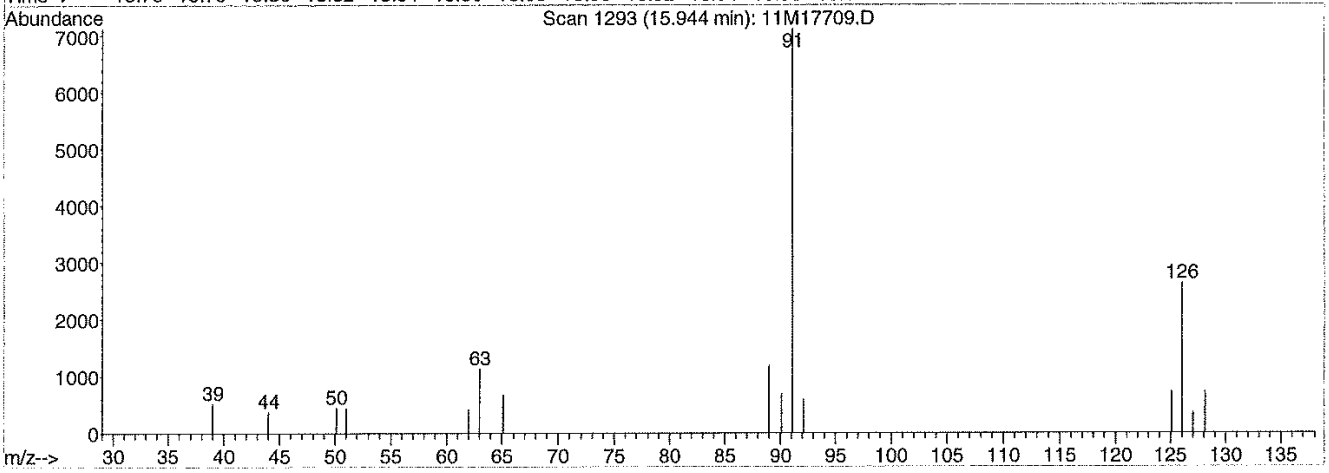
(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17709.D 8260WT.M Tue Apr 25 11:16:29 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:53 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.94min 1.13ug/L

response 15291

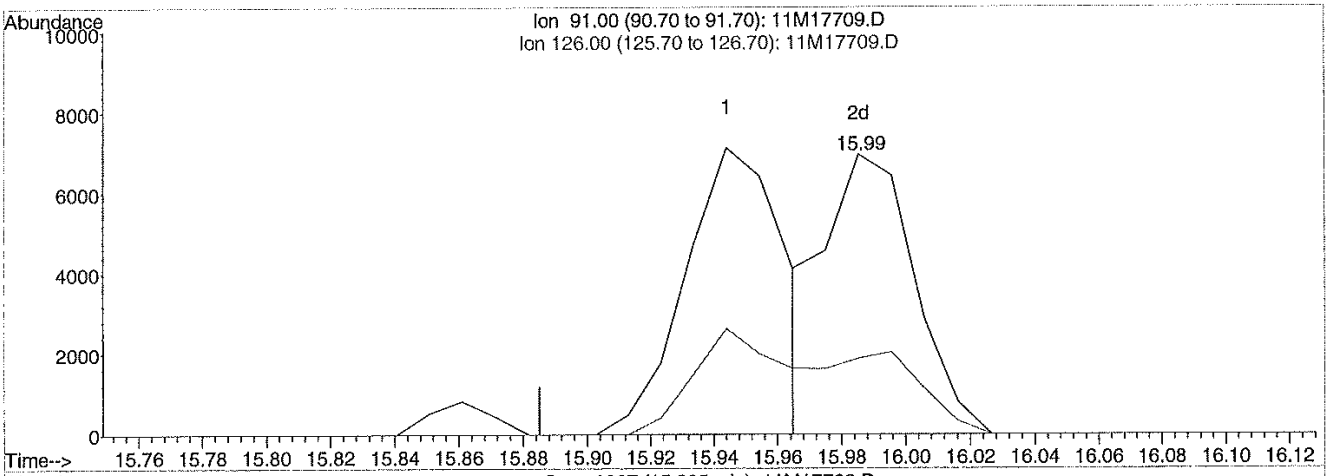
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	39.59
0.00	0.00	0.00
0.00	0.00	0.00

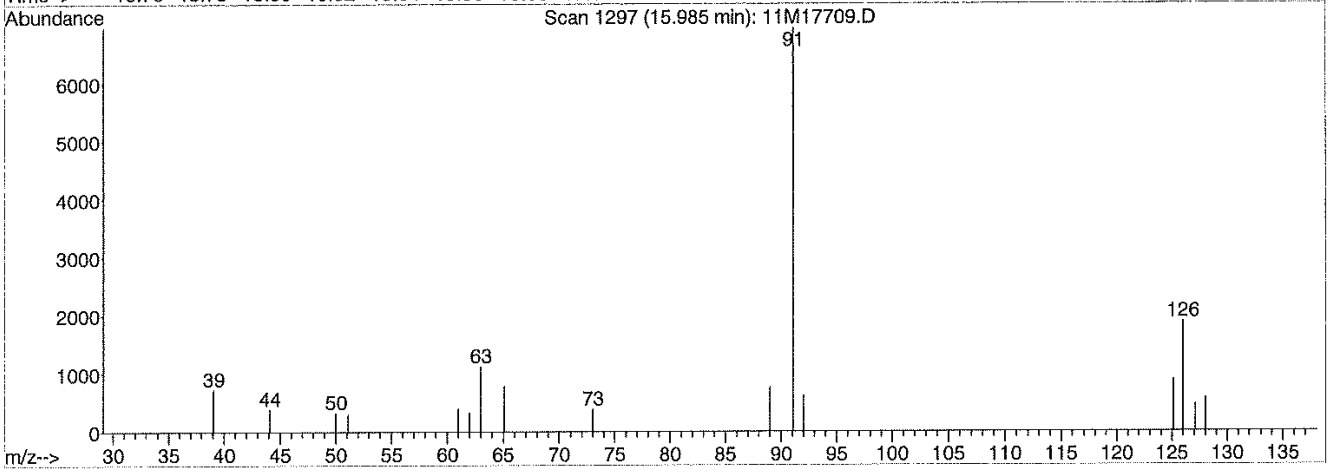
11M17709.D 8260WT.M Tue Apr 25 12:00:08 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:00 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.99min 0.99ug/L mint

response 13421

Ion	Exp%	Act%
91.00	100	100
126.00	29.80	45.11#
0.00	0.00	0.00
0.00	0.00	0.00

#3 JDS 4/28/17

FJB 4-28-17

11M17709.D 8260WT.M Tue Apr 25 12:00:48 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	423052	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	298274	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158082	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	8171	1.7736	ug/L	97
3) Chloromethane	3.65	50	14006	2.0410	ug/L	98
4) Vinyl Chloride	3.88	62	7048	1.9411	ug/L	92
5) 1,3-Butadiene	3.94	54	5898	1.8029	ug/L	82
6) Bromomethane	4.77	94	8565	2.2846	ug/L	93
7) Chloroethane	4.92	64	7416	1.9717	ug/L	96
8) Trichlorofluoromethane	5.41	101	12401	1.9549	ug/L	96
9) Diethyl ether	5.91	59	125331	26.6986	ug/L	99
10) Isoprene	5.97	67	12223	1.8599	ug/L	98
11) Acrolein	6.15	56	9083	12.1647	ug/L	87
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	7120	1.8953	ug/L	95
13) Acetone	6.26	43	2853	2.0169	ug/L #	58
14) 1,1-Dichloroethene	6.46	61	14698	1.9454	ug/L	92
15) Tert-Butyl Alcohol	6.57	59	26412	49.9213	ug/L	98
16) Dimethyl Sulfide	6.73	62	12206	2.0565	ug/L	95
17) Iodomethane	6.97	142	4155	1.9912	ug/L	84
18) Methyl acetate	6.98	43	8771	1.9660	ug/L #	90
19) Methylene Chloride	7.23	84	10291	2.0415	ug/L	96
20) Carbon Disulfide	7.27	76	25649	1.9855	ug/L	99
21) Acrylonitrile	7.40	53	25609	12.2578	ug/L	98
22) Methyl Tert Butyl Ether	7.43	73	26251	2.0795	ug/L	95
23) trans-1,2-Dichloroethene	7.66	96	8682	1.8884	ug/L	96
24) n-Hexane	7.73	57	11742	1.6467	ug/L #	90
25) Diisopropyl ether	8.07	45	526087	28.6176	ug/L	96
26) Vinyl Acetate	8.23	43	18149	2.1149	ug/L	94
27) 1,1-Dichloroethane	8.26	63	19706	2.0335	ug/L	93
28) Ethyl-Tert-Butyl ether	8.61	59	458837	28.2373	ug/L	96
29) 2-Butanone	8.79	43	4278	1.8509	ug/L	85
30) Propionitrile	8.89	54	19554	25.3600	ug/L	96
31) 2,2-Dichloropropane	9.00	77	13045	1.9887	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	10257	1.9881	ug/L	99
33) Chloroform	9.26	83	17270	2.0597	ug/L	97
34) 1-Bromopropane	9.39	122	1887	2.1774	ug/L	87
35) Bromochloromethane	9.48	130	6167	1.9495	ug/L	91
36) Tetrahydrofuran	9.50	42	47591	25.2790	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	13223	1.9351	ug/L #	97
39) Cyclohexane	9.80	56	18403	1.9154	ug/L	98
40) 1,1-Dichloropropene	9.95	75	11588	1.9350	ug/L	94
41) Carbon Tetrachloride	10.08	117	10600	1.7935	ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	366534	27.9618	ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

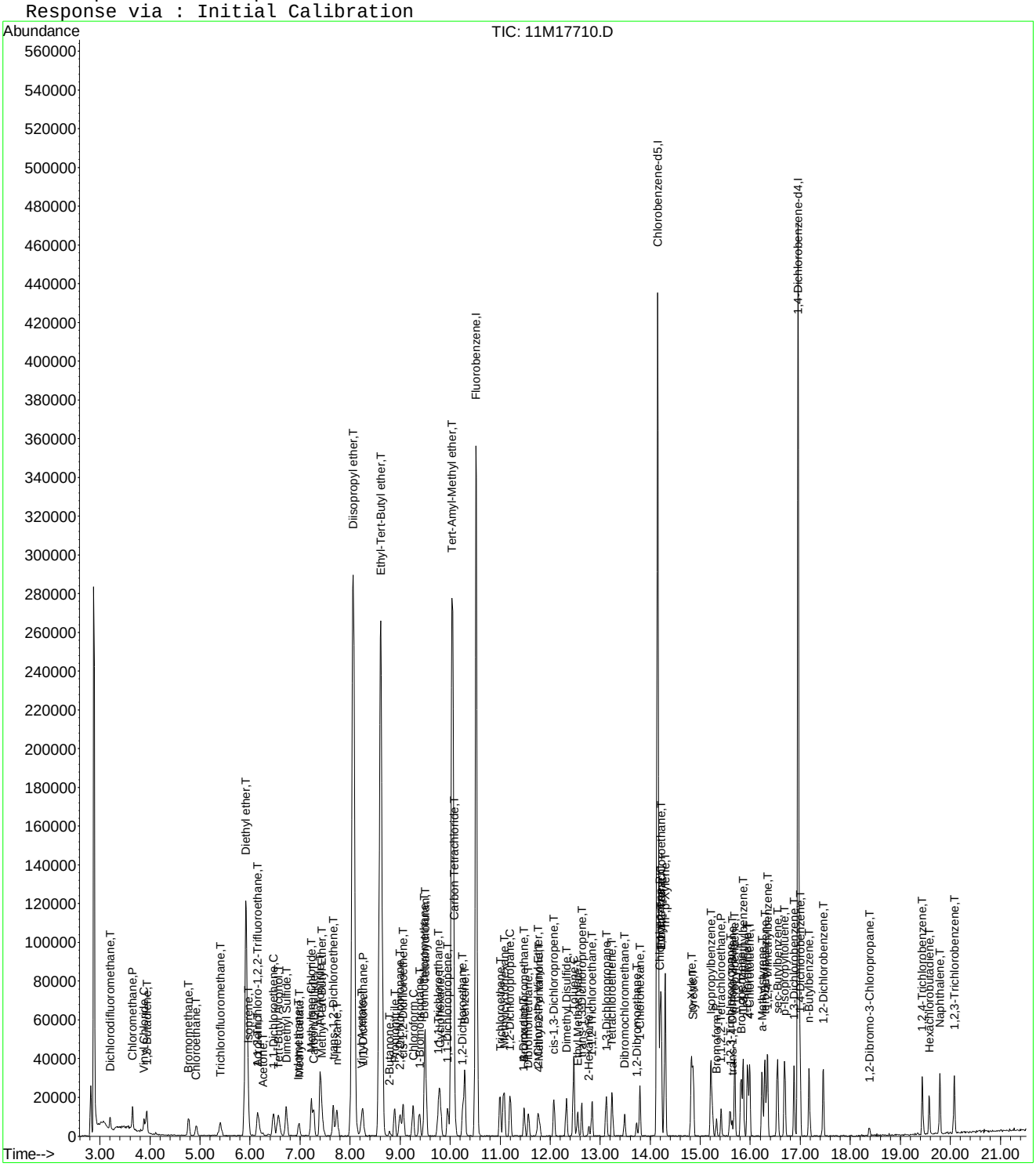
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.25	62	13423	2.0298	ug/L		99
45)	Benzene	10.29	78	38755	2.0889	ug/L		97
46)	Trichloroethene	11.00	130	9148	1.8811	ug/L		95
47)	Methylcyclohexane	11.08	83	14663	1.9666	ug/L		95
48)	1,2-Dichloropropane	11.20	63	11593	2.0077	ug/L		92
49)	1,4-Dioxane	11.47	88	2174	41.6924	ug/L		91
50)	Bromodichloromethane	11.48	83	11628	1.9302	ug/L		96
51)	Dibromomethane	11.56	93	5303	1.9415	ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	5429	1.7209	ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	3489	1.7175	ug/L	#	78
54)	cis-1,3-Dichloropropene	12.08	75	13651	1.9099	ug/L		97
55)	Dimethyl Disulfide	12.32	79	6926	1.5525	ug/L		98
58)	Toluene	12.47	91	38249	1.9806	ug/L		98
59)	Ethyl Methacrylate	12.55	69	9441	1.7788	ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	11353	1.8624	ug/L		97
61)	1,1,2-Trichloroethane	12.83	97	7908	1.9412	ug/L		94
62)	2-Hexanone	12.77	43	5906	1.7450	ug/L	#	69
63)	1,3-Dichloropropane	13.12	76	14255	2.1069	ug/L		99
64)	Tetrachloroethene	13.23	164	7409	1.9327	ug/L		99
65)	Dibromochloromethane	13.48	129	8612	1.8962	ug/L		95
66)	1,2-Dibromoethane	13.73	107	7412	2.0240	ug/L		99
67)	1-Chlorohexane	13.79	91	10002	1.8174	ug/L		97
68)	Chlorobenzene	14.20	112	26139	2.1284	ug/L		99
69)	1,1,1,2-Tetrachloroethane	14.22	131	8771	1.9183	ug/L		95
70)	Ethylbenzene	14.22	106	12495	1.9240	ug/L		75
71)	m-,p-Xylene	14.30	106	32038	4.1230	ug/L		87
72)	o-Xylene	14.83	106	16027	2.0470	ug/L		96
73)	Styrene	14.86	104	22629	1.9500	ug/L		99
74)	Bromoform	15.32	173	5086	1.5628	ug/L		97
75)	Isopropylbenzene	15.22	105	39378	2.0616	ug/L		91
77)	1,1,2,2-Tetrachloroethane	15.42	83	10345	2.0816	ug/L		98
79)	1,2,3-Trichloropropane	15.60	110	2638	1.8538	ug/L		80
80)	trans-1,4-Dichloro-2-Buten	15.64	53	2763	1.7957	ug/L		85
81)	n-Propylbenzene	15.69	91	44389	2.0034	ug/L		93
82)	Bromobenzene	15.82	156	11263	2.0888	ug/L		97
83)	1,3,5-Trimethylbenzene	15.86	105	29561	1.9502	ug/L		99
84)	2-Chlorotoluene	15.94	91	29746	1.9774	ug/L		84
85)	4-Chlorotoluene	15.99	91	27997	2.0620	ug/L		91
86)	a-Methylstyrene	16.24	118	14142	1.6928	ug/L		98
87)	tert-Butylbenzene	16.30	134	7098	1.9260	ug/L		84
88)	1,2,4-Trimethylbenzene	16.35	105	33715	2.1267	ug/L		92
89)	sec-Butylbenzene	16.54	105	39307	1.9635	ug/L		96
90)	p-Isopropyltoluene	16.69	119	31619	1.9656	ug/L		99
91)	1,3-Dichlorobenzene	16.87	146	19564	2.0397	ug/L		100
92)	1,4-Dichlorobenzene	17.00	146	21139	2.0493	ug/L		91
93)	n-Butylbenzene	17.17	91	27403	1.9100	ug/L		93
94)	1,2-Dichlorobenzene	17.46	146	20869	2.1562	ug/L		97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	1569	1.7994	ug/L		89
96)	1,2,4-Trichlorobenzene	19.44	180	13382	1.9259	ug/L		99
97)	Hexachlorobutadiene	19.58	225	6745	1.8303	ug/L		95
98)	Naphthalene	19.79	128	31285	2.0187	ug/L	#	96
99)	1,2,3-Trichlorobenzene	20.08	180	13778	1.9382	ug/L		95

(#) = qualifier out of range (m) = manual integration
11M17710.D 8260WT.M Tue Apr 25 14:17:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17710.D 8260WT.M Tue Apr 25 14:17:45 2017 Page 3

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:24:44 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	2.0000	1.7736	11.3	100	0.00
3	P	Chloromethane	2.0000	2.0410	-2.0	100	0.00
4	C	Vinyl Chloride	2.0000	1.9411	2.9	100	-0.01
5	T	1,3-Butadiene	2.0000	1.8029	9.9	100	0.01
6	T	Bromomethane	2.0000	2.2846	-14.2	100	-0.01
7	T	Chloroethane	2.0000	1.9717	1.4	100	-0.01
8	T	Trichlorofluoromethane	2.0000	1.9550	2.3	100	0.00
9	T	Diethyl ether	25.0000	26.6987	-6.8	100	-0.01
10	T	Isoprene	2.0000	1.8600	7.0	100	0.00
11	T	Acrolein	12.5000	12.1647	2.7	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8953	5.2	100	-0.01
13	T	Acetone	2.0000	2.0169	-0.8	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9454	2.7	100	-0.01
15	T	Tert-Butyl Alcohol	50.0000	49.9213	0.2	100	0.00
16	T	Dimethyl Sulfide	2.0000	2.0565	-2.8	100	0.00
17	T	Iodomethane	2.0000	1.9912	0.4	100	0.00
18	T	Methyl acetate	2.0000	1.9660	1.7	100	0.00
19	T	Methylene Chloride	2.0000	2.0415	-2.1	100	0.00
20	T	Carbon Disulfide	2.0000	1.9855	0.7	100	-0.01
21	T	Acrylonitrile	12.5000	12.2578	1.9	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	2.0795	-4.0	100	0.00
23	T	trans-1,2-Dichloroethene	2.0000	1.8884	5.6	100	-0.01
24	T	n-Hexane	2.0000	1.6467	17.7	100	0.00
25	T	Diisopropyl ether	25.0000	28.6176	-14.5	100	0.00
26	T	Vinyl Acetate	2.0000	2.1149	-5.7	100	0.00
27	P	1,1-Dichloroethane	2.0000	2.0335	-1.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	28.2373	-12.9	100	0.00
29	T	2-Butanone	2.0000	1.8509	7.5	100	0.00
30	T	Propionitrile	25.0000	25.3600	-1.4	100	0.00
31	T	2,2-Dichloropropane	2.0000	1.9887	0.6	100	-0.01
32	T	cis-1,2-Dichloroethene	2.0000	1.9881	0.6	100	-0.01
33	C	Chloroform	2.0000	2.0597	-3.0	100	0.00
34	T	1-Bromopropane	2.0000	2.1774	-8.9	100	0.00
35	T	Bromochloromethane	2.0000	1.9495	2.5	100	0.00
36	T	Tetrahydrofuran	25.0000	25.2790	-1.1	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	2.0000	1.9351	3.2	100	0.00
39	T	Cyclohexane	2.0000	1.9154	4.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9349	3.3	100	0.00
41	T	Carbon Tetrachloride	2.0000	1.7935	10.3	100	-0.01
42	T	Tert-Amyl-Methyl ether	25.0000	27.9618	-11.8	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	2.0000	2.0298	-1.5	100	0.00
45	T	Benzene	2.0000	2.0889	-4.4	100	0.00
46	T	Trichloroethene	2.0000	1.8811	5.9	100	0.00
47	T	Methylcyclohexane	2.0000	1.9666	1.7	100	0.01
48	C	1,2-Dichloropropane	2.0000	2.0077	-0.4	100	0.00
49	T	1,4-Dioxane	-1.0000	41.6924	0.0	100	0.00
50	T	Bromodichloromethane	2.0000	1.9302	3.5	100	-0.01
51	T	Dibromomethane	2.0000	1.9415	2.9	100	-0.01
52	T	2-Chloroethyl Vinyl Ether	2.0000	1.7209	14.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	1.7175	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	2.0000	1.9099	4.5	100	0.00
55	T	Dimethyl Disulfide	-1.0000	1.5525	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	2.0000	1.9806	1.0	100	0.00	
59	T	Ethyl Methacrylate	2.0000	1.7788	11.1	100	0.00	
60	T	trans-1,3-Dichloropropene	2.0000	1.8623	6.9	100	0.00	
61	T	1,1,2-Trichloroethane	2.0000	1.9412	2.9	100	-0.01	
62	T	2-Hexanone	-1.0000	1.7450	0.0	100	0.00	
63	T	1,3-Dichloropropane	2.0000	2.1069	-5.3	100	0.00	
64	T	Tetrachloroethene	2.0000	1.9327	3.4	100	0.00	
65	T	Dibromochloromethane	2.0000	1.8962	5.2	100	-0.01	
66	T	1,2-Dibromoethane	2.0000	2.0240	-1.2	100	0.00	
67	T	1-Chlorohexane	2.0000	1.8174	9.1	100	0.00	
68	P	Chlorobenzene	2.0000	2.1284	-6.4	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	2.0000	1.9184	4.1	100	0.00	
70	C	Ethylbenzene	2.0000	1.9240	3.8	100	0.00	
71	T	m-,p-Xylene	4.0000	4.1230	-3.1	100	0.00	
72	T	o-Xylene	2.0000	2.0470	-2.4	100	0.00	
73	T	Styrene	2.0000	1.9500	2.5	100	0.00	
74	P	Bromoform	2.0000	1.5628	21.9	100	0.00	
75	T	Isopropylbenzene	2.0000	2.0616	-3.1	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	2.0000	2.0816	-4.1	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	2.0000	1.8538	7.3	100	0.00	
80	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7957	10.2	100	0.01	
81	T	n-Propylbenzene	2.0000	2.0034	-0.2	100	0.00	
82	T	Bromobenzene	2.0000	2.0888	-4.4	100	0.00	
83	T	1,3,5-Trimethylbenzene	2.0000	1.9502	2.5	100	0.00	
84	T	2-Chlorotoluene	2.0000	1.9774	1.1	100	0.00	
85	T	4-Chlorotoluene	2.0000	2.0641	-3.2	100	0.00	
86	T	a-Methylstyrene	-1.0000	1.6928	0.0	0	0.01	
87	T	tert-Butylbenzene	2.0000	1.9260	3.7	100	0.00	
88	T	1,2,4-Trimethylbenzene	2.0000	2.1267	-6.3	100	0.00	
89	T	sec-Butylbenzene	2.0000	1.9635	1.8	100	0.00	
90	T	p-Isopropyltoluene	2.0000	1.9656	1.7	100	0.00	
91	T	1,3-Dichlorobenzene	2.0000	2.0398	-2.0	100	0.00	
92	T	1,4-Dichlorobenzene	2.0000	2.0493	-2.5	100	0.00	
93	T	n-Butylbenzene	2.0000	1.9044	4.8	100	0.00	
94	T	1,2-Dichlorobenzene	2.0000	2.1562	-7.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7994	10.0	100	0.00	
96	T	1,2,4-Trichlorobenzene	2.0000	1.9259	3.7	100	-0.01	
97	T	Hexachlorobutadiene	2.0000	1.8303	8.5	100	0.00	
98	T	Naphthalene	2.0000	2.0187	-0.9	100	0.00	
99	T	1,2,3-Trichlorobenzene	2.0000	1.9382	3.1	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0

11M17710.D 8260WT.M Tue Apr 25 11:24:59 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	428779	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	303515	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	159230	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	21997	5.1792	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.72%#			
43) 1,2-Dichloroethane-d4	10.14	65	25817	5.2381	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 20.96%#			
57) Toluene-d8	12.38	98	85704	5.4381	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 21.76%#			
78) p-Bromofluorobenzene	15.54	95	28349	5.1223	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 20.48%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	22183	4.4060	ug/L	96
3) Chloromethane	3.66	50	27821	4.7278	ug/L	95
4) Vinyl Chloride	3.89	62	17550	4.7689	ug/L	99
5) 1,3-Butadiene	3.93	54	13640	5.4863	ug/L	89
6) Bromomethane	4.78	94	19431	5.1137	ug/L	98
7) Chloroethane	4.93	64	18475	4.8465	ug/L	99
8) Trichlorofluoromethane	5.41	101	32605	5.0713	ug/L	99
9) Diethyl ether	5.92	59	249706	52.4832	ug/L	99
10) Isoprene	5.96	67	33440	5.0205	ug/L	96
11) Acrolein	6.15	56	19773	26.1280	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	18985	4.9861	ug/L	96
13) Acetone	6.26	43	6991	4.8763	ug/L	95
14) 1,1-Dichloroethene	6.47	61	37724	4.9264	ug/L	97
15) Tert-Butyl Alcohol	6.58	59	54089	100.8680	ug/L	99
16) Dimethyl Sulfide	6.73	62	30254	5.0292	ug/L	97
17) Iodomethane	6.97	142	17033	4.3725	ug/L	96
18) Methyl acetate	6.99	43	22739	5.0288	ug/L	95
19) Methylene Chloride	7.23	84	24965	4.8863	ug/L	93
20) Carbon Disulfide	7.27	76	66413	5.0725	ug/L	100
21) Acrylonitrile	7.40	53	52004	24.5594	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	66369	5.1874	ug/L	98
23) trans-1,2-Dichloroethene	7.66	96	22656	4.8619	ug/L	99
24) n-Hexane	7.73	57	34418	4.7622	ug/L	97
25) Diisopropyl ether	8.07	45	1035574	55.5799	ug/L	97
26) Vinyl Acetate	8.23	43	41746	4.7998	ug/L	97
27) 1,1-Dichloroethane	8.26	63	50180	5.1091	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	902275	54.7853	ug/L	97
29) 2-Butanone	8.79	43	11494	4.9065	ug/L	88
30) Propionitrile	8.89	54	39167	50.1181	ug/L	99
31) 2,2-Dichloropropane	9.01	77	32896	4.9480	ug/L	96
32) cis-1,2-Dichloroethene	9.06	96	26061	4.9839	ug/L	95
33) Chloroform	9.26	83	41854	5.1947	ug/L	98
34) 1-Bromopropane	9.39	122	4450	4.5889	ug/L	94
35) Bromochloromethane	9.48	130	16004	4.9916	ug/L	95
36) Tetrahydrofuran	9.50	42	92549	48.5028	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	34620	4.9988	ug/L	97
39) Cyclohexane	9.80	56	49732	5.1069	ug/L	98
40) 1,1-Dichloropropene	9.95	75	30690	5.0561	ug/L	97
41) Carbon Tetrachloride	10.09	117	30445	5.0826	ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	718908	54.1108	ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

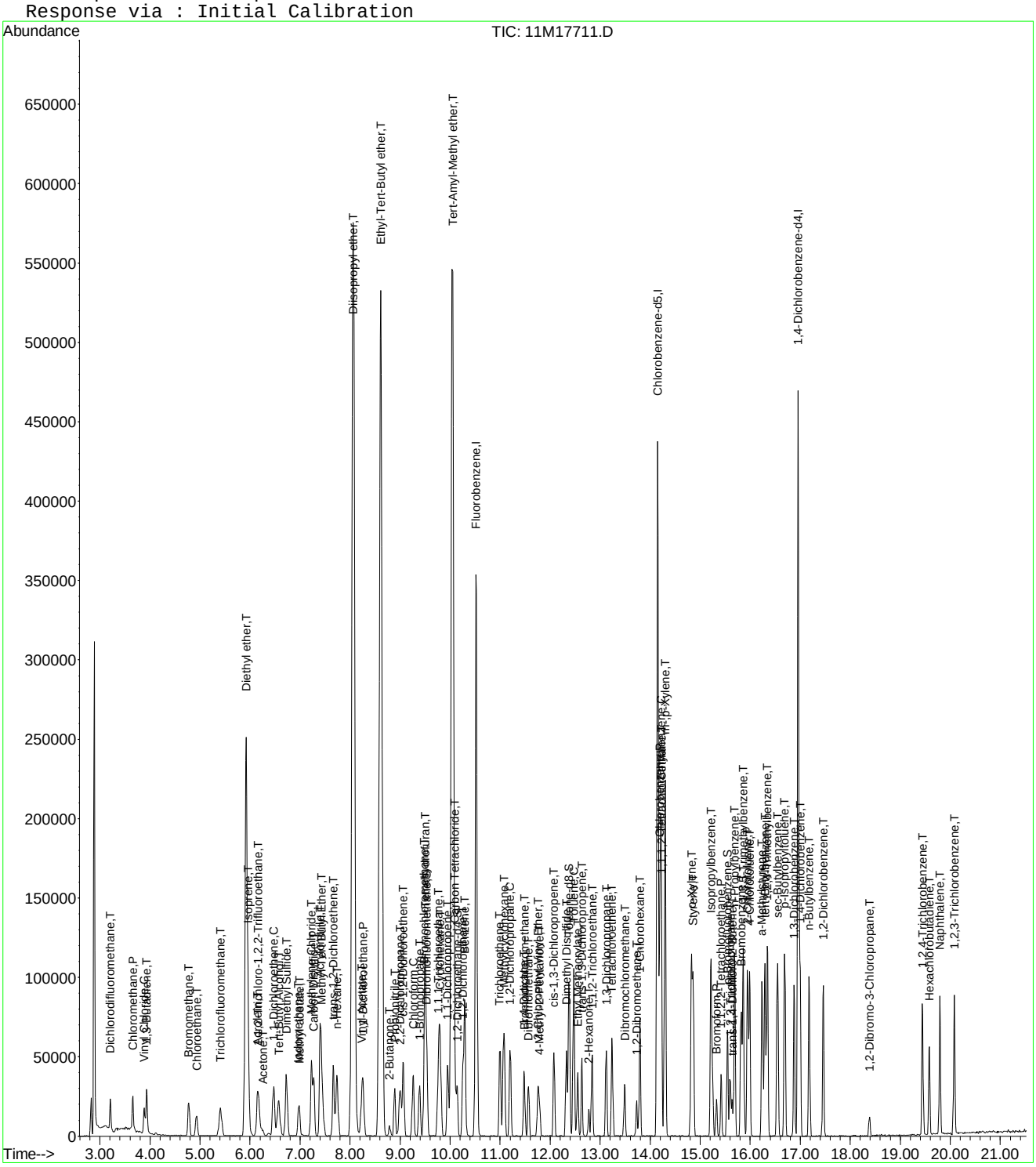
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	34564	5.1568	ug/L	97
45)	Benzene	10.29	78	98721	5.2499	ug/L	97
46)	Trichloroethene	10.99	130	24435	4.9574	ug/L	99
47)	Methylcyclohexane	11.07	83	38311	5.0696	ug/L	96
48)	1,2-Dichloropropane	11.20	63	28756	4.9135	ug/L	96
49)	1,4-Dioxane	11.48	88	4775	90.3507	ug/L	96
50)	Bromodichloromethane	11.49	83	29635	4.8536	ug/L	98
51)	Dibromomethane	11.57	93	14576	5.2651	ug/L	93
52)	2-Chloroethyl Vinyl Ether	11.76	63	14370	4.4942	ug/L	98
53)	4-Methyl-2-Pentanone	11.79	58	8487	4.1220	ug/L	95
54)	cis-1,3-Dichloropropene	12.08	75	36650	5.0591	ug/L	100
55)	Dimethyl Disulfide	12.32	79	18858	4.1706	ug/L	97
58)	Toluene	12.47	91	100679	5.1234	ug/L	95
59)	Ethyl Methacrylate	12.55	69	25852	4.7866	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	32301	5.2072	ug/L	96
61)	1,1,2-Trichloroethane	12.84	97	21812	5.2618	ug/L	100
62)	2-Hexanone	12.77	43	16299	4.7327	ug/L	94
63)	1,3-Dichloropropane	13.12	76	36430	5.2914	ug/L	99
64)	Tetrachloroethene	13.23	164	20026	5.1338	ug/L	98
65)	Dibromochloromethane	13.49	129	23433	5.0705	ug/L	98
66)	1,2-Dibromoethane	13.73	107	18938	5.0820	ug/L	100
67)	1-Chlorohexane	13.79	91	27949	4.9909	ug/L	97
68)	Chlorobenzene	14.20	112	65228	5.2197	ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.23	131	23202	4.9870	ug/L	99
70)	Ethylbenzene	14.22	106	34657	5.2444	ug/L	85
71)	m-,p-Xylene	14.30	106	84626	10.7026	ug/L	87
72)	o-Xylene	14.83	106	41271	5.1802	ug/L	91
73)	Styrene	14.86	104	62547	5.2968	ug/L	98
74)	Bromoform	15.32	173	14707	4.4411	ug/L	98
75)	Isopropylbenzene	15.22	105	103427	5.3214	ug/L	95
77)	1,1,2,2-Tetrachloroethane	15.42	83	26325	5.2589	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	7568	5.2799	ug/L	98
80)	trans-1,4-Dichloro-2-Buten	15.64	53	7445	4.8037	ug/L	95
81)	n-Propylbenzene	15.69	91	120808	5.4132	ug/L	94
82)	Bromobenzene	15.82	156	29282	5.3915	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	86498	5.6654	ug/L	96
84)	2-Chlorotoluene	15.94	91	80304	5.2998	ug/L	94
85)	4-Chlorotoluene	15.99	91	75635	5.5305	ug/L	95
86)	a-Methylstyrene	16.23	118	41076	4.8814	ug/L	98
87)	tert-Butylbenzene	16.30	134	18231	4.9113	ug/L	74
88)	1,2,4-Trimethylbenzene	16.34	105	90217	5.6498	ug/L	94
89)	sec-Butylbenzene	16.54	105	108569	5.3842	ug/L	95
90)	p-Isopropyltoluene	16.69	119	91804	5.6660	ug/L	95
91)	1,3-Dichlorobenzene	16.87	146	53587	5.5467	ug/L	97
92)	1,4-Dichlorobenzene	17.00	146	52478	5.0507	ug/L	99
93)	n-Butylbenzene	17.17	91	75319	5.2119	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	53808	5.5195	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	4345	4.9470	ug/L	91
96)	1,2,4-Trichlorobenzene	19.45	180	36374	5.1970	ug/L	99
97)	Hexachlorobutadiene	19.58	225	18114	4.8798	ug/L	98
98)	Naphthalene	19.79	128	82884	5.3097	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	36011	5.0292	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17711.D 8260WT.M Tue Apr 25 14:17:57 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	436695	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	310777	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	168187	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	39986	9.2441	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.96%#			
43) 1,2-Dichloroethane-d4	10.14	65	46884	9.3400	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.36%#			
57) Toluene-d8	12.38	98	157855	9.7822	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 39.12%#			
78) p-Bromofluorobenzene	15.54	95	53711	9.1881	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 36.76%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	119907	22.4994	ug/L	100
3) Chloromethane	3.65	50	131720	24.7445	ug/L	98
4) Vinyl Chloride	3.88	62	77026	20.5511	ug/L	99
5) 1,3-Butadiene	3.92	54	40987	18.4416	ug/L	94
6) Bromomethane	4.77	94	73160	18.9046	ug/L	99
7) Chloroethane	4.92	64	82150	21.1595	ug/L	99
8) Trichlorofluoromethane	5.41	101	139146	21.2503	ug/L	100
9) Diethyl ether	5.91	59	401213	82.7983	ug/L	100
10) Isoprene	5.96	67	141743	20.8949	ug/L	98
11) Acrolein	6.14	56	32156	41.7206	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	81406	20.9925	ug/L	99
13) Acetone	6.25	43	30233	20.7056	ug/L	93
14) 1,1-Dichloroethene	6.46	61	159850	20.4966	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	88568	162.1723	ug/L	98
16) Dimethyl Sulfide	6.72	62	129191	21.0867	ug/L	98
17) Iodomethane	6.97	142	104516	20.2684	ug/L	98
18) Methyl acetate	6.98	43	95685	20.7776	ug/L	99
19) Methylene Chloride	7.23	84	103909	19.9691	ug/L	97
20) Carbon Disulfide	7.27	76	274943	20.6190	ug/L	98
21) Acrylonitrile	7.40	53	89042	41.2886	ug/L	98
22) Methyl Tert Butyl Ether	7.42	73	273761	21.0092	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	96267	20.2843	ug/L	99
24) n-Hexane	7.73	57	146088	19.8470	ug/L	99
25) Diisopropyl ether	8.06	45	1618979	85.3165	ug/L	99
26) Vinyl Acetate	8.23	43	176447	19.9194	ug/L	99
27) 1,1-Dichloroethane	8.26	63	205623	20.5559	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1426794	85.0632	ug/L	98
29) 2-Butanone	8.79	43	49794	20.8706	ug/L	98
30) Propionitrile	8.89	54	65774	82.6388	ug/L	99
31) 2,2-Dichloropropane	9.01	77	135298	19.9819	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	110879	20.8200	ug/L	98
33) Chloroform	9.25	83	172198	21.5740	ug/L	100
34) 1-Bromopropane	9.39	122	20252	19.2581	ug/L	99
35) Bromochloromethane	9.48	130	68191	20.8830	ug/L	99
36) Tetrahydrofuran	9.50	42	150814	77.6055	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	148271	21.0209	ug/L	100
39) Cyclohexane	9.79	56	207352	20.9066	ug/L	98
40) 1,1-Dichloropropene	9.95	75	128943	20.8581	ug/L	97
41) Carbon Tetrachloride	10.09	117	130686	21.4216	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	1142684	84.4485	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17712.D 8260WT.M Tue Apr 25 14:18:10 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

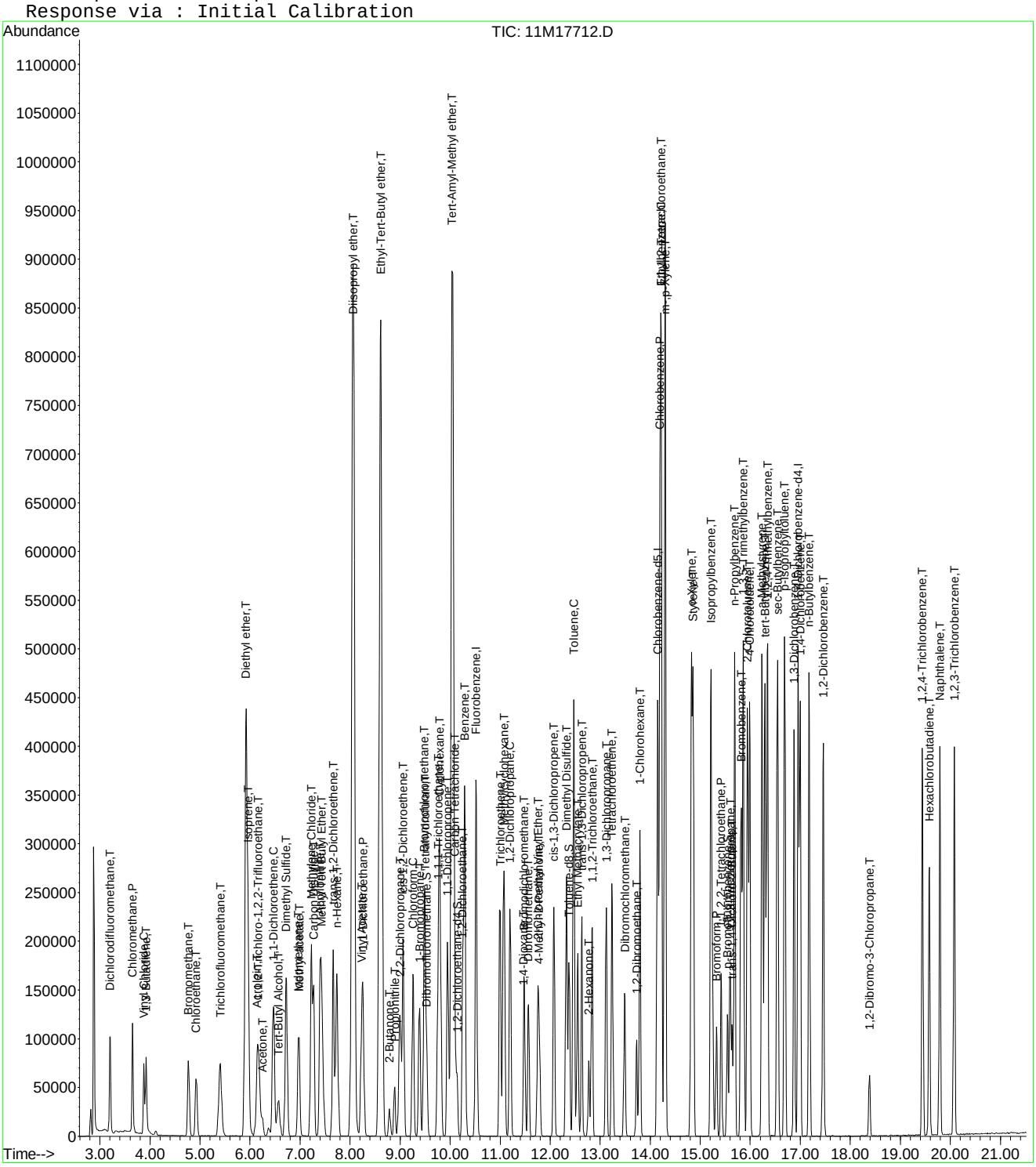
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	145252	21.2783	ug/L	99
45)	Benzene	10.29	78	398956	20.8317	ug/L	97
46)	Trichloroethene	11.00	130	104094	20.7359	ug/L	99
47)	Methylcyclohexane	11.07	83	160115	20.8036	ug/L	99
48)	1,2-Dichloropropane	11.20	63	120072	20.1447	ug/L	98
49)	1,4-Dioxane	11.47	88	7871	146.2322	ug/L	94
50)	Bromodichloromethane	11.48	83	129011	20.7463	ug/L	100
51)	Dibromomethane	11.56	93	59829	21.2194	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	69123	21.2263	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	43246	20.6231	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	160707	21.7817	ug/L	97
55)	Dimethyl Disulfide	12.32	79	90938	19.7473	ug/L	99
58)	Toluene	12.47	91	414902	20.6203	ug/L	97
59)	Ethyl Methacrylate	12.55	69	121437	21.9593	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	139862	22.0200	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	91832	21.6355	ug/L	98
62)	2-Hexanone	12.77	43	72420	20.5371	ug/L	98
63)	1,3-Dichloropropane	13.12	76	151591	21.5037	ug/L	100
64)	Tetrachloroethene	13.23	164	85598	21.4310	ug/L	100
65)	Dibromochloromethane	13.49	129	101802	21.5133	ug/L	99
66)	1,2-Dibromoethane	13.73	107	80818	21.1809	ug/L	97
67)	1-Chlorohexane	13.79	91	119894	20.9092	ug/L	100
68)	Chlorobenzene	14.20	112	267703	20.9215	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	100693	21.1370	ug/L	99
70)	Ethylbenzene	14.22	106	146101	21.5919	ug/L	90
71)	m-,p-Xylene	14.30	106	347301	42.8965	ug/L	89
72)	o-Xylene	14.83	106	175418	21.5033	ug/L	94
73)	Styrene	14.86	104	282121	23.3331	ug/L	97
74)	Bromoform	15.32	173	70896	20.9084	ug/L	99
75)	Isopropylbenzene	15.22	105	435928	21.9046	ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	112391	21.2565	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	33992	22.4518	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	34278	20.9390	ug/L	96
81)	n-Propylbenzene	15.69	91	520501	22.0807	ug/L	96
82)	Bromobenzene	15.82	156	124008	21.6168	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	367954	22.8164	ug/L	97
84)	2-Chlorotoluene	15.94	91	327461	20.4604	ug/L	86
85)	4-Chlorotoluene	15.99	91	317263	21.9631	ug/L	97
86)	a-Methylstyrene	16.23	118	196070	22.0595	ug/L	99
87)	tert-Butylbenzene	16.30	134	85202	21.7304	ug/L	99
88)	1,2,4-Trimethylbenzene	16.35	105	382132	22.6565	ug/L	96
89)	sec-Butylbenzene	16.54	105	466322	21.8946	ug/L	96
90)	p-Isopropyltoluene	16.69	119	393753	23.0076	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	225765	22.1241	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	227443	20.7244	ug/L	98
93)	n-Butylbenzene	17.17	91	353074	23.1308	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	224912	21.8422	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	19018	20.4998	ug/L	98
96)	1,2,4-Trichlorobenzene	19.44	180	165986	22.4528	ug/L	100
97)	Hexachlorobutadiene	19.58	225	83698	21.3469	ug/L	98
98)	Naphthalene	19.79	128	382950	23.2260	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	163857	21.6652	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17712.D 8260WT.M Tue Apr 25 14:18:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	445066	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	320836	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	178101	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	112079	25.4235	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%			
43) 1,2-Dichloroethane-d4	10.14	65	130851	25.5772	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.32%			
57) Toluene-d8	12.38	98	436970	26.2298	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%			
78) p-Bromofluorobenzene	15.54	95	161708	26.1227	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	307006	56.2126	ug/L	100
3) Chloromethane	3.66	50	206853	38.5380	ug/L	100
4) Vinyl Chloride	3.89	62	200431	52.4708	ug/L	100
5) 1,3-Butadiene	3.93	54	121423	57.3894	ug/L	100
6) Bromomethane	4.78	94	179017	45.3881	ug/L	100
7) Chloroethane	4.93	64	208061	52.5825	ug/L	100
8) Trichlorofluoromethane	5.41	101	356930	53.4848	ug/L	100
9) Diethyl ether	5.92	59	492681	99.7622	ug/L	100
10) Isoprene	5.97	67	385229	55.7200	ug/L	100
11) Acrolein	6.15	56	39643	50.4672	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	207994	52.6275	ug/L	100
13) Acetone	6.26	43	72300	48.5847	ug/L	99
14) 1,1-Dichloroethene	6.47	61	418655	52.6721	ug/L	100
15) Tert-Butyl Alcohol	6.57	59	108302	194.5763	ug/L	100
16) Dimethyl Sulfide	6.73	62	323528	51.8133	ug/L	100
17) Iodomethane	6.98	142	294369	53.8800	ug/L	100
18) Methyl acetate	6.98	43	235792	50.2382	ug/L	100
19) Methylene Chloride	7.23	84	265477	50.0596	ug/L	100
20) Carbon Disulfide	7.28	76	716496	52.7221	ug/L	100
21) Acrylonitrile	7.40	53	112383	51.1317	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	696161	52.4207	ug/L	100
23) trans-1,2-Dichloroethene	7.67	96	244230	50.4935	ug/L	100
24) n-Hexane	7.73	57	407356	54.3010	ug/L	100
25) Diisopropyl ether	8.06	45	1936523	100.1309	ug/L	100
26) Vinyl Acetate	8.23	43	462428	51.2223	ug/L	100
27) 1,1-Dichloroethane	8.26	63	520163	51.0221	ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1708288	99.9299	ug/L	100
29) 2-Butanone	8.79	43	122699	50.4606	ug/L	100
30) Propionitrile	8.89	54	81159	100.0507	ug/L	100
31) 2,2-Dichloropropane	9.01	77	339288	49.1664	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	283070	52.1530	ug/L	100
33) Chloroform	9.26	83	429355	53.0609	ug/L	100
34) 1-Bromopropane	9.39	122	54732	50.4729	ug/L	100
35) Bromochloromethane	9.48	130	174716	52.4993	ug/L	100
36) Tetrahydrofuran	9.50	42	183509	92.6535	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	385302	53.5982	ug/L	100
39) Cyclohexane	9.80	56	550451	54.4562	ug/L	100
40) 1,1-Dichloropropene	9.95	75	331140	52.5584	ug/L	100
41) Carbon Tetrachloride	10.09	117	338384	54.4234	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1383285	100.3070	ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

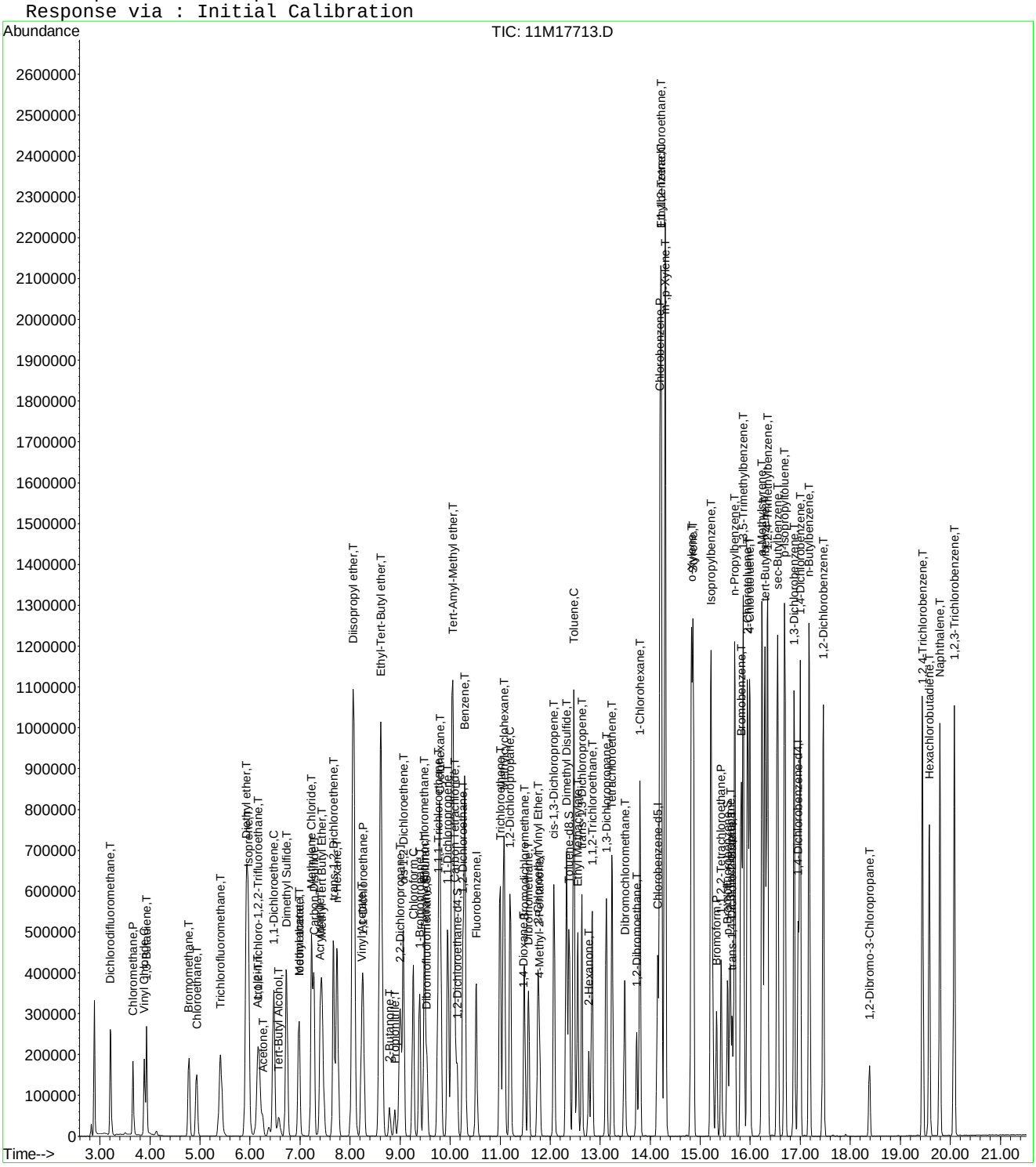
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	361701	51.9898	ug/L	100
45)	Benzene	10.29	78	968426	49.6158	ug/L	100
46)	Trichloroethene	11.00	130	265683	51.9297	ug/L	100
47)	Methylcyclohexane	11.07	83	432180	55.0967	ug/L	100
48)	1,2-Dichloropropane	11.20	63	313159	51.5511	ug/L	100
49)	1,4-Dioxane	11.47	88	10688	194.8334	ug/L	100
50)	Bromodichloromethane	11.49	83	337537	53.2585	ug/L	100
51)	Dibromomethane	11.57	93	152290	52.9965	ug/L	100
52)	2-Chloroethyl Vinyl Ether	11.76	63	178405	53.7542	ug/L	100
53)	4-Methyl-2-Pentanone	11.79	58	105435	49.3340	ug/L	100
54)	cis-1,3-Dichloropropene	12.08	75	412082	54.8017	ug/L	100
55)	Dimethyl Disulfide	12.32	79	244059	52.0010	ug/L	100
58)	Toluene	12.47	91	1001084	48.1931	ug/L	100
59)	Ethyl Methacrylate	12.55	69	315794	55.3143	ug/L	100
60)	trans-1,3-Dichloropropene	12.64	75	366578	55.9049	ug/L	100
61)	1,1,2-Trichloroethane	12.84	97	225750	51.5190	ug/L	100
62)	2-Hexanone	12.77	43	185197	50.8721	ug/L	100
63)	1,3-Dichloropropane	13.12	76	380682	52.3080	ug/L	100
64)	Tetrachloroethene	13.23	164	223637	54.2361	ug/L	100
65)	Dibromochloromethane	13.49	129	269291	55.1237	ug/L	100
66)	1,2-Dibromoethane	13.73	107	209203	53.1091	ug/L	100
67)	1-Chlorohexane	13.79	91	332337	56.1415	ug/L	100
68)	Chlorobenzene	14.20	112	662611	50.1608	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	264376	53.7567	ug/L	100
70)	Ethylbenzene	14.22	106	377411	54.0278	ug/L	100
71)	m-,p-Xylene	14.30	106	860460	102.9467	ug/L	100
72)	o-Xylene	14.83	106	448780	53.2881	ug/L	100
73)	Styrene	14.86	104	726395	58.1938	ug/L	100
74)	Bromoform	15.32	173	189058	54.0081	ug/L	100
75)	Isopropylbenzene	15.22	105	1056621	51.4287	ug/L	100
77)	1,1,2,2-Tetrachloroethane	15.42	83	286055	51.0900	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	84214	52.5272	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	86739	50.0359	ug/L	100
81)	n-Propylbenzene	15.69	91	1252755	50.1862	ug/L	100
82)	Bromobenzene	15.82	156	322294	53.0542	ug/L	100
83)	1,3,5-Trimethylbenzene	15.86	105	917525	53.7277	ug/L	100
84)	2-Chlorotoluene	15.94	91	795808	46.9558	ug/L	100
85)	4-Chlorotoluene	15.99	91	788645	51.5562	ug/L	100
86)	a-Methylstyrene	16.23	118	529141	56.2190	ug/L	100
87)	tert-Butylbenzene	16.30	134	217546	52.3956	ug/L	100
88)	1,2,4-Trimethylbenzene	16.35	105	939986	52.6293	ug/L	100
89)	sec-Butylbenzene	16.54	105	1150332	51.0035	ug/L	100
90)	p-Isopropyltoluene	16.69	119	999581	55.1559	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	587925	54.4073	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	580973	49.9909	ug/L	100
93)	n-Butylbenzene	17.17	91	912776	56.4697	ug/L	100
94)	1,2-Dichlorobenzene	17.46	146	580005	53.1914	ug/L	100
95)	1,2-Dibromo-3-Chloropropan	18.38	75	51998	52.9295	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	445578	56.9178	ug/L	100
97)	Hexachlorobutadiene	19.58	225	224987	54.1880	ug/L	100
98)	Naphthalene	19.79	128	942009	53.9528	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	430160	53.7098	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17713.D 8260WT.M Tue Apr 25 14:18:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	443137	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	325943	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	184790	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	229531	52.2924	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 209.16%#			
43) 1,2-Dichloroethane-d4	10.14	65	262519	51.5376	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 206.16%#			
57) Toluene-d8	12.38	98	850522	50.2539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 201.00%#			
78) p-Bromofluorobenzene	15.54	95	335482	52.2328	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 208.92%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	604893	111.0366	ug/L	98
3) Chloromethane	3.66	50	588818	111.5874	ug/L	99
4) Vinyl Chloride	3.88	62	393311	103.4130	ug/L	99
5) 1,3-Butadiene	3.92	54	190798	93.9693	ug/L	99
6) Bromomethane	4.77	94	376626	95.9057	ug/L	100
7) Chloroethane	4.92	64	418888	106.3250	ug/L	100
8) Trichlorofluoromethane	5.41	101	730248	109.9017	ug/L	100
9) Diethyl ether	5.92	59	959569	195.1474	ug/L	99
10) Isoprene	5.96	67	784840	114.0143	ug/L	98
11) Acrolein	6.15	56	82672	105.7031	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	429066	109.0365	ug/L	99
13) Acetone	6.25	43	151205	102.0502	ug/L	96
14) 1,1-Dichloroethene	6.46	61	828852	104.7339	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	222885	402.1803	ug/L	98
16) Dimethyl Sulfide	6.72	62	640880	103.0843	ug/L	99
17) Iodomethane	6.97	142	588728	107.0077	ug/L	99
18) Methyl acetate	6.98	43	472053	101.0142	ug/L	99
19) Methylene Chloride	7.23	84	522767	99.0045	ug/L	98
20) Carbon Disulfide	7.27	76	1365403	100.9081	ug/L	98
21) Acrylonitrile	7.40	53	226916	103.6910	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	1345867	101.7844	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	492184	102.1998	ug/L	98
24) n-Hexane	7.73	57	826192	110.6117	ug/L	100
25) Diisopropyl ether	8.06	45	3381163	175.5893	ug/L	94
26) Vinyl Acetate	8.23	43	998822	111.1193	ug/L	98
27) 1,1-Dichloroethane	8.26	63	1014407	99.9350	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	3057711	179.6459	ug/L	94
29) 2-Butanone	8.79	43	246500	101.8157	ug/L	100
30) Propionitrile	8.89	54	165540	204.9617	ug/L	100
31) 2,2-Dichloropropane	9.00	77	669887	97.4961	ug/L	99
32) cis-1,2-Dichloroethene	9.07	96	560030	103.6295	ug/L	99
33) Chloroform	9.26	83	843333	104.8637	ug/L	99
34) 1-Bromopropane	9.39	122	109496	101.0518	ug/L	98
35) Bromochloromethane	9.48	130	348028	105.0319	ug/L	99
36) Tetrahydrofuran	9.50	42	358633	181.8616	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	776308	108.4599	ug/L	100
39) Cyclohexane	9.79	56	1081578	107.4665	ug/L	98
40) 1,1-Dichloropropene	9.95	75	677069	107.9320	ug/L	100
41) Carbon Tetrachloride	10.09	117	688454	111.2083	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	2515859	183.2282	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17714.D 8260WT.M Tue Apr 25 14:18:37 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

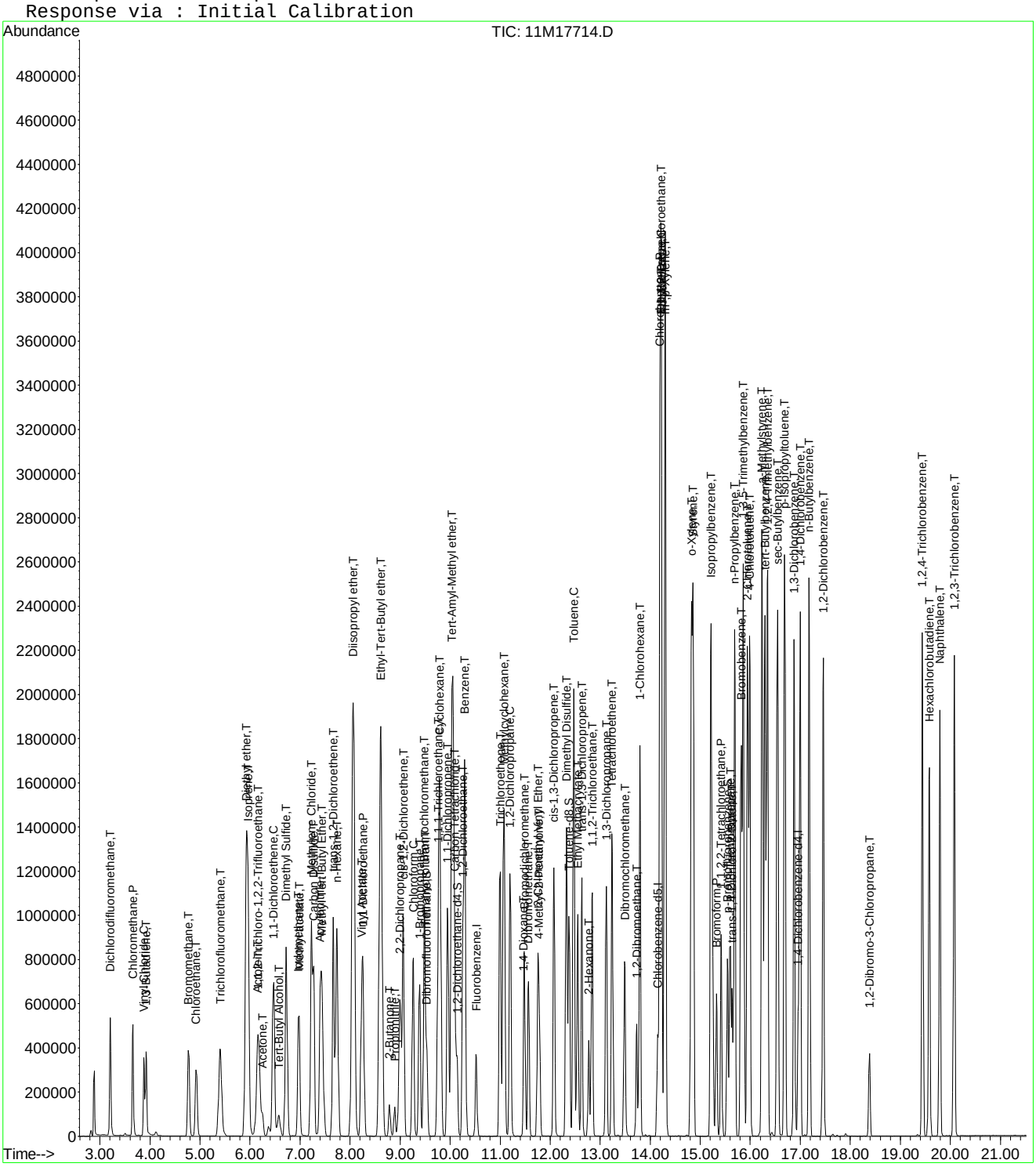
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	703902	101.6171	ug/L	99
45)	Benzene	10.29	78	1772720	91.2179	ug/L	96
46)	Trichloroethene	11.00	130	526193	103.2959	ug/L	99
47)	Methylcyclohexane	11.07	83	864734	110.7210	ug/L	98
48)	1,2-Dichloropropane	11.20	63	621334	102.7270	ug/L	98
49)	1,4-Dioxane	11.47	88	21847	399.9864	ug/L	100
50)	Bromodichloromethane	11.49	83	666763	105.6636	ug/L	98
51)	Dibromomethane	11.56	93	305154	106.6549	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	360720	109.1595	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	219621	103.2101	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	801442	107.0456	ug/L	98
55)	Dimethyl Disulfide	12.32	79	507165	108.5307	ug/L	95
58)	Toluene	12.47	91	1805110	85.5381	ug/L	96
59)	Ethyl Methacrylate	12.55	69	643120	110.8835	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	711444	106.7986	ug/L	97
61)	1,1,2-Trichloroethane	12.84	97	452546	101.6585	ug/L	100
62)	2-Hexanone	12.77	43	372237	100.6483	ug/L	97
63)	1,3-Dichloropropane	13.12	76	735346	99.4578	ug/L	100
64)	Tetrachloroethene	13.23	164	452415	107.9998	ug/L	99
65)	Dibromochloromethane	13.49	129	551761	111.1755	ug/L	100
66)	1,2-Dibromoethane	13.73	107	420061	104.9675	ug/L	99
67)	1-Chlorohexane	13.79	91	683203	113.6048	ug/L	99
68)	Chlorobenzene	14.20	112	1245459	92.8061	ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.22	131	529238	105.9261	ug/L	100
70)	Ethylbenzene	14.22	106	752987	106.1040	ug/L	84
71)	m-,p-Xylene	14.30	106	1591790	187.4601	ug/L	88
72)	o-Xylene	14.83	106	889860	104.0064	ug/L	91
73)	Styrene	14.86	104	1397203	110.1805	ug/L	95
74)	Bromoform	15.32	173	396884	111.6013	ug/L	99
75)	Isopropylbenzene	15.22	105	1927342	92.3393	ug/L	93
77)	1,1,2,2-Tetrachloroethane	15.42	83	602015	103.6290	ug/L	98
79)	1,2,3-Trichloropropane	15.60	110	173318	104.1913	ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	189961	105.6135	ug/L	93
81)	n-Propylbenzene	15.69	91	2210569	85.3513	ug/L	91
82)	Bromobenzene	15.82	156	659931	104.7018	ug/L	97
83)	1,3,5-Trimethylbenzene	15.86	105	1716523	96.8764	ug/L	95
84)	2-Chlorotoluene	15.94	91	1489900	84.7277	ug/L	94
85)	4-Chlorotoluene	15.99	91	1468871	92.5489	ug/L	94
86)	a-Methylstyrene	16.23	118	1076353	110.2184	ug/L	98
87)	tert-Butylbenzene	16.30	134	455630	105.7654	ug/L	90
88)	1,2,4-Trimethylbenzene	16.35	105	1743485	94.0832	ug/L	93
89)	sec-Butylbenzene	16.54	105	2092627	89.4244	ug/L	93
90)	p-Isopropyltoluene	16.69	119	1832480	97.4543	ug/L	92
91)	1,3-Dichlorobenzene	16.87	146	1155639	103.0731	ug/L	96
92)	1,4-Dichlorobenzene	17.00	146	1147317	95.1495	ug/L	96
93)	n-Butylbenzene	17.17	91	1724933	102.8517	ug/L	94
94)	1,2-Dichlorobenzene	17.46	146	1140737	100.8284	ug/L	96
95)	1,2-Dibromo-3-Chloropropan	18.38	75	110832	108.7337	ug/L	100
96)	1,2,4-Trichlorobenzene	19.44	180	905719	111.5079	ug/L	97
97)	Hexachlorobutadiene	19.58	225	498992	115.8317	ug/L	100
98)	Naphthalene	19.79	128	1716856	94.7722	ug/L #	95
99)	1,2,3-Trichlorobenzene	20.08	180	886147	106.6393	ug/L	98

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17714.D 8260WT.M Tue Apr 25 14:18:38 2017 Page 3

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	441465	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	322306	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	194046	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	427205	97.6956 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 390.80%#		
43) 1,2-Dichloroethane-d4	10.14	65	489457	96.4538 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 385.80%#		
57) Toluene-d8	12.38	98	1472553	87.9891 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 351.96%#		
78) p-Bromofluorobenzene	15.54	95	652310	96.7169 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 386.88%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	1084654	199.6933 ug/L	97
3) Chloromethane	3.66	50	1072612	204.6696 ug/L	95
4) Vinyl Chloride	3.89	62	753560	198.8834 ug/L	94
5) 1,3-Butadiene	3.92	54	359863	195.2817 ug/L	97
6) Bromomethane	4.77	94	739600	189.0484 ug/L	99
7) Chloroethane	4.92	64	803022	204.6004 ug/L	99
8) Trichlorofluoromethane	5.40	101	1365610	206.3015 ug/L	99
9) Diethyl ether	5.91	59	1781	0.3636 ug/L #	1
10) Isoprene	5.96	67	1461947	213.1826 ug/L	99
11) Acrolein	6.16	56	214	0.2747 ug/L #	1
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	830314	211.8030 ug/L	100
13) Acetone	6.26	43	298659	202.3322 ug/L	99
14) 1,1-Dichloroethene	6.47	61	1526824	193.6605 ug/L	94
16) Dimethyl Sulfide	6.72	62	1192801	192.5864 ug/L	99
17) Iodomethane	6.97	142	1114937	202.3300 ug/L	97
18) Methyl acetate	6.98	43	891475	191.4885 ug/L	98
19) Methylene Chloride	7.23	84	984822	187.2173 ug/L	92
20) Carbon Disulfide	7.27	76	2316195	171.8233 ug/L	94
21) Acrylonitrile	7.43	53	29726	13.6350 ug/L #	29
22) Methyl Tert Butyl Ether	7.43	73	2477296	188.0610 ug/L	96
23) trans-1,2-Dichloroethene	7.66	96	925607	192.9261 ug/L	94
24) n-Hexane	7.73	57	1547358	207.9469 ug/L	98
25) Diisopropyl ether	8.07	45	8775	0.4574 ug/L	86
26) Vinyl Acetate	8.23	43	1736893	193.9619 ug/L	96
27) 1,1-Dichloroethane	8.26	63	1814215	179.4055 ug/L	95
28) Ethyl-Tert-Butyl ether	8.60	59	5748	0.3390 ug/L #	44
29) 2-Butanone	8.79	43	488651	202.5994 ug/L	99
31) 2,2-Dichloropropane	9.00	77	1243150	181.6148 ug/L	97
32) cis-1,2-Dichloroethene	9.07	96	1052119	195.4244 ug/L	95
33) Chloroform	9.26	83	1523744	190.3442 ug/L	95
34) 1-Bromopropane	9.39	122	216377	200.0929 ug/L	97
35) Bromochloromethane	9.48	130	668214	202.4251 ug/L	95
36) Tetrahydrofuran	9.51	42	6410	3.2628 ug/L	89
38) 1,1,1-Trichloroethane	9.76	97	1439508	201.8790 ug/L	98
39) Cyclohexane	9.79	56	1957676	195.2531 ug/L	95
40) 1,1-Dichloropropene	9.95	75	1233925	197.4457 ug/L	96
41) Carbon Tetrachloride	10.09	117	1293444	209.7256 ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3290	0.2405 ug/L #	71
44) 1,2-Dichloroethane	10.26	62	1275072	184.7698 ug/L	95
45) Benzene	10.29	78	2884485	148.9876 ug/L	87

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

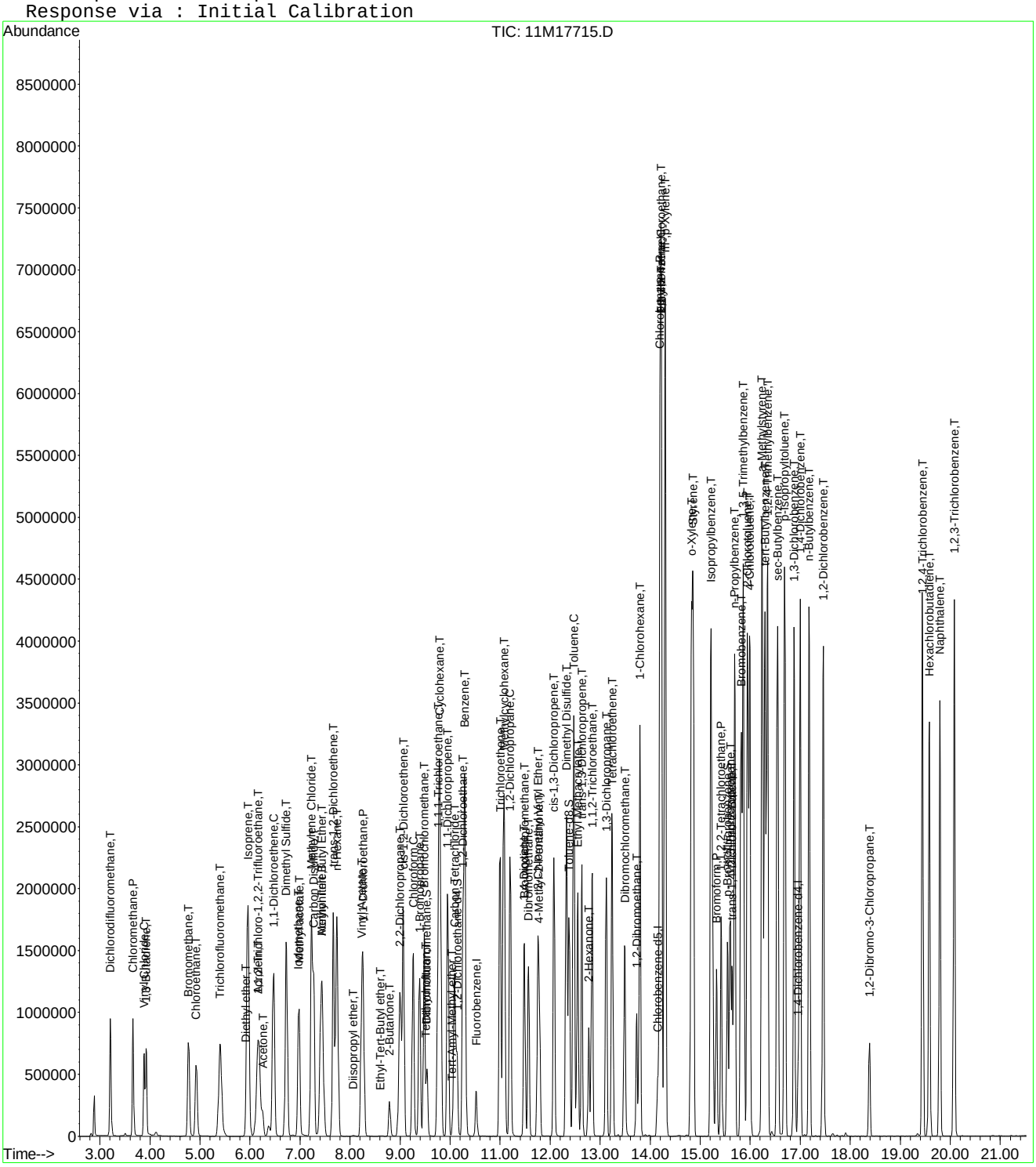
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
46)	Trichloroethene	11.00	130	991682	195.4125	ug/L		99
47)	Methylcyclohexane	11.07	83	1584915	203.7020	ug/L		98
48)	1,2-Dichloropropane	11.20	63	1154133	191.5390	ug/L		95
49)	1,4-Dioxane	11.48	88	1253	23.0275	ug/L	#	12
50)	Bromodichloromethane	11.49	83	1250957	198.9932	ug/L		96
51)	Dibromomethane	11.57	93	590911	207.3126	ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	700959	212.9246	ug/L		97
53)	4-Methyl-2-Pentanone	11.78	58	447607	211.1480	ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1441762	193.3001	ug/L		93
55)	Dimethyl Disulfide	12.33	79	980586	210.6351	ug/L		87
58)	Toluene	12.47	91	2836194	135.9144	ug/L		89
59)	Ethyl Methacrylate	12.55	69	1220047	212.7281	ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1297661	196.9969	ug/L		93
61)	1,1,2-Trichloroethane	12.84	97	863979	196.2716	ug/L		99
62)	2-Hexanone	12.77	43	746111	204.0158	ug/L		96
63)	1,3-Dichloropropane	13.12	76	1337916	182.9992	ug/L		97
64)	Tetrachloroethene	13.25	164	860212	207.6657	ug/L		99
65)	Dibromochloromethane	13.49	129	1052649	214.4940	ug/L		98
66)	1,2-Dibromoethane	13.73	107	824035	208.2388	ug/L		100
67)	1-Chlorohexane	13.79	91	1263938	212.5425	ug/L		100
68)	Chlorobenzene	14.20	112	2075953	156.4364	ug/L		87
69)	1,1,1,2-Tetrachloroethane	14.22	131	1000940	202.5970	ug/L		99
70)	Ethylbenzene	14.22	106	1371668	195.4640	ug/L		64
71)	m-,p-Xylene	14.30	106	2554712	304.2555	ug/L		75
72)	o-Xylene	14.83	106	1603783	189.5646	ug/L		78
73)	Styrene	14.86	104	2329255	185.7528	ug/L		85
74)	Bromoform	15.32	173	812860	231.1504	ug/L		97
75)	Isopropylbenzene	15.22	105	3024104	146.5203	ug/L		82
77)	1,1,2,2-Tetrachloroethane	15.42	83	1131498	185.4819	ug/L		96
79)	1,2,3-Trichloropropane	15.60	110	352057	201.5462	ug/L		94
80)	trans-1,4-Dichloro-2-Buten	15.63	53	395069	209.1712	ug/L		86
81)	n-Propylbenzene	15.69	91	3379886	124.2744	ug/L	#	78
82)	Bromobenzene	15.82	156	1242817	187.7744	ug/L		94
83)	1,3,5-Trimethylbenzene	15.86	105	2753405	147.9831	ug/L		86
84)	2-Chlorotoluene	15.94	91	2376893	128.7217	ug/L		82
85)	4-Chlorotoluene	15.99	91	2342047m	140.5261	ug/L		
86)	a-Methylstyrene	16.23	118	1883116	183.6328	ug/L		90
87)	tert-Butylbenzene	16.30	134	872813	192.9418	ug/L		76
88)	1,2,4-Trimethylbenzene	16.35	105	2762633	141.9681	ug/L		81
89)	sec-Butylbenzene	16.54	105	3225671	131.2678	ug/L	#	80
90)	p-Isopropyltoluene	16.69	119	2869693	145.3352	ug/L		81
91)	1,3-Dichlorobenzene	16.87	146	1985905	168.6768	ug/L		87
92)	1,4-Dichlorobenzene	17.00	146	1965623	155.2376	ug/L		88
93)	n-Butylbenzene	17.17	91	2713386	154.0723	ug/L	#	83
94)	1,2-Dichlorobenzene	17.46	146	1953869	164.4624	ug/L		89
95)	1,2-Dibromo-3-Chloropropan	18.38	75	232153	216.8937	ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	1657477	194.3271	ug/L		89
97)	Hexachlorobutadiene	19.58	225	977238	216.0270	ug/L		99
98)	Naphthalene	19.79	128	2796411	147.0016	ug/L	#	84
99)	1,2,3-Trichlorobenzene	20.08	180	1654465	189.6020	ug/L		90

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

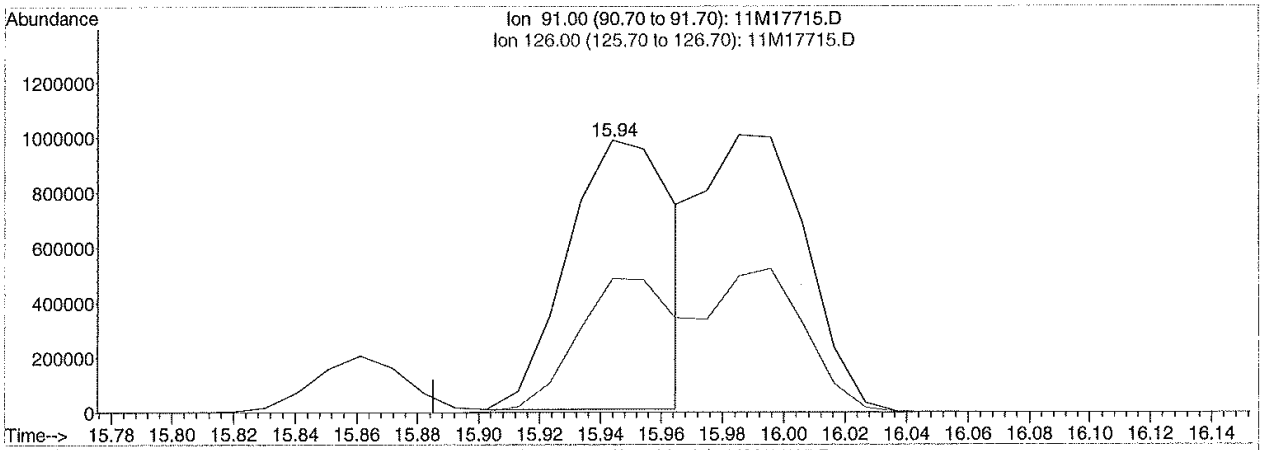
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

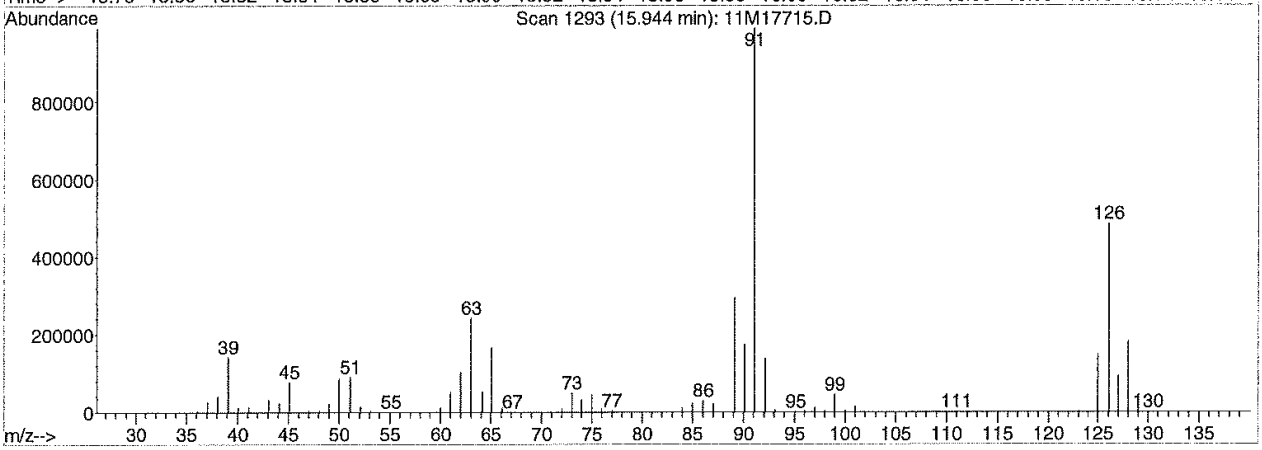


Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:55 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17715.D

(85) 4-Chlorotoluene (T)

15.94min 142.76ug/L

response 2376893

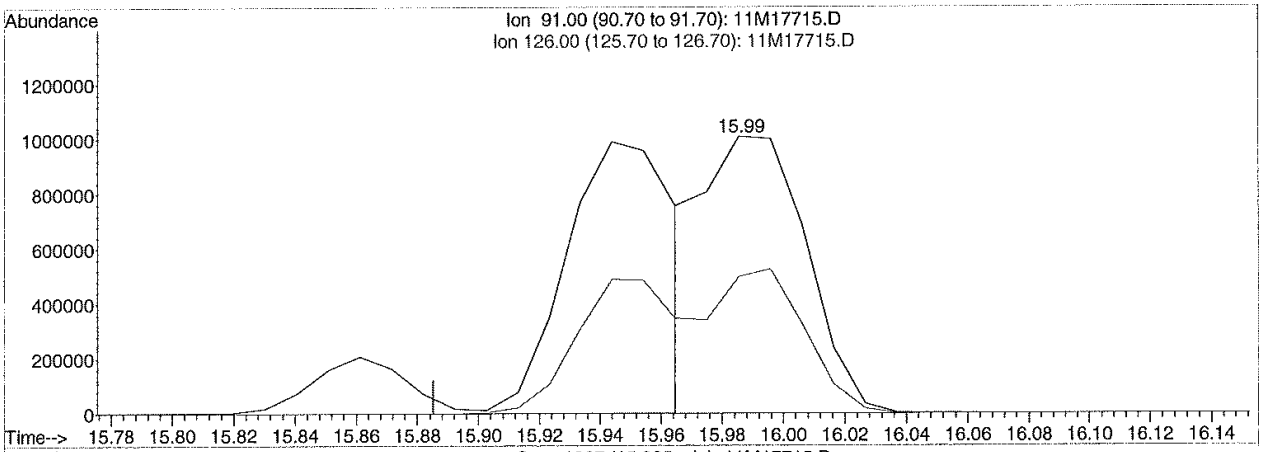
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	54.18#
0.00	0.00	0.00
0.00	0.00	0.00

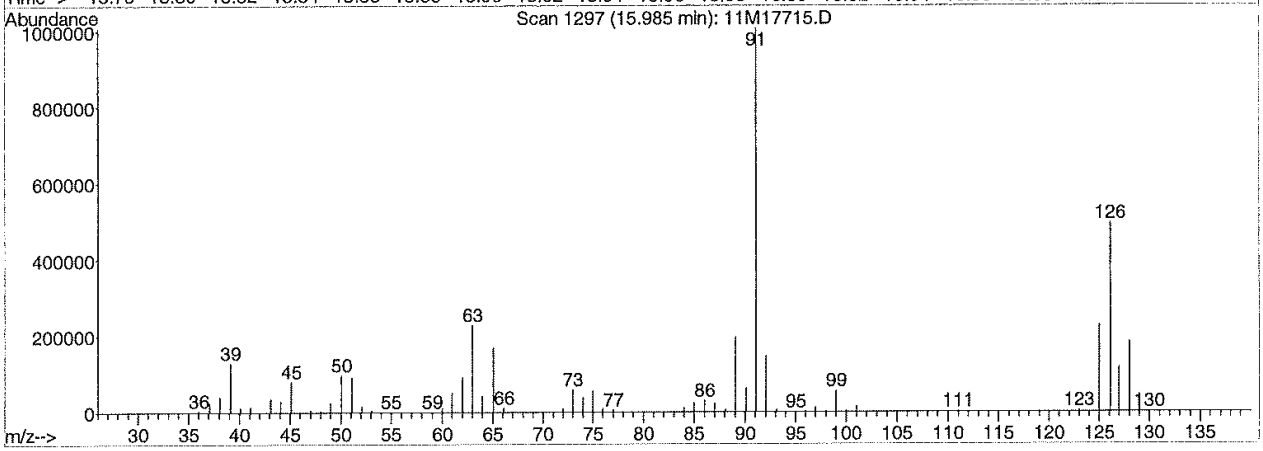
11M17715.D 8260WT.M Tue Apr 25 12:01:28 2017

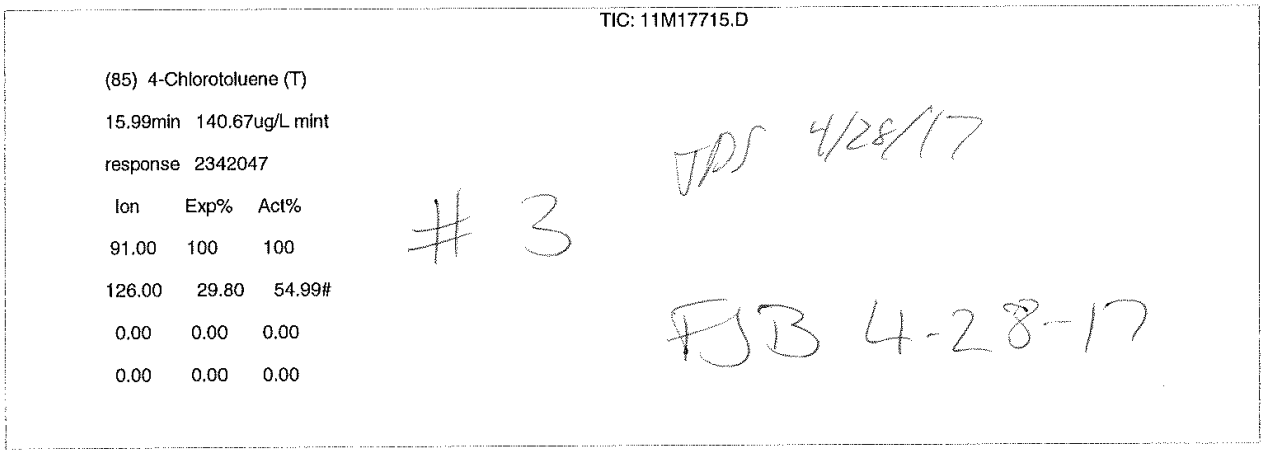
Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:01 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration







11M17715.D 8260WT.M Tue Apr 25 12:01:47 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	429502	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	318865	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	200748	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	10.13	65	920	0.1863	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.76%#		
57) Toluene-d8	12.38	98	3446	0.2081	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.84%#		
78) p-Bromofluorobenzene	15.54	95	4319	0.6190	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.48%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1487704	281.4427	ug/L	94
3) Chloromethane	3.65	50	1480946	290.7743	ug/L	90
4) Vinyl Chloride	3.88	62	935582	253.8011	ug/L	92
5) 1,3-Butadiene	3.92	54	492171	305.3526	ug/L	98
6) Bromomethane	4.76	94	1056026	277.4481	ug/L	99
7) Chloroethane	4.91	64	1133716	296.9029	ug/L	97
8) Trichlorofluoromethane	5.40	101	1922550	298.5276	ug/L	98
9) Diethyl ether	5.91	59	1328532	278.7605	ug/L	98
10) Isoprene	5.96	67	2048327	307.0085	ug/L	100
11) Acrolein	6.15	56	114318	150.8053	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	1203713	315.6049	ug/L	100
13) Acetone	6.25	43	420970	293.1377	ug/L	98
14) 1,1-Dichloroethene	6.46	61	2091321	272.6490	ug/L	91
15) Tert-Butyl Alcohol	6.59	59	366938	683.1333	ug/L	97
16) Dimethyl Sulfide	6.72	62	1656354	274.8792	ug/L	98
17) Iodomethane	6.97	142	1542193	287.1503	ug/L	95
18) Methyl acetate	6.98	43	1256510	277.4153	ug/L	96
19) Methylene Chloride	7.23	84	1370000	267.6948	ug/L	87
20) Carbon Disulfide	7.27	76	3008057	229.3634	ug/L #	89
21) Acrylonitrile	7.40	53	351015	165.4910	ug/L	95
22) Methyl Tert Butyl Ether	7.43	73	3363996	262.4868	ug/L	92
23) trans-1,2-Dichloroethene	7.66	96	1305110	279.6035	ug/L	89
24) n-Hexane	7.73	57	2144691	296.2494	ug/L	96
25) Diisopropyl ether	8.07	45	4262729	228.3981	ug/L	89
26) Vinyl Acetate	8.22	43	2303029	264.3467	ug/L	93
27) 1,1-Dichloroethane	8.26	63	2412009	245.1642	ug/L	91
28) Ethyl-Tert-Butyl ether	8.61	59	3953810	239.6677	ug/L	89
29) 2-Butanone	8.79	43	710548	302.8056	ug/L	97
30) Propionitrile	8.89	54	247789	316.5371	ug/L	98
31) 2,2-Dichloropropane	9.00	77	1720909	258.4143	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	1463102	279.3312	ug/L	92
33) Chloroform	9.25	83	2060764	264.6739	ug/L	93
34) 1-Bromopropane	9.39	122	315354	299.5645	ug/L	96
35) Bromochloromethane	9.48	130	952566	296.6026	ug/L	92
36) Tetrahydrofuran	9.50	42	517016	270.5002	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	1972168	284.2838	ug/L	95
39) Cyclohexane	9.79	56	2655757	272.2554	ug/L	92
40) 1,1-Dichloropropene	9.95	75	1701002	279.7660	ug/L	93
41) Carbon Tetrachloride	10.09	117	1783305	297.2081	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3323784	249.7535	ug/L	93

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

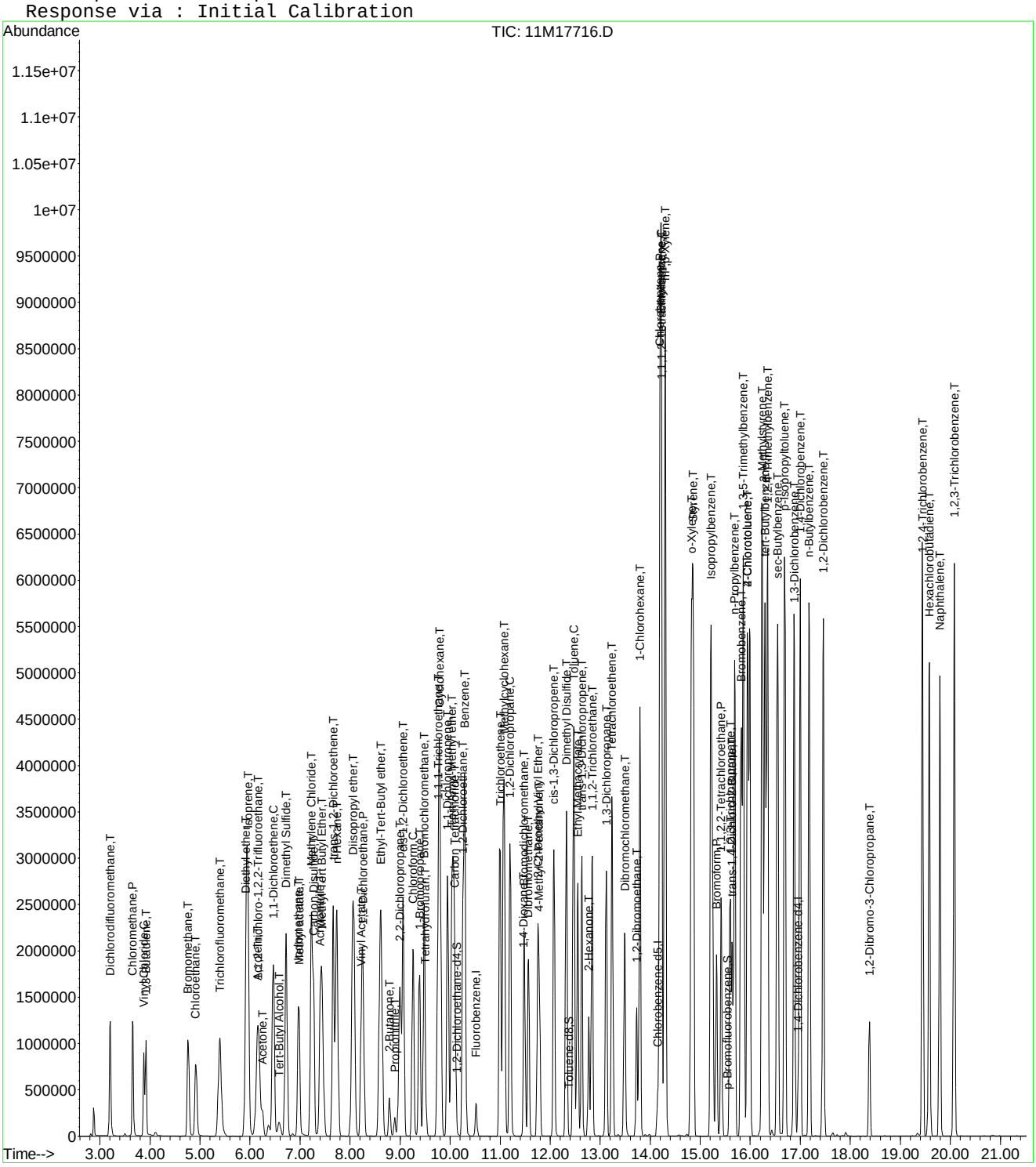
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	1710065	254.7064 ug/L		91
45)	Benzene	10.29	78	3603219	191.2950 ug/L	#	80
46)	Trichloroethene	11.00	130	1366450	276.7609 ug/L		100
47)	Methylcyclohexane	11.07	83	2196028	290.1071 ug/L		97
48)	1,2-Dichloropropane	11.20	63	1593531	271.8272 ug/L		92
49)	1,4-Dioxane	11.47	88	38383	725.0453 ug/L		100
50)	Bromodichloromethane	11.48	83	1718011	280.9007 ug/L		93
51)	Dibromomethane	11.56	93	835997	301.4668 ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	1008145	314.7656 ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	661993	320.9775 ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1929512	265.8993 ug/L	#	88
55)	Dimethyl Disulfide	12.32	79	1370273	302.5404 ug/L		78
58)	Toluene	12.47	91	3489025	169.0032 ug/L		85
59)	Ethyl Methacrylate	12.55	69	1689598	297.7784 ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1741147	267.1745 ug/L		88
61)	1,1,2-Trichloroethane	12.84	97	1214759	278.9368 ug/L		98
62)	2-Hexanone	12.77	43	1066539	294.7804 ug/L		93
63)	1,3-Dichloropropane	13.12	76	1799199	248.7488 ug/L		96
64)	Tetrachloroethene	13.23	164	1207755	294.7132 ug/L		98
65)	Dibromochloromethane	13.49	129	1478641	304.5480 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1164847	297.5407 ug/L		99
67)	1-Chlorohexane	13.79	91	1750520	297.5423 ug/L		99
68)	Chlorobenzene	14.20	112	2641462	201.1992 ug/L		80
69)	1,1,1,2-Tetrachloroethane	14.23	131	1406828	287.8244 ug/L		99
70)	Ethylbenzene	14.22	106	1848656	266.2781 ug/L		53
71)	m-,p-Xylene	14.30	106	3154067	379.6898 ug/L		70
72)	o-Xylene	14.83	106	2131378	254.6441 ug/L		71
73)	Styrene	14.86	104	2958704	238.4962 ug/L		78
74)	Bromoform	15.32	173	1167450	335.5665 ug/L		94
75)	Isopropylbenzene	15.22	105	3705942	181.4936 ug/L	#	73
77)	1,1,2,2-Tetrachloroethane	15.42	83	1605655	254.4213 ug/L		93
79)	1,2,3-Trichloropropane	15.60	110	526530	291.3655 ug/L		92
80)	trans-1,4-Dichloro-2-Buten	15.63	53	599834	306.9824 ug/L		82
81)	n-Propylbenzene	15.69	91	4071066	144.6909 ug/L	#	68
82)	Bromobenzene	15.82	156	1701392	248.4775 ug/L		92
83)	1,3,5-Trimethylbenzene	15.86	105	3402009	176.7384 ug/L		81
84)	2-Chlorotoluene	15.94	91	2879340	150.7262 ug/L	#	70
85)	4-Chlorotoluene	15.94	91	2879340	166.9966 ug/L	#	42
86)	a-Methylstyrene	16.24	118	2469841	232.8068 ug/L		85
87)	tert-Butylbenzene	16.30	134	1242715	265.5401 ug/L		65
88)	1,2,4-Trimethylbenzene	16.35	105	3404948	169.1342 ug/L		72
89)	sec-Butylbenzene	16.54	105	3933155	154.7151 ug/L	#	71
90)	p-Isopropyltoluene	16.69	119	3530046	172.8101 ug/L	#	71
91)	1,3-Dichlorobenzene	16.88	146	2590010	212.6434 ug/L		80
92)	1,4-Dichlorobenzene	17.00	146	2551626	194.7903 ug/L		81
93)	n-Butylbenzene	17.17	91	3379892	185.5108 ug/L	#	74
94)	1,2-Dichlorobenzene	17.46	146	2581451	210.0335 ug/L		81
95)	1,2-Dibromo-3-Chloropropan	18.38	75	382233	345.1869 ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	2249860	254.9734 ug/L		82
97)	Hexachlorobutadiene	19.58	225	1458179	311.5817 ug/L		96
98)	Naphthalene	19.79	128	3489261	177.2997 ug/L	#	73
99)	1,2,3-Trichlorobenzene	20.08	180	2249648	249.2030 ug/L		84

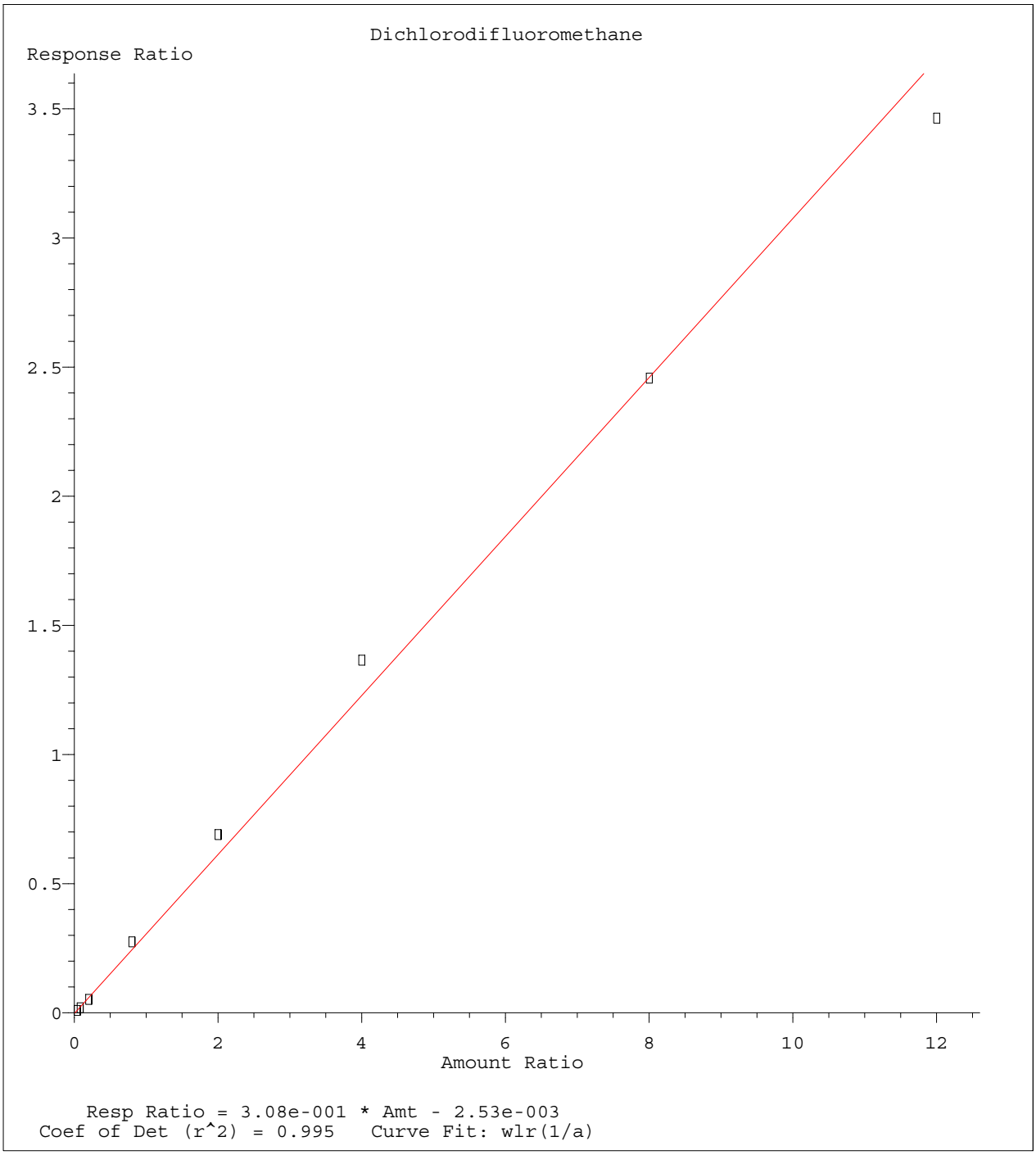
(#) = qualifier out of range (m) = manual integration
11M17716.D 8260WT.M Tue Apr 25 14:19:05 2017 Page 2

Quantitation Report (Not Reviewed)

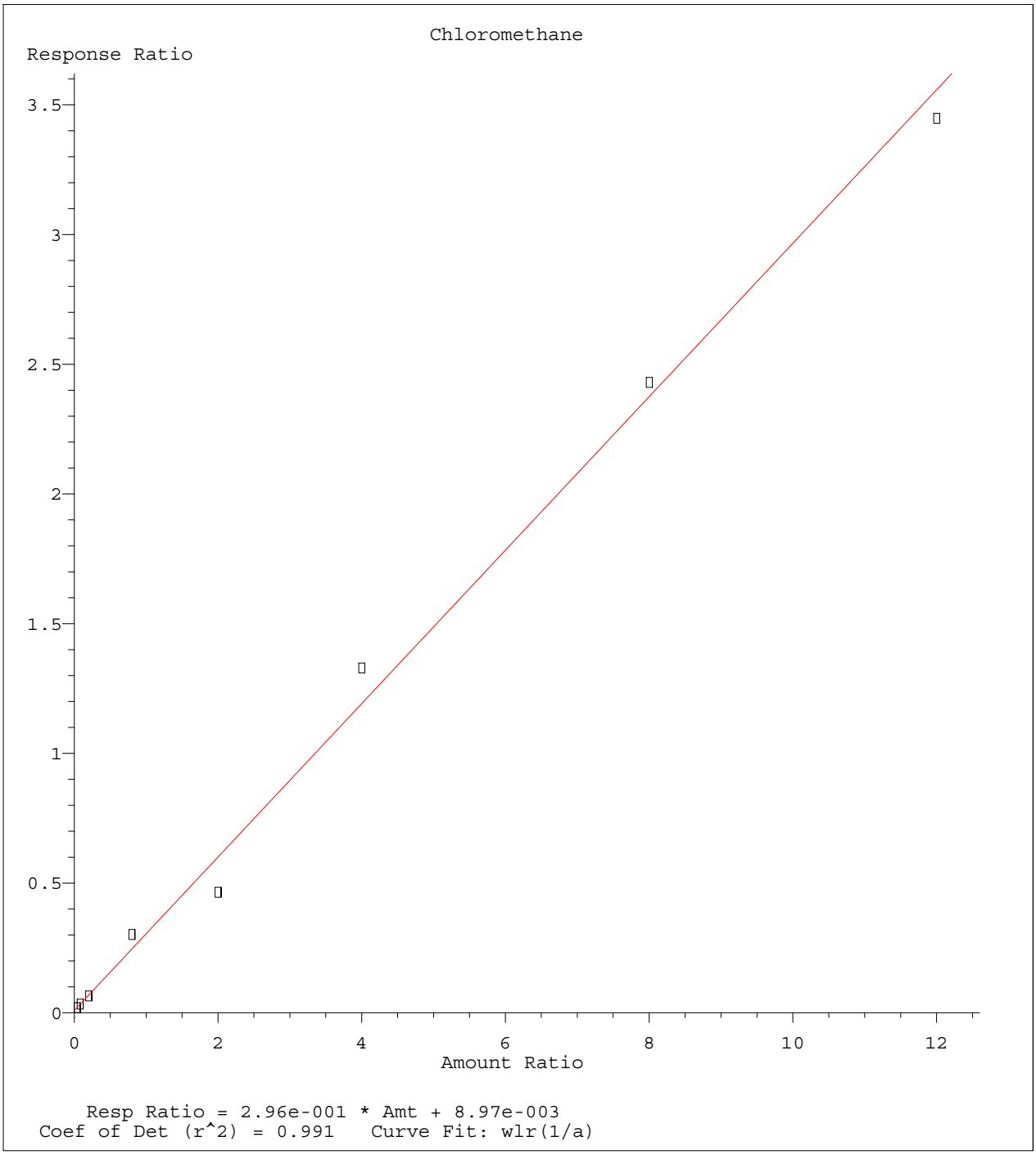
Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

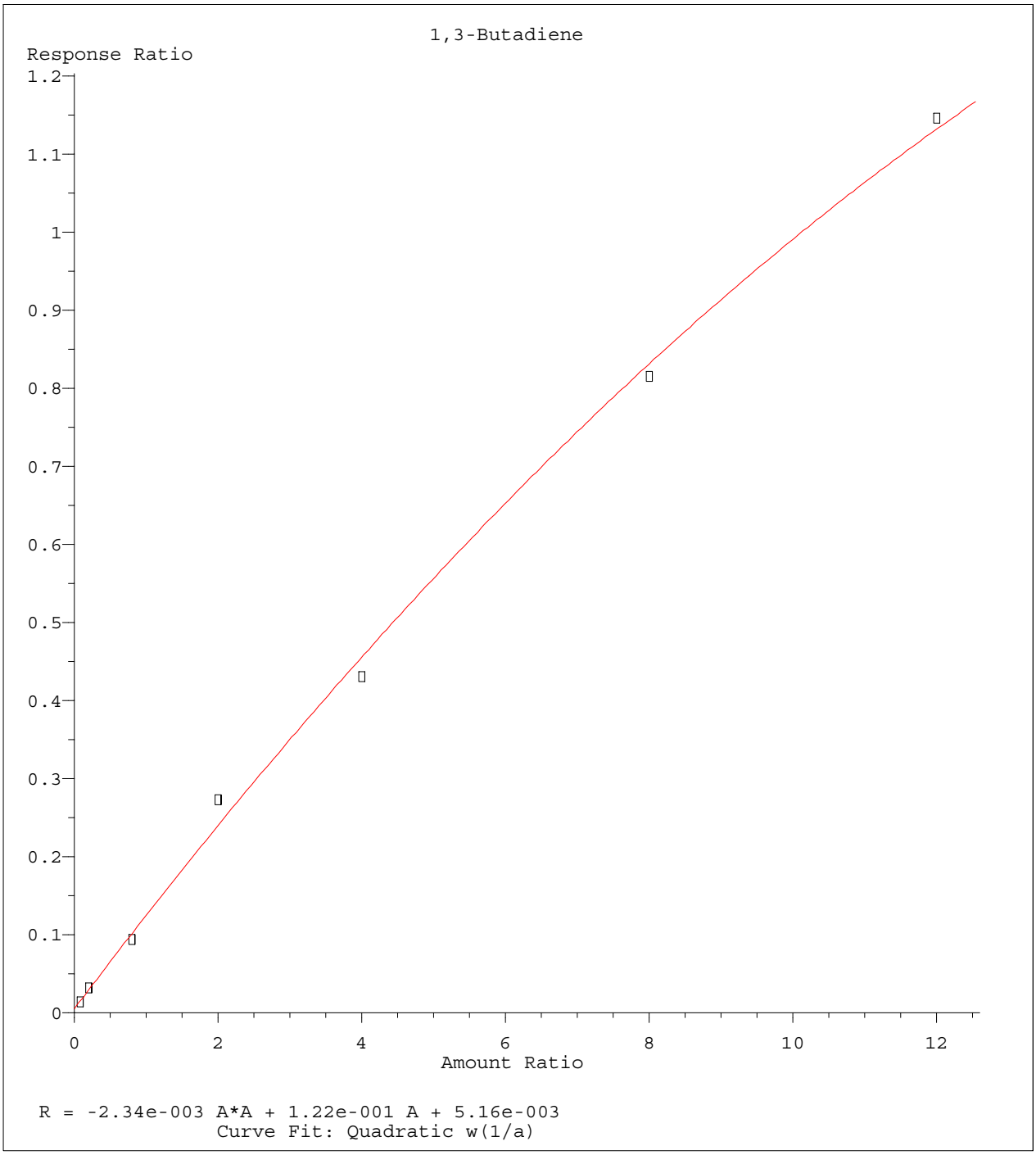




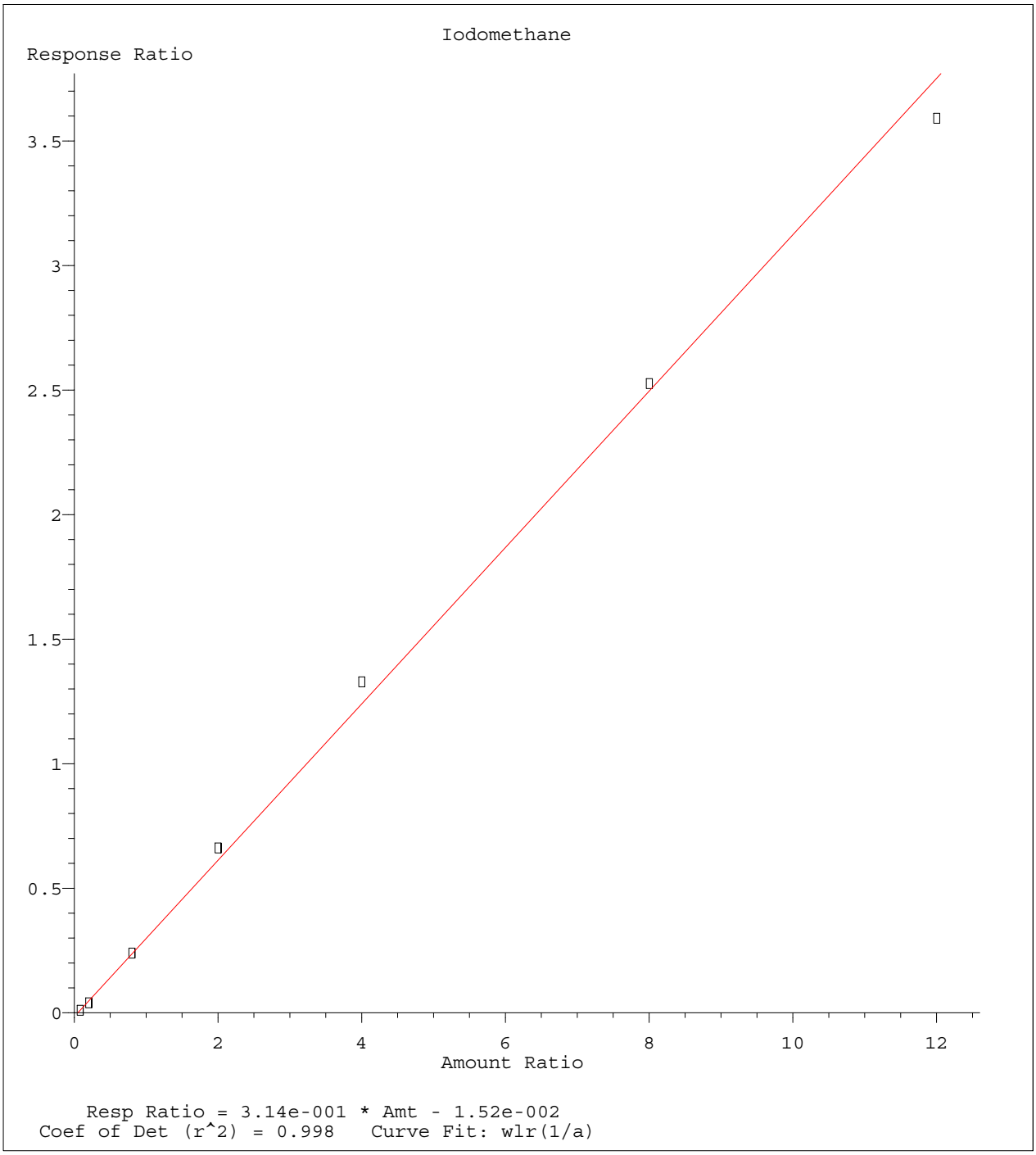
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



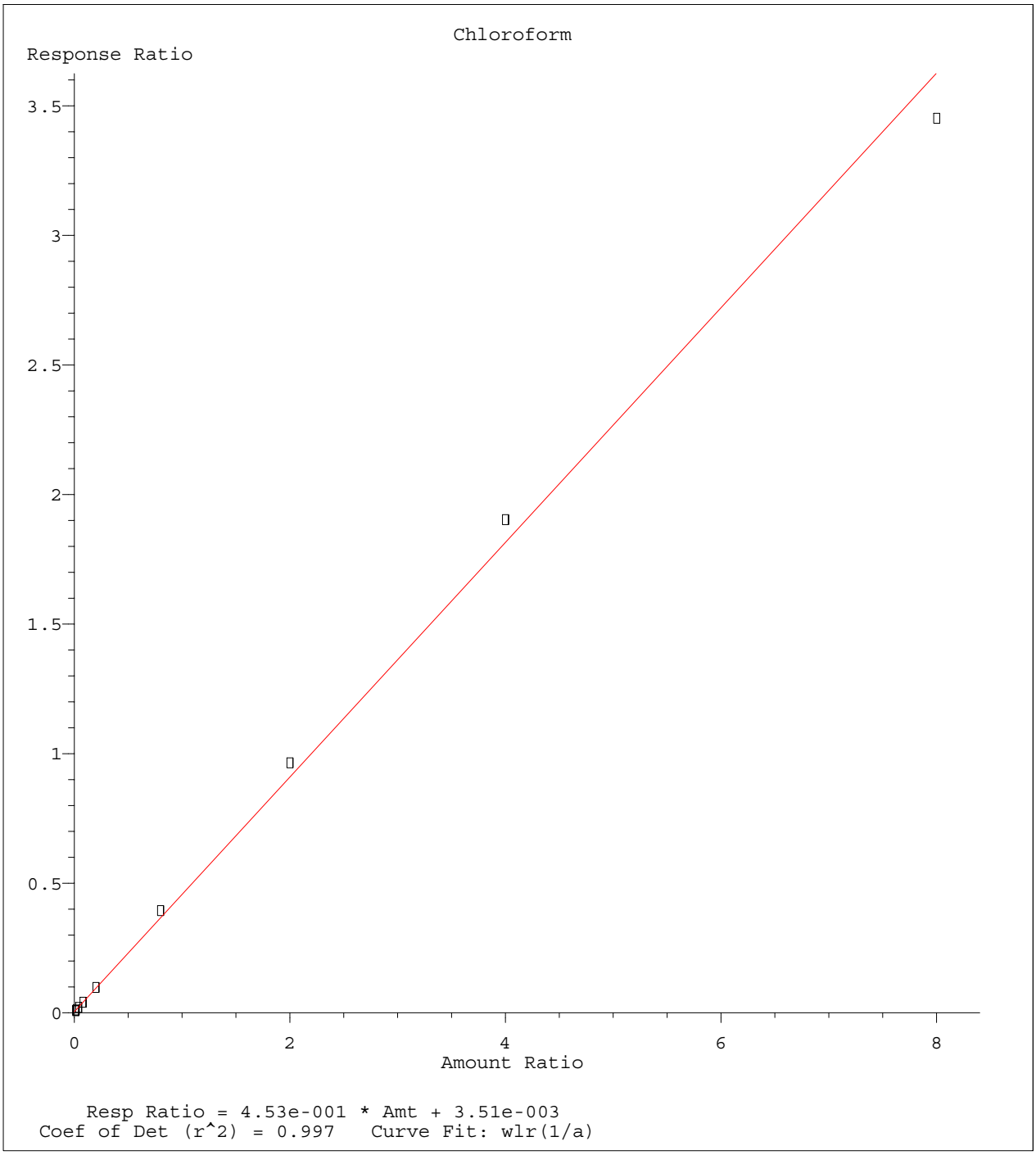
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



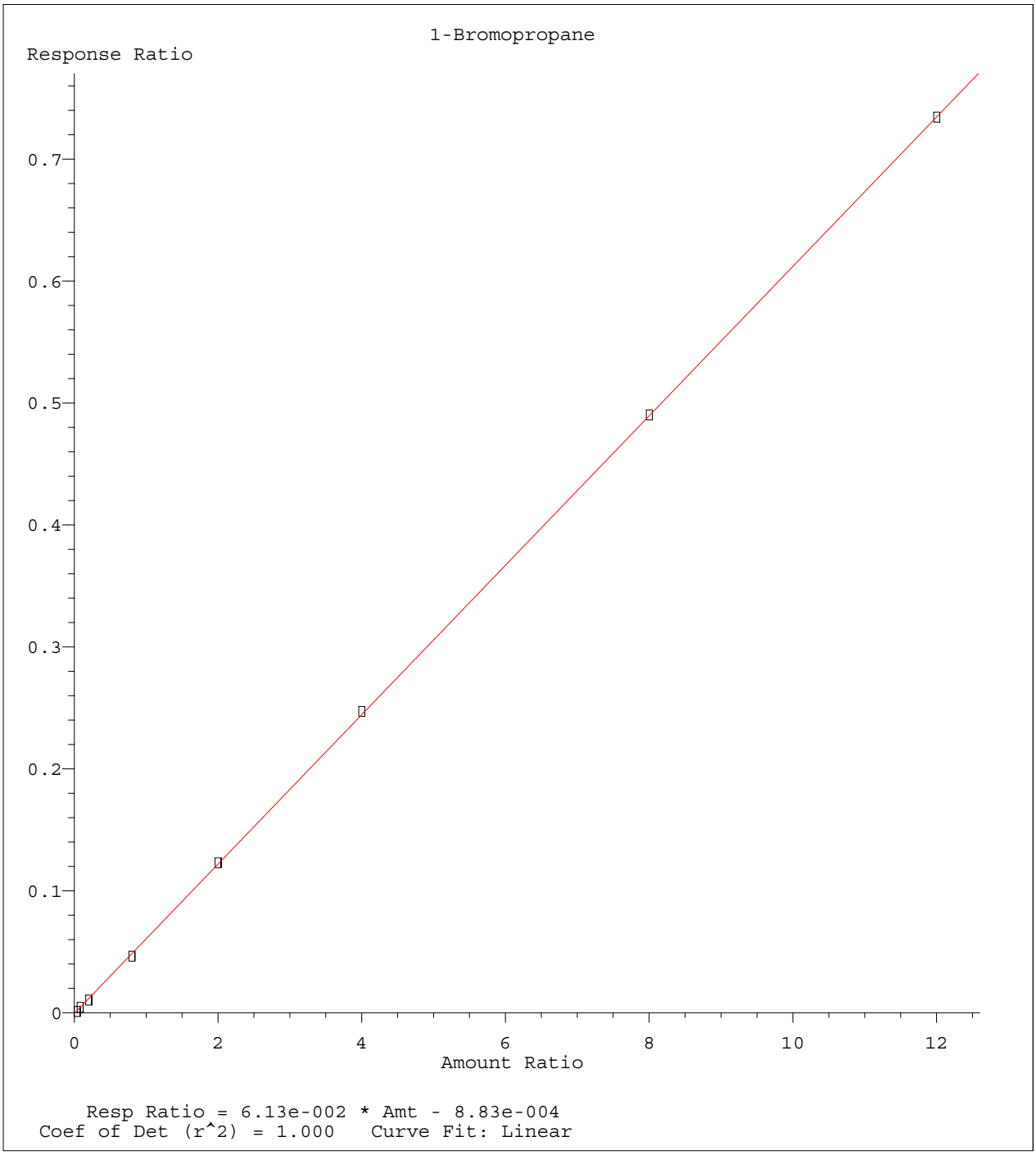
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	404778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	296292	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	174279	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	102600	25.5897	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.36%			
43) 1,2-Dichloroethane-d4	10.14	65	115358	24.7932	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.16%			
57) Toluene-d8	12.38	98	408420	26.5469	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%			
78) p-Bromofluorobenzene	15.54	95	155220	25.6245	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	321438	63.6532	ug/L	100
3) Chloromethane	3.66	50	314119	64.5824	ug/L	99
4) Vinyl Chloride	3.89	62	181213	52.1614	ug/L	100
5) 1,3-Butadiene	3.93	54	123931	71.8739	ug/L	99
6) Bromomethane	4.77	94	183192	51.0695	ug/L	100
7) Chloroethane	4.92	64	212398	59.0213	ug/L	100
8) Trichlorofluoromethane	5.40	101	335310	55.2461	ug/L	100
9) Diethyl ether	5.92	59	429716	95.6729	ug/L	99
10) Isoprene	5.96	67	323465	51.4431	ug/L	97
11) Acrolein	6.16	56	75414	105.5607	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	211256	58.7730	ug/L	99
13) Acetone	6.26	43	65342	48.2793	ug/L	98
14) 1,1-Dichloroethene	6.46	61	345883	47.8477	ug/L	100
15) Tert-Butyl Alcohol	6.59	59	109193	215.7028	ug/L	98
16) Dimethyl Sulfide	6.72	62	288119	50.7351	ug/L	98
17) Iodomethane	6.97	142	222809	43.3262	ug/L	100
18) Methyl acetate	6.99	43	188374	44.1300	ug/L	98
19) Methylene Chloride	7.23	84	226129	46.8839	ug/L	98
20) Carbon Disulfide	7.27	76	495160	40.0619	ug/L	99
21) Acrylonitrile	7.40	53	99809	49.9306	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	612436	50.7062	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	215317	48.9466	ug/L	100
24) n-Hexane	7.73	57	327658	48.0244	ug/L	99
25) Diisopropyl ether	8.07	45	1754893	99.7708	ug/L	98
26) Vinyl Acetate	8.23	43	491772	59.8944	ug/L	100
27) 1,1-Dichloroethane	8.26	63	443691	47.8528	ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1500356	96.5020	ug/L	99
29) 2-Butanone	8.79	43	111441	50.3923	ug/L	99
30) Propionitrile	8.89	54	75625	102.5076	ug/L	100
31) 2,2-Dichloropropane	9.00	77	271137	43.2012	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	246617	49.9593	ug/L	98
33) Chloroform	9.26	83	383109	52.4059	ug/L	100
34) 1-Bromopropane	9.39	122	61677	62.4526	ug/L	99
35) Bromochloromethane	9.48	130	151874	50.1778	ug/L	97
36) Tetrahydrofuran	9.50	42	159523	88.5595	ug/L	98
38) 1,1,1-Trichloroethane	9.77	97	342769	52.4274	ug/L	98
39) Cyclohexane	9.79	56	420990	45.7940	ug/L	98
40) 1,1-Dichloropropene	9.95	75	291345	50.8447	ug/L	99
41) Carbon Tetrachloride	10.09	117	295888	52.3252	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1274020	101.5789	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

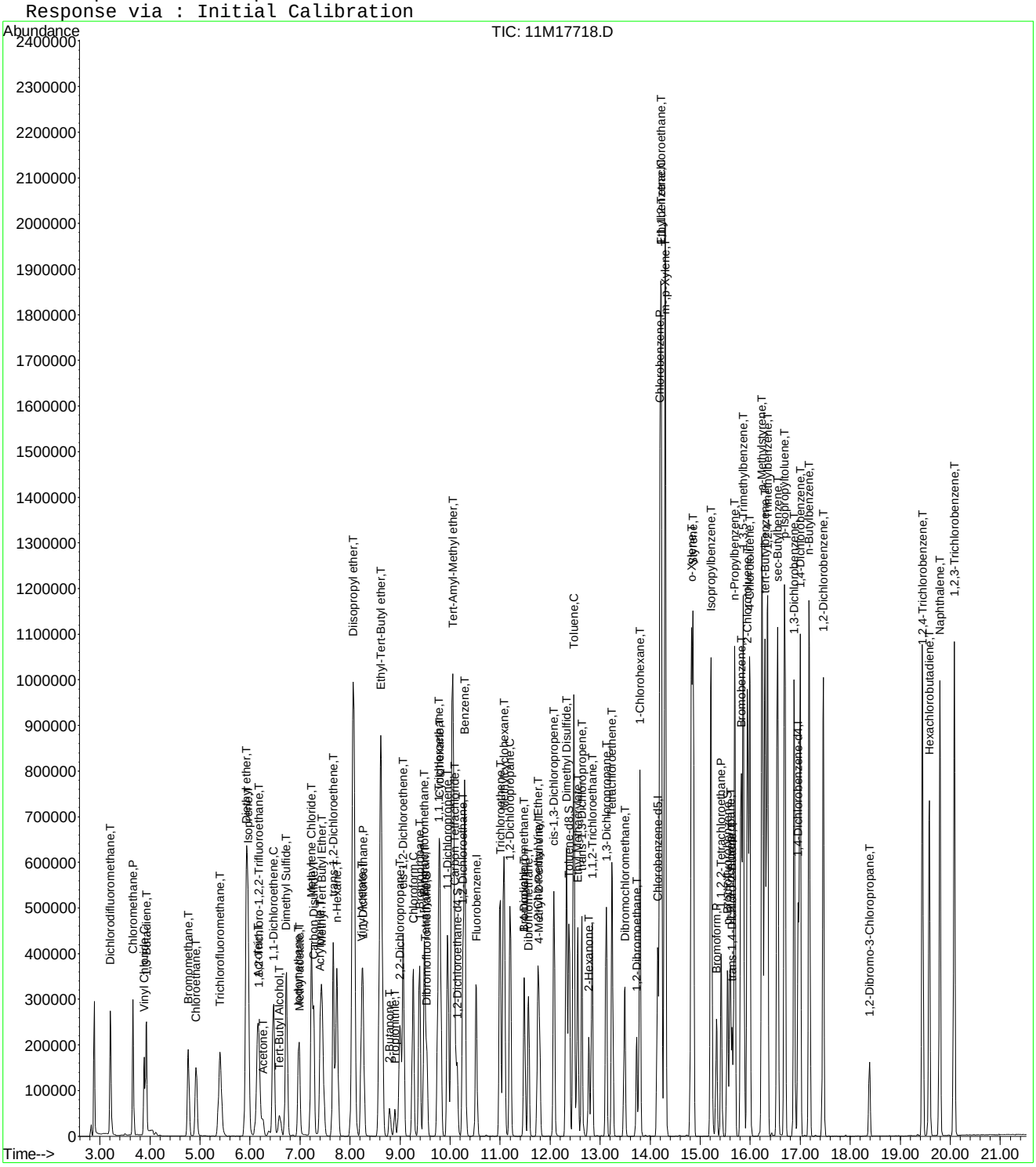
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	297642	47.0403	ug/L	99
45)	Benzene	10.29	78	857754	48.3197	ug/L	99
46)	Trichloroethene	11.00	130	228970	49.2082	ug/L	99
47)	Methylcyclohexane	11.07	83	365405	51.2204	ug/L	98
48)	1,2-Dichloropropane	11.20	63	268004	48.5090	ug/L	100
49)	1,4-Dioxane	11.48	88	11767	235.8524	ug/L	99
50)	Bromodichloromethane	11.48	83	285760	49.5766	ug/L	100
51)	Dibromomethane	11.57	93	132263	50.6083	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	168900	55.9554	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	102676	52.8249	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	366912	53.6513	ug/L	100
55)	Dimethyl Disulfide	12.32	79	227275	53.2447	ug/L	99
58)	Toluene	12.47	91	900488	46.9414	ug/L	98
59)	Ethyl Methacrylate	12.55	69	307663	58.3542	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	303988	50.1999	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	194833	48.1466	ug/L	99
62)	2-Hexanone	12.77	43	182967	54.4229	ug/L	96
63)	1,3-Dichloropropane	13.12	76	338332	50.3398	ug/L	95
64)	Tetrachloroethene	13.23	164	200233	52.5828	ug/L	100
65)	Dibromochloromethane	13.49	129	229367	50.8406	ug/L	100
66)	1,2-Dibromoethane	13.73	107	180409	49.5933	ug/L	100
67)	1-Chlorohexane	13.79	91	319102	58.3711	ug/L	97
68)	Chlorobenzene	14.20	112	596714	48.9142	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	224771	49.4896	ug/L	100
70)	Ethylbenzene	14.22	106	341076	52.8710	ug/L	99
71)	m-,p-Xylene	14.30	106	782076	101.3197	ug/L	99
72)	o-Xylene	14.83	106	405843	52.1817	ug/L	99
73)	Styrene	14.86	104	667618	57.9155	ug/L	100
74)	Bromoform	15.32	173	162013	50.1161	ug/L	99
75)	Isopropylbenzene	15.22	105	948335	49.9817	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	269536	49.1954	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	77024	49.0961	ug/L	99
80)	trans-1,4-Dichloro-2-Buten	15.63	53	68075	40.1306	ug/L	82
81)	n-Propylbenzene	15.69	91	1116620	45.7135	ug/L	100
82)	Bromobenzene	15.82	156	297807	50.0984	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	842028	50.3881	ug/L	99
84)	2-Chlorotoluene	15.94	91	715077	43.1176	ug/L	89
85)	4-Chlorotoluene	15.99	91	744558	49.7920	ug/L	87
86)	a-Methylstyrene	16.23	118	539705	58.5989	ug/L	100
87)	tert-Butylbenzene	16.30	134	198172	48.7761	ug/L	98
88)	1,2,4-Trimethylbenzene	16.35	105	869183	49.7323	ug/L	100
89)	sec-Butylbenzene	16.54	105	1050045	47.5779	ug/L	100
90)	p-Isopropyltoluene	16.69	119	930341	52.4611	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	546568	51.6893	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	556363	48.9232	ug/L	99
93)	n-Butylbenzene	17.17	91	857941	54.0817	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	552370	51.7680	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	49841	51.8465	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	451948	58.9976	ug/L	100
97)	Hexachlorobutadiene	19.58	225	223584	55.0311	ug/L	98
98)	Naphthalene	19.79	128	955305	55.9143	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	445985	56.9069	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	0.2938	0.3971	-35.2#	105	0.00
3	P	Chloromethane	0.3458	0.3880	-12.2	152#	0.00
4	C	Vinyl Chloride	0.2146	0.2238	-4.3	90	0.00
5	T	1,3-Butadiene	0.1274	0.1531	-20.1	102	0.00
6	T	Bromomethane	0.2216	0.2263	-2.1	102	-0.01
7	T	Chloroethane	0.2223	0.2624	-18.0	102	-0.01
8	T	Trichlorofluoromethane	0.3749	0.4142	-10.5	94	-0.01
9	T	Diethyl ether	0.2774	0.2654	4.3	87	0.00
10	T	Isoprene	0.3883	0.3996	-2.9	84	-0.01
11	T	Acrolein	0.0441	0.0931	-111.1#	190#	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2610	-17.5	102	0.01
13	T	Acetone	0.0836	0.0807	3.4	90	0.00
14	C	1,1-Dichloroethene	0.4465	0.4273	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0337	-7.8	101	0.02
16	T	Dimethyl Sulfide	0.3507	0.3559	-1.5	89	-0.01
17	T	Iodomethane	0.2712	0.2752	-1.5	76	0.00
18	T	Methyl acetate	0.2636	0.2327	11.7	80	0.01
19	T	Methylene Chloride	0.2979	0.2793	6.2	85	0.00
20	T	Carbon Disulfide	0.7634	0.6116	19.9	69	-0.01
21	T	Acrylonitrile	0.1235	0.1233	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7565	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	0.2717	0.2660	2.1	88	-0.01
24	T	n-Hexane	0.4214	0.4047	4.0	80	0.00
25	T	Diisopropyl ether	1.0863	1.0839	0.2	91	0.00
26	T	Vinyl Acetate	0.5071	0.6075	-19.8	106	0.00
27	P	1,1-Dichloroethane	0.5727	0.5481	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	88	0.00
29	T	2-Butanone	0.1366	0.1377	-0.8	91	0.00
30	T	Propionitrile	0.0456	0.0467	-2.5	93	0.00
31	T	2,2-Dichloropropane	0.3876	0.3349	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.3046	0.1	87	-0.01
33	C	Chloroform	0.5272	0.4732	10.2	89	0.00
34	T	1-Bromopropane	0.0547	0.0762	-39.2#	113	0.00
35	T	Bromochloromethane	0.1869	0.1876	-0.4	87	0.00
36	T	Tetrahydrofuran	0.1113	0.0985	11.4	87	0.00
37	S	Dibromofluoromethane	0.2476	0.2535	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4234	-4.9	89	0.01
39	T	Cyclohexane	0.5678	0.5200	8.4	76	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3599	-1.7	88	0.00
41	T	Carbon Tetrachloride	0.3493	0.3655	-4.6	87	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7869	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	0.2874	0.2850	0.8	88	0.00
44	T	1,2-Dichloroethane	0.3908	0.3677	5.9	82	0.00
45	T	Benzene	1.0964	1.0595	3.4	89	0.00
46	T	Trichloroethene	0.2874	0.2828	1.6	86	0.00
47	T	Methylcyclohexane	0.4406	0.4514	-2.4	85	0.00
48	C	1,2-Dichloropropane	0.3412	0.3311	3.0	86	0.00
49	T	1,4-Dioxane	0.0031	0.0036	-17.9	110	0.01
50	T	Bromodichloromethane	0.3560	0.3530	0.8	85	-0.01
51	T	Dibromomethane	0.1614	0.1634	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.2086	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1268	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4532	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:52 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2807	-6.5	93	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	92	0.00
57	S	Toluene-d8	1.2981	1.3784	-6.2	93	0.00
58	C	Toluene	1.6186	1.5196	6.1	90	0.00
59	T	Ethyl Methacrylate	0.4449	0.5192	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5130	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3288	3.7	86	0.00
62	T	2-Hexanone	0.2837	0.3088	-8.8	99	0.00
63	T	1,3-Dichloropropane	0.5671	0.5709	-0.7	89	0.00
64	T	Tetrachloroethene	0.3213	0.3379	-5.2	90	0.00
65	T	Dibromochloromethane	0.3807	0.3871	-1.7	85	0.00
66	T	1,2-Dibromoethane	0.3069	0.3044	0.8	86	0.00
67	T	1-Chlorohexane	0.4613	0.5385	-16.7	96	0.00
68	P	Chlorobenzene	1.0293	1.0070	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3793	1.0	85	0.00
70	C	Ethylbenzene	0.5443	0.5756	-5.7	90	0.00
71	T	m-,p-Xylene	0.6513	0.6599	-1.3	91	0.00
72	T	o-Xylene	0.6562	0.6849	-4.4	90	0.00
73	T	Styrene	0.9726	1.1266	-15.8	92	0.00
74	P	Bromoform	0.2728	0.2734	-0.2	86	0.00
75	T	Isopropylbenzene	1.6009	1.6003	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7733	1.6	94	0.00
78	S	p-Bromofluorobenzene	0.8689	0.8906	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2210	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.1953	19.7	78	0.00
81	T	n-Propylbenzene	3.5039	3.2035	8.6	89	0.00
82	T	Bromobenzene	0.8527	0.8544	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4158	-0.8	92	0.00
84	T	2-Chlorotoluene	2.3790	2.0515	13.8	90	0.00
85	T	4-Chlorotoluene	2.1472	2.1361	0.5	94	0.00
86	T	a-Methylstyrene	1.3212	1.5484	-17.2	102	0.00
87	T	tert-Butylbenzene	0.5828	0.5686	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4937	0.5	92	0.00
89	T	sec-Butylbenzene	3.1659	3.0125	4.8	91	0.00
90	T	p-Isopropyltoluene	2.5439	2.6691	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5681	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5962	2.2	96	0.00
93	T	n-Butylbenzene	2.2689	2.4614	-8.5	94	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.5847	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1430	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2966	-18.0	101	0.00
97	T	Hexachlorobutadiene	0.5828	0.6414	-10.1	99	0.00
98	T	Naphthalene	2.4508	2.7407	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.2795	-13.8	104	0.00

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	50.0000	63.6532	-27.3#	105	0.00
3	P	Chloromethane	50.0000	64.5824	-29.2#	152	0.00
4	C	Vinyl Chloride	50.0000	52.1614	-4.3	90	0.00
5	T	1,3-Butadiene	50.0000	71.8739	-43.7#	102	0.00
6	T	Bromomethane	50.0000	51.0695	-2.1	102	-0.01
7	T	Chloroethane	50.0000	59.0213	-18.0	102	-0.01
8	T	Trichlorofluoromethane	50.0000	55.2461	-10.5	94	-0.01
9	T	Diethyl ether	100.0000	95.6729	4.3	87	0.00
10	T	Isoprene	50.0000	51.4430	-2.9	84	-0.01
11	T	Acrolein	50.0000	105.5607	-111.1#	190	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	58.7730	-17.5	102	0.01
13	T	Acetone	50.0000	48.2793	3.4	90	0.00
14	C	1,1-Dichloroethene	50.0000	47.8477	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	200.0000	215.7028	-7.9	101	0.02
16	T	Dimethyl Sulfide	50.0000	50.7351	-1.5	89	-0.01
17	T	Iodomethane	50.0000	43.3262	13.3	76	0.00
18	T	Methyl acetate	50.0000	44.1300	11.7	80	0.01
19	T	Methylene Chloride	50.0000	46.8839	6.2	85	0.00
20	T	Carbon Disulfide	50.0000	40.0619	19.9	69	-0.01
21	T	Acrylonitrile	50.0000	49.9306	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.7062	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	50.0000	48.9466	2.1	88	-0.01
24	T	n-Hexane	50.0000	48.0244	4.0	80	0.00
25	T	Diisopropyl ether	100.0000	99.7708	0.2	91	0.00
26	T	Vinyl Acetate	50.0000	59.8944	-19.8	106	0.00
27	P	1,1-Dichloroethane	50.0000	47.8528	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5020	3.5	88	0.00
29	T	2-Butanone	50.0000	50.3923	-0.8	91	0.00
30	T	Propionitrile	100.0000	102.5076	-2.5	93	0.00
31	T	2,2-Dichloropropane	50.0000	43.2012	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	49.9593	0.1	87	-0.01
33	C	Chloroform	50.0000	52.4059	-4.8	89	0.00
34	T	1-Bromopropane	50.0000	62.4526	-24.9	113	0.00
35	T	Bromochloromethane	50.0000	50.1778	-0.4	87	0.00
36	T	Tetrahydrofuran	100.0000	88.5595	11.4	87	0.00
37	S	Dibromofluoromethane	25.0000	25.5897	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	50.0000	52.4274	-4.9	89	0.01
39	T	Cyclohexane	50.0000	45.7940	8.4	76	-0.01
40	T	1,1-Dichloropropene	50.0000	50.8447	-1.7	88	0.00
41	T	Carbon Tetrachloride	50.0000	52.3252	-4.7	87	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	101.5789	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.7932	0.8	88	0.00
44	T	1,2-Dichloroethane	50.0000	47.0403	5.9	82	0.00
45	T	Benzene	50.0000	48.3197	3.4	89	0.00
46	T	Trichloroethene	50.0000	49.2083	1.6	86	0.00
47	T	Methylcyclohexane	50.0000	51.2204	-2.4	85	0.00
48	C	1,2-Dichloropropane	50.0000	48.5090	3.0	86	0.00
49	T	1,4-Dioxane	200.0000	235.8524	-17.9	110	0.01
50	T	Bromodichloromethane	50.0000	49.5766	0.8	85	-0.01
51	T	Dibromomethane	50.0000	50.6083	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	50.0000	55.9554	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	50.0000	52.8249	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	53.6513	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:54 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	53.2447	-6.5	93	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	92	0.00
57	S	Toluene-d8	25.0000	26.5469	-6.2	93	0.00
58	C	Toluene	50.0000	46.9414	6.1	90	0.00
59	T	Ethyl Methacrylate	50.0000	58.3542	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	50.0000	50.1999	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	50.0000	48.1465	3.7	86	0.00
62	T	2-Hexanone	50.0000	54.4229	-8.8	99	0.00
63	T	1,3-Dichloropropane	50.0000	50.3398	-0.7	89	0.00
64	T	Tetrachloroethene	50.0000	52.5827	-5.2	90	0.00
65	T	Dibromochloromethane	50.0000	50.8406	-1.7	85	0.00
66	T	1,2-Dibromoethane	50.0000	49.5932	0.8	86	0.00
67	T	1-Chlorohexane	50.0000	58.3711	-16.7	96	0.00
68	P	Chlorobenzene	50.0000	48.9142	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	49.4896	1.0	85	0.00
70	C	Ethylbenzene	50.0000	52.8710	-5.7	90	0.00
71	T	m-,p-Xylene	100.0000	101.3197	-1.3	91	0.00
72	T	o-Xylene	50.0000	52.1817	-4.4	90	0.00
73	T	Styrene	50.0000	57.9155	-15.8	92	0.00
74	P	Bromoform	50.0000	50.1161	-0.2	86	0.00
75	T	Isopropylbenzene	50.0000	49.9817	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	49.1954	1.6	94	0.00
78	S	p-Bromofluorobenzene	25.0000	25.6245	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	50.0000	49.0961	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	40.1307	19.7	78	0.00
81	T	n-Propylbenzene	50.0000	45.7135	8.6	89	0.00
82	T	Bromobenzene	50.0000	50.0984	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3881	-0.8	92	0.00
84	T	2-Chlorotoluene	50.0000	43.1176	13.8	90	0.00
85	T	4-Chlorotoluene	50.0000	49.7920	0.4	94	0.00
86	T	a-Methylstyrene	50.0000	58.5989	-17.2	102	0.00
87	T	tert-Butylbenzene	50.0000	48.7761	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.7323	0.5	92	0.00
89	T	sec-Butylbenzene	50.0000	47.5780	4.8	91	0.00
90	T	p-Isopropyltoluene	50.0000	52.4611	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	50.0000	51.6893	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	50.0000	48.9232	2.2	96	0.00
93	T	n-Butylbenzene	50.0000	54.0817	-8.2	94	0.00
94	T	1,2-Dichlorobenzene	50.0000	51.7679	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	51.8465	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	58.9976	-18.0	101	0.00
97	T	Hexachlorobutadiene	50.0000	55.0311	-10.1	99	0.00
98	T	Naphthalene	50.0000	55.9143	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	56.9069	-13.8	104	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17718.D 8260WT.M Tue Apr 25 14:21:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	423656	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311145	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.956	65	238	0.0555	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.222%#		
47) Toluene-d8	6.815	98	3708	0.2388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.955%#		
66) p-Bromofluorobenzene	8.784	95	1270	0.2423	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.969%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	1386	0.2755	ug/L #	71
3) Chloromethane	1.215	50	1742	0.3538	ug/L	88
4) Vinyl Chloride	1.267	62	1689	0.3098	ug/L	88
5) 1,3-Butadiene	1.273	54	1144	0.3417	ug/L	97
6) Bromomethane	1.458	94	1616	0.3986	ug/L	94
7) Chloroethane	1.539	64	848	0.3278	ug/L #	77
8) Trichlorofluoromethane	1.626	101	2195	0.3138	ug/L	96
10) 1,1-Dichloroethene	1.962	61	2150	0.3285	ug/L	100
11) Carbon Disulfide	1.977	76	4627	0.3294	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	1335	0.3200	ug/L	97
13) Iodomethane	2.069	142	665	2.1023	ug/L	88
15) Methylene Chloride	2.405	84	1853	0.3732	ug/L	98
16) Acetone	2.463	43	744	0.8734	ug/L #	42
17) trans-1,2-Dichloroethene	2.544	96	1433	0.3216	ug/L	97
18) Methyl acetate	2.564	43	325	0.1455	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	3236	0.2862	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	2399	0.2998	ug/L #	88
23) cis-1,2-Dichloroethene	3.731	96	1523	0.3020	ug/L	99
24) 2,2-Dichloropropane	3.864	77	1041	0.4368	ug/L #	81
25) Cyclohexane	3.960	56	2117	0.3110	ug/L	93
26) Bromochloromethane	3.992	130	693	0.2132	ug/L	93
27) Chloroform	4.113	83	2418	0.2898	ug/L	97
28) Carbon Tetrachloride	4.252	117	1818	0.2755	ug/L #	92
30) 1,1,1-Trichloroethane	4.339	97	2183	0.2976	ug/L	95
31) 1,1-Dichloropropene	4.499	75	1767	0.3067	ug/L	94
32) 2-Butanone	4.542	43	223	0.1756	ug/L #	37
33) Benzene	4.803	78	5779	0.3202	ug/L	96
35) 1,2-Dichloroethane	5.028	62	1675	0.2981	ug/L #	83
36) Methylcyclohexane	5.422	83	2260	0.3169	ug/L	99
37) Trichloroethene	5.445	130	1637	0.3020	ug/L	99
38) Dibromomethane	5.862	93	745	0.2695	ug/L	97
39) 1,2-Dichloropropane	5.961	63	1450	0.3064	ug/L	87
40) Bromodichloromethane	6.050	83	1785	0.2826	ug/L	93
43) cis-1,3-Dichloropropene	6.647	75	1935	0.2719	ug/L	97
44) 4-Methyl-2-Pentanone	7.229	58	288	0.2449	ug/L #	23
45) trans-1,3-Dichloropropene	7.240	75	1352	0.2234	ug/L #	91
48) Toluene	6.858	91	6302	0.3231	ug/L	100
49) Tetrachloroethene	7.185	166	1930	0.3469	ug/L	91
50) 1,1,2-Trichloroethane	7.371	97	1139	0.3012	ug/L	94
51) Dibromochloromethane	7.504	129	1421	0.2753	ug/L	95
52) 1,3-Dichloropropane	7.585	76	1813	0.3017	ug/L	98
53) 1,2-Dibromoethane	7.672	107	1035	0.2672	ug/L	97
54) 2-Hexanone	7.889	43	602	0.3032	ug/L	97
55) Chlorobenzene	8.057	112	4294	0.3281	ug/L #	18
56) 1-Chlorohexane	8.068	69	297	0.2811	ug/L #	1
57) Ethylbenzene	8.095	106	2178	0.3197	ug/L	88

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

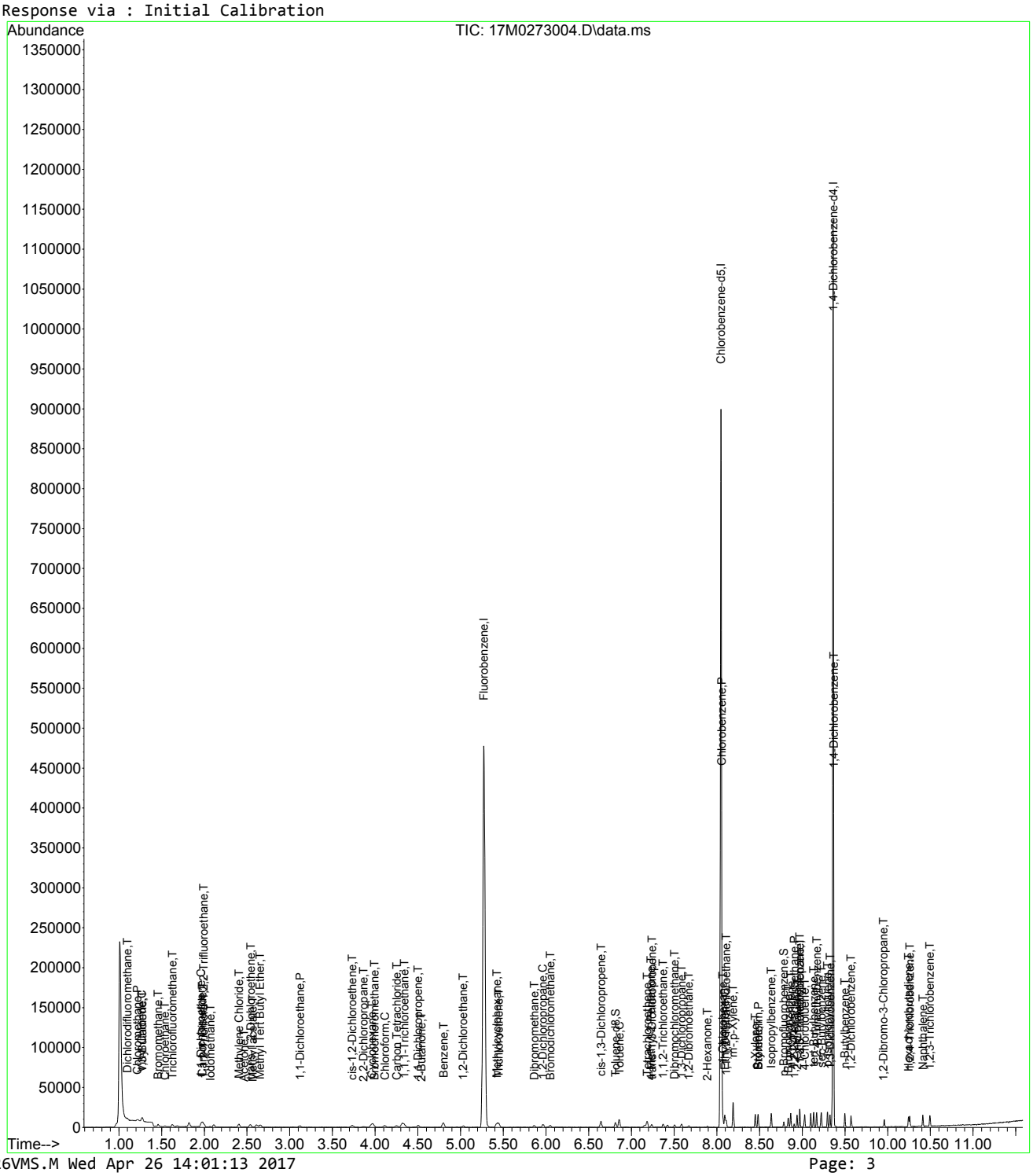
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
58) 1,1,1,2-Tetrachloroethane	8.109	131	1430	0.2807	ug/L	84
59) m-,p-Xylene	8.190	106	5242	0.6375	ug/L	99
60) o-Xylene	8.451	106	2600	0.3209	ug/L	98
61) Styrene	8.483	104	3767	0.2906	ug/L	99
62) Bromoform	8.485	173	950	0.2617	ug/L	94
63) Isopropylbenzene	8.636	105	6492	0.3096	ug/L	95
65) 1,3,5-Trimethylbenzene	8.972	105	5612	0.3216	ug/L	97
67) Bromobenzene	8.836	156	1948	0.3164	ug/L	95
68) n-Propylbenzene	8.865	91	7312	0.3164	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	1172	0.2784	ug/L	97
70) 2-Chlorotoluene	8.940	91	4467	0.3131	ug/L	97
71) 1,2,3-Trichloropropane	8.972	110	337	0.2708	ug/L	78
73) 1,2,4-Trimethylbenzene	9.169	105	5331	0.3030	ug/L	99
74) 4-Chlorotoluene	9.030	91	4520	0.3174	ug/L	99
75) tert-Butylbenzene	9.134	134	1169	0.3352	ug/L	95
76) sec-Butylbenzene	9.224	105	6865	0.3194	ug/L	99
77) p-Isopropyltoluene	9.296	119	5855	0.3195	ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	3604	0.3358	ug/L	97
79) 1,4-Dichlorobenzene	9.368	146	3693	0.3408	ug/L	89
80) n-Butylbenzene	9.499	91	5016	0.3243	ug/L	99
81) 1,2-Dichlorobenzene	9.571	146	3159	0.3020	ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	194	0.2512	ug/L	85
83) Hexachlorobutadiene	10.243	225	1532	0.3474	ug/L	94
84) 1,2,4-Trichlorobenzene	10.260	180	2401	0.3090	ug/L	96
85) Naphthalene	10.411	128	4948	0.3265	ug/L	95
86) 1,2,3-Trichlorobenzene	10.495	180	2415	0.3200	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:13 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.275	0.0	0	0.000
3	P	Chloromethane	-1.000	0.354	0.0	0	0.000
4	C	Vinyl Chloride	-1.000	0.310	0.0	0	0.000
5	T	1,3-Butadiene	-1.000	0.342	0.0	0	0.000
6	T	Bromomethane	-1.000	0.399	0.0	0	0.000
7	T	Chloroethane	-1.000	0.328	0.0	0	0.011
8	T	Trichlorofluoromethane	-1.000	0.314	0.0	0	0.011
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	-1.000	0.329	0.0	0	0.000
11	T	Carbon Disulfide	-1.000	0.329	0.0	0	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.000	0.320	0.0	0	0.000
13	T	Iodomethane	-1.000	2.102	0.0	0	0.011
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	-1.000	0.373	0.0	0	0.000
16	T	Acetone	-1.000	0.873	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	-1.000	0.322	0.0	0	0.012
18	T	Methyl acetate	-1.000	0.146	0.0	0	0.000
19	T	Methyl Tert Butyl Ether	-1.000	0.286	0.0	0	0.000
20	P	1,1-Dichloroethane	-1.000	0.300	0.0	0	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	-1.000	0.302	0.0	0	0.000
24	T	2,2-Dichloropropane	-1.000	0.437	0.0	0	0.000
25	T	Cyclohexane	-1.000	0.311	0.0	0	0.000
26	T	Bromochloromethane	-1.000	0.213	0.0	0	0.018
27	C	Chloroform	0.300	0.290	3.3#	100	0.000
28	T	Carbon Tetrachloride	-1.000	0.276	0.0	0	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	-1.000	0.298	0.0	0	0.000
31	T	1,1-Dichloropropene	-1.000	0.307	0.0	0	0.000
32	T	2-Butanone	-1.000	0.176	0.0	0	0.018
33	T	Benzene	-1.000	0.320	0.0	0	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.055	0.0	0	0.000
35	T	1,2-Dichloroethane	-1.000	0.298	0.0	0	0.000
36	T	Methylcyclohexane	0.300	0.317	-5.7	100	0.000
37	T	Trichloroethene	-1.000	0.302	0.0	0	0.000
38	T	Dibromomethane	-1.000	0.270	0.0	0	0.000
39	C	1,2-Dichloropropane	-1.000	0.306	0.0	0	0.000
40	T	Bromodichloromethane	-1.000	0.283	0.0	0	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.098	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	-1.000	0.272	0.0	0	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.245	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.223	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.239	0.0	0	0.000
48	C	Toluene	-1.000	0.323	0.0	0	0.000
49	T	Tetrachloroethene	-1.000	0.347	0.0	0	0.000
50	T	1,1,2-Trichloroethane	-1.000	0.301	0.0	0	0.000
51	T	Dibromochloromethane	-1.000	0.275	0.0	0	0.000
52	T	1,3-Dichloropropane	-1.000	0.302	0.0	0	0.000
53	T	1,2-Dibromoethane	-1.000	0.267	0.0	0	0.000
54	T	2-Hexanone	-1.000	0.303	0.0	0	0.000
55	P	Chlorobenzene	-1.000	0.328	0.0	0	0.000
56	T	1-Chlorohexane	-1.000	0.281	0.0	0	0.000
57	C	Ethylbenzene	-1.000	0.320	0.0	0	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	-1.000	0.281	0.0	0	0.000
59	T	m-,p-Xylene	-1.000	0.637	0.0	0	0.000
60	T	o-Xylene	-1.000	0.321	0.0	0	0.000
61	T	Styrene	-1.000	0.291	0.0	0	0.000
62	P	Bromoform	-1.000	0.262	0.0	0	0.000
63	T	Isopropylbenzene	-1.000	0.310	0.0	0	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	-1.000	0.322	0.0	0	0.000
66	S	p-Bromofluorobenzene	-1.000	0.242	0.0	0	0.000
67	T	Bromobenzene	0.300	0.316	-5.3	100	0.000
68	T	n-Propylbenzene	-1.000	0.316	0.0	0	0.000
69	P	1,1,2,2-Tetrachloroethane	-1.000	0.278	0.0	0	0.000
70	T	2-Chlorotoluene	-1.000	0.313	0.0	0	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.271	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.110	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	-1.000	0.303	0.0	0	0.000
74	T	4-Chlorotoluene	-1.000	0.317	0.0	0	0.000
75	T	tert-Butylbenzene	-1.000	0.335	0.0	0	0.000
76	T	sec-Butylbenzene	-1.000	0.319	0.0	0	0.000
77	T	p-Isopropyltoluene	-1.000	0.320	0.0	0	0.000
78	T	1,3-Dichlorobenzene	-1.000	0.336	0.0	0	0.000
79	T	1,4-Dichlorobenzene	0.300	0.341	-13.7	100	0.000
80	T	n-Butylbenzene	-1.000	0.324	0.0	0	0.000
81	T	1,2-Dichlorobenzene	0.300	0.302	-0.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.251	0.0	0	0.000
83	T	Hexachlorobutadiene	-1.000	0.347	0.0	0	0.000
84	T	1,2,4-Trichlorobenzene	-1.000	0.309	0.0	0	0.000
85	T	Naphthalene	-1.000	0.327	0.0	0	0.000
86	T	1,2,3-Trichlorobenzene	0.300	0.320	-6.7	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	420908	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307739	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151803	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.968	65	216	0.0507	ug/L	0.0145
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.203%#		
47) Toluene-d8	6.818	98	3149	0.2050	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.820%#		
66) p-Bromofluorobenzene	8.786	95	1018	0.2003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.801%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1833	0.3667	ug/L #	71
3) Chloromethane	1.224	50	2073	0.4237	ug/L	97
4) Vinyl Chloride	1.267	62	2251	0.4155	ug/L	86
5) 1,3-Butadiene	1.276	54	1444	0.4341	ug/L	90
6) Bromomethane	1.467	94	2073	0.5147	ug/L	98
7) Chloroethane	1.545	64	1207	0.4697	ug/L	84
8) Trichlorofluoromethane	1.632	101	3013	0.4336	ug/L	98
10) 1,1-Dichloroethene	1.968	61	2718	0.4180	ug/L	98
11) Carbon Disulfide	1.982	76	5991	0.4293	ug/L	97
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	1729	0.4171	ug/L	96
13) Iodomethane	2.066	142	736	2.1139	ug/L #	78
15) Methylene Chloride	2.411	84	2286	0.4634	ug/L	99
16) Acetone	2.463	43	807	0.9536	ug/L #	77
17) trans-1,2-Dichloroethene	2.541	96	1807	0.4082	ug/L	97
18) Methyl acetate	2.573	43	725	0.3268	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	4361	0.3882	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	3143	0.3953	ug/L	96
23) cis-1,2-Dichloroethene	3.731	96	2019	0.4029	ug/L	97
24) 2,2-Dichloropropane	3.870	77	1332	0.4838	ug/L	99
25) Cyclohexane	3.966	56	2634	0.3895	ug/L	99
26) Bromochloromethane	3.992	130	1100	0.3407	ug/L	90
27) Chloroform	4.113	83	3459	0.4172	ug/L	98
28) Carbon Tetrachloride	4.258	117	2434	0.3713	ug/L #	92
30) 1,1,1-Trichloroethane	4.351	97	2888	0.3962	ug/L	97
31) 1,1-Dichloropropene	4.507	75	2338	0.4084	ug/L	94
32) 2-Butanone	4.539	43	444	0.3519	ug/L #	37
33) Benzene	4.797	78	7693	0.4291	ug/L	98
35) 1,2-Dichloroethane	5.037	62	2311	0.4140	ug/L #	86
36) Methylcyclohexane	5.422	83	2910	0.4107	ug/L	98
37) Trichloroethene	5.454	130	2296	0.4264	ug/L	96
38) Dibromomethane	5.862	93	1026	0.3736	ug/L	94
39) 1,2-Dichloropropane	5.966	63	1791	0.3809	ug/L	98
40) Bromodichloromethane	6.053	83	2463	0.3925	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.632	63	400	0.1876	ug/L #	42
43) cis-1,3-Dichloropropene	6.650	75	2541	0.3593	ug/L	94
44) 4-Methyl-2-Pentanone	7.226	58	368	0.3150	ug/L	79
45) trans-1,3-Dichloropropene	7.237	75	1772	0.2948	ug/L	98
48) Toluene	6.858	91	8187	0.4243	ug/L	97
49) Tetrachloroethene	7.185	166	2388	0.4339	ug/L	97
50) 1,1,2-Trichloroethane	7.376	97	1530	0.4091	ug/L	98
51) Dibromochloromethane	7.507	129	2046	0.4008	ug/L	98
52) 1,3-Dichloropropane	7.588	76	2378	0.4001	ug/L	92
53) 1,2-Dibromoethane	7.672	107	1583	0.4132	ug/L	95
54) 2-Hexanone	7.892	43	744	0.3788	ug/L	96
55) Chlorobenzene	8.060	112	5389	0.4163	ug/L #	31
56) 1-Chlorohexane	8.071	69	449	0.4296	ug/L #	66

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

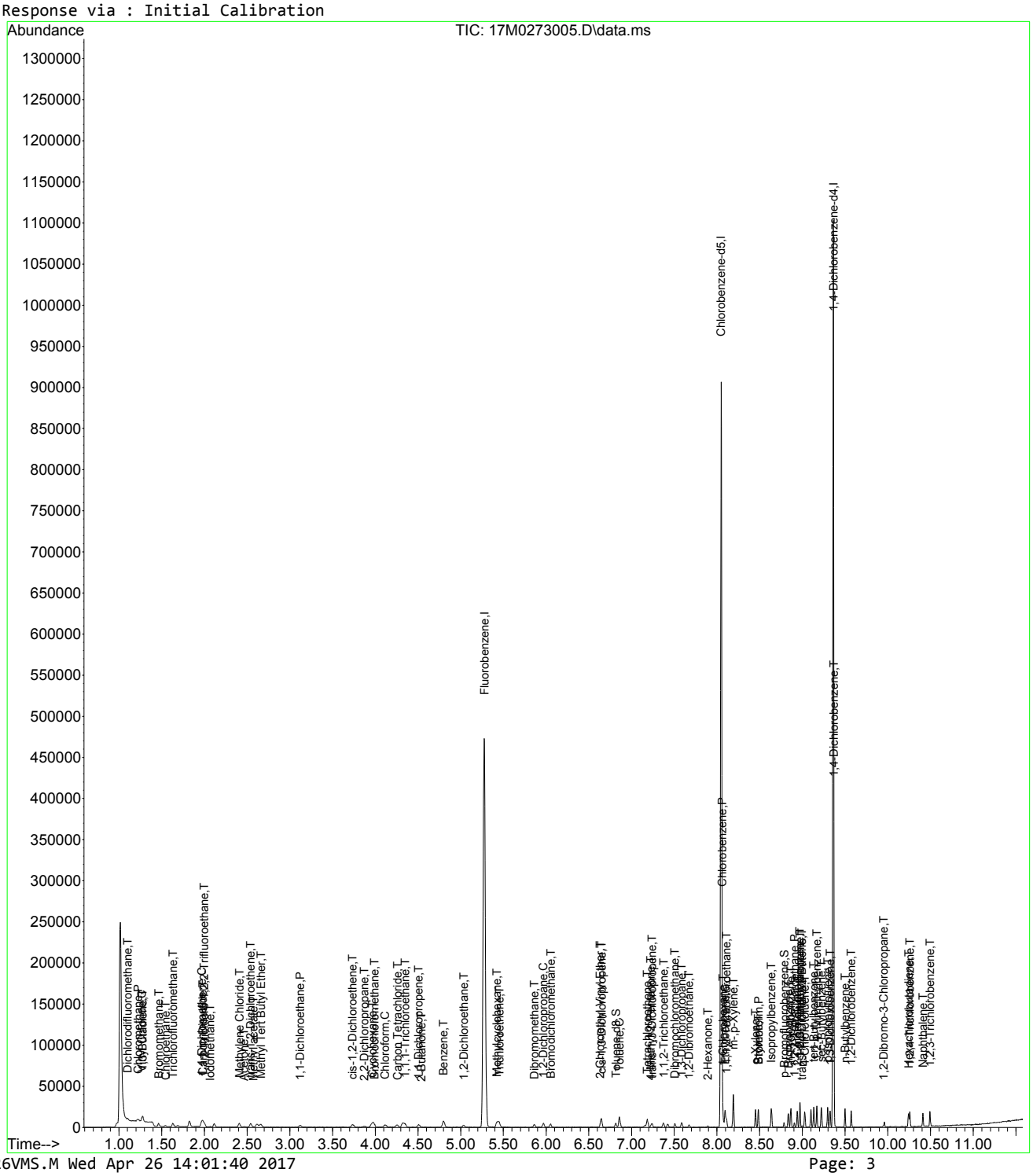
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
57) Ethylbenzene	8.094	106	2751	0.4082	ug/L		85
58) 1,1,1,2-Tetrachloroethane	8.112	131	2018	0.4004	ug/L		92
59) m-,p-Xylene	8.193	106	6639	0.8163	ug/L		98
60) o-Xylene	8.451	106	3154	0.3936	ug/L		95
61) Styrene	8.482	104	4908	0.3828	ug/L		98
62) Bromoform	8.485	173	1308	0.3643	ug/L		88
63) Isopropylbenzene	8.636	105	8520	0.4108	ug/L		99
65) 1,3,5-Trimethylbenzene	8.969	105	6976	0.4122	ug/L		97
67) Bromobenzene	8.836	156	2470	0.4136	ug/L		97
68) n-Propylbenzene	8.865	91	9526	0.4249	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	1521	0.3725	ug/L		100
70) 2-Chlorotoluene	8.940	91	5795	0.4188	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	488	0.4043	ug/L		94
72) trans-1,4-Dichloro-2-B...	8.995	53	204	0.2267	ug/L	#	80
73) 1,2,4-Trimethylbenzene	9.169	105	7147	0.4188	ug/L		97
74) 4-Chlorotoluene	9.027	91	5692	0.4121	ug/L		99
75) tert-Butylbenzene	9.131	134	1424	0.4210	ug/L		97
76) sec-Butylbenzene	9.224	105	8888	0.4263	ug/L		96
77) p-Isopropyltoluene	9.296	119	7466	0.4201	ug/L		99
78) 1,3-Dichlorobenzene	9.322	146	4514	0.4336	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	4491	0.4273	ug/L		85
80) n-Butylbenzene	9.499	91	6442	0.4295	ug/L		95
81) 1,2-Dichlorobenzene	9.571	146	4496	0.4432	ug/L		96
82) 1,2-Dibromo-3-Chloropr...	9.947	75	266	0.3551	ug/L		81
83) Hexachlorobutadiene	10.243	225	1975	0.4618	ug/L		93
84) 1,2,4-Trichlorobenzene	10.257	180	3124	0.4145	ug/L		95
85) Naphthalene	10.411	128	6130	0.4171	ug/L		98
86) 1,2,3-Trichlorobenzene	10.495	180	3077	0.4203	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:40 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.367	0.0	0	0.000
3	P	Chloromethane	-1.000	0.424	0.0	0	0.012
4	C	Vinyl Chloride	0.400	0.416	-4.0#	100	0.000
5	T	1,3-Butadiene	-1.000	0.434	0.0	0	0.000
6	T	Bromomethane	-1.000	0.515	0.0	0	0.012
7	T	Chloroethane	-1.000	0.470	0.0	0	0.017
8	T	Trichlorofluoromethane	0.400	0.434	-8.5	100	0.017
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	0.400	0.418	-4.5#	100	0.012
11	T	Carbon Disulfide	0.400	0.429	-7.2	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.400	0.417	-4.2	100	0.000
13	T	Iodomethane	-1.000	2.114	0.0	0	0.000
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	0.400	0.463	-15.8	100	0.012
16	T	Acetone	-1.000	0.954	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	0.400	0.408	-2.0	100	0.000
18	T	Methyl acetate	0.400	0.327	18.3	100	0.000
19	T	Methyl Tert Butyl Ether	0.400	0.388	3.0	100	0.015
20	P	1,1-Dichloroethane	0.400	0.395	1.3	100	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	0.400	0.403	-0.8	100	0.000
24	T	2,2-Dichloropropane	0.400	0.484	-21.0	100	0.012
25	T	Cyclohexane	0.400	0.389	2.8	100	0.000
26	T	Bromochloromethane	-1.000	0.341	0.0	0	0.018
27	C	Chloroform	0.400	0.417	-4.2#	100	0.000
28	T	Carbon Tetrachloride	0.400	0.371	7.3	100	0.012
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	0.400	0.396	1.0	100	0.000
31	T	1,1-Dichloropropene	0.400	0.408	-2.0	100	0.000
32	T	2-Butanone	-1.000	0.352	0.0	0	0.015
33	T	Benzene	0.400	0.429	-7.2	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.051	0.0	0	0.014
35	T	1,2-Dichloroethane	0.400	0.414	-3.5	100	0.000
36	T	Methylcyclohexane	0.400	0.411	-2.7	100	0.000
37	T	Trichloroethene	0.400	0.426	-6.5	100	0.000
38	T	Dibromomethane	0.400	0.374	6.5	100	0.000
39	C	1,2-Dichloropropane	0.400	0.381	4.8#	100	0.000
40	T	Bromodichloromethane	0.400	0.392	2.0	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.188	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	0.400	0.359	10.3	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.315	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.295	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.205	0.0	0	0.000
48	C	Toluene	0.400	0.424	-6.0#	100	0.000
49	T	Tetrachloroethene	0.400	0.434	-8.5	100	0.000
50	T	1,1,2-Trichloroethane	0.400	0.409	-2.2	100	0.000
51	T	Dibromochloromethane	0.400	0.401	-0.3	100	0.000
52	T	1,3-Dichloropropane	0.400	0.400	0.0	100	0.000
53	T	1,2-Dibromoethane	0.400	0.413	-3.2	100	0.000
54	T	2-Hexanone	-1.000	0.379	0.0	0	0.000
55	P	Chlorobenzene	0.400	0.416	-4.0	100	0.000
56	T	1-Chlorohexane	-1.000	0.430	0.0	0	0.000
57	C	Ethylbenzene	0.400	0.408	-2.0#	100	0.000

826VMS.M Wed Apr 26 14:01:37 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.400	0.400	0.0	100	0.000
59	T	m-,p-Xylene	0.800	0.816	-2.0	100	0.000
60	T	o-Xylene	0.400	0.394	1.5	100	0.000
61	T	Styrene	0.400	0.383	4.3	100	0.000
62	P	Bromoform	0.400	0.364	9.0	100	0.000
63	T	Isopropylbenzene	0.400	0.411	-2.7	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	0.400	0.412	-3.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.200	0.0	0	0.000
67	T	Bromobenzene	0.400	0.414	-3.5	100	0.000
68	T	n-Propylbenzene	0.400	0.425	-6.2	100	0.000
69	P	1,1,2,2-Tetrachloroethane	0.400	0.372	7.0	100	0.000
70	T	2-Chlorotoluene	0.400	0.419	-4.7	100	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.404	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.227	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	0.400	0.419	-4.7	100	0.000
74	T	4-Chlorotoluene	0.400	0.412	-3.0	100	0.000
75	T	tert-Butylbenzene	0.400	0.421	-5.2	100	0.000
76	T	sec-Butylbenzene	0.400	0.426	-6.5	100	0.000
77	T	p-Isopropyltoluene	0.400	0.420	-5.0	100	0.000
78	T	1,3-Dichlorobenzene	0.400	0.434	-8.5	100	0.000
79	T	1,4-Dichlorobenzene	0.400	0.427	-6.7	100	0.000
80	T	n-Butylbenzene	0.400	0.429	-7.2	100	0.000
81	T	1,2-Dichlorobenzene	0.400	0.443	-10.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.355	0.0	0	0.000
83	T	Hexachlorobutadiene	0.400	0.462	-15.5	100	0.000
84	T	1,2,4-Trichlorobenzene	0.400	0.415	-3.7	100	0.000
85	T	Naphthalene	0.400	0.417	-4.2	100	0.000
86	T	1,2,3-Trichlorobenzene	0.400	0.420	-5.0	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	426227	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	321768	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	162525	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.959	65	153	0.0355	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.142%#		
47) Toluene-d8	6.815	98	2654	0.1653	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.661%#		
66) p-Bromofluorobenzene	8.783	95	924	0.1698	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.679%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	4435	0.8761	ug/L	90
3) Chloromethane	1.218	50	4921	0.9933	ug/L	95
4) Vinyl Chloride	1.267	62	5224	0.9523	ug/L	100
5) 1,3-Butadiene	1.276	54	3212	0.9536	ug/L	92
6) Bromomethane	1.461	94	4459	1.0933	ug/L	94
7) Chloroethane	1.539	64	2867	1.1017	ug/L	94
8) Trichlorofluoromethane	1.626	101	7223	1.0265	ug/L	99
9) Diethyl ether	1.837	59	16707	4.9236	ug/L	98
10) 1,1-Dichloroethene	1.965	61	6575	0.9987	ug/L	99
11) Carbon Disulfide	1.976	76	13954	0.9875	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	4132	0.9844	ug/L	99
13) Iodomethane	2.060	142	2054	2.3117	ug/L	97
14) Acrolein	2.217	56	1026	2.4478	ug/L	97
15) Methylene Chloride	2.402	84	5125	1.0259	ug/L	99
16) Acetone	2.460	43	1354	1.5799	ug/L #	71
17) trans-1,2-Dichloroethene	2.538	96	4313	0.9621	ug/L	100
18) Methyl acetate	2.573	43	2105	0.9369	ug/L #	84
19) Methyl Tert Butyl Ether	2.654	73	11029	0.9694	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	7772	0.9652	ug/L	99
21) Acrylonitrile	3.187	53	2537	2.3210	ug/L	98
22) Vinyl Acetate	2.611	86	589	0.8163	ug/L	72
23) cis-1,2-Dichloroethene	3.737	96	4813	0.9485	ug/L	99
24) 2,2-Dichloropropane	3.864	77	4555	0.9837	ug/L	99
25) Cyclohexane	3.966	56	6602	0.9640	ug/L	100
26) Bromochloromethane	3.980	130	2843	0.8696	ug/L	97
27) Chloroform	4.113	83	8392	0.9997	ug/L	98
28) Carbon Tetrachloride	4.252	117	6172	0.9297	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	7196	0.9750	ug/L	99
31) 1,1-Dichloropropene	4.501	75	5583	0.9632	ug/L	97
32) 2-Butanone	4.539	43	1222	0.9564	ug/L #	37
33) Benzene	4.799	78	17817	0.9814	ug/L	99
35) 1,2-Dichloroethane	5.034	62	5412	0.9573	ug/L	96
36) Methylcyclohexane	5.422	83	7060	0.9839	ug/L	95
37) Trichloroethene	5.445	130	5322	0.9759	ug/L	97
38) Dibromomethane	5.862	93	2591	0.9318	ug/L	98
39) 1,2-Dichloropropane	5.963	63	4551	0.9559	ug/L	93
40) Bromodichloromethane	6.050	83	5958	0.9376	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	1303	0.6034	ug/L	88
43) cis-1,3-Dichloropropene	6.650	75	6508	0.9088	ug/L	98
44) 4-Methyl-2-Pentanone	7.232	58	1028	0.8690	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	5180	0.8509	ug/L	98
48) Toluene	6.858	91	19458	0.9645	ug/L	98
49) Tetrachloroethene	7.185	166	5539	0.9627	ug/L	97
50) 1,1,2-Trichloroethane	7.373	97	3713	0.9496	ug/L	99
51) Dibromochloromethane	7.507	129	4726	0.8855	ug/L	97
52) 1,3-Dichloropropane	7.588	76	5873	0.9451	ug/L	96

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

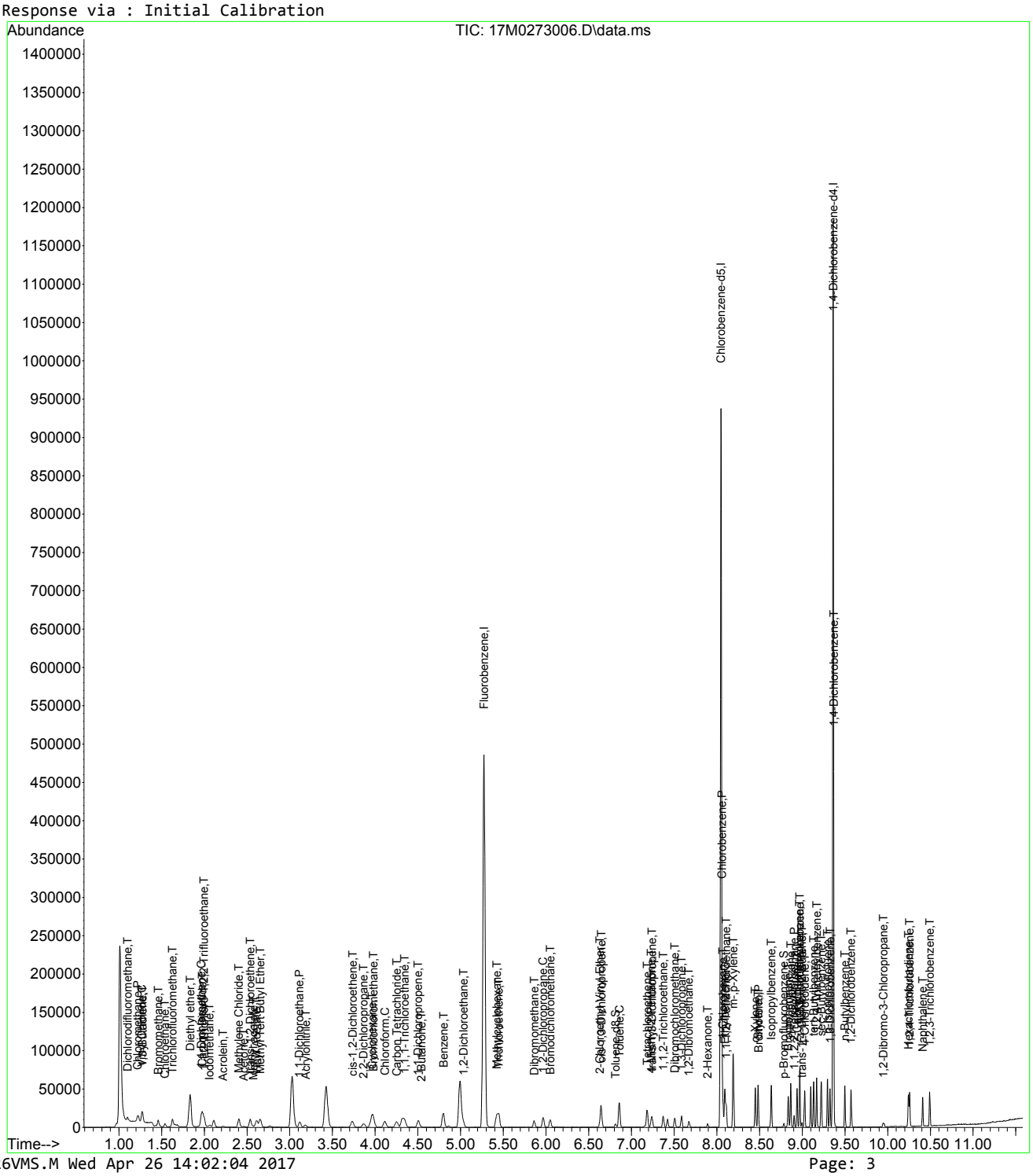
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
53) 1,2-Dibromoethane	7.672	107	3784	0.9445 ug/L	97
54) 2-Hexanone	7.892	43	1881	0.9161 ug/L	97
55) Chlorobenzene	8.060	112	13080	0.9663 ug/L	72
56) 1-Chlorohexane	8.068	69	1019	0.9324 ug/L	78
57) Ethylbenzene	8.094	106	6455	0.9161 ug/L	89
58) 1,1,1,2-Tetrachloroethane	8.109	131	4898	0.9296 ug/L	95
59) m-,p-Xylene	8.193	106	15829	1.8615 ug/L	97
60) o-Xylene	8.450	106	7831	0.9347 ug/L	97
61) Styrene	8.482	104	11851	0.8840 ug/L	99
62) Bromoform	8.488	173	3119	0.8308 ug/L	98
63) Isopropylbenzene	8.636	105	20533	0.9468 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	17243	0.9517 ug/L	98
67) Bromobenzene	8.836	156	6018	0.9413 ug/L	99
68) n-Propylbenzene	8.864	91	22729	0.9470 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	4042	0.9246 ug/L	95
70) 2-Chlorotoluene	8.940	91	14288	0.9645 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	1215	0.9401 ug/L	94
72) trans-1,4-Dichloro-2-B...	8.995	53	570	0.5916 ug/L #	89
73) 1,2,4-Trimethylbenzene	9.168	105	17160	0.9393 ug/L	98
74) 4-Chlorotoluene	9.027	91	14292	0.9664 ug/L	98
75) tert-Butylbenzene	9.134	134	3479	0.9608 ug/L	99
76) sec-Butylbenzene	9.221	105	21376	0.9577 ug/L	99
77) p-Isopropyltoluene	9.296	119	17861	0.9387 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	10532	0.9450 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	10637	0.9454 ug/L	94
80) n-Butylbenzene	9.499	91	14714	0.9162 ug/L	100
81) 1,2-Dichlorobenzene	9.571	146	10274	0.9459 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.947	75	692	0.8628 ug/L	85
83) Hexachlorobutadiene	10.243	225	4412	0.9635 ug/L	97
84) 1,2,4-Trichlorobenzene	10.257	180	7410	0.9183 ug/L	99
85) Naphthalene	10.408	128	14173	0.9007 ug/L	99
86) 1,2,3-Trichlorobenzene	10.492	180	7259	0.9262 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:04 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	1.000	0.876	12.4	100	0.000
3	P	Chloromethane	1.000	0.993	0.7	100	0.000
4	C	Vinyl Chloride	1.000	0.952	4.8#	100	0.000
5	T	1,3-Butadiene	1.000	0.954	4.6	100	0.000
6	T	Bromomethane	1.000	1.093	-9.3	100	0.000
7	T	Chloroethane	1.000	1.102	-10.2	100	0.011
8	T	Trichlorofluoromethane	1.000	1.027	-2.7	100	0.011
9	T	Diethyl ether	5.000	4.924	1.5	100	0.000
10	C	1,1-Dichloroethene	1.000	0.999	0.1#	100	0.000
11	T	Carbon Disulfide	1.000	0.988	1.2	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.000	0.984	1.6	100	0.000
13	T	Iodomethane	-1.000	2.312	0.0	0	0.000
14	T	Acrolein	2.500	2.448	2.1	100	0.000
15	T	Methylene Chloride	1.000	1.026	-2.6	100	0.000
16	T	Acetone	-1.000	1.580	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	1.000	0.962	3.8	100	0.000
18	T	Methyl acetate	1.000	0.937	6.3	100	0.000
19	T	Methyl Tert Butyl Ether	1.000	0.969	3.1	100	0.000
20	P	1,1-Dichloroethane	1.000	0.965	3.5	100	0.000
21	T	Acrylonitrile	2.500	2.321	7.2	100	0.000
22	T	Vinyl Acetate	-1.000	0.816	0.0	0	0.000
23	T	cis-1,2-Dichloroethene	1.000	0.948	5.2	100	0.000
24	T	2,2-Dichloropropane	1.000	0.984	1.6	100	0.000
25	T	Cyclohexane	1.000	0.964	3.6	100	0.000
26	T	Bromochloromethane	1.000	0.870	13.0	100	0.000
27	C	Chloroform	1.000	1.000	0.0	100	0.000
28	T	Carbon Tetrachloride	1.000	0.930	7.0	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	1.000	0.975	2.5	100	0.000
31	T	1,1-Dichloropropene	1.000	0.963	3.7	100	0.000
32	T	2-Butanone	-1.000	0.956	0.0	0	0.015
33	T	Benzene	1.000	0.981	1.9	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.035	0.0	0	0.000
35	T	1,2-Dichloroethane	1.000	0.957	4.3	100	0.000
36	T	Methylcyclohexane	1.000	0.984	1.6	100	0.000
37	T	Trichloroethene	1.000	0.976	2.4	100	0.000
38	T	Dibromomethane	1.000	0.932	6.8	100	0.000
39	C	1,2-Dichloropropane	1.000	0.956	4.4#	100	0.000
40	T	Bromodichloromethane	1.000	0.938	6.2	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.603	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	1.000	0.909	9.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.869	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	1.000	0.851	14.9	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.165	0.0	0	0.000
48	C	Toluene	1.000	0.965	3.5#	100	0.000
49	T	Tetrachloroethene	1.000	0.963	3.7	100	0.000
50	T	1,1,2-Trichloroethane	1.000	0.950	5.0	100	0.000
51	T	Dibromochloromethane	1.000	0.885	11.5	100	0.000
52	T	1,3-Dichloropropane	1.000	0.945	5.5	100	0.000
53	T	1,2-Dibromoethane	1.000	0.945	5.5	100	0.000
54	T	2-Hexanone	-1.000	0.916	0.0	0	0.000
55	P	Chlorobenzene	1.000	0.966	3.4	100	0.000
56	T	1-Chlorohexane	1.000	0.932	6.8	100	0.000
57	C	Ethylbenzene	1.000	0.916	8.4#	100	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	1.000	0.930	7.0	100	0.000
59	T	m-,p-Xylene	2.000	1.861	7.0	100	0.000
60	T	o-Xylene	1.000	0.935	6.5	100	0.000
61	T	Styrene	1.000	0.884	11.6	100	0.000
62	P	Bromoform	1.000	0.831	16.9	100	0.000
63	T	Isopropylbenzene	1.000	0.947	5.3	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	1.000	0.952	4.8	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.170	0.0	0	0.000
67	T	Bromobenzene	1.000	0.941	5.9	100	0.000
68	T	n-Propylbenzene	1.000	0.947	5.3	100	0.000
69	P	1,1,2,2-Tetrachloroethane	1.000	0.925	7.5	100	0.000
70	T	2-Chlorotoluene	1.000	0.965	3.5	100	0.000
71	T	1,2,3-Trichloropropane	1.000	0.940	6.0	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.592	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	1.000	0.939	6.1	100	0.000
74	T	4-Chlorotoluene	1.000	0.966	3.4	100	0.000
75	T	tert-Butylbenzene	1.000	0.961	3.9	100	0.000
76	T	sec-Butylbenzene	1.000	0.958	4.2	100	0.000
77	T	p-Isopropyltoluene	1.000	0.939	6.1	100	0.000
78	T	1,3-Dichlorobenzene	1.000	0.945	5.5	100	0.000
79	T	1,4-Dichlorobenzene	1.000	0.945	5.5	100	0.000
80	T	n-Butylbenzene	1.000	0.916	8.4	100	0.000
81	T	1,2-Dichlorobenzene	1.000	0.946	5.4	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	1.000	0.863	13.7	100	0.000
83	T	Hexachlorobutadiene	1.000	0.964	3.6	100	0.000
84	T	1,2,4-Trichlorobenzene	1.000	0.918	8.2	100	0.000
85	T	Naphthalene	1.000	0.901	9.9	100	0.000
86	T	1,2,3-Trichlorobenzene	1.000	0.926	7.4	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 5

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	419250	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	301521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148386	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.973	65	410	0.0966	ug/L	0.0203
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.386%#		
47) Toluene-d8	6.812	98	2299	0.1528	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.611%#		
66) p-Bromofluorobenzene	8.786	95	744	0.1497	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.599%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	8266	1.6601	ug/L	96
3) Chloromethane	1.224	50	9490	1.9475	ug/L	97
4) Vinyl Chloride	1.264	62	9802	1.8166	ug/L	100
5) 1,3-Butadiene	1.276	54	6439	1.9436	ug/L	97
6) Bromomethane	1.461	94	8818	2.1981	ug/L	97
7) Chloroethane	1.539	64	5382	2.1025	ug/L	99
8) Trichlorofluoromethane	1.626	101	13476	1.9470	ug/L	99
9) Diethyl ether	1.841	59	82987	24.8636	ug/L	99
10) 1,1-Dichloroethene	1.965	61	12193	1.8828	ug/L	100
11) Carbon Disulfide	1.979	76	25350	1.8238	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	7533	1.8245	ug/L	100
13) Iodomethane	2.066	142	4068	2.6265	ug/L	98
14) Acrolein	2.223	56	4766	11.5599	ug/L	98
15) Methylene Chloride	2.408	84	9550	1.9434	ug/L	98
16) Acetone	2.469	43	2137	2.5351	ug/L	88
17) trans-1,2-Dichloroethene	2.541	96	8550	1.9390	ug/L	99
18) Methyl acetate	2.576	43	3864	1.7485	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	21515	1.9226	ug/L #	100
20) 1,1-Dichloroethane	3.123	63	15207	1.9201	ug/L	98
21) Acrylonitrile	3.184	53	13059	12.1457	ug/L	100
22) Vinyl Acetate	2.619	86	1095	1.5429	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	9709	1.9452	ug/L	99
24) 2,2-Dichloropropane	3.870	77	9712	1.8129	ug/L	95
25) Cyclohexane	3.966	56	12484	1.8532	ug/L	98
26) Bromochloromethane	3.992	130	5989	1.8623	ug/L	99
27) Chloroform	4.113	83	16510	1.9994	ug/L	99
28) Carbon Tetrachloride	4.255	117	12159	1.8621	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	13879	1.9117	ug/L	99
31) 1,1-Dichloropropene	4.507	75	10473	1.8369	ug/L	98
32) 2-Butanone	4.536	43	2256	1.7951	ug/L #	64
33) Benzene	4.800	78	34359	1.9240	ug/L	100
35) 1,2-Dichloroethane	5.037	62	10797	1.9417	ug/L	99
36) Methylcyclohexane	5.425	83	12634	1.7900	ug/L	99
37) Trichloroethene	5.448	130	10311	1.9223	ug/L	99
38) Dibromomethane	5.859	93	5276	1.9290	ug/L	97
39) 1,2-Dichloropropane	5.966	63	9039	1.9301	ug/L	97
40) Bromodichloromethane	6.053	83	12025	1.9238	ug/L	96
41) 1,4-Dioxane	6.265	88	961	41.1985	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.627	63	2988	1.4066	ug/L	98
43) cis-1,3-Dichloropropene	6.647	75	13096	1.8592	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	2026	1.7412	ug/L	95
45) trans-1,3-Dichloropropene	7.243	75	10805	1.8044	ug/L	100
48) Toluene	6.858	91	37329	1.9747	ug/L	100
49) Tetrachloroethene	7.185	166	10472	1.9422	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	7445	2.0319	ug/L	99
51) Dibromochloromethane	7.510	129	9685	1.9365	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

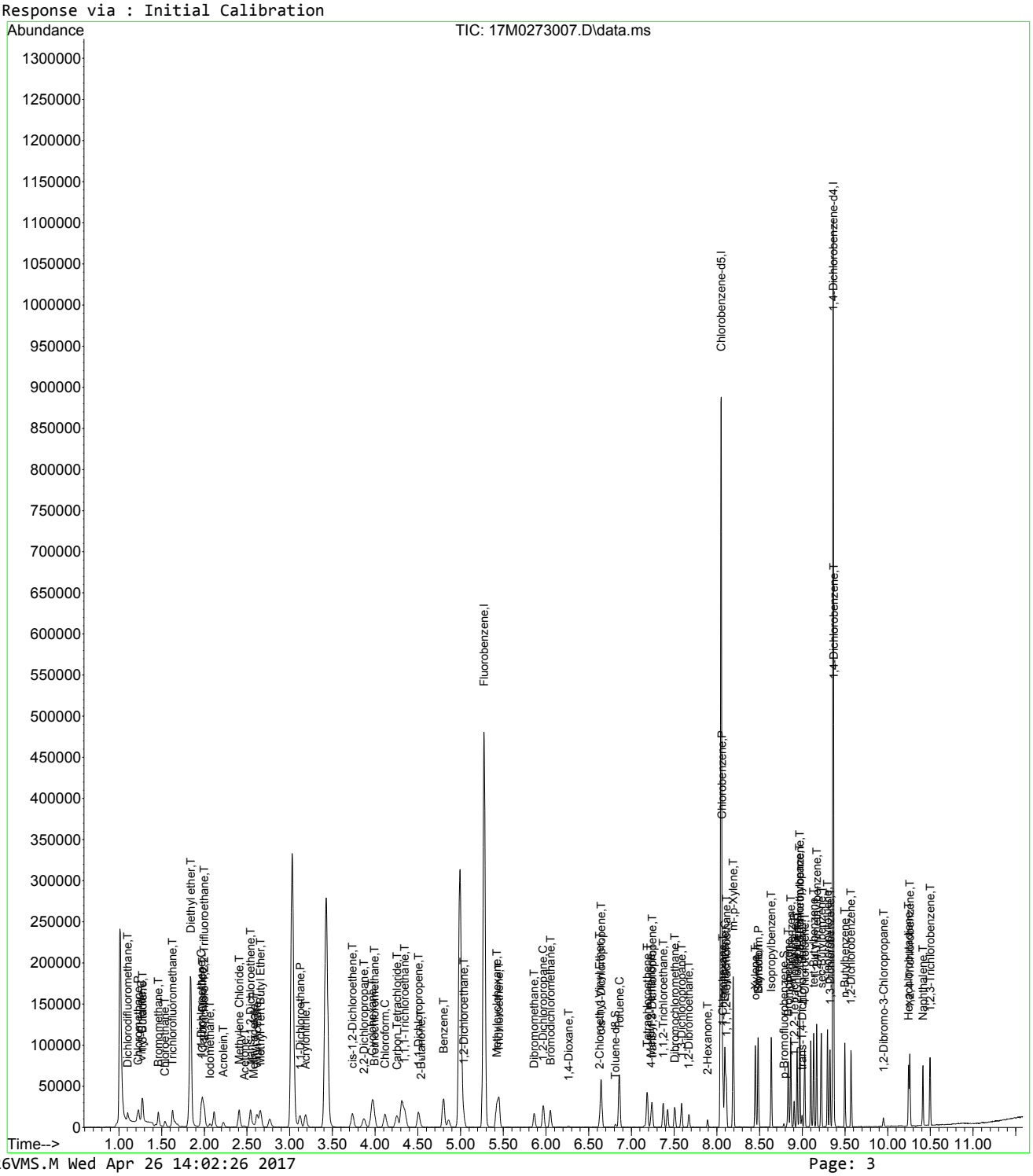
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	11727	2.0138	ug/L		98
53) 1,2-Dibromoethane	7.672	107	7414	1.9749	ug/L		100
54) 2-Hexanone	7.892	43	3567	1.8538	ug/L		100
55) Chlorobenzene	8.060	112	24892	1.9625	ug/L		85
56) 1-Chlorohexane	8.071	69	1995	1.9481	ug/L	#	85
57) Ethylbenzene	8.094	106	13014	1.9710	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	9923	2.0097	ug/L		100
59) m-,p-Xylene	8.193	106	30447	3.8209	ug/L		97
60) o-Xylene	8.451	106	15486	1.9724	ug/L		100
61) Styrene	8.482	104	23501	1.8707	ug/L		99
62) Bromoform	8.485	173	6423	1.8257	ug/L		100
63) Isopropylbenzene	8.636	105	38809	1.9097	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	32427	1.9603	ug/L		99
67) Bromobenzene	8.836	156	11776	2.0175	ug/L		100
68) n-Propylbenzene	8.865	91	42908	1.9582	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	7761	1.9444	ug/L		99
70) 2-Chlorotoluene	8.940	91	27206	2.0115	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	2495	2.1145	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	1392	1.5825	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.169	105	33214	1.9912	ug/L		100
74) 4-Chlorotoluene	9.027	91	26984	1.9984	ug/L		98
75) tert-Butylbenzene	9.134	134	6697	2.0257	ug/L		99
76) sec-Butylbenzene	9.224	105	40402	1.9825	ug/L		99
77) p-Isopropyltoluene	9.296	119	33833	1.9475	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	20210	1.9861	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	20145	1.9610	ug/L		98
80) n-Butylbenzene	9.499	91	26982	1.8402	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	19850	2.0016	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	1468	2.0048	ug/L		87
83) Hexachlorobutadiene	10.243	225	7947	1.9009	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	13652	1.8531	ug/L		97
85) Naphthalene	10.414	128	27628	1.9232	ug/L		99
86) 1,2,3-Trichlorobenzene	10.498	180	13906	1.9433	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:26 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	2.000	1.660	17.0	100	0.000
3	P	Chloromethane	2.000	1.948	2.6	100	0.012
4	C	Vinyl Chloride	2.000	1.817	9.2#	100	0.000
5	T	1,3-Butadiene	2.000	1.944	2.8	100	0.000
6	T	Bromomethane	2.000	2.198	-9.9	100	0.000
7	T	Chloroethane	2.000	2.103	-5.2	100	0.011
8	T	Trichlorofluoromethane	2.000	1.947	2.6	100	0.011
9	T	Diethyl ether	25.000	24.864	0.5	100	0.000
10	C	1,1-Dichloroethene	2.000	1.883	5.8#	100	0.000
11	T	Carbon Disulfide	2.000	1.824	8.8	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.000	1.825	8.8	100	0.000
13	T	Iodomethane	2.000	2.626	-31.3#	100	0.000
14	T	Acrolein	12.500	11.560	7.5	100	0.000
15	T	Methylene Chloride	2.000	1.943	2.8	100	0.000
16	T	Acetone	-1.000	2.535	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	2.000	1.939	3.0	100	0.000
18	T	Methyl acetate	2.000	1.748	12.6	100	0.000
19	T	Methyl Tert Butyl Ether	2.000	1.923	3.8	100	0.000
20	P	1,1-Dichloroethane	2.000	1.920	4.0	100	0.012
21	T	Acrylonitrile	12.500	12.146	2.8	100	0.000
22	T	Vinyl Acetate	-1.000	1.543	0.0	0	0.011
23	T	cis-1,2-Dichloroethene	2.000	1.945	2.7	100	0.000
24	T	2,2-Dichloropropane	2.000	1.813	9.4	100	0.012
25	T	Cyclohexane	2.000	1.853	7.4	100	0.000
26	T	Bromochloromethane	2.000	1.862	6.9	100	0.018
27	C	Chloroform	2.000	1.999	0.0#	100	0.000
28	T	Carbon Tetrachloride	2.000	1.862	6.9	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	2.000	1.912	4.4	100	0.000
31	T	1,1-Dichloropropene	2.000	1.837	8.2	100	0.000
32	T	2-Butanone	-1.000	1.795	0.0	0	0.012
33	T	Benzene	2.000	1.924	3.8	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.097	0.0	0	0.020
35	T	1,2-Dichloroethane	2.000	1.942	2.9	100	0.000
36	T	Methylcyclohexane	2.000	1.790	10.5	100	0.000
37	T	Trichloroethene	2.000	1.922	3.9	100	0.000
38	T	Dibromomethane	2.000	1.929	3.5	100	0.000
39	C	1,2-Dichloropropane	2.000	1.930	3.5#	100	0.000
40	T	Bromodichloromethane	2.000	1.924	3.8	100	0.000
41	T	1,4-Dioxane	50.000	41.198	17.6	100	0.000
42	T	2-Chloroethyl Vinyl Ether	-1.000	1.407	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	2.000	1.859	7.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	1.741	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	2.000	1.804	9.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.153	0.0	0	0.000
48	C	Toluene	2.000	1.975	1.2#	100	0.000
49	T	Tetrachloroethene	2.000	1.942	2.9	100	0.000
50	T	1,1,2-Trichloroethane	2.000	2.032	-1.6	100	0.000
51	T	Dibromochloromethane	2.000	1.936	3.2	100	0.000
52	T	1,3-Dichloropropane	2.000	2.014	-0.7	100	0.000
53	T	1,2-Dibromoethane	2.000	1.975	1.2	100	0.000
54	T	2-Hexanone	2.000	1.854	7.3	100	0.000
55	P	Chlorobenzene	2.000	1.962	1.9	100	0.000
56	T	1-Chlorohexane	2.000	1.948	2.6	100	0.000
57	C	Ethylbenzene	2.000	1.971	1.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	2.000	2.010	-0.5	100	0.000
59	T	m-,p-Xylene	4.000	3.821	4.5	100	0.000
60	T	o-Xylene	2.000	1.972	1.4	100	0.000
61	T	Styrene	2.000	1.871	6.5	100	0.000
62	P	Bromoform	2.000	1.826	8.7	100	0.000
63	T	Isopropylbenzene	2.000	1.910	4.5	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	2.000	1.960	2.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.150	0.0	0	0.000
67	T	Bromobenzene	2.000	2.018	-0.9	100	0.000
68	T	n-Propylbenzene	2.000	1.958	2.1	100	0.000
69	P	1,1,2,2-Tetrachloroethane	2.000	1.944	2.8	100	0.000
70	T	2-Chlorotoluene	2.000	2.012	-0.6	100	0.000
71	T	1,2,3-Trichloropropane	2.000	2.114	-5.7	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	2.000	1.583	20.9	100	0.000
73	T	1,2,4-Trimethylbenzene	2.000	1.991	0.4	100	0.000
74	T	4-Chlorotoluene	2.000	1.998	0.1	100	0.000
75	T	tert-Butylbenzene	2.000	2.026	-1.3	100	0.000
76	T	sec-Butylbenzene	2.000	1.983	0.8	100	0.000
77	T	p-Isopropyltoluene	2.000	1.948	2.6	100	0.000
78	T	1,3-Dichlorobenzene	2.000	1.986	0.7	100	0.000
79	T	1,4-Dichlorobenzene	2.000	1.961	1.9	100	0.000
80	T	n-Butylbenzene	2.000	1.840	8.0	100	0.000
81	T	1,2-Dichlorobenzene	2.000	2.002	-0.1	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	2.000	2.005	-0.2	100	0.000
83	T	Hexachlorobutadiene	2.000	1.901	4.9	100	0.000
84	T	1,2,4-Trichlorobenzene	2.000	1.853	7.4	100	0.000
85	T	Naphthalene	2.000	1.923	3.8	100	0.000
86	T	1,2,3-Trichlorobenzene	2.000	1.943	2.8	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	431262	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	319022	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	163434	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	23759	5.1012	ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.405%#			
34) 1,2-Dichloroethane-d4	4.964	65	23294	5.3358	ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.343%#			
47) Toluene-d8	6.815	98	82876	5.2054	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 20.822%#			
66) p-Bromofluorobenzene	8.783	95	24857	4.5424	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 18.170%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	23001	4.4908	ug/L	99
3) Chloromethane	1.224	50	24053	4.7986	ug/L	98
4) Vinyl Chloride	1.270	62	26844	4.8364	ug/L	100
5) 1,3-Butadiene	1.282	54	17084	5.0131	ug/L	98
6) Bromomethane	1.464	94	22223	5.3853	ug/L	99
7) Chloroethane	1.539	64	14714	5.5881	ug/L	93
8) Trichlorofluoromethane	1.632	101	37891	5.3221	ug/L	99
9) Diethyl ether	1.843	59	169782	49.4513	ug/L	100
10) 1,1-Dichloroethene	1.971	61	33029	4.9581	ug/L	100
11) Carbon Disulfide	1.982	76	71308	4.9874	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	21872	5.1500	ug/L	100
13) Iodomethane	2.069	142	16154	4.4150	ug/L	99
14) Acrolein	2.225	56	10883	25.6613	ug/L	100
15) Methylene Chloride	2.411	84	25075	4.9606	ug/L	100
16) Acetone	2.469	43	5224	6.0246	ug/L	95
17) trans-1,2-Dichloroethene	2.544	96	22591	4.9805	ug/L	99
18) Methyl acetate	2.576	43	11275	4.9598	ug/L #	97
19) Methyl Tert Butyl Ether	2.660	73	58542	5.0855	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	41374	5.0784	ug/L	99
21) Acrylonitrile	3.190	53	27474	24.8409	ug/L	97
22) Vinyl Acetate	2.616	86	3460	4.7395	ug/L #	45
23) cis-1,2-Dichloroethene	3.740	96	26009	5.0656	ug/L	98
24) 2,2-Dichloropropane	3.870	77	28316	4.6367	ug/L	100
25) Cyclohexane	3.971	56	35009	5.0522	ug/L	99
26) Bromochloromethane	3.986	130	16786	5.0742	ug/L	98
27) Chloroform	4.116	83	43019	5.0646	ug/L	99
28) Carbon Tetrachloride	4.255	117	34147	5.0837	ug/L	98
30) 1,1,1-Trichloroethane	4.351	97	37529	5.0254	ug/L	99
31) 1,1-Dichloropropene	4.510	75	28981	4.9414	ug/L	98
32) 2-Butanone	4.539	43	6581	5.0907	ug/L #	96
33) Benzene	4.799	78	91557	4.9841	ug/L	100
35) 1,2-Dichloroethane	5.037	62	29435	5.1460	ug/L	99
36) Methylcyclohexane	5.428	83	36223	4.9893	ug/L	99
37) Trichloroethene	5.451	130	27251	4.9389	ug/L	99
38) Dibromomethane	5.862	93	14614	5.1942	ug/L	98
39) 1,2-Dichloropropane	5.969	63	24584	5.1032	ug/L	99
40) Bromodichloromethane	6.053	83	32146	4.9995	ug/L	100
41) 1,4-Dioxane	6.262	88	2257	94.0635	ug/L	90
42) 2-Chloroethyl Vinyl Ether	6.629	63	9083	4.1568	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	36540	5.0431	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	5813	4.8566	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	31049	5.0407	ug/L	100
48) Toluene	6.858	91	101530	5.0762	ug/L	99
49) Tetrachloroethene	7.185	166	29104	5.1017	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	20117	5.1891	ug/L	99
51) Dibromochloromethane	7.509	129	26886	5.0809	ug/L	99

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

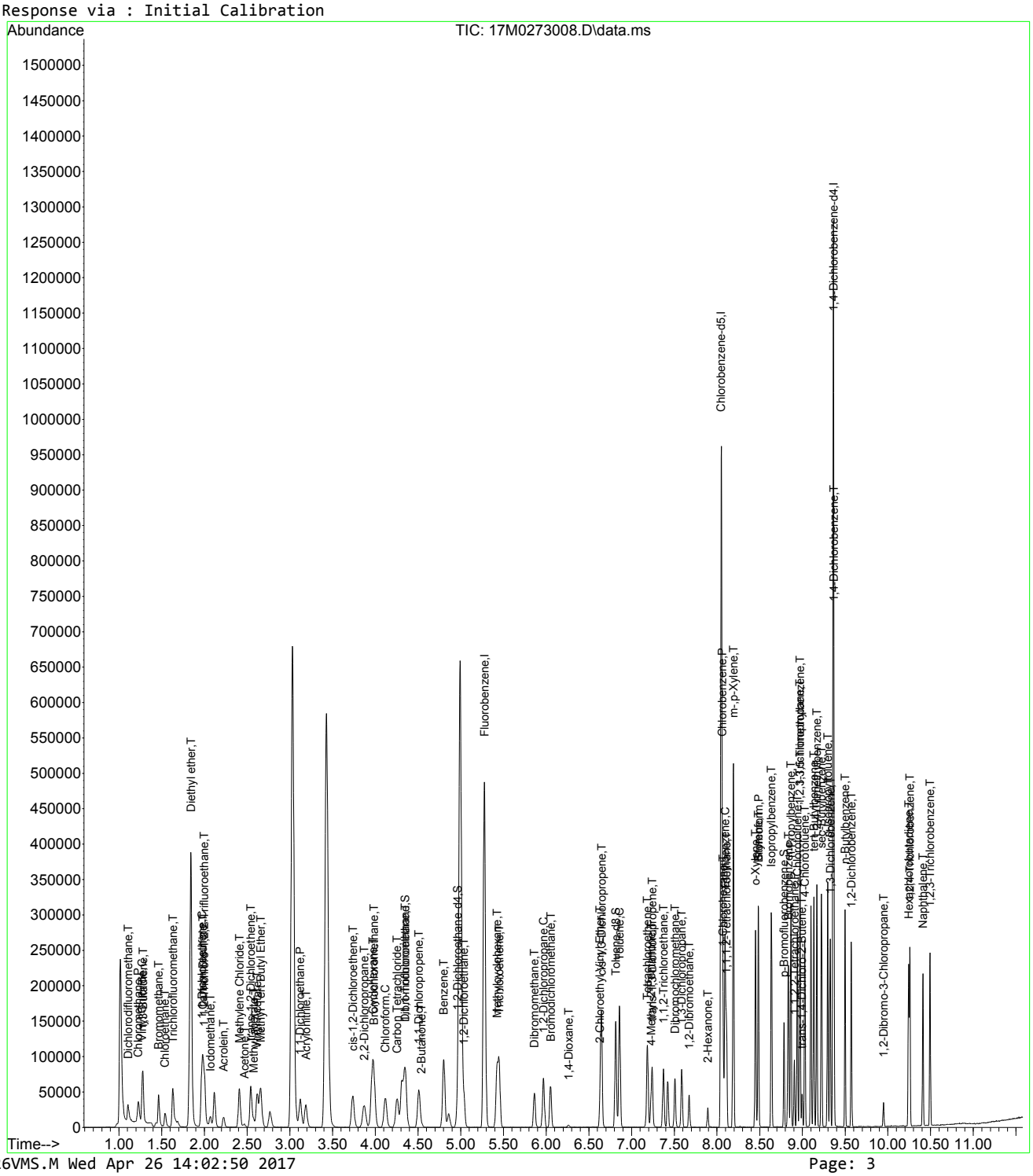
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	31843	5.1682 ug/L	98
53) 1,2-Dibromoethane	7.674	107	20257	5.1000 ug/L	99
54) 2-Hexanone	7.892	43	10630	5.2214 ug/L	100
55) Chlorobenzene	8.060	112	67203	5.0076 ug/L	93
56) 1-Chlorohexane	8.071	69	5432	5.0134 ug/L	83
57) Ethylbenzene	8.094	106	35155	5.0323 ug/L	97
58) 1,1,1,2-Tetrachloroethane	8.112	131	26571	5.0862 ug/L	99
59) m-,p-Xylene	8.193	106	85229	10.1090 ug/L	97
60) o-Xylene	8.450	106	41928	5.0473 ug/L	97
61) Styrene	8.482	104	66320	4.9896 ug/L	100
62) Bromoform	8.485	173	18946	5.0897 ug/L	99
63) Isopropylbenzene	8.636	105	109791	5.1061 ug/L	100
65) 1,3,5-Trimethylbenzene	8.972	105	93688	5.1422 ug/L	99
67) Bromobenzene	8.835	156	32100	4.9931 ug/L	99
68) n-Propylbenzene	8.864	91	123890	5.1333 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	23301	5.3002 ug/L	100
70) 2-Chlorotoluene	8.940	91	75963	5.0993 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	6702	5.1569 ug/L	98
72) trans-1,4-Dichloro-2-B...	8.995	53	4475	4.6190 ug/L #	91
73) 1,2,4-Trimethylbenzene	9.168	105	94879	5.1644 ug/L	99
74) 4-Chlorotoluene	9.029	91	75469	5.0745 ug/L	99
75) tert-Butylbenzene	9.134	134	18683	5.1309 ug/L	99
76) sec-Butylbenzene	9.223	105	116472	5.1891 ug/L	99
77) p-Isopropyltoluene	9.296	119	98419	5.1437 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	56651	5.0548 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	56423	4.9866 ug/L	99
80) n-Butylbenzene	9.499	91	82542	5.1112 ug/L	99
81) 1,2-Dichlorobenzene	9.574	146	55072	5.0420 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	4044	5.0142 ug/L	98
83) Hexachlorobutadiene	10.243	225	23413	5.0847 ug/L	99
84) 1,2,4-Trichlorobenzene	10.257	180	40601	5.0037 ug/L	100
85) Naphthalene	10.411	128	82078	5.1873 ug/L	100
86) 1,2,3-Trichlorobenzene	10.495	180	39894	5.0617 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:50 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	5.000	4.491	10.2	100	0.012
3	P	Chloromethane	5.000	4.799	4.0	100	0.012
4	C	Vinyl Chloride	5.000	4.836	3.3#	100	0.000
5	T	1,3-Butadiene	5.000	5.013	-0.3	100	0.012
6	T	Bromomethane	5.000	5.385	-7.7	100	0.000
7	T	Chloroethane	5.000	5.588	-11.8	100	0.011
8	T	Trichlorofluoromethane	5.000	5.322	-6.4	100	0.017
9	T	Diethyl ether	50.000	49.451	1.1	100	0.000
10	C	1,1-Dichloroethene	5.000	4.958	0.8#	100	0.015
11	T	Carbon Disulfide	5.000	4.987	0.3	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.000	5.150	-3.0	100	0.012
13	T	Iodomethane	5.000	4.415	11.7	100	0.011
14	T	Acrolein	25.000	25.661	-2.6	100	0.000
15	T	Methylene Chloride	5.000	4.961	0.8	100	0.012
16	T	Acetone	5.000	6.025	-20.5	100	0.000
17	T	trans-1,2-Dichloroethene	5.000	4.980	0.4	100	0.012
18	T	Methyl acetate	5.000	4.960	0.8	100	0.000
19	T	Methyl Tert Butyl Ether	5.000	5.086	-1.7	100	0.012
20	P	1,1-Dichloroethane	5.000	5.078	-1.6	100	0.000
21	T	Acrylonitrile	25.000	24.841	0.6	100	0.000
22	T	Vinyl Acetate	5.000	4.740	5.2	100	0.000
23	T	cis-1,2-Dichloroethene	5.000	5.066	-1.3	100	0.012
24	T	2,2-Dichloropropane	5.000	4.637	7.3	100	0.012
25	T	Cyclohexane	5.000	5.052	-1.0	100	0.000
26	T	Bromochloromethane	5.000	5.074	-1.5	100	0.012
27	C	Chloroform	5.000	5.065	-1.3#	100	0.000
28	T	Carbon Tetrachloride	5.000	5.084	-1.7	100	0.000
29	S	Dibromofluoromethane	5.000	5.101	-2.0	100	0.012
30	T	1,1,1-Trichloroethane	5.000	5.025	-0.5	100	0.000
31	T	1,1-Dichloropropene	5.000	4.941	1.2	100	0.000
32	T	2-Butanone	5.000	5.091	-1.8	100	0.015
33	T	Benzene	5.000	4.984	0.3	100	0.000
34	S	1,2-Dichloroethane-d4	5.000	5.336	-6.7	100	0.011
35	T	1,2-Dichloroethane	5.000	5.146	-2.9	100	0.000
36	T	Methylcyclohexane	5.000	4.989	0.2	100	0.000
37	T	Trichloroethene	5.000	4.939	1.2	100	0.000
38	T	Dibromomethane	5.000	5.194	-3.9	100	0.000
39	C	1,2-Dichloropropane	5.000	5.103	-2.1#	100	0.000
40	T	Bromodichloromethane	5.000	5.000	0.0	100	0.000
41	T	1,4-Dioxane	100.000	94.064	5.9	100	0.000
42	T	2-Chloroethyl Vinyl Ether	5.000	4.157	16.9	100	0.000
43	T	cis-1,3-Dichloropropene	5.000	5.043	-0.9	100	0.000
44	T	4-Methyl-2-Pentanone	5.000	4.857	2.9	100	0.000
45	T	trans-1,3-Dichloropropene	5.000	5.041	-0.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	5.000	5.205	-4.1	100	0.000
48	C	Toluene	5.000	5.076	-1.5#	100	0.000
49	T	Tetrachloroethene	5.000	5.102	-2.0	100	0.000
50	T	1,1,2-Trichloroethane	5.000	5.189	-3.8	100	0.000
51	T	Dibromochloromethane	5.000	5.081	-1.6	100	0.000
52	T	1,3-Dichloropropane	5.000	5.168	-3.4	100	0.000
53	T	1,2-Dibromoethane	5.000	5.100	-2.0	100	0.000
54	T	2-Hexanone	5.000	5.221	-4.4	100	0.000
55	P	Chlorobenzene	5.000	5.008	-0.2	100	0.000
56	T	1-Chlorohexane	5.000	5.013	-0.3	100	0.000
57	C	Ethylbenzene	5.000	5.032	-0.6#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	5.000	5.086	-1.7	100	0.000
59	T	m-,p-Xylene	10.000	10.109	-1.1	100	0.000
60	T	o-Xylene	5.000	5.047	-0.9	100	0.000
61	T	Styrene	5.000	4.990	0.2	100	0.000
62	P	Bromoform	5.000	5.090	-1.8	100	0.000
63	T	Isopropylbenzene	5.000	5.106	-2.1	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	5.000	5.142	-2.8	100	0.000
66	S	p-Bromofluorobenzene	5.000	4.542	9.2	100	0.000
67	T	Bromobenzene	5.000	4.993	0.1	100	0.000
68	T	n-Propylbenzene	5.000	5.133	-2.7	100	0.000
69	P	1,1,2,2-Tetrachloroethane	5.000	5.300	-6.0	100	0.000
70	T	2-Chlorotoluene	5.000	5.099	-2.0	100	0.000
71	T	1,2,3-Trichloropropane	5.000	5.157	-3.1	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	5.000	4.619	7.6	100	0.000
73	T	1,2,4-Trimethylbenzene	5.000	5.164	-3.3	100	0.000
74	T	4-Chlorotoluene	5.000	5.075	-1.5	100	0.000
75	T	tert-Butylbenzene	5.000	5.131	-2.6	100	0.000
76	T	sec-Butylbenzene	5.000	5.189	-3.8	100	0.000
77	T	p-Isopropyltoluene	5.000	5.144	-2.9	100	0.000
78	T	1,3-Dichlorobenzene	5.000	5.055	-1.1	100	0.000
79	T	1,4-Dichlorobenzene	5.000	4.987	0.3	100	0.000
80	T	n-Butylbenzene	5.000	5.111	-2.2	100	0.000
81	T	1,2-Dichlorobenzene	5.000	5.042	-0.8	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	5.000	5.014	-0.3	100	0.000
83	T	Hexachlorobutadiene	5.000	5.085	-1.7	100	0.000
84	T	1,2,4-Trichlorobenzene	5.000	5.004	-0.1	100	0.000
85	T	Naphthalene	5.000	5.187	-3.7	100	0.000
86	T	1,2,3-Trichlorobenzene	5.000	5.062	-1.2	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	415989	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	308316	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	155966	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	41370	9.2085	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.834%#			
34) 1,2-Dichloroethane-d4	4.956	65	39416	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.441%#			
47) Toluene-d8	6.815	98	144252	9.3749	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 37.500%#			
66) p-Bromofluorobenzene	8.784	95	48881	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 37.441%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	107073	21.6728	ug/L	100
3) Chloromethane	1.218	50	97047	20.0719	ug/L	100
4) Vinyl Chloride	1.264	62	110236	20.5901	ug/L	99
5) 1,3-Butadiene	1.276	54	65854	20.0334	ug/L	99
6) Bromomethane	1.458	94	79989	20.0955	ug/L	100
7) Chloroethane	1.534	64	58403	22.9945	ug/L	100
8) Trichlorofluoromethane	1.626	101	147654	21.5007	ug/L	99
9) Diethyl ether	1.838	59	271363	81.9400	ug/L	100
10) 1,1-Dichloroethene	1.962	61	129870	20.2111	ug/L	100
11) Carbon Disulfide	1.977	76	273076	19.8007	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	82665	20.1789	ug/L	100
13) Iodomethane	2.063	142	90634	16.0415	ug/L	99
14) Acrolein	2.220	56	16470	40.2609	ug/L	100
15) Methylene Chloride	2.405	84	94958	19.4753	ug/L	99
16) Acetone	2.463	43	17323	20.7112	ug/L	97
17) trans-1,2-Dichloroethene	2.538	96	87762	20.0586	ug/L	99
18) Methyl acetate	2.573	43	47763	21.7821	ug/L #	98
19) Methyl Tert Butyl Ether	2.654	73	223741	20.1499	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	159579	20.3066	ug/L	99
21) Acrylonitrile	3.181	53	43518	40.7919	ug/L	100
22) Vinyl Acetate	2.616	86	13399	19.0279	ug/L	87
23) cis-1,2-Dichloroethene	3.731	96	98926	19.9747	ug/L	100
24) 2,2-Dichloropropane	3.867	77	117122	18.9833	ug/L	98
25) Cyclohexane	3.966	56	132299	19.7932	ug/L	99
26) Bromochloromethane	3.983	130	65363	20.4839	ug/L	100
27) Chloroform	4.116	83	162820	19.8724	ug/L	100
28) Carbon Tetrachloride	4.255	117	133209	20.5600	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	146436	20.3288	ug/L	100
31) 1,1-Dichloropropene	4.504	75	113299	20.0273	ug/L	99
32) 2-Butanone	4.530	43	23212	18.6149	ug/L	97
33) Benzene	4.800	78	350607	19.7868	ug/L	100
35) 1,2-Dichloroethane	5.031	62	110449	20.0184	ug/L	100
36) Methylcyclohexane	5.422	83	133533	19.0679	ug/L	100
37) Trichloroethene	5.448	130	105023	19.7330	ug/L	100
38) Dibromomethane	5.859	93	54492	20.0791	ug/L	100
39) 1,2-Dichloropropane	5.966	63	93539	20.1299	ug/L	100
40) Bromodichloromethane	6.050	83	125080	20.1673	ug/L	99
41) 1,4-Dioxane	6.259	88	3291	142.1926	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.629	63	38855	18.4348	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	142778	20.4290	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	21644	18.7468	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	121640	20.4727	ug/L	100
48) Toluene	6.858	91	390265	20.1896	ug/L	100
49) Tetrachloroethene	7.185	166	108682	19.7126	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	75279	20.0923	ug/L	100
51) Dibromochloromethane	7.507	129	104430	20.4202	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

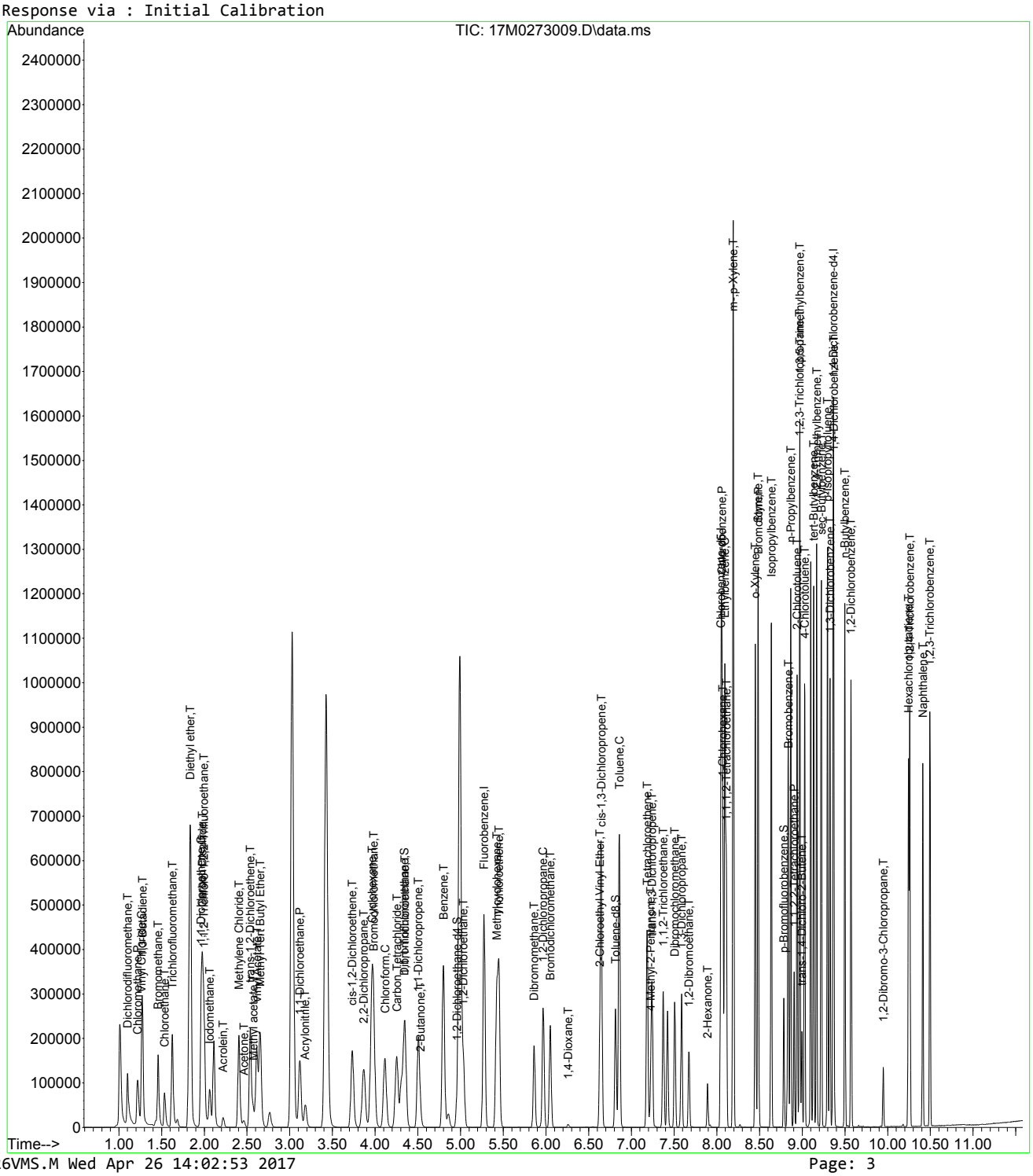
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	121547	20.4125	ug/L		100
53) 1,2-Dibromoethane	7.675	107	76988	20.0559	ug/L		99
54) 2-Hexanone	7.892	43	38232	19.4315	ug/L		100
55) Chlorobenzene	8.060	112	258733	19.9487	ug/L		98
56) 1-Chlorohexane	8.071	69	20340	19.4243	ug/L		84
57) Ethylbenzene	8.095	106	135392	20.0539	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.112	131	101795	20.1621	ug/L		100
59) m-,p-Xylene	8.193	106	327137	40.1491	ug/L		97
60) o-Xylene	8.451	106	160719	20.0193	ug/L		98
61) Styrene	8.482	104	262832	20.4609	ug/L		100
62) Bromoform	8.485	173	73848	20.5278	ug/L		100
63) Isopropylbenzene	8.639	105	420954	20.2572	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	353581	20.3360	ug/L		100
67) Bromobenzene	8.839	156	122250	19.9264	ug/L		99
68) n-Propylbenzene	8.865	91	469314	20.3768	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	85621	20.4085	ug/L		100
70) 2-Chlorotoluene	8.940	91	286030	20.1202	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24779	19.9792	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	20177	21.8236	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	356727	20.3467	ug/L		100
74) 4-Chlorotoluene	9.027	91	285276	20.1003	ug/L		99
75) tert-Butylbenzene	9.134	134	69653	20.0447	ug/L		100
76) sec-Butylbenzene	9.224	105	435489	20.3309	ug/L		100
77) p-Isopropyltoluene	9.296	119	374739	20.5229	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	213997	20.0086	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	209144	19.3691	ug/L		100
80) n-Butylbenzene	9.499	91	311602	20.2190	ug/L		99
81) 1,2-Dichlorobenzene	9.571	146	208933	20.0442	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	15581	20.2441	ug/L		97
83) Hexachlorobutadiene	10.243	225	85120	19.3709	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	156012	20.1477	ug/L		100
85) Naphthalene	10.411	128	308618	20.4385	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	149504	19.8771	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:53 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417906	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	317098	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167026	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115980	25.6974	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.790%			
34) 1,2-Dichloroethane-d4	4.953	65	108720	25.6997	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.799%			
47) Toluene-d8	6.812	98	406817	25.7068	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.827%			
66) p-Bromofluorobenzene	8.783	95	141725	25.3421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.368%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	273383	55.0820	ug/L	100
3) Chloromethane	1.212	50	241081	49.6332	ug/L	100
4) Vinyl Chloride	1.261	62	274798	51.0919	ug/L	100
5) 1,3-Butadiene	1.270	54	170920	51.7569	ug/L	100
6) Bromomethane	1.455	94	185476	46.3830	ug/L	100
7) Chloroethane	1.528	64	113694	44.5585	ug/L	100
8) Trichlorofluoromethane	1.615	101	370004	53.6311	ug/L	100
9) Diethyl ether	1.835	59	343062	103.1148	ug/L	100
10) 1,1-Dichloroethene	1.956	61	324434	50.2586	ug/L	100
11) Carbon Disulfide	1.971	76	711965	51.3878	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	212072	51.5304	ug/L	100
13) Iodomethane	2.058	142	303865	48.8576	ug/L	100
14) Acrolein	2.217	56	22080	53.7270	ug/L	100
15) Methylene Chloride	2.399	84	234342	47.8417	ug/L	100
16) Acetone	2.460	43	40588	48.3039	ug/L	99
17) trans-1,2-Dichloroethene	2.532	96	221078	50.2970	ug/L	100
18) Methyl acetate	2.567	43	128727	58.4362	ug/L #	98
19) Methyl Tert Butyl Ether	2.648	73	575057	51.5516	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	399083	50.5507	ug/L	100
21) Acrylonitrile	3.181	53	55941	52.1961	ug/L	100
22) Vinyl Acetate	2.608	86	37712	53.3092	ug/L	91
23) cis-1,2-Dichloroethene	3.728	96	250294	50.3065	ug/L	100
24) 2,2-Dichloropropane	3.858	77	316045	50.5289	ug/L	100
25) Cyclohexane	3.963	56	351763	52.3857	ug/L	100
26) Bromochloromethane	3.974	130	167162	52.1461	ug/L	100
27) Chloroform	4.110	83	408367	49.6131	ug/L	100
28) Carbon Tetrachloride	4.246	117	339910	52.2223	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	366464	50.6404	ug/L	100
31) 1,1-Dichloropropene	4.501	75	294187	51.7635	ug/L	100
32) 2-Butanone	4.524	43	63238	50.4812	ug/L	100
33) Benzene	4.797	78	884324	49.6787	ug/L	100
35) 1,2-Dichloroethane	5.031	62	277929	50.1424	ug/L	100
36) Methylcyclohexane	5.422	83	366430	52.0844	ug/L	100
37) Trichloroethene	5.445	130	266043	49.7582	ug/L	100
38) Dibromomethane	5.859	93	140437	51.5105	ug/L	100
39) 1,2-Dichloropropane	5.966	63	238320	51.0521	ug/L	100
40) Bromodichloromethane	6.047	83	318787	51.1640	ug/L	100
41) 1,4-Dioxane	6.256	88	4661	200.4617	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	106937	50.5036	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	371992	52.9813	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	58337	50.2965	ug/L	100
45) trans-1,3-Dichloropropene	7.240	75	316603	53.0417	ug/L	100
48) Toluene	6.858	91	1001874	50.3945	ug/L	100
49) Tetrachloroethene	7.182	166	285329	50.3192	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	194901	50.5792	ug/L	100
51) Dibromochloromethane	7.507	129	274126	52.1181	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

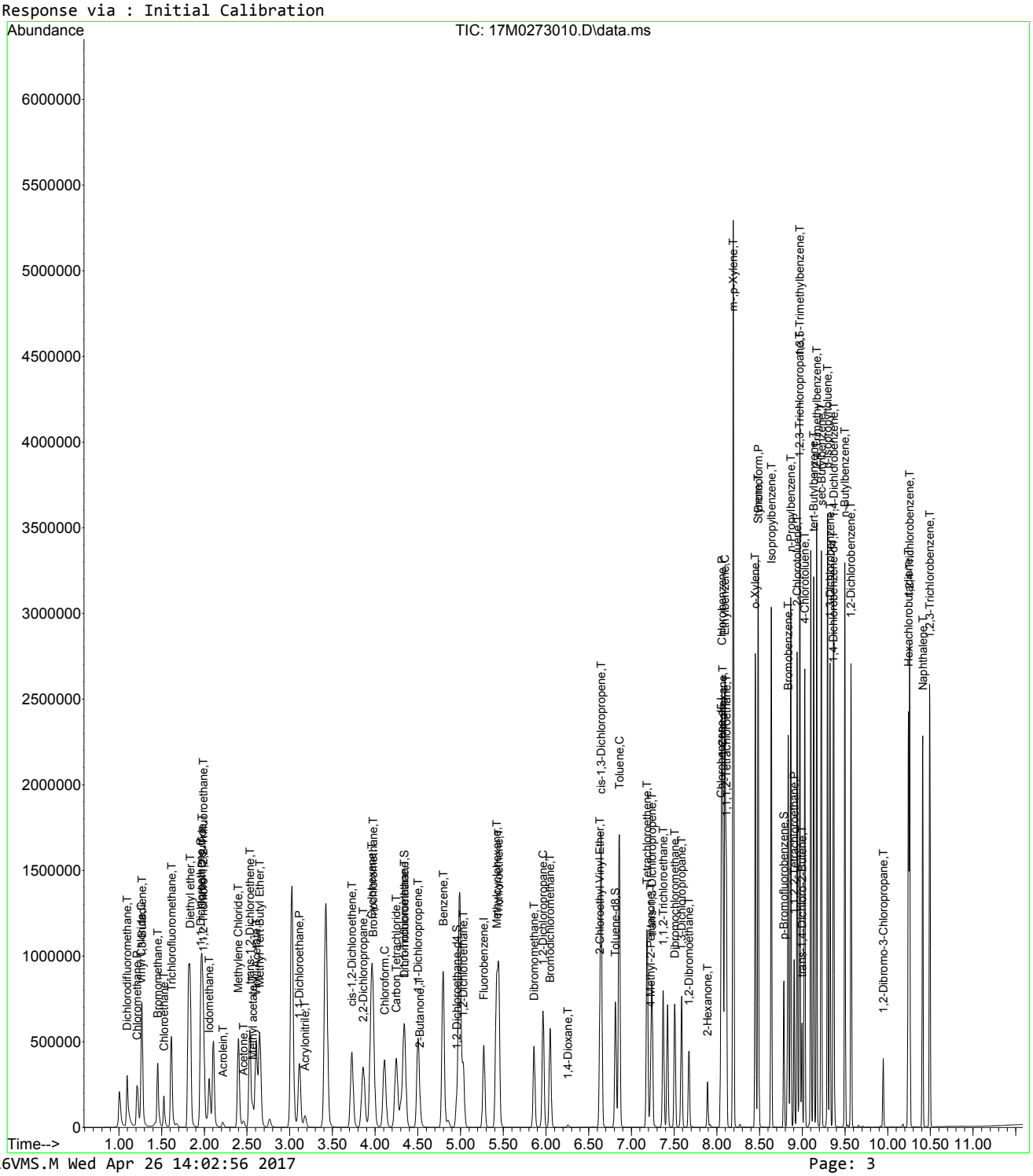
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	310634	50.7227	ug/L		100
53) 1,2-Dibromoethane	7.675	107	202402	51.2669	ug/L		100
54) 2-Hexanone	7.892	43	102578	50.6916	ug/L		100
55) Chlorobenzene	8.060	112	671778	50.3605	ug/L		100
56) 1-Chlorohexane	8.071	69	56830	52.7686	ug/L		100
57) Ethylbenzene	8.094	106	354570	51.0636	ug/L		100
58) 1,1,1,2-Tetrachloroethane	8.112	131	263117	50.6712	ug/L		100
59) m-,p-Xylene	8.193	106	866538	103.4037	ug/L		100
60) o-Xylene	8.450	106	423285	51.2646	ug/L		100
61) Styrene	8.482	104	700211	53.0002	ug/L		100
62) Bromoform	8.485	173	202713	54.7882	ug/L		100
63) Isopropylbenzene	8.639	105	1095961	51.2793	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	941312	50.5541	ug/L		100
67) Bromobenzene	8.836	156	322344	49.0619	ug/L		100
68) n-Propylbenzene	8.864	91	1246315	50.5297	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	238334	53.0473	ug/L		100
70) 2-Chlorotoluene	8.940	91	752979	49.4596	ug/L		100
71) 1,2,3-Trichloropropane	8.969	110	66677	50.2014	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	54428	54.9716	ug/L	#	100
73) 1,2,4-Trimethylbenzene	9.169	105	950457	50.6217	ug/L		100
74) 4-Chlorotoluene	9.030	91	761067	50.0733	ug/L		100
75) tert-Butylbenzene	9.134	134	183420	49.2893	ug/L		100
76) sec-Butylbenzene	9.224	105	1166744	50.8629	ug/L		100
77) p-Isopropyltoluene	9.296	119	1013386	51.8240	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	575762	50.2687	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	570068	49.2988	ug/L		100
80) n-Butylbenzene	9.499	91	877964	53.1964	ug/L		100
81) 1,2-Dichlorobenzene	9.571	146	560761	50.2349	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	44335	53.7892	ug/L		100
83) Hexachlorobutadiene	10.243	225	244851	52.0316	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	445052	53.6691	ug/L		100
85) Naphthalene	10.411	128	870655	53.8418	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	422273	52.4250	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:56 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	416412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	322460	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.366	152	174149	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	231222	51.4151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 205.660%#			
34) 1,2-Dichloroethane-d4	4.959	65	212387	50.3851	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 201.540%#			
47) Toluene-d8	6.815	98	820550	50.9885	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 203.954%#			
66) p-Bromofluorobenzene	8.786	95	299359	51.3394	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 205.358%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	539830	109.1568	ug/L	100
3) Chloromethane	1.215	50	509696	105.3116	ug/L	100
4) Vinyl Chloride	1.261	62	558799	104.2675	ug/L	100
5) 1,3-Butadiene	1.273	54	332020	100.9009	ug/L	99
6) Bromomethane	1.455	94	363546	91.2402	ug/L	99
7) Chloroethane	1.528	64	219087	86.1717	ug/L	99
8) Trichlorofluoromethane	1.606	101	628305	91.3979	ug/L	99
9) Diethyl ether	1.841	59	666542	201.0626	ug/L	100
10) 1,1-Dichloroethene	1.953	61	657831	102.2712	ug/L	100
11) Carbon Disulfide	1.968	76	1388153	100.5527	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	410087	100.0026	ug/L	100
13) Iodomethane	2.058	142	632275	99.8486	ug/L	100
14) Acrolein	2.220	56	41772	102.0079	ug/L	99
15) Methylene Chloride	2.399	84	477038	97.7384	ug/L	100
16) Acetone	2.466	43	81015	96.7621	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	452419	103.2982	ug/L	99
18) Methyl acetate	2.573	43	246307	112.2133	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	1158243	104.2044	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	814580	103.5507	ug/L	100
21) Acrylonitrile	3.184	53	109445	102.4848	ug/L	99
22) Vinyl Acetate	2.605	86	68474	97.1413	ug/L	81
23) cis-1,2-Dichloroethene	3.731	96	513237	103.5255	ug/L	99
24) 2,2-Dichloropropane	3.861	77	635375	101.6691	ug/L	100
25) Cyclohexane	3.963	56	686248	102.5650	ug/L	99
26) Bromochloromethane	3.980	130	340996	106.7552	ug/L	100
27) Chloroform	4.110	83	831165	101.3417	ug/L	100
28) Carbon Tetrachloride	4.249	117	691112	106.5604	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	746228	103.4887	ug/L	100
31) 1,1-Dichloropropene	4.504	75	587037	103.6624	ug/L	100
32) 2-Butanone	4.530	43	127054	101.7877	ug/L	100
33) Benzene	4.797	78	1806588	101.8528	ug/L	100
35) 1,2-Dichloroethane	5.034	62	560473	101.4803	ug/L	100
36) Methylcyclohexane	5.425	83	693665	98.9514	ug/L	100
37) Trichloroethene	5.448	130	544959	102.2898	ug/L	99
38) Dibromomethane	5.862	93	286873	105.5988	ug/L	100
39) 1,2-Dichloropropane	5.966	63	487994	104.9115	ug/L	100
40) Bromodichloromethane	6.050	83	655753	105.6233	ug/L	100
41) 1,4-Dioxane	6.259	88	11272	486.5289	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.632	63	223283	105.8292	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	759853	108.6111	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	117344	101.5337	ug/L	99
45) trans-1,3-Dichloropropene	7.243	75	639506	107.5233	ug/L	100
48) Toluene	6.861	91	2019788	99.9064	ug/L	99
49) Tetrachloroethene	7.185	166	569494	98.7631	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	391353	99.8722	ug/L	100
51) Dibromochloromethane	7.510	129	559220	104.5535	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

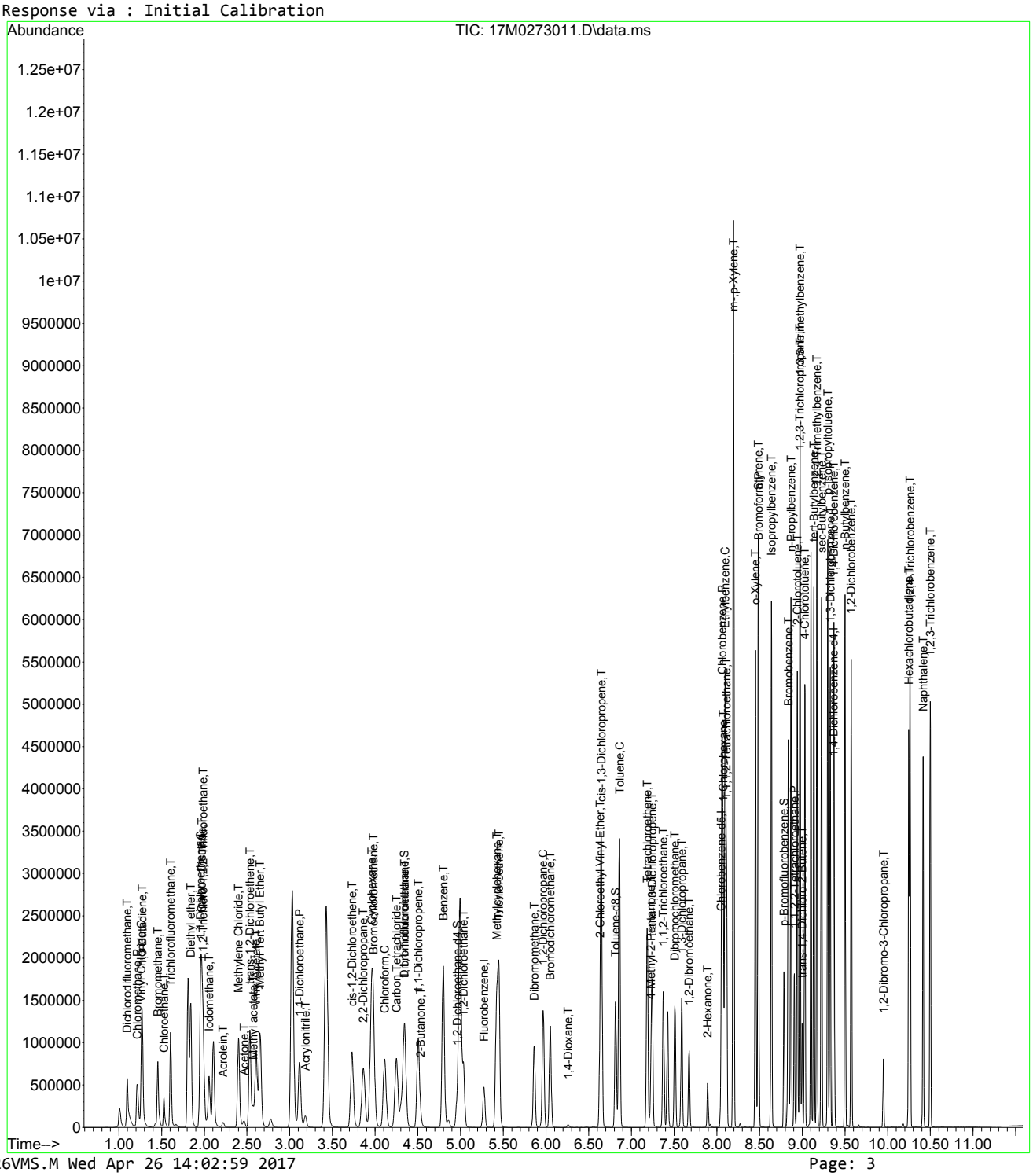
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	628375	100.8998	ug/L		100
53) 1,2-Dibromoethane	7.675	107	404718	100.8074	ug/L		99
54) 2-Hexanone	7.892	43	205809	100.0147	ug/L		100
55) Chlorobenzene	8.063	112	1370148	101.0066	ug/L		100
56) 1-Chlorohexane	8.074	69	110333	100.7444	ug/L		93
57) Ethylbenzene	8.097	106	720227	101.9990	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	539757	102.2182	ug/L		100
59) m-,p-Xylene	8.196	106	1760776	206.6191	ug/L		98
60) o-Xylene	8.453	106	860737	102.5116	ug/L		99
61) Styrene	8.485	104	1437076	106.9660	ug/L		100
62) Bromoform	8.488	173	409507	108.8390	ug/L		100
63) Isopropylbenzene	8.639	105	2195751	101.0295	ug/L		100
65) 1,3,5-Trimethylbenzene	8.975	105	1894143	97.5661	ug/L		100
67) Bromobenzene	8.839	156	656082	95.7737	ug/L		100
68) n-Propylbenzene	8.867	91	2460312	95.6691	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.908	83	459840	98.1628	ug/L		100
70) 2-Chlorotoluene	8.943	91	1511609	95.2292	ug/L		100
71) 1,2,3-Trichloropropane	8.972	110	133032	96.0637	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	104884	101.5987	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.172	105	1913672	97.7541	ug/L		100
74) 4-Chlorotoluene	9.030	91	1517738	95.7730	ug/L		99
75) tert-Butylbenzene	9.137	134	369444	95.2178	ug/L		99
76) sec-Butylbenzene	9.227	105	2287023	95.6223	ug/L		99
77) p-Isopropyltoluene	9.299	119	1998379	98.0160	ug/L		99
78) 1,3-Dichlorobenzene	9.328	146	1155544	96.7618	ug/L		99
79) 1,4-Dichlorobenzene	9.371	146	1146291	95.0753	ug/L		100
80) n-Butylbenzene	9.502	91	1722841	100.1183	ug/L		100
81) 1,2-Dichlorobenzene	9.574	146	1130299	97.1145	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	91272	106.2061	ug/L		99
83) Hexachlorobutadiene	10.246	225	476519	97.1199	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	897981	103.8590	ug/L		100
85) Naphthalene	10.417	128	1727630	102.4678	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	823456	98.0503	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:59 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	422742	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.054	117	336124	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.365	152	172896	25.00000	ug/L	# 0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	457792	100.2715	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 401.086%#			
34) 1,2-Dichloroethane-d4	4.962	65	411299	96.1124	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 384.450%#			
47) Toluene-d8	6.817	98	1632836	97.3388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 389.355%#			
66) p-Bromofluorobenzene	8.789	95	645488	111.5020	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 446.008%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1123418	223.7603	ug/L	100
3) Chloromethane	1.218	50	1006074	204.7589	ug/L	100
4) Vinyl Chloride	1.264	62	1130871	207.8521	ug/L	100
5) 1,3-Butadiene	1.276	54	685580	205.2281	ug/L	100
6) Bromomethane	1.458	94	716567	177.1461	ug/L	99
7) Chloroethane	1.531	64	426821	165.3643	ug/L	97
8) Trichlorofluoromethane	1.606	101	1102484	157.9741	ug/L	99
9) Diethyl ether	1.843	59	3720	1.1053	ug/L	93
10) 1,1-Dichloroethene	1.956	61	1286118	196.9553	ug/L	100
11) Carbon Disulfide	1.971	76	2821100	201.2903	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	825067	198.1856	ug/L	100
13) Iodomethane	2.058	142	1333071	205.2109	ug/L	100
14) Acrolein	2.220	56	2243	5.3954	ug/L	100
15) Methylene Chloride	2.402	84	935406	188.7818	ug/L	100
16) Acetone	2.469	43	158152	186.0640	ug/L	99
17) trans-1,2-Dichloroethene	2.535	96	898207	202.0115	ug/L	100
18) Methyl acetate	2.576	43	529604	237.6658	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	2259635	200.2500	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	1611611	201.8029	ug/L	100
21) Acrylonitrile	3.184	53	143	0.1319	ug/L #	7
22) Vinyl Acetate	2.611	86	152152	212.6197	ug/L	79
23) cis-1,2-Dichloroethene	3.731	96	1025145	203.6866	ug/L	100
24) 2,2-Dichloropropane	3.867	77	1266128	199.3016	ug/L	99
25) Cyclohexane	3.968	56	1443111	212.4544	ug/L	98
26) Bromochloromethane	3.986	130	680841	209.9583	ug/L	100
27) Chloroform	4.116	83	1630953	195.8801	ug/L	100
28) Carbon Tetrachloride	4.252	117	1390908	211.2485	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	1477746	201.8688	ug/L	100
31) 1,1-Dichloropropene	4.507	75	1190890	207.1454	ug/L	100
32) 2-Butanone	4.533	43	254497	200.8340	ug/L	100
33) Benzene	4.799	78	3549706	197.1306	ug/L	100
35) 1,2-Dichloroethane	5.037	62	1109187	197.8242	ug/L	100
36) Methylcyclohexane	5.428	83	1502567	211.1318	ug/L	100
37) Trichloroethene	5.451	130	1086595	200.9018	ug/L	99
38) Dibromomethane	5.862	93	573997	208.1262	ug/L	100
39) 1,2-Dichloropropane	5.969	63	972277	205.8952	ug/L	99
40) Bromodichloromethane	6.053	83	1300334	206.3109	ug/L	100
41) 1,4-Dioxane	6.267	88	427	18.1545	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.635	63	462111	215.7466	ug/L	100
43) cis-1,3-Dichloropropene	6.652	75	1544723	217.4919	ug/L	100
44) 4-Methyl-2-Pentanone	7.231	58	247079	210.5876	ug/L	99
45) trans-1,3-Dichloropropene	7.246	75	1303100	215.8160	ug/L	100
48) Toluene	6.864	91	4027711	191.1271	ug/L	99
49) Tetrachloroethene	7.188	166	1179771	196.2816	ug/L	99
50) 1,1,2-Trichloroethane	7.376	97	783346	191.7811	ug/L	99
51) Dibromochloromethane	7.512	129	1136390	203.8259	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

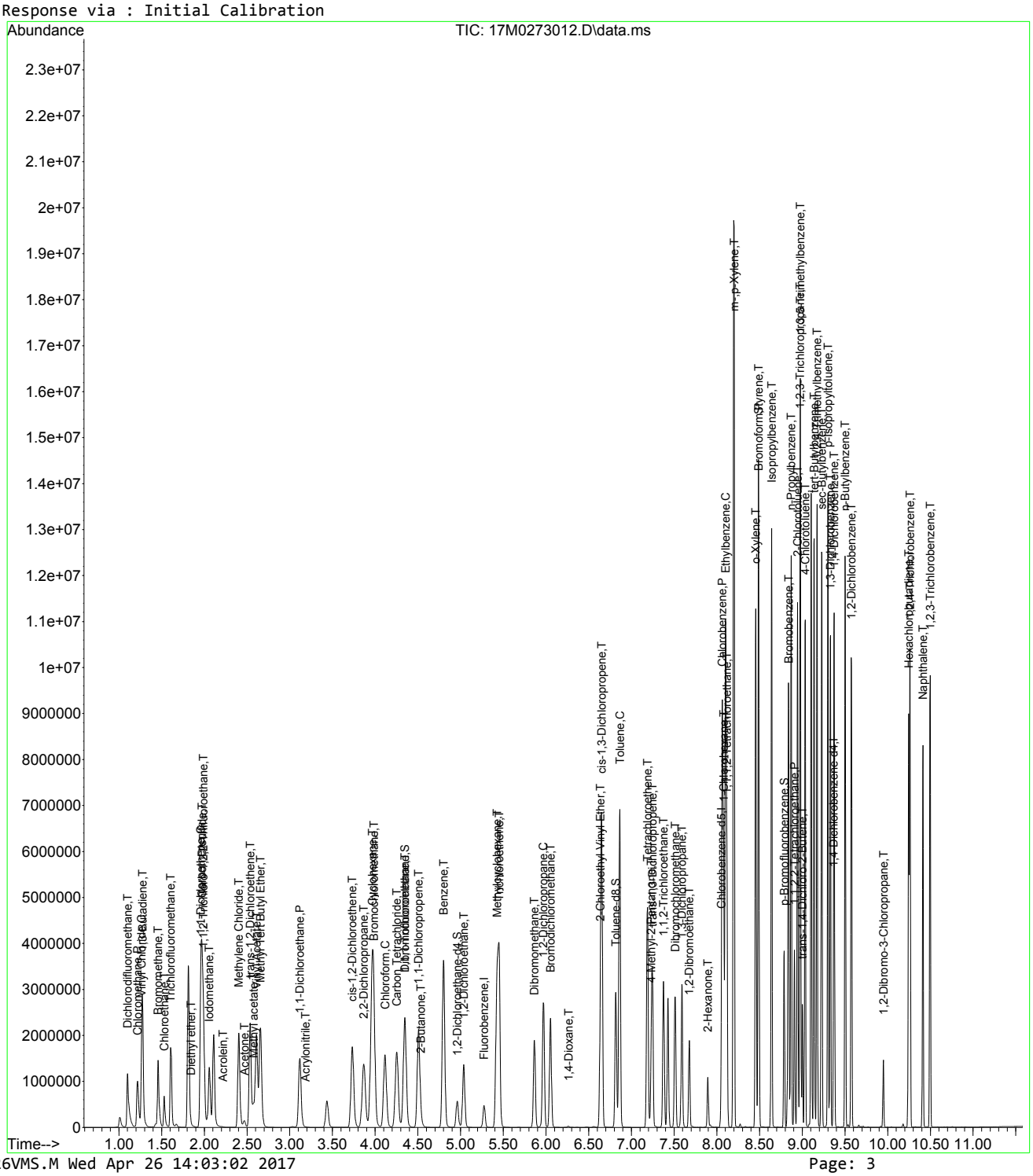
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1259427	194.0084 ug/L	99
53) 1,2-Dibromoethane	7.677	107	819308	195.7778 ug/L	99
54) 2-Hexanone	7.895	43	433472	202.0863 ug/L	99
55) Chlorobenzene	8.062	112	2815311	199.1062 ug/L	99
56) 1-Chlorohexane	8.080	69	241282	211.3571 ug/L	93
57) Ethylbenzene	8.103	106	1512310	205.4678 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.117	131	1104704	200.7023 ug/L	99
59) m-,p-Xylene	8.201	106	3595369	404.7493 ug/L	92
60) o-Xylene	8.456	106	1810464	206.8564 ug/L	97
61) Styrene	8.488	104	3005372	214.6053 ug/L	99
62) Bromoform	8.491	173	876359	223.4506 ug/L	100
63) Isopropylbenzene	8.642	105	4537785	200.3019 ug/L	97
65) 1,3,5-Trimethylbenzene	8.977	105	3876481	201.1221 ug/L	98
67) Bromobenzene	8.841	156	1397197	205.4384 ug/L	100
68) n-Propylbenzene	8.870	91	5099958	199.7489 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.908	83	975708	209.7955 ug/L	100
70) 2-Chlorotoluene	8.946	91	3200183	203.0680 ug/L	99
71) 1,2,3-Trichloropropane	8.975	110	277077	201.5300 ug/L	95
72) trans-1,4-Dichloro-2-B...	9.001	53	221040	215.6681 ug/L #	96
73) 1,2,4-Trimethylbenzene	9.174	105	3801181	195.5789 ug/L	97
74) 4-Chlorotoluene	9.035	91	3225947	205.0404 ug/L	98
75) tert-Butylbenzene	9.140	134	776105	201.4772 ug/L	94
76) sec-Butylbenzene	9.229	105	4546895	191.4871 ug/L	97
77) p-Isopropyltoluene	9.302	119	3910662	193.1992 ug/L	97
78) 1,3-Dichlorobenzene	9.331	146	2355778	198.6954 ug/L	98
79) 1,4-Dichlorobenzene	9.374	146	2315642	193.4552 ug/L	100
80) n-Butylbenzene	9.501	91	3388493	198.3403 ug/L	98
81) 1,2-Dichlorobenzene	9.577	146	2200775	190.4594 ug/L	98
82) 1,2-Dibromo-3-Chloropr...	9.950	75	167553	196.3812 ug/L	100
83) Hexachlorobutadiene	10.246	225	910189	186.8511 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	1714658	199.7517 ug/L	99
85) Naphthalene	10.413	128	3126949	186.8072 ug/L	99
86) 1,2,3-Trichlorobenzene	10.497	180	1583634	189.9325 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	421163	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.051	117	318095	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167190	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.348	111	349	0.0767	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.307%#			
34) 1,2-Dichloroethane-d4	4.994	65	5040	1.1822	ug/L		0.0405
Spiked Amount 25.000	Range 80 - 120		Recovery =	4.729%#			
47) Toluene-d8	6.818	98	3065	0.1931	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.772%#			
66) p-Bromofluorobenzene	8.784	95	2416	0.4316	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.726%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.105	85	6972	1.3939	ug/L		92
3) Chloromethane	1.212	50	17159	3.5053	ug/L		99
4) Vinyl Chloride	1.267	62	3350	0.6180	ug/L		95
5) 1,3-Butadiene	1.276	54	1017883	305.8452	ug/L		100
6) Bromomethane	1.458	94	147661	36.6409	ug/L		99
7) Chloroethane	1.528	64	774	0.3010	ug/L	#	1
8) Trichlorofluoromethane	1.606	101	3390	0.4876	ug/L		94
9) Diethyl ether	1.846	59	976700	291.2984	ug/L		100
10) 1,1-Dichloroethene	1.953	61	4141	0.6365	ug/L		100
11) Carbon Disulfide	1.965	76	4144048	296.7934	ug/L		99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	4030	0.9717	ug/L		99
13) Iodomethane	2.058	142	1505993	232.4313	ug/L		100
14) Acrolein	2.228	56	60168	145.2737	ug/L		99
15) Methylene Chloride	2.405	84	2234	0.4526	ug/L		97
16) Acetone	2.475	43	227499	268.6534	ug/L		100
17) trans-1,2-Dichloroethene	2.538	96	4122	0.9305	ug/L		98
18) Methyl acetate	2.579	43	793361	357.3646	ug/L	#	97
19) Methyl Tert Butyl Ether	2.666	73	1685	0.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	1574	0.1978	ug/L		92
21) Acrylonitrile	3.190	53	164892	152.6638	ug/L		100
22) Vinyl Acetate	2.608	86	202937	284.6507	ug/L		82
23) cis-1,2-Dichloroethene	3.740	96	2225	0.4437	ug/L		93
24) 2,2-Dichloropropane	3.873	77	904	0.4162	ug/L	#	81
25) Cyclohexane	3.969	56	2110437	311.8629	ug/L		99
26) Bromochloromethane	3.986	130	800	0.2476	ug/L		99
27) Chloroform	4.119	83	2791	0.3365	ug/L		95
28) Carbon Tetrachloride	4.258	117	2228	0.3397	ug/L		99
30) 1,1,1-Trichloroethane	4.348	97	1716	0.2353	ug/L		97
31) 1,1-Dichloropropene	4.504	75	5532	0.9659	ug/L	#	1
32) 2-Butanone	4.533	43	386102	305.8312	ug/L	#	75
33) Benzene	4.802	78	6042	0.3368	ug/L		98
35) 1,2-Dichloroethane	5.034	62	890	0.1593	ug/L	#	55
36) Methylcyclohexane	5.428	83	2089398	294.6906	ug/L		99
37) Trichloroethene	5.451	130	4538	0.8422	ug/L		96
38) Dibromomethane	5.862	93	711	0.2588	ug/L		99
39) 1,2-Dichloropropane	5.972	63	809	0.1720	ug/L	#	75
40) Bromodichloromethane	6.050	83	1149	0.1830	ug/L		94
41) 1,4-Dioxane	6.262	88	15860	676.8366	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.635	63	704063	329.9396	ug/L		99
43) cis-1,3-Dichloropropene	6.653	75	3088	0.4364	ug/L		94
44) 4-Methyl-2-Pentanone	7.229	58	356679	305.1404	ug/L		89
45) trans-1,3-Dichloropropene	7.246	75	2608	0.4335	ug/L	#	44
48) Toluene	6.858	91	10685	0.5358	ug/L		100
49) Tetrachloroethene	7.185	166	7101	1.2484	ug/L		99
50) 1,1,2-Trichloroethane	7.373	97	542	0.1402	ug/L	#	65
51) Dibromochloromethane	7.510	129	818	0.1550	ug/L		98

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

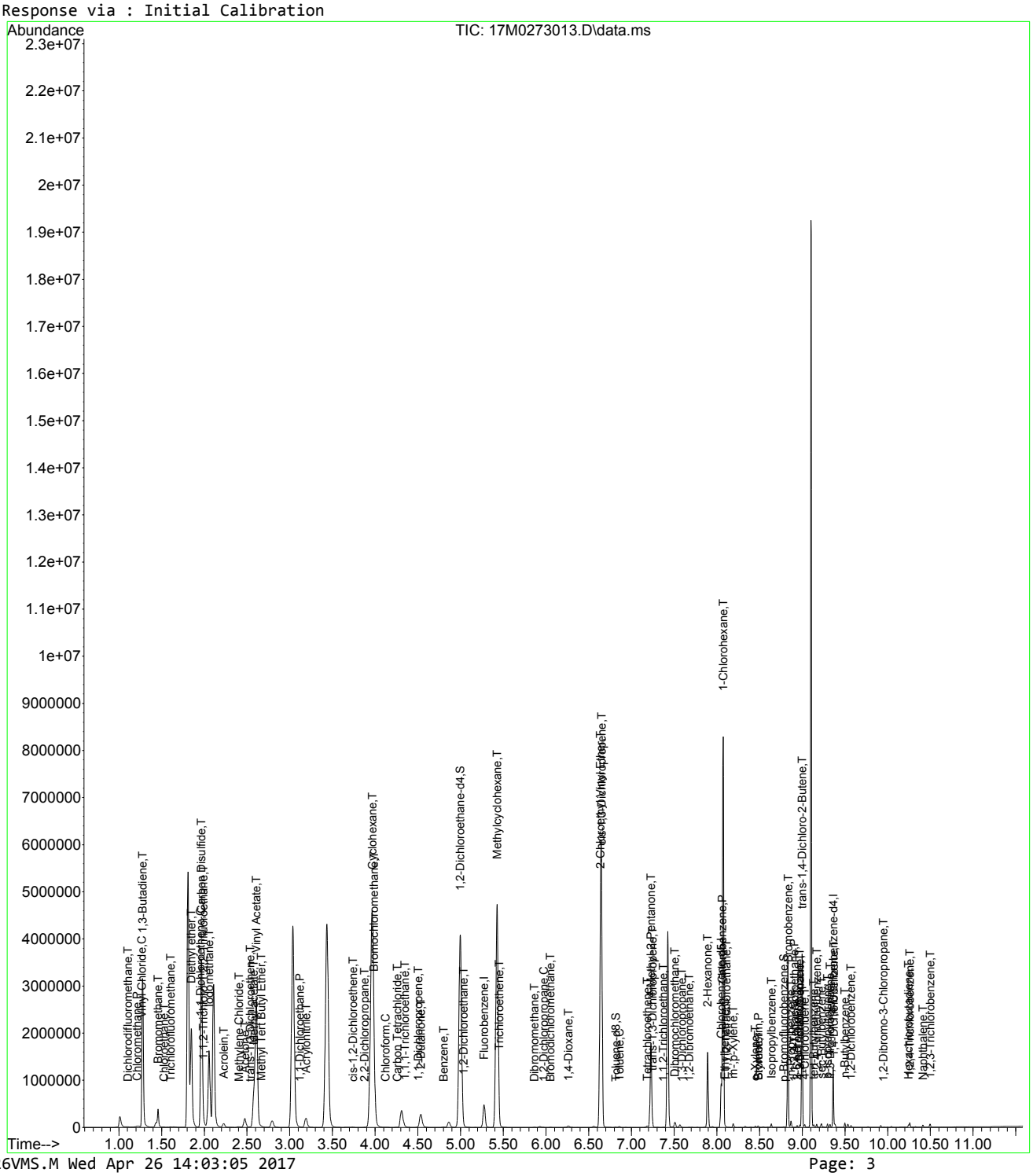
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1557	0.2534	ug/L		96
53) 1,2-Dibromoethane	7.677	107	1315	0.3320	ug/L		83
54) 2-Hexanone	7.892	43	628976	309.8508	ug/L		99
55) Chlorobenzene	8.063	112	8335	0.6229	ug/L	#	1
56) 1-Chlorohexane	8.074	69	332865	308.1078	ug/L	#	1
57) Ethylbenzene	8.094	106	4492	0.6449	ug/L	#	1
58) 1,1,1,2-Tetrachloroethane	8.112	131	902	0.1732	ug/L		85
59) m-,p-Xylene	8.193	106	12446	1.4805	ug/L		92
60) o-Xylene	8.451	106	4066	0.4909	ug/L		99
61) Styrene	8.485	104	8240	0.6217	ug/L		98
62) Bromoform	8.485	173	663	0.1786	ug/L	#	79
63) Isopropylbenzene	8.639	105	23066	1.0759	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	14997	0.8046	ug/L		97
67) Bromobenzene	8.836	156	4020	0.6113	ug/L	#	1
68) n-Propylbenzene	8.865	91	32164	1.3028	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	643	0.1430	ug/L		99
70) 2-Chlorotoluene	8.940	91	11336	0.7439	ug/L		97
71) 1,2,3-Trichloropropane	8.972	110	252	0.1895	ug/L	#	1
72) trans-1,4-Dichloro-2-B...	8.998	53	334602	337.6122	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	15648	0.8326	ug/L		99
74) 4-Chlorotoluene	9.030	91	16738	1.1002	ug/L		100
75) tert-Butylbenzene	9.134	134	2631	0.7063	ug/L		98
76) sec-Butylbenzene	9.224	105	25971	1.1311	ug/L		99
77) p-Isopropyltoluene	9.296	119	20909	1.0682	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	13448	1.1730	ug/L		98
79) 1,4-Dichlorobenzene	9.368	146	14447	1.2481	ug/L		96
80) n-Butylbenzene	9.499	91	25212	1.5261	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	8203	0.7341	ug/L		98
82) 1,2-Dibromo-3-Chloropr...	9.947	75	274	0.3321	ug/L		74
83) Hexachlorobutadiene	10.243	225	5645	1.1984	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	15501	1.8674	ug/L		99
85) Naphthalene	10.414	128	18220	1.1256	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	11288	1.4000	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

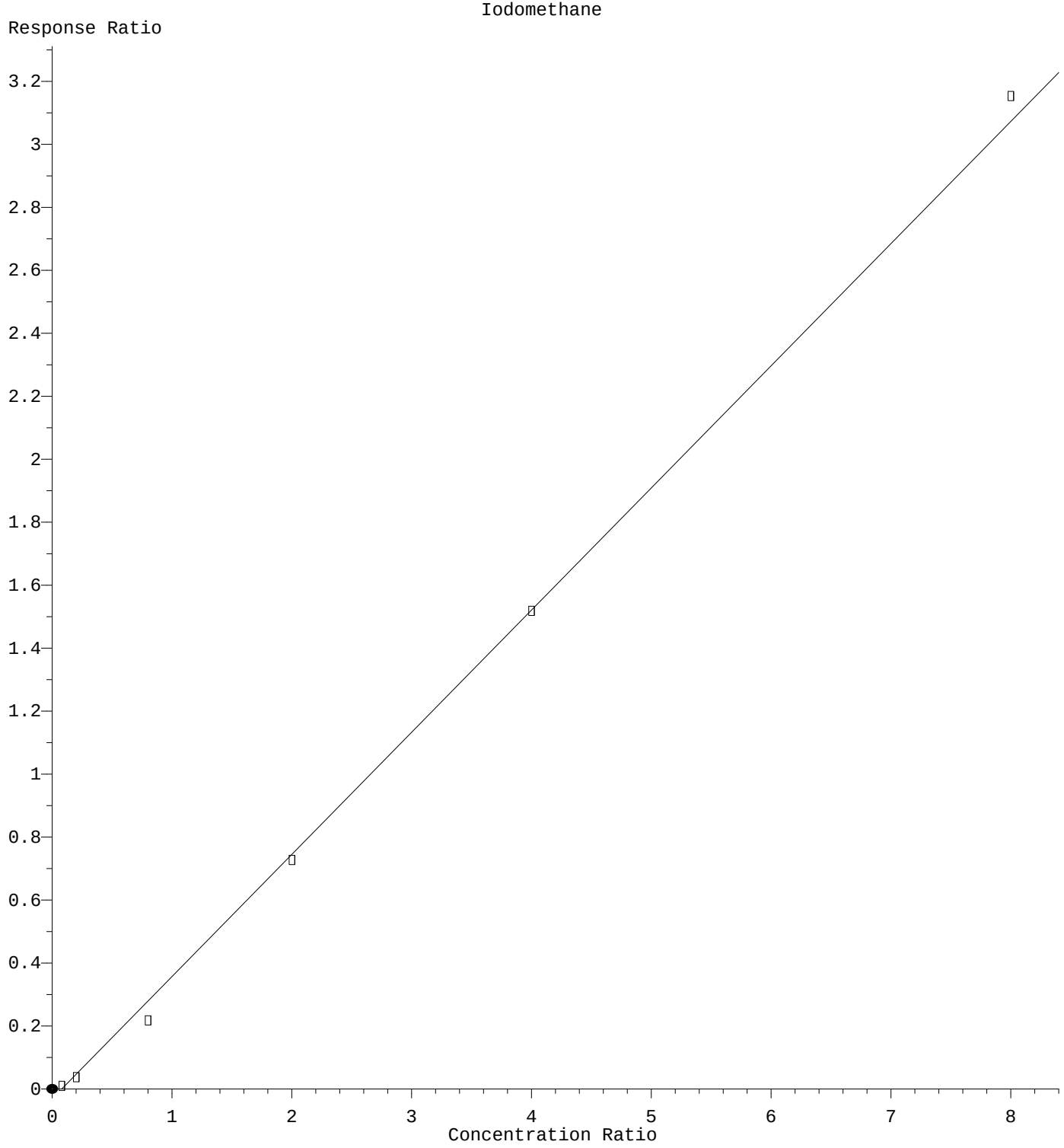
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

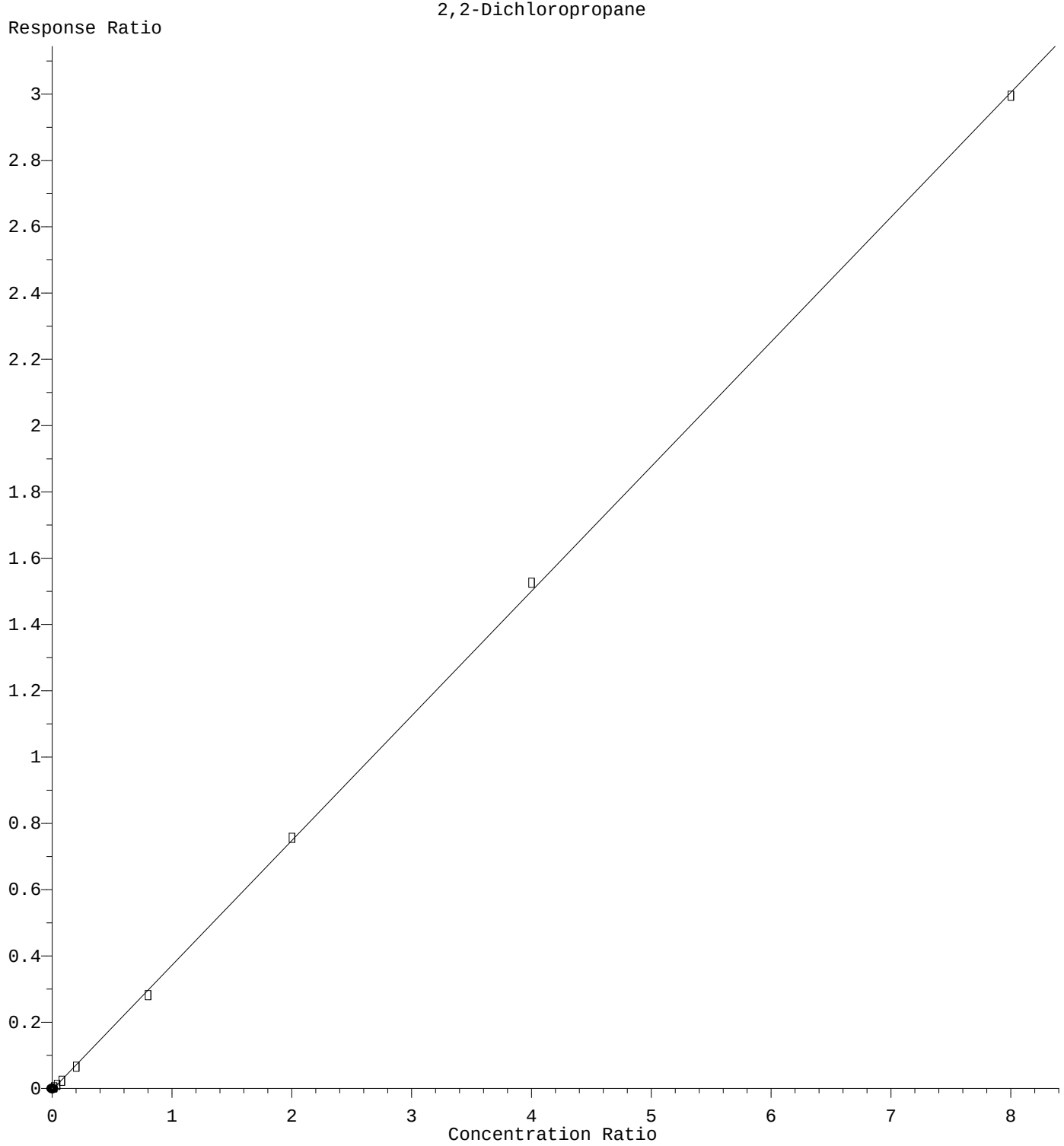


826VMS.M Wed Apr 26 14:03:05 2017 Page: 3



Response = 3.879e-001 * Amt - 3.105e-002
Coef of Det (r^2) = 0.996358 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

2,2-Dichloropropane



Response = 3.762e-001 * Amt - 4.116e-003
Coef of Det (r^2) = 0.999589 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	427426	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	325357	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	172416	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115154	24.9461	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.784%			
34) 1,2-Dichloroethane-d4	4.956	65	107614	24.8717	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.487%			
47) Toluene-d8	6.812	98	413254	25.4507	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.803%			
66) p-Bromofluorobenzene	8.786	95	146143	25.3151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.260%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.091	85	340360	67.0494	ug/L	100
3) Chloromethane	1.209	50	296192	59.6212	ug/L	99
4) Vinyl Chloride	1.256	62	335286	60.9497	ug/L	100
5) 1,3-Butadiene	1.267	54	281377	83.3070	ug/L	99
6) Bromomethane	1.450	94	177201	43.3267	ug/L	99
7) Chloroethane	1.519	64	108932	41.7413	ug/L	99
8) Trichlorofluoromethane	1.597	101	225737	31.9912	ug/L	100
9) Diethyl ether	1.841	59	316851	93.1153	ug/L	100
10) 1,1-Dichloroethene	1.939	61	284785	43.1339	ug/L	100
11) Carbon Disulfide	1.951	76	621205	43.8383	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.971	101	212873	50.5729	ug/L	99
13) Iodomethane	2.043	142	436680	67.8380	ug/L	100
14) Acrolein	2.220	56	42666	101.5062	ug/L	100
15) Methylene Chloride	2.394	84	222390	44.3905	ug/L	99
16) Acetone	2.472	43	42575	49.5401	ug/L	99
17) trans-1,2-Dichloroethene	2.524	96	211286	46.9986	ug/L	100
18) Methyl acetate	2.585	43	266388	118.2346	ug/L #	77
19) Methyl Tert Butyl Ether	2.657	73	586859	51.4378	ug/L #	100
20) 1,1-Dichloroethane	3.106	63	386650	47.8850	ug/L	100
21) Acrylonitrile	3.184	53	55958	51.0491	ug/L	100
22) Vinyl Acetate	2.593	86	33146	45.8112	ug/L #	1
23) cis-1,2-Dichloroethene	3.720	96	246047	48.3515	ug/L	100
24) 2,2-Dichloropropane	3.853	77	277540	43.4231	ug/L	100
25) Cyclohexane	3.951	56	319980	46.5911	ug/L	92
26) Bromochloromethane	3.974	130	161439	49.2391	ug/L	100
27) Chloroform	4.108	83	411531	48.8839	ug/L	100
28) Carbon Tetrachloride	4.241	117	326387	49.0278	ug/L	100
30) 1,1,1-Trichloroethane	4.336	97	369604	49.9368	ug/L	100
31) 1,1-Dichloropropene	4.496	75	278322	47.8813	ug/L	100
32) 2-Butanone	4.533	43	64598	50.4183	ug/L #	77
33) Benzene	4.791	78	864999	47.5107	ug/L	100
35) 1,2-Dichloroethane	5.028	62	268041	47.2814	ug/L	100
36) Methylcyclohexane	5.416	83	337902	46.9597	ug/L	99
37) Trichloroethene	5.442	130	264383	48.3464	ug/L	100
38) Dibromomethane	5.859	93	136084	48.8021	ug/L	100
39) 1,2-Dichloropropane	5.964	63	232197	48.6326	ug/L	100
40) Bromodichloromethane	6.047	83	305406	47.9247	ug/L	100
41) 1,4-Dioxane	6.268	88	4924	207.0561	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	119939	55.3825	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	366582	51.0479	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	61610	51.9353	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	294490	48.2382	ug/L	100
48) Toluene	6.855	91	962641	47.1919	ug/L	100
49) Tetrachloroethene	7.182	166	271333	46.6363	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	183455	46.4003	ug/L	100
51) Dibromochloromethane	7.507	129	255775	47.3947	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

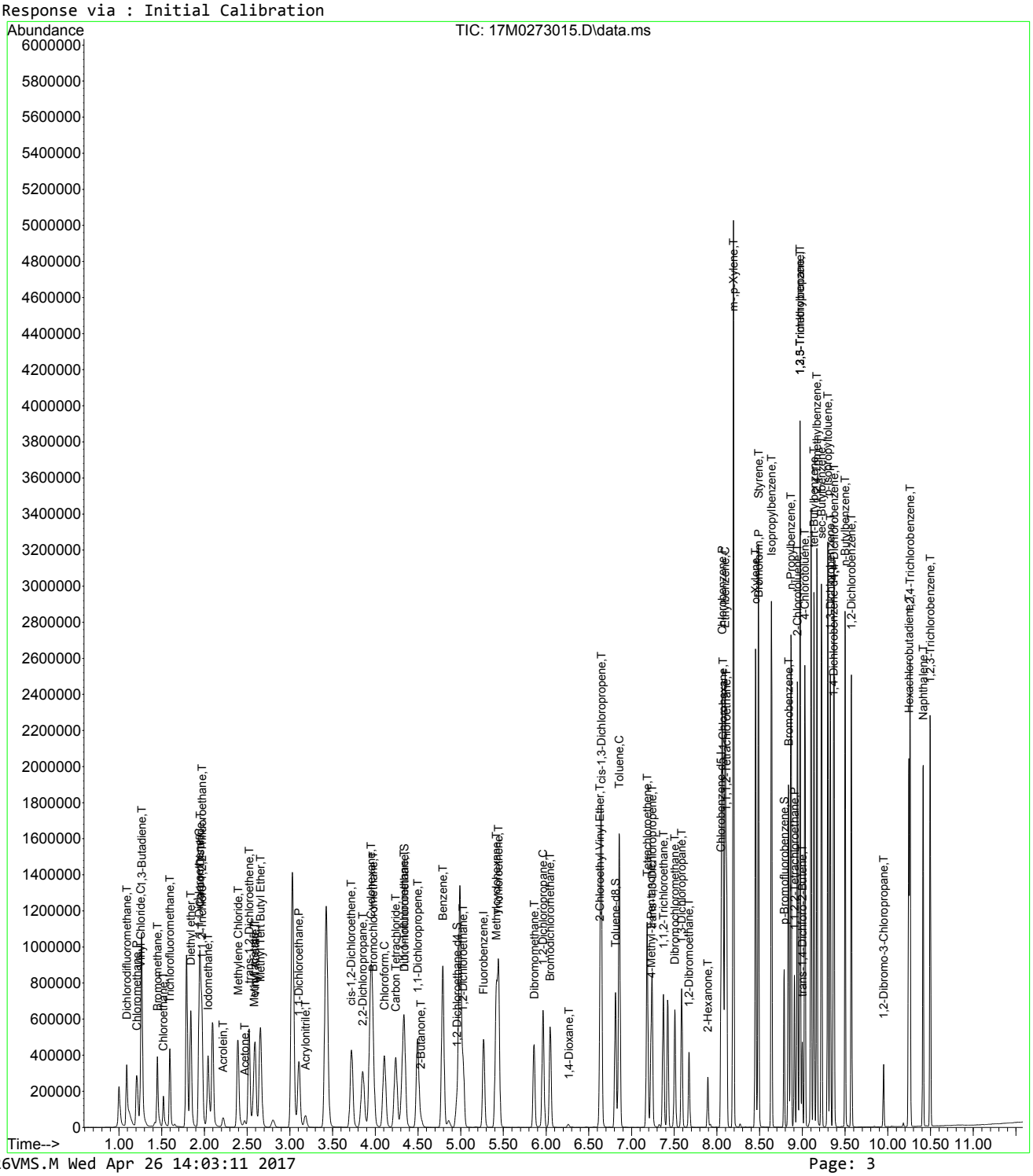
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	304079	48.3920 ug/L	100
53) 1,2-Dibromoethane	7.672	107	188269	46.4766 ug/L	99
54) 2-Hexanone	7.892	43	111735	53.8151 ug/L	99
55) Chlorobenzene	8.060	112	645652	47.1733 ug/L	100
56) 1-Chlorohexane	8.071	69	57184	51.7495 ug/L	92
57) Ethylbenzene	8.094	106	338763	47.5487 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.112	131	249632	46.8539 ug/L	99
59) m-,p-Xylene	8.193	106	824011	95.8330 ug/L	100
60) o-Xylene	8.451	106	407790	48.1343 ug/L	99
61) Styrene	8.485	104	676703	49.9206 ug/L	100
62) Bromoform	8.488	173	186092	49.0192 ug/L	100
63) Isopropylbenzene	8.639	105	1026933	46.8298 ug/L	100
65) 1,3,5-Trimethylbenzene	8.972	105	881437	45.8586 ug/L	100
67) Bromobenzene	8.839	156	305375	45.0262 ug/L	98
68) n-Propylbenzene	8.865	91	1132307	44.4723 ug/L	100
69) 1,1,2,2-Tetrachloroethane	8.905	83	209471	45.1656 ug/L	100
70) 2-Chlorotoluene	8.940	91	699415	44.5050 ug/L	99
71) 1,2,3-Trichloropropane	8.972	110	63151	46.0603 ug/L	96
72) trans-1,4-Dichloro-2-B...	8.998	53	41660	40.7607 ug/L #	93
73) 1,2,4-Trimethylbenzene	9.169	105	890512	45.9463 ug/L	100
74) 4-Chlorotoluene	9.030	91	720079	45.8955 ug/L	100
75) tert-Butylbenzene	9.134	134	171753	44.7113 ug/L	99
76) sec-Butylbenzene	9.224	105	1059058	44.7251 ug/L	100
77) p-Isopropyltoluene	9.296	119	926654	45.9071 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	527115	44.5827 ug/L	100
79) 1,4-Dichlorobenzene	9.371	146	537479	45.0275 ug/L	100
80) n-Butylbenzene	9.499	91	781454	45.8686 ug/L	99
81) 1,2-Dichlorobenzene	9.574	146	530951	46.0775 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	39964	46.9704 ug/L	96
83) Hexachlorobutadiene	10.246	225	211253	43.4885 ug/L	100
84) 1,2,4-Trichlorobenzene	10.260	180	408655	47.7394 ug/L	100
85) Naphthalene	10.414	128	784767	47.0133 ug/L	100
86) 1,2,3-Trichlorobenzene	10.498	180	377306	45.3780 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:11 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	102	0.000
2	T	Dichlorodifluoromethane	50.000	67.049	-34.1#	124	0.000
3	P	Chloromethane	50.000	59.621	-19.2	123	0.000
4	C	Vinyl Chloride	50.000	60.950	-21.9#	122	0.000
5	T	1,3-Butadiene	50.000	83.307	-66.6#	165	0.000
6	T	Bromomethane	50.000	43.327	13.3	96	0.000
7	T	Chloroethane	50.000	41.741	16.5	96	0.000
8	T	Trichlorofluoromethane	50.000	31.991	36.0#	61	-0.018
9	T	Diethyl ether	100.000	93.115	6.9	92	0.000
10	C	1,1-Dichloroethene	50.000	43.134	13.7#	88	-0.017
11	T	Carbon Disulfide	50.000	43.838	12.3	87	-0.020
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	50.573	-1.1	100	-0.017
13	T	Iodomethane	50.000	67.838	-35.7#	144	-0.015
14	T	Acrolein	50.000	101.506	-103.0#	193	0.000
15	T	Methylene Chloride	50.000	44.390	11.2	95	0.000
16	T	Acetone	50.000	49.540	0.9	105	0.012
17	T	trans-1,2-Dichloroethene	50.000	46.999	6.0	96	0.000
18	T	Methyl acetate	50.000	118.235	-136.5#	207	0.018
19	T	Methyl Tert Butyl Ether	50.000	51.438	-2.9	102	0.000
20	P	1,1-Dichloroethane	50.000	47.885	4.2	97	0.000
21	T	Acrylonitrile	50.000	51.049	-2.1	100	0.000
22	T	Vinyl Acetate	50.000	45.811	8.4	88	-0.015
23	T	cis-1,2-Dichloroethene	50.000	48.351	3.3	98	0.000
24	T	2,2-Dichloropropane	50.000	43.423	13.2	88	0.000
25	T	Cyclohexane	50.000	46.591	6.8	91	-0.012
26	T	Bromochloromethane	50.000	49.239	1.5	97	0.000
27	C	Chloroform	50.000	48.884	2.2#	101	0.000
28	T	Carbon Tetrachloride	50.000	49.028	1.9	96	0.000
29	S	Dibromofluoromethane	25.000	24.946	0.2	99	0.000
30	T	1,1,1-Trichloroethane	50.000	49.937	0.1	101	0.000
31	T	1,1-Dichloropropene	50.000	47.881	4.2	95	0.000
32	T	2-Butanone	50.000	50.418	-0.8	102	0.000
33	T	Benzene	50.000	47.511	5.0	98	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.872	0.5	99	0.000
35	T	1,2-Dichloroethane	50.000	47.281	5.4	96	0.000
36	T	Methylcyclohexane	50.000	46.960	6.1	92	0.000
37	T	Trichloroethene	50.000	48.346	3.3	99	0.000
38	T	Dibromomethane	50.000	48.802	2.4	97	0.000
39	C	1,2-Dichloropropane	50.000	48.633	2.7#	97	0.000
40	T	Bromodichloromethane	50.000	47.925	4.2	96	0.000
41	T	1,4-Dioxane	200.000	207.056	-3.5	106	0.012
42	T	2-Chloroethyl Vinyl Ether	50.000	55.383	-10.8	112	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.048	-2.1	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	51.935	-3.9	106	0.000
45	T	trans-1,3-Dichloropropene	50.000	48.238	3.5	93	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.451	-1.8	102	0.000
48	C	Toluene	50.000	47.192	5.6#	96	0.000
49	T	Tetrachloroethene	50.000	46.636	6.7	95	0.000
50	T	1,1,2-Trichloroethane	50.000	46.400	7.2	94	0.000
51	T	Dibromochloromethane	50.000	47.395	5.2	93	0.000
52	T	1,3-Dichloropropane	50.000	48.392	3.2	98	0.000
53	T	1,2-Dibromoethane	50.000	46.477	7.0	93	0.000
54	T	2-Hexanone	50.000	53.815	-7.6	109	0.000
55	P	Chlorobenzene	50.000	47.173	5.7	96	0.000
56	T	1-Chlorohexane	50.000	51.749	-3.5	101	0.000
57	C	Ethylbenzene	50.000	47.549	4.9#	96	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	46.854	6.3	95	0.000
59	T	m-,p-Xylene	100.000	95.833	4.2	95	0.000
60	T	o-Xylene	50.000	48.134	3.7	96	0.000
61	T	Styrene	50.000	49.921	0.2	97	0.000
62	P	Bromoform	50.000	49.019	2.0	92	0.000
63	T	Isopropylbenzene	50.000	46.830	6.3	94	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	103	0.000
65	T	1,3,5-Trimethylbenzene	50.000	45.859	8.3	94	0.000
66	S	p-Bromofluorobenzene	25.000	25.315	-1.3	103	0.000
67	T	Bromobenzene	50.000	45.026	9.9	95	0.000
68	T	n-Propylbenzene	50.000	44.472	11.1	91	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.166	9.7	88	0.000
70	T	2-Chlorotoluene	50.000	44.505	11.0	93	0.000
71	T	1,2,3-Trichloropropane	50.000	46.060	7.9	95	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	40.761	18.5	77	0.000
73	T	1,2,4-Trimethylbenzene	50.000	45.946	8.1	94	0.000
74	T	4-Chlorotoluene	50.000	45.895	8.2	95	0.000
75	T	tert-Butylbenzene	50.000	44.711	10.6	94	0.000
76	T	sec-Butylbenzene	50.000	44.725	10.5	91	0.000
77	T	p-Isopropyltoluene	50.000	45.907	8.2	91	0.000
78	T	1,3-Dichlorobenzene	50.000	44.583	10.8	92	0.000
79	T	1,4-Dichlorobenzene	50.000	45.027	9.9	94	0.000
80	T	n-Butylbenzene	50.000	45.869	8.3	89	0.000
81	T	1,2-Dichlorobenzene	50.000	46.077	7.8	95	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.970	6.1	90	0.000
83	T	Hexachlorobutadiene	50.000	43.488	13.0	86	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.739	4.5	92	0.000
85	T	Naphthalene	50.000	47.013	6.0	90	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.378	9.2	89	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:31:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

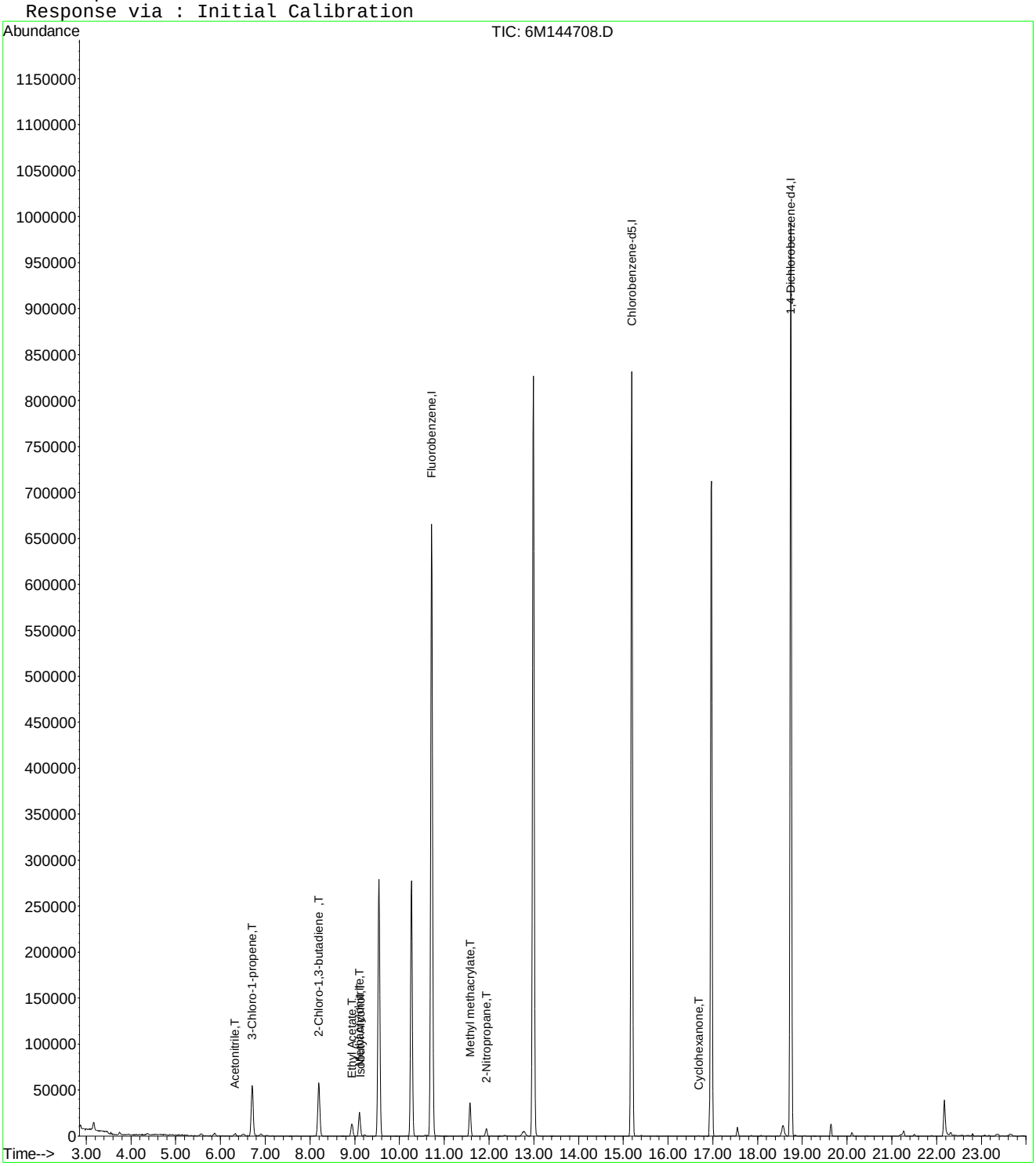
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	865370	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	638669	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	353919	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	3679	5.9467	ug/L		88
3) 3-Chloro-1-propene	6.70	41	52014	5.0135	ug/L		95
4) 2-Chloro-1,3-butadiene	8.19	53	60212	4.7023	ug/L		97
5) Ethyl Acetate	8.93	43	24851	4.4777	ug/L		98
6) Methacrylonitrile	9.10	67	13164	4.5054	ug/L		95
7) Isobutyl Alcohol	9.12	43	1340	7.4492	ug/L	#	85
9) Methyl methacrylate	11.57	41	25255	4.1589	ug/L		95
10) 2-Nitropropane	11.94	43	9310	3.7703	ug/L		96
13) Cyclohexanone	16.69	55	637	4.7569	ug/L	#	25

(#) = qualifier out of range (m) = manual integration
6M144708.D A9FOOWT.M Fri Jan 13 08:34:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:31 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	5.9467	-18.9	100	0.00
3	T	3-Chloro-1-propene	5.0000	5.0135	-0.3	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.7023	6.0	100	0.00
5	T	Ethyl Acetate	5.0000	4.4778	10.4	100	0.00
6	T	Methacrylonitrile	5.0000	4.5054	9.9	100	0.00
7	T	Isobutyl Alcohol	10.0000	7.4492	25.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	5.0000	4.1589	16.8	100	0.00
10	T	2-Nitropropane	-1.0000	3.7703	0.0	0	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	4.7569	0.0	0	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144708.D A9FOOWT.M Fri Jan 13 08:34:56 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

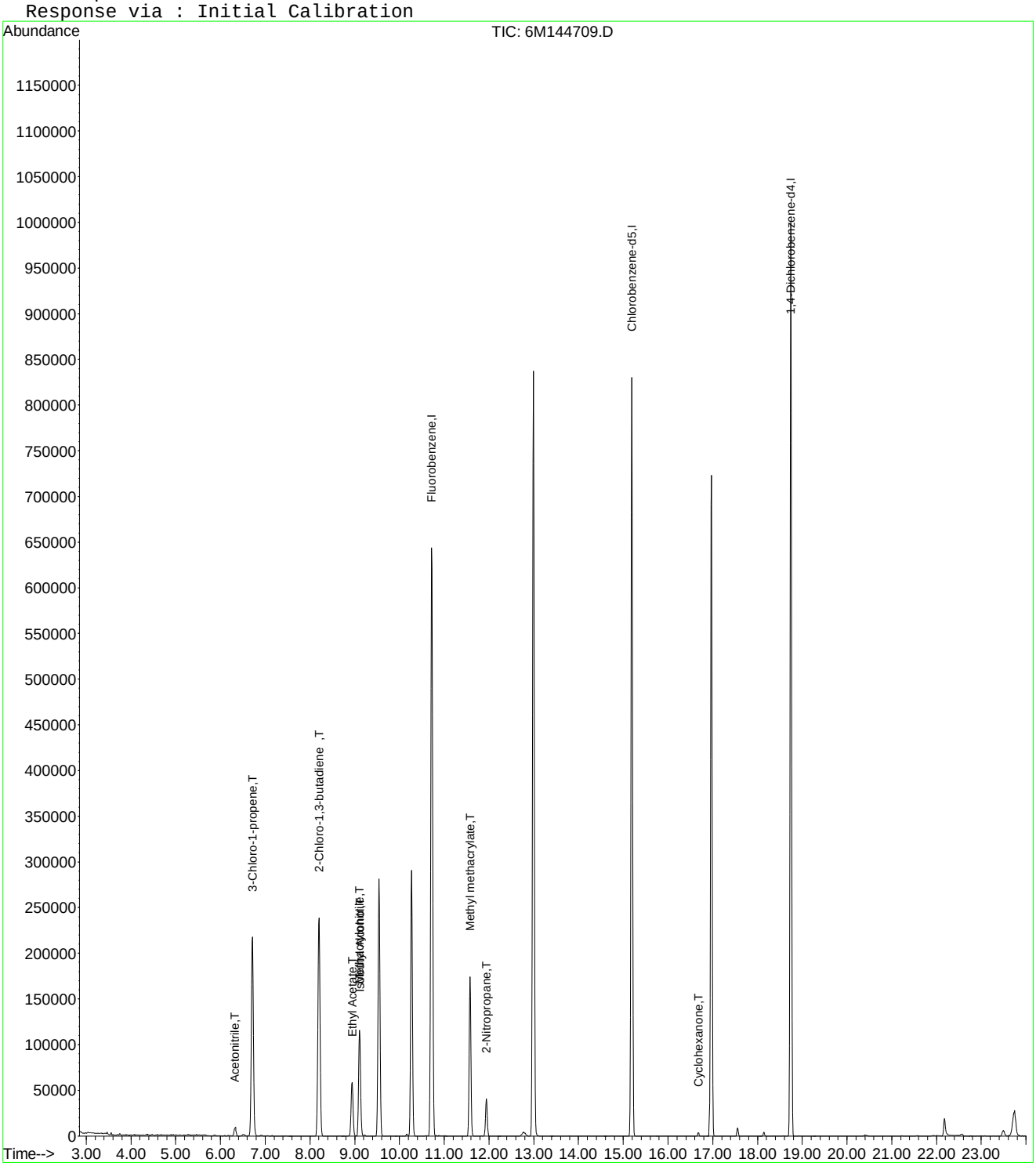
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	858255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	632728	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	350367	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	12918	21.0537	ug/L		97
3) 3-Chloro-1-propene	6.71	41	209633	20.3736	ug/L		94
4) 2-Chloro-1,3-butadiene	8.21	53	252913	19.9152	ug/L		96
5) Ethyl Acetate	8.94	43	112226	20.3889	ug/L		97
6) Methacrylonitrile	9.10	67	59955	20.6898	ug/L		93
7) Isobutyl Alcohol	9.11	43	8059	45.1723	ug/L	#	85
9) Methyl methacrylate	11.58	41	119041	19.7660	ug/L		97
10) 2-Nitropropane	11.94	43	43188	17.6351	ug/L		96
13) Cyclohexanone	16.68	55	2248	16.9576	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M144709.D A9FOOWT.M Fri Jan 13 08:34:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	21.0537	-5.3	100	0.00
3	T	3-Chloro-1-propene	20.0000	20.3736	-1.9	100	0.01
4	T	2-Chloro-1,3-butadiene	20.0000	19.9152	0.4	100	0.01
5	T	Ethyl Acetate	20.0000	20.3890	-1.9	100	0.01
6	T	Methacrylonitrile	20.0000	20.6898	-3.4	100	0.00
7	T	Isobutyl Alcohol	40.0000	45.1723	-12.9	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	20.0000	19.7660	1.2	100	0.00
10	T	2-Nitropropane	20.0000	17.6351	11.8	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	16.9576	15.2	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144709.D A9FOOWT.M Fri Jan 13 08:35:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:24 2017 Quant Results File: A9FOOWT.RES

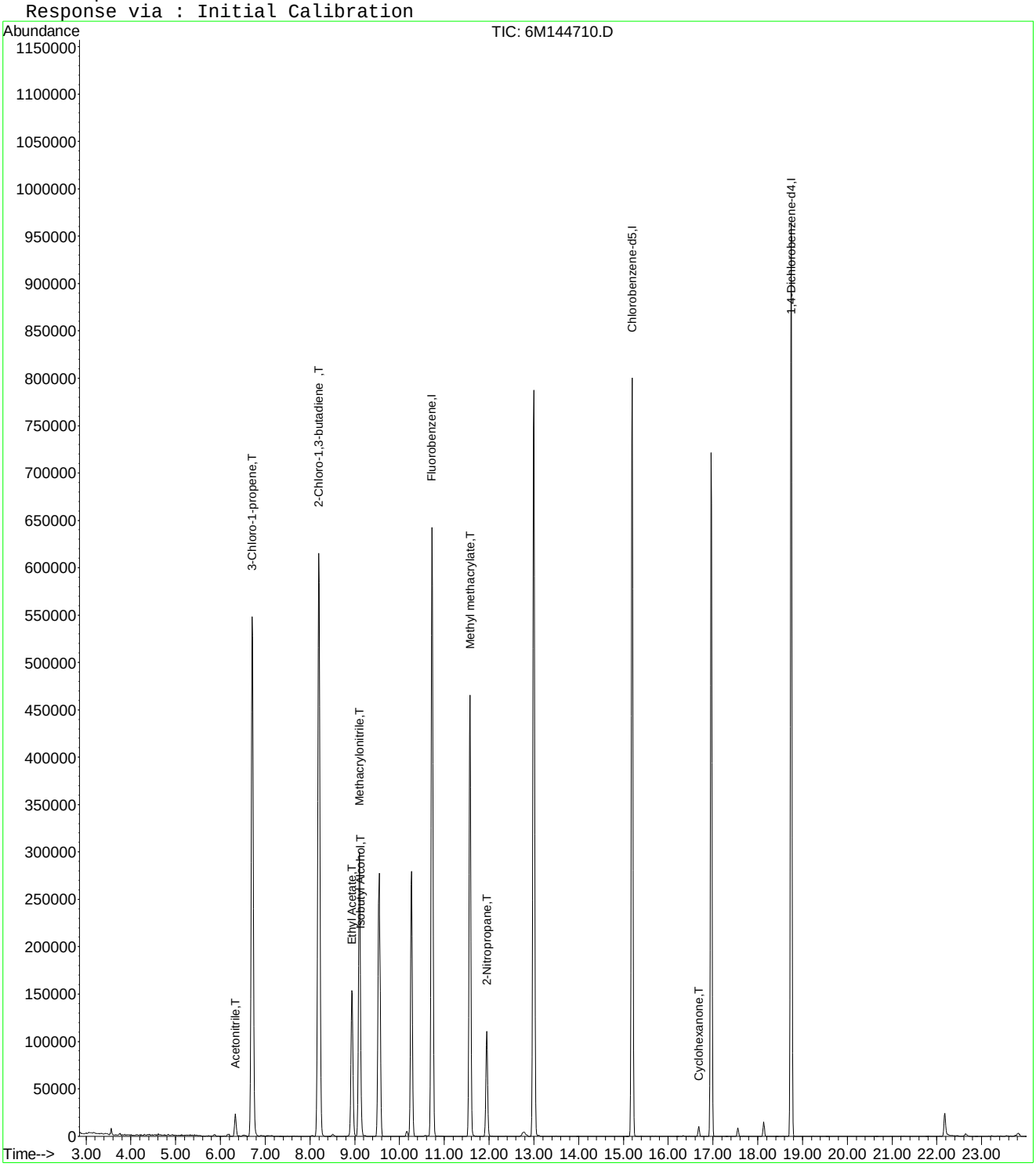
Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	838990	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	618534	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	341738	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	29692	49.5030	ug/L		97
3) 3-Chloro-1-propene	6.71	41	515211	51.2215	ug/L		94
4) 2-Chloro-1,3-butadiene	8.20	53	637594	51.3592	ug/L		97
5) Ethyl Acetate	8.93	43	283978	52.7771	ug/L		97
6) Methacrylonitrile	9.11	67	149634	52.8227	ug/L		95
7) Isobutyl Alcohol	9.13	43	18800	107.7975	ug/L	#	86
9) Methyl methacrylate	11.58	41	310762	52.7848	ug/L		96
10) 2-Nitropropane	11.94	43	119051	49.7288	ug/L		97
13) Cyclohexanone	16.68	55	5849	45.2354	ug/L		91

(#) = qualifier out of range (m) = manual integration
6M144710.D A9FOOWT.M Fri Jan 13 08:34:17 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	49.5030	1.0	100	0.00
3	T	3-Chloro-1-propene	50.0000	51.2215	-2.4	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	51.3592	-2.7	100	0.00
5	T	Ethyl Acetate	50.0000	52.7771	-5.6	100	0.00
6	T	Methacrylonitrile	50.0000	52.8227	-5.6	100	0.00
7	T	Isobutyl Alcohol	100.0000	107.7975	-7.8	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	50.0000	52.7848	-5.6	100	0.00
10	T	2-Nitropropane	50.0000	49.7289	0.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	45.2354	9.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

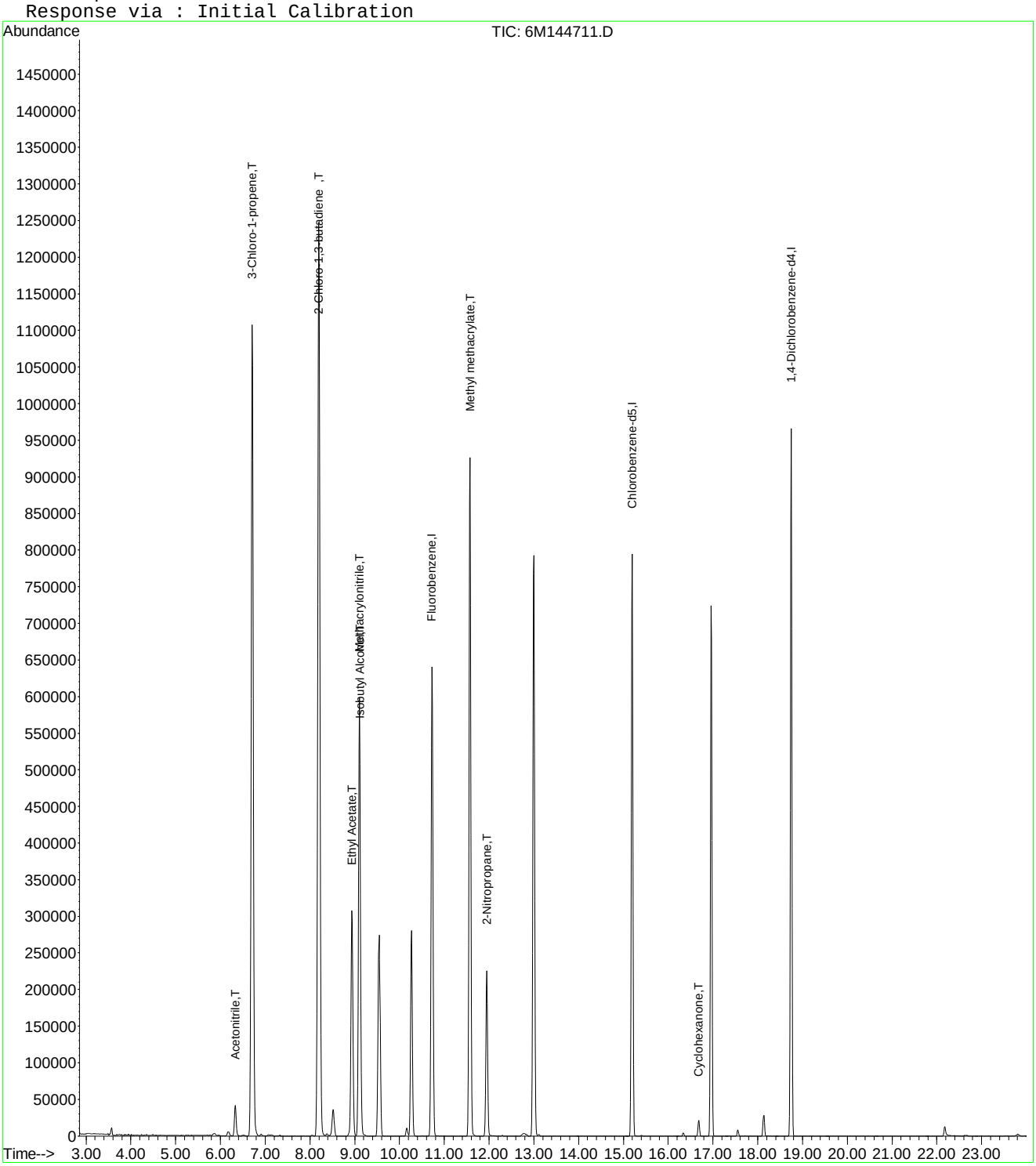
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 08:34:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 09:36:00 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

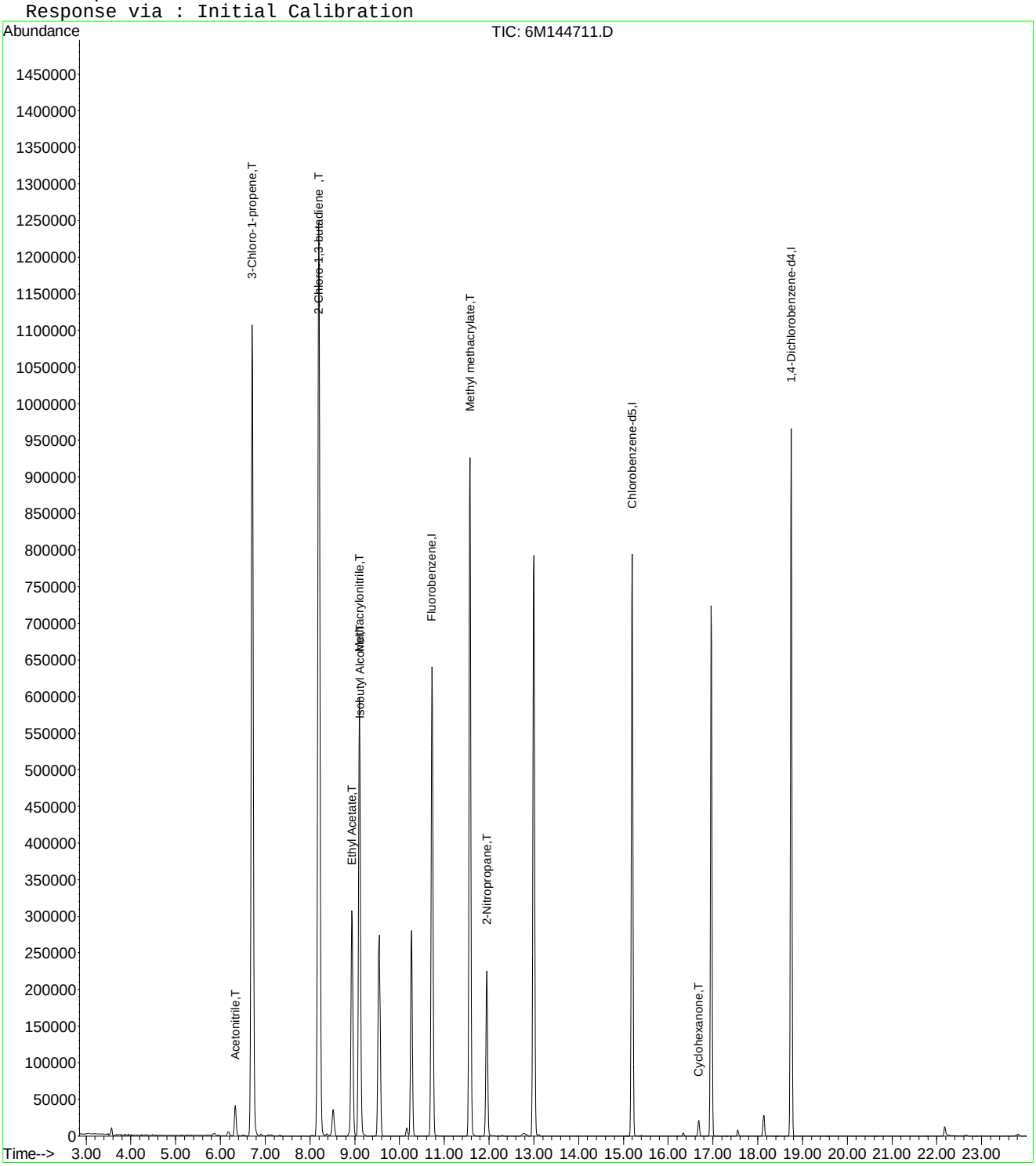
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 09:36:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 9:35 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	97.5407	2.5	100	0.00
3	T	3-Chloro-1-propene	100.0000	102.6783	-2.7	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	104.0084	-4.0	100	0.00
5	T	Ethyl Acetate	100.0000	103.6261	-3.6	100	0.00
6	T	Methacrylonitrile	100.0000	104.3479	-4.3	100	0.00
7	T	Isobutyl Alcohol	200.0000	210.2692	-5.1	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	100.0000	105.4552	-5.5	100	0.00
10	T	2-Nitropropane	100.0000	99.3433	0.7	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	86.0143	14.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144711.D A9FOOWT.M Fri Jan 13 09:36:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

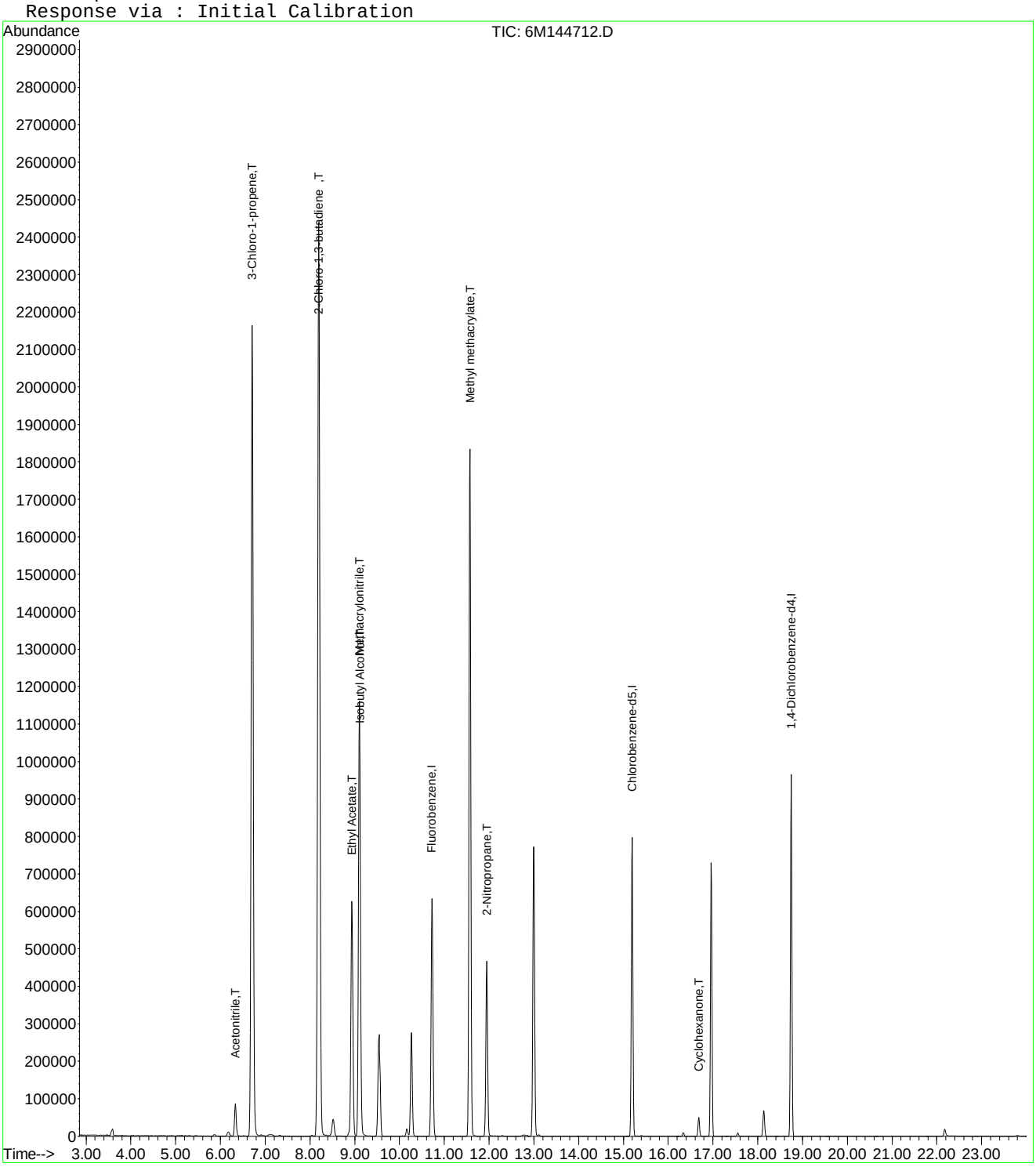
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	831063	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	617643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346241	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	117408	197.6116	ug/L		95
3) 3-Chloro-1-propene	6.71	41	2031969	203.9423	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	2539389	206.5027	ug/L		96
5) Ethyl Acetate	8.93	43	1134089	212.7800	ug/L		97
6) Methacrylonitrile	9.11	67	588766	209.8242	ug/L		92
7) Isobutyl Alcohol	9.12	43	69700	403.4656	ug/L	#	77
9) Methyl methacrylate	11.58	41	1251118	214.5369	ug/L		96
10) 2-Nitropropane	11.94	43	508471	214.4196	ug/L		98
13) Cyclohexanone	16.68	55	26625	203.2365	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144712.D A9FOOWT.M Fri Jan 13 08:34:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

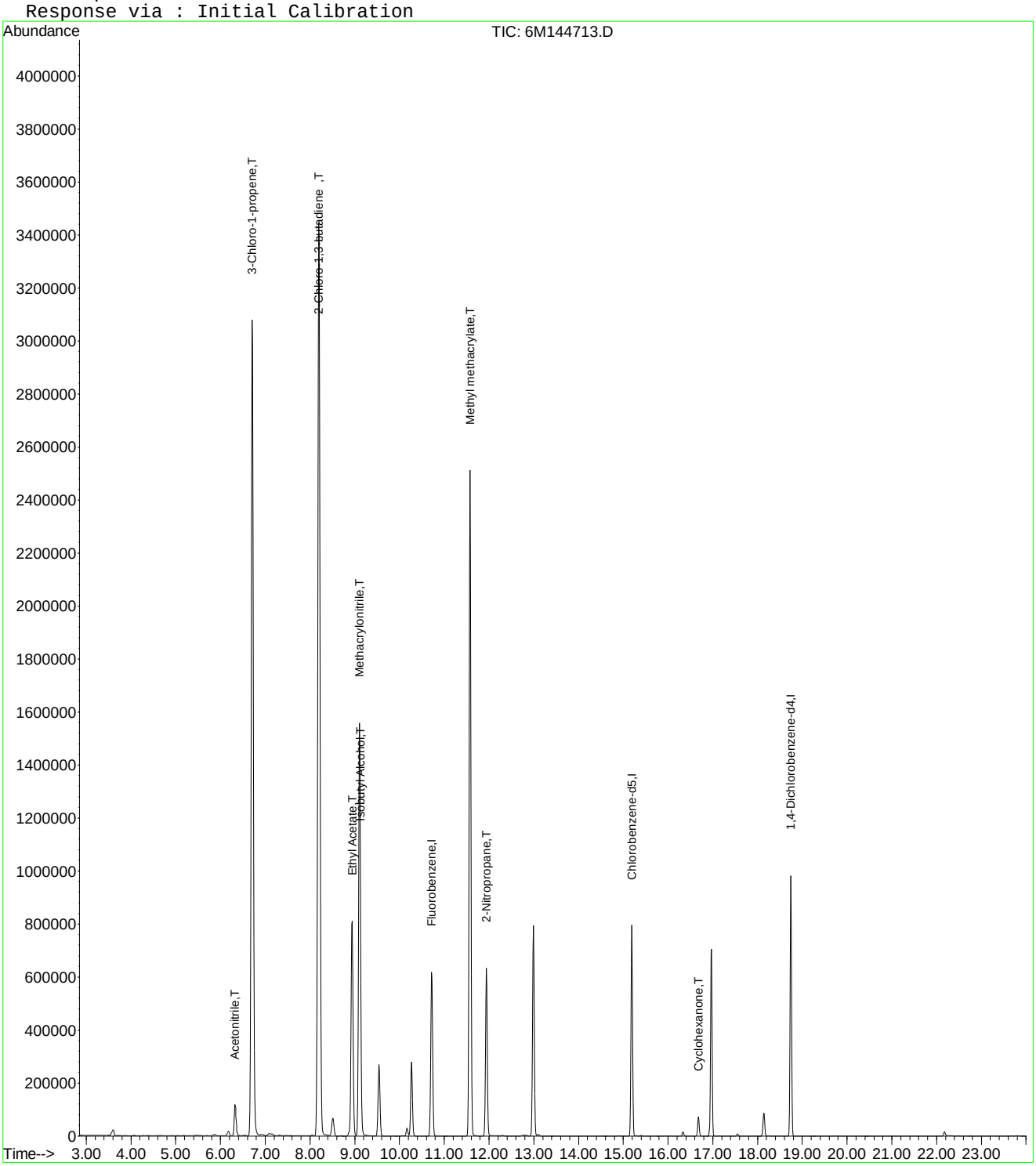
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	820441	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	609250	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	347545	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	159684	272.2468	ug/L		94
3) 3-Chloro-1-propene	6.70	41	2909215	295.7689	ug/L		93
4) 2-Chloro-1,3-butadiene	8.19	53	3653381	300.9387	ug/L		97
5) Ethyl Acetate	8.94	43	1494846	284.0971	ug/L		98
6) Methacrylonitrile	9.10	67	791160	285.6036	ug/L		92
7) Isobutyl Alcohol	9.12	43	88161	516.9360	ug/L	#	85
9) Methyl methacrylate	11.57	41	1679549	291.7313	ug/L		97
10) 2-Nitropropane	11.94	43	685276	292.7186	ug/L		98
13) Cyclohexanone	16.68	55	38739	294.5967	ug/L		82

(#) = qualifier out of range (m) = manual integration
6M144713.D A9FOOWT.M Fri Jan 13 08:34:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:16 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

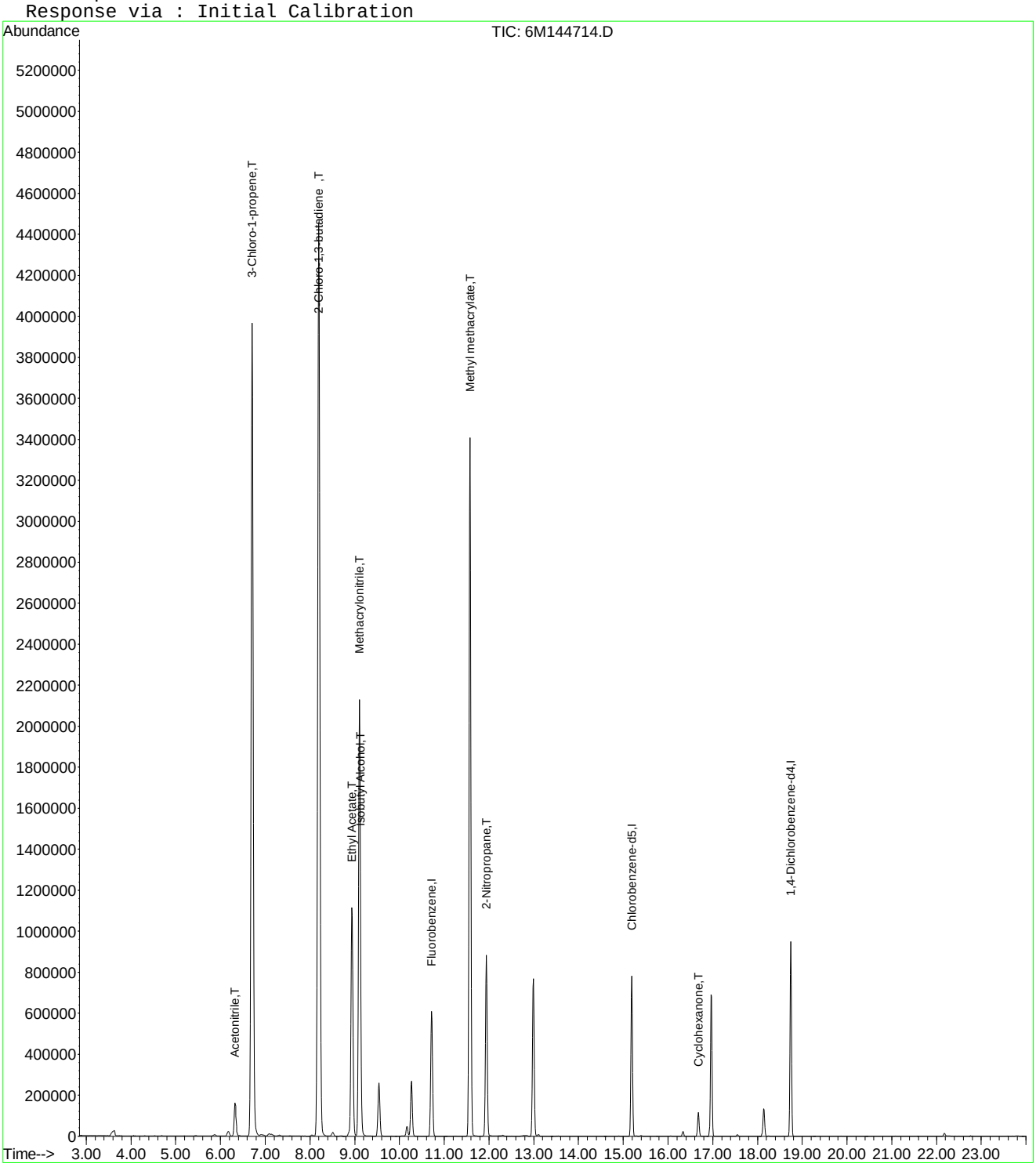
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	806744	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	606622	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	341512	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	218566	378.9620	ug/L		95
3) 3-Chloro-1-propene	6.70	41	3703442	382.9075	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	4659517	390.3333	ug/L		97
5) Ethyl Acetate	8.93	43	2048087	395.8497	ug/L		97
6) Methacrylonitrile	9.10	67	1071225	393.2708	ug/L		92
7) Isobutyl Alcohol	9.12	43	136765	815.5430	ug/L	#	75
9) Methyl methacrylate	11.58	41	2287798	404.1286	ug/L		96
10) 2-Nitropropane	11.94	43	962802	418.2475	ug/L		98
13) Cyclohexanone	16.68	55	59579	461.0815	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M144714.D A9FOOWT.M Fri Jan 13 08:34:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

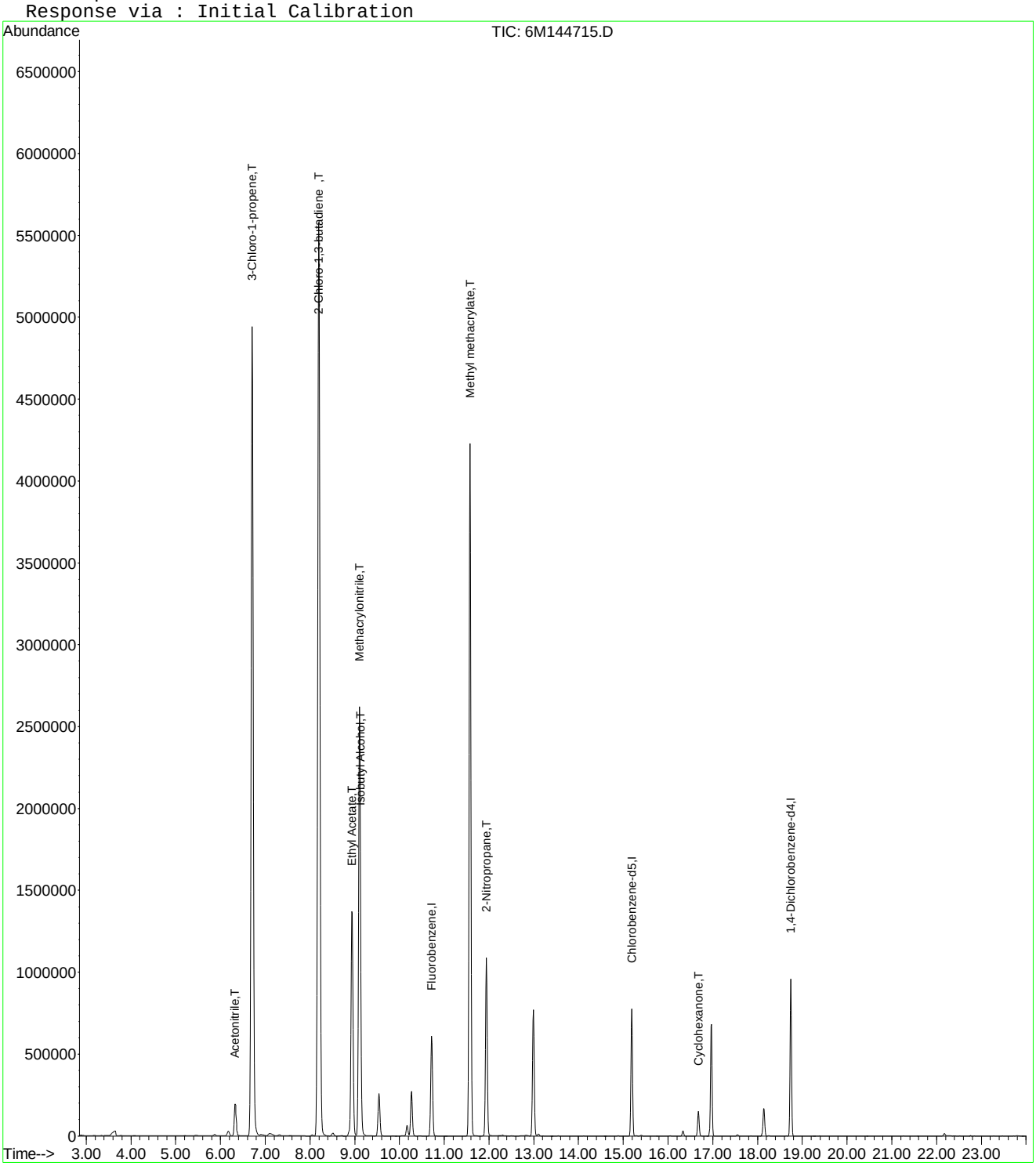
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	800443	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596335	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	335040	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	271689	474.7778	ug/L		94
3) 3-Chloro-1-propene	6.70	41	4627976	482.2639	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	5833383	492.5163	ug/L		97
5) Ethyl Acetate	8.93	43	2547971	496.3428	ug/L		97
6) Methacrylonitrile	9.10	67	1324536	490.0948	ug/L		92
7) Isobutyl Alcohol	9.12	43	184158	1106.7966	ug/L	#	75
9) Methyl methacrylate	11.58	41	2848365	507.1108	ug/L		97
10) 2-Nitropropane	11.94	43	1184018	518.3941	ug/L		98
13) Cyclohexanone	16.68	55	78367	618.1972	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144715.D A9FOOWT.M Fri Jan 13 08:34:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:45 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

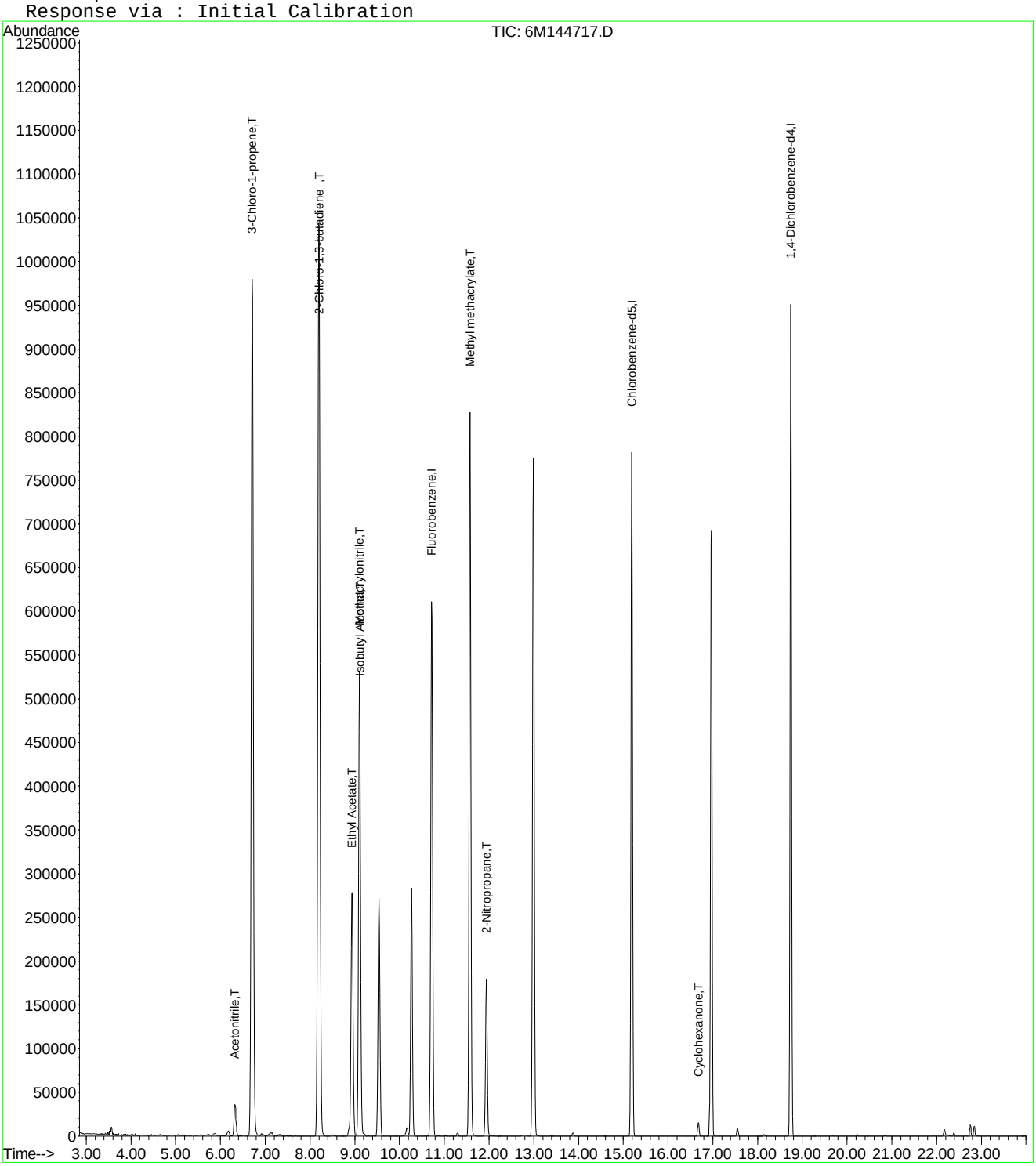
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	814360	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596096	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	332903	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	50370	86.5176	ug/L		93
3) 3-Chloro-1-propene	6.70	41	925364	94.7808	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1105734	91.7624	ug/L		97
5) Ethyl Acetate	8.93	43	511531	97.9429	ug/L		98
6) Methacrylonitrile	9.10	67	268526	97.6600	ug/L		92
7) Isobutyl Alcohol	9.11	43	30815	182.0344	ug/L	#	85
9) Methyl methacrylate	11.57	41	547496	95.8081	ug/L		96
10) 2-Nitropropane	11.94	43	194232	83.5866	ug/L		98
13) Cyclohexanone	16.68	55	8825	70.0628	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144717.D A9FOOWT.M Fri Jan 13 08:34:35 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	96	0.00
2	T	Acetonitrile	100.0000	86.5176	13.5	85	0.00
3	T	3-Chloro-1-propene	100.0000	94.7808	5.2	89	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	91.7624	8.2	85	0.00
5	T	Ethyl Acetate	100.0000	97.9429	2.1	91	0.00
6	T	Methacrylonitrile	100.0000	97.6600	2.3	90	0.00
7	T	Isobutyl Alcohol	200.0000	182.0344	9.0	83	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	100.0000	95.8081	4.2	88	0.00
10	T	2-Nitropropane	100.0000	83.5866	16.4	81	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	97	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	96	0.00
13	T	Cyclohexanone	100.0000	70.0628	29.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144717.D A9FOOWT.M Fri Jan 13 08:36:19 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	640408	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	444925	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226775	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	13.23	98	192	0.0085	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	2815	0.2769	ug/L #	64
3) Chloromethane	4.03	50	6905	Below Cal		88
4) Vinyl Chloride	4.28	62	3256	0.2803	ug/L	87
5) 1,3-Butadiene	4.33	54	2170	Below Cal		73
6) Bromomethane	5.23	94	1315	0.2622	ug/L	87
7) Chloroethane	5.40	64	1308	0.2617	ug/L #	43
8) Trichlorofluoromethane	5.90	101	3191	0.2680	ug/L #	92
10) Isoprene	6.49	67	2782	0.2840	ug/L #	60
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1282	0.1902	ug/L #	63
13) Acetone	6.76	43	1442	1.0435	ug/L #	48
14) 1,1-Dichloroethene	7.02	61	2988	0.3060	ug/L	96
16) Dimethyl Sulfide	7.28	62	1851	0.2653	ug/L	61
17) Iodomethane	7.54	142	460	0.8640	ug/L #	32
19) Methylene Chloride	7.79	84	2606	0.3531	ug/L	59
20) Carbon Disulfide	7.86	76	6466	0.3077	ug/L	98
22) Methyl Tert Butyl Ether	8.01	73	5425	0.3352	ug/L #	49
23) trans-1,2-Dichloroethene	8.26	96	1807	0.2572	ug/L	86
24) n-Hexane	8.33	57	2597	0.3268	ug/L	76
27) 1,1-Dichloroethane	8.87	63	3092	0.2656	ug/L	88
31) 2,2-Dichloropropane	9.64	77	1800	0.2033	ug/L #	31
32) cis-1,2-Dichloroethene	9.72	96	2213	0.2865	ug/L	84
33) Chloroform	9.92	83	5055	0.3812	ug/L #	83
35) Bromochloromethane	10.14	130	638	0.1569	ug/L	91
38) 1,1,1-Trichloroethane	10.45	97	3279	0.3042	ug/L #	50
39) Cyclohexane	10.48	56	2906	0.2915	ug/L #	75
40) 1,1-Dichloropropene	10.65	75	2741	0.3008	ug/L	77
45) 1,2-Dichloroethane	10.96	62	2340	0.2837	ug/L #	52
46) Benzene	11.01	78	9356	0.3415	ug/L #	79
47) Trichloroethene	11.75	130	2089	0.2801	ug/L #	65
48) Methylcyclohexane	11.85	83	3351	0.3110	ug/L	80
49) 1,2-Dichloropropane	11.97	63	2128	0.3291	ug/L #	53
51) Bromodichloromethane	12.27	83	2341	0.2564	ug/L	98
52) Dibromomethane	12.35	93	743	0.1951	ug/L	91
55) cis-1,3-Dichloropropene	12.90	75	2460	0.2447	ug/L #	77
56) Dimethyl Disulfide	13.17	79	1308	0.2062	ug/L #	47
59) Toluene	13.33	91	9335	0.3356	ug/L	99
60) Ethyl Methacrylate	13.40	69	1912	0.2840	ug/L	78
62) trans-1,3-Dichloropropene	13.48	75	2047	0.2387	ug/L #	51
63) 1,1,2-Trichloroethane	13.72	97	1325	0.2528	ug/L	83
64) 2-Hexanone	13.64	43	717	0.2848	ug/L #	28

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

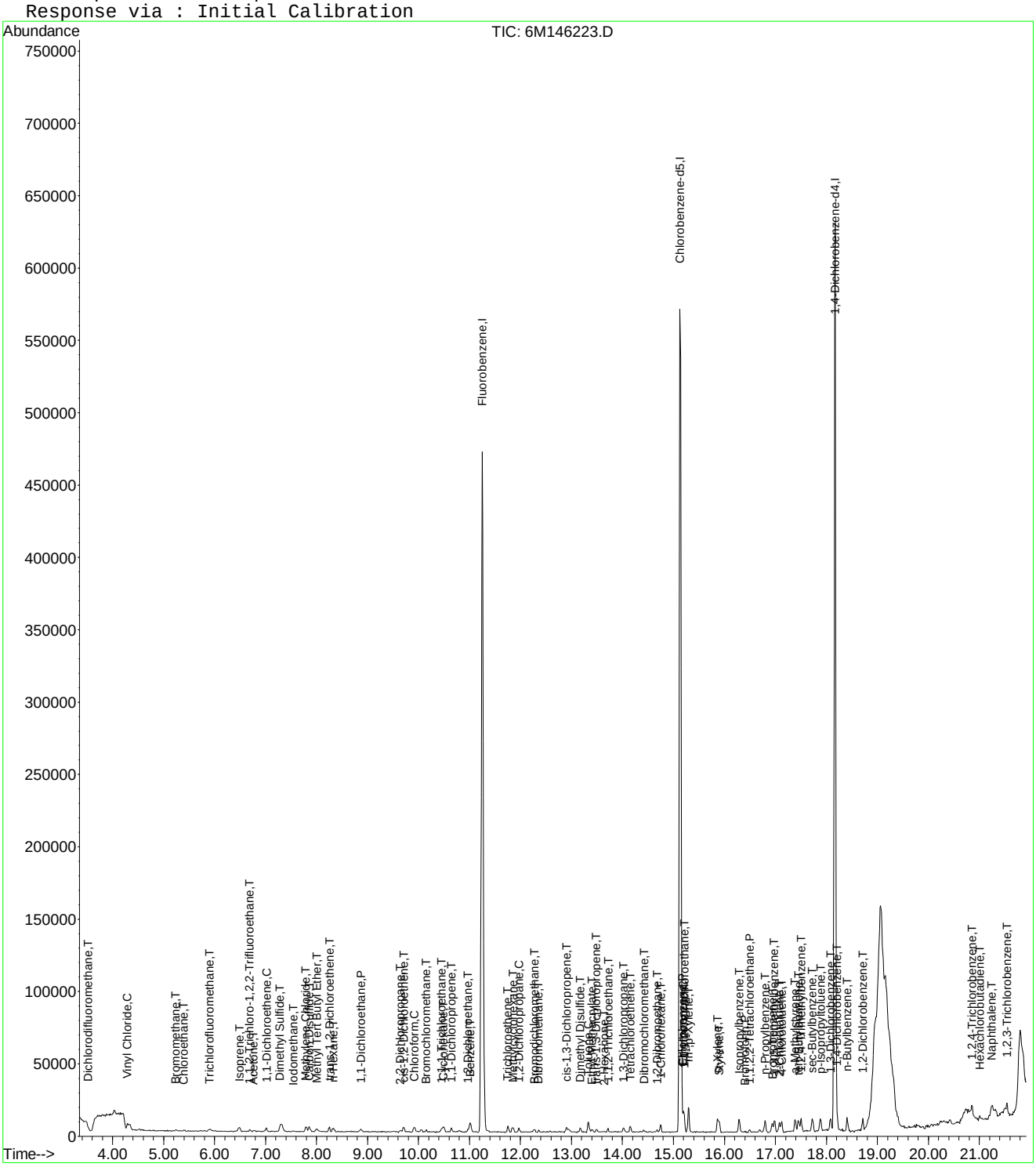
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
65)	1,3-Dichloropropane	14.03	76	2632	0.2991 ug/L		73
66)	Tetrachloroethene	14.16	166	2146	0.3184 ug/L		92
67)	Dibromochloromethane	14.42	129	1611	0.2486 ug/L		96
68)	1,2-Dibromoethane	14.68	107	1255	0.2493 ug/L		83
69)	1-Chlorohexane	14.75	91	2852	0.3175 ug/L		77
70)	Chlorobenzene	15.18	112	5819	0.3056 ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	1834	0.2690 ug/L	#	36
72)	Ethylbenzene	15.20	106	3131	0.3038 ug/L		92
73)	m-,p-Xylene	15.29	106	7511	0.6097 ug/L		97
74)	o-Xylene	15.86	106	3485	0.2932 ug/L		89
75)	Styrene	15.89	104	6272	0.3143 ug/L		93
76)	Bromoform	16.40	173	562	0.1423 ug/L	#	35
77)	Isopropylbenzene	16.29	105	10184	0.3423 ug/L		93
79)	1,1,2,2-Tetrachloroethane	16.50	83	1871	0.3168 ug/L		77
83)	n-Propylbenzene	16.79	91	11774	0.3429 ug/L	#	93
84)	Bromobenzene	16.95	156	2344	0.3039 ug/L	#	63
85)	1,3,5-Trimethylbenzene	16.98	105	7944	0.3265 ug/L		95
86)	2-Chlorotoluene	17.08	91	7914	0.3462 ug/L		93
87)	4-Chlorotoluene	17.12	91	6658	0.3295 ug/L	#	94
88)	a-Methylstyrene	17.38	118	3803	0.2826 ug/L		94
89)	tert-Butylbenzene	17.46	134	1349	0.2646 ug/L		32
90)	1,2,4-Trimethylbenzene	17.51	105	8218	0.3289 ug/L		89
91)	sec-Butylbenzene	17.72	105	10323	0.3440 ug/L		91
92)	p-Isopropyltoluene	17.89	119	8482	0.3360 ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	4887	0.3355 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5055	0.3432 ug/L	#	53
95)	n-Butylbenzene	18.41	91	8369	0.3631 ug/L		92
96)	1,2-Dichlorobenzene	18.71	146	4262	0.3121 ug/L		90
98)	1,2,4-Trichlorobenzene	20.86	180	3679	0.3683 ug/L		84
99)	Hexachlorobutadiene	21.01	225	1397	0.3661 ug/L		82
100)	Naphthalene	21.23	128	6133	0.3066 ug/L		94
101)	1,2,3-Trichlorobenzene	21.54	180	3447	0.3574 ug/L	#	77

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2769	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.2012	0.0	0	0.01
4	C	Vinyl Chloride	-1.0000	0.2803	0.0	0	0.01
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.2622	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.2617	0.0	100	0.02
8	T	Trichlorofluoromethane	-1.0000	0.2680	0.0	100	0.00
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.2840	0.0	100	0.02
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.1902	0.0	100	0.00
13	T	Acetone	-1.0000	1.0435	0.0	100	-0.01
14	C	1,1-Dichloroethene	-1.0000	0.3060	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.2653	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8640	0.0	0	0.01
18	T	Methyl acetate	-1.0000	0.0537	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3531	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3077	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3352	0.0	100	-0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.2572	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.3268	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.0000	0.0	0	-8.83#
27	P	1,1-Dichloroethane	-1.0000	0.2656	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.41#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	-1.0000	0.2033	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2865	0.0	100	0.00
33	C	Chloroform	0.3000	0.3812	-27.1#	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	-1.0000	0.1569	0.0	0	-0.01
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-10.18#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	-1.0000	0.3042	0.0	100	-0.01
39	T	Cyclohexane	-1.0000	0.2915	0.0	100	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.3008	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.1105	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	-1.0000	0.2837	0.0	100	0.00
46	T	Benzene	-1.0000	0.3415	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2801	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3110	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.3291	0.0	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	-1.0000	0.2564	0.0	100	0.00
52	T	Dibromomethane	-1.0000	0.1951	0.0	100	-0.01
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.0000	0.0	0	-12.56#
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.59#

(#) = Out of Range

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2447	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2062	0.0	100	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0085	0.0	100	0.00
59	C	Toluene	-1.0000	0.3356	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2840	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2387	0.0	100	-0.01
63	T	1,1,2-Trichloroethane	-1.0000	0.2528	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.2848	0.0	100	0.00
65	T	1,3-Dichloropropane	-1.0000	0.2991	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.3184	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2486	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2493	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.3175	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3056	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2690	0.0	100	0.00
72	C	Ethylbenzene	-1.0000	0.3038	0.0	100	0.00
73	T	m-,p-Xylene	-1.0000	0.6097	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2932	0.0	100	0.00
75	T	Styrene	-1.0000	0.3143	0.0	100	-0.01
76	P	Bromoform	-1.0000	0.1423	0.0	100	0.00
77	T	Isopropylbenzene	-1.0000	0.3423	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3168	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-16.69#
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	-1.0000	0.3429	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.3039	-1.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.3265	0.0	100	-0.01
86	T	2-Chlorotoluene	-1.0000	0.3462	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3295	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2826	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2646	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.3289	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.3440	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3360	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3355	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3432	-14.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.3631	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.3121	-4.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.3683	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.3661	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.3066	0.0	100	-0.01
101	T	1,2,3-Trichlorobenzene	0.3000	0.3574	-19.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	626609	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	442971	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226791	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#			
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L		
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#			
58) Toluene-d8	0.00	98	0	0.0000	ug/L		
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#			
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	3419	0.3437	ug/L	#	64
3) Chloromethane	4.04	50	7947	Below Cal			96
4) Vinyl Chloride	4.29	62	5656	0.4976	ug/L		98
5) 1,3-Butadiene	4.34	54	2862	Below Cal		#	60
6) Bromomethane	5.23	94	1597	0.3254	ug/L		99
7) Chloroethane	5.40	64	1845	0.3772	ug/L	#	43
8) Trichlorofluoromethane	5.91	101	4335	0.3721	ug/L	#	93
10) Isoprene	6.48	67	3687	0.3847	ug/L		68
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	2169	0.3289	ug/L		74
13) Acetone	6.77	43	782	0.5783	ug/L	#	48
14) 1,1-Dichloroethene	7.01	61	3813	0.3991	ug/L		83
16) Dimethyl Sulfide	7.28	62	2499	0.3661	ug/L	#	56
17) Iodomethane	7.55	142	506	0.8739	ug/L	#	32
18) Methyl acetate	7.54	43	953	0.2810	ug/L	#	66
19) Methylene Chloride	7.79	84	3151	0.4363	ug/L		69
20) Carbon Disulfide	7.86	76	8568	0.4167	ug/L		96
22) Methyl Tert Butyl Ether	8.00	73	6676	0.4215	ug/L	#	68
23) trans-1,2-Dichloroethene	8.25	96	2699	0.3926	ug/L		77
24) n-Hexane	8.32	57	3415	0.4392	ug/L		70
26) Vinyl Acetate	8.83	43	1421	0.2892	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	4613	0.4050	ug/L	#	77
29) 2-Butanone	9.41	43	260	0.1526	ug/L	#	57
31) 2,2-Dichloropropane	9.64	77	3882	0.4480	ug/L		72
32) cis-1,2-Dichloroethene	9.72	96	3041	0.4023	ug/L		76
33) Chloroform	9.92	83	5917	0.4561	ug/L	#	88
35) Bromochloromethane	10.15	130	1328	0.3338	ug/L		91
36) Tetrahydrofuran	10.17	42	200	0.1782	ug/L	#	41
38) 1,1,1-Trichloroethane	10.45	97	4059	0.3848	ug/L		83
39) Cyclohexane	10.49	56	3820	0.3916	ug/L		75
40) 1,1-Dichloropropene	10.64	75	3280	0.3679	ug/L		86
42) Carbon Tetrachloride	10.80	117	2236	0.2688	ug/L	#	79
45) 1,2-Dichloroethane	10.97	62	3278	0.4061	ug/L	#	68
46) Benzene	11.01	78	12127	0.4523	ug/L		84
47) Trichloroethene	11.76	130	2885	0.3953	ug/L		71
48) Methylcyclohexane	11.85	83	4224	0.4006	ug/L		83
49) 1,2-Dichloropropane	11.97	63	2324	0.3673	ug/L		84
51) Bromodichloromethane	12.27	83	3345	0.3745	ug/L		82
52) Dibromomethane	12.36	93	1227	0.3293	ug/L		99
53) 2-Chloroethyl Vinyl Ether	12.55	63	709	0.2857	ug/L	#	41
55) cis-1,3-Dichloropropene	12.90	75	3464	0.3522	ug/L	#	77

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

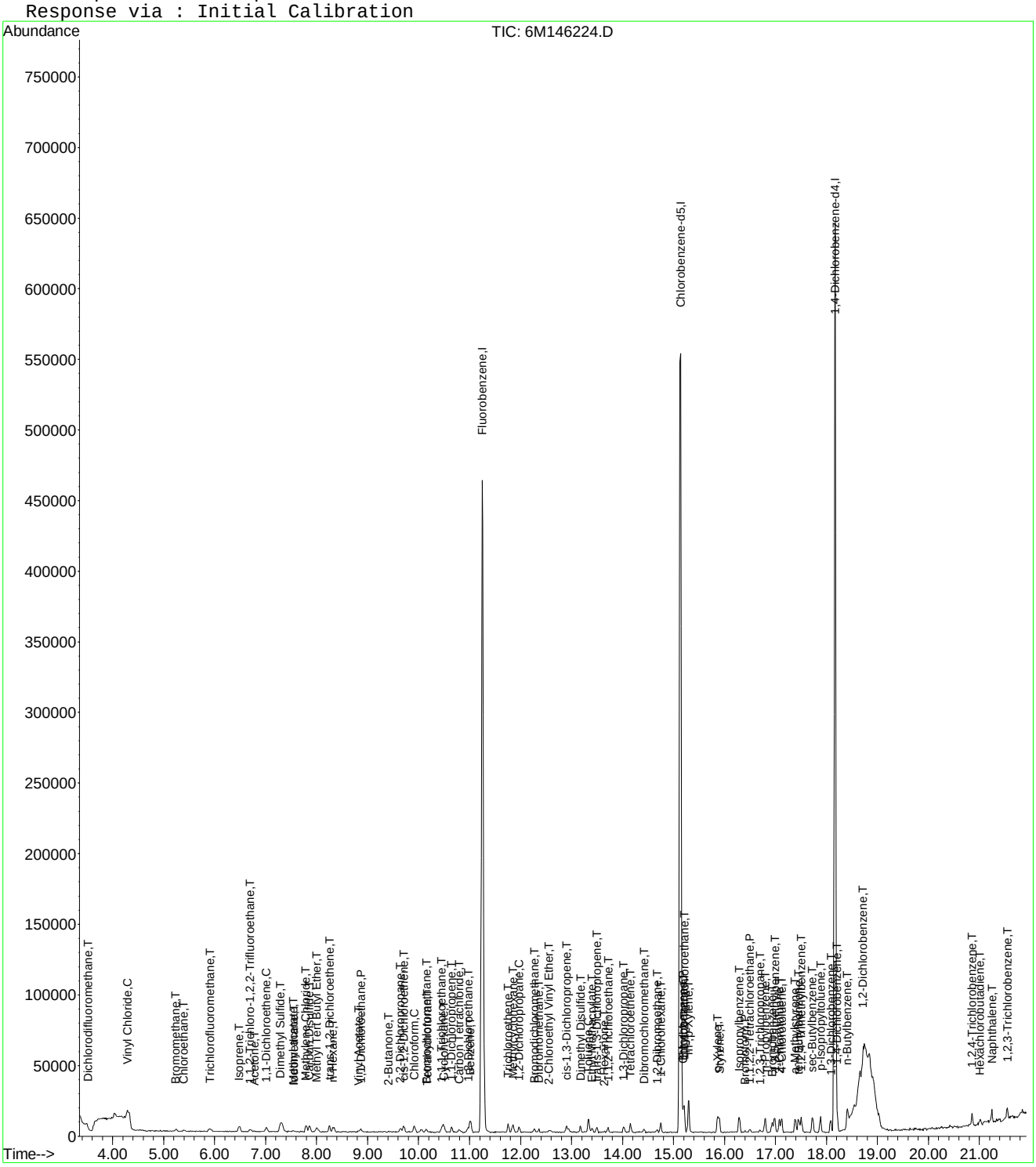
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
56)	Dimethyl Disulfide	13.18	79	1794	0.2891 ug/L	#	47
59)	Toluene	13.33	91	11706	0.4227 ug/L		96
60)	Ethyl Methacrylate	13.40	69	2704	0.4035 ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	3001	0.3514 ug/L		88
63)	1,1,2-Trichloroethane	13.72	97	1935	0.3708 ug/L		97
64)	2-Hexanone	13.64	43	838	0.3344 ug/L	#	28
65)	1,3-Dichloropropane	14.02	76	3430	0.3915 ug/L		80
66)	Tetrachloroethene	14.16	166	2515	0.3748 ug/L		90
67)	Dibromochloromethane	14.42	129	2281	0.3536 ug/L		87
68)	1,2-Dibromoethane	14.68	107	2013	0.4017 ug/L		91
69)	1-Chlorohexane	14.75	91	3553	0.3973 ug/L		75
70)	Chlorobenzene	15.19	112	7763	0.4095 ug/L		93
71)	1,1,1,2-Tetrachloroethane	15.21	131	2463	0.3628 ug/L	#	36
72)	Ethylbenzene	15.20	106	4250	0.4142 ug/L		92
73)	m-,p-Xylene	15.29	106	10084	0.8222 ug/L		94
74)	o-Xylene	15.86	106	4446	0.3756 ug/L		95
75)	Styrene	15.90	104	7608	0.3829 ug/L		91
76)	Bromoform	16.40	173	1201	0.3055 ug/L	#	50
77)	Isopropylbenzene	16.29	105	12585	0.4249 ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	2532	0.4287 ug/L		74
81)	1,2,3-Trichloropropane	16.70	110	576	0.3302 ug/L	#	1
83)	n-Propylbenzene	16.80	91	14774	0.4303 ug/L	#	96
84)	Bromobenzene	16.93	156	3090	0.4006 ug/L		70
85)	1,3,5-Trimethylbenzene	16.99	105	10064	0.4136 ug/L		97
86)	2-Chlorotoluene	17.08	91	9917	0.4337 ug/L		94
87)	4-Chlorotoluene	17.12	91	8689	0.4300 ug/L		97
88)	a-Methylstyrene	17.38	118	4762	0.3539 ug/L		99
89)	tert-Butylbenzene	17.46	134	1902	0.3730 ug/L		48
90)	1,2,4-Trimethylbenzene	17.51	105	10085	0.4035 ug/L		86
91)	sec-Butylbenzene	17.72	105	13346	0.4447 ug/L		93
92)	p-Isopropyltoluene	17.88	119	10657	0.4222 ug/L		97
93)	1,3-Dichlorobenzene	18.09	146	6333	0.4347 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5959	0.4045 ug/L		98
95)	n-Butylbenzene	18.41	91	10090	0.4377 ug/L		88
96)	1,2-Dichlorobenzene	18.71	146	5766	0.4223 ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	4424	0.4428 ug/L		85
99)	Hexachlorobutadiene	21.01	225	1728	0.4528 ug/L		78
100)	Naphthalene	21.24	128	8285	0.4141 ug/L		94
101)	1,2,3-Trichlorobenzene	21.55	180	4343	0.4503 ug/L		83

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:50 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3437	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.0968	0.0	0	0.02
4	C	Vinyl Chloride	0.4000	0.4976	-24.4#	100	0.02
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.3254	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.3772	0.0	100	0.02
8	T	Trichlorofluoromethane	0.4000	0.3721	7.0	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.3847	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3289	0.0	100	0.00
13	T	Acetone	-1.0000	0.5783	0.0	100	0.00
14	C	1,1-Dichloroethene	0.4000	0.3991	0.2	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.3661	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8739	0.0	0	0.02
18	T	Methyl acetate	-1.0000	0.2810	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4363	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.4167	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.4215	0.0	100	-0.02
23	T	trans-1,2-Dichloroethene	0.4000	0.3926	1.9	100	0.00
24	T	n-Hexane	-1.0000	0.4392	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.2892	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.4051	-1.3	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.1526	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	0.4000	0.4480	-12.0	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.4023	-0.6	100	0.00
33	C	Chloroform	0.4000	0.4561	-14.0	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	0.4000	0.3338	16.6	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.1782	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	0.4000	0.3848	3.8	100	-0.01
39	T	Cyclohexane	-1.0000	0.3916	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3679	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.2688	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	0.4000	0.4061	-1.5	100	0.00
46	T	Benzene	0.4000	0.4523	-13.1	100	0.00
47	T	Trichloroethene	0.4000	0.3953	1.2	100	0.00
48	T	Methylcyclohexane	-1.0000	0.4006	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3673	8.2	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	0.4000	0.3745	6.4	100	0.00
52	T	Dibromomethane	0.4000	0.3293	17.7	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.2857	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.1142	0.0	100	0.00

(#) = Out of Range
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3522	12.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2891	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0000	0.0	0	-13.23#
59	C	Toluene	0.4000	0.4227	-5.7	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.4035	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3514	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3708	7.3	100	0.00
64	T	2-Hexanone	-1.0000	0.3344	0.0	100	0.00
65	T	1,3-Dichloropropane	0.4000	0.3915	2.1	100	0.00
66	T	Tetrachloroethene	0.4000	0.3748	6.3	100	0.00
67	T	Dibromochloromethane	0.4000	0.3535	11.6	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.4017	-0.4	100	0.00
69	T	1-Chlorohexane	0.4000	0.3973	0.7	100	0.00
70	P	Chlorobenzene	0.4000	0.4096	-2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3628	9.3	100	0.00
72	C	Ethylbenzene	0.4000	0.4142	-3.5	100	0.00
73	T	m-,p-Xylene	0.8000	0.8222	-2.8	100	0.00
74	T	o-Xylene	-1.0000	0.3756	0.0	100	0.00
75	T	Styrene	0.4000	0.3829	4.3	100	0.00
76	P	Bromoform	-1.0000	0.3055	0.0	100	0.00
77	T	Isopropylbenzene	0.4000	0.4249	-6.2	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.4287	-7.2	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.3302	0.0	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	0.4000	0.4303	-7.6	100	0.00
84	T	Bromobenzene	0.4000	0.4006	-0.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.4136	-3.4	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4338	-8.4	100	0.00
87	T	4-Chlorotoluene	0.4000	0.4300	-7.5	100	0.00
88	T	a-Methylstyrene	-1.0000	0.3539	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3730	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.4035	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4447	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.4222	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.4347	-8.7	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4045	-1.1	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4377	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.4223	-5.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	0.4000	0.4428	-10.7	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.4528	-13.2	100	0.00
100	T	Naphthalene	0.4000	0.4141	-3.5	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.4503	-12.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	632181	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	444070	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	224733	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	3097	0.4799	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.92%#		
43) 1,2-Dichloroethane-d4	10.85	65	2998	0.4714	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	13.24	98	11387	0.5025	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	2.00%#		
80) p-Bromofluorobenzene	16.64	95	4328	0.5071	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.04%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	9629	0.9593	ug/L #	85
3) Chloromethane	4.04	50	18344	0.8003	ug/L	93
4) Vinyl Chloride	4.28	62	12799	1.1160	ug/L	96
5) 1,3-Butadiene	4.34	54	8885	0.7170	ug/L	88
6) Bromomethane	5.24	94	4461	0.9009	ug/L	95
7) Chloroethane	5.40	64	4858	0.9845	ug/L	80
8) Trichlorofluoromethane	5.91	101	11643	0.9905	ug/L	95
9) Diethyl ether	6.44	59	24166	4.9333	ug/L	82
10) Isoprene	6.48	67	8997	0.9306	ug/L	79
11) Acrolein	6.68	56	678	1.2633	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	6814	1.0241	ug/L	88
13) Acetone	6.77	43	1642	1.2036	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	9339	0.9690	ug/L	75
15) Tert-Butyl Alcohol	7.10	59	3988	9.4246	ug/L #	57
16) Dimethyl Sulfide	7.27	62	6552	0.9514	ug/L	98
17) Iodomethane	7.55	142	2740	1.2641	ug/L	83
18) Methyl acetate	7.54	43	3105	0.9075	ug/L #	66
19) Methylene Chloride	7.80	84	7857	1.0783	ug/L	64
20) Carbon Disulfide	7.86	76	21108	1.0176	ug/L	95
21) Acrylonitrile	7.97	53	3676	2.3254	ug/L	83
22) Methyl Tert Butyl Ether	8.01	73	16436	1.0286	ug/L	88
23) trans-1,2-Dichloroethene	8.26	96	6924	0.9982	ug/L	75
24) n-Hexane	8.32	57	8671	1.1054	ug/L	80
25) Diisopropyl ether	8.66	45	90855	5.0880	ug/L #	90
26) Vinyl Acetate	8.83	43	4307	0.8689	ug/L #	78
27) 1,1-Dichloroethane	8.87	63	11386	0.9909	ug/L	100
28) Ethyl-Tert-Butyl ether	9.24	59	90588	5.0069	ug/L	90
29) 2-Butanone	9.42	43	1578	0.9178	ug/L #	57
30) Propionitrile	9.52	54	2484	4.4300	ug/L #	56
31) 2,2-Dichloropropane	9.65	77	10191	1.1658	ug/L	75
32) cis-1,2-Dichloroethene	9.72	96	7549	0.9899	ug/L	90
33) Chloroform	9.92	83	13696	1.0463	ug/L	91
34) 1-Bromopropane	10.06	122	1026	0.7587	ug/L	54
35) Bromochloromethane	10.15	130	3643	0.9075	ug/L	100
36) Tetrahydrofuran	10.17	42	6307	5.5703	ug/L	83
38) 1,1,1-Trichloroethane	10.45	97	10730	1.0083	ug/L	83
39) Cyclohexane	10.49	56	9783	0.9941	ug/L	78
40) 1,1-Dichloropropene	10.64	75	9021	1.0028	ug/L	85
41) Tert-Amyl-Methyl ether	10.75	73	86495	5.0351	ug/L	93
42) Carbon Tetrachloride	10.80	117	7124	0.8490	ug/L	95

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:53 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

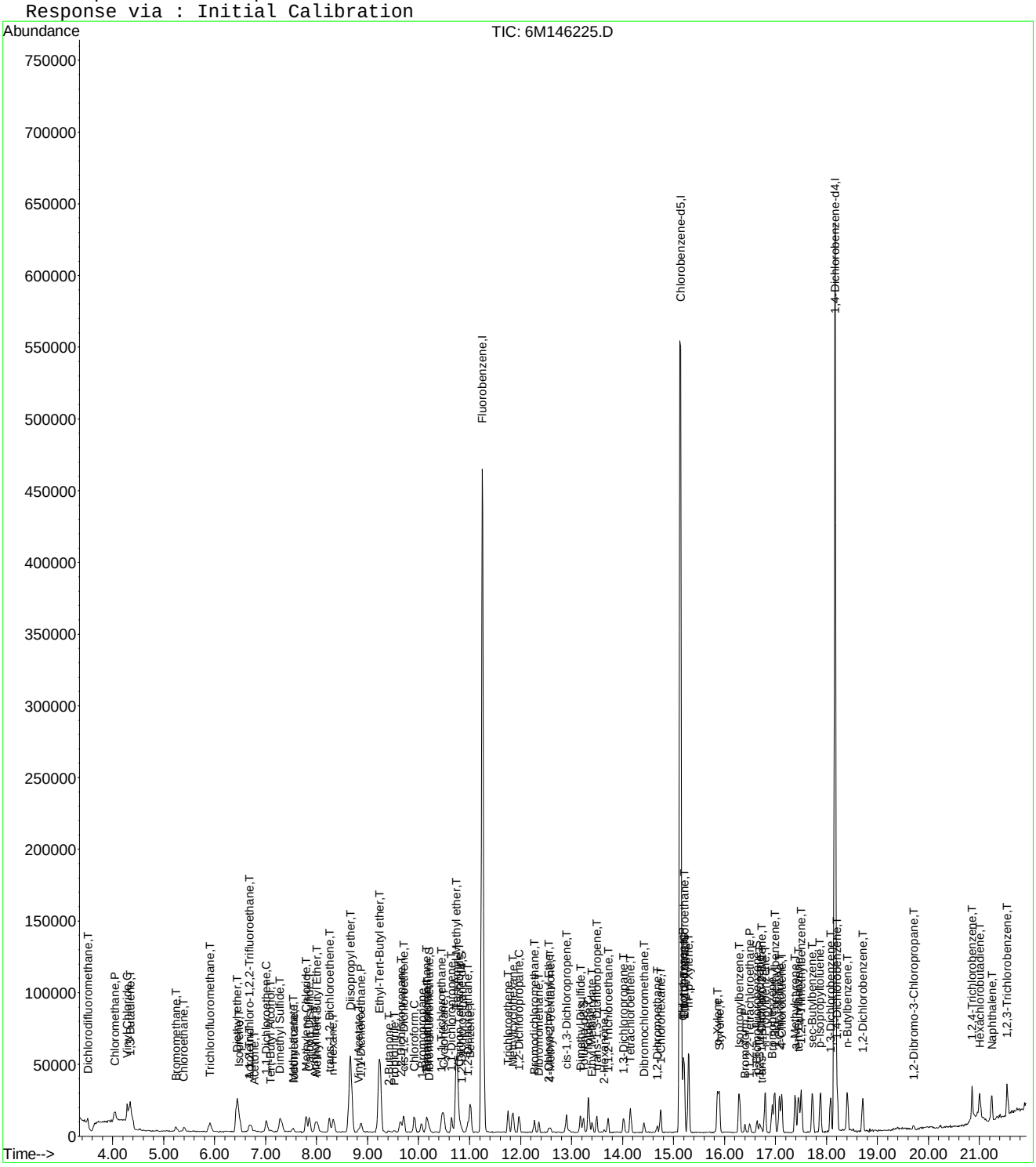
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	8252	1.0134	ug/L	#	79
46)	Benzene	11.01	78	27830	1.0289	ug/L		85
47)	Trichloroethene	11.76	130	7188	0.9763	ug/L		86
48)	Methylcyclohexane	11.85	83	10430	0.9805	ug/L		81
49)	1,2-Dichloropropane	11.97	63	6337	0.9927	ug/L		93
51)	Bromodichloromethane	12.27	83	8602	0.9546	ug/L		100
52)	Dibromomethane	12.36	93	3907	1.0392	ug/L		88
53)	2-Chloroethyl Vinyl Ether	12.55	63	2066	0.8251	ug/L		85
54)	4-Methyl-2-Pentanone	12.58	58	1310	0.7976	ug/L	#	38
55)	cis-1,3-Dichloropropene	12.90	75	9650	0.9724	ug/L	#	91
56)	Dimethyl Disulfide	13.18	79	5152	0.8229	ug/L		84
59)	Toluene	13.33	91	28882	1.0403	ug/L		97
60)	Ethyl Methacrylate	13.40	69	6287	0.9358	ug/L		73
62)	trans-1,3-Dichloropropene	13.49	75	8281	0.9673	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	5263	1.0059	ug/L		98
64)	2-Hexanone	13.64	43	2640	1.0508	ug/L		100
65)	1,3-Dichloropropane	14.02	76	9029	1.0281	ug/L		71
66)	Tetrachloroethene	14.16	166	6743	1.0023	ug/L		96
67)	Dibromochloromethane	14.42	129	6126	0.9472	ug/L		94
68)	1,2-Dibromoethane	14.68	107	5001	0.9955	ug/L		97
69)	1-Chlorohexane	14.75	91	8893	0.9919	ug/L		81
70)	Chlorobenzene	15.19	112	19139	1.0072	ug/L		80
71)	1,1,1,2-Tetrachloroethane	15.21	131	6334	0.9308	ug/L	#	45
72)	Ethylbenzene	15.21	106	9526	0.9260	ug/L		96
73)	m-,p-Xylene	15.29	106	24042	1.9553	ug/L		95
74)	o-Xylene	15.86	106	11918	1.0045	ug/L		97
75)	Styrene	15.90	104	18813	0.9445	ug/L		97
76)	Bromoform	16.40	173	3544	0.8992	ug/L	#	94
77)	Isopropylbenzene	16.29	105	30143	1.0152	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	5946	1.0159	ug/L		93
81)	1,2,3-Trichloropropane	16.69	110	1751	1.0131	ug/L	#	44
82)	trans-1,4-Dichloro-2-Buten	16.73	53	1111	0.8939	ug/L	#	1
83)	n-Propylbenzene	16.80	91	35315	1.0379	ug/L		100
84)	Bromobenzene	16.93	156	7797	1.0200	ug/L		78
85)	1,3,5-Trimethylbenzene	16.99	105	24668	1.0230	ug/L		97
86)	2-Chlorotoluene	17.08	91	24173	1.0670	ug/L		97
87)	4-Chlorotoluene	17.12	91	21009	1.0492	ug/L		97
88)	a-Methylstyrene	17.38	118	11540	0.8654	ug/L		96
89)	tert-Butylbenzene	17.46	134	4954	0.9805	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	25152	1.0156	ug/L		87
91)	sec-Butylbenzene	17.72	105	32001	1.0761	ug/L		95
92)	p-Isopropyltoluene	17.87	119	25877	1.0345	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	14335	0.9930	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	14500	0.9933	ug/L	#	52
95)	n-Butylbenzene	18.42	91	23762	1.0403	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	13818	1.0212	ug/L		94
97)	1,2-Dibromo-3-Chloropropan	19.71	75	1139	1.0744	ug/L		87
98)	1,2,4-Trichlorobenzene	20.86	180	9978	1.0078	ug/L		93
99)	Hexachlorobutadiene	21.01	225	4008	1.0599	ug/L		89
100)	Naphthalene	21.24	128	19584	0.9879	ug/L		98
101)	1,2,3-Trichlorobenzene	21.54	180	10033	1.0497	ug/L		89

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9593	4.1	100	0.00
3	P	Chloromethane	1.0000	0.8003	20.0	100	0.02
4	C	Vinyl Chloride	1.0000	1.1160	-11.6	100	0.00
5	T	1,3-Butadiene	-1.0000	0.7170	0.0	0	0.03
6	T	Bromomethane	1.0000	0.9009	9.9	100	0.03
7	T	Chloroethane	1.0000	0.9845	1.5	100	0.02
8	T	Trichlorofluoromethane	1.0000	0.9905	0.9	100	0.02
9	T	Diethyl ether	5.0000	4.9333	1.3	100	0.00
10	T	Isoprene	-1.0000	0.9306	0.0	100	0.00
11	T	Acrolein	-1.0000	1.2633	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0241	-2.4	100	0.00
13	T	Acetone	-1.0000	1.2036	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.9690	3.1	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	9.4246	0.0	100	-0.02
16	T	Dimethyl Sulfide	-1.0000	0.9514	0.0	100	0.00
17	T	Iodomethane	1.0000	1.2641	-26.4#	100	0.02
18	T	Methyl acetate	-1.0000	0.9075	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0783	-7.8	100	0.00
20	T	Carbon Disulfide	1.0000	1.0176	-1.8	100	0.00
21	T	Acrylonitrile	2.5000	2.3254	7.0	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	1.0286	-2.9	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9982	0.2	100	0.00
24	T	n-Hexane	-1.0000	1.1054	0.0	100	-0.01
25	T	Diisopropyl ether	5.0000	5.0880	-1.8	100	0.00
26	T	Vinyl Acetate	-1.0000	0.8689	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9909	0.9	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0069	-0.1	100	0.00
29	T	2-Butanone	-1.0000	0.9178	0.0	100	0.00
30	T	Propionitrile	5.0000	4.4300	11.4	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.1658	-16.6	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9899	1.0	100	0.00
33	C	Chloroform	1.0000	1.0463	-4.6	100	0.00
34		1-Bromopropane	1.0000	0.7587	24.1#	100	0.00
35	T	Bromochloromethane	1.0000	0.9075	9.2	100	0.00
36	T	Tetrahydrofuran	5.0000	5.5703	-11.4	100	0.00
37	S	Dibromofluoromethane	0.5000	0.4799	4.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0083	-0.8	100	-0.01
39	T	Cyclohexane	1.0000	0.9941	0.6	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0028	-0.3	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	5.0351	-0.7	100	0.00
42	T	Carbon Tetrachloride	1.0000	0.8490	15.1	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.4714	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	1.0000	1.0134	-1.3	100	0.00
46	T	Benzene	1.0000	1.0289	-2.9	100	0.00
47	T	Trichloroethene	1.0000	0.9763	2.4	100	0.00
48	T	Methylcyclohexane	-1.0000	0.9805	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9927	0.7	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	1.0000	0.9546	4.5	100	0.00
52	T	Dibromomethane	1.0000	1.0392	-3.9	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8251	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.7976	0.0	100	0.00

(#) = Out of Range
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9724	2.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.8229	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	0.5000	0.5025	-0.5	100	0.00
59	C	Toluene	1.0000	1.0403	-4.0	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.9358	6.4	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.10
62	T	trans-1,3-Dichloropropene	1.0000	0.9673	3.3	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0059	-0.6	100	0.00
64	T	2-Hexanone	-1.0000	1.0508	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0281	-2.8	100	0.00
66	T	Tetrachloroethene	1.0000	1.0023	-0.2	100	0.00
67	T	Dibromochloromethane	1.0000	0.9472	5.3	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9954	0.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9919	0.8	100	0.00
70	P	Chlorobenzene	1.0000	1.0072	-0.7	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.9308	6.9	100	0.00
72	C	Ethylbenzene	1.0000	0.9260	7.4	100	0.00
73	T	m-,p-Xylene	2.0000	1.9553	2.2	100	0.00
74	T	o-Xylene	1.0000	1.0045	-0.4	100	0.00
75	T	Styrene	1.0000	0.9445	5.5	100	0.00
76	P	Bromoform	1.0000	0.8992	10.1	100	0.00
77	T	Isopropylbenzene	1.0000	1.0152	-1.5	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0159	-1.6	100	0.00
80	S	p-Bromofluorobenzene	0.5000	0.5071	-1.4	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	1.0131	-1.3	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	1.0000	0.8939	10.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0379	-3.8	100	0.00
84	T	Bromobenzene	1.0000	1.0200	-2.0	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	1.0230	-2.3	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0670	-6.7	100	0.00
87	T	4-Chlorotoluene	1.0000	1.0492	-4.9	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8654	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9805	2.0	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0156	-1.6	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0761	-7.6	100	0.00
92	T	p-Isopropyltoluene	1.0000	1.0345	-3.4	100	-0.01
93	T	1,3-Dichlorobenzene	1.0000	0.9930	0.7	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	0.9933	0.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0403	-4.0	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0212	-2.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	1.0744	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	1.0078	-0.8	100	0.00
99	T	Hexachlorobutadiene	1.0000	1.0599	-6.0	100	0.00
100	T	Naphthalene	1.0000	0.9879	1.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	1.0497	-5.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	622575	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	435125	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	222815	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	5872	0.9239	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.68%#			
43) 1,2-Dichloroethane-d4	10.85	65	6086	0.9716	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.88%#			
58) Toluene-d8	13.23	98	22416	1.0096	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	4.04%#			
80) p-Bromofluorobenzene	16.64	95	8846	1.0453	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.20%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	17204	1.7405	ug/L		90
3) Chloromethane	4.04	50	31810	2.0127	ug/L		90
4) Vinyl Chloride	4.28	62	21813	1.9313	ug/L		100
5) 1,3-Butadiene	4.32	54	13563	1.8365	ug/L		98
6) Bromomethane	5.24	94	7916	1.6233	ug/L		98
7) Chloroethane	5.41	64	9130	1.8788	ug/L		79
8) Trichlorofluoromethane	5.91	101	21485	1.8560	ug/L		98
9) Diethyl ether	6.44	59	119329	24.7359	ug/L		81
10) Isoprene	6.48	67	17497	1.8377	ug/L		78
11) Acrolein	6.67	56	6469	12.2399	ug/L		91
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	12320	1.8801	ug/L		96
13) Acetone	6.77	43	2910	2.1660	ug/L		88
14) 1,1-Dichloroethene	7.02	61	18326	1.9308	ug/L		82
15) Tert-Butyl Alcohol	7.11	59	21089	50.6073	ug/L		91
16) Dimethyl Sulfide	7.28	62	13289	1.9594	ug/L		85
17) Iodomethane	7.55	142	6278	1.9004	ug/L		87
18) Methyl acetate	7.54	43	6217	1.8451	ug/L	#	93
19) Methylene Chloride	7.80	84	14280	1.9900	ug/L		58
20) Carbon Disulfide	7.86	76	40699	1.9924	ug/L		98
21) Acrylonitrile	7.97	53	18438	11.8437	ug/L		95
22) Methyl Tert Butyl Ether	8.01	73	30909	1.9643	ug/L		90
23) trans-1,2-Dichloroethene	8.26	96	13599	1.9908	ug/L		73
24) n-Hexane	8.33	57	15204	1.9682	ug/L		83
25) Diisopropyl ether	8.66	45	450794	25.6347	ug/L	#	90
26) Vinyl Acetate	8.82	43	6597	1.3515	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	22151	1.9576	ug/L		100
28) Ethyl-Tert-Butyl ether	9.24	59	449659	25.2364	ug/L		91
29) 2-Butanone	9.42	43	3106	1.8344	ug/L		84
30) Propionitrile	9.52	54	13656	24.7299	ug/L		97
31) 2,2-Dichloropropane	9.64	77	17425	2.0241	ug/L		79
32) cis-1,2-Dichloroethene	9.72	96	14760	1.9654	ug/L		85
33) Chloroform	9.92	83	24171	1.8751	ug/L		93
34) 1-Bromopropane	10.05	122	2578	1.9358	ug/L		99
35) Bromochloromethane	10.15	130	7493	1.8954	ug/L		94
36) Tetrahydrofuran	10.18	42	27217	24.4090	ug/L	#	70
38) 1,1,1-Trichloroethane	10.46	97	20272	1.9343	ug/L		87
39) Cyclohexane	10.49	56	18307	1.8890	ug/L		77
40) 1,1-Dichloropropene	10.65	75	17358	1.9593	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	419848	24.8173	ug/L		93
42) Carbon Tetrachloride	10.80	117	13633	1.6498	ug/L		96

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

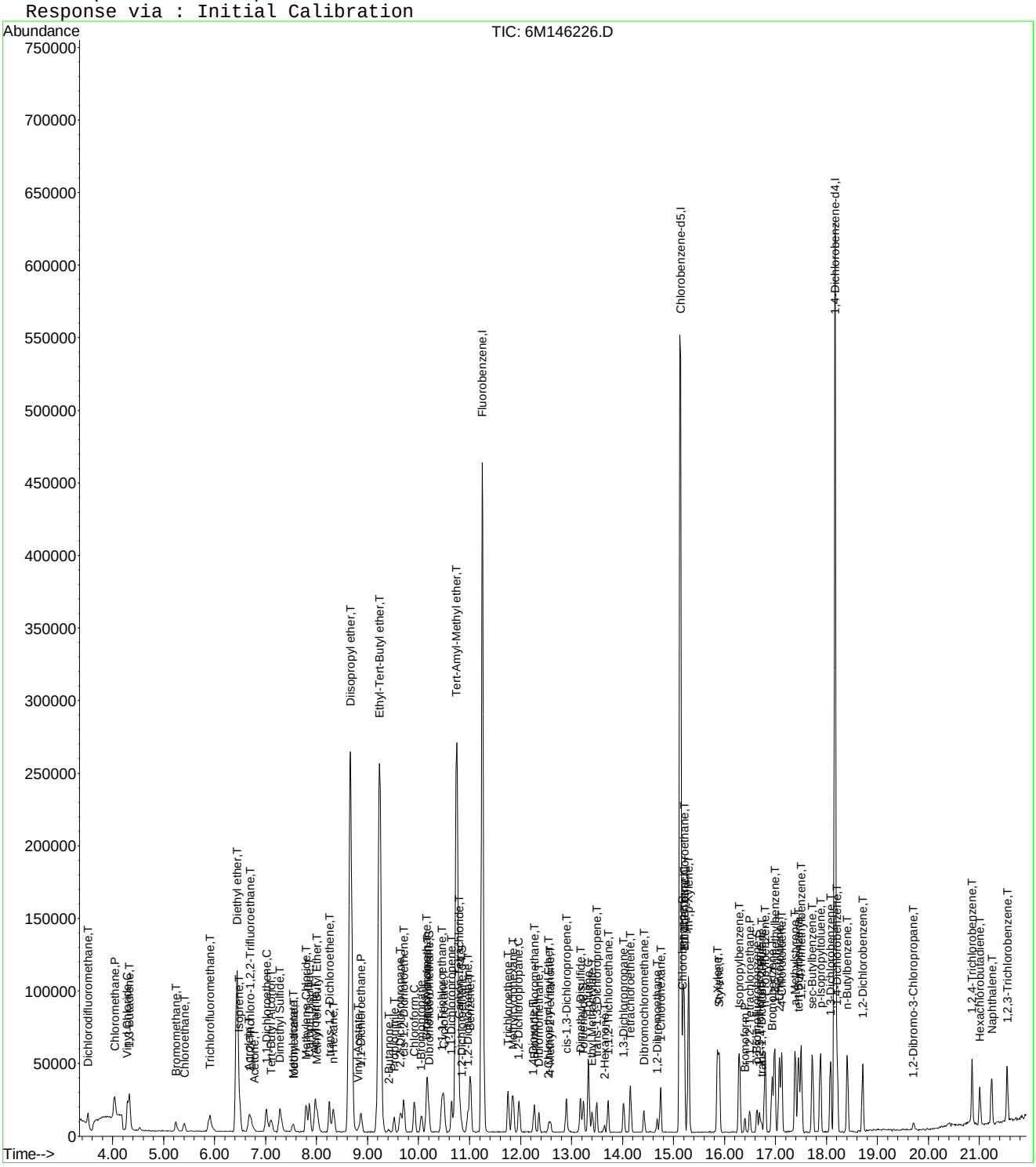
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	15260	1.9029	ug/L		88
46)	Benzene	11.01	78	53642	2.0138	ug/L		84
47)	Trichloroethene	11.76	130	13662	1.8843	ug/L		86
48)	Methylcyclohexane	11.85	83	20180	1.9264	ug/L		83
49)	1,2-Dichloropropane	11.96	63	12672	2.0157	ug/L		96
50)	1,4-Dioxane	12.25	88	2094	45.8104	ug/L		79
51)	Bromodichloromethane	12.27	83	16986	1.9140	ug/L		100
52)	Dibromomethane	12.36	93	7229	1.9525	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.54	63	3804	1.5427	ug/L		93
54)	4-Methyl-2-Pentanone	12.59	58	2633	1.6278	ug/L		97
55)	cis-1,3-Dichloropropene	12.90	75	18417	1.8845	ug/L		93
56)	Dimethyl Disulfide	13.18	79	10342	1.6774	ug/L		85
59)	Toluene	13.33	91	54153	1.9906	ug/L		99
60)	Ethyl Methacrylate	13.40	69	12139	1.8439	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	14848	1.7701	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	10051	1.9605	ug/L		100
64)	2-Hexanone	13.65	43	4642	1.8856	ug/L		83
65)	1,3-Dichloropropane	14.03	76	16522	1.9199	ug/L		72
66)	Tetrachloroethene	14.16	166	13068	1.9824	ug/L		97
67)	Dibromochloromethane	14.42	129	11966	1.8881	ug/L		99
68)	1,2-Dibromoethane	14.68	107	9631	1.9565	ug/L		98
69)	1-Chlorohexane	14.75	91	16906	1.9245	ug/L		76
70)	Chlorobenzene	15.18	112	35469	1.9050	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	12013	1.8016	ug/L		88
72)	Ethylbenzene	15.21	106	18719	1.8571	ug/L		98
73)	m-,p-Xylene	15.29	106	46470	3.8571	ug/L		92
74)	o-Xylene	15.86	106	22349	1.9223	ug/L		97
75)	Styrene	15.89	104	37462	1.9194	ug/L		98
76)	Bromoform	16.40	173	6961	1.8024	ug/L		93
77)	Isopropylbenzene	16.29	105	56507	1.9422	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	11588	1.9969	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	3156	1.8416	ug/L	#	45
82)	trans-1,4-Dichloro-2-Buten	16.73	53	2077	1.6855	ug/L	#	1
83)	n-Propylbenzene	16.79	91	68212	2.0219	ug/L		100
84)	Bromobenzene	16.94	156	14979	1.9764	ug/L		81
85)	1,3,5-Trimethylbenzene	16.99	105	48272	2.0191	ug/L		98
86)	2-Chlorotoluene	17.08	91	45900	2.0434	ug/L		97
87)	4-Chlorotoluene	17.12	91	40071	2.0184	ug/L		97
88)	a-Methylstyrene	17.38	118	23772	1.7980	ug/L		98
89)	tert-Butylbenzene	17.46	134	10046	2.0053	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	48653	1.9815	ug/L		86
91)	sec-Butylbenzene	17.72	105	59307	2.0115	ug/L		96
92)	p-Isopropyltoluene	17.88	119	48956	1.9740	ug/L		96
93)	1,3-Dichlorobenzene	18.08	146	28643	2.0012	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	28060	1.9387	ug/L		82
95)	n-Butylbenzene	18.41	91	44182	1.9509	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	25901	1.9307	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	1831	1.7419	ug/L		85
98)	1,2,4-Trichlorobenzene	20.86	180	18897	1.9251	ug/L		96
99)	Hexachlorobutadiene	21.01	225	7029	1.8748	ug/L		95
100)	Naphthalene	21.24	128	36518	1.8580	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	17908	1.8898	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7405	13.0	100	0.00
3	P	Chloromethane	2.0000	2.0127	-0.6	100	0.02
4	C	Vinyl Chloride	2.0000	1.9313	3.4	100	0.01
5	T	1,3-Butadiene	-1.0000	1.8365	0.0	0	0.01
6	T	Bromomethane	2.0000	1.6233	18.8	100	0.03
7	T	Chloroethane	2.0000	1.8788	6.1	100	0.03
8	T	Trichlorofluoromethane	2.0000	1.8560	7.2	100	0.02
9	T	Diethyl ether	25.0000	24.7359	1.1	100	0.00
10	T	Isoprene	-1.0000	1.8377	0.0	100	0.00
11	T	Acrolein	12.5000	12.2399	2.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8801	6.0	100	0.02
13	T	Acetone	-1.0000	2.1660	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9308	3.5	100	0.00
15	T	Tert-Butyl Alcohol	50.0000	50.6073	-1.2	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.9594	0.0	100	0.00
17	T	Iodomethane	2.0000	1.9004	5.0	100	0.02
18	T	Methyl acetate	-1.0000	1.8451	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.9900	0.5	100	0.00
20	T	Carbon Disulfide	2.0000	1.9924	0.4	100	0.00
21	T	Acrylonitrile	12.5000	11.8437	5.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.9643	1.8	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9908	0.5	100	0.00
24	T	n-Hexane	-1.0000	1.9682	0.0	100	0.00
25	T	Diisopropyl ether	25.0000	25.6347	-2.5	100	0.00
26	T	Vinyl Acetate	-1.0000	1.3515	0.0	100	-0.01
27	P	1,1-Dichloroethane	2.0000	1.9576	2.1	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	25.2364	-0.9	100	0.00
29	T	2-Butanone	-1.0000	1.8344	0.0	100	0.00
30	T	Propionitrile	25.0000	24.7299	1.1	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0241	-1.2	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9654	1.7	100	0.00
33	C	Chloroform	2.0000	1.8751	6.2	100	0.00
34		1-Bromopropane	2.0000	1.9358	3.2	100	0.00
35	T	Bromochloromethane	2.0000	1.8954	5.2	100	0.00
36	T	Tetrahydrofuran	25.0000	24.4090	2.4	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9239	7.6	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.9343	3.3	100	0.00
39	T	Cyclohexane	2.0000	1.8890	5.5	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9593	2.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.8173	0.7	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.6498	17.5	100	-0.01
43	S	1,2-Dichloroethane-d4	1.0000	0.9716	2.8	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	2.0000	1.9029	4.9	100	0.00
46	T	Benzene	2.0000	2.0138	-0.7	100	0.00
47	T	Trichloroethene	2.0000	1.8843	5.8	100	0.00
48	T	Methylcyclohexane	-1.0000	1.9264	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	2.0158	-0.8	100	-0.01
50	T	1,4-Dioxane	-1.0000	45.8104	0.0	100	0.00
51	T	Bromodichloromethane	2.0000	1.9140	4.3	100	0.00
52	T	Dibromomethane	2.0000	1.9525	2.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.5427	22.9#	100	-0.01
54	T	4-Methyl-2-Pentanone	-1.0000	1.6278	0.0	100	0.00

(#) = Out of Range
6M146226.D 8260BWT.M Thu Apr 06 15:02:50 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8845	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	1.6774	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	1.0096	-1.0	100	0.00
59	C	Toluene	2.0000	1.9906	0.5	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.8439	7.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	2.0000	1.7701	11.5	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9605	2.0	100	0.00
64	T	2-Hexanone	-1.0000	1.8856	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9199	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9824	0.9	100	0.00
67	T	Dibromochloromethane	2.0000	1.8882	5.6	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9565	2.2	100	0.00
69	T	1-Chlorohexane	2.0000	1.9245	3.8	100	0.00
70	P	Chlorobenzene	2.0000	1.9050	4.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8016	9.9	100	0.00
72	C	Ethylbenzene	2.0000	1.8571	7.1	100	0.00
73	T	m-,p-Xylene	4.0000	3.8571	3.6	100	0.00
74	T	o-Xylene	2.0000	1.9223	3.9	100	0.00
75	T	Styrene	2.0000	1.9194	4.0	100	-0.01
76	P	Bromoform	2.0000	1.8024	9.9	100	0.00
77	T	Isopropylbenzene	2.0000	1.9422	2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9969	0.2	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0453	-4.5	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8416	7.9	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.6855	15.7	100	0.00
83	T	n-Propylbenzene	2.0000	2.0219	-1.1	100	0.00
84	T	Bromobenzene	2.0000	1.9764	1.2	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	2.0191	-1.0	100	0.00
86	T	2-Chlorotoluene	2.0000	2.0434	-2.2	100	0.00
87	T	4-Chlorotoluene	2.0000	2.0184	-0.9	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7980	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	2.0053	-0.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	1.9815	0.9	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0115	-0.6	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9740	1.3	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	2.0012	-0.1	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9387	3.1	100	0.00
95	T	n-Butylbenzene	2.0000	1.9509	2.5	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	1.9307	3.5	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7419	12.9	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.9251	3.7	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.8748	6.3	100	0.00
100	T	Naphthalene	2.0000	1.8580	7.1	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8898	5.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146226.D 8260BWT.M Thu Apr 06 15:02:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	624930	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	437844	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	229708	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	16009	2.5095	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 10.04%#				
43) 1,2-Dichloroethane-d4	10.85	65	15355	2.4422	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 9.76%#				
58) Toluene-d8	13.24	98	57180	2.5593	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 10.24%#				
80) p-Bromofluorobenzene	16.64	95	20953	2.4017	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 9.60%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	45599	4.5957	ug/L		94
3) Chloromethane	4.04	50	70172	5.3733	ug/L		92
4) Vinyl Chloride	4.28	62	52481	4.6291	ug/L		100
5) 1,3-Butadiene	4.33	54	27485	5.0651	ug/L		93
6) Bromomethane	5.24	94	22408	4.5778	ug/L		98
7) Chloroethane	5.41	64	24876	5.0998	ug/L		86
8) Trichlorofluoromethane	5.91	101	57306	4.9318	ug/L		99
9) Diethyl ether	6.44	59	241182	49.8065	ug/L		81
10) Isoprene	6.48	67	45799	4.7920	ug/L		80
11) Acrolein	6.67	56	13253	24.9813	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	32606	4.9572	ug/L		97
13) Acetone	6.77	43	7120	5.2798	ug/L		90
14) 1,1-Dichloroethene	7.01	61	48384	5.0784	ug/L		84
15) Tert-Butyl Alcohol	7.11	59	45515	108.8107	ug/L		90
16) Dimethyl Sulfide	7.28	62	33336	4.8967	ug/L		83
17) Iodomethane	7.54	142	18689	4.0940	ug/L		98
18) Methyl acetate	7.53	43	16127	4.7683	ug/L		90
19) Methylene Chloride	7.80	84	35921	4.9870	ug/L		61
20) Carbon Disulfide	7.86	76	101736	4.9617	ug/L		99
21) Acrylonitrile	7.97	53	39515	25.2869	ug/L		94
22) Methyl Tert Butyl Ether	8.01	73	82575	5.2279	ug/L		89
23) trans-1,2-Dichloroethene	8.26	96	34052	4.9661	ug/L		78
24) n-Hexane	8.33	57	39086	5.0408	ug/L		81
25) Diisopropyl ether	8.66	45	886670	50.2311	ug/L	#	90
26) Vinyl Acetate	8.83	43	24007	4.8995	ug/L	#	91
27) 1,1-Dichloroethane	8.87	63	57099	5.0271	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	897158	50.1618	ug/L		90
29) 2-Butanone	9.42	43	8484	4.9917	ug/L		88
30) Propionitrile	9.52	54	29088	52.4775	ug/L		99
31) 2,2-Dichloropropane	9.65	77	44879	5.1936	ug/L		78
32) cis-1,2-Dichloroethene	9.71	96	37579	4.9850	ug/L		89
33) Chloroform	9.92	83	60253	4.6565	ug/L		95
34) 1-Bromopropane	10.06	122	6559	4.9064	ug/L		100
35) Bromochloromethane	10.15	130	20571	5.1839	ug/L		98
36) Tetrahydrofuran	10.17	42	56370	50.3637	ug/L	#	72
38) 1,1,1-Trichloroethane	10.46	97	51277	4.8743	ug/L		91
39) Cyclohexane	10.49	56	47949	4.9291	ug/L		78
40) 1,1-Dichloropropene	10.64	75	44354	4.9877	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	851603	50.1488	ug/L		93
42) Carbon Tetrachloride	10.80	117	40401	4.8706	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

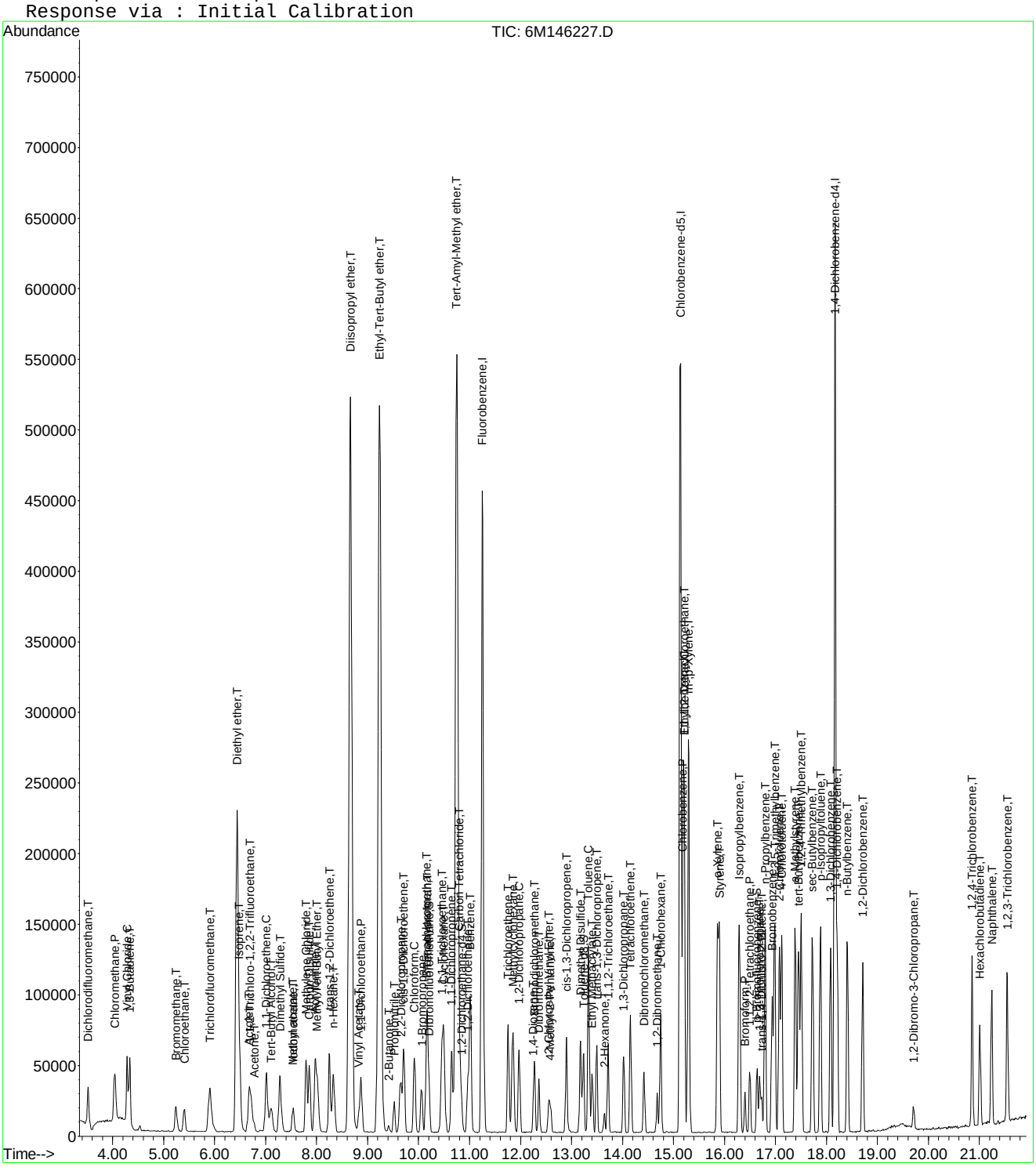
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	40993	5.0925	ug/L		88
46)	Benzene	11.01	78	132914	4.9709	ug/L		86
47)	Trichloroethene	11.76	130	36216	4.9761	ug/L		84
48)	Methylcyclohexane	11.85	83	51654	4.9123	ug/L		82
49)	1,2-Dichloropropane	11.97	63	32123	5.0906	ug/L		96
50)	1,4-Dioxane	12.25	88	4272	93.1064	ug/L		79
51)	Bromodichloromethane	12.27	83	44761	5.0248	ug/L		99
52)	Dibromomethane	12.36	93	19386	5.2162	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	12476	5.0404	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	7903	4.8674	ug/L		86
55)	cis-1,3-Dichloropropene	12.90	75	50089	5.1061	ug/L		95
56)	Dimethyl Disulfide	13.18	79	28390	4.5874	ug/L		89
59)	Toluene	13.33	91	137485	5.0224	ug/L		100
60)	Ethyl Methacrylate	13.40	69	33232	5.0167	ug/L		72
62)	trans-1,3-Dichloropropene	13.49	75	42828	5.0741	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	26530	5.1428	ug/L		99
64)	2-Hexanone	13.65	43	12468	5.0332	ug/L		86
65)	1,3-Dichloropropane	14.02	76	44093	5.0920	ug/L		70
66)	Tetrachloroethene	14.16	166	33551	5.0579	ug/L		98
67)	Dibromochloromethane	14.42	129	31682	4.9681	ug/L		99
68)	1,2-Dibromoethane	14.68	107	24528	4.9517	ug/L		99
69)	1-Chlorohexane	14.75	91	43721	4.9460	ug/L		79
70)	Chlorobenzene	15.18	112	91449	4.8810	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.21	131	32496	4.8433	ug/L		89
72)	Ethylbenzene	15.21	106	48984	4.8296	ug/L		96
73)	m-,p-Xylene	15.29	106	119341	9.8441	ug/L		94
74)	o-Xylene	15.86	106	57354	4.9026	ug/L		97
75)	Styrene	15.90	104	98078	4.9940	ug/L		95
76)	Bromoform	16.40	173	18699	4.8117	ug/L		99
77)	Isopropylbenzene	16.29	105	146585	5.0070	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	30970	5.1767	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	9050	5.1225	ug/L	#	50
82)	trans-1,4-Dichloro-2-Buten	16.73	53	6208	4.8867	ug/L	#	1
83)	n-Propylbenzene	16.80	91	176740	5.0817	ug/L		100
84)	Bromobenzene	16.93	156	38734	4.9575	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	121939	4.9473	ug/L		99
86)	2-Chlorotoluene	17.08	91	114766	4.9559	ug/L		97
87)	4-Chlorotoluene	17.12	91	102125	4.9897	ug/L		97
88)	a-Methylstyrene	17.38	118	66394	4.8711	ug/L		96
89)	tert-Butylbenzene	17.46	134	24993	4.8393	ug/L		71
90)	1,2,4-Trimethylbenzene	17.51	105	126114	4.9821	ug/L		87
91)	sec-Butylbenzene	17.72	105	152633	5.0216	ug/L		97
92)	p-Isopropyltoluene	17.88	119	126283	4.9391	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	71556	4.8495	ug/L		97
94)	1,4-Dichlorobenzene	18.21	146	72485	4.8577	ug/L		94
95)	n-Butylbenzene	18.41	91	115961	4.9668	ug/L		99
96)	1,2-Dichlorobenzene	18.71	146	67580	4.8863	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.71	75	5531	5.1041	ug/L		98
98)	1,2,4-Trichlorobenzene	20.86	180	48642	4.8067	ug/L		98
99)	Hexachlorobutadiene	21.01	225	19187	4.9642	ug/L		98
100)	Naphthalene	21.24	128	101621	5.0152	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	45886	4.6970	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.5957	8.1	100	0.00
3	P	Chloromethane	5.0000	5.3733	-7.5	100	0.02
4	C	Vinyl Chloride	5.0000	4.6291	7.4	100	0.00
5	T	1,3-Butadiene	5.0000	5.0651	-1.3	100	0.02
6	T	Bromomethane	5.0000	4.5778	8.4	100	0.03
7	T	Chloroethane	5.0000	5.0998	-2.0	100	0.03
8	T	Trichlorofluoromethane	5.0000	4.9318	1.4	100	0.02
9	T	Diethyl ether	50.0000	49.8065	0.4	100	0.00
10	T	Isoprene	5.0000	4.7920	4.2	100	0.00
11	T	Acrolein	25.0000	24.9813	0.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.9572	0.9	100	0.00
13	T	Acetone	5.0000	5.2798	-5.6	100	0.00
14	C	1,1-Dichloroethene	5.0000	5.0784	-1.6	100	0.00
15	T	Tert-Butyl Alcohol	100.0000	108.8107	-8.8	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8967	2.1	100	0.00
17	T	Iodomethane	5.0000	4.0940	18.1	100	0.00
18	T	Methyl acetate	5.0000	4.7683	4.6	100	0.00
19	T	Methylene Chloride	5.0000	4.9870	0.3	100	0.00
20	T	Carbon Disulfide	5.0000	4.9617	0.8	100	0.00
21	T	Acrylonitrile	25.0000	25.2869	-1.1	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	5.2279	-4.6	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.9661	0.7	100	0.00
24	T	n-Hexane	5.0000	5.0408	-0.8	100	0.00
25	T	Diisopropyl ether	50.0000	50.2311	-0.5	100	0.00
26	T	Vinyl Acetate	5.0000	4.8995	2.0	100	0.00
27	P	1,1-Dichloroethane	5.0000	5.0271	-0.5	100	0.00
28	T	Ethyl-Tert-Butyl ether	50.0000	50.1618	-0.3	100	0.00
29	T	2-Butanone	5.0000	4.9917	0.2	100	0.00
30	T	Propionitrile	50.0000	52.4775	-5.0	100	0.00
31	T	2,2-Dichloropropane	5.0000	5.1936	-3.9	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9850	0.3	100	0.00
33	C	Chloroform	5.0000	4.6565	6.9	100	0.00
34		1-Bromopropane	5.0000	4.9064	1.9	100	0.00
35	T	Bromochloromethane	5.0000	5.1839	-3.7	100	0.00
36	T	Tetrahydrofuran	50.0000	50.3637	-0.7	100	0.00
37	S	Dibromofluoromethane	2.5000	2.5095	-0.4	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8743	2.5	100	0.00
39	T	Cyclohexane	5.0000	4.9291	1.4	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.9877	0.2	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	50.1488	-0.3	100	0.00
42	T	Carbon Tetrachloride	5.0000	4.8706	2.6	100	-0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4421	2.3	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	0.00
45	T	1,2-Dichloroethane	5.0000	5.0925	-1.9	100	0.00
46	T	Benzene	5.0000	4.9709	0.6	100	0.00
47	T	Trichloroethene	5.0000	4.9761	0.5	100	0.00
48	T	Methylcyclohexane	5.0000	4.9123	1.8	100	0.00
49	C	1,2-Dichloropropane	5.0000	5.0906	-1.8	100	0.00
50	T	1,4-Dioxane	100.0000	93.1064	6.9	100	0.00
51	T	Bromodichloromethane	5.0000	5.0248	-0.5	100	0.00
52	T	Dibromomethane	5.0000	5.2162	-4.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	5.0404	-0.8	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.8674	2.7	100	0.00

(#) = Out of Range

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	5.1061	-2.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	4.5874	8.3	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.5593	-2.4	100	0.00
59	C	Toluene	5.0000	5.0224	-0.4	100	0.00
60	T	Ethyl Methacrylate	5.0000	5.0167	-0.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	5.0000	5.0741	-1.5	100	0.00
63	T	1,1,2-Trichloroethane	5.0000	5.1428	-2.9	100	0.00
64	T	2-Hexanone	5.0000	5.0332	-0.7	100	0.00
65	T	1,3-Dichloropropane	5.0000	5.0920	-1.8	100	0.00
66	T	Tetrachloroethene	5.0000	5.0579	-1.2	100	0.00
67	T	Dibromochloromethane	5.0000	4.9681	0.6	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9517	1.0	100	0.00
69	T	1-Chlorohexane	5.0000	4.9460	1.1	100	0.00
70	P	Chlorobenzene	5.0000	4.8810	2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.8433	3.1	100	0.00
72	C	Ethylbenzene	5.0000	4.8296	3.4	100	0.00
73	T	m-,p-Xylene	10.0000	9.8441	1.6	100	0.00
74	T	o-Xylene	5.0000	4.9026	1.9	100	0.00
75	T	Styrene	5.0000	4.9940	0.1	100	0.00
76	P	Bromoform	5.0000	4.8117	3.8	100	0.00
77	T	Isopropylbenzene	5.0000	5.0070	-0.1	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	5.1767	-3.5	100	0.00
80	S	p-Bromofluorobenzene	2.5000	2.4017	3.9	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	5.1225	-2.5	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.8867	2.3	100	0.00
83	T	n-Propylbenzene	5.0000	5.0817	-1.6	100	0.00
84	T	Bromobenzene	5.0000	4.9575	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9473	1.1	100	0.00
86	T	2-Chlorotoluene	5.0000	4.9558	0.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.9897	0.2	100	0.00
88	T	a-Methylstyrene	5.0000	4.8711	2.6	100	0.00
89	T	tert-Butylbenzene	5.0000	4.8393	3.2	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9821	0.4	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0216	-0.4	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9391	1.2	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8495	3.0	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.8577	2.8	100	0.00
95	T	n-Butylbenzene	5.0000	4.9668	0.7	100	0.00
96	T	1,2-Dichlorobenzene	5.0000	4.8863	2.3	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	5.1041	-2.1	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.8067	3.9	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.9642	0.7	100	0.00
100	T	Naphthalene	5.0000	5.0152	-0.3	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.6970	6.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146227.D 8260BWT.M Thu Apr 06 15:03:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	627241	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	447577	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	235510	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	65613	10.2471	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 41.00%#				
43) 1,2-Dichloroethane-d4	10.84	65	64459	10.2142	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.84%#				
58) Toluene-d8	13.23	98	228384	9.9998	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 40.00%#				
80) p-Bromofluorobenzene	16.63	95	91659	10.2472	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 41.00%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	217664	21.8564	ug/L		93
3) Chloromethane	4.03	50	264881	22.3981	ug/L		99
4) Vinyl Chloride	4.29	62	233054	20.4810	ug/L		99
5) 1,3-Butadiene	4.33	54	106373	23.7613	ug/L		88
6) Bromomethane	5.24	94	98255	19.9988	ug/L		97
7) Chloroethane	5.40	64	103887	21.2191	ug/L		84
8) Trichlorofluoromethane	5.91	101	240343	20.6080	ug/L		99
9) Diethyl ether	6.44	59	380286	78.2436	ug/L		82
10) Isoprene	6.48	67	178379	18.5952	ug/L		80
11) Acrolein	6.68	56	20488	38.4767	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.71	101	132626	20.0893	ug/L		98
13) Acetone	6.78	43	28940	21.3811	ug/L		93
14) 1,1-Dichloroethene	7.01	61	195653	20.4603	ug/L		83
15) Tert-Butyl Alcohol	7.11	59	64817	154.3843	ug/L		90
16) Dimethyl Sulfide	7.28	62	130765	19.1371	ug/L		78
17) Iodomethane	7.54	142	98959	18.2438	ug/L		99
18) Methyl acetate	7.53	43	62843	18.5124	ug/L	#	82
19) Methylene Chloride	7.80	84	143369	19.8310	ug/L		60
20) Carbon Disulfide	7.86	76	390904	18.9942	ug/L		100
21) Acrylonitrile	7.96	53	63296	40.3559	ug/L		97
22) Methyl Tert Butyl Ether	8.01	73	330905	20.8726	ug/L		90
23) trans-1,2-Dichloroethene	8.25	96	138532	20.1290	ug/L		77
24) n-Hexane	8.33	57	145559	18.7032	ug/L		83
25) Diisopropyl ether	8.66	45	1403454	79.2147	ug/L	#	90
26) Vinyl Acetate	8.83	43	85023	17.2882	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	233405	20.4736	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1415029	78.8255	ug/L		91
29) 2-Butanone	9.41	43	34173	20.0320	ug/L	#	81
30) Propionitrile	9.52	54	43958	79.0122	ug/L		100
31) 2,2-Dichloropropane	9.65	77	149189	17.2012	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	151702	20.0499	ug/L		88
33) Chloroform	9.91	83	241705	18.6109	ug/L		94
34) 1-Bromopropane	10.06	122	28065	20.9166	ug/L		97
35) Bromochloromethane	10.15	130	85288	21.4135	ug/L		99
36) Tetrahydrofuran	10.18	42	86703	77.1792	ug/L	#	71
38) 1,1,1-Trichloroethane	10.45	97	212928	20.1661	ug/L		91
39) Cyclohexane	10.49	56	183893	18.8342	ug/L		77
40) 1,1-Dichloropropene	10.65	75	179871	20.1524	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	1330159	78.0412	ug/L		93
42) Carbon Tetrachloride	10.80	117	176032	21.1436	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

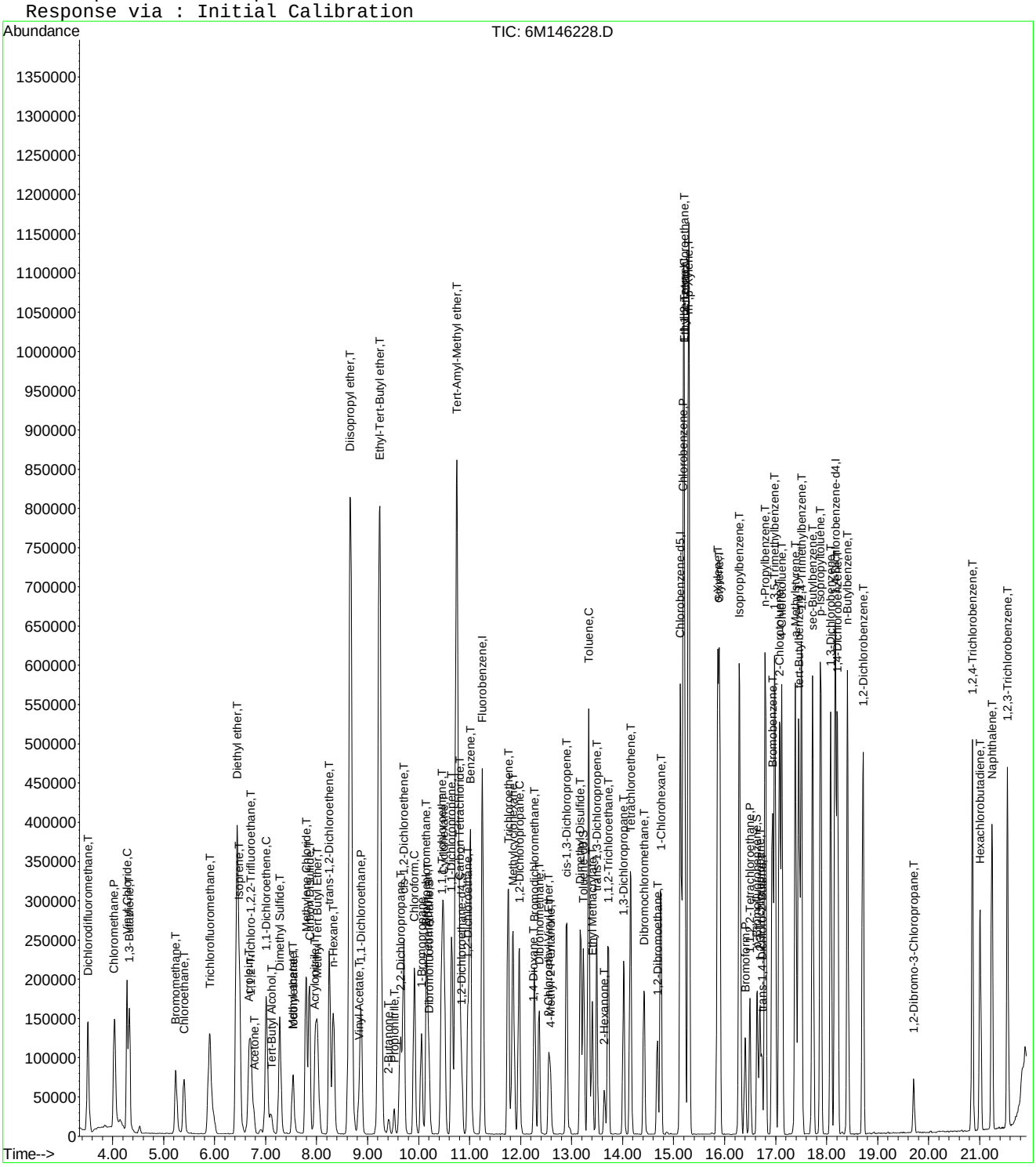
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	162109	20.0644	ug/L		89
46)	Benzene	11.02	78	529115	19.7158	ug/L		86
47)	Trichloroethene	11.76	130	150238	20.5667	ug/L		87
48)	Methylcyclohexane	11.85	83	197423	18.7059	ug/L		81
49)	1,2-Dichloropropane	11.98	63	131909	20.8268	ug/L		95
50)	1,4-Dioxane	12.25	88	7005	152.1084	ug/L		87
51)	Bromodichloromethane	12.27	83	185470	20.7439	ug/L		99
52)	Dibromomethane	12.36	93	77214	20.6995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	53194	21.4116	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	32212	19.7660	ug/L		82
55)	cis-1,3-Dichloropropene	12.90	75	206895	21.0133	ug/L		96
56)	Dimethyl Disulfide	13.17	79	112927	18.1801	ug/L		89
59)	Toluene	13.33	91	555221	19.8416	ug/L		100
60)	Ethyl Methacrylate	13.40	69	129462	19.1184	ug/L		71
62)	trans-1,3-Dichloropropene	13.50	75	176914	20.5042	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107303	20.3482	ug/L		99
64)	2-Hexanone	13.64	43	50259	19.8477	ug/L		85
65)	1,3-Dichloropropane	14.02	76	178966	20.2181	ug/L		71
66)	Tetrachloroethene	14.16	166	136246	20.0929	ug/L		96
67)	Dibromochloromethane	14.42	129	135202	20.7404	ug/L		99
68)	1,2-Dibromoethane	14.68	107	100778	19.9028	ug/L		98
69)	1-Chlorohexane	14.75	91	167924	18.5834	ug/L		76
70)	Chlorobenzene	15.18	112	374272	19.5421	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	138016	20.1228	ug/L		94
72)	Ethylbenzene	15.21	106	202068	19.4896	ug/L		96
73)	m-,p-Xylene	15.29	106	481680	38.8682	ug/L		93
74)	o-Xylene	15.87	106	239598	20.0353	ug/L		93
75)	Styrene	15.90	104	405734	20.2101	ug/L		95
76)	Bromoform	16.41	173	81039	20.4000	ug/L		99
77)	Isopropylbenzene	16.28	105	597096	19.9520	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	119591	19.4973	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	37129	20.4983	ug/L		64
82)	trans-1,4-Dichloro-2-Buten	16.73	53	24964	19.1666	ug/L	#	1
83)	n-Propylbenzene	16.80	91	713905	20.0209	ug/L		99
84)	Bromobenzene	16.94	156	161202	20.1236	ug/L		85
85)	1,3,5-Trimethylbenzene	16.98	105	501322	19.8384	ug/L		100
86)	2-Chlorotoluene	17.07	91	485880	20.4645	ug/L		97
87)	4-Chlorotoluene	17.12	91	386400	18.4139	ug/L		95
88)	a-Methylstyrene	17.39	118	257428	18.4215	ug/L		99
89)	tert-Butylbenzene	17.46	134	106931	20.1945	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	519993	20.0363	ug/L		87
91)	sec-Butylbenzene	17.72	105	621099	19.9306	ug/L		98
92)	p-Isopropyltoluene	17.88	119	523649	19.9759	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	301598	19.9362	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	300266	19.6272	ug/L		97
95)	n-Butylbenzene	18.41	91	473351	19.7747	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	282119	19.8957	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	22784	20.5074	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	203918	19.6545	ug/L		98
99)	Hexachlorobutadiene	21.01	225	76009	19.1810	ug/L		99
100)	Naphthalene	21.24	128	421214	20.2755	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	187267	18.6967	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.26	96	643185	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	452398	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	244954	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	166582	25.3710 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.48%		
43) 1,2-Dichloroethane-d4	10.85	65	162624	25.1306 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.52%		
58) Toluene-d8	13.24	98	572476	24.7988 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.20%		
80) p-Bromofluorobenzene	16.64	95	228722	24.5846 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	553692	54.2200 ug/L	93
3) Chloromethane	4.04	50	600762	50.5019 ug/L	96
4) Vinyl Chloride	4.28	62	580327	49.7355 ug/L	98
5) 1,3-Butadiene	4.32	54	226006	52.2463 ug/L	89
6) Bromomethane	5.24	94	282558	56.0861 ug/L	99
7) Chloroethane	5.40	64	261262	52.0405 ug/L	86
8) Trichlorofluoromethane	5.91	101	620646	51.8976 ug/L	99
9) Diethyl ether	6.44	59	492985	98.9169 ug/L	81
10) Isoprene	6.48	67	496738	50.4991 ug/L	80
11) Acrolein	6.67	56	27556	50.4676 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	339922	50.2127 ug/L	99
13) Acetone	6.77	43	71305	51.3749 ug/L	91
14) 1,1-Dichloroethene	7.02	61	496978	50.6828 ug/L	82
15) Tert-Butyl Alcohol	7.11	59	73877	171.6018 ug/L	92
16) Dimethyl Sulfide	7.27	62	354958	50.6595 ug/L	78
17) Iodomethane	7.54	142	275688	48.2182 ug/L	99
18) Methyl acetate	7.53	43	172494	49.5541 ug/L #	83
19) Methylene Chloride	7.80	84	366519	49.4406 ug/L	58
20) Carbon Disulfide	7.86	76	1082478	51.2943 ug/L	99
21) Acrylonitrile	7.97	53	85120	52.9250 ug/L	99
22) Methyl Tert Butyl Ether	8.01	73	811828	49.9385 ug/L	90
23) trans-1,2-Dichloroethene	8.26	96	354872	50.2856 ug/L	76
24) n-Hexane	8.33	57	401945	50.3665 ug/L	84
25) Diisopropyl ether	8.66	45	1784496	98.2249 ug/L #	89
26) Vinyl Acetate	8.83	43	213738	42.3833 ug/L #	86
27) 1,1-Dichloroethane	8.87	63	581534	49.7460 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	1807267	98.1798 ug/L	90
29) 2-Butanone	9.42	43	84730	48.4371 ug/L #	77
30) Propionitrile	9.52	54	58459	102.4722 ug/L	99
31) 2,2-Dichloropropane	9.65	77	356297	40.0620 ug/L	78
32) cis-1,2-Dichloroethene	9.72	96	387448	49.9382 ug/L	85
33) Chloroform	9.92	83	612607	46.0004 ug/L	95
34) 1-Bromopropane	10.06	122	73633	53.5176 ug/L	100
35) Bromochloromethane	10.15	130	215507	52.7668 ug/L	100
36) Tetrahydrofuran	10.17	42	110912	96.2816 ug/L #	70
38) 1,1,1-Trichloroethane	10.46	97	545213	50.3562 ug/L	90
39) Cyclohexane	10.49	56	510981	51.0369 ug/L	77
40) 1,1-Dichloropropene	10.65	75	459189	50.1714 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	1722091	98.5314 ug/L	92
42) Carbon Tetrachloride	10.80	117	471043	55.1754 ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

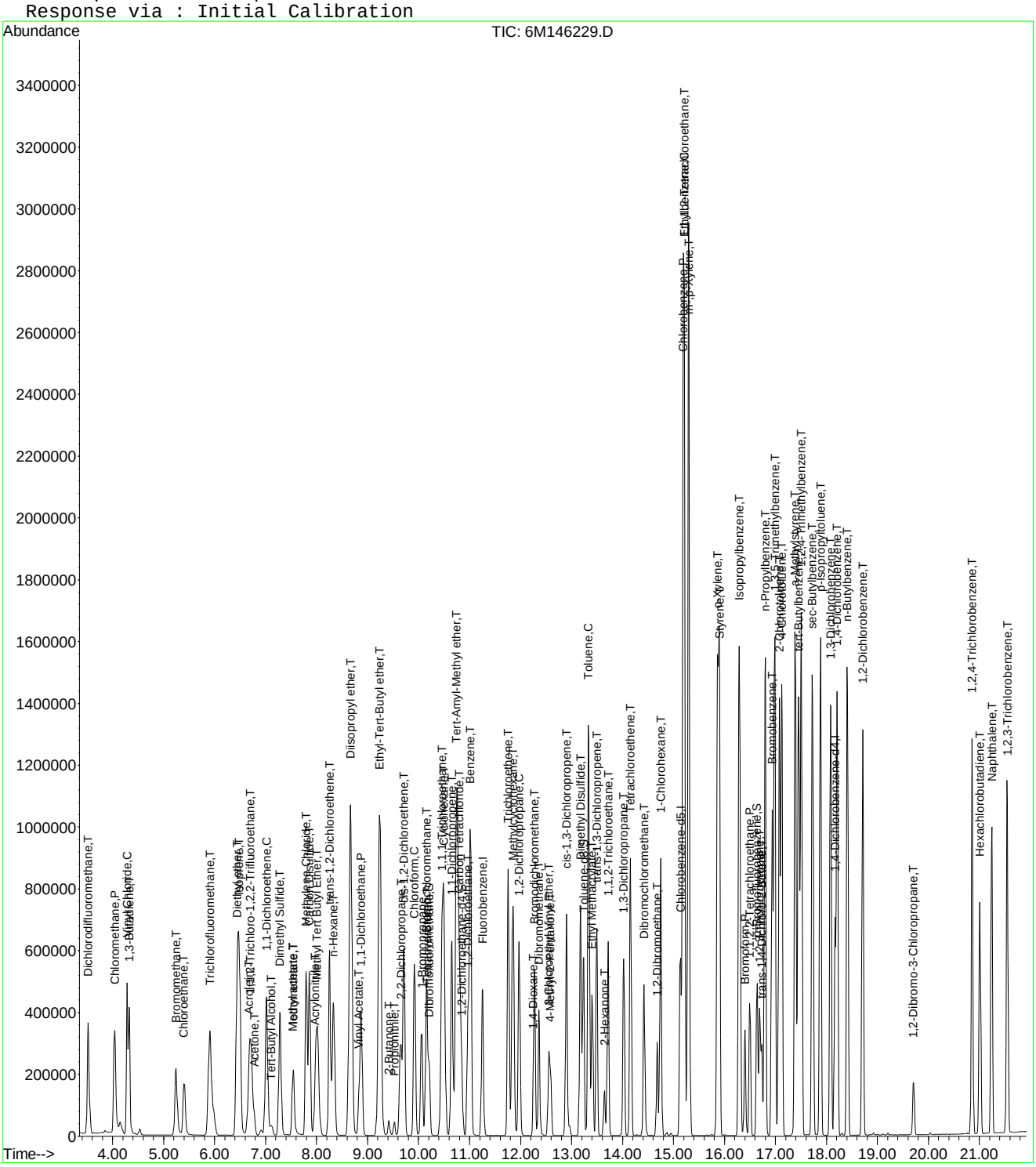
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	412436	49.7821	ug/L		89
46)	Benzene	11.01	78	1319158	47.9357	ug/L		87
47)	Trichloroethene	11.76	130	387869	51.7807	ug/L		87
48)	Methylcyclohexane	11.85	83	542828	50.1582	ug/L		81
49)	1,2-Dichloropropane	11.97	63	328985	50.6551	ug/L		93
50)	1,4-Dioxane	12.25	88	9841	208.3929	ug/L		83
51)	Bromodichloromethane	12.27	83	474501	51.7551	ug/L		99
52)	Dibromomethane	12.36	93	196449	51.3585	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	136743	53.6772	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	82093	49.1253	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	524104	51.9110	ug/L		95
56)	Dimethyl Disulfide	13.18	79	317578	49.8595	ug/L		90
59)	Toluene	13.33	91	1390320	49.1555	ug/L		99
60)	Ethyl Methacrylate	13.40	69	348973	50.9857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	449513	51.5430	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	269281	50.5203	ug/L		99
64)	2-Hexanone	13.65	43	126266	49.3321	ug/L		84
65)	1,3-Dichloropropane	14.02	76	449481	50.2374	ug/L		71
66)	Tetrachloroethene	14.16	166	348547	50.8542	ug/L		96
67)	Dibromochloromethane	14.42	129	344760	52.3235	ug/L		100
68)	1,2-Dibromoethane	14.68	107	258841	50.5741	ug/L		99
69)	1-Chlorohexane	14.75	91	464382	50.8434	ug/L		76
70)	Chlorobenzene	15.19	112	963037	49.7477	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	362017	52.2198	ug/L		100
72)	Ethylbenzene	15.21	106	525624	50.1565	ug/L		94
73)	m-,p-Xylene	15.30	106	1260386	100.6206	ug/L		93
74)	o-Xylene	15.86	106	613404	50.7466	ug/L		93
75)	Styrene	15.90	104	1057078	52.0932	ug/L		95
76)	Bromoform	16.40	173	214895	53.5191	ug/L		100
77)	Isopropylbenzene	16.29	105	1536873	50.8076	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	296759	46.5163	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	93220	49.4809	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	69453	51.2682	ug/L	#	1
83)	n-Propylbenzene	16.80	91	1831263	49.3764	ug/L		99
84)	Bromobenzene	16.93	156	411541	49.3938	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	1296579	49.3302	ug/L		99
86)	2-Chlorotoluene	17.08	91	1170064	47.3812	ug/L		97
87)	4-Chlorotoluene	17.12	91	1072560	49.1422	ug/L		95
88)	a-Methylstyrene	17.38	118	716903	49.3235	ug/L		100
89)	tert-Butylbenzene	17.46	134	276611	50.2256	ug/L		89
90)	1,2,4-Trimethylbenzene	17.51	105	1344827	49.8208	ug/L		86
91)	sec-Butylbenzene	17.72	105	1604756	49.5099	ug/L		98
92)	p-Isopropyltoluene	17.88	119	1361479	49.9346	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	771343	49.0216	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	773205	48.5928	ug/L		98
95)	n-Butylbenzene	18.41	91	1242193	49.8932	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	721223	48.9013	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	58274	50.4290	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	530769	49.1854	ug/L		99
99)	Hexachlorobutadiene	21.01	225	200495	48.6445	ug/L		100
100)	Naphthalene	21.24	128	1087303	50.3204	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	486226	46.6732	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	664065	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	468638	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	250611	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	341745	50.4124 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 201.64%#		
43) 1,2-Dichloroethane-d4	10.85	65	335061	50.1496 ug/L	0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 200.60%#		
58) Toluene-d8	13.23	98	1165336	48.7313 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 194.92%#		
80) p-Bromofluorobenzene	16.64	95	452319	47.5209 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 190.08%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	1092279	103.5976 ug/L	93
3) Chloromethane	4.04	50	1229045	100.8473 ug/L	98
4) Vinyl Chloride	4.27	62	967994	80.3511 ug/L	98
5) 1,3-Butadiene	4.32	54	358708	83.9572 ug/L	89
6) Bromomethane	5.23	94	557041	107.0928 ug/L	99
7) Chloroethane	5.40	64	501046	96.6647 ug/L	86
8) Trichlorofluoromethane	5.90	101	1280944	103.7431 ug/L	99
9) Diethyl ether	6.44	59	1046407	203.3587 ug/L	80
10) Isoprene	6.48	67	1028447	101.2660 ug/L	80
11) Acrolein	6.67	56	60742	107.7484 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	703798	100.6949 ug/L	99
13) Acetone	6.78	43	140983	98.3836 ug/L	90
14) 1,1-Dichloroethene	7.01	61	1000191	98.7943 ug/L	81
15) Tert-Butyl Alcohol	7.11	59	188168	423.3346 ug/L	91
16) Dimethyl Sulfide	7.28	62	716529	99.0473 ug/L	78
17) Iodomethane	7.54	142	665529	111.6922 ug/L	98
18) Methyl acetate	7.53	43	370733	103.1554 ug/L #	80
19) Methylene Chloride	7.80	84	728236	95.1448 ug/L	58
20) Carbon Disulfide	7.86	76	2173570	99.7583 ug/L	99
21) Acrylonitrile	7.97	53	179187	107.9098 ug/L	100
22) Methyl Tert Butyl Ether	8.01	73	1646227	98.0813 ug/L	91
23) trans-1,2-Dichloroethene	8.25	96	720013	98.8182 ug/L	75
24) n-Hexane	8.33	57	825655	100.2073 ug/L	84
25) Diisopropyl ether	8.66	45	3713047	197.9529 ug/L #	89
26) Vinyl Acetate	8.83	43	615132	118.1426 ug/L #	85
27) 1,1-Dichloroethane	8.87	63	1179111	97.6929 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	3847795	202.4591 ug/L	90
29) 2-Butanone	9.41	43	187675	103.9136 ug/L #	77
30) Propionitrile	9.52	54	123101	208.9977 ug/L	100
31) 2,2-Dichloropropane	9.64	77	930942	101.3837 ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	791312	98.7853 ug/L	87
33) Chloroform	9.92	83	1229915	89.4500 ug/L	95
34) 1-Bromopropane	10.06	122	153107	107.7815 ug/L	99
35) Bromochloromethane	10.16	130	453837	107.6278 ug/L	99
36) Tetrahydrofuran	10.18	42	239360	201.2527 ug/L #	68
38) 1,1,1-Trichloroethane	10.45	97	1128754	100.9745 ug/L	90
39) Cyclohexane	10.49	56	1047823	101.3662 ug/L	76
40) 1,1-Dichloropropene	10.65	75	936238	99.0778 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	3710771	205.6403 ug/L	92
42) Carbon Tetrachloride	10.80	117	1002331	113.7160 ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

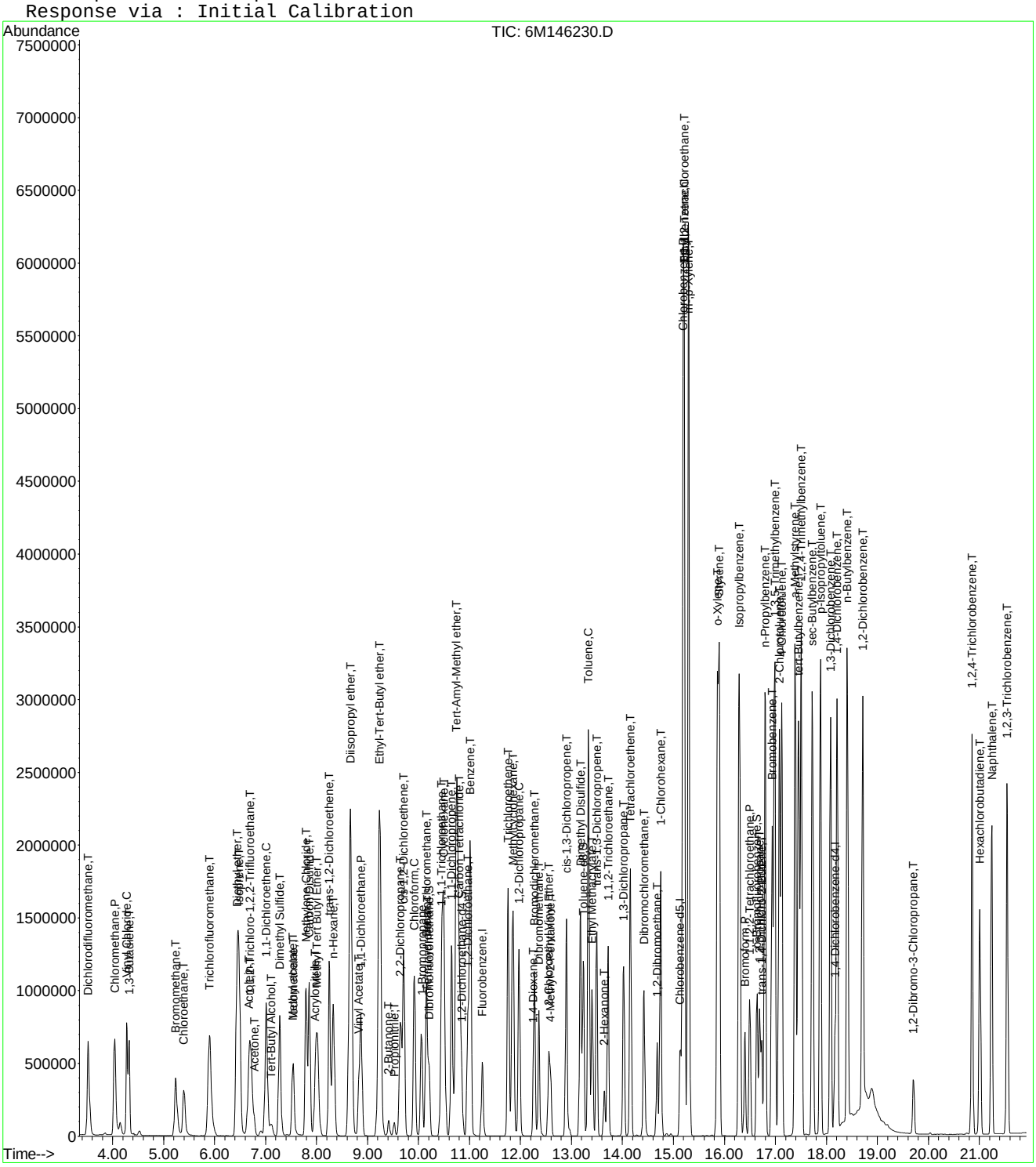
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	848725	99.2223	ug/L		88
46)	Benzene	11.01	78	2675533	94.1668	ug/L		87
47)	Trichloroethene	11.76	130	775075	100.2194	ug/L		86
48)	Methylcyclohexane	11.85	83	1124227	100.6142	ug/L		81
49)	1,2-Dichloropropane	11.97	63	661802	98.6962	ug/L		92
50)	1,4-Dioxane	12.25	88	21047	431.6772	ug/L		82
51)	Bromodichloromethane	12.27	83	965686	102.0182	ug/L		100
52)	Dibromomethane	12.36	93	405664	102.7198	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.56	63	290699	110.5233	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	180197	104.4413	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	1085875	104.1711	ug/L		95
56)	Dimethyl Disulfide	13.18	79	668834	101.7047	ug/L		90
59)	Toluene	13.33	91	2831304	96.6334	ug/L		99
60)	Ethyl Methacrylate	13.40	69	750754	105.8857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	942608	104.3378	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	558224	101.1002	ug/L		99
64)	2-Hexanone	13.64	43	274093	103.3770	ug/L		83
65)	1,3-Dichloropropane	14.03	76	927364	100.0574	ug/L		71
66)	Tetrachloroethene	14.16	166	715953	100.8400	ug/L		95
67)	Dibromochloromethane	14.42	129	727778	106.6258	ug/L		100
68)	1,2-Dibromoethane	14.68	107	543243	102.4642	ug/L		99
69)	1-Chlorohexane	14.75	91	954085	100.8392	ug/L		75
70)	Chlorobenzene	15.19	112	2008196	100.1428	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	774570	107.8575	ug/L		100
72)	Ethylbenzene	15.21	106	1116135	102.8139	ug/L		91
73)	m-,p-Xylene	15.29	106	2626638	202.4261	ug/L		89
74)	o-Xylene	15.86	106	1232018	98.3922	ug/L		94
75)	Styrene	15.89	104	2150597	102.3095	ug/L		96
76)	Bromoform	16.40	173	448000	107.7070	ug/L		99
77)	Isopropylbenzene	16.29	105	3046400	97.2211	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	638495	97.8234	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	193544	100.4136	ug/L	#	54
82)	trans-1,4-Dichloro-2-Buten	16.73	53	151702	109.4542	ug/L	#	1
83)	n-Propylbenzene	16.79	91	3593480	94.7040	ug/L		98
84)	Bromobenzene	16.94	156	823903	96.6540	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	2597441	96.5926	ug/L		99
86)	2-Chlorotoluene	17.08	91	2351484	93.0729	ug/L		97
87)	4-Chlorotoluene	17.12	91	2098144	93.9621	ug/L		95
88)	a-Methylstyrene	17.39	118	1476708	99.3054	ug/L		99
89)	tert-Butylbenzene	17.46	134	556423	98.7517	ug/L		90
90)	1,2,4-Trimethylbenzene	17.51	105	2720771	98.5191	ug/L		86
91)	sec-Butylbenzene	17.72	105	3204852	96.6442	ug/L		99
92)	p-Isopropyltoluene	17.89	119	2766683	99.1824	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	1563276	97.1091	ug/L		98
94)	1,4-Dichlorobenzene	18.21	146	1568190	96.3298	ug/L		98
95)	n-Butylbenzene	18.41	91	2566638	100.7630	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	1480882	98.1422	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	128198	108.4355	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	1094628	99.1474	ug/L		100
99)	Hexachlorobutadiene	21.01	225	409810	97.1846	ug/L		99
100)	Naphthalene	21.25	128	2294953	103.8129	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	1006776	94.4596	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146230.D 8260BWT.M Thu Apr 06 14:58:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	690233	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	498674	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	255138	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	723475	102.6772	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 410.72%#				
43) 1,2-Dichloroethane-d4	10.85	65	702452	101.1521	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 404.60%#				
58) Toluene-d8	13.24	98	2516915	98.9113	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 395.64%#				
80) p-Bromofluorobenzene	16.64	95	966850	99.7755	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 399.12%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	2275311	207.6213	ug/L		93
3) Chloromethane	4.04	50	2474245	196.0665	ug/L		98
4) Vinyl Chloride	4.27	62	2319895	185.2689	ug/L		98
5) 1,3-Butadiene	4.31	54	816680	218.8754	ug/L		89
6) Bromomethane	5.23	94	1250039	231.2125	ug/L		99
7) Chloroethane	5.40	64	1064300	197.5465	ug/L		86
8) Trichlorofluoromethane	5.90	101	2718616	211.8320	ug/L		99
9) Diethyl ether	6.44	59	4640	0.8676	ug/L	#	53
10) Isoprene	6.48	67	2127378	201.5306	ug/L		80
11) Acrolein	6.67	56	9706	16.5644	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	1494747	205.7510	ug/L		99
13) Acetone	6.77	43	308579	207.1749	ug/L		90
14) 1,1-Dichloroethene	7.01	61	2162367	205.4912	ug/L		81
15) Tert-Butyl Alcohol	7.12	59	25996	56.2677	ug/L		92
16) Dimethyl Sulfide	7.27	62	1547256	205.7718	ug/L		78
17) Iodomethane	7.54	142	1235435	198.8594	ug/L		98
18) Methyl acetate	7.53	43	780560	208.9546	ug/L	#	80
19) Methylene Chloride	7.80	84	1587097	199.4946	ug/L		58
20) Carbon Disulfide	7.86	76	4648119	205.2426	ug/L		98
21) Acrylonitrile	8.01	53	30991	17.9558	ug/L	#	37
22) Methyl Tert Butyl Ether	8.01	73	3211564	184.0891	ug/L		91
23) trans-1,2-Dichloroethene	8.24	96	1562245	206.2818	ug/L		75
24) n-Hexane	8.33	57	1747043	203.9948	ug/L		84
25) Diisopropyl ether	8.66	45	2991	0.1534	ug/L	#	78
26) Vinyl Acetate	8.83	43	1230567	227.3831	ug/L	#	84
27) 1,1-Dichloroethane	8.87	63	2550945	203.3406	ug/L		98
28) Ethyl-Tert-Butyl ether	9.24	59	7221	0.3655	ug/L		93
29) 2-Butanone	9.42	43	378724	201.7454	ug/L	#	77
30) Propionitrile	9.52	54	2541	4.1505	ug/L	#	56
31) 2,2-Dichloropropane	9.64	77	1886252	197.6333	ug/L		77
32) cis-1,2-Dichloroethene	9.72	96	1724251	207.0903	ug/L		86
33) Chloroform	9.92	83	2655020	185.7753	ug/L		95
34) 1-Bromopropane	10.06	122	290747	196.9152	ug/L		99
35) Bromochloromethane	10.15	130	939086	214.2618	ug/L		100
36) Tetrahydrofuran	10.18	42	5089	4.1166	ug/L		86
38) 1,1,1-Trichloroethane	10.46	97	2469058	212.4998	ug/L		89
39) Cyclohexane	10.49	56	2270992	211.3662	ug/L	#	75
40) 1,1-Dichloropropene	10.64	75	2000053	203.6322	ug/L		80
41) Tert-Amyl-Methyl ether	10.75	73	11602	0.6186	ug/L		88
42) Carbon Tetrachloride	10.80	117	1931578	210.8325	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146231.D 8260BWT.M Thu Apr 06 14:58:18 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

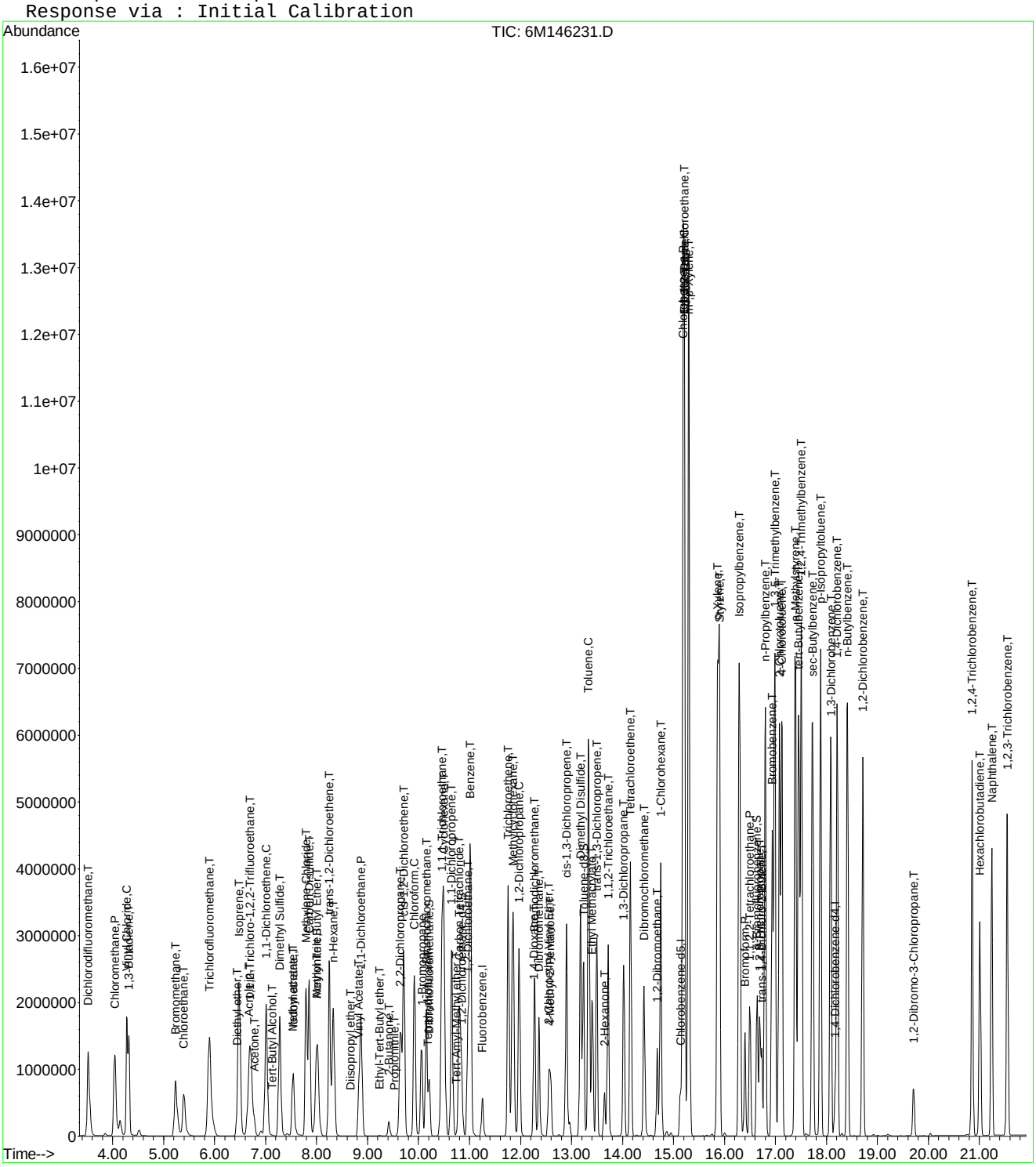
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	1796420	202.0529	ug/L		88
46)	Benzene	11.01	78	5629098	190.6080	ug/L		88
47)	Trichloroethene	11.76	130	1658935	206.3727	ug/L		87
48)	Methylcyclohexane	11.85	83	2386424	205.4792	ug/L		81
49)	1,2-Dichloropropane	11.97	63	1424092	204.3268	ug/L		91
50)	1,4-Dioxane	12.26	88	5637	111.2325	ug/L	#	42
51)	Bromodichloromethane	12.27	83	2075418	210.9415	ug/L		100
52)	Dibromomethane	12.36	93	844625	205.7626	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	484387	177.1812	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	361541	201.6031	ug/L		79
55)	cis-1,3-Dichloropropene	12.90	75	2281875	210.6076	ug/L		95
56)	Dimethyl Disulfide	13.18	79	1458790	213.4177	ug/L		90
59)	Toluene	13.33	91	5996618	192.3392	ug/L		96
60)	Ethyl Methacrylate	13.40	69	1573548	208.5646	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	1986746	206.6682	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	1198048	203.9100	ug/L		99
64)	2-Hexanone	13.65	43	554015	196.3669	ug/L		83
65)	1,3-Dichloropropane	14.02	76	1969579	199.7070	ug/L		71
66)	Tetrachloroethene	14.16	166	1553218	205.5897	ug/L		94
67)	Dibromochloromethane	14.42	129	1570999	216.3018	ug/L		99
68)	1,2-Dibromoethane	14.68	107	1128869	200.0979	ug/L		100
69)	1-Chlorohexane	14.75	91	2077549	206.3548	ug/L		76
70)	Chlorobenzene	15.19	112	4552595	213.3503	ug/L		97
71)	1,1,1,2-Tetrachloroethane	15.21	131	1778263	232.7054	ug/L		99
72)	Ethylbenzene	15.21	106	2629830	227.6583	ug/L		78
73)	m-,p-Xylene	15.30	106	5831651	422.3560	ug/L		72
74)	o-Xylene	15.86	106	2806681	210.6481	ug/L		89
75)	Styrene	15.90	104	4761074	212.8544	ug/L		99
76)	Bromoform	16.40	173	946995	213.9608	ug/L		98
77)	Isopropylbenzene	16.29	105	6429037	192.8147	ug/L		96
79)	1,1,2,2-Tetrachloroethane	16.50	83	1322669	199.0497	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	401464	204.5900	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	305769	216.7003	ug/L	#	1
83)	n-Propylbenzene	16.80	91	7135293	184.7099	ug/L		94
84)	Bromobenzene	16.93	156	1779598	205.0645	ug/L		84
85)	1,3,5-Trimethylbenzene	16.99	105	5473541	199.9363	ug/L		97
86)	2-Chlorotoluene	17.08	91	4805990	186.8483	ug/L		96
87)	4-Chlorotoluene	17.12	91	4663827	205.1564	ug/L		94
88)	a-Methylstyrene	17.39	118	3146362	207.8317	ug/L		99
89)	tert-Butylbenzene	17.46	134	1201485	209.4513	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	5700578	202.7553	ug/L		82
91)	sec-Butylbenzene	17.73	105	6486144	192.1230	ug/L		99
92)	p-Isopropyltoluene	17.88	119	5687835	200.2844	ug/L		98
93)	1,3-Dichlorobenzene	18.09	146	3282192	200.2687	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	3295686	198.8532	ug/L		96
95)	n-Butylbenzene	18.42	91	5169144	199.3335	ug/L		98
96)	1,2-Dichlorobenzene	18.71	146	3028833	197.1676	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.71	75	238291	197.9807	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	2255491	200.6692	ug/L		99
99)	Hexachlorobutadiene	21.01	225	836245	194.7931	ug/L		99
100)	Naphthalene	21.24	128	4440092	197.2852	ug/L		98
101)	1,2,3-Trichlorobenzene	21.55	180	2031369	187.2092	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146231.D 8260BWT.M Thu Apr 06 14:58:19 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	670280	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	474156	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	251420	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	1065288	155.6886 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 622.76%#		
43) 1,2-Dichloroethane-d4	10.84	65	1022057	151.5559 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 606.24%#		
58) Toluene-d8	13.23	98	3651048	150.9004 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 603.60%#		
80) p-Bromofluorobenzene	16.64	95	1466208	153.5450 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 614.20%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	3198	0.3005 ug/L #	64
3) Chloromethane	4.02	50	124029	9.3687 ug/L	97
4) Vinyl Chloride	4.27	62	2879	0.2368 ug/L	96
5) 1,3-Butadiene	4.31	54	952750	291.3161 ug/L	90
6) Bromomethane	5.21	94	256997	48.9503 ug/L	98
8) Trichlorofluoromethane	5.89	101	1832	0.1470 ug/L #	92
9) Diethyl ether	6.44	59	1626336	313.1315 ug/L	80
10) Isoprene	6.47	67	3326056	324.4632 ug/L	81
11) Acrolein	6.67	56	83031	145.9205 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1896	0.2688 ug/L #	63
13) Acetone	6.78	43	359192	248.3344 ug/L	88
14) 1,1-Dichloroethene	7.01	61	2982	0.2918 ug/L	94
15) Tert-Butyl Alcohol	7.12	59	274170	611.1000 ug/L	90
16) Dimethyl Sulfide	7.28	62	2259113	309.3863 ug/L	78
17) Iodomethane	7.53	142	1774336	293.7287 ug/L	98
18) Methyl acetate	7.53	43	1146284	315.9929 ug/L #	79
19) Methylene Chloride	7.79	84	3453	0.4470 ug/L	74
20) Carbon Disulfide	7.85	76	6560949	298.3296 ug/L	98
21) Acrylonitrile	7.97	53	242452	144.6554 ug/L	93
22) Methyl Tert Butyl Ether	8.02	73	17659	1.0424 ug/L #	49
23) trans-1,2-Dichloroethene	8.25	96	3508	0.4770 ug/L	84
24) n-Hexane	8.33	57	2563085	308.1896 ug/L	84
25) Diisopropyl ether	8.66	45	5624093	297.0560 ug/L #	88
26) Vinyl Acetate	8.83	43	1560345	296.9020 ug/L #	86
27) 1,1-Dichloroethane	8.87	63	1658	0.1361 ug/L #	43
28) Ethyl-Tert-Butyl ether	9.24	59	5792489	301.9568 ug/L	90
29) 2-Butanone	9.41	43	537846	295.0381 ug/L #	77
30) Propionitrile	9.52	54	181548	305.3695 ug/L	99
32) cis-1,2-Dichloroethene	9.71	96	2592	0.3206 ug/L	71
33) Chloroform	9.91	83	3316	0.2389 ug/L #	81
34) 1-Bromopropane	10.05	122	479000	334.0712 ug/L	100
35) Bromochloromethane	10.16	130	2635	0.6191 ug/L	93
36) Tetrahydrofuran	10.18	42	348793	290.5441 ug/L #	69
39) Cyclohexane	10.49	56	3263442	312.7774 ug/L	77
40) 1,1-Dichloropropene	10.65	75	3347	0.3509 ug/L #	34
41) Tert-Amyl-Methyl ether	10.75	73	5509448	302.4868 ug/L	92
45) 1,2-Dichloroethane	10.96	62	6370	0.7378 ug/L #	78
46) Benzene	11.01	78	5876	0.2049 ug/L #	70
47) Trichloroethene	11.75	130	2541	0.3255 ug/L	78
48) Methylcyclohexane	11.85	83	3537517	313.6594 ug/L	81

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

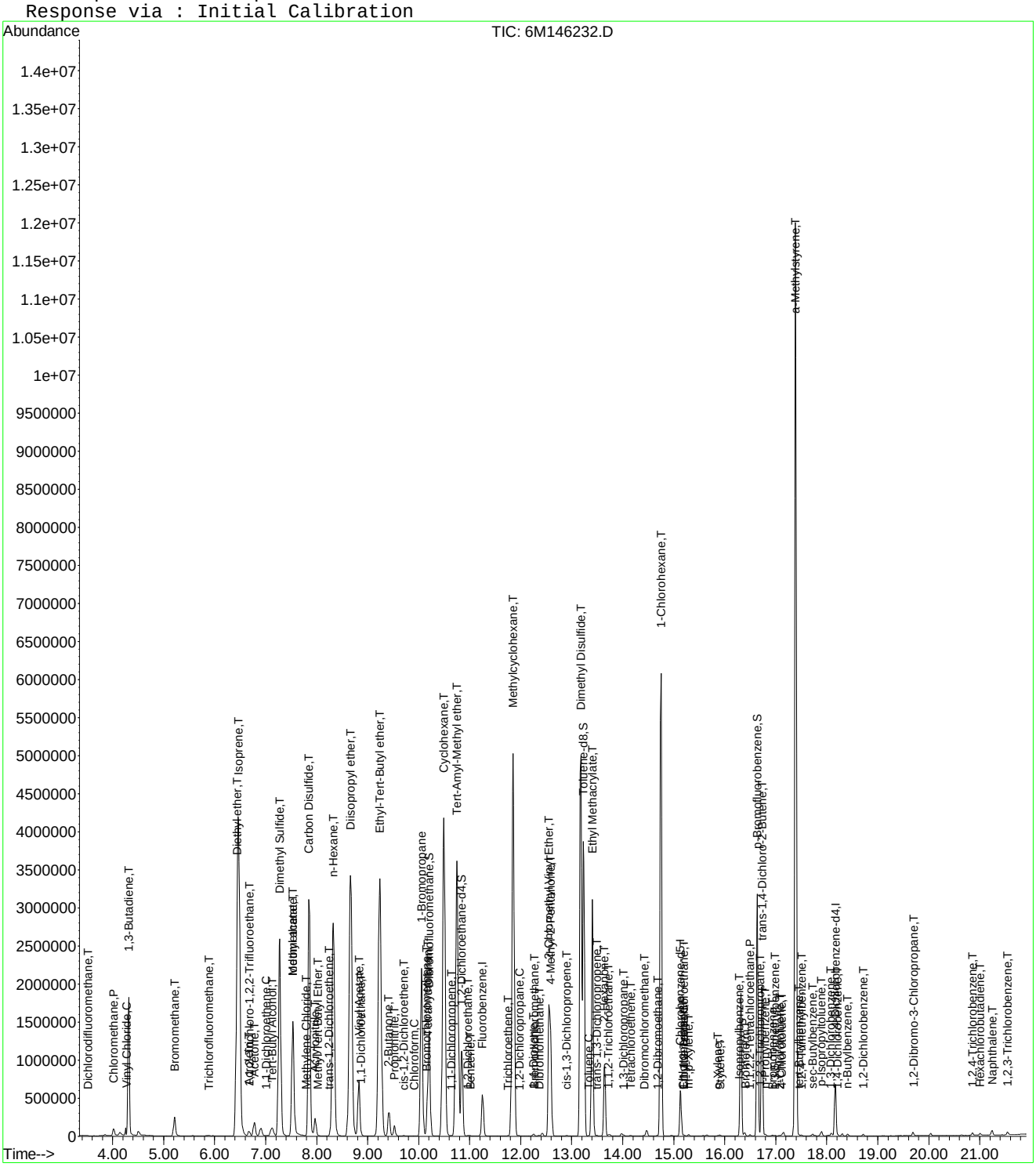
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
49)	1,2-Dichloropropane	11.97	63	846	0.1250	ug/L	#	35
50)	1,4-Dioxane	12.25	88	29442	598.2608	ug/L		83
51)	Bromodichloromethane	12.27	83	2460	0.2575	ug/L		95
52)	Dibromomethane	12.36	93	4528	1.1359	ug/L		94
53)	2-Chloroethyl Vinyl Ether	12.56	63	864405	325.5982	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	524164	300.9860	ug/L		80
55)	cis-1,3-Dichloropropene	12.90	75	4329	0.4114	ug/L		88
56)	Dimethyl Disulfide	13.18	79	2174908	327.6559	ug/L		91
59)	Toluene	13.33	91	8304	0.2801	ug/L		97
60)	Ethyl Methacrylate	13.40	69	2284715	318.4843	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	8074	0.8833	ug/L		92
63)	1,1,2-Trichloroethane	13.72	97	5984	1.0712	ug/L		96
64)	2-Hexanone	13.64	43	803768	299.6215	ug/L		83
65)	1,3-Dichloropropane	14.02	76	10167	1.0842	ug/L		86
66)	Tetrachloroethene	14.16	166	2501	0.3482	ug/L		97
67)	Dibromochloromethane	14.42	129	5257	0.7612	ug/L		98
68)	1,2-Dibromoethane	14.68	107	7804	1.4548	ug/L		95
69)	1-Chlorohexane	14.75	91	3093710	323.1754	ug/L		77
70)	Chlorobenzene	15.18	112	6402	0.3155	ug/L		89
71)	1,1,1,2-Tetrachloroethane	15.20	131	1051	0.1446	ug/L	#	24
72)	Ethylbenzene	15.20	106	2758	0.2511	ug/L		82
73)	m-,p-Xylene	15.29	106	7899	0.6017	ug/L		94
74)	o-Xylene	15.86	106	2490	0.1965	ug/L		71
75)	Styrene	15.90	104	7614	0.3580	ug/L		91
76)	Bromoform	16.41	173	6944	1.6500	ug/L		95
77)	Isopropylbenzene	16.28	105	23768	0.7497	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	12720	1.9426	ug/L		97
81)	1,2,3-Trichloropropane	16.69	110	5207	2.6928	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.73	53	468972	337.2782	ug/L	#	50
83)	n-Propylbenzene	16.79	91	25834	0.6786	ug/L		98
84)	Bromobenzene	16.94	156	4350	0.5087	ug/L		80
85)	1,3,5-Trimethylbenzene	16.99	105	9549	0.3540	ug/L		94
86)	2-Chlorotoluene	17.08	91	10250	0.4044	ug/L		85
87)	4-Chlorotoluene	17.12	91	10678	0.4767	ug/L		93
88)	a-Methylstyrene	17.39	118	4860473	325.8044	ug/L		98
89)	tert-Butylbenzene	17.46	134	3329	0.5889	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.51	105	10602	0.3827	ug/L		84
91)	sec-Butylbenzene	17.72	105	27629	0.8305	ug/L		96
92)	p-Isopropyltoluene	17.89	119	16184	0.5783	ug/L		93
93)	1,3-Dichlorobenzene	18.08	146	10117	0.6264	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	11412	0.6988	ug/L		90
95)	n-Butylbenzene	18.41	91	21424	0.8384	ug/L		95
96)	1,2-Dichlorobenzene	18.71	146	10357	0.6842	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	4375	3.6887	ug/L		97
98)	1,2,4-Trichlorobenzene	20.86	180	14842	1.3400	ug/L		97
99)	Hexachlorobutadiene	21.01	225	8098	1.9142	ug/L		93
100)	Naphthalene	21.25	128	71843	3.2394	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	18787	1.7570	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:23 2017 Page 2

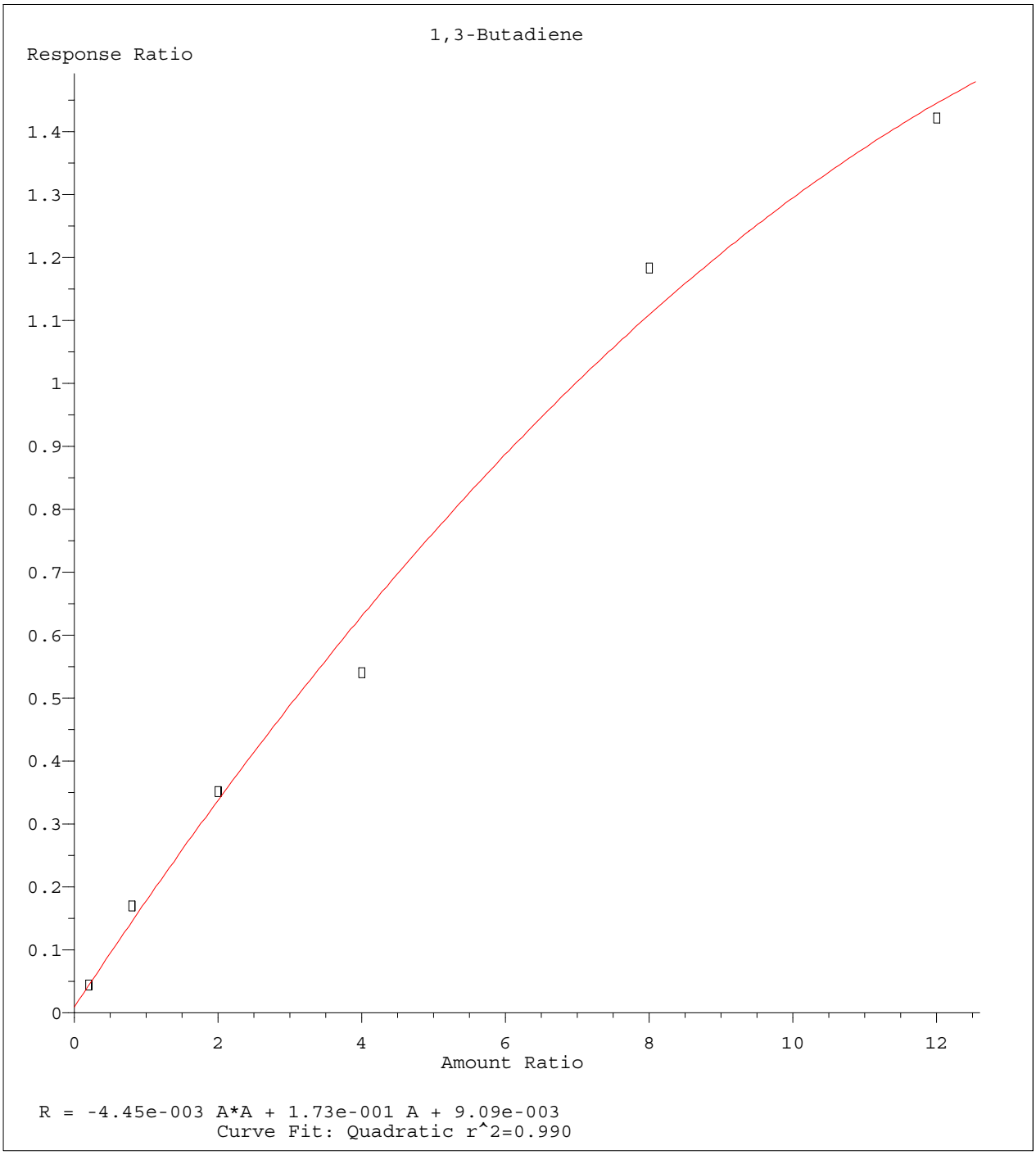
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

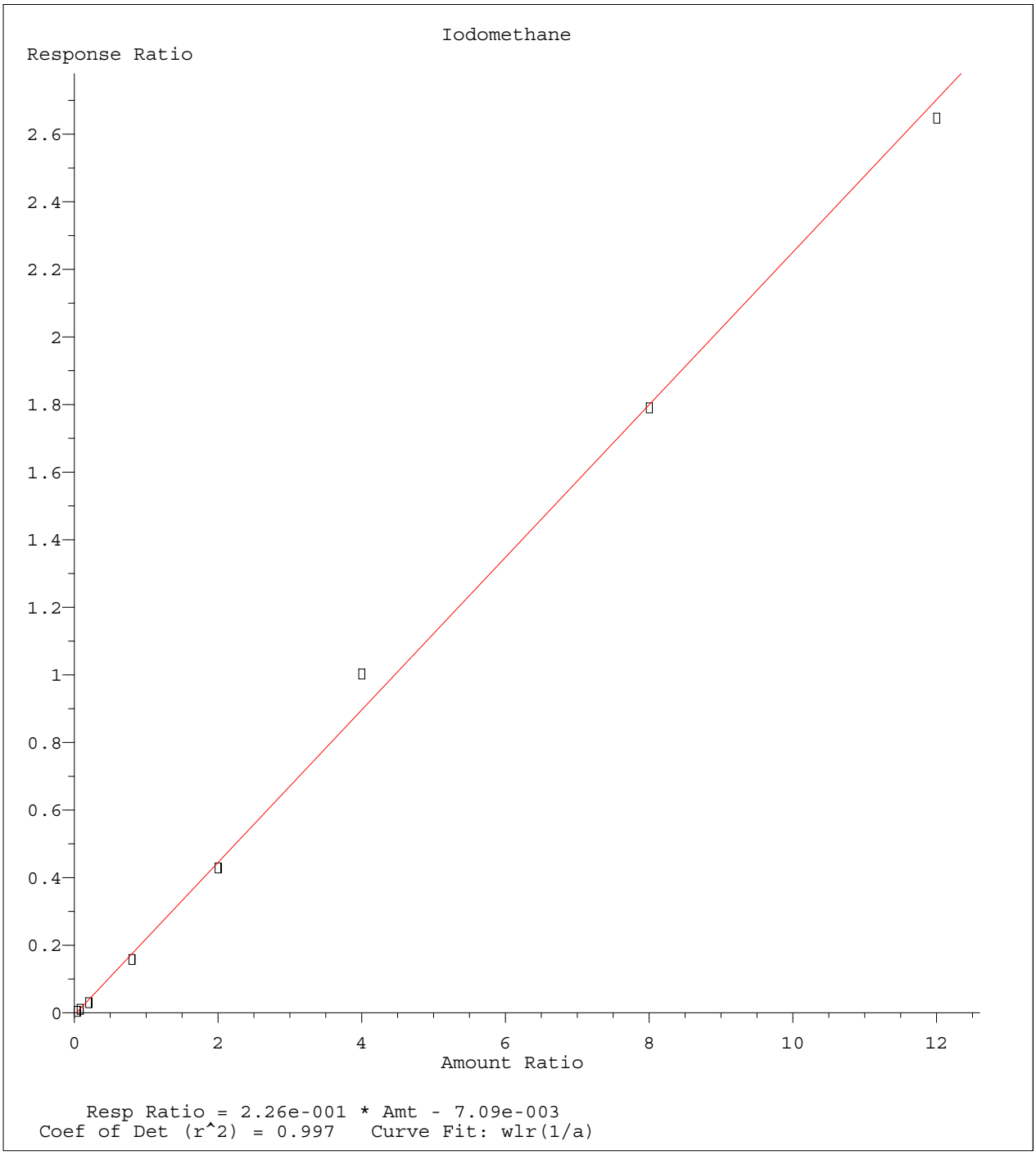
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



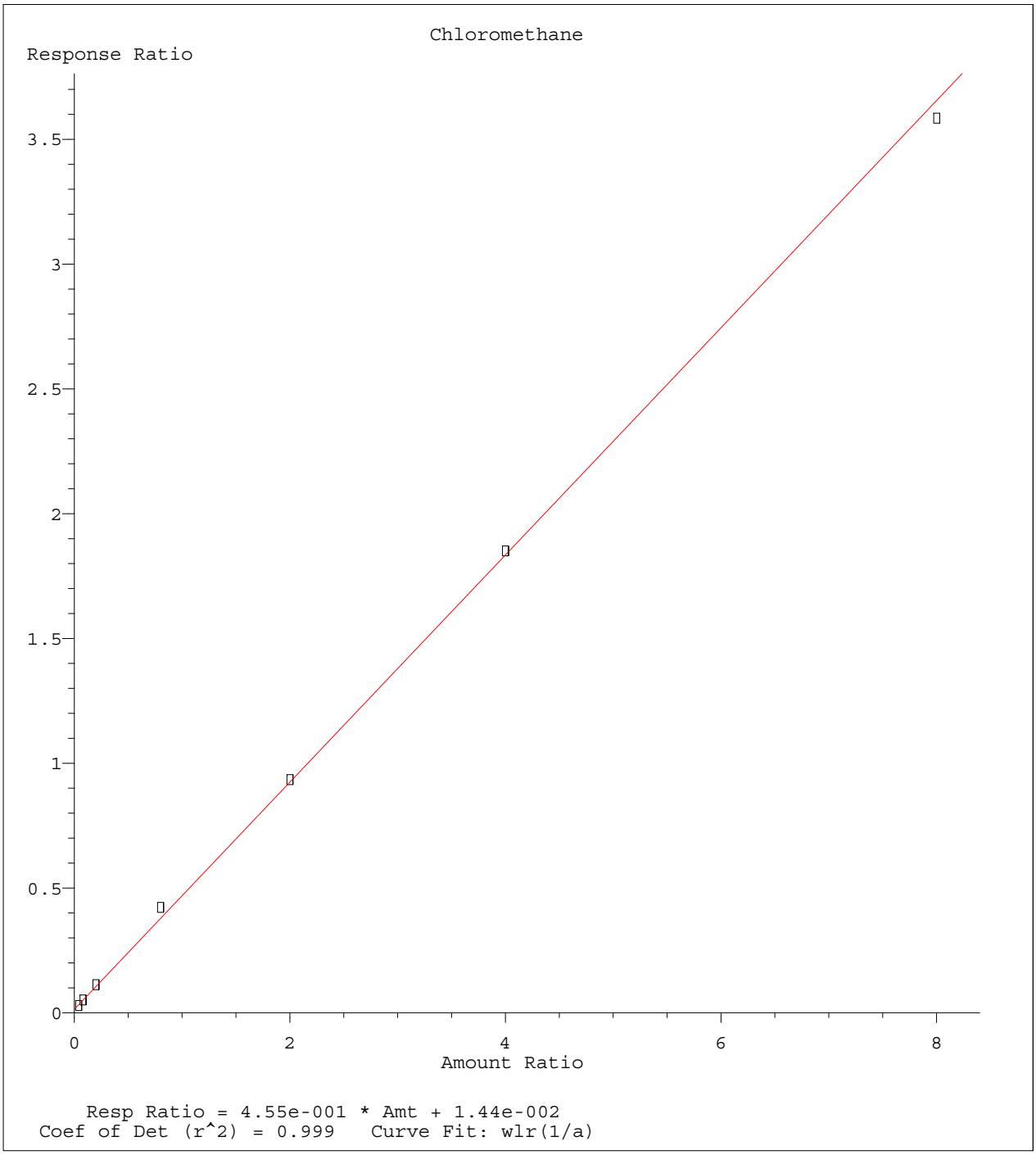
6M146232.D 8260BWT.M Thu Apr 06 14:58:23 2017 Page 3



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.26	96	670831	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	482468	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	257501	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	178273	26.0327	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.12%				
43) 1,2-Dichloroethane-d4	10.85	65	171804	25.4551	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.84%				
58) Toluene-d8	13.24	98	618189	25.1100	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.44%				
80) p-Bromofluorobenzene	16.64	95	243106	24.8575	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.44%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	261278	24.5311	ug/L		94
3) Chloromethane	4.04	50	284057	22.4610	ug/L		99
4) Vinyl Chloride	4.27	62	267730	21.9996	ug/L		98
5) 1,3-Butadiene	4.31	54	117985	24.7175	ug/L		89
6) Bromomethane	5.23	94	93039	17.7066	ug/L		98
7) Chloroethane	5.40	64	119687	22.8578	ug/L		85
8) Trichlorofluoromethane	5.90	101	262422	21.0391	ug/L		99
9) Diethyl ether	6.44	59	528084	101.5927	ug/L		82
10) Isoprene	6.48	67	201796	19.6694	ug/L		81
11) Acrolein	6.67	56	92591	162.5878	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	153538	21.7457	ug/L		98
13) Acetone	6.77	43	27527	19.0157	ug/L		88
14) 1,1-Dichloroethene	7.01	61	204274	19.9737	ug/L		84
15) Tert-Butyl Alcohol	7.12	59	102016	227.1976	ug/L		91
16) Dimethyl Sulfide	7.27	62	152875	20.9191	ug/L		78
17) Iodomethane	7.54	142	153036	26.0301	ug/L		99
18) Methyl acetate	7.53	43	73917	20.3598	ug/L	#	82
19) Methylene Chloride	7.80	84	150043	19.4056	ug/L		61
20) Carbon Disulfide	7.86	76	355422	16.1479	ug/L		99
21) Acrylonitrile	7.97	53	36232	21.5995	ug/L		100
22) Methyl Tert Butyl Ether	8.01	73	352993	20.8190	ug/L		92
23) trans-1,2-Dichloroethene	8.25	96	144008	19.5650	ug/L		78
24) n-Hexane	8.33	57	166297	19.9794	ug/L		85
25) Diisopropyl ether	8.66	45	1988872	104.9629	ug/L	#	90
26) Vinyl Acetate	8.83	43	160945	30.5994	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	240190	19.6997	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1886475	98.2593	ug/L		90
29) 2-Butanone	9.42	43	36957	20.2563	ug/L	#	79
30) Propionitrile	9.52	54	63234	106.2742	ug/L		100
31) 2,2-Dichloropropane	9.65	77	204249	22.0193	ug/L		80
32) cis-1,2-Dichloroethene	9.72	96	157553	19.4701	ug/L		90
33) Chloroform	9.92	83	257055	18.5067	ug/L		94
34) 1-Bromopropane	10.06	122	38246	26.6522	ug/L		98
35) Bromochloromethane	10.15	130	91199	21.4098	ug/L		99
36) Tetrahydrofuran	10.17	42	123208	102.5478	ug/L	#	71
38) 1,1,1-Trichloroethane	10.46	97	227236	20.1227	ug/L		91
39) Cyclohexane	10.49	56	186905	17.8988	ug/L		77
40) 1,1-Dichloropropene	10.65	75	187277	19.6188	ug/L		83
41) Tert-Amyl-Methyl ether	10.75	73	1887460	103.5427	ug/L		92
42) Carbon Tetrachloride	10.80	117	183539	20.6128	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:43 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

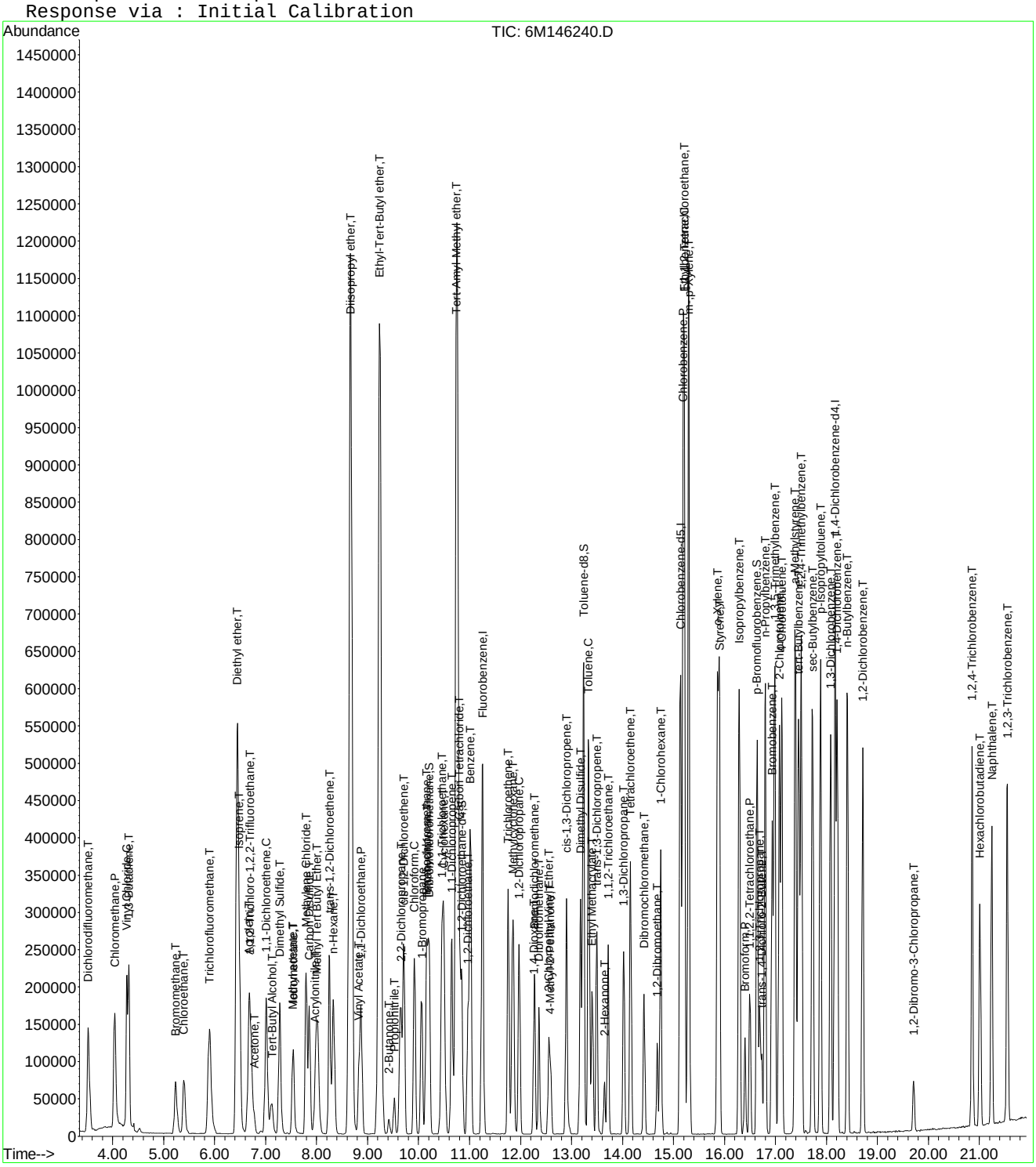
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	168256	19.4720	ug/L		89
46)	Benzene	11.01	78	540364	18.8266	ug/L		86
47)	Trichloroethene	11.76	130	145590	18.6353	ug/L		88
48)	Methylcyclohexane	11.85	83	208804	18.4987	ug/L		82
49)	1,2-Dichloropropane	11.97	63	132922	19.6231	ug/L		94
50)	1,4-Dioxane	12.26	88	10470	212.5754	ug/L		89
51)	Bromodichloromethane	12.27	83	185813	19.4319	ug/L		99
52)	Dibromomethane	12.36	93	81782	20.4995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	67812	25.5220	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	36319	20.8380	ug/L		84
55)	cis-1,3-Dichloropropene	12.90	75	227477	21.6024	ug/L		94
56)	Dimethyl Disulfide	13.18	79	134164	20.1956	ug/L		89
59)	Toluene	13.33	91	559021	18.5327	ug/L		99
60)	Ethyl Methacrylate	13.40	69	152544	20.8980	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	184754	19.8643	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107408	18.8951	ug/L		99
64)	2-Hexanone	13.65	43	58431	21.4061	ug/L		83
65)	1,3-Dichloropropane	14.02	76	192119	20.1344	ug/L		71
66)	Tetrachloroethene	14.16	166	141756	19.3936	ug/L		96
67)	Dibromochloromethane	14.42	129	136028	19.3580	ug/L		98
68)	1,2-Dibromoethane	14.68	107	106469	19.5061	ug/L		100
69)	1-Chlorohexane	14.75	91	199484	20.4795	ug/L		76
70)	Chlorobenzene	15.19	112	378551	18.3361	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	137413	18.5860	ug/L		97
72)	Ethylbenzene	15.21	106	207722	18.5860	ug/L		92
73)	m-,p-Xylene	15.30	106	498999	37.3538	ug/L		92
74)	o-Xylene	15.86	106	243704	18.9049	ug/L		94
75)	Styrene	15.90	104	417768	19.3046	ug/L		96
76)	Bromoform	16.40	173	80208	18.7306	ug/L		98
77)	Isopropylbenzene	16.29	105	603691	18.7136	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	131416	19.5954	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	38665	19.5232	ug/L		71
82)	trans-1,4-Dichloro-2-Buten	16.73	53	25343	17.7959	ug/L	#	1
83)	n-Propylbenzene	16.80	91	714710	18.3318	ug/L		99
84)	Bromobenzene	16.93	156	162348	18.5358	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	512320	18.5422	ug/L		99
86)	2-Chlorotoluene	17.08	91	450684	17.3610	ug/L		97
87)	4-Chlorotoluene	17.12	91	432917	18.8688	ug/L		96
88)	a-Methylstyrene	17.38	118	306134	20.0360	ug/L		98
89)	tert-Butylbenzene	17.46	134	110255	19.0440	ug/L		91
90)	1,2,4-Trimethylbenzene	17.51	105	530643	18.7005	ug/L		86
91)	sec-Butylbenzene	17.73	105	623072	18.2864	ug/L		99
92)	p-Isopropyltoluene	17.88	119	543701	18.9695	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	304800	18.4272	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	308581	18.4481	ug/L		98
95)	n-Butylbenzene	18.41	91	494571	18.8967	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	287359	18.5345	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	23576	19.4080	ug/L		93
98)	1,2,4-Trichlorobenzene	20.86	180	212338	18.7182	ug/L		99
99)	Hexachlorobutadiene	21.01	225	80592	18.6006	ug/L		100
100)	Naphthalene	21.24	128	425467	18.7312	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	199388	18.2068	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:44 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 16:54 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	107	0.00
2	T	Dichlorodifluoromethane	20.0000	24.5311	-22.7#	120	0.00
3	P	Chloromethane	20.0000	22.4610	-12.3	107	0.02
4	C	Vinyl Chloride	20.0000	21.9995	-10.0	115	0.00
5	T	1,3-Butadiene	20.0000	24.7175	-23.6#	111	0.00
6	T	Bromomethane	20.0000	17.7066	11.5	95	0.02
7	T	Chloroethane	20.0000	22.8578	-14.3	115	0.02
8	T	Trichlorofluoromethane	20.0000	21.0391	-5.2	109	0.00
9	T	Diethyl ether	80.0000	101.5927	-27.0#	139	0.00
10	T	Isoprene	20.0000	19.6694	1.7	113	0.00
11	T	Acrolein	40.0000	162.5878	-306.5#	452	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	20.0000	21.7457	-8.7	116	0.00
13	T	Acetone	20.0000	19.0157	4.9	95	0.00
14	C	1,1-Dichloroethene	20.0000	19.9737	0.1	104	0.00
15	T	Tert-Butyl Alcohol	160.0000	227.1976	-42.0#	157	0.00
16	T	Dimethyl Sulfide	20.0000	20.9191	-4.6	117	0.00
17	T	Iodomethane	20.0000	26.0301	-30.2#	155	0.00
18	T	Methyl acetate	20.0000	20.3597	-1.8	118	0.00
19	T	Methylene Chloride	20.0000	19.4056	3.0	105	0.00
20	T	Carbon Disulfide	20.0000	16.1479	19.3	91	0.00
21	T	Acrylonitrile	40.0000	21.5995	46.0#	57	0.00
22	T	Methyl Tert Butyl Ether	20.0000	20.8190	-4.1	107	-0.01
23	T	trans-1,2-Dichloroethene	20.0000	19.5650	2.2	104	0.00
24	T	n-Hexane	20.0000	19.9794	0.1	114	0.00
25	T	Diisopropyl ether	80.0000	104.9629	-31.2#	142	0.00
26	T	Vinyl Acetate	20.0000	30.5994	-53.0#	189	0.00
27	P	1,1-Dichloroethane	20.0000	19.6997	1.5	103	0.00
28	T	Ethyl-Tert-Butyl ether	80.0000	98.2593	-22.8#	133	0.00
29	T	2-Butanone	20.0000	20.2563	-1.3	108	0.00
30	T	Propionitrile	80.0000	106.2742	-32.8#	144	0.00
31	T	2,2-Dichloropropane	20.0000	22.0193	-10.1	137	0.00
32	T	cis-1,2-Dichloroethene	20.0000	19.4701	2.6	104	0.00
33	C	Chloroform	20.0000	18.5067	7.5	106	0.00
34		1-Bromopropane	20.0000	26.6522	-33.3#	136	0.00
35	T	Bromochloromethane	20.0000	21.4098	-7.0	107	0.00
36	T	Tetrahydrofuran	80.0000	102.5478	-28.2#	142	0.00
37	S	Dibromofluoromethane	10.0000	26.0327	-160.3#	272	0.00
38	T	1,1,1-Trichloroethane	20.0000	20.1227	-0.6	107	0.00
39	T	Cyclohexane	20.0000	17.8988	10.5	102	0.00
40	T	1,1-Dichloropropene	20.0000	19.6188	1.9	104	0.00
41	T	Tert-Amyl-Methyl ether	80.0000	103.5426	-29.4#	142	0.00
42	T	Carbon Tetrachloride	20.0000	20.6128	-3.1	104	-0.01
43	S	1,2-Dichloroethane-d4	10.0000	25.4551	-154.6#	267	0.00
44		Heptane	-1.0000	0.0000	0.0	142	0.00
45	T	1,2-Dichloroethane	20.0000	19.4720	2.6	104	0.00
46	T	Benzene	20.0000	18.8266	5.9	102	0.00
47	T	Trichloroethene	20.0000	18.6353	6.8	97	0.00
48	T	Methylcyclohexane	20.0000	18.4987	7.5	106	0.00
49	C	1,2-Dichloropropane	20.0000	19.6231	1.9	101	0.00
50	T	1,4-Dioxane	160.0000	212.5754	-32.9#	149	0.00
51	T	Bromodichloromethane	20.0000	19.4319	2.8	100	0.00
52	T	Dibromomethane	20.0000	20.4995	-2.5	106	0.00
53	T	2-Chloroethyl Vinyl Ether	20.0000	25.5220	-27.6#	127	0.00
54	T	4-Methyl-2-Pentanone	20.0000	20.8380	-4.2	113	0.00

(#) = Out of Range
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	20.0000	21.6024	-8.0	110	0.00
56	T	Dimethyl Disulfide	20.0000	20.1956	-1.0	119	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	108	0.00
58	S	Toluene-d8	10.0000	25.1100	-151.1#	271	0.00
59	C	Toluene	20.0000	18.5327	7.3	101	0.00
60	T	Ethyl Methacrylate	20.0000	20.8980	-4.5	118	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	20.0000	19.8643	0.7	104	0.00
63	T	1,1,2-Trichloroethane	20.0000	18.8951	5.5	100	0.00
64	T	2-Hexanone	20.0000	21.4061	-7.0	116	0.00
65	T	1,3-Dichloropropane	20.0000	20.1344	-0.7	107	0.00
66	T	Tetrachloroethene	20.0000	19.3936	3.0	104	0.00
67	T	Dibromochloromethane	20.0000	19.3580	3.2	101	0.00
68	T	1,2-Dibromoethane	20.0000	19.5061	2.5	106	0.00
69	T	1-Chlorohexane	20.0000	20.4795	-2.4	119	0.00
70	P	Chlorobenzene	20.0000	18.3361	8.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	20.0000	18.5860	7.1	100	0.00
72	C	Ethylbenzene	20.0000	18.5860	7.1	103	0.00
73	T	m-,p-Xylene	40.0000	37.3538	6.6	104	0.00
74	T	o-Xylene	20.0000	18.9049	5.5	102	0.00
75	T	Styrene	20.0000	19.3046	3.5	103	0.00
76	P	Bromoform	20.0000	18.7306	6.3	99	0.00
77	T	Isopropylbenzene	20.0000	18.7136	6.4	101	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	109	0.00
79	P	1,1,2,2-Tetrachloroethane	20.0000	19.5954	2.0	110	0.00
80	S	p-Bromofluorobenzene	10.0000	24.8575	-148.6#	265	0.00
81	T	1,2,3-Trichloropropane	20.0000	19.5233	2.4	104	0.00
82	T	trans-1,4-Dichloro-2-Butene	20.0000	17.7959	11.0	102	0.00
83	T	n-Propylbenzene	20.0000	18.3318	8.3	100	0.00
84	T	Bromobenzene	20.0000	18.5358	7.3	101	0.00
85	T	1,3,5-Trimethylbenzene	20.0000	18.5422	7.3	102	0.00
86	T	2-Chlorotoluene	20.0000	17.3610	13.2	93	0.00
87	T	4-Chlorotoluene	20.0000	18.8688	5.7	112	0.00
88	T	a-Methylstyrene	20.0000	20.0360	-0.2	119	0.00
89	T	tert-Butylbenzene	20.0000	19.0440	4.8	103	0.00
90	T	1,2,4-Trimethylbenzene	20.0000	18.7005	6.5	102	0.00
91	T	sec-Butylbenzene	20.0000	18.2864	8.6	100	0.00
92	T	p-Isopropyltoluene	20.0000	18.9695	5.2	104	0.00
93	T	1,3-Dichlorobenzene	20.0000	18.4272	7.9	101	0.00
94	T	1,4-Dichlorobenzene	20.0000	18.4481	7.8	103	0.00
95	T	n-Butylbenzene	20.0000	18.8967	5.5	104	0.00
96	T	1,2-Dichlorobenzene	20.0000	18.5345	7.3	102	0.00
97	T	1,2-Dibromo-3-Chloropropane	20.0000	19.4080	3.0	103	0.00
98	T	1,2,4-Trichlorobenzene	20.0000	18.7182	6.4	104	0.00
99	T	Hexachlorobutadiene	20.0000	18.6007	7.0	106	0.00
100	T	Naphthalene	20.0000	18.7312	6.3	101	0.00
101	T	1,2,3-Trichlorobenzene	20.0000	18.2068	9.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:24 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

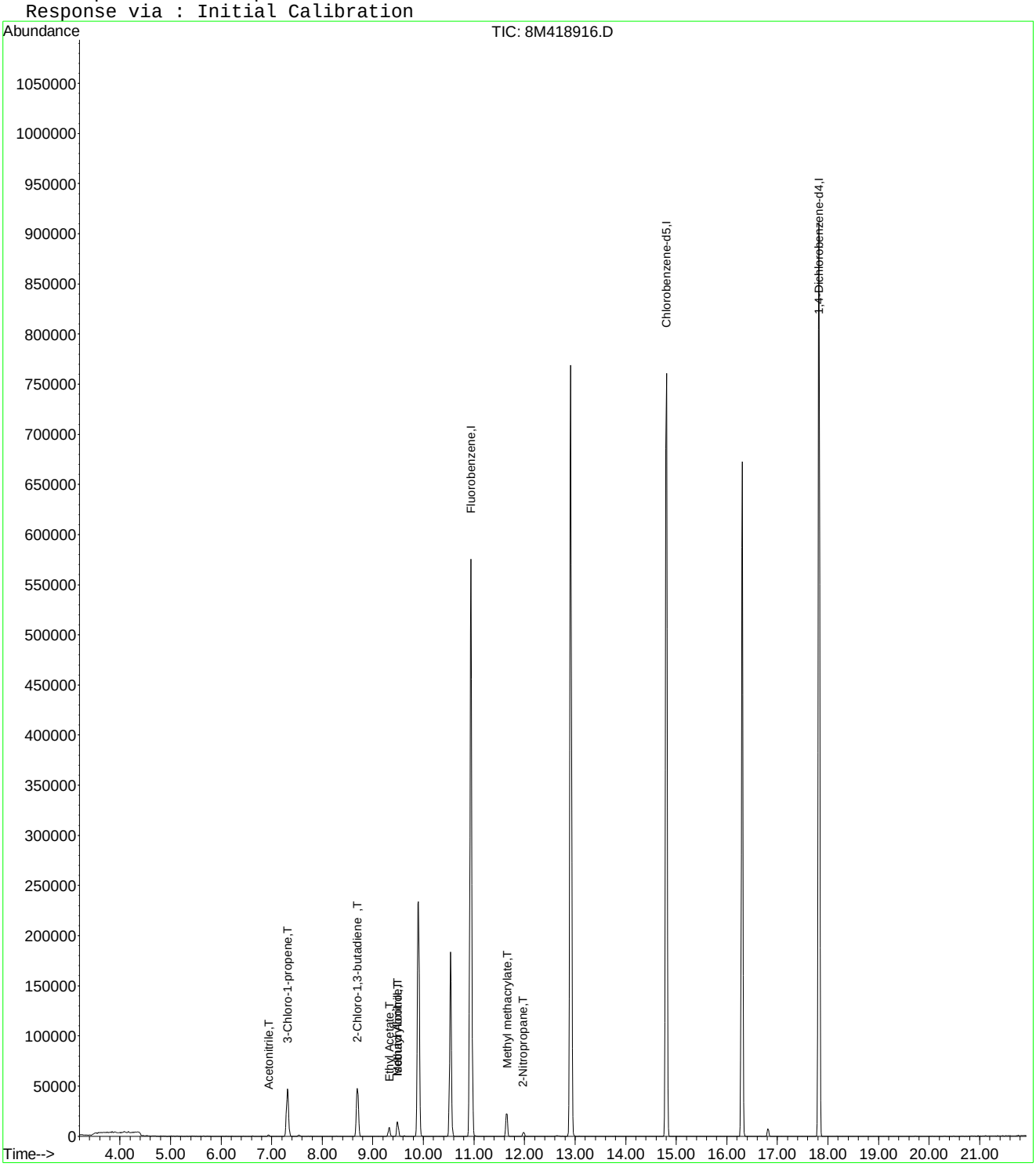
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746277	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	612130	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	333789	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.95	41	1710	4.5291	ug/L		90
3) 3-Chloro-1-propene	7.31	41	46601	4.6885	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	42607	4.4258	ug/L		60
5) Ethyl Acetate	9.33	43	14817	4.8044	ug/L		100
6) Methacrylonitrile	9.49	67	7777	4.3375	ug/L	#	64
7) Isobutyl Alcohol	9.49	43	409	3.2163	ug/L	#	8
9) Methyl methacrylate	11.65	41	14303	4.3932	ug/L	#	57
10) 2-Nitropropane	11.97	43	3479	3.6066	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418916.D A9FOOWT.M Mon Jul 03 11:20:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418916.D Vial: 3
Acq On : 12 Apr 2017 11:11 Operator: TMB
Sample : WG609829-02 5ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	-1.0000	4.5291	0.0	100	0.01
3	T	3-Chloro-1-propene	5.0000	4.6885	6.2	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.4258	11.5	100	0.00
5	T	Ethyl Acetate	5.0000	4.8044	3.9	100	0.01
6	T	Methacrylonitrile	5.0000	4.3375	13.2	100	0.00
7	T	Isobutyl Alcohol	-1.0000	3.2163	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.41#
9	T	Methyl methacrylate	5.0000	4.3932	12.1	100	0.01
10	T	2-Nitropropane	-1.0000	3.6066	0.0	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	0.0000	0.0	0	-16.07#

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418916.D A9FOOWT.M Fri Apr 14 14:10:53 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:26 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

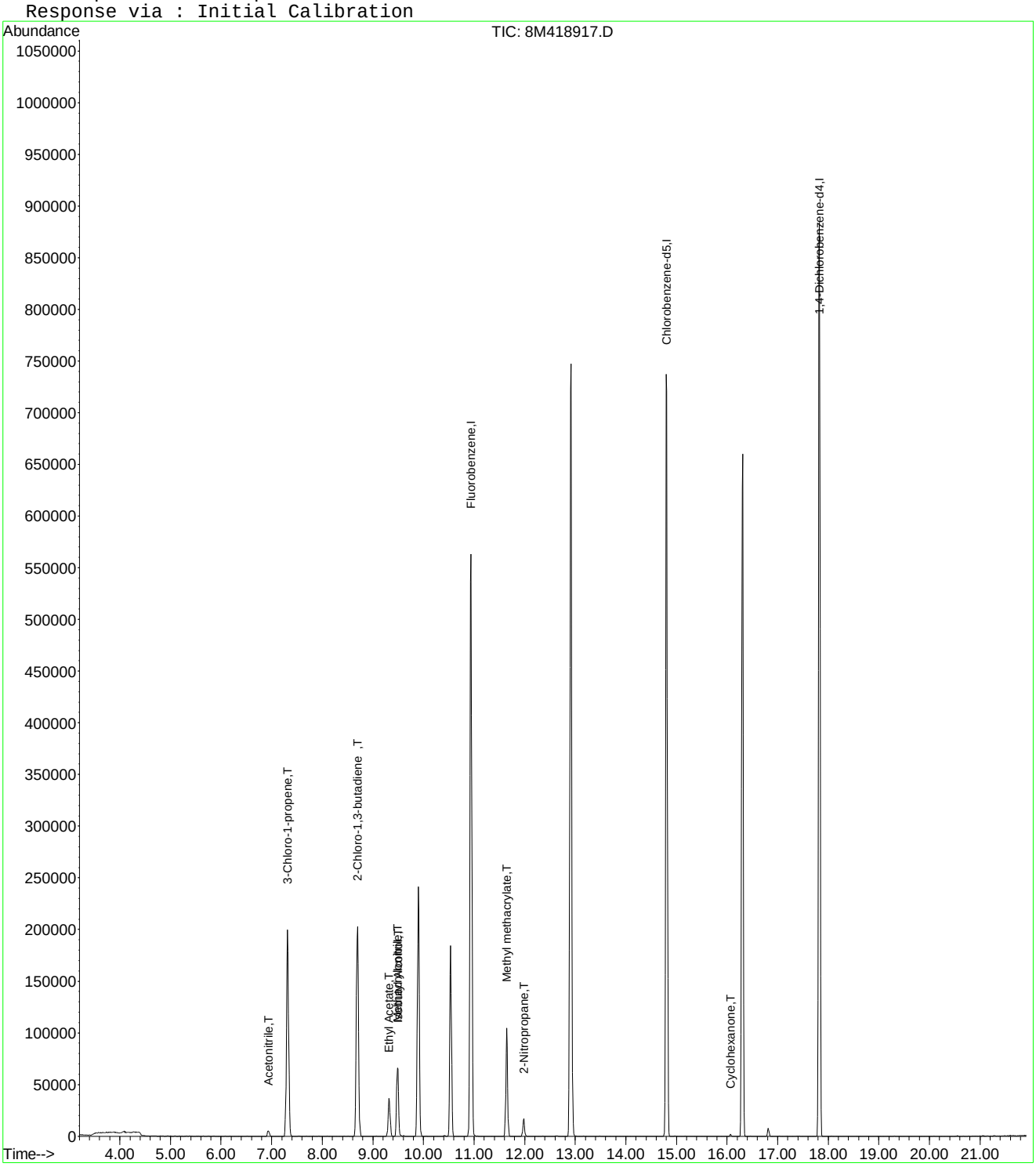
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	746151	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	609753	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	336388	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	7512	19.8997	ug/L		98
3) 3-Chloro-1-propene	7.31	41	187894	18.9072	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	178575	18.5528	ug/L		58
5) Ethyl Acetate	9.32	43	60325	19.5637	ug/L		93
6) Methacrylonitrile	9.48	67	35176	19.6222	ug/L	#	56
7) Isobutyl Alcohol	9.49	43	3848	30.2653	ug/L	#	98
9) Methyl methacrylate	11.64	41	60538	18.5974	ug/L		57
10) 2-Nitropropane	11.99	43	15961	16.5493	ug/L		97
13) Cyclohexanone	16.07	55	1572	15.8886	ug/L		86

(#) = qualifier out of range (m) = manual integration
8M418917.D A9FOOWT.M Mon Jul 03 11:20:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418917.D Vial: 4
Acq On : 12 Apr 2017 11:40 Operator: TMB
Sample : WG609829-03 20ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.8997	0.5	100	0.00
3	T	3-Chloro-1-propene	20.0000	18.9072	5.5	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	18.5528	7.2	100	0.00
5	T	Ethyl Acetate	20.0000	19.5637	2.2	100	0.00
6	T	Methacrylonitrile	20.0000	19.6222	1.9	100	0.00
7	T	Isobutyl Alcohol	-1.0000	30.2653	0.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	20.0000	18.5974	7.0	100	0.00
10	T	2-Nitropropane	20.0000	16.5493	17.3	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	15.8886	20.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418917.D A9FOOWT.M Fri Apr 14 14:07:45 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

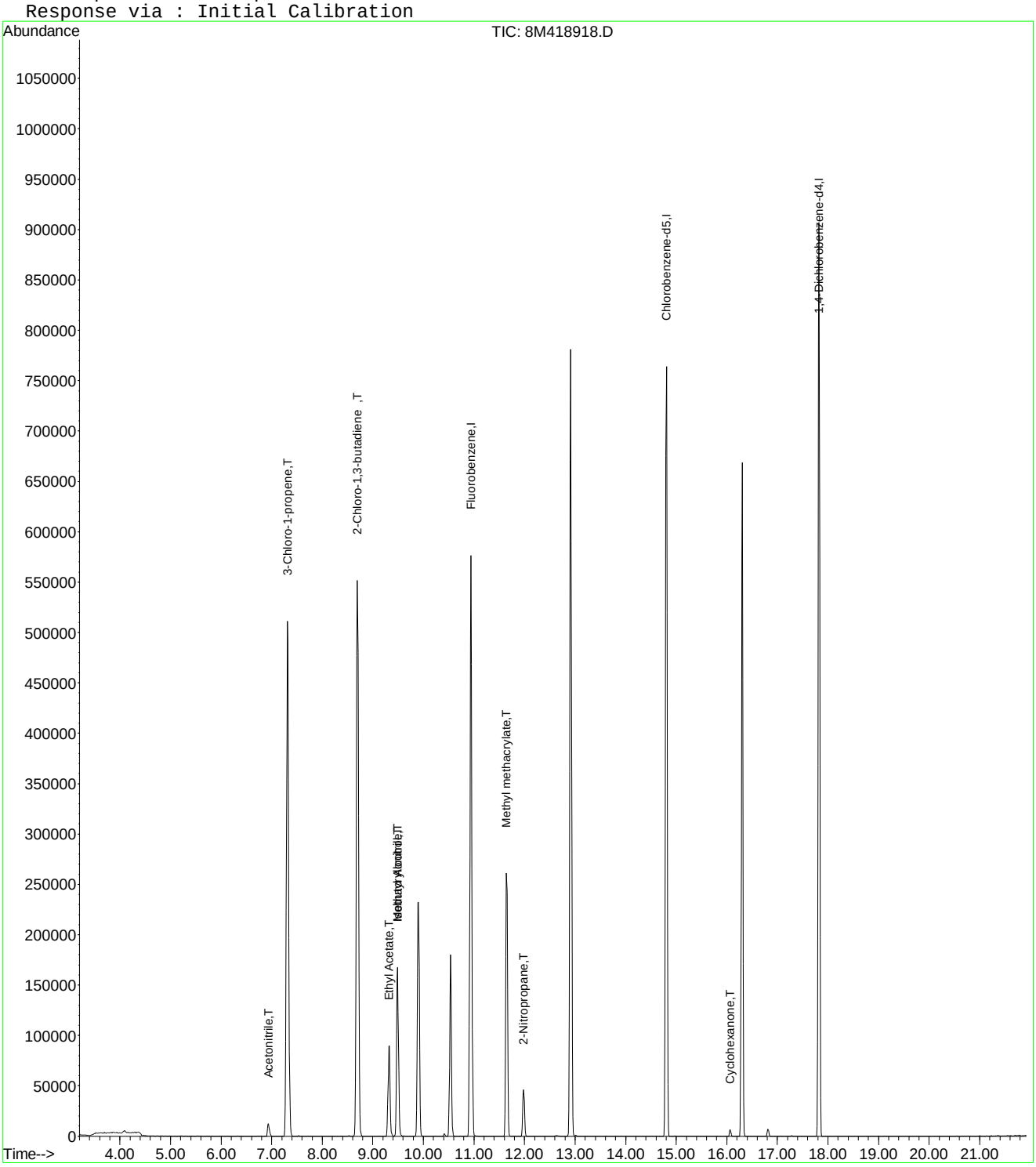
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	742498	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	604990	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	330523	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	17705	47.1322	ug/L		98
3) 3-Chloro-1-propene	7.31	41	486302	49.1759	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	471228	49.1983	ug/L		59
5) Ethyl Acetate	9.32	43	145956	47.5671	ug/L		92
6) Methacrylonitrile	9.49	67	84850	47.5646	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	10376	82.0109	ug/L		100
9) Methyl methacrylate	11.64	41	152652	47.1258	ug/L		59
10) 2-Nitropropane	11.98	43	41969	43.7301	ug/L		97
13) Cyclohexanone	16.07	55	4089	42.0619	ug/L	#	58

(#) = qualifier out of range (m) = manual integration
8M418918.D A9FOOWT.M Mon Jul 03 11:20:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418918.D Vial: 5
Acq On : 12 Apr 2017 12:10 Operator: TMB
Sample : WG609829-04 50ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	47.1322	5.7	100	0.00
3	T	3-Chloro-1-propene	50.0000	49.1759	1.6	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	49.1983	1.6	100	0.00
5	T	Ethyl Acetate	50.0000	47.5671	4.9	100	0.00
6	T	Methacrylonitrile	50.0000	47.5646	4.9	100	0.00
7	T	Isobutyl Alcohol	100.0000	82.0109	18.0	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	50.0000	47.1258	5.7	100	0.00
10	T	2-Nitropropane	50.0000	43.7301	12.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	42.0619	15.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418918.D A9FOOWT.M Fri Apr 14 14:08:07 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:30 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

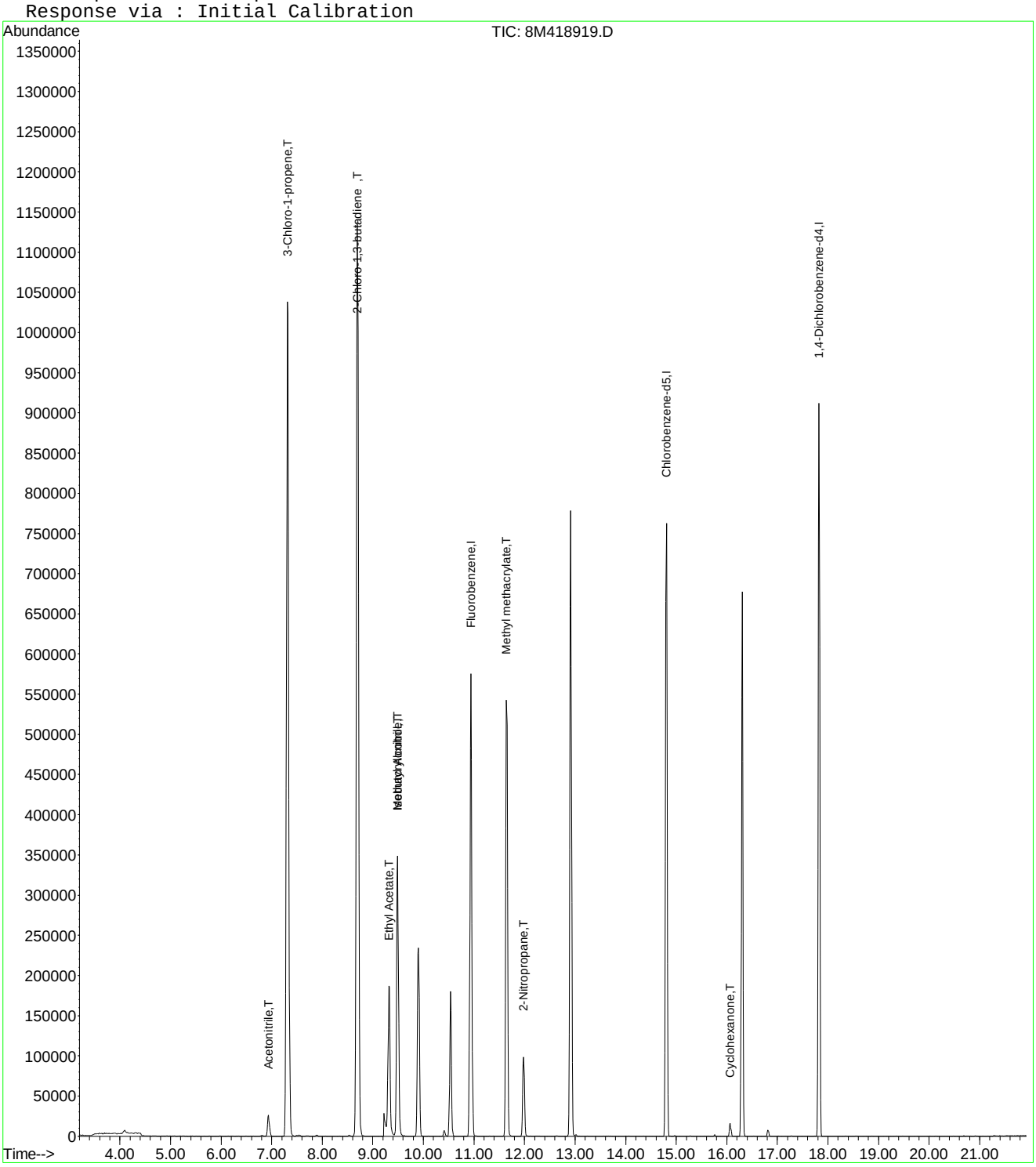
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	739808	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	600111	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	325970	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	37316	99.6994	ug/L		97
3) 3-Chloro-1-propene	7.31	41	997371	101.2231	ug/L		83
4) 2-Chloro-1,3-butadiene	8.69	53	975175	102.1828	ug/L		59
5) Ethyl Acetate	9.32	43	298184	97.5316	ug/L		91
6) Methacrylonitrile	9.49	67	175302	98.6268	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	23313	184.9338	ug/L		94
9) Methyl methacrylate	11.64	41	318110	98.5622	ug/L		58
10) 2-Nitropropane	11.98	43	93106	97.3657	ug/L		99
13) Cyclohexanone	16.07	55	9597	100.0994	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418919.D A9FOOWT.M Mon Jul 03 11:20:31 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418919.D Vial: 6
Acq On : 12 Apr 2017 12:41 Operator: TMB
Sample : WG609829-05 100ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	99.6994	0.3	100	0.00
3	T	3-Chloro-1-propene	100.0000	101.2231	-1.2	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	102.1828	-2.2	100	0.00
5	T	Ethyl Acetate	100.0000	97.5315	2.5	100	0.00
6	T	Methacrylonitrile	100.0000	98.6268	1.4	100	0.00
7	T	Isobutyl Alcohol	200.0000	184.9338	7.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	100	0.00
9	T	Methyl methacrylate	100.0000	98.5622	1.4	100	0.00
10	T	2-Nitropropane	100.0000	97.3657	2.6	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	100.0994	-0.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:08:27 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:32 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

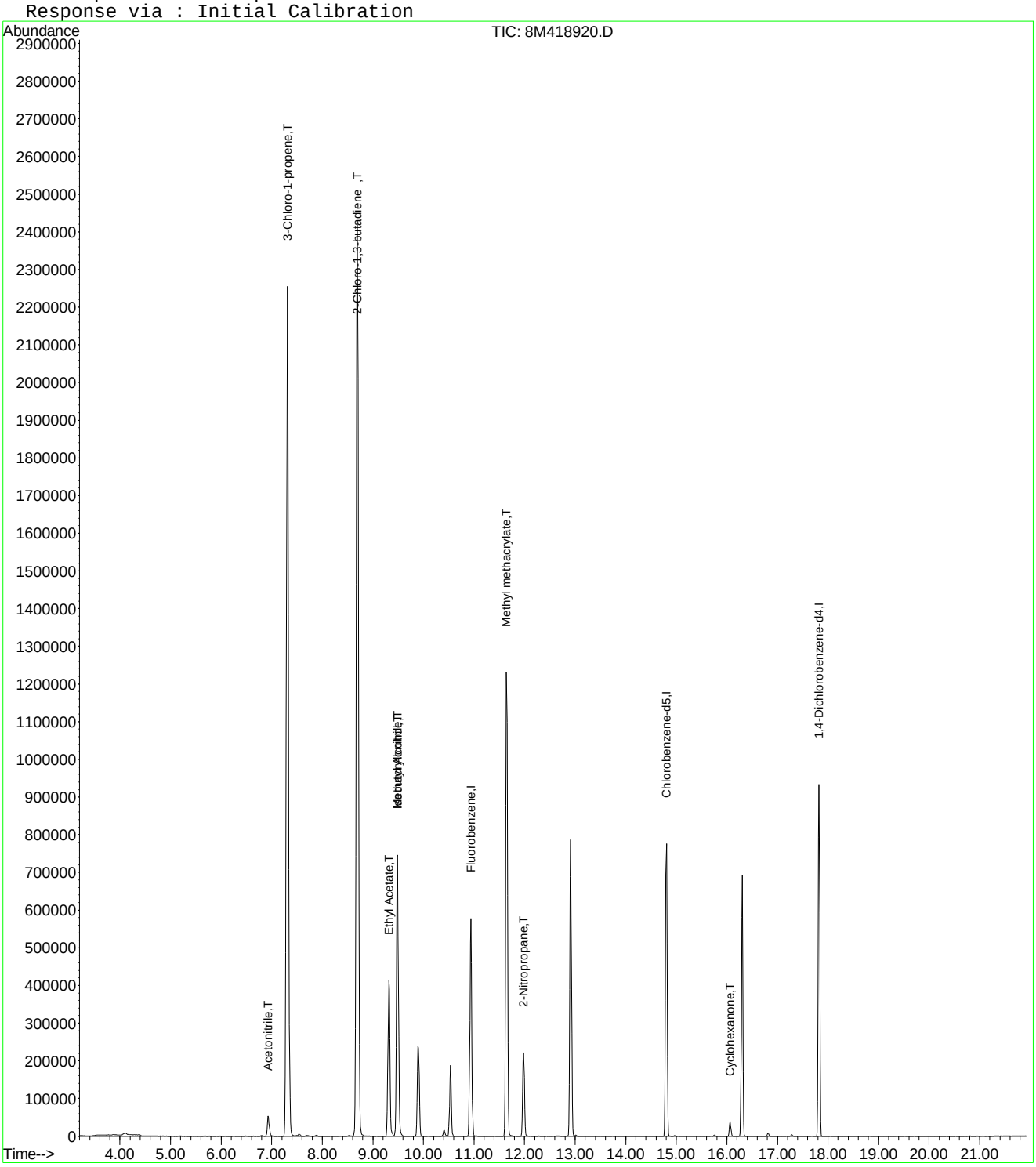
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	757530	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	615643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	339067	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	77830	203.0784	ug/L		95
3) 3-Chloro-1-propene	7.31	41	2094851	207.6324	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	2059315	210.7353	ug/L		59
5) Ethyl Acetate	9.31	43	656953	209.8526	ug/L		92
6) Methacrylonitrile	9.49	67	384959	211.5153	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	53170	411.9115	ug/L		94
9) Methyl methacrylate	11.64	41	704517	213.1786	ug/L		59
10) 2-Nitropropane	11.98	43	205555	209.9305	ug/L		100
13) Cyclohexanone	16.07	55	21273	213.3128	ug/L	#	65

(#) = qualifier out of range (m) = manual integration
8M418920.D A9FOOWT.M Mon Jul 03 11:20:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418920.D Vial: 7
Acq On : 12 Apr 2017 13:10 Operator: TMB
Sample : WG609829-06 200ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41:23 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

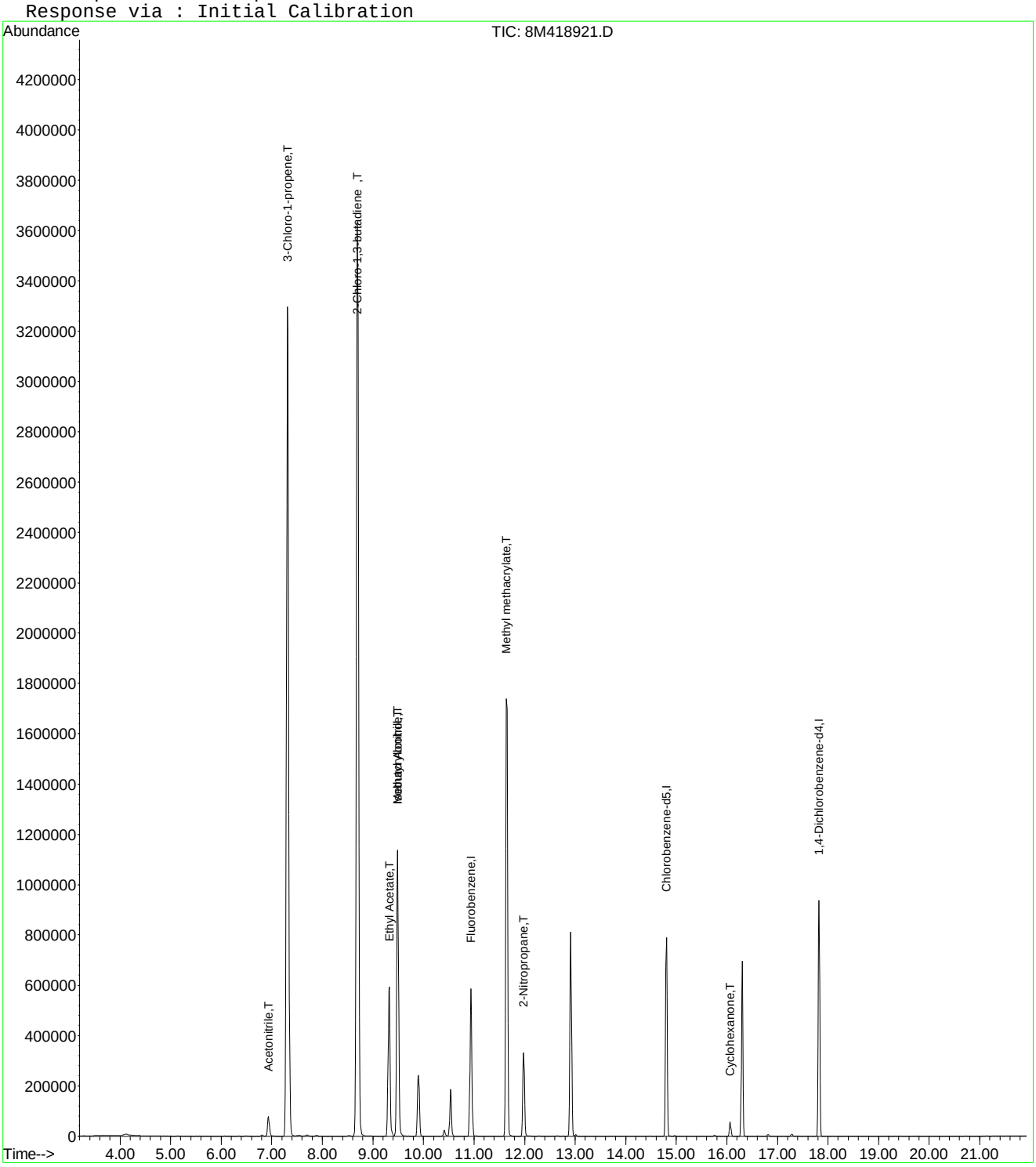
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	760698	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	622355	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	340966	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	112530	292.3968	ug/L		96
3) 3-Chloro-1-propene	7.31	41	3114799	307.4394	ug/L		82
4) 2-Chloro-1,3-butadiene	8.69	53	3064882	312.3316	ug/L		58
5) Ethyl Acetate	9.32	43	942946	299.9538	ug/L		92
6) Methacrylonitrile	9.49	67	556822	304.6711	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	76292	588.5777	ug/L		95
9) Methyl methacrylate	11.64	41	1020819	307.6014	ug/L		57
10) 2-Nitropropane	11.98	43	308845	314.1056	ug/L		97
13) Cyclohexanone	16.07	55	30268	301.8189	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418921.D 8260BWT.M Fri Apr 14 13:48:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418921.D Vial: 8
Acq On : 12 Apr 2017 13:40 Operator: TMB
Sample : WG609829-07 300ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 14 13:41 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



8M418921.D 8260BWT.M Fri Apr 14 13:48:32 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:36 2017 Quant Results File: A9FOOWT.RES

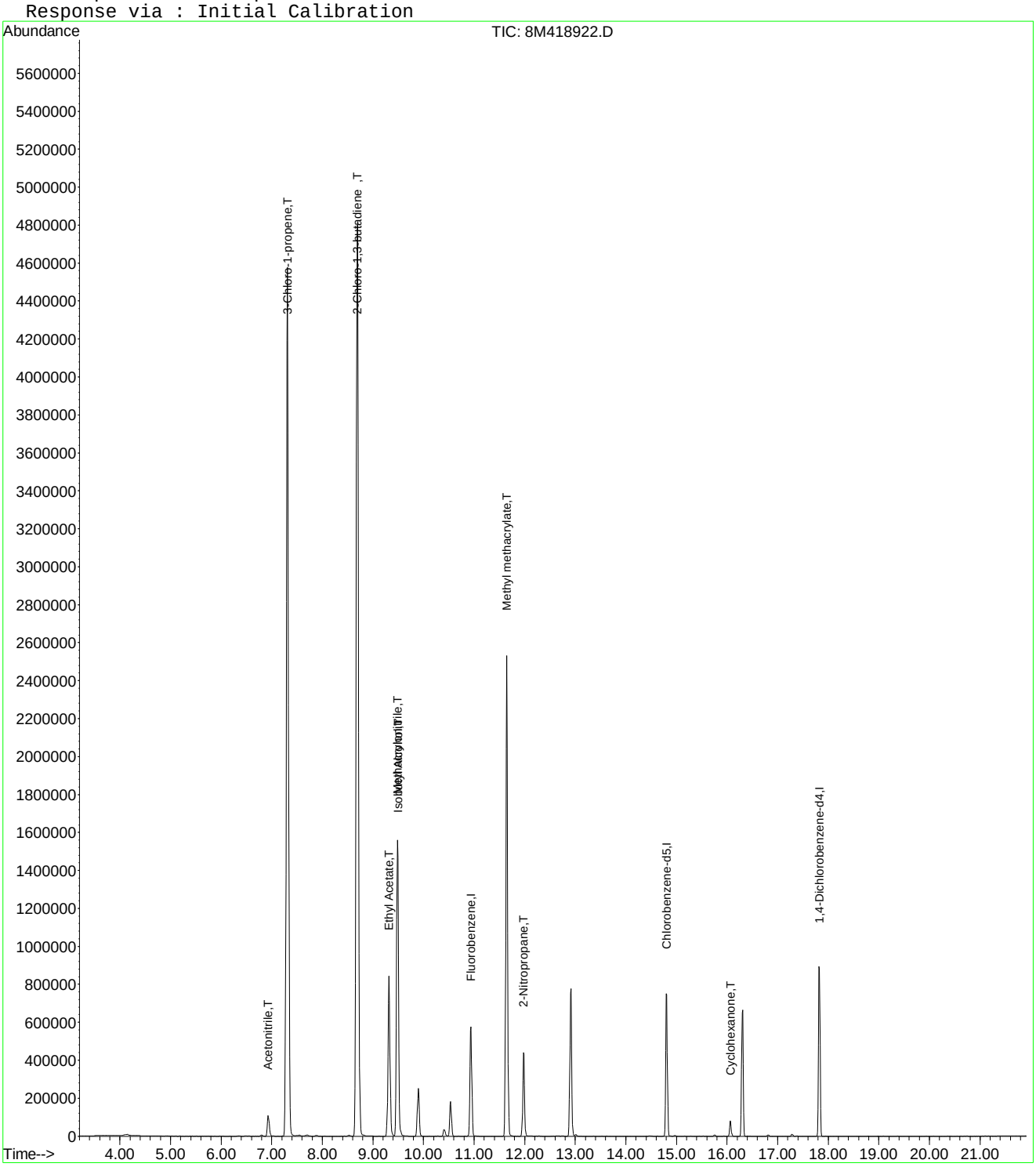
Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	765828	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	627777	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	342670	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	158097	408.0459	ug/L		96
3) 3-Chloro-1-propene	7.31	41	4220040	413.7396	ug/L		81
4) 2-Chloro-1,3-butadiene	8.69	53	4133844	418.4439	ug/L		56
5) Ethyl Acetate	9.32	43	1301555	411.2549	ug/L		91
6) Methacrylonitrile	9.48	67	774795	421.0975	ug/L	#	58
7) Isobutyl Alcohol	9.49	43	112499	862.0938	ug/L		94
9) Methyl methacrylate	11.64	41	1421838	425.5698	ug/L		57
10) 2-Nitropropane	11.98	43	433957	438.3922	ug/L		96
13) Cyclohexanone	16.07	55	45392	450.3778	ug/L	#	62

(#) = qualifier out of range (m) = manual integration
8M418922.D A9FOOWT.M Mon Jul 03 11:20:38 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418922.D Vial: 9
Acq On : 12 Apr 2017 14:10 Operator: TMB
Sample : WG609829-08 400ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

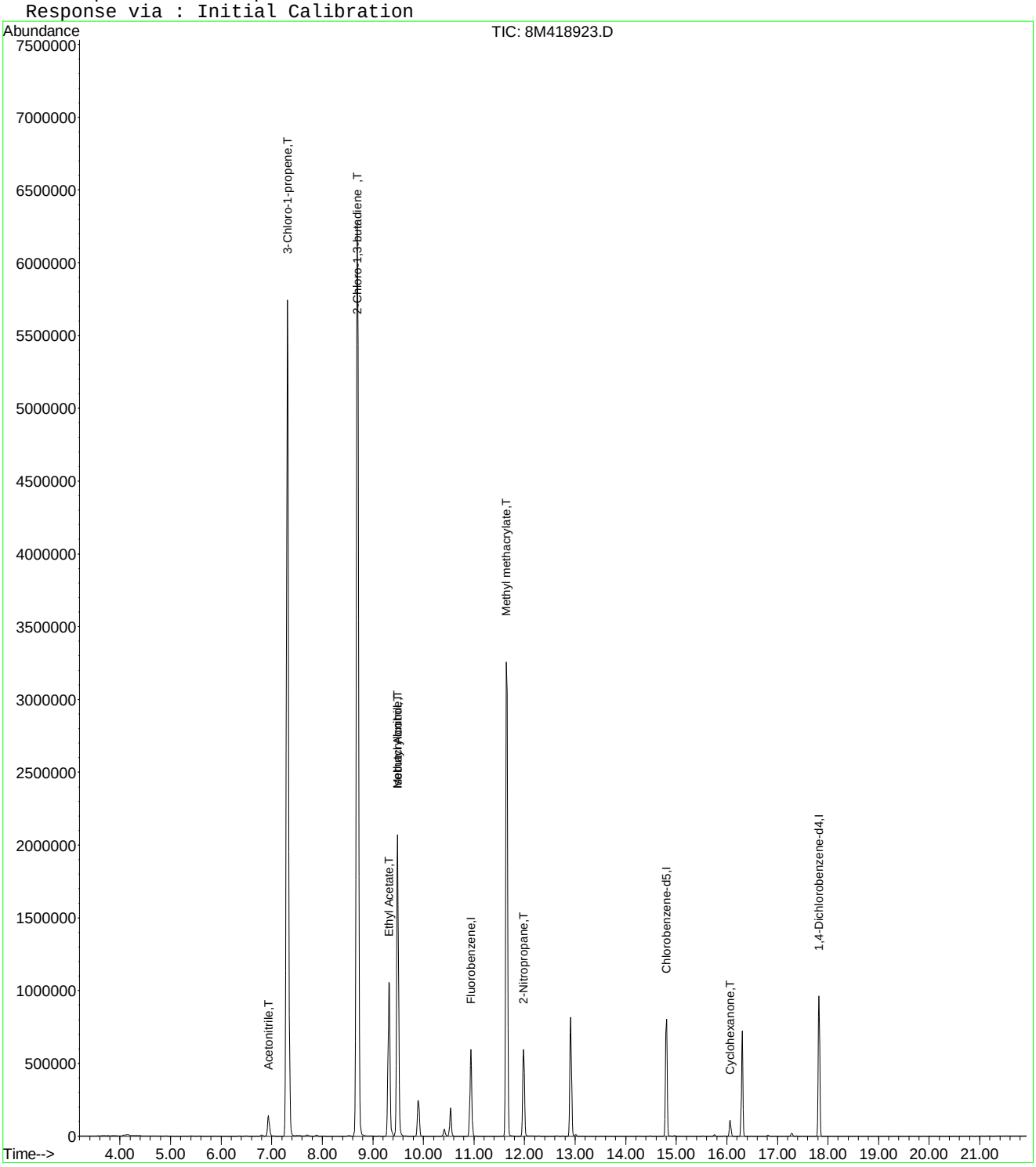
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	771678	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.81	117	638069	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.82	152	349522	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.94	41	205983	527.6086	ug/L		94
3) 3-Chloro-1-propene	7.31	41	5261515	511.9369	ug/L		79
4) 2-Chloro-1,3-butadiene	8.69	53	5178897	520.2542	ug/L		54
5) Ethyl Acetate	9.31	43	1685443	528.5156	ug/L		91
6) Methacrylonitrile	9.49	67	1008521	543.9712	ug/L	#	59
7) Isobutyl Alcohol	9.49	43	153433	1166.8627	ug/L		93
9) Methyl methacrylate	11.64	41	1865399	554.0992	ug/L		57
10) 2-Nitropropane	11.98	43	564365	565.8109	ug/L		96
13) Cyclohexanone	16.07	55	59870	582.3827	ug/L	#	64

(#) = qualifier out of range (m) = manual integration
8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418923.D Vial: 10
Acq On : 12 Apr 2017 14:39 Operator: TMB
Sample : WG609829-09 500ug/L STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



8M418923.D A9FOOWT.M Mon Jul 03 11:20:40 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32:00 2017 Quant Results File: 8260WTR.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 09:07:42 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

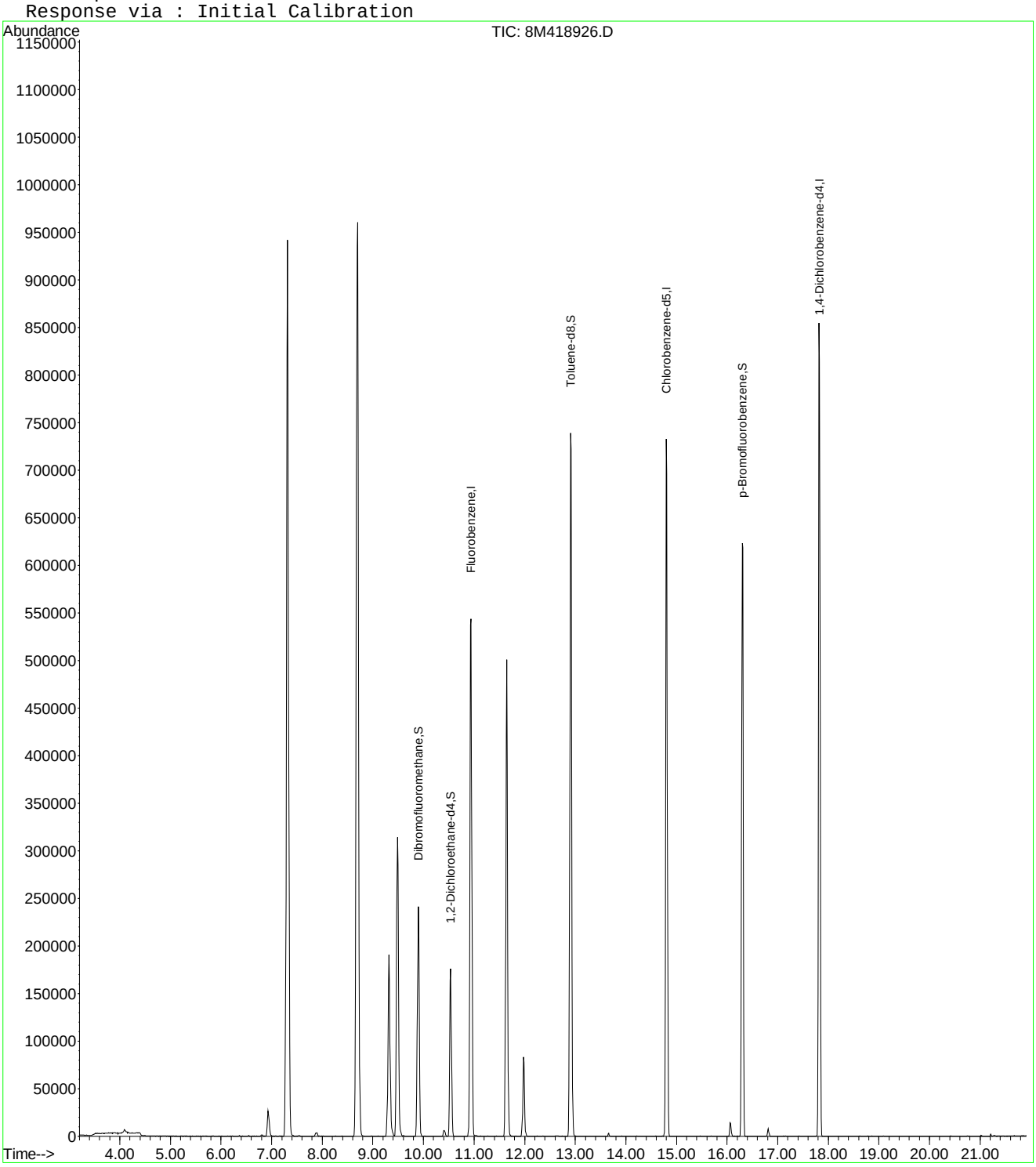
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	198928	23.9627	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.84%			
43) 1,2-Dichloroethane-d4	10.54	65	152795	21.2389	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 84.96%			
58) Toluene-d8	12.91	98	717629	24.0240	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 96.08%			
80) p-Bromofluorobenzene	16.30	95	278441	22.8541	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 91.40%			

Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
8M418926.D 8260WTR.M Fri Apr 14 13:50:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 12 16:32 2017 Quant Results File: 8260WTR.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8
Last Update : Thu Mar 23 10:18:22 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 03 11:20:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration
DataAcq Meth : 8260WTR

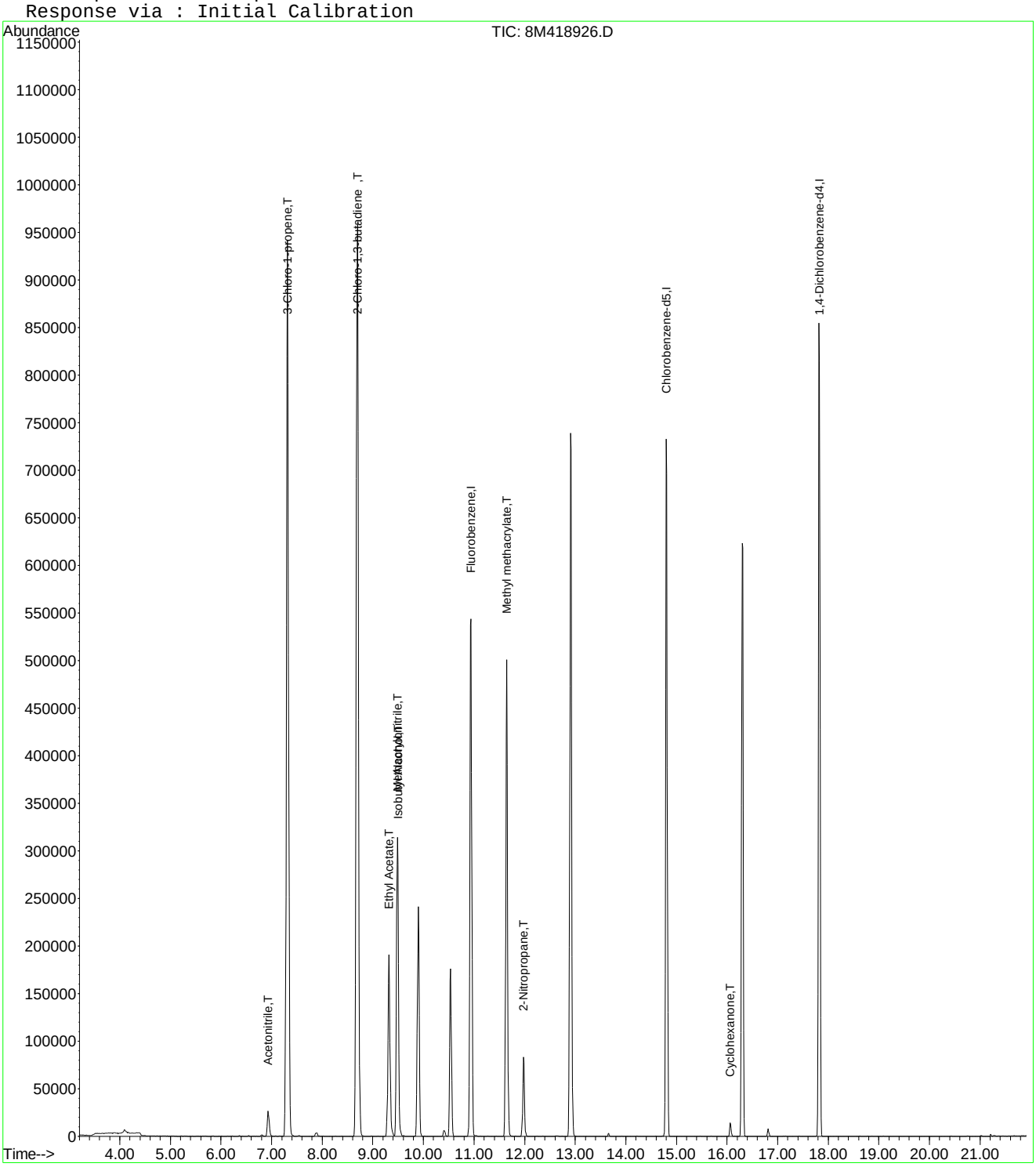
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.94	96	731971	25.00	ug/L		0.00
11) Chlorobenzene-d5	14.80	117	593832	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	17.83	152	321962	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.93	41	36372	98.2177	ug/L		97
3) 3-Chloro-1-propene	7.31	41	875524	89.8082	ug/L		83
4) 2-Chloro-1,3-butadiene	8.70	53	843244	89.3046	ug/L		59
5) Ethyl Acetate	9.32	43	297830	98.4588	ug/L		92
6) Methacrylonitrile	9.48	67	153966	87.5504	ug/L	#	60
7) Isobutyl Alcohol	9.49	43	24214	194.1377	ug/L		91
9) Methyl methacrylate	11.64	41	284340	89.0422	ug/L		58
10) 2-Nitropropane	11.98	43	76371	80.7201	ug/L		99
13) Cyclohexanone	16.06	55	8405	88.7579	ug/L	#	59

(#) = qualifier out of range (m) = manual integration
8M418926.D A9FOOWT.M Mon Jul 03 11:20:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jul 3 11:20 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041217\8M418926.D Vial: 13
Acq On : 12 Apr 2017 16:10 Operator: TMB
Sample : WG609829-10 100ug/L ALT SRC STD A9/FOO Inst : HPMS8
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\2\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water SOP:MSV01 04-12-17 HPMS8
Last Update : Thu Apr 13 16:40:13 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	99	0.00
2	T	Acetonitrile	100.0000	98.2177	1.8	97	0.00
3	T	3-Chloro-1-propene	100.0000	89.8082	10.2	88	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	89.3046	10.7	86	0.00
5	T	Ethyl Acetate	100.0000	98.4588	1.5	100	0.00
6	T	Methacrylonitrile	100.0000	87.5504	12.4	88	0.00
7	T	Isobutyl Alcohol	200.0000	194.1377	2.9	104	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	83	0.00
9	T	Methyl methacrylate	100.0000	89.0422	11.0	89	0.00
10	T	2-Nitropropane	100.0000	80.7202	19.3	82	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
13	T	Cyclohexanone	100.0000	88.7579	11.2	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M418919.D A9FOOWT.M Fri Apr 14 14:11:32 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	803771	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	623661	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	312774	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.91	98	456	0.0160	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.08%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2205	0.2027	ug/L	97
3) Chloromethane	3.83	50	5565	0.4092	ug/L	76
4) Vinyl Chloride	4.07	62	4202	0.3272	ug/L	93
5) 1,3-Butadiene	4.12	54	2857	Below Cal #		1
7) Chloroethane	5.14	64	1232	0.2196	ug/L #	45
8) Trichlorofluoromethane	5.62	101	3405	0.2441	ug/L #	94
10) Isoprene	6.18	67	2827	0.2563	ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1919	0.2413	ug/L #	53
14) 1,1-Dichloroethene	6.72	61	2851	0.2449	ug/L	87
16) Dimethyl Sulfide	6.98	62	1743	0.2248	ug/L	76
19) Methylene Chloride	7.51	84	3288	0.3930	ug/L	95
20) Carbon Disulfide	7.55	76	8902	0.3678	ug/L	96
22) Methyl Tert Butyl Ether	7.71	73	4778	0.2899	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	3284	0.2900	ug/L	96
24) n-Hexane	8.02	57	2298	0.2431	ug/L	89
26) Vinyl Acetate	8.53	43	3061	0.2692	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	3743	0.2568	ug/L #	88
31) 2,2-Dichloropropane	9.34	77	3225	0.2621	ug/L #	77
32) cis-1,2-Dichloroethene	9.40	96	2463	0.2631	ug/L	90
33) Chloroform	9.62	83	5969	0.3696	ug/L	94
35) Bromochloromethane	9.84	130	1452	0.2875	ug/L	93
38) 1,1,1-Trichloroethane	10.14	97	3644	0.2796	ug/L	97
39) Cyclohexane	10.18	56	3332	0.2746	ug/L #	87
40) 1,1-Dichloropropene	10.33	75	3293	0.2894	ug/L	95
42) Carbon Tetrachloride	10.49	117	3061	0.2533	ug/L #	81
45) 1,2-Dichloroethane	10.65	62	2799	0.3065	ug/L #	64
46) Benzene	10.70	78	11003	0.3314	ug/L	94
47) Trichloroethene	11.43	130	2640	0.2830	ug/L	93
48) Methylcyclohexane	11.53	83	3718	0.2990	ug/L	93
49) 1,2-Dichloropropane	11.65	63	2260	0.2787	ug/L	87
50) Bromodichloromethane	11.96	83	2937	0.2767	ug/L #	87
52) Dibromomethane	12.04	93	1092	0.2616	ug/L	85
53) 2-Chloroethyl Vinyl Ether	12.25	63	496	0.1413	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3354	0.2775	ug/L	86
56) Dimethyl Disulfide	12.85	79	410	6.5739	ug/L #	24
59) Toluene	13.02	91	10893	0.3138	ug/L	96
60) Ethyl Methacrylate	13.10	69	1281	0.1956	ug/L	70
62) trans-1,3-Dichloropropene	13.18	75	2847	0.2828	ug/L	78
63) 1,1,2-Trichloroethane	13.41	97	1378	0.2413	ug/L	80
65) 1,3-Dichloropropane	13.71	76	3029	0.3137	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:16 2017 Quant Results File: 8260WT.RES

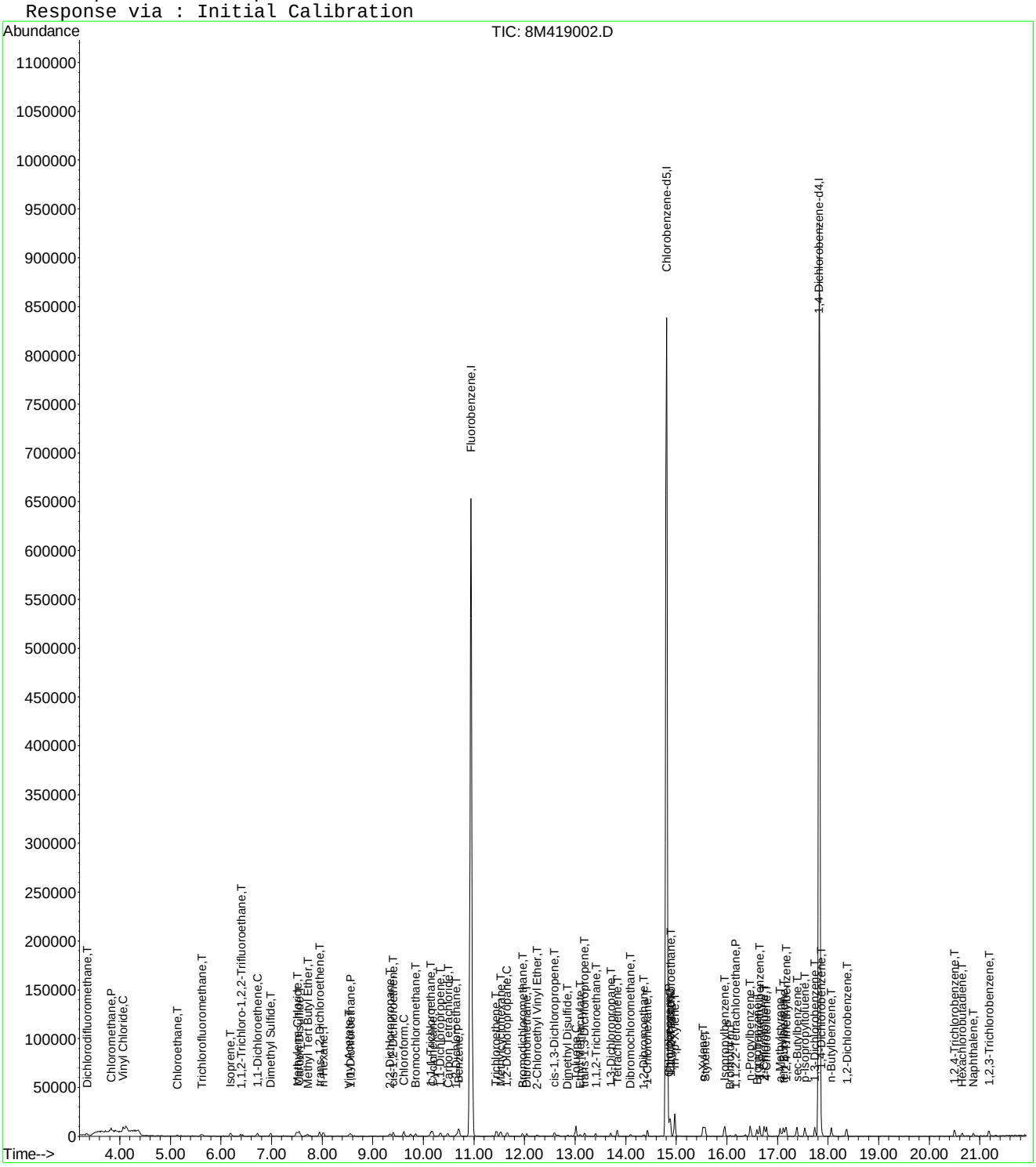
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
66)	Tetrachloroethene	13.83	164	2097	0.2876	ug/L		94
67)	Dibromochloromethane	14.09	129	1754	0.2390	ug/L		96
68)	1,2-Dibromoethane	14.35	107	1560	0.2796	ug/L		80
69)	1-Chlorohexane	14.42	91	2902	0.2642	ug/L		93
70)	Chlorobenzene	14.86	112	7625	0.3086	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.89	131	2025	0.2309	ug/L		92
72)	Ethylbenzene	14.88	106	3702	0.2675	ug/L		78
73)	m-,p-Xylene	14.97	106	9617	0.6000	ug/L		93
74)	o-Xylene	15.53	106	4785	0.2969	ug/L		96
75)	Styrene	15.57	104	6235	0.2468	ug/L		87
76)	Bromoform	16.06	173	794	1.3534	ug/L	#	27
77)	Isopropylbenzene	15.95	105	11105	0.2878	ug/L		97
79)	1,1,2,2-Tetrachloroethane	16.17	83	1461	0.2476	ug/L	#	92
83)	n-Propylbenzene	16.46	91	13614	0.3110	ug/L		97
84)	Bromobenzene	16.60	156	2823	0.2752	ug/L		78
85)	1,3,5-Trimethylbenzene	16.64	105	9120	0.2877	ug/L		91
86)	2-Chlorotoluene	16.74	91	9154	0.3063	ug/L		80
87)	4-Chlorotoluene	16.78	91	8789	0.3263	ug/L		88
88)	a-Methylstyrene	17.05	118	4528	0.2548	ug/L		94
89)	tert-Butylbenzene	17.12	134	1769	0.2465	ug/L		76
90)	1,2,4-Trimethylbenzene	17.17	105	9542	0.2949	ug/L		94
91)	sec-Butylbenzene	17.39	105	11285	0.2842	ug/L		93
92)	p-Isopropyltoluene	17.54	119	9114	0.2726	ug/L		94
93)	1,3-Dichlorobenzene	17.74	146	6334	0.3186	ug/L		92
94)	1,4-Dichlorobenzene	17.86	146	6652	0.3291	ug/L	#	49
95)	n-Butylbenzene	18.06	91	8752	0.2906	ug/L		94
96)	1,2-Dichlorobenzene	18.37	146	5133	0.2939	ug/L		98
98)	1,2,4-Trichlorobenzene	20.50	180	3486	0.2965	ug/L		89
99)	Hexachlorobutadiene	20.64	225	1480	0.2705	ug/L	#	86
100)	Naphthalene	20.87	128	4833	0.2876	ug/L	#	80
101)	1,2,3-Trichlorobenzene	21.18	180	2987	0.3059	ug/L	#	93

(#) = qualifier out of range (m) = manual integration
8M419002.D 8260WT.M Tue Apr 18 11:58:50 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2027	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.4092	0.0	100	0.01
4	C	Vinyl Chloride	-1.0000	0.3272	0.0	100	0.01
5	T	1,3-Butadiene	-1.0000	-20.2217	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	-1.0000	0.2196	0.0	100	0.01
8	T	Trichlorofluoromethane	-1.0000	0.2441	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.2563	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.2413	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	-1.0000	0.2449	0.0	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.2248	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.0662	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3930	0.0	100	0.01
20	T	Carbon Disulfide	-1.0000	0.3678	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2899	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	-1.0000	0.2900	0.0	100	0.01
24	T	n-Hexane	-1.0000	0.2431	0.0	100	0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.2692	0.0	100	0.00
27	P	1,1-Dichloroethane	-1.0000	0.2568	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	-1.0000	0.2621	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2631	0.0	100	0.00
33	C	Chloroform	0.3000	0.3696	-23.2#	100	0.01
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	-1.0000	0.2875	0.0	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-9.86#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	-1.0000	0.2796	0.0	100	0.00
39	T	Cyclohexane	-1.0000	0.2746	0.0	100	0.01
40	T	1,1-Dichloropropene	-1.0000	0.2894	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	-1.0000	0.2533	0.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	-1.0000	0.3065	0.0	100	0.00
46	T	Benzene	-1.0000	0.3314	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2830	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.2990	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.2787	0.0	100	0.00
50	T	Bromodichloromethane	-1.0000	0.2767	0.0	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	-1.0000	0.2616	0.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1413	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419002.D Vial: 3
Acq On : 17 Apr 2017 13:51 Operator: TMB
Sample : WG610410-02 0.3ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2775	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.5739	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0160	0.0	100	0.00
59	C	Toluene	-1.0000	0.3138	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.1956	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2828	0.0	100	0.00
63	T	1,1,2-Trichloroethane	-1.0000	0.2413	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	-1.0000	0.3137	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.2876	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2390	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2796	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.2642	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3086	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2309	0.0	0	0.01
72	C	Ethylbenzene	-1.0000	0.2675	0.0	0	0.00
73	T	m-,p-Xylene	-1.0000	0.6000	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2969	0.0	100	0.00
75	T	Styrene	-1.0000	0.2468	0.0	100	0.00
76	P	Bromoform	-1.0000	1.3534	0.0	100	0.01
77	T	Isopropylbenzene	-1.0000	0.2878	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.2476	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1194	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	-1.0000	0.3110	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.2752	8.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.2877	0.0	100	0.00
86	T	2-Chlorotoluene	-1.0000	0.3063	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3263	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2548	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2465	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.2949	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.2842	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.2726	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3186	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3291	-9.7	100	0.00
95	T	n-Butylbenzene	-1.0000	0.2906	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.2939	2.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.2965	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.2705	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.2876	0.0	100	0.00
101	T	1,2,3-Trichlorobenzene	0.3000	0.3059	-2.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
8M419002.D 8260WT.M Tue Apr 18 11:59:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	787150	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	615912	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	306493	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	12.92	98	201	0.0071	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	3389	0.3181	ug/L	86
3) Chloromethane	3.82	50	7334	0.5507	ug/L	96
4) Vinyl Chloride	4.07	62	5367	0.4267	ug/L	99
5) 1,3-Butadiene	4.12	54	3783	Below Cal #		53
7) Chloroethane	5.13	64	2045	0.3723	ug/L #	45
8) Trichlorofluoromethane	5.62	101	4954	0.3627	ug/L #	93
10) Isoprene	6.18	67	3988	0.3692	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	2378	0.3053	ug/L	89
14) 1,1-Dichloroethene	6.71	61	4170	0.3658	ug/L	97
16) Dimethyl Sulfide	6.98	62	2440	0.3213	ug/L	86
18) Methyl acetate	7.23	43	600	0.1979	ug/L #	53
19) Methylene Chloride	7.48	84	3294	0.4021	ug/L	63
20) Carbon Disulfide	7.54	76	9802	0.4135	ug/L	98
22) Methyl Tert Butyl Ether	7.71	73	5656	0.3504	ug/L #	58
23) trans-1,2-Dichloroethene	7.95	61	4304	0.3881	ug/L	85
24) n-Hexane	8.02	57	3612	0.3902	ug/L	91
26) Vinyl Acetate	8.53	43	3817	0.3428	ug/L #	69
27) 1,1-Dichloroethane	8.56	63	5095	0.3569	ug/L #	76
31) 2,2-Dichloropropane	9.34	77	4235	0.3515	ug/L	77
32) cis-1,2-Dichloroethene	9.40	96	3310	0.3611	ug/L	95
33) Chloroform	9.61	83	6791	0.4294	ug/L	94
35) Bromochloromethane	9.85	130	1484	0.3000	ug/L	78
36) Tetrahydrofuran	9.86	42	394	0.3297	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	4246	0.3327	ug/L	95
39) Cyclohexane	10.17	56	4729	0.3979	ug/L	82
40) 1,1-Dichloropropene	10.32	75	4225	0.3791	ug/L	84
42) Carbon Tetrachloride	10.48	117	3628	0.3065	ug/L	85
45) 1,2-Dichloroethane	10.66	62	3115	0.3483	ug/L #	68
46) Benzene	10.70	78	12752	0.3921	ug/L	99
47) Trichloroethene	11.44	130	3526	0.3860	ug/L	94
48) Methylcyclohexane	11.53	83	4742	0.3894	ug/L	98
49) 1,2-Dichloropropane	11.66	63	2964	0.3732	ug/L	72
50) Bromodichloromethane	11.96	83	3435	0.3305	ug/L #	95
52) Dibromomethane	12.05	93	1271	0.3110	ug/L	92
53) 2-Chloroethyl Vinyl Ether	12.25	63	562	0.1635	ug/L #	45
55) cis-1,3-Dichloropropene	12.59	75	3811	0.3220	ug/L	88
56) Dimethyl Disulfide	12.86	79	827	6.6305	ug/L	76
59) Toluene	13.01	91	12577	0.3668	ug/L	100
60) Ethyl Methacrylate	13.09	69	1611	0.2491	ug/L #	68
62) trans-1,3-Dichloropropene	13.19	75	3144	0.3162	ug/L	96

(#) = qualifier out of range (m) = manual integration
8M419003.D 8260WT.M Tue Apr 18 11:58:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:40:34 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:39:55 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

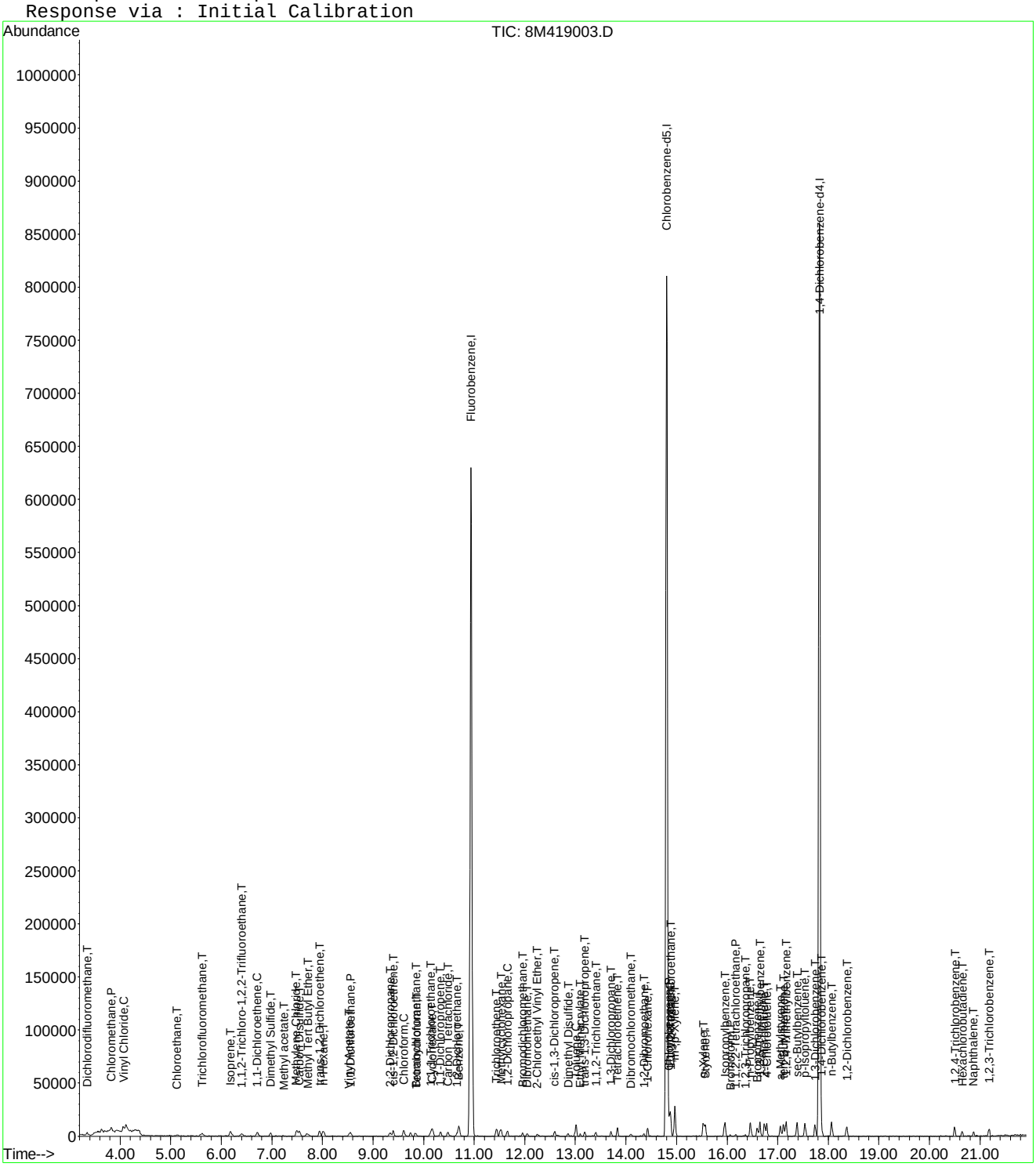
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
63)	1,1,2-Trichloroethane	13.40	97	2066	0.3663 ug/L		83
65)	1,3-Dichloropropane	13.70	76	3481	0.3651 ug/L		81
66)	Tetrachloroethene	13.83	164	2419	0.3359 ug/L		93
67)	Dibromochloromethane	14.10	129	2287	0.3155 ug/L		95
68)	1,2-Dibromoethane	14.36	107	1857	0.3370 ug/L		87
69)	1-Chlorohexane	14.43	91	3796	0.3500 ug/L		88
70)	Chlorobenzene	14.85	112	9935	0.4071 ug/L		80
71)	1,1,1,2-Tetrachloroethane	14.88	131	2985	0.3447 ug/L		94
72)	Ethylbenzene	14.87	106	4602	0.3367 ug/L		81
73)	m-,p-Xylene	14.97	106	11280	0.7126 ug/L		87
74)	o-Xylene	15.53	106	5356	0.3366 ug/L		95
75)	Styrene	15.56	104	8019	0.3214 ug/L		98
76)	Bromoform	16.07	173	792	1.3549 ug/L	#	65
77)	Isopropylbenzene	15.96	105	14417	0.3784 ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.16	83	1888	0.3265 ug/L	#	87
81)	1,2,3-Trichloropropane	16.36	110	210	0.1267 ug/L	#	6
83)	n-Propylbenzene	16.45	91	17056	0.3976 ug/L		93
84)	Bromobenzene	16.60	156	3412	0.3395 ug/L		91
85)	1,3,5-Trimethylbenzene	16.65	105	12100	0.3896 ug/L		98
86)	2-Chlorotoluene	16.73	91	13111	0.4477 ug/L		99
87)	4-Chlorotoluene	16.78	91	9782	0.3706 ug/L		95
88)	a-Methylstyrene	17.05	118	5086	0.2921 ug/L		99
89)	tert-Butylbenzene	17.11	134	2759	0.3923 ug/L		83
90)	1,2,4-Trimethylbenzene	17.17	105	11199	0.3532 ug/L		96
91)	sec-Butylbenzene	17.38	105	16076	0.4132 ug/L		92
92)	p-Isopropyltoluene	17.54	119	11698	0.3571 ug/L		98
93)	1,3-Dichlorobenzene	17.75	146	7364	0.3780 ug/L		96
94)	1,4-Dichlorobenzene	17.87	146	7953	0.4015 ug/L		83
95)	n-Butylbenzene	18.07	91	12640	0.4283 ug/L	#	94
96)	1,2-Dichlorobenzene	18.37	146	5812	0.3396 ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	4235	0.3675 ug/L		99
99)	Hexachlorobutadiene	20.65	225	1988	0.3708 ug/L		96
100)	Naphthalene	20.87	128	6635	0.4029 ug/L	#	86
101)	1,2,3-Trichlorobenzene	21.18	180	3757	0.3926 ug/L		95

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:40 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3181	0.0	100	0.00
3	P	Chloromethane	-1.0000	0.5507	0.0	100	0.00
4	C	Vinyl Chloride	0.4000	0.4267	-6.7	100	0.02
5	T	1,3-Butadiene	-1.0000	-19.9254	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.0000	0.0	0	-4.96#
7	T	Chloroethane	0.4000	0.3723	6.9	100	0.00
8	T	Trichlorofluoromethane	0.4000	0.3627	9.3	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.14#
10	T	Isoprene	-1.0000	0.3692	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.39#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3053	0.0	100	0.00
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.48#
14	C	1,1-Dichloroethene	0.4000	0.3658	8.6	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.83#
16	T	Dimethyl Sulfide	-1.0000	0.3213	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.1979	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4021	0.0	100	-0.01
20	T	Carbon Disulfide	-1.0000	0.4135	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.67#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3504	0.0	100	0.00
23	T	trans-1,2-Dichloroethene	0.4000	0.3881	3.0	100	0.00
24	T	n-Hexane	-1.0000	0.3902	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.35#
26	T	Vinyl Acetate	-1.0000	0.3428	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.3569	10.8	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.93#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.11#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.22#
31	T	2,2-Dichloropropane	0.4000	0.3514	12.1	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.3611	9.7	100	0.00
33	C	Chloroform	0.4000	0.4294	-7.3	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-9.75#
35	T	Bromochloromethane	0.4000	0.3000	25.0#	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.3297	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.90#
38	T	1,1,1-Trichloroethane	0.4000	0.3327	16.8	100	0.00
39	T	Cyclohexane	-1.0000	0.3979	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3791	0.0	100	-0.01
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.44#
42	T	Carbon Tetrachloride	0.4000	0.3065	23.4	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.53#
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	0.4000	0.3483	12.9	100	0.00
46	T	Benzene	0.4000	0.3922	2.0	100	0.00
47	T	Trichloroethene	0.4000	0.3860	3.5	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3894	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3732	6.7	100	0.00
50	T	Bromodichloromethane	0.4000	0.3305	17.4	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	0.4000	0.3110	22.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1635	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.28#

(#) = Out of Range
8M419003.D 8260WT.M Tue Apr 18 11:59:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419003.D Vial: 4
Acq On : 17 Apr 2017 14:25 Operator: TMB
Sample : WG610410-03 0.4ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3220	19.5	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.6305	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0071	0.0	100	0.00
59	C	Toluene	0.4000	0.3669	8.3	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2491	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3162	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3663	8.4	100	0.00
64	T	2-Hexanone	-1.0000	0.0000	0.0	0	-13.33#
65	T	1,3-Dichloropropane	0.4000	0.3651	8.7	100	0.00
66	T	Tetrachloroethene	0.4000	0.3359	16.0	100	0.00
67	T	Dibromochloromethane	0.4000	0.3155	21.1	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.3371	15.7	100	0.00
69	T	1-Chlorohexane	0.4000	0.3500	12.5	100	0.00
70	P	Chlorobenzene	0.4000	0.4071	-1.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3447	13.8	100	0.00
72	C	Ethylbenzene	0.4000	0.3367	15.8	100	-0.01
73	T	m-,p-Xylene	0.8000	0.7126	10.9	100	0.00
74	T	o-Xylene	-1.0000	0.3366	0.0	100	0.00
75	T	Styrene	0.4000	0.3214	19.6	100	0.00
76	P	Bromoform	-1.0000	1.3549	0.0	100	0.02
77	T	Isopropylbenzene	0.4000	0.3784	5.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.3265	18.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.30#
81	T	1,2,3-Trichloropropane	-1.0000	0.1267	0.0	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.40#
83	T	n-Propylbenzene	0.4000	0.3976	0.6	100	0.00
84	T	Bromobenzene	0.4000	0.3395	15.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.3896	2.6	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4477	-11.9	100	0.00
87	T	4-Chlorotoluene	0.4000	0.3706	7.3	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2921	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3923	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	0.4000	0.3532	11.7	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4132	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3571	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.3780	5.5	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4015	-0.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4283	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.3396	15.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.36#
98	T	1,2,4-Trichlorobenzene	0.4000	0.3675	8.1	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.3708	7.3	100	0.00
100	T	Naphthalene	0.4000	0.4029	-0.7	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.3926	1.8	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419003.D 8260WT.M Tue Apr 18 11:59:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	779914	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	608999	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	308129	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	3656	0.4469	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.80%#		
43) 1,2-Dichloroethane-d4	10.54	65	3358	0.4748	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	12.91	98	13712	0.4928	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	1.96%#		
80) p-Bromofluorobenzene	16.30	95	5409	0.4974	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	9773	0.9259	ug/L	89
3) Chloromethane	3.82	50	14220	1.0777	ug/L	94
4) Vinyl Chloride	4.06	62	13411	1.0762	ug/L	98
5) 1,3-Butadiene	4.12	54	9735	Below Cal	#	74
6) Bromomethane	4.98	94	2003	1.2503	ug/L	89
7) Chloroethane	5.14	64	5085	0.9342	ug/L	98
8) Trichlorofluoromethane	5.63	101	14425	1.0658	ug/L #	94
9) Diethyl ether	6.15	59	24837	4.8725	ug/L	91
10) Isoprene	6.19	67	11081	1.0355	ug/L	99
11) Acrolein	6.39	56	1283	1.8174	ug/L	87
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	7816	1.0127	ug/L	95
13) Acetone	6.50	43	1194	1.0885	ug/L #	42
14) 1,1-Dichloroethene	6.72	61	11427	1.0117	ug/L	93
15) Tert-Butyl Alcohol	6.82	59	3335	9.3795	ug/L #	68
16) Dimethyl Sulfide	6.98	62	7490	0.9956	ug/L	98
18) Methyl acetate	7.24	43	2479	0.8253	ug/L #	53
19) Methylene Chloride	7.49	84	8465	1.0429	ug/L	79
20) Carbon Disulfide	7.54	76	24774	1.0549	ug/L	99
21) Acrylonitrile	7.68	53	3342	2.1964	ug/L	91
22) Methyl Tert Butyl Ether	7.71	73	15457	0.9665	ug/L	97
23) trans-1,2-Dichloroethene	7.95	61	10769	0.9800	ug/L	94
24) n-Hexane	8.02	57	9445	1.0297	ug/L	89
25) Diisopropyl ether	8.36	45	121009	4.9196	ug/L	94
26) Vinyl Acetate	8.53	43	10576	0.9587	ug/L	90
27) 1,1-Dichloroethane	8.57	63	14365	1.0157	ug/L	95
28) Ethyl-Tert-Butyl ether	8.93	59	101471	4.8508	ug/L	97
29) 2-Butanone	9.13	43	992	0.5767	ug/L #	44
30) Propionitrile	9.23	54	2404	4.5091	ug/L #	56
31) 2,2-Dichloropropane	9.34	77	12075	1.0114	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	8962	0.9867	ug/L	89
33) Chloroform	9.61	83	16050	1.0242	ug/L	99
34) 1-Bromopropane	9.75	122	1768	0.9867	ug/L	91
35) Bromochloromethane	9.84	130	4693	0.9575	ug/L	83
36) Tetrahydrofuran	9.87	42	6126	5.1735	ug/L	80
38) 1,1,1-Trichloroethane	10.14	97	12661	1.0011	ug/L	93
39) Cyclohexane	10.18	56	11570	0.9826	ug/L	96
40) 1,1-Dichloropropene	10.34	75	11057	1.0014	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	88613	4.7307	ug/L	96
42) Carbon Tetrachloride	10.49	117	11842	1.0099	ug/L	98
45) 1,2-Dichloroethane	10.66	62	8720	0.9841	ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:55 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

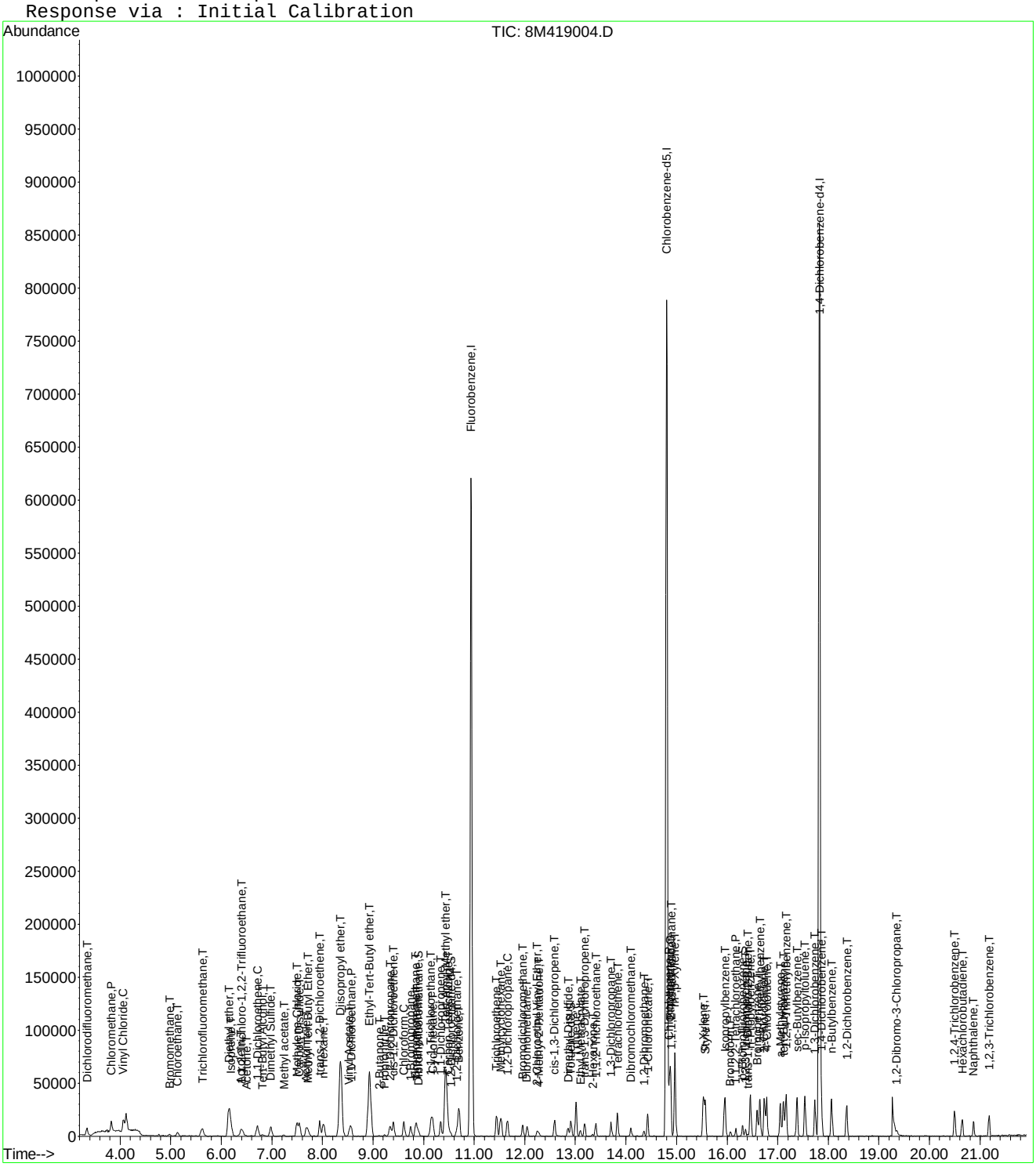
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
46)	Benzene	10.70	78	32995	1.0241 ug/L		98
47)	Trichloroethene	11.44	130	9064	1.0014 ug/L		96
48)	Methylcyclohexane	11.52	83	12257	1.0159 ug/L		96
49)	1,2-Dichloropropane	11.66	63	7625	0.9690 ug/L		89
50)	Bromodichloromethane	11.96	83	9755	0.9472 ug/L		97
52)	Dibromomethane	12.04	93	3914	0.9665 ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	3022	0.8875 ug/L		86
54)	4-Methyl-2-Pentanone	12.28	58	1067	0.6996 ug/L	#	33
55)	cis-1,3-Dichloropropene	12.59	75	11045	0.9418 ug/L		99
56)	Dimethyl Disulfide	12.86	79	3184	6.9480 ug/L		100
59)	Toluene	13.01	91	34963	1.0314 ug/L		98
60)	Ethyl Methacrylate	13.11	69	5063	0.7916 ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	8931	0.9085 ug/L		94
63)	1,1,2-Trichloroethane	13.40	97	5720	1.0256 ug/L		92
64)	2-Hexanone	13.34	58	660	0.4822 ug/L	#	1
65)	1,3-Dichloropropane	13.70	76	9865	1.0463 ug/L		88
66)	Tetrachloroethene	13.84	164	6911	0.9706 ug/L		94
67)	Dibromochloromethane	14.10	129	6507	0.9079 ug/L		93
68)	1,2-Dibromoethane	14.36	107	5094	0.9351 ug/L		96
69)	1-Chlorohexane	14.44	91	10710	0.9986 ug/L		96
70)	Chlorobenzene	14.85	112	23511	0.9743 ug/L		74
71)	1,1,1,2-Tetrachloroethane	14.89	131	7696	0.8987 ug/L		99
72)	Ethylbenzene	14.87	106	12181	0.9013 ug/L		83
73)	m-,p-Xylene	14.97	106	31012	1.9815 ug/L		91
74)	o-Xylene	15.53	106	14876	0.9454 ug/L		96
75)	Styrene	15.56	104	22652	0.9182 ug/L		96
76)	Bromoform	16.06	173	3053	1.1801 ug/L		92
77)	Isopropylbenzene	15.96	105	37771	1.0025 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.16	83	6072	1.0444 ug/L	#	97
81)	1,2,3-Trichloropropane	16.36	110	1447	0.8681 ug/L		93
82)	trans-1,4-Dichloro-2-Buten	16.41	53	711	1.1263 ug/L	#	1
83)	n-Propylbenzene	16.46	91	45884	1.0639 ug/L		99
84)	Bromobenzene	16.60	156	10336	1.0229 ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	30984	0.9922 ug/L		98
86)	2-Chlorotoluene	16.73	91	32327	1.0980 ug/L		96
87)	4-Chlorotoluene	16.78	91	26310	0.9916 ug/L		96
88)	a-Methylstyrene	17.05	118	14557	0.8315 ug/L		95
89)	tert-Butylbenzene	17.12	134	6410	0.9066 ug/L		87
90)	1,2,4-Trimethylbenzene	17.17	105	32136	1.0080 ug/L		99
91)	sec-Butylbenzene	17.38	105	40408	1.0331 ug/L		98
92)	p-Isopropyltoluene	17.54	119	32541	0.9881 ug/L		100
93)	1,3-Dichlorobenzene	17.74	146	19666	1.0041 ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	20254	1.0171 ug/L	#	70
95)	n-Butylbenzene	18.07	91	29903	1.0080 ug/L		97
96)	1,2-Dichlorobenzene	18.37	146	18343	1.0661 ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.35	75	619	0.6542 ug/L		90
98)	1,2,4-Trichlorobenzene	20.49	180	11339	0.9788 ug/L		98
99)	Hexachlorobutadiene	20.65	225	5266	0.9769 ug/L		99
100)	Naphthalene	20.87	128	15692	0.9479 ug/L		98
101)	1,2,3-Trichlorobenzene	21.18	180	9244	0.9609 ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419004.D 8260WT.M Tue Apr 18 11:58:56 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9260	7.4	100	0.00
3	P	Chloromethane	1.0000	1.0777	-7.8	100	0.00
4	C	Vinyl Chloride	1.0000	1.0762	-7.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-18.1082	0.0	0	0.03
6	T	Bromomethane	1.0000	1.2503	-25.0#	100	0.02
7	T	Chloroethane	1.0000	0.9342	6.6	100	0.01
8	T	Trichlorofluoromethane	1.0000	1.0658	-6.6	100	0.03
9	T	Diethyl ether	5.0000	4.8725	2.6	100	0.00
10	T	Isoprene	-1.0000	1.0355	0.0	100	0.00
11	T	Acrolein	-1.0000	1.8174	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0127	-1.3	100	0.00
13	T	Acetone	-1.0000	1.0885	0.0	100	0.02
14	C	1,1-Dichloroethene	1.0000	1.0117	-1.2	100	0.02
15	T	Tert-Butyl Alcohol	-1.0000	9.3795	0.0	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	0.9956	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-7.22#
18	T	Methyl acetate	-1.0000	0.8253	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0429	-4.3	100	0.00
20	T	Carbon Disulfide	1.0000	1.0549	-5.5	100	0.00
21	T	Acrylonitrile	2.5000	2.1965	12.1	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	0.9665	3.4	100	0.00
23	T	trans-1,2-Dichloroethene	1.0000	0.9800	2.0	100	0.00
24	T	n-Hexane	-1.0000	1.0297	0.0	100	0.00
25	T	Diisopropyl ether	5.0000	4.9196	1.6	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9587	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	1.0157	-1.6	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	4.8508	3.0	100	0.00
29	T	2-Butanone	-1.0000	0.5767	0.0	100	0.02
30	T	Propionitrile	5.0000	4.5091	9.8	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.0114	-1.1	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9867	1.3	100	0.00
33	C	Chloroform	1.0000	1.0242	-2.4	100	0.00
34		1-Bromopropane	1.0000	0.9867	1.3	100	0.00
35	T	Bromochloromethane	1.0000	0.9575	4.2	100	-0.01
36	T	Tetrahydrofuran	5.0000	5.1735	-3.5	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.4469	0.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0011	-0.1	100	0.00
39	T	Cyclohexane	1.0000	0.9826	1.7	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0014	-0.1	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	4.7307	5.4	100	0.00
42	T	Carbon Tetrachloride	1.0000	1.0099	-1.0	100	0.02
43	S	1,2-Dichloroethane-d4	-1.0000	0.4748	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	1.0000	0.9841	1.6	100	0.00
46	T	Benzene	1.0000	1.0241	-2.4	100	0.00
47	T	Trichloroethene	1.0000	1.0014	-0.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.0159	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9690	3.1	100	0.00
50	T	Bromodichloromethane	1.0000	0.9473	5.3	100	0.00
51	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.95#
52	T	Dibromomethane	1.0000	0.9665	3.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8875	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.6996	0.0	100	0.00

(#) = Out of Range
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419004.D Vial: 5
Acq On : 17 Apr 2017 14:55 Operator: TMB
Sample : WG610410-04 1ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9417	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	6.9480	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.4928	0.0	100	0.00
59	C	Toluene	1.0000	1.0314	-3.1	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.7916	20.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	1.0000	0.9084	9.2	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0256	-2.6	100	0.00
64	T	2-Hexanone	-1.0000	0.4822	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0463	-4.6	100	0.00
66	T	Tetrachloroethene	1.0000	0.9706	2.9	100	0.00
67	T	Dibromochloromethane	1.0000	0.9079	9.2	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9351	6.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9986	0.1	100	0.00
70	P	Chlorobenzene	1.0000	0.9743	2.6	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.8987	10.1	100	0.02
72	C	Ethylbenzene	1.0000	0.9013	9.9	100	-0.01
73	T	m-,p-Xylene	2.0000	1.9815	0.9	100	0.00
74	T	o-Xylene	1.0000	0.9454	5.5	100	0.00
75	T	Styrene	1.0000	0.9182	8.2	100	0.00
76	P	Bromoform	1.0000	1.1801	-18.0	100	0.00
77	T	Isopropylbenzene	1.0000	1.0025	-0.3	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0444	-4.4	100	-0.01
80	S	p-Bromofluorobenzene	-1.0000	0.4974	0.0	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	0.8681	13.2	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	1.0000	1.1263	-12.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0639	-6.4	100	0.00
84	T	Bromobenzene	1.0000	1.0229	-2.3	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	0.9922	0.8	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0980	-9.8	100	0.00
87	T	4-Chlorotoluene	1.0000	0.9916	0.8	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8315	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9066	9.3	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0080	-0.8	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0331	-3.3	100	0.00
92	T	p-Isopropyltoluene	1.0000	0.9881	1.2	100	0.00
93	T	1,3-Dichlorobenzene	1.0000	1.0041	-0.4	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	1.0171	-1.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0079	-0.8	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0661	-6.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.6542	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	0.9788	2.1	100	0.00
99	T	Hexachlorobutadiene	1.0000	0.9769	2.3	100	0.00
100	T	Naphthalene	1.0000	0.9479	5.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	0.9609	3.9	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419004.D 8260WT.M Tue Apr 18 12:00:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.93	96	786816	25.00 ug/L	0.00
57) Chlorobenzene-d5	14.80	117	613120	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	307545	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.90	111	7910	0.9585 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.84%#	
43) 1,2-Dichloroethane-d4	10.53	65	6765	0.9482 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.80%#	
58) Toluene-d8	12.91	98	27609	0.9855 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	3.96%#	
80) p-Bromofluorobenzene	16.30	95	11029	1.0161 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.08%#	
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.35	85	18197	1.7090 ug/L	98
3) Chloromethane	3.82	50	27723	2.0826 ug/L	96
4) Vinyl Chloride	4.06	62	26048	2.0720 ug/L	98
5) 1,3-Butadiene	4.12	54	18463	Below Cal #	71
6) Bromomethane	4.97	94	4285	1.8796 ug/L	92
7) Chloroethane	5.15	64	10874	1.9802 ug/L	96
8) Trichlorofluoromethane	5.62	101	25863	1.8941 ug/L	99
9) Diethyl ether	6.15	59	125724	24.4479 ug/L	91
10) Isoprene	6.19	67	20005	1.8530 ug/L	94
11) Acrolein	6.39	56	8808	12.3674 ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	14374	1.8461 ug/L	99
13) Acetone	6.49	43	2188	1.9772 ug/L #	61
14) 1,1-Dichloroethene	6.72	61	21622	1.8975 ug/L	94
15) Tert-Butyl Alcohol	6.82	59	15100	42.0952 ug/L	95
16) Dimethyl Sulfide	6.99	62	14397	1.8968 ug/L	83
17) Iodomethane	7.24	142	1183	0.3475 ug/L #	31
18) Methyl acetate	7.23	43	6243	2.0602 ug/L #	64
19) Methylene Chloride	7.49	84	15417	1.8827 ug/L	82
20) Carbon Disulfide	7.54	76	46839	1.9769 ug/L	99
21) Acrylonitrile	7.68	53	17600	11.4657 ug/L	93
22) Methyl Tert Butyl Ether	7.70	73	29822	1.8483 ug/L	99
23) trans-1,2-Dichloroethene	7.95	61	21949	1.9798 ug/L	92
24) n-Hexane	8.03	57	18571	2.0068 ug/L	92
25) Diisopropyl ether	8.36	45	624517	25.1670 ug/L	95
26) Vinyl Acetate	8.53	43	20892	1.8772 ug/L	91
27) 1,1-Dichloroethane	8.57	63	27479	1.9259 ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	512681	24.2936 ug/L	97
29) 2-Butanone	9.12	43	2972	1.7126 ug/L #	59
30) Propionitrile	9.23	54	12326	22.9166 ug/L	98
31) 2,2-Dichloropropane	9.34	77	24154	2.0053 ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	17720	1.9338 ug/L	92
33) Chloroform	9.61	83	31381	1.9850 ug/L	97
34) 1-Bromopropane	9.75	122	3352	1.8543 ug/L	99
35) Bromochloromethane	9.84	130	9815	1.9850 ug/L	94
36) Tetrahydrofuran	9.87	42	27490	23.0121 ug/L	86
38) 1,1,1-Trichloroethane	10.15	97	23941	1.8765 ug/L	99
39) Cyclohexane	10.17	56	22528	1.8965 ug/L	89
40) 1,1-Dichloropropene	10.34	75	21378	1.9191 ug/L	100
41) Tert-Amyl-Methyl ether	10.44	73	455514	24.1049 ug/L	97
42) Carbon Tetrachloride	10.49	117	22574	1.9082 ug/L	97

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:42:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:42:26 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

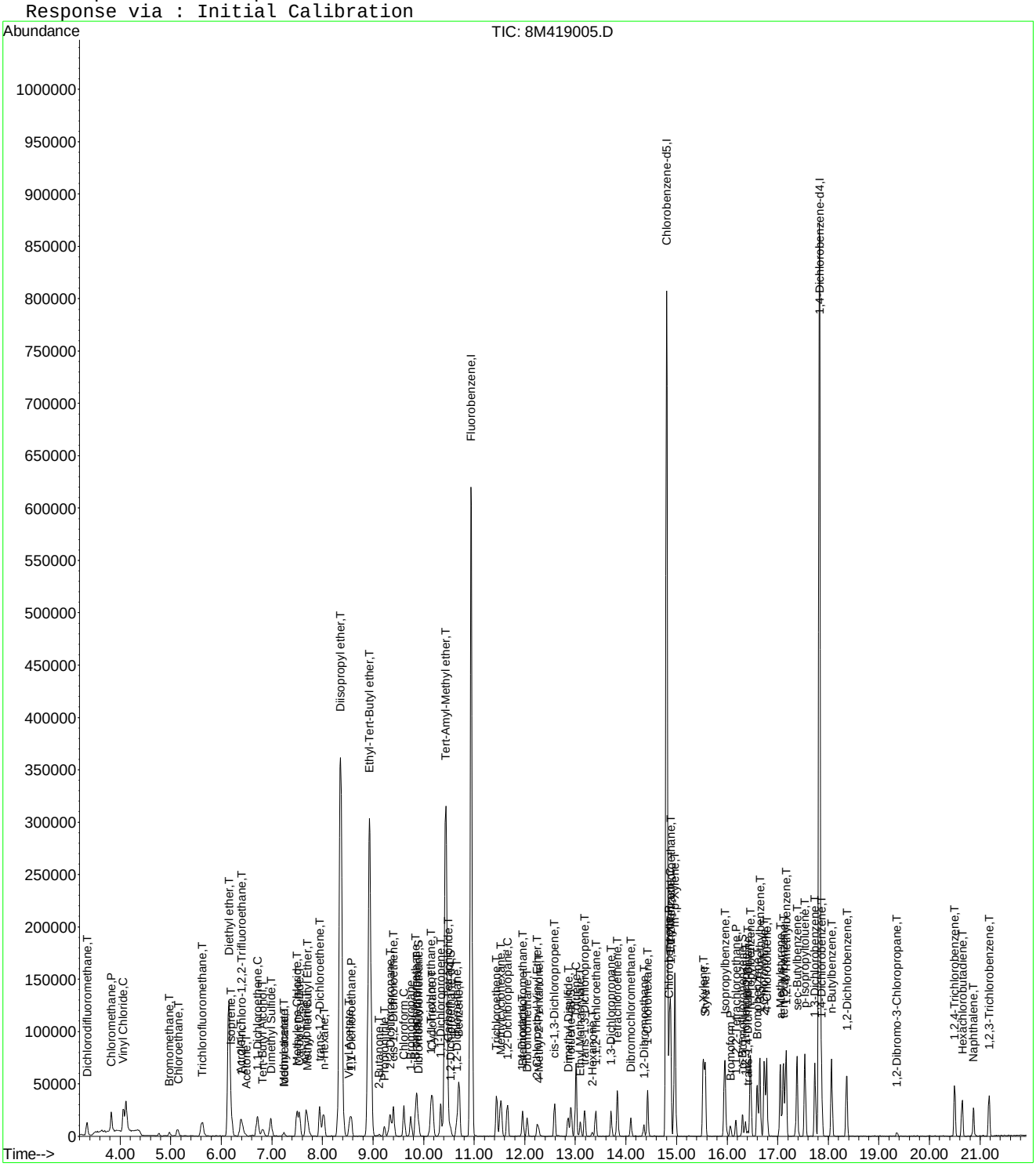
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	17154	1.9189 ug/L		100
46)	Benzene	10.70	78	65094	2.0026 ug/L		98
47)	Trichloroethene	11.44	130	17338	1.8988 ug/L		94
48)	Methylcyclohexane	11.52	83	22736	1.8679 ug/L		91
49)	1,2-Dichloropropane	11.66	63	15665	1.9732 ug/L		97
50)	Bromodichloromethane	11.96	83	20105	1.9351 ug/L		99
51)	1,4-Dioxane	11.95	88	1498	33.0951 ug/L		74
52)	Dibromomethane	12.05	93	8093	1.9809 ug/L		95
53)	2-Chloroethyl Vinyl Ether	12.25	63	5724	1.6664 ug/L		91
54)	4-Methyl-2-Pentanone	12.28	58	2383	1.5488 ug/L	#	73
55)	cis-1,3-Dichloropropene	12.59	75	21986	1.8582 ug/L		99
56)	Dimethyl Disulfide	12.86	79	7091	7.4642 ug/L		90
59)	Toluene	13.01	91	69700	2.0423 ug/L		98
60)	Ethyl Methacrylate	13.09	69	10905	1.6936 ug/L		84
62)	trans-1,3-Dichloropropene	13.19	75	17794	1.7978 ug/L		98
63)	1,1,2-Trichloroethane	13.40	97	10978	1.9551 ug/L		92
64)	2-Hexanone	13.33	58	1923	1.3955 ug/L	#	21
65)	1,3-Dichloropropane	13.70	76	18233	1.9209 ug/L		89
66)	Tetrachloroethene	13.83	164	13703	1.9115 ug/L		98
67)	Dibromochloromethane	14.10	129	13297	1.8429 ug/L		95
68)	1,2-Dibromoethane	14.36	107	10688	1.9487 ug/L		95
69)	1-Chlorohexane	14.43	91	20724	1.9193 ug/L		94
70)	Chlorobenzene	14.85	112	47662	1.9619 ug/L		90
71)	1,1,1,2-Tetrachloroethane	14.88	131	15693	1.8203 ug/L		97
72)	Ethylbenzene	14.87	106	26084	1.9171 ug/L		97
73)	m-,p-Xylene	14.97	106	60868	3.8629 ug/L		91
74)	o-Xylene	15.53	106	29031	1.8326 ug/L		95
75)	Styrene	15.56	104	45562	1.8345 ug/L		96
76)	Bromoform	16.07	173	6974	1.9520 ug/L		96
77)	Isopropylbenzene	15.96	105	75544	1.9916 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	11188	1.9280 ug/L		91
81)	1,2,3-Trichloropropane	16.36	110	3124	1.8778 ug/L		76
82)	trans-1,4-Dichloro-2-Buten	16.41	53	1589	1.7434 ug/L	#	37
83)	n-Propylbenzene	16.46	91	90826	2.1100 ug/L		99
84)	Bromobenzene	16.60	156	19940	1.9771 ug/L		98
85)	1,3,5-Trimethylbenzene	16.65	105	62132	1.9935 ug/L		99
86)	2-Chlorotoluene	16.73	91	56721	1.9302 ug/L		87
87)	4-Chlorotoluene	16.78	91	60016	2.2662 ug/L		88
88)	a-Methylstyrene	17.05	118	30045	1.7194 ug/L		99
89)	tert-Butylbenzene	17.12	134	13646	1.9338 ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	64473	2.0262 ug/L		99
91)	sec-Butylbenzene	17.38	105	80995	2.0748 ug/L		96
92)	p-Isopropyltoluene	17.54	119	64103	1.9501 ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	38573	1.9731 ug/L		98
94)	1,4-Dichlorobenzene	17.87	146	39209	1.9728 ug/L		84
95)	n-Butylbenzene	18.07	91	57496	1.9417 ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	34361	2.0008 ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.36	75	1793	1.8985 ug/L		85
98)	1,2,4-Trichlorobenzene	20.49	180	21702	1.8770 ug/L		93
99)	Hexachlorobutadiene	20.65	225	10481	1.9480 ug/L		99
100)	Naphthalene	20.87	128	30316	1.8348 ug/L		95
101)	1,2,3-Trichlorobenzene	21.18	180	17347	1.8067 ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419005.D 8260WT.M Tue Apr 18 11:58:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:42 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7090	14.6	100	0.00
3	P	Chloromethane	2.0000	2.0826	-4.1	100	0.00
4	C	Vinyl Chloride	2.0000	2.0720	-3.6	100	0.00
5	T	1,3-Butadiene	-1.0000	-15.5080	0.0	0	0.03
6	T	Bromomethane	2.0000	1.8796	6.0	100	0.00
7	T	Chloroethane	2.0000	1.9802	1.0	100	0.02
8	T	Trichlorofluoromethane	2.0000	1.8941	5.3	100	0.02
9	T	Diethyl ether	25.0000	24.4479	2.2	100	0.00
10	T	Isoprene	-1.0000	1.8530	0.0	100	0.00
11	T	Acrolein	12.5000	12.3674	1.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8461	7.7	100	0.00
13	T	Acetone	-1.0000	1.9772	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.8975	5.1	100	0.02
15	T	Tert-Butyl Alcohol	50.0000	42.0951	15.8	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.8968	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.3475	0.0	0	0.02
18	T	Methyl acetate	-1.0000	2.0602	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.8827	5.9	100	0.00
20	T	Carbon Disulfide	2.0000	1.9769	1.2	100	0.00
21	T	Acrylonitrile	12.5000	11.4657	8.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.8483	7.6	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9798	1.0	100	0.00
24	T	n-Hexane	-1.0000	2.0068	0.0	100	0.02
25	T	Diisopropyl ether	25.0000	25.1670	-0.7	100	0.00
26	T	Vinyl Acetate	-1.0000	1.8772	0.0	100	0.00
27	P	1,1-Dichloroethane	2.0000	1.9259	3.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	24.2936	2.8	100	0.00
29	T	2-Butanone	-1.0000	1.7126	0.0	100	0.00
30	T	Propionitrile	25.0000	22.9166	8.3	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0053	-0.3	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9338	3.3	100	0.00
33	C	Chloroform	2.0000	1.9850	0.8	100	0.00
34		1-Bromopropane	2.0000	1.8543	7.3	100	0.00
35	T	Bromochloromethane	2.0000	1.9850	0.8	100	-0.01
36	T	Tetrahydrofuran	25.0000	23.0121	8.0	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9585	4.2	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.8765	6.2	100	0.00
39	T	Cyclohexane	2.0000	1.8965	5.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9191	4.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.1049	3.6	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.9082	4.6	100	0.02
43	S	1,2-Dichloroethane-d4	1.0000	0.9482	5.2	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	2.0000	1.9189	4.1	100	0.00
46	T	Benzene	2.0000	2.0026	-0.1	100	0.00
47	T	Trichloroethene	2.0000	1.8988	5.1	100	0.00
48	T	Methylcyclohexane	-1.0000	1.8679	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	1.9732	1.3	100	0.00
50	T	Bromodichloromethane	2.0000	1.9351	3.2	100	0.00
51	T	1,4-Dioxane	-1.0000	33.0951	0.0	100	0.00
52	T	Dibromomethane	2.0000	1.9809	1.0	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.6664	16.7	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	1.5488	0.0	100	0.00

(#) = Out of Range
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419005.D Vial: 6
Acq On : 17 Apr 2017 15:25 Operator: TMB
Sample : WG610410-05 2ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8582	7.1	100	0.00
56	T	Dimethyl Disulfide	-1.0000	7.4642	0.0	0	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	0.9855	1.4	100	0.00
59	C	Toluene	2.0000	2.0423	-2.1	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.6936	15.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	2.0000	1.7978	10.1	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9551	2.2	100	0.00
64	T	2-Hexanone	-1.0000	1.3955	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9209	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9115	4.4	100	0.00
67	T	Dibromochloromethane	2.0000	1.8429	7.9	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9487	2.6	100	0.00
69	T	1-Chlorohexane	2.0000	1.9193	4.0	100	0.00
70	P	Chlorobenzene	2.0000	1.9619	1.9	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8203	9.0	100	0.00
72	C	Ethylbenzene	2.0000	1.9171	4.1	100	-0.01
73	T	m-,p-Xylene	4.0000	3.8629	3.4	100	0.00
74	T	o-Xylene	2.0000	1.8326	8.4	100	0.00
75	T	Styrene	2.0000	1.8345	8.3	100	0.00
76	P	Bromoform	2.0000	1.9520	2.4	100	0.02
77	T	Isopropylbenzene	2.0000	1.9916	0.4	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9280	3.6	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0161	-1.6	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8778	6.1	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7434	12.8	100	0.00
83	T	n-Propylbenzene	2.0000	2.1100	-5.5	100	0.00
84	T	Bromobenzene	2.0000	1.9771	1.1	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	1.9935	0.3	100	0.00
86	T	2-Chlorotoluene	2.0000	1.9302	3.5	100	0.00
87	T	4-Chlorotoluene	2.0000	2.2662	-13.3	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7194	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	1.9338	3.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	2.0262	-1.3	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0748	-3.7	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9501	2.5	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	1.9731	1.3	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9728	1.4	100	0.00
95	T	n-Butylbenzene	2.0000	1.9417	2.9	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	2.0008	-0.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.8985	5.1	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.8770	6.2	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.9480	2.6	100	0.00
100	T	Naphthalene	2.0000	1.8348	8.3	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8067	9.7	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419005.D 8260WT.M Tue Apr 18 12:00:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	778912	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	612991	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	325196	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	19042	2.3308	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	9.32%#		
43) 1,2-Dichloroethane-d4	10.53	65	17061	2.4156	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	9.68%#		
58) Toluene-d8	12.91	98	67864	2.4230	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	9.68%#		
80) p-Bromofluorobenzene	16.30	95	27271	2.3761	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	9.52%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	43158	4.0943	ug/L	99
3) Chloromethane	3.83	50	64959	4.9293	ug/L	98
4) Vinyl Chloride	4.06	62	61310	4.9264	ug/L	99
5) 1,3-Butadiene	4.11	54	42524	3.2475	ug/L	80
6) Bromomethane	4.97	94	11598	3.9117	ug/L	96
7) Chloroethane	5.13	64	26632	4.8991	ug/L	96
8) Trichlorofluoromethane	5.62	101	65432	4.8407	ug/L	98
9) Diethyl ether	6.15	59	254455	49.9827	ug/L	91
10) Isoprene	6.19	67	49212	4.6047	ug/L	89
11) Acrolein	6.38	56	18060	25.6156	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	36923	4.7903	ug/L	99
13) Acetone	6.49	43	5612	5.1228	ug/L	83
14) 1,1-Dichloroethene	6.72	61	54337	4.8168	ug/L	92
15) Tert-Butyl Alcohol	6.82	59	38399	108.1334	ug/L	97
16) Dimethyl Sulfide	6.98	62	36188	4.8162	ug/L	88
17) Iodomethane	7.24	142	4078	1.2101	ug/L	89
18) Methyl acetate	7.25	43	15352	5.1176	ug/L #	85
19) Methylene Chloride	7.49	84	38847	4.7920	ug/L	82
20) Carbon Disulfide	7.55	76	116168	4.9528	ug/L	98
21) Acrylonitrile	7.67	53	38351	25.2377	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	78139	4.8920	ug/L	96
23) trans-1,2-Dichloroethene	7.95	61	52084	4.7457	ug/L	95
24) n-Hexane	8.02	57	46838	5.1127	ug/L	96
25) Diisopropyl ether	8.35	45	1253906	51.0432	ug/L	95
26) Vinyl Acetate	8.53	43	55036	4.9952	ug/L	92
27) 1,1-Dichloroethane	8.57	63	68755	4.8676	ug/L	98
28) Ethyl-Tert-Butyl ether	8.93	59	1064807	50.9683	ug/L	97
29) 2-Butanone	9.12	43	8240	4.7964	ug/L	80
30) Propionitrile	9.22	54	27971	52.5317	ug/L	100
31) 2,2-Dichloropropane	9.33	77	58069	4.8700	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	44615	4.9182	ug/L	96
33) Chloroform	9.61	83	71537	4.5709	ug/L	96
34) 1-Bromopropane	9.75	122	8516	4.7588	ug/L	99
35) Bromochloromethane	9.84	130	24918	5.0905	ug/L	91
36) Tetrahydrofuran	9.86	42	59759	50.5323	ug/L	85
38) 1,1,1-Trichloroethane	10.14	97	61305	4.8538	ug/L	98
39) Cyclohexane	10.17	56	57878	4.9219	ug/L	89
40) 1,1-Dichloropropene	10.34	75	52556	4.7657	ug/L	98
41) Tert-Amyl-Methyl ether	10.43	73	963240	51.4900	ug/L	97
42) Carbon Tetrachloride	10.48	117	56505	4.8249	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:43 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

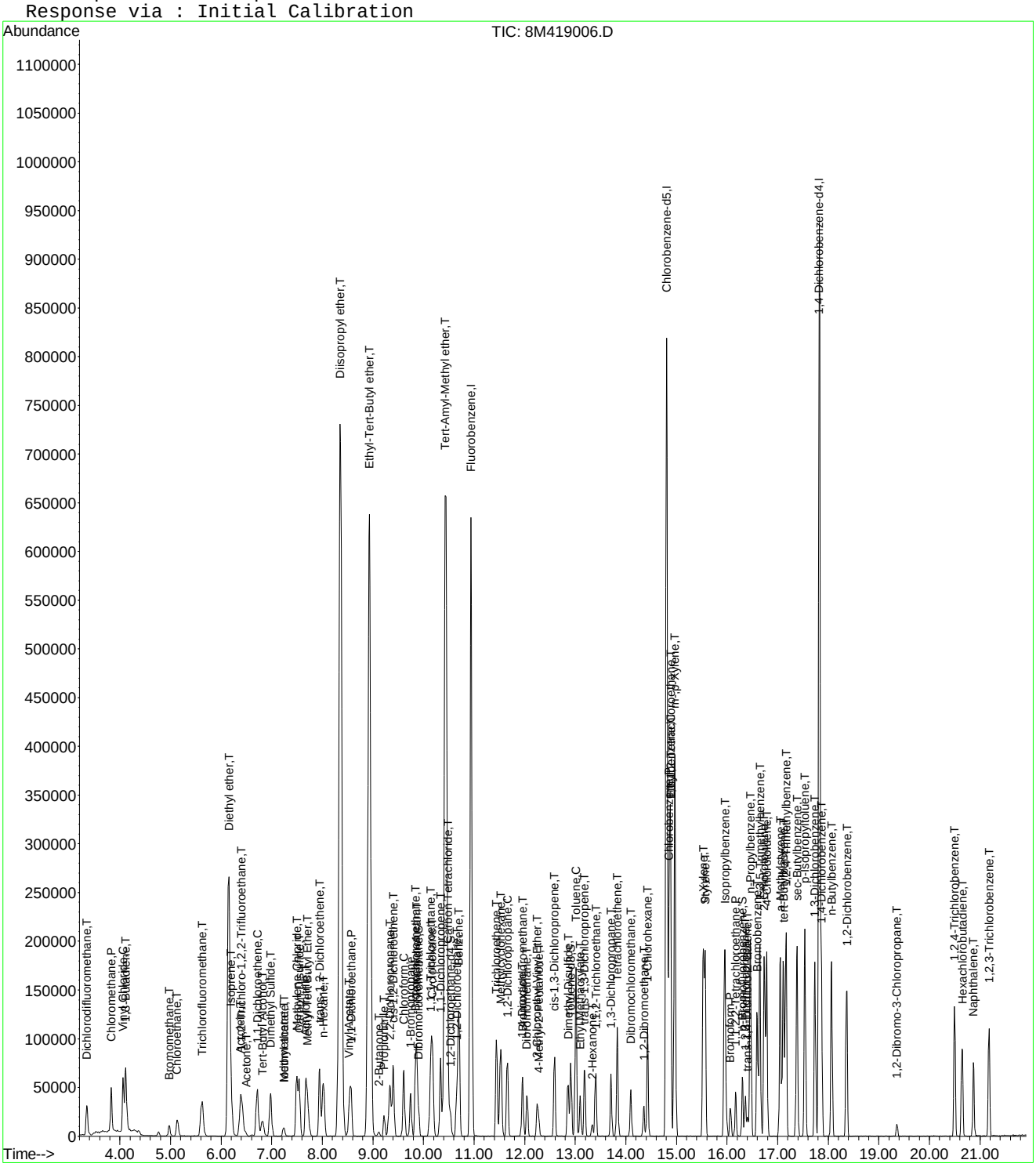
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	43458	4.9106	ug/L		97
46)	Benzene	10.70	78	157813	4.9044	ug/L		96
47)	Trichloroethene	11.44	130	42638	4.7169	ug/L		97
48)	Methylcyclohexane	11.52	83	57749	4.7926	ug/L		95
49)	1,2-Dichloropropane	11.66	63	37898	4.8221	ug/L		94
50)	Bromodichloromethane	11.96	83	49682	4.8305	ug/L		98
51)	1,4-Dioxane	11.95	88	4215	94.0662	ug/L		87
52)	Dibromomethane	12.04	93	20146	4.9810	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.25	63	15782	4.6410	ug/L		93
54)	4-Methyl-2-Pentanone	12.28	58	6536	4.2910	ug/L		95
55)	cis-1,3-Dichloropropene	12.59	75	56759	4.8458	ug/L		99
56)	Dimethyl Disulfide	12.86	79	20741	5.9847	ug/L		89
59)	Toluene	13.01	91	173564	5.0867	ug/L		97
60)	Ethyl Methacrylate	13.10	69	30943	4.8067	ug/L		84
62)	trans-1,3-Dichloropropene	13.18	75	47647	4.8150	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	27951	4.9790	ug/L		97
64)	2-Hexanone	13.33	58	5889	4.2746	ug/L	#	80
65)	1,3-Dichloropropane	13.71	76	45722	4.8179	ug/L		84
66)	Tetrachloroethene	13.83	164	34889	4.8678	ug/L		97
67)	Dibromochloromethane	14.10	129	35461	4.9157	ug/L		98
68)	1,2-Dibromoethane	14.36	107	27169	4.9547	ug/L		98
69)	1-Chlorohexane	14.43	91	52484	4.8617	ug/L		91
70)	Chlorobenzene	14.85	112	114782	4.7258	ug/L		100
71)	1,1,1,2-Tetrachloroethane	14.88	131	41080	4.7660	ug/L		99
72)	Ethylbenzene	14.88	106	62867	4.6214	ug/L		90
73)	m-,p-Xylene	14.97	106	153807	9.7633	ug/L		91
74)	o-Xylene	15.53	106	76425	4.8253	ug/L		99
75)	Styrene	15.57	104	122002	4.9133	ug/L		98
76)	Bromoform	16.06	173	19962	4.5235	ug/L		95
77)	Isopropylbenzene	15.96	105	195151	5.1460	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.17	83	30245	4.9291	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	8507	4.8359	ug/L		83
82)	trans-1,4-Dichloro-2-Buten	16.40	53	5523	4.2935	ug/L		74
83)	n-Propylbenzene	16.47	91	234652	5.1554	ug/L		99
84)	Bromobenzene	16.60	156	52847	4.9554	ug/L		96
85)	1,3,5-Trimethylbenzene	16.65	105	163016	4.9464	ug/L		99
86)	2-Chlorotoluene	16.73	91	166031	5.3432	ug/L		95
87)	4-Chlorotoluene	16.79	91	121429	4.3363	ug/L		100
88)	a-Methylstyrene	17.05	118	84298	4.5624	ug/L		95
89)	tert-Butylbenzene	17.12	134	34340	4.6022	ug/L		94
90)	1,2,4-Trimethylbenzene	17.17	105	167693	4.9841	ug/L		100
91)	sec-Butylbenzene	17.38	105	207005	5.0149	ug/L		100
92)	p-Isopropyltoluene	17.54	119	170789	4.9137	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	99857	4.8307	ug/L		97
94)	1,4-Dichlorobenzene	17.87	146	98681	4.6956	ug/L		94
95)	n-Butylbenzene	18.07	91	145988	4.6626	ug/L		98
96)	1,2-Dichlorobenzene	18.37	146	89702	4.9398	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	4713	4.7194	ug/L		90
98)	1,2,4-Trichlorobenzene	20.50	180	55429	4.5338	ug/L		97
99)	Hexachlorobutadiene	20.65	225	26149	4.5963	ug/L		99
100)	Naphthalene	20.87	128	81337	4.6555	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	44939	4.4263	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419006.D 8260WT.M Tue Apr 18 11:59:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.0943	18.1	100	-0.01
3	P	Chloromethane	5.0000	4.9293	1.4	100	0.01
4	C	Vinyl Chloride	5.0000	4.9264	1.5	100	0.01
5	T	1,3-Butadiene	5.0000	3.2475	35.0#	100	0.02
6	T	Bromomethane	5.0000	3.9117	21.8	100	0.01
7	T	Chloroethane	5.0000	4.8991	2.0	100	0.00
8	T	Trichlorofluoromethane	5.0000	4.8407	3.2	100	0.02
9	T	Diethyl ether	50.0000	49.9827	0.0	100	0.01
10	T	Isoprene	5.0000	4.6047	7.9	100	0.01
11	T	Acrolein	25.0000	25.6156	-2.5	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.7903	4.2	100	0.00
13	T	Acetone	5.0000	5.1228	-2.5	100	0.01
14	C	1,1-Dichloroethene	5.0000	4.8168	3.7	100	0.02
15	T	Tert-Butyl Alcohol	100.0000	108.1334	-8.1	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8162	3.7	100	0.00
17	T	Iodomethane	5.0000	1.2101	75.8#	100	0.01
18	T	Methyl acetate	5.0000	5.1176	-2.4	100	0.01
19	T	Methylene Chloride	5.0000	4.7920	4.2	100	0.00
20	T	Carbon Disulfide	5.0000	4.9528	0.9	100	0.00
21	T	Acrylonitrile	25.0000	25.2377	-1.0	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	4.8920	2.2	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.7457	5.1	100	0.01
24	T	n-Hexane	5.0000	5.1127	-2.3	100	0.01
25	T	Diisopropyl ether	50.0000	51.0432	-2.1	100	0.00
26	T	Vinyl Acetate	5.0000	4.9952	0.1	100	0.00
27	P	1,1-Dichloroethane	5.0000	4.8676	2.6	100	0.01
28	T	Ethyl-Tert-Butyl ether	50.0000	50.9683	-1.9	100	0.00
29	T	2-Butanone	5.0000	4.7964	4.1	100	0.01
30	T	Propionitrile	50.0000	52.5317	-5.1	100	0.00
31	T	2,2-Dichloropropane	5.0000	4.8700	2.6	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9182	1.6	100	0.00
33	C	Chloroform	5.0000	4.5709	8.6	100	0.01
34		1-Bromopropane	5.0000	4.7588	4.8	100	0.00
35	T	Bromochloromethane	5.0000	5.0905	-1.8	100	-0.01
36	T	Tetrahydrofuran	50.0000	50.5323	-1.1	100	0.00
37	S	Dibromofluoromethane	2.5000	2.3308	6.8	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8538	2.9	100	0.00
39	T	Cyclohexane	5.0000	4.9219	1.6	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.7657	4.7	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	51.4900	-3.0	100	-0.01
42	T	Carbon Tetrachloride	5.0000	4.8249	3.5	100	0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4156	3.4	100	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	5.0000	4.9106	1.8	100	0.00
46	T	Benzene	5.0000	4.9044	1.9	100	0.00
47	T	Trichloroethene	5.0000	4.7169	5.7	100	0.00
48	T	Methylcyclohexane	5.0000	4.7926	4.1	100	0.00
49	C	1,2-Dichloropropane	5.0000	4.8221	3.6	100	0.01
50	T	Bromodichloromethane	5.0000	4.8305	3.4	100	0.00
51	T	1,4-Dioxane	100.0000	94.0662	5.9	100	0.00
52	T	Dibromomethane	5.0000	4.9810	0.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	4.6410	7.2	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.2910	14.2	100	0.00

(#) = Out of Range
8M419006.D 8260WT.M Tue Apr 18 12:00:23 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419006.D Vial: 7
Acq On : 17 Apr 2017 15:54 Operator: TMB
Sample : WG610410-06 5ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	4.8458	3.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	5.9847	-19.7	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.4230	3.1	100	0.00
59	C	Toluene	5.0000	5.0867	-1.7	100	0.00
60	T	Ethyl Methacrylate	5.0000	4.8067	3.9	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	5.0000	4.8150	3.7	100	-0.01
63	T	1,1,2-Trichloroethane	5.0000	4.9790	0.4	100	0.00
64	T	2-Hexanone	5.0000	4.2745	14.5	100	0.00
65	T	1,3-Dichloropropane	5.0000	4.8179	3.6	100	0.00
66	T	Tetrachloroethene	5.0000	4.8678	2.6	100	0.00
67	T	Dibromochloromethane	5.0000	4.9157	1.7	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9547	0.9	100	0.00
69	T	1-Chlorohexane	5.0000	4.8617	2.8	100	0.00
70	P	Chlorobenzene	5.0000	4.7258	5.5	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.7660	4.7	100	0.01
72	C	Ethylbenzene	5.0000	4.6214	7.6	100	0.00
73	T	m-,p-Xylene	10.0000	9.7632	2.4	100	0.00
74	T	o-Xylene	5.0000	4.8253	3.5	100	0.01
75	T	Styrene	5.0000	4.9133	1.7	100	0.00
76	P	Bromoform	5.0000	4.5235	9.5	100	0.01
77	T	Isopropylbenzene	5.0000	5.1460	-2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	4.9291	1.4	100	-0.01
80	S	p-Bromofluorobenzene	2.5000	2.3761	5.0	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	4.8359	3.3	100	0.06
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.2935	14.1	100	0.00
83	T	n-Propylbenzene	5.0000	5.1554	-3.1	100	0.01
84	T	Bromobenzene	5.0000	4.9554	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9464	1.1	100	0.01
86	T	2-Chlorotoluene	5.0000	5.3432	-6.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.3363	13.3	100	0.00
88	T	a-Methylstyrene	5.0000	4.5624	8.8	100	0.00
89	T	tert-Butylbenzene	5.0000	4.6022	8.0	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9841	0.3	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0149	-0.3	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9136	1.7	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8308	3.4	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.6956	6.1	100	0.00
95	T	n-Butylbenzene	5.0000	4.6626	6.7	100	0.01
96	T	1,2-Dichlorobenzene	5.0000	4.9398	1.2	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	4.7194	5.6	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.5338	9.3	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.5963	8.1	100	0.00
100	T	Naphthalene	5.0000	4.6555	6.9	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.4263	11.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419006.D 8260WT.M Tue Apr 18 12:00:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	821977	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	642967	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	340149	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	85773	9.9487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 39.80%#			
43) 1,2-Dichloroethane-d4	10.53	65	74599	10.0087	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.04%#			
58) Toluene-d8	12.91	98	304223	10.3554	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 41.44%#			
80) p-Bromofluorobenzene	16.30	95	119256	9.9340	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 39.72%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	252364	22.6868	ug/L	99
3) Chloromethane	3.83	50	287414	20.6672	ug/L	98
4) Vinyl Chloride	4.06	62	282320	21.4964	ug/L	98
5) 1,3-Butadiene	4.11	54	161495	28.2603	ug/L	87
6) Bromomethane	4.97	94	81674	20.2735	ug/L	99
7) Chloroethane	5.13	64	120257	20.9628	ug/L	97
8) Trichlorofluoromethane	5.62	101	297058	20.8251	ug/L	100
9) Diethyl ether	6.15	59	415326	77.3083	ug/L	91
10) Isoprene	6.19	67	213582	18.9375	ug/L	91
11) Acrolein	6.38	56	27406	36.8350	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.41	101	166401	20.4573	ug/L	99
13) Acetone	6.48	43	21719	18.7871	ug/L	94
14) 1,1-Dichloroethene	6.72	61	247619	20.8008	ug/L	96
15) Tert-Butyl Alcohol	6.82	59	55617	148.4145	ug/L	99
16) Dimethyl Sulfide	6.98	62	148417	18.7178	ug/L	90
17) Iodomethane	7.24	142	44249	12.4422	ug/L	90
18) Methyl acetate	7.24	43	60034	18.9640	ug/L	90
19) Methylene Chloride	7.49	84	172623	20.1783	ug/L	82
20) Carbon Disulfide	7.55	76	479534	19.3736	ug/L	99
21) Acrylonitrile	7.67	53	64007	39.9143	ug/L	100
22) Methyl Tert Butyl Ether	7.70	73	348421	20.6705	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	236570	20.4261	ug/L	96
24) n-Hexane	8.02	57	182974	18.9267	ug/L	91
25) Diisopropyl ether	8.36	45	2083333	80.3637	ug/L	95
26) Vinyl Acetate	8.53	43	230138	19.7935	ug/L	95
27) 1,1-Dichloroethane	8.57	63	311422	20.8926	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	1753329	79.5282	ug/L	97
29) 2-Butanone	9.12	43	34263	18.8992	ug/L	91
30) Propionitrile	9.22	54	43804	77.9572	ug/L	100
31) 2,2-Dichloropropane	9.34	77	262688	20.8761	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	197079	20.5872	ug/L	94
33) Chloroform	9.61	83	315049	19.0755	ug/L	99
34) 1-Bromopropane	9.75	122	36957	19.5700	ug/L	98
35) Bromochloromethane	9.84	130	109675	21.2316	ug/L	94
36) Tetrahydrofuran	9.86	42	95917	76.8581	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	279934	21.0024	ug/L	99
39) Cyclohexane	10.17	56	235278	18.9596	ug/L	91
40) 1,1-Dichloropropene	10.34	75	238994	20.5364	ug/L	99
41) Tert-Amyl-Methyl ether	10.44	73	1574273	79.7438	ug/L	98
42) Carbon Tetrachloride	10.48	117	265448	21.4787	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:04 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:44:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

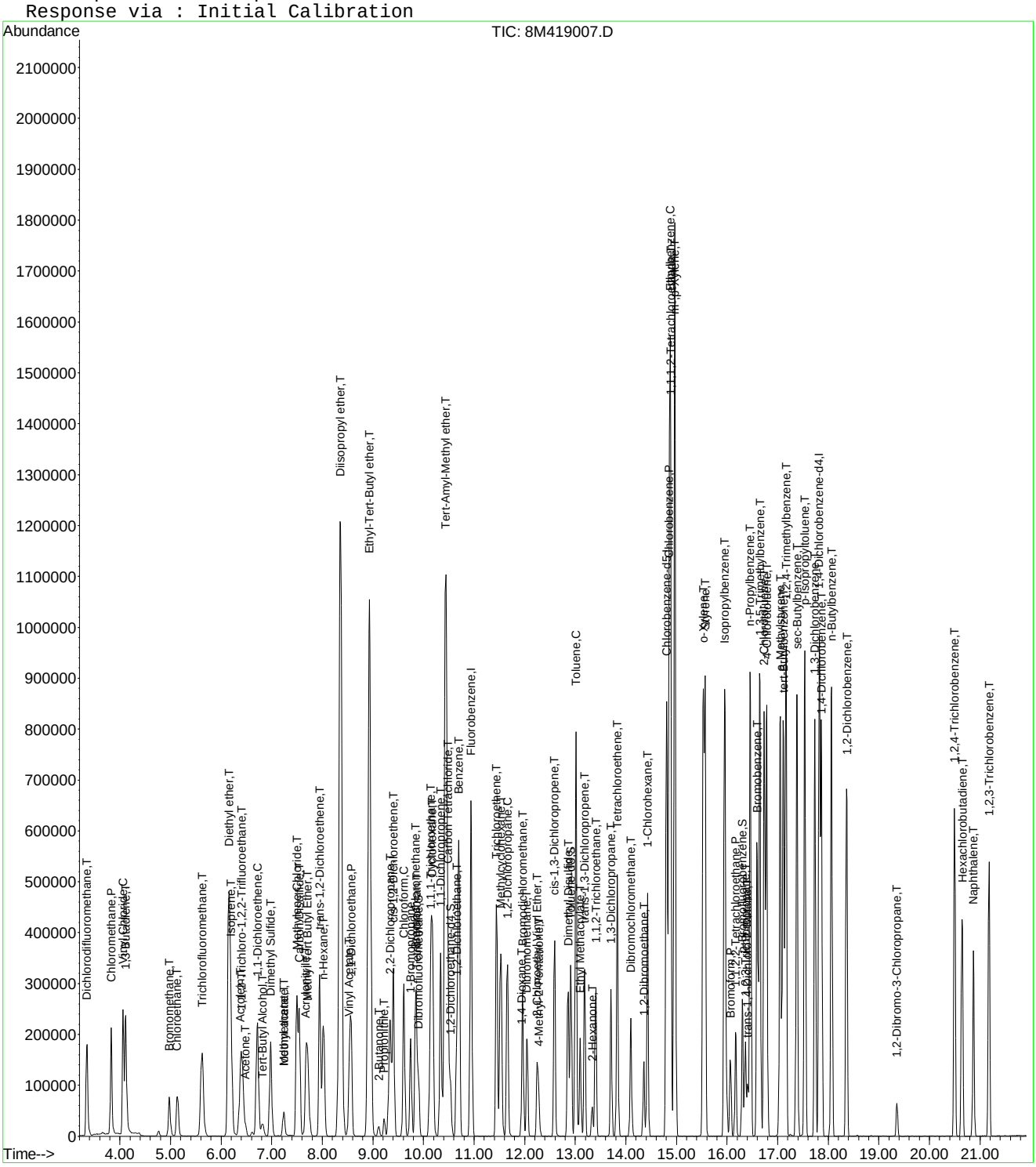
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	195832	20.9688	ug/L	96
46)	Benzene	10.70	78	711384	20.9494	ug/L	96
47)	Trichloroethene	11.44	130	193633	20.2988	ug/L	98
48)	Methylcyclohexane	11.53	83	242870	19.0998	ug/L	96
49)	1,2-Dichloropropane	11.66	63	168889	20.3636	ug/L	95
50)	Bromodichloromethane	11.96	83	229920	21.1836	ug/L	99
51)	1,4-Dioxane	11.94	88	6600	139.5754	ug/L	85
52)	Dibromomethane	12.04	93	90632	21.2345	ug/L	100
53)	2-Chloroethyl Vinyl Ether	12.25	63	69708	19.4252	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	29890	18.5953	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	263367	21.3068	ug/L	99
56)	Dimethyl Disulfide	12.86	79	111248	17.7360	ug/L	95
59)	Toluene	13.01	91	775026	21.6549	ug/L	99
60)	Ethyl Methacrylate	13.10	69	134570	19.9297	ug/L	85
62)	trans-1,3-Dichloropropene	13.19	75	216517	20.8604	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	122992	20.8877	ug/L	97
64)	2-Hexanone	13.33	58	27313	18.9010	ug/L	86
65)	1,3-Dichloropropane	13.71	76	210672	21.1642	ug/L	88
66)	Tetrachloroethene	13.83	164	159386	21.2013	ug/L	98
67)	Dibromochloromethane	14.10	129	162011	21.4115	ug/L	100
68)	1,2-Dibromoethane	14.36	107	124514	21.6484	ug/L	98
69)	1-Chlorohexane	14.43	91	226576	20.0098	ug/L	94
70)	Chlorobenzene	14.85	112	518298	20.3445	ug/L	96
71)	1,1,1,2-Tetrachloroethane	14.88	131	195026	21.5715	ug/L	99
72)	Ethylbenzene	14.87	106	295348	20.6992	ug/L	97
73)	m-,p-Xylene	14.97	106	708993	42.9068	ug/L	96
74)	o-Xylene	15.54	106	341856	20.5778	ug/L	100
75)	Styrene	15.57	104	572956	21.9986	ug/L	97
76)	Bromoform	16.07	173	98140	19.0943	ug/L	98
77)	Isopropylbenzene	15.95	105	862970	21.6948	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.17	83	138371	21.5592	ug/L	98
81)	1,2,3-Trichloropropane	16.36	110	38934	21.1594	ug/L	72
82)	trans-1,4-Dichloro-2-Buten	16.40	53	29562	19.3838	ug/L	86
83)	n-Propylbenzene	16.45	91	1035858	21.7579	ug/L	100
84)	Bromobenzene	16.60	156	233146	20.9007	ug/L	97
85)	1,3,5-Trimethylbenzene	16.65	105	744817	21.6064	ug/L	99
86)	2-Chlorotoluene	16.73	91	638655	19.6497	ug/L	93
87)	4-Chlorotoluene	16.79	91	644553	22.0056	ug/L	99
88)	a-Methylstyrene	17.05	118	368766	19.0812	ug/L	97
89)	tert-Butylbenzene	17.12	134	159935	20.4918	ug/L	94
90)	1,2,4-Trimethylbenzene	17.17	105	766585	21.7826	ug/L	98
91)	sec-Butylbenzene	17.39	105	933219	21.6142	ug/L	99
92)	p-Isopropyltoluene	17.54	119	792583	21.8005	ug/L	98
93)	1,3-Dichlorobenzene	17.74	146	452988	20.9507	ug/L	97
94)	1,4-Dichlorobenzene	17.87	146	445404	20.2622	ug/L	99
95)	n-Butylbenzene	18.07	91	716182	21.8682	ug/L	100
96)	1,2-Dichlorobenzene	18.37	146	397181	20.9107	ug/L	97
97)	1,2-Dibromo-3-Chloropropan	19.36	75	20637	19.7567	ug/L	92
98)	1,2,4-Trichlorobenzene	20.50	180	259021	20.2551	ug/L	99
99)	Hexachlorobutadiene	20.65	225	122095	20.5178	ug/L	100
100)	Naphthalene	20.87	128	379929	20.7902	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	218288	20.5554	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419007.D 8260WT.M Tue Apr 18 11:59:05 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419007.D Vial: 8
Acq On : 17 Apr 2017 16:24 Operator: TMB
Sample : WG610410-07 20ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:44 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419007.D 8260WT.M Tue Apr 18 11:59:06 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.93	96	830845	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	667165	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	355416	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	225758	25.9058	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.64%			
43) 1,2-Dichloroethane-d4	10.53	65	196828	26.1260	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.52%			
58) Toluene-d8	12.91	98	790662	25.9370	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.76%			
80) p-Bromofluorobenzene	16.30	95	316705	25.2481	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	614921	54.6895	ug/L	100
3) Chloromethane	3.82	50	669133	47.6020	ug/L	99
4) Vinyl Chloride	4.06	62	646175	48.6760	ug/L	98
5) 1,3-Butadiene	4.10	54	271666	52.3987	ug/L	95
6) Bromomethane	4.97	94	247075	50.8432	ug/L	99
7) Chloroethane	5.14	64	294319	50.7572	ug/L	96
8) Trichlorofluoromethane	5.62	101	725121	50.2916	ug/L	99
9) Diethyl ether	6.15	59	532757	98.1084	ug/L	92
10) Isoprene	6.18	67	574160	50.3651	ug/L	91
11) Acrolein	6.39	56	36832	48.9756	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	415693	50.5596	ug/L	99
13) Acetone	6.48	43	59341	50.7827	ug/L	93
14) 1,1-Dichloroethene	6.71	61	615843	51.1806	ug/L	96
15) Tert-Butyl Alcohol	6.81	59	75781	200.0639	ug/L	99
16) Dimethyl Sulfide	6.98	62	398383	49.7064	ug/L	89
17) Iodomethane	7.23	142	201159	55.9595	ug/L	95
18) Methyl acetate	7.23	43	161579	50.4959	ug/L	92
19) Methylene Chloride	7.49	84	428023	49.4986	ug/L	84
20) Carbon Disulfide	7.54	76	1268101	50.6857	ug/L	100
21) Acrylonitrile	7.68	53	87950	54.2596	ug/L	97
22) Methyl Tert Butyl Ether	7.70	73	877515	51.5041	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	586042	50.0603	ug/L	95
24) n-Hexane	8.02	57	481804	49.3054	ug/L	92
25) Diisopropyl ether	8.35	45	2603190	99.3452	ug/L	96
26) Vinyl Acetate	8.53	43	596735	50.7757	ug/L	95
27) 1,1-Dichloroethane	8.57	63	767008	50.9075	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2222589	99.7371	ug/L	98
29) 2-Butanone	9.12	43	93741	51.1549	ug/L	90
30) Propionitrile	9.22	54	56850	100.0950	ug/L	99
31) 2,2-Dichloropropane	9.33	77	643624	50.6036	ug/L	100
32) cis-1,2-Dichloroethene	9.40	96	492349	50.8826	ug/L	96
33) Chloroform	9.61	83	775769	46.4696	ug/L	98
34) 1-Bromopropane	9.75	122	94615	49.5670	ug/L	98
35) Bromochloromethane	9.84	130	277955	53.2340	ug/L	94
36) Tetrahydrofuran	9.86	42	125929	99.8297	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	697375	51.7630	ug/L	99
39) Cyclohexane	10.17	56	629161	50.1591	ug/L	91
40) 1,1-Dichloropropene	10.34	75	585776	49.7976	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	2000715	100.2633	ug/L	97
42) Carbon Tetrachloride	10.48	117	654658	52.4061	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:07 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 08:45:12 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:44:40 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

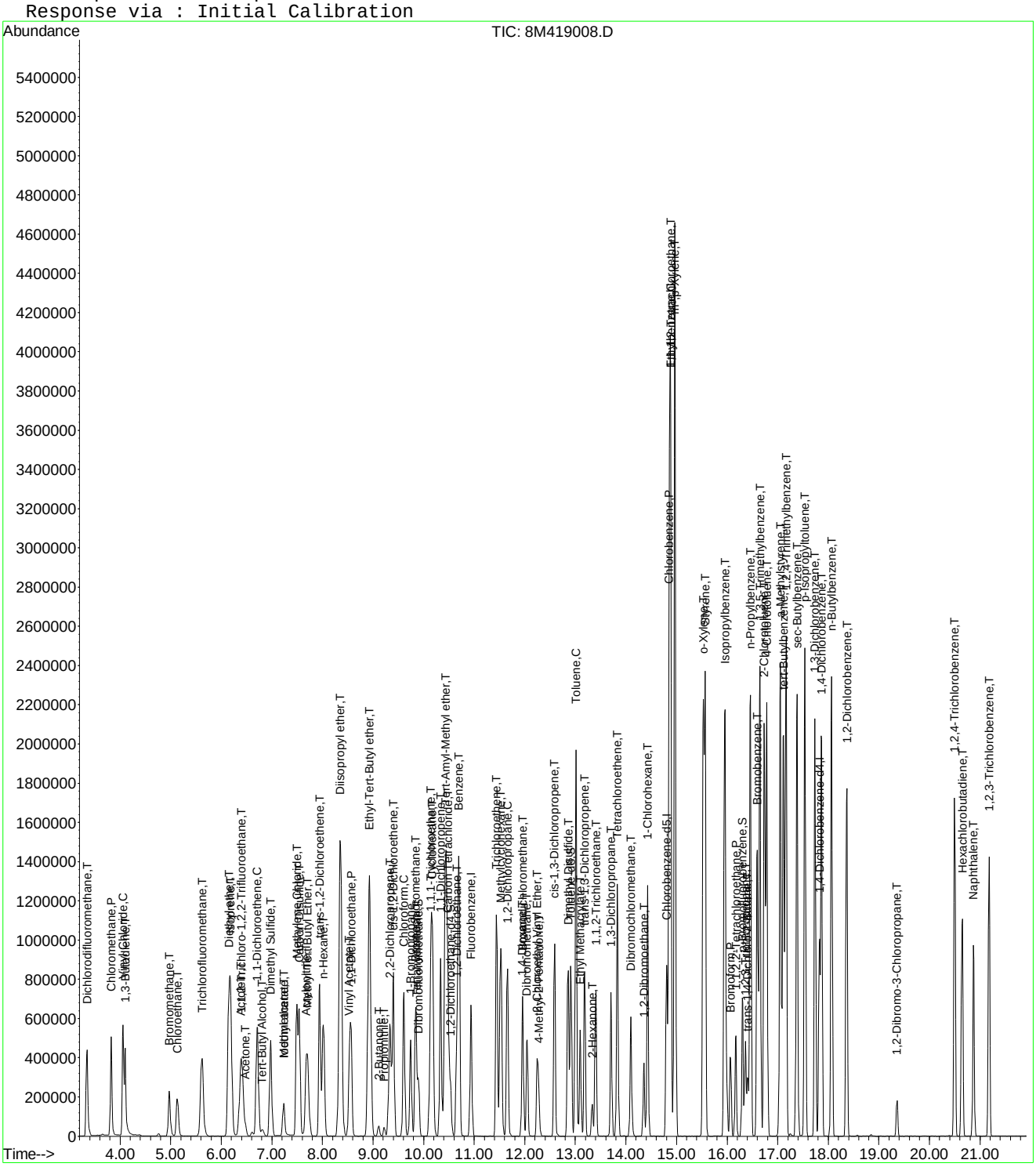
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	486966	51.5856	ug/L	96
46)	Benzene	10.70	78	1734691	50.5393	ug/L	95
47)	Trichloroethene	11.44	130	482430	50.0340	ug/L	98
48)	Methylcyclohexane	11.52	83	641638	49.9211	ug/L	95
49)	1,2-Dichloropropane	11.66	63	424777	50.6703	ug/L	95
50)	Bromodichloromethane	11.96	83	576854	52.5810	ug/L	98
51)	1,4-Dioxane	11.95	88	10143	212.2125	ug/L	95
52)	Dibromomethane	12.04	93	226605	52.5254	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.25	63	188674	52.0156	ug/L	98
54)	4-Methyl-2-Pentanone	12.28	58	83519	51.4047	ug/L	100
55)	cis-1,3-Dichloropropene	12.59	75	670536	53.6685	ug/L	99
56)	Dimethyl Disulfide	12.86	79	333317	46.4713	ug/L	95
59)	Toluene	13.01	91	1910471	51.4442	ug/L	99
60)	Ethyl Methacrylate	13.09	69	383134	54.6839	ug/L	86
62)	trans-1,3-Dichloropropene	13.19	75	563669	52.3371	ug/L	99
63)	1,1,2-Trichloroethane	13.40	97	305450	49.9930	ug/L	98
64)	2-Hexanone	13.33	58	78016	52.0300	ug/L	88
65)	1,3-Dichloropropane	13.70	76	530141	51.3266	ug/L	88
66)	Tetrachloroethene	13.83	164	393935	50.5000	ug/L	97
67)	Dibromochloromethane	14.10	129	424633	54.0844	ug/L	100
68)	1,2-Dibromoethane	14.36	107	314486	52.6944	ug/L	100
69)	1-Chlorohexane	14.43	91	601634	51.2055	ug/L	95
70)	Chlorobenzene	14.85	112	1317659	49.8455	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.88	131	513627	54.7508	ug/L	100
72)	Ethylbenzene	14.88	106	758538	51.2333	ug/L	99
73)	m-,p-Xylene	14.97	106	1805748	105.3165	ug/L	100
74)	o-Xylene	15.53	106	865202	50.1913	ug/L	99
75)	Styrene	15.56	104	1482377	54.8515	ug/L	96
76)	Bromoform	16.07	173	261596	48.1536	ug/L	100
77)	Isopropylbenzene	15.96	105	2152073	52.1403	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	351132	52.3588	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	102223	53.1686	ug/L	89
82)	trans-1,4-Dichloro-2-Buten	16.40	53	86624	53.2257	ug/L	89
83)	n-Propylbenzene	16.46	91	2542578	51.1120	ug/L	98
84)	Bromobenzene	16.60	156	600757	51.5423	ug/L	96
85)	1,3,5-Trimethylbenzene	16.65	105	1864667	51.7685	ug/L	97
86)	2-Chlorotoluene	16.73	91	1562483	46.0085	ug/L	82
87)	4-Chlorotoluene	16.78	91	1653591	54.0299	ug/L	92
88)	a-Methylstyrene	17.05	118	1034318	51.2201	ug/L	100
89)	tert-Butylbenzene	17.12	134	406063	49.7923	ug/L	95
90)	1,2,4-Trimethylbenzene	17.17	105	1948760	52.9955	ug/L	97
91)	sec-Butylbenzene	17.38	105	2311933	51.2464	ug/L	98
92)	p-Isopropyltoluene	17.54	119	1987599	52.3217	ug/L	99
93)	1,3-Dichlorobenzene	17.74	146	1155357	51.1399	ug/L	98
94)	1,4-Dichlorobenzene	17.87	146	1131775	49.2748	ug/L	99
95)	n-Butylbenzene	18.07	91	1806946	52.8040	ug/L	99
96)	1,2-Dichlorobenzene	18.37	146	1022039	51.4969	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	56496	51.7628	ug/L	90
98)	1,2,4-Trichlorobenzene	20.49	180	698538	52.2784	ug/L	99
99)	Hexachlorobutadiene	20.65	225	312987	50.3375	ug/L	98
100)	Naphthalene	20.87	128	1020583	53.4486	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583406	52.5775	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419008.D 8260WT.M Tue Apr 18 11:59:08 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419008.D Vial: 9
Acq On : 17 Apr 2017 16:54 Operator: TMB
Sample : WG610410-08 50ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 8:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419008.D 8260WT.M Tue Apr 18 11:59:09 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	890949	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	720891	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	383088	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	472717	52.5898	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 210.36%#			
43) 1,2-Dichloroethane-d4	10.53	65	409191	52.1214	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 208.48%#			
58) Toluene-d8	12.91	98	1637669	49.8807	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 199.52%#			
80) p-Bromofluorobenzene	16.30	95	659264	49.4208	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 197.68%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	1290950	114.7073	ug/L	99
3) Chloromethane	3.82	50	1428240	91.5868	ug/L	99
4) Vinyl Chloride	4.06	62	1309074	87.7619	ug/L	99
5) 1,3-Butadiene	4.10	54	464115	48.1221	ug/L	96
6) Bromomethane	4.97	94	643662	218.3047	ug/L	99
7) Chloroethane	5.13	64	642480	105.8029	ug/L	98
8) Trichlorofluoromethane	5.62	101	1556663	102.1329	ug/L	100
9) Diethyl ether	6.15	59	1193850	209.2873	ug/L	91
10) Isoprene	6.18	67	1256334	110.0441	ug/L	89
11) Acrolein	6.39	56	84264	106.8054	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	896546	103.8513	ug/L	98
13) Acetone	6.48	43	131839	107.1463	ug/L	95
14) 1,1-Dichloroethene	6.71	61	1340489	106.4797	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	161800	419.1836	ug/L	100
16) Dimethyl Sulfide	6.98	62	875323	107.2557	ug/L	91
17) Iodomethane	7.24	142	550506	330.5339	ug/L	94
18) Methyl acetate	7.24	43	350126	103.5017	ug/L	91
19) Methylene Chloride	7.49	84	940849	102.7095	ug/L	84
20) Carbon Disulfide	7.55	76	2734573	101.8614	ug/L	99
21) Acrylonitrile	7.68	53	192477	116.4657	ug/L	98
22) Methyl Tert Butyl Ether	7.70	73	1934910	108.5495	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	1292550	104.8396	ug/L	95
24) n-Hexane	8.02	57	1050655	101.8502	ug/L	92
25) Diisopropyl ether	8.36	45	5712696	202.4948	ug/L	97
26) Vinyl Acetate	8.53	43	1305418	104.1714	ug/L	95
27) 1,1-Dichloroethane	8.57	63	1685691	106.7005	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	4942845	209.1646	ug/L	98
29) 2-Butanone	9.12	43	205108	109.6264	ug/L	92
30) Propionitrile	9.22	54	127357	217.6184	ug/L	100
31) 2,2-Dichloropropane	9.33	77	1411824	105.4011	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	1085665	107.4406	ug/L	95
33) Chloroform	9.61	83	1687138	91.3508	ug/L	97
34) 1-Bromopropane	9.75	122	211298	107.4131	ug/L	100
35) Bromochloromethane	9.84	130	607058	113.4193	ug/L	94
36) Tetrahydrofuran	9.86	42	282824	212.9932	ug/L	86
38) 1,1,1-Trichloroethane	10.14	97	1536060	110.9408	ug/L	100
39) Cyclohexane	10.17	56	1386309	106.7139	ug/L	90
40) 1,1-Dichloropropene	10.34	75	1279941	102.9919	ug/L	98
41) Tert-Amyl-Methyl ether	10.44	73	4484638	212.9890	ug/L	97
42) Carbon Tetrachloride	10.48	117	1460831	114.3286	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

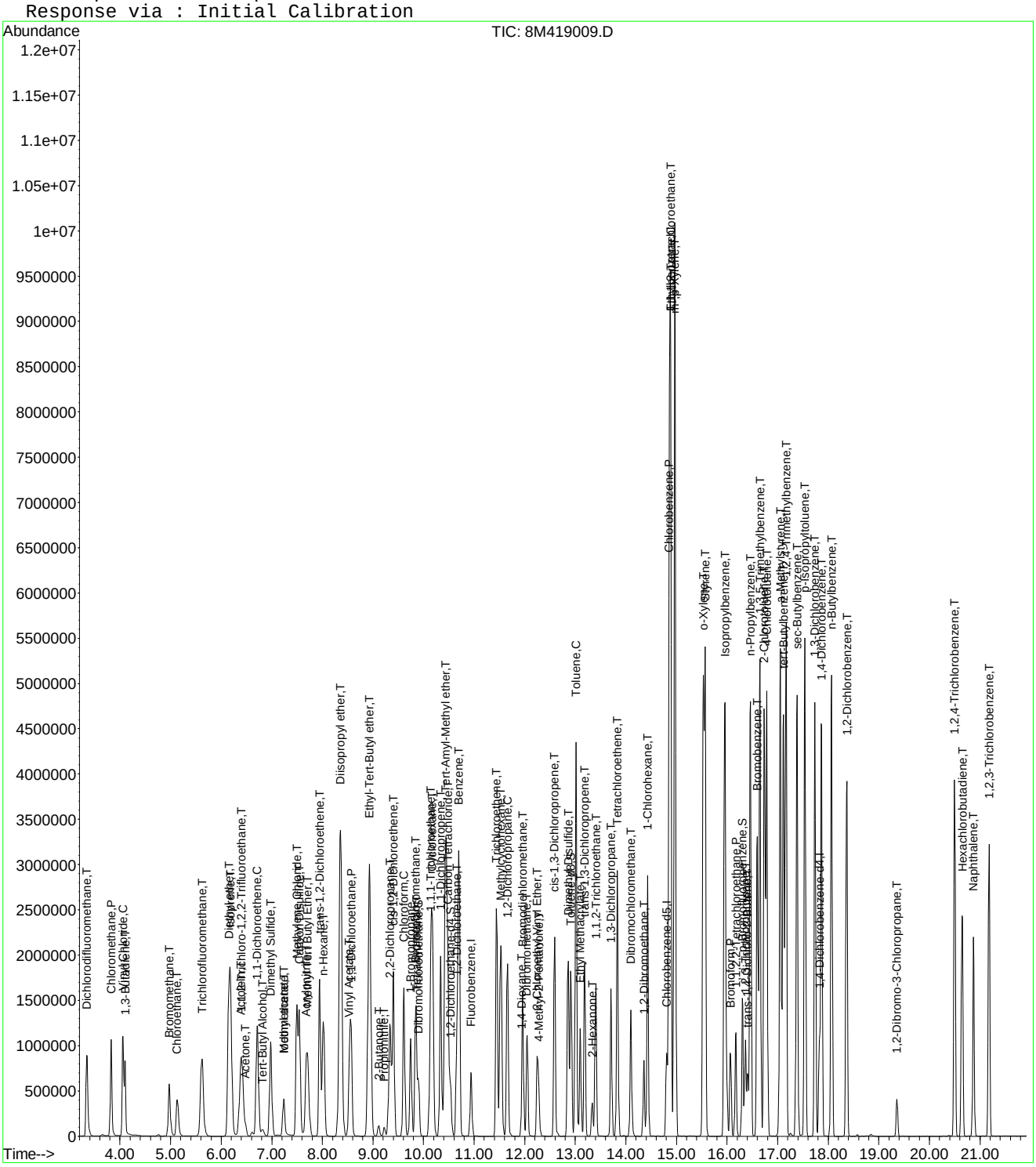
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.66	62	1085356	110.6535	ug/L		97
46)	Benzene	10.70	78	3722629	100.4557	ug/L		93
47)	Trichloroethene	11.44	130	1074923	106.6468	ug/L		98
48)	Methylcyclohexane	11.52	83	1398054	106.0194	ug/L		95
49)	1,2-Dichloropropane	11.66	63	942189	107.5812	ug/L		95
50)	Bromodichloromethane	11.96	83	1280673	114.1972	ug/L		98
51)	1,4-Dioxane	11.94	88	22104	475.7434	ug/L		90
52)	Dibromomethane	12.04	93	499793	112.7164	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	415136	117.1702	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	182865	117.4045	ug/L		98
55)	cis-1,3-Dichloropropene	12.59	75	1487011	117.8164	ug/L		100
56)	Dimethyl Disulfide	12.86	79	764852	141.9810	ug/L		96
59)	Toluene	13.01	91	4070819	100.0521	ug/L		97
60)	Ethyl Methacrylate	13.10	69	835156	122.6996	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	1269353	114.4143	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	683956	104.4552	ug/L		97
64)	2-Hexanone	13.33	58	172797	118.5052	ug/L		88
65)	1,3-Dichloropropane	13.70	76	1162920	105.4392	ug/L		87
66)	Tetrachloroethene	13.83	164	900370	111.2776	ug/L		98
67)	Dibromochloromethane	14.10	129	959992	121.1054	ug/L		100
68)	1,2-Dibromoethane	14.36	107	694704	111.6258	ug/L		100
69)	1-Chlorohexane	14.43	91	1319148	108.1005	ug/L		93
70)	Chlorobenzene	14.85	112	3004153	106.5496	ug/L		99
71)	1,1,1,2-Tetrachloroethane	14.88	131	1219121	127.8831	ug/L		99
72)	Ethylbenzene	14.88	106	1786508	119.7983	ug/L		90
73)	m-,p-Xylene	14.97	106	4003661	220.6823	ug/L		86
74)	o-Xylene	15.53	106	1960306	109.1849	ug/L		94
75)	Styrene	15.57	104	3292073	119.3828	ug/L		99
76)	Bromoform	16.07	173	597737	133.4926	ug/L		99
77)	Isopropylbenzene	15.96	105	4545601	100.7509	ug/L		94
79)	1,1,2,2-Tetrachloroethane	16.17	83	769153	108.8387	ug/L		96
81)	1,2,3-Trichloropropane	16.36	110	224094	112.8735	ug/L	#	29
82)	trans-1,4-Dichloro-2-Buten	16.40	53	175819	145.3184	ug/L	#	32
83)	n-Propylbenzene	16.46	91	5183759	92.3935	ug/L		93
84)	Bromobenzene	16.60	156	1335569	109.7181	ug/L		95
85)	1,3,5-Trimethylbenzene	16.65	105	3967760	101.5410	ug/L		94
86)	2-Chlorotoluene	16.73	91	3371801	88.0052	ug/L		79
87)	4-Chlorotoluene	16.78	91	3536460	106.8023	ug/L		95
88)	a-Methylstyrene	17.05	118	2324630	114.4381	ug/L		99
89)	tert-Butylbenzene	17.12	134	920850	109.7387	ug/L		93
90)	1,2,4-Trimethylbenzene	17.17	105	4138155	104.6152	ug/L		93
91)	sec-Butylbenzene	17.38	105	4819621	95.4354	ug/L		95
92)	p-Isopropyltoluene	17.54	119	4194755	101.5359	ug/L		97
93)	1,3-Dichlorobenzene	17.74	146	2515568	104.3629	ug/L		100
94)	1,4-Dichlorobenzene	17.87	146	2479841	99.2322	ug/L		99
95)	n-Butylbenzene	18.07	91	3805421	103.0498	ug/L		95
96)	1,2-Dichlorobenzene	18.37	146	2228398	105.4250	ug/L		100
97)	1,2-Dibromo-3-Chloropropan	19.36	75	126624	112.0824	ug/L		88
98)	1,2,4-Trichlorobenzene	20.50	180	1566801	114.3776	ug/L		99
99)	Hexachlorobutadiene	20.65	225	698852	108.1043	ug/L		98
100)	Naphthalene	20.87	128	2244301	112.5737	ug/L		99
101)	1,2,3-Trichlorobenzene	21.18	180	1297908	112.6794	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419009.D 8260WT.M Tue Apr 18 11:59:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419009.D Vial: 10
Acq On : 17 Apr 2017 17:23 Operator: TMB
Sample : WG610410-09 100ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 17:45 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	916133	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.81	117	758457	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.83	152	404542	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	985298	106.6012	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 426.40%#			
43) 1,2-Dichloroethane-d4	10.54	65	821015	101.7034	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 406.80%#			
58) Toluene-d8	12.91	98	3407259	98.6394	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 394.56%#			
80) p-Bromofluorobenzene	16.30	95	1421252	100.8919	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 403.56%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	2732295	236.1042	ug/L	97
3) Chloromethane	3.82	50	2983027	186.0300	ug/L	100
4) Vinyl Chloride	4.05	62	2540371	165.6278	ug/L	99
5) 1,3-Butadiene	4.10	54	866990	87.4234	ug/L	96
6) Bromomethane	4.97	94	1545771	509.8527	ug/L	99
7) Chloroethane	5.13	64	1366615	218.8661	ug/L	97
8) Trichlorofluoromethane	5.62	101	3365549	214.7442	ug/L	99
10) Isoprene	6.19	67	2589463	220.5797	ug/L	89
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	1913316	215.5364	ug/L	97
13) Acetone	6.49	43	249206	196.9637	ug/L	95
14) 1,1-Dichloroethene	6.71	61	2810695	217.1259	ug/L	98
16) Dimethyl Sulfide	6.98	62	1824420	217.4058	ug/L	89
17) Iodomethane	7.23	142	1201977	701.8503	ug/L	96
18) Methyl acetate	7.23	43	677953	194.9022	ug/L	93
19) Methylene Chloride	7.49	84	1990660	211.3402	ug/L	86
20) Carbon Disulfide	7.54	76	5610478	203.2424	ug/L	97
21) Acrylonitrile	7.70	53	33650	19.8015	ug/L #	32
22) Methyl Tert Butyl Ether	7.70	73	3788672	206.7038	ug/L	95
23) trans-1,2-Dichloroethene	7.95	61	2733215	215.5987	ug/L	96
24) n-Hexane	8.02	57	2197012	207.1230	ug/L	92
26) Vinyl Acetate	8.53	43	2553826	198.1912	ug/L	96
27) 1,1-Dichloroethane	8.57	63	3486757	214.6369	ug/L	98
29) 2-Butanone	9.12	43	389130	202.2654	ug/L	91
31) 2,2-Dichloropropane	9.34	77	2923670	212.2692	ug/L	99
32) cis-1,2-Dichloroethene	9.40	96	2276453	219.0916	ug/L	96
33) Chloroform	9.61	83	3453780	181.8658	ug/L	95
34) 1-Bromopropane	9.75	122	446868	220.9203	ug/L	100
35) Bromochloromethane	9.85	130	1233768	224.1736	ug/L	95
36) Tetrahydrofuran	9.88	42	870	0.6372	ug/L #	24
38) 1,1,1-Trichloroethane	10.14	97	3296755	231.5603	ug/L	98
39) Cyclohexane	10.17	56	2952221	221.0060	ug/L	91
40) 1,1-Dichloropropene	10.33	75	2719959	212.8482	ug/L	96
42) Carbon Tetrachloride	10.49	117	3008633	228.9911	ug/L	99
45) 1,2-Dichloroethane	10.66	62	2188642	217.0011	ug/L	96
46) Benzene	10.70	78	7143494	187.4691	ug/L	88
47) Trichloroethene	11.44	130	2308292	222.7182	ug/L	98
48) Methylcyclohexane	11.53	83	2934528	216.4182	ug/L	94
49) 1,2-Dichloropropane	11.66	63	1973272	219.1188	ug/L	96
50) Bromodichloromethane	11.96	83	2645509	229.4144	ug/L	96
51) 1,4-Dioxane	11.95	88	4065	85.0857	ug/L #	36

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:13 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

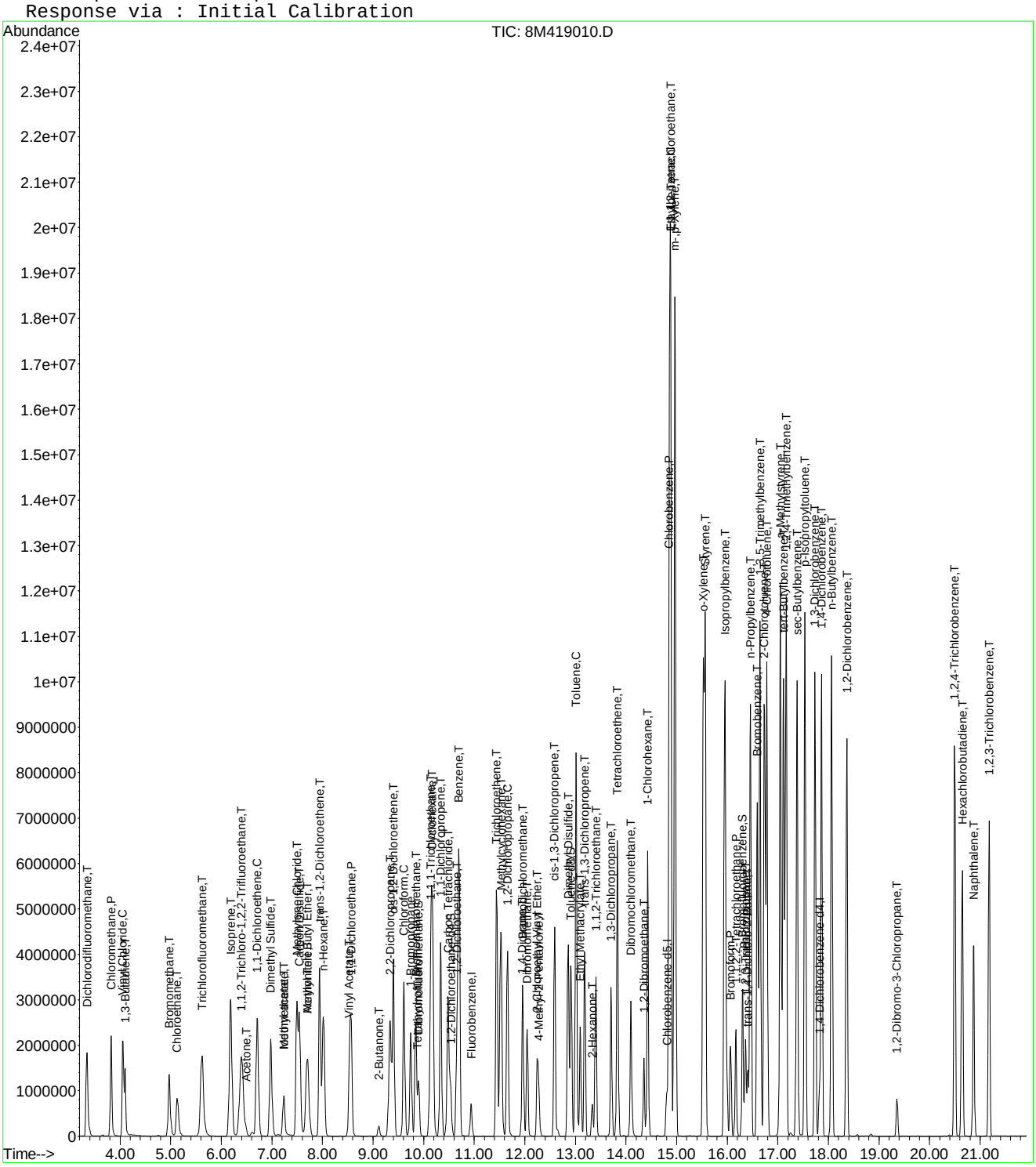
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
52)	Dibromomethane	12.05	93	1024578	224.7172	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.25	63	831891	228.3430	ug/L		98
54)	4-Methyl-2-Pentanone	12.28	58	360147	224.8683	ug/L		100
55)	cis-1,3-Dichloropropene	12.59	75	3048770	234.9149	ug/L		98
56)	Dimethyl Disulfide	12.86	79	1659189	299.5317	ug/L		99
59)	Toluene	13.01	91	7488758	174.9415	ug/L		89
60)	Ethyl Methacrylate	13.09	69	1679080	234.4692	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	2568979	220.0883	ug/L		97
63)	1,1,2-Trichloroethane	13.40	97	1396211	202.6709	ug/L		97
64)	2-Hexanone	13.33	58	330423	215.3823	ug/L		88
65)	1,3-Dichloropropane	13.70	76	2325588	200.4119	ug/L		86
66)	Tetrachloroethene	13.83	164	1990187	233.7864	ug/L		97
67)	Dibromochloromethane	14.10	129	1990057	238.6162	ug/L		99
68)	1,2-Dibromoethane	14.36	107	1415902	216.2402	ug/L		99
69)	1-Chlorohexane	14.43	91	2828351	220.2957	ug/L		92
70)	Chlorobenzene	14.85	112	6105996	205.8377	ug/L		94
71)	1,1,1,2-Tetrachloroethane	14.88	131	2810140	280.1772	ug/L		99
72)	Ethylbenzene	14.88	106	4032119	256.9908	ug/L		59
73)	m-,p-Xylene	14.96	106	7563563	396.2554	ug/L		66
74)	o-Xylene	15.53	106	4264660	225.7677	ug/L		79
75)	Styrene	15.56	104	6476388	223.2255	ug/L		92
76)	Bromoform	16.07	173	1258352	267.1087	ug/L		99
77)	Isopropylbenzene	15.96	105	8256603	173.9393	ug/L		81
79)	1,1,2,2-Tetrachloroethane	16.17	83	1527344	204.6644	ug/L		95
81)	1,2,3-Trichloropropane	16.36	110	447781	213.5809	ug/L	#	27
82)	trans-1,4-Dichloro-2-Buten	16.40	53	367713	287.8052	ug/L	#	26
83)	n-Propylbenzene	16.46	91	8822276	148.9059	ug/L	#	76
84)	Bromobenzene	16.60	156	2898738	225.5047	ug/L		92
85)	1,3,5-Trimethylbenzene	16.65	105	7463417	180.8708	ug/L		82
86)	2-Chlorotoluene	16.73	91	7153343	176.8033	ug/L		79
87)	4-Chlorotoluene	16.78	91	5772378	165.0827	ug/L		82
88)	a-Methylstyrene	17.05	118	4847570	225.9830	ug/L		96
89)	tert-Butylbenzene	17.11	134	2112689	238.4192	ug/L		79
90)	1,2,4-Trimethylbenzene	17.17	105	7584285	181.5672	ug/L		77
91)	sec-Butylbenzene	17.38	105	8521003	159.7799	ug/L	#	81
92)	p-Isopropyltoluene	17.54	119	7724336	177.0554	ug/L		84
93)	1,3-Dichlorobenzene	17.73	146	5116611	201.0146	ug/L		93
94)	1,4-Dichlorobenzene	17.87	146	5000020	189.4678	ug/L		93
95)	n-Butylbenzene	18.07	91	7068933	181.2731	ug/L		85
96)	1,2-Dichlorobenzene	18.37	146	4516876	202.3597	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.36	75	250305	209.8099	ug/L		86
98)	1,2,4-Trichlorobenzene	20.49	180	3378961	233.5852	ug/L		99
99)	Hexachlorobutadiene	20.65	225	1595889	233.7735	ug/L		98
100)	Naphthalene	20.88	128	4334998	205.9111	ug/L		96
101)	1,2,3-Trichlorobenzene	21.18	180	2739944	225.2564	ug/L		98

(#) = qualifier out of range (m) = manual integration
8M419010.D 8260WT.M Tue Apr 18 11:59:14 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419010.D Vial: 11
Acq On : 17 Apr 2017 17:54 Operator: TMB
Sample : WG610410-10 200ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:16 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	930696	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	749881	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	397655	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	1524398	162.3468	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 649.40%#			
43) 1,2-Dichloroethane-d4	10.53	65	1314412	160.2752	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 641.12%#			
58) Toluene-d8	12.91	98	5112365	149.6945	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 598.76%#			
80) p-Bromofluorobenzene	16.30	95	2230349	161.0701	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 644.28%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.35	85	5624	0.4784	ug/L	87
3) Chloromethane	3.81	50	108738	6.6751	ug/L	99
4) Vinyl Chloride	4.05	62	3886	0.2494	ug/L	93
5) 1,3-Butadiene	4.09	54	1246692	123.7438	ug/L	96
6) Bromomethane	4.96	94	300170	97.4580	ug/L	98
8) Trichlorofluoromethane	5.60	101	2530	0.1589	ug/L #	94
9) Diethyl ether	6.14	59	1962473	329.3380	ug/L	92
10) Isoprene	6.18	67	4088373	342.8128	ug/L	88
11) Acrolein	6.39	56	131510	159.5714	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	3091	0.3428	ug/L	94
13) Acetone	6.48	43	393174	305.8885	ug/L	96
14) 1,1-Dichloroethene	6.70	61	3035	0.2308	ug/L	80
15) Tert-Butyl Alcohol	6.83	59	293536	728.0013	ug/L	97
16) Dimethyl Sulfide	6.98	62	2844355	333.6421	ug/L	89
17) Iodomethane	7.23	142	1295425	744.5798	ug/L	95
18) Methyl acetate	7.24	43	1115371	315.6365	ug/L	92
19) Methylene Chloride	7.49	84	3692	0.3858	ug/L	89
20) Carbon Disulfide	7.55	76	7967065	284.0949	ug/L	95
21) Acrylonitrile	7.67	53	273516	158.4334	ug/L	95
22) Methyl Tert Butyl Ether	7.71	73	3414	0.1833	ug/L #	1
23) trans-1,2-Dichloroethene	7.94	61	6140	0.4768	ug/L	75
24) n-Hexane	8.01	57	3358910	311.7059	ug/L	91
25) Diisopropyl ether	8.35	45	8576863	291.0356	ug/L	97
26) Vinyl Acetate	8.53	43	3848978	294.0283	ug/L	97
28) Ethyl-Tert-Butyl ether	8.93	59	7584668	307.2506	ug/L	97
29) 2-Butanone	9.11	43	656445	335.8737	ug/L	92
30) Propionitrile	9.22	54	211846	346.5277	ug/L	99
32) cis-1,2-Dichloroethene	9.41	96	2415	0.2288	ug/L	92
33) Chloroform	9.60	83	4216	0.2185	ug/L	95
34) 1-Bromopropane	9.75	122	686822	334.2345	ug/L	99
35) Bromochloromethane	9.85	130	960	0.1717	ug/L #	25
36) Tetrahydrofuran	9.86	42	436518	314.6999	ug/L	87
39) Cyclohexane	10.17	56	4365494	321.6913	ug/L	90
40) 1,1-Dichloropropene	10.34	75	4278	0.3295	ug/L	77
41) Tert-Amyl-Methyl ether	10.44	73	6796184	308.9868	ug/L	95
42) Carbon Tetrachloride	10.47	117	1728	0.1295	ug/L #	76
45) 1,2-Dichloroethane	10.66	62	2027	0.1978	ug/L #	62
46) Benzene	10.70	78	6536	0.1688	ug/L	90
47) Trichloroethene	11.44	130	3270	0.3106	ug/L	87
48) Methylcyclohexane	11.52	83	4485299	325.6100	ug/L	91

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46:18 2017 Quant Results File: 8260WT.RES

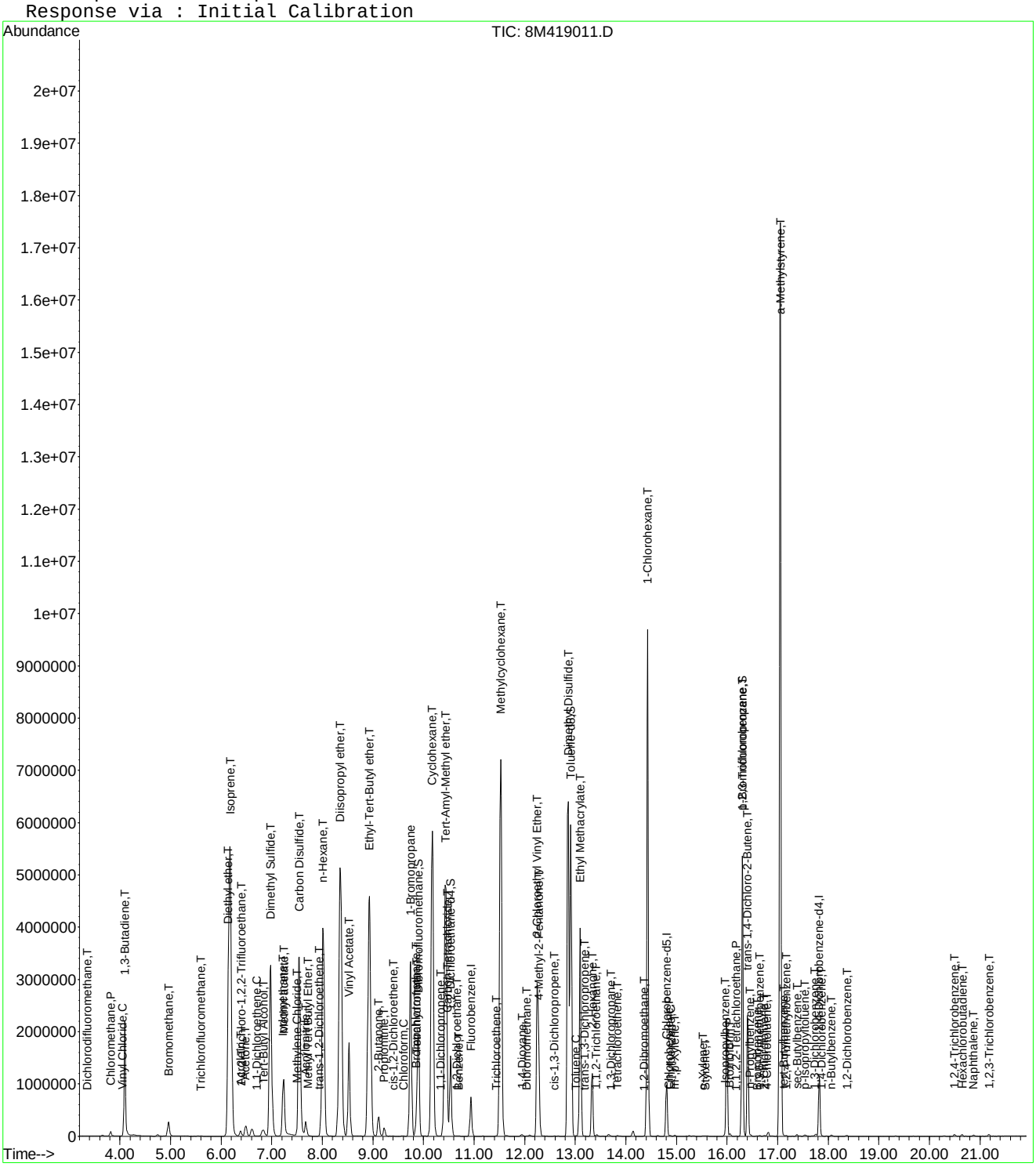
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Mon Apr 17 16:56:30 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

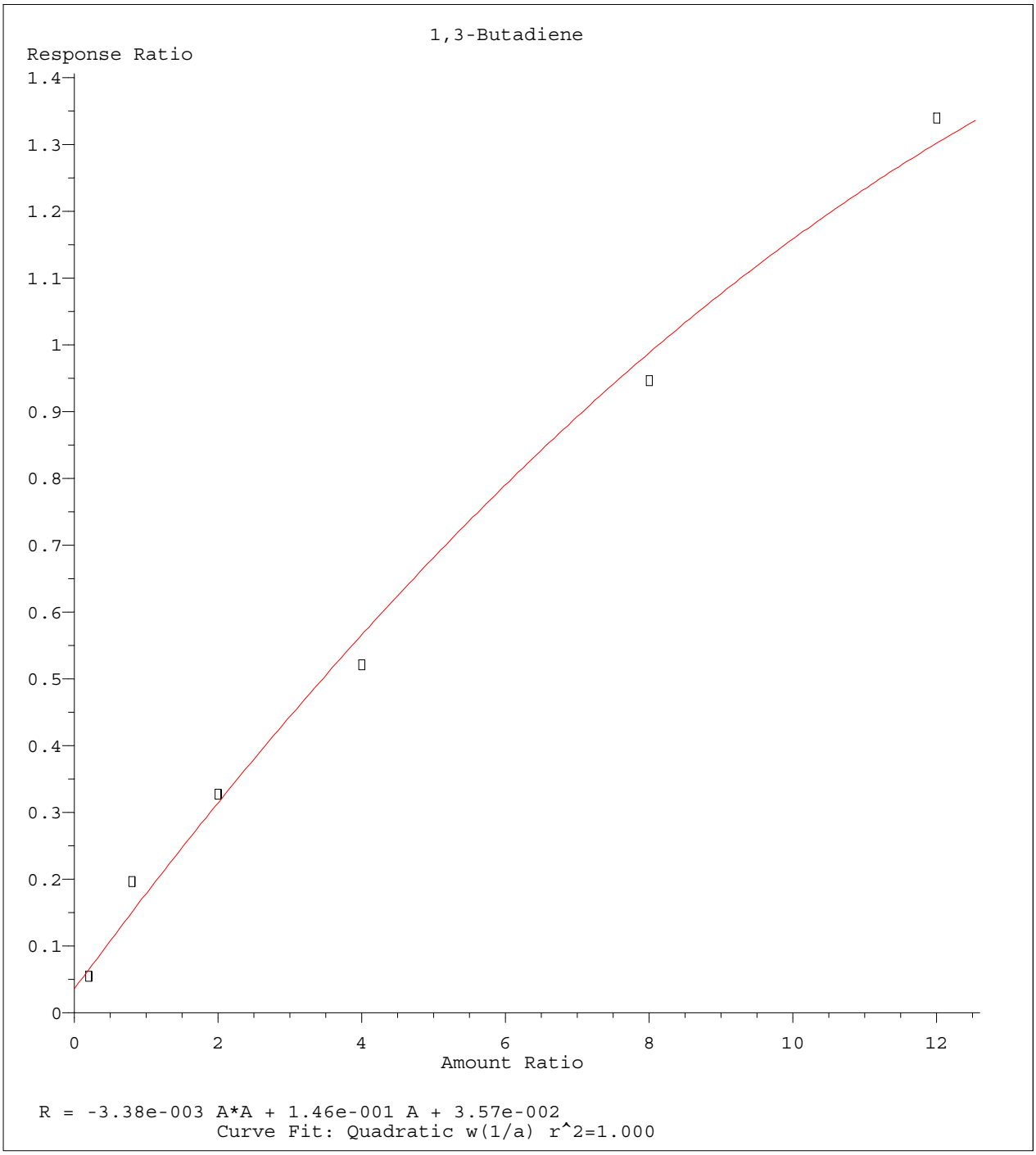
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
51)	1,4-Dioxane	11.95	88	33659	693.5026	ug/L		89
52)	Dibromomethane	12.04	93	1293	0.2792	ug/L		96
53)	2-Chloroethyl Vinyl Ether	12.25	63	1364979	368.8059	ug/L		99
54)	4-Methyl-2-Pentanone	12.28	58	616547	378.9355	ug/L		99
55)	cis-1,3-Dichloropropene	12.59	75	2930	0.2222	ug/L		90
56)	Dimethyl Disulfide	12.86	79	2642662	469.6121	ug/L		97
59)	Toluene	13.01	91	8813	0.2082	ug/L		96
60)	Ethyl Methacrylate	13.10	69	2723549	384.6698	ug/L		85
62)	trans-1,3-Dichloropropene	13.19	75	4235	0.3670	ug/L		99
63)	1,1,2-Trichloroethane	13.41	97	876	0.1286	ug/L		98
64)	2-Hexanone	13.33	58	568157	374.5818	ug/L		90
65)	1,3-Dichloropropane	13.71	76	2049	0.1786	ug/L	#	1
66)	Tetrachloroethene	13.83	164	2941	0.3494	ug/L		93
68)	1,2-Dibromoethane	14.36	107	1642	0.2536	ug/L		90
69)	1-Chlorohexane	14.43	91	4247410	334.6073	ug/L		90
70)	Chlorobenzene	14.85	112	7000	0.2387	ug/L		82
72)	Ethylbenzene	14.88	106	3495	0.2253	ug/L		86
73)	m-,p-Xylene	14.97	106	8767	0.4646	ug/L		94
74)	o-Xylene	15.52	106	3350	0.1794	ug/L		99
75)	Styrene	15.57	104	6628	0.2311	ug/L		93
76)	Bromoform	16.05	173	997	0.2141	ug/L	#	27
77)	Isopropylbenzene	15.96	105	32558	0.6937	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.18	83	1079	0.1471	ug/L	#	70
81)	1,2,3-Trichloropropane	16.30	110	745	0.3615	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.40	53	554896	441.8333	ug/L	#	1
83)	n-Propylbenzene	16.45	91	27737	0.4763	ug/L		84
84)	Bromobenzene	16.60	156	3516	0.2783	ug/L		92
85)	1,3,5-Trimethylbenzene	16.64	105	13389	0.3301	ug/L		97
86)	2-Chlorotoluene	16.73	91	9839	0.2474	ug/L		98
87)	4-Chlorotoluene	16.79	91	11812	0.3437	ug/L		97
88)	a-Methylstyrene	17.05	118	6686703	317.1180	ug/L		90
89)	tert-Butylbenzene	17.12	134	5062	0.5811	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.17	105	13828	0.3368	ug/L		90
91)	sec-Butylbenzene	17.38	105	38994	0.7439	ug/L		98
92)	p-Isopropyltoluene	17.54	119	20259	0.4724	ug/L		96
93)	1,3-Dichlorobenzene	17.74	146	10177	0.4067	ug/L		99
94)	1,4-Dichlorobenzene	17.87	146	11796	0.4547	ug/L		86
95)	n-Butylbenzene	18.06	91	22615	0.5900	ug/L		99
96)	1,2-Dichlorobenzene	18.37	146	7307	0.3330	ug/L		97
98)	1,2,4-Trichlorobenzene	20.50	180	15569	1.0949	ug/L		99
99)	Hexachlorobutadiene	20.65	225	10959	1.6331	ug/L		96
100)	Naphthalene	20.87	128	27819	1.3443	ug/L		97
101)	1,2,3-Trichlorobenzene	21.18	180	15009	1.2553	ug/L		94

(#) = qualifier out of range (m) = manual integration
8M419011.D 8260WT.M Tue Apr 18 11:59:17 2017 Page 2

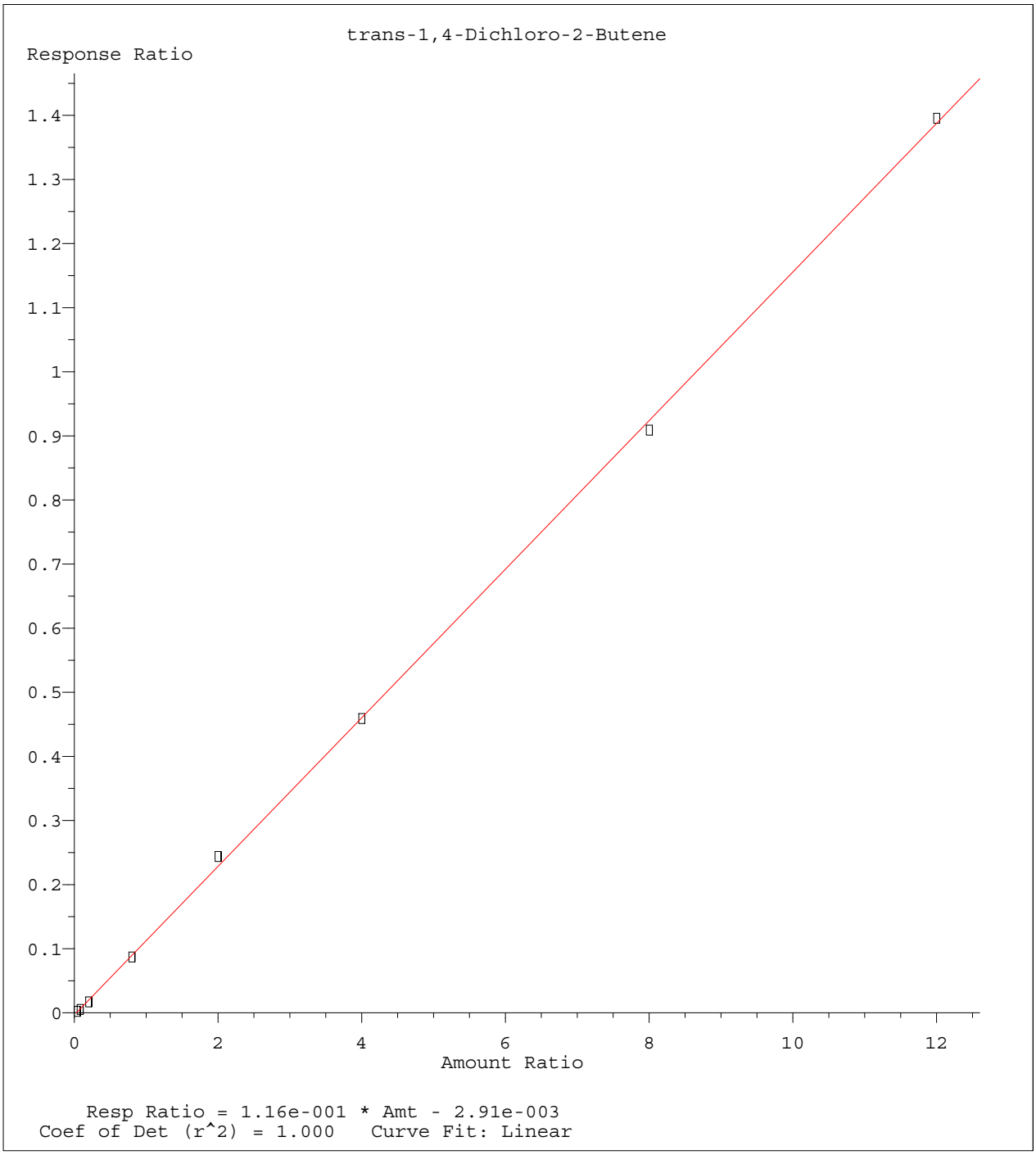
Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419011.D Vial: 12
Acq On : 17 Apr 2017 18:24 Operator: TMB
Sample : WG610410-11 300ug/L STD 8260 Inst : HPMS8
Misc : 1,1 STD81447 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 17 18:46 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

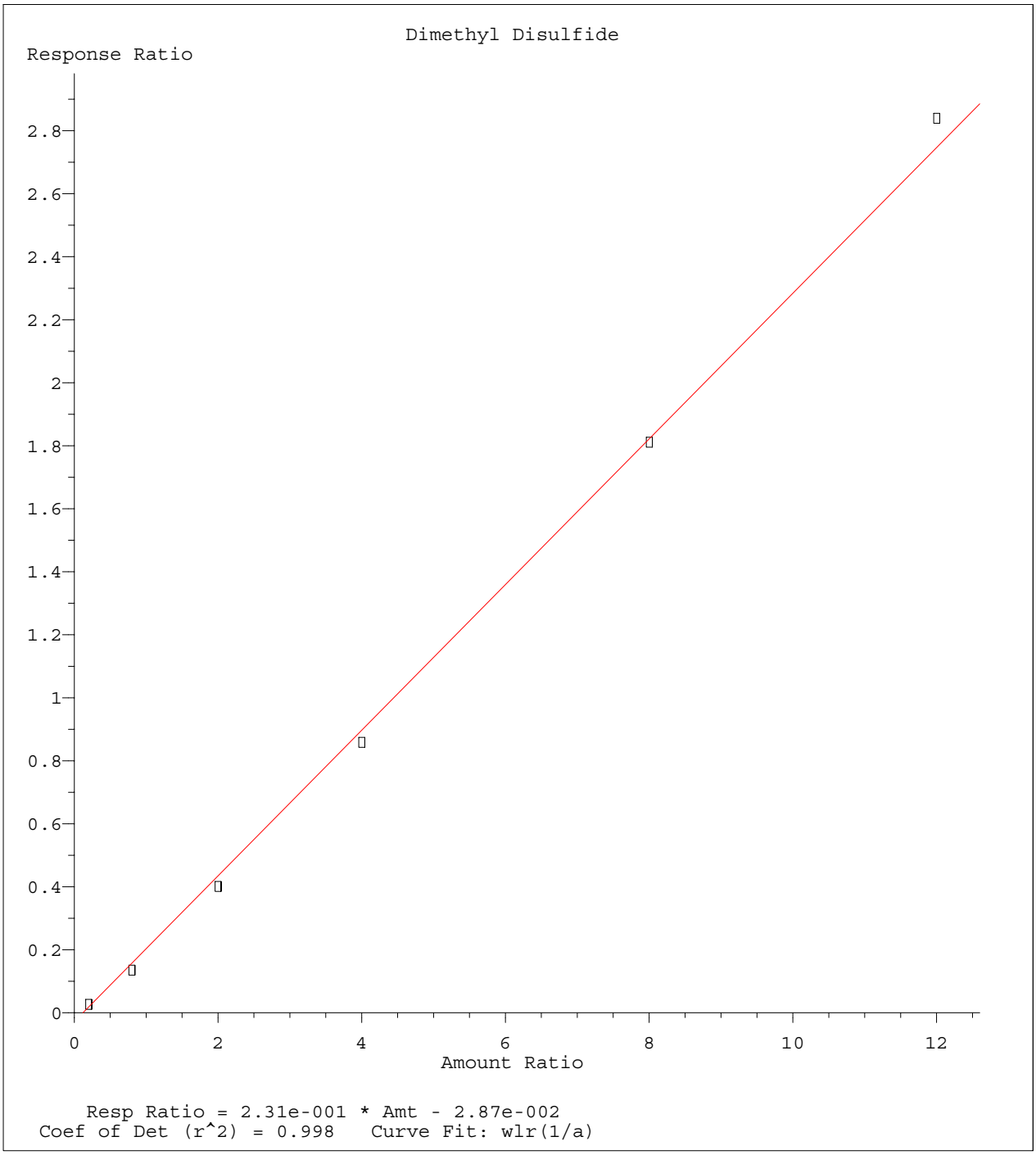




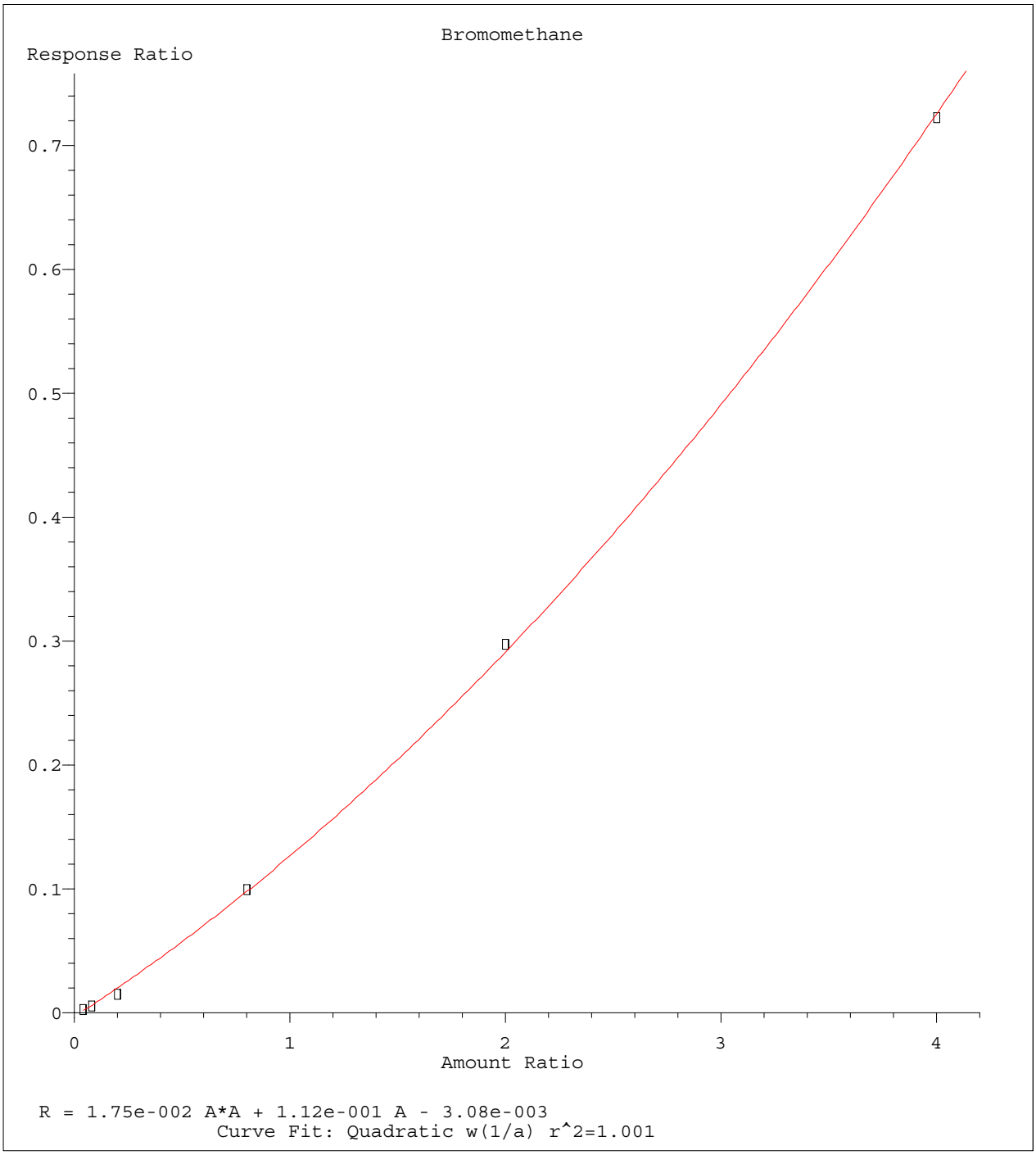
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



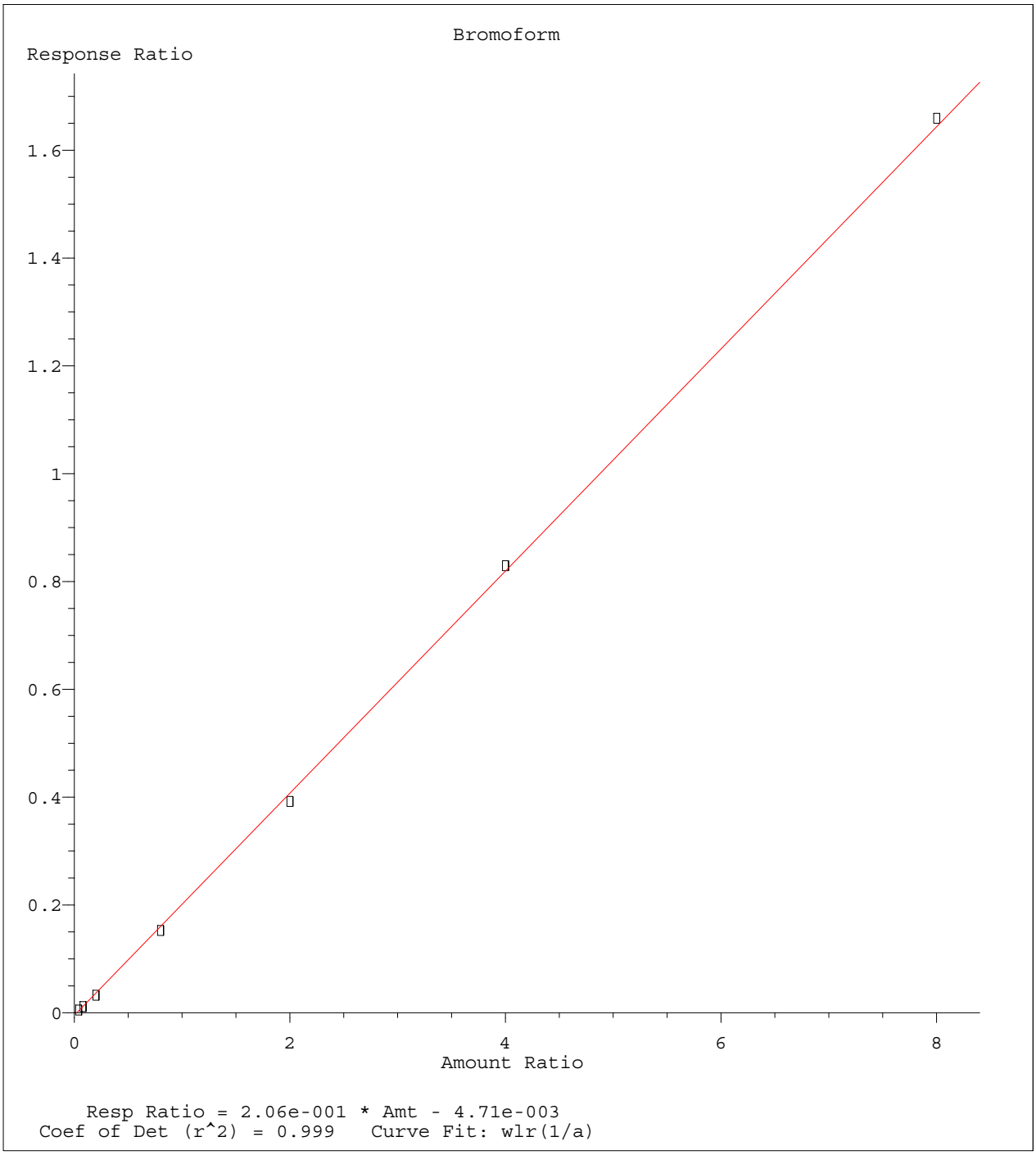
Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 18 08:45:38 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.94	96	876345	25.00	ug/L	0.00
57) Chlorobenzene-d5	14.80	117	707189	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.82	152	383750	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.90	111	227423	24.7419	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.96%			
43) 1,2-Dichloroethane-d4	10.53	65	193344	24.3311	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.32%			
58) Toluene-d8	12.91	98	800923	24.7866	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.16%			
80) p-Bromofluorobenzene	16.30	95	322047	23.7784	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 95.12%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.34	85	667667	56.2976	ug/L	100
3) Chloromethane	3.82	50	720887	48.6211	ug/L	98
4) Vinyl Chloride	4.05	62	635481	45.3850	ug/L	98
5) 1,3-Butadiene	4.10	54	359379	68.4146	ug/L	96
6) Bromomethane	4.96	94	215525	43.6302	ug/L	99
7) Chloroethane	5.13	64	324474	53.0523	ug/L	96
8) Trichlorofluoromethane	5.61	101	738420	48.5549	ug/L	99
9) Diethyl ether	6.14	59	498151	86.9727	ug/L	91
10) Isoprene	6.18	67	610998	50.8138	ug/L	89
11) Acrolein	6.39	56	80484	101.4634	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.40	101	445386	51.3586	ug/L	97
13) Acetone	6.49	43	53217	43.1773	ug/L	96
14) 1,1-Dichloroethene	6.71	61	596314	46.9846	ug/L	97
15) Tert-Butyl Alcohol	6.82	59	66729	167.0197	ug/L	97
16) Dimethyl Sulfide	6.98	62	449123	53.1278	ug/L	91
17) Iodomethane	7.24	142	397109	104.7342	ug/L	90
18) Methyl acetate	7.24	43	145496	43.1089	ug/L	93
19) Methylene Chloride	7.50	84	425943	46.7005	ug/L	84
20) Carbon Disulfide	7.55	76	1144667	43.3766	ug/L	100
21) Acrylonitrile	7.67	53	78412	45.8636	ug/L	99
22) Methyl Tert Butyl Ether	7.70	73	827526	46.0483	ug/L	94
23) trans-1,2-Dichloroethene	7.94	61	583968	47.2932	ug/L	96
24) n-Hexane	8.02	57	502871	48.7894	ug/L	93
25) Diisopropyl ether	8.35	45	2651186	95.9237	ug/L	96
26) Vinyl Acetate	8.53	43	616012	49.6945	ug/L	96
27) 1,1-Dichloroethane	8.56	63	756542	47.6058	ug/L	99
28) Ethyl-Tert-Butyl ether	8.93	59	2118923	90.1483	ug/L	98
29) 2-Butanone	9.12	43	83993	43.4556	ug/L	91
30) Propionitrile	9.22	54	56456	94.2403	ug/L	99
31) 2,2-Dichloropropane	9.34	77	626218	46.6788	ug/L	100
32) cis-1,2-Dichloroethene	9.41	96	489725	47.9836	ug/L	96
33) Chloroform	9.61	83	787042	44.6971	ug/L	97
34) 1-Bromopropane	9.75	122	124602	61.8875	ug/L	100
35) Bromochloromethane	9.84	130	272025	49.3934	ug/L	95
36) Tetrahydrofuran	9.86	42	114805	86.2858	ug/L	87
38) 1,1,1-Trichloroethane	10.14	97	721765	50.7918	ug/L	100
39) Cyclohexane	10.17	56	587817	44.4298	ug/L	91
40) 1,1-Dichloropropene	10.34	75	586359	47.2590	ug/L	97
41) Tert-Amyl-Methyl ether	10.44	73	1981831	94.1604	ug/L	98
42) Carbon Tetrachloride	10.48	117	660929	50.1611	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

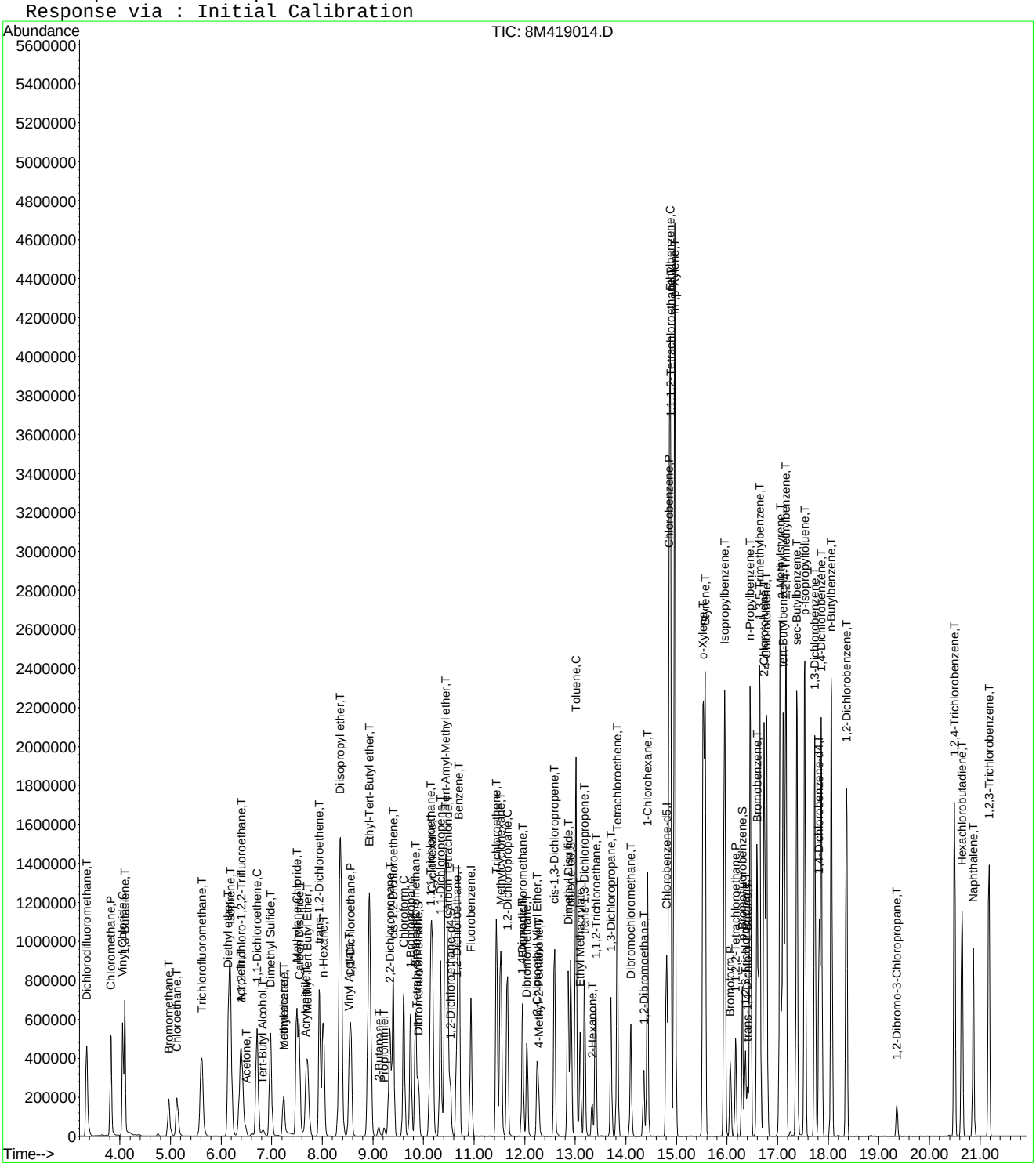
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.66	62	470242	47.2276	ug/L	97
46)	Benzene	10.70	78	1721941	47.5631	ug/L	95
47)	Trichloroethene	11.44	130	483157	47.5077	ug/L	97
48)	Methylcyclohexane	11.53	83	636402	46.9430	ug/L	95
49)	1,2-Dichloropropane	11.66	63	418165	47.2917	ug/L	95
50)	Bromodichloromethane	11.96	83	555676	48.0208	ug/L	98
51)	1,4-Dioxane	11.95	88	8508	168.7628	ug/L	89
52)	Dibromomethane	12.04	93	215781	47.4196	ug/L	96
53)	2-Chloroethyl Vinyl Ether	12.25	63	183970	48.0854	ug/L	100
54)	4-Methyl-2-Pentanone	12.28	58	77823	45.4120	ug/L	99
55)	cis-1,3-Dichloropropene	12.59	75	666388	50.5672	ug/L	100
56)	Dimethyl Disulfide	12.86	79	345797	45.7592	ug/L	95
59)	Toluene	13.01	91	1910652	48.5373	ug/L	100
60)	Ethyl Methacrylate	13.10	69	388584	52.3228	ug/L	88
62)	trans-1,3-Dichloropropene	13.18	75	531560	46.5624	ug/L	100
63)	1,1,2-Trichloroethane	13.41	97	293466	45.3132	ug/L	96
64)	2-Hexanone	13.34	58	76776	48.3051	ug/L	91
65)	1,3-Dichloropropane	13.71	76	516864	47.2090	ug/L	88
66)	Tetrachloroethene	13.83	164	418500	50.6128	ug/L	97
67)	Dibromochloromethane	14.10	129	402089	48.3146	ug/L	99
68)	1,2-Dibromoethane	14.36	107	298114	47.1242	ug/L	99
69)	1-Chlorohexane	14.43	91	648721	52.0883	ug/L	94
70)	Chlorobenzene	14.85	112	1321464	47.1602	ug/L	97
71)	1,1,1,2-Tetrachloroethane	14.89	131	500071	50.2889	ug/L	99
72)	Ethylbenzene	14.87	106	767808	48.9244	ug/L	99
73)	m-,p-Xylene	14.97	106	1848951	101.7331	ug/L	100
74)	o-Xylene	15.53	106	879490	48.1326	ug/L	100
75)	Styrene	15.57	104	1509115	52.6805	ug/L	96
76)	Bromoform	16.06	173	246815	42.9243	ug/L	99
77)	Isopropylbenzene	15.95	105	2164038	49.4628	ug/L	98
79)	1,1,2,2-Tetrachloroethane	16.17	83	331079	45.7235	ug/L	97
81)	1,2,3-Trichloropropane	16.36	110	97508	46.9716	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.40	53	63669	36.4332	ug/L	93
83)	n-Propylbenzene	16.46	91	2539452	47.2799	ug/L	97
84)	Bromobenzene	16.60	156	605699	48.1294	ug/L	96
85)	1,3,5-Trimethylbenzene	16.64	105	1903333	48.9404	ug/L	97
86)	2-Chlorotoluene	16.74	91	1618818	44.1478	ug/L	92
87)	4-Chlorotoluene	16.78	91	1639005	49.5992	ug/L	98
88)	a-Methylstyrene	17.06	118	1156988	53.0644	ug/L	97
89)	tert-Butylbenzene	17.11	134	423431	48.0884	ug/L	94
90)	1,2,4-Trimethylbenzene	17.16	105	1982610	49.9352	ug/L	96
91)	sec-Butylbenzene	17.38	105	2331979	47.8741	ug/L	99
92)	p-Isopropyltoluene	17.54	119	2050846	50.0005	ug/L	100
93)	1,3-Dichlorobenzene	17.74	146	1155418	47.3665	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	1144693	46.1575	ug/L	99
95)	n-Butylbenzene	18.06	91	1844076	49.9102	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	1012196	47.2353	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.36	75	51865	44.0112	ug/L	90
98)	1,2,4-Trichlorobenzene	20.50	180	707379	49.0312	ug/L	100
99)	Hexachlorobutadiene	20.64	225	326033	48.5641	ug/L	99
100)	Naphthalene	20.87	128	990859	48.0605	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	583838	48.7315	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419014.D 8260WT.M Tue Apr 18 11:59:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 18 10:03 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\2\DATA\041717\8M419014.D Vial: 15
Acq On : 17 Apr 2017 19:53 Operator: TMB
Sample : WG610410-12 50ug/L ALT SRC STD 8260 Inst : HPMS8
Misc : 1,1 STD81461 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	56.2976	-12.6	109	0.00
3	P	Chloromethane	50.0000	48.6212	2.8	108	0.00
4	C	Vinyl Chloride	50.0000	45.3850	9.2	98	0.00
5	T	1,3-Butadiene	50.0000	68.4146	-36.8#	132	0.00
6	T	Bromomethane	50.0000	43.6302	12.7	87	0.00
7	T	Chloroethane	50.0000	53.0523	-6.1	110	0.00
8	T	Trichlorofluoromethane	50.0000	48.5549	2.9	102	0.01
9	T	Diethyl ether	100.0000	86.9727	13.0	94	0.00
10	T	Isoprene	50.0000	50.8138	-1.6	106	0.00
11	T	Acrolein	50.0000	101.4634	-102.9#	219	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.3586	-2.7	107	0.00
13	T	Acetone	50.0000	43.1773	13.6	90	0.01
14	C	1,1-Dichloroethene	50.0000	46.9845	6.0	97	0.01
15	T	Tert-Butyl Alcohol	200.0000	167.0197	16.5	88	0.00
16	T	Dimethyl Sulfide	50.0000	53.1278	-6.3	113	0.00
17	T	Iodomethane	50.0000	104.7342	-109.5#	197	0.01
18	T	Methyl acetate	50.0000	43.1089	13.8	90	0.00
19	T	Methylene Chloride	50.0000	46.7005	6.6	100	0.00
20	T	Carbon Disulfide	50.0000	43.3766	13.2	90	0.00
21	T	Acrylonitrile	50.0000	45.8636	8.3	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.0483	7.9	94	0.00
23	T	trans-1,2-Dichloroethene	50.0000	47.2932	5.4	100	0.00
24	T	n-Hexane	50.0000	48.7894	2.4	104	0.01
25	T	Diisopropyl ether	100.0000	95.9237	4.1	102	0.00
26	T	Vinyl Acetate	50.0000	49.6946	0.6	103	0.00
27	P	1,1-Dichloroethane	50.0000	47.6058	4.8	99	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	90.1483	9.9	95	0.00
29	T	2-Butanone	50.0000	43.4556	13.1	90	0.01
30	T	Propionitrile	100.0000	94.2404	5.8	99	0.00
31	T	2,2-Dichloropropane	50.0000	46.6788	6.6	97	0.00
32	T	cis-1,2-Dichloroethene	50.0000	47.9836	4.0	99	0.00
33	C	Chloroform	50.0000	44.6971	10.6	101	0.01
34		1-Bromopropane	50.0000	61.8875	-23.8	132	0.00
35	T	Bromochloromethane	50.0000	49.3934	1.2	98	0.00
36	T	Tetrahydrofuran	100.0000	86.2858	13.7	91	0.00
37	S	Dibromofluoromethane	25.0000	24.7419	1.0	101	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.7918	-1.6	103	0.00
39	T	Cyclohexane	50.0000	44.4298	11.1	93	0.00
40	T	1,1-Dichloropropene	50.0000	47.2591	5.5	100	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.1604	5.8	99	0.00
42	T	Carbon Tetrachloride	50.0000	50.1611	-0.3	101	0.01
43	S	1,2-Dichloroethane-d4	25.0000	24.3311	2.7	98	0.00
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	47.2276	5.5	97	0.00
46	T	Benzene	50.0000	47.5631	4.9	99	0.00
47	T	Trichloroethene	50.0000	47.5078	5.0	100	0.00
48	T	Methylcyclohexane	50.0000	46.9430	6.1	99	0.00
49	C	1,2-Dichloropropane	50.0000	47.2917	5.4	98	0.01
50	T	Bromodichloromethane	50.0000	48.0208	4.0	96	0.00
51	T	1,4-Dioxane	200.0000	168.7628	15.6	84	0.00
52	T	Dibromomethane	50.0000	47.4196	5.2	95	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	48.0854	3.8	98	0.00
54	T	4-Methyl-2-Pentanone	50.0000	45.4120	9.2	93	0.00
55	T	cis-1,3-Dichloropropene	50.0000	50.5673	-1.1	99	0.00
56	T	Dimethyl Disulfide	50.0000	45.7592	8.5	104	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	106	0.00

58	S	Toluene-d8	25.0000	24.7866	0.9	101	0.00	
59	C	Toluene	50.0000	48.5373	2.9	100	0.00	
60	T	Ethyl Methacrylate	50.0000	52.3228	-4.6	101	0.00	
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#	
62	T	trans-1,3-Dichloropropene	50.0000	46.5624	6.9	94	0.00	
63	T	1,1,2-Trichloroethane	50.0000	45.3132	9.4	96	0.00	
64	T	2-Hexanone	50.0000	48.3051	3.4	98	0.00	
65	T	1,3-Dichloropropane	50.0000	47.2090	5.6	97	0.00	
66	T	Tetrachloroethene	50.0000	50.6128	-1.2	106	0.00	
67	T	Dibromochloromethane	50.0000	48.3146	3.4	95	0.00	
68	T	1,2-Dibromoethane	50.0000	47.1242	5.8	95	0.00	
69	T	1-Chlorohexane	50.0000	52.0883	-4.2	108	0.00	
70	P	Chlorobenzene	50.0000	47.1602	5.7	100	0.00	
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.2889	-0.6	97	0.01	
72	C	Ethylbenzene	50.0000	48.9244	2.2	101	0.00	
73	T	m-,p-Xylene	100.0000	101.7331	-1.7	102	0.00	
74	T	o-Xylene	50.0000	48.1326	3.7	102	0.00	
75	T	Styrene	50.0000	52.6805	-5.4	102	0.00	
76	P	Bromoform	50.0000	42.9243	14.2	94	0.01	
77	T	Isopropylbenzene	50.0000	49.4628	1.1	101	0.00	
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	108	0.00	
79	P	1,1,2,2-Tetrachloroethane	50.0000	45.7235	8.6	94	0.00	
80	S	p-Bromofluorobenzene	25.0000	23.7784	4.9	102	0.00	
81	T	1,2,3-Trichloropropane	50.0000	46.9716	6.1	95	0.06	
82	T	trans-1,4-Dichloro-2-Butene	50.0000	36.4332	27.1#	74	0.00	
83	T	n-Propylbenzene	50.0000	47.2799	5.4	100	0.00	
84	T	Bromobenzene	50.0000	48.1294	3.7	101	0.00	
85	T	1,3,5-Trimethylbenzene	50.0000	48.9404	2.1	102	0.00	
86	T	2-Chlorotoluene	50.0000	44.1478	11.7	104	0.00	
87	T	4-Chlorotoluene	50.0000	49.5992	0.8	99	0.00	
88	T	a-Methylstyrene	50.0000	53.0644	-6.1	112	0.00	
89	T	tert-Butylbenzene	50.0000	48.0884	3.8	104	0.00	
90	T	1,2,4-Trimethylbenzene	50.0000	49.9352	0.1	102	0.00	
91	T	sec-Butylbenzene	50.0000	47.8741	4.3	101	0.00	
92	T	p-Isopropyltoluene	50.0000	50.0005	-0.0	103	0.00	
93	T	1,3-Dichlorobenzene	50.0000	47.3665	5.3	100	0.00	
94	T	1,4-Dichlorobenzene	50.0000	46.1575	7.7	101	0.00	
95	T	n-Butylbenzene	50.0000	49.9102	0.2	102	0.00	
96	T	1,2-Dichlorobenzene	50.0000	47.2353	5.5	99	0.00	
97	T	1,2-Dibromo-3-Chloropropane	50.0000	44.0112	12.0	92	0.00	
98	T	1,2,4-Trichlorobenzene	50.0000	49.0312	1.9	101	0.00	
99	T	Hexachlorobutadiene	50.0000	48.5641	2.9	104	0.00	
100	T	Naphthalene	50.0000	48.0605	3.9	97	0.00	
101	T	1,2,3-Trichlorobenzene	50.0000	48.7315	2.5	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419008.D 8260WT.M Tue Apr 18 12:35:57 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 07:48:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	359950	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	261455	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	145760	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	94201	26.4210	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.68%			
43) 1,2-Dichloroethane-d4	10.13	65	107325	25.9394	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.76%			
57) Toluene-d8	12.38	98	364288	26.8333	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.32%			
78) p-Bromofluorobenzene	15.54	95	135763	26.7976	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.20%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	241542	54.6898	ug/L	99
3) Chloromethane	3.65	50	169877	39.1448	ug/L	98
4) Vinyl Chloride	3.88	62	162322	52.5427	ug/L	99
5) 1,3-Butadiene	3.92	54	103699	60.8320	ug/L	100
6) Bromomethane	4.77	94	150882	47.3007	ug/L	99
7) Chloroethane	4.92	64	163127	50.9752	ug/L	98
8) Trichlorofluoromethane	5.40	101	282312	52.3069	ug/L	100
9) Diethyl ether	5.91	59	389320	97.4741	ug/L	99
10) Isoprene	5.96	67	305641	54.6620	ug/L	100
11) Acrolein	6.14	56	23713	37.3260	ug/L	94
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	167068	52.2681	ug/L	100
13) Acetone	6.25	43	49995	41.5404	ug/L	95
14) 1,1-Dichloroethene	6.46	61	324647	50.5030	ug/L	100
15) Tert-Butyl Alcohol	6.57	59	77428	172.0021	ug/L	98
16) Dimethyl Sulfide	6.72	62	253086	50.1164	ug/L	98
17) Iodomethane	6.97	142	223415	50.6371	ug/L	99
18) Methyl acetate	6.98	43	184427	48.5861	ug/L	98
19) Methylene Chloride	7.23	84	203472	47.4403	ug/L	97
20) Carbon Disulfide	7.27	76	572556	52.0930	ug/L	100
21) Acrylonitrile	7.40	53	84787	47.6981	ug/L	96
22) Methyl Tert Butyl Ether	7.42	73	510049	47.4883	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	191912	49.0592	ug/L	99
24) n-Hexane	7.73	57	370372	61.0455	ug/L	99
25) Diisopropyl ether	8.05	45	1623207	103.7771	ug/L	98
26) Vinyl Acetate	8.22	43	368787	50.5095	ug/L	100
27) 1,1-Dichloroethane	8.25	63	405749	49.2106	ug/L	100
28) Ethyl-Tert-Butyl ether	8.60	59	1391869	100.6735	ug/L	98
29) 2-Butanone	8.78	43	85947	43.7043	ug/L	97
30) Propionitrile	8.89	54	59220	90.2680	ug/L	99
31) 2,2-Dichloropropane	9.00	77	298849	53.5468	ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	219553	50.0158	ug/L	95
33) Chloroform	9.25	83	337002	51.4902	ug/L	100
34) 1-Bromopropane	9.39	122	42216	48.1534	ug/L	99
35) Bromochloromethane	9.48	130	129639	48.1658	ug/L	96
36) Tetrahydrofuran	9.50	42	132183	82.5206	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	301145	51.7973	ug/L	100
39) Cyclohexane	9.79	56	445319	54.4731	ug/L	99
40) 1,1-Dichloropropene	9.95	75	261531	51.3259	ug/L	99
41) Carbon Tetrachloride	10.09	117	266821	53.0613	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	1093411	98.0359	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17828.D 8260WT.M Fri Apr 28 07:48:37 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 07:48:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

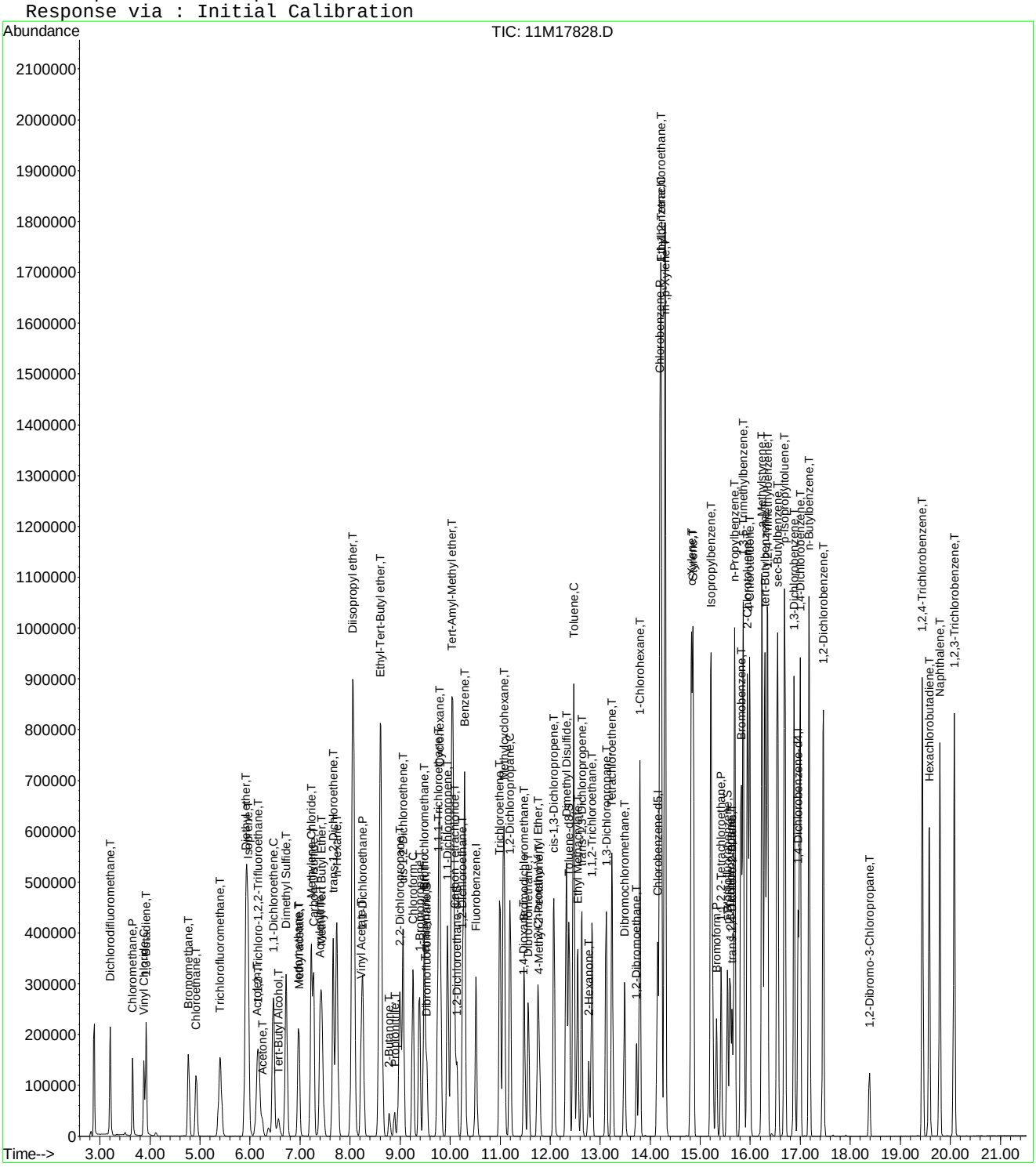
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	276266	49.0996	ug/L	99
45)	Benzene	10.29	78	764527	48.4316	ug/L	99
46)	Trichloroethene	10.99	130	205964	49.7766	ug/L	99
47)	Methylcyclohexane	11.07	83	355853	56.0937	ug/L	100
48)	1,2-Dichloropropane	11.20	63	244207	49.7065	ug/L	99
49)	1,4-Dioxane	11.47	88	8308	187.2603	ug/L	99
50)	Bromodichloromethane	11.48	83	260308	50.7852	ug/L	99
51)	Dibromomethane	11.56	93	116299	50.0419	ug/L	98
52)	2-Chloroethyl Vinyl Ether	11.76	63	131325	48.9254	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	74230	42.9461	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	322755	53.0720	ug/L	99
55)	Dimethyl Disulfide	12.32	79	190066	50.0730	ug/L	98
58)	Toluene	12.47	91	799709	47.2425	ug/L	98
59)	Ethyl Methacrylate	12.55	69	237057	50.9533	ug/L	97
60)	trans-1,3-Dichloropropene	12.64	75	282968	52.9550	ug/L	99
61)	1,1,2-Trichloroethane	12.83	97	170317	47.6962	ug/L	99
62)	2-Hexanone	12.77	43	130458	43.9747	ug/L	98
63)	1,3-Dichloropropane	13.12	76	284411	47.9555	ug/L	98
64)	Tetrachloroethene	13.23	164	178166	53.0219	ug/L	99
65)	Dibromochloromethane	13.48	129	204961	51.4842	ug/L	100
66)	1,2-Dibromoethane	13.72	107	154080	47.9992	ug/L	97
67)	1-Chlorohexane	13.79	91	276347	57.2857	ug/L	98
68)	Chlorobenzene	14.20	112	529360	49.1748	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	204292	50.9739	ug/L	100
70)	Ethylbenzene	14.22	106	298170	52.3785	ug/L	95
71)	m-,p-Xylene	14.30	106	689223	101.1877	ug/L	96
72)	o-Xylene	14.83	106	352837	51.4111	ug/L	97
73)	Styrene	14.86	104	576741	56.6984	ug/L	100
74)	Bromoform	15.32	173	140070	49.1016	ug/L	100
75)	Isopropylbenzene	15.22	105	852912	50.9421	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	217052	47.3672	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	61840	47.1300	ug/L	98
80)	trans-1,4-Dichloro-2-Buten	15.63	53	72729	51.2629	ug/L	85
81)	n-Propylbenzene	15.69	91	1030164	50.4257	ug/L	99
82)	Bromobenzene	15.82	156	259477	52.1909	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	741928	53.0848	ug/L	98
84)	2-Chlorotoluene	15.94	91	653412	47.1081	ug/L	89
85)	4-Chlorotoluene	15.99	91	638474	51.0001	ug/L	87
86)	a-Methylstyrene	16.23	118	433700	56.3027	ug/L	99
87)	tert-Butylbenzene	16.30	134	171726	50.5368	ug/L	99
88)	1,2,4-Trimethylbenzene	16.35	105	763510	52.2334	ug/L	98
89)	sec-Butylbenzene	16.54	105	928174	50.2845	ug/L	99
90)	p-Isopropyltoluene	16.69	119	808431	54.5060	ug/L	99
91)	1,3-Dichlorobenzene	16.87	146	476290	53.8561	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	477207	50.1730	ug/L	99
93)	n-Butylbenzene	17.17	91	759559	57.4170	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	460752	51.6303	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	37986	47.2457	ug/L	96
96)	1,2,4-Trichlorobenzene	19.44	180	363589	56.7496	ug/L	100
97)	Hexachlorobutadiene	19.58	225	186985	55.0276	ug/L	99
98)	Naphthalene	19.79	128	723595	50.6387	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	343381	52.3875	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17828.D 8260WT.M Fri Apr 28 07:48:37 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 7:48 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: hpms11
Initial cal date: 24 Mar 2017 18:45
CCV date: 28 Apr 2017 7:26
CCV Filename: 11M17828.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	432286	10.54	305247	14.17	158955	16.98
CCV	359950	10.52	261455	14.14	145760	16.96

Data File : C:\MSDCHEM\1\DATA\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	81	-0.01
2	T	Dichlorodifluoromethane	0.2938	0.3355	-14.2	79	0.00
3	P	Chloromethane	0.3458	0.2360	31.8#	82	0.00
4	C	Vinyl Chloride	0.2146	0.2255	-5.1	81	-0.01
5	T	1,3-Butadiene	0.1274	0.1441	-13.0	85	-0.01
6	T	Bromomethane	0.2216	0.2096	5.4	84	-0.01
7	T	Chloroethane	0.2223	0.2266	-2.0	78	-0.01
8	T	Trichlorofluoromethane	0.3749	0.3922	-4.6	79	-0.01
9	T	Diethyl ether	0.2774	0.2704	2.5	79	-0.01
10	T	Isoprene	0.3883	0.4246	-9.3	79	-0.01
11	T	Acrolein	0.0441	0.0329	25.3#	60	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2321	-4.5	80	0.00
13	T	Acetone	0.0836	0.0694	16.9	69	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4510	-1.0	78	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0269	14.0	71	0.00
16	T	Dimethyl Sulfide	0.3507	0.3516	-0.2	78	-0.01
17	T	Iodomethane	0.2712	0.3103	-14.4	76	0.00
18	T	Methyl acetate	0.2636	0.2562	2.8	78	0.00
19	T	Methylene Chloride	0.2979	0.2826	5.1	77	0.00
20	T	Carbon Disulfide	0.7634	0.7953	-4.2	80	-0.01
21	T	Acrylonitrile	0.1235	0.1178	4.6	75	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7085	5.0	73	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2666	1.9	79	-0.01
24	T	n-Hexane	0.4214	0.5145	-22.1	91	0.00
25	T	Diisopropyl ether	1.0863	1.1274	-3.8	84	-0.01
26	T	Vinyl Acetate	0.5071	0.5123	-1.0	80	-0.01
27	P	1,1-Dichloroethane	0.5727	0.5636	1.6	78	-0.01
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9667	-0.7	81	-0.01
29	T	2-Butanone	0.1366	0.1194	12.6	70	-0.01
30	T	Propionitrile	0.0456	0.0411	9.7	73	0.00
31	T	2,2-Dichloropropane	0.3876	0.4151	-7.1	88	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.3050	-0.0	78	-0.01
33	C	Chloroform	0.5272	0.4681	11.2	78	0.00
34	T	1-Bromopropane	0.0547	0.0586	-7.1	77	0.00
35	T	Bromochloromethane	0.1869	0.1801	3.7	74	0.00
36	T	Tetrahydrofuran	0.1113	0.0918	17.5	72	0.00
37	S	Dibromofluoromethane	0.2476	0.2617	-5.7	84	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4183	-3.6	78	0.00
39	T	Cyclohexane	0.5678	0.6186	-8.9	81	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3633	-2.7	79	0.00
41	T	Carbon Tetrachloride	0.3493	0.3706	-6.1	79	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7594	2.0	79	-0.01
43	S	1,2-Dichloroethane-d4	0.2874	0.2982	-3.8	82	-0.01
44	T	1,2-Dichloroethane	0.3908	0.3838	1.8	76	0.00
45	T	Benzene	1.0964	1.0620	3.1	79	0.00
46	T	Trichloroethene	0.2874	0.2861	0.4	78	-0.01
47	T	Methylcyclohexane	0.4406	0.4943	-12.2	82	0.00
48	C	1,2-Dichloropropane	0.3412	0.3392	0.6	78	0.00
49	T	1,4-Dioxane	0.0031	0.0029	6.2	78	0.00
50	T	Bromodichloromethane	0.3560	0.3616	-1.6	77	-0.01
51	T	Dibromomethane	0.1614	0.1616	-0.1	76	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1824	2.2	74	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1031	14.1	70	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4483	-6.1	78	0.00

(#) = Out of Range
11M17828.D 8260WT.M Fri Apr 28 07:53:27 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2640	-0.1	78	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	81	0.00
57	S	Toluene-d8	1.2981	1.3933	-7.3	83	0.00
58	C	Toluene	1.6186	1.5293	5.5	80	0.00
59	T	Ethyl Methacrylate	0.4449	0.4533	-1.9	75	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5411	-5.9	77	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3257	4.6	75	-0.01
62	T	2-Hexanone	0.2837	0.2495	12.1	70	0.00
63	T	1,3-Dichloropropane	0.5671	0.5439	4.1	75	0.00
64	T	Tetrachloroethene	0.3213	0.3407	-6.0	80	0.00
65	T	Dibromochloromethane	0.3807	0.3920	-3.0	76	-0.01
66	T	1,2-Dibromoethane	0.3069	0.2947	4.0	74	-0.01
67	T	1-Chlorohexane	0.4613	0.5285	-14.6	83	0.00
68	P	Chlorobenzene	1.0293	1.0123	1.7	80	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3907	-1.9	77	0.00
70	C	Ethylbenzene	0.5443	0.5702	-4.8	79	0.00
71	T	m-,p-Xylene	0.6513	0.6590	-1.2	80	0.00
72	T	o-Xylene	0.6562	0.6748	-2.8	79	0.00
73	T	Styrene	0.9726	1.1030	-13.4	79	0.00
74	P	Bromoform	0.2728	0.2679	1.8	74	0.00
75	T	Isopropylbenzene	1.6009	1.6311	-1.9	81	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	82	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7446	5.3	76	0.00
78	S	p-Bromofluorobenzene	0.8689	0.9314	-7.2	84	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2121	5.7	73	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2495	-2.5	84	0.00
81	T	n-Propylbenzene	3.5039	3.5338	-0.9	82	0.00
82	T	Bromobenzene	0.8527	0.8901	-4.4	81	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.5450	-6.2	81	0.00
84	T	2-Chlorotoluene	2.3790	2.2414	5.8	82	0.00
85	T	4-Chlorotoluene	2.1472	2.1902	-2.0	81	0.00
86	T	a-Methylstyrene	1.3212	1.4877	-12.6	82	0.00
87	T	tert-Butylbenzene	0.5828	0.5891	-1.1	79	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.6191	-4.5	81	0.00
89	T	sec-Butylbenzene	3.1659	3.1839	-0.6	81	0.00
90	T	p-Isopropyltoluene	2.5439	2.7732	-9.0	81	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.6338	-7.7	81	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.6370	-0.3	82	0.00
93	T	n-Butylbenzene	2.2689	2.6055	-14.8	83	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.5805	-3.3	79	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1303	5.5	73	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2472	-13.5	82	-0.01
97	T	Hexachlorobutadiene	0.5828	0.6414	-10.1	83	0.00
98	T	Naphthalene	2.4508	2.4821	-1.3	77	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1779	-4.8	80	0.00

Data File : C:\MSDCHEM\1\DATA\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	81	-0.01
2	T	Dichlorodifluoromethane	50.0000	54.6898	-9.4	79	0.00
3	P	Chloromethane	50.0000	39.1448	21.7	82	0.00
4	C	Vinyl Chloride	50.0000	52.5427	-5.1	81	-0.01
5	T	1,3-Butadiene	50.0000	60.8320	-21.7	85	-0.01
6	T	Bromomethane	50.0000	47.3007	5.4	84	-0.01
7	T	Chloroethane	50.0000	50.9752	-2.0	78	-0.01
8	T	Trichlorofluoromethane	50.0000	52.3069	-4.6	79	-0.01
9	T	Diethyl ether	100.0000	97.4741	2.5	79	-0.01
10	T	Isoprene	50.0000	54.6620	-9.3	79	-0.01
11	T	Acrolein	50.0000	37.3260	25.3#	60	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.2681	-4.5	80	0.00
13	T	Acetone	50.0000	41.5403	16.9	69	-0.01
14	C	1,1-Dichloroethene	50.0000	50.5031	-1.0	78	-0.01
15	T	Tert-Butyl Alcohol	200.0000	172.0021	14.0	71	0.00
16	T	Dimethyl Sulfide	50.0000	50.1164	-0.2	78	-0.01
17	T	Iodomethane	50.0000	50.6371	-1.3	76	0.00
18	T	Methyl acetate	50.0000	48.5861	2.8	78	0.00
19	T	Methylene Chloride	50.0000	47.4403	5.1	77	0.00
20	T	Carbon Disulfide	50.0000	52.0930	-4.2	80	-0.01
21	T	Acrylonitrile	50.0000	47.6981	4.6	75	0.00
22	T	Methyl Tert Butyl Ether	50.0000	47.4883	5.0	73	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	49.0592	1.9	79	-0.01
24	T	n-Hexane	50.0000	61.0455	-22.1	91	0.00
25	T	Diisopropyl ether	100.0000	103.7771	-3.8	84	-0.01
26	T	Vinyl Acetate	50.0000	50.5095	-1.0	80	-0.01
27	P	1,1-Dichloroethane	50.0000	49.2106	1.6	78	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	100.6735	-0.7	81	-0.01
29	T	2-Butanone	50.0000	43.7043	12.6	70	-0.01
30	T	Propionitrile	100.0000	90.2680	9.7	73	0.00
31	T	2,2-Dichloropropane	50.0000	53.5468	-7.1	88	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	50.0158	-0.0	78	-0.01
33	C	Chloroform	50.0000	51.4902	-3.0	78	0.00
34	T	1-Bromopropane	50.0000	48.1534	3.7	77	0.00
35	T	Bromochloromethane	50.0000	48.1658	3.7	74	0.00
36	T	Tetrahydrofuran	100.0000	82.5206	17.5	72	0.00
37	S	Dibromofluoromethane	25.0000	26.4210	-5.7	84	0.00
38	T	1,1,1-Trichloroethane	50.0000	51.7973	-3.6	78	0.00
39	T	Cyclohexane	50.0000	54.4731	-8.9	81	-0.01
40	T	1,1-Dichloropropene	50.0000	51.3259	-2.7	79	0.00
41	T	Carbon Tetrachloride	50.0000	53.0613	-6.1	79	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	98.0359	2.0	79	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	25.9394	-3.8	82	-0.01
44	T	1,2-Dichloroethane	50.0000	49.0996	1.8	76	0.00
45	T	Benzene	50.0000	48.4316	3.1	79	0.00
46	T	Trichloroethene	50.0000	49.7766	0.4	78	-0.01
47	T	Methylcyclohexane	50.0000	56.0937	-12.2	82	0.00
48	C	1,2-Dichloropropane	50.0000	49.7065	0.6	78	0.00
49	T	1,4-Dioxane	200.0000	187.2603	6.4	78	0.00
50	T	Bromodichloromethane	50.0000	50.7852	-1.6	77	-0.01
51	T	Dibromomethane	50.0000	50.0419	-0.1	76	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	48.9254	2.1	74	0.00
53	T	4-Methyl-2-Pentanone	50.0000	42.9461	14.1	70	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	53.0720	-6.1	78	0.00

(#) = Out of Range
11M17828.D 8260WT.M Fri Apr 28 07:53:29 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042817\11M17828.D Vial: 1
Acq On : 28 Apr 2017 7:26 Operator: TMB
Sample : WG611924-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	50.0730	-0.1	78	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	81	0.00
57	S	Toluene-d8	25.0000	26.8333	-7.3	83	0.00
58	C	Toluene	50.0000	47.2425	5.5	80	0.00
59	T	Ethyl Methacrylate	50.0000	50.9533	-1.9	75	0.00
60	T	trans-1,3-Dichloropropene	50.0000	52.9550	-5.9	77	0.00
61	T	1,1,2-Trichloroethane	50.0000	47.6962	4.6	75	-0.01
62	T	2-Hexanone	50.0000	43.9747	12.1	70	0.00
63	T	1,3-Dichloropropane	50.0000	47.9555	4.1	75	0.00
64	T	Tetrachloroethene	50.0000	53.0219	-6.0	80	0.00
65	T	Dibromochloromethane	50.0000	51.4842	-3.0	76	-0.01
66	T	1,2-Dibromoethane	50.0000	47.9992	4.0	74	-0.01
67	T	1-Chlorohexane	50.0000	57.2857	-14.6	83	0.00
68	P	Chlorobenzene	50.0000	49.1748	1.7	80	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	50.9739	-1.9	77	0.00
70	C	Ethylbenzene	50.0000	52.3785	-4.8	79	0.00
71	T	m-,p-Xylene	100.0000	101.1877	-1.2	80	0.00
72	T	o-Xylene	50.0000	51.4111	-2.8	79	0.00
73	T	Styrene	50.0000	56.6984	-13.4	79	0.00
74	P	Bromoform	50.0000	49.1016	1.8	74	0.00
75	T	Isopropylbenzene	50.0000	50.9421	-1.9	81	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	82	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	47.3672	5.3	76	0.00
78	S	p-Bromofluorobenzene	25.0000	26.7976	-7.2	84	0.00
79	T	1,2,3-Trichloropropane	50.0000	47.1300	5.7	73	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	51.2629	-2.5	84	0.00
81	T	n-Propylbenzene	50.0000	50.4258	-0.9	82	0.00
82	T	Bromobenzene	50.0000	52.1909	-4.4	81	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	53.0848	-6.2	81	0.00
84	T	2-Chlorotoluene	50.0000	47.1081	5.8	82	0.00
85	T	4-Chlorotoluene	50.0000	51.0001	-2.0	81	0.00
86	T	a-Methylstyrene	50.0000	56.3027	-12.6	82	0.00
87	T	tert-Butylbenzene	50.0000	50.5368	-1.1	79	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	52.2334	-4.5	81	0.00
89	T	sec-Butylbenzene	50.0000	50.2845	-0.6	81	0.00
90	T	p-Isopropyltoluene	50.0000	54.5060	-9.0	81	0.00
91	T	1,3-Dichlorobenzene	50.0000	53.8561	-7.7	81	0.00
92	T	1,4-Dichlorobenzene	50.0000	50.1730	-0.3	82	0.00
93	T	n-Butylbenzene	50.0000	57.4171	-14.8	83	0.00
94	T	1,2-Dichlorobenzene	50.0000	51.6303	-3.3	79	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	47.2457	5.5	73	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	56.7496	-13.5	82	-0.01
97	T	Hexachlorobutadiene	50.0000	55.0276	-10.1	83	0.00
98	T	Naphthalene	50.0000	50.6387	-1.3	77	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	52.3875	-4.8	80	0.00

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 19:44:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	350787	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	250759	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	141775	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	90280	25.9826	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.92%			
43) 1,2-Dichloroethane-d4	10.14	65	106355	26.3764	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.52%			
57) Toluene-d8	12.38	98	346073	26.5789	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.32%			
78) p-Bromofluorobenzene	15.54	95	126245	25.6193	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	243710	56.6148	ug/L	98
3) Chloromethane	3.65	50	179889	42.6003	ug/L	97
4) Vinyl Chloride	3.88	62	157348	52.2630	ug/L	100
5) 1,3-Butadiene	3.92	54	93453	55.9502	ug/L	99
6) Bromomethane	4.77	94	143845	46.2726	ug/L	98
7) Chloroethane	4.92	64	160331	51.4102	ug/L	98
8) Trichlorofluoromethane	5.40	101	283773	53.9510	ug/L	99
9) Diethyl ether	5.91	59	366471	94.1501	ug/L	98
10) Isoprene	5.96	67	289218	53.0760	ug/L	100
11) Acrolein	6.14	56	24885	40.1940	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	169191	54.3150	ug/L	98
13) Acetone	6.25	43	52341	44.6256	ug/L	95
14) 1,1-Dichloroethene	6.46	61	325562	51.9683	ug/L	97
15) Tert-Butyl Alcohol	6.57	59	75241	171.5098	ug/L	96
16) Dimethyl Sulfide	6.72	62	243274	49.4318	ug/L	97
17) Iodomethane	6.97	142	211800	49.2914	ug/L	98
18) Methyl acetate	6.98	43	189825	51.3144	ug/L	98
19) Methylene Chloride	7.23	84	199439	47.7146	ug/L	95
20) Carbon Disulfide	7.27	76	534145	49.8677	ug/L	99
21) Acrylonitrile	7.40	53	83270	48.0683	ug/L	97
22) Methyl Tert Butyl Ether	7.42	73	508414	48.5726	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	186991	49.0499	ug/L	98
24) n-Hexane	7.73	57	340219	57.5404	ug/L	99
25) Diisopropyl ether	8.05	45	1528299	100.2616	ug/L	99
26) Vinyl Acetate	8.22	43	340137	47.8024	ug/L	99
27) 1,1-Dichloroethane	8.25	63	398769	49.6274	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1303233	96.7247	ug/L	98
29) 2-Butanone	8.78	43	88360	46.1050	ug/L	97
30) Propionitrile	8.89	54	58316	91.2120	ug/L	100
31) 2,2-Dichloropropane	9.00	77	286878	52.7446	ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	212066	49.5721	ug/L	96
33) Chloroform	9.25	83	328530	51.5070	ug/L	100
34) 1-Bromopropane	9.39	122	38428	45.0013	ug/L	96
35) Bromochloromethane	9.48	130	130744	49.8452	ug/L	95
36) Tetrahydrofuran	9.50	42	134238	85.9926	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	295629	52.1767	ug/L	99
39) Cyclohexane	9.79	56	419447	52.6486	ug/L	98
40) 1,1-Dichloropropene	9.95	75	257557	51.8663	ug/L	98
41) Carbon Tetrachloride	10.09	117	263578	53.7856	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1023124	94.1302	ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 19:44:50 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

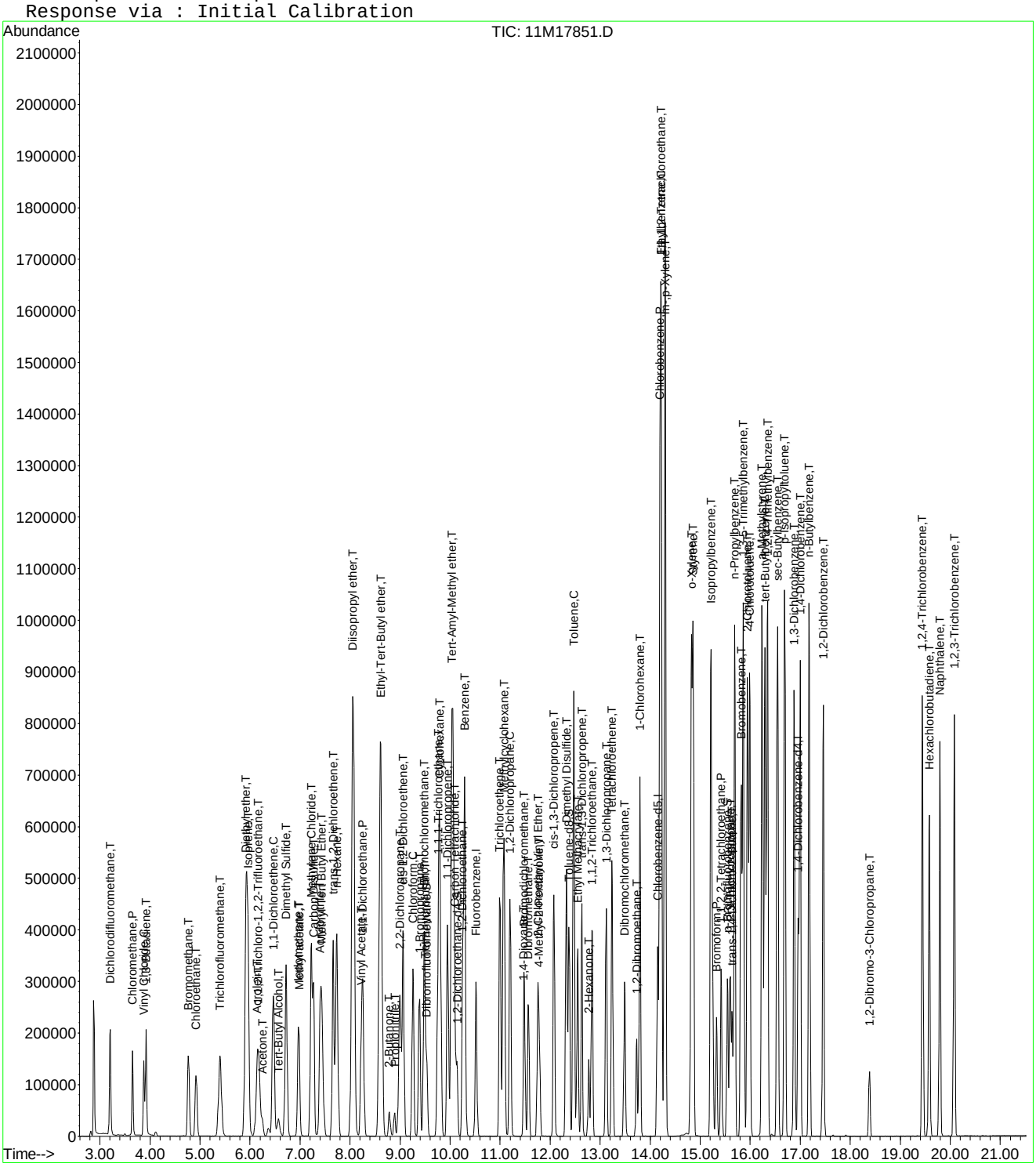
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	276341	50.3958	ug/L	100
45)	Benzene	10.29	78	744219	48.3766	ug/L	99
46)	Trichloroethene	10.99	130	199424	49.4550	ug/L	99
47)	Methylcyclohexane	11.07	83	332710	53.8156	ug/L	99
48)	1,2-Dichloropropane	11.20	63	237726	49.6513	ug/L	99
49)	1,4-Dioxane	11.47	88	7652	176.9795	ug/L	97
50)	Bromodichloromethane	11.48	83	253350	50.7189	ug/L	100
51)	Dibromomethane	11.56	93	112000	49.4509	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	129724	49.5914	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	74996	44.5226	ug/L	97
54)	cis-1,3-Dichloropropene	12.08	75	311218	52.5117	ug/L	100
55)	Dimethyl Disulfide	12.32	79	179167	48.4346	ug/L	99
58)	Toluene	12.47	91	775337	47.7564	ug/L	98
59)	Ethyl Methacrylate	12.55	69	232130	52.0225	ug/L	97
60)	trans-1,3-Dichloropropene	12.64	75	277518	54.1503	ug/L	99
61)	1,1,2-Trichloroethane	12.83	97	168469	49.1910	ug/L	100
62)	2-Hexanone	12.77	43	131921	46.3646	ug/L	97
63)	1,3-Dichloropropane	13.12	76	280713	49.3509	ug/L	96
64)	Tetrachloroethene	13.23	164	174638	54.1888	ug/L	99
65)	Dibromochloromethane	13.48	129	203082	53.1881	ug/L	99
66)	1,2-Dibromoethane	13.73	107	156212	50.7390	ug/L	100
67)	1-Chlorohexane	13.79	91	256318	55.4002	ug/L	97
68)	Chlorobenzene	14.20	112	513545	49.7406	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	199482	51.8968	ug/L	99
70)	Ethylbenzene	14.22	106	292644	53.6005	ug/L	97
71)	m-,p-Xylene	14.30	106	666213	101.9815	ug/L	95
72)	o-Xylene	14.83	106	346070	52.5760	ug/L	98
73)	Styrene	14.86	104	568897	58.3128	ug/L	100
74)	Bromoform	15.32	173	139788	51.0929	ug/L	99
75)	Isopropylbenzene	15.22	105	842047	52.4384	ug/L	98
77)	1,1,2,2-Tetrachloroethane	15.42	83	212742	47.7316	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	60667	47.5356	ug/L	93
80)	trans-1,4-Dichloro-2-Buten	15.63	53	73605	53.3386	ug/L	83
81)	n-Propylbenzene	15.69	91	1012510	50.9547	ug/L	99
82)	Bromobenzene	15.82	156	248729	51.4352	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	727703	53.5305	ug/L	99
84)	2-Chlorotoluene	15.94	91	631982	46.8438	ug/L	88
85)	4-Chlorotoluene	15.99	91	627489	51.5315	ug/L	88
86)	a-Methylstyrene	16.23	118	407243	54.3540	ug/L	99
87)	tert-Butylbenzene	16.30	134	168088	50.8565	ug/L	98
88)	1,2,4-Trimethylbenzene	16.35	105	746242	52.4871	ug/L	99
89)	sec-Butylbenzene	16.54	105	916451	51.0449	ug/L	99
90)	p-Isopropyltoluene	16.69	119	798593	55.3562	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	462127	53.7234	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	459322	49.6500	ug/L	98
93)	n-Butylbenzene	17.17	91	744323	57.8468	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	447937	51.6052	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	38102	48.7220	ug/L	99
96)	1,2,4-Trichlorobenzene	19.44	180	349947	56.1556	ug/L	100
97)	Hexachlorobutadiene	19.58	225	187425	56.7075	ug/L	99
98)	Naphthalene	19.79	128	713723	51.3518	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	337144	52.8817	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17851.D 8260WT.M Fri Apr 28 19:44:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 19:44 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	79	-0.01
2	T	Dichlorodifluoromethane	0.2938	0.3474	-18.2	79	0.00
3	P	Chloromethane	0.3458	0.2564	25.9#	87	0.00
4	C	Vinyl Chloride	0.2146	0.2243	-4.5	79	-0.01
5	T	1,3-Butadiene	0.1274	0.1332	-4.5	77	-0.01
6	T	Bromomethane	0.2216	0.2050	7.5	80	-0.01
7	T	Chloroethane	0.2223	0.2285	-2.8	77	-0.01
8	T	Trichlorofluoromethane	0.3749	0.4045	-7.9	80	-0.01
9	T	Diethyl ether	0.2774	0.2612	5.9	74	-0.01
10	T	Isoprene	0.3883	0.4122	-6.2	75	-0.01
11	T	Acrolein	0.0441	0.0355	19.6	63	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2412	-8.6	81	0.00
13	T	Acetone	0.0836	0.0746	10.7	72	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4641	-3.9	78	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0268	14.3	69	0.00
16	T	Dimethyl Sulfide	0.3507	0.3468	1.1	75	-0.01
17	T	Iodomethane	0.2712	0.3019	-11.3	72	0.00
18	T	Methyl acetate	0.2636	0.2706	-2.6	81	0.00
19	T	Methylene Chloride	0.2979	0.2843	4.6	75	0.00
20	T	Carbon Disulfide	0.7634	0.7613	0.3	75	-0.01
21	T	Acrylonitrile	0.1235	0.1187	3.9	74	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7247	2.9	73	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2665	1.9	77	-0.01
24	T	n-Hexane	0.4214	0.4849	-15.1	84	0.00
25	T	Diisopropyl ether	1.0863	1.0892	-0.3	79	-0.01
26	T	Vinyl Acetate	0.5071	0.4848	4.4	74	-0.01
27	P	1,1-Dichloroethane	0.5727	0.5684	0.7	77	-0.01
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9288	3.3	76	0.00
29	T	2-Butanone	0.1366	0.1260	7.8	72	-0.01
30	T	Propionitrile	0.0456	0.0416	8.8	72	0.00
31	T	2,2-Dichloropropane	0.3876	0.4089	-5.5	85	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.3023	0.9	75	-0.01
33	C	Chloroform	0.5272	0.4683	11.2	77	0.00
34	T	1-Bromopropane	0.0547	0.0548	-0.1	70	0.00
35	T	Bromochloromethane	0.1869	0.1864	0.3	75	0.00
36	T	Tetrahydrofuran	0.1113	0.0957	14.0	73	0.00
37	S	Dibromofluoromethane	0.2476	0.2574	-3.9	81	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4214	-4.4	77	0.00
39	T	Cyclohexane	0.5678	0.5979	-5.3	76	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3671	-3.7	78	0.00
41	T	Carbon Tetrachloride	0.3493	0.3757	-7.6	78	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7292	5.9	74	-0.01
43	S	1,2-Dichloroethane-d4	0.2874	0.3032	-5.5	81	0.00
44	T	1,2-Dichloroethane	0.3908	0.3939	-0.8	76	0.00
45	T	Benzene	1.0964	1.0608	3.2	77	0.00
46	T	Trichloroethene	0.2874	0.2843	1.1	75	-0.01
47	T	Methylcyclohexane	0.4406	0.4742	-7.6	77	0.00
48	C	1,2-Dichloropropane	0.3412	0.3388	0.7	76	0.00
49	T	1,4-Dioxane	0.0031	0.0027	11.4	72	0.00
50	T	Bromodichloromethane	0.3560	0.3611	-1.4	75	-0.01
51	T	Dibromomethane	0.1614	0.1596	1.1	74	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1849	0.8	73	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1069	11.0	71	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4436	-5.0	76	0.00

(#) = Out of Range
11M17851.D 8260WT.M Fri Apr 28 19:53:41 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2554	3.1	73	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	78	0.00
57	S	Toluene-d8	1.2981	1.3801	-6.3	79	0.00
58	C	Toluene	1.6186	1.5460	4.5	77	0.00
59	T	Ethyl Methacrylate	0.4449	0.4628	-4.0	74	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5534	-8.3	76	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3359	1.6	75	-0.01
62	T	2-Hexanone	0.2837	0.2630	7.3	71	0.00
63	T	1,3-Dichloropropane	0.5671	0.5597	1.3	74	0.00
64	T	Tetrachloroethene	0.3213	0.3482	-8.4	78	0.00
65	T	Dibromochloromethane	0.3807	0.4049	-6.4	75	-0.01
66	T	1,2-Dibromoethane	0.3069	0.3115	-1.5	75	0.00
67	T	1-Chlorohexane	0.4613	0.5111	-10.8	77	0.00
68	P	Chlorobenzene	1.0293	1.0240	0.5	78	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3978	-3.8	75	0.00
70	C	Ethylbenzene	0.5443	0.5835	-7.2	78	0.00
71	T	m-,p-Xylene	0.6513	0.6642	-2.0	77	0.00
72	T	o-Xylene	0.6562	0.6901	-5.2	77	0.00
73	T	Styrene	0.9726	1.1344	-16.6	78	0.00
74	P	Bromoform	0.2728	0.2787	-2.2	74	0.00
75	T	Isopropylbenzene	1.6009	1.6790	-4.9	80	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	80	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7503	4.5	74	0.00
78	S	p-Bromofluorobenzene	0.8689	0.8905	-2.5	78	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2140	4.9	72	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2596	-6.7	85	0.00
81	T	n-Propylbenzene	3.5039	3.5708	-1.9	81	0.00
82	T	Bromobenzene	0.8527	0.8772	-2.9	77	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.5664	-7.1	79	0.00
84	T	2-Chlorotoluene	2.3790	2.2288	6.3	79	0.00
85	T	4-Chlorotoluene	2.1472	2.2130	-3.1	80	0.00
86	T	a-Methylstyrene	1.3212	1.4362	-8.7	77	0.00
87	T	tert-Butylbenzene	0.5828	0.5928	-1.7	77	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.6318	-5.0	79	0.00
89	T	sec-Butylbenzene	3.1659	3.2321	-2.1	80	0.00
90	T	p-Isopropyltoluene	2.5439	2.8164	-10.7	80	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.6298	-7.4	79	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.6199	0.7	79	0.00
93	T	n-Butylbenzene	2.2689	2.6250	-15.7	82	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.5798	-3.2	77	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1344	2.6	73	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2342	-12.3	79	-0.01
97	T	Hexachlorobutadiene	0.5828	0.6610	-13.4	83	0.00
98	T	Naphthalene	2.4508	2.5171	-2.7	76	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1890	-5.8	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17851.D 8260WT.M Fri Apr 28 19:53:42 2017 Page 2

Data File : C:\MSDCHEM\1\DATA\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	79	-0.01
2	T	Dichlorodifluoromethane	50.0000	56.6148	-13.2	79	0.00
3	P	Chloromethane	50.0000	42.6003	14.8	87	0.00
4	C	Vinyl Chloride	50.0000	52.2630	-4.5	79	-0.01
5	T	1,3-Butadiene	50.0000	55.9502	-11.9	77	-0.01
6	T	Bromomethane	50.0000	46.2726	7.5	80	-0.01
7	T	Chloroethane	50.0000	51.4102	-2.8	77	-0.01
8	T	Trichlorofluoromethane	50.0000	53.9510	-7.9	80	-0.01
9	T	Diethyl ether	100.0000	94.1501	5.8	74	-0.01
10	T	Isoprene	50.0000	53.0760	-6.2	75	-0.01
11	T	Acrolein	50.0000	40.1940	19.6	63	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	54.3150	-8.6	81	0.00
13	T	Acetone	50.0000	44.6256	10.7	72	-0.01
14	C	1,1-Dichloroethene	50.0000	51.9683	-3.9	78	-0.01
15	T	Tert-Butyl Alcohol	200.0000	171.5098	14.2	69	0.00
16	T	Dimethyl Sulfide	50.0000	49.4318	1.1	75	-0.01
17	T	Iodomethane	50.0000	49.2914	1.4	72	0.00
18	T	Methyl acetate	50.0000	51.3145	-2.6	81	0.00
19	T	Methylene Chloride	50.0000	47.7146	4.6	75	0.00
20	T	Carbon Disulfide	50.0000	49.8676	0.3	75	-0.01
21	T	Acrylonitrile	50.0000	48.0683	3.9	74	0.00
22	T	Methyl Tert Butyl Ether	50.0000	48.5726	2.9	73	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	49.0499	1.9	77	-0.01
24	T	n-Hexane	50.0000	57.5404	-15.1	84	0.00
25	T	Diisopropyl ether	100.0000	100.2616	-0.3	79	-0.01
26	T	Vinyl Acetate	50.0000	47.8024	4.4	74	-0.01
27	P	1,1-Dichloroethane	50.0000	49.6274	0.7	77	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	96.7247	3.3	76	0.00
29	T	2-Butanone	50.0000	46.1050	7.8	72	-0.01
30	T	Propionitrile	100.0000	91.2120	8.8	72	0.00
31	T	2,2-Dichloropropane	50.0000	52.7446	-5.5	85	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	49.5721	0.9	75	-0.01
33	C	Chloroform	50.0000	51.5070	-3.0	77	0.00
34	T	1-Bromopropane	50.0000	45.0013	10.0	70	0.00
35	T	Bromochloromethane	50.0000	49.8452	0.3	75	0.00
36	T	Tetrahydrofuran	100.0000	85.9925	14.0	73	0.00
37	S	Dibromofluoromethane	25.0000	25.9826	-3.9	81	0.00
38	T	1,1,1-Trichloroethane	50.0000	52.1767	-4.4	77	0.00
39	T	Cyclohexane	50.0000	52.6486	-5.3	76	-0.01
40	T	1,1-Dichloropropene	50.0000	51.8663	-3.7	78	0.00
41	T	Carbon Tetrachloride	50.0000	53.7856	-7.6	78	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	94.1302	5.9	74	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.3764	-5.5	81	0.00
44	T	1,2-Dichloroethane	50.0000	50.3958	-0.8	76	0.00
45	T	Benzene	50.0000	48.3766	3.2	77	0.00
46	T	Trichloroethene	50.0000	49.4550	1.1	75	-0.01
47	T	Methylcyclohexane	50.0000	53.8156	-7.6	77	0.00
48	C	1,2-Dichloropropane	50.0000	49.6513	0.7	76	0.00
49	T	1,4-Dioxane	200.0000	176.9795	11.5	72	0.00
50	T	Bromodichloromethane	50.0000	50.7189	-1.4	75	-0.01
51	T	Dibromomethane	50.0000	49.4509	1.1	74	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	49.5914	0.8	73	0.00
53	T	4-Methyl-2-Pentanone	50.0000	44.5226	11.0	71	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	52.5117	-5.0	76	0.00

(#) = Out of Range
11M17851.D 8260WT.M Fri Apr 28 19:53:44 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042817\11M17851.D Vial: 1
Acq On : 28 Apr 2017 19:23 Operator: JDS
Sample : WG612020-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	48.4346	3.1	73	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	78	0.00
57	S	Toluene-d8	25.0000	26.5789	-6.3	79	0.00
58	C	Toluene	50.0000	47.7564	4.5	77	0.00
59	T	Ethyl Methacrylate	50.0000	52.0225	-4.0	74	0.00
60	T	trans-1,3-Dichloropropene	50.0000	54.1503	-8.3	76	0.00
61	T	1,1,2-Trichloroethane	50.0000	49.1910	1.6	75	-0.01
62	T	2-Hexanone	50.0000	46.3646	7.3	71	0.00
63	T	1,3-Dichloropropane	50.0000	49.3509	1.3	74	0.00
64	T	Tetrachloroethene	50.0000	54.1888	-8.4	78	0.00
65	T	Dibromochloromethane	50.0000	53.1881	-6.4	75	-0.01
66	T	1,2-Dibromoethane	50.0000	50.7390	-1.5	75	0.00
67	T	1-Chlorohexane	50.0000	55.4002	-10.8	77	0.00
68	P	Chlorobenzene	50.0000	49.7406	0.5	78	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	51.8968	-3.8	75	0.00
70	C	Ethylbenzene	50.0000	53.6005	-7.2	78	0.00
71	T	m-,p-Xylene	100.0000	101.9815	-2.0	77	0.00
72	T	o-Xylene	50.0000	52.5760	-5.2	77	0.00
73	T	Styrene	50.0000	58.3128	-16.6	78	0.00
74	P	Bromoform	50.0000	51.0929	-2.2	74	0.00
75	T	Isopropylbenzene	50.0000	52.4384	-4.9	80	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	80	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	47.7316	4.5	74	0.00
78	S	p-Bromofluorobenzene	25.0000	25.6193	-2.5	78	0.00
79	T	1,2,3-Trichloropropane	50.0000	47.5356	4.9	72	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	53.3385	-6.7	85	0.00
81	T	n-Propylbenzene	50.0000	50.9547	-1.9	81	0.00
82	T	Bromobenzene	50.0000	51.4352	-2.9	77	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	53.5305	-7.1	79	0.00
84	T	2-Chlorotoluene	50.0000	46.8438	6.3	79	0.00
85	T	4-Chlorotoluene	50.0000	51.5315	-3.1	80	0.00
86	T	a-Methylstyrene	50.0000	54.3540	-8.7	77	0.00
87	T	tert-Butylbenzene	50.0000	50.8565	-1.7	77	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	52.4871	-5.0	79	0.00
89	T	sec-Butylbenzene	50.0000	51.0449	-2.1	80	0.00
90	T	p-Isopropyltoluene	50.0000	55.3562	-10.7	80	0.00
91	T	1,3-Dichlorobenzene	50.0000	53.7234	-7.4	79	0.00
92	T	1,4-Dichlorobenzene	50.0000	49.6500	0.7	79	0.00
93	T	n-Butylbenzene	50.0000	57.8468	-15.7	82	0.00
94	T	1,2-Dichlorobenzene	50.0000	51.6052	-3.2	77	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	48.7221	2.6	73	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	56.1556	-12.3	79	-0.01
97	T	Hexachlorobutadiene	50.0000	56.7075	-13.4	83	0.00
98	T	Naphthalene	50.0000	51.3518	-2.7	76	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	52.8817	-5.8	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17851.D 8260WT.M Fri Apr 28 19:53:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	377587	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	273493	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	151470	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	98358	26.2983	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.20%			
43) 1,2-Dichloroethane-d4	10.13	65	113244	26.0915	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.36%			
57) Toluene-d8	12.38	98	380659	26.8050	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%			
78) p-Bromofluorobenzene	15.54	95	140530	26.6929	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	234829	50.7013	ug/L	99
3) Chloromethane	3.65	50	171923	37.7391	ug/L	98
4) Vinyl Chloride	3.88	62	174945	53.9835	ug/L	99
5) 1,3-Butadiene	3.92	54	115323	64.7625	ug/L	96
6) Bromomethane	4.77	94	149144	44.5719	ug/L	99
7) Chloroethane	4.92	64	160409	47.7845	ug/L	100
8) Trichlorofluoromethane	5.40	101	281187	49.6650	ug/L	99
9) Diethyl ether	5.91	59	398171	95.0336	ug/L	97
10) Isoprene	5.96	67	312628	53.3000	ug/L	99
11) Acrolein	6.15	56	27281	40.9365	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	165270	49.2905	ug/L	99
13) Acetone	6.25	43	53550	42.4159	ug/L	96
14) 1,1-Dichloroethene	6.46	61	327341	48.5436	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	76883	162.8138	ug/L	99
16) Dimethyl Sulfide	6.72	62	253821	47.9142	ug/L	96
17) Iodomethane	6.97	142	211978	45.9162	ug/L	99
18) Methyl acetate	6.98	43	199442	50.0875	ug/L	98
19) Methylene Chloride	7.22	84	203154	45.1537	ug/L	94
20) Carbon Disulfide	7.27	76	579960	50.3019	ug/L	100
21) Acrylonitrile	7.40	53	87375	46.8580	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	523295	46.4458	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	187750	45.7534	ug/L	96
24) n-Hexane	7.73	57	373840	58.7390	ug/L	98
25) Diisopropyl ether	8.05	45	1664100	101.4220	ug/L	98
26) Vinyl Acetate	8.22	43	375180	48.9849	ug/L	99
27) 1,1-Dichloroethane	8.25	63	411194	47.5415	ug/L	99
28) Ethyl-Tert-Butyl ether	8.60	59	1399566	96.5018	ug/L	98
29) 2-Butanone	8.78	43	94319	45.7212	ug/L	98
30) Propionitrile	8.89	54	60167	87.4277	ug/L	98
31) 2,2-Dichloropropane	9.00	77	296283	50.6074	ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	217610	47.2576	ug/L	94
33) Chloroform	9.25	83	335657	48.8794	ug/L	100
34) 1-Bromopropane	9.39	122	40922	44.5244	ug/L	95
35) Bromochloromethane	9.48	130	129174	45.7513	ug/L	93
36) Tetrahydrofuran	9.50	42	142627	84.8816	ug/L	96
38) 1,1,1-Trichloroethane	9.76	97	297657	48.8059	ug/L	99
39) Cyclohexane	9.79	56	455459	53.1111	ug/L	97
40) 1,1-Dichloropropene	9.95	75	258756	48.4093	ug/L	99
41) Carbon Tetrachloride	10.09	117	259083	49.1159	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1104100	94.3703	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17869.D 8260WT.M Sat Apr 29 19:25:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

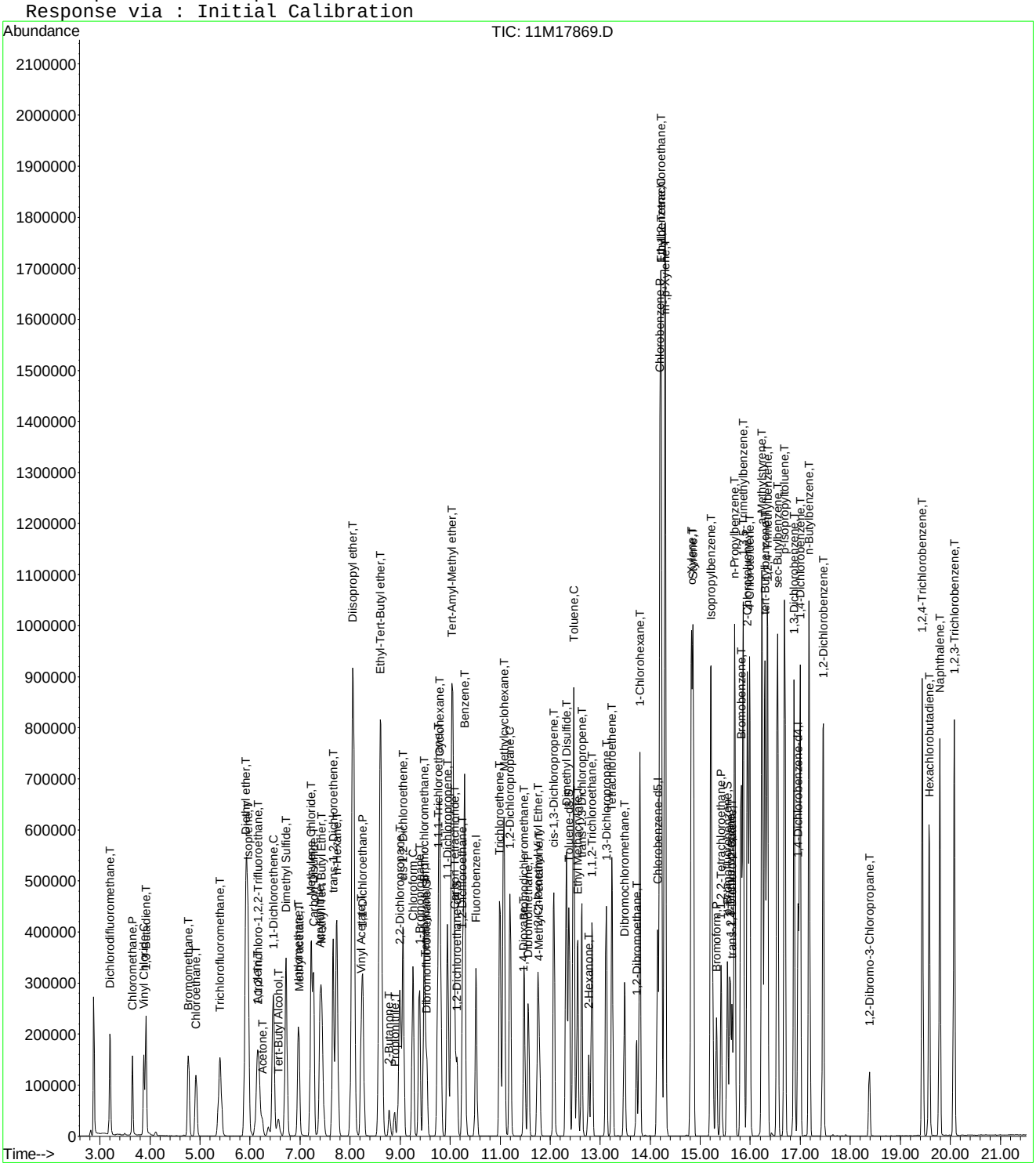
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	280790	47.5726	ug/L	100
45)	Benzene	10.29	78	755591	45.6297	ug/L	99
46)	Trichloroethene	10.99	130	197539	45.5105	ug/L	98
47)	Methylcyclohexane	11.07	83	356832	53.6207	ug/L	98
48)	1,2-Dichloropropane	11.20	63	243886	47.3225	ug/L	99
49)	1,4-Dioxane	11.47	88	7182	154.3191	ug/L	90
50)	Bromodichloromethane	11.48	83	261815	48.6933	ug/L	100
51)	Dibromomethane	11.56	93	114061	46.7864	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	138274	49.1081	ug/L	100
53)	4-Methyl-2-Pentanone	11.78	58	80029	44.1384	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	323822	50.7603	ug/L	99
55)	Dimethyl Disulfide	12.32	79	196311	49.3025	ug/L	99
58)	Toluene	12.47	91	788483	44.5291	ug/L	98
59)	Ethyl Methacrylate	12.55	69	245605	50.4670	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	286013	51.1689	ug/L	98
61)	1,1,2-Trichloroethane	12.83	97	170909	45.7553	ug/L	98
62)	2-Hexanone	12.77	43	139786	45.0450	ug/L	98
63)	1,3-Dichloropropane	13.12	76	285083	45.9530	ug/L	93
64)	Tetrachloroethene	13.23	164	172661	49.1220	ug/L	99
65)	Dibromochloromethane	13.48	129	205885	49.4400	ug/L	99
66)	1,2-Dibromoethane	13.73	107	156839	46.7081	ug/L	99
67)	1-Chlorohexane	13.79	91	279869	55.4622	ug/L	97
68)	Chlorobenzene	14.20	112	516373	45.8570	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	199529	47.5941	ug/L	99
70)	Ethylbenzene	14.22	106	295332	49.5964	ug/L	96
71)	m-,p-Xylene	14.30	106	677561	95.0970	ug/L	96
72)	o-Xylene	14.83	106	349638	48.7026	ug/L	97
73)	Styrene	14.86	104	571749	53.7336	ug/L	100
74)	Bromoform	15.32	173	140741	47.1652	ug/L	99
75)	Isopropylbenzene	15.22	105	840218	47.9750	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	216860	45.5413	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	60125	44.0955	ug/L	97
80)	trans-1,4-Dichloro-2-Buten	15.63	53	74279	50.3817	ug/L	84
81)	n-Propylbenzene	15.69	91	1019169	48.0069	ug/L	98
82)	Bromobenzene	15.82	156	251660	48.7104	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	731926	50.3950	ug/L	98
84)	2-Chlorotoluene	15.94	91	652835	45.2922	ug/L	88
85)	4-Chlorotoluene	15.99	91	629357	48.3767	ug/L	89
86)	a-Methylstyrene	16.23	118	431026	53.8462	ug/L	99
87)	tert-Butylbenzene	16.30	134	163276	46.2387	ug/L	93
88)	1,2,4-Trimethylbenzene	16.35	105	751305	49.4609	ug/L	98
89)	sec-Butylbenzene	16.54	105	913634	47.6309	ug/L	99
90)	p-Isopropyltoluene	16.69	119	793754	51.4991	ug/L	99
91)	1,3-Dichlorobenzene	16.87	146	465150	50.6137	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	467994	47.3495	ug/L	99
93)	n-Butylbenzene	17.17	91	746891	54.3311	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	451560	48.6928	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	38793	46.4306	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	356631	53.5652	ug/L	100
97)	Hexachlorobutadiene	19.58	225	179707	50.8921	ug/L	99
98)	Naphthalene	19.79	128	719637	48.4632	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	337608	49.5651	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17869.D 8260WT.M Sat Apr 29 19:25:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: hpms11
Initial cal date: 24 Mar 2017 18:45
CCV date: 29 Apr 2017 18:53
CCV Filename: 11M17869.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	432286	10.54	305247	14.17	158955	16.98
CCV	377587	10.52	273493	14.14	151470	16.96

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	0.2938	0.3110	-5.9	76	0.00
3	P	Chloromethane	0.3458	0.2277	34.2#	83	0.00
4	C	Vinyl Chloride	0.2146	0.2317	-8.0	87	-0.01
5	T	1,3-Butadiene	0.1274	0.1527	-19.8	95	-0.01
6	T	Bromomethane	0.2216	0.1975	10.9	83	-0.01
7	T	Chloroethane	0.2223	0.2124	4.4	77	-0.01
8	T	Trichlorofluoromethane	0.3749	0.3724	0.7	79	-0.01
9	T	Diethyl ether	0.2774	0.2636	5.0	81	-0.01
10	T	Isoprene	0.3883	0.4140	-6.6	81	-0.01
11	T	Acrolein	0.0441	0.0361	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2188	1.4	79	0.00
13	T	Acetone	0.0836	0.0709	15.2	74	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4335	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0255	18.6	71	0.00
16	T	Dimethyl Sulfide	0.3507	0.3361	4.2	78	-0.01
17	T	Iodomethane	0.2712	0.2807	-3.5	72	0.00
18	T	Methyl acetate	0.2636	0.2641	-0.2	85	0.00
19	T	Methylene Chloride	0.2979	0.2690	9.7	77	-0.01
20	T	Carbon Disulfide	0.7634	0.7680	-0.6	81	-0.01
21	T	Acrylonitrile	0.1235	0.1157	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.6929	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2486	8.5	77	-0.01
24	T	n-Hexane	0.4214	0.4950	-17.5	92	0.00
25	T	Diisopropyl ether	1.0863	1.1018	-1.4	86	-0.01
26	T	Vinyl Acetate	0.5071	0.4968	2.0	81	-0.01
27	P	1,1-Dichloroethane	0.5727	0.5445	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	82	-0.01
29	T	2-Butanone	0.1366	0.1249	8.6	77	-0.01
30	T	Propionitrile	0.0456	0.0398	12.6	74	0.00
31	T	2,2-Dichloropropane	0.3876	0.3923	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.2882	5.5	77	-0.01
33	C	Chloroform	0.5272	0.4445	15.7	78	0.00
34	T	1-Bromopropane	0.0547	0.0542	1.0	75	0.00
35	T	Bromochloromethane	0.1869	0.1711	8.5	74	0.00
36	T	Tetrahydrofuran	0.1113	0.0944	15.1	78	0.00
37	S	Dibromofluoromethane	0.2476	0.2605	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.3942	2.4	77	0.00
39	T	Cyclohexane	0.5678	0.6031	-6.2	83	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3426	3.2	78	0.00
41	T	Carbon Tetrachloride	0.3493	0.3431	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7310	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	0.2874	0.2999	-4.4	87	-0.01
44	T	1,2-Dichloroethane	0.3908	0.3718	4.9	78	0.00
45	T	Benzene	1.0964	1.0006	8.7	78	0.00
46	T	Trichloroethene	0.2874	0.2616	9.0	74	-0.01
47	T	Methylcyclohexane	0.4406	0.4725	-7.2	83	0.00
48	C	1,2-Dichloropropane	0.3412	0.3230	5.4	78	0.00
49	T	1,4-Dioxane	0.0031	0.0024	22.7	67	0.00
50	T	Bromodichloromethane	0.3560	0.3467	2.6	78	-0.01
51	T	Dibromomethane	0.1614	0.1510	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1831	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1060	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4288	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:40 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2600	1.4	80	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	85	0.00
57	S	Toluene-d8	1.2981	1.3918	-7.2	87	0.00
58	C	Toluene	1.6186	1.4415	10.9	79	0.00
59	T	Ethyl Methacrylate	0.4449	0.4490	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5229	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3125	8.5	76	-0.01
62	T	2-Hexanone	0.2837	0.2556	9.9	75	0.00
63	T	1,3-Dichloropropane	0.5671	0.5212	8.1	75	0.00
64	T	Tetrachloroethene	0.3213	0.3157	1.8	77	0.00
65	T	Dibromochloromethane	0.3807	0.3764	1.1	76	-0.01
66	T	1,2-Dibromoethane	0.3069	0.2867	6.6	75	0.00
67	T	1-Chlorohexane	0.4613	0.5117	-10.9	84	0.00
68	P	Chlorobenzene	1.0293	0.9440	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3648	4.8	75	0.00
70	C	Ethylbenzene	0.5443	0.5399	0.8	78	0.00
71	T	m-,p-Xylene	0.6513	0.6194	4.9	79	0.00
72	T	o-Xylene	0.6562	0.6392	2.6	78	0.00
73	T	Styrene	0.9726	1.0453	-7.5	79	0.00
74	P	Bromoform	0.2728	0.2573	5.7	74	0.00
75	T	Isopropylbenzene	1.6009	1.5361	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7158	8.9	76	0.00
78	S	p-Bromofluorobenzene	0.8689	0.9278	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.1985	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2452	-0.8	86	0.00
81	T	n-Propylbenzene	3.5039	3.3643	4.0	81	0.00
82	T	Bromobenzene	0.8527	0.8307	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4161	-0.8	80	0.00
84	T	2-Chlorotoluene	2.3790	2.1550	9.4	82	0.00
85	T	4-Chlorotoluene	2.1472	2.0775	3.2	80	0.00
86	T	a-Methylstyrene	1.3212	1.4228	-7.7	81	0.00
87	T	tert-Butylbenzene	0.5828	0.5390	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4800	1.1	80	0.00
89	T	sec-Butylbenzene	3.1659	3.0159	4.7	79	0.00
90	T	p-Isopropyltoluene	2.5439	2.6202	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5355	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5448	5.3	81	0.00
93	T	n-Butylbenzene	2.2689	2.4655	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.4906	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1281	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.1772	-7.1	80	-0.01
97	T	Hexachlorobutadiene	0.5828	0.5932	-1.8	80	0.00
98	T	Naphthalene	2.4508	2.3755	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1144	0.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17869.D 8260WT.M Sat Apr 29 19:25:40 2017 Page 2

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	50.0000	50.7013	-1.4	76	0.00
3	P	Chloromethane	50.0000	37.7391	24.5	83	0.00
4	C	Vinyl Chloride	50.0000	53.9835	-8.0	87	-0.01
5	T	1,3-Butadiene	50.0000	64.7625	-29.5#	95	-0.01
6	T	Bromomethane	50.0000	44.5719	10.9	83	-0.01
7	T	Chloroethane	50.0000	47.7845	4.4	77	-0.01
8	T	Trichlorofluoromethane	50.0000	49.6650	0.7	79	-0.01
9	T	Diethyl ether	100.0000	95.0336	5.0	81	-0.01
10	T	Isoprene	50.0000	53.3000	-6.6	81	-0.01
11	T	Acrolein	50.0000	40.9365	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	49.2905	1.4	79	0.00
13	T	Acetone	50.0000	42.4158	15.2	74	-0.01
14	C	1,1-Dichloroethene	50.0000	48.5436	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	200.0000	162.8138	18.6	71	0.00
16	T	Dimethyl Sulfide	50.0000	47.9142	4.2	78	-0.01
17	T	Iodomethane	50.0000	45.9162	8.2	72	0.00
18	T	Methyl acetate	50.0000	50.0875	-0.2	85	0.00
19	T	Methylene Chloride	50.0000	45.1537	9.7	77	-0.01
20	T	Carbon Disulfide	50.0000	50.3019	-0.6	81	-0.01
21	T	Acrylonitrile	50.0000	46.8580	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.4458	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	45.7534	8.5	77	-0.01
24	T	n-Hexane	50.0000	58.7390	-17.5	92	0.00
25	T	Diisopropyl ether	100.0000	101.4220	-1.4	86	-0.01
26	T	Vinyl Acetate	50.0000	48.9849	2.0	81	-0.01
27	P	1,1-Dichloroethane	50.0000	47.5415	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5018	3.5	82	-0.01
29	T	2-Butanone	50.0000	45.7212	8.6	77	-0.01
30	T	Propionitrile	100.0000	87.4277	12.6	74	0.00
31	T	2,2-Dichloropropane	50.0000	50.6073	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	47.2576	5.5	77	-0.01
33	C	Chloroform	50.0000	48.8794	2.2	78	0.00
34	T	1-Bromopropane	50.0000	44.5244	11.0	75	0.00
35	T	Bromochloromethane	50.0000	45.7513	8.5	74	0.00
36	T	Tetrahydrofuran	100.0000	84.8816	15.1	78	0.00
37	S	Dibromofluoromethane	25.0000	26.2983	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	50.0000	48.8059	2.4	77	0.00
39	T	Cyclohexane	50.0000	53.1112	-6.2	83	-0.01
40	T	1,1-Dichloropropene	50.0000	48.4093	3.2	78	0.00
41	T	Carbon Tetrachloride	50.0000	49.1159	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	94.3703	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.0915	-4.4	87	-0.01
44	T	1,2-Dichloroethane	50.0000	47.5726	4.9	78	0.00
45	T	Benzene	50.0000	45.6297	8.7	78	0.00
46	T	Trichloroethene	50.0000	45.5105	9.0	74	-0.01
47	T	Methylcyclohexane	50.0000	53.6207	-7.2	83	0.00
48	C	1,2-Dichloropropane	50.0000	47.3225	5.4	78	0.00
49	T	1,4-Dioxane	200.0000	154.3191	22.8	67	0.00
50	T	Bromodichloromethane	50.0000	48.6933	2.6	78	-0.01
51	T	Dibromomethane	50.0000	46.7864	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	49.1081	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	50.0000	44.1384	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	50.7603	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:42 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	49.3025	1.4	80	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	85	0.00
57	S	Toluene-d8	25.0000	26.8050	-7.2	87	0.00
58	C	Toluene	50.0000	44.5291	10.9	79	0.00
59	T	Ethyl Methacrylate	50.0000	50.4670	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	50.0000	51.1689	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	50.0000	45.7553	8.5	76	-0.01
62	T	2-Hexanone	50.0000	45.0450	9.9	75	0.00
63	T	1,3-Dichloropropane	50.0000	45.9530	8.1	75	0.00
64	T	Tetrachloroethene	50.0000	49.1219	1.8	77	0.00
65	T	Dibromochloromethane	50.0000	49.4400	1.1	76	-0.01
66	T	1,2-Dibromoethane	50.0000	46.7081	6.6	75	0.00
67	T	1-Chlorohexane	50.0000	55.4622	-10.9	84	0.00
68	P	Chlorobenzene	50.0000	45.8570	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	47.5941	4.8	75	0.00
70	C	Ethylbenzene	50.0000	49.5964	0.8	78	0.00
71	T	m-,p-Xylene	100.0000	95.0970	4.9	79	0.00
72	T	o-Xylene	50.0000	48.7026	2.6	78	0.00
73	T	Styrene	50.0000	53.7336	-7.5	79	0.00
74	P	Bromoform	50.0000	47.1652	5.7	74	0.00
75	T	Isopropylbenzene	50.0000	47.9750	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	45.5413	8.9	76	0.00
78	S	p-Bromofluorobenzene	25.0000	26.6929	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	50.0000	44.0955	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	50.3817	-0.8	86	0.00
81	T	n-Propylbenzene	50.0000	48.0069	4.0	81	0.00
82	T	Bromobenzene	50.0000	48.7104	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3950	-0.8	80	0.00
84	T	2-Chlorotoluene	50.0000	45.2922	9.4	82	0.00
85	T	4-Chlorotoluene	50.0000	48.3767	3.2	80	0.00
86	T	a-Methylstyrene	50.0000	53.8462	-7.7	81	0.00
87	T	tert-Butylbenzene	50.0000	46.2387	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.4609	1.1	80	0.00
89	T	sec-Butylbenzene	50.0000	47.6309	4.7	79	0.00
90	T	p-Isopropyltoluene	50.0000	51.4991	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	50.0000	50.6137	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	50.0000	47.3495	5.3	81	0.00
93	T	n-Butylbenzene	50.0000	54.3311	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	50.0000	48.6928	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	46.4306	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	53.5652	-7.1	80	-0.01
97	T	Hexachlorobutadiene	50.0000	50.8921	-1.8	80	0.00
98	T	Naphthalene	50.0000	48.4633	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	49.5651	0.9	78	0.00

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	385785	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	287200	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	145182	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	104329	25.0406	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.162%			
34) 1,2-Dichloroethane-d4	4.956	65	94521	24.2036	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.814%			
47) Toluene-d8	6.812	98	359220	25.0622	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.249%			
66) p-Bromofluorobenzene	8.786	95	122899	25.2822	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.129%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	254492	55.5451	ug/L	100
3) Chloromethane	1.215	50	210371	46.9168	ug/L	99
4) Vinyl Chloride	1.264	62	253843	51.1254	ug/L	100
5) 1,3-Butadiene	1.273	54	164421	53.9344	ug/L	99
6) Bromomethane	1.455	94	137560	37.2646	ug/L	99
7) Chloroethane	1.528	64	109611	46.5351	ug/L	98
8) Trichlorofluoromethane	1.615	101	345749	54.2881	ug/L	99
9) Diethyl ether	1.837	59	284264	92.5558	ug/L	98
10) 1,1-Dichloroethene	1.959	61	299336	50.2315	ug/L	98
11) Carbon Disulfide	1.971	76	645427	50.4640	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	199701	52.5646	ug/L	98
13) Iodomethane	2.060	142	284263	49.4846	ug/L	98
14) Acrolein	2.220	56	16152	42.5748	ug/L	99
15) Methylene Chloride	2.402	84	208845	46.1864	ug/L	98
16) Acetone	2.463	43	32137	41.4308	ug/L	97
17) trans-1,2-Dichloroethene	2.535	96	198924	49.0249	ug/L	99
18) Methyl acetate	2.570	43	101588	49.9560	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	459890	44.6599	ug/L #	24
20) 1,1-Dichloroethane	3.114	63	362626	49.7572	ug/L	100
21) Acrylonitrile	3.184	53	44000	44.4727	ug/L	99
22) Vinyl Acetate	2.613	86	36600	56.0450	ug/L	97
23) cis-1,2-Dichloroethene	3.728	96	220793	48.0720	ug/L	99
24) 2,2-Dichloropropane	3.864	77	316006	54.7065	ug/L	98
25) Cyclohexane	3.963	56	323029	52.1120	ug/L	98
26) Bromochloromethane	3.980	130	141396	47.7809	ug/L	100
27) Chloroform	4.110	83	365318	48.0784	ug/L	99
28) Carbon Tetrachloride	4.249	117	301083	50.1085	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	328754	49.2119	ug/L	100
31) 1,1-Dichloropropene	4.501	75	260702	49.6910	ug/L	99
32) 2-Butanone	4.530	43	49629	42.9161	ug/L	98
33) Benzene	4.797	78	794098	48.3243	ug/L	99
35) 1,2-Dichloroethane	5.034	62	237120	46.3418	ug/L	99
36) Methylcyclohexane	5.425	83	335056	51.5902	ug/L	99
37) Trichloroethene	5.445	130	227592	46.1109	ug/L	98
38) Dibromomethane	5.859	93	115371	45.8399	ug/L	100
39) 1,2-Dichloropropane	5.966	63	209340	48.5779	ug/L	100
40) Bromodichloromethane	6.050	83	276266	48.0313	ug/L	100
41) 1,4-Dioxane	6.259	88	4405	205.2256	ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.629	63	85773	43.8812	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	329359	50.8150	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	44186	41.2678	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	269998	49.0000	ug/L	100
48) Toluene	6.858	91	889735	49.4128	ug/L	100
49) Tetrachloroethene	7.185	166	250486	48.7731	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	157695	45.1840	ug/L	99
51) Dibromochloromethane	7.507	129	222443	46.6945	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

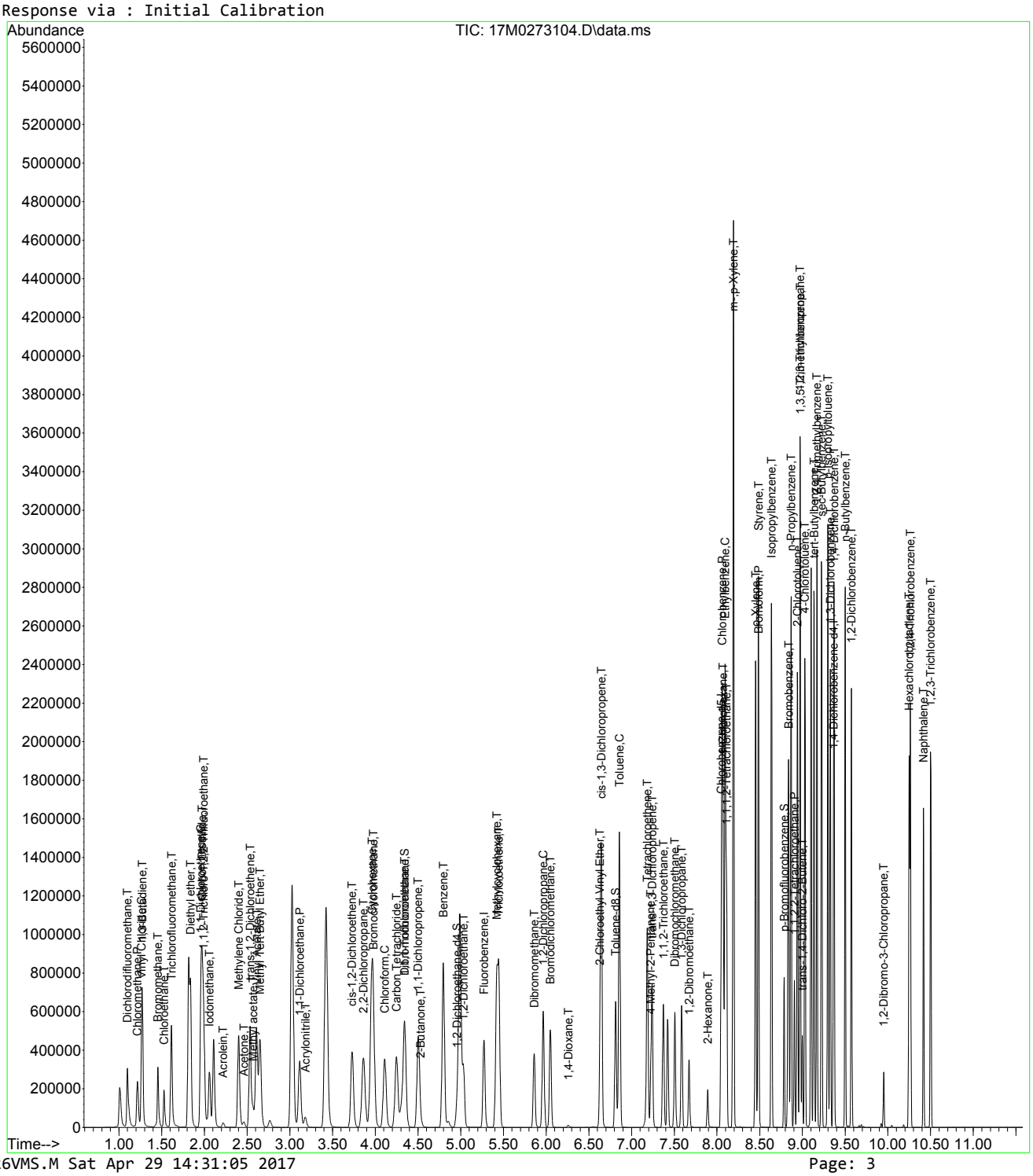
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	256210	46.1912	ug/L		99
53) 1,2-Dibromoethane	7.674	107	159461	44.5950	ug/L		99
54) 2-Hexanone	7.892	43	75989	41.4612	ug/L		99
55) Chlorobenzene	8.060	112	586054	48.5078	ug/L		99
56) 1-Chlorohexane	8.071	69	51526	52.8243	ug/L		96
57) Ethylbenzene	8.094	106	310654	49.3964	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.112	131	224220	47.6756	ug/L		99
59) m-,p-Xylene	8.193	106	763160	100.5480	ug/L		99
60) o-Xylene	8.453	106	362667	48.4956	ug/L		97
61) Styrene	8.485	104	608376	50.8428	ug/L		100
62) Bromoform	8.488	173	155509	46.4056	ug/L		99
63) Isopropylbenzene	8.639	105	959579	49.5721	ug/L		100
65) 1,3,5-Trimethylbenzene	8.974	105	827338	51.1184	ug/L		99
67) Bromobenzene	8.838	156	271383	47.5203	ug/L		98
68) n-Propylbenzene	8.867	91	1117433	52.1208	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	188462	48.2583	ug/L		100
70) 2-Chlorotoluene	8.940	91	662592	50.0709	ug/L		99
71) 1,2,3-Trichloropropane	8.972	110	50968	44.1478	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	42862	49.8035	ug/L	#	97
73) 1,2,4-Trimethylbenzene	9.168	105	831889	50.9731	ug/L		100
74) 4-Chlorotoluene	9.029	91	674434	51.0498	ug/L		99
75) tert-Butylbenzene	9.137	134	158261	48.9273	ug/L		99
76) sec-Butylbenzene	9.223	105	1018664	51.0890	ug/L		99
77) p-Isopropyltoluene	9.296	119	883541	51.9821	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	497129	49.9338	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	487390	48.4906	ug/L		100
80) n-Butylbenzene	9.501	91	782954	54.5774	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	464122	47.8334	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	33874	47.2810	ug/L		93
83) Hexachlorobutadiene	10.248	225	193657	47.3445	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	352636	48.9229	ug/L		99
85) Naphthalene	10.416	128	614902	43.7473	ug/L		100
86) 1,2,3-Trichlorobenzene	10.500	180	317140	45.2968	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:05 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	92	0.000
2	T	Dichlorodifluoromethane	0.297	0.330	-11.1	93	0.000
3	P	Chloromethane	0.291	0.273	6.2	87	0.000
4	C	Vinyl Chloride	0.322	0.329	-2.2#	92	0.000
5	T	1,3-Butadiene	0.198	0.213	-7.6	96	0.000
6	T	Bromomethane	0.239	0.178	25.5#	74	0.000
7	T	Chloroethane	0.153	0.142	7.2	96	0.000
8	T	Trichlorofluoromethane	0.413	0.448	-8.5	93	0.000
9	T	Diethyl ether	0.199	0.184	7.5	83	0.000
10	C	1,1-Dichloroethene	0.386	0.388	-0.5#	92	0.000
11	T	Carbon Disulfide	0.829	0.837	-1.0	91	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.259	-5.3	94	0.000
13	T	Iodomethane	0.286	0.368	-28.7#	94	0.000
14	T	Acrolein	0.025	0.021	16.0	73	0.000
15	T	Methylene Chloride	0.293	0.271	7.5	89	0.000
16	T	Acetone	0.050	0.042	16.0	79	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.258	1.9	90	0.000
18	T	Methyl acetate	0.132	0.132	0.0	79	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.596	10.6	80	0.000
20	P	1,1-Dichloroethane	0.472	0.470	0.4	91	0.000
21	T	Acrylonitrile	0.064	0.057	10.9	79	0.000
22	T	Vinyl Acetate	0.042	0.047	-11.9	97	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.286	4.0	88	0.000
24	T	2,2-Dichloropropane	0.321	0.410	-27.7#	100	0.000
25	T	Cyclohexane	0.402	0.419	-4.2	92	0.000
26	T	Bromochloromethane	0.192	0.183	4.7	85	0.000
27	C	Chloroform	0.492	0.473	3.9#	89	0.000
28	T	Carbon Tetrachloride	0.389	0.390	-0.3	89	0.000
29	S	Dibromofluoromethane	0.270	0.270	0.0	90	0.000
30	T	1,1,1-Trichloroethane	0.433	0.426	1.6	90	0.000
31	T	1,1-Dichloropropene	0.340	0.338	0.6	89	0.000
32	T	2-Butanone	0.075	0.064	14.7	78	0.000
33	T	Benzene	1.065	1.029	3.4	90	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.245	3.2	87	0.000
35	T	1,2-Dichloroethane	0.332	0.307	7.5	85	0.000
36	T	Methylcyclohexane	0.421	0.434	-3.1	91	0.000
37	T	Trichloroethene	0.320	0.295	7.8	86	0.000
38	T	Dibromomethane	0.163	0.150	8.0	82	0.000
39	C	1,2-Dichloropropane	0.279	0.271	2.9#	88	0.000
40	T	Bromodichloromethane	0.373	0.358	4.0	87	0.000
41	T	1,4-Dioxane	0.001	0.001	0.0	95	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.111	12.6	80	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.427	-1.7	89	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.057	17.4	76	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.350	2.0	85	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	91	0.000
47	S	Toluene-d8	1.248	1.251	-0.2	88	0.000
48	C	Toluene	1.567	1.549	1.1#	89	0.000
49	T	Tetrachloroethene	0.447	0.436	2.5	88	0.000
50	T	1,1,2-Trichloroethane	0.304	0.275	9.5	81	0.000
51	T	Dibromochloromethane	0.415	0.387	6.7	81	0.000
52	T	1,3-Dichloropropane	0.483	0.446	7.7	82	0.000
53	T	1,2-Dibromoethane	0.311	0.278	10.6	79	0.000
54	T	2-Hexanone	0.160	0.132	17.5	74	0.000
55	P	Chlorobenzene	1.052	1.020	3.0	87	0.000
56	T	1-Chlorohexane	0.085	0.090	-5.9	91	0.000
57	C	Ethylbenzene	0.547	0.541	1.1#	88	0.000

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.390	4.6	85	0.000
59	T	m-,p-Xylene	0.661	0.664	-0.5	88	0.000
60	T	o-Xylene	0.651	0.631	3.1	86	0.000
61	T	Styrene	1.042	1.059	-1.6	87	0.000
62	P	Bromoform	0.292	0.271	7.2	77	0.000
63	T	Isopropylbenzene	1.685	1.671	0.8	88	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	87	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.849	-2.2	88	0.000
66	S	p-Bromofluorobenzene	0.837	0.847	-1.2	87	0.000
67	T	Bromobenzene	0.983	0.935	4.9	84	0.000
68	T	n-Propylbenzene	3.692	3.848	-4.2	90	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.649	3.4	79	0.000
70	T	2-Chlorotoluene	2.279	2.282	-0.1	88	0.000
71	T	1,2,3-Trichloropropane	0.199	0.176	11.6	76	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.148	0.0	79	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.865	-2.0	88	0.000
74	T	4-Chlorotoluene	2.275	2.323	-2.1	89	0.000
75	T	tert-Butylbenzene	0.557	0.545	2.2	86	0.000
76	T	sec-Butylbenzene	3.433	3.508	-2.2	87	0.000
77	T	p-Isopropyltoluene	2.927	3.043	-4.0	87	0.000
78	T	1,3-Dichlorobenzene	1.714	1.712	0.1	86	0.000
79	T	1,4-Dichlorobenzene	1.731	1.679	3.0	85	0.000
80	T	n-Butylbenzene	2.470	2.696	-9.1	89	0.000
81	T	1,2-Dichlorobenzene	1.671	1.598	4.4	83	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.117	4.9	76	0.000
83	T	Hexachlorobutadiene	0.704	0.667	5.3	79	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.214	2.2	79	0.000
85	T	Naphthalene	2.420	2.118	12.5	71	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.092	9.5	75	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	92	0.000
2	T	Dichlorodifluoromethane	50.000	55.545	-11.1	93	0.000
3	P	Chloromethane	50.000	46.917	6.2	87	0.000
4	C	Vinyl Chloride	50.000	51.125	-2.3#	92	0.000
5	T	1,3-Butadiene	50.000	53.934	-7.9	96	0.000
6	T	Bromomethane	50.000	37.265	25.5#	74	0.000
7	T	Chloroethane	50.000	46.535	6.9	96	0.000
8	T	Trichlorofluoromethane	50.000	54.288	-8.6	93	0.000
9	T	Diethyl ether	100.000	92.556	7.4	83	0.000
10	C	1,1-Dichloroethene	50.000	50.231	-0.5#	92	0.000
11	T	Carbon Disulfide	50.000	50.464	-0.9	91	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	52.565	-5.1	94	0.000
13	T	Iodomethane	50.000	49.485	1.0	94	0.000
14	T	Acrolein	50.000	42.575	14.8	73	0.000
15	T	Methylene Chloride	50.000	46.186	7.6	89	0.000
16	T	Acetone	50.000	41.431	17.1	79	0.000
17	T	trans-1,2-Dichloroethene	50.000	49.025	2.0	90	0.000
18	T	Methyl acetate	50.000	49.956	0.1	79	0.000
19	T	Methyl Tert Butyl Ether	50.000	44.660	10.7	80	0.000
20	P	1,1-Dichloroethane	50.000	49.757	0.5	91	0.000
21	T	Acrylonitrile	50.000	44.473	11.1	79	0.000
22	T	Vinyl Acetate	50.000	56.045	-12.1	97	0.000
23	T	cis-1,2-Dichloroethene	50.000	48.072	3.9	88	0.000
24	T	2,2-Dichloropropane	50.000	54.707	-9.4	100	0.000
25	T	Cyclohexane	50.000	52.112	-4.2	92	0.000
26	T	Bromochloromethane	50.000	47.781	4.4	85	0.000
27	C	Chloroform	50.000	48.078	3.8#	89	0.000
28	T	Carbon Tetrachloride	50.000	50.109	-0.2	89	0.000
29	S	Dibromofluoromethane	25.000	25.041	-0.2	90	0.000
30	T	1,1,1-Trichloroethane	50.000	49.212	1.6	90	0.000
31	T	1,1-Dichloropropene	50.000	49.691	0.6	89	0.000
32	T	2-Butanone	50.000	42.916	14.2	78	0.000
33	T	Benzene	50.000	48.324	3.4	90	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.204	3.2	87	0.000
35	T	1,2-Dichloroethane	50.000	46.342	7.3	85	0.000
36	T	Methylcyclohexane	50.000	51.590	-3.2	91	0.000
37	T	Trichloroethene	50.000	46.111	7.8	86	0.000
38	T	Dibromomethane	50.000	45.840	8.3	82	0.000
39	C	1,2-Dichloropropane	50.000	48.578	2.8#	88	0.000
40	T	Bromodichloromethane	50.000	48.031	3.9	87	0.000
41	T	1,4-Dioxane	200.000	205.226	-2.6	95	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	43.881	12.2	80	0.000
43	T	cis-1,3-Dichloropropene	50.000	50.815	-1.6	89	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.268	17.5	76	0.000
45	T	trans-1,3-Dichloropropene	50.000	49.000	2.0	85	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	91	0.000
47	S	Toluene-d8	25.000	25.062	-0.2	88	0.000
48	C	Toluene	50.000	49.413	1.2#	89	0.000
49	T	Tetrachloroethene	50.000	48.773	2.5	88	0.000
50	T	1,1,2-Trichloroethane	50.000	45.184	9.6	81	0.000
51	T	Dibromochloromethane	50.000	46.695	6.6	81	0.000
52	T	1,3-Dichloropropane	50.000	46.191	7.6	82	0.000
53	T	1,2-Dibromoethane	50.000	44.595	10.8	79	0.000
54	T	2-Hexanone	50.000	41.461	17.1	74	0.000
55	P	Chlorobenzene	50.000	48.508	3.0	87	0.000
56	T	1-Chlorohexane	50.000	52.824	-5.6	91	0.000
57	C	Ethylbenzene	50.000	49.396	1.2#	88	0.000

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273104.D Vial: 1
Acq On : 28 Apr 2017 12:19 Operator: ADC
Sample : WG612029-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 28 12:31:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	47.676	4.6	85	0.000
59	T	m-,p-Xylene	100.000	100.548	-0.5	88	0.000
60	T	o-Xylene	50.000	48.496	3.0	86	0.000
61	T	Styrene	50.000	50.843	-1.7	87	0.000
62	P	Bromoform	50.000	46.406	7.2	77	0.000
63	T	Isopropylbenzene	50.000	49.572	0.9	88	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	87	0.000
65	T	1,3,5-Trimethylbenzene	50.000	51.118	-2.2	88	0.000
66	S	p-Bromofluorobenzene	25.000	25.282	-1.1	87	0.000
67	T	Bromobenzene	50.000	47.520	5.0	84	0.000
68	T	n-Propylbenzene	50.000	52.121	-4.2	90	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	48.258	3.5	79	0.000
70	T	2-Chlorotoluene	50.000	50.071	-0.1	88	0.000
71	T	1,2,3-Trichloropropane	50.000	44.148	11.7	76	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.803	0.4	79	0.000
73	T	1,2,4-Trimethylbenzene	50.000	50.973	-1.9	88	0.000
74	T	4-Chlorotoluene	50.000	51.050	-2.1	89	0.000
75	T	tert-Butylbenzene	50.000	48.927	2.1	86	0.000
76	T	sec-Butylbenzene	50.000	51.089	-2.2	87	0.000
77	T	p-Isopropyltoluene	50.000	51.982	-4.0	87	0.000
78	T	1,3-Dichlorobenzene	50.000	49.934	0.1	86	0.000
79	T	1,4-Dichlorobenzene	50.000	48.491	3.0	85	0.000
80	T	n-Butylbenzene	50.000	54.577	-9.2	89	0.000
81	T	1,2-Dichlorobenzene	50.000	47.833	4.3	83	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	47.281	5.4	76	0.000
83	T	Hexachlorobutadiene	50.000	47.344	5.3	79	0.000
84	T	1,2,4-Trichlorobenzene	50.000	48.923	2.2	79	0.000
85	T	Naphthalene	50.000	43.747	12.5	71	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.297	9.4	75	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 07:16:21 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	648453	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	445927	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	243153	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.20	111	170660	25.7810 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.12%		
43) 1,2-Dichloroethane-d4	10.84	65	172526	26.4442 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.76%		
58) Toluene-d8	13.23	98	604837	26.5808 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.32%		
80) p-Bromofluorobenzene	16.63	95	240890	26.0843 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	591290	57.4313 ug/L	93
3) Chloromethane	4.03	50	585655	48.8058 ug/L	99
4) Vinyl Chloride	4.29	62	595609	50.6306 ug/L	98
5) 1,3-Butadiene	4.33	54	246841	57.0102 ug/L	90
6) Bromomethane	5.24	94	236635	46.5891 ug/L	99
7) Chloroethane	5.40	64	283762	56.0630 ug/L	86
8) Trichlorofluoromethane	5.90	101	650322	53.9373 ug/L	100
9) Diethyl ether	6.43	59	494431	98.4011 ug/L	84
10) Isoprene	6.48	67	552666	55.7284 ug/L	83
11) Acrolein	6.67	56	30603	55.5927 ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	362981	53.1833 ug/L	96
13) Acetone	6.77	43	71103	50.8131 ug/L	94
14) 1,1-Dichloroethene	7.01	61	567838	57.4388 ug/L	88
15) Tert-Butyl Alcohol	7.11	59	64096	147.6730 ug/L	94
16) Dimethyl Sulfide	7.28	62	377722	53.4704 ug/L	82
17) Iodomethane	7.53	142	281049	48.7478 ug/L	96
18) Methyl acetate	7.52	43	178275	50.7988 ug/L #	86
19) Methylene Chloride	7.79	84	386854	51.7597 ug/L	66
20) Carbon Disulfide	7.85	76	1178011	55.3677 ug/L	99
21) Acrylonitrile	7.96	53	84106	51.8697 ug/L	99
22) Methyl Tert Butyl Ether	8.00	73	833427	50.8506 ug/L	92
23) trans-1,2-Dichloroethene	8.25	96	373023	52.4281 ug/L	84
24) n-Hexane	8.33	57	488809	60.7536 ug/L	87
25) Diisopropyl ether	8.66	45	1982155	108.2184 ug/L #	93
26) Vinyl Acetate	8.82	43	378799	74.5039 ug/L #	90
27) 1,1-Dichloroethane	8.86	63	670328	56.8758 ug/L	99
28) Ethyl-Tert-Butyl ether	9.23	59	1877374	101.1599 ug/L	93
29) 2-Butanone	9.41	43	85673	48.5783 ug/L	84
30) Propionitrile	9.51	54	57187	99.4281 ug/L	99
31) 2,2-Dichloropropane	9.64	77	486422	54.2489 ug/L	80
32) cis-1,2-Dichloroethene	9.71	96	408903	52.2753 ug/L	96
33) Chloroform	9.91	83	655419	48.8154 ug/L	95
34) 1-Bromopropane	10.06	122	71034	51.2091 ug/L	98
35) Bromochloromethane	10.15	130	215137	52.2482 ug/L	100
36) Tetrahydrofuran	10.17	42	115943	99.8313 ug/L	78
38) 1,1,1-Trichloroethane	10.45	97	581587	53.2794 ug/L	92
39) Cyclohexane	10.49	56	583551	57.8117 ug/L	82
40) 1,1-Dichloropropene	10.65	75	500437	54.2340 ug/L	84
41) Tert-Amyl-Methyl ether	10.74	73	1666400	94.5704 ug/L	94
42) Carbon Tetrachloride	10.79	117	484802	56.3257 ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 07:16:21 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

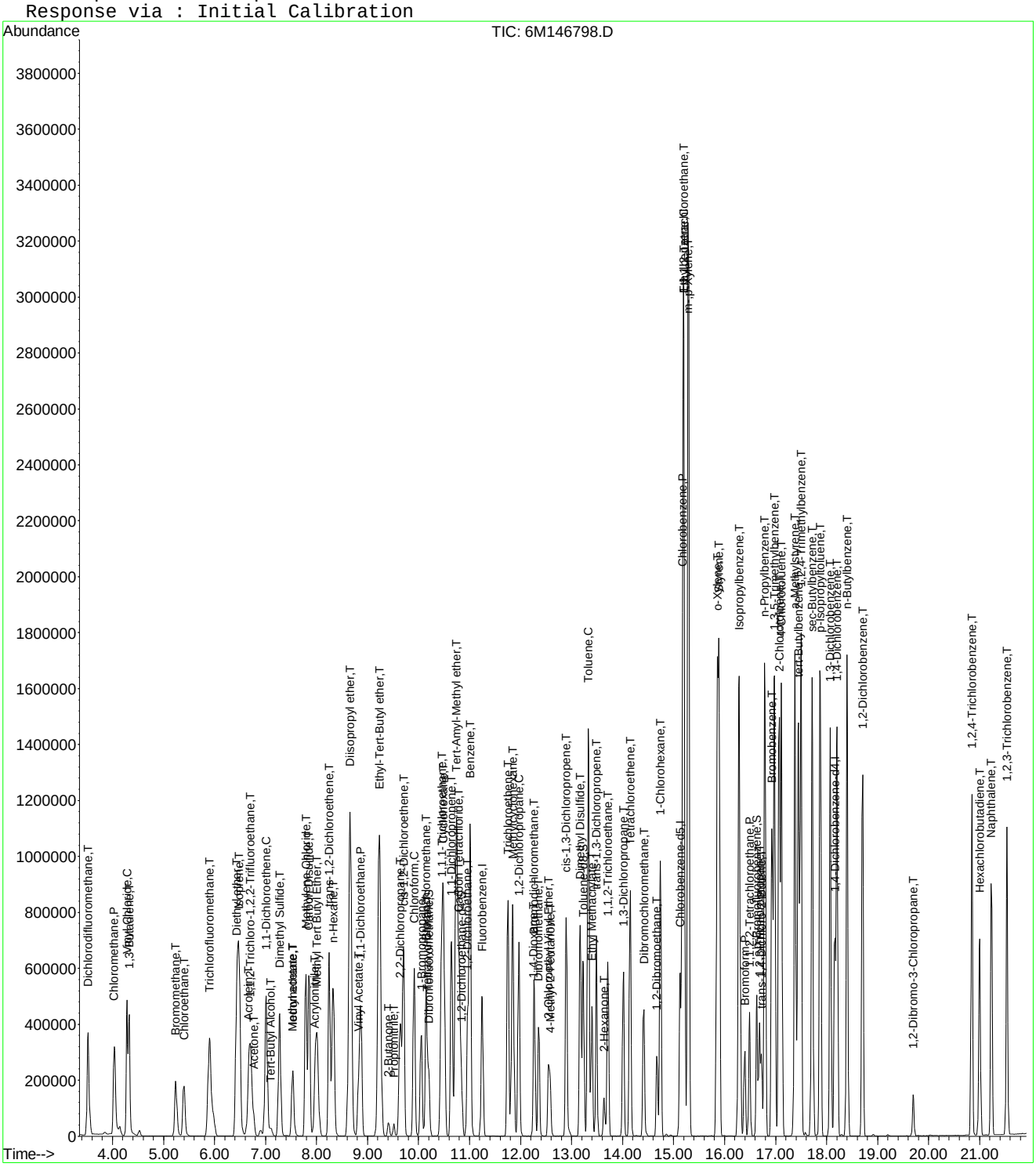
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.95	62	439994	52.6770	ug/L		91
46)	Benzene	11.01	78	1440206	51.9092	ug/L		89
47)	Trichloroethene	11.75	130	364222	48.2288	ug/L		93
48)	Methylcyclohexane	11.84	83	572574	52.4770	ug/L		86
49)	1,2-Dichloropropane	11.97	63	358661	54.7758	ug/L		94
50)	1,4-Dioxane	12.25	88	10101	212.1609	ug/L		86
51)	Bromodichloromethane	12.26	83	492326	53.2631	ug/L		99
52)	Dibromomethane	12.35	93	194432	50.4182	ug/L		100
53)	2-Chloroethyl Vinyl Ether	12.55	63	129255	50.3257	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	77936	46.2589	ug/L		86
55)	cis-1,3-Dichloropropene	12.89	75	572050	56.1996	ug/L		96
56)	Dimethyl Disulfide	13.17	79	316348	49.2629	ug/L		92
59)	Toluene	13.32	91	1483268	53.2027	ug/L		100
60)	Ethyl Methacrylate	13.40	69	350067	51.8877	ug/L		76
62)	trans-1,3-Dichloropropene	13.49	75	486839	56.6330	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	261563	49.7844	ug/L		98
64)	2-Hexanone	13.64	43	124087	49.1842	ug/L		87
65)	1,3-Dichloropropane	14.02	76	459249	52.0740	ug/L		76
66)	Tetrachloroethene	14.15	166	335334	49.6363	ug/L		92
67)	Dibromochloromethane	14.42	129	324920	50.0281	ug/L		100
68)	1,2-Dibromoethane	14.67	107	244972	48.5589	ug/L		100
69)	1-Chlorohexane	14.74	91	479707	53.2834	ug/L		83
70)	Chlorobenzene	15.17	112	980182	51.3682	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	359338	52.5856	ug/L		99
72)	Ethylbenzene	15.20	106	546063	52.8630	ug/L		99
73)	m-,p-Xylene	15.28	106	1307184	105.8710	ug/L		97
74)	o-Xylene	15.86	106	632418	53.0789	ug/L		98
75)	Styrene	15.89	104	1095774	54.7837	ug/L		100
76)	Bromoform	16.40	173	189860	47.9704	ug/L		98
77)	Isopropylbenzene	16.29	105	1609413	53.9777	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	310877	49.0902	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	86007	45.9904	ug/L	#	46
82)	trans-1,4-Dichloro-2-Buten	16.72	53	73406	54.5875	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1963590	53.3365	ug/L		99
84)	Bromobenzene	16.93	156	398210	48.1478	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1368446	52.4501	ug/L		98
86)	2-Chlorotoluene	17.07	91	1313802	53.5959	ug/L		98
87)	4-Chlorotoluene	17.11	91	1118352	51.6198	ug/L		99
88)	a-Methylstyrene	17.38	118	724295	50.2012	ug/L		99
89)	tert-Butylbenzene	17.45	134	278930	51.0218	ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	1437648	53.6539	ug/L		89
91)	sec-Butylbenzene	17.71	105	1719638	53.4472	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1431381	52.8872	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	778407	49.8369	ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	777781	49.2425	ug/L		95
95)	n-Butylbenzene	18.40	91	1375516	55.6574	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	695088	47.4783	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	53279	46.4480	ug/L		97
98)	1,2,4-Trichlorobenzene	20.85	180	483693	45.1549	ug/L		99
99)	Hexachlorobutadiene	21.00	225	186741	45.6431	ug/L		100
100)	Naphthalene	21.23	128	939127	43.7847	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	427233	41.3141	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146798.D 8260BWT.M Fri Apr 28 10:38:48 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 7:16 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



6M146798.D 8260BWT.M Fri Apr 28 10:38:49 2017 Page 3

Continuing Calibration Area and RT check

Instrument: Hpms6
Initial cal date: 5 Apr 2017 20:34
CCV date: 28 Apr 2017 6:52
CCV Filename: 6M146798.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	643185	11.26	452398	15.14	244954	18.17
CCV	648453	11.25	445927	15.13	243153	18.16

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	101	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4559	-14.9	107	0.00
3	P	Chloromethane	0.5473	0.4516	17.5	97	0.01
4	C	Vinyl Chloride	0.4535	0.4592	-1.3	103	0.01
5	T	1,3-Butadiene	0.1682	0.1903	-13.2	109	0.01
6	T	Bromomethane	0.1958	0.1825	6.8	83	0.02
7	T	Chloroethane	0.1951	0.2188	-12.1	109	0.02
8	T	Trichlorofluoromethane	0.4648	0.5014	-7.9	105	0.01
9	T	Diethyl ether	0.1937	0.1906	1.6	100	0.00
10	T	Isoprene	0.3823	0.4261	-11.5	111	0.01
11	T	Acrolein	0.0212	0.0236	-11.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2799	-6.4	107	0.01
13	T	Acetone	0.0539	0.0548	-1.6	100	0.00
14	C	1,1-Dichloroethene	0.3811	0.4378	-14.9	114	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0124	26.1#	87	-0.02
16	T	Dimethyl Sulfide	0.2723	0.2913	-6.9	106	0.00
17	T	Iodomethane	0.1863	0.2167	-16.3	102	0.00
18	T	Methyl acetate	0.1353	0.1375	-1.6	103	0.00
19	T	Methylene Chloride	0.2882	0.2983	-3.5	106	0.00
20	T	Carbon Disulfide	0.8203	0.9083	-10.7	109	0.00
21	T	Acrylonitrile	0.0625	0.0649	-3.7	99	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6426	-1.7	103	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2876	-4.9	105	0.00
24	T	n-Hexane	0.3102	0.3769	-21.5#	122	0.00
25	T	Diisopropyl ether	0.7062	0.7642	-8.2	111	0.00
26	T	Vinyl Acetate	0.1960	0.2921	-49.0#	177	0.00
27	P	1,1-Dichloroethane	0.4544	0.5169	-13.8	115	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7238	-1.2	104	0.00
29	T	2-Butanone	0.0680	0.0661	2.8	101	0.00
30	T	Propionitrile	0.0222	0.0221	0.5	98	0.00
31	T	2,2-Dichloropropane	0.3457	0.3751	-8.5	137	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3153	-4.5	106	0.00
33	C	Chloroform	0.5176	0.5054	2.4	107	0.00
34		1-Bromopropane	0.0535	0.0548	-2.4	96	0.00
35	T	Bromochloromethane	0.1588	0.1659	-4.5	100	0.00
36	T	Tetrahydrofuran	0.0448	0.0447	0.2	105	0.00
37	S	Dibromofluoromethane	0.2552	0.2632	-3.1	102	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4484	-6.6	107	0.00
39	T	Cyclohexane	0.3892	0.4500	-15.6	114	0.00
40	T	1,1-Dichloropropene	0.3558	0.3859	-8.5	109	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6424	5.4	97	0.00
42	T	Carbon Tetrachloride	0.3318	0.3738	-12.7	103	-0.02
43	S	1,2-Dichloroethane-d4	0.2515	0.2661	-5.8	106	0.00
44		Heptane	0.0000	0.0000	0.0	102	0.00
45	T	1,2-Dichloroethane	0.3220	0.3393	-5.4	107	0.00
46	T	Benzene	1.0697	1.1105	-3.8	109	0.00
47	T	Trichloroethene	0.2912	0.2808	3.5	94	0.00
48	T	Methylcyclohexane	0.4207	0.4415	-5.0	105	0.00
49	C	1,2-Dichloropropane	0.2524	0.2766	-9.6	109	0.00
50	T	1,4-Dioxane	0.0018	0.0019	-6.0	103	0.00
51	T	Bromodichloromethane	0.3564	0.3796	-6.5	104	0.00
52	T	Dibromomethane	0.1487	0.1499	-0.8	99	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.0997	-0.6	95	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0601	7.5	95	0.00

(#) = Out of Range
6M146798.D 8260BWT.M Fri Apr 28 10:39:22 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4411	-12.4	109	0.00
56	T	Dimethyl Disulfide	0.2476	0.2439	1.5	100	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	99	0.00
58	S	Toluene-d8	1.2757	1.3564	-6.3	106	0.00
59	C	Toluene	1.5630	1.6631	-6.4	107	0.00
60	T	Ethyl Methacrylate	0.3782	0.3925	-3.8	100	0.00
61		Paraldehyde	0.0000	0.0000	0.0	106	0.08
62	T	trans-1,3-Dichloropropene	0.4819	0.5459	-13.3	108	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2933	0.4	97	0.00
64	T	2-Hexanone	0.1414	0.1391	1.6	98	0.00
65	T	1,3-Dichloropropane	0.4944	0.5149	-4.1	102	0.00
66	T	Tetrachloroethene	0.3787	0.3760	0.7	96	0.00
67	T	Dibromochloromethane	0.3641	0.3643	-0.1	94	0.00
68	T	1,2-Dibromoethane	0.2828	0.2747	2.9	95	0.00
69	T	1-Chlorohexane	0.5047	0.5379	-6.6	103	0.00
70	P	Chlorobenzene	1.0698	1.0990	-2.7	102	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.4029	-5.2	99	0.00
72	C	Ethylbenzene	0.5791	0.6123	-5.7	104	0.00
73	T	m-,p-Xylene	0.6922	0.7329	-5.9	104	0.00
74	T	o-Xylene	0.6680	0.7091	-6.2	103	0.00
75	T	Styrene	1.1214	1.2287	-9.6	104	-0.02
76	P	Bromoform	0.2219	0.2129	4.1	88	0.00
77	T	Isopropylbenzene	1.6716	1.8046	-8.0	105	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	99	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6393	1.8	105	0.00
80	S	p-Bromofluorobenzene	0.9495	0.9907	-4.3	105	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1769	8.0	92	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1510	-9.2	106	0.00
83	T	n-Propylbenzene	3.7852	4.0378	-6.7	107	0.00
84	T	Bromobenzene	0.8504	0.8188	3.7	97	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8140	-4.9	106	0.00
86	T	2-Chlorotoluene	2.5203	2.7016	-7.2	112	0.00
87	T	4-Chlorotoluene	2.2275	2.2997	-3.2	104	0.00
88	T	a-Methylstyrene	1.4834	1.4894	-0.4	101	0.00
89	T	tert-Butylbenzene	0.5621	0.5736	-2.0	101	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.9563	-7.3	107	0.00
91	T	sec-Butylbenzene	3.3081	3.5361	-6.9	107	0.00
92	T	p-Isopropyltoluene	2.7827	2.9434	-5.8	105	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.6006	0.3	101	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5994	1.5	101	0.00
95	T	n-Butylbenzene	2.5410	2.8285	-11.3	111	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4293	5.0	96	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1096	7.1	91	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	0.9946	9.7	91	0.00
99	T	Hexachlorobutadiene	0.4207	0.3840	8.7	93	0.00
100	T	Naphthalene	2.2053	1.9311	12.4	86	-0.02
101	T	1,2,3-Trichlorobenzene	1.0632	0.8785	17.4	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146798.D 8260BWT.M Fri Apr 28 10:39:23 2017 Page 2

Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	101	0.00
2	T	Dichlorodifluoromethane	50.0000	57.4313	-14.9	107	0.00
3	P	Chloromethane	50.0000	48.8058	2.4	97	0.01
4	C	Vinyl Chloride	50.0000	50.6306	-1.3	103	0.01
5	T	1,3-Butadiene	50.0000	57.0102	-14.0	109	0.01
6	T	Bromomethane	50.0000	46.5891	6.8	83	0.02
7	T	Chloroethane	50.0000	56.0630	-12.1	109	0.02
8	T	Trichlorofluoromethane	50.0000	53.9373	-7.9	105	0.01
9	T	Diethyl ether	100.0000	98.4011	1.6	100	0.00
10	T	Isoprene	50.0000	55.7284	-11.5	111	0.01
11	T	Acrolein	50.0000	55.5927	-11.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	53.1833	-6.4	107	0.01
13	T	Acetone	50.0000	50.8131	-1.6	100	0.00
14	C	1,1-Dichloroethene	50.0000	57.4388	-14.9	114	0.00
15	T	Tert-Butyl Alcohol	200.0000	147.6730	26.2#	87	-0.02
16	T	Dimethyl Sulfide	50.0000	53.4704	-6.9	106	0.00
17	T	Iodomethane	50.0000	48.7478	2.5	102	0.00
18	T	Methyl acetate	50.0000	50.7988	-1.6	103	0.00
19	T	Methylene Chloride	50.0000	51.7597	-3.5	106	0.00
20	T	Carbon Disulfide	50.0000	55.3677	-10.7	109	0.00
21	T	Acrylonitrile	50.0000	51.8697	-3.7	99	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.8506	-1.7	103	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	52.4282	-4.9	105	0.00
24	T	n-Hexane	50.0000	60.7536	-21.5#	122	0.00
25	T	Diisopropyl ether	100.0000	108.2184	-8.2	111	0.00
26	T	Vinyl Acetate	50.0000	74.5039	-49.0#	177	0.00
27	P	1,1-Dichloroethane	50.0000	56.8758	-13.8	115	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	101.1599	-1.2	104	0.00
29	T	2-Butanone	50.0000	48.5783	2.8	101	0.00
30	T	Propionitrile	100.0000	99.4281	0.6	98	0.00
31	T	2,2-Dichloropropane	50.0000	54.2489	-8.5	137	0.00
32	T	cis-1,2-Dichloroethene	50.0000	52.2753	-4.6	106	0.00
33	C	Chloroform	50.0000	48.8154	2.4	107	0.00
34		1-Bromopropane	50.0000	51.2092	-2.4	96	0.00
35	T	Bromochloromethane	50.0000	52.2482	-4.5	100	0.00
36	T	Tetrahydrofuran	100.0000	99.8313	0.2	105	0.00
37	S	Dibromofluoromethane	25.0000	25.7810	-3.1	102	0.00
38	T	1,1,1-Trichloroethane	50.0000	53.2794	-6.6	107	0.00
39	T	Cyclohexane	50.0000	57.8117	-15.6	114	0.00
40	T	1,1-Dichloropropene	50.0000	54.2340	-8.5	109	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	94.5704	5.4	97	0.00
42	T	Carbon Tetrachloride	50.0000	56.3257	-12.7	103	-0.02
43	S	1,2-Dichloroethane-d4	25.0000	26.4442	-5.8	106	0.00
44		Heptane	-1.0000	0.0000	0.0	102	0.00
45	T	1,2-Dichloroethane	50.0000	52.6770	-5.4	107	0.00
46	T	Benzene	50.0000	51.9092	-3.8	109	0.00
47	T	Trichloroethene	50.0000	48.2288	3.5	94	0.00
48	T	Methylcyclohexane	50.0000	52.4770	-5.0	105	0.00
49	C	1,2-Dichloropropane	50.0000	54.7758	-9.6	109	0.00
50	T	1,4-Dioxane	200.0000	212.1609	-6.1	103	0.00
51	T	Bromodichloromethane	50.0000	53.2631	-6.5	104	0.00
52	T	Dibromomethane	50.0000	50.4182	-0.8	99	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	50.3257	-0.7	95	0.00
54	T	4-Methyl-2-Pentanone	50.0000	46.2589	7.5	95	0.00

(#) = Out of Range
6M146798.D 8260BWT.M Fri Apr 28 10:39:25 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146798.D Vial: 2
Acq On : 28 Apr 2017 6:52 Operator: TMB
Sample : WG611920-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	56.1996	-12.4	109	0.00
56	T	Dimethyl Disulfide	50.0000	49.2629	1.5	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
58	S	Toluene-d8	25.0000	26.5808	-6.3	106	0.00
59	C	Toluene	50.0000	53.2027	-6.4	107	0.00
60	T	Ethyl Methacrylate	50.0000	51.8877	-3.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	106	0.08
62	T	trans-1,3-Dichloropropene	50.0000	56.6330	-13.3	108	0.00
63	T	1,1,2-Trichloroethane	50.0000	49.7844	0.4	97	0.00
64	T	2-Hexanone	50.0000	49.1842	1.6	98	0.00
65	T	1,3-Dichloropropane	50.0000	52.0740	-4.1	102	0.00
66	T	Tetrachloroethene	50.0000	49.6363	0.7	96	0.00
67	T	Dibromochloromethane	50.0000	50.0281	-0.1	94	0.00
68	T	1,2-Dibromoethane	50.0000	48.5589	2.9	95	0.00
69	T	1-Chlorohexane	50.0000	53.2834	-6.6	103	0.00
70	P	Chlorobenzene	50.0000	51.3682	-2.7	102	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	52.5856	-5.2	99	0.00
72	C	Ethylbenzene	50.0000	52.8630	-5.7	104	0.00
73	T	m-,p-Xylene	100.0000	105.8709	-5.9	104	0.00
74	T	o-Xylene	50.0000	53.0789	-6.2	103	0.00
75	T	Styrene	50.0000	54.7837	-9.6	104	-0.02
76	P	Bromoform	50.0000	47.9704	4.1	88	0.00
77	T	Isopropylbenzene	50.0000	53.9777	-8.0	105	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	99	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	49.0902	1.8	105	0.00
80	S	p-Bromofluorobenzene	25.0000	26.0843	-4.3	105	0.00
81	T	1,2,3-Trichloropropane	50.0000	45.9904	8.0	92	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	54.5875	-9.2	106	0.00
83	T	n-Propylbenzene	50.0000	53.3365	-6.7	107	0.00
84	T	Bromobenzene	50.0000	48.1478	3.7	97	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	52.4501	-4.9	106	0.00
86	T	2-Chlorotoluene	50.0000	53.5959	-7.2	112	0.00
87	T	4-Chlorotoluene	50.0000	51.6198	-3.2	104	0.00
88	T	a-Methylstyrene	50.0000	50.2012	-0.4	101	0.00
89	T	tert-Butylbenzene	50.0000	51.0217	-2.0	101	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	53.6539	-7.3	107	0.00
91	T	sec-Butylbenzene	50.0000	53.4472	-6.9	107	0.00
92	T	p-Isopropyltoluene	50.0000	52.8872	-5.8	105	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.8369	0.3	101	0.00
94	T	1,4-Dichlorobenzene	50.0000	49.2424	1.5	101	0.00
95	T	n-Butylbenzene	50.0000	55.6574	-11.3	111	0.00
96	T	1,2-Dichlorobenzene	50.0000	47.4783	5.0	96	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	46.4480	7.1	91	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	45.1549	9.7	91	0.00
99	T	Hexachlorobutadiene	50.0000	45.6431	8.7	93	0.00
100	T	Naphthalene	50.0000	43.7847	12.4	86	-0.02
101	T	1,2,3-Trichlorobenzene	50.0000	41.3141	17.4	88	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146798.D 8260BWT.M Fri Apr 28 10:39:25 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14:33 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

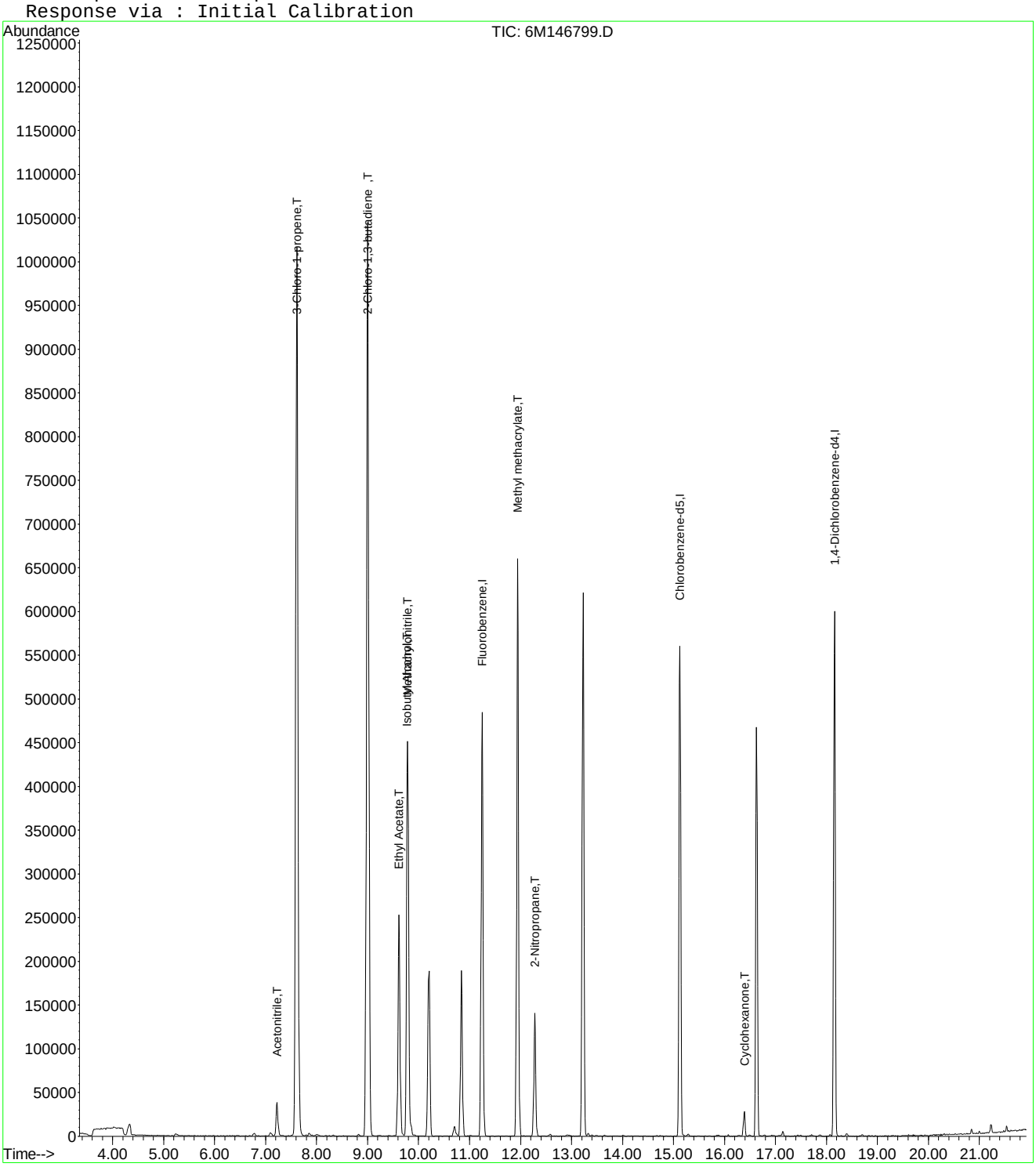
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	619428	25.00	ug/L		-0.02
11) Chlorobenzene-d5	15.13	117	419364	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	209429	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	54992	124.1817	ug/L		92
3) 3-Chloro-1-propene	7.61	41	1012527	136.3452	ug/L		95
4) 2-Chloro-1,3-butadiene	9.00	53	982561	107.2011	ug/L		95
5) Ethyl Acetate	9.61	43	415654	104.6306	ug/L		99
6) Methacrylonitrile	9.79	67	215623	103.0982	ug/L		95
7) Isobutyl Alcohol	9.78	43	35075	272.4046	ug/L	#	82
9) Methyl methacrylate	11.94	41	414687	95.4041	ug/L		94
10) 2-Nitropropane	12.28	43	139626	78.9965	ug/L		95
13) Cyclohexanone	16.39	55	17972	226.8037	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146799.D A9FOOWT.M Sat Apr 29 13:40:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146799.D Vial: 3
Acq On : 28 Apr 2017 7:23 Operator: TMB
Sample : WG611923-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	73	-0.02
2	T	Acetonitrile	100.0000	124.1817	-24.2	93	0.00
3	T	3-Chloro-1-propene	100.0000	136.3452	-36.3	97	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.2011	-7.2	76	0.00
5	T	Ethyl Acetate	100.0000	104.6306	-4.6	74	-0.02
6	T	Methacrylonitrile	100.0000	103.0982	-3.1	72	-0.01
7	T	Isobutyl Alcohol	200.0000	272.4046	-36.2	95	-0.02
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.15
9	T	Methyl methacrylate	100.0000	95.4041	4.6	66	-0.02
10	T	2-Nitropropane	100.0000	78.9965	21.0	58	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	68	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	60	-0.02
13	T	Cyclohexanone	100.0000	226.8037	-126.8#	160	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146799.D A9FOOWT.M Sat Apr 29 13:40:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	674511	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	467302	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	245649	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	175428	25.4774	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.92%				
43) 1,2-Dichloroethane-d4	10.84	65	180868	26.6518	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.60%				
58) Toluene-d8	13.23	98	633032	26.5474	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%				
80) p-Bromofluorobenzene	16.63	95	253083	27.1261	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.52%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	576101	53.7943	ug/L		93
3) Chloromethane	4.03	50	631330	50.6084	ug/L		97
4) Vinyl Chloride	4.28	62	589398	48.1670	ug/L		98
5) 1,3-Butadiene	4.32	54	251427	55.7184	ug/L		92
6) Bromomethane	5.24	94	250215	47.3596	ug/L		99
7) Chloroethane	5.40	64	290230	55.1257	ug/L		87
8) Trichlorofluoromethane	5.90	101	645011	51.4301	ug/L		99
9) Diethyl ether	6.43	59	567587	108.5966	ug/L		85
10) Isoprene	6.47	67	577802	56.0121	ug/L		83
11) Acrolein	6.67	56	30675	53.5708	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	366384	51.6080	ug/L		97
13) Acetone	6.77	43	80917	55.5926	ug/L		90
14) 1,1-Dichloroethene	7.01	61	578268	56.2341	ug/L		88
15) Tert-Butyl Alcohol	7.11	59	86431	191.4384	ug/L		92
16) Dimethyl Sulfide	7.28	62	411573	56.0115	ug/L		80
17) Iodomethane	7.53	142	267121	44.6097	ug/L		96
18) Methyl acetate	7.53	43	223477	61.2188	ug/L	#	86
19) Methylene Chloride	7.79	84	398606	51.2718	ug/L		65
20) Carbon Disulfide	7.85	76	1234647	55.7879	ug/L		99
21) Acrylonitrile	7.96	53	95460	56.5975	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	901569	52.8831	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	378554	51.1501	ug/L		84
24) n-Hexane	8.32	57	525000	62.7309	ug/L		87
25) Diisopropyl ether	8.66	45	2165836	113.6786	ug/L	#	93
26) Vinyl Acetate	8.82	43	376570	71.2042	ug/L	#	90
27) 1,1-Dichloroethane	8.86	63	681369	55.5792	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	2082037	107.8538	ug/L		93
29) 2-Butanone	9.41	43	96865	52.8025	ug/L		83
30) Propionitrile	9.52	54	65817	110.0119	ug/L		100
31) 2,2-Dichloropropane	9.65	77	513892	55.0984	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	415446	51.0600	ug/L		96
33) Chloroform	9.91	83	663582	47.5140	ug/L		95
34) 1-Bromopropane	10.06	122	72813	50.4638	ug/L		100
35) Bromochloromethane	10.15	130	216616	50.5751	ug/L		99
36) Tetrahydrofuran	10.17	42	133785	110.7437	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	586013	51.6109	ug/L		92
39) Cyclohexane	10.49	56	619444	58.9968	ug/L		82
40) 1,1-Dichloropropene	10.65	75	508046	52.9316	ug/L		84
41) Tert-Amyl-Methyl ether	10.74	73	1866535	101.8361	ug/L		94
42) Carbon Tetrachloride	10.79	117	466290	52.0821	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

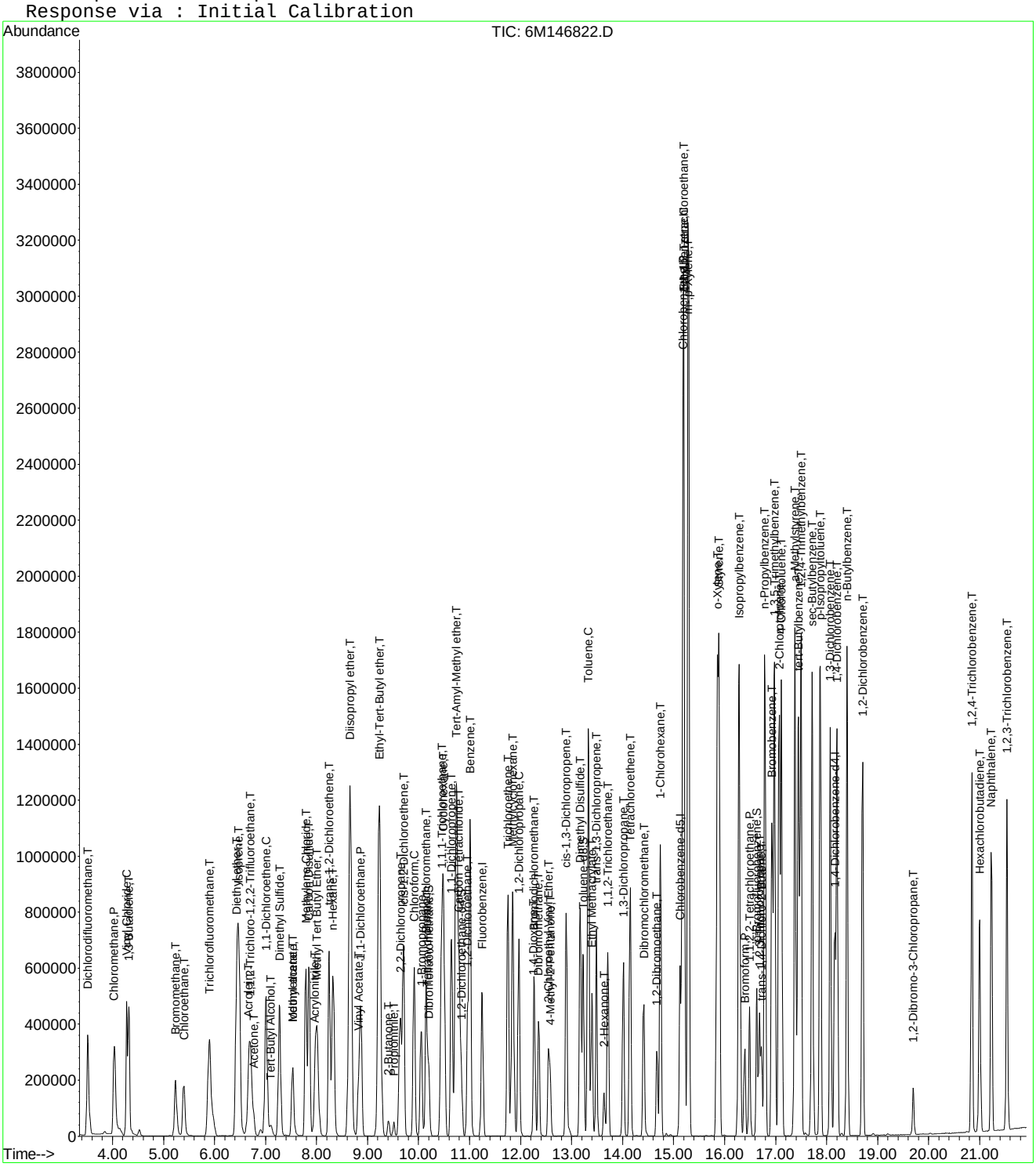
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	453777	52.2284	ug/L		91
46)	Benzene	11.01	78	1451388	50.2913	ug/L		89
47)	Trichloroethene	11.75	130	370184	47.1246	ug/L		93
48)	Methylcyclohexane	11.84	83	607083	53.4903	ug/L		86
49)	1,2-Dichloropropane	11.97	63	371520	54.5477	ug/L		95
50)	1,4-Dioxane	12.25	88	11005	222.2187	ug/L		92
51)	Bromodichloromethane	12.26	83	500450	52.0504	ug/L		99
52)	Dibromomethane	12.35	93	201321	50.1878	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	160509	60.0802	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	88146	50.2978	ug/L		87
55)	cis-1,3-Dichloropropene	12.90	75	584158	55.1720	ug/L		97
56)	Dimethyl Disulfide	13.17	79	342356	51.2534	ug/L		93
59)	Toluene	13.32	91	1497061	51.2413	ug/L		100
60)	Ethyl Methacrylate	13.40	69	387220	54.7693	ug/L		75
62)	trans-1,3-Dichloropropene	13.49	75	505767	56.1437	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	278473	50.5786	ug/L		99
64)	2-Hexanone	13.64	43	139331	52.7004	ug/L		86
65)	1,3-Dichloropropane	14.02	76	484050	52.3756	ug/L		75
66)	Tetrachloroethene	14.15	166	340915	48.1542	ug/L		92
67)	Dibromochloromethane	14.42	129	332881	48.9094	ug/L		99
68)	1,2-Dibromoethane	14.67	107	261538	49.4712	ug/L		100
69)	1-Chlorohexane	14.74	91	512571	54.3296	ug/L		82
70)	Chlorobenzene	15.18	112	990139	49.5165	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	358393	50.0483	ug/L		99
72)	Ethylbenzene	15.20	106	547394	50.5679	ug/L		99
73)	m-,p-Xylene	15.28	106	1312947	101.4737	ug/L		98
74)	o-Xylene	15.86	106	640930	51.3327	ug/L		98
75)	Styrene	15.89	104	1106798	52.8038	ug/L		99
76)	Bromoform	16.40	173	193478	46.6484	ug/L		98
77)	Isopropylbenzene	16.29	105	1633970	52.2947	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.49	83	325050	50.8067	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	92582	49.0032	ug/L	#	42
82)	trans-1,4-Dichloro-2-Buten	16.72	53	78763	57.9760	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1993012	53.5856	ug/L		99
84)	Bromobenzene	16.93	156	402556	48.1787	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1389254	52.7066	ug/L		99
86)	2-Chlorotoluene	17.07	91	1321267	53.3528	ug/L		98
87)	4-Chlorotoluene	17.11	91	1138393	52.0110	ug/L		99
88)	a-Methylstyrene	17.38	118	754151	51.7394	ug/L		99
89)	tert-Butylbenzene	17.45	134	283504	51.3315	ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	1446503	53.4359	ug/L		88
91)	sec-Butylbenzene	17.72	105	1730970	53.2528	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1442137	52.7432	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	773999	49.0512	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	769587	48.2286	ug/L		96
95)	n-Butylbenzene	18.40	91	1391368	55.7268	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	711411	48.0995	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	59865	51.6593	ug/L		95
98)	1,2,4-Trichlorobenzene	20.85	180	511851	47.2981	ug/L		99
99)	Hexachlorobutadiene	21.00	225	203742	49.2925	ug/L		99
100)	Naphthalene	21.23	128	1040596	48.0225	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	462949	44.3131	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4270	-7.6	104	0.00
3	P	Chloromethane	0.5473	0.4680	14.5	105	0.01
4	C	Vinyl Chloride	0.4535	0.4369	3.7	102	0.00
5	T	1,3-Butadiene	0.1682	0.1864	-10.8	111	0.00
6	T	Bromomethane	0.1958	0.1855	5.3	88	0.02
7	T	Chloroethane	0.1951	0.2151	-10.2	111	0.02
8	T	Trichlorofluoromethane	0.4648	0.4781	-2.9	104	0.01
9	T	Diethyl ether	0.1937	0.2104	-8.6	115	0.00
10	T	Isoprene	0.3823	0.4283	-12.0	116	0.00
11	T	Acrolein	0.0212	0.0227	-7.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2716	-3.2	108	0.01
13	T	Acetone	0.0539	0.0600	-11.2	113	0.00
14	C	1,1-Dichloroethene	0.3811	0.4287	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0160	4.2	117	-0.02
16	T	Dimethyl Sulfide	0.2723	0.3051	-12.0	116	0.00
17	T	Iodomethane	0.1863	0.1980	-6.3	97	0.00
18	T	Methyl acetate	0.1353	0.1657	-22.4#	130	0.00
19	T	Methylene Chloride	0.2882	0.2955	-2.5	109	0.00
20	T	Carbon Disulfide	0.8203	0.9152	-11.6	114	0.00
21	T	Acrylonitrile	0.0625	0.0708	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6683	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2806	-2.3	107	0.00
24	T	n-Hexane	0.3102	0.3892	-25.5#	131	0.00
25	T	Diisopropyl ether	0.7062	0.8027	-13.7	121	0.00
26	T	Vinyl Acetate	0.1960	0.2791	-42.4#	176	0.00
27	P	1,1-Dichloroethane	0.4544	0.5051	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7717	-7.9	115	0.00
29	T	2-Butanone	0.0680	0.0718	-5.6	114	0.00
30	T	Propionitrile	0.0222	0.0244	-10.0	113	0.00
31	T	2,2-Dichloropropane	0.3457	0.3809	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3080	-2.1	107	0.00
33	C	Chloroform	0.5176	0.4919	5.0	108	0.00
34		1-Bromopropane	0.0535	0.0540	-0.9	99	0.00
35	T	Bromochloromethane	0.1588	0.1606	-1.1	101	0.00
36	T	Tetrahydrofuran	0.0448	0.0496	-10.7	121	0.00
37	S	Dibromofluoromethane	0.2552	0.2601	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4344	-3.2	107	0.00
39	T	Cyclohexane	0.3892	0.4592	-18.0	121	0.00
40	T	1,1-Dichloropropene	0.3558	0.3766	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6918	-1.8	108	0.00
42	T	Carbon Tetrachloride	0.3318	0.3457	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	0.2515	0.2682	-6.6	111	0.00
44		Heptane	0.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	0.3220	0.3364	-4.5	110	0.00
46	T	Benzene	1.0697	1.0759	-0.6	110	0.00
47	T	Trichloroethene	0.2912	0.2744	5.7	95	0.00
48	T	Methylcyclohexane	0.4207	0.4500	-7.0	112	0.00
49	C	1,2-Dichloropropane	0.2524	0.2754	-9.1	113	0.00
50	T	1,4-Dioxane	0.0018	0.0020	-10.9	112	0.00
51	T	Bromodichloromethane	0.3564	0.3710	-4.1	105	0.00
52	T	Dibromomethane	0.1487	0.1492	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.1190	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0653	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:31 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4330	-10.3	111	0.00
56	T	Dimethyl Disulfide	0.2476	0.2538	-2.5	108	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	103	0.00
58	S	Toluene-d8	1.2757	1.3546	-6.2	111	0.00
59	C	Toluene	1.5630	1.6018	-2.5	108	0.00
60	T	Ethyl Methacrylate	0.3782	0.4143	-9.5	111	0.00
61		Paraldehyde	0.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	0.4819	0.5412	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2980	-1.2	103	0.00
64	T	2-Hexanone	0.1414	0.1491	-5.4	110	0.00
65	T	1,3-Dichloropropane	0.4944	0.5179	-4.8	108	0.00
66	T	Tetrachloroethene	0.3787	0.3648	3.7	98	0.00
67	T	Dibromochloromethane	0.3641	0.3562	2.2	97	0.00
68	T	1,2-Dibromoethane	0.2828	0.2798	1.1	101	0.00
69	T	1-Chlorohexane	0.5047	0.5484	-8.7	110	0.00
70	P	Chlorobenzene	1.0698	1.0594	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3835	-0.1	99	0.00
72	C	Ethylbenzene	0.5791	0.5857	-1.1	104	0.00
73	T	m-,p-Xylene	0.6922	0.7024	-1.5	104	0.00
74	T	o-Xylene	0.6680	0.6858	-2.7	104	0.00
75	T	Styrene	1.1214	1.1842	-5.6	105	-0.02
76	P	Bromoform	0.2219	0.2070	6.7	90	0.00
77	T	Isopropylbenzene	1.6716	1.7483	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6616	-1.6	110	0.00
80	S	p-Bromofluorobenzene	0.9495	1.0303	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1884	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1603	-16.0	113	0.00
83	T	n-Propylbenzene	3.7852	4.0566	-7.2	109	0.00
84	T	Bromobenzene	0.8504	0.8194	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8277	-5.4	107	0.00
86	T	2-Chlorotoluene	2.5203	2.6893	-6.7	113	0.00
87	T	4-Chlorotoluene	2.2275	2.3171	-4.0	106	0.00
88	T	a-Methylstyrene	1.4834	1.5350	-3.5	105	0.00
89	T	tert-Butylbenzene	0.5621	0.5770	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.9442	-6.9	108	0.00
91	T	sec-Butylbenzene	3.3081	3.5233	-6.5	108	0.00
92	T	p-Isopropyltoluene	2.7827	2.9354	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.5754	1.9	100	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5664	3.5	100	0.00
95	T	n-Butylbenzene	2.5410	2.8320	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4480	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1219	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	1.0418	5.4	96	0.00
99	T	Hexachlorobutadiene	0.4207	0.4147	1.4	102	0.00
100	T	Naphthalene	2.2053	2.1181	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	1.0632	0.9423	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:32 2017 Page 2

Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	53.7943	-7.6	104	0.00
3	P	Chloromethane	50.0000	50.6084	-1.2	105	0.01
4	C	Vinyl Chloride	50.0000	48.1670	3.7	102	0.00
5	T	1,3-Butadiene	50.0000	55.7184	-11.4	111	0.00
6	T	Bromomethane	50.0000	47.3596	5.3	88	0.02
7	T	Chloroethane	50.0000	55.1257	-10.3	111	0.02
8	T	Trichlorofluoromethane	50.0000	51.4301	-2.9	104	0.01
9	T	Diethyl ether	100.0000	108.5966	-8.6	115	0.00
10	T	Isoprene	50.0000	56.0121	-12.0	116	0.00
11	T	Acrolein	50.0000	53.5708	-7.1	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.6080	-3.2	108	0.01
13	T	Acetone	50.0000	55.5926	-11.2	113	0.00
14	C	1,1-Dichloroethene	50.0000	56.2341	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	200.0000	191.4384	4.3	117	-0.02
16	T	Dimethyl Sulfide	50.0000	56.0115	-12.0	116	0.00
17	T	Iodomethane	50.0000	44.6097	10.8	97	0.00
18	T	Methyl acetate	50.0000	61.2188	-22.4#	130	0.00
19	T	Methylene Chloride	50.0000	51.2718	-2.5	109	0.00
20	T	Carbon Disulfide	50.0000	55.7879	-11.6	114	0.00
21	T	Acrylonitrile	50.0000	56.5975	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	50.0000	52.8831	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	51.1501	-2.3	107	0.00
24	T	n-Hexane	50.0000	62.7309	-25.5#	131	0.00
25	T	Diisopropyl ether	100.0000	113.6786	-13.7	121	0.00
26	T	Vinyl Acetate	50.0000	71.2042	-42.4#	176	0.00
27	P	1,1-Dichloroethane	50.0000	55.5792	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	107.8538	-7.9	115	0.00
29	T	2-Butanone	50.0000	52.8025	-5.6	114	0.00
30	T	Propionitrile	100.0000	110.0119	-10.0	113	0.00
31	T	2,2-Dichloropropane	50.0000	55.0984	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	50.0000	51.0600	-2.1	107	0.00
33	C	Chloroform	50.0000	47.5140	5.0	108	0.00
34		1-Bromopropane	50.0000	50.4638	-0.9	99	0.00
35	T	Bromochloromethane	50.0000	50.5751	-1.2	101	0.00
36	T	Tetrahydrofuran	100.0000	110.7437	-10.7	121	0.00
37	S	Dibromofluoromethane	25.0000	25.4775	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	50.0000	51.6109	-3.2	107	0.00
39	T	Cyclohexane	50.0000	58.9968	-18.0	121	0.00
40	T	1,1-Dichloropropene	50.0000	52.9316	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	101.8361	-1.8	108	0.00
42	T	Carbon Tetrachloride	50.0000	52.0821	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	25.0000	26.6518	-6.6	111	0.00
44		Heptane	-1.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	50.0000	52.2283	-4.5	110	0.00
46	T	Benzene	50.0000	50.2913	-0.6	110	0.00
47	T	Trichloroethene	50.0000	47.1245	5.8	95	0.00
48	T	Methylcyclohexane	50.0000	53.4903	-7.0	112	0.00
49	C	1,2-Dichloropropane	50.0000	54.5477	-9.1	113	0.00
50	T	1,4-Dioxane	200.0000	222.2187	-11.1	112	0.00
51	T	Bromodichloromethane	50.0000	52.0504	-4.1	105	0.00
52	T	Dibromomethane	50.0000	50.1878	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	60.0802	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	50.0000	50.2978	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	55.1720	-10.3	111	0.00
56	T	Dimethyl Disulfide	50.0000	51.2534	-2.5	108	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	103	0.00
58	S	Toluene-d8	25.0000	26.5474	-6.2	111	0.00
59	C	Toluene	50.0000	51.2413	-2.5	108	0.00
60	T	Ethyl Methacrylate	50.0000	54.7693	-9.5	111	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	50.0000	56.1437	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	50.0000	50.5786	-1.2	103	0.00
64	T	2-Hexanone	50.0000	52.7004	-5.4	110	0.00
65	T	1,3-Dichloropropane	50.0000	52.3756	-4.8	108	0.00
66	T	Tetrachloroethene	50.0000	48.1542	3.7	98	0.00
67	T	Dibromochloromethane	50.0000	48.9094	2.2	97	0.00
68	T	1,2-Dibromoethane	50.0000	49.4712	1.1	101	0.00
69	T	1-Chlorohexane	50.0000	54.3296	-8.7	110	0.00
70	P	Chlorobenzene	50.0000	49.5164	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.0483	-0.1	99	0.00
72	C	Ethylbenzene	50.0000	50.5679	-1.1	104	0.00
73	T	m-,p-Xylene	100.0000	101.4737	-1.5	104	0.00
74	T	o-Xylene	50.0000	51.3327	-2.7	104	0.00
75	T	Styrene	50.0000	52.8038	-5.6	105	-0.02
76	P	Bromoform	50.0000	46.6484	6.7	90	0.00
77	T	Isopropylbenzene	50.0000	52.2947	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	50.8067	-1.6	110	0.00
80	S	p-Bromofluorobenzene	25.0000	27.1261	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	50.0000	49.0032	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	57.9760	-16.0	113	0.00
83	T	n-Propylbenzene	50.0000	53.5856	-7.2	109	0.00
84	T	Bromobenzene	50.0000	48.1787	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	52.7066	-5.4	107	0.00
86	T	2-Chlorotoluene	50.0000	53.3528	-6.7	113	0.00
87	T	4-Chlorotoluene	50.0000	52.0110	-4.0	106	0.00
88	T	a-Methylstyrene	50.0000	51.7394	-3.5	105	0.00
89	T	tert-Butylbenzene	50.0000	51.3315	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	53.4359	-6.9	108	0.00
91	T	sec-Butylbenzene	50.0000	53.2528	-6.5	108	0.00
92	T	p-Isopropyltoluene	50.0000	52.7432	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.0512	1.9	100	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.2286	3.5	100	0.00
95	T	n-Butylbenzene	50.0000	55.7268	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.0995	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	51.6593	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	47.2981	5.4	96	0.00
99	T	Hexachlorobutadiene	50.0000	49.2925	1.4	102	0.00
100	T	Naphthalene	50.0000	48.0225	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	50.0000	44.3131	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 03 09:21:47 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

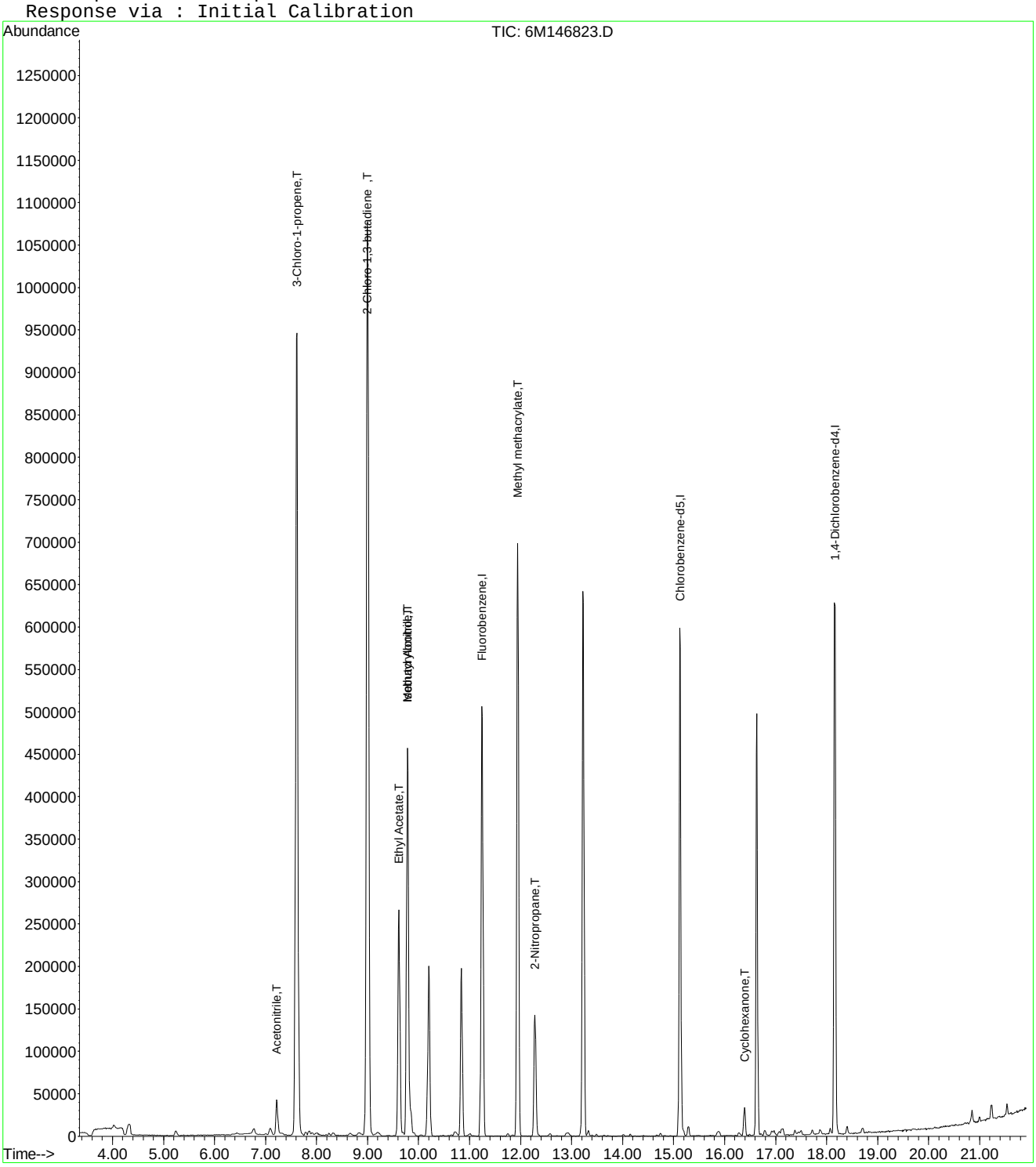
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.24	96	669196	25.00	ug/L		-0.03
11) Chlorobenzene-d5	15.13	117	453141	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	223571	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	59465	124.2959	ug/L		95
3) 3-Chloro-1-propene	7.62	41	991047	123.5279	ug/L		95
4) 2-Chloro-1,3-butadiene	8.99	53	1040852	105.1153	ug/L		95
5) Ethyl Acetate	9.62	43	438811	102.2449	ug/L		98
6) Methacrylonitrile	9.78	67	227767	100.8055	ug/L		97
7) Isobutyl Alcohol	9.78	43	24031	172.7532	ug/L	#	83
9) Methyl methacrylate	11.95	41	442639	94.2614	ug/L		95
10) 2-Nitropropane	12.28	43	141711	74.2134	ug/L		87
13) Cyclohexanone	16.39	55	18410	217.6350	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M146823.D A9FOOWT.M Wed May 03 09:37:30 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 3 9:21 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	79	-0.03
2	T	Acetonitrile	100.0000	124.2959	-24.3	101	-0.01
3	T	3-Chloro-1-propene	100.0000	123.5279	-23.5	95	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	105.1154	-5.1	80	-0.02
5	T	Ethyl Acetate	100.0000	102.2449	-2.2	78	-0.01
6	T	Methacrylonitrile	100.0000	100.8055	-0.8	76	-0.02
7	T	Isobutyl Alcohol	200.0000	172.7532	13.6	65	-0.02
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.06
9	T	Methyl methacrylate	100.0000	94.2614	5.7	71	-0.01
10	T	2-Nitropropane	100.0000	74.2134	25.8	59	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	73	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	65	-0.02
13	T	Cyclohexanone	100.0000	217.6350	-117.6#	163	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146823.D A9FOOWT.M Wed May 03 09:37:34 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:23:45 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.92	96	761033	25.00 ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	626315	25.00 ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	339008	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.88	111	204281	25.5917 ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.36%		
43) 1,2-Dichloroethane-d4	10.52	65	176851	25.6277 ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.52%		
58) Toluene-d8	12.90	98	751409	26.2570 ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.04%		
80) p-Bromofluorobenzene	16.29	95	303595	25.3744 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.48%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.33	85	566432	54.9983 ug/L	100
3) Chloromethane	3.81	50	653735	50.7728 ug/L	97
4) Vinyl Chloride	4.04	62	687332	56.5259 ug/L	99
5) 1,3-Butadiene	4.08	54	370821	83.7883 ug/L	92
6) Bromomethane	4.95	94	244530	54.0672 ug/L	99
7) Chloroethane	5.12	64	284434	53.5522 ug/L	97
8) Trichlorofluoromethane	5.60	101	681965	51.6373 ug/L	100
9) Diethyl ether	6.12	59	467036	93.8953 ug/L	89
10) Isoprene	6.16	67	595527	57.0315 ug/L	89
11) Acrolein	6.37	56	25093	36.4270 ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	393582	52.2616 ug/L	97
13) Acetone	6.46	43	56569	52.8513 ug/L	91
14) 1,1-Dichloroethene	6.69	61	592102	53.7215 ug/L	95
15) Tert-Butyl Alcohol	6.79	59	64287	185.2883 ug/L	97
16) Dimethyl Sulfide	6.96	62	403209	54.9235 ug/L	89
17) Iodomethane	7.21	142	130468	39.6237 ug/L	99
18) Methyl acetate	7.21	43	177325	60.5003 ug/L	90
19) Methylene Chloride	7.47	84	414055	52.2757 ug/L	79
20) Carbon Disulfide	7.52	76	1341568	58.5411 ug/L	100
21) Acrylonitrile	7.65	53	77477	52.1831 ug/L	97
22) Methyl Tert Butyl Ether	7.68	73	834350	53.4628 ug/L	96
23) trans-1,2-Dichloroethene	7.93	61	569036	53.0665 ug/L	95
24) n-Hexane	8.00	57	522844	58.4134 ug/L	91
25) Diisopropyl ether	8.33	45	2431958	101.3243 ug/L	95
26) Vinyl Acetate	8.51	43	457788	42.5261 ug/L	94
27) 1,1-Dichloroethane	8.55	63	762965	55.2845 ug/L	99
28) Ethyl-Tert-Butyl ether	8.91	59	1977511	96.8797 ug/L	97
29) 2-Butanone	9.10	43	85759	51.0921 ug/L	87
30) Propionitrile	9.20	54	49988	96.0869 ug/L	100
31) 2,2-Dichloropropane	9.31	77	662488	56.8648 ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	483814	54.5872 ug/L	93
33) Chloroform	9.59	83	769657	50.3327 ug/L	98
34) 1-Bromopropane	9.73	122	89334	51.0935 ug/L	99
35) Bromochloromethane	9.83	130	261004	54.5731 ug/L	89
36) Tetrahydrofuran	9.85	42	114355	98.9704 ug/L	85
38) 1,1,1-Trichloroethane	10.12	97	673491	54.5760 ug/L	100
39) Cyclohexane	10.15	56	656350	57.1268 ug/L	89
40) 1,1-Dichloropropene	10.32	75	574047	53.2771 ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1773366	97.0223 ug/L	97
42) Carbon Tetrachloride	10.47	117	625367	54.6536 ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419224.D 8260WT.M Fri Apr 28 09:01:59 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:23:45 2017 Quant Results File: 8260WT.RES

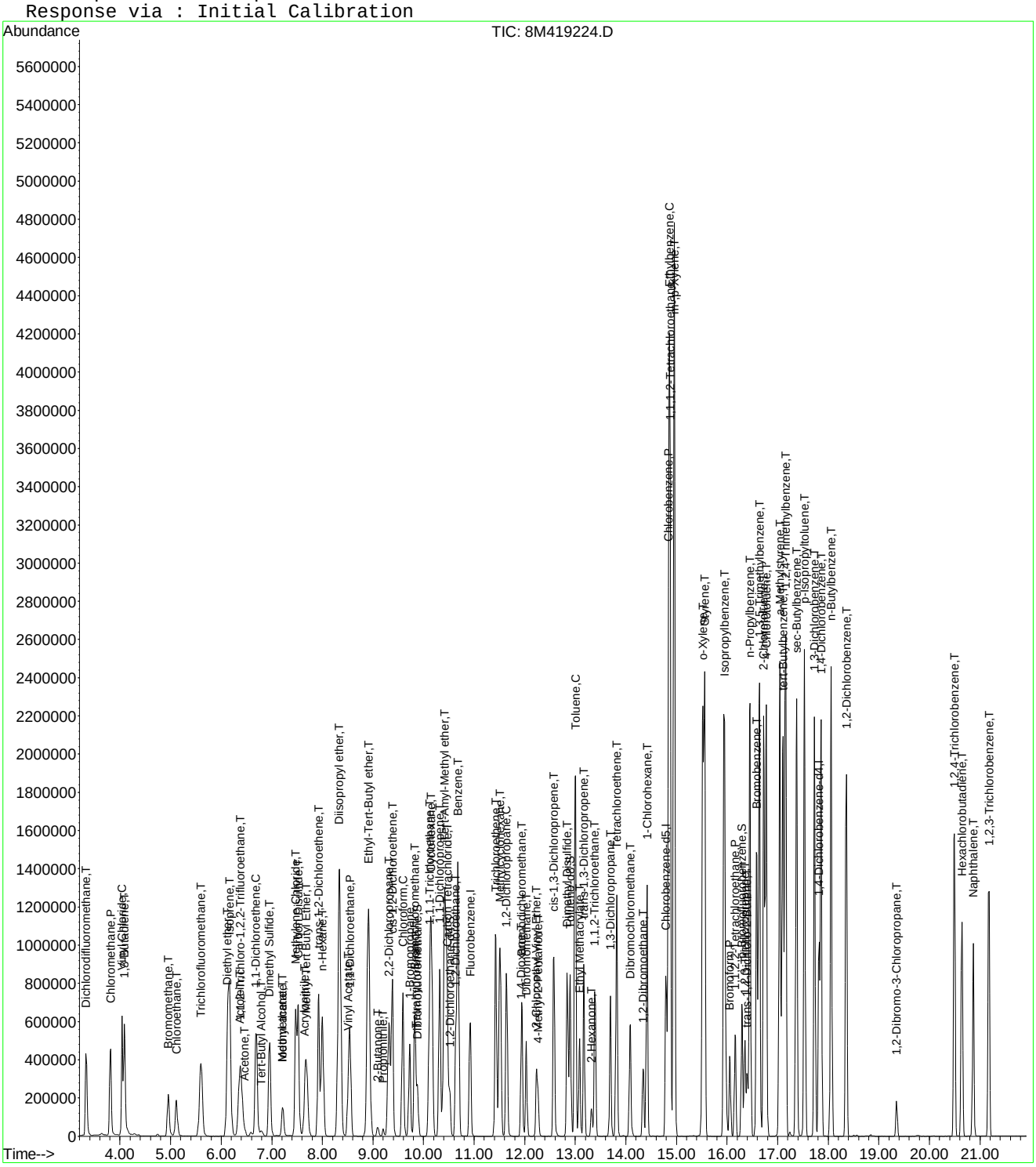
Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.64	62	476997	55.1648	ug/L		95
46)	Benzene	10.68	78	1716711	54.6036	ug/L		94
47)	Trichloroethene	11.43	130	464049	52.5426	ug/L		99
48)	Methylcyclohexane	11.51	83	650656	55.2666	ug/L		94
49)	1,2-Dichloropropane	11.64	63	426313	55.5185	ug/L		95
50)	Bromodichloromethane	11.94	83	578899	57.6079	ug/L		98
51)	1,4-Dioxane	11.93	88	9394	214.5712	ug/L		89
52)	Dibromomethane	12.03	93	221590	56.0747	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.23	63	169819	51.1122	ug/L		97
54)	4-Methyl-2-Pentanone	12.26	58	73483	49.3766	ug/L		97
55)	cis-1,3-Dichloropropene	12.58	75	678634	59.2993	ug/L		99
56)	Dimethyl Disulfide	12.84	79	332729	50.3658	ug/L		96
59)	Toluene	13.00	91	1917906	55.0128	ug/L		99
60)	Ethyl Methacrylate	13.08	69	365427	55.5584	ug/L		84
62)	trans-1,3-Dichloropropene	13.17	75	574504	56.8223	ug/L		99
63)	1,1,2-Trichloroethane	13.38	97	312584	54.4974	ug/L		97
64)	2-Hexanone	13.32	58	67675	48.0772	ug/L		84
65)	1,3-Dichloropropane	13.69	76	532245	54.8912	ug/L		86
66)	Tetrachloroethene	13.82	164	376326	51.3892	ug/L		97
67)	Dibromochloromethane	14.09	129	424893	57.6472	ug/L		100
68)	1,2-Dibromoethane	14.34	107	306010	54.6185	ug/L		99
69)	1-Chlorohexane	14.42	91	606615	54.9969	ug/L		92
70)	Chlorobenzene	14.84	112	1330862	53.6286	ug/L		98
71)	1,1,1,2-Tetrachloroethane	14.87	131	512594	58.2045	ug/L		100
72)	Ethylbenzene	14.86	106	757917	54.5302	ug/L		97
73)	m-,p-Xylene	14.96	106	1829497	113.6610	ug/L		99
74)	o-Xylene	15.52	106	874133	54.0168	ug/L		100
75)	Styrene	15.55	104	1507465	59.4179	ug/L		97
76)	Bromoform	16.05	173	264268	51.7747	ug/L		99
77)	Isopropylbenzene	15.95	105	2151913	55.5369	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.15	83	364707	57.0152	ug/L		97
81)	1,2,3-Trichloropropane	16.35	110	101052	55.1035	ug/L	#	31
82)	trans-1,4-Dichloro-2-Buten	16.39	53	94453	60.7552	ug/L	#	22
83)	n-Propylbenzene	16.45	91	2583441	54.4470	ug/L		99
84)	Bromobenzene	16.59	156	597098	53.7079	ug/L		98
85)	1,3,5-Trimethylbenzene	16.64	105	1866844	54.3375	ug/L		98
86)	2-Chlorotoluene	16.72	91	1618662	49.9696	ug/L		83
87)	4-Chlorotoluene	16.77	91	1685720	57.7456	ug/L		92
88)	a-Methylstyrene	17.04	118	1048726	54.4471	ug/L		99
89)	tert-Butylbenzene	17.11	134	400798	51.5254	ug/L		95
90)	1,2,4-Trimethylbenzene	17.16	105	1976446	56.3498	ug/L		98
91)	sec-Butylbenzene	17.37	105	2280567	52.9978	ug/L		100
92)	p-Isopropyltoluene	17.53	119	1975873	54.5304	ug/L		99
93)	1,3-Dichlorobenzene	17.73	146	1166224	54.1194	ug/L		98
94)	1,4-Dichlorobenzene	17.86	146	1151954	52.5808	ug/L		99
95)	n-Butylbenzene	18.06	91	1830578	56.0838	ug/L		100
96)	1,2-Dichlorobenzene	18.36	146	1020452	53.9055	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.35	75	56924	54.6792	ug/L		94
98)	1,2,4-Trichlorobenzene	20.50	180	674712	52.9392	ug/L		99
99)	Hexachlorobutadiene	20.64	225	296248	49.9514	ug/L		99
100)	Naphthalene	20.87	128	1015144	55.7369	ug/L		100
101)	1,2,3-Trichlorobenzene	21.18	180	553970	52.3410	ug/L		99

(#) = qualifier out of range (m) = manual integration
8M419224.D 8260WT.M Fri Apr 28 09:02:00 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 8:23 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: HPMS8
Initial cal date: 17 Apr 2017 16:54
CCV date: 28 Apr 2017 8:01
CCV Filename: 8M419224.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	830845	10.93	667165	14.80	355416	17.83
CCV	761033	10.92	626315	14.79	339008	17.82

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	92	-0.01
2	T	Dichlorodifluoromethane	0.3383	0.3721	-10.0	92	-0.02
3	P	Chloromethane	0.4230	0.4295	-1.5	98	0.00
4	C	Vinyl Chloride	0.3994	0.4516	-13.1	106	-0.01
5	T	1,3-Butadiene	0.1737	0.2436	-40.2#	136	-0.01
6	T	Bromomethane	0.1100	0.1607	-46.0#	99	-0.01
7	T	Chloroethane	0.1745	0.1869	-7.1	97	0.00
8	T	Trichlorofluoromethane	0.4339	0.4481	-3.3	94	0.00
9	T	Diethyl ether	0.1634	0.1534	6.1	88	-0.02
10	T	Isoprene	0.3430	0.3913	-14.1	104	-0.02
11	T	Acrolein	0.0226	0.0165	27.1#	68	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2474	0.2586	-4.5	95	-0.02
13	T	Acetone	0.0352	0.0372	-5.7	95	-0.02
14	C	1,1-Dichloroethene	0.3621	0.3890	-7.4	96	-0.01
15	T	Tert-Butyl Alcohol	0.0114	0.0106	7.4	85	-0.04
16	T	Dimethyl Sulfide	0.2412	0.2649	-9.8	101	-0.02
17	T	Iodomethane	0.1082	0.0857	20.7	65	-0.01
18	T	Methyl acetate	0.0963	0.1165	-21.0	110	-0.02
19	T	Methylene Chloride	0.2602	0.2720	-4.6	97	-0.02
20	T	Carbon Disulfide	0.7528	0.8814	-17.1	106	-0.02
21	T	Acrylonitrile	0.0488	0.0509	-4.4	88	-0.02
22	T	Methyl Tert Butyl Ether	0.5127	0.5482	-6.9	95	-0.03
23	T	trans-1,2-Dichloroethene	0.3523	0.3739	-6.1	97	-0.01
24	T	n-Hexane	0.2940	0.3435	-16.8	109	-0.01
25	T	Diisopropyl ether	0.7885	0.7989	-1.3	93	-0.02
26	T	Vinyl Acetate	0.3536	0.3008	14.9	77	-0.02
27	P	1,1-Dichloroethane	0.4533	0.5013	-10.6	99	-0.01
28	T	Ethyl-Tert-Butyl ether	0.6705	0.6496	3.1	89	-0.02
29	T	2-Butanone	0.0551	0.0563	-2.2	91	-0.01
30	T	Propionitrile	0.0171	0.0164	3.9	88	-0.02
31	T	2,2-Dichloropropane	0.3827	0.4353	-13.7	103	-0.02
32	T	cis-1,2-Dichloroethene	0.2912	0.3179	-9.2	98	-0.02
33	C	Chloroform	0.5023	0.5057	-0.7	99	-0.01
34		1-Bromopropane	0.0574	0.0587	-2.2	94	-0.02
35	T	Bromochloromethane	0.1571	0.1715	-9.1	94	-0.02
36	T	Tetrahydrofuran	0.0380	0.0376	1.0	91	-0.01
37	S	Dibromofluoromethane	0.2622	0.2684	-2.4	90	-0.02
38	T	1,1,1-Trichloroethane	0.4054	0.4425	-9.2	97	-0.02
39	T	Cyclohexane	0.3774	0.4312	-14.3	104	-0.02
40	T	1,1-Dichloropropene	0.3539	0.3771	-6.6	98	-0.02
41	T	Tert-Amyl-Methyl ether	0.6004	0.5826	3.0	89	-0.02
42	T	Carbon Tetrachloride	0.3759	0.4109	-9.3	96	0.00
43	S	1,2-Dichloroethane-d4	0.2267	0.2324	-2.5	90	-0.01
44		Heptane	0.0000	0.0000	0.0	0#	-2.61#
45	T	1,2-Dichloroethane	0.2841	0.3134	-10.3	98	-0.02
46	T	Benzene	1.0328	1.1279	-9.2	99	-0.02
47	T	Trichloroethene	0.2901	0.3049	-5.1	96	-0.01
48	T	Methylcyclohexane	0.3867	0.4275	-10.5	101	-0.01
49	C	1,2-Dichloropropane	0.2522	0.2801	-11.0	100	-0.01
50	T	Bromodichloromethane	0.3301	0.3803	-15.2	100	-0.02
51	T	1,4-Dioxane	0.0014	0.0015	-6.9	93	-0.02
52	T	Dibromomethane	0.1298	0.1456	-12.2	98	-0.01
53	T	2-Chloroethyl Vinyl Ether	0.1091	0.1116	-2.2	90	-0.02
54	T	4-Methyl-2-Pentanone	0.0489	0.0483	1.2	88	-0.02

(#) = Out of Range
8M419224.D 8260WT.M Fri Apr 28 09:02:14 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3759	0.4459	-18.6	101	-0.01
56	T	Dimethyl Disulfide	0.1968	0.2186	-11.1	100	-0.02
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	94	-0.01
58	S	Toluene-d8	1.1423	1.1997	-5.0	95	-0.01
59	C	Toluene	1.3916	1.5311	-10.0	100	-0.01
60	T	Ethyl Methacrylate	0.2625	0.2917	-11.1	95	-0.01
61		Paraldehyde	0.0000	0.0000	0.0	0#	-13.40#
62	T	trans-1,3-Dichloropropene	0.4036	0.4586	-13.6	102	-0.02
63	T	1,1,2-Trichloroethane	0.2289	0.2495	-9.0	102	-0.02
64	T	2-Hexanone	0.0562	0.0540	3.8	87	-0.01
65	T	1,3-Dichloropropane	0.3870	0.4249	-9.8	100	-0.01
66	T	Tetrachloroethene	0.2923	0.3004	-2.8	96	-0.01
67	T	Dibromochloromethane	0.2942	0.3392	-15.3	100	-0.01
68	T	1,2-Dibromoethane	0.2236	0.2443	-9.2	97	-0.02
69	T	1-Chlorohexane	0.4403	0.4843	-10.0	101	-0.01
70	P	Chlorobenzene	0.9906	1.0624	-7.3	101	-0.01
71	T	1,1,1,2-Tetrachloroethane	0.3515	0.4092	-16.4	100	0.00
72	C	Ethylbenzene	0.5548	0.6051	-9.1	100	-0.02
73	T	m-,p-Xylene	0.6425	0.7303	-13.7	101	-0.01
74	T	o-Xylene	0.6460	0.6978	-8.0	101	0.00
75	T	Styrene	1.0127	1.2034	-18.8	102	-0.01
76	P	Bromoform	0.1760	0.2110	-19.9	101	0.00
77	T	Isopropylbenzene	1.5466	1.7179	-11.1	100	-0.01
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	95	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4717	0.5379	-14.0	104	-0.02
80	S	p-Bromofluorobenzene	0.8823	0.8955	-1.5	96	-0.01
81	T	1,2,3-Trichloropropane	0.1352	0.1490	-10.2	99	0.05
82	T	trans-1,4-Dichloro-2-Butene	0.0978	0.1393	-42.5#	109	-0.01
83	T	n-Propylbenzene	3.4991	3.8103	-8.9	102	0.00
84	T	Bromobenzene	0.8199	0.8807	-7.4	99	-0.01
85	T	1,3,5-Trimethylbenzene	2.5336	2.7534	-8.7	100	0.00
86	T	2-Chlorotoluene	2.3888	2.3874	0.1	104	-0.01
87	T	4-Chlorotoluene	2.1528	2.4863	-15.5	102	-0.01
88	T	a-Methylstyrene	1.4204	1.5468	-8.9	101	-0.01
89	T	tert-Butylbenzene	0.5736	0.5911	-3.1	99	-0.01
90	T	1,2,4-Trimethylbenzene	2.5866	2.9150	-12.7	101	-0.01
91	T	sec-Butylbenzene	3.1733	3.3636	-6.0	99	-0.01
92	T	p-Isopropyltoluene	2.6721	2.9142	-9.1	99	-0.01
93	T	1,3-Dichlorobenzene	1.5891	1.7201	-8.2	101	-0.01
94	T	1,4-Dichlorobenzene	1.6156	1.6990	-5.2	102	-0.01
95	T	n-Butylbenzene	2.4070	2.6999	-12.2	101	0.00
96	T	1,2-Dichlorobenzene	1.3960	1.5051	-7.8	100	-0.01
97	T	1,2-Dibromo-3-Chloropropane	0.0768	0.0840	-9.4	101	0.00
98	T	1,2,4-Trichlorobenzene	0.9399	0.9951	-5.9	97	0.00
99	T	Hexachlorobutadiene	0.4374	0.4369	0.1	95	-0.01
100	T	Naphthalene	1.3431	1.4972	-11.5	99	0.00
101	T	1,2,3-Trichlorobenzene	0.7805	0.8171	-4.7	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419224.D 8260WT.M Fri Apr 28 09:02:14 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	92	-0.01
2	T	Dichlorodifluoromethane	50.0000	54.9983	-10.0	92	-0.02
3	P	Chloromethane	50.0000	50.7728	-1.5	98	0.00
4	C	Vinyl Chloride	50.0000	56.5259	-13.1	106	-0.01
5	T	1,3-Butadiene	50.0000	83.7883	-67.6#	136	-0.01
6	T	Bromomethane	50.0000	54.0672	-8.1	99	-0.01
7	T	Chloroethane	50.0000	53.5522	-7.1	97	0.00
8	T	Trichlorofluoromethane	50.0000	51.6373	-3.3	94	0.00
9	T	Diethyl ether	100.0000	93.8953	6.1	88	-0.02
10	T	Isoprene	50.0000	57.0315	-14.1	104	-0.02
11	T	Acrolein	50.0000	36.4270	27.1#	68	-0.02
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.2617	-4.5	95	-0.02
13	T	Acetone	50.0000	52.8513	-5.7	95	-0.02
14	C	1,1-Dichloroethene	50.0000	53.7215	-7.4	96	-0.01
15	T	Tert-Butyl Alcohol	200.0000	185.2883	7.4	85	-0.04
16	T	Dimethyl Sulfide	50.0000	54.9235	-9.8	101	-0.02
17	T	Iodomethane	50.0000	39.6236	20.8	65	-0.01
18	T	Methyl acetate	50.0000	60.5003	-21.0	110	-0.02
19	T	Methylene Chloride	50.0000	52.2757	-4.6	97	-0.02
20	T	Carbon Disulfide	50.0000	58.5411	-17.1	106	-0.02
21	T	Acrylonitrile	50.0000	52.1831	-4.4	88	-0.02
22	T	Methyl Tert Butyl Ether	50.0000	53.4628	-6.9	95	-0.03
23	T	trans-1,2-Dichloroethene	50.0000	53.0665	-6.1	97	-0.01
24	T	n-Hexane	50.0000	58.4134	-16.8	109	-0.01
25	T	Diisopropyl ether	100.0000	101.3243	-1.3	93	-0.02
26	T	Vinyl Acetate	50.0000	42.5261	14.9	77	-0.02
27	P	1,1-Dichloroethane	50.0000	55.2845	-10.6	99	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	96.8797	3.1	89	-0.02
29	T	2-Butanone	50.0000	51.0921	-2.2	91	-0.01
30	T	Propionitrile	100.0000	96.0869	3.9	88	-0.02
31	T	2,2-Dichloropropane	50.0000	56.8648	-13.7	103	-0.02
32	T	cis-1,2-Dichloroethene	50.0000	54.5872	-9.2	98	-0.02
33	C	Chloroform	50.0000	50.3327	-0.7	99	-0.01
34		1-Bromopropane	50.0000	51.0935	-2.2	94	-0.02
35	T	Bromochloromethane	50.0000	54.5731	-9.1	94	-0.02
36	T	Tetrahydrofuran	100.0000	98.9705	1.0	91	-0.01
37	S	Dibromofluoromethane	25.0000	25.5917	-2.4	90	-0.02
38	T	1,1,1-Trichloroethane	50.0000	54.5760	-9.2	97	-0.02
39	T	Cyclohexane	50.0000	57.1268	-14.3	104	-0.02
40	T	1,1-Dichloropropene	50.0000	53.2771	-6.6	98	-0.02
41	T	Tert-Amyl-Methyl ether	100.0000	97.0223	3.0	89	-0.02
42	T	Carbon Tetrachloride	50.0000	54.6536	-9.3	96	0.00
43	S	1,2-Dichloroethane-d4	25.0000	25.6277	-2.5	90	-0.01
44		Heptane	-1.0000	0.0000	0.0	0	-2.61#
45	T	1,2-Dichloroethane	50.0000	55.1648	-10.3	98	-0.02
46	T	Benzene	50.0000	54.6036	-9.2	99	-0.02
47	T	Trichloroethene	50.0000	52.5426	-5.1	96	-0.01
48	T	Methylcyclohexane	50.0000	55.2666	-10.5	101	-0.01
49	C	1,2-Dichloropropane	50.0000	55.5185	-11.0	100	-0.01
50	T	Bromodichloromethane	50.0000	57.6079	-15.2	100	-0.02
51	T	1,4-Dioxane	200.0000	214.5712	-7.3	93	-0.02
52	T	Dibromomethane	50.0000	56.0746	-12.1	98	-0.01
53	T	2-Chloroethyl Vinyl Ether	50.0000	51.1122	-2.2	90	-0.02
54	T	4-Methyl-2-Pentanone	50.0000	49.3766	1.2	88	-0.02

(#) = Out of Range
8M419224.D 8260WT.M Fri Apr 28 09:02:16 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419224.D Vial: 2
Acq On : 28 Apr 2017 8:01 Operator: TMB
Sample : WG611928-02 50ug/L CCV STD 8260 Inst : HPMS8
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Multiple Level Calibration

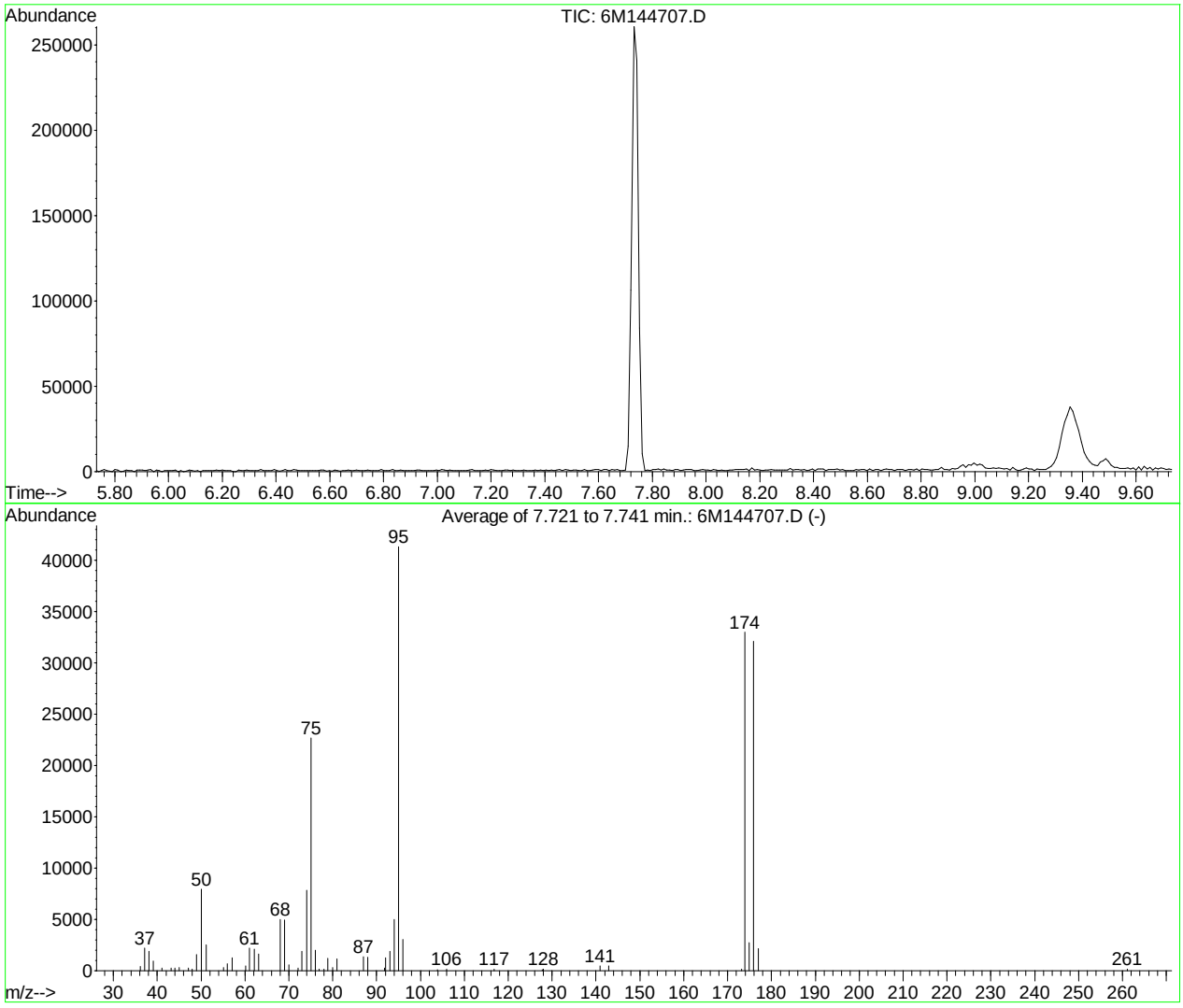
Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	59.2993	-18.6	101	-0.01
56	T	Dimethyl Disulfide	50.0000	50.3658	-0.7	100	-0.02
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	94	-0.01
58	S	Toluene-d8	25.0000	26.2570	-5.0	95	-0.01
59	C	Toluene	50.0000	55.0128	-10.0	100	-0.01
60	T	Ethyl Methacrylate	50.0000	55.5584	-11.1	95	-0.01
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.40#
62	T	trans-1,3-Dichloropropene	50.0000	56.8223	-13.6	102	-0.02
63	T	1,1,2-Trichloroethane	50.0000	54.4975	-9.0	102	-0.02
64	T	2-Hexanone	50.0000	48.0772	3.8	87	-0.01
65	T	1,3-Dichloropropane	50.0000	54.8912	-9.8	100	-0.01
66	T	Tetrachloroethene	50.0000	51.3892	-2.8	96	-0.01
67	T	Dibromochloromethane	50.0000	57.6472	-15.3	100	-0.01
68	T	1,2-Dibromoethane	50.0000	54.6185	-9.2	97	-0.02
69	T	1-Chlorohexane	50.0000	54.9969	-10.0	101	-0.01
70	P	Chlorobenzene	50.0000	53.6286	-7.3	101	-0.01
71	T	1,1,1,2-Tetrachloroethane	50.0000	58.2045	-16.4	100	0.00
72	C	Ethylbenzene	50.0000	54.5302	-9.1	100	-0.02
73	T	m-,p-Xylene	100.0000	113.6610	-13.7	101	-0.01
74	T	o-Xylene	50.0000	54.0168	-8.0	101	0.00
75	T	Styrene	50.0000	59.4179	-18.8	102	-0.01
76	P	Bromoform	50.0000	51.7747	-3.5	101	0.00
77	T	Isopropylbenzene	50.0000	55.5369	-11.1	100	-0.01
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	95	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	57.0152	-14.0	104	-0.02
80	S	p-Bromofluorobenzene	25.0000	25.3744	-1.5	96	-0.01
81	T	1,2,3-Trichloropropane	50.0000	55.1035	-10.2	99	0.05
82	T	trans-1,4-Dichloro-2-Butene	50.0000	60.7552	-21.5	109	-0.01
83	T	n-Propylbenzene	50.0000	54.4470	-8.9	102	0.00
84	T	Bromobenzene	50.0000	53.7079	-7.4	99	-0.01
85	T	1,3,5-Trimethylbenzene	50.0000	54.3375	-8.7	100	0.00
86	T	2-Chlorotoluene	50.0000	49.9696	0.1	104	-0.01
87	T	4-Chlorotoluene	50.0000	57.7456	-15.5	102	-0.01
88	T	a-Methylstyrene	50.0000	54.4471	-8.9	101	-0.01
89	T	tert-Butylbenzene	50.0000	51.5254	-3.1	99	-0.01
90	T	1,2,4-Trimethylbenzene	50.0000	56.3498	-12.7	101	-0.01
91	T	sec-Butylbenzene	50.0000	52.9978	-6.0	99	-0.01
92	T	p-Isopropyltoluene	50.0000	54.5304	-9.1	99	-0.01
93	T	1,3-Dichlorobenzene	50.0000	54.1194	-8.2	101	-0.01
94	T	1,4-Dichlorobenzene	50.0000	52.5808	-5.2	102	-0.01
95	T	n-Butylbenzene	50.0000	56.0838	-12.2	101	0.00
96	T	1,2-Dichlorobenzene	50.0000	53.9055	-7.8	100	-0.01
97	T	1,2-Dibromo-3-Chloropropane	50.0000	54.6792	-9.4	101	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	52.9392	-5.9	97	0.00
99	T	Hexachlorobutadiene	50.0000	49.9514	0.1	95	-0.01
100	T	Naphthalene	50.0000	55.7368	-11.5	99	0.00
101	T	1,2,3-Trichlorobenzene	50.0000	52.3410	-4.7	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
8M419224.D 8260WT.M Fri Apr 28 09:02:17 2017 Page 2

2.1.1.5 Raw QC Data

```
Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144707.D Vial: 1
Acq On    : 12 Jan 2017   8:36                      Operator: TMB
Sample    : WG598323-01 50ng BFB STD 8260           Inst    : Hpms6
Misc      : 1,1 STD79474                            Multiplr: 1.00
MS Integration Params: rteint.p
Method    : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title     : SOP: OVL MSV01
```

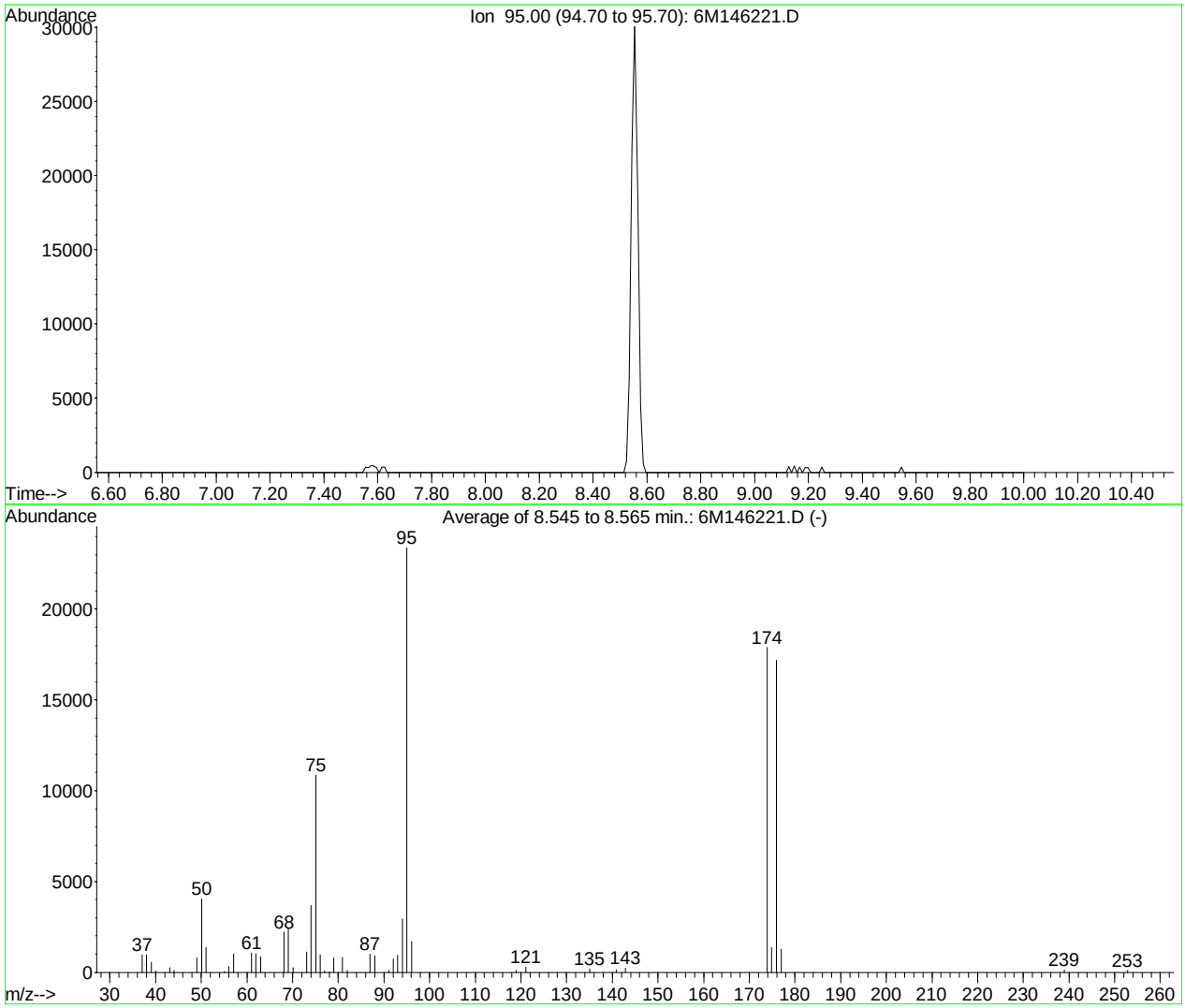


AutoFind: Scans 258, 259, 260; Background Corrected with Scan 253

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	7923	PASS
75	95	30	60	54.8	22651	PASS
95	95	100	100	100.0	41304	PASS
96	95	5	9	7.3	3007	PASS
173	174	0.00	2	0.4	116	PASS
174	95	50	100	79.8	32963	PASS
175	174	5	9	8.2	2709	PASS
176	174	95	101	97.3	32071	PASS
177	176	5	9	6.7	2147	PASS

6M144707.D BFB.M Thu Apr 27 13:11:59 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146221.D Vial: 3
Acq On : 5 Apr 2017 16:29 Operator: TMB
Sample : WG608938-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

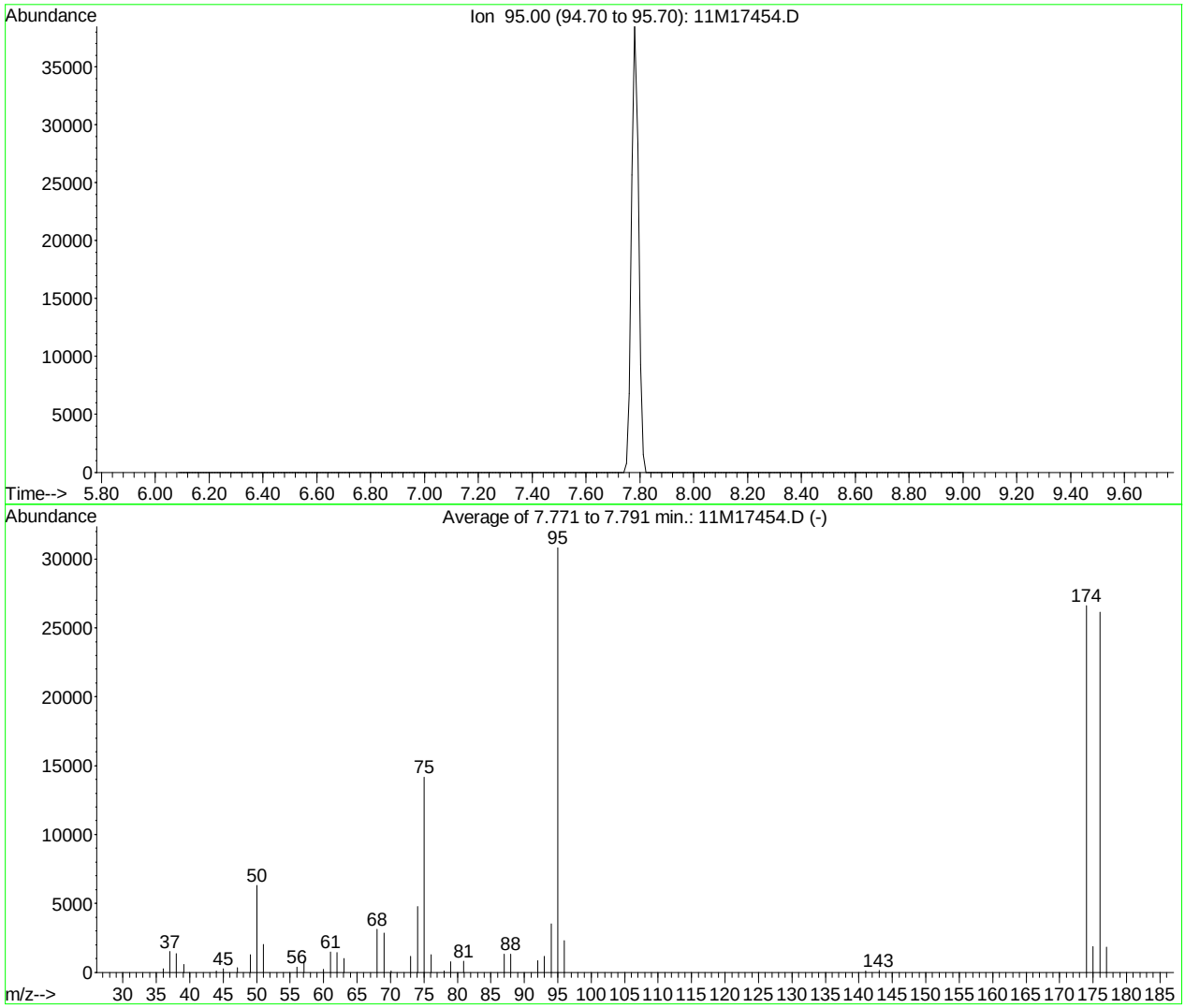


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.3	4043	PASS
75	95	30	60	46.5	10875	PASS
95	95	100	100	100.0	23389	PASS
96	95	5	9	7.2	1674	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	76.5	17883	PASS
175	174	5	9	7.6	1356	PASS
176	174	95	101	96.1	17186	PASS
177	176	5	9	7.3	1263	PASS

6M146221.D 8260BWT.M Thu Apr 06 14:59:20 2017

Data File : C:\MSDCHEM\1\DATA\041117\11M17454.D Vial: 1
Acq On : 11 Apr 2017 17:59 Operator: FJB
Sample : WG609769-01 BFB 50ng A9 Inst : hpms11
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11

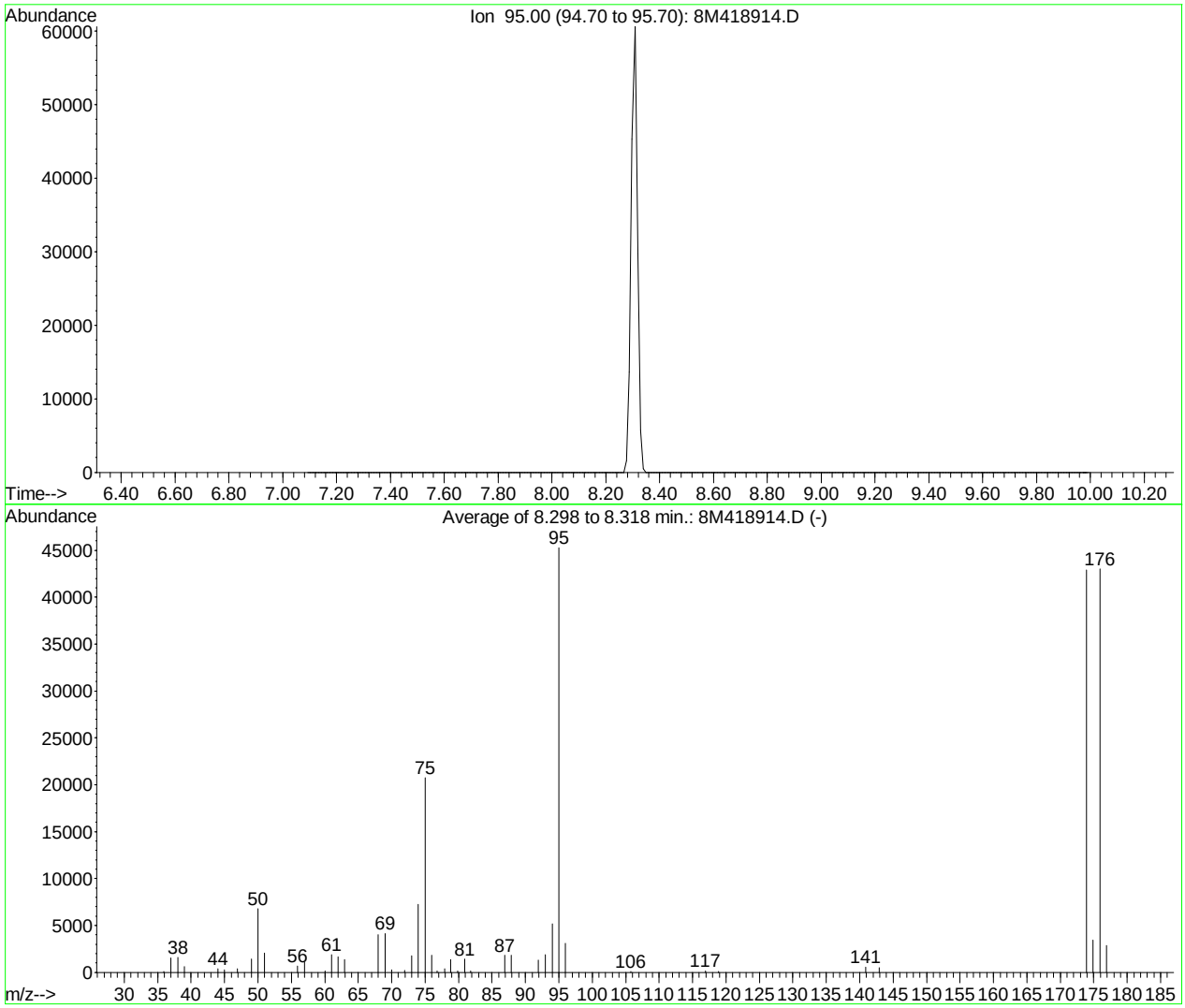


AutoFind: Scans 164, 165, 166; Background Corrected with Scan 159

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	20.4	6289	PASS
75	95	30	60	45.9	14147	PASS
95	95	100	100	100.0	30826	PASS
96	95	5	9	7.4	2288	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	86.3	26595	PASS
175	174	5	9	7.1	1884	PASS
176	174	95	101	98.2	26124	PASS
177	176	5	9	7.0	1818	PASS

11M17454.D A9FOOWT.M Fri Apr 21 13:38:28 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041217\8M418914.D Vial: 1
Acq On : 12 Apr 2017 10:17 Operator: TMB
Sample : WG609829-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WTR.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 03-21-17 HPMS8

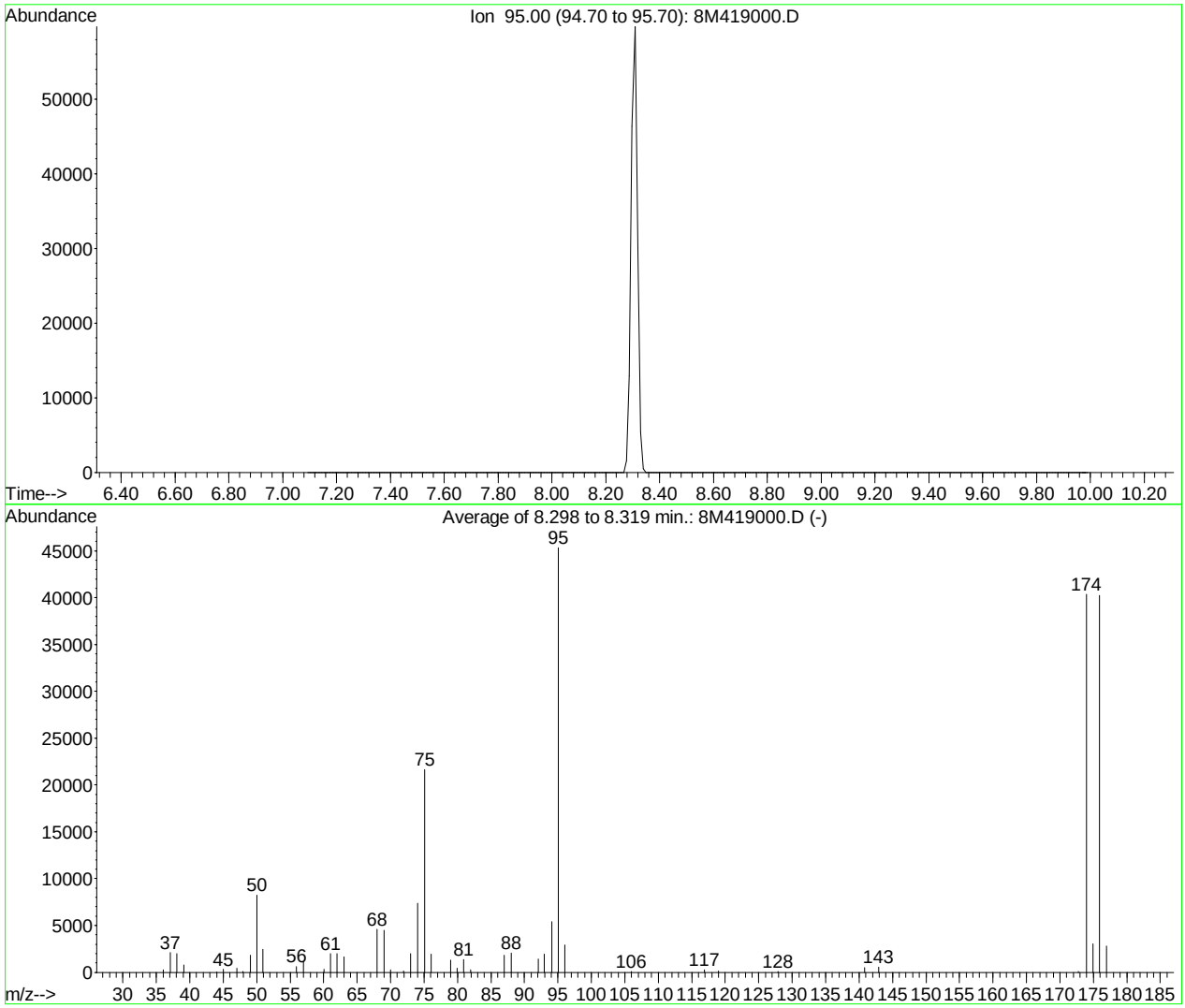


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	15.0	6807	PASS
75	95	30	60	45.8	20724	PASS
95	95	100	100	100.0	45280	PASS
96	95	5	9	6.8	3077	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	94.7	42898	PASS
175	174	5	9	8.0	3453	PASS
176	174	95	101	100.2	42994	PASS
177	176	5	9	6.7	2876	PASS

8M418914.D 8260WTR.M Fri Apr 14 13:50:48 2017

```
Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\041717\8M419000.D Vial: 1
Acq On    : 17 Apr 2017  12:58                    Operator: TMB
Sample    : WG610410-01 50ng BFB STD 8260         Inst    : HPMS8
Misc      : 1,1 STD80989                          Multiplr: 1.00
MS Integration Params: RTEINT.P
Method    : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title     : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
```

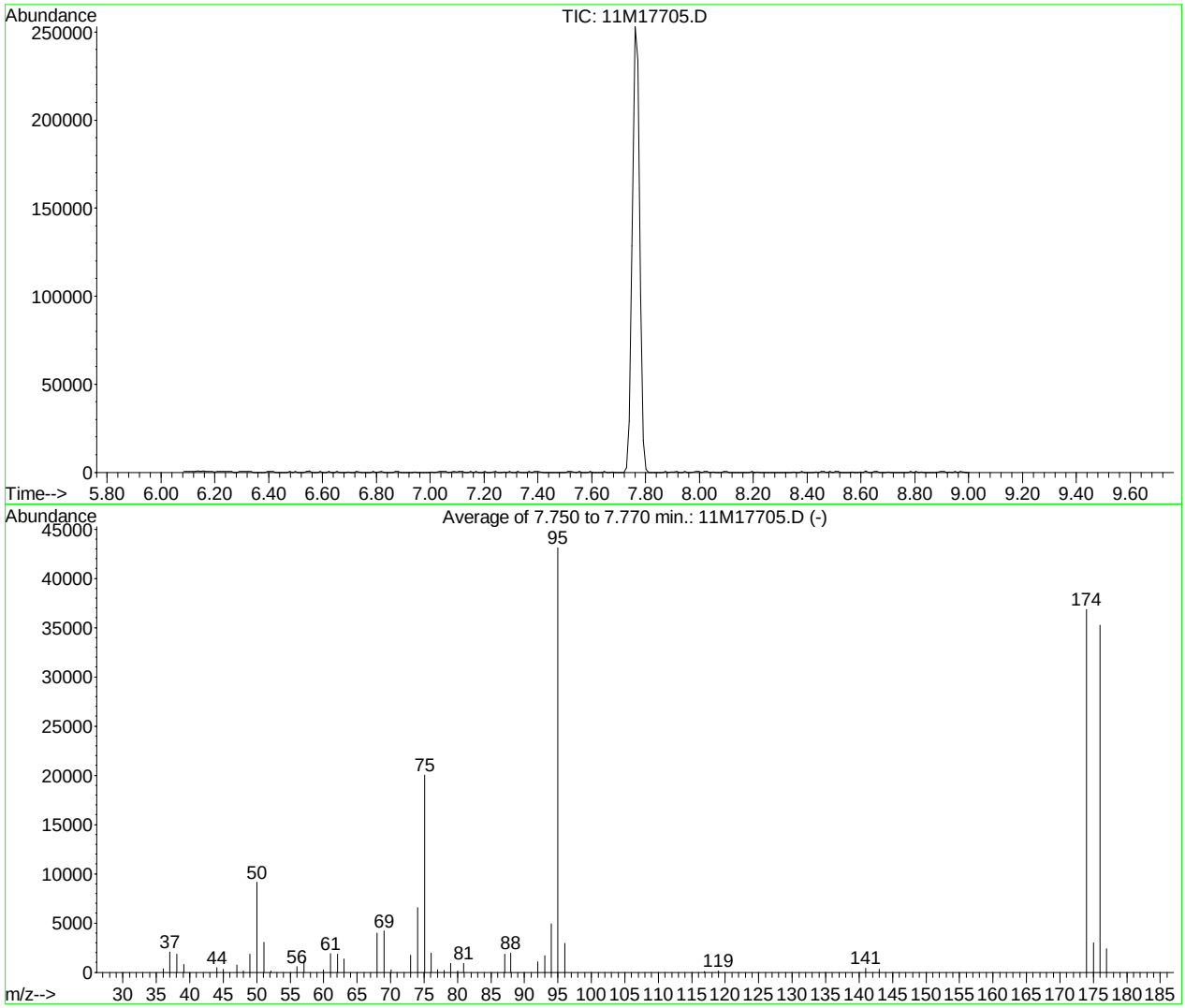


AutoFind: Scans 119, 120, 121; Background Corrected with Scan 114

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.1	8216	PASS
75	95	30	60	47.8	21655	PASS
95	95	100	100	100.0	45349	PASS
96	95	5	9	6.4	2901	PASS
173	174	0.00	2	0.3	110	PASS
174	95	50	100	89.0	40349	PASS
175	174	5	9	7.5	3042	PASS
176	174	95	101	99.8	40256	PASS
177	176	5	9	7.0	2800	PASS

8M419000.D 8260WT.M Tue Apr 18 11:58:27 2017

Data File : C:\MSDCHEM\1\DATA\042417\11M17705.D Vial: 2
Acq On : 24 Apr 2017 16:08 Operator: JDS
Sample : WG611320-01 BFB 50ng 8260 Inst : hpms11
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

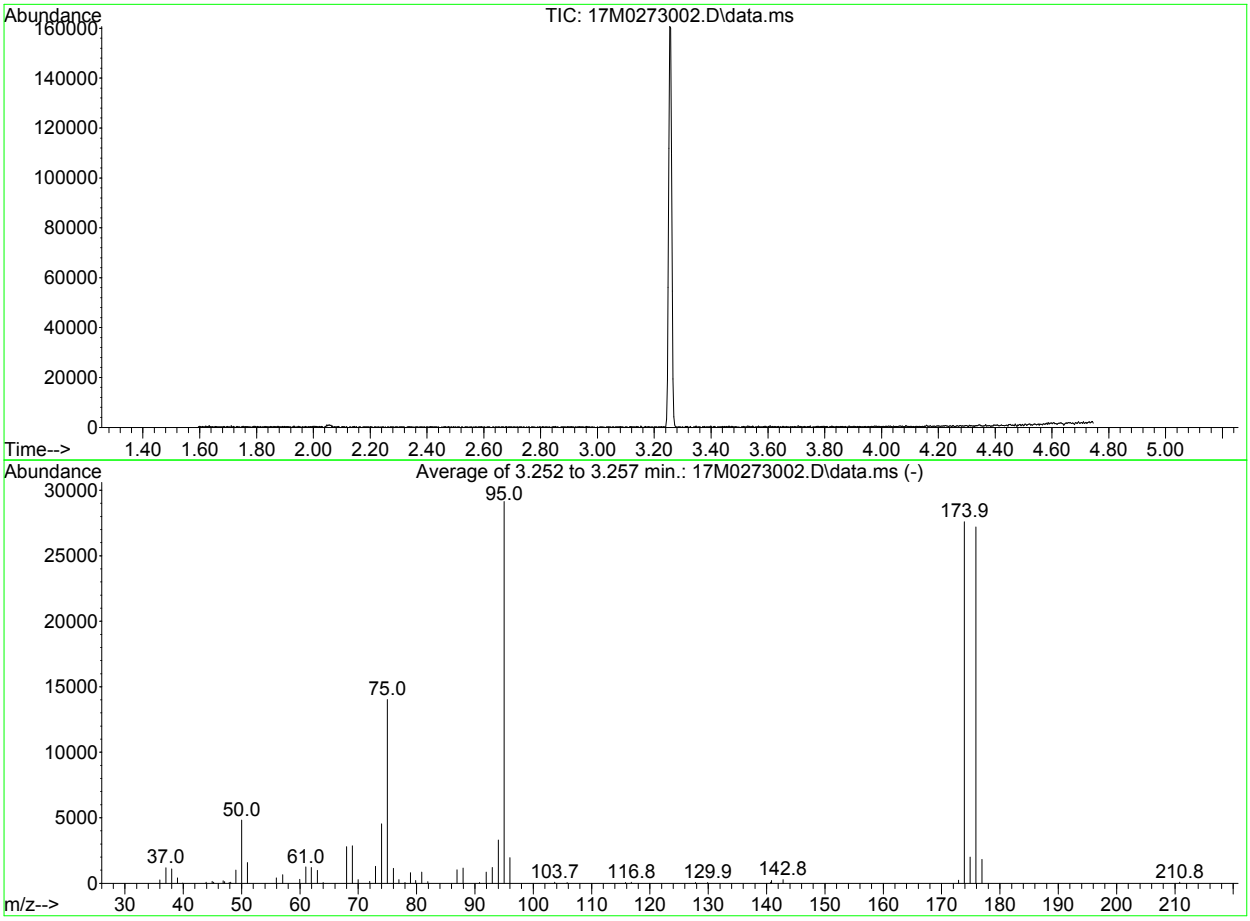
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	21.2	9137	PASS
75	95	30	60	46.5	20047	PASS
95	95	100	100	100.0	43125	PASS
96	95	5	9	6.8	2920	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	85.4	36834	PASS
175	174	5	9	8.1	2976	PASS
176	174	95	101	95.7	35256	PASS
177	176	5	9	6.8	2409	PASS

11M17705.D 8260WT.M Tue Apr 25 14:35:28 2017

Data Path : D:\MassHunter\GCMS\1\data\042517\
Data File : 17M0273002.D
Acq On : 25 Apr 2017 20:07
Operator : FJB
Sample : WG611454-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

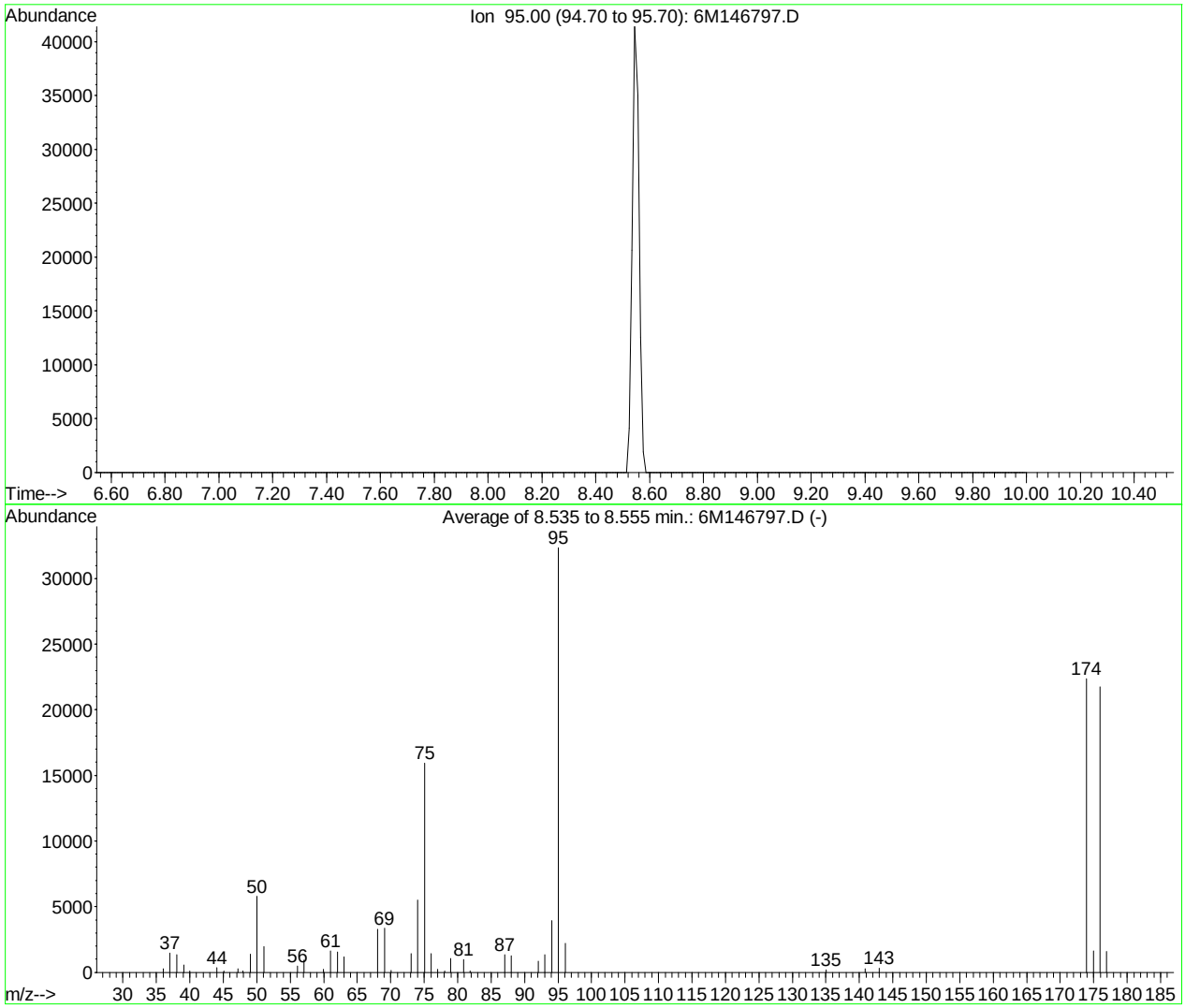
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	4824	PASS
75	95	30	60	48.1	14022	PASS
95	95	100	100	100.0	29152	PASS
96	95	5	9	6.7	1953	PASS
173	174	0.00	2	0.8	223	PASS
174	95	50	100	94.7	27600	PASS
175	174	5	9	7.3	2004	PASS
176	174	95	101	98.5	27192	PASS
177	176	5	9	6.7	1814	PASS

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146797.D Vial: 1
Acq On : 28 Apr 2017 6:27 Operator: TMB
Sample : WG611920-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

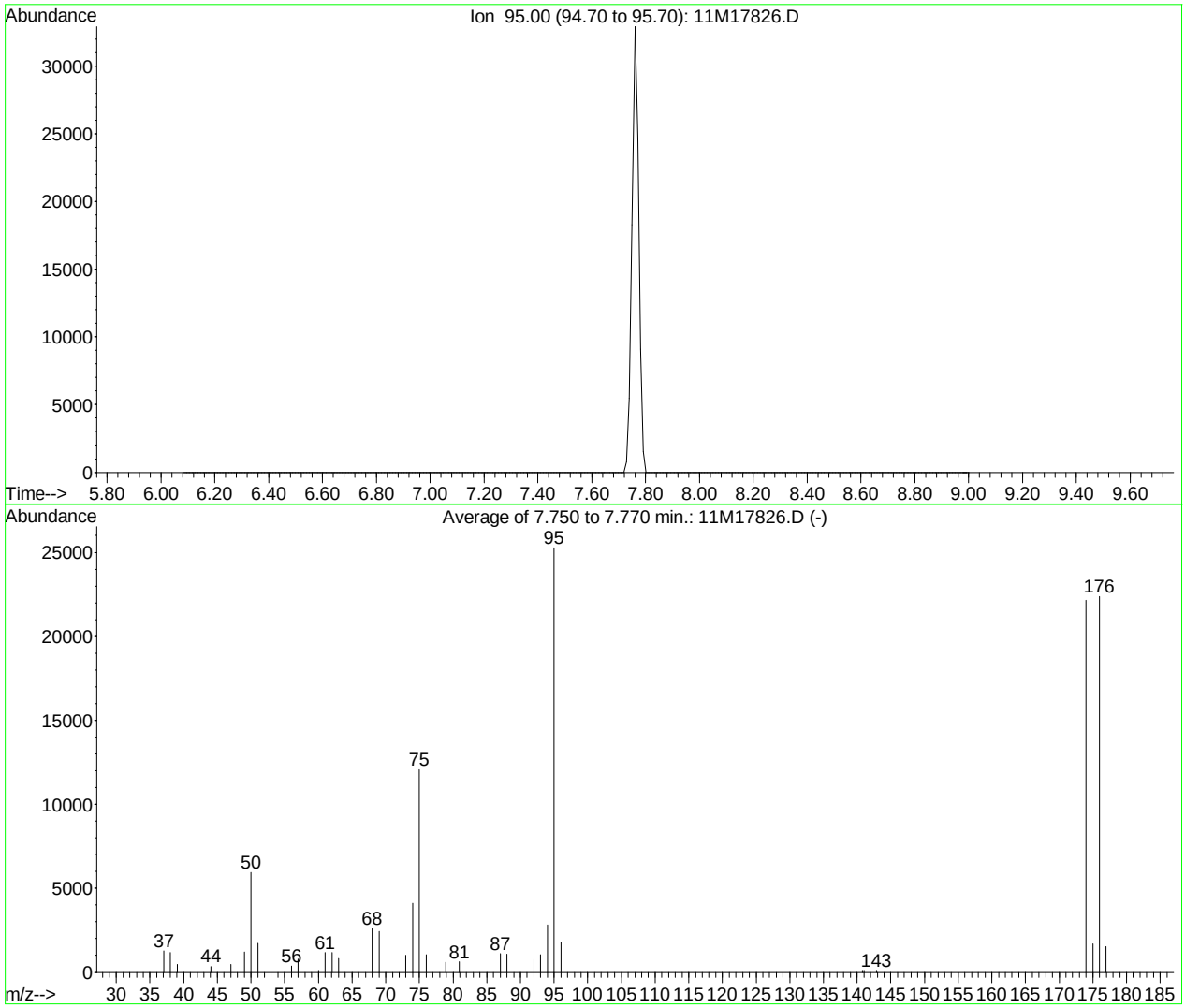


AutoFind: Scans 338, 339, 340; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.9	5780	PASS
75	95	30	60	49.3	15935	PASS
95	95	100	100	100.0	32354	PASS
96	95	5	9	6.8	2194	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	69.1	22363	PASS
175	174	5	9	7.2	1614	PASS
176	174	95	101	97.3	21763	PASS
177	176	5	9	7.2	1577	PASS

6M146797.D 8260BWT.M Fri Apr 28 10:38:32 2017

```
Data File : C:\MSDCHEM\1\DATA\042817\11M17826.D          Vial: 1
Acq On    : 28 Apr 2017   6:28                    Operator: TMB
Sample    : WG611924-01 50ng BFB STD 8260         Inst    : hpms11
Misc      : 1,1 STD81491                          Multiplr: 1.00
MS Integration Params: rteint.p
Method    : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title     : SOP: OVL MSV01
```

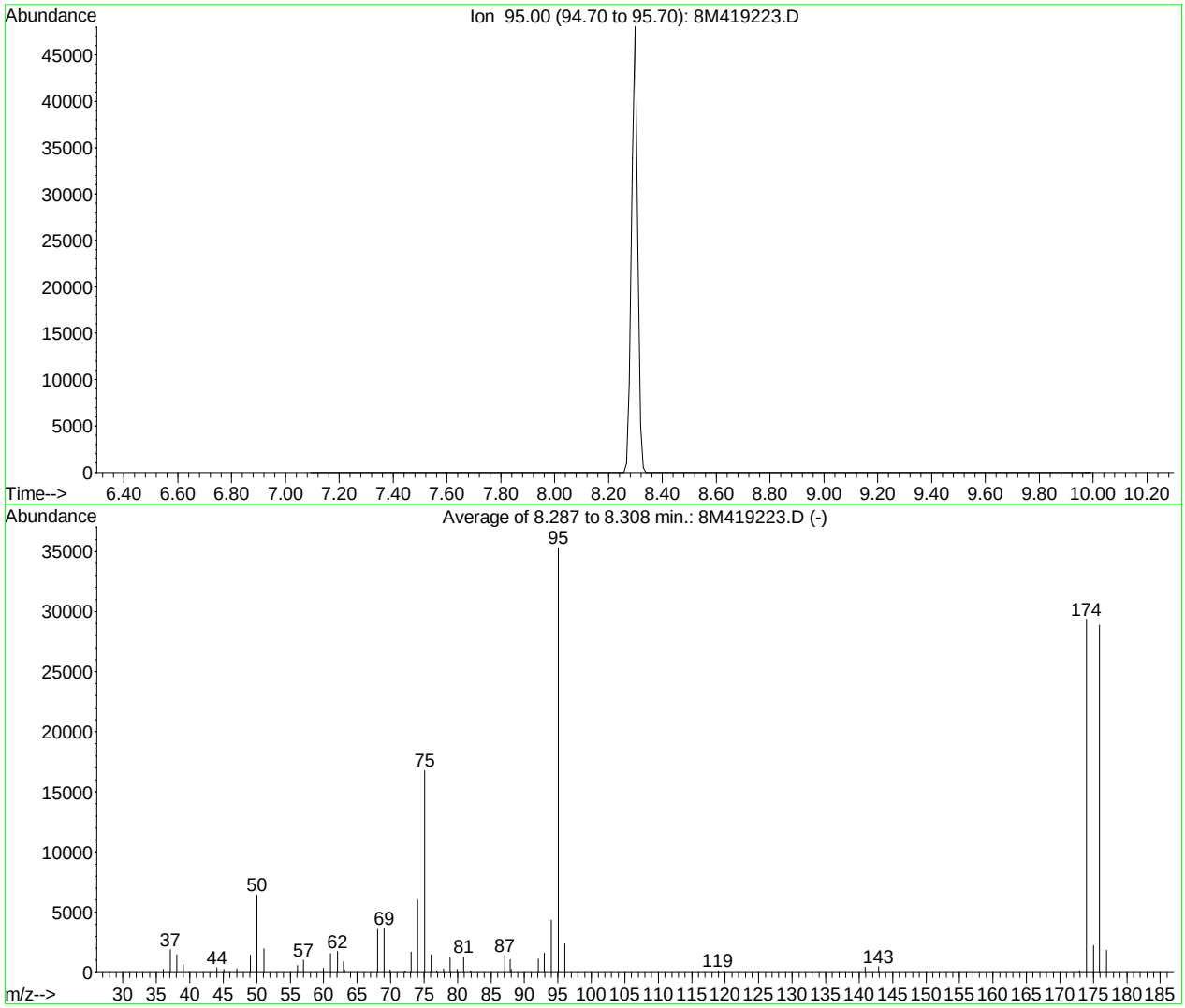


AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	23.6	5959	PASS
75	95	30	60	47.8	12082	PASS
95	95	100	100	100.0	25282	PASS
96	95	5	9	7.1	1795	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	87.7	22162	PASS
175	174	5	9	7.6	1685	PASS
176	174	95	101	100.9	22366	PASS
177	176	5	9	6.8	1519	PASS

11M17826.D BFB.M Fri Apr 28 06:40:34 2017

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419223.D Vial: 2
Acq On : 28 Apr 2017 7:37 Operator: TMB
Sample : WG611928-01 50ng BFB STD 8260 Inst : HPMS8
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8



AutoFind: Scans 118, 119, 120; Background Corrected with Scan 113

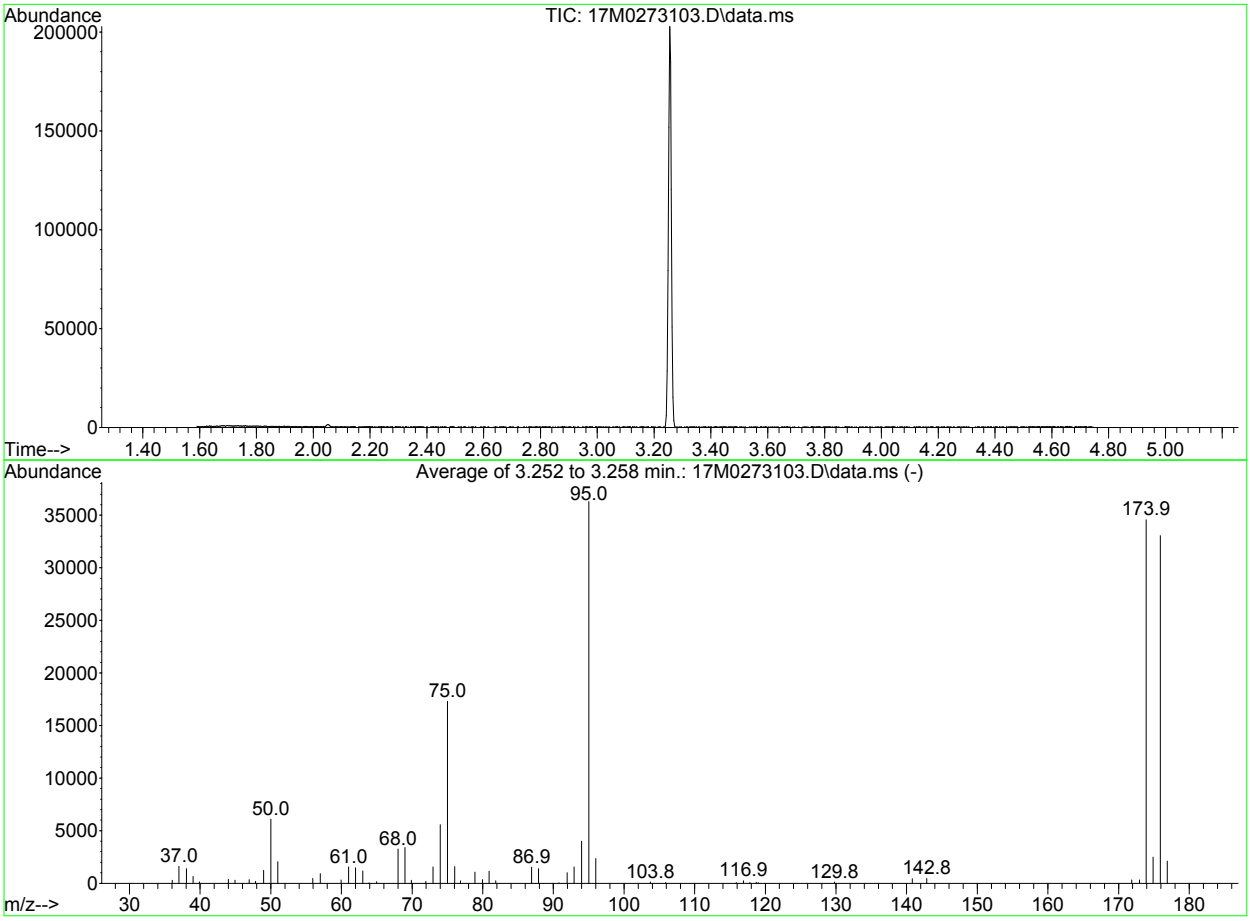
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.1	6392	PASS
75	95	30	60	47.4	16752	PASS
95	95	100	100	100.0	35314	PASS
96	95	5	9	6.7	2375	PASS
173	174	0.00	2	0.4	107	PASS
174	95	50	100	83.2	29365	PASS
175	174	5	9	7.6	2222	PASS
176	174	95	101	98.3	28858	PASS
177	176	5	9	6.3	1815	PASS

8M419223.D 8260WT.M Fri Apr 28 09:01:44 2017

Data Path : D:\MassHunter\GCMS\1\data\042817\
Data File : 17M0273103.D
Acq On : 28 Apr 2017 12:01
Operator : ADC
Sample : WG612029-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017

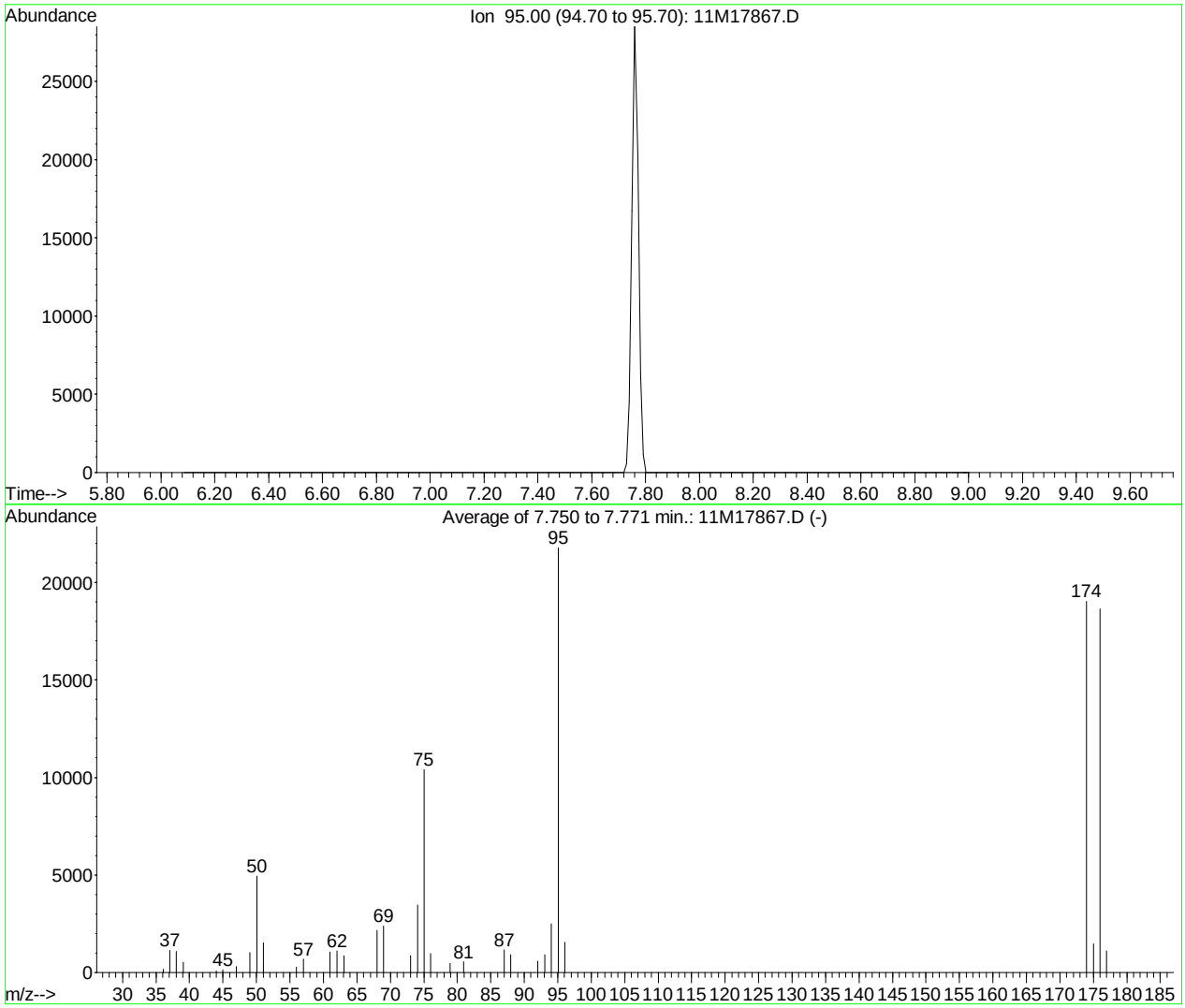


AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.8	6101	PASS
75	95	30	60	47.7	17307	PASS
95	95	100	100	100.0	36315	PASS
96	95	5	9	6.5	2365	PASS
173	174	0.00	2	0.9	322	PASS
174	95	50	100	95.2	34571	PASS
175	174	5	9	7.2	2501	PASS
176	174	95	101	95.6	33064	PASS
177	176	5	9	6.4	2111	PASS

826VMS.M Fri Apr 28 13:19:54 2017 Page: 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17867.D Vial: 2
Acq On : 29 Apr 2017 17:57 Operator: TMB
Sample : WG612121-01 50ng BFB STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	22.6	4932	PASS
75	95	30	60	47.7	10389	PASS
95	95	100	100	100.0	21797	PASS
96	95	5	9	7.1	1539	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	87.4	19054	PASS
175	174	5	9	7.6	1451	PASS
176	174	95	101	97.9	18648	PASS
177	176	5	9	5.9	1102	PASS

11M17867.D BFB.M Sat Apr 29 18:08:15 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17830.D Vial: 3
Acq On : 28 Apr 2017 8:26 Operator: TMB
Sample : WG611925-01 VBLK0428 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39:28 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

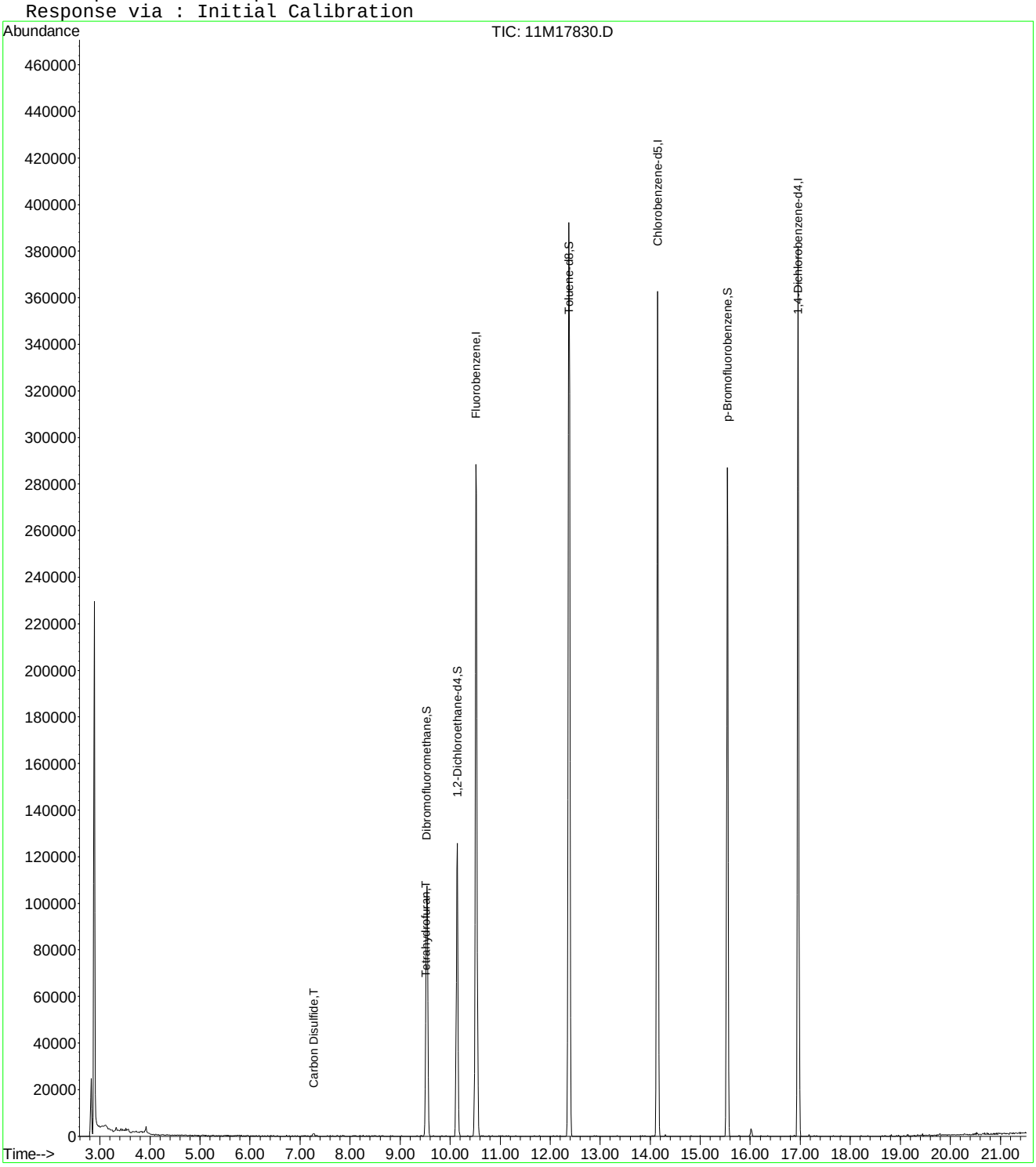
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	340536	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	243342	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	128681	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86511	25.6474	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.60%			
43) 1,2-Dichloroethane-d4	10.14	65	102789	26.2594	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.04%			
57) Toluene-d8	12.38	98	335631	26.5626	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.24%			
78) p-Bromofluorobenzene	15.54	95	118833	26.5690	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.28%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	414	Below Cal	#	40
20) Carbon Disulfide	7.27	76	1688	0.1623	ug/L #	73
36) Tetrahydrofuran	9.51	42	5485	3.6194	ug/L	91

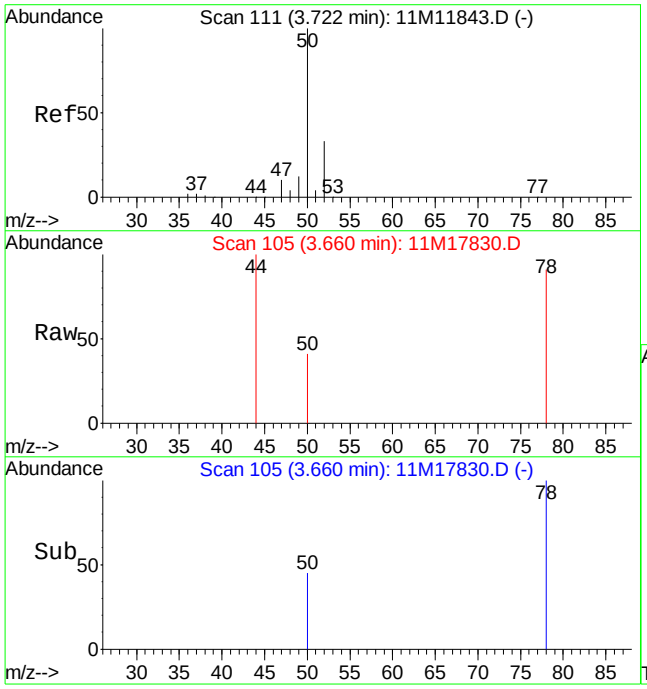
(#) = qualifier out of range (m) = manual integration
11M17830.D 8260WT.M Sun Apr 30 15:39:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042817\11M17830.D Vial: 3
Acq On : 28 Apr 2017 8:26 Operator: TMB
Sample : WG611925-01 VBLK0428 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 15:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

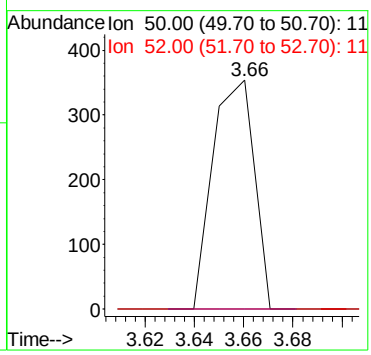


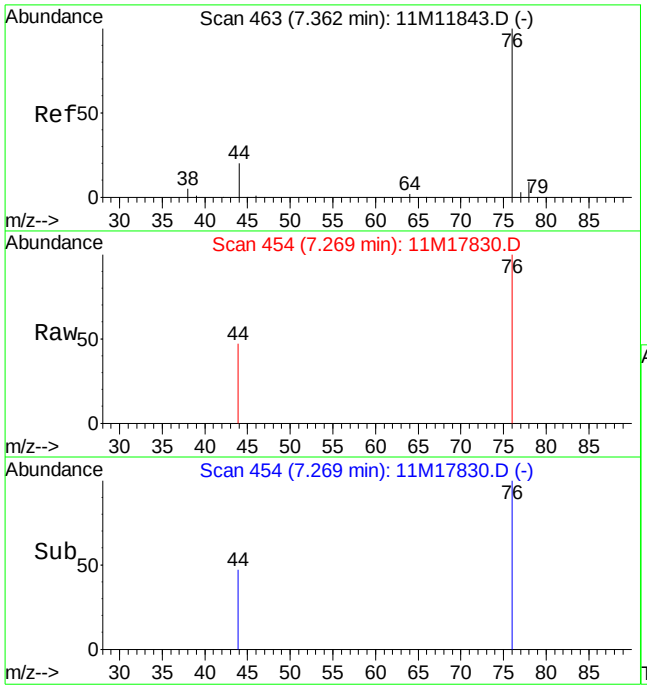


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17830.D
Acq: 28 Apr 2017 8:26

Tgt Ion: 50 Resp: 414

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

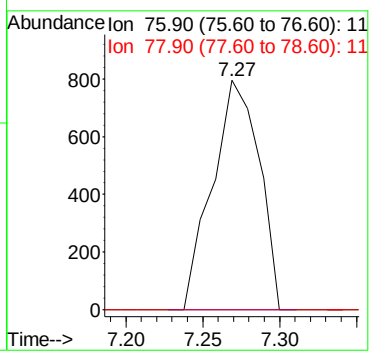


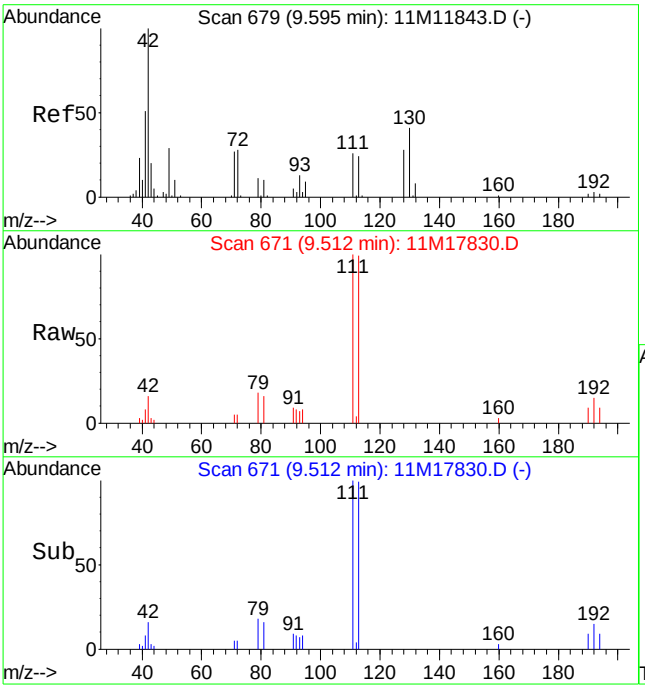


#20
Carbon Disulfide
Concen: 0.16 ug/L
RT: 7.27 min Scan# 454
Delta R.T. -0.01 min
Lab File: 11M17830.D
Acq: 28 Apr 2017 8:26

Tgt Ion: 76 Resp: 1688

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

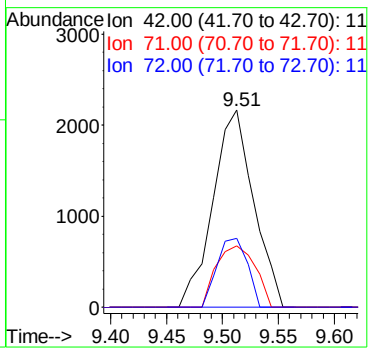




#36
Tetrahydrofuran
Concen: 3.62 ug/L
RT: 9.51 min Scan# 671
Delta R.T. 0.01 min
Lab File: 11M17830.D
Acq: 28 Apr 2017 8:26

Tgt Ion: 42 Resp: 5485

Ion	Ratio	Lower	Upper
42	100		
71	29.8	19.0	44.2
72	26.1	20.8	48.4



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51:55 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

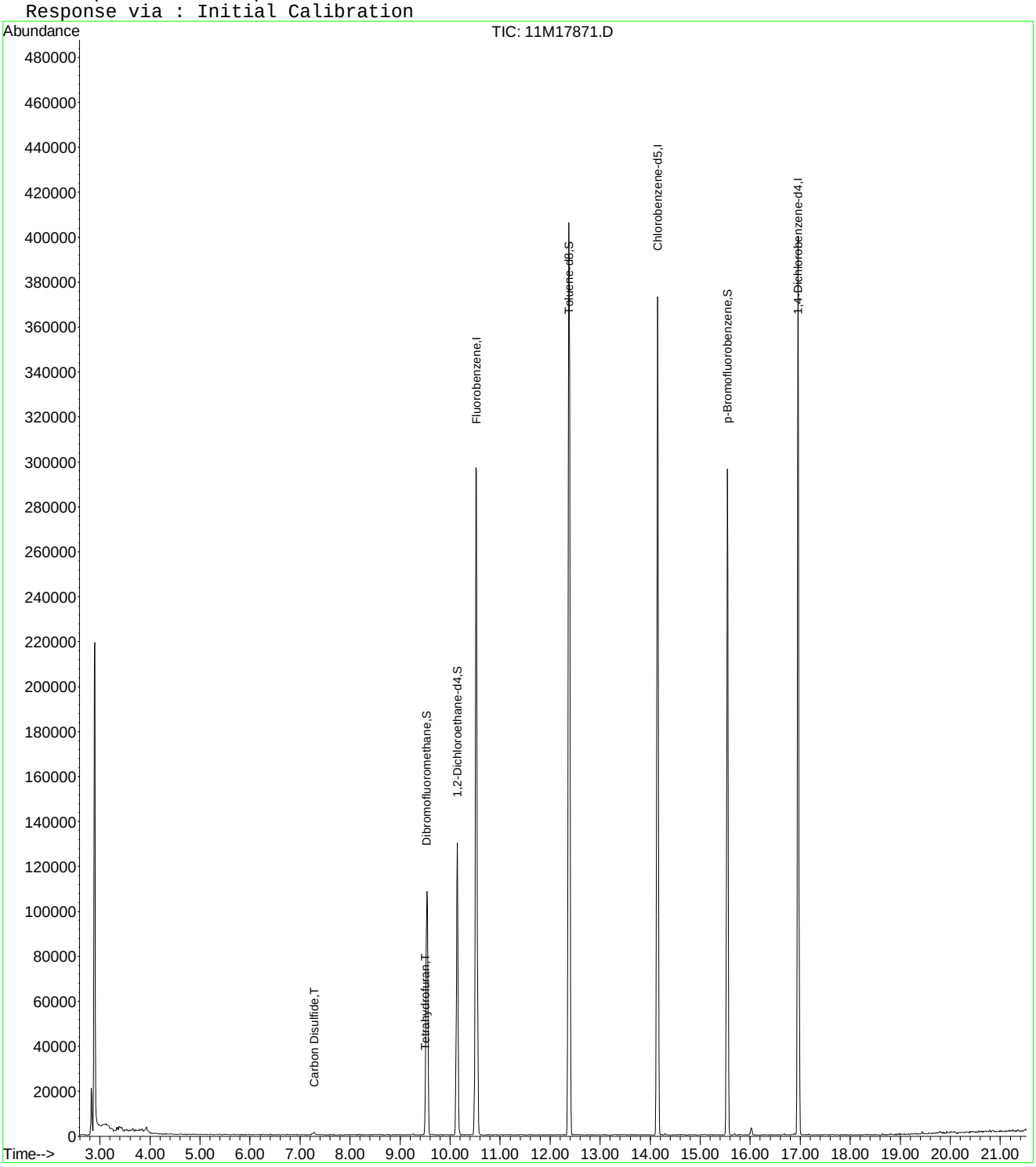
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	353206	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	250807	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	132987	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86657	24.7691	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.08%			
43) 1,2-Dichloroethane-d4	10.14	65	105541	25.9953	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.00%			
57) Toluene-d8	12.38	98	345519	26.5313	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.12%			
78) p-Bromofluorobenzene	15.54	95	122347	26.4690	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	695	Below Cal		95
20) Carbon Disulfide	7.28	76	2034	0.1886	ug/L #	73
33) Chloroform	9.25	83	425	Below Cal	#	17
36) Tetrahydrofuran	9.50	42	5959	3.7912	ug/L	85

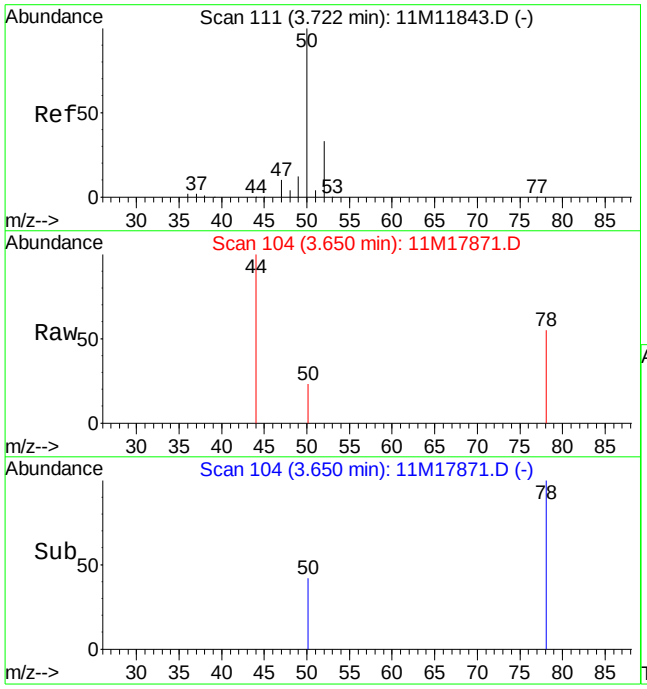
(#) = qualifier out of range (m) = manual integration
11M17871.D 8260WT.M Sun Apr 30 12:51:55 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

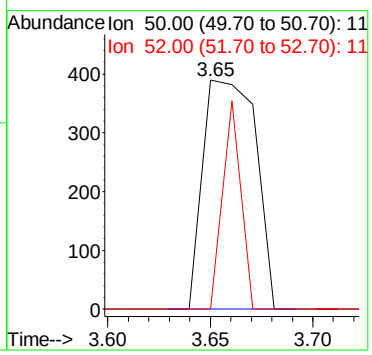


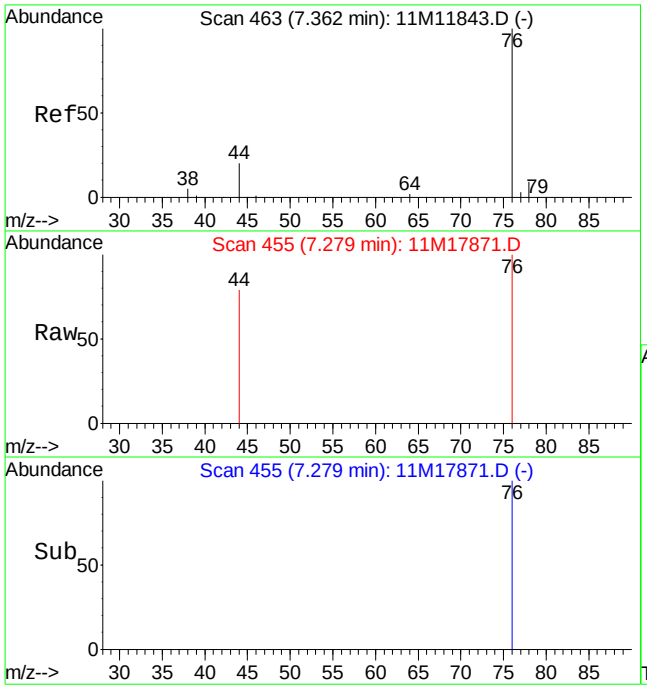


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 50 Resp: 695

Ion	Ratio	Lower	Upper
50	100		
52	31.7	20.8	48.6

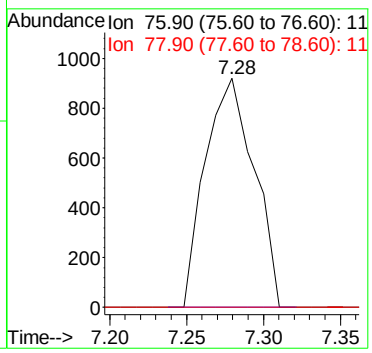


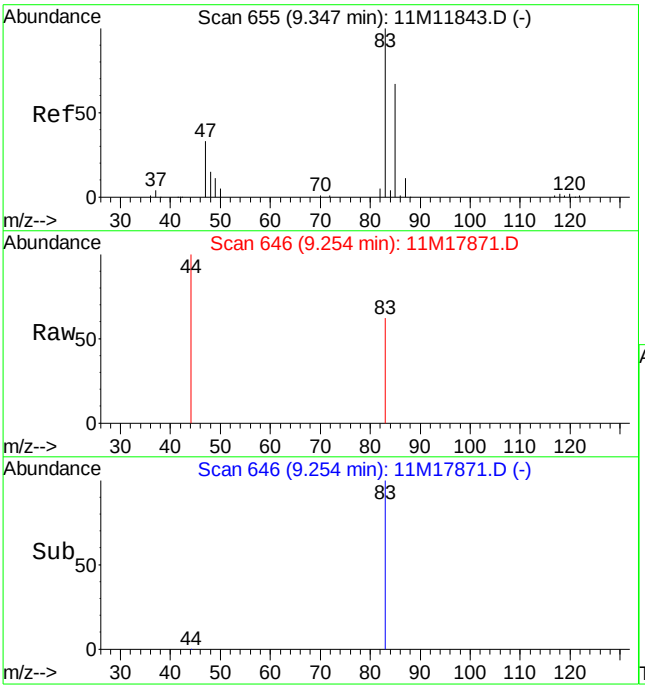


#20
Carbon Disulfide
Concen: 0.19 ug/L
RT: 7.28 min Scan# 455
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 76 Resp: 2034

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

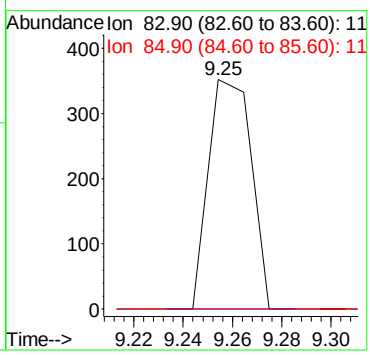


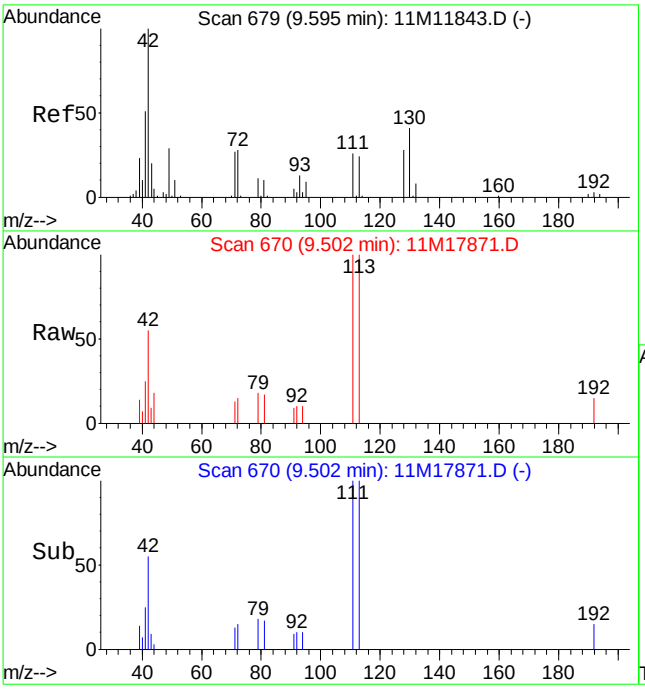


#33
Chloroform
Concen: Below Cal
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 83 Resp: 425

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

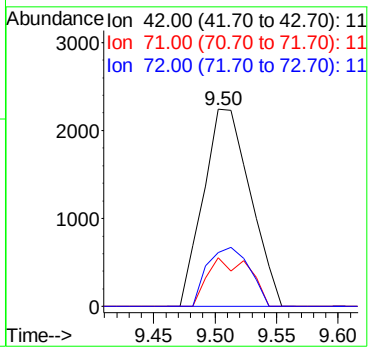




#36
Tetrahydrofuran
Concen: 3.79 ug/L
RT: 9.50 min Scan# 670
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 42 Resp: 5959

Ion	Ratio	Lower	Upper
42	100		
71	22.2	19.0	44.2
72	27.2	20.8	48.4



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273106.D Vial: 3
Acq On : 28 Apr 2017 13:01 Operator: ADC
Sample : WG612030-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

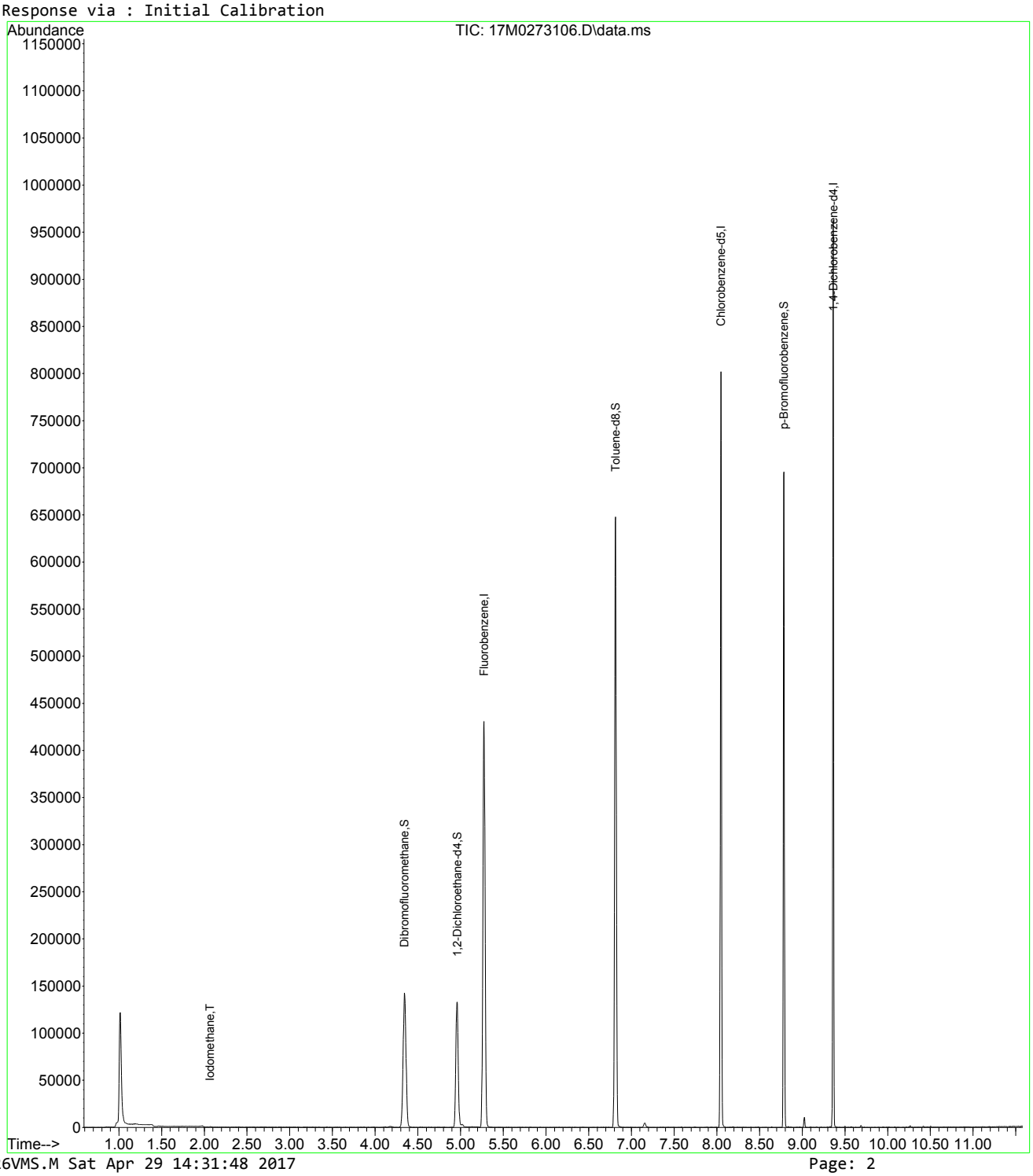
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	372168	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	271660	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129762	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	101128	25.1604	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.642%			
34) 1,2-Dichloroethane-d4	4.959	65	97378	25.8475	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.390%			
47) Toluene-d8	6.815	98	353592	26.0807	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.323%			
66) p-Bromofluorobenzene	8.784	95	117733	27.0976	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.390%			
Target Compounds						Qvalue
13) Iodomethane	2.066	142	463	2.0814	ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

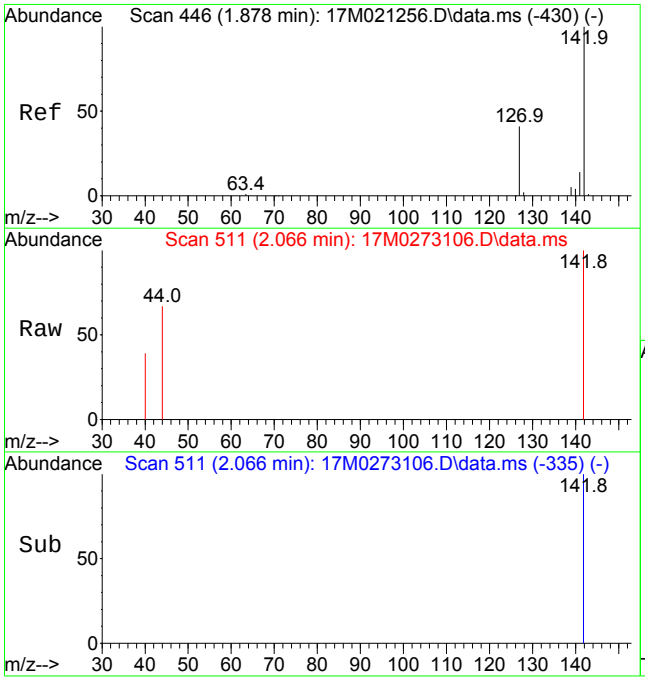
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273106.D Vial: 3
Acq On : 28 Apr 2017 13:01 Operator: ADC
Sample : WG612030-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



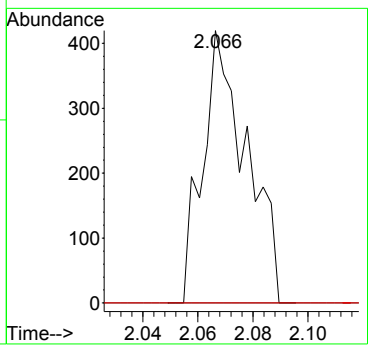
826VMS.M Sat Apr 29 14:31:48 2017 Page: 2



#13
Iodomethane
Concen: 2.0814 ug/L
RT: 2.066 min Scan# 511
Delta R.T. 0.008 min
Lab File: 17M0273106.D
Acq: 28 Apr 2017 13:01

Tgt Ion:142 Resp: 463

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:16:34 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

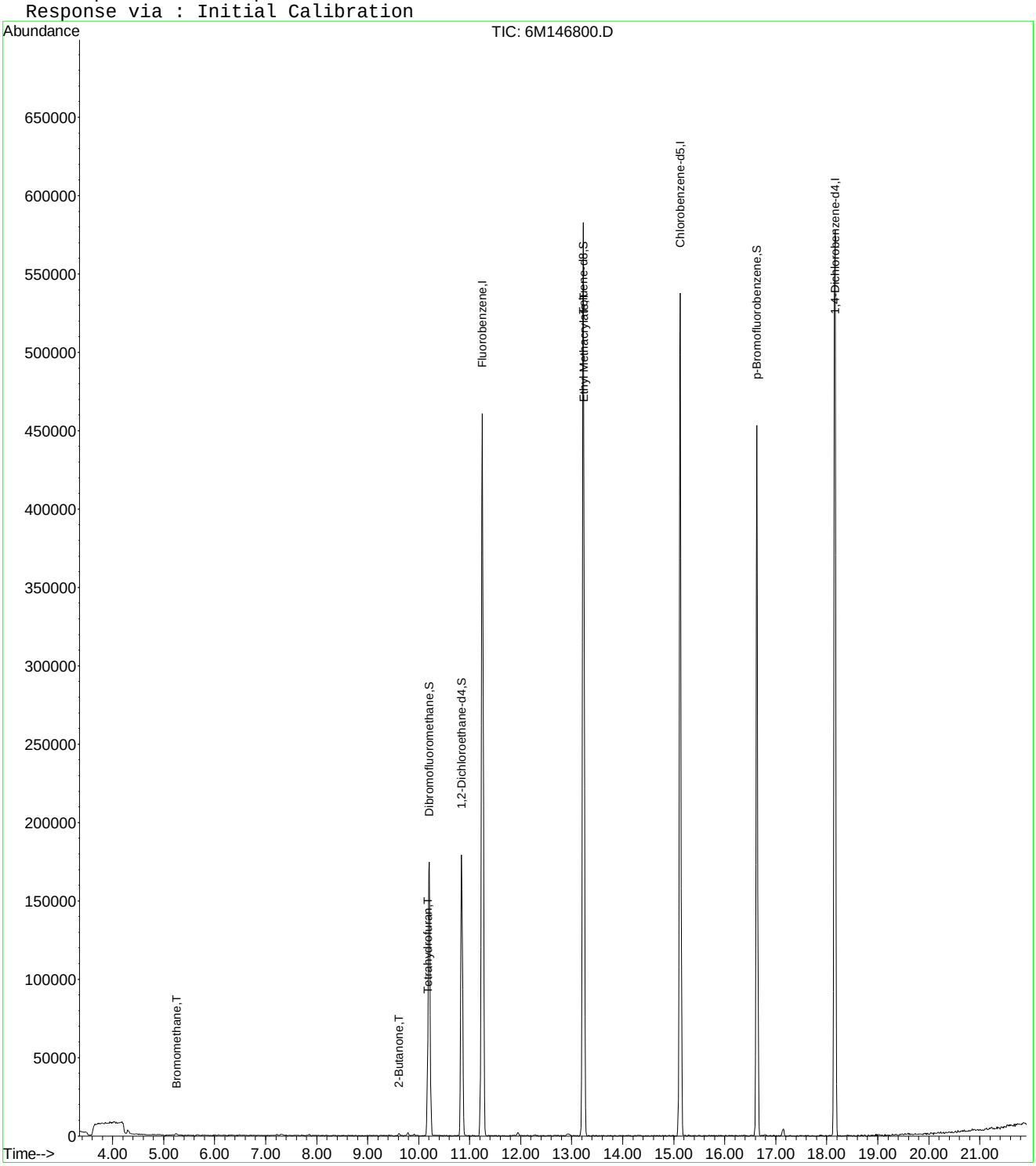
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	587274	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	403127	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	201980	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	153561	25.6145	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.44%			
43) 1,2-Dichloroethane-d4	10.84	65	162056	27.4270	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.72%			
58) Toluene-d8	13.23	98	545120	26.4999	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.00%			
80) p-Bromofluorobenzene	16.63	95	209143	27.2631	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.04%			
Target Compounds						Qvalue
6) Bromomethane	5.25	94	1430	0.3109	ug/L	97
29) 2-Butanone	9.61	43	2496	1.5627	ug/L #	57
36) Tetrahydrofuran	10.18	42	5230	4.9723	ug/L	85
60) Ethyl Methacrylate	13.24	69	828	0.1358	ug/L #	51

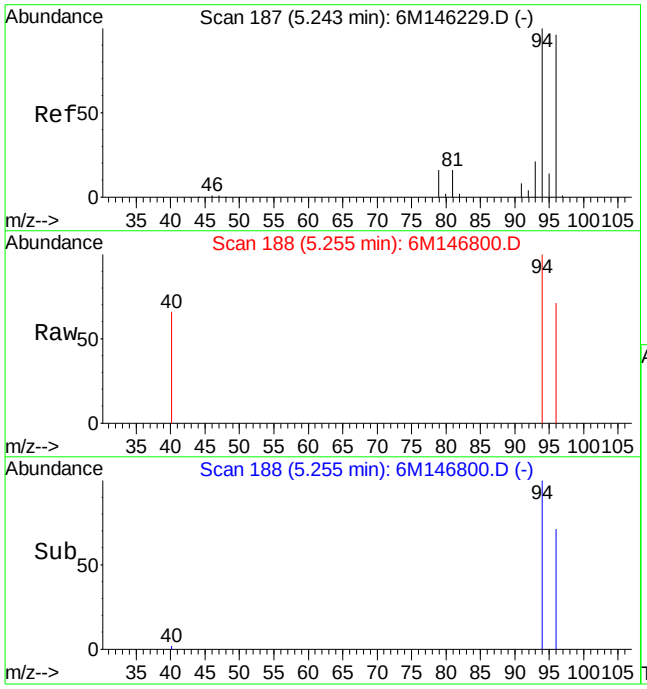
(#) = qualifier out of range (m) = manual integration
6M146800.D 8260BWT.M Sat Apr 29 12:16:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 8:16 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

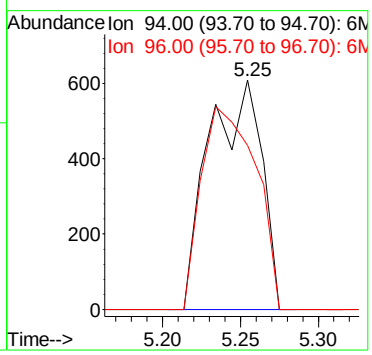


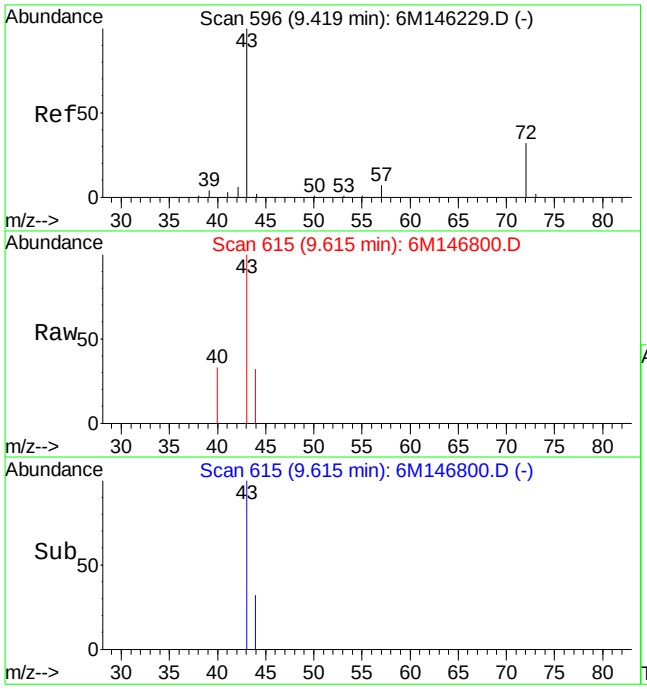


#6
Bromomethane
Concen: 0.31 ug/L
RT: 5.25 min Scan# 188
Delta R.T. 0.04 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 94 Resp: 1430

Ion	Ratio	Lower	Upper
94	100		
96	91.8	56.7	132.3

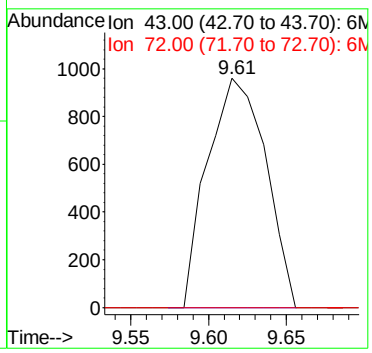


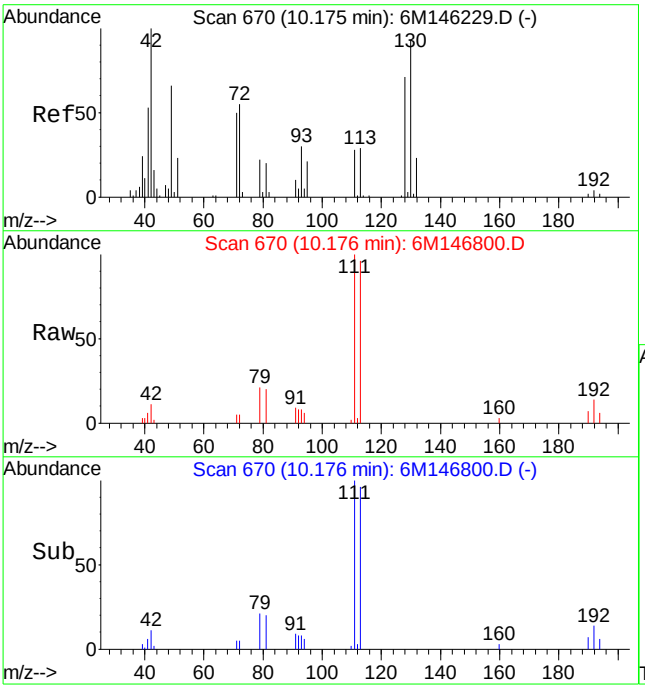


#29
2-Butanone
Concen: 1.56 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 2496

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

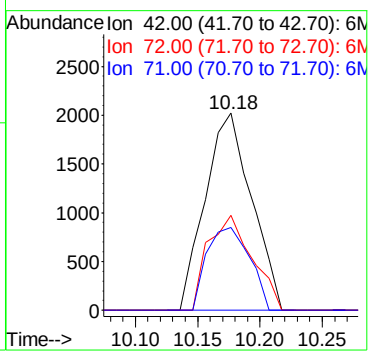


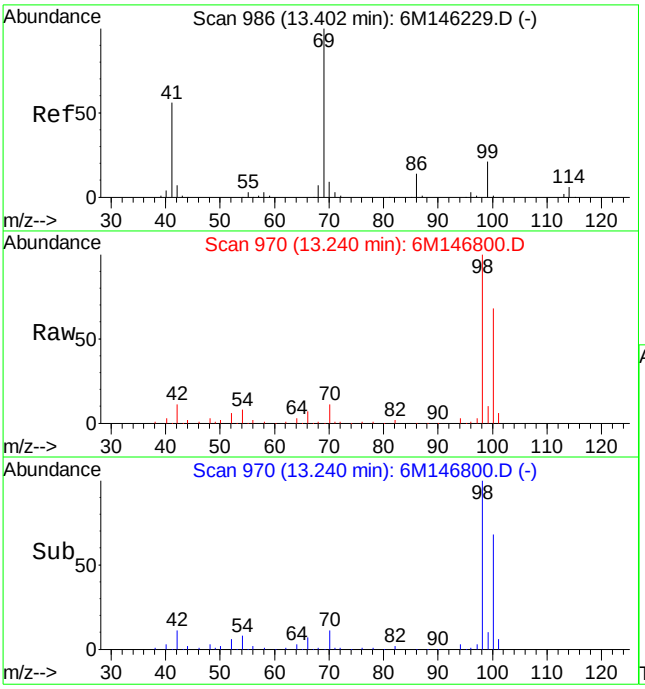


#36
Tetrahydrofuran
Concen: 4.97 ug/L
RT: 10.18 min Scan# 670
Delta R.T. 0.00 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 42 Resp: 5230

Ion	Ratio	Lower	Upper
42	100		
72	45.7	20.8	48.4
71	38.7	19.9	46.5

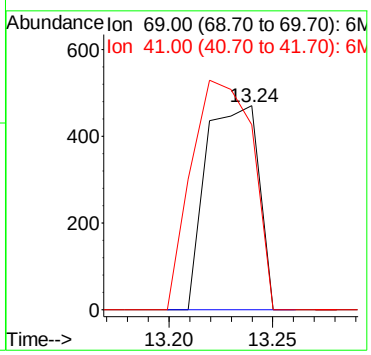




#60
Ethyl Methacrylate
Concen: 0.14 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 69 Resp: 828

Ion	Ratio	Lower	Upper
69	100		
41	130.6	51.4	120.0#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	587274	25.00	ug/L	-0.02
11) Chlorobenzene-d5	15.13	117	403127	25.00	ug/L	-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	201980	25.00	ug/L	-0.02

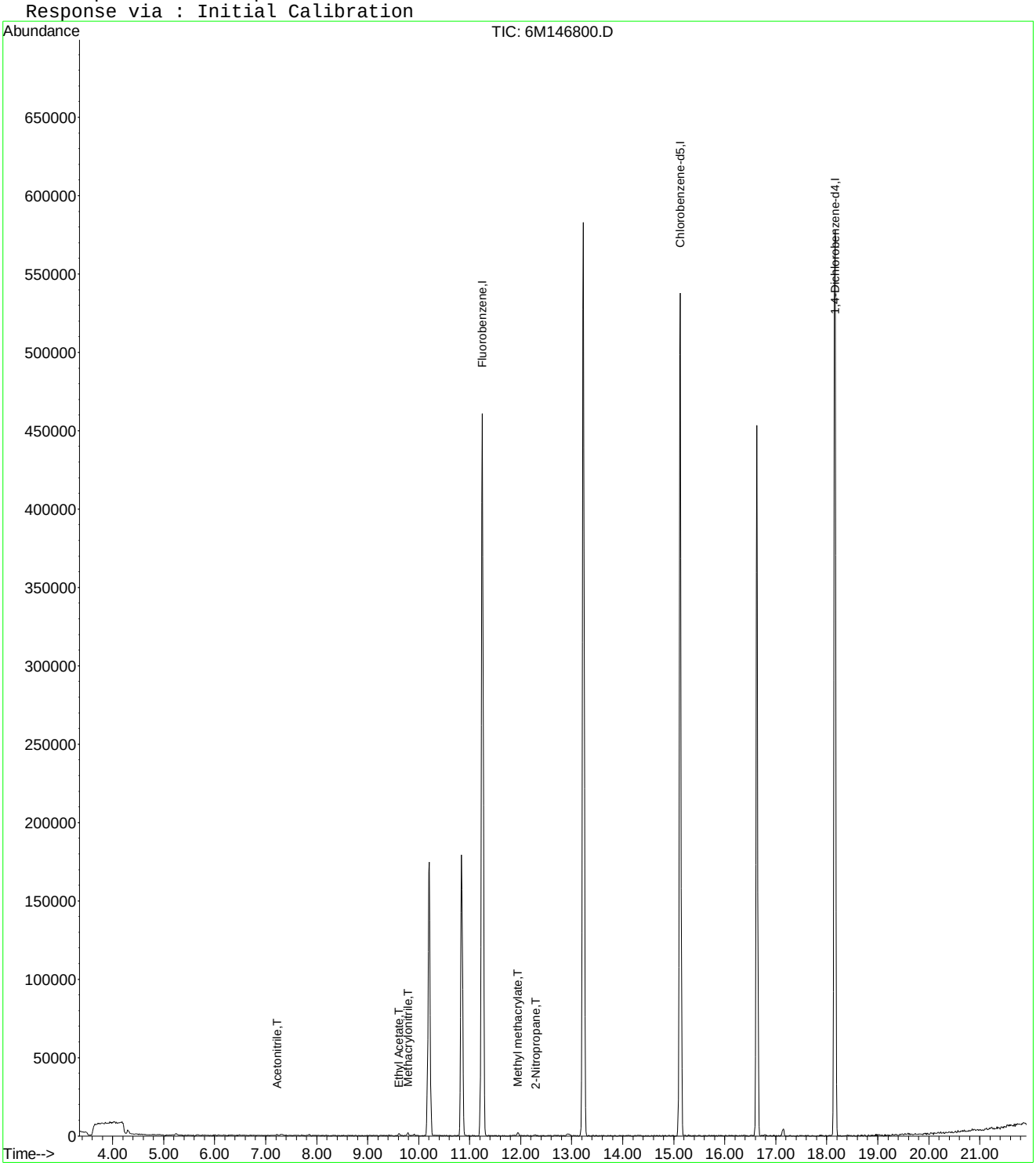
Target Compounds						Qvalue
2) Acetonitrile	7.23	41	733	1.7459	ug/L	# 65
5) Ethyl Acetate	9.61	43	2496	0.6627	ug/L	# 68
6) Methacrylonitrile	9.79	67	703	0.3545	ug/L	# 20
9) Methyl methacrylate	11.94	41	1296	0.3145	ug/L	# 69
10) 2-Nitropropane	12.29	43	404	0.2411	ug/L	# 68

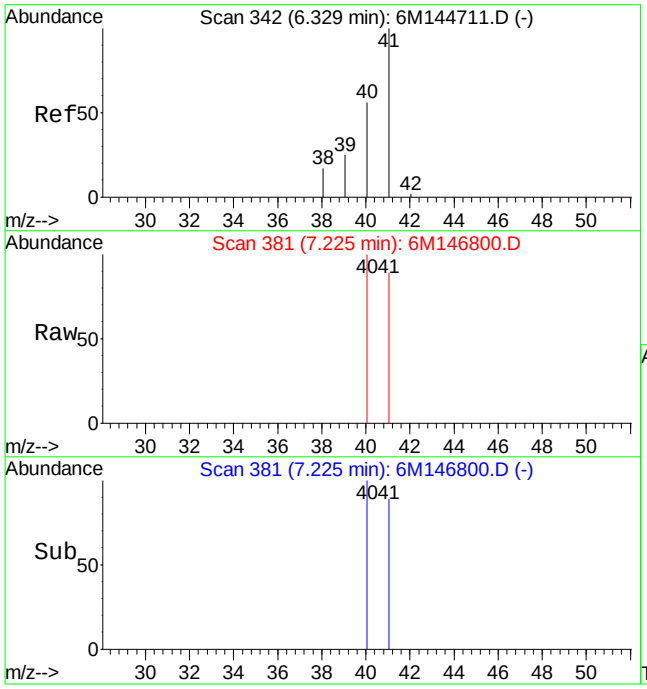
(#) = qualifier out of range (m) = manual integration
6M146800.D A9FOOWT.M Sat Apr 29 13:41:24 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146800.D Vial: 4
Acq On : 28 Apr 2017 7:54 Operator: TMB
Sample : WG611922-01 VBLK0428 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 13:14 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration

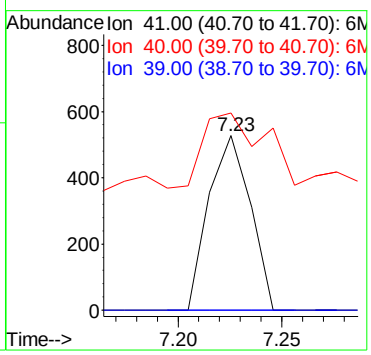


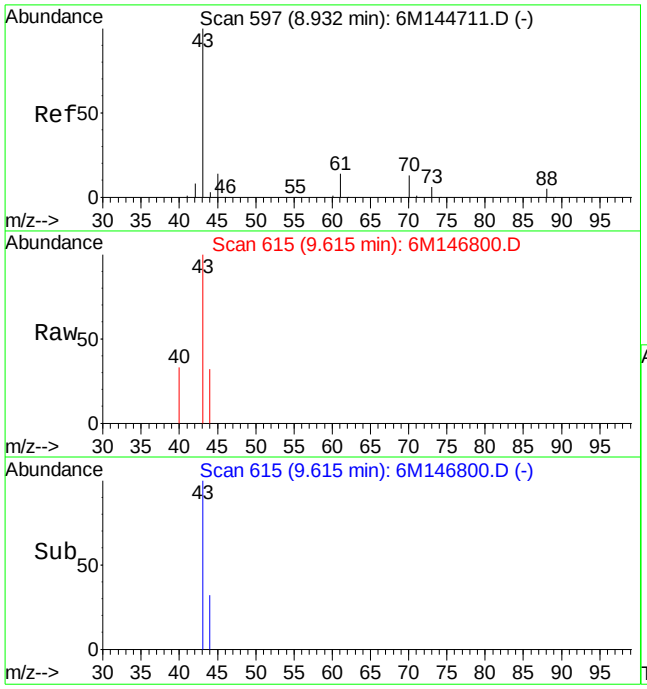


#2
Acetonitrile
Concen: 1.75 ug/L
RT: 7.23 min Scan# 381
Delta R.T. -0.00 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 41 Resp: 733

Ion	Ratio	Lower	Upper
41	100		
40	85.0	19.8	99.8
39	0.0	0.0	57.7

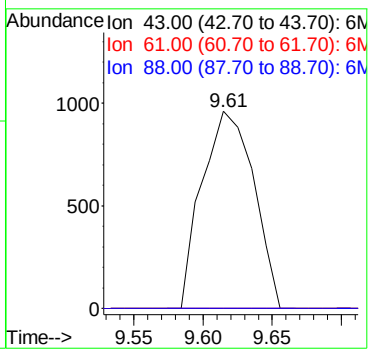


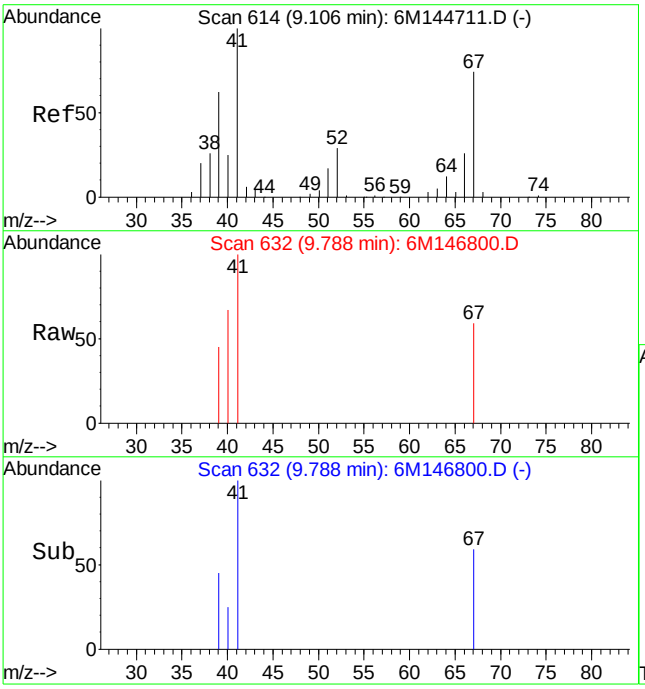


#5
Ethyl Acetate
Concen: 0.66 ug/L
RT: 9.61 min Scan# 615
Delta R.T. -0.02 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 2496

Ion	Ratio	Lower	Upper
43	100		
61	0.0	9.5	22.1#
88	0.0	2.8	6.4#

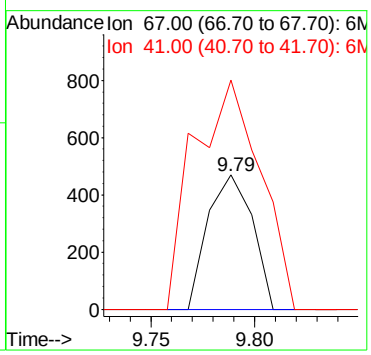


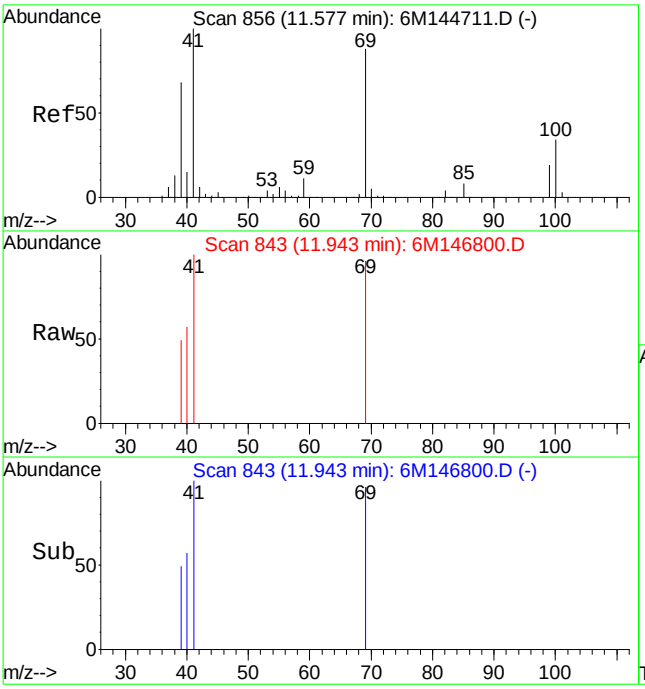


#6
Methacrylonitrile
Concen: 0.35 ug/L
RT: 9.79 min Scan# 632
Delta R.T. -0.01 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 67 Resp: 703

Ion	Ratio	Lower	Upper
67	100		
41	254.1	112.0	192.0#

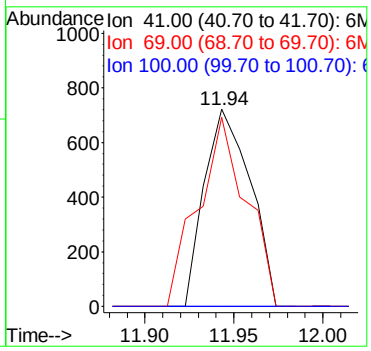


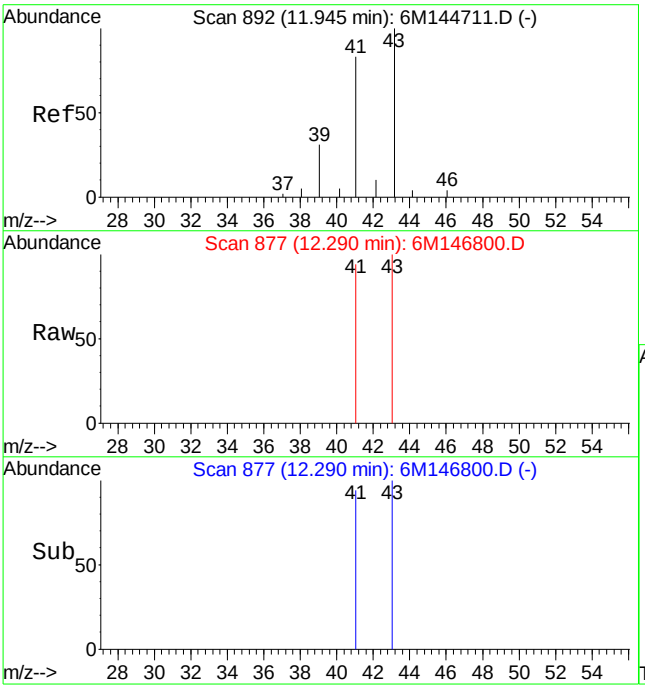


#9
Methyl methacrylate
Concen: 0.31 ug/L
RT: 11.94 min Scan# 843
Delta R.T. -0.02 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 41 Resp: 1296

Ion	Ratio	Lower	Upper
41	100		
69	100.8	42.7	122.7
100	0.0	0.0	73.7

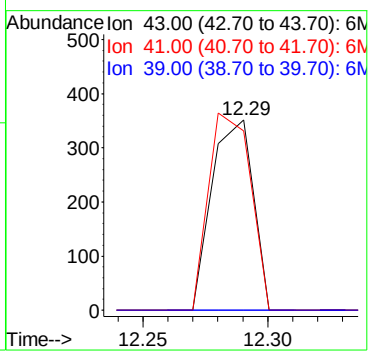




#10
2-Nitropropane
Concen: 0.24 ug/L
RT: 12.29 min Scan# 877
Delta R.T. -0.01 min
Lab File: 6M146800.D
Acq: 28 Apr 2017 7:54

Tgt Ion: 43 Resp: 404

Ion	Ratio	Lower	Upper
43	100		
41	105.4	50.0	116.8
39	0.0	16.6	38.8#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419226.D Vial: 4
Acq On : 28 Apr 2017 9:02 Operator: TMB
Sample : WG611929-01 VBLK0428 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 09:24:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

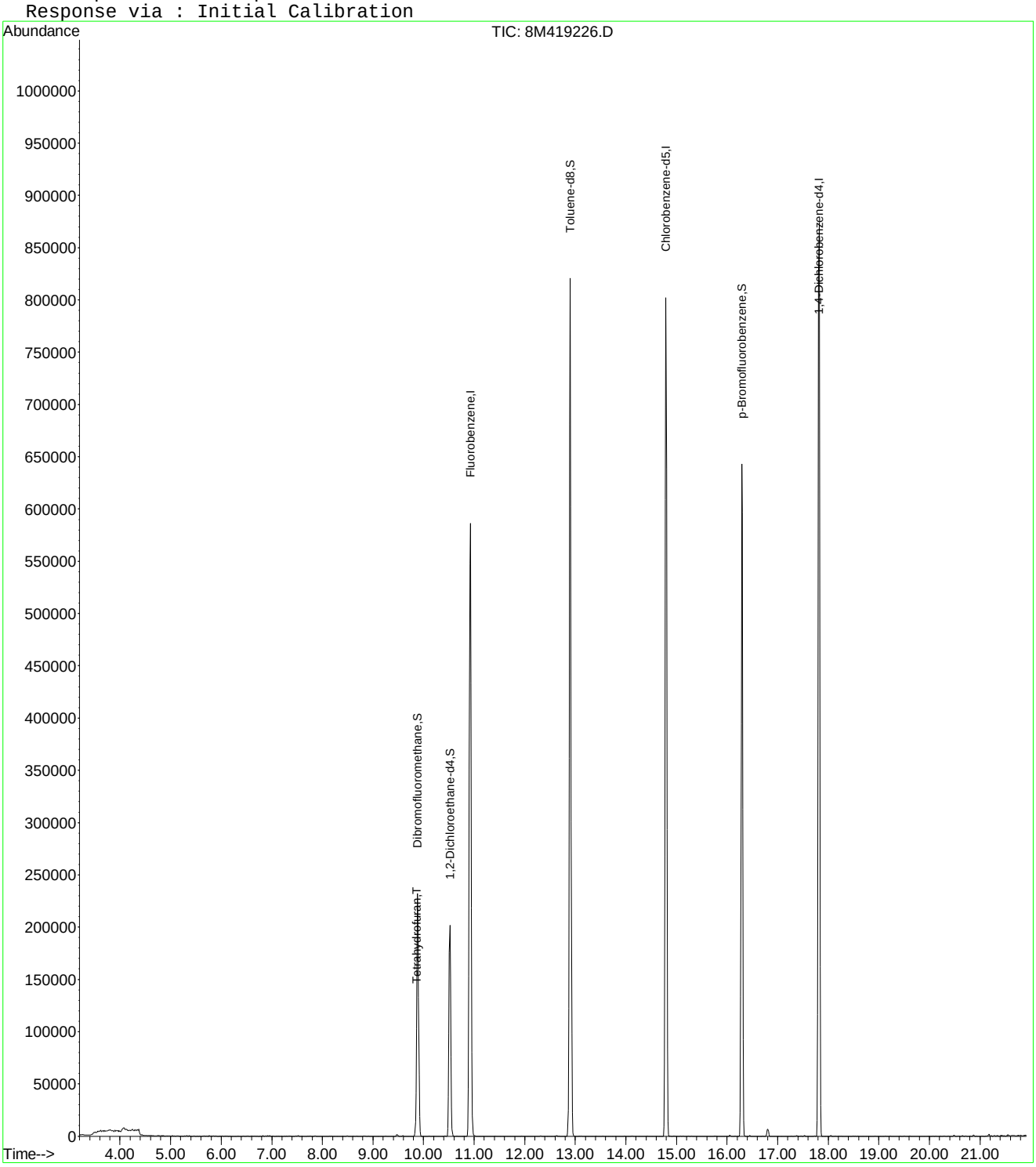
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	724893	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	586669	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	299428	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	193784	25.4869	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.96%			
43) 1,2-Dichloroethane-d4	10.52	65	171515	26.0936	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.36%			
58) Toluene-d8	12.90	98	717743	26.7755	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.12%			
80) p-Bromofluorobenzene	16.29	95	280871	26.5782	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.32%			
Target Compounds						Qvalue
36) Tetrahydrofuran	9.86	42	3809	3.4609	ug/L #	70

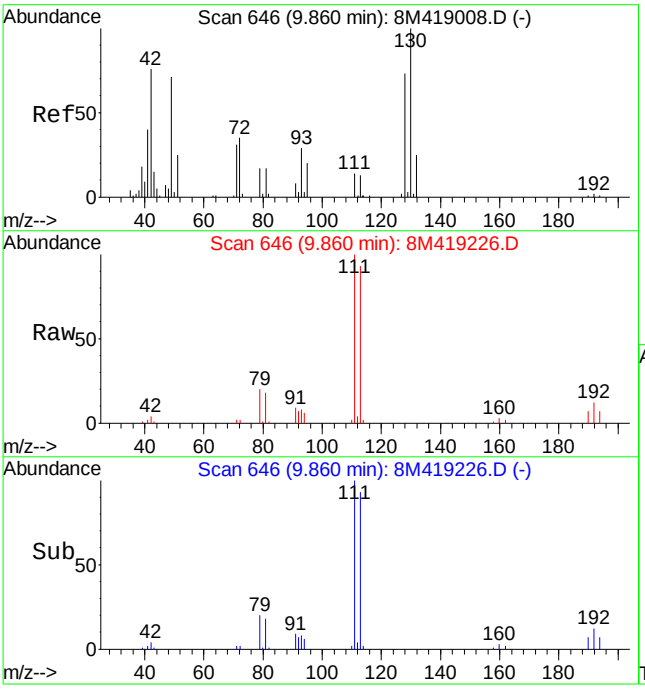
(#) = qualifier out of range (m) = manual integration
8M419226.D 8260WT.M Mon May 01 08:30:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419226.D Vial: 4
Acq On : 28 Apr 2017 9:02 Operator: TMB
Sample : WG611929-01 VBLK0428 BLANK STD 8260 Inst : HPMS8
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 9:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration

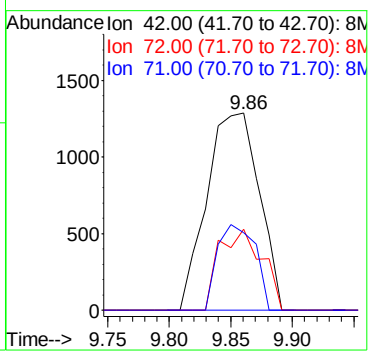




#36
Tetrahydrofuran
Concen: 3.46 ug/L
RT: 9.86 min Scan# 646
Delta R.T. -0.00 min
Lab File: 8M419226.D
Acq: 28 Apr 2017 9:02

Tgt Ion: 42 Resp: 3809

Ion	Ratio	Lower	Upper
42	100		
72	33.6	32.9	76.9
71	31.3	32.1	74.9#



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17831.D Vial: 4
Acq On : 28 Apr 2017 8:56 Operator: TMB
Sample : WG611925-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 09:18:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	334861	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	242025	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	138352	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	85962	25.9165	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.68%			
43) 1,2-Dichloroethane-d4	10.14	65	101820	26.4527	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.80%			
57) Toluene-d8	12.38	98	337673	26.8697	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.48%			
78) p-Bromofluorobenzene	15.54	95	122336	25.4403	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	103250	25.2404	ug/L	99
3) Chloromethane	3.66	50	81410	19.7972	ug/L	96
4) Vinyl Chloride	3.89	62	60060	20.8977	ug/L	99
5) 1,3-Butadiene	3.93	54	41599	24.8806	ug/L	95
6) Bromomethane	4.77	94	63306	21.3330	ug/L	99
7) Chloroethane	4.92	64	68805	23.1116	ug/L	96
8) Trichlorofluoromethane	5.41	101	110220	21.9517	ug/L	100
9) Diethyl ether	5.92	59	345907	93.0935	ug/L	99
10) Isoprene	5.96	67	100719	19.3626	ug/L	100
11) Acrolein	6.15	56	52513	88.8524	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	68563	23.0574	ug/L	97
13) Acetone	6.26	43	20968	18.7274	ug/L	94
14) 1,1-Dichloroethene	6.47	61	123620	20.6715	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	84452	201.6617	ug/L	99
16) Dimethyl Sulfide	6.73	62	92493	19.6878	ug/L	97
17) Iodomethane	6.98	142	65033	16.6748	ug/L	99
18) Methyl acetate	6.99	43	63935	18.1052	ug/L	98
19) Methylene Chloride	7.23	84	77890	19.5210	ug/L	95
20) Carbon Disulfide	7.27	76	150113	14.6810	ug/L	99
21) Acrylonitrile	7.40	53	31794	19.2262	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	198463	19.8624	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	71917	19.7619	ug/L	97
24) n-Hexane	7.73	57	106062	18.7911	ug/L	98
25) Diisopropyl ether	8.07	45	1484651	102.0304	ug/L	99
26) Vinyl Acetate	8.23	43	168540	24.8129	ug/L	99
27) 1,1-Dichloroethane	8.26	63	154637	20.1601	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1219433	94.8096	ug/L	98
29) 2-Butanone	8.79	43	36931	20.1866	ug/L	94
30) Propionitrile	8.89	54	60336	98.8598	ug/L	98
31) 2,2-Dichloropropane	9.01	77	103933	20.0176	ug/L	98
32) cis-1,2-Dichloroethene	9.06	96	83143	20.3597	ug/L	98
33) Chloroform	9.26	83	131289	21.4498	ug/L	100
34) 1-Bromopropane	9.39	122	19587	24.1960	ug/L	96
35) Bromochloromethane	9.48	130	51441	20.5442	ug/L	97
36) Tetrahydrofuran	9.50	42	132777	89.1019	ug/L	99
38) 1,1,1-Trichloroethane	9.77	97	116862	21.6064	ug/L	98
39) Cyclohexane	9.79	56	136705	17.9752	ug/L	98
40) 1,1-Dichloropropene	9.95	75	99729	21.0384	ug/L	97
41) Carbon Tetrachloride	10.09	117	100786	21.5445	ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	1009898	97.3323	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17831.D 8260WT.M Fri Apr 28 09:18:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17831.D Vial: 4
Acq On : 28 Apr 2017 8:56 Operator: TMB
Sample : WG611925-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 09:18:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

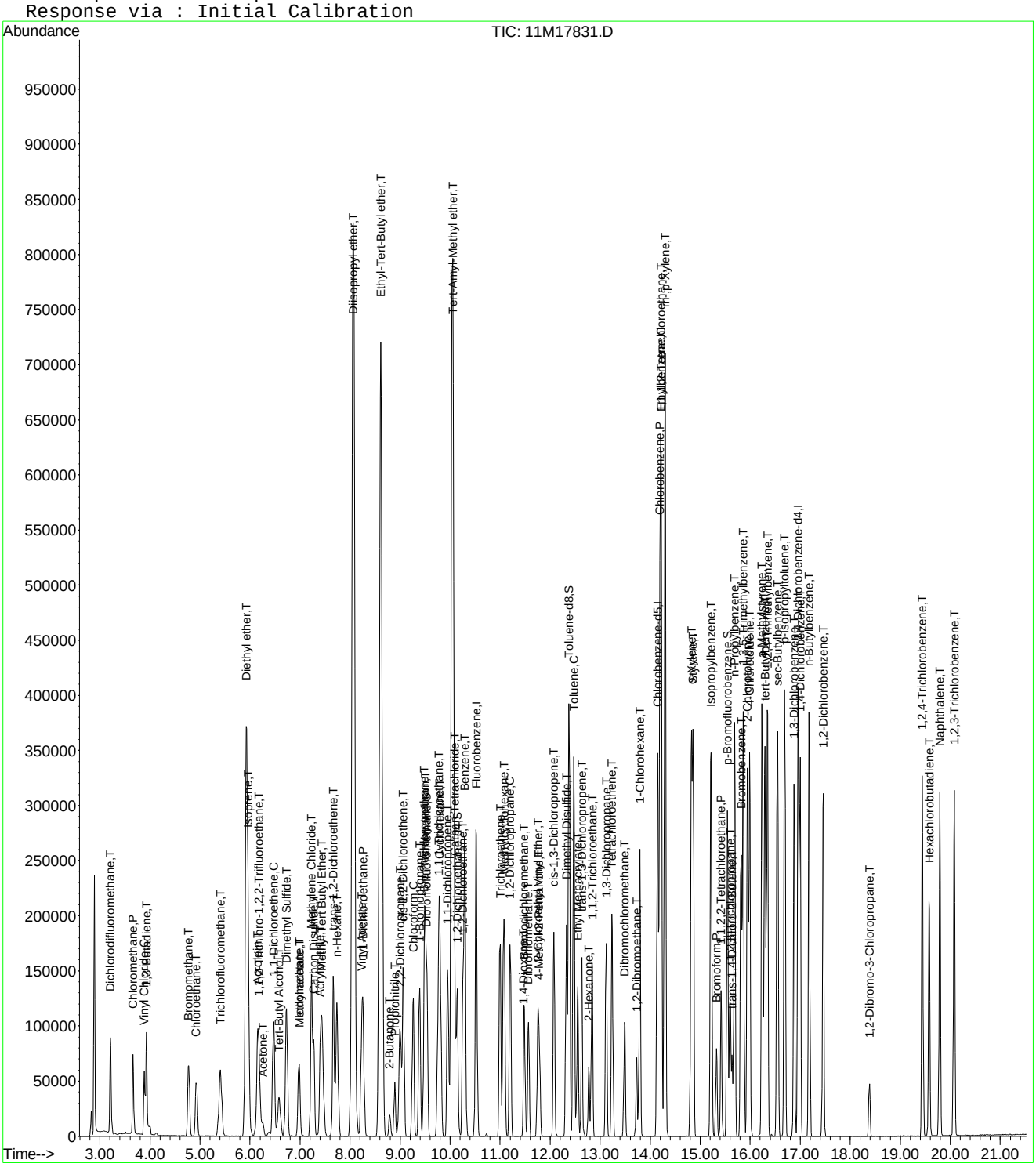
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	106454	20.3371	ug/L	99
45)	Benzene	10.29	78	303607	20.6740	ug/L	97
46)	Trichloroethene	11.00	130	76993	20.0015	ug/L	98
47)	Methylcyclohexane	11.07	83	112975	19.1427	ug/L	98
48)	1,2-Dichloropropane	11.20	63	91783	20.0815	ug/L	99
49)	1,4-Dioxane	11.47	88	8315	201.4601	ug/L	89
50)	Bromodichloromethane	11.48	83	94893	19.9004	ug/L	100
51)	Dibromomethane	11.56	93	44045	20.3719	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	52819	21.1522	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	31324	19.4804	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	122959	21.7335	ug/L	99
55)	Dimethyl Disulfide	12.33	79	66571	18.8522	ug/L	95
58)	Toluene	12.47	91	315898	20.1597	ug/L	96
59)	Ethyl Methacrylate	12.55	69	90814	21.0867	ug/L	98
60)	trans-1,3-Dichloropropene	12.64	75	102179	20.6570	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	65122	19.7011	ug/L	99
62)	2-Hexanone	12.77	43	58169	21.1817	ug/L	98
63)	1,3-Dichloropropane	13.12	76	114413	20.8403	ug/L	99
64)	Tetrachloroethene	13.23	164	66631	21.4212	ug/L	99
65)	Dibromochloromethane	13.48	129	72006	19.5393	ug/L	99
66)	1,2-Dibromoethane	13.73	107	59917	20.1639	ug/L	99
67)	1-Chlorohexane	13.79	91	98317	22.0169	ug/L	99
68)	Chlorobenzene	14.20	112	201013	20.1722	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	71680	19.3211	ug/L	97
70)	Ethylbenzene	14.22	106	111433	21.1466	ug/L	89
71)	m-,p-Xylene	14.30	106	267774	42.4691	ug/L	90
72)	o-Xylene	14.83	106	131731	20.7352	ug/L	93
73)	Styrene	14.86	104	216023	22.9417	ug/L	99
74)	Bromoform	15.32	173	49184	18.6256	ug/L	99
75)	Isopropylbenzene	15.22	105	328779	21.2136	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	87997	20.2318	ug/L	97
79)	1,2,3-Trichloropropane	15.60	110	24916	20.0059	ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	21987	16.3273	ug/L	92
81)	n-Propylbenzene	15.69	91	391655	20.1977	ug/L	95
82)	Bromobenzene	15.82	156	94311	19.9853	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	279127	21.0408	ug/L	96
84)	2-Chlorotoluene	15.94	91	246186	18.6993	ug/L	87
85)	4-Chlorotoluene	15.99	91	241214	20.2994	ug/L	89
86)	a-Methylstyrene	16.23	118	159342	21.7933	ug/L	98
87)	tert-Butylbenzene	16.30	134	64482	19.9923	ug/L	97
88)	1,2,4-Trimethylbenzene	16.35	105	291626	21.0190	ug/L	96
89)	sec-Butylbenzene	16.54	105	356139	20.3272	ug/L	97
90)	p-Isopropyltoluene	16.69	119	306511	21.7721	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	172416	20.5397	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	176594	19.5610	ug/L	98
93)	n-Butylbenzene	17.17	91	277759	22.1208	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	177471	20.9516	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	15088	19.7708	ug/L	94
96)	1,2,4-Trichlorobenzene	19.44	180	132994	21.8694	ug/L	99
97)	Hexachlorobutadiene	19.58	225	65459	20.2953	ug/L	99
98)	Naphthalene	19.79	128	301093	22.1994	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	131682	21.1656	ug/L	98

(#) = qualifier out of range (m) = manual integration
11M17831.D 8260WT.M Fri Apr 28 09:18:03 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042817\11M17831.D Vial: 4
Acq On : 28 Apr 2017 8:56 Operator: TMB
Sample : WG611925-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 28 9:18 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	355789	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	255038	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	143146	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	90834	25.7746	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.08%			
43) 1,2-Dichloroethane-d4	10.14	65	106893	26.1371	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.56%			
57) Toluene-d8	12.38	98	348435	26.3114	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.24%			
78) p-Bromofluorobenzene	15.54	95	129219	25.9717	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	100258	23.0850	ug/L	99
3) Chloromethane	3.66	50	78100	17.8015	ug/L	98
4) Vinyl Chloride	3.88	62	63200	20.6967	ug/L	98
5) 1,3-Butadiene	3.93	54	43411	24.4089	ug/L	98
6) Bromomethane	4.77	94	63617	20.1768	ug/L	98
7) Chloroethane	4.92	64	69051	21.8300	ug/L	99
8) Trichlorofluoromethane	5.41	101	112298	21.0500	ug/L	99
9) Diethyl ether	5.92	59	377474	95.6135	ug/L	97
10) Isoprene	5.96	67	102959	18.6289	ug/L	99
11) Acrolein	6.15	56	71039	113.1283	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	67912	21.4951	ug/L	97
13) Acetone	6.26	43	22499	18.9128	ug/L	94
14) 1,1-Dichloroethene	6.47	61	124824	19.6451	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	81266	182.6393	ug/L	98
16) Dimethyl Sulfide	6.72	62	96108	19.2540	ug/L	98
17) Iodomethane	6.97	142	63409	15.4016	ug/L	100
18) Methyl acetate	6.98	43	72369	19.2881	ug/L	97
19) Methylene Chloride	7.23	84	79132	18.6657	ug/L	92
20) Carbon Disulfide	7.27	76	153765	14.1536	ug/L	99
21) Acrylonitrile	7.40	53	33040	18.8045	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	201513	18.9814	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	72002	18.6214	ug/L	93
24) n-Hexane	7.73	57	102629	17.1134	ug/L	98
25) Diisopropyl ether	8.06	45	1612128	104.2742	ug/L	98
26) Vinyl Acetate	8.23	43	119078	16.4998	ug/L	99
27) 1,1-Dichloroethane	8.26	63	159412	19.5601	ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1306151	95.5784	ug/L	97
29) 2-Butanone	8.79	43	37585	19.3356	ug/L	97
30) Propionitrile	8.89	54	63554	98.0072	ug/L	100
31) 2,2-Dichloropropane	9.01	77	93890	17.0197	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	84785	19.5405	ug/L	99
33) Chloroform	9.26	83	133714	20.5529	ug/L	100
34) 1-Bromopropane	9.39	122	20024	23.2944	ug/L	96
35) Bromochloromethane	9.48	130	51233	19.2576	ug/L	93
36) Tetrahydrofuran	9.50	42	145624	91.9749	ug/L	97
38) 1,1,1-Trichloroethane	9.76	97	118385	20.6005	ug/L	99
39) Cyclohexane	9.79	56	138998	17.2016	ug/L	98
40) 1,1-Dichloropropene	9.95	75	97992	19.4560	ug/L	99
41) Carbon Tetrachloride	10.09	117	101391	20.3989	ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	1071343	97.1807	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17872.D 8260WT.M Sat Apr 29 20:46:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

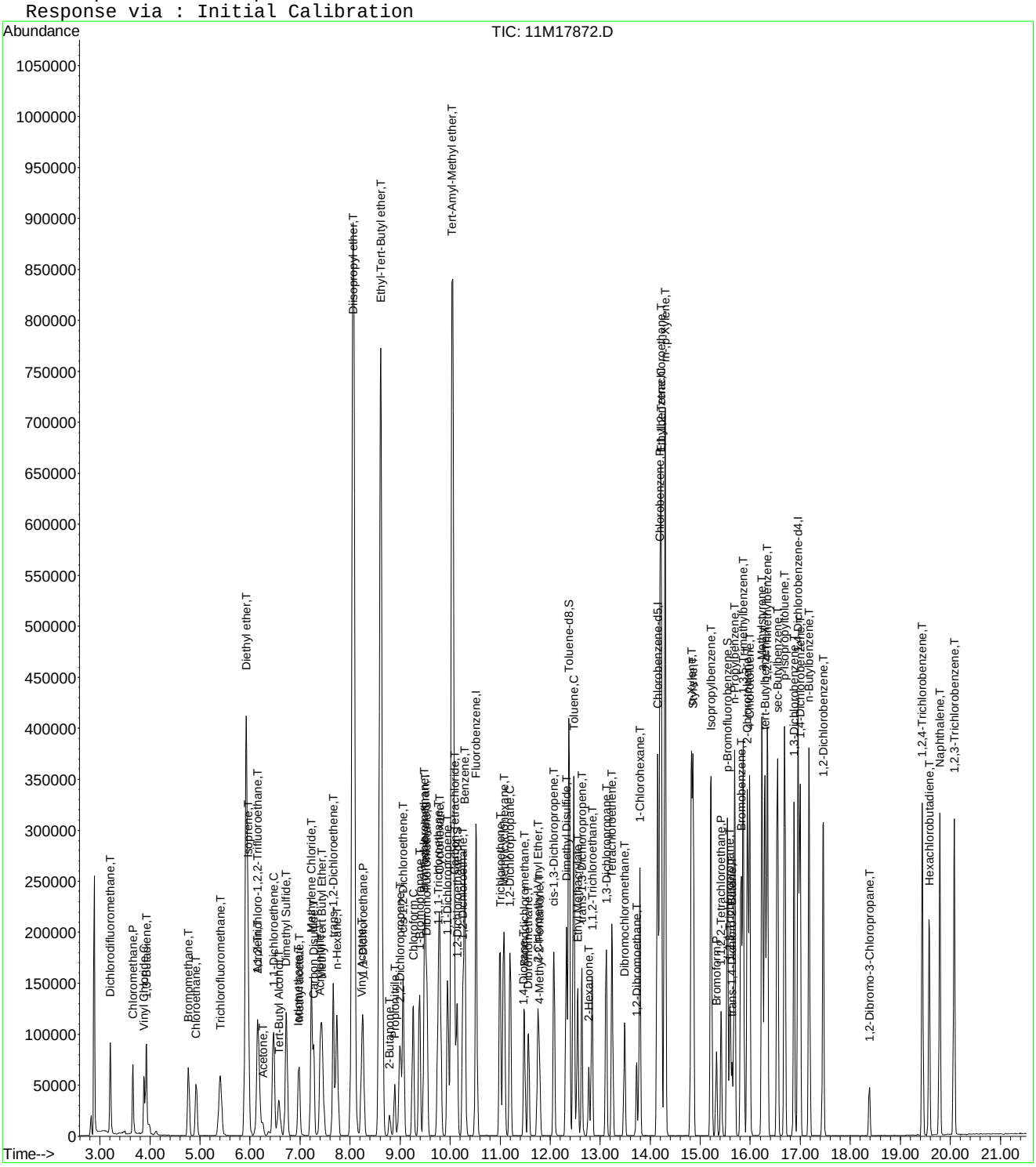
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	110027	19.7833	ug/L	99
45)	Benzene	10.29	78	304649	19.5247	ug/L	97
46)	Trichloroethene	11.00	130	77816	19.0262	ug/L	98
47)	Methylcyclohexane	11.07	83	114907	18.3248	ug/L	97
48)	1,2-Dichloropropane	11.20	63	94758	19.5129	ug/L	100
49)	1,4-Dioxane	11.47	88	7714	175.9051	ug/L	96
50)	Bromodichloromethane	11.49	83	97671	19.2781	ug/L	99
51)	Dibromomethane	11.56	93	45746	19.9141	ug/L	96
52)	2-Chloroethyl Vinyl Ether	11.76	63	55752	21.0135	ug/L	96
53)	4-Methyl-2-Pentanone	11.79	58	31638	18.5184	ug/L	97
54)	cis-1,3-Dichloropropene	12.08	75	123539	20.5516	ug/L	98
55)	Dimethyl Disulfide	12.32	79	69298	18.4701	ug/L	93
58)	Toluene	12.47	91	317224	19.2114	ug/L	97
59)	Ethyl Methacrylate	12.55	69	94980	20.9288	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	102510	19.6665	ug/L	98
61)	1,1,2-Trichloroethane	12.84	97	65002	18.6614	ug/L	98
62)	2-Hexanone	12.77	43	61444	21.2326	ug/L	96
63)	1,3-Dichloropropane	13.12	76	118460	20.4765	ug/L	97
64)	Tetrachloroethene	13.23	164	66863	20.3990	ug/L	100
65)	Dibromochloromethane	13.48	129	75136	19.3483	ug/L	99
66)	1,2-Dibromoethane	13.73	107	60134	19.2043	ug/L	100
67)	1-Chlorohexane	13.79	91	97291	20.6755	ug/L	96
68)	Chlorobenzene	14.20	112	204338	19.4596	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	73648	18.8386	ug/L	99
70)	Ethylbenzene	14.22	106	111484	20.0768	ug/L	85
71)	m-,p-Xylene	14.30	106	269991	40.6358	ug/L	89
72)	o-Xylene	14.83	106	133005	19.8675	ug/L	92
73)	Styrene	14.86	104	220340	22.2062	ug/L	98
74)	Bromoform	15.32	173	50521	18.1558	ug/L	98
75)	Isopropylbenzene	15.22	105	327159	20.0320	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	81150	18.0327	ug/L	100
79)	1,2,3-Trichloropropane	15.59	110	25379	19.6953	ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	21952	15.7554	ug/L	92
81)	n-Propylbenzene	15.69	91	392754	19.5761	ug/L	96
82)	Bromobenzene	15.82	156	95355	19.5298	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	281777	20.5292	ug/L	96
84)	2-Chlorotoluene	15.94	91	251647	18.4739	ug/L	86
85)	4-Chlorotoluene	15.99	91	242577	19.7304	ug/L	90
86)	a-Methylstyrene	16.23	118	160476	21.2133	ug/L	98
87)	tert-Butylbenzene	16.30	134	64162	19.2269	ug/L	96
88)	1,2,4-Trimethylbenzene	16.34	105	293274	20.4299	ug/L	95
89)	sec-Butylbenzene	16.54	105	352893	19.4673	ug/L	96
90)	p-Isopropyltoluene	16.69	119	308603	21.1866	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	174332	20.0724	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	174290	18.6593	ug/L	100
93)	n-Butylbenzene	17.17	91	278422	21.4310	ug/L	95
94)	1,2-Dichlorobenzene	17.46	146	173192	19.7617	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	15217	19.2720	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	134122	21.3163	ug/L	97
97)	Hexachlorobutadiene	19.58	225	63864	19.1377	ug/L	98
98)	Naphthalene	19.79	128	297018	21.1655	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	130077	20.2074	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17872.D 8260WT.M Sat Apr 29 20:46:31 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	372242	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	276134	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	138671	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	102790	25.5688 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.275%		
34) 1,2-Dichloroethane-d4	4.962	65	97919	25.9860 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.944%		
47) Toluene-d8	6.815	98	358005	25.9784 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.914%		
66) p-Bromofluorobenzene	8.784	95	122508	26.3851 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.540%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	1.105	85	115030	26.0197 ug/L	100
3) Chloromethane	1.224	50	89330	20.6472 ug/L	100
4) Vinyl Chloride	1.270	62	112886	23.5630 ug/L	99
5) 1,3-Butadiene	1.279	54	97040	32.9898 ug/L	98
6) Bromomethane	1.461	94	61505	17.2677 ug/L	99
7) Chloroethane	1.537	64	47562	20.9270 ug/L	97
8) Trichlorofluoromethane	1.623	101	132487	21.5594 ug/L	99
9) Diethyl ether	1.844	59	183867	62.0448 ug/L	98
10) 1,1-Dichloroethene	1.965	61	115209	20.0366 ug/L	98
11) Carbon Disulfide	1.980	76	203000	16.4494 ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	80053	21.8379 ug/L	98
13) Iodomethane	2.066	142	109216	20.9084 ug/L	99
14) Acrolein	2.226	56	27153	74.1761 ug/L	99
15) Methylene Chloride	2.408	84	83079	19.0415 ug/L	98
16) Acetone	2.469	43	11488	15.3491 ug/L	95
17) trans-1,2-Dichloroethene	2.538	96	75742	19.3458 ug/L	98
18) Methyl acetate	2.573	43	36576	18.6407 ug/L #	100
19) Methyl Tert Butyl Ether	2.657	73	192483	19.3721 ug/L #	53
20) 1,1-Dichloroethane	3.120	63	141490	20.1207 ug/L	100
21) Acrylonitrile	3.190	53	17909	18.7600 ug/L	100
22) Vinyl Acetate	2.617	86	12779	20.2802 ug/L	97
23) cis-1,2-Dichloroethene	3.734	96	86607	19.5425 ug/L	99
24) 2,2-Dichloropropane	3.867	77	117051	21.1695 ug/L	98
25) Cyclohexane	3.969	56	107338	17.9461 ug/L #	88
26) Bromochloromethane	3.986	130	57486	20.1326 ug/L	100
27) Chloroform	4.116	83	147060	20.0583 ug/L	99
28) Carbon Tetrachloride	4.252	117	117263	20.2258 ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	132040	20.4845 ug/L	99
31) 1,1-Dichloropropene	4.507	75	100562	19.8650 ug/L	99
32) 2-Butanone	4.536	43	19009	17.0359 ug/L	98
33) Benzene	4.800	78	311380	19.6382 ug/L	99
35) 1,2-Dichloroethane	5.037	62	95900	19.4242 ug/L	99
36) Methylcyclohexane	5.425	83	117058	18.6797 ug/L	99
37) Trichloroethene	5.451	130	87331	18.3373 ug/L	98
38) Dibromomethane	5.862	93	48086	19.8009 ug/L	100
39) 1,2-Dichloropropane	5.966	63	81390	19.5739 ug/L	100
40) Bromodichloromethane	6.050	83	106987	19.2774 ug/L	100
41) 1,4-Dioxane	6.262	88	1257	60.6933 ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.630	63	36557	19.3829 ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	131620	21.0458 ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19445	18.8215 ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	105251	19.7962 ug/L	99
48) Toluene	6.858	91	343748	19.8556 ug/L	99
49) Tetrachloroethene	7.185	166	96627	19.5686 ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	64747	19.2953 ug/L	99
51) Dibromochloromethane	7.507	129	87312	19.0628 ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

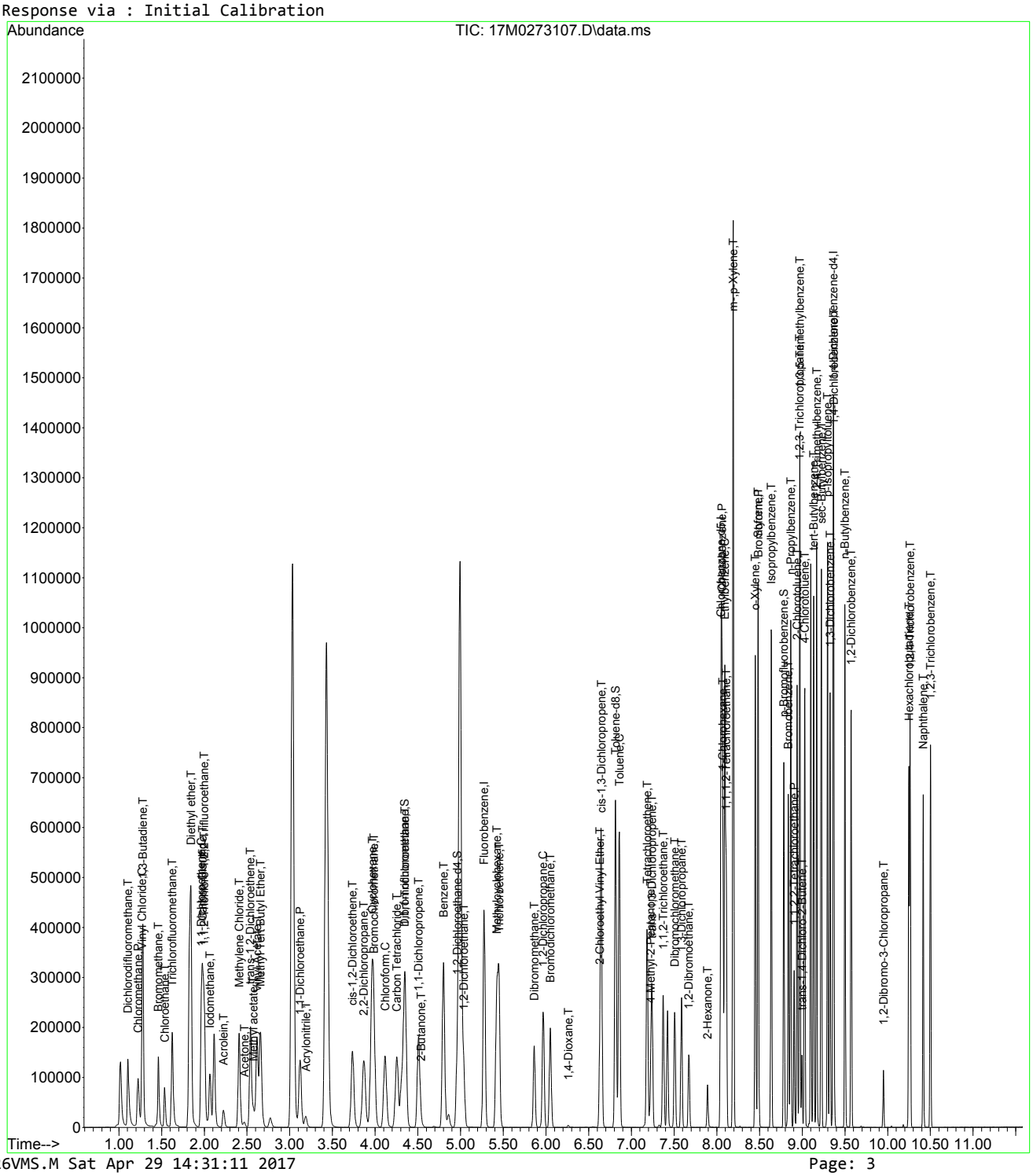
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	107884	20.2295	ug/L		99
53) 1,2-Dibromoethane	7.672	107	65753	19.1254	ug/L		100
54) 2-Hexanone	7.892	43	33529	19.0273	ug/L		99
55) Chlorobenzene	8.060	112	221900	19.1027	ug/L		98
56) 1-Chlorohexane	8.071	69	19494	20.7861	ug/L		98
57) Ethylbenzene	8.095	106	118953	19.6724	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.109	131	85234	18.8495	ug/L		98
59) m-,p-Xylene	8.193	106	288282	39.5039	ug/L		98
60) o-Xylene	8.451	106	139340	19.3791	ug/L		99
61) Styrene	8.483	104	229413	19.9407	ug/L		99
62) Bromoform	8.485	173	62073	19.2656	ug/L		100
63) Isopropylbenzene	8.636	105	359008	19.2897	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	306580	19.8319	ug/L		99
67) Bromobenzene	8.836	156	103205	18.9201	ug/L		99
68) n-Propylbenzene	8.865	91	407450	19.8972	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	78479	21.0392	ug/L		100
70) 2-Chlorotoluene	8.940	91	243883	19.2951	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	21151	19.1809	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.998	53	13863	16.8644	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.169	105	311723	19.9973	ug/L		99
74) 4-Chlorotoluene	9.030	91	252763	20.0306	ug/L		99
75) tert-Butylbenzene	9.134	134	60611	19.6181	ug/L		98
76) sec-Butylbenzene	9.224	105	380261	19.9667	ug/L		99
77) p-Isopropyltoluene	9.296	119	327254	20.1576	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	182319	19.1728	ug/L		100
79) 1,4-Dichlorobenzene	9.369	146	182093	18.9671	ug/L		100
80) n-Butylbenzene	9.499	91	281662	20.5557	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	178441	19.2540	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13434	19.6315	ug/L		92
83) Hexachlorobutadiene	10.249	225	73724	18.8700	ug/L		99
84) 1,2,4-Trichlorobenzene	10.263	180	129546	18.8164	ug/L		99
85) Naphthalene	10.417	128	247958	18.4693	ug/L		100
86) 1,2,3-Trichlorobenzene	10.501	180	124865	18.6717	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042817\17M0273107.D Vial: 4
Acq On : 28 Apr 2017 13:21 Operator: ADC
Sample : WG612030-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 29 14:31:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Sat Apr 29 14:31:11 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:47:47 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	613920	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	424126	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	224441	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	162918	25.9958	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%				
43) 1,2-Dichloroethane-d4	10.84	65	169608	27.4592	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 109.84%				
58) Toluene-d8	13.22	98	572812	26.4674	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%				
80) p-Bromofluorobenzene	16.63	95	225901	26.5006	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.00%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	219181	22.4863	ug/L		94
3) Chloromethane	4.03	50	249192	21.4979	ug/L		99
4) Vinyl Chloride	4.28	62	225196	20.2199	ug/L		99
5) 1,3-Butadiene	4.32	54	141487	33.1001	ug/L		89
6) Bromomethane	5.23	94	72271	15.0292	ug/L		98
7) Chloroethane	5.39	64	105685	22.0548	ug/L		86
8) Trichlorofluoromethane	5.89	101	224668	19.6820	ug/L		99
9) Diethyl ether	6.43	59	469821	98.7628	ug/L		85
10) Isoprene	6.47	67	172445	18.3667	ug/L		83
11) Acrolein	6.67	56	74233	142.4353	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	131247	20.3118	ug/L		96
13) Acetone	6.78	43	28254	21.3272	ug/L		94
14) 1,1-Dichloroethene	7.00	61	188467	20.1365	ug/L		89
15) Tert-Butyl Alcohol	7.12	59	95915	233.4121	ug/L		92
16) Dimethyl Sulfide	7.27	62	138518	20.7116	ug/L		79
17) Iodomethane	7.53	142	114152	21.3613	ug/L		97
18) Methyl acetate	7.53	43	65200	19.6235	ug/L	#	87
19) Methylene Chloride	7.79	84	136531	19.2949	ug/L		65
20) Carbon Disulfide	7.85	76	293051	14.5485	ug/L		99
21) Acrylonitrile	7.96	53	34866	22.7120	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	319238	20.5736	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	128136	19.0225	ug/L		84
24) n-Hexane	8.32	57	148097	19.4422	ug/L		85
25) Diisopropyl ether	8.66	45	1910548	110.1763	ug/L	#	93
26) Vinyl Acetate	8.82	43	190642	39.6055	ug/L	#	91
27) 1,1-Dichloroethane	8.86	63	231165	20.7171	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	1770816	100.7854	ug/L		93
29) 2-Butanone	9.41	43	37874	22.6833	ug/L		87
30) Propionitrile	9.52	54	61944	113.7570	ug/L		100
31) 2,2-Dichloropropane	9.64	77	188944	22.2576	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	142227	19.2055	ug/L		97
33) Chloroform	9.91	83	237666	18.6970	ug/L		95
34) 1-Bromopropane	10.06	122	32466	24.7216	ug/L		99
35) Bromochloromethane	10.15	130	81266	20.8465	ug/L		98
36) Tetrahydrofuran	10.17	42	126218	114.7916	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	205982	19.9315	ug/L		93
39) Cyclohexane	10.49	56	170253	17.8155	ug/L		82
40) 1,1-Dichloropropene	10.65	75	171868	19.6736	ug/L		85
41) Tert-Amyl-Methyl ether	10.74	73	1744989	104.6009	ug/L		94
42) Carbon Tetrachloride	10.79	117	165581	20.3198	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146801.D 8260BWT.M Fri Apr 28 10:38:57 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 08:47:47 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

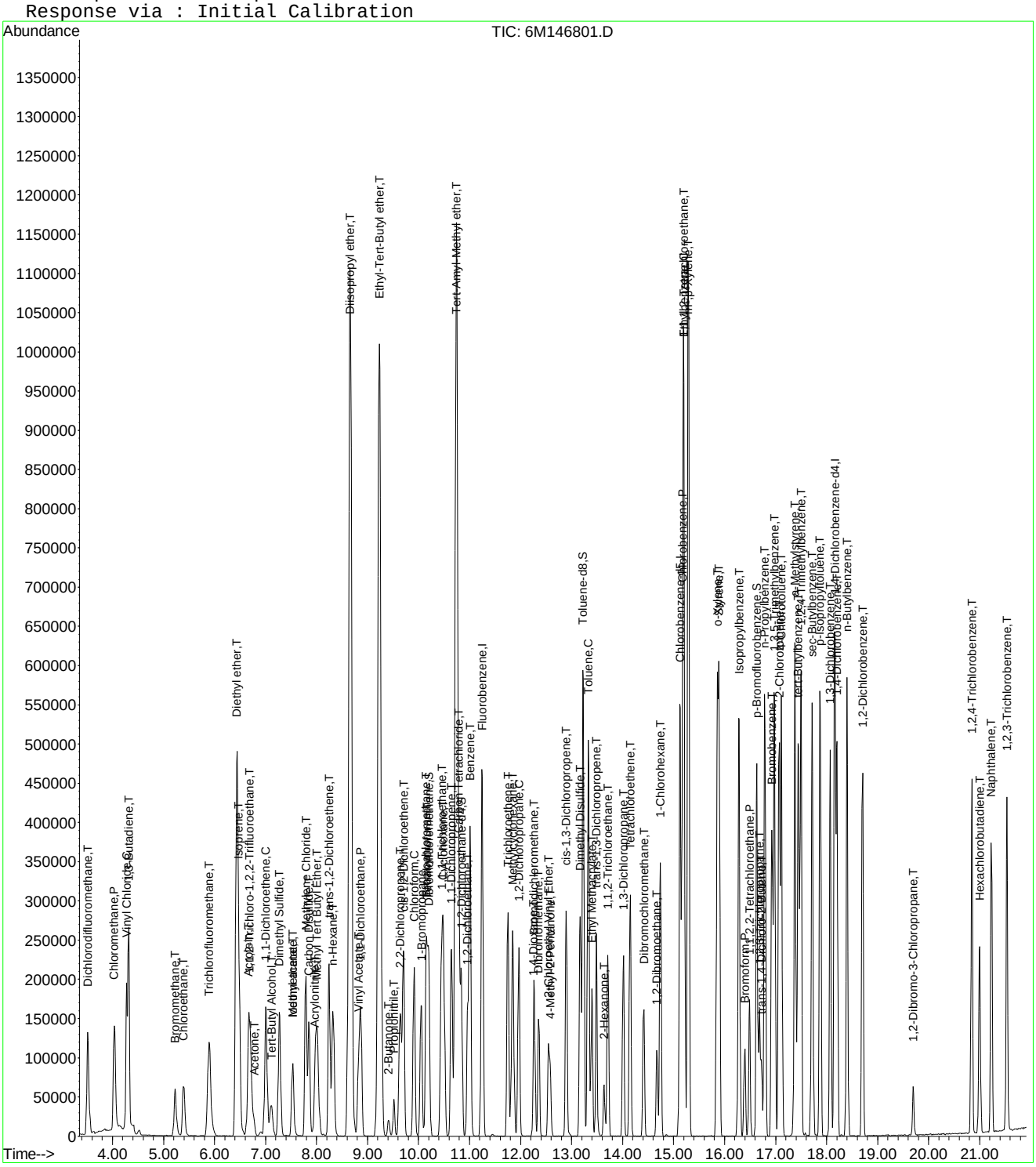
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	166347	21.0357	ug/L		89
46)	Benzene	11.01	78	510984	19.4533	ug/L		89
47)	Trichloroethene	11.75	130	122850	17.1823	ug/L		93
48)	Methylcyclohexane	11.84	83	183895	17.8022	ug/L		85
49)	1,2-Dichloropropane	11.97	63	126305	20.3747	ug/L		94
50)	1,4-Dioxane	12.25	88	9580	212.5364	ug/L		91
51)	Bromodichloromethane	12.26	83	171913	19.6449	ug/L		99
52)	Dibromomethane	12.35	93	74307	20.3524	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	59888	24.6291	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	35146	22.0343	ug/L		89
55)	cis-1,3-Dichloropropene	12.90	75	210992	21.8943	ug/L		95
56)	Dimethyl Disulfide	13.17	79	118331	19.4635	ug/L		91
59)	Toluene	13.32	91	518057	19.5371	ug/L		100
60)	Ethyl Methacrylate	13.40	69	144398	22.5032	ug/L		80
62)	trans-1,3-Dichloropropene	13.49	75	176681	21.6094	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	98650	19.7416	ug/L		98
64)	2-Hexanone	13.64	43	58156	24.2361	ug/L		87
65)	1,3-Dichloropropane	14.02	76	178735	21.3084	ug/L		76
66)	Tetrachloroethene	14.15	166	118806	18.4897	ug/L		92
67)	Dibromochloromethane	14.42	129	116186	18.8087	ug/L		99
68)	1,2-Dibromoethane	14.67	107	93075	19.3979	ug/L		98
69)	1-Chlorohexane	14.74	91	171568	20.0365	ug/L		83
70)	Chlorobenzene	15.17	112	339454	18.7041	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	121042	18.6238	ug/L		96
72)	Ethylbenzene	15.20	106	186150	18.9470	ug/L		99
73)	m-,p-Xylene	15.28	106	448906	38.2265	ug/L		98
74)	o-Xylene	15.86	106	218840	19.3114	ug/L		98
75)	Styrene	15.89	104	376755	19.8043	ug/L		100
76)	Bromoform	16.40	173	69485	18.4586	ug/L		99
77)	Isopropylbenzene	16.29	105	542142	19.1174	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	123953	21.2051	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	35554	20.5968	ug/L	#	56
82)	trans-1,4-Dichloro-2-Buten	16.72	53	25413	20.4736	ug/L	#	1
83)	n-Propylbenzene	16.79	91	661901	19.4780	ug/L		98
84)	Bromobenzene	16.93	156	141497	18.5348	ug/L		74
85)	1,3,5-Trimethylbenzene	16.98	105	471330	19.5714	ug/L		99
86)	2-Chlorotoluene	17.07	91	451337	19.9471	ug/L		98
87)	4-Chlorotoluene	17.11	91	388062	19.4051	ug/L		99
88)	a-Methylstyrene	17.38	118	264107	19.8315	ug/L		99
89)	tert-Butylbenzene	17.44	134	94681	18.7629	ug/L		83
90)	1,2,4-Trimethylbenzene	17.50	105	490467	19.8306	ug/L		88
91)	sec-Butylbenzene	17.72	105	574211	19.3347	ug/L		96
92)	p-Isopropyltoluene	17.87	119	486303	19.4661	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	265803	18.4366	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	268974	18.4489	ug/L		95
95)	n-Butylbenzene	18.40	91	461514	20.2311	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	250100	18.5075	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	22089	20.8624	ug/L		99
98)	1,2,4-Trichlorobenzene	20.85	180	182269	18.4342	ug/L		98
99)	Hexachlorobutadiene	21.00	225	65280	17.2859	ug/L		100
100)	Naphthalene	21.23	128	386339	19.5139	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	169300	17.7365	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146801.D 8260BWT.M Fri Apr 28 10:38:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146801.D Vial: 5
Acq On : 28 Apr 2017 8:25 Operator: TMB
Sample : WG611922-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 8:47 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419227.D Vial: 5
Acq On : 28 Apr 2017 9:33 Operator: TMB
Sample : WG611929-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 09:55:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	757341	25.00	ug/L	-0.01
57) Chlorobenzene-d5	14.79	117	622640	25.00	ug/L	-0.01
78) 1,4-Dichlorobenzene-d4	17.82	152	335593	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	204151	25.7000	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.52	65	176086	25.6412	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.56%			
58) Toluene-d8	12.90	98	746411	26.2363	ug/L	-0.01
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.96%			
80) p-Bromofluorobenzene	16.29	95	298664	25.2163	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.88%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	250625	24.4533	ug/L	99
3) Chloromethane	3.80	50	289671	22.6072	ug/L	97
4) Vinyl Chloride	4.04	62	280907	23.2143	ug/L	99
5) 1,3-Butadiene	4.08	54	182704	36.4112	ug/L	95
6) Bromomethane	4.95	94	80602	21.5226	ug/L	100
7) Chloroethane	5.12	64	126223	23.8806	ug/L	97
8) Trichlorofluoromethane	5.60	101	282002	21.4568	ug/L	99
9) Diethyl ether	6.13	59	305580	61.7348	ug/L	90
10) Isoprene	6.17	67	208475	20.0622	ug/L	89
11) Acrolein	6.37	56	43491	63.4429	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	166739	22.2483	ug/L	99
13) Acetone	6.47	43	20565	19.3071	ug/L	95
14) 1,1-Dichloroethene	6.70	61	229615	20.9346	ug/L	95
15) Tert-Butyl Alcohol	6.79	59	68160	197.4088	ug/L	100
16) Dimethyl Sulfide	6.96	62	156652	21.4425	ug/L	89
17) Iodomethane	7.21	142	28676	8.7515	ug/L	95
18) Methyl acetate	7.22	43	59827	20.5115	ug/L	90
19) Methylene Chloride	7.47	84	159160	20.1924	ug/L	79
20) Carbon Disulfide	7.52	76	370935	16.2651	ug/L	100
21) Acrylonitrile	7.66	53	30902	20.9149	ug/L	100
22) Methyl Tert Butyl Ether	7.69	73	301334	19.4028	ug/L	94
23) trans-1,2-Dichloroethene	7.93	61	223349	20.9304	ug/L	93
24) n-Hexane	8.00	57	180285	20.2401	ug/L	93
25) Diisopropyl ether	8.34	45	2310575	96.7363	ug/L	95
26) Vinyl Acetate	8.51	43	205307	19.1649	ug/L	94
27) 1,1-Dichloroethane	8.55	63	291432	21.2201	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1802918	88.7569	ug/L	97
29) 2-Butanone	9.10	43	33850	20.2649	ug/L	84
30) Propionitrile	9.21	54	52141	100.7140	ug/L	98
31) 2,2-Dichloropropane	9.32	77	243462	20.9995	ug/L	98
32) cis-1,2-Dichloroethene	9.38	96	182377	20.6773	ug/L	93
33) Chloroform	9.59	83	297133	19.5261	ug/L	99
34) 1-Bromopropane	9.73	122	45946	26.4064	ug/L	97
35) Bromochloromethane	9.83	130	98094	20.6104	ug/L	88
36) Tetrahydrofuran	9.85	42	112269	97.6388	ug/L	82
38) 1,1,1-Trichloroethane	10.13	97	265233	21.5978	ug/L	100
39) Cyclohexane	10.16	56	212769	18.6091	ug/L	89
40) 1,1-Dichloropropene	10.31	75	222486	20.7495	ug/L	100
41) Tert-Amyl-Methyl ether	10.42	73	1776124	97.6469	ug/L	97
42) Carbon Tetrachloride	10.47	117	246591	21.6557	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419227.D 8260WT.M Fri Apr 28 10:38:01 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419227.D Vial: 5
Acq On : 28 Apr 2017 9:33 Operator: TMB
Sample : WG611929-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 09:55:19 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

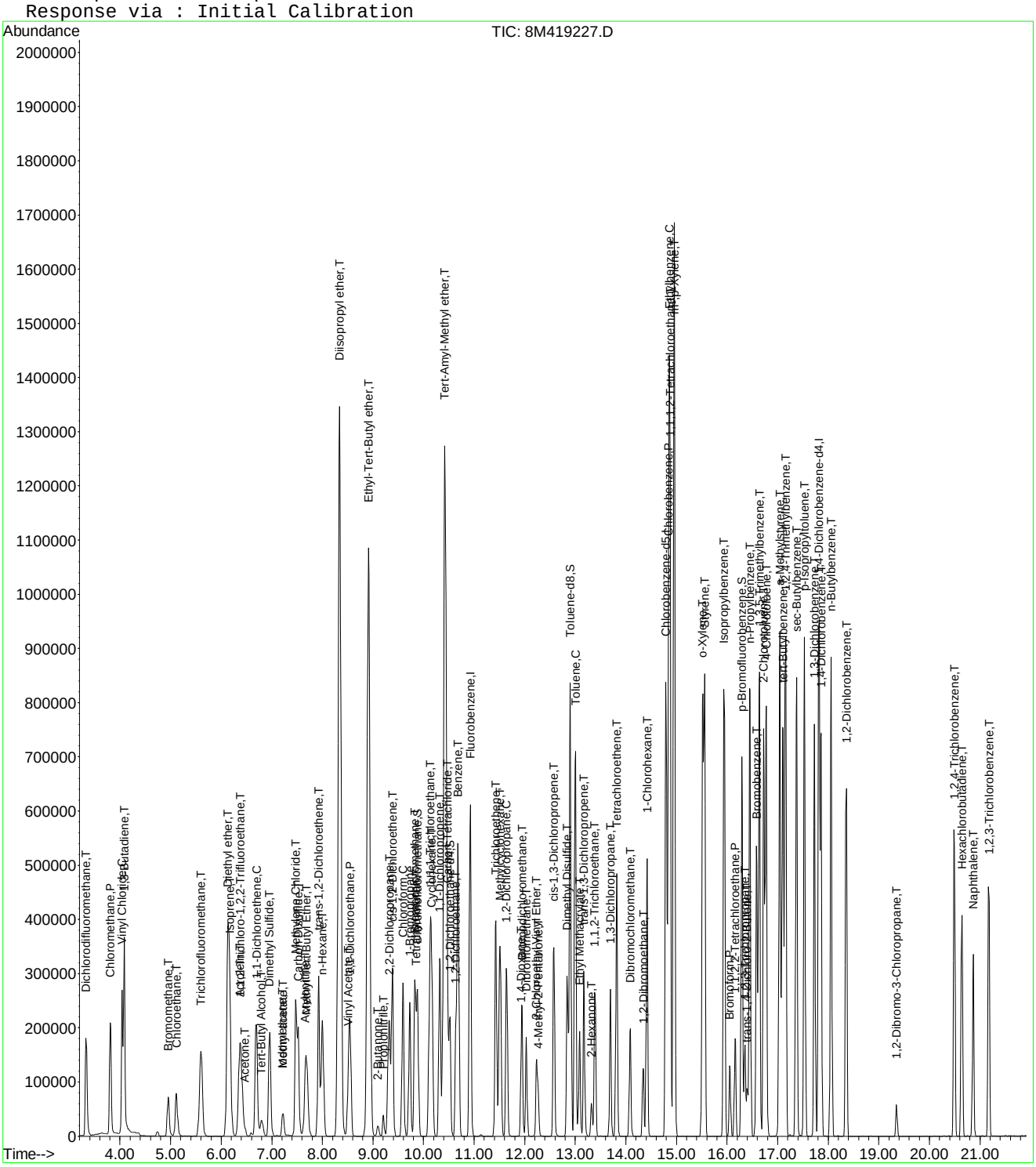
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	178155	20.7041	ug/L	95
46)	Benzene	10.68	78	658195	21.0373	ug/L	94
47)	Trichloroethene	11.43	130	175999	20.0249	ug/L	99
48)	Methylcyclohexane	11.51	83	233941	19.9678	ug/L	94
49)	1,2-Dichloropropane	11.64	63	157938	20.6684	ug/L	94
50)	Bromodichloromethane	11.95	83	201925	20.1921	ug/L	98
51)	1,4-Dioxane	11.93	88	8046	184.6771	ug/L	88
52)	Dibromomethane	12.03	93	82171	20.8952	ug/L	100
53)	2-Chloroethyl Vinyl Ether	12.23	63	69206	20.9312	ug/L	96
54)	4-Methyl-2-Pentanone	12.27	58	29008	19.5868	ug/L	98
55)	cis-1,3-Dichloropropene	12.58	75	251990	22.1263	ug/L	98
56)	Dimethyl Disulfide	12.84	79	113686	19.3326	ug/L	87
59)	Toluene	13.00	91	723541	20.8764	ug/L	98
60)	Ethyl Methacrylate	13.08	69	142587	21.8064	ug/L	85
62)	trans-1,3-Dichloropropene	13.17	75	197552	19.6545	ug/L	99
63)	1,1,2-Trichloroethane	13.38	97	108161	18.9686	ug/L	99
64)	2-Hexanone	13.32	58	27206	19.4416	ug/L	84
65)	1,3-Dichloropropane	13.69	76	197157	20.4531	ug/L	86
66)	Tetrachloroethene	13.82	164	147213	20.2213	ug/L	98
67)	Dibromochloromethane	14.09	129	142905	19.5030	ug/L	100
68)	1,2-Dibromoethane	14.35	107	110153	19.7768	ug/L	99
69)	1-Chlorohexane	14.42	91	237227	21.6344	ug/L	91
70)	Chlorobenzene	14.84	112	472478	19.1514	ug/L	98
71)	1,1,1,2-Tetrachloroethane	14.87	131	171481	19.5864	ug/L	99
72)	Ethylbenzene	14.86	106	271753	19.6673	ug/L	94
73)	m-,p-Xylene	14.96	106	663383	41.4572	ug/L	94
74)	o-Xylene	15.51	106	316954	19.7017	ug/L	98
75)	Styrene	15.55	104	531214	21.0618	ug/L	96
76)	Bromoform	16.05	173	82162	16.5849	ug/L	99
77)	Isopropylbenzene	15.94	105	792832	20.5823	ug/L	99
79)	1,1,2,2-Tetrachloroethane	16.15	83	123126	19.4443	ug/L	99
81)	1,2,3-Trichloropropane	16.35	110	36551	20.1340	ug/L	68
82)	trans-1,4-Dichloro-2-Buten	16.39	53	23516	15.7505	ug/L	92
83)	n-Propylbenzene	16.45	91	960500	20.4489	ug/L	99
84)	Bromobenzene	16.59	156	209403	19.0271	ug/L	100
85)	1,3,5-Trimethylbenzene	16.64	105	688214	20.2354	ug/L	99
86)	2-Chlorotoluene	16.72	91	583846	18.2073	ug/L	95
87)	4-Chlorotoluene	16.77	91	609361	21.0865	ug/L	100
88)	a-Methylstyrene	17.04	118	399561	20.9553	ug/L	100
89)	tert-Butylbenzene	17.10	134	144834	18.8089	ug/L	93
90)	1,2,4-Trimethylbenzene	17.16	105	717453	20.6632	ug/L	99
91)	sec-Butylbenzene	17.37	105	867092	20.3553	ug/L	99
92)	p-Isopropyltoluene	17.53	119	741246	20.6652	ug/L	97
93)	1,3-Dichlorobenzene	17.73	146	410049	19.2222	ug/L	98
94)	1,4-Dichlorobenzene	17.86	146	412565	19.0231	ug/L	99
95)	n-Butylbenzene	18.06	91	687014	21.2624	ug/L	98
96)	1,2-Dichlorobenzene	18.36	146	363732	19.4097	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18414	17.8678	ug/L	95
98)	1,2,4-Trichlorobenzene	20.49	180	236399	18.7371	ug/L	100
99)	Hexachlorobutadiene	20.64	225	106435	18.1290	ug/L	97
100)	Naphthalene	20.87	128	343317	19.0418	ug/L	100
101)	1,2,3-Trichlorobenzene	21.18	180	194350	18.5497	ug/L	99

(#) = qualifier out of range (m) = manual integration
8M419227.D 8260WT.M Fri Apr 28 10:38:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419227.D Vial: 5
Acq On : 28 Apr 2017 9:33 Operator: TMB
Sample : WG611929-02 20ug/L LCS STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 9:55 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419228.D Vial: 6
Acq On : 28 Apr 2017 10:02 Operator: TMB
Sample : WG611929-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 10:24:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.92	96	796613	25.00	ug/L	-0.02
57) Chlorobenzene-d5	14.79	117	644046	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	17.81	152	348410	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.88	111	213523	25.5547	ug/L	-0.02
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.20%			
43) 1,2-Dichloroethane-d4	10.51	65	187105	25.9026	ug/L	-0.02
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.60%			
58) Toluene-d8	12.89	98	778950	26.4700	ug/L	-0.02
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.88%			
80) p-Bromofluorobenzene	16.29	95	311453	25.3287	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.32%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.33	85	259039	24.0283	ug/L	99
3) Chloromethane	3.81	50	296883	22.0278	ug/L	98
4) Vinyl Chloride	4.03	62	282301	22.1794	ug/L	98
5) 1,3-Butadiene	4.08	54	176135	32.7287	ug/L	95
6) Bromomethane	4.95	94	89949	22.6560	ug/L	98
7) Chloroethane	5.11	64	128758	23.1593	ug/L	95
8) Trichlorofluoromethane	5.59	101	291926	21.1169	ug/L	99
9) Diethyl ether	6.12	59	322572	61.9550	ug/L	90
10) Isoprene	6.16	67	213288	19.5135	ug/L	88
11) Acrolein	6.36	56	48029	66.6087	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.38	101	174949	22.1930	ug/L	99
13) Acetone	6.46	43	22804	20.3537	ug/L	92
14) 1,1-Dichloroethene	6.69	61	234906	20.3611	ug/L	95
15) Tert-Butyl Alcohol	6.79	59	80113	220.5890	ug/L	99
16) Dimethyl Sulfide	6.96	62	166024	21.6050	ug/L	90
17) Iodomethane	7.22	142	39478	11.4541	ug/L	93
18) Methyl acetate	7.22	43	63087	20.5629	ug/L	91
19) Methylene Chloride	7.48	84	163574	19.7293	ug/L	78
20) Carbon Disulfide	7.52	76	383790	15.9992	ug/L	100
21) Acrylonitrile	7.65	53	32574	20.9597	ug/L	96
22) Methyl Tert Butyl Ether	7.68	73	326350	19.9776	ug/L	94
23) trans-1,2-Dichloroethene	7.92	61	230075	20.4978	ug/L	94
24) n-Hexane	7.99	57	186535	19.9094	ug/L	91
25) Diisopropyl ether	8.33	45	2417767	96.2339	ug/L	94
26) Vinyl Acetate	8.51	43	237490	21.0762	ug/L	94
27) 1,1-Dichloroethane	8.54	63	298709	20.6777	ug/L	98
28) Ethyl-Tert-Butyl ether	8.91	59	1907713	89.2860	ug/L	97
29) 2-Butanone	9.10	43	35354	20.1219	ug/L	90
30) Propionitrile	9.20	54	57079	104.8168	ug/L	99
31) 2,2-Dichloropropane	9.32	77	255489	20.9505	ug/L	100
32) cis-1,2-Dichloroethene	9.38	96	187605	20.2215	ug/L	92
33) Chloroform	9.59	83	307466	19.2091	ug/L	98
34) 1-Bromopropane	9.73	122	45893	25.0756	ug/L	100
35) Bromochloromethane	9.82	130	103850	20.7441	ug/L	90
36) Tetrahydrofuran	9.84	42	122711	101.4589	ug/L	84
38) 1,1,1-Trichloroethane	10.12	97	274446	21.2463	ug/L	99
39) Cyclohexane	10.15	56	220502	18.3347	ug/L	88
40) 1,1-Dichloropropene	10.32	75	227852	20.2024	ug/L	99
41) Tert-Amyl-Methyl ether	10.42	73	1885852	98.5682	ug/L	97
42) Carbon Tetrachloride	10.46	117	252198	21.0563	ug/L	98

(#) = qualifier out of range (m) = manual integration
8M419228.D 8260WT.M Fri Apr 28 10:38:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419228.D Vial: 6
Acq On : 28 Apr 2017 10:02 Operator: TMB
Sample : WG611929-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 10:24:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\2\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

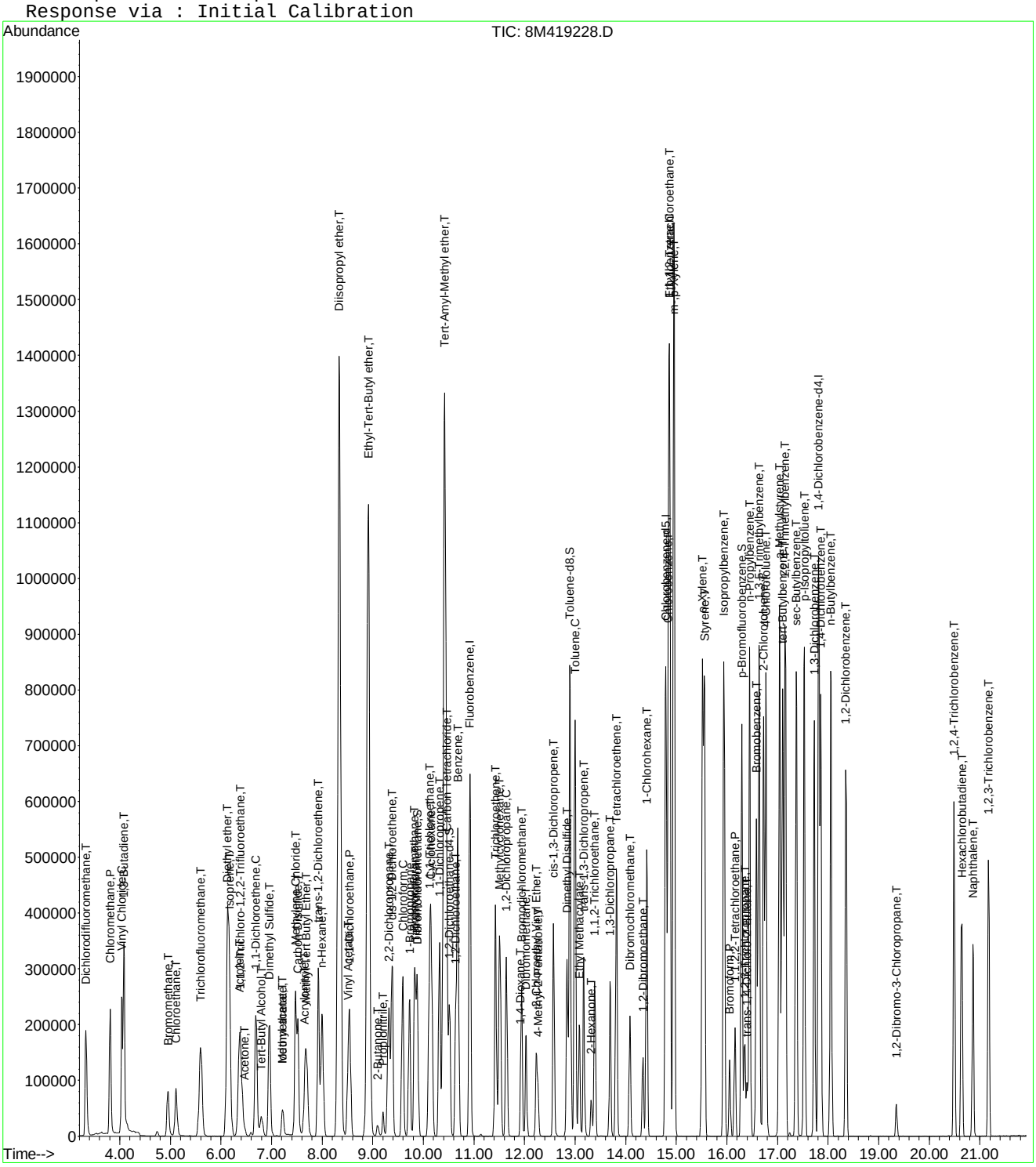
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
45)	1,2-Dichloroethane	10.64	62	185497	20.4946	ug/L	95
46)	Benzene	10.68	78	674017	20.4810	ug/L	95
47)	Trichloroethene	11.42	130	179168	19.3805	ug/L	98
48)	Methylcyclohexane	11.51	83	237461	19.2690	ug/L	94
49)	1,2-Dichloropropane	11.64	63	161800	20.1300	ug/L	93
50)	Bromodichloromethane	11.94	83	211751	20.1308	ug/L	99
51)	1,4-Dioxane	11.92	88	10265	223.9938	ug/L	83
52)	Dibromomethane	12.02	93	86975	21.0265	ug/L	98
53)	2-Chloroethyl Vinyl Ether	12.23	63	72595	20.8738	ug/L	95
54)	4-Methyl-2-Pentanone	12.26	58	30878	19.8216	ug/L	99
55)	cis-1,3-Dichloropropene	12.57	75	259833	21.6902	ug/L	98
56)	Dimethyl Disulfide	12.84	79	121913	19.6490	ug/L	88
59)	Toluene	12.99	91	728896	20.3319	ug/L	99
60)	Ethyl Methacrylate	13.08	69	150663	22.2757	ug/L	83
62)	trans-1,3-Dichloropropene	13.17	75	202382	19.4659	ug/L	99
63)	1,1,2-Trichloroethane	13.39	97	115364	19.5594	ug/L	96
64)	2-Hexanone	13.32	58	29805	20.5909	ug/L	82
65)	1,3-Dichloropropane	13.69	76	204181	20.4778	ug/L	84
66)	Tetrachloroethene	13.81	164	151725	20.1484	ug/L	99
67)	Dibromochloromethane	14.08	129	147645	19.4802	ug/L	100
68)	1,2-Dibromoethane	14.34	107	114833	19.9318	ug/L	99
69)	1-Chlorohexane	14.41	91	243349	21.4551	ug/L	92
70)	Chlorobenzene	14.83	112	478155	18.7373	ug/L	99
71)	1,1,1,2-Tetrachloroethane	14.87	131	174645	19.2848	ug/L	100
72)	Ethylbenzene	14.87	106	271091	18.9673	ug/L	92
73)	m-,p-Xylene	14.95	106	661575	39.9700	ug/L	94
74)	o-Xylene	15.52	106	316565	19.0235	ug/L	98
75)	Styrene	15.56	104	537666	20.6091	ug/L	97
76)	Bromoform	16.05	173	84044	16.4073	ug/L	99
77)	Isopropylbenzene	15.94	105	801628	20.1190	ug/L	100
79)	1,1,2,2-Tetrachloroethane	16.16	83	128588	19.5599	ug/L	97
81)	1,2,3-Trichloropropane	16.35	110	36665	19.4538	ug/L	70
82)	trans-1,4-Dichloro-2-Buten	16.40	53	27944	17.9369	ug/L	84
83)	n-Propylbenzene	16.45	91	958469	19.6550	ug/L	100
84)	Bromobenzene	16.58	156	215541	18.8643	ug/L	99
85)	1,3,5-Trimethylbenzene	16.63	105	690333	19.5510	ug/L	99
86)	2-Chlorotoluene	16.73	91	609799	18.3171	ug/L	95
87)	4-Chlorotoluene	16.77	91	586672	19.5546	ug/L	99
88)	a-Methylstyrene	17.04	118	404464	20.4321	ug/L	97
89)	tert-Butylbenzene	17.10	134	147298	18.4252	ug/L	95
90)	1,2,4-Trimethylbenzene	17.15	105	719780	19.9676	ug/L	100
91)	sec-Butylbenzene	17.37	105	864321	19.5438	ug/L	99
92)	p-Isopropyltoluene	17.53	119	736630	19.7810	ug/L	98
93)	1,3-Dichlorobenzene	17.73	146	411756	18.5922	ug/L	98
94)	1,4-Dichlorobenzene	17.85	146	412328	18.3128	ug/L	99
95)	n-Butylbenzene	18.05	91	678935	20.2393	ug/L	99
96)	1,2-Dichlorobenzene	18.35	146	365338	18.7782	ug/L	98
97)	1,2-Dibromo-3-Chloropropan	19.35	75	18877	17.6433	ug/L	95
98)	1,2,4-Trichlorobenzene	20.49	180	241723	18.4542	ug/L	99
99)	Hexachlorobutadiene	20.64	225	108240	17.7582	ug/L	99
100)	Naphthalene	20.86	128	363032	19.3945	ug/L	100
101)	1,2,3-Trichlorobenzene	21.17	180	199428	18.3342	ug/L	100

(#) = qualifier out of range (m) = manual integration
8M419228.D 8260WT.M Fri Apr 28 10:38:05 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS8\DATA\042817\8M419228.D Vial: 6
Acq On : 28 Apr 2017 10:02 Operator: TMB
Sample : WG611929-03 20ug/L LCS2 STD 8260 Inst : HPMS8
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 10:24 2017 Quant Results File: 8260WT.RES

Method : K:\ORGANICS\VOLATILE\HPMS8\METHODS\8260WT.M (RTE Integrator)
Title : Method 8260B/624 WTR-SOP:OVLMSV01 04-17-17 HPMS8
Last Update : Tue Apr 18 08:45:38 2017
Response via : Initial Calibration



8M419228.D 8260WT.M Fri Apr 28 10:38:06 2017 Page 3

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 25, 2017

---

001 - BIO-CHEM TESTING WVDEP 220	002 - REIC Consultants, Inc. WVDEP 060
003 - Sturm Environmental	004 - MICROBAC PITTSBURGH
005 - ES LABORATORIES	006 - ALCOSAN LABORATORIES
007 - ALS LABORATORIES	008 - BENCHMARK LABORATORIES
010 - MICROBAC CHICAGOLAND	AC - AMBER R. CARMICHAEL
ADC - ANTHONY D. CANTER	ADG - APRIL D. GREENE
ALS - ADRIANE L. STEED	AWE - ANDREW W. ESSIG
AZH - AFTER HOURS	BJO - BRIAN J. OGDEN
BLG - BRENDA L. GREENWALT	BNB - Brandi N. Bentley
BRG - BRENDA R. GREGORY	CAS - Craig A. Smith
CEB - CHAD E. BARNES	CLC - CHRYS L. CRAWFORD
CLS - CARA L. STRICKLER	CPD - CHAD P. DAVIS
CSH - CHRIS S. HILL	CV - Carl Volkman
DAK - DEAN A. KETELSEN	DCM - DAVID C. MERCKLE
DEV - DAVID E. VANDENBERG	DIH - DEANNA I. HESSON
DLB - DAVID L. BUMGARNER	DLP - DOROTHY L. PAYNE
DSM - DAVID S. MOSSOR	DTG - DOMINIC T. GEHRET
ECL - ERIC C. LAWSON	EPT - ETHAN P. TIDD
ERP - ERIN R. PORTER	FJB - FRANCES J. BOLDEN
HRF - HEATHER R. FAIRCHILD	JDH - JUSTIN D. HESSON
JDS - JARED D. SMITH	JKP - JACQUELINE K. PARSONS
JLD - JESSICA L. DELONG	JST - JOSHUA S. TAYLOR
JTP - JOSHUA T. PEMBERTON	JWR - JOHN W. RICHARDS
JWS - JACK W. SHEAVES	JYH - JI Y. HU
KAK - KATHY A. KIRBY	KDD - Katelyn D. Daley
KEB - KATIE E. BARNES	KHR - KIM H. RHODES
KKB - KERRI K. BUCK	KRA - KATHY R. ALBERTSON
KRP - KATHY R. PARSONS	LJH - Lacey J. Hendershot
LLS - LARRY L. STEPHENS	LSB - LESLIE S. BUCINA
LSJ - LAURA S. JONES	MAP - MARLA A. PORTER
MBK - MORGAN B. KNOWLTON	MES - MARY E. SCHILLING
MMB - MAREN M. BEERY	MRT - MICHELLE R. TAYLOR
OJE - OMOYEMWEN J. ENGLISH	PDM - PIERCE D. MORRIS
PIT - MICROBAC WARRENDALE	REK - BOB E. KYER
RLB - BOB BUCHANAN	RNP - RICK N. PETTY
SAV - SARAH A. VANDENBERG	SCA - SUEELLEN C. ADAMS
SCB - SARAH C. BOGOLIN	SCJ - SUE ELLEN C. JOHNSON
SDC - SHALYN D. CONLEY	TB - TODD BOYLE
TMB - TIFFANY M. BAILEY	TMM - TAMMY M. MORRIS
VC - VICKI COLLIER	WTD - WADE T. DELONG
XXX - UNAVAILABLE OR SUBCONTRACT	ZTB - ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 25, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 D&O	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-57-ODLB-14	4/22/17	0957	G	W	N		x		
MW-227-ODLB-14	4/22/17	1004	G	W	N		x		
MW-228-ODLB-14	4/22/17	1010	G	W	N		x		
MW-174-ODLB-14	4/22/17	1016	G	W	N		x		
MW-15-ODLB-14	4/22/17	1023	G	W	N		x		
MW-91-ODLB-14	4/22/17	1030	G	W	N		x		
DUP-3	4/22/17	1032	G	W	N		x		
MW-06-ODLB-14	4/22/17	1040	G	W	N		x		
MW-87-ODLB-14	4/22/17	1045	G	W	N		x		
MW-176-ODLB-14	4/22/17	1053	G	W	N		x		
MW-225-ODLB-14	4/22/17	1110	G	W	N	x	x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	Relinquished by:	Date/Time:	Company			
	Relinquished by:	Date/Time:	Company			

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

Microbac OVD
Received: 04/25/2017 10:39
By: BRENDA GREGORY 221000099952

Brenda Gregory

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 2 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 05/10	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-223-ODLB-14	4/22/17	1120	G	W	N		x		
MW-226-ODLB-14	4/22/17	1125	G	W	N		x		
MW-222-ODLB-14	4/22/17	1130	G	W	N		x		
DUP-7	4/22/17	1133	G	W	N		x		
MW-224-ODLB-14	4/22/17	1139	G	W	N		x		
MW-134-ODLB-14	4/22/17	1144	G	W	N		x		
MW-187-ODLB-14	4/22/17	1346	G	W	N		x		
DUP-6	4/22/17	1350	G	W	N		x		
MW-13-ODLB-14	4/22/17	1353	G	W	N		x		
MW-04-ODLB-14	4/22/17	1359	G	W	N		x		
MW-221-ODLB-14	4/22/17	1405	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For _____ Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/24/17 1610	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 3 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/OD	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-180-ODLB-14	4/22/17	1412	G	W	N		x		
MW-03-ODLB-14	4/22/17	1420	G	W	N		x		
MW-220-ODLB-14	4/22/17	1428	G	W	N		x		
MW-07-ODLB-14	4/22/17	1432	G	W	N		x		
MW-230-ODLB-14	4/22/17	1440	G	W	N		x		
MW-31-ODLB-14	4/22/17	1514	G	W	N		x		
MW-147-ODLB-14	4/22/17	1523	G	W	N		x		
MW-148-ODLB-14	4/22/17	1530	G	W	N		x		
MW-241-ODLB-14	4/22/17	1537	G	W	N		x		
MW-160-ODLB-14	4/22/17	1545	G	W	N		x		
MW-242-ODLB-14	4/22/17	1552	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 4 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2O3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - pH 4-5 L - EDA Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			Other:
Project Name: LTM 2017 OD/OF	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-150-ODLB-14	4/22/17	1601	G	W	N		x		
DUP-4	4/22/17	1605	G	W	N		x		
MW-54-ODLB-14	4/22/17	1610	G	W	N		x		
MW-155-ODLB-14	4/22/17	1616	G	W	N		x		
MW-243-ODLB-14	4/22/17	1624	G	W	N		x		
MW-245-ODLB-14	4/22/17	1633	G	W	N		x		
MW-159-ODLB-14	4/22/17	1640	G	W	N		x		
MW-149-ODLB-14	4/22/17	1646	G	W	N		x		
MW-244-ODLB-14	4/23/17	817	G	W	N		x		
MW-251-ODLB-14	4/23/17	825	G	W	N		x		
MW-250-ODLB-14	4/23/17	838	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 5 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/2D	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
DUP-9	4/23/17	842	G	W	N		x		
MW-158-ODLB-14	4/23/17	851	G	W	N		x		
MW-158A-ODLB-14	4/23/17	856	G	W	N		x		
MW-246-ODLB-14	4/23/17	902	G	W	N		x		
DUP-8	4/23/17	905	G	W	N		x		
MW-237-ODLB-14	4/23/17	916	G	W	N		x		
MW-166-ODLB-14	4/23/17	925	G	W	N		x		
MW-166A-ODLB-14	4/23/17	930	G	W	N		x		
MW-151-ODLB-14	4/23/17	942	G	W	N		x		
MW-247-ODLB-14	4/23/17	948	G	W	N	x	x		
MW-165A-ODLB-14	4/23/17	1001	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
DF/2D	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 6 of 9
Company: HDR		Analysis Requested		Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/OD	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-165-ODLB-14	4/23/17	1010	G	W	N	x	x		
MW-152-ODLB-14	4/23/17	1129	G	W	N		x		
MW-79-ODLB-14	4/23/17	1135	G	W	N		x		
MW-153-ODLB-14	4/23/17	1146	G	W	N		x		
MW-249-ODLB-14	4/23/17	1339	G	W	N		x		
MW-145-ODLB-14	4/23/17	1345	G	W	N		x		
MW-235-ODLB-14	4/23/17	1354	G	W	N		x		
MW-80-ODLB-14	4/23/17	1405	G	W	N	x	x		
MW-167-ODLB-14	4/23/17	1417	G	W	N		x		
MW-248-ODLB-14	4/23/17	1429	G	W	N		x		
MW-44-ODLB-14	4/23/17	1438	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 7 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			Other:
Project Name: LTM 2017 05/00	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-171-ODLB-14	4/23/17	1448	G	W	N		x		
DUP-5	4/23/17	1454	G	W	N		x		
MW-129-ODLB-14	4/23/17	1504	G	W	N		x		
MW-130-ODLB-14	4/23/17	1511	G	W	N	x	x		
MW-28-ODLB-14	4/23/17	1520	G	W	N		x		
MW-67-ODLB-14	4/23/17	1553	G	W	N		x		
MW-154-ODLB-14	4/23/17	1559	G	W	N		x		
MW-182-ODLB-14	4/23/17	1609	G	W	N		x		
MW-08-ODLB-14	4/22/17	1557	G	W	N		x		
MW-58-ODLB-14	4/23/17	936	G	W	N		x		
DUP-1	4/22/17	1657	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 8 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/QD	Project #:			
Site: DDMT	SSOW#:			

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2O3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - pH 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-126-ODLB-14	4/23/17	1442	G	W	N		x		
MW-169-ODLB-14	4/23/17	1028	G	W	N		x		
MW-170-ODLB-14	4/23/17	1038	G	W	N		x		
MW-78-ODLB-14	4/23/17	1049	G	W	N		x		
MW-76-ODLB-14	4/23/17	1103	G	W	N		x		
MW-77-ODLB-14	4/23/17	1115	G	W	N		x		
MW-70-ODLB-14	4/23/17	1128	G	W	N		x		
MW-71-ODLB-14	4/23/17	1142	G	W	N		x		
MW-163-ODLB-14	4/23/17	1508	G	W	N		x		
MW-144-ODLB-14	4/23/17	1520	G	W	N		x		
MW-190-ODLB-14	4/23/17	1530	G	W	N		x		

Possible Hazard Identification *Unconfirmed*	***Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)*** ☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time: 4/24/17 1610	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

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Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 9 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/OD	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-164-ODLB-14	4/23/17	1540	G	W	N		x		
✓ MW-184-ODLB-14	4/23/17	1545	G	W	N		x		
✓ MW-157-ODLB-14	4/23/17	1600	G	W	N		x		
✓ MW-68-ODLB-14	4/23/17	1610	G	W	N		x		
✓ DUP-2	4/23/17	1710	G	W	N		x		
✓ MW-69-ODLB-14	4/23/17	1630	G	W	N		x		
✓ TB-1-ODLB-14	4/24/17	1600	G	W	N		x		
✓ EB1-ODLB-14	4/23/17	0750	G	W	N		x		
TB2-ODLB-14	4/24/17	1600	G	W			X		
TB3-ODLB-14	4/24/17	1600	G	W			X		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

MICROBAC

Cooler ID 9959

COOLER TEMP >6° C LOG

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

CHD 4/25/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

CHD 4/25/17

PRESERVATIVE EXCEPTIONS

__✓__ NONE

____ AS NOTED

CHD 4/25/17

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Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-01	898710	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Samplenum	Container ID	Products
L17041200-02	898711	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:31	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-03	898712	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Samplenum	Container ID	Products
L17041200-04	898713	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-05	898714	CU-MS MN-MS ZN 826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:31	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Samplenum	Container ID	Products
L17041200-06	898715	CU-MSD MN-MSD ZN-D 826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-07	898716	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:31	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

Samplenum	Container ID	Products
L17041200-08	898717	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-09	898718	CU-MS MN-MS ZN 826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Samplenum	Container ID	Products
L17041200-10	898719	CU-MSD MN-MSD ZN-D 826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-11	898720	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

Samplenum	Container ID	Products
L17041200-12	898721	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-13	898722	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

Samplenum	Container ID	Products
L17041200-14	898723	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:25	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-15	898724	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:22	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041200-16	898725	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-17	898726	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041200-18	898727	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:31	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-19	898728	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041200-20	898729	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-21	898730	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Samplenum	Container ID	Products
L17041200-22	898731	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-23	898732	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	

Samplenum	Container ID	Products
L17041200-24	898733	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:23	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:31	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:24	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-25	898734	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-26	898735	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:31	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
3	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-27	898736	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-28	898737	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-29	898738	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-30	898739	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-31	898740	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-32	898741	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-33	898742	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-34	898743	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-35	898744	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-36	898745	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:12	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-37	898746	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Samplenum	Container ID	Products
L17041200-38	898747	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:57	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-39	898748	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Samplenum	Container ID	Products
L17041200-40	898749	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-41	898750	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Samplenum	Container ID	Products
L17041200-42	898751	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-43	898752	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:11	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Samplenum	Container ID	Products
L17041200-44	898753	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-45	898754	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Samplenum	Container ID	Products
L17041200-46	898755	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-47	898756	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Samplenum	Container ID	Products
L17041200-48	898757	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:10	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:26	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:58	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-49	898758	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:28	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:28	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Samplenum	Container ID	Products
L17041200-50	898759	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:28	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:28	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-51	898760	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	03-JUL-2017 15:05	BJO	JST	

Samplenum	Container ID	Products
L17041200-52	898761	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-53	898762	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Samplenum	Container ID	Products
L17041200-54	898763	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-55	898764	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Samplenum	Container ID	Products
L17041200-56	898765	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-57	898766	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

Samplenum	Container ID	Products
L17041200-58	898767	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:31	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041200
Account: 2694
Project: 2694.011
Samples: 59
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041200-59	898768	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:04	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 11:00	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:31	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:09	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:27	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:59	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17041203 *(Revised)*

Report revised to remove 1,4 Dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on July 25 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17041203
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

There were no discrepancies.

Discrepancy	Resolution

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
00113829	H	2.0		1001891733610004575000778978192929	X
00113893	H	1.0		1002826033610004575000778978193340	X
00113761	H	2.0		1002826033610004575000778978193307	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	Yes
7	Were sample labels intact and match COC?	Yes
8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	Yes

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-165-ODLB-14	L17041203-01	04/23/2017 10:10	04/25/2017 10:39
MW-165-ODLB-14	L17041203-02	04/23/2017 10:10	04/25/2017 10:39
MW-165-ODLB-14	L17041203-03	04/23/2017 10:10	04/25/2017 10:39
MW-152-ODLB-14	L17041203-04	04/23/2017 11:29	04/25/2017 10:39
MW-79-ODLB-14	L17041203-05	04/23/2017 11:35	04/25/2017 10:39
MW-153-ODLB-14	L17041203-06	04/23/2017 11:46	04/25/2017 10:39
MW-249-ODLB-14	L17041203-07	04/23/2017 13:39	04/25/2017 10:39
MW-145-ODLB-14	L17041203-08	04/23/2017 13:45	04/25/2017 10:39
MW-235-ODLB-14	L17041203-09	04/23/2017 13:54	04/25/2017 10:39
MW-80-ODLB-14	L17041203-10	04/23/2017 14:05	04/25/2017 10:39
MW-80-ODLB-14	L17041203-11	04/23/2017 14:05	04/25/2017 10:39
MW-80-ODLB-14	L17041203-12	04/23/2017 14:05	04/25/2017 10:39
MW-167-ODLB-14	L17041203-13	04/23/2017 14:17	04/25/2017 10:39
MW-248-ODLB-14	L17041203-14	04/23/2017 14:29	04/25/2017 10:39
MW-44-ODLB-14	L17041203-15	04/23/2017 14:38	04/25/2017 10:39
MW-171-ODLB-14	L17041203-16	04/23/2017 14:48	04/25/2017 10:39
DUP-5	L17041203-17	04/23/2017 14:54	04/25/2017 10:39
MW-129-ODLB-14	L17041203-18	04/23/2017 15:04	04/25/2017 10:39
MW-130-ODLB-14	L17041203-19	04/23/2017 15:11	04/25/2017 10:39
MW-130-ODLB-14	L17041203-20	04/23/2017 15:11	04/25/2017 10:39
MW-130-ODLB-14	L17041203-21	04/23/2017 15:11	04/25/2017 10:39
MW-28-ODLB-14	L17041203-22	04/23/2017 15:20	04/25/2017 10:39
MW-67-ODLB-14	L17041203-23	04/23/2017 15:53	04/25/2017 10:39
MW-154-ODLB-14	L17041203-24	04/23/2017 15:59	04/25/2017 10:39
MW-182-ODLB-14	L17041203-25	04/23/2017 16:09	04/25/2017 10:39
MW-08-ODLB-14	L17041203-26	04/22/2017 15:57	04/25/2017 10:39
MW-58-ODLB-14	L17041203-27	04/23/2017 09:36	04/25/2017 10:39
DUP-1	L17041203-28	04/22/2017 16:57	04/25/2017 10:39
MW-126-ODLB-14	L17041203-29	04/23/2017 14:42	04/25/2017 10:39
MW-169-ODLB-14	L17041203-30	04/23/2017 10:28	04/25/2017 10:39
MW-170-ODLB-14	L17041203-31	04/23/2017 10:38	04/25/2017 10:39
MW-78-ODLB-14	L17041203-32	04/23/2017 10:49	04/25/2017 10:39
MW-76-ODLB-14	L17041203-33	04/23/2017 11:03	04/25/2017 10:39
MW-77-ODLB-14	L17041203-34	04/23/2017 11:15	04/25/2017 10:39
MW-70-ODLB-14	L17041203-35	04/23/2017 11:28	04/25/2017 10:39
MW-71-ODLB-14	L17041203-36	04/23/2017 11:42	04/25/2017 10:39
MW-163-ODLB-14	L17041203-37	04/23/2017 15:08	04/25/2017 10:39

MW-144-ODLB-14	L17041203-38	04/23/2017 15:20	04/25/2017 10:39
MW-190-ODLB-14	L17041203-39	04/23/2017 15:30	04/25/2017 10:39
MW-164-ODLB-14	L17041203-40	04/23/2017 15:40	04/25/2017 10:39
MW-184-ODLB-14	L17041203-41	04/23/2017 15:45	04/25/2017 10:39
MW-157-ODLB-14	L17041203-42	04/23/2017 16:00	04/25/2017 10:39
MW-68-ODLB-14	L17041203-43	04/23/2017 16:10	04/25/2017 10:39
DUP-2	L17041203-44	04/23/2017 17:10	04/25/2017 10:39
MW-69-ODLB-14	L17041203-45	04/23/2017 16:30	04/25/2017 10:39
TB-1-ODLB-14	L17041203-46	04/24/2017 16:00	04/25/2017 10:39
EB1-ODLB-14	L17041203-47	04/23/2017 07:50	04/25/2017 10:39
TB-2-ODLB-14	L17041203-48	04/24/2017 16:00	04/25/2017 10:39
TB-3-ODLB-14	L17041203-49	04/24/2017 16:00	04/25/2017 10:39

Microbac REPORT L17041203
PREPARED FOR CT Laboratories
WORK ID:

1.0 Summary Data ..... ??
1.1 Narratives ..... ??
1.2 Certificate of Analysis ..... ??
2.0 Full Sample Data Package ..... ??
2.1 Volatiles Data ..... ??
2.1.1 Volatiles GCMS Data (8260) ..... ??
2.1.1.1 Summary Data ..... ??
2.1.1.2 QC Summary Data ..... ??
2.1.1.3 Sample Data ..... ??
2.1.1.4 Standards Data ..... ??
2.1.1.5 Raw QC Data ..... ??
3.0 Attachments ..... ??

1.0 Summary Data

1.1 Narratives

Login Number: L17041203
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: In the alternate source analyzed 4/24/17 on HPMS11, WG611320-12, Chloromethane and Dichlorodifluoromethane exceeded the limit for percent difference, biased high. In the alternate source analyzed 4/26/17 on HPMS17, WG611454-12, Trichlorofluoromethane exceeded the limit for percent difference biased low. In the same alternate source Dichlorodifluoromethane exceeded the limit for percent difference, biased high. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: In the CCV analyzed 4/29/17 on HPSM11, WG612121-02, the following analyte recoveries exceeded the limit for percent difference, biased low: Chloromethane. In the CCV analyzed 4/30/17 on HPMS17, WG612141-02, Acetone exceeded the limit for percent difference, biased low. In the CCV analyzed 5/1/17 on HPMS17, WG612249-02, Bromomethane exceeded the limit for percent difference, biased low. In the CCV analyzed 5/2/17 on HPMS17, WG612550-02, Acetone exceeded the limit for percent difference, biased low. In the same CCV, Chloromethane and Dichlorodifluoromethane exceeded the limit for percent difference, biased high. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: In the blank analyzed 4/28/17 on HPMS6, the following analyte recoveries were above the MDL but below

the RL: 1,2,3-Trichlorobenzene, 1,2,4-Trichlorobenzene, 1,4-Dichlorobenzene, Hexachlorobutadiene, and Naphthalene. The associated samples were non-detect for these analytes. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: For 1203-19, 20 MS, and 21 MSD, Trichloroethene recovery was low. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

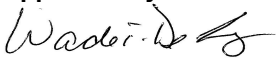
Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 125088

Approved By: Wade DeLong



1.2 Certificate of Analysis

Certificate of Analysis

Sample #:	L17041203-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-165-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/29/2017 22:49
Collect Date:	04/23/2017 10:10	**Dilution:**	1	**File ID:**	11M17877
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.84	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.20		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-165-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/29/2017 20:53
Collect Date:	04/23/2017 10:10	**Dilution:**	1	**File ID:**	11M17873
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.3		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.1		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	20.2		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.8		1.00	0.250
1,1-Dichloroethane	75-34-3	18.6		1.00	0.125
1,1-Dichloroethene	75-35-4	17.8		1.00	0.500
1,1-Dichloropropene	563-58-6	18.7		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	21.1		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	21.9		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.9		1.00	0.250
1,2-Dichloroethane	107-06-2	19.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.6		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.3		2.00	1.00
1,2-Dichloropropane	78-87-5	18.7		1.00	0.200
1,2-Dibromoethane	106-93-4	19.5		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	20.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.6		0.500	0.125
1-Chlorohexane	544-10-5	20.1		1.00	0.125
2,2-Dichloropropane	594-20-7	18.4		1.00	0.250
2-Hexanone	591-78-6	21.2		10.0	2.50
2-Chlorotoluene	95-49-8	18.6		1.00	0.125
4-Chlorotoluene	106-43-4	20.1		1.00	0.250
Acetone	67-64-1	22.6		10.0	2.50
Benzene	71-43-2	18.6		0.400	0.125
Bromobenzene	108-86-1	19.7		1.00	0.125
Bromochloromethane	74-97-5	18.5		1.00	0.200
Bromodichloromethane	75-27-4	18.7		0.500	0.250
Bromoform	75-25-2	18.3		1.00	0.500
Bromomethane	74-83-9	18.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	13.5		1.00	0.500
Carbon tetrachloride	56-23-5	18.8		1.00	0.250
Chlorobenzene	108-90-7	18.9		0.500	0.125
Chloroethane	75-00-3	20.5		1.00	0.500
Chloroform	67-66-3	20.0		0.300	0.125
Chloromethane	74-87-3	17.4	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.2		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	19.9		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	18.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	21.0		1.00	0.250
Ethylbenzene	100-41-4	19.6		1.00	0.250
Hexachlorobutadiene	87-68-3	20.1		0.600	0.250
Isopropylbenzene	98-82-8	19.6		1.00	0.250
Methylene chloride	75-09-2	17.9		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.7		5.00	0.500
MEK (2-Butanone)	78-93-3	19.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.0		10.0	2.50
n-Butylbenzene	104-51-8	22.1		1.00	0.250
n-Propylbenzene	103-65-1	19.7		1.00	0.125
m-,p-Xylene	179601-23-1	39.5		2.00	0.500
Naphthalene	91-20-3	22.4		1.00	0.200
o-Xylene	95-47-6	19.6		1.00	0.250
p-Isopropyltoluene	99-87-6	21.5		1.00	0.250
sec-Butylbenzene	135-98-8	19.5		1.00	0.250
Styrene	100-42-5	21.8		1.00	0.125
Trichloroethene	79-01-6	18.2		1.00	0.250
tert-Butylbenzene	98-06-6	18.8		1.00	0.250
Tetrachloroethene	127-18-4	19.4		1.00	0.250
Toluene	108-88-3	18.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	17.5		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.5		1.00	0.500
Trichlorofluoromethane	75-69-4	19.4		1.00	0.250
Vinyl chloride	75-01-4	20.7		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	110	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041203-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-165-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/29/2017 21:22
Collect Date:	04/23/2017 10:10	**Dilution:**	1	**File ID:**	11M17874
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.0		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.3		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.0		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.3		1.00	0.250
1,1-Dichloroethane	75-34-3	18.7		1.00	0.125
1,1-Dichloroethene	75-35-4	17.8		1.00	0.500
1,1-Dichloropropene	563-58-6	18.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	19.6		1.00	0.150
1,2,3-Trichloropropane	96-18-4	18.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.8		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.6		1.00	0.250
1,2-Dichloroethane	107-06-2	19.2		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	18.9		2.00	1.00
1,2-Dichloropropane	78-87-5	18.9		1.00	0.200
1,2-Dibromoethane	106-93-4	18.8		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.4		1.00	0.250
1,3-Dichloropropane	142-28-9	19.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.2		0.500	0.125
1-Chlorohexane	544-10-5	19.6		1.00	0.125
2,2-Dichloropropane	594-20-7	18.2		1.00	0.250
2-Hexanone	591-78-6	20.5		10.0	2.50
2-Chlorotoluene	95-49-8	17.2		1.00	0.125
4-Chlorotoluene	106-43-4	18.8		1.00	0.250
Acetone	67-64-1	21.7		10.0	2.50
Benzene	71-43-2	18.9		0.400	0.125
Bromobenzene	108-86-1	19.0		1.00	0.125
Bromochloromethane	74-97-5	18.5		1.00	0.200
Bromodichloromethane	75-27-4	18.7		0.500	0.250
Bromoform	75-25-2	17.3		1.00	0.500
Bromomethane	74-83-9	17.9		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	13.2		1.00	0.500
Carbon tetrachloride	56-23-5	18.5		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	20.4		1.00	0.500
Chloroform	67-66-3	19.8		0.300	0.125
Chloromethane	74-87-3	17.4	Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	18.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.6		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	19.5		1.00	0.250
Dichlorodifluoromethane	75-71-8	20.5		1.00	0.250
Ethylbenzene	100-41-4	19.1		1.00	0.250
Hexachlorobutadiene	87-68-3	18.5		0.600	0.250
Isopropylbenzene	98-82-8	19.2		1.00	0.250
Methylene chloride	75-09-2	18.3		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	18.7		5.00	0.500
MEK (2-Butanone)	78-93-3	19.1		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	18.2		10.0	2.50
n-Butylbenzene	104-51-8	20.7		1.00	0.250
n-Propylbenzene	103-65-1	18.5		1.00	0.125
m-,p-Xylene	179601-23-1	38.9		2.00	0.500
Naphthalene	91-20-3	21.0		1.00	0.200
o-Xylene	95-47-6	19.1		1.00	0.250
p-Isopropyltoluene	99-87-6	20.2		1.00	0.250
sec-Butylbenzene	135-98-8	18.5		1.00	0.250
Styrene	100-42-5	21.1		1.00	0.125
Trichloroethene	79-01-6	18.4		1.00	0.250
tert-Butylbenzene	98-06-6	17.5		1.00	0.250
Tetrachloroethene	127-18-4	18.8		1.00	0.250
Toluene	108-88-3	18.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	17.6		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.1		1.00	0.500
Trichlorofluoromethane	75-69-4	18.9		1.00	0.250
Vinyl chloride	75-01-4	20.0		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041203-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-152-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 00:46
Collect Date:	04/23/2017 11:29	**Dilution:**	1	**File ID:**	11M17881
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.378	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-79-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 20:53
Collect Date:	04/23/2017 11:35	**Dilution:**	1	**File ID:**	17M0273189
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.234	F	1.00	0.125
1,1-Dichloroethene	75-35-4	4.72		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.82	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.164	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.53		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	7.64		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.2	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	104	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-153-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 04:40
Collect Date:	04/23/2017 11:46	**Dilution:**	1	**File ID:**	11M17889
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	104	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	110	81	120	
4-Bromofluorobenzene	113	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-249-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 05:10
Collect Date:	04/23/2017 13:39	**Dilution:**	1	**File ID:**	11M17890
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.95	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.385	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.95		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.318	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.76		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.373	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	105	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	MW-145-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612123	**Analyst:**	TMB	**Run Date:**	04/30/2017 05:39
Collect Date:	04/23/2017 13:45	**Dilution:**	1	**File ID:**	11M17891
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.534	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.09		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.82		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-235-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 21:13
Collect Date:	04/23/2017 13:54	**Dilution:**	1	**File ID:**	17M0273190
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.57	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	104	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-80-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG612085	**Analyst:**	JDS	**Run Date:**	04/28/2017 23:42
Collect Date:	04/23/2017 14:05	**Dilution:**	1	**File ID:**	6M146830
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	112	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-80-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG612085	**Analyst:**	JDS	**Run Date:**	04/28/2017 21:40
Collect Date:	04/23/2017 14:05	**Dilution:**	1	**File ID:**	6M146826
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.8		1.00	0.250
1,1-Dichloroethane	75-34-3	21.4		1.00	0.125
1,1-Dichloroethene	75-35-4	20.7		1.00	0.500
1,1-Dichloropropene	563-58-6	20.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.8		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.7		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	22.7		2.00	1.00
1,2-Dichloropropane	78-87-5	21.2		1.00	0.200
1,2-Dibromoethane	106-93-4	19.1		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.1		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.8		1.00	0.250
1,3-Dichloropropane	142-28-9	21.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	20.7		1.00	0.125
2,2-Dichloropropane	594-20-7	20.2		1.00	0.250
2-Hexanone	591-78-6	23.6		10.0	2.50
2-Chlorotoluene	95-49-8	20.2		1.00	0.125
4-Chlorotoluene	106-43-4	20.4		1.00	0.250
Acetone	67-64-1	25.0		10.0	2.50
Benzene	71-43-2	19.8		0.400	0.125
Bromobenzene	108-86-1	19.1		1.00	0.125
Bromochloromethane	74-97-5	20.1		1.00	0.200
Bromodichloromethane	75-27-4	20.0		0.500	0.250
Bromoform	75-25-2	17.8		1.00	0.500
Bromomethane	74-83-9	16.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.9		1.00	0.500
Carbon tetrachloride	56-23-5	19.1		1.00	0.250
Chlorobenzene	108-90-7	18.8		0.500	0.125
Chloroethane	75-00-3	22.0		1.00	0.500
Chloroform	67-66-3	19.0		0.300	0.125
Chloromethane	74-87-3	21.5		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.7		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	22.0		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	20.1		1.00	0.250
Dichlorodifluoromethane	75-71-8	23.0		1.00	0.250
Ethylbenzene	100-41-4	18.9		1.00	0.250
Hexachlorobutadiene	87-68-3	18.2		0.600	0.250
Isopropylbenzene	98-82-8	19.2		1.00	0.250
Methylene chloride	75-09-2	19.6		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.7		5.00	0.500
MEK (2-Butanone)	78-93-3	22.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	21.6		10.0	2.50
n-Butylbenzene	104-51-8	20.7		1.00	0.250
n-Propylbenzene	103-65-1	20.2		1.00	0.125
m-,p-Xylene	179601-23-1	38.3		2.00	0.500
Naphthalene	91-20-3	19.5		1.00	0.200
o-Xylene	95-47-6	19.4		1.00	0.250
p-Isopropyltoluene	99-87-6	20.1		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	19.6		1.00	0.125
Trichloroethene	79-01-6	17.8		1.00	0.250
tert-Butylbenzene	98-06-6	19.5		1.00	0.250
Tetrachloroethene	127-18-4	18.6		1.00	0.250
Toluene	108-88-3	19.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.7		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.8		1.00	0.500
Trichlorofluoromethane	75-69-4	18.9		1.00	0.250
Vinyl chloride	75-01-4	20.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	108	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	109	76	119	

Certificate of Analysis

Sample #:	L17041203-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-80-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/05/2017 22:09
Workgroup #:	WG612085	**Analyst:**	JDS	**Run Date:**	04/28/2017 22:10
Collect Date:	04/23/2017 14:05	**Dilution:**	1	**File ID:**	6M146827
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.3		0.500	0.250
1,1,1-Trichloroethane	71-55-6	19.7		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.5		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.7		1.00	0.250
1,1-Dichloroethane	75-34-3	21.1		1.00	0.125
1,1-Dichloroethene	75-35-4	20.6		1.00	0.500
1,1-Dichloropropene	563-58-6	20.0		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.6		1.00	0.150
1,2,3-Trichloropropane	96-18-4	20.5		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.0		1.00	0.250
1,2-Dichloroethane	107-06-2	20.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.8		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.5		2.00	1.00
1,2-Dichloropropane	78-87-5	20.9		1.00	0.200
1,2-Dibromoethane	106-93-4	19.2		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.9		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.4		1.00	0.250
1,3-Dichloropropane	142-28-9	21.2		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	20.3		1.00	0.125
2,2-Dichloropropane	594-20-7	16.1		1.00	0.250
2-Hexanone	591-78-6	23.6		10.0	2.50
2-Chlorotoluene	95-49-8	19.1		1.00	0.125
4-Chlorotoluene	106-43-4	20.8		1.00	0.250
Acetone	67-64-1	24.6		10.0	2.50
Benzene	71-43-2	19.7		0.400	0.125
Bromobenzene	108-86-1	18.7		1.00	0.125
Bromochloromethane	74-97-5	19.8		1.00	0.200
Bromodichloromethane	75-27-4	19.6		0.500	0.250
Bromoform	75-25-2	18.0		1.00	0.500
Bromomethane	74-83-9	17.2		1.00	0.500
Carbon disulfide	75-15-0	16.6		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	18.2		1.00	0.250
Chlorobenzene	108-90-7	18.6		0.500	0.125
Chloroethane	75-00-3	21.4		1.00	0.500
Chloroform	67-66-3	18.9		0.300	0.125
Chloromethane	74-87-3	21.3		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.5		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.8		0.500	0.250
Dibromochloromethane	124-48-1	18.7		0.500	0.250
Dibromomethane	74-95-3	20.2		1.00	0.250
Dichlorodifluoromethane	75-71-8	22.5		1.00	0.250
Ethylbenzene	100-41-4	18.7		1.00	0.250
Hexachlorobutadiene	87-68-3	17.9		0.600	0.250
Isopropylbenzene	98-82-8	19.1		1.00	0.250
Methylene chloride	75-09-2	19.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	21.7		5.00	0.500
MEK (2-Butanone)	78-93-3	22.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	22.1		10.0	2.50
n-Butylbenzene	104-51-8	20.4		1.00	0.250
n-Propylbenzene	103-65-1	19.6		1.00	0.125
m-,p-Xylene	179601-23-1	38.1		2.00	0.500
Naphthalene	91-20-3	19.6		1.00	0.200
o-Xylene	95-47-6	19.4		1.00	0.250
p-Isopropyltoluene	99-87-6	19.8		1.00	0.250
sec-Butylbenzene	135-98-8	19.5		1.00	0.250
Styrene	100-42-5	19.7		1.00	0.125
Trichloroethene	79-01-6	17.7		1.00	0.250
tert-Butylbenzene	98-06-6	19.2		1.00	0.250
Tetrachloroethene	127-18-4	18.3		1.00	0.250
Toluene	108-88-3	19.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.1		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.0		1.00	0.500
Trichlorofluoromethane	75-69-4	18.4		1.00	0.250
Vinyl chloride	75-01-4	20.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	109	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	108	76	119	

Certificate of Analysis

Sample #:	L17041203-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-167-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 21:39
Collect Date:	04/23/2017 14:17	**Dilution:**	1	**File ID:**	17M0273191
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5	0.297	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.98		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.60		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.9	85	115	
1,2-Dichloroethane-d4	100	72	119	
Toluene-d8	99.8	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-248-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 21:59
Collect Date:	04/23/2017 14:29	**Dilution:**	1	**File ID:**	17M0273192
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	106	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	109	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-44-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 22:19
Collect Date:	04/23/2017 14:38	**Dilution:**	1	**File ID:**	17M0273193
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.280	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.37	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.97		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.83		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-171-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 22:39
Collect Date:	04/23/2017 14:48	**Dilution:**	1	**File ID:**	17M0273194
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.84	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.28		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.92		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.563	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-5	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 22:59
Collect Date:	04/23/2017 14:54	**Dilution:**	1	**File ID:**	17M0273195
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.15		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.90		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.550	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.8	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-129-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 23:19
Collect Date:	04/23/2017 15:04	**Dilution:**	1	**File ID:**	17M0273196
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6	0.303	F	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.993	F	1.00	0.125
1,1-Dichloroethene	75-35-4	10.9		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.88	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	15.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	13.3		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-130-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 20:33
Collect Date:	04/23/2017 15:11	**Dilution:**	1	**File ID:**	17M0273188
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6	0.817	F	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3	0.632	F	1.00	0.125
1,1-Dichloroethene	75-35-4	9.50		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.26	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.333		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.387	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	49.1		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	22.5		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-130-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 16:27
Collect Date:	04/23/2017 15:11	**Dilution:**	1	**File ID:**	17M0273177
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.5		1.00	0.250
1,1-Dichloroethane	75-34-3	20.7		1.00	0.125
1,1-Dichloroethene	75-35-4	26.9		1.00	0.500
1,1-Dichloropropene	563-58-6	19.6		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	18.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.8		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.5		1.00	0.250
1,2-Dichloroethane	107-06-2	19.9		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.9		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.3		2.00	1.00
1,2-Dichloropropane	78-87-5	19.9		1.00	0.200
1,2-Dibromoethane	106-93-4	19.2		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	19.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.0		1.00	0.250
1,3-Dichloropropane	142-28-9	20.6		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.8		0.500	0.125
1-Chlorohexane	544-10-5	20.6		1.00	0.125
2,2-Dichloropropane	594-20-7	21.4		1.00	0.250
2-Hexanone	591-78-6	21.7		10.0	2.50
2-Chlorotoluene	95-49-8	18.9		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	25.4	Q	10.0	2.50
Benzene	71-43-2	19.7		0.400	0.125
Bromobenzene	108-86-1	18.4		1.00	0.125
Bromochloromethane	74-97-5	20.1		1.00	0.200
Bromodichloromethane	75-27-4	19.2		0.500	0.250
Bromoform	75-25-2	19.1		1.00	0.500
Bromomethane	74-83-9	16.8		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.6		1.00	0.250
Chlorobenzene	108-90-7	19.0		0.500	0.125
Chloroethane	75-00-3	18.7		1.00	0.500
Chloroform	67-66-3	20.3		0.300	0.125
Chloromethane	74-87-3	22.2		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.8		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.1		0.500	0.250
Dibromochloromethane	124-48-1	19.1		0.500	0.250
Dibromomethane	74-95-3	19.8		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.4		1.00	0.250
Ethylbenzene	100-41-4	19.6		1.00	0.250
Hexachlorobutadiene	87-68-3	17.9		0.600	0.250
Isopropylbenzene	98-82-8	19.1		1.00	0.250
Methylene chloride	75-09-2	19.1		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.8		5.00	0.500
MEK (2-Butanone)	78-93-3	20.8		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.9		10.0	2.50
n-Butylbenzene	104-51-8	20.3		1.00	0.250
n-Propylbenzene	103-65-1	19.5		1.00	0.125
m-,p-Xylene	179601-23-1	39.0		2.00	0.500
Naphthalene	91-20-3	18.5		1.00	0.200
o-Xylene	95-47-6	19.2		1.00	0.250
p-Isopropyltoluene	99-87-6	19.6		1.00	0.250
sec-Butylbenzene	135-98-8	19.4		1.00	0.250
Styrene	100-42-5	20.3		1.00	0.125
Trichloroethene	79-01-6	61.0		1.00	0.250
tert-Butylbenzene	98-06-6	18.7		1.00	0.250
Tetrachloroethene	127-18-4	39.0		1.00	0.250
Toluene	108-88-3	19.7		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.5		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	20.1		1.00	0.500
Trichlorofluoromethane	75-69-4	20.0		1.00	0.250
Vinyl chloride	75-01-4	22.5		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041203-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-130-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612142	**Analyst:**	ADC	**Run Date:**	04/30/2017 16:47
Collect Date:	04/23/2017 15:11	**Dilution:**	1	**File ID:**	17M0273178
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	18.2		0.500	0.250
1,1,1-Trichloroethane	71-55-6	20.4		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	21.3		0.500	0.200
1,1,2-Trichloroethane	79-00-5	18.9		1.00	0.250
1,1-Dichloroethane	75-34-3	20.3		1.00	0.125
1,1-Dichloroethene	75-35-4	26.8		1.00	0.500
1,1-Dichloropropene	563-58-6	19.2		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	17.4		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.0		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	18.0		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	19.0		1.00	0.250
1,2-Dichloroethane	107-06-2	19.4		0.500	0.250
1,2-Dichlorobenzene	95-50-1	18.3		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	20.1		2.00	1.00
1,2-Dichloropropane	78-87-5	19.5		1.00	0.200
1,2-Dibromoethane	106-93-4	18.6		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	18.8		1.00	0.250
1,3-Dichlorobenzene	541-73-1	18.3		1.00	0.250
1,3-Dichloropropane	142-28-9	19.9		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.4		0.500	0.125
1-Chlorohexane	544-10-5	20.1		1.00	0.125
2,2-Dichloropropane	594-20-7	20.8		1.00	0.250
2-Hexanone	591-78-6	21.1		10.0	2.50
2-Chlorotoluene	95-49-8	18.5		1.00	0.125
4-Chlorotoluene	106-43-4	19.4		1.00	0.250
Acetone	67-64-1	25.3	Q	10.0	2.50
Benzene	71-43-2	19.2		0.400	0.125
Bromobenzene	108-86-1	18.0		1.00	0.125
Bromochloromethane	74-97-5	19.4		1.00	0.200
Bromodichloromethane	75-27-4	18.8		0.500	0.250
Bromoform	75-25-2	18.6		1.00	0.500
Bromomethane	74-83-9	16.9		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	16.0		1.00	0.500
Carbon tetrachloride	56-23-5	19.0		1.00	0.250
Chlorobenzene	108-90-7	18.5		0.500	0.125
Chloroethane	75-00-3	18.8		1.00	0.500
Chloroform	67-66-3	19.9		0.300	0.125
Chloromethane	74-87-3	22.1		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.3		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	20.6		0.500	0.250
Dibromochloromethane	124-48-1	18.5		0.500	0.250
Dibromomethane	74-95-3	19.3		1.00	0.250
Dichlorodifluoromethane	75-71-8	24.2		1.00	0.250
Ethylbenzene	100-41-4	18.8		1.00	0.250
Hexachlorobutadiene	87-68-3	16.5		0.600	0.250
Isopropylbenzene	98-82-8	18.1		1.00	0.250
Methylene chloride	75-09-2	18.5		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	19.5		5.00	0.500
MEK (2-Butanone)	78-93-3	20.4		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	20.3		10.0	2.50
n-Butylbenzene	104-51-8	19.2		1.00	0.250
n-Propylbenzene	103-65-1	18.8		1.00	0.125
m-,p-Xylene	179601-23-1	37.6		2.00	0.500
Naphthalene	91-20-3	18.0		1.00	0.200
o-Xylene	95-47-6	18.5		1.00	0.250
p-Isopropyltoluene	99-87-6	18.8		1.00	0.250
sec-Butylbenzene	135-98-8	18.3		1.00	0.250
Styrene	100-42-5	19.5		1.00	0.125
Trichloroethene	79-01-6	59.7		1.00	0.250
tert-Butylbenzene	98-06-6	18.0		1.00	0.250
Tetrachloroethene	127-18-4	37.3		1.00	0.250
Toluene	108-88-3	19.2		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.0		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.4		1.00	0.500
Trichlorofluoromethane	75-69-4	19.9		1.00	0.250
Vinyl chloride	75-01-4	22.8		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	102	76	119	

Q	One or more quality control criteria failed. See narrative.

Certificate of Analysis

Sample #:	L17041203-22	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-28-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 14:58
Collect Date:	04/23/2017 15:20	**Dilution:**	1	**File ID:**	17M0273211
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.70	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.149	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-23	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-67-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 15:18
Collect Date:	04/23/2017 15:53	**Dilution:**	1	**File ID:**	17M0273212
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.50	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-24	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-154-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 15:49
Collect Date:	04/23/2017 15:59	**Dilution:**	1	**File ID:**	17M0273213
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.9	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	104	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-25	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-182-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 16:09
Collect Date:	04/23/2017 16:09	**Dilution:**	1	**File ID:**	17M0273214
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.36	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.3	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-26	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-08-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 16:28
Collect Date:	04/22/2017 15:57	**Dilution:**	1	**File ID:**	17M0273215
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.205	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.11		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.44	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.241	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.256	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.49		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.29		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-27	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-58-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 16:48
Collect Date:	04/23/2017 09:36	**Dilution:**	1	**File ID:**	17M0273216
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.394	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.894		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.727	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-28	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-1	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 17:17
Collect Date:	04/22/2017 16:57	**Dilution:**	1	**File ID:**	17M0273217
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.12		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.234	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.48		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	4.21		1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	112	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-29	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-126-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 17:37
Collect Date:	04/23/2017 14:42	**Dilution:**	1	**File ID:**	17M0273218
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-30	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-169-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 17:57
Collect Date:	04/23/2017 10:28	**Dilution:**	1	**File ID:**	17M0273219
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.62	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	1.51		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	1.96	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.412	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-31	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-170-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 18:16
Collect Date:	04/23/2017 10:38	**Dilution:**	1	**File ID:**	17M0273220
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.45		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.62		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	0.268	F	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-32	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-78-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 18:36
Collect Date:	04/23/2017 10:49	**Dilution:**	1	**File ID:**	17M0273221
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.65	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	105	72	119	
Toluene-d8	104	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-33	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-76-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 19:08
Collect Date:	04/23/2017 11:03	**Dilution:**	1	**File ID:**	17M0273222
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.237	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.26	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.183	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.777	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.5	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	98.7	81	120	
4-Bromofluorobenzene	97.9	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-34	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-77-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 19:27
Collect Date:	04/23/2017 11:15	**Dilution:**	1	**File ID:**	17M0273223
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.59		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.05	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.295	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	4.37		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.294	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	101	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	110	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-35	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-70-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 19:47
Collect Date:	04/23/2017 11:28	**Dilution:**	1	**File ID:**	17M0273224
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.08		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.11	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	5.69		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	103	72	119	
Toluene-d8	99.4	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-36	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-71-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 20:17
Collect Date:	04/23/2017 11:42	**Dilution:**	1	**File ID:**	17M0273225
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	12.5		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	2.13		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.03		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.308	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-37	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-163-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 20:36
Collect Date:	04/23/2017 15:08	**Dilution:**	1	**File ID:**	17M0273226
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.412	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	10.6		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.234	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.52		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.351	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-38	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-144-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 20:56
Collect Date:	04/23/2017 15:20	**Dilution:**	1	**File ID:**	17M0273227
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	8.04		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	11.3		10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.406		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.709	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	33.2		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.5	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-39	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-190-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 21:16
Collect Date:	04/23/2017 15:30	**Dilution:**	1	**File ID:**	17M0273228
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.54		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	9.21	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.224	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.16		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.428	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	98.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-40	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-164-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612250	**Analyst:**	ADC	**Run Date:**	05/01/2017 21:44
Collect Date:	04/23/2017 15:40	**Dilution:**	1	**File ID:**	17M0273229
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.45	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.16		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.21		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	102	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	105	81	120	
4-Bromofluorobenzene	111	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-41	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-184-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 21:30
Collect Date:	04/23/2017 15:45	**Dilution:**	1	**File ID:**	17M0273269
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.82	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.542	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	1.40		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.396	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.994	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.272	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	108	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-42	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-157-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 21:50
Collect Date:	04/23/2017 16:00	**Dilution:**	1	**File ID:**	17M0273270
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.46	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.956		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.08		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.375	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.4	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	98.4	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-43	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-68-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 22:09
Collect Date:	04/23/2017 16:10	**Dilution:**	1	**File ID:**	17M0273271
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.137	F	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.643	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.3	85	115	
1,2-Dichloroethane-d4	101	72	119	
Toluene-d8	103	81	120	
4-Bromofluorobenzene	109	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-44	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	DUP-2	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 22:29
Collect Date:	04/23/2017 17:10	**Dilution:**	1	**File ID:**	17M0273272
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.20	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	0.640	F	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.2	85	115	
1,2-Dichloroethane-d4	98.2	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	103	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-45	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	MW-69-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 22:48
Collect Date:	04/23/2017 16:30	**Dilution:**	1	**File ID:**	17M0273273
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.33	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.956	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	95.9	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	106	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-46	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	TB-1-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612295	**Analyst:**	JDS	**Run Date:**	05/01/2017 19:46
Collect Date:	04/24/2017 16:00	**Dilution:**	1	**File ID:**	11M17942
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	107	81	120	
4-Bromofluorobenzene	105	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-47	**PrePrep Method:**	N/A	**Instrument:**	HPMS17
Client ID:	EB1-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/26/2017 00:33
Workgroup #:	WG612551	**Analyst:**	ADC	**Run Date:**	05/02/2017 21:11
Collect Date:	04/23/2017 07:50	**Dilution:**	1	**File ID:**	17M0273268
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7	0.176	F	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	7.42	Q	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.492		0.300	0.125
Chloromethane	74-87-3		Q	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		Q	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3	1.23		1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.8	85	115	
1,2-Dichloroethane-d4	102	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	107	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-48	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	TB-2-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612295	**Analyst:**	JDS	**Run Date:**	05/01/2017 19:17
Collect Date:	04/24/2017 16:00	**Dilution:**	1	**File ID:**	11M17941
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	107	72	119	
Toluene-d8	108	81	120	
4-Bromofluorobenzene	107	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17041203-49	**PrePrep Method:**	N/A	**Instrument:**	HPMS11
Client ID:	TB-3-ODLB-14	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	04/24/2017 21:26
Workgroup #:	WG612295	**Analyst:**	JDS	**Run Date:**	05/01/2017 18:47
Collect Date:	04/24/2017 16:00	**Dilution:**	1	**File ID:**	11M17940
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	103	85	115	
1,2-Dichloroethane-d4	104	72	119	
Toluene-d8	106	81	120	
4-Bromofluorobenzene	105	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.0 Full Sample Data Package

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17041203
Department: Volatiles
Analyst: Anthony Canter

METHOD

Preparation SW-846 5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: In the alternate source analyzed 4/24/17 on HPMS11, WG611320-12, Chloromethane and Dichlorodifluoromethane exceeded the limit for percent difference, biased high. In the alternate source analyzed 4/26/17 on HPMS17, WG611454-12, Trichlorofluoromethane exceeded the limit for percent difference biased low. In the same alternate source Dichlorodifluoromethane exceeded the limit for percent difference, biased high. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: In the CCV analyzed 4/29/17 on HPSM11, WG612121-02, the following analyte recoveries exceeded the limit for percent difference, biased low: Chloromethane. In the CCV analyzed 4/30/17 on HPMS17, WG612141-02, Acetone exceeded the limit for percent difference, biased low. In the CCV analyzed 5/1/17 on HPMS17, WG612249-02, Bromomethane exceeded the limit for percent difference, biased low. In the CCV analyzed 5/2/17 on HPMS17, WG612550-02, Acetone exceeded the limit for percent difference, biased low. In the same CCV, Chloromethane and Dichlorodifluoromethane exceeded the limit for percent difference, biased high. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: In the blank analyzed 4/28/17 on HPMS6, the following analyte recoveries were above the MDL but below

the RL: 1,2,3-Trichlorobenzene, 1,2,4-Trichlorobenzene, 1,4-Dichlorobenzene, Hexachlorobutadiene, and Naphthalene. The associated samples were non-detect for these analytes. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: For 1203-19, 20 MS, and 21 MSD, Trichloroethene recovery was low. All other acceptance criteria were met. Please see the applicable QC report for a detailed presentation of the failures.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: None.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low area counts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

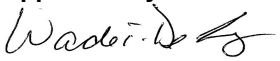
Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 125088

Approved By: Wade DeLong



Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612123
Blank File ID: 11M17871
Blank Sample ID: WG612123-01
Prep Date: 04/29/17 19:55
Instrument ID: HPMS11
Analyzed Date: 04/29/17 19:55
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612123-02	11M17872	04/29/17 20:24	01
MW-165-ODLB-14	L17041203-02	11M17873	04/29/17 20:53	01
MW-165-ODLB-14	L17041203-03	11M17874	04/29/17 21:22	01
MW-165-ODLB-14	L17041203-01	11M17877	04/29/17 22:49	01
MW-152-ODLB-14	L17041203-04	11M17881	04/30/17 00:46	01
MW-153-ODLB-14	L17041203-06	11M17889	04/30/17 04:40	01
MW-249-ODLB-14	L17041203-07	11M17890	04/30/17 05:10	01
MW-145-ODLB-14	L17041203-08	11M17891	04/30/17 05:39	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612295
Blank File ID: 11M17936
Blank Sample ID: WG612295-01
Prep Date: 05/01/17 16:50
Instrument ID: HPMS11
Analyzed Date: 05/01/17 16:50
Method: 8260B
Analyst: JDS

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612295-02	11M17937	05/01/17 17:20	01
TB-3-ODLB-14	L17041203-49	11M17940	05/01/17 18:47	01
TB-2-ODLB-14	L17041203-48	11M17941	05/01/17 19:17	01
TB-1-ODLB-14	L17041203-46	11M17942	05/01/17 19:46	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612142
Blank File ID: 17M0273175
Blank Sample ID: WG612142-01
Prep Date: 04/30/17 15:48
Instrument ID: HPMS17
Analyzed Date: 04/30/17 15:48
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612142-02	17M0273176	04/30/17 16:07	01
MW-130-ODLB-14	L17041203-20	17M0273177	04/30/17 16:27	01
MW-130-ODLB-14	L17041203-21	17M0273178	04/30/17 16:47	01
MW-130-ODLB-14	L17041203-19	17M0273188	04/30/17 20:33	01
MW-79-ODLB-14	L17041203-05	17M0273189	04/30/17 20:53	01
MW-235-ODLB-14	L17041203-09	17M0273190	04/30/17 21:13	01
MW-167-ODLB-14	L17041203-13	17M0273191	04/30/17 21:39	01
MW-248-ODLB-14	L17041203-14	17M0273192	04/30/17 21:59	01
MW-44-ODLB-14	L17041203-15	17M0273193	04/30/17 22:19	01
MW-171-ODLB-14	L17041203-16	17M0273194	04/30/17 22:39	01
DUP-5	L17041203-17	17M0273195	04/30/17 22:59	01
MW-129-ODLB-14	L17041203-18	17M0273196	04/30/17 23:19	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Blank File ID: 17M0273205
Prep Date: 05/01/17 12:49
Analyzed Date: 05/01/17 12:49
Analyst: ADC

Work Group: WG612250
Blank Sample ID: WG612250-01
Instrument ID: HPMS17
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612250-02	17M0273206	05/01/17 13:09	01
LCS2	WG612250-03	17M0273207	05/01/17 13:29	01
MW-28-ODLB-14	L17041203-22	17M0273211	05/01/17 14:58	01
MW-67-ODLB-14	L17041203-23	17M0273212	05/01/17 15:18	01
MW-154-ODLB-14	L17041203-24	17M0273213	05/01/17 15:49	01
MW-182-ODLB-14	L17041203-25	17M0273214	05/01/17 16:09	01
MW-08-ODLB-14	L17041203-26	17M0273215	05/01/17 16:28	01
MW-58-ODLB-14	L17041203-27	17M0273216	05/01/17 16:48	01
DUP-1	L17041203-28	17M0273217	05/01/17 17:17	01
MW-126-ODLB-14	L17041203-29	17M0273218	05/01/17 17:37	01
MW-169-ODLB-14	L17041203-30	17M0273219	05/01/17 17:57	01
MW-170-ODLB-14	L17041203-31	17M0273220	05/01/17 18:16	01
MW-78-ODLB-14	L17041203-32	17M0273221	05/01/17 18:36	01
MW-76-ODLB-14	L17041203-33	17M0273222	05/01/17 19:08	01
MW-77-ODLB-14	L17041203-34	17M0273223	05/01/17 19:27	01
MW-70-ODLB-14	L17041203-35	17M0273224	05/01/17 19:47	01
MW-71-ODLB-14	L17041203-36	17M0273225	05/01/17 20:17	01
MW-163-ODLB-14	L17041203-37	17M0273226	05/01/17 20:36	01
MW-144-ODLB-14	L17041203-38	17M0273227	05/01/17 20:56	01
MW-190-ODLB-14	L17041203-39	17M0273228	05/01/17 21:16	01
MW-164-ODLB-14	L17041203-40	17M0273229	05/01/17 21:44	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Blank File ID: 17M0273263
Prep Date: 05/02/17 19:34
Analyzed Date: 05/02/17 19:34
Analyst: ADC

Work Group: WG612551
Blank Sample ID: WG612551-01
Instrument ID: HPMS17
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612551-02	17M0273264	05/02/17 19:53	01
EB1-ODLB-14	L17041203-47	17M0273268	05/02/17 21:11	01
MW-184-ODLB-14	L17041203-41	17M0273269	05/02/17 21:30	01
MW-157-ODLB-14	L17041203-42	17M0273270	05/02/17 21:50	01
MW-68-ODLB-14	L17041203-43	17M0273271	05/02/17 22:09	01
DUP-2	L17041203-44	17M0273272	05/02/17 22:29	01
MW-69-ODLB-14	L17041203-45	17M0273273	05/02/17 22:48	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041203	Work Group:	WG612085
Blank File ID:	6M146824	Blank Sample ID:	WG612085-01
Prep Date:	04/28/17 20:38	Instrument ID:	HPMS6
Analyzed Date:	04/28/17 20:38	Method:	8260B
Analyst:	JDS		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612085-02	6M146825	04/28/17 21:09	01
MW-80-ODLB-14	L17041203-11	6M146826	04/28/17 21:40	01
MW-80-ODLB-14	L17041203-12	6M146827	04/28/17 22:10	01
LCS	WG612085-06	6M146828	04/28/17 22:41	01
MW-80-ODLB-14	L17041203-10	6M146830	04/28/17 23:42	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.1	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 16:50 Sample ID:WG612295-01
Instrument ID:HPMS11 Run Date:05/01/17 16:50 Prep Method:5030B/5030C/503
File ID:11M17936 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612295 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 16:50 Sample ID:WG612295-01
Instrument ID:HPMS11 Run Date:05/01/17 16:50 Prep Method:5030B/5030C/503
File ID:11M17936 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612295 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	107	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	100	85	-	115	PASS
1,2-Dichloroethane-d4	103	72	-	119	PASS
Toluene-d8	101	81	-	120	PASS
4-Bromofluorobenzene	105	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	101	85	-	115	PASS
1,2-Dichloroethane-d4	104	72	-	119	PASS
Toluene-d8	102	81	-	120	PASS
4-Bromofluorobenzene	106	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/02/17 19:34 Sample ID:WG612551-01
Instrument ID:HPMS17 Run Date:05/02/17 19:34 Prep Method:5030B/5030C/503
File ID:17M0273263 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612551 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/02/17 19:34 Sample ID:WG612551-01
Instrument ID:HPMS17 Run Date:05/02/17 19:34 Prep Method:5030B/5030C/503
File ID:17M0273263 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612551 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.9	85 - 115	PASS
1,2-Dichloroethane-d4	99.2	72 - 119	PASS
Toluene-d8	101	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268575
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/28/17 20:38 Sample ID:WG612085-01
Instrument ID:HPMS6 Run Date:04/28/17 20:38 Prep Method:5030B/5030C/503
File ID:6M146824 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612085 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.490	1	F
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.409	1	F
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.126	1	F
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17041203 Prep Date: 04/28/17 20:38 Sample ID: WG612085-01
Instrument ID: HPMS6 Run Date: 04/28/17 20:38 Prep Method: 5030B/5030C/503
File ID: 6M146824 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612085 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.272	1	F
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.238	1	F
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	108	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	110	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.6	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.0	90.2	63 - 128	
1,1,2-Trichloroethane	20.0	18.7	93.3	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.6	98.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.5	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.3	107	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.9	69 - 132	
1,2-Dichlorobenzene	20.0	19.8	98.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.4	50 - 132	
1,2-Dichloropropane	20.0	19.5	97.6	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	103	74 - 131	
1,3-Dichlorobenzene	20.0	20.1	100	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	17.0	85.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.5	92.4	73 - 126	
4-Chlorotoluene	20.0	19.7	98.7	74 - 128	
Acetone	20.0	18.9	94.6	40 - 135	
Benzene	20.0	19.5	97.6	81 - 122	
Bromobenzene	20.0	19.5	97.6	76 - 124	
Bromochloromethane	20.0	19.3	96.3	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	18.2	90.8	69 - 128	
Bromomethane	20.0	20.2	101	30 - 141	
Carbon disulfide	20.0	14.2	70.8	58 - 128	
Carbon tetrachloride	20.0	20.4	102	66 - 138	
Chlorobenzene	20.0	19.5	97.3	81 - 122	
Chloroethane	20.0	21.8	109	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	17.8	89.0	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.6	103	69 - 131	
Dibromochloromethane	20.0	19.3	96.7	66 - 133	

LCS - Modified 03/06/2008
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LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.9	99.6	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	20.1	100	73 - 127	
Hexachlorobutadiene	20.0	19.1	95.7	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	18.7	93.3	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.0	94.9	65 - 123	
MEK (2-Butanone)	20.0	19.3	96.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.6	58 - 134	
n-Butylbenzene	20.0	21.4	107	69 - 137	
n-Propylbenzene	20.0	19.6	97.9	72 - 129	
m-,p-Xylene	40.0	40.6	102	76 - 128	
Naphthalene	20.0	21.2	106	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	19.5	97.3	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	19.0	95.1	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	20.4	102	66 - 128	
Toluene	20.0	19.2	96.1	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	20.7	103	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612295-02
Instrument ID: HPMS11 Run Time: 17:20 Prep Method: 5030B/5030C/503
File ID: 11M17937 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612295 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81656 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.3	96.3	81 - 129	
1,1,1-Trichloroethane	20.0	21.3	106	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.2	95.9	63 - 128	
1,1,2-Trichloroethane	20.0	19.3	96.4	75 - 125	
1,1-Dichloroethane	20.0	19.7	98.5	69 - 133	
1,1-Dichloroethene	20.0	19.9	99.7	68 - 130	
1,1-Dichloropropene	20.0	20.3	101	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.3	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.4	97.1	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.1	105	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.9	104	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.8	69 - 132	
1,2-Dichlorobenzene	20.0	20.3	101	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	18.0	90.1	50 - 132	
1,2-Dichloropropane	20.0	19.6	97.8	75 - 125	
1,2-Dibromoethane	20.0	19.5	97.4	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.2	106	74 - 131	
1,3-Dichlorobenzene	20.0	20.3	101	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	19.2	95.8	74 - 123	
1-Chlorohexane	20.0	21.9	110	70 - 125	
2,2-Dichloropropane	20.0	20.0	99.8	69 - 137	
2-Hexanone	20.0	19.6	98.0	55 - 130	
2-Chlorotoluene	20.0	18.1	90.7	73 - 126	
4-Chlorotoluene	20.0	20.6	103	74 - 128	
Acetone	20.0	18.5	92.3	40 - 135	
Benzene	20.0	20.1	100	81 - 122	
Bromobenzene	20.0	19.6	98.0	76 - 124	
Bromochloromethane	20.0	19.9	99.4	65 - 129	
Bromodichloromethane	20.0	19.2	96.0	76 - 121	
Bromoform	20.0	17.8	88.9	69 - 128	
Bromomethane	20.0	20.5	102	30 - 141	
Carbon disulfide	20.0	16.7	83.3	58 - 128	
Carbon tetrachloride	20.0	20.7	104	66 - 138	
Chlorobenzene	20.0	19.7	98.5	81 - 122	
Chloroethane	20.0	22.1	111	58 - 133	
Chloroform	20.0	20.8	104	69 - 128	
Chloromethane	20.0	15.3	76.4	56 - 131	
cis-1,2-Dichloroethene	20.0	19.6	98.2	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	19.3	96.5	66 - 133	

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Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612295-02
Instrument ID: HPMS11 Run Time: 17:20 Prep Method: 5030B/5030C/503
File ID: 11M17937 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612295 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81656 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.6	76 - 125	
Dichlorodifluoromethane	20.0	24.5	123	30 - 153	
Ethylbenzene	20.0	21.0	105	73 - 127	
Hexachlorobutadiene	20.0	19.8	99.1	67 - 131	
Isopropylbenzene	20.0	20.8	104	75 - 127	
Methylene chloride	20.0	19.0	94.8	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.4	65 - 123	
MEK (2-Butanone)	20.0	18.8	93.8	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.4	58 - 134	
n-Butylbenzene	20.0	22.0	110	69 - 137	
n-Propylbenzene	20.0	20.1	101	72 - 129	
m-,p-Xylene	40.0	41.8	104	76 - 128	
Naphthalene	20.0	20.9	105	54 - 138	
o-Xylene	20.0	20.5	102	80 - 121	
p-Isopropyltoluene	20.0	21.8	109	73 - 130	
sec-Butylbenzene	20.0	20.2	101	72 - 127	
Styrene	20.0	22.5	112	65 - 134	
Trichloroethene	20.0	19.1	95.4	70 - 127	
tert-Butylbenzene	20.0	19.4	97.1	70 - 129	
Tetrachloroethene	20.0	21.3	106	66 - 128	
Toluene	20.0	19.6	98.2	77 - 122	
trans-1,2-Dichloroethene	20.0	19.5	97.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.8	98.8	59 - 135	
Trichlorofluoromethane	20.0	20.6	103	57 - 129	
Vinyl chloride	20.0	16.1	80.7	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	93.8	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.2	96.2	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	19.7	98.4	68 - 130	
1,1-Dichloropropene	20.0	19.8	99.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.1	90.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.6	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.7	93.7	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	74 - 132	
1,2-Dichloroethane	20.0	19.5	97.3	69 - 132	
1,2-Dichlorobenzene	20.0	18.9	94.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	19.8	99.1	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.7	98.7	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.3	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	93.8	74 - 123	
1-Chlorohexane	20.0	20.6	103	70 - 125	
2,2-Dichloropropane	20.0	20.9	104	69 - 137	
2-Hexanone	20.0	20.6	103	55 - 130	
2-Chlorotoluene	20.0	19.2	95.8	73 - 126	
4-Chlorotoluene	20.0	19.9	99.7	74 - 128	
Acetone	20.0	19.0	94.9	40 - 135	
Benzene	20.0	19.7	98.4	81 - 122	
Bromobenzene	20.0	18.6	93.2	76 - 124	
Bromochloromethane	20.0	19.9	99.6	65 - 129	
Bromodichloromethane	20.0	19.2	96.1	76 - 121	
Bromoform	20.0	19.1	95.3	69 - 128	
Bromomethane	20.0	17.2	86.0	30 - 141	
Carbon disulfide	20.0	16.2	80.8	58 - 128	
Carbon tetrachloride	20.0	19.6	98.0	66 - 138	
Chlorobenzene	20.0	19.0	95.0	81 - 122	
Chloroethane	20.0	19.0	95.1	58 - 133	
Chloroform	20.0	20.1	101	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	19.3	96.6	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	18.9	94.6	66 - 133	

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Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.7	76 - 125	
Dichlorodifluoromethane	20.0	24.9	124	30 - 153	
Ethylbenzene	20.0	19.9	99.3	73 - 127	
Hexachlorobutadiene	20.0	17.5	87.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.5	75 - 127	
Methylene chloride	20.0	18.9	94.7	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.3	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.7	98.5	58 - 134	
n-Butylbenzene	20.0	20.3	101	69 - 137	
n-Propylbenzene	20.0	19.7	98.4	72 - 129	
m-,p-Xylene	40.0	39.6	99.1	76 - 128	
Naphthalene	20.0	18.1	90.6	54 - 138	
o-Xylene	20.0	19.3	96.5	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.6	73 - 130	
sec-Butylbenzene	20.0	19.6	98.0	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	18.1	90.7	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.3	96.5	66 - 128	
Toluene	20.0	19.9	99.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.7	98.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	20.5	103	57 - 129	
Vinyl chloride	20.0	23.1	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	99.4	81 - 120	PASS
4-Bromofluorobenzene	96.4	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612551-02
Instrument ID: HPMS17 Run Time: 19:53 Prep Method: 5030B/5030C/503
File ID: 17M0273264 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612551 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.3	96.5	81 - 129	
1,1,1-Trichloroethane	20.0	21.0	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.1	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.5	97.3	75 - 125	
1,1-Dichloroethane	20.0	21.0	105	69 - 133	
1,1-Dichloroethene	20.0	20.2	101	68 - 130	
1,1-Dichloropropene	20.0	20.3	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.9	89.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.3	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	93.9	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.2	101	74 - 132	
1,2-Dichloroethane	20.0	19.9	99.7	69 - 132	
1,2-Dichlorobenzene	20.0	19.1	95.7	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.4	97.2	50 - 132	
1,2-Dichloropropane	20.0	20.4	102	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.7	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.3	101	74 - 131	
1,3-Dichlorobenzene	20.0	19.7	98.4	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	19.4	96.9	74 - 123	
1-Chlorohexane	20.0	21.6	108	70 - 125	
2,2-Dichloropropane	20.0	21.6	108	69 - 137	
2-Hexanone	20.0	20.2	101	55 - 130	
2-Chlorotoluene	20.0	19.7	98.5	73 - 126	
4-Chlorotoluene	20.0	20.4	102	74 - 128	
Acetone	20.0	18.3	91.7	40 - 135	
Benzene	20.0	20.3	102	81 - 122	
Bromobenzene	20.0	19.1	95.4	76 - 124	
Bromochloromethane	20.0	20.3	101	65 - 129	
Bromodichloromethane	20.0	19.7	98.6	76 - 121	
Bromoform	20.0	19.0	95.1	69 - 128	
Bromomethane	20.0	19.2	96.1	30 - 141	
Carbon disulfide	20.0	16.3	81.4	58 - 128	
Carbon tetrachloride	20.0	20.5	102	66 - 138	
Chlorobenzene	20.0	19.6	98.0	81 - 122	
Chloroethane	20.0	19.5	97.3	58 - 133	
Chloroform	20.0	20.7	103	69 - 128	
Chloromethane	20.0	24.8	124	56 - 131	
cis-1,2-Dichloroethene	20.0	19.9	99.3	72 - 126	
cis-1,3-Dichloropropene	20.0	21.7	108	69 - 131	
Dibromochloromethane	20.0	19.1	95.3	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612551-02
Instrument ID: HPMS17 Run Time: 19:53 Prep Method: 5030B/5030C/503
File ID: 17M0273264 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612551 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.8	99.2	76 - 125	
Dichlorodifluoromethane	20.0	24.0	120	30 - 153	
Ethylbenzene	20.0	20.2	101	73 - 127	
Hexachlorobutadiene	20.0	18.5	92.3	67 - 131	
Isopropylbenzene	20.0	19.6	97.9	75 - 127	
Methylene chloride	20.0	19.6	97.8	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.0	99.9	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.5	97.6	58 - 134	
n-Butylbenzene	20.0	20.9	105	69 - 137	
n-Propylbenzene	20.0	20.3	102	72 - 129	
m-,p-Xylene	40.0	40.4	101	76 - 128	
Naphthalene	20.0	17.5	87.6	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	20.3	102	73 - 130	
sec-Butylbenzene	20.0	20.0	100	72 - 127	
Styrene	20.0	20.6	103	65 - 134	
Trichloroethene	20.0	19.1	95.4	70 - 127	
tert-Butylbenzene	20.0	19.5	97.4	70 - 129	
Tetrachloroethene	20.0	20.0	100	66 - 128	
Toluene	20.0	20.4	102	77 - 122	
trans-1,2-Dichloroethene	20.0	20.2	101	63 - 137	
trans-1,3-Dichloropropene	20.0	19.9	99.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	23.9	120	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	102	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612085-02
Instrument ID: HPMS6 Run Time: 21:09 Prep Method: 5030B/5030C/503
File ID: 6M146825 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612085 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.1	90.7	81 - 129	
1,1,1-Trichloroethane	20.0	19.9	99.3	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.8	98.8	63 - 128	
1,1,2-Trichloroethane	20.0	19.0	95.1	75 - 125	
1,1-Dichloroethane	20.0	20.5	102	69 - 133	
1,1-Dichloroethene	20.0	20.1	100	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.6	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.5	87.4	67 - 137	
1,2,3-Trichloropropane	20.0	19.6	98.1	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.1	90.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.6	98.2	74 - 132	
1,2-Dichloroethane	20.0	20.1	101	69 - 132	
1,2-Dichlorobenzene	20.0	18.2	90.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.4	102	50 - 132	
1,2-Dichloropropane	20.0	20.1	101	75 - 125	
1,2-Dibromoethane	20.0	18.9	94.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	74 - 131	
1,3-Dichlorobenzene	20.0	17.8	89.2	75 - 124	
1,3-Dichloropropane	20.0	20.6	103	73 - 126	
1,4-Dichlorobenzene	20.0	18.0	89.9	74 - 123	
1-Chlorohexane	20.0	20.4	102	70 - 125	
2,2-Dichloropropane	20.0	20.8	104	69 - 137	
2-Hexanone	20.0	22.3	112	55 - 130	
2-Chlorotoluene	20.0	19.6	98.2	73 - 126	
4-Chlorotoluene	20.0	19.2	96.0	74 - 128	
Acetone	20.0	23.4	117	40 - 135	
Benzene	20.0	19.2	95.9	81 - 122	
Bromobenzene	20.0	18.2	91.1	76 - 124	
Bromochloromethane	20.0	20.3	101	65 - 129	
Bromodichloromethane	20.0	19.1	95.4	76 - 121	
Bromoform	20.0	17.2	85.8	69 - 128	
Bromomethane	20.0	15.9	79.6	30 - 141	
Carbon disulfide	20.0	16.4	82.0	58 - 128	
Carbon tetrachloride	20.0	19.2	95.9	66 - 138	
Chlorobenzene	20.0	18.1	90.6	81 - 122	
Chloroethane	20.0	21.3	107	58 - 133	
Chloroform	20.0	18.3	91.6	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	18.9	94.5	72 - 126	
cis-1,3-Dichloropropene	20.0	21.4	107	69 - 131	
Dibromochloromethane	20.0	18.1	90.4	66 - 133	

LCS - Modified 03/06/2008
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Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612085-02
Instrument ID: HPMS6 Run Time: 21:09 Prep Method: 5030B/5030C/503
File ID: 6M146825 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612085 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.6	98.2	76 - 125	
Dichlorodifluoromethane	20.0	23.6	118	30 - 153	
Ethylbenzene	20.0	18.5	92.6	73 - 127	
Hexachlorobutadiene	20.0	17.2	86.2	67 - 131	
Isopropylbenzene	20.0	18.7	93.6	75 - 127	
Methylene chloride	20.0	19.0	94.9	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	21.2	106	65 - 123	
MEK (2-Butanone)	20.0	21.8	109	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.1	106	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	19.3	96.3	72 - 129	
m-,p-Xylene	40.0	37.3	93.4	76 - 128	
Naphthalene	20.0	18.6	93.1	54 - 138	
o-Xylene	20.0	18.9	94.6	80 - 121	
p-Isopropyltoluene	20.0	19.2	96.1	73 - 130	
sec-Butylbenzene	20.0	19.2	95.8	72 - 127	
Styrene	20.0	19.2	95.9	65 - 134	
Trichloroethene	20.0	17.3	86.6	70 - 127	
tert-Butylbenzene	20.0	18.6	92.9	70 - 129	
Tetrachloroethene	20.0	18.1	90.6	66 - 128	
Toluene	20.0	18.9	94.6	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	20.5	103	59 - 135	
Trichlorofluoromethane	20.0	18.9	94.7	57 - 129	
Vinyl chloride	20.0	22.0	110	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	107	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	107	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number:L17041203 Analyst:ADC Prep Method:5030B/5030C/503
Instrument ID:HPMS17 Matrix:Water Method:8260B
Workgroup (AAB#):WG612250 Units:ug/L
QC Key:AF40 Lot #:STD81596

Sample ID:WG612250-02 LCS File ID:17M0273206 Run Date:05/01/2017 13:09
Sample ID:WG612250-03 LCS2 File ID:17M0273207 Run Date:05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.9	94.5	20.0	19.4	97.0	2.58	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.3	101	20.0	21.0	105	3.24	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	21.3	106	20.0	22.3	111	4.49	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.3	96.5	20.0	19.9	99.5	3.04	75 - 125	20	
1,1-Dichloroethane	20.0	20.2	101	20.0	20.8	104	2.71	69 - 133	20	
1,1-Dichloroethene	20.0	20.3	102	20.0	20.4	102	0.506	68 - 130	20	
1,1-Dichloropropene	20.0	19.5	97.6	20.0	20.4	102	4.26	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	20.0	19.3	96.4	4.20	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.4	97.1	20.0	20.3	102	4.56	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	95.2	20.0	19.7	98.7	3.56	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.0	100	20.0	20.6	103	2.71	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.2	96.0	20.0	20.7	103	7.46	50 - 132	20	
1,2-Dibromoethane	20.0	19.2	95.8	20.0	19.6	97.9	2.24	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.4	96.8	20.0	19.8	99.2	2.43	71 - 122	20	
1,2-Dichloroethane	20.0	19.8	98.8	20.0	20.3	101	2.66	69 - 132	20	
1,2-Dichloropropane	20.0	19.7	98.7	20.0	20.5	103	3.74	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.9	99.5	20.0	20.5	103	3.22	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.4	97.1	20.0	20.0	99.9	2.92	75 - 124	20	
1,3-Dichloropropane	20.0	20.2	101	20.0	21.0	105	3.78	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.2	95.9	20.0	19.8	99.2	3.42	74 - 123	20	
1-Chlorohexane	20.0	20.7	104	20.0	21.7	108	4.47	70 - 125	20	
2,2-Dichloropropane	20.0	21.1	106	20.0	21.5	108	1.87	69 - 137	20	
MEK (2-Butanone)	20.0	18.5	92.6	20.0	19.6	97.9	5.47	49 - 136	20	
2-Chlorotoluene	20.0	19.5	97.3	20.0	20.0	99.9	2.55	73 - 126	20	
2-Hexanone	20.0	20.2	101	20.0	21.1	105	4.19	55 - 130	20	
4-Chlorotoluene	20.0	20.2	101	20.0	20.8	104	2.90	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	20.0	20.7	104	6.94	58 - 134	20	
Acetone	20.0	16.6	83.0	20.0	17.4	87.1	4.83	40 - 135	20	
Benzene	20.0	19.6	97.8	20.0	20.3	102	3.83	81 - 122	20	
Bromobenzene	20.0	18.9	94.7	20.0	19.4	97.2	2.55	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	20.6	103	2.87	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.0	20.0	19.8	98.9	2.99	76 - 121	20	
Bromoform	20.0	19.1	95.5	20.0	19.7	98.5	3.10	69 - 128	20	
Bromomethane	20.0	17.1	85.6	20.0	17.8	88.9	3.81	30 - 141	20	
Carbon disulfide	20.0	16.7	83.3	20.0	16.8	83.9	0.693	58 - 128	20	
Carbon tetrachloride	20.0	19.8	99.1	20.0	20.5	102	3.34	66 - 138	20	
Chlorobenzene	20.0	19.1	95.4	20.0	19.6	97.9	2.57	81 - 122	20	
Chloroethane	20.0	20.4	102	20.0	19.7	98.3	3.89	58 - 133	20	
Chloroform	20.0	20.1	100	20.0	20.8	104	3.41	69 - 128	20	
Chloromethane	20.0	21.9	109	20.0	22.9	114	4.56	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.3	96.4	20.0	20.0	100	3.87	72 - 126	20	
cis-1,3-Dichloropropene	20.0	21.1	105	20.0	21.9	110	3.82	69 - 131	20	
Dibromochloromethane	20.0	18.9	94.7	20.0	19.5	97.4	2.86	66 - 133	20	
Dibromomethane	20.0	19.8	98.8	20.0	20.4	102	3.09	76 - 125	20	
Dichlorodifluoromethane	20.0	24.8	124	20.0	24.6	123	0.901	30 - 153	20	
Ethylbenzene	20.0	19.5	97.7	20.0	20.2	101	3.09	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.5	92.3	1.53	67 - 131	20	
Isopropylbenzene	20.0	19.0	94.9	20.0	19.7	98.7	3.91	75 - 127	20	
m-,p-Xylene	40.0	39.2	98.0	40.0	40.4	101	2.97	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.6	98.1	20.0	20.1	101	2.56	65 - 123	20	
Methylene chloride	20.0	19.6	97.8	20.0	19.7	98.4	0.646	63 - 137	20	
n-Butylbenzene	20.0	20.6	103	20.0	21.2	106	3.05	69 - 137	20	
n-Propylbenzene	20.0	20.0	100	20.0	20.5	103	2.35	72 - 129	20	
Naphthalene	20.0	18.1	90.5	20.0	19.3	96.4	6.35	54 - 138	20	
o-Xylene	20.0	19.2	95.9	20.0	19.8	99.1	3.25	80 - 121	20	
p-Isopropyltoluene	20.0	20.0	99.8	20.0	20.6	103	3.11	73 - 130	20	
sec-Butylbenzene	20.0	19.8	99.0	20.0	20.3	102	2.65	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.8	104	2.70	65 - 134	20	
tert-Butylbenzene	20.0	19.3	96.6	20.0	19.7	98.5	2.03	70 - 129	20	
Tetrachloroethene	20.0	19.3	96.4	20.0	19.9	99.4	3.05	66 - 128	20	
Toluene	20.0	19.8	98.9	20.0	20.4	102	2.98	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.6	98.0	20.0	20.1	100	2.26	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.5	97.7	20.0	20.6	103	5.06	59 - 135	20	
Trichloroethene	20.0	18.1	90.5	20.0	18.7	93.5	3.26	70 - 127	20	
Trichlorofluoromethane	20.0	21.0	105	20.0	21.1	106	0.598	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	23.5	118	1.49	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	103	72 - 119	PASS
Dibromofluoromethane	103	101	85 - 115	PASS
4-Bromofluorobenzene	109	102	76 - 119	PASS
Toluene-d8	105	102	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS6- 05-APR-17 Worknum: WG612085

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-10 File ID: 6M146830 Dil: 1 Method: 5035A

Sample ID: L17041203-11 MS File ID: 6M146826 Dil: 1 Matrix: 8260B

Sample ID: L17041203-12 MSD File ID: 6M146827 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.7	93.3	20.0	18.3	91.7	1.74	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.4	102	20.0	19.7	98.6	3.13	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.3	107	20.0	21.5	107	0.784	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.8	98.8	20.0	19.7	98.4	0.422	75 - 125	20	
1,1-Dichloroethane	U	20.0	21.4	107	20.0	21.1	105	1.39	69 - 133	20	
1,1-Dichloroethene	U	20.0	20.7	104	20.0	20.6	103	0.867	68 - 130	20	
1,1-Dichloropropene	U	20.0	20.2	101	20.0	20.0	99.8	1.28	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	17.8	88.9	20.0	17.6	88	0.989	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.7	103	20.0	20.5	102	0.918	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.5	92.4	20.0	18.5	92.4	0.0012	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	102	20.0	20.0	100	1.36	74 - 132	20	
1,2-Dichloroethane	U	20.0	20.9	104	20.0	20.9	104	0.0869	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.7	93.5	20.0	18.8	93.8	0.388	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.7	114	20.0	21.5	108	5.29	50 - 132	20	
1,2-Dichloropropane	U	20.0	21.2	106	20.0	20.9	105	1.43	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.1	95.7	20.0	19.2	95.9	0.236	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.1	101	20.0	19.9	99.4	1.30	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.8	93.9	20.0	18.4	92.1	1.93	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.3	106	20.0	21.2	106	0.343	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.7	93.7	20.0	18.7	93.3	0.433	74 - 123	20	
1-Chlorohexane	U	20.0	20.7	104	20.0	20.3	102	1.79	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.2	101	20.0	16.1	80.6	22.6	69 - 137	20	#
2-Hexanone	U	20.0	23.6	118	20.0	23.6	118	0.163	55 - 130	20	
2-Chlorotoluene	U	20.0	20.2	101	20.0	19.1	95.7	5.19	73 - 126	20	
4-Chlorotoluene	U	20.0	20.4	102	20.0	20.8	104	2.00	74 - 128	20	
Acetone	U	20.0	25.0	125	20.0	24.6	123	1.62	40 - 135	20	
Benzene	U	20.0	19.8	99.1	20.0	19.7	98.3	0.748	81 - 122	20	
Bromobenzene	U	20.0	19.1	95.3	20.0	18.7	93.4	2.08	76 - 124	20	
Bromochloromethane	U	20.0	20.1	100	20.0	19.8	99.2	1.25	65 - 129	20	
Bromodichloromethane	U	20.0	20.0	99.8	20.0	19.6	97.9	1.91	76 - 121	20	
Bromoform	U	20.0	17.8	89.2	20.0	18.0	89.8	0.710	69 - 128	20	
Bromomethane	U	20.0	16.8	83.8	20.0	17.2	85.8	2.34	30 - 141	20	
Carbon disulfide	U	20.0	16.9	84.6	20.0	16.6	82.9	2.02	58 - 128	20	
Carbon tetrachloride	U	20.0	19.1	95.4	20.0	18.2	90.8	4.99	66 - 138	20	
Chlorobenzene	U	20.0	18.8	94.2	20.0	18.6	93	1.31	81 - 122	20	
Chloroethane	U	20.0	22.0	110	20.0	21.4	107	2.66	58 - 133	20	
Chloroform	U	20.0	19.0	94.9	20.0	18.9	94.4	0.566	69 - 128	20	
Chloromethane	U	20.0	21.5	108	20.0	21.3	107	1.04	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	19.7	98.7	20.0	19.5	97.7	1.06	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.0	110	20.0	21.8	109	0.904	69 - 131	20	
Dibromochloromethane	U	20.0	18.7	93.5	20.0	18.7	93.7	0.220	66 - 133	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS6 05-APR-17 Worknum: WG612085

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-10 File ID: 6M146830 Dil: 1 Method: 5035A

Sample ID: L17041203-11 MS File ID: 6M146826 Dil: 1 Matrix: 8260B

Sample ID: L17041203-12 MSD File ID: 6M146827 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.1	101	20.0	20.2	101	0.473	76 - 125	20	
Dichlorodifluoromethane	U	20.0	23.0	115	20.0	22.5	112	2.38	30 - 153	20	
Ethylbenzene	U	20.0	18.9	94.7	20.0	18.7	93.4	1.40	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.2	91	20.0	17.9	89.3	1.86	67 - 131	20	
Isopropylbenzene	U	20.0	19.2	96.1	20.0	19.1	95.5	0.577	75 - 127	20	
Methylene chloride	U	20.0	19.6	98.2	20.0	19.7	98.7	0.558	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	21.7	108	20.0	21.7	109	0.215	65 - 123	20	
MEK (2-Butanone)	U	20.0	22.8	114	20.0	22.5	112	1.54	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	21.6	108	20.0	22.1	110	1.93	58 - 134	20	
n-Butylbenzene	U	20.0	20.7	104	20.0	20.4	102	1.49	69 - 137	20	
n-Propylbenzene	U	20.0	20.2	101	20.0	19.6	98.1	2.95	72 - 129	20	
m-,p-Xylene	U	40.0	38.3	95.7	40.0	38.1	95.2	0.484	76 - 128	20	
Naphthalene	U	20.0	19.5	97.5	20.0	19.6	98	0.548	54 - 138	20	
o-Xylene	U	20.0	19.4	97.2	20.0	19.4	97.1	0.151	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.1	100	20.0	19.8	99.1	1.21	73 - 130	20	
sec-Butylbenzene	U	20.0	19.9	99.3	20.0	19.5	97.5	1.77	72 - 127	20	
Styrene	U	20.0	19.6	98	20.0	19.7	98.5	0.431	65 - 134	20	
Trichloroethene	U	20.0	17.8	89.1	20.0	17.7	88.3	0.914	70 - 127	20	
tert-Butylbenzene	U	20.0	19.5	97.5	20.0	19.2	96	1.56	70 - 129	20	
Tetrachloroethene	U	20.0	18.6	93.1	20.0	18.3	91.6	1.71	66 - 128	20	
Toluene	U	20.0	19.6	97.9	20.0	19.5	97.5	0.441	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.7	98.6	20.0	19.1	95.4	3.28	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.0	99.8	4.27	59 - 135	20	
Trichlorofluoromethane	U	20.0	18.9	94.5	20.0	18.4	91.9	2.74	57 - 129	20	
Vinyl chloride	U	20.0	20.5	102	20.0	20.8	104	1.44	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS11- 24-APR-17 Worknum: WG612123

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-01 File ID: 11M17877 Dil: 1 Method: 5035A

Sample ID: L17041203-02 MS File ID: 11M17873 Dil: 1 Matrix: 8260B

Sample ID: L17041203-03 MSD File ID: 11M17874 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.3	91.5	20.0	18.0	90.2	1.45	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.1	95.7	20.0	19.3	96.7	1.01	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.2	101	20.0	19.0	95	6.33	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.8	93.8	20.0	18.3	91.7	2.19	75 - 125	20	
1,1-Dichloroethane	U	20.0	18.6	92.9	20.0	18.7	93.7	0.851	69 - 133	20	
1,1-Dichloroethene	U	20.0	17.8	89	20.0	17.8	89.2	0.224	68 - 130	20	
1,1-Dichloropropene	U	20.0	18.7	93.7	20.0	18.3	91.5	2.41	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.1	106	20.0	19.6	97.8	7.78	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.0	99.9	20.0	18.5	92.6	7.57	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	21.9	109	20.0	20.8	104	5.23	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.9	104	20.0	19.6	97.9	6.39	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.2	95.8	20.0	19.2	95.8	0.0426	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.6	103	20.0	19.3	96.7	6.49	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	19.3	96.5	20.0	18.9	94.6	2.05	50 - 132	20	
1,2-Dichloropropane	U	20.0	18.7	93.7	20.0	18.9	94.7	1.06	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.5	97.3	20.0	18.8	94.2	3.28	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.7	103	20.0	19.7	98.3	5.12	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.3	101	20.0	19.4	97.1	4.33	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.9	99.3	20.0	19.3	96.3	3.03	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.6	97.8	20.0	18.2	90.9	7.32	74 - 123	20	
1-Chlorohexane	U	20.0	20.1	101	20.0	19.6	97.8	2.84	70 - 125	20	
2,2-Dichloropropane	U	20.0	18.4	91.8	20.0	18.2	91	0.921	69 - 137	20	
2-Hexanone	U	20.0	21.2	106	20.0	20.5	102	3.25	55 - 130	20	
2-Chlorotoluene	U	20.0	18.6	93	20.0	17.2	85.9	7.97	73 - 126	20	
4-Chlorotoluene	U	20.0	20.1	100	20.0	18.8	94.1	6.52	74 - 128	20	
Acetone	4.84	20.0	22.6	89	20.0	21.7	84.3	4.27	40 - 135	20	
Benzene	U	20.0	18.6	93.2	20.0	18.9	94.4	1.22	81 - 122	20	
Bromobenzene	U	20.0	19.7	98.7	20.0	19.0	94.8	4.01	76 - 124	20	
Bromochloromethane	U	20.0	18.5	92.6	20.0	18.5	92.6	0.0342	65 - 129	20	
Bromodichloromethane	U	20.0	18.7	93.6	20.0	18.7	93.7	0.0206	76 - 121	20	
Bromoform	U	20.0	18.3	91.5	20.0	17.3	86.7	5.35	69 - 128	20	
Bromomethane	U	20.0	18.5	92.4	20.0	17.9	89.5	3.21	30 - 141	20	
Carbon disulfide	U	20.0	13.5	67.6	20.0	13.2	66.1	2.24	58 - 128	20	
Carbon tetrachloride	U	20.0	18.8	93.9	20.0	18.5	92.6	1.33	66 - 138	20	
Chlorobenzene	U	20.0	18.9	94.7	20.0	18.6	93.1	1.72	81 - 122	20	
Chloroethane	U	20.0	20.5	102	20.0	20.4	102	0.444	58 - 133	20	
Chloroform	U	20.0	20.0	99.9	20.0	19.8	99.1	0.853	69 - 128	20	
Chloromethane	U	20.0	17.4	87.1	20.0	17.4	86.9	0.261	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	18.2	91.1	20.0	18.7	93.6	2.70	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	19.9	99.7	20.0	20.6	103	3.05	69 - 131	20	
Dibromochloromethane	U	20.0	18.7	93.6	20.0	18.7	93.5	0.0795	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS11 24-APR-17 Worknum: WG612123

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-01 File ID: 11M17877 Dil: 1 Method: 5035A

Sample ID: L17041203-02 MS File ID: 11M17873 Dil: 1 Matrix: 8260B

Sample ID: L17041203-03 MSD File ID: 11M17874 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	18.9	94.4	20.0	19.5	97.3	2.96	76 - 125	20	
Dichlorodifluoromethane	U	20.0	21.0	105	20.0	20.5	102	2.48	30 - 153	20	
Ethylbenzene	U	20.0	19.6	98.1	20.0	19.1	95.5	2.70	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.1	101	20.0	18.5	92.4	8.60	67 - 131	20	
Isopropylbenzene	U	20.0	19.6	97.9	20.0	19.2	95.9	2.05	75 - 127	20	
Methylene chloride	U	20.0	17.9	89.4	20.0	18.3	91.3	2.03	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	18.7	93.6	20.0	18.7	93.4	0.189	65 - 123	20	
MEK (2-Butanone)	U	20.0	19.4	96.8	20.0	19.1	95.4	1.40	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	18.0	89.9	20.0	18.2	91.1	1.42	58 - 134	20	
n-Butylbenzene	U	20.0	22.1	111	20.0	20.7	104	6.54	69 - 137	20	
n-Propylbenzene	U	20.0	19.7	98.4	20.0	18.5	92.5	6.25	72 - 129	20	
m-,p-Xylene	U	40.0	39.5	98.7	40.0	38.9	97.3	1.51	76 - 128	20	
Naphthalene	U	20.0	22.4	112	20.0	21.0	105	6.46	54 - 138	20	
o-Xylene	U	20.0	19.6	98.2	20.0	19.1	95.7	2.59	80 - 121	20	
p-Isopropyltoluene	U	20.0	21.5	107	20.0	20.2	101	6.15	73 - 130	20	
sec-Butylbenzene	U	20.0	19.5	97.5	20.0	18.5	92.5	5.27	72 - 127	20	
Styrene	U	20.0	21.8	109	20.0	21.1	105	3.42	65 - 134	20	
Trichloroethene	1.20	20.0	18.2	85	20.0	18.4	85.8	0.911	70 - 127	20	
tert-Butylbenzene	U	20.0	18.8	94	20.0	17.5	87.3	7.37	70 - 129	20	
Tetrachloroethene	U	20.0	19.4	96.8	20.0	18.8	93.8	3.18	66 - 128	20	
Toluene	U	20.0	18.7	93.6	20.0	18.2	91	2.78	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	17.5	87.6	20.0	17.6	88.2	0.646	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.5	97.5	20.0	19.1	95.3	2.31	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.4	97	20.0	18.9	94.6	2.53	57 - 129	20	
Vinyl chloride	U	20.0	20.7	103	20.0	20.0	99.9	3.53	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS17- 26-APR-17 Worknum: WG612142

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-19 File ID: 17M0273188 Dil: 1 Method: 5035A

Sample ID: L17041203-20 MS File ID: 17M0273177 Dil: 1 Matrix: 8260B

Sample ID: L17041203-21 MSD File ID: 17M0273178 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.7	93.7	20.0	18.2	91.1	2.89	81 - 129	20	
1,1,1-Trichloroethane	0.817	20.0	20.9	100	20.0	20.4	97.8	2.56	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.4	107	20.0	21.3	106	0.686	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.5	97.7	20.0	18.9	94.6	3.17	75 - 125	20	
1,1-Dichloroethane	0.632	20.0	20.7	100	20.0	20.3	98.1	2.23	69 - 133	20	
1,1-Dichloroethene	9.50	20.0	26.9	87.1	20.0	26.8	86.3	0.617	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.6	98.1	20.0	19.2	95.8	2.34	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	18.3	91.3	20.0	17.4	86.8	5.11	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	96	20.0	19.0	94.8	1.27	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.8	94	20.0	18.0	89.8	4.59	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.5	97.5	20.0	19.0	94.8	2.80	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.9	99.7	20.0	19.4	97.1	2.65	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.9	94.5	20.0	18.3	91.6	3.07	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	20.3	102	20.0	20.1	101	1.00	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.9	99.6	20.0	19.5	97.5	2.15	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.2	96.1	20.0	18.6	92.9	3.35	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.5	97.7	20.0	18.8	94.1	3.77	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.0	94.8	20.0	18.3	91.7	3.34	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.6	103	20.0	19.9	99.6	3.24	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.8	94	20.0	18.4	92.1	2.01	74 - 123	20	
1-Chlorohexane	U	20.0	20.6	103	20.0	20.1	101	2.26	70 - 125	20	
2,2-Dichloropropane	U	20.0	21.4	107	20.0	20.8	104	3.07	69 - 137	20	
2-Hexanone	U	20.0	21.7	108	20.0	21.1	106	2.52	55 - 130	20	
2-Chlorotoluene	U	20.0	18.9	94.7	20.0	18.5	92.7	2.07	73 - 126	20	
4-Chlorotoluene	U	20.0	19.8	98.8	20.0	19.4	96.9	1.95	74 - 128	20	
Acetone	7.26	20.0	25.4	90.9	20.0	25.3	90.2	0.561	40 - 135	20	
Benzene	U	20.0	19.7	98.7	20.0	19.2	96.1	2.66	81 - 122	20	
Bromobenzene	U	20.0	18.4	92.1	20.0	18.0	90.2	2.13	76 - 124	20	
Bromochloromethane	U	20.0	20.1	101	20.0	19.4	97.2	3.42	65 - 129	20	
Bromodichloromethane	U	20.0	19.2	96.1	20.0	18.8	93.9	2.28	76 - 121	20	
Bromoform	U	20.0	19.1	95.4	20.0	18.6	92.8	2.76	69 - 128	20	
Bromomethane	U	20.0	16.8	84.2	20.0	16.9	84.4	0.186	30 - 141	20	
Carbon disulfide	U	20.0	16.0	79.8	20.0	16.0	80.1	0.430	58 - 128	20	
Carbon tetrachloride	U	20.0	19.6	97.9	20.0	19.0	94.9	3.09	66 - 138	20	
Chlorobenzene	U	20.0	19.0	95.1	20.0	18.5	92.3	2.96	81 - 122	20	
Chloroethane	U	20.0	18.7	93.6	20.0	18.8	94.2	0.563	58 - 133	20	
Chloroform	0.333	20.0	20.3	100	20.0	19.9	97.8	2.12	69 - 128	20	
Chloromethane	U	20.0	22.2	111	20.0	22.1	111	0.516	56 - 131	20	
cis-1,2-Dichloroethene	0.387	20.0	19.8	97.1	20.0	19.3	94.8	2.32	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	21.1	105	20.0	20.6	103	2.23	69 - 131	20	
Dibromochloromethane	U	20.0	19.1	95.5	20.0	18.5	92.3	3.44	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS17 26-APR-17 Worknum: WG612142

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-19 File ID: 17M0273188 Dil: 1 Method: 5035A

Sample ID: L17041203-20 MS File ID: 17M0273177 Dil: 1 Matrix: 8260B

Sample ID: L17041203-21 MSD File ID: 17M0273178 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	19.8	98.8	20.0	19.3	96.5	2.35	76 - 125	20	
Dichlorodifluoromethane	U	20.0	24.4	122	20.0	24.2	121	0.875	30 - 153	20	
Ethylbenzene	U	20.0	19.6	98.2	20.0	18.8	94	4.33	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.9	89.3	20.0	16.5	82.5	7.90	67 - 131	20	
Isopropylbenzene	U	20.0	19.1	95.3	20.0	18.1	90.5	5.13	75 - 127	20	
Methylene chloride	U	20.0	19.1	95.3	20.0	18.5	92.6	2.82	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.8	98.9	20.0	19.5	97.7	1.16	65 - 123	20	
MEK (2-Butanone)	U	20.0	20.8	104	20.0	20.4	102	1.91	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	20.9	104	20.0	20.3	101	2.82	58 - 134	20	
n-Butylbenzene	U	20.0	20.3	101	20.0	19.2	95.9	5.45	69 - 137	20	
n-Propylbenzene	U	20.0	19.5	97.3	20.0	18.8	94	3.44	72 - 129	20	
m-,p-Xylene	U	40.0	39.0	97.4	40.0	37.6	94.1	3.47	76 - 128	20	
Naphthalene	U	20.0	18.5	92.7	20.0	18.0	89.8	3.19	54 - 138	20	
o-Xylene	U	20.0	19.2	96.1	20.0	18.5	92.7	3.65	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.6	98.2	20.0	18.8	93.9	4.51	73 - 130	20	
sec-Butylbenzene	U	20.0	19.4	96.9	20.0	18.3	91.7	5.51	72 - 127	20	
Styrene	U	20.0	20.3	102	20.0	19.5	97.6	3.95	65 - 134	20	
Trichloroethene	49.1	20.0	61.0	59.7	20.0	59.7	53	2.21	70 - 127	20	*
tert-Butylbenzene	U	20.0	18.7	93.3	20.0	18.0	89.8	3.88	70 - 129	20	
Tetrachloroethene	22.5	20.0	39.0	82.1	20.0	37.3	73.9	4.30	66 - 128	20	
Toluene	U	20.0	19.7	98.6	20.0	19.2	96	2.74	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.5	97.5	20.0	19.0	95	2.57	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.1	100	20.0	19.4	97	3.44	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.0	99.8	20.0	19.9	99.6	0.270	57 - 129	20	
Vinyl chloride	U	20.0	22.5	112	20.0	22.8	114	1.27	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5268577

Report generated 07/25/2017 13:47

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:	**Example**
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144707	WG598323-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 08:36
6M144708	WG598323-02 5ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:02
6M144709	WG598323-03 20ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 09:37
6M144710	WG598323-04 50ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:10
6M144711	WG598323-05 100ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 10:42
6M144712	WG598323-06 200ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:14
6M144713	WG598323-07 300ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 11:47
6M144714	WG598323-08 400ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:19
6M144715	WG598323-09 500ug/L A9/FOO STD	NA	1	1	STD79571	01/12/17 12:52
6M144716	rinse	NA	1	1		01/12/17 13:25
6M144717	WG598323-10 100ug/L ALT SRC STD A9/F	NA	1	1	STD79496	01/12/17 13:56
6M144718	WG598430-01 50ng BFB STD 8260	NA	1	1	STD79474	01/12/17 14:27
6M144719	WG598430-02 50ug/L CCV STD 8260	NA	1	1	STD79829	01/12/17 14:52
6M144720	WG598452-01 100ug/L A9 CCV STD 8260	NA	1	1	STD79571	01/12/17 15:27
6M144721	WG598431-01 VBLK0112 BLANK STD 826	NA	1	1		01/12/17 15:59
6M144722	WG598431-02 20ug/L LCS STD 8260	NA	1	1	STD79908	01/12/17 16:32
6M144723	L16120615-05 B MS 826-A9-SPE	7	1	1	STD79909	01/12/17 17:04
6M144724	L16120615-06 B MSD 826-A9-SPE	7	1	1	STD79909	01/12/17 17:37
6M144725	WG598431-03 100ug/L A9/FOO LCS	NA	1	1	STD79496	01/12/17 18:09
6M144726	L16120718-01 B TB 826-AP-SPE	<2	1	1		01/12/17 18:42
6M144727	L16120973-01 B TB 826-AP-SPE	<2	1	1		01/12/17 19:14
6M144728	L16120615-01 B 826-AP-SPE	7	1	1		01/12/17 19:46
6M144729	L16120615-02 B 826-AP-SPE	7	1	1		01/12/17 20:19
6M144730	L16120615-03 B EB 826-AP-SPE	4	1	1		01/12/17 20:51
6M144731	L16120615-04 B RS 826-AP-SPE	7	1	1		01/12/17 21:23
6M144732	L16120615-07 B 826-AP-SPE	4	1	1		01/12/17 21:55
6M144733	L16120615-08 B 826-AP-SPE	7	1	1		01/12/17 22:27
6M144734	L16120615-09 B 826-AP-SPE	7	1	1		01/12/17 22:59
6M144735	L16120718-02 B 826-AP-SPE	7	1	1		01/12/17 23:31
6M144736	L16120718-03 B 826-AP-SPE	7	1	1		01/13/17 00:03
6M144737	L16120718-04 B 826-AP-SPE	4	1	1		01/13/17 00:36
6M144738	L16120718-05 B 826-AP-SPE	4	1	1		01/13/17 01:08
6M144739	L16120718-06 B 826-AP-SPE	7	1	1		01/13/17 01:40
6M144740	L16120718-07 B 826-AP-SPE	7	1	1		01/13/17 02:12

Approved: January 13, 2017

Sarah Vandenberg

Microbac

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 011217
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01 Rev: 24
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01 Rev: 18
Maintenance Log ID: 54037

Internal Standard: STD79772 Surrogate Standard: STD79772
CCV: STD79829; STD79571 LCS: STD79908; STD79496 MS/MSD: STD79909

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG598323; WG598431

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M144741	RINSE	NA	1	1		01/13/17 02:44
6M144742	WG598431-07 VBLK0112 BLANK STD 624	NA	2	1		01/13/17 03:16
6M144743	L17010300-04 A 624	7	2	1		01/13/17 03:47
6M144744	L17010466-03 A 624-SPE	7	2	1		01/13/17 04:20
6M144745	L17010446-02 A 624-SPE1	7	2	1		01/13/17 04:52
6M144746	CCV	NA	1	1		01/13/17 05:24
6M144747	RINSE	NA	1	1		01/13/17 05:56
6M144748	RINSE	NA	1	1		01/13/17 06:28

Approved: January 13, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040517
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54116

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194 LCS: STD81257 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608938

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146219	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:24
6M146220	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 14:38
6M146221	WG608938-01 50ng BFB STD 8260	NA	1	1	STD80989	04/05/17 16:29
6M146222	RINSE	NA	1	1	STD80989	04/05/17 16:54
6M146223	WG608938-02 0.3ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:25
6M146224	WG608938-03 0.4ug/L STD 8260	NA	1	1	STD81194	04/05/17 17:57
6M146225	WG608938-04 1ug/L STD 8260	NA	1	1	STD81194	04/05/17 18:28
6M146226	WG608938-05 2ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:00
6M146227	WG608938-06 5ug/L STD 8260	NA	1	1	STD81194	04/05/17 19:31
6M146228	WG608938-07 20ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:02
6M146229	WG608938-08 50ug/L STD 8260	NA	1	1	STD81194	04/05/17 20:34
6M146230	WG608938-09 100ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:06
6M146231	WG608938-10 200ug/L STD 8260	NA	1	1	STD81194	04/05/17 21:37
6M146232	WG608938-11 300ug/L STD 8260	NA	1	1	STD81194	04/05/17 22:09
6M146233	RINSE	NA	1	1		04/05/17 22:40

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1	X			
File ID: 6M146219				
	Tune failed, DNR.			
2	X			
File ID: 6M146220				
	Tune failed, DNR. Clipped the column and repalced the ferrule on the column.			

Approved: April 07, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146234	RINSE	NA	1	1		04/06/17 12:16
6M146235	RINSE	NA	1	1		04/06/17 13:19
6M146236	WG609128-01 50ng BFB STD 8260	NA	1	1	STD80989	04/06/17 13:59
6M146237	WG609128-02 50ug/L CCV STD 8260	NA	1	1	STD81194	04/06/17 14:24
6M146238	WG608979-01 100ug/L A9 CCV STD 8260	NA	1	1	STD80642	04/06/17 14:54
6M146239	WG608987-01 VBLK0406 BLANK STD 826	NA	1	1		04/06/17 15:26
6M146240	WG608938-12 20ug/L ALT SRC STD 8260	NA	1	1	STD81257	04/06/17 15:57
6M146241	WG608987-02 20ug/L LCS STD 8260	NA	1	1	STD81257	04/06/17 16:28
6M146242	L17040128-01 B 1000X 826-SPE D1	<2	1	1000		04/06/17 16:59
6M146243	L17031533-15 A 826-SPE	<2	1	1		04/06/17 17:30
6M146244	L17031574-17 A RS 826-SPE	NA	1	1		04/06/17 18:01
6M146245	L17031574-18 A MS 826-SPE	NA	1	1	STD81257	04/06/17 18:32
6M146246	L17031574-19 A MSD 826-SPE	NA	1	1	STD81257	04/06/17 19:02
6M146247	L17040128-02 B 200X 826-SPE D1	10	1	200		04/06/17 19:32
6M146248	L17031574-28 TB A 826-SPE	<2	1	1		04/06/17 20:03
6M146249	L17031690-02 TB A 826-SPE	<2	1	1		04/06/17 20:33
6M146250	L17040002-01 LOQ 826-SPE	NA	1	1	STD81310	04/06/17 21:03
6M146251	L17040004-01 LOD 826-SPE	NA	1	1	STD81310	04/06/17 21:33
6M146252	L17031690-01 A 826-SPE	<2	1	1		04/06/17 22:04
6M146253	L17031574-25 A 826-SPE	<2	1	1		04/06/17 22:34
6M146254	L17031574-24 A 826-SPE	<2	1	1		04/06/17 23:04
6M146255	L17031574-27 A 2.5X 826-SPE	<2	1	2.5		04/06/17 23:35
6M146256	L17031574-26 A 826-SPE	<2	1	1		04/07/17 00:05
6M146257	L17031574-23 A 826-SPE	<2	1	1		04/07/17 00:35
6M146258	L17040173-01 A 10X 826-TC	5	17	10		04/07/17 01:06
6M146259	ccv	NA	1	1		04/07/17 01:36
6M146260	rinse	NA	1	1		04/07/17 02:06
6M146261	rinse	NA	1	1		04/07/17 02:36
6M146262	WG608867-01 A FBLK 10X 826-TC	NA	17	10		04/07/17 03:06

Comments

Seq.	Rerun	Dil.	Reason	Analytes
14	X	1000	Over Calibration Range	D.ETHER

Approved: April 07, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 040617
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/ OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/ OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81235 Surrogate Standard: STD81235
CCV: STD81194; STD80642 LCS: STD81257 MS/MSD: STD81257

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG608987

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
File ID: 6M146247				
20	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146253				
21	X	5	Over Calibration Range	CIS12-DCE
File ID: 6M146254				

Approved: April 07, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 041117
Analyst1: FJB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD80956 Surrogate Standard: STD80957
CCV: NA LCS: STD81404 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG609769

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17453	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:40
11M17454	WG609769-01 BFB 50ng A9	NA	1	1	STD80989	04/11/17 17:59
11M17455	RINSE	NA	1	1		04/11/17 18:23
11M17456	WG609769-02 5ug/L STD A9	NA	1	1	STD81397	04/11/17 18:52
11M17457	WG609769-03 20ug/L STD A9	NA	1	1	STD81397	04/11/17 19:20
11M17458	WG609769-04 50ug/L STD A9	NA	1	1	STD81397	04/11/17 19:50
11M17459	WG609769-05 100ug/L STD A9	NA	1	1	STD81397	04/11/17 20:20
11M17460	WG609769-06 200ug/L STD A9	NA	1	1	STD81397	04/11/17 20:49
11M17461	WG609769-07 300ug/L STD A9	NA	1	1	STD81397	04/11/17 21:18
11M17462	WG609769-08 400ug/L STD A9	NA	1	1	STD81397	04/11/17 21:47
11M17463	WG609769-09 500ug/L STD A9	NA	1	1	STD81397	04/11/17 22:17
11M17464	RINSE	NA	1	1		04/11/17 22:47
11M17465	RINSE	NA	1	1		04/11/17 23:17
11M17466	WG609769-10 100ug/L ICV A9	NA	1	1	STD81404	04/11/17 23:46

Approved: April 24, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042417
Analyst1: JDS Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54137

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611320

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17701	WG611320-02 50ug/L CCV 8260	NA	1	1	STD81577	04/24/17 14:20
11M17704	RINSE	NA	1	1	STD81491	04/24/17 15:18
11M17705	WG611320-01 BFB 50ng 8260	NA	1	1	STD81491	04/24/17 16:08
11M17706	RINSE	NA	1	1	STD81577	04/24/17 16:32
11M17707	WG611320-02 .3ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:01
11M17708	WG611320-03 .4ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:30
11M17709	WG611320-04 1ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 17:59
11M17710	WG611320-05 2ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:29
11M17711	WG611320-06 5ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 18:58
11M17712	WG611320-07 20ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:27
11M17713	WG611320-08 50ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 19:57
11M17714	WG611320-09 100ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:27
11M17715	WG611320-10 200ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 20:56
11M17716	WG611320-11 300ug/L ICAL 8260	NA	1	1	STD81577	04/24/17 21:26
11M17717	RINSE	NA	1	1		04/24/17 21:56
11M17718	WG611320-12 50ug/L ICV 8260	NA	1	1	STD81583	04/24/17 22:26

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 042517
Analyst1: ADC Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81583 MS/MSD: NA

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG611545, WG611456

Comments: MDLS need RR for DCDF

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273002	WG611454-01 BFB 50ng 8260	NA	1	1	STD81491	04/25/17 20:07
17M0273003	RINSE	NA	1	1		04/25/17 20:25
17M0273004	WG611454-02 0.3ug/L STD 8260	NA	1	1	STD81577	04/25/17 20:45
17M0273005	WG611454-03 0.4ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:05
17M0273006	WG611454-04 1ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:24
17M0273007	WG611454-05 2ug/L STD 8260	NA	1	1	STD81577	04/25/17 21:56
17M0273008	WG611454-06 5ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:15
17M0273009	WG611454-07 20ug/L STD 8260	NA	1	1	STD81577	04/25/17 22:46
17M0273010	WG611454-08 50ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:06
17M0273011	WG611454-09 100ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:38
17M0273012	WG611454-10 200ug/L STD 8260	NA	1	1	STD81577	04/25/17 23:58
17M0273013	WG611454-11 300ug/L STD 8260	NA	1	1	STD81577	04/26/17 00:33
17M0273014	RINSE	NA	1	1		04/26/17 00:53
17M0273015	WG611454-12 50ug/L ICV 8260	NA	1	1	STD81596	04/26/17 01:35
17M0273016	RINSE	NA	1	1		04/26/17 02:19
17M0273017	WG611456-01 BLANK 8260	NA	1	1		04/26/17 02:53
17M0273018	L17041271-01 MDL	NA	1	1	STD81596	04/26/17 03:32
17M0273019	L17041271-02 MDL	NA	1	1	STD81596	04/26/17 04:14
17M0273020	L17041271-03 MDL	NA	1	1	STD81596	04/26/17 04:34
17M0273021	L17041271-04 MDL	NA	1	1	STD81596	04/26/17 05:22
17M0273022	L17041271-05 MDL	NA	1	1	STD81596	04/26/17 05:58
17M0273023	L17041271-06 MDL	NA	1	1	STD81596	04/26/17 06:18
17M0273024	L17041271-07 MDL	NA	1	1	STD81596	04/26/17 07:01
17M0273025	L17040002-01 LOD	NA	1	1	STD81596	04/26/17 07:21
17M0273026	L17040004-01 LOQ	NA	1	1	STD81596	04/26/17 08:14

Approved: April 28, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146797	WG611920-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 06:27
6M146798	WG611920-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/28/17 06:52
6M146799	WG611923-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 07:23
6M146800	WG611922-01 VBLK0428 BLANK STD 826	NA	1	1		04/28/17 07:54
6M146801	WG611922-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 08:25
6M146802	WG611922-03 100ug/L A9 LCS STD 8260	NA	1	1	STD81640	04/28/17 08:57
6M146803	L17041110-09 B 826-SPE	<2	1	1		04/28/17 09:28
6M146804	L17041110-12 A 826-SPE	<2	1	1		04/28/17 09:59
6M146805	L17041110-17 A 826-SPE	<2	1	1		04/28/17 10:29
6M146806	L17041200-50 A 826-SPE	<2	1	1		04/28/17 11:00
6M146807	L17041200-51 A 826-SPE	<2	1	1		04/28/17 11:30
6M146808	L17041200-52 A 826-SPE	<2	1	1		04/28/17 12:02
6M146809	L17041200-53 A 826-SPE	<2	1	1		04/28/17 12:32
6M146810	L17041200-54 A 826-SPE	<2	1	1		04/28/17 13:03
6M146811	L17041200-55 A 826-SPE	<2	1	1		04/28/17 13:34
6M146812	L17041200-56 RS A 826-SPE	<2	1	1		04/28/17 14:03
6M146813	L17041200-59 A 826-SPE	<2	1	1		04/28/17 14:33
6M146814	L17041200-57 A MS 826-SPE	<2	1	1	STD8	04/28/17 15:04
6M146816	L17041200-58 A MSD 826-SPE	<2	1	1	STD81634	04/28/17 15:35
6M146817	L17041314-04 B 5X 826-A9-SPE D1	6	1	5		04/28/17 16:05
6M146818	L17041110-25 B 5X 826-SPE 00	6	1	5		04/28/17 16:36
6M146819	L17041314-02 B 5X 826-SPE 00	3	1	5		04/28/17 17:06
6M146820	WG612082-01 50ng BFB STD 8260	NA	1	1	STD81491	04/28/17 18:32
6M146821	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 18:57
6M146822	WG612082-02 50ug/L CCV STD 8260	NA	1	1	STD81599	04/28/17 19:35
6M146823	WG612110-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/28/17 20:07
6M146824	WG612085-01 BLANK STD 8260	NA	1	1		04/28/17 20:38
6M146825	WG612085-02 20ug/L LCS STD 8260	NA	1	1	STD81634	04/28/17 21:09
6M146826	L17041203-11 A MS 826-SPE	NA	1	1	STD81634	04/28/17 21:40
6M146827	L17041203-12 A MSD 826-SPE	NA	1	1	STD81634	04/28/17 22:10
6M146828	WG612085-06 100ug/L LCS STD 826-A9	NA	1	1	STD81640	04/28/17 22:41
6M146829	L17041431-05 A EB 826-A9-SPE	5	1	1		04/28/17 23:11
6M146830	L17041203-10 A REF 826-SPE	NA	1	1		04/28/17 23:42

Approved: May 03, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 042817
Analyst1: TMB Analyst2: JDS
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 24/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54148

Internal Standard: STD81597 Surrogate Standard: STD81597
CCV: STD81577; STD81397 LCS: STD81634; STD 81640 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG611922; WG612085

Comments: File 6M146815 does not exist.
PM run did not complete due to a power outage.

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M146831	L17041431-07 A 826-A9-SPE	6	1	1		04/29/17 00:12

Comments

Seq.	Rerun	Dil.	Reason	Analytes
21				
File ID: 6M146818				
			L17041110-25 B 5X 826-SPE 00 antifoam added. Sample is dark and foamy-unable to run more concentrated.	
22				
File ID: 6M146819				
			L17041314-02 B 5X 826-SPE 00 analyzed at a dilution based on sample history.	
24				
File ID: 6M146821				
			WG612082-02 50ug/L CCV STD 8260 rerun CCV, vinyl chloride is low.	
43				
File ID: 6M146830				
			L17041203-10 A REF 826-SPE F flag hits present in the blank. The sample is non-detect for all analytes.	

Approved: May 03, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17861	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:42
11M17862	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81491	04/29/17 15:54
11M17863	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 16:19
11M17864	RINSE	NA	1	1	STD81577	04/29/17 16:50
11M17865	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 17:20
11M17866	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:45
11M17867	WG612121-01 50ng BFB STD 8260	NA	1	1	STD81577	04/29/17 17:57
11M17868	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:21
11M17869	WG612121-02 50ug/L CCV STD 8260	NA	1	1	STD81577	04/29/17 18:53
11M17870	WG612122-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	04/29/17 19:26
11M17871	WG612123-01 VBLK0429 BLANK STD 826	NA	1	1		04/29/17 19:55
11M17872	WG612123-02 20ug/L LCS STD 8260	NA	1	1	STD81654	04/29/17 20:24
11M17873	L17041203-02 B MS 826-SPE	<2	1	1	STD81654	04/29/17 20:53
11M17874	L17041203-03 B MSD 826-SPE	<2	1	1	STD81654	04/29/17 21:22
11M17875	RINSE	NA	1	1		04/29/17 21:51
11M17876	L17041208-03 A TB 826-SPE	<2	1	1		04/29/17 22:20
11M17877	L17041203-01 A RS 826-SPE	<2	1	1		04/29/17 22:49
11M17878	L17041209-08 A TB 826-SPE	<2	1	1		04/29/17 23:18
11M17879	L17041209-09 A EB 826-SPE	<2	1	1		04/29/17 23:48
11M17880	L17041200-01 B 826-SPE	<2	1	1		04/30/17 00:17
11M17881	L17041203-04 A 826-SPE	<2	1	1		04/30/17 00:46
11M17882	L17041208-01 A 826-SPE	<2	1	1		04/30/17 01:16
11M17883	L17041208-02 A 826-SPE	<2	1	1		04/30/17 01:45
11M17884	L17041209-01 A 826-SPE	<2	1	1		04/30/17 02:14
11M17885	L17041209-02 A 826-SPE	<2	1	1		04/30/17 02:43
11M17886	L17041209-03 A 826-SPE	<2	1	1		04/30/17 03:13
11M17887	L17041209-04 A 826-SPE	<2	1	1		04/30/17 03:42
11M17888	L17041209-05 A 826-SPE	<2	1	1		04/30/17 04:11
11M17889	L17041203-06 A 826-SPE	<2	1	1		04/30/17 04:40
11M17890	L17041203-07 A 826-SPE	<2	1	1		04/30/17 05:10
11M17891	L17041203-08 A 826-SPE	<2	1	1		04/30/17 05:39
11M17892	WG612124-02 20ug/L LCS STD 624	NA	2	1	STD81654	04/30/17 06:08
11M17893	WG612124-03 20ug/L LCS2 STD 624	NA	2	1	STD81654	04/30/17 06:37
11M17894	WG612124-01 VBLK0429 BLANK STD 624	NA	2	1		04/30/17 07:06

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 042917
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81634 MS/MSD: STD81634

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG612123, WG612124

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17895	L17041383-07 A TB 624-SPE1	5	2	1		04/30/17 07:35
11M17896	L17041379-03 A 624-SPE1	7	2	1		04/30/17 08:05
11M17897	L17041379-05 A 624-SPE1	7	2	1		04/30/17 08:34
11M17898	L17041379-10 A 624-SPE1	7	2	1		04/30/17 09:04
11M17899	L17041381-01 A 624-SPE1	7	2	1		04/30/17 09:33
11M17900	L17041381-03 A 624-SPE1	7	2	1		04/30/17 10:02
11M17901	L17041381-05 A 624-SPE1	7	2	1		04/30/17 10:31
11M17902	CCV	NA	1	1		04/30/17 11:00
11M17903	RINSE	NA	1	1		04/30/17 11:29

Comments

Seq.	Rerun	Dil.	Reason	Analytes
1				
File ID: 11M17861				
			WG612121-01 fails, RR BFB.	
3	X			
File ID: 11M17863				
			WG612121-02 ISTD high.	
5				
File ID: 11M17865				
			WG612121-02 VC fails high, Drop voltage, RR.	
6				
File ID: 11M17866				
			WG612121-01 Fails, RR.	
8				
File ID: 11M17868				
			WG612121-02 VC fails, high, RR.	

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 043017
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612142

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273172	WG612141-01 BFB 50ng 8260	NA	1	1	STD81491	04/30/17 14:35
17M0273173	WG612141-02 50ug/L CCV 8260	NA	1	1	STD81577	04/30/17 14:54
17M0273174	RINSE	NA	1	1		04/30/17 15:28
17M0273175	WG612142-01 BLANK 8260	NA	1	1		04/30/17 15:48
17M0273176	WG612142-02 20ug/L LCS 8260	NA	1	1	STD81596	04/30/17 16:07
17M0273177	L17041203-20 A MS 826-SPE	<2	1	1	STD81596	04/30/17 16:27
17M0273178	L17041203-21 A MSD 826-SPE	<2	1	1	STD81596	04/30/17 16:47
17M0273179	RINSE	NA	1	1		04/30/17 17:20
17M0273180	L17041244-42 A 826-SPE	<2	1	1		04/30/17 17:40
17M0273181	L17041244-43 A 826-SPE	<2	1	1		04/30/17 18:00
17M0273182	L17041244-38 A 826-SPE	<2	1	1		04/30/17 18:34
17M0273183	L17041244-41 A 826-SPE	<2	1	1		04/30/17 18:54
17M0273184	L17041244-28 B 826-SPE	<2	1	1		04/30/17 19:14
17M0273185	L17041244-36 B 826-SPE	<2	1	1		04/30/17 19:34
17M0273186	L17041244-34 B 20X 826-SPE	3	1	20		04/30/17 19:54
17M0273187	RINSE	NA	1	1		04/30/17 20:13
17M0273188	L17041203-19 A RS 826-SPE	<2	1	1		04/30/17 20:33
17M0273189	L17041203-05 A 826-SPE	<2	1	1		04/30/17 20:53
17M0273190	L17041203-09 A 826-SPE	<2	1	1		04/30/17 21:13
17M0273191	L17041203-13 A 826-SPE	<2	1	1		04/30/17 21:39
17M0273192	L17041203-14 A 826-SPE	<2	1	1		04/30/17 21:59
17M0273193	L17041203-15 A 826-SPE	<2	1	1		04/30/17 22:19
17M0273194	L17041203-16 A 826-SPE	<2	1	1		04/30/17 22:39
17M0273195	L17041203-17 A 826-SPE	<2	1	1		04/30/17 22:59
17M0273196	L17041203-18 A 826-SPE	<2	1	1		04/30/17 23:19
17M0273197	L17041209-09 A 50X 826-SPE	NA	1	50		04/30/17 23:42
17M0273198	L17041209-07 A 5X 826-SPE	NA	1	5		05/01/17 00:10
17M0273199	RINSE	NA	1	1		05/01/17 00:30
17M0273200	RINSE	NA	1	1		05/01/17 00:49
17M0273201	RINSE	NA	1	1		05/01/17 01:09

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 043017
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612142

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
26				
File ID: 17M0273197				
			L17041209-09 sample foamed. Too dark to pH.	
27				
File ID: 17M0273198				
			L17041209-07 sample too dark to pH. Dark and foamy matrix, done at 5x.	

Approved: May 02, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050117
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612250

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273202	WG612249-01 BFB 50ng 8260	NA	1	1	STD81491	05/01/17 11:49
17M0273203	WG612249-02 50ug/L CCV 8260	NA	1	1	STD81577	05/01/17 12:07
17M0273204	RINSE	NA	1	1		05/01/17 12:29
17M0273205	WG612250-01 BLANK 8260	NA	1	1		05/01/17 12:49
17M0273206	WG612250-02 20ug/L LCS 8260	NA	1	1	STD81596	05/01/17 13:09
17M0273207	WG612250-03 20ug/L LCSDUP 8260	NA	1	1	STD81596	05/01/17 13:29
17M0273208	RINSE	NA	1	1		05/01/17 13:48
17M0273209	L17041209-06 B 50X 826-SPE	<2	1	50		05/01/17 14:08
17M0273210	RINSE	NA	1	1		05/01/17 14:38
17M0273211	L17041203-22 A 826-SPE	<2	1	1		05/01/17 14:58
17M0273212	L17041203-23 A 826-SPE	<2	1	1		05/01/17 15:18
17M0273213	L17041203-24 A 826-SPE	<2	1	1		05/01/17 15:49
17M0273214	L17041203-25 A 826-SPE	<2	1	1		05/01/17 16:09
17M0273215	L17041203-26 A 826-SPE	<2	1	1		05/01/17 16:28
17M0273216	L17041203-27 A 826-SPE	<2	1	1		05/01/17 16:48
17M0273217	L17041203-28 A 826-SPE	<2	1	1		05/01/17 17:17
17M0273218	L17041203-29 A 826-SPE	<2	1	1		05/01/17 17:37
17M0273219	L17041203-30 A 826-SPE	<2	1	1		05/01/17 17:57
17M0273220	L17041203-31 A 826-SPE	<2	1	1		05/01/17 18:16
17M0273221	L17041203-32 A 826-SPE	<2	1	1		05/01/17 18:36
17M0273222	L17041203-33 A 826-SPE	<2	1	1		05/01/17 19:08
17M0273223	L17041203-34 A 826-SPE	<2	1	1		05/01/17 19:27
17M0273224	L17041203-35 A 826-SPE	<2	1	1		05/01/17 19:47
17M0273225	L17041203-36 A 826-SPE	<2	1	1		05/01/17 20:17
17M0273226	L17041203-37 A 826-SPE	<2	1	1		05/01/17 20:36
17M0273227	L17041203-38 A 826-SPE	<2	1	1		05/01/17 20:56
17M0273228	L17041203-39 A 826-SPE	<2	1	1		05/01/17 21:16
17M0273229	L17041203-40 A 826-SPE	<2	1	1		05/01/17 21:44
17M0273230	RINSE	NA	1	1		05/01/17 22:04
17M0273231	RINSE	NA	1	1		05/01/17 22:33
17M0273232	RINSE	NA	1	1		05/01/17 22:53

Comments

Approved: May 02, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050117
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 Rev: 24
Method: 5035/ 5030B/ 5030C SOP: PAT01 Rev: 19

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81596 MS/MSD: STD81596

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612250

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
8				
File ID: 17M0273209				
L17041209-06 HIGH SS due to dark and foamy sample matrix. A vial foamed instrument.				

Approved: May 02, 2017

Page: 2

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 050117
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81656 MS/MSD: NA

Column 1 ID: Column 2 ID: NA
Workgroups: WG612295

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
11M17932	WG612294-01 50ng BFB STD 8260	NA	1	1	STD81491	05/01/17 14:47
11M17933	WG612294-02 50ug/L CCV STD 8260	NA	1	1	STD81577	05/01/17 15:11
11M17934	WG612294-02 50ug/L CCV STD 8260	NA	1	1	STD81577	05/01/17 15:53
11M17935	WG612299-01 100ug/L A9 CCV STD 8260	NA	1	1	STD81397	05/01/17 16:21
11M17936	WG612295-01 BLANK STD 8260	NA	1	1		05/01/17 16:50
11M17937	WG612295-02 20ug/L LCS STD 8260	NA	1	1	STD81656	05/01/17 17:20
11M17938	L17041172-12 A MS 826-SPE	<2	1	1	STD81656	05/01/17 17:49
11M17939	L17041172-13 A MSD 826-SPE	<2	1	1	STD81656	05/01/17 18:18
11M17940	L17041203-49 A TB 826-SPE	<2	1	1		05/01/17 18:47
11M17941	L17041203-48 A TB 826-SPE	<2	1	1		05/01/17 19:17
11M17942	L17041203-46 A TB 826-SPE	<2	1	1		05/01/17 19:46
11M17943	L17041172-11 A REF 826-SPE	<2	1	1		05/01/17 20:15
11M17944	L17041246-11 A TB 826-SPE	<2	1	1		05/01/17 20:44
11M17945	L17041246-12 A TB 826-SPE	<2	1	1		05/01/17 21:13
11M17946	L17041246-07 A EB 826-SPE	<2	1	1		05/01/17 21:43
11M17947	L17041246-09 A FB 826-SPE	<2	1	1		05/01/17 22:11
11M17948	L17041203-41 A 826-SPE	<2	1	1		05/01/17 22:41
11M17949	L17041203-42 A 826-SPE	<2	1	1		05/01/17 23:10
11M17950	L17041203-43 A 826-SPE	<2	1	1		05/01/17 23:39
11M17951	L17041203-44 A 826-SPE	<2	1	1		05/02/17 00:08
11M17952	L17041203-45 A 826-SPE	<2	1	1		05/02/17 00:38
11M17953	L17041203-47 A 826-SPE	<2	1	1		05/02/17 01:07
11M17954	L17041246-01 A 826-SPE	<2	1	1		05/02/17 01:36
11M17955	L17041246-03 A 826-SPE	<2	1	1		05/02/17 02:05
11M17956	L17041246-05 A 826-SPE	<2	1	1		05/02/17 02:34
11M17957	CCV	NA	1	1		05/02/17 03:03
11M17958	RINSE	NA	1	1		05/02/17 03:32
11M17959	RINSE	NA	1	1		05/02/17 04:02

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15			Surrogate standard failure	1,2-dce-d4
File ID: 11M17946				

Approved: May 04, 2017

Microbac

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS11 Dataset: 050117
Analyst1: JDS Analyst2: NA
Method: 8260 SOP: MSV01, OVAP MSV01 Rev: 24,0
Method: 5035/ 5030B/ 5030C SOP: PAT01, OVAP PAT01 Rev: 18,1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81656 MS/MSD: NA

Column 1 ID: Column 2 ID: NA
Workgroups: WG612295

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
			L17041246-07 SS failed high	
17	X		Internal standard failure	
File ID: 11M17948				
			L17041203-41 IS failed low	
18			Internal standard failure	
File ID: 11M17949				
			L17041203-42 IS failed low	
19			Internal standard failure	
File ID: 11M17950				
			L17041203-43 IS failed low	
20			Internal standard failure	
File ID: 11M17951				
			L17041203-44 IS failed low	
21			Internal standard failure	
File ID: 11M17952				
			L17041203-45 IS failed low	
22	X		Internal standard failure	
File ID: 11M17953				
			L17041203-47 IS failed low	
23			Surrogate standard failure	1,2-dce-d4
File ID: 11M17954				
			L17041246-01 SS failed high	

Approved: May 04, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050217
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 / OVAP MSV01 Rev: 25 / 0
Method: 5035/ 5030B/ 5030C SOP: PAT01 / OVAP PAT01 Rev: 18 / 1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81680 MS/MSD: STD81680

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612375, WG612551

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273233	WG612373-01 50ng BFB STD 8260	NA	1	1	STD81491	05/02/17 07:37
17M0273234	WG612373-02 50ug/L CCV STD 8260	NA	1	1	STD81577	05/02/17 07:55
17M0273235	RINSE	NA	1	1		05/02/17 08:17
17M0273236	WG612375-01 VBLK0502 BLANK STD 826	NA	1	1		05/02/17 08:37
17M0273237	WG612375-02 20ug/L LCS STD 8260	NA	1	1	STD81680	05/02/17 08:57
17M0273238	WG612375-03 20ug/L LC2 STD 8260	NA	1	1	STD81680	05/02/17 09:17
17M0273239	L17041438-01 A 10X 826-TC	NA	17	10		05/02/17 09:36
17M0273240	L17041172-14 A TB 826-SPE	<2	1	1		05/02/17 10:06
17M0273241	L17041172-15 A TB 826-SPE	<2	1	1		05/02/17 10:26
17M0273242	L17041172-10 A 826-SPE	<2	1	1		05/02/17 10:45
17M0273243	L17041172-09 A 826-SPE	<2	1	1		05/02/17 11:18
17M0273244	L17041172-08 A 826-SPE	<2	1	1		05/02/17 11:38
17M0273245	L17041172-07 A 826-SPE	<2	1	1		05/02/17 12:16
17M0273246	L17041172-06 A 826-SPE	<2	1	1		05/02/17 12:36
17M0273247	L17041172-05 A 826-SPE	<2	1	1		05/02/17 12:56
17M0273248	L17041172-04 A 826-SPE	<2	1	1		05/02/17 13:16
17M0273249	L17041172-03 A 826-SPE	<2	1	1		05/02/17 13:51
17M0273250	L17041172-02 A 826-SPE	<2	1	1		05/02/17 14:11
17M0273251	L17041172-01 A 826-SPE	<2	1	1		05/02/17 14:43
17M0273252	L17041252-01 A 826-SPE	<2	1	1		05/02/17 15:03
17M0273253	L17041252-03 A 826-SPE	<2	1	1		05/02/17 15:38
17M0273254	L17041252-04 A 826-SPE	<2	1	1		05/02/17 15:58
17M0273255	L17041252-05 A 826-SPE	<2	1	1		05/02/17 16:25
17M0273256	L17041252-02 A 826-SPE	<2	1	1		05/02/17 16:44
17M0273257	L17041252-06 A 250X 826-SPE	6	1	250		05/02/17 17:15
17M0273258	L17041280-01 A 826-SPE	<2	1	1		05/02/17 17:35
17M0273259	WG612131-01 A FBLK 10X 826-TC	NA	17	10		05/02/17 18:01
17M0273260	WG612550-01 50ng BFB STD 8260	NA	1	1	STD81491	05/02/17 18:30
17M0273261	WG612550-02 50ug/L CCV STD 8260	NA	1	1	STD81577	05/02/17 18:50
17M0273262	RINSE	NA	1	1		05/02/17 19:14
17M0273263	WG612551-01 VBLK0502 BLANK STD 826	NA	1	1		05/02/17 19:34
17M0273264	WG612551-02 20ug/L LCS STD 8260	NA	1	1	STD81680	05/02/17 19:53
17M0273265	L17041172-12 B MS 826-SPE	<2	1	1	STD81680	05/02/17 20:13
17M0273266	L17041172-13 B MSD 826-SPE	<2	1	1	STD81680	05/02/17 20:32

Approved: May 08, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050217
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 / OVAP MSV01 Rev: 25 / 0
Method: 5035/ 5030B/ 5030C SOP: PAT01 / OVAP PAT01 Rev: 18 / 1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81680 MS/MSD: STD81680

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612375, WG612551

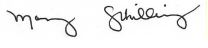
Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
17M0273267	RINSE	NA	1	1		05/02/17 20:51
17M0273268	L17041203-47 B 826-SPE	<2	1	1		05/02/17 21:11
17M0273269	L17041203-41 B 826-SPE	<2	1	1		05/02/17 21:30
17M0273270	L17041203-42 B 826-SPE	<2	1	1		05/02/17 21:50
17M0273271	L17041203-43 B 826-SPE	<2	1	1		05/02/17 22:09
17M0273272	L17041203-44 B 826-SPE	<2	1	1		05/02/17 22:29
17M0273273	L17041203-45 B 826-SPE	<2	1	1		05/02/17 22:48
17M0273274	L17041172-11 B 826-SPE	<2	1	1		05/02/17 23:07
17M0273275	L17041252-07 A 200X 826-SPE	<2	1	200		05/02/17 23:27
17M0273276	L17041252-10 A 100X 826-SPE	<2	1	100		05/02/17 23:46
17M0273277	L17041252-11 A 500X 826-SPE	<2	1	500		05/03/17 00:06
17M0273278	L17041252-08 A 10X 826-SPE	<2	1	10		05/03/17 00:25
17M0273279	L17041252-09 A 10X 826-SPE	<2	1	10		05/03/17 00:44
17M0273280	L17041358-02 A 826-SPE1	<2	1	1		05/03/17 01:04
17M0273281	L17041358-04 A 826-SPE1	<2	1	1		05/03/17 01:23
17M0273282	L17041358-06 A 826-SPE1	<2	1	1		05/03/17 01:42
17M0273283	L17041358-08 A 826-SPE1	<2	1	1		05/03/17 02:02
17M0273284	L17041358-10 A 826-SPE1	<2	1	1		05/03/17 02:21
17M0273285	L17041358-12 A 826-SPE1	<2	1	1		05/03/17 02:41
17M0273286	RINSE	NA	1	1		05/03/17 03:00
17M0273287	RINSE	NA	1	1		05/03/17 03:19
17M0273288	RINSE	NA	1	1		05/03/17 03:39

Comments

Seq.	Rerun	Dil.	Reason	Analytes
43	X	100	Analyzed too dilute	
File ID: 17M0273275				
L17041252-07				
44	X		Analyzed too dilute	
File ID: 17M0273276				
L17041252-10				
45	X	100	Analyzed too dilute	
File ID: 17M0273277				
L17041252-11				

Approved: May 08, 2017



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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS17 Dataset: 050217
Analyst1: ADC Analyst2: NA
Method: 8260 SOP: MSV01 / OVAP MSV01 Rev: 25 / 0
Method: 5035/ 5030B/ 5030C SOP: PAT01 / OVAP PAT01 Rev: 18 / 1

Maintenance Log ID:

Internal Standard: STD81442 Surrogate Standard: STD81441
CCV: STD81577 LCS: STD81680 MS/MSD: STD81680

Column 1 ID: RTX-VMS Column 2 ID: NA
Workgroups: WG612375, WG612551

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
46	X	50	Over Calibration Range	VC
File ID: 17M0273278				
L17041252-08				
47				
File ID: 17M0273279				
L17041252-09 RR 5X TOO DILUTE				

Approved: May 08, 2017

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Microbac Laboratories Inc.

Data Checklist

Date: 12-JAN-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 79799
Analytical Workgroups: WG598323; WG598431

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
13-JAN-2017
Tiffany Bailey

Secondary Reviewer:
13-JAN-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: JAN-13-2017 13:54:15

Microbac Laboratories Inc.

Data Checklist

Date: 05-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81399
Analytical Workgroups: WG608938

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
06-APR-2017

Tiffany Bailey

Secondary Reviewer:
07-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:59:30

Microbac Laboratories Inc.

Data Checklist

Date: 06-APR-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81412
Analytical Workgroups: WG608987

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
07-APR-2017
Tiffany Bailey

Secondary Reviewer:
07-APR-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: APR-07-2017 14:09:55

Microbac Laboratories Inc.

Data Checklist

Date: 11-APR-2017
Analyst: FJB
Analyst: NA
Method: 8260B/C/OVAP/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81698
Analytical Workgroups: WG609769

System Performance Check	X
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	NA
TCL's	NA
Surrogates	NA
LCS (Laboratory Control Sample)	NA
Recoveries	NA
Surrogates	NA
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	NA
Internal Standards Criteria	NA
Library Searches	NA
Calculations & Correct Factors	NA
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	NA
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	FJB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-APR-2017

Secondary Reviewer:
24-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-24-2017 15:52:25

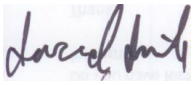
Microbac Laboratories Inc.

Data Checklist

Date: 24-APR-2017
Analyst: JDS
Analyst: NA
Method: 8260/624
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81779
Analytical Workgroups: WG611320

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	NA
Project/Client Specific Requirements	NA
Special Standards	NA
Blanks	NA
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	NA
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	NA
TCL Hits	NA
Spectra of TCL Hits	NA
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017



Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: APR-28-2017 16:39:04

Microbac Laboratories Inc.

Data Checklist

Date: 25-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81782
Analytical Workgroups: WG611454, WG611456

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
27-APR-2017

Secondary Reviewer:
28-APR-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-31-2017 15:17:00

Microbac Laboratories Inc.

Data Checklist

Date: 28-APR-2017
Analyst: TMB
Analyst: JDS
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 81824
Analytical Workgroups: WG611922; WG612085

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
29-APR-2017
Tiffany Bailey

Secondary Reviewer:
03-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-03-2017 09:32:40

Microbac Laboratories Inc.

Data Checklist

Date: 29-APR-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81877
Analytical Workgroups: WG612123, WG612124

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
02-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 16:33:36

Microbac Laboratories Inc.

Data Checklist

Date: 30-MAY-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81857
Analytical Workgroups: WG612142

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
01-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 18:29:31

Microbac Laboratories Inc.

Data Checklist

Date: 01-MAY-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81875
Analytical Workgroups: WG612250

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
02-MAY-2017

Secondary Reviewer:
02-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-02-2017 18:41:38

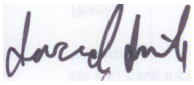
Microbac Laboratories Inc.

Data Checklist

Date: 01-MAY-2017
Analyst: JDS
Analyst: NA
Method: 8260
Instrument: HPMS11
Curve Workgroup: NA
Runlog ID: 81919
Analytical Workgroups: WG612295

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	JDS
Surrogates	X
Internal Standards Criteria	X
Library Searches	X
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	JDS
Secondary Reviewer	FJB
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
03-MAY-2017



Secondary Reviewer:
04-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-04-2017 14:15:10

Microbac Laboratories Inc.

Data Checklist

Date: 02-MAY-2017
Analyst: ADC
Analyst: NA
Method: 8260
Instrument: HPMS17
Curve Workgroup: NA
Runlog ID: 81923
Analytical Workgroups: WG612551, WG612375

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	NA
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	ADC
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	X
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	ADC
Secondary Reviewer	MES
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
03-MAY-2017

Secondary Reviewer:
08-MAY-2017

CHECKLIST1 - Modified 03/05/2008
Generated: MAY-08-2017 12:39:28

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612085

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-80-ODLB-14	10	04/23/17					04/28/2017	5.4	14		04/28/17	5.4	14	
MW-80-ODLB-14	11	04/23/17					04/28/2017	5.3	14		04/28/17	5.3	14	
MW-80-ODLB-14	12	04/23/17					04/28/2017	5.3	14		04/28/17	5.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612123

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-165-ODLB-14	01	04/23/17					04/29/2017	6.5	14		04/29/17	6.5	14	
MW-165-ODLB-14	02	04/23/17					04/29/2017	6.4	14		04/29/17	6.4	14	
MW-165-ODLB-14	03	04/23/17					04/29/2017	6.5	14		04/29/17	6.5	14	
MW-152-ODLB-14	04	04/23/17					04/30/2017	6.6	14		04/30/17	6.6	14	
MW-153-ODLB-14	06	04/23/17					04/30/2017	6.7	14		04/30/17	6.7	14	
MW-249-ODLB-14	07	04/23/17					04/30/2017	6.6	14		04/30/17	6.6	14	
MW-145-ODLB-14	08	04/23/17					04/30/2017	6.7	14		04/30/17	6.7	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612142

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-79-ODLB-14	05	04/23/17					04/30/2017	7.4	14		04/30/17	7.4	14	
MW-235-ODLB-14	09	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-167-ODLB-14	13	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-248-ODLB-14	14	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-44-ODLB-14	15	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-171-ODLB-14	16	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
DUP-5	17	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-129-ODLB-14	18	04/23/17					04/30/2017	7.3	14		04/30/17	7.3	14	
MW-130-ODLB-14	19	04/23/17					04/30/2017	7.2	14		04/30/17	7.2	14	
MW-130-ODLB-14	20	04/23/17					04/30/2017	7.1	14		04/30/17	7.1	14	
MW-130-ODLB-14	21	04/23/17					04/30/2017	7.1	14		04/30/17	7.1	14	

*** = SEE PROJECT QAPP REQUIREMENTS**

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG612250

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-28-ODLB-14	22	04/23/17					05/01/2017	8	14		05/01/17	8	14	
MW-67-ODLB-14	23	04/23/17					05/01/2017	8	14		05/01/17	8	14	
MW-154-ODLB-14	24	04/23/17					05/01/2017	8	14		05/01/17	8	14	
MW-182-ODLB-14	25	04/23/17					05/01/2017	8	14		05/01/17	8	14	
MW-08-ODLB-14	26	04/22/17					05/01/2017	9	14		05/01/17	9	14	
MW-58-ODLB-14	27	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
DUP-1	28	04/22/17					05/01/2017	9	14		05/01/17	9	14	
MW-126-ODLB-14	29	04/23/17					05/01/2017	8.1	14		05/01/17	8.1	14	
MW-169-ODLB-14	30	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-170-ODLB-14	31	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-78-ODLB-14	32	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-76-ODLB-14	33	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-77-ODLB-14	34	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-70-ODLB-14	35	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	
MW-71-ODLB-14	36	04/23/17					05/01/2017	8.4	14		05/01/17	8.4	14	
MW-163-ODLB-14	37	04/23/17					05/01/2017	8.2	14		05/01/17	8.2	14	
MW-144-ODLB-14	38	04/23/17					05/01/2017	8.2	14		05/01/17	8.2	14	
MW-190-ODLB-14	39	04/23/17					05/01/2017	8.2	14		05/01/17	8.2	14	
MW-164-ODLB-14	40	04/23/17					05/01/2017	8.3	14		05/01/17	8.3	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612295

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
TB-1-ODLB-14	46	04/24/17					05/01/2017	7.2	14		05/01/17	7.2	14	
TB-2-ODLB-14	48	04/24/17					05/01/2017	7.1	14		05/01/17	7.1	14	
TB-3-ODLB-14	49	04/24/17					05/01/2017	7.1	14		05/01/17	7.1	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B **AAB#:** WG612551

Login Number: L17041203

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-184-ODLB-14	41	04/23/17					05/02/2017	9.2	14		05/02/17	9.2	14	
MW-157-ODLB-14	42	04/23/17					05/02/2017	9.2	14		05/02/17	9.2	14	
MW-68-ODLB-14	43	04/23/17					05/02/2017	9.2	14		05/02/17	9.2	14	
DUP-2	44	04/23/17					05/02/2017	9.2	14		05/02/17	9.2	14	
MW-69-ODLB-14	45	04/23/17					05/02/2017	9.3	14		05/02/17	9.3	14	
EB1-ODLB-14	47	04/23/17					05/02/2017	9.6	14		05/02/17	9.6	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5268574
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041203 **Method:** 8260
Instrument Id: HPMS17 **CAL ID:** HPMS17-26-APR-17
Workgroup (AAB#): WG612551 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-41	1.00	01	101	97.0	108	102
L17041203-42	1.00	01	98.6	95.4	103	98.4
L17041203-43	1.00	01	101	97.3	109	103
L17041203-44	1.00	01	98.2	95.2	103	100
L17041203-45	1.00	01	98.9	95.9	106	102
L17041203-47	1.00	01	102	97.8	107	102
WG612551-01	1.00	01	99.2	97.9	106	101
WG612551-02	1.00	01	102	102	104	103

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Login Number: L17041203
Instrument Id: HPMS17
Workgroup (AAB#): WG612250

Method: 8260
CAL ID: HPMS17-26-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-22	1.00	01	103	101	107	102
L17041203-23	1.00	01	105	103	112	107
L17041203-24	1.00	01	101	97.9	104	99.9
L17041203-25	1.00	01	102	99.3	107	102
L17041203-26	1.00	01	104	102	110	103
L17041203-27	1.00	01	105	102	109	105
L17041203-28	1.00	01	102	100	112	103
L17041203-29	1.00	01	101	98.9	101	100
L17041203-30	1.00	01	104	102	107	103
L17041203-31	1.00	01	105	103	107	105
L17041203-32	1.00	01	105	101	111	104
L17041203-33	1.00	01	101	98.5	97.9	98.7
L17041203-34	1.00	01	104	101	110	103
L17041203-35	1.00	01	103	99.5	103	99.4
L17041203-36	1.00	01	102	100	108	103
L17041203-37	1.00	01	104	100	109	103
L17041203-38	1.00	01	102	99.5	101	102
L17041203-39	1.00	01	104	98.9	98.7	101
L17041203-40	1.00	01	104	102	111	105
WG612250-01	1.00	01	104	101	106	102
WG612250-02	1.00	01	104	103	109	105
WG612250-03	1.00	01	103	101	102	102

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Login Number: L17041203
Instrument Id: HPMS17
Workgroup (AAB#): WG612142

Method: 8260
CAL ID: HPMS17-26-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-05	1.00	01	102	99.2	104	101
L17041203-09	1.00	01	105	100	104	103
L17041203-13	1.00	01	100	97.9	101	99.8
L17041203-14	1.00	01	106	102	109	105
L17041203-15	1.00	01	105	101	106	102
L17041203-16	1.00	01	103	101	103	102
L17041203-17	1.00	01	103	99.8	107	103
L17041203-18	1.00	01	105	101	109	104
L17041203-19	1.00	01	103	101	106	102
L17041203-20	1.00	01	102	101	102	102
L17041203-21	1.00	01	101	100	102	102
WG612142-01	1.00	01	103	100	105	101
WG612142-02	1.00	01	100	98.4	96.4	99.4

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17041203 **Method:** 8260
Instrument Id: HPMS11 **CAL ID:** HPMS11-24-APR-17
Workgroup (AAB#): WG612295 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-46	1.00	01	102	100	105	107
L17041203-48	1.00	01	107	103	107	108
L17041203-49	1.00	01	104	103	105	106
WG612295-01	1.00	01	105	102	107	108
WG612295-02	1.00	01	103	103	102	107

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Login Number: L17041203
Instrument Id: HPMS6
Workgroup (AAB#): WG612085

Method: 8260
CAL ID: HPMS6-05-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-10	1.00	01	108	102	112	106
L17041203-11	1.00	01	108	102	109	105
L17041203-12	1.00	01	109	102	108	105
WG612085-01	1.00	01	108	103	110	105
WG612085-02	1.00	01	107	103	107	106
WG612085-06	1.00	01	107	103	112	107

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Login Number: L17041203
Instrument Id: HPMS11
Workgroup (AAB#): WG612123

Method: 8260
CAL ID: HPMS11-24-APR-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17041203-01	1.00	01	105	99.8	106	106
L17041203-02	1.00	01	105	103	110	107
L17041203-03	1.00	01	107	105	102	108
L17041203-04	1.00	01	108	104	110	108
L17041203-06	1.00	01	107	104	113	110
L17041203-07	1.00	01	107	105	110	108
L17041203-08	1.00	01	107	103	111	107
WG612123-01	1.00	01	104	99.1	106	106
WG612123-02	1.00	01	105	103	104	105

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5268581
Report generated: 05/09/2017 14:19

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612123
Blank File ID: 11M17871
Blank Sample ID: WG612123-01
Prep Date: 04/29/17 19:55
Instrument ID: HPMS11
Analyzed Date: 04/29/17 19:55
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612123-02	11M17872	04/29/17 20:24	01
MW-165-ODLB-14	L17041203-02	11M17873	04/29/17 20:53	01
MW-165-ODLB-14	L17041203-03	11M17874	04/29/17 21:22	01
MW-165-ODLB-14	L17041203-01	11M17877	04/29/17 22:49	01
MW-152-ODLB-14	L17041203-04	11M17881	04/30/17 00:46	01
MW-153-ODLB-14	L17041203-06	11M17889	04/30/17 04:40	01
MW-249-ODLB-14	L17041203-07	11M17890	04/30/17 05:10	01
MW-145-ODLB-14	L17041203-08	11M17891	04/30/17 05:39	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041203	**Work Group:**	WG612295
Blank File ID:	11M17936	**Blank Sample ID:**	WG612295-01
Prep Date:	05/01/17 16:50	**Instrument ID:**	HPMS11
Analyzed Date:	05/01/17 16:50	**Method:**	8260B
Analyst:	JDS		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612295-02	11M17937	05/01/17 17:20	01
TB-3-ODLB-14	L17041203-49	11M17940	05/01/17 18:47	01
TB-2-ODLB-14	L17041203-48	11M17941	05/01/17 19:17	01
TB-1-ODLB-14	L17041203-46	11M17942	05/01/17 19:46	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612142
Blank File ID: 17M0273175
Blank Sample ID: WG612142-01
Prep Date: 04/30/17 15:48
Instrument ID: HPMS17
Analyzed Date: 04/30/17 15:48
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612142-02	17M0273176	04/30/17 16:07	01
MW-130-ODLB-14	L17041203-20	17M0273177	04/30/17 16:27	01
MW-130-ODLB-14	L17041203-21	17M0273178	04/30/17 16:47	01
MW-130-ODLB-14	L17041203-19	17M0273188	04/30/17 20:33	01
MW-79-ODLB-14	L17041203-05	17M0273189	04/30/17 20:53	01
MW-235-ODLB-14	L17041203-09	17M0273190	04/30/17 21:13	01
MW-167-ODLB-14	L17041203-13	17M0273191	04/30/17 21:39	01
MW-248-ODLB-14	L17041203-14	17M0273192	04/30/17 21:59	01
MW-44-ODLB-14	L17041203-15	17M0273193	04/30/17 22:19	01
MW-171-ODLB-14	L17041203-16	17M0273194	04/30/17 22:39	01
DUP-5	L17041203-17	17M0273195	04/30/17 22:59	01
MW-129-ODLB-14	L17041203-18	17M0273196	04/30/17 23:19	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Blank File ID: 17M0273205
Prep Date: 05/01/17 12:49
Analyzed Date: 05/01/17 12:49
Analyst: ADC

Work Group: WG612250
Blank Sample ID: WG612250-01
Instrument ID: HPMS17
Method: 8260B

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612250-02	17M0273206	05/01/17 13:09	01
LCS2	WG612250-03	17M0273207	05/01/17 13:29	01
MW-28-ODLB-14	L17041203-22	17M0273211	05/01/17 14:58	01
MW-67-ODLB-14	L17041203-23	17M0273212	05/01/17 15:18	01
MW-154-ODLB-14	L17041203-24	17M0273213	05/01/17 15:49	01
MW-182-ODLB-14	L17041203-25	17M0273214	05/01/17 16:09	01
MW-08-ODLB-14	L17041203-26	17M0273215	05/01/17 16:28	01
MW-58-ODLB-14	L17041203-27	17M0273216	05/01/17 16:48	01
DUP-1	L17041203-28	17M0273217	05/01/17 17:17	01
MW-126-ODLB-14	L17041203-29	17M0273218	05/01/17 17:37	01
MW-169-ODLB-14	L17041203-30	17M0273219	05/01/17 17:57	01
MW-170-ODLB-14	L17041203-31	17M0273220	05/01/17 18:16	01
MW-78-ODLB-14	L17041203-32	17M0273221	05/01/17 18:36	01
MW-76-ODLB-14	L17041203-33	17M0273222	05/01/17 19:08	01
MW-77-ODLB-14	L17041203-34	17M0273223	05/01/17 19:27	01
MW-70-ODLB-14	L17041203-35	17M0273224	05/01/17 19:47	01
MW-71-ODLB-14	L17041203-36	17M0273225	05/01/17 20:17	01
MW-163-ODLB-14	L17041203-37	17M0273226	05/01/17 20:36	01
MW-144-ODLB-14	L17041203-38	17M0273227	05/01/17 20:56	01
MW-190-ODLB-14	L17041203-39	17M0273228	05/01/17 21:16	01
MW-164-ODLB-14	L17041203-40	17M0273229	05/01/17 21:44	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17041203
Work Group: WG612551
Blank File ID: 17M0273263
Blank Sample ID: WG612551-01
Prep Date: 05/02/17 19:34
Instrument ID: HPMS17
Analyzed Date: 05/02/17 19:34
Method: 8260B
Analyst: ADC

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612551-02	17M0273264	05/02/17 19:53	01
EB1-ODLB-14	L17041203-47	17M0273268	05/02/17 21:11	01
MW-184-ODLB-14	L17041203-41	17M0273269	05/02/17 21:30	01
MW-157-ODLB-14	L17041203-42	17M0273270	05/02/17 21:50	01
MW-68-ODLB-14	L17041203-43	17M0273271	05/02/17 22:09	01
DUP-2	L17041203-44	17M0273272	05/02/17 22:29	01
MW-69-ODLB-14	L17041203-45	17M0273273	05/02/17 22:48	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number:	L17041203	Work Group:	WG612085
Blank File ID:	6M146824	Blank Sample ID:	WG612085-01
Prep Date:	04/28/17 20:38	Instrument ID:	HPMS6
Analyzed Date:	04/28/17 20:38	Method:	8260B
Analyst:	JDS		

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG612085-02	6M146825	04/28/17 21:09	01
MW-80-ODLB-14	L17041203-11	6M146826	04/28/17 21:40	01
MW-80-ODLB-14	L17041203-12	6M146827	04/28/17 22:10	01
LCS	WG612085-06	6M146828	04/28/17 22:41	01
MW-80-ODLB-14	L17041203-10	6M146830	04/28/17 23:42	01

Report Name: BLANK_SUMMARY
PDF File ID: 5269888
Report generated 07/25/2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/29/17 19:55 Sample ID:WG612123-01
Instrument ID:HPMS11 Run Date:04/29/17 19:55 Prep Method:5030B/5030C/503
File ID:11M17871 Analyst:TMB Method:8260B
Workgroup (AAB#):WG612123 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	99.1	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 16:50 Sample ID:WG612295-01
Instrument ID:HPMS11 Run Date:05/01/17 16:50 Prep Method:5030B/5030C/503
File ID:11M17936 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612295 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 16:50 Sample ID:WG612295-01
Instrument ID:HPMS11 Run Date:05/01/17 16:50 Prep Method:5030B/5030C/503
File ID:11M17936 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612295 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS11-24-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	108	81 - 120	PASS
4-Bromofluorobenzene	107	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/30/17 15:48 Sample ID:WG612142-01
Instrument ID:HPMS17 Run Date:04/30/17 15:48 Prep Method:5030B/5030C/503
File ID:17M0273175 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612142 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	100	85	-	115	PASS
1,2-Dichloroethane-d4	103	72	-	119	PASS
Toluene-d8	101	81	-	120	PASS
4-Bromofluorobenzene	105	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/01/17 12:49 Sample ID:WG612250-01
Instrument ID:HPMS17 Run Date:05/01/17 12:49 Prep Method:5030B/5030C/503
File ID:17M0273205 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612250 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	101	85 - 115	PASS
1,2-Dichloroethane-d4	104	72 - 119	PASS
Toluene-d8	102	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/02/17 19:34 Sample ID:WG612551-01
Instrument ID:HPMS17 Run Date:05/02/17 19:34 Prep Method:5030B/5030C/503
File ID:17M0273263 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612551 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:05/02/17 19:34 Sample ID:WG612551-01
Instrument ID:HPMS17 Run Date:05/02/17 19:34 Prep Method:5030B/5030C/503
File ID:17M0273263 Analyst:ADC Method:8260B
Workgroup (AAB#):WG612551 Matrix:Water Units:ug/L
Contract #: Cal ID:HPMS17-26-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.9	85 - 115	PASS
1,2-Dichloroethane-d4	99.2	72 - 119	PASS
Toluene-d8	101	81 - 120	PASS
4-Bromofluorobenzene	106	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/28/17 20:38 Sample ID:WG612085-01
Instrument ID:HPMS6 Run Date:04/28/17 20:38 Prep Method:5030B/5030C/503
File ID:6M146824 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612085 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.490	1	F
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.409	1	F
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.126	1	F
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U
Dibromomethane	0.250	1.00	0.250	1	U

Report Name:BLANK
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METHOD BLANK REPORT

Login Number:L17041203 Prep Date:04/28/17 20:38 Sample ID:WG612085-01
Instrument ID:HPMS6 Run Date:04/28/17 20:38 Prep Method:5030B/5030C/503
File ID:6M146824 Analyst:JDS Method:8260B
Workgroup (AAB#):WG612085 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-05-APR-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.272	1	F
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.238	1	F
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	108	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	110	76 - 119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5268575
25-JUL-2017 13:45

Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	94.2	81 - 129	
1,1,1-Trichloroethane	20.0	20.6	103	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	18.0	90.2	63 - 128	
1,1,2-Trichloroethane	20.0	18.7	93.3	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.8	69 - 133	
1,1-Dichloroethene	20.0	19.6	98.2	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.3	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.7	98.5	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.3	107	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.4	102	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.9	69 - 132	
1,2-Dichlorobenzene	20.0	19.8	98.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.3	96.4	50 - 132	
1,2-Dichloropropane	20.0	19.5	97.6	75 - 125	
1,2-Dibromoethane	20.0	19.2	96.0	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.5	103	74 - 131	
1,3-Dichlorobenzene	20.0	20.1	100	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	18.7	93.3	74 - 123	
1-Chlorohexane	20.0	20.7	103	70 - 125	
2,2-Dichloropropane	20.0	17.0	85.1	69 - 137	
2-Hexanone	20.0	21.2	106	55 - 130	
2-Chlorotoluene	20.0	18.5	92.4	73 - 126	
4-Chlorotoluene	20.0	19.7	98.7	74 - 128	
Acetone	20.0	18.9	94.6	40 - 135	
Benzene	20.0	19.5	97.6	81 - 122	
Bromobenzene	20.0	19.5	97.6	76 - 124	
Bromochloromethane	20.0	19.3	96.3	65 - 129	
Bromodichloromethane	20.0	19.3	96.4	76 - 121	
Bromoform	20.0	18.2	90.8	69 - 128	
Bromomethane	20.0	20.2	101	30 - 141	
Carbon disulfide	20.0	14.2	70.8	58 - 128	
Carbon tetrachloride	20.0	20.4	102	66 - 138	
Chlorobenzene	20.0	19.5	97.3	81 - 122	
Chloroethane	20.0	21.8	109	58 - 133	
Chloroform	20.0	20.6	103	69 - 128	
Chloromethane	20.0	17.8	89.0	56 - 131	
cis-1,2-Dichloroethene	20.0	19.5	97.7	72 - 126	
cis-1,3-Dichloropropene	20.0	20.6	103	69 - 131	
Dibromochloromethane	20.0	19.3	96.7	66 - 133	

LCS - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612123-02
Instrument ID: HPMS11 Run Time: 20:24 Prep Method: 5030B/5030C/503
File ID: 11M17872 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG612123 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.9	99.6	76 - 125	
Dichlorodifluoromethane	20.0	23.1	115	30 - 153	
Ethylbenzene	20.0	20.1	100	73 - 127	
Hexachlorobutadiene	20.0	19.1	95.7	67 - 131	
Isopropylbenzene	20.0	20.0	100	75 - 127	
Methylene chloride	20.0	18.7	93.3	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.0	94.9	65 - 123	
MEK (2-Butanone)	20.0	19.3	96.7	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.6	58 - 134	
n-Butylbenzene	20.0	21.4	107	69 - 137	
n-Propylbenzene	20.0	19.6	97.9	72 - 129	
m-,p-Xylene	40.0	40.6	102	76 - 128	
Naphthalene	20.0	21.2	106	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	19.5	97.3	72 - 127	
Styrene	20.0	22.2	111	65 - 134	
Trichloroethene	20.0	19.0	95.1	70 - 127	
tert-Butylbenzene	20.0	19.2	96.1	70 - 129	
Tetrachloroethene	20.0	20.4	102	66 - 128	
Toluene	20.0	19.2	96.1	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	20.7	103	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	105	72 - 119	PASS
Toluene-d8	105	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

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Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612295-02
Instrument ID: HPMS11 Run Time: 17:20 Prep Method: 5030B/5030C/503
File ID: 11M17937 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612295 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81656 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.3	96.3	81 - 129	
1,1,1-Trichloroethane	20.0	21.3	106	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.2	95.9	63 - 128	
1,1,2-Trichloroethane	20.0	19.3	96.4	75 - 125	
1,1-Dichloroethane	20.0	19.7	98.5	69 - 133	
1,1-Dichloroethene	20.0	19.9	99.7	68 - 130	
1,1-Dichloropropene	20.0	20.3	101	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.3	101	67 - 137	
1,2,3-Trichloropropane	20.0	19.4	97.1	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.1	105	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.9	104	74 - 132	
1,2-Dichloroethane	20.0	19.8	98.8	69 - 132	
1,2-Dichlorobenzene	20.0	20.3	101	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	18.0	90.1	50 - 132	
1,2-Dichloropropane	20.0	19.6	97.8	75 - 125	
1,2-Dibromoethane	20.0	19.5	97.4	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.2	106	74 - 131	
1,3-Dichlorobenzene	20.0	20.3	101	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	19.2	95.8	74 - 123	
1-Chlorohexane	20.0	21.9	110	70 - 125	
2,2-Dichloropropane	20.0	20.0	99.8	69 - 137	
2-Hexanone	20.0	19.6	98.0	55 - 130	
2-Chlorotoluene	20.0	18.1	90.7	73 - 126	
4-Chlorotoluene	20.0	20.6	103	74 - 128	
Acetone	20.0	18.5	92.3	40 - 135	
Benzene	20.0	20.1	100	81 - 122	
Bromobenzene	20.0	19.6	98.0	76 - 124	
Bromochloromethane	20.0	19.9	99.4	65 - 129	
Bromodichloromethane	20.0	19.2	96.0	76 - 121	
Bromoform	20.0	17.8	88.9	69 - 128	
Bromomethane	20.0	20.5	102	30 - 141	
Carbon disulfide	20.0	16.7	83.3	58 - 128	
Carbon tetrachloride	20.0	20.7	104	66 - 138	
Chlorobenzene	20.0	19.7	98.5	81 - 122	
Chloroethane	20.0	22.1	111	58 - 133	
Chloroform	20.0	20.8	104	69 - 128	
Chloromethane	20.0	15.3	76.4	56 - 131	
cis-1,2-Dichloroethene	20.0	19.6	98.2	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	19.3	96.5	66 - 133	

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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612295-02
Instrument ID: HPMS11 Run Time: 17:20 Prep Method: 5030B/5030C/503
File ID: 11M17937 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612295 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81656 Cal ID: HPMS11-24-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.6	76 - 125	
Dichlorodifluoromethane	20.0	24.5	123	30 - 153	
Ethylbenzene	20.0	21.0	105	73 - 127	
Hexachlorobutadiene	20.0	19.8	99.1	67 - 131	
Isopropylbenzene	20.0	20.8	104	75 - 127	
Methylene chloride	20.0	19.0	94.8	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.4	65 - 123	
MEK (2-Butanone)	20.0	18.8	93.8	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	18.5	92.4	58 - 134	
n-Butylbenzene	20.0	22.0	110	69 - 137	
n-Propylbenzene	20.0	20.1	101	72 - 129	
m-,p-Xylene	40.0	41.8	104	76 - 128	
Naphthalene	20.0	20.9	105	54 - 138	
o-Xylene	20.0	20.5	102	80 - 121	
p-Isopropyltoluene	20.0	21.8	109	73 - 130	
sec-Butylbenzene	20.0	20.2	101	72 - 127	
Styrene	20.0	22.5	112	65 - 134	
Trichloroethene	20.0	19.1	95.4	70 - 127	
tert-Butylbenzene	20.0	19.4	97.1	70 - 129	
Tetrachloroethene	20.0	21.3	106	66 - 128	
Toluene	20.0	19.6	98.2	77 - 122	
trans-1,2-Dichloroethene	20.0	19.5	97.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.8	98.8	59 - 135	
Trichlorofluoromethane	20.0	20.6	103	57 - 129	
Vinyl chloride	20.0	16.1	80.7	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	103	72 - 119	PASS
Toluene-d8	107	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.8	93.8	81 - 129	
1,1,1-Trichloroethane	20.0	20.4	102	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.0	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.2	96.2	75 - 125	
1,1-Dichloroethane	20.0	20.2	101	69 - 133	
1,1-Dichloroethene	20.0	19.7	98.4	68 - 130	
1,1-Dichloropropene	20.0	19.8	99.1	73 - 132	
1,2,3-Trichlorobenzene	20.0	18.1	90.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.6	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.7	93.7	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.7	98.6	74 - 132	
1,2-Dichloroethane	20.0	19.5	97.3	69 - 132	
1,2-Dichlorobenzene	20.0	18.9	94.5	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.1	101	50 - 132	
1,2-Dichloropropane	20.0	19.8	99.1	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.7	98.7	74 - 131	
1,3-Dichlorobenzene	20.0	19.1	95.3	75 - 124	
1,3-Dichloropropane	20.0	20.2	101	73 - 126	
1,4-Dichlorobenzene	20.0	18.8	93.8	74 - 123	
1-Chlorohexane	20.0	20.6	103	70 - 125	
2,2-Dichloropropane	20.0	20.9	104	69 - 137	
2-Hexanone	20.0	20.6	103	55 - 130	
2-Chlorotoluene	20.0	19.2	95.8	73 - 126	
4-Chlorotoluene	20.0	19.9	99.7	74 - 128	
Acetone	20.0	19.0	94.9	40 - 135	
Benzene	20.0	19.7	98.4	81 - 122	
Bromobenzene	20.0	18.6	93.2	76 - 124	
Bromochloromethane	20.0	19.9	99.6	65 - 129	
Bromodichloromethane	20.0	19.2	96.1	76 - 121	
Bromoform	20.0	19.1	95.3	69 - 128	
Bromomethane	20.0	17.2	86.0	30 - 141	
Carbon disulfide	20.0	16.2	80.8	58 - 128	
Carbon tetrachloride	20.0	19.6	98.0	66 - 138	
Chlorobenzene	20.0	19.0	95.0	81 - 122	
Chloroethane	20.0	19.0	95.1	58 - 133	
Chloroform	20.0	20.1	101	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	19.3	96.6	72 - 126	
cis-1,3-Dichloropropene	20.0	21.0	105	69 - 131	
Dibromochloromethane	20.0	18.9	94.6	66 - 133	

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Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612142-02
Instrument ID: HPMS17 Run Time: 16:07 Prep Method: 5030B/5030C/503
File ID: 17M0273176 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612142 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.7	98.7	76 - 125	
Dichlorodifluoromethane	20.0	24.9	124	30 - 153	
Ethylbenzene	20.0	19.9	99.3	73 - 127	
Hexachlorobutadiene	20.0	17.5	87.4	67 - 131	
Isopropylbenzene	20.0	19.3	96.5	75 - 127	
Methylene chloride	20.0	18.9	94.7	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.3	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.7	98.5	58 - 134	
n-Butylbenzene	20.0	20.3	101	69 - 137	
n-Propylbenzene	20.0	19.7	98.4	72 - 129	
m-,p-Xylene	40.0	39.6	99.1	76 - 128	
Naphthalene	20.0	18.1	90.6	54 - 138	
o-Xylene	20.0	19.3	96.5	80 - 121	
p-Isopropyltoluene	20.0	19.7	98.6	73 - 130	
sec-Butylbenzene	20.0	19.6	98.0	72 - 127	
Styrene	20.0	20.2	101	65 - 134	
Trichloroethene	20.0	18.1	90.7	70 - 127	
tert-Butylbenzene	20.0	19.3	96.5	70 - 129	
Tetrachloroethene	20.0	19.3	96.5	66 - 128	
Toluene	20.0	19.9	99.6	77 - 122	
trans-1,2-Dichloroethene	20.0	19.7	98.6	63 - 137	
trans-1,3-Dichloropropene	20.0	19.7	98.3	59 - 135	
Trichlorofluoromethane	20.0	20.5	103	57 - 129	
Vinyl chloride	20.0	23.1	115	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	98.4	85 - 115	PASS
1,2-Dichloroethane-d4	100	72 - 119	PASS
Toluene-d8	99.4	81 - 120	PASS
4-Bromofluorobenzene	96.4	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612551-02
Instrument ID: HPMS17 Run Time: 19:53 Prep Method: 5030B/5030C/503
File ID: 17M0273264 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612551 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	19.3	96.5	81 - 129	
1,1,1-Trichloroethane	20.0	21.0	105	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	21.1	105	63 - 128	
1,1,2-Trichloroethane	20.0	19.5	97.3	75 - 125	
1,1-Dichloroethane	20.0	21.0	105	69 - 133	
1,1-Dichloroethene	20.0	20.2	101	68 - 130	
1,1-Dichloropropene	20.0	20.3	102	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.9	89.5	67 - 137	
1,2,3-Trichloropropane	20.0	19.3	96.3	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.8	93.9	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.2	101	74 - 132	
1,2-Dichloroethane	20.0	19.9	99.7	69 - 132	
1,2-Dichlorobenzene	20.0	19.1	95.7	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	19.4	97.2	50 - 132	
1,2-Dichloropropane	20.0	20.4	102	75 - 125	
1,2-Dibromoethane	20.0	19.1	95.7	80 - 121	
1,3,5-Trimethylbenzene	20.0	20.3	101	74 - 131	
1,3-Dichlorobenzene	20.0	19.7	98.4	75 - 124	
1,3-Dichloropropane	20.0	20.5	102	73 - 126	
1,4-Dichlorobenzene	20.0	19.4	96.9	74 - 123	
1-Chlorohexane	20.0	21.6	108	70 - 125	
2,2-Dichloropropane	20.0	21.6	108	69 - 137	
2-Hexanone	20.0	20.2	101	55 - 130	
2-Chlorotoluene	20.0	19.7	98.5	73 - 126	
4-Chlorotoluene	20.0	20.4	102	74 - 128	
Acetone	20.0	18.3	91.7	40 - 135	
Benzene	20.0	20.3	102	81 - 122	
Bromobenzene	20.0	19.1	95.4	76 - 124	
Bromochloromethane	20.0	20.3	101	65 - 129	
Bromodichloromethane	20.0	19.7	98.6	76 - 121	
Bromoform	20.0	19.0	95.1	69 - 128	
Bromomethane	20.0	19.2	96.1	30 - 141	
Carbon disulfide	20.0	16.3	81.4	58 - 128	
Carbon tetrachloride	20.0	20.5	102	66 - 138	
Chlorobenzene	20.0	19.6	98.0	81 - 122	
Chloroethane	20.0	19.5	97.3	58 - 133	
Chloroform	20.0	20.7	103	69 - 128	
Chloromethane	20.0	24.8	124	56 - 131	
cis-1,2-Dichloroethene	20.0	19.9	99.3	72 - 126	
cis-1,3-Dichloropropene	20.0	21.7	108	69 - 131	
Dibromochloromethane	20.0	19.1	95.3	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612551-02
Instrument ID: HPMS17 Run Time: 19:53 Prep Method: 5030B/5030C/503
File ID: 17M0273264 Analyst: ADC Method: 8260B
Workgroup (AAB#): WG612551 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81596 Cal ID: HPMS17-26-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.8	99.2	76 - 125	
Dichlorodifluoromethane	20.0	24.0	120	30 - 153	
Ethylbenzene	20.0	20.2	101	73 - 127	
Hexachlorobutadiene	20.0	18.5	92.3	67 - 131	
Isopropylbenzene	20.0	19.6	97.9	75 - 127	
Methylene chloride	20.0	19.6	97.8	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	19.3	96.6	65 - 123	
MEK (2-Butanone)	20.0	20.0	99.9	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.5	97.6	58 - 134	
n-Butylbenzene	20.0	20.9	105	69 - 137	
n-Propylbenzene	20.0	20.3	102	72 - 129	
m-,p-Xylene	40.0	40.4	101	76 - 128	
Naphthalene	20.0	17.5	87.6	54 - 138	
o-Xylene	20.0	19.9	99.3	80 - 121	
p-Isopropyltoluene	20.0	20.3	102	73 - 130	
sec-Butylbenzene	20.0	20.0	100	72 - 127	
Styrene	20.0	20.6	103	65 - 134	
Trichloroethene	20.0	19.1	95.4	70 - 127	
tert-Butylbenzene	20.0	19.5	97.4	70 - 129	
Tetrachloroethene	20.0	20.0	100	66 - 128	
Toluene	20.0	20.4	102	77 - 122	
trans-1,2-Dichloroethene	20.0	20.2	101	63 - 137	
trans-1,3-Dichloropropene	20.0	19.9	99.3	59 - 135	
Trichlorofluoromethane	20.0	21.0	105	57 - 129	
Vinyl chloride	20.0	23.9	120	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	102	85 - 115	PASS
1,2-Dichloroethane-d4	102	72 - 119	PASS
Toluene-d8	103	81 - 120	PASS
4-Bromofluorobenzene	104	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612085-02
Instrument ID: HPMS6 Run Time: 21:09 Prep Method: 5030B/5030C/503
File ID: 6M146825 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612085 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	18.1	90.7	81 - 129	
1,1,1-Trichloroethane	20.0	19.9	99.3	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	19.8	98.8	63 - 128	
1,1,2-Trichloroethane	20.0	19.0	95.1	75 - 125	
1,1-Dichloroethane	20.0	20.5	102	69 - 133	
1,1-Dichloroethene	20.0	20.1	100	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.6	73 - 132	
1,2,3-Trichlorobenzene	20.0	17.5	87.4	67 - 137	
1,2,3-Trichloropropane	20.0	19.6	98.1	73 - 124	
1,2,4-Trichlorobenzene	20.0	18.1	90.5	66 - 134	
1,2,4-Trimethylbenzene	20.0	19.6	98.2	74 - 132	
1,2-Dichloroethane	20.0	20.1	101	69 - 132	
1,2-Dichlorobenzene	20.0	18.2	90.8	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.4	102	50 - 132	
1,2-Dichloropropane	20.0	20.1	101	75 - 125	
1,2-Dibromoethane	20.0	18.9	94.3	80 - 121	
1,3,5-Trimethylbenzene	20.0	19.5	97.3	74 - 131	
1,3-Dichlorobenzene	20.0	17.8	89.2	75 - 124	
1,3-Dichloropropane	20.0	20.6	103	73 - 126	
1,4-Dichlorobenzene	20.0	18.0	89.9	74 - 123	
1-Chlorohexane	20.0	20.4	102	70 - 125	
2,2-Dichloropropane	20.0	20.8	104	69 - 137	
2-Hexanone	20.0	22.3	112	55 - 130	
2-Chlorotoluene	20.0	19.6	98.2	73 - 126	
4-Chlorotoluene	20.0	19.2	96.0	74 - 128	
Acetone	20.0	23.4	117	40 - 135	
Benzene	20.0	19.2	95.9	81 - 122	
Bromobenzene	20.0	18.2	91.1	76 - 124	
Bromochloromethane	20.0	20.3	101	65 - 129	
Bromodichloromethane	20.0	19.1	95.4	76 - 121	
Bromoform	20.0	17.2	85.8	69 - 128	
Bromomethane	20.0	15.9	79.6	30 - 141	
Carbon disulfide	20.0	16.4	82.0	58 - 128	
Carbon tetrachloride	20.0	19.2	95.9	66 - 138	
Chlorobenzene	20.0	18.1	90.6	81 - 122	
Chloroethane	20.0	21.3	107	58 - 133	
Chloroform	20.0	18.3	91.6	69 - 128	
Chloromethane	20.0	22.1	111	56 - 131	
cis-1,2-Dichloroethene	20.0	18.9	94.5	72 - 126	
cis-1,3-Dichloropropene	20.0	21.4	107	69 - 131	
Dibromochloromethane	20.0	18.1	90.4	66 - 133	

LCS - Modified 03/06/2008
PDF File ID: 5268576
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Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612085-02
Instrument ID: HPMS6 Run Time: 21:09 Prep Method: 5030B/5030C/503
File ID: 6M146825 Analyst: JDS Method: 8260B
Workgroup (AAB#): WG612085 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD81654 Cal ID: HPMS6-05-APR-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromomethane	20.0	19.6	98.2	76 - 125	
Dichlorodifluoromethane	20.0	23.6	118	30 - 153	
Ethylbenzene	20.0	18.5	92.6	73 - 127	
Hexachlorobutadiene	20.0	17.2	86.2	67 - 131	
Isopropylbenzene	20.0	18.7	93.6	75 - 127	
Methylene chloride	20.0	19.0	94.9	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	21.2	106	65 - 123	
MEK (2-Butanone)	20.0	21.8	109	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	21.1	106	58 - 134	
n-Butylbenzene	20.0	20.0	100	69 - 137	
n-Propylbenzene	20.0	19.3	96.3	72 - 129	
m-,p-Xylene	40.0	37.3	93.4	76 - 128	
Naphthalene	20.0	18.6	93.1	54 - 138	
o-Xylene	20.0	18.9	94.6	80 - 121	
p-Isopropyltoluene	20.0	19.2	96.1	73 - 130	
sec-Butylbenzene	20.0	19.2	95.8	72 - 127	
Styrene	20.0	19.2	95.9	65 - 134	
Trichloroethene	20.0	17.3	86.6	70 - 127	
tert-Butylbenzene	20.0	18.6	92.9	70 - 129	
Tetrachloroethene	20.0	18.1	90.6	66 - 128	
Toluene	20.0	18.9	94.6	77 - 122	
trans-1,2-Dichloroethene	20.0	18.6	93.1	63 - 137	
trans-1,3-Dichloropropene	20.0	20.5	103	59 - 135	
Trichlorofluoromethane	20.0	18.9	94.7	57 - 129	
Vinyl chloride	20.0	22.0	110	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	103	85 - 115	PASS
1,2-Dichloroethane-d4	107	72 - 119	PASS
Toluene-d8	106	81 - 120	PASS
4-Bromofluorobenzene	107	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5268576
Report generated: 07/25/2017 13:45

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
1,1,1,2-Tetrachloroethane	20.0	18.9	94.5	20.0	19.4	97.0	2.58	81 - 129	20	
1,1,1-Trichloroethane	20.0	20.3	101	20.0	21.0	105	3.24	67 - 132	20	
1,1,2,2-Tetrachloroethane	20.0	21.3	106	20.0	22.3	111	4.49	63 - 128	20	
1,1,2-Trichloroethane	20.0	19.3	96.5	20.0	19.9	99.5	3.04	75 - 125	20	
1,1-Dichloroethane	20.0	20.2	101	20.0	20.8	104	2.71	69 - 133	20	
1,1-Dichloroethene	20.0	20.3	102	20.0	20.4	102	0.506	68 - 130	20	
1,1-Dichloropropene	20.0	19.5	97.6	20.0	20.4	102	4.26	73 - 132	20	
1,2,3-Trichlorobenzene	20.0	18.5	92.4	20.0	19.3	96.4	4.20	67 - 137	20	
1,2,3-Trichloropropane	20.0	19.4	97.1	20.0	20.3	102	4.56	73 - 124	20	
1,2,4-Trichlorobenzene	20.0	19.0	95.2	20.0	19.7	98.7	3.56	66 - 134	20	
1,2,4-Trimethylbenzene	20.0	20.0	100	20.0	20.6	103	2.71	74 - 132	20	
1,2-Dibromo-3-chloropropane	20.0	19.2	96.0	20.0	20.7	103	7.46	50 - 132	20	
1,2-Dibromoethane	20.0	19.2	95.8	20.0	19.6	97.9	2.24	80 - 121	20	
1,2-Dichlorobenzene	20.0	19.4	96.8	20.0	19.8	99.2	2.43	71 - 122	20	
1,2-Dichloroethane	20.0	19.8	98.8	20.0	20.3	101	2.66	69 - 132	20	
1,2-Dichloropropane	20.0	19.7	98.7	20.0	20.5	103	3.74	75 - 125	20	
1,3,5-Trimethylbenzene	20.0	19.9	99.5	20.0	20.5	103	3.22	74 - 131	20	
1,3-Dichlorobenzene	20.0	19.4	97.1	20.0	20.0	99.9	2.92	75 - 124	20	
1,3-Dichloropropane	20.0	20.2	101	20.0	21.0	105	3.78	73 - 126	20	
1,4-Dichlorobenzene	20.0	19.2	95.9	20.0	19.8	99.2	3.42	74 - 123	20	
1-Chlorohexane	20.0	20.7	104	20.0	21.7	108	4.47	70 - 125	20	
2,2-Dichloropropane	20.0	21.1	106	20.0	21.5	108	1.87	69 - 137	20	
MEK (2-Butanone)	20.0	18.5	92.6	20.0	19.6	97.9	5.47	49 - 136	20	
2-Chlorotoluene	20.0	19.5	97.3	20.0	20.0	99.9	2.55	73 - 126	20	
2-Hexanone	20.0	20.2	101	20.0	21.1	105	4.19	55 - 130	20	
4-Chlorotoluene	20.0	20.2	101	20.0	20.8	104	2.90	74 - 128	20	
MIBK (methyl isobutyl ketone)	20.0	19.3	96.6	20.0	20.7	104	6.94	58 - 134	20	
Acetone	20.0	16.6	83.0	20.0	17.4	87.1	4.83	40 - 135	20	
Benzene	20.0	19.6	97.8	20.0	20.3	102	3.83	81 - 122	20	
Bromobenzene	20.0	18.9	94.7	20.0	19.4	97.2	2.55	76 - 124	20	
Bromochloromethane	20.0	20.0	100	20.0	20.6	103	2.87	65 - 129	20	
Bromodichloromethane	20.0	19.2	96.0	20.0	19.8	98.9	2.99	76 - 121	20	
Bromoform	20.0	19.1	95.5	20.0	19.7	98.5	3.10	69 - 128	20	
Bromomethane	20.0	17.1	85.6	20.0	17.8	88.9	3.81	30 - 141	20	
Carbon disulfide	20.0	16.7	83.3	20.0	16.8	83.9	0.693	58 - 128	20	
Carbon tetrachloride	20.0	19.8	99.1	20.0	20.5	102	3.34	66 - 138	20	
Chlorobenzene	20.0	19.1	95.4	20.0	19.6	97.9	2.57	81 - 122	20	
Chloroethane	20.0	20.4	102	20.0	19.7	98.3	3.89	58 - 133	20	
Chloroform	20.0	20.1	100	20.0	20.8	104	3.41	69 - 128	20	
Chloromethane	20.0	21.9	109	20.0	22.9	114	4.56	56 - 131	20	

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17041203 Analyst: ADC Prep Method: 5030B/5030C/503
Instrument ID: HPMS17 Matrix: Water Method: 8260B
Workgroup (AAB#): WG612250 Units: ug/L
QC Key: AF40 Lot #: STD81596

Sample ID: WG612250-02 LCS File ID: 17M0273206 Run Date: 05/01/2017 13:09
Sample ID: WG612250-03 LCS2 File ID: 17M0273207 Run Date: 05/01/2017 13:29

Analytes	LCS			LCS2			%RPD	%Rec Limits	RPD Lmt	Q
	Known	Found	% REC	Known	Found	% REC				
cis-1,2-Dichloroethene	20.0	19.3	96.4	20.0	20.0	100	3.87	72 - 126	20	
cis-1,3-Dichloropropene	20.0	21.1	105	20.0	21.9	110	3.82	69 - 131	20	
Dibromochloromethane	20.0	18.9	94.7	20.0	19.5	97.4	2.86	66 - 133	20	
Dibromomethane	20.0	19.8	98.8	20.0	20.4	102	3.09	76 - 125	20	
Dichlorodifluoromethane	20.0	24.8	124	20.0	24.6	123	0.901	30 - 153	20	
Ethylbenzene	20.0	19.5	97.7	20.0	20.2	101	3.09	73 - 127	20	
Hexachlorobutadiene	20.0	18.2	90.9	20.0	18.5	92.3	1.53	67 - 131	20	
Isopropylbenzene	20.0	19.0	94.9	20.0	19.7	98.7	3.91	75 - 127	20	
m-,p-Xylene	40.0	39.2	98.0	40.0	40.4	101	2.97	76 - 128	20	
Methyl t-butyl ether (MTBE)	20.0	19.6	98.1	20.0	20.1	101	2.56	65 - 123	20	
Methylene chloride	20.0	19.6	97.8	20.0	19.7	98.4	0.646	63 - 137	20	
n-Butylbenzene	20.0	20.6	103	20.0	21.2	106	3.05	69 - 137	20	
n-Propylbenzene	20.0	20.0	100	20.0	20.5	103	2.35	72 - 129	20	
Naphthalene	20.0	18.1	90.5	20.0	19.3	96.4	6.35	54 - 138	20	
o-Xylene	20.0	19.2	95.9	20.0	19.8	99.1	3.25	80 - 121	20	
p-Isopropyltoluene	20.0	20.0	99.8	20.0	20.6	103	3.11	73 - 130	20	
sec-Butylbenzene	20.0	19.8	99.0	20.0	20.3	102	2.65	72 - 127	20	
Styrene	20.0	20.2	101	20.0	20.8	104	2.70	65 - 134	20	
tert-Butylbenzene	20.0	19.3	96.6	20.0	19.7	98.5	2.03	70 - 129	20	
Tetrachloroethene	20.0	19.3	96.4	20.0	19.9	99.4	3.05	66 - 128	20	
Toluene	20.0	19.8	98.9	20.0	20.4	102	2.98	77 - 122	20	
trans-1,2-Dichloroethene	20.0	19.6	98.0	20.0	20.1	100	2.26	63 - 137	20	
trans-1,3-Dichloropropene	20.0	19.5	97.7	20.0	20.6	103	5.06	59 - 135	20	
Trichloroethene	20.0	18.1	90.5	20.0	18.7	93.5	3.26	70 - 127	20	
Trichlorofluoromethane	20.0	21.0	105	20.0	21.1	106	0.598	57 - 129	20	
Vinyl chloride	20.0	23.2	116	20.0	23.5	118	1.49	50 - 134	20	

Surogates	LCS	LCS2	Surrogate Limits	Qualifier
	% Recovery	% Recovery		
1,2-Dichloroethane-d4	104	103	72 - 119	PASS
Dibromofluoromethane	103	101	85 - 115	PASS
4-Bromofluorobenzene	109	102	76 - 119	PASS
Toluene-d8	105	102	81 - 120	PASS

* EXCEEDS %REC LIMIT

\# EXCEEDS RPD LIMIT

LCS_LCS2 - Modified 03/06/2008
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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS6- 05-APR-17 Worknum: WG612085

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-10 File ID: 6M146830 Dil: 1 Method: 5035A

Sample ID: L17041203-11 MS File ID: 6M146826 Dil: 1 Matrix: 8260B

Sample ID: L17041203-12 MSD File ID: 6M146827 Dil: 1 Units: Water ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.7	93.3	20.0	18.3	91.7	1.74	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	20.4	102	20.0	19.7	98.6	3.13	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.3	107	20.0	21.5	107	0.784	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.8	98.8	20.0	19.7	98.4	0.422	75 - 125	20	
1,1-Dichloroethane	U	20.0	21.4	107	20.0	21.1	105	1.39	69 - 133	20	
1,1-Dichloroethene	U	20.0	20.7	104	20.0	20.6	103	0.867	68 - 130	20	
1,1-Dichloropropene	U	20.0	20.2	101	20.0	20.0	99.8	1.28	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	17.8	88.9	20.0	17.6	88	0.989	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.7	103	20.0	20.5	102	0.918	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.5	92.4	20.0	18.5	92.4	0.0012	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	102	20.0	20.0	100	1.36	74 - 132	20	
1,2-Dichloroethane	U	20.0	20.9	104	20.0	20.9	104	0.0869	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.7	93.5	20.0	18.8	93.8	0.388	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	22.7	114	20.0	21.5	108	5.29	50 - 132	20	
1,2-Dichloropropane	U	20.0	21.2	106	20.0	20.9	105	1.43	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.1	95.7	20.0	19.2	95.9	0.236	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.1	101	20.0	19.9	99.4	1.30	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	18.8	93.9	20.0	18.4	92.1	1.93	75 - 124	20	
1,3-Dichloropropane	U	20.0	21.3	106	20.0	21.2	106	0.343	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.7	93.7	20.0	18.7	93.3	0.433	74 - 123	20	
1-Chlorohexane	U	20.0	20.7	104	20.0	20.3	102	1.79	70 - 125	20	
2,2-Dichloropropane	U	20.0	20.2	101	20.0	16.1	80.6	22.6	69 - 137	20	#
2-Hexanone	U	20.0	23.6	118	20.0	23.6	118	0.163	55 - 130	20	
2-Chlorotoluene	U	20.0	20.2	101	20.0	19.1	95.7	5.19	73 - 126	20	
4-Chlorotoluene	U	20.0	20.4	102	20.0	20.8	104	2.00	74 - 128	20	
Acetone	U	20.0	25.0	125	20.0	24.6	123	1.62	40 - 135	20	
Benzene	U	20.0	19.8	99.1	20.0	19.7	98.3	0.748	81 - 122	20	
Bromobenzene	U	20.0	19.1	95.3	20.0	18.7	93.4	2.08	76 - 124	20	
Bromochloromethane	U	20.0	20.1	100	20.0	19.8	99.2	1.25	65 - 129	20	
Bromodichloromethane	U	20.0	20.0	99.8	20.0	19.6	97.9	1.91	76 - 121	20	
Bromoform	U	20.0	17.8	89.2	20.0	18.0	89.8	0.710	69 - 128	20	
Bromomethane	U	20.0	16.8	83.8	20.0	17.2	85.8	2.34	30 - 141	20	
Carbon disulfide	U	20.0	16.9	84.6	20.0	16.6	82.9	2.02	58 - 128	20	
Carbon tetrachloride	U	20.0	19.1	95.4	20.0	18.2	90.8	4.99	66 - 138	20	
Chlorobenzene	U	20.0	18.8	94.2	20.0	18.6	93	1.31	81 - 122	20	
Chloroethane	U	20.0	22.0	110	20.0	21.4	107	2.66	58 - 133	20	
Chloroform	U	20.0	19.0	94.9	20.0	18.9	94.4	0.566	69 - 128	20	
Chloromethane	U	20.0	21.5	108	20.0	21.3	107	1.04	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	19.7	98.7	20.0	19.5	97.7	1.06	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	22.0	110	20.0	21.8	109	0.904	69 - 131	20	
Dibromochloromethane	U	20.0	18.7	93.5	20.0	18.7	93.7	0.220	66 - 133	20	

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS6 05-APR-17 Worknum: WG612085

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-10 File ID: 6M146830 Dil: 1 Method: 5035A

Sample ID: L17041203-11 MS File ID: 6M146826 Dil: 1 Matrix: 8260B

Sample ID: L17041203-12 MSD File ID: 6M146827 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	20.1	101	20.0	20.2	101	0.473	76 - 125	20	
Dichlorodifluoromethane	U	20.0	23.0	115	20.0	22.5	112	2.38	30 - 153	20	
Ethylbenzene	U	20.0	18.9	94.7	20.0	18.7	93.4	1.40	73 - 127	20	
Hexachlorobutadiene	U	20.0	18.2	91	20.0	17.9	89.3	1.86	67 - 131	20	
Isopropylbenzene	U	20.0	19.2	96.1	20.0	19.1	95.5	0.577	75 - 127	20	
Methylene chloride	U	20.0	19.6	98.2	20.0	19.7	98.7	0.558	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	21.7	108	20.0	21.7	109	0.215	65 - 123	20	
MEK (2-Butanone)	U	20.0	22.8	114	20.0	22.5	112	1.54	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	21.6	108	20.0	22.1	110	1.93	58 - 134	20	
n-Butylbenzene	U	20.0	20.7	104	20.0	20.4	102	1.49	69 - 137	20	
n-Propylbenzene	U	20.0	20.2	101	20.0	19.6	98.1	2.95	72 - 129	20	
m-,p-Xylene	U	40.0	38.3	95.7	40.0	38.1	95.2	0.484	76 - 128	20	
Naphthalene	U	20.0	19.5	97.5	20.0	19.6	98	0.548	54 - 138	20	
o-Xylene	U	20.0	19.4	97.2	20.0	19.4	97.1	0.151	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.1	100	20.0	19.8	99.1	1.21	73 - 130	20	
sec-Butylbenzene	U	20.0	19.9	99.3	20.0	19.5	97.5	1.77	72 - 127	20	
Styrene	U	20.0	19.6	98	20.0	19.7	98.5	0.431	65 - 134	20	
Trichloroethene	U	20.0	17.8	89.1	20.0	17.7	88.3	0.914	70 - 127	20	
tert-Butylbenzene	U	20.0	19.5	97.5	20.0	19.2	96	1.56	70 - 129	20	
Tetrachloroethene	U	20.0	18.6	93.1	20.0	18.3	91.6	1.71	66 - 128	20	
Toluene	U	20.0	19.6	97.9	20.0	19.5	97.5	0.441	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.7	98.6	20.0	19.1	95.4	3.28	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.8	104	20.0	20.0	99.8	4.27	59 - 135	20	
Trichlorofluoromethane	U	20.0	18.9	94.5	20.0	18.4	91.9	2.74	57 - 129	20	
Vinyl chloride	U	20.0	20.5	102	20.0	20.8	104	1.44	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS11- 24-APR-17 Worknum: WG612123

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-01 File ID: 11M17877 Dil: 1 Method: 5035A

Sample ID: L17041203-02 MS File ID: 11M17873 Dil: 1 Matrix: 8260B

Sample ID: L17041203-03 MSD File ID: 11M17874 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.3	91.5	20.0	18.0	90.2	1.45	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	19.1	95.7	20.0	19.3	96.7	1.01	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	20.2	101	20.0	19.0	95	6.33	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	18.8	93.8	20.0	18.3	91.7	2.19	75 - 125	20	
1,1-Dichloroethane	U	20.0	18.6	92.9	20.0	18.7	93.7	0.851	69 - 133	20	
1,1-Dichloroethene	U	20.0	17.8	89	20.0	17.8	89.2	0.224	68 - 130	20	
1,1-Dichloropropene	U	20.0	18.7	93.7	20.0	18.3	91.5	2.41	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	21.1	106	20.0	19.6	97.8	7.78	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	20.0	99.9	20.0	18.5	92.6	7.57	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	21.9	109	20.0	20.8	104	5.23	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.9	104	20.0	19.6	97.9	6.39	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.2	95.8	20.0	19.2	95.8	0.0426	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.6	103	20.0	19.3	96.7	6.49	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	19.3	96.5	20.0	18.9	94.6	2.05	50 - 132	20	
1,2-Dichloropropane	U	20.0	18.7	93.7	20.0	18.9	94.7	1.06	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.5	97.3	20.0	18.8	94.2	3.28	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.7	103	20.0	19.7	98.3	5.12	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	20.3	101	20.0	19.4	97.1	4.33	75 - 124	20	
1,3-Dichloropropane	U	20.0	19.9	99.3	20.0	19.3	96.3	3.03	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.6	97.8	20.0	18.2	90.9	7.32	74 - 123	20	
1-Chlorohexane	U	20.0	20.1	101	20.0	19.6	97.8	2.84	70 - 125	20	
2,2-Dichloropropane	U	20.0	18.4	91.8	20.0	18.2	91	0.921	69 - 137	20	
2-Hexanone	U	20.0	21.2	106	20.0	20.5	102	3.25	55 - 130	20	
2-Chlorotoluene	U	20.0	18.6	93	20.0	17.2	85.9	7.97	73 - 126	20	
4-Chlorotoluene	U	20.0	20.1	100	20.0	18.8	94.1	6.52	74 - 128	20	
Acetone	4.84	20.0	22.6	89	20.0	21.7	84.3	4.27	40 - 135	20	
Benzene	U	20.0	18.6	93.2	20.0	18.9	94.4	1.22	81 - 122	20	
Bromobenzene	U	20.0	19.7	98.7	20.0	19.0	94.8	4.01	76 - 124	20	
Bromochloromethane	U	20.0	18.5	92.6	20.0	18.5	92.6	0.0342	65 - 129	20	
Bromodichloromethane	U	20.0	18.7	93.6	20.0	18.7	93.7	0.0206	76 - 121	20	
Bromoform	U	20.0	18.3	91.5	20.0	17.3	86.7	5.35	69 - 128	20	
Bromomethane	U	20.0	18.5	92.4	20.0	17.9	89.5	3.21	30 - 141	20	
Carbon disulfide	U	20.0	13.5	67.6	20.0	13.2	66.1	2.24	58 - 128	20	
Carbon tetrachloride	U	20.0	18.8	93.9	20.0	18.5	92.6	1.33	66 - 138	20	
Chlorobenzene	U	20.0	18.9	94.7	20.0	18.6	93.1	1.72	81 - 122	20	
Chloroethane	U	20.0	20.5	102	20.0	20.4	102	0.444	58 - 133	20	
Chloroform	U	20.0	20.0	99.9	20.0	19.8	99.1	0.853	69 - 128	20	
Chloromethane	U	20.0	17.4	87.1	20.0	17.4	86.9	0.261	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	18.2	91.1	20.0	18.7	93.6	2.70	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	19.9	99.7	20.0	20.6	103	3.05	69 - 131	20	
Dibromochloromethane	U	20.0	18.7	93.6	20.0	18.7	93.5	0.0795	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS11 24-APR-17 Worknum: WG612123

Instrument ID: HPMS11 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-01 File ID: 11M17877 Dil: 1 Method: 5035A

Sample ID: L17041203-02 MS File ID: 11M17873 Dil: 1 Matrix: 8260B

Sample ID: L17041203-03 MSD File ID: 11M17874 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	18.9	94.4	20.0	19.5	97.3	2.96	76 - 125	20	
Dichlorodifluoromethane	U	20.0	21.0	105	20.0	20.5	102	2.48	30 - 153	20	
Ethylbenzene	U	20.0	19.6	98.1	20.0	19.1	95.5	2.70	73 - 127	20	
Hexachlorobutadiene	U	20.0	20.1	101	20.0	18.5	92.4	8.60	67 - 131	20	
Isopropylbenzene	U	20.0	19.6	97.9	20.0	19.2	95.9	2.05	75 - 127	20	
Methylene chloride	U	20.0	17.9	89.4	20.0	18.3	91.3	2.03	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	18.7	93.6	20.0	18.7	93.4	0.189	65 - 123	20	
MEK (2-Butanone)	U	20.0	19.4	96.8	20.0	19.1	95.4	1.40	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	18.0	89.9	20.0	18.2	91.1	1.42	58 - 134	20	
n-Butylbenzene	U	20.0	22.1	111	20.0	20.7	104	6.54	69 - 137	20	
n-Propylbenzene	U	20.0	19.7	98.4	20.0	18.5	92.5	6.25	72 - 129	20	
m-,p-Xylene	U	40.0	39.5	98.7	40.0	38.9	97.3	1.51	76 - 128	20	
Naphthalene	U	20.0	22.4	112	20.0	21.0	105	6.46	54 - 138	20	
o-Xylene	U	20.0	19.6	98.2	20.0	19.1	95.7	2.59	80 - 121	20	
p-Isopropyltoluene	U	20.0	21.5	107	20.0	20.2	101	6.15	73 - 130	20	
sec-Butylbenzene	U	20.0	19.5	97.5	20.0	18.5	92.5	5.27	72 - 127	20	
Styrene	U	20.0	21.8	109	20.0	21.1	105	3.42	65 - 134	20	
Trichloroethene	1.20	20.0	18.2	85	20.0	18.4	85.8	0.911	70 - 127	20	
tert-Butylbenzene	U	20.0	18.8	94	20.0	17.5	87.3	7.37	70 - 129	20	
Tetrachloroethene	U	20.0	19.4	96.8	20.0	18.8	93.8	3.18	66 - 128	20	
Toluene	U	20.0	18.7	93.6	20.0	18.2	91	2.78	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	17.5	87.6	20.0	17.6	88.2	0.646	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.5	97.5	20.0	19.1	95.3	2.31	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.4	97	20.0	18.9	94.6	2.53	57 - 129	20	
Vinyl chloride	U	20.0	20.7	103	20.0	20.0	99.9	3.53	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

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Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS17- 26-APR-17 Worknum: WG612142

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-19 File ID: 17M0273188 Dil: 1 Method: 5035A

Sample ID: L17041203-20 MS File ID: 17M0273177 Dil: 1 Matrix: 8260B

Sample ID: L17041203-21 MSD File ID: 17M0273178 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	18.7	93.7	20.0	18.2	91.1	2.89	81 - 129	20	
1,1,1-Trichloroethane	0.817	20.0	20.9	100	20.0	20.4	97.8	2.56	67 - 132	20	
1,1,2,2-Tetrachloroethane	U	20.0	21.4	107	20.0	21.3	106	0.686	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.5	97.7	20.0	18.9	94.6	3.17	75 - 125	20	
1,1-Dichloroethane	0.632	20.0	20.7	100	20.0	20.3	98.1	2.23	69 - 133	20	
1,1-Dichloroethene	9.50	20.0	26.9	87.1	20.0	26.8	86.3	0.617	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.6	98.1	20.0	19.2	95.8	2.34	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	18.3	91.3	20.0	17.4	86.8	5.11	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.2	96	20.0	19.0	94.8	1.27	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	18.8	94	20.0	18.0	89.8	4.59	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	19.5	97.5	20.0	19.0	94.8	2.80	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.9	99.7	20.0	19.4	97.1	2.65	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	18.9	94.5	20.0	18.3	91.6	3.07	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	20.3	102	20.0	20.1	101	1.00	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.9	99.6	20.0	19.5	97.5	2.15	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.2	96.1	20.0	18.6	92.9	3.35	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	19.5	97.7	20.0	18.8	94.1	3.77	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.0	94.8	20.0	18.3	91.7	3.34	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.6	103	20.0	19.9	99.6	3.24	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	18.8	94	20.0	18.4	92.1	2.01	74 - 123	20	
1-Chlorohexane	U	20.0	20.6	103	20.0	20.1	101	2.26	70 - 125	20	
2,2-Dichloropropane	U	20.0	21.4	107	20.0	20.8	104	3.07	69 - 137	20	
2-Hexanone	U	20.0	21.7	108	20.0	21.1	106	2.52	55 - 130	20	
2-Chlorotoluene	U	20.0	18.9	94.7	20.0	18.5	92.7	2.07	73 - 126	20	
4-Chlorotoluene	U	20.0	19.8	98.8	20.0	19.4	96.9	1.95	74 - 128	20	
Acetone	7.26	20.0	25.4	90.9	20.0	25.3	90.2	0.561	40 - 135	20	
Benzene	U	20.0	19.7	98.7	20.0	19.2	96.1	2.66	81 - 122	20	
Bromobenzene	U	20.0	18.4	92.1	20.0	18.0	90.2	2.13	76 - 124	20	
Bromochloromethane	U	20.0	20.1	101	20.0	19.4	97.2	3.42	65 - 129	20	
Bromodichloromethane	U	20.0	19.2	96.1	20.0	18.8	93.9	2.28	76 - 121	20	
Bromoform	U	20.0	19.1	95.4	20.0	18.6	92.8	2.76	69 - 128	20	
Bromomethane	U	20.0	16.8	84.2	20.0	16.9	84.4	0.186	30 - 141	20	
Carbon disulfide	U	20.0	16.0	79.8	20.0	16.0	80.1	0.430	58 - 128	20	
Carbon tetrachloride	U	20.0	19.6	97.9	20.0	19.0	94.9	3.09	66 - 138	20	
Chlorobenzene	U	20.0	19.0	95.1	20.0	18.5	92.3	2.96	81 - 122	20	
Chloroethane	U	20.0	18.7	93.6	20.0	18.8	94.2	0.563	58 - 133	20	
Chloroform	0.333	20.0	20.3	100	20.0	19.9	97.8	2.12	69 - 128	20	
Chloromethane	U	20.0	22.2	111	20.0	22.1	111	0.516	56 - 131	20	
cis-1,2-Dichloroethene	0.387	20.0	19.8	97.1	20.0	19.3	94.8	2.32	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	21.1	105	20.0	20.6	103	2.23	69 - 131	20	
Dibromochloromethane	U	20.0	19.1	95.5	20.0	18.5	92.3	3.44	66 - 133	20	

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MS/MSD REPORT

Loginnum: L17041203 Cal ID: HPMS17 26-APR-17 Worknum: WG612142

Instrument ID: HPMS17 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17041203-19 File ID: 17M0273188 Dil: 1 Method: 5035A

Sample ID: L17041203-20 MS File ID: 17M0273177 Dil: 1 Matrix: 8260B

Sample ID: L17041203-21 MSD File ID: 17M0273178 Dil: 1 Units: Water

ug/L

Analyte	Parent	MS Spiked	MS Found	MS %Rec	MSD Spiked	MSD Found	MSD %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromomethane	U	20.0	19.8	98.8	20.0	19.3	96.5	2.35	76 - 125	20	
Dichlorodifluoromethane	U	20.0	24.4	122	20.0	24.2	121	0.875	30 - 153	20	
Ethylbenzene	U	20.0	19.6	98.2	20.0	18.8	94	4.33	73 - 127	20	
Hexachlorobutadiene	U	20.0	17.9	89.3	20.0	16.5	82.5	7.90	67 - 131	20	
Isopropylbenzene	U	20.0	19.1	95.3	20.0	18.1	90.5	5.13	75 - 127	20	
Methylene chloride	U	20.0	19.1	95.3	20.0	18.5	92.6	2.82	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	19.8	98.9	20.0	19.5	97.7	1.16	65 - 123	20	
MEK (2-Butanone)	U	20.0	20.8	104	20.0	20.4	102	1.91	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	20.9	104	20.0	20.3	101	2.82	58 - 134	20	
n-Butylbenzene	U	20.0	20.3	101	20.0	19.2	95.9	5.45	69 - 137	20	
n-Propylbenzene	U	20.0	19.5	97.3	20.0	18.8	94	3.44	72 - 129	20	
m-,p-Xylene	U	40.0	39.0	97.4	40.0	37.6	94.1	3.47	76 - 128	20	
Naphthalene	U	20.0	18.5	92.7	20.0	18.0	89.8	3.19	54 - 138	20	
o-Xylene	U	20.0	19.2	96.1	20.0	18.5	92.7	3.65	80 - 121	20	
p-Isopropyltoluene	U	20.0	19.6	98.2	20.0	18.8	93.9	4.51	73 - 130	20	
sec-Butylbenzene	U	20.0	19.4	96.9	20.0	18.3	91.7	5.51	72 - 127	20	
Styrene	U	20.0	20.3	102	20.0	19.5	97.6	3.95	65 - 134	20	
Trichloroethene	49.1	20.0	61.0	59.7	20.0	59.7	53	2.21	70 - 127	20	*
tert-Butylbenzene	U	20.0	18.7	93.3	20.0	18.0	89.8	3.88	70 - 129	20	
Tetrachloroethene	22.5	20.0	39.0	82.1	20.0	37.3	73.9	4.30	66 - 128	20	
Toluene	U	20.0	19.7	98.6	20.0	19.2	96	2.74	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.5	97.5	20.0	19.0	95	2.57	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	20.1	100	20.0	19.4	97	3.44	59 - 135	20	
Trichlorofluoromethane	U	20.0	20.0	99.8	20.0	19.9	99.6	0.270	57 - 129	20	
Vinyl chloride	U	20.0	22.5	112	20.0	22.8	114	1.27	50 - 134	20	

* FAILS %REC LIMIT

FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5268577

Report generated 07/25/2017 13:47

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS11
Analyst: FJB
Workgroup: WG609769

Tune ID: WG609769-01
Run Date: 04/11/2017
Run Time: 17:59
File ID: 11M17454
Cal ID: HPMS11 - 11-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	20.4	6289	PASS
75.0	95.0	30.0	60.0	45.9	14147	PASS
95.0	95.0	100	100	100	30826	PASS
96.0	95.0	5.00	9.00	7.42	2288	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	86.3	26595	PASS
175	174	5.00	9.00	7.08	1884	PASS
176	174	95.0	101	98.2	26124	PASS
177	176	5.00	9.00	6.96	1818	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG609769-02	STD	01	04/11/2017 18:52	
WG609769-03	STD	01	04/11/2017 19:20	
WG609769-04	STD	01	04/11/2017 19:50	
WG609769-05	STD-CCV	01	04/11/2017 20:20	
WG609769-06	STD	01	04/11/2017 20:49	
WG609769-07	STD	01	04/11/2017 21:18	
WG609769-08	STD	01	04/11/2017 21:47	
WG609769-09	STD	01	04/11/2017 22:17	
WG609769-10	SSCV	01	04/11/2017 23:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS11
Analyst: JDS
Workgroup: WG611320

Tune ID: WG611320-01
Run Date: 04/24/2017
Run Time: 16:08
File ID: 11M17705
Cal ID: HPMS11-24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.2	9137	PASS
75.0	95.0	30.0	60.0	46.5	20047	PASS
95.0	95.0	100	100	100	43125	PASS
96.0	95.0	5.00	9.00	6.77	2920	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	85.4	36834	PASS
175	174	5.00	9.00	8.08	2976	PASS
176	174	95.0	101	95.7	35256	PASS
177	176	5.00	9.00	6.83	2409	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611320-02	STD	01	04/24/2017 17:01	
WG611320-03	STD	01	04/24/2017 17:30	
WG611320-04	STD	01	04/24/2017 17:59	
WG611320-05	STD	01	04/24/2017 18:29	
WG611320-06	STD	01	04/24/2017 18:58	
WG611320-07	STD	01	04/24/2017 19:27	
WG611320-08	STD-CCV	01	04/24/2017 19:57	
WG611320-09	STD	01	04/24/2017 20:27	
WG611320-10	STD	01	04/24/2017 20:56	
WG611320-11	STD	01	04/24/2017 21:26	
WG611320-12	SSCV	01	04/24/2017 22:26	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS11
Analyst: TMB
Workgroup: WG612121

Tune ID: WG612121-01
Run Date: 04/29/2017
Run Time: 17:57
File ID: 11M17867
Cal ID: HPMS11 - 24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.6	4932	PASS
75.0	95.0	30.0	60.0	47.7	10389	PASS
95.0	95.0	100	100	100	21797	PASS
96.0	95.0	5.00	9.00	7.06	1539	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	87.4	19054	PASS
175	174	5.00	9.00	7.62	1451	PASS
176	174	95.0	101	97.9	18648	PASS
177	176	5.00	9.00	5.91	1102	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612121-02	CCV	01	04/29/2017 18:53	
WG612123-01	BLANK	01	04/29/2017 19:55	
WG612123-02	LCS	01	04/29/2017 20:24	
L17041203-02	MW-165-ODLB-14	01	04/29/2017 20:53	
L17041203-03	MW-165-ODLB-14	01	04/29/2017 21:22	
L17041203-01	MW-165-ODLB-14	01	04/29/2017 22:49	
L17041203-04	MW-152-ODLB-14	01	04/30/2017 00:46	
L17041203-06	MW-153-ODLB-14	01	04/30/2017 04:40	
L17041203-07	MW-249-ODLB-14	01	04/30/2017 05:10	
L17041203-08	MW-145-ODLB-14	01	04/30/2017 05:39	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS11
Analyst: JDS
Workgroup: WG612294

Tune ID: WG612294-01
Run Date: 05/01/2017
Run Time: 14:47
File ID: 11M17932
Cal ID: HPMS11 - 24-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.3	8076	PASS
75.0	95.0	30.0	60.0	48.1	18251	PASS
95.0	95.0	100	100	100	37946	PASS
96.0	95.0	5.00	9.00	6.95	2638	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	84.9	32234	PASS
175	174	5.00	9.00	8.11	2613	PASS
176	174	95.0	101	96.5	31117	PASS
177	176	5.00	9.00	6.33	1970	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612294-02	CCV	01	05/01/2017 15:53	
WG612299-01	CCV	01	05/01/2017 16:21	
WG612295-01	BLANK	01	05/01/2017 16:50	
WG612295-02	LCS	01	05/01/2017 17:20	
L17041203-49	TB-3-ODLB-14	01	05/01/2017 18:47	
L17041203-48	TB-2-ODLB-14	01	05/01/2017 19:17	
L17041203-46	TB-1-ODLB-14	01	05/01/2017 19:46	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS17
Analyst: FJB
Workgroup: WG611454

Tune ID: WG611454-01
Run Date: 04/25/2017
Run Time: 20:07
File ID: 17M0273002
Cal ID: HPMS17 -

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	4824	PASS
75.0	95.0	30.0	60.0	48.1	14022	PASS
95.0	95.0	100	100	100	29152	PASS
96.0	95.0	5.00	9.00	6.70	1953	PASS
173	174	0	2.00	0.808	223	PASS
174	95.0	50.0	100	94.7	27600	PASS
175	174	5.00	9.00	7.26	2004	PASS
176	174	95.0	101	98.5	27192	PASS
177	176	5.00	9.00	6.67	1814	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG611454-02	STD	01	04/25/2017 20:45	
WG611454-03	STD	01	04/25/2017 21:05	
WG611454-04	STD	01	04/25/2017 21:24	
WG611454-05	STD	01	04/25/2017 21:56	
WG611454-06	STD	01	04/25/2017 22:15	
WG611454-07	STD	01	04/25/2017 22:46	
WG611454-08	STD-CCV	01	04/25/2017 23:06	
WG611454-09	STD	01	04/25/2017 23:38	
WG611454-10	STD	01	04/25/2017 23:58	
WG611454-11	STD	01	04/26/2017 00:33	
WG611454-12	SSCV	01	04/26/2017 01:35	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612141

Tune ID: WG612141-01
Run Date: 04/30/2017
Run Time: 14:35
File ID: 17M0273172
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.5	5657	PASS
75.0	95.0	30.0	60.0	47.2	16166	PASS
95.0	95.0	100	100	100	34232	PASS
96.0	95.0	5.00	9.00	6.26	2144	PASS
173	174	0	2.00	1.19	398	PASS
174	95.0	50.0	100	97.5	33387	PASS
175	174	5.00	9.00	7.24	2416	PASS
176	174	95.0	101	95.5	31880	PASS
177	176	5.00	9.00	7.03	2241	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612141-02	CCV	01	04/30/2017 14:54	
WG612142-01	BLANK	01	04/30/2017 15:48	
WG612142-02	LCS	01	04/30/2017 16:07	
L17041203-20	MW-130-ODLB-14	01	04/30/2017 16:27	
L17041203-21	MW-130-ODLB-14	01	04/30/2017 16:47	
L17041203-19	MW-130-ODLB-14	01	04/30/2017 20:33	
L17041203-05	MW-79-ODLB-14	01	04/30/2017 20:53	
L17041203-09	MW-235-ODLB-14	01	04/30/2017 21:13	
L17041203-13	MW-167-ODLB-14	01	04/30/2017 21:39	
L17041203-14	MW-248-ODLB-14	01	04/30/2017 21:59	
L17041203-15	MW-44-ODLB-14	01	04/30/2017 22:19	
L17041203-16	MW-171-ODLB-14	01	04/30/2017 22:39	
L17041203-17	DUP-5	01	04/30/2017 22:59	
L17041203-18	MW-129-ODLB-14	01	04/30/2017 23:19	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612249

Tune ID: WG612249-01
Run Date: 05/01/2017
Run Time: 11:49
File ID: 17M0273202
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.1	6087	PASS
75.0	95.0	30.0	60.0	47.7	16978	PASS
95.0	95.0	100	100	100	35584	PASS
96.0	95.0	5.00	9.00	6.38	2270	PASS
173	174	0	2.00	1.19	402	PASS
174	95.0	50.0	100	94.7	33696	PASS
175	174	5.00	9.00	7.25	2442	PASS
176	174	95.0	101	97.3	32781	PASS
177	176	5.00	9.00	6.95	2279	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612249-02	CCV	01	05/01/2017 12:07	
WG612250-01	BLANK	01	05/01/2017 12:49	
WG612250-02	LCS	01	05/01/2017 13:09	
WG612250-03	LCS2	01	05/01/2017 13:29	
L17041203-22	MW-28-ODLB-14	01	05/01/2017 14:58	
L17041203-23	MW-67-ODLB-14	01	05/01/2017 15:18	
L17041203-24	MW-154-ODLB-14	01	05/01/2017 15:49	
L17041203-25	MW-182-ODLB-14	01	05/01/2017 16:09	
L17041203-26	MW-08-ODLB-14	01	05/01/2017 16:28	
L17041203-27	MW-58-ODLB-14	01	05/01/2017 16:48	
L17041203-28	DUP-1	01	05/01/2017 17:17	
L17041203-29	MW-126-ODLB-14	01	05/01/2017 17:37	
L17041203-30	MW-169-ODLB-14	01	05/01/2017 17:57	
L17041203-31	MW-170-ODLB-14	01	05/01/2017 18:16	
L17041203-32	MW-78-ODLB-14	01	05/01/2017 18:36	
L17041203-33	MW-76-ODLB-14	01	05/01/2017 19:08	
L17041203-34	MW-77-ODLB-14	01	05/01/2017 19:27	
L17041203-35	MW-70-ODLB-14	01	05/01/2017 19:47	
L17041203-36	MW-71-ODLB-14	01	05/01/2017 20:17	
L17041203-37	MW-163-ODLB-14	01	05/01/2017 20:36	
L17041203-38	MW-144-ODLB-14	01	05/01/2017 20:56	
L17041203-39	MW-190-ODLB-14	01	05/01/2017 21:16	
L17041203-40	MW-164-ODLB-14	01	05/01/2017 21:44	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
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Report generated 07/25/2017 13:51

BFB

Login Number: L17041203
Instrument: HPMS17
Analyst: ADC
Workgroup: WG612550

Tune ID: WG612550-01
Run Date: 05/02/2017
Run Time: 18:30
File ID: 17M0273260
Cal ID: HPMS17 - 26-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	16.7	5312	PASS
75.0	95.0	30.0	60.0	46.5	14752	PASS
95.0	95.0	100	100	100	31725	PASS
96.0	95.0	5.00	9.00	6.64	2108	PASS
173	174	0	2.00	1.23	380	PASS
174	95.0	50.0	100	97.7	31008	PASS
175	174	5.00	9.00	7.31	2266	PASS
176	174	95.0	101	95.3	29544	PASS
177	176	5.00	9.00	6.95	2053	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612550-02	CCV	01	05/02/2017 18:50	
WG612551-01	BLANK	01	05/02/2017 19:34	
WG612551-02	LCS	01	05/02/2017 19:53	
L17041203-47	EB1-ODLB-14	01	05/02/2017 21:11	
L17041203-41	MW-184-ODLB-14	01	05/02/2017 21:30	
L17041203-42	MW-157-ODLB-14	01	05/02/2017 21:50	
L17041203-43	MW-68-ODLB-14	01	05/02/2017 22:09	
L17041203-44	DUP-2	01	05/02/2017 22:29	
L17041203-45	MW-69-ODLB-14	01	05/02/2017 22:48	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS6
Analyst: TMB
Workgroup: WG598323

Tune ID: WG598323-01
Run Date: 01/12/2017
Run Time: 08:36
File ID: 6M144707
Cal ID: HPMS6-12-JAN-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	19.2	7923	PASS
75.0	95.0	30.0	60.0	54.8	22651	PASS
95.0	95.0	100	100	100	41304	PASS
96.0	95.0	5.00	9.00	7.28	3007	PASS
173	174	0	2.00	0.352	116	PASS
174	95.0	50.0	100	79.8	32963	PASS
175	174	5.00	9.00	8.22	2709	PASS
176	174	95.0	101	97.3	32071	PASS
177	176	5.00	9.00	6.69	2147	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG598323-02	STD	01	01/12/2017 09:02	
WG598323-03	STD	01	01/12/2017 09:37	
WG598323-04	STD	01	01/12/2017 10:10	
WG598323-05	STD-CCV	01	01/12/2017 10:42	
WG598323-06	STD	01	01/12/2017 11:14	
WG598323-07	STD	01	01/12/2017 11:47	
WG598323-08	STD	01	01/12/2017 12:19	
WG598323-09	STD	01	01/12/2017 12:52	
WG598323-10	SSCV	01	01/12/2017 13:56	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS6
Analyst: TMB
Workgroup: WG608938

Tune ID: WG608938-01
Run Date: 04/05/2017
Run Time: 16:29
File ID: 6M146221
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.3	4043	PASS
75.0	95.0	30.0	60.0	46.5	10875	PASS
95.0	95.0	100	100	100	23389	PASS
96.0	95.0	5.00	9.00	7.16	1674	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.5	17883	PASS
175	174	5.00	9.00	7.58	1356	PASS
176	174	95.0	101	96.1	17186	PASS
177	176	5.00	9.00	7.35	1263	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-02	STD	01	04/05/2017 17:25	
WG608938-03	STD	01	04/05/2017 17:57	
WG608938-04	STD	01	04/05/2017 18:28	
WG608938-05	STD	01	04/05/2017 19:00	
WG608938-06	STD	01	04/05/2017 19:31	
WG608938-07	STD	01	04/05/2017 20:02	
WG608938-08	STD-CCV	01	04/05/2017 20:34	
WG608938-09	STD	01	04/05/2017 21:06	
WG608938-10	STD	01	04/05/2017 21:37	
WG608938-11	STD	01	04/05/2017 22:09	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS6
Analyst: TMB
Workgroup: WG609128

Tune ID: WG609128-01
Run Date: 04/06/2017
Run Time: 13:59
File ID: 6M146236
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	17.6	6056	PASS
75.0	95.0	30.0	60.0	47.8	16465	PASS
95.0	95.0	100	100	100	34464	PASS
96.0	95.0	5.00	9.00	7.14	2460	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	76.9	26498	PASS
175	174	5.00	9.00	7.37	1953	PASS
176	174	95.0	101	98.9	26205	PASS
177	176	5.00	9.00	6.88	1804	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG608938-12	SSCV	01	04/06/2017 15:57	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17041203
Instrument: HPMS6
Analyst: JDS
Workgroup: WG612082

Tune ID: WG612082-01
Run Date: 04/28/2017
Run Time: 18:32
File ID: 6M146820
Cal ID: HPMS6-05-APR-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	18.7	6497	PASS
75.0	95.0	30.0	60.0	49.8	17276	PASS
95.0	95.0	100	100	100	34696	PASS
96.0	95.0	5.00	9.00	7.04	2444	PASS
173	174	0	2.00	0.506	121	PASS
174	95.0	50.0	100	68.9	23908	PASS
175	174	5.00	9.00	7.43	1777	PASS
176	174	95.0	101	98.5	23552	PASS
177	176	5.00	9.00	6.99	1647	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG612082-02	CCV	01	04/28/2017 19:35	
WG612110-01	CCV	01	04/28/2017 20:07	
WG612085-01	BLANK	01	04/28/2017 20:38	
WG612085-02	LCS	01	04/28/2017 21:09	
L17041203-11	MW-80-ODLB-14	01	04/28/2017 21:40	
L17041203-12	MW-80-ODLB-14	01	04/28/2017 22:10	
L17041203-10	MW-80-ODLB-14	01	04/28/2017 23:42	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5268579
Report generated 07/25/2017 13:51

Calibration Table Report
Method: A9FOOWT.M
Title: Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Calibration: Fri Apr 21 13:34:21 2017
Curve: WG609769
Calibration Files

	Compound	5 11M17456.D	20 11M17457.D	50 11M17458.D	100 11M17459.D	200 11M17460.D	300 11M17461.D	400 11M17462.D	500 11M17463.D	Avg	%RSD	R^2 Linear	R^2 Quadratic
I	Fluorobenzene	ISTD											
T	Acetonitrile		0.040	0.041	0.040	0.043	0.044	0.044	0.043	0.042	4.036		
T	3-Chloro-1-propene	0.535	0.558	0.577	0.545	0.518	0.476	0.416	0.391	0.502	13.493		
T	2-Chloro-1,3-butadiene	0.424	0.462	0.493	0.468	0.458	0.429	0.381	0.363	0.435	10.276		
T	Methacrylonitrile	0.182	0.207	0.216	0.208	0.213	0.208	0.193	0.186	0.202	6.342		
T	Isobutyl Alcohol		0.013	0.014	0.013	0.015	0.016	0.016	0.016	0.014	9.665		
T	1-Butanol				0.005	0.007	0.008	0.008	0.008	0.007	17.196	0.999	
T	Cyclohexanone			0.008	0.008	0.010	0.012	0.012	0.012	0.010	17.429	0.995	
T	2-Nitropropane			0.069	0.071	0.078	0.081	0.078	0.078	0.076	5.966		
T	Ethyl Acetate	0.255	0.278	0.298	0.283	0.286	0.277	0.253	0.241	0.271	7.209		
T	Methyl methacrylate	0.217	0.250	0.274	0.268	0.272	0.260	0.235	0.224	0.250	8.833		
I	Chlorobenzene-d5	ISTD											
I	1,4-Dichlorobenzene-d4	ISTD											

Fri Apr 21 13:35:57 2017

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Calibration: Tue Apr 25 12:03:16 2017
Curve: WG611320
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
		11M17707.D	11M17708.D	11M17709.D	11M17710.D	11M17711.D	11M17712.D	11M17713.D	11M17714.D	11M17715.D	11M17716.D				
	Compound											Avg	%RSD	Linear	Quadratic
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.225	0.241	0.259	0.343	0.345	0.341	0.307	0.289	0.294	16.393	0.995	
P	Chloromethane			0.495	0.414	0.324	0.377	0.232	0.332	0.304	0.287	0.346	23.621	0.991	
C	Vinyl Chloride		0.242	0.181	0.208	0.205	0.220	0.225	0.222	0.213		0.215	8.319		
T	1,3-Butadiene				0.174	0.159	0.117	0.136	0.108	0.102	0.095	0.127	23.629		0.999
T	Bromomethane			0.239	0.253	0.227	0.209	0.201	0.212	0.209		0.222	8.464		
T	Chloroethane			0.189	0.219	0.215	0.235	0.234	0.236	0.227		0.222	7.585		
T	Trichlorofluoromethane		0.321	0.333	0.366	0.380	0.398	0.401	0.412	0.387		0.375	8.718		
T	Diethyl ether			0.262	0.296	0.291	0.287	0.277	0.271		0.258	0.277	5.316		
T	Isoprene		0.325	0.336	0.361	0.390	0.406	0.433	0.443	0.414		0.388	11.286		
T	Acrolein			0.038	0.043	0.046	0.046	0.045	0.047		0.044	0.044	6.542		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.178	0.210	0.221	0.233	0.234	0.242	0.235		0.222	9.849		
T	Acetone				0.084	0.082	0.087	0.081	0.085	0.085	0.082	0.084	2.520		
C	1,1-Dichloroethene		0.472	0.398	0.434	0.440	0.458	0.470	0.468	0.432		0.446	5.694		
T	Tert-Butyl Alcohol			0.027	0.031	0.032	0.032	0.030	0.031		0.036	0.031	8.078		
T	Dimethyl Sulfide		0.358	0.301	0.361	0.353	0.370	0.363	0.362	0.338		0.351	6.285		
T	Iodomethane				0.123	0.199	0.299	0.331	0.332	0.316	0.299	0.271	29.385	0.998	
T	Methyl acetate				0.259	0.265	0.274	0.265	0.266	0.252		0.264	2.746		
T	Methylene Chloride		0.342	0.277	0.304	0.291	0.297	0.298	0.295	0.279		0.298	6.766		
T	Carbon Disulfide			0.793	0.758	0.774	0.787	0.805	0.770	0.656		0.763	6.538		
T	Acrylonitrile			0.104	0.121	0.121	0.127	0.126	0.128		0.136	0.123	8.087		
T	Methyl Tert Butyl Ether		0.685	0.707	0.776	0.774	0.784	0.782	0.759	0.701		0.746	5.501		
T	trans-1,2-Dichloroethene		0.297	0.266	0.257	0.264	0.276	0.274	0.278	0.262		0.272	4.677		
T	n-Hexane				0.347	0.401	0.418	0.458	0.466	0.438		0.421	10.370		
T	Diisopropyl ether			1.126	1.244	1.208	1.159	1.088	0.954		0.827	1.086	13.603		
T	Vinyl Acetate				0.536	0.487	0.505	0.520	0.563	0.492	0.447	0.507	7.407		
P	1,1-Dichloroethane		0.594	0.561	0.582	0.585	0.589	0.584	0.572	0.514		0.573	4.533		
T	Ethyl-Tert-Butyl ether			0.975	1.085	1.052	1.021	0.960	0.863		0.767	0.960	11.616		
T	2-Butanone				0.126	0.134	0.143	0.138	0.139	0.138	0.138	0.137	3.758		
T	Propionitrile			0.040	0.046	0.046	0.047	0.046	0.047		0.048	0.046	6.042		
T	2,2-Dichloropropane		0.459	0.375	0.385	0.384	0.387	0.381	0.378	0.352		0.388	7.945		
T	cis-1,2-Dichloroethene		0.334	0.249	0.303	0.304	0.317	0.318	0.316	0.298		0.305	8.359		
C	Chloroform	0.665	0.682	0.517	0.510	0.488	0.493	0.482	0.476	0.431		0.527	16.402	0.997	
T	1-Bromopropane			0.027	0.056	0.052	0.058	0.061	0.062	0.061	0.061	0.055	21.722	1.000	
T	Bromochloromethane		0.173	0.179	0.182	0.187	0.195	0.196	0.196	0.189	0.185	0.187	4.391		
T	Tetrahydrofuran			0.146	0.112	0.108	0.108	0.103	0.101		0.100	0.111	14.263		
S	Dibromofluoromethane					0.257	0.229	0.252	0.259	0.242		0.248	4.980		
T	1,1,1-Trichloroethane		0.394	0.361	0.391	0.404	0.424	0.433	0.438	0.408	0.383	0.404	6.212		
T	Cyclohexane		0.585	0.510	0.544	0.580	0.594	0.618	0.610	0.554	0.515	0.568	6.920		
T	1,1-Dichloropropene		0.344	0.338	0.342	0.358	0.369	0.372	0.382	0.349	0.330	0.354	4.923		
T	Carbon Tetrachloride		0.316	0.304	0.313	0.355	0.374	0.380	0.388	0.366	0.346	0.349	8.985		
T	Tert-Amyl-Methyl ether			0.768	0.866	0.838	0.818	0.777	0.710		0.645	0.775	9.920		
S	1,2-Dichloroethane-d4					0.301	0.268	0.294	0.296	0.277		0.287	4.837		
T	1,2-Dichloroethane		0.409	0.397	0.397	0.403	0.416	0.406	0.397	0.361	0.332	0.391	6.899		
T	Benzene		1.312	1.116	1.145	1.151	1.142	1.088	1.000	0.817		1.096	12.984		
T	Trichloroethene		0.335	0.257	0.270	0.285	0.298	0.298	0.297	0.281	0.265	0.287	8.100		
T	Methylcyclohexane		0.413	0.366	0.433	0.447	0.458	0.486	0.488	0.449	0.426	0.441	8.533		
C	1,2-Dichloropropane		0.370	0.341	0.343	0.335	0.344	0.352	0.351	0.327	0.309	0.341	4.980		
T	1,4-Dioxane					0.003	0.003	0.003	0.003		0.004	0.003	12.331		
T	Bromodichloromethane		0.381	0.322	0.344	0.346	0.369	0.379	0.376	0.354	0.333	0.356	6.019		
T	Dibromomethane		0.147	0.135	0.157	0.170	0.171	0.171	0.172	0.167	0.162	0.161	8.034		
T	2-Chloroethyl Vinyl Ether			0.168	0.160	0.168	0.198	0.200	0.204	0.198	0.196	0.186	9.586		
T	4-Methyl-2-Pentanone					0.099	0.124	0.118	0.124	0.127	0.128	0.120	9.057		
T	cis-1,3-Dichloropropene		0.417	0.396	0.403	0.427	0.460	0.463	0.452	0.408	0.374	0.422	7.288		
T	Dimethyl Disulfide					0.220	0.260	0.274	0.286	0.278		0.264	9.922		

I	Chlorobenzene-d5	ISTD											
S	Toluene-d8					1.412	1.270	1.362	1.305	1.142		1.298	7.909
C	Toluene		1.926	1.529	1.603	1.659	1.669	1.560	1.385			1.619	10.245
T	Ethyl Methacrylate			0.349	0.396	0.426	0.488	0.492	0.493	0.473	0.442	0.445	11.806
T	trans-1,3-Dichloropropene			0.442	0.476	0.532	0.563	0.571	0.546	0.503	0.455	0.511	9.689
T	1,1,2-Trichloroethane		0.333	0.328	0.331	0.359	0.369	0.352	0.347	0.335	0.317	0.341	4.855
T	2-Hexanone					0.269	0.291	0.289	0.286	0.289	0.279	0.284	3.043
T	1,3-Dichloropropane		0.565	0.585	0.597	0.600	0.610	0.593	0.564	0.519	0.470	0.567	8.020
T	Tetrachloroethene		0.299	0.263	0.310	0.330	0.344	0.349	0.347	0.334	0.316	0.321	8.642
T	Dibromochloromethane		0.307	0.325	0.361	0.386	0.409	0.420	0.423	0.408	0.386	0.381	10.945
T	1,2-Dibromoethane		0.275	0.268	0.311	0.312	0.325	0.326	0.322	0.320	0.304	0.307	7.007
T	1-Chlorohexane		0.445	0.355	0.419	0.460	0.482	0.518	0.524	0.490	0.457	0.461	11.299
P	Chlorobenzene		1.157	1.038	1.095	1.075	1.077	1.033	0.955	0.805		1.029	10.431
T	1,1,1,2-Tetrachloroethane		0.378	0.343	0.368	0.382	0.405	0.412	0.406	0.388	0.368	0.383	5.842
C	Ethylbenzene			0.492	0.524	0.571	0.588	0.588	0.578	0.532	0.483	0.544	7.832
T	m-,p-Xylene		0.719	0.649	0.671	0.697	0.698	0.670	0.610	0.495		0.651	10.950
T	o-Xylene		0.687	0.601	0.672	0.680	0.706	0.699	0.683	0.622	0.557	0.656	7.778
T	Styrene		0.901	0.859	0.948	1.030	1.135	1.132	1.072	0.903	0.773	0.973	13.004
P	Bromoform			0.222	0.213	0.242	0.285	0.295	0.304	0.315	0.305	0.273	14.879
T	Isopropylbenzene		1.842	1.560	1.650	1.704	1.753	1.647	1.478	1.173		1.601	12.852
I	1,4-Dichlorobenzene-d4	ISTD											
P	1,1,2,2-Tetrachloroethane		0.808	0.773	0.818	0.827	0.835	0.803	0.814	0.729	0.667	0.786	7.026
S	p-Bromofluorobenzene					0.890	0.798	0.908	0.908	0.840		0.869	5.541
T	1,2,3-Trichloropropane			0.185	0.209	0.238	0.253	0.236	0.234	0.227	0.219	0.225	9.257
T	trans-1,4-Dichloro-2-Butene			0.236	0.218	0.234	0.255	0.244	0.257	0.254	0.249	0.243	5.473
T	n-Propylbenzene		3.575	3.273	3.510	3.794	3.868	3.517	2.991			3.504	8.551
T	Bromobenzene	0.829	0.796	0.865	0.891	0.919	0.922	0.905	0.893	0.801	0.706	0.853	8.108
T	1,3,5-Trimethylbenzene		2.411	2.306	2.337	2.716	2.735	2.576	2.322	1.774		2.397	12.751
T	2-Chlorotoluene		2.679	2.417	2.352	2.522	2.434	2.234	2.016			2.379	8.890
T	4-Chlorotoluene		2.400	2.121	2.214	2.375	2.358	2.214	1.987	1.509		2.147	13.668
T	a-Methylstyrene					1.290	1.457	1.486	1.456	1.213	1.025	1.321	13.707
T	tert-Butylbenzene		0.608	0.565	0.561	0.572	0.633	0.611	0.616	0.562	0.516	0.583	6.319
T	1,2,4-Trimethylbenzene			2.433	2.666	2.833	2.840	2.639	2.359	1.780		2.507	14.712
T	sec-Butylbenzene			2.952	3.108	3.409	3.466	3.229	2.831			3.166	7.921
T	p-Isopropyltoluene			2.364	2.500	2.883	2.926	2.806	2.479	1.849		2.544	14.812
T	1,3-Dichlorobenzene		1.711	1.464	1.547	1.683	1.678	1.651	1.563	1.279	1.075	1.517	14.111
T	1,4-Dichlorobenzene		1.926	1.665	1.672	1.648	1.690	1.631	1.552	1.266		1.631	11.187
T	n-Butylbenzene			2.082	2.167	2.365	2.624	2.563	2.334	1.748		2.269	13.252
T	1,2-Dichlorobenzene	1.619	1.678	1.497	1.650	1.690	1.672	1.628	1.543	1.259	1.072	1.531	13.502
T	1,2-Dibromo-3-Chloropropane			0.097	0.124	0.136	0.141	0.146	0.150	0.150	0.159	0.138	14.080
T	1,2,4-Trichlorobenzene		1.009	0.969	1.058	1.142	1.234	1.251	1.225	1.068	0.934	1.099	10.858
T	Hexachlorobutadiene		0.499	0.481	0.533	0.569	0.622	0.632	0.675	0.630	0.605	0.583	11.387
T	Naphthalene		2.456	2.459	2.474	2.603	2.846	2.645	2.323	1.801		2.451	12.488
T	1,2,3-Trichlorobenzene	1.338	1.022	1.038	1.089	1.131	1.218	1.208	1.199	1.066	0.934	1.124	10.516

Thu Apr 27 12:49:03 2017

Response Factor Report HPMS17

Method Path : D:\MassHunter\GCMS\1\methods\
Method File : 826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017
Response Via : Initial Calibration
Curve: WG611454
Calibration Files
0.3 =17M0273004.D 0.4 =17M0273005.D 1 =17M0273006.D 2 =17M0273007.D 5 =17M0273008.D 20 =17M0273009.D
50 =17M0273010.D 100 =17M0273011.D 200 =17M0273012.D 300 =17M0273013.D

		Compound	0.3	0.4	1	2	5	20	50	100	200	300	Avg	%RSD	Linear	
1)	I	Fluorobenzene	----------	ISTD	----------											
2)	T	Dichlorodifluo...			0.260	0.246	0.267	0.322	0.327	0.324	0.332		0.297	12.54		
3)	P	Chloromethane			0.289	0.283	0.279	0.292	0.288	0.306	0.297		0.291	3.11		
4)	C	Vinyl Chloride		0.334	0.306	0.292	0.311	0.331	0.329	0.335	0.334		0.322	5.07#		
5)	T	1,3-Butadiene			0.188	0.192	0.198	0.198	0.204	0.199	0.203		0.198	2.87		
6)	T	Bromomethane			0.262	0.263	0.258	0.240	0.222	0.218	0.212		0.239	9.17		
7)	T	Chloroethane			0.168	0.160	0.171	0.175	0.136	0.132	0.126		0.153	13.55		
8)	T	Trichlorofluor...		0.447	0.424	0.402	0.439	0.444	0.443	0.377	0.326		0.413	10.36		
9)	T	Diethyl ether			0.196	0.198	0.197	0.204	0.205	0.200		0.193	0.199	2.16		
10)	C	1,1-Dichloroet...		0.404	0.386	0.364	0.383	0.390	0.388	0.395	0.380		0.386	3.03#		
11)	T	Carbon Disulfide		0.890	0.818	0.756	0.827	0.821	0.852	0.833	0.834		0.829	4.51		
12)	T	1,1,2-Trichlor...		0.257	0.242	0.225	0.254	0.248	0.254	0.246	0.244		0.246	4.10		
13)	T	Iodomethane				0.121	0.187	0.272	0.364	0.380	0.394		0.286	39.36	0.996	
14)	T	Acrolein			0.024	0.023	0.025	0.025	0.026	0.025		0.024	0.025	4.79		
15)	T	Methylene Chlo...		0.339	0.301	0.285	0.291	0.285	0.280	0.286	0.277		0.293	6.85		
16)	T	Acetone					0.061	0.052	0.049	0.049	0.047	0.045	0.050	11.07		
17)	T	trans-1,2-Dich...		0.268	0.253	0.255	0.262	0.264	0.265	0.272	0.266		0.263	2.40		
18)	T	Methyl acetate		0.108	0.123	0.115	0.131	0.144	0.154	0.148			0.132	13.21		
19)	T	Methyl Tert Bu...		0.648	0.647	0.641	0.679	0.672	0.688	0.695	0.668		0.667	3.02		
20)	P	1,1-Dichloroet...		0.467	0.456	0.453	0.480	0.480	0.477	0.489	0.477		0.472	2.64		
21)	T	Acrylonitrile			0.060	0.062	0.064	0.065	0.067	0.066		0.065	0.064	3.92		
22)	T	Vinyl Acetate					0.040	0.040	0.045	0.041	0.045		0.042	5.97		
23)	T	cis-1,2-Dichlo...		0.300	0.282	0.289	0.302	0.297	0.299	0.308	0.303		0.298	2.74		
24)	T	2,2-Dichloropr...		0.198	0.267	0.290	0.328	0.352	0.378	0.381	0.374		0.321	20.34	1.000	
25)	T	Cyclohexane		0.391	0.387	0.372	0.406	0.398	0.421	0.412	0.427		0.402	4.54		
26)	T	Bromochloromet...			0.167	0.179	0.195	0.196	0.200	0.205	0.201		0.192	7.24		
27)	C	Chloroform	0.476	0.514	0.492	0.492	0.499	0.489	0.489	0.499	0.482		0.492	2.21#		
28)	T	Carbon Tetrach...		0.361	0.362	0.363	0.396	0.400	0.407	0.415	0.411		0.389	6.02		
29)	S	Dibromofluorom...					0.275	0.249	0.278	0.278	0.271		0.270	4.54		
30)	T	1,1,1-Trichlor...		0.429	0.422	0.414	0.435	0.440	0.438	0.448	0.437		0.433	2.51		
31)	T	1,1-Dichloropr...		0.347	0.327	0.312	0.336	0.340	0.352	0.352	0.352		0.340	4.22		
32)	T	2-Butanone					0.076	0.070	0.076	0.076	0.075	0.076	0.075	3.44		
33)	T	Benzene		1.142	1.045	1.024	1.062	1.054	1.058	1.085	1.050		1.065	3.34		
34)	S	1,2-Dichloroet...					0.270	0.237	0.260	0.255	0.243		0.253	5.23		
35)	T	1,2-Dichloroet...		0.343	0.317	0.322	0.341	0.332	0.333	0.336	0.328		0.332	2.70		
36)	T	Methylcyclohexane	0.445	0.432	0.414	0.377	0.420	0.401	0.438	0.416	0.444		0.421	5.28		
37)	T	Trichloroethene		0.341	0.312	0.307	0.316	0.316	0.318	0.327	0.321		0.320	3.24		

38)	T	Dibromomethane		0.152	0.152	0.157	0.169	0.164	0.168	0.172	0.170		0.163	5.00
39)	C	1,2-Dichloropr...		0.266	0.267	0.269	0.285	0.281	0.285	0.293	0.287		0.279	3.71#
40)	T	Bromodichlorom...		0.366	0.349	0.359	0.373	0.376	0.381	0.394	0.384		0.373	3.87
41)	T	1,4-Dioxane				0.001	0.001	0.001	0.001	0.002		0.002	0.001	14.84
42)	T	2-Chloroethyl ...					0.105	0.117	0.128	0.134	0.137	0.139	0.127	10.41
43)	T	cis-1,3-Dichlo...		0.377	0.382	0.390	0.424	0.429	0.445	0.456	0.457		0.420	7.82
44)	T	4-Methyl-2-Pen...					0.067	0.065	0.070	0.070	0.073	0.071	0.069	4.03
45)	T	trans-1,3-Dich...			0.304	0.322	0.360	0.366	0.379	0.384	0.385		0.357	8.95
46)	I	Chlorobenzene-d5	----------ISTD----------											
47)	S	Toluene-d8					1.299	1.170	1.283	1.272	1.214		1.248	4.33
48)	C	Toluene		1.663	1.512	1.548	1.591	1.582	1.580	1.566	1.498		1.567	3.27#
49)	T	Tetrachloroethene		0.485	0.430	0.434	0.456	0.441	0.450	0.442	0.439		0.447	3.89
50)	T	1,1,2-Trichlor...		0.311	0.288	0.309	0.315	0.305	0.307	0.303	0.291		0.304	3.07
51)	T	Dibromochlorom...		0.416	0.367	0.402	0.421	0.423	0.432	0.434	0.423		0.415	5.22
52)	T	1,3-Dichloropr...		0.483	0.456	0.486	0.499	0.493	0.490	0.487	0.468		0.483	2.88
53)	T	1,2-Dibromoethane		0.321	0.294	0.307	0.317	0.312	0.319	0.314	0.305		0.311	2.90
54)	T	2-Hexanone				0.148	0.167	0.155	0.162	0.160	0.161	0.165	0.160	3.98
55)	P	Chlorobenzene		1.094	1.016	1.032	1.053	1.049	1.059	1.062	1.047		1.052	2.18
56)	T	1-Chlorohexane			0.079	0.083	0.085	0.082	0.090	0.086	0.090		0.085	4.55
57)	C	Ethylbenzene		0.559	0.502	0.540	0.551	0.549	0.559	0.558	0.562		0.547	3.65#
58)	T	1,1,1,2-Tetrac...		0.410	0.381	0.411	0.416	0.413	0.415	0.418	0.411		0.409	2.94
59)	T	m-,p-Xylene		0.674	0.615	0.631	0.668	0.663	0.683	0.683	0.669		0.661	3.73
60)	T	o-Xylene		0.641	0.608	0.642	0.657	0.652	0.667	0.667	0.673		0.651	3.22
61)	T	Styrene		0.997	0.921	0.974	1.039	1.066	1.104	1.114	1.118		1.042	6.95
62)	P	Bromoform		0.266	0.242	0.266	0.297	0.299	0.320	0.317	0.326		0.292	10.42
63)	T	Isopropylbenzene		1.730	1.595	1.609	1.721	1.707	1.728	1.702	1.688		1.685	3.16
64)	I	1,4-Dichlorobenzen...	----------ISTD----------											
65)	T	1,3,5-Trimethy...			2.872	2.652	2.732	2.866	2.834	2.818	2.719	2.803	2.787	2.80
66)	S	p-Bromofluorob...					0.760	0.784	0.849	0.859	0.933		0.837	8.16
67)	T	Bromobenzene	1.037	1.017	0.926	0.992	0.982	0.980	0.965	0.942	1.010		0.983	3.63
68)	T	n-Propylbenzene		3.922	3.496	3.615	3.790	3.761	3.731	3.532	3.687		3.692	3.82
69)	P	1,1,2,2-Tetrac...		0.626	0.622	0.654	0.713	0.686	0.713	0.660	0.705		0.672	5.56
70)	T	2-Chlorotoluene		2.386	2.198	2.292	2.324	2.292	2.254	2.170	2.314		2.279	3.06
71)	T	1,2,3-Trichlor...			0.187	0.210	0.205	0.199	0.200	0.191	0.200		0.199	3.97
72)	T	trans-1,4-Dich...				0.117	0.137	0.162	0.163	0.151	0.160		0.148	12.16
73)	T	1,2,4-Trimethy...		2.943	2.640	2.798	2.903	2.859	2.845	2.747	2.748		2.810	3.47
74)	T	4-Chlorotoluene		2.343	2.198	2.273	2.309	2.286	2.278	2.179	2.332		2.275	2.59
75)	T	tert-Butylbenzene		0.586	0.535	0.564	0.572	0.558	0.549	0.530	0.561		0.557	3.32
76)	T	sec-Butylbenzene		3.659	3.288	3.403	3.563	3.490	3.493	3.283	3.287		3.433	4.13
77)	T	p-Isopropyltol...		3.074	2.747	2.850	3.010	3.003	3.034	2.869	2.827		2.927	4.03
78)	T	1,3-Dichlorobe...		1.858	1.620	1.702	1.733	1.715	1.724	1.659	1.703		1.714	4.03
79)	T	1,4-Dichlorobe...	1.966	1.849	1.636	1.697	1.726	1.676	1.707	1.646	1.674		1.731	6.25
80)	T	n-Butylbenzene		2.652	2.263	2.273	2.525	2.497	2.628	2.473	2.450		2.470	5.81
81)	T	1,2-Dichlorobe...	1.682	1.851	1.580	1.672	1.685	1.675	1.679	1.623	1.591		1.671	4.72
82)	T	1,2-Dibromo-3-...			0.106	0.124	0.124	0.125	0.133	0.131	0.121		0.123	6.94
83)	T	Hexachlorobuta...		0.813	0.679	0.669	0.716	0.682	0.733	0.684	0.658		0.704	7.14
84)	T	1,2,4-Trichlor...		1.286	1.140	1.150	1.242	1.250	1.332	1.289	1.240		1.241	5.39
85)	T	Naphthalene		2.524	2.180	2.327	2.511	2.473	2.606	2.480	2.261		2.420	6.08
86)	T	1,2,3-Trichlor...	1.286	1.267	1.117	1.171	1.220	1.198	1.264	1.182	1.145		1.206	4.84

(#) = Out of Range

826VMS.M Thu Apr 27 10:23:42 2017

Calibration Table Report
Method: A9FOOWT.M
Title: A9-FOO Water - IC: 011217 - HPMS6
Last Calibration: Thu Jan 12 13:53:06 2017
Curve: WG598323
Calibration Files

	Compound	5 6M144708.D	20 6M144709.D	50 6M144710.D	100 6M144711.D	200 6M144712.D	300 6M144713.D	400 6M144714.D	500 6M144715.D	Avg	%RSD
I	Fluorobenzene	ISTD									
T	Acetonitrile	0.021	0.019	0.018	0.017	0.018	0.016	0.017	0.017	0.018	8.729
T	3-Chloro-1-propene	0.301	0.305	0.307	0.308	0.306	0.295	0.287	0.289	0.300	2.763
T	2-Chloro-1,3-butadiene	0.348	0.368	0.380	0.385	0.382	0.371	0.361	0.364	0.370	3.335
T	Ethyl Acetate	0.144	0.163	0.169	0.166	0.171	0.152	0.159	0.159	0.160	5.700
T	Methacrylonitrile	0.076	0.087	0.089	0.088	0.089	0.080	0.083	0.083	0.084	5.535
T	Isobutyl Alcohol	0.004	0.006	0.006	0.005	0.005	0.004	0.005	0.006	0.005	13.176
T	1-Butanol									0.000	0.000
T	Methyl methacrylate	0.146	0.173	0.185	0.185	0.188	0.171	0.177	0.178	0.175	7.640
T	2-Nitropropane		0.063	0.071	0.071	0.076	0.070	0.075	0.074	0.071	6.228
I	Chlorobenzene-d5	ISTD									
I	1,4-Dichlorobenzene-d4	ISTD									
T	Cyclohexanone		0.008	0.009	0.008	0.010	0.009	0.011	0.012	0.009	14.808

Fri Jan 13 10:37:15 2017

Calibration Table Report
Method: 8260BWT.M
Title: 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Calibration: Thu Apr 06 09:55:03 2017
Curve: WG608938
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300				
	Compound	6M146223.D	6M146224.D	6M146225.D	6M146226.D	6M146227.D	6M146228.D	6M146229.D	6M146230.D	6M146231.D	6M146232.D	Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.381	0.345	0.365	0.434	0.430	0.411	0.412		0.397	8.516		
P	Chloromethane			0.725	0.639	0.561	0.528	0.467	0.463	0.448		0.547	18.885	0.999	
C	Vinyl Chloride		0.564	0.506	0.438	0.420	0.464	0.451	0.364	0.420		0.454	13.323		
T	1,3-Butadiene					0.220	0.212	0.176	0.135	0.148	0.118	0.168	24.710		0.990
T	Bromomethane			0.176	0.159	0.179	0.196	0.221	0.211	0.228		0.196	13.055		
T	Chloroethane			0.192	0.183	0.199	0.207	0.203	0.189	0.193		0.195	4.273		
T	Trichlorofluoromethane		0.432	0.460	0.431	0.458	0.479	0.482	0.482	0.492		0.465	5.013		
T	Diethyl ether			0.191	0.192	0.193	0.189	0.192	0.197		0.202	0.194	2.274		
T	Isoprene					0.366	0.355	0.386	0.387	0.385	0.414	0.382	5.221		
T	Acrolein				0.021	0.021	0.020	0.021	0.023		0.021	0.021	4.175		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.269	0.247	0.261	0.264	0.264	0.265	0.271		0.263	2.932		
T	Acetone					0.057	0.058	0.055	0.053	0.056	0.045	0.054	8.929		
C	1,1-Dichloroethene		0.380	0.369	0.368	0.387	0.390	0.386	0.377	0.392		0.381	2.398		
T	Tert-Butyl Alcohol				0.017	0.018	0.016	0.014	0.018		0.017	0.017	8.130		
T	Dimethyl Sulfide					0.267	0.261	0.276	0.270	0.280	0.281	0.272	2.955		
T	Iodomethane			0.108	0.126	0.150	0.197	0.214	0.251	0.224	0.221	0.186	27.720	0.997	
T	Methyl acetate					0.129	0.125	0.134	0.140	0.141	0.143	0.135	5.216		
T	Methylene Chloride			0.311	0.287	0.287	0.286	0.285	0.274	0.287		0.288	3.813		
T	Carbon Disulfide			0.835	0.817	0.814	0.779	0.841	0.818	0.842	0.816	0.820	2.481		
T	Acrylonitrile			0.058	0.059	0.063	0.063	0.066	0.067		0.060	0.063	5.597		
T	Methyl Tert Butyl Ether			0.650	0.621	0.661	0.659	0.631	0.620	0.582		0.632	4.438		
T	trans-1,2-Dichloroethene		0.269	0.274	0.273	0.272	0.276	0.276	0.271	0.283		0.274	1.519		
T	n-Hexane					0.313	0.290	0.312	0.311	0.316	0.319	0.310	3.309		
T	Diisopropyl ether			0.719	0.724	0.709	0.699	0.694	0.699		0.699	0.706	1.627		
T	Vinyl Acetate					0.192	0.169	0.166	0.232	0.223	0.194	0.196	13.694		
P	1,1-Dichloroethane		0.460	0.450	0.445	0.457	0.465	0.452	0.444	0.462		0.454	1.740		
T	Ethyl-Tert-Butyl ether			0.716	0.722	0.718	0.705	0.702	0.724		0.720	0.715	1.185		
T	2-Butanone					0.068	0.068	0.066	0.071	0.069	0.067	0.068	2.393		
T	Propionitrile			0.020	0.022	0.023	0.022	0.023	0.023		0.023	0.022	5.579		
T	2,2-Dichloropropane		0.387	0.403	0.350	0.359	0.297	0.277	0.350	0.342		0.346	12.129		
T	cis-1,2-Dichloroethene		0.303	0.299	0.296	0.301	0.302	0.301	0.298	0.312		0.302	1.628		
C	Chloroform	0.658	0.590	0.542	0.485	0.482	0.482	0.476	0.463	0.481		0.518	12.803		
T	1-Bromopropane			0.041	0.052	0.052	0.056	0.057	0.058	0.053	0.060	0.053	11.075		
T	Bromochloromethane		0.132	0.144	0.150	0.165	0.170	0.168	0.171	0.170		0.159	9.183		
T	Tetrahydrofuran			0.050	0.044	0.045	0.043	0.043	0.045		0.043	0.045	5.367		
S	Dibromofluoromethane			0.245	0.236	0.256	0.262	0.259	0.257	0.262	0.265	0.255	3.868		
T	1,1,1-Trichloroethane		0.405	0.424	0.407	0.410	0.424	0.424	0.425	0.447		0.421	3.239		
T	Cyclohexane			0.387	0.368	0.384	0.366	0.397	0.394	0.411	0.406	0.389	4.204		
T	1,1-Dichloropropene			0.357	0.349	0.355	0.358	0.357	0.352	0.362		0.356	1.233		
T	Tert-Amyl-Methyl ether			0.684	0.674	0.681	0.663	0.669	0.698		0.685	0.679	1.728		
T	Carbon Tetrachloride			0.282	0.274	0.323	0.351	0.366	0.377	0.35		0.33183	12.2386		
S	1,2-Dichloroethane-d4				0.244	0.246	0.257	0.253	0.252	0.254	0.254	0.25153	1.86029		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.327	0.326	0.306	0.328	0.323	0.321	0.32	0.325		0.32202	2.174		
T	Benzene		1.21	1.101	1.077	1.063	1.054	1.025	1.007	1.019		1.06965	6.04095		
T	Trichloroethene		0.288	0.284	0.274	0.29	0.299	0.302	0.292	0.3		0.29115	3.19828		
T	Methylcyclohexane					0.413	0.393	0.422	0.423	0.432	0.44	0.42065	3.83804		
C	1,2-Dichloropropane		0.232	0.251	0.254	0.257	0.263	0.256	0.249	0.258		0.25244	3.71187		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.00184	6.16966		
T	Bromodichloromethane		0.334	0.34	0.341	0.358	0.37	0.369	0.364	0.376		0.35636	4.47459		
T	Dibromomethane		0.122	0.155	0.145	0.155	0.154	0.153	0.153	0.153		0.14868	7.44253		
T	2-Chloroethyl Vinyl Ether				0.076	0.1	0.106	0.106	0.109	0.088	0.107	0.09902	12.5245		
T	4-Methyl-2-Pentanone					0.063	0.064	0.064	0.068	0.065	0.065	0.06495	2.52742		
T	cis-1,3-Dichloropropene		0.346	0.382	0.37	0.401	0.412	0.407	0.409	0.413		0.39243	6.25845		
T	Dimethyl Disulfide					0.227	0.225	0.247	0.252	0.264	0.27	0.24758	7.53484		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.282	1.288	1.306	1.276	1.265	1.243	1.262	1.283	1.27569	1.48449		
C	Toluene		1.652	1.626	1.556	1.57	1.551	1.537	1.51	1.503		1.56301	3.34424		
T	Ethyl Methacrylate			0.354	0.349	0.379	0.362	0.386	0.4	0.394	0.402	0.37824	5.56152		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.466	0.427	0.489	0.494	0.497	0.503	0.498		0.48194	5.63896		
T	1,1,2-Trichloroethane		0.273	0.296	0.289	0.303	0.3	0.298	0.298	0.3		0.29455	3.27325		
T	2-Hexanone					0.142	0.14	0.14	0.146	0.139	0.141	0.14144	1.87214		
T	1,3-Dichloropropane		0.484	0.508	0.475	0.504	0.5	0.497	0.495	0.494		0.49443	2.17868		
T	Tetrachloroethene		0.355	0.38	0.375	0.383	0.381	0.385	0.382	0.389		0.37875	2.7685		
T	Dibromochloromethane		0.322	0.345	0.344	0.362	0.378	0.381	0.388	0.394		0.36412	6.97018		
T	1,2-Dibromoethane		0.284	0.282	0.277	0.28	0.281	0.286	0.29	0.283		0.28283	1.39806		
T	1-Chlorohexane		0.501	0.501	0.486	0.499	0.469	0.513	0.509	0.521	0.544	0.50473	4.18396		
P	Chlorobenzene		1.095	1.077	1.019	1.044	1.045	1.064	1.071	1.141		1.06977	3.47515		
T	1,1,1,2-Tetrachloroethane		0.348	0.357	0.345	0.371	0.385	0.4	0.413	0.446		0.3831	9.19348		
C	Ethylbenzene		0.6	0.536	0.538	0.559	0.564	0.581	0.595	0.659		0.57912	6.92495		
T	m-,p-Xylene		0.711	0.677	0.667	0.681	0.673	0.697	0.701	0.731		0.69221	3.13862		
T	o-Xylene			0.671	0.642	0.655	0.669	0.678	0.657	0.704		0.66797	2.95161		
T	Styrene		1.073	1.059	1.076	1.12	1.133	1.168	1.147	1.193		1.12136	4.31921		
P	Bromoform			0.2	0.2	0.214	0.226	0.238	0.239	0.237		0.22189	7.90635		
T	Isopropylbenzene		1.776	1.697	1.623	1.674	1.668	1.699	1.625	1.612		1.67159	3.22323		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.698	0.661	0.65	0.674	0.635	0.606	0.637	0.648		0.65111	4.24655		
S	p-Bromofluorobenzene			0.963	0.993	0.912	0.973	0.934	0.902	0.947	0.972	0.94951	3.31848		

T	1,2,3-Trichloropropane			0.195	0.177	0.197	0.197	0.19	0.193	0.197		0.19228	3.72212
T	trans-1,4-Dichloro-2-Butene			0.124	0.117	0.135	0.132	0.142	0.151	0.15	0.155	0.13826	10.0162
T	n-Propylbenzene		4.071	3.929	3.827	3.847	3.789	3.738	3.585	3.496		3.78518	4.83282
T	Bromobenzene	0.861	0.852	0.867	0.84	0.843	0.856	0.84	0.822	0.872		0.85035	1.84632
T	1,3,5-Trimethylbenzene		2.773	2.744	2.708	2.654	2.661	2.647	2.591	2.682		2.68251	2.16658
T	2-Chlorotoluene		2.733	2.689	2.575	2.498	2.579	2.388	2.346	2.355		2.52034	5.92259
T	4-Chlorotoluene		2.395	2.337	2.248	2.223	2.051	2.189	2.093	2.284		2.22752	5.21159
T	a-Methylstyrene					1.445	1.366	1.463	1.473	1.542	1.611	1.48341	5.66686
T	tert-Butylbenzene			0.551	0.564	0.544	0.568	0.565	0.555	0.589		0.56208	2.558
T	1,2,4-Trimethylbenzene			2.798	2.729	2.745	2.76	2.745	2.714	2.793		2.75494	1.13121
T	sec-Butylbenzene			3.56	3.327	3.322	3.297	3.276	3.197	3.178		3.30805	3.79322
T	p-Isopropyltoluene			2.879	2.746	2.749	2.779	2.779	2.76	2.787		2.78269	1.6223
T	1,3-Dichlorobenzene		1.745	1.595	1.607	1.558	1.601	1.574	1.559	1.608		1.60589	3.7263
T	1,4-Dichlorobenzene	1.858	1.642	1.613	1.574	1.578	1.594	1.578	1.564	1.615		1.62397	5.60487
T	n-Butylbenzene			2.643	2.479	2.524	2.512	2.536	2.56	2.533		2.54099	2.02916
T	1,2-Dichlorobenzene	1.566	1.589	1.537	1.453	1.471	1.497	1.472	1.477	1.484		1.50524	3.15458
T	1,2-Dibromo-3-Chloropropane				0.103	0.12	0.121	0.119	0.128	0.117		0.11794	7.07341
T	1,2,4-Trichlorobenzene		1.219	1.11	1.06	1.059	1.082	1.083	1.092	1.105		1.10135	4.63701
T	Hexachlorobutadiene		0.476	0.446	0.394	0.418	0.403	0.409	0.409	0.41		0.42065	6.42356
T	Naphthalene		2.283	2.179	2.049	2.212	2.236	2.219	2.289	2.175		2.20527	3.4468
T	1,2,3-Trichlorobenzene	1.267	1.197	1.116	1.005	0.999	0.994	0.992	1.004	0.995		1.06323	9.83782

Thu Apr 06 14:39:00 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041203 Run Date: 04/24/2017 Sample ID: WG611320-12
Instrument ID: HPMS11 Run Time: 22:26 Method: 8260B
File ID: 11M17718 Analyst: JDS QC Key: AF40
ICal Workgroup: WG611320 Cal ID: HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	47.8	ug/L	0.427	4.30	25	
1,2-Dichloropropane	CCC	50.0	48.5	ug/L	0.331	3.00	25	
Chloroform	CCC	50.0	52.4	ug/L	0.473	4.80	25	
Ethylbenzene	CCC	50.0	52.9	ug/L	0.576	5.70	25	
Toluene	CCC	50.0	46.9	ug/L	1.52	6.10	25	
Vinyl Chloride	CCC	50.0	52.2	ug/L	0.224	4.30	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.2	ug/L	0.773	1.60	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.548	4.30	25	
Bromoform	SPCC	50.0	50.1	ug/L	0.273	0.200	25	
Chlorobenzene	SPCC	50.0	48.9	ug/L	1.01	2.20	25	
Chloromethane	SPCC	50.0	64.6	ug/L	0.388	29.2	25	*
1,1,1,2-Tetrachloroethane		50.0	49.5	ug/L	0.379	1.00	25	
1,1,1-Trichloroethane		50.0	52.4	ug/L	0.423	4.90	25	
1,1,2-Trichloroethane		50.0	48.1	ug/L	0.329	3.70	25	
1,1-Dichloropropene		50.0	50.8	ug/L	0.360	1.70	25	
1,2,3-Trichlorobenzene		50.0	56.9	ug/L	1.28	13.8	25	
1,2,3-Trichloropropane		50.0	49.1	ug/L	0.221	1.80	25	
1,2,4-Trichlorobenzene		50.0	59.0	ug/L	1.30	18.0	25	
1,2,4-Trimethylbenzene		50.0	49.7	ug/L	2.49	0.500	25	
1,2-Dichloroethane		50.0	47.0	ug/L	0.368	5.90	25	
1,2-Dichlorobenzene		50.0	51.8	ug/L	1.58	3.50	25	
1,2-Dibromo-3-Chloropropane		50.0	51.8	ug/L	0.143	3.70	25	
1,2-Dibromoethane		50.0	49.6	ug/L	0.304	0.800	25	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.800	25	
1,3-Dichlorobenzene		50.0	51.7	ug/L	1.57	3.40	25	
1,3-Dichloropropane		50.0	50.3	ug/L	0.571	0.700	25	
1,4-Dichlorobenzene		50.0	48.9	ug/L	1.60	2.20	25	
1-Chlorohexane		50.0	58.4	ug/L	0.539	16.7	25	
2,2-Dichloropropane		50.0	43.2	ug/L	0.335	13.6	25	
2-Hexanone		50.0	54.4	ug/L	0.309	8.80	25	
2-Chlorotoluene		50.0	43.1	ug/L	2.05	13.8	25	
4-Chlorotoluene		50.0	49.8	ug/L	2.14	0.400	25	
Acetone		50.0	48.3	ug/L	0.0807	3.40	25	
Benzene		50.0	48.3	ug/L	1.06	3.40	25	
Bromobenzene		50.0	50.1	ug/L	0.854	0.200	25	
Bromochloromethane		50.0	50.2	ug/L	0.188	0.400	25	
Bromodichloromethane		50.0	49.6	ug/L	0.353	0.800	25	
Bromomethane		50.0	51.1	ug/L	0.226	2.10	25	
Carbon Disulfide		50.0	40.1	ug/L	0.612	19.9	25	
Carbon Tetrachloride		50.0	52.3	ug/L	0.366	4.70	25	
Chloroethane		50.0	59.0	ug/L	0.262	18.0	25	
cis-1,2-Dichloroethene		50.0	50.0	ug/L	0.305	0.100	25	

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041203 Run Date: 04/24/2017 Sample ID: WG611320-12
Instrument ID: HPMS11 Run Time: 22:26 Method: 8260B
File ID: 11M17718 Analyst: JDS QC Key: AF40
ICal Workgroup: WG611320 Cal ID: HPMS11 - 24-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	53.7	ug/L	0.453	7.30	25	
Dibromochloromethane		50.0	50.8	ug/L	0.387	1.70	25	
Dibromomethane		50.0	50.6	ug/L	0.163	1.20	25	
Dichlorodifluoromethane		50.0	63.7	ug/L	0.397	27.3	25	*
Hexachlorobutadiene		50.0	55.0	ug/L	0.642	10.1	25	
Isopropylbenzene		50.0	50.0	ug/L	1.60	0	25	
Methylene Chloride		50.0	46.9	ug/L	0.279	6.20	25	
Methyl Tert Butyl Ether		50.0	50.7	ug/L	0.757	1.40	25	
2-Butanone		50.0	50.4	ug/L	0.138	0.800	25	
4-Methyl-2-Pentanone		50.0	52.8	ug/L	0.127	5.60	25	
n-Butylbenzene		50.0	54.1	ug/L	2.46	8.20	25	
n-Propylbenzene		50.0	45.7	ug/L	3.20	8.60	25	
m-,p-Xylene		100	101	ug/L	0.660	1.30	25	
Naphthalene		50.0	55.9	ug/L	2.74	11.8	25	
o-Xylene		50.0	52.2	ug/L	0.685	4.40	25	
p-Isopropyltoluene		50.0	52.5	ug/L	2.67	4.90	25	
sec-Butylbenzene		50.0	47.6	ug/L	3.01	4.80	25	
Styrene		50.0	57.9	ug/L	1.13	15.8	25	
Trichloroethene		50.0	49.2	ug/L	0.283	1.60	25	
tert-Butylbenzene		50.0	48.8	ug/L	0.569	2.40	25	
Tetrachloroethene		50.0	52.6	ug/L	0.338	5.20	25	
trans-1,2-Dichloroethene		50.0	48.9	ug/L	0.266	2.10	25	
trans-1,3-Dichloropropene		50.0	50.2	ug/L	0.513	0.400	25	
Trichlorofluoromethane		50.0	55.2	ug/L	0.414	10.5	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041203 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	43.1	ug/L	0.333	13.7	25	
1,2-Dichloropropane	CCC	50.0	48.6	ug/L	0.272	2.70	25	
Chloroform	CCC	50.0	48.9	ug/L	0.481	2.20	25	
Ethylbenzene	CCC	50.0	47.5	ug/L	0.521	4.90	25	
Toluene	CCC	50.0	47.2	ug/L	1.48	5.60	25	
Vinyl Chloride	CCC	50.0	60.9	ug/L	0.392	21.9	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.2	ug/L	0.608	9.70	25	
1,1-Dichloroethane	SPCC	50.0	47.9	ug/L	0.452	4.20	25	
Bromoform	SPCC	50.0	49.0	ug/L	0.286	2.00	25	
Chlorobenzene	SPCC	50.0	47.2	ug/L	0.992	5.70	25	
Chloromethane	SPCC	50.0	59.6	ug/L	0.347	19.2	25	
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.384	6.30	25	
1,1,1-Trichloroethane		50.0	49.9	ug/L	0.432	0.100	25	
1,1,2-Trichloroethane		50.0	46.4	ug/L	0.282	7.20	25	
1,1-Dichloropropene		50.0	47.9	ug/L	0.326	4.20	25	
1,2,3-Trichlorobenzene		50.0	45.4	ug/L	1.09	9.20	25	
1,2,3-Trichloropropane		50.0	46.1	ug/L	0.183	7.90	25	
1,2,4-Trichlorobenzene		50.0	47.7	ug/L	1.19	4.50	25	
1,2,4-Trimethylbenzene		50.0	45.9	ug/L	2.58	8.10	25	
1,2-Dichloroethane		50.0	47.3	ug/L	0.314	5.40	25	
1,2-Dichlorobenzene		50.0	46.1	ug/L	1.54	7.80	25	
1,2-Dibromo-3-Chloropropane		50.0	47.0	ug/L	0.116	6.10	25	
1,2-Dibromoethane		50.0	46.5	ug/L	0.289	7.00	25	
1,3,5-Trimethylbenzene		50.0	45.9	ug/L	2.56	8.30	25	
1,3-Dichlorobenzene		50.0	44.6	ug/L	1.53	10.8	25	
1,3-Dichloropropane		50.0	48.4	ug/L	0.467	3.20	25	
1,4-Dichlorobenzene		50.0	45.0	ug/L	1.56	9.90	25	
1-Chlorohexane		50.0	51.7	ug/L	0.0879	3.50	25	
2,2-Dichloropropane		50.0	43.4	ug/L	0.325	13.2	25	
2-Hexanone		50.0	53.8	ug/L	0.172	7.60	25	
2-Chlorotoluene		50.0	44.5	ug/L	2.03	11.0	25	
4-Chlorotoluene		50.0	45.9	ug/L	2.09	8.20	25	
Acetone		50.0	49.5	ug/L	0.0498	0.900	25	
Benzene		50.0	47.5	ug/L	1.01	5.00	25	
Bromobenzene		50.0	45.0	ug/L	0.886	9.90	25	
Bromochloromethane		50.0	49.2	ug/L	0.189	1.50	25	
Bromodichloromethane		50.0	47.9	ug/L	0.357	4.20	25	
Bromomethane		50.0	43.3	ug/L	0.207	13.3	25	
Carbon Disulfide		50.0	43.8	ug/L	0.727	12.3	25	
Carbon Tetrachloride		50.0	49.0	ug/L	0.382	1.90	25	
Chloroethane		50.0	41.7	ug/L	0.127	16.5	25	
cis-1,2-Dichloroethene		50.0	48.4	ug/L	0.288	3.30	25	

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Login Number: L17041203 Run Date: 04/26/2017 Sample ID: WG611454-12
Instrument ID: HPMS17 Run Time: 01:35 Method: 8260B
File ID: 17M0273015 Analyst: FJB QC Key: AF40
ICal Workgroup: WG611454 Cal ID: HPMS17 - 26-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		50.0	51.0	ug/L	0.429	2.10	25	
Dibromochloromethane		50.0	47.4	ug/L	0.393	5.20	25	
Dibromomethane		50.0	48.8	ug/L	0.159	2.40	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.398	34.1	25	*
Hexachlorobutadiene		50.0	43.5	ug/L	0.613	13.0	25	
Isopropylbenzene		50.0	46.8	ug/L	1.58	6.30	25	
Methylene Chloride		50.0	44.4	ug/L	0.260	11.2	25	
Methyl Tert Butyl Ether		50.0	51.4	ug/L	0.687	2.90	25	
2-Butanone		50.0	50.4	ug/L	0.0756	0.800	25	
4-Methyl-2-Pentanone		50.0	51.9	ug/L	0.0721	3.90	25	
n-Butylbenzene		50.0	45.9	ug/L	2.27	8.30	25	
n-Propylbenzene		50.0	44.5	ug/L	3.28	11.1	25	
m-,p-Xylene		100	95.8	ug/L	0.633	4.20	25	
Naphthalene		50.0	47.0	ug/L	2.28	6.00	25	
o-Xylene		50.0	48.1	ug/L	0.627	3.70	25	
p-Isopropyltoluene		50.0	45.9	ug/L	2.69	8.20	25	
sec-Butylbenzene		50.0	44.7	ug/L	3.07	10.5	25	
Styrene		50.0	49.9	ug/L	1.04	0.200	25	
Trichloroethene		50.0	48.3	ug/L	0.309	3.30	25	
tert-Butylbenzene		50.0	44.7	ug/L	0.498	10.6	25	
Tetrachloroethene		50.0	46.6	ug/L	0.417	6.70	25	
trans-1,2-Dichloroethene		50.0	47.0	ug/L	0.247	6.00	25	
trans-1,3-Dichloropropene		50.0	48.2	ug/L	0.345	3.50	25	
Trichlorofluoromethane		50.0	32.0	ug/L	0.264	36.0	25	*

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041203 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	20.0	20.0	ug/L	0.381	0.100	25	
1,2-Dichloropropane	CCC	20.0	19.6	ug/L	0.248	1.90	25	
Chloroform	CCC	20.0	18.5	ug/L	0.479	7.50	25	
Ethylbenzene	CCC	20.0	18.6	ug/L	0.538	7.10	25	
Toluene	CCC	20.0	18.5	ug/L	1.45	7.30	25	
Vinyl Chloride	CCC	20.0	22.0	ug/L	0.499	10.0	25	
1,1,2,2-Tetrachloroethane	SPCC	20.0	19.6	ug/L	0.638	2.00	25	
1,1-Dichloroethane	SPCC	20.0	19.7	ug/L	0.448	1.50	25	
Bromoform	SPCC	20.0	18.7	ug/L	0.208	6.30	25	
Chlorobenzene	SPCC	20.0	18.3	ug/L	0.981	8.30	25	
Chloromethane	SPCC	20.0	22.5	ug/L	0.529	12.3	25	
1,1,1,2-Tetrachloroethane		20.0	18.6	ug/L	0.356	7.10	25	
1,1,1-Trichloroethane		20.0	20.1	ug/L	0.423	0.600	25	
1,1,2-Trichloroethane		20.0	18.9	ug/L	0.278	5.50	25	
1,1-Dichloropropene		20.0	19.6	ug/L	0.349	1.90	25	
1,2,3-Trichlorobenzene		20.0	18.2	ug/L	0.968	9.00	25	
1,2,3-Trichloropropane		20.0	19.5	ug/L	0.188	2.40	25	
1,2,4-Trichlorobenzene		20.0	18.7	ug/L	1.03	6.40	25	
1,2,4-Trimethylbenzene		20.0	18.7	ug/L	2.58	6.50	25	
1,2-Dichloroethane		20.0	19.5	ug/L	0.314	2.60	25	
1,2-Dichlorobenzene		20.0	18.5	ug/L	1.39	7.30	25	
1,2-Dibromo-3-Chloropropane		20.0	19.4	ug/L	0.114	3.00	25	
1,2-Dibromoethane		20.0	19.5	ug/L	0.276	2.50	25	
1,3,5-Trimethylbenzene		20.0	18.5	ug/L	2.49	7.30	25	
1,3-Dichlorobenzene		20.0	18.4	ug/L	1.48	7.90	25	
1,3-Dichloropropane		20.0	20.1	ug/L	0.498	0.700	25	
1,4-Dichlorobenzene		20.0	18.4	ug/L	1.50	7.80	25	
1-Chlorohexane		20.0	20.5	ug/L	0.517	2.40	25	
2,2-Dichloropropane		20.0	22.0	ug/L	0.381	10.1	25	
2-Hexanone		20.0	21.4	ug/L	0.151	7.00	25	
2-Chlorotoluene		20.0	17.4	ug/L	2.19	13.2	25	
4-Chlorotoluene		20.0	18.9	ug/L	2.10	5.70	25	
Acetone		20.0	19.0	ug/L	0.0513	4.90	25	
Benzene		20.0	18.8	ug/L	1.01	5.90	25	
Bromobenzene		20.0	18.5	ug/L	0.788	7.30	25	
Bromochloromethane		20.0	21.4	ug/L	0.170	7.00	25	
Bromodichloromethane		20.0	19.4	ug/L	0.346	2.80	25	
Bromomethane		20.0	17.7	ug/L	0.173	11.5	25	
Carbon Disulfide		20.0	16.1	ug/L	0.662	19.3	25	
Carbon Tetrachloride		20.0	20.6	ug/L	0.342	3.10	25	
Chloroethane		20.0	22.9	ug/L	0.223	14.3	25	
cis-1,2-Dichloroethene		20.0	19.5	ug/L	0.294	2.60	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5268578
Report generated 07/25/2017 13:49

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17041203 Run Date: 04/06/2017 Sample ID: WG608938-12
Instrument ID: HPMS6 Run Time: 15:57 Method: 8260B
File ID: 6M146240 Analyst: TMB QC Key: AF40
ICal Workgroup: WG608938 Cal ID: HPMS6 - 05-APR-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,3-Dichloropropene		20.0	21.6	ug/L	0.424	8.00	25	
Dibromochloromethane		20.0	19.4	ug/L	0.352	3.20	25	
Dibromomethane		20.0	20.5	ug/L	0.152	2.50	25	
Dichlorodifluoromethane		20.0	24.5	ug/L	0.487	22.7	25	
Hexachlorobutadiene		20.0	18.6	ug/L	0.391	7.00	25	
Isopropylbenzene		20.0	18.7	ug/L	1.56	6.40	25	
Methylene Chloride		20.0	19.4	ug/L	0.280	3.00	25	
Methyl Tert Butyl Ether		20.0	20.8	ug/L	0.658	4.10	25	
2-Butanone		20.0	20.3	ug/L	0.0689	1.30	25	
4-Methyl-2-Pentanone		20.0	20.8	ug/L	0.0677	4.20	25	
n-Butylbenzene		20.0	18.9	ug/L	2.40	5.50	25	
n-Propylbenzene		20.0	18.3	ug/L	3.47	8.30	25	
m-,p-Xylene		40.0	37.4	ug/L	0.646	6.60	25	
Naphthalene		20.0	18.7	ug/L	2.07	6.30	25	
o-Xylene		20.0	18.9	ug/L	0.631	5.50	25	
p-Isopropyltoluene		20.0	19.0	ug/L	2.64	5.20	25	
sec-Butylbenzene		20.0	18.3	ug/L	3.02	8.60	25	
Styrene		20.0	19.3	ug/L	1.08	3.50	25	
Trichloroethene		20.0	18.6	ug/L	0.271	6.80	25	
tert-Butylbenzene		20.0	19.0	ug/L	0.535	4.80	25	
Tetrachloroethene		20.0	19.4	ug/L	0.367	3.00	25	
trans-1,2-Dichloroethene		20.0	19.6	ug/L	0.268	2.20	25	
trans-1,3-Dichloropropene		20.0	19.9	ug/L	0.479	0.700	25	
Trichlorofluoromethane		20.0	21.0	ug/L	0.489	5.20	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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Version 1.5 PDF File ID: 5268578
Report generated 07/25/2017 13:49

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG612085 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	56.2	ug/L	0.429	12.5	20	
1,2-Dichloropropane	CCC	50.0	54.5	ug/L	0.275	9.10	20	
Chloroform	CCC	50.0	47.5	ug/L	0.492	4.97	20	
Ethylbenzene	CCC	50.0	50.6	ug/L	0.586	1.14	20	
Toluene	CCC	50.0	51.2	ug/L	1.60	2.48	20	
Vinyl Chloride	CCC	50.0	48.2	ug/L	0.437	3.67	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.8	ug/L	0.662	1.61	20	
1,1-Dichloroethane	SPCC	50.0	55.6	ug/L	0.505	11.2	20	
Bromoform	SPCC	50.0	46.6	ug/L	0.207	6.70	20	
Chlorobenzene	SPCC	50.0	49.5	ug/L	1.06	0.967	20	
Chloromethane	SPCC	50.0	50.6	ug/L	0.468	1.22	20	
Xylenes		150	153	ug/L	0.694	1.87	20	
1,1,1,2-Tetrachloroethane		50.0	50.0	ug/L	0.384	0.0966	20	
1,1,1-Trichloroethane		50.0	51.6	ug/L	0.434	3.22	20	
1,1,2-Trichloroethane		50.0	50.6	ug/L	0.298	1.16	20	
1,1-Dichloropropene		50.0	52.9	ug/L	0.377	5.86	20	
1,2,3-Trichlorobenzene		50.0	44.3	ug/L	0.942	11.4	20	
1,2,3-Trichloropropane		50.0	49.0	ug/L	0.188	1.99	20	
1,2,4-Trichlorobenzene		50.0	47.3	ug/L	1.04	5.40	20	
1,2,4-Trimethylbenzene		50.0	53.4	ug/L	2.94	6.87	20	
1,2-Dichloroethane		50.0	52.2	ug/L	0.336	4.46	20	
1,2-Dichlorobenzene		50.0	48.1	ug/L	1.45	3.80	20	
1,2-Dibromo-3-Chloropropane		50.0	51.7	ug/L	0.122	3.32	20	
1,2-Dibromoethane		50.0	49.5	ug/L	0.280	1.06	20	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.83	5.41	20	
1,3-Dichlorobenzene		50.0	49.1	ug/L	1.58	1.90	20	
1,3-Dichloropropane		50.0	52.4	ug/L	0.518	4.75	20	
1,4-Dichlorobenzene		50.0	48.2	ug/L	1.57	3.54	20	
1-Chlorohexane		50.0	54.3	ug/L	0.548	8.66	20	
2,2-Dichloropropane		50.0	55.1	ug/L	0.381	10.2	20	
2-Hexanone		50.0	52.7	ug/L	0.149	5.40	20	
2-Chlorotoluene		50.0	53.4	ug/L	2.69	6.71	20	
4-Chlorotoluene		50.0	52.0	ug/L	2.32	4.02	20	
Acetone		50.0	55.6	ug/L	0.0600	11.2	20	
Benzene		50.0	50.3	ug/L	1.08	0.583	20	
Bromobenzene		50.0	48.2	ug/L	0.819	3.64	20	
Bromochloromethane		50.0	50.6	ug/L	0.161	1.15	20	
Bromodichloromethane		50.0	52.1	ug/L	0.371	4.10	20	
Bromomethane		50.0	47.4	ug/L	0.186	5.28	20	
Carbon Disulfide		50.0	55.8	ug/L	0.915	11.6	20	
Carbon Tetrachloride		50.0	52.1	ug/L	0.346	4.16	20	
Chloroethane		50.0	55.1	ug/L	0.215	10.3	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/28/2017 Sample ID: WG612082-02

Instrument ID: HPMS6 Run Time: 19:35 Method: 8260B

File ID: 6M146822 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG612085 Cal ID: HPMS6 - 05-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	51.1	ug/L	0.308	2.12	20	
cis-1,3-Dichloropropene		50.0	55.2	ug/L	0.433	10.3	20	
Dibromochloromethane		50.0	48.9	ug/L	0.356	2.18	20	
Dibromomethane		50.0	50.2	ug/L	0.149	0.376	20	
Dichlorodifluoromethane		50.0	53.8	ug/L	0.427	7.59	20	
Hexachlorobutadiene		50.0	49.3	ug/L	0.415	1.42	20	
Isopropylbenzene		50.0	52.3	ug/L	1.75	4.59	20	
Methylene Chloride		50.0	51.3	ug/L	0.296	2.54	20	
Methyl Tert Butyl Ether		50.0	52.9	ug/L	0.668	5.77	20	
2-Butanone		50.0	52.8	ug/L	0.0718	5.61	20	
4-Methyl-2-Pentanone		50.0	50.3	ug/L	0.0653	0.596	20	
n-Butylbenzene		50.0	55.7	ug/L	2.83	11.5	20	
n-Propylbenzene		50.0	53.6	ug/L	4.06	7.17	20	
m-,p-Xylene		100	101	ug/L	0.702	1.47	20	
Naphthalene		50.0	48.0	ug/L	2.12	3.96	20	
o-Xylene		50.0	51.3	ug/L	0.686	2.67	20	
p-Isopropyltoluene		50.0	52.7	ug/L	2.94	5.49	20	
sec-Butylbenzene		50.0	53.3	ug/L	3.52	6.51	20	
Styrene		50.0	52.8	ug/L	1.18	5.61	20	
Trichloroethene		50.0	47.1	ug/L	0.274	5.75	20	
tert-Butylbenzene		50.0	51.3	ug/L	0.577	2.66	20	
Tetrachloroethene		50.0	48.2	ug/L	0.365	3.69	20	
trans-1,2-Dichloroethene		50.0	51.2	ug/L	0.281	2.30	20	
trans-1,3-Dichloropropene		50.0	56.1	ug/L	0.541	12.3	20	
Trichlorofluoromethane		50.0	51.4	ug/L	0.478	2.86	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612121-02

Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B

File ID: 11M17869 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	48.5	ug/L	0.434	2.91	20	
1,2-Dichloropropane	CCC	50.0	47.3	ug/L	0.323	5.36	20	
Chloroform	CCC	50.0	48.9	ug/L	0.445	2.24	20	
Ethylbenzene	CCC	50.0	49.6	ug/L	0.540	0.807	20	
Toluene	CCC	50.0	44.5	ug/L	1.44	10.9	20	
Vinyl Chloride	CCC	50.0	54.0	ug/L	0.232	7.97	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.5	ug/L	0.716	8.92	20	
1,1-Dichloroethane	SPCC	50.0	47.5	ug/L	0.545	4.92	20	
Bromoform	SPCC	50.0	47.2	ug/L	0.257	5.67	20	
Chlorobenzene	SPCC	50.0	45.9	ug/L	0.944	8.29	20	
Chloromethane	SPCC	50.0	37.7	ug/L	0.228	24.5	20	*
Xylenes		150	144	ug/L	0.629	4.13	20	
1,1,1,2-Tetrachloroethane		50.0	47.6	ug/L	0.365	4.81	20	
1,1,1-Trichloroethane		50.0	48.8	ug/L	0.394	2.39	20	
1,1,2-Trichloroethane		50.0	45.8	ug/L	0.313	8.49	20	
1,1-Dichloropropene		50.0	48.4	ug/L	0.343	3.18	20	
1,2,3-Trichlorobenzene		50.0	49.6	ug/L	1.11	0.870	20	
1,2,3-Trichloropropane		50.0	44.1	ug/L	0.199	11.8	20	
1,2,4-Trichlorobenzene		50.0	53.6	ug/L	1.18	7.13	20	
1,2,4-Trimethylbenzene		50.0	49.5	ug/L	2.48	1.08	20	
1,2-Dichloroethane		50.0	47.6	ug/L	0.372	4.85	20	
1,2-Dichlorobenzene		50.0	48.7	ug/L	1.49	2.61	20	
1,2-Dibromo-3-Chloropropane		50.0	46.4	ug/L	0.128	7.14	20	
1,2-Dibromoethane		50.0	46.7	ug/L	0.287	6.58	20	
1,3,5-Trimethylbenzene		50.0	50.4	ug/L	2.42	0.790	20	
1,3-Dichlorobenzene		50.0	50.6	ug/L	1.54	1.23	20	
1,3-Dichloropropane		50.0	46.0	ug/L	0.521	8.09	20	
1,4-Dichlorobenzene		50.0	47.3	ug/L	1.54	5.30	20	
1-Chlorohexane		50.0	55.5	ug/L	0.512	10.9	20	
2,2-Dichloropropane		50.0	50.6	ug/L	0.392	1.21	20	
2-Hexanone		50.0	45.0	ug/L	0.256	9.91	20	
2-Chlorotoluene		50.0	45.3	ug/L	2.16	9.42	20	
4-Chlorotoluene		50.0	48.4	ug/L	2.08	3.25	20	
Acetone		50.0	42.4	ug/L	0.0709	15.2	20	
Benzene		50.0	45.6	ug/L	1.00	8.74	20	
Bromobenzene		50.0	48.7	ug/L	0.831	2.58	20	
Bromochloromethane		50.0	45.8	ug/L	0.171	8.50	20	
Bromodichloromethane		50.0	48.7	ug/L	0.347	2.61	20	
Bromomethane		50.0	44.6	ug/L	0.198	10.9	20	
Carbon Disulfide		50.0	50.3	ug/L	0.768	0.604	20	
Carbon Tetrachloride		50.0	49.1	ug/L	0.343	1.77	20	
Chloroethane		50.0	47.8	ug/L	0.212	4.43	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/29/2017 Sample ID: WG612121-02

Instrument ID: HPMS11 Run Time: 18:53 Method: 8260B

File ID: 11M17869 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG612123 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	47.3	ug/L	0.288	5.48	20	
cis-1,3-Dichloropropene		50.0	50.8	ug/L	0.429	1.52	20	
Dibromochloromethane		50.0	49.4	ug/L	0.376	1.12	20	
Dibromomethane		50.0	46.8	ug/L	0.151	6.43	20	
Dichlorodifluoromethane		50.0	50.7	ug/L	0.311	1.40	20	
Hexachlorobutadiene		50.0	50.9	ug/L	0.593	1.78	20	
Isopropylbenzene		50.0	48.0	ug/L	1.54	4.05	20	
Methylene Chloride		50.0	45.2	ug/L	0.269	9.69	20	
Methyl Tert Butyl Ether		50.0	46.4	ug/L	0.693	7.11	20	
2-Butanone		50.0	45.7	ug/L	0.125	8.56	20	
4-Methyl-2-Pentanone		50.0	44.1	ug/L	0.106	11.7	20	
n-Butylbenzene		50.0	54.3	ug/L	2.47	8.66	20	
n-Propylbenzene		50.0	48.0	ug/L	3.36	3.99	20	
m-,p-Xylene		100	95.1	ug/L	0.619	4.90	20	
Naphthalene		50.0	48.5	ug/L	2.38	3.07	20	
o-Xylene		50.0	48.7	ug/L	0.639	2.59	20	
p-Isopropyltoluene		50.0	51.5	ug/L	2.62	3.00	20	
sec-Butylbenzene		50.0	47.6	ug/L	3.02	4.74	20	
Styrene		50.0	53.7	ug/L	1.05	7.47	20	
Trichloroethene		50.0	45.5	ug/L	0.262	8.98	20	
tert-Butylbenzene		50.0	46.2	ug/L	0.539	7.52	20	
Tetrachloroethene		50.0	49.1	ug/L	0.316	1.76	20	
trans-1,2-Dichloroethene		50.0	45.8	ug/L	0.249	8.49	20	
trans-1,3-Dichloropropene		50.0	51.2	ug/L	0.523	2.34	20	
Trichlorofluoromethane		50.0	49.7	ug/L	0.372	0.670	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5268580
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Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612141-02
Instrument ID: HPMS17 Run Time: 14:54 Method: 8260B
File ID: 17M0273173 Analyst: ADC QC Key: AF40
Workgroup (AAB#): WG612142 Cal ID: HPMS17 - 26-APR-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	52.4	ug/L	0.405	4.80	20	
1,2-Dichloropropane	CCC	50.0	50.5	ug/L	0.282	0.947	20	
Chloroform	CCC	50.0	49.7	ug/L	0.489	0.632	20	
Ethylbenzene	CCC	50.0	50.9	ug/L	0.557	1.74	20	
Toluene	CCC	50.0	50.9	ug/L	1.59	1.72	20	
Vinyl Chloride	CCC	50.0	53.2	ug/L	0.342	6.33	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.4	ug/L	0.665	1.15	20	
1,1-Dichloroethane	SPCC	50.0	52.0	ug/L	0.492	4.10	20	
Bromoform	SPCC	50.0	46.0	ug/L	0.268	8.05	20	
Chlorobenzene	SPCC	50.0	49.0	ug/L	1.03	1.93	20	
Chloromethane	SPCC	50.0	51.4	ug/L	0.299	2.81	20	
Xylenes		150	153	ug/L	0.666	2.01	20	
1,1,1,2-Tetrachloroethane		50.0	47.9	ug/L	0.392	4.18	20	
1,1,1-Trichloroethane		50.0	50.4	ug/L	0.436	0.728	20	
1,1,2-Trichloroethane		50.0	45.8	ug/L	0.279	8.30	20	
1,1-Dichloropropene		50.0	52.0	ug/L	0.353	3.92	20	
1,2,3-Trichlorobenzene		50.0	46.0	ug/L	1.11	7.96	20	
1,2,3-Trichloropropane		50.0	45.1	ug/L	0.179	9.88	20	
1,2,4-Trichlorobenzene		50.0	50.6	ug/L	1.26	1.21	20	
1,2,4-Trimethylbenzene		50.0	52.5	ug/L	2.95	5.08	20	
1,2-Dichloroethane		50.0	47.7	ug/L	0.316	4.63	20	
1,2-Dichlorobenzene		50.0	48.9	ug/L	1.64	2.13	20	
1,2-Dibromo-3-Chloropropane		50.0	48.7	ug/L	0.120	2.53	20	
1,2-Dibromoethane		50.0	45.2	ug/L	0.282	9.54	20	
1,3,5-Trimethylbenzene		50.0	53.0	ug/L	2.95	6.02	20	
1,3-Dichlorobenzene		50.0	51.4	ug/L	1.76	2.90	20	
1,3-Dichloropropane		50.0	47.0	ug/L	0.454	5.94	20	
1,4-Dichlorobenzene		50.0	50.0	ug/L	1.73	0.0310	20	
1-Chlorohexane		50.0	53.6	ug/L	0.0911	7.26	20	
2,2-Dichloropropane		50.0	56.3	ug/L	0.422	12.6	20	
2-Hexanone		50.0	44.3	ug/L	0.141	11.4	20	
2-Chlorotoluene		50.0	52.1	ug/L	2.38	4.26	20	
4-Chlorotoluene		50.0	53.0	ug/L	2.41	5.96	20	
Acetone		50.0	39.2	ug/L	0.0394	21.6	20	*
Benzene		50.0	50.3	ug/L	1.07	0.658	20	
Bromobenzene		50.0	48.3	ug/L	0.949	3.47	20	
Bromochloromethane		50.0	48.8	ug/L	0.187	2.50	20	
Bromodichloromethane		50.0	49.5	ug/L	0.369	1.01	20	
Bromomethane		50.0	40.3	ug/L	0.193	19.4	20	
Carbon Disulfide		50.0	50.8	ug/L	0.842	1.52	20	
Carbon Tetrachloride		50.0	51.1	ug/L	0.398	2.28	20	
Chloroethane		50.0	45.5	ug/L	0.139	9.01	20	

CCV - Modified 03/05/2008
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Report generated 07/25/2017 13:52

Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 04/30/2017 Sample ID: WG612141-02

Instrument ID: HPMS17 Run Time: 14:54 Method: 8260B

File ID: 17M0273173 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612142 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.9	ug/L	0.297	0.148	20	
cis-1,3-Dichloropropene		50.0	52.4	ug/L	0.440	4.77	20	
Dibromochloromethane		50.0	46.8	ug/L	0.388	6.37	20	
Dibromomethane		50.0	46.9	ug/L	0.153	6.19	20	
Dichlorodifluoromethane		50.0	57.4	ug/L	0.341	14.8	20	
Hexachlorobutadiene		50.0	48.4	ug/L	0.681	3.26	20	
Isopropylbenzene		50.0	50.8	ug/L	1.71	1.56	20	
Methylene Chloride		50.0	48.0	ug/L	0.282	3.93	20	
Methyl Tert Butyl Ether		50.0	46.0	ug/L	0.614	7.92	20	
2-Butanone		50.0	44.6	ug/L	0.0668	10.8	20	
4-Methyl-2-Pentanone		50.0	42.8	ug/L	0.0594	14.4	20	
n-Butylbenzene		50.0	56.7	ug/L	2.80	13.4	20	
n-Propylbenzene		50.0	54.2	ug/L	4.00	8.44	20	
m-,p-Xylene		100	103	ug/L	0.681	3.13	20	
Naphthalene		50.0	44.5	ug/L	2.16	10.9	20	
o-Xylene		50.0	49.9	ug/L	0.650	0.215	20	
p-Isopropyltoluene		50.0	53.2	ug/L	3.12	6.45	20	
sec-Butylbenzene		50.0	52.8	ug/L	3.62	5.53	20	
Styrene		50.0	52.1	ug/L	1.09	4.29	20	
Trichloroethene		50.0	47.3	ug/L	0.303	5.44	20	
tert-Butylbenzene		50.0	50.3	ug/L	0.560	0.534	20	
Tetrachloroethene		50.0	49.4	ug/L	0.442	1.17	20	
trans-1,2-Dichloroethene		50.0	50.8	ug/L	0.267	1.68	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.360	0.817	20	
Trichlorofluoromethane		50.0	54.0	ug/L	0.446	7.95	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612249-02

Instrument ID: HPMS17 Run Time: 12:07 Method: 8260B

File ID: 17M0273203 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612250 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	51.2	ug/L	0.396	2.45	20	
1,2-Dichloropropane	CCC	50.0	50.3	ug/L	0.281	0.698	20	
Chloroform	CCC	50.0	49.1	ug/L	0.483	1.88	20	
Ethylbenzene	CCC	50.0	50.6	ug/L	0.554	1.20	20	
Toluene	CCC	50.0	50.3	ug/L	1.58	0.684	20	
Vinyl Chloride	CCC	50.0	51.6	ug/L	0.332	3.18	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.4	ug/L	0.665	1.15	20	
1,1-Dichloroethane	SPCC	50.0	51.3	ug/L	0.485	2.65	20	
Bromoform	SPCC	50.0	47.2	ug/L	0.275	5.63	20	
Chlorobenzene	SPCC	50.0	48.9	ug/L	1.03	2.13	20	
Chloromethane	SPCC	50.0	51.6	ug/L	0.300	3.21	20	
Xylenes		150	152	ug/L	0.661	1.28	20	
1,1,1,2-Tetrachloroethane		50.0	48.2	ug/L	0.395	3.58	20	
1,1,1-Trichloroethane		50.0	49.4	ug/L	0.428	1.11	20	
1,1,2-Trichloroethane		50.0	46.2	ug/L	0.281	7.50	20	
1,1-Dichloropropene		50.0	50.8	ug/L	0.346	1.68	20	
1,2,3-Trichlorobenzene		50.0	45.7	ug/L	1.10	8.65	20	
1,2,3-Trichloropropane		50.0	44.6	ug/L	0.177	10.9	20	
1,2,4-Trichlorobenzene		50.0	49.5	ug/L	1.23	0.963	20	
1,2,4-Trimethylbenzene		50.0	50.7	ug/L	2.85	1.31	20	
1,2-Dichloroethane		50.0	47.6	ug/L	0.315	4.87	20	
1,2-Dichlorobenzene		50.0	48.3	ug/L	1.61	3.46	20	
1,2-Dibromo-3-Chloropropane		50.0	47.9	ug/L	0.118	4.20	20	
1,2-Dibromoethane		50.0	45.3	ug/L	0.282	9.46	20	
1,3,5-Trimethylbenzene		50.0	50.6	ug/L	2.82	1.29	20	
1,3-Dichlorobenzene		50.0	49.9	ug/L	1.71	0.259	20	
1,3-Dichloropropane		50.0	47.5	ug/L	0.459	4.96	20	
1,4-Dichlorobenzene		50.0	48.7	ug/L	1.69	2.51	20	
1-Chlorohexane		50.0	53.7	ug/L	0.0912	7.44	20	
2,2-Dichloropropane		50.0	55.0	ug/L	0.412	9.99	20	
2-Hexanone		50.0	42.3	ug/L	0.135	15.4	20	
2-Chlorotoluene		50.0	49.8	ug/L	2.27	0.394	20	
4-Chlorotoluene		50.0	51.0	ug/L	2.32	1.96	20	
Acetone		50.0	40.7	ug/L	0.0409	18.7	20	
Benzene		50.0	49.5	ug/L	1.05	1.09	20	
Bromobenzene		50.0	47.0	ug/L	0.925	5.93	20	
Bromochloromethane		50.0	48.5	ug/L	0.186	2.94	20	
Bromodichloromethane		50.0	49.0	ug/L	0.366	1.93	20	
Bromomethane		50.0	39.4	ug/L	0.188	21.2	20	*
Carbon Disulfide		50.0	51.2	ug/L	0.848	2.35	20	
Carbon Tetrachloride		50.0	50.5	ug/L	0.393	1.01	20	
Chloroethane		50.0	45.1	ug/L	0.138	9.75	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612249-02

Instrument ID: HPMS17 Run Time: 12:07 Method: 8260B

File ID: 17M0273203 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612250 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.0	ug/L	0.291	2.08	20	
cis-1,3-Dichloropropene		50.0	51.7	ug/L	0.434	3.43	20	
Dibromochloromethane		50.0	47.6	ug/L	0.394	4.89	20	
Dibromomethane		50.0	47.0	ug/L	0.153	6.04	20	
Dichlorodifluoromethane		50.0	55.9	ug/L	0.332	11.7	20	
Hexachlorobutadiene		50.0	46.1	ug/L	0.649	7.89	20	
Isopropylbenzene		50.0	50.1	ug/L	1.69	0.289	20	
Methylene Chloride		50.0	48.4	ug/L	0.284	3.20	20	
Methyl Tert Butyl Ether		50.0	45.9	ug/L	0.612	8.24	20	
2-Butanone		50.0	43.9	ug/L	0.0659	12.1	20	
4-Methyl-2-Pentanone		50.0	42.0	ug/L	0.0582	16.1	20	
n-Butylbenzene		50.0	54.3	ug/L	2.68	8.65	20	
n-Propylbenzene		50.0	51.7	ug/L	3.82	3.49	20	
m-,p-Xylene		100	102	ug/L	0.675	2.21	20	
Naphthalene		50.0	44.5	ug/L	2.16	10.9	20	
o-Xylene		50.0	49.7	ug/L	0.647	0.568	20	
p-Isopropyltoluene		50.0	51.0	ug/L	2.98	1.98	20	
sec-Butylbenzene		50.0	50.5	ug/L	3.47	1.01	20	
Styrene		50.0	51.9	ug/L	1.08	3.90	20	
Trichloroethene		50.0	46.7	ug/L	0.299	6.57	20	
tert-Butylbenzene		50.0	48.0	ug/L	0.534	4.05	20	
Tetrachloroethene		50.0	48.8	ug/L	0.437	2.30	20	
trans-1,2-Dichloroethene		50.0	49.9	ug/L	0.262	0.242	20	
trans-1,3-Dichloropropene		50.0	50.4	ug/L	0.360	0.704	20	
Trichlorofluoromethane		50.0	53.8	ug/L	0.444	7.61	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612294-02

Instrument ID: HPMS11 Run Time: 15:53 Method: 8260B

File ID: 11M17934 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG612295 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	50.7	ug/L	0.453	1.48	20	
1,2-Dichloropropane	CCC	50.0	49.3	ug/L	0.336	1.43	20	
Chloroform	CCC	50.0	50.6	ug/L	0.460	1.13	20	
Ethylbenzene	CCC	50.0	52.0	ug/L	0.566	4.02	20	
Toluene	CCC	50.0	47.0	ug/L	1.52	5.98	20	
Vinyl Chloride	CCC	50.0	45.8	ug/L	0.197	8.35	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	47.8	ug/L	0.751	4.40	20	
1,1-Dichloroethane	SPCC	50.0	49.2	ug/L	0.564	1.56	20	
Bromoform	SPCC	50.0	49.3	ug/L	0.269	1.46	20	
Chlorobenzene	SPCC	50.0	49.2	ug/L	1.01	1.54	20	
Chloromethane	SPCC	50.0	40.1	ug/L	0.242	19.8	20	
Xylenes		150	153	ug/L	0.668	1.85	20	
1,1,1,2-Tetrachloroethane		50.0	49.9	ug/L	0.382	0.267	20	
1,1,1-Trichloroethane		50.0	50.2	ug/L	0.405	0.373	20	
1,1,2-Trichloroethane		50.0	47.7	ug/L	0.326	4.50	20	
1,1-Dichloropropene		50.0	51.1	ug/L	0.362	2.13	20	
1,2,3-Trichlorobenzene		50.0	52.4	ug/L	1.18	4.71	20	
1,2,3-Trichloropropane		50.0	46.9	ug/L	0.211	6.16	20	
1,2,4-Trichlorobenzene		50.0	55.9	ug/L	1.23	11.7	20	
1,2,4-Trimethylbenzene		50.0	52.9	ug/L	2.65	5.72	20	
1,2-Dichloroethane		50.0	49.0	ug/L	0.383	1.99	20	
1,2-Dichlorobenzene		50.0	51.8	ug/L	1.59	3.66	20	
1,2-Dibromo-3-Chloropropane		50.0	47.1	ug/L	0.130	5.78	20	
1,2-Dibromoethane		50.0	49.1	ug/L	0.301	1.80	20	
1,3,5-Trimethylbenzene		50.0	53.7	ug/L	2.57	7.30	20	
1,3-Dichlorobenzene		50.0	54.0	ug/L	1.64	7.98	20	
1,3-Dichloropropane		50.0	48.3	ug/L	0.548	3.40	20	
1,4-Dichlorobenzene		50.0	49.9	ug/L	1.63	0.271	20	
1-Chlorohexane		50.0	55.9	ug/L	0.515	11.7	20	
2,2-Dichloropropane		50.0	53.0	ug/L	0.411	5.92	20	
2-Hexanone		50.0	43.8	ug/L	0.249	12.4	20	
2-Chlorotoluene		50.0	54.5	ug/L	2.59	8.92	20	
4-Chlorotoluene		50.0	43.6	ug/L	1.87	12.9	20	
Acetone		50.0	41.2	ug/L	0.0689	17.6	20	
Benzene		50.0	47.6	ug/L	1.04	4.75	20	
Bromobenzene		50.0	51.9	ug/L	0.884	3.71	20	
Bromochloromethane		50.0	49.1	ug/L	0.184	1.73	20	
Bromodichloromethane		50.0	50.3	ug/L	0.359	0.694	20	
Bromomethane		50.0	46.6	ug/L	0.206	6.88	20	
Carbon Disulfide		50.0	50.1	ug/L	0.765	0.253	20	
Carbon Tetrachloride		50.0	52.0	ug/L	0.363	4.04	20	
Chloroethane		50.0	50.3	ug/L	0.224	0.599	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/01/2017 Sample ID: WG612294-02

Instrument ID: HPMS11 Run Time: 15:53 Method: 8260B

File ID: 11M17934 Analyst: JDS QC Key: AF40

Workgroup (AAB#): WG612295 Cal ID: HPMS11 - 24-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.1	ug/L	0.300	1.77	20	
cis-1,3-Dichloropropene		50.0	52.7	ug/L	0.445	5.40	20	
Dibromochloromethane		50.0	51.7	ug/L	0.394	3.43	20	
Dibromomethane		50.0	49.0	ug/L	0.158	1.98	20	
Dichlorodifluoromethane		50.0	53.5	ug/L	0.328	7.03	20	
Hexachlorobutadiene		50.0	55.1	ug/L	0.642	10.1	20	
Isopropylbenzene		50.0	51.1	ug/L	1.64	2.20	20	
Methylene Chloride		50.0	47.2	ug/L	0.282	5.51	20	
Methyl Tert Butyl Ether		50.0	47.2	ug/L	0.705	5.52	20	
2-Butanone		50.0	44.1	ug/L	0.120	11.9	20	
4-Methyl-2-Pentanone		50.0	42.8	ug/L	0.103	14.4	20	
n-Butylbenzene		50.0	58.2	ug/L	2.64	16.3	20	
n-Propylbenzene		50.0	51.2	ug/L	3.59	2.34	20	
m-,p-Xylene		100	101	ug/L	0.660	1.35	20	
Naphthalene		50.0	50.9	ug/L	2.49	1.80	20	
o-Xylene		50.0	51.4	ug/L	0.675	2.84	20	
p-Isopropyltoluene		50.0	55.4	ug/L	2.82	10.8	20	
sec-Butylbenzene		50.0	51.1	ug/L	3.24	2.24	20	
Styrene		50.0	56.5	ug/L	1.10	13.0	20	
Trichloroethene		50.0	48.3	ug/L	0.278	3.40	20	
tert-Butylbenzene		50.0	50.7	ug/L	0.591	1.36	20	
Tetrachloroethene		50.0	52.2	ug/L	0.336	4.41	20	
trans-1,2-Dichloroethene		50.0	47.7	ug/L	0.259	4.66	20	
trans-1,3-Dichloropropene		50.0	53.1	ug/L	0.542	6.16	20	
Trichlorofluoromethane		50.0	52.5	ug/L	0.394	5.07	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612550-02

Instrument ID: HPMS17 Run Time: 18:50 Method: 8260B

File ID: 17M0273261 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612551 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	53.6	ug/L	0.414	7.20	20	
1,2-Dichloropropane	CCC	50.0	51.9	ug/L	0.290	3.75	20	
Chloroform	CCC	50.0	50.2	ug/L	0.494	0.330	20	
Ethylbenzene	CCC	50.0	51.1	ug/L	0.560	2.23	20	
Toluene	CCC	50.0	50.9	ug/L	1.60	1.90	20	
Vinyl Chloride	CCC	50.0	55.4	ug/L	0.357	10.8	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	49.4	ug/L	0.664	1.27	20	
1,1-Dichloroethane	SPCC	50.0	52.9	ug/L	0.500	5.80	20	
Bromoform	SPCC	50.0	46.9	ug/L	0.273	6.28	20	
Chlorobenzene	SPCC	50.0	49.6	ug/L	1.04	0.798	20	
Chloromethane	SPCC	50.0	60.2	ug/L	0.350	20.4	20	*
Xylenes		150	154	ug/L	0.669	2.58	20	
1,1,1,2-Tetrachloroethane		50.0	48.8	ug/L	0.399	2.47	20	
1,1,1-Trichloroethane		50.0	50.9	ug/L	0.441	1.75	20	
1,1,2-Trichloroethane		50.0	46.7	ug/L	0.284	6.67	20	
1,1-Dichloropropene		50.0	52.4	ug/L	0.357	4.89	20	
1,2,3-Trichlorobenzene		50.0	42.5	ug/L	1.02	15.0	20	
1,2,3-Trichloropropane		50.0	44.6	ug/L	0.177	10.8	20	
1,2,4-Trichlorobenzene		50.0	47.4	ug/L	1.18	5.20	20	
1,2,4-Trimethylbenzene		50.0	52.0	ug/L	2.92	3.92	20	
1,2-Dichloroethane		50.0	48.6	ug/L	0.322	2.90	20	
1,2-Dichlorobenzene		50.0	47.9	ug/L	1.60	4.11	20	
1,2-Dibromo-3-Chloropropane		50.0	46.5	ug/L	0.115	6.99	20	
1,2-Dibromoethane		50.0	46.0	ug/L	0.286	8.01	20	
1,3,5-Trimethylbenzene		50.0	51.7	ug/L	2.88	3.48	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.73	0.965	20	
1,3-Dichloropropane		50.0	48.2	ug/L	0.465	3.62	20	
1,4-Dichlorobenzene		50.0	49.3	ug/L	1.71	1.42	20	
1-Chlorohexane		50.0	53.2	ug/L	0.0903	6.31	20	
2,2-Dichloropropane		50.0	55.6	ug/L	0.416	11.2	20	
2-Hexanone		50.0	41.4	ug/L	0.132	17.1	20	
2-Chlorotoluene		50.0	51.2	ug/L	2.33	2.39	20	
4-Chlorotoluene		50.0	51.9	ug/L	2.36	3.73	20	
Acetone		50.0	38.7	ug/L	0.0389	22.6	20	*
Benzene		50.0	50.9	ug/L	1.08	1.88	20	
Bromobenzene		50.0	48.0	ug/L	0.944	3.98	20	
Bromochloromethane		50.0	49.6	ug/L	0.190	0.729	20	
Bromodichloromethane		50.0	50.5	ug/L	0.376	0.995	20	
Bromomethane		50.0	42.8	ug/L	0.205	14.4	20	
Carbon Disulfide		50.0	50.7	ug/L	0.840	1.35	20	
Carbon Tetrachloride		50.0	52.0	ug/L	0.405	3.94	20	
Chloroethane		50.0	49.9	ug/L	0.152	0.225	20	

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CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17041203 Run Date: 05/02/2017 Sample ID: WG612550-02

Instrument ID: HPMS17 Run Time: 18:50 Method: 8260B

File ID: 17M0273261 Analyst: ADC QC Key: AF40

Workgroup (AAB#): WG612551 Cal ID: HPMS17 - 26-APR-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	49.9	ug/L	0.297	0.142	20	
cis-1,3-Dichloropropene		50.0	53.3	ug/L	0.448	6.58	20	
Dibromochloromethane		50.0	47.7	ug/L	0.396	4.50	20	
Dibromomethane		50.0	48.1	ug/L	0.157	3.71	20	
Dichlorodifluoromethane		50.0	65.0	ug/L	0.386	29.9	20	*
Hexachlorobutadiene		50.0	45.2	ug/L	0.637	9.55	20	
Isopropylbenzene		50.0	50.8	ug/L	1.71	1.67	20	
Methylene Chloride		50.0	48.8	ug/L	0.286	2.33	20	
Methyl Tert Butyl Ether		50.0	46.7	ug/L	0.623	6.59	20	
2-Butanone		50.0	43.8	ug/L	0.0657	12.3	20	
4-Methyl-2-Pentanone		50.0	41.6	ug/L	0.0577	16.9	20	
n-Butylbenzene		50.0	55.1	ug/L	2.72	10.2	20	
n-Propylbenzene		50.0	53.1	ug/L	3.92	6.20	20	
m-,p-Xylene		100	104	ug/L	0.685	3.71	20	
Naphthalene		50.0	41.6	ug/L	2.01	16.8	20	
o-Xylene		50.0	50.2	ug/L	0.653	0.321	20	
p-Isopropyltoluene		50.0	52.3	ug/L	3.06	4.53	20	
sec-Butylbenzene		50.0	51.7	ug/L	3.55	3.41	20	
Styrene		50.0	52.6	ug/L	1.10	5.15	20	
Trichloroethene		50.0	48.0	ug/L	0.307	3.90	20	
tert-Butylbenzene		50.0	49.6	ug/L	0.552	0.853	20	
Tetrachloroethene		50.0	49.4	ug/L	0.442	1.12	20	
trans-1,2-Dichloroethene		50.0	51.1	ug/L	0.269	2.16	20	
trans-1,3-Dichloropropene		50.0	51.5	ug/L	0.368	2.96	20	
Trichlorofluoromethane		50.0	56.5	ug/L	0.467	13.0	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
PDF File ID: 5268580
Report generated 07/25/2017 13:52

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS6
Workgroup (AAB#): WG612085

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	244954	452398	643185
Upper Limit	NA	NA	489908	904796	1286370
Lower Limit	NA	NA	122477	226199	321593
L17041203-10	1.00	01	222167	443730	637857
L17041203-11	1.00	01	245426	482920	687945
L17041203-12	1.00	01	249055	478757	685500
WG612085-01	1.00	01	219610	443608	637103
WG612085-02	1.00	01	237863	456820	653347
WG612085-06	1.00	01	229857	463768	669445

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS11
Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08
CAL ID: HPMS11 - 24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	178101	320836	445066
Upper Limit	NA	NA	356202	641672	890132
Lower Limit	NA	NA	89051	160418	222533
L17041203-01	1.00	01	134758	254076	360515
L17041203-02	1.00	01	137096	251716	354518
L17041203-03	1.00	01	146333	257831	354235
L17041203-04	1.00	01	128117	247535	346529
L17041203-06	1.00	01	123608	239033	339848
L17041203-07	1.00	01	121718	235876	333603
L17041203-08	1.00	01	125801	240093	338916
WG612123-01	1.00	01	132987	250807	353206
WG612123-02	1.00	01	143146	255038	355789

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS17
Workgroup (AAB#): WG612142

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041203-05	1.00	01	123693	259116	353722
L17041203-09	1.00	01	124082	257677	349598
L17041203-13	1.00	01	125547	260372	351468
L17041203-14	1.00	01	120645	251472	343643
L17041203-15	1.00	01	117171	248001	336762
L17041203-16	1.00	01	122413	253521	347288
L17041203-17	1.00	01	121559	255944	348615
L17041203-18	1.00	01	123290	258262	350410
L17041203-19	1.00	01	121131	253433	342833
L17041203-20	1.00	01	135958	263476	353297
L17041203-21	1.00	01	133408	266204	357898
WG612142-01	1.00	01	124070	260834	354974
WG612142-02	1.00	01	135161	264980	358784

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number:L17041203
Instrument ID:HPMS17
Workgroup (AAB#):WG612250

ICAL CCV Number:WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix:WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041203-22	1.00	01	118977	252727	343443
L17041203-23	1.00	01	116205	244041	335782
L17041203-24	1.00	01	119833	252282	342216
L17041203-25	1.00	01	121436	256635	349373
L17041203-26	1.00	01	118500	255525	345772
L17041203-27	1.00	01	118857	252635	344572
L17041203-28	1.00	01	116684	249665	340443
L17041203-29	1.00	01	122473	255719	348107
L17041203-30	1.00	01	118229	247421	337187
L17041203-31	1.00	01	117457	246989	340513
L17041203-32	1.00	01	119169	254736	346876
L17041203-33	1.00	01	125329	257074	344631
L17041203-34	1.00	01	117680	250385	337541
L17041203-35	1.00	01	122785	256823	346189
L17041203-36	1.00	01	118432	250466	341651
L17041203-37	1.00	01	119106	251872	341895
L17041203-38	1.00	01	126900	257022	348469
L17041203-39	1.00	01	128652	258895	347854
L17041203-40	1.00	01	116371	246707	336311
WG612250-01	1.00	01	119647	252656	343255
WG612250-02	1.00	01	132028	263010	354875
WG612250-03	1.00	01	129780	258540	346601

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS11
Workgroup (AAB#): WG612295

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	178101	320836	445066
Upper Limit	NA	NA	356202	641672	890132
Lower Limit	NA	NA	89051	160418	222533
L17041203-46	1.00	01	123991	232461	327451
L17041203-48	1.00	01	123815	232049	327037
L17041203-49	1.00	01	132721	250763	353251
WG612295-01	1.00	01	124853	233920	336081
WG612295-02	1.00	01	134781	237167	330570

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS17
Workgroup (AAB#): WG612551

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	167026	317098	417906
Upper Limit	NA	NA	334052	634196	835812
Lower Limit	NA	NA	83513	158549	208953
L17041203-41	1.00	01	121139	252874	343382
L17041203-42	1.00	01	120157	253632	341628
L17041203-43	1.00	01	119345	252338	340985
L17041203-44	1.00	01	120326	254277	346649
L17041203-45	1.00	01	120752	256220	350518
L17041203-47	1.00	01	122419	252409	339756
WG612551-01	1.00	01	121175	252779	343909
WG612551-02	1.00	01	130450	255725	342483

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5269889
Report generated 05/09/2017 14:19

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS6
Workgroup (AAB#): WG612085

ICAL CCV Number: WG608938-08
CAL ID: HPMS6-05-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG608938-08	NA	NA	18.17	15.14	11.26
Upper Limit	NA	NA	18.67	15.64	11.76
Lower Limit	NA	NA	17.67	14.64	10.76
L17041203-10	1.00	01	18.16	15.13	11.25
L17041203-11	1.00	01	18.16	15.13	11.25
L17041203-12	1.00	01	18.16	15.13	11.25
WG612085-01	1.00	01	18.16	15.13	11.25
WG612085-02	1.00	01	18.16	15.13	11.25
WG612085-06	1.00	01	18.16	15.13	11.25

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5269894
Report generated: 05/09/2017 14:21

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203

Instrument ID: HPMS11

Workgroup (AAB#): WG612123

ICAL CCV Number: WG611320-08

CAL ID: HPMS11-24-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	16.96	14.14	10.53
Upper Limit	NA	NA	17.46	14.64	11.03
Lower Limit	NA	NA	16.46	13.64	10.03
L17041203-01	1.00	01	16.96	14.14	10.53
L17041203-02	1.00	01	16.96	14.14	10.53
L17041203-03	1.00	01	16.96	14.14	10.52
L17041203-04	1.00	01	16.96	14.14	10.52
L17041203-06	1.00	01	16.96	14.14	10.53
L17041203-07	1.00	01	16.96	14.14	10.53
L17041203-08	1.00	01	16.96	14.14	10.53
WG612123-01	1.00	01	16.96	14.14	10.53
WG612123-02	1.00	01	16.96	14.14	10.52

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5269894

Report generated: 05/09/2017 14:21

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS11
Workgroup (AAB#): WG612295

ICAL CCV Number: WG611320-08
CAL ID: HPMS11-24-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611320-08	NA	NA	16.96	14.14	10.53
Upper Limit	NA	NA	17.46	14.64	11.03
Lower Limit	NA	NA	16.46	13.64	10.03
L17041203-46	1.00	01	16.96	14.14	10.53
L17041203-48	1.00	01	16.96	14.15	10.53
L17041203-49	1.00	01	16.96	14.14	10.53
WG612295-01	1.00	01	16.96	14.14	10.53
WG612295-02	1.00	01	16.96	14.14	10.53

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5269894
Report generated: 05/09/2017 14:21

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS17
Workgroup (AAB#): WG612142

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041203-05	1.00	01	9.36	8.05	5.28
L17041203-09	1.00	01	9.36	8.05	5.27
L17041203-13	1.00	01	9.36	8.05	5.27
L17041203-14	1.00	01	9.36	8.05	5.27
L17041203-15	1.00	01	9.36	8.05	5.27
L17041203-16	1.00	01	9.36	8.05	5.27
L17041203-17	1.00	01	9.36	8.05	5.27
L17041203-18	1.00	01	9.36	8.05	5.27
L17041203-19	1.00	01	9.36	8.05	5.28
L17041203-20	1.00	01	9.36	8.05	5.27
L17041203-21	1.00	01	9.36	8.05	5.27
WG612142-01	1.00	01	9.36	8.05	5.27
WG612142-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5269894
Report generated: 05/09/2017 14:21

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203
Instrument ID: HPMS17
Workgroup (AAB#): WG612250

ICAL CCV Number: WG611454-08
CAL ID: HPMS17-26-APR-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041203-22	1.00	01	9.36	8.05	5.28
L17041203-23	1.00	01	9.36	8.05	5.27
L17041203-24	1.00	01	9.36	8.05	5.27
L17041203-25	1.00	01	9.36	8.05	5.27
L17041203-26	1.00	01	9.36	8.05	5.27
L17041203-27	1.00	01	9.36	8.05	5.27
L17041203-28	1.00	01	9.36	8.05	5.27
L17041203-29	1.00	01	9.36	8.05	5.27
L17041203-30	1.00	01	9.36	8.05	5.27
L17041203-31	1.00	01	9.36	8.05	5.27
L17041203-32	1.00	01	9.36	8.05	5.28
L17041203-33	1.00	01	9.36	8.05	5.27
L17041203-34	1.00	01	9.36	8.05	5.28
L17041203-35	1.00	01	9.36	8.05	5.27
L17041203-36	1.00	01	9.36	8.05	5.28
L17041203-37	1.00	01	9.36	8.05	5.28
L17041203-38	1.00	01	9.36	8.05	5.27
L17041203-39	1.00	01	9.36	8.05	5.27
L17041203-40	1.00	01	9.36	8.05	5.27
WG612250-01	1.00	01	9.36	8.05	5.27
WG612250-02	1.00	01	9.36	8.05	5.28
WG612250-03	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5269894
Report generated: 05/09/2017 14:21

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY

(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17041203

Instrument ID: HPMS17

Workgroup (AAB#): WG612551

ICAL CCV Number: WG611454-08

CAL ID: HPMS17-26-APR-17

Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG611454-08	NA	NA	9.363	8.051	5.271
Upper Limit	NA	NA	9.863	8.551	5.771
Lower Limit	NA	NA	8.863	7.551	4.771
L17041203-41	1.00	01	9.36	8.05	5.28
L17041203-42	1.00	01	9.36	8.05	5.27
L17041203-43	1.00	01	9.36	8.05	5.27
L17041203-44	1.00	01	9.36	8.05	5.27
L17041203-45	1.00	01	9.36	8.05	5.27
L17041203-47	1.00	01	9.36	8.05	5.27
WG612551-01	1.00	01	9.36	8.05	5.27
WG612551-02	1.00	01	9.36	8.05	5.27

IS-1 - 1,4-Dichlorobenzene-d4

IS-2 - Chlorobenzene-d5

IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008

PDF File ID: 5269894

Report generated: 05/09/2017 14:21

2.1.1.3 Sample Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17877.D Vial: 9
Acq On : 29 Apr 2017 22:49 Operator: TMB
Sample : L17041203-01 A RS 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

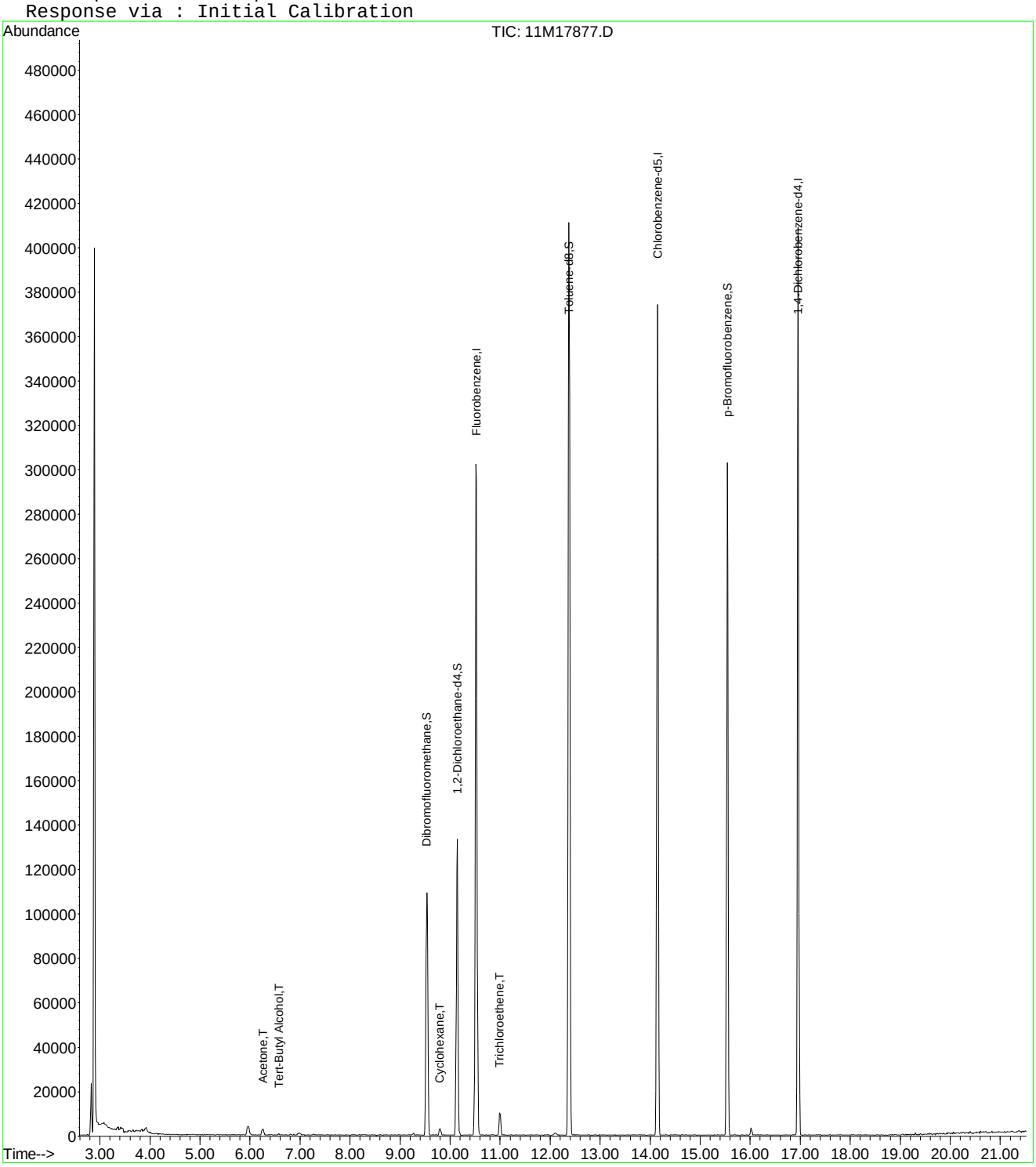
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	360515	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	254076	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	134758	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	89096	24.9500	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.80%			
43) 1,2-Dichloroethane-d4	10.14	65	108904	26.2798	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.12%			
57) Toluene-d8	12.38	98	348111	26.3864	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.56%			
78) p-Bromofluorobenzene	15.54	95	124222	26.5214	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.08%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	476	Below Cal		91
13) Acetone	6.26	43	5834	4.8398	ug/L	81
15) Tert-Butyl Alcohol	6.58	59	742	1.6457	ug/L #	60
33) Chloroform	9.25	83	1053	Below Cal		74
39) Cyclohexane	9.79	56	3041	0.3714	ug/L #	89
46) Trichloroethene	10.99	130	4992	1.2046	ug/L	95

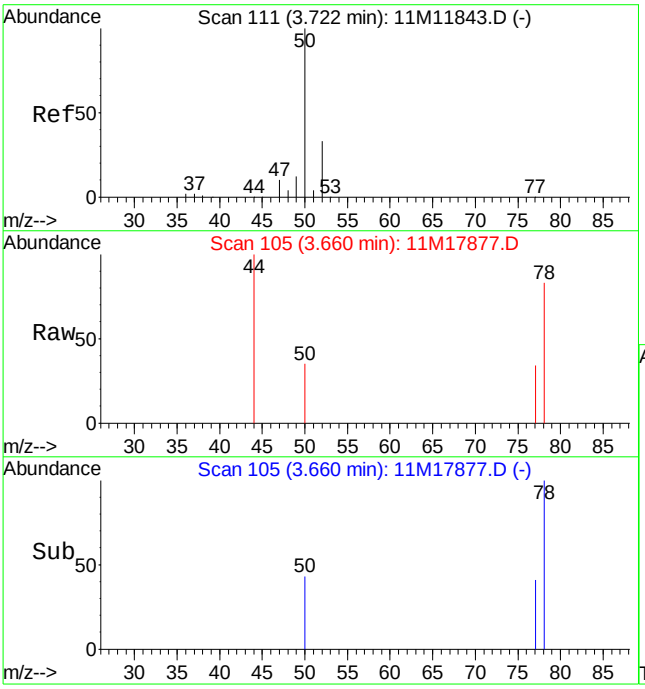
(#) = qualifier out of range (m) = manual integration
11M17877.D 8260WT.M Sun Apr 30 12:51:59 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17877.D Vial: 9
Acq On : 29 Apr 2017 22:49 Operator: TMB
Sample : L17041203-01 A RS 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

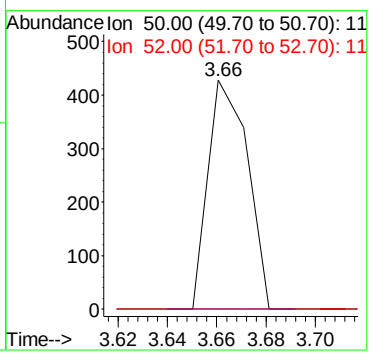


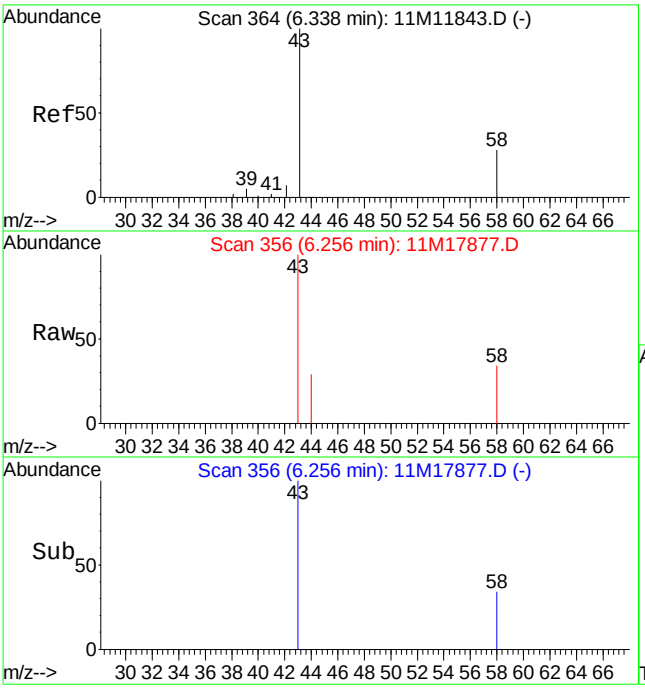


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17877.D
Acq: 29 Apr 2017 22:49

Tgt Ion: 50 Resp: 476

Ion	Ratio	Lower	Upper
50	100		
52	39.9	20.8	48.6

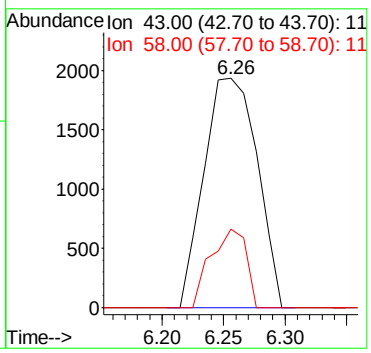


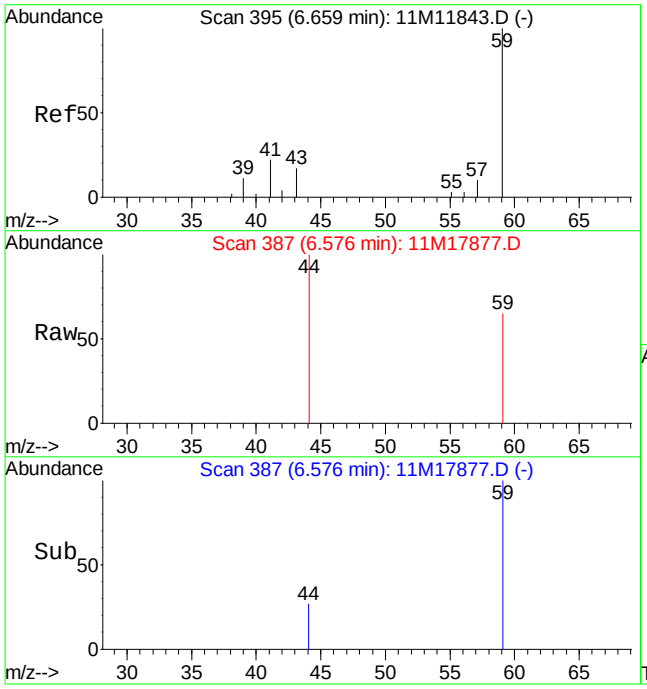


#13
Acetone
Concen: 4.84 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17877.D
Acq: 29 Apr 2017 22:49

Tgt Ion: 43 Resp: 5834

Ion	Ratio	Lower	Upper
43	100		
58	22.7	20.1	46.9

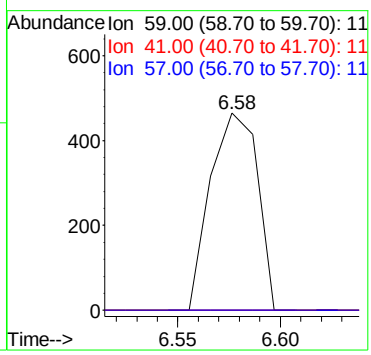


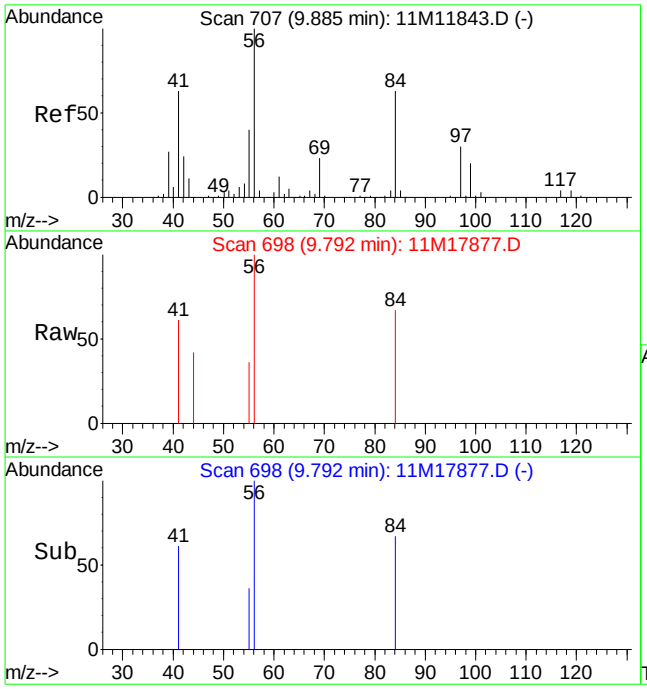


#15
Tert-Butyl Alcohol
Concen: 1.65 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17877.D
Acq: 29 Apr 2017 22:49

Tgt Ion: 59 Resp: 742

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

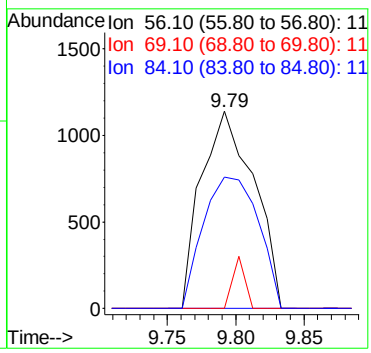


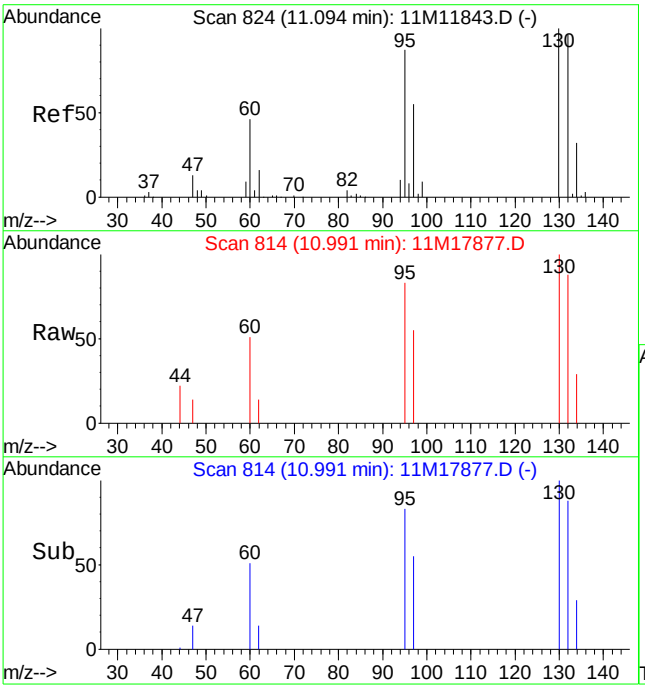


#39
Cyclohexane
Concen: 0.37 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17877.D
Acq: 29 Apr 2017 22:49

Tgt Ion: 56 Resp: 3041

Ion	Ratio	Lower	Upper
56	100		
69	6.2	15.3	35.7#
84	69.9	41.6	97.0

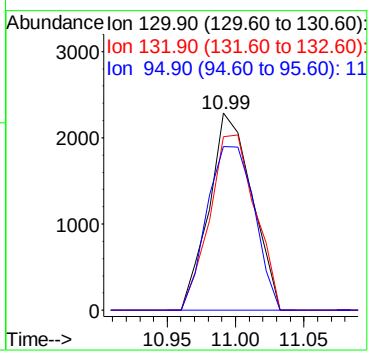




#46
Trichloroethene
Concen: 1.20 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.01 min
Lab File: 11M17877.D
Acq: 29 Apr 2017 22:49

Tgt Ion:130 Resp: 4992

Ion	Ratio	Lower	Upper
130	100		
132	94.1	58.2	135.8
95	91.4	59.0	137.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17873.D Vial: 5
Acq On : 29 Apr 2017 20:53 Operator: TMB
Sample : L17041203-02 B MS 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:15:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	354518	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	251716	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	137096	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	90651	25.8148	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.24%			
43) 1,2-Dichloroethane-d4	10.14	65	107127	26.2883	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.16%			
57) Toluene-d8	12.38	98	350239	26.7966	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.20%			
78) p-Bromofluorobenzene	15.54	95	131153	27.5237	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.08%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	90824	21.0064	ug/L	99
3) Chloromethane	3.66	50	76261	17.4295	ug/L	99
4) Vinyl Chloride	3.89	62	62976	20.6973	ug/L	99
5) 1,3-Butadiene	3.93	54	29921	16.4497	ug/L	94
6) Bromomethane	4.77	94	58063	18.4813	ug/L	99
7) Chloroethane	4.93	64	64526	20.4725	ug/L	98
8) Trichlorofluoromethane	5.41	101	103122	19.3993	ug/L	99
9) Diethyl ether	5.92	59	367206	93.3461	ug/L	95
10) Isoprene	5.96	67	92813	16.8534	ug/L	100
11) Acrolein	6.15	56	78853	126.0222	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	64064	20.3499	ug/L	98
13) Acetone	6.26	43	26837	22.6403	ug/L	98
14) 1,1-Dichloroethene	6.47	61	112726	17.8047	ug/L	100
15) Tert-Butyl Alcohol	6.58	59	85799	193.5182	ug/L	99
16) Dimethyl Sulfide	6.73	62	90454	18.1863	ug/L	95
17) Iodomethane	6.97	142	71947	17.3704	ug/L	100
18) Methyl acetate	6.99	43	67814	18.1389	ug/L	98
19) Methylene Chloride	7.23	84	75557	17.8863	ug/L	91
20) Carbon Disulfide	7.27	76	146294	13.5142	ug/L	98
21) Acrylonitrile	7.40	53	32664	18.6571	ug/L	99
22) Methyl Tert Butyl Ether	7.43	73	198080	18.7249	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	67492	17.5176	ug/L	94
24) n-Hexane	7.73	57	104926	17.5591	ug/L	97
25) Diisopropyl ether	8.07	45	1556959	101.0669	ug/L	98
26) Vinyl Acetate	8.23	43	153024	21.2795	ug/L	99
27) 1,1-Dichloroethane	8.26	63	150944	18.5875	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	1270112	93.2744	ug/L	98
29) 2-Butanone	8.79	43	37494	19.3579	ug/L	97
30) Propionitrile	8.89	54	62961	97.4409	ug/L	100
31) 2,2-Dichloropropane	9.01	77	100967	18.3681	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	78777	18.2210	ug/L	95
33) Chloroform	9.26	83	129606	19.9876	ug/L	99
34) 1-Bromopropane	9.39	122	18760	21.9237	ug/L	100
35) Bromochloromethane	9.48	130	49121	18.5299	ug/L	93
36) Tetrahydrofuran	9.50	42	136257	86.3673	ug/L	96
38) 1,1,1-Trichloroethane	9.76	97	109624	19.1444	ug/L	100
39) Cyclohexane	9.79	56	130441	16.2005	ug/L	97
40) 1,1-Dichloropropene	9.95	75	94043	18.7389	ug/L	97
41) Carbon Tetrachloride	10.09	117	92993	18.7764	ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	1055198	96.0594	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17873.D 8260WT.M Sat Apr 29 21:15:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17873.D Vial: 5
Acq On : 29 Apr 2017 20:53 Operator: TMB
Sample : L17041203-02 B MS 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:15:27 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

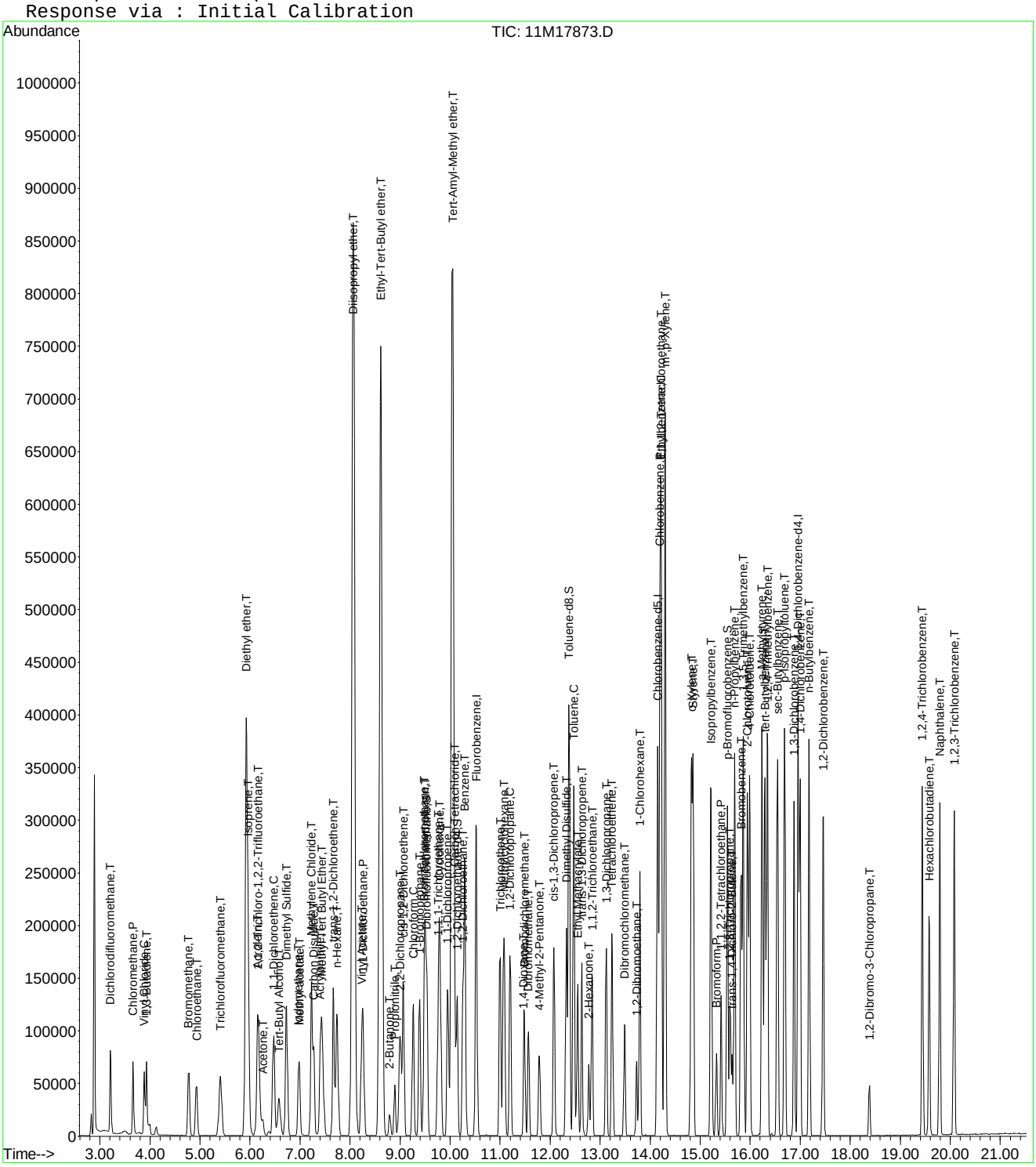
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	106190	19.1619	ug/L	99
45)	Benzene	10.29	78	289832	18.6417	ug/L	97
46)	Trichloroethene	11.00	130	74201	18.2074	ug/L	100
47)	Methylcyclohexane	11.07	83	109837	17.5791	ug/L	98
48)	1,2-Dichloropropane	11.20	63	90669	18.7378	ug/L	100
49)	1,4-Dioxane	11.47	88	8129	186.0331	ug/L	92
50)	Bromodichloromethane	11.49	83	94554	18.7298	ug/L	99
51)	Dibromomethane	11.56	93	43221	18.8824	ug/L	97
53)	4-Methyl-2-Pentanone	11.79	58	30597	17.9733	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	119482	19.9480	ug/L	100
55)	Dimethyl Disulfide	12.33	79	67443	18.0401	ug/L	93
58)	Toluene	12.47	91	304982	18.7138	ug/L	97
59)	Ethyl Methacrylate	12.55	69	93992	20.9844	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	100320	19.5004	ug/L	100
61)	1,1,2-Trichloroethane	12.84	97	64481	18.7561	ug/L	99
62)	2-Hexanone	12.77	43	60421	21.1546	ug/L	98
63)	1,3-Dichloropropane	13.12	76	113406	19.8616	ug/L	94
64)	Tetrachloroethene	13.23	164	62638	19.3622	ug/L	100
65)	Dibromochloromethane	13.48	129	71764	18.7239	ug/L	98
66)	1,2-Dibromoethane	13.73	107	60163	19.4672	ug/L	96
67)	1-Chlorohexane	13.79	91	93418	20.1145	ug/L	96
68)	Chlorobenzene	14.20	112	196372	18.9477	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	70633	18.3059	ug/L	98
70)	Ethylbenzene	14.22	106	107559	19.6256	ug/L	87
71)	m-,p-Xylene	14.30	106	259012	39.4979	ug/L	88
72)	o-Xylene	14.83	106	129832	19.6495	ug/L	94
73)	Styrene	14.86	104	213818	21.8333	ug/L	99
74)	Bromoform	15.32	173	50269	18.3036	ug/L	98
75)	Isopropylbenzene	15.22	105	315652	19.5825	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	87266	20.2476	ug/L	100
79)	1,2,3-Trichloropropane	15.59	110	24664	19.9850	ug/L	98
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22343	16.7437	ug/L	96
81)	n-Propylbenzene	15.69	91	378244	19.6848	ug/L	95
82)	Bromobenzene	15.82	156	92265	19.7309	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	272095	20.6987	ug/L	96
84)	2-Chlorotoluene	15.94	91	242658	18.6002	ug/L	86
85)	4-Chlorotoluene	15.99	91	236503	20.0853	ug/L	92
86)	a-Methylstyrene	16.23	118	153649	21.2072	ug/L	99
87)	tert-Butylbenzene	16.30	134	60081	18.7985	ug/L	91
88)	1,2,4-Trimethylbenzene	16.35	105	286825	20.8624	ug/L	95
89)	sec-Butylbenzene	16.54	105	338405	19.4919	ug/L	96
90)	p-Isopropyltoluene	16.69	119	299494	21.4686	ug/L	96
91)	1,3-Dichlorobenzene	16.87	146	168725	20.2841	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	174919	19.5530	ug/L	98
93)	n-Butylbenzene	17.17	91	275184	22.1165	ug/L	96
94)	1,2-Dichlorobenzene	17.46	146	173207	20.6356	ug/L	97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	14596	19.3013	ug/L	98
96)	1,2,4-Trichlorobenzene	19.44	180	131954	21.8972	ug/L	98
97)	Hexachlorobutadiene	19.58	225	64340	20.1312	ug/L	98
98)	Naphthalene	19.79	128	301145	22.4066	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	130343	21.1423	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17873.D 8260WT.M Sat Apr 29 21:15:28 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17873.D Vial: 5
Acq On : 29 Apr 2017 20:53 Operator: TMB
Sample : L17041203-02 B MS 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:15 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17874.D Vial: 6
Acq On : 29 Apr 2017 21:22 Operator: TMB
Sample : L17041203-03 B MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:44:26 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	354235	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	257831	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	146333	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	91756	26.1504	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.60%			
43) 1,2-Dichloroethane-d4	10.14	65	109221	26.8235	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.28%			
57) Toluene-d8	12.38	98	360888	26.9565	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.84%			
78) p-Bromofluorobenzene	15.54	95	129947	25.5492	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.20%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	88507	20.4919	ug/L	99
3) Chloromethane	3.66	50	76010	17.3841	ug/L	97
4) Vinyl Chloride	3.88	62	60744	19.9797	ug/L	98
5) 1,3-Butadiene	3.92	54	23655	12.7550	ug/L	93
6) Bromomethane	4.77	94	56185	17.8979	ug/L	100
7) Chloroethane	4.92	64	64189	20.3819	ug/L	99
8) Trichlorofluoromethane	5.40	101	100466	18.9147	ug/L	99
9) Diethyl ether	5.91	59	368066	93.6394	ug/L	96
10) Isoprene	5.96	67	91636	16.6529	ug/L	100
11) Acrolein	6.15	56	76965	123.1031	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	63311	20.1268	ug/L	97
13) Acetone	6.26	43	25694	21.6933	ug/L	91
14) 1,1-Dichloroethene	6.46	61	112889	17.8447	ug/L	99
15) Tert-Butyl Alcohol	6.58	59	86059	194.2597	ug/L	99
16) Dimethyl Sulfide	6.72	62	92125	18.5370	ug/L	98
17) Iodomethane	6.97	142	74796	18.0238	ug/L	99
18) Methyl acetate	6.98	43	68028	18.2107	ug/L	96
19) Methylene Chloride	7.23	84	77046	18.2534	ug/L	94
20) Carbon Disulfide	7.27	76	142932	13.2142	ug/L	99
21) Acrylonitrile	7.40	53	32776	18.7361	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	197548	18.6895	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	67875	17.6311	ug/L	96
24) n-Hexane	7.73	57	102155	17.1091	ug/L	98
25) Diisopropyl ether	8.06	45	1556857	101.1410	ug/L	98
26) Vinyl Acetate	8.23	43	150395	20.9306	ug/L	99
27) 1,1-Dichloroethane	8.26	63	152113	18.7464	ug/L	96
28) Ethyl-Tert-Butyl ether	8.61	59	1276247	93.7998	ug/L	98
29) 2-Butanone	8.79	43	36943	19.0887	ug/L	98
30) Propionitrile	8.89	54	61878	95.8413	ug/L	100
31) 2,2-Dichloropropane	9.00	77	99961	18.1996	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	80871	18.7202	ug/L	97
33) Chloroform	9.26	83	128413	19.8178	ug/L	100
34) 1-Bromopropane	9.39	122	18226	21.3266	ug/L	94
35) Bromochloromethane	9.48	130	49065	18.5236	ug/L	94
36) Tetrahydrofuran	9.50	42	134836	85.5349	ug/L	97
38) 1,1,1-Trichloroethane	9.76	97	110646	19.3383	ug/L	99
39) Cyclohexane	9.79	56	128165	15.9306	ug/L	98
40) 1,1-Dichloropropene	9.95	75	91730	18.2926	ug/L	97
41) Carbon Tetrachloride	10.09	117	91691	18.5283	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1063698	96.9105	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17874.D 8260WT.M Sat Apr 29 21:44:27 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17874.D Vial: 6
Acq On : 29 Apr 2017 21:22 Operator: TMB
Sample : L17041203-03 B MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:44:26 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

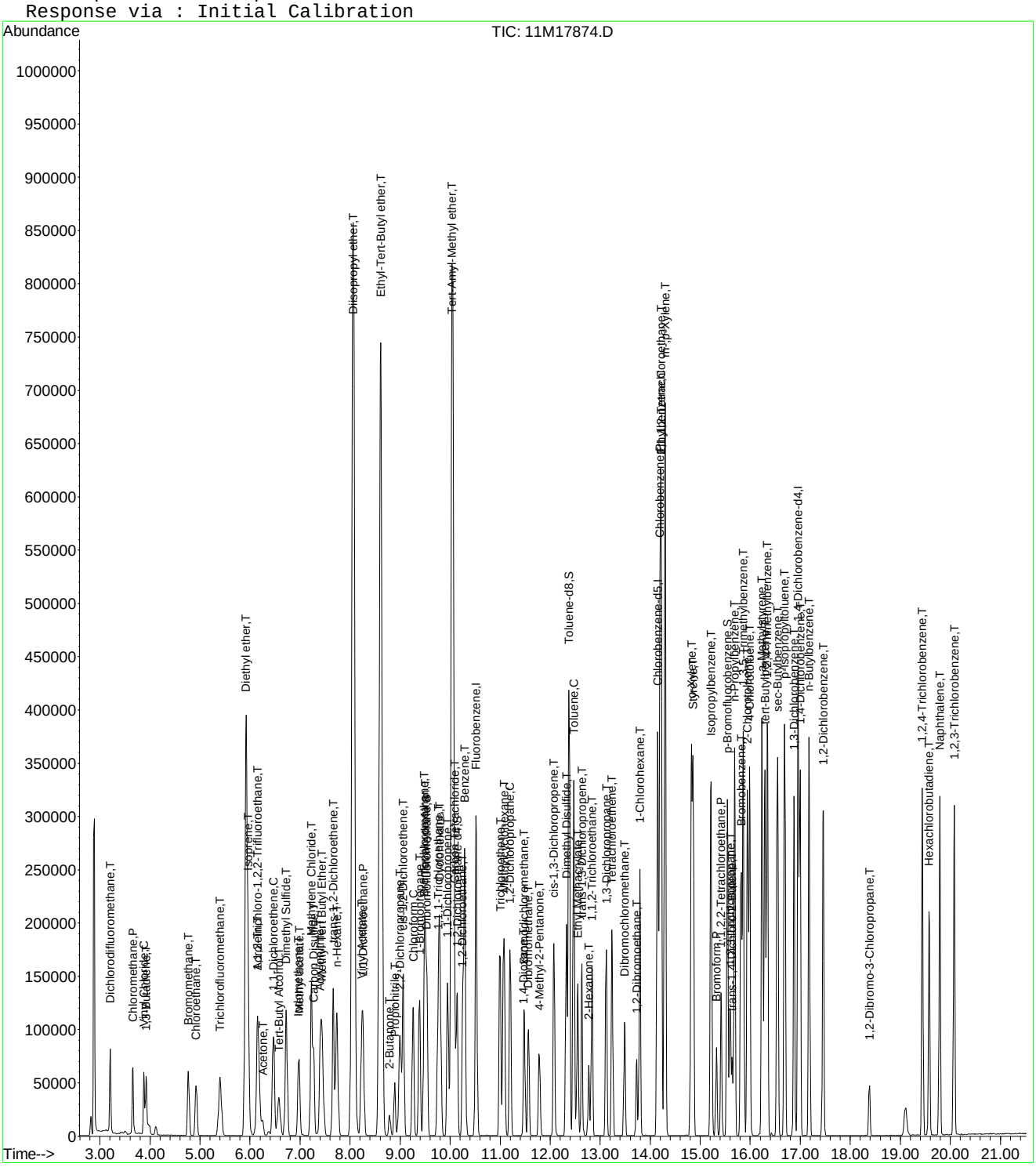
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	106060	19.1537 ug/L	99
45)	Benzene	10.29	78	293160	18.8708 ug/L	97
46)	Trichloroethene	11.00	130	74820	18.3739 ug/L	99
47)	Methylcyclohexane	11.07	83	109581	17.5521 ug/L	98
48)	1,2-Dichloropropane	11.20	63	91562	18.9374 ug/L	100
49)	1,4-Dioxane	11.47	88	8860	202.9241 ug/L	99
50)	Bromodichloromethane	11.48	83	94498	18.7337 ug/L	100
51)	Dibromomethane	11.56	93	44485	19.4501 ug/L	97
53)	4-Methyl-2-Pentanone	11.79	58	31009	18.2298 ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	123089	20.5666 ug/L	97
55)	Dimethyl Disulfide	12.32	79	67133	17.9716 ug/L	93
58)	Toluene	12.47	91	303814	18.2000 ug/L	96
59)	Ethyl Methacrylate	12.55	69	92942	20.2579 ug/L	98
60)	trans-1,3-Dichloropropene	12.64	75	100413	19.0555 ug/L	97
61)	1,1,2-Trichloroethane	12.83	97	64617	18.3499 ug/L	100
62)	2-Hexanone	12.77	43	59907	20.4772 ug/L	97
63)	1,3-Dichloropropane	13.12	76	112699	19.2696 ug/L	96
64)	Tetrachloroethene	13.23	164	62149	18.7554 ug/L	100
65)	Dibromochloromethane	13.48	129	73449	18.7090 ug/L	100
66)	1,2-Dibromoethane	13.73	107	59637	18.8393 ug/L	99
67)	1-Chlorohexane	13.79	91	93004	19.5504 ug/L	97
68)	Chlorobenzene	14.20	112	197715	18.6249 ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	71308	18.0425 ug/L	100
70)	Ethylbenzene	14.22	106	107232	19.1018 ug/L	85
71)	m-,p-Xylene	14.30	106	261332	38.9065 ug/L	88
72)	o-Xylene	14.83	106	129590	19.1477 ug/L	94
73)	Styrene	14.86	104	211656	21.1000 ug/L	99
74)	Bromoform	15.32	173	48807	17.3498 ug/L	100
75)	Isopropylbenzene	15.22	105	316773	19.1859 ug/L	95
77)	1,1,2,2-Tetrachloroethane	15.42	83	87433	19.0058 ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	24406	18.5277 ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	22574	15.8489 ug/L	98
81)	n-Propylbenzene	15.69	91	379265	18.4920 ug/L	96
82)	Bromobenzene	15.82	156	94614	18.9560 ug/L	100
83)	1,3,5-Trimethylbenzene	15.86	105	275932	19.6656 ug/L	95
84)	2-Chlorotoluene	15.94	91	239144	17.1737 ug/L	86
85)	4-Chlorotoluene	15.99	91	236493	18.8166 ug/L	91
86)	a-Methylstyrene	16.23	118	154645	19.9973 ug/L	99
87)	tert-Butylbenzene	16.30	134	59572	17.4626 ug/L	88
88)	1,2,4-Trimethylbenzene	16.34	105	287199	19.5710 ug/L	96
89)	sec-Butylbenzene	16.54	105	342649	18.4906 ug/L	96
90)	p-Isopropyltoluene	16.69	119	300606	20.1881 ug/L	96
91)	1,3-Dichlorobenzene	16.87	146	172459	19.4243 ug/L	97
92)	1,4-Dichlorobenzene	17.00	146	173523	18.1726 ug/L	99
93)	n-Butylbenzene	17.17	91	275123	20.7158 ug/L	96
94)	1,2-Dichlorobenzene	17.46	146	173248	19.3376 ug/L	97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	15264	18.9105 ug/L	92
96)	1,2,4-Trichlorobenzene	19.44	180	133665	20.7810 ug/L	98
97)	Hexachlorobutadiene	19.57	225	63015	18.4720 ug/L	98
98)	Naphthalene	19.79	128	301318	21.0043 ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	128705	19.5588 ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17874.D 8260WT.M Sat Apr 29 21:44:27 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17874.D Vial: 6
Acq On : 29 Apr 2017 21:22 Operator: TMB
Sample : L17041203-03 B MSD 826-SPE Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 21:44 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17881.D Vial: 13
Acq On : 30 Apr 2017 00:46 Operator: TMB
Sample : L17041203-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:07 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

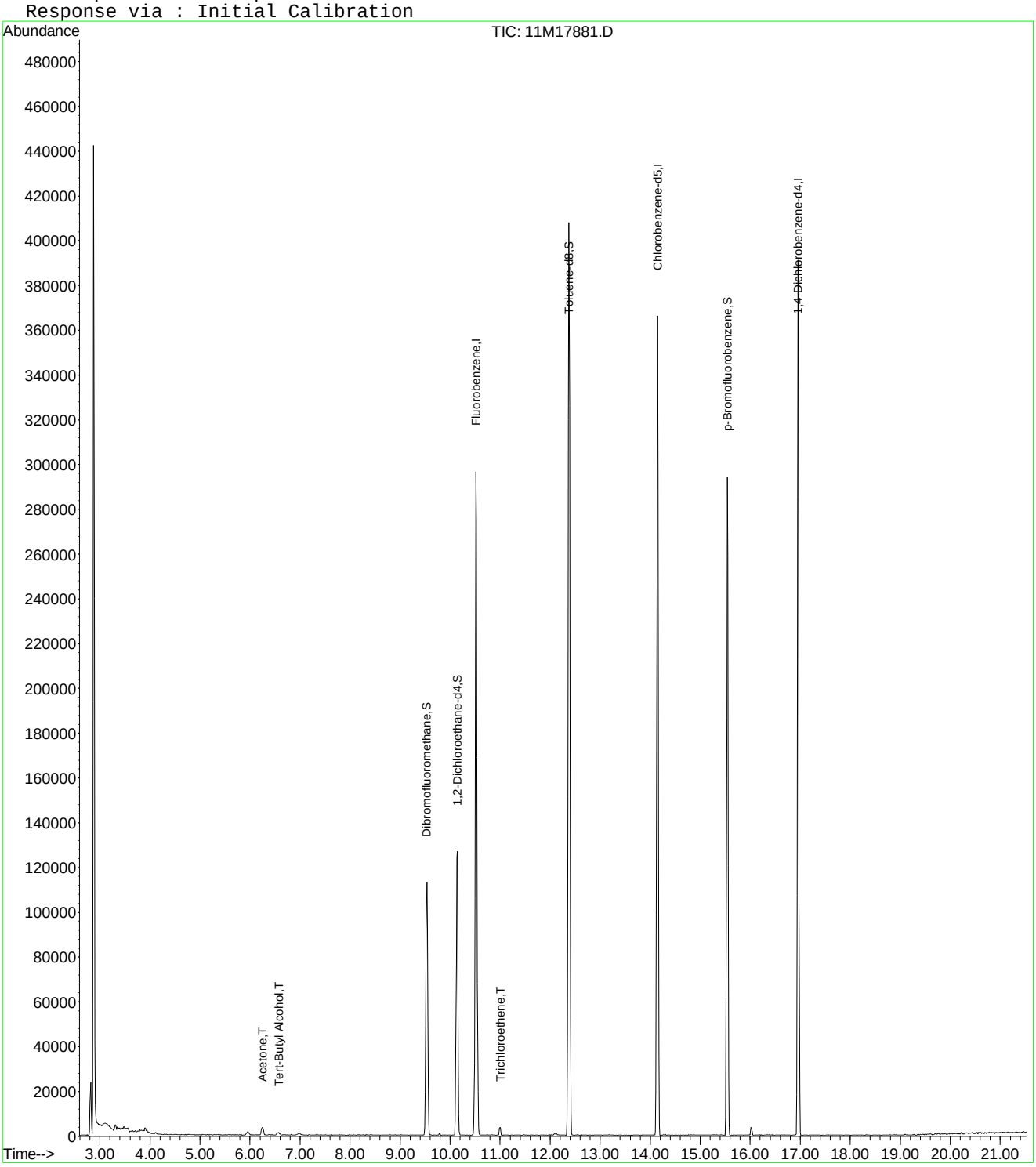
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	346529	25.00 ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	247535	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	128117	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	88964	25.9185 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.68%		
43) 1,2-Dichloroethane-d4	10.14	65	107659	27.0279 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.12%		
57) Toluene-d8	12.38	98	347019	26.9987 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.00%		
78) p-Bromofluorobenzene	15.54	95	122839	27.5856 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.36%		
Target Compounds					Qvalue
3) Chloromethane	3.65	50	412	Below Cal #	40
13) Acetone	6.25	43	7467	6.4445 ug/L	97
15) Tert-Butyl Alcohol	6.58	59	3705	8.5492 ug/L #	60
46) Trichloroethene	11.00	130	1505	0.3778 ug/L	90

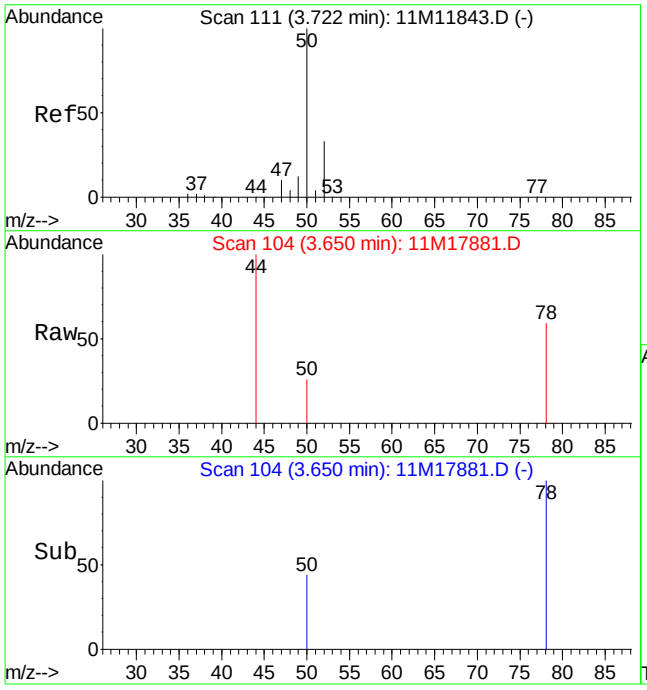
(#) = qualifier out of range (m) = manual integration
11M17881.D 8260WT.M Sun Apr 30 12:52:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17881.D Vial: 13
Acq On : 30 Apr 2017 00:46 Operator: TMB
Sample : L17041203-04 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

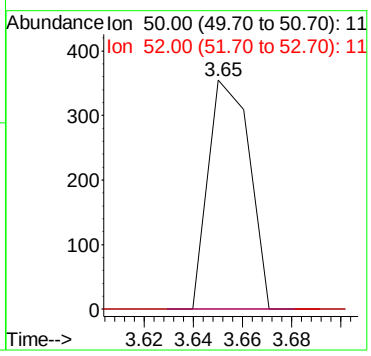


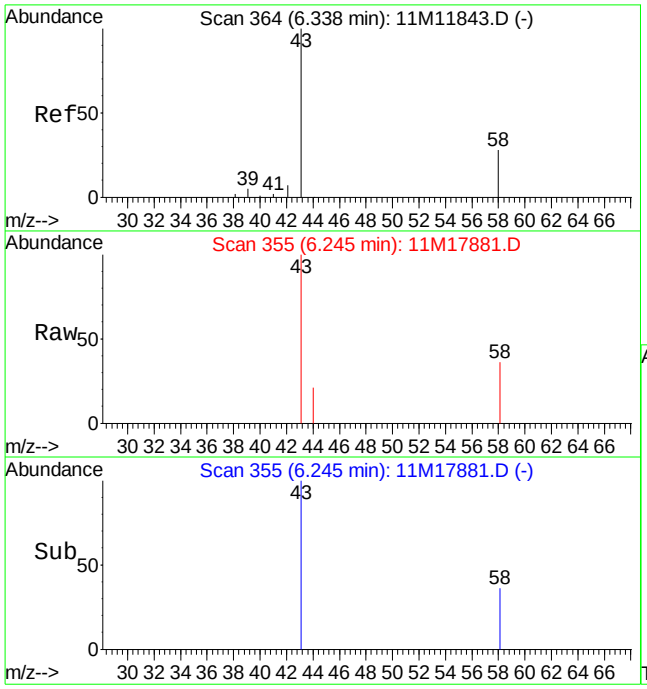


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17881.D
Acq: 30 Apr 2017 00:46

Tgt Ion: 50 Resp: 412

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

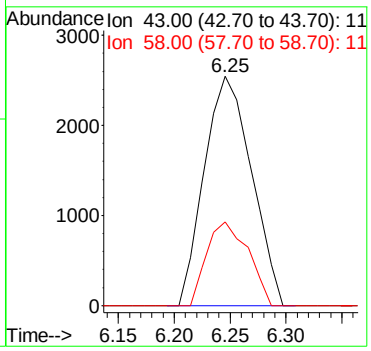


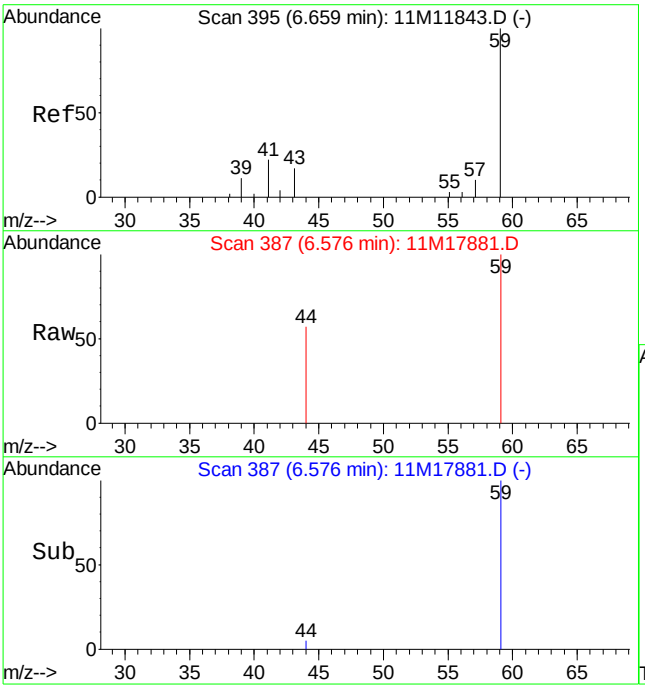


#13
Acetone
Concen: 6.44 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17881.D
Acq: 30 Apr 2017 00:46

Tgt Ion: 43 Resp: 7467

Ion	Ratio	Lower	Upper
43	100		
58	32.0	20.1	46.9

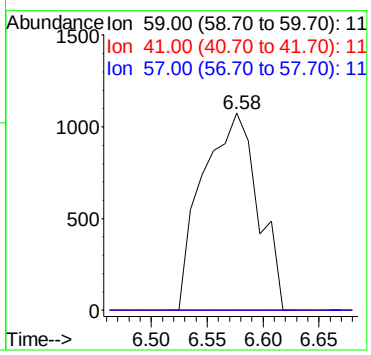


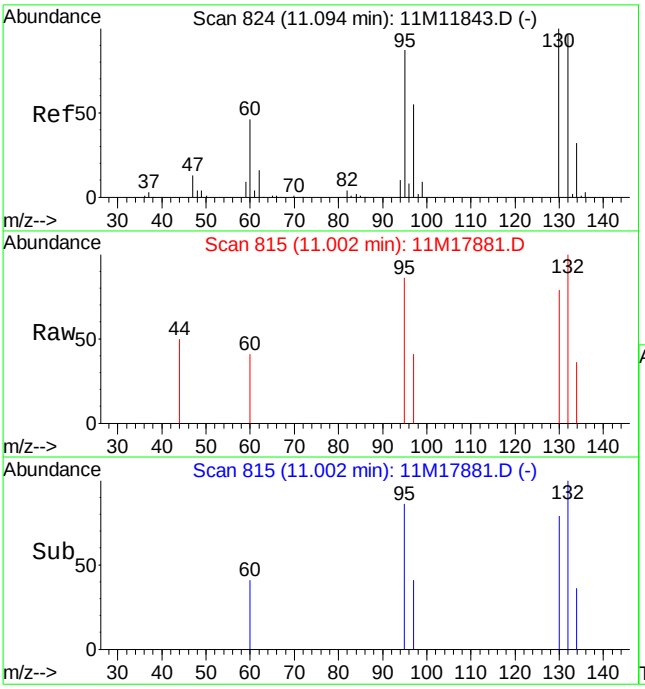


#15
Tert-Butyl Alcohol
Concen: 8.55 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17881.D
Acq: 30 Apr 2017 00:46

Tgt Ion: 59 Resp: 3705

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

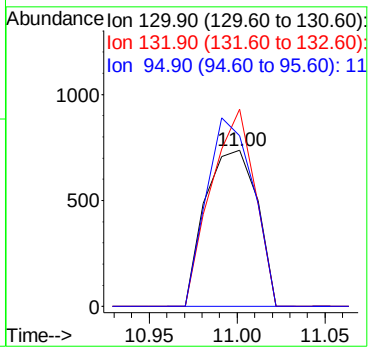




#46
Trichloroethene
Concen: 0.38 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17881.D
Acq: 30 Apr 2017 00:46

Tgt Ion:130 Resp: 1505

Ion	Ratio	Lower	Upper
130	100		
132	106.8	58.2	135.8
95	108.7	59.0	137.8



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273189.D Vial: 17
Acq On : 30 Apr 2017 20:53 Operator: ADC
Sample : L17041203-05 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:35 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

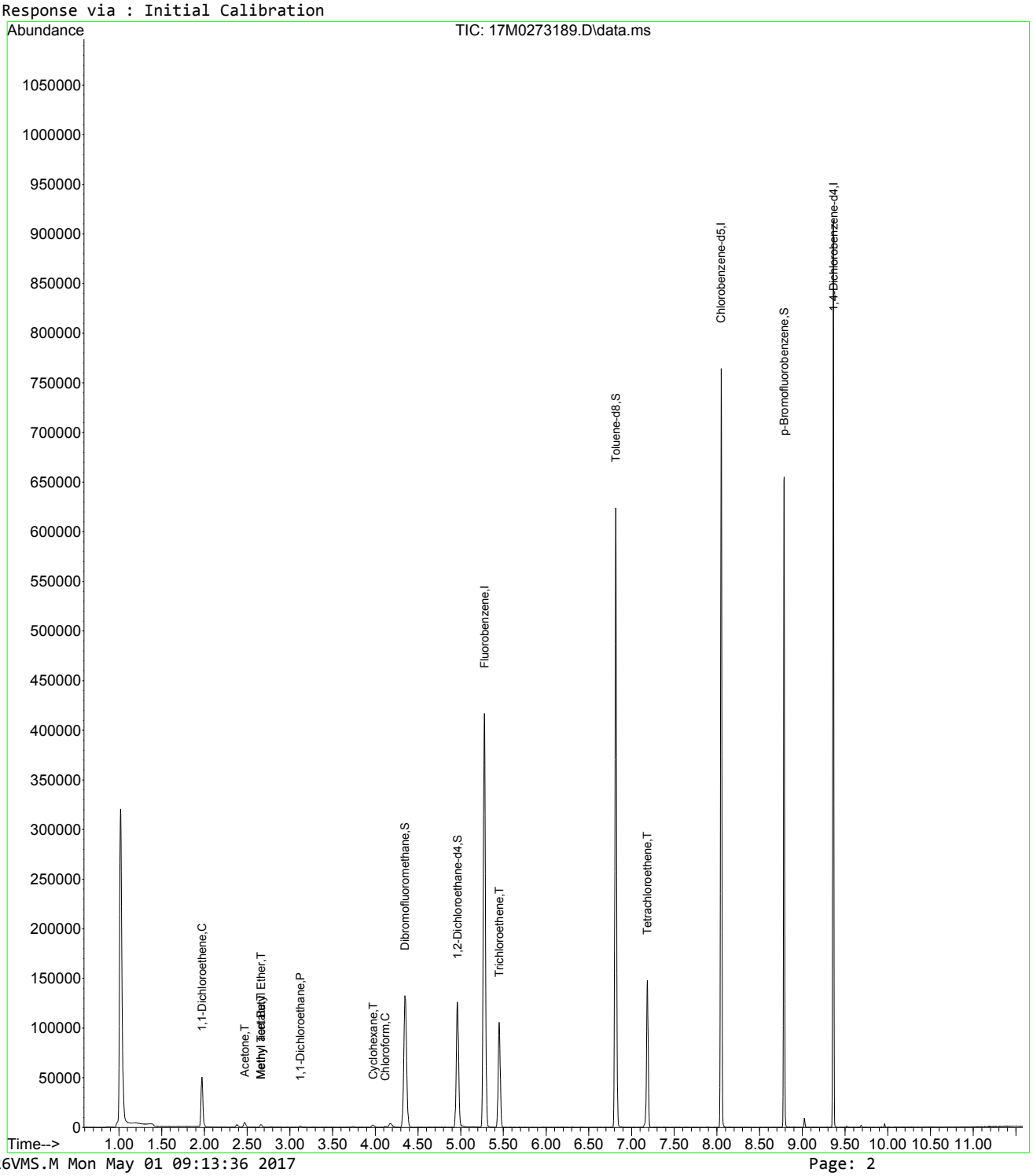
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	353722	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	259116	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	123693	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	94785	24.8120	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.248%			
34) 1,2-Dichloroethane-d4	4.965	65	91025	25.4212	ug/L	0.0115
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.685%			
47) Toluene-d8	6.815	98	327017	25.2883	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.153%			
66) p-Bromofluorobenzene	8.783	95	107496	25.9553	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.821%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.971	61	25815	4.7247	ug/L	97
16) Acetone	2.472	43	5561	7.8190	ug/L	96
18) Methyl acetate	2.660	43	525	0.2816	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	2749	0.2912	ug/L #	89
20) 1,1-Dichloroethane	3.123	63	1566	0.2344	ug/L	91
25) Cyclohexane	3.974	56	1523	0.2680	ug/L #	58
27) Chloroform	4.116	83	1143	0.1641	ug/L #	72
37) Trichloroethene	5.451	130	34099	7.5348	ug/L	97
49) Tetrachloroethene	7.185	166	35416	7.6434	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

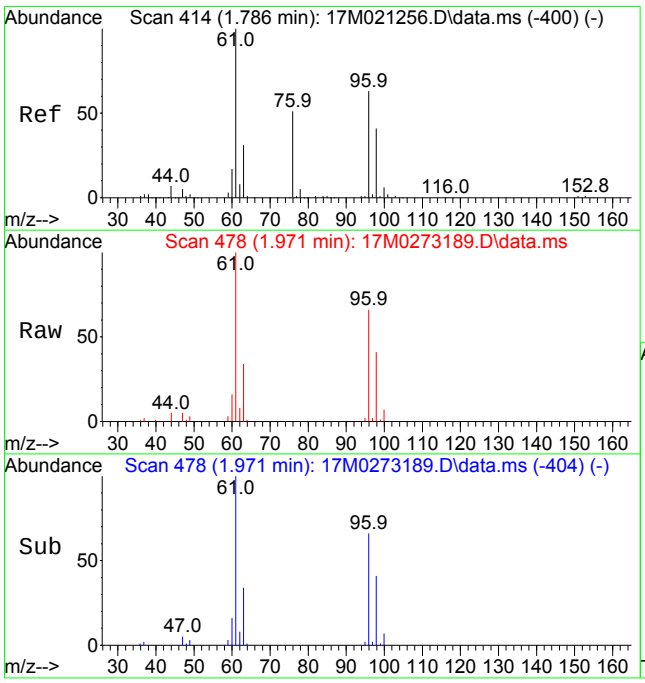
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273189.D Vial: 17
Acq On : 30 Apr 2017 20:53 Operator: ADC
Sample : L17041203-05 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:35 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



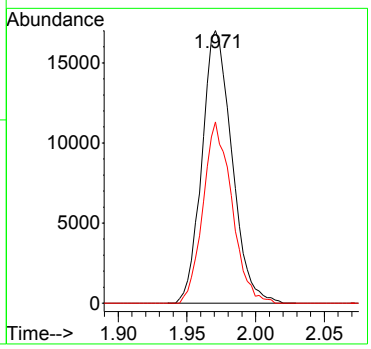
826VMS.M Mon May 01 09:13:36 2017 Page: 2

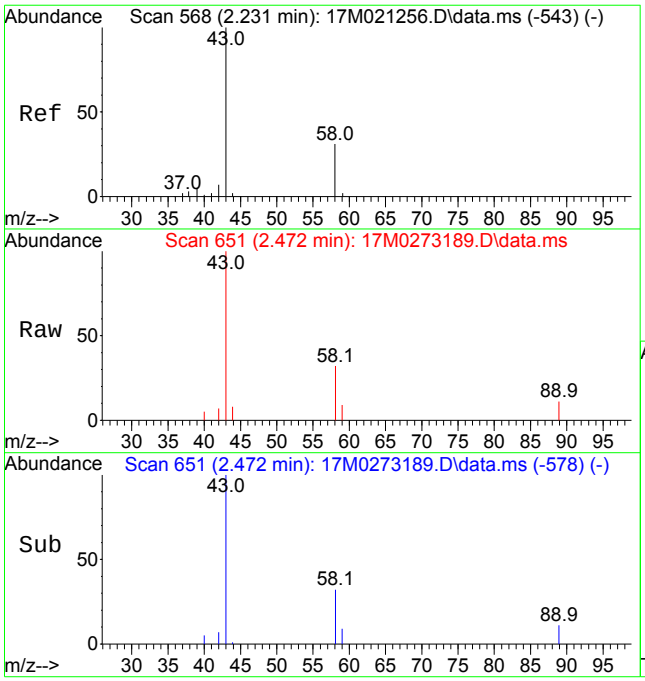


#10
1,1-Dichloroethene
Concen: 4.7247 ug/L
RT: 1.971 min Scan# 478
Delta R.T. 0.015 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 61 Resp: 25815

Ion	Ratio	Lower	Upper
61	100		
96	64.0	52.9	79.3

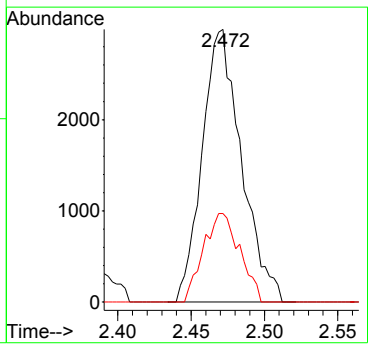


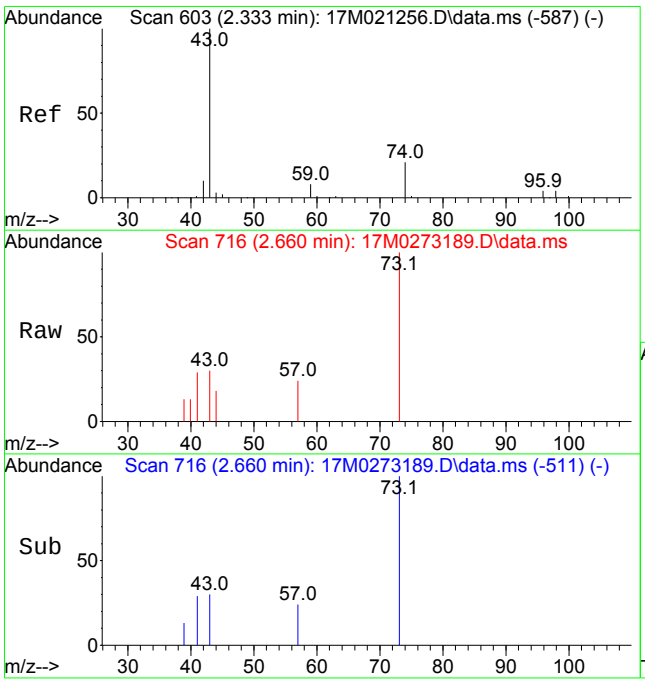


#16
Acetone
Concen: 7.8190 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 43 Resp: 5561

Ion	Ratio	Lower	Upper
43	100		
58	30.1	19.4	45.2

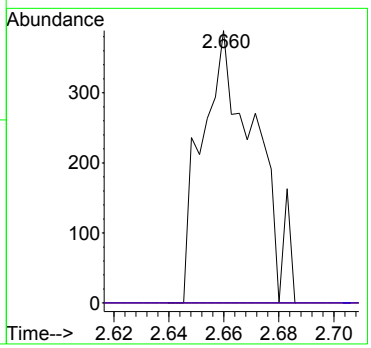


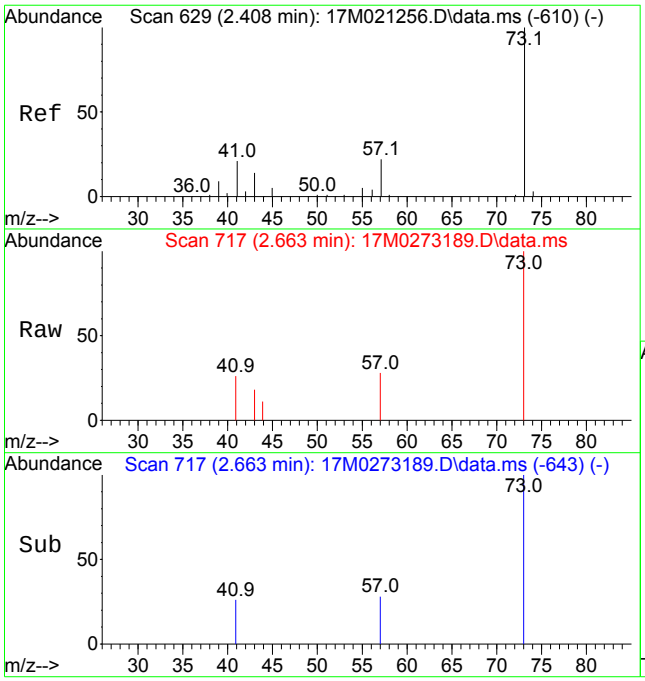


#18
Methyl acetate
Concen: 0.2816 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.093 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 43 Resp: 525

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

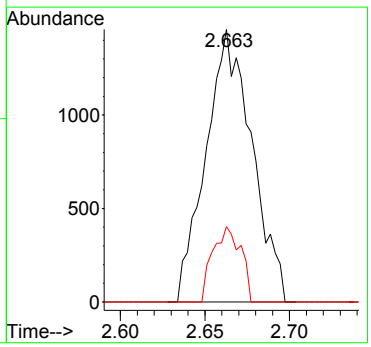


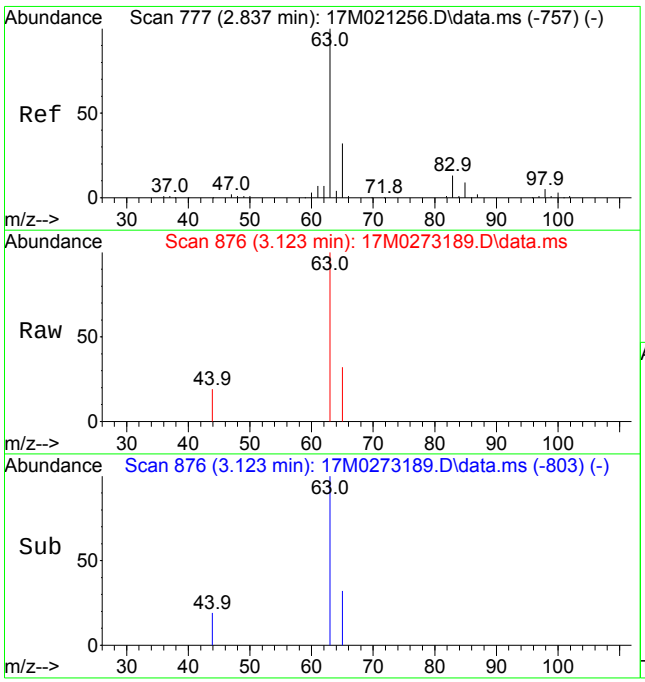


#19
Methyl Tert Butyl Ether
Concen: 0.2912 ug/L
RT: 2.663 min Scan# 717
Delta R.T. 0.015 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 73 Resp: 2749

Ion	Ratio	Lower	Upper
73	100		
57	16.8	17.6	26.4#

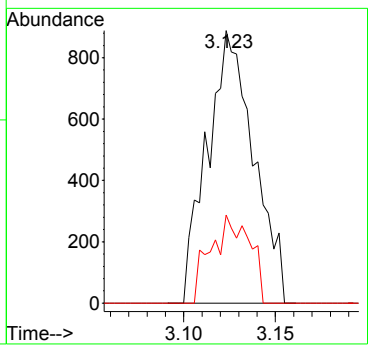


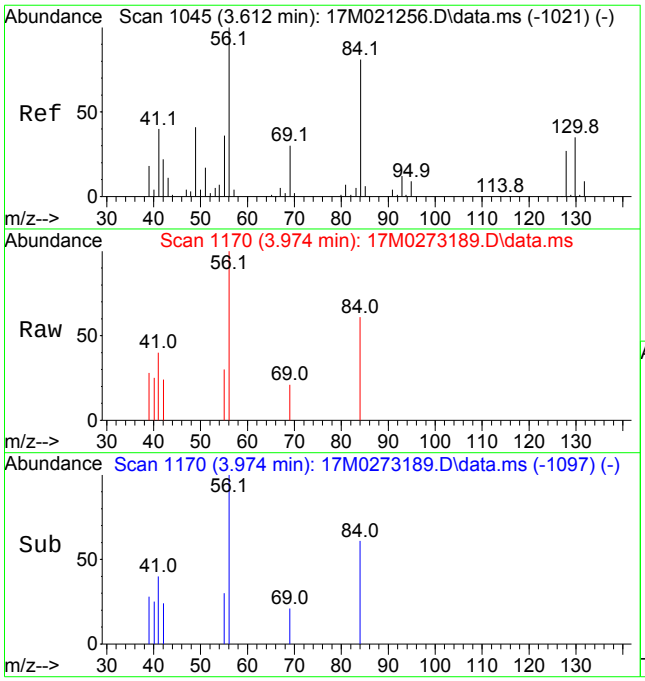


#20
1,1-Dichloroethane
Concen: 0.2344 ug/L
RT: 3.123 min Scan# 876
Delta R.T. 0.012 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 63 Resp: 1566

Ion	Ratio	Lower	Upper
63	100		
65	27.0	25.4	38.2

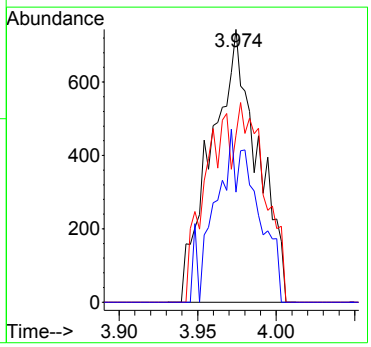


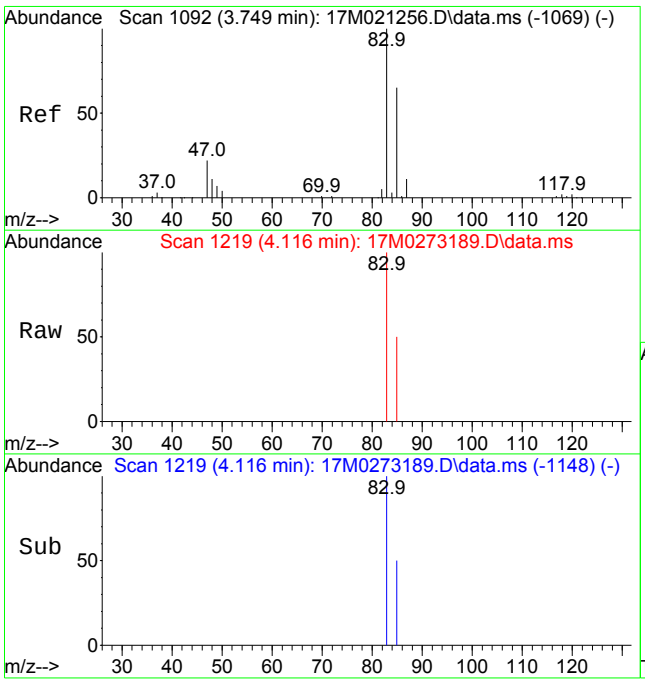


#25
Cyclohexane
Concen: 0.2680 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 56 Resp: 1523

Ion	Ratio	Lower	Upper
56	100		
84	40.8	69.4	104.0#
41	56.7	72.2	108.2#

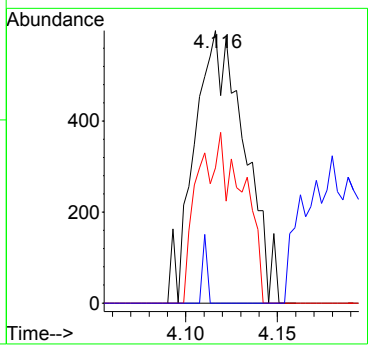


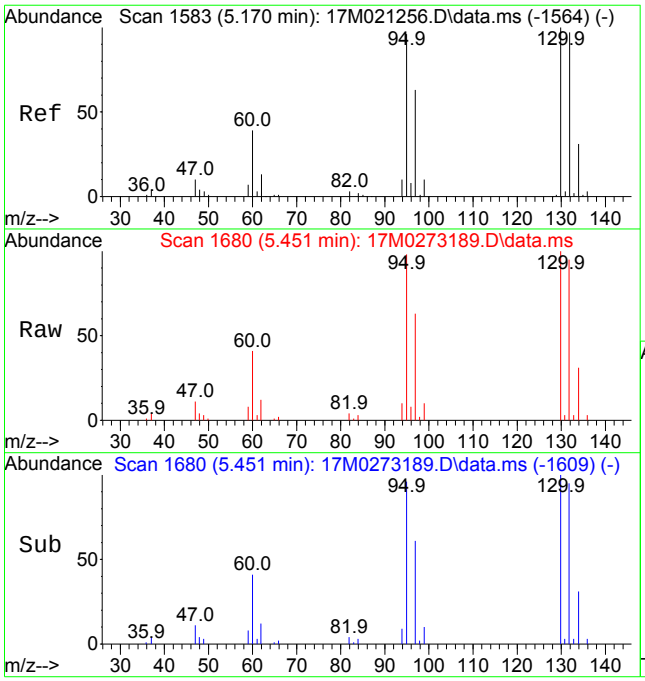


#27
Chloroform
Concen: 0.1641 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion: 83 Resp: 1143

Ion	Ratio	Lower	Upper
83	100		
85	55.6	39.2	91.4
47	58.0	12.9	30.1#

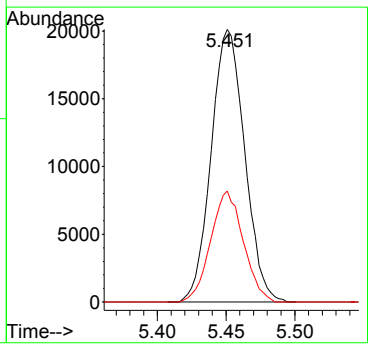


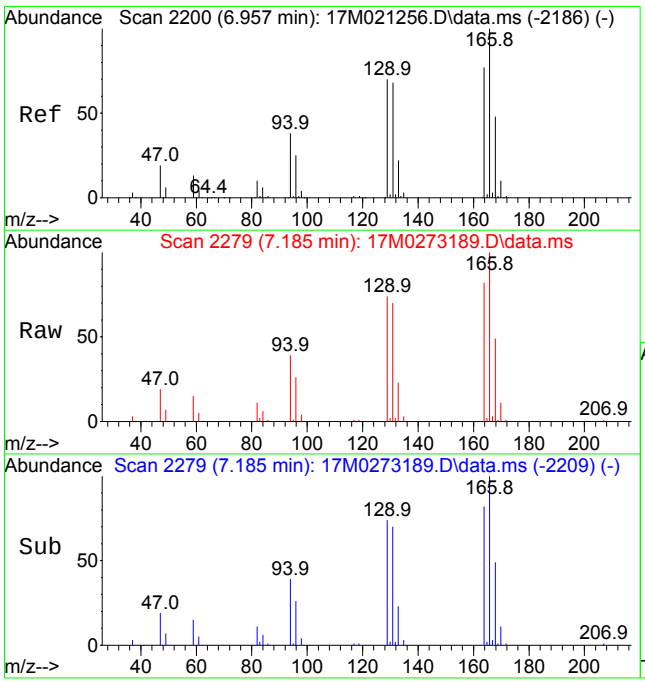


#37
Trichloroethene
Concen: 7.5348 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion:130 Resp: 34099

Ion	Ratio	Lower	Upper
130	100		
60	39.6	22.9	53.3

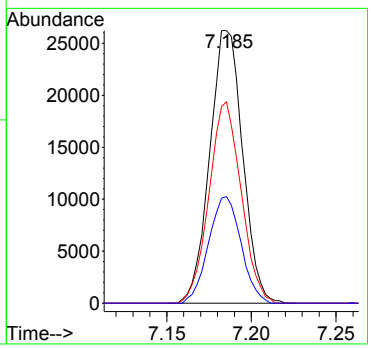




#49
Tetrachloroethene
Concen: 7.6434 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273189.D
Acq: 30 Apr 2017 20:53

Tgt Ion:166 Resp: 35416

Ion	Ratio	Lower	Upper
166	100		
129	71.9	56.2	84.4
94	38.5	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17889.D Vial: 21
Acq On : 30 Apr 2017 4:40 Operator: TMB
Sample : L17041203-06 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:26 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

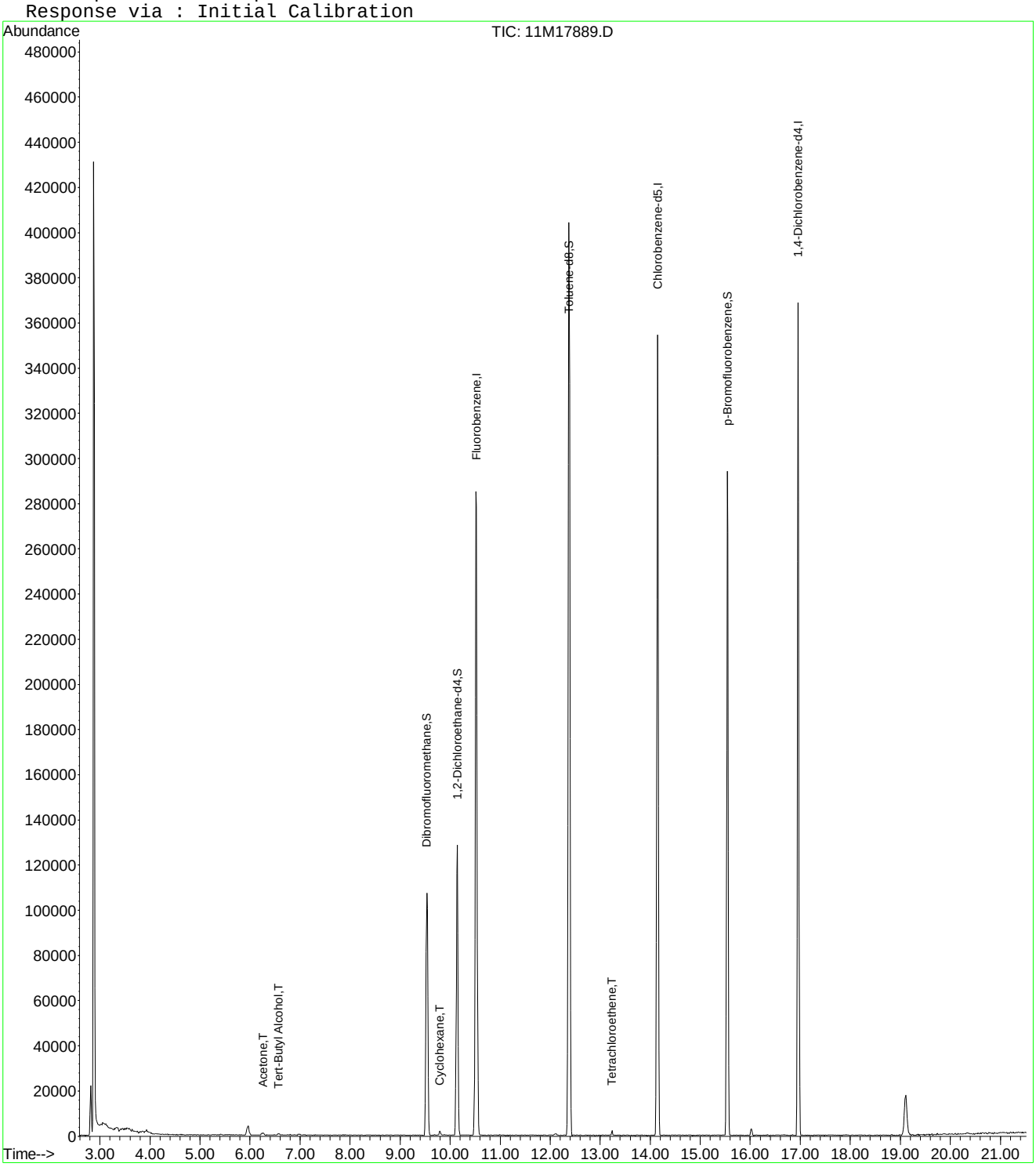
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	339848	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	239033	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	123608	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	87529	26.0017	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%			
43) 1,2-Dichloroethane-d4	10.14	65	104128	26.6553	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.64%			
57) Toluene-d8	12.38	98	341918	27.5480	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 110.20%#			
78) p-Bromofluorobenzene	15.54	95	121840	28.3593	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 113.44%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	626	Below Cal	#	40
13) Acetone	6.26	43	2560	2.2529	ug/L #	41
15) Tert-Butyl Alcohol	6.57	59	1248	2.9364	ug/L #	60
39) Cyclohexane	9.79	56	1972	0.2555	ug/L #	57
64) Tetrachloroethene	13.23	164	734	0.2389	ug/L	84

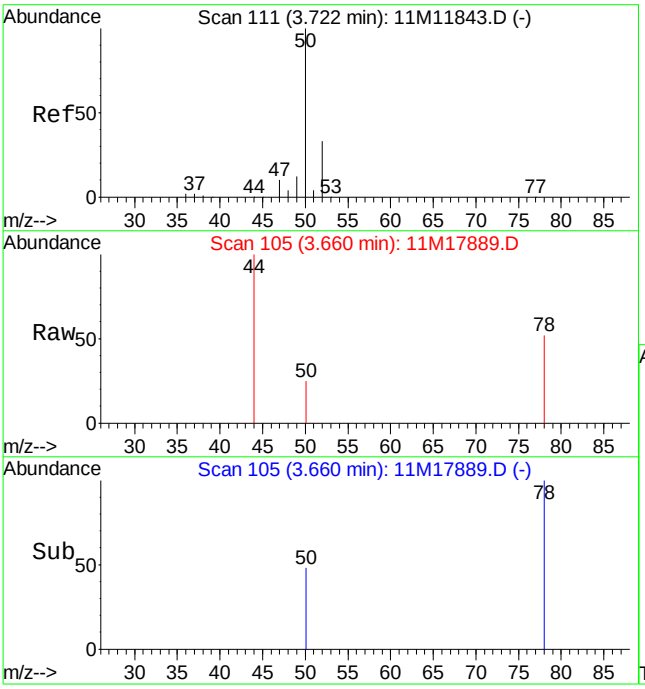
(#) = qualifier out of range (m) = manual integration
11M17889.D 8260WT.M Sun Apr 30 12:52:26 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17889.D Vial: 21
Acq On : 30 Apr 2017 4:40 Operator: TMB
Sample : L17041203-06 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

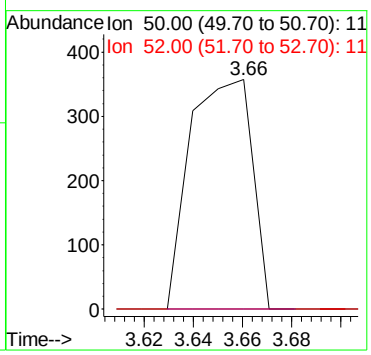


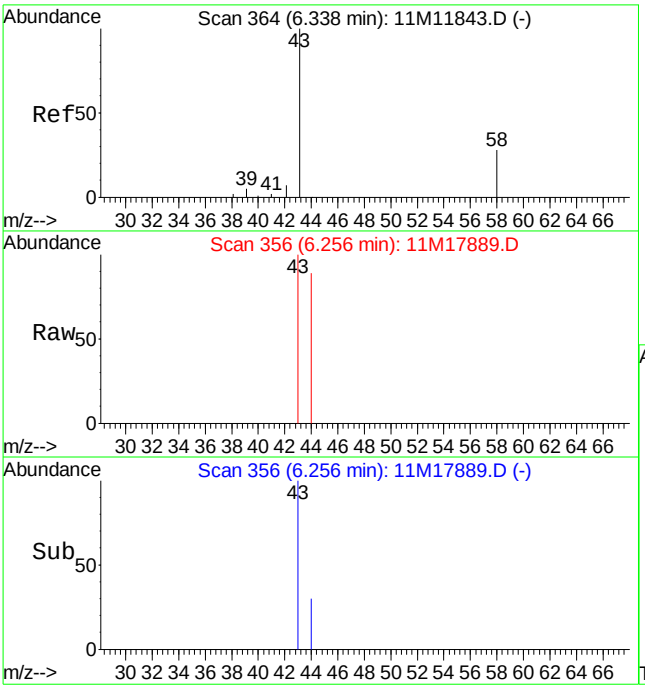


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17889.D
Acq: 30 Apr 2017 4:40

Tgt Ion: 50 Resp: 626

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

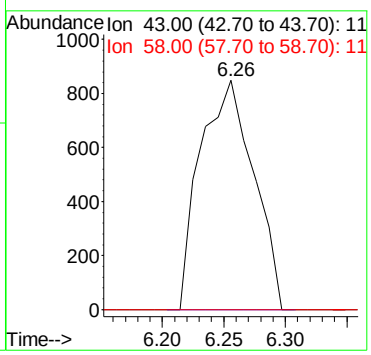


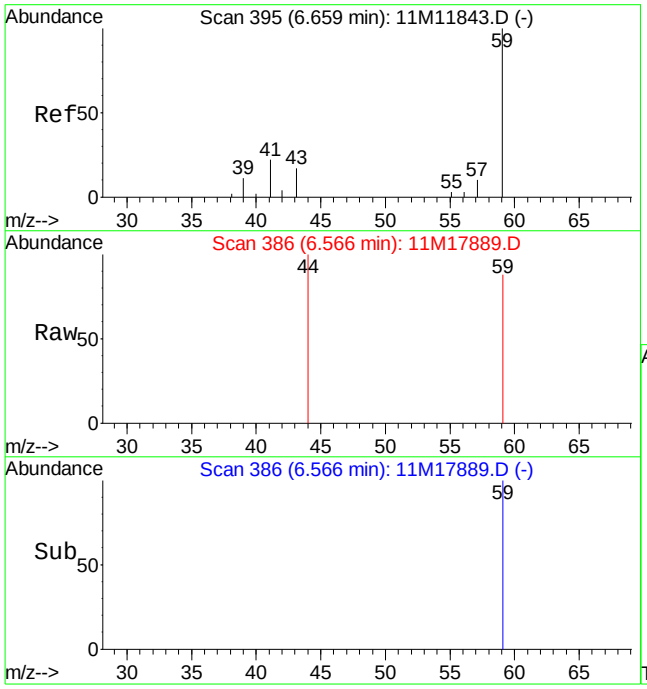


#13
Acetone
Concen: 2.25 ug/L
RT: 6.26 min Scan# 356
Delta R.T. -0.00 min
Lab File: 11M17889.D
Acq: 30 Apr 2017 4:40

Tgt Ion: 43 Resp: 2560

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

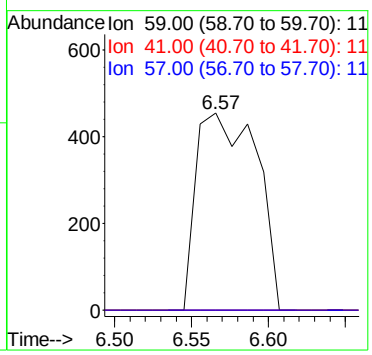


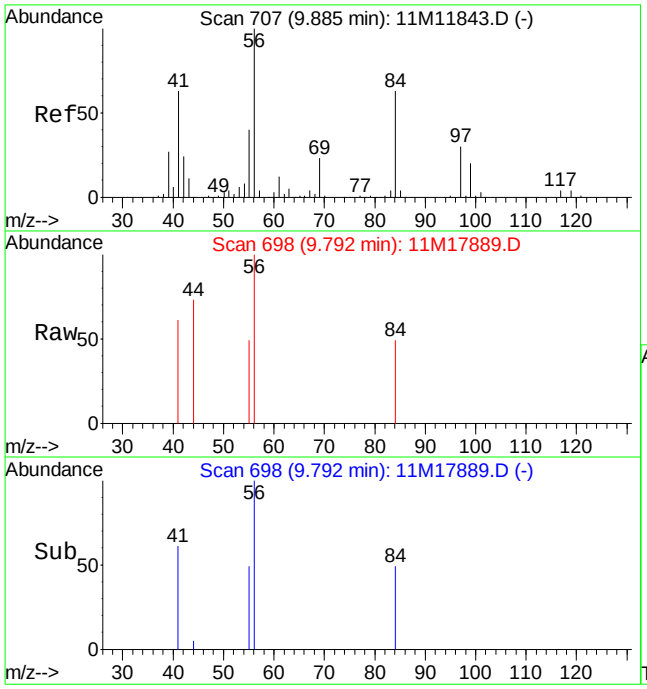


#15
Tert-Butyl Alcohol
Concen: 2.94 ug/L
RT: 6.57 min Scan# 386
Delta R.T. -0.00 min
Lab File: 11M17889.D
Acq: 30 Apr 2017 4:40

Tgt Ion: 59 Resp: 1248

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

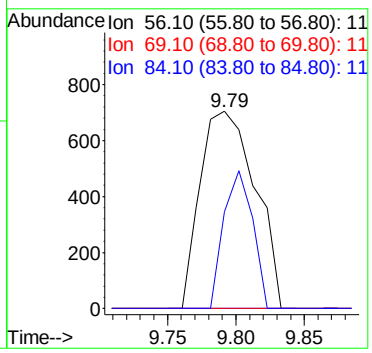


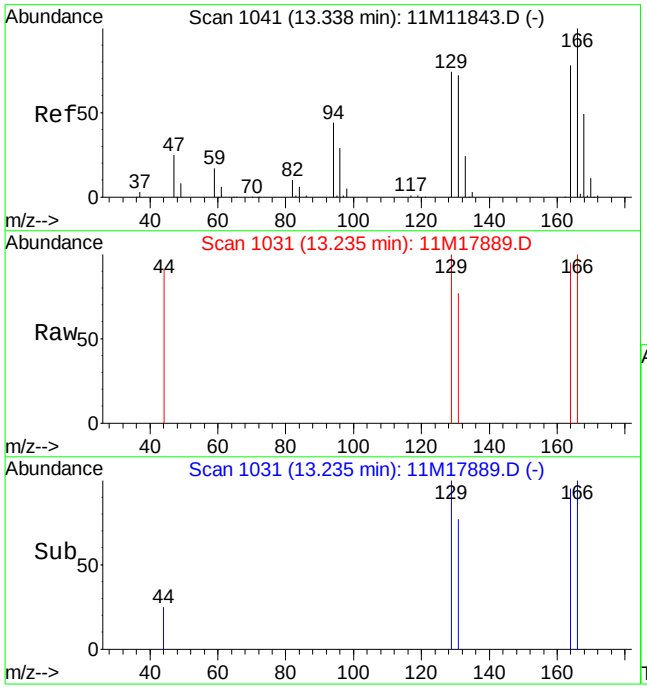


#39
Cyclohexane
Concen: 0.26 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17889.D
Acq: 30 Apr 2017 4:40

Tgt Ion: 56 Resp: 1972

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	36.5	41.6	97.0#

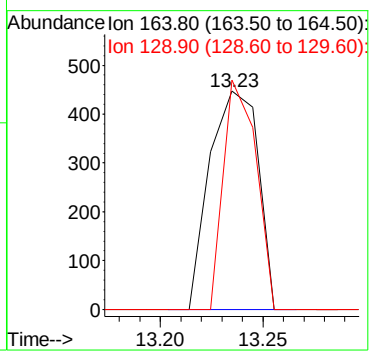




#64
Tetrachloroethene
Concen: 0.24 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. -0.00 min
Lab File: 11M17889.D
Acq: 30 Apr 2017 4:40

Tgt Ion:164 Resp: 734

Ion	Ratio	Lower	Upper
164	100		
129	71.3	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17890.D Vial: 22
Acq On : 30 Apr 2017 5:10 Operator: TMB
Sample : L17041203-07 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:28 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

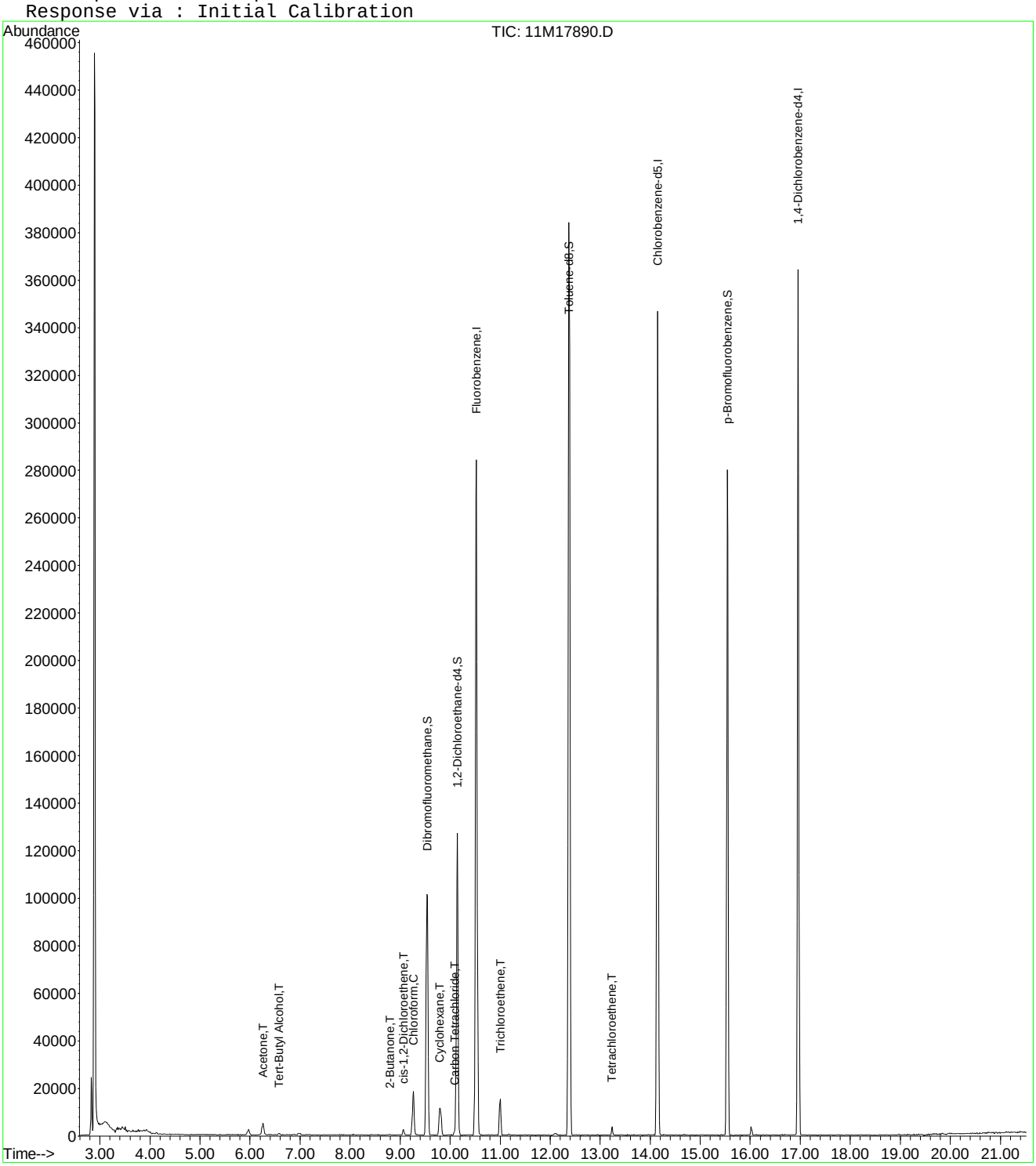
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	333603	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	235876	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	121718	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.54	111	86802	26.2685 ug/L	0.01
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.08%		
43) 1,2-Dichloroethane-d4	10.14	65	102369	26.6956 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.80%		
57) Toluene-d8	12.38	98	331089	27.0326 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 108.12%		
78) p-Bromofluorobenzene	15.54	95	116721	27.5897 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.36%		
Target Compounds					Qvalue
3) Chloromethane	3.66	50	193	Below Cal #	40
13) Acetone	6.26	43	9987	8.9535 ug/L	92
15) Tert-Butyl Alcohol	6.58	59	1639	3.9285 ug/L #	60
29) 2-Butanone	8.80	43	430	0.2359 ug/L #	56
32) cis-1,2-Dichloroethene	9.07	96	1295	0.3183 ug/L	97
33) Chloroform	9.26	83	19021	2.9537 ug/L	94
39) Cyclohexane	9.79	56	10968	1.4476 ug/L	96
41) Carbon Tetrachloride	10.09	117	1792	0.3845 ug/L #	91
46) Trichloroethene	11.00	130	6742	1.7581 ug/L	96
64) Tetrachloroethene	13.23	164	1131	0.3731 ug/L	78

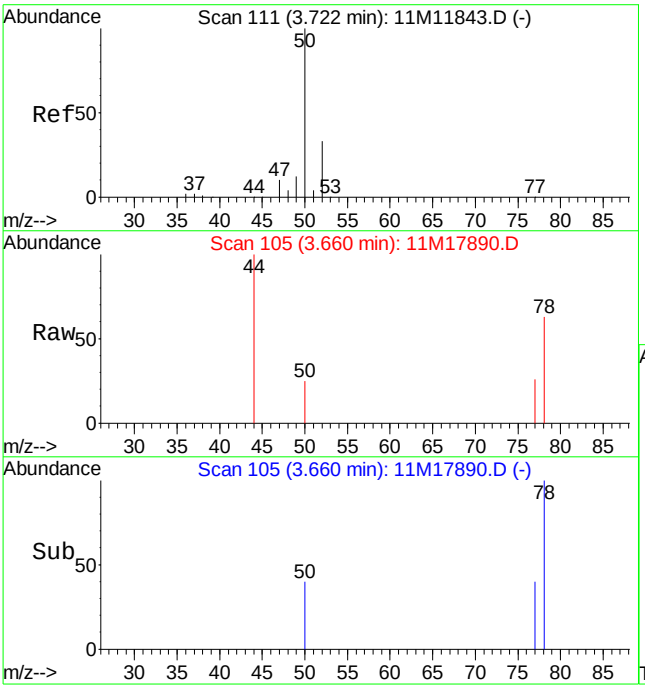
(#) = qualifier out of range (m) = manual integration
11M17890.D 8260WT.M Sun Apr 30 12:52:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17890.D Vial: 22
Acq On : 30 Apr 2017 5:10 Operator: TMB
Sample : L17041203-07 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

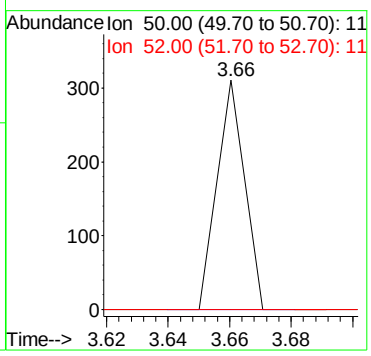


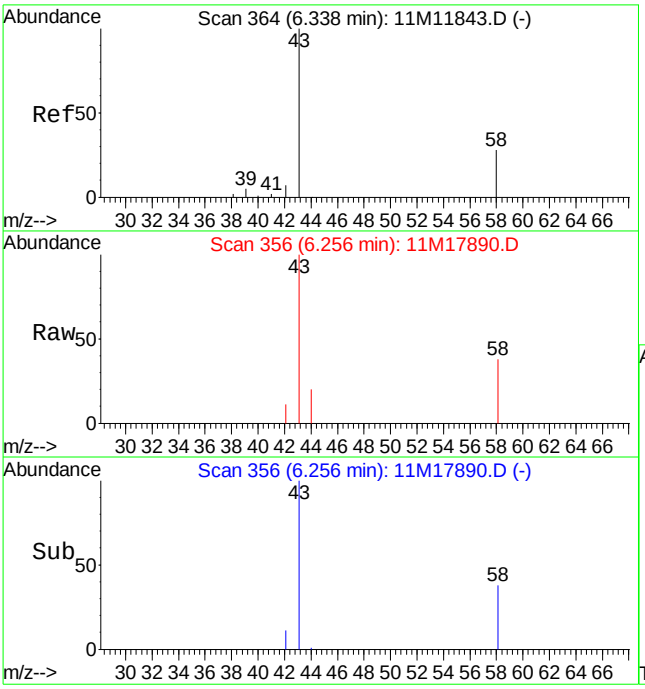


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 50 Resp: 193

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

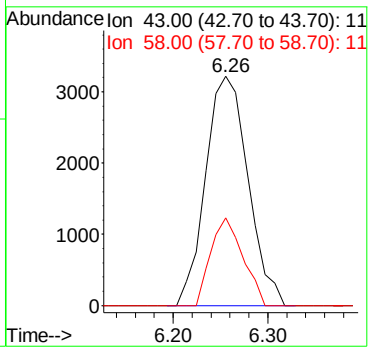


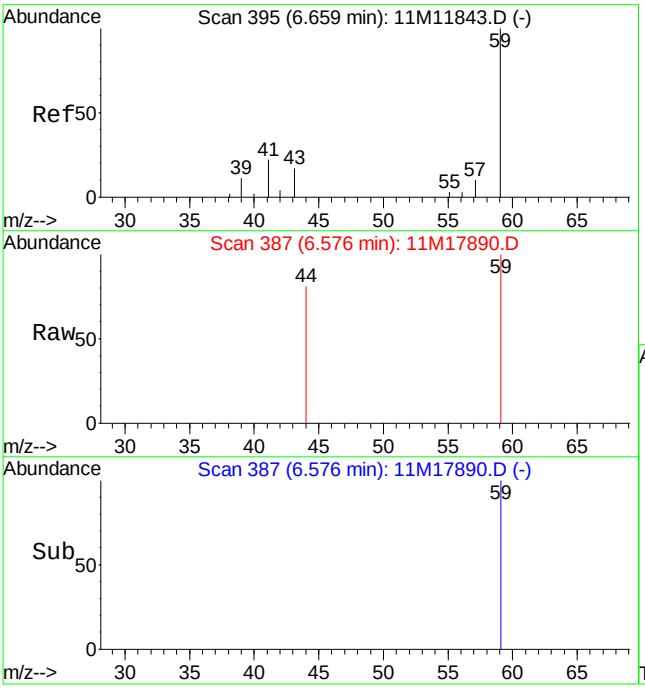


#13
Acetone
Concen: 8.95 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 43 Resp: 9987

Ion	Ratio	Lower	Upper
43	100		
58	28.9	20.1	46.9

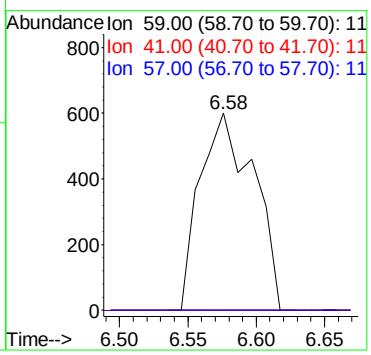


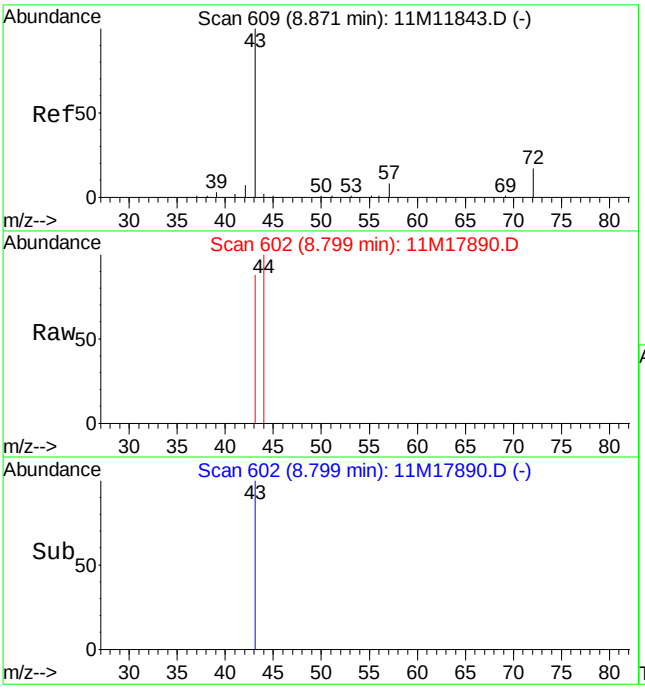


#15
Tert-Butyl Alcohol
Concen: 3.93 ug/L
RT: 6.58 min Scan# 387
Delta R.T. 0.01 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 59 Resp: 1639

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

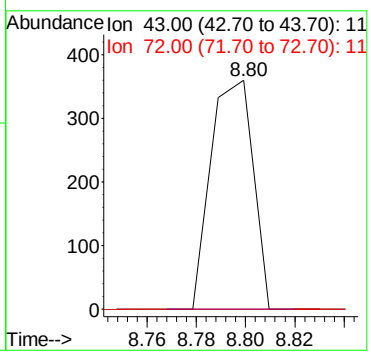


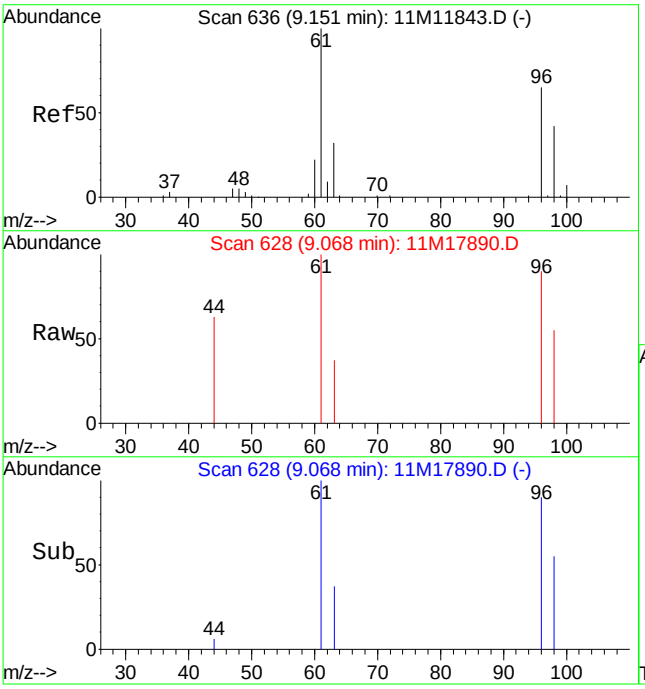


#29
2-Butanone
Concen: 0.24 ug/L
RT: 8.80 min Scan# 602
Delta R.T. 0.01 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 43 Resp: 430

Ion	Ratio	Lower	Upper
43	100		
72	0.0	12.4	28.8#

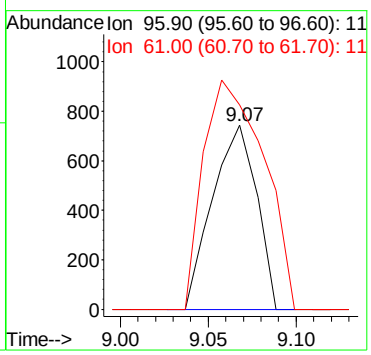


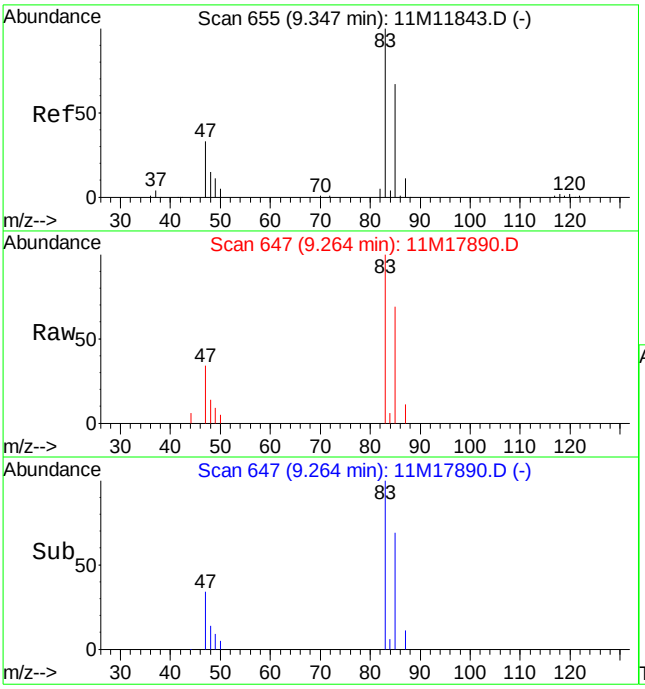


#32
cis-1,2-Dichloroethene
Concen: 0.32 ug/L
RT: 9.07 min Scan# 628
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 96 Resp: 1295

Ion	Ratio	Lower	Upper
96	100		
61	170.2	100.0	233.4

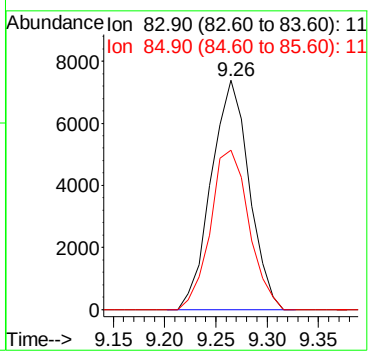


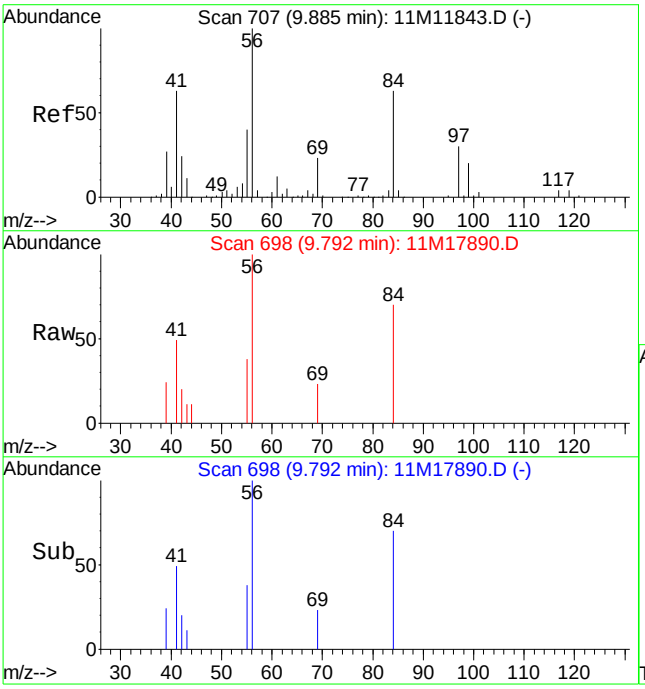


#33
Chloroform
Concen: 2.95 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 83 Resp: 19021

Ion	Ratio	Lower	Upper
83	100		
85	70.6	39.4	92.0

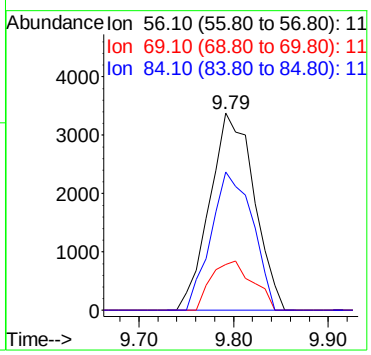


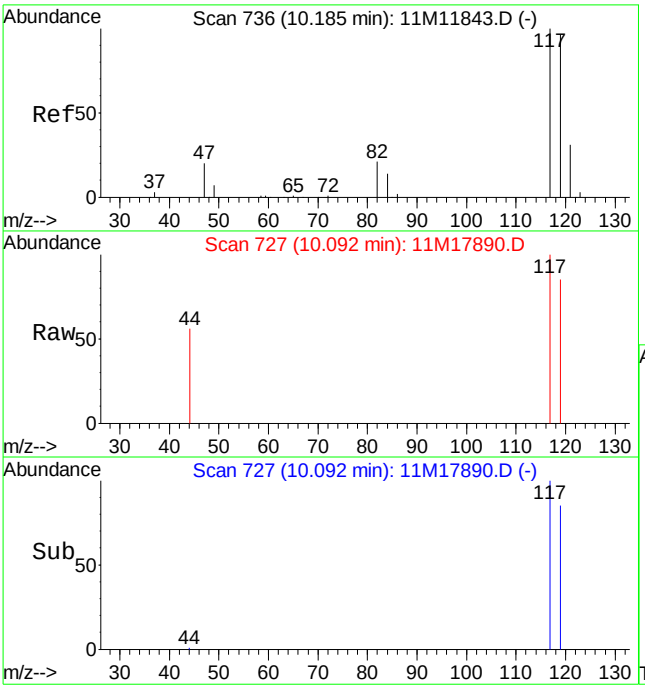


#39
Cyclohexane
Concen: 1.45 ug/L
RT: 9.79 min Scan# 698
Delta R.T. -0.01 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion: 56 Resp: 10968

Ion	Ratio	Lower	Upper
56	100		
69	23.3	15.3	35.7
84	65.7	41.6	97.0

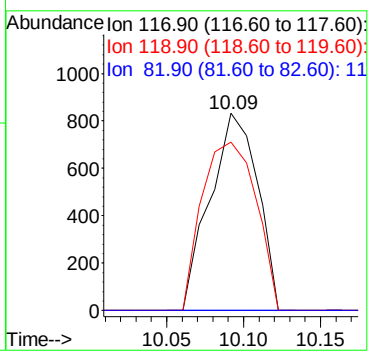


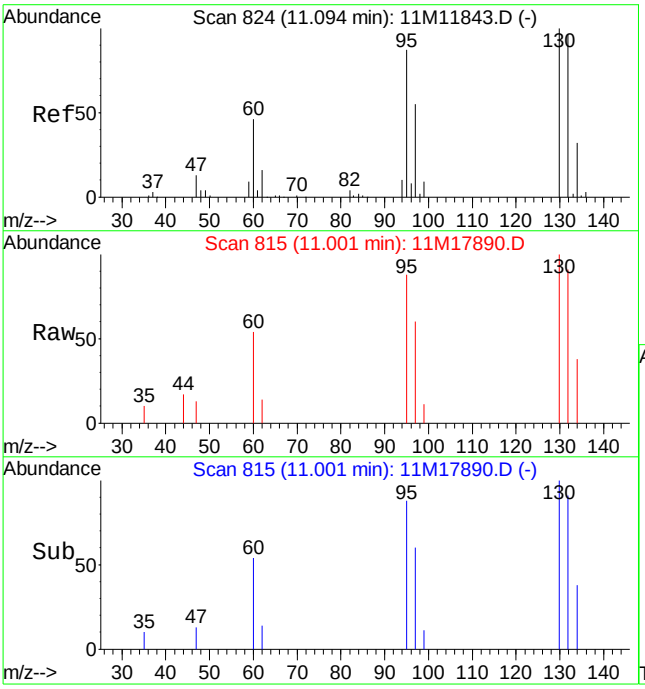


#41
Carbon Tetrachloride
Concen: 0.38 ug/L
RT: 10.09 min Scan# 727
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion:117 Resp: 1792

Ion	Ratio	Lower	Upper
117	100		
119	97.2	58.1	135.7
82	0.0	13.7	32.1#

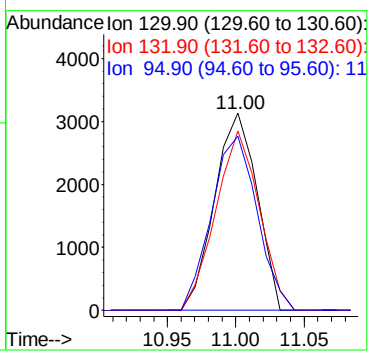


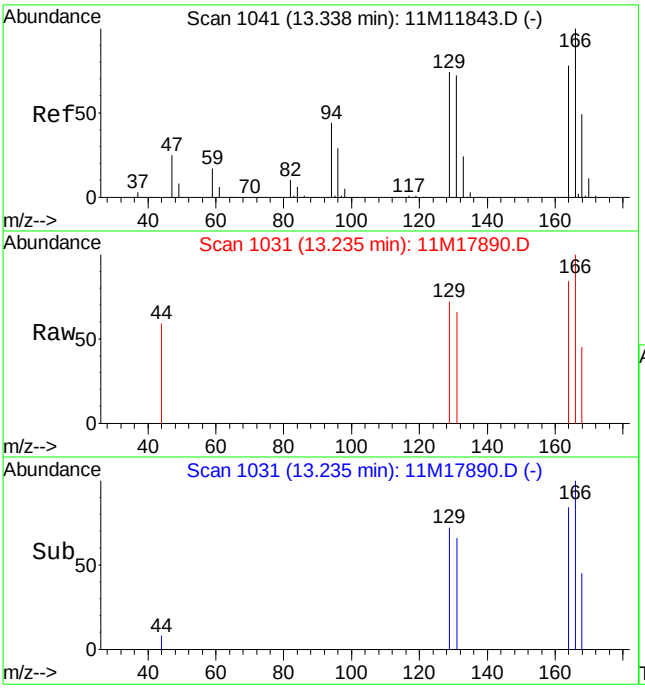


#46
Trichloroethene
Concen: 1.76 ug/L
RT: 11.00 min Scan# 815
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion:130 Resp: 6742

Ion	Ratio	Lower	Upper
130	100		
132	93.4	58.2	135.8
95	95.0	59.0	137.8

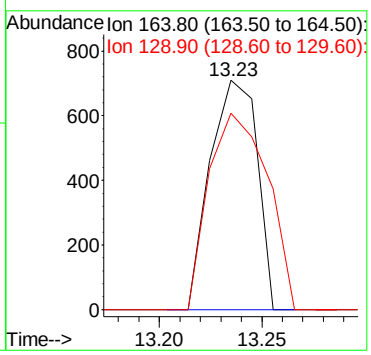




#64
Tetrachloroethene
Concen: 0.37 ug/L
RT: 13.23 min Scan# 1031
Delta R.T. 0.00 min
Lab File: 11M17890.D
Acq: 30 Apr 2017 5:10

Tgt Ion:164 Resp: 1131

Ion	Ratio	Lower	Upper
164	100		
129	107.0	51.8	120.8



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17891.D Vial: 23
Acq On : 30 Apr 2017 5:39 Operator: TMB
Sample : L17041203-08 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

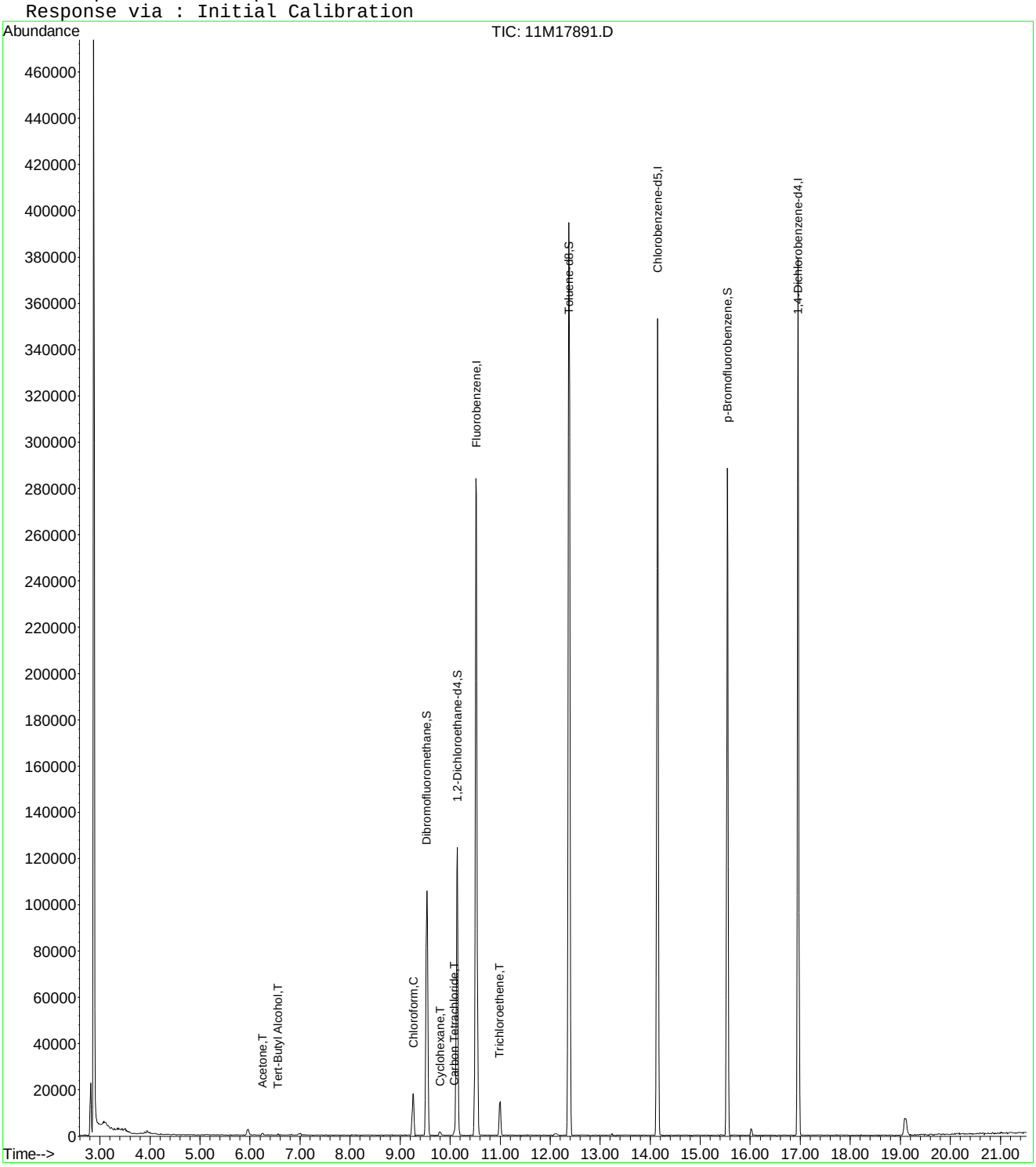
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	338916	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	240093	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	125801	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86265	25.6967	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.14	65	104125	26.7279	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.92%			
57) Toluene-d8	12.38	98	331928	26.6251	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.52%			
78) p-Bromofluorobenzene	15.54	95	120994	27.6715	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.68%			
Target Compounds						Qvalue
13) Acetone	6.25	43	1412	1.2460	ug/L #	41
15) Tert-Butyl Alcohol	6.56	59	468	1.1042	ug/L #	60
33) Chloroform	9.26	83	20189	3.0946	ug/L	99
39) Cyclohexane	9.80	56	1925	0.2501	ug/L #	69
41) Carbon Tetrachloride	10.08	117	2526	0.5335	ug/L #	77
46) Trichloroethene	10.99	130	7109	1.8247	ug/L	91

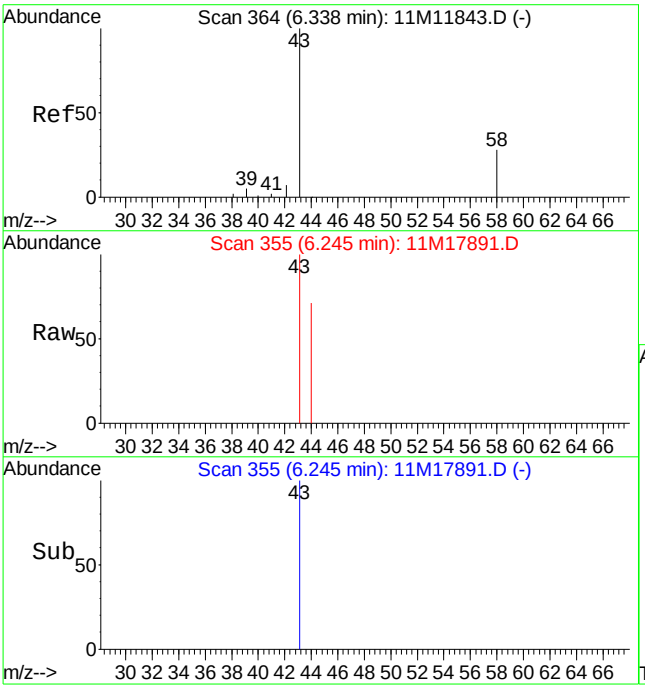
(#) = qualifier out of range (m) = manual integration
11M17891.D 8260WT.M Sun Apr 30 12:52:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17891.D Vial: 23
Acq On : 30 Apr 2017 5:39 Operator: TMB
Sample : L17041203-08 A 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:52 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

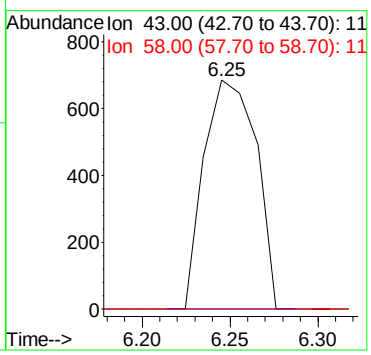


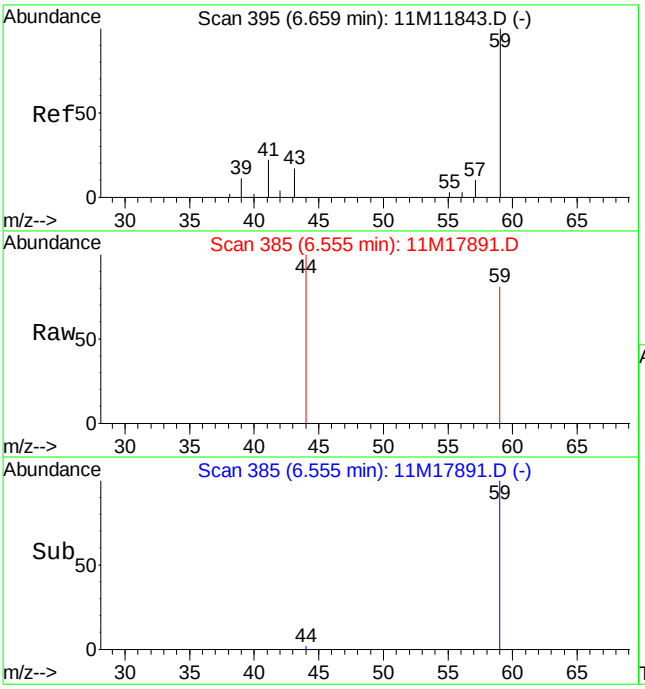


#13
Acetone
Concen: 1.25 ug/L
RT: 6.25 min Scan# 355
Delta R.T. -0.01 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion: 43 Resp: 1412

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

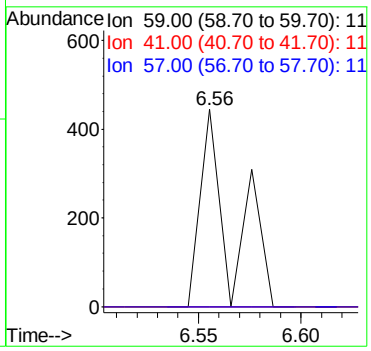


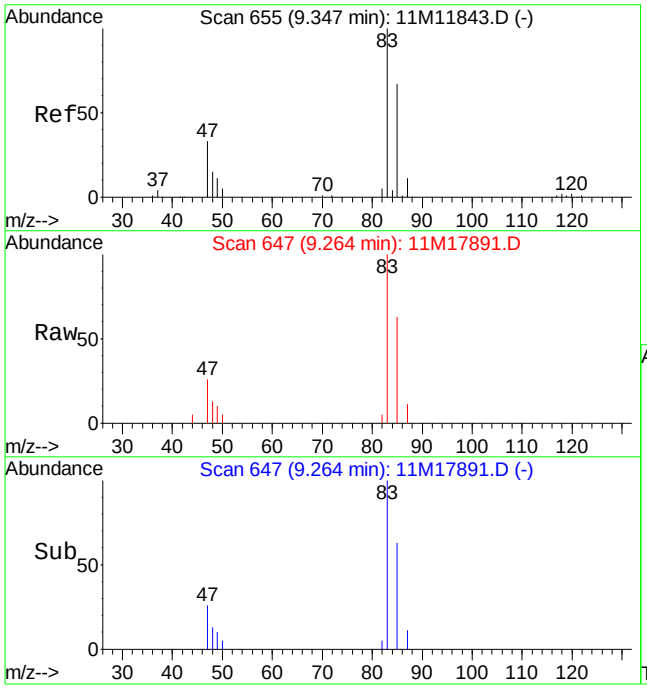


#15
Tert-Butyl Alcohol
Concen: 1.10 ug/L
RT: 6.56 min Scan# 385
Delta R.T. -0.01 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion: 59 Resp: 468

Ion	Ratio	Lower	Upper
59	100		
41	0.0	13.3	31.1#
57	0.0	5.9	13.7#

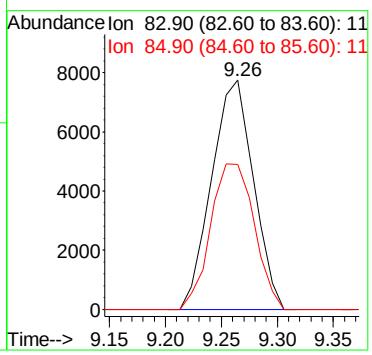


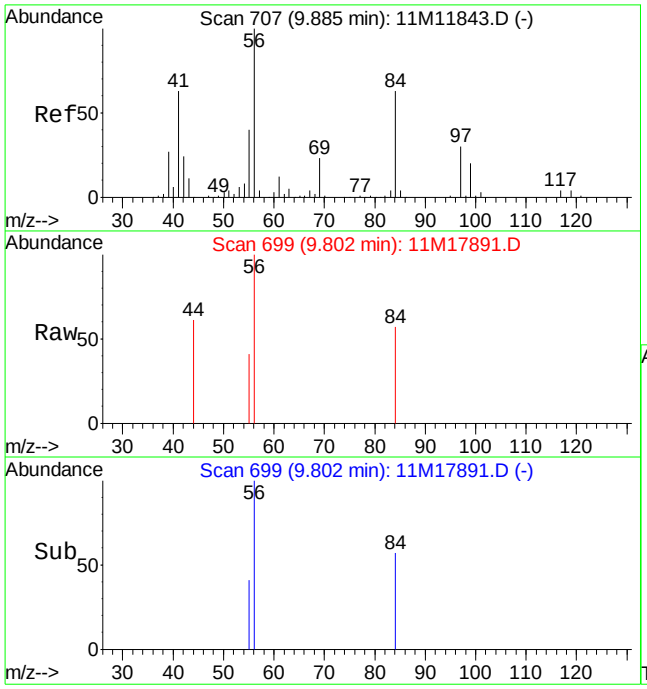


#33
Chloroform
Concen: 3.09 ug/L
RT: 9.26 min Scan# 647
Delta R.T. 0.00 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion: 83 Resp: 20189

Ion	Ratio	Lower	Upper
83	100		
85	66.2	39.4	92.0

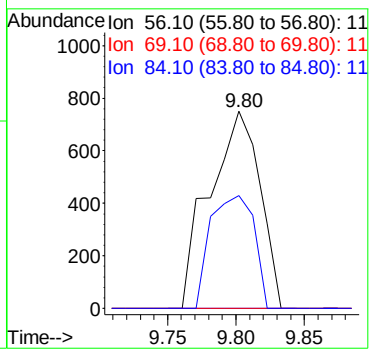


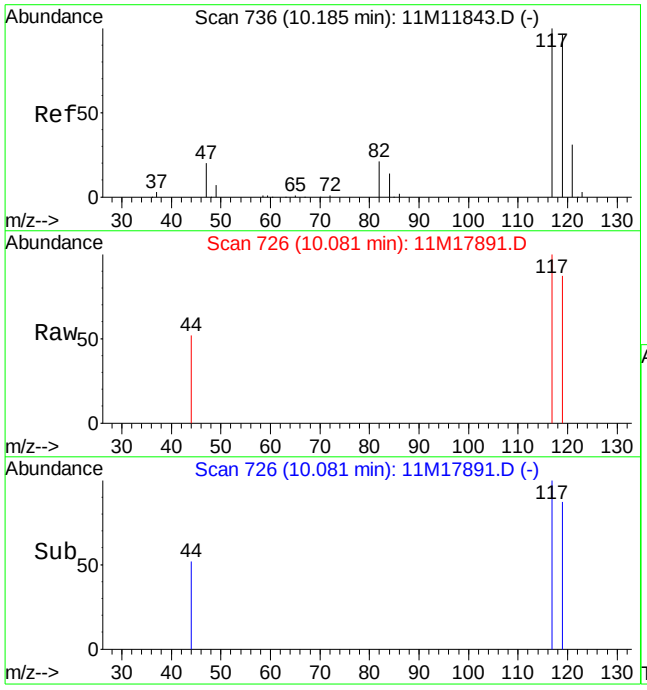


#39
Cyclohexane
Concen: 0.25 ug/L
RT: 9.80 min Scan# 699
Delta R.T. -0.00 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion: 56 Resp: 1925

Ion	Ratio	Lower	Upper
56	100		
69	0.0	15.3	35.7#
84	49.4	41.6	97.0

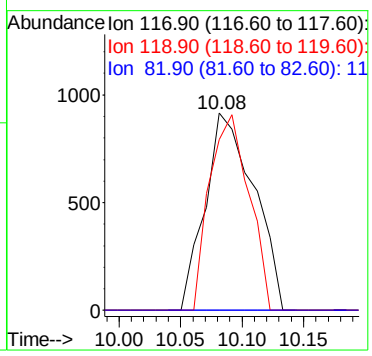


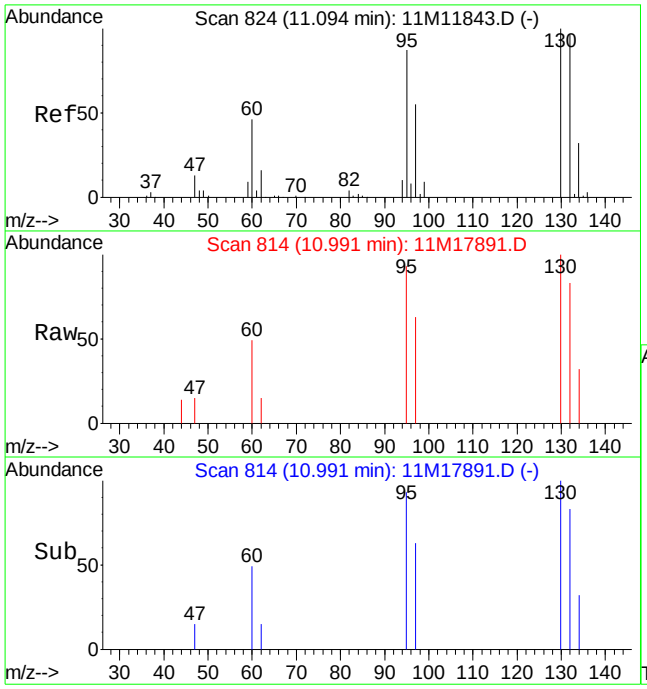


#41
Carbon Tetrachloride
Concen: 0.53 ug/L
RT: 10.08 min Scan# 726
Delta R.T. -0.01 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion:117 Resp: 2526

Ion	Ratio	Lower	Upper
117	100		
119	80.1	58.1	135.7
82	0.0	13.7	32.1#

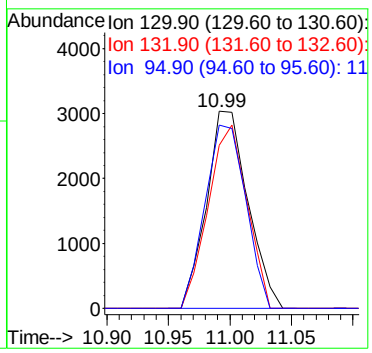




#46
Trichloroethene
Concen: 1.82 ug/L
RT: 10.99 min Scan# 814
Delta R.T. -0.01 min
Lab File: 11M17891.D
Acq: 30 Apr 2017 5:39

Tgt Ion:130 Resp: 7109

Ion	Ratio	Lower	Upper
130	100		
132	87.1	58.2	135.8
95	91.2	59.0	137.8



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273190.D Vial: 18
Acq On : 30 Apr 2017 21:13 Operator: ADC
Sample : L17041203-09 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:38 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

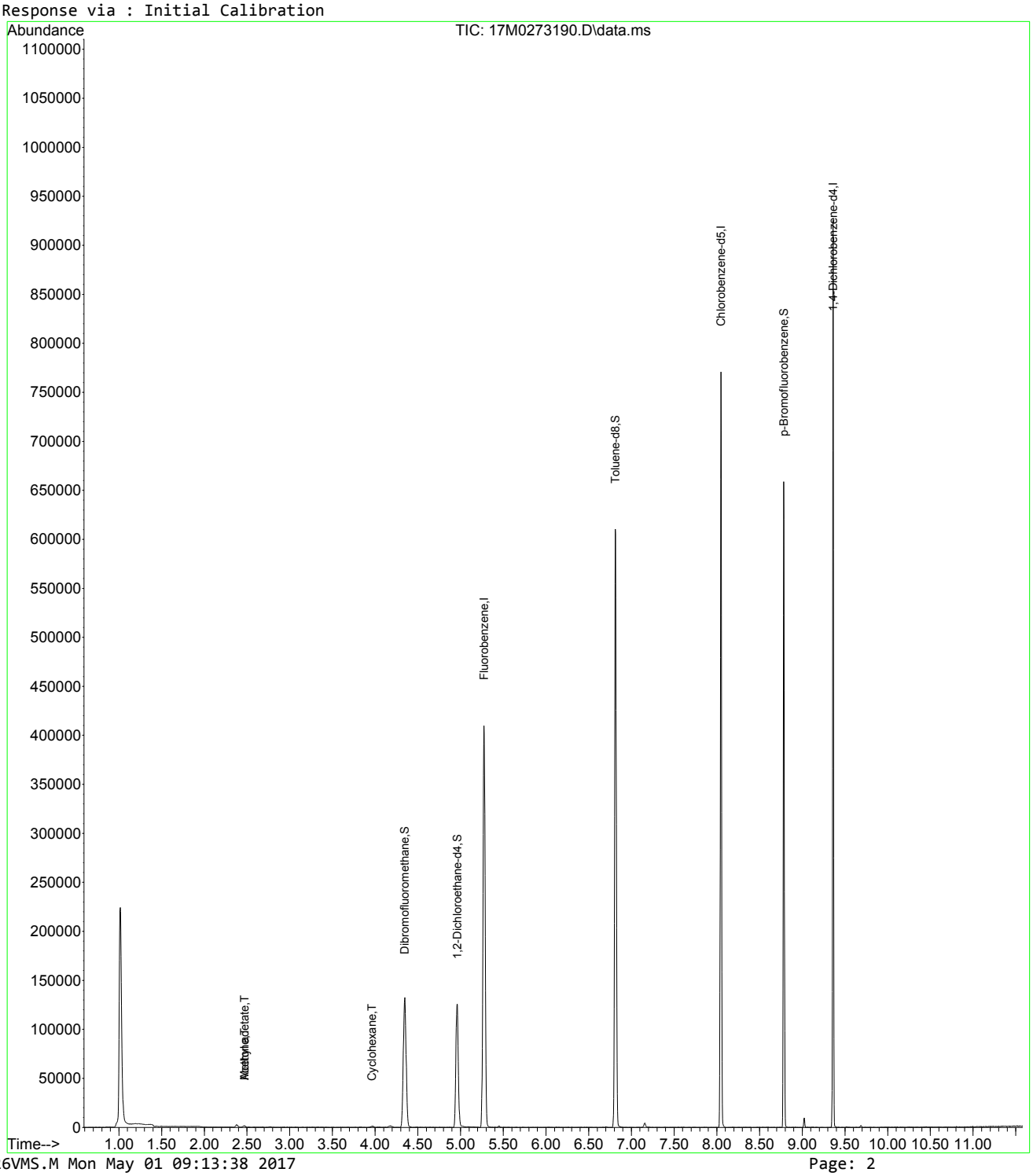
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	349598	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	257677	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	124082	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	94737	25.0920	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.368%			
34) 1,2-Dichloroethane-d4	4.962	65	92963	26.2687	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.075%			
47) Toluene-d8	6.812	98	329648	25.6341	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.536%			
66) p-Bromofluorobenzene	8.784	95	108221	26.0485	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.194%			
Target Compounds						Qvalue
16) Acetone	2.469	43	1805	2.5679	ug/L	83
18) Methyl acetate	2.469	43	1805	0.9795	ug/L #	56
25) Cyclohexane	3.960	56	717	0.1276	ug/L #	74

(#) = qualifier out of range (m) = manual integration (+) = signals summed

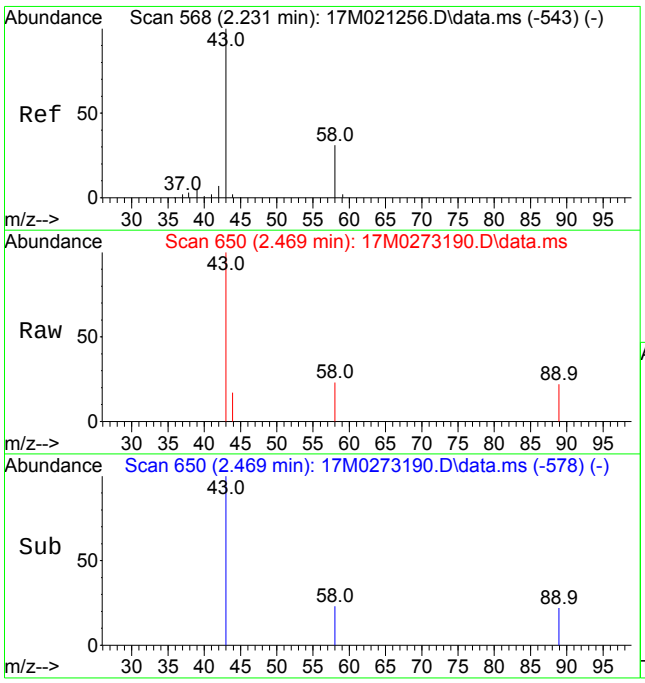
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273190.D Vial: 18
Acq On : 30 Apr 2017 21:13 Operator: ADC
Sample : L17041203-09 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:38 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



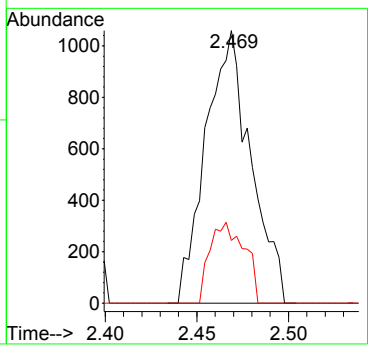
826VMS.M Mon May 01 09:13:38 2017 Page: 2

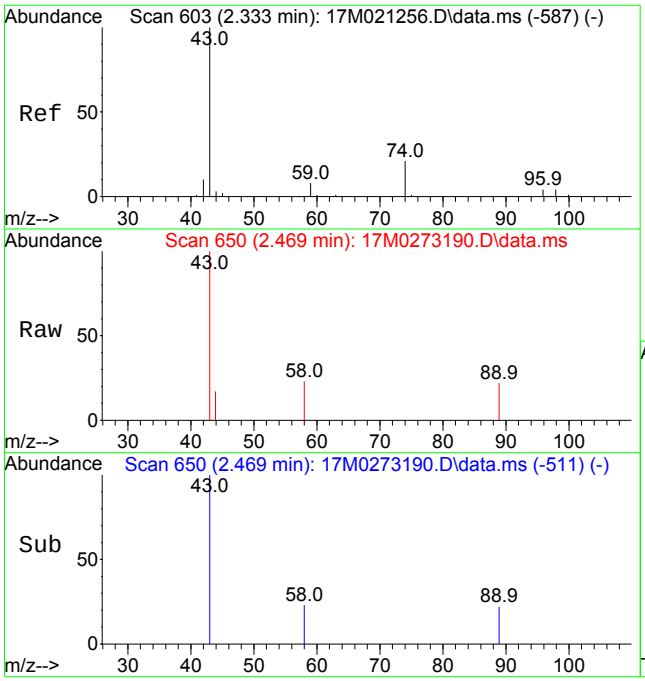


#16
Acetone
Concen: 2.5679 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273190.D
Acq: 30 Apr 2017 21:13

Tgt Ion: 43 Resp: 1805

Ion	Ratio	Lower	Upper
43	100		
58	22.8	19.4	45.2

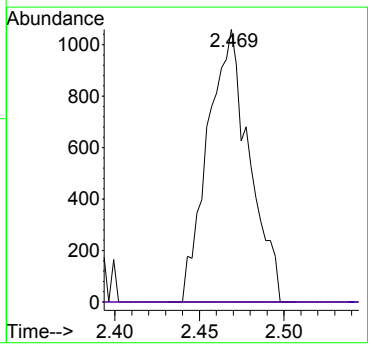


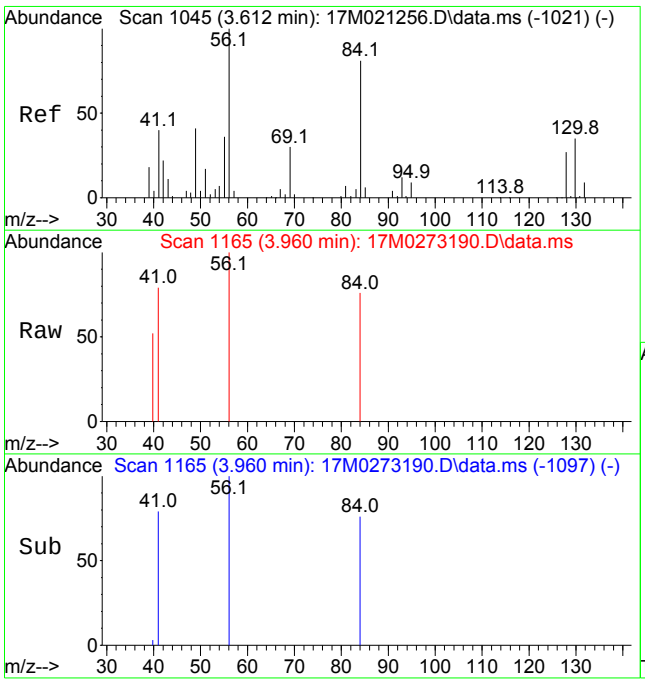


#18
Methyl acetate
Concen: 0.9795 ug/L
RT: 2.469 min Scan# 650
Delta R.T. -0.098 min
Lab File: 17M0273190.D
Acq: 30 Apr 2017 21:13

Tgt Ion: 43 Resp: 1805

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

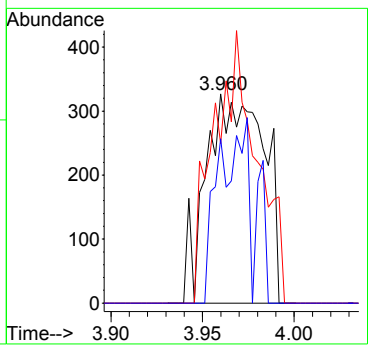




#25
Cyclohexane
Concen: 0.1276 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273190.D
Acq: 30 Apr 2017 21:13

Tgt Ion: 56 Resp: 717

Ion	Ratio	Lower	Upper
56	100		
84	97.1	69.4	104.0
41	52.9	72.2	108.2#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146830.D Vial: 9
Acq On : 28 Apr 2017 23:42 Operator: JDS
Sample : L17041203-10 A REF 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 29 00:04:22 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

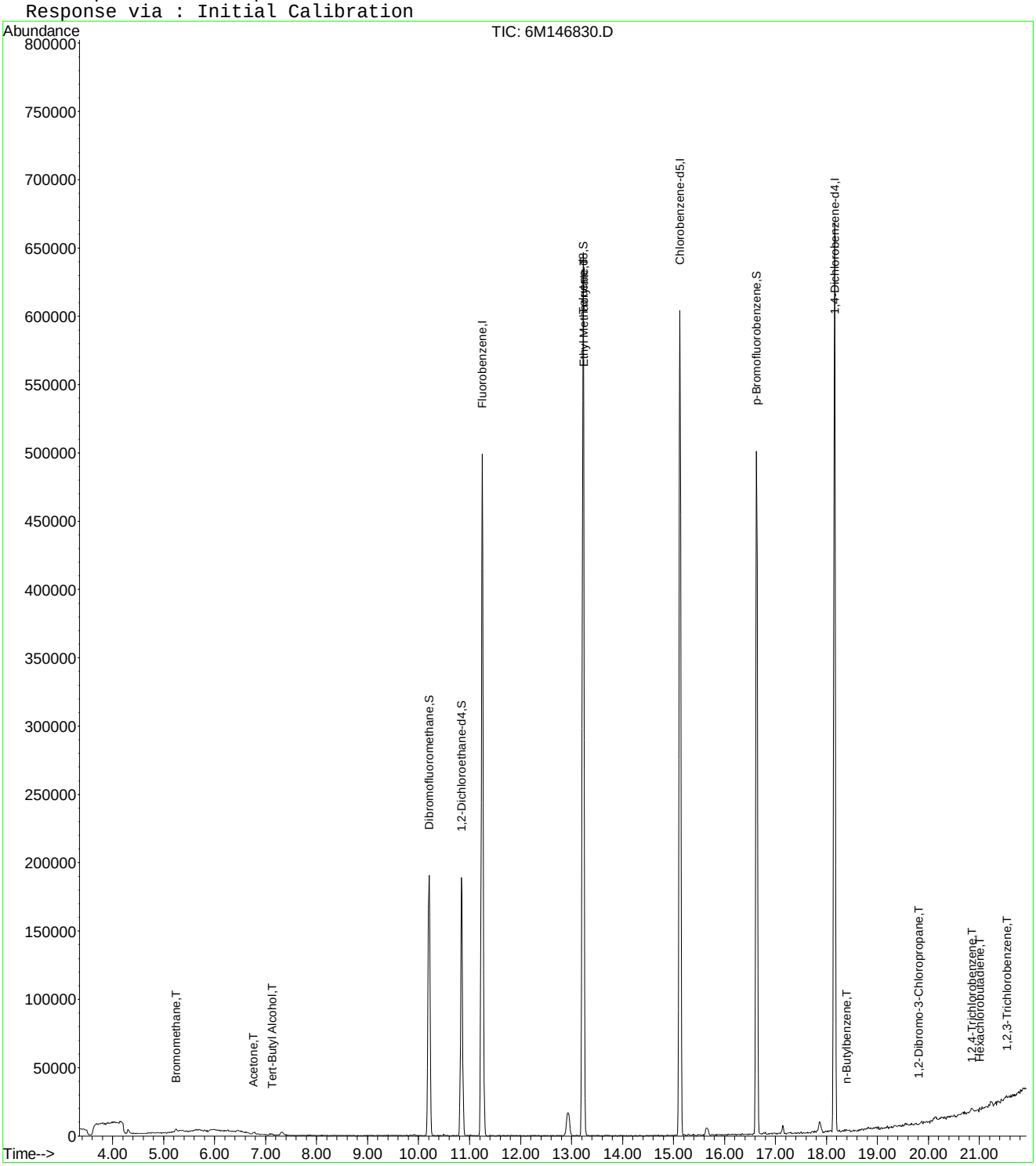
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	637857	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	443730	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	222167	25.00	ug/L	-0.01
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	166446	25.5621	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.24%			
43) 1,2-Dichloroethane-d4	10.84	65	172875	26.9378	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 107.76%			
58) Toluene-d8	13.23	98	601753	26.5762	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.32%			
80) p-Bromofluorobenzene	16.63	95	235654	27.9277	ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.72%			
Target Compounds						Qvalue
3) Chloromethane	4.03	50	2199	Below Cal		94
6) Bromomethane	5.24	94	1802	0.3607	ug/L	70
13) Acetone	6.76	43	2104	1.5286	ug/L	84
15) Tert-Butyl Alcohol	7.12	59	2489	5.8298	ug/L #	57
60) Ethyl Methacrylate	13.24	69	1184	0.1764	ug/L	82
95) n-Butylbenzene	18.40	91	3637	0.1611	ug/L #	48
97) 1,2-Dibromo-3-Chloropropan	19.80	75	205	0.1956	ug/L #	1
98) 1,2,4-Trichlorobenzene	20.86	180	1753	0.1791	ug/L #	48
99) Hexachlorobutadiene	21.01	225	600	0.1605	ug/L #	9
101) 1,2,3-Trichlorobenzene	21.54	180	3466	0.3668	ug/L #	24

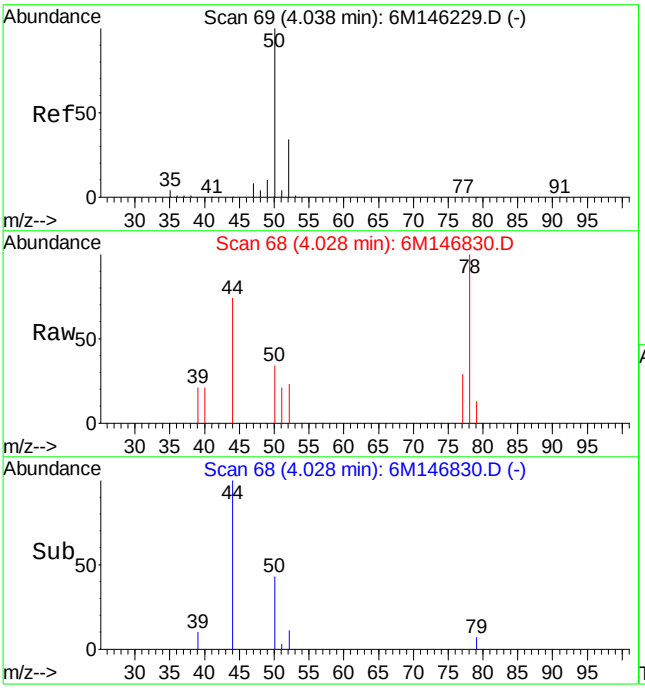
(#) = qualifier out of range (m) = manual integration
6M146830.D 8260BWT.M Sat Apr 29 12:17:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146830.D Vial: 9
Acq On : 28 Apr 2017 23:42 Operator: JDS
Sample : L17041203-10 A REF 826-SPE Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 29 0:04 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

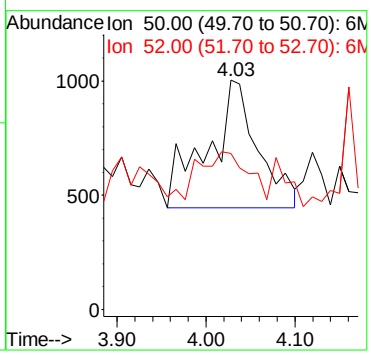


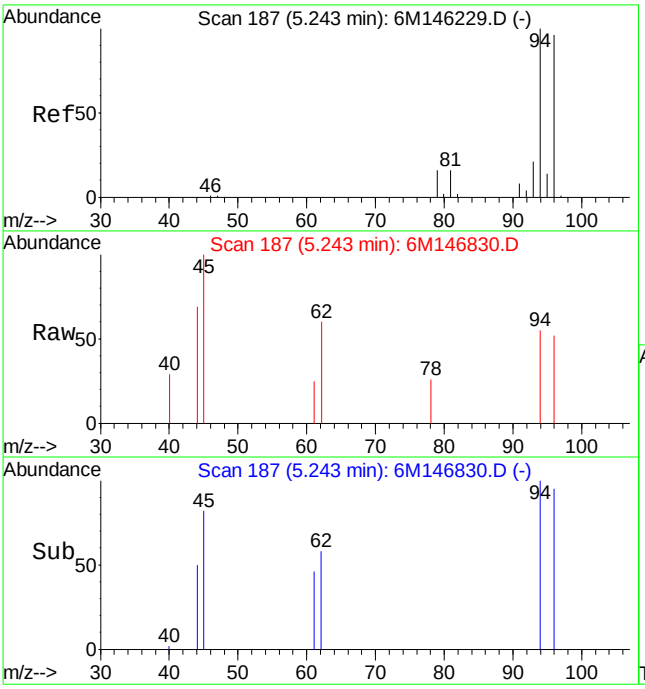


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 50 Resp: 2199

Ion	Ratio	Lower	Upper
50	100		
52	36.4	19.8	46.2

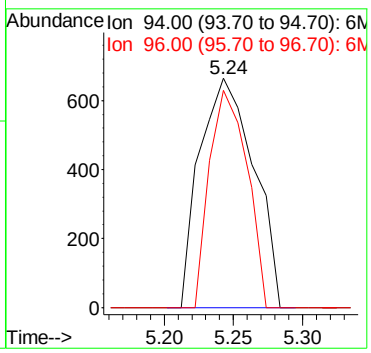


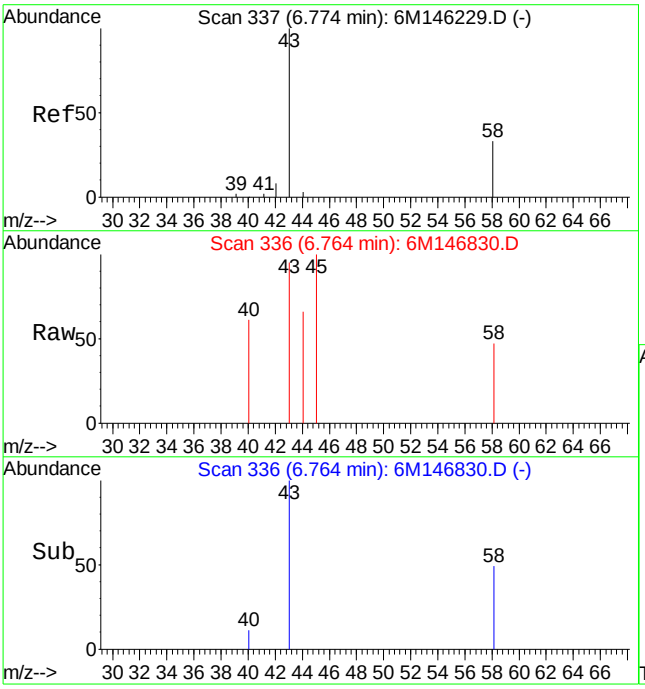


#6
Bromomethane
Concen: 0.36 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 94 Resp: 1802

Ion	Ratio	Lower	Upper
94	100		
96	65.9	56.7	132.3

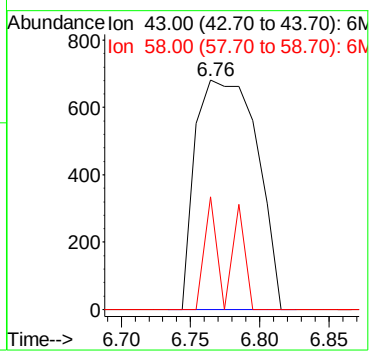


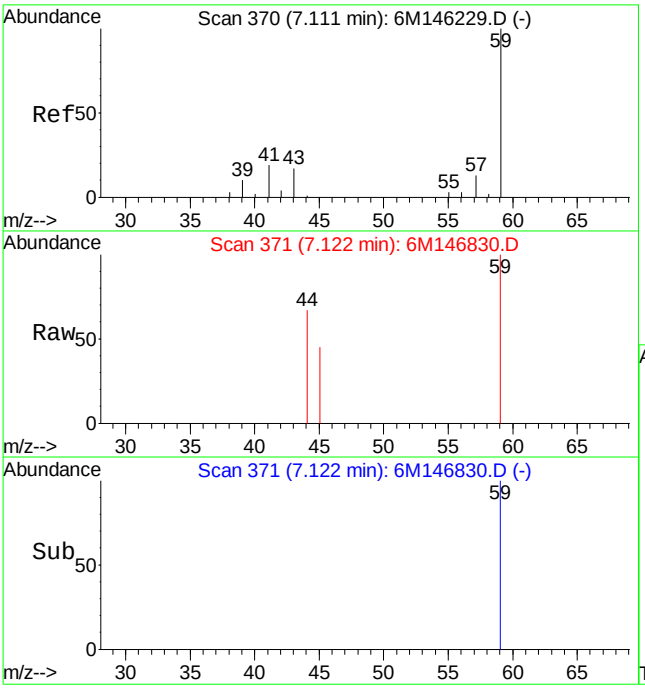


#13
Acetone
Concen: 1.53 ug/L
RT: 6.76 min Scan# 336
Delta R.T. -0.01 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 43 Resp: 2104

Ion	Ratio	Lower	Upper
43	100		
58	18.8	16.4	38.2

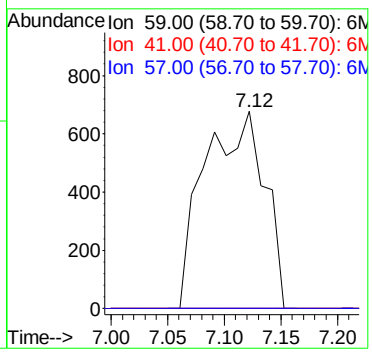


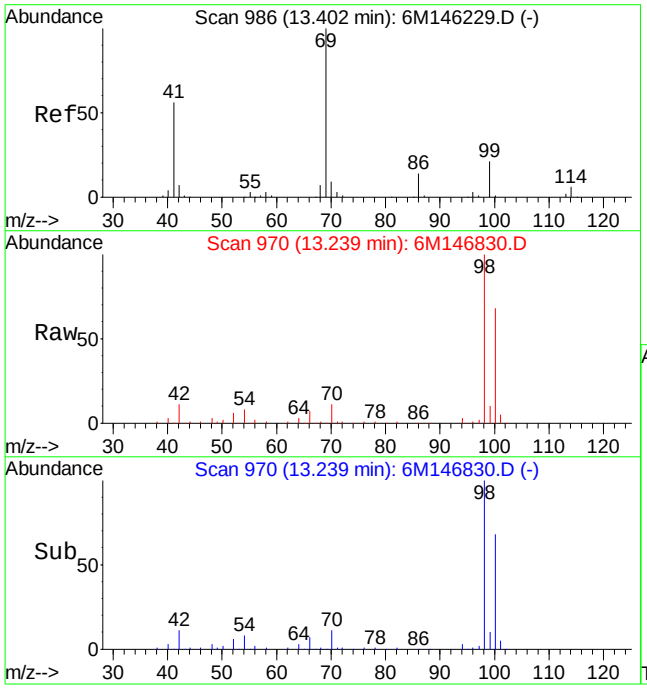


#15
Tert-Butyl Alcohol
Concen: 5.83 ug/L
RT: 7.12 min Scan# 371
Delta R.T. -0.00 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 59 Resp: 2489

Ion	Ratio	Lower	Upper
59	100		
41	0.0	14.6	34.0#
57	0.0	6.4	14.8#

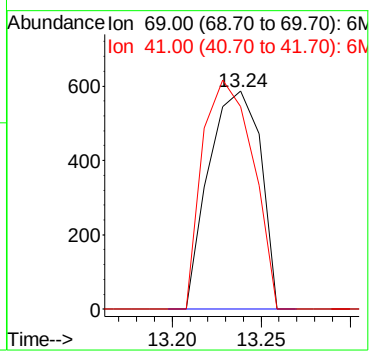


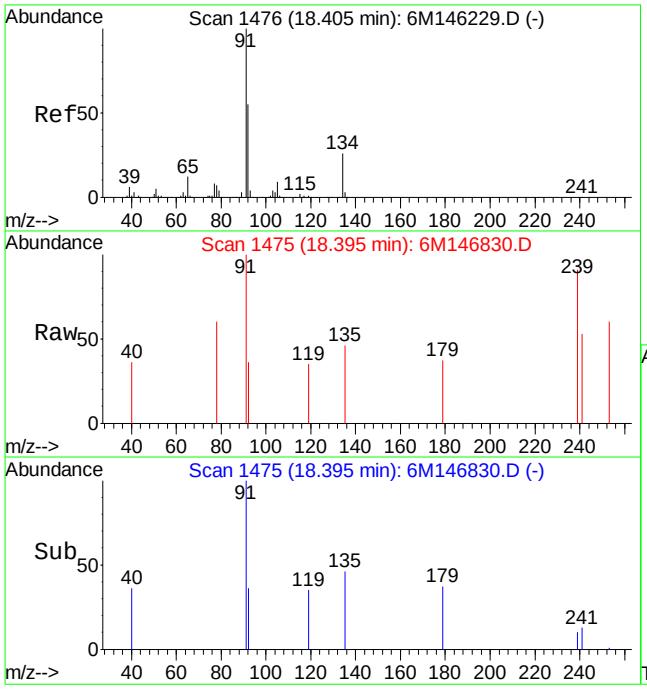


#60
Ethyl Methacrylate
Concen: 0.18 ug/L
RT: 13.24 min Scan# 970
Delta R.T. -0.16 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 69 Resp: 1184

Ion	Ratio	Lower	Upper
69	100		
41	102.6	51.4	120.0

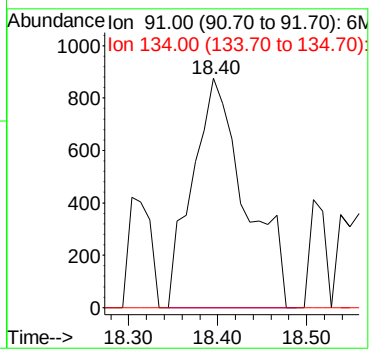


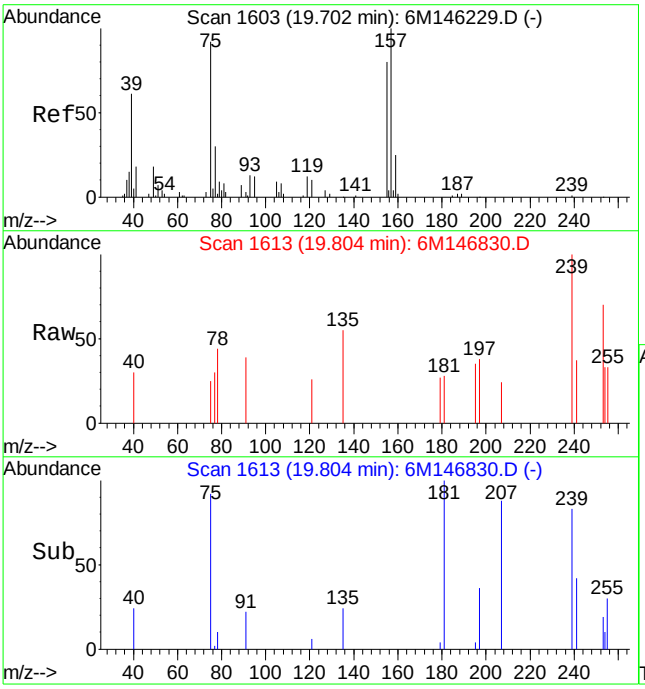


#95
n-Butylbenzene
Concen: 0.16 ug/L
RT: 18.40 min Scan# 1475
Delta R.T. -0.01 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 91 Resp: 3637

Ion	Ratio	Lower	Upper
91	100		
134	0.0	16.1	37.5#

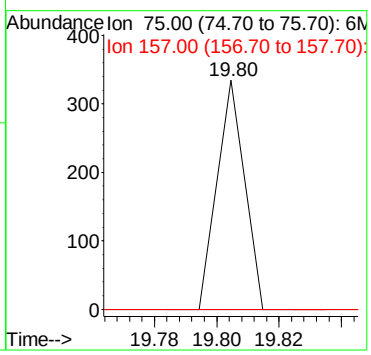


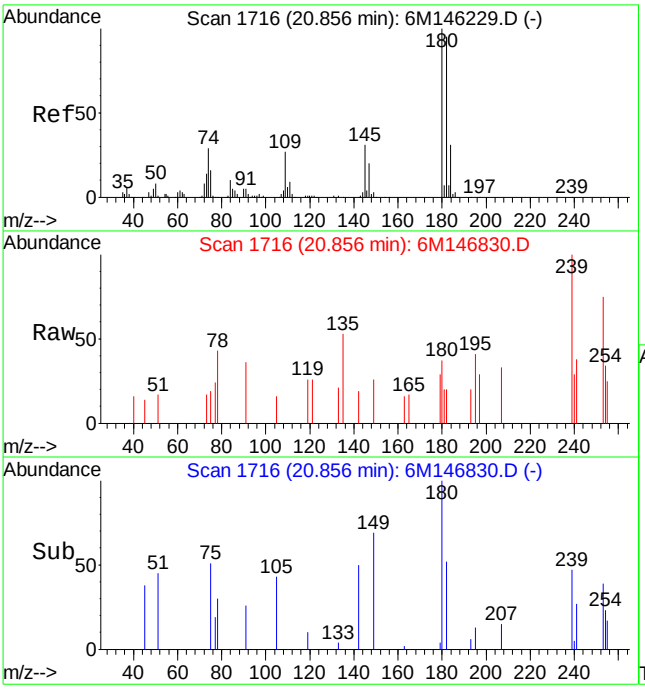


#97
1,2-Dibromo-3-Chloropropane
Concen: 0.20 ug/L
RT: 19.80 min Scan# 1613
Delta R.T. 0.10 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion: 75 Resp: 205

Ion	Ratio	Lower	Upper
75	100		
157	0.0	66.9	156.1#

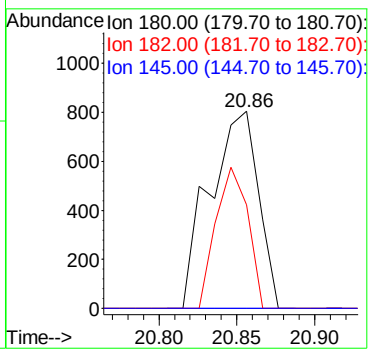


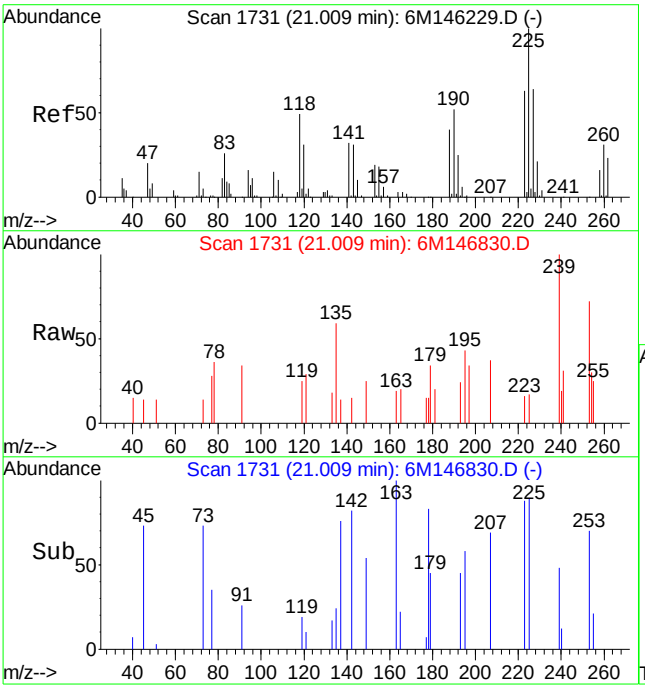


#98
1,2,4-Trichlorobenzene
Concen: 0.18 ug/L
RT: 20.86 min Scan# 1716
Delta R.T. -0.00 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion:180 Resp: 1753

Ion	Ratio	Lower	Upper
180	100		
182	46.9	57.7	134.5#
145	0.0	19.0	44.4#

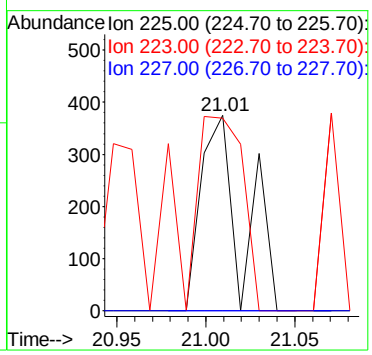


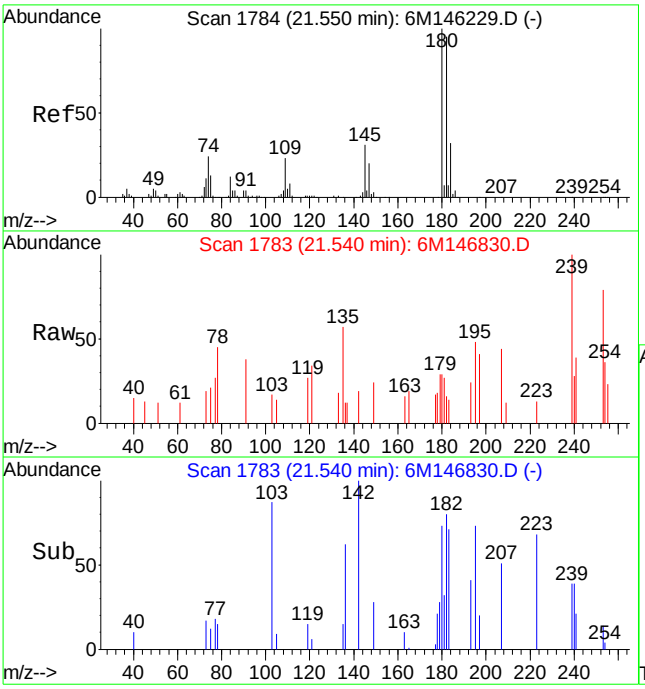


#99
Hexachlorobutadiene
Concen: 0.16 ug/L
RT: 21.01 min Scan# 1731
Delta R.T. -0.00 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion:225 Resp: 600

Ion	Ratio	Lower	Upper
225	100		
223	141.2	37.7	88.1#
227	0.0	38.6	90.0#

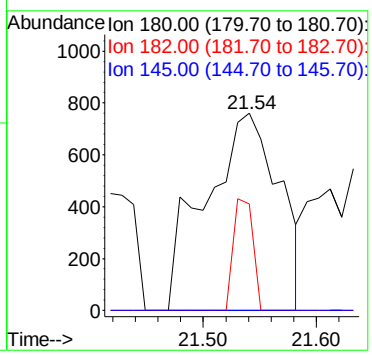




#101
1,2,3-Trichlorobenzene
Concen: 0.37 ug/L
RT: 21.54 min Scan# 1783
Delta R.T. -0.00 min
Lab File: 6M146830.D
Acq: 28 Apr 2017 23:42

Tgt Ion:180 Resp: 3466

Ion	Ratio	Lower	Upper
180	100		
182	14.9	57.2	133.4#
145	0.0	19.6	45.6#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146826.D Vial: 5
Acq On : 28 Apr 2017 21:40 Operator: JDS
Sample : L17041203-11 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:02:02 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	687945	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	482920	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	245426	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	179783	25.6001	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.40%				
43) 1,2-Dichloroethane-d4	10.84	65	187045	27.0238	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.08%				
58) Toluene-d8	13.23	98	648669	26.3234	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.28%				
80) p-Bromofluorobenzene	16.63	95	253553	27.2012	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.80%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	251141	22.9927	ug/L		95
3) Chloromethane	4.04	50	279663	21.5317	ug/L		99
4) Vinyl Chloride	4.28	62	255693	20.4878	ug/L		100
5) 1,3-Butadiene	4.32	54	127483	26.1549	ug/L		91
6) Bromomethane	5.24	94	90318	16.7612	ug/L		100
7) Chloroethane	5.40	64	117903	21.9570	ug/L		86
8) Trichlorofluoromethane	5.90	101	241662	18.8927	ug/L		99
9) Diethyl ether	6.44	59	575112	107.8876	ug/L		85
10) Isoprene	6.47	67	218906	20.8064	ug/L		83
11) Acrolein	6.68	56	103804	177.7431	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	147093	20.3146	ug/L		96
13) Acetone	6.78	43	37085	24.9811	ug/L		90
14) 1,1-Dichloroethene	7.01	61	217454	20.7335	ug/L		89
15) Tert-Butyl Alcohol	7.11	59	105508	229.1291	ug/L		92
16) Dimethyl Sulfide	7.28	62	171795	22.9233	ug/L		80
17) Iodomethane	7.53	142	130532	21.7820	ug/L		100
18) Methyl acetate	7.53	43	84554	22.7102	ug/L	#	84
19) Methylene Chloride	7.79	84	155688	19.6347	ug/L		66
20) Carbon Disulfide	7.85	76	381958	16.9219	ug/L		99
21) Acrylonitrile	7.97	53	39919	23.2055	ug/L		98
22) Methyl Tert Butyl Ether	8.00	73	377314	21.6998	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	148807	19.7141	ug/L		85
24) n-Hexane	8.33	57	191992	22.4927	ug/L		87
25) Diisopropyl ether	8.66	45	2272203	116.9326	ug/L	#	93
26) Vinyl Acetate	8.83	43	173313	32.1311	ug/L		92
27) 1,1-Dichloroethane	8.87	63	267159	21.3666	ug/L		98
28) Ethyl-Tert-Butyl ether	9.24	59	2088116	106.0564	ug/L		93
29) 2-Butanone	9.41	43	42733	22.8395	ug/L		84
30) Propionitrile	9.51	54	71349	116.9297	ug/L		100
31) 2,2-Dichloropropane	9.65	77	192414	20.2274	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	163880	19.7482	ug/L		96
33) Chloroform	9.91	83	270381	18.9818	ug/L		95
34) 1-Bromopropane	10.06	122	37367	25.3918	ug/L		99
35) Bromochloromethane	10.15	130	87730	20.0830	ug/L		100
36) Tetrahydrofuran	10.17	42	141412	114.7713	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	235739	20.3564	ug/L		91
39) Cyclohexane	10.49	56	209925	19.6032	ug/L		82
40) 1,1-Dichloropropene	10.65	75	198002	20.2263	ug/L		85
41) Tert-Amyl-Methyl ether	10.74	73	1994460	106.6906	ug/L		94
42) Carbon Tetrachloride	10.80	117	174252	19.0829	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146826.D 8260BWT.M Sat Apr 29 12:14:49 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146826.D Vial: 5
Acq On : 28 Apr 2017 21:40 Operator: JDS
Sample : L17041203-11 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:02:02 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

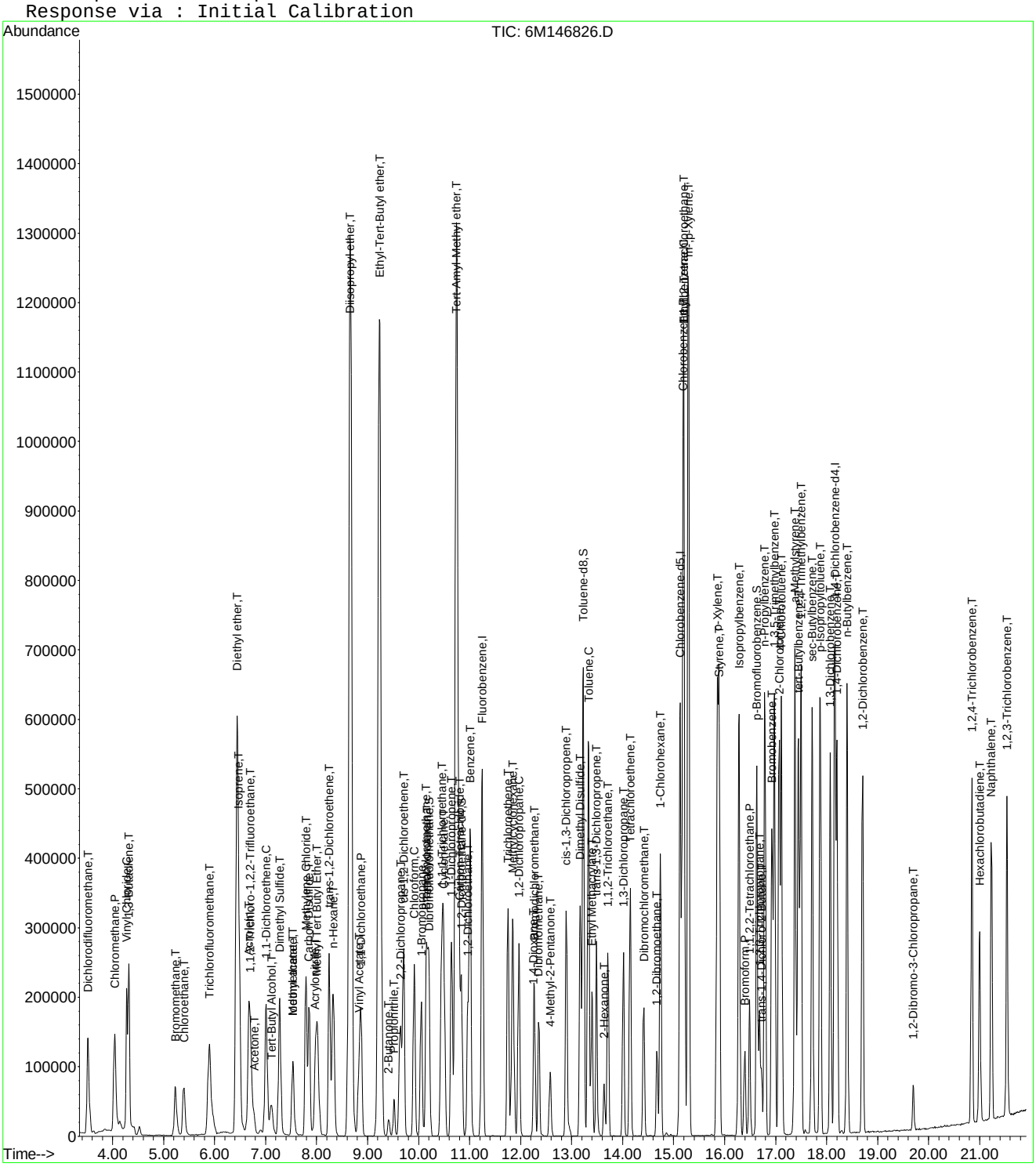
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	185087	20.8870	ug/L		90
46)	Benzene	11.01	78	583233	19.8147	ug/L		89
47)	Trichloroethene	11.75	130	142734	17.8153	ug/L		93
48)	Methylcyclohexane	11.84	83	219817	18.9899	ug/L		86
49)	1,2-Dichloropropane	11.97	63	147376	21.2156	ug/L		96
50)	1,4-Dioxane	12.25	88	12206	241.6569	ug/L		90
51)	Bromodichloromethane	12.27	83	195667	19.9534	ug/L		99
52)	Dibromomethane	12.35	93	82376	20.1347	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	38666	21.6327	ug/L		88
55)	cis-1,3-Dichloropropene	12.89	75	237151	21.9608	ug/L		96
56)	Dimethyl Disulfide	13.17	79	138248	20.2926	ug/L		92
59)	Toluene	13.33	91	591446	19.5893	ug/L		100
60)	Ethyl Methacrylate	13.39	69	164038	22.4516	ug/L		79
62)	trans-1,3-Dichloropropene	13.49	75	193999	20.8388	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	112440	19.7618	ug/L		99
64)	2-Hexanone	13.64	43	64383	23.5646	ug/L		88
65)	1,3-Dichloropropane	14.02	76	203263	21.2824	ug/L		75
66)	Tetrachloroethene	14.15	166	136280	18.6270	ug/L		93
67)	Dibromochloromethane	14.42	129	131580	18.7075	ug/L		100
68)	1,2-Dibromoethane	14.67	107	104590	19.1439	ug/L		98
69)	1-Chlorohexane	14.74	91	201902	20.7083	ug/L		81
70)	Chlorobenzene	15.18	112	389496	18.8486	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	138143	18.6673	ug/L		97
72)	Ethylbenzene	15.20	106	211976	18.9489	ug/L		100
73)	m-,p-Xylene	15.29	106	511668	38.2663	ug/L		98
74)	o-Xylene	15.86	106	250959	19.4495	ug/L		97
75)	Styrene	15.90	104	424771	19.6098	ug/L		100
76)	Bromoform	16.40	173	76471	17.8412	ug/L		98
77)	Isopropylbenzene	16.28	105	620403	19.2136	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	136220	21.3111	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	39002	20.6623	ug/L		61
82)	trans-1,4-Dichloro-2-Buten	16.72	53	23849	17.5708	ug/L	#	1
83)	n-Propylbenzene	16.78	91	750575	20.1989	ug/L		98
84)	Bromobenzene	16.93	156	159179	19.0682	ug/L		74
85)	1,3,5-Trimethylbenzene	16.98	105	530312	20.1377	ug/L		99
86)	2-Chlorotoluene	17.07	91	498839	20.1614	ug/L		98
87)	4-Chlorotoluene	17.11	91	446828	20.4333	ug/L		99
88)	a-Methylstyrene	17.38	118	293342	20.1434	ug/L		99
89)	tert-Butylbenzene	17.45	134	107632	19.5057	ug/L		73
90)	1,2,4-Trimethylbenzene	17.50	105	549116	20.3036	ug/L		88
91)	sec-Butylbenzene	17.71	105	644737	19.8532	ug/L		96
92)	p-Isopropyltoluene	17.88	119	547801	20.0529	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	296176	18.7868	ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	298701	18.7361	ug/L		95
95)	n-Butylbenzene	18.40	91	516751	20.7156	ug/L		97
96)	1,2-Dichlorobenzene	18.70	146	276207	18.6917	ug/L		94
97)	1,2-Dibromo-3-Chloropropan	19.70	75	26305	22.7200	ug/L		87
98)	1,2,4-Trichlorobenzene	20.85	180	199806	18.4800	ug/L		99
99)	Hexachlorobutadiene	21.00	225	75139	18.1953	ug/L		98
100)	Naphthalene	21.23	128	422182	19.5010	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	185623	17.7838	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146826.D 8260BWT.M Sat Apr 29 12:14:49 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146826.D Vial: 5
Acq On : 28 Apr 2017 21:40 Operator: JDS
Sample : L17041203-11 A MS 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:02 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146827.D Vial: 6
Acq On : 28 Apr 2017 22:10 Operator: JDS
Sample : L17041203-12 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:32:23 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	685500	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	478757	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	249055	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	178959	25.5736 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.28%		
43) 1,2-Dichloroethane-d4	10.84	65	187594	27.1998 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.80%		
58) Toluene-d8	13.23	98	643703	26.3490 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.40%		
80) p-Bromofluorobenzene	16.63	95	255866	27.0494 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.20%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	244365	22.4522 ug/L	94
3) Chloromethane	4.04	50	275893	21.3093 ug/L	97
4) Vinyl Chloride	4.27	62	258487	20.7855 ug/L	99
5) 1,3-Butadiene	4.31	54	122471	25.1408 ug/L	91
6) Bromomethane	5.23	94	92130	17.1584 ug/L	97
7) Chloroethane	5.40	64	114397	21.3800 ug/L	86
8) Trichlorofluoromethane	5.90	101	234288	18.3815 ug/L	99
9) Diethyl ether	6.44	59	576112	108.4606 ug/L	85
10) Isoprene	6.48	67	208907	19.9268 ug/L	83
11) Acrolein	6.67	56	106029	182.2005 ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	142992	19.8187 ug/L	95
13) Acetone	6.78	43	36361	24.5807 ug/L	87
14) 1,1-Dichloroethene	7.01	61	214810	20.5545 ug/L	89
15) Tert-Butyl Alcohol	7.11	59	90442	197.1112 ug/L	92
16) Dimethyl Sulfide	7.28	62	169752	22.7314 ug/L	80
17) Iodomethane	7.54	142	130917	21.9191 ug/L	97
18) Methyl acetate	7.53	43	84165	22.6864 ug/L #	84
19) Methylene Chloride	7.79	84	156003	19.7446 ug/L	65
20) Carbon Disulfide	7.86	76	372992	16.5836 ug/L	99
21) Acrylonitrile	7.97	53	39978	23.3227 ug/L	98
22) Methyl Tert Butyl Ether	8.01	73	376781	21.7465 ug/L	93
23) trans-1,2-Dichloroethene	8.25	96	143497	19.0784 ug/L	85
24) n-Hexane	8.33	57	185685	21.8314 ug/L	87
25) Diisopropyl ether	8.66	45	2248685	116.1350 ug/L #	93
26) Vinyl Acetate	8.83	43	157360	29.2776 ug/L #	90
27) 1,1-Dichloroethane	8.87	63	262540	21.0720 ug/L	99
28) Ethyl-Tert-Butyl ether	9.24	59	2068227	105.4209 ug/L	93
29) 2-Butanone	9.41	43	41932	22.4913 ug/L	83
30) Propionitrile	9.52	54	72009	118.4322 ug/L	98
31) 2,2-Dichloropropane	9.65	77	152858	16.1264 ug/L	79
32) cis-1,2-Dichloroethene	9.71	96	161568	19.5390 ug/L	93
33) Chloroform	9.91	83	267900	18.8748 ug/L	95
34) 1-Bromopropane	10.05	122	35198	24.0033 ug/L	100
35) Bromochloromethane	10.15	130	86333	19.8337 ug/L	100
36) Tetrahydrofuran	10.18	42	141930	115.6025 ug/L	77
38) 1,1,1-Trichloroethane	10.45	97	227661	19.7290 ug/L	93
39) Cyclohexane	10.49	56	203387	19.0604 ug/L	81
40) 1,1-Dichloropropene	10.65	75	194788	19.9690 ug/L	84
41) Tert-Amyl-Methyl ether	10.75	73	1975764	106.0675 ug/L	94
42) Carbon Tetrachloride	10.80	117	165186	18.1546 ug/L	99

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146827.D Vial: 6
Acq On : 28 Apr 2017 22:10 Operator: JDS
Sample : L17041203-12 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:32:23 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

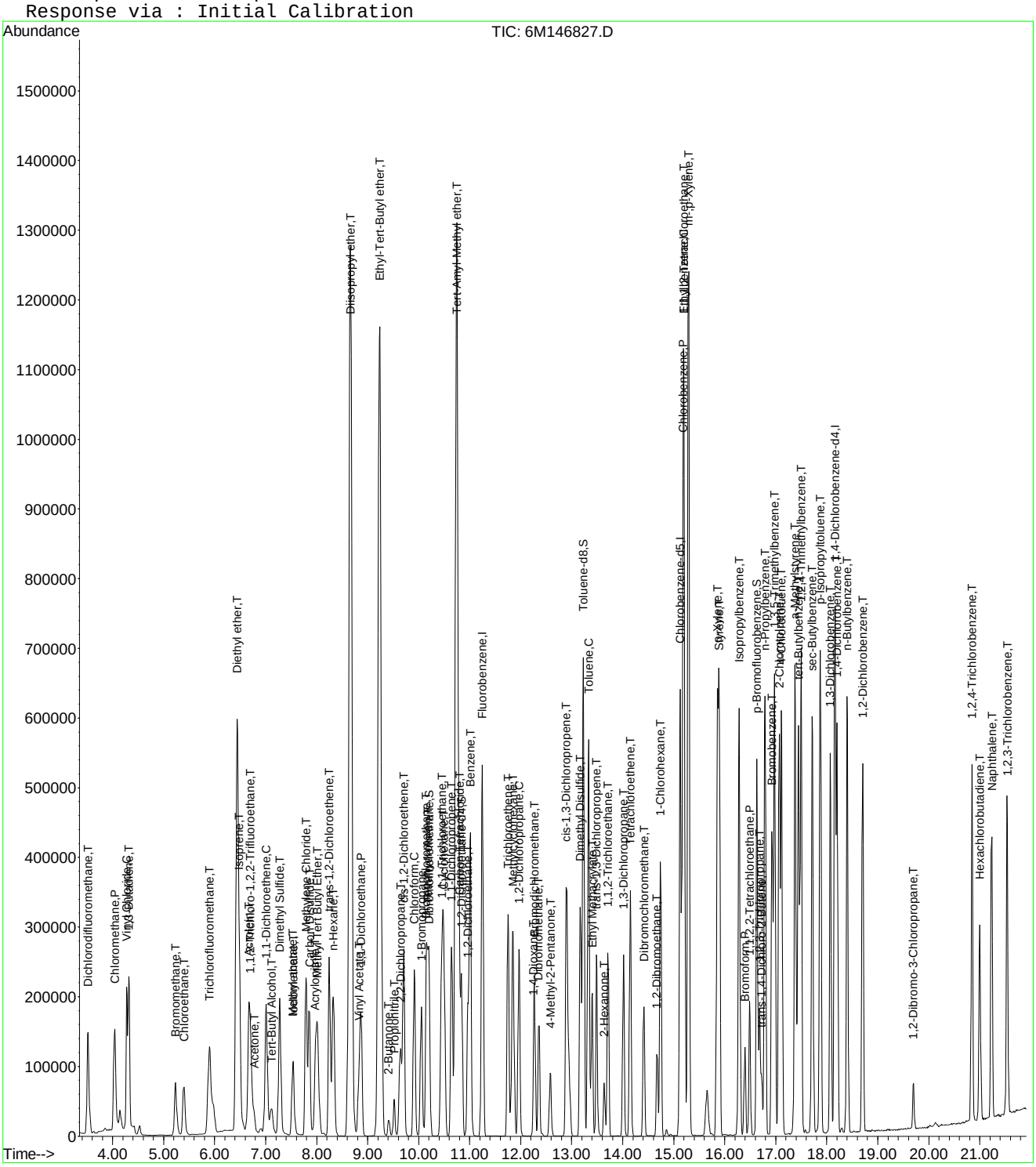
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	184269	20.8688 ug/L		89
46)	Benzene	11.01	78	576832	19.6671 ug/L		88
47)	Trichloroethene	11.75	130	140933	17.6532 ug/L		92
48)	Methylcyclohexane	11.85	83	213220	18.4857 ug/L		85
49)	1,2-Dichloropropane	11.96	63	144768	20.9145 ug/L		95
50)	1,4-Dioxane	12.25	88	12437	247.1085 ug/L		88
51)	Bromodichloromethane	12.27	83	191292	19.5768 ug/L		100
52)	Dibromomethane	12.35	93	82472	20.2301 ug/L		98
54)	4-Methyl-2-Pentanone	12.59	58	39280	22.0546 ug/L		87
55)	cis-1,3-Dichloropropene	12.89	75	234181	21.7632 ug/L		95
56)	Dimethyl Disulfide	13.17	79	136189	20.0617 ug/L		92
59)	Toluene	13.33	91	583766	19.5030 ug/L		100
60)	Ethyl Methacrylate	13.40	69	164050	22.6484 ug/L		78
62)	trans-1,3-Dichloropropene	13.48	75	184278	19.9667 ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	111001	19.6785 ug/L		98
64)	2-Hexanone	13.64	43	63932	23.6030 ug/L		84
65)	1,3-Dichloropropane	14.02	76	200821	21.2095 ug/L		75
66)	Tetrachloroethene	14.15	166	132809	18.3104 ug/L		91
67)	Dibromochloromethane	14.41	129	130733	18.7487 ug/L		99
68)	1,2-Dibromoethane	14.67	107	103933	19.1891 ug/L		99
69)	1-Chlorohexane	14.74	91	196610	20.3409 ug/L		81
70)	Chlorobenzene	15.18	112	381097	18.6025 ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.20	131	134583	18.3443 ug/L		97
72)	Ethylbenzene	15.20	106	207217	18.6846 ug/L		100
73)	m-,p-Xylene	15.29	106	504807	38.0815 ug/L		98
74)	o-Xylene	15.85	106	248421	19.4202 ug/L		97
75)	Styrene	15.89	104	422930	19.6946 ug/L		99
76)	Bromoform	16.39	173	76352	17.9684 ug/L		98
77)	Isopropylbenzene	16.28	105	611515	19.1031 ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	139322	21.4788 ug/L		97
81)	1,2,3-Trichloropropane	16.68	110	39217	20.4735 ug/L		73
82)	trans-1,4-Dichloro-2-Buten	16.72	53	21692	15.7487 ug/L	#	1
83)	n-Propylbenzene	16.79	91	739524	19.6115 ug/L		99
84)	Bromobenzene	16.93	156	158210	18.6759 ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	531227	19.8785 ug/L		98
86)	2-Chlorotoluene	17.07	91	480586	19.1407 ug/L		98
87)	4-Chlorotoluene	17.11	91	462613	20.8468 ug/L		99
88)	a-Methylstyrene	17.38	118	291868	19.7501 ug/L		98
89)	tert-Butylbenzene	17.45	134	107529	19.2030 ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	549709	20.0293 ug/L		89
91)	sec-Butylbenzene	17.71	105	642785	19.5047 ug/L		96
92)	p-Isopropyltoluene	17.88	119	549226	19.8121 ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	294815	18.4280 ug/L		96
94)	1,4-Dichlorobenzene	18.20	146	301809	18.6552 ug/L		95
95)	n-Butylbenzene	18.40	91	516631	20.4090 ug/L		96
96)	1,2-Dichlorobenzene	18.70	146	281381	18.7644 ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.69	75	25317	21.5480 ug/L		93
98)	1,2,4-Trichlorobenzene	20.85	180	202763	18.4803 ug/L		99
99)	Hexachlorobutadiene	21.00	225	74847	17.8605 ug/L		98
100)	Naphthalene	21.24	128	430779	19.6082 ug/L		100
101)	1,2,3-Trichlorobenzene	21.54	180	186514	17.6088 ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146827.D 8260BWT.M Sat Apr 29 12:14:52 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146827.D Vial: 6
Acq On : 28 Apr 2017 22:10 Operator: JDS
Sample : L17041203-12 A MSD 826-SPE Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 22:32 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273191.D Vial: 19
Acq On : 30 Apr 2017 21:39 Operator: ADC
Sample : L17041203-13 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:41 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

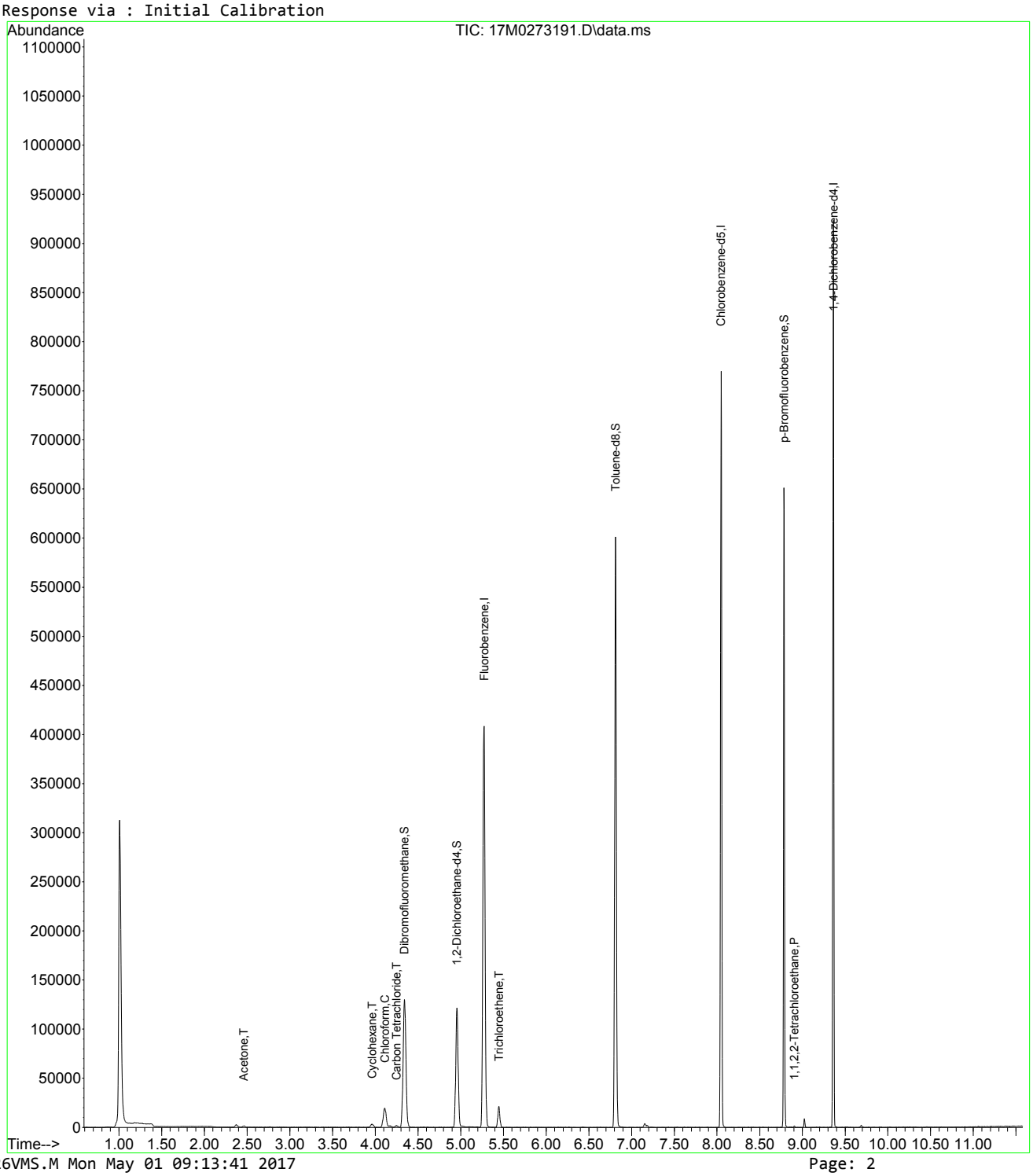
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	351468	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	260372	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	125547	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.342	111	92855	24.4627 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.851%		
34) 1,2-Dichloroethane-d4	4.953	65	89371	25.1193 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.477%		
47) Toluene-d8	6.812	98	324082	24.9404 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.762%		
66) p-Bromofluorobenzene	8.783	95	106092	25.2380 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.952%		
Target Compounds					Qvalue
16) Acetone	2.460	43	1675	2.3702 ug/L	91
25) Cyclohexane	3.963	56	2139	0.3788 ug/L #	75
27) Chloroform	4.113	83	20602	2.9761 ug/L	100
28) Carbon Tetrachloride	4.249	117	1626	0.2970 ug/L #	95
37) Trichloroethene	5.448	130	7209	1.6032 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.902	83	667	0.1975 ug/L #	81

(#) = qualifier out of range (m) = manual integration (+) = signals summed

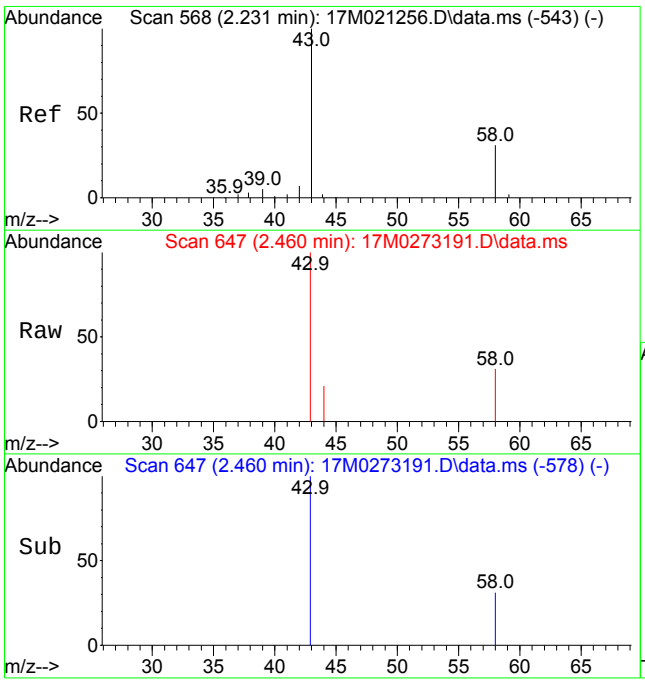
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273191.D Vial: 19
Acq On : 30 Apr 2017 21:39 Operator: ADC
Sample : L17041203-13 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:41 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



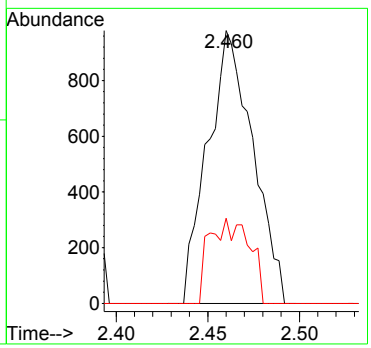
826VMS.M Mon May 01 09:13:41 2017 Page: 2

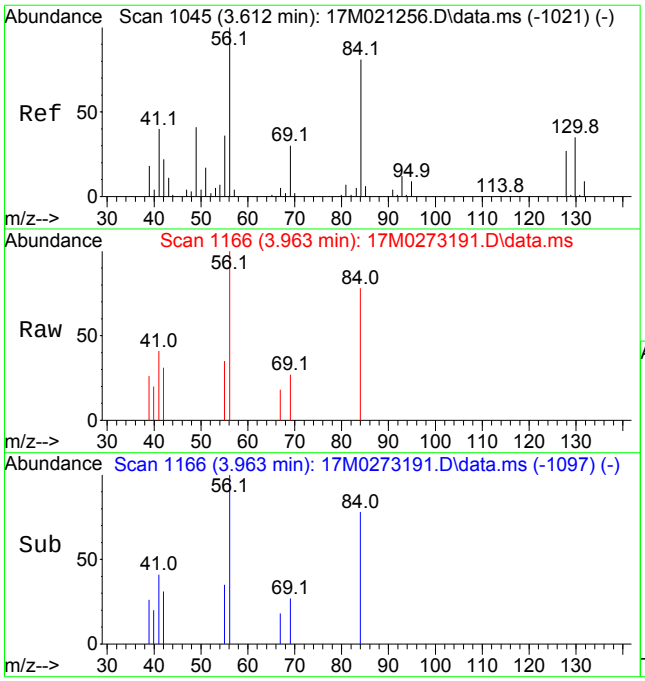


#16
Acetone
Concen: 2.3702 ug/L
RT: 2.460 min Scan# 647
Delta R.T. -0.000 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion: 43 Resp: 1675

Ion	Ratio	Lower	Upper
43	100		
58	27.5	19.4	45.2

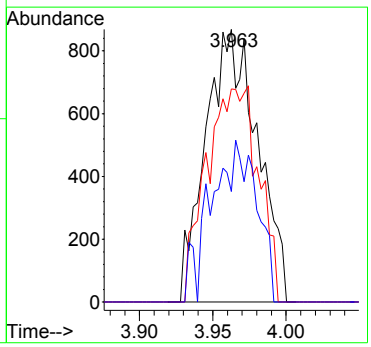


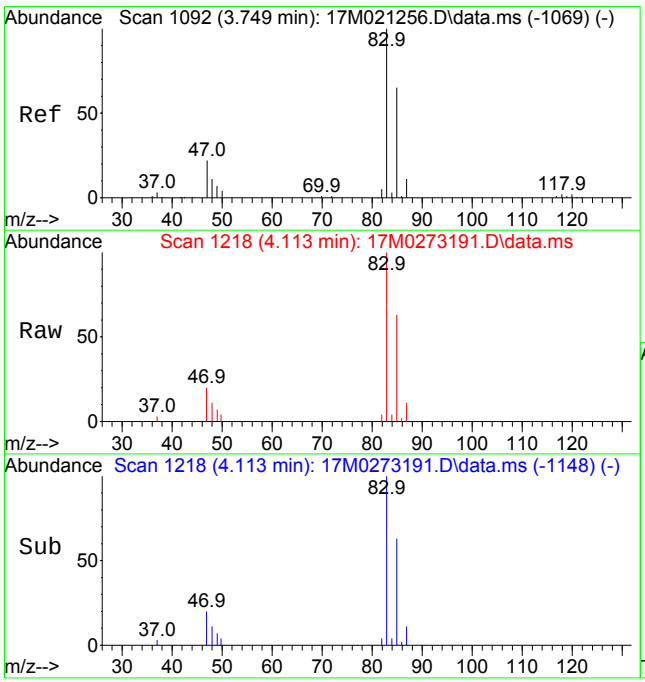


#25
Cyclohexane
Concen: 0.3788 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion: 56 Resp: 2139

Ion	Ratio	Lower	Upper
56	100		
84	79.0	69.4	104.0
41	52.3	72.2	108.2#

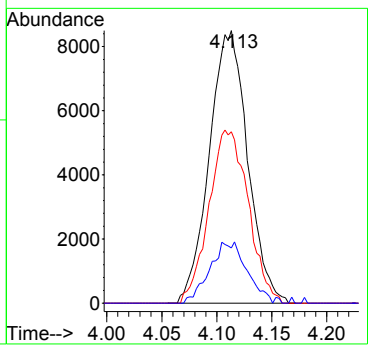


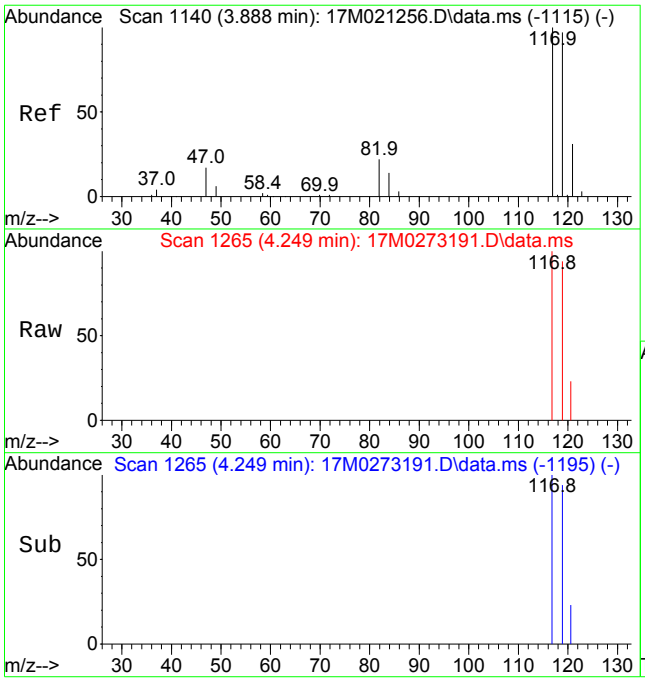


#27
Chloroform
Concen: 2.9761 ug/L
RT: 4.113 min Scan# 1218
Delta R.T. 0.003 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion: 83 Resp: 20602

Ion	Ratio	Lower	Upper
83	100		
85	65.3	39.2	91.4
47	22.0	12.9	30.1

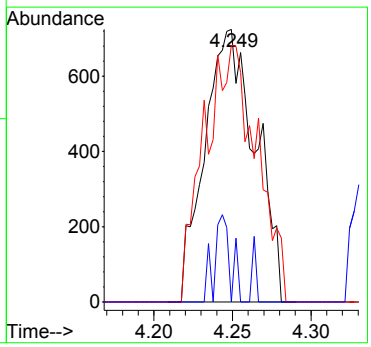


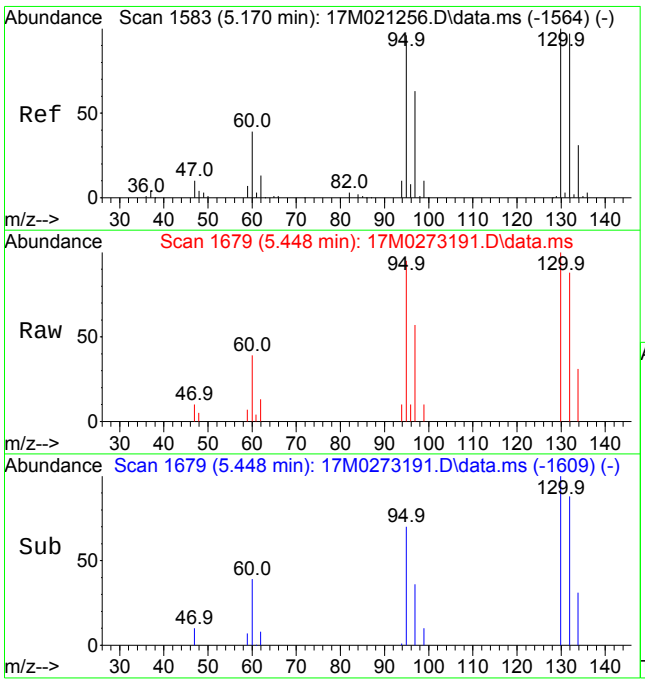


#28
Carbon Tetrachloride
Concen: 0.2970 ug/L
RT: 4.249 min Scan# 1265
Delta R.T. 0.003 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion:117 Resp: 1626

Ion	Ratio	Lower	Upper
117	100		
119	97.5	77.4	116.2
82	10.3	17.7	26.5#

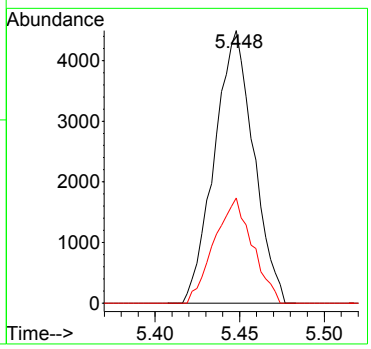


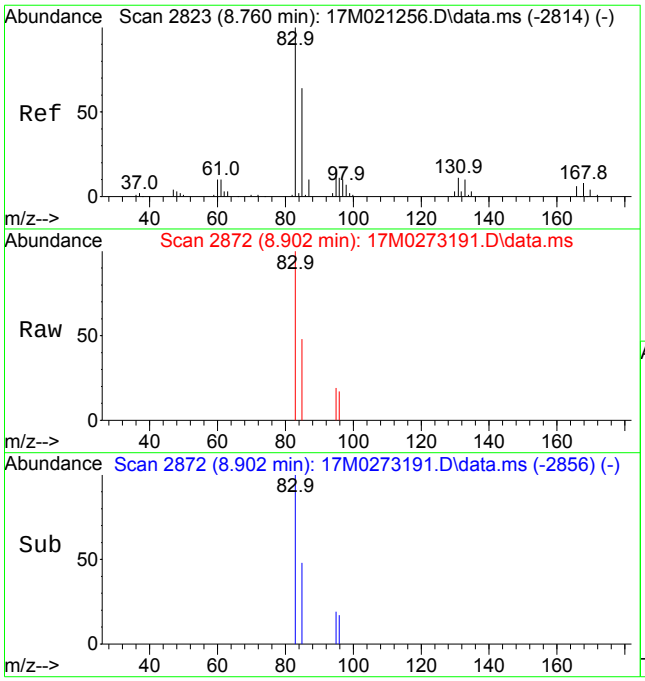


#37
Trichloroethene
Concen: 1.6032 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion:130 Resp: 7209

Ion	Ratio	Lower	Upper
130	100		
60	37.8	22.9	53.3

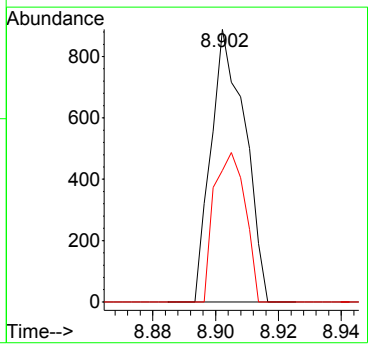




#69
1,1,2,2-Tetrachloroethane
Concen: 0.1975 ug/L
RT: 8.902 min Scan# 2872
Delta R.T. -0.003 min
Lab File: 17M0273191.D
Acq: 30 Apr 2017 21:39

Tgt Ion: 83 Resp: 667

Ion	Ratio	Lower	Upper
83	100		
85	50.2	51.9	77.9#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273192.D Vial: 20
Acq On : 30 Apr 2017 21:59 Operator: ADC
Sample : L17041203-14 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

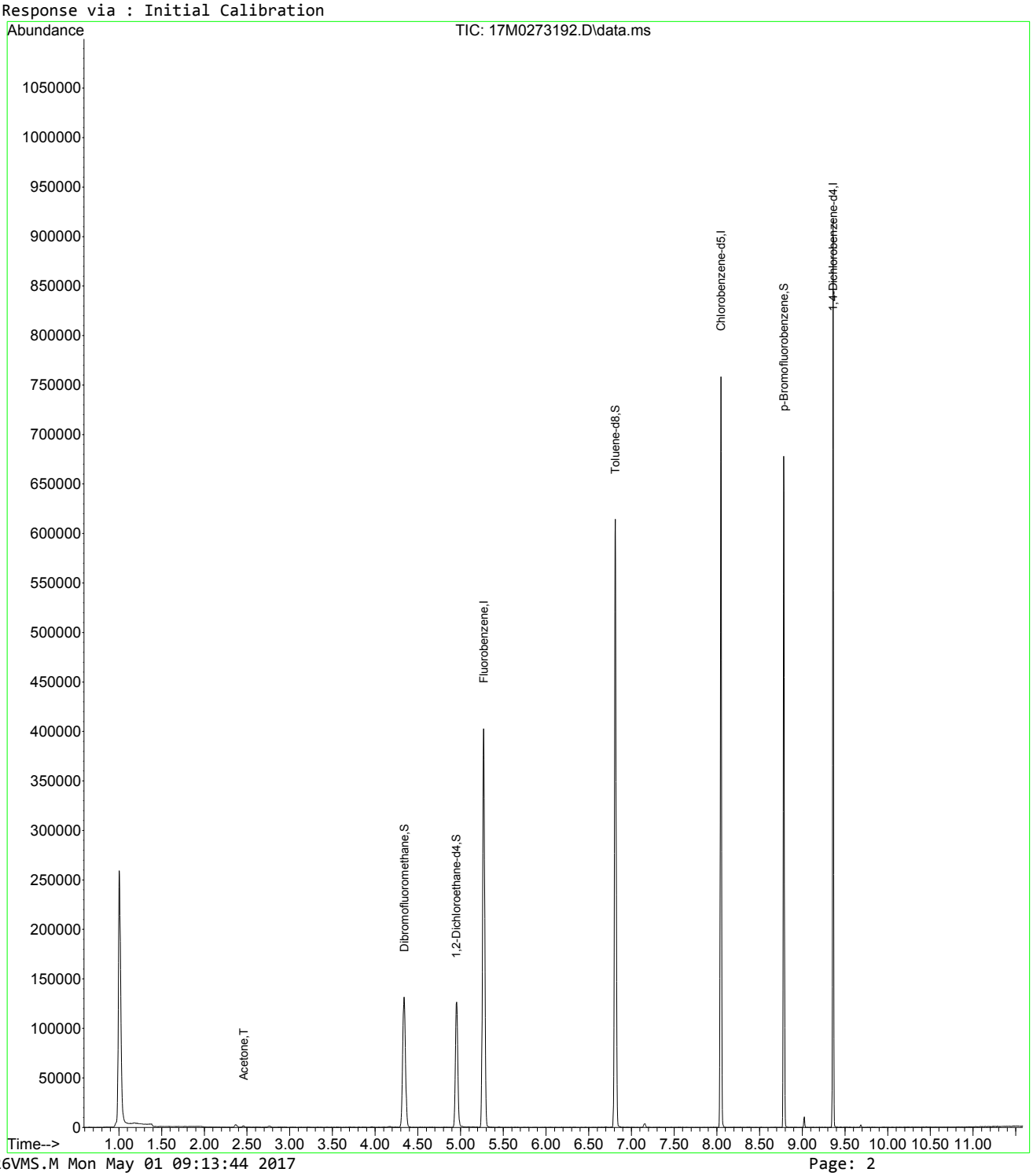
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	343643	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	251472	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	120645	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	94896	25.5697	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.279%			
34) 1,2-Dichloroethane-d4	4.950	65	92239	26.5158	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.063%			
47) Toluene-d8	6.812	98	330473	26.3323	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.329%			
66) p-Bromofluorobenzene	8.784	95	110194	27.2790	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.116%			
Target Compounds						Qvalue
16) Acetone	2.460	43	1518	2.1970	ug/L	80

(#) = qualifier out of range (m) = manual integration (+) = signals summed

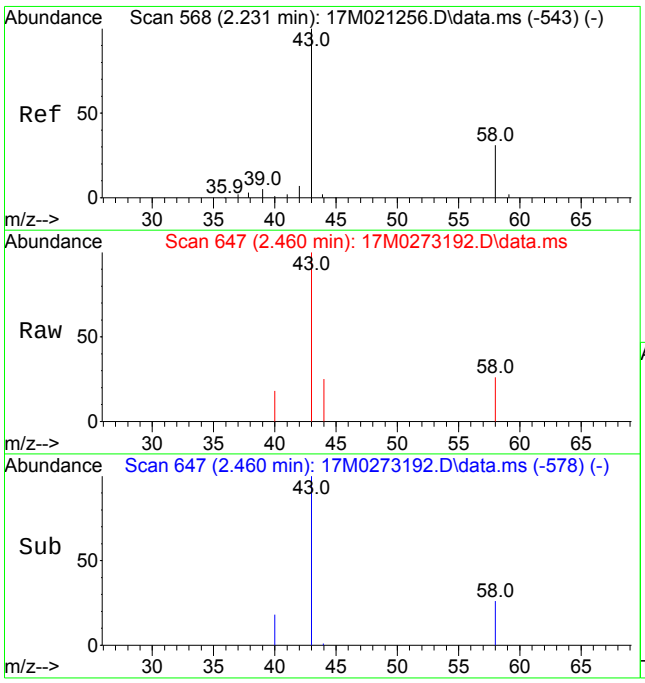
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273192.D Vial: 20
Acq On : 30 Apr 2017 21:59 Operator: ADC
Sample : L17041203-14 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:44 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



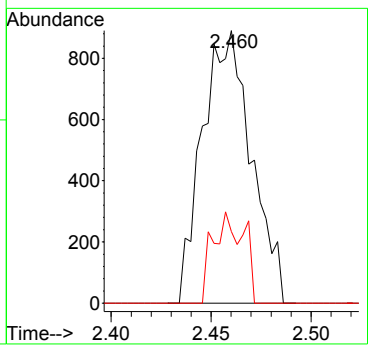
826VMS.M Mon May 01 09:13:44 2017 Page: 2



#16
Acetone
Concen: 2.1970 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273192.D
Acq: 30 Apr 2017 21:59

Tgt Ion: 43 Resp: 1518

Ion	Ratio	Lower	Upper
43	100		
58	21.0	19.4	45.2



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273193.D Vial: 21
Acq On : 30 Apr 2017 22:19 Operator: ADC
Sample : L17041203-15 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

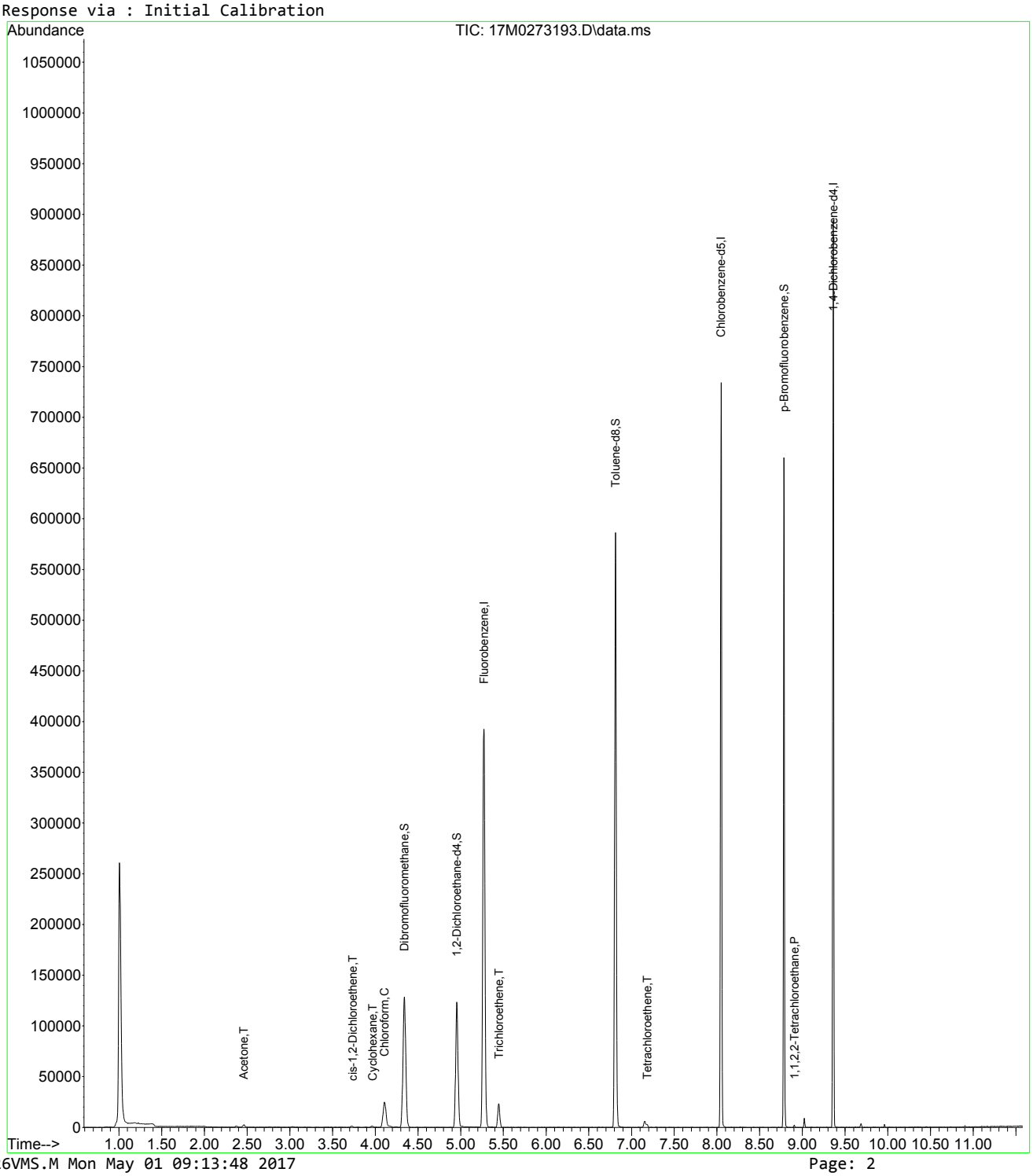
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	336762	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	248001	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	117171	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	91615	25.1900	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.760%			
34) 1,2-Dichloroethane-d4	4.953	65	89331	26.2045	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.818%			
47) Toluene-d8	6.812	98	315770	25.5129	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.052%			
66) p-Bromofluorobenzene	8.784	95	104358	26.6002	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.401%			
Target Compounds						Qvalue
16) Acetone	2.460	43	2958	4.3686	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	619	0.1544	ug/L	82
25) Cyclohexane	3.969	56	803	0.1484	ug/L #	76
27) Chloroform	4.108	83	26335	3.9704	ug/L	100
37) Trichloroethene	5.448	130	7902	1.8340	ug/L	98
49) Tetrachloroethene	7.185	166	737	0.1662	ug/L #	91
69) 1,1,2,2-Tetrachloroethane	8.905	83	883	0.2802	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

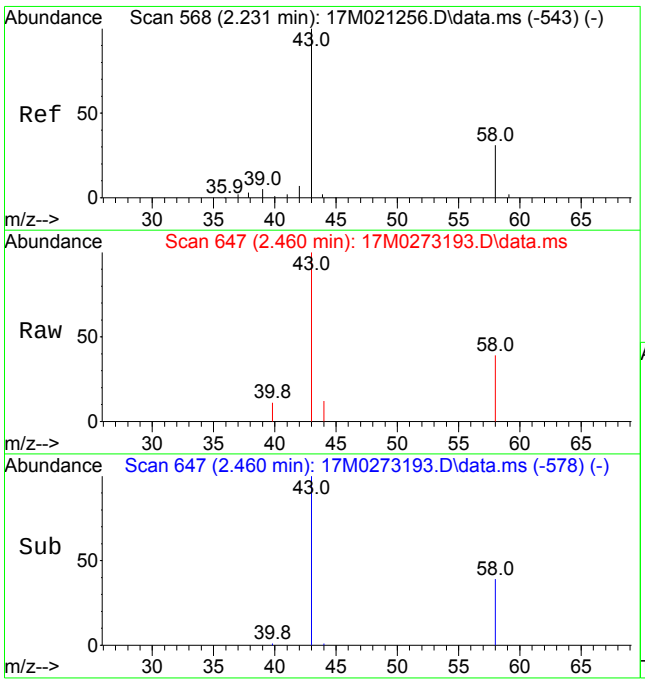
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273193.D Vial: 21
Acq On : 30 Apr 2017 22:19 Operator: ADC
Sample : L17041203-15 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:47 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



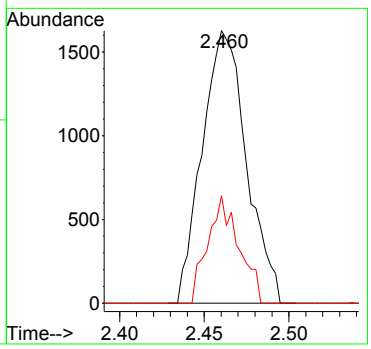
826VMS.M Mon May 01 09:13:48 2017 Page: 2

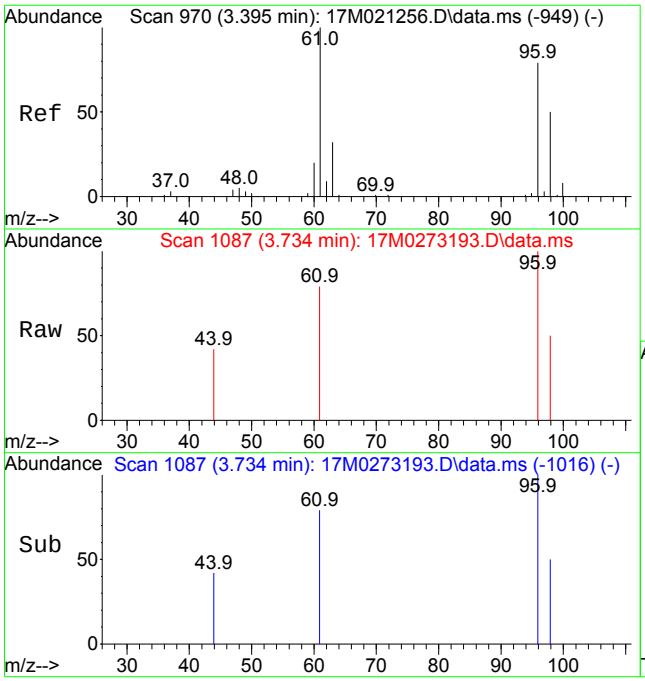


#16
Acetone
Concen: 4.3686 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion: 43 Resp: 2958

Ion	Ratio	Lower	Upper
43	100		
58	27.7	19.4	45.2

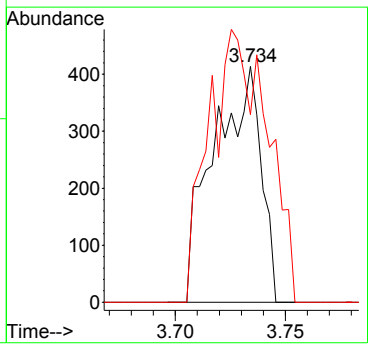


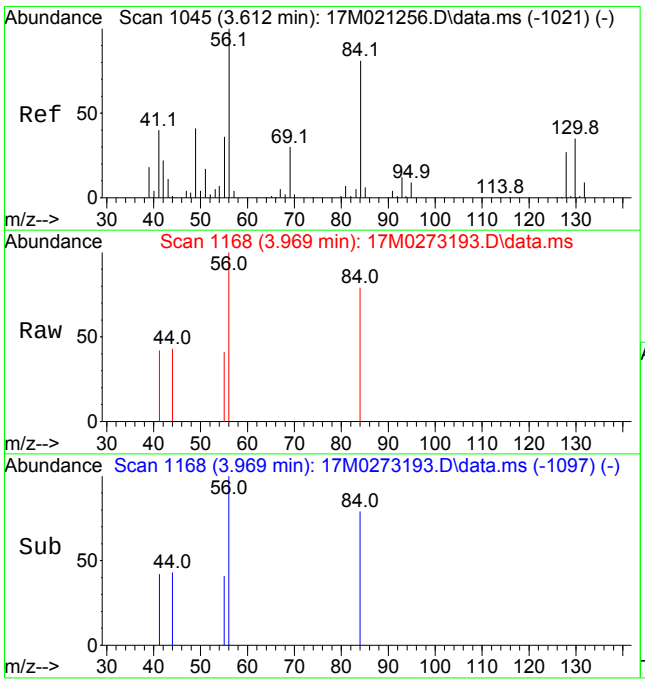


#23
cis-1,2-Dichloroethene
Concen: 0.1544 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion: 96 Resp: 619

Ion	Ratio	Lower	Upper
96	100		
61	142.8	98.1	147.1

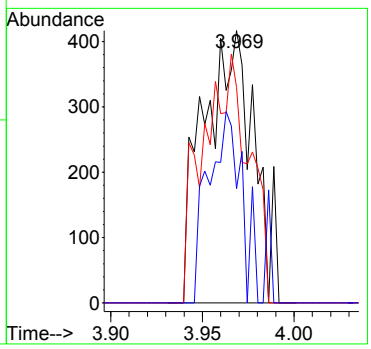


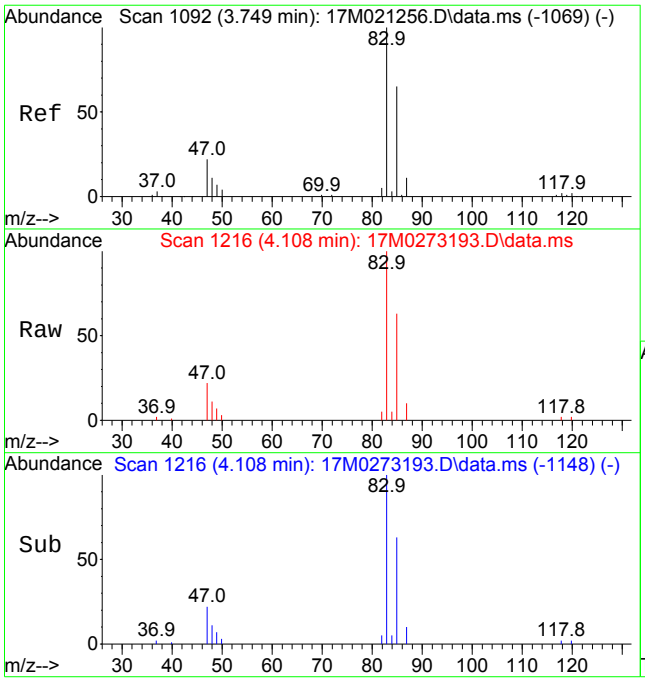


#25
Cyclohexane
Concen: 0.1484 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion: 56 Resp: 803

Ion	Ratio	Lower	Upper
56	100		
84	82.9	69.4	104.0
41	50.1	72.2	108.2#

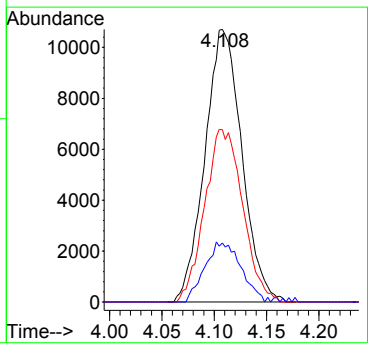


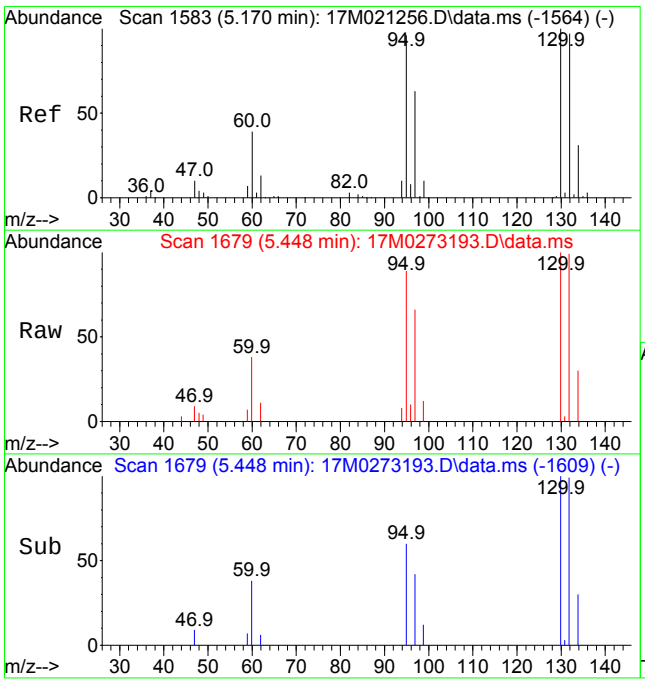


#27
Chloroform
Concen: 3.9704 ug/L
RT: 4.108 min Scan# 1216
Delta R.T. -0.002 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion: 83 Resp: 26335

Ion	Ratio	Lower	Upper
83	100		
85	65.0	39.2	91.4
47	21.5	12.9	30.1

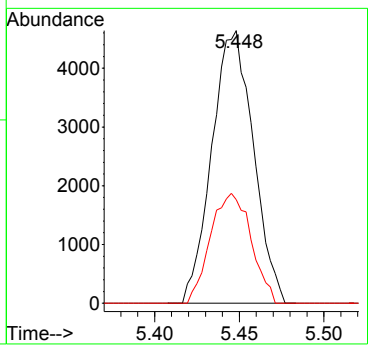


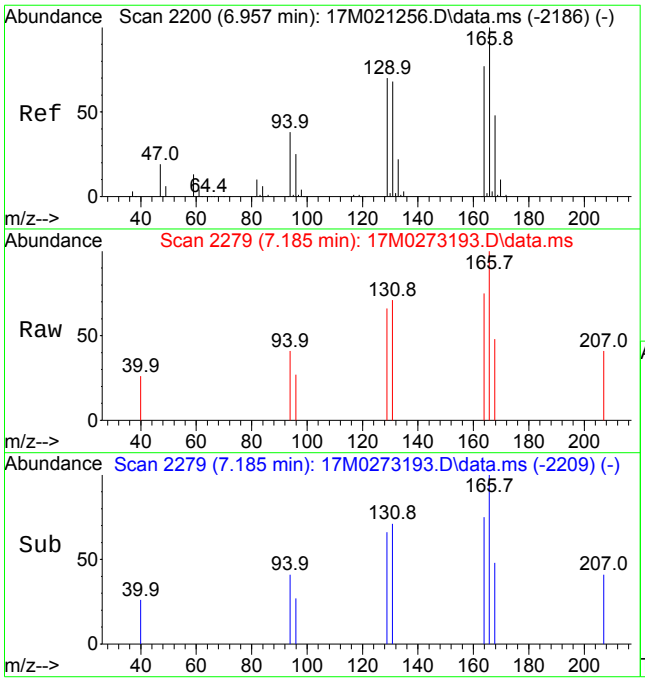


#37
Trichloroethene
Concen: 1.8340 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion:130 Resp: 7902

Ion	Ratio	Lower	Upper
130	100		
60	39.5	22.9	53.3

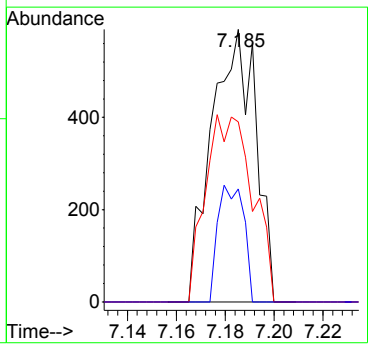


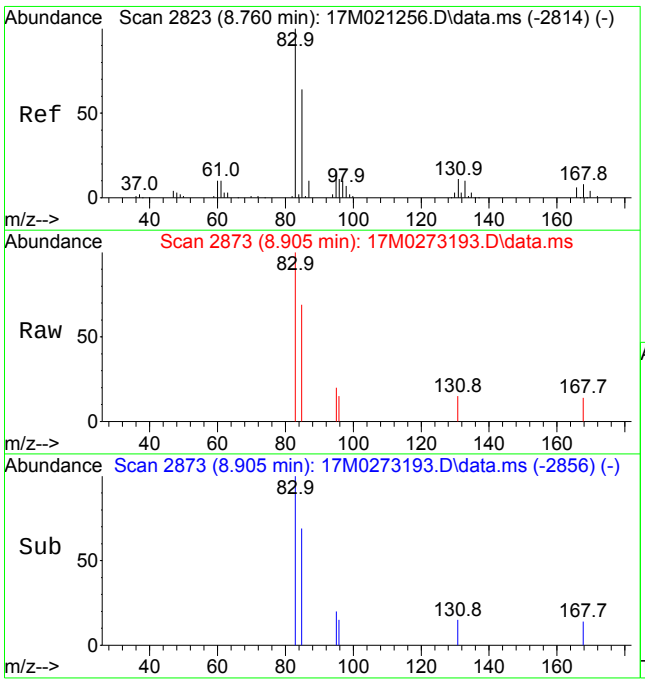


#49
Tetrachloroethene
Concen: 0.1662 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion:166 Resp: 737

Ion	Ratio	Lower	Upper
166	100		
129	73.3	56.2	84.4
94	25.1	29.7	44.5#

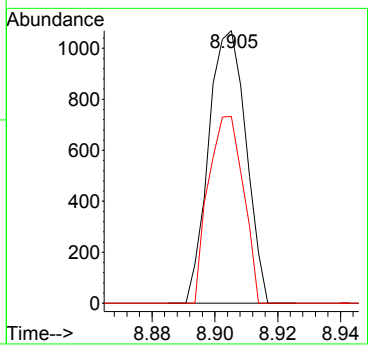




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2802 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273193.D
Acq: 30 Apr 2017 22:19

Tgt Ion: 83 Resp: 883

Ion	Ratio	Lower	Upper
83	100		
85	63.9	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273194.D Vial: 22
Acq On : 30 Apr 2017 22:39 Operator: ADC
Sample : L17041203-16 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:50 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

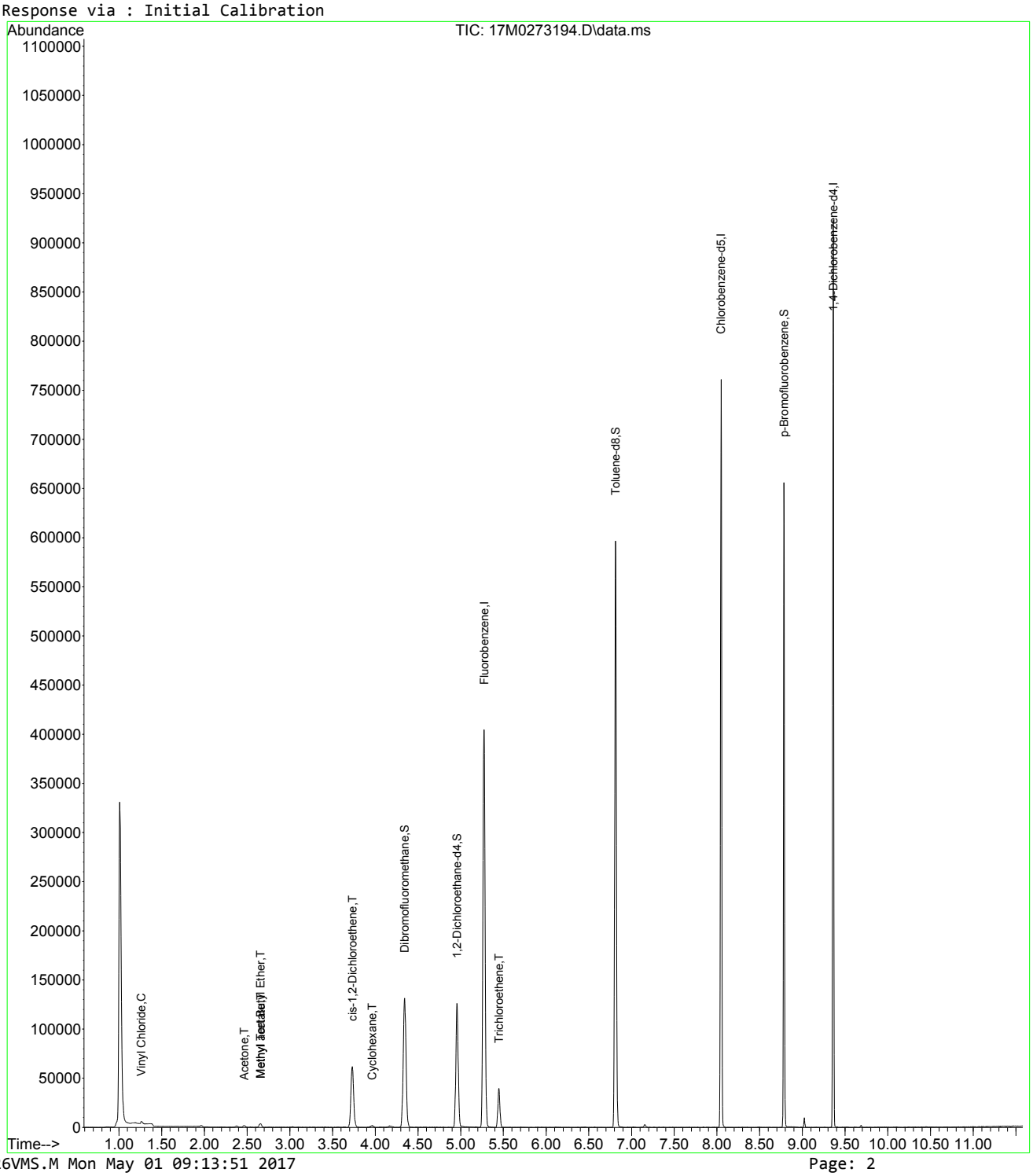
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	347288	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	253521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	122413	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	94459	25.1848	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.739%			
34) 1,2-Dichloroethane-d4	4.956	65	90518	25.7479	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.992%			
47) Toluene-d8	6.812	98	323132	25.5393	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.157%			
66) p-Bromofluorobenzene	8.783	95	105797	25.8122	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.249%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.261	62	2518	0.5634	ug/L	98
16) Acetone	2.466	43	1983	2.8399	ug/L	95
18) Methyl acetate	2.660	43	710	0.3878	ug/L #	56
19) Methyl Tert Butyl Ether	2.657	73	3929	0.4238	ug/L	99
23) cis-1,2-Dichloroethene	3.731	96	34234	8.2798	ug/L	98
25) Cyclohexane	3.963	56	1187	0.2127	ug/L #	80
37) Trichloroethene	5.448	130	12958	2.9164	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

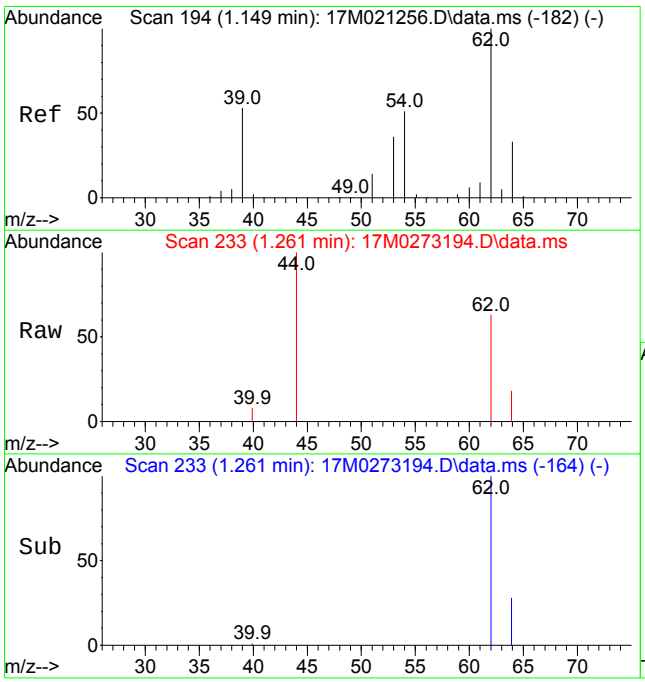
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273194.D Vial: 22
Acq On : 30 Apr 2017 22:39 Operator: ADC
Sample : L17041203-16 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:50 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



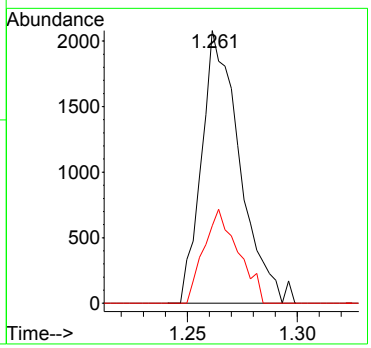
826VMS.M Mon May 01 09:13:51 2017 Page: 2

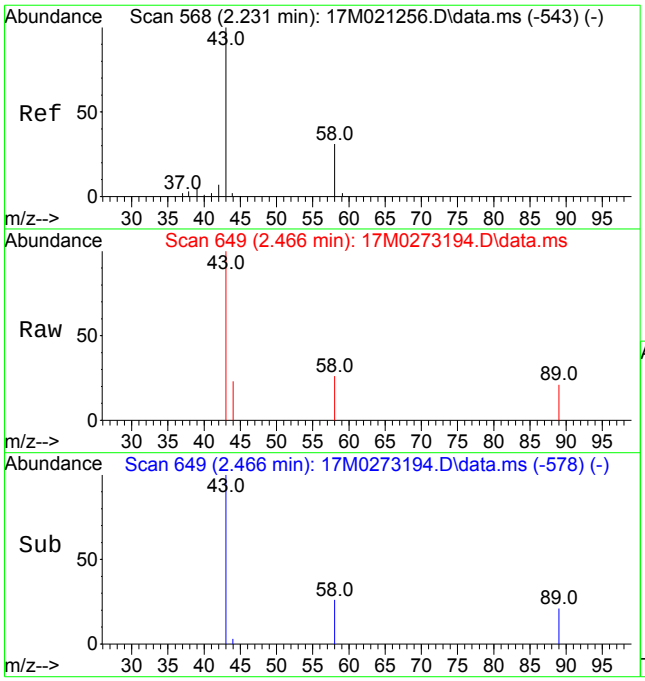


#4
Vinyl Chloride
Concen: 0.5634 ug/L
RT: 1.261 min Scan# 233
Delta R.T. 0.000 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 62 Resp: 2518

Ion	Ratio	Lower	Upper
62	100		
64	31.0	19.2	44.8

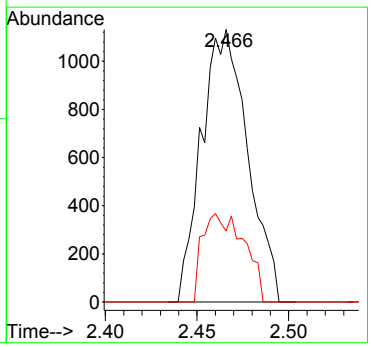


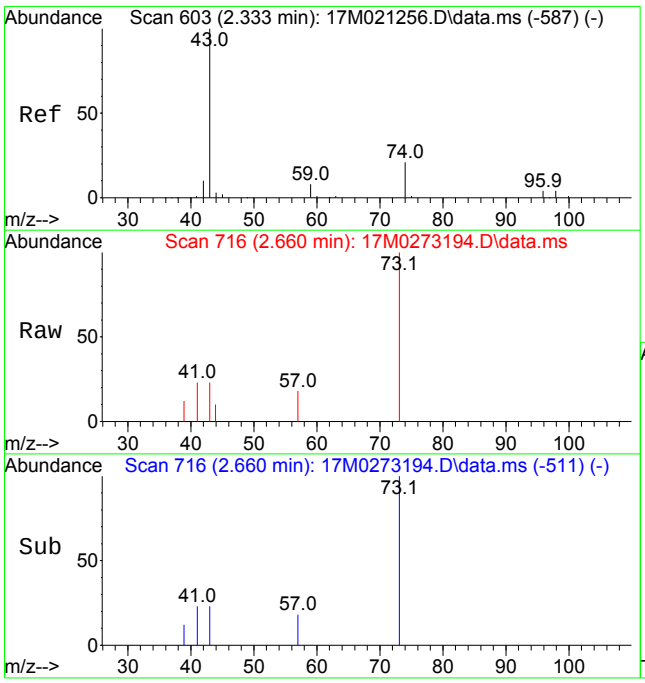


#16
Acetone
Concen: 2.8399 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 43 Resp: 1983

Ion	Ratio	Lower	Upper
43	100		
58	29.3	19.4	45.2

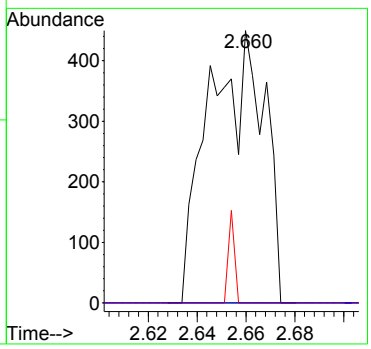


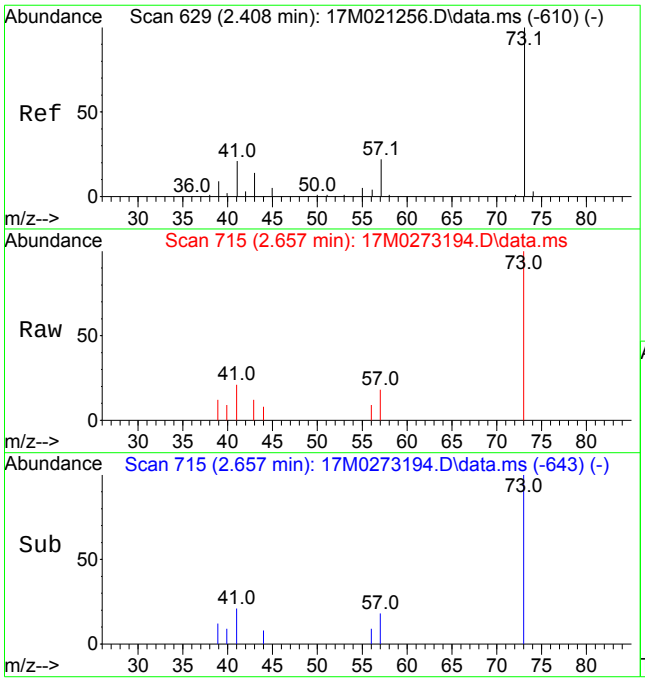


#18
Methyl acetate
Concen: 0.3878 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.093 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 43 Resp: 710

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

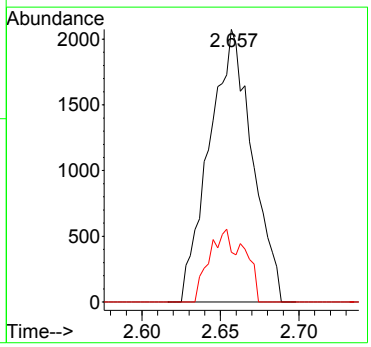


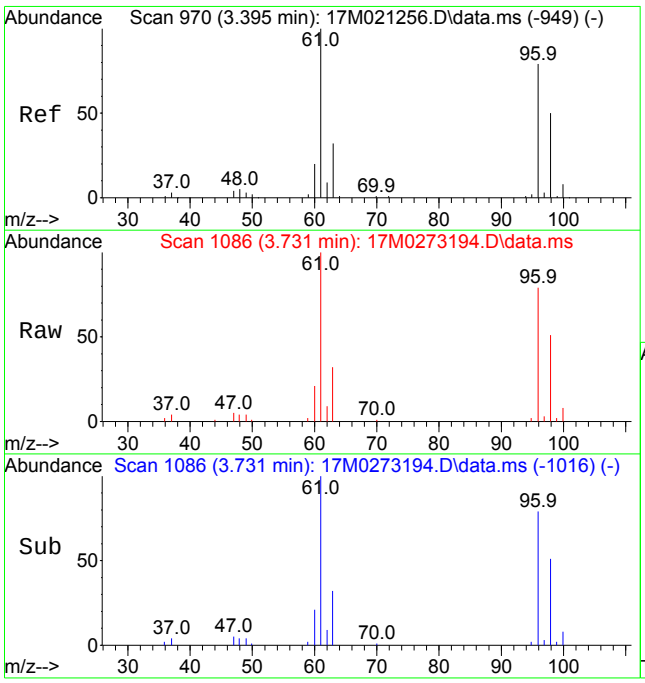


#19
Methyl Tert Butyl Ether
Concen: 0.4238 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 73 Resp: 3929

Ion	Ratio	Lower	Upper
73	100		
57	21.6	17.6	26.4

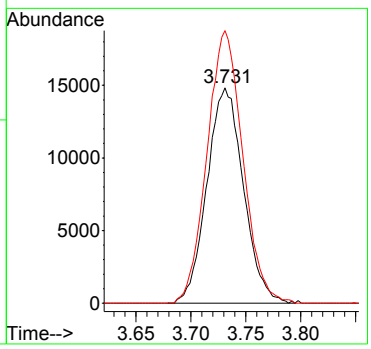


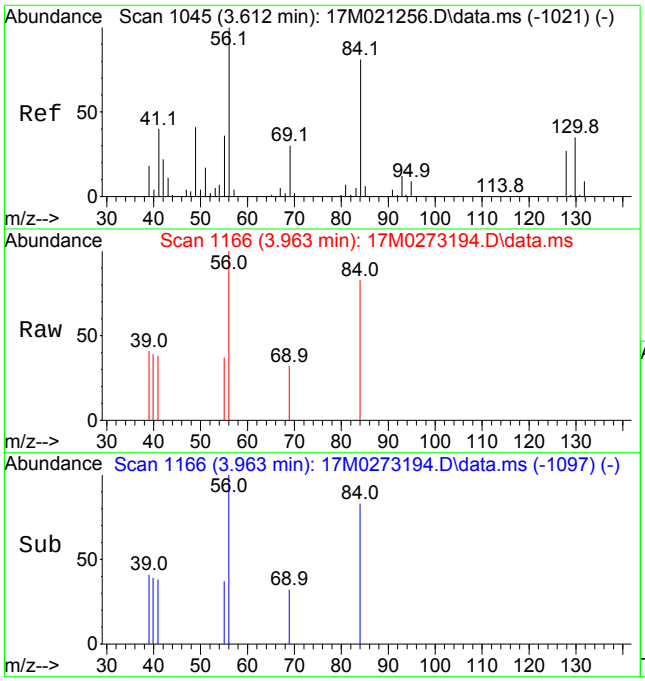


#23
cis-1,2-Dichloroethene
Concen: 8.2798 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 96 Resp: 34234

Ion	Ratio	Lower	Upper
96	100		
61	124.4	98.1	147.1

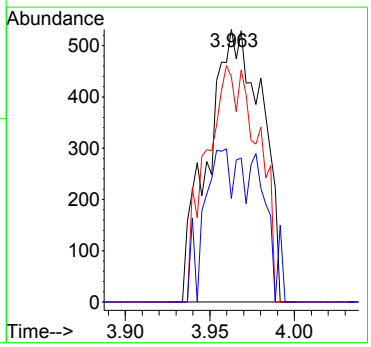


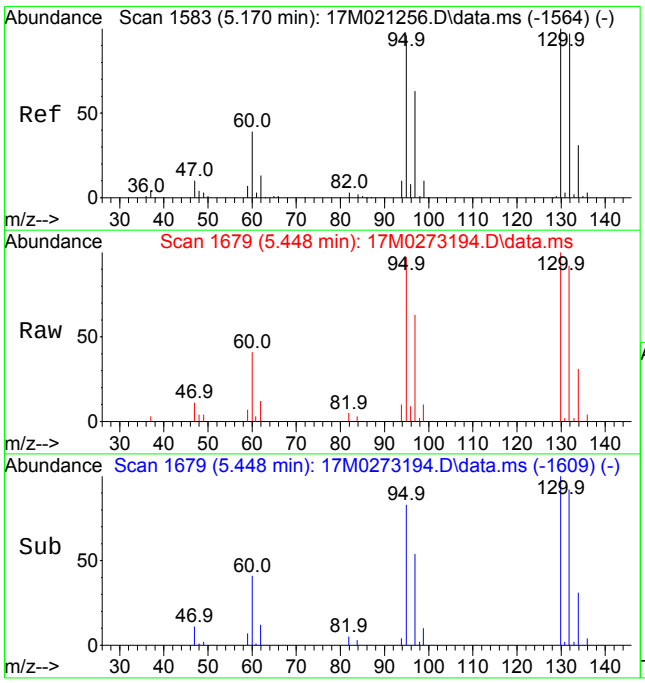


#25
Cyclohexane
Concen: 0.2127 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion: 56 Resp: 1187

Ion	Ratio	Lower	Upper
56	100		
84	82.2	69.4	104.0
41	57.4	72.2	108.2#

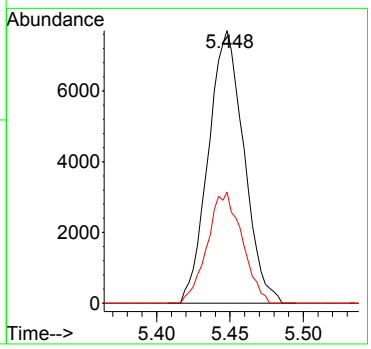




#37
Trichloroethene
Concen: 2.9164 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273194.D
Acq: 30 Apr 2017 22:39

Tgt Ion:130 Resp: 12958

Ion	Ratio	Lower	Upper
130	100		
60	39.9	22.9	53.3



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273195.D Vial: 23
Acq On : 30 Apr 2017 22:59 Operator: ADC
Sample : L17041203-17 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:53 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

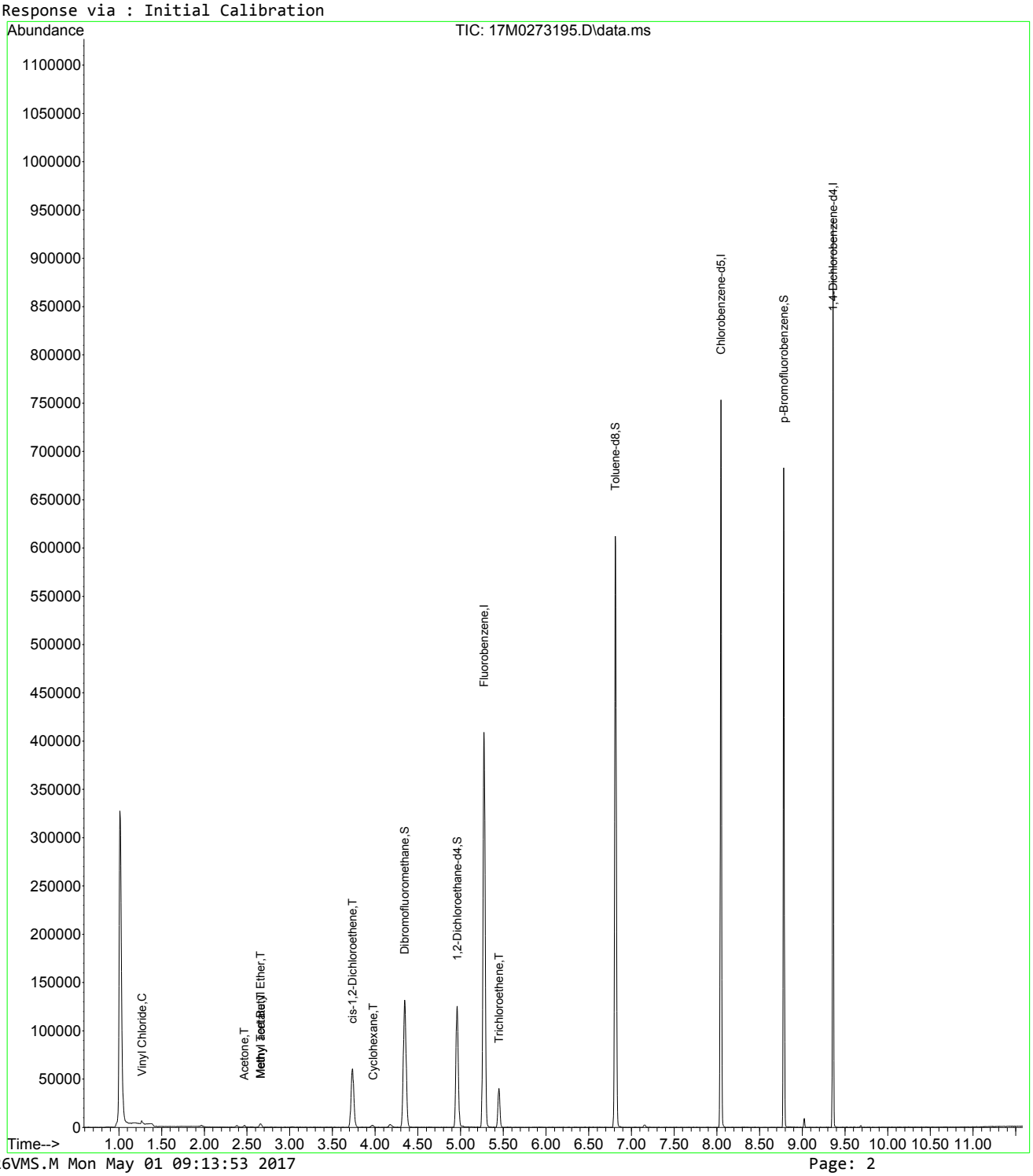
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	348615	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	255944	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	121559	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	93950	24.9537	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.815%			
34) 1,2-Dichloroethane-d4	4.959	65	91196	25.8420	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.368%			
47) Toluene-d8	6.812	98	327819	25.6645	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.658%			
66) p-Bromofluorobenzene	8.784	95	108628	26.6891	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.756%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.270	62	2466	0.5496	ug/L	99
16) Acetone	2.466	43	1636	2.3340	ug/L	86
18) Methyl acetate	2.660	43	784	0.4266	ug/L #	56
19) Methyl Tert Butyl Ether	2.657	73	3853	0.4141	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	33824	8.1495	ug/L	98
25) Cyclohexane	3.974	56	1444	0.2578	ug/L #	71
37) Trichloroethene	5.448	130	12956	2.9048	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

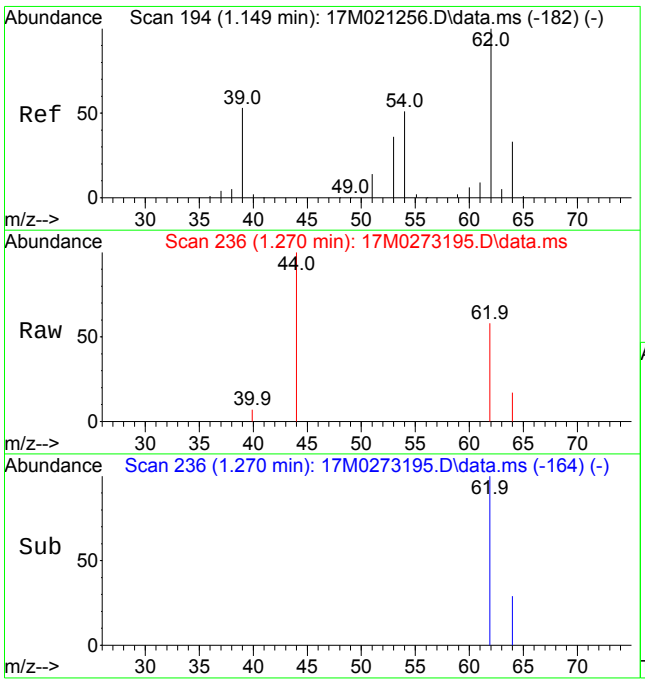
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273195.D Vial: 23
Acq On : 30 Apr 2017 22:59 Operator: ADC
Sample : L17041203-17 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:53 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



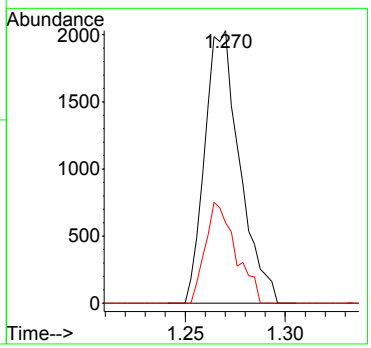
826VMS.M Mon May 01 09:13:53 2017 Page: 2

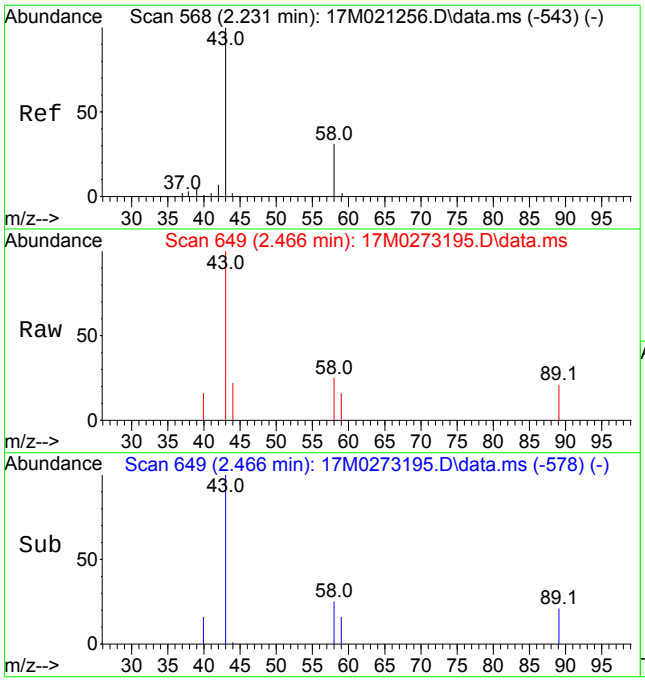


#4
Vinyl Chloride
Concen: 0.5496 ug/L
RT: 1.270 min Scan# 236
Delta R.T. 0.009 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 62 Resp: 2466

Ion	Ratio	Lower	Upper
62	100		
64	32.3	19.2	44.8

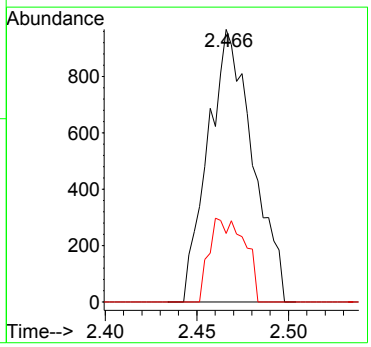


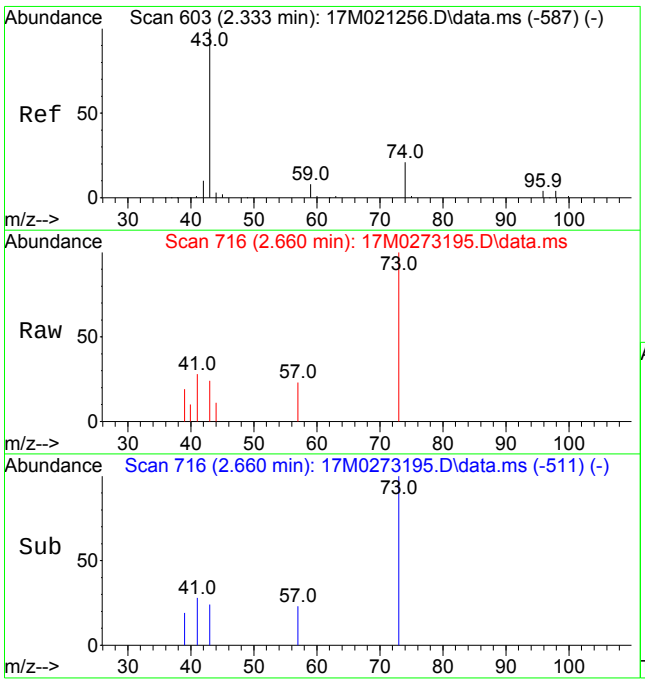


#16
Acetone
Concen: 2.3340 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 43 Resp: 1636

Ion	Ratio	Lower	Upper
43	100		
58	24.4	19.4	45.2

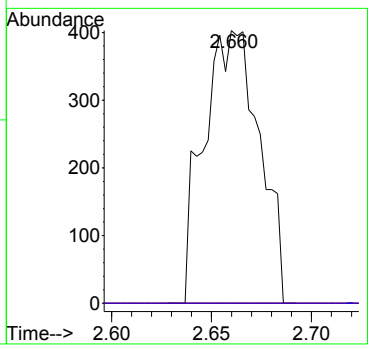


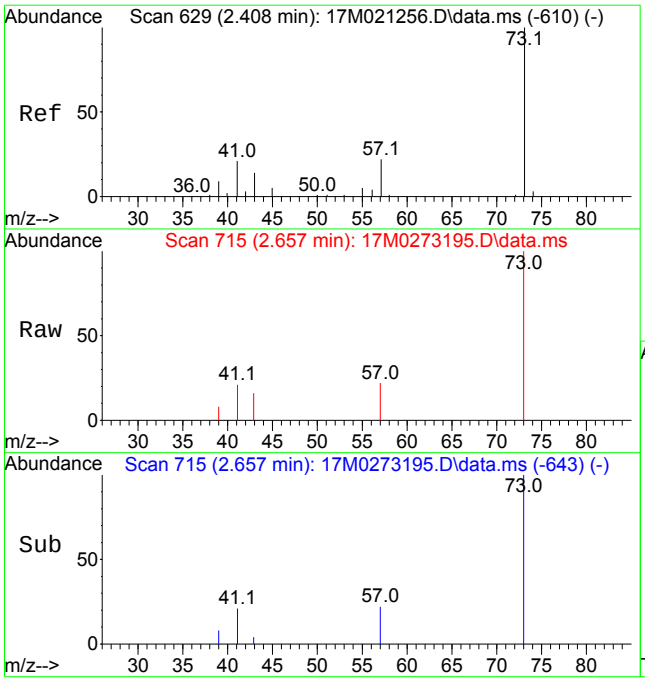


#18
Methyl acetate
Concen: 0.4266 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.093 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 43 Resp: 784

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

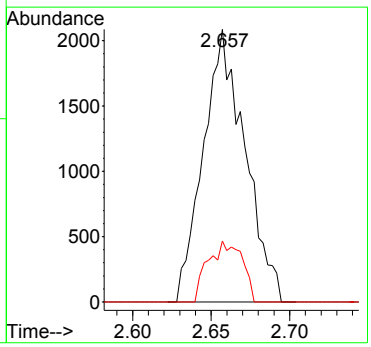


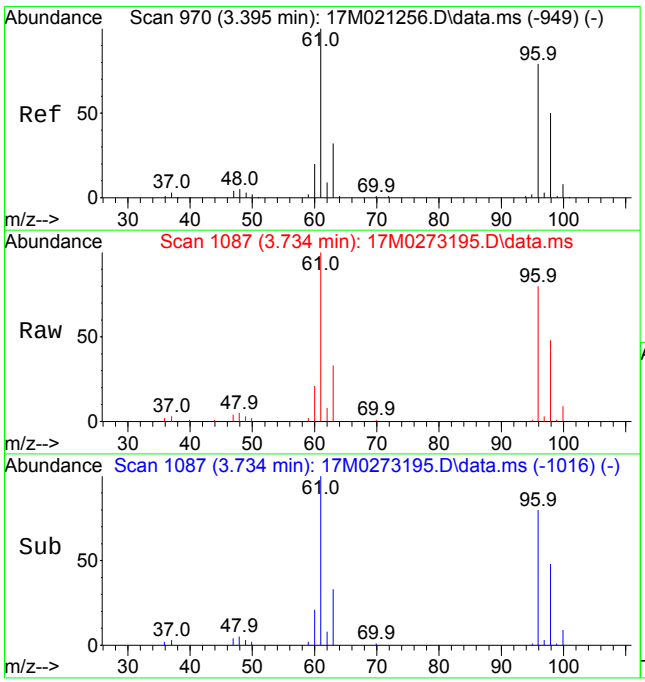


#19
Methyl Tert Butyl Ether
Concen: 0.4141 ug/L
RT: 2.657 min Scan# 715
Delta R.T. 0.009 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 73 Resp: 3853

Ion	Ratio	Lower	Upper
73	100		
57	18.1	17.6	26.4

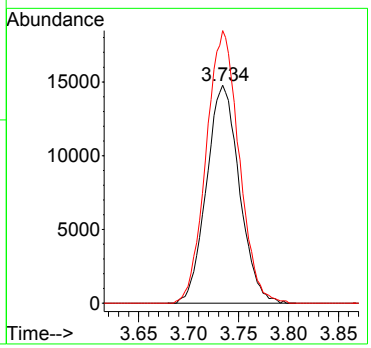


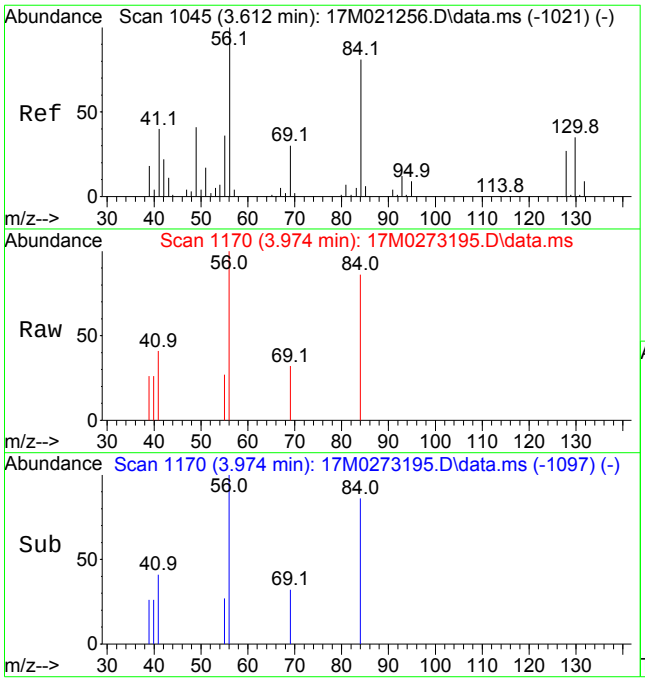


#23
cis-1,2-Dichloroethene
Concen: 8.1495 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 96 Resp: 33824

Ion	Ratio	Lower	Upper
96	100		
61	125.2	98.1	147.1

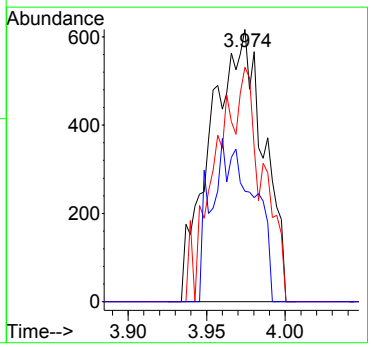


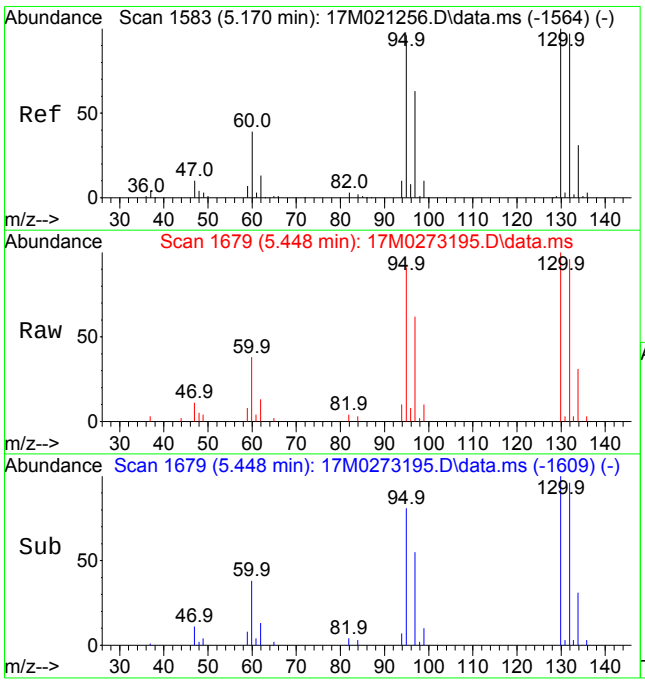


#25
Cyclohexane
Concen: 0.2578 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion: 56 Resp: 1444

Ion	Ratio	Lower	Upper
56	100		
84	76.5	69.4	104.0
41	47.3	72.2	108.2#

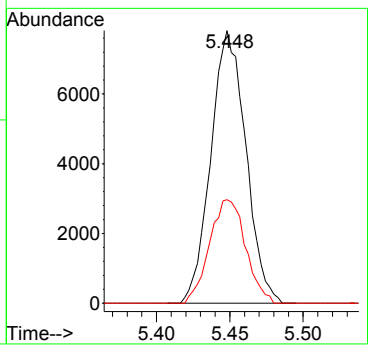




#37
Trichloroethene
Concen: 2.9048 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273195.D
Acq: 30 Apr 2017 22:59

Tgt Ion:130 Resp: 12956

Ion	Ratio	Lower	Upper
130	100		
60	39.2	22.9	53.3



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273196.D Vial: 24
Acq On : 30 Apr 2017 23:19 Operator: ADC
Sample : L17041203-18 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

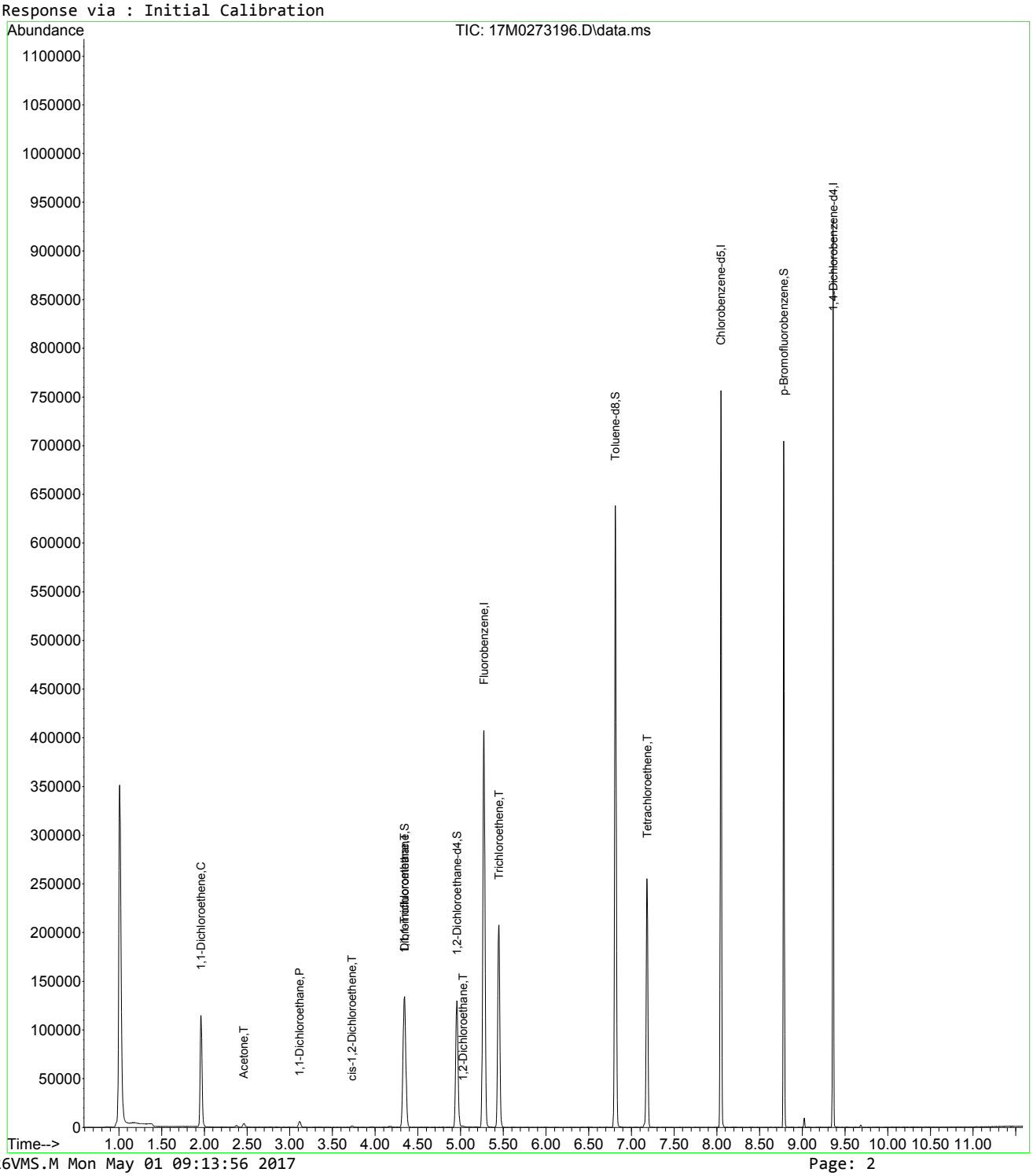
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	350410	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	258262	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	123290	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	95905	25.3425	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.370%			
34) 1,2-Dichloroethane-d4	4.956	65	93196	26.2735	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.094%			
47) Toluene-d8	6.812	98	335603	26.0380	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.152%			
66) p-Bromofluorobenzene	8.783	95	112444	27.2388	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.955%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.962	61	59265	10.9492	ug/L	98
16) Acetone	2.460	43	4844	6.8753	ug/L	92
20) 1,1-Dichloroethane	3.114	63	6573	0.9930	ug/L	100
23) cis-1,2-Dichloroethene	3.728	96	815	0.1954	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	1836	0.3026	ug/L	97
35) 1,2-Dichloroethane	5.028	62	605	0.1302	ug/L #	1
37) Trichloroethene	5.448	130	67050	14.9559	ug/L	98
49) Tetrachloroethene	7.185	166	61595	13.3373	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

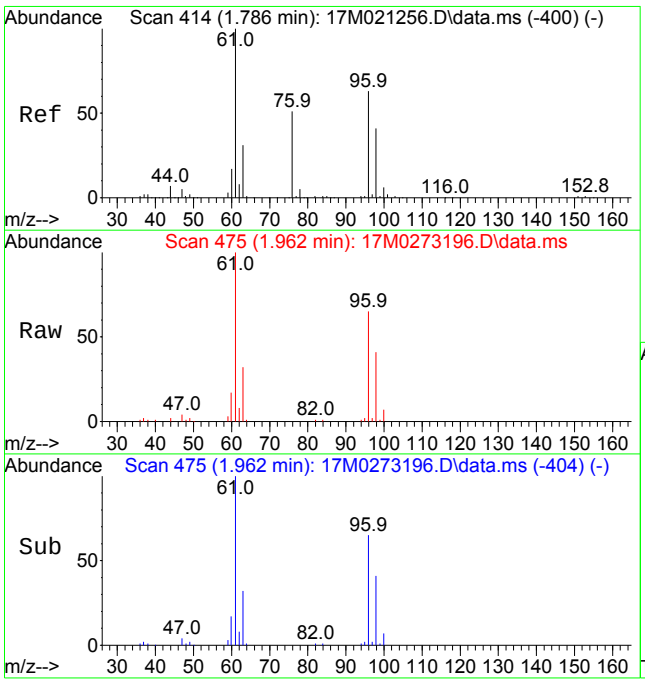
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273196.D Vial: 24
Acq On : 30 Apr 2017 23:19 Operator: ADC
Sample : L17041203-18 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:56 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



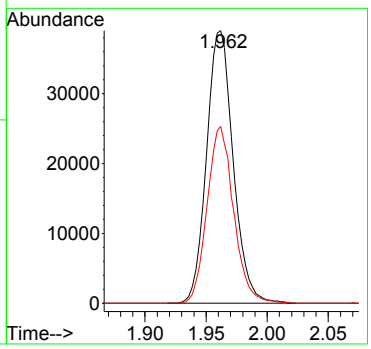
826VMS.M Mon May 01 09:13:56 2017 Page: 2

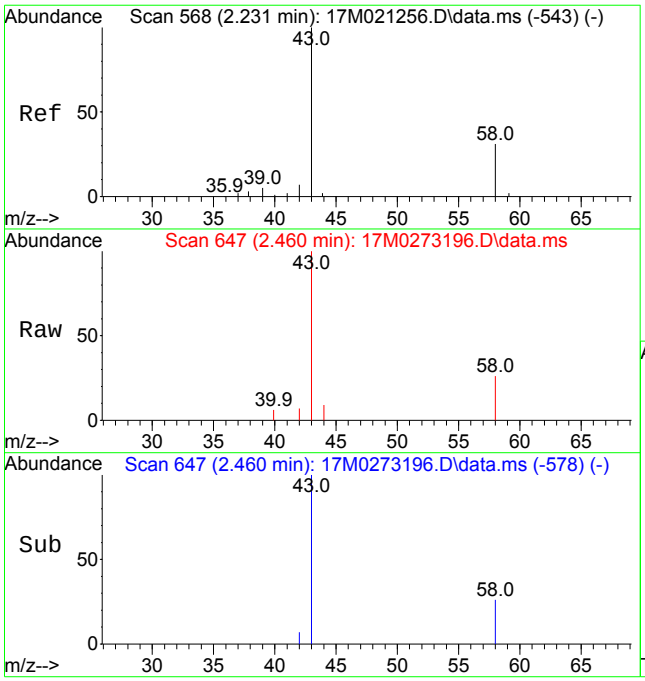


#10
1,1-Dichloroethene
Concen: 10.9492 ug/L
RT: 1.962 min Scan# 475
Delta R.T. 0.006 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 61 Resp: 59265

Ion	Ratio	Lower	Upper
61	100		
96	64.4	52.9	79.3

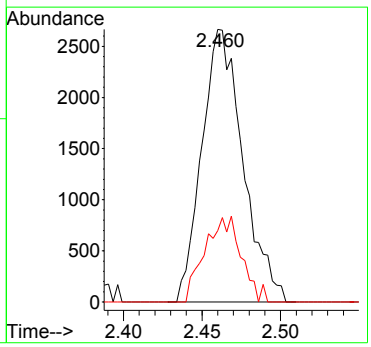


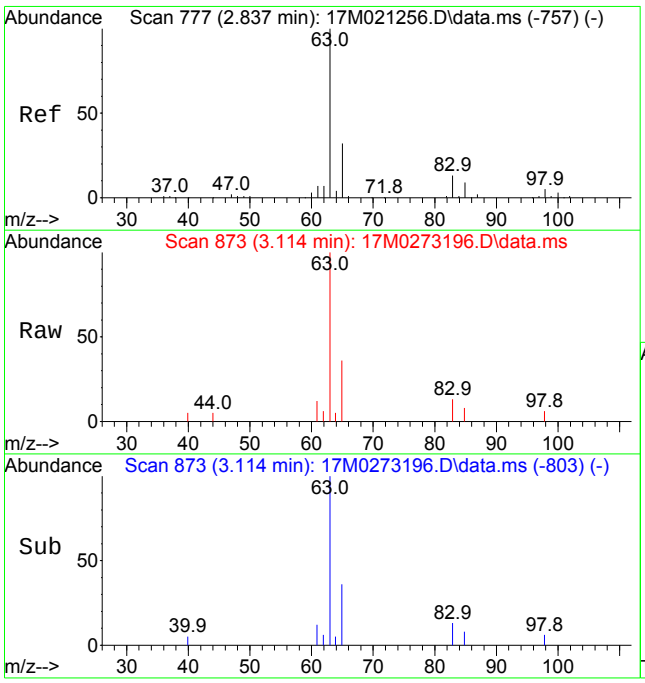


#16
Acetone
Concen: 6.8753 ug/L
RT: 2.460 min Scan# 647
Delta R.T. -0.000 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 43 Resp: 4844

Ion	Ratio	Lower	Upper
43	100		
58	27.8	19.4	45.2

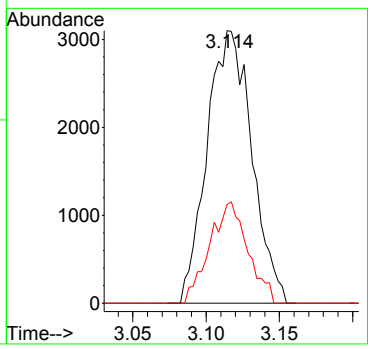


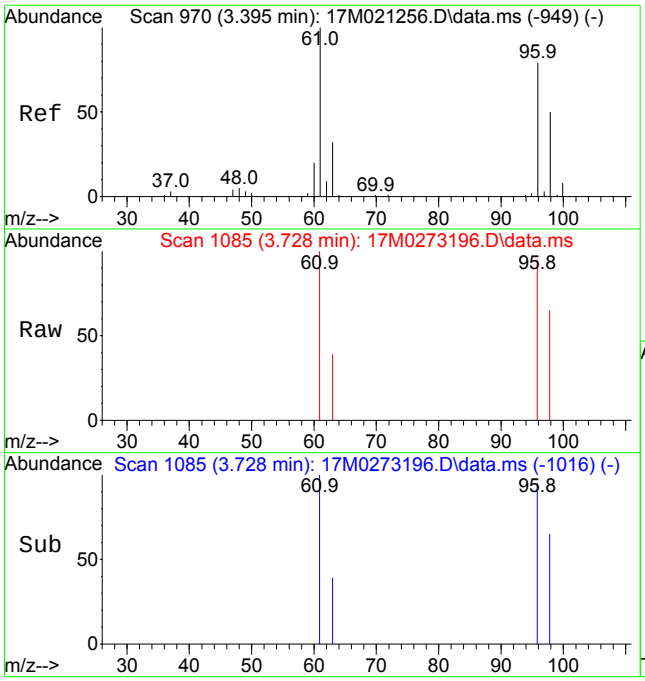


#20
1,1-Dichloroethane
Concen: 0.9930 ug/L
RT: 3.114 min Scan# 873
Delta R.T. 0.003 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 63 Resp: 6573

Ion	Ratio	Lower	Upper
63	100		
65	31.7	25.4	38.2

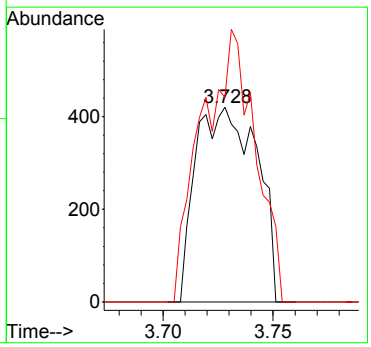


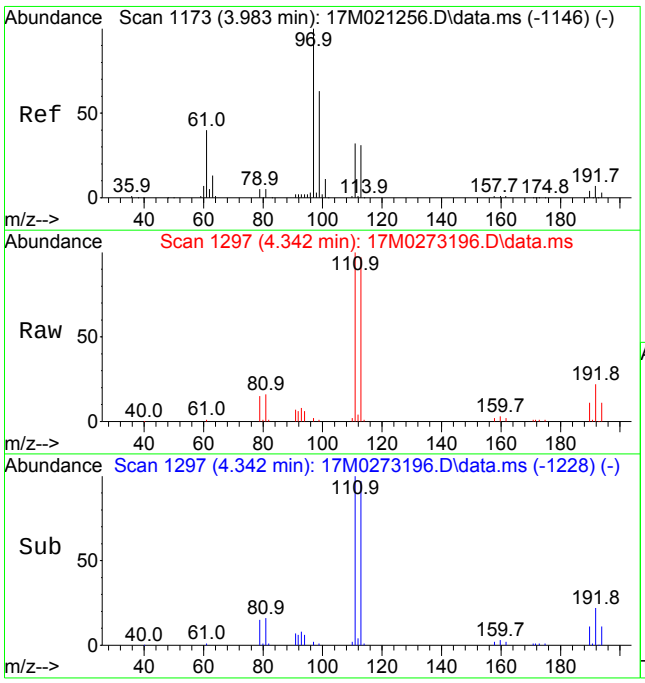


#23
cis-1,2-Dichloroethene
Concen: 0.1954 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 96 Resp: 815

Ion	Ratio	Lower	Upper
96	100		
61	122.2	98.1	147.1

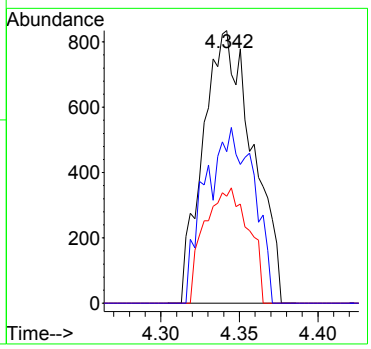


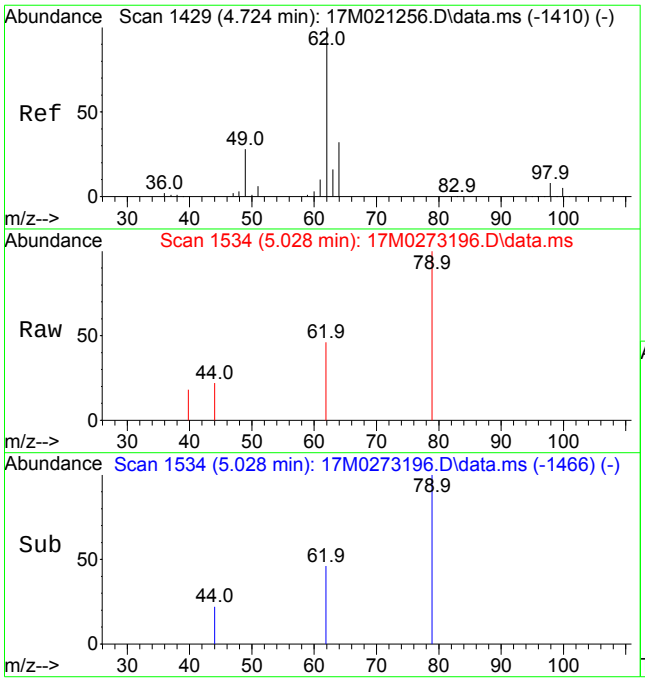


#30
1,1,1-Trichloroethane
Concen: 0.3026 ug/L
RT: 4.342 min Scan# 1297
Delta R.T. -0.000 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 97 Resp: 1836

Ion	Ratio	Lower	Upper
97	100		
61	37.4	24.1	56.3
99	62.9	51.8	77.6

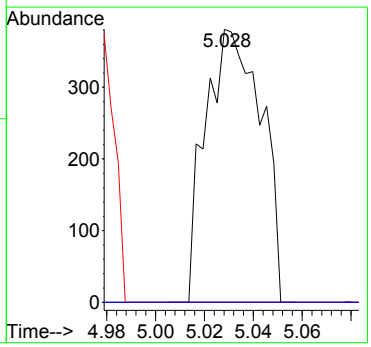


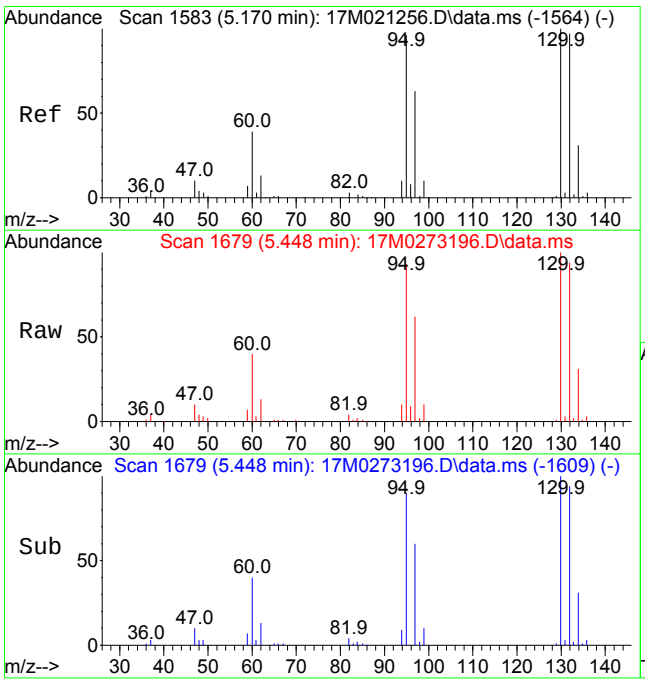


#35
1,2-Dichloroethane
Concen: 0.1302 ug/L
RT: 5.028 min Scan# 1534
Delta R.T. -0.003 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion: 62 Resp: 605

Ion	Ratio	Lower	Upper
62	100		
49	550.9	15.9	37.1#
98	0.0	5.2	12.0#

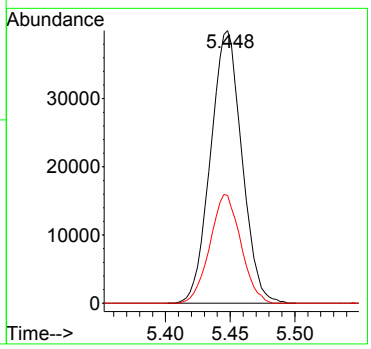


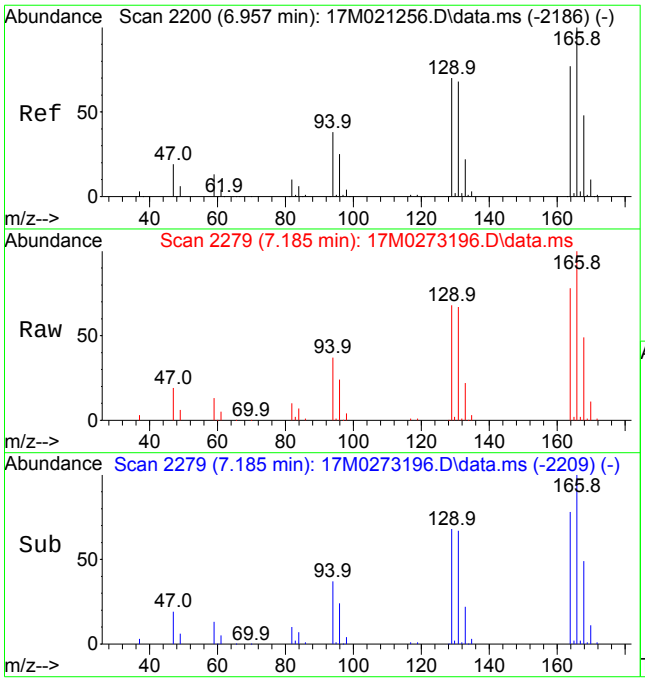


#37
Trichloroethene
Concen: 14.9559 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion:130 Resp: 67050

Ion	Ratio	Lower	Upper
130	100		
60	39.4	22.9	53.3

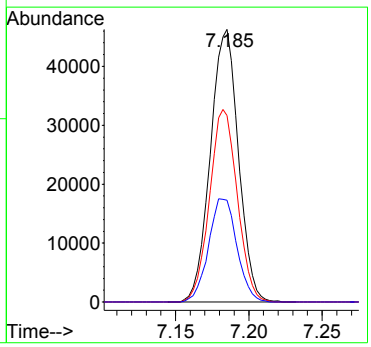




#49
Tetrachloroethene
Concen: 13.3373 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273196.D
Acq: 30 Apr 2017 23:19

Tgt Ion:166 Resp: 61595

Ion	Ratio	Lower	Upper
166	100		
129	69.9	56.2	84.4
94	38.3	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273188.D Vial: 16
Acq On : 30 Apr 2017 20:33 Operator: ADC
Sample : L17041203-19 A RS 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:32 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

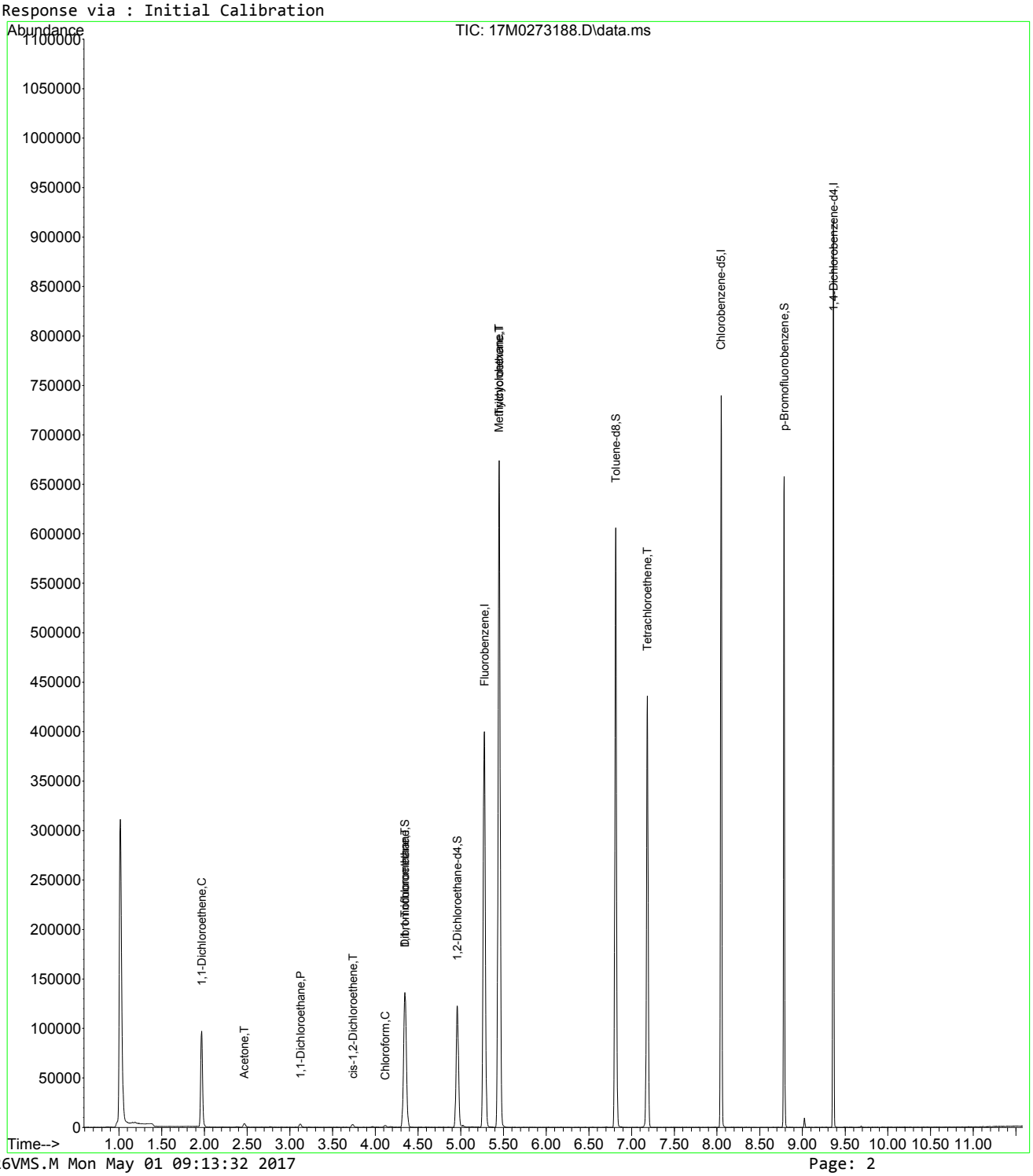
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	342833	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	253433	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	121131	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	93604	25.2811	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.124%			
34) 1,2-Dichloroethane-d4	4.959	65	89527	25.7970	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.188%			
47) Toluene-d8	6.815	98	321915	25.4520	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.808%			
66) p-Bromofluorobenzene	8.786	95	107374	26.4742	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.897%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.968	61	50299	9.4981	ug/L	96
16) Acetone	2.466	43	5006	7.2623	ug/L	94
20) 1,1-Dichloroethane	3.126	63	4096	0.6324	ug/L	97
23) cis-1,2-Dichloroethene	3.737	96	1581	0.3873	ug/L	88
27) Chloroform	4.116	83	2251	0.3334	ug/L #	93
30) 1,1,1-Trichloroethane	4.348	97	4850	0.8170	ug/L	98
36) Methylcyclohexane	5.448	83	2318	0.4016	ug/L #	1
37) Trichloroethene	5.451	130	215301	49.0857	ug/L	98
49) Tetrachloroethene	7.185	166	102155	22.5412	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

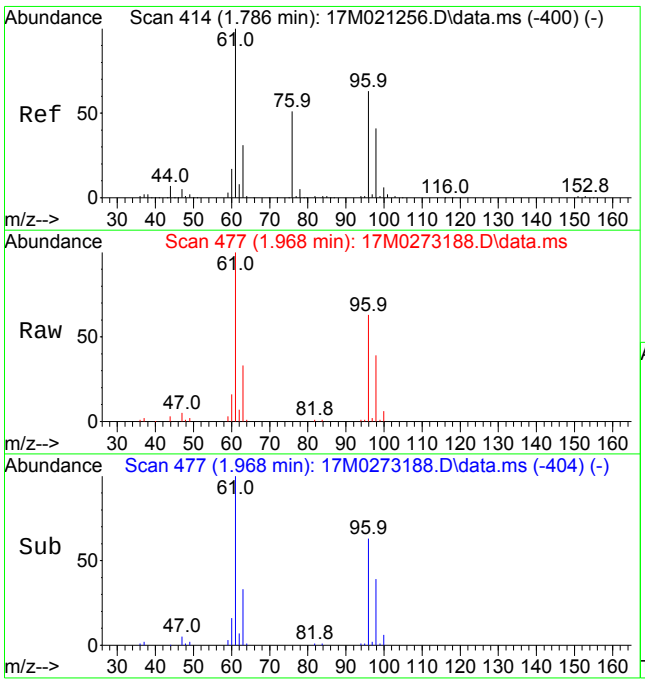
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273188.D Vial: 16
Acq On : 30 Apr 2017 20:33 Operator: ADC
Sample : L17041203-19 A RS 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:32 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



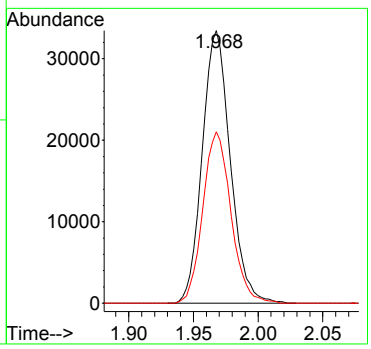
826VMS.M Mon May 01 09:13:32 2017 Page: 2

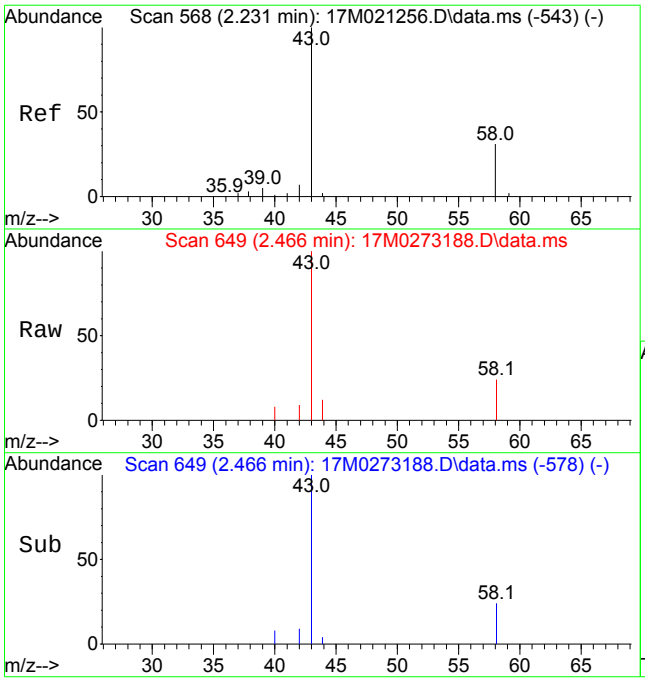


#10
1,1-Dichloroethene
Concen: 9.4981 ug/L
RT: 1.968 min Scan# 477
Delta R.T. 0.012 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 61 Resp: 50299

Ion	Ratio	Lower	Upper
61	100		
96	63.1	52.9	79.3

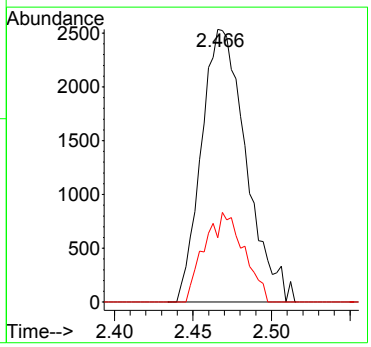


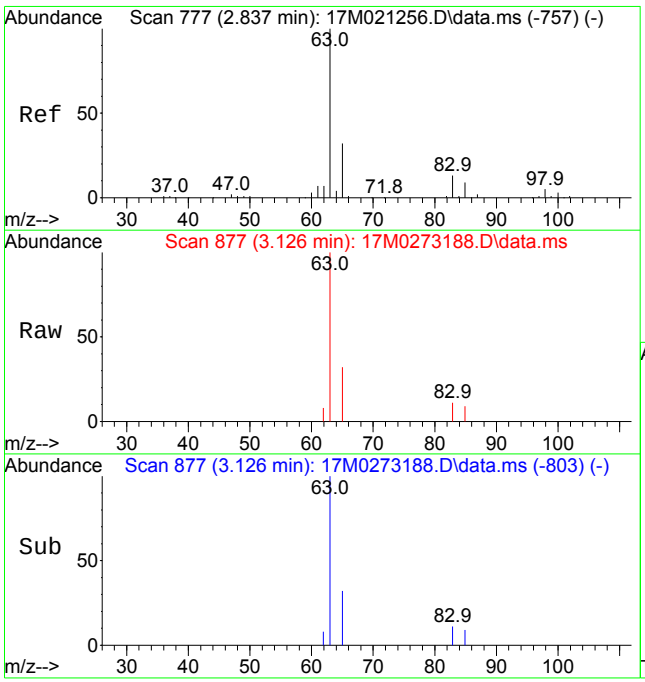


#16
Acetone
Concen: 7.2623 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 43 Resp: 5006

Ion	Ratio	Lower	Upper
43	100		
58	29.0	19.4	45.2

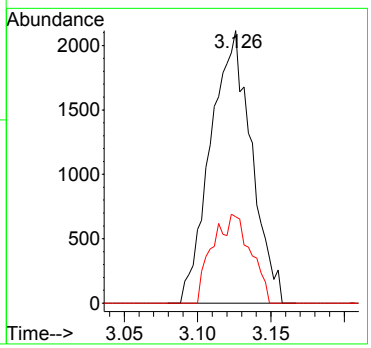


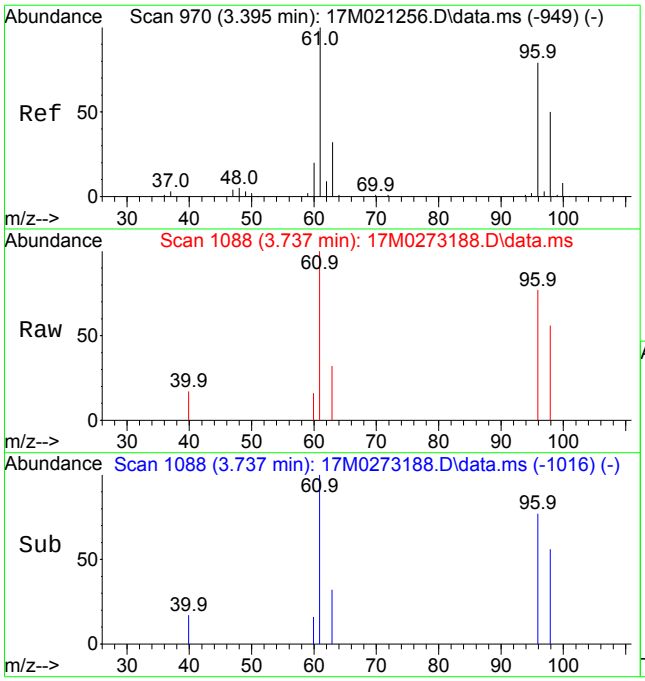


#20
1,1-Dichloroethane
Concen: 0.6324 ug/L
RT: 3.126 min Scan# 877
Delta R.T. 0.015 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 63 Resp: 4096

Ion	Ratio	Lower	Upper
63	100		
65	30.3	25.4	38.2

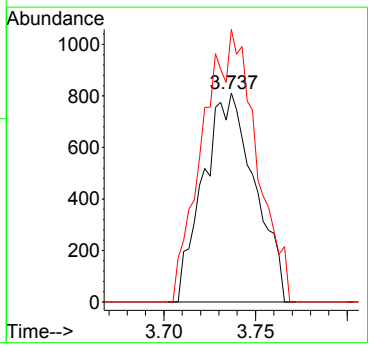


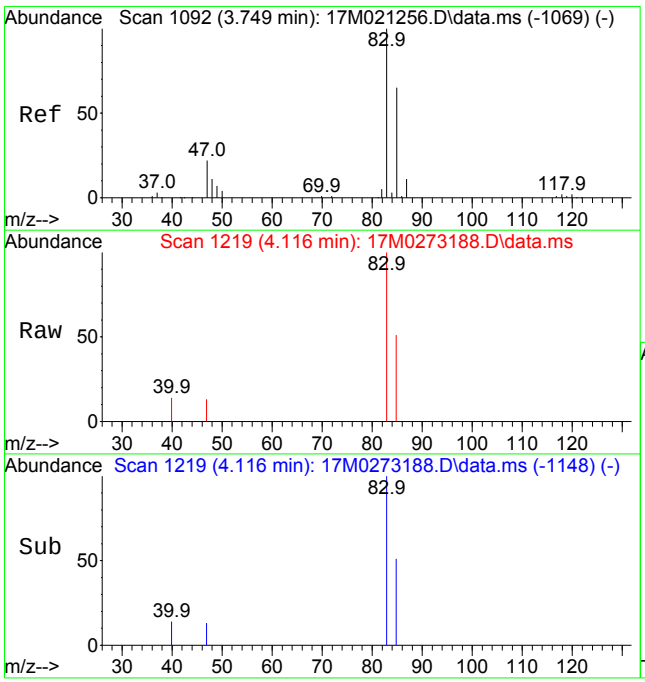


#23
cis-1,2-Dichloroethene
Concen: 0.3873 ug/L
RT: 3.737 min Scan# 1088
Delta R.T. 0.009 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 96 Resp: 1581

Ion	Ratio	Lower	Upper
96	100		
61	136.6	98.1	147.1

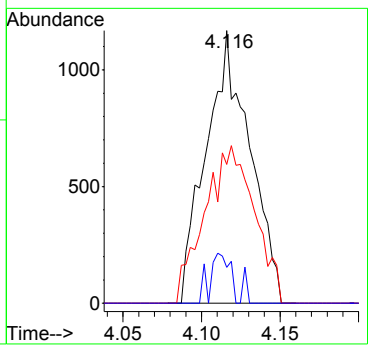


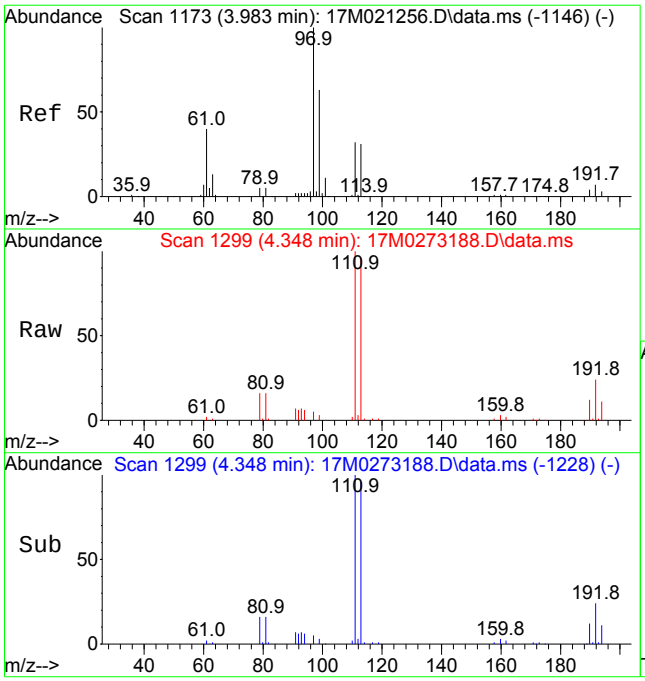


#27
Chloroform
Concen: 0.3334 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 83 Resp: 2251

Ion	Ratio	Lower	Upper
83	100		
85	66.1	39.2	91.4
47	9.6	12.9	30.1#

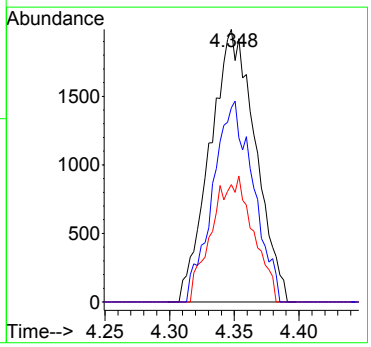


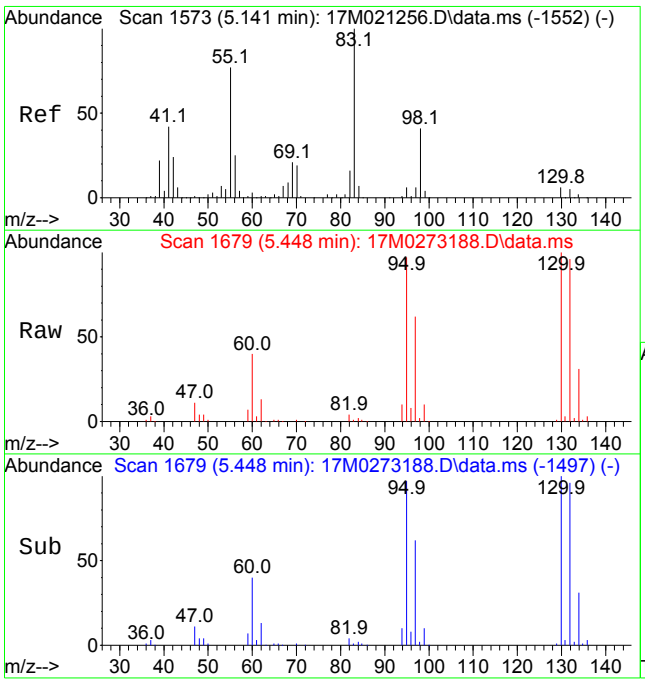


#30
1,1,1-Trichloroethane
Concen: 0.8170 ug/L
RT: 4.348 min Scan# 1299
Delta R.T. 0.006 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 97 Resp: 4850

Ion	Ratio	Lower	Upper
97	100		
61	41.8	24.1	56.3
99	65.8	51.8	77.6

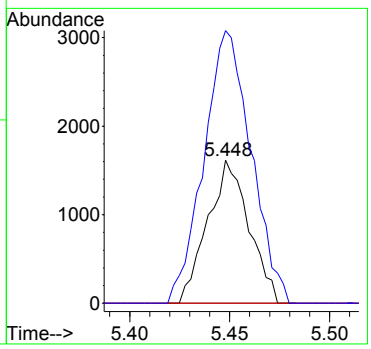


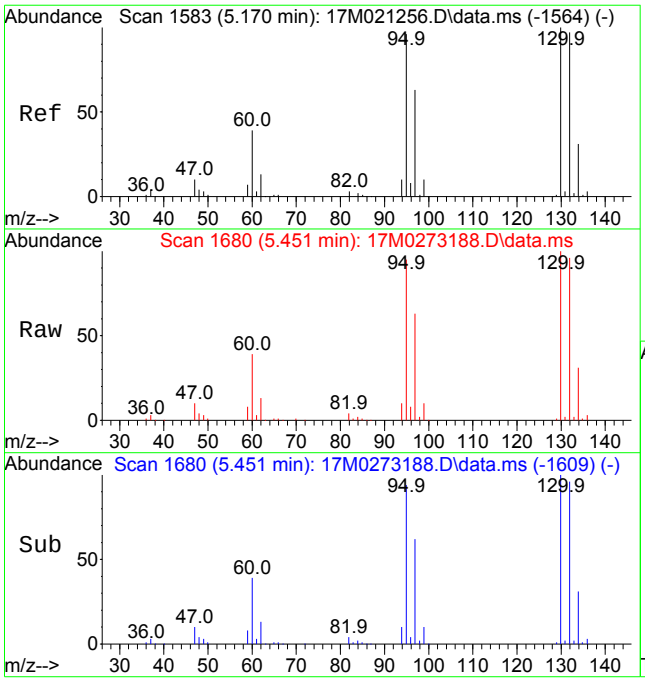


#36
Methylcyclohexane
Concen: 0.4016 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.026 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion: 83 Resp: 2318

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	218.3	34.4	51.6#

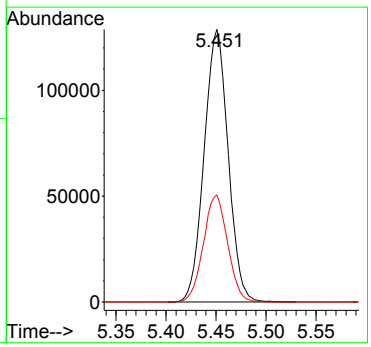


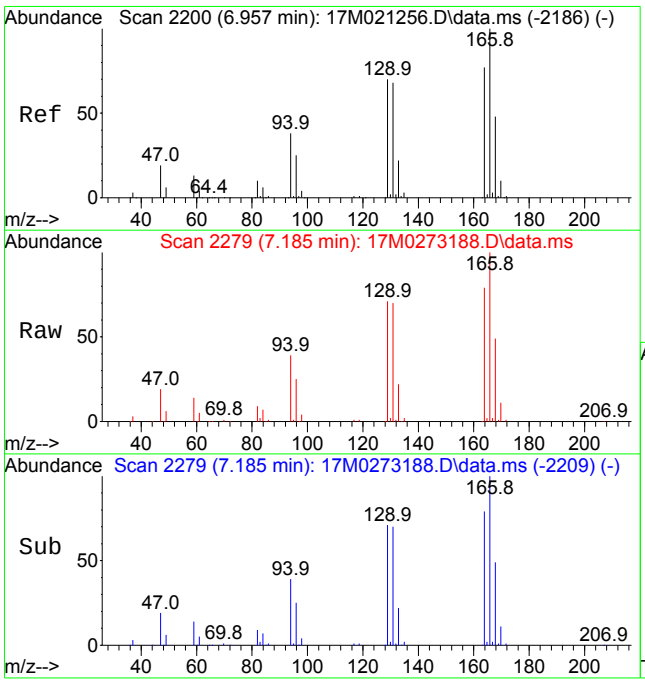


#37
Trichloroethene
Concen: 49.0857 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion:130 Resp: 215301

Ion	Ratio	Lower	Upper
130	100		
60	39.5	22.9	53.3

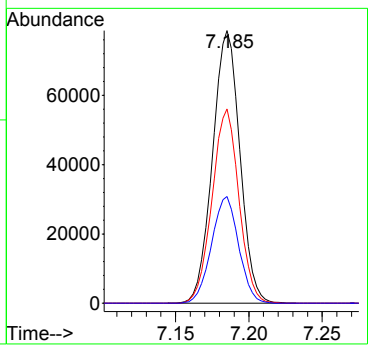




#49
Tetrachloroethene
Concen: 22.5412 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273188.D
Acq: 30 Apr 2017 20:33

Tgt Ion:166 Resp: 102155

Ion	Ratio	Lower	Upper
166	100		
129	69.9	56.2	84.4
94	38.8	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273177.D Vial: 5
Acq On : 30 Apr 2017 16:27 Operator: ADC
Sample : L17041203-20 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	353297	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	263476	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	135958	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	96075	25.1800	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.720%			
34) 1,2-Dichloroethane-d4	4.956	65	91254	25.5158	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.063%			
47) Toluene-d8	6.812	98	336269	25.5734	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.294%			
66) p-Bromofluorobenzene	8.784	95	115990	25.4798	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.919%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	102567	24.4447	ug/L	100
3) Chloromethane	1.218	50	91311	22.2368	ug/L	100
4) Vinyl Chloride	1.264	62	102160	22.4677	ug/L	100
5) 1,3-Butadiene	1.273	54	92303	33.0621	ug/L	99
6) Bromomethane	1.456	94	56944	16.8445	ug/L	99
7) Chloroethane	1.528	64	40397	18.7275	ug/L	94
8) Trichlorofluoromethane	1.606	101	116452	19.9662	ug/L	100
9) Diethyl ether	1.841	59	284374	101.1060	ug/L	97
10) 1,1-Dichloroethene	1.956	61	146895	26.9172	ug/L	97
11) Carbon Disulfide	1.968	76	186880	15.9552	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	73352	21.0829	ug/L	98
13) Iodomethane	2.055	142	97107	19.7136	ug/L	99
14) Acrolein	2.223	56	49113	141.3606	ug/L	100
15) Methylene Chloride	2.399	84	78901	19.0536	ug/L	97
16) Acetone	2.466	43	18077	25.4478	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	72427	19.4911	ug/L	98
18) Methyl acetate	2.573	43	37183	19.9662	ug/L #	98
19) Methyl Tert Butyl Ether	2.654	73	186501	19.7766	ug/L	100
20) 1,1-Dichloroethane	3.115	63	138225	20.7104	ug/L	100
21) Acrylonitrile	3.184	53	18617	20.5474	ug/L	100
22) Vinyl Acetate	2.608	86	11740	19.6304	ug/L	93
23) cis-1,2-Dichloroethene	3.728	96	83288	19.8014	ug/L	97
24) 2,2-Dichloropropane	3.862	77	112397	21.4146	ug/L	96
25) Cyclohexane	3.960	56	101687	17.9129	ug/L #	88
26) Bromochloromethane	3.977	130	54529	20.1210	ug/L	100
27) Chloroform	4.108	83	141458	20.3288	ug/L	99
28) Carbon Tetrachloride	4.250	117	107694	19.5714	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	127838	20.8961	ug/L	99
31) 1,1-Dichloropropene	4.501	75	94229	19.6121	ug/L	97
32) 2-Butanone	4.527	43	22067	20.8369	ug/L	97
33) Benzene	4.797	78	297002	19.7359	ug/L	99
35) 1,2-Dichloroethane	5.031	62	93466	19.9464	ug/L	99
36) Methylcyclohexane	5.419	83	112342	18.8885	ug/L	97
37) Trichloroethene	5.445	130	275834	61.0238	ug/L	98
38) Dibromomethane	5.859	93	45551	19.7629	ug/L	99
39) 1,2-Dichloropropane	5.964	63	78627	19.9234	ug/L	100
40) Bromodichloromethane	6.050	83	101224	19.2170	ug/L	100
41) 1,4-Dioxane	6.262	88	3293	167.5262	ug/L	96
42) 2-Chloroethyl Vinyl Ether	6.644	63	1382	0.7720	ug/L	81
43) cis-1,3-Dichloropropene	6.647	75	124958	21.0519	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	20458	20.8639	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	101299	20.0746	ug/L	99
48) Toluene	6.858	91	325820	19.7242	ug/L	100
49) Tetrachloroethene	7.182	166	183542	38.9561	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	62534	19.5311	ug/L	99
51) Dibromochloromethane	7.507	129	83497	19.1056	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273177.D Vial: 5
Acq On : 30 Apr 2017 16:27 Operator: ADC
Sample : L17041203-20 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

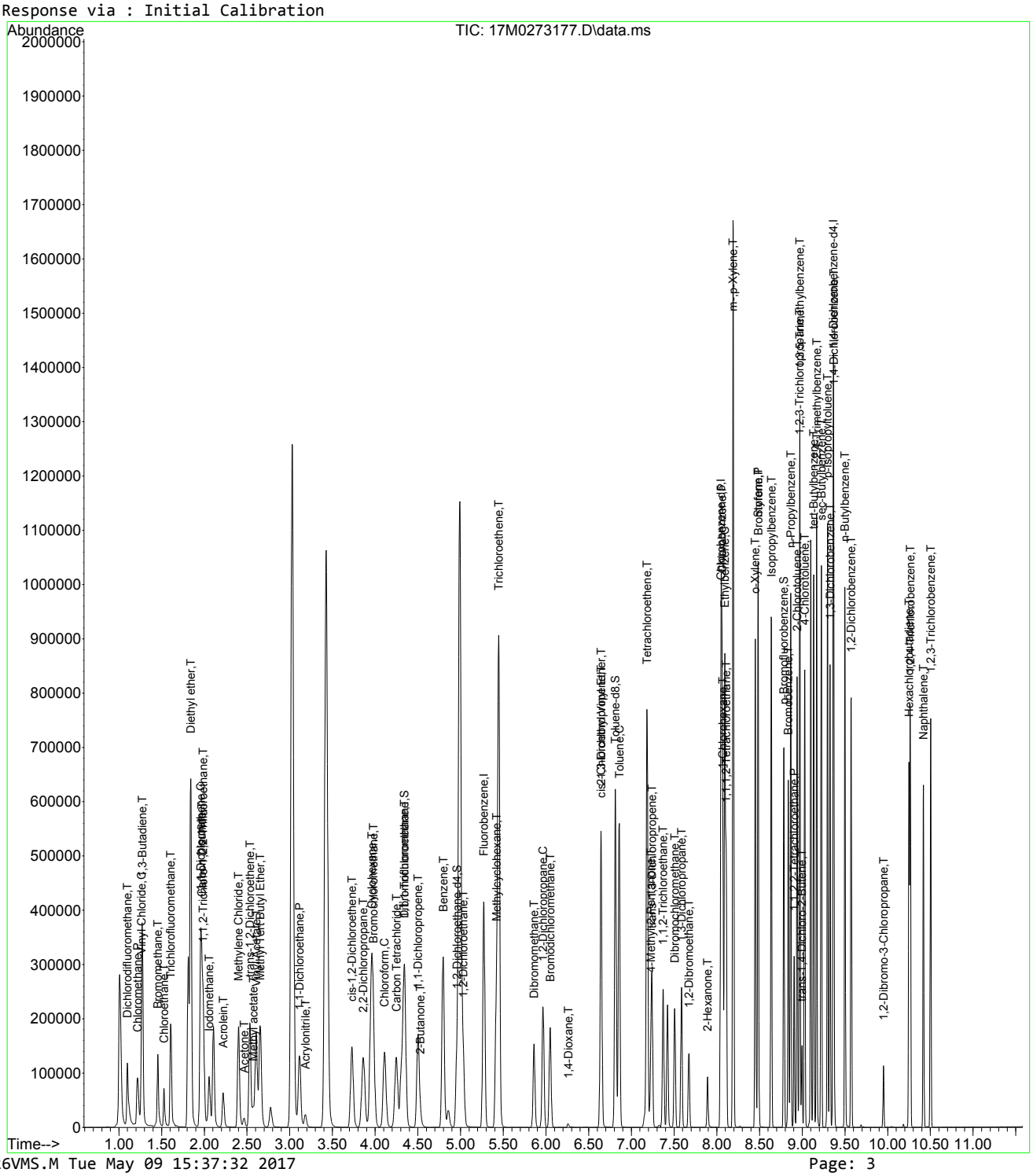
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.588	76	104686	20.5729 ug/L	98
53) 1,2-Dibromoethane	7.675	107	63043	19.2182 ug/L	99
54) 2-Hexanone	7.892	43	36419	21.6602 ug/L	98
55) Chlorobenzene	8.060	112	210744	19.0139 ug/L	97
56) 1-Chlorohexane	8.071	69	18422	20.5867 ug/L	98
57) Ethylbenzene	8.095	106	113330	19.6429 ug/L	97
58) 1,1,1,2-Tetrachloroethane	8.109	131	80896	18.7496 ug/L	98
59) m-,p-Xylene	8.190	106	271356	38.9709 ug/L	96
60) o-Xylene	8.451	106	131857	19.2194 ug/L	97
61) Styrene	8.482	104	222943	20.3093 ug/L	99
62) Bromoform	8.485	173	58651	19.0780 ug/L	99
63) Isopropylbenzene	8.639	105	338392	19.0555 ug/L	99
65) 1,3,5-Trimethylbenzene	8.972	105	296159	19.5401 ug/L	98
67) Bromobenzene	8.836	156	98510	18.4198 ug/L	100
68) n-Propylbenzene	8.865	91	390534	19.4517 ug/L	98
69) 1,1,2,2-Tetrachloroethane	8.905	83	78304	21.4112 ug/L	100
70) 2-Chlorotoluene	8.940	91	234636	18.9340 ug/L	98
71) 1,2,3-Trichloropropane	8.969	110	20765	19.2066 ug/L	98
72) trans-1,4-Dichloro-2-B...	8.995	53	14578	18.0881 ug/L #	91
73) 1,2,4-Trimethylbenzene	9.169	105	297921	19.4933 ug/L	99
74) 4-Chlorotoluene	9.030	91	244433	19.7571 ug/L	98
75) tert-Butylbenzene	9.134	134	56545	18.6672 ug/L	97
76) sec-Butylbenzene	9.224	105	361998	19.3870 ug/L	99
77) p-Isopropyltoluene	9.296	119	312622	19.6406 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	176841	18.9678 ug/L	100
79) 1,4-Dichlorobenzene	9.368	146	176908	18.7948 ug/L	99
80) n-Butylbenzene	9.499	91	272107	20.2546 ug/L	97
81) 1,2-Dichlorobenzene	9.574	146	171671	18.8931 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13640	20.3302 ug/L	93
83) Hexachlorobutadiene	10.249	225	68432	17.8650 ug/L	100
84) 1,2,4-Trichlorobenzene	10.266	180	126885	18.7976 ug/L	100
85) Naphthalene	10.419	128	244078	18.5431 ug/L	100
86) 1,2,3-Trichlorobenzene	10.503	180	119731	18.2613 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273177.D Vial: 5
Acq On : 30 Apr 2017 16:27 Operator: ADC
Sample : L17041203-20 A MS 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:37:32 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273178.D Vial: 6
Acq On : 30 Apr 2017 16:47 Operator: ADC
Sample : L17041203-21 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	357898	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	266204	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	133408	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	96958	25.0847	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.339%			
34) 1,2-Dichloroethane-d4	4.959	65	91698	25.3103	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.241%			
47) Toluene-d8	6.812	98	337523	25.4057	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.623%			
66) p-Bromofluorobenzene	8.783	95	113580	25.4272	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.709%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	102998	24.2318	ug/L	100
3) Chloromethane	1.221	50	92024	22.1223	ug/L	100
4) Vinyl Chloride	1.267	62	104818	22.7559	ug/L	100
5) 1,3-Butadiene	1.276	54	92060	32.5511	ug/L	99
6) Bromomethane	1.458	94	57793	16.8759	ug/L	100
7) Chloroethane	1.531	64	41154	18.8332	ug/L	89
8) Trichlorofluoromethane	1.612	101	117651	19.9125	ug/L	99
9) Diethyl ether	1.843	59	278777	97.8419	ug/L	98
10) 1,1-Dichloroethene	1.959	61	147892	26.7515	ug/L	97
11) Carbon Disulfide	1.971	76	190130	16.0240	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	72534	20.5798	ug/L	97
13) Iodomethane	2.060	142	103283	20.5979	ug/L	100
14) Acrolein	2.223	56	48129	136.7475	ug/L	100
15) Methylene Chloride	2.402	84	77708	18.5243	ug/L	97
16) Acetone	2.466	43	18210	25.3054	ug/L	97
17) trans-1,2-Dichloroethene	2.535	96	71512	18.9974	ug/L	98
18) Methyl acetate	2.579	43	39691	21.0389	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	186749	19.5483	ug/L	98
20) 1,1-Dichloroethane	3.114	63	136943	20.2546	ug/L	100
21) Acrylonitrile	3.184	53	18742	20.4194	ug/L	99
22) Vinyl Acetate	2.611	86	11672	19.2658	ug/L	87
23) cis-1,2-Dichloroethene	3.731	96	82440	19.3478	ug/L	98
24) 2,2-Dichloropropane	3.864	77	110373	20.7670	ug/L	96
25) Cyclohexane	3.963	56	101175	17.5936	ug/L #	88
26) Bromochloromethane	3.983	130	53380	19.4438	ug/L	100
27) Chloroform	4.113	83	140293	19.9022	ug/L	100
28) Carbon Tetrachloride	4.252	117	105781	18.9766	ug/L	99
30) 1,1,1-Trichloroethane	4.342	97	126226	20.3673	ug/L	99
31) 1,1-Dichloropropene	4.504	75	93247	19.1582	ug/L	98
32) 2-Butanone	4.539	43	21932	20.4432	ug/L	95
33) Benzene	4.797	78	292976	19.2181	ug/L	99
35) 1,2-Dichloroethane	5.037	62	92205	19.4243	ug/L	99
36) Methylcyclohexane	5.422	83	109286	18.1385	ug/L	97
37) Trichloroethene	5.448	130	273305	59.6870	ug/L	98
38) Dibromomethane	5.859	93	45072	19.3037	ug/L	99
39) 1,2-Dichloropropane	5.966	63	77960	19.5004	ug/L	99
40) Bromodichloromethane	6.047	83	100234	18.7844	ug/L	100
41) 1,4-Dioxane	6.259	88	3150	158.1911	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.647	63	1332	0.7345	ug/L	81
43) cis-1,3-Dichloropropene	6.647	75	123791	20.5872	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	20149	20.2846	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	99150	19.3961	ug/L	100
48) Toluene	6.858	91	320308	19.1918	ug/L	100
49) Tetrachloroethene	7.182	166	177631	37.3152	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	61210	18.9217	ug/L	99
51) Dibromochloromethane	7.507	129	81510	18.4598	ug/L	99

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273178.D Vial: 6
Acq On : 30 Apr 2017 16:47 Operator: ADC
Sample : L17041203-21 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

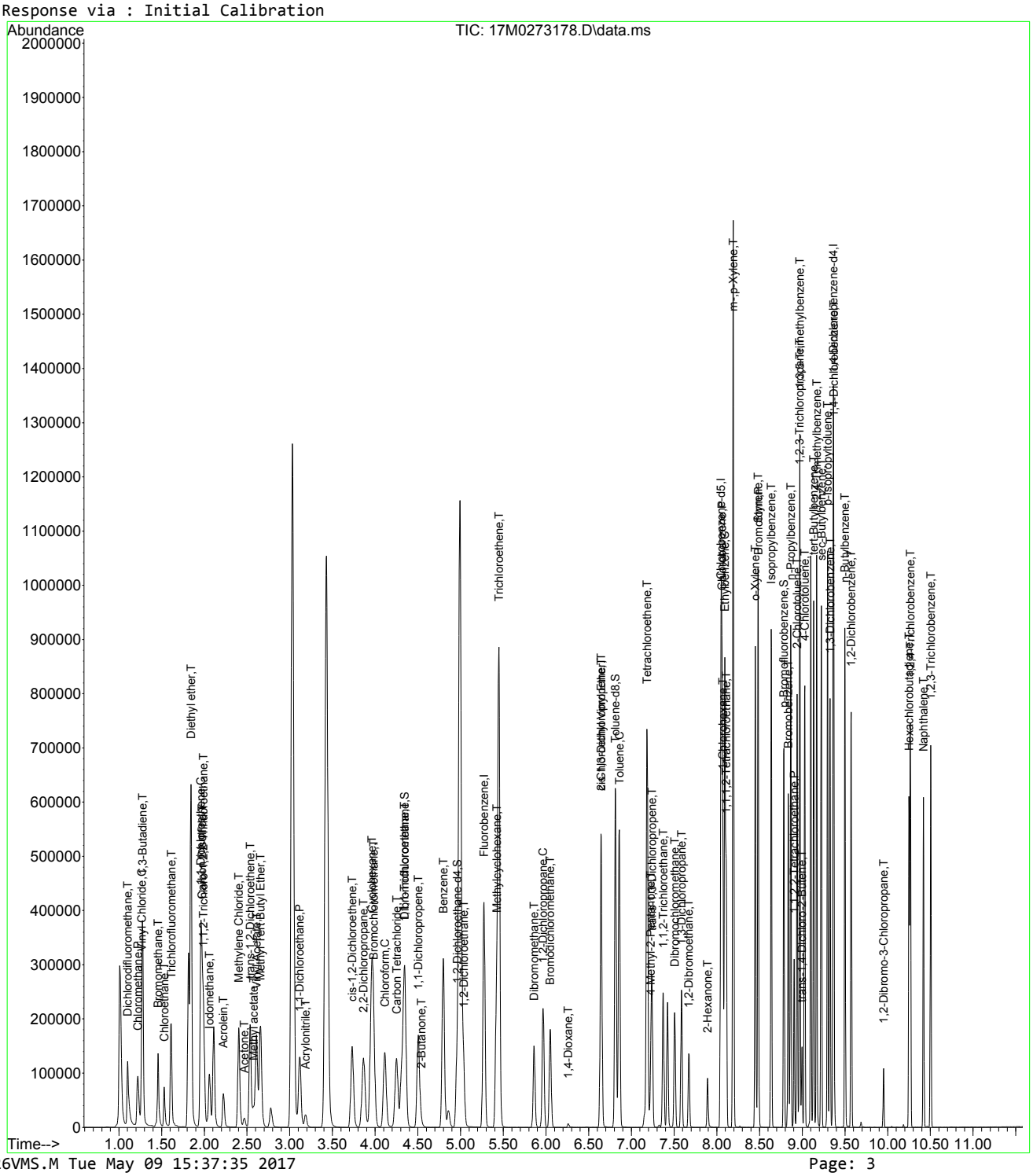
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.585	76	102394	19.9162 ug/L	98
53) 1,2-Dibromoethane	7.672	107	61597	18.5849 ug/L	99
54) 2-Hexanone	7.892	43	35882	21.1221 ug/L	98
55) Chlorobenzene	8.060	112	206705	18.4584 ug/L	96
56) 1-Chlorohexane	8.071	69	18197	20.1269 ug/L	96
57) Ethylbenzene	8.094	106	109648	18.8100 ug/L	96
58) 1,1,1,2-Tetrachloroethane	8.109	131	79406	18.2157 ug/L	99
59) m-,p-Xylene	8.193	106	264826	37.6433 ug/L	97
60) o-Xylene	8.450	106	128453	18.5314 ug/L	98
61) Styrene	8.482	104	216519	19.5219 ug/L	99
62) Bromoform	8.485	173	57645	18.5586 ug/L	99
63) Isopropylbenzene	8.636	105	324790	18.1021 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	279854	18.8173 ug/L	98
67) Bromobenzene	8.836	156	94627	18.0319 ug/L	99
68) n-Propylbenzene	8.865	91	370247	18.7937 ug/L	98
69) 1,1,2,2-Tetrachloroethane	8.905	83	76310	21.2648 ug/L	99
70) 2-Chlorotoluene	8.940	91	225529	18.5469 ug/L	98
71) 1,2,3-Trichloropropane	8.969	110	20119	18.9648 ug/L	97
72) trans-1,4-Dichloro-2-B...	8.995	53	14202	17.9584 ug/L #	92
73) 1,2,4-Trimethylbenzene	9.169	105	284268	18.9555 ug/L	98
74) 4-Chlorotoluene	9.030	91	235228	19.3765 ug/L	99
75) tert-Butylbenzene	9.134	134	53372	17.9565 ug/L	97
76) sec-Butylbenzene	9.224	105	336153	18.3470 ug/L	99
77) p-Isopropyltoluene	9.296	119	293233	18.7746 ug/L	100
78) 1,3-Dichlorobenzene	9.325	146	167826	18.3449 ug/L	100
79) 1,4-Dichlorobenzene	9.368	146	170136	18.4208 ug/L	99
80) n-Butylbenzene	9.499	91	252840	19.1802 ug/L	97
81) 1,2-Dichlorobenzene	9.574	146	163359	18.3220 ug/L	100
82) 1,2-Dibromo-3-Chloropr...	9.953	75	13251	20.1279 ug/L	91
83) Hexachlorobutadiene	10.249	225	62048	16.5080 ug/L	100
84) 1,2,4-Trichlorobenzene	10.266	180	118915	17.9537 ug/L	100
85) Naphthalene	10.419	128	231991	17.9617 ug/L	100
86) 1,2,3-Trichlorobenzene	10.503	180	111637	17.3522 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273178.D Vial: 6
Acq On : 30 Apr 2017 16:47 Operator: ADC
Sample : L17041203-21 A MSD 826-SPE Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:37:35 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273211.D Vial: 9
Acq On : 01 May 2017 14:58 Operator: ADC
Sample : L17041203-22 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

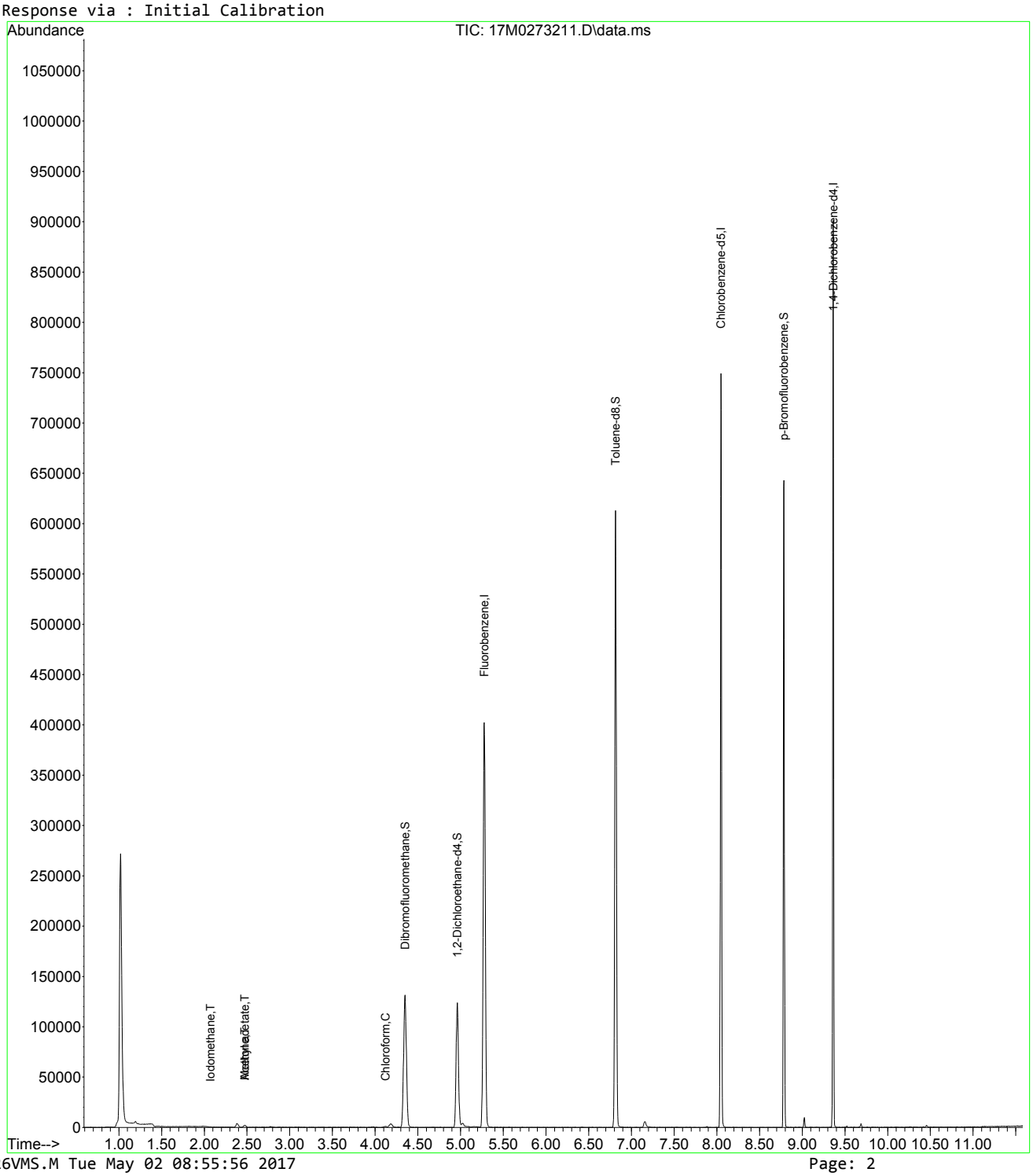
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	343443	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252727	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	118977	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	94008	25.3451	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.380%			
34) 1,2-Dichloroethane-d4	4.962	65	89224	25.6640	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.656%			
47) Toluene-d8	6.815	98	322992	25.6084	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.434%			
66) p-Bromofluorobenzene	8.784	95	106196	26.6578	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.631%			
Target Compounds						Qvalue
13) Iodomethane	2.069	142	195	2.0378	ug/L #	35
16) Acetone	2.472	43	1866	2.7022	ug/L	95
18) Methyl acetate	2.472	43	1866	1.0307	ug/L #	59
27) Chloroform	4.119	83	1008	0.1490	ug/L #	83

(#) = qualifier out of range (m) = manual integration (+) = signals summed

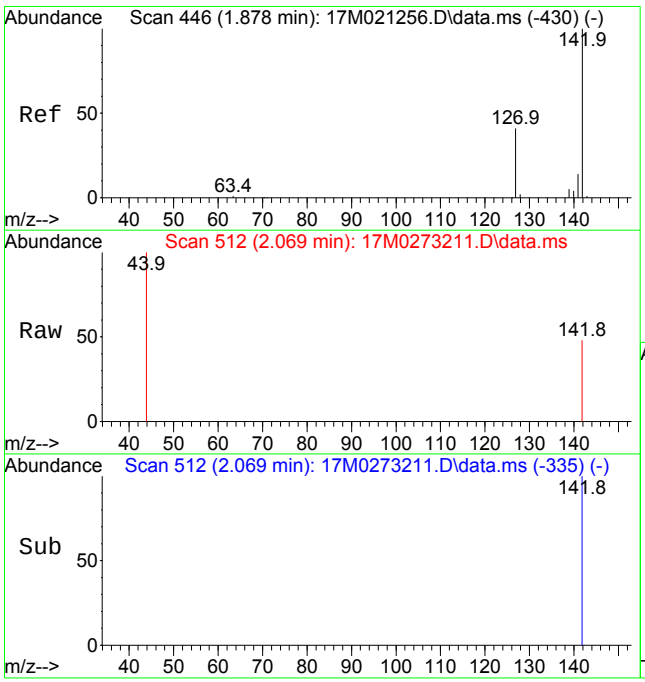
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273211.D Vial: 9
Acq On : 01 May 2017 14:58 Operator: ADC
Sample : L17041203-22 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



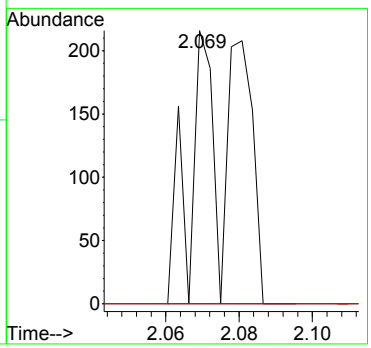
826VMS.M Tue May 02 08:55:56 2017 Page: 2

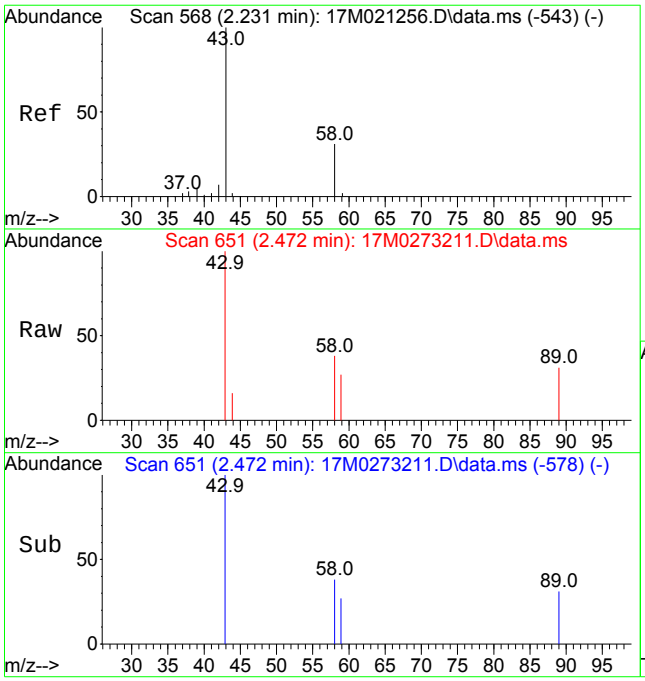


#13
Iodomethane
Concen: 2.0378 ug/L
RT: 2.069 min Scan# 512
Delta R.T. 0.011 min
Lab File: 17M0273211.D
Acq: 01 May 2017 14:58

Tgt Ion:142 Resp: 195

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#

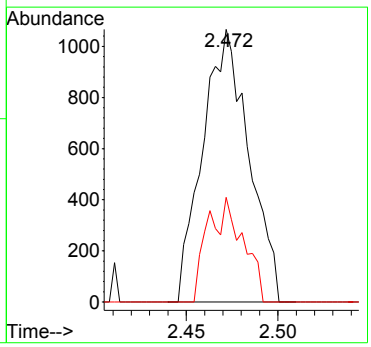


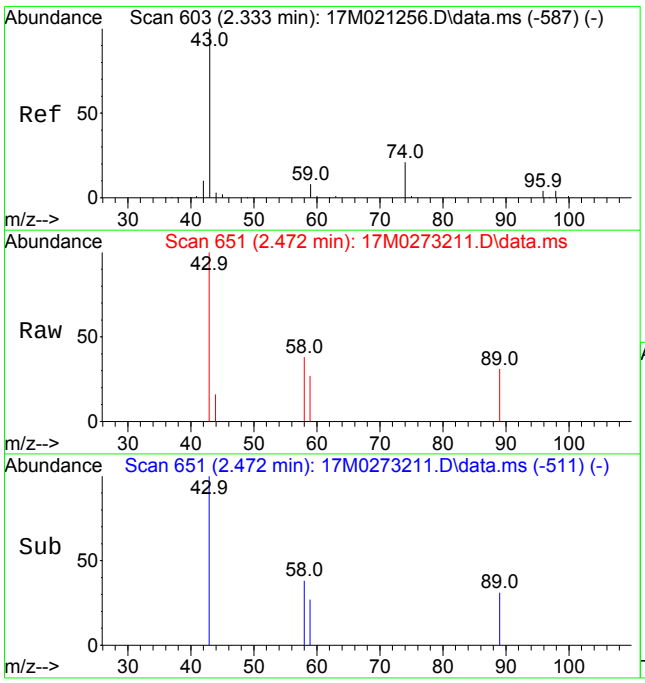


#16
Acetone
Concen: 2.7022 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273211.D
Acq: 01 May 2017 14:58

Tgt Ion: 43 Resp: 1866

Ion	Ratio	Lower	Upper
43	100		
58	29.3	19.4	45.2

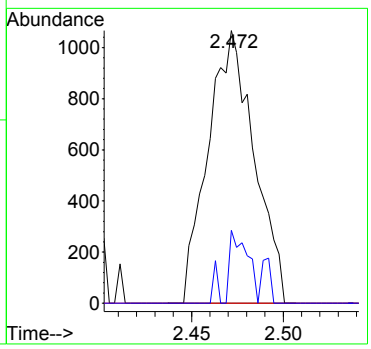


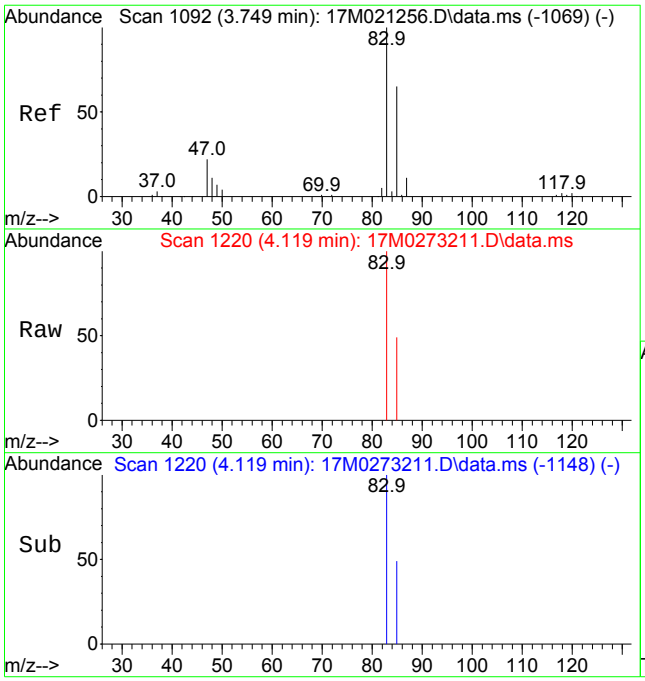


#18
Methyl acetate
Concen: 1.0307 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273211.D
Acq: 01 May 2017 14:58

Tgt Ion: 43 Resp: 1866

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	15.0	7.6	11.4#

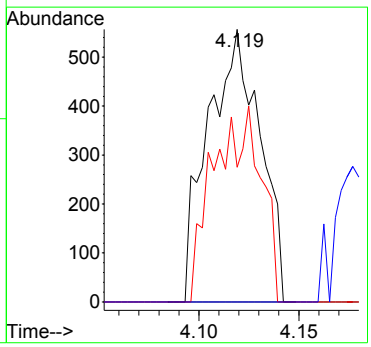




#27
Chloroform
Concen: 0.1490 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273211.D
Acq: 01 May 2017 14:58

Tgt Ion: 83 Resp: 1008

Ion	Ratio	Lower	Upper
83	100		
85	65.7	39.2	91.4
47	53.8	12.9	30.1#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273212.D Vial: 10
Acq On : 01 May 2017 15:18 Operator: ADC
Sample : L17041203-23 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

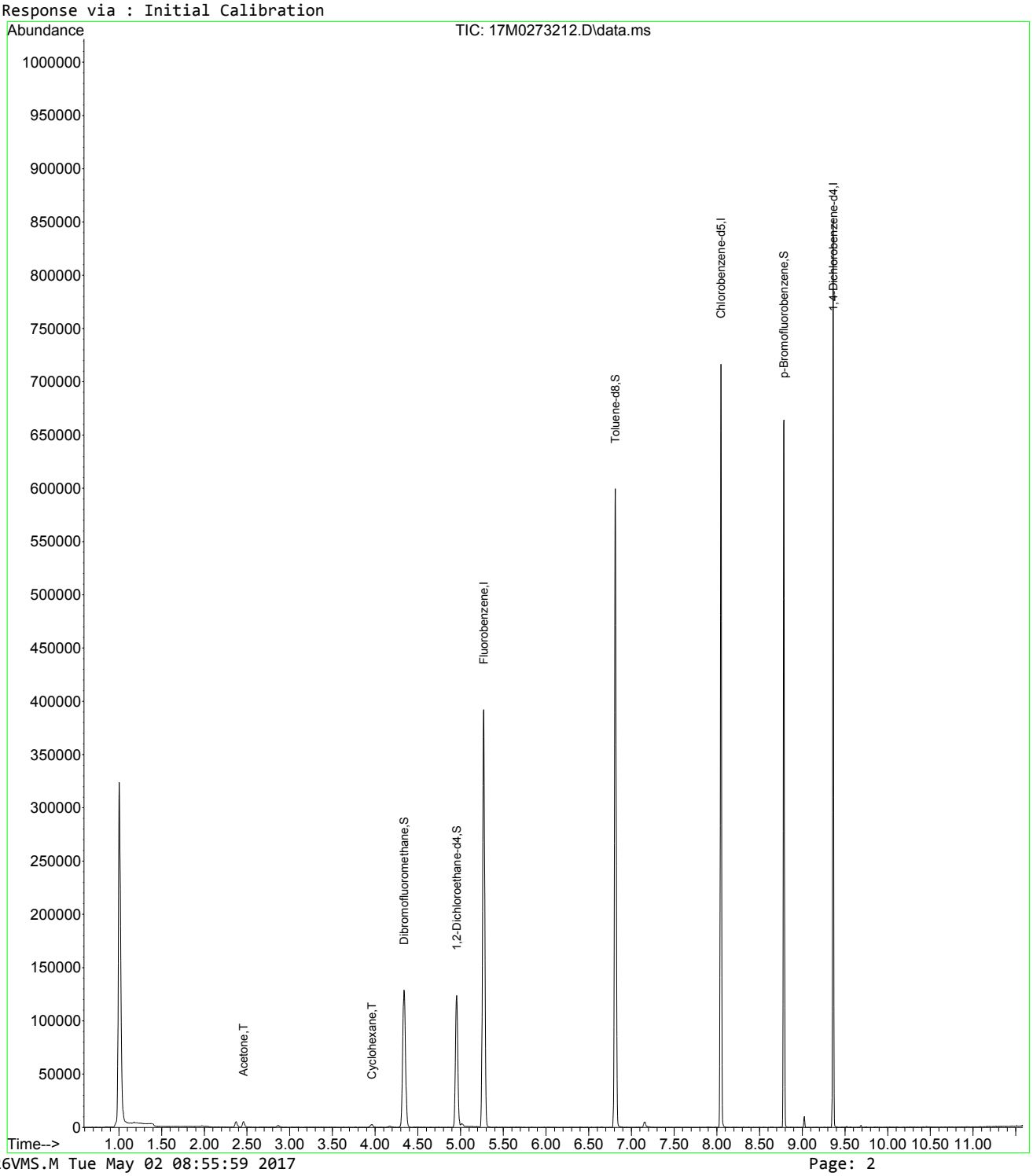
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	335782	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	244041	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	116205	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	93635	25.8206	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.282%			
34) 1,2-Dichloroethane-d4	4.953	65	89637	26.3710	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.484%			
47) Toluene-d8	6.812	98	325524	26.7278	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.911%			
66) p-Bromofluorobenzene	8.784	95	109397	28.1164	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 112.466%			
Target Compounds						Qvalue
16) Acetone	2.457	43	6414	9.5002	ug/L	97
25) Cyclohexane	3.960	56	1644	0.3047	ug/L #	80

(#) = qualifier out of range (m) = manual integration (+) = signals summed

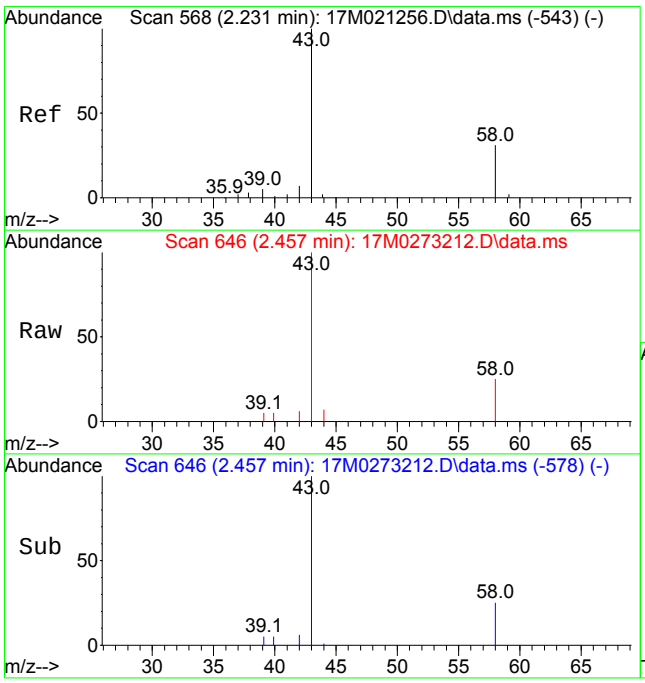
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273212.D Vial: 10
Acq On : 01 May 2017 15:18 Operator: ADC
Sample : L17041203-23 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



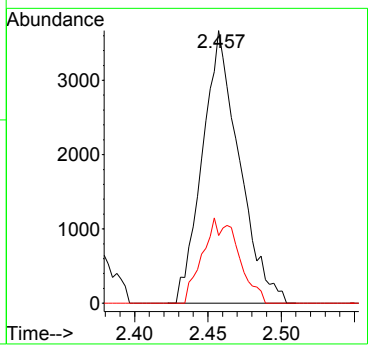
826VMS.M Tue May 02 08:55:59 2017 Page: 2

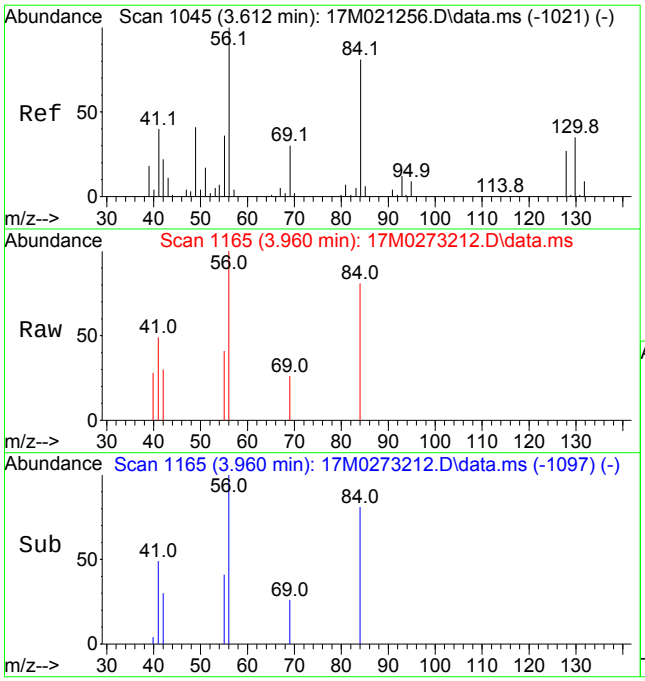


#16
Acetone
Concen: 9.5002 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273212.D
Acq: 01 May 2017 15:18

Tgt Ion: 43 Resp: 6414

Ion	Ratio	Lower	Upper
43	100		
58	30.4	19.4	45.2

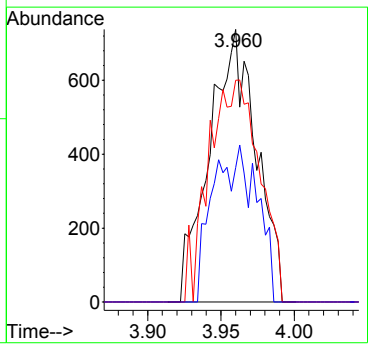




#25
Cyclohexane
Concen: 0.3047 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273212.D
Acq: 01 May 2017 15:18

Tgt Ion: 56 Resp: 1644

Ion	Ratio	Lower	Upper
56	100		
84	88.6	69.4	104.0
41	54.2	72.2	108.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273213.D Vial: 11
Acq On : 01 May 2017 15:49 Operator: ADC
Sample : L17041203-24 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

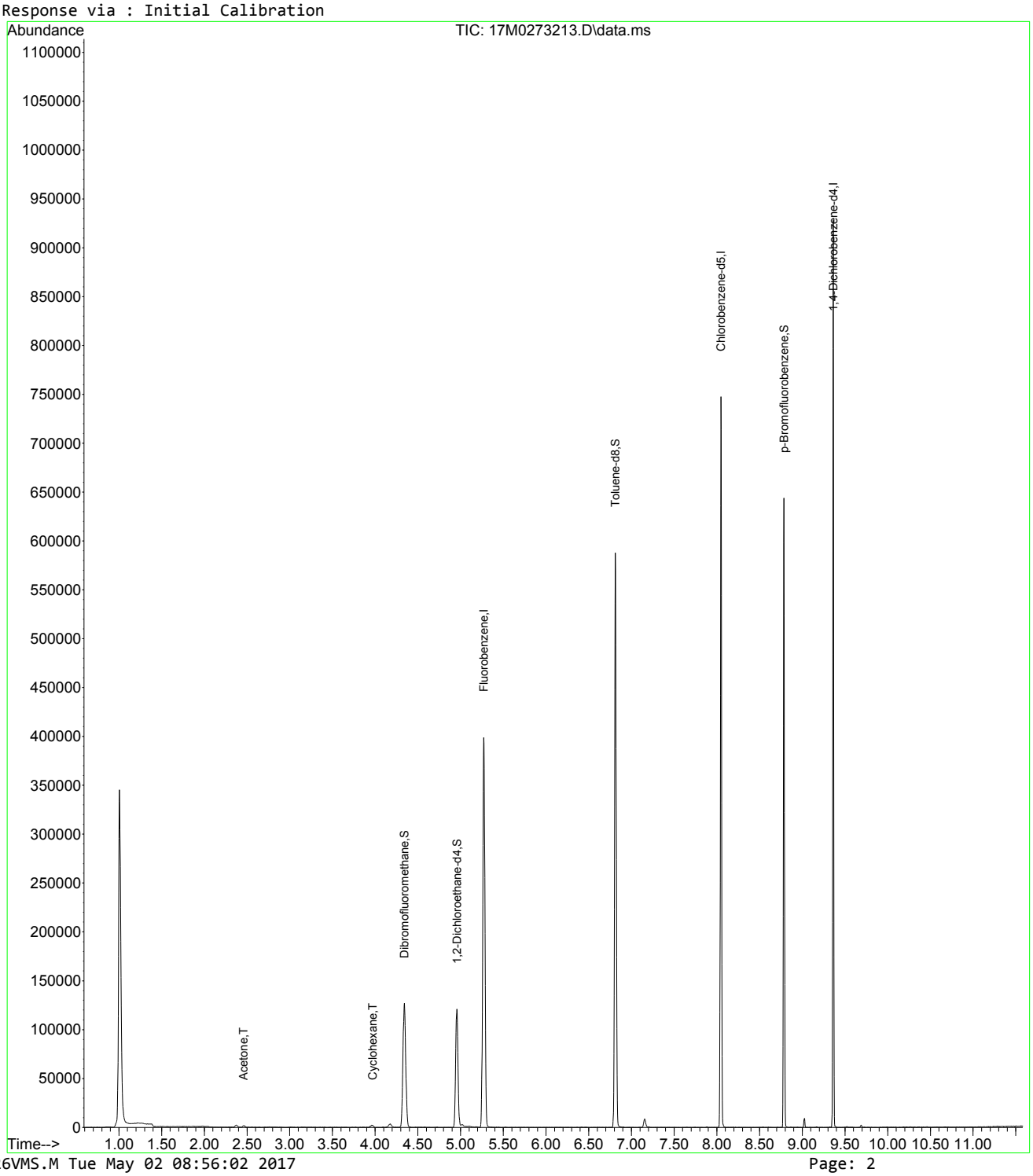
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	342216	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252282	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	119833	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	90448	24.4728	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.891%			
34) 1,2-Dichloroethane-d4	4.956	65	87334	25.2104	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.842%			
47) Toluene-d8	6.812	98	314403	24.9714	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.886%			
66) p-Bromofluorobenzene	8.786	95	104754	26.1080	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.432%			
Target Compounds						Qvalue
16) Acetone	2.457	43	1438	2.0899	ug/L	81
25) Cyclohexane	3.971	56	1488	0.2706	ug/L #	77

(#) = qualifier out of range (m) = manual integration (+) = signals summed

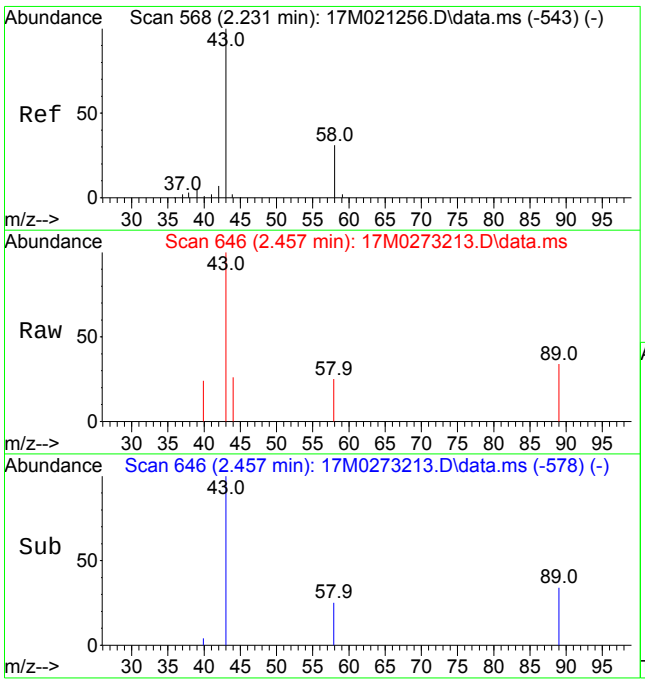
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273213.D Vial: 11
Acq On : 01 May 2017 15:49 Operator: ADC
Sample : L17041203-24 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



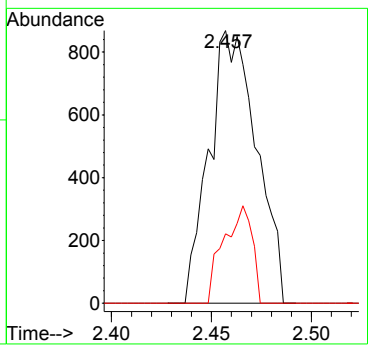
826VMS.M Tue May 02 08:56:02 2017 Page: 2

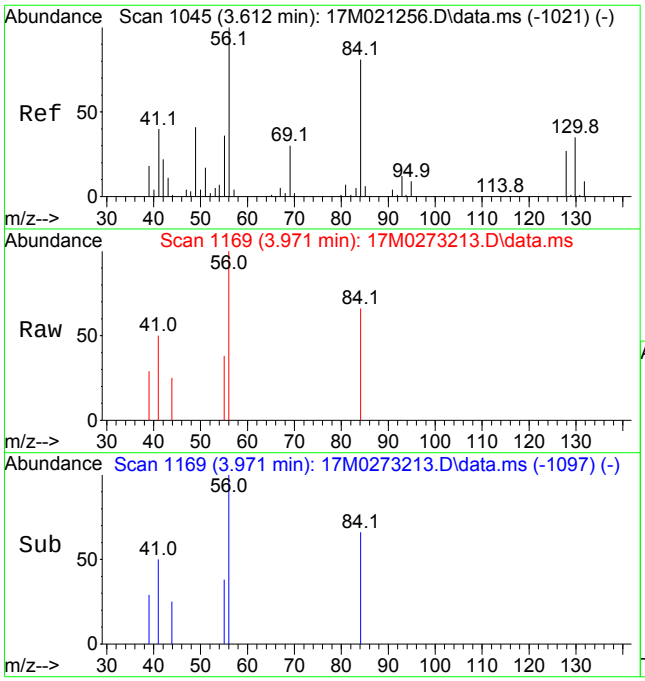


#16
Acetone
Concen: 2.0899 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273213.D
Acq: 01 May 2017 15:49

Tgt Ion: 43 Resp: 1438

Ion	Ratio	Lower	Upper
43	100		
58	21.4	19.4	45.2

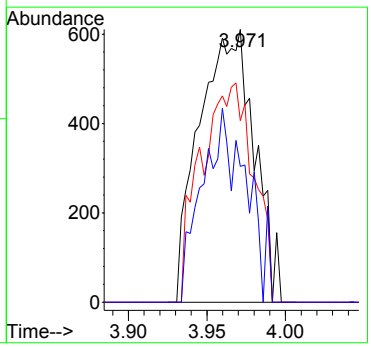




#25
Cyclohexane
Concen: 0.2706 ug/L
RT: 3.971 min Scan# 1169
Delta R.T. 0.008 min
Lab File: 17M0273213.D
Acq: 01 May 2017 15:49

Tgt Ion: 56 Resp: 1488

Ion	Ratio	Lower	Upper
56	100		
84	76.5	69.4	104.0
41	57.3	72.2	108.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273214.D Vial: 12
Acq On : 01 May 2017 16:09 Operator: ADC
Sample : L17041203-25 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

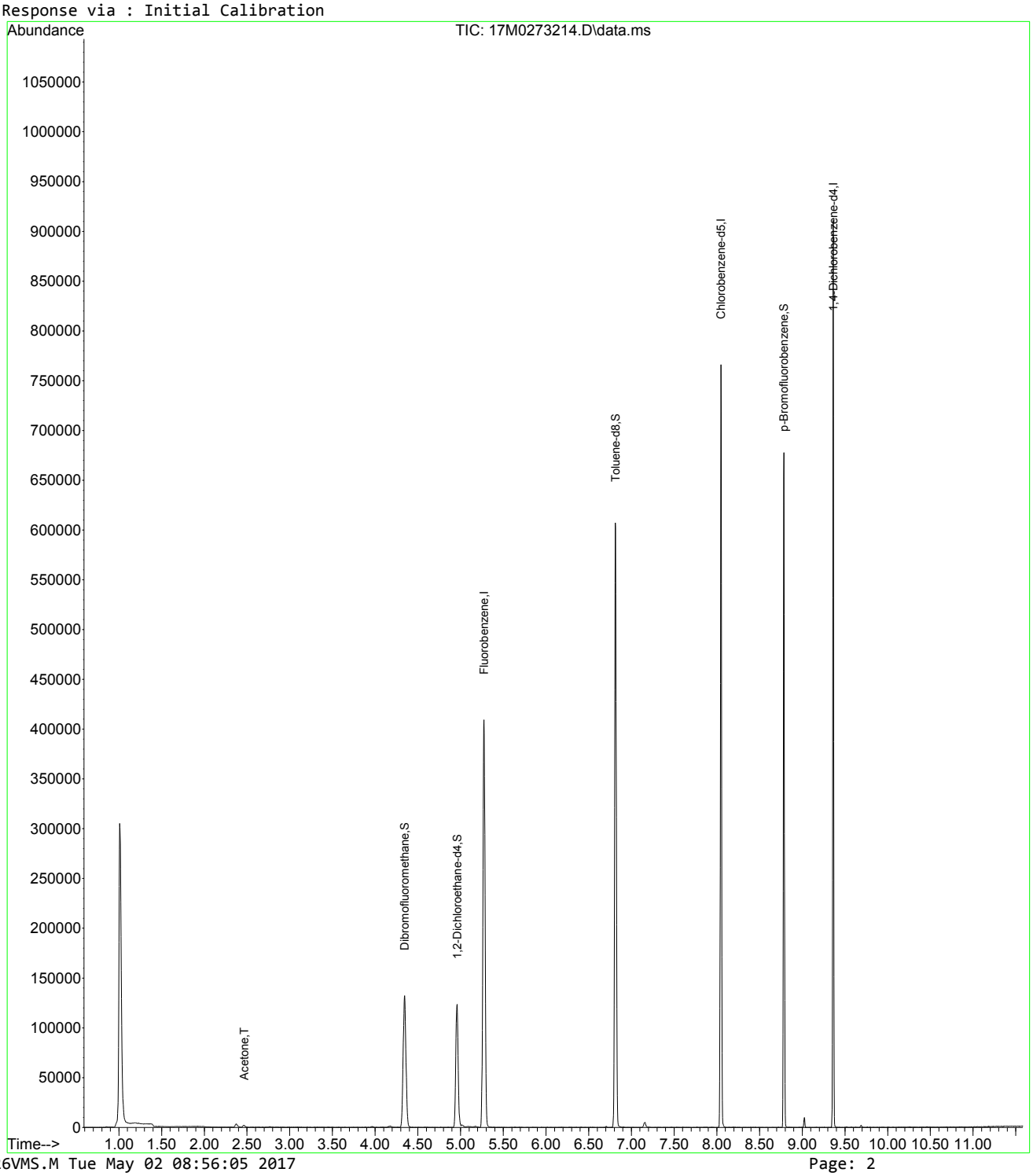
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	349373	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	256635	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	121436	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	93630	24.8148	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.259%			
34) 1,2-Dichloroethane-d4	4.959	65	89977	25.4413	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.765%			
47) Toluene-d8	6.815	98	327919	25.6032	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.413%			
66) p-Bromofluorobenzene	8.784	95	108305	26.6367	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.547%			
Target Compounds						Qvalue
16) Acetone	2.466	43	2357	3.3553	ug/L	96

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273214.D Vial: 12
Acq On : 01 May 2017 16:09 Operator: ADC
Sample : L17041203-25 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



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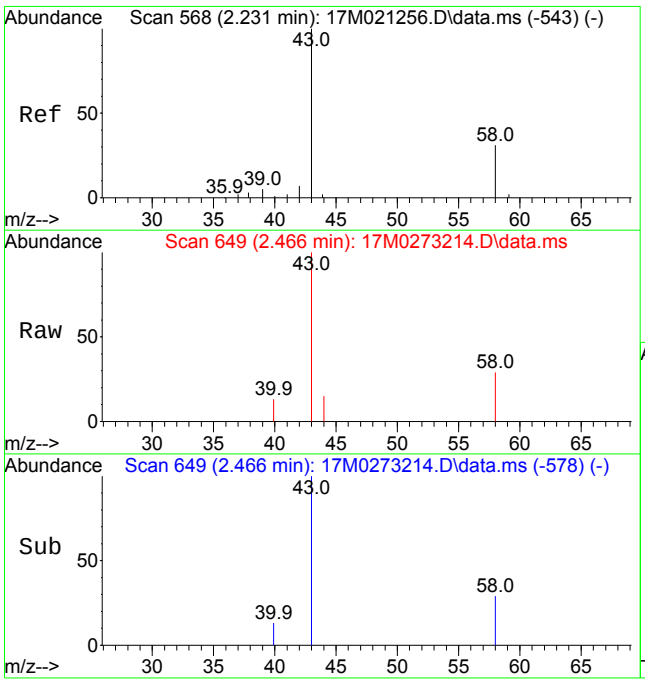
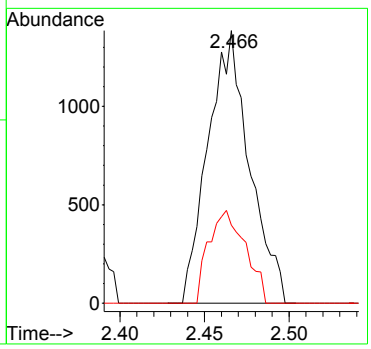


#16
Acetone
Concen: 3.3553 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273214.D
Acq: 01 May 2017 16:09

Tgt Ion: 43 Resp: 2357

Ion	Ratio	Lower	Upper
43	100		
58	29.9	19.4	45.2



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273215.D Vial: 13
Acq On : 01 May 2017 16:28 Operator: ADC
Sample : L17041203-26 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

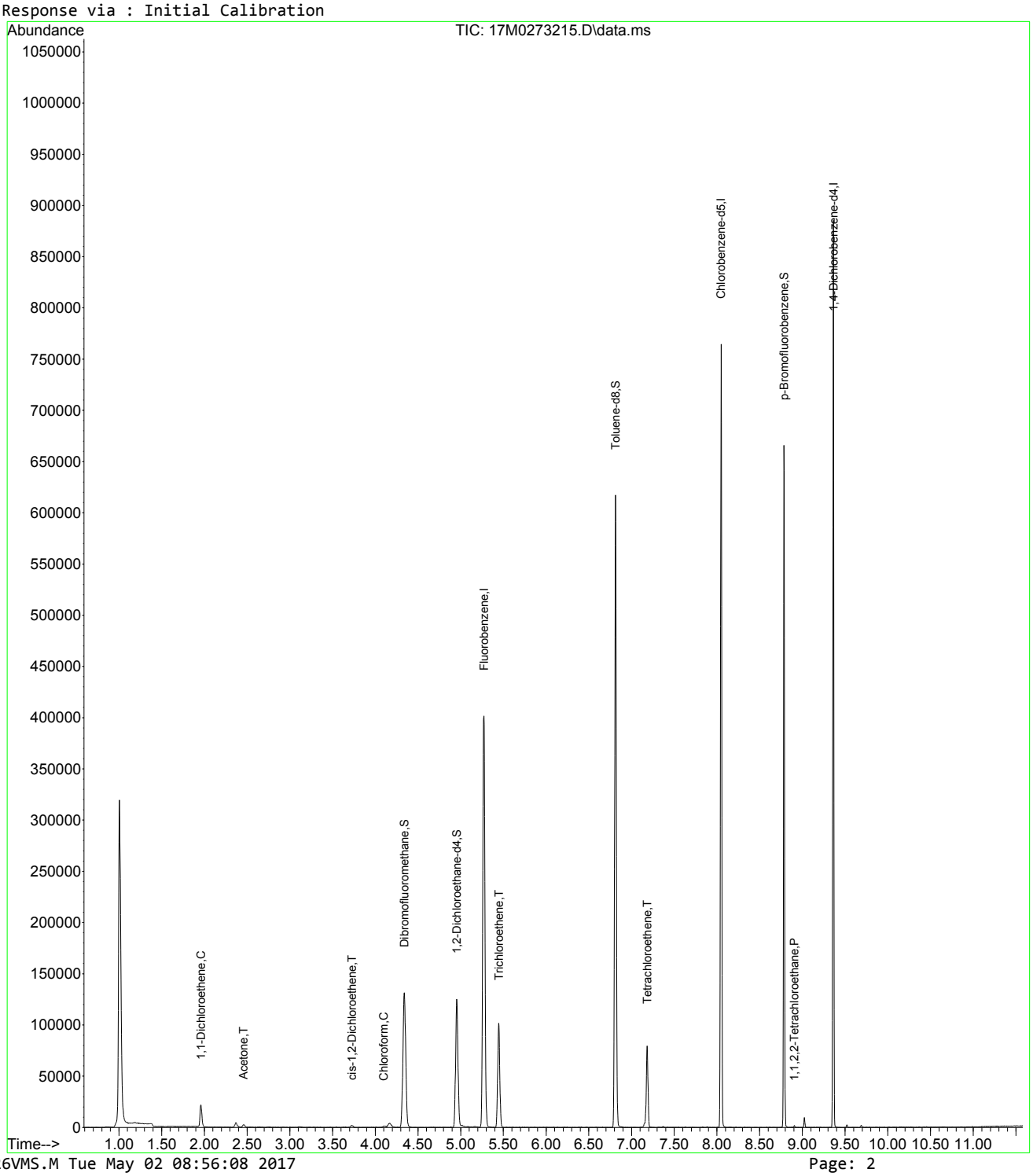
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	345772	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	255525	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	118500	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	95041	25.4511	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.804%			
34) 1,2-Dichloroethane-d4	4.953	65	90748	25.9265	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.706%			
47) Toluene-d8	6.812	98	328807	25.7840	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.136%			
66) p-Bromofluorobenzene	8.784	95	109438	27.5822	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.329%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.962	61	11285	2.1129	ug/L	99
16) Acetone	2.457	43	2393	3.4420	ug/L	95
23) cis-1,2-Dichloroethene	3.728	96	1055	0.2563	ug/L	96
27) Chloroform	4.099	83	1640	0.2408	ug/L #	56
37) Trichloroethene	5.448	130	33142	7.4917	ug/L	97
49) Tetrachloroethene	7.185	166	19582	4.2855	ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.902	83	654	0.2052	ug/L	94

(#) = qualifier out of range (m) = manual integration (+) = signals summed

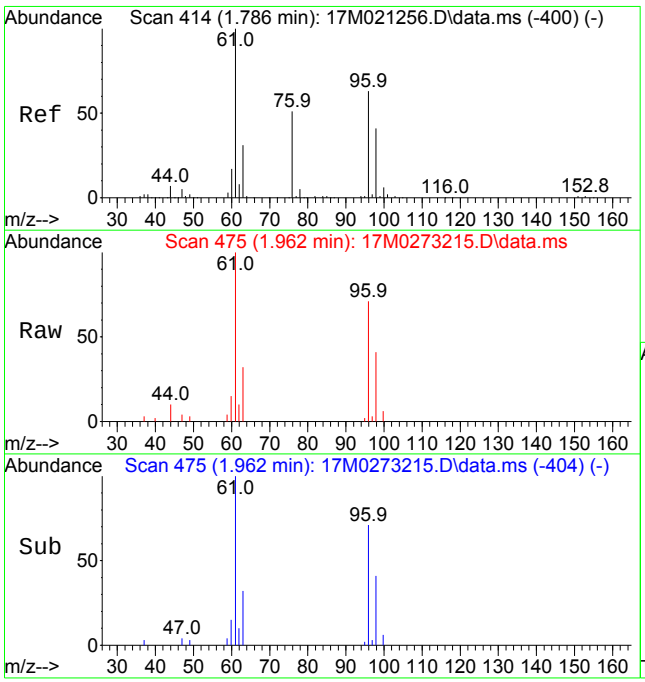
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273215.D Vial: 13
Acq On : 01 May 2017 16:28 Operator: ADC
Sample : L17041203-26 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



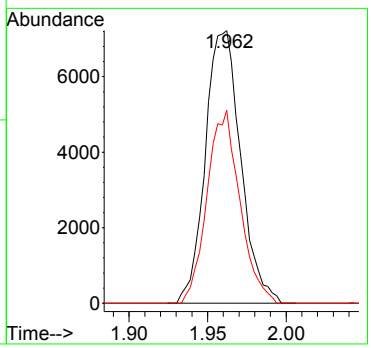
826VMS.M Tue May 02 08:56:08 2017 Page: 2

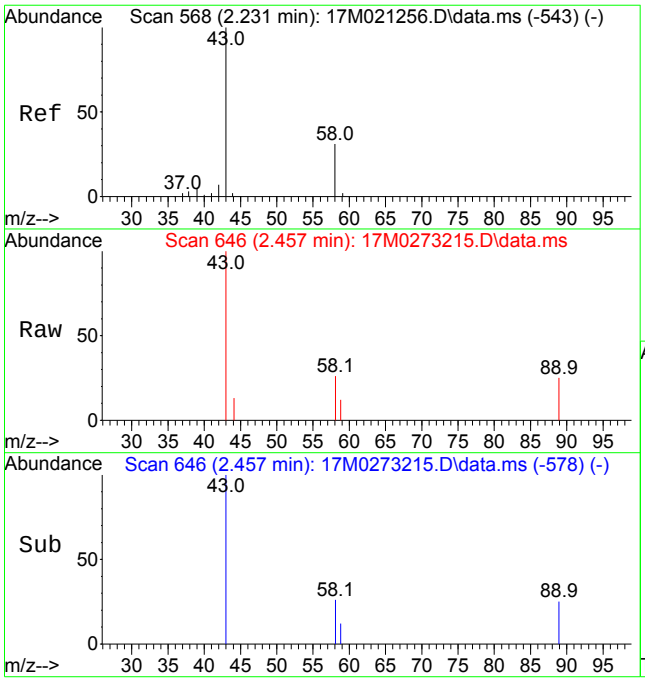


#10
1,1-Dichloroethene
Concen: 2.1129 ug/L
RT: 1.962 min Scan# 475
Delta R.T. 0.006 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion: 61 Resp: 11285

Ion	Ratio	Lower	Upper
61	100		
96	65.7	52.9	79.3

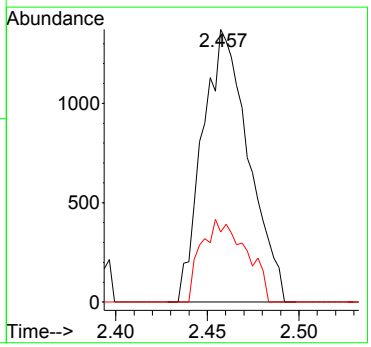


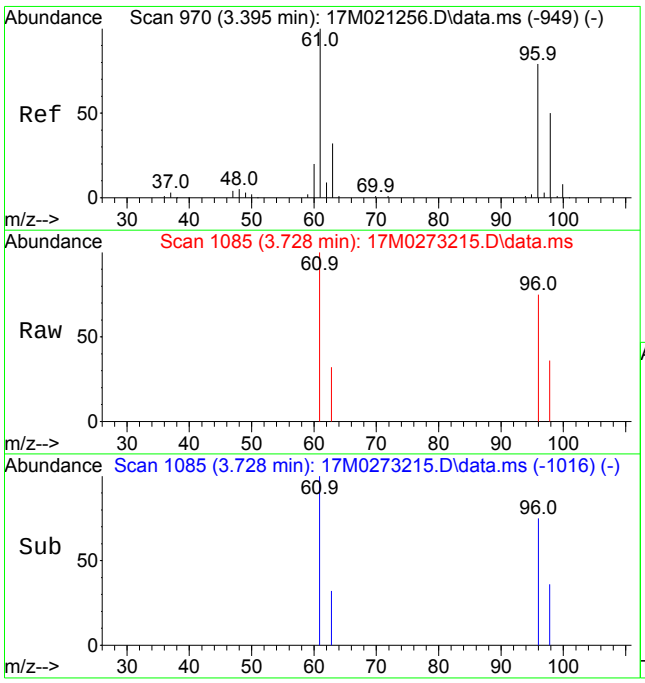


#16
Acetone
Concen: 3.4420 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion: 43 Resp: 2393

Ion	Ratio	Lower	Upper
43	100		
58	29.3	19.4	45.2

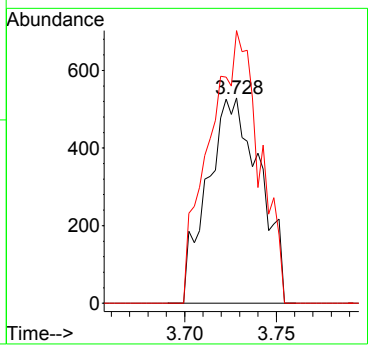


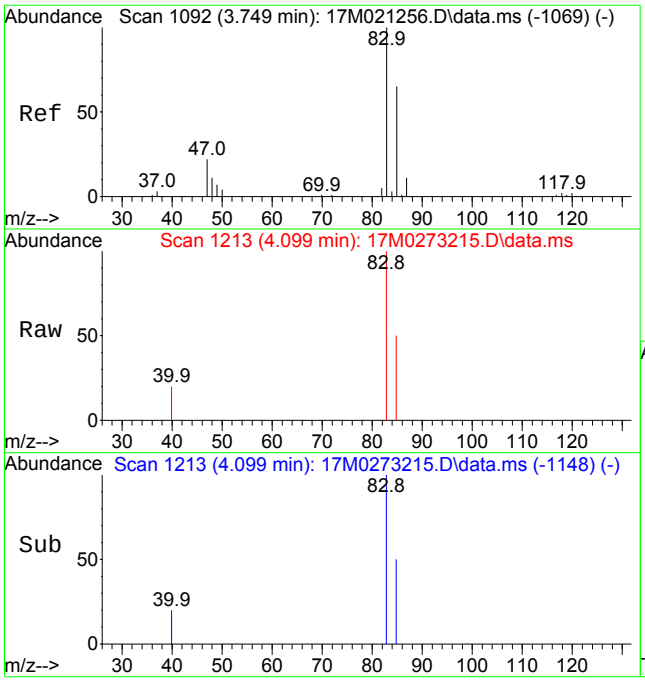


#23
cis-1,2-Dichloroethene
Concen: 0.2563 ug/L
RT: 3.728 min Scan# 1085
Delta R.T. 0.000 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion: 96 Resp: 1055

Ion	Ratio	Lower	Upper
96	100		
61	126.8	98.1	147.1

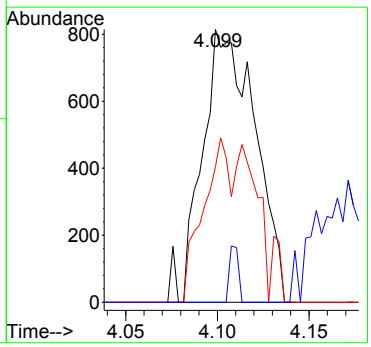


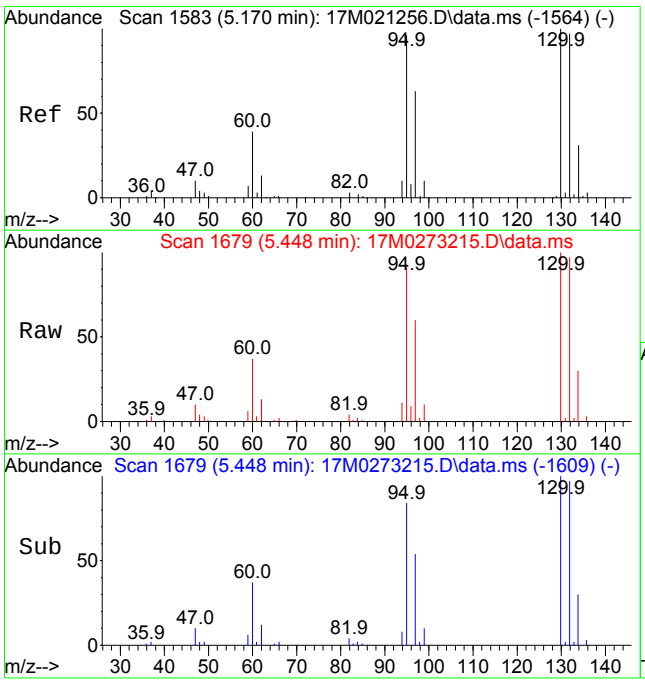


#27
Chloroform
Concen: 0.2408 ug/L
RT: 4.099 min Scan# 1213
Delta R.T. -0.011 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion: 83 Resp: 1640

Ion	Ratio	Lower	Upper
83	100		
85	30.6	39.2	91.4#
47	42.2	12.9	30.1#

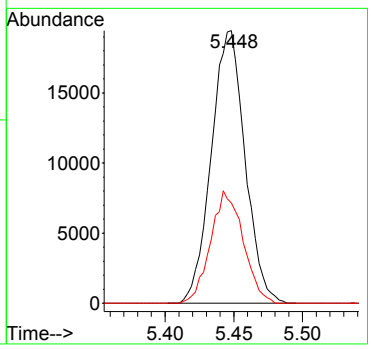


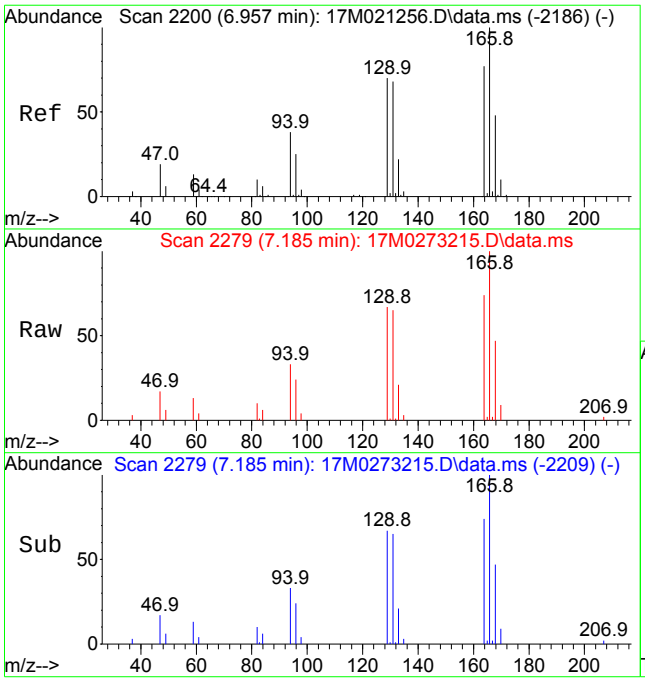


#37
Trichloroethene
Concen: 7.4917 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion:130 Resp: 33142

Ion	Ratio	Lower	Upper
130	100		
60	39.7	22.9	53.3

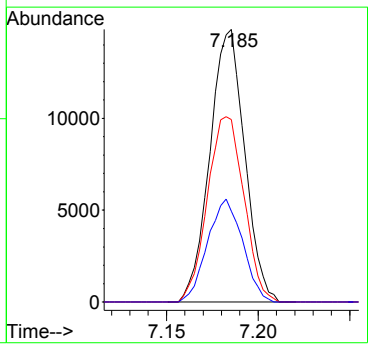


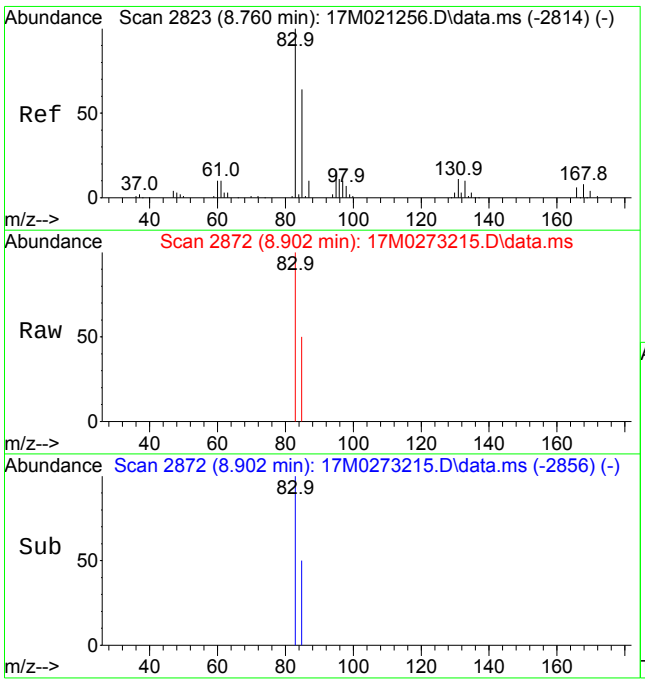


#49
Tetrachloroethene
Concen: 4.2855 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion:166 Resp: 19582

Ion	Ratio	Lower	Upper
166	100		
129	71.3	56.2	84.4
94	38.1	29.7	44.5

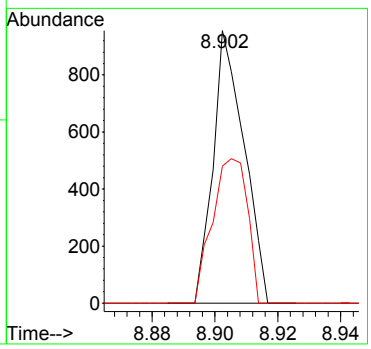




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2052 ug/L
RT: 8.902 min Scan# 2872
Delta R.T. -0.003 min
Lab File: 17M0273215.D
Acq: 01 May 2017 16:28

Tgt Ion: 83 Resp: 654

Ion	Ratio	Lower	Upper
83	100		
85	60.1	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273216.D Vial: 14
Acq On : 01 May 2017 16:48 Operator: ADC
Sample : L17041203-27 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

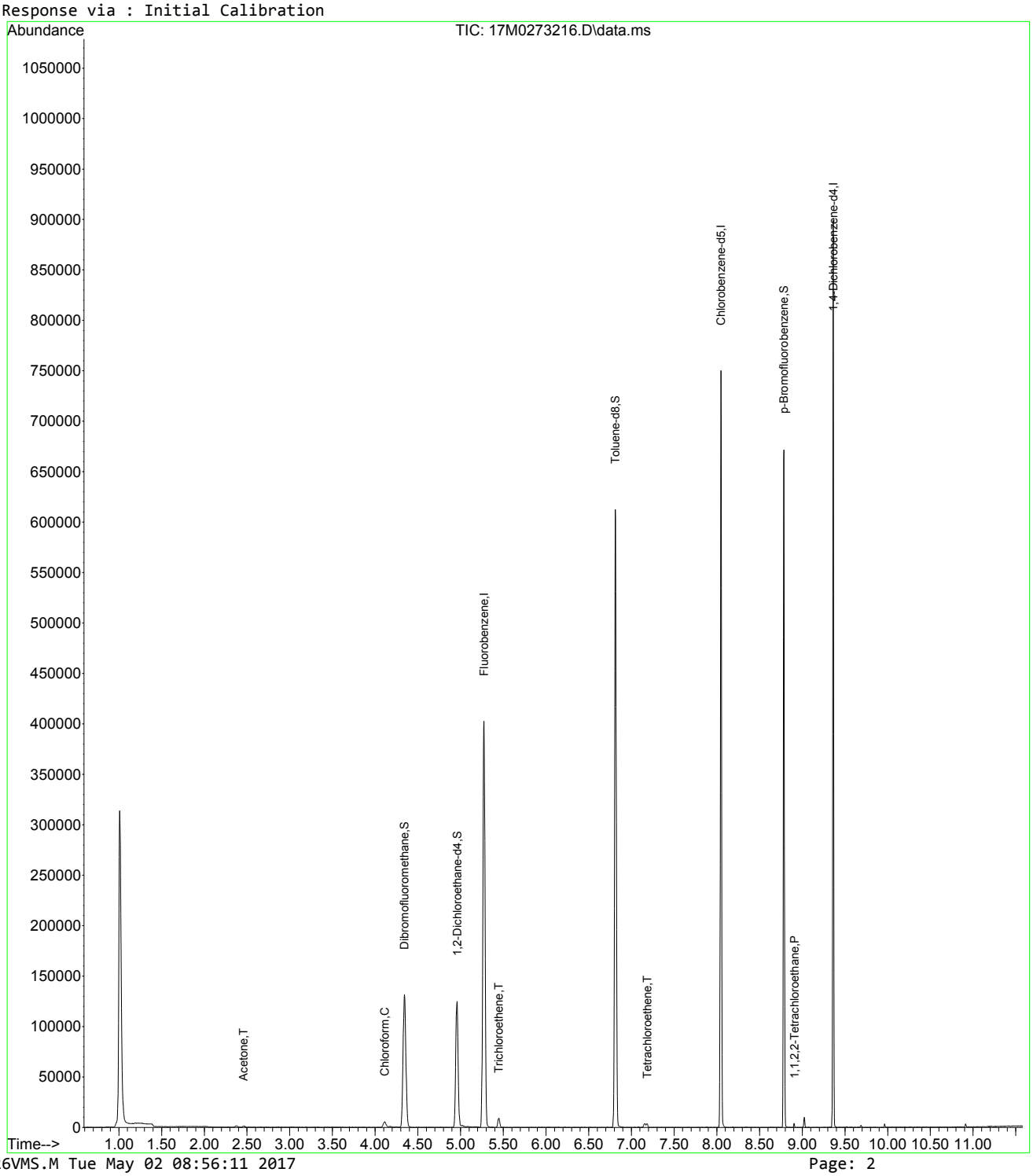
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	344572	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252635	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	118857	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	95050	25.5421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.168%			
34) 1,2-Dichloroethane-d4	4.959	65	91141	26.1295	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.518%			
47) Toluene-d8	6.812	98	329392	26.1254	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.502%			
66) p-Bromofluorobenzene	8.783	95	108607	27.2906	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.162%			
Target Compounds						Qvalue
16) Acetone	2.460	43	1332	1.9226	ug/L	85
27) Chloroform	4.110	83	6069	0.8943	ug/L	98
37) Trichloroethene	5.445	130	3204	0.7268	ug/L	99
49) Tetrachloroethene	7.185	166	888	0.1966	ug/L	88
69) 1,1,2,2-Tetrachloroethane	8.908	83	1260	0.3941	ug/L	89

(#) = qualifier out of range (m) = manual integration (+) = signals summed

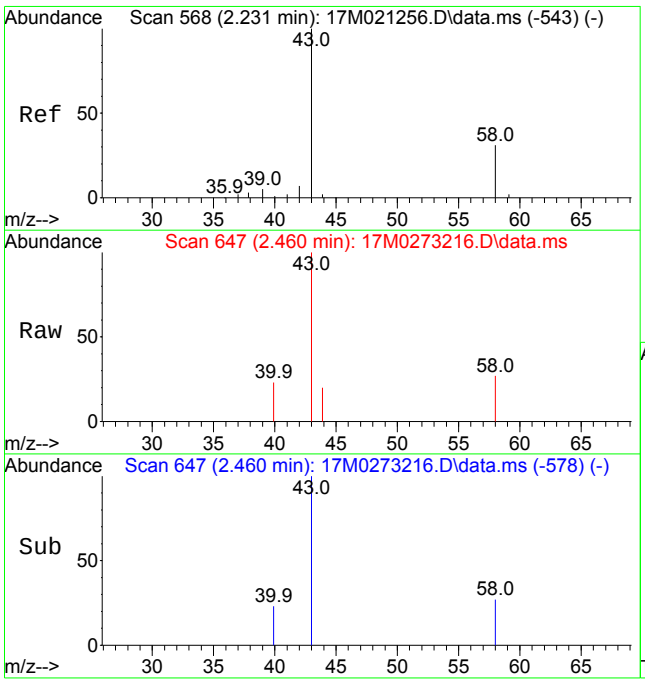
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273216.D Vial: 14
Acq On : 01 May 2017 16:48 Operator: ADC
Sample : L17041203-27 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



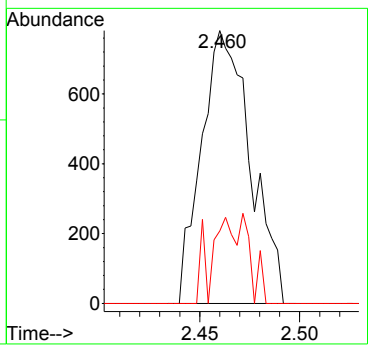
826VMS.M Tue May 02 08:56:11 2017 Page: 2

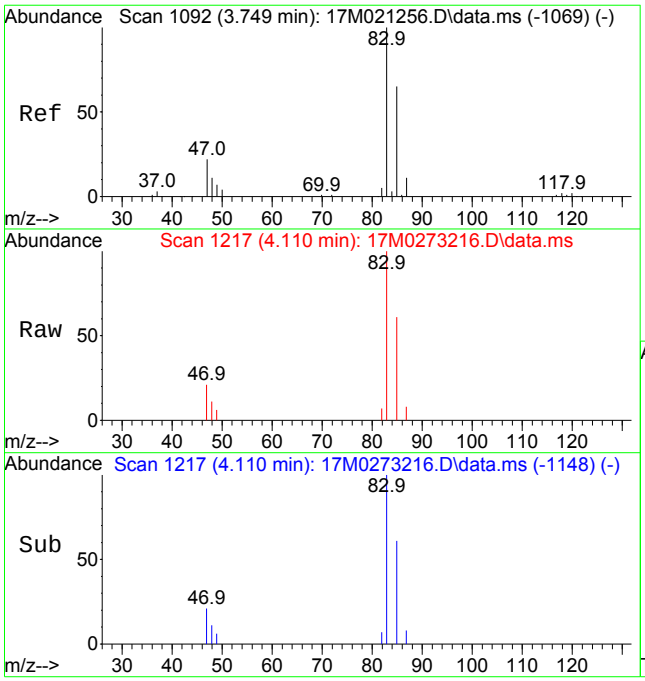


#16
Acetone
Concen: 1.9226 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273216.D
Acq: 01 May 2017 16:48

Tgt Ion: 43 Resp: 1332

Ion	Ratio	Lower	Upper
43	100		
58	24.0	19.4	45.2

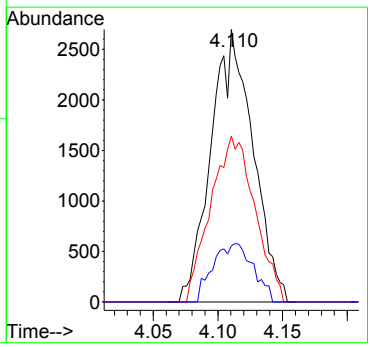


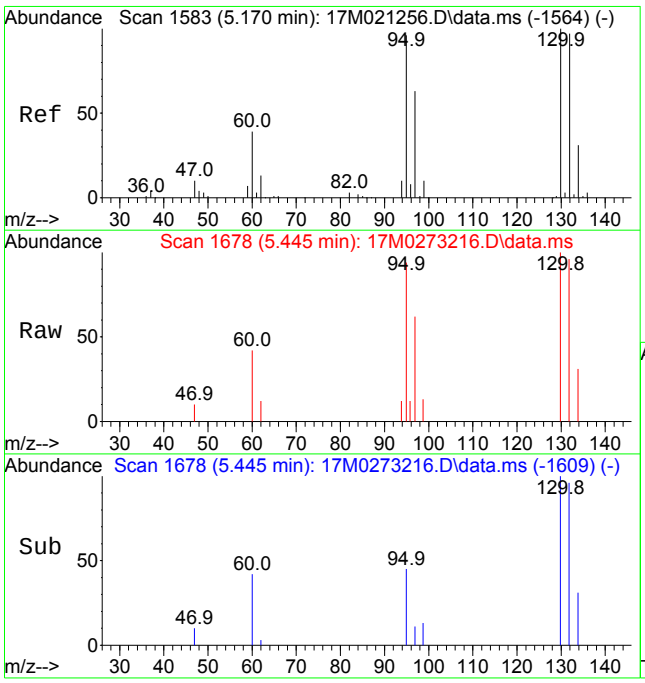


#27
Chloroform
Concen: 0.8943 ug/L
RT: 4.110 min Scan# 1217
Delta R.T. 0.000 min
Lab File: 17M0273216.D
Acq: 01 May 2017 16:48

Tgt Ion: 83 Resp: 6069

Ion	Ratio	Lower	Upper
83	100		
85	64.0	39.2	91.4
47	20.5	12.9	30.1

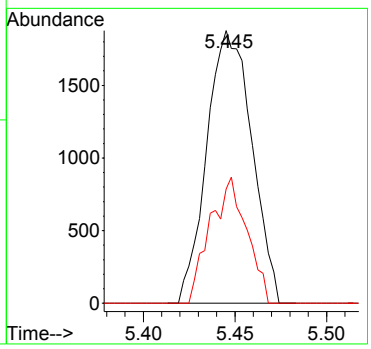


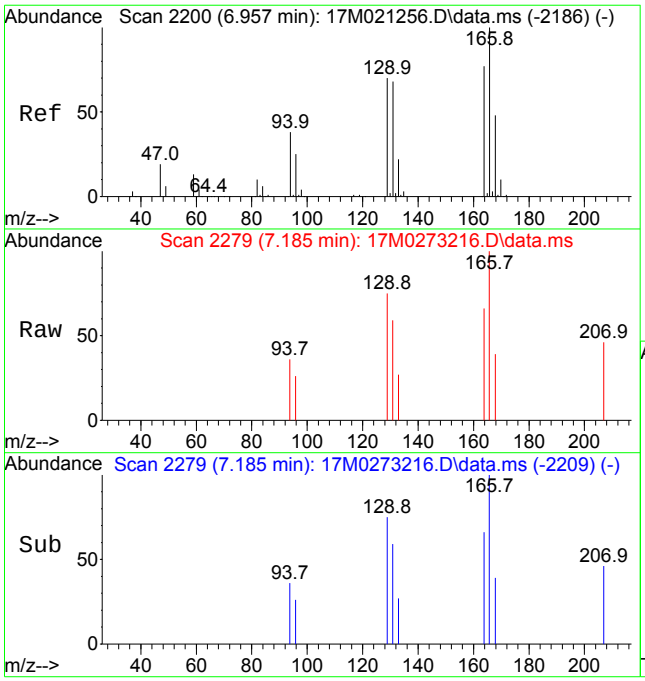


#37
Trichloroethene
Concen: 0.7268 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273216.D
Acq: 01 May 2017 16:48

Tgt Ion:130 Resp: 3204

Ion	Ratio	Lower	Upper
130	100		
60	37.7	22.9	53.3

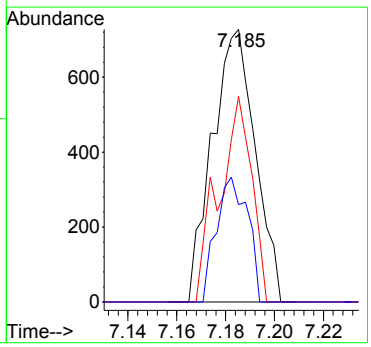


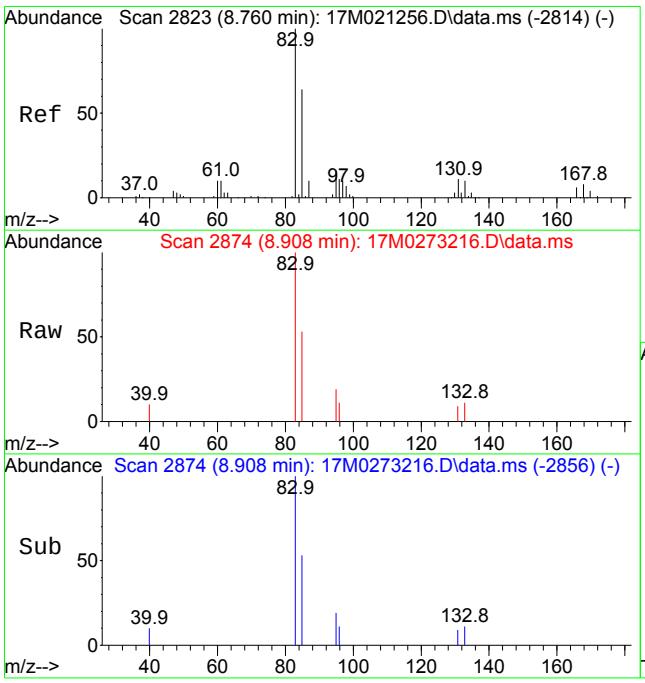


#49
Tetrachloroethene
Concen: 0.1966 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273216.D
Acq: 01 May 2017 16:48

Tgt Ion:166 Resp: 888

Ion	Ratio	Lower	Upper
166	100		
129	57.7	56.2	84.4
94	33.3	29.7	44.5

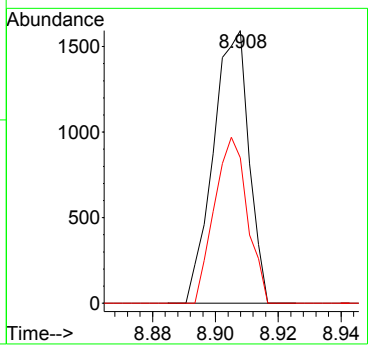




#69
1,1,2,2-Tetrachloroethane
Concen: 0.3941 ug/L
RT: 8.908 min Scan# 2874
Delta R.T. 0.003 min
Lab File: 17M0273216.D
Acq: 01 May 2017 16:48

Tgt Ion: 83 Resp: 1260

Ion	Ratio	Lower	Upper
83	100		
85	56.3	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273217.D Vial: 15
Acq On : 01 May 2017 17:17 Operator: ADC
Sample : L17041203-28 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

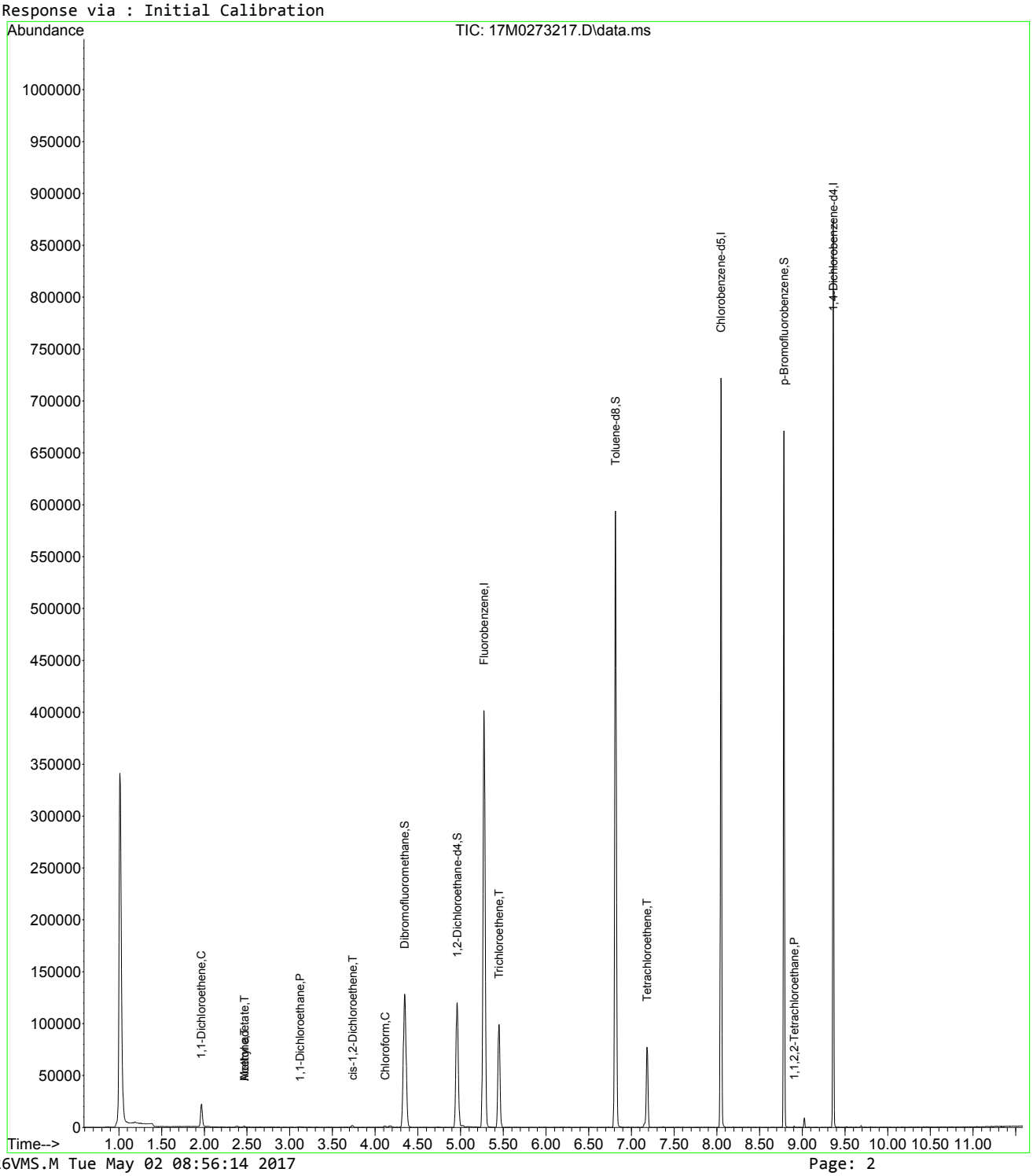
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	340443	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	249665	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	116684	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	92176	25.0702	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.281%			
34) 1,2-Dichloroethane-d4	4.959	65	87860	25.4943	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.977%			
47) Toluene-d8	6.815	98	321196	25.7784	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.114%			
66) p-Bromofluorobenzene	8.786	95	109257	27.9652	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 111.861%			
Target Compounds						Qvalue
10) 1,1-Dichloroethene	1.965	61	11154	2.1210	ug/L	99
16) Acetone	2.469	43	1211	1.7691	ug/L #	73
18) Methyl acetate	2.469	43	1211	0.6748	ug/L #	56
20) 1,1-Dichloroethane	3.120	63	781	0.1214	ug/L #	43
23) cis-1,2-Dichloroethene	3.737	96	951	0.2346	ug/L	84
27) Chloroform	4.116	83	1570	0.2341	ug/L #	86
37) Trichloroethene	5.448	130	32570	7.4776	ug/L	97
49) Tetrachloroethene	7.182	166	18814	4.2141	ug/L	98
69) 1,1,2,2-Tetrachloroethane	8.905	83	566	0.1803	ug/L	86

(#) = qualifier out of range (m) = manual integration (+) = signals summed

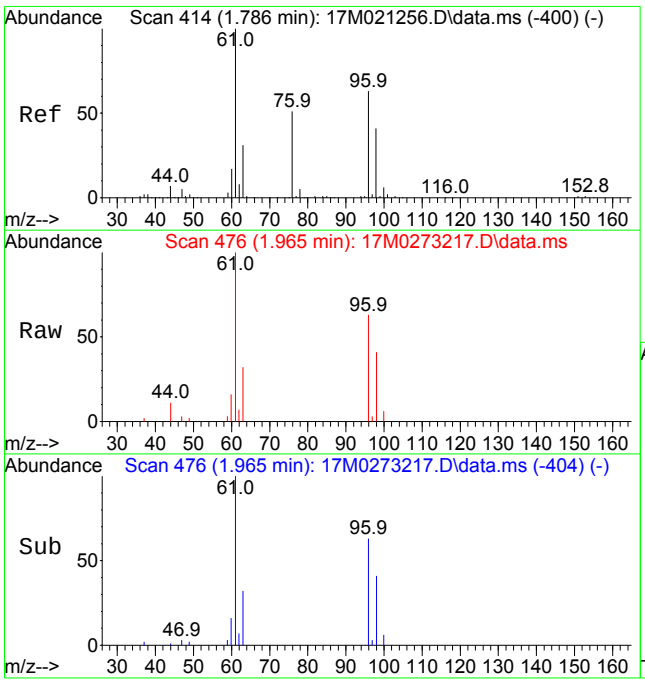
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273217.D Vial: 15
Acq On : 01 May 2017 17:17 Operator: ADC
Sample : L17041203-28 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:13 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



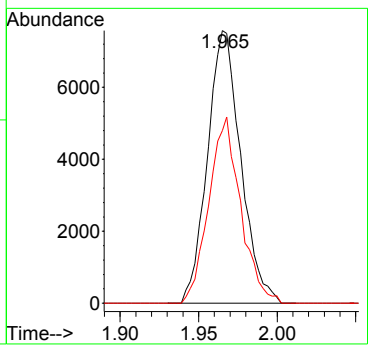
826VMS.M Tue May 02 08:56:14 2017 Page: 2

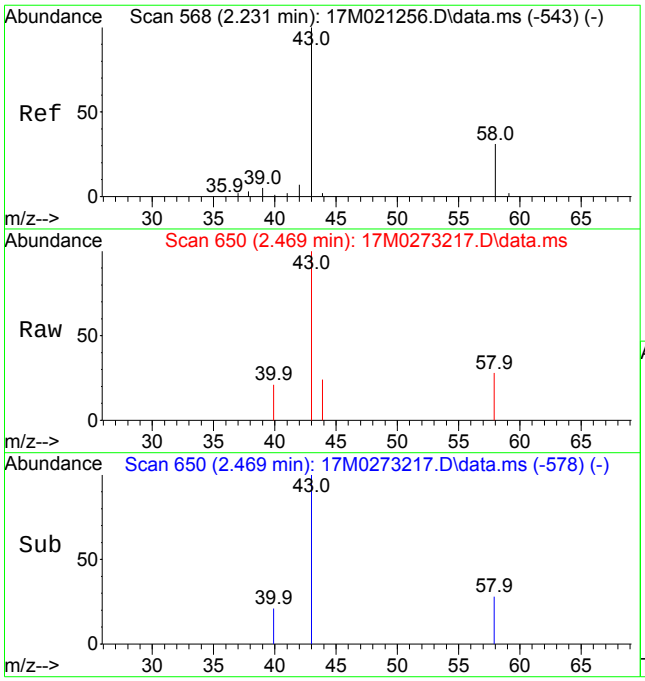


#10
1,1-Dichloroethene
Concen: 2.1210 ug/L
RT: 1.965 min Scan# 476
Delta R.T. 0.009 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 61 Resp: 11154

Ion	Ratio	Lower	Upper
61	100		
96	65.3	52.9	79.3

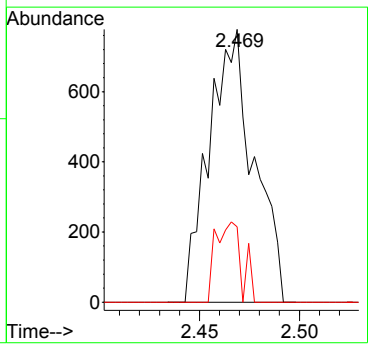


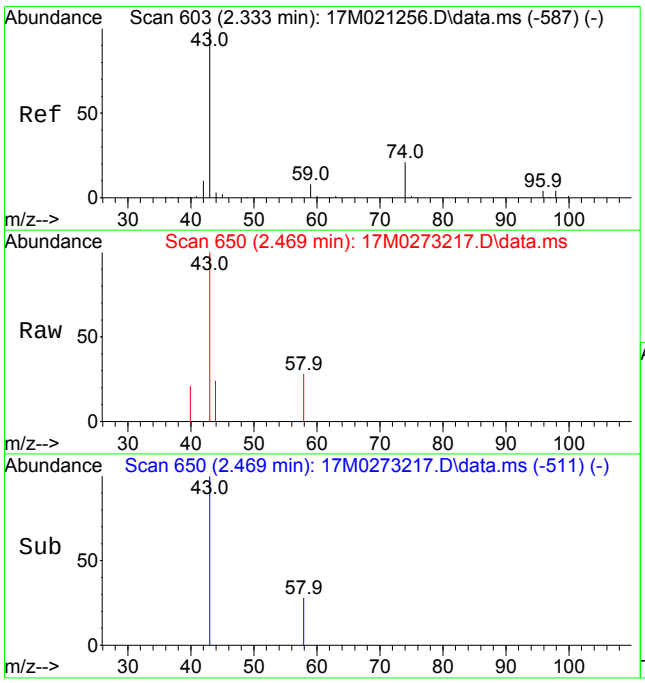


#16
Acetone
Concen: 1.7691 ug/L
RT: 2.469 min Scan# 650
Delta R.T. 0.009 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 43 Resp: 1211

Ion	Ratio	Lower	Upper
43	100		
58	17.2	19.4	45.2#

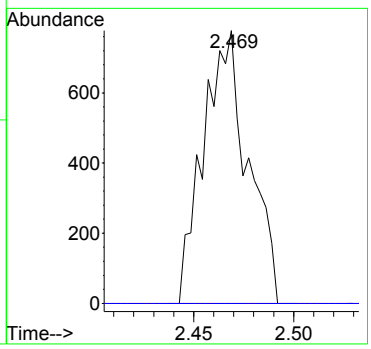


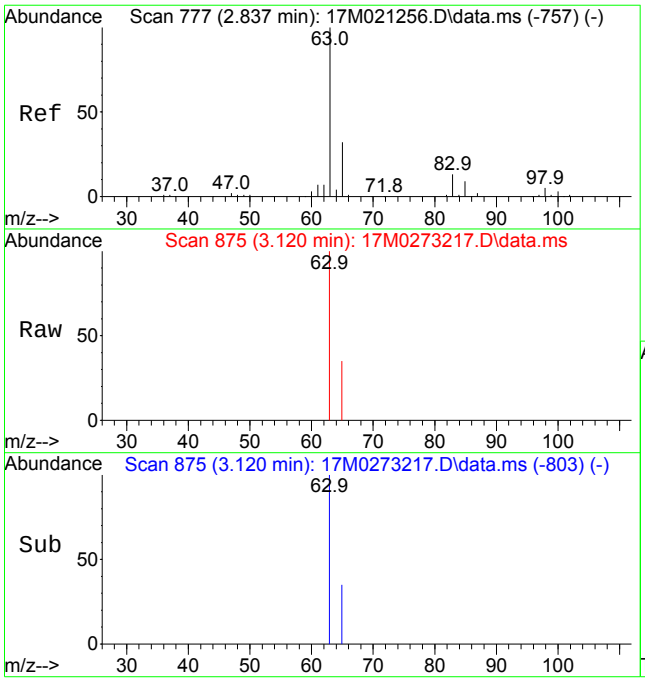


#18
Methyl acetate
Concen: 0.6748 ug/L
RT: 2.469 min Scan# 650
Delta R.T. -0.098 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 43 Resp: 1211

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

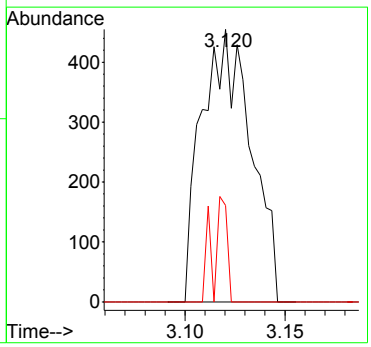


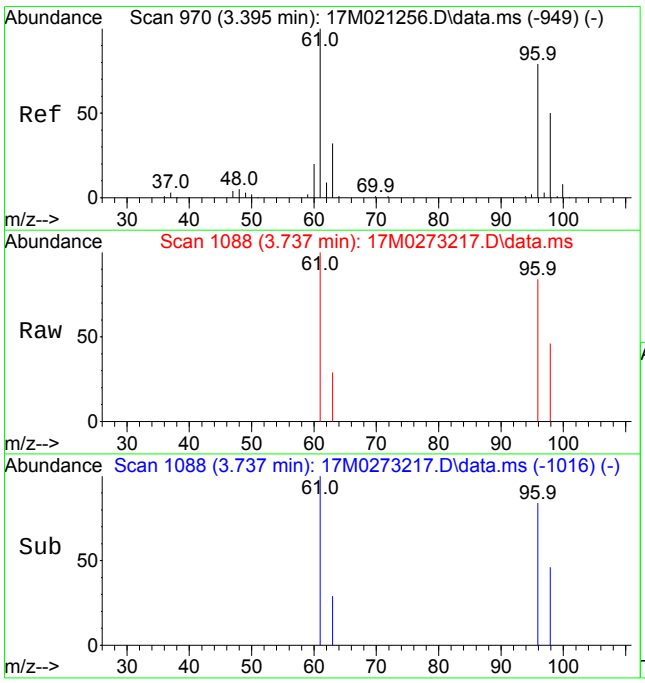


#20
1,1-Dichloroethane
Concen: 0.1214 ug/L
RT: 3.120 min Scan# 875
Delta R.T. 0.009 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 63 Resp: 781

Ion	Ratio	Lower	Upper
63	100		
65	0.0	25.4	38.2#

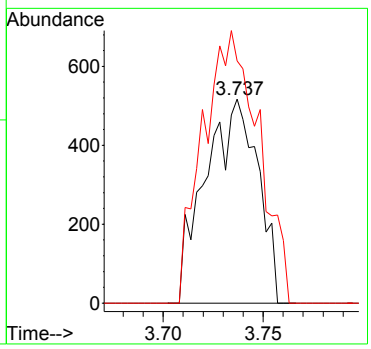


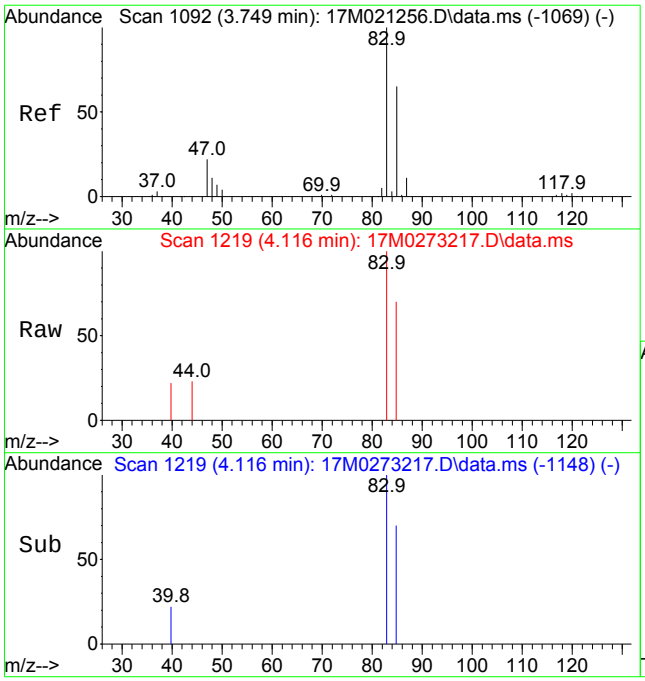


#23
cis-1,2-Dichloroethene
Concen: 0.2346 ug/L
RT: 3.737 min Scan# 1088
Delta R.T. 0.009 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 96 Resp: 951

Ion	Ratio	Lower	Upper
96	100		
61	140.6	98.1	147.1

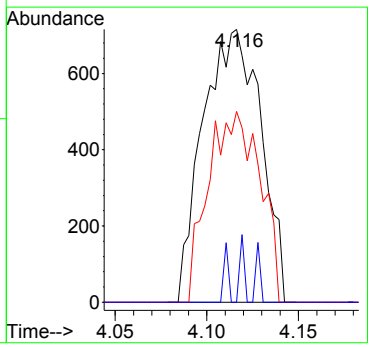


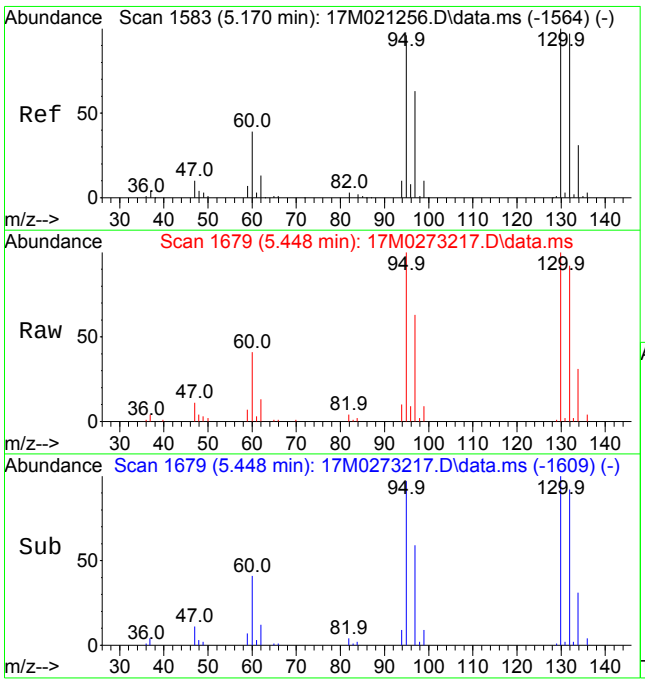


#27
Chloroform
Concen: 0.2341 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 83 Resp: 1570

Ion	Ratio	Lower	Upper
83	100		
85	62.6	39.2	91.4
47	0.0	12.9	30.1#

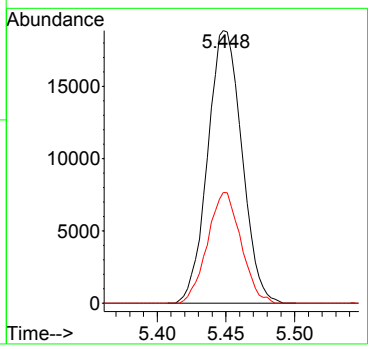


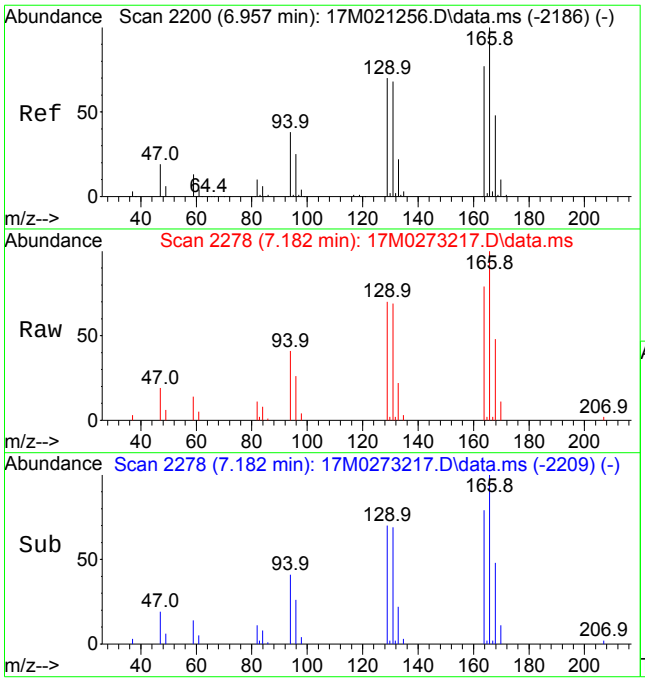


#37
Trichloroethene
Concen: 7.4776 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion:130 Resp: 32570

Ion	Ratio	Lower	Upper
130	100		
60	39.9	22.9	53.3

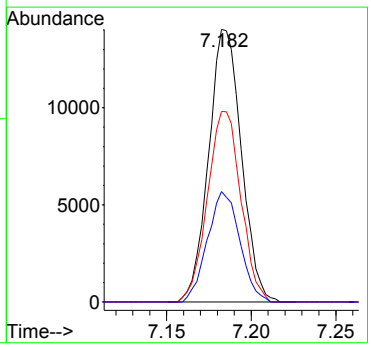


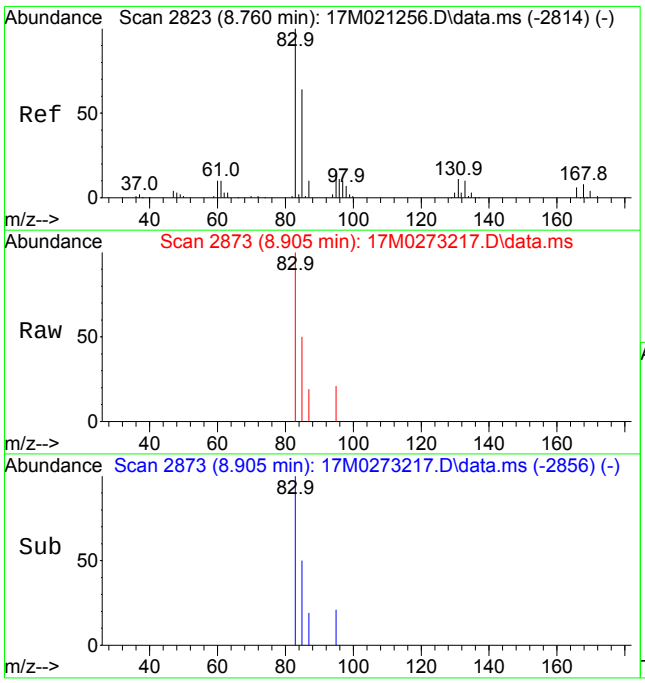


#49
Tetrachloroethene
Concen: 4.2141 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion:166 Resp: 18814

Ion	Ratio	Lower	Upper
166	100		
129	71.3	56.2	84.4
94	40.0	29.7	44.5

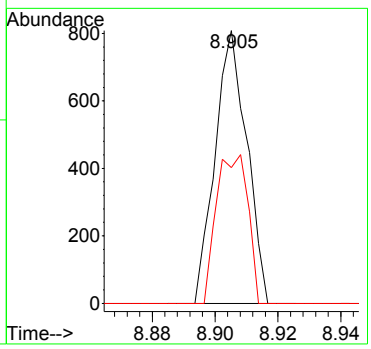




#69
1,1,2,2-Tetrachloroethane
Concen: 0.1803 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273217.D
Acq: 01 May 2017 17:17

Tgt Ion: 83 Resp: 566

Ion	Ratio	Lower	Upper
83	100		
85	54.2	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273218.D Vial: 16
Acq On : 01 May 2017 17:37 Operator: ADC
Sample : L17041203-29 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

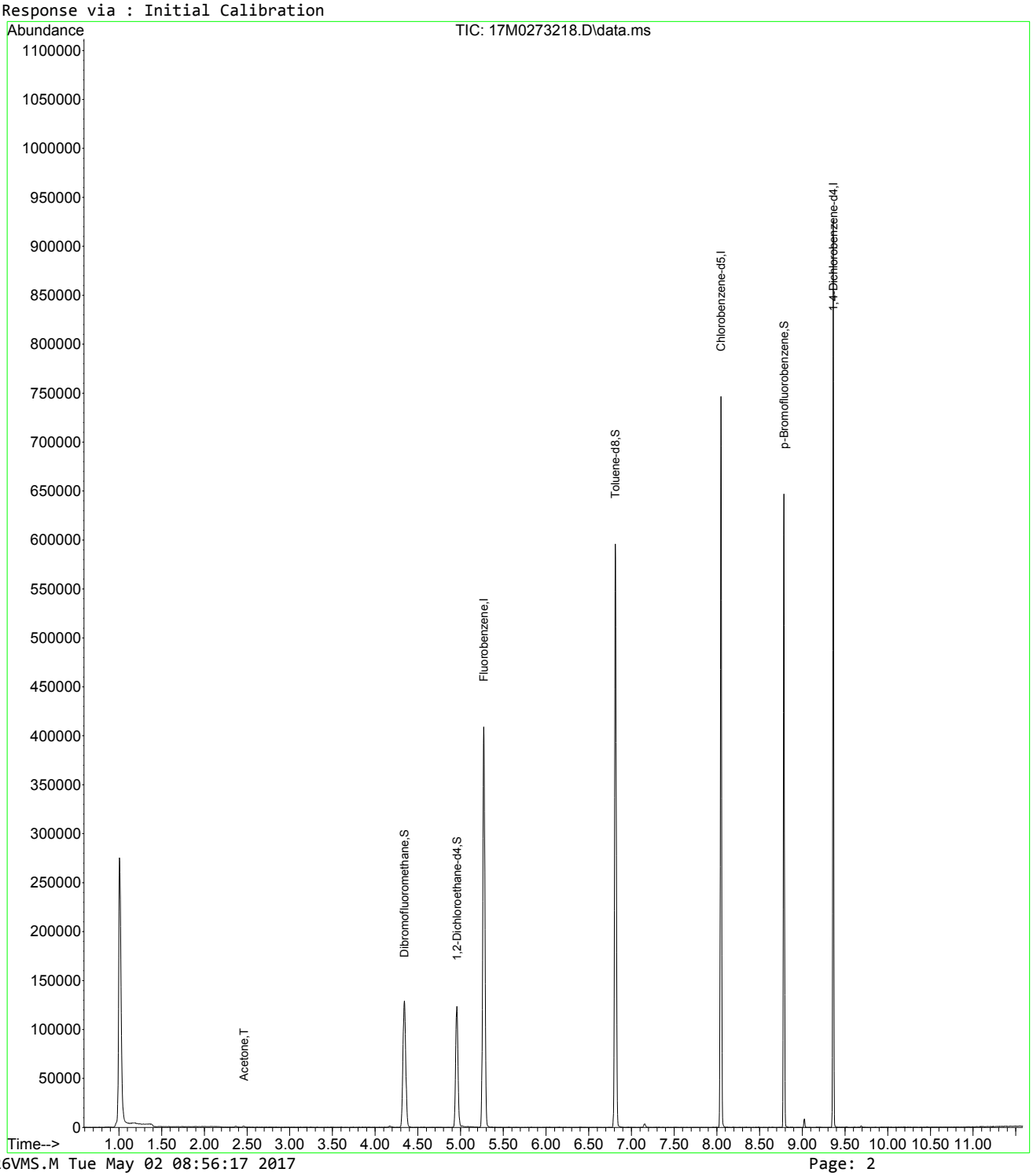
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	348107	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	255719	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	122473	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	92923	24.7170	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.868%			
34) 1,2-Dichloroethane-d4	4.956	65	89215	25.3176	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.270%			
47) Toluene-d8	6.812	98	319942	25.0698	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.279%			
66) p-Bromofluorobenzene	8.786	95	103952	25.3496	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.398%			
Target Compounds						Qvalue
16) Acetone	2.463	43	1182	1.6888	ug/L	83

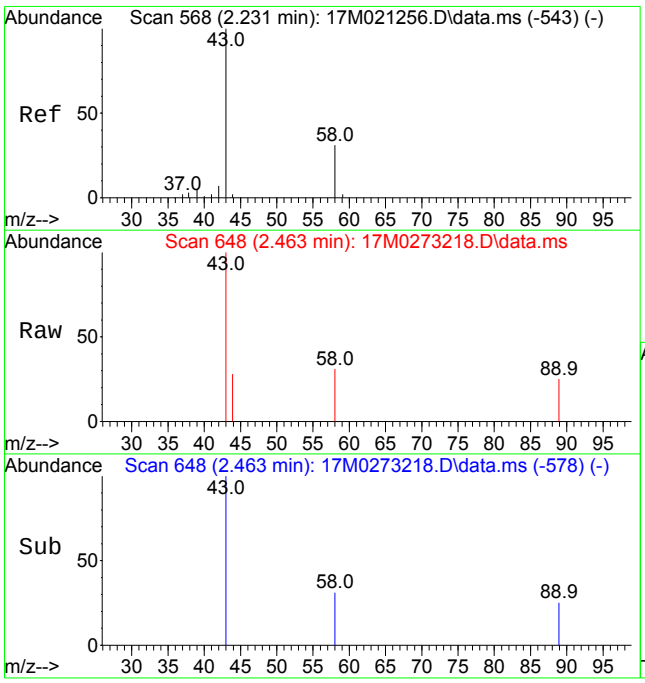
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273218.D Vial: 16
Acq On : 01 May 2017 17:37 Operator: ADC
Sample : L17041203-29 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

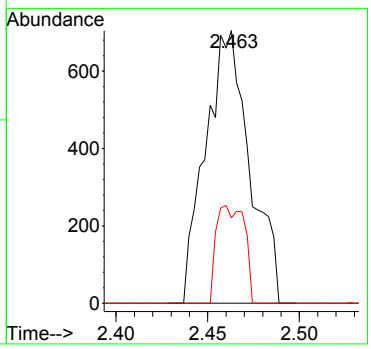




#16
Acetone
Concen: 1.6888 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273218.D
Acq: 01 May 2017 17:37

Tgt Ion: 43 Resp: 1182

Ion	Ratio	Lower	Upper
43	100		
58	22.8	19.4	45.2



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273219.D Vial: 17
Acq On : 01 May 2017 17:57 Operator: ADC
Sample : L17041203-30 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:19 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

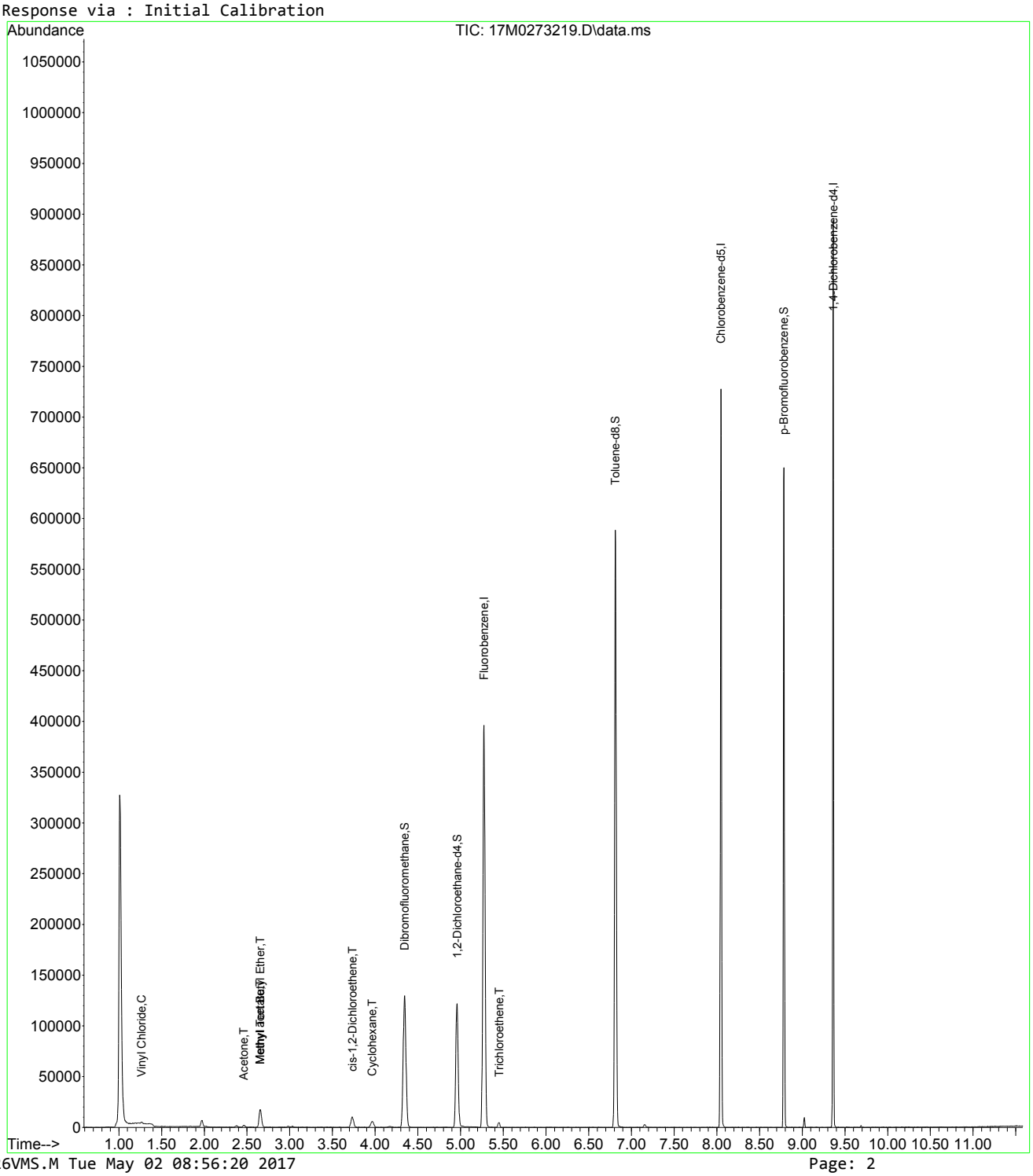
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.274	96	337187	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	247421	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	118229	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.345	111	92538	25.4117 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.647%		
34) 1,2-Dichloroethane-d4	4.959	65	88440	25.9105 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.642%		
47) Toluene-d8	6.812	98	319398	25.8666 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.466%		
66) p-Bromofluorobenzene	8.784	95	105872	26.7446 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.978%		
Target Compounds					Qvalue
4) Vinyl Chloride	1.264	62	952	0.2194 ug/L	95
16) Acetone	2.460	43	2452	3.6167 ug/L	84
18) Methyl acetate	2.651	43	3545	1.9945 ug/L #	82
19) Methyl Tert Butyl Ether	2.654	73	17659	1.9620 ug/L	100
23) cis-1,2-Dichloroethene	3.734	96	6060	1.5096 ug/L	99
25) Cyclohexane	3.966	56	3635	0.6709 ug/L #	80
37) Trichloroethene	5.451	130	1779	0.4124 ug/L	90

(#) = qualifier out of range (m) = manual integration (+) = signals summed

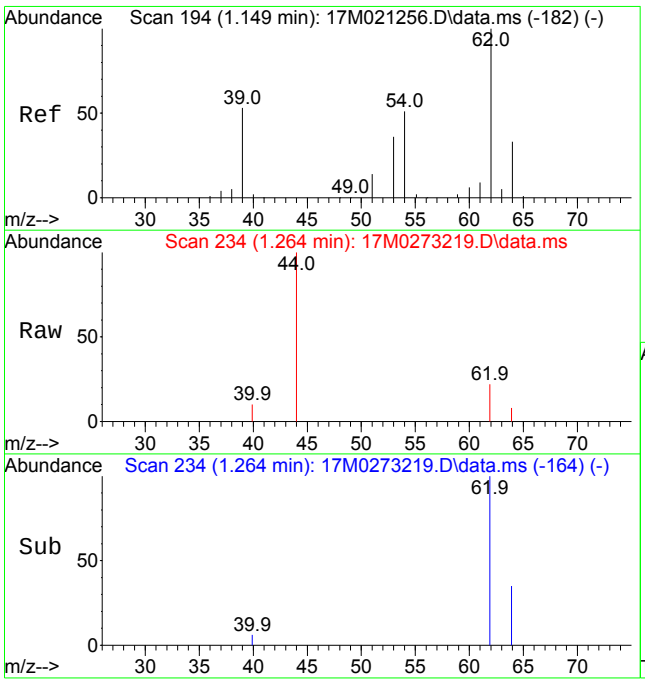
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273219.D Vial: 17
Acq On : 01 May 2017 17:57 Operator: ADC
Sample : L17041203-30 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:19 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



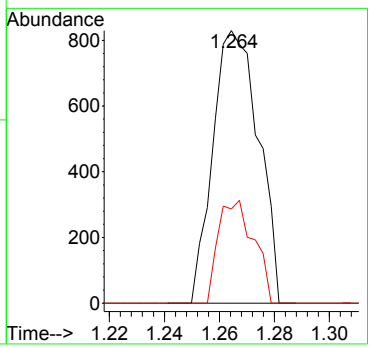
826VMS.M Tue May 02 08:56:20 2017 Page: 2

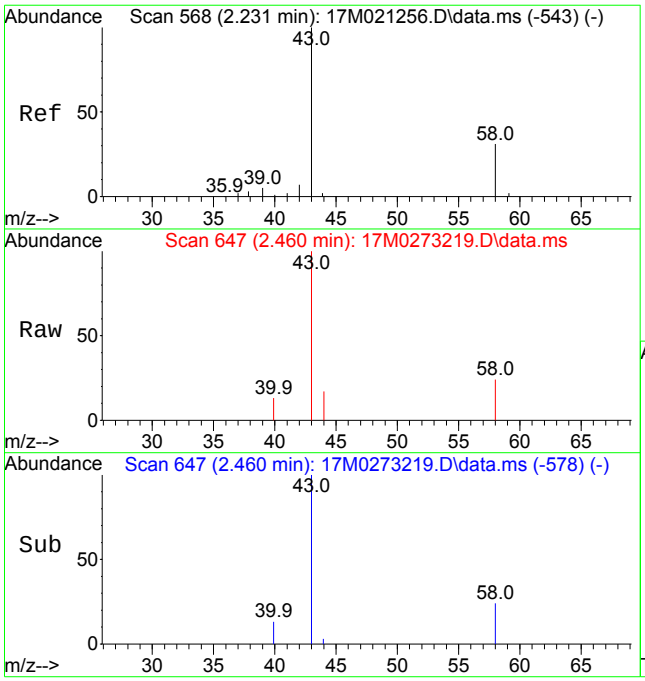


#4
Vinyl Chloride
Concen: 0.2194 ug/L
RT: 1.264 min Scan# 234
Delta R.T. 0.003 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 62 Resp: 952

Ion	Ratio	Lower	Upper
62	100		
64	29.4	19.2	44.8

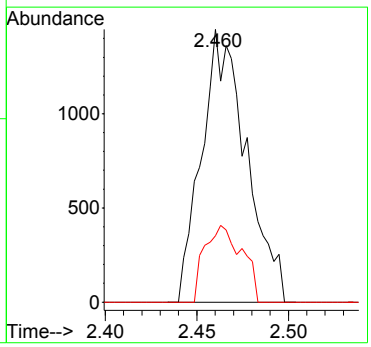


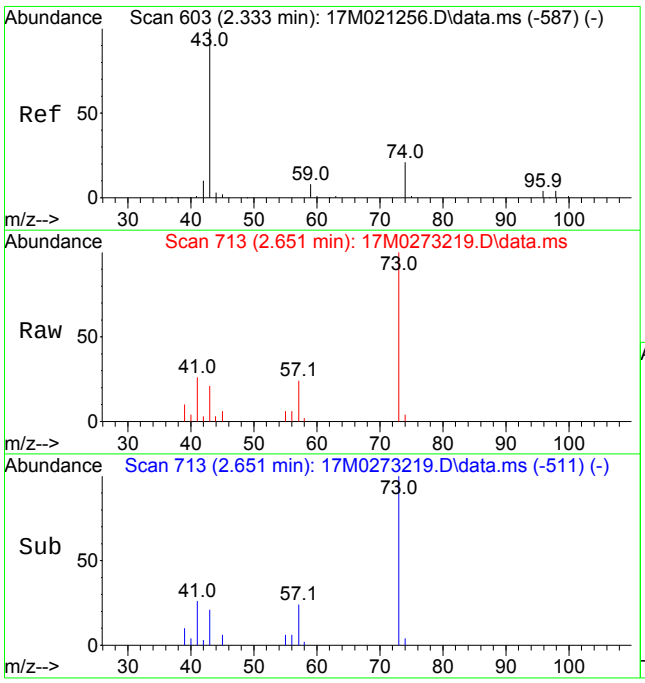


#16
Acetone
Concen: 3.6167 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 43 Resp: 2452

Ion	Ratio	Lower	Upper
43	100		
58	23.5	19.4	45.2

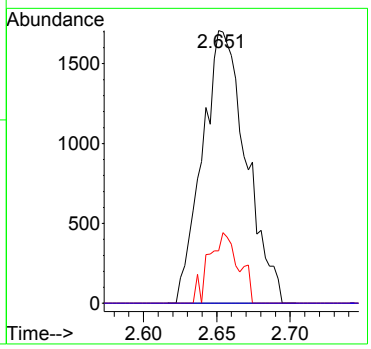


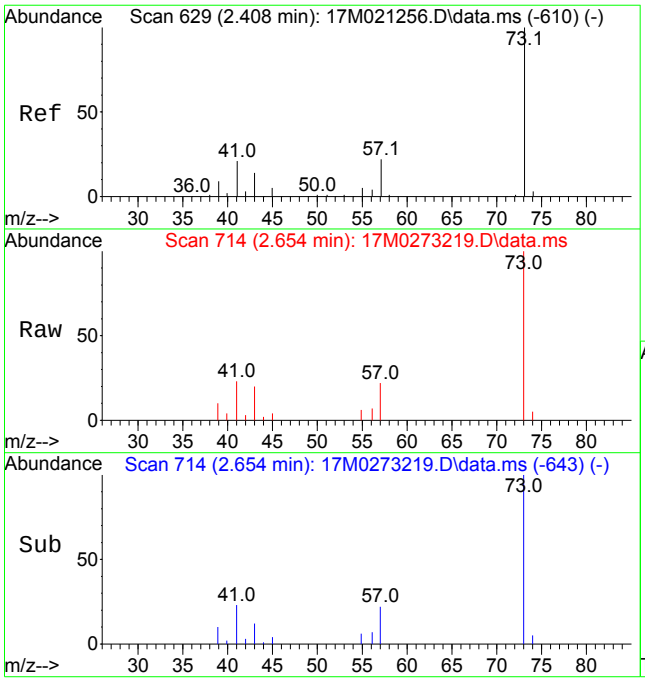


#18
Methyl acetate
Concen: 1.9945 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.084 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 43 Resp: 3545

Ion	Ratio	Lower	Upper
43	100		
74	17.5	25.4	25.4#
59	0.0	7.6	11.4#

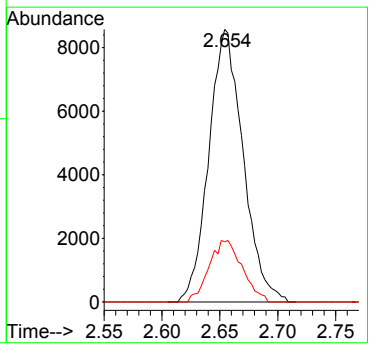


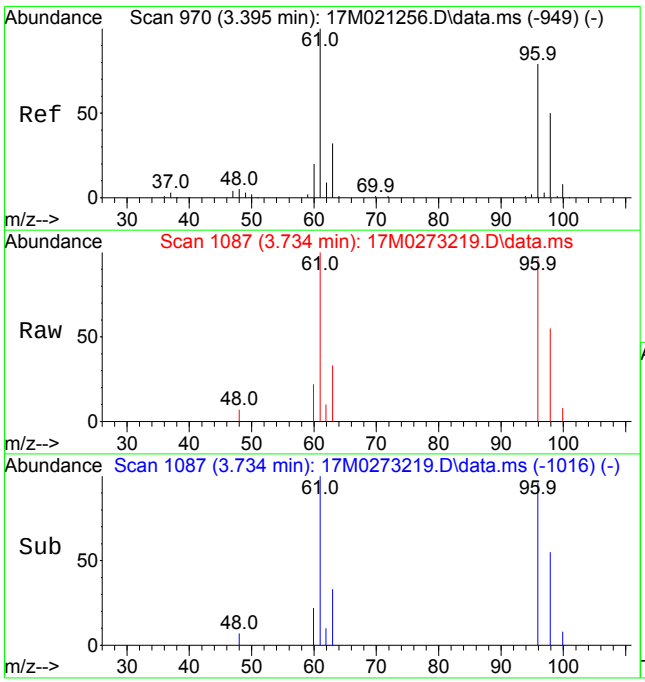


#19
Methyl Tert Butyl Ether
Concen: 1.9620 ug/L
RT: 2.654 min Scan# 714
Delta R.T. 0.006 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 73 Resp: 17659

Ion	Ratio	Lower	Upper
73	100		
57	21.8	17.6	26.4

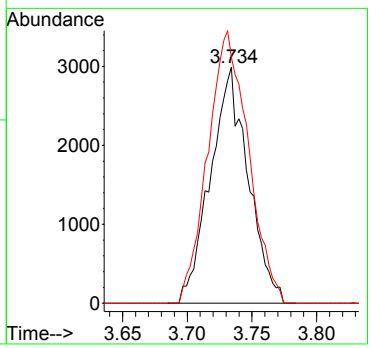


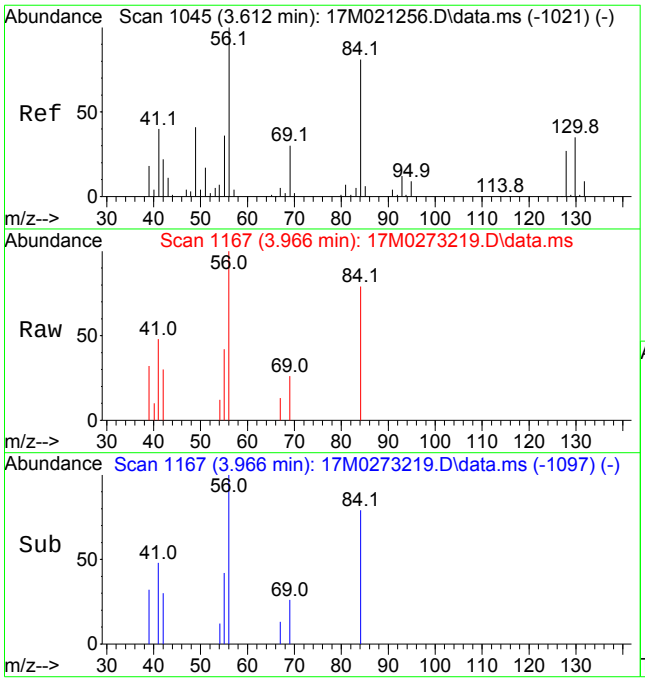


#23
cis-1,2-Dichloroethene
Concen: 1.5096 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 96 Resp: 6060

Ion	Ratio	Lower	Upper
96	100		
61	123.7	98.1	147.1

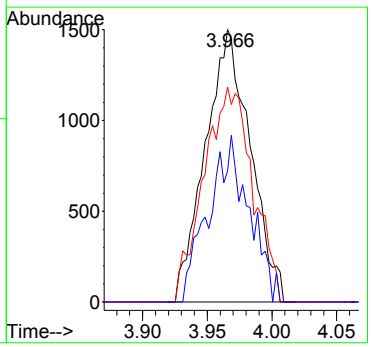


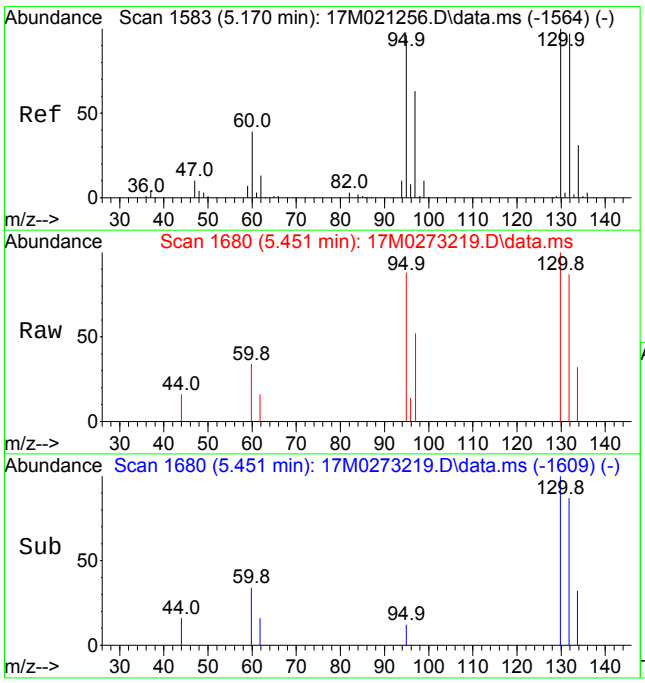


#25
Cyclohexane
Concen: 0.6709 ug/L
RT: 3.966 min Scan# 1167
Delta R.T. 0.003 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion: 56 Resp: 3635

Ion	Ratio	Lower	Upper
56	100		
84	85.6	69.4	104.0
41	54.7	72.2	108.2#

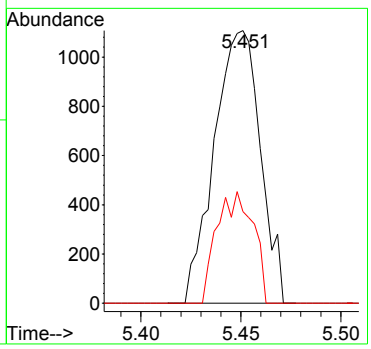




#37
Trichloroethene
Concen: 0.4124 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273219.D
Acq: 01 May 2017 17:57

Tgt Ion:130 Resp: 1779

Ion	Ratio	Lower	Upper
130	100		
60	32.2	22.9	53.3



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273220.D Vial: 18
Acq On : 01 May 2017 18:16 Operator: ADC
Sample : L17041203-31 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:22 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

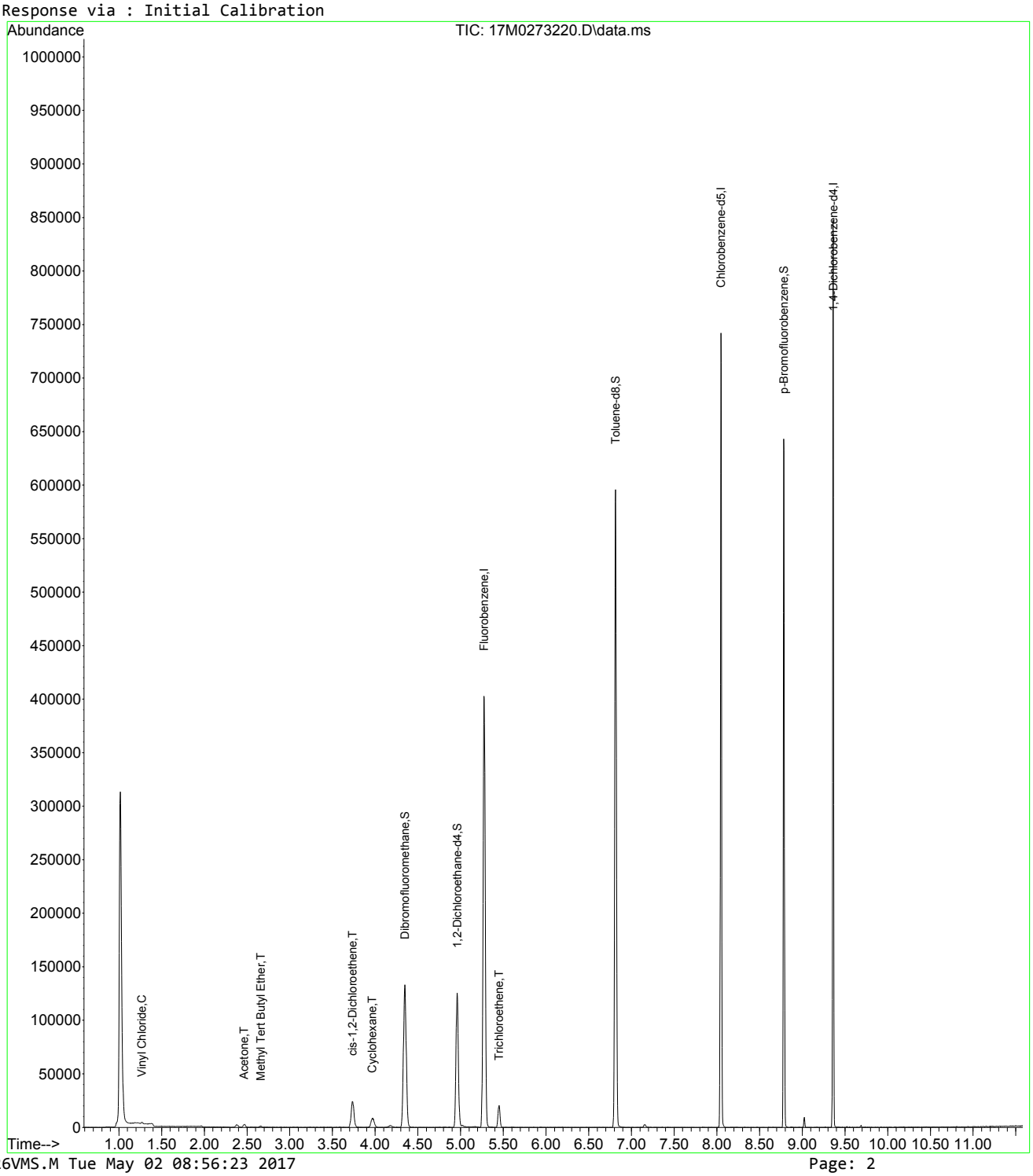
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	340513	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	246989	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	117457	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	94781	25.7734	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.094%			
34) 1,2-Dichloroethane-d4	4.959	65	90334	26.2068	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.827%			
47) Toluene-d8	6.815	98	323585	26.2515	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.006%			
66) p-Bromofluorobenzene	8.783	95	105692	26.8746	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.498%			
Target Compounds						Qvalue
4) Vinyl Chloride	1.267	62	1175	0.2681	ug/L	91
16) Acetone	2.463	43	3046	4.4490	ug/L	96
19) Methyl Tert Butyl Ether	2.660	73	1160	0.1276	ug/L #	75
23) cis-1,2-Dichloroethene	3.734	96	13968	3.4455	ug/L	98
25) Cyclohexane	3.966	56	5326	0.9734	ug/L #	82
37) Trichloroethene	5.448	130	7064	1.6215	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273220.D Vial: 18
Acq On : 01 May 2017 18:16 Operator: ADC
Sample : L17041203-31 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:22 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



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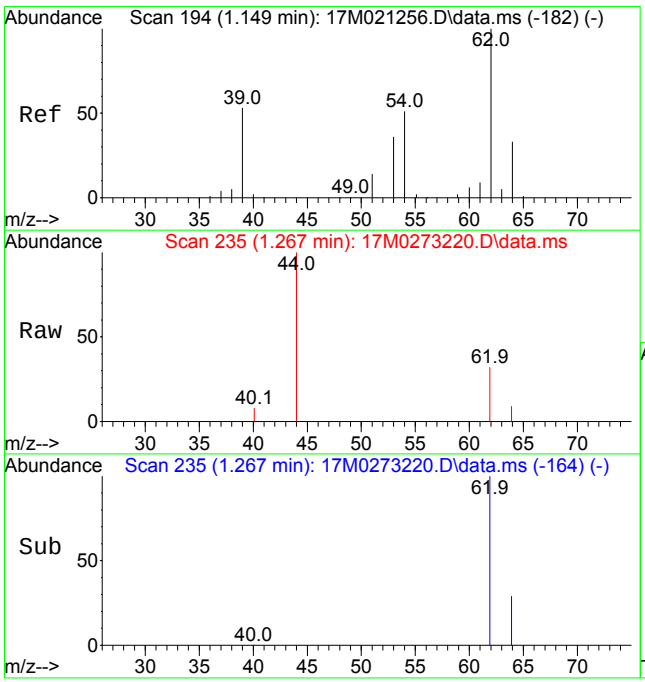
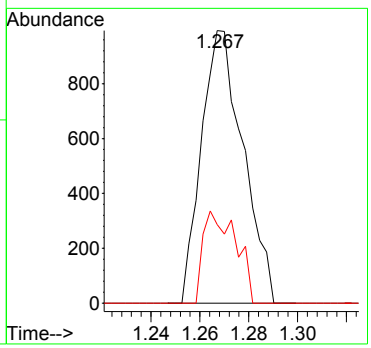
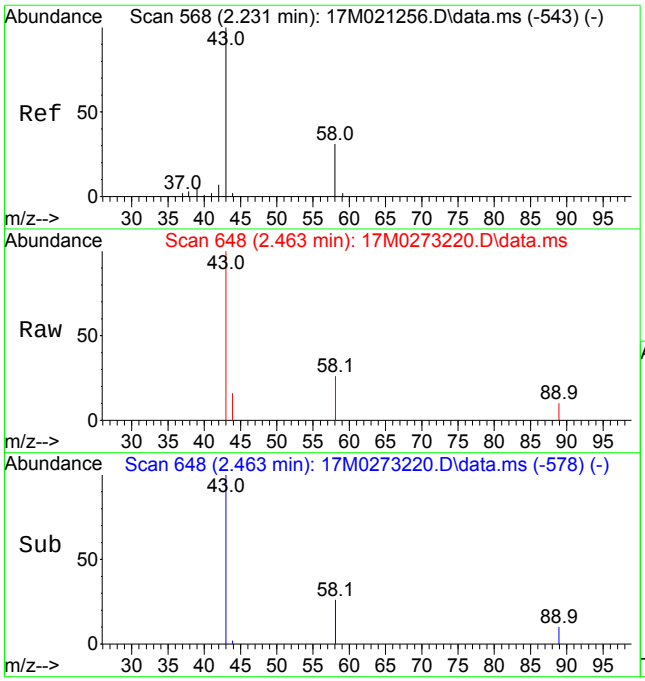


#4
Vinyl Chloride
Concen: 0.2681 ug/L
RT: 1.267 min Scan# 235
Delta R.T. 0.006 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion: 62 Resp: 1175

Ion	Ratio	Lower	Upper
62	100		
64	26.7	19.2	44.8

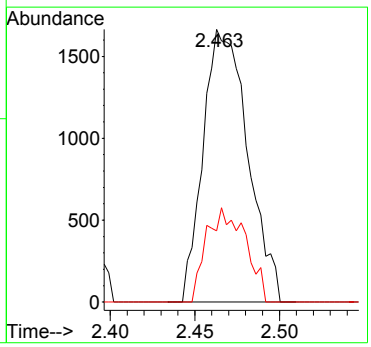


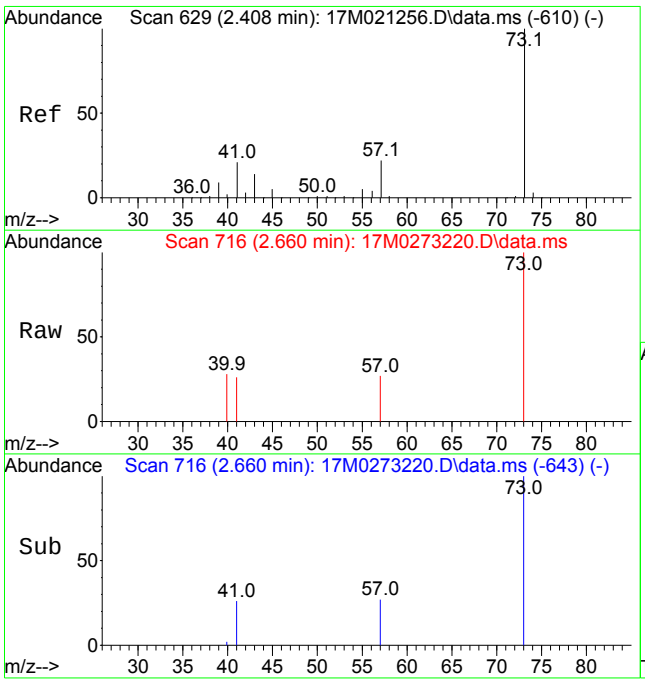


#16
Acetone
Concen: 4.4490 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion: 43 Resp: 3046

Ion	Ratio	Lower	Upper
43	100		
58	30.1	19.4	45.2

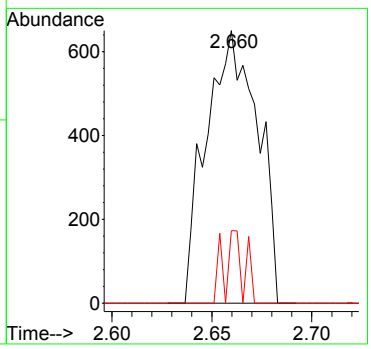


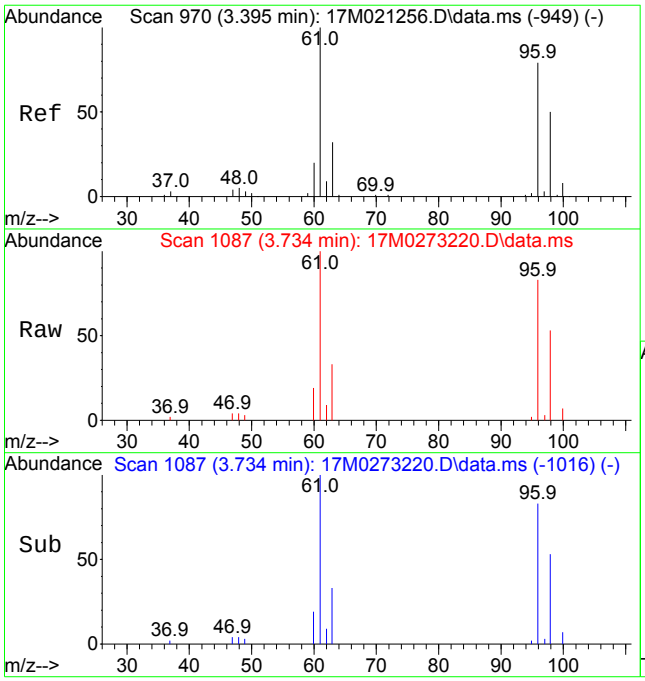


#19
Methyl Tert Butyl Ether
Concen: 0.1276 ug/L
RT: 2.660 min Scan# 716
Delta R.T. 0.012 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion: 73 Resp: 1160

Ion	Ratio	Lower	Upper
73	100		
57	10.1	17.6	26.4#

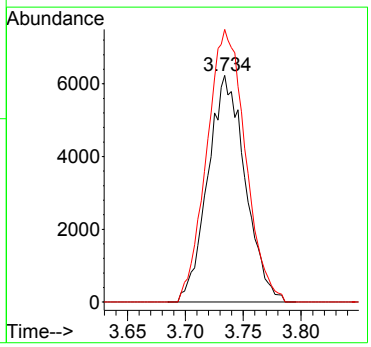


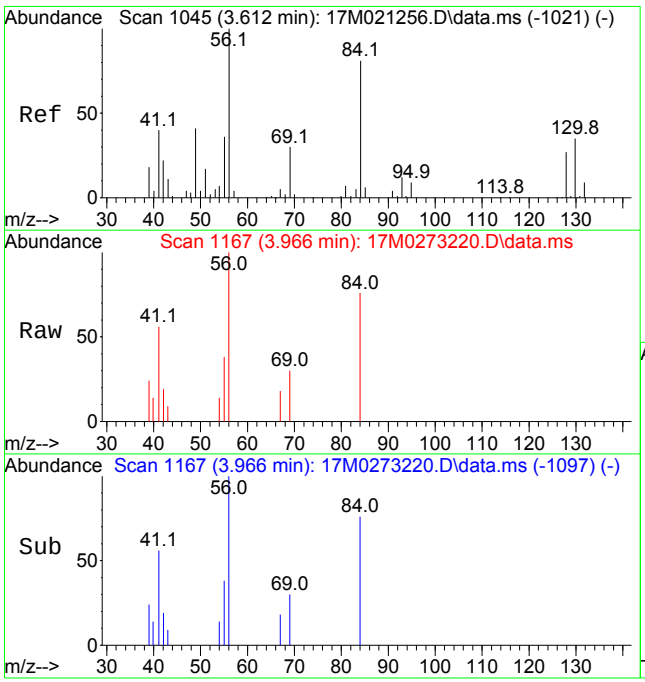


#23
cis-1,2-Dichloroethene
Concen: 3.4455 ug/L
RT: 3.734 min Scan# 1087
Delta R.T. 0.006 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion: 96 Resp: 13968

Ion	Ratio	Lower	Upper
96	100		
61	124.7	98.1	147.1

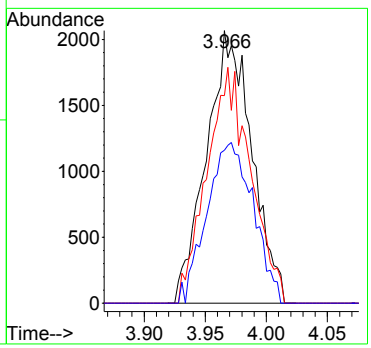


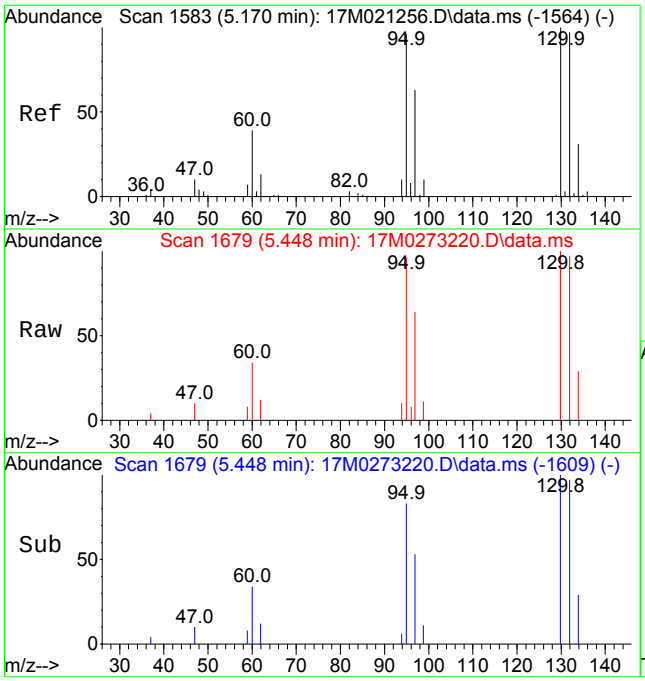


#25
Cyclohexane
Concen: 0.9734 ug/L
RT: 3.966 min Scan# 1167
Delta R.T. 0.003 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion: 56 Resp: 5326

Ion	Ratio	Lower	Upper
56	100		
84	83.8	69.4	104.0
41	60.3	72.2	108.2#

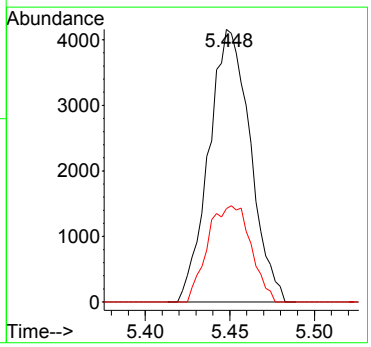




#37
Trichloroethene
Concen: 1.6215 ug/L
RT: 5.448 min Scan# 1679
Delta R.T. 0.003 min
Lab File: 17M0273220.D
Acq: 01 May 2017 18:16

Tgt Ion:130 Resp: 7064

Ion	Ratio	Lower	Upper
130	100		
60	36.7	22.9	53.3



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273221.D Vial: 19
Acq On : 01 May 2017 18:36 Operator: ADC
Sample : L17041203-32 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:25 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

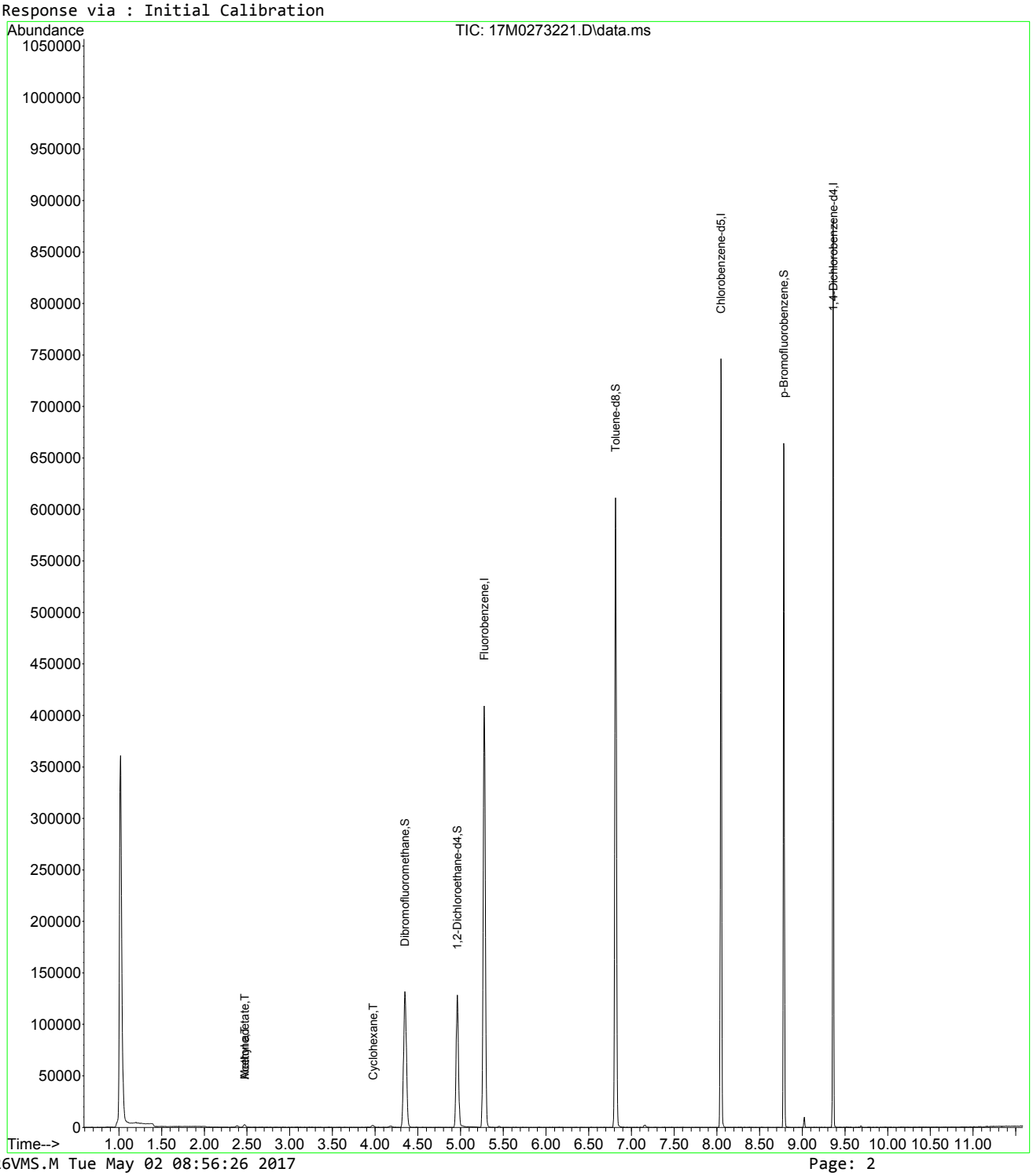
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	346876	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	254736	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	119169	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	94839	25.3161	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.264%			
34) 1,2-Dichloroethane-d4	4.962	65	92195	26.2561	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 105.024%			
47) Toluene-d8	6.815	98	330973	26.0343	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.137%			
66) p-Bromofluorobenzene	8.784	95	110632	27.7266	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.906%			
Target Compounds						Qvalue
16) Acetone	2.472	43	3246	4.6541	ug/L	93
18) Methyl acetate	2.472	43	3245	1.7747	ug/L #	56
25) Cyclohexane	3.974	56	1361	0.2442	ug/L #	80

(#) = qualifier out of range (m) = manual integration (+) = signals summed

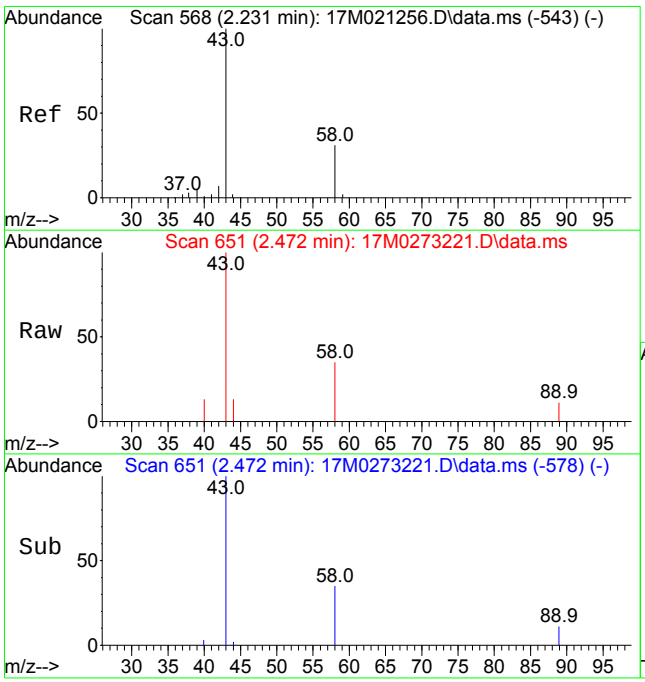
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273221.D Vial: 19
Acq On : 01 May 2017 18:36 Operator: ADC
Sample : L17041203-32 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:25 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



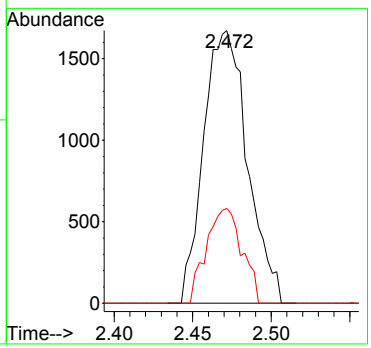
826VMS.M Tue May 02 08:56:26 2017 Page: 2

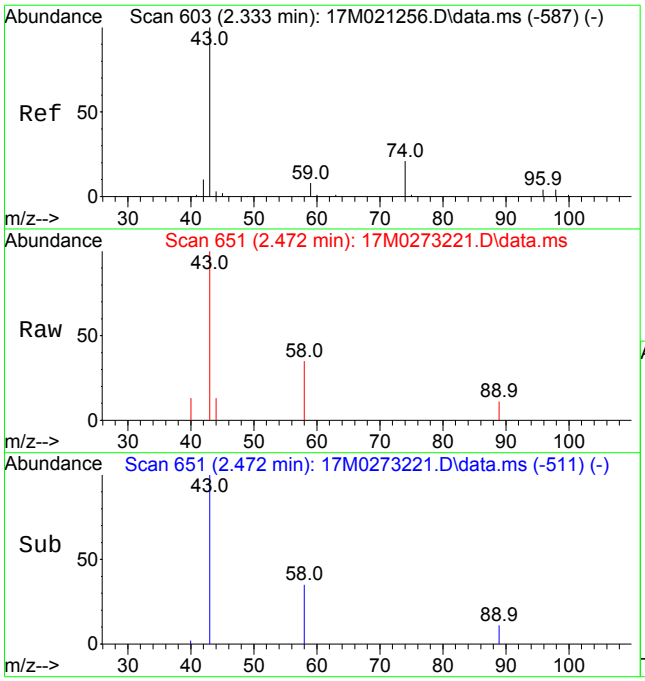


#16
Acetone
Concen: 4.6541 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273221.D
Acq: 01 May 2017 18:36

Tgt Ion: 43 Resp: 3246

Ion	Ratio	Lower	Upper
43	100		
58	28.3	19.4	45.2

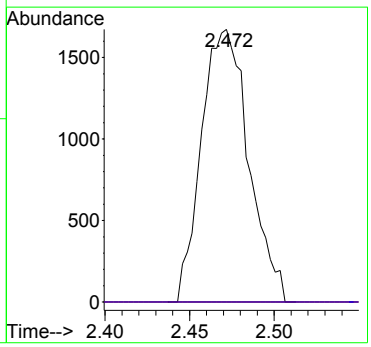


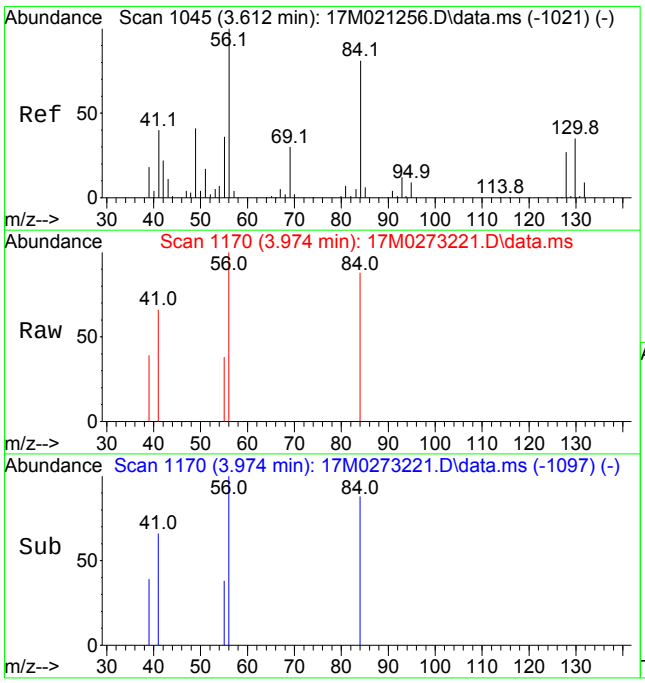


#18
Methyl acetate
Concen: 1.7747 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273221.D
Acq: 01 May 2017 18:36

Tgt Ion: 43 Resp: 3245

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

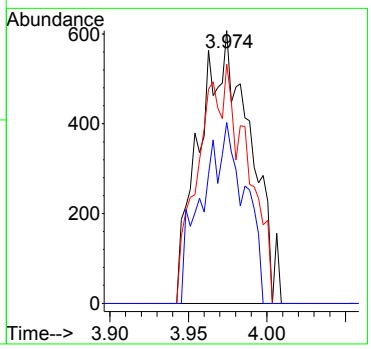




#25
Cyclohexane
Concen: 0.2442 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273221.D
Acq: 01 May 2017 18:36

Tgt Ion: 56 Resp: 1361

Ion	Ratio	Lower	Upper
56	100		
84	83.8	69.4	104.0
41	56.2	72.2	108.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273222.D Vial: 20
Acq On : 01 May 2017 19:08 Operator: ADC
Sample : L17041203-33 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

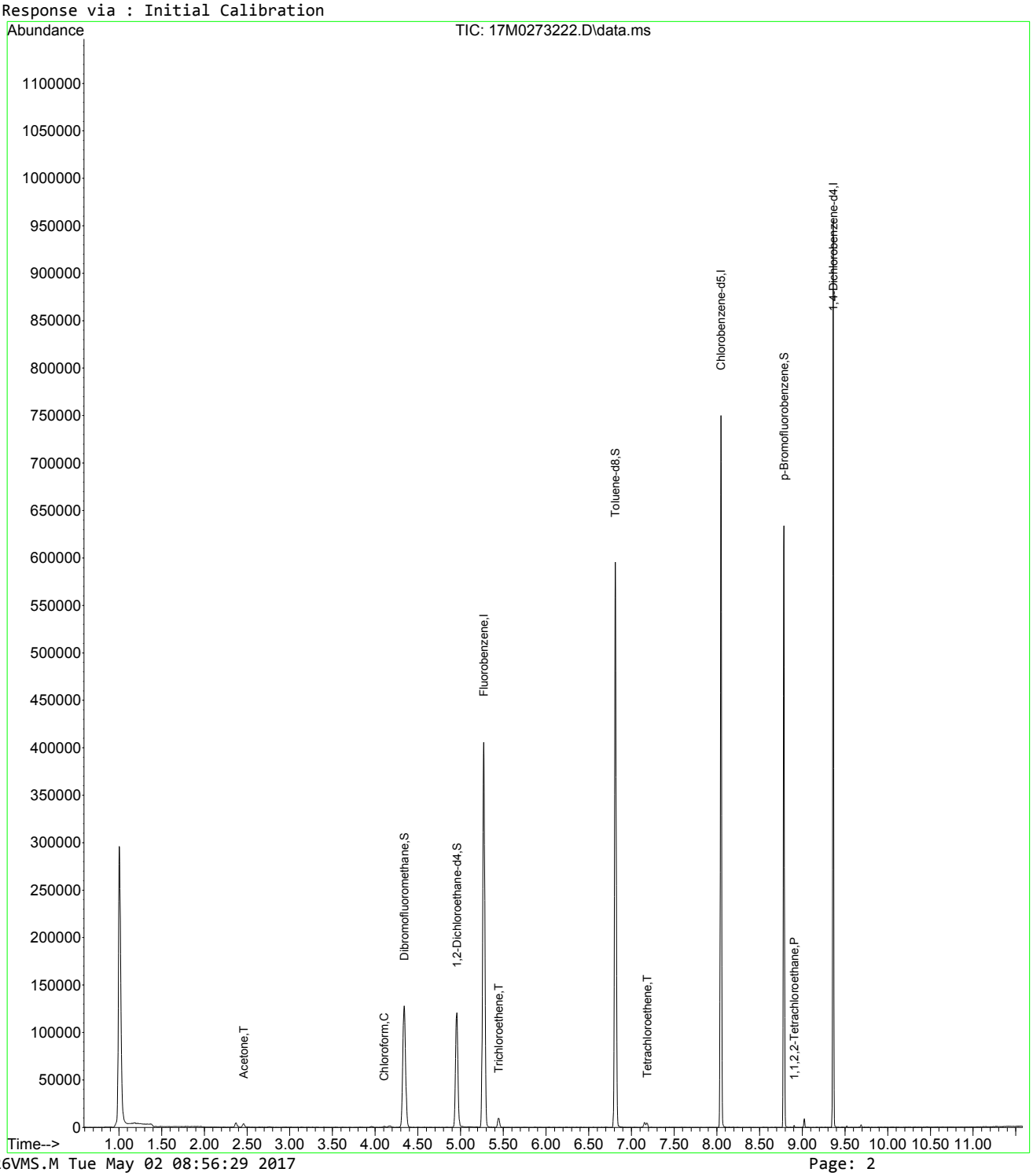
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	344631	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	257074	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	125329	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	91625	24.6175	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.470%			
34) 1,2-Dichloroethane-d4	4.956	65	88014	25.2287	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.915%			
47) Toluene-d8	6.812	98	316616	24.6784	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 98.714%			
66) p-Bromofluorobenzene	8.786	95	102668	24.4660	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 97.864%			
Target Compounds						Qvalue
16) Acetone	2.460	43	4337	6.2589	ug/L	97
27) Chloroform	4.105	83	1245	0.1834	ug/L #	84
37) Trichloroethene	5.445	130	3426	0.7770	ug/L	97
49) Tetrachloroethene	7.185	166	1148	0.2497	ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.905	83	798	0.2367	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273222.D Vial: 20
Acq On : 01 May 2017 19:08 Operator: ADC
Sample : L17041203-33 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



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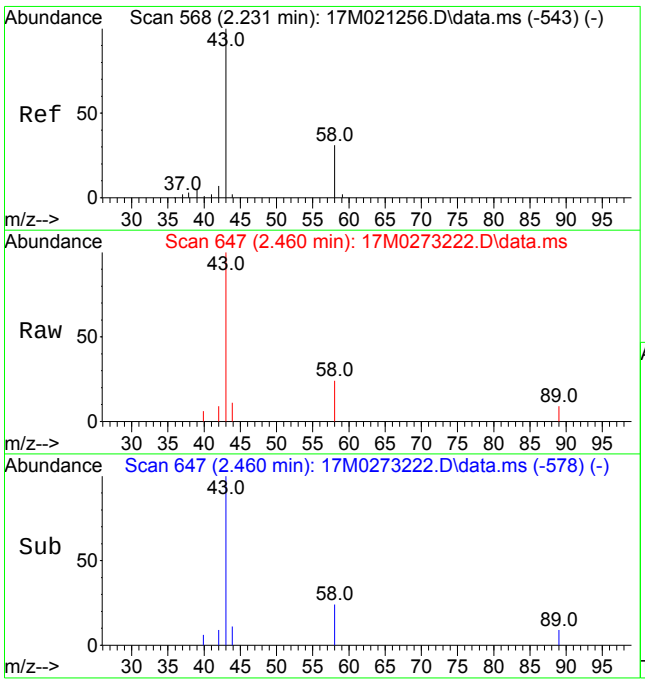
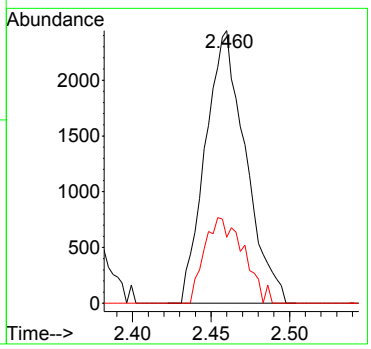
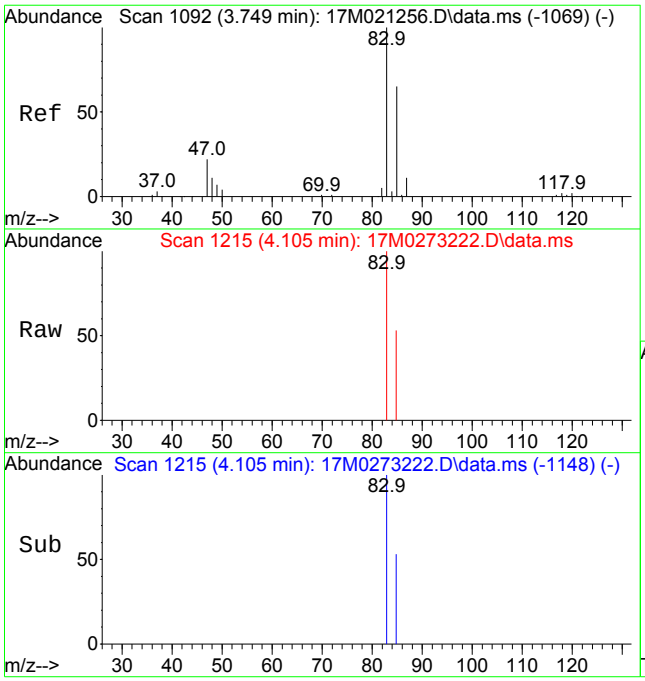


#16
Acetone
Concen: 6.2589 ug/L
RT: 2.460 min Scan# 647
Delta R.T. -0.000 min
Lab File: 17M0273222.D
Acq: 01 May 2017 19:08

Tgt Ion: 43 Resp: 4337

Ion	Ratio	Lower	Upper
43	100		
58	30.6	19.4	45.2

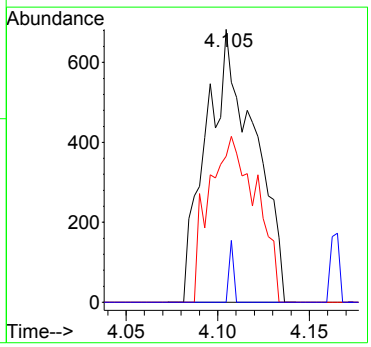


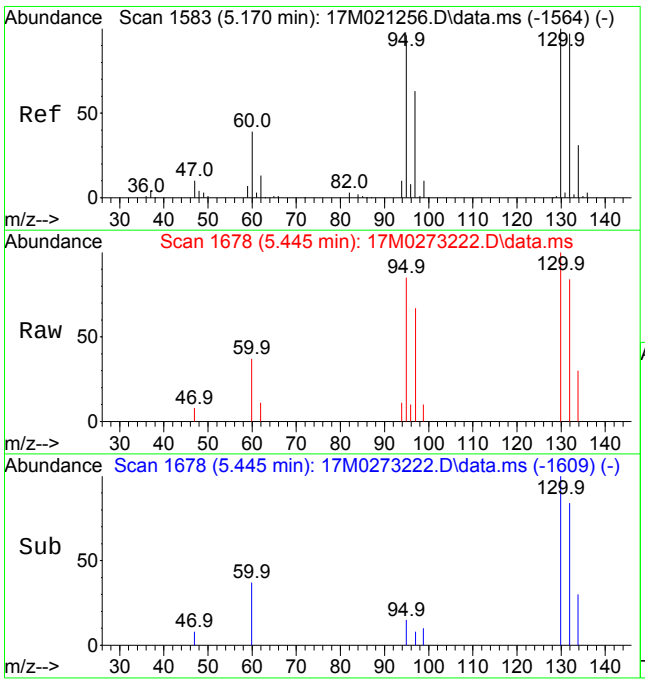


#27
Chloroform
Concen: 0.1834 ug/L
RT: 4.105 min Scan# 1215
Delta R.T. -0.005 min
Lab File: 17M0273222.D
Acq: 01 May 2017 19:08

Tgt Ion: 83 Resp: 1245

Ion	Ratio	Lower	Upper
83	100		
85	60.2	39.2	91.4
47	0.0	12.9	30.1#

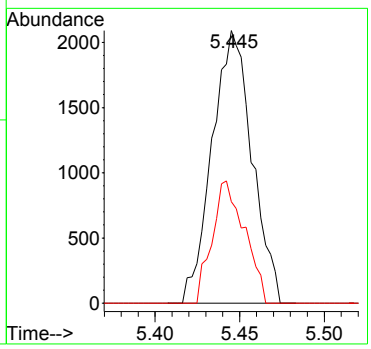


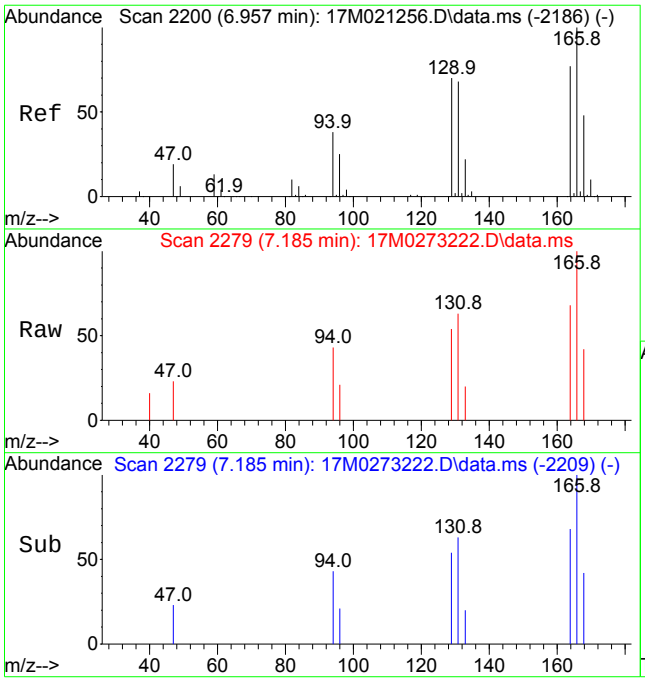


#37
Trichloroethene
Concen: 0.7770 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273222.D
Acq: 01 May 2017 19:08

Tgt Ion:130 Resp: 3426

Ion	Ratio	Lower	Upper
130	100		
60	36.3	22.9	53.3

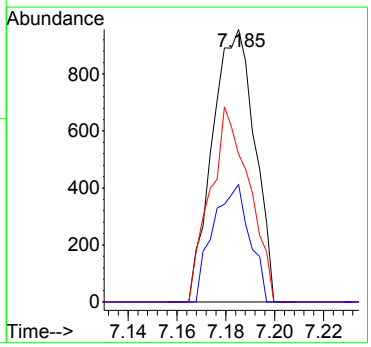


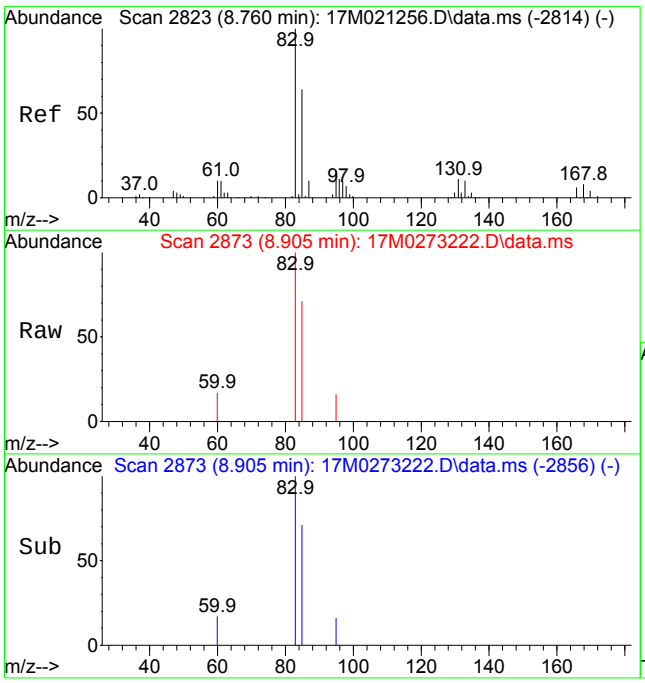


#49
Tetrachloroethene
Concen: 0.2497 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273222.D
Acq: 01 May 2017 19:08

Tgt Ion:166 Resp: 1148

Ion	Ratio	Lower	Upper
166	100		
129	66.3	56.2	84.4
94	37.5	29.7	44.5

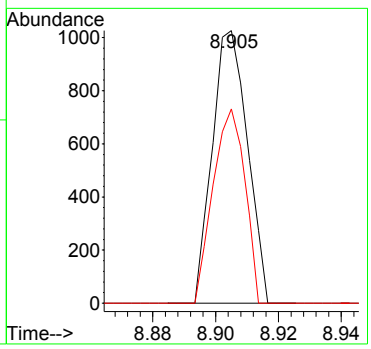




#69
1,1,2,2-Tetrachloroethane
Concen: 0.2367 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273222.D
Acq: 01 May 2017 19:08

Tgt Ion: 83 Resp: 798

Ion	Ratio	Lower	Upper
83	100		
85	64.4	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273223.D Vial: 21
Acq On : 01 May 2017 19:27 Operator: ADC
Sample : L17041203-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

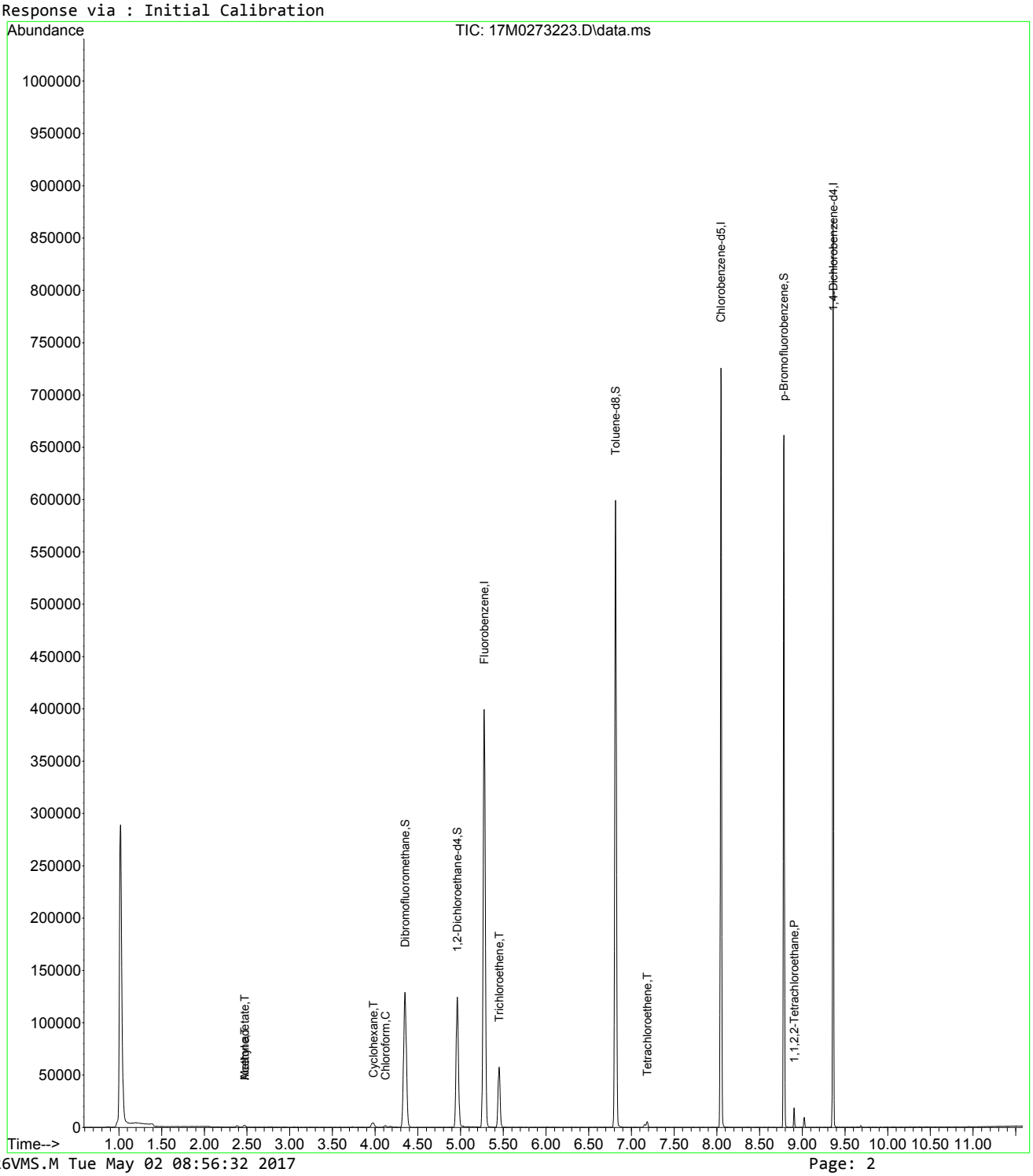
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	337541	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	250385	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	117680	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	91810	25.1854	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.742%			
34) 1,2-Dichloroethane-d4	4.962	65	88799	25.9883	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.953%			
47) Toluene-d8	6.815	98	322042	25.7720	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.088%			
66) p-Bromofluorobenzene	8.784	95	108046	27.4211	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.684%			
Target Compounds						Qvalue
16) Acetone	2.472	43	2746	4.0461	ug/L	90
18) Methyl acetate	2.472	43	2746	1.5434	ug/L #	56
25) Cyclohexane	3.977	56	2684	0.4949	ug/L #	84
27) Chloroform	4.122	83	1962	0.2951	ug/L #	87
37) Trichloroethene	5.451	130	18863	4.3679	ug/L	98
49) Tetrachloroethene	7.185	166	1316	0.2939	ug/L	90
69) 1,1,2,2-Tetrachloroethane	8.905	83	5038	1.5915	ug/L	96

(#) = qualifier out of range (m) = manual integration (+) = signals summed

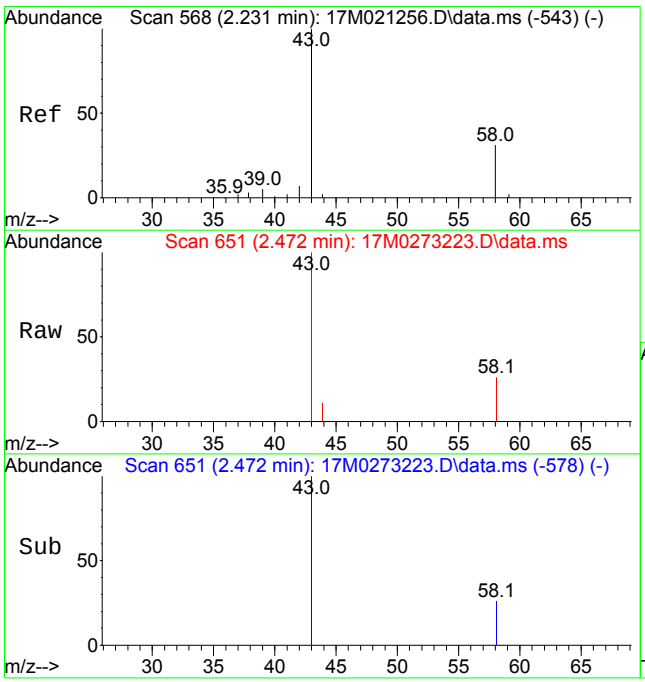
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273223.D Vial: 21
Acq On : 01 May 2017 19:27 Operator: ADC
Sample : L17041203-34 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



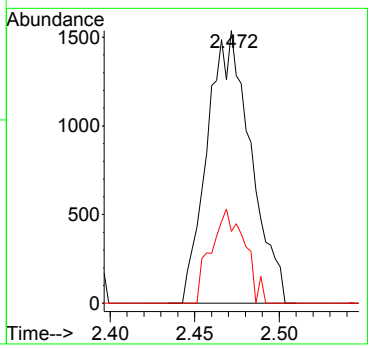
826VMS.M Tue May 02 08:56:32 2017 Page: 2

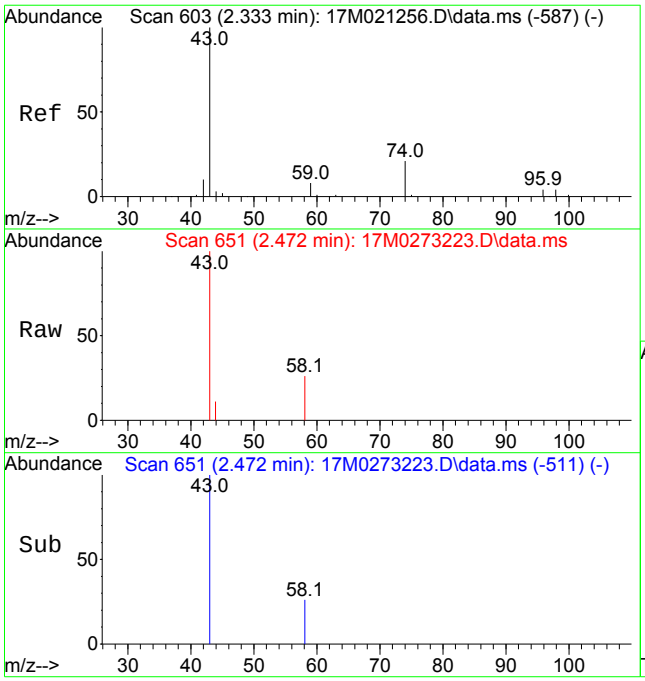


#16
Acetone
Concen: 4.0461 ug/L
RT: 2.472 min Scan# 651
Delta R.T. 0.012 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion: 43 Resp: 2746

Ion	Ratio	Lower	Upper
43	100		
58	26.5	19.4	45.2

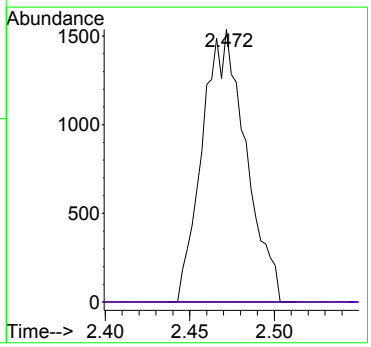


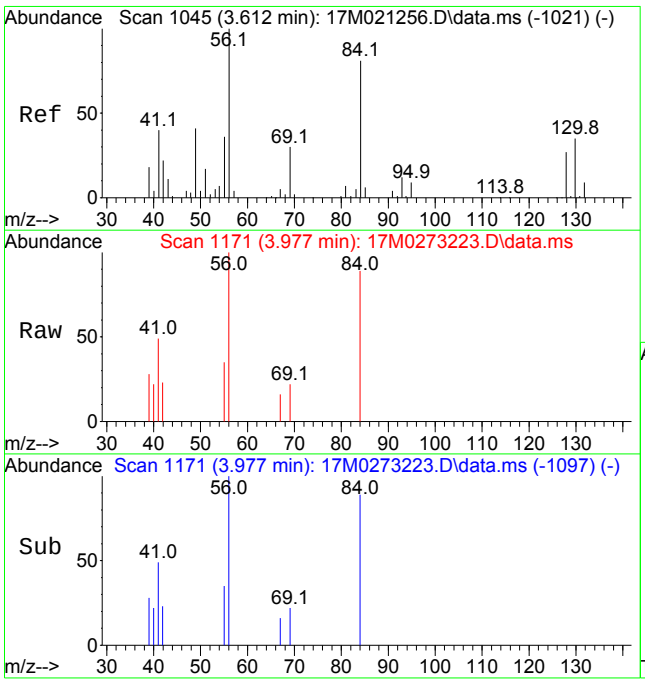


#18
Methyl acetate
Concen: 1.5434 ug/L
RT: 2.472 min Scan# 651
Delta R.T. -0.095 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion: 43 Resp: 2746

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

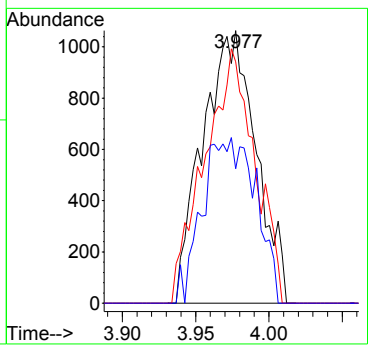


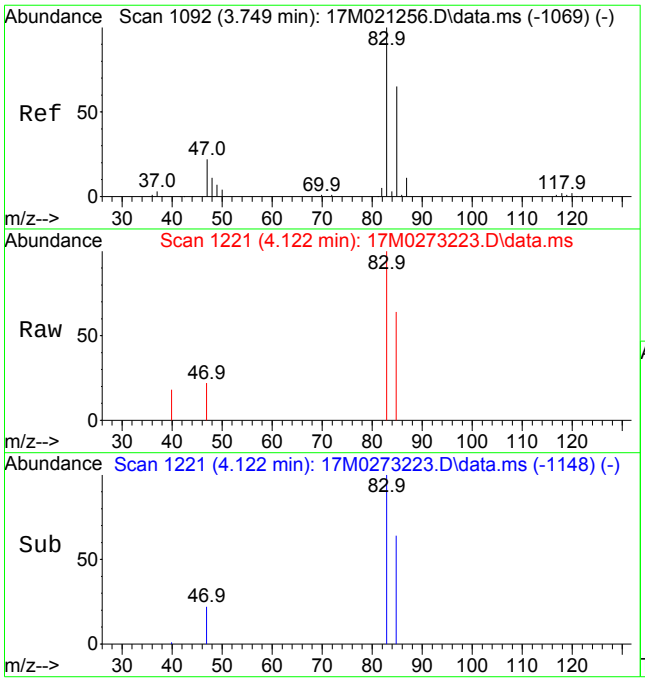


#25
Cyclohexane
Concen: 0.4949 ug/L
RT: 3.977 min Scan# 1171
Delta R.T. 0.014 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion: 56 Resp: 2684

Ion	Ratio	Lower	Upper
56	100		
84	88.0	69.4	104.0
41	61.2	72.2	108.2#

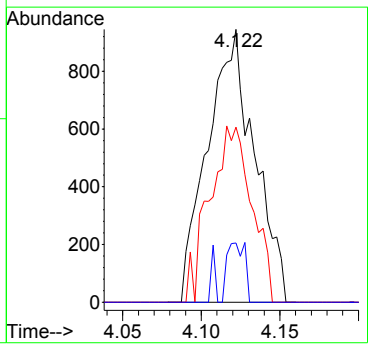


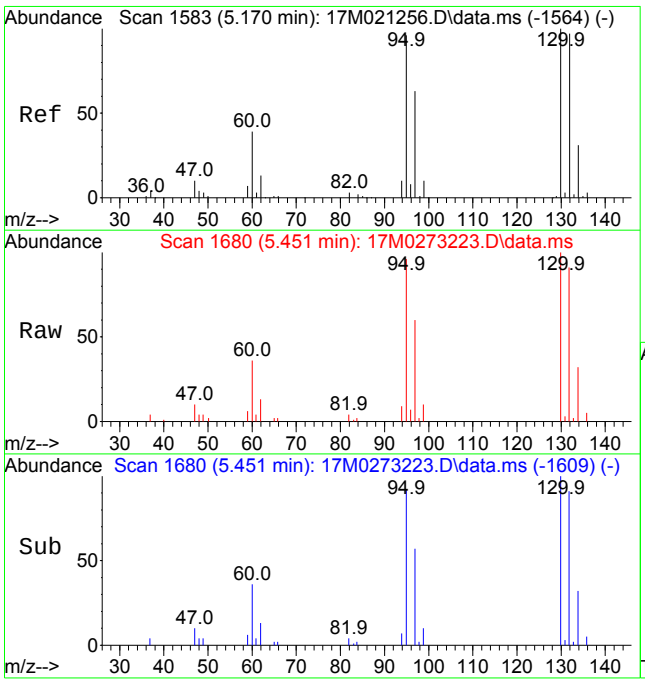


#27
Chloroform
Concen: 0.2951 ug/L
RT: 4.122 min Scan# 1221
Delta R.T. 0.012 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion: 83 Resp: 1962

Ion	Ratio	Lower	Upper
83	100		
85	58.0	39.2	91.4
47	10.0	12.9	30.1#

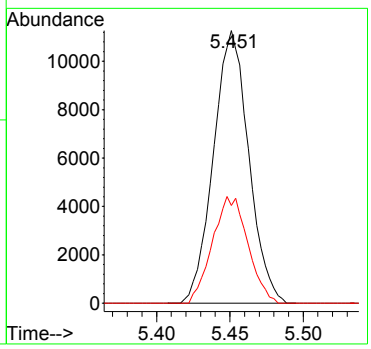


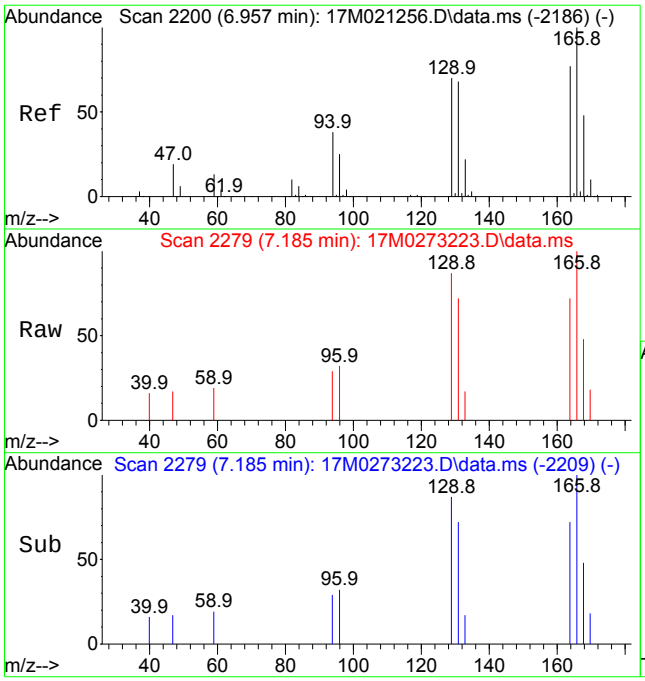


#37
Trichloroethene
Concen: 4.3679 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion:130 Resp: 18863

Ion	Ratio	Lower	Upper
130	100		
60	39.3	22.9	53.3

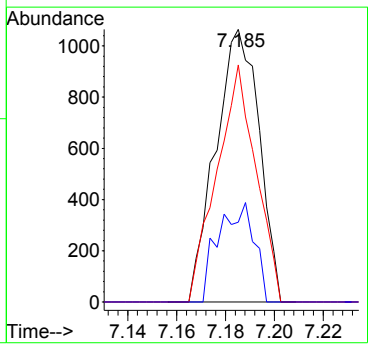


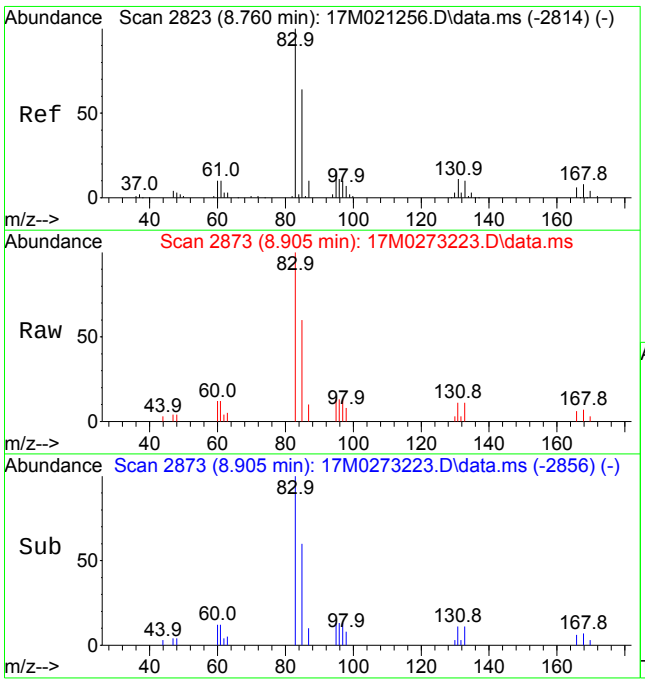


#49
Tetrachloroethene
Concen: 0.2939 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion:166 Resp: 1316

Ion	Ratio	Lower	Upper
166	100		
129	78.1	56.2	84.4
94	29.8	29.7	44.5

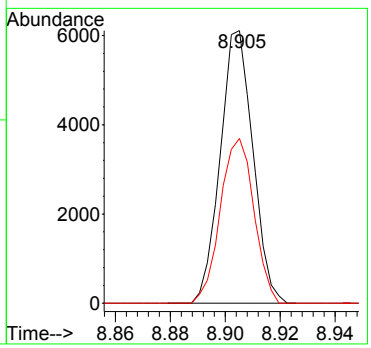




#69
1,1,2,2-Tetrachloroethane
Concen: 1.5915 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273223.D
Acq: 01 May 2017 19:27

Tgt Ion: 83 Resp: 5038

Ion	Ratio	Lower	Upper
83	100		
85	62.1	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273224.D Vial: 22
Acq On : 01 May 2017 19:47 Operator: ADC
Sample : L17041203-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

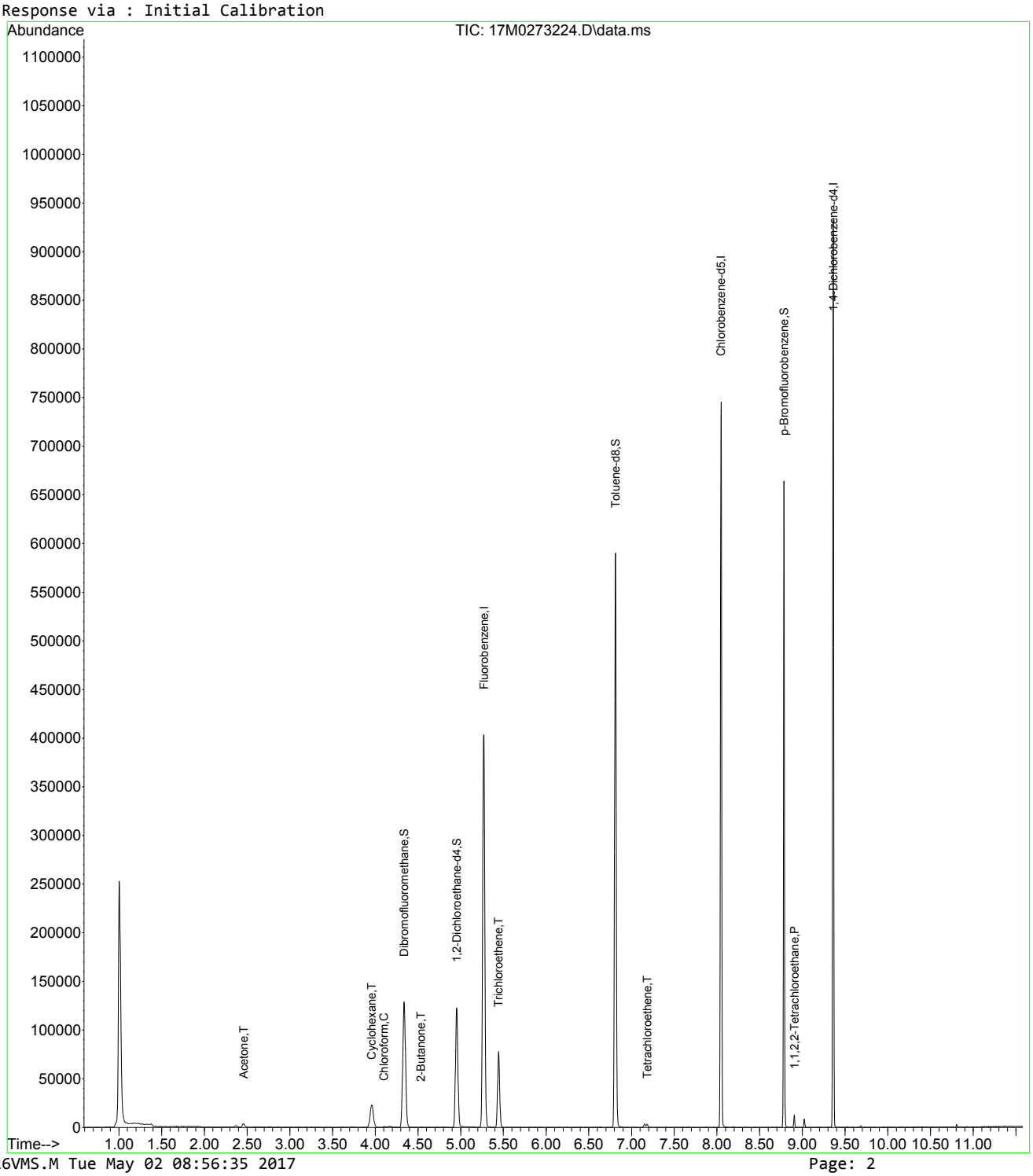
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	346189	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	256823	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	122785	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	93045	24.8865	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.546%			
34) 1,2-Dichloroethane-d4	4.953	65	90296	25.7663	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.065%			
47) Toluene-d8	6.812	98	318430	24.8441	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.376%			
66) p-Bromofluorobenzene	8.784	95	105519	25.6664	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.666%			
Target Compounds						Qvalue
16) Acetone	2.460	43	4946	7.1057	ug/L	91
25) Cyclohexane	3.957	56	13352	2.4003	ug/L #	83
27) Chloroform	4.102	83	832	0.1220	ug/L #	84
32) 2-Butanone	4.533	43	182	0.1754	ug/L #	37
37) Trichloroethene	5.442	130	25191	5.6875	ug/L	98
49) Tetrachloroethene	7.183	166	805	0.1753	ug/L #	89
69) 1,1,2,2-Tetrachloroethane	8.905	83	3578	1.0833	ug/L	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

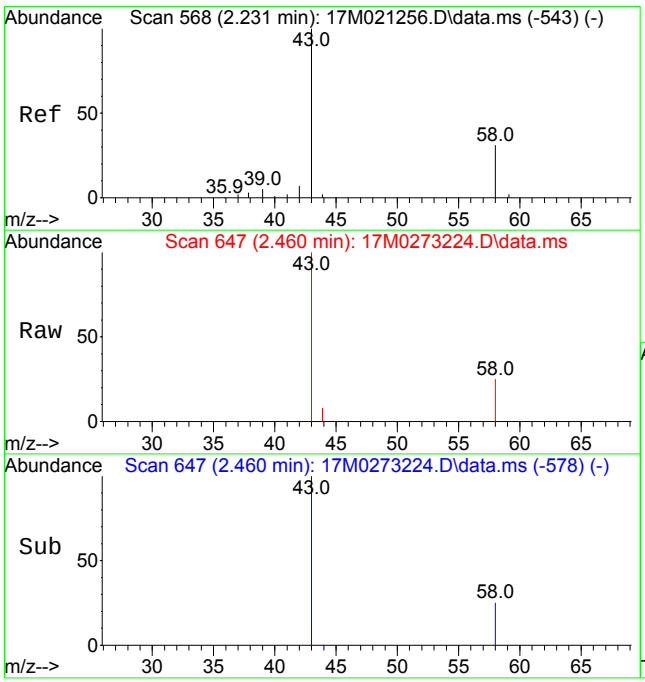
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273224.D Vial: 22
Acq On : 01 May 2017 19:47 Operator: ADC
Sample : L17041203-35 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:34 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



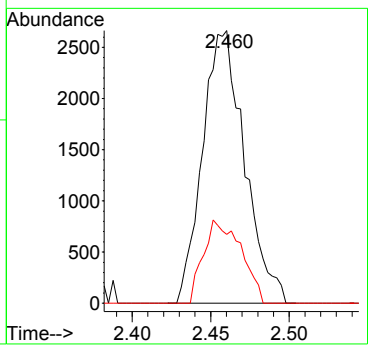
826VMS.M Tue May 02 08:56:35 2017 Page: 2

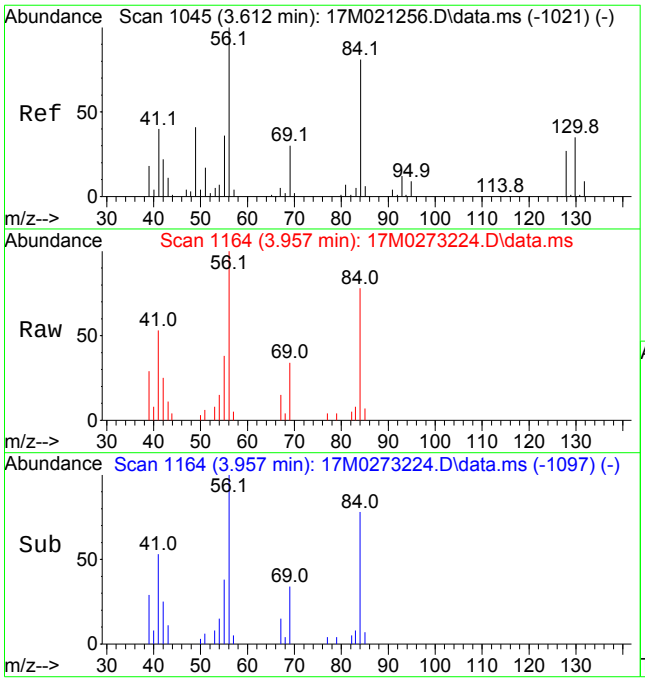


#16
Acetone
Concen: 7.1057 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion: 43 Resp: 4946

Ion	Ratio	Lower	Upper
43	100		
58	27.3	19.4	45.2

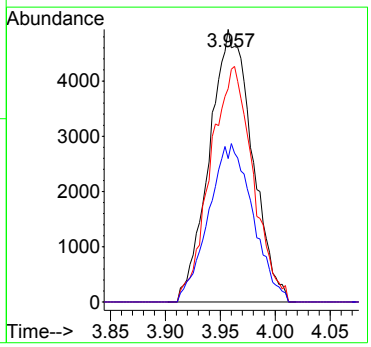


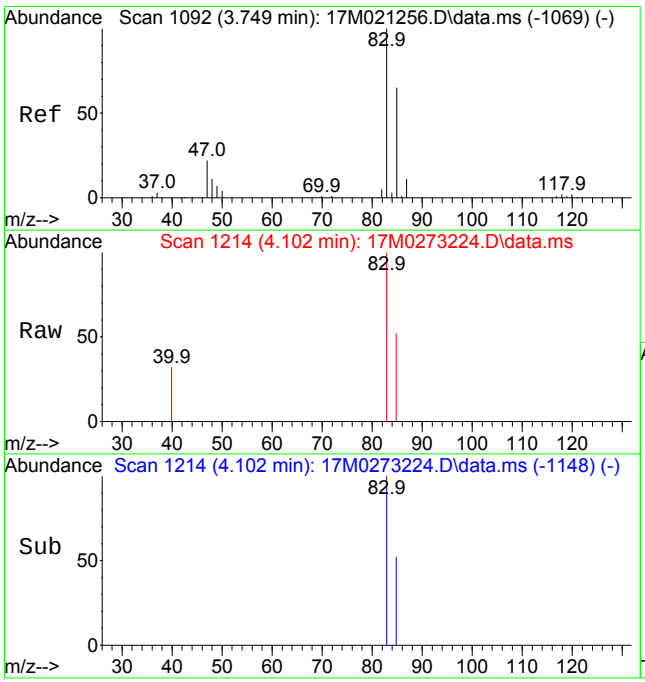


#25
Cyclohexane
Concen: 2.4003 ug/L
RT: 3.957 min Scan# 1164
Delta R.T. -0.006 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion: 56 Resp: 13352

Ion	Ratio	Lower	Upper
56	100		
84	85.9	69.4	104.0
41	60.0	72.2	108.2#

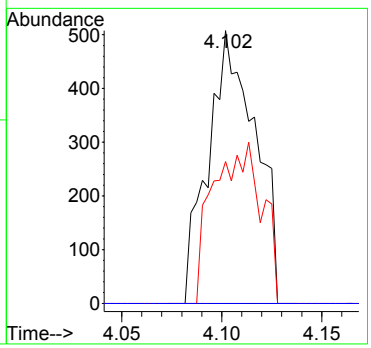


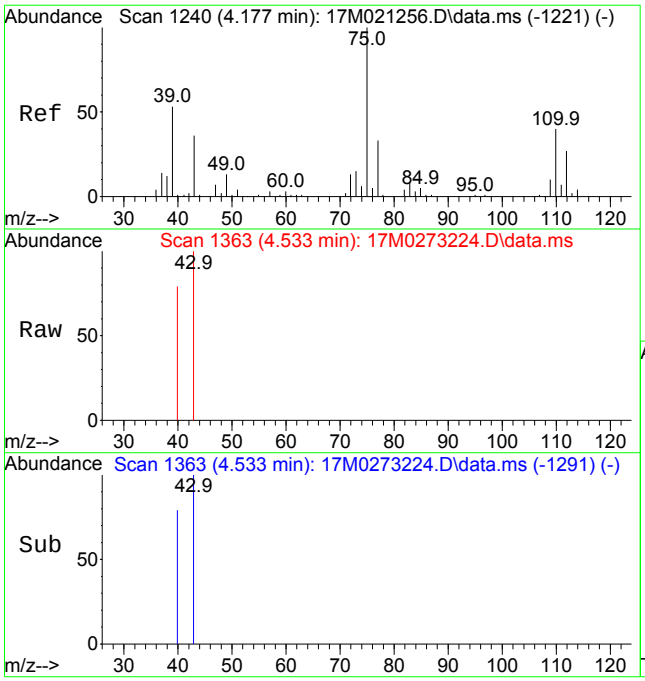


#27
Chloroform
Concen: 0.1220 ug/L
RT: 4.102 min Scan# 1214
Delta R.T. -0.008 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion: 83 Resp: 832

Ion	Ratio	Lower	Upper
83	100		
85	60.7	39.2	91.4
47	0.0	12.9	30.1#

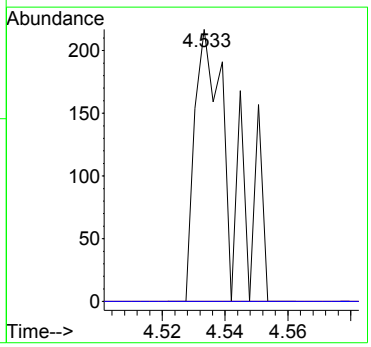


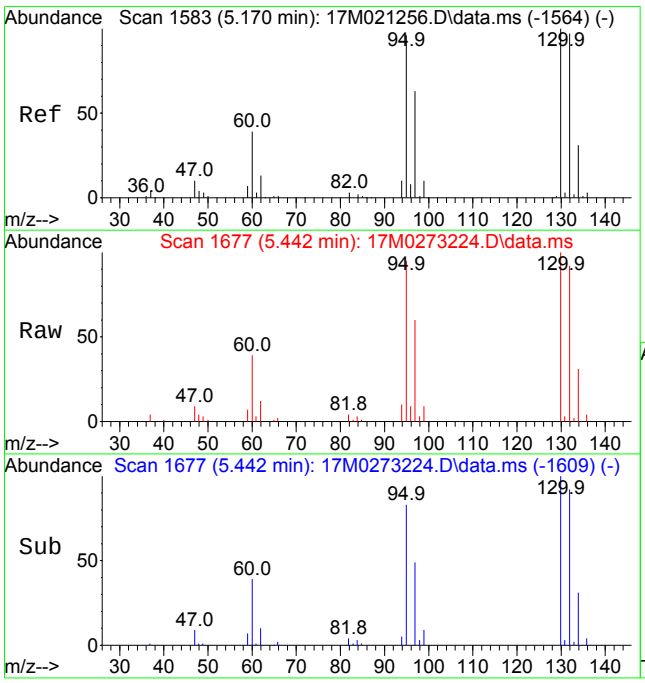


#32
2-Butanone
Concen: 0.1754 ug/L
RT: 4.533 min Scan# 1363
Delta R.T. 0.009 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion: 43 Resp: 182

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

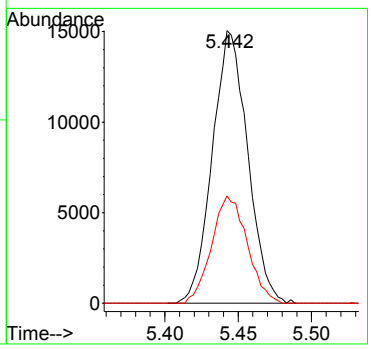


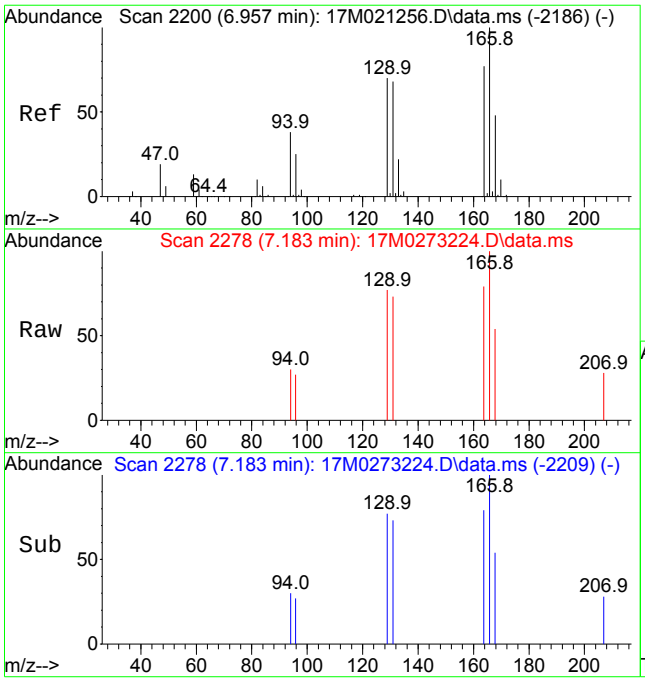


#37
Trichloroethene
Concen: 5.6875 ug/L
RT: 5.442 min Scan# 1677
Delta R.T. -0.003 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion:130 Resp: 25191

Ion	Ratio	Lower	Upper
130	100		
60	39.6	22.9	53.3

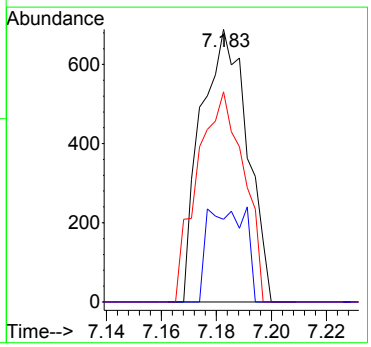


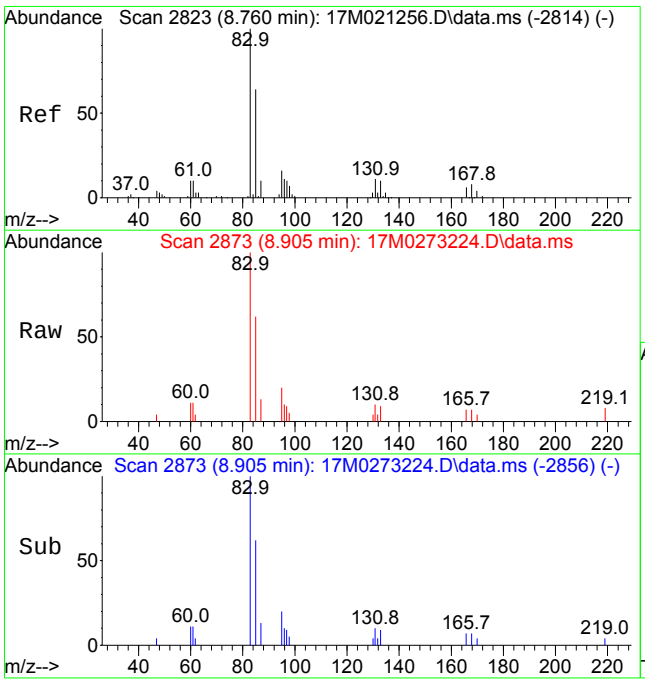


#49
Tetrachloroethene
Concen: 0.1753 ug/L
RT: 7.183 min Scan# 2278
Delta R.T. 0.001 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion:166 Resp: 805

Ion	Ratio	Lower	Upper
166	100		
129	77.3	56.2	84.4
94	28.4	29.7	44.5#

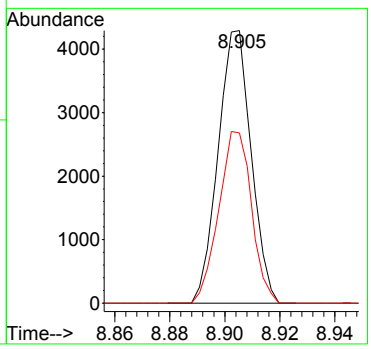




#69
1,1,2,2-Tetrachloroethane
Concen: 1.0833 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273224.D
Acq: 01 May 2017 19:47

Tgt Ion: 83 Resp: 3578

Ion	Ratio	Lower	Upper
83	100		
85	62.5	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273225.D Vial: 23
Acq On : 01 May 2017 20:17 Operator: ADC
Sample : L17041203-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:37 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

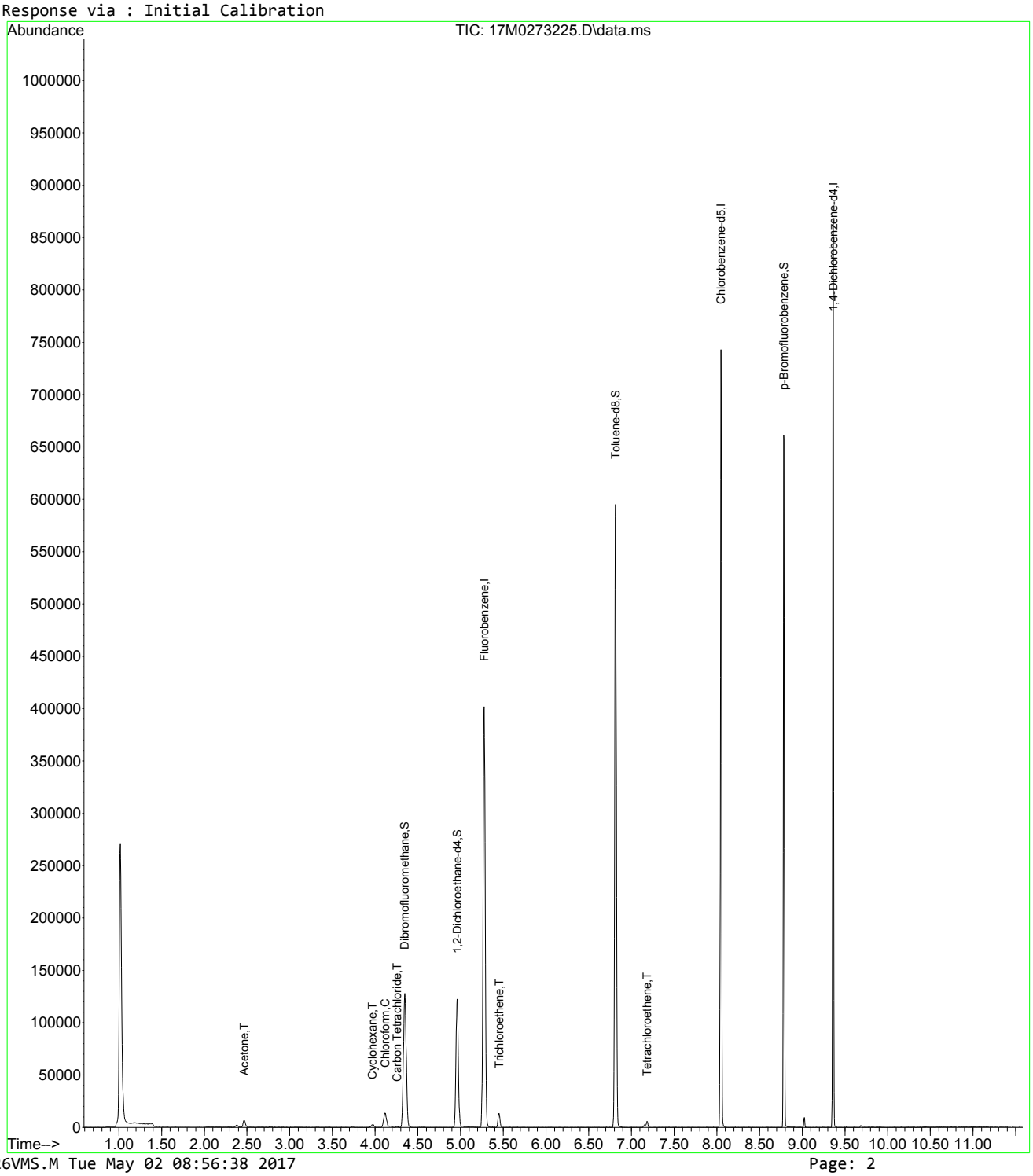
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	341651	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	250466	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	118432	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	92245	25.0003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.001%			
34) 1,2-Dichloroethane-d4	4.959	65	88072	25.4655	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.862%			
47) Toluene-d8	6.815	98	321328	25.7065	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.826%			
66) p-Bromofluorobenzene	8.784	95	107057	26.9976	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.990%			
Target Compounds						Qvalue
16) Acetone	2.466	43	8596	12.5134	ug/L	96
25) Cyclohexane	3.969	56	1650	0.3006	ug/L #	76
27) Chloroform	4.116	83	14322	2.1284	ug/L	98
28) Carbon Tetrachloride	4.255	117	657	0.1235	ug/L #	50
37) Trichloroethene	5.451	130	4505	1.0306	ug/L	98
49) Tetrachloroethene	7.182	166	1380	0.3081	ug/L	93

(#) = qualifier out of range (m) = manual integration (+) = signals summed

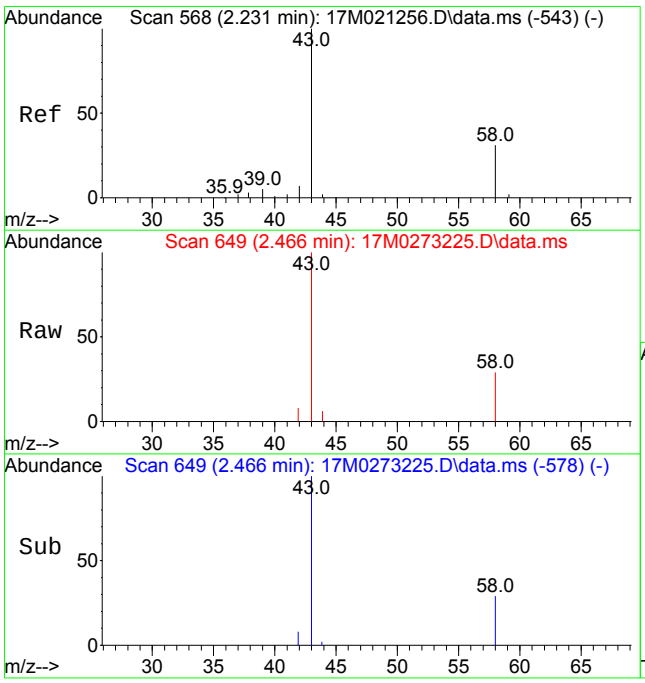
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273225.D Vial: 23
Acq On : 01 May 2017 20:17 Operator: ADC
Sample : L17041203-36 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:37 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



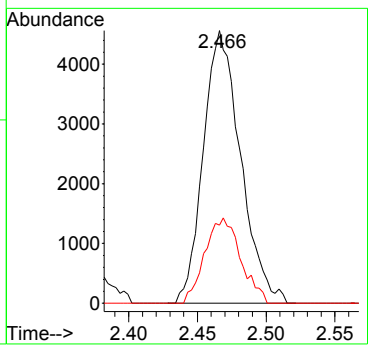
826VMS.M Tue May 02 08:56:38 2017 Page: 2

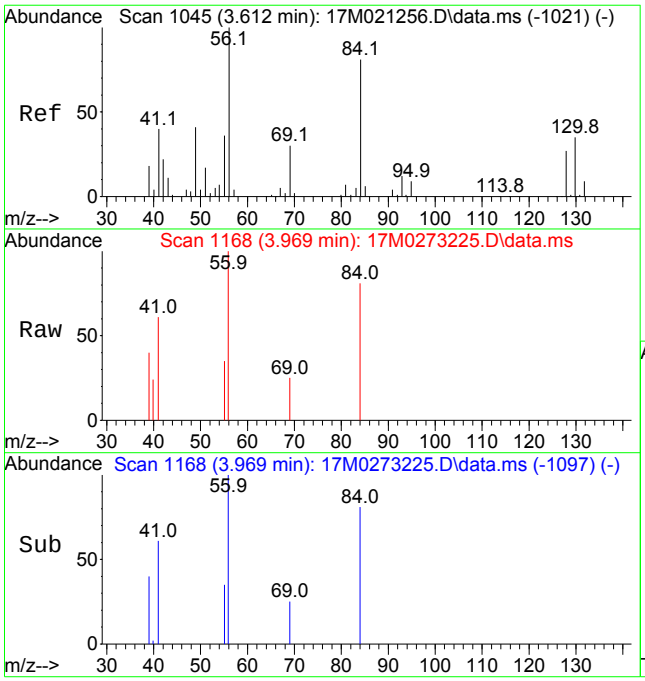


#16
Acetone
Concen: 12.5134 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion: 43 Resp: 8596

Ion	Ratio	Lower	Upper
43	100		
58	30.0	19.4	45.2

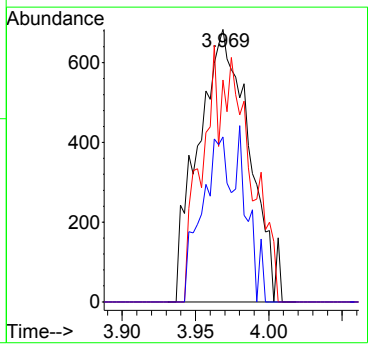


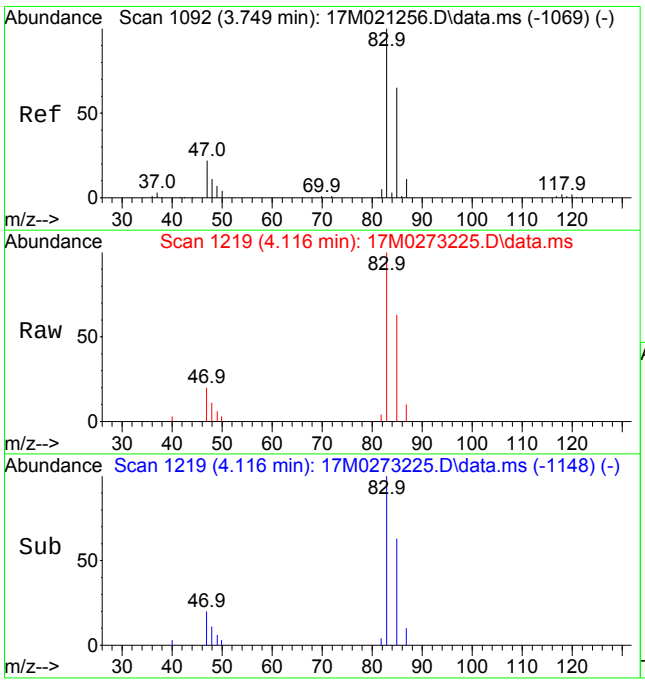


#25
Cyclohexane
Concen: 0.3006 ug/L
RT: 3.969 min Scan# 1168
Delta R.T. 0.006 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion: 56 Resp: 1650

Ion	Ratio	Lower	Upper
56	100		
84	83.5	69.4	104.0
41	48.9	72.2	108.2#

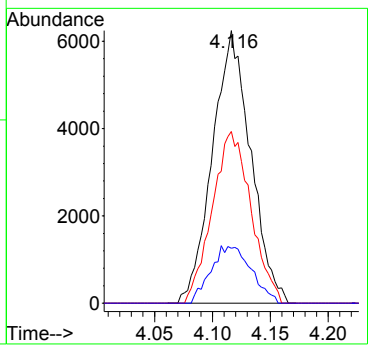


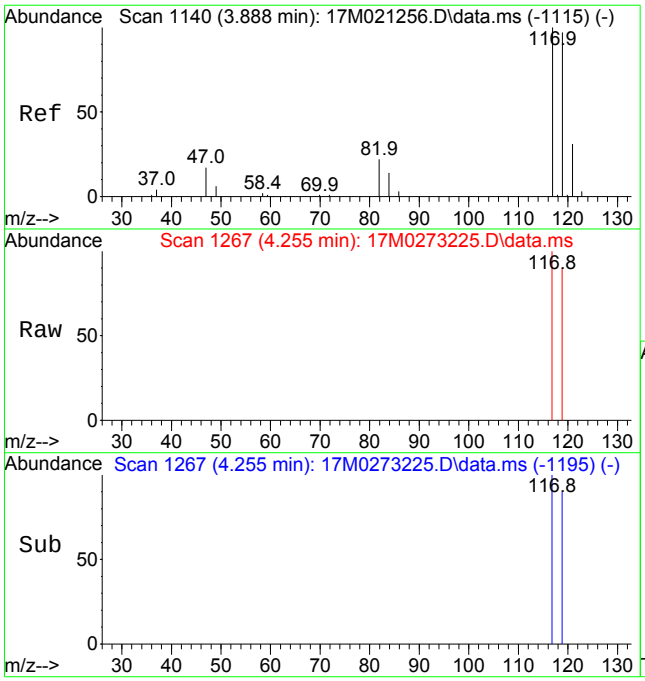


#27
Chloroform
Concen: 2.1284 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion: 83 Resp: 14322

Ion	Ratio	Lower	Upper
83	100		
85	63.8	39.2	91.4
47	22.2	12.9	30.1

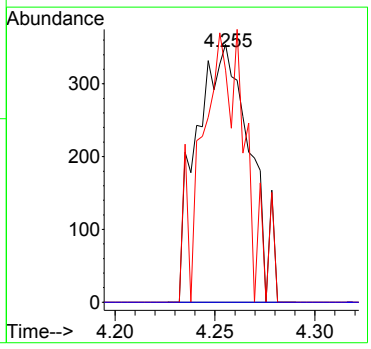


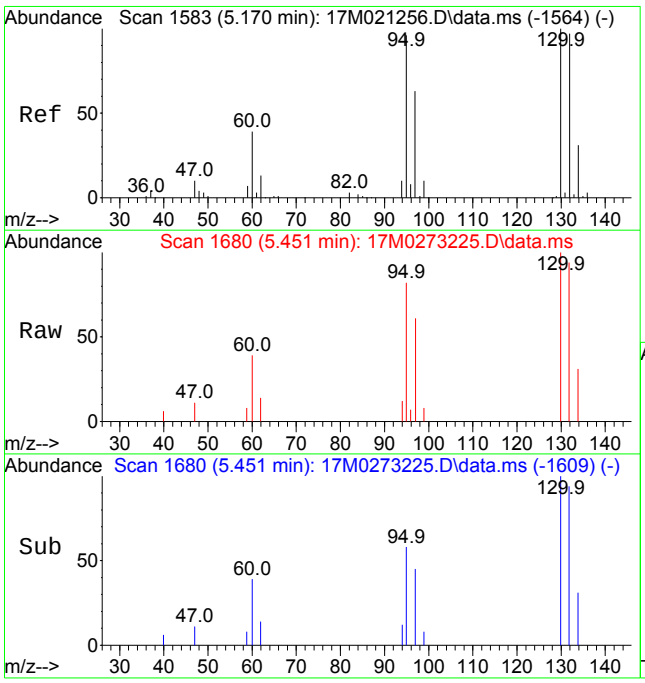


#28
Carbon Tetrachloride
Concen: 0.1235 ug/L
RT: 4.255 min Scan# 1267
Delta R.T. 0.009 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion:117 Resp: 657

Ion	Ratio	Lower	Upper
117	100		
119	86.8	77.4	116.2
82	128.5	17.7	26.5#

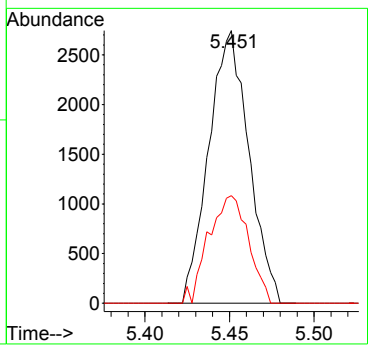


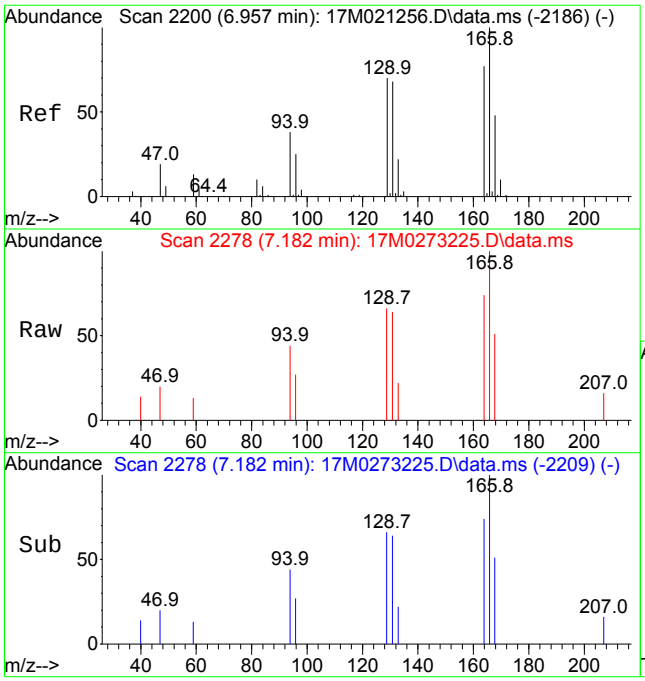


#37
Trichloroethene
Concen: 1.0306 ug/L
RT: 5.451 min Scan# 1680
Delta R.T. 0.006 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion:130 Resp: 4505

Ion	Ratio	Lower	Upper
130	100		
60	39.3	22.9	53.3

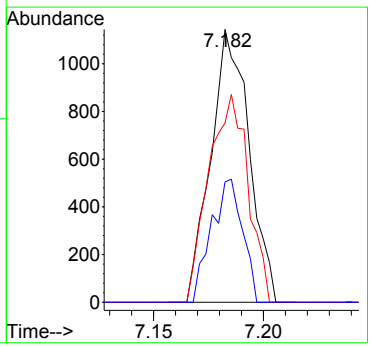




#49
Tetrachloroethene
Concen: 0.3081 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273225.D
Acq: 01 May 2017 20:17

Tgt Ion:166 Resp: 1380

Ion	Ratio	Lower	Upper
166	100		
129	78.4	56.2	84.4
94	36.7	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273226.D Vial: 24
Acq On : 01 May 2017 20:36 Operator: ADC
Sample : L17041203-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

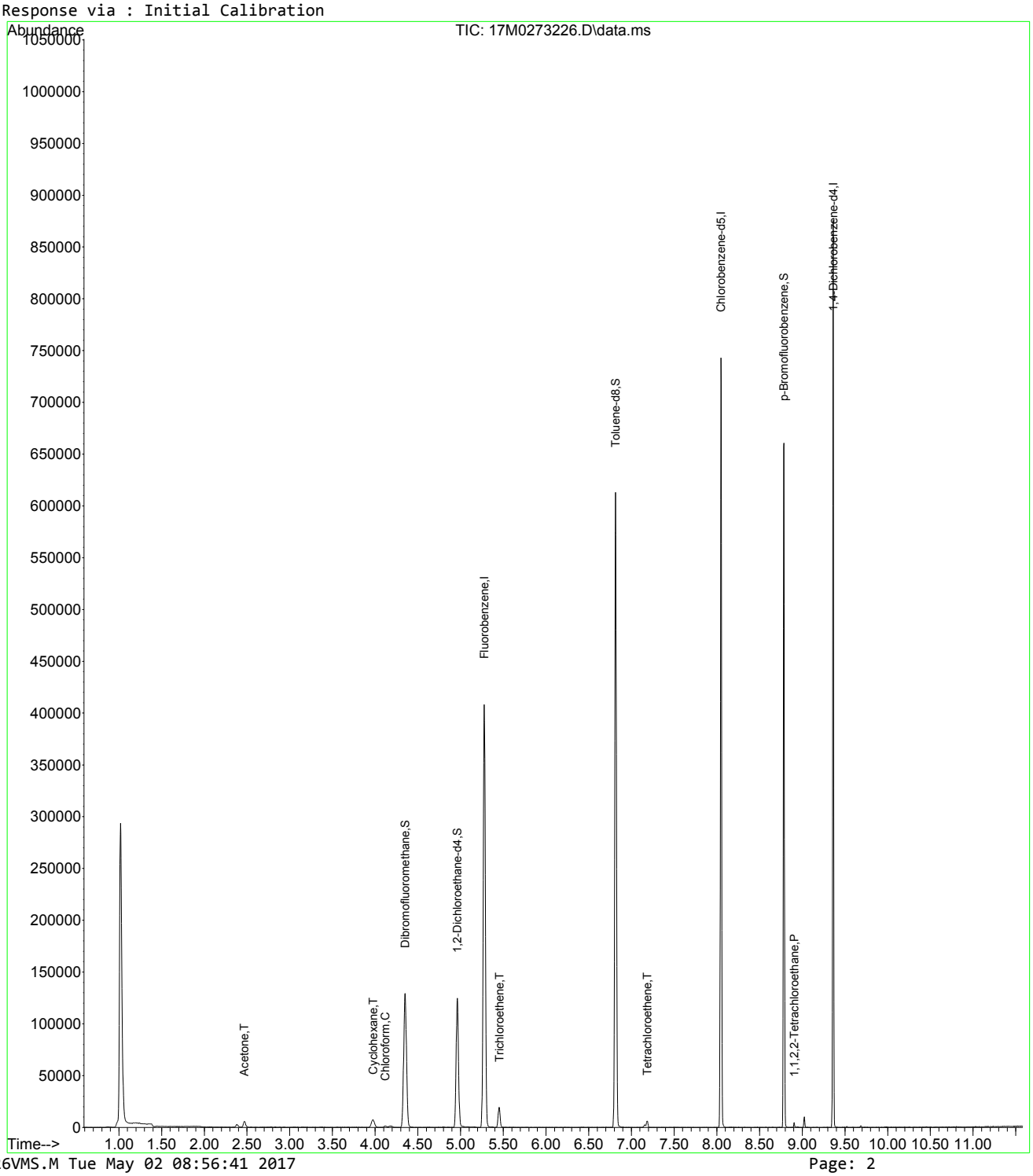
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	341895	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	251872	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	119106	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	92425	25.0312	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.125%			
34) 1,2-Dichloroethane-d4	4.962	65	90104	26.0345	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.138%			
47) Toluene-d8	6.815	98	324281	25.7979	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.192%			
66) p-Bromofluorobenzene	8.783	95	108621	27.2370	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.948%			
Target Compounds						Qvalue
16) Acetone	2.466	43	7284	10.5960	ug/L	96
25) Cyclohexane	3.974	56	4567	0.8313	ug/L #	81
27) Chloroform	4.116	83	1574	0.2337	ug/L #	85
37) Trichloroethene	5.454	130	6647	1.5196	ug/L	99
49) Tetrachloroethene	7.185	166	1581	0.3510	ug/L	92
69) 1,1,2,2-Tetrachloroethane	8.905	83	1321	0.4123	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

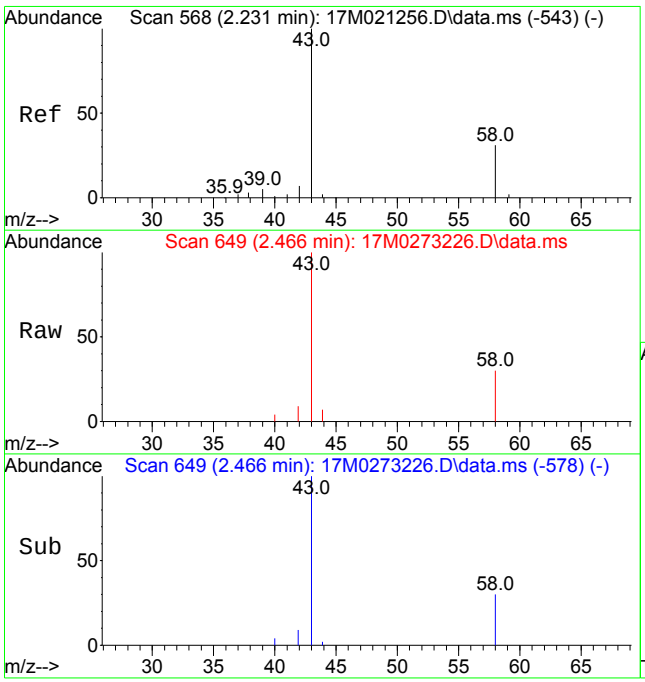
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273226.D Vial: 24
Acq On : 01 May 2017 20:36 Operator: ADC
Sample : L17041203-37 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



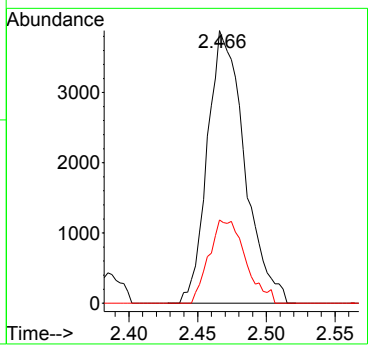
826VMS.M Tue May 02 08:56:41 2017 Page: 2

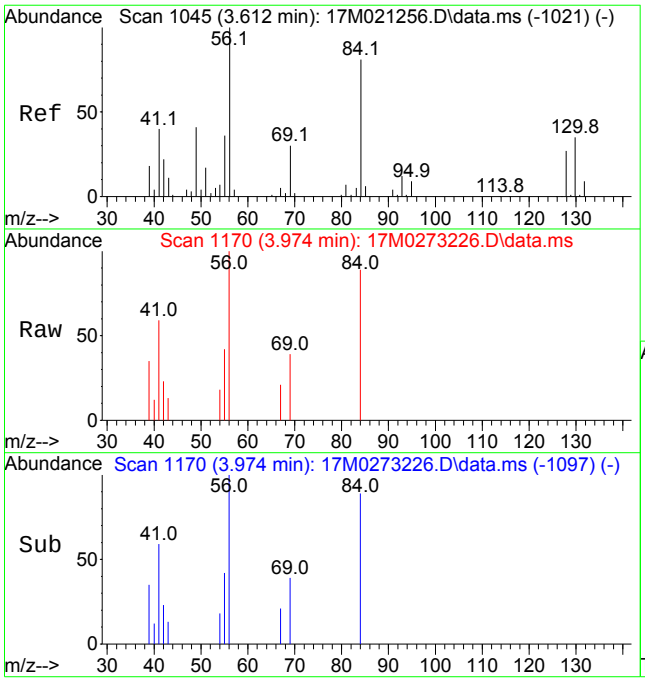


#16
Acetone
Concen: 10.5960 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion: 43 Resp: 7284

Ion	Ratio	Lower	Upper
43	100		
58	29.9	19.4	45.2

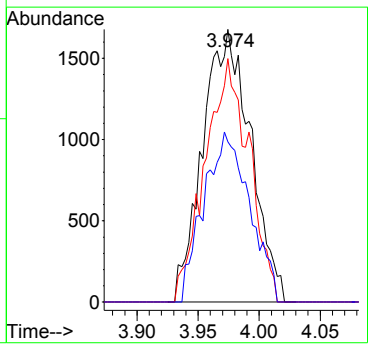


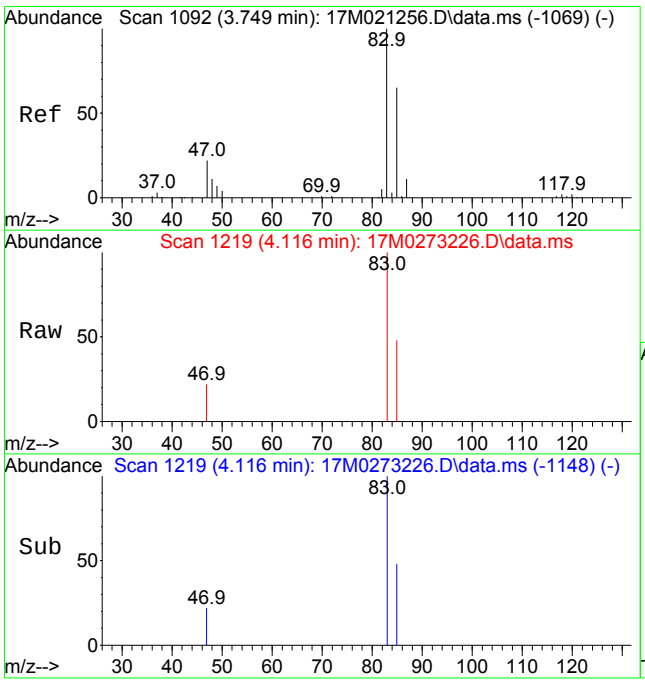


#25
Cyclohexane
Concen: 0.8313 ug/L
RT: 3.974 min Scan# 1170
Delta R.T. 0.011 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion: 56 Resp: 4567

Ion	Ratio	Lower	Upper
56	100		
84	81.8	69.4	104.0
41	59.6	72.2	108.2#

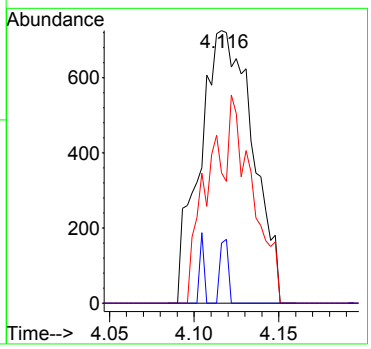


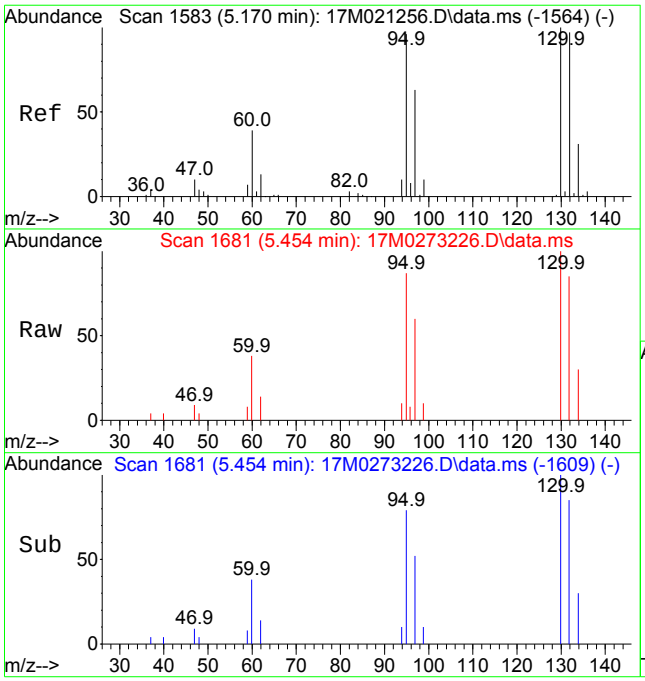


#27
Chloroform
Concen: 0.2337 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion: 83 Resp: 1574

Ion	Ratio	Lower	Upper
83	100		
85	61.6	39.2	91.4
47	0.0	12.9	30.1#

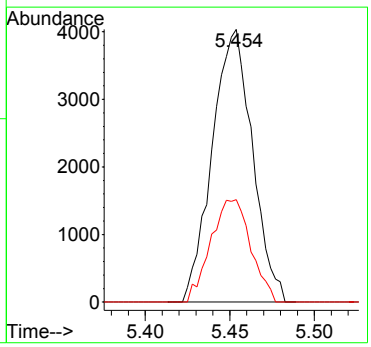


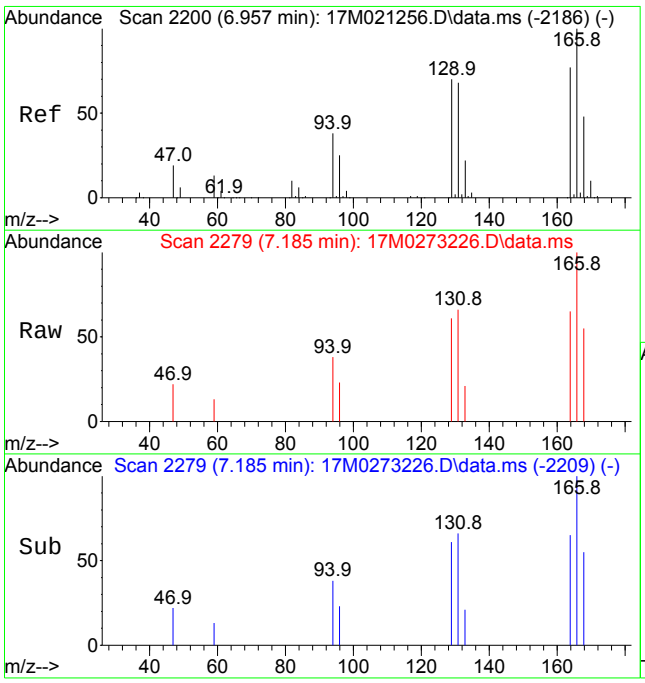


#37
Trichloroethene
Concen: 1.5196 ug/L
RT: 5.454 min Scan# 1681
Delta R.T. 0.009 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion:130 Resp: 6647

Ion	Ratio	Lower	Upper
130	100		
60	37.4	22.9	53.3

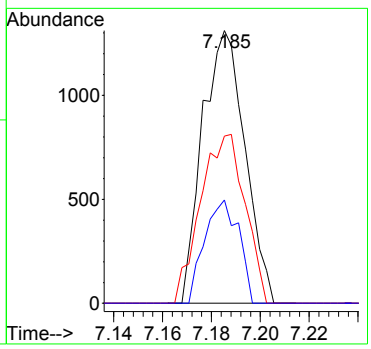


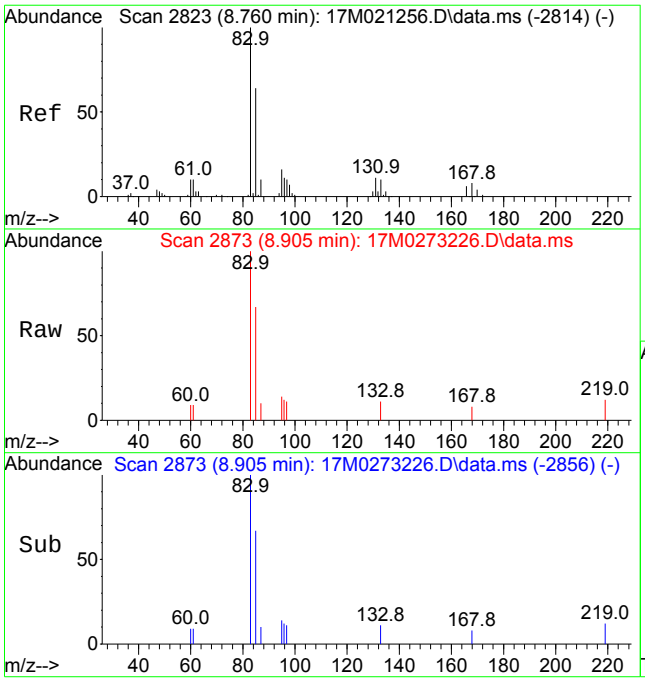


#49
Tetrachloroethene
Concen: 0.3510 ug/L
RT: 7.185 min Scan# 2279
Delta R.T. 0.003 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion:166 Resp: 1581

Ion	Ratio	Lower	Upper
166	100		
129	65.0	56.2	84.4
94	30.6	29.7	44.5

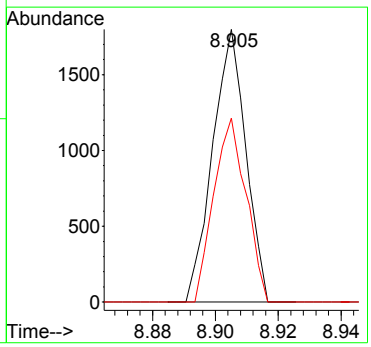




#69
1,1,2,2-Tetrachloroethane
Concen: 0.4123 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273226.D
Acq: 01 May 2017 20:36

Tgt Ion: 83 Resp: 1321

Ion	Ratio	Lower	Upper
83	100		
85	65.6	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273227.D Vial: 25
Acq On : 01 May 2017 20:56 Operator: ADC
Sample : L17041203-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:43 2017

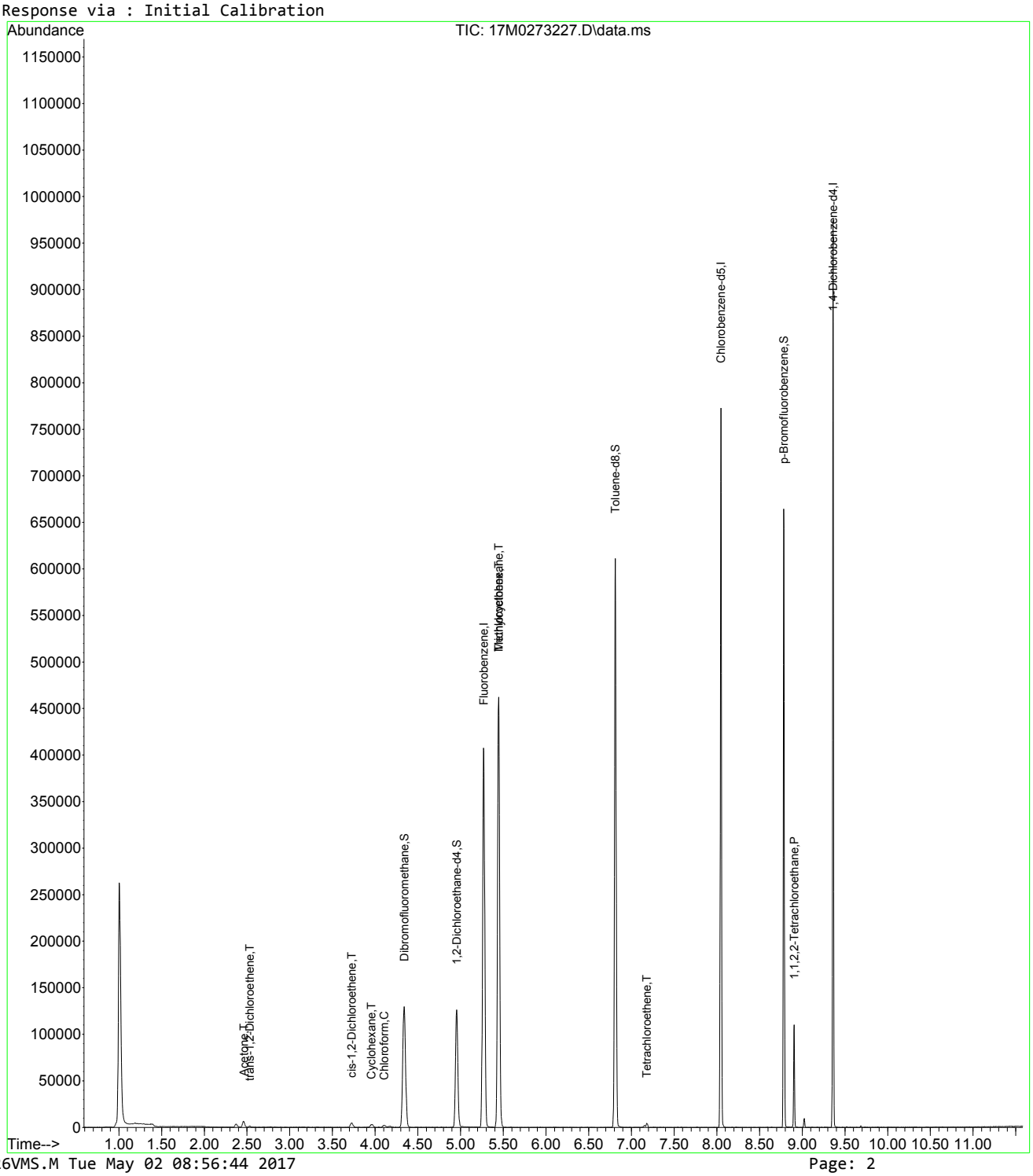
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

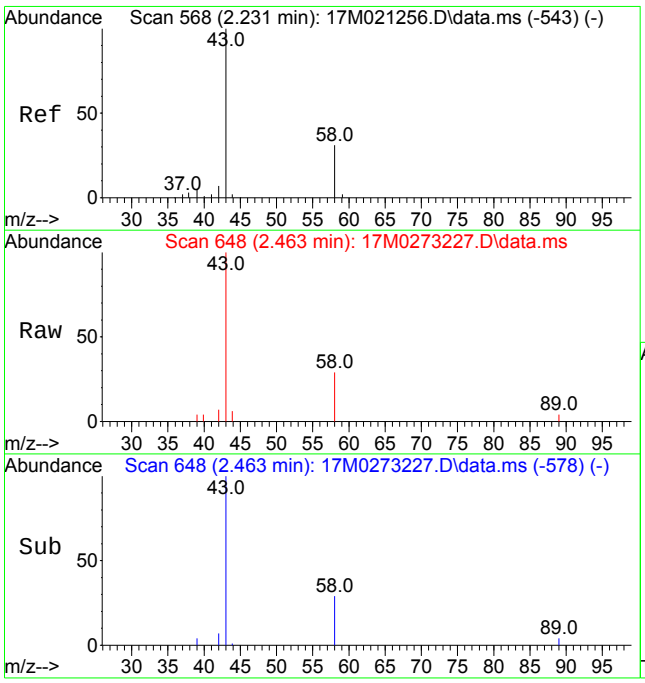
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	348469	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	257022	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	126900	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	93647	24.8837	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.535%			
34) 1,2-Dichloroethane-d4	4.953	65	90005	25.5152	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.061%			
47) Toluene-d8	6.812	98	325674	25.3896	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.558%			
66) p-Bromofluorobenzene	8.784	95	107149	25.2177	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 100.871%			
Target Compounds						Qvalue
16) Acetone	2.463	43	7927	11.3138	ug/L	95
17) trans-1,2-Dichloroethene	2.530	96	469	0.1280	ug/L	89
23) cis-1,2-Dichloroethene	3.725	96	2941	0.7089	ug/L	98
25) Cyclohexane	3.954	56	1921	0.3431	ug/L #	83
27) Chloroform	4.105	83	2787	0.4061	ug/L	97
36) Methylcyclohexane	5.445	83	1611	0.2746	ug/L #	1
37) Trichloroethene	5.445	130	147861	33.1651	ug/L	97
49) Tetrachloroethene	7.180	166	1102	0.2398	ug/L	93
69) 1,1,2,2-Tetrachloroethane	8.905	83	27448	8.0410	ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273227.D Vial: 25
Acq On : 01 May 2017 20:56 Operator: ADC
Sample : L17041203-38 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:43 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

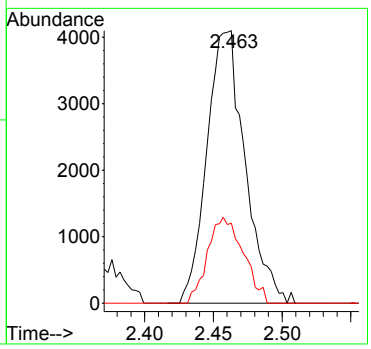


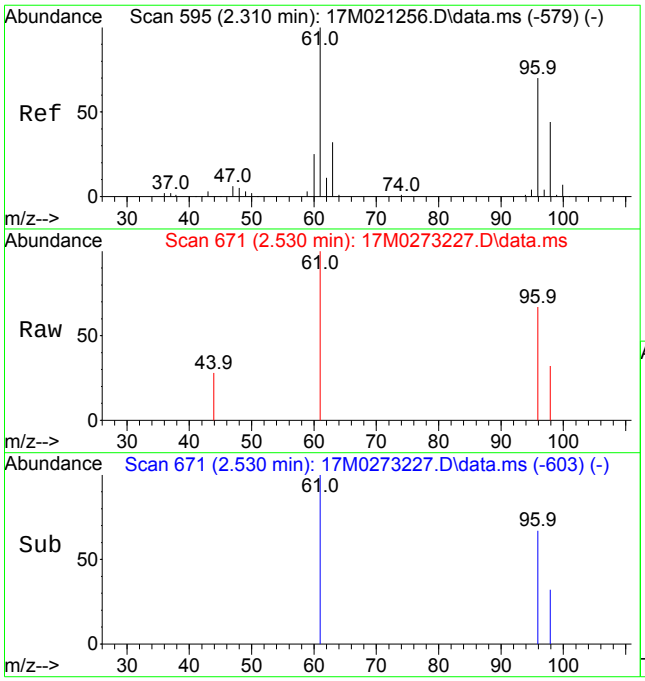


#16
Acetone
Concen: 11.3138 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 43 Resp: 7927

Ion	Ratio	Lower	Upper
43	100		
58	29.4	19.4	45.2

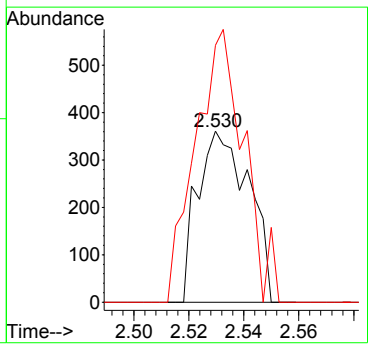


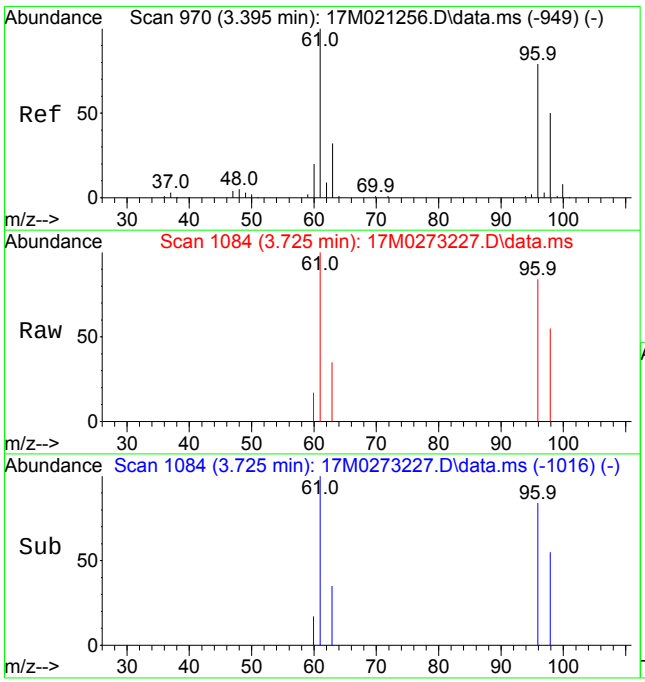


#17
trans-1,2-Dichloroethene
Concen: 0.1280 ug/L
RT: 2.530 min Scan# 671
Delta R.T. -0.002 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 96 Resp: 469

Ion	Ratio	Lower	Upper
96	100		
61	149.9	109.4	164.0

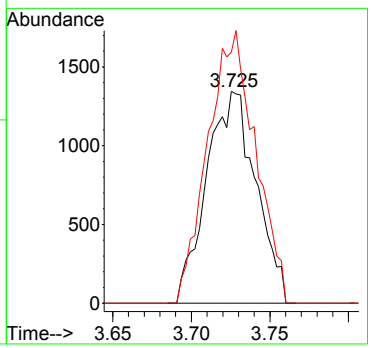


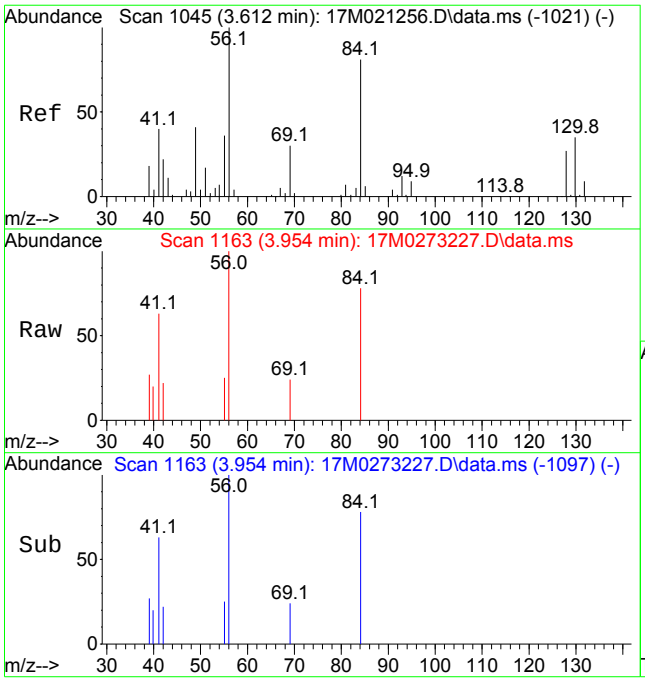


#23
cis-1,2-Dichloroethene
Concen: 0.7089 ug/L
RT: 3.725 min Scan# 1084
Delta R.T. -0.003 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 96 Resp: 2941

Ion	Ratio	Lower	Upper
96	100		
61	124.6	98.1	147.1

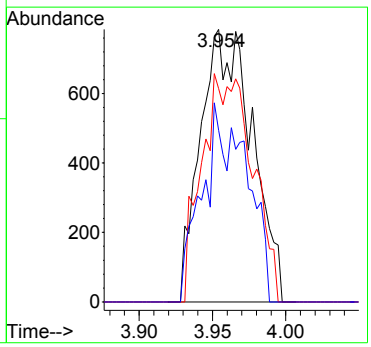


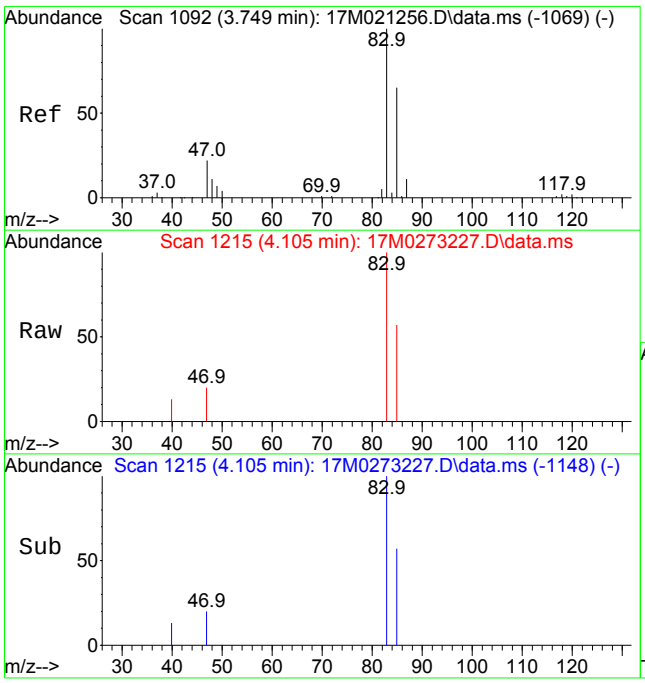


#25
Cyclohexane
Concen: 0.3431 ug/L
RT: 3.954 min Scan# 1163
Delta R.T. -0.009 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 56 Resp: 1921

Ion	Ratio	Lower	Upper
56	100		
84	81.9	69.4	104.0
41	62.8	72.2	108.2#

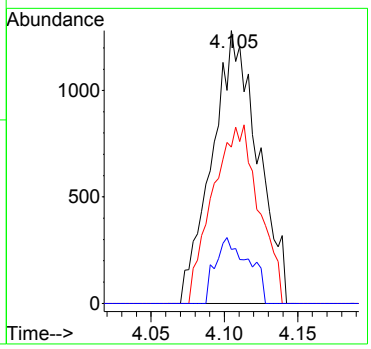


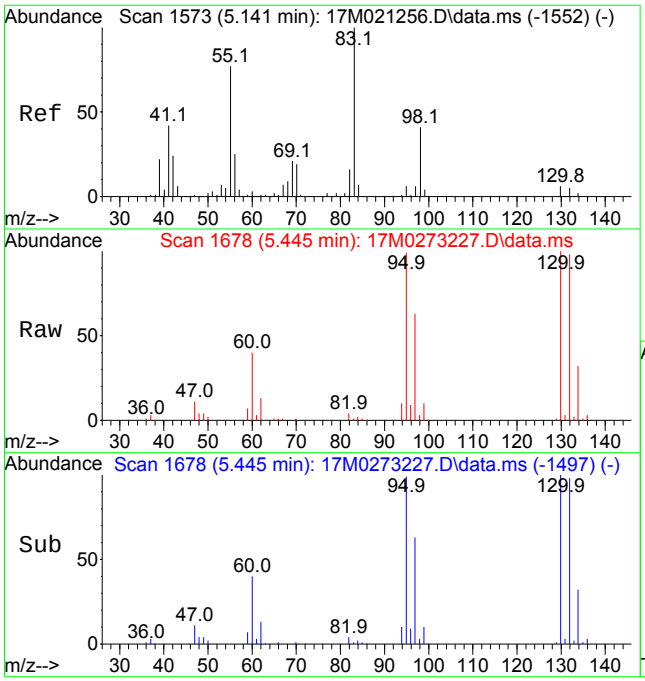


#27
Chloroform
Concen: 0.4061 ug/L
RT: 4.105 min Scan# 1215
Delta R.T. -0.005 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 83 Resp: 2787

Ion	Ratio	Lower	Upper
83	100		
85	65.7	39.2	91.4
47	17.5	12.9	30.1

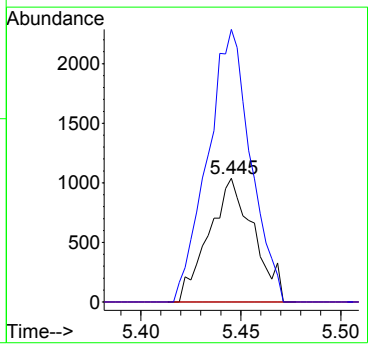


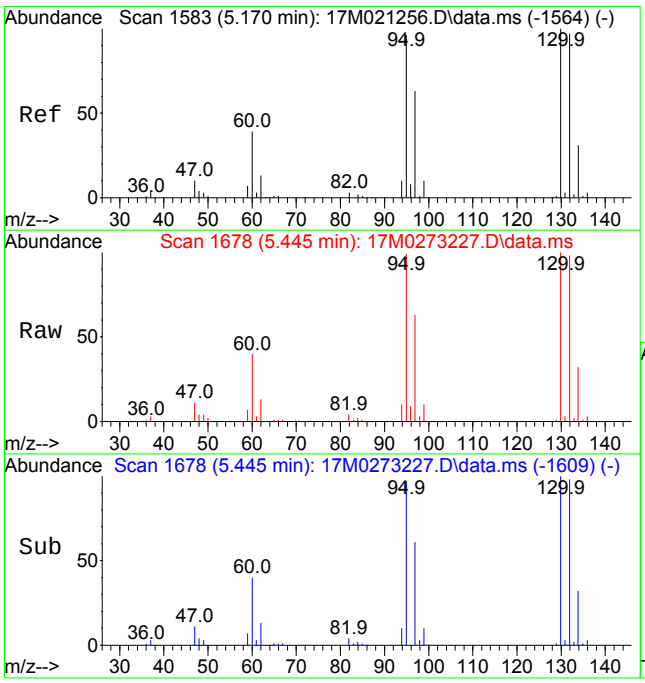


#36
Methylcyclohexane
Concen: 0.2746 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.023 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 83 Resp: 1611

Ion	Ratio	Lower	Upper
83	100		
55	0.0	57.1	85.7#
98	214.0	34.4	51.6#

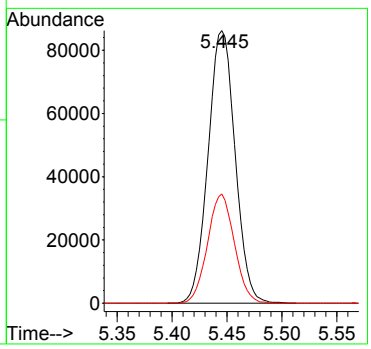


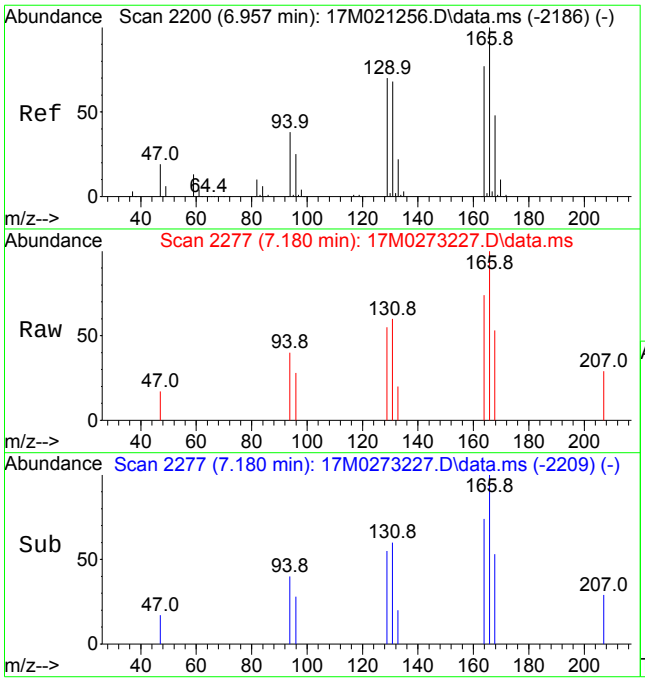


#37
Trichloroethene
Concen: 33.1651 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion:130 Resp: 147861

Ion	Ratio	Lower	Upper
130	100		
60	39.6	22.9	53.3

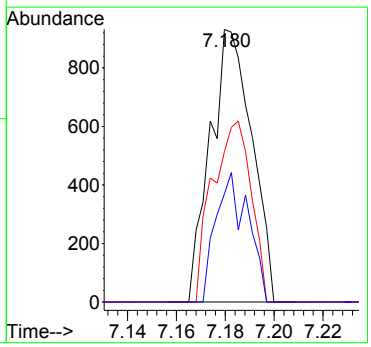


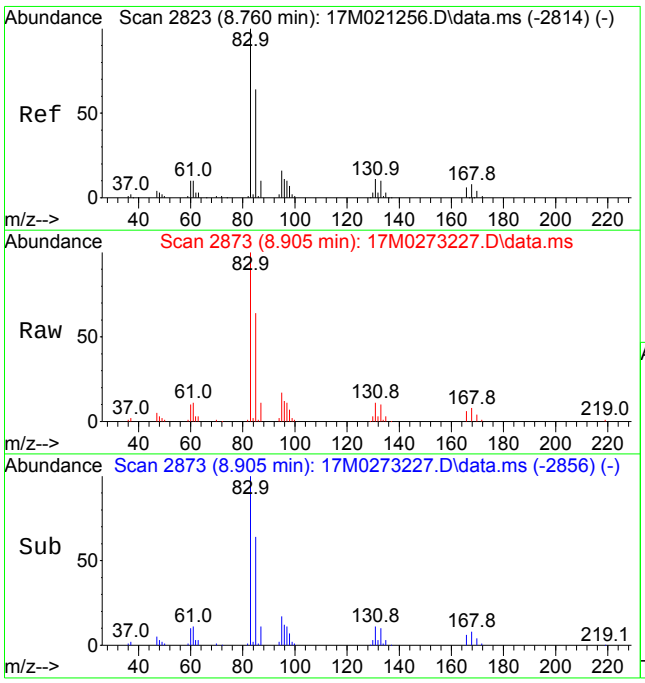


#49
Tetrachloroethene
Concen: 0.2398 ug/L
RT: 7.180 min Scan# 2277
Delta R.T. -0.002 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion:166 Resp: 1102

Ion	Ratio	Lower	Upper
166	100		
129	61.9	56.2	84.4
94	36.7	29.7	44.5

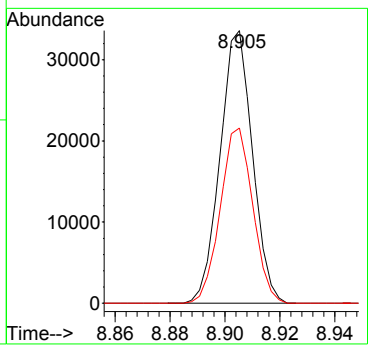




#69
1,1,2,2-Tetrachloroethane
Concen: 8.0410 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273227.D
Acq: 01 May 2017 20:56

Tgt Ion: 83 Resp: 27448

Ion	Ratio	Lower	Upper
83	100		
85	64.4	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273228.D Vial: 26
Acq On : 01 May 2017 21:16 Operator: ADC
Sample : L17041203-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:46 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

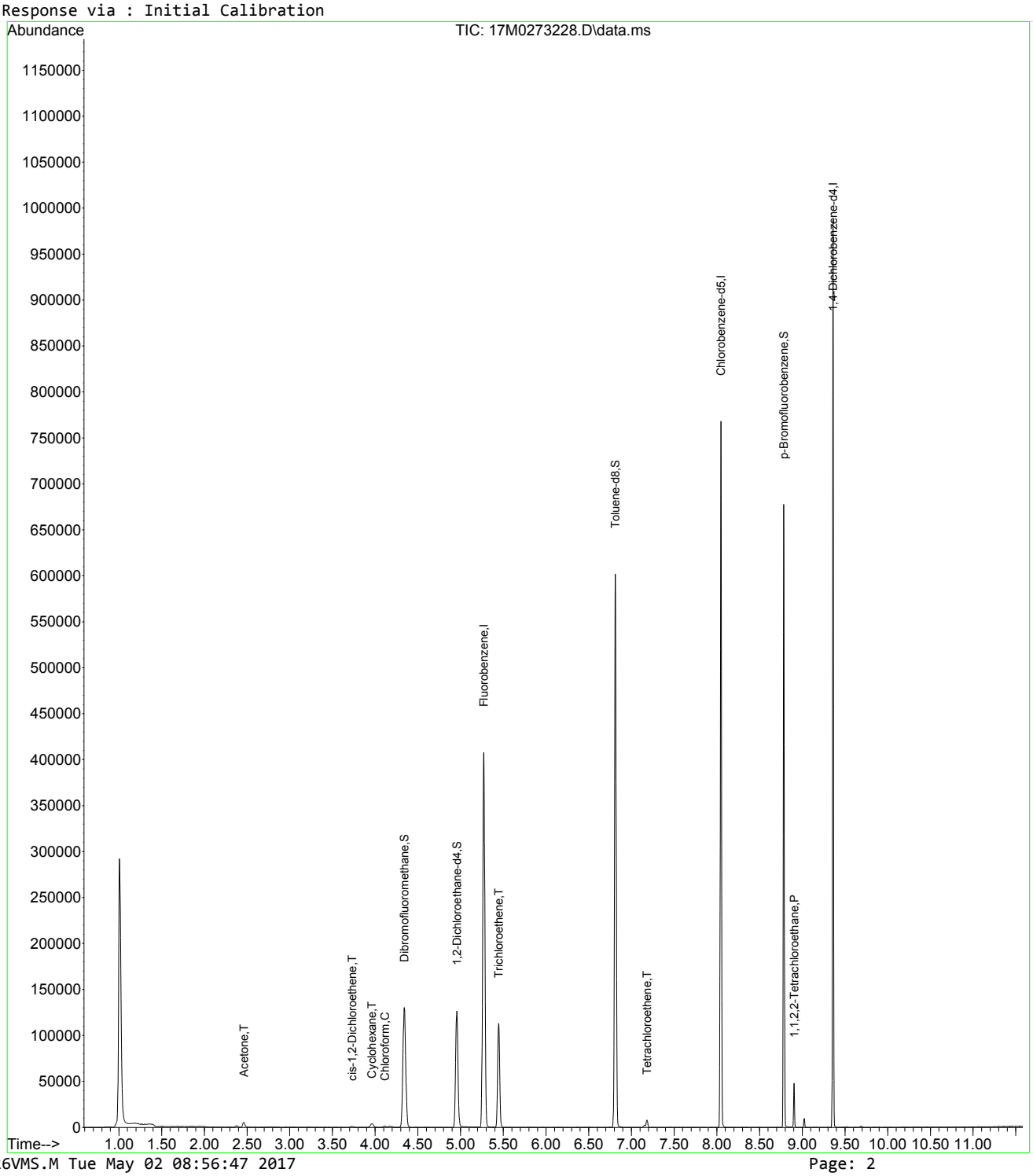
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	347854	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	258895	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	128652	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	92897	24.7280	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.912%			
34) 1,2-Dichloroethane-d4	4.956	65	91657	26.0295	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.118%			
47) Toluene-d8	6.812	98	326065	25.2362	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.945%			
66) p-Bromofluorobenzene	8.783	95	106263	24.6686	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.674%			
Target Compounds						Qvalue
16) Acetone	2.463	43	6444	9.2134	ug/L	95
23) cis-1,2-Dichloroethene	3.731	96	627	0.1514	ug/L	94
25) Cyclohexane	3.963	56	2568	0.4595	ug/L #	79
27) Chloroform	4.113	83	1535	0.2240	ug/L #	89
37) Trichloroethene	5.445	130	36301	8.1567	ug/L	97
49) Tetrachloroethene	7.182	166	1980	0.4277	ug/L	94
69) 1,1,2,2-Tetrachloroethane	8.905	83	12252	3.5404	ug/L	98

(#) = qualifier out of range (m) = manual integration (+) = signals summed

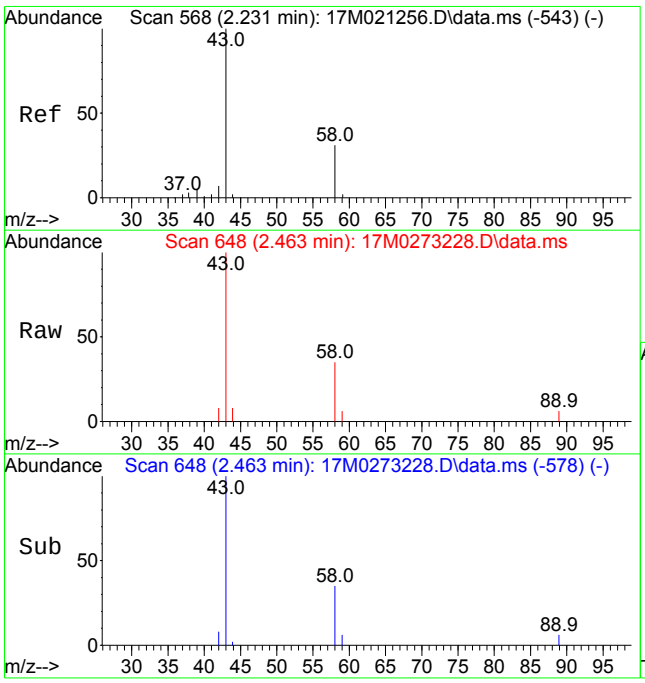
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273228.D Vial: 26
Acq On : 01 May 2017 21:16 Operator: ADC
Sample : L17041203-39 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:46 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



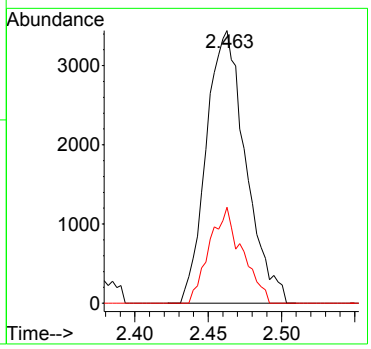
826VMS.M Tue May 02 08:56:47 2017 Page: 2

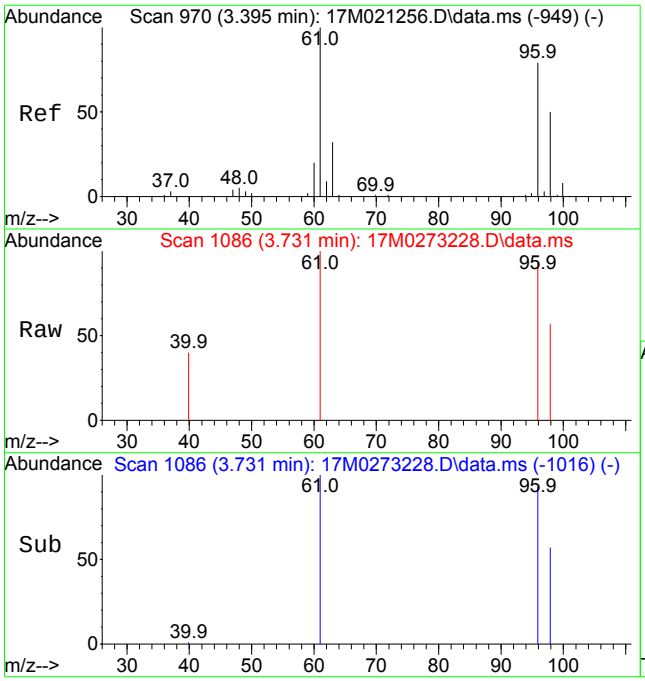


#16
Acetone
Concen: 9.2134 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion: 43 Resp: 6444

Ion	Ratio	Lower	Upper
43	100		
58	29.4	19.4	45.2

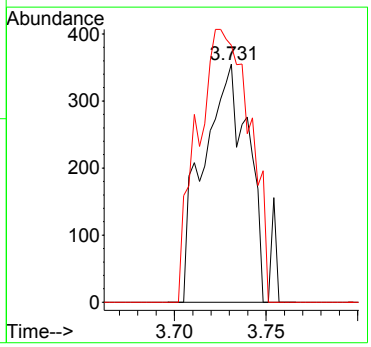


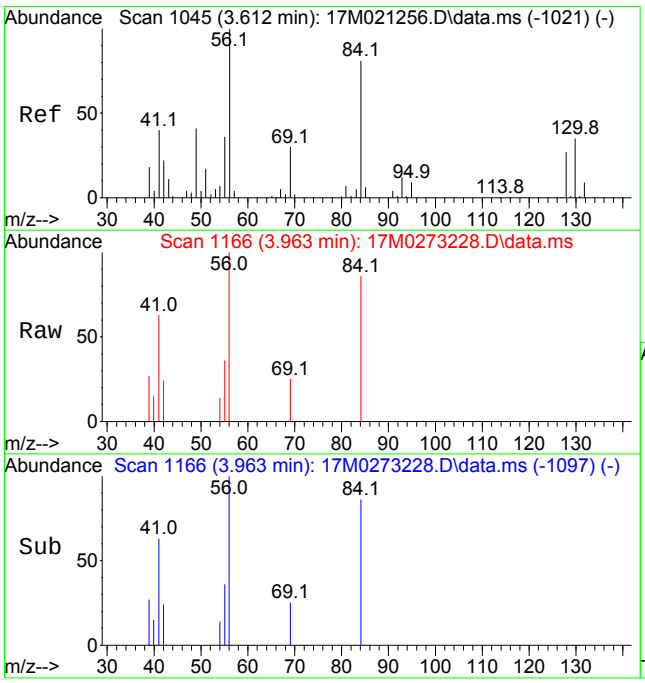


#23
cis-1,2-Dichloroethene
Concen: 0.1514 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion: 96 Resp: 627

Ion	Ratio	Lower	Upper
96	100		
61	129.2	98.1	147.1

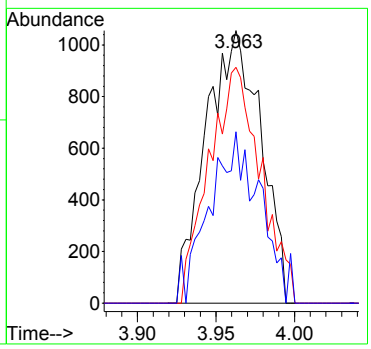


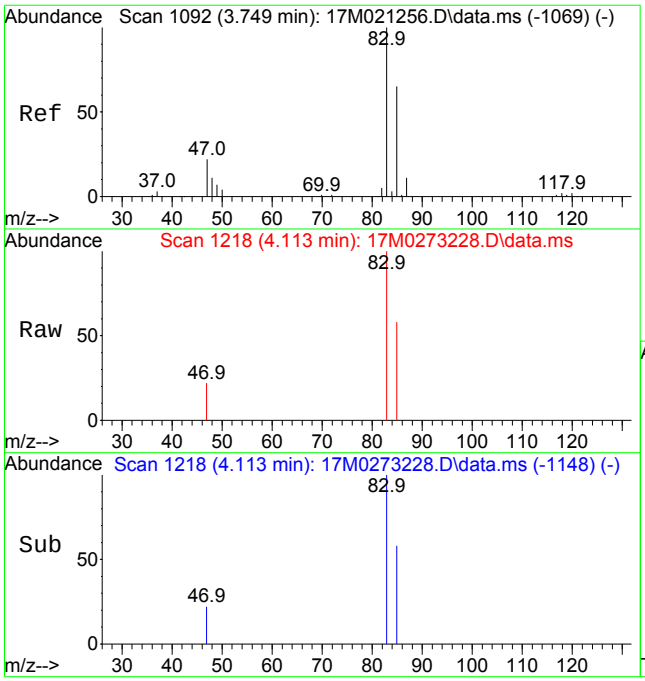


#25
Cyclohexane
Concen: 0.4595 ug/L
RT: 3.963 min Scan# 1166
Delta R.T. -0.000 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion: 56 Resp: 2568

Ion	Ratio	Lower	Upper
56	100		
84	81.0	69.4	104.0
41	57.8	72.2	108.2#

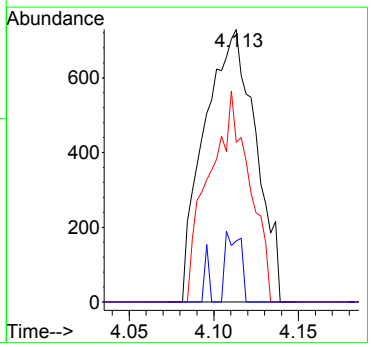


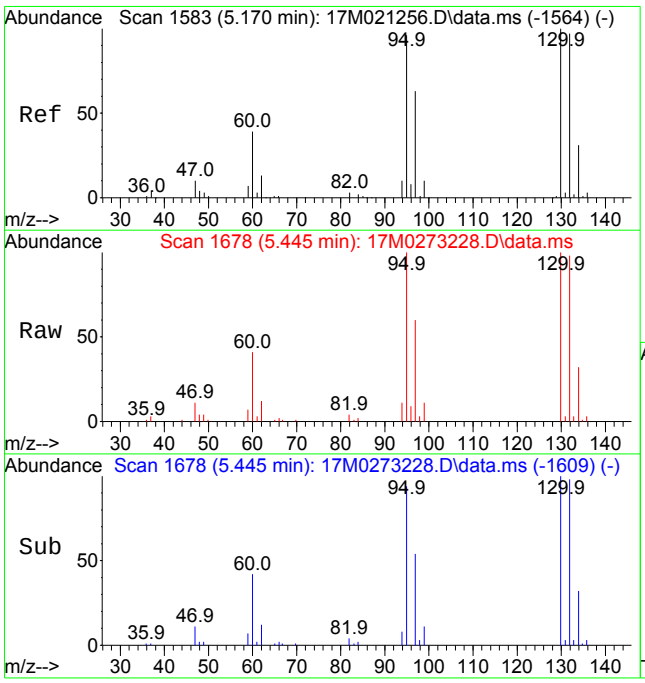


#27
Chloroform
Concen: 0.2240 ug/L
RT: 4.113 min Scan# 1218
Delta R.T. 0.003 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion: 83 Resp: 1535

Ion	Ratio	Lower	Upper
83	100		
85	60.8	39.2	91.4
47	9.4	12.9	30.1#

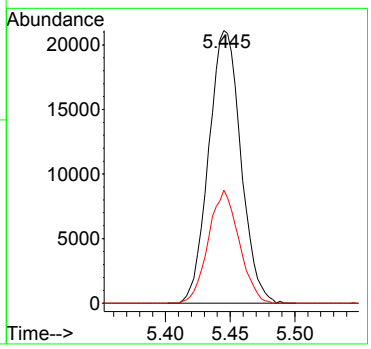


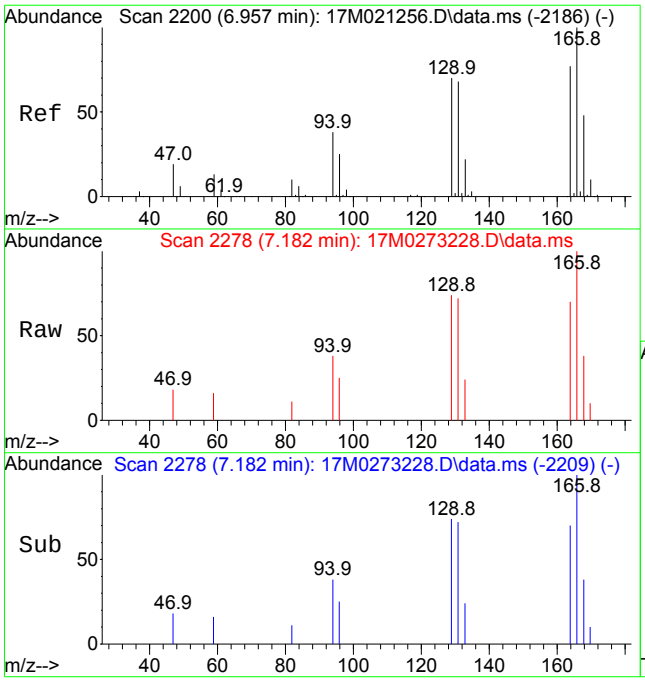


#37
Trichloroethene
Concen: 8.1567 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion:130 Resp: 36301

Ion	Ratio	Lower	Upper
130	100		
60	39.6	22.9	53.3

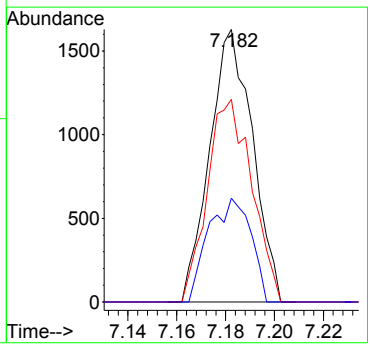


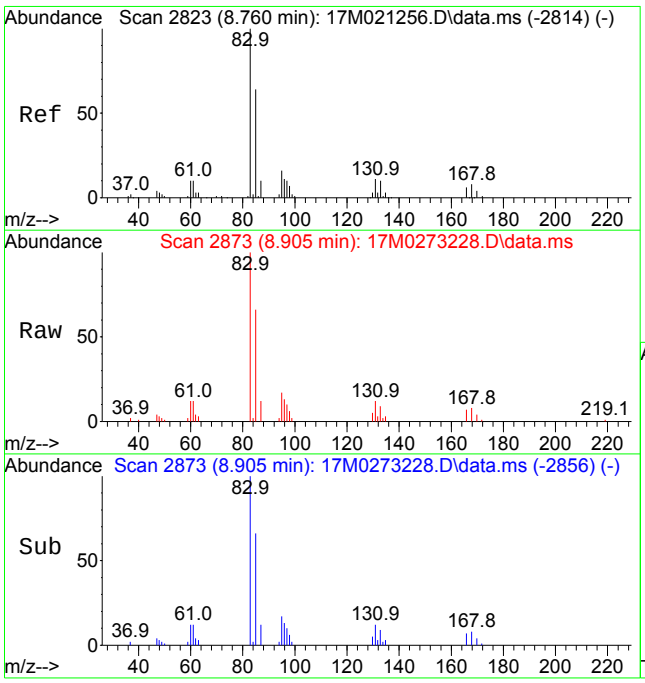


#49
Tetrachloroethene
Concen: 0.4277 ug/L
RT: 7.182 min Scan# 2278
Delta R.T. 0.000 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion:166 Resp: 1980

Ion	Ratio	Lower	Upper
166	100		
129	77.1	56.2	84.4
94	37.6	29.7	44.5

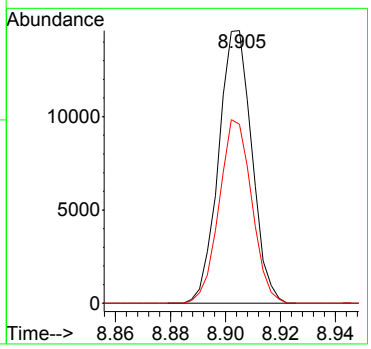




#69
1,1,2,2-Tetrachloroethane
Concen: 3.5404 ug/L
RT: 8.905 min Scan# 2873
Delta R.T. 0.000 min
Lab File: 17M0273228.D
Acq: 01 May 2017 21:16

Tgt Ion: 83 Resp: 12252

Ion	Ratio	Lower	Upper
83	100		
85	66.1	51.9	77.9



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273229.D Vial: 27
Acq On : 01 May 2017 21:44 Operator: ADC
Sample : L17041203-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

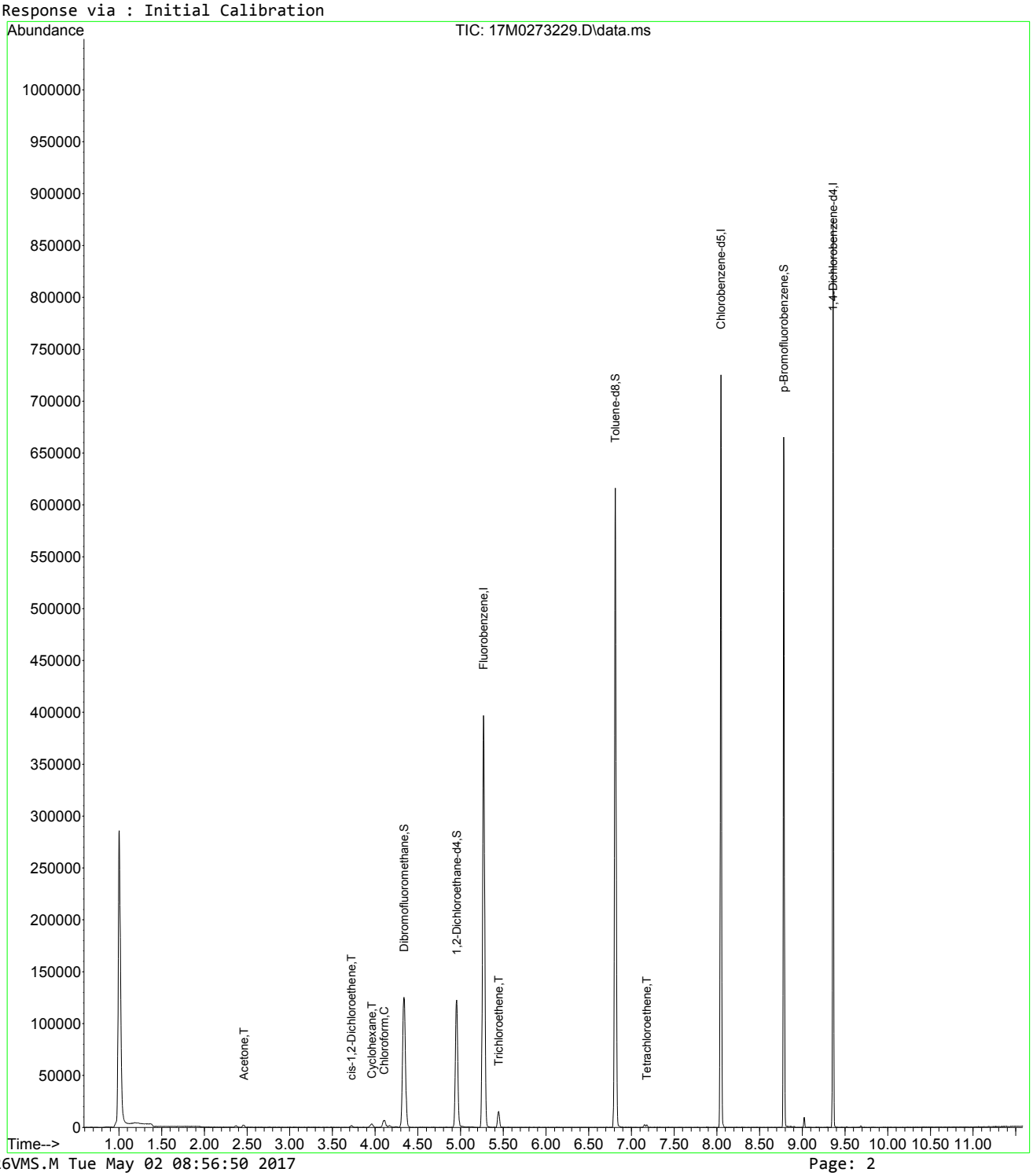
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.268	96	336311	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	246707	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	116371	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	92365	25.4303	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.721%			
34) 1,2-Dichloroethane-d4	4.953	65	88326	25.9445	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.778%			
47) Toluene-d8	6.812	98	321684	26.1271	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.508%			
66) p-Bromofluorobenzene	8.783	95	108060	27.7332	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.933%			
Target Compounds						Qvalue
16) Acetone	2.463	43	2332	3.4487	ug/L	95
23) cis-1,2-Dichloroethene	3.722	96	961	0.2400	ug/L	97
25) Cyclohexane	3.960	56	2020	0.3738	ug/L #	78
27) Chloroform	4.105	83	7700	1.1624	ug/L	99
37) Trichloroethene	5.445	130	5197	1.2078	ug/L	99
49) Tetrachloroethene	7.179	166	593	0.1344	ug/L #	65

(#) = qualifier out of range (m) = manual integration (+) = signals summed

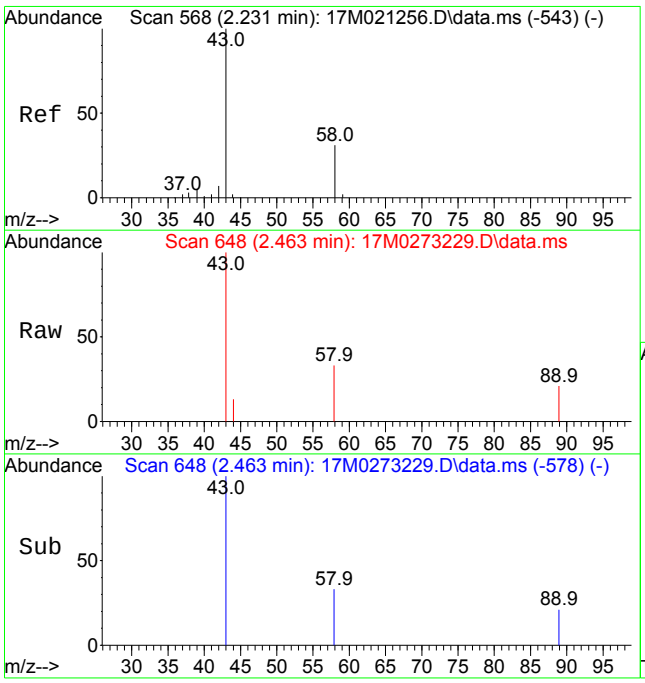
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273229.D Vial: 27
Acq On : 01 May 2017 21:44 Operator: ADC
Sample : L17041203-40 A 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:56:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



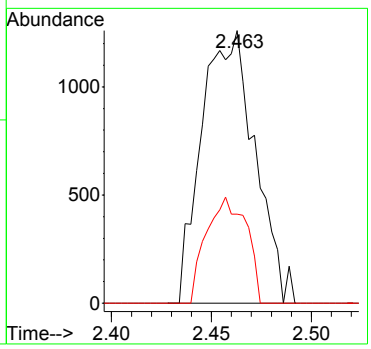
826VMS.M Tue May 02 08:56:50 2017 Page: 2

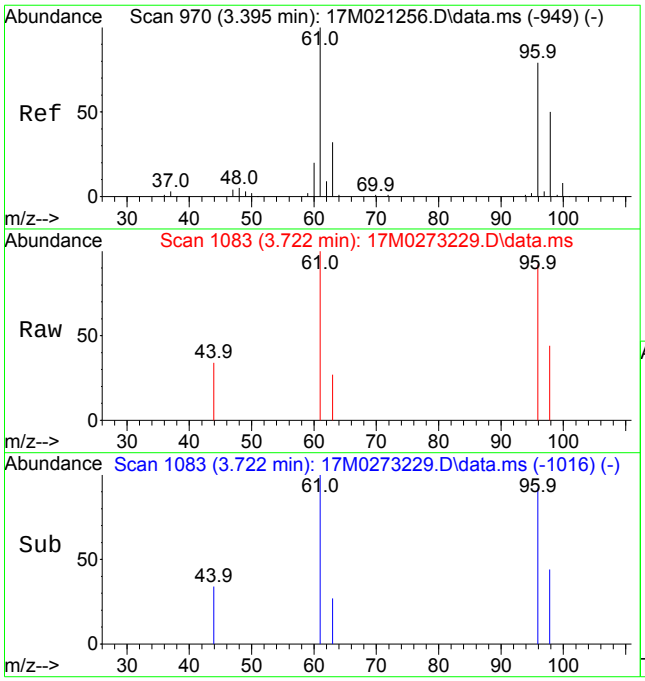


#16
Acetone
Concen: 3.4487 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion: 43 Resp: 2332

Ion	Ratio	Lower	Upper
43	100		
58	29.3	19.4	45.2

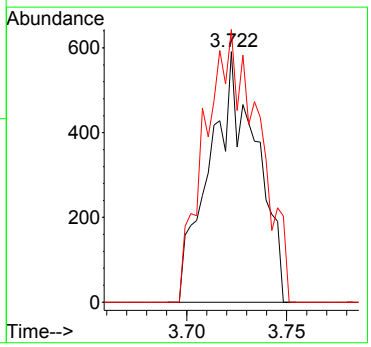


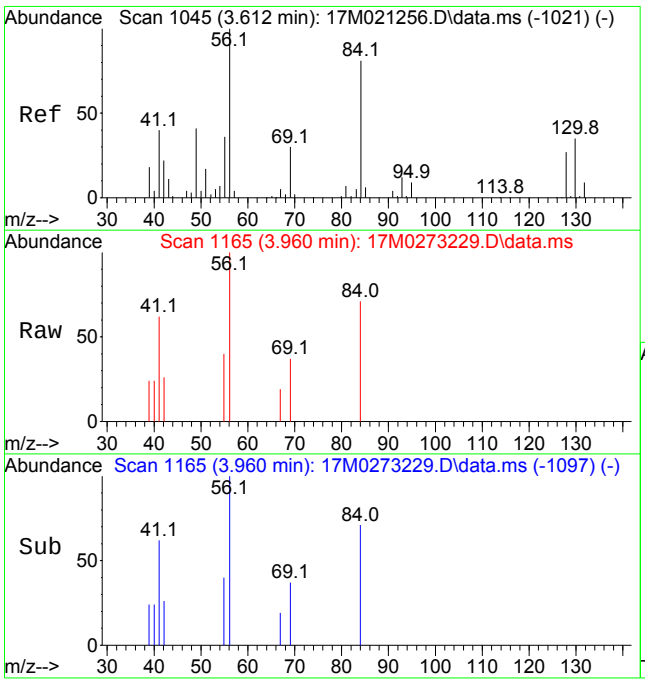


#23
cis-1,2-Dichloroethene
Concen: 0.2400 ug/L
RT: 3.722 min Scan# 1083
Delta R.T. -0.006 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion: 96 Resp: 961

Ion	Ratio	Lower	Upper
96	100		
61	125.9	98.1	147.1

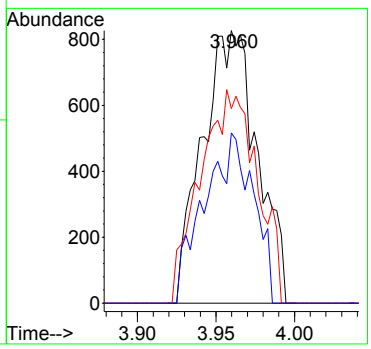


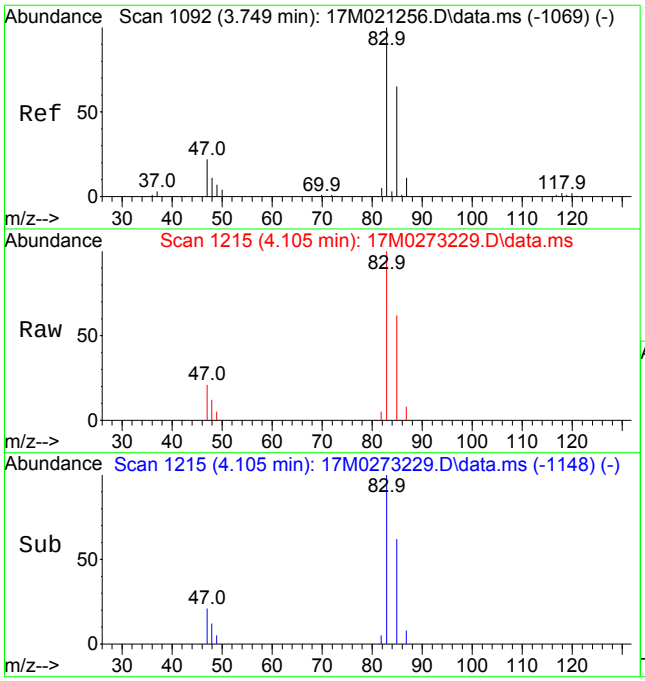


#25
Cyclohexane
Concen: 0.3738 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion: 56 Resp: 2020

Ion	Ratio	Lower	Upper
56	100		
84	80.6	69.4	104.0
41	55.5	72.2	108.2#

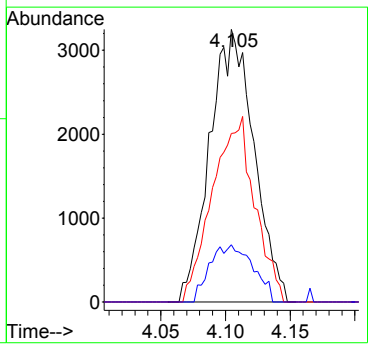


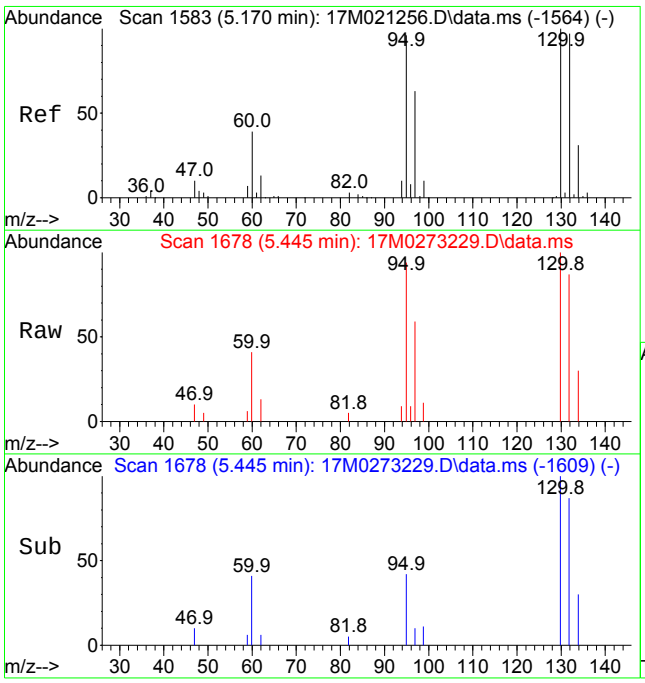


#27
Chloroform
Concen: 1.1624 ug/L
RT: 4.105 min Scan# 1215
Delta R.T. -0.005 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion: 83 Resp: 7700

Ion	Ratio	Lower	Upper
83	100		
85	65.0	39.2	91.4
47	20.4	12.9	30.1

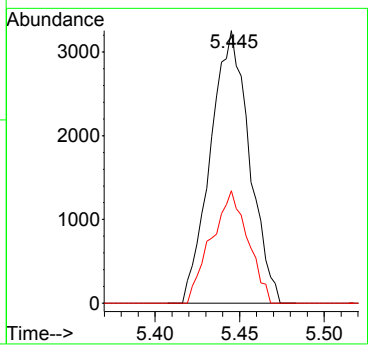


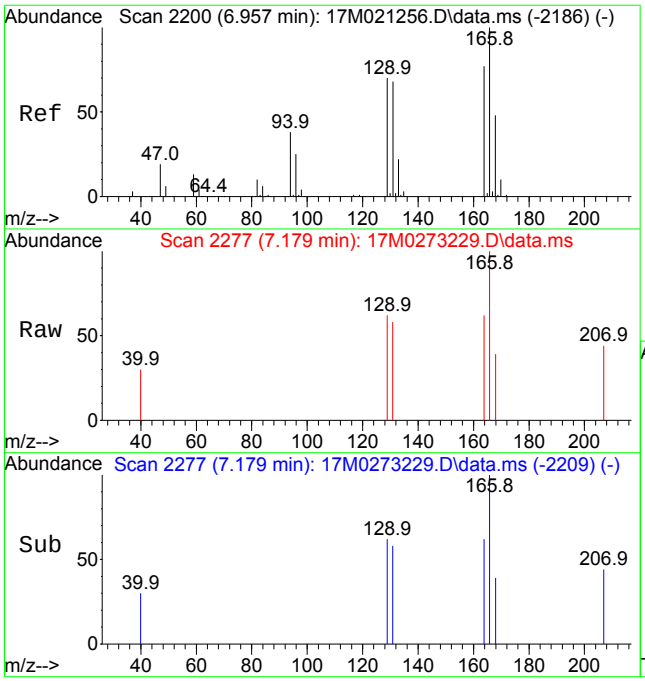


#37
Trichloroethene
Concen: 1.2078 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion:130 Resp: 5197

Ion	Ratio	Lower	Upper
130	100		
60	38.7	22.9	53.3

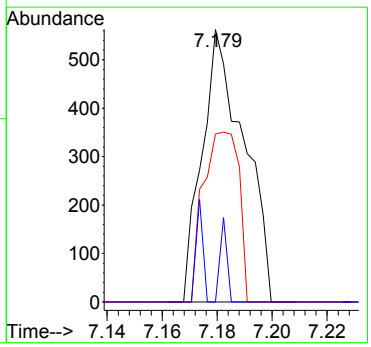




#49
Tetrachloroethene
Concen: 0.1344 ug/L
RT: 7.179 min Scan# 2277
Delta R.T. -0.003 min
Lab File: 17M0273229.D
Acq: 01 May 2017 21:44

Tgt Ion:166 Resp: 593

Ion	Ratio	Lower	Upper
166	100		
129	53.1	56.2	84.4#
94	0.0	29.7	44.5#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273269.D Vial: 9
Acq On : 02 May 2017 21:30 Operator: ADC
Sample : L17041203-41 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:08 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

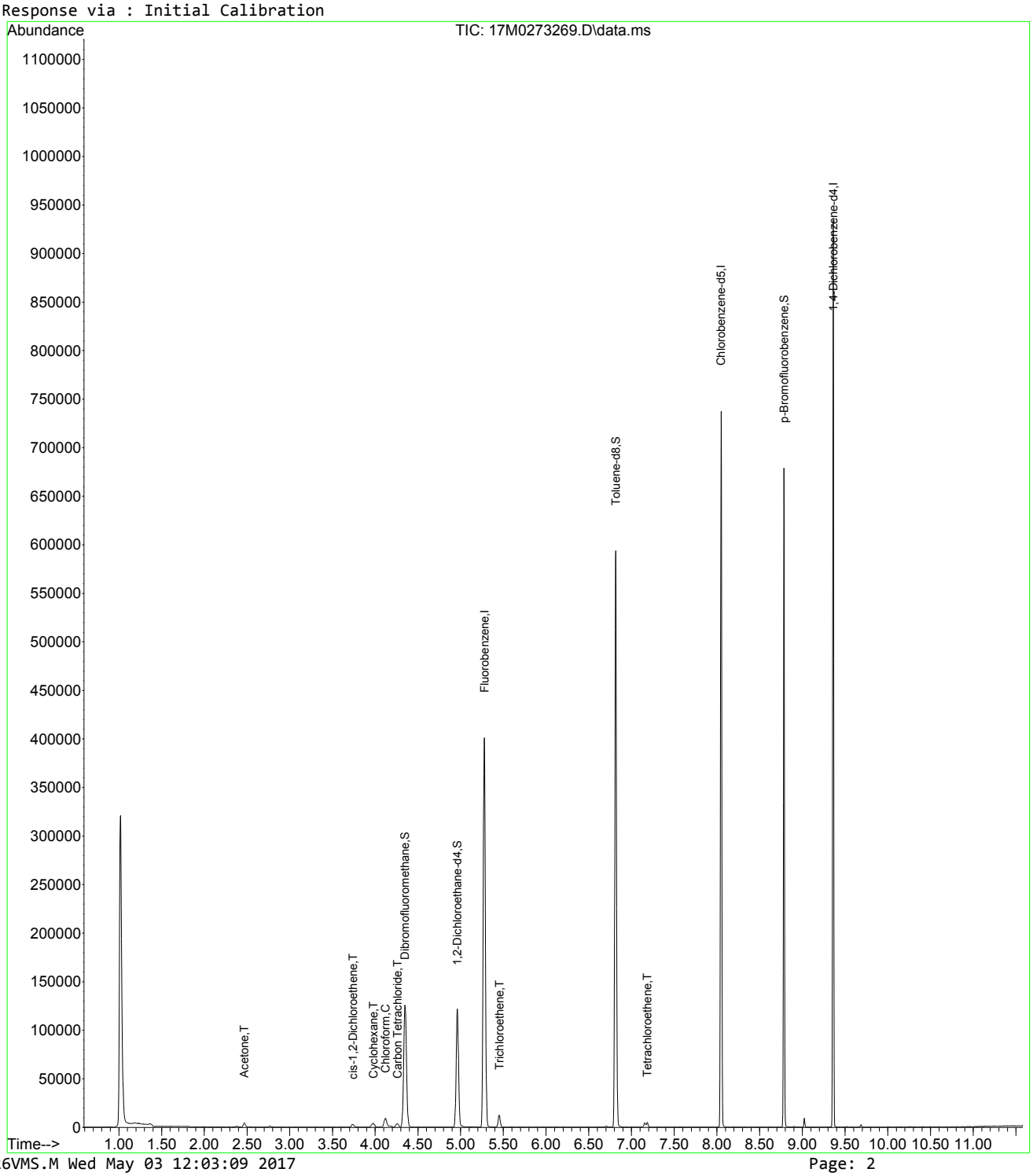
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	343382	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252874	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	121139	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	89885	24.2379	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 96.952%			
34) 1,2-Dichloroethane-d4	4.959	65	87480	25.1668	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.667%			
47) Toluene-d8	6.815	98	321358	25.4641	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.856%			
66) p-Bromofluorobenzene	8.784	95	109274	26.9409	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.764%			
Target Compounds						Qvalue
16) Acetone	2.466	43	5402	7.8242	ug/L	97
23) cis-1,2-Dichloroethene	3.740	96	1618	0.3958	ug/L	90
25) Cyclohexane	3.980	56	2595	0.4703	ug/L #	77
27) Chloroform	4.119	83	9482	1.4020	ug/L	100
28) Carbon Tetrachloride	4.261	117	2901	0.5424	ug/L	94
37) Trichloroethene	5.454	130	4367	0.9940	ug/L	99
49) Tetrachloroethene	7.186	166	1231	0.2722	ug/L	95

(#) = qualifier out of range (m) = manual integration (+) = signals summed

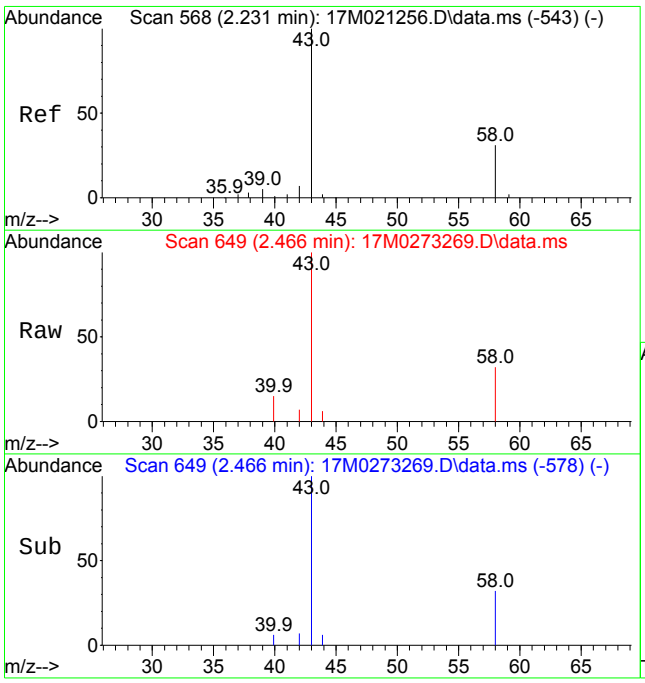
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273269.D Vial: 9
Acq On : 02 May 2017 21:30 Operator: ADC
Sample : L17041203-41 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:08 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



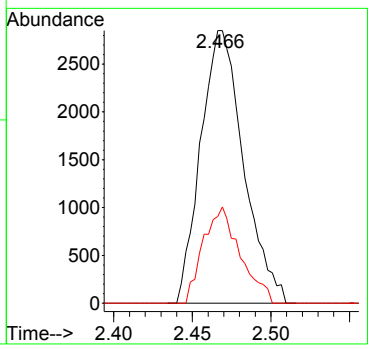
826VMS.M Wed May 03 12:03:09 2017 Page: 2

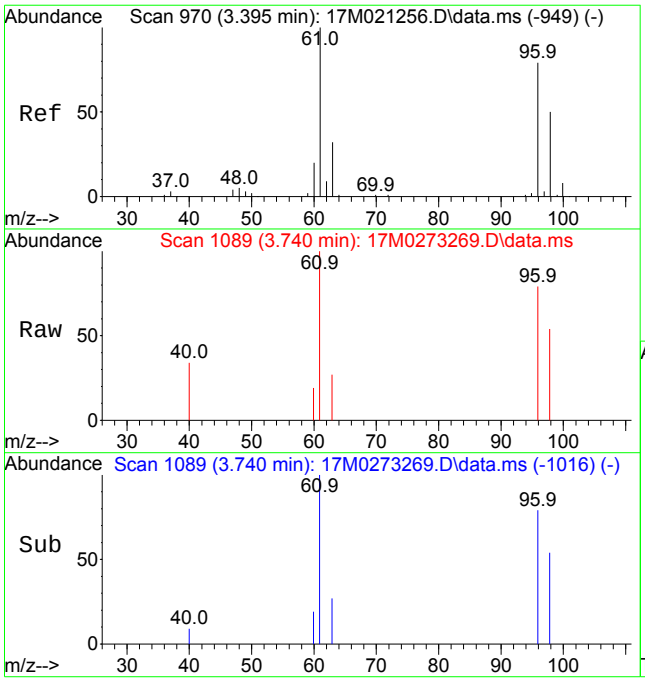


#16
Acetone
Concen: 7.8242 ug/L
RT: 2.466 min Scan# 649
Delta R.T. 0.006 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion: 43 Resp: 5402

Ion	Ratio	Lower	Upper
43	100		
58	30.5	19.4	45.2

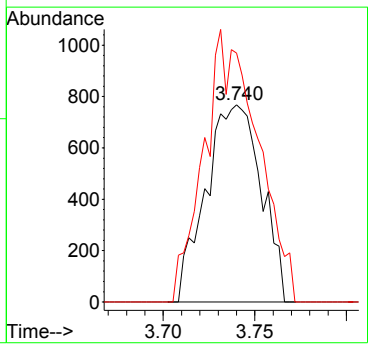


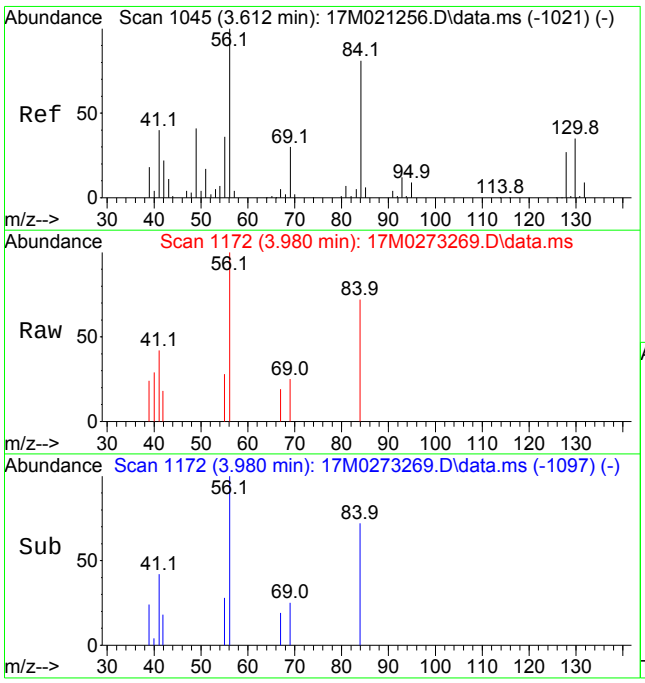


#23
cis-1,2-Dichloroethene
Concen: 0.3958 ug/L
RT: 3.740 min Scan# 1089
Delta R.T. 0.012 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion: 96 Resp: 1618

Ion	Ratio	Lower	Upper
96	100		
61	134.3	98.1	147.1

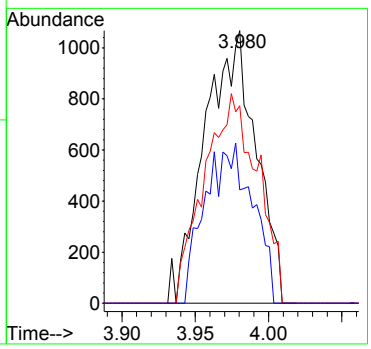


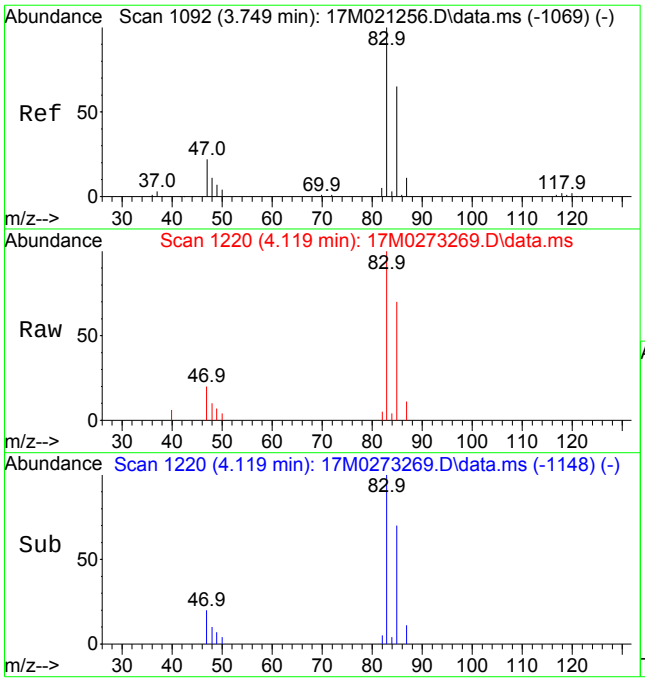


#25
Cyclohexane
Concen: 0.4703 ug/L
RT: 3.980 min Scan# 1172
Delta R.T. 0.017 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion: 56 Resp: 2595

Ion	Ratio	Lower	Upper
56	100		
84	79.7	69.4	104.0
41	54.6	72.2	108.2#

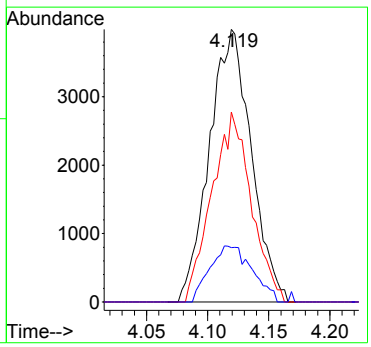


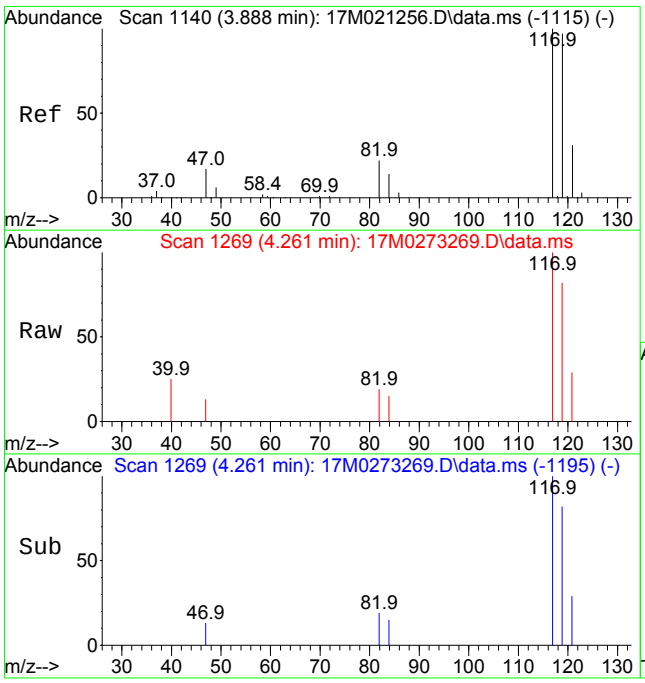


#27
Chloroform
Concen: 1.4020 ug/L
RT: 4.119 min Scan# 1220
Delta R.T. 0.009 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion: 83 Resp: 9482

Ion	Ratio	Lower	Upper
83	100		
85	65.3	39.2	91.4
47	20.8	12.9	30.1

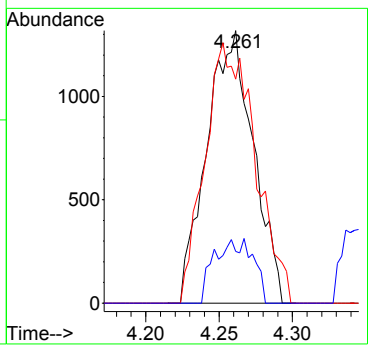


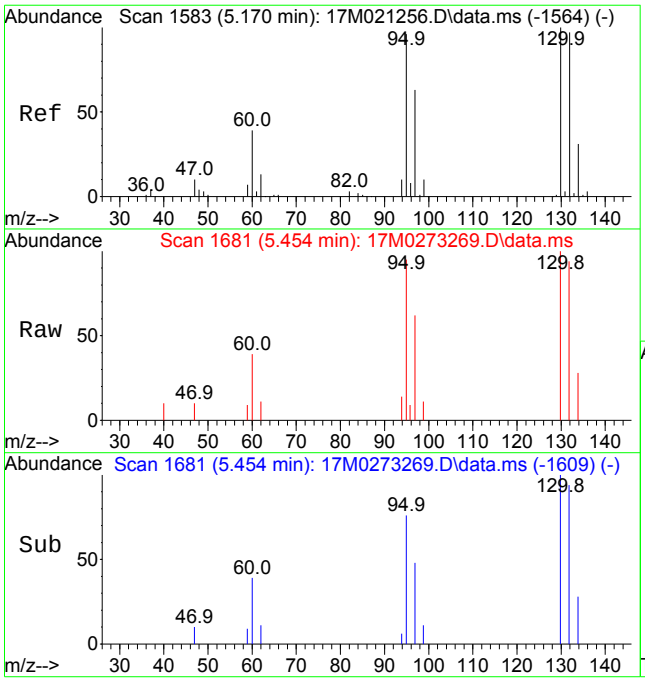


#28
Carbon Tetrachloride
Concen: 0.5424 ug/L
RT: 4.261 min Scan# 1269
Delta R.T. 0.015 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion:117 Resp: 2901

Ion	Ratio	Lower	Upper
117	100		
119	103.1	77.4	116.2
82	19.4	17.7	26.5

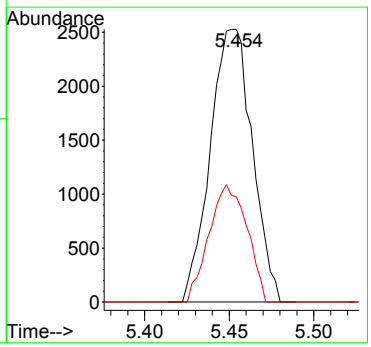


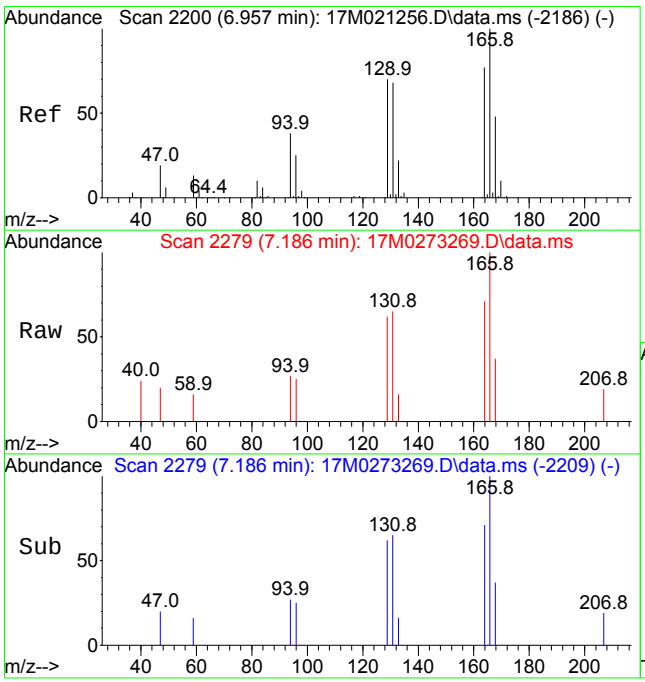


#37
Trichloroethene
Concen: 0.9940 ug/L
RT: 5.454 min Scan# 1681
Delta R.T. 0.009 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion:130 Resp: 4367

Ion	Ratio	Lower	Upper
130	100		
60	38.7	22.9	53.3

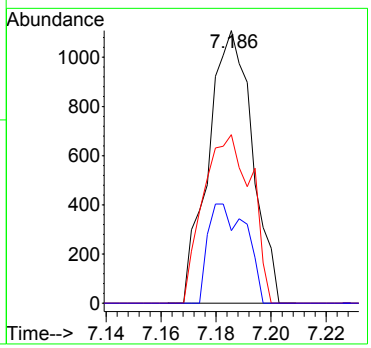




#49
Tetrachloroethene
Concen: 0.2722 ug/L
RT: 7.186 min Scan# 2279
Delta R.T. 0.004 min
Lab File: 17M0273269.D
Acq: 02 May 2017 21:30

Tgt Ion:166 Resp: 1231

Ion	Ratio	Lower	Upper
166	100		
129	67.6	56.2	84.4
94	31.5	29.7	44.5



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273270.D Vial: 10
Acq On : 02 May 2017 21:50 Operator: ADC
Sample : L17041203-42 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:11 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

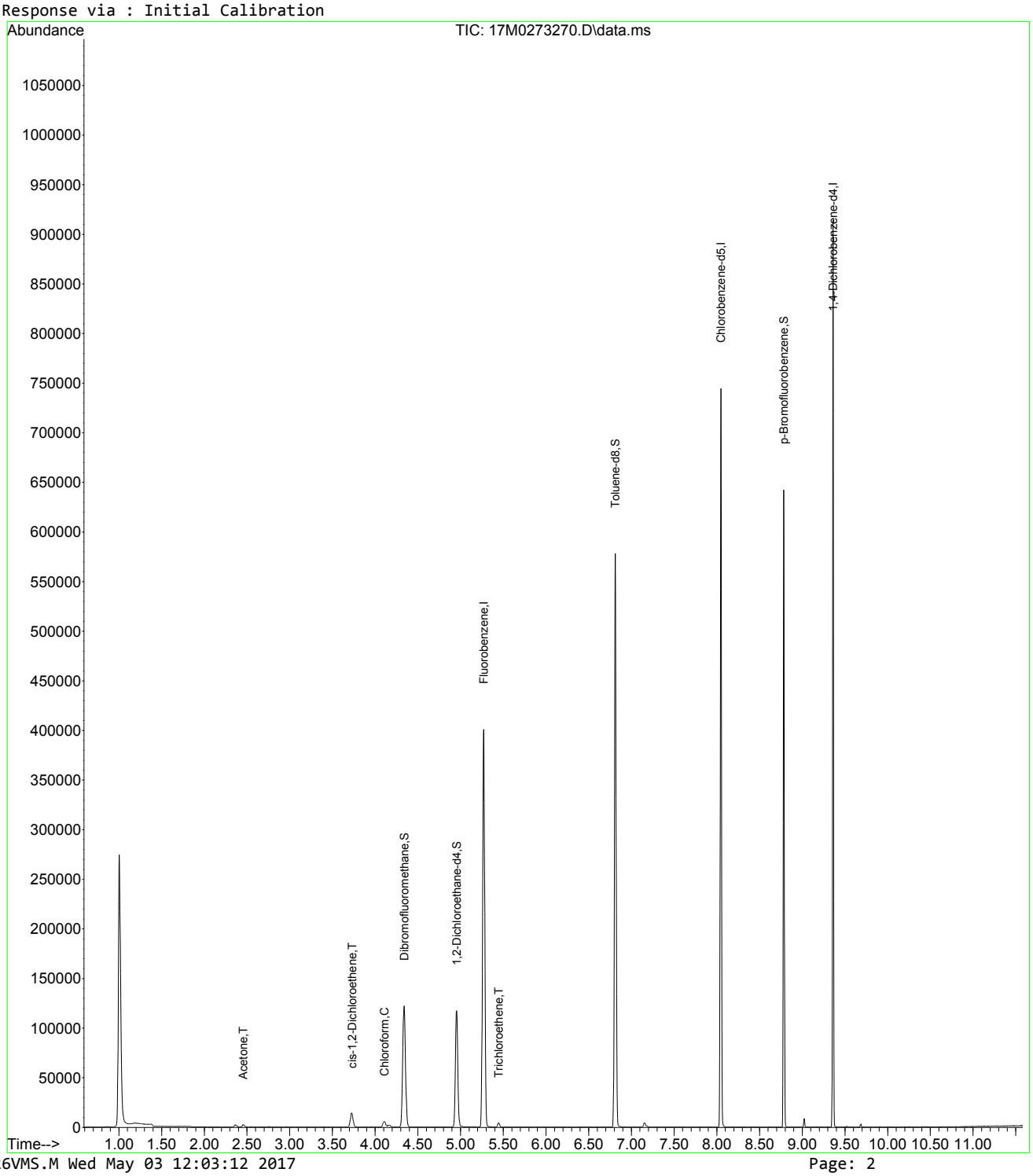
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	341628	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	253632	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	120157	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	87956	23.8395	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.358%			
34) 1,2-Dichloroethane-d4	4.953	65	85263	24.6550	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.620%			
47) Toluene-d8	6.812	98	311286	24.5923	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 98.369%			
66) p-Bromofluorobenzene	8.784	95	103282	25.6717	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.687%			
Target Compounds						Qvalue
16) Acetone	2.454	43	3064	4.4607	ug/L	97
23) cis-1,2-Dichloroethene	3.731	96	8447	2.0768	ug/L	99
27) Chloroform	4.108	83	6432	0.9559	ug/L	98
37) Trichloroethene	5.445	130	1641	0.3754	ug/L	93

(#) = qualifier out of range (m) = manual integration (+) = signals summed

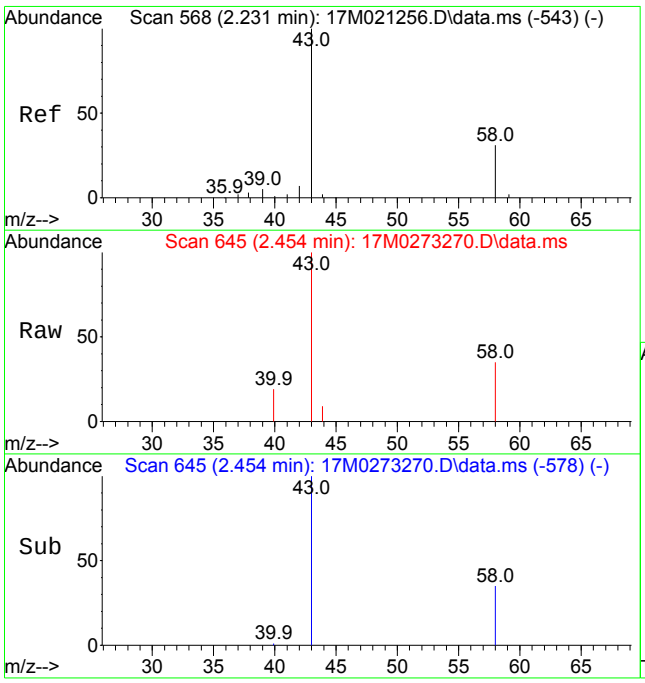
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273270.D Vial: 10
Acq On : 02 May 2017 21:50 Operator: ADC
Sample : L17041203-42 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:11 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



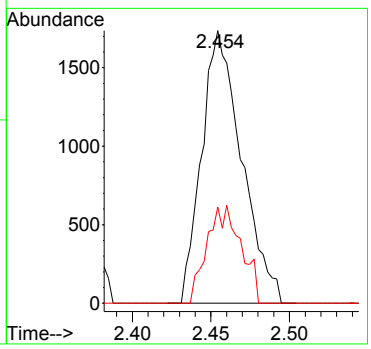
826VMS.M Wed May 03 12:03:12 2017 Page: 2

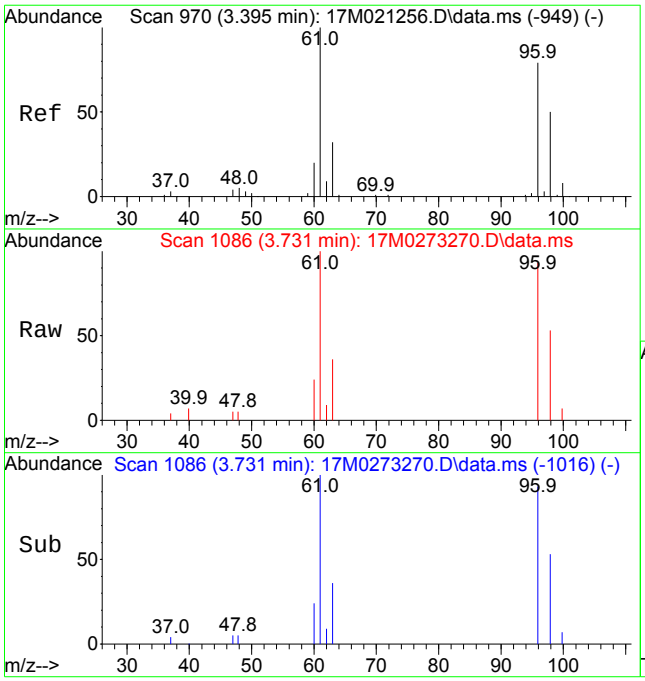


#16
Acetone
Concen: 4.4607 ug/L
RT: 2.454 min Scan# 645
Delta R.T. -0.006 min
Lab File: 17M0273270.D
Acq: 02 May 2017 21:50

Tgt Ion: 43 Resp: 3064

Ion	Ratio	Lower	Upper
43	100		
58	30.7	19.4	45.2

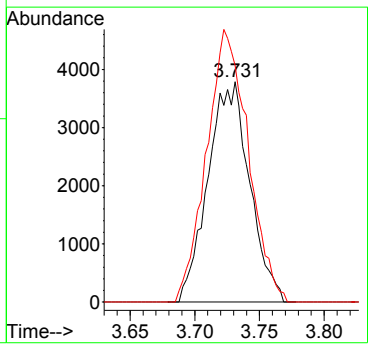


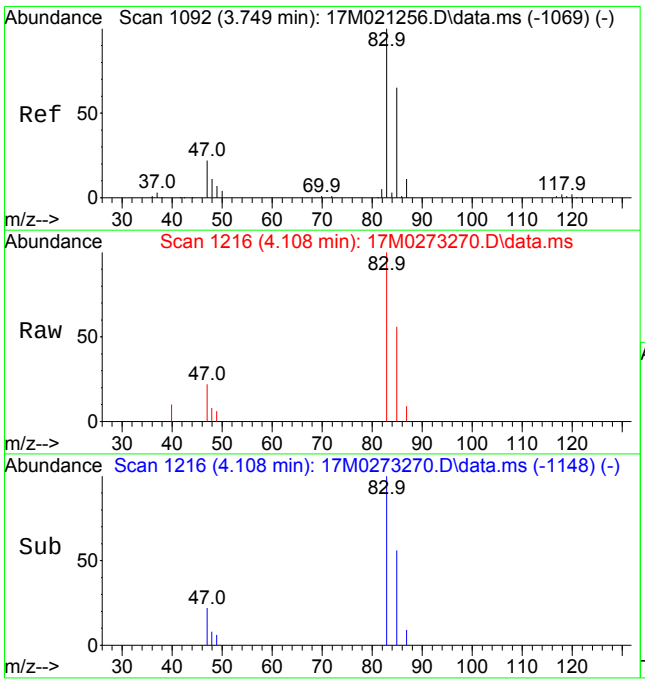


#23
cis-1,2-Dichloroethene
Concen: 2.0768 ug/L
RT: 3.731 min Scan# 1086
Delta R.T. 0.003 min
Lab File: 17M0273270.D
Acq: 02 May 2017 21:50

Tgt Ion: 96 Resp: 8447

Ion	Ratio	Lower	Upper
96	100		
61	123.7	98.1	147.1

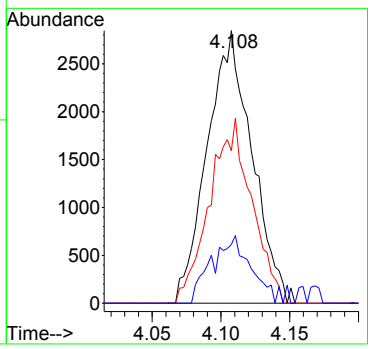


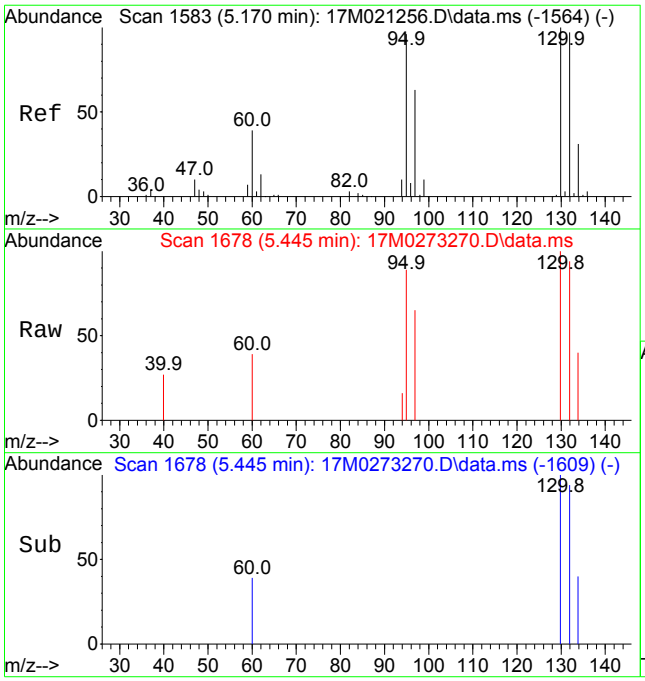


#27
Chloroform
Concen: 0.9559 ug/L
RT: 4.108 min Scan# 1216
Delta R.T. -0.002 min
Lab File: 17M0273270.D
Acq: 02 May 2017 21:50

Tgt Ion: 83 Resp: 6432

Ion	Ratio	Lower	Upper
83	100		
85	63.6	39.2	91.4
47	22.5	12.9	30.1

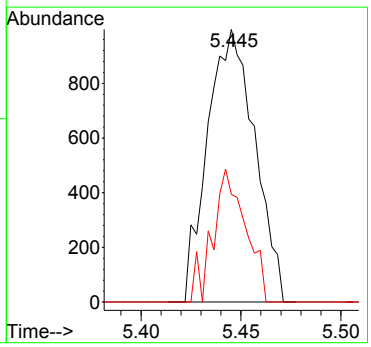




#37
Trichloroethene
Concen: 0.3754 ug/L
RT: 5.445 min Scan# 1678
Delta R.T. 0.000 min
Lab File: 17M0273270.D
Acq: 02 May 2017 21:50

Tgt Ion:130 Resp: 1641

Ion	Ratio	Lower	Upper
130	100		
60	33.9	22.9	53.3



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273271.D Vial: 11
Acq On : 02 May 2017 22:09 Operator: ADC
Sample : L17041203-43 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:15 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

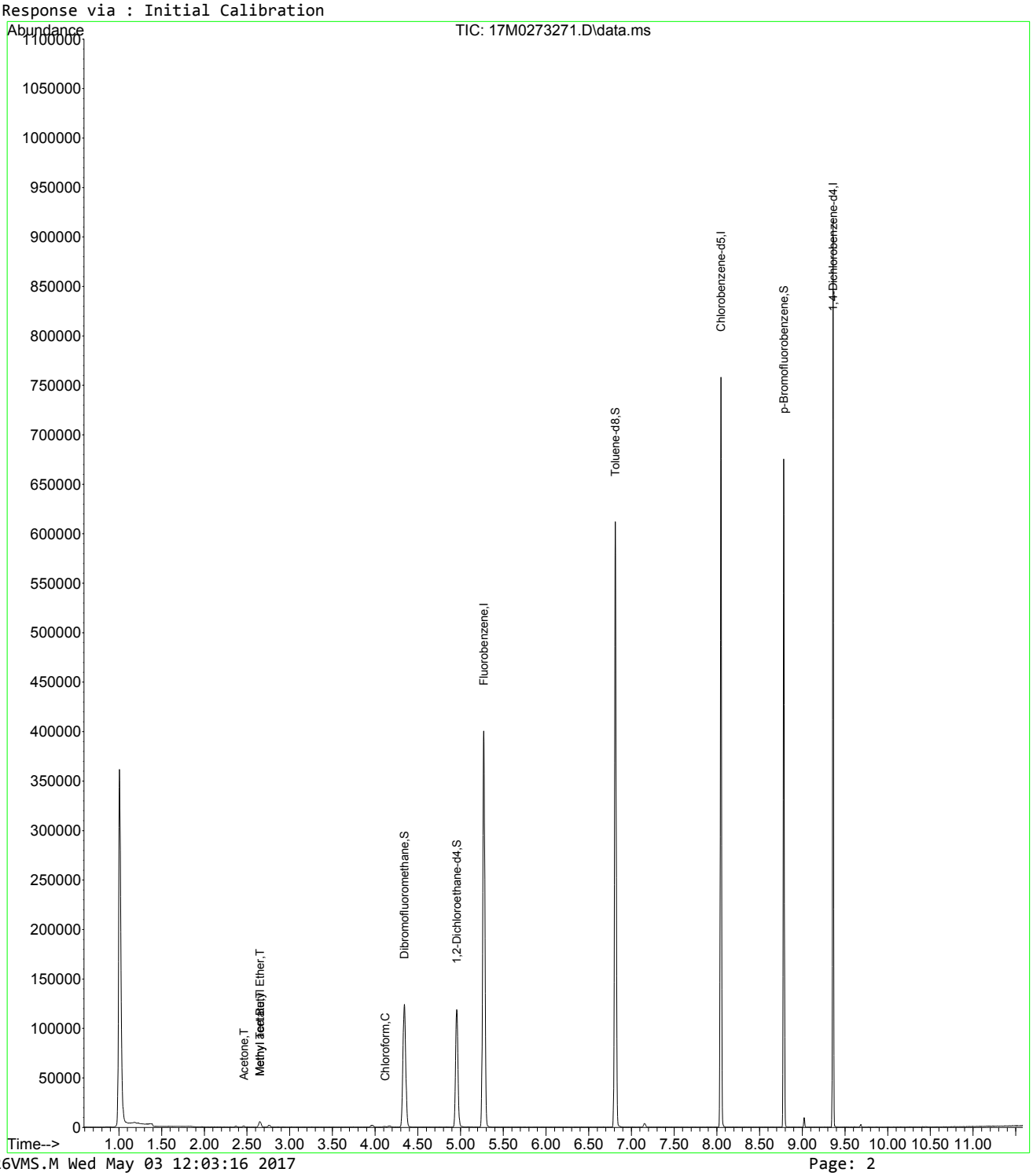
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	340985	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252338	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	119345	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	89601	24.3311	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.324%			
34) 1,2-Dichloroethane-d4	4.953	65	86992	25.2024	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.810%			
47) Toluene-d8	6.812	98	323125	25.6585	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.634%			
66) p-Bromofluorobenzene	8.784	95	108901	27.2525	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.010%			
Target Compounds						Qvalue
16) Acetone	2.463	43	1248	1.8203	ug/L	81
18) Methyl acetate	2.651	43	1182	0.6576	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	5852	0.6430	ug/L	99
27) Chloroform	4.116	83	923	0.1374	ug/L #	76

(#) = qualifier out of range (m) = manual integration (+) = signals summed

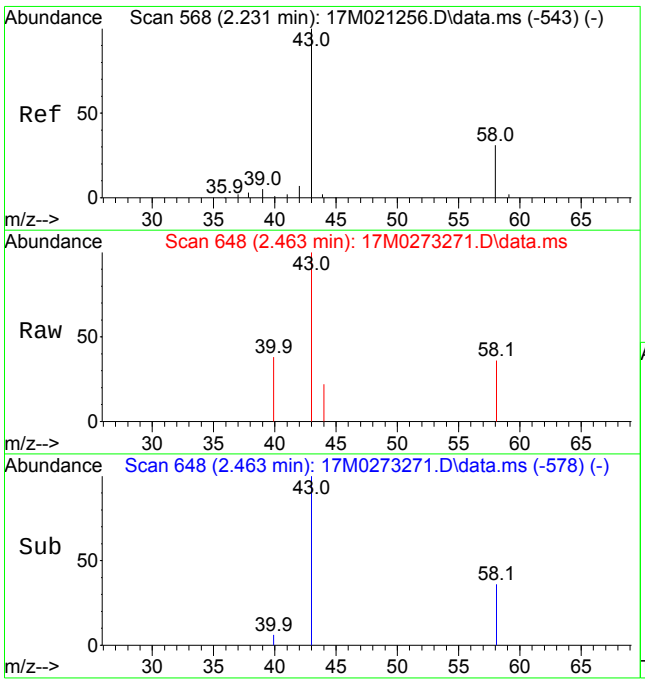
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273271.D Vial: 11
Acq On : 02 May 2017 22:09 Operator: ADC
Sample : L17041203-43 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:15 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



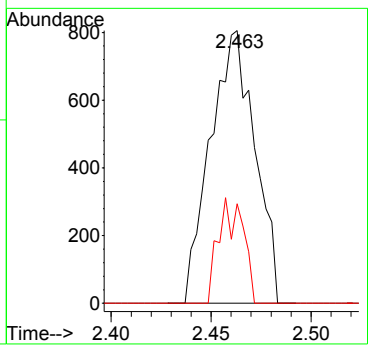
826VMS.M Wed May 03 12:03:16 2017 Page: 2

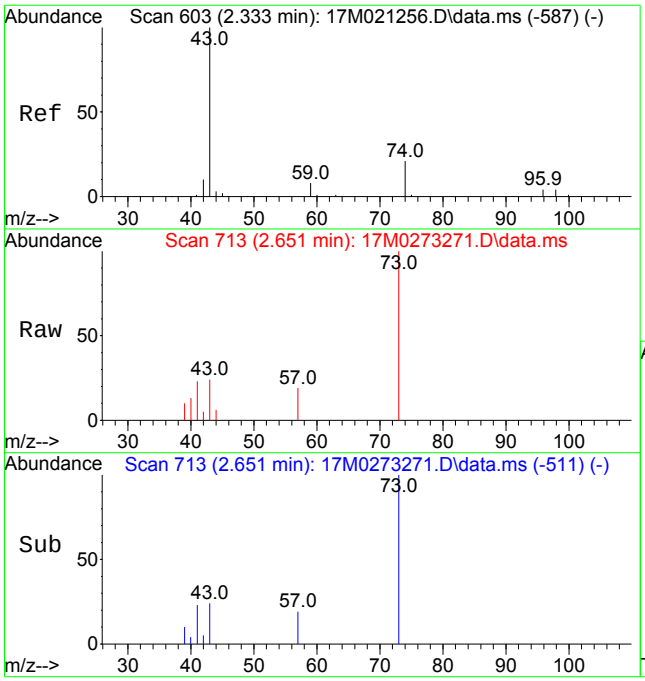


#16
Acetone
Concen: 1.8203 ug/L
RT: 2.463 min Scan# 648
Delta R.T. 0.003 min
Lab File: 17M0273271.D
Acq: 02 May 2017 22:09

Tgt Ion: 43 Resp: 1248

Ion	Ratio	Lower	Upper
43	100		
58	21.4	19.4	45.2

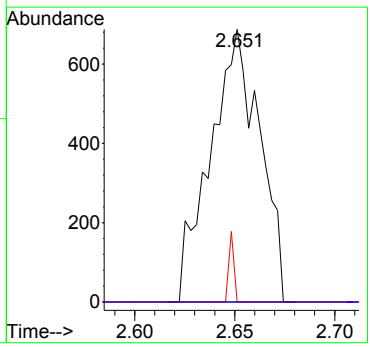


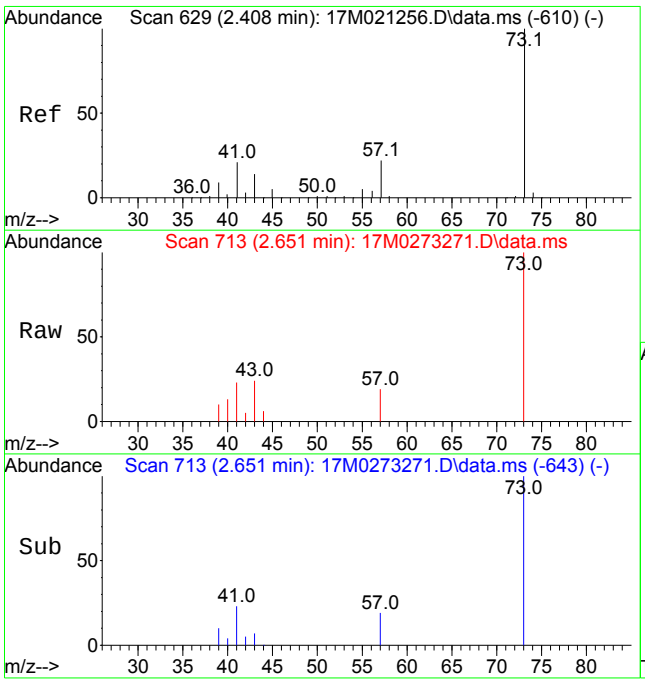


#18
Methyl acetate
Concen: 0.6576 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.084 min
Lab File: 17M0273271.D
Acq: 02 May 2017 22:09

Tgt Ion: 43 Resp: 1182

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

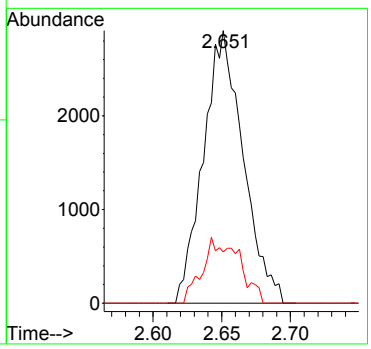


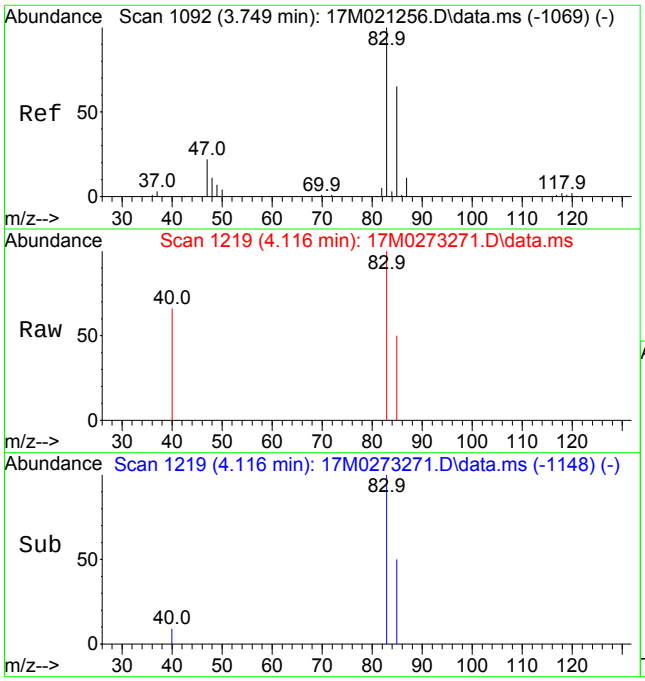


#19
Methyl Tert Butyl Ether
Concen: 0.6430 ug/L
RT: 2.651 min Scan# 713
Delta R.T. 0.003 min
Lab File: 17M0273271.D
Acq: 02 May 2017 22:09

Tgt Ion: 73 Resp: 5852

Ion	Ratio	Lower	Upper
73	100		
57	22.3	17.6	26.4

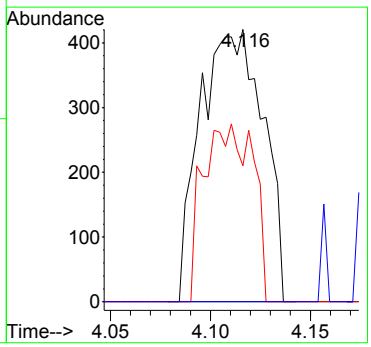




#27
Chloroform
Concen: 0.1374 ug/L
RT: 4.116 min Scan# 1219
Delta R.T. 0.006 min
Lab File: 17M0273271.D
Acq: 02 May 2017 22:09

Tgt Ion: 83 Resp: 923

Ion	Ratio	Lower	Upper
83	100		
85	51.7	39.2	91.4
47	0.0	12.9	30.1#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273272.D Vial: 12
Acq On : 02 May 2017 22:29 Operator: ADC
Sample : L17041203-44 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:18 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

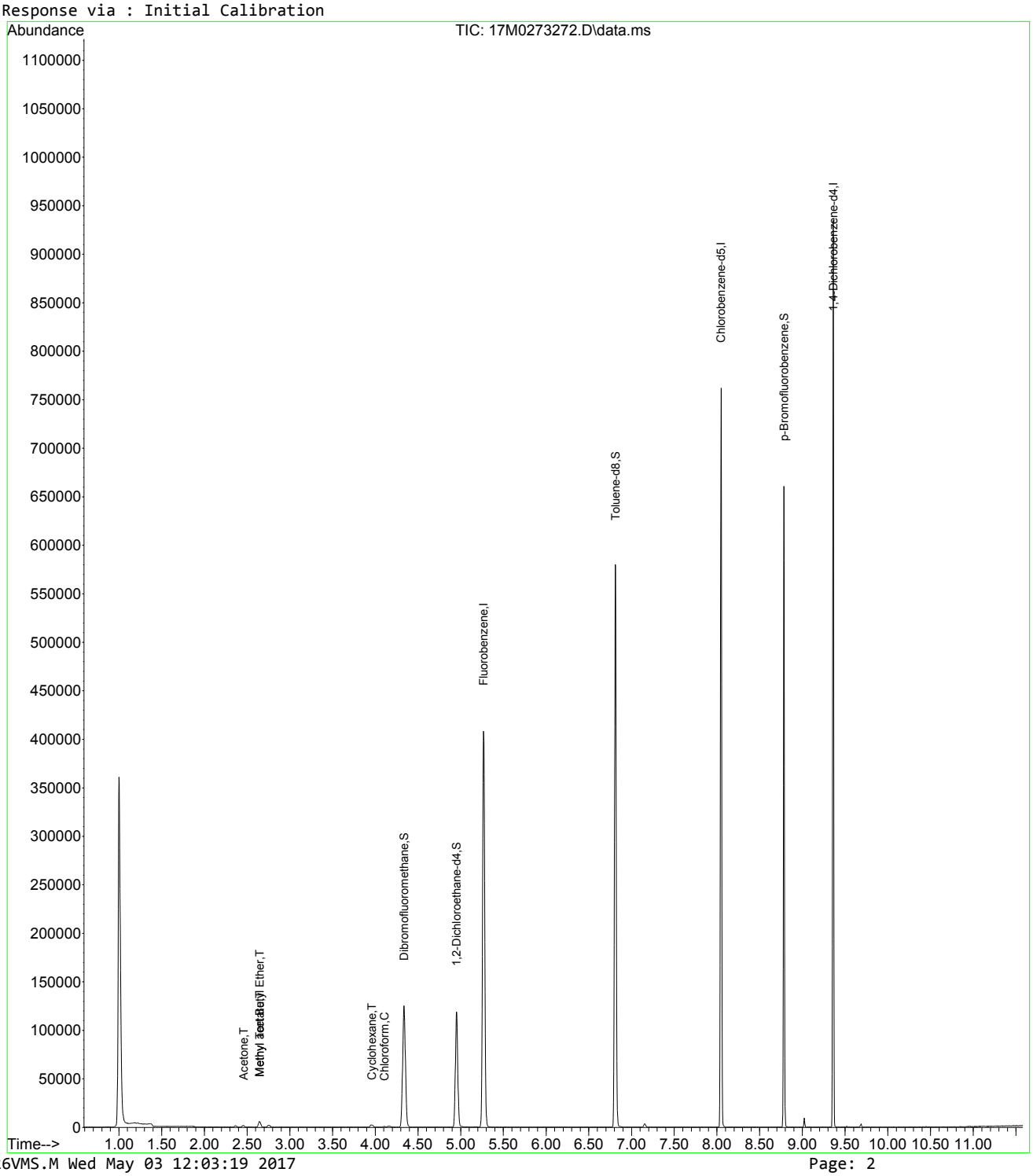
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	346649	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	254277	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	120326	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	89104	23.8008	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.203%			
34) 1,2-Dichloroethane-d4	4.950	65	86170	24.5563	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.225%			
47) Toluene-d8	6.812	98	318106	25.0673	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.269%			
66) p-Bromofluorobenzene	8.783	95	104126	25.8452	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.381%			
Target Compounds						Qvalue
16) Acetone	2.460	43	2230	3.1995	ug/L	90
18) Methyl acetate	2.648	43	1104	0.6042	ug/L #	56
19) Methyl Tert Butyl Ether	2.648	73	5920	0.6398	ug/L	100
25) Cyclohexane	3.960	56	1561	0.2803	ug/L #	82
27) Chloroform	4.107	83	826	0.1210	ug/L #	82

(#) = qualifier out of range (m) = manual integration (+) = signals summed

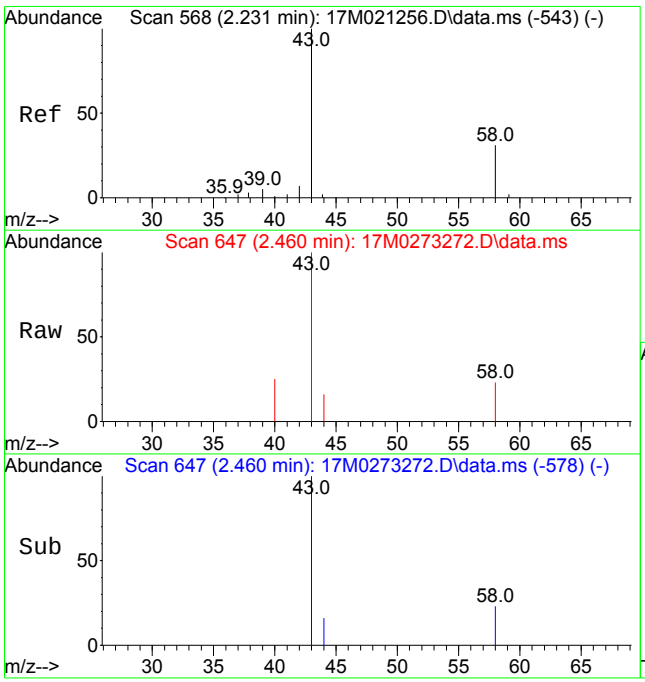
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273272.D Vial: 12
Acq On : 02 May 2017 22:29 Operator: ADC
Sample : L17041203-44 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:18 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



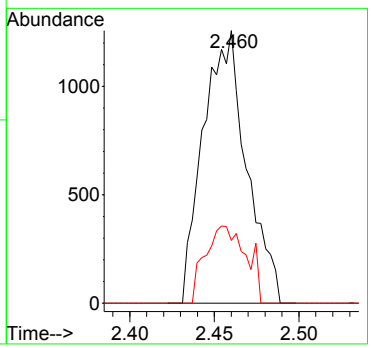
826VMS.M Wed May 03 12:03:19 2017 Page: 2

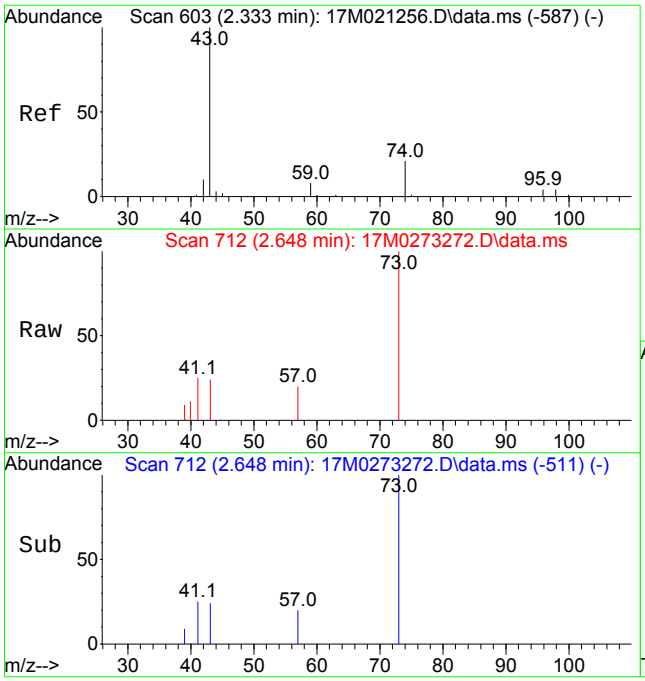


#16
Acetone
Concen: 3.1995 ug/L
RT: 2.460 min Scan# 647
Delta R.T. 0.000 min
Lab File: 17M0273272.D
Acq: 02 May 2017 22:29

Tgt Ion: 43 Resp: 2230

Ion	Ratio	Lower	Upper
43	100		
58	26.7	19.4	45.2

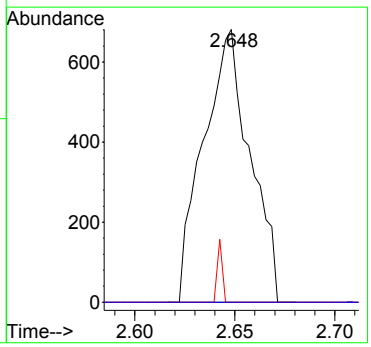


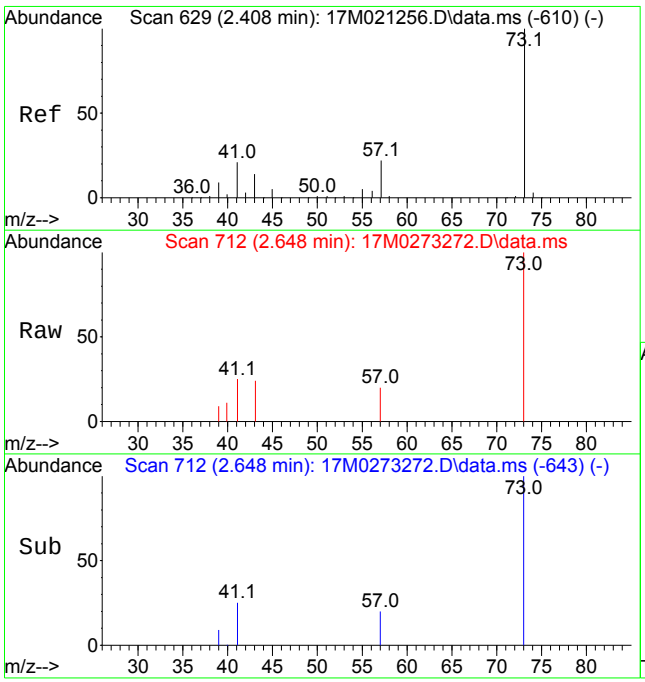


#18
Methyl acetate
Concen: 0.6042 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.081 min
Lab File: 17M0273272.D
Acq: 02 May 2017 22:29

Tgt Ion: 43 Resp: 1104

Ion	Ratio	Lower	Upper
43	100		
74	0.0	25.4	25.4#
59	0.0	7.6	11.4#

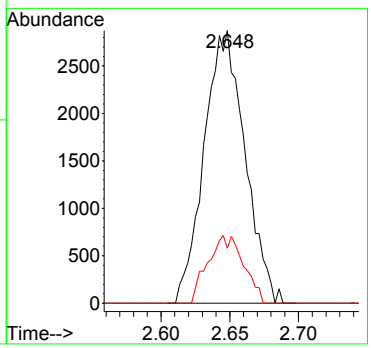


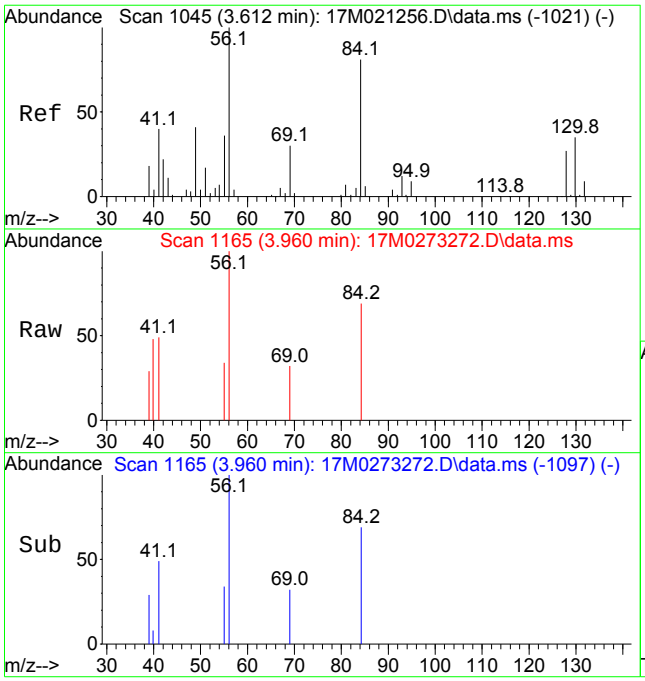


#19
Methyl Tert Butyl Ether
Concen: 0.6398 ug/L
RT: 2.648 min Scan# 712
Delta R.T. 0.000 min
Lab File: 17M0273272.D
Acq: 02 May 2017 22:29

Tgt Ion: 73 Resp: 5920

Ion	Ratio	Lower	Upper
73	100		
57	21.8	17.6	26.4

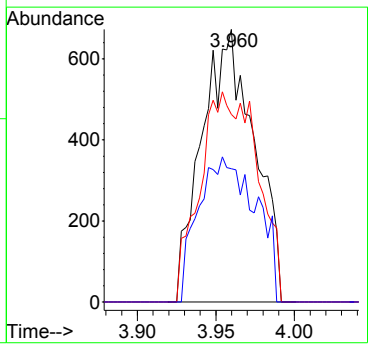


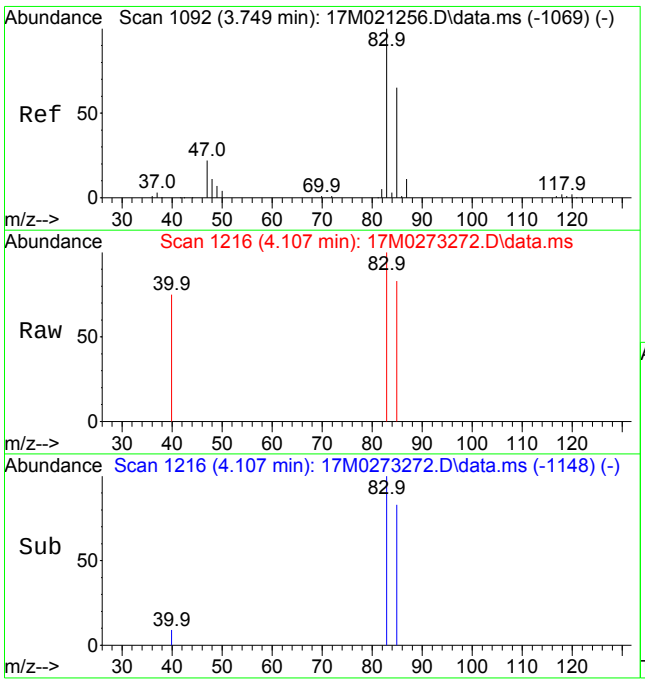


#25
Cyclohexane
Concen: 0.2803 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273272.D
Acq: 02 May 2017 22:29

Tgt Ion: 56 Resp: 1561

Ion	Ratio	Lower	Upper
56	100		
84	85.1	69.4	104.0
41	58.4	72.2	108.2#

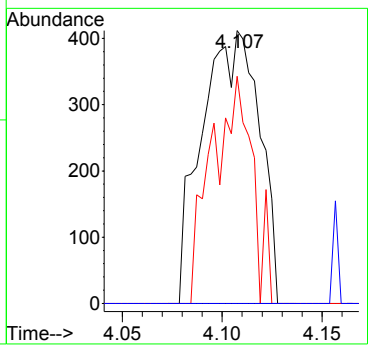




#27
Chloroform
Concen: 0.1210 ug/L
RT: 4.107 min Scan# 1216
Delta R.T. -0.003 min
Lab File: 17M0273272.D
Acq: 02 May 2017 22:29

Tgt Ion: 83 Resp: 826

Ion	Ratio	Lower	Upper
83	100		
85	58.7	39.2	91.4
47	0.0	12.9	30.1#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273273.D Vial: 13
Acq On : 02 May 2017 22:48 Operator: ADC
Sample : L17041203-45 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

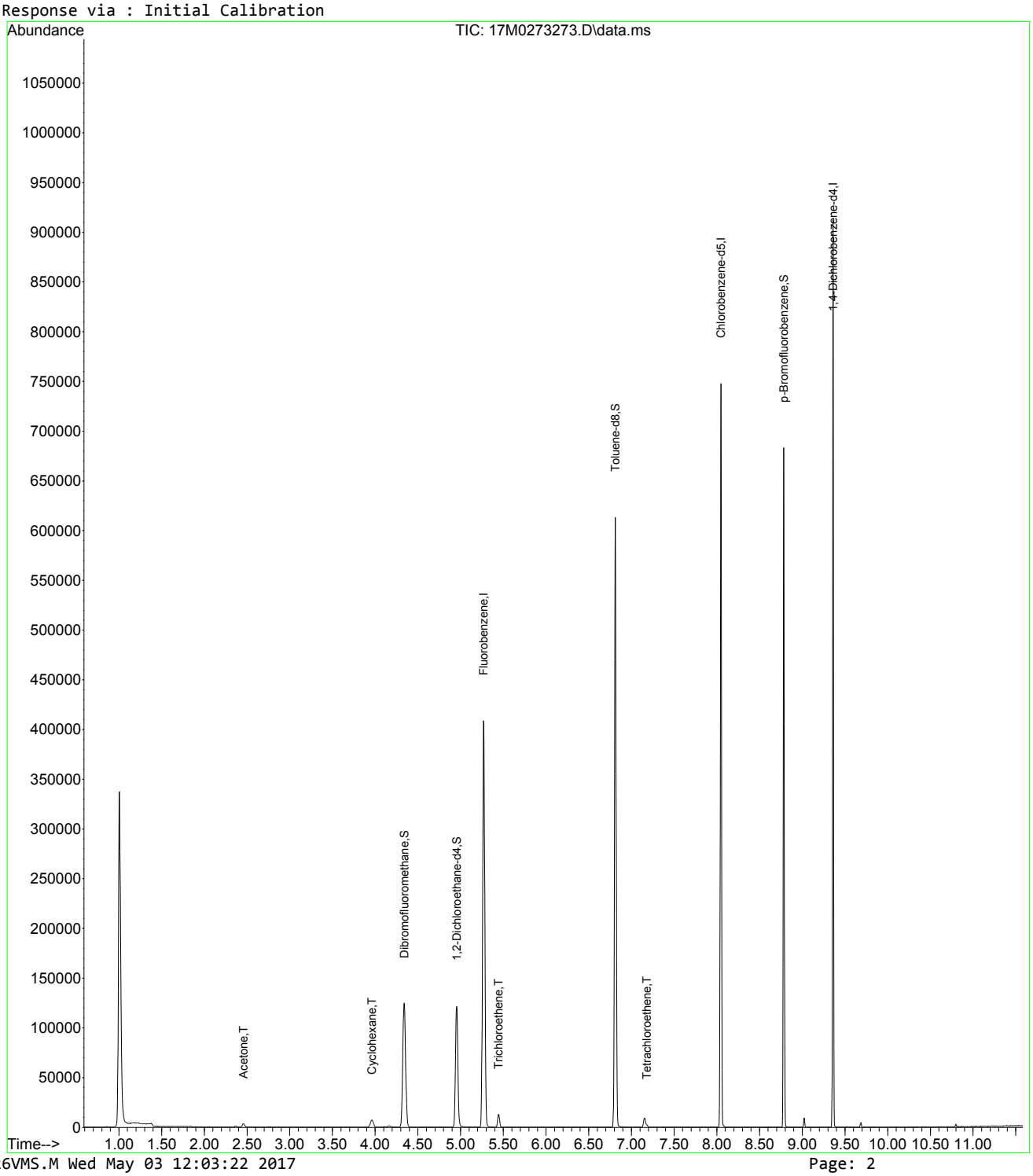
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.268	96	350518	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	256220	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	120752	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	90722	23.9655	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 95.862%			
34) 1,2-Dichloroethane-d4	4.953	65	87741	24.7280	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.912%			
47) Toluene-d8	6.812	98	325208	25.4326	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.730%			
66) p-Bromofluorobenzene	8.783	95	107070	26.4821	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.928%			
Target Compounds						Qvalue
16) Acetone	2.457	43	4464	6.3340	ug/L	97
25) Cyclohexane	3.960	56	4433	0.7871	ug/L #	84
37) Trichloroethene	5.442	130	4286	0.9557	ug/L	100
49) Tetrachloroethene	7.179	166	582	0.1270	ug/L #	77

(#) = qualifier out of range (m) = manual integration (+) = signals summed

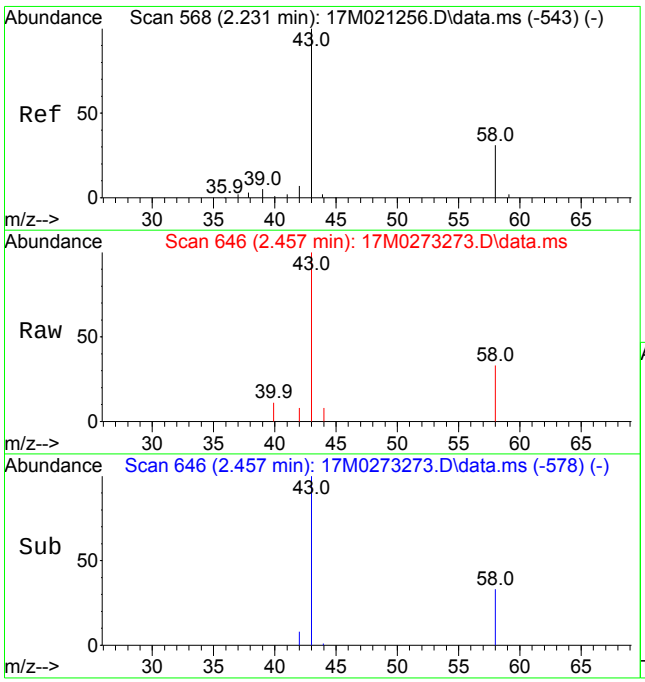
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273273.D Vial: 13
Acq On : 02 May 2017 22:48 Operator: ADC
Sample : L17041203-45 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:21 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



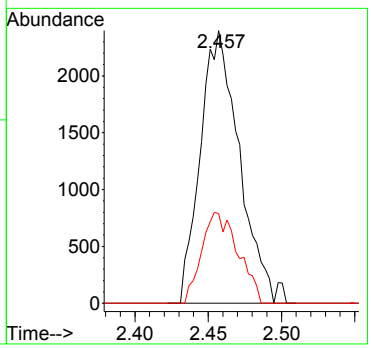
826VMS.M Wed May 03 12:03:22 2017 Page: 2

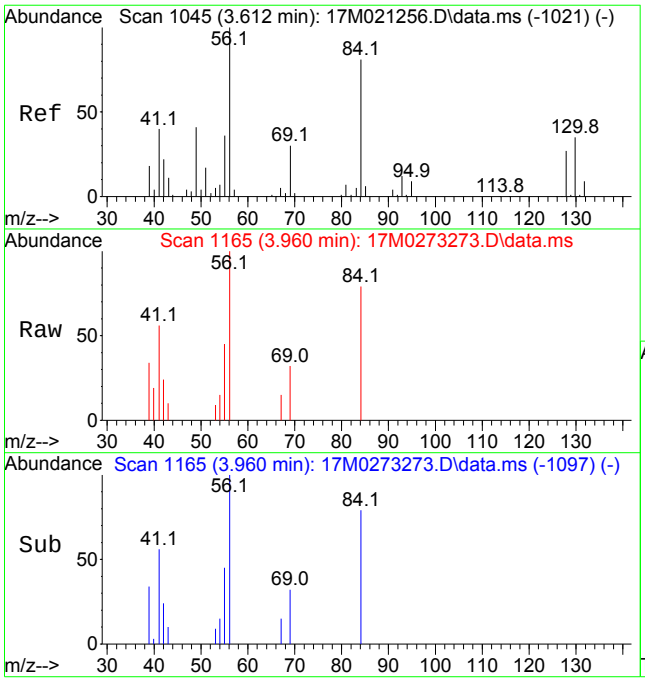


#16
Acetone
Concen: 6.3340 ug/L
RT: 2.457 min Scan# 646
Delta R.T. -0.003 min
Lab File: 17M0273273.D
Acq: 02 May 2017 22:48

Tgt Ion: 43 Resp: 4464

Ion	Ratio	Lower	Upper
43	100		
58	30.9	19.4	45.2

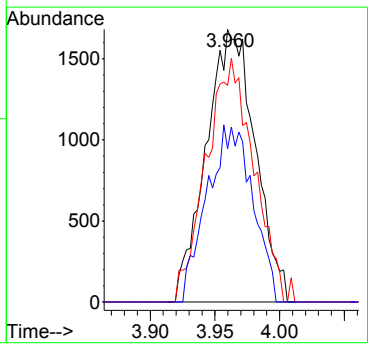


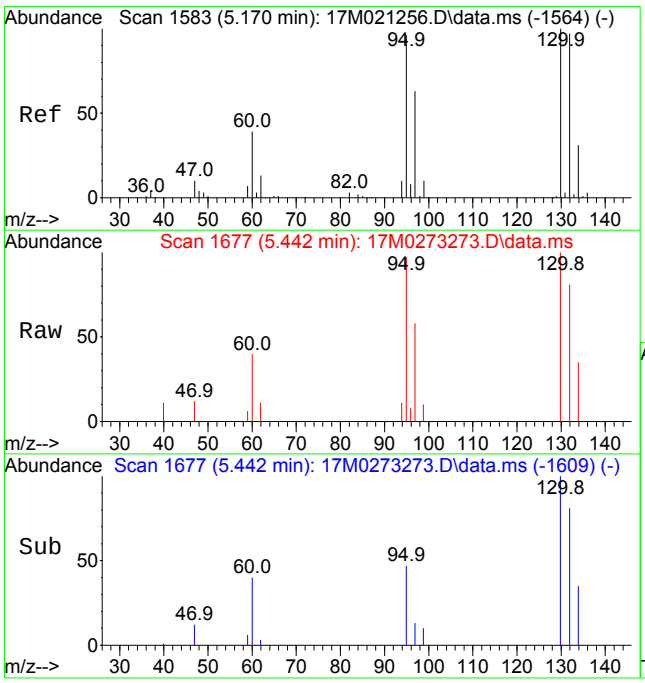


#25
Cyclohexane
Concen: 0.7871 ug/L
RT: 3.960 min Scan# 1165
Delta R.T. -0.003 min
Lab File: 17M0273273.D
Acq: 02 May 2017 22:48

Tgt Ion: 56 Resp: 4433

Ion	Ratio	Lower	Upper
56	100		
84	86.8	69.4	104.0
41	60.2	72.2	108.2#

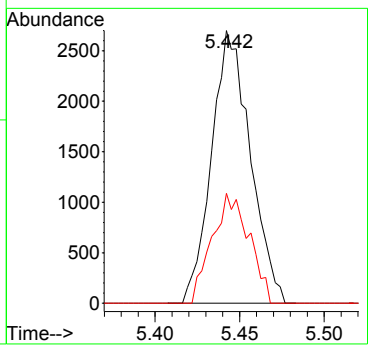


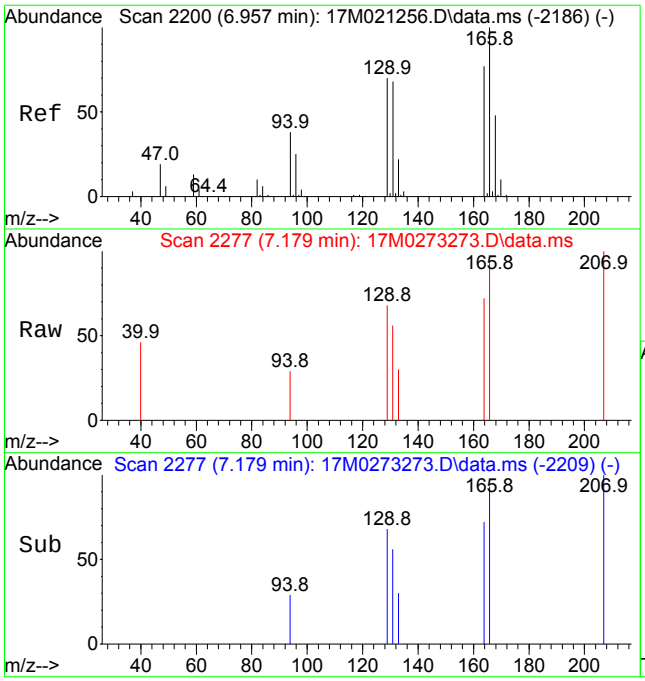


#37
Trichloroethene
Concen: 0.9557 ug/L
RT: 5.442 min Scan# 1677
Delta R.T. -0.003 min
Lab File: 17M0273273.D
Acq: 02 May 2017 22:48

Tgt Ion:130 Resp: 4286

Ion	Ratio	Lower	Upper
130	100		
60	38.3	22.9	53.3

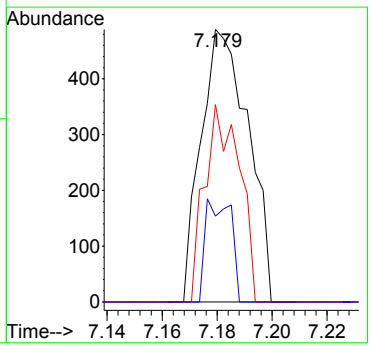




#49
Tetrachloroethene
Concen: 0.1270 ug/L
RT: 7.179 min Scan# 2277
Delta R.T. -0.003 min
Lab File: 17M0273273.D
Acq: 02 May 2017 22:48

Tgt Ion:166 Resp: 582

Ion	Ratio	Lower	Upper
166	100		
129	53.3	56.2	84.4#
94	20.3	29.7	44.5#



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17942.D Vial: 9
Acq On : 1 May 2017 19:46 Operator: JDS
Sample : L17041203-46 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 02 13:28:07 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

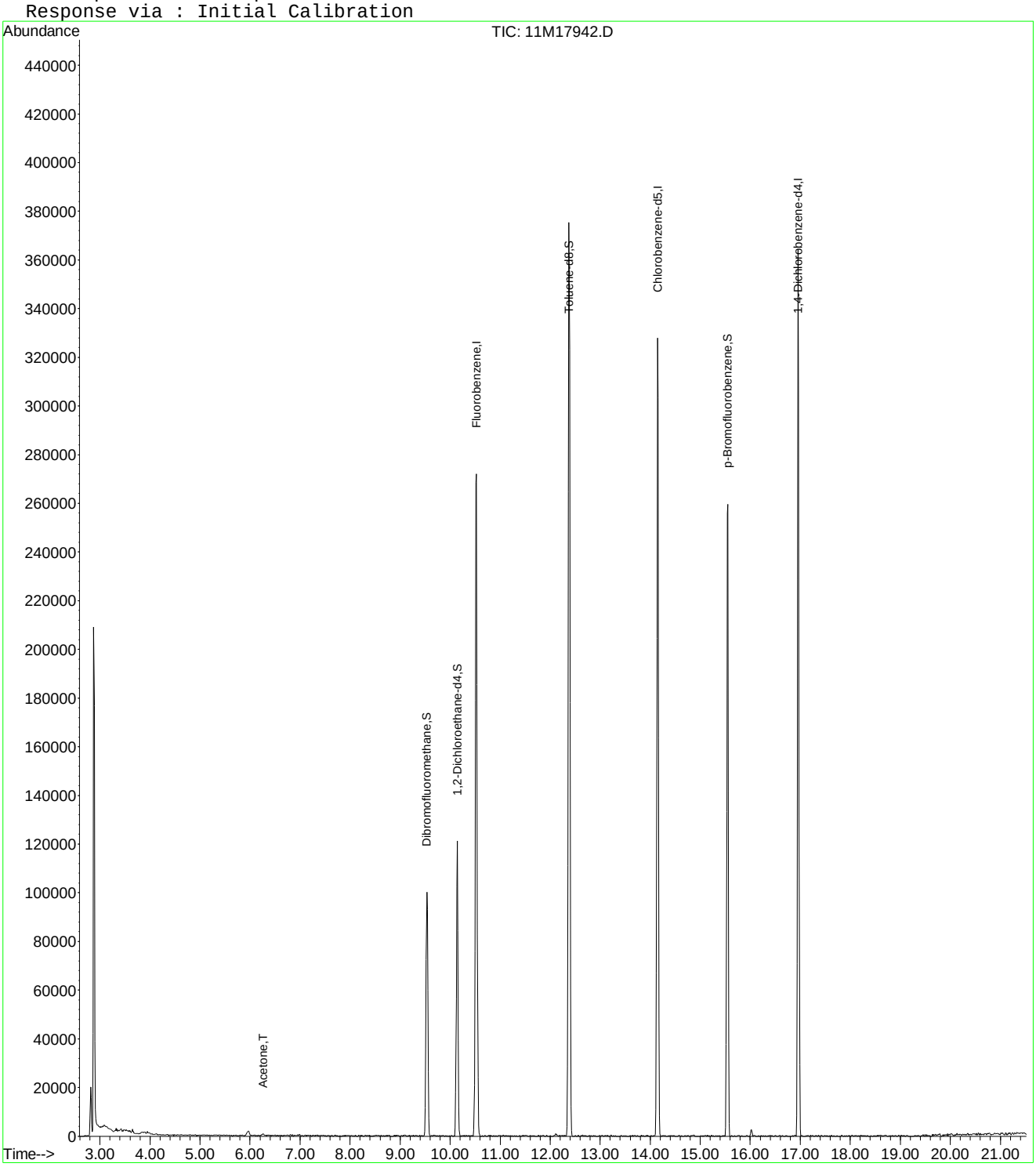
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	327451	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	232461	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	123991	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	81442	25.1095	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.44%			
43) 1,2-Dichloroethane-d4	10.14	65	96237	25.5680	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.28%			
57) Toluene-d8	12.38	98	322063	26.6819	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.72%			
78) p-Bromofluorobenzene	15.54	95	112681	26.1465	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.60%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	324	Below Cal	#	55
13) Acetone	6.26	43	1549	1.4148	ug/L #	41

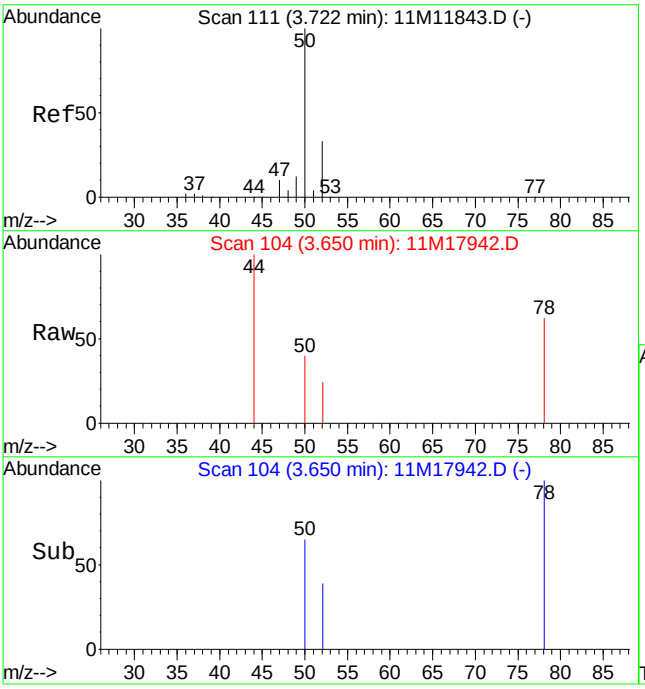
(#) = qualifier out of range (m) = manual integration
11M17942.D 8260WT.M Tue May 02 13:28:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17942.D Vial: 9
Acq On : 1 May 2017 19:46 Operator: JDS
Sample : L17041203-46 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 2 13:28 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

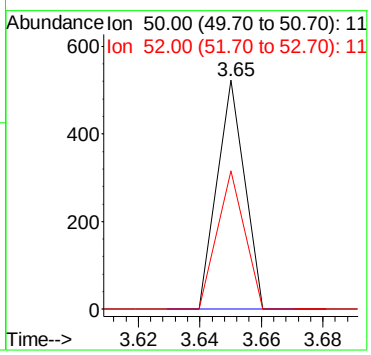


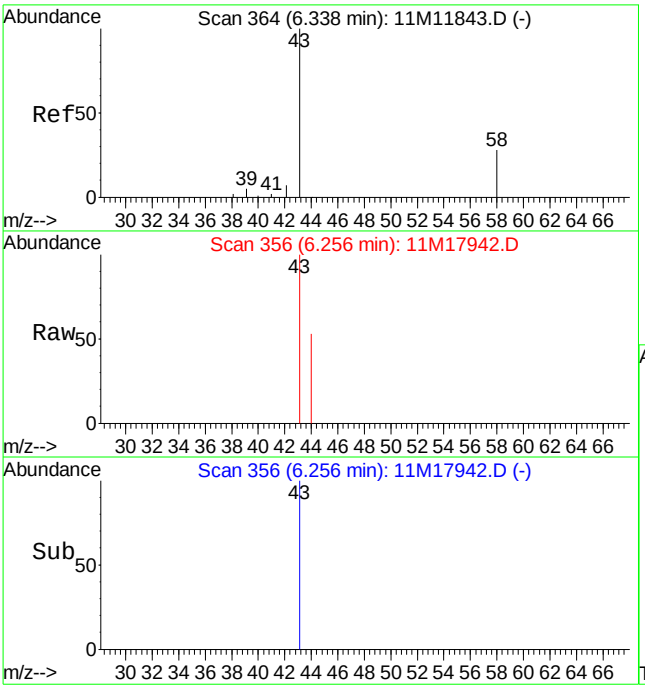


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17942.D
Acq: 1 May 2017 19:46

Tgt Ion: 50 Resp: 324

Ion	Ratio	Lower	Upper
50	100		
52	60.5	20.8	48.6#

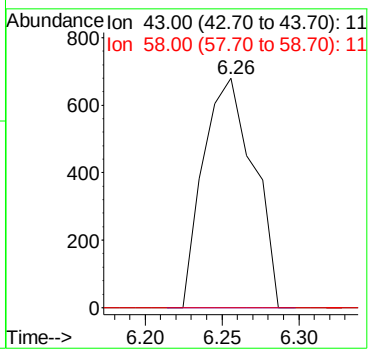




#13
Acetone
Concen: 1.41 ug/L
RT: 6.26 min Scan# 356
Delta R.T. 0.00 min
Lab File: 11M17942.D
Acq: 1 May 2017 19:46

Tgt Ion: 43 Resp: 1549

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273268.D Vial: 8
Acq On : 02 May 2017 21:11 Operator: ADC
Sample : L17041203-47 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

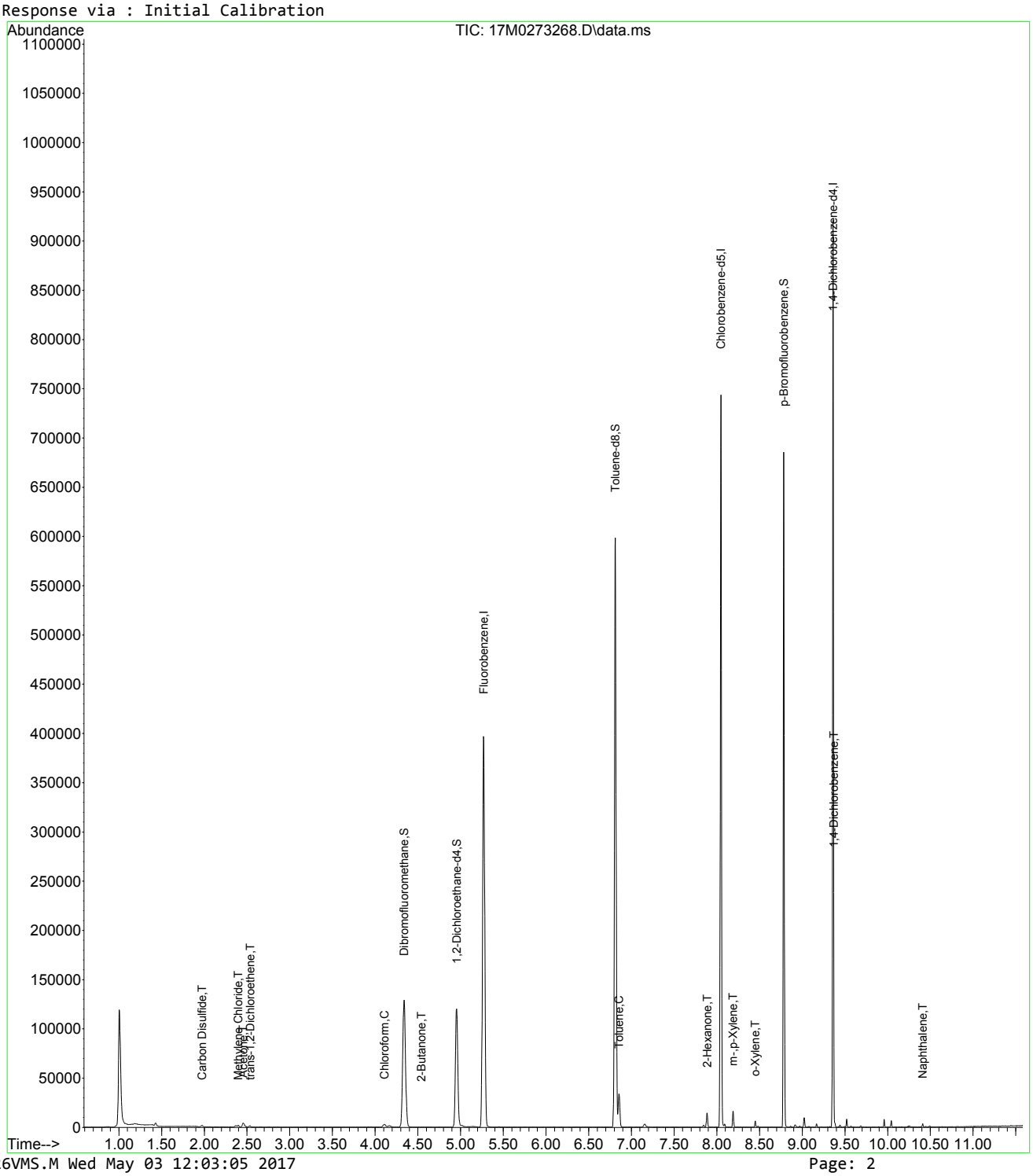
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
Internal Standards					
1) Fluorobenzene	5.271	96	339756	25.00000 ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252409	25.00000 ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	122419	25.00000 ug/L	0.0000
System Monitoring Compounds					
29) Dibromofluoromethane	4.336	111	89722	24.4521 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.808%		
34) 1,2-Dichloroethane-d4	4.953	65	87439	25.4235 ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.694%		
47) Toluene-d8	6.812	98	320976	25.4807 ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.923%		
66) p-Bromofluorobenzene	8.783	95	109211	26.6438 ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.575%		
Target Compounds					Qvalue
11) Carbon Disulfide	1.971	76	1742	0.1547 ug/L #	73
15) Methylene Chloride	2.396	84	620	0.1557 ug/L	95
16) Acetone	2.454	43	5070	7.4217 ug/L	97
17) trans-1,2-Dichloroethene	2.538	96	535	0.1497 ug/L	99
27) Chloroform	4.107	83	3293	0.4921 ug/L #	88
32) 2-Butanone	4.539	43	131	0.1286 ug/L #	37
48) Toluene	6.855	91	19512	1.2330 ug/L	97
54) 2-Hexanone	7.886	43	1552	0.9635 ug/L #	36
59) m-,p-Xylene	8.190	106	2659	0.3986 ug/L	88
60) o-Xylene	8.448	106	1017	0.1547 ug/L	94
79) 1,4-Dichlorobenzene	9.368	146	1488	0.1756 ug/L #	60
85) Naphthalene	10.408	128	1525	0.1287 ug/L	94

(#) = qualifier out of range (m) = manual integration (+) = signals summed

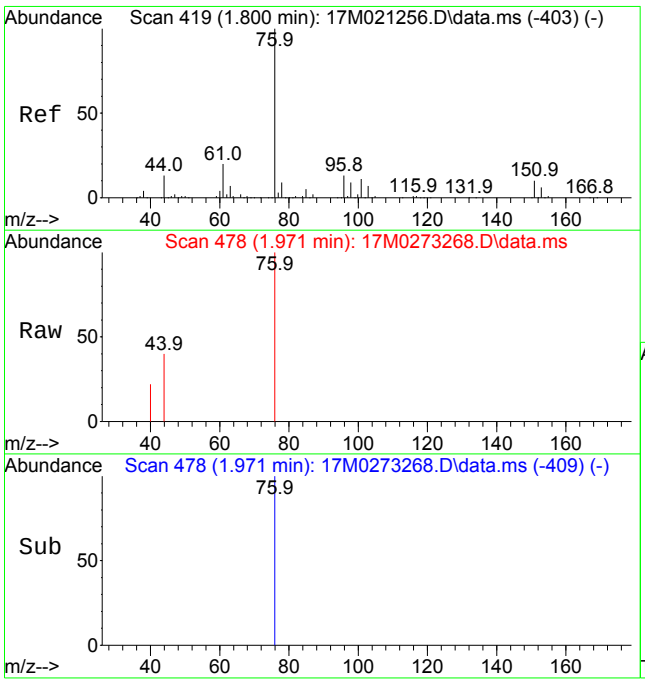
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273268.D Vial: 8
Acq On : 02 May 2017 21:11 Operator: ADC
Sample : L17041203-47 B 826-SPE Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



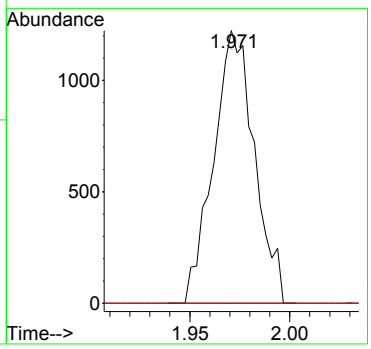
826VMS.M Wed May 03 12:03:05 2017 Page: 2

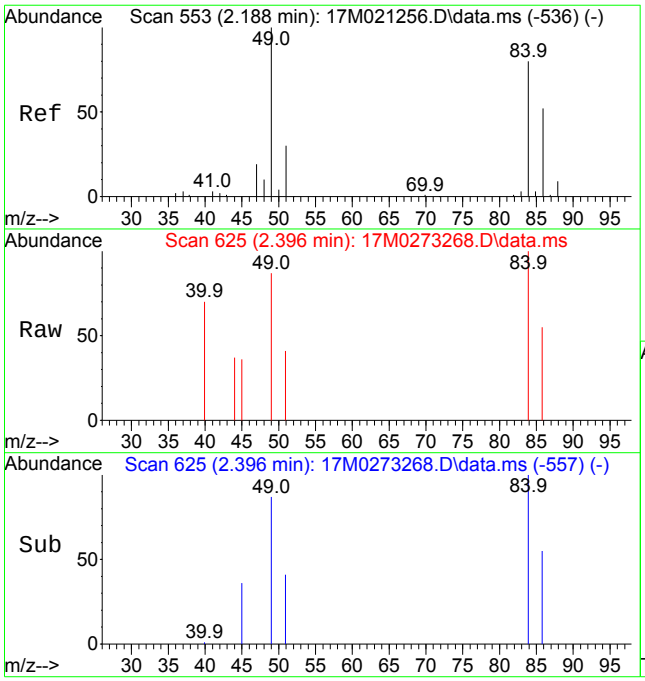


#11
Carbon Disulfide
Concen: 0.1547 ug/L
RT: 1.971 min Scan# 478
Delta R.T. -0.000 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 76 Resp: 1742

Ion	Ratio	Lower	Upper
76	100		
78	0.0	7.8	11.8#

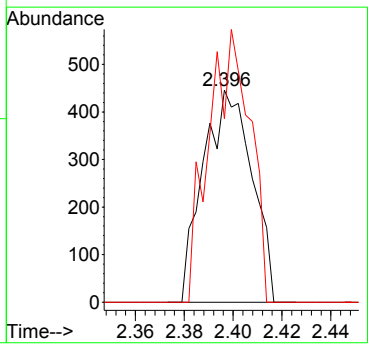


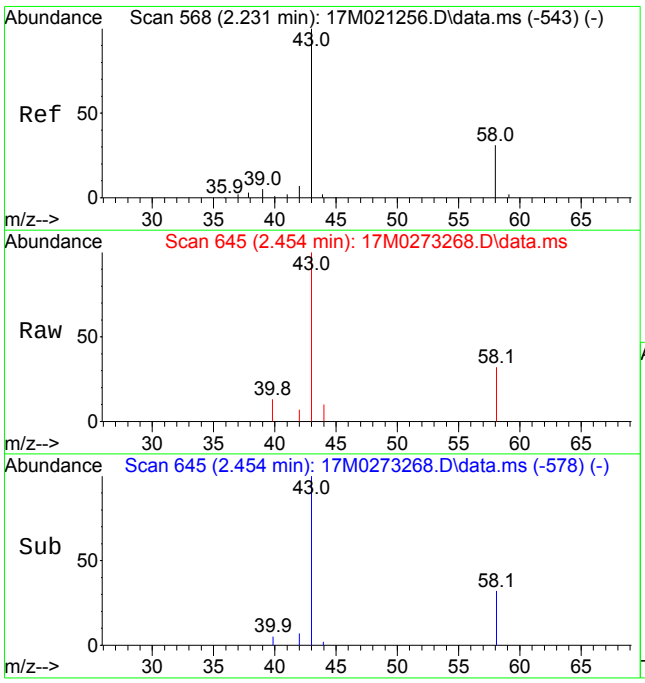


#15
Methylene Chloride
Concen: 0.1557 ug/L
RT: 2.396 min Scan# 625
Delta R.T. -0.003 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 84 Resp: 620

Ion	Ratio	Lower	Upper
84	100		
49	108.7	91.3	136.9

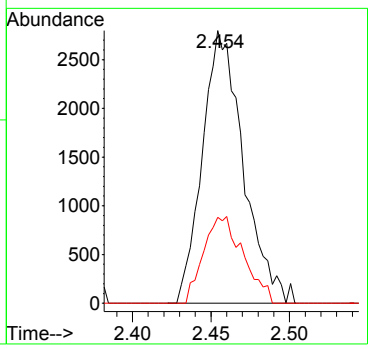


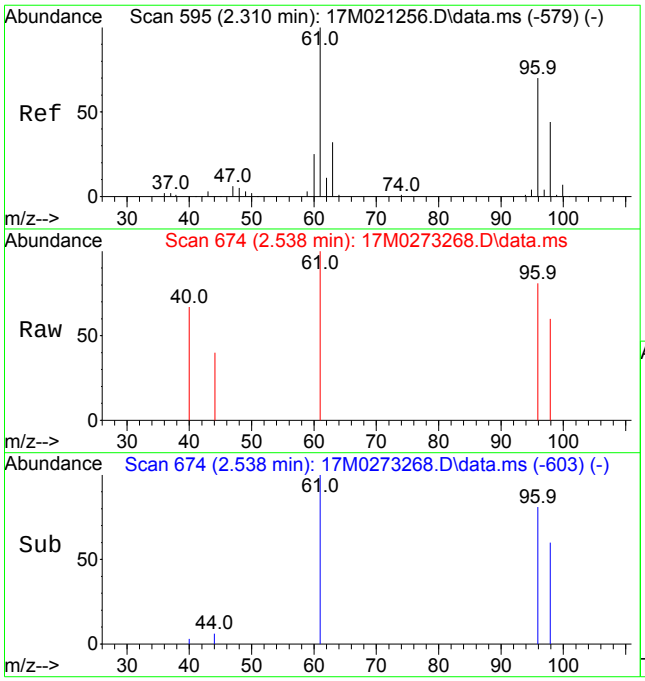


#16
Acetone
Concen: 7.4217 ug/L
RT: 2.454 min Scan# 645
Delta R.T. -0.006 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 43 Resp: 5070

Ion	Ratio	Lower	Upper
43	100		
58	30.9	19.4	45.2

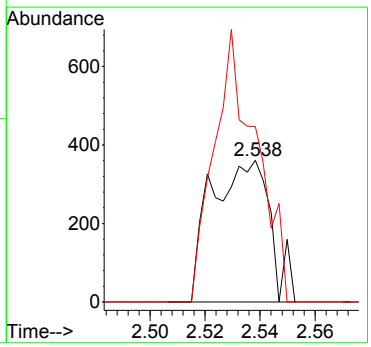


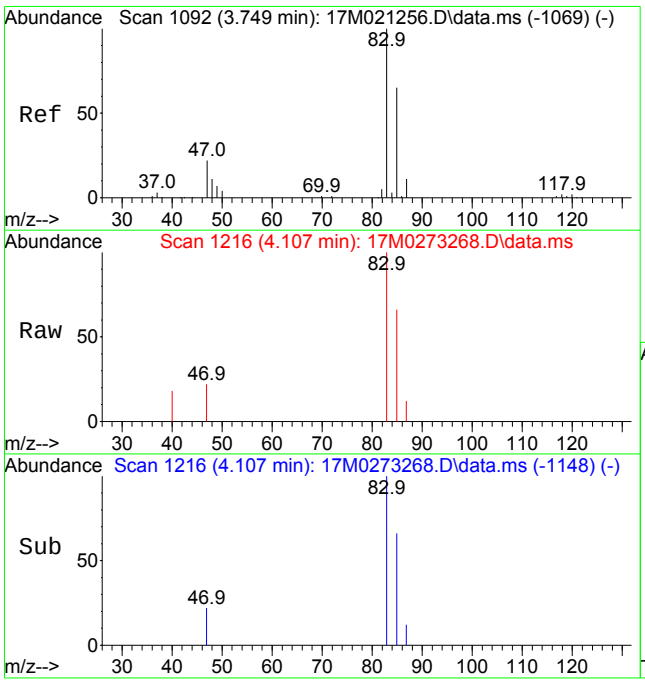


#17
trans-1,2-Dichloroethene
Concen: 0.1497 ug/L
RT: 2.538 min Scan# 674
Delta R.T. 0.006 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 96 Resp: 535

Ion	Ratio	Lower	Upper
96	100		
61	138.3	109.4	164.0

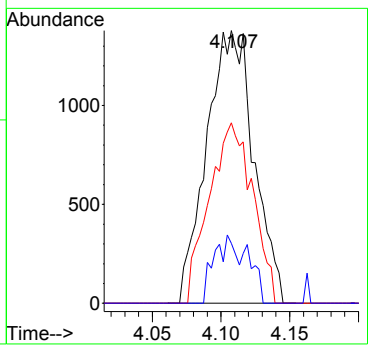


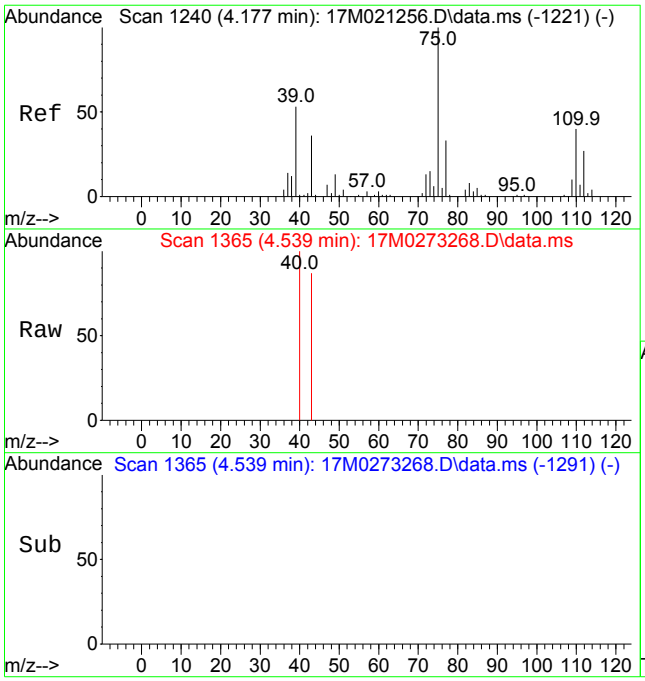


#27
Chloroform
Concen: 0.4921 ug/L
RT: 4.107 min Scan# 1216
Delta R.T. -0.003 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 83 Resp: 3293

Ion	Ratio	Lower	Upper
83	100		
85	60.9	39.2	91.4
47	6.1	12.9	30.1#

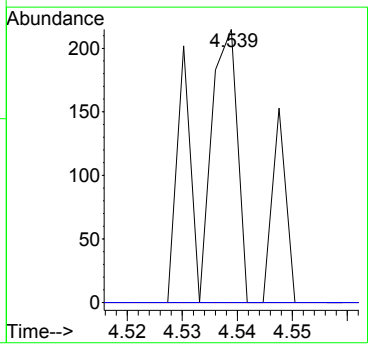


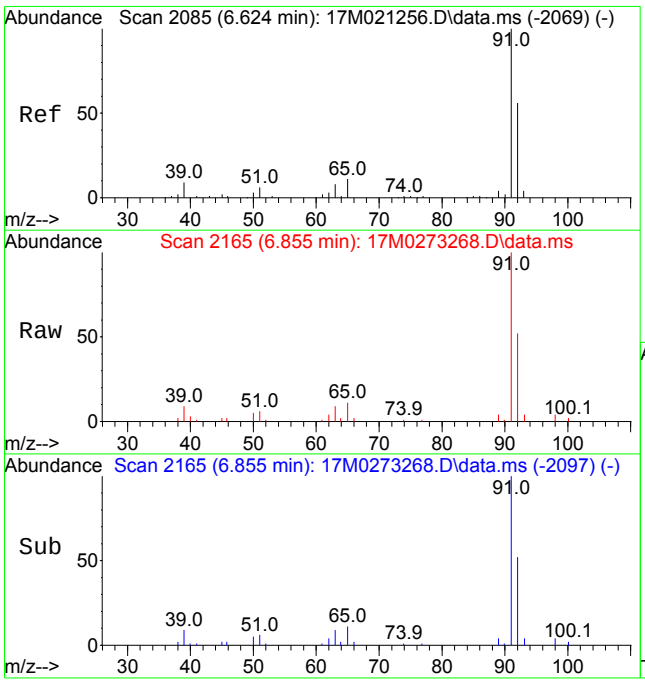


#32
2-Butanone
Concen: 0.1286 ug/L
RT: 4.539 min Scan# 1365
Delta R.T. 0.015 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 43 Resp: 131

Ion	Ratio	Lower	Upper
43	100		
72	0.0	37.3	55.9#
57	0.0	6.9	10.3#

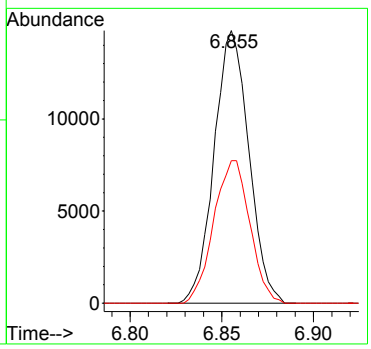


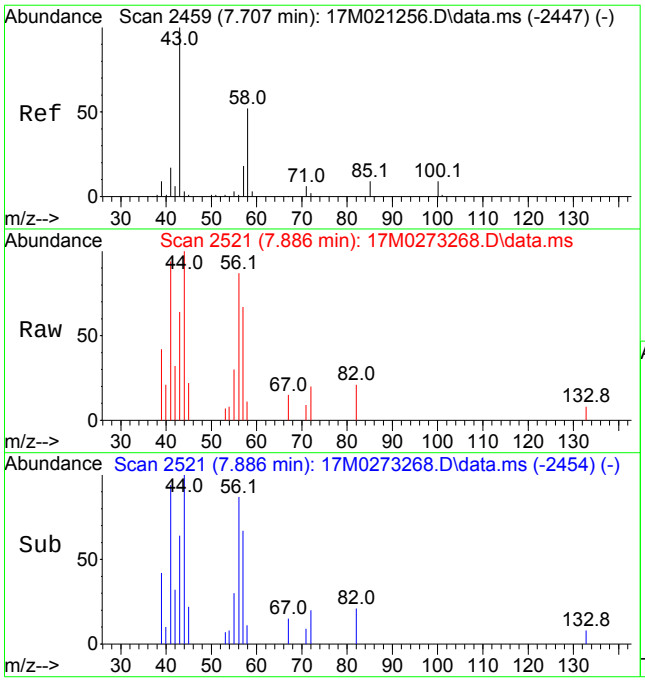


#48
Toluene
Concen: 1.2330 ug/L
RT: 6.855 min Scan# 2165
Delta R.T. -0.003 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 91 Resp: 19512

Ion	Ratio	Lower	Upper
91	100		
92	54.3	33.8	78.8

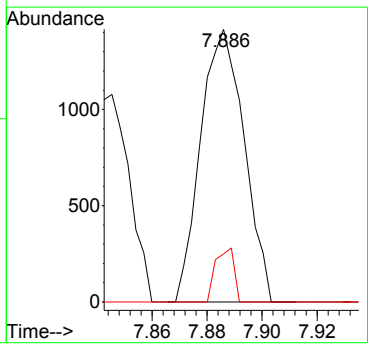


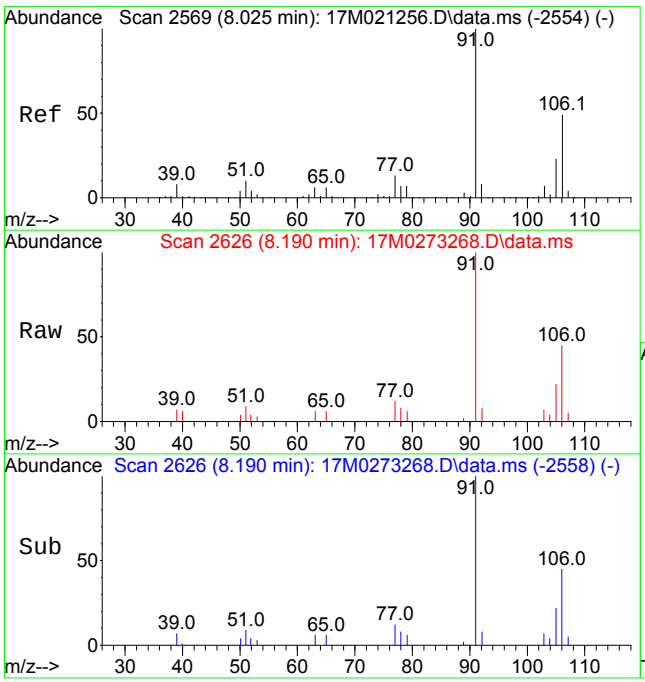


#54
2-Hexanone
Concen: 0.9635 ug/L
RT: 7.886 min Scan# 2521
Delta R.T. -0.006 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion: 43 Resp: 1552

Ion	Ratio	Lower	Upper
43	100		
58	8.4	43.3	64.9#

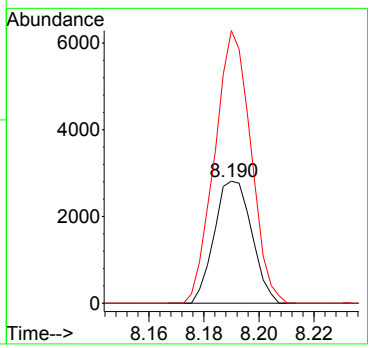


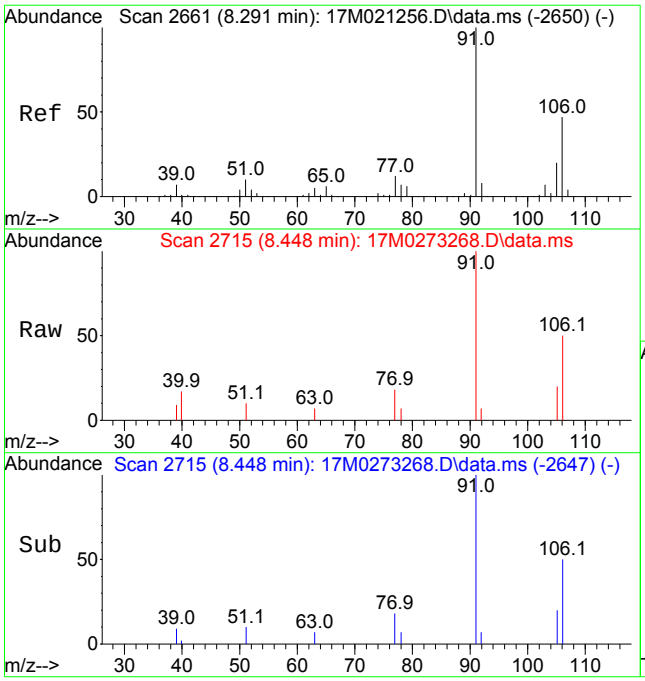


#59
m-,p-Xylene
Concen: 0.3986 ug/L
RT: 8.190 min Scan# 2626
Delta R.T. -0.003 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion:106 Resp: 2659

Ion	Ratio	Lower	Upper
106	100		
91	215.8	118.3	276.1

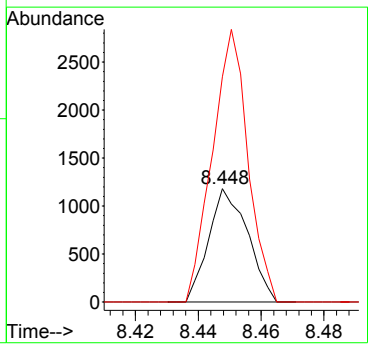


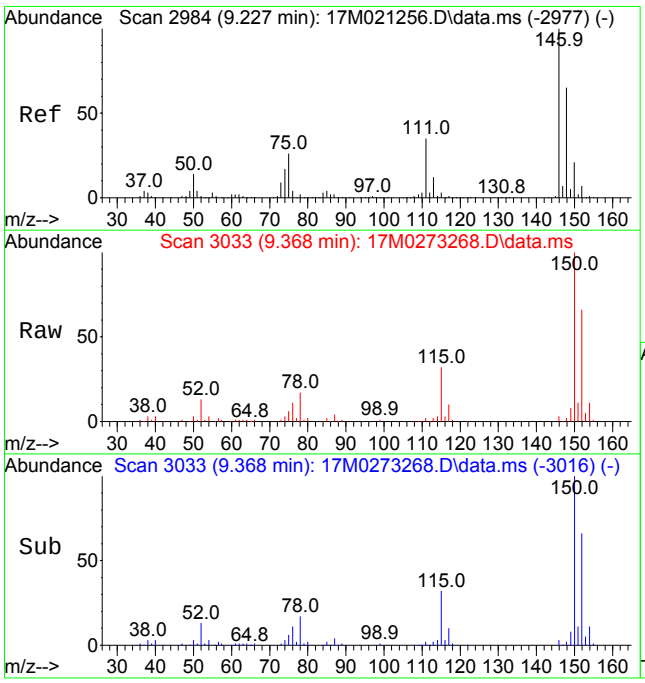


#60
o-Xylene
Concen: 0.1547 ug/L
RT: 8.448 min Scan# 2715
Delta R.T. -0.002 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion:106 Resp: 1017

Ion	Ratio	Lower	Upper
106	100		
91	219.2	125.5	292.9

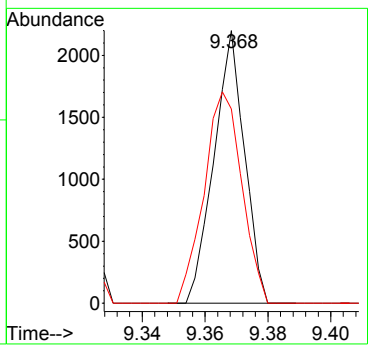


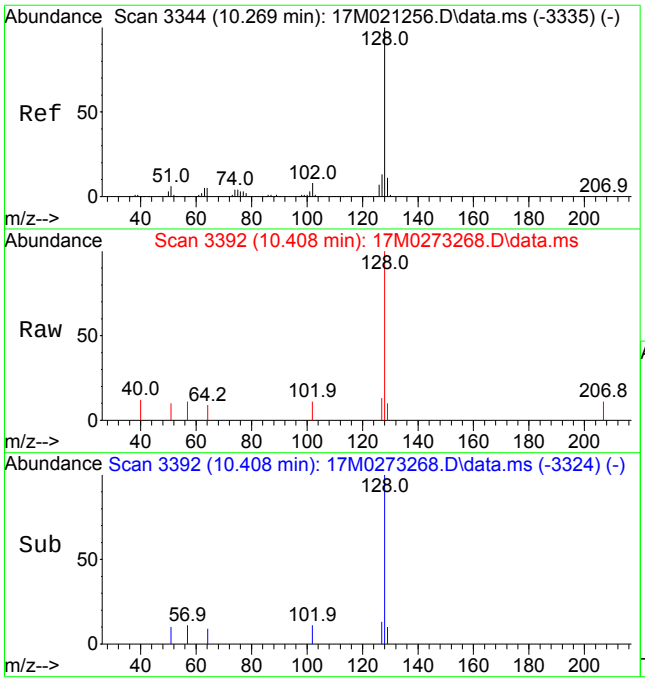


#79
1,4-Dichlorobenzene
Concen: 0.1756 ug/L
RT: 9.368 min Scan# 3033
Delta R.T. 0.000 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion:146 Resp: 1488

Ion	Ratio	Lower	Upper
146	100		
148	96.0	51.7	77.5#

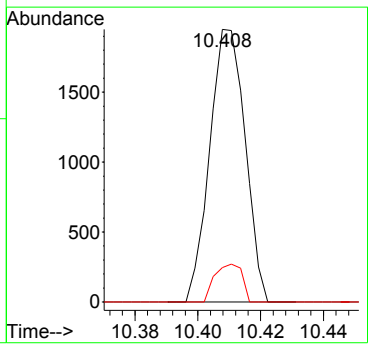




#85
Naphthalene
Concen: 0.1287 ug/L
RT: 10.408 min Scan# 3392
Delta R.T. -0.003 min
Lab File: 17M0273268.D
Acq: 02 May 2017 21:11

Tgt Ion:128 Resp: 1525

Ion	Ratio	Lower	Upper
128	100		
127	10.7	7.8	18.2



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17941.D Vial: 8
Acq On : 1 May 2017 19:17 Operator: JDS
Sample : L17041203-48 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 02 13:28:05 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

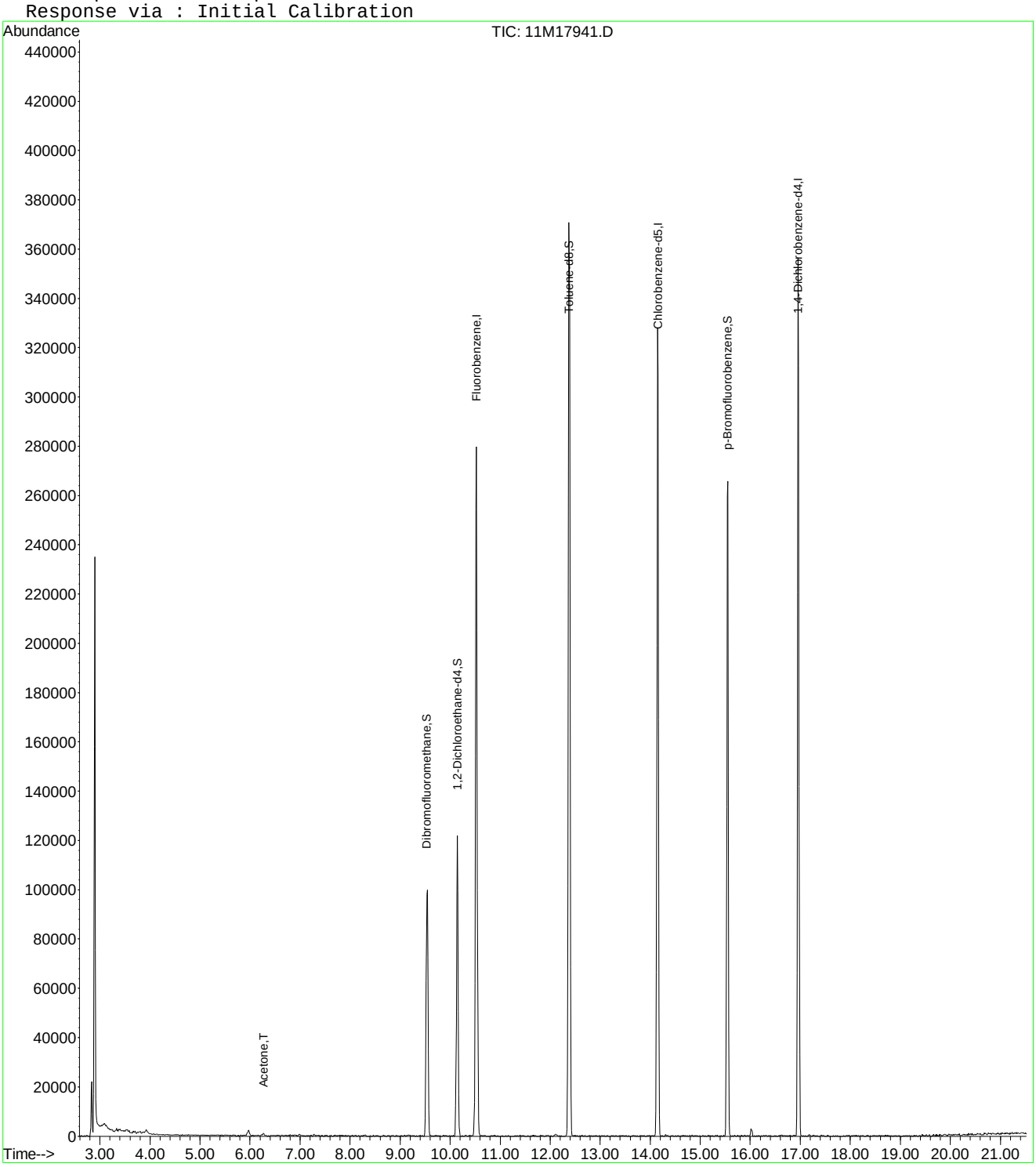
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	327037	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.15	117	232049	25.00	ug/L	0.01
76) 1,4-Dichlorobenzene-d4	16.96	152	123815	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	83256	25.7012	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.80%			
43) 1,2-Dichloroethane-d4	10.14	65	100151	26.6416	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.56%			
57) Toluene-d8	12.38	98	325052	26.9774	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.92%			
78) p-Bromofluorobenzene	15.54	95	115485	26.8352	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.36%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	449	Below Cal	#	40
13) Acetone	6.27	43	2117	1.9360	ug/L #	41
33) Chloroform	9.27	83	197	Below Cal	#	17

(#) = qualifier out of range (m) = manual integration
11M17941.D 8260WT.M Tue May 02 13:28:06 2017 Page 1

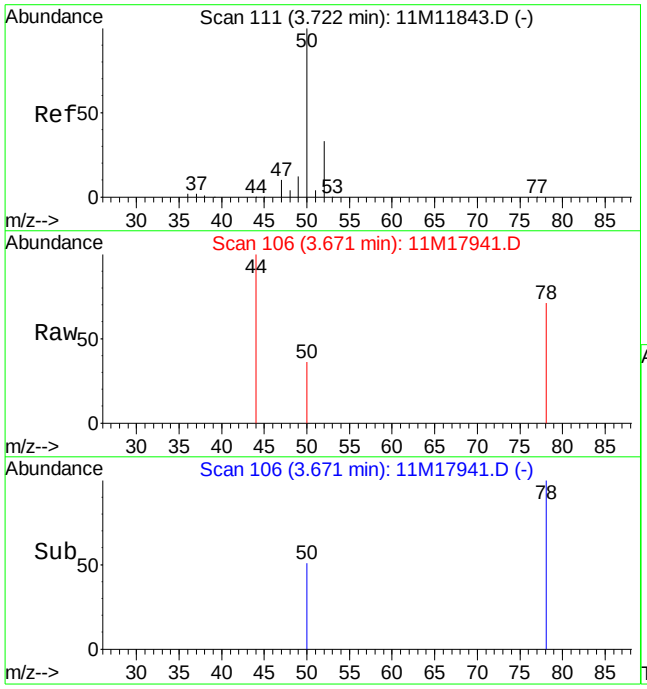
Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17941.D Vial: 8
Acq On : 1 May 2017 19:17 Operator: JDS
Sample : L17041203-48 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 2 13:28 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



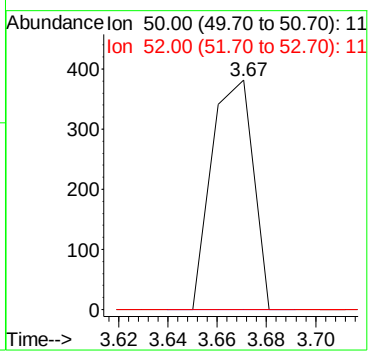
11M17941.D 8260WT.M Tue May 02 13:28:06 2017 Page 2

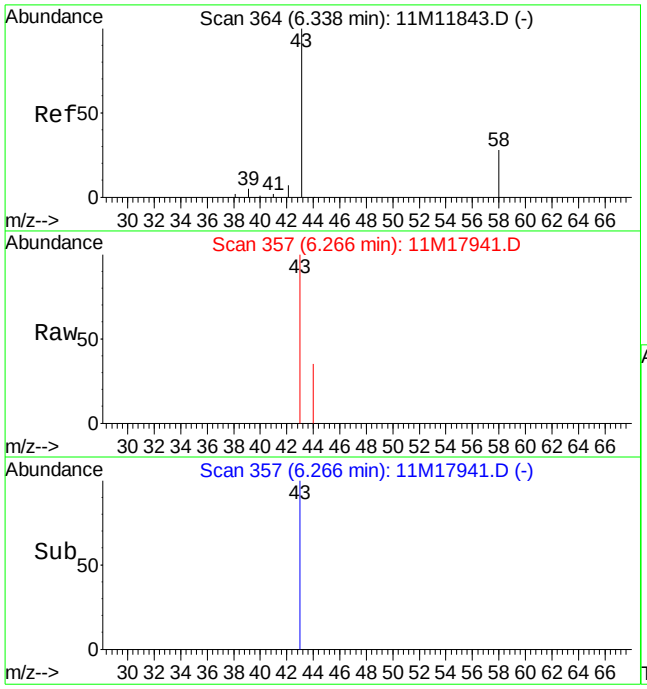


#3
Chloromethane
Concen: Below Cal
RT: 3.67 min Scan# 106
Delta R.T. 0.01 min
Lab File: 11M17941.D
Acq: 1 May 2017 19:17

Tgt Ion: 50 Resp: 449

Ion	Ratio	Lower	Upper
50	100		
52	0.0	20.8	48.6#

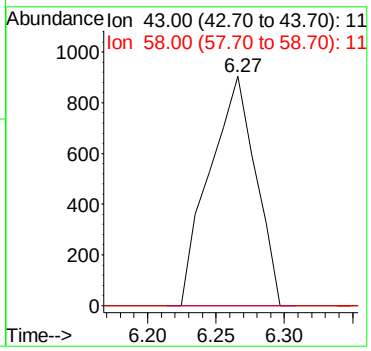


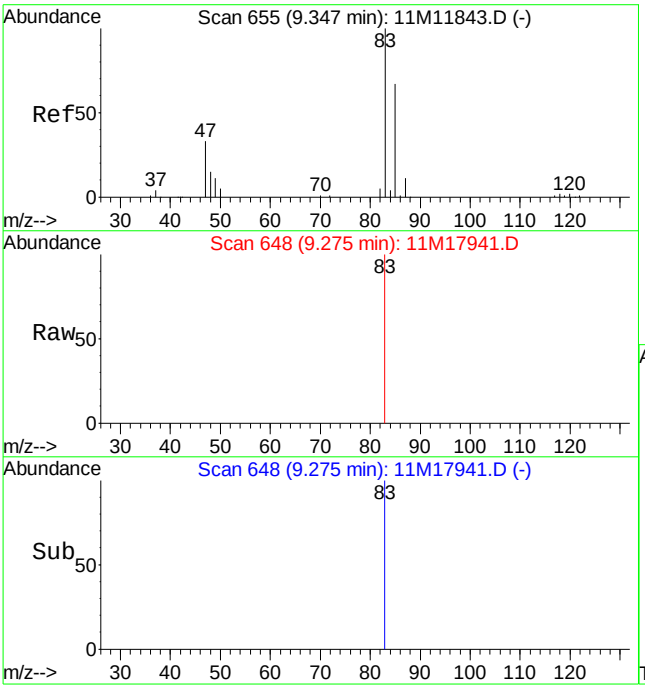


#13
Acetone
Concen: 1.94 ug/L
RT: 6.27 min Scan# 357
Delta R.T. 0.01 min
Lab File: 11M17941.D
Acq: 1 May 2017 19:17

Tgt Ion: 43 Resp: 2117

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

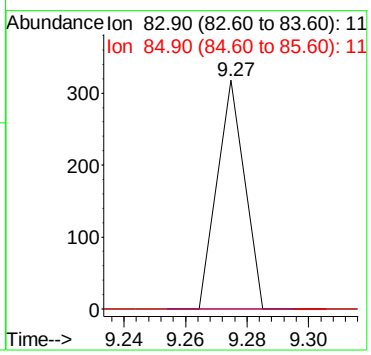




#33
Chloroform
Concen: Below Cal
RT: 9.27 min Scan# 648
Delta R.T. 0.01 min
Lab File: 11M17941.D
Acq: 1 May 2017 19:17

Tgt Ion: 83 Resp: 197

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17940.D Vial: 7
Acq On : 1 May 2017 18:47 Operator: JDS
Sample : L17041203-49 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 02 13:28:03 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

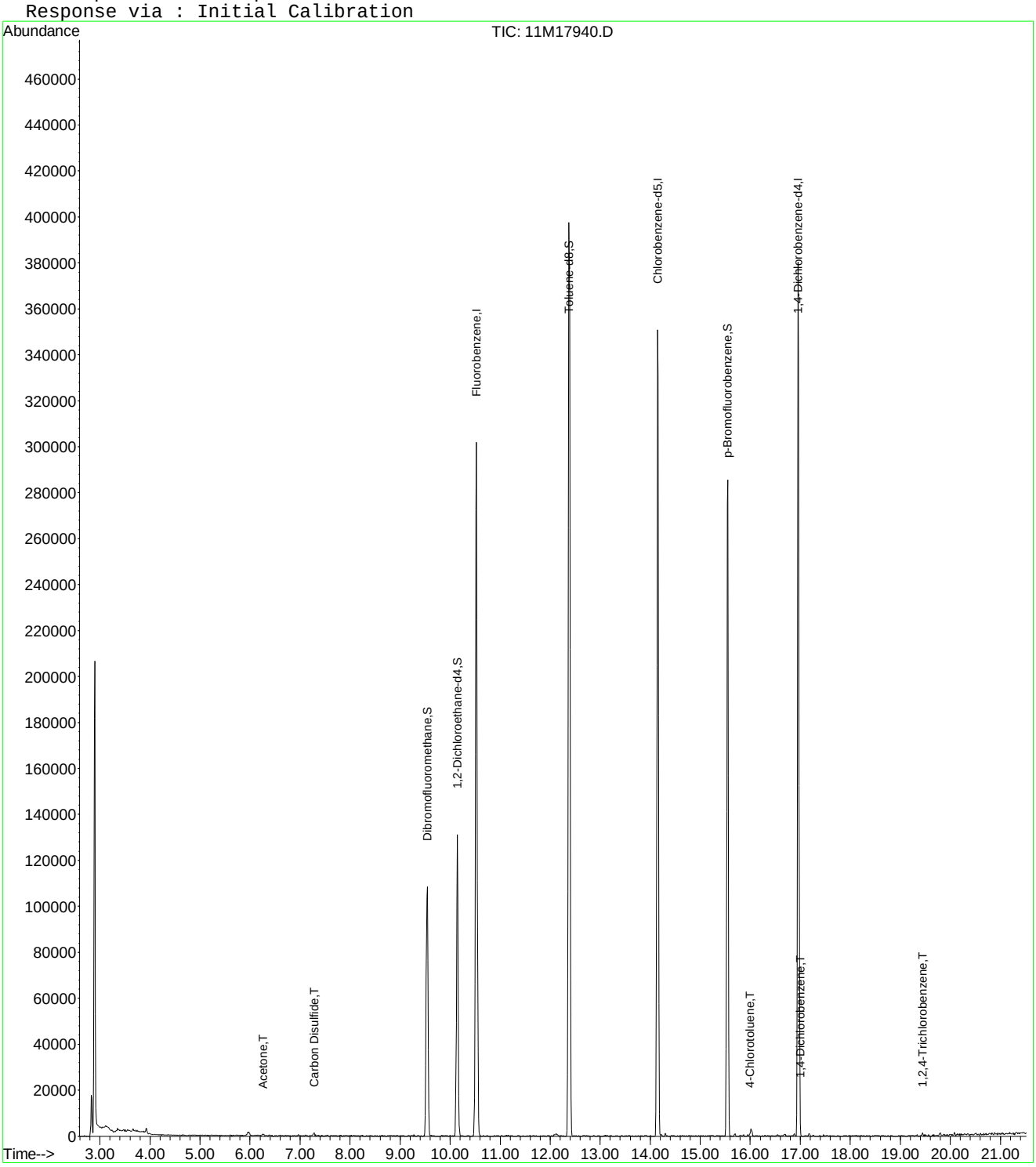
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	353251	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	250763	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	132721	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.54	111	90315	25.8114 ug/L	0.01
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.24%		
43) 1,2-Dichloroethane-d4	10.14	65	105655	26.0200 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.08%		
57) Toluene-d8	12.38	98	346358	26.6004 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.40%		
78) p-Bromofluorobenzene	15.54	95	121030	26.2365 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.96%		
Target Compounds					Qvalue
3) Chloromethane	3.66	50	1341	Below Cal	# 74
13) Acetone	6.26	43	1268	1.0735 ug/L	# 41
20) Carbon Disulfide	7.28	76	1675	0.1553 ug/L	# 73
33) Chloroform	9.27	83	204	Below Cal	# 17
85) 4-Chlorotoluene	16.00	91	1499	0.1315 ug/L	# 45
92) 1,4-Dichlorobenzene	17.00	146	1078	0.1245 ug/L	# 1
96) 1,2,4-Trichlorobenzene	19.45	180	1141	0.1956 ug/L	# 45

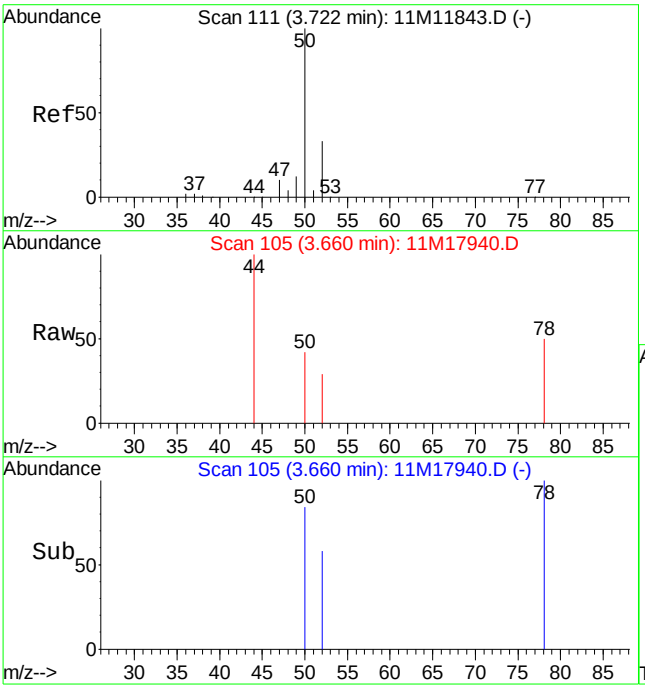
(#) = qualifier out of range (m) = manual integration
11M17940.D 8260WT.M Tue May 02 13:28:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17940.D Vial: 7
Acq On : 1 May 2017 18:47 Operator: JDS
Sample : L17041203-49 A TB 826-SPE Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 2 13:28 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

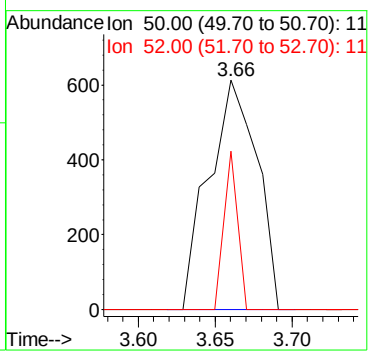


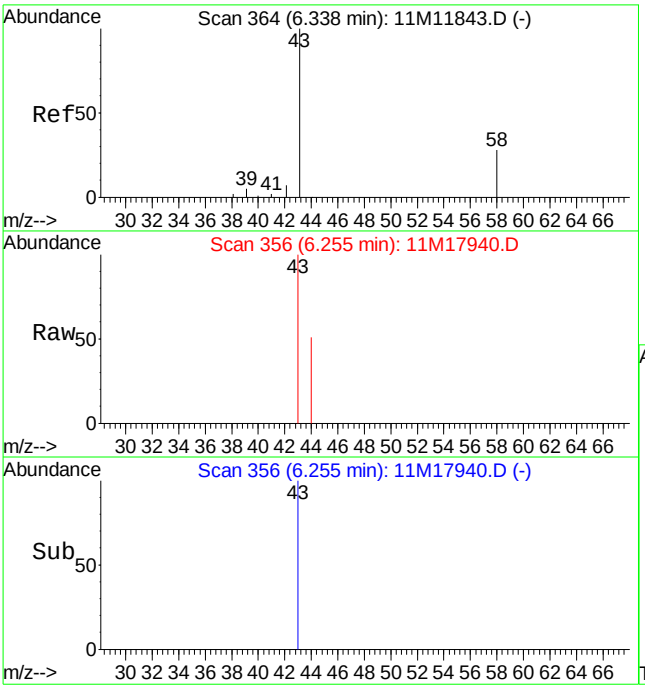


#3
Chloromethane
Concen: Below Cal
RT: 3.66 min Scan# 105
Delta R.T. 0.00 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion: 50 Resp: 1341

Ion	Ratio	Lower	Upper
50	100		
52	19.5	20.8	48.6#

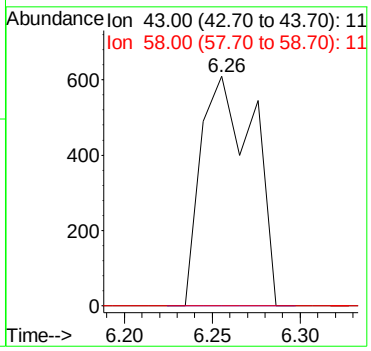


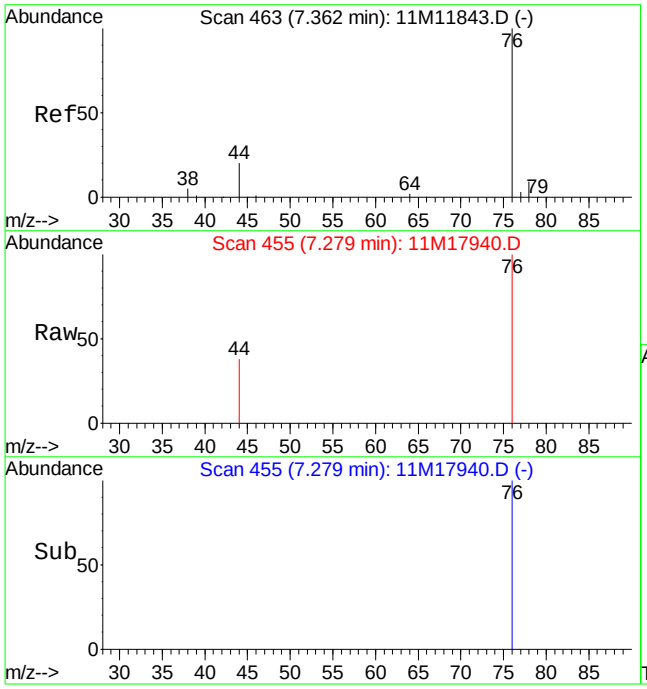


#13
Acetone
Concen: 1.07 ug/L
RT: 6.26 min Scan# 356
Delta R.T. -0.00 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion: 43 Resp: 1268

Ion	Ratio	Lower	Upper
43	100		
58	0.0	20.1	46.9#

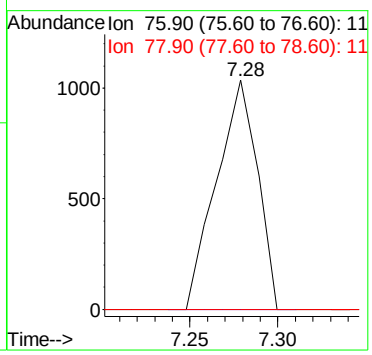


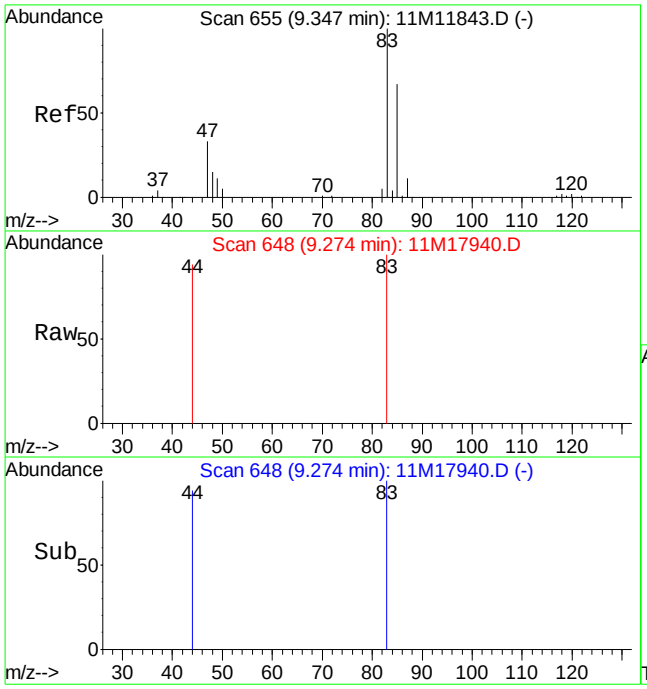


#20
Carbon Disulfide
Concen: 0.16 ug/L
RT: 7.28 min Scan# 455
Delta R.T. -0.00 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion: 76 Resp: 1675

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

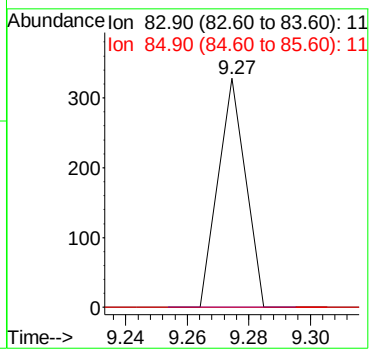


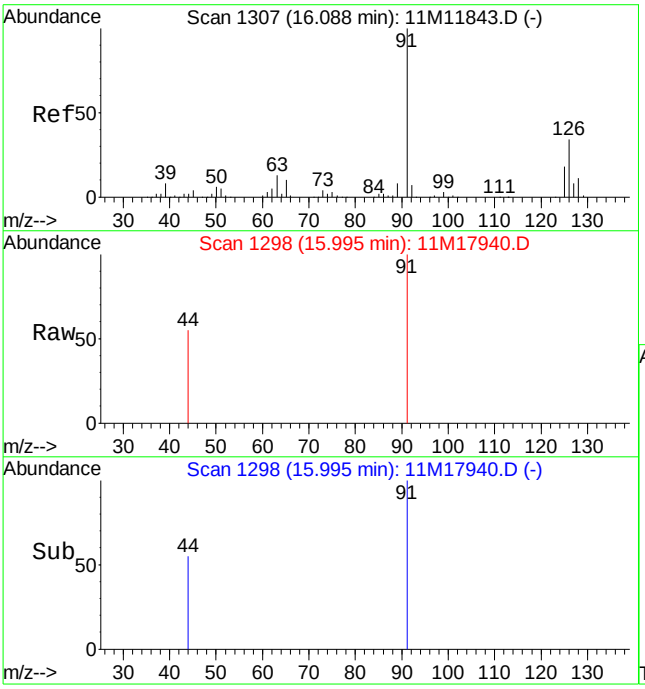


#33
Chloroform
Concen: Below Cal
RT: 9.27 min Scan# 648
Delta R.T. 0.01 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion: 83 Resp: 204

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

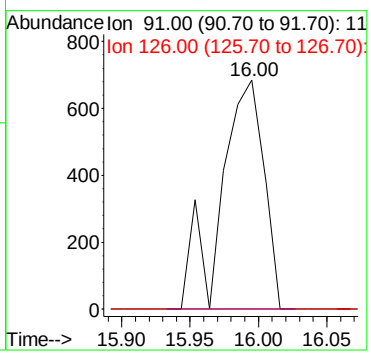


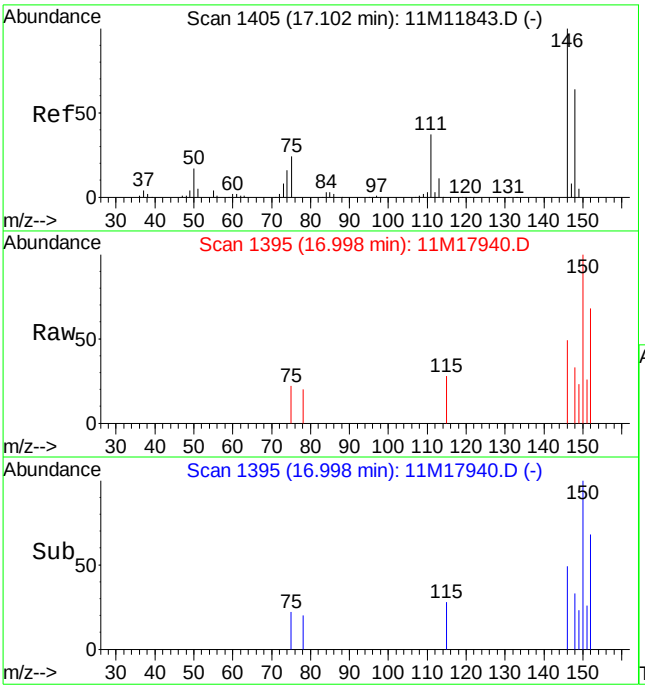


#85
4-Chlorotoluene
Concen: 0.13 ug/L
RT: 16.00 min Scan# 1298
Delta R.T. 0.01 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion: 91 Resp: 1499

Ion	Ratio	Lower	Upper
91	100		
126	0.0	17.9	41.7#

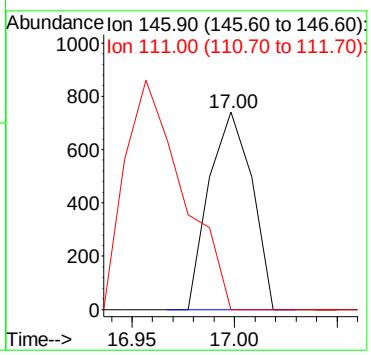


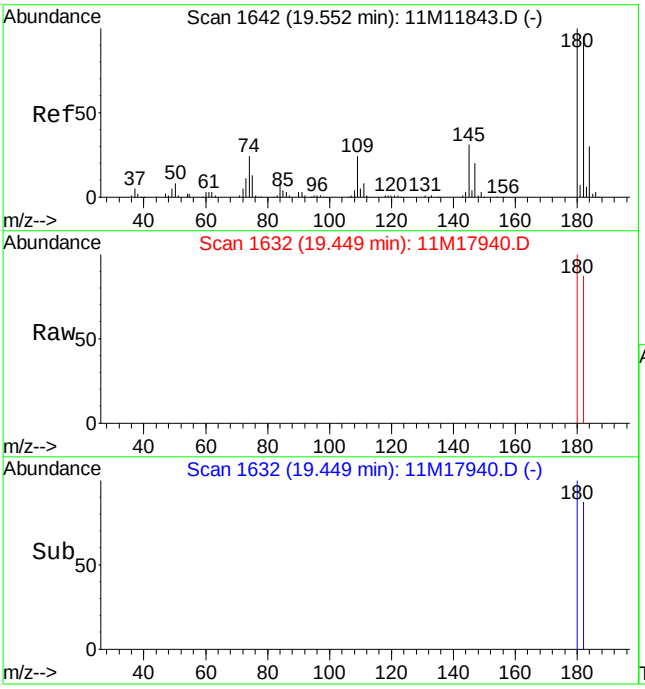


#92
1,4-Dichlorobenzene
Concen: 0.12 ug/L
RT: 17.00 min Scan# 1395
Delta R.T. -0.00 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion:146 Resp: 1078

Ion	Ratio	Lower	Upper
146	100		
111	156.6	22.9	53.5#

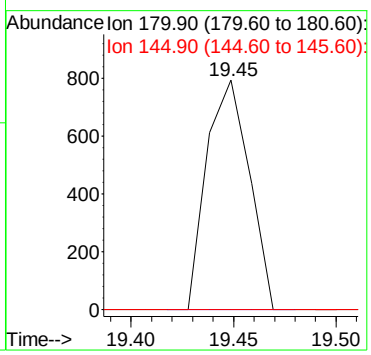




#96
1,2,4-Trichlorobenzene
Concen: 0.20 ug/L
RT: 19.45 min Scan# 1632
Delta R.T. -0.00 min
Lab File: 11M17940.D
Acq: 1 May 2017 18:47

Tgt Ion:180 Resp: 1141

Ion	Ratio	Lower	Upper
180	100		
145	0.0	17.7	41.3#



2.1.1.4 Standards Data

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

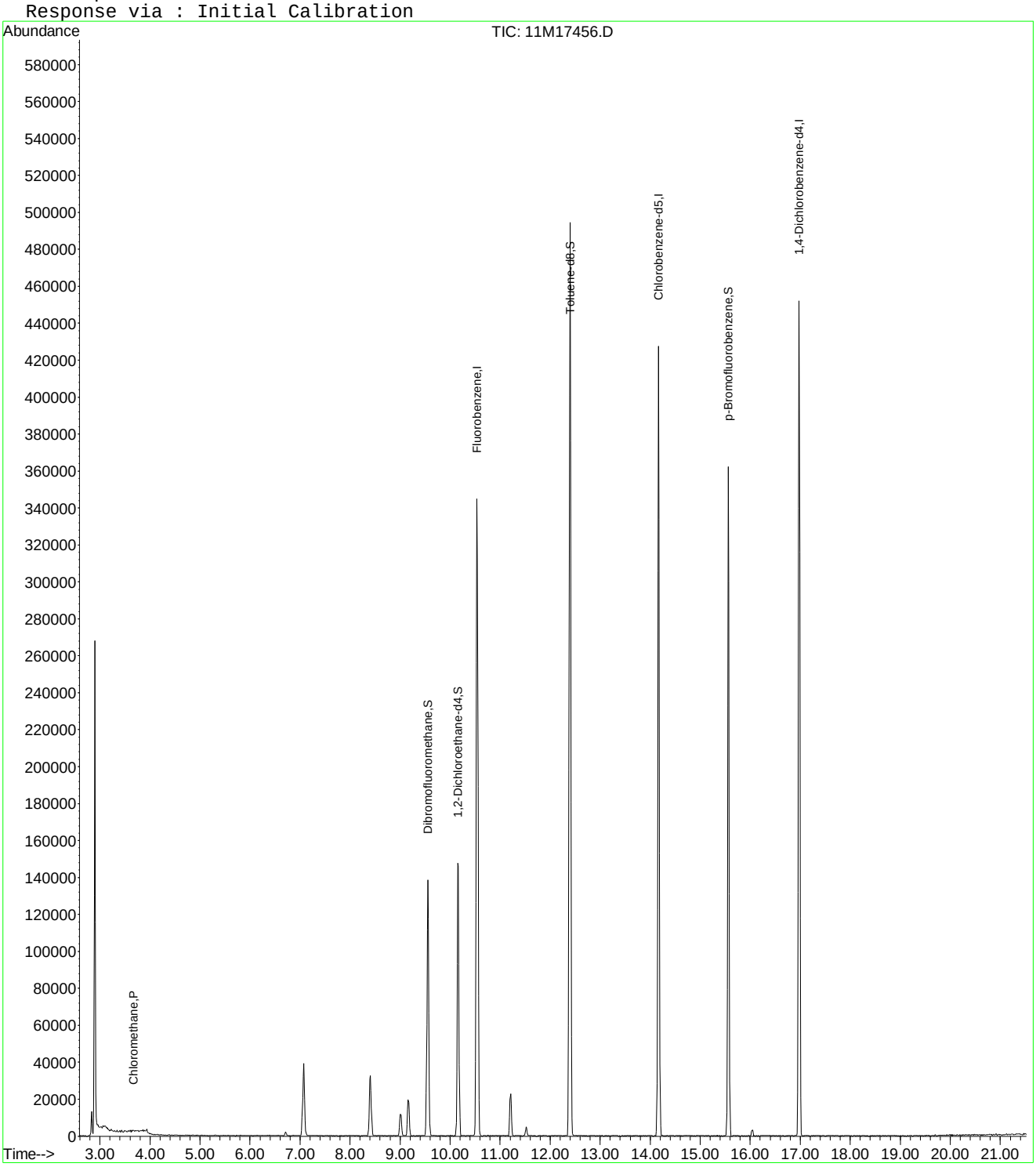
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	109363	26.4089	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.15	65	126342	23.9108	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.64%			
57) Toluene-d8	12.40	98	415624	26.0292	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.12%			
78) p-Bromofluorobenzene	15.56	95	145423	23.2743	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.08%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1126	0.1407	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17456.D 8260WT.M Tue Apr 11 19:13:45 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:13 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:48 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

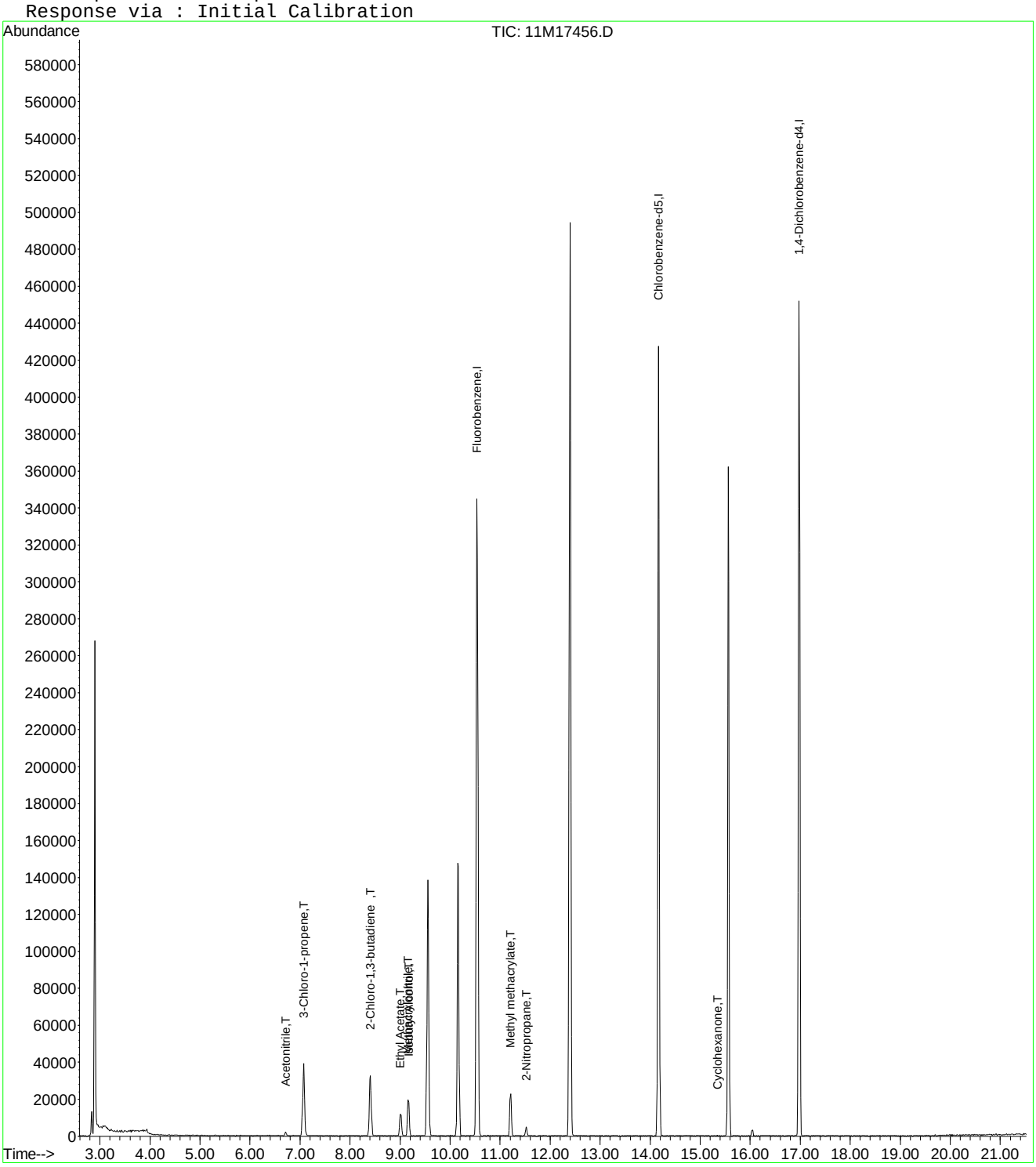
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	398427	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285208	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150743	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	2655	3.9469	ug/L	#	57
3) 3-Chloro-1-propene	7.07	41	42597	5.3245	ug/L		83
4) 2-Chloro-1,3-butadiene	8.41	53	33819	4.8784	ug/L		86
5) Methacrylonitrile	9.16	41	14534	4.5257	ug/L		73
6) Isobutyl Alcohol	9.17	43	1353	5.8827	ug/L		86
8) Cyclohexanone	15.34	55	188	24.3163	ug/L	#	19
9) 2-Nitropropane	11.52	43	4060	3.3583	ug/L		100
10) Ethyl Acetate	9.01	43	20309	4.6970	ug/L	#	94
11) Methyl methacrylate	11.21	41	17318	4.3466	ug/L		80

(#) = qualifier out of range (m) = manual integration
11M17456.D A9FOOWT.M Fri Apr 21 13:34:48 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17456.D Vial: 2
Acq On : 11 Apr 2017 18:52 Operator: FJB
Sample : WG609769-02 5ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	3.9469	21.1	0	0.00
3	T	3-Chloro-1-propene	5.0000	5.3245	-6.5	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.8784	2.4	100	0.00
5	T	Methacrylonitrile	5.0000	4.5257	9.5	100	0.00
6	T	Isobutyl Alcohol	-1.0000	5.8827	0.0	100	0.00
7	T	1-Butanol	-1.0000	0.0000	0.0	0	-10.04#
8	T	Cyclohexanone	-1.0000	24.3163	0.0	0	0.00
9	T	2-Nitropropane	-1.0000	3.3583	0.0	100	0.00
10	T	Ethyl Acetate	5.0000	4.6970	6.1	100	0.00
11	T	Methyl methacrylate	5.0000	4.3466	13.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17456.D A9FOOWT.M Fri Apr 21 13:37:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42:41 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

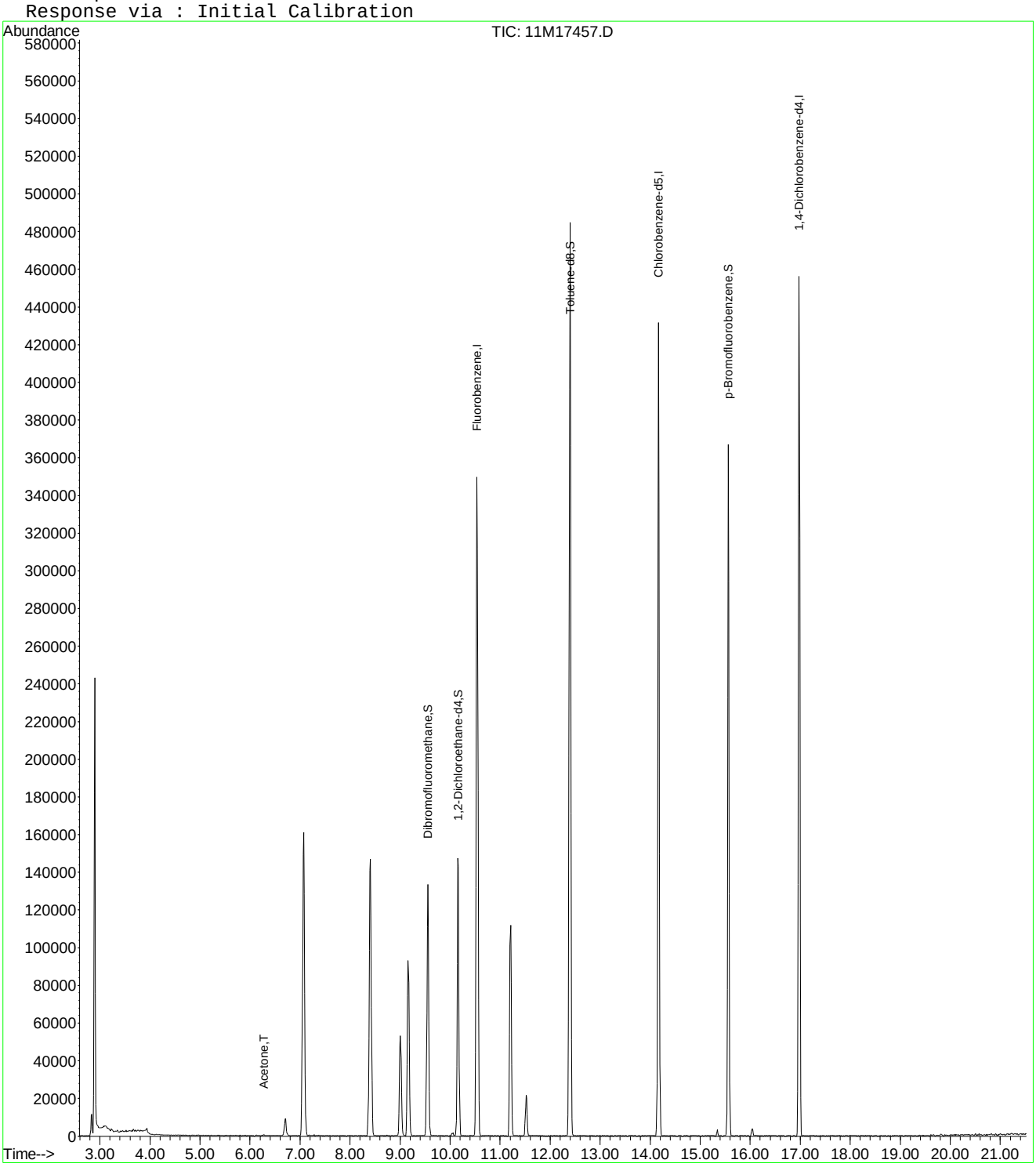
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108479	25.9785	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.92%			
43) 1,2-Dichloroethane-d4	10.16	65	125288	23.5150	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.04%			
57) Toluene-d8	12.40	98	409577	25.2978	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.20%			
78) p-Bromofluorobenzene	15.56	95	144896	23.3830	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.52%			
Target Compounds						Qvalue
13) Acetone	6.28	43	637	0.3936	ug/L #	46

(#) = qualifier out of range (m) = manual integration
11M17457.D 8260WT.M Tue Apr 11 19:42:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 19:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:49 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

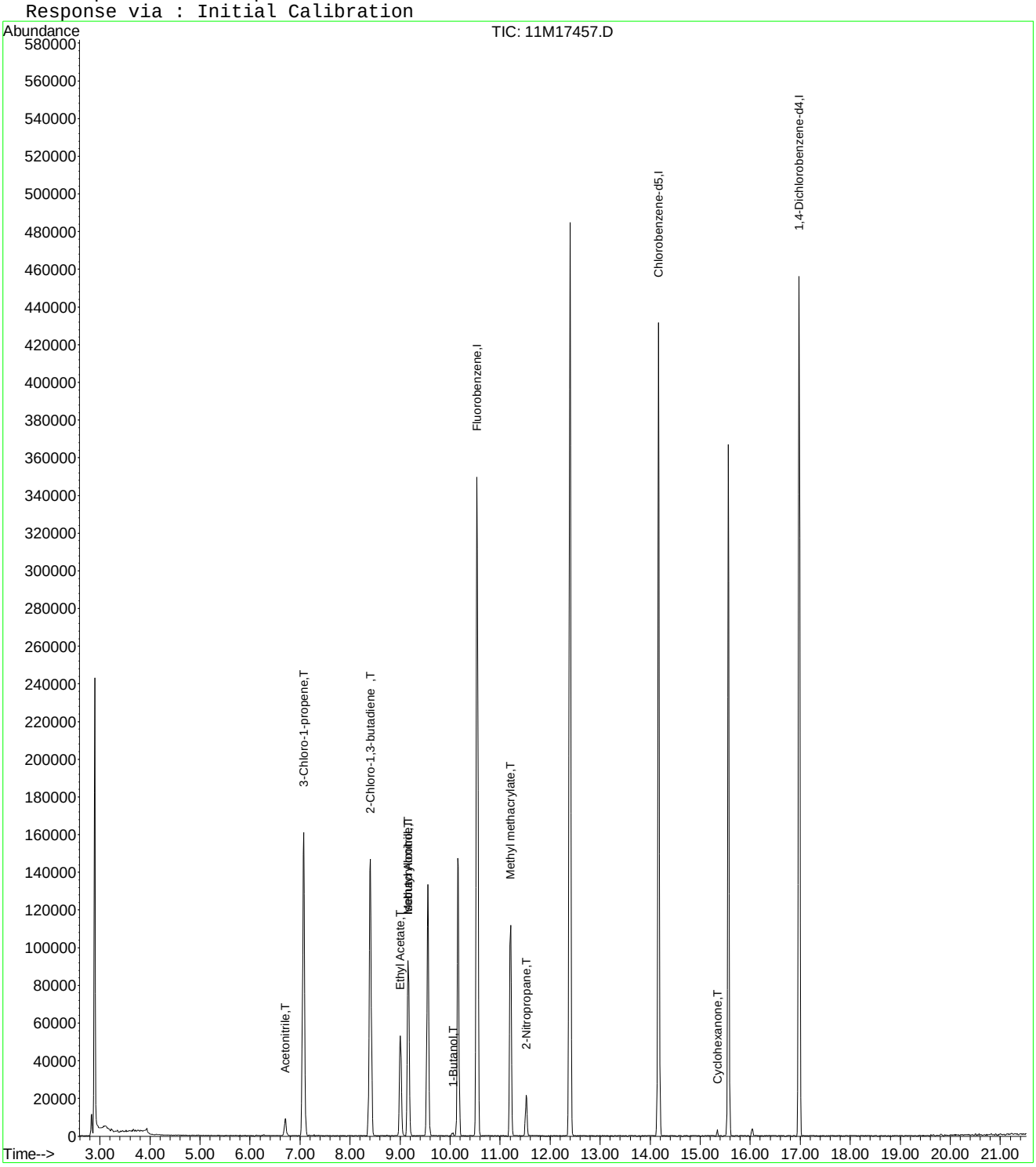
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	401754	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289184	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149499	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	12921	19.0493	ug/L		93
3) 3-Chloro-1-propene	7.07	41	179217	22.2162	ug/L		84
4) 2-Chloro-1,3-butadiene	8.41	53	148576	21.2547	ug/L		81
5) Methacrylonitrile	9.16	41	66481	20.5299	ug/L		79
6) Isobutyl Alcohol	9.16	43	8047	34.6980	ug/L		84
7) 1-Butanol	10.06	56	1259	51.3220	ug/L	#	15
8) Cyclohexanone	15.34	55	2341	34.9999	ug/L	#	77
9) 2-Nitropropane	11.52	43	19277	15.8135	ug/L		98
10) Ethyl Acetate	9.01	43	89326	20.4881	ug/L	#	92
11) Methyl methacrylate	11.21	41	80466	20.0289	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17457.D A9FOOWT.M Fri Apr 21 13:34:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17457.D Vial: 3
Acq On : 11 Apr 2017 19:20 Operator: FJB
Sample : WG609769-03 20ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	19.0493	4.8	100	-0.01
3	T	3-Chloro-1-propene	20.0000	22.2162	-11.1	100	0.00
4	T	2-Chloro-1,3-butadiene	20.0000	21.2547	-6.3	100	0.00
5	T	Methacrylonitrile	20.0000	20.5299	-2.6	100	0.00
6	T	Isobutyl Alcohol	40.0000	34.6980	13.3	100	-0.01
7	T	1-Butanol	-1.0000	51.3220	0.0	100	0.02
8	T	Cyclohexanone	-1.0000	34.9999	0.0	100	0.00
9	T	2-Nitropropane	-1.0000	15.8135	0.0	100	0.00
10	T	Ethyl Acetate	20.0000	20.4881	-2.4	100	0.00
11	T	Methyl methacrylate	20.0000	20.0289	-0.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17457.D A9FOOWT.M Fri Apr 21 13:37:36 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

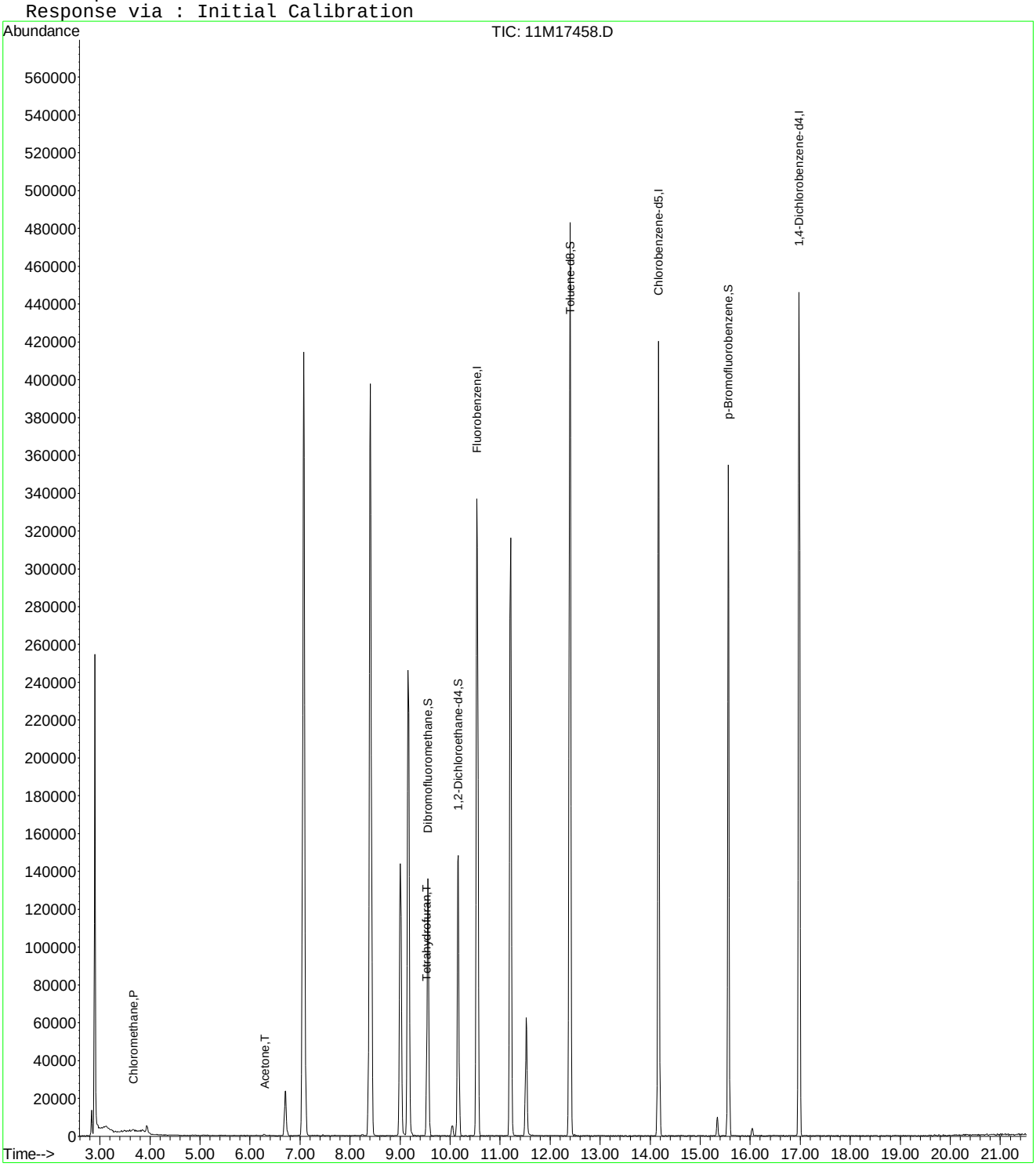
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	108362	26.2787	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.12%			
43) 1,2-Dichloroethane-d4	10.16	65	125236	23.8026	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.20%			
57) Toluene-d8	12.40	98	407400	25.6066	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.44%			
78) p-Bromofluorobenzene	15.56	95	144829	23.2872	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.16%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	985	0.1236	ug/L	78
13) Acetone	6.30	43	1193	0.7465	ug/L #	46
36) Tetrahydrofuran	9.53	42	402	0.2227	ug/L #	41

(#) = qualifier out of range (m) = manual integration
11M17458.D 8260WT.M Tue Apr 11 20:12:14 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:12 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:50 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

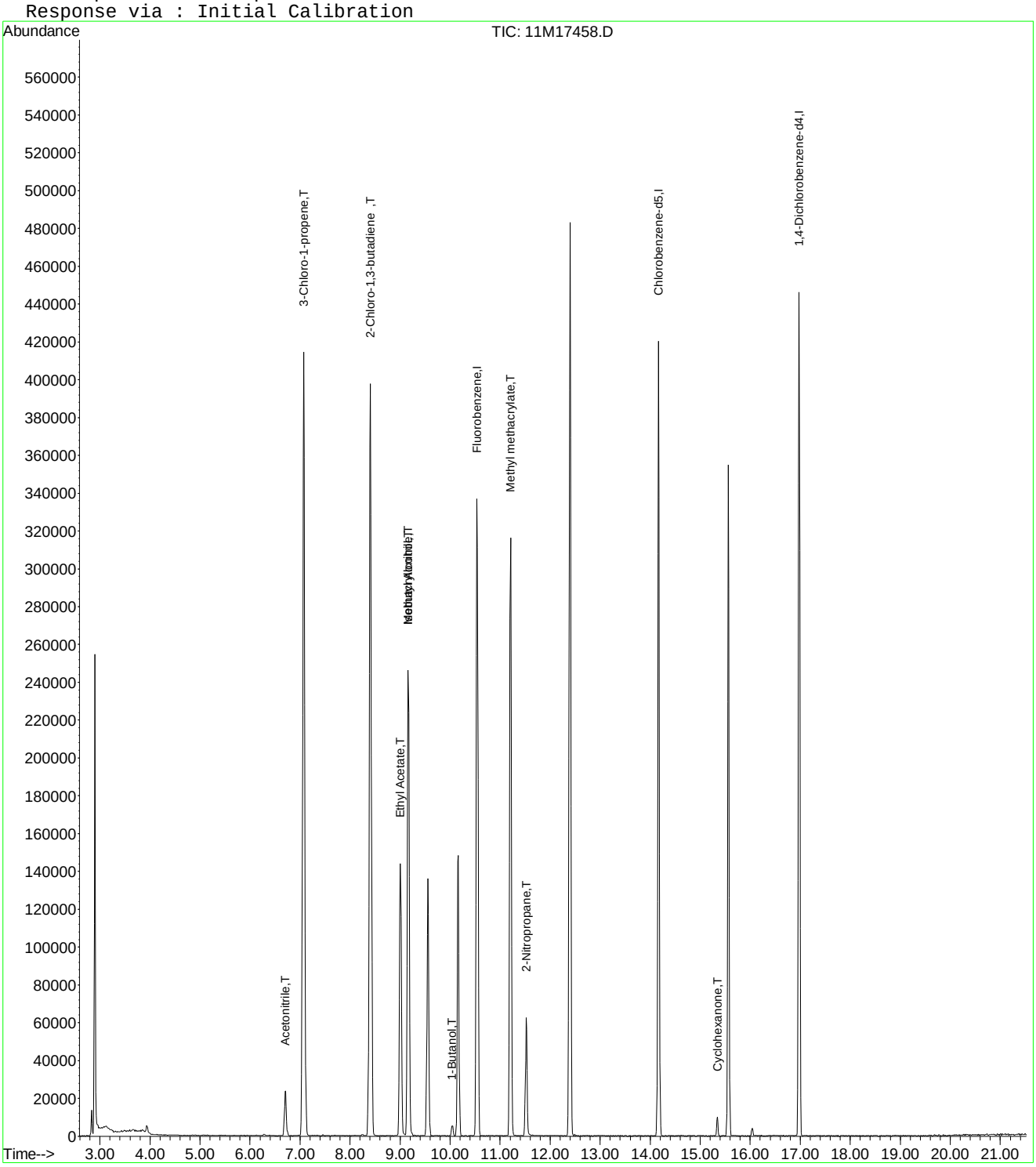
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	396735	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	284178	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	150044	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	32285	48.1995	ug/L		99
3) 3-Chloro-1-propene	7.07	41	457447	57.4238	ug/L		82
4) 2-Chloro-1,3-butadiene	8.41	53	391135	56.6621	ug/L		81
5) Methacrylonitrile	9.16	41	171426	53.6075	ug/L		77
6) Isobutyl Alcohol	9.16	43	21874	95.5120	ug/L		82
7) 1-Butanol	10.04	56	3950	70.2746	ug/L	#	84
8) Cyclohexanone	15.34	55	6611	56.6194	ug/L	#	80
9) 2-Nitropropane	11.52	43	54987	45.6781	ug/L		95
10) Ethyl Acetate	9.01	43	236322	54.8894	ug/L	#	93
11) Methyl methacrylate	11.21	41	217399	54.7977	ug/L		78

(#) = qualifier out of range (m) = manual integration
11M17458.D A9FOOWT.M Fri Apr 21 13:34:50 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17458.D Vial: 4
Acq On : 11 Apr 2017 19:50 Operator: FJB
Sample : WG609769-04 50ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	48.1995	3.6	100	-0.01
3	T	3-Chloro-1-propene	50.0000	57.4238	-14.8	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	56.6621	-13.3	100	0.00
5	T	Methacrylonitrile	50.0000	53.6075	-7.2	100	0.00
6	T	Isobutyl Alcohol	100.0000	95.5120	4.5	100	-0.01
7	T	1-Butanol	-1.0000	70.2746	0.0	100	0.00
8	T	Cyclohexanone	50.0000	56.6194	-13.2	100	0.00
9	T	2-Nitropropane	50.0000	45.6781	8.6	100	0.00
10	T	Ethyl Acetate	50.0000	54.8894	-9.8	100	0.00
11	T	Methyl methacrylate	50.0000	54.7977	-9.6	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17458.D A9FOOWT.M Fri Apr 21 13:37:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42:04 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

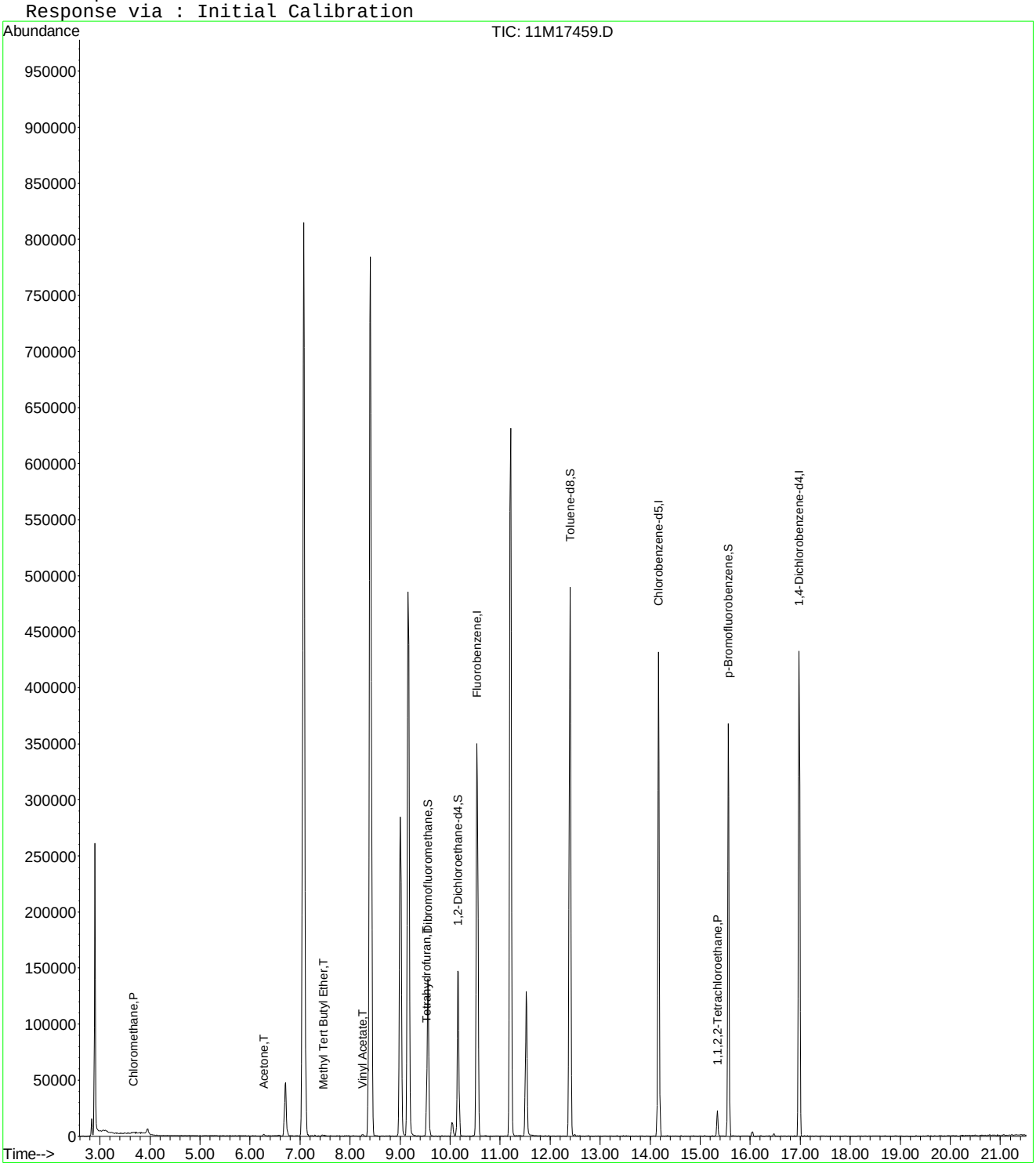
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	111534	26.4487	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.80%			
43) 1,2-Dichloroethane-d4	10.15	65	126001	23.4174	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.68%			
57) Toluene-d8	12.40	98	411886	25.4379	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.76%			
78) p-Bromofluorobenzene	15.56	95	149293	25.2500	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.00%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1132	0.1389	ug/L	# 55
13) Acetone	6.28	43	2268	1.3877	ug/L	80
22) Methyl Tert Butyl Ether	7.47	73	2104	0.1479	ug/L	# 47
26) Vinyl Acetate	8.25	43	2683	0.2564	ug/L	# 77
36) Tetrahydrofuran	9.53	42	240	0.1300	ug/L	# 41
77) 1,1,2,2-Tetrachloroethane	15.34	83	872	0.1644	ug/L	# 18

(#) = qualifier out of range (m) = manual integration
11M17459.D 8260WT.M Tue Apr 11 20:42:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 20:42 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:51 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

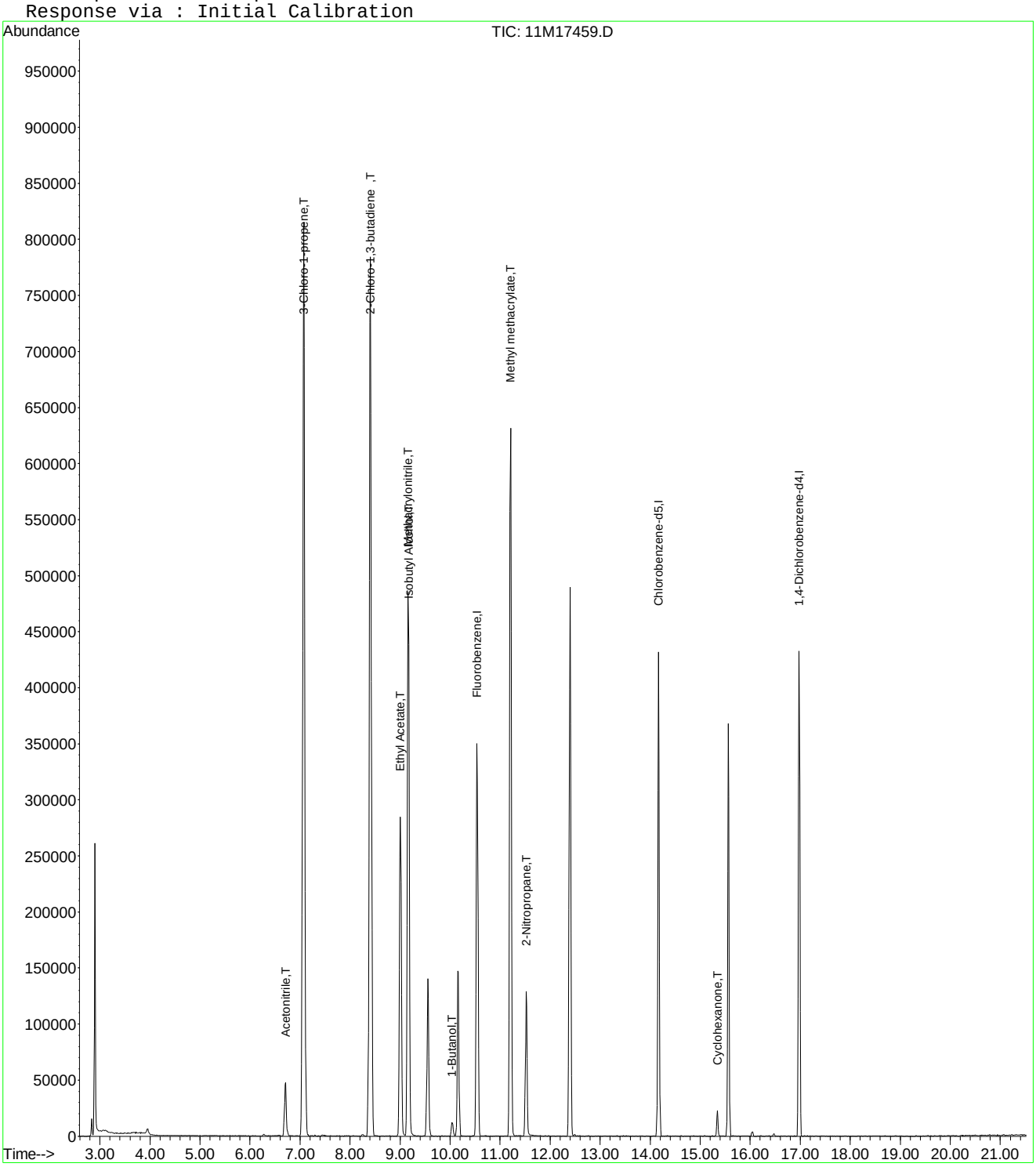
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	405724	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	289212	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	142646	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	65494	95.6122	ug/L		99
3) 3-Chloro-1-propene	7.07	41	885129	108.6494	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	760026	107.6624	ug/L		78
5) Methacrylonitrile	9.16	41	338034	103.3663	ug/L		76
6) Isobutyl Alcohol	9.17	43	41794	178.4487	ug/L		89
7) 1-Butanol	10.04	56	8518	100.9385	ug/L	#	84
8) Cyclohexanone	15.34	55	13236	88.4596	ug/L	#	84
9) 2-Nitropropane	11.52	43	115457	93.7860	ug/L		94
10) Ethyl Acetate	9.01	43	459743	104.4165	ug/L	#	90
11) Methyl methacrylate	11.21	41	434329	107.0516	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17459.D A9FOOWT.M Fri Apr 21 13:34:51 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17459.D Vial: 5
Acq On : 11 Apr 2017 20:20 Operator: FJB
Sample : WG609769-05 100ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	95.6122	4.4	100	0.00
3	T	3-Chloro-1-propene	100.0000	108.6494	-8.6	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	107.6624	-7.7	100	0.00
5	T	Methacrylonitrile	100.0000	103.3663	-3.4	100	0.00
6	T	Isobutyl Alcohol	200.0000	178.4487	10.8	100	0.00
7	T	1-Butanol	100.0000	100.9385	-0.9	100	0.00
8	T	Cyclohexanone	100.0000	88.4596	11.5	100	0.00
9	T	2-Nitropropane	100.0000	93.7860	6.2	100	0.00
10	T	Ethyl Acetate	100.0000	104.4165	-4.4	100	0.00
11	T	Methyl methacrylate	100.0000	107.0516	-7.1	100	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17459.D A9FOOWT.M Fri Apr 21 13:39:02 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11:03 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

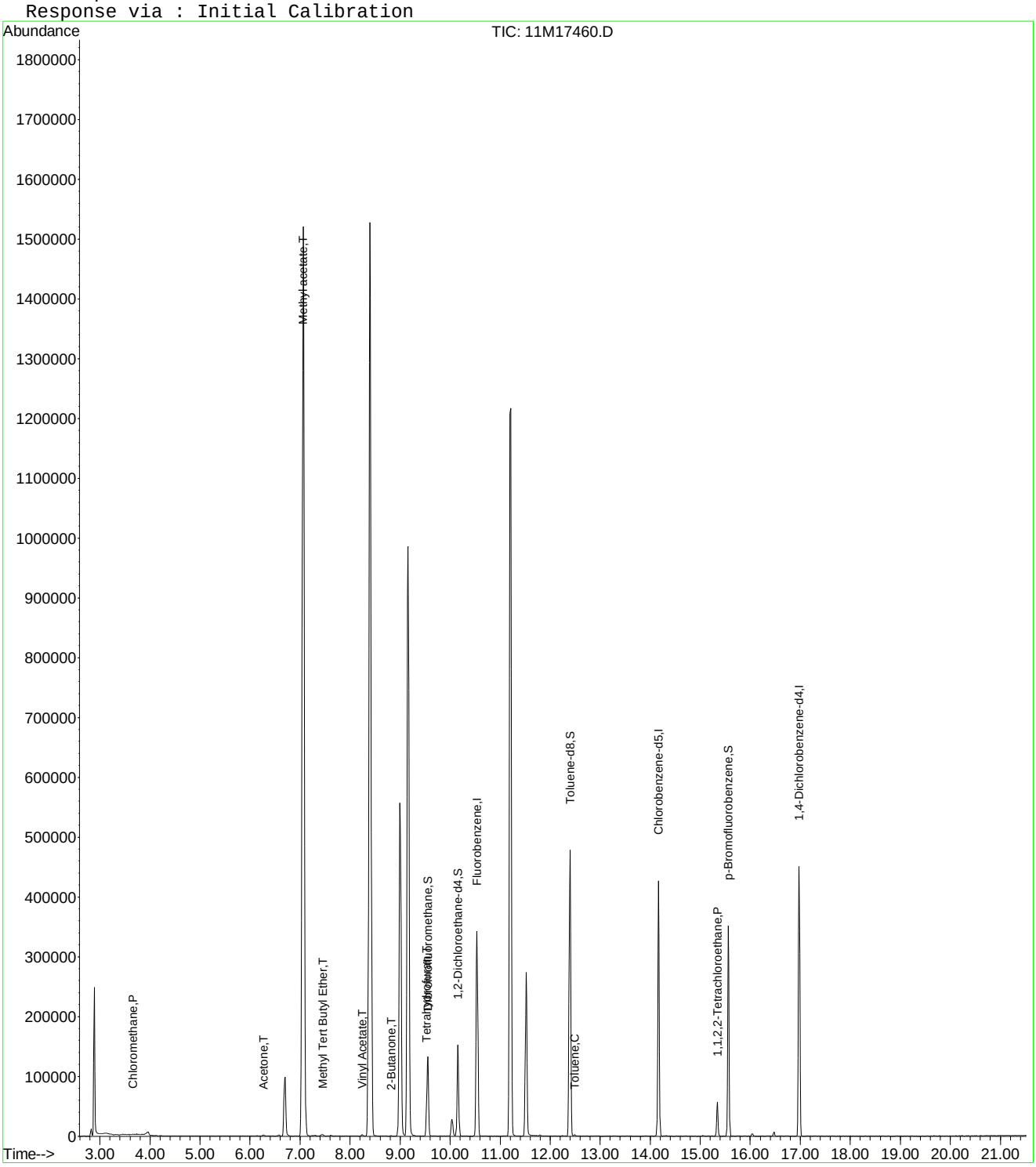
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106964	26.0007	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.00%			
43) 1,2-Dichloroethane-d4	10.15	65	122550	23.3468	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.40%			
57) Toluene-d8	12.40	98	406174	25.3933	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.56%			
78) p-Bromofluorobenzene	15.56	95	144524	23.5455	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 94.20%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	1338	0.1683	ug/L #	67
13) Acetone	6.27	43	4034	2.5301	ug/L	78
18) Methyl acetate	7.05	43	612	0.1369	ug/L #	1
22) Methyl Tert Butyl Ether	7.45	73	4894	0.3527	ug/L	93
26) Vinyl Acetate	8.24	43	5337	0.5228	ug/L #	77
29) 2-Butanone	8.82	43	474	0.1854	ug/L #	55
36) Tetrahydrofuran	9.53	42	385	0.2138	ug/L #	41
58) Toluene	12.49	91	2879	0.1437	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	2354	0.4276	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17460.D 8260WT.M Tue Apr 11 21:11:04 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:11 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:52 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

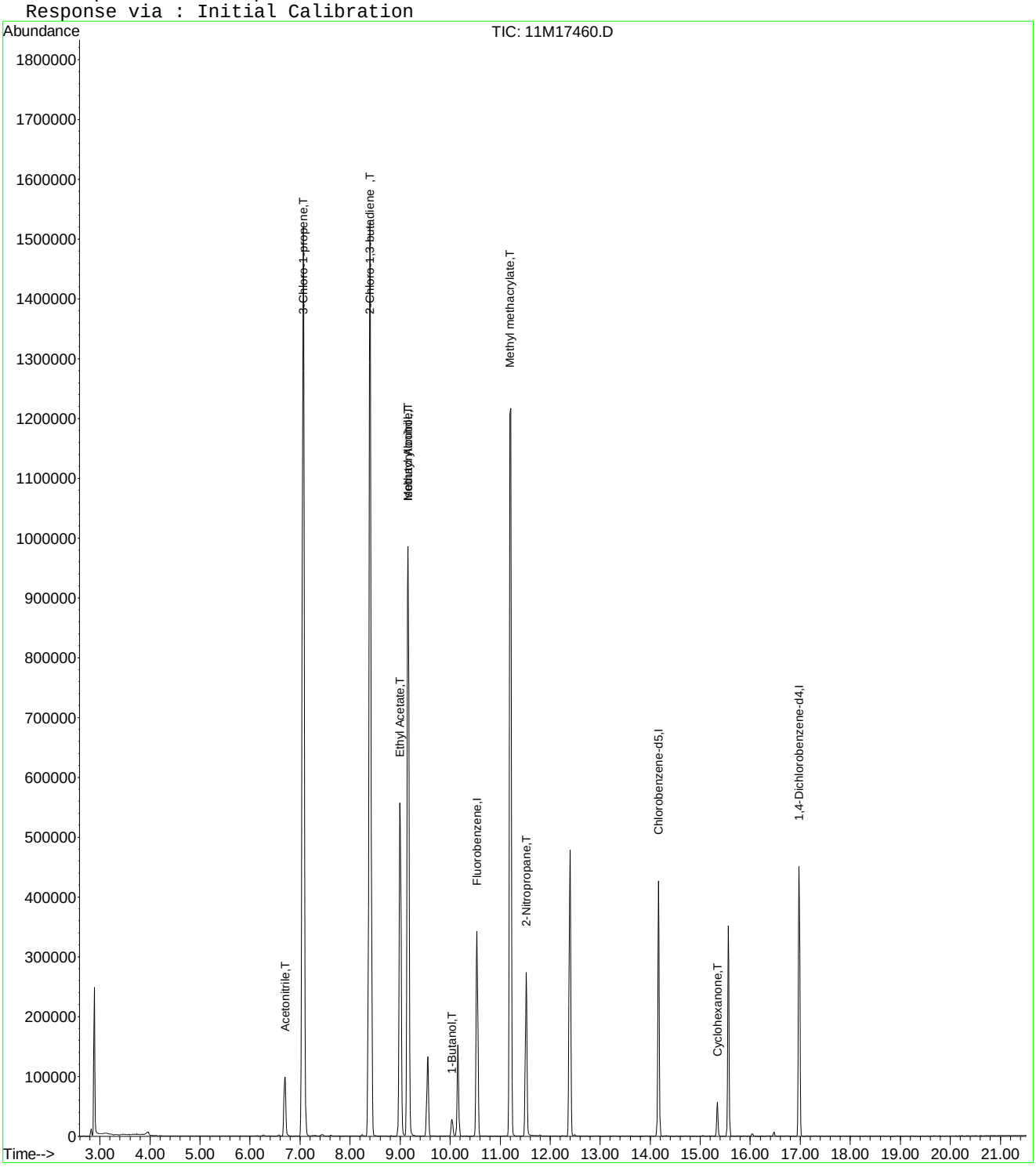
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	395804	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285702	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	148086	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	136902	204.8671	ug/L		98
3) 3-Chloro-1-propene	7.06	41	1641249	206.5122	ug/L		74
4) 2-Chloro-1,3-butadiene	8.40	53	1451521	210.7703	ug/L		74
5) Methacrylonitrile	9.16	41	673287	211.0422	ug/L		74
6) Isobutyl Alcohol	9.16	43	92763	405.9989	ug/L		87
7) 1-Butanol	10.04	56	21553	193.8864	ug/L	#	82
8) Cyclohexanone	15.34	55	32781	188.6073	ug/L	#	83
9) 2-Nitropropane	11.52	43	245915	204.7638	ug/L		95
10) Ethyl Acetate	9.00	43	905759	210.8712	ug/L	#	89
11) Methyl methacrylate	11.20	41	859855	217.2452	ug/L		74

(#) = qualifier out of range (m) = manual integration
11M17460.D A9FOOWT.M Fri Apr 21 13:34:52 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17460.D Vial: 6
Acq On : 11 Apr 2017 20:49 Operator: FJB
Sample : WG609769-06 200ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



11M17460.D A9FOOWT.M Fri Apr 21 13:34:52 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40:02 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

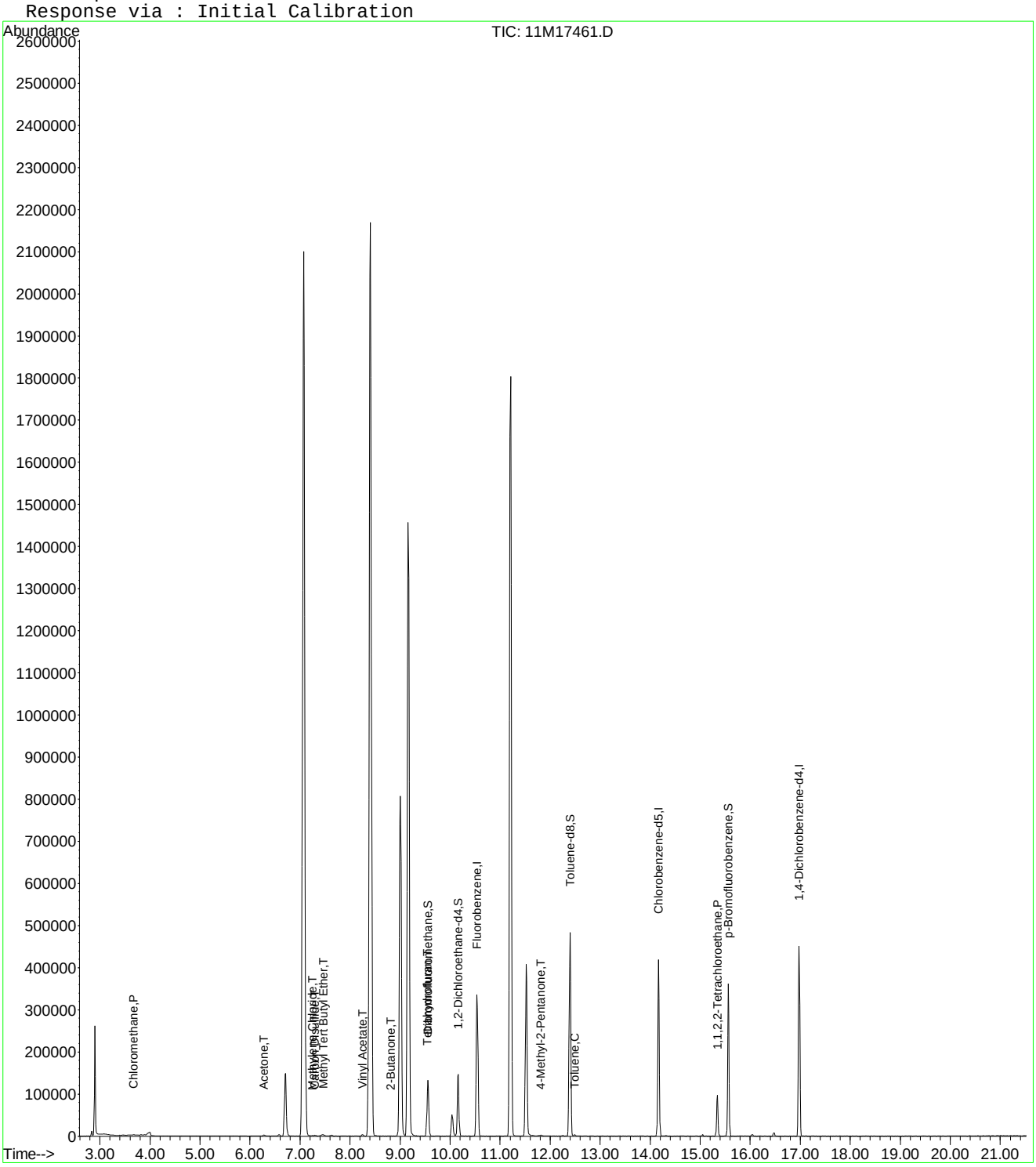
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	107197	26.4141	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.64%			
43) 1,2-Dichloroethane-d4	10.16	65	123580	23.8654	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 95.48%			
57) Toluene-d8	12.40	98	410662	25.6678	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.68%			
78) p-Bromofluorobenzene	15.56	95	147403	23.4277	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.72%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1060	0.1352	ug/L #	75
13) Acetone	6.28	43	5404	3.4357	ug/L	98
19) Methylene Chloride	7.25	84	697	0.1329	ug/L	66
20) Carbon Disulfide	7.29	76	1636	0.1208	ug/L #	73
22) Methyl Tert Butyl Ether	7.47	73	7202	0.5261	ug/L	85
26) Vinyl Acetate	8.25	43	8317	0.8259	ug/L #	80
29) 2-Butanone	8.81	43	763	0.3025	ug/L #	55
36) Tetrahydrofuran	9.54	42	395	0.2224	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	258	0.1206	ug/L #	40
58) Toluene	12.49	91	4122	0.2057	ug/L	97
77) 1,1,2,2-Tetrachloroethane	15.34	83	4198	0.7439	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17461.D 8260WT.M Tue Apr 11 21:40:03 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 21:40 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



11M17461.D 8260WT.M Tue Apr 11 21:40:03 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:53 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

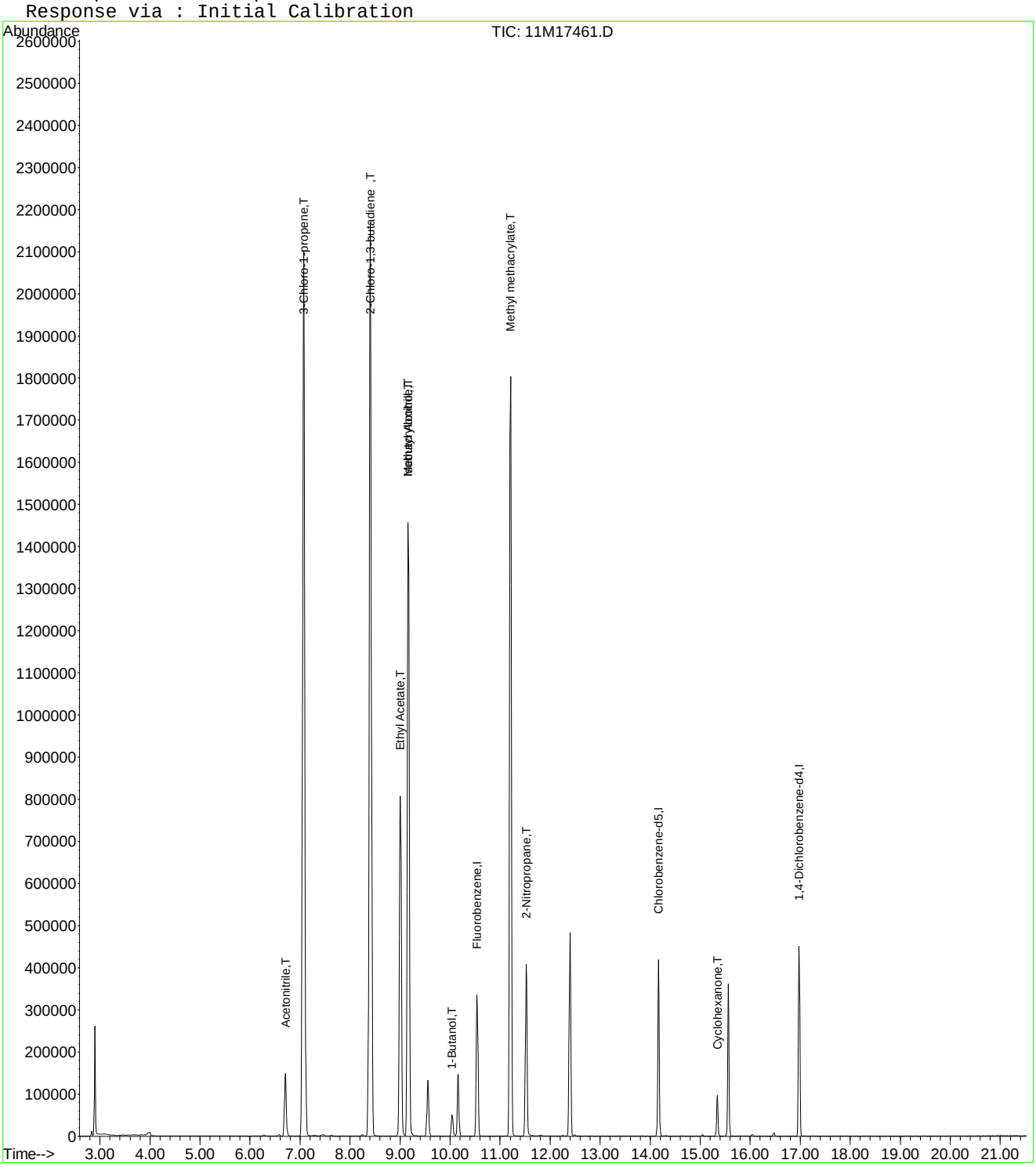
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	390458	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285770	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151795	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.71	41	206451	313.1737	ug/L		99
3) 3-Chloro-1-propene	7.07	41	2228814	284.2830	ug/L		69
4) 2-Chloro-1,3-butadiene	8.41	53	2012298	296.1995	ug/L		70
5) Methacrylonitrile	9.16	41	972780	309.0933	ug/L		72
6) Isobutyl Alcohol	9.16	43	149280	662.3042	ug/L		87
7) 1-Butanol	10.04	56	37487	309.3216	ug/L	#	79
8) Cyclohexanone	15.34	55	55514	307.0239	ug/L	#	85
9) 2-Nitropropane	11.52	43	377920	318.9877	ug/L		94
10) Ethyl Acetate	9.01	43	1297135	306.1227	ug/L	#	86
11) Methyl methacrylate	11.21	41	1217565	311.8337	ug/L		71

(#) = qualifier out of range (m) = manual integration
11M17461.D A9FOOWT.M Fri Apr 21 13:34:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17461.D Vial: 7
Acq On : 11 Apr 2017 21:18 Operator: FJB
Sample : WG609769-07 300ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09:37 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

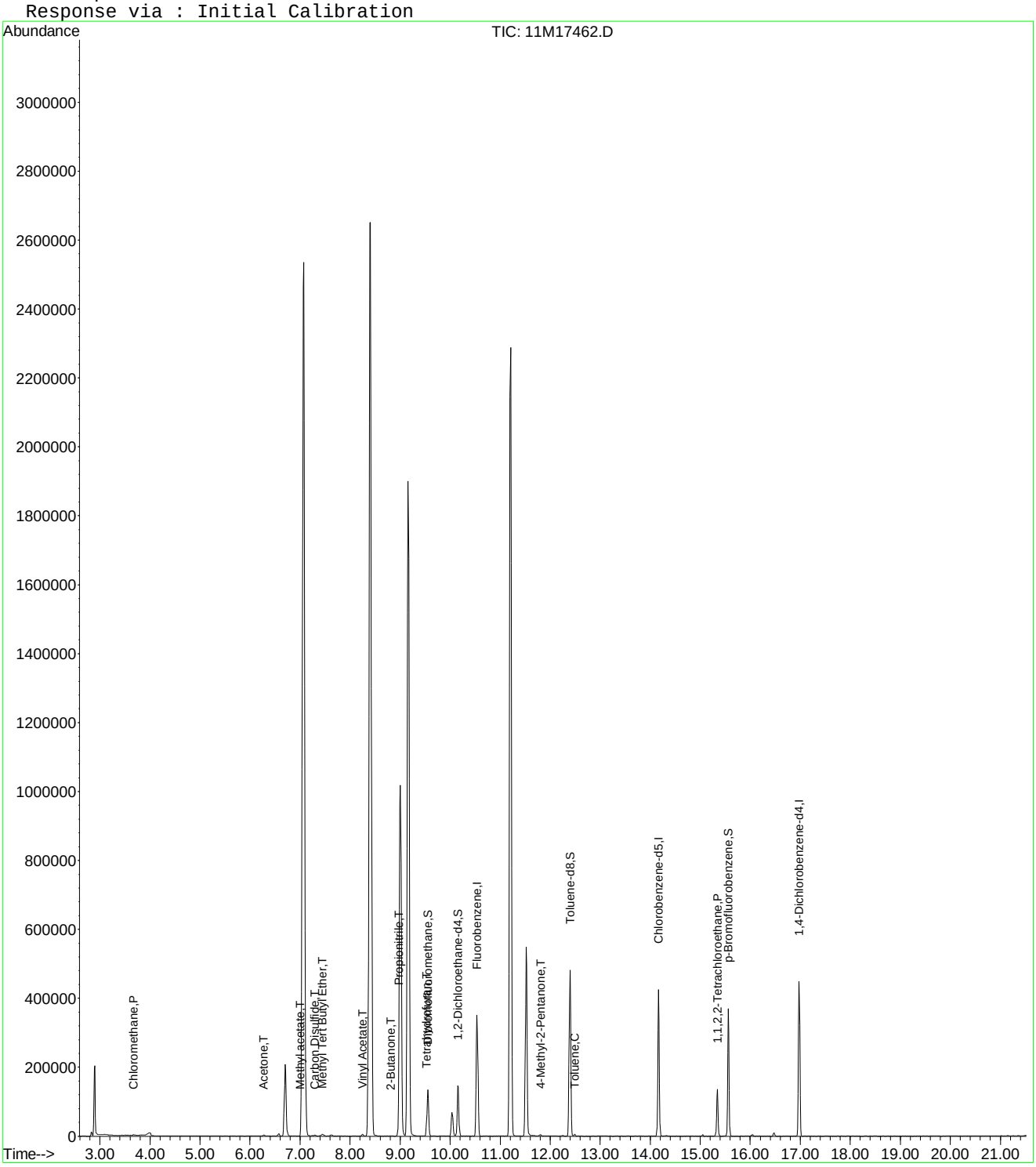
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106259	25.3144	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.24%			
43) 1,2-Dichloroethane-d4	10.15	65	123943	23.1414	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 92.56%			
57) Toluene-d8	12.40	98	411573	25.6539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.60%			
78) p-Bromofluorobenzene	15.56	95	151173	24.3188	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 97.28%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1293	0.1594	ug/L	99
13) Acetone	6.27	43	6921	4.2542	ug/L	90
18) Methyl acetate	7.00	43	726	0.1591	ug/L #	65
20) Carbon Disulfide	7.29	76	2261	0.1614	ug/L #	73
22) Methyl Tert Butyl Ether	7.44	73	9257	0.6538	ug/L	98
26) Vinyl Acetate	8.25	43	10807	1.0376	ug/L #	86
29) 2-Butanone	8.81	43	1338	0.5129	ug/L #	55
30) Propionitrile	8.97	54	189	0.2276	ug/L #	1
36) Tetrahydrofuran	9.53	42	1093	0.5949	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	707	0.3194	ug/L #	40
58) Toluene	12.49	91	6136	0.3054	ug/L	96
77) 1,1,2,2-Tetrachloroethane	15.34	83	5881	1.0548	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17462.D 8260WT.M Tue Apr 11 22:09:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:54 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

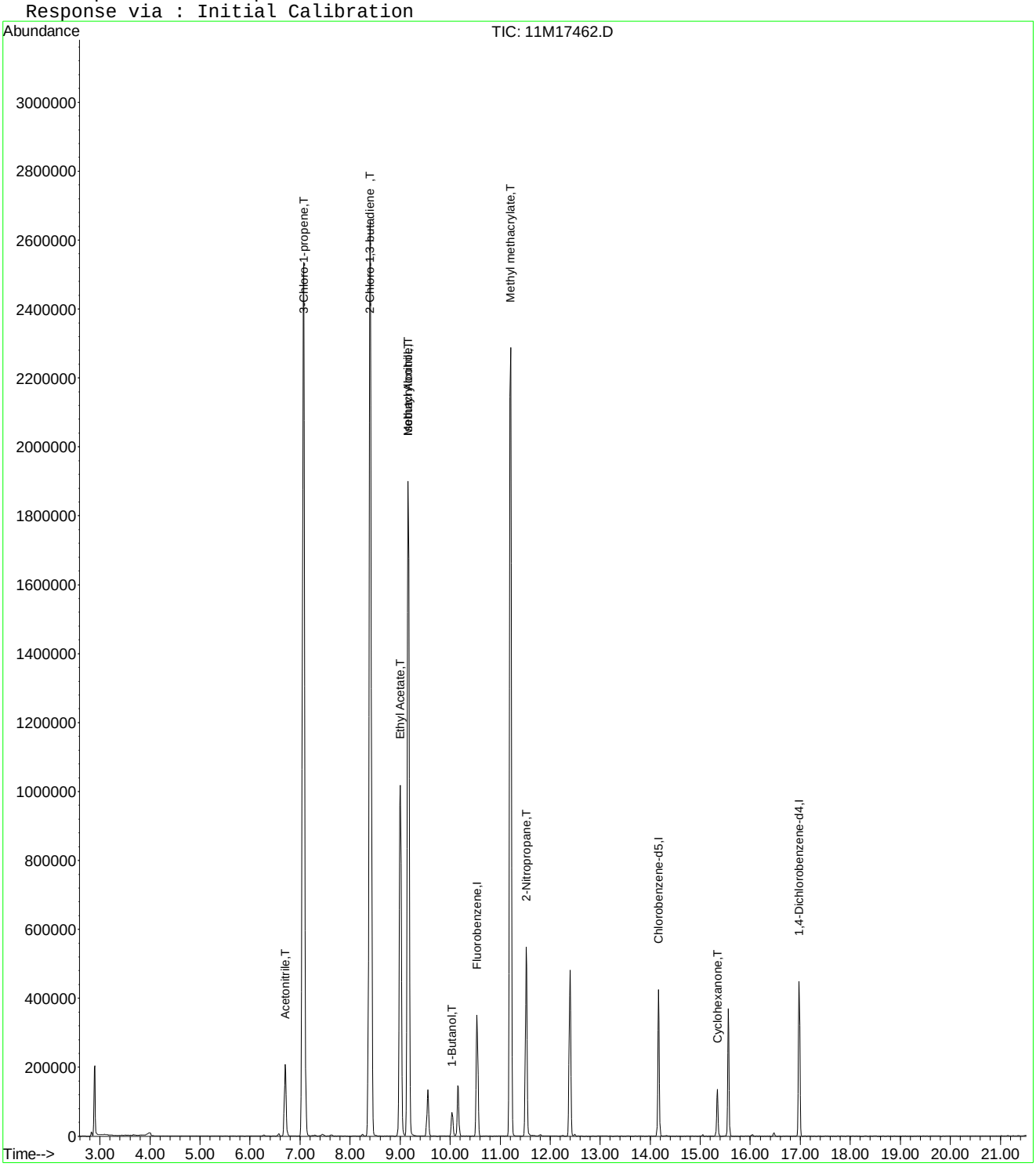
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	403856	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	286559	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	149973	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	281651	413.0735	ug/L		98
3) 3-Chloro-1-propene	7.07	41	2690047	331.7300	ug/L		64
4) 2-Chloro-1,3-butadiene	8.40	53	2460691	350.1845	ug/L		67
5) Methacrylonitrile	9.16	41	1244299	382.2500	ug/L		70
6) Isobutyl Alcohol	9.16	43	201547	864.5299	ug/L		87
7) 1-Butanol	10.04	56	51492	396.8081	ug/L	#	80
8) Cyclohexanone	15.34	55	75425	395.9741	ug/L	#	85
9) 2-Nitropropane	11.52	43	505423	412.4553	ug/L		93
10) Ethyl Acetate	9.01	43	1632644	372.5201	ug/L	#	84
11) Methyl methacrylate	11.21	41	1521562	376.7630	ug/L		68

(#) = qualifier out of range (m) = manual integration
11M17462.D A9FOOWT.M Fri Apr 21 13:34:54 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17462.D Vial: 8
Acq On : 11 Apr 2017 21:47 Operator: FJB
Sample : WG609769-08 400ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39:11 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

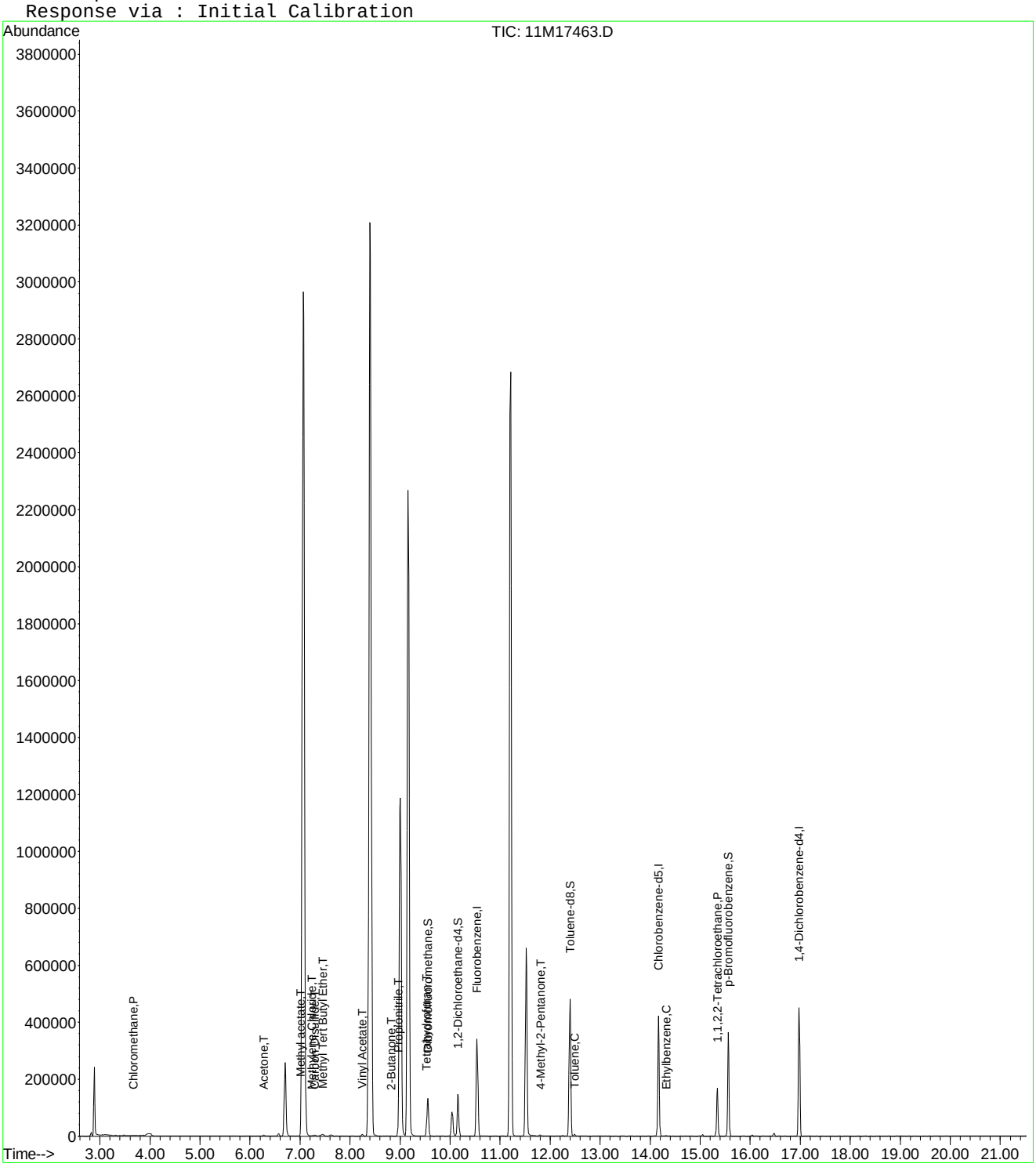
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	106074	25.8808	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.52%			
43) 1,2-Dichloroethane-d4	10.15	65	123547	23.6248	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 94.48%			
57) Toluene-d8	12.40	98	409774	25.8060	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.24%			
78) p-Bromofluorobenzene	15.56	95	148708	23.3407	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 93.36%			
Target Compounds						Qvalue
3) Chloromethane	3.67	50	1661	0.2097	ug/L #	74
13) Acetone	6.28	43	7987	5.0280	ug/L	98
18) Methyl acetate	7.01	43	1700	0.3816	ug/L #	65
19) Methylene Chloride	7.24	84	1079	0.2037	ug/L	78
20) Carbon Disulfide	7.29	76	2617	0.1913	ug/L #	73
22) Methyl Tert Butyl Ether	7.46	73	11856	0.8576	ug/L	94
26) Vinyl Acetate	8.24	43	14104	1.3868	ug/L #	91
29) 2-Butanone	8.82	43	1665	0.6537	ug/L #	55
30) Propionitrile	8.96	54	198	0.2442	ug/L #	1
36) Tetrahydrofuran	9.53	42	768	0.4281	ug/L #	41
53) 4-Methyl-2-Pentanone	11.81	58	1108	0.5127	ug/L #	40
58) Toluene	12.49	91	7820	0.3932	ug/L	90
70) Ethylbenzene	14.32	106	907	0.1268	ug/L	92
77) 1,1,2,2-Tetrachloroethane	15.34	83	7437	1.3015	ug/L #	18

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 11 22:39 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

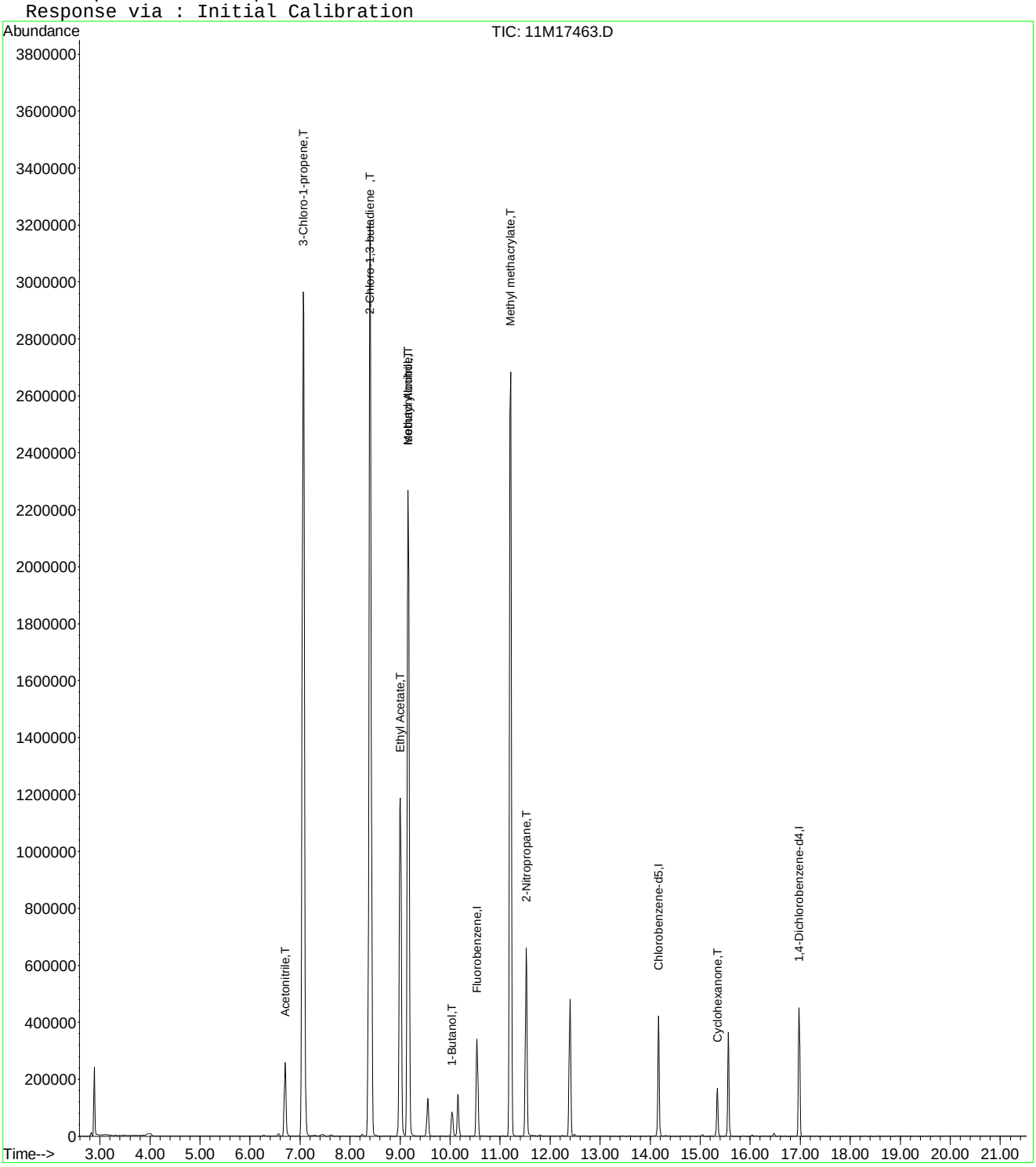
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394330	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	283625	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	153710	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	341698	513.2456	ug/L		99
3) 3-Chloro-1-propene	7.06	41	3087243	389.9082	ug/L		59
4) 2-Chloro-1,3-butadiene	8.40	53	2864759	417.5367	ug/L		64
5) Methacrylonitrile	9.16	41	1464306	460.7032	ug/L		68
6) Isobutyl Alcohol	9.16	43	247135	1085.6871	ug/L		87
7) 1-Butanol	10.04	56	64790	499.0454	ug/L	#	78
8) Cyclohexanone	15.34	55	96839	513.3157	ug/L	#	84
9) 2-Nitropropane	11.52	43	616392	515.1641	ug/L		94
10) Ethyl Acetate	9.01	43	1900376	444.0833	ug/L	#	82
11) Methyl methacrylate	11.21	41	1764954	447.5883	ug/L		66

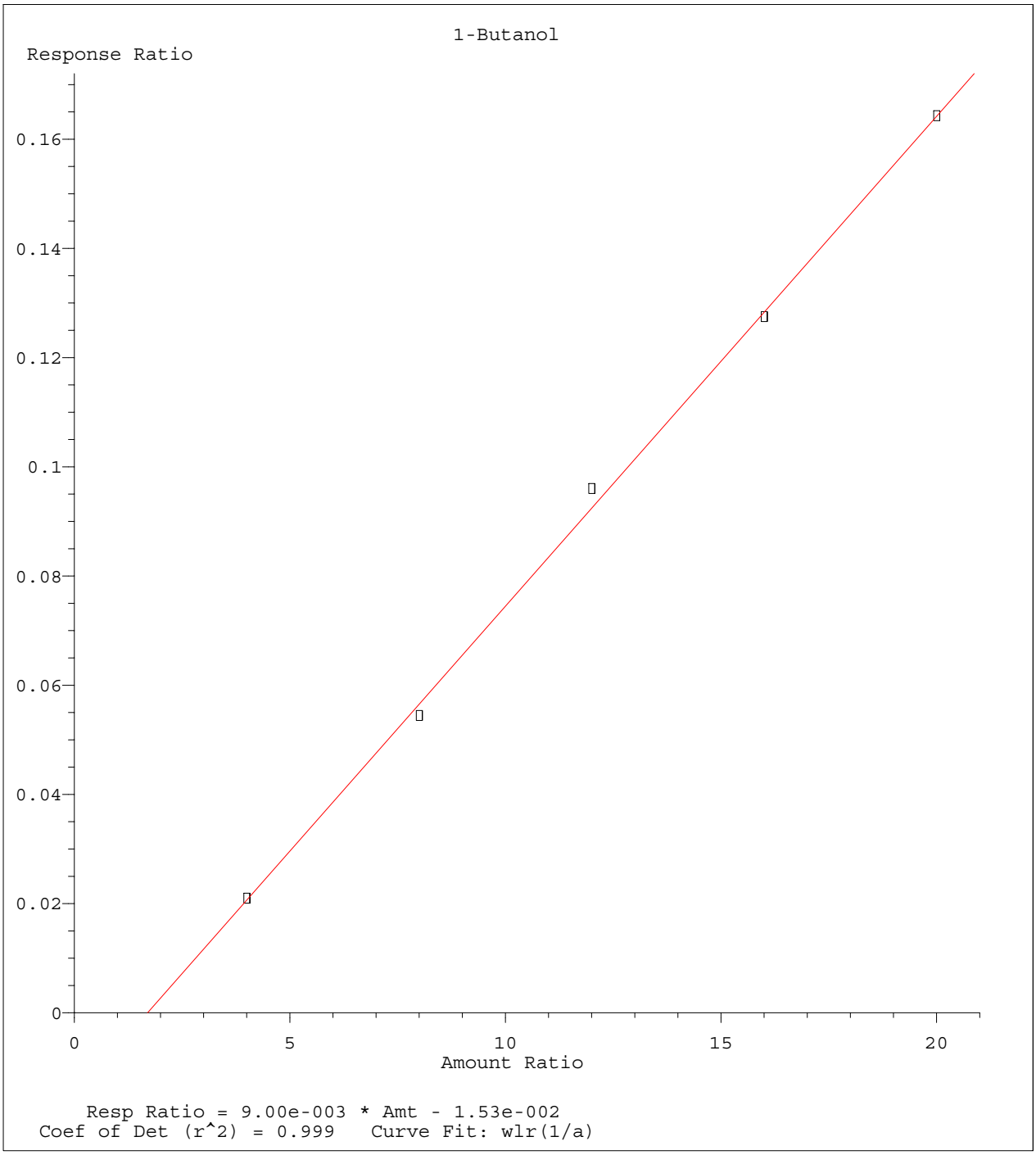
(#) = qualifier out of range (m) = manual integration
11M17463.D A9FOOWT.M Fri Apr 21 13:34:55 2017 Page 1

Quantitation Report (Not Reviewed)

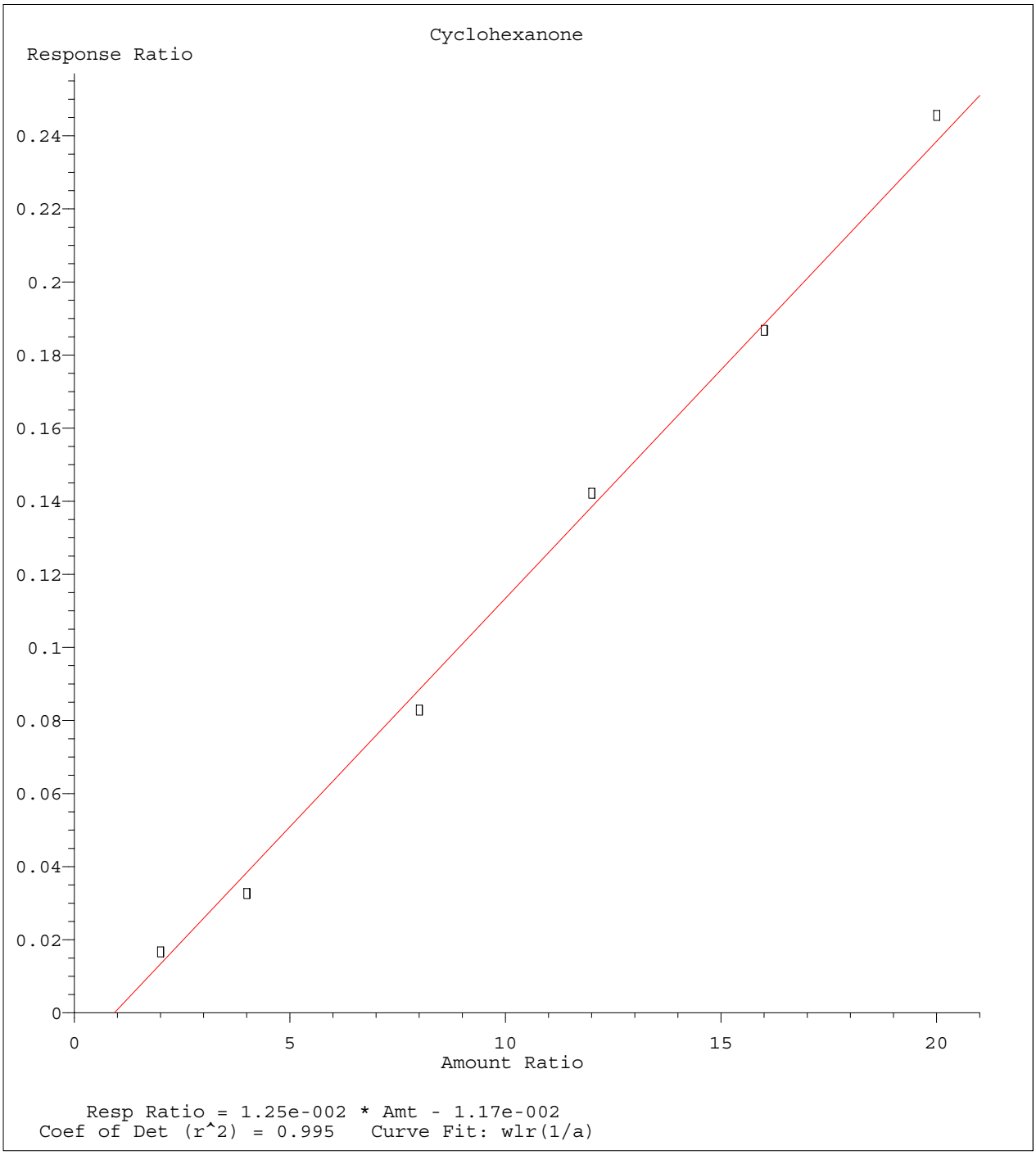
Data File : C:\MSDCHEM\1\DATA\041117\11M17463.D Vial: 9
Acq On : 11 Apr 2017 22:17 Operator: FJB
Sample : WG609769-09 500ug/L STD A9 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration





Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017



Method Name: C:\MSDCHEM\1\METHODS\A9FOOWT.M
Calibration Table Last Updated: Fri Apr 21 13:34:21 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 00:08:29 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

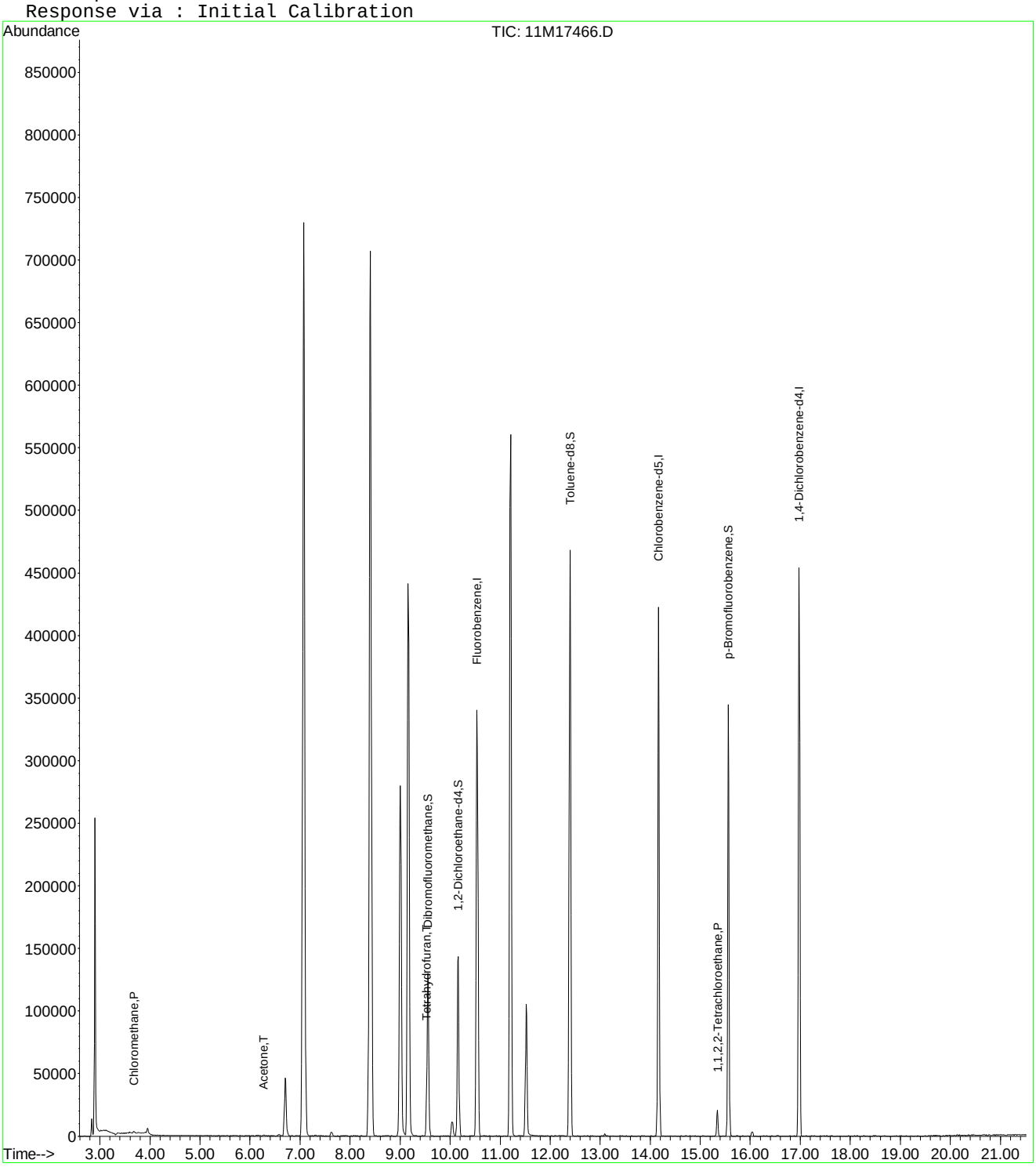
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.55	111	104183	25.3905	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.56%			
43) 1,2-Dichloroethane-d4	10.16	65	122221	23.3447	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 93.36%			
57) Toluene-d8	12.40	98	399954	25.0423	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.16%			
78) p-Bromofluorobenzene	15.56	95	141009	22.5068	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 90.04%			
Target Compounds						Qvalue
3) Chloromethane	3.68	50	1043	0.1316	ug/L	92
13) Acetone	6.27	43	1337	0.8407	ug/L #	46
36) Tetrahydrofuran	9.53	42	231	0.1286	ug/L #	41
77) 1,1,2,2-Tetrachloroethane	15.35	83	776	0.1381	ug/L #	18

(#) = qualifier out of range (m) = manual integration
11M17466.D 8260WT.M Wed Apr 12 00:08:29 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 12 0:08 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 032417 HPMS11
Last Update : Sat Mar 25 12:46:14 2017
Response via : Initial Calibration



11M17466.D 8260WT.M Wed Apr 12 00:08:30 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34:57 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

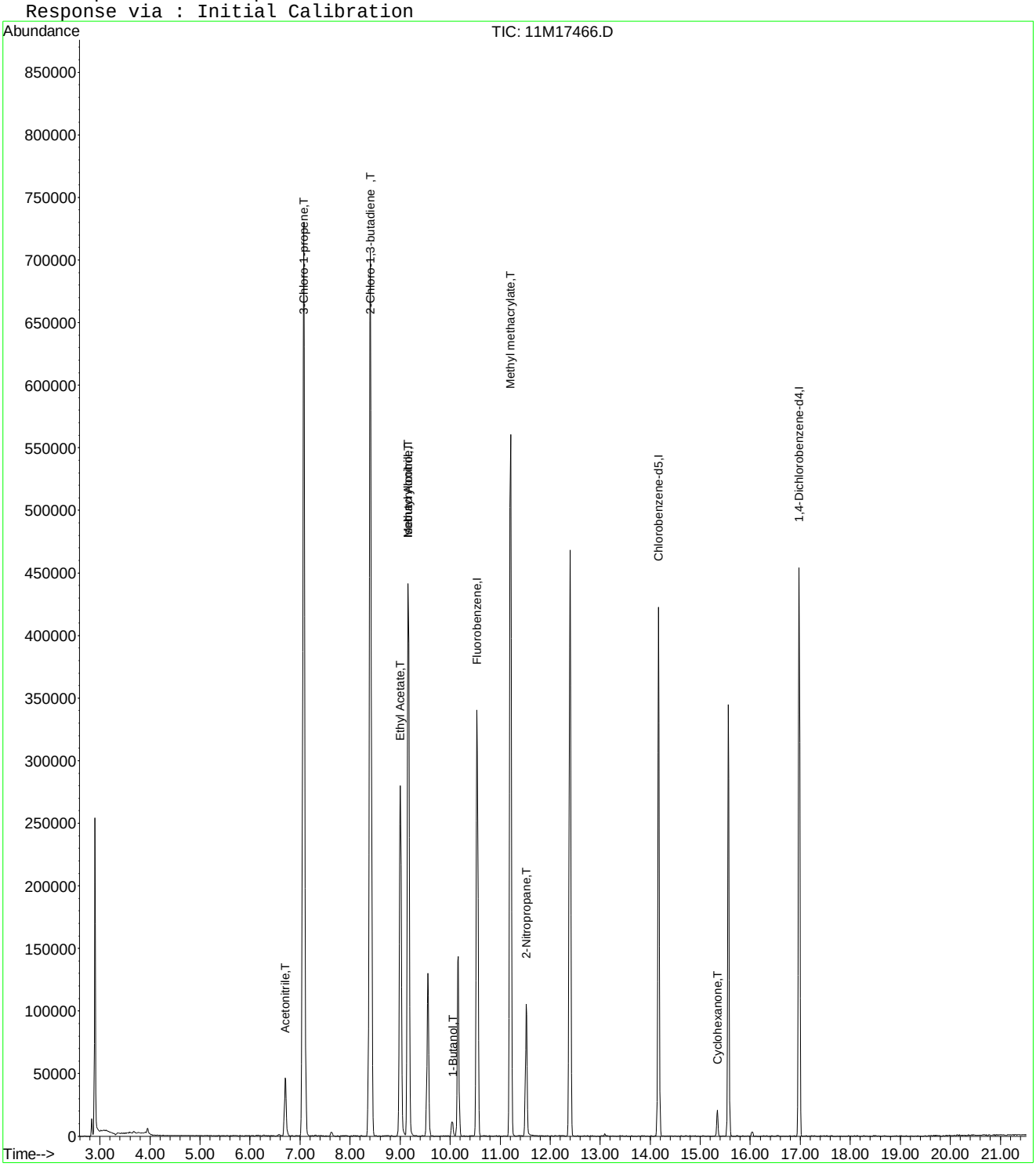
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.54	96	394778	25.00	ug/L		0.00
12) Chlorobenzene-d5	14.17	117	285271	25.00	ug/L		0.00
13) 1,4-Dichlorobenzene-d4	16.98	152	151152	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.70	41	63420	95.1516	ug/L		98
3) 3-Chloro-1-propene	7.07	41	795836	100.3973	ug/L		80
4) 2-Chloro-1,3-butadiene	8.41	53	687438	100.0799	ug/L		79
5) Methacrylonitrile	9.16	41	302024	94.9156	ug/L		77
6) Isobutyl Alcohol	9.16	43	44330	194.5248	ug/L		86
7) 1-Butanol	10.05	56	8714	103.9348	ug/L	#	83
8) Cyclohexanone	15.34	55	12464	86.3629	ug/L	#	89
9) 2-Nitropropane	11.52	43	94805	79.1456	ug/L		94
10) Ethyl Acetate	9.01	43	448775	104.7515	ug/L	#	90
11) Methyl methacrylate	11.21	41	388983	98.5333	ug/L		76

(#) = qualifier out of range (m) = manual integration
11M17466.D A9FOOWT.M Fri Apr 21 13:34:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 21 13:34 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\041117\11M17466.D Vial: 12
Acq On : 11 Apr 2017 23:46 Operator: FJB
Sample : WG609769-10 100ug/L ICV A9 Inst : hpms11
Misc : 1,1 STD81404 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	97	0.00
2	T	Acetonitrile	100.0000	95.1516	4.8	97	-0.01
3	T	3-Chloro-1-propene	100.0000	100.3973	-0.4	90	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	100.0799	-0.1	90	0.00
5	T	Methacrylonitrile	100.0000	94.9156	5.1	89	0.00
6	T	Isobutyl Alcohol	200.0000	194.5248	2.7	106	-0.01
7	T	1-Butanol	100.0000	103.9348	-3.9	102	0.01
8	T	Cyclohexanone	100.0000	86.3629	13.6	94	0.00
9	T	2-Nitropropane	100.0000	79.1456	20.9	82	0.00
10	T	Ethyl Acetate	100.0000	104.7515	-4.8	98	0.00
11	T	Methyl methacrylate	100.0000	98.5332	1.5	90	0.00
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	99	0.00
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17466.D A9FOOWT.M Fri Apr 21 13:35:16 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	407936	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	286002	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	135961	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.22	85	1456	0.4952	ug/L #	68
3) Chloromethane	3.66	50	2818	Below Cal		94
4) Vinyl Chloride	3.89	62	1026	0.2930	ug/L #	43
5) 1,3-Butadiene	3.94	54	1048	Below Cal #		49
6) Bromomethane	4.79	94	1550	0.4288	ug/L	89
7) Chloroethane	4.93	64	452	0.1246	ug/L #	43
8) Trichlorofluoromethane	5.42	101	1600	0.2616	ug/L #	36
10) Isoprene	5.96	67	1639	0.2586	ug/L	74
14) 1,1-Dichloroethene	6.47	61	2095	0.2876	ug/L	85
16) Dimethyl Sulfide	6.73	62	1703	0.2976	ug/L	79
18) Methyl acetate	6.99	43	821	0.1908	ug/L #	66
19) Methylene Chloride	7.23	84	1555	0.3199	ug/L	78
20) Carbon Disulfide	7.28	76	4247	0.3410	ug/L	96
22) Methyl Tert Butyl Ether	7.44	73	3535	0.2904	ug/L #	69
23) trans-1,2-Dichloroethene	7.67	96	1342	0.3027	ug/L	89
24) n-Hexane	7.72	57	1979	0.2878	ug/L #	71
26) Vinyl Acetate	8.24	43	2384	0.2881	ug/L #	78
27) 1,1-Dichloroethane	8.26	63	2770	0.2964	ug/L #	59
31) 2,2-Dichloropropane	9.01	77	1778	0.2811	ug/L #	42
32) cis-1,2-Dichloroethene	9.07	96	1403	0.2820	ug/L	82
33) Chloroform	9.25	83	3255	0.2466	ug/L	94
35) Bromochloromethane	9.48	130	565	0.1852	ug/L #	34
36) Tetrahydrofuran	9.51	42	4820	2.6551	ug/L	94
38) 1,1,1-Trichloroethane	9.76	97	2073	0.3146	ug/L #	49
39) Cyclohexane	9.79	56	2645	0.2855	ug/L #	82
40) 1,1-Dichloropropene	9.96	75	1488	0.2577	ug/L #	38
41) Carbon Tetrachloride	10.08	117	1234	0.2165	ug/L #	68
44) 1,2-Dichloroethane	10.25	62	1821	0.2856	ug/L #	60
45) Benzene	10.29	78	6292	0.3517	ug/L	88
46) Trichloroethene	11.00	130	1256	0.2678	ug/L	89
47) Methylcyclohexane	11.07	83	2187	0.3042	ug/L #	81
48) 1,2-Dichloropropane	11.19	63	1237	0.2222	ug/L #	67
50) Bromodichloromethane	11.48	83	1657	0.2852	ug/L #	73
51) Dibromomethane	11.56	93	446	0.1693	ug/L #	31
52) 2-Chloroethyl Vinyl Ether	11.76	63	514	0.1690	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	1951	0.2831	ug/L #	80
55) Dimethyl Disulfide	12.32	79	694	0.1613	ug/L	59
58) Toluene	12.47	91	6620	0.3575	ug/L	85
59) Ethyl Methacrylate	12.55	69	975	0.1916	ug/L	63
60) trans-1,3-Dichloropropene	12.64	75	1504	0.2573	ug/L #	75

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:44 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

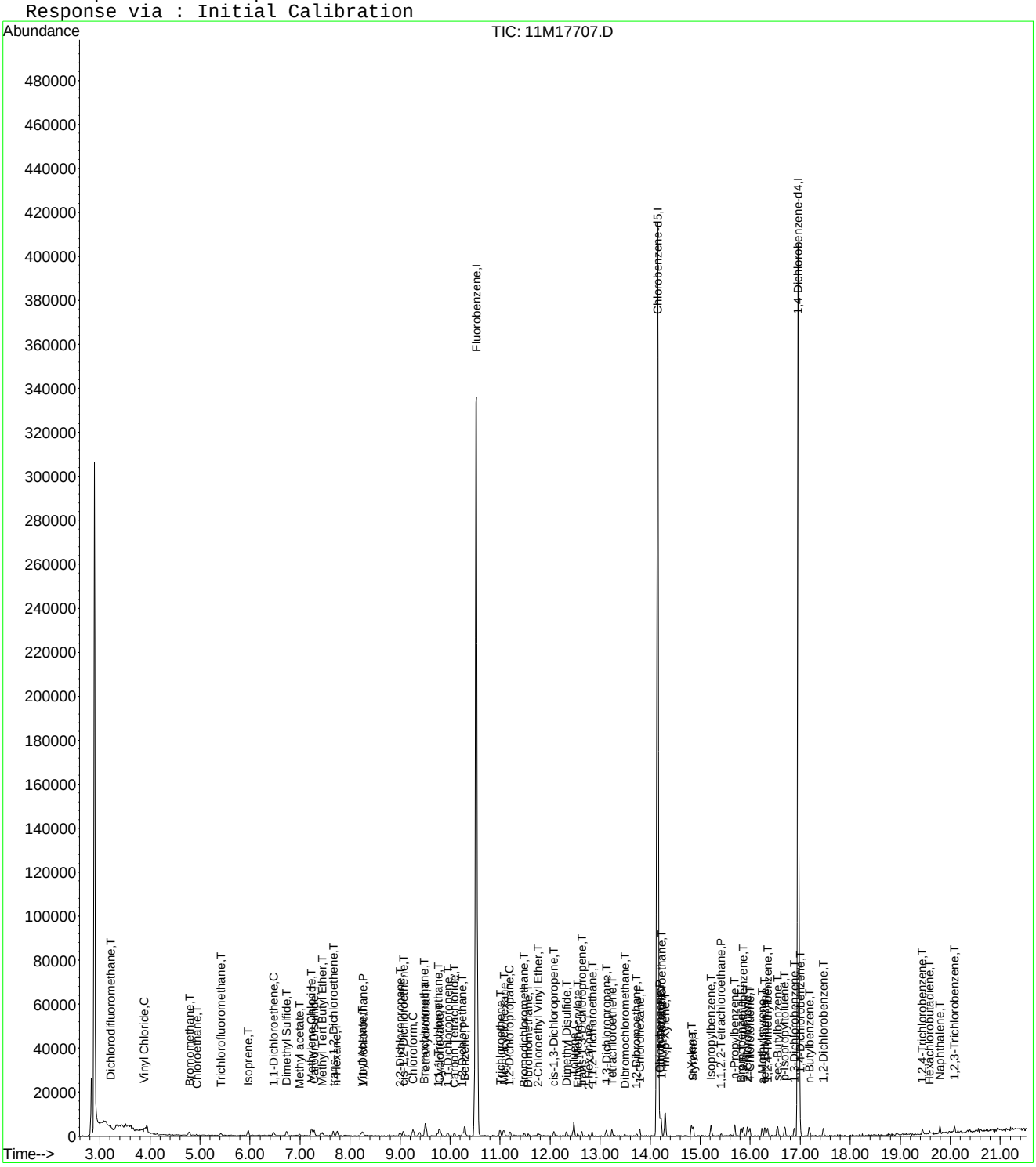
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
61)	1,1,2-Trichloroethane	12.84	97	834	0.2135 ug/L		89
62)	2-Hexanone	12.77	43	717	0.2209 ug/L	#	25
63)	1,3-Dichloropropane	13.12	76	2317	0.3571 ug/L		84
64)	Tetrachloroethene	13.25	164	1130	0.3074 ug/L		70
65)	Dibromochloromethane	13.49	129	1211	0.2781 ug/L	#	55
66)	1,2-Dibromoethane	13.72	107	718	0.2045 ug/L		68
67)	1-Chlorohexane	13.79	91	1457	0.2761 ug/L		89
68)	Chlorobenzene	14.20	112	4403	0.3739 ug/L		89
69)	1,1,1,2-Tetrachloroethane	14.23	131	1170	0.2669 ug/L		77
70)	Ethylbenzene	14.22	106	1776	0.2852 ug/L		61
71)	m-,p-Xylene	14.30	106	4931	0.6618 ug/L		85
72)	o-Xylene	14.83	106	2270	0.3024 ug/L		85
73)	Styrene	14.86	104	2939	0.2641 ug/L		92
75)	Isopropylbenzene	15.22	105	5572	0.3042 ug/L		99
77)	1,1,2,2-Tetrachloroethane	15.42	83	1387	0.3245 ug/L		85
81)	n-Propylbenzene	15.69	91	6224	0.3266 ug/L		99
82)	Bromobenzene	15.82	156	1353	0.2918 ug/L		71
83)	1,3,5-Trimethylbenzene	15.86	105	4376	0.3357 ug/L		99
84)	2-Chlorotoluene	15.94	91	4736	0.3661 ug/L		75
85)	4-Chlorotoluene	16.00	91	4248	0.3638 ug/L		99
86)	a-Methylstyrene	16.24	118	1829	0.2546 ug/L		88
87)	tert-Butylbenzene	16.29	134	845	0.2666 ug/L		62
88)	1,2,4-Trimethylbenzene	16.35	105	4414	0.3237 ug/L		83
89)	sec-Butylbenzene	16.54	105	5762	0.3347 ug/L	#	74
90)	p-Isopropyltoluene	16.69	119	4204	0.3039 ug/L		87
91)	1,3-Dichlorobenzene	16.88	146	3109	0.3769 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	3081	0.3473 ug/L	#	69
93)	n-Butylbenzene	17.18	91	4116	0.3336 ug/L	#	90
94)	1,2-Dichlorobenzene	17.46	146	2641	0.3173 ug/L		96
96)	1,2,4-Trichlorobenzene	19.44	180	1873	0.3134 ug/L	#	45
97)	Hexachlorobutadiene	19.58	225	943	0.2975 ug/L	#	42
98)	Naphthalene	19.79	128	4408	0.3307 ug/L	#	77
99)	1,2,3-Trichlorobenzene	20.08	180	2183	0.3571 ug/L	#	77

(#) = qualifier out of range (m) = manual integration
11M17707.D 8260WT.M Tue Apr 25 14:17:09 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17707.D Vial: 2
Acq On : 24 Apr 2017 17:01 Operator: JDS
Sample : WG611320-02 .3ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:12:12 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	-3.8239	0.0	0	0.01
3	P	Chloromethane	-1.0000	-1.3371	0.0	0	0.00
4	C	Vinyl Chloride	-1.0000	0.2930	0.0	100	0.00
5	T	1,3-Butadiene	-1.0000	-8.0076	0.0	0	0.01
6	T	Bromomethane	-1.0000	0.4288	0.0	100	0.01
7	T	Chloroethane	-1.0000	0.1246	0.0	100	0.00
8	T	Trichlorofluoromethane	-1.0000	0.2616	0.0	100	0.01
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-5.92#
10	T	Isoprene	-1.0000	0.2586	0.0	100	-0.01
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.15#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.0000	0.0	0	-6.16#
13	T	Acetone	-1.0000	0.0000	0.0	0	-6.26#
14	C	1,1-Dichloroethene	-1.0000	0.2876	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-6.57#
16	T	Dimethyl Sulfide	-1.0000	0.2976	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.0000	0.0	0	-6.98#
18	T	Methyl acetate	-1.0000	0.1908	0.0	100	0.01
19	T	Methylene Chloride	-1.0000	0.3199	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3410	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.40#
22	T	Methyl Tert Butyl Ether	-1.0000	0.2904	0.0	100	0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.3027	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.2878	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.06#
26	T	Vinyl Acetate	-1.0000	0.2881	0.0	100	0.01
27	P	1,1-Dichloroethane	-1.0000	0.2964	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-8.61#
29	T	2-Butanone	-1.0000	0.0974	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-8.89#
31	T	2,2-Dichloropropane	-1.0000	0.2811	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2820	0.0	100	0.00
33	C	Chloroform	0.3000	0.2466	17.8	100	0.00
34	T	1-Bromopropane	-1.0000	0.0000	0.0	0	-9.39#
35	T	Bromochloromethane	-1.0000	0.1852	0.0	0	0.00
36	T	Tetrahydrofuran	-1.0000	2.6551	0.0	100	0.01
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	-1.0000	0.3146	0.0	0	0.00
39	T	Cyclohexane	-1.0000	0.2855	0.0	0	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.2577	0.0	0	0.01
41	T	Carbon Tetrachloride	-1.0000	0.2165	0.0	0	-0.01
42	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.05#
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	-1.0000	0.2856	0.0	0	0.00
45	T	Benzene	-1.0000	0.3517	0.0	0	0.00
46	T	Trichloroethene	-1.0000	0.2678	0.0	0	0.00
47	T	Methylcyclohexane	-1.0000	0.3042	0.0	0	0.00
48	C	1,2-Dichloropropane	-1.0000	0.2222	0.0	0	-0.01
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	-1.0000	0.2852	0.0	0	-0.01
51	T	Dibromomethane	-1.0000	0.1693	0.0	0	-0.01
52	T	2-Chloroethyl Vinyl Ether	-1.0000	0.1690	0.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-11.79#
54	T	cis-1,3-Dichloropropene	-1.0000	0.2831	0.0	0	0.00
55	T	Dimethyl Disulfide	-1.0000	0.1613	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	-1.0000	0.3575	0.0	100	0.00	
59	T	Ethyl Methacrylate	-1.0000	0.1916	0.0	0	0.00	
60	T	trans-1,3-Dichloropropene	-1.0000	0.2573	0.0	0	0.00	
61	T	1,1,2-Trichloroethane	-1.0000	0.2135	0.0	0	0.00	
62	T	2-Hexanone	-1.0000	0.2209	0.0	100	0.00	
63	T	1,3-Dichloropropane	-1.0000	0.3571	0.0	0	0.00	
64	T	Tetrachloroethene	-1.0000	0.3074	0.0	0	0.01	
65	T	Dibromochloromethane	-1.0000	0.2781	0.0	0	0.00	
66	T	1,2-Dibromoethane	-1.0000	0.2045	0.0	0	-0.01	
67	T	1-Chlorohexane	-1.0000	0.2761	0.0	0	0.00	
68	P	Chlorobenzene	-1.0000	0.3739	0.0	0	0.00	
69	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2669	0.0	0	0.01	
70	C	Ethylbenzene	-1.0000	0.2852	0.0	0	0.00	
71	T	m-,p-Xylene	-1.0000	0.6618	0.0	0	0.00	
72	T	o-Xylene	-1.0000	0.3024	0.0	0	0.00	
73	T	Styrene	-1.0000	0.2641	0.0	0	0.00	
74	P	Bromoform	-1.0000	0.0641	0.0	0	0.01	
75	T	Isopropylbenzene	-1.0000	0.3042	0.0	0	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3245	0.0	0	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-15.60#	
80	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-15.63#	
81	T	n-Propylbenzene	-1.0000	0.3266	0.0	0	0.00	
82	T	Bromobenzene	0.3000	0.2918	2.7	100	0.00	
83	T	1,3,5-Trimethylbenzene	-1.0000	0.3357	0.0	0	0.00	
84	T	2-Chlorotoluene	-1.0000	0.3661	0.0	0	0.00	
85	T	4-Chlorotoluene	-1.0000	0.3641	0.0	0	0.01	
86	T	a-Methylstyrene	-1.0000	0.2546	0.0	0	0.01	
87	T	tert-Butylbenzene	-1.0000	0.2666	0.0	0	-0.01	
88	T	1,2,4-Trimethylbenzene	-1.0000	0.3237	0.0	0	0.00	
89	T	sec-Butylbenzene	-1.0000	0.3347	0.0	0	0.00	
90	T	p-Isopropyltoluene	-1.0000	0.3039	0.0	0	0.00	
91	T	1,3-Dichlorobenzene	-1.0000	0.3769	0.0	0	0.01	
92	T	1,4-Dichlorobenzene	-1.0000	0.3473	0.0	0	0.00	
93	T	n-Butylbenzene	-1.0000	0.3326	0.0	0	0.01	
94	T	1,2-Dichlorobenzene	0.3000	0.3173	-5.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-18.38#	
96	T	1,2,4-Trichlorobenzene	-1.0000	0.3134	0.0	0	-0.01	
97	T	Hexachlorobutadiene	-1.0000	0.2975	0.0	0	0.00	
98	T	Naphthalene	-1.0000	0.3307	0.0	0	0.00	
99	T	1,2,3-Trichlorobenzene	0.3000	0.3570	-19.0	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17707.D 8260WT.M Tue Apr 25 11:12:33 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	429611	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	306087	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158073	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1957	0.5753	ug/L #	68
3) Chloromethane	3.65	50	4970	0.2199	ug/L	80
4) Vinyl Chloride	3.89	62	1663	0.4510	ug/L #	67
5) 1,3-Butadiene	3.94	54	1211	Below Cal	#	28
6) Bromomethane	4.78	94	2124	0.5579	ug/L	92
7) Chloroethane	4.92	64	1272	0.3330	ug/L #	43
8) Trichlorofluoromethane	5.41	101	2206	0.3425	ug/L	75
10) Isoprene	5.96	67	2233	0.3346	ug/L	93
12) 1,1,2-Trichloro-1,2,2-Trif	6.18	101	1328	0.3481	ug/L	76
14) 1,1-Dichloroethene	6.47	61	3243	0.4227	ug/L	75
16) Dimethyl Sulfide	6.73	62	2464	0.4088	ug/L	92
18) Methyl acetate	6.98	43	1720	0.3796	ug/L #	66
19) Methylene Chloride	7.23	84	2350	0.4591	ug/L	83
20) Carbon Disulfide	7.28	76	6928	0.5281	ug/L	93
22) Methyl Tert Butyl Ether	7.43	73	4710	0.3674	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	2044	0.4378	ug/L	97
24) n-Hexane	7.72	57	2506	0.3461	ug/L #	71
26) Vinyl Acetate	8.23	43	3174	0.3642	ug/L #	78
27) 1,1-Dichloroethane	8.25	63	4084	0.4150	ug/L #	81
31) 2,2-Dichloropropane	8.99	77	3153	0.4733	ug/L #	65
32) cis-1,2-Dichloroethene	9.06	96	2298	0.4386	ug/L	92
33) Chloroform	9.26	83	4687	0.4084	ug/L	99
35) Bromochloromethane	9.49	130	1188	0.3698	ug/L	82
36) Tetrahydrofuran	9.51	42	4867	2.5457	ug/L	93
38) 1,1,1-Trichloroethane	9.77	97	2706	0.3900	ug/L #	86
39) Cyclohexane	9.80	56	4021	0.4121	ug/L #	88
40) 1,1-Dichloropropene	9.95	75	2367	0.3892	ug/L	84
41) Carbon Tetrachloride	10.09	117	2174	0.3622	ug/L #	83
44) 1,2-Dichloroethane	10.26	62	2810	0.4184	ug/L #	69
45) Benzene	10.29	78	9018	0.4786	ug/L	97
46) Trichloroethene	10.99	130	2302	0.4661	ug/L	85
47) Methylcyclohexane	11.07	83	2842	0.3753	ug/L	95
48) 1,2-Dichloropropane	11.20	63	2544	0.4338	ug/L	89
50) Bromodichloromethane	11.49	83	2617	0.4278	ug/L #	85
51) Dibromomethane	11.56	93	1012	0.3648	ug/L	84
52) 2-Chloroethyl Vinyl Ether	11.76	63	790	0.2466	ug/L #	52
54) cis-1,3-Dichloropropene	12.08	75	2869	0.3953	ug/L	91
55) Dimethyl Disulfide	12.32	79	1058	0.2335	ug/L	89
58) Toluene	12.47	91	9432	0.4759	ug/L	91
59) Ethyl Methacrylate	12.55	69	1408	0.2585	ug/L	88

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:46 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

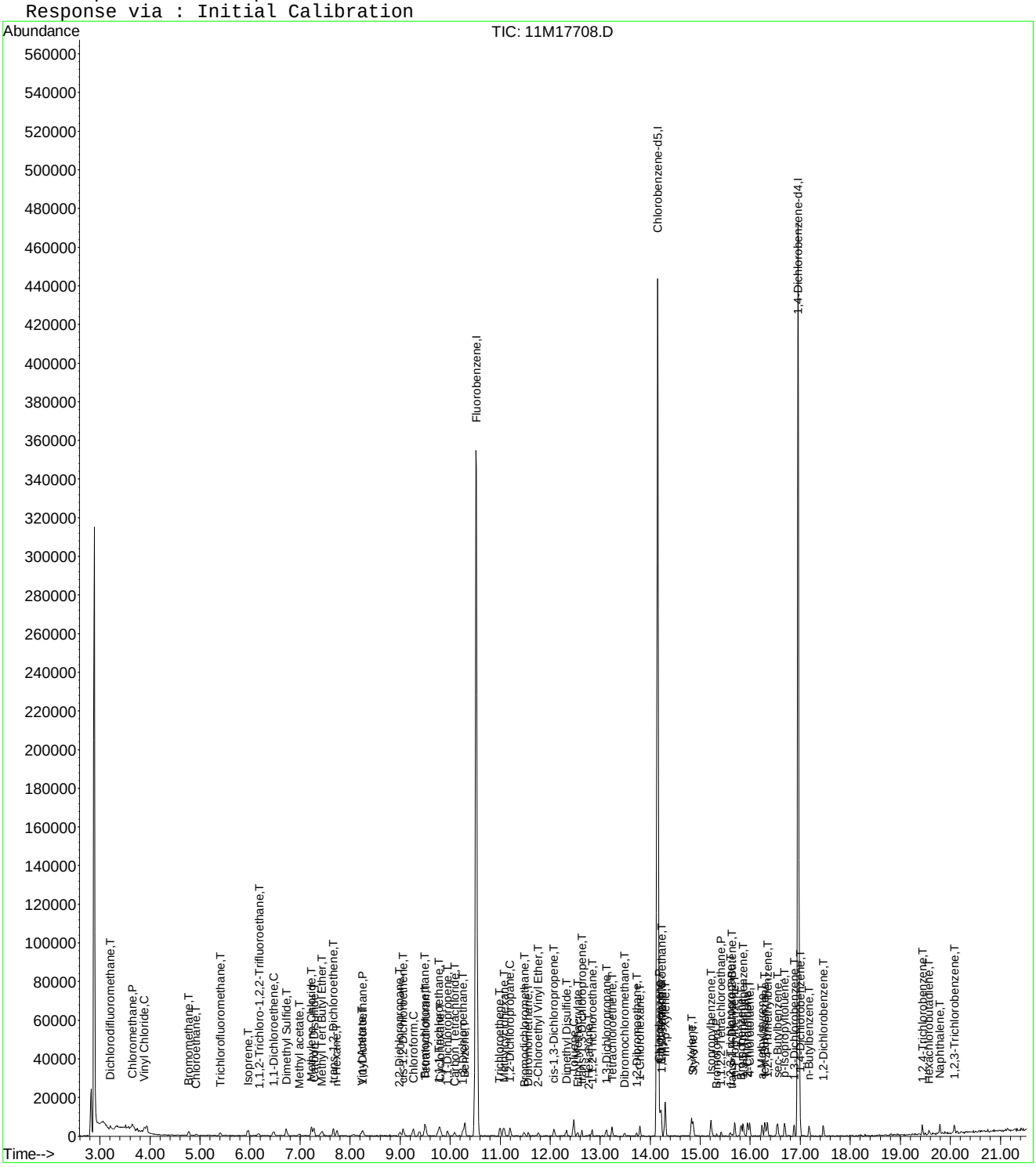
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
60)	trans-1,3-Dichloropropene	12.64	75	2241	0.3582 ug/L	#	76
61)	1,1,2-Trichloroethane	12.84	97	1632	0.3904 ug/L		81
62)	2-Hexanone	12.77	43	804	0.2315 ug/L	#	6
63)	1,3-Dichloropropane	13.12	76	2769	0.3988 ug/L		88
64)	Tetrachloroethene	13.25	164	1464	0.3722 ug/L		96
65)	Dibromochloromethane	13.48	129	1505	0.3229 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1347	0.3584 ug/L		95
67)	1-Chlorohexane	13.79	91	2178	0.3857 ug/L		95
68)	Chlorobenzene	14.19	112	5664	0.4494 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	1850	0.3943 ug/L		95
70)	Ethylbenzene	14.22	106	2675	0.4014 ug/L		59
71)	m-,p-Xylene	14.30	106	7039	0.8827 ug/L		83
72)	o-Xylene	14.83	106	3366	0.4189 ug/L		77
73)	Styrene	14.86	104	4411	0.3704 ug/L		84
74)	Bromoform	15.32	173	846	0.2533 ug/L	#	28
75)	Isopropylbenzene	15.22	105	9020	0.4602 ug/L		87
77)	1,1,2,2-Tetrachloroethane	15.42	83	2043	0.4111 ug/L		84
79)	1,2,3-Trichloropropane	15.60	110	485	0.3408 ug/L	#	30
80)	trans-1,4-Dichloro-2-Buten	15.63	53	454	0.2951 ug/L	#	51
81)	n-Propylbenzene	15.69	91	9041	0.4081 ug/L		94
82)	Bromobenzene	15.82	156	2014	0.3735 ug/L		59
83)	1,3,5-Trimethylbenzene	15.86	105	6098	0.4023 ug/L		97
84)	2-Chlorotoluene	15.94	91	6775	0.4504 ug/L		82
85)	4-Chlorotoluene	15.99	91	6069	0.4470 ug/L		86
86)	a-Methylstyrene	16.23	118	2595	0.3106 ug/L		92
87)	tert-Butylbenzene	16.28	134	1537	0.4171 ug/L		92
88)	1,2,4-Trimethylbenzene	16.35	105	6674	0.4210 ug/L		95
89)	sec-Butylbenzene	16.54	105	8349	0.4171 ug/L		87
90)	p-Isopropyltoluene	16.69	119	6602	0.4104 ug/L		94
91)	1,3-Dichlorobenzene	16.88	146	4328	0.4513 ug/L		91
92)	1,4-Dichlorobenzene	17.00	146	4872	0.4723 ug/L	#	47
93)	n-Butylbenzene	17.17	91	5874	0.4094 ug/L	#	84
94)	1,2-Dichlorobenzene	17.46	146	4243	0.4384 ug/L		83
96)	1,2,4-Trichlorobenzene	19.45	180	2551	0.3671 ug/L	#	64
97)	Hexachlorobutadiene	19.57	225	1261	0.3422 ug/L	#	55
98)	Naphthalene	19.79	128	6212	0.4009 ug/L	#	82
99)	1,2,3-Trichlorobenzene	20.08	180	2584	0.3635 ug/L		93

(#) = qualifier out of range (m) = manual integration
11M17708.D 8260WT.M Tue Apr 25 14:17:20 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17708.D Vial: 3
Acq On : 24 Apr 2017 17:30 Operator: JDS
Sample : WG611320-03 .4ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	427420	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	301358	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158168	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	12.38	98	215	0.0137	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	3845	0.9358	ug/L #	81
3) Chloromethane	3.65	50	8471	0.9175	ug/L	83
4) Vinyl Chloride	3.88	62	3091	0.8426	ug/L	92
5) 1,3-Butadiene	3.93	54	3188	0.4718	ug/L	79
6) Bromomethane	4.78	94	4082	1.0777	ug/L	82
7) Chloroethane	4.92	64	3226	0.8490	ug/L	98
8) Trichlorofluoromethane	5.39	101	5700	0.8894	ug/L	93
9) Diethyl ether	5.92	59	22406	4.7243	ug/L	97
10) Isoprene	5.96	67	5738	0.8642	ug/L	97
11) Acrolein	6.14	56	1635	2.1674	ug/L	77
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	3050	0.8036	ug/L	90
13) Acetone	6.26	43	1420	0.9936	ug/L #	41
14) 1,1-Dichloroethene	6.46	61	6804	0.8914	ug/L	94
15) Tert-Butyl Alcohol	6.59	59	4610	8.6243	ug/L #	67
16) Dimethyl Sulfide	6.73	62	5154	0.8595	ug/L	99
17) Iodomethane	6.98	142	1485	1.4857	ug/L #	35
18) Methyl acetate	6.98	43	4284	0.9504	ug/L #	75
19) Methylene Chloride	7.23	84	4729	0.9285	ug/L	86
20) Carbon Disulfide	7.27	76	13562	1.0391	ug/L	98
21) Acrylonitrile	7.39	53	4443	2.1049	ug/L	95
22) Methyl Tert Butyl Ether	7.42	73	12080	0.9472	ug/L	90
23) trans-1,2-Dichloroethene	7.66	96	4544	0.9782	ug/L	91
24) n-Hexane	7.74	57	5383	0.7472	ug/L #	71
25) Diisopropyl ether	8.07	45	96270	5.1833	ug/L	96
26) Vinyl Acetate	8.23	43	8211	0.9471	ug/L #	81
27) 1,1-Dichloroethane	8.25	63	9588	0.9793	ug/L #	90
28) Ethyl-Tert-Butyl ether	8.61	59	83324	5.0754	ug/L	95
29) 2-Butanone	8.79	43	1733	0.7421	ug/L #	56
30) Propionitrile	8.89	54	3388	4.3491	ug/L #	73
31) 2,2-Dichloropropane	9.00	77	6410	0.9672	ug/L	86
32) cis-1,2-Dichloroethene	9.06	96	4249	0.8152	ug/L	85
33) Chloroform	9.26	83	8839	0.9478	ug/L	98
34) 1-Bromopropane	9.40	122	455	0.7935	ug/L	52
35) Bromochloromethane	9.48	130	3059	0.9571	ug/L	91
36) Tetrahydrofuran	9.50	42	12470	6.5560	ug/L	96
38) 1,1,1-Trichloroethane	9.77	97	6166	0.8931	ug/L #	90
39) Cyclohexane	9.79	56	8715	0.8978	ug/L	98
40) 1,1-Dichloropropene	9.95	75	5779	0.9551	ug/L	87
41) Carbon Tetrachloride	10.08	117	5196	0.8702	ug/L	96
42) Tert-Amyl-Methyl ether	10.05	73	65688	4.9599	ug/L #	98

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:48 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

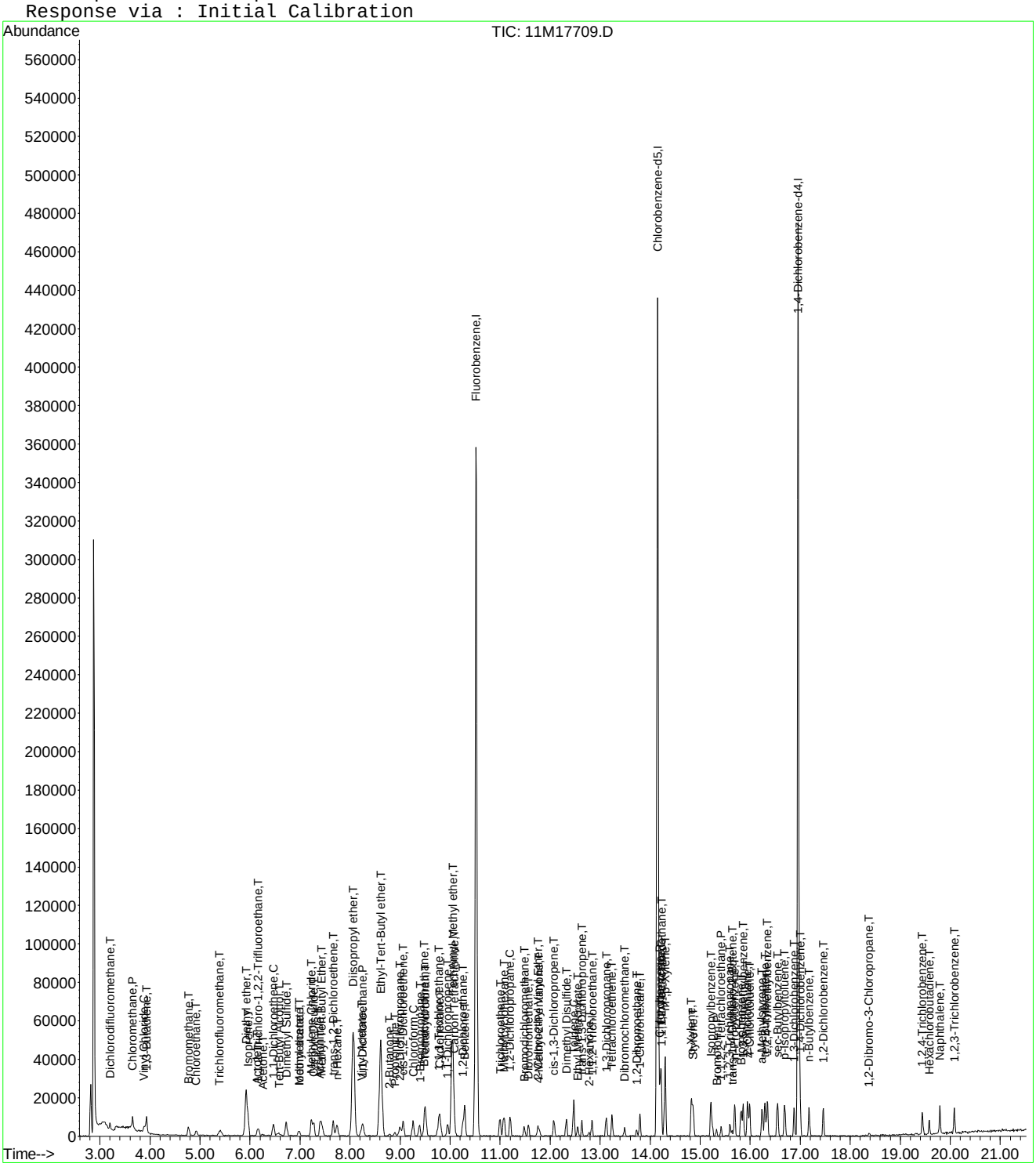
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	6781	1.0149 ug/L		85
45)	Benzene	10.29	78	19081	1.0179 ug/L		92
46)	Trichloroethene	11.00	130	4396	0.8947 ug/L		96
47)	Methylcyclohexane	11.07	83	6249	0.8295 ug/L		92
48)	1,2-Dichloropropane	11.20	63	5831	0.9995 ug/L		85
50)	Bromodichloromethane	11.49	83	5504	0.9043 ug/L	#	94
51)	Dibromomethane	11.57	93	2305	0.8352 ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	2865	0.8989 ug/L		82
53)	4-Methyl-2-Pentanone	11.78	58	1045	0.5092 ug/L	#	40
54)	cis-1,3-Dichloropropene	12.08	75	6764	0.9367 ug/L		91
55)	Dimethyl Disulfide	12.33	79	3035	0.6734 ug/L		97
58)	Toluene	12.47	91	18436	0.9449 ug/L		99
59)	Ethyl Methacrylate	12.55	69	4204	0.7840 ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	5326	0.8647 ug/L		86
61)	1,1,2-Trichloroethane	12.84	97	3956	0.9612 ug/L		97
62)	2-Hexanone	12.78	43	2630	0.7691 ug/L	#	72
63)	1,3-Dichloropropane	13.12	76	7049	1.0312 ug/L		96
64)	Tetrachloroethene	13.23	164	3174	0.8195 ug/L		78
65)	Dibromochloromethane	13.48	129	3914	0.8530 ug/L		94
66)	1,2-Dibromoethane	13.73	107	3225	0.8716 ug/L		97
67)	1-Chlorohexane	13.79	91	4282	0.7701 ug/L		88
68)	Chlorobenzene	14.20	112	12516	1.0087 ug/L		90
69)	1,1,1,2-Tetrachloroethane	14.23	131	4130	0.8940 ug/L		99
70)	Ethylbenzene	14.22	106	5925	0.9030 ug/L		65
71)	m-,p-Xylene	14.30	106	15635	1.9915 ug/L		84
72)	o-Xylene	14.82	106	7242	0.9155 ug/L		82
73)	Styrene	14.86	104	10359	0.8835 ug/L		93
74)	Bromoform	15.33	173	2678	0.8145 ug/L		93
75)	Isopropylbenzene	15.22	105	18809	0.9747 ug/L		95
77)	1,1,2,2-Tetrachloroethane	15.42	83	4889	0.9832 ug/L		88
79)	1,2,3-Trichloropropane	15.59	110	1172	0.8231 ug/L		77
80)	trans-1,4-Dichloro-2-Buten	15.64	53	1491	0.9685 ug/L	#	82
81)	n-Propylbenzene	15.69	91	20709	0.9342 ug/L		90
82)	Bromobenzene	15.82	156	5475	1.0148 ug/L		98
83)	1,3,5-Trimethylbenzene	15.86	105	14589	0.9620 ug/L		96
84)	2-Chlorotoluene	15.94	91	15291	1.0159 ug/L		95
85)	4-Chlorotoluene	15.99	91	13421m	0.9879 ug/L		
86)	a-Methylstyrene	16.23	118	6311	0.7550 ug/L		98
87)	tert-Butylbenzene	16.30	134	3577	0.9701 ug/L		91
88)	1,2,4-Trimethylbenzene	16.34	105	15395	0.9706 ug/L		96
89)	sec-Butylbenzene	16.54	105	18675	0.9324 ug/L		96
90)	p-Isopropyltoluene	16.69	119	14956	0.9293 ug/L		92
91)	1,3-Dichlorobenzene	16.87	146	9264	0.9653 ug/L		97
92)	1,4-Dichlorobenzene	17.00	146	10534	1.0206 ug/L		83
93)	n-Butylbenzene	17.17	91	13175	0.9178 ug/L	#	86
94)	1,2-Dichlorobenzene	17.46	146	9468	0.9777 ug/L		100
95)	1,2-Dibromo-3-Chloropropan	18.37	75	615	0.7049 ug/L		81
96)	1,2,4-Trichlorobenzene	19.44	180	6133	0.8822 ug/L		97
97)	Hexachlorobutadiene	19.58	225	3043	0.8253 ug/L		86
98)	Naphthalene	19.79	128	15559	1.0034 ug/L	#	90
99)	1,2,3-Trichlorobenzene	20.08	180	6569	0.9236 ug/L		97

(#) = qualifier out of range (m) = manual integration
11M17709.D 8260WT.M Tue Apr 25 14:17:31 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:15:28 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	1.0000	0.9358	6.4	100	0.00
3	P	Chloromethane	1.0000	0.9175	8.3	100	0.00
4	C	Vinyl Chloride	1.0000	0.8426	15.7	100	-0.01
5	T	1,3-Butadiene	-1.0000	-6.7210	0.0	100	0.00
6	T	Bromomethane	1.0000	1.0777	-7.8	100	0.00
7	T	Chloroethane	1.0000	0.8490	15.1	100	-0.01
8	T	Trichlorofluoromethane	1.0000	0.8894	11.1	100	-0.02
9	T	Diethyl ether	5.0000	4.7243	5.5	100	0.00
10	T	Isoprene	1.0000	0.8642	13.6	100	-0.01
11	T	Acrolein	2.5000	2.1673	13.3	100	-0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	0.8036	19.6	100	0.00
13	T	Acetone	-1.0000	0.9936	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.8914	10.9	100	-0.01
15	T	Tert-Butyl Alcohol	10.0000	8.6243	13.8	100	0.02
16	T	Dimethyl Sulfide	1.0000	0.8595	14.0	100	0.00
17	T	Iodomethane	-1.0000	-1.6799	0.0	100	0.00
18	T	Methyl acetate	-1.0000	0.9504	0.0	100	0.00
19	T	Methylene Chloride	1.0000	0.9285	7.1	100	0.00
20	T	Carbon Disulfide	1.0000	1.0391	-3.9	100	-0.01
21	T	Acrylonitrile	2.5000	2.1049	15.8	100	-0.01
22	T	Methyl Tert Butyl Ether	1.0000	0.9472	5.3	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9782	2.2	100	-0.01
24	T	n-Hexane	-1.0000	0.7472	0.0	100	0.01
25	T	Diisopropyl ether	5.0000	5.1833	-3.7	100	0.00
26	T	Vinyl Acetate	-1.0000	0.9471	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9793	2.1	100	-0.01
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0755	-1.5	100	0.00
29	T	2-Butanone	-1.0000	0.7421	0.0	100	0.00
30	T	Propionitrile	5.0000	4.3491	13.0	100	0.00
31	T	2,2-Dichloropropane	1.0000	0.9672	3.3	100	-0.01
32	T	cis-1,2-Dichloroethene	1.0000	0.8152	18.5	100	-0.01
33	C	Chloroform	1.0000	0.9478	5.2	100	0.00
34	T	1-Bromopropane	1.0000	0.7935	20.7	100	0.01
35	T	Bromochloromethane	1.0000	0.9571	4.3	100	0.00
36	T	Tetrahydrofuran	5.0000	6.5560	-31.1#	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	1.0000	0.8932	10.7	100	0.01
39	T	Cyclohexane	1.0000	0.8978	10.2	100	-0.01
40	T	1,1-Dichloropropene	1.0000	0.9551	4.5	100	0.00
41	T	Carbon Tetrachloride	1.0000	0.8702	13.0	100	-0.01
42	T	Tert-Amyl-Methyl ether	5.0000	4.9599	0.8	100	0.00
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	1.0000	1.0149	-1.5	100	0.00
45	T	Benzene	1.0000	1.0179	-1.8	100	0.00
46	T	Trichloroethene	1.0000	0.8947	10.5	100	0.00
47	T	Methylcyclohexane	1.0000	0.8296	17.0	100	0.00
48	C	1,2-Dichloropropane	1.0000	0.9995	0.0	100	0.00
49	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-11.47#
50	T	Bromodichloromethane	1.0000	0.9043	9.6	100	0.00
51	T	Dibromomethane	1.0000	0.8353	16.5	100	0.00
52	T	2-Chloroethyl Vinyl Ether	1.0000	0.8989	10.1	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	0.5092	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	1.0000	0.9367	6.3	100	0.00
55	T	Dimethyl Disulfide	-1.0000	0.6734	0.0	100	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0137	0.0	100	0.00

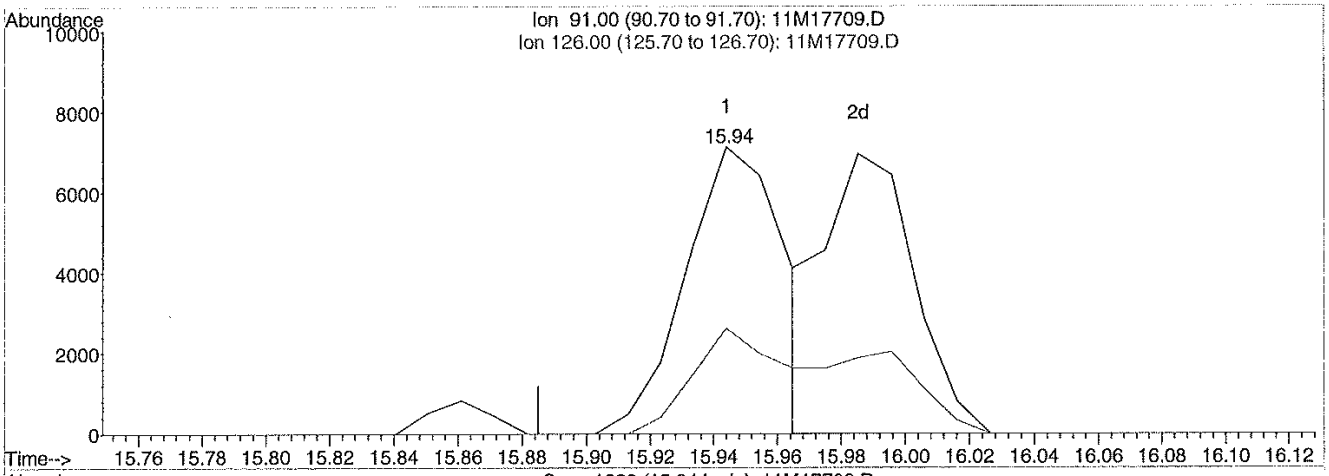
58	C	Toluene	1.0000	0.9449	5.5	100	0.00	
59	T	Ethyl Methacrylate	1.0000	0.7840	21.6	100	0.00	
60	T	trans-1,3-Dichloropropene	1.0000	0.8647	13.5	100	0.00	
61	T	1,1,2-Trichloroethane	1.0000	0.9612	3.9	100	0.00	
62	T	2-Hexanone	-1.0000	0.7691	0.0	100	0.01	
63	T	1,3-Dichloropropane	1.0000	1.0312	-3.1	100	0.00	
64	T	Tetrachloroethene	1.0000	0.8195	18.0	100	0.00	
65	T	Dibromochloromethane	1.0000	0.8530	14.7	100	-0.01	
66	T	1,2-Dibromoethane	1.0000	0.8716	12.8	100	0.00	
67	T	1-Chlorohexane	1.0000	0.7701	23.0	100	0.00	
68	P	Chlorobenzene	1.0000	1.0087	-0.9	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	1.0000	0.8941	10.6	100	0.01	
70	C	Ethylbenzene	1.0000	0.9030	9.7	100	0.00	
71	T	m-,p-Xylene	2.0000	1.9915	0.4	100	0.00	
72	T	o-Xylene	1.0000	0.9155	8.5	100	-0.01	
73	T	Styrene	1.0000	0.8835	11.6	100	0.00	
74	P	Bromoform	1.0000	0.8145	18.6	100	0.01	
75	T	Isopropylbenzene	1.0000	0.9747	2.5	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	1.0000	0.9832	1.7	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	1.0000	0.8231	17.7	100	-0.01	
80	T	trans-1,4-Dichloro-2-Butene	1.0000	0.9685	3.2	100	0.01	
81	T	n-Propylbenzene	1.0000	0.9342	6.6	100	0.00	
82	T	Bromobenzene	1.0000	1.0148	-1.5	100	0.00	
83	T	1,3,5-Trimethylbenzene	1.0000	0.9619	3.8	100	0.00	
84	T	2-Chlorotoluene	1.0000	1.0159	-1.6	100	0.00	
85	T	4-Chlorotoluene	1.0000	1.1267	-12.7	115	-0.04	
86	T	a-Methylstyrene	-1.0000	0.7550	0.0	100	0.00	
87	T	tert-Butylbenzene	1.0000	0.9701	3.0	100	0.00	
88	T	1,2,4-Trimethylbenzene	1.0000	0.9706	2.9	100	-0.01	
89	T	sec-Butylbenzene	1.0000	0.9324	6.8	100	0.00	
90	T	p-Isopropyltoluene	1.0000	0.9293	7.1	100	0.00	
91	T	1,3-Dichlorobenzene	1.0000	0.9653	3.5	100	0.00	
92	T	1,4-Dichlorobenzene	1.0000	1.0207	-2.1	100	0.00	
93	T	n-Butylbenzene	1.0000	0.9151	8.5	100	0.00	
94	T	1,2-Dichlorobenzene	1.0000	0.9777	2.2	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	1.0000	0.7049	29.5#	100	-0.01	
96	T	1,2,4-Trichlorobenzene	1.0000	0.8822	11.8	100	-0.01	
97	T	Hexachlorobutadiene	1.0000	0.8253	17.5	100	0.00	
98	T	Naphthalene	1.0000	1.0034	-0.3	100	0.00	
99	T	1,2,3-Trichlorobenzene	1.0000	0.9236	7.6	100	0.00	

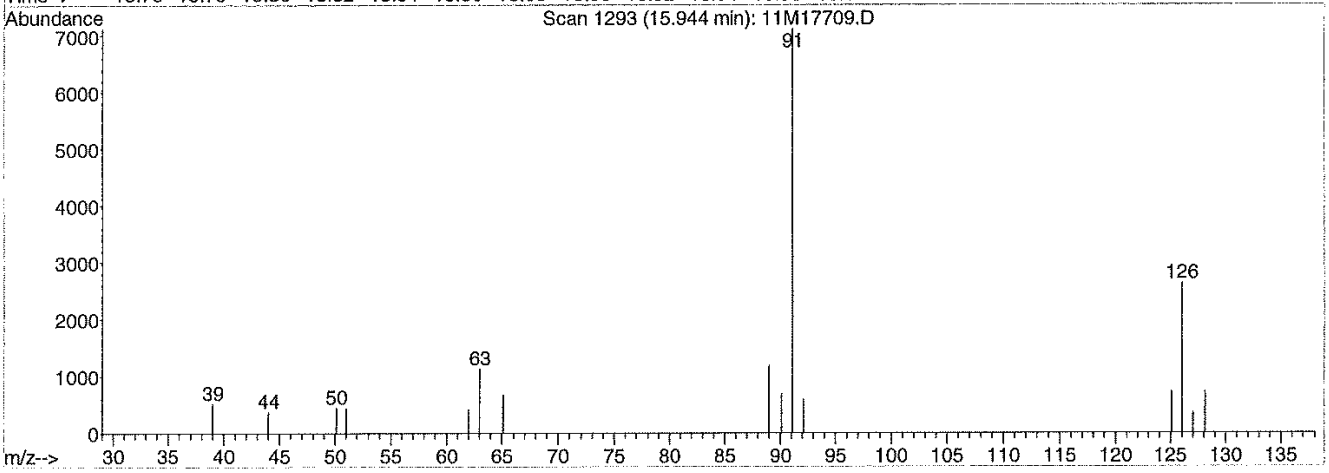
(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17709.D 8260WT.M Tue Apr 25 11:16:29 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:53 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.94min 1.13ug/L

response 15291

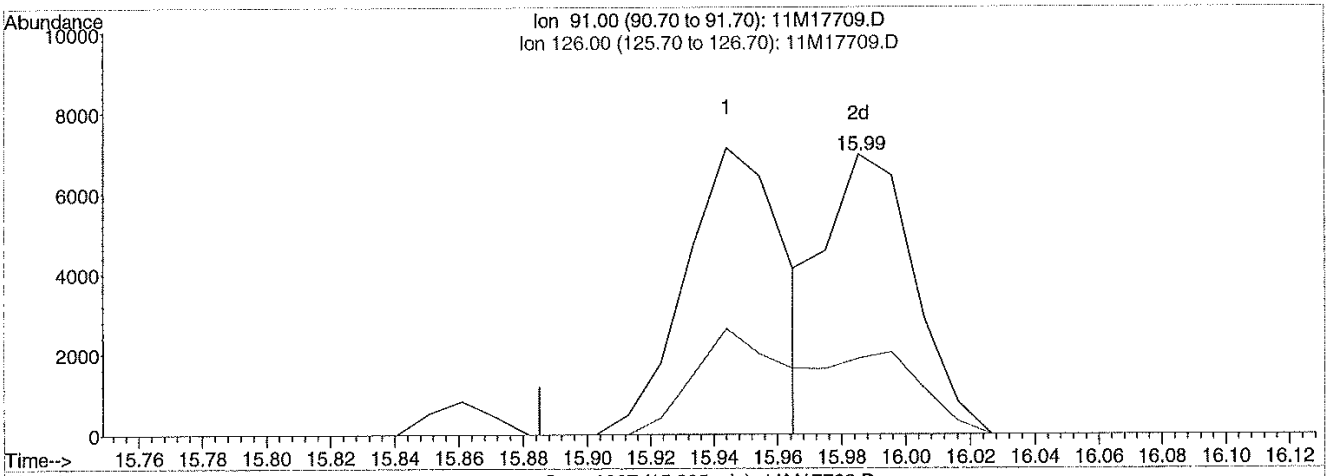
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	39.59
0.00	0.00	0.00
0.00	0.00	0.00

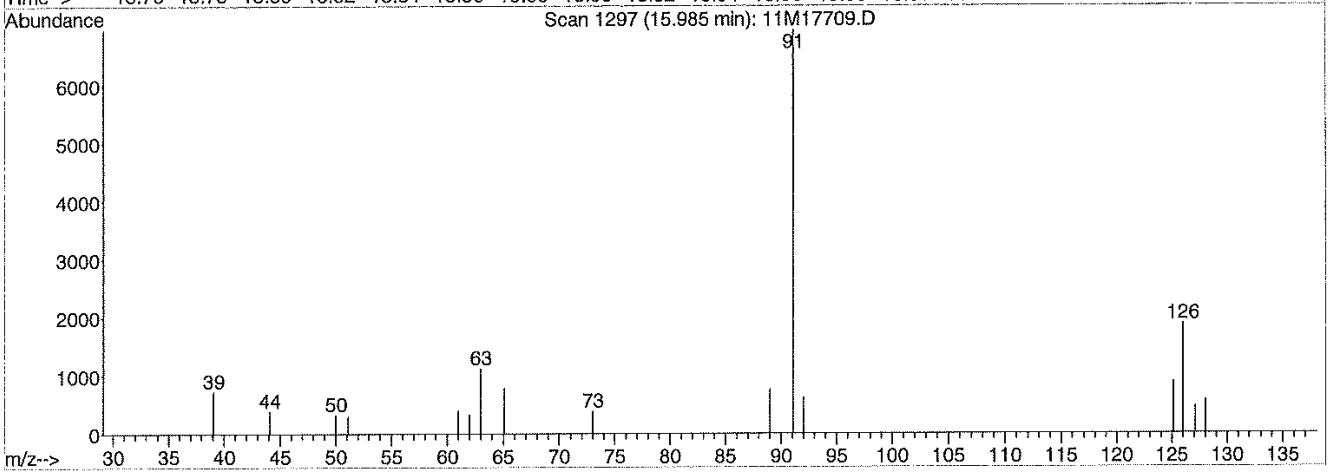
11M17709.D 8260WT.M Tue Apr 25 12:00:08 2017

Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17709.D Vial: 4
Acq On : 24 Apr 2017 17:59 Operator: JDS
Sample : WG611320-04 1ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:00 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17709.D

(85) 4-Chlorotoluene (T)

15.99min 0.99ug/L mint

response 13421

Ion	Exp%	Act%
91.00	100	100
126.00	29.80	45.11#
0.00	0.00	0.00
0.00	0.00	0.00

#3 JDS 4/28/17

FJB 4-28-17

11M17709.D 8260WT.M Tue Apr 25 12:00:48 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	423052	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	298274	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	158082	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
57) Toluene-d8	0.00	98	0	0.0000	ug/L	
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#		
78) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	8171	1.7736	ug/L	97
3) Chloromethane	3.65	50	14006	2.0410	ug/L	98
4) Vinyl Chloride	3.88	62	7048	1.9411	ug/L	92
5) 1,3-Butadiene	3.94	54	5898	1.8029	ug/L	82
6) Bromomethane	4.77	94	8565	2.2846	ug/L	93
7) Chloroethane	4.92	64	7416	1.9717	ug/L	96
8) Trichlorofluoromethane	5.41	101	12401	1.9549	ug/L	96
9) Diethyl ether	5.91	59	125331	26.6986	ug/L	99
10) Isoprene	5.97	67	12223	1.8599	ug/L	98
11) Acrolein	6.15	56	9083	12.1647	ug/L	87
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	7120	1.8953	ug/L	95
13) Acetone	6.26	43	2853	2.0169	ug/L #	58
14) 1,1-Dichloroethene	6.46	61	14698	1.9454	ug/L	92
15) Tert-Butyl Alcohol	6.57	59	26412	49.9213	ug/L	98
16) Dimethyl Sulfide	6.73	62	12206	2.0565	ug/L	95
17) Iodomethane	6.97	142	4155	1.9912	ug/L	84
18) Methyl acetate	6.98	43	8771	1.9660	ug/L #	90
19) Methylene Chloride	7.23	84	10291	2.0415	ug/L	96
20) Carbon Disulfide	7.27	76	25649	1.9855	ug/L	99
21) Acrylonitrile	7.40	53	25609	12.2578	ug/L	98
22) Methyl Tert Butyl Ether	7.43	73	26251	2.0795	ug/L	95
23) trans-1,2-Dichloroethene	7.66	96	8682	1.8884	ug/L	96
24) n-Hexane	7.73	57	11742	1.6467	ug/L #	90
25) Diisopropyl ether	8.07	45	526087	28.6176	ug/L	96
26) Vinyl Acetate	8.23	43	18149	2.1149	ug/L	94
27) 1,1-Dichloroethane	8.26	63	19706	2.0335	ug/L	93
28) Ethyl-Tert-Butyl ether	8.61	59	458837	28.2373	ug/L	96
29) 2-Butanone	8.79	43	4278	1.8509	ug/L	85
30) Propionitrile	8.89	54	19554	25.3600	ug/L	96
31) 2,2-Dichloropropane	9.00	77	13045	1.9887	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	10257	1.9881	ug/L	99
33) Chloroform	9.26	83	17270	2.0597	ug/L	97
34) 1-Bromopropane	9.39	122	1887	2.1774	ug/L	87
35) Bromochloromethane	9.48	130	6167	1.9495	ug/L	91
36) Tetrahydrofuran	9.50	42	47591	25.2790	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	13223	1.9351	ug/L #	97
39) Cyclohexane	9.80	56	18403	1.9154	ug/L	98
40) 1,1-Dichloropropene	9.95	75	11588	1.9350	ug/L	94
41) Carbon Tetrachloride	10.08	117	10600	1.7935	ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	366534	27.9618	ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:49 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

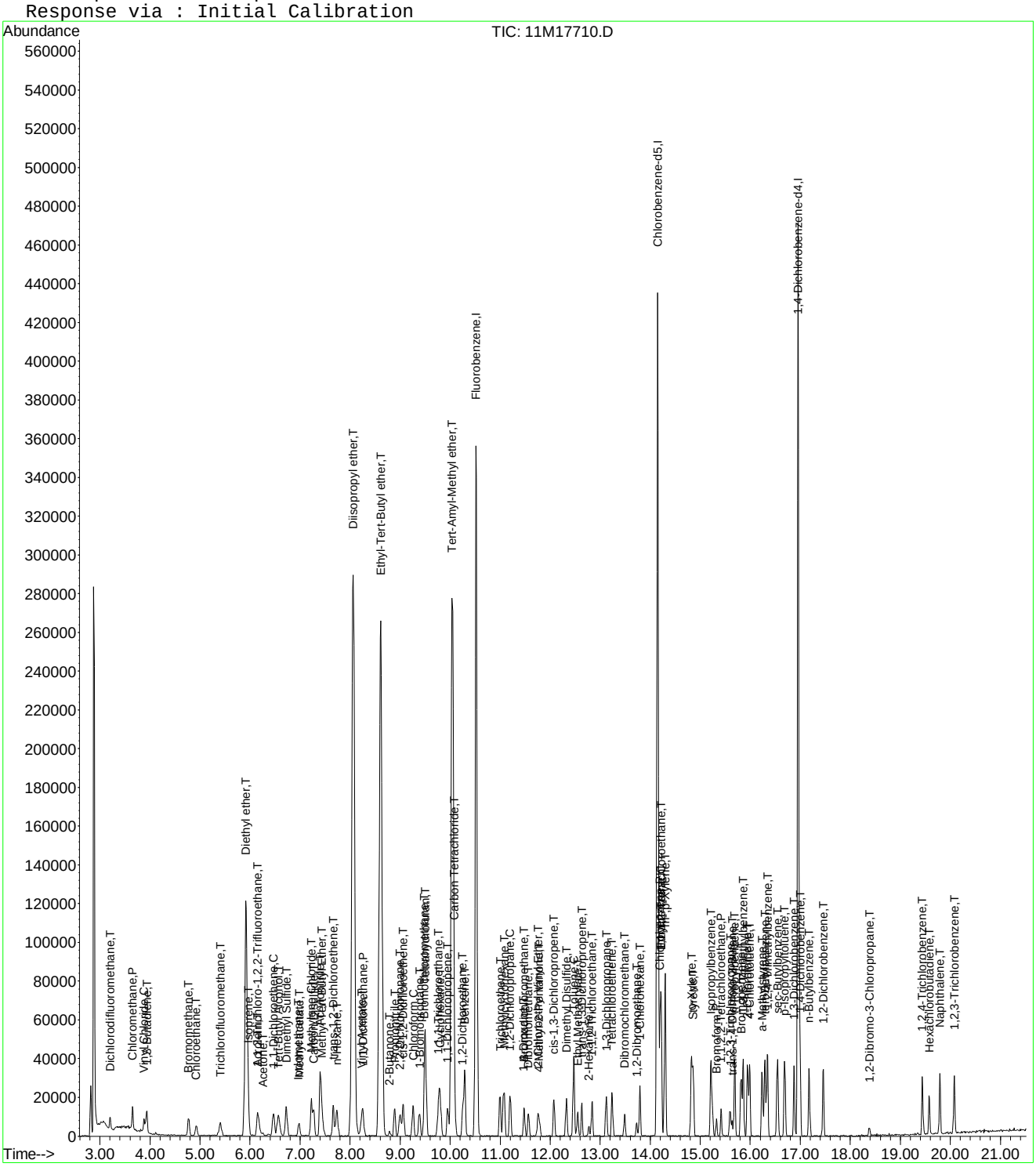
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
44)	1,2-Dichloroethane	10.25	62	13423	2.0298	ug/L		99
45)	Benzene	10.29	78	38755	2.0889	ug/L		97
46)	Trichloroethene	11.00	130	9148	1.8811	ug/L		95
47)	Methylcyclohexane	11.08	83	14663	1.9666	ug/L		95
48)	1,2-Dichloropropane	11.20	63	11593	2.0077	ug/L		92
49)	1,4-Dioxane	11.47	88	2174	41.6924	ug/L		91
50)	Bromodichloromethane	11.48	83	11628	1.9302	ug/L		96
51)	Dibromomethane	11.56	93	5303	1.9415	ug/L		96
52)	2-Chloroethyl Vinyl Ether	11.76	63	5429	1.7209	ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	3489	1.7175	ug/L	#	78
54)	cis-1,3-Dichloropropene	12.08	75	13651	1.9099	ug/L		97
55)	Dimethyl Disulfide	12.32	79	6926	1.5525	ug/L		98
58)	Toluene	12.47	91	38249	1.9806	ug/L		98
59)	Ethyl Methacrylate	12.55	69	9441	1.7788	ug/L		99
60)	trans-1,3-Dichloropropene	12.64	75	11353	1.8624	ug/L		97
61)	1,1,2-Trichloroethane	12.83	97	7908	1.9412	ug/L		94
62)	2-Hexanone	12.77	43	5906	1.7450	ug/L	#	69
63)	1,3-Dichloropropane	13.12	76	14255	2.1069	ug/L		99
64)	Tetrachloroethene	13.23	164	7409	1.9327	ug/L		99
65)	Dibromochloromethane	13.48	129	8612	1.8962	ug/L		95
66)	1,2-Dibromoethane	13.73	107	7412	2.0240	ug/L		99
67)	1-Chlorohexane	13.79	91	10002	1.8174	ug/L		97
68)	Chlorobenzene	14.20	112	26139	2.1284	ug/L		99
69)	1,1,1,2-Tetrachloroethane	14.22	131	8771	1.9183	ug/L		95
70)	Ethylbenzene	14.22	106	12495	1.9240	ug/L		75
71)	m-,p-Xylene	14.30	106	32038	4.1230	ug/L		87
72)	o-Xylene	14.83	106	16027	2.0470	ug/L		96
73)	Styrene	14.86	104	22629	1.9500	ug/L		99
74)	Bromoform	15.32	173	5086	1.5628	ug/L		97
75)	Isopropylbenzene	15.22	105	39378	2.0616	ug/L		91
77)	1,1,2,2-Tetrachloroethane	15.42	83	10345	2.0816	ug/L		98
79)	1,2,3-Trichloropropane	15.60	110	2638	1.8538	ug/L		80
80)	trans-1,4-Dichloro-2-Buten	15.64	53	2763	1.7957	ug/L		85
81)	n-Propylbenzene	15.69	91	44389	2.0034	ug/L		93
82)	Bromobenzene	15.82	156	11263	2.0888	ug/L		97
83)	1,3,5-Trimethylbenzene	15.86	105	29561	1.9502	ug/L		99
84)	2-Chlorotoluene	15.94	91	29746	1.9774	ug/L		84
85)	4-Chlorotoluene	15.99	91	27997	2.0620	ug/L		91
86)	a-Methylstyrene	16.24	118	14142	1.6928	ug/L		98
87)	tert-Butylbenzene	16.30	134	7098	1.9260	ug/L		84
88)	1,2,4-Trimethylbenzene	16.35	105	33715	2.1267	ug/L		92
89)	sec-Butylbenzene	16.54	105	39307	1.9635	ug/L		96
90)	p-Isopropyltoluene	16.69	119	31619	1.9656	ug/L		99
91)	1,3-Dichlorobenzene	16.87	146	19564	2.0397	ug/L		100
92)	1,4-Dichlorobenzene	17.00	146	21139	2.0493	ug/L		91
93)	n-Butylbenzene	17.17	91	27403	1.9100	ug/L		93
94)	1,2-Dichlorobenzene	17.46	146	20869	2.1562	ug/L		97
95)	1,2-Dibromo-3-Chloropropan	18.38	75	1569	1.7994	ug/L		89
96)	1,2,4-Trichlorobenzene	19.44	180	13382	1.9259	ug/L		99
97)	Hexachlorobutadiene	19.58	225	6745	1.8303	ug/L		95
98)	Naphthalene	19.79	128	31285	2.0187	ug/L	#	96
99)	1,2,3-Trichlorobenzene	20.08	180	13778	1.9382	ug/L		95

(#) = qualifier out of range (m) = manual integration
11M17710.D 8260WT.M Tue Apr 25 14:17:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17710.D 8260WT.M Tue Apr 25 14:17:45 2017 Page 3

Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\042417\11M17710.D Vial: 5
Acq On : 24 Apr 2017 18:29 Operator: JDS
Sample : WG611320-05 2ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:24:44 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	-0.01
2	T	Dichlorodifluoromethane	2.0000	1.7736	11.3	100	0.00
3	P	Chloromethane	2.0000	2.0410	-2.0	100	0.00
4	C	Vinyl Chloride	2.0000	1.9411	2.9	100	-0.01
5	T	1,3-Butadiene	2.0000	1.8029	9.9	100	0.01
6	T	Bromomethane	2.0000	2.2846	-14.2	100	-0.01
7	T	Chloroethane	2.0000	1.9717	1.4	100	-0.01
8	T	Trichlorofluoromethane	2.0000	1.9550	2.3	100	0.00
9	T	Diethyl ether	25.0000	26.6987	-6.8	100	-0.01
10	T	Isoprene	2.0000	1.8600	7.0	100	0.00
11	T	Acrolein	12.5000	12.1647	2.7	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8953	5.2	100	-0.01
13	T	Acetone	2.0000	2.0169	-0.8	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9454	2.7	100	-0.01
15	T	Tert-Butyl Alcohol	50.0000	49.9213	0.2	100	0.00
16	T	Dimethyl Sulfide	2.0000	2.0565	-2.8	100	0.00
17	T	Iodomethane	2.0000	1.9912	0.4	100	0.00
18	T	Methyl acetate	2.0000	1.9660	1.7	100	0.00
19	T	Methylene Chloride	2.0000	2.0415	-2.1	100	0.00
20	T	Carbon Disulfide	2.0000	1.9855	0.7	100	-0.01
21	T	Acrylonitrile	12.5000	12.2578	1.9	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	2.0795	-4.0	100	0.00
23	T	trans-1,2-Dichloroethene	2.0000	1.8884	5.6	100	-0.01
24	T	n-Hexane	2.0000	1.6467	17.7	100	0.00
25	T	Diisopropyl ether	25.0000	28.6176	-14.5	100	0.00
26	T	Vinyl Acetate	2.0000	2.1149	-5.7	100	0.00
27	P	1,1-Dichloroethane	2.0000	2.0335	-1.7	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	28.2373	-12.9	100	0.00
29	T	2-Butanone	2.0000	1.8509	7.5	100	0.00
30	T	Propionitrile	25.0000	25.3600	-1.4	100	0.00
31	T	2,2-Dichloropropane	2.0000	1.9887	0.6	100	-0.01
32	T	cis-1,2-Dichloroethene	2.0000	1.9881	0.6	100	-0.01
33	C	Chloroform	2.0000	2.0597	-3.0	100	0.00
34	T	1-Bromopropane	2.0000	2.1774	-8.9	100	0.00
35	T	Bromochloromethane	2.0000	1.9495	2.5	100	0.00
36	T	Tetrahydrofuran	25.0000	25.2790	-1.1	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-9.53#
38	T	1,1,1-Trichloroethane	2.0000	1.9351	3.2	100	0.00
39	T	Cyclohexane	2.0000	1.9154	4.2	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9349	3.3	100	0.00
41	T	Carbon Tetrachloride	2.0000	1.7935	10.3	100	-0.01
42	T	Tert-Amyl-Methyl ether	25.0000	27.9618	-11.8	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.14#
44	T	1,2-Dichloroethane	2.0000	2.0298	-1.5	100	0.00
45	T	Benzene	2.0000	2.0889	-4.4	100	0.00
46	T	Trichloroethene	2.0000	1.8811	5.9	100	0.00
47	T	Methylcyclohexane	2.0000	1.9666	1.7	100	0.01
48	C	1,2-Dichloropropane	2.0000	2.0077	-0.4	100	0.00
49	T	1,4-Dioxane	-1.0000	41.6924	0.0	100	0.00
50	T	Bromodichloromethane	2.0000	1.9302	3.5	100	-0.01
51	T	Dibromomethane	2.0000	1.9415	2.9	100	-0.01
52	T	2-Chloroethyl Vinyl Ether	2.0000	1.7209	14.0	100	0.00
53	T	4-Methyl-2-Pentanone	-1.0000	1.7175	0.0	100	-0.01
54	T	cis-1,3-Dichloropropene	2.0000	1.9099	4.5	100	0.00
55	T	Dimethyl Disulfide	-1.0000	1.5525	0.0	0	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
57	S	Toluene-d8	-1.0000	0.0000	0.0	0	-12.38#

58	C	Toluene	2.0000	1.9806	1.0	100	0.00	
59	T	Ethyl Methacrylate	2.0000	1.7788	11.1	100	0.00	
60	T	trans-1,3-Dichloropropene	2.0000	1.8623	6.9	100	0.00	
61	T	1,1,2-Trichloroethane	2.0000	1.9412	2.9	100	-0.01	
62	T	2-Hexanone	-1.0000	1.7450	0.0	100	0.00	
63	T	1,3-Dichloropropane	2.0000	2.1069	-5.3	100	0.00	
64	T	Tetrachloroethene	2.0000	1.9327	3.4	100	0.00	
65	T	Dibromochloromethane	2.0000	1.8962	5.2	100	-0.01	
66	T	1,2-Dibromoethane	2.0000	2.0240	-1.2	100	0.00	
67	T	1-Chlorohexane	2.0000	1.8174	9.1	100	0.00	
68	P	Chlorobenzene	2.0000	2.1284	-6.4	100	0.00	
69	T	1,1,1,2-Tetrachloroethane	2.0000	1.9184	4.1	100	0.00	
70	C	Ethylbenzene	2.0000	1.9240	3.8	100	0.00	
71	T	m-,p-Xylene	4.0000	4.1230	-3.1	100	0.00	
72	T	o-Xylene	2.0000	2.0470	-2.4	100	0.00	
73	T	Styrene	2.0000	1.9500	2.5	100	0.00	
74	P	Bromoform	2.0000	1.5628	21.9	100	0.00	
75	T	Isopropylbenzene	2.0000	2.0616	-3.1	100	0.00	
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00	
77	P	1,1,2,2-Tetrachloroethane	2.0000	2.0816	-4.1	100	0.00	
78	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-15.54#	
79	T	1,2,3-Trichloropropane	2.0000	1.8538	7.3	100	0.00	
80	T	trans-1,4-Dichloro-2-Butene	2.0000	1.7957	10.2	100	0.01	
81	T	n-Propylbenzene	2.0000	2.0034	-0.2	100	0.00	
82	T	Bromobenzene	2.0000	2.0888	-4.4	100	0.00	
83	T	1,3,5-Trimethylbenzene	2.0000	1.9502	2.5	100	0.00	
84	T	2-Chlorotoluene	2.0000	1.9774	1.1	100	0.00	
85	T	4-Chlorotoluene	2.0000	2.0641	-3.2	100	0.00	
86	T	a-Methylstyrene	-1.0000	1.6928	0.0	0	0.01	
87	T	tert-Butylbenzene	2.0000	1.9260	3.7	100	0.00	
88	T	1,2,4-Trimethylbenzene	2.0000	2.1267	-6.3	100	0.00	
89	T	sec-Butylbenzene	2.0000	1.9635	1.8	100	0.00	
90	T	p-Isopropyltoluene	2.0000	1.9656	1.7	100	0.00	
91	T	1,3-Dichlorobenzene	2.0000	2.0398	-2.0	100	0.00	
92	T	1,4-Dichlorobenzene	2.0000	2.0493	-2.5	100	0.00	
93	T	n-Butylbenzene	2.0000	1.9044	4.8	100	0.00	
94	T	1,2-Dichlorobenzene	2.0000	2.1562	-7.8	100	0.00	
95	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7994	10.0	100	0.00	
96	T	1,2,4-Trichlorobenzene	2.0000	1.9259	3.7	100	-0.01	
97	T	Hexachlorobutadiene	2.0000	1.8303	8.5	100	0.00	
98	T	Naphthalene	2.0000	2.0187	-0.9	100	0.00	
99	T	1,2,3-Trichlorobenzene	2.0000	1.9382	3.1	100	0.00	

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17710.D 8260WT.M Tue Apr 25 11:24:59 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	428779	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	303515	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	159230	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	21997	5.1792	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.72%#			
43) 1,2-Dichloroethane-d4	10.14	65	25817	5.2381	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 20.96%#			
57) Toluene-d8	12.38	98	85704	5.4381	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 21.76%#			
78) p-Bromofluorobenzene	15.54	95	28349	5.1223	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 20.48%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	22183	4.4060	ug/L	96
3) Chloromethane	3.66	50	27821	4.7278	ug/L	95
4) Vinyl Chloride	3.89	62	17550	4.7689	ug/L	99
5) 1,3-Butadiene	3.93	54	13640	5.4863	ug/L	89
6) Bromomethane	4.78	94	19431	5.1137	ug/L	98
7) Chloroethane	4.93	64	18475	4.8465	ug/L	99
8) Trichlorofluoromethane	5.41	101	32605	5.0713	ug/L	99
9) Diethyl ether	5.92	59	249706	52.4832	ug/L	99
10) Isoprene	5.96	67	33440	5.0205	ug/L	96
11) Acrolein	6.15	56	19773	26.1280	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	18985	4.9861	ug/L	96
13) Acetone	6.26	43	6991	4.8763	ug/L	95
14) 1,1-Dichloroethene	6.47	61	37724	4.9264	ug/L	97
15) Tert-Butyl Alcohol	6.58	59	54089	100.8680	ug/L	99
16) Dimethyl Sulfide	6.73	62	30254	5.0292	ug/L	97
17) Iodomethane	6.97	142	17033	4.3725	ug/L	96
18) Methyl acetate	6.99	43	22739	5.0288	ug/L	95
19) Methylene Chloride	7.23	84	24965	4.8863	ug/L	93
20) Carbon Disulfide	7.27	76	66413	5.0725	ug/L	100
21) Acrylonitrile	7.40	53	52004	24.5594	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	66369	5.1874	ug/L	98
23) trans-1,2-Dichloroethene	7.66	96	22656	4.8619	ug/L	99
24) n-Hexane	7.73	57	34418	4.7622	ug/L	97
25) Diisopropyl ether	8.07	45	1035574	55.5799	ug/L	97
26) Vinyl Acetate	8.23	43	41746	4.7998	ug/L	97
27) 1,1-Dichloroethane	8.26	63	50180	5.1091	ug/L	97
28) Ethyl-Tert-Butyl ether	8.61	59	902275	54.7853	ug/L	97
29) 2-Butanone	8.79	43	11494	4.9065	ug/L	88
30) Propionitrile	8.89	54	39167	50.1181	ug/L	99
31) 2,2-Dichloropropane	9.01	77	32896	4.9480	ug/L	96
32) cis-1,2-Dichloroethene	9.06	96	26061	4.9839	ug/L	95
33) Chloroform	9.26	83	41854	5.1947	ug/L	98
34) 1-Bromopropane	9.39	122	4450	4.5889	ug/L	94
35) Bromochloromethane	9.48	130	16004	4.9916	ug/L	95
36) Tetrahydrofuran	9.50	42	92549	48.5028	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	34620	4.9988	ug/L	97
39) Cyclohexane	9.80	56	49732	5.1069	ug/L	98
40) 1,1-Dichloropropene	9.95	75	30690	5.0561	ug/L	97
41) Carbon Tetrachloride	10.09	117	30445	5.0826	ug/L	99
42) Tert-Amyl-Methyl ether	10.05	73	718908	54.1108	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17711.D 8260WT.M Tue Apr 25 14:17:57 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:51 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

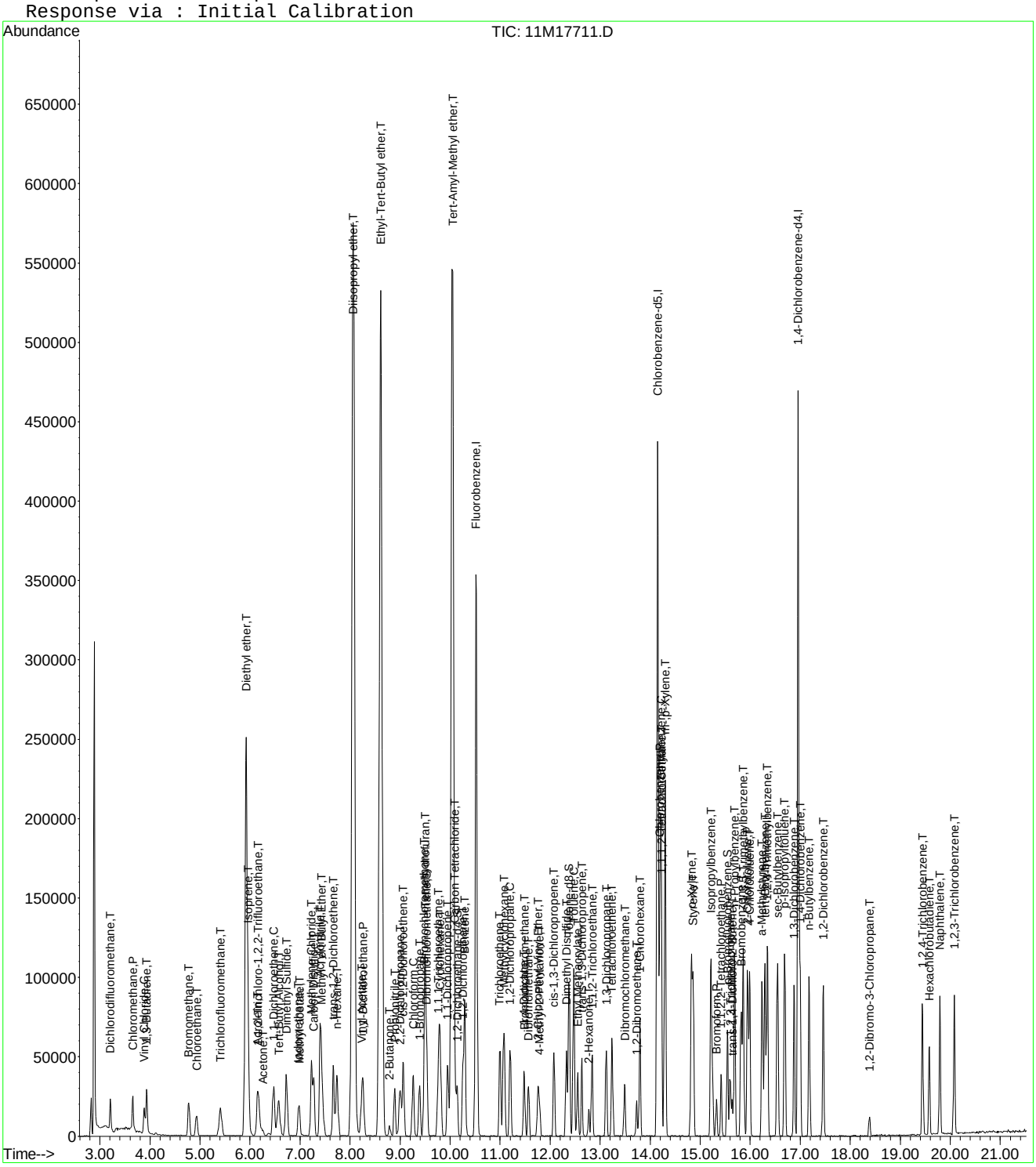
	Compound	R.T.	QIon	Response	Conc Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	34564	5.1568 ug/L	97
45)	Benzene	10.29	78	98721	5.2499 ug/L	97
46)	Trichloroethene	10.99	130	24435	4.9574 ug/L	99
47)	Methylcyclohexane	11.07	83	38311	5.0696 ug/L	96
48)	1,2-Dichloropropane	11.20	63	28756	4.9135 ug/L	96
49)	1,4-Dioxane	11.48	88	4775	90.3507 ug/L	96
50)	Bromodichloromethane	11.49	83	29635	4.8536 ug/L	98
51)	Dibromomethane	11.57	93	14576	5.2651 ug/L	93
52)	2-Chloroethyl Vinyl Ether	11.76	63	14370	4.4942 ug/L	98
53)	4-Methyl-2-Pentanone	11.79	58	8487	4.1220 ug/L	95
54)	cis-1,3-Dichloropropene	12.08	75	36650	5.0591 ug/L	100
55)	Dimethyl Disulfide	12.32	79	18858	4.1706 ug/L	97
58)	Toluene	12.47	91	100679	5.1234 ug/L	95
59)	Ethyl Methacrylate	12.55	69	25852	4.7866 ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	32301	5.2072 ug/L	96
61)	1,1,2-Trichloroethane	12.84	97	21812	5.2618 ug/L	100
62)	2-Hexanone	12.77	43	16299	4.7327 ug/L	94
63)	1,3-Dichloropropane	13.12	76	36430	5.2914 ug/L	99
64)	Tetrachloroethene	13.23	164	20026	5.1338 ug/L	98
65)	Dibromochloromethane	13.49	129	23433	5.0705 ug/L	98
66)	1,2-Dibromoethane	13.73	107	18938	5.0820 ug/L	100
67)	1-Chlorohexane	13.79	91	27949	4.9909 ug/L	97
68)	Chlorobenzene	14.20	112	65228	5.2197 ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.23	131	23202	4.9870 ug/L	99
70)	Ethylbenzene	14.22	106	34657	5.2444 ug/L	85
71)	m-,p-Xylene	14.30	106	84626	10.7026 ug/L	87
72)	o-Xylene	14.83	106	41271	5.1802 ug/L	91
73)	Styrene	14.86	104	62547	5.2968 ug/L	98
74)	Bromoform	15.32	173	14707	4.4411 ug/L	98
75)	Isopropylbenzene	15.22	105	103427	5.3214 ug/L	95
77)	1,1,2,2-Tetrachloroethane	15.42	83	26325	5.2589 ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	7568	5.2799 ug/L	98
80)	trans-1,4-Dichloro-2-Buten	15.64	53	7445	4.8037 ug/L	95
81)	n-Propylbenzene	15.69	91	120808	5.4132 ug/L	94
82)	Bromobenzene	15.82	156	29282	5.3915 ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	86498	5.6654 ug/L	96
84)	2-Chlorotoluene	15.94	91	80304	5.2998 ug/L	94
85)	4-Chlorotoluene	15.99	91	75635	5.5305 ug/L	95
86)	a-Methylstyrene	16.23	118	41076	4.8814 ug/L	98
87)	tert-Butylbenzene	16.30	134	18231	4.9113 ug/L	74
88)	1,2,4-Trimethylbenzene	16.34	105	90217	5.6498 ug/L	94
89)	sec-Butylbenzene	16.54	105	108569	5.3842 ug/L	95
90)	p-Isopropyltoluene	16.69	119	91804	5.6660 ug/L	95
91)	1,3-Dichlorobenzene	16.87	146	53587	5.5467 ug/L	97
92)	1,4-Dichlorobenzene	17.00	146	52478	5.0507 ug/L	99
93)	n-Butylbenzene	17.17	91	75319	5.2119 ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	53808	5.5195 ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	4345	4.9470 ug/L	91
96)	1,2,4-Trichlorobenzene	19.45	180	36374	5.1970 ug/L	99
97)	Hexachlorobutadiene	19.58	225	18114	4.8798 ug/L	98
98)	Naphthalene	19.79	128	82884	5.3097 ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	36011	5.0292 ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17711.D 8260WT.M Tue Apr 25 14:17:57 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17711.D Vial: 6
Acq On : 24 Apr 2017 18:58 Operator: JDS
Sample : WG611320-06 5ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17711.D 8260WT.M Tue Apr 25 14:17:58 2017 Page 3

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	436695	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	310777	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	168187	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	39986	9.2441	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.96%#			
43) 1,2-Dichloroethane-d4	10.14	65	46884	9.3400	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.36%#			
57) Toluene-d8	12.38	98	157855	9.7822	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 39.12%#			
78) p-Bromofluorobenzene	15.54	95	53711	9.1881	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 36.76%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	119907	22.4994	ug/L	100
3) Chloromethane	3.65	50	131720	24.7445	ug/L	98
4) Vinyl Chloride	3.88	62	77026	20.5511	ug/L	99
5) 1,3-Butadiene	3.92	54	40987	18.4416	ug/L	94
6) Bromomethane	4.77	94	73160	18.9046	ug/L	99
7) Chloroethane	4.92	64	82150	21.1595	ug/L	99
8) Trichlorofluoromethane	5.41	101	139146	21.2503	ug/L	100
9) Diethyl ether	5.91	59	401213	82.7983	ug/L	100
10) Isoprene	5.96	67	141743	20.8949	ug/L	98
11) Acrolein	6.14	56	32156	41.7206	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	81406	20.9925	ug/L	99
13) Acetone	6.25	43	30233	20.7056	ug/L	93
14) 1,1-Dichloroethene	6.46	61	159850	20.4966	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	88568	162.1723	ug/L	98
16) Dimethyl Sulfide	6.72	62	129191	21.0867	ug/L	98
17) Iodomethane	6.97	142	104516	20.2684	ug/L	98
18) Methyl acetate	6.98	43	95685	20.7776	ug/L	99
19) Methylene Chloride	7.23	84	103909	19.9691	ug/L	97
20) Carbon Disulfide	7.27	76	274943	20.6190	ug/L	98
21) Acrylonitrile	7.40	53	89042	41.2886	ug/L	98
22) Methyl Tert Butyl Ether	7.42	73	273761	21.0092	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	96267	20.2843	ug/L	99
24) n-Hexane	7.73	57	146088	19.8470	ug/L	99
25) Diisopropyl ether	8.06	45	1618979	85.3165	ug/L	99
26) Vinyl Acetate	8.23	43	176447	19.9194	ug/L	99
27) 1,1-Dichloroethane	8.26	63	205623	20.5559	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1426794	85.0632	ug/L	98
29) 2-Butanone	8.79	43	49794	20.8706	ug/L	98
30) Propionitrile	8.89	54	65774	82.6388	ug/L	99
31) 2,2-Dichloropropane	9.01	77	135298	19.9819	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	110879	20.8200	ug/L	98
33) Chloroform	9.25	83	172198	21.5740	ug/L	100
34) 1-Bromopropane	9.39	122	20252	19.2581	ug/L	99
35) Bromochloromethane	9.48	130	68191	20.8830	ug/L	99
36) Tetrahydrofuran	9.50	42	150814	77.6055	ug/L	99
38) 1,1,1-Trichloroethane	9.76	97	148271	21.0209	ug/L	100
39) Cyclohexane	9.79	56	207352	20.9066	ug/L	98
40) 1,1-Dichloropropene	9.95	75	128943	20.8581	ug/L	97
41) Carbon Tetrachloride	10.09	117	130686	21.4216	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	1142684	84.4485	ug/L	100

(#) = qualifier out of range (m) = manual integration

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:53 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

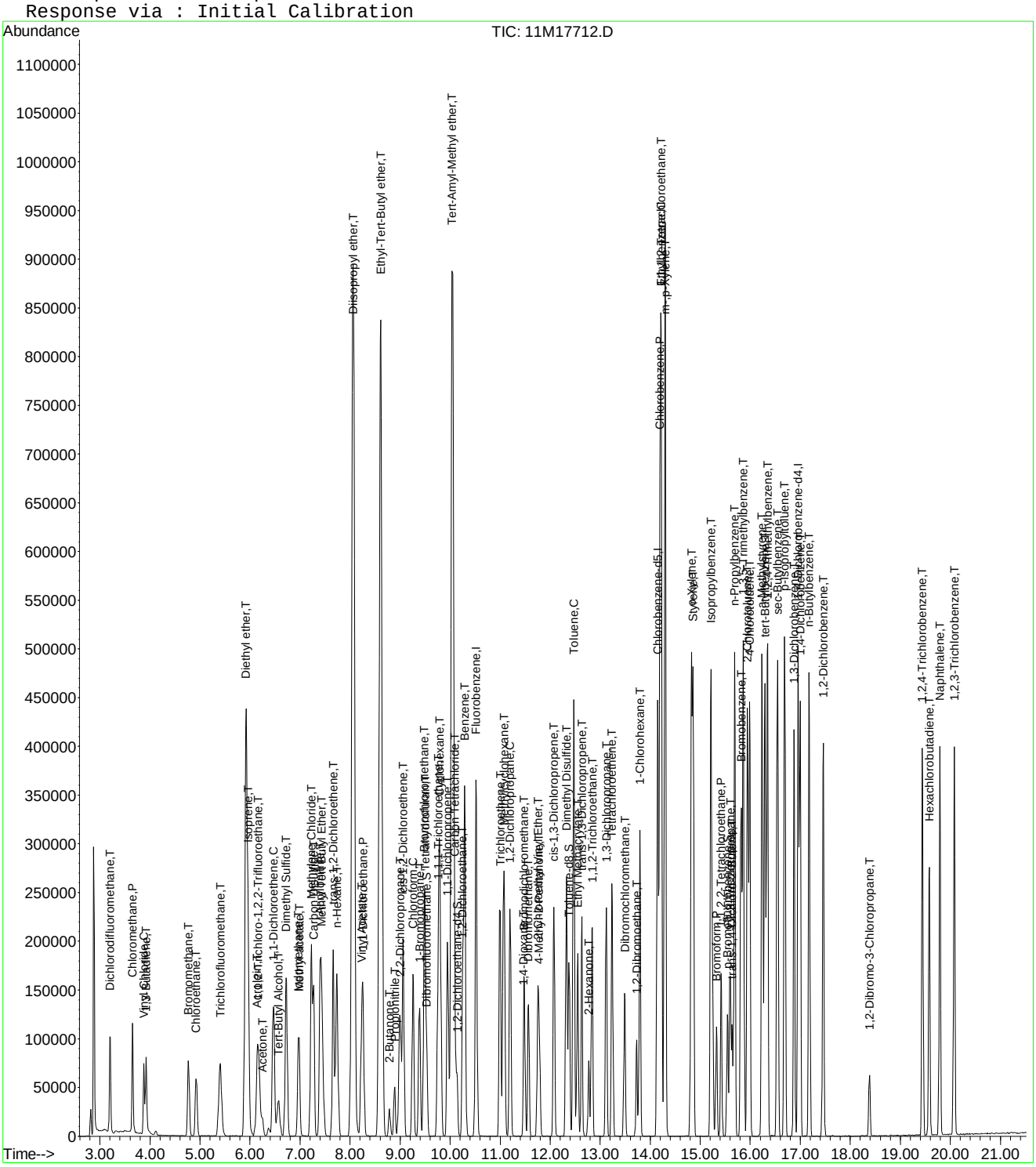
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	145252	21.2783	ug/L	99
45)	Benzene	10.29	78	398956	20.8317	ug/L	97
46)	Trichloroethene	11.00	130	104094	20.7359	ug/L	99
47)	Methylcyclohexane	11.07	83	160115	20.8036	ug/L	99
48)	1,2-Dichloropropane	11.20	63	120072	20.1447	ug/L	98
49)	1,4-Dioxane	11.47	88	7871	146.2322	ug/L	94
50)	Bromodichloromethane	11.48	83	129011	20.7463	ug/L	100
51)	Dibromomethane	11.56	93	59829	21.2194	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	69123	21.2263	ug/L	99
53)	4-Methyl-2-Pentanone	11.78	58	43246	20.6231	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	160707	21.7817	ug/L	97
55)	Dimethyl Disulfide	12.32	79	90938	19.7473	ug/L	99
58)	Toluene	12.47	91	414902	20.6203	ug/L	97
59)	Ethyl Methacrylate	12.55	69	121437	21.9593	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	139862	22.0200	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	91832	21.6355	ug/L	98
62)	2-Hexanone	12.77	43	72420	20.5371	ug/L	98
63)	1,3-Dichloropropane	13.12	76	151591	21.5037	ug/L	100
64)	Tetrachloroethene	13.23	164	85598	21.4310	ug/L	100
65)	Dibromochloromethane	13.49	129	101802	21.5133	ug/L	99
66)	1,2-Dibromoethane	13.73	107	80818	21.1809	ug/L	97
67)	1-Chlorohexane	13.79	91	119894	20.9092	ug/L	100
68)	Chlorobenzene	14.20	112	267703	20.9215	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	100693	21.1370	ug/L	99
70)	Ethylbenzene	14.22	106	146101	21.5919	ug/L	90
71)	m-,p-Xylene	14.30	106	347301	42.8965	ug/L	89
72)	o-Xylene	14.83	106	175418	21.5033	ug/L	94
73)	Styrene	14.86	104	282121	23.3331	ug/L	97
74)	Bromoform	15.32	173	70896	20.9084	ug/L	99
75)	Isopropylbenzene	15.22	105	435928	21.9046	ug/L	97
77)	1,1,2,2-Tetrachloroethane	15.42	83	112391	21.2565	ug/L	99
79)	1,2,3-Trichloropropane	15.60	110	33992	22.4518	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	34278	20.9390	ug/L	96
81)	n-Propylbenzene	15.69	91	520501	22.0807	ug/L	96
82)	Bromobenzene	15.82	156	124008	21.6168	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	367954	22.8164	ug/L	97
84)	2-Chlorotoluene	15.94	91	327461	20.4604	ug/L	86
85)	4-Chlorotoluene	15.99	91	317263	21.9631	ug/L	97
86)	a-Methylstyrene	16.23	118	196070	22.0595	ug/L	99
87)	tert-Butylbenzene	16.30	134	85202	21.7304	ug/L	99
88)	1,2,4-Trimethylbenzene	16.35	105	382132	22.6565	ug/L	96
89)	sec-Butylbenzene	16.54	105	466322	21.8946	ug/L	96
90)	p-Isopropyltoluene	16.69	119	393753	23.0076	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	225765	22.1241	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	227443	20.7244	ug/L	98
93)	n-Butylbenzene	17.17	91	353074	23.1308	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	224912	21.8422	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	19018	20.4998	ug/L	98
96)	1,2,4-Trichlorobenzene	19.44	180	165986	22.4528	ug/L	100
97)	Hexachlorobutadiene	19.58	225	83698	21.3469	ug/L	98
98)	Naphthalene	19.79	128	382950	23.2260	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	163857	21.6652	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17712.D 8260WT.M Tue Apr 25 14:18:11 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17712.D Vial: 7
Acq On : 24 Apr 2017 19:27 Operator: JDS
Sample : WG611320-07 20ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	445066	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	320836	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	178101	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	112079	25.4235 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.68%		
43) 1,2-Dichloroethane-d4	10.14	65	130851	25.5772 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.32%		
57) Toluene-d8	12.38	98	436970	26.2298 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.92%		
78) p-Bromofluorobenzene	15.54	95	161708	26.1227 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.48%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	307006	56.2126 ug/L	100
3) Chloromethane	3.66	50	206853	38.5380 ug/L	100
4) Vinyl Chloride	3.89	62	200431	52.4708 ug/L	100
5) 1,3-Butadiene	3.93	54	121423	57.3894 ug/L	100
6) Bromomethane	4.78	94	179017	45.3881 ug/L	100
7) Chloroethane	4.93	64	208061	52.5825 ug/L	100
8) Trichlorofluoromethane	5.41	101	356930	53.4848 ug/L	100
9) Diethyl ether	5.92	59	492681	99.7622 ug/L	100
10) Isoprene	5.97	67	385229	55.7200 ug/L	100
11) Acrolein	6.15	56	39643	50.4672 ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	207994	52.6275 ug/L	100
13) Acetone	6.26	43	72300	48.5847 ug/L	99
14) 1,1-Dichloroethene	6.47	61	418655	52.6721 ug/L	100
15) Tert-Butyl Alcohol	6.57	59	108302	194.5763 ug/L	100
16) Dimethyl Sulfide	6.73	62	323528	51.8133 ug/L	100
17) Iodomethane	6.98	142	294369	53.8800 ug/L	100
18) Methyl acetate	6.98	43	235792	50.2382 ug/L	100
19) Methylene Chloride	7.23	84	265477	50.0596 ug/L	100
20) Carbon Disulfide	7.28	76	716496	52.7221 ug/L	100
21) Acrylonitrile	7.40	53	112383	51.1317 ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	696161	52.4207 ug/L	100
23) trans-1,2-Dichloroethene	7.67	96	244230	50.4935 ug/L	100
24) n-Hexane	7.73	57	407356	54.3010 ug/L	100
25) Diisopropyl ether	8.06	45	1936523	100.1309 ug/L	100
26) Vinyl Acetate	8.23	43	462428	51.2223 ug/L	100
27) 1,1-Dichloroethane	8.26	63	520163	51.0221 ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1708288	99.9299 ug/L	100
29) 2-Butanone	8.79	43	122699	50.4606 ug/L	100
30) Propionitrile	8.89	54	81159	100.0507 ug/L	100
31) 2,2-Dichloropropane	9.01	77	339288	49.1664 ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	283070	52.1530 ug/L	100
33) Chloroform	9.26	83	429355	53.0609 ug/L	100
34) 1-Bromopropane	9.39	122	54732	50.4729 ug/L	100
35) Bromochloromethane	9.48	130	174716	52.4993 ug/L	100
36) Tetrahydrofuran	9.50	42	183509	92.6535 ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	385302	53.5982 ug/L	100
39) Cyclohexane	9.80	56	550451	54.4562 ug/L	100
40) 1,1-Dichloropropene	9.95	75	331140	52.5584 ug/L	100
41) Carbon Tetrachloride	10.09	117	338384	54.4234 ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1383285	100.3070 ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:54 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

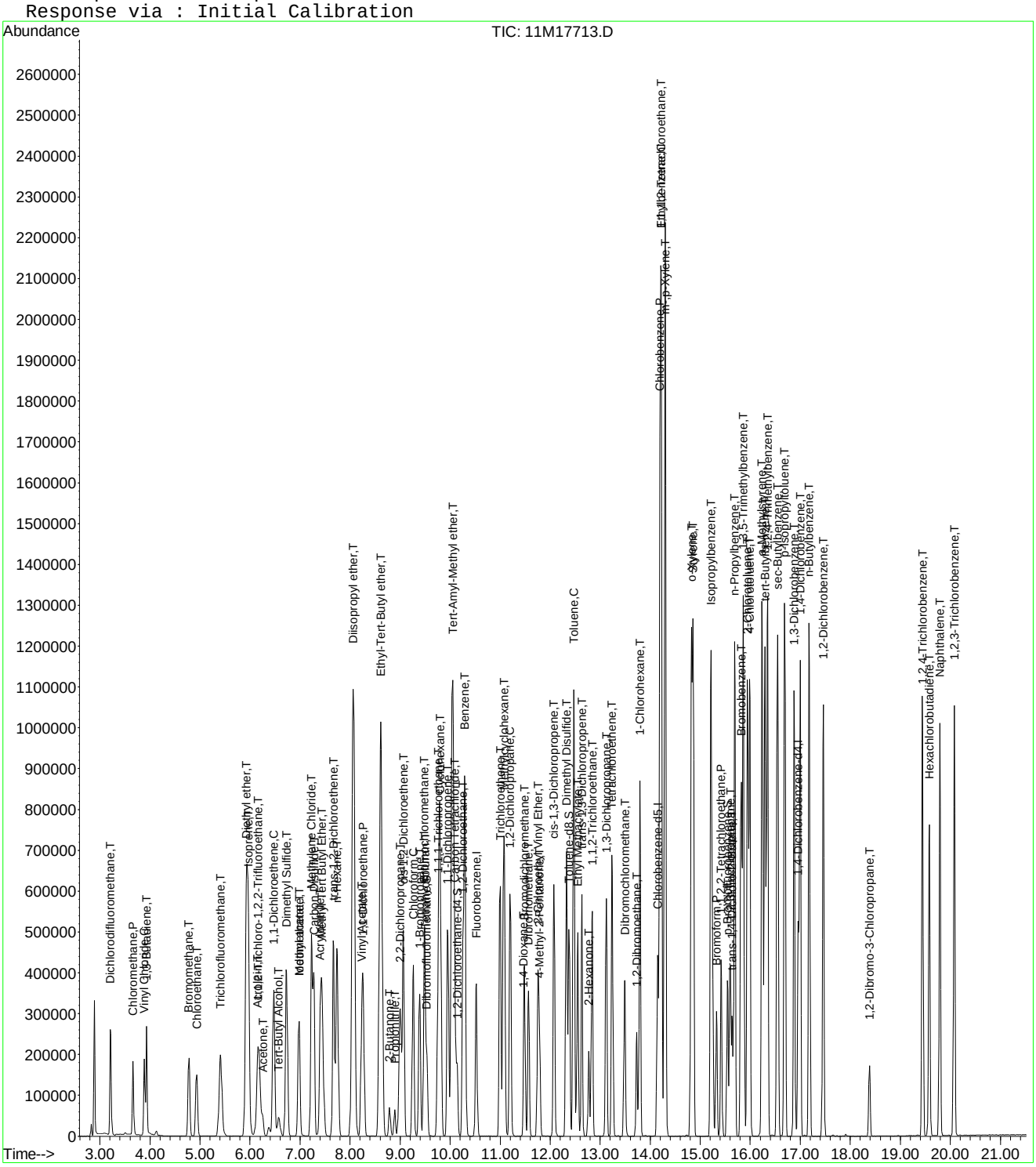
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	361701	51.9898	ug/L	100
45)	Benzene	10.29	78	968426	49.6158	ug/L	100
46)	Trichloroethene	11.00	130	265683	51.9297	ug/L	100
47)	Methylcyclohexane	11.07	83	432180	55.0967	ug/L	100
48)	1,2-Dichloropropane	11.20	63	313159	51.5511	ug/L	100
49)	1,4-Dioxane	11.47	88	10688	194.8334	ug/L	100
50)	Bromodichloromethane	11.49	83	337537	53.2585	ug/L	100
51)	Dibromomethane	11.57	93	152290	52.9965	ug/L	100
52)	2-Chloroethyl Vinyl Ether	11.76	63	178405	53.7542	ug/L	100
53)	4-Methyl-2-Pentanone	11.79	58	105435	49.3340	ug/L	100
54)	cis-1,3-Dichloropropene	12.08	75	412082	54.8017	ug/L	100
55)	Dimethyl Disulfide	12.32	79	244059	52.0010	ug/L	100
58)	Toluene	12.47	91	1001084	48.1931	ug/L	100
59)	Ethyl Methacrylate	12.55	69	315794	55.3143	ug/L	100
60)	trans-1,3-Dichloropropene	12.64	75	366578	55.9049	ug/L	100
61)	1,1,2-Trichloroethane	12.84	97	225750	51.5190	ug/L	100
62)	2-Hexanone	12.77	43	185197	50.8721	ug/L	100
63)	1,3-Dichloropropane	13.12	76	380682	52.3080	ug/L	100
64)	Tetrachloroethene	13.23	164	223637	54.2361	ug/L	100
65)	Dibromochloromethane	13.49	129	269291	55.1237	ug/L	100
66)	1,2-Dibromoethane	13.73	107	209203	53.1091	ug/L	100
67)	1-Chlorohexane	13.79	91	332337	56.1415	ug/L	100
68)	Chlorobenzene	14.20	112	662611	50.1608	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	264376	53.7567	ug/L	100
70)	Ethylbenzene	14.22	106	377411	54.0278	ug/L	100
71)	m-,p-Xylene	14.30	106	860460	102.9467	ug/L	100
72)	o-Xylene	14.83	106	448780	53.2881	ug/L	100
73)	Styrene	14.86	104	726395	58.1938	ug/L	100
74)	Bromoform	15.32	173	189058	54.0081	ug/L	100
75)	Isopropylbenzene	15.22	105	1056621	51.4287	ug/L	100
77)	1,1,2,2-Tetrachloroethane	15.42	83	286055	51.0900	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	84214	52.5272	ug/L	100
80)	trans-1,4-Dichloro-2-Buten	15.63	53	86739	50.0359	ug/L	100
81)	n-Propylbenzene	15.69	91	1252755	50.1862	ug/L	100
82)	Bromobenzene	15.82	156	322294	53.0542	ug/L	100
83)	1,3,5-Trimethylbenzene	15.86	105	917525	53.7277	ug/L	100
84)	2-Chlorotoluene	15.94	91	795808	46.9558	ug/L	100
85)	4-Chlorotoluene	15.99	91	788645	51.5562	ug/L	100
86)	a-Methylstyrene	16.23	118	529141	56.2190	ug/L	100
87)	tert-Butylbenzene	16.30	134	217546	52.3956	ug/L	100
88)	1,2,4-Trimethylbenzene	16.35	105	939986	52.6293	ug/L	100
89)	sec-Butylbenzene	16.54	105	1150332	51.0035	ug/L	100
90)	p-Isopropyltoluene	16.69	119	999581	55.1559	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	587925	54.4073	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	580973	49.9909	ug/L	100
93)	n-Butylbenzene	17.17	91	912776	56.4697	ug/L	100
94)	1,2-Dichlorobenzene	17.46	146	580005	53.1914	ug/L	100
95)	1,2-Dibromo-3-Chloropropan	18.38	75	51998	52.9295	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	445578	56.9178	ug/L	100
97)	Hexachlorobutadiene	19.58	225	224987	54.1880	ug/L	100
98)	Naphthalene	19.79	128	942009	53.9528	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	430160	53.7098	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17713.D 8260WT.M Tue Apr 25 14:18:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17713.D Vial: 8
Acq On : 24 Apr 2017 19:57 Operator: JDS
Sample : WG611320-08 50ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	443137	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	325943	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	184790	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	229531	52.2924	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 209.16%#			
43) 1,2-Dichloroethane-d4	10.14	65	262519	51.5376	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 206.16%#			
57) Toluene-d8	12.38	98	850522	50.2539	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 201.00%#			
78) p-Bromofluorobenzene	15.54	95	335482	52.2328	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 208.92%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	604893	111.0366	ug/L	98
3) Chloromethane	3.66	50	588818	111.5874	ug/L	99
4) Vinyl Chloride	3.88	62	393311	103.4130	ug/L	99
5) 1,3-Butadiene	3.92	54	190798	93.9693	ug/L	99
6) Bromomethane	4.77	94	376626	95.9057	ug/L	100
7) Chloroethane	4.92	64	418888	106.3250	ug/L	100
8) Trichlorofluoromethane	5.41	101	730248	109.9017	ug/L	100
9) Diethyl ether	5.92	59	959569	195.1474	ug/L	99
10) Isoprene	5.96	67	784840	114.0143	ug/L	98
11) Acrolein	6.15	56	82672	105.7031	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	429066	109.0365	ug/L	99
13) Acetone	6.25	43	151205	102.0502	ug/L	96
14) 1,1-Dichloroethene	6.46	61	828852	104.7339	ug/L	98
15) Tert-Butyl Alcohol	6.58	59	222885	402.1803	ug/L	98
16) Dimethyl Sulfide	6.72	62	640880	103.0843	ug/L	99
17) Iodomethane	6.97	142	588728	107.0077	ug/L	99
18) Methyl acetate	6.98	43	472053	101.0142	ug/L	99
19) Methylene Chloride	7.23	84	522767	99.0045	ug/L	98
20) Carbon Disulfide	7.27	76	1365403	100.9081	ug/L	98
21) Acrylonitrile	7.40	53	226916	103.6910	ug/L	100
22) Methyl Tert Butyl Ether	7.43	73	1345867	101.7844	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	492184	102.1998	ug/L	98
24) n-Hexane	7.73	57	826192	110.6117	ug/L	100
25) Diisopropyl ether	8.06	45	3381163	175.5893	ug/L	94
26) Vinyl Acetate	8.23	43	998822	111.1193	ug/L	98
27) 1,1-Dichloroethane	8.26	63	1014407	99.9350	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	3057711	179.6459	ug/L	94
29) 2-Butanone	8.79	43	246500	101.8157	ug/L	100
30) Propionitrile	8.89	54	165540	204.9617	ug/L	100
31) 2,2-Dichloropropane	9.00	77	669887	97.4961	ug/L	99
32) cis-1,2-Dichloroethene	9.07	96	560030	103.6295	ug/L	99
33) Chloroform	9.26	83	843333	104.8637	ug/L	99
34) 1-Bromopropane	9.39	122	109496	101.0518	ug/L	98
35) Bromochloromethane	9.48	130	348028	105.0319	ug/L	99
36) Tetrahydrofuran	9.50	42	358633	181.8616	ug/L	100
38) 1,1,1-Trichloroethane	9.76	97	776308	108.4599	ug/L	100
39) Cyclohexane	9.79	56	1081578	107.4665	ug/L	98
40) 1,1-Dichloropropene	9.95	75	677069	107.9320	ug/L	100
41) Carbon Tetrachloride	10.09	117	688454	111.2083	ug/L	100
42) Tert-Amyl-Methyl ether	10.04	73	2515859	183.2282	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17714.D 8260WT.M Tue Apr 25 14:18:37 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:56 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

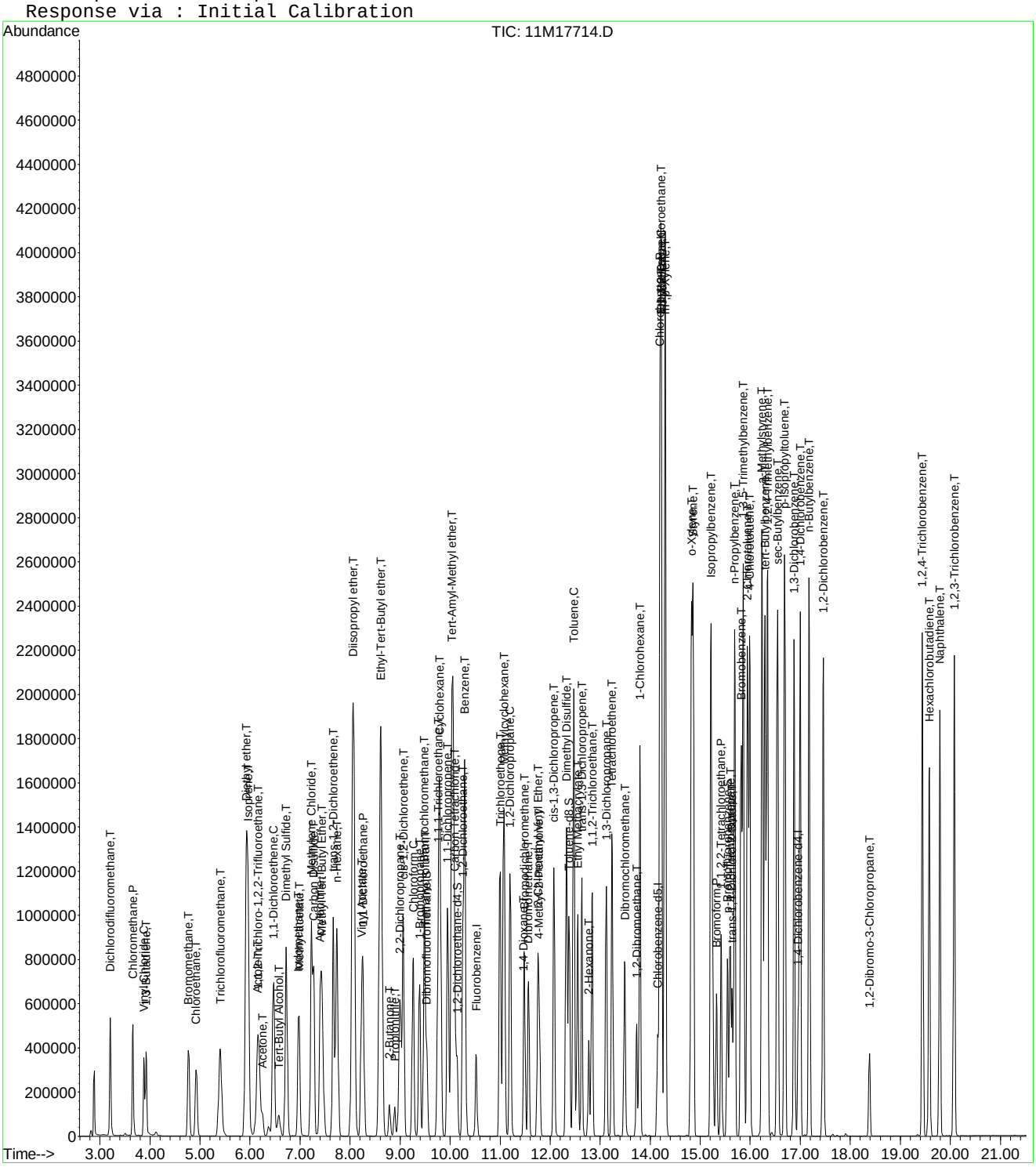
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	703902	101.6171	ug/L	99
45)	Benzene	10.29	78	1772720	91.2179	ug/L	96
46)	Trichloroethene	11.00	130	526193	103.2959	ug/L	99
47)	Methylcyclohexane	11.07	83	864734	110.7210	ug/L	98
48)	1,2-Dichloropropane	11.20	63	621334	102.7270	ug/L	98
49)	1,4-Dioxane	11.47	88	21847	399.9864	ug/L	100
50)	Bromodichloromethane	11.49	83	666763	105.6636	ug/L	98
51)	Dibromomethane	11.56	93	305154	106.6549	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	360720	109.1595	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	219621	103.2101	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	801442	107.0456	ug/L	98
55)	Dimethyl Disulfide	12.32	79	507165	108.5307	ug/L	95
58)	Toluene	12.47	91	1805110	85.5381	ug/L	96
59)	Ethyl Methacrylate	12.55	69	643120	110.8835	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	711444	106.7986	ug/L	97
61)	1,1,2-Trichloroethane	12.84	97	452546	101.6585	ug/L	100
62)	2-Hexanone	12.77	43	372237	100.6483	ug/L	97
63)	1,3-Dichloropropane	13.12	76	735346	99.4578	ug/L	100
64)	Tetrachloroethene	13.23	164	452415	107.9998	ug/L	99
65)	Dibromochloromethane	13.49	129	551761	111.1755	ug/L	100
66)	1,2-Dibromoethane	13.73	107	420061	104.9675	ug/L	99
67)	1-Chlorohexane	13.79	91	683203	113.6048	ug/L	99
68)	Chlorobenzene	14.20	112	1245459	92.8061	ug/L	96
69)	1,1,1,2-Tetrachloroethane	14.22	131	529238	105.9261	ug/L	100
70)	Ethylbenzene	14.22	106	752987	106.1040	ug/L	84
71)	m-,p-Xylene	14.30	106	1591790	187.4601	ug/L	88
72)	o-Xylene	14.83	106	889860	104.0064	ug/L	91
73)	Styrene	14.86	104	1397203	110.1805	ug/L	95
74)	Bromoform	15.32	173	396884	111.6013	ug/L	99
75)	Isopropylbenzene	15.22	105	1927342	92.3393	ug/L	93
77)	1,1,2,2-Tetrachloroethane	15.42	83	602015	103.6290	ug/L	98
79)	1,2,3-Trichloropropane	15.60	110	173318	104.1913	ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	189961	105.6135	ug/L	93
81)	n-Propylbenzene	15.69	91	2210569	85.3513	ug/L	91
82)	Bromobenzene	15.82	156	659931	104.7018	ug/L	97
83)	1,3,5-Trimethylbenzene	15.86	105	1716523	96.8764	ug/L	95
84)	2-Chlorotoluene	15.94	91	1489900	84.7277	ug/L	94
85)	4-Chlorotoluene	15.99	91	1468871	92.5489	ug/L	94
86)	a-Methylstyrene	16.23	118	1076353	110.2184	ug/L	98
87)	tert-Butylbenzene	16.30	134	455630	105.7654	ug/L	90
88)	1,2,4-Trimethylbenzene	16.35	105	1743485	94.0832	ug/L	93
89)	sec-Butylbenzene	16.54	105	2092627	89.4244	ug/L	93
90)	p-Isopropyltoluene	16.69	119	1832480	97.4543	ug/L	92
91)	1,3-Dichlorobenzene	16.87	146	1155639	103.0731	ug/L	96
92)	1,4-Dichlorobenzene	17.00	146	1147317	95.1495	ug/L	96
93)	n-Butylbenzene	17.17	91	1724933	102.8517	ug/L	94
94)	1,2-Dichlorobenzene	17.46	146	1140737	100.8284	ug/L	96
95)	1,2-Dibromo-3-Chloropropan	18.38	75	110832	108.7337	ug/L	100
96)	1,2,4-Trichlorobenzene	19.44	180	905719	111.5079	ug/L	97
97)	Hexachlorobutadiene	19.58	225	498992	115.8317	ug/L	100
98)	Naphthalene	19.79	128	1716856	94.7722	ug/L #	95
99)	1,2,3-Trichlorobenzene	20.08	180	886147	106.6393	ug/L	98

(#) = qualifier out of range (m) = manual integration
11M17714.D 8260WT.M Tue Apr 25 14:18:37 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17714.D Vial: 9
Acq On : 24 Apr 2017 20:27 Operator: JDS
Sample : WG611320-09 100ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	441465	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	322306	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	194046	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	427205	97.6956 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 390.80%#		
43) 1,2-Dichloroethane-d4	10.14	65	489457	96.4538 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 385.80%#		
57) Toluene-d8	12.38	98	1472553	87.9891 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 351.96%#		
78) p-Bromofluorobenzene	15.54	95	652310	96.7169 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 386.88%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	1084654	199.6933 ug/L	97
3) Chloromethane	3.66	50	1072612	204.6696 ug/L	95
4) Vinyl Chloride	3.89	62	753560	198.8834 ug/L	94
5) 1,3-Butadiene	3.92	54	359863	195.2817 ug/L	97
6) Bromomethane	4.77	94	739600	189.0484 ug/L	99
7) Chloroethane	4.92	64	803022	204.6004 ug/L	99
8) Trichlorofluoromethane	5.40	101	1365610	206.3015 ug/L	99
9) Diethyl ether	5.91	59	1781	0.3636 ug/L #	1
10) Isoprene	5.96	67	1461947	213.1826 ug/L	99
11) Acrolein	6.16	56	214	0.2747 ug/L #	1
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	830314	211.8030 ug/L	100
13) Acetone	6.26	43	298659	202.3322 ug/L	99
14) 1,1-Dichloroethene	6.47	61	1526824	193.6605 ug/L	94
16) Dimethyl Sulfide	6.72	62	1192801	192.5864 ug/L	99
17) Iodomethane	6.97	142	1114937	202.3300 ug/L	97
18) Methyl acetate	6.98	43	891475	191.4885 ug/L	98
19) Methylene Chloride	7.23	84	984822	187.2173 ug/L	92
20) Carbon Disulfide	7.27	76	2316195	171.8233 ug/L	94
21) Acrylonitrile	7.43	53	29726	13.6350 ug/L #	29
22) Methyl Tert Butyl Ether	7.43	73	2477296	188.0610 ug/L	96
23) trans-1,2-Dichloroethene	7.66	96	925607	192.9261 ug/L	94
24) n-Hexane	7.73	57	1547358	207.9469 ug/L	98
25) Diisopropyl ether	8.07	45	8775	0.4574 ug/L	86
26) Vinyl Acetate	8.23	43	1736893	193.9619 ug/L	96
27) 1,1-Dichloroethane	8.26	63	1814215	179.4055 ug/L	95
28) Ethyl-Tert-Butyl ether	8.60	59	5748	0.3390 ug/L #	44
29) 2-Butanone	8.79	43	488651	202.5994 ug/L	99
31) 2,2-Dichloropropane	9.00	77	1243150	181.6148 ug/L	97
32) cis-1,2-Dichloroethene	9.07	96	1052119	195.4244 ug/L	95
33) Chloroform	9.26	83	1523744	190.3442 ug/L	95
34) 1-Bromopropane	9.39	122	216377	200.0929 ug/L	97
35) Bromochloromethane	9.48	130	668214	202.4251 ug/L	95
36) Tetrahydrofuran	9.51	42	6410	3.2628 ug/L	89
38) 1,1,1-Trichloroethane	9.76	97	1439508	201.8790 ug/L	98
39) Cyclohexane	9.79	56	1957676	195.2531 ug/L	95
40) 1,1-Dichloropropene	9.95	75	1233925	197.4457 ug/L	96
41) Carbon Tetrachloride	10.09	117	1293444	209.7256 ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3290	0.2405 ug/L #	71
44) 1,2-Dichloroethane	10.26	62	1275072	184.7698 ug/L	95
45) Benzene	10.29	78	2884485	148.9876 ug/L	87

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:58 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

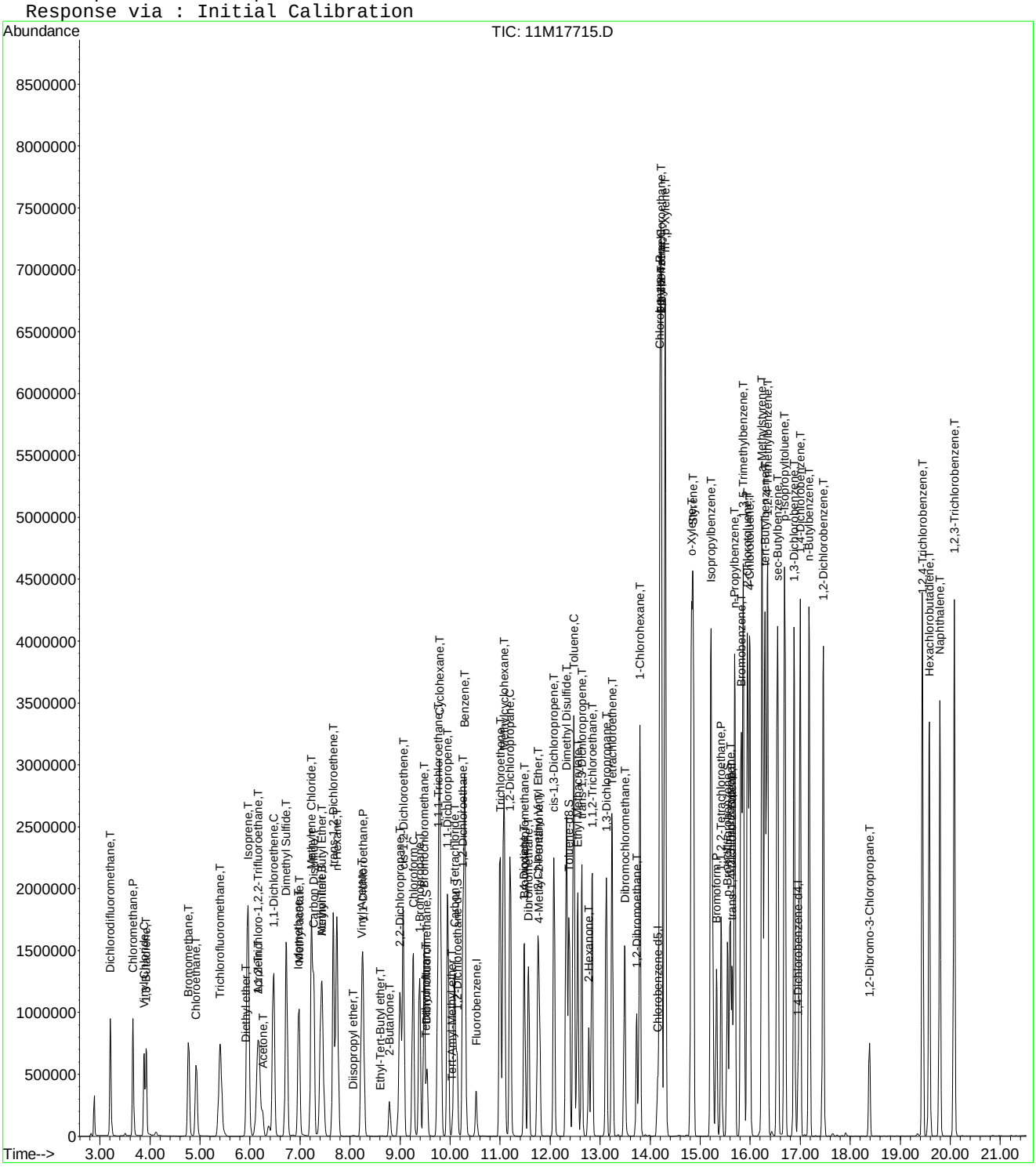
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
46)	Trichloroethene	11.00	130	991682	195.4125	ug/L		99
47)	Methylcyclohexane	11.07	83	1584915	203.7020	ug/L		98
48)	1,2-Dichloropropane	11.20	63	1154133	191.5390	ug/L		95
49)	1,4-Dioxane	11.48	88	1253	23.0275	ug/L	#	12
50)	Bromodichloromethane	11.49	83	1250957	198.9932	ug/L		96
51)	Dibromomethane	11.57	93	590911	207.3126	ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	700959	212.9246	ug/L		97
53)	4-Methyl-2-Pentanone	11.78	58	447607	211.1480	ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1441762	193.3001	ug/L		93
55)	Dimethyl Disulfide	12.33	79	980586	210.6351	ug/L		87
58)	Toluene	12.47	91	2836194	135.9144	ug/L		89
59)	Ethyl Methacrylate	12.55	69	1220047	212.7281	ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1297661	196.9969	ug/L		93
61)	1,1,2-Trichloroethane	12.84	97	863979	196.2716	ug/L		99
62)	2-Hexanone	12.77	43	746111	204.0158	ug/L		96
63)	1,3-Dichloropropane	13.12	76	1337916	182.9992	ug/L		97
64)	Tetrachloroethene	13.25	164	860212	207.6657	ug/L		99
65)	Dibromochloromethane	13.49	129	1052649	214.4940	ug/L		98
66)	1,2-Dibromoethane	13.73	107	824035	208.2388	ug/L		100
67)	1-Chlorohexane	13.79	91	1263938	212.5425	ug/L		100
68)	Chlorobenzene	14.20	112	2075953	156.4364	ug/L		87
69)	1,1,1,2-Tetrachloroethane	14.22	131	1000940	202.5970	ug/L		99
70)	Ethylbenzene	14.22	106	1371668	195.4640	ug/L		64
71)	m-,p-Xylene	14.30	106	2554712	304.2555	ug/L		75
72)	o-Xylene	14.83	106	1603783	189.5646	ug/L		78
73)	Styrene	14.86	104	2329255	185.7528	ug/L		85
74)	Bromoform	15.32	173	812860	231.1504	ug/L		97
75)	Isopropylbenzene	15.22	105	3024104	146.5203	ug/L		82
77)	1,1,2,2-Tetrachloroethane	15.42	83	1131498	185.4819	ug/L		96
79)	1,2,3-Trichloropropane	15.60	110	352057	201.5462	ug/L		94
80)	trans-1,4-Dichloro-2-Buten	15.63	53	395069	209.1712	ug/L		86
81)	n-Propylbenzene	15.69	91	3379886	124.2744	ug/L	#	78
82)	Bromobenzene	15.82	156	1242817	187.7744	ug/L		94
83)	1,3,5-Trimethylbenzene	15.86	105	2753405	147.9831	ug/L		86
84)	2-Chlorotoluene	15.94	91	2376893	128.7217	ug/L		82
85)	4-Chlorotoluene	15.99	91	2342047m	140.5261	ug/L		
86)	a-Methylstyrene	16.23	118	1883116	183.6328	ug/L		90
87)	tert-Butylbenzene	16.30	134	872813	192.9418	ug/L		76
88)	1,2,4-Trimethylbenzene	16.35	105	2762633	141.9681	ug/L		81
89)	sec-Butylbenzene	16.54	105	3225671	131.2678	ug/L	#	80
90)	p-Isopropyltoluene	16.69	119	2869693	145.3352	ug/L		81
91)	1,3-Dichlorobenzene	16.87	146	1985905	168.6768	ug/L		87
92)	1,4-Dichlorobenzene	17.00	146	1965623	155.2376	ug/L		88
93)	n-Butylbenzene	17.17	91	2713386	154.0723	ug/L	#	83
94)	1,2-Dichlorobenzene	17.46	146	1953869	164.4624	ug/L		89
95)	1,2-Dibromo-3-Chloropropan	18.38	75	232153	216.8937	ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	1657477	194.3271	ug/L		89
97)	Hexachlorobutadiene	19.58	225	977238	216.0270	ug/L		99
98)	Naphthalene	19.79	128	2796411	147.0016	ug/L	#	84
99)	1,2,3-Trichlorobenzene	20.08	180	1654465	189.6020	ug/L		90

(#) = qualifier out of range (m) = manual integration
11M17715.D 8260WT.M Tue Apr 25 14:18:51 2017 Page 2

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

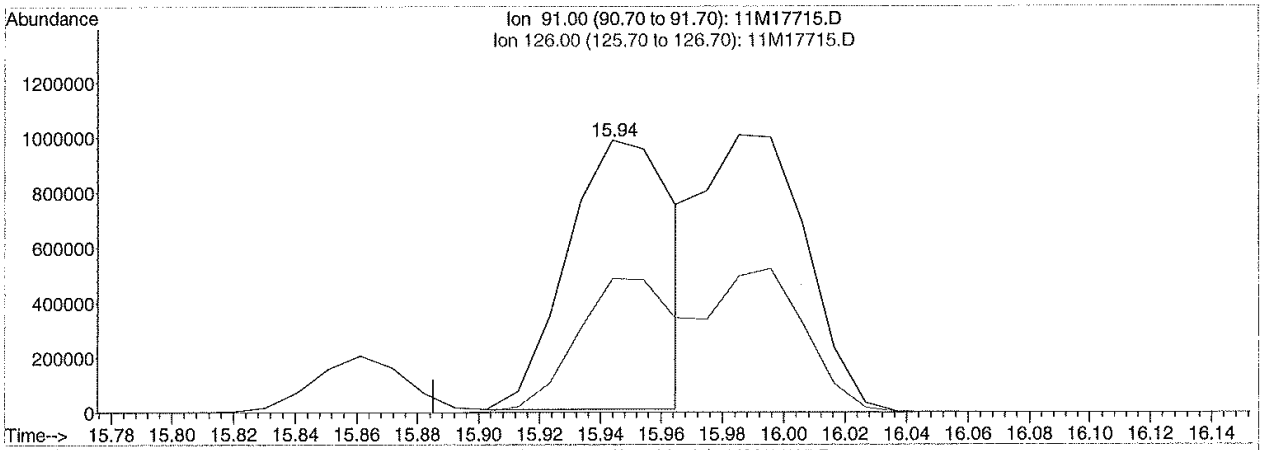
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

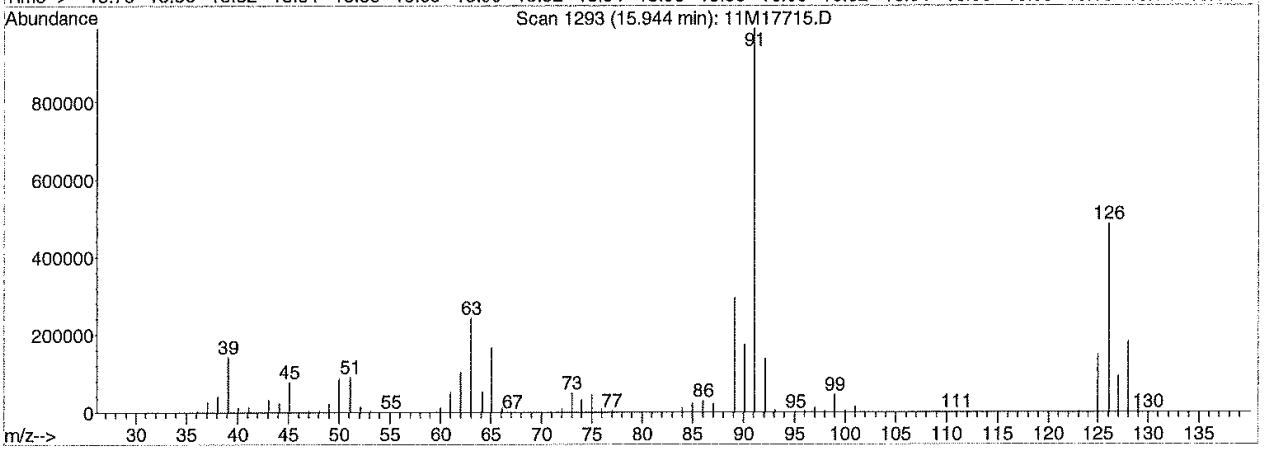


Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 11:55 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration





TIC: 11M17715.D

(85) 4-Chlorotoluene (T)

15.94min 142.76ug/L

response 2376893

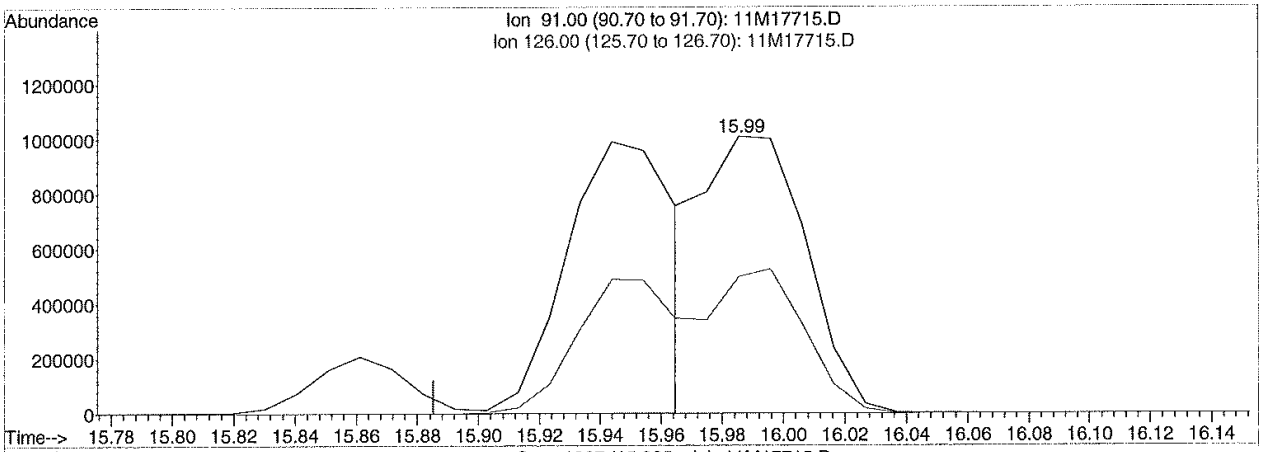
Ion	Exp%	Act%
91.00	100	100
126.00	29.80	54.18#
0.00	0.00	0.00
0.00	0.00	0.00

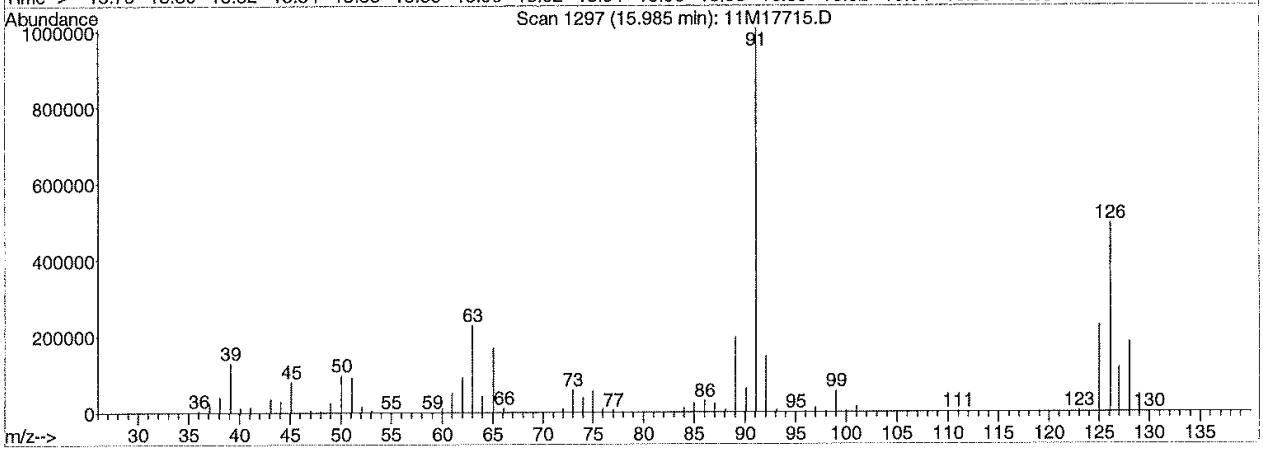
11M17715.D 8260WT.M Tue Apr 25 12:01:28 2017

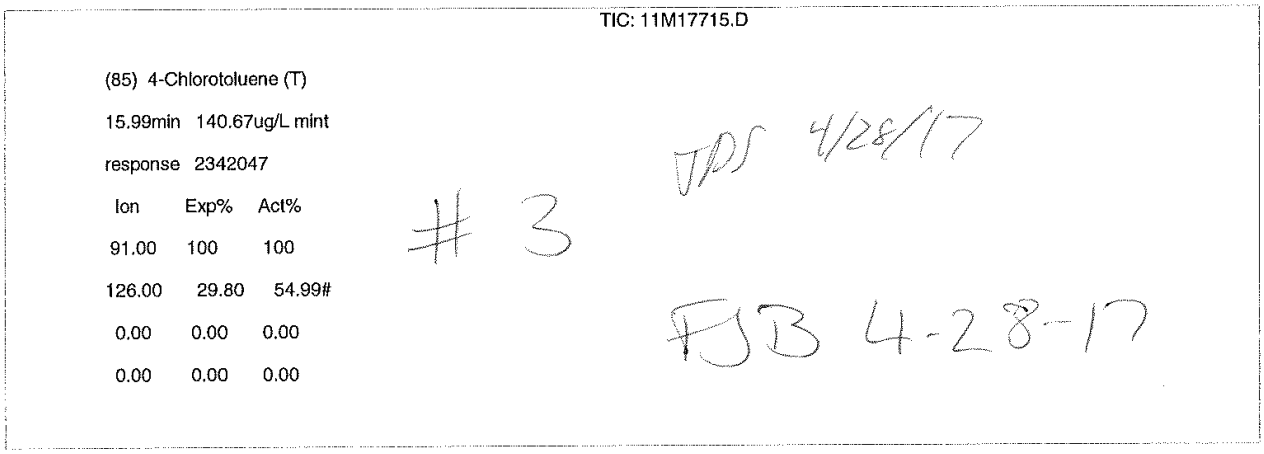
Quantitation Report (Qedit)

Data File : C:\MSDCHEM\1\DATA\042417\11M17715.D Vial: 10
Acq On : 24 Apr 2017 20:56 Operator: JDS
Sample : WG611320-10 200ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 12:01 2017 Quant Results File: temp.res

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 11:45:31 2017
Response via : Multiple Level Calibration







11M17715.D 8260WT.M Tue Apr 25 12:01:47 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	429502	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	318865	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	200748	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	10.13	65	920	0.1863	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.76%#		
57) Toluene-d8	12.38	98	3446	0.2081	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.84%#		
78) p-Bromofluorobenzene	15.54	95	4319	0.6190	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.48%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	1487704	281.4427	ug/L	94
3) Chloromethane	3.65	50	1480946	290.7743	ug/L	90
4) Vinyl Chloride	3.88	62	935582	253.8011	ug/L	92
5) 1,3-Butadiene	3.92	54	492171	305.3526	ug/L	98
6) Bromomethane	4.76	94	1056026	277.4481	ug/L	99
7) Chloroethane	4.91	64	1133716	296.9029	ug/L	97
8) Trichlorofluoromethane	5.40	101	1922550	298.5276	ug/L	98
9) Diethyl ether	5.91	59	1328532	278.7605	ug/L	98
10) Isoprene	5.96	67	2048327	307.0085	ug/L	100
11) Acrolein	6.15	56	114318	150.8053	ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	1203713	315.6049	ug/L	100
13) Acetone	6.25	43	420970	293.1377	ug/L	98
14) 1,1-Dichloroethene	6.46	61	2091321	272.6490	ug/L	91
15) Tert-Butyl Alcohol	6.59	59	366938	683.1333	ug/L	97
16) Dimethyl Sulfide	6.72	62	1656354	274.8792	ug/L	98
17) Iodomethane	6.97	142	1542193	287.1503	ug/L	95
18) Methyl acetate	6.98	43	1256510	277.4153	ug/L	96
19) Methylene Chloride	7.23	84	1370000	267.6948	ug/L	87
20) Carbon Disulfide	7.27	76	3008057	229.3634	ug/L #	89
21) Acrylonitrile	7.40	53	351015	165.4910	ug/L	95
22) Methyl Tert Butyl Ether	7.43	73	3363996	262.4868	ug/L	92
23) trans-1,2-Dichloroethene	7.66	96	1305110	279.6035	ug/L	89
24) n-Hexane	7.73	57	2144691	296.2494	ug/L	96
25) Diisopropyl ether	8.07	45	4262729	228.3981	ug/L	89
26) Vinyl Acetate	8.22	43	2303029	264.3467	ug/L	93
27) 1,1-Dichloroethane	8.26	63	2412009	245.1642	ug/L	91
28) Ethyl-Tert-Butyl ether	8.61	59	3953810	239.6677	ug/L	89
29) 2-Butanone	8.79	43	710548	302.8056	ug/L	97
30) Propionitrile	8.89	54	247789	316.5371	ug/L	98
31) 2,2-Dichloropropane	9.00	77	1720909	258.4143	ug/L	95
32) cis-1,2-Dichloroethene	9.06	96	1463102	279.3312	ug/L	92
33) Chloroform	9.25	83	2060764	264.6739	ug/L	93
34) 1-Bromopropane	9.39	122	315354	299.5645	ug/L	96
35) Bromochloromethane	9.48	130	952566	296.6026	ug/L	92
36) Tetrahydrofuran	9.50	42	517016	270.5002	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	1972168	284.2838	ug/L	95
39) Cyclohexane	9.79	56	2655757	272.2554	ug/L	92
40) 1,1-Dichloropropene	9.95	75	1701002	279.7660	ug/L	93
41) Carbon Tetrachloride	10.09	117	1783305	297.2081	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	3323784	249.7535	ug/L	93

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:09:59 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

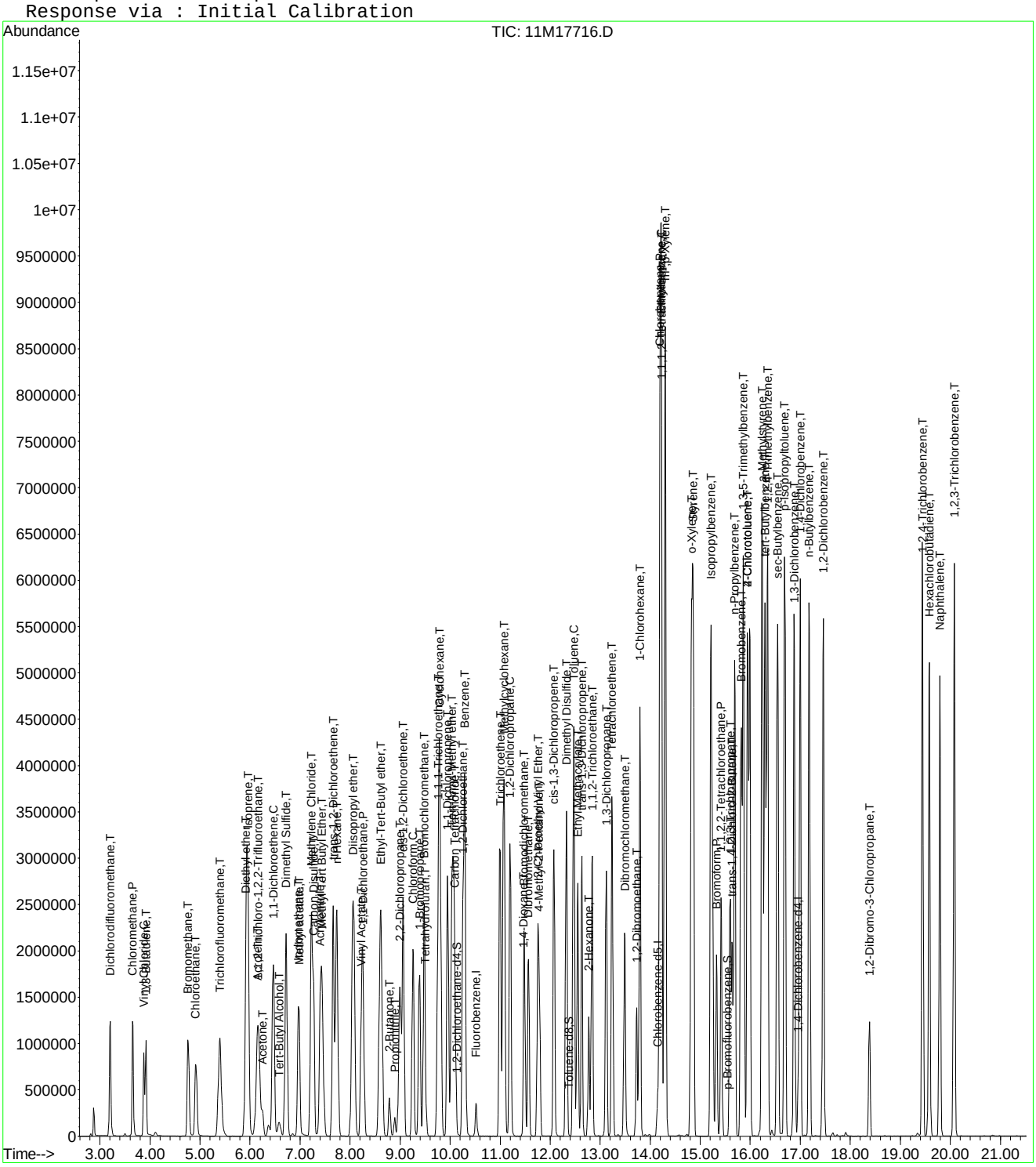
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
44)	1,2-Dichloroethane	10.26	62	1710065	254.7064 ug/L		91
45)	Benzene	10.29	78	3603219	191.2950 ug/L	#	80
46)	Trichloroethene	11.00	130	1366450	276.7609 ug/L		100
47)	Methylcyclohexane	11.07	83	2196028	290.1071 ug/L		97
48)	1,2-Dichloropropane	11.20	63	1593531	271.8272 ug/L		92
49)	1,4-Dioxane	11.47	88	38383	725.0453 ug/L		100
50)	Bromodichloromethane	11.48	83	1718011	280.9007 ug/L		93
51)	Dibromomethane	11.56	93	835997	301.4668 ug/L		99
52)	2-Chloroethyl Vinyl Ether	11.76	63	1008145	314.7656 ug/L		95
53)	4-Methyl-2-Pentanone	11.78	58	661993	320.9775 ug/L		99
54)	cis-1,3-Dichloropropene	12.08	75	1929512	265.8993 ug/L	#	88
55)	Dimethyl Disulfide	12.32	79	1370273	302.5404 ug/L		78
58)	Toluene	12.47	91	3489025	169.0032 ug/L		85
59)	Ethyl Methacrylate	12.55	69	1689598	297.7784 ug/L		100
60)	trans-1,3-Dichloropropene	12.64	75	1741147	267.1745 ug/L		88
61)	1,1,2-Trichloroethane	12.84	97	1214759	278.9368 ug/L		98
62)	2-Hexanone	12.77	43	1066539	294.7804 ug/L		93
63)	1,3-Dichloropropane	13.12	76	1799199	248.7488 ug/L		96
64)	Tetrachloroethene	13.23	164	1207755	294.7132 ug/L		98
65)	Dibromochloromethane	13.49	129	1478641	304.5480 ug/L		96
66)	1,2-Dibromoethane	13.73	107	1164847	297.5407 ug/L		99
67)	1-Chlorohexane	13.79	91	1750520	297.5423 ug/L		99
68)	Chlorobenzene	14.20	112	2641462	201.1992 ug/L		80
69)	1,1,1,2-Tetrachloroethane	14.23	131	1406828	287.8244 ug/L		99
70)	Ethylbenzene	14.22	106	1848656	266.2781 ug/L		53
71)	m-,p-Xylene	14.30	106	3154067	379.6898 ug/L		70
72)	o-Xylene	14.83	106	2131378	254.6441 ug/L		71
73)	Styrene	14.86	104	2958704	238.4962 ug/L		78
74)	Bromoform	15.32	173	1167450	335.5665 ug/L		94
75)	Isopropylbenzene	15.22	105	3705942	181.4936 ug/L	#	73
77)	1,1,2,2-Tetrachloroethane	15.42	83	1605655	254.4213 ug/L		93
79)	1,2,3-Trichloropropane	15.60	110	526530	291.3655 ug/L		92
80)	trans-1,4-Dichloro-2-Buten	15.63	53	599834	306.9824 ug/L		82
81)	n-Propylbenzene	15.69	91	4071066	144.6909 ug/L	#	68
82)	Bromobenzene	15.82	156	1701392	248.4775 ug/L		92
83)	1,3,5-Trimethylbenzene	15.86	105	3402009	176.7384 ug/L		81
84)	2-Chlorotoluene	15.94	91	2879340	150.7262 ug/L	#	70
85)	4-Chlorotoluene	15.94	91	2879340	166.9966 ug/L	#	42
86)	a-Methylstyrene	16.24	118	2469841	232.8068 ug/L		85
87)	tert-Butylbenzene	16.30	134	1242715	265.5401 ug/L		65
88)	1,2,4-Trimethylbenzene	16.35	105	3404948	169.1342 ug/L		72
89)	sec-Butylbenzene	16.54	105	3933155	154.7151 ug/L	#	71
90)	p-Isopropyltoluene	16.69	119	3530046	172.8101 ug/L	#	71
91)	1,3-Dichlorobenzene	16.88	146	2590010	212.6434 ug/L		80
92)	1,4-Dichlorobenzene	17.00	146	2551626	194.7903 ug/L		81
93)	n-Butylbenzene	17.17	91	3379892	185.5108 ug/L	#	74
94)	1,2-Dichlorobenzene	17.46	146	2581451	210.0335 ug/L		81
95)	1,2-Dibromo-3-Chloropropan	18.38	75	382233	345.1869 ug/L		100
96)	1,2,4-Trichlorobenzene	19.45	180	2249860	254.9734 ug/L		82
97)	Hexachlorobutadiene	19.58	225	1458179	311.5817 ug/L		96
98)	Naphthalene	19.79	128	3489261	177.2997 ug/L	#	73
99)	1,2,3-Trichlorobenzene	20.08	180	2249648	249.2030 ug/L		84

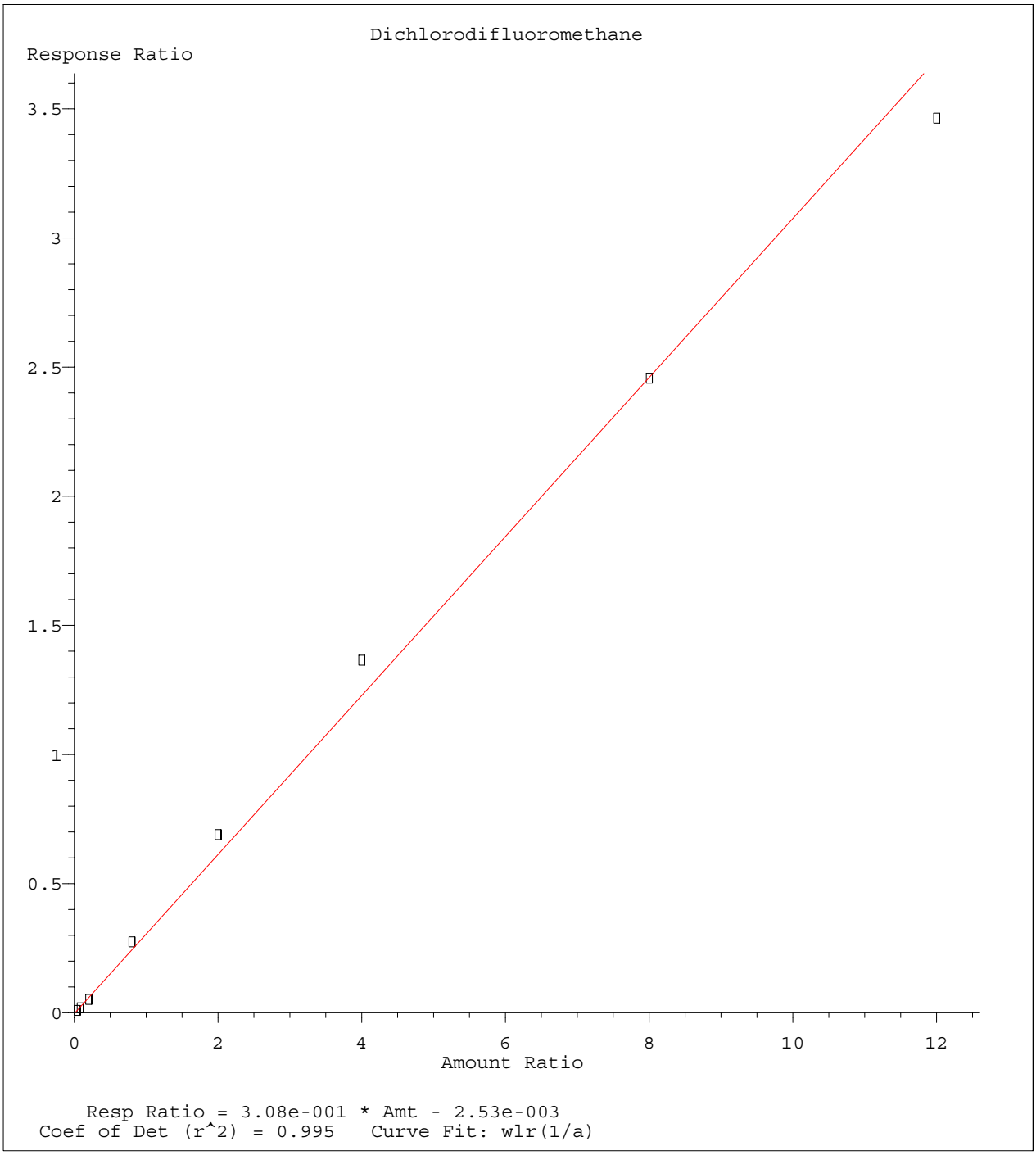
(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

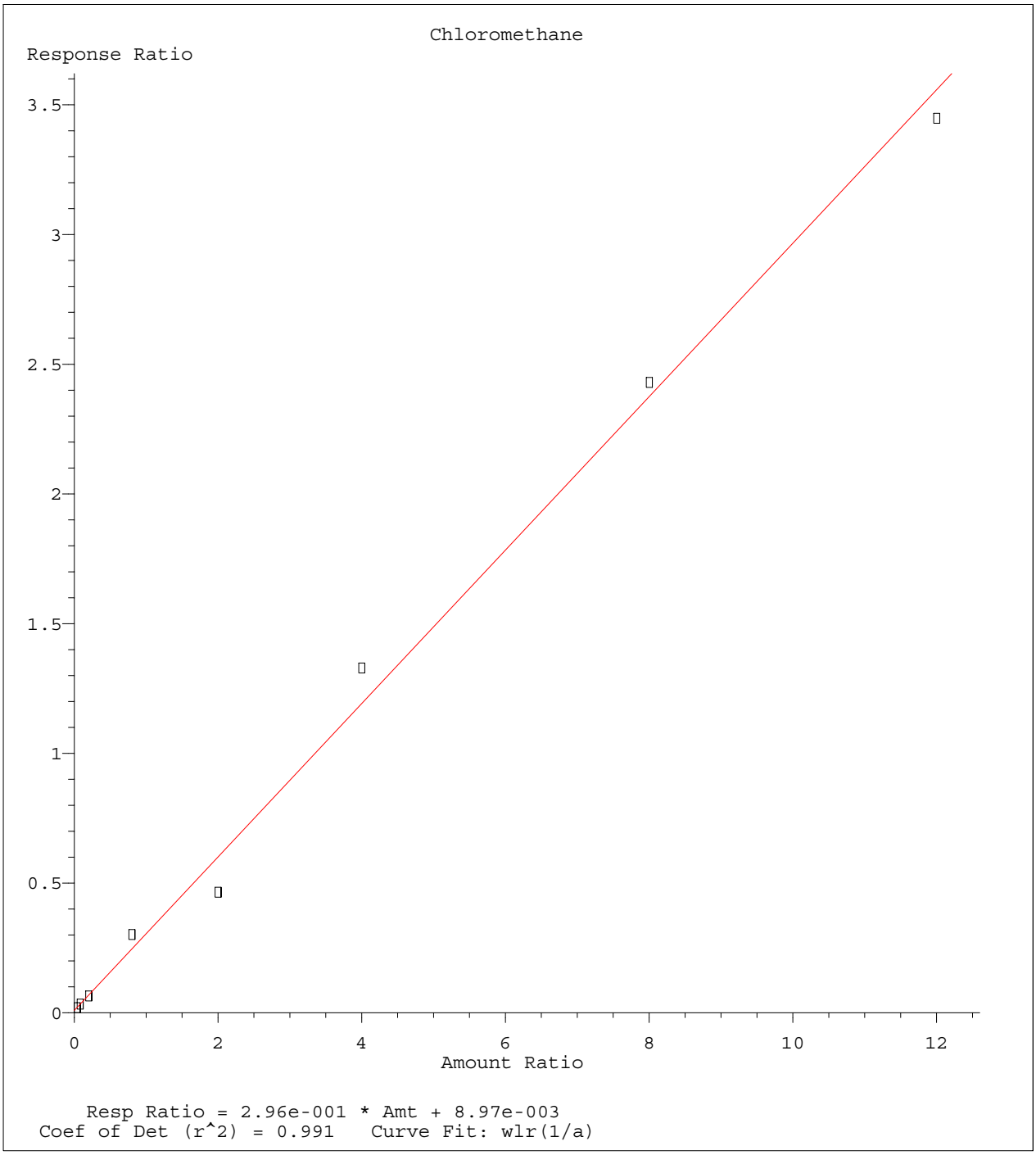
Data File : C:\MSDCHEM\1\DATA\042417\11M17716.D Vial: 11
Acq On : 24 Apr 2017 21:26 Operator: JDS
Sample : WG611320-11 300ug/L ICAL 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 14:10 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

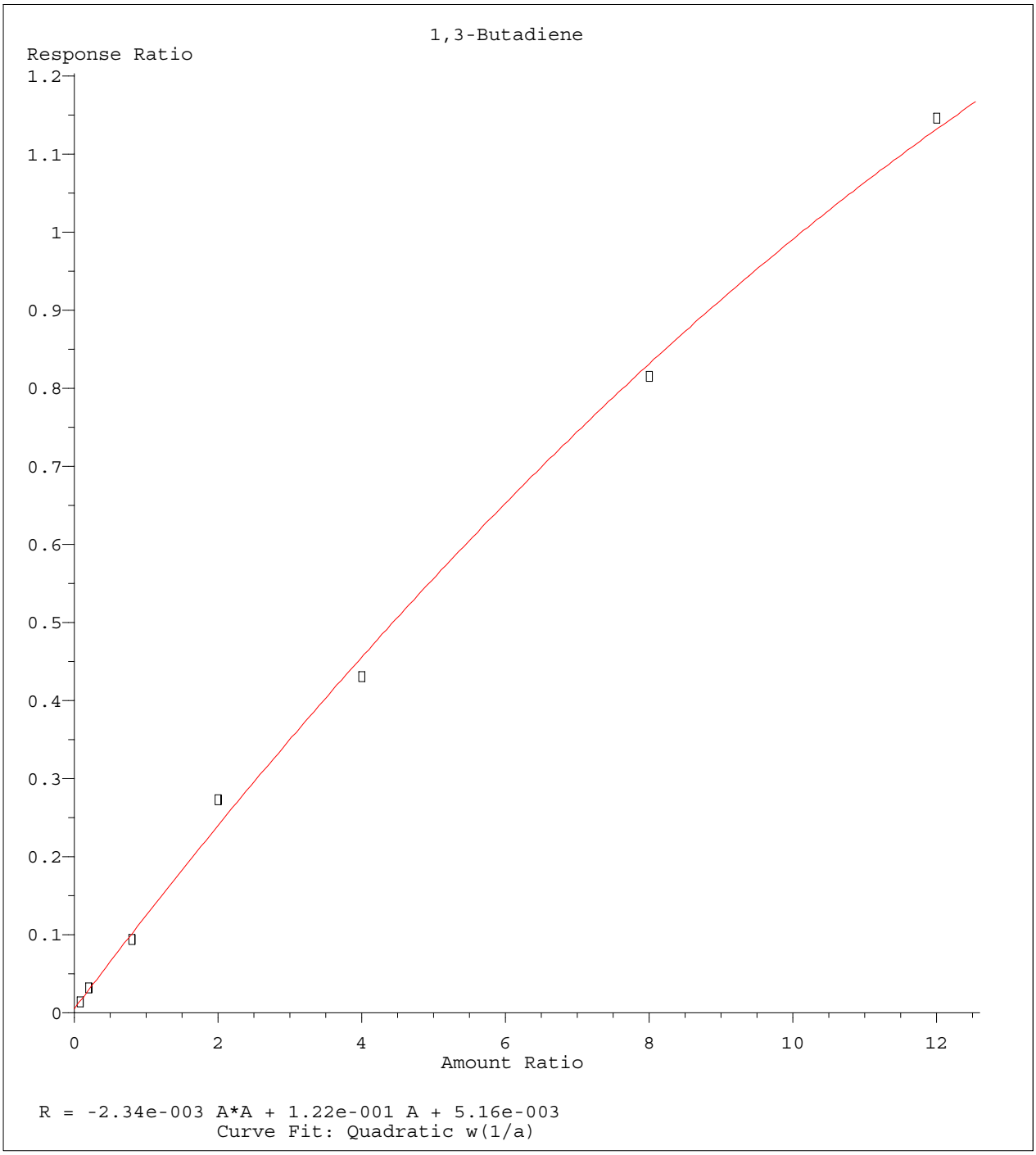




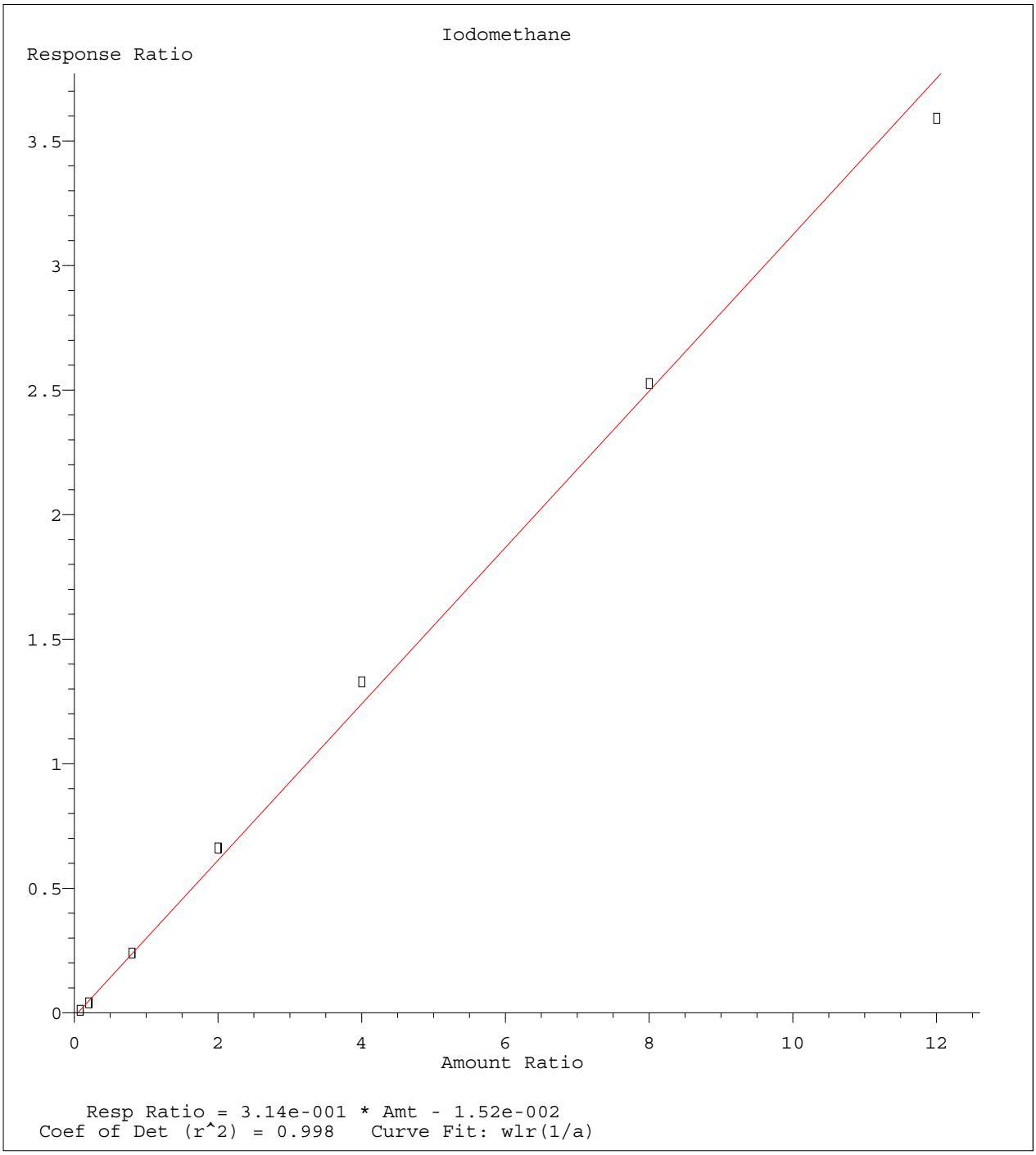
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



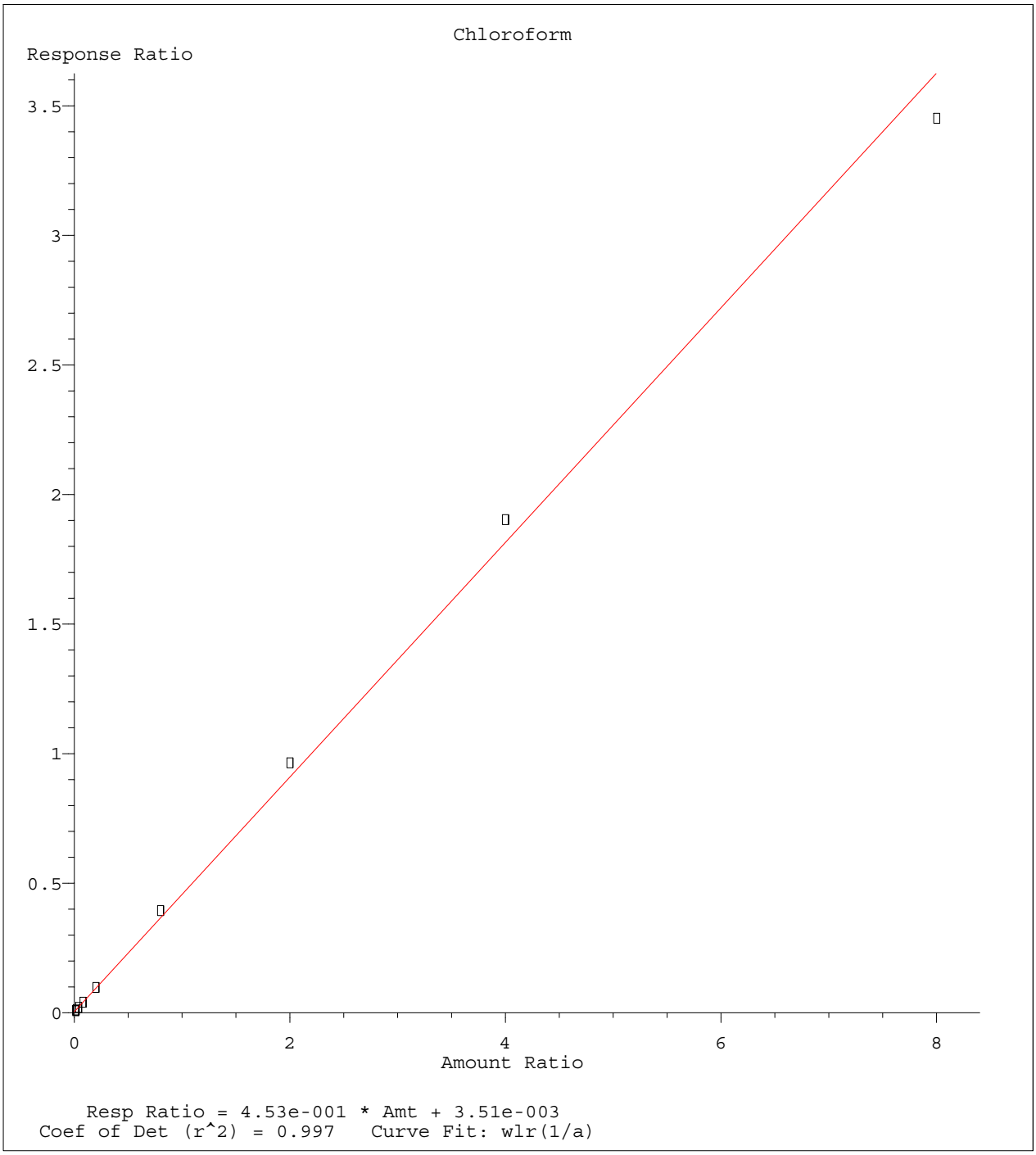
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



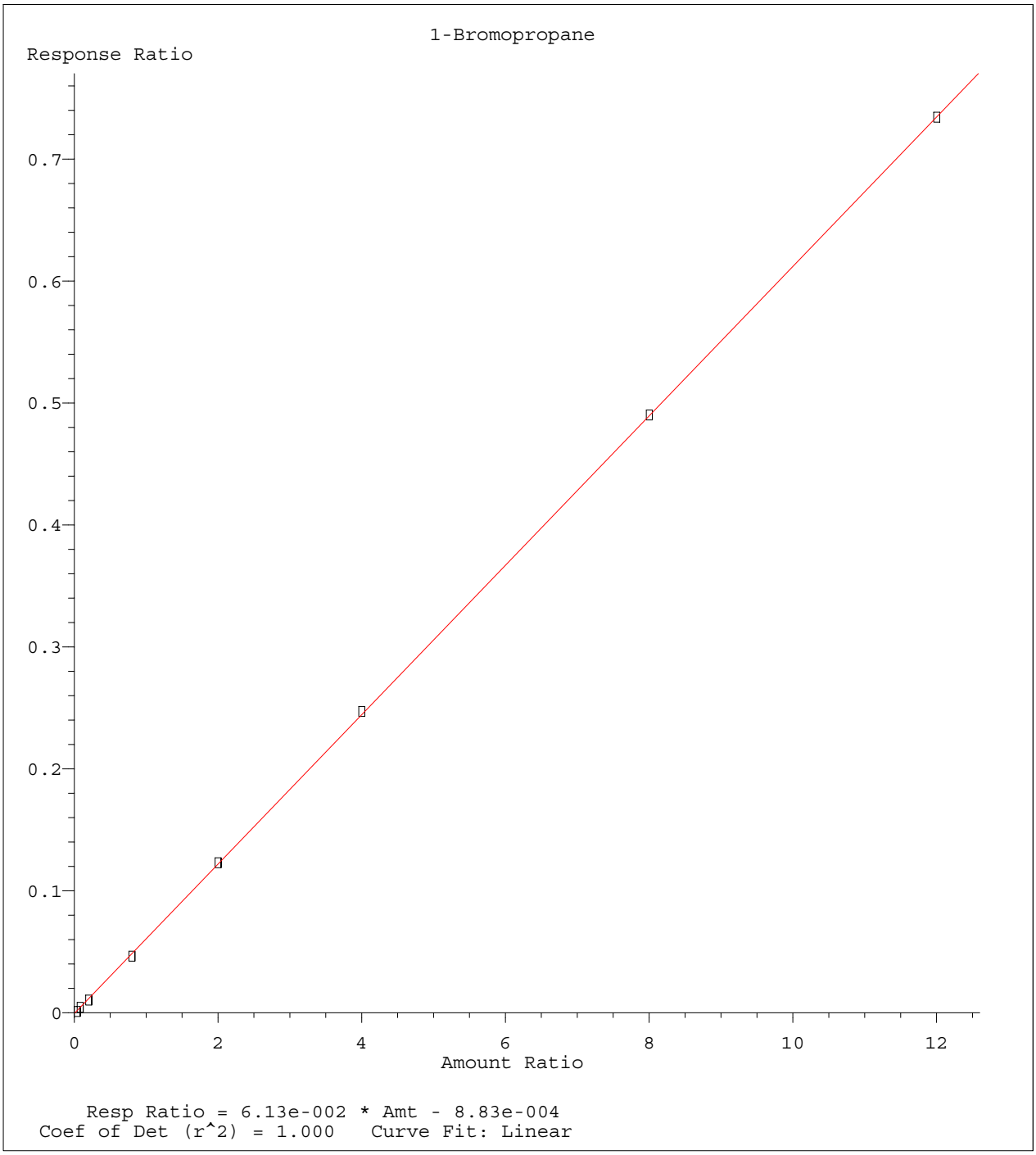
Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017



Method Name: C:\MSDCHEM\1\METHODS\8260WT.M
Calibration Table Last Updated: Tue Apr 25 12:03:16 2017

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	404778	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	296292	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	174279	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	102600	25.5897	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.36%			
43) 1,2-Dichloroethane-d4	10.14	65	115358	24.7932	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.16%			
57) Toluene-d8	12.38	98	408420	26.5469	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%			
78) p-Bromofluorobenzene	15.54	95	155220	25.6245	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.48%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	321438	63.6532	ug/L	100
3) Chloromethane	3.66	50	314119	64.5824	ug/L	99
4) Vinyl Chloride	3.89	62	181213	52.1614	ug/L	100
5) 1,3-Butadiene	3.93	54	123931	71.8739	ug/L	99
6) Bromomethane	4.77	94	183192	51.0695	ug/L	100
7) Chloroethane	4.92	64	212398	59.0213	ug/L	100
8) Trichlorofluoromethane	5.40	101	335310	55.2461	ug/L	100
9) Diethyl ether	5.92	59	429716	95.6729	ug/L	99
10) Isoprene	5.96	67	323465	51.4431	ug/L	97
11) Acrolein	6.16	56	75414	105.5607	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.17	101	211256	58.7730	ug/L	99
13) Acetone	6.26	43	65342	48.2793	ug/L	98
14) 1,1-Dichloroethene	6.46	61	345883	47.8477	ug/L	100
15) Tert-Butyl Alcohol	6.59	59	109193	215.7028	ug/L	98
16) Dimethyl Sulfide	6.72	62	288119	50.7351	ug/L	98
17) Iodomethane	6.97	142	222809	43.3262	ug/L	100
18) Methyl acetate	6.99	43	188374	44.1300	ug/L	98
19) Methylene Chloride	7.23	84	226129	46.8839	ug/L	98
20) Carbon Disulfide	7.27	76	495160	40.0619	ug/L	99
21) Acrylonitrile	7.40	53	99809	49.9306	ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	612436	50.7062	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	215317	48.9466	ug/L	100
24) n-Hexane	7.73	57	327658	48.0244	ug/L	99
25) Diisopropyl ether	8.07	45	1754893	99.7708	ug/L	98
26) Vinyl Acetate	8.23	43	491772	59.8944	ug/L	100
27) 1,1-Dichloroethane	8.26	63	443691	47.8528	ug/L	100
28) Ethyl-Tert-Butyl ether	8.61	59	1500356	96.5020	ug/L	99
29) 2-Butanone	8.79	43	111441	50.3923	ug/L	99
30) Propionitrile	8.89	54	75625	102.5076	ug/L	100
31) 2,2-Dichloropropane	9.00	77	271137	43.2012	ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	246617	49.9593	ug/L	98
33) Chloroform	9.26	83	383109	52.4059	ug/L	100
34) 1-Bromopropane	9.39	122	61677	62.4526	ug/L	99
35) Bromochloromethane	9.48	130	151874	50.1778	ug/L	97
36) Tetrahydrofuran	9.50	42	159523	88.5595	ug/L	98
38) 1,1,1-Trichloroethane	9.77	97	342769	52.4274	ug/L	98
39) Cyclohexane	9.79	56	420990	45.7940	ug/L	98
40) 1,1-Dichloropropene	9.95	75	291345	50.8447	ug/L	99
41) Carbon Tetrachloride	10.09	117	295888	52.3252	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1274020	101.5789	ug/L	97

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 09:57:53 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

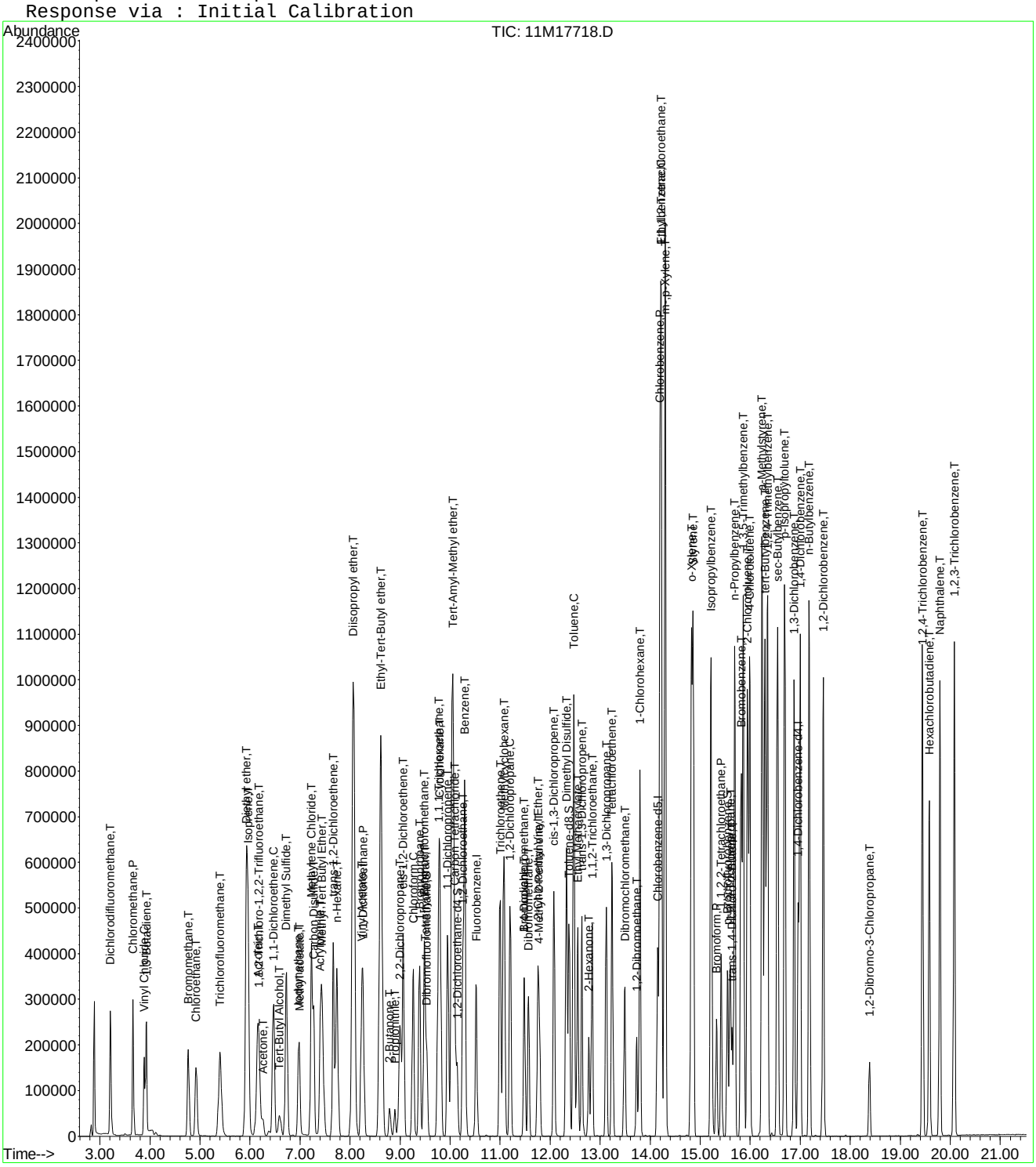
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	297642	47.0403	ug/L	99
45)	Benzene	10.29	78	857754	48.3197	ug/L	99
46)	Trichloroethene	11.00	130	228970	49.2082	ug/L	99
47)	Methylcyclohexane	11.07	83	365405	51.2204	ug/L	98
48)	1,2-Dichloropropane	11.20	63	268004	48.5090	ug/L	100
49)	1,4-Dioxane	11.48	88	11767	235.8524	ug/L	99
50)	Bromodichloromethane	11.48	83	285760	49.5766	ug/L	100
51)	Dibromomethane	11.57	93	132263	50.6083	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	168900	55.9554	ug/L	98
53)	4-Methyl-2-Pentanone	11.78	58	102676	52.8249	ug/L	99
54)	cis-1,3-Dichloropropene	12.08	75	366912	53.6513	ug/L	100
55)	Dimethyl Disulfide	12.32	79	227275	53.2447	ug/L	99
58)	Toluene	12.47	91	900488	46.9414	ug/L	98
59)	Ethyl Methacrylate	12.55	69	307663	58.3542	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	303988	50.1999	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	194833	48.1466	ug/L	99
62)	2-Hexanone	12.77	43	182967	54.4229	ug/L	96
63)	1,3-Dichloropropane	13.12	76	338332	50.3398	ug/L	95
64)	Tetrachloroethene	13.23	164	200233	52.5828	ug/L	100
65)	Dibromochloromethane	13.49	129	229367	50.8406	ug/L	100
66)	1,2-Dibromoethane	13.73	107	180409	49.5933	ug/L	100
67)	1-Chlorohexane	13.79	91	319102	58.3711	ug/L	97
68)	Chlorobenzene	14.20	112	596714	48.9142	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.22	131	224771	49.4896	ug/L	100
70)	Ethylbenzene	14.22	106	341076	52.8710	ug/L	99
71)	m-,p-Xylene	14.30	106	782076	101.3197	ug/L	99
72)	o-Xylene	14.83	106	405843	52.1817	ug/L	99
73)	Styrene	14.86	104	667618	57.9155	ug/L	100
74)	Bromoform	15.32	173	162013	50.1161	ug/L	99
75)	Isopropylbenzene	15.22	105	948335	49.9817	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	269536	49.1954	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	77024	49.0961	ug/L	99
80)	trans-1,4-Dichloro-2-Buten	15.63	53	68075	40.1306	ug/L	82
81)	n-Propylbenzene	15.69	91	1116620	45.7135	ug/L	100
82)	Bromobenzene	15.82	156	297807	50.0984	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	842028	50.3881	ug/L	99
84)	2-Chlorotoluene	15.94	91	715077	43.1176	ug/L	89
85)	4-Chlorotoluene	15.99	91	744558	49.7920	ug/L	87
86)	a-Methylstyrene	16.23	118	539705	58.5989	ug/L	100
87)	tert-Butylbenzene	16.30	134	198172	48.7761	ug/L	98
88)	1,2,4-Trimethylbenzene	16.35	105	869183	49.7323	ug/L	100
89)	sec-Butylbenzene	16.54	105	1050045	47.5779	ug/L	100
90)	p-Isopropyltoluene	16.69	119	930341	52.4611	ug/L	100
91)	1,3-Dichlorobenzene	16.87	146	546568	51.6893	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	556363	48.9232	ug/L	99
93)	n-Butylbenzene	17.17	91	857941	54.0817	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	552370	51.7680	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	49841	51.8465	ug/L	100
96)	1,2,4-Trichlorobenzene	19.45	180	451948	58.9976	ug/L	100
97)	Hexachlorobutadiene	19.58	225	223584	55.0311	ug/L	98
98)	Naphthalene	19.79	128	955305	55.9143	ug/L	100
99)	1,2,3-Trichlorobenzene	20.08	180	445985	56.9069	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17718.D 8260WT.M Tue Apr 25 14:15:17 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 25 10:38 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	0.2938	0.3971	-35.2#	105	0.00
3	P	Chloromethane	0.3458	0.3880	-12.2	152#	0.00
4	C	Vinyl Chloride	0.2146	0.2238	-4.3	90	0.00
5	T	1,3-Butadiene	0.1274	0.1531	-20.1	102	0.00
6	T	Bromomethane	0.2216	0.2263	-2.1	102	-0.01
7	T	Chloroethane	0.2223	0.2624	-18.0	102	-0.01
8	T	Trichlorofluoromethane	0.3749	0.4142	-10.5	94	-0.01
9	T	Diethyl ether	0.2774	0.2654	4.3	87	0.00
10	T	Isoprene	0.3883	0.3996	-2.9	84	-0.01
11	T	Acrolein	0.0441	0.0931	-111.1#	190#	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2610	-17.5	102	0.01
13	T	Acetone	0.0836	0.0807	3.4	90	0.00
14	C	1,1-Dichloroethene	0.4465	0.4273	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0337	-7.8	101	0.02
16	T	Dimethyl Sulfide	0.3507	0.3559	-1.5	89	-0.01
17	T	Iodomethane	0.2712	0.2752	-1.5	76	0.00
18	T	Methyl acetate	0.2636	0.2327	11.7	80	0.01
19	T	Methylene Chloride	0.2979	0.2793	6.2	85	0.00
20	T	Carbon Disulfide	0.7634	0.6116	19.9	69	-0.01
21	T	Acrylonitrile	0.1235	0.1233	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7565	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	0.2717	0.2660	2.1	88	-0.01
24	T	n-Hexane	0.4214	0.4047	4.0	80	0.00
25	T	Diisopropyl ether	1.0863	1.0839	0.2	91	0.00
26	T	Vinyl Acetate	0.5071	0.6075	-19.8	106	0.00
27	P	1,1-Dichloroethane	0.5727	0.5481	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	88	0.00
29	T	2-Butanone	0.1366	0.1377	-0.8	91	0.00
30	T	Propionitrile	0.0456	0.0467	-2.5	93	0.00
31	T	2,2-Dichloropropane	0.3876	0.3349	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.3046	0.1	87	-0.01
33	C	Chloroform	0.5272	0.4732	10.2	89	0.00
34	T	1-Bromopropane	0.0547	0.0762	-39.2#	113	0.00
35	T	Bromochloromethane	0.1869	0.1876	-0.4	87	0.00
36	T	Tetrahydrofuran	0.1113	0.0985	11.4	87	0.00
37	S	Dibromofluoromethane	0.2476	0.2535	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4234	-4.9	89	0.01
39	T	Cyclohexane	0.5678	0.5200	8.4	76	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3599	-1.7	88	0.00
41	T	Carbon Tetrachloride	0.3493	0.3655	-4.6	87	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7869	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	0.2874	0.2850	0.8	88	0.00
44	T	1,2-Dichloroethane	0.3908	0.3677	5.9	82	0.00
45	T	Benzene	1.0964	1.0595	3.4	89	0.00
46	T	Trichloroethene	0.2874	0.2828	1.6	86	0.00
47	T	Methylcyclohexane	0.4406	0.4514	-2.4	85	0.00
48	C	1,2-Dichloropropane	0.3412	0.3311	3.0	86	0.00
49	T	1,4-Dioxane	0.0031	0.0036	-17.9	110	0.01
50	T	Bromodichloromethane	0.3560	0.3530	0.8	85	-0.01
51	T	Dibromomethane	0.1614	0.1634	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.2086	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1268	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4532	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:52 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2807	-6.5	93	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	92	0.00
57	S	Toluene-d8	1.2981	1.3784	-6.2	93	0.00
58	C	Toluene	1.6186	1.5196	6.1	90	0.00
59	T	Ethyl Methacrylate	0.4449	0.5192	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5130	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3288	3.7	86	0.00
62	T	2-Hexanone	0.2837	0.3088	-8.8	99	0.00
63	T	1,3-Dichloropropane	0.5671	0.5709	-0.7	89	0.00
64	T	Tetrachloroethene	0.3213	0.3379	-5.2	90	0.00
65	T	Dibromochloromethane	0.3807	0.3871	-1.7	85	0.00
66	T	1,2-Dibromoethane	0.3069	0.3044	0.8	86	0.00
67	T	1-Chlorohexane	0.4613	0.5385	-16.7	96	0.00
68	P	Chlorobenzene	1.0293	1.0070	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3793	1.0	85	0.00
70	C	Ethylbenzene	0.5443	0.5756	-5.7	90	0.00
71	T	m-,p-Xylene	0.6513	0.6599	-1.3	91	0.00
72	T	o-Xylene	0.6562	0.6849	-4.4	90	0.00
73	T	Styrene	0.9726	1.1266	-15.8	92	0.00
74	P	Bromoform	0.2728	0.2734	-0.2	86	0.00
75	T	Isopropylbenzene	1.6009	1.6003	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7733	1.6	94	0.00
78	S	p-Bromofluorobenzene	0.8689	0.8906	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2210	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.1953	19.7	78	0.00
81	T	n-Propylbenzene	3.5039	3.2035	8.6	89	0.00
82	T	Bromobenzene	0.8527	0.8544	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4158	-0.8	92	0.00
84	T	2-Chlorotoluene	2.3790	2.0515	13.8	90	0.00
85	T	4-Chlorotoluene	2.1472	2.1361	0.5	94	0.00
86	T	a-Methylstyrene	1.3212	1.5484	-17.2	102	0.00
87	T	tert-Butylbenzene	0.5828	0.5686	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4937	0.5	92	0.00
89	T	sec-Butylbenzene	3.1659	3.0125	4.8	91	0.00
90	T	p-Isopropyltoluene	2.5439	2.6691	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5681	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5962	2.2	96	0.00
93	T	n-Butylbenzene	2.2689	2.4614	-8.5	94	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.5847	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1430	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2966	-18.0	101	0.00
97	T	Hexachlorobutadiene	0.5828	0.6414	-10.1	99	0.00
98	T	Naphthalene	2.4508	2.7407	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.2795	-13.8	104	0.00

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	91	0.00
2	T	Dichlorodifluoromethane	50.0000	63.6532	-27.3#	105	0.00
3	P	Chloromethane	50.0000	64.5824	-29.2#	152	0.00
4	C	Vinyl Chloride	50.0000	52.1614	-4.3	90	0.00
5	T	1,3-Butadiene	50.0000	71.8739	-43.7#	102	0.00
6	T	Bromomethane	50.0000	51.0695	-2.1	102	-0.01
7	T	Chloroethane	50.0000	59.0213	-18.0	102	-0.01
8	T	Trichlorofluoromethane	50.0000	55.2461	-10.5	94	-0.01
9	T	Diethyl ether	100.0000	95.6729	4.3	87	0.00
10	T	Isoprene	50.0000	51.4430	-2.9	84	-0.01
11	T	Acrolein	50.0000	105.5607	-111.1#	190	0.01
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	58.7730	-17.5	102	0.01
13	T	Acetone	50.0000	48.2793	3.4	90	0.00
14	C	1,1-Dichloroethene	50.0000	47.8477	4.3	83	-0.01
15	T	Tert-Butyl Alcohol	200.0000	215.7028	-7.9	101	0.02
16	T	Dimethyl Sulfide	50.0000	50.7351	-1.5	89	-0.01
17	T	Iodomethane	50.0000	43.3262	13.3	76	0.00
18	T	Methyl acetate	50.0000	44.1300	11.7	80	0.01
19	T	Methylene Chloride	50.0000	46.8839	6.2	85	0.00
20	T	Carbon Disulfide	50.0000	40.0619	19.9	69	-0.01
21	T	Acrylonitrile	50.0000	49.9306	0.1	89	0.00
22	T	Methyl Tert Butyl Ether	50.0000	50.7062	-1.4	88	0.00
23	T	trans-1,2-Dichloroethene	50.0000	48.9466	2.1	88	-0.01
24	T	n-Hexane	50.0000	48.0244	4.0	80	0.00
25	T	Diisopropyl ether	100.0000	99.7708	0.2	91	0.00
26	T	Vinyl Acetate	50.0000	59.8944	-19.8	106	0.00
27	P	1,1-Dichloroethane	50.0000	47.8528	4.3	85	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5020	3.5	88	0.00
29	T	2-Butanone	50.0000	50.3923	-0.8	91	0.00
30	T	Propionitrile	100.0000	102.5076	-2.5	93	0.00
31	T	2,2-Dichloropropane	50.0000	43.2012	13.6	80	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	49.9593	0.1	87	-0.01
33	C	Chloroform	50.0000	52.4059	-4.8	89	0.00
34	T	1-Bromopropane	50.0000	62.4526	-24.9	113	0.00
35	T	Bromochloromethane	50.0000	50.1778	-0.4	87	0.00
36	T	Tetrahydrofuran	100.0000	88.5595	11.4	87	0.00
37	S	Dibromofluoromethane	25.0000	25.5897	-2.4	92	0.00
38	T	1,1,1-Trichloroethane	50.0000	52.4274	-4.9	89	0.01
39	T	Cyclohexane	50.0000	45.7940	8.4	76	-0.01
40	T	1,1-Dichloropropene	50.0000	50.8447	-1.7	88	0.00
41	T	Carbon Tetrachloride	50.0000	52.3252	-4.7	87	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	101.5789	-1.6	92	0.00
43	S	1,2-Dichloroethane-d4	25.0000	24.7932	0.8	88	0.00
44	T	1,2-Dichloroethane	50.0000	47.0403	5.9	82	0.00
45	T	Benzene	50.0000	48.3197	3.4	89	0.00
46	T	Trichloroethene	50.0000	49.2083	1.6	86	0.00
47	T	Methylcyclohexane	50.0000	51.2204	-2.4	85	0.00
48	C	1,2-Dichloropropane	50.0000	48.5090	3.0	86	0.00
49	T	1,4-Dioxane	200.0000	235.8524	-17.9	110	0.01
50	T	Bromodichloromethane	50.0000	49.5766	0.8	85	-0.01
51	T	Dibromomethane	50.0000	50.6083	-1.2	87	0.00
52	T	2-Chloroethyl Vinyl Ether	50.0000	55.9554	-11.9	95	0.00
53	T	4-Methyl-2-Pentanone	50.0000	52.8249	-5.6	97	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	53.6513	-7.3	89	0.00

(#) = Out of Range
11M17718.D 8260WT.M Tue Apr 25 14:21:54 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042417\11M17718.D Vial: 13
Acq On : 24 Apr 2017 22:26 Operator: JDS
Sample : WG611320-12 50ug/L ICV 8260 Inst : hpms11
Misc : 1,1 STD81583 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	53.2447	-6.5	93	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	92	0.00
57	S	Toluene-d8	25.0000	26.5469	-6.2	93	0.00
58	C	Toluene	50.0000	46.9414	6.1	90	0.00
59	T	Ethyl Methacrylate	50.0000	58.3542	-16.7	97	0.00
60	T	trans-1,3-Dichloropropene	50.0000	50.1999	-0.4	83	0.00
61	T	1,1,2-Trichloroethane	50.0000	48.1465	3.7	86	0.00
62	T	2-Hexanone	50.0000	54.4229	-8.8	99	0.00
63	T	1,3-Dichloropropane	50.0000	50.3398	-0.7	89	0.00
64	T	Tetrachloroethene	50.0000	52.5827	-5.2	90	0.00
65	T	Dibromochloromethane	50.0000	50.8406	-1.7	85	0.00
66	T	1,2-Dibromoethane	50.0000	49.5932	0.8	86	0.00
67	T	1-Chlorohexane	50.0000	58.3711	-16.7	96	0.00
68	P	Chlorobenzene	50.0000	48.9142	2.2	90	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	49.4896	1.0	85	0.00
70	C	Ethylbenzene	50.0000	52.8710	-5.7	90	0.00
71	T	m-,p-Xylene	100.0000	101.3197	-1.3	91	0.00
72	T	o-Xylene	50.0000	52.1817	-4.4	90	0.00
73	T	Styrene	50.0000	57.9155	-15.8	92	0.00
74	P	Bromoform	50.0000	50.1161	-0.2	86	0.00
75	T	Isopropylbenzene	50.0000	49.9817	0.0	90	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	98	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	49.1954	1.6	94	0.00
78	S	p-Bromofluorobenzene	25.0000	25.6245	-2.5	96	0.00
79	T	1,2,3-Trichloropropane	50.0000	49.0961	1.8	91	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	40.1307	19.7	78	0.00
81	T	n-Propylbenzene	50.0000	45.7135	8.6	89	0.00
82	T	Bromobenzene	50.0000	50.0984	-0.2	92	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3881	-0.8	92	0.00
84	T	2-Chlorotoluene	50.0000	43.1176	13.8	90	0.00
85	T	4-Chlorotoluene	50.0000	49.7920	0.4	94	0.00
86	T	a-Methylstyrene	50.0000	58.5989	-17.2	102	0.00
87	T	tert-Butylbenzene	50.0000	48.7761	2.4	91	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.7323	0.5	92	0.00
89	T	sec-Butylbenzene	50.0000	47.5780	4.8	91	0.00
90	T	p-Isopropyltoluene	50.0000	52.4611	-4.9	93	0.00
91	T	1,3-Dichlorobenzene	50.0000	51.6893	-3.4	93	0.00
92	T	1,4-Dichlorobenzene	50.0000	48.9232	2.2	96	0.00
93	T	n-Butylbenzene	50.0000	54.0817	-8.2	94	0.00
94	T	1,2-Dichlorobenzene	50.0000	51.7679	-3.5	95	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	51.8465	-3.7	96	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	58.9976	-18.0	101	0.00
97	T	Hexachlorobutadiene	50.0000	55.0311	-10.1	99	0.00
98	T	Naphthalene	50.0000	55.9143	-11.8	101	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	56.9069	-13.8	104	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17718.D 8260WT.M Tue Apr 25 14:21:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	423656	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	311145	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	156511	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.956	65	238	0.0555	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.222%#		
47) Toluene-d8	6.815	98	3708	0.2388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.955%#		
66) p-Bromofluorobenzene	8.784	95	1270	0.2423	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.969%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.099	85	1386	0.2755	ug/L #	71
3) Chloromethane	1.215	50	1742	0.3538	ug/L	88
4) Vinyl Chloride	1.267	62	1689	0.3098	ug/L	88
5) 1,3-Butadiene	1.273	54	1144	0.3417	ug/L	97
6) Bromomethane	1.458	94	1616	0.3986	ug/L	94
7) Chloroethane	1.539	64	848	0.3278	ug/L #	77
8) Trichlorofluoromethane	1.626	101	2195	0.3138	ug/L	96
10) 1,1-Dichloroethene	1.962	61	2150	0.3285	ug/L	100
11) Carbon Disulfide	1.977	76	4627	0.3294	ug/L	98
12) 1,1,2-Trichloro-1,2,2-...	1.991	101	1335	0.3200	ug/L	97
13) Iodomethane	2.069	142	665	2.1023	ug/L	88
15) Methylene Chloride	2.405	84	1853	0.3732	ug/L	98
16) Acetone	2.463	43	744	0.8734	ug/L #	42
17) trans-1,2-Dichloroethene	2.544	96	1433	0.3216	ug/L	97
18) Methyl acetate	2.564	43	325	0.1455	ug/L #	56
19) Methyl Tert Butyl Ether	2.651	73	3236	0.2862	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	2399	0.2998	ug/L #	88
23) cis-1,2-Dichloroethene	3.731	96	1523	0.3020	ug/L	99
24) 2,2-Dichloropropane	3.864	77	1041	0.4368	ug/L #	81
25) Cyclohexane	3.960	56	2117	0.3110	ug/L	93
26) Bromochloromethane	3.992	130	693	0.2132	ug/L	93
27) Chloroform	4.113	83	2418	0.2898	ug/L	97
28) Carbon Tetrachloride	4.252	117	1818	0.2755	ug/L #	92
30) 1,1,1-Trichloroethane	4.339	97	2183	0.2976	ug/L	95
31) 1,1-Dichloropropene	4.499	75	1767	0.3067	ug/L	94
32) 2-Butanone	4.542	43	223	0.1756	ug/L #	37
33) Benzene	4.803	78	5779	0.3202	ug/L	96
35) 1,2-Dichloroethane	5.028	62	1675	0.2981	ug/L #	83
36) Methylcyclohexane	5.422	83	2260	0.3169	ug/L	99
37) Trichloroethene	5.445	130	1637	0.3020	ug/L	99
38) Dibromomethane	5.862	93	745	0.2695	ug/L	97
39) 1,2-Dichloropropane	5.961	63	1450	0.3064	ug/L	87
40) Bromodichloromethane	6.050	83	1785	0.2826	ug/L	93
43) cis-1,3-Dichloropropene	6.647	75	1935	0.2719	ug/L	97
44) 4-Methyl-2-Pentanone	7.229	58	288	0.2449	ug/L #	23
45) trans-1,3-Dichloropropene	7.240	75	1352	0.2234	ug/L #	91
48) Toluene	6.858	91	6302	0.3231	ug/L	100
49) Tetrachloroethene	7.185	166	1930	0.3469	ug/L	91
50) 1,1,2-Trichloroethane	7.371	97	1139	0.3012	ug/L	94
51) Dibromochloromethane	7.504	129	1421	0.2753	ug/L	95
52) 1,3-Dichloropropane	7.585	76	1813	0.3017	ug/L	98
53) 1,2-Dibromoethane	7.672	107	1035	0.2672	ug/L	97
54) 2-Hexanone	7.889	43	602	0.3032	ug/L	97
55) Chlorobenzene	8.057	112	4294	0.3281	ug/L #	18
56) 1-Chlorohexane	8.068	69	297	0.2811	ug/L #	1
57) Ethylbenzene	8.095	106	2178	0.3197	ug/L	88

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

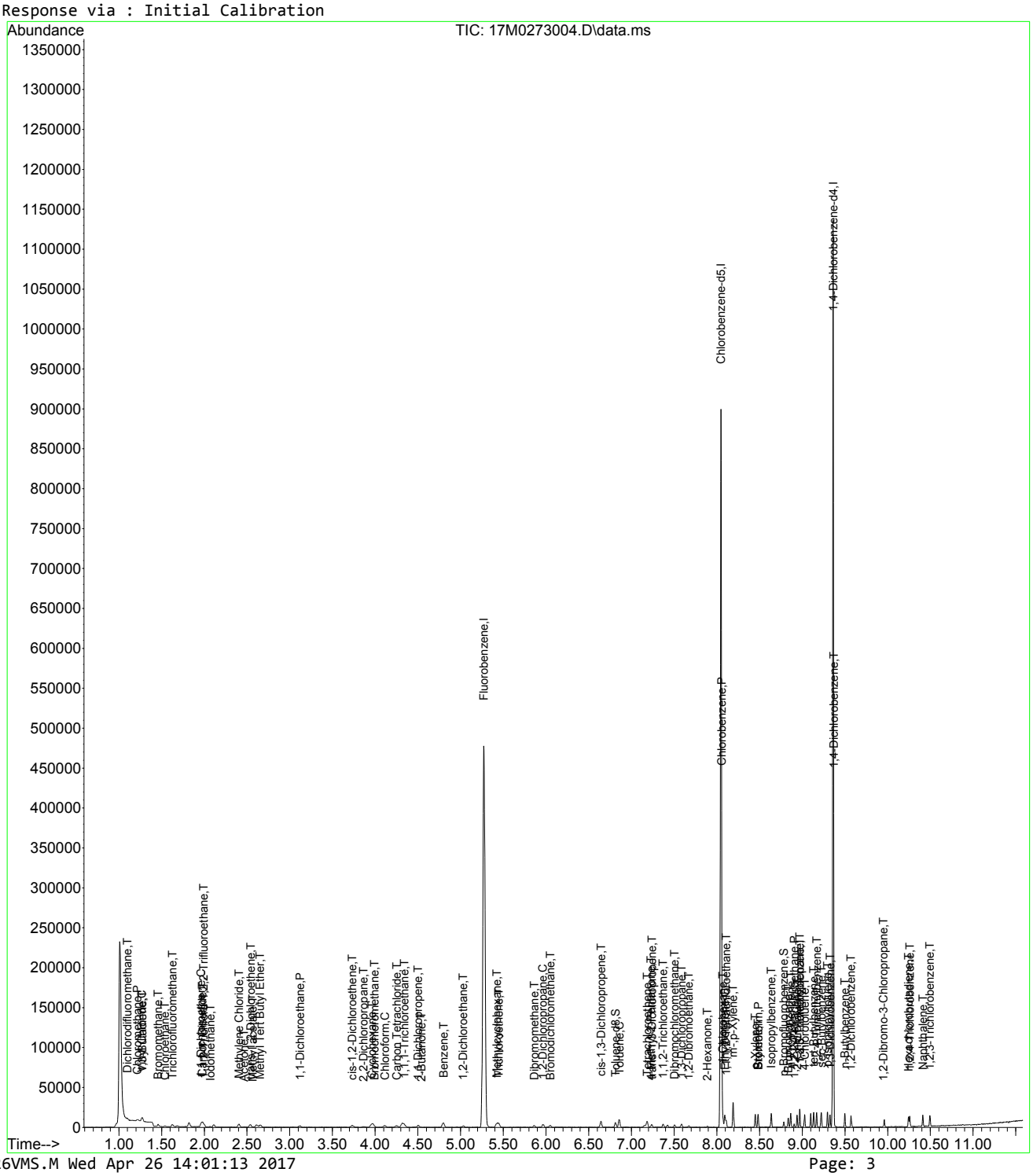
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
58) 1,1,1,2-Tetrachloroethane	8.109	131	1430	0.2807 ug/L	84
59) m-,p-Xylene	8.190	106	5242	0.6375 ug/L	99
60) o-Xylene	8.451	106	2600	0.3209 ug/L	98
61) Styrene	8.483	104	3767	0.2906 ug/L	99
62) Bromoform	8.485	173	950	0.2617 ug/L	94
63) Isopropylbenzene	8.636	105	6492	0.3096 ug/L	95
65) 1,3,5-Trimethylbenzene	8.972	105	5612	0.3216 ug/L	97
67) Bromobenzene	8.836	156	1948	0.3164 ug/L	95
68) n-Propylbenzene	8.865	91	7312	0.3164 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	1172	0.2784 ug/L	97
70) 2-Chlorotoluene	8.940	91	4467	0.3131 ug/L	97
71) 1,2,3-Trichloropropane	8.972	110	337	0.2708 ug/L	78
73) 1,2,4-Trimethylbenzene	9.169	105	5331	0.3030 ug/L	99
74) 4-Chlorotoluene	9.030	91	4520	0.3174 ug/L	99
75) tert-Butylbenzene	9.134	134	1169	0.3352 ug/L	95
76) sec-Butylbenzene	9.224	105	6865	0.3194 ug/L	99
77) p-Isopropyltoluene	9.296	119	5855	0.3195 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	3604	0.3358 ug/L	97
79) 1,4-Dichlorobenzene	9.368	146	3693	0.3408 ug/L	89
80) n-Butylbenzene	9.499	91	5016	0.3243 ug/L	99
81) 1,2-Dichlorobenzene	9.571	146	3159	0.3020 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	194	0.2512 ug/L	85
83) Hexachlorobutadiene	10.243	225	1532	0.3474 ug/L	94
84) 1,2,4-Trichlorobenzene	10.260	180	2401	0.3090 ug/L	96
85) Naphthalene	10.411	128	4948	0.3265 ug/L	95
86) 1,2,3-Trichlorobenzene	10.495	180	2415	0.3200 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:13 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.275	0.0	0	0.000
3	P	Chloromethane	-1.000	0.354	0.0	0	0.000
4	C	Vinyl Chloride	-1.000	0.310	0.0	0	0.000
5	T	1,3-Butadiene	-1.000	0.342	0.0	0	0.000
6	T	Bromomethane	-1.000	0.399	0.0	0	0.000
7	T	Chloroethane	-1.000	0.328	0.0	0	0.011
8	T	Trichlorofluoromethane	-1.000	0.314	0.0	0	0.011
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	-1.000	0.329	0.0	0	0.000
11	T	Carbon Disulfide	-1.000	0.329	0.0	0	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.000	0.320	0.0	0	0.000
13	T	Iodomethane	-1.000	2.102	0.0	0	0.011
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	-1.000	0.373	0.0	0	0.000
16	T	Acetone	-1.000	0.873	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	-1.000	0.322	0.0	0	0.012
18	T	Methyl acetate	-1.000	0.146	0.0	0	0.000
19	T	Methyl Tert Butyl Ether	-1.000	0.286	0.0	0	0.000
20	P	1,1-Dichloroethane	-1.000	0.300	0.0	0	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	-1.000	0.302	0.0	0	0.000
24	T	2,2-Dichloropropane	-1.000	0.437	0.0	0	0.000
25	T	Cyclohexane	-1.000	0.311	0.0	0	0.000
26	T	Bromochloromethane	-1.000	0.213	0.0	0	0.018
27	C	Chloroform	0.300	0.290	3.3#	100	0.000
28	T	Carbon Tetrachloride	-1.000	0.276	0.0	0	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	-1.000	0.298	0.0	0	0.000
31	T	1,1-Dichloropropene	-1.000	0.307	0.0	0	0.000
32	T	2-Butanone	-1.000	0.176	0.0	0	0.018
33	T	Benzene	-1.000	0.320	0.0	0	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.055	0.0	0	0.000
35	T	1,2-Dichloroethane	-1.000	0.298	0.0	0	0.000
36	T	Methylcyclohexane	0.300	0.317	-5.7	100	0.000
37	T	Trichloroethene	-1.000	0.302	0.0	0	0.000
38	T	Dibromomethane	-1.000	0.270	0.0	0	0.000
39	C	1,2-Dichloropropane	-1.000	0.306	0.0	0	0.000
40	T	Bromodichloromethane	-1.000	0.283	0.0	0	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.098	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	-1.000	0.272	0.0	0	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.245	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.223	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.239	0.0	0	0.000
48	C	Toluene	-1.000	0.323	0.0	0	0.000
49	T	Tetrachloroethene	-1.000	0.347	0.0	0	0.000
50	T	1,1,2-Trichloroethane	-1.000	0.301	0.0	0	0.000
51	T	Dibromochloromethane	-1.000	0.275	0.0	0	0.000
52	T	1,3-Dichloropropane	-1.000	0.302	0.0	0	0.000
53	T	1,2-Dibromoethane	-1.000	0.267	0.0	0	0.000
54	T	2-Hexanone	-1.000	0.303	0.0	0	0.000
55	P	Chlorobenzene	-1.000	0.328	0.0	0	0.000
56	T	1-Chlorohexane	-1.000	0.281	0.0	0	0.000
57	C	Ethylbenzene	-1.000	0.320	0.0	0	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273004.D Vial: 2
Acq On : 25 Apr 2017 20:45 Operator: FJB
Sample : WG611454-02 0.3ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:07 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	-1.000	0.281	0.0	0	0.000
59	T	m-,p-Xylene	-1.000	0.637	0.0	0	0.000
60	T	o-Xylene	-1.000	0.321	0.0	0	0.000
61	T	Styrene	-1.000	0.291	0.0	0	0.000
62	P	Bromoform	-1.000	0.262	0.0	0	0.000
63	T	Isopropylbenzene	-1.000	0.310	0.0	0	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	-1.000	0.322	0.0	0	0.000
66	S	p-Bromofluorobenzene	-1.000	0.242	0.0	0	0.000
67	T	Bromobenzene	0.300	0.316	-5.3	100	0.000
68	T	n-Propylbenzene	-1.000	0.316	0.0	0	0.000
69	P	1,1,2,2-Tetrachloroethane	-1.000	0.278	0.0	0	0.000
70	T	2-Chlorotoluene	-1.000	0.313	0.0	0	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.271	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.110	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	-1.000	0.303	0.0	0	0.000
74	T	4-Chlorotoluene	-1.000	0.317	0.0	0	0.000
75	T	tert-Butylbenzene	-1.000	0.335	0.0	0	0.000
76	T	sec-Butylbenzene	-1.000	0.319	0.0	0	0.000
77	T	p-Isopropyltoluene	-1.000	0.320	0.0	0	0.000
78	T	1,3-Dichlorobenzene	-1.000	0.336	0.0	0	0.000
79	T	1,4-Dichlorobenzene	0.300	0.341	-13.7	100	0.000
80	T	n-Butylbenzene	-1.000	0.324	0.0	0	0.000
81	T	1,2-Dichlorobenzene	0.300	0.302	-0.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.251	0.0	0	0.000
83	T	Hexachlorobutadiene	-1.000	0.347	0.0	0	0.000
84	T	1,2,4-Trichlorobenzene	-1.000	0.309	0.0	0	0.000
85	T	Naphthalene	-1.000	0.327	0.0	0	0.000
86	T	1,2,3-Trichlorobenzene	0.300	0.320	-6.7	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	420908	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	307739	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	151803	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.968	65	216	0.0507	ug/L	0.0145
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.203%#		
47) Toluene-d8	6.818	98	3149	0.2050	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.820%#		
66) p-Bromofluorobenzene	8.786	95	1018	0.2003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.801%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1833	0.3667	ug/L #	71
3) Chloromethane	1.224	50	2073	0.4237	ug/L	97
4) Vinyl Chloride	1.267	62	2251	0.4155	ug/L	86
5) 1,3-Butadiene	1.276	54	1444	0.4341	ug/L	90
6) Bromomethane	1.467	94	2073	0.5147	ug/L	98
7) Chloroethane	1.545	64	1207	0.4697	ug/L	84
8) Trichlorofluoromethane	1.632	101	3013	0.4336	ug/L	98
10) 1,1-Dichloroethene	1.968	61	2718	0.4180	ug/L	98
11) Carbon Disulfide	1.982	76	5991	0.4293	ug/L	97
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	1729	0.4171	ug/L	96
13) Iodomethane	2.066	142	736	2.1139	ug/L #	78
15) Methylene Chloride	2.411	84	2286	0.4634	ug/L	99
16) Acetone	2.463	43	807	0.9536	ug/L #	77
17) trans-1,2-Dichloroethene	2.541	96	1807	0.4082	ug/L	97
18) Methyl acetate	2.573	43	725	0.3268	ug/L #	56
19) Methyl Tert Butyl Ether	2.663	73	4361	0.3882	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	3143	0.3953	ug/L	96
23) cis-1,2-Dichloroethene	3.731	96	2019	0.4029	ug/L	97
24) 2,2-Dichloropropane	3.870	77	1332	0.4838	ug/L	99
25) Cyclohexane	3.966	56	2634	0.3895	ug/L	99
26) Bromochloromethane	3.992	130	1100	0.3407	ug/L	90
27) Chloroform	4.113	83	3459	0.4172	ug/L	98
28) Carbon Tetrachloride	4.258	117	2434	0.3713	ug/L #	92
30) 1,1,1-Trichloroethane	4.351	97	2888	0.3962	ug/L	97
31) 1,1-Dichloropropene	4.507	75	2338	0.4084	ug/L	94
32) 2-Butanone	4.539	43	444	0.3519	ug/L #	37
33) Benzene	4.797	78	7693	0.4291	ug/L	98
35) 1,2-Dichloroethane	5.037	62	2311	0.4140	ug/L #	86
36) Methylcyclohexane	5.422	83	2910	0.4107	ug/L	98
37) Trichloroethene	5.454	130	2296	0.4264	ug/L	96
38) Dibromomethane	5.862	93	1026	0.3736	ug/L	94
39) 1,2-Dichloropropane	5.966	63	1791	0.3809	ug/L	98
40) Bromodichloromethane	6.053	83	2463	0.3925	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.632	63	400	0.1876	ug/L #	42
43) cis-1,3-Dichloropropene	6.650	75	2541	0.3593	ug/L	94
44) 4-Methyl-2-Pentanone	7.226	58	368	0.3150	ug/L	79
45) trans-1,3-Dichloropropene	7.237	75	1772	0.2948	ug/L	98
48) Toluene	6.858	91	8187	0.4243	ug/L	97
49) Tetrachloroethene	7.185	166	2388	0.4339	ug/L	97
50) 1,1,2-Trichloroethane	7.376	97	1530	0.4091	ug/L	98
51) Dibromochloromethane	7.507	129	2046	0.4008	ug/L	98
52) 1,3-Dichloropropane	7.588	76	2378	0.4001	ug/L	92
53) 1,2-Dibromoethane	7.672	107	1583	0.4132	ug/L	95
54) 2-Hexanone	7.892	43	744	0.3788	ug/L	96
55) Chlorobenzene	8.060	112	5389	0.4163	ug/L #	31
56) 1-Chlorohexane	8.071	69	449	0.4296	ug/L #	66

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

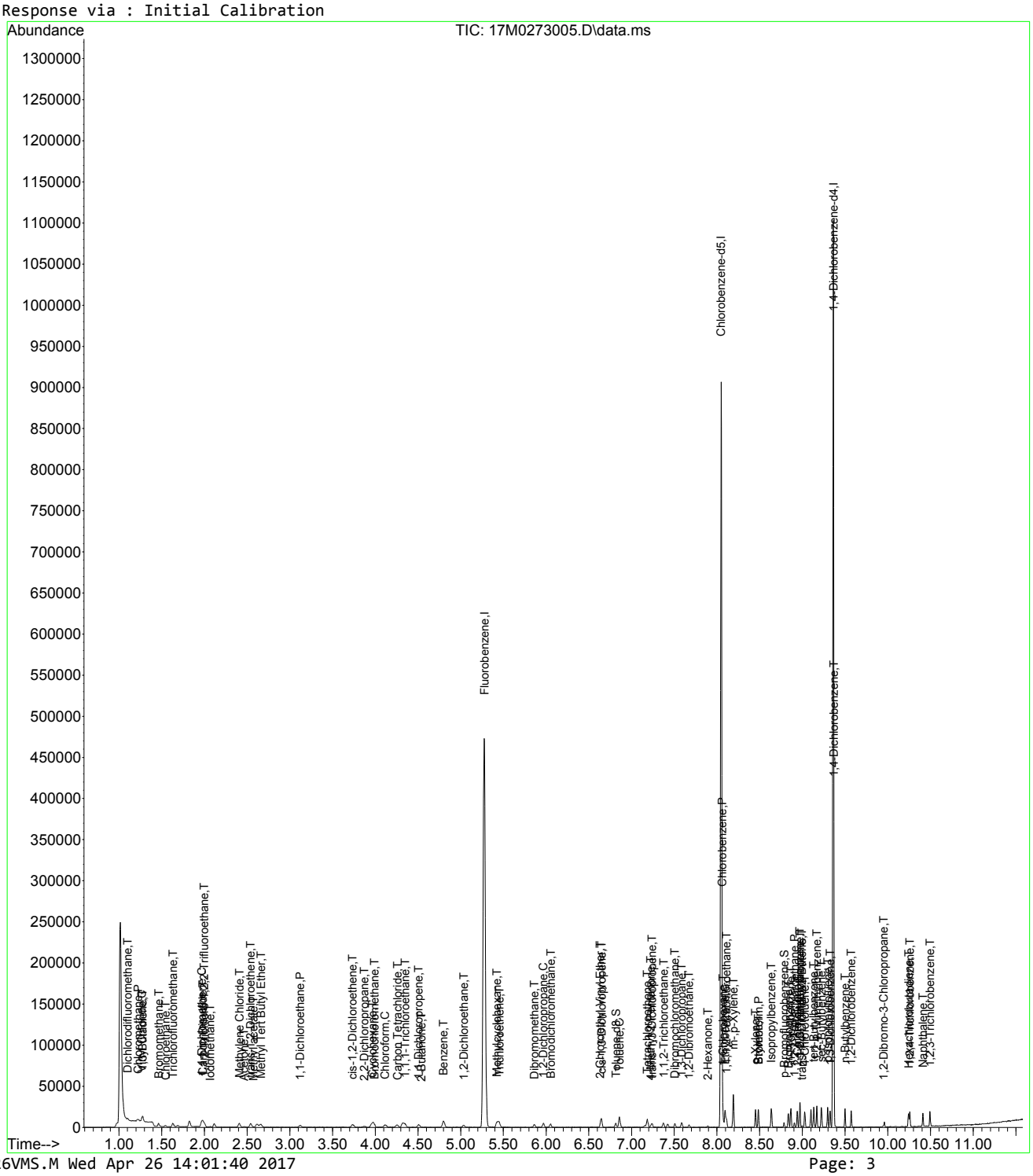
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
57) Ethylbenzene	8.094	106	2751	0.4082	ug/L		85
58) 1,1,1,2-Tetrachloroethane	8.112	131	2018	0.4004	ug/L		92
59) m-,p-Xylene	8.193	106	6639	0.8163	ug/L		98
60) o-Xylene	8.451	106	3154	0.3936	ug/L		95
61) Styrene	8.482	104	4908	0.3828	ug/L		98
62) Bromoform	8.485	173	1308	0.3643	ug/L		88
63) Isopropylbenzene	8.636	105	8520	0.4108	ug/L		99
65) 1,3,5-Trimethylbenzene	8.969	105	6976	0.4122	ug/L		97
67) Bromobenzene	8.836	156	2470	0.4136	ug/L		97
68) n-Propylbenzene	8.865	91	9526	0.4249	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	1521	0.3725	ug/L		100
70) 2-Chlorotoluene	8.940	91	5795	0.4188	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	488	0.4043	ug/L		94
72) trans-1,4-Dichloro-2-B...	8.995	53	204	0.2267	ug/L	#	80
73) 1,2,4-Trimethylbenzene	9.169	105	7147	0.4188	ug/L		97
74) 4-Chlorotoluene	9.027	91	5692	0.4121	ug/L		99
75) tert-Butylbenzene	9.131	134	1424	0.4210	ug/L		97
76) sec-Butylbenzene	9.224	105	8888	0.4263	ug/L		96
77) p-Isopropyltoluene	9.296	119	7466	0.4201	ug/L		99
78) 1,3-Dichlorobenzene	9.322	146	4514	0.4336	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	4491	0.4273	ug/L		85
80) n-Butylbenzene	9.499	91	6442	0.4295	ug/L		95
81) 1,2-Dichlorobenzene	9.571	146	4496	0.4432	ug/L		96
82) 1,2-Dibromo-3-Chloropr...	9.947	75	266	0.3551	ug/L		81
83) Hexachlorobutadiene	10.243	225	1975	0.4618	ug/L		93
84) 1,2,4-Trichlorobenzene	10.257	180	3124	0.4145	ug/L		95
85) Naphthalene	10.411	128	6130	0.4171	ug/L		98
86) 1,2,3-Trichlorobenzene	10.495	180	3077	0.4203	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:01:40 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	-1.000	0.367	0.0	0	0.000
3	P	Chloromethane	-1.000	0.424	0.0	0	0.012
4	C	Vinyl Chloride	0.400	0.416	-4.0#	100	0.000
5	T	1,3-Butadiene	-1.000	0.434	0.0	0	0.000
6	T	Bromomethane	-1.000	0.515	0.0	0	0.012
7	T	Chloroethane	-1.000	0.470	0.0	0	0.017
8	T	Trichlorofluoromethane	0.400	0.434	-8.5	100	0.017
9	T	Diethyl ether	-1.000	0.000	0.0	0	-1.835#
10	C	1,1-Dichloroethene	0.400	0.418	-4.5#	100	0.012
11	T	Carbon Disulfide	0.400	0.429	-7.2	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.400	0.417	-4.2	100	0.000
13	T	Iodomethane	-1.000	2.114	0.0	0	0.000
14	T	Acrolein	-1.000	0.000	0.0	0	-2.217#
15	T	Methylene Chloride	0.400	0.463	-15.8	100	0.012
16	T	Acetone	-1.000	0.954	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	0.400	0.408	-2.0	100	0.000
18	T	Methyl acetate	0.400	0.327	18.3	100	0.000
19	T	Methyl Tert Butyl Ether	0.400	0.388	3.0	100	0.015
20	P	1,1-Dichloroethane	0.400	0.395	1.3	100	0.000
21	T	Acrylonitrile	-1.000	0.000	0.0	0	-3.181#
22	T	Vinyl Acetate	-1.000	0.000	0.0	0	-2.608#
23	T	cis-1,2-Dichloroethene	0.400	0.403	-0.8	100	0.000
24	T	2,2-Dichloropropane	0.400	0.484	-21.0	100	0.012
25	T	Cyclohexane	0.400	0.389	2.8	100	0.000
26	T	Bromochloromethane	-1.000	0.341	0.0	0	0.018
27	C	Chloroform	0.400	0.417	-4.2#	100	0.000
28	T	Carbon Tetrachloride	0.400	0.371	7.3	100	0.012
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	0.400	0.396	1.0	100	0.000
31	T	1,1-Dichloropropene	0.400	0.408	-2.0	100	0.000
32	T	2-Butanone	-1.000	0.352	0.0	0	0.015
33	T	Benzene	0.400	0.429	-7.2	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.051	0.0	0	0.014
35	T	1,2-Dichloroethane	0.400	0.414	-3.5	100	0.000
36	T	Methylcyclohexane	0.400	0.411	-2.7	100	0.000
37	T	Trichloroethene	0.400	0.426	-6.5	100	0.000
38	T	Dibromomethane	0.400	0.374	6.5	100	0.000
39	C	1,2-Dichloropropane	0.400	0.381	4.8#	100	0.000
40	T	Bromodichloromethane	0.400	0.392	2.0	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.188	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	0.400	0.359	10.3	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.315	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	-1.000	0.295	0.0	0	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.205	0.0	0	0.000
48	C	Toluene	0.400	0.424	-6.0#	100	0.000
49	T	Tetrachloroethene	0.400	0.434	-8.5	100	0.000
50	T	1,1,2-Trichloroethane	0.400	0.409	-2.2	100	0.000
51	T	Dibromochloromethane	0.400	0.401	-0.3	100	0.000
52	T	1,3-Dichloropropane	0.400	0.400	0.0	100	0.000
53	T	1,2-Dibromoethane	0.400	0.413	-3.2	100	0.000
54	T	2-Hexanone	-1.000	0.379	0.0	0	0.000
55	P	Chlorobenzene	0.400	0.416	-4.0	100	0.000
56	T	1-Chlorohexane	-1.000	0.430	0.0	0	0.000
57	C	Ethylbenzene	0.400	0.408	-2.0#	100	0.000

826VMS.M Wed Apr 26 14:01:37 2017 Page: 1

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273005.D Vial: 3
Acq On : 25 Apr 2017 21:05 Operator: FJB
Sample : WG611454-03 0.4ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.400	0.400	0.0	100	0.000
59	T	m-,p-Xylene	0.800	0.816	-2.0	100	0.000
60	T	o-Xylene	0.400	0.394	1.5	100	0.000
61	T	Styrene	0.400	0.383	4.3	100	0.000
62	P	Bromoform	0.400	0.364	9.0	100	0.000
63	T	Isopropylbenzene	0.400	0.411	-2.7	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	0.400	0.412	-3.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.200	0.0	0	0.000
67	T	Bromobenzene	0.400	0.414	-3.5	100	0.000
68	T	n-Propylbenzene	0.400	0.425	-6.2	100	0.000
69	P	1,1,2,2-Tetrachloroethane	0.400	0.372	7.0	100	0.000
70	T	2-Chlorotoluene	0.400	0.419	-4.7	100	0.000
71	T	1,2,3-Trichloropropane	-1.000	0.404	0.0	0	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.227	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	0.400	0.419	-4.7	100	0.000
74	T	4-Chlorotoluene	0.400	0.412	-3.0	100	0.000
75	T	tert-Butylbenzene	0.400	0.421	-5.2	100	0.000
76	T	sec-Butylbenzene	0.400	0.426	-6.5	100	0.000
77	T	p-Isopropyltoluene	0.400	0.420	-5.0	100	0.000
78	T	1,3-Dichlorobenzene	0.400	0.434	-8.5	100	0.000
79	T	1,4-Dichlorobenzene	0.400	0.427	-6.7	100	0.000
80	T	n-Butylbenzene	0.400	0.429	-7.2	100	0.000
81	T	1,2-Dichlorobenzene	0.400	0.443	-10.7	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	-1.000	0.355	0.0	0	0.000
83	T	Hexachlorobutadiene	0.400	0.462	-15.5	100	0.000
84	T	1,2,4-Trichlorobenzene	0.400	0.415	-3.7	100	0.000
85	T	Naphthalene	0.400	0.417	-4.2	100	0.000
86	T	1,2,3-Trichlorobenzene	0.400	0.420	-5.0	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	426227	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	321768	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	162525	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.959	65	153	0.0355	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.142%#		
47) Toluene-d8	6.815	98	2654	0.1653	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.661%#		
66) p-Bromofluorobenzene	8.783	95	924	0.1698	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.679%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	4435	0.8761	ug/L	90
3) Chloromethane	1.218	50	4921	0.9933	ug/L	95
4) Vinyl Chloride	1.267	62	5224	0.9523	ug/L	100
5) 1,3-Butadiene	1.276	54	3212	0.9536	ug/L	92
6) Bromomethane	1.461	94	4459	1.0933	ug/L	94
7) Chloroethane	1.539	64	2867	1.1017	ug/L	94
8) Trichlorofluoromethane	1.626	101	7223	1.0265	ug/L	99
9) Diethyl ether	1.837	59	16707	4.9236	ug/L	98
10) 1,1-Dichloroethene	1.965	61	6575	0.9987	ug/L	99
11) Carbon Disulfide	1.976	76	13954	0.9875	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	4132	0.9844	ug/L	99
13) Iodomethane	2.060	142	2054	2.3117	ug/L	97
14) Acrolein	2.217	56	1026	2.4478	ug/L	97
15) Methylene Chloride	2.402	84	5125	1.0259	ug/L	99
16) Acetone	2.460	43	1354	1.5799	ug/L #	71
17) trans-1,2-Dichloroethene	2.538	96	4313	0.9621	ug/L	100
18) Methyl acetate	2.573	43	2105	0.9369	ug/L #	84
19) Methyl Tert Butyl Ether	2.654	73	11029	0.9694	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	7772	0.9652	ug/L	99
21) Acrylonitrile	3.187	53	2537	2.3210	ug/L	98
22) Vinyl Acetate	2.611	86	589	0.8163	ug/L	72
23) cis-1,2-Dichloroethene	3.737	96	4813	0.9485	ug/L	99
24) 2,2-Dichloropropane	3.864	77	4555	0.9837	ug/L	99
25) Cyclohexane	3.966	56	6602	0.9640	ug/L	100
26) Bromochloromethane	3.980	130	2843	0.8696	ug/L	97
27) Chloroform	4.113	83	8392	0.9997	ug/L	98
28) Carbon Tetrachloride	4.252	117	6172	0.9297	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	7196	0.9750	ug/L	99
31) 1,1-Dichloropropene	4.501	75	5583	0.9632	ug/L	97
32) 2-Butanone	4.539	43	1222	0.9564	ug/L #	37
33) Benzene	4.799	78	17817	0.9814	ug/L	99
35) 1,2-Dichloroethane	5.034	62	5412	0.9573	ug/L	96
36) Methylcyclohexane	5.422	83	7060	0.9839	ug/L	95
37) Trichloroethene	5.445	130	5322	0.9759	ug/L	97
38) Dibromomethane	5.862	93	2591	0.9318	ug/L	98
39) 1,2-Dichloropropane	5.963	63	4551	0.9559	ug/L	93
40) Bromodichloromethane	6.050	83	5958	0.9376	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	1303	0.6034	ug/L	88
43) cis-1,3-Dichloropropene	6.650	75	6508	0.9088	ug/L	98
44) 4-Methyl-2-Pentanone	7.232	58	1028	0.8690	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	5180	0.8509	ug/L	98
48) Toluene	6.858	91	19458	0.9645	ug/L	98
49) Tetrachloroethene	7.185	166	5539	0.9627	ug/L	97
50) 1,1,2-Trichloroethane	7.373	97	3713	0.9496	ug/L	99
51) Dibromochloromethane	7.507	129	4726	0.8855	ug/L	97
52) 1,3-Dichloropropane	7.588	76	5873	0.9451	ug/L	96

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

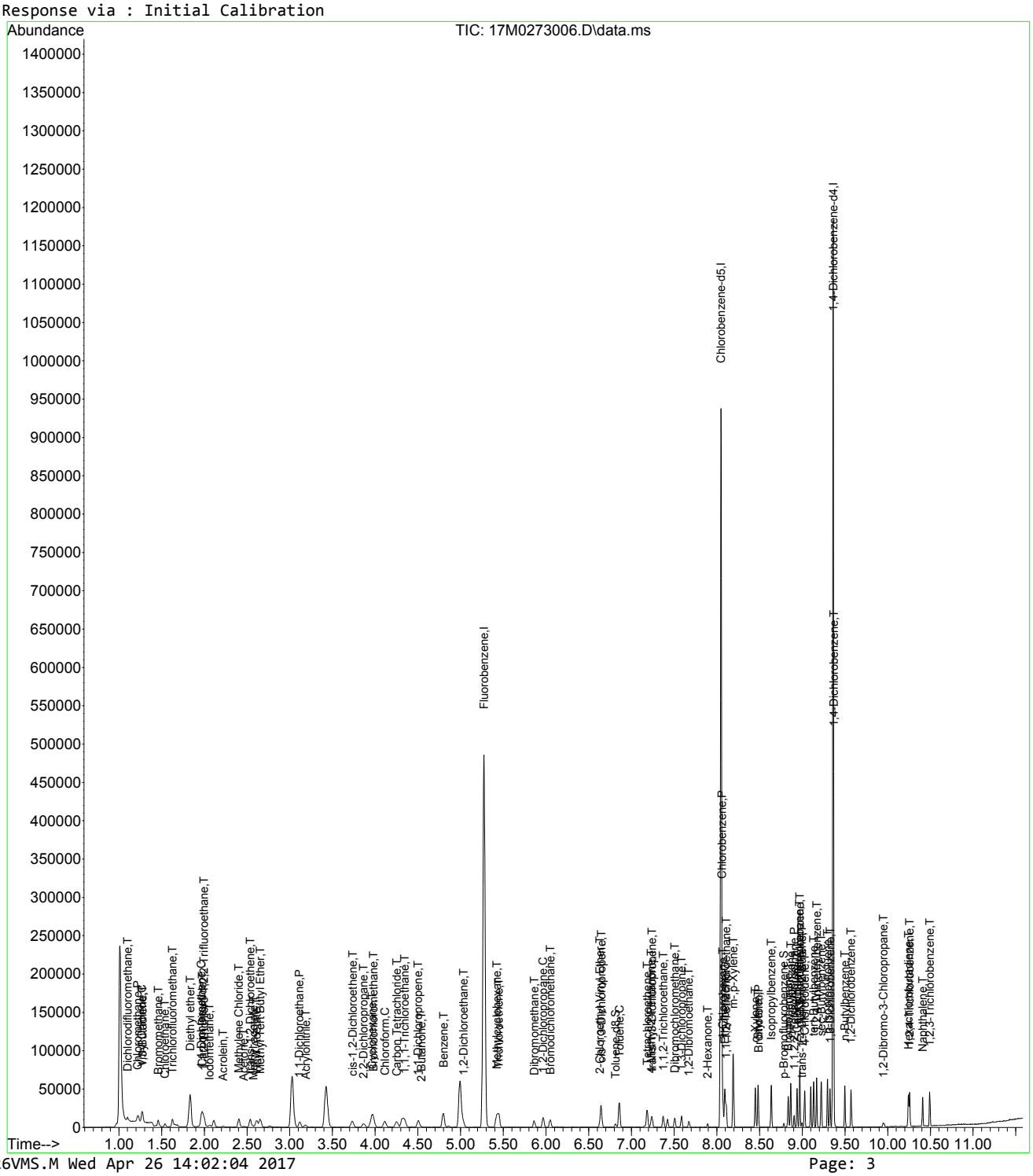
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
53) 1,2-Dibromoethane	7.672	107	3784	0.9445 ug/L	97
54) 2-Hexanone	7.892	43	1881	0.9161 ug/L	97
55) Chlorobenzene	8.060	112	13080	0.9663 ug/L	72
56) 1-Chlorohexane	8.068	69	1019	0.9324 ug/L	78
57) Ethylbenzene	8.094	106	6455	0.9161 ug/L	89
58) 1,1,1,2-Tetrachloroethane	8.109	131	4898	0.9296 ug/L	95
59) m-,p-Xylene	8.193	106	15829	1.8615 ug/L	97
60) o-Xylene	8.450	106	7831	0.9347 ug/L	97
61) Styrene	8.482	104	11851	0.8840 ug/L	99
62) Bromoform	8.488	173	3119	0.8308 ug/L	98
63) Isopropylbenzene	8.636	105	20533	0.9468 ug/L	98
65) 1,3,5-Trimethylbenzene	8.972	105	17243	0.9517 ug/L	98
67) Bromobenzene	8.836	156	6018	0.9413 ug/L	99
68) n-Propylbenzene	8.864	91	22729	0.9470 ug/L	99
69) 1,1,2,2-Tetrachloroethane	8.905	83	4042	0.9246 ug/L	95
70) 2-Chlorotoluene	8.940	91	14288	0.9645 ug/L	99
71) 1,2,3-Trichloropropane	8.969	110	1215	0.9401 ug/L	94
72) trans-1,4-Dichloro-2-B...	8.995	53	570	0.5916 ug/L #	89
73) 1,2,4-Trimethylbenzene	9.168	105	17160	0.9393 ug/L	98
74) 4-Chlorotoluene	9.027	91	14292	0.9664 ug/L	98
75) tert-Butylbenzene	9.134	134	3479	0.9608 ug/L	99
76) sec-Butylbenzene	9.221	105	21376	0.9577 ug/L	99
77) p-Isopropyltoluene	9.296	119	17861	0.9387 ug/L	99
78) 1,3-Dichlorobenzene	9.325	146	10532	0.9450 ug/L	99
79) 1,4-Dichlorobenzene	9.368	146	10637	0.9454 ug/L	94
80) n-Butylbenzene	9.499	91	14714	0.9162 ug/L	100
81) 1,2-Dichlorobenzene	9.571	146	10274	0.9459 ug/L	99
82) 1,2-Dibromo-3-Chloropr...	9.947	75	692	0.8628 ug/L	85
83) Hexachlorobutadiene	10.243	225	4412	0.9635 ug/L	97
84) 1,2,4-Trichlorobenzene	10.257	180	7410	0.9183 ug/L	99
85) Naphthalene	10.408	128	14173	0.9007 ug/L	99
86) 1,2,3-Trichlorobenzene	10.492	180	7259	0.9262 ug/L	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:04 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	1.000	0.876	12.4	100	0.000
3	P	Chloromethane	1.000	0.993	0.7	100	0.000
4	C	Vinyl Chloride	1.000	0.952	4.8#	100	0.000
5	T	1,3-Butadiene	1.000	0.954	4.6	100	0.000
6	T	Bromomethane	1.000	1.093	-9.3	100	0.000
7	T	Chloroethane	1.000	1.102	-10.2	100	0.011
8	T	Trichlorofluoromethane	1.000	1.027	-2.7	100	0.011
9	T	Diethyl ether	5.000	4.924	1.5	100	0.000
10	C	1,1-Dichloroethene	1.000	0.999	0.1#	100	0.000
11	T	Carbon Disulfide	1.000	0.988	1.2	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.000	0.984	1.6	100	0.000
13	T	Iodomethane	-1.000	2.312	0.0	0	0.000
14	T	Acrolein	2.500	2.448	2.1	100	0.000
15	T	Methylene Chloride	1.000	1.026	-2.6	100	0.000
16	T	Acetone	-1.000	1.580	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	1.000	0.962	3.8	100	0.000
18	T	Methyl acetate	1.000	0.937	6.3	100	0.000
19	T	Methyl Tert Butyl Ether	1.000	0.969	3.1	100	0.000
20	P	1,1-Dichloroethane	1.000	0.965	3.5	100	0.000
21	T	Acrylonitrile	2.500	2.321	7.2	100	0.000
22	T	Vinyl Acetate	-1.000	0.816	0.0	0	0.000
23	T	cis-1,2-Dichloroethene	1.000	0.948	5.2	100	0.000
24	T	2,2-Dichloropropane	1.000	0.984	1.6	100	0.000
25	T	Cyclohexane	1.000	0.964	3.6	100	0.000
26	T	Bromochloromethane	1.000	0.870	13.0	100	0.000
27	C	Chloroform	1.000	1.000	0.0	100	0.000
28	T	Carbon Tetrachloride	1.000	0.930	7.0	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	1.000	0.975	2.5	100	0.000
31	T	1,1-Dichloropropene	1.000	0.963	3.7	100	0.000
32	T	2-Butanone	-1.000	0.956	0.0	0	0.015
33	T	Benzene	1.000	0.981	1.9	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.035	0.0	0	0.000
35	T	1,2-Dichloroethane	1.000	0.957	4.3	100	0.000
36	T	Methylcyclohexane	1.000	0.984	1.6	100	0.000
37	T	Trichloroethene	1.000	0.976	2.4	100	0.000
38	T	Dibromomethane	1.000	0.932	6.8	100	0.000
39	C	1,2-Dichloropropane	1.000	0.956	4.4#	100	0.000
40	T	Bromodichloromethane	1.000	0.938	6.2	100	0.000
41	T	1,4-Dioxane	-1.000	0.000	0.0	0	-6.256#
42	T	2-Chloroethyl Vinyl Ether	-1.000	0.603	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	1.000	0.909	9.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	0.869	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	1.000	0.851	14.9	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.165	0.0	0	0.000
48	C	Toluene	1.000	0.965	3.5#	100	0.000
49	T	Tetrachloroethene	1.000	0.963	3.7	100	0.000
50	T	1,1,2-Trichloroethane	1.000	0.950	5.0	100	0.000
51	T	Dibromochloromethane	1.000	0.885	11.5	100	0.000
52	T	1,3-Dichloropropane	1.000	0.945	5.5	100	0.000
53	T	1,2-Dibromoethane	1.000	0.945	5.5	100	0.000
54	T	2-Hexanone	-1.000	0.916	0.0	0	0.000
55	P	Chlorobenzene	1.000	0.966	3.4	100	0.000
56	T	1-Chlorohexane	1.000	0.932	6.8	100	0.000
57	C	Ethylbenzene	1.000	0.916	8.4#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273006.D Vial: 4
Acq On : 25 Apr 2017 21:24 Operator: FJB
Sample : WG611454-04 1ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:12 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	1.000	0.930	7.0	100	0.000
59	T	m-,p-Xylene	2.000	1.861	7.0	100	0.000
60	T	o-Xylene	1.000	0.935	6.5	100	0.000
61	T	Styrene	1.000	0.884	11.6	100	0.000
62	P	Bromoform	1.000	0.831	16.9	100	0.000
63	T	Isopropylbenzene	1.000	0.947	5.3	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	1.000	0.952	4.8	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.170	0.0	0	0.000
67	T	Bromobenzene	1.000	0.941	5.9	100	0.000
68	T	n-Propylbenzene	1.000	0.947	5.3	100	0.000
69	P	1,1,2,2-Tetrachloroethane	1.000	0.925	7.5	100	0.000
70	T	2-Chlorotoluene	1.000	0.965	3.5	100	0.000
71	T	1,2,3-Trichloropropane	1.000	0.940	6.0	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	-1.000	0.592	0.0	0	0.000
73	T	1,2,4-Trimethylbenzene	1.000	0.939	6.1	100	0.000
74	T	4-Chlorotoluene	1.000	0.966	3.4	100	0.000
75	T	tert-Butylbenzene	1.000	0.961	3.9	100	0.000
76	T	sec-Butylbenzene	1.000	0.958	4.2	100	0.000
77	T	p-Isopropyltoluene	1.000	0.939	6.1	100	0.000
78	T	1,3-Dichlorobenzene	1.000	0.945	5.5	100	0.000
79	T	1,4-Dichlorobenzene	1.000	0.945	5.5	100	0.000
80	T	n-Butylbenzene	1.000	0.916	8.4	100	0.000
81	T	1,2-Dichlorobenzene	1.000	0.946	5.4	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	1.000	0.863	13.7	100	0.000
83	T	Hexachlorobutadiene	1.000	0.964	3.6	100	0.000
84	T	1,2,4-Trichlorobenzene	1.000	0.918	8.2	100	0.000
85	T	Naphthalene	1.000	0.901	9.9	100	0.000
86	T	1,2,3-Trichlorobenzene	1.000	0.926	7.4	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 5

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	419250	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	301521	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	148386	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	0.000	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.000%#		
34) 1,2-Dichloroethane-d4	4.973	65	410	0.0966	ug/L	0.0203
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.386%#		
47) Toluene-d8	6.812	98	2299	0.1528	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.611%#		
66) p-Bromofluorobenzene	8.786	95	744	0.1497	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.599%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	8266	1.6601	ug/L	96
3) Chloromethane	1.224	50	9490	1.9475	ug/L	97
4) Vinyl Chloride	1.264	62	9802	1.8166	ug/L	100
5) 1,3-Butadiene	1.276	54	6439	1.9436	ug/L	97
6) Bromomethane	1.461	94	8818	2.1981	ug/L	97
7) Chloroethane	1.539	64	5382	2.1025	ug/L	99
8) Trichlorofluoromethane	1.626	101	13476	1.9470	ug/L	99
9) Diethyl ether	1.841	59	82987	24.8636	ug/L	99
10) 1,1-Dichloroethene	1.965	61	12193	1.8828	ug/L	100
11) Carbon Disulfide	1.979	76	25350	1.8238	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	7533	1.8245	ug/L	100
13) Iodomethane	2.066	142	4068	2.6265	ug/L	98
14) Acrolein	2.223	56	4766	11.5599	ug/L	98
15) Methylene Chloride	2.408	84	9550	1.9434	ug/L	98
16) Acetone	2.469	43	2137	2.5351	ug/L	88
17) trans-1,2-Dichloroethene	2.541	96	8550	1.9390	ug/L	99
18) Methyl acetate	2.576	43	3864	1.7485	ug/L #	96
19) Methyl Tert Butyl Ether	2.657	73	21515	1.9226	ug/L #	100
20) 1,1-Dichloroethane	3.123	63	15207	1.9201	ug/L	98
21) Acrylonitrile	3.184	53	13059	12.1457	ug/L	100
22) Vinyl Acetate	2.619	86	1095	1.5429	ug/L	92
23) cis-1,2-Dichloroethene	3.734	96	9709	1.9452	ug/L	99
24) 2,2-Dichloropropane	3.870	77	9712	1.8129	ug/L	95
25) Cyclohexane	3.966	56	12484	1.8532	ug/L	98
26) Bromochloromethane	3.992	130	5989	1.8623	ug/L	99
27) Chloroform	4.113	83	16510	1.9994	ug/L	99
28) Carbon Tetrachloride	4.255	117	12159	1.8621	ug/L	98
30) 1,1,1-Trichloroethane	4.345	97	13879	1.9117	ug/L	99
31) 1,1-Dichloropropene	4.507	75	10473	1.8369	ug/L	98
32) 2-Butanone	4.536	43	2256	1.7951	ug/L #	64
33) Benzene	4.800	78	34359	1.9240	ug/L	100
35) 1,2-Dichloroethane	5.037	62	10797	1.9417	ug/L	99
36) Methylcyclohexane	5.425	83	12634	1.7900	ug/L	99
37) Trichloroethene	5.448	130	10311	1.9223	ug/L	99
38) Dibromomethane	5.859	93	5276	1.9290	ug/L	97
39) 1,2-Dichloropropane	5.966	63	9039	1.9301	ug/L	97
40) Bromodichloromethane	6.053	83	12025	1.9238	ug/L	96
41) 1,4-Dioxane	6.265	88	961	41.1985	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.627	63	2988	1.4066	ug/L	98
43) cis-1,3-Dichloropropene	6.647	75	13096	1.8592	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	2026	1.7412	ug/L	95
45) trans-1,3-Dichloropropene	7.243	75	10805	1.8044	ug/L	100
48) Toluene	6.858	91	37329	1.9747	ug/L	100
49) Tetrachloroethene	7.185	166	10472	1.9422	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	7445	2.0319	ug/L	99
51) Dibromochloromethane	7.510	129	9685	1.9365	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

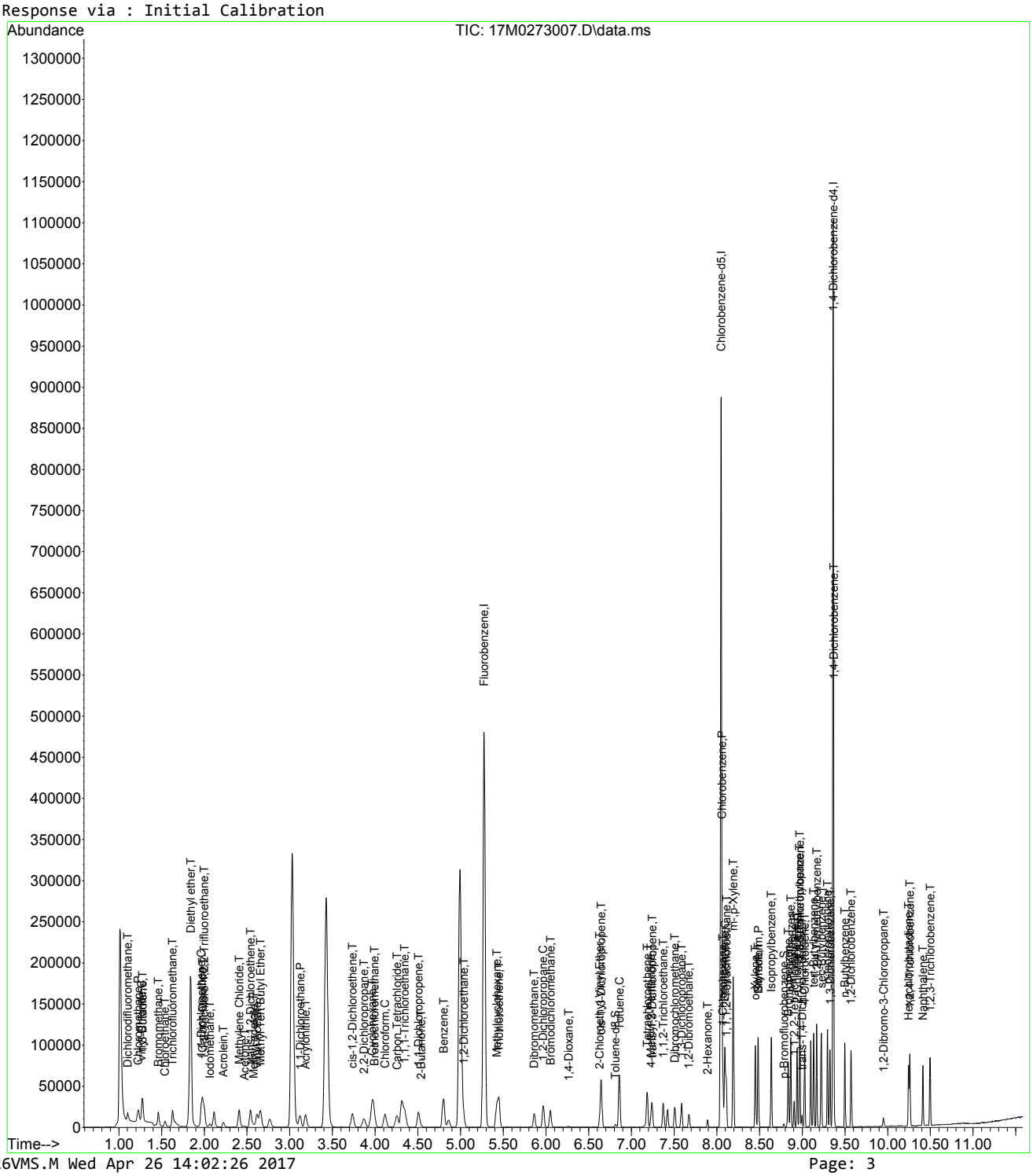
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	11727	2.0138	ug/L		98
53) 1,2-Dibromoethane	7.672	107	7414	1.9749	ug/L		100
54) 2-Hexanone	7.892	43	3567	1.8538	ug/L		100
55) Chlorobenzene	8.060	112	24892	1.9625	ug/L		85
56) 1-Chlorohexane	8.071	69	1995	1.9481	ug/L	#	85
57) Ethylbenzene	8.094	106	13014	1.9710	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	9923	2.0097	ug/L		100
59) m-,p-Xylene	8.193	106	30447	3.8209	ug/L		97
60) o-Xylene	8.451	106	15486	1.9724	ug/L		100
61) Styrene	8.482	104	23501	1.8707	ug/L		99
62) Bromoform	8.485	173	6423	1.8257	ug/L		100
63) Isopropylbenzene	8.636	105	38809	1.9097	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	32427	1.9603	ug/L		99
67) Bromobenzene	8.836	156	11776	2.0175	ug/L		100
68) n-Propylbenzene	8.865	91	42908	1.9582	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	7761	1.9444	ug/L		99
70) 2-Chlorotoluene	8.940	91	27206	2.0115	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	2495	2.1145	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	1392	1.5825	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.169	105	33214	1.9912	ug/L		100
74) 4-Chlorotoluene	9.027	91	26984	1.9984	ug/L		98
75) tert-Butylbenzene	9.134	134	6697	2.0257	ug/L		99
76) sec-Butylbenzene	9.224	105	40402	1.9825	ug/L		99
77) p-Isopropyltoluene	9.296	119	33833	1.9475	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	20210	1.9861	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	20145	1.9610	ug/L		98
80) n-Butylbenzene	9.499	91	26982	1.8402	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	19850	2.0016	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	1468	2.0048	ug/L		87
83) Hexachlorobutadiene	10.243	225	7947	1.9009	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	13652	1.8531	ug/L		97
85) Naphthalene	10.414	128	27628	1.9232	ug/L		99
86) 1,2,3-Trichlorobenzene	10.498	180	13906	1.9433	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:26 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	2.000	1.660	17.0	100	0.000
3	P	Chloromethane	2.000	1.948	2.6	100	0.012
4	C	Vinyl Chloride	2.000	1.817	9.2#	100	0.000
5	T	1,3-Butadiene	2.000	1.944	2.8	100	0.000
6	T	Bromomethane	2.000	2.198	-9.9	100	0.000
7	T	Chloroethane	2.000	2.103	-5.2	100	0.011
8	T	Trichlorofluoromethane	2.000	1.947	2.6	100	0.011
9	T	Diethyl ether	25.000	24.864	0.5	100	0.000
10	C	1,1-Dichloroethene	2.000	1.883	5.8#	100	0.000
11	T	Carbon Disulfide	2.000	1.824	8.8	100	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.000	1.825	8.8	100	0.000
13	T	Iodomethane	2.000	2.626	-31.3#	100	0.000
14	T	Acrolein	12.500	11.560	7.5	100	0.000
15	T	Methylene Chloride	2.000	1.943	2.8	100	0.000
16	T	Acetone	-1.000	2.535	0.0	0	0.000
17	T	trans-1,2-Dichloroethene	2.000	1.939	3.0	100	0.000
18	T	Methyl acetate	2.000	1.748	12.6	100	0.000
19	T	Methyl Tert Butyl Ether	2.000	1.923	3.8	100	0.000
20	P	1,1-Dichloroethane	2.000	1.920	4.0	100	0.012
21	T	Acrylonitrile	12.500	12.146	2.8	100	0.000
22	T	Vinyl Acetate	-1.000	1.543	0.0	0	0.011
23	T	cis-1,2-Dichloroethene	2.000	1.945	2.7	100	0.000
24	T	2,2-Dichloropropane	2.000	1.813	9.4	100	0.012
25	T	Cyclohexane	2.000	1.853	7.4	100	0.000
26	T	Bromochloromethane	2.000	1.862	6.9	100	0.018
27	C	Chloroform	2.000	1.999	0.0#	100	0.000
28	T	Carbon Tetrachloride	2.000	1.862	6.9	100	0.000
29	S	Dibromofluoromethane	-1.000	0.000	0.0	0	-4.339#
30	T	1,1,1-Trichloroethane	2.000	1.912	4.4	100	0.000
31	T	1,1-Dichloropropene	2.000	1.837	8.2	100	0.000
32	T	2-Butanone	-1.000	1.795	0.0	0	0.012
33	T	Benzene	2.000	1.924	3.8	100	0.000
34	S	1,2-Dichloroethane-d4	-1.000	0.097	0.0	0	0.020
35	T	1,2-Dichloroethane	2.000	1.942	2.9	100	0.000
36	T	Methylcyclohexane	2.000	1.790	10.5	100	0.000
37	T	Trichloroethene	2.000	1.922	3.9	100	0.000
38	T	Dibromomethane	2.000	1.929	3.5	100	0.000
39	C	1,2-Dichloropropane	2.000	1.930	3.5#	100	0.000
40	T	Bromodichloromethane	2.000	1.924	3.8	100	0.000
41	T	1,4-Dioxane	50.000	41.198	17.6	100	0.000
42	T	2-Chloroethyl Vinyl Ether	-1.000	1.407	0.0	0	0.000
43	T	cis-1,3-Dichloropropene	2.000	1.859	7.1	100	0.000
44	T	4-Methyl-2-Pentanone	-1.000	1.741	0.0	0	0.000
45	T	trans-1,3-Dichloropropene	2.000	1.804	9.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	-1.000	0.153	0.0	0	0.000
48	C	Toluene	2.000	1.975	1.2#	100	0.000
49	T	Tetrachloroethene	2.000	1.942	2.9	100	0.000
50	T	1,1,2-Trichloroethane	2.000	2.032	-1.6	100	0.000
51	T	Dibromochloromethane	2.000	1.936	3.2	100	0.000
52	T	1,3-Dichloropropane	2.000	2.014	-0.7	100	0.000
53	T	1,2-Dibromoethane	2.000	1.975	1.2	100	0.000
54	T	2-Hexanone	2.000	1.854	7.3	100	0.000
55	P	Chlorobenzene	2.000	1.962	1.9	100	0.000
56	T	1-Chlorohexane	2.000	1.948	2.6	100	0.000
57	C	Ethylbenzene	2.000	1.971	1.4#	100	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273007.D Vial: 5
Acq On : 25 Apr 2017 21:56 Operator: FJB
Sample : WG611454-05 2ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	2.000	2.010	-0.5	100	0.000
59	T	m-,p-Xylene	4.000	3.821	4.5	100	0.000
60	T	o-Xylene	2.000	1.972	1.4	100	0.000
61	T	Styrene	2.000	1.871	6.5	100	0.000
62	P	Bromoform	2.000	1.826	8.7	100	0.000
63	T	Isopropylbenzene	2.000	1.910	4.5	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	2.000	1.960	2.0	100	0.000
66	S	p-Bromofluorobenzene	-1.000	0.150	0.0	0	0.000
67	T	Bromobenzene	2.000	2.018	-0.9	100	0.000
68	T	n-Propylbenzene	2.000	1.958	2.1	100	0.000
69	P	1,1,2,2-Tetrachloroethane	2.000	1.944	2.8	100	0.000
70	T	2-Chlorotoluene	2.000	2.012	-0.6	100	0.000
71	T	1,2,3-Trichloropropane	2.000	2.114	-5.7	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	2.000	1.583	20.9	100	0.000
73	T	1,2,4-Trimethylbenzene	2.000	1.991	0.4	100	0.000
74	T	4-Chlorotoluene	2.000	1.998	0.1	100	0.000
75	T	tert-Butylbenzene	2.000	2.026	-1.3	100	0.000
76	T	sec-Butylbenzene	2.000	1.983	0.8	100	0.000
77	T	p-Isopropyltoluene	2.000	1.948	2.6	100	0.000
78	T	1,3-Dichlorobenzene	2.000	1.986	0.7	100	0.000
79	T	1,4-Dichlorobenzene	2.000	1.961	1.9	100	0.000
80	T	n-Butylbenzene	2.000	1.840	8.0	100	0.000
81	T	1,2-Dichlorobenzene	2.000	2.002	-0.1	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	2.000	2.005	-0.2	100	0.000
83	T	Hexachlorobutadiene	2.000	1.901	4.9	100	0.000
84	T	1,2,4-Trichlorobenzene	2.000	1.853	7.4	100	0.000
85	T	Naphthalene	2.000	1.923	3.8	100	0.000
86	T	1,2,3-Trichlorobenzene	2.000	1.943	2.8	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	431262	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	319022	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	163434	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	23759	5.1012	ug/L	0.0116
Spiked Amount 25.000	Range 86 - 118		Recovery = 20.405%#			
34) 1,2-Dichloroethane-d4	4.964	65	23294	5.3358	ug/L	0.0114
Spiked Amount 25.000	Range 80 - 120		Recovery = 21.343%#			
47) Toluene-d8	6.815	98	82876	5.2054	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 20.822%#			
66) p-Bromofluorobenzene	8.783	95	24857	4.5424	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 18.170%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	23001	4.4908	ug/L	99
3) Chloromethane	1.224	50	24053	4.7986	ug/L	98
4) Vinyl Chloride	1.270	62	26844	4.8364	ug/L	100
5) 1,3-Butadiene	1.282	54	17084	5.0131	ug/L	98
6) Bromomethane	1.464	94	22223	5.3853	ug/L	99
7) Chloroethane	1.539	64	14714	5.5881	ug/L	93
8) Trichlorofluoromethane	1.632	101	37891	5.3221	ug/L	99
9) Diethyl ether	1.843	59	169782	49.4513	ug/L	100
10) 1,1-Dichloroethene	1.971	61	33029	4.9581	ug/L	100
11) Carbon Disulfide	1.982	76	71308	4.9874	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	21872	5.1500	ug/L	100
13) Iodomethane	2.069	142	16154	4.4150	ug/L	99
14) Acrolein	2.225	56	10883	25.6613	ug/L	100
15) Methylene Chloride	2.411	84	25075	4.9606	ug/L	100
16) Acetone	2.469	43	5224	6.0246	ug/L	95
17) trans-1,2-Dichloroethene	2.544	96	22591	4.9805	ug/L	99
18) Methyl acetate	2.576	43	11275	4.9598	ug/L #	97
19) Methyl Tert Butyl Ether	2.660	73	58542	5.0855	ug/L #	100
20) 1,1-Dichloroethane	3.120	63	41374	5.0784	ug/L	99
21) Acrylonitrile	3.190	53	27474	24.8409	ug/L	97
22) Vinyl Acetate	2.616	86	3460	4.7395	ug/L #	45
23) cis-1,2-Dichloroethene	3.740	96	26009	5.0656	ug/L	98
24) 2,2-Dichloropropane	3.870	77	28316	4.6367	ug/L	100
25) Cyclohexane	3.971	56	35009	5.0522	ug/L	99
26) Bromochloromethane	3.986	130	16786	5.0742	ug/L	98
27) Chloroform	4.116	83	43019	5.0646	ug/L	99
28) Carbon Tetrachloride	4.255	117	34147	5.0837	ug/L	98
30) 1,1,1-Trichloroethane	4.351	97	37529	5.0254	ug/L	99
31) 1,1-Dichloropropene	4.510	75	28981	4.9414	ug/L	98
32) 2-Butanone	4.539	43	6581	5.0907	ug/L #	96
33) Benzene	4.799	78	91557	4.9841	ug/L	100
35) 1,2-Dichloroethane	5.037	62	29435	5.1460	ug/L	99
36) Methylcyclohexane	5.428	83	36223	4.9893	ug/L	99
37) Trichloroethene	5.451	130	27251	4.9389	ug/L	99
38) Dibromomethane	5.862	93	14614	5.1942	ug/L	98
39) 1,2-Dichloropropane	5.969	63	24584	5.1032	ug/L	99
40) Bromodichloromethane	6.053	83	32146	4.9995	ug/L	100
41) 1,4-Dioxane	6.262	88	2257	94.0635	ug/L	90
42) 2-Chloroethyl Vinyl Ether	6.629	63	9083	4.1568	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	36540	5.0431	ug/L	99
44) 4-Methyl-2-Pentanone	7.229	58	5813	4.8566	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	31049	5.0407	ug/L	100
48) Toluene	6.858	91	101530	5.0762	ug/L	99
49) Tetrachloroethene	7.185	166	29104	5.1017	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	20117	5.1891	ug/L	99
51) Dibromochloromethane	7.509	129	26886	5.0809	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

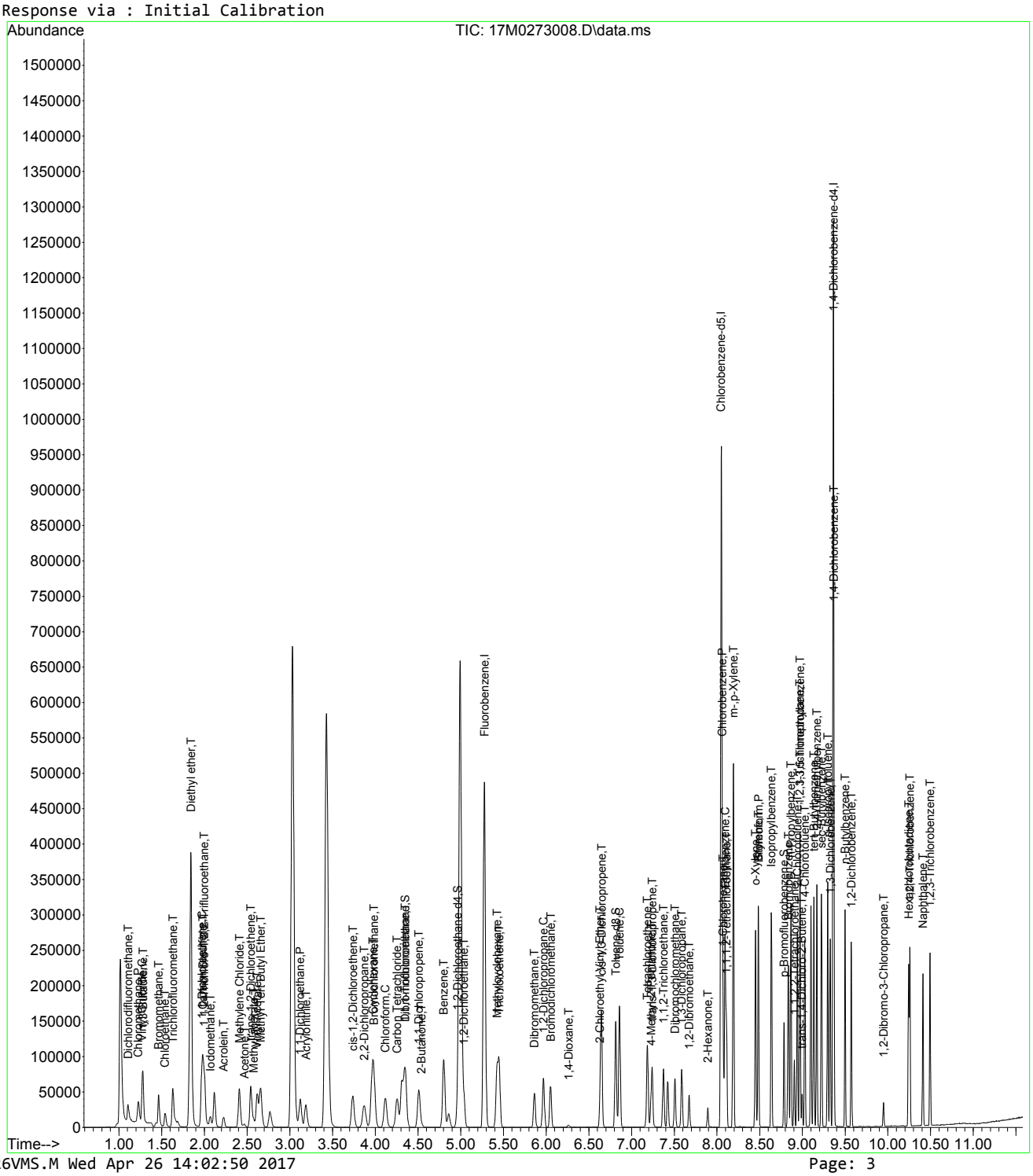
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	31843	5.1682	ug/L		98
53) 1,2-Dibromoethane	7.674	107	20257	5.1000	ug/L		99
54) 2-Hexanone	7.892	43	10630	5.2214	ug/L		100
55) Chlorobenzene	8.060	112	67203	5.0076	ug/L		93
56) 1-Chlorohexane	8.071	69	5432	5.0134	ug/L		83
57) Ethylbenzene	8.094	106	35155	5.0323	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	26571	5.0862	ug/L		99
59) m-,p-Xylene	8.193	106	85229	10.1090	ug/L		97
60) o-Xylene	8.450	106	41928	5.0473	ug/L		97
61) Styrene	8.482	104	66320	4.9896	ug/L		100
62) Bromoform	8.485	173	18946	5.0897	ug/L		99
63) Isopropylbenzene	8.636	105	109791	5.1061	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	93688	5.1422	ug/L		99
67) Bromobenzene	8.835	156	32100	4.9931	ug/L		99
68) n-Propylbenzene	8.864	91	123890	5.1333	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	23301	5.3002	ug/L		100
70) 2-Chlorotoluene	8.940	91	75963	5.0993	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	6702	5.1569	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	4475	4.6190	ug/L	#	91
73) 1,2,4-Trimethylbenzene	9.168	105	94879	5.1644	ug/L		99
74) 4-Chlorotoluene	9.029	91	75469	5.0745	ug/L		99
75) tert-Butylbenzene	9.134	134	18683	5.1309	ug/L		99
76) sec-Butylbenzene	9.223	105	116472	5.1891	ug/L		99
77) p-Isopropyltoluene	9.296	119	98419	5.1437	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	56651	5.0548	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	56423	4.9866	ug/L		99
80) n-Butylbenzene	9.499	91	82542	5.1112	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	55072	5.0420	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	4044	5.0142	ug/L		98
83) Hexachlorobutadiene	10.243	225	23413	5.0847	ug/L		99
84) 1,2,4-Trichlorobenzene	10.257	180	40601	5.0037	ug/L		100
85) Naphthalene	10.411	128	82078	5.1873	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	39894	5.0617	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:50 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	100	0.000
2	T	Dichlorodifluoromethane	5.000	4.491	10.2	100	0.012
3	P	Chloromethane	5.000	4.799	4.0	100	0.012
4	C	Vinyl Chloride	5.000	4.836	3.3#	100	0.000
5	T	1,3-Butadiene	5.000	5.013	-0.3	100	0.012
6	T	Bromomethane	5.000	5.385	-7.7	100	0.000
7	T	Chloroethane	5.000	5.588	-11.8	100	0.011
8	T	Trichlorofluoromethane	5.000	5.322	-6.4	100	0.017
9	T	Diethyl ether	50.000	49.451	1.1	100	0.000
10	C	1,1-Dichloroethene	5.000	4.958	0.8#	100	0.015
11	T	Carbon Disulfide	5.000	4.987	0.3	100	0.011
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.000	5.150	-3.0	100	0.012
13	T	Iodomethane	5.000	4.415	11.7	100	0.011
14	T	Acrolein	25.000	25.661	-2.6	100	0.000
15	T	Methylene Chloride	5.000	4.961	0.8	100	0.012
16	T	Acetone	5.000	6.025	-20.5	100	0.000
17	T	trans-1,2-Dichloroethene	5.000	4.980	0.4	100	0.012
18	T	Methyl acetate	5.000	4.960	0.8	100	0.000
19	T	Methyl Tert Butyl Ether	5.000	5.086	-1.7	100	0.012
20	P	1,1-Dichloroethane	5.000	5.078	-1.6	100	0.000
21	T	Acrylonitrile	25.000	24.841	0.6	100	0.000
22	T	Vinyl Acetate	5.000	4.740	5.2	100	0.000
23	T	cis-1,2-Dichloroethene	5.000	5.066	-1.3	100	0.012
24	T	2,2-Dichloropropane	5.000	4.637	7.3	100	0.012
25	T	Cyclohexane	5.000	5.052	-1.0	100	0.000
26	T	Bromochloromethane	5.000	5.074	-1.5	100	0.012
27	C	Chloroform	5.000	5.065	-1.3#	100	0.000
28	T	Carbon Tetrachloride	5.000	5.084	-1.7	100	0.000
29	S	Dibromofluoromethane	5.000	5.101	-2.0	100	0.012
30	T	1,1,1-Trichloroethane	5.000	5.025	-0.5	100	0.000
31	T	1,1-Dichloropropene	5.000	4.941	1.2	100	0.000
32	T	2-Butanone	5.000	5.091	-1.8	100	0.015
33	T	Benzene	5.000	4.984	0.3	100	0.000
34	S	1,2-Dichloroethane-d4	5.000	5.336	-6.7	100	0.011
35	T	1,2-Dichloroethane	5.000	5.146	-2.9	100	0.000
36	T	Methylcyclohexane	5.000	4.989	0.2	100	0.000
37	T	Trichloroethene	5.000	4.939	1.2	100	0.000
38	T	Dibromomethane	5.000	5.194	-3.9	100	0.000
39	C	1,2-Dichloropropane	5.000	5.103	-2.1#	100	0.000
40	T	Bromodichloromethane	5.000	5.000	0.0	100	0.000
41	T	1,4-Dioxane	100.000	94.064	5.9	100	0.000
42	T	2-Chloroethyl Vinyl Ether	5.000	4.157	16.9	100	0.000
43	T	cis-1,3-Dichloropropene	5.000	5.043	-0.9	100	0.000
44	T	4-Methyl-2-Pentanone	5.000	4.857	2.9	100	0.000
45	T	trans-1,3-Dichloropropene	5.000	5.041	-0.8	100	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	100	0.000
47	S	Toluene-d8	5.000	5.205	-4.1	100	0.000
48	C	Toluene	5.000	5.076	-1.5#	100	0.000
49	T	Tetrachloroethene	5.000	5.102	-2.0	100	0.000
50	T	1,1,2-Trichloroethane	5.000	5.189	-3.8	100	0.000
51	T	Dibromochloromethane	5.000	5.081	-1.6	100	0.000
52	T	1,3-Dichloropropane	5.000	5.168	-3.4	100	0.000
53	T	1,2-Dibromoethane	5.000	5.100	-2.0	100	0.000
54	T	2-Hexanone	5.000	5.221	-4.4	100	0.000
55	P	Chlorobenzene	5.000	5.008	-0.2	100	0.000
56	T	1-Chlorohexane	5.000	5.013	-0.3	100	0.000
57	C	Ethylbenzene	5.000	5.032	-0.6#	100	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273008.D Vial: 6
Acq On : 25 Apr 2017 22:15 Operator: FJB
Sample : WG611454-06 5ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 13:59:16 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	5.000	5.086	-1.7	100	0.000
59	T	m-,p-Xylene	10.000	10.109	-1.1	100	0.000
60	T	o-Xylene	5.000	5.047	-0.9	100	0.000
61	T	Styrene	5.000	4.990	0.2	100	0.000
62	P	Bromoform	5.000	5.090	-1.8	100	0.000
63	T	Isopropylbenzene	5.000	5.106	-2.1	100	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	100	0.000
65	T	1,3,5-Trimethylbenzene	5.000	5.142	-2.8	100	0.000
66	S	p-Bromofluorobenzene	5.000	4.542	9.2	100	0.000
67	T	Bromobenzene	5.000	4.993	0.1	100	0.000
68	T	n-Propylbenzene	5.000	5.133	-2.7	100	0.000
69	P	1,1,2,2-Tetrachloroethane	5.000	5.300	-6.0	100	0.000
70	T	2-Chlorotoluene	5.000	5.099	-2.0	100	0.000
71	T	1,2,3-Trichloropropane	5.000	5.157	-3.1	100	0.000
72	T	trans-1,4-Dichloro-2-Butene	5.000	4.619	7.6	100	0.000
73	T	1,2,4-Trimethylbenzene	5.000	5.164	-3.3	100	0.000
74	T	4-Chlorotoluene	5.000	5.075	-1.5	100	0.000
75	T	tert-Butylbenzene	5.000	5.131	-2.6	100	0.000
76	T	sec-Butylbenzene	5.000	5.189	-3.8	100	0.000
77	T	p-Isopropyltoluene	5.000	5.144	-2.9	100	0.000
78	T	1,3-Dichlorobenzene	5.000	5.055	-1.1	100	0.000
79	T	1,4-Dichlorobenzene	5.000	4.987	0.3	100	0.000
80	T	n-Butylbenzene	5.000	5.111	-2.2	100	0.000
81	T	1,2-Dichlorobenzene	5.000	5.042	-0.8	100	0.000
82	T	1,2-Dibromo-3-Chloropropane	5.000	5.014	-0.3	100	0.000
83	T	Hexachlorobutadiene	5.000	5.085	-1.7	100	0.000
84	T	1,2,4-Trichlorobenzene	5.000	5.004	-0.1	100	0.000
85	T	Naphthalene	5.000	5.187	-3.7	100	0.000
86	T	1,2,3-Trichlorobenzene	5.000	5.062	-1.2	100	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	415989	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	308316	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	155966	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	41370	9.2085	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 36.834%#			
34) 1,2-Dichloroethane-d4	4.956	65	39416	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 37.441%#			
47) Toluene-d8	6.815	98	144252	9.3749	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 37.500%#			
66) p-Bromofluorobenzene	8.784	95	48881	9.3603	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 37.441%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	107073	21.6728	ug/L	100
3) Chloromethane	1.218	50	97047	20.0719	ug/L	100
4) Vinyl Chloride	1.264	62	110236	20.5901	ug/L	99
5) 1,3-Butadiene	1.276	54	65854	20.0334	ug/L	99
6) Bromomethane	1.458	94	79989	20.0955	ug/L	100
7) Chloroethane	1.534	64	58403	22.9945	ug/L	100
8) Trichlorofluoromethane	1.626	101	147654	21.5007	ug/L	99
9) Diethyl ether	1.838	59	271363	81.9400	ug/L	100
10) 1,1-Dichloroethene	1.962	61	129870	20.2111	ug/L	100
11) Carbon Disulfide	1.977	76	273076	19.8007	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	82665	20.1789	ug/L	100
13) Iodomethane	2.063	142	90634	16.0415	ug/L	99
14) Acrolein	2.220	56	16470	40.2609	ug/L	100
15) Methylene Chloride	2.405	84	94958	19.4753	ug/L	99
16) Acetone	2.463	43	17323	20.7112	ug/L	97
17) trans-1,2-Dichloroethene	2.538	96	87762	20.0586	ug/L	99
18) Methyl acetate	2.573	43	47763	21.7821	ug/L #	98
19) Methyl Tert Butyl Ether	2.654	73	223741	20.1499	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	159579	20.3066	ug/L	99
21) Acrylonitrile	3.181	53	43518	40.7919	ug/L	100
22) Vinyl Acetate	2.616	86	13399	19.0279	ug/L	87
23) cis-1,2-Dichloroethene	3.731	96	98926	19.9747	ug/L	100
24) 2,2-Dichloropropane	3.867	77	117122	18.9833	ug/L	98
25) Cyclohexane	3.966	56	132299	19.7932	ug/L	99
26) Bromochloromethane	3.983	130	65363	20.4839	ug/L	100
27) Chloroform	4.116	83	162820	19.8724	ug/L	100
28) Carbon Tetrachloride	4.255	117	133209	20.5600	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	146436	20.3288	ug/L	100
31) 1,1-Dichloropropene	4.504	75	113299	20.0273	ug/L	99
32) 2-Butanone	4.530	43	23212	18.6149	ug/L	97
33) Benzene	4.800	78	350607	19.7868	ug/L	100
35) 1,2-Dichloroethane	5.031	62	110449	20.0184	ug/L	100
36) Methylcyclohexane	5.422	83	133533	19.0679	ug/L	100
37) Trichloroethene	5.448	130	105023	19.7330	ug/L	100
38) Dibromomethane	5.859	93	54492	20.0791	ug/L	100
39) 1,2-Dichloropropane	5.966	63	93539	20.1299	ug/L	100
40) Bromodichloromethane	6.050	83	125080	20.1673	ug/L	99
41) 1,4-Dioxane	6.259	88	3291	142.1926	ug/L	98
42) 2-Chloroethyl Vinyl Ether	6.629	63	38855	18.4348	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	142778	20.4290	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	21644	18.7468	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	121640	20.4727	ug/L	100
48) Toluene	6.858	91	390265	20.1896	ug/L	100
49) Tetrachloroethene	7.185	166	108682	19.7126	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	75279	20.0923	ug/L	100
51) Dibromochloromethane	7.507	129	104430	20.4202	ug/L	100

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

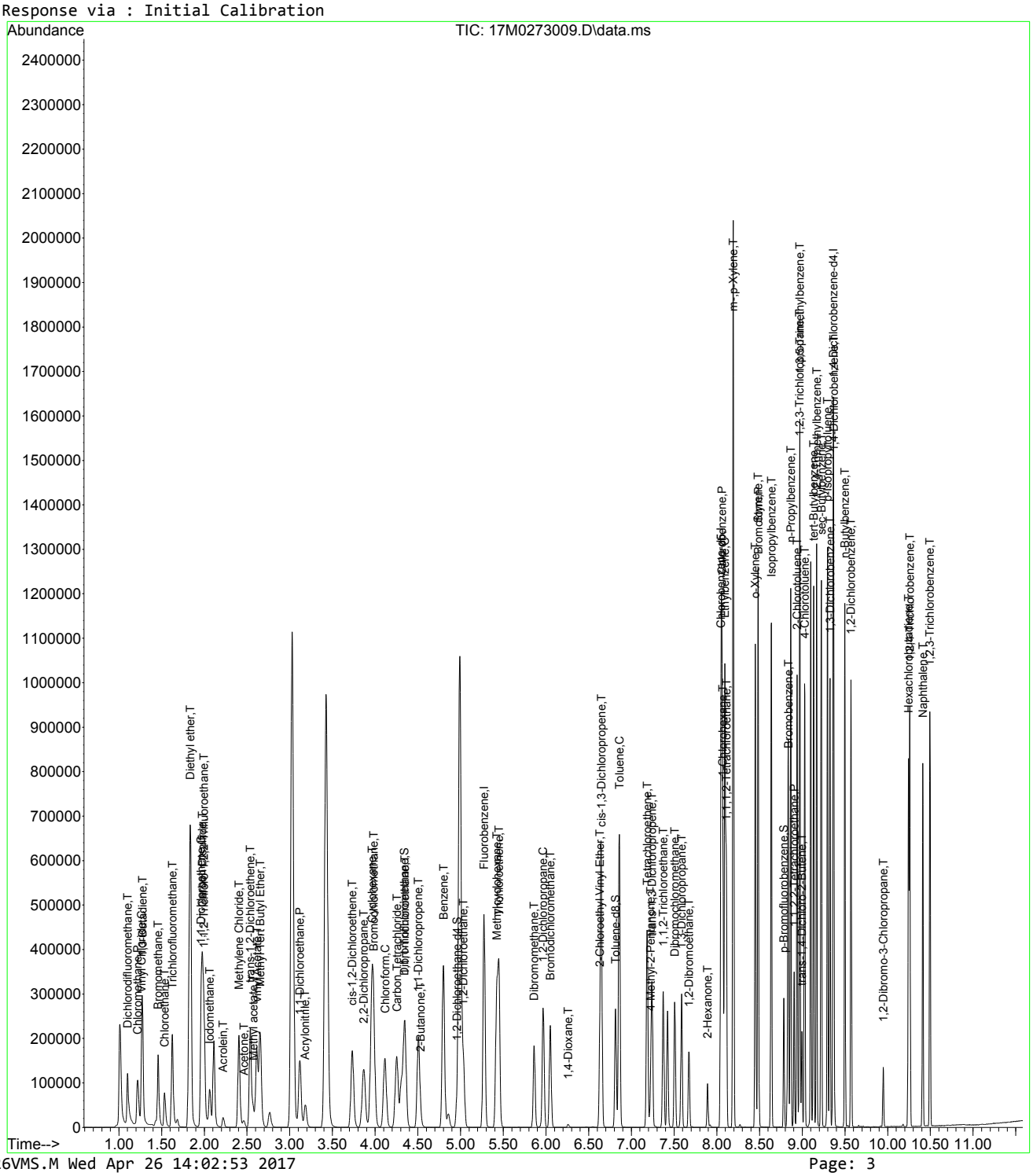
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	121547	20.4125	ug/L		100
53) 1,2-Dibromoethane	7.675	107	76988	20.0559	ug/L		99
54) 2-Hexanone	7.892	43	38232	19.4315	ug/L		100
55) Chlorobenzene	8.060	112	258733	19.9487	ug/L		98
56) 1-Chlorohexane	8.071	69	20340	19.4243	ug/L		84
57) Ethylbenzene	8.095	106	135392	20.0539	ug/L		99
58) 1,1,1,2-Tetrachloroethane	8.112	131	101795	20.1621	ug/L		100
59) m-,p-Xylene	8.193	106	327137	40.1491	ug/L		97
60) o-Xylene	8.451	106	160719	20.0193	ug/L		98
61) Styrene	8.482	104	262832	20.4609	ug/L		100
62) Bromoform	8.485	173	73848	20.5278	ug/L		100
63) Isopropylbenzene	8.639	105	420954	20.2572	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	353581	20.3360	ug/L		100
67) Bromobenzene	8.839	156	122250	19.9264	ug/L		99
68) n-Propylbenzene	8.865	91	469314	20.3768	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	85621	20.4085	ug/L		100
70) 2-Chlorotoluene	8.940	91	286030	20.1202	ug/L		99
71) 1,2,3-Trichloropropane	8.969	110	24779	19.9792	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	20177	21.8236	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	356727	20.3467	ug/L		100
74) 4-Chlorotoluene	9.027	91	285276	20.1003	ug/L		99
75) tert-Butylbenzene	9.134	134	69653	20.0447	ug/L		100
76) sec-Butylbenzene	9.224	105	435489	20.3309	ug/L		100
77) p-Isopropyltoluene	9.296	119	374739	20.5229	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	213997	20.0086	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	209144	19.3691	ug/L		100
80) n-Butylbenzene	9.499	91	311602	20.2190	ug/L		99
81) 1,2-Dichlorobenzene	9.571	146	208933	20.0442	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.948	75	15581	20.2441	ug/L		97
83) Hexachlorobutadiene	10.243	225	85120	19.3709	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	156012	20.1477	ug/L		100
85) Naphthalene	10.411	128	308618	20.4385	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	149504	19.8771	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273009.D Vial: 7
Acq On : 25 Apr 2017 22:46 Operator: FJB
Sample : WG611454-07 20ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:52 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:53 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	417906	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	317098	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167026	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115980	25.6974	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.790%			
34) 1,2-Dichloroethane-d4	4.953	65	108720	25.6997	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.799%			
47) Toluene-d8	6.812	98	406817	25.7068	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.827%			
66) p-Bromofluorobenzene	8.783	95	141725	25.3421	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.368%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	273383	55.0820	ug/L	100
3) Chloromethane	1.212	50	241081	49.6332	ug/L	100
4) Vinyl Chloride	1.261	62	274798	51.0919	ug/L	100
5) 1,3-Butadiene	1.270	54	170920	51.7569	ug/L	100
6) Bromomethane	1.455	94	185476	46.3830	ug/L	100
7) Chloroethane	1.528	64	113694	44.5585	ug/L	100
8) Trichlorofluoromethane	1.615	101	370004	53.6311	ug/L	100
9) Diethyl ether	1.835	59	343062	103.1148	ug/L	100
10) 1,1-Dichloroethene	1.956	61	324434	50.2586	ug/L	100
11) Carbon Disulfide	1.971	76	711965	51.3878	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	212072	51.5304	ug/L	100
13) Iodomethane	2.058	142	303865	48.8576	ug/L	100
14) Acrolein	2.217	56	22080	53.7270	ug/L	100
15) Methylene Chloride	2.399	84	234342	47.8417	ug/L	100
16) Acetone	2.460	43	40588	48.3039	ug/L	99
17) trans-1,2-Dichloroethene	2.532	96	221078	50.2970	ug/L	100
18) Methyl acetate	2.567	43	128727	58.4362	ug/L #	98
19) Methyl Tert Butyl Ether	2.648	73	575057	51.5516	ug/L #	100
20) 1,1-Dichloroethane	3.111	63	399083	50.5507	ug/L	100
21) Acrylonitrile	3.181	53	55941	52.1961	ug/L	100
22) Vinyl Acetate	2.608	86	37712	53.3092	ug/L	91
23) cis-1,2-Dichloroethene	3.728	96	250294	50.3065	ug/L	100
24) 2,2-Dichloropropane	3.858	77	316045	50.5289	ug/L	100
25) Cyclohexane	3.963	56	351763	52.3857	ug/L	100
26) Bromochloromethane	3.974	130	167162	52.1461	ug/L	100
27) Chloroform	4.110	83	408367	49.6131	ug/L	100
28) Carbon Tetrachloride	4.246	117	339910	52.2223	ug/L	100
30) 1,1,1-Trichloroethane	4.342	97	366464	50.6404	ug/L	100
31) 1,1-Dichloropropene	4.501	75	294187	51.7635	ug/L	100
32) 2-Butanone	4.524	43	63238	50.4812	ug/L	100
33) Benzene	4.797	78	884324	49.6787	ug/L	100
35) 1,2-Dichloroethane	5.031	62	277929	50.1424	ug/L	100
36) Methylcyclohexane	5.422	83	366430	52.0844	ug/L	100
37) Trichloroethene	5.445	130	266043	49.7582	ug/L	100
38) Dibromomethane	5.859	93	140437	51.5105	ug/L	100
39) 1,2-Dichloropropane	5.966	63	238320	51.0521	ug/L	100
40) Bromodichloromethane	6.047	83	318787	51.1640	ug/L	100
41) 1,4-Dioxane	6.256	88	4661	200.4617	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.629	63	106937	50.5036	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	371992	52.9813	ug/L	100
44) 4-Methyl-2-Pentanone	7.226	58	58337	50.2965	ug/L	100
45) trans-1,3-Dichloropropene	7.240	75	316603	53.0417	ug/L	100
48) Toluene	6.858	91	1001874	50.3945	ug/L	100
49) Tetrachloroethene	7.182	166	285329	50.3192	ug/L	100
50) 1,1,2-Trichloroethane	7.373	97	194901	50.5792	ug/L	100
51) Dibromochloromethane	7.507	129	274126	52.1181	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

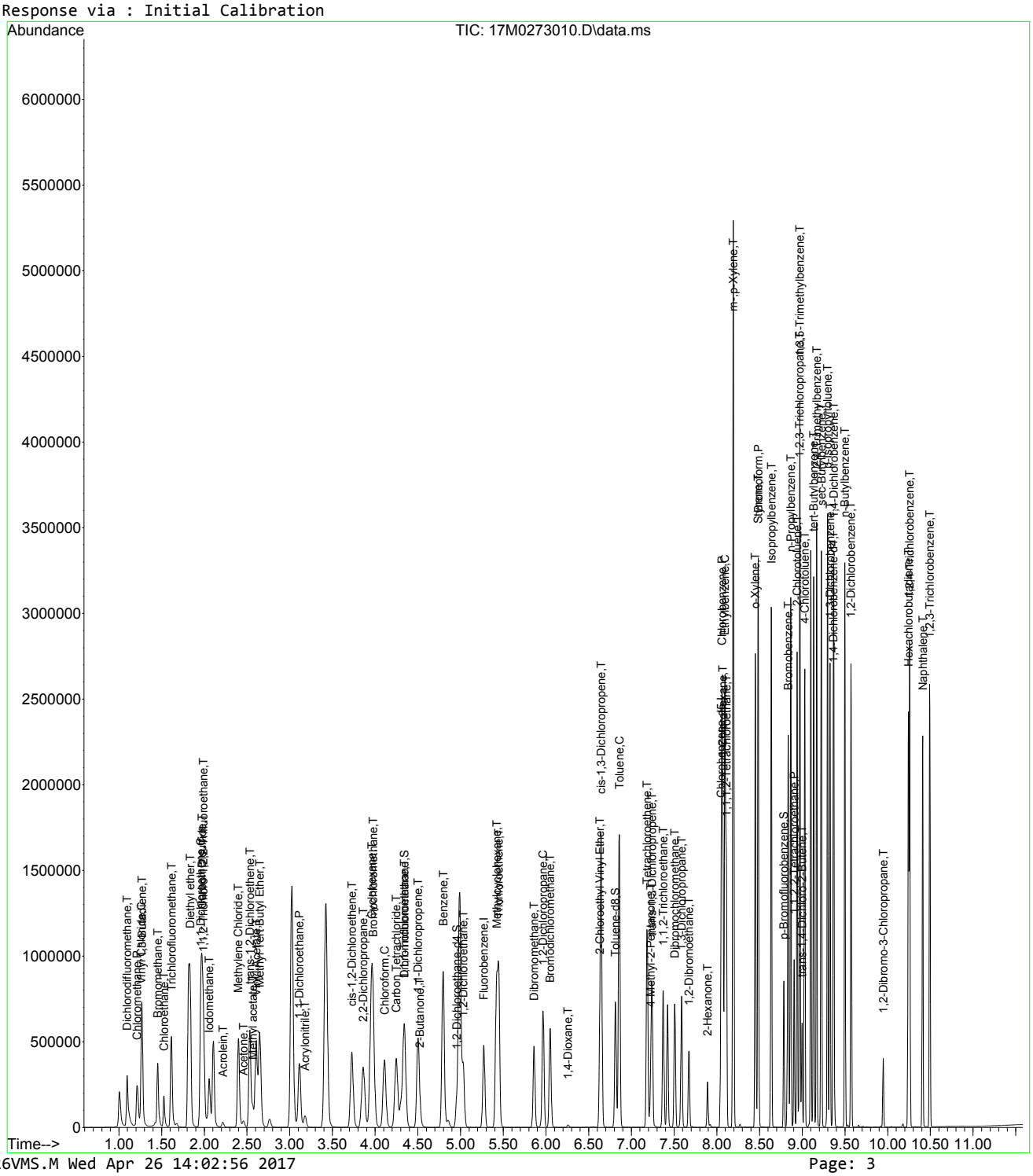
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	310634	50.7227	ug/L		100
53) 1,2-Dibromoethane	7.675	107	202402	51.2669	ug/L		100
54) 2-Hexanone	7.892	43	102578	50.6916	ug/L		100
55) Chlorobenzene	8.060	112	671778	50.3605	ug/L		100
56) 1-Chlorohexane	8.071	69	56830	52.7686	ug/L		100
57) Ethylbenzene	8.094	106	354570	51.0636	ug/L		100
58) 1,1,1,2-Tetrachloroethane	8.112	131	263117	50.6712	ug/L		100
59) m-,p-Xylene	8.193	106	866538	103.4037	ug/L		100
60) o-Xylene	8.450	106	423285	51.2646	ug/L		100
61) Styrene	8.482	104	700211	53.0002	ug/L		100
62) Bromoform	8.485	173	202713	54.7882	ug/L		100
63) Isopropylbenzene	8.639	105	1095961	51.2793	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	941312	50.5541	ug/L		100
67) Bromobenzene	8.836	156	322344	49.0619	ug/L		100
68) n-Propylbenzene	8.864	91	1246315	50.5297	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	238334	53.0473	ug/L		100
70) 2-Chlorotoluene	8.940	91	752979	49.4596	ug/L		100
71) 1,2,3-Trichloropropane	8.969	110	66677	50.2014	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	54428	54.9716	ug/L	#	100
73) 1,2,4-Trimethylbenzene	9.169	105	950457	50.6217	ug/L		100
74) 4-Chlorotoluene	9.030	91	761067	50.0733	ug/L		100
75) tert-Butylbenzene	9.134	134	183420	49.2893	ug/L		100
76) sec-Butylbenzene	9.224	105	1166744	50.8629	ug/L		100
77) p-Isopropyltoluene	9.296	119	1013386	51.8240	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	575762	50.2687	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	570068	49.2988	ug/L		100
80) n-Butylbenzene	9.499	91	877964	53.1964	ug/L		100
81) 1,2-Dichlorobenzene	9.571	146	560761	50.2349	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	44335	53.7892	ug/L		100
83) Hexachlorobutadiene	10.243	225	244851	52.0316	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	445052	53.6691	ug/L		100
85) Naphthalene	10.411	128	870655	53.8418	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	422273	52.4250	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273010.D Vial: 8
Acq On : 25 Apr 2017 23:06 Operator: FJB
Sample : WG611454-08 50ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:55 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:56 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	416412	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	322460	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.366	152	174149	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.342	111	231222	51.4151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 205.660%#			
34) 1,2-Dichloroethane-d4	4.959	65	212387	50.3851	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 201.540%#			
47) Toluene-d8	6.815	98	820550	50.9885	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 203.954%#			
66) p-Bromofluorobenzene	8.786	95	299359	51.3394	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 205.358%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	539830	109.1568	ug/L	100
3) Chloromethane	1.215	50	509696	105.3116	ug/L	100
4) Vinyl Chloride	1.261	62	558799	104.2675	ug/L	100
5) 1,3-Butadiene	1.273	54	332020	100.9009	ug/L	99
6) Bromomethane	1.455	94	363546	91.2402	ug/L	99
7) Chloroethane	1.528	64	219087	86.1717	ug/L	99
8) Trichlorofluoromethane	1.606	101	628305	91.3979	ug/L	99
9) Diethyl ether	1.841	59	666542	201.0626	ug/L	100
10) 1,1-Dichloroethene	1.953	61	657831	102.2712	ug/L	100
11) Carbon Disulfide	1.968	76	1388153	100.5527	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	410087	100.0026	ug/L	100
13) Iodomethane	2.058	142	632275	99.8486	ug/L	100
14) Acrolein	2.220	56	41772	102.0079	ug/L	99
15) Methylene Chloride	2.399	84	477038	97.7384	ug/L	100
16) Acetone	2.466	43	81015	96.7621	ug/L	99
17) trans-1,2-Dichloroethene	2.533	96	452419	103.2982	ug/L	99
18) Methyl acetate	2.573	43	246307	112.2133	ug/L #	99
19) Methyl Tert Butyl Ether	2.651	73	1158243	104.2044	ug/L #	100
20) 1,1-Dichloroethane	3.114	63	814580	103.5507	ug/L	100
21) Acrylonitrile	3.184	53	109445	102.4848	ug/L	99
22) Vinyl Acetate	2.605	86	68474	97.1413	ug/L	81
23) cis-1,2-Dichloroethene	3.731	96	513237	103.5255	ug/L	99
24) 2,2-Dichloropropane	3.861	77	635375	101.6691	ug/L	100
25) Cyclohexane	3.963	56	686248	102.5650	ug/L	99
26) Bromochloromethane	3.980	130	340996	106.7552	ug/L	100
27) Chloroform	4.110	83	831165	101.3417	ug/L	100
28) Carbon Tetrachloride	4.249	117	691112	106.5604	ug/L	100
30) 1,1,1-Trichloroethane	4.345	97	746228	103.4887	ug/L	100
31) 1,1-Dichloropropene	4.504	75	587037	103.6624	ug/L	100
32) 2-Butanone	4.530	43	127054	101.7877	ug/L	100
33) Benzene	4.797	78	1806588	101.8528	ug/L	100
35) 1,2-Dichloroethane	5.034	62	560473	101.4803	ug/L	100
36) Methylcyclohexane	5.425	83	693665	98.9514	ug/L	100
37) Trichloroethene	5.448	130	544959	102.2898	ug/L	99
38) Dibromomethane	5.862	93	286873	105.5988	ug/L	100
39) 1,2-Dichloropropane	5.966	63	487994	104.9115	ug/L	100
40) Bromodichloromethane	6.050	83	655753	105.6233	ug/L	100
41) 1,4-Dioxane	6.259	88	11272	486.5289	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.632	63	223283	105.8292	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	759853	108.6111	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	117344	101.5337	ug/L	99
45) trans-1,3-Dichloropropene	7.243	75	639506	107.5233	ug/L	100
48) Toluene	6.861	91	2019788	99.9064	ug/L	99
49) Tetrachloroethene	7.185	166	569494	98.7631	ug/L	100
50) 1,1,2-Trichloroethane	7.374	97	391353	99.8722	ug/L	100
51) Dibromochloromethane	7.510	129	559220	104.5535	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

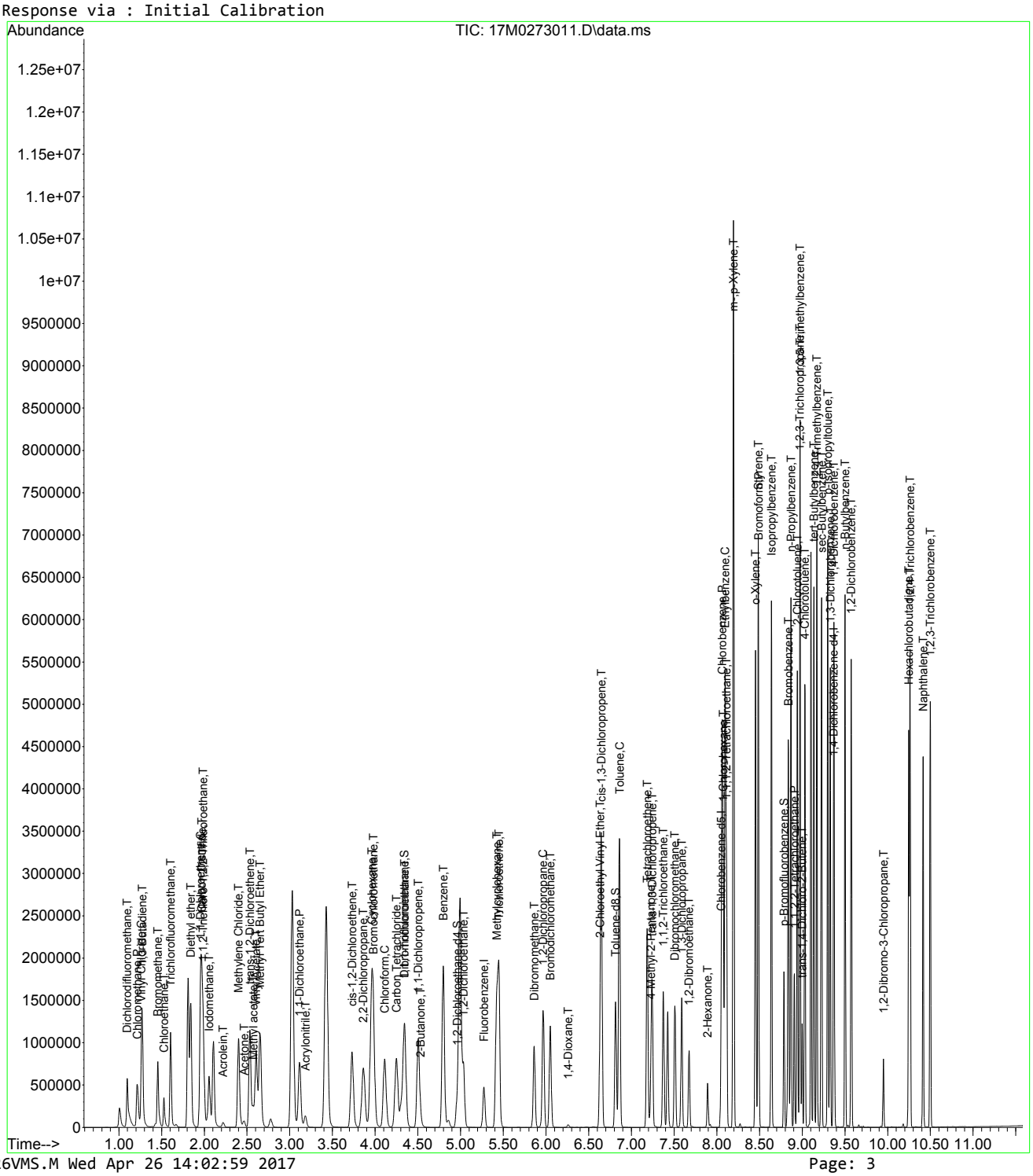
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	628375	100.8998	ug/L		100
53) 1,2-Dibromoethane	7.675	107	404718	100.8074	ug/L		99
54) 2-Hexanone	7.892	43	205809	100.0147	ug/L		100
55) Chlorobenzene	8.063	112	1370148	101.0066	ug/L		100
56) 1-Chlorohexane	8.074	69	110333	100.7444	ug/L		93
57) Ethylbenzene	8.097	106	720227	101.9990	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	539757	102.2182	ug/L		100
59) m-,p-Xylene	8.196	106	1760776	206.6191	ug/L		98
60) o-Xylene	8.453	106	860737	102.5116	ug/L		99
61) Styrene	8.485	104	1437076	106.9660	ug/L		100
62) Bromoform	8.488	173	409507	108.8390	ug/L		100
63) Isopropylbenzene	8.639	105	2195751	101.0295	ug/L		100
65) 1,3,5-Trimethylbenzene	8.975	105	1894143	97.5661	ug/L		100
67) Bromobenzene	8.839	156	656082	95.7737	ug/L		100
68) n-Propylbenzene	8.867	91	2460312	95.6691	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.908	83	459840	98.1628	ug/L		100
70) 2-Chlorotoluene	8.943	91	1511609	95.2292	ug/L		100
71) 1,2,3-Trichloropropane	8.972	110	133032	96.0637	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	104884	101.5987	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.172	105	1913672	97.7541	ug/L		100
74) 4-Chlorotoluene	9.030	91	1517738	95.7730	ug/L		99
75) tert-Butylbenzene	9.137	134	369444	95.2178	ug/L		99
76) sec-Butylbenzene	9.227	105	2287023	95.6223	ug/L		99
77) p-Isopropyltoluene	9.299	119	1998379	98.0160	ug/L		99
78) 1,3-Dichlorobenzene	9.328	146	1155544	96.7618	ug/L		99
79) 1,4-Dichlorobenzene	9.371	146	1146291	95.0753	ug/L		100
80) n-Butylbenzene	9.502	91	1722841	100.1183	ug/L		100
81) 1,2-Dichlorobenzene	9.574	146	1130299	97.1145	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	91272	106.2061	ug/L		99
83) Hexachlorobutadiene	10.246	225	476519	97.1199	ug/L		100
84) 1,2,4-Trichlorobenzene	10.263	180	897981	103.8590	ug/L		100
85) Naphthalene	10.417	128	1727630	102.4678	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	823456	98.0503	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273011.D Vial: 9
Acq On : 25 Apr 2017 23:38 Operator: FJB
Sample : WG611454-09 100ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:02:58 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:02:59 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	422742	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.054	117	336124	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.365	152	172896	25.00000	ug/L	# 0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	457792	100.2715	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 401.086%#			
34) 1,2-Dichloroethane-d4	4.962	65	411299	96.1124	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 384.450%#			
47) Toluene-d8	6.817	98	1632836	97.3388	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 389.355%#			
66) p-Bromofluorobenzene	8.789	95	645488	111.5020	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 446.008%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.102	85	1123418	223.7603	ug/L	100
3) Chloromethane	1.218	50	1006074	204.7589	ug/L	100
4) Vinyl Chloride	1.264	62	1130871	207.8521	ug/L	100
5) 1,3-Butadiene	1.276	54	685580	205.2281	ug/L	100
6) Bromomethane	1.458	94	716567	177.1461	ug/L	99
7) Chloroethane	1.531	64	426821	165.3643	ug/L	97
8) Trichlorofluoromethane	1.606	101	1102484	157.9741	ug/L	99
9) Diethyl ether	1.843	59	3720	1.1053	ug/L	93
10) 1,1-Dichloroethene	1.956	61	1286118	196.9553	ug/L	100
11) Carbon Disulfide	1.971	76	2821100	201.2903	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	825067	198.1856	ug/L	100
13) Iodomethane	2.058	142	1333071	205.2109	ug/L	100
14) Acrolein	2.220	56	2243	5.3954	ug/L	100
15) Methylene Chloride	2.402	84	935406	188.7818	ug/L	100
16) Acetone	2.469	43	158152	186.0640	ug/L	99
17) trans-1,2-Dichloroethene	2.535	96	898207	202.0115	ug/L	100
18) Methyl acetate	2.576	43	529604	237.6658	ug/L #	97
19) Methyl Tert Butyl Ether	2.657	73	2259635	200.2500	ug/L #	100
20) 1,1-Dichloroethane	3.117	63	1611611	201.8029	ug/L	100
21) Acrylonitrile	3.184	53	143	0.1319	ug/L #	7
22) Vinyl Acetate	2.611	86	152152	212.6197	ug/L	79
23) cis-1,2-Dichloroethene	3.731	96	1025145	203.6866	ug/L	100
24) 2,2-Dichloropropane	3.867	77	1266128	199.3016	ug/L	99
25) Cyclohexane	3.968	56	1443111	212.4544	ug/L	98
26) Bromochloromethane	3.986	130	680841	209.9583	ug/L	100
27) Chloroform	4.116	83	1630953	195.8801	ug/L	100
28) Carbon Tetrachloride	4.252	117	1390908	211.2485	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	1477746	201.8688	ug/L	100
31) 1,1-Dichloropropene	4.507	75	1190890	207.1454	ug/L	100
32) 2-Butanone	4.533	43	254497	200.8340	ug/L	100
33) Benzene	4.799	78	3549706	197.1306	ug/L	100
35) 1,2-Dichloroethane	5.037	62	1109187	197.8242	ug/L	100
36) Methylcyclohexane	5.428	83	1502567	211.1318	ug/L	100
37) Trichloroethene	5.451	130	1086595	200.9018	ug/L	99
38) Dibromomethane	5.862	93	573997	208.1262	ug/L	100
39) 1,2-Dichloropropane	5.969	63	972277	205.8952	ug/L	99
40) Bromodichloromethane	6.053	83	1300334	206.3109	ug/L	100
41) 1,4-Dioxane	6.267	88	427	18.1545	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.635	63	462111	215.7466	ug/L	100
43) cis-1,3-Dichloropropene	6.652	75	1544723	217.4919	ug/L	100
44) 4-Methyl-2-Pentanone	7.231	58	247079	210.5876	ug/L	99
45) trans-1,3-Dichloropropene	7.246	75	1303100	215.8160	ug/L	100
48) Toluene	6.864	91	4027711	191.1271	ug/L	99
49) Tetrachloroethene	7.188	166	1179771	196.2816	ug/L	99
50) 1,1,2-Trichloroethane	7.376	97	783346	191.7811	ug/L	99
51) Dibromochloromethane	7.512	129	1136390	203.8259	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

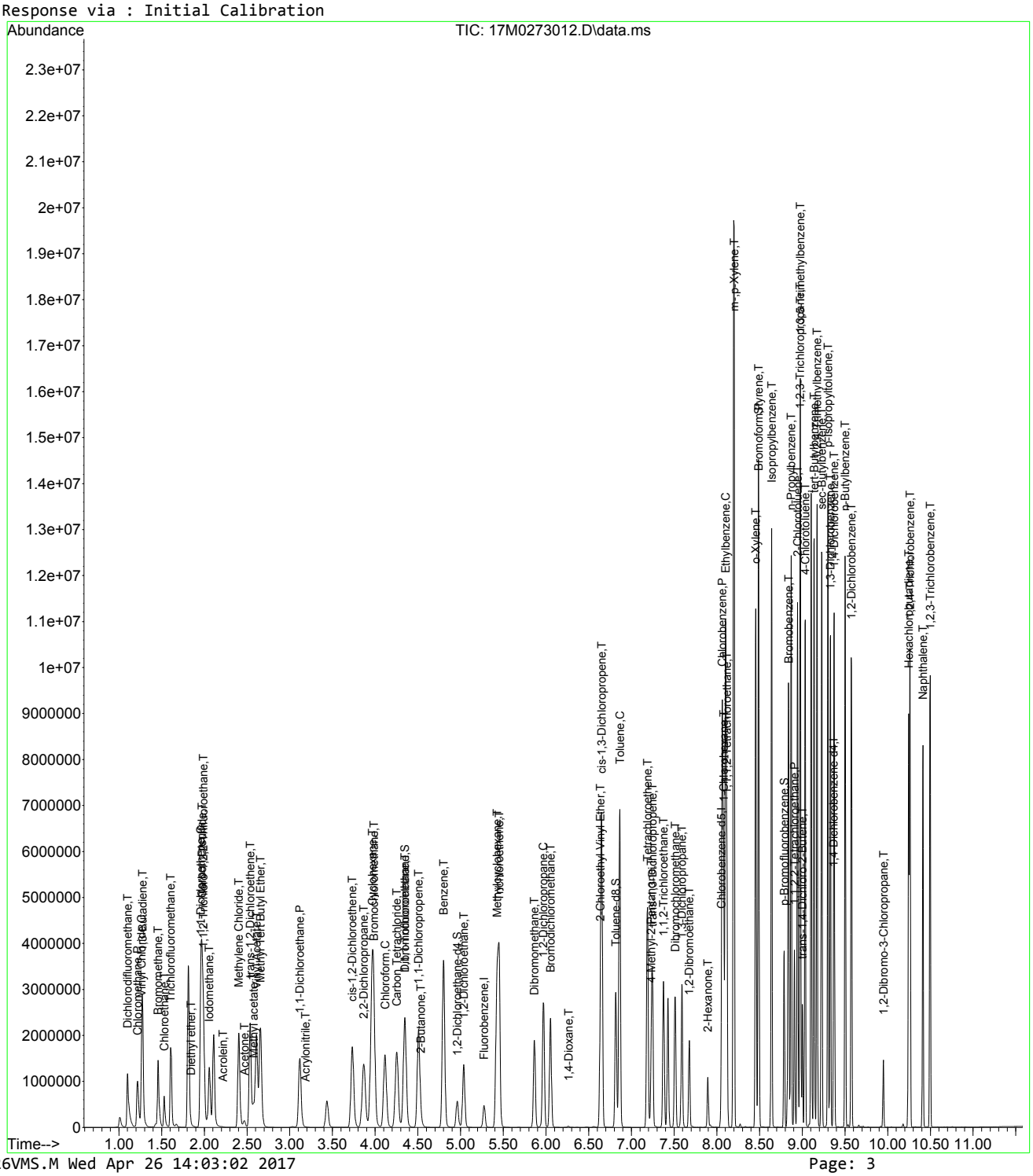
Compound	R.T.	QIon	Response	Conc Units	Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1259427	194.0084 ug/L	99
53) 1,2-Dibromoethane	7.677	107	819308	195.7778 ug/L	99
54) 2-Hexanone	7.895	43	433472	202.0863 ug/L	99
55) Chlorobenzene	8.062	112	2815311	199.1062 ug/L	99
56) 1-Chlorohexane	8.080	69	241282	211.3571 ug/L	93
57) Ethylbenzene	8.103	106	1512310	205.4678 ug/L	95
58) 1,1,1,2-Tetrachloroethane	8.117	131	1104704	200.7023 ug/L	99
59) m-,p-Xylene	8.201	106	3595369	404.7493 ug/L	92
60) o-Xylene	8.456	106	1810464	206.8564 ug/L	97
61) Styrene	8.488	104	3005372	214.6053 ug/L	99
62) Bromoform	8.491	173	876359	223.4506 ug/L	100
63) Isopropylbenzene	8.642	105	4537785	200.3019 ug/L	97
65) 1,3,5-Trimethylbenzene	8.977	105	3876481	201.1221 ug/L	98
67) Bromobenzene	8.841	156	1397197	205.4384 ug/L	100
68) n-Propylbenzene	8.870	91	5099958	199.7489 ug/L	97
69) 1,1,2,2-Tetrachloroethane	8.908	83	975708	209.7955 ug/L	100
70) 2-Chlorotoluene	8.946	91	3200183	203.0680 ug/L	99
71) 1,2,3-Trichloropropane	8.975	110	277077	201.5300 ug/L	95
72) trans-1,4-Dichloro-2-B...	9.001	53	221040	215.6681 ug/L #	96
73) 1,2,4-Trimethylbenzene	9.174	105	3801181	195.5789 ug/L	97
74) 4-Chlorotoluene	9.035	91	3225947	205.0404 ug/L	98
75) tert-Butylbenzene	9.140	134	776105	201.4772 ug/L	94
76) sec-Butylbenzene	9.229	105	4546895	191.4871 ug/L	97
77) p-Isopropyltoluene	9.302	119	3910662	193.1992 ug/L	97
78) 1,3-Dichlorobenzene	9.331	146	2355778	198.6954 ug/L	98
79) 1,4-Dichlorobenzene	9.374	146	2315642	193.4552 ug/L	100
80) n-Butylbenzene	9.501	91	3388493	198.3403 ug/L	98
81) 1,2-Dichlorobenzene	9.577	146	2200775	190.4594 ug/L	98
82) 1,2-Dibromo-3-Chloropr...	9.950	75	167553	196.3812 ug/L	100
83) Hexachlorobutadiene	10.246	225	910189	186.8511 ug/L	100
84) 1,2,4-Trichlorobenzene	10.263	180	1714658	199.7517 ug/L	99
85) Naphthalene	10.413	128	3126949	186.8072 ug/L	99
86) 1,2,3-Trichlorobenzene	10.497	180	1583634	189.9325 ug/L	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273012.D Vial: 10
Acq On : 25 Apr 2017 23:58 Operator: FJB
Sample : WG611454-10 200ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:01 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Fluorobenzene	5.274	96	421163	25.00000	ug/L		0.0000
46) Chlorobenzene-d5	8.051	117	318095	25.00000	ug/L		0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	167190	25.00000	ug/L		0.0000
System Monitoring Compounds							
29) Dibromofluoromethane	4.348	111	349	0.0767	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.307%#			
34) 1,2-Dichloroethane-d4	4.994	65	5040	1.1822	ug/L		0.0405
Spiked Amount 25.000	Range 80 - 120		Recovery =	4.729%#			
47) Toluene-d8	6.818	98	3065	0.1931	ug/L		0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.772%#			
66) p-Bromofluorobenzene	8.784	95	2416	0.4316	ug/L		0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery =	1.726%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.105	85	6972	1.3939	ug/L		92
3) Chloromethane	1.212	50	17159	3.5053	ug/L		99
4) Vinyl Chloride	1.267	62	3350	0.6180	ug/L		95
5) 1,3-Butadiene	1.276	54	1017883	305.8452	ug/L		100
6) Bromomethane	1.458	94	147661	36.6409	ug/L		99
7) Chloroethane	1.528	64	774	0.3010	ug/L	#	1
8) Trichlorofluoromethane	1.606	101	3390	0.4876	ug/L		94
9) Diethyl ether	1.846	59	976700	291.2984	ug/L		100
10) 1,1-Dichloroethene	1.953	61	4141	0.6365	ug/L		100
11) Carbon Disulfide	1.965	76	4144048	296.7934	ug/L		99
12) 1,1,2-Trichloro-1,2,2-...	1.988	101	4030	0.9717	ug/L		99
13) Iodomethane	2.058	142	1505993	232.4313	ug/L		100
14) Acrolein	2.228	56	60168	145.2737	ug/L		99
15) Methylene Chloride	2.405	84	2234	0.4526	ug/L		97
16) Acetone	2.475	43	227499	268.6534	ug/L		100
17) trans-1,2-Dichloroethene	2.538	96	4122	0.9305	ug/L		98
18) Methyl acetate	2.579	43	793361	357.3646	ug/L	#	97
19) Methyl Tert Butyl Ether	2.666	73	1685	0.1499	ug/L	#	100
20) 1,1-Dichloroethane	3.117	63	1574	0.1978	ug/L		92
21) Acrylonitrile	3.190	53	164892	152.6638	ug/L		100
22) Vinyl Acetate	2.608	86	202937	284.6507	ug/L		82
23) cis-1,2-Dichloroethene	3.740	96	2225	0.4437	ug/L		93
24) 2,2-Dichloropropane	3.873	77	904	0.4162	ug/L	#	81
25) Cyclohexane	3.969	56	2110437	311.8629	ug/L		99
26) Bromochloromethane	3.986	130	800	0.2476	ug/L		99
27) Chloroform	4.119	83	2791	0.3365	ug/L		95
28) Carbon Tetrachloride	4.258	117	2228	0.3397	ug/L		99
30) 1,1,1-Trichloroethane	4.348	97	1716	0.2353	ug/L		97
31) 1,1-Dichloropropene	4.504	75	5532	0.9659	ug/L	#	1
32) 2-Butanone	4.533	43	386102	305.8312	ug/L	#	75
33) Benzene	4.802	78	6042	0.3368	ug/L		98
35) 1,2-Dichloroethane	5.034	62	890	0.1593	ug/L	#	55
36) Methylcyclohexane	5.428	83	2089398	294.6906	ug/L		99
37) Trichloroethene	5.451	130	4538	0.8422	ug/L		96
38) Dibromomethane	5.862	93	711	0.2588	ug/L		99
39) 1,2-Dichloropropane	5.972	63	809	0.1720	ug/L	#	75
40) Bromodichloromethane	6.050	83	1149	0.1830	ug/L		94
41) 1,4-Dioxane	6.262	88	15860	676.8366	ug/L		98
42) 2-Chloroethyl Vinyl Ether	6.635	63	704063	329.9396	ug/L		99
43) cis-1,3-Dichloropropene	6.653	75	3088	0.4364	ug/L		94
44) 4-Methyl-2-Pentanone	7.229	58	356679	305.1404	ug/L		89
45) trans-1,3-Dichloropropene	7.246	75	2608	0.4335	ug/L	#	44
48) Toluene	6.858	91	10685	0.5358	ug/L		100
49) Tetrachloroethene	7.185	166	7101	1.2484	ug/L		99
50) 1,1,2-Trichloroethane	7.373	97	542	0.1402	ug/L	#	65
51) Dibromochloromethane	7.510	129	818	0.1550	ug/L		98

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

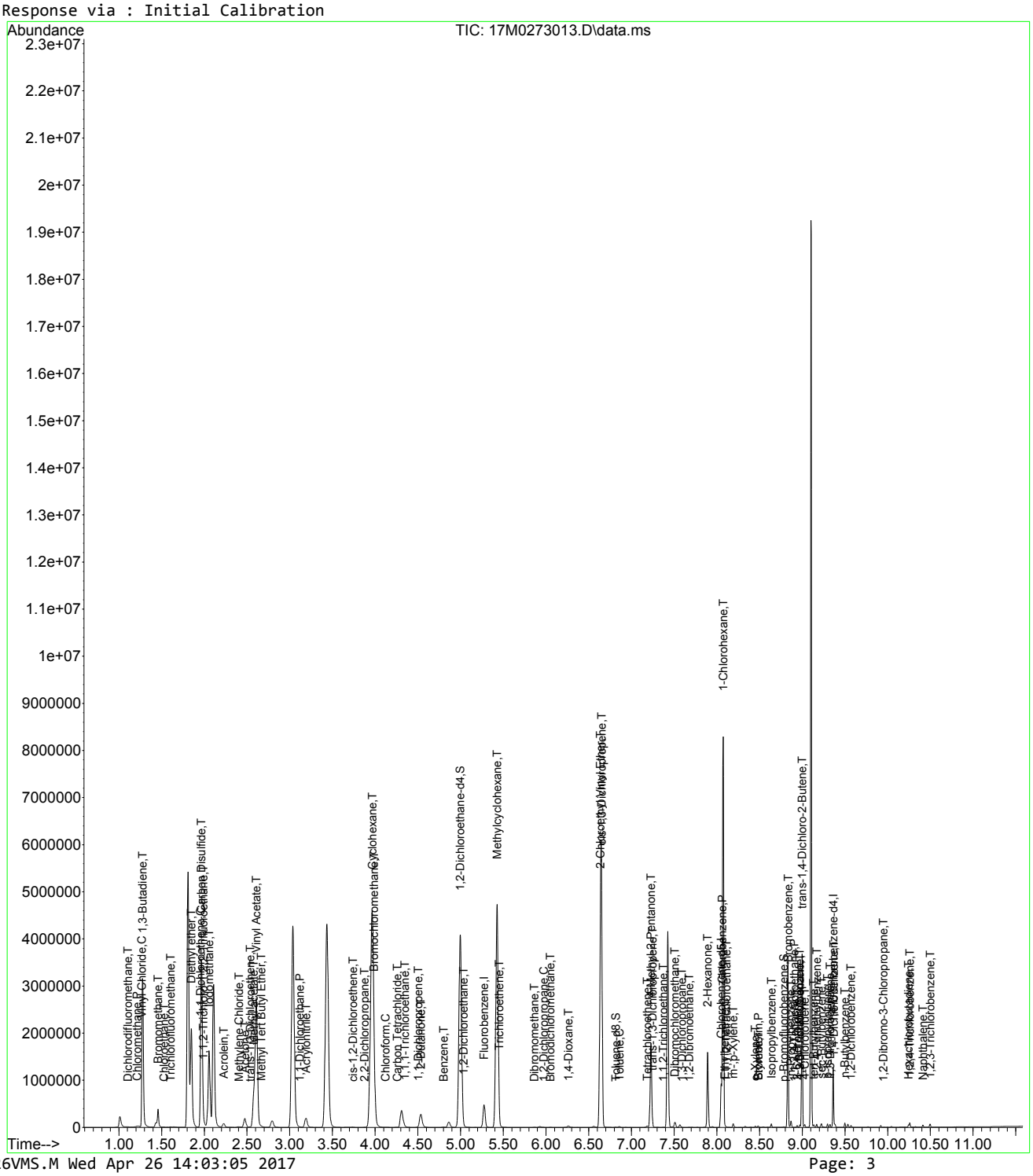
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.591	76	1557	0.2534	ug/L		96
53) 1,2-Dibromoethane	7.677	107	1315	0.3320	ug/L		83
54) 2-Hexanone	7.892	43	628976	309.8508	ug/L		99
55) Chlorobenzene	8.063	112	8335	0.6229	ug/L	#	1
56) 1-Chlorohexane	8.074	69	332865	308.1078	ug/L	#	1
57) Ethylbenzene	8.094	106	4492	0.6449	ug/L	#	1
58) 1,1,1,2-Tetrachloroethane	8.112	131	902	0.1732	ug/L		85
59) m-,p-Xylene	8.193	106	12446	1.4805	ug/L		92
60) o-Xylene	8.451	106	4066	0.4909	ug/L		99
61) Styrene	8.485	104	8240	0.6217	ug/L		98
62) Bromoform	8.485	173	663	0.1786	ug/L	#	79
63) Isopropylbenzene	8.639	105	23066	1.0759	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	14997	0.8046	ug/L		97
67) Bromobenzene	8.836	156	4020	0.6113	ug/L	#	1
68) n-Propylbenzene	8.865	91	32164	1.3028	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	643	0.1430	ug/L		99
70) 2-Chlorotoluene	8.940	91	11336	0.7439	ug/L		97
71) 1,2,3-Trichloropropane	8.972	110	252	0.1895	ug/L	#	1
72) trans-1,4-Dichloro-2-B...	8.998	53	334602	337.6122	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.169	105	15648	0.8326	ug/L		99
74) 4-Chlorotoluene	9.030	91	16738	1.1002	ug/L		100
75) tert-Butylbenzene	9.134	134	2631	0.7063	ug/L		98
76) sec-Butylbenzene	9.224	105	25971	1.1311	ug/L		99
77) p-Isopropyltoluene	9.296	119	20909	1.0682	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	13448	1.1730	ug/L		98
79) 1,4-Dichlorobenzene	9.368	146	14447	1.2481	ug/L		96
80) n-Butylbenzene	9.499	91	25212	1.5261	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	8203	0.7341	ug/L		98
82) 1,2-Dibromo-3-Chloropr...	9.947	75	274	0.3321	ug/L		74
83) Hexachlorobutadiene	10.243	225	5645	1.1984	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	15501	1.8674	ug/L		99
85) Naphthalene	10.414	128	18220	1.1256	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	11288	1.4000	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

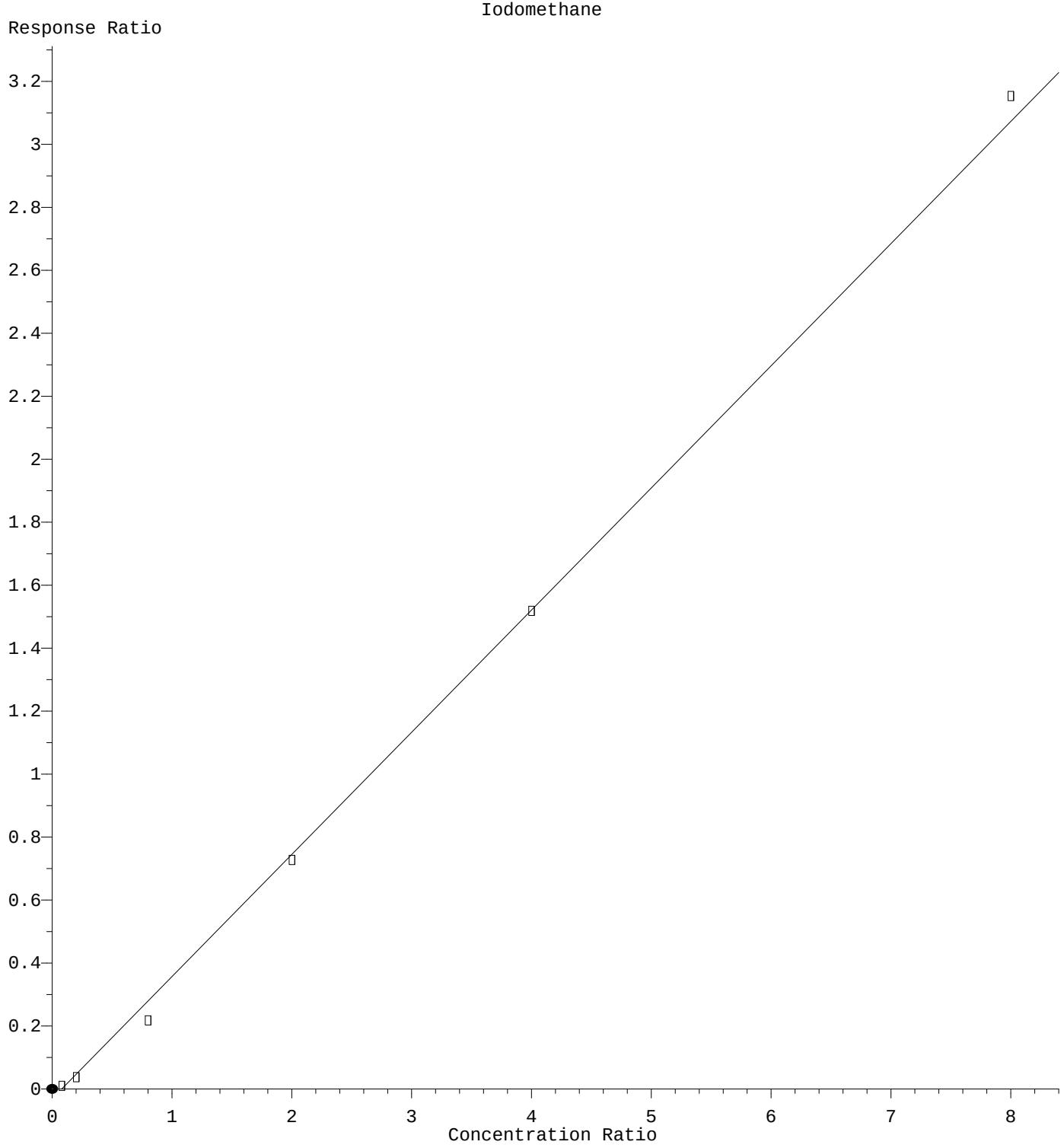
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273013.D Vial: 11
Acq On : 26 Apr 2017 00:33 Operator: FJB
Sample : WG611454-11 300ug/L STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:04 2017

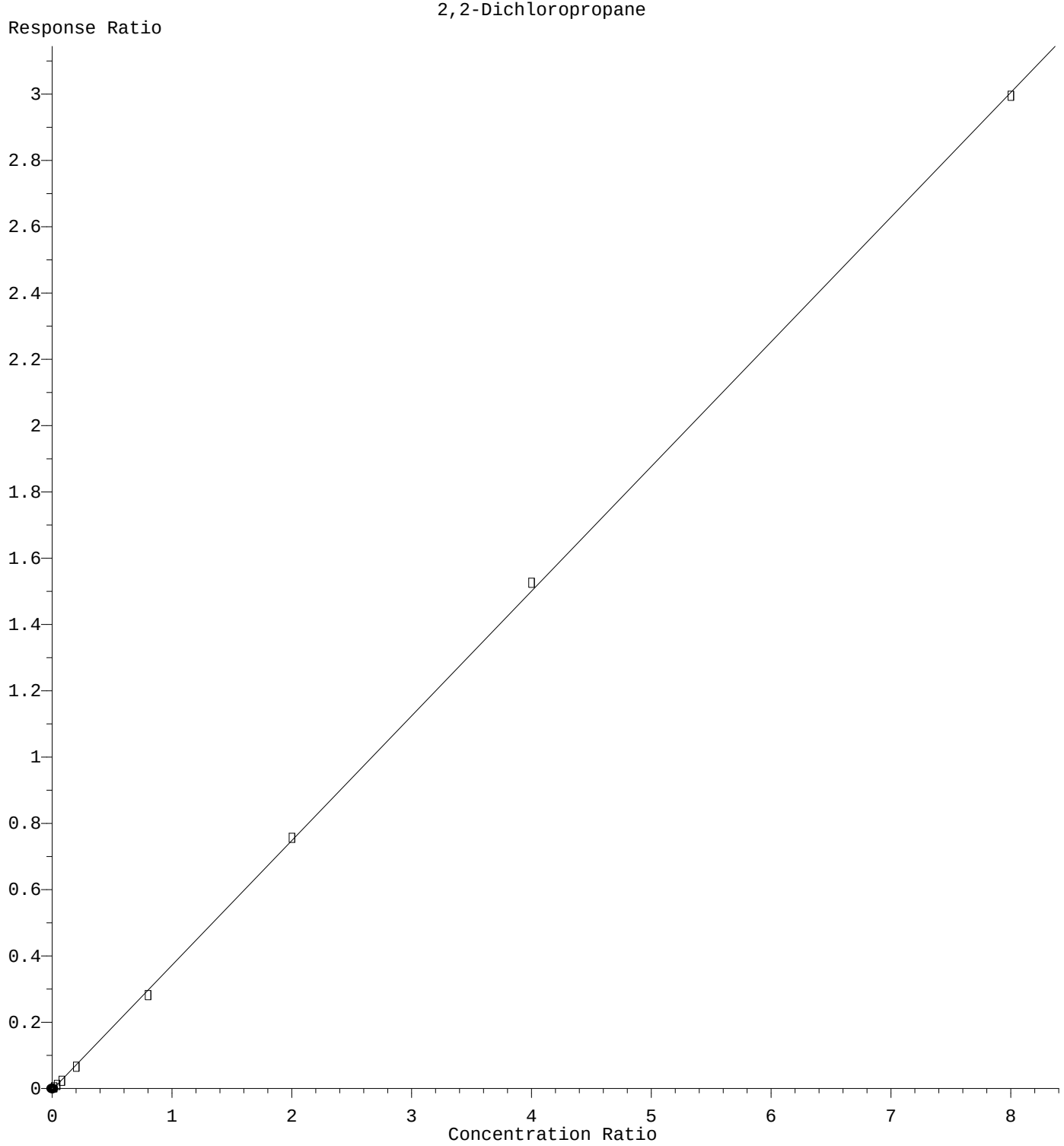
Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:05 2017 Page: 3



Response = 3.879e-001 * Amt - 3.105e-002
Coef of Det (r^2) = 0.996358 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017



Response = 3.762e-001 * Amt - 4.116e-003
Coef of Det (r^2) = 0.999589 Curve Fit: wlr(1/a)
Method Name: D:\MassHunter\GCMS\1\methods\826VMS.M
Calibration Table Last Updated: Wed Apr 26 08:51:20 2017

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	427426	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	325357	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	172416	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	115154	24.9461	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.784%			
34) 1,2-Dichloroethane-d4	4.956	65	107614	24.8717	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.487%			
47) Toluene-d8	6.812	98	413254	25.4507	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.803%			
66) p-Bromofluorobenzene	8.786	95	146143	25.3151	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.260%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.091	85	340360	67.0494	ug/L	100
3) Chloromethane	1.209	50	296192	59.6212	ug/L	99
4) Vinyl Chloride	1.256	62	335286	60.9497	ug/L	100
5) 1,3-Butadiene	1.267	54	281377	83.3070	ug/L	99
6) Bromomethane	1.450	94	177201	43.3267	ug/L	99
7) Chloroethane	1.519	64	108932	41.7413	ug/L	99
8) Trichlorofluoromethane	1.597	101	225737	31.9912	ug/L	100
9) Diethyl ether	1.841	59	316851	93.1153	ug/L	100
10) 1,1-Dichloroethene	1.939	61	284785	43.1339	ug/L	100
11) Carbon Disulfide	1.951	76	621205	43.8383	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.971	101	212873	50.5729	ug/L	99
13) Iodomethane	2.043	142	436680	67.8380	ug/L	100
14) Acrolein	2.220	56	42666	101.5062	ug/L	100
15) Methylene Chloride	2.394	84	222390	44.3905	ug/L	99
16) Acetone	2.472	43	42575	49.5401	ug/L	99
17) trans-1,2-Dichloroethene	2.524	96	211286	46.9986	ug/L	100
18) Methyl acetate	2.585	43	266388	118.2346	ug/L #	77
19) Methyl Tert Butyl Ether	2.657	73	586859	51.4378	ug/L #	100
20) 1,1-Dichloroethane	3.106	63	386650	47.8850	ug/L	100
21) Acrylonitrile	3.184	53	55958	51.0491	ug/L	100
22) Vinyl Acetate	2.593	86	33146	45.8112	ug/L #	1
23) cis-1,2-Dichloroethene	3.720	96	246047	48.3515	ug/L	100
24) 2,2-Dichloropropane	3.853	77	277540	43.4231	ug/L	100
25) Cyclohexane	3.951	56	319980	46.5911	ug/L	92
26) Bromochloromethane	3.974	130	161439	49.2391	ug/L	100
27) Chloroform	4.108	83	411531	48.8839	ug/L	100
28) Carbon Tetrachloride	4.241	117	326387	49.0278	ug/L	100
30) 1,1,1-Trichloroethane	4.336	97	369604	49.9368	ug/L	100
31) 1,1-Dichloropropene	4.496	75	278322	47.8813	ug/L	100
32) 2-Butanone	4.533	43	64598	50.4183	ug/L #	77
33) Benzene	4.791	78	864999	47.5107	ug/L	100
35) 1,2-Dichloroethane	5.028	62	268041	47.2814	ug/L	100
36) Methylcyclohexane	5.416	83	337902	46.9597	ug/L	99
37) Trichloroethene	5.442	130	264383	48.3464	ug/L	100
38) Dibromomethane	5.859	93	136084	48.8021	ug/L	100
39) 1,2-Dichloropropane	5.964	63	232197	48.6326	ug/L	100
40) Bromodichloromethane	6.047	83	305406	47.9247	ug/L	100
41) 1,4-Dioxane	6.268	88	4924	207.0561	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	119939	55.3825	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	366582	51.0479	ug/L	100
44) 4-Methyl-2-Pentanone	7.229	58	61610	51.9353	ug/L	99
45) trans-1,3-Dichloropropene	7.240	75	294490	48.2382	ug/L	100
48) Toluene	6.855	91	962641	47.1919	ug/L	100
49) Tetrachloroethene	7.182	166	271333	46.6363	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	183455	46.4003	ug/L	100
51) Dibromochloromethane	7.507	129	255775	47.3947	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

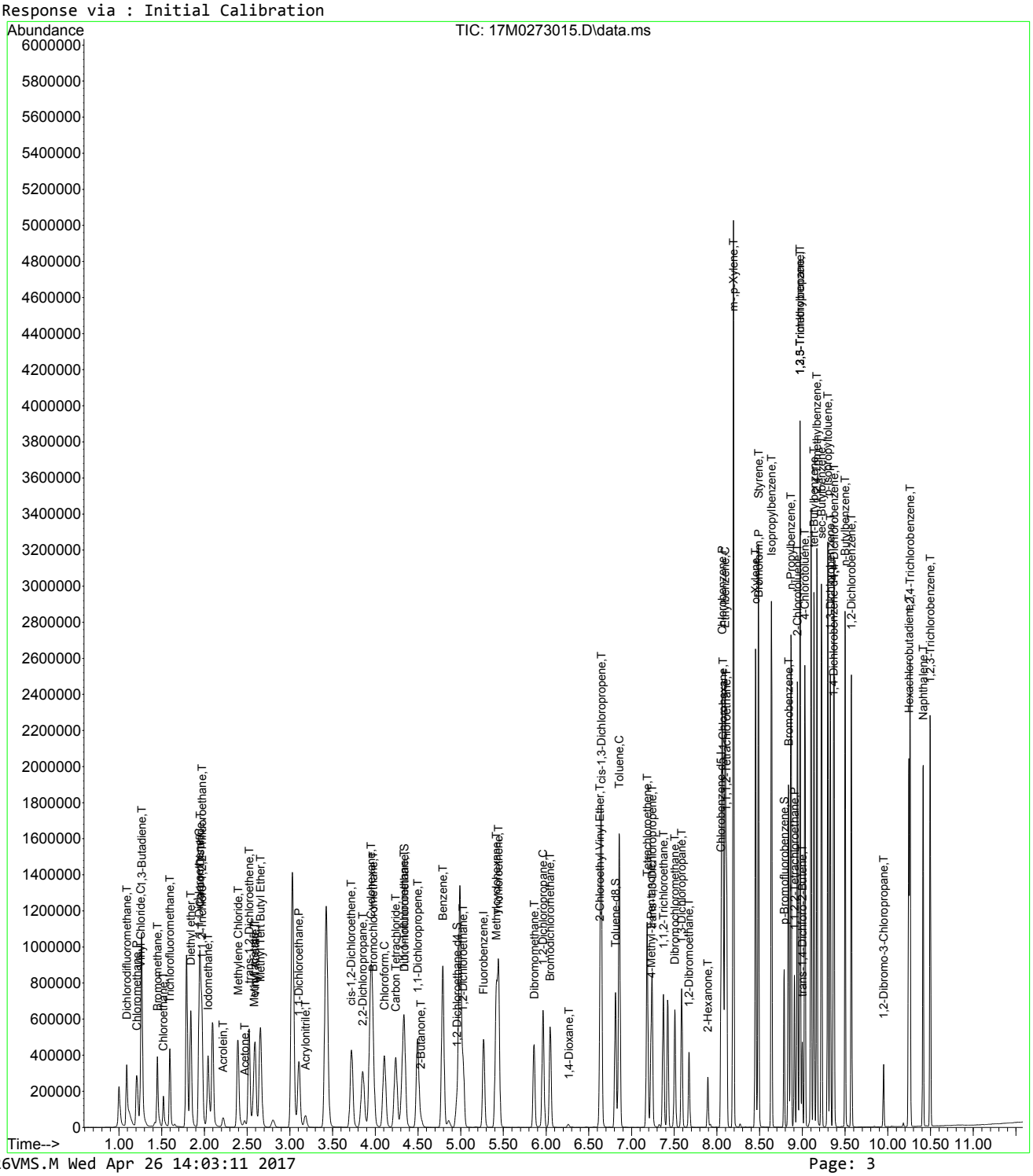
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	304079	48.3920	ug/L		100
53) 1,2-Dibromoethane	7.672	107	188269	46.4766	ug/L		99
54) 2-Hexanone	7.892	43	111735	53.8151	ug/L		99
55) Chlorobenzene	8.060	112	645652	47.1733	ug/L		100
56) 1-Chlorohexane	8.071	69	57184	51.7495	ug/L		92
57) Ethylbenzene	8.094	106	338763	47.5487	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.112	131	249632	46.8539	ug/L		99
59) m-,p-Xylene	8.193	106	824011	95.8330	ug/L		100
60) o-Xylene	8.451	106	407790	48.1343	ug/L		99
61) Styrene	8.485	104	676703	49.9206	ug/L		100
62) Bromoform	8.488	173	186092	49.0192	ug/L		100
63) Isopropylbenzene	8.639	105	1026933	46.8298	ug/L		100
65) 1,3,5-Trimethylbenzene	8.972	105	881437	45.8586	ug/L		100
67) Bromobenzene	8.839	156	305375	45.0262	ug/L		98
68) n-Propylbenzene	8.865	91	1132307	44.4723	ug/L		100
69) 1,1,2,2-Tetrachloroethane	8.905	83	209471	45.1656	ug/L		100
70) 2-Chlorotoluene	8.940	91	699415	44.5050	ug/L		99
71) 1,2,3-Trichloropropane	8.972	110	63151	46.0603	ug/L		96
72) trans-1,4-Dichloro-2-B...	8.998	53	41660	40.7607	ug/L	#	93
73) 1,2,4-Trimethylbenzene	9.169	105	890512	45.9463	ug/L		100
74) 4-Chlorotoluene	9.030	91	720079	45.8955	ug/L		100
75) tert-Butylbenzene	9.134	134	171753	44.7113	ug/L		99
76) sec-Butylbenzene	9.224	105	1059058	44.7251	ug/L		100
77) p-Isopropyltoluene	9.296	119	926654	45.9071	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	527115	44.5827	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	537479	45.0275	ug/L		100
80) n-Butylbenzene	9.499	91	781454	45.8686	ug/L		99
81) 1,2-Dichlorobenzene	9.574	146	530951	46.0775	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	39964	46.9704	ug/L		96
83) Hexachlorobutadiene	10.246	225	211253	43.4885	ug/L		100
84) 1,2,4-Trichlorobenzene	10.260	180	408655	47.7394	ug/L		100
85) Naphthalene	10.414	128	784767	47.0133	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	377306	45.3780	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed Apr 26 14:03:11 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	102	0.000
2	T	Dichlorodifluoromethane	50.000	67.049	-34.1#	124	0.000
3	P	Chloromethane	50.000	59.621	-19.2	123	0.000
4	C	Vinyl Chloride	50.000	60.950	-21.9#	122	0.000
5	T	1,3-Butadiene	50.000	83.307	-66.6#	165	0.000
6	T	Bromomethane	50.000	43.327	13.3	96	0.000
7	T	Chloroethane	50.000	41.741	16.5	96	0.000
8	T	Trichlorofluoromethane	50.000	31.991	36.0#	61	-0.018
9	T	Diethyl ether	100.000	93.115	6.9	92	0.000
10	C	1,1-Dichloroethene	50.000	43.134	13.7#	88	-0.017
11	T	Carbon Disulfide	50.000	43.838	12.3	87	-0.020
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	50.573	-1.1	100	-0.017
13	T	Iodomethane	50.000	67.838	-35.7#	144	-0.015
14	T	Acrolein	50.000	101.506	-103.0#	193	0.000
15	T	Methylene Chloride	50.000	44.390	11.2	95	0.000
16	T	Acetone	50.000	49.540	0.9	105	0.012
17	T	trans-1,2-Dichloroethene	50.000	46.999	6.0	96	0.000
18	T	Methyl acetate	50.000	118.235	-136.5#	207	0.018
19	T	Methyl Tert Butyl Ether	50.000	51.438	-2.9	102	0.000
20	P	1,1-Dichloroethane	50.000	47.885	4.2	97	0.000
21	T	Acrylonitrile	50.000	51.049	-2.1	100	0.000
22	T	Vinyl Acetate	50.000	45.811	8.4	88	-0.015
23	T	cis-1,2-Dichloroethene	50.000	48.351	3.3	98	0.000
24	T	2,2-Dichloropropane	50.000	43.423	13.2	88	0.000
25	T	Cyclohexane	50.000	46.591	6.8	91	-0.012
26	T	Bromochloromethane	50.000	49.239	1.5	97	0.000
27	C	Chloroform	50.000	48.884	2.2#	101	0.000
28	T	Carbon Tetrachloride	50.000	49.028	1.9	96	0.000
29	S	Dibromofluoromethane	25.000	24.946	0.2	99	0.000
30	T	1,1,1-Trichloroethane	50.000	49.937	0.1	101	0.000
31	T	1,1-Dichloropropene	50.000	47.881	4.2	95	0.000
32	T	2-Butanone	50.000	50.418	-0.8	102	0.000
33	T	Benzene	50.000	47.511	5.0	98	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.872	0.5	99	0.000
35	T	1,2-Dichloroethane	50.000	47.281	5.4	96	0.000
36	T	Methylcyclohexane	50.000	46.960	6.1	92	0.000
37	T	Trichloroethene	50.000	48.346	3.3	99	0.000
38	T	Dibromomethane	50.000	48.802	2.4	97	0.000
39	C	1,2-Dichloropropane	50.000	48.633	2.7#	97	0.000
40	T	Bromodichloromethane	50.000	47.925	4.2	96	0.000
41	T	1,4-Dioxane	200.000	207.056	-3.5	106	0.012
42	T	2-Chloroethyl Vinyl Ether	50.000	55.383	-10.8	112	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.048	-2.1	99	0.000
44	T	4-Methyl-2-Pentanone	50.000	51.935	-3.9	106	0.000
45	T	trans-1,3-Dichloropropene	50.000	48.238	3.5	93	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	103	0.000
47	S	Toluene-d8	25.000	25.451	-1.8	102	0.000
48	C	Toluene	50.000	47.192	5.6#	96	0.000
49	T	Tetrachloroethene	50.000	46.636	6.7	95	0.000
50	T	1,1,2-Trichloroethane	50.000	46.400	7.2	94	0.000
51	T	Dibromochloromethane	50.000	47.395	5.2	93	0.000
52	T	1,3-Dichloropropane	50.000	48.392	3.2	98	0.000
53	T	1,2-Dibromoethane	50.000	46.477	7.0	93	0.000
54	T	2-Hexanone	50.000	53.815	-7.6	109	0.000
55	P	Chlorobenzene	50.000	47.173	5.7	96	0.000
56	T	1-Chlorohexane	50.000	51.749	-3.5	101	0.000
57	C	Ethylbenzene	50.000	47.549	4.9#	96	0.000

Data File : D:\MassHunter\GCMS\1...a\042517\17M0273015.D Vial: 13
Acq On : 26 Apr 2017 01:35 Operator: FJB
Sample : WG611454-12 50ug/L ICV 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 26 14:03:10 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	46.854	6.3	95	0.000
59	T	m-,p-Xylene	100.000	95.833	4.2	95	0.000
60	T	o-Xylene	50.000	48.134	3.7	96	0.000
61	T	Styrene	50.000	49.921	0.2	97	0.000
62	P	Bromoform	50.000	49.019	2.0	92	0.000
63	T	Isopropylbenzene	50.000	46.830	6.3	94	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	103	0.000
65	T	1,3,5-Trimethylbenzene	50.000	45.859	8.3	94	0.000
66	S	p-Bromofluorobenzene	25.000	25.315	-1.3	103	0.000
67	T	Bromobenzene	50.000	45.026	9.9	95	0.000
68	T	n-Propylbenzene	50.000	44.472	11.1	91	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	45.166	9.7	88	0.000
70	T	2-Chlorotoluene	50.000	44.505	11.0	93	0.000
71	T	1,2,3-Trichloropropane	50.000	46.060	7.9	95	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	40.761	18.5	77	0.000
73	T	1,2,4-Trimethylbenzene	50.000	45.946	8.1	94	0.000
74	T	4-Chlorotoluene	50.000	45.895	8.2	95	0.000
75	T	tert-Butylbenzene	50.000	44.711	10.6	94	0.000
76	T	sec-Butylbenzene	50.000	44.725	10.5	91	0.000
77	T	p-Isopropyltoluene	50.000	45.907	8.2	91	0.000
78	T	1,3-Dichlorobenzene	50.000	44.583	10.8	92	0.000
79	T	1,4-Dichlorobenzene	50.000	45.027	9.9	94	0.000
80	T	n-Butylbenzene	50.000	45.869	8.3	89	0.000
81	T	1,2-Dichlorobenzene	50.000	46.077	7.8	95	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.970	6.1	90	0.000
83	T	Hexachlorobutadiene	50.000	43.488	13.0	86	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.739	4.5	92	0.000
85	T	Naphthalene	50.000	47.013	6.0	90	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.378	9.2	89	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:31:41 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

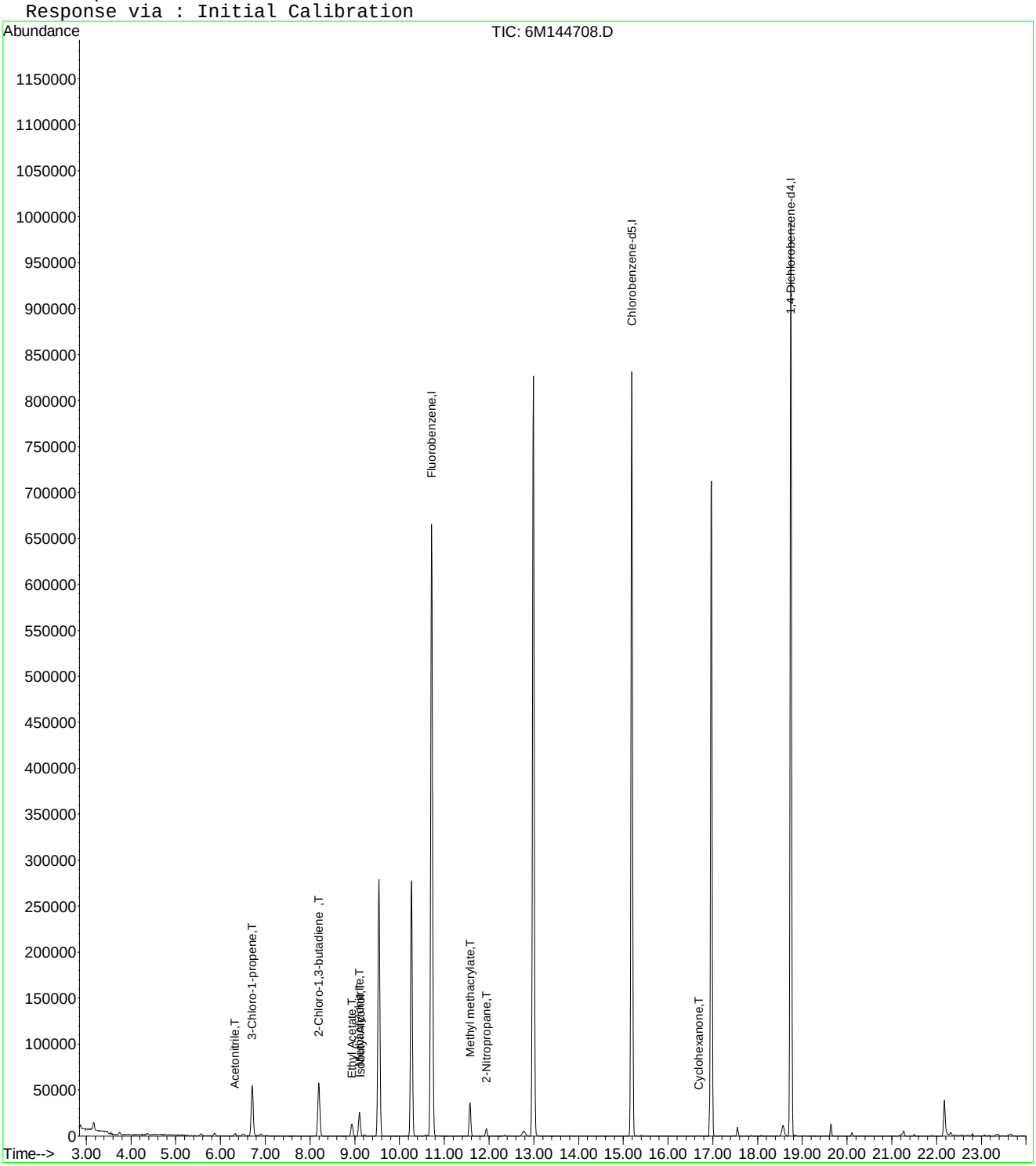
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	865370	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	638669	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	353919	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	3679	5.9467	ug/L		88
3) 3-Chloro-1-propene	6.70	41	52014	5.0135	ug/L		95
4) 2-Chloro-1,3-butadiene	8.19	53	60212	4.7023	ug/L		97
5) Ethyl Acetate	8.93	43	24851	4.4777	ug/L		98
6) Methacrylonitrile	9.10	67	13164	4.5054	ug/L		95
7) Isobutyl Alcohol	9.12	43	1340	7.4492	ug/L	#	85
9) Methyl methacrylate	11.57	41	25255	4.1589	ug/L		95
10) 2-Nitropropane	11.94	43	9310	3.7703	ug/L		96
13) Cyclohexanone	16.69	55	637	4.7569	ug/L	#	25

(#) = qualifier out of range (m) = manual integration
6M144708.D A9FOOWT.M Fri Jan 13 08:34:12 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:31 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144708.D Vial: 2
Acq On : 12 Jan 2017 9:02 Operator: TMB
Sample : WG598323-02 5ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	5.0000	5.9467	-18.9	100	0.00
3	T	3-Chloro-1-propene	5.0000	5.0135	-0.3	100	0.00
4	T	2-Chloro-1,3-butadiene	5.0000	4.7023	6.0	100	0.00
5	T	Ethyl Acetate	5.0000	4.4778	10.4	100	0.00
6	T	Methacrylonitrile	5.0000	4.5054	9.9	100	0.00
7	T	Isobutyl Alcohol	10.0000	7.4492	25.5	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	5.0000	4.1589	16.8	100	0.00
10	T	2-Nitropropane	-1.0000	3.7703	0.0	0	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	-1.0000	4.7569	0.0	0	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144708.D A9FOOWT.M Fri Jan 13 08:34:56 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

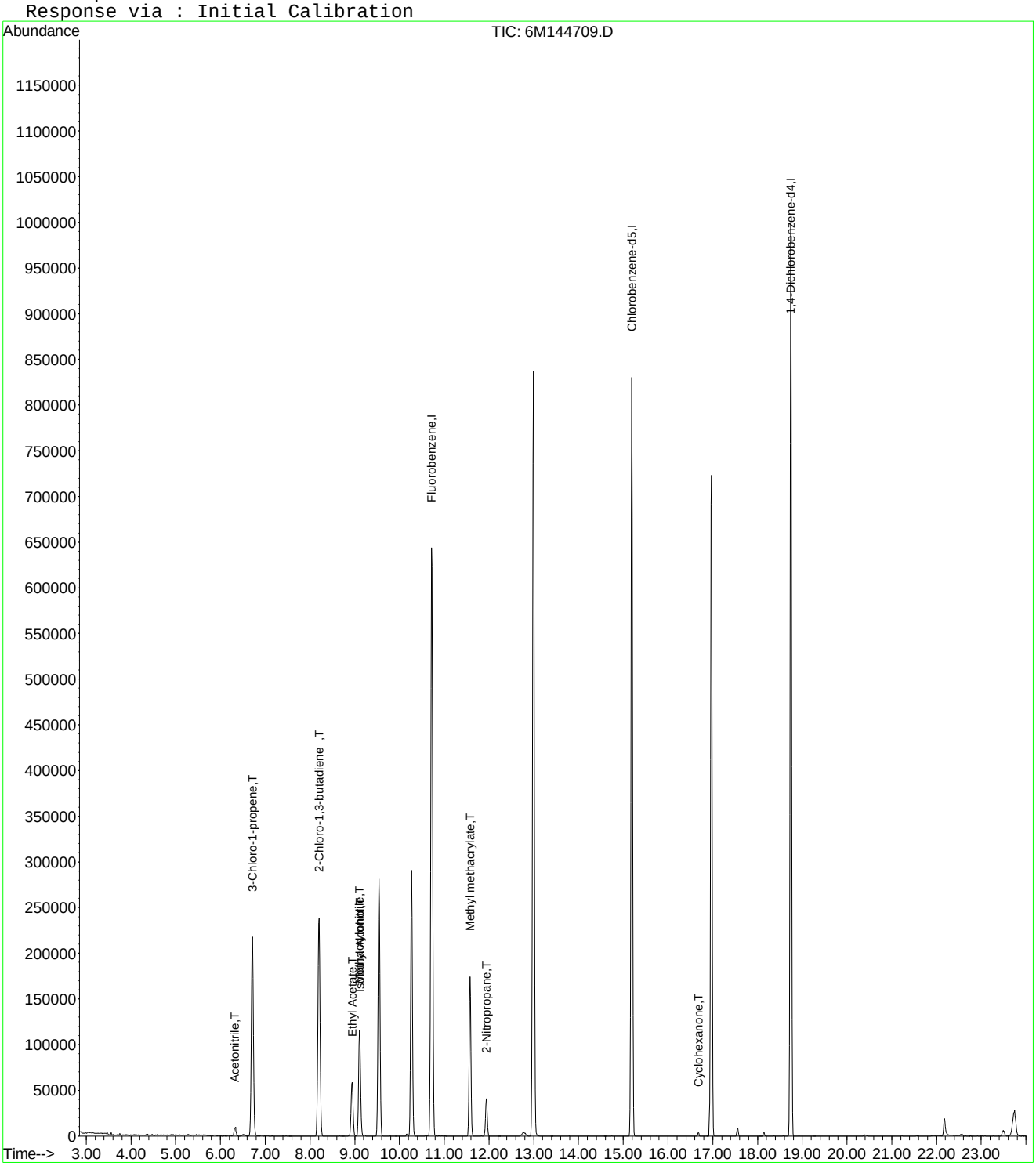
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	858255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	632728	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	350367	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	12918	21.0537	ug/L		97
3) 3-Chloro-1-propene	6.71	41	209633	20.3736	ug/L		94
4) 2-Chloro-1,3-butadiene	8.21	53	252913	19.9152	ug/L		96
5) Ethyl Acetate	8.94	43	112226	20.3889	ug/L		97
6) Methacrylonitrile	9.10	67	59955	20.6898	ug/L		93
7) Isobutyl Alcohol	9.11	43	8059	45.1723	ug/L	#	85
9) Methyl methacrylate	11.58	41	119041	19.7660	ug/L		97
10) 2-Nitropropane	11.94	43	43188	17.6351	ug/L		96
13) Cyclohexanone	16.68	55	2248	16.9576	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M144709.D A9FOOWT.M Fri Jan 13 08:34:15 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144709.D Vial: 3
Acq On : 12 Jan 2017 9:37 Operator: TMB
Sample : WG598323-03 20ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	20.0000	21.0537	-5.3	100	0.00
3	T	3-Chloro-1-propene	20.0000	20.3736	-1.9	100	0.01
4	T	2-Chloro-1,3-butadiene	20.0000	19.9152	0.4	100	0.01
5	T	Ethyl Acetate	20.0000	20.3890	-1.9	100	0.01
6	T	Methacrylonitrile	20.0000	20.6898	-3.4	100	0.00
7	T	Isobutyl Alcohol	40.0000	45.1723	-12.9	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	20.0000	19.7660	1.2	100	0.00
10	T	2-Nitropropane	20.0000	17.6351	11.8	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	20.0000	16.9576	15.2	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144709.D A9FOOWT.M Fri Jan 13 08:35:08 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:24 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

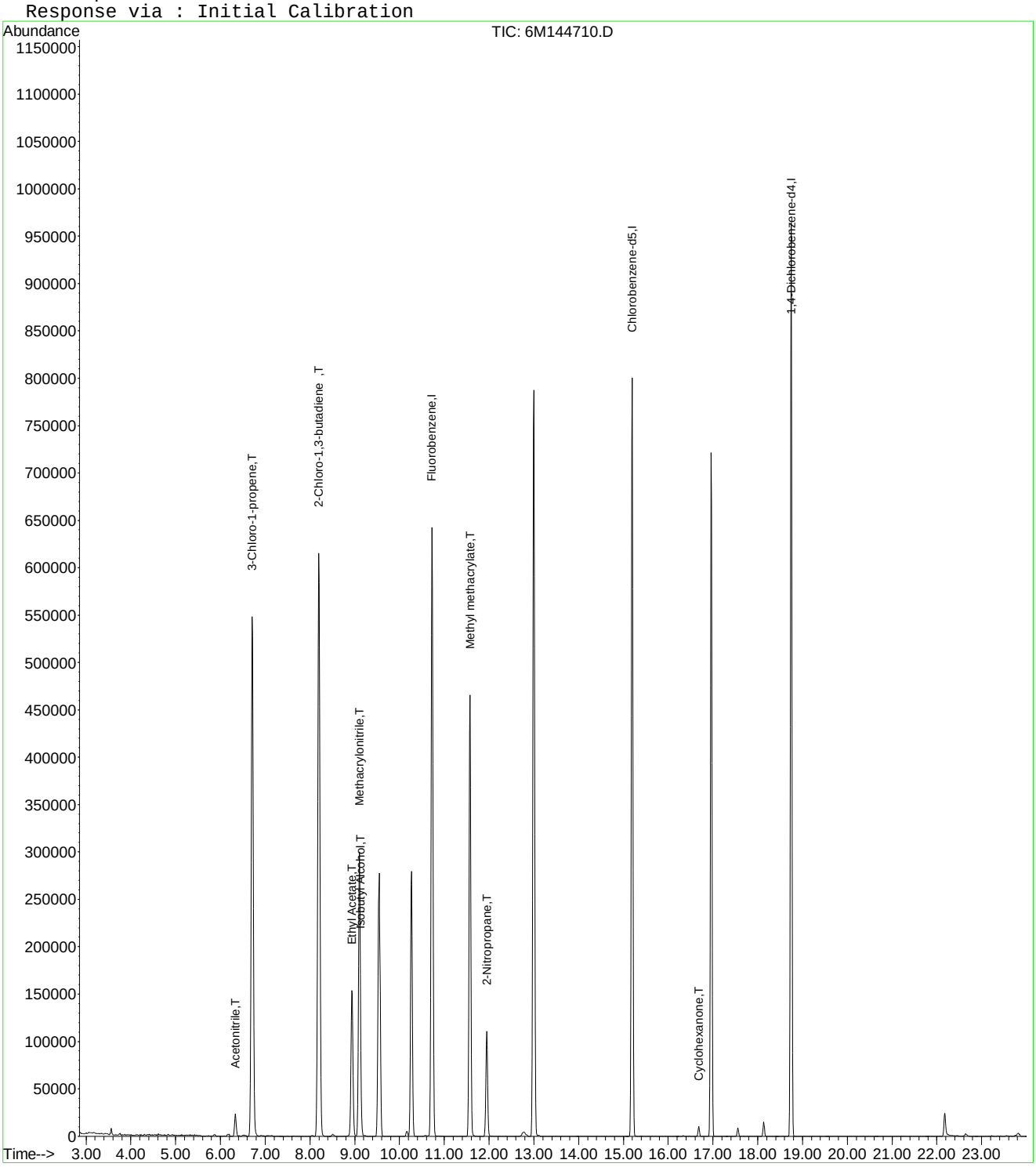
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	838990	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	618534	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	341738	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	29692	49.5030	ug/L		97
3) 3-Chloro-1-propene	6.71	41	515211	51.2215	ug/L		94
4) 2-Chloro-1,3-butadiene	8.20	53	637594	51.3592	ug/L		97
5) Ethyl Acetate	8.93	43	283978	52.7771	ug/L		97
6) Methacrylonitrile	9.11	67	149634	52.8227	ug/L		95
7) Isobutyl Alcohol	9.13	43	18800	107.7975	ug/L	#	86
9) Methyl methacrylate	11.58	41	310762	52.7848	ug/L		96
10) 2-Nitropropane	11.94	43	119051	49.7288	ug/L		97
13) Cyclohexanone	16.68	55	5849	45.2354	ug/L		91

(#) = qualifier out of range (m) = manual integration
6M144710.D A9FOOWT.M Fri Jan 13 08:34:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144710.D Vial: 4
Acq On : 12 Jan 2017 10:10 Operator: TMB
Sample : WG598323-04 50ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	50.0000	49.5030	1.0	100	0.00
3	T	3-Chloro-1-propene	50.0000	51.2215	-2.4	100	0.00
4	T	2-Chloro-1,3-butadiene	50.0000	51.3592	-2.7	100	0.00
5	T	Ethyl Acetate	50.0000	52.7771	-5.6	100	0.00
6	T	Methacrylonitrile	50.0000	52.8227	-5.6	100	0.00
7	T	Isobutyl Alcohol	100.0000	107.7975	-7.8	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	50.0000	52.7848	-5.6	100	0.00
10	T	2-Nitropropane	50.0000	49.7289	0.5	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	50.0000	45.2354	9.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:39 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

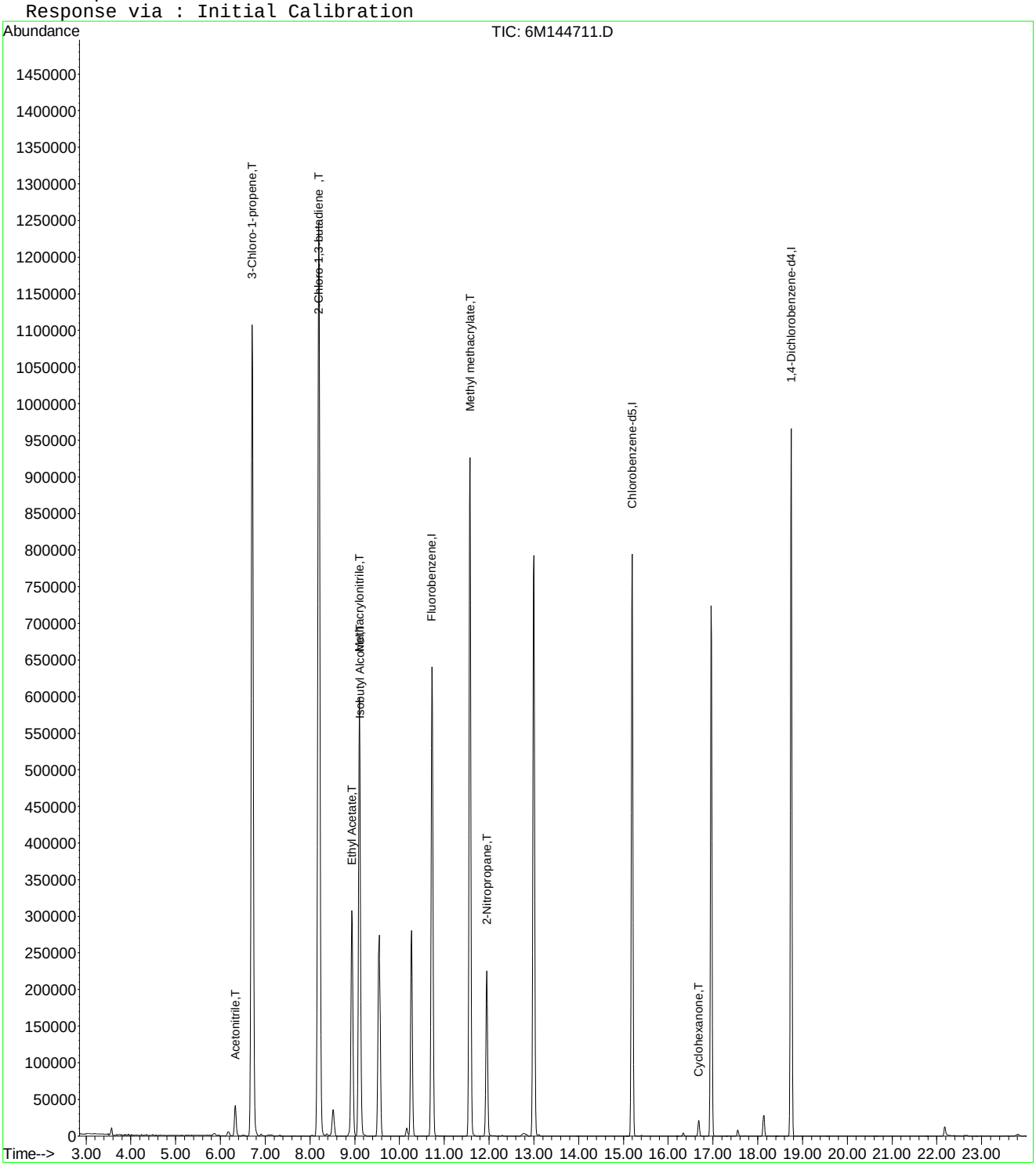
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 08:34:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 09:36:00 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

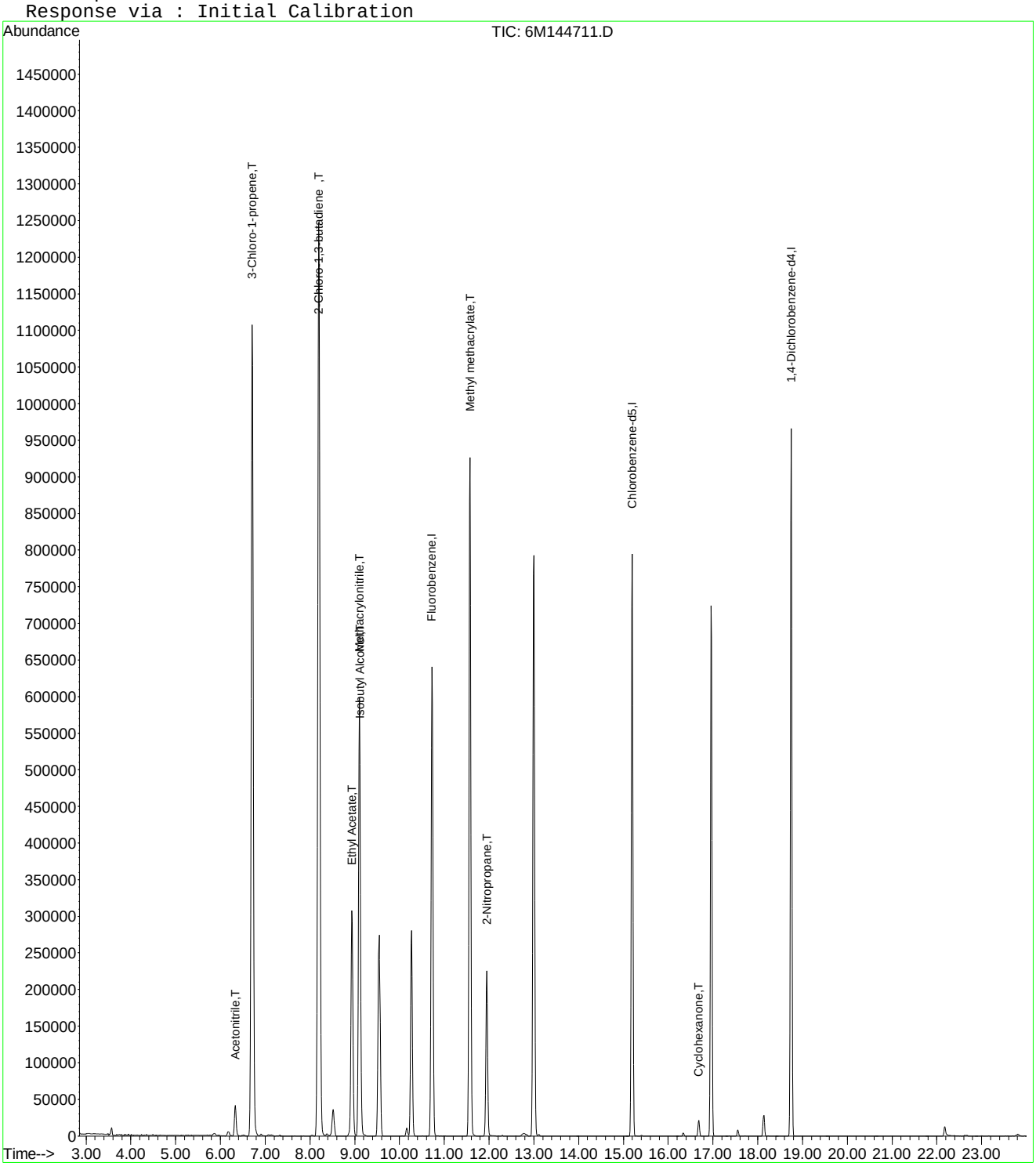
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	845255	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	616939	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346170	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	58942	97.5407	ug/L		93
3) 3-Chloro-1-propene	6.71	41	1040500	102.6782	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1300845	104.0084	ug/L		97
5) Ethyl Acetate	8.93	43	561745	103.6261	ug/L		97
6) Methacrylonitrile	9.11	67	297800	104.3479	ug/L		93
7) Isobutyl Alcohol	9.12	43	36945	210.2692	ug/L	#	73
9) Methyl methacrylate	11.58	41	625487	105.4552	ug/L		96
10) 2-Nitropropane	11.94	43	239604	99.3433	ug/L		96
13) Cyclohexanone	16.67	55	11266	86.0143	ug/L		74

(#) = qualifier out of range (m) = manual integration
6M144711.D A9FOOWT.M Fri Jan 13 09:36:01 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 9:35 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144711.D Vial: 5
Acq On : 12 Jan 2017 10:42 Operator: TMB
Sample : WG598323-05 100ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Thu Jan 12 13:53:06 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Acetonitrile	100.0000	97.5407	2.5	100	0.00
3	T	3-Chloro-1-propene	100.0000	102.6783	-2.7	100	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	104.0084	-4.0	100	0.00
5	T	Ethyl Acetate	100.0000	103.6261	-3.6	100	0.00
6	T	Methacrylonitrile	100.0000	104.3479	-4.3	100	0.00
7	T	Isobutyl Alcohol	200.0000	210.2692	-5.1	100	0.00
8	T	1-Butanol	-1.0000	0.0000	0.0	0	0.00
9	T	Methyl methacrylate	100.0000	105.4552	-5.5	100	0.00
10	T	2-Nitropropane	100.0000	99.3433	0.7	100	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
13	T	Cyclohexanone	100.0000	86.0143	14.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144711.D A9FOOWT.M Fri Jan 13 09:36:05 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:32:55 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

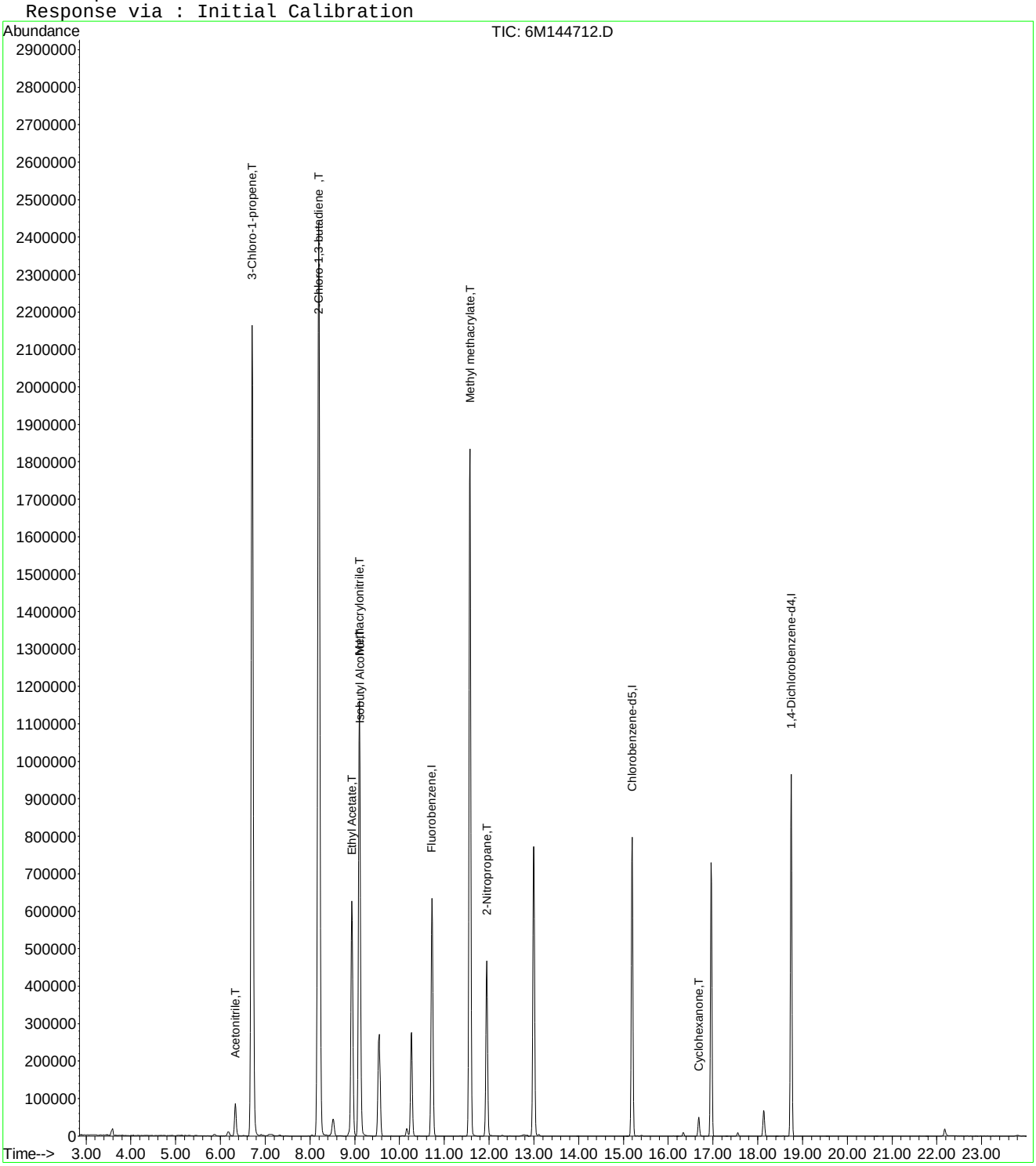
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	831063	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	617643	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.75	152	346241	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	117408	197.6116	ug/L		95
3) 3-Chloro-1-propene	6.71	41	2031969	203.9423	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	2539389	206.5027	ug/L		96
5) Ethyl Acetate	8.93	43	1134089	212.7800	ug/L		97
6) Methacrylonitrile	9.11	67	588766	209.8242	ug/L		92
7) Isobutyl Alcohol	9.12	43	69700	403.4656	ug/L	#	77
9) Methyl methacrylate	11.58	41	1251118	214.5369	ug/L		96
10) 2-Nitropropane	11.94	43	508471	214.4196	ug/L		98
13) Cyclohexanone	16.68	55	26625	203.2365	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144712.D A9FOOWT.M Fri Jan 13 08:34:25 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144712.D Vial: 6
Acq On : 12 Jan 2017 11:14 Operator: TMB
Sample : WG598323-06 200ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:32 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:06 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

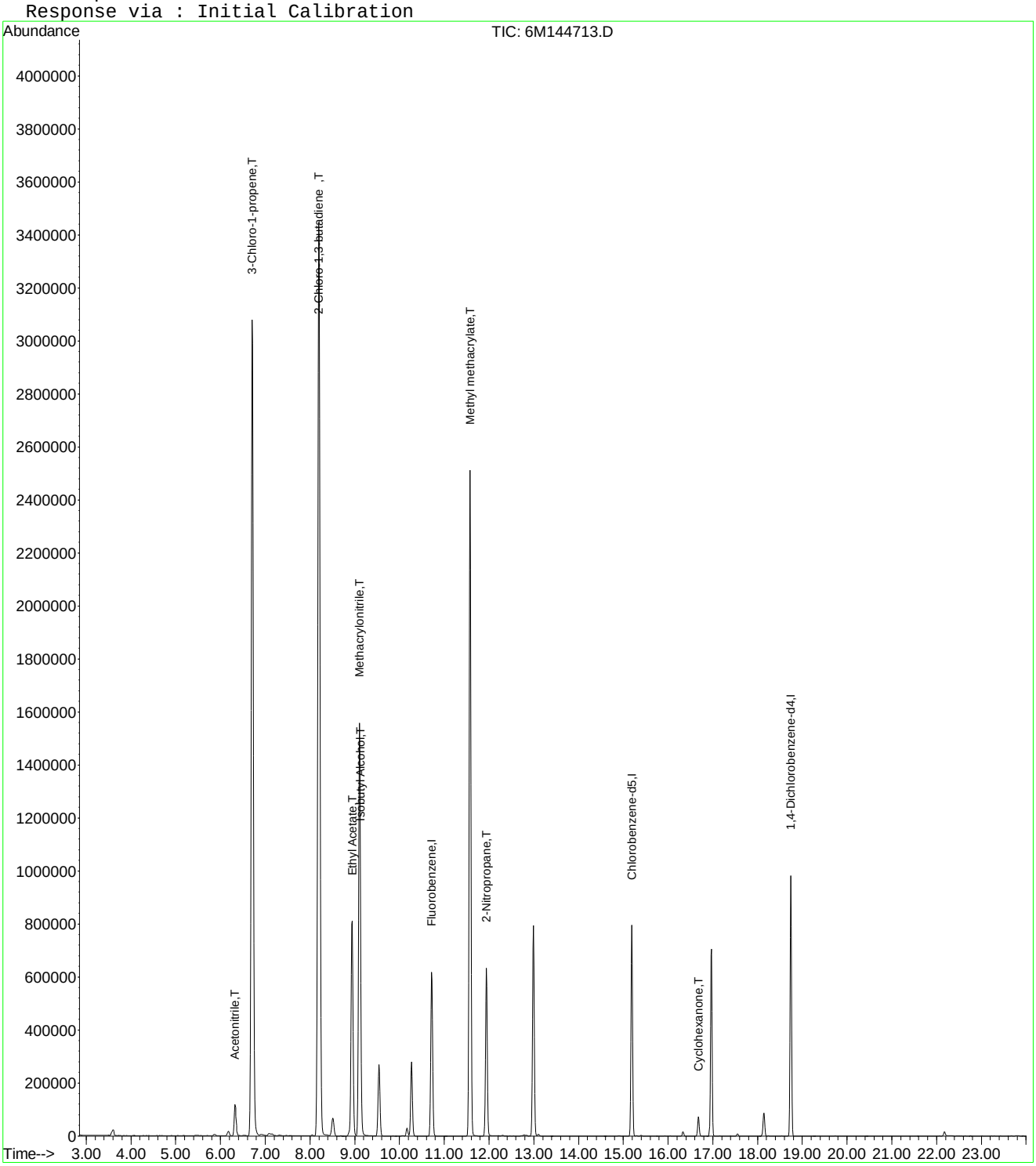
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	820441	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	609250	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	347545	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	159684	272.2468	ug/L		94
3) 3-Chloro-1-propene	6.70	41	2909215	295.7689	ug/L		93
4) 2-Chloro-1,3-butadiene	8.19	53	3653381	300.9387	ug/L		97
5) Ethyl Acetate	8.94	43	1494846	284.0971	ug/L		98
6) Methacrylonitrile	9.10	67	791160	285.6036	ug/L		92
7) Isobutyl Alcohol	9.12	43	88161	516.9360	ug/L	#	85
9) Methyl methacrylate	11.57	41	1679549	291.7313	ug/L		97
10) 2-Nitropropane	11.94	43	685276	292.7186	ug/L		98
13) Cyclohexanone	16.68	55	38739	294.5967	ug/L		82

(#) = qualifier out of range (m) = manual integration
6M144713.D A9FOOWT.M Fri Jan 13 08:34:28 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144713.D Vial: 7
Acq On : 12 Jan 2017 11:47 Operator: TMB
Sample : WG598323-07 300ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:16 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

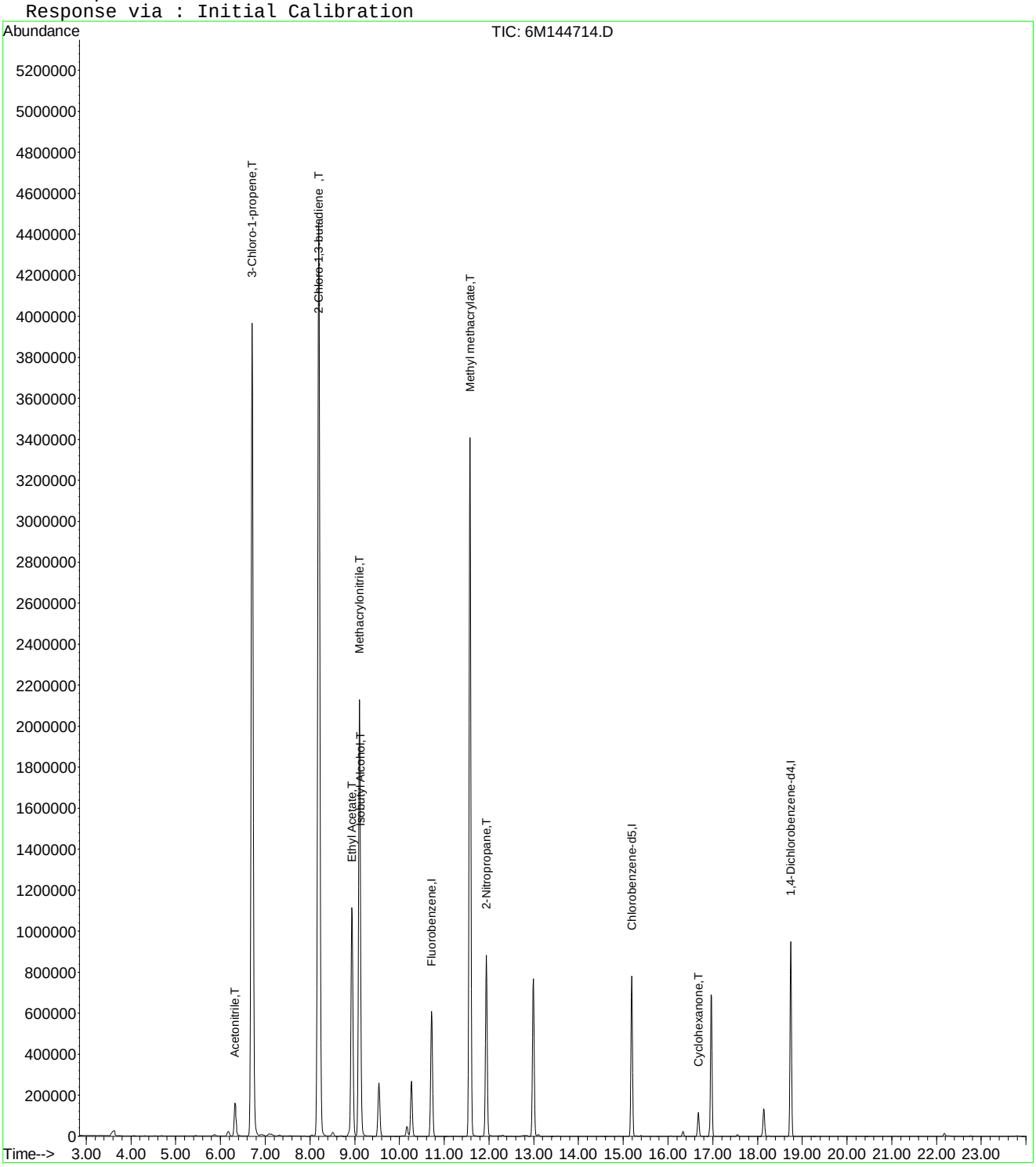
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	806744	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	606622	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	341512	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	218566	378.9620	ug/L		95
3) 3-Chloro-1-propene	6.70	41	3703442	382.9075	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	4659517	390.3333	ug/L		97
5) Ethyl Acetate	8.93	43	2048087	395.8497	ug/L		97
6) Methacrylonitrile	9.10	67	1071225	393.2708	ug/L		92
7) Isobutyl Alcohol	9.12	43	136765	815.5430	ug/L	#	75
9) Methyl methacrylate	11.58	41	2287798	404.1286	ug/L		96
10) 2-Nitropropane	11.94	43	962802	418.2475	ug/L		98
13) Cyclohexanone	16.68	55	59579	461.0815	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M144714.D A9FOOWT.M Fri Jan 13 08:34:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144714.D Vial: 8
Acq On : 12 Jan 2017 12:19 Operator: TMB
Sample : WG598323-08 400ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:28 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

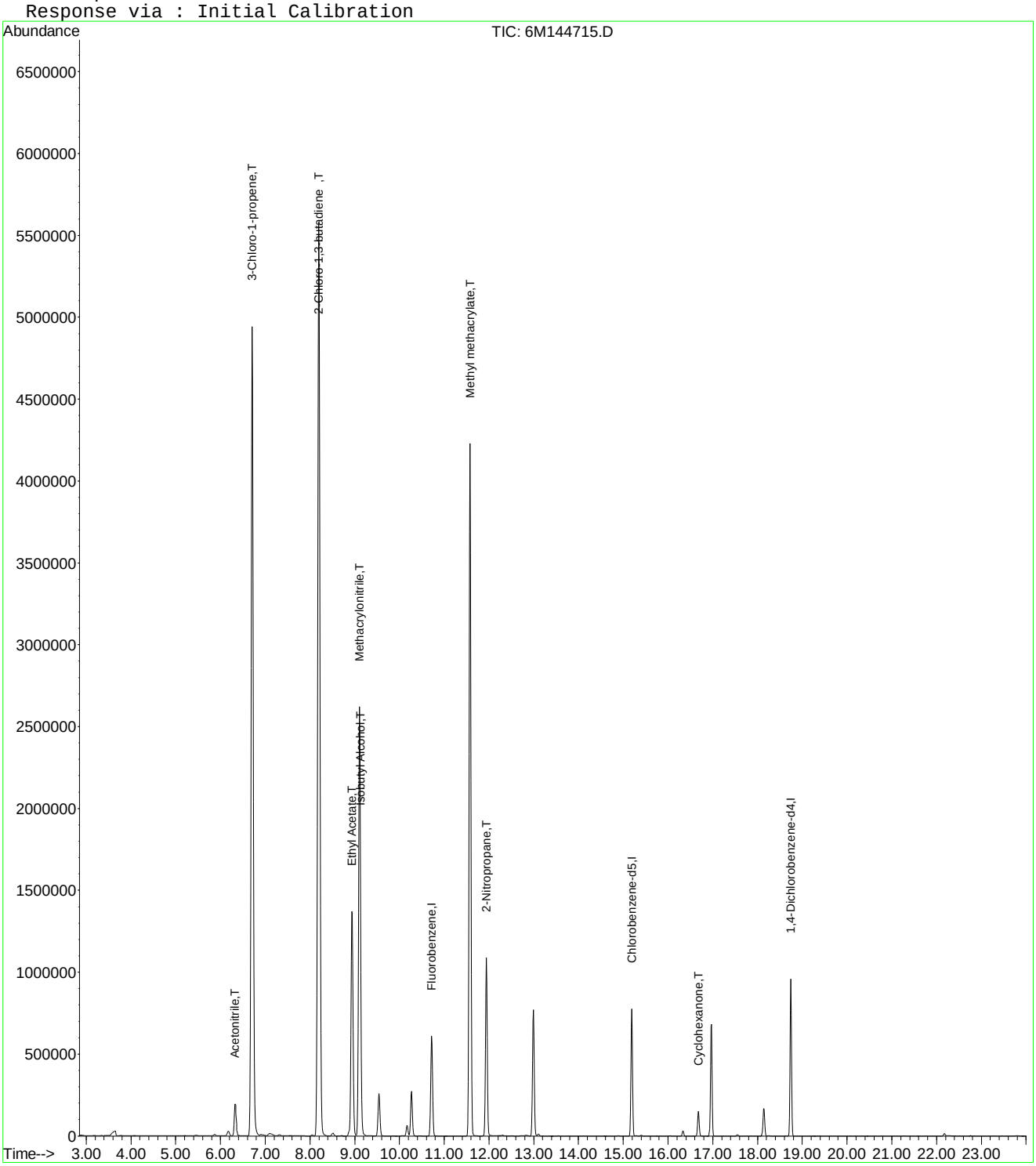
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	800443	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596335	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	335040	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	271689	474.7778	ug/L		94
3) 3-Chloro-1-propene	6.70	41	4627976	482.2639	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	5833383	492.5163	ug/L		97
5) Ethyl Acetate	8.93	43	2547971	496.3428	ug/L		97
6) Methacrylonitrile	9.10	67	1324536	490.0948	ug/L		92
7) Isobutyl Alcohol	9.12	43	184158	1106.7966	ug/L	#	75
9) Methyl methacrylate	11.58	41	2848365	507.1108	ug/L		97
10) 2-Nitropropane	11.94	43	1184018	518.3941	ug/L		98
13) Cyclohexanone	16.68	55	78367	618.1972	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144715.D A9FOOWT.M Fri Jan 13 08:34:33 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144715.D Vial: 9
Acq On : 12 Jan 2017 12:52 Operator: TMB
Sample : WG598323-09 500ug/L A9/FOO STD Inst : Hpms6
Misc : 1,1 STD79571 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 08:33:45 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

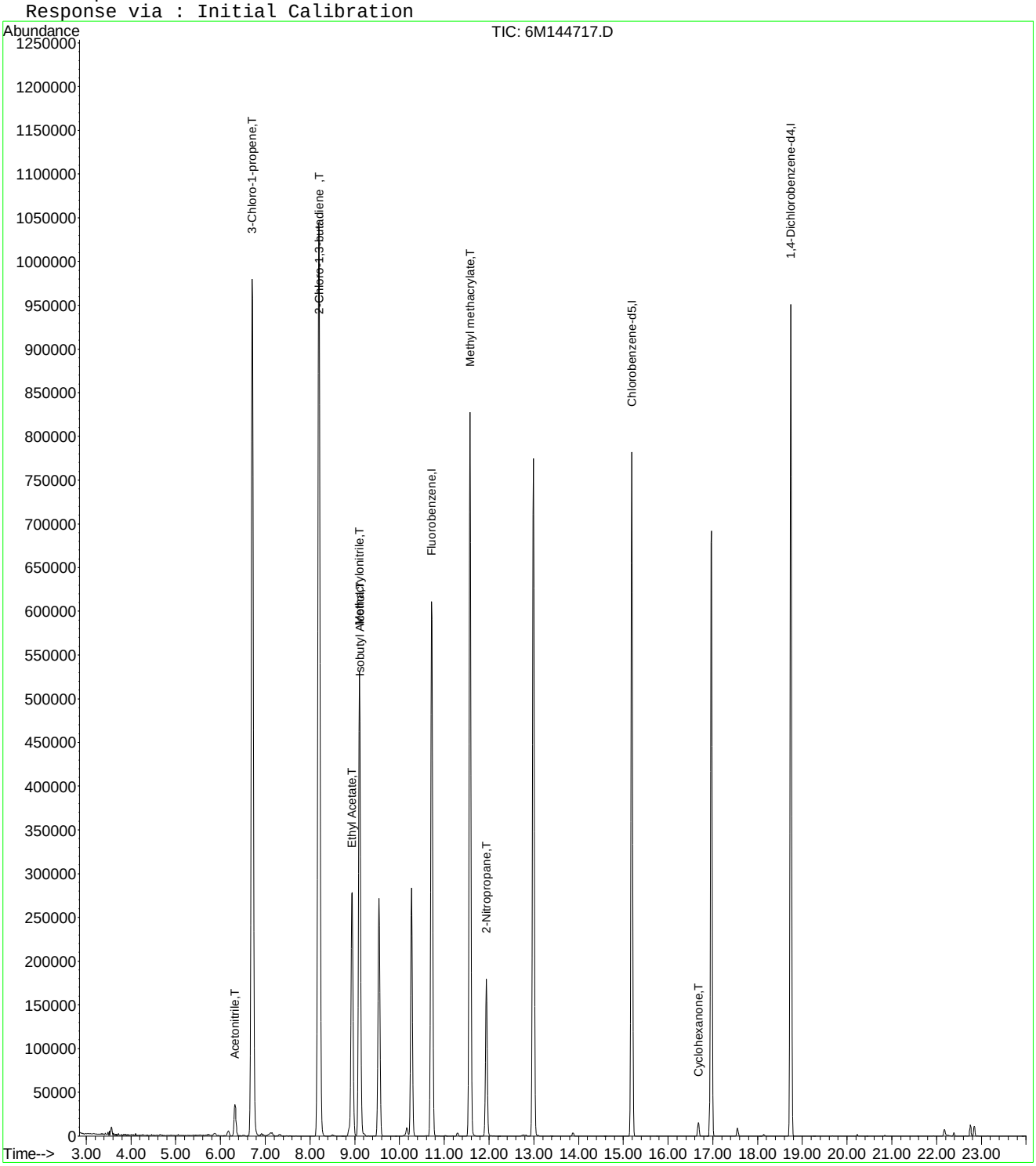
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.72	96	814360	25.00	ug/L		0.00
11) Chlorobenzene-d5	15.19	117	596096	25.00	ug/L		0.00
12) 1,4-Dichlorobenzene-d4	18.74	152	332903	25.00	ug/L		0.00
Target Compounds							Qvalue
2) Acetonitrile	6.33	41	50370	86.5176	ug/L		93
3) 3-Chloro-1-propene	6.70	41	925364	94.7808	ug/L		93
4) 2-Chloro-1,3-butadiene	8.20	53	1105734	91.7624	ug/L		97
5) Ethyl Acetate	8.93	43	511531	97.9429	ug/L		98
6) Methacrylonitrile	9.10	67	268526	97.6600	ug/L		92
7) Isobutyl Alcohol	9.11	43	30815	182.0344	ug/L	#	85
9) Methyl methacrylate	11.57	41	547496	95.8081	ug/L		96
10) 2-Nitropropane	11.94	43	194232	83.5866	ug/L		98
13) Cyclohexanone	16.68	55	8825	70.0628	ug/L		79

(#) = qualifier out of range (m) = manual integration
6M144717.D A9FOOWT.M Fri Jan 13 08:34:35 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Jan 13 8:33 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144717.D Vial: 11
Acq On : 12 Jan 2017 13:56 Operator: TMB
Sample : WG598323-10 100ug/L ALT SRC STD A9/FOO Inst : Hpms6
Misc : 1,1 STD79496 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Fri Jan 13 08:29:29 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	96	0.00
2	T	Acetonitrile	100.0000	86.5176	13.5	85	0.00
3	T	3-Chloro-1-propene	100.0000	94.7808	5.2	89	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	91.7624	8.2	85	0.00
5	T	Ethyl Acetate	100.0000	97.9429	2.1	91	0.00
6	T	Methacrylonitrile	100.0000	97.6600	2.3	90	0.00
7	T	Isobutyl Alcohol	200.0000	182.0344	9.0	83	-0.01
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.01
9	T	Methyl methacrylate	100.0000	95.8081	4.2	88	0.00
10	T	2-Nitropropane	100.0000	83.5866	16.4	81	0.00
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	97	0.00
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	96	0.00
13	T	Cyclohexanone	100.0000	70.0628	29.9	78	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M144717.D A9FOOWT.M Fri Jan 13 08:36:19 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	640408	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.13	117	444925	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226775	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#		
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L	
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#		
58) Toluene-d8	13.23	98	192	0.0085	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.04%#		
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L	
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	2815	0.2769	ug/L #	64
3) Chloromethane	4.03	50	6905	Below Cal		88
4) Vinyl Chloride	4.28	62	3256	0.2803	ug/L	87
5) 1,3-Butadiene	4.33	54	2170	Below Cal		73
6) Bromomethane	5.23	94	1315	0.2622	ug/L	87
7) Chloroethane	5.40	64	1308	0.2617	ug/L #	43
8) Trichlorofluoromethane	5.90	101	3191	0.2680	ug/L #	92
10) Isoprene	6.49	67	2782	0.2840	ug/L #	60
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1282	0.1902	ug/L #	63
13) Acetone	6.76	43	1442	1.0435	ug/L #	48
14) 1,1-Dichloroethene	7.02	61	2988	0.3060	ug/L	96
16) Dimethyl Sulfide	7.28	62	1851	0.2653	ug/L	61
17) Iodomethane	7.54	142	460	0.8640	ug/L #	32
19) Methylene Chloride	7.79	84	2606	0.3531	ug/L	59
20) Carbon Disulfide	7.86	76	6466	0.3077	ug/L	98
22) Methyl Tert Butyl Ether	8.01	73	5425	0.3352	ug/L #	49
23) trans-1,2-Dichloroethene	8.26	96	1807	0.2572	ug/L	86
24) n-Hexane	8.33	57	2597	0.3268	ug/L	76
27) 1,1-Dichloroethane	8.87	63	3092	0.2656	ug/L	88
31) 2,2-Dichloropropane	9.64	77	1800	0.2033	ug/L #	31
32) cis-1,2-Dichloroethene	9.72	96	2213	0.2865	ug/L	84
33) Chloroform	9.92	83	5055	0.3812	ug/L #	83
35) Bromochloromethane	10.14	130	638	0.1569	ug/L	91
38) 1,1,1-Trichloroethane	10.45	97	3279	0.3042	ug/L #	50
39) Cyclohexane	10.48	56	2906	0.2915	ug/L #	75
40) 1,1-Dichloropropene	10.65	75	2741	0.3008	ug/L	77
45) 1,2-Dichloroethane	10.96	62	2340	0.2837	ug/L #	52
46) Benzene	11.01	78	9356	0.3415	ug/L #	79
47) Trichloroethene	11.75	130	2089	0.2801	ug/L #	65
48) Methylcyclohexane	11.85	83	3351	0.3110	ug/L	80
49) 1,2-Dichloropropane	11.97	63	2128	0.3291	ug/L #	53
51) Bromodichloromethane	12.27	83	2341	0.2564	ug/L	98
52) Dibromomethane	12.35	93	743	0.1951	ug/L	91
55) cis-1,3-Dichloropropene	12.90	75	2460	0.2447	ug/L #	77
56) Dimethyl Disulfide	13.17	79	1308	0.2062	ug/L #	47
59) Toluene	13.33	91	9335	0.3356	ug/L	99
60) Ethyl Methacrylate	13.40	69	1912	0.2840	ug/L	78
62) trans-1,3-Dichloropropene	13.48	75	2047	0.2387	ug/L #	51
63) 1,1,2-Trichloroethane	13.72	97	1325	0.2528	ug/L	83
64) 2-Hexanone	13.64	43	717	0.2848	ug/L #	28

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:43 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

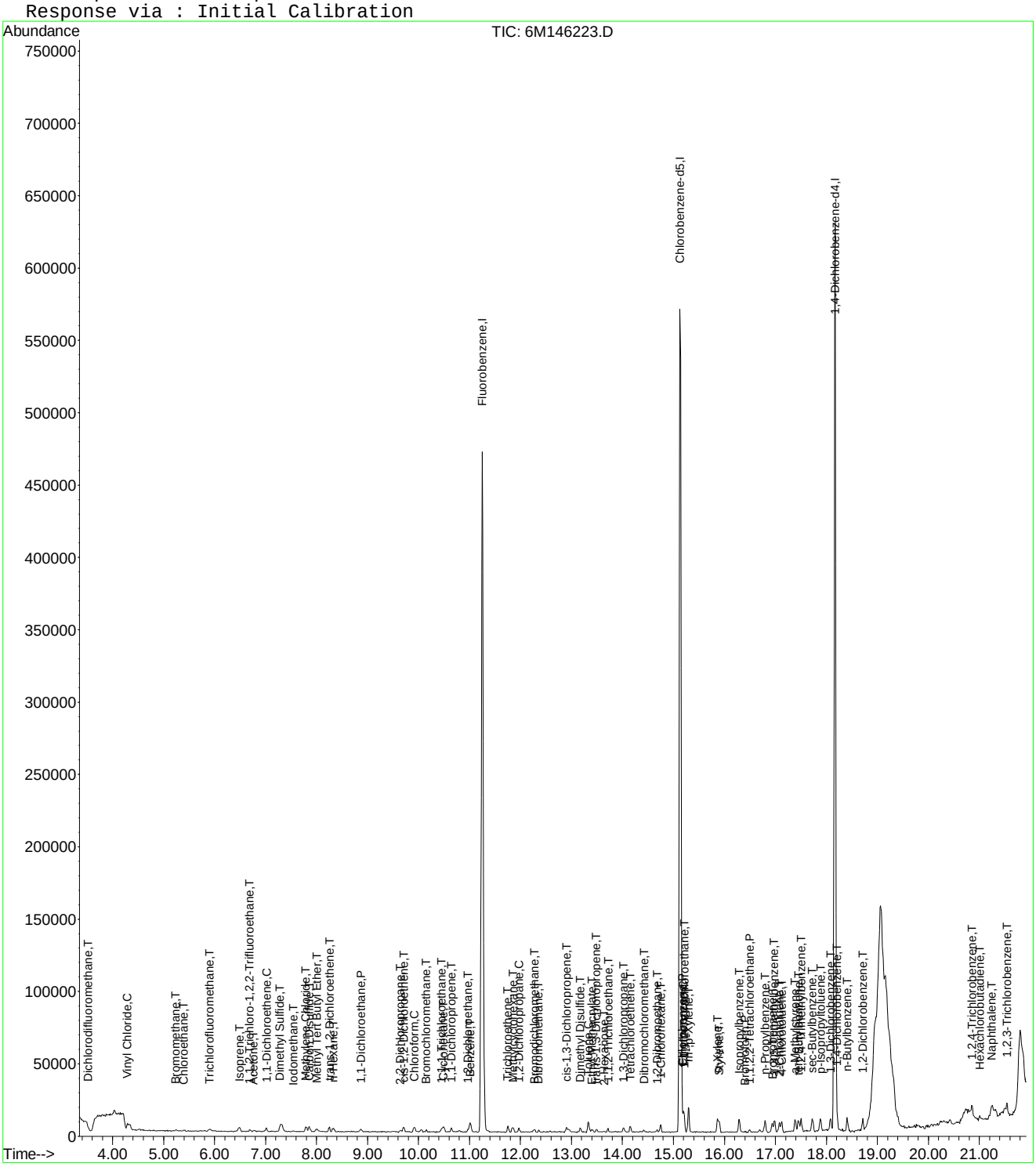
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
65)	1,3-Dichloropropane	14.03	76	2632	0.2991	ug/L		73
66)	Tetrachloroethene	14.16	166	2146	0.3184	ug/L		92
67)	Dibromochloromethane	14.42	129	1611	0.2486	ug/L		96
68)	1,2-Dibromoethane	14.68	107	1255	0.2493	ug/L		83
69)	1-Chlorohexane	14.75	91	2852	0.3175	ug/L		77
70)	Chlorobenzene	15.18	112	5819	0.3056	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	1834	0.2690	ug/L	#	36
72)	Ethylbenzene	15.20	106	3131	0.3038	ug/L		92
73)	m-,p-Xylene	15.29	106	7511	0.6097	ug/L		97
74)	o-Xylene	15.86	106	3485	0.2932	ug/L		89
75)	Styrene	15.89	104	6272	0.3143	ug/L		93
76)	Bromoform	16.40	173	562	0.1423	ug/L	#	35
77)	Isopropylbenzene	16.29	105	10184	0.3423	ug/L		93
79)	1,1,2,2-Tetrachloroethane	16.50	83	1871	0.3168	ug/L		77
83)	n-Propylbenzene	16.79	91	11774	0.3429	ug/L	#	93
84)	Bromobenzene	16.95	156	2344	0.3039	ug/L	#	63
85)	1,3,5-Trimethylbenzene	16.98	105	7944	0.3265	ug/L		95
86)	2-Chlorotoluene	17.08	91	7914	0.3462	ug/L		93
87)	4-Chlorotoluene	17.12	91	6658	0.3295	ug/L	#	94
88)	a-Methylstyrene	17.38	118	3803	0.2826	ug/L		94
89)	tert-Butylbenzene	17.46	134	1349	0.2646	ug/L		32
90)	1,2,4-Trimethylbenzene	17.51	105	8218	0.3289	ug/L		89
91)	sec-Butylbenzene	17.72	105	10323	0.3440	ug/L		91
92)	p-Isopropyltoluene	17.89	119	8482	0.3360	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	4887	0.3355	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5055	0.3432	ug/L	#	53
95)	n-Butylbenzene	18.41	91	8369	0.3631	ug/L		92
96)	1,2-Dichlorobenzene	18.71	146	4262	0.3121	ug/L		90
98)	1,2,4-Trichlorobenzene	20.86	180	3679	0.3683	ug/L		84
99)	Hexachlorobutadiene	21.01	225	1397	0.3661	ug/L		82
100)	Naphthalene	21.23	128	6133	0.3066	ug/L		94
101)	1,2,3-Trichlorobenzene	21.54	180	3447	0.3574	ug/L	#	77

(#) = qualifier out of range (m) = manual integration
6M146223.D 8260BWT.M Thu Apr 06 14:57:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.2769	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.2012	0.0	0	0.01
4	C	Vinyl Chloride	-1.0000	0.2803	0.0	0	0.01
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.02
6	T	Bromomethane	-1.0000	0.2622	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.2617	0.0	100	0.02
8	T	Trichlorofluoromethane	-1.0000	0.2680	0.0	100	0.00
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.2840	0.0	100	0.02
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.1902	0.0	100	0.00
13	T	Acetone	-1.0000	1.0435	0.0	100	-0.01
14	C	1,1-Dichloroethene	-1.0000	0.3060	0.0	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.2653	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8640	0.0	0	0.01
18	T	Methyl acetate	-1.0000	0.0537	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.3531	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.3077	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.3352	0.0	100	-0.01
23	T	trans-1,2-Dichloroethene	-1.0000	0.2572	0.0	100	0.00
24	T	n-Hexane	-1.0000	0.3268	0.0	100	0.00
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.0000	0.0	0	-8.83#
27	P	1,1-Dichloroethane	-1.0000	0.2656	0.0	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.0000	0.0	0	-9.41#
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	-1.0000	0.2033	0.0	100	0.00
32	T	cis-1,2-Dichloroethene	-1.0000	0.2865	0.0	100	0.00
33	C	Chloroform	0.3000	0.3812	-27.1#	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	-1.0000	0.1569	0.0	0	-0.01
36	T	Tetrahydrofuran	-1.0000	0.0000	0.0	0	-10.18#
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	-1.0000	0.3042	0.0	100	-0.01
39	T	Cyclohexane	-1.0000	0.2915	0.0	100	-0.01
40	T	1,1-Dichloropropene	-1.0000	0.3008	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.1105	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	-1.0000	0.2837	0.0	100	0.00
46	T	Benzene	-1.0000	0.3415	0.0	100	0.00
47	T	Trichloroethene	-1.0000	0.2801	0.0	100	0.00
48	T	Methylcyclohexane	-1.0000	0.3110	0.0	100	0.00
49	C	1,2-Dichloropropane	-1.0000	0.3291	0.0	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	-1.0000	0.2564	0.0	100	0.00
52	T	Dibromomethane	-1.0000	0.1951	0.0	100	-0.01
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.0000	0.0	0	-12.56#
54	T	4-Methyl-2-Pentanone	-1.0000	0.0000	0.0	0	-12.59#

(#) = Out of Range

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146223.D Vial: 3
Acq On : 5 Apr 2017 17:25 Operator: TMB
Sample : WG608938-02 0.3ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	-1.0000	0.2447	0.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2062	0.0	100	-0.01
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0085	0.0	100	0.00
59	C	Toluene	-1.0000	0.3356	0.0	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.2840	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.2387	0.0	100	-0.01
63	T	1,1,2-Trichloroethane	-1.0000	0.2528	0.0	100	0.00
64	T	2-Hexanone	-1.0000	0.2848	0.0	100	0.00
65	T	1,3-Dichloropropane	-1.0000	0.2991	0.0	100	0.00
66	T	Tetrachloroethene	-1.0000	0.3184	0.0	100	0.00
67	T	Dibromochloromethane	-1.0000	0.2486	0.0	100	0.00
68	T	1,2-Dibromoethane	-1.0000	0.2493	0.0	100	0.00
69	T	1-Chlorohexane	-1.0000	0.3175	0.0	100	0.00
70	P	Chlorobenzene	-1.0000	0.3056	0.0	100	0.00
71	T	1,1,1,2-Tetrachloroethane	-1.0000	0.2690	0.0	100	0.00
72	C	Ethylbenzene	-1.0000	0.3038	0.0	100	0.00
73	T	m-,p-Xylene	-1.0000	0.6097	0.0	100	0.00
74	T	o-Xylene	-1.0000	0.2932	0.0	100	0.00
75	T	Styrene	-1.0000	0.3143	0.0	100	-0.01
76	P	Bromoform	-1.0000	0.1423	0.0	100	0.00
77	T	Isopropylbenzene	-1.0000	0.3423	0.0	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	-1.0000	0.3168	0.0	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.0000	0.0	0	-16.69#
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	-1.0000	0.3429	0.0	100	0.00
84	T	Bromobenzene	0.3000	0.3039	-1.3	100	0.00
85	T	1,3,5-Trimethylbenzene	-1.0000	0.3265	0.0	100	-0.01
86	T	2-Chlorotoluene	-1.0000	0.3462	0.0	100	0.00
87	T	4-Chlorotoluene	-1.0000	0.3295	0.0	100	0.00
88	T	a-Methylstyrene	-1.0000	0.2826	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.2646	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.3289	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.3440	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.3360	0.0	100	0.00
93	T	1,3-Dichlorobenzene	-1.0000	0.3355	0.0	100	0.00
94	T	1,4-Dichlorobenzene	0.3000	0.3432	-14.4	100	0.00
95	T	n-Butylbenzene	-1.0000	0.3631	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.3000	0.3121	-4.0	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	-1.0000	0.3683	0.0	100	0.00
99	T	Hexachlorobutadiene	-1.0000	0.3661	0.0	100	0.00
100	T	Naphthalene	-1.0000	0.3066	0.0	100	-0.01
101	T	1,2,3-Trichlorobenzene	0.3000	0.3574	-19.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146223.D 8260BWT.M Thu Apr 06 15:02:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	626609	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	442971	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	226791	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	0.00	111	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 118		Recovery =	0.00%#			
43) 1,2-Dichloroethane-d4	0.00	65	0	0.0000	ug/L		
Spiked Amount 25.000	Range 80 - 120		Recovery =	0.00%#			
58) Toluene-d8	0.00	98	0	0.0000	ug/L		
Spiked Amount 25.000	Range 88 - 110		Recovery =	0.00%#			
80) p-Bromofluorobenzene	0.00	95	0	0.0000	ug/L		
Spiked Amount 25.000	Range 86 - 115		Recovery =	0.00%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	3419	0.3437	ug/L	#	64
3) Chloromethane	4.04	50	7947	Below Cal			96
4) Vinyl Chloride	4.29	62	5656	0.4976	ug/L		98
5) 1,3-Butadiene	4.34	54	2862	Below Cal		#	60
6) Bromomethane	5.23	94	1597	0.3254	ug/L		99
7) Chloroethane	5.40	64	1845	0.3772	ug/L	#	43
8) Trichlorofluoromethane	5.91	101	4335	0.3721	ug/L	#	93
10) Isoprene	6.48	67	3687	0.3847	ug/L		68
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	2169	0.3289	ug/L		74
13) Acetone	6.77	43	782	0.5783	ug/L	#	48
14) 1,1-Dichloroethene	7.01	61	3813	0.3991	ug/L		83
16) Dimethyl Sulfide	7.28	62	2499	0.3661	ug/L	#	56
17) Iodomethane	7.55	142	506	0.8739	ug/L	#	32
18) Methyl acetate	7.54	43	953	0.2810	ug/L	#	66
19) Methylene Chloride	7.79	84	3151	0.4363	ug/L		69
20) Carbon Disulfide	7.86	76	8568	0.4167	ug/L		96
22) Methyl Tert Butyl Ether	8.00	73	6676	0.4215	ug/L	#	68
23) trans-1,2-Dichloroethene	8.25	96	2699	0.3926	ug/L		77
24) n-Hexane	8.32	57	3415	0.4392	ug/L		70
26) Vinyl Acetate	8.83	43	1421	0.2892	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	4613	0.4050	ug/L	#	77
29) 2-Butanone	9.41	43	260	0.1526	ug/L	#	57
31) 2,2-Dichloropropane	9.64	77	3882	0.4480	ug/L		72
32) cis-1,2-Dichloroethene	9.72	96	3041	0.4023	ug/L		76
33) Chloroform	9.92	83	5917	0.4561	ug/L	#	88
35) Bromochloromethane	10.15	130	1328	0.3338	ug/L		91
36) Tetrahydrofuran	10.17	42	200	0.1782	ug/L	#	41
38) 1,1,1-Trichloroethane	10.45	97	4059	0.3848	ug/L		83
39) Cyclohexane	10.49	56	3820	0.3916	ug/L		75
40) 1,1-Dichloropropene	10.64	75	3280	0.3679	ug/L		86
42) Carbon Tetrachloride	10.80	117	2236	0.2688	ug/L	#	79
45) 1,2-Dichloroethane	10.97	62	3278	0.4061	ug/L	#	68
46) Benzene	11.01	78	12127	0.4523	ug/L		84
47) Trichloroethene	11.76	130	2885	0.3953	ug/L		71
48) Methylcyclohexane	11.85	83	4224	0.4006	ug/L		83
49) 1,2-Dichloropropane	11.97	63	2324	0.3673	ug/L		84
51) Bromodichloromethane	12.27	83	3345	0.3745	ug/L		82
52) Dibromomethane	12.36	93	1227	0.3293	ug/L		99
53) 2-Chloroethyl Vinyl Ether	12.55	63	709	0.2857	ug/L	#	41
55) cis-1,3-Dichloropropene	12.90	75	3464	0.3522	ug/L	#	77

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:49 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:47 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

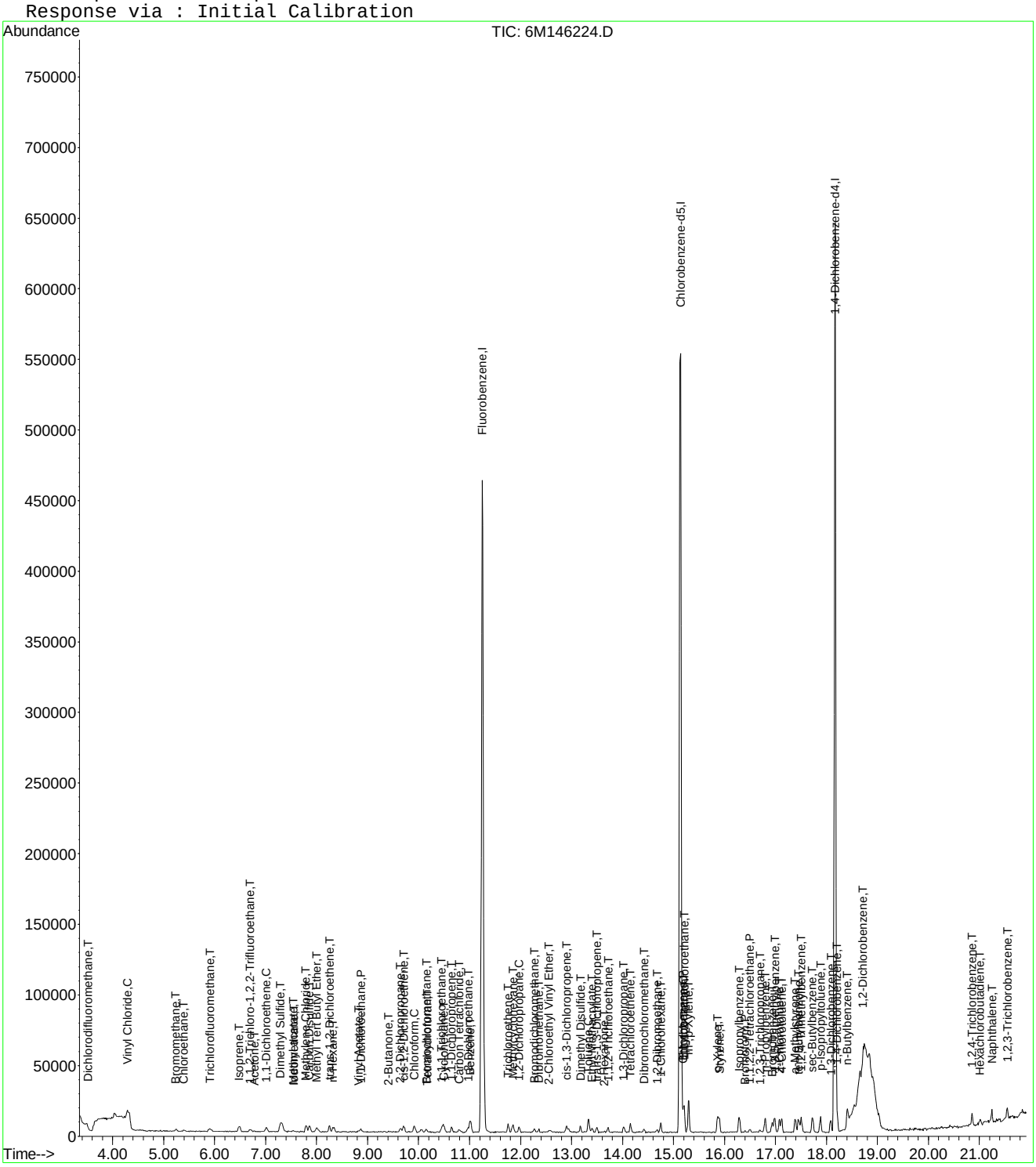
	Compound	R.T.	QIon	Response	Conc Unit		Qvalue
56)	Dimethyl Disulfide	13.18	79	1794	0.2891 ug/L	#	47
59)	Toluene	13.33	91	11706	0.4227 ug/L		96
60)	Ethyl Methacrylate	13.40	69	2704	0.4035 ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	3001	0.3514 ug/L		88
63)	1,1,2-Trichloroethane	13.72	97	1935	0.3708 ug/L		97
64)	2-Hexanone	13.64	43	838	0.3344 ug/L	#	28
65)	1,3-Dichloropropane	14.02	76	3430	0.3915 ug/L		80
66)	Tetrachloroethene	14.16	166	2515	0.3748 ug/L		90
67)	Dibromochloromethane	14.42	129	2281	0.3536 ug/L		87
68)	1,2-Dibromoethane	14.68	107	2013	0.4017 ug/L		91
69)	1-Chlorohexane	14.75	91	3553	0.3973 ug/L		75
70)	Chlorobenzene	15.19	112	7763	0.4095 ug/L		93
71)	1,1,1,2-Tetrachloroethane	15.21	131	2463	0.3628 ug/L	#	36
72)	Ethylbenzene	15.20	106	4250	0.4142 ug/L		92
73)	m-,p-Xylene	15.29	106	10084	0.8222 ug/L		94
74)	o-Xylene	15.86	106	4446	0.3756 ug/L		95
75)	Styrene	15.90	104	7608	0.3829 ug/L		91
76)	Bromoform	16.40	173	1201	0.3055 ug/L	#	50
77)	Isopropylbenzene	16.29	105	12585	0.4249 ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	2532	0.4287 ug/L		74
81)	1,2,3-Trichloropropane	16.70	110	576	0.3302 ug/L	#	1
83)	n-Propylbenzene	16.80	91	14774	0.4303 ug/L	#	96
84)	Bromobenzene	16.93	156	3090	0.4006 ug/L		70
85)	1,3,5-Trimethylbenzene	16.99	105	10064	0.4136 ug/L		97
86)	2-Chlorotoluene	17.08	91	9917	0.4337 ug/L		94
87)	4-Chlorotoluene	17.12	91	8689	0.4300 ug/L		97
88)	a-Methylstyrene	17.38	118	4762	0.3539 ug/L		99
89)	tert-Butylbenzene	17.46	134	1902	0.3730 ug/L		48
90)	1,2,4-Trimethylbenzene	17.51	105	10085	0.4035 ug/L		86
91)	sec-Butylbenzene	17.72	105	13346	0.4447 ug/L		93
92)	p-Isopropyltoluene	17.88	119	10657	0.4222 ug/L		97
93)	1,3-Dichlorobenzene	18.09	146	6333	0.4347 ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	5959	0.4045 ug/L		98
95)	n-Butylbenzene	18.41	91	10090	0.4377 ug/L		88
96)	1,2-Dichlorobenzene	18.71	146	5766	0.4223 ug/L		99
98)	1,2,4-Trichlorobenzene	20.86	180	4424	0.4428 ug/L		85
99)	Hexachlorobutadiene	21.01	225	1728	0.4528 ug/L		78
100)	Naphthalene	21.24	128	8285	0.4141 ug/L		94
101)	1,2,3-Trichlorobenzene	21.55	180	4343	0.4503 ug/L		83

(#) = qualifier out of range (m) = manual integration
6M146224.D 8260BWT.M Thu Apr 06 14:57:50 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	-1.0000	0.3437	0.0	100	0.00
3	P	Chloromethane	-1.0000	-0.0968	0.0	0	0.02
4	C	Vinyl Chloride	0.4000	0.4976	-24.4#	100	0.02
5	T	1,3-Butadiene	-1.0000	-1.0000	0.0	0	0.03
6	T	Bromomethane	-1.0000	0.3254	0.0	0	0.02
7	T	Chloroethane	-1.0000	0.3772	0.0	100	0.02
8	T	Trichlorofluoromethane	0.4000	0.3721	7.0	100	0.02
9	T	Diethyl ether	-1.0000	0.0000	0.0	0	-6.44#
10	T	Isoprene	-1.0000	0.3847	0.0	100	0.00
11	T	Acrolein	-1.0000	0.0000	0.0	0	-6.67#
12	T	1,1,2-Trichloro-1,2,2-Trifl	-1.0000	0.3289	0.0	100	0.00
13	T	Acetone	-1.0000	0.5783	0.0	100	0.00
14	C	1,1-Dichloroethene	0.4000	0.3991	0.2	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	0.0000	0.0	0	-7.12#
16	T	Dimethyl Sulfide	-1.0000	0.3661	0.0	100	0.00
17	T	Iodomethane	-1.0000	0.8739	0.0	0	0.02
18	T	Methyl acetate	-1.0000	0.2810	0.0	100	0.00
19	T	Methylene Chloride	-1.0000	0.4363	0.0	100	0.00
20	T	Carbon Disulfide	-1.0000	0.4167	0.0	100	0.00
21	T	Acrylonitrile	-1.0000	0.0000	0.0	0	-7.97#
22	T	Methyl Tert Butyl Ether	-1.0000	0.4215	0.0	100	-0.02
23	T	trans-1,2-Dichloroethene	0.4000	0.3926	1.9	100	0.00
24	T	n-Hexane	-1.0000	0.4392	0.0	100	-0.01
25	T	Diisopropyl ether	-1.0000	0.0000	0.0	0	-8.66#
26	T	Vinyl Acetate	-1.0000	0.2892	0.0	100	0.00
27	P	1,1-Dichloroethane	0.4000	0.4051	-1.3	100	0.00
28	T	Ethyl-Tert-Butyl ether	-1.0000	0.0000	0.0	0	-9.24#
29	T	2-Butanone	-1.0000	0.1526	0.0	100	0.00
30	T	Propionitrile	-1.0000	0.0000	0.0	0	-9.52#
31	T	2,2-Dichloropropane	0.4000	0.4480	-12.0	100	0.00
32	T	cis-1,2-Dichloroethene	0.4000	0.4023	-0.6	100	0.00
33	C	Chloroform	0.4000	0.4561	-14.0	100	0.00
34		1-Bromopropane	-1.0000	0.0000	0.0	0	-10.05#
35	T	Bromochloromethane	0.4000	0.3338	16.6	100	0.00
36	T	Tetrahydrofuran	-1.0000	0.1782	0.0	100	0.00
37	S	Dibromofluoromethane	-1.0000	0.0000	0.0	0	-10.21#
38	T	1,1,1-Trichloroethane	0.4000	0.3848	3.8	100	-0.01
39	T	Cyclohexane	-1.0000	0.3916	0.0	100	0.00
40	T	1,1-Dichloropropene	-1.0000	0.3679	0.0	100	0.00
41	T	Tert-Amyl-Methyl ether	-1.0000	0.0000	0.0	0	-10.75#
42	T	Carbon Tetrachloride	-1.0000	0.2688	0.0	0	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.0000	0.0	0	-10.84#
44		Heptane	-1.0000	0.0000	0.0	0	-10.75#
45	T	1,2-Dichloroethane	0.4000	0.4061	-1.5	100	0.00
46	T	Benzene	0.4000	0.4523	-13.1	100	0.00
47	T	Trichloroethene	0.4000	0.3953	1.2	100	0.00
48	T	Methylcyclohexane	-1.0000	0.4006	0.0	100	0.00
49	C	1,2-Dichloropropane	0.4000	0.3673	8.2	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	0.4000	0.3745	6.4	100	0.00
52	T	Dibromomethane	0.4000	0.3293	17.7	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.2857	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.1142	0.0	100	0.00

(#) = Out of Range
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146224.D Vial: 4
Acq On : 5 Apr 2017 17:57 Operator: TMB
Sample : WG608938-03 0.4ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.4000	0.3522	12.0	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.2891	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	-1.0000	0.0000	0.0	0	-13.23#
59	C	Toluene	0.4000	0.4227	-5.7	100	0.00
60	T	Ethyl Methacrylate	-1.0000	0.4035	0.0	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	0	-13.24#
62	T	trans-1,3-Dichloropropene	-1.0000	0.3514	0.0	100	0.00
63	T	1,1,2-Trichloroethane	0.4000	0.3708	7.3	100	0.00
64	T	2-Hexanone	-1.0000	0.3344	0.0	100	0.00
65	T	1,3-Dichloropropane	0.4000	0.3915	2.1	100	0.00
66	T	Tetrachloroethene	0.4000	0.3748	6.3	100	0.00
67	T	Dibromochloromethane	0.4000	0.3535	11.6	100	0.00
68	T	1,2-Dibromoethane	0.4000	0.4017	-0.4	100	0.00
69	T	1-Chlorohexane	0.4000	0.3973	0.7	100	0.00
70	P	Chlorobenzene	0.4000	0.4096	-2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	0.4000	0.3628	9.3	100	0.00
72	C	Ethylbenzene	0.4000	0.4142	-3.5	100	0.00
73	T	m-,p-Xylene	0.8000	0.8222	-2.8	100	0.00
74	T	o-Xylene	-1.0000	0.3756	0.0	100	0.00
75	T	Styrene	0.4000	0.3829	4.3	100	0.00
76	P	Bromoform	-1.0000	0.3055	0.0	100	0.00
77	T	Isopropylbenzene	0.4000	0.4249	-6.2	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.4000	0.4287	-7.2	100	0.00
80	S	p-Bromofluorobenzene	-1.0000	0.0000	0.0	0	-16.64#
81	T	1,2,3-Trichloropropane	-1.0000	0.3302	0.0	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	-1.0000	0.0000	0.0	0	-16.73#
83	T	n-Propylbenzene	0.4000	0.4303	-7.6	100	0.00
84	T	Bromobenzene	0.4000	0.4006	-0.1	100	0.00
85	T	1,3,5-Trimethylbenzene	0.4000	0.4136	-3.4	100	0.00
86	T	2-Chlorotoluene	0.4000	0.4338	-8.4	100	0.00
87	T	4-Chlorotoluene	0.4000	0.4300	-7.5	100	0.00
88	T	a-Methylstyrene	-1.0000	0.3539	0.0	100	0.00
89	T	tert-Butylbenzene	-1.0000	0.3730	0.0	100	0.00
90	T	1,2,4-Trimethylbenzene	-1.0000	0.4035	0.0	100	0.00
91	T	sec-Butylbenzene	-1.0000	0.4447	0.0	100	0.00
92	T	p-Isopropyltoluene	-1.0000	0.4222	0.0	100	0.00
93	T	1,3-Dichlorobenzene	0.4000	0.4347	-8.7	100	0.00
94	T	1,4-Dichlorobenzene	0.4000	0.4045	-1.1	100	0.00
95	T	n-Butylbenzene	-1.0000	0.4377	0.0	100	0.00
96	T	1,2-Dichlorobenzene	0.4000	0.4223	-5.6	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	0.0000	0.0	0	-19.70#
98	T	1,2,4-Trichlorobenzene	0.4000	0.4428	-10.7	100	0.00
99	T	Hexachlorobutadiene	0.4000	0.4528	-13.2	100	0.00
100	T	Naphthalene	0.4000	0.4141	-3.5	100	0.00
101	T	1,2,3-Trichlorobenzene	0.4000	0.4503	-12.6	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 1
6M146224.D 8260BWT.M Thu Apr 06 15:02:29 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	632181	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	444070	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	224733	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	3097	0.4799	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	1.92%#		
43) 1,2-Dichloroethane-d4	10.85	65	2998	0.4714	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	1.88%#		
58) Toluene-d8	13.24	98	11387	0.5025	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	2.00%#		
80) p-Bromofluorobenzene	16.64	95	4328	0.5071	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	2.04%#		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	9629	0.9593	ug/L #	85
3) Chloromethane	4.04	50	18344	0.8003	ug/L	93
4) Vinyl Chloride	4.28	62	12799	1.1160	ug/L	96
5) 1,3-Butadiene	4.34	54	8885	0.7170	ug/L	88
6) Bromomethane	5.24	94	4461	0.9009	ug/L	95
7) Chloroethane	5.40	64	4858	0.9845	ug/L	80
8) Trichlorofluoromethane	5.91	101	11643	0.9905	ug/L	95
9) Diethyl ether	6.44	59	24166	4.9333	ug/L	82
10) Isoprene	6.48	67	8997	0.9306	ug/L	79
11) Acrolein	6.68	56	678	1.2633	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	6814	1.0241	ug/L	88
13) Acetone	6.77	43	1642	1.2036	ug/L #	48
14) 1,1-Dichloroethene	7.01	61	9339	0.9690	ug/L	75
15) Tert-Butyl Alcohol	7.10	59	3988	9.4246	ug/L #	57
16) Dimethyl Sulfide	7.27	62	6552	0.9514	ug/L	98
17) Iodomethane	7.55	142	2740	1.2641	ug/L	83
18) Methyl acetate	7.54	43	3105	0.9075	ug/L #	66
19) Methylene Chloride	7.80	84	7857	1.0783	ug/L	64
20) Carbon Disulfide	7.86	76	21108	1.0176	ug/L	95
21) Acrylonitrile	7.97	53	3676	2.3254	ug/L	83
22) Methyl Tert Butyl Ether	8.01	73	16436	1.0286	ug/L	88
23) trans-1,2-Dichloroethene	8.26	96	6924	0.9982	ug/L	75
24) n-Hexane	8.32	57	8671	1.1054	ug/L	80
25) Diisopropyl ether	8.66	45	90855	5.0880	ug/L #	90
26) Vinyl Acetate	8.83	43	4307	0.8689	ug/L #	78
27) 1,1-Dichloroethane	8.87	63	11386	0.9909	ug/L	100
28) Ethyl-Tert-Butyl ether	9.24	59	90588	5.0069	ug/L	90
29) 2-Butanone	9.42	43	1578	0.9178	ug/L #	57
30) Propionitrile	9.52	54	2484	4.4300	ug/L #	56
31) 2,2-Dichloropropane	9.65	77	10191	1.1658	ug/L	75
32) cis-1,2-Dichloroethene	9.72	96	7549	0.9899	ug/L	90
33) Chloroform	9.92	83	13696	1.0463	ug/L	91
34) 1-Bromopropane	10.06	122	1026	0.7587	ug/L	54
35) Bromochloromethane	10.15	130	3643	0.9075	ug/L	100
36) Tetrahydrofuran	10.17	42	6307	5.5703	ug/L	83
38) 1,1,1-Trichloroethane	10.45	97	10730	1.0083	ug/L	83
39) Cyclohexane	10.49	56	9783	0.9941	ug/L	78
40) 1,1-Dichloropropene	10.64	75	9021	1.0028	ug/L	85
41) Tert-Amyl-Methyl ether	10.75	73	86495	5.0351	ug/L	93
42) Carbon Tetrachloride	10.80	117	7124	0.8490	ug/L	95

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:53 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:51 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

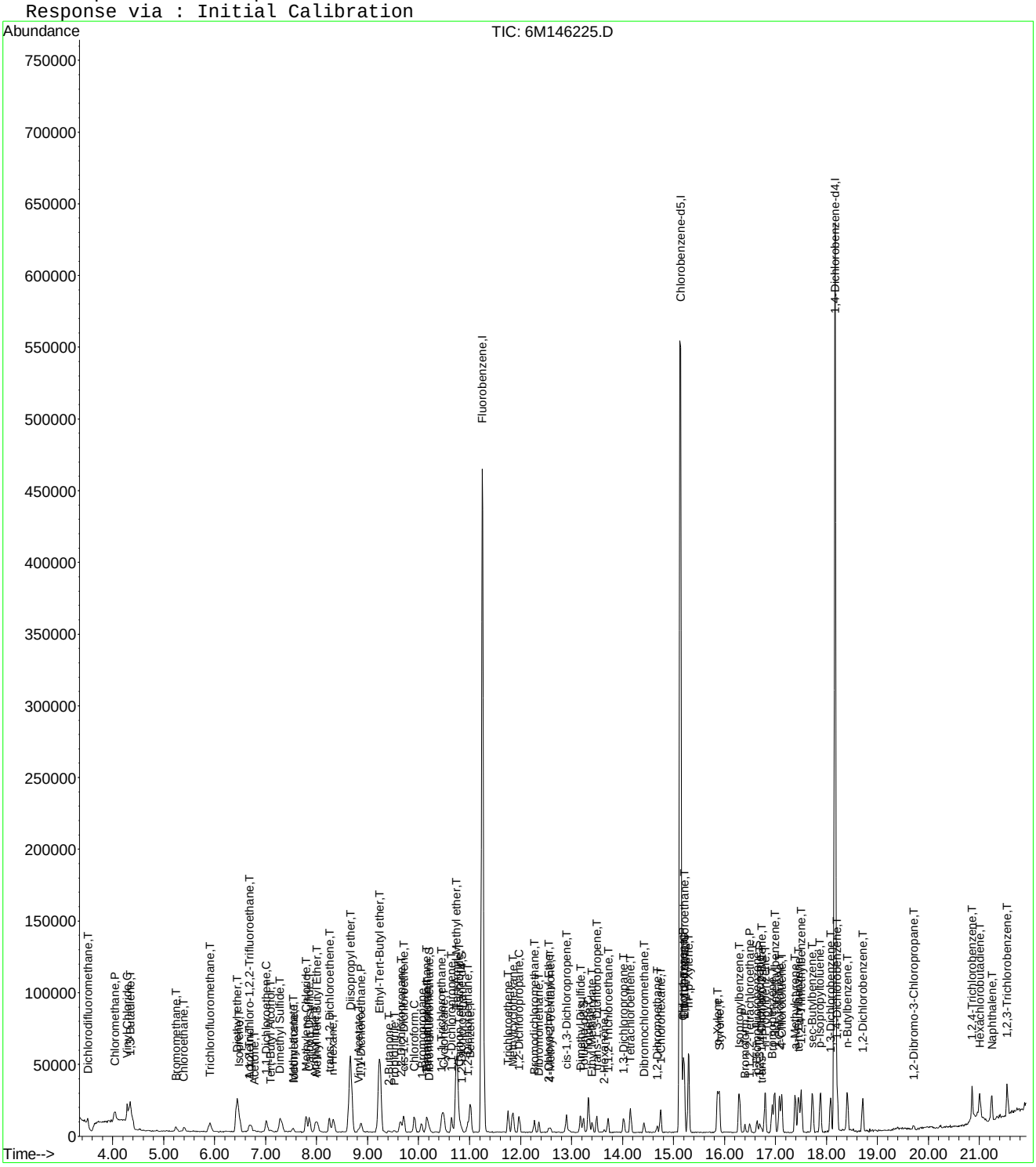
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	8252	1.0134	ug/L	#	79
46)	Benzene	11.01	78	27830	1.0289	ug/L		85
47)	Trichloroethene	11.76	130	7188	0.9763	ug/L		86
48)	Methylcyclohexane	11.85	83	10430	0.9805	ug/L		81
49)	1,2-Dichloropropane	11.97	63	6337	0.9927	ug/L		93
51)	Bromodichloromethane	12.27	83	8602	0.9546	ug/L		100
52)	Dibromomethane	12.36	93	3907	1.0392	ug/L		88
53)	2-Chloroethyl Vinyl Ether	12.55	63	2066	0.8251	ug/L		85
54)	4-Methyl-2-Pentanone	12.58	58	1310	0.7976	ug/L	#	38
55)	cis-1,3-Dichloropropene	12.90	75	9650	0.9724	ug/L	#	91
56)	Dimethyl Disulfide	13.18	79	5152	0.8229	ug/L		84
59)	Toluene	13.33	91	28882	1.0403	ug/L		97
60)	Ethyl Methacrylate	13.40	69	6287	0.9358	ug/L		73
62)	trans-1,3-Dichloropropene	13.49	75	8281	0.9673	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	5263	1.0059	ug/L		98
64)	2-Hexanone	13.64	43	2640	1.0508	ug/L		100
65)	1,3-Dichloropropane	14.02	76	9029	1.0281	ug/L		71
66)	Tetrachloroethene	14.16	166	6743	1.0023	ug/L		96
67)	Dibromochloromethane	14.42	129	6126	0.9472	ug/L		94
68)	1,2-Dibromoethane	14.68	107	5001	0.9955	ug/L		97
69)	1-Chlorohexane	14.75	91	8893	0.9919	ug/L		81
70)	Chlorobenzene	15.19	112	19139	1.0072	ug/L		80
71)	1,1,1,2-Tetrachloroethane	15.21	131	6334	0.9308	ug/L	#	45
72)	Ethylbenzene	15.21	106	9526	0.9260	ug/L		96
73)	m-,p-Xylene	15.29	106	24042	1.9553	ug/L		95
74)	o-Xylene	15.86	106	11918	1.0045	ug/L		97
75)	Styrene	15.90	104	18813	0.9445	ug/L		97
76)	Bromoform	16.40	173	3544	0.8992	ug/L	#	94
77)	Isopropylbenzene	16.29	105	30143	1.0152	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	5946	1.0159	ug/L		93
81)	1,2,3-Trichloropropane	16.69	110	1751	1.0131	ug/L	#	44
82)	trans-1,4-Dichloro-2-Buten	16.73	53	1111	0.8939	ug/L	#	1
83)	n-Propylbenzene	16.80	91	35315	1.0379	ug/L		100
84)	Bromobenzene	16.93	156	7797	1.0200	ug/L		78
85)	1,3,5-Trimethylbenzene	16.99	105	24668	1.0230	ug/L		97
86)	2-Chlorotoluene	17.08	91	24173	1.0670	ug/L		97
87)	4-Chlorotoluene	17.12	91	21009	1.0492	ug/L		97
88)	a-Methylstyrene	17.38	118	11540	0.8654	ug/L		96
89)	tert-Butylbenzene	17.46	134	4954	0.9805	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	25152	1.0156	ug/L		87
91)	sec-Butylbenzene	17.72	105	32001	1.0761	ug/L		95
92)	p-Isopropyltoluene	17.87	119	25877	1.0345	ug/L		98
93)	1,3-Dichlorobenzene	18.08	146	14335	0.9930	ug/L		96
94)	1,4-Dichlorobenzene	18.21	146	14500	0.9933	ug/L	#	52
95)	n-Butylbenzene	18.42	91	23762	1.0403	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	13818	1.0212	ug/L		94
97)	1,2-Dibromo-3-Chloropropan	19.71	75	1139	1.0744	ug/L		87
98)	1,2,4-Trichlorobenzene	20.86	180	9978	1.0078	ug/L		93
99)	Hexachlorobutadiene	21.01	225	4008	1.0599	ug/L		89
100)	Naphthalene	21.24	128	19584	0.9879	ug/L		98
101)	1,2,3-Trichlorobenzene	21.54	180	10033	1.0497	ug/L		89

(#) = qualifier out of range (m) = manual integration
6M146225.D 8260BWT.M Thu Apr 06 14:57:54 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	1.0000	0.9593	4.1	100	0.00
3	P	Chloromethane	1.0000	0.8003	20.0	100	0.02
4	C	Vinyl Chloride	1.0000	1.1160	-11.6	100	0.00
5	T	1,3-Butadiene	-1.0000	0.7170	0.0	0	0.03
6	T	Bromomethane	1.0000	0.9009	9.9	100	0.03
7	T	Chloroethane	1.0000	0.9845	1.5	100	0.02
8	T	Trichlorofluoromethane	1.0000	0.9905	0.9	100	0.02
9	T	Diethyl ether	5.0000	4.9333	1.3	100	0.00
10	T	Isoprene	-1.0000	0.9306	0.0	100	0.00
11	T	Acrolein	-1.0000	1.2633	0.0	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	1.0000	1.0241	-2.4	100	0.00
13	T	Acetone	-1.0000	1.2036	0.0	100	0.00
14	C	1,1-Dichloroethene	1.0000	0.9690	3.1	100	0.00
15	T	Tert-Butyl Alcohol	-1.0000	9.4246	0.0	100	-0.02
16	T	Dimethyl Sulfide	-1.0000	0.9514	0.0	100	0.00
17	T	Iodomethane	1.0000	1.2641	-26.4#	100	0.02
18	T	Methyl acetate	-1.0000	0.9075	0.0	100	0.00
19	T	Methylene Chloride	1.0000	1.0783	-7.8	100	0.00
20	T	Carbon Disulfide	1.0000	1.0176	-1.8	100	0.00
21	T	Acrylonitrile	2.5000	2.3254	7.0	100	0.00
22	T	Methyl Tert Butyl Ether	1.0000	1.0286	-2.9	100	-0.01
23	T	trans-1,2-Dichloroethene	1.0000	0.9982	0.2	100	0.00
24	T	n-Hexane	-1.0000	1.1054	0.0	100	-0.01
25	T	Diisopropyl ether	5.0000	5.0880	-1.8	100	0.00
26	T	Vinyl Acetate	-1.0000	0.8689	0.0	100	0.00
27	P	1,1-Dichloroethane	1.0000	0.9909	0.9	100	0.00
28	T	Ethyl-Tert-Butyl ether	5.0000	5.0069	-0.1	100	0.00
29	T	2-Butanone	-1.0000	0.9178	0.0	100	0.00
30	T	Propionitrile	5.0000	4.4300	11.4	100	0.00
31	T	2,2-Dichloropropane	1.0000	1.1658	-16.6	100	0.00
32	T	cis-1,2-Dichloroethene	1.0000	0.9899	1.0	100	0.00
33	C	Chloroform	1.0000	1.0463	-4.6	100	0.00
34		1-Bromopropane	1.0000	0.7587	24.1#	100	0.00
35	T	Bromochloromethane	1.0000	0.9075	9.2	100	0.00
36	T	Tetrahydrofuran	5.0000	5.5703	-11.4	100	0.00
37	S	Dibromofluoromethane	0.5000	0.4799	4.0	100	0.00
38	T	1,1,1-Trichloroethane	1.0000	1.0083	-0.8	100	-0.01
39	T	Cyclohexane	1.0000	0.9941	0.6	100	0.00
40	T	1,1-Dichloropropene	1.0000	1.0028	-0.3	100	0.00
41	T	Tert-Amyl-Methyl ether	5.0000	5.0351	-0.7	100	0.00
42	T	Carbon Tetrachloride	1.0000	0.8490	15.1	100	-0.01
43	S	1,2-Dichloroethane-d4	-1.0000	0.4714	0.0	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	1.0000	1.0134	-1.3	100	0.00
46	T	Benzene	1.0000	1.0289	-2.9	100	0.00
47	T	Trichloroethene	1.0000	0.9763	2.4	100	0.00
48	T	Methylcyclohexane	-1.0000	0.9805	0.0	100	0.00
49	C	1,2-Dichloropropane	1.0000	0.9927	0.7	100	0.00
50	T	1,4-Dioxane	-1.0000	0.0000	0.0	0	-12.25#
51	T	Bromodichloromethane	1.0000	0.9546	4.5	100	0.00
52	T	Dibromomethane	1.0000	1.0392	-3.9	100	0.00
53	T	2-Chloroethyl Vinyl Ether	-1.0000	0.8251	0.0	100	0.00
54	T	4-Methyl-2-Pentanone	-1.0000	0.7976	0.0	100	0.00

(#) = Out of Range
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146225.D Vial: 5
Acq On : 5 Apr 2017 18:28 Operator: TMB
Sample : WG608938-04 1ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	1.0000	0.9724	2.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	0.8229	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	0.5000	0.5025	-0.5	100	0.00
59	C	Toluene	1.0000	1.0403	-4.0	100	0.00
60	T	Ethyl Methacrylate	1.0000	0.9358	6.4	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.10
62	T	trans-1,3-Dichloropropene	1.0000	0.9673	3.3	100	0.00
63	T	1,1,2-Trichloroethane	1.0000	1.0059	-0.6	100	0.00
64	T	2-Hexanone	-1.0000	1.0508	0.0	100	0.00
65	T	1,3-Dichloropropane	1.0000	1.0281	-2.8	100	0.00
66	T	Tetrachloroethene	1.0000	1.0023	-0.2	100	0.00
67	T	Dibromochloromethane	1.0000	0.9472	5.3	100	0.00
68	T	1,2-Dibromoethane	1.0000	0.9954	0.5	100	0.00
69	T	1-Chlorohexane	1.0000	0.9919	0.8	100	0.00
70	P	Chlorobenzene	1.0000	1.0072	-0.7	100	0.00
71	T	1,1,1,2-Tetrachloroethane	1.0000	0.9308	6.9	100	0.00
72	C	Ethylbenzene	1.0000	0.9260	7.4	100	0.00
73	T	m-,p-Xylene	2.0000	1.9553	2.2	100	0.00
74	T	o-Xylene	1.0000	1.0045	-0.4	100	0.00
75	T	Styrene	1.0000	0.9445	5.5	100	0.00
76	P	Bromoform	1.0000	0.8992	10.1	100	0.00
77	T	Isopropylbenzene	1.0000	1.0152	-1.5	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	1.0000	1.0159	-1.6	100	0.00
80	S	p-Bromofluorobenzene	0.5000	0.5071	-1.4	100	0.00
81	T	1,2,3-Trichloropropane	1.0000	1.0131	-1.3	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	1.0000	0.8939	10.6	100	0.00
83	T	n-Propylbenzene	1.0000	1.0379	-3.8	100	0.00
84	T	Bromobenzene	1.0000	1.0200	-2.0	100	0.00
85	T	1,3,5-Trimethylbenzene	1.0000	1.0230	-2.3	100	0.00
86	T	2-Chlorotoluene	1.0000	1.0670	-6.7	100	0.00
87	T	4-Chlorotoluene	1.0000	1.0492	-4.9	100	0.00
88	T	a-Methylstyrene	-1.0000	0.8654	0.0	100	0.00
89	T	tert-Butylbenzene	1.0000	0.9805	2.0	100	0.00
90	T	1,2,4-Trimethylbenzene	1.0000	1.0156	-1.6	100	0.00
91	T	sec-Butylbenzene	1.0000	1.0761	-7.6	100	0.00
92	T	p-Isopropyltoluene	1.0000	1.0345	-3.4	100	-0.01
93	T	1,3-Dichlorobenzene	1.0000	0.9930	0.7	100	0.00
94	T	1,4-Dichlorobenzene	1.0000	0.9933	0.7	100	0.00
95	T	n-Butylbenzene	1.0000	1.0403	-4.0	100	0.00
96	T	1,2-Dichlorobenzene	1.0000	1.0212	-2.1	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	-1.0000	1.0744	0.0	100	0.00
98	T	1,2,4-Trichlorobenzene	1.0000	1.0078	-0.8	100	0.00
99	T	Hexachlorobutadiene	1.0000	1.0599	-6.0	100	0.00
100	T	Naphthalene	1.0000	0.9879	1.2	100	0.00
101	T	1,2,3-Trichlorobenzene	1.0000	1.0497	-5.0	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146225.D 8260BWT.M Thu Apr 06 15:02:41 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	622575	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	435125	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	222815	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	5872	0.9239	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery =	3.68%#			
43) 1,2-Dichloroethane-d4	10.85	65	6086	0.9716	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery =	3.88%#			
58) Toluene-d8	13.23	98	22416	1.0096	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery =	4.04%#			
80) p-Bromofluorobenzene	16.64	95	8846	1.0453	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery =	4.20%#			
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	17204	1.7405	ug/L		90
3) Chloromethane	4.04	50	31810	2.0127	ug/L		90
4) Vinyl Chloride	4.28	62	21813	1.9313	ug/L		100
5) 1,3-Butadiene	4.32	54	13563	1.8365	ug/L		98
6) Bromomethane	5.24	94	7916	1.6233	ug/L		98
7) Chloroethane	5.41	64	9130	1.8788	ug/L		79
8) Trichlorofluoromethane	5.91	101	21485	1.8560	ug/L		98
9) Diethyl ether	6.44	59	119329	24.7359	ug/L		81
10) Isoprene	6.48	67	17497	1.8377	ug/L		78
11) Acrolein	6.67	56	6469	12.2399	ug/L		91
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	12320	1.8801	ug/L		96
13) Acetone	6.77	43	2910	2.1660	ug/L		88
14) 1,1-Dichloroethene	7.02	61	18326	1.9308	ug/L		82
15) Tert-Butyl Alcohol	7.11	59	21089	50.6073	ug/L		91
16) Dimethyl Sulfide	7.28	62	13289	1.9594	ug/L		85
17) Iodomethane	7.55	142	6278	1.9004	ug/L		87
18) Methyl acetate	7.54	43	6217	1.8451	ug/L	#	93
19) Methylene Chloride	7.80	84	14280	1.9900	ug/L		58
20) Carbon Disulfide	7.86	76	40699	1.9924	ug/L		98
21) Acrylonitrile	7.97	53	18438	11.8437	ug/L		95
22) Methyl Tert Butyl Ether	8.01	73	30909	1.9643	ug/L		90
23) trans-1,2-Dichloroethene	8.26	96	13599	1.9908	ug/L		73
24) n-Hexane	8.33	57	15204	1.9682	ug/L		83
25) Diisopropyl ether	8.66	45	450794	25.6347	ug/L	#	90
26) Vinyl Acetate	8.82	43	6597	1.3515	ug/L	#	78
27) 1,1-Dichloroethane	8.87	63	22151	1.9576	ug/L		100
28) Ethyl-Tert-Butyl ether	9.24	59	449659	25.2364	ug/L		91
29) 2-Butanone	9.42	43	3106	1.8344	ug/L		84
30) Propionitrile	9.52	54	13656	24.7299	ug/L		97
31) 2,2-Dichloropropane	9.64	77	17425	2.0241	ug/L		79
32) cis-1,2-Dichloroethene	9.72	96	14760	1.9654	ug/L		85
33) Chloroform	9.92	83	24171	1.8751	ug/L		93
34) 1-Bromopropane	10.05	122	2578	1.9358	ug/L		99
35) Bromochloromethane	10.15	130	7493	1.8954	ug/L		94
36) Tetrahydrofuran	10.18	42	27217	24.4090	ug/L	#	70
38) 1,1,1-Trichloroethane	10.46	97	20272	1.9343	ug/L		87
39) Cyclohexane	10.49	56	18307	1.8890	ug/L		77
40) 1,1-Dichloropropene	10.65	75	17358	1.9593	ug/L		84
41) Tert-Amyl-Methyl ether	10.75	73	419848	24.8173	ug/L		93
42) Carbon Tetrachloride	10.80	117	13633	1.6498	ug/L		96

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:55 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

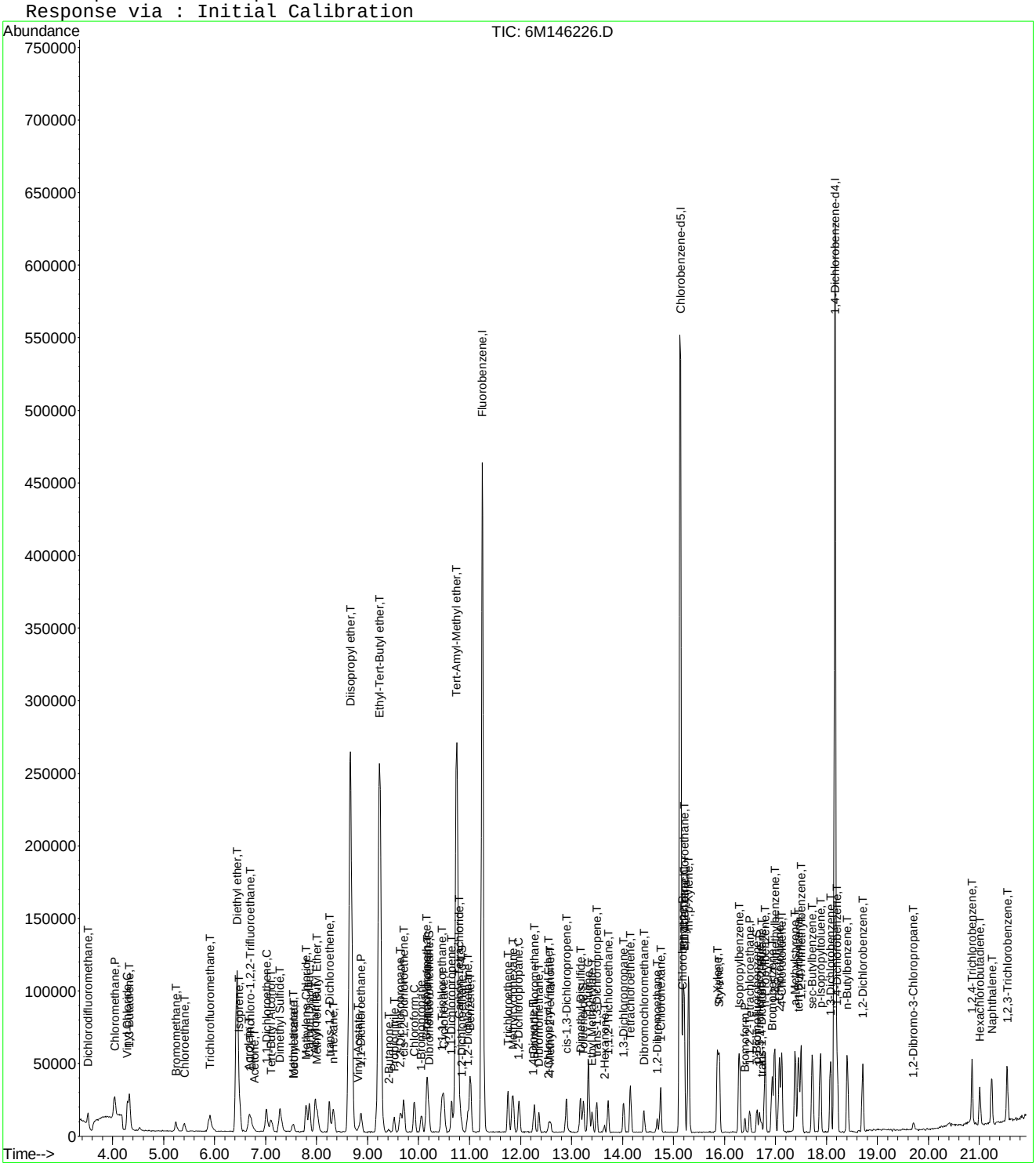
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	15260	1.9029	ug/L		88
46)	Benzene	11.01	78	53642	2.0138	ug/L		84
47)	Trichloroethene	11.76	130	13662	1.8843	ug/L		86
48)	Methylcyclohexane	11.85	83	20180	1.9264	ug/L		83
49)	1,2-Dichloropropane	11.96	63	12672	2.0157	ug/L		96
50)	1,4-Dioxane	12.25	88	2094	45.8104	ug/L		79
51)	Bromodichloromethane	12.27	83	16986	1.9140	ug/L		100
52)	Dibromomethane	12.36	93	7229	1.9525	ug/L		97
53)	2-Chloroethyl Vinyl Ether	12.54	63	3804	1.5427	ug/L		93
54)	4-Methyl-2-Pentanone	12.59	58	2633	1.6278	ug/L		97
55)	cis-1,3-Dichloropropene	12.90	75	18417	1.8845	ug/L		93
56)	Dimethyl Disulfide	13.18	79	10342	1.6774	ug/L		85
59)	Toluene	13.33	91	54153	1.9906	ug/L		99
60)	Ethyl Methacrylate	13.40	69	12139	1.8439	ug/L		74
62)	trans-1,3-Dichloropropene	13.49	75	14848	1.7701	ug/L		98
63)	1,1,2-Trichloroethane	13.72	97	10051	1.9605	ug/L		100
64)	2-Hexanone	13.65	43	4642	1.8856	ug/L		83
65)	1,3-Dichloropropane	14.03	76	16522	1.9199	ug/L		72
66)	Tetrachloroethene	14.16	166	13068	1.9824	ug/L		97
67)	Dibromochloromethane	14.42	129	11966	1.8881	ug/L		99
68)	1,2-Dibromoethane	14.68	107	9631	1.9565	ug/L		98
69)	1-Chlorohexane	14.75	91	16906	1.9245	ug/L		76
70)	Chlorobenzene	15.18	112	35469	1.9050	ug/L		90
71)	1,1,1,2-Tetrachloroethane	15.21	131	12013	1.8016	ug/L		88
72)	Ethylbenzene	15.21	106	18719	1.8571	ug/L		98
73)	m-,p-Xylene	15.29	106	46470	3.8571	ug/L		92
74)	o-Xylene	15.86	106	22349	1.9223	ug/L		97
75)	Styrene	15.89	104	37462	1.9194	ug/L		98
76)	Bromoform	16.40	173	6961	1.8024	ug/L		93
77)	Isopropylbenzene	16.29	105	56507	1.9422	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	11588	1.9969	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	3156	1.8416	ug/L	#	45
82)	trans-1,4-Dichloro-2-Buten	16.73	53	2077	1.6855	ug/L	#	1
83)	n-Propylbenzene	16.79	91	68212	2.0219	ug/L		100
84)	Bromobenzene	16.94	156	14979	1.9764	ug/L		81
85)	1,3,5-Trimethylbenzene	16.99	105	48272	2.0191	ug/L		98
86)	2-Chlorotoluene	17.08	91	45900	2.0434	ug/L		97
87)	4-Chlorotoluene	17.12	91	40071	2.0184	ug/L		97
88)	a-Methylstyrene	17.38	118	23772	1.7980	ug/L		98
89)	tert-Butylbenzene	17.46	134	10046	2.0053	ug/L		75
90)	1,2,4-Trimethylbenzene	17.51	105	48653	1.9815	ug/L		86
91)	sec-Butylbenzene	17.72	105	59307	2.0115	ug/L		96
92)	p-Isopropyltoluene	17.88	119	48956	1.9740	ug/L		96
93)	1,3-Dichlorobenzene	18.08	146	28643	2.0012	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	28060	1.9387	ug/L		82
95)	n-Butylbenzene	18.41	91	44182	1.9509	ug/L		97
96)	1,2-Dichlorobenzene	18.71	146	25901	1.9307	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	1831	1.7419	ug/L		85
98)	1,2,4-Trichlorobenzene	20.86	180	18897	1.9251	ug/L		96
99)	Hexachlorobutadiene	21.01	225	7029	1.8748	ug/L		95
100)	Naphthalene	21.24	128	36518	1.8580	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	17908	1.8898	ug/L		95

(#) = qualifier out of range (m) = manual integration
6M146226.D 8260BWT.M Thu Apr 06 14:57:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:57 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	2.0000	1.7405	13.0	100	0.00
3	P	Chloromethane	2.0000	2.0127	-0.6	100	0.02
4	C	Vinyl Chloride	2.0000	1.9313	3.4	100	0.01
5	T	1,3-Butadiene	-1.0000	1.8365	0.0	0	0.01
6	T	Bromomethane	2.0000	1.6233	18.8	100	0.03
7	T	Chloroethane	2.0000	1.8788	6.1	100	0.03
8	T	Trichlorofluoromethane	2.0000	1.8560	7.2	100	0.02
9	T	Diethyl ether	25.0000	24.7359	1.1	100	0.00
10	T	Isoprene	-1.0000	1.8377	0.0	100	0.00
11	T	Acrolein	12.5000	12.2399	2.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	2.0000	1.8801	6.0	100	0.02
13	T	Acetone	-1.0000	2.1660	0.0	100	0.00
14	C	1,1-Dichloroethene	2.0000	1.9308	3.5	100	0.00
15	T	Tert-Butyl Alcohol	50.0000	50.6073	-1.2	100	-0.01
16	T	Dimethyl Sulfide	-1.0000	1.9594	0.0	100	0.00
17	T	Iodomethane	2.0000	1.9004	5.0	100	0.02
18	T	Methyl acetate	-1.0000	1.8451	0.0	100	0.00
19	T	Methylene Chloride	2.0000	1.9900	0.5	100	0.00
20	T	Carbon Disulfide	2.0000	1.9924	0.4	100	0.00
21	T	Acrylonitrile	12.5000	11.8437	5.3	100	0.00
22	T	Methyl Tert Butyl Ether	2.0000	1.9643	1.8	100	-0.01
23	T	trans-1,2-Dichloroethene	2.0000	1.9908	0.5	100	0.00
24	T	n-Hexane	-1.0000	1.9682	0.0	100	0.00
25	T	Diisopropyl ether	25.0000	25.6347	-2.5	100	0.00
26	T	Vinyl Acetate	-1.0000	1.3515	0.0	100	-0.01
27	P	1,1-Dichloroethane	2.0000	1.9576	2.1	100	0.00
28	T	Ethyl-Tert-Butyl ether	25.0000	25.2364	-0.9	100	0.00
29	T	2-Butanone	-1.0000	1.8344	0.0	100	0.00
30	T	Propionitrile	25.0000	24.7299	1.1	100	0.00
31	T	2,2-Dichloropropane	2.0000	2.0241	-1.2	100	0.00
32	T	cis-1,2-Dichloroethene	2.0000	1.9654	1.7	100	0.00
33	C	Chloroform	2.0000	1.8751	6.2	100	0.00
34		1-Bromopropane	2.0000	1.9358	3.2	100	0.00
35	T	Bromochloromethane	2.0000	1.8954	5.2	100	0.00
36	T	Tetrahydrofuran	25.0000	24.4090	2.4	100	0.00
37	S	Dibromofluoromethane	1.0000	0.9239	7.6	100	0.00
38	T	1,1,1-Trichloroethane	2.0000	1.9343	3.3	100	0.00
39	T	Cyclohexane	2.0000	1.8890	5.5	100	0.00
40	T	1,1-Dichloropropene	2.0000	1.9593	2.0	100	0.00
41	T	Tert-Amyl-Methyl ether	25.0000	24.8173	0.7	100	0.00
42	T	Carbon Tetrachloride	2.0000	1.6498	17.5	100	-0.01
43	S	1,2-Dichloroethane-d4	1.0000	0.9716	2.8	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	-0.01
45	T	1,2-Dichloroethane	2.0000	1.9029	4.9	100	0.00
46	T	Benzene	2.0000	2.0138	-0.7	100	0.00
47	T	Trichloroethene	2.0000	1.8843	5.8	100	0.00
48	T	Methylcyclohexane	-1.0000	1.9264	0.0	100	0.00
49	C	1,2-Dichloropropane	2.0000	2.0158	-0.8	100	-0.01
50	T	1,4-Dioxane	-1.0000	45.8104	0.0	100	0.00
51	T	Bromodichloromethane	2.0000	1.9140	4.3	100	0.00
52	T	Dibromomethane	2.0000	1.9525	2.4	100	0.00
53	T	2-Chloroethyl Vinyl Ether	2.0000	1.5427	22.9#	100	-0.01
54	T	4-Methyl-2-Pentanone	-1.0000	1.6278	0.0	100	0.00

(#) = Out of Range
6M146226.D 8260BWT.M Thu Apr 06 15:02:50 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146226.D Vial: 6
Acq On : 5 Apr 2017 19:00 Operator: TMB
Sample : WG608938-05 2ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	2.0000	1.8845	5.8	100	0.00
56	T	Dimethyl Disulfide	-1.0000	1.6774	0.0	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	1.0000	1.0096	-1.0	100	0.00
59	C	Toluene	2.0000	1.9906	0.5	100	0.00
60	T	Ethyl Methacrylate	2.0000	1.8439	7.8	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	2.0000	1.7701	11.5	100	0.00
63	T	1,1,2-Trichloroethane	2.0000	1.9605	2.0	100	0.00
64	T	2-Hexanone	-1.0000	1.8856	0.0	100	0.00
65	T	1,3-Dichloropropane	2.0000	1.9199	4.0	100	0.00
66	T	Tetrachloroethene	2.0000	1.9824	0.9	100	0.00
67	T	Dibromochloromethane	2.0000	1.8882	5.6	100	0.00
68	T	1,2-Dibromoethane	2.0000	1.9565	2.2	100	0.00
69	T	1-Chlorohexane	2.0000	1.9245	3.8	100	0.00
70	P	Chlorobenzene	2.0000	1.9050	4.8	100	0.00
71	T	1,1,1,2-Tetrachloroethane	2.0000	1.8016	9.9	100	0.00
72	C	Ethylbenzene	2.0000	1.8571	7.1	100	0.00
73	T	m-,p-Xylene	4.0000	3.8571	3.6	100	0.00
74	T	o-Xylene	2.0000	1.9223	3.9	100	0.00
75	T	Styrene	2.0000	1.9194	4.0	100	-0.01
76	P	Bromoform	2.0000	1.8024	9.9	100	0.00
77	T	Isopropylbenzene	2.0000	1.9422	2.9	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	2.0000	1.9969	0.2	100	0.00
80	S	p-Bromofluorobenzene	1.0000	1.0453	-4.5	100	0.00
81	T	1,2,3-Trichloropropane	2.0000	1.8416	7.9	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	2.0000	1.6855	15.7	100	0.00
83	T	n-Propylbenzene	2.0000	2.0219	-1.1	100	0.00
84	T	Bromobenzene	2.0000	1.9764	1.2	100	0.00
85	T	1,3,5-Trimethylbenzene	2.0000	2.0191	-1.0	100	0.00
86	T	2-Chlorotoluene	2.0000	2.0434	-2.2	100	0.00
87	T	4-Chlorotoluene	2.0000	2.0184	-0.9	100	0.00
88	T	a-Methylstyrene	-1.0000	1.7980	0.0	100	0.00
89	T	tert-Butylbenzene	2.0000	2.0053	-0.3	100	0.00
90	T	1,2,4-Trimethylbenzene	2.0000	1.9815	0.9	100	0.00
91	T	sec-Butylbenzene	2.0000	2.0115	-0.6	100	0.00
92	T	p-Isopropyltoluene	2.0000	1.9740	1.3	100	0.00
93	T	1,3-Dichlorobenzene	2.0000	2.0012	-0.1	100	0.00
94	T	1,4-Dichlorobenzene	2.0000	1.9387	3.1	100	0.00
95	T	n-Butylbenzene	2.0000	1.9509	2.5	100	0.00
96	T	1,2-Dichlorobenzene	2.0000	1.9307	3.5	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	2.0000	1.7419	12.9	100	0.00
98	T	1,2,4-Trichlorobenzene	2.0000	1.9251	3.7	100	0.00
99	T	Hexachlorobutadiene	2.0000	1.8748	6.3	100	0.00
100	T	Naphthalene	2.0000	1.8580	7.1	100	0.00
101	T	1,2,3-Trichlorobenzene	2.0000	1.8898	5.5	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146226.D 8260BWT.M Thu Apr 06 15:02:51 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	624930	25.00	ug/L	0.00
57) Chlorobenzene-d5	15.14	117	437844	25.00	ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	229708	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	10.21	111	16009	2.5095	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 10.04%#			
43) 1,2-Dichloroethane-d4	10.85	65	15355	2.4422	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 9.76%#			
58) Toluene-d8	13.24	98	57180	2.5593	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 10.24%#			
80) p-Bromofluorobenzene	16.64	95	20953	2.4017	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 9.60%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.52	85	45599	4.5957	ug/L	94
3) Chloromethane	4.04	50	70172	5.3733	ug/L	92
4) Vinyl Chloride	4.28	62	52481	4.6291	ug/L	100
5) 1,3-Butadiene	4.33	54	27485	5.0651	ug/L	93
6) Bromomethane	5.24	94	22408	4.5778	ug/L	98
7) Chloroethane	5.41	64	24876	5.0998	ug/L	86
8) Trichlorofluoromethane	5.91	101	57306	4.9318	ug/L	99
9) Diethyl ether	6.44	59	241182	49.8065	ug/L	81
10) Isoprene	6.48	67	45799	4.7920	ug/L	80
11) Acrolein	6.67	56	13253	24.9813	ug/L	99
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	32606	4.9572	ug/L	97
13) Acetone	6.77	43	7120	5.2798	ug/L	90
14) 1,1-Dichloroethene	7.01	61	48384	5.0784	ug/L	84
15) Tert-Butyl Alcohol	7.11	59	45515	108.8107	ug/L	90
16) Dimethyl Sulfide	7.28	62	33336	4.8967	ug/L	83
17) Iodomethane	7.54	142	18689	4.0940	ug/L	98
18) Methyl acetate	7.53	43	16127	4.7683	ug/L	90
19) Methylene Chloride	7.80	84	35921	4.9870	ug/L	61
20) Carbon Disulfide	7.86	76	101736	4.9617	ug/L	99
21) Acrylonitrile	7.97	53	39515	25.2869	ug/L	94
22) Methyl Tert Butyl Ether	8.01	73	82575	5.2279	ug/L	89
23) trans-1,2-Dichloroethene	8.26	96	34052	4.9661	ug/L	78
24) n-Hexane	8.33	57	39086	5.0408	ug/L	81
25) Diisopropyl ether	8.66	45	886670	50.2311	ug/L #	90
26) Vinyl Acetate	8.83	43	24007	4.8995	ug/L #	91
27) 1,1-Dichloroethane	8.87	63	57099	5.0271	ug/L	99
28) Ethyl-Tert-Butyl ether	9.24	59	897158	50.1618	ug/L	90
29) 2-Butanone	9.42	43	8484	4.9917	ug/L	88
30) Propionitrile	9.52	54	29088	52.4775	ug/L	99
31) 2,2-Dichloropropane	9.65	77	44879	5.1936	ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	37579	4.9850	ug/L	89
33) Chloroform	9.92	83	60253	4.6565	ug/L	95
34) 1-Bromopropane	10.06	122	6559	4.9064	ug/L	100
35) Bromochloromethane	10.15	130	20571	5.1839	ug/L	98
36) Tetrahydrofuran	10.17	42	56370	50.3637	ug/L #	72
38) 1,1,1-Trichloroethane	10.46	97	51277	4.8743	ug/L	91
39) Cyclohexane	10.49	56	47949	4.9291	ug/L	78
40) 1,1-Dichloropropene	10.64	75	44354	4.9877	ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	851603	50.1488	ug/L	93
42) Carbon Tetrachloride	10.80	117	40401	4.8706	ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:57:59 2017 Quant Results File: 8260BWT.RES

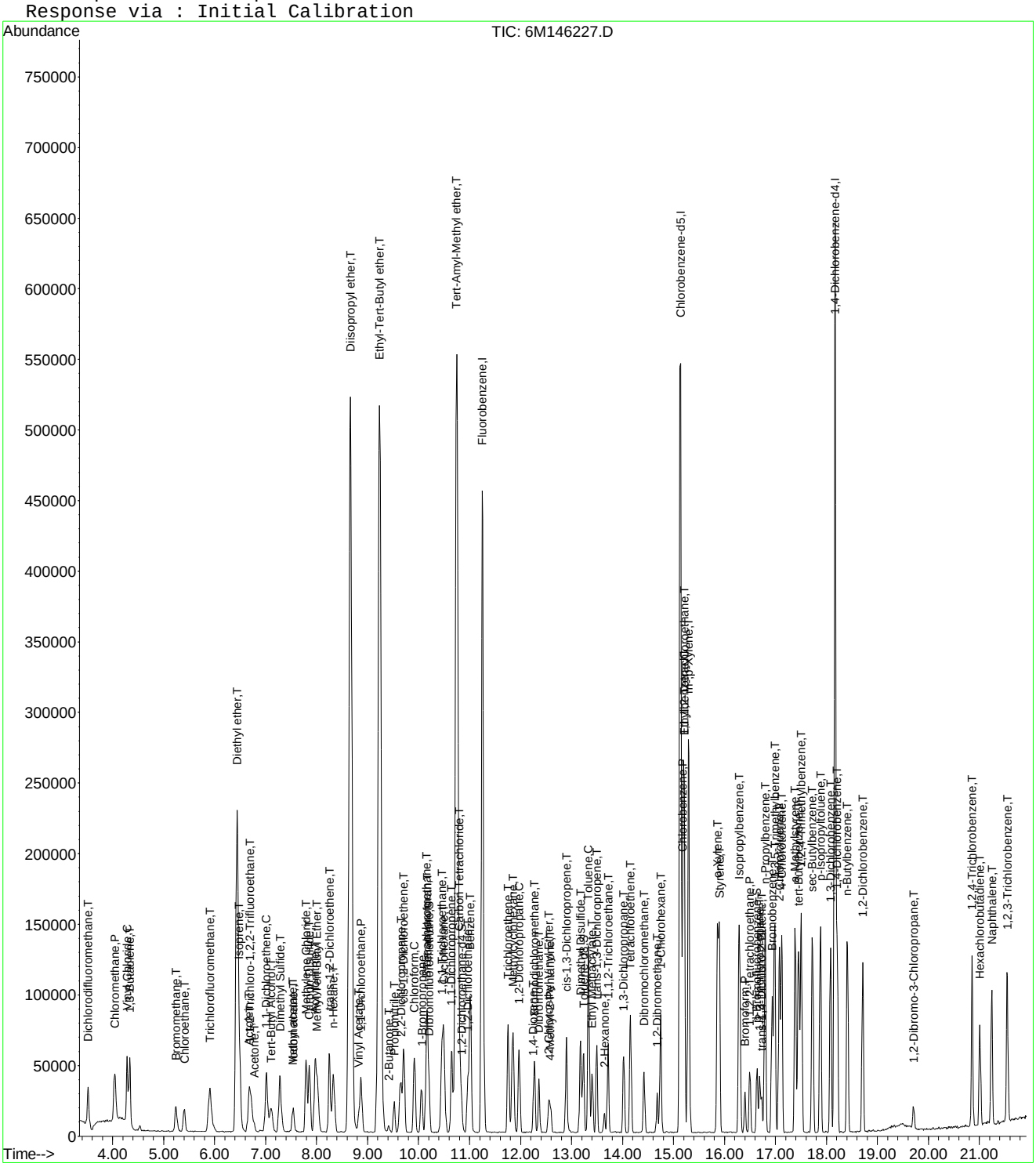
Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	40993	5.0925	ug/L		88
46)	Benzene	11.01	78	132914	4.9709	ug/L		86
47)	Trichloroethene	11.76	130	36216	4.9761	ug/L		84
48)	Methylcyclohexane	11.85	83	51654	4.9123	ug/L		82
49)	1,2-Dichloropropane	11.97	63	32123	5.0906	ug/L		96
50)	1,4-Dioxane	12.25	88	4272	93.1064	ug/L		79
51)	Bromodichloromethane	12.27	83	44761	5.0248	ug/L		99
52)	Dibromomethane	12.36	93	19386	5.2162	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	12476	5.0404	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	7903	4.8674	ug/L		86
55)	cis-1,3-Dichloropropene	12.90	75	50089	5.1061	ug/L		95
56)	Dimethyl Disulfide	13.18	79	28390	4.5874	ug/L		89
59)	Toluene	13.33	91	137485	5.0224	ug/L		100
60)	Ethyl Methacrylate	13.40	69	33232	5.0167	ug/L		72
62)	trans-1,3-Dichloropropene	13.49	75	42828	5.0741	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	26530	5.1428	ug/L		99
64)	2-Hexanone	13.65	43	12468	5.0332	ug/L		86
65)	1,3-Dichloropropane	14.02	76	44093	5.0920	ug/L		70
66)	Tetrachloroethene	14.16	166	33551	5.0579	ug/L		98
67)	Dibromochloromethane	14.42	129	31682	4.9681	ug/L		99
68)	1,2-Dibromoethane	14.68	107	24528	4.9517	ug/L		99
69)	1-Chlorohexane	14.75	91	43721	4.9460	ug/L		79
70)	Chlorobenzene	15.18	112	91449	4.8810	ug/L		100
71)	1,1,1,2-Tetrachloroethane	15.21	131	32496	4.8433	ug/L		89
72)	Ethylbenzene	15.21	106	48984	4.8296	ug/L		96
73)	m-,p-Xylene	15.29	106	119341	9.8441	ug/L		94
74)	o-Xylene	15.86	106	57354	4.9026	ug/L		97
75)	Styrene	15.90	104	98078	4.9940	ug/L		95
76)	Bromoform	16.40	173	18699	4.8117	ug/L		99
77)	Isopropylbenzene	16.29	105	146585	5.0070	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	30970	5.1767	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	9050	5.1225	ug/L	#	50
82)	trans-1,4-Dichloro-2-Buten	16.73	53	6208	4.8867	ug/L	#	1
83)	n-Propylbenzene	16.80	91	176740	5.0817	ug/L		100
84)	Bromobenzene	16.93	156	38734	4.9575	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	121939	4.9473	ug/L		99
86)	2-Chlorotoluene	17.08	91	114766	4.9559	ug/L		97
87)	4-Chlorotoluene	17.12	91	102125	4.9897	ug/L		97
88)	a-Methylstyrene	17.38	118	66394	4.8711	ug/L		96
89)	tert-Butylbenzene	17.46	134	24993	4.8393	ug/L		71
90)	1,2,4-Trimethylbenzene	17.51	105	126114	4.9821	ug/L		87
91)	sec-Butylbenzene	17.72	105	152633	5.0216	ug/L		97
92)	p-Isopropyltoluene	17.88	119	126283	4.9391	ug/L		97
93)	1,3-Dichlorobenzene	18.08	146	71556	4.8495	ug/L		97
94)	1,4-Dichlorobenzene	18.21	146	72485	4.8577	ug/L		94
95)	n-Butylbenzene	18.41	91	115961	4.9668	ug/L		99
96)	1,2-Dichlorobenzene	18.71	146	67580	4.8863	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.71	75	5531	5.1041	ug/L		98
98)	1,2,4-Trichlorobenzene	20.86	180	48642	4.8067	ug/L		98
99)	Hexachlorobutadiene	21.01	225	19187	4.9642	ug/L		98
100)	Naphthalene	21.24	128	101621	5.0152	ug/L		99
101)	1,2,3-Trichlorobenzene	21.55	180	45886	4.6970	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146227.D 8260BWT.M Thu Apr 06 14:58:02 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	100	0.00
2	T	Dichlorodifluoromethane	5.0000	4.5957	8.1	100	0.00
3	P	Chloromethane	5.0000	5.3733	-7.5	100	0.02
4	C	Vinyl Chloride	5.0000	4.6291	7.4	100	0.00
5	T	1,3-Butadiene	5.0000	5.0651	-1.3	100	0.02
6	T	Bromomethane	5.0000	4.5778	8.4	100	0.03
7	T	Chloroethane	5.0000	5.0998	-2.0	100	0.03
8	T	Trichlorofluoromethane	5.0000	4.9318	1.4	100	0.02
9	T	Diethyl ether	50.0000	49.8065	0.4	100	0.00
10	T	Isoprene	5.0000	4.7920	4.2	100	0.00
11	T	Acrolein	25.0000	24.9813	0.1	100	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	5.0000	4.9572	0.9	100	0.00
13	T	Acetone	5.0000	5.2798	-5.6	100	0.00
14	C	1,1-Dichloroethene	5.0000	5.0784	-1.6	100	0.00
15	T	Tert-Butyl Alcohol	100.0000	108.8107	-8.8	100	-0.01
16	T	Dimethyl Sulfide	5.0000	4.8967	2.1	100	0.00
17	T	Iodomethane	5.0000	4.0940	18.1	100	0.00
18	T	Methyl acetate	5.0000	4.7683	4.6	100	0.00
19	T	Methylene Chloride	5.0000	4.9870	0.3	100	0.00
20	T	Carbon Disulfide	5.0000	4.9617	0.8	100	0.00
21	T	Acrylonitrile	25.0000	25.2869	-1.1	100	0.00
22	T	Methyl Tert Butyl Ether	5.0000	5.2279	-4.6	100	-0.01
23	T	trans-1,2-Dichloroethene	5.0000	4.9661	0.7	100	0.00
24	T	n-Hexane	5.0000	5.0408	-0.8	100	0.00
25	T	Diisopropyl ether	50.0000	50.2311	-0.5	100	0.00
26	T	Vinyl Acetate	5.0000	4.8995	2.0	100	0.00
27	P	1,1-Dichloroethane	5.0000	5.0271	-0.5	100	0.00
28	T	Ethyl-Tert-Butyl ether	50.0000	50.1618	-0.3	100	0.00
29	T	2-Butanone	5.0000	4.9917	0.2	100	0.00
30	T	Propionitrile	50.0000	52.4775	-5.0	100	0.00
31	T	2,2-Dichloropropane	5.0000	5.1936	-3.9	100	0.00
32	T	cis-1,2-Dichloroethene	5.0000	4.9850	0.3	100	0.00
33	C	Chloroform	5.0000	4.6565	6.9	100	0.00
34		1-Bromopropane	5.0000	4.9064	1.9	100	0.00
35	T	Bromochloromethane	5.0000	5.1839	-3.7	100	0.00
36	T	Tetrahydrofuran	50.0000	50.3637	-0.7	100	0.00
37	S	Dibromofluoromethane	2.5000	2.5095	-0.4	100	0.00
38	T	1,1,1-Trichloroethane	5.0000	4.8743	2.5	100	0.00
39	T	Cyclohexane	5.0000	4.9291	1.4	100	0.00
40	T	1,1-Dichloropropene	5.0000	4.9877	0.2	100	0.00
41	T	Tert-Amyl-Methyl ether	50.0000	50.1488	-0.3	100	0.00
42	T	Carbon Tetrachloride	5.0000	4.8706	2.6	100	-0.01
43	S	1,2-Dichloroethane-d4	2.5000	2.4421	2.3	100	0.00
44		Heptane	-1.0000	0.0000	0.0	100	0.00
45	T	1,2-Dichloroethane	5.0000	5.0925	-1.9	100	0.00
46	T	Benzene	5.0000	4.9709	0.6	100	0.00
47	T	Trichloroethene	5.0000	4.9761	0.5	100	0.00
48	T	Methylcyclohexane	5.0000	4.9123	1.8	100	0.00
49	C	1,2-Dichloropropane	5.0000	5.0906	-1.8	100	0.00
50	T	1,4-Dioxane	100.0000	93.1064	6.9	100	0.00
51	T	Bromodichloromethane	5.0000	5.0248	-0.5	100	0.00
52	T	Dibromomethane	5.0000	5.2162	-4.3	100	0.00
53	T	2-Chloroethyl Vinyl Ether	5.0000	5.0404	-0.8	100	0.00
54	T	4-Methyl-2-Pentanone	5.0000	4.8674	2.7	100	0.00

(#) = Out of Range

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146227.D Vial: 7
Acq On : 5 Apr 2017 19:31 Operator: TMB
Sample : WG608938-06 5ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	5.0000	5.1061	-2.1	100	0.00
56	T	Dimethyl Disulfide	5.0000	4.5874	8.3	100	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	100	0.00
58	S	Toluene-d8	2.5000	2.5593	-2.4	100	0.00
59	C	Toluene	5.0000	5.0224	-0.4	100	0.00
60	T	Ethyl Methacrylate	5.0000	5.0167	-0.3	100	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	100	0.09
62	T	trans-1,3-Dichloropropene	5.0000	5.0741	-1.5	100	0.00
63	T	1,1,2-Trichloroethane	5.0000	5.1428	-2.9	100	0.00
64	T	2-Hexanone	5.0000	5.0332	-0.7	100	0.00
65	T	1,3-Dichloropropane	5.0000	5.0920	-1.8	100	0.00
66	T	Tetrachloroethene	5.0000	5.0579	-1.2	100	0.00
67	T	Dibromochloromethane	5.0000	4.9681	0.6	100	0.00
68	T	1,2-Dibromoethane	5.0000	4.9517	1.0	100	0.00
69	T	1-Chlorohexane	5.0000	4.9460	1.1	100	0.00
70	P	Chlorobenzene	5.0000	4.8810	2.4	100	0.00
71	T	1,1,1,2-Tetrachloroethane	5.0000	4.8433	3.1	100	0.00
72	C	Ethylbenzene	5.0000	4.8296	3.4	100	0.00
73	T	m-,p-Xylene	10.0000	9.8441	1.6	100	0.00
74	T	o-Xylene	5.0000	4.9026	1.9	100	0.00
75	T	Styrene	5.0000	4.9940	0.1	100	0.00
76	P	Bromoform	5.0000	4.8117	3.8	100	0.00
77	T	Isopropylbenzene	5.0000	5.0070	-0.1	100	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	5.0000	5.1767	-3.5	100	0.00
80	S	p-Bromofluorobenzene	2.5000	2.4017	3.9	100	0.00
81	T	1,2,3-Trichloropropane	5.0000	5.1225	-2.5	100	0.00
82	T	trans-1,4-Dichloro-2-Butene	5.0000	4.8867	2.3	100	0.00
83	T	n-Propylbenzene	5.0000	5.0817	-1.6	100	0.00
84	T	Bromobenzene	5.0000	4.9575	0.9	100	0.00
85	T	1,3,5-Trimethylbenzene	5.0000	4.9473	1.1	100	0.00
86	T	2-Chlorotoluene	5.0000	4.9558	0.9	100	0.00
87	T	4-Chlorotoluene	5.0000	4.9897	0.2	100	0.00
88	T	a-Methylstyrene	5.0000	4.8711	2.6	100	0.00
89	T	tert-Butylbenzene	5.0000	4.8393	3.2	100	0.00
90	T	1,2,4-Trimethylbenzene	5.0000	4.9821	0.4	100	0.00
91	T	sec-Butylbenzene	5.0000	5.0216	-0.4	100	0.00
92	T	p-Isopropyltoluene	5.0000	4.9391	1.2	100	0.00
93	T	1,3-Dichlorobenzene	5.0000	4.8495	3.0	100	0.00
94	T	1,4-Dichlorobenzene	5.0000	4.8577	2.8	100	0.00
95	T	n-Butylbenzene	5.0000	4.9668	0.7	100	0.00
96	T	1,2-Dichlorobenzene	5.0000	4.8863	2.3	100	0.00
97	T	1,2-Dibromo-3-Chloropropane	5.0000	5.1041	-2.1	100	0.00
98	T	1,2,4-Trichlorobenzene	5.0000	4.8067	3.9	100	0.00
99	T	Hexachlorobutadiene	5.0000	4.9642	0.7	100	0.00
100	T	Naphthalene	5.0000	5.0152	-0.3	100	0.00
101	T	1,2,3-Trichlorobenzene	5.0000	4.6970	6.1	100	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146227.D 8260BWT.M Thu Apr 06 15:03:02 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	627241	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	447577	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	235510	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	65613	10.2471	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 41.00%#				
43) 1,2-Dichloroethane-d4	10.84	65	64459	10.2142	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 40.84%#				
58) Toluene-d8	13.23	98	228384	9.9998	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 40.00%#				
80) p-Bromofluorobenzene	16.63	95	91659	10.2472	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 41.00%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	217664	21.8564	ug/L		93
3) Chloromethane	4.03	50	264881	22.3981	ug/L		99
4) Vinyl Chloride	4.29	62	233054	20.4810	ug/L		99
5) 1,3-Butadiene	4.33	54	106373	23.7613	ug/L		88
6) Bromomethane	5.24	94	98255	19.9988	ug/L		97
7) Chloroethane	5.40	64	103887	21.2191	ug/L		84
8) Trichlorofluoromethane	5.91	101	240343	20.6080	ug/L		99
9) Diethyl ether	6.44	59	380286	78.2436	ug/L		82
10) Isoprene	6.48	67	178379	18.5952	ug/L		80
11) Acrolein	6.68	56	20488	38.4767	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.71	101	132626	20.0893	ug/L		98
13) Acetone	6.78	43	28940	21.3811	ug/L		93
14) 1,1-Dichloroethene	7.01	61	195653	20.4603	ug/L		83
15) Tert-Butyl Alcohol	7.11	59	64817	154.3843	ug/L		90
16) Dimethyl Sulfide	7.28	62	130765	19.1371	ug/L		78
17) Iodomethane	7.54	142	98959	18.2438	ug/L		99
18) Methyl acetate	7.53	43	62843	18.5124	ug/L	#	82
19) Methylene Chloride	7.80	84	143369	19.8310	ug/L		60
20) Carbon Disulfide	7.86	76	390904	18.9942	ug/L		100
21) Acrylonitrile	7.96	53	63296	40.3559	ug/L		97
22) Methyl Tert Butyl Ether	8.01	73	330905	20.8726	ug/L		90
23) trans-1,2-Dichloroethene	8.25	96	138532	20.1290	ug/L		77
24) n-Hexane	8.33	57	145559	18.7032	ug/L		83
25) Diisopropyl ether	8.66	45	1403454	79.2147	ug/L	#	90
26) Vinyl Acetate	8.83	43	85023	17.2882	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	233405	20.4736	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1415029	78.8255	ug/L		91
29) 2-Butanone	9.41	43	34173	20.0320	ug/L	#	81
30) Propionitrile	9.52	54	43958	79.0122	ug/L		100
31) 2,2-Dichloropropane	9.65	77	149189	17.2012	ug/L		79
32) cis-1,2-Dichloroethene	9.71	96	151702	20.0499	ug/L		88
33) Chloroform	9.91	83	241705	18.6109	ug/L		94
34) 1-Bromopropane	10.06	122	28065	20.9166	ug/L		97
35) Bromochloromethane	10.15	130	85288	21.4135	ug/L		99
36) Tetrahydrofuran	10.18	42	86703	77.1792	ug/L	#	71
38) 1,1,1-Trichloroethane	10.45	97	212928	20.1661	ug/L		91
39) Cyclohexane	10.49	56	183893	18.8342	ug/L		77
40) 1,1-Dichloropropene	10.65	75	179871	20.1524	ug/L		81
41) Tert-Amyl-Methyl ether	10.75	73	1330159	78.0412	ug/L		93
42) Carbon Tetrachloride	10.80	117	176032	21.1436	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:03 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

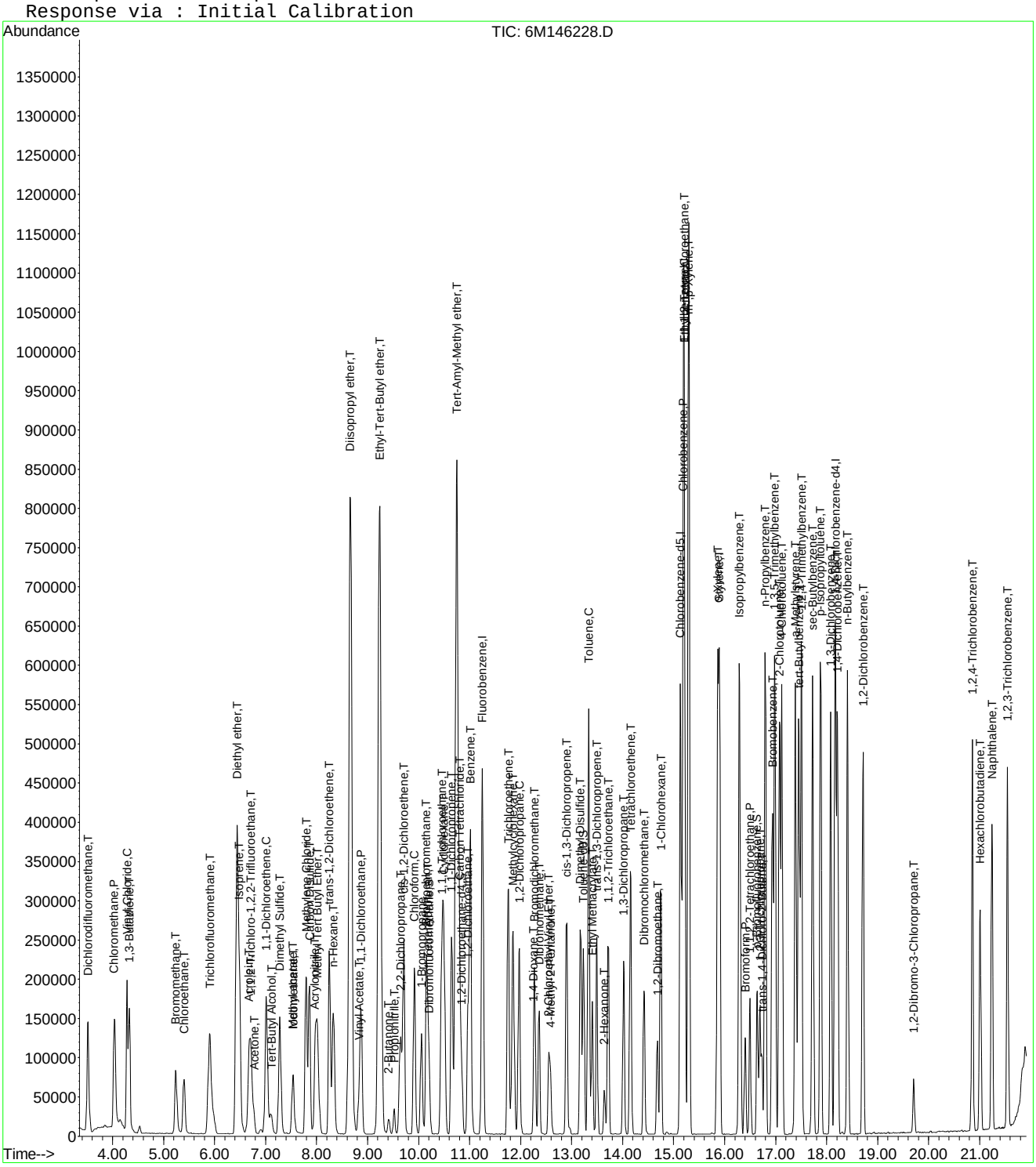
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	162109	20.0644	ug/L		89
46)	Benzene	11.02	78	529115	19.7158	ug/L		86
47)	Trichloroethene	11.76	130	150238	20.5667	ug/L		87
48)	Methylcyclohexane	11.85	83	197423	18.7059	ug/L		81
49)	1,2-Dichloropropane	11.98	63	131909	20.8268	ug/L		95
50)	1,4-Dioxane	12.25	88	7005	152.1084	ug/L		87
51)	Bromodichloromethane	12.27	83	185470	20.7439	ug/L		99
52)	Dibromomethane	12.36	93	77214	20.6995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	53194	21.4116	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	32212	19.7660	ug/L		82
55)	cis-1,3-Dichloropropene	12.90	75	206895	21.0133	ug/L		96
56)	Dimethyl Disulfide	13.17	79	112927	18.1801	ug/L		89
59)	Toluene	13.33	91	555221	19.8416	ug/L		100
60)	Ethyl Methacrylate	13.40	69	129462	19.1184	ug/L		71
62)	trans-1,3-Dichloropropene	13.50	75	176914	20.5042	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107303	20.3482	ug/L		99
64)	2-Hexanone	13.64	43	50259	19.8477	ug/L		85
65)	1,3-Dichloropropane	14.02	76	178966	20.2181	ug/L		71
66)	Tetrachloroethene	14.16	166	136246	20.0929	ug/L		96
67)	Dibromochloromethane	14.42	129	135202	20.7404	ug/L		99
68)	1,2-Dibromoethane	14.68	107	100778	19.9028	ug/L		98
69)	1-Chlorohexane	14.75	91	167924	18.5834	ug/L		76
70)	Chlorobenzene	15.18	112	374272	19.5421	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	138016	20.1228	ug/L		94
72)	Ethylbenzene	15.21	106	202068	19.4896	ug/L		96
73)	m-,p-Xylene	15.29	106	481680	38.8682	ug/L		93
74)	o-Xylene	15.87	106	239598	20.0353	ug/L		93
75)	Styrene	15.90	104	405734	20.2101	ug/L		95
76)	Bromoform	16.41	173	81039	20.4000	ug/L		99
77)	Isopropylbenzene	16.28	105	597096	19.9520	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	119591	19.4973	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	37129	20.4983	ug/L		64
82)	trans-1,4-Dichloro-2-Buten	16.73	53	24964	19.1666	ug/L	#	1
83)	n-Propylbenzene	16.80	91	713905	20.0209	ug/L		99
84)	Bromobenzene	16.94	156	161202	20.1236	ug/L		85
85)	1,3,5-Trimethylbenzene	16.98	105	501322	19.8384	ug/L		100
86)	2-Chlorotoluene	17.07	91	485880	20.4645	ug/L		97
87)	4-Chlorotoluene	17.12	91	386400	18.4139	ug/L		95
88)	a-Methylstyrene	17.39	118	257428	18.4215	ug/L		99
89)	tert-Butylbenzene	17.46	134	106931	20.1945	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	519993	20.0363	ug/L		87
91)	sec-Butylbenzene	17.72	105	621099	19.9306	ug/L		98
92)	p-Isopropyltoluene	17.88	119	523649	19.9759	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	301598	19.9362	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	300266	19.6272	ug/L		97
95)	n-Butylbenzene	18.41	91	473351	19.7747	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	282119	19.8957	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	22784	20.5074	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	203918	19.6545	ug/L		98
99)	Hexachlorobutadiene	21.01	225	76009	19.1810	ug/L		99
100)	Naphthalene	21.24	128	421214	20.2755	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	187267	18.6967	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146228.D 8260BWT.M Thu Apr 06 14:58:06 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146228.D Vial: 8
Acq On : 5 Apr 2017 20:02 Operator: TMB
Sample : WG608938-07 20ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.26	96	643185	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	452398	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	244954	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	166582	25.3710 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.48%		
43) 1,2-Dichloroethane-d4	10.85	65	162624	25.1306 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.52%		
58) Toluene-d8	13.24	98	572476	24.7988 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.20%		
80) p-Bromofluorobenzene	16.64	95	228722	24.5846 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 98.32%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	553692	54.2200 ug/L	93
3) Chloromethane	4.04	50	600762	50.5019 ug/L	96
4) Vinyl Chloride	4.28	62	580327	49.7355 ug/L	98
5) 1,3-Butadiene	4.32	54	226006	52.2463 ug/L	89
6) Bromomethane	5.24	94	282558	56.0861 ug/L	99
7) Chloroethane	5.40	64	261262	52.0405 ug/L	86
8) Trichlorofluoromethane	5.91	101	620646	51.8976 ug/L	99
9) Diethyl ether	6.44	59	492985	98.9169 ug/L	81
10) Isoprene	6.48	67	496738	50.4991 ug/L	80
11) Acrolein	6.67	56	27556	50.4676 ug/L	96
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	339922	50.2127 ug/L	99
13) Acetone	6.77	43	71305	51.3749 ug/L	91
14) 1,1-Dichloroethene	7.02	61	496978	50.6828 ug/L	82
15) Tert-Butyl Alcohol	7.11	59	73877	171.6018 ug/L	92
16) Dimethyl Sulfide	7.27	62	354958	50.6595 ug/L	78
17) Iodomethane	7.54	142	275688	48.2182 ug/L	99
18) Methyl acetate	7.53	43	172494	49.5541 ug/L #	83
19) Methylene Chloride	7.80	84	366519	49.4406 ug/L	58
20) Carbon Disulfide	7.86	76	1082478	51.2943 ug/L	99
21) Acrylonitrile	7.97	53	85120	52.9250 ug/L	99
22) Methyl Tert Butyl Ether	8.01	73	811828	49.9385 ug/L	90
23) trans-1,2-Dichloroethene	8.26	96	354872	50.2856 ug/L	76
24) n-Hexane	8.33	57	401945	50.3665 ug/L	84
25) Diisopropyl ether	8.66	45	1784496	98.2249 ug/L #	89
26) Vinyl Acetate	8.83	43	213738	42.3833 ug/L #	86
27) 1,1-Dichloroethane	8.87	63	581534	49.7460 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	1807267	98.1798 ug/L	90
29) 2-Butanone	9.42	43	84730	48.4371 ug/L #	77
30) Propionitrile	9.52	54	58459	102.4722 ug/L	99
31) 2,2-Dichloropropane	9.65	77	356297	40.0620 ug/L	78
32) cis-1,2-Dichloroethene	9.72	96	387448	49.9382 ug/L	85
33) Chloroform	9.92	83	612607	46.0004 ug/L	95
34) 1-Bromopropane	10.06	122	73633	53.5176 ug/L	100
35) Bromochloromethane	10.15	130	215507	52.7668 ug/L	100
36) Tetrahydrofuran	10.17	42	110912	96.2816 ug/L #	70
38) 1,1,1-Trichloroethane	10.46	97	545213	50.3562 ug/L	90
39) Cyclohexane	10.49	56	510981	51.0369 ug/L	77
40) 1,1-Dichloropropene	10.65	75	459189	50.1714 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	1722091	98.5314 ug/L	92
42) Carbon Tetrachloride	10.80	117	471043	55.1754 ug/L	99

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:08 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

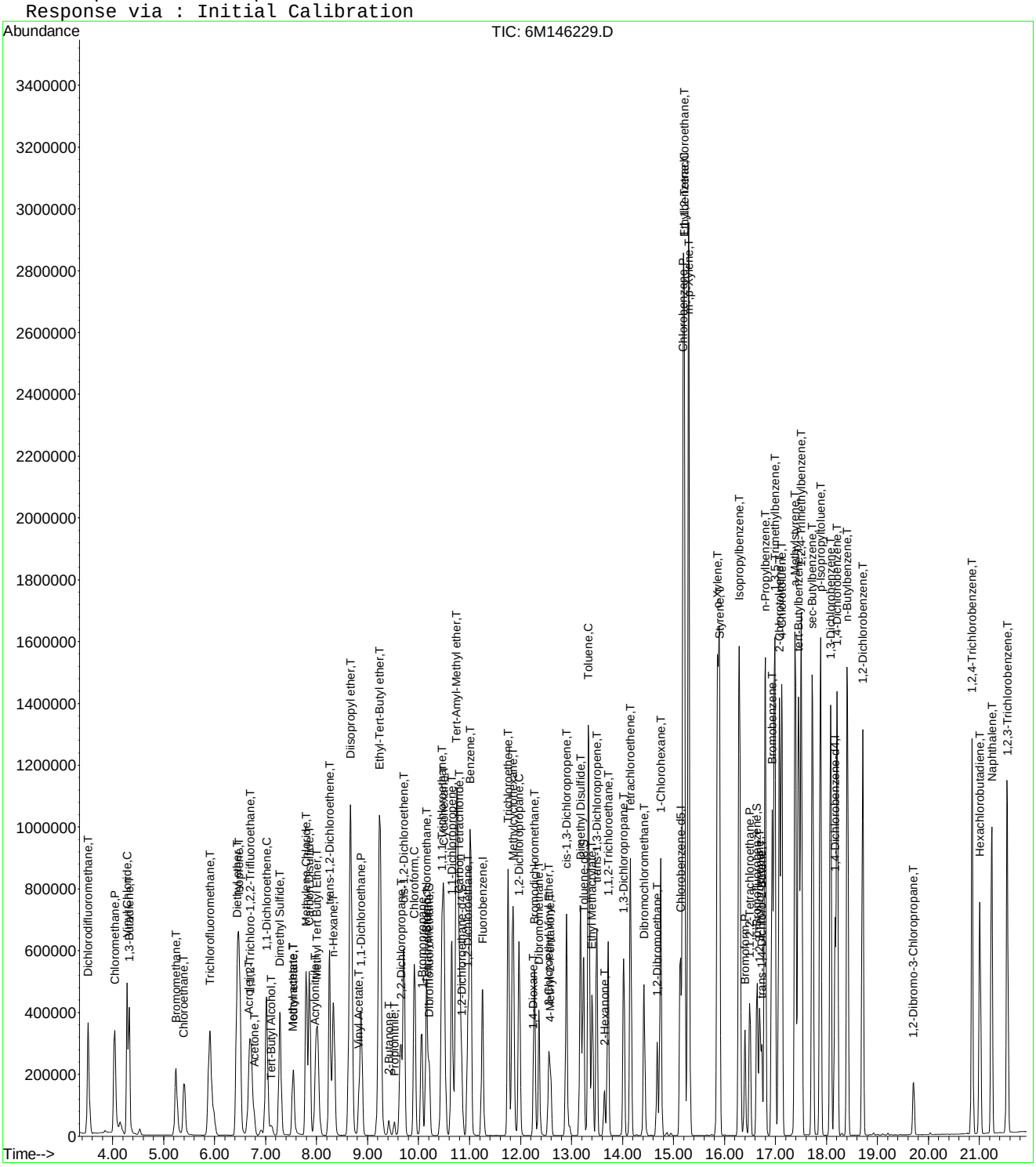
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	412436	49.7821	ug/L		89
46)	Benzene	11.01	78	1319158	47.9357	ug/L		87
47)	Trichloroethene	11.76	130	387869	51.7807	ug/L		87
48)	Methylcyclohexane	11.85	83	542828	50.1582	ug/L		81
49)	1,2-Dichloropropane	11.97	63	328985	50.6551	ug/L		93
50)	1,4-Dioxane	12.25	88	9841	208.3929	ug/L		83
51)	Bromodichloromethane	12.27	83	474501	51.7551	ug/L		99
52)	Dibromomethane	12.36	93	196449	51.3585	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	136743	53.6772	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	82093	49.1253	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	524104	51.9110	ug/L		95
56)	Dimethyl Disulfide	13.18	79	317578	49.8595	ug/L		90
59)	Toluene	13.33	91	1390320	49.1555	ug/L		99
60)	Ethyl Methacrylate	13.40	69	348973	50.9857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	449513	51.5430	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	269281	50.5203	ug/L		99
64)	2-Hexanone	13.65	43	126266	49.3321	ug/L		84
65)	1,3-Dichloropropane	14.02	76	449481	50.2374	ug/L		71
66)	Tetrachloroethene	14.16	166	348547	50.8542	ug/L		96
67)	Dibromochloromethane	14.42	129	344760	52.3235	ug/L		100
68)	1,2-Dibromoethane	14.68	107	258841	50.5741	ug/L		99
69)	1-Chlorohexane	14.75	91	464382	50.8434	ug/L		76
70)	Chlorobenzene	15.19	112	963037	49.7477	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	362017	52.2198	ug/L		100
72)	Ethylbenzene	15.21	106	525624	50.1565	ug/L		94
73)	m-,p-Xylene	15.30	106	1260386	100.6206	ug/L		93
74)	o-Xylene	15.86	106	613404	50.7466	ug/L		93
75)	Styrene	15.90	104	1057078	52.0932	ug/L		95
76)	Bromoform	16.40	173	214895	53.5191	ug/L		100
77)	Isopropylbenzene	16.29	105	1536873	50.8076	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	296759	46.5163	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	93220	49.4809	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	69453	51.2682	ug/L	#	1
83)	n-Propylbenzene	16.80	91	1831263	49.3764	ug/L		99
84)	Bromobenzene	16.93	156	411541	49.3938	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	1296579	49.3302	ug/L		99
86)	2-Chlorotoluene	17.08	91	1170064	47.3812	ug/L		97
87)	4-Chlorotoluene	17.12	91	1072560	49.1422	ug/L		95
88)	a-Methylstyrene	17.38	118	716903	49.3235	ug/L		100
89)	tert-Butylbenzene	17.46	134	276611	50.2256	ug/L		89
90)	1,2,4-Trimethylbenzene	17.51	105	1344827	49.8208	ug/L		86
91)	sec-Butylbenzene	17.72	105	1604756	49.5099	ug/L		98
92)	p-Isopropyltoluene	17.88	119	1361479	49.9346	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	771343	49.0216	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	773205	48.5928	ug/L		98
95)	n-Butylbenzene	18.41	91	1242193	49.8932	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	721223	48.9013	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.70	75	58274	50.4290	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	530769	49.1854	ug/L		99
99)	Hexachlorobutadiene	21.01	225	200495	48.6445	ug/L		100
100)	Naphthalene	21.24	128	1087303	50.3204	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	486226	46.6732	ug/L		100

(#) = qualifier out of range (m) = manual integration
6M146229.D 8260BWT.M Thu Apr 06 14:58:10 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146229.D Vial: 9
Acq On : 5 Apr 2017 20:34 Operator: TMB
Sample : WG608938-08 50ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	664065	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	468638	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	250611	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	341745	50.4124 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 201.64%#		
43) 1,2-Dichloroethane-d4	10.85	65	335061	50.1496 ug/L	0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 200.60%#		
58) Toluene-d8	13.23	98	1165336	48.7313 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 194.92%#		
80) p-Bromofluorobenzene	16.64	95	452319	47.5209 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 190.08%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	1092279	103.5976 ug/L	93
3) Chloromethane	4.04	50	1229045	100.8473 ug/L	98
4) Vinyl Chloride	4.27	62	967994	80.3511 ug/L	98
5) 1,3-Butadiene	4.32	54	358708	83.9572 ug/L	89
6) Bromomethane	5.23	94	557041	107.0928 ug/L	99
7) Chloroethane	5.40	64	501046	96.6647 ug/L	86
8) Trichlorofluoromethane	5.90	101	1280944	103.7431 ug/L	99
9) Diethyl ether	6.44	59	1046407	203.3587 ug/L	80
10) Isoprene	6.48	67	1028447	101.2660 ug/L	80
11) Acrolein	6.67	56	60742	107.7484 ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	703798	100.6949 ug/L	99
13) Acetone	6.78	43	140983	98.3836 ug/L	90
14) 1,1-Dichloroethene	7.01	61	1000191	98.7943 ug/L	81
15) Tert-Butyl Alcohol	7.11	59	188168	423.3346 ug/L	91
16) Dimethyl Sulfide	7.28	62	716529	99.0473 ug/L	78
17) Iodomethane	7.54	142	665529	111.6922 ug/L	98
18) Methyl acetate	7.53	43	370733	103.1554 ug/L #	80
19) Methylene Chloride	7.80	84	728236	95.1448 ug/L	58
20) Carbon Disulfide	7.86	76	2173570	99.7583 ug/L	99
21) Acrylonitrile	7.97	53	179187	107.9098 ug/L	100
22) Methyl Tert Butyl Ether	8.01	73	1646227	98.0813 ug/L	91
23) trans-1,2-Dichloroethene	8.25	96	720013	98.8182 ug/L	75
24) n-Hexane	8.33	57	825655	100.2073 ug/L	84
25) Diisopropyl ether	8.66	45	3713047	197.9529 ug/L #	89
26) Vinyl Acetate	8.83	43	615132	118.1426 ug/L #	85
27) 1,1-Dichloroethane	8.87	63	1179111	97.6929 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	3847795	202.4591 ug/L	90
29) 2-Butanone	9.41	43	187675	103.9136 ug/L #	77
30) Propionitrile	9.52	54	123101	208.9977 ug/L	100
31) 2,2-Dichloropropane	9.64	77	930942	101.3837 ug/L	78
32) cis-1,2-Dichloroethene	9.71	96	791312	98.7853 ug/L	87
33) Chloroform	9.92	83	1229915	89.4500 ug/L	95
34) 1-Bromopropane	10.06	122	153107	107.7815 ug/L	99
35) Bromochloromethane	10.16	130	453837	107.6278 ug/L	99
36) Tetrahydrofuran	10.18	42	239360	201.2527 ug/L #	68
38) 1,1,1-Trichloroethane	10.45	97	1128754	100.9745 ug/L	90
39) Cyclohexane	10.49	56	1047823	101.3662 ug/L	76
40) 1,1-Dichloropropene	10.65	75	936238	99.0778 ug/L	81
41) Tert-Amyl-Methyl ether	10.75	73	3710771	205.6403 ug/L	92
42) Carbon Tetrachloride	10.80	117	1002331	113.7160 ug/L	100

(#) = qualifier out of range (m) = manual integration

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:12 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

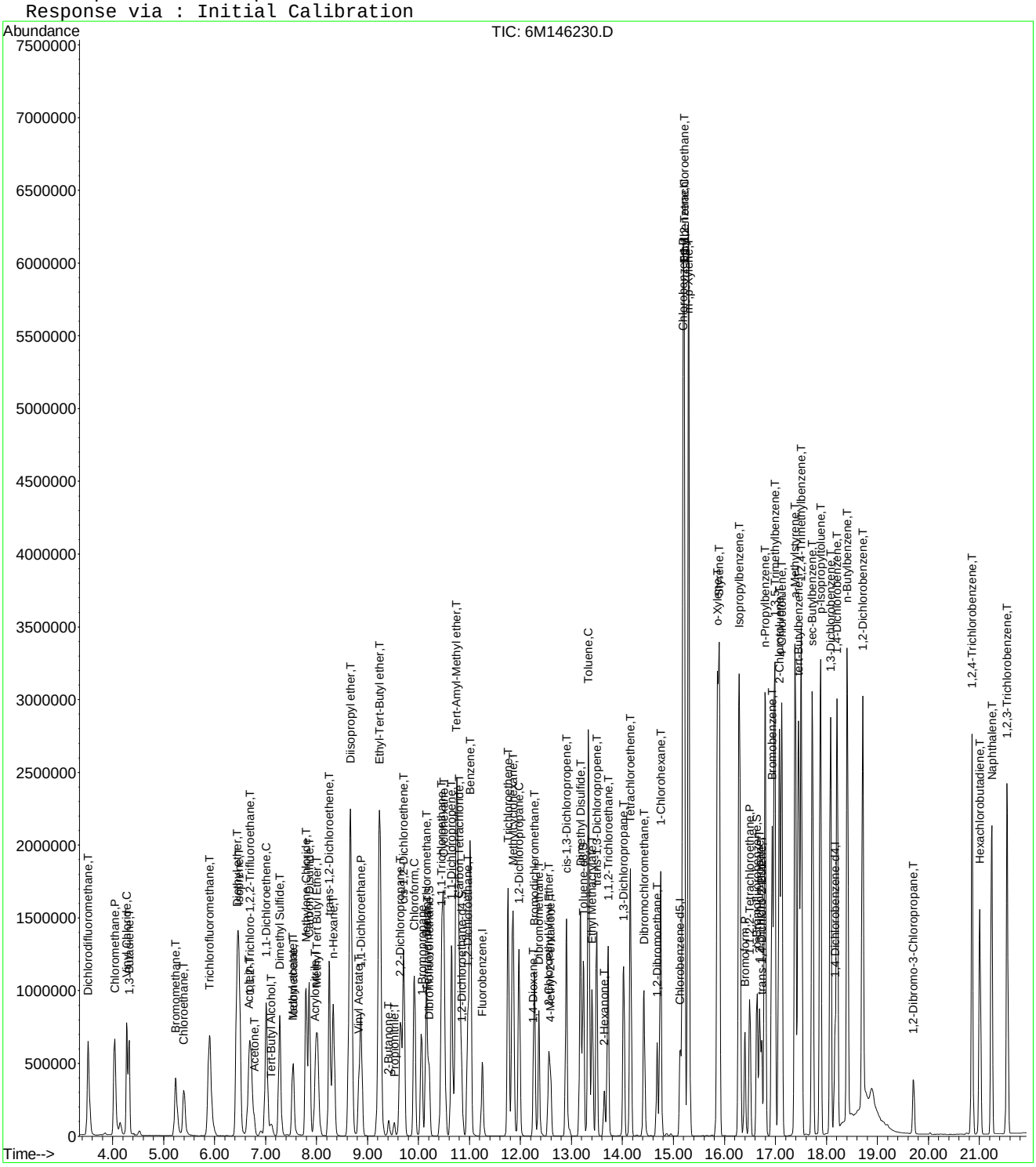
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	848725	99.2223	ug/L		88
46)	Benzene	11.01	78	2675533	94.1668	ug/L		87
47)	Trichloroethene	11.76	130	775075	100.2194	ug/L		86
48)	Methylcyclohexane	11.85	83	1124227	100.6142	ug/L		81
49)	1,2-Dichloropropane	11.97	63	661802	98.6962	ug/L		92
50)	1,4-Dioxane	12.25	88	21047	431.6772	ug/L		82
51)	Bromodichloromethane	12.27	83	965686	102.0182	ug/L		100
52)	Dibromomethane	12.36	93	405664	102.7198	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.56	63	290699	110.5233	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	180197	104.4413	ug/L		81
55)	cis-1,3-Dichloropropene	12.90	75	1085875	104.1711	ug/L		95
56)	Dimethyl Disulfide	13.18	79	668834	101.7047	ug/L		90
59)	Toluene	13.33	91	2831304	96.6334	ug/L		99
60)	Ethyl Methacrylate	13.40	69	750754	105.8857	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	942608	104.3378	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	558224	101.1002	ug/L		99
64)	2-Hexanone	13.64	43	274093	103.3770	ug/L		83
65)	1,3-Dichloropropane	14.03	76	927364	100.0574	ug/L		71
66)	Tetrachloroethene	14.16	166	715953	100.8400	ug/L		95
67)	Dibromochloromethane	14.42	129	727778	106.6258	ug/L		100
68)	1,2-Dibromoethane	14.68	107	543243	102.4642	ug/L		99
69)	1-Chlorohexane	14.75	91	954085	100.8392	ug/L		75
70)	Chlorobenzene	15.19	112	2008196	100.1428	ug/L		94
71)	1,1,1,2-Tetrachloroethane	15.21	131	774570	107.8575	ug/L		100
72)	Ethylbenzene	15.21	106	1116135	102.8139	ug/L		91
73)	m-,p-Xylene	15.29	106	2626638	202.4261	ug/L		89
74)	o-Xylene	15.86	106	1232018	98.3922	ug/L		94
75)	Styrene	15.89	104	2150597	102.3095	ug/L		96
76)	Bromoform	16.40	173	448000	107.7070	ug/L		99
77)	Isopropylbenzene	16.29	105	3046400	97.2211	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.50	83	638495	97.8234	ug/L		99
81)	1,2,3-Trichloropropane	16.69	110	193544	100.4136	ug/L	#	54
82)	trans-1,4-Dichloro-2-Buten	16.73	53	151702	109.4542	ug/L	#	1
83)	n-Propylbenzene	16.79	91	3593480	94.7040	ug/L		98
84)	Bromobenzene	16.94	156	823903	96.6540	ug/L		85
85)	1,3,5-Trimethylbenzene	16.99	105	2597441	96.5926	ug/L		99
86)	2-Chlorotoluene	17.08	91	2351484	93.0729	ug/L		97
87)	4-Chlorotoluene	17.12	91	2098144	93.9621	ug/L		95
88)	a-Methylstyrene	17.39	118	1476708	99.3054	ug/L		99
89)	tert-Butylbenzene	17.46	134	556423	98.7517	ug/L		90
90)	1,2,4-Trimethylbenzene	17.51	105	2720771	98.5191	ug/L		86
91)	sec-Butylbenzene	17.72	105	3204852	96.6442	ug/L		99
92)	p-Isopropyltoluene	17.89	119	2766683	99.1824	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	1563276	97.1091	ug/L		98
94)	1,4-Dichlorobenzene	18.21	146	1568190	96.3298	ug/L		98
95)	n-Butylbenzene	18.41	91	2566638	100.7630	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	1480882	98.1422	ug/L		96
97)	1,2-Dibromo-3-Chloropropan	19.70	75	128198	108.4355	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	1094628	99.1474	ug/L		100
99)	Hexachlorobutadiene	21.01	225	409810	97.1846	ug/L		99
100)	Naphthalene	21.25	128	2294953	103.8129	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	1006776	94.4596	ug/L		100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146230.D Vial: 10
Acq On : 5 Apr 2017 21:06 Operator: TMB
Sample : WG608938-09 100ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	690233	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.14	117	498674	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	255138	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	723475	102.6772 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 410.72%#		
43) 1,2-Dichloroethane-d4	10.85	65	702452	101.1521 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 404.60%#		
58) Toluene-d8	13.24	98	2516915	98.9113 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 395.64%#		
80) p-Bromofluorobenzene	16.64	95	966850	99.7755 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 399.12%#		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.52	85	2275311	207.6213 ug/L	93
3) Chloromethane	4.04	50	2474245	196.0665 ug/L	98
4) Vinyl Chloride	4.27	62	2319895	185.2689 ug/L	98
5) 1,3-Butadiene	4.31	54	816680	218.8754 ug/L	89
6) Bromomethane	5.23	94	1250039	231.2125 ug/L	99
7) Chloroethane	5.40	64	1064300	197.5465 ug/L	86
8) Trichlorofluoromethane	5.90	101	2718616	211.8320 ug/L	99
9) Diethyl ether	6.44	59	4640	0.8676 ug/L #	53
10) Isoprene	6.48	67	2127378	201.5306 ug/L	80
11) Acrolein	6.67	56	9706	16.5644 ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	1494747	205.7510 ug/L	99
13) Acetone	6.77	43	308579	207.1749 ug/L	90
14) 1,1-Dichloroethene	7.01	61	2162367	205.4912 ug/L	81
15) Tert-Butyl Alcohol	7.12	59	25996	56.2677 ug/L	92
16) Dimethyl Sulfide	7.27	62	1547256	205.7718 ug/L	78
17) Iodomethane	7.54	142	1235435	198.8594 ug/L	98
18) Methyl acetate	7.53	43	780560	208.9546 ug/L #	80
19) Methylene Chloride	7.80	84	1587097	199.4946 ug/L	58
20) Carbon Disulfide	7.86	76	4648119	205.2426 ug/L	98
21) Acrylonitrile	8.01	53	30991	17.9558 ug/L #	37
22) Methyl Tert Butyl Ether	8.01	73	3211564	184.0891 ug/L	91
23) trans-1,2-Dichloroethene	8.24	96	1562245	206.2818 ug/L	75
24) n-Hexane	8.33	57	1747043	203.9948 ug/L	84
25) Diisopropyl ether	8.66	45	2991	0.1534 ug/L #	78
26) Vinyl Acetate	8.83	43	1230567	227.3831 ug/L #	84
27) 1,1-Dichloroethane	8.87	63	2550945	203.3406 ug/L	98
28) Ethyl-Tert-Butyl ether	9.24	59	7221	0.3655 ug/L	93
29) 2-Butanone	9.42	43	378724	201.7454 ug/L #	77
30) Propionitrile	9.52	54	2541	4.1505 ug/L #	56
31) 2,2-Dichloropropane	9.64	77	1886252	197.6333 ug/L	77
32) cis-1,2-Dichloroethene	9.72	96	1724251	207.0903 ug/L	86
33) Chloroform	9.92	83	2655020	185.7753 ug/L	95
34) 1-Bromopropane	10.06	122	290747	196.9152 ug/L	99
35) Bromochloromethane	10.15	130	939086	214.2618 ug/L	100
36) Tetrahydrofuran	10.18	42	5089	4.1166 ug/L	86
38) 1,1,1-Trichloroethane	10.46	97	2469058	212.4998 ug/L	89
39) Cyclohexane	10.49	56	2270992	211.3662 ug/L #	75
40) 1,1-Dichloropropene	10.64	75	2000053	203.6322 ug/L	80
41) Tert-Amyl-Methyl ether	10.75	73	11602	0.6186 ug/L	88
42) Carbon Tetrachloride	10.80	117	1931578	210.8325 ug/L	99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:16 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

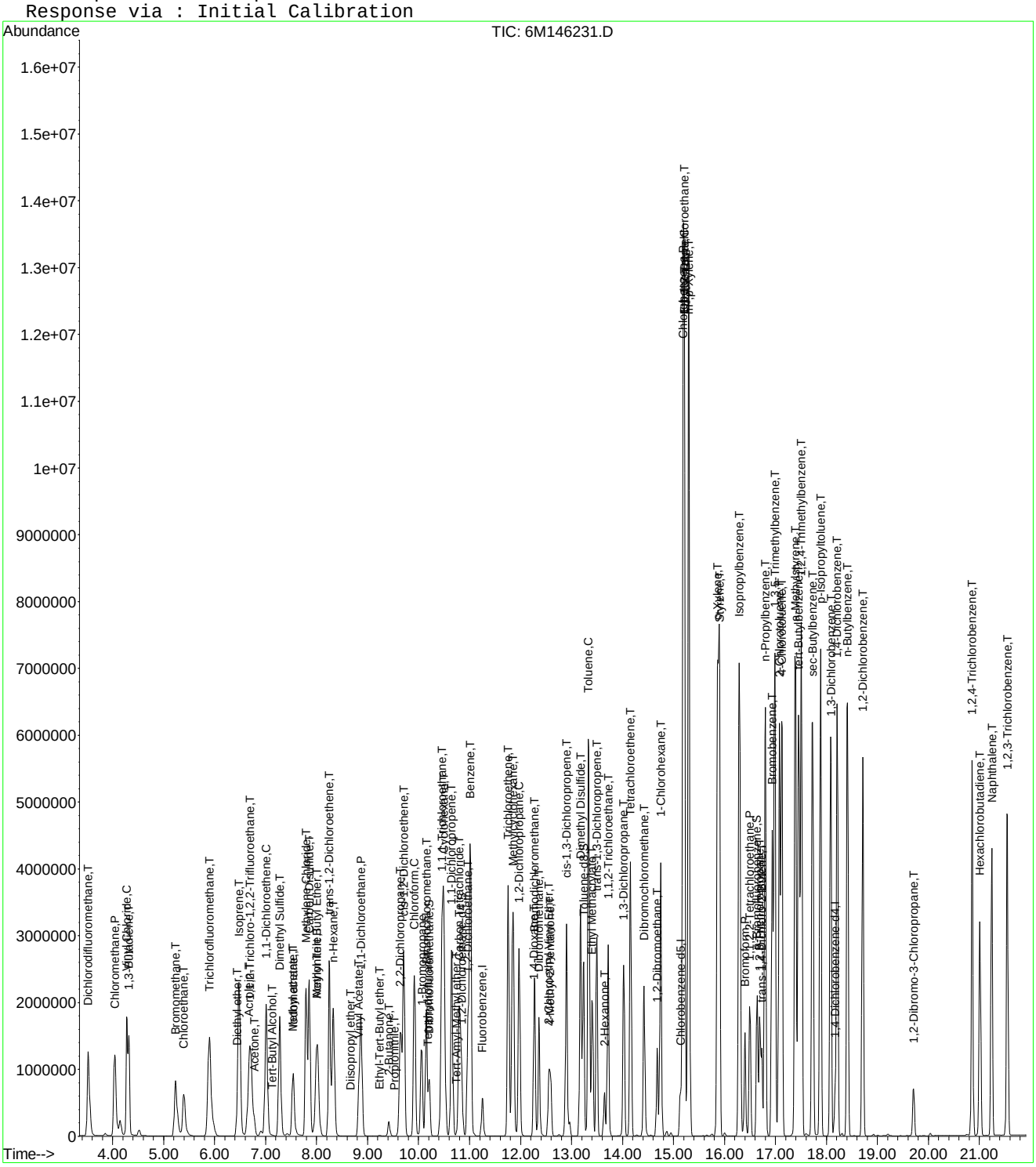
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	1796420	202.0529	ug/L		88
46)	Benzene	11.01	78	5629098	190.6080	ug/L		88
47)	Trichloroethene	11.76	130	1658935	206.3727	ug/L		87
48)	Methylcyclohexane	11.85	83	2386424	205.4792	ug/L		81
49)	1,2-Dichloropropane	11.97	63	1424092	204.3268	ug/L		91
50)	1,4-Dioxane	12.26	88	5637	111.2325	ug/L	#	42
51)	Bromodichloromethane	12.27	83	2075418	210.9415	ug/L		100
52)	Dibromomethane	12.36	93	844625	205.7626	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	484387	177.1812	ug/L		98
54)	4-Methyl-2-Pentanone	12.58	58	361541	201.6031	ug/L		79
55)	cis-1,3-Dichloropropene	12.90	75	2281875	210.6076	ug/L		95
56)	Dimethyl Disulfide	13.18	79	1458790	213.4177	ug/L		90
59)	Toluene	13.33	91	5996618	192.3392	ug/L		96
60)	Ethyl Methacrylate	13.40	69	1573548	208.5646	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	1986746	206.6682	ug/L		95
63)	1,1,2-Trichloroethane	13.72	97	1198048	203.9100	ug/L		99
64)	2-Hexanone	13.65	43	554015	196.3669	ug/L		83
65)	1,3-Dichloropropane	14.02	76	1969579	199.7070	ug/L		71
66)	Tetrachloroethene	14.16	166	1553218	205.5897	ug/L		94
67)	Dibromochloromethane	14.42	129	1570999	216.3018	ug/L		99
68)	1,2-Dibromoethane	14.68	107	1128869	200.0979	ug/L		100
69)	1-Chlorohexane	14.75	91	2077549	206.3548	ug/L		76
70)	Chlorobenzene	15.19	112	4552595	213.3503	ug/L		97
71)	1,1,1,2-Tetrachloroethane	15.21	131	1778263	232.7054	ug/L		99
72)	Ethylbenzene	15.21	106	2629830	227.6583	ug/L		78
73)	m-,p-Xylene	15.30	106	5831651	422.3560	ug/L		72
74)	o-Xylene	15.86	106	2806681	210.6481	ug/L		89
75)	Styrene	15.90	104	4761074	212.8544	ug/L		99
76)	Bromoform	16.40	173	946995	213.9608	ug/L		98
77)	Isopropylbenzene	16.29	105	6429037	192.8147	ug/L		96
79)	1,1,2,2-Tetrachloroethane	16.50	83	1322669	199.0497	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	401464	204.5900	ug/L		56
82)	trans-1,4-Dichloro-2-Buten	16.73	53	305769	216.7003	ug/L	#	1
83)	n-Propylbenzene	16.80	91	7135293	184.7099	ug/L		94
84)	Bromobenzene	16.93	156	1779598	205.0645	ug/L		84
85)	1,3,5-Trimethylbenzene	16.99	105	5473541	199.9363	ug/L		97
86)	2-Chlorotoluene	17.08	91	4805990	186.8483	ug/L		96
87)	4-Chlorotoluene	17.12	91	4663827	205.1564	ug/L		94
88)	a-Methylstyrene	17.39	118	3146362	207.8317	ug/L		99
89)	tert-Butylbenzene	17.46	134	1201485	209.4513	ug/L		81
90)	1,2,4-Trimethylbenzene	17.51	105	5700578	202.7553	ug/L		82
91)	sec-Butylbenzene	17.73	105	6486144	192.1230	ug/L		99
92)	p-Isopropyltoluene	17.88	119	5687835	200.2844	ug/L		98
93)	1,3-Dichlorobenzene	18.09	146	3282192	200.2687	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	3295686	198.8532	ug/L		96
95)	n-Butylbenzene	18.42	91	5169144	199.3335	ug/L		98
96)	1,2-Dichlorobenzene	18.71	146	3028833	197.1676	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.71	75	238291	197.9807	ug/L		91
98)	1,2,4-Trichlorobenzene	20.86	180	2255491	200.6692	ug/L		99
99)	Hexachlorobutadiene	21.01	225	836245	194.7931	ug/L		99
100)	Naphthalene	21.24	128	4440092	197.2852	ug/L		98
101)	1,2,3-Trichlorobenzene	21.55	180	2031369	187.2092	ug/L		99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146231.D Vial: 11
Acq On : 5 Apr 2017 21:37 Operator: TMB
Sample : WG608938-10 200ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	670280	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	474156	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	251420	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	1065288	155.6886	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 622.76%#				
43) 1,2-Dichloroethane-d4	10.84	65	1022057	151.5559	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 606.24%#				
58) Toluene-d8	13.23	98	3651048	150.9004	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 603.60%#				
80) p-Bromofluorobenzene	16.64	95	1466208	153.5450	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 614.20%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	3198	0.3005	ug/L	#	64
3) Chloromethane	4.02	50	124029	9.3687	ug/L		97
4) Vinyl Chloride	4.27	62	2879	0.2368	ug/L		96
5) 1,3-Butadiene	4.31	54	952750	291.3161	ug/L		90
6) Bromomethane	5.21	94	256997	48.9503	ug/L		98
8) Trichlorofluoromethane	5.89	101	1832	0.1470	ug/L	#	92
9) Diethyl ether	6.44	59	1626336	313.1315	ug/L		80
10) Isoprene	6.47	67	3326056	324.4632	ug/L		81
11) Acrolein	6.67	56	83031	145.9205	ug/L		96
12) 1,1,2-Trichloro-1,2,2-Trif	6.68	101	1896	0.2688	ug/L	#	63
13) Acetone	6.78	43	359192	248.3344	ug/L		88
14) 1,1-Dichloroethene	7.01	61	2982	0.2918	ug/L		94
15) Tert-Butyl Alcohol	7.12	59	274170	611.1000	ug/L		90
16) Dimethyl Sulfide	7.28	62	2259113	309.3863	ug/L		78
17) Iodomethane	7.53	142	1774336	293.7287	ug/L		98
18) Methyl acetate	7.53	43	1146284	315.9929	ug/L	#	79
19) Methylene Chloride	7.79	84	3453	0.4470	ug/L		74
20) Carbon Disulfide	7.85	76	6560949	298.3296	ug/L		98
21) Acrylonitrile	7.97	53	242452	144.6554	ug/L		93
22) Methyl Tert Butyl Ether	8.02	73	17659	1.0424	ug/L	#	49
23) trans-1,2-Dichloroethene	8.25	96	3508	0.4770	ug/L		84
24) n-Hexane	8.33	57	2563085	308.1896	ug/L		84
25) Diisopropyl ether	8.66	45	5624093	297.0560	ug/L	#	88
26) Vinyl Acetate	8.83	43	1560345	296.9020	ug/L	#	86
27) 1,1-Dichloroethane	8.87	63	1658	0.1361	ug/L	#	43
28) Ethyl-Tert-Butyl ether	9.24	59	5792489	301.9568	ug/L		90
29) 2-Butanone	9.41	43	537846	295.0381	ug/L	#	77
30) Propionitrile	9.52	54	181548	305.3695	ug/L		99
32) cis-1,2-Dichloroethene	9.71	96	2592	0.3206	ug/L		71
33) Chloroform	9.91	83	3316	0.2389	ug/L	#	81
34) 1-Bromopropane	10.05	122	479000	334.0712	ug/L		100
35) Bromochloromethane	10.16	130	2635	0.6191	ug/L		93
36) Tetrahydrofuran	10.18	42	348793	290.5441	ug/L	#	69
39) Cyclohexane	10.49	56	3263442	312.7774	ug/L		77
40) 1,1-Dichloropropene	10.65	75	3347	0.3509	ug/L	#	34
41) Tert-Amyl-Methyl ether	10.75	73	5509448	302.4868	ug/L		92
45) 1,2-Dichloroethane	10.96	62	6370	0.7378	ug/L	#	78
46) Benzene	11.01	78	5876	0.2049	ug/L	#	70
47) Trichloroethene	11.75	130	2541	0.3255	ug/L		78
48) Methylcyclohexane	11.85	83	3537517	313.6594	ug/L		81

(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:22 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 14:58:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

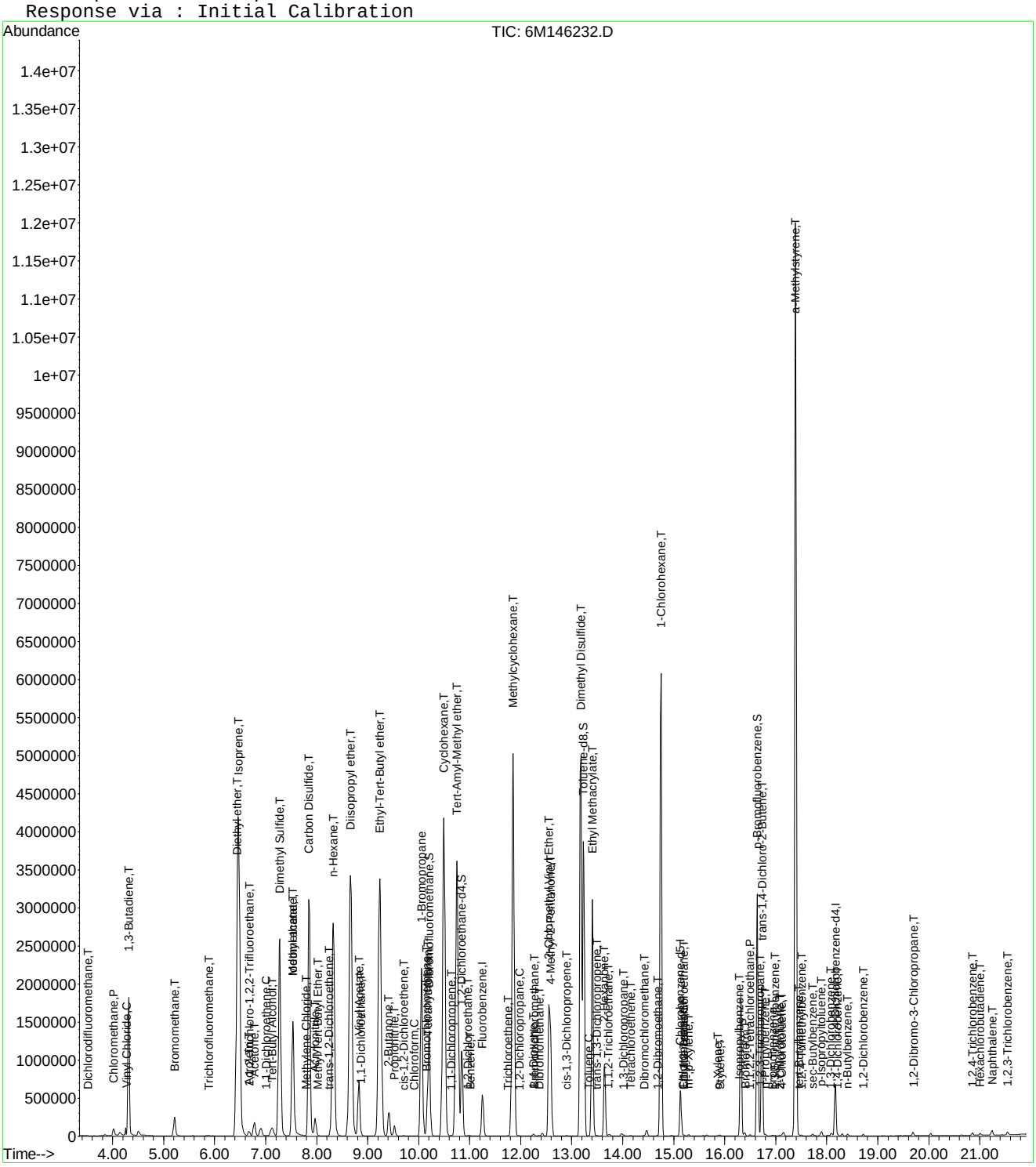
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
49)	1,2-Dichloropropane	11.97	63	846	0.1250	ug/L	#	35
50)	1,4-Dioxane	12.25	88	29442	598.2608	ug/L		83
51)	Bromodichloromethane	12.27	83	2460	0.2575	ug/L		95
52)	Dibromomethane	12.36	93	4528	1.1359	ug/L		94
53)	2-Chloroethyl Vinyl Ether	12.56	63	864405	325.5982	ug/L		99
54)	4-Methyl-2-Pentanone	12.59	58	524164	300.9860	ug/L		80
55)	cis-1,3-Dichloropropene	12.90	75	4329	0.4114	ug/L		88
56)	Dimethyl Disulfide	13.18	79	2174908	327.6559	ug/L		91
59)	Toluene	13.33	91	8304	0.2801	ug/L		97
60)	Ethyl Methacrylate	13.40	69	2284715	318.4843	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	8074	0.8833	ug/L		92
63)	1,1,2-Trichloroethane	13.72	97	5984	1.0712	ug/L		96
64)	2-Hexanone	13.64	43	803768	299.6215	ug/L		83
65)	1,3-Dichloropropane	14.02	76	10167	1.0842	ug/L		86
66)	Tetrachloroethene	14.16	166	2501	0.3482	ug/L		97
67)	Dibromochloromethane	14.42	129	5257	0.7612	ug/L		98
68)	1,2-Dibromoethane	14.68	107	7804	1.4548	ug/L		95
69)	1-Chlorohexane	14.75	91	3093710	323.1754	ug/L		77
70)	Chlorobenzene	15.18	112	6402	0.3155	ug/L		89
71)	1,1,1,2-Tetrachloroethane	15.20	131	1051	0.1446	ug/L	#	24
72)	Ethylbenzene	15.20	106	2758	0.2511	ug/L		82
73)	m-,p-Xylene	15.29	106	7899	0.6017	ug/L		94
74)	o-Xylene	15.86	106	2490	0.1965	ug/L		71
75)	Styrene	15.90	104	7614	0.3580	ug/L		91
76)	Bromoform	16.41	173	6944	1.6500	ug/L		95
77)	Isopropylbenzene	16.28	105	23768	0.7497	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.50	83	12720	1.9426	ug/L		97
81)	1,2,3-Trichloropropane	16.69	110	5207	2.6928	ug/L	#	1
82)	trans-1,4-Dichloro-2-Buten	16.73	53	468972	337.2782	ug/L	#	50
83)	n-Propylbenzene	16.79	91	25834	0.6786	ug/L		98
84)	Bromobenzene	16.94	156	4350	0.5087	ug/L		80
85)	1,3,5-Trimethylbenzene	16.99	105	9549	0.3540	ug/L		94
86)	2-Chlorotoluene	17.08	91	10250	0.4044	ug/L		85
87)	4-Chlorotoluene	17.12	91	10678	0.4767	ug/L		93
88)	a-Methylstyrene	17.39	118	4860473	325.8044	ug/L		98
89)	tert-Butylbenzene	17.46	134	3329	0.5889	ug/L	#	1
90)	1,2,4-Trimethylbenzene	17.51	105	10602	0.3827	ug/L		84
91)	sec-Butylbenzene	17.72	105	27629	0.8305	ug/L		96
92)	p-Isopropyltoluene	17.89	119	16184	0.5783	ug/L		93
93)	1,3-Dichlorobenzene	18.08	146	10117	0.6264	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	11412	0.6988	ug/L		90
95)	n-Butylbenzene	18.41	91	21424	0.8384	ug/L		95
96)	1,2-Dichlorobenzene	18.71	146	10357	0.6842	ug/L		99
97)	1,2-Dibromo-3-Chloropropan	19.70	75	4375	3.6887	ug/L		97
98)	1,2,4-Trichlorobenzene	20.86	180	14842	1.3400	ug/L		97
99)	Hexachlorobutadiene	21.01	225	8098	1.9142	ug/L		93
100)	Naphthalene	21.25	128	71843	3.2394	ug/L		99
101)	1,2,3-Trichlorobenzene	21.54	180	18787	1.7570	ug/L		95

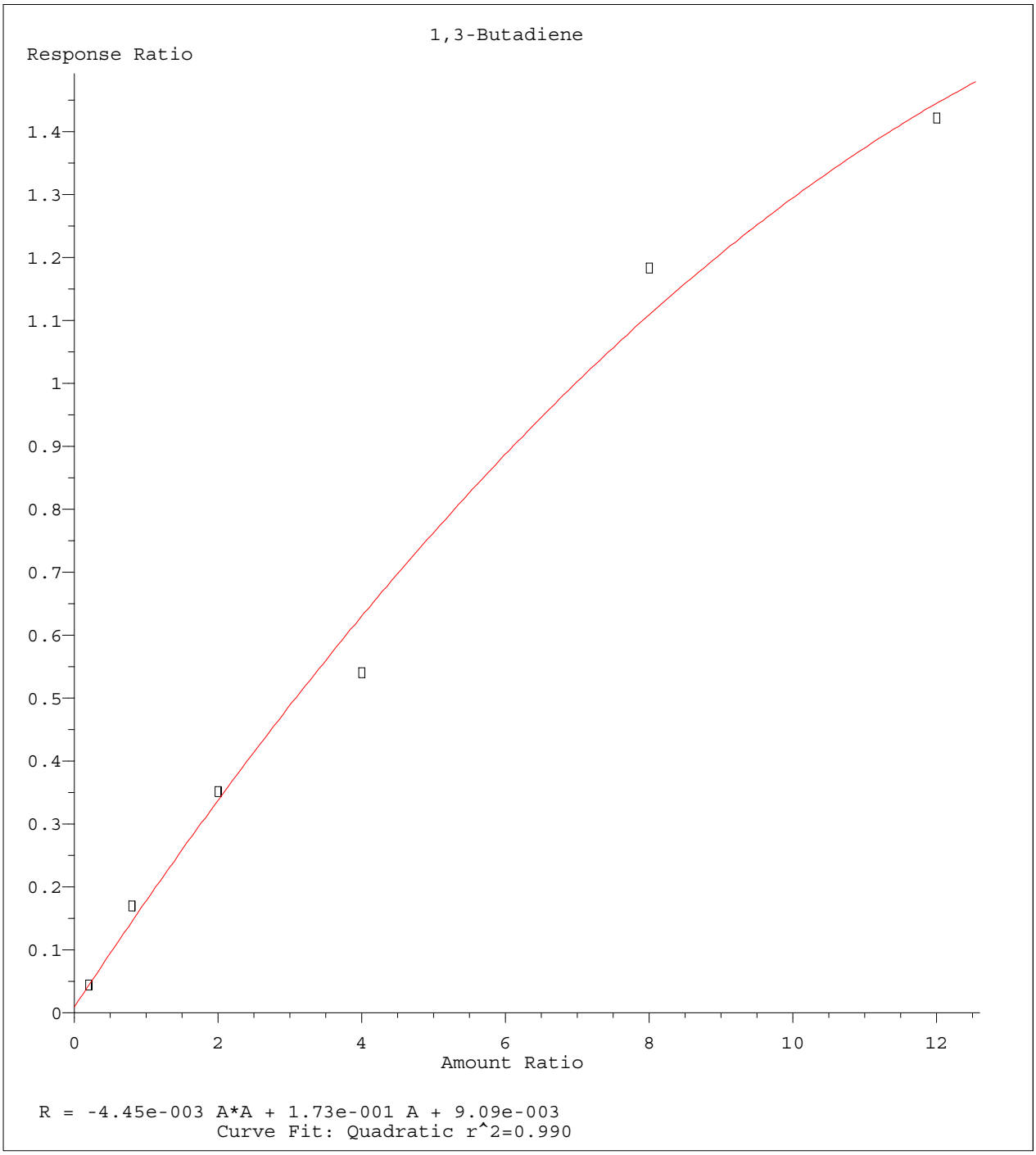
(#) = qualifier out of range (m) = manual integration
6M146232.D 8260BWT.M Thu Apr 06 14:58:23 2017 Page 2

Quantitation Report (Not Reviewed)

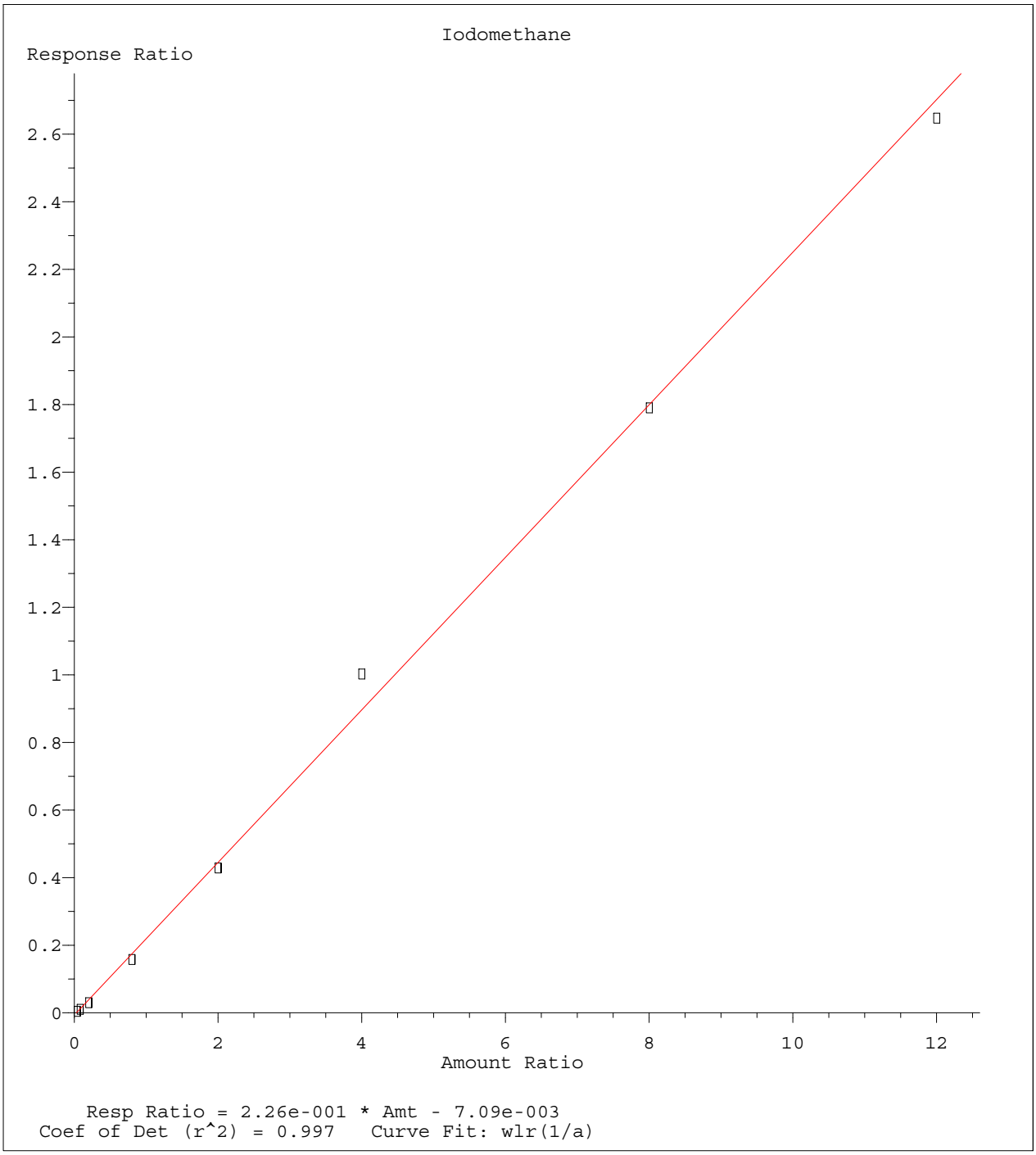
Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146232.D Vial: 12
Acq On : 5 Apr 2017 22:09 Operator: TMB
Sample : WG608938-11 300ug/L STD 8260 Inst : Hpms6
Misc : 1,1 STD81194 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 14:58 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

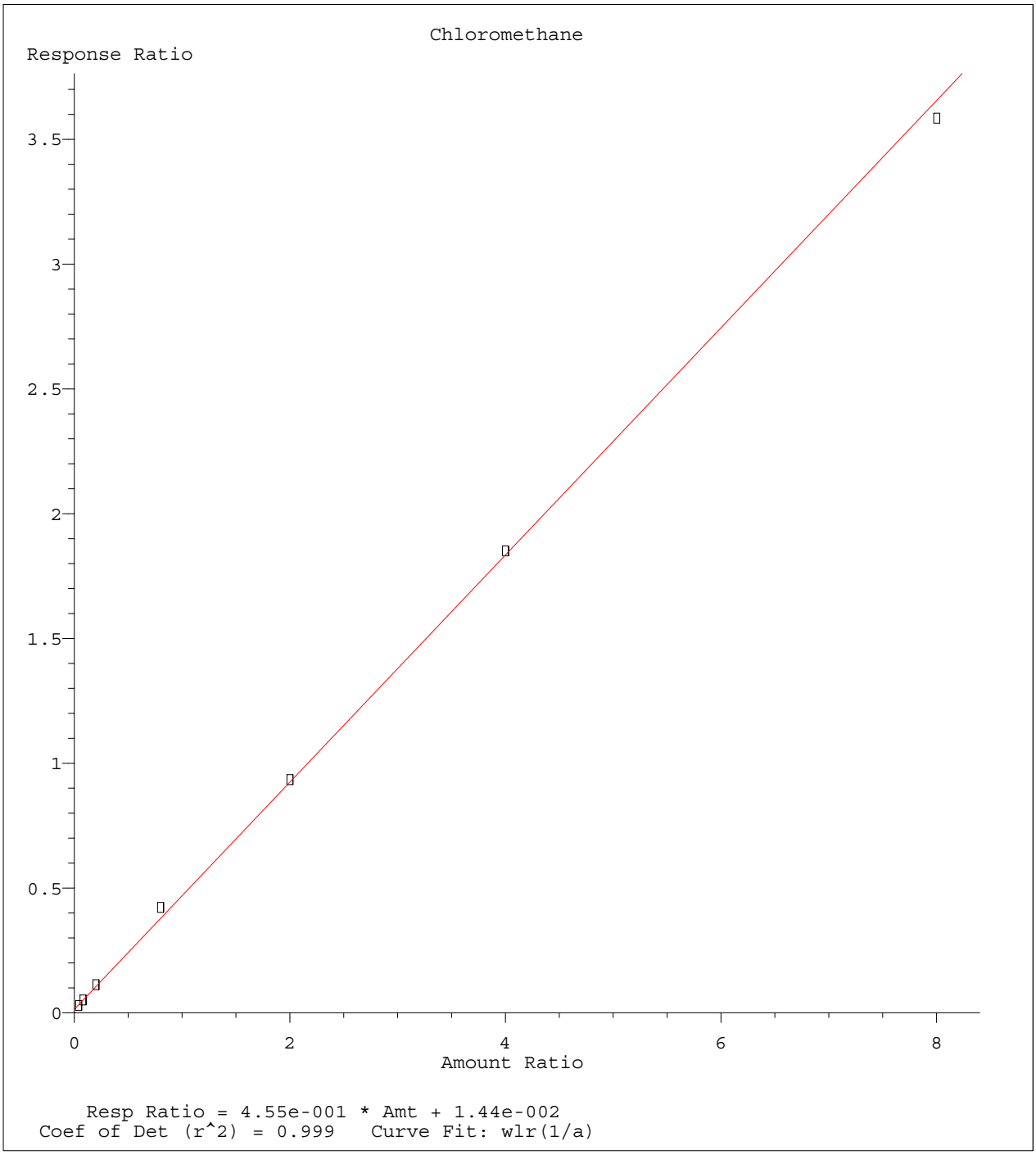




Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017



Method Name: K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M
Calibration Table Last Updated: Thu Apr 06 09:55:03 2017

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.26	96	670831	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.14	117	482468	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.17	152	257501	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.21	111	178273	26.0327	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.12%				
43) 1,2-Dichloroethane-d4	10.85	65	171804	25.4551	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 101.84%				
58) Toluene-d8	13.24	98	618189	25.1100	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.44%				
80) p-Bromofluorobenzene	16.64	95	243106	24.8575	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.44%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.52	85	261278	24.5311	ug/L		94
3) Chloromethane	4.04	50	284057	22.4610	ug/L		99
4) Vinyl Chloride	4.27	62	267730	21.9996	ug/L		98
5) 1,3-Butadiene	4.31	54	117985	24.7175	ug/L		89
6) Bromomethane	5.23	94	93039	17.7066	ug/L		98
7) Chloroethane	5.40	64	119687	22.8578	ug/L		85
8) Trichlorofluoromethane	5.90	101	262422	21.0391	ug/L		99
9) Diethyl ether	6.44	59	528084	101.5927	ug/L		82
10) Isoprene	6.48	67	201796	19.6694	ug/L		81
11) Acrolein	6.67	56	92591	162.5878	ug/L		98
12) 1,1,2-Trichloro-1,2,2-Trif	6.69	101	153538	21.7457	ug/L		98
13) Acetone	6.77	43	27527	19.0157	ug/L		88
14) 1,1-Dichloroethene	7.01	61	204274	19.9737	ug/L		84
15) Tert-Butyl Alcohol	7.12	59	102016	227.1976	ug/L		91
16) Dimethyl Sulfide	7.27	62	152875	20.9191	ug/L		78
17) Iodomethane	7.54	142	153036	26.0301	ug/L		99
18) Methyl acetate	7.53	43	73917	20.3598	ug/L	#	82
19) Methylene Chloride	7.80	84	150043	19.4056	ug/L		61
20) Carbon Disulfide	7.86	76	355422	16.1479	ug/L		99
21) Acrylonitrile	7.97	53	36232	21.5995	ug/L		100
22) Methyl Tert Butyl Ether	8.01	73	352993	20.8190	ug/L		92
23) trans-1,2-Dichloroethene	8.25	96	144008	19.5650	ug/L		78
24) n-Hexane	8.33	57	166297	19.9794	ug/L		85
25) Diisopropyl ether	8.66	45	1988872	104.9629	ug/L	#	90
26) Vinyl Acetate	8.83	43	160945	30.5994	ug/L	#	87
27) 1,1-Dichloroethane	8.87	63	240190	19.6997	ug/L		99
28) Ethyl-Tert-Butyl ether	9.24	59	1886475	98.2593	ug/L		90
29) 2-Butanone	9.42	43	36957	20.2563	ug/L	#	79
30) Propionitrile	9.52	54	63234	106.2742	ug/L		100
31) 2,2-Dichloropropane	9.65	77	204249	22.0193	ug/L		80
32) cis-1,2-Dichloroethene	9.72	96	157553	19.4701	ug/L		90
33) Chloroform	9.92	83	257055	18.5067	ug/L		94
34) 1-Bromopropane	10.06	122	38246	26.6522	ug/L		98
35) Bromochloromethane	10.15	130	91199	21.4098	ug/L		99
36) Tetrahydrofuran	10.17	42	123208	102.5478	ug/L	#	71
38) 1,1,1-Trichloroethane	10.46	97	227236	20.1227	ug/L		91
39) Cyclohexane	10.49	56	186905	17.8988	ug/L		77
40) 1,1-Dichloropropene	10.65	75	187277	19.6188	ug/L		83
41) Tert-Amyl-Methyl ether	10.75	73	1887460	103.5427	ug/L		92
42) Carbon Tetrachloride	10.80	117	183539	20.6128	ug/L		99

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 06 16:54:41 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

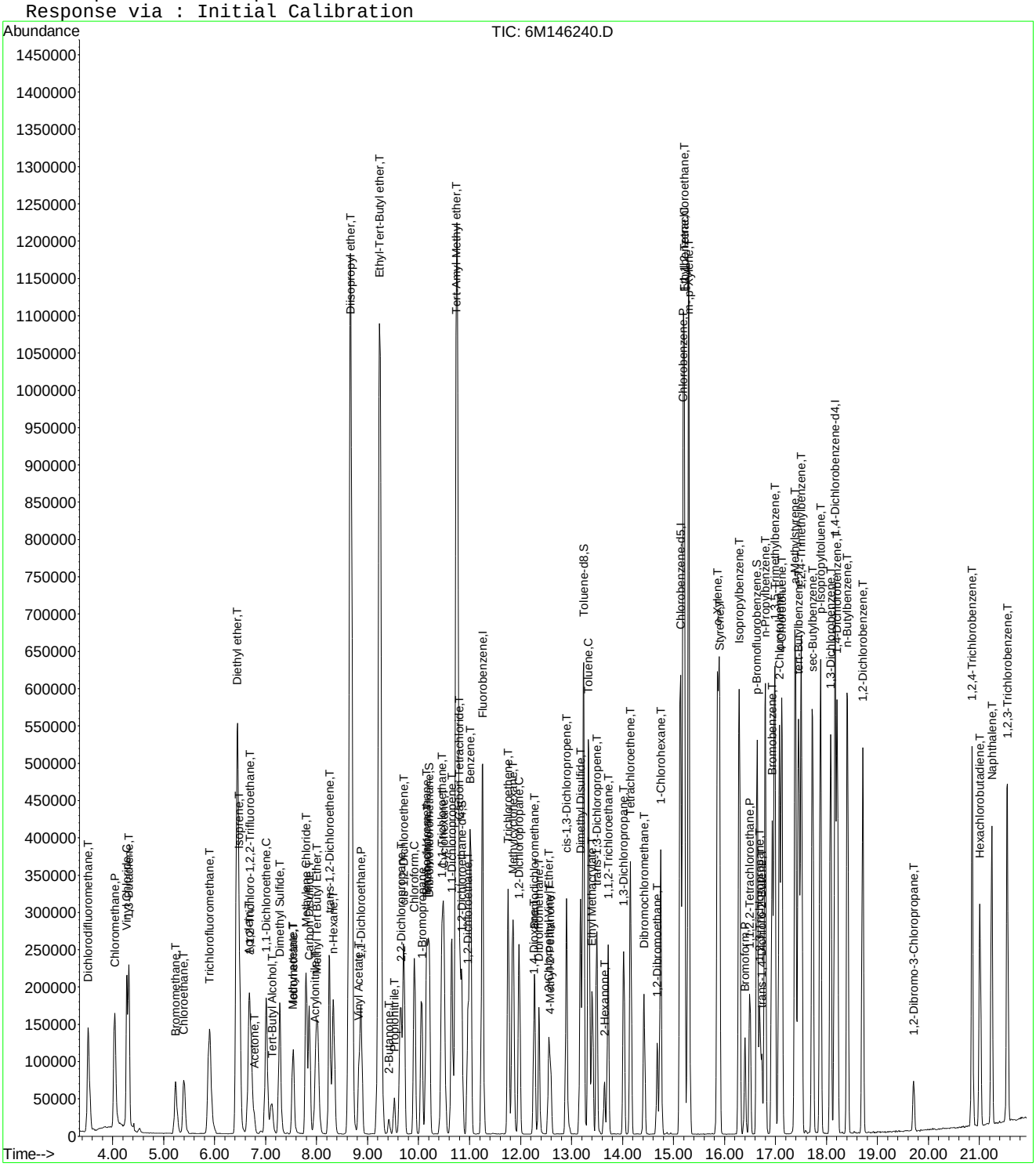
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	168256	19.4720	ug/L		89
46)	Benzene	11.01	78	540364	18.8266	ug/L		86
47)	Trichloroethene	11.76	130	145590	18.6353	ug/L		88
48)	Methylcyclohexane	11.85	83	208804	18.4987	ug/L		82
49)	1,2-Dichloropropane	11.97	63	132922	19.6231	ug/L		94
50)	1,4-Dioxane	12.26	88	10470	212.5754	ug/L		89
51)	Bromodichloromethane	12.27	83	185813	19.4319	ug/L		99
52)	Dibromomethane	12.36	93	81782	20.4995	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	67812	25.5220	ug/L		100
54)	4-Methyl-2-Pentanone	12.58	58	36319	20.8380	ug/L		84
55)	cis-1,3-Dichloropropene	12.90	75	227477	21.6024	ug/L		94
56)	Dimethyl Disulfide	13.18	79	134164	20.1956	ug/L		89
59)	Toluene	13.33	91	559021	18.5327	ug/L		99
60)	Ethyl Methacrylate	13.40	69	152544	20.8980	ug/L		71
62)	trans-1,3-Dichloropropene	13.49	75	184754	19.8643	ug/L		96
63)	1,1,2-Trichloroethane	13.72	97	107408	18.8951	ug/L		99
64)	2-Hexanone	13.65	43	58431	21.4061	ug/L		83
65)	1,3-Dichloropropane	14.02	76	192119	20.1344	ug/L		71
66)	Tetrachloroethene	14.16	166	141756	19.3936	ug/L		96
67)	Dibromochloromethane	14.42	129	136028	19.3580	ug/L		98
68)	1,2-Dibromoethane	14.68	107	106469	19.5061	ug/L		100
69)	1-Chlorohexane	14.75	91	199484	20.4795	ug/L		76
70)	Chlorobenzene	15.19	112	378551	18.3361	ug/L		95
71)	1,1,1,2-Tetrachloroethane	15.21	131	137413	18.5860	ug/L		97
72)	Ethylbenzene	15.21	106	207722	18.5860	ug/L		92
73)	m-,p-Xylene	15.30	106	498999	37.3538	ug/L		92
74)	o-Xylene	15.86	106	243704	18.9049	ug/L		94
75)	Styrene	15.90	104	417768	19.3046	ug/L		96
76)	Bromoform	16.40	173	80208	18.7306	ug/L		98
77)	Isopropylbenzene	16.29	105	603691	18.7136	ug/L		100
79)	1,1,2,2-Tetrachloroethane	16.50	83	131416	19.5954	ug/L		98
81)	1,2,3-Trichloropropane	16.69	110	38665	19.5232	ug/L		71
82)	trans-1,4-Dichloro-2-Buten	16.73	53	25343	17.7959	ug/L	#	1
83)	n-Propylbenzene	16.80	91	714710	18.3318	ug/L		99
84)	Bromobenzene	16.93	156	162348	18.5358	ug/L		83
85)	1,3,5-Trimethylbenzene	16.99	105	512320	18.5422	ug/L		99
86)	2-Chlorotoluene	17.08	91	450684	17.3610	ug/L		97
87)	4-Chlorotoluene	17.12	91	432917	18.8688	ug/L		96
88)	a-Methylstyrene	17.38	118	306134	20.0360	ug/L		98
89)	tert-Butylbenzene	17.46	134	110255	19.0440	ug/L		91
90)	1,2,4-Trimethylbenzene	17.51	105	530643	18.7005	ug/L		86
91)	sec-Butylbenzene	17.73	105	623072	18.2864	ug/L		99
92)	p-Isopropyltoluene	17.88	119	543701	18.9695	ug/L		99
93)	1,3-Dichlorobenzene	18.08	146	304800	18.4272	ug/L		99
94)	1,4-Dichlorobenzene	18.21	146	308581	18.4481	ug/L		98
95)	n-Butylbenzene	18.41	91	494571	18.8967	ug/L		100
96)	1,2-Dichlorobenzene	18.71	146	287359	18.5345	ug/L		98
97)	1,2-Dibromo-3-Chloropropan	19.71	75	23576	19.4080	ug/L		93
98)	1,2,4-Trichlorobenzene	20.86	180	212338	18.7182	ug/L		99
99)	Hexachlorobutadiene	21.01	225	80592	18.6006	ug/L		100
100)	Naphthalene	21.24	128	425467	18.7312	ug/L		100
101)	1,2,3-Trichlorobenzene	21.55	180	199388	18.2068	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146240.D 8260BWT.M Thu Apr 06 16:54:44 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 6 16:54 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	107	0.00
2	T	Dichlorodifluoromethane	20.0000	24.5311	-22.7#	120	0.00
3	P	Chloromethane	20.0000	22.4610	-12.3	107	0.02
4	C	Vinyl Chloride	20.0000	21.9995	-10.0	115	0.00
5	T	1,3-Butadiene	20.0000	24.7175	-23.6#	111	0.00
6	T	Bromomethane	20.0000	17.7066	11.5	95	0.02
7	T	Chloroethane	20.0000	22.8578	-14.3	115	0.02
8	T	Trichlorofluoromethane	20.0000	21.0391	-5.2	109	0.00
9	T	Diethyl ether	80.0000	101.5927	-27.0#	139	0.00
10	T	Isoprene	20.0000	19.6694	1.7	113	0.00
11	T	Acrolein	40.0000	162.5878	-306.5#	452	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	20.0000	21.7457	-8.7	116	0.00
13	T	Acetone	20.0000	19.0157	4.9	95	0.00
14	C	1,1-Dichloroethene	20.0000	19.9737	0.1	104	0.00
15	T	Tert-Butyl Alcohol	160.0000	227.1976	-42.0#	157	0.00
16	T	Dimethyl Sulfide	20.0000	20.9191	-4.6	117	0.00
17	T	Iodomethane	20.0000	26.0301	-30.2#	155	0.00
18	T	Methyl acetate	20.0000	20.3597	-1.8	118	0.00
19	T	Methylene Chloride	20.0000	19.4056	3.0	105	0.00
20	T	Carbon Disulfide	20.0000	16.1479	19.3	91	0.00
21	T	Acrylonitrile	40.0000	21.5995	46.0#	57	0.00
22	T	Methyl Tert Butyl Ether	20.0000	20.8190	-4.1	107	-0.01
23	T	trans-1,2-Dichloroethene	20.0000	19.5650	2.2	104	0.00
24	T	n-Hexane	20.0000	19.9794	0.1	114	0.00
25	T	Diisopropyl ether	80.0000	104.9629	-31.2#	142	0.00
26	T	Vinyl Acetate	20.0000	30.5994	-53.0#	189	0.00
27	P	1,1-Dichloroethane	20.0000	19.6997	1.5	103	0.00
28	T	Ethyl-Tert-Butyl ether	80.0000	98.2593	-22.8#	133	0.00
29	T	2-Butanone	20.0000	20.2563	-1.3	108	0.00
30	T	Propionitrile	80.0000	106.2742	-32.8#	144	0.00
31	T	2,2-Dichloropropane	20.0000	22.0193	-10.1	137	0.00
32	T	cis-1,2-Dichloroethene	20.0000	19.4701	2.6	104	0.00
33	C	Chloroform	20.0000	18.5067	7.5	106	0.00
34		1-Bromopropane	20.0000	26.6522	-33.3#	136	0.00
35	T	Bromochloromethane	20.0000	21.4098	-7.0	107	0.00
36	T	Tetrahydrofuran	80.0000	102.5478	-28.2#	142	0.00
37	S	Dibromofluoromethane	10.0000	26.0327	-160.3#	272	0.00
38	T	1,1,1-Trichloroethane	20.0000	20.1227	-0.6	107	0.00
39	T	Cyclohexane	20.0000	17.8988	10.5	102	0.00
40	T	1,1-Dichloropropene	20.0000	19.6188	1.9	104	0.00
41	T	Tert-Amyl-Methyl ether	80.0000	103.5426	-29.4#	142	0.00
42	T	Carbon Tetrachloride	20.0000	20.6128	-3.1	104	-0.01
43	S	1,2-Dichloroethane-d4	10.0000	25.4551	-154.6#	267	0.00
44		Heptane	-1.0000	0.0000	0.0	142	0.00
45	T	1,2-Dichloroethane	20.0000	19.4720	2.6	104	0.00
46	T	Benzene	20.0000	18.8266	5.9	102	0.00
47	T	Trichloroethene	20.0000	18.6353	6.8	97	0.00
48	T	Methylcyclohexane	20.0000	18.4987	7.5	106	0.00
49	C	1,2-Dichloropropane	20.0000	19.6231	1.9	101	0.00
50	T	1,4-Dioxane	160.0000	212.5754	-32.9#	149	0.00
51	T	Bromodichloromethane	20.0000	19.4319	2.8	100	0.00
52	T	Dibromomethane	20.0000	20.4995	-2.5	106	0.00
53	T	2-Chloroethyl Vinyl Ether	20.0000	25.5220	-27.6#	127	0.00
54	T	4-Methyl-2-Pentanone	20.0000	20.8380	-4.2	113	0.00

(#) = Out of Range
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040617\6M146240.D Vial: 5
Acq On : 6 Apr 2017 15:57 Operator: TMB
Sample : WG608938-12 20ug/L ALT SRC STD 8260 Inst : Hpms6
Misc : 1,1 STD81257 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	20.0000	21.6024	-8.0	110	0.00
56	T	Dimethyl Disulfide	20.0000	20.1956	-1.0	119	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	108	0.00
58	S	Toluene-d8	10.0000	25.1100	-151.1#	271	0.00
59	C	Toluene	20.0000	18.5327	7.3	101	0.00
60	T	Ethyl Methacrylate	20.0000	20.8980	-4.5	118	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	103	0.09
62	T	trans-1,3-Dichloropropene	20.0000	19.8643	0.7	104	0.00
63	T	1,1,2-Trichloroethane	20.0000	18.8951	5.5	100	0.00
64	T	2-Hexanone	20.0000	21.4061	-7.0	116	0.00
65	T	1,3-Dichloropropane	20.0000	20.1344	-0.7	107	0.00
66	T	Tetrachloroethene	20.0000	19.3936	3.0	104	0.00
67	T	Dibromochloromethane	20.0000	19.3580	3.2	101	0.00
68	T	1,2-Dibromoethane	20.0000	19.5061	2.5	106	0.00
69	T	1-Chlorohexane	20.0000	20.4795	-2.4	119	0.00
70	P	Chlorobenzene	20.0000	18.3361	8.3	101	0.00
71	T	1,1,1,2-Tetrachloroethane	20.0000	18.5860	7.1	100	0.00
72	C	Ethylbenzene	20.0000	18.5860	7.1	103	0.00
73	T	m-,p-Xylene	40.0000	37.3538	6.6	104	0.00
74	T	o-Xylene	20.0000	18.9049	5.5	102	0.00
75	T	Styrene	20.0000	19.3046	3.5	103	0.00
76	P	Bromoform	20.0000	18.7306	6.3	99	0.00
77	T	Isopropylbenzene	20.0000	18.7136	6.4	101	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	109	0.00
79	P	1,1,2,2-Tetrachloroethane	20.0000	19.5954	2.0	110	0.00
80	S	p-Bromofluorobenzene	10.0000	24.8575	-148.6#	265	0.00
81	T	1,2,3-Trichloropropane	20.0000	19.5233	2.4	104	0.00
82	T	trans-1,4-Dichloro-2-Butene	20.0000	17.7959	11.0	102	0.00
83	T	n-Propylbenzene	20.0000	18.3318	8.3	100	0.00
84	T	Bromobenzene	20.0000	18.5358	7.3	101	0.00
85	T	1,3,5-Trimethylbenzene	20.0000	18.5422	7.3	102	0.00
86	T	2-Chlorotoluene	20.0000	17.3610	13.2	93	0.00
87	T	4-Chlorotoluene	20.0000	18.8688	5.7	112	0.00
88	T	a-Methylstyrene	20.0000	20.0360	-0.2	119	0.00
89	T	tert-Butylbenzene	20.0000	19.0440	4.8	103	0.00
90	T	1,2,4-Trimethylbenzene	20.0000	18.7005	6.5	102	0.00
91	T	sec-Butylbenzene	20.0000	18.2864	8.6	100	0.00
92	T	p-Isopropyltoluene	20.0000	18.9695	5.2	104	0.00
93	T	1,3-Dichlorobenzene	20.0000	18.4272	7.9	101	0.00
94	T	1,4-Dichlorobenzene	20.0000	18.4481	7.8	103	0.00
95	T	n-Butylbenzene	20.0000	18.8967	5.5	104	0.00
96	T	1,2-Dichlorobenzene	20.0000	18.5345	7.3	102	0.00
97	T	1,2-Dibromo-3-Chloropropane	20.0000	19.4080	3.0	103	0.00
98	T	1,2,4-Trichlorobenzene	20.0000	18.7182	6.4	104	0.00
99	T	Hexachlorobutadiene	20.0000	18.6007	7.0	106	0.00
100	T	Naphthalene	20.0000	18.7312	6.3	101	0.00
101	T	1,2,3-Trichlorobenzene	20.0000	18.2068	9.0	106	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146240.D 8260BWT.M Thu Apr 06 17:39:18 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.52	96	377587	25.00	ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	273493	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	151470	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	98358	26.2983	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.20%			
43) 1,2-Dichloroethane-d4	10.13	65	113244	26.0915	ug/L	-0.01
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.36%			
57) Toluene-d8	12.38	98	380659	26.8050	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.24%			
78) p-Bromofluorobenzene	15.54	95	140530	26.6929	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.76%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	234829	50.7013	ug/L	99
3) Chloromethane	3.65	50	171923	37.7391	ug/L	98
4) Vinyl Chloride	3.88	62	174945	53.9835	ug/L	99
5) 1,3-Butadiene	3.92	54	115323	64.7625	ug/L	96
6) Bromomethane	4.77	94	149144	44.5719	ug/L	99
7) Chloroethane	4.92	64	160409	47.7845	ug/L	100
8) Trichlorofluoromethane	5.40	101	281187	49.6650	ug/L	99
9) Diethyl ether	5.91	59	398171	95.0336	ug/L	97
10) Isoprene	5.96	67	312628	53.3000	ug/L	99
11) Acrolein	6.15	56	27281	40.9365	ug/L	100
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	165270	49.2905	ug/L	99
13) Acetone	6.25	43	53550	42.4159	ug/L	96
14) 1,1-Dichloroethene	6.46	61	327341	48.5436	ug/L	98
15) Tert-Butyl Alcohol	6.57	59	76883	162.8138	ug/L	99
16) Dimethyl Sulfide	6.72	62	253821	47.9142	ug/L	96
17) Iodomethane	6.97	142	211978	45.9162	ug/L	99
18) Methyl acetate	6.98	43	199442	50.0875	ug/L	98
19) Methylene Chloride	7.22	84	203154	45.1537	ug/L	94
20) Carbon Disulfide	7.27	76	579960	50.3019	ug/L	100
21) Acrylonitrile	7.40	53	87375	46.8580	ug/L	99
22) Methyl Tert Butyl Ether	7.42	73	523295	46.4458	ug/L	99
23) trans-1,2-Dichloroethene	7.66	96	187750	45.7534	ug/L	96
24) n-Hexane	7.73	57	373840	58.7390	ug/L	98
25) Diisopropyl ether	8.05	45	1664100	101.4220	ug/L	98
26) Vinyl Acetate	8.22	43	375180	48.9849	ug/L	99
27) 1,1-Dichloroethane	8.25	63	411194	47.5415	ug/L	99
28) Ethyl-Tert-Butyl ether	8.60	59	1399566	96.5018	ug/L	98
29) 2-Butanone	8.78	43	94319	45.7212	ug/L	98
30) Propionitrile	8.89	54	60167	87.4277	ug/L	98
31) 2,2-Dichloropropane	9.00	77	296283	50.6074	ug/L	100
32) cis-1,2-Dichloroethene	9.06	96	217610	47.2576	ug/L	94
33) Chloroform	9.25	83	335657	48.8794	ug/L	100
34) 1-Bromopropane	9.39	122	40922	44.5244	ug/L	95
35) Bromochloromethane	9.48	130	129174	45.7513	ug/L	93
36) Tetrahydrofuran	9.50	42	142627	84.8816	ug/L	96
38) 1,1,1-Trichloroethane	9.76	97	297657	48.8059	ug/L	99
39) Cyclohexane	9.79	56	455459	53.1111	ug/L	97
40) 1,1-Dichloropropene	9.95	75	258756	48.4093	ug/L	99
41) Carbon Tetrachloride	10.09	117	259083	49.1159	ug/L	99
42) Tert-Amyl-Methyl ether	10.04	73	1104100	94.3703	ug/L	100

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25:14 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

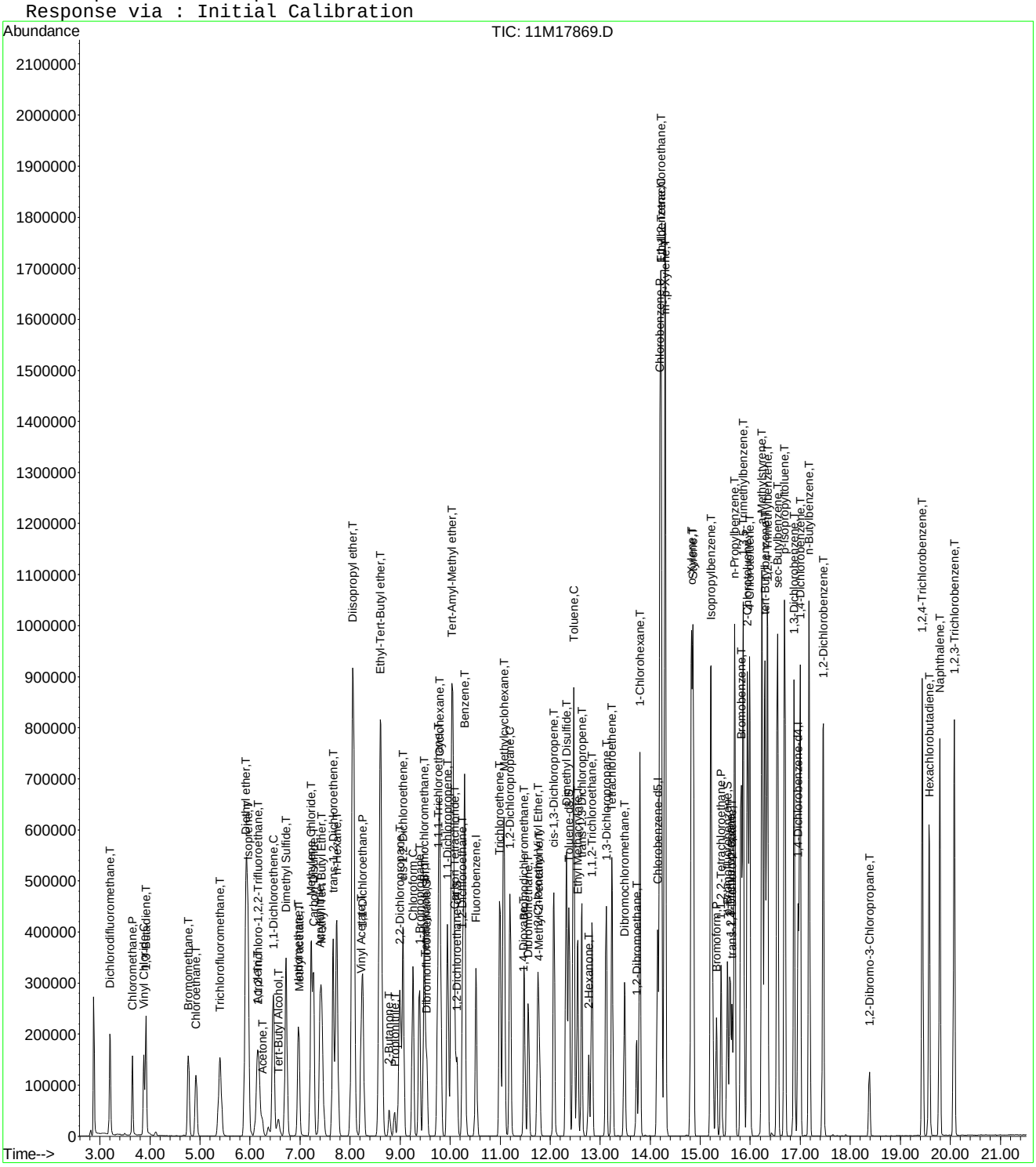
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.25	62	280790	47.5726	ug/L	100
45)	Benzene	10.29	78	755591	45.6297	ug/L	99
46)	Trichloroethene	10.99	130	197539	45.5105	ug/L	98
47)	Methylcyclohexane	11.07	83	356832	53.6207	ug/L	98
48)	1,2-Dichloropropane	11.20	63	243886	47.3225	ug/L	99
49)	1,4-Dioxane	11.47	88	7182	154.3191	ug/L	90
50)	Bromodichloromethane	11.48	83	261815	48.6933	ug/L	100
51)	Dibromomethane	11.56	93	114061	46.7864	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	138274	49.1081	ug/L	100
53)	4-Methyl-2-Pentanone	11.78	58	80029	44.1384	ug/L	96
54)	cis-1,3-Dichloropropene	12.08	75	323822	50.7603	ug/L	99
55)	Dimethyl Disulfide	12.32	79	196311	49.3025	ug/L	99
58)	Toluene	12.47	91	788483	44.5291	ug/L	98
59)	Ethyl Methacrylate	12.55	69	245605	50.4670	ug/L	94
60)	trans-1,3-Dichloropropene	12.64	75	286013	51.1689	ug/L	98
61)	1,1,2-Trichloroethane	12.83	97	170909	45.7553	ug/L	98
62)	2-Hexanone	12.77	43	139786	45.0450	ug/L	98
63)	1,3-Dichloropropane	13.12	76	285083	45.9530	ug/L	93
64)	Tetrachloroethene	13.23	164	172661	49.1220	ug/L	99
65)	Dibromochloromethane	13.48	129	205885	49.4400	ug/L	99
66)	1,2-Dibromoethane	13.73	107	156839	46.7081	ug/L	99
67)	1-Chlorohexane	13.79	91	279869	55.4622	ug/L	97
68)	Chlorobenzene	14.20	112	516373	45.8570	ug/L	99
69)	1,1,1,2-Tetrachloroethane	14.22	131	199529	47.5941	ug/L	99
70)	Ethylbenzene	14.22	106	295332	49.5964	ug/L	96
71)	m-,p-Xylene	14.30	106	677561	95.0970	ug/L	96
72)	o-Xylene	14.83	106	349638	48.7026	ug/L	97
73)	Styrene	14.86	104	571749	53.7336	ug/L	100
74)	Bromoform	15.32	173	140741	47.1652	ug/L	99
75)	Isopropylbenzene	15.22	105	840218	47.9750	ug/L	99
77)	1,1,2,2-Tetrachloroethane	15.42	83	216860	45.5413	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	60125	44.0955	ug/L	97
80)	trans-1,4-Dichloro-2-Buten	15.63	53	74279	50.3817	ug/L	84
81)	n-Propylbenzene	15.69	91	1019169	48.0069	ug/L	98
82)	Bromobenzene	15.82	156	251660	48.7104	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	731926	50.3950	ug/L	98
84)	2-Chlorotoluene	15.94	91	652835	45.2922	ug/L	88
85)	4-Chlorotoluene	15.99	91	629357	48.3767	ug/L	89
86)	a-Methylstyrene	16.23	118	431026	53.8462	ug/L	99
87)	tert-Butylbenzene	16.30	134	163276	46.2387	ug/L	93
88)	1,2,4-Trimethylbenzene	16.35	105	751305	49.4609	ug/L	98
89)	sec-Butylbenzene	16.54	105	913634	47.6309	ug/L	99
90)	p-Isopropyltoluene	16.69	119	793754	51.4991	ug/L	99
91)	1,3-Dichlorobenzene	16.87	146	465150	50.6137	ug/L	100
92)	1,4-Dichlorobenzene	17.00	146	467994	47.3495	ug/L	99
93)	n-Butylbenzene	17.17	91	746891	54.3311	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	451560	48.6928	ug/L	99
95)	1,2-Dibromo-3-Chloropropan	18.38	75	38793	46.4306	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	356631	53.5652	ug/L	100
97)	Hexachlorobutadiene	19.58	225	179707	50.8921	ug/L	99
98)	Naphthalene	19.79	128	719637	48.4632	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	337608	49.5651	ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17869.D 8260WT.M Sat Apr 29 19:25:15 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 19:25 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Continuing Calibration Area and RT check

Instrument: hpms11
Initial cal date: 24 Mar 2017 18:45
CCV date: 29 Apr 2017 18:53
CCV Filename: 11M17869.D

	Fluorobenzene		Chlorobenzene-d5		1,4-Dichlorobenzene-d4	
	Amount	RT	Amount	RT	Amount	RT
InitCal	432286	10.54	305247	14.17	158955	16.98
CCV	377587	10.52	273493	14.14	151470	16.96

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	0.2938	0.3110	-5.9	76	0.00
3	P	Chloromethane	0.3458	0.2277	34.2#	83	0.00
4	C	Vinyl Chloride	0.2146	0.2317	-8.0	87	-0.01
5	T	1,3-Butadiene	0.1274	0.1527	-19.8	95	-0.01
6	T	Bromomethane	0.2216	0.1975	10.9	83	-0.01
7	T	Chloroethane	0.2223	0.2124	4.4	77	-0.01
8	T	Trichlorofluoromethane	0.3749	0.3724	0.7	79	-0.01
9	T	Diethyl ether	0.2774	0.2636	5.0	81	-0.01
10	T	Isoprene	0.3883	0.4140	-6.6	81	-0.01
11	T	Acrolein	0.0441	0.0361	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2188	1.4	79	0.00
13	T	Acetone	0.0836	0.0709	15.2	74	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4335	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0255	18.6	71	0.00
16	T	Dimethyl Sulfide	0.3507	0.3361	4.2	78	-0.01
17	T	Iodomethane	0.2712	0.2807	-3.5	72	0.00
18	T	Methyl acetate	0.2636	0.2641	-0.2	85	0.00
19	T	Methylene Chloride	0.2979	0.2690	9.7	77	-0.01
20	T	Carbon Disulfide	0.7634	0.7680	-0.6	81	-0.01
21	T	Acrylonitrile	0.1235	0.1157	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.6929	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2486	8.5	77	-0.01
24	T	n-Hexane	0.4214	0.4950	-17.5	92	0.00
25	T	Diisopropyl ether	1.0863	1.1018	-1.4	86	-0.01
26	T	Vinyl Acetate	0.5071	0.4968	2.0	81	-0.01
27	P	1,1-Dichloroethane	0.5727	0.5445	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9266	3.5	82	-0.01
29	T	2-Butanone	0.1366	0.1249	8.6	77	-0.01
30	T	Propionitrile	0.0456	0.0398	12.6	74	0.00
31	T	2,2-Dichloropropane	0.3876	0.3923	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.2882	5.5	77	-0.01
33	C	Chloroform	0.5272	0.4445	15.7	78	0.00
34	T	1-Bromopropane	0.0547	0.0542	1.0	75	0.00
35	T	Bromochloromethane	0.1869	0.1711	8.5	74	0.00
36	T	Tetrahydrofuran	0.1113	0.0944	15.1	78	0.00
37	S	Dibromofluoromethane	0.2476	0.2605	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.3942	2.4	77	0.00
39	T	Cyclohexane	0.5678	0.6031	-6.2	83	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3426	3.2	78	0.00
41	T	Carbon Tetrachloride	0.3493	0.3431	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7310	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	0.2874	0.2999	-4.4	87	-0.01
44	T	1,2-Dichloroethane	0.3908	0.3718	4.9	78	0.00
45	T	Benzene	1.0964	1.0006	8.7	78	0.00
46	T	Trichloroethene	0.2874	0.2616	9.0	74	-0.01
47	T	Methylcyclohexane	0.4406	0.4725	-7.2	83	0.00
48	C	1,2-Dichloropropane	0.3412	0.3230	5.4	78	0.00
49	T	1,4-Dioxane	0.0031	0.0024	22.7	67	0.00
50	T	Bromodichloromethane	0.3560	0.3467	2.6	78	-0.01
51	T	Dibromomethane	0.1614	0.1510	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1831	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1060	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	0.4224	0.4288	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:40 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2600	1.4	80	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	85	0.00
57	S	Toluene-d8	1.2981	1.3918	-7.2	87	0.00
58	C	Toluene	1.6186	1.4415	10.9	79	0.00
59	T	Ethyl Methacrylate	0.4449	0.4490	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5229	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3125	8.5	76	-0.01
62	T	2-Hexanone	0.2837	0.2556	9.9	75	0.00
63	T	1,3-Dichloropropane	0.5671	0.5212	8.1	75	0.00
64	T	Tetrachloroethene	0.3213	0.3157	1.8	77	0.00
65	T	Dibromochloromethane	0.3807	0.3764	1.1	76	-0.01
66	T	1,2-Dibromoethane	0.3069	0.2867	6.6	75	0.00
67	T	1-Chlorohexane	0.4613	0.5117	-10.9	84	0.00
68	P	Chlorobenzene	1.0293	0.9440	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3648	4.8	75	0.00
70	C	Ethylbenzene	0.5443	0.5399	0.8	78	0.00
71	T	m-,p-Xylene	0.6513	0.6194	4.9	79	0.00
72	T	o-Xylene	0.6562	0.6392	2.6	78	0.00
73	T	Styrene	0.9726	1.0453	-7.5	79	0.00
74	P	Bromoform	0.2728	0.2573	5.7	74	0.00
75	T	Isopropylbenzene	1.6009	1.5361	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7158	8.9	76	0.00
78	S	p-Bromofluorobenzene	0.8689	0.9278	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.1985	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2452	-0.8	86	0.00
81	T	n-Propylbenzene	3.5039	3.3643	4.0	81	0.00
82	T	Bromobenzene	0.8527	0.8307	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.4161	-0.8	80	0.00
84	T	2-Chlorotoluene	2.3790	2.1550	9.4	82	0.00
85	T	4-Chlorotoluene	2.1472	2.0775	3.2	80	0.00
86	T	a-Methylstyrene	1.3212	1.4228	-7.7	81	0.00
87	T	tert-Butylbenzene	0.5828	0.5390	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.4800	1.1	80	0.00
89	T	sec-Butylbenzene	3.1659	3.0159	4.7	79	0.00
90	T	p-Isopropyltoluene	2.5439	2.6202	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.5355	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	1.6313	1.5448	5.3	81	0.00
93	T	n-Butylbenzene	2.2689	2.4655	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	1.5306	1.4906	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1281	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.1772	-7.1	80	-0.01
97	T	Hexachlorobutadiene	0.5828	0.5932	-1.8	80	0.00
98	T	Naphthalene	2.4508	2.3755	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1144	0.9	78	0.00

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	85	-0.01
2	T	Dichlorodifluoromethane	50.0000	50.7013	-1.4	76	0.00
3	P	Chloromethane	50.0000	37.7391	24.5	83	0.00
4	C	Vinyl Chloride	50.0000	53.9835	-8.0	87	-0.01
5	T	1,3-Butadiene	50.0000	64.7625	-29.5#	95	-0.01
6	T	Bromomethane	50.0000	44.5719	10.9	83	-0.01
7	T	Chloroethane	50.0000	47.7845	4.4	77	-0.01
8	T	Trichlorofluoromethane	50.0000	49.6650	0.7	79	-0.01
9	T	Diethyl ether	100.0000	95.0336	5.0	81	-0.01
10	T	Isoprene	50.0000	53.3000	-6.6	81	-0.01
11	T	Acrolein	50.0000	40.9365	18.1	69	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	49.2905	1.4	79	0.00
13	T	Acetone	50.0000	42.4158	15.2	74	-0.01
14	C	1,1-Dichloroethene	50.0000	48.5436	2.9	78	-0.01
15	T	Tert-Butyl Alcohol	200.0000	162.8138	18.6	71	0.00
16	T	Dimethyl Sulfide	50.0000	47.9142	4.2	78	-0.01
17	T	Iodomethane	50.0000	45.9162	8.2	72	0.00
18	T	Methyl acetate	50.0000	50.0875	-0.2	85	0.00
19	T	Methylene Chloride	50.0000	45.1537	9.7	77	-0.01
20	T	Carbon Disulfide	50.0000	50.3019	-0.6	81	-0.01
21	T	Acrylonitrile	50.0000	46.8580	6.3	78	0.00
22	T	Methyl Tert Butyl Ether	50.0000	46.4458	7.1	75	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	45.7534	8.5	77	-0.01
24	T	n-Hexane	50.0000	58.7390	-17.5	92	0.00
25	T	Diisopropyl ether	100.0000	101.4220	-1.4	86	-0.01
26	T	Vinyl Acetate	50.0000	48.9849	2.0	81	-0.01
27	P	1,1-Dichloroethane	50.0000	47.5415	4.9	79	-0.01
28	T	Ethyl-Tert-Butyl ether	100.0000	96.5018	3.5	82	-0.01
29	T	2-Butanone	50.0000	45.7212	8.6	77	-0.01
30	T	Propionitrile	100.0000	87.4277	12.6	74	0.00
31	T	2,2-Dichloropropane	50.0000	50.6073	-1.2	87	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	47.2576	5.5	77	-0.01
33	C	Chloroform	50.0000	48.8794	2.2	78	0.00
34	T	1-Bromopropane	50.0000	44.5244	11.0	75	0.00
35	T	Bromochloromethane	50.0000	45.7513	8.5	74	0.00
36	T	Tetrahydrofuran	100.0000	84.8816	15.1	78	0.00
37	S	Dibromofluoromethane	25.0000	26.2983	-5.2	88	0.00
38	T	1,1,1-Trichloroethane	50.0000	48.8059	2.4	77	0.00
39	T	Cyclohexane	50.0000	53.1112	-6.2	83	-0.01
40	T	1,1-Dichloropropene	50.0000	48.4093	3.2	78	0.00
41	T	Carbon Tetrachloride	50.0000	49.1159	1.8	77	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	94.3703	5.6	80	-0.01
43	S	1,2-Dichloroethane-d4	25.0000	26.0915	-4.4	87	-0.01
44	T	1,2-Dichloroethane	50.0000	47.5726	4.9	78	0.00
45	T	Benzene	50.0000	45.6297	8.7	78	0.00
46	T	Trichloroethene	50.0000	45.5105	9.0	74	-0.01
47	T	Methylcyclohexane	50.0000	53.6207	-7.2	83	0.00
48	C	1,2-Dichloropropane	50.0000	47.3225	5.4	78	0.00
49	T	1,4-Dioxane	200.0000	154.3191	22.8	67	0.00
50	T	Bromodichloromethane	50.0000	48.6933	2.6	78	-0.01
51	T	Dibromomethane	50.0000	46.7864	6.4	75	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	49.1081	1.8	78	0.00
53	T	4-Methyl-2-Pentanone	50.0000	44.1384	11.7	76	-0.01
54	T	cis-1,3-Dichloropropene	50.0000	50.7603	-1.5	79	0.00

(#) = Out of Range
11M17869.D 8260WT.M Sat Apr 29 19:25:42 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\042917\11M17869.D Vial: 1
Acq On : 29 Apr 2017 18:53 Operator: TMB
Sample : WG612121-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	49.3025	1.4	80	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	85	0.00
57	S	Toluene-d8	25.0000	26.8050	-7.2	87	0.00
58	C	Toluene	50.0000	44.5291	10.9	79	0.00
59	T	Ethyl Methacrylate	50.0000	50.4670	-0.9	78	0.00
60	T	trans-1,3-Dichloropropene	50.0000	51.1689	-2.3	78	0.00
61	T	1,1,2-Trichloroethane	50.0000	45.7553	8.5	76	-0.01
62	T	2-Hexanone	50.0000	45.0450	9.9	75	0.00
63	T	1,3-Dichloropropane	50.0000	45.9530	8.1	75	0.00
64	T	Tetrachloroethene	50.0000	49.1219	1.8	77	0.00
65	T	Dibromochloromethane	50.0000	49.4400	1.1	76	-0.01
66	T	1,2-Dibromoethane	50.0000	46.7081	6.6	75	0.00
67	T	1-Chlorohexane	50.0000	55.4622	-10.9	84	0.00
68	P	Chlorobenzene	50.0000	45.8570	8.3	78	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	47.5941	4.8	75	0.00
70	C	Ethylbenzene	50.0000	49.5964	0.8	78	0.00
71	T	m-,p-Xylene	100.0000	95.0970	4.9	79	0.00
72	T	o-Xylene	50.0000	48.7026	2.6	78	0.00
73	T	Styrene	50.0000	53.7336	-7.5	79	0.00
74	P	Bromoform	50.0000	47.1652	5.7	74	0.00
75	T	Isopropylbenzene	50.0000	47.9750	4.0	80	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	85	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	45.5413	8.9	76	0.00
78	S	p-Bromofluorobenzene	25.0000	26.6929	-6.8	87	0.00
79	T	1,2,3-Trichloropropane	50.0000	44.0955	11.8	71	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	50.3817	-0.8	86	0.00
81	T	n-Propylbenzene	50.0000	48.0069	4.0	81	0.00
82	T	Bromobenzene	50.0000	48.7104	2.6	78	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	50.3950	-0.8	80	0.00
84	T	2-Chlorotoluene	50.0000	45.2922	9.4	82	0.00
85	T	4-Chlorotoluene	50.0000	48.3767	3.2	80	0.00
86	T	a-Methylstyrene	50.0000	53.8462	-7.7	81	0.00
87	T	tert-Butylbenzene	50.0000	46.2387	7.5	75	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	49.4609	1.1	80	0.00
89	T	sec-Butylbenzene	50.0000	47.6309	4.7	79	0.00
90	T	p-Isopropyltoluene	50.0000	51.4991	-3.0	79	0.00
91	T	1,3-Dichlorobenzene	50.0000	50.6137	-1.2	79	0.00
92	T	1,4-Dichlorobenzene	50.0000	47.3495	5.3	81	0.00
93	T	n-Butylbenzene	50.0000	54.3311	-8.7	82	0.00
94	T	1,2-Dichlorobenzene	50.0000	48.6928	2.6	78	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	46.4306	7.1	75	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	53.5652	-7.1	80	-0.01
97	T	Hexachlorobutadiene	50.0000	50.8921	-1.8	80	0.00
98	T	Naphthalene	50.0000	48.4633	3.1	76	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	49.5651	0.9	78	0.00

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 01 16:14:42 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	349941	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	252011	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	138978	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	90447	26.0936	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 104.36%			
43) 1,2-Dichloroethane-d4	10.14	65	103994	25.8532	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.40%			
57) Toluene-d8	12.38	98	351594	26.8688	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.48%			
78) p-Bromofluorobenzene	15.54	95	131707	27.2656	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.08%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.21	85	229767	53.5161	ug/L	99
3) Chloromethane	3.65	50	169209	40.1247	ug/L	98
4) Vinyl Chloride	3.88	62	137637	45.8266	ug/L	99
5) 1,3-Butadiene	3.92	54	92277	55.3414	ug/L	97
6) Bromomethane	4.77	94	144386	46.5589	ug/L	98
7) Chloroethane	4.92	64	156489	50.2996	ug/L	100
8) Trichlorofluoromethane	5.40	101	275653	52.5339	ug/L	100
9) Diethyl ether	5.91	59	354615	91.3244	ug/L	99
10) Isoprene	5.96	67	290944	53.5218	ug/L	99
11) Acrolein	6.15	56	21787	35.2752	ug/L	97
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	164114	52.8125	ug/L	99
13) Acetone	6.25	43	48228	41.2183	ug/L	99
14) 1,1-Dichloroethene	6.46	61	317101	50.7401	ug/L	99
15) Tert-Butyl Alcohol	6.57	59	70032	160.0220	ug/L	99
16) Dimethyl Sulfide	6.72	62	236746	48.2216	ug/L	99
17) Iodomethane	6.97	142	200420	46.8179	ug/L	99
18) Methyl acetate	6.98	43	179836	48.7317	ug/L	99
19) Methylene Chloride	7.23	84	196993	47.2433	ug/L	98
20) Carbon Disulfide	7.27	76	535621	50.1263	ug/L	99
21) Acrylonitrile	7.40	53	79952	46.2646	ug/L	97
22) Methyl Tert Butyl Ether	7.42	73	493287	47.2413	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	181283	47.6676	ug/L	97
24) n-Hexane	7.73	57	335484	56.8768	ug/L	99
25) Diisopropyl ether	8.07	45	1500479	98.6745	ug/L	98
26) Vinyl Acetate	8.23	43	323686	45.6004	ug/L	99
27) 1,1-Dichloroethane	8.26	63	394554	49.2215	ug/L	99
28) Ethyl-Tert-Butyl ether	8.61	59	1286852	95.7398	ug/L	99
29) 2-Butanone	8.79	43	84246	44.0646	ug/L	98
30) Propionitrile	8.89	54	55274	86.6630	ug/L	99
31) 2,2-Dichloropropane	9.00	77	287348	52.9587	ug/L	100
32) cis-1,2-Dichloroethene	9.07	96	209606	49.1155	ug/L	96
33) Chloroform	9.26	83	321757	50.5635	ug/L	100
34) 1-Bromopropane	9.39	122	39638	46.5183	ug/L	99
35) Bromochloromethane	9.48	130	128573	49.1360	ug/L	98
36) Tetrahydrofuran	9.50	42	126124	80.9901	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	283668	50.1867	ug/L	99
39) Cyclohexane	9.79	56	414477	52.1506	ug/L	100
40) 1,1-Dichloropropene	9.95	75	252978	51.0673	ug/L	98
41) Carbon Tetrachloride	10.09	117	254314	52.0206	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	1024108	94.4485	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17934.D 8260WT.M Mon May 01 16:14:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 01 16:14:42 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

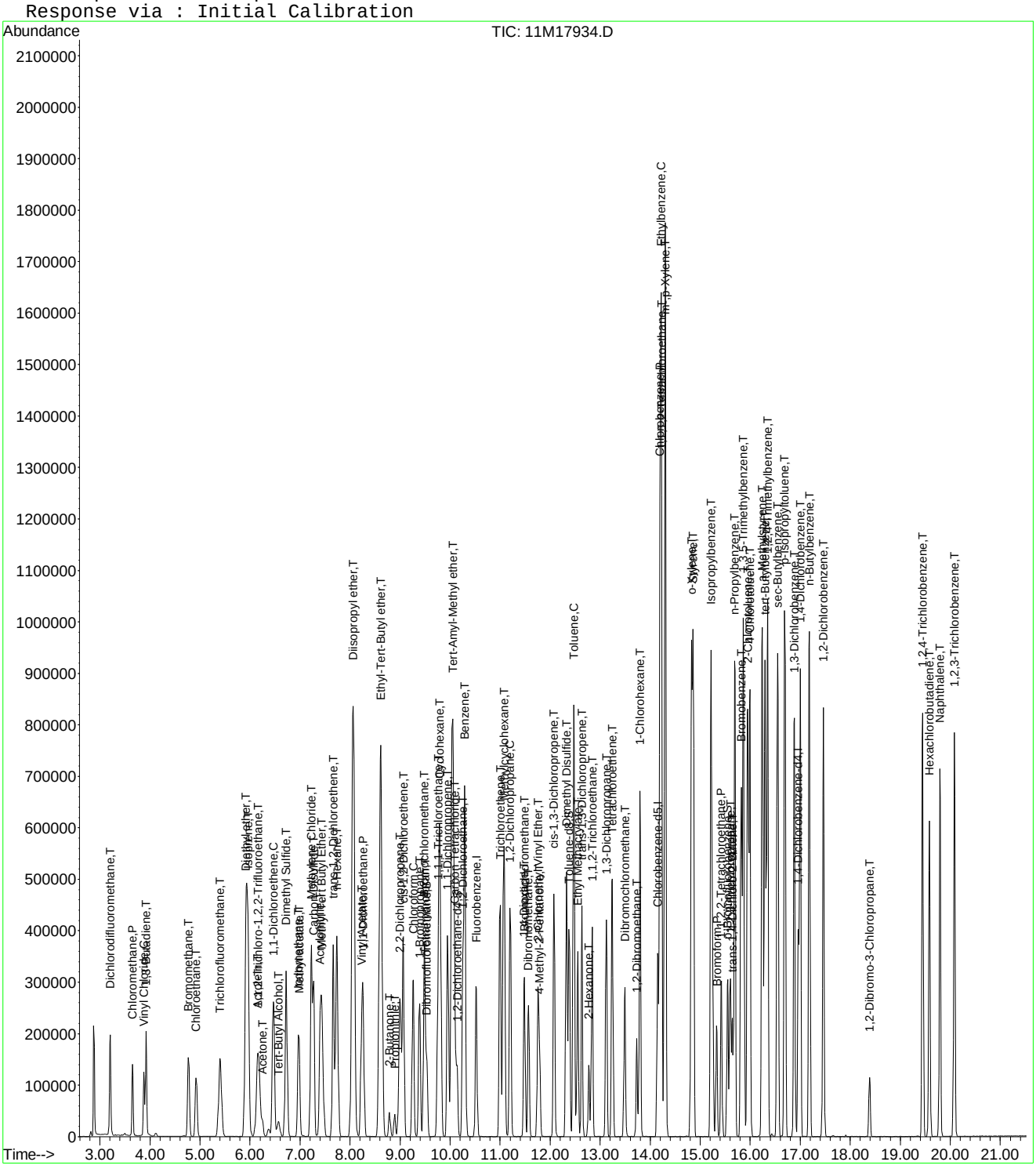
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	268072	49.0060	ug/L	99
45)	Benzene	10.29	78	730895	47.6254	ug/L	98
46)	Trichloroethene	11.00	130	194301	48.3010	ug/L	99
47)	Methylcyclohexane	11.07	83	333924	54.1425	ug/L	100
48)	1,2-Dichloropropane	11.20	63	235395	49.2833	ug/L	99
49)	1,4-Dioxane	11.48	88	7302	169.2928	ug/L	95
50)	Bromodichloromethane	11.49	83	250885	50.3468	ug/L	99
51)	Dibromomethane	11.56	93	110737	49.0115	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	128164	49.1135	ug/L	98
53)	4-Methyl-2-Pentanone	11.79	58	71914	42.7962	ug/L	98
54)	cis-1,3-Dichloropropene	12.08	75	311579	52.6997	ug/L	99
55)	Dimethyl Disulfide	12.32	79	177423	48.0791	ug/L	99
58)	Toluene	12.47	91	767065	47.0122	ug/L	99
59)	Ethyl Methacrylate	12.55	69	224685	50.1039	ug/L	99
60)	trans-1,3-Dichloropropene	12.64	75	273379	53.0777	ug/L	100
61)	1,1,2-Trichloroethane	12.84	97	164346	47.7488	ug/L	99
62)	2-Hexanone	12.77	43	125228	43.7936	ug/L	99
63)	1,3-Dichloropropane	13.12	76	276101	48.2989	ug/L	99
64)	Tetrachloroethene	13.25	164	169081	52.2039	ug/L	100
65)	Dibromochloromethane	13.49	129	198442	51.7147	ug/L	99
66)	1,2-Dibromoethane	13.73	107	151928	49.1024	ug/L	100
67)	1-Chlorohexane	13.79	91	259792	55.8721	ug/L	100
68)	Chlorobenzene	14.20	112	510821	49.2309	ug/L	100
69)	1,1,1,2-Tetrachloroethane	14.23	131	192635	49.8665	ug/L	98
70)	Ethylbenzene	14.22	106	285369	52.0084	ug/L	96
71)	m-,p-Xylene	14.30	106	665418	101.3538	ug/L	96
72)	o-Xylene	14.83	106	340161	51.4215	ug/L	97
73)	Styrene	14.86	104	553911	56.4946	ug/L	100
74)	Bromoform	15.33	173	135473	49.2698	ug/L	100
75)	Isopropylbenzene	15.22	105	824649	51.0998	ug/L	98
77)	1,1,2,2-Tetrachloroethane	15.42	83	208840	47.7991	ug/L	100
79)	1,2,3-Trichloropropane	15.60	110	58701	46.9208	ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.64	53	68029	50.2900	ug/L	86
81)	n-Propylbenzene	15.69	91	996729	51.1700	ug/L	99
82)	Bromobenzene	15.82	156	245811	51.8548	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	714960	53.6516	ug/L	98
84)	2-Chlorotoluene	15.95	91	720213	54.4580	ug/L	88
85)	4-Chlorotoluene	16.00	91	519887	43.5541	ug/L	86
86)	a-Methylstyrene	16.24	118	405547	55.2170	ug/L	99
87)	tert-Butylbenzene	16.30	134	164207	50.6822	ug/L	97
88)	1,2,4-Trimethylbenzene	16.35	105	736751	52.8624	ug/L	98
89)	sec-Butylbenzene	16.54	105	899671	51.1188	ug/L	99
90)	p-Isopropyltoluene	16.69	119	783297	55.3886	ug/L	99
91)	1,3-Dichlorobenzene	16.88	146	455274	53.9919	ug/L	99
92)	1,4-Dichlorobenzene	17.00	146	452205	49.8644	ug/L	99
93)	n-Butylbenzene	17.18	91	733565	58.1581	ug/L	99
94)	1,2-Dichlorobenzene	17.46	146	441015	51.8302	ug/L	100
95)	1,2-Dibromo-3-Chloropropan	18.38	75	36115	47.1106	ug/L	97
96)	1,2,4-Trichlorobenzene	19.45	180	341186	55.8516	ug/L	100
97)	Hexachlorobutadiene	19.58	225	178425	55.0709	ug/L	98
98)	Naphthalene	19.79	128	693475	50.8991	ug/L	99
99)	1,2,3-Trichlorobenzene	20.08	180	327191	52.3534	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17934.D 8260WT.M Mon May 01 16:14:42 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 1 16:14 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17934.D 8260WT.M Mon May 01 16:14:43 2017 Page 3

Data File : C:\MSDCHEM\1\DATA\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	79	0.00
2	T	Dichlorodifluoromethane	0.2938	0.3283	-11.8	75	0.00
3	P	Chloromethane	0.3458	0.2418	30.1#	82	0.00
4	C	Vinyl Chloride	0.2146	0.1967	8.3	69	-0.01
5	T	1,3-Butadiene	0.1274	0.1318	-3.5	76	-0.01
6	T	Bromomethane	0.2216	0.2063	6.9	81	-0.01
7	T	Chloroethane	0.2223	0.2236	-0.6	75	-0.01
8	T	Trichlorofluoromethane	0.3749	0.3939	-5.1	77	-0.01
9	T	Diethyl ether	0.2774	0.2533	8.7	72	-0.01
10	T	Isoprene	0.3883	0.4157	-7.0	76	-0.01
11	T	Acrolein	0.0441	0.0311	29.4#	55	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2220	0.2345	-5.6	79	0.00
13	T	Acetone	0.0836	0.0689	17.6	67	-0.01
14	C	1,1-Dichloroethene	0.4465	0.4531	-1.5	76	-0.01
15	T	Tert-Butyl Alcohol	0.0313	0.0250	20.0	65	0.00
16	T	Dimethyl Sulfide	0.3507	0.3383	3.6	73	-0.01
17	T	Iodomethane	0.2712	0.2864	-5.6	68	0.00
18	T	Methyl acetate	0.2636	0.2570	2.5	76	0.00
19	T	Methylene Chloride	0.2979	0.2815	5.5	74	0.00
20	T	Carbon Disulfide	0.7634	0.7653	-0.3	75	-0.01
21	T	Acrylonitrile	0.1235	0.1142	7.5	71	0.00
22	T	Methyl Tert Butyl Ether	0.7460	0.7048	5.5	71	-0.01
23	T	trans-1,2-Dichloroethene	0.2717	0.2590	4.7	74	-0.01
24	T	n-Hexane	0.4214	0.4793	-13.8	82	0.00
25	T	Diisopropyl ether	1.0863	1.0720	1.3	77	0.00
26	T	Vinyl Acetate	0.5071	0.4625	8.8	70	0.00
27	P	1,1-Dichloroethane	0.5727	0.5637	1.6	76	0.00
28	T	Ethyl-Tert-Butyl ether	0.9602	0.9193	4.3	75	0.00
29	T	2-Butanone	0.1366	0.1204	11.9	69	0.00
30	T	Propionitrile	0.0456	0.0395	13.3	68	0.00
31	T	2,2-Dichloropropane	0.3876	0.4106	-5.9	85	-0.01
32	T	cis-1,2-Dichloroethene	0.3049	0.2995	1.8	74	0.00
33	C	Chloroform	0.5272	0.4597	12.8	75	0.00
34	T	1-Bromopropane	0.0547	0.0566	-3.5	72	0.00
35	T	Bromochloromethane	0.1869	0.1837	1.7	74	0.00
36	T	Tetrahydrofuran	0.1113	0.0901	19.0	69	0.00
37	S	Dibromofluoromethane	0.2476	0.2585	-4.4	81	0.00
38	T	1,1,1-Trichloroethane	0.4038	0.4053	-0.4	74	0.00
39	T	Cyclohexane	0.5678	0.5922	-4.3	75	-0.01
40	T	1,1-Dichloropropene	0.3539	0.3615	-2.1	76	0.00
41	T	Carbon Tetrachloride	0.3493	0.3634	-4.0	75	0.00
42	T	Tert-Amyl-Methyl ether	0.7746	0.7316	5.6	74	0.00
43	S	1,2-Dichloroethane-d4	0.2874	0.2972	-3.4	79	0.00
44	T	1,2-Dichloroethane	0.3908	0.3830	2.0	74	0.00
45	T	Benzene	1.0964	1.0443	4.7	75	0.00
46	T	Trichloroethene	0.2874	0.2776	3.4	73	0.00
47	T	Methylcyclohexane	0.4406	0.4771	-8.3	77	0.00
48	C	1,2-Dichloropropane	0.3412	0.3363	1.4	75	0.00
49	T	1,4-Dioxane	0.0031	0.0026	15.3	68	0.01
50	T	Bromodichloromethane	0.3560	0.3585	-0.7	74	0.00
51	T	Dibromomethane	0.1614	0.1582	2.0	73	-0.01
52	T	2-Chloroethyl Vinyl Ether	0.1864	0.1831	1.8	72	0.00
53	T	4-Methyl-2-Pentanone	0.1201	0.1027	14.4	68	0.00
54	T	cis-1,3-Dichloropropene	0.4224	0.4452	-5.4	76	0.00

(#) = Out of Range
11M17934.D 8260WT.M Mon May 01 16:16:57 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	0.2636	0.2535	3.8	73	0.00
56	I	Chlorobenzene-d5	1.0000	1.0000	0.0	79	0.00
57	S	Toluene-d8	1.2981	1.3951	-7.5	80	0.00
58	C	Toluene	1.6186	1.5219	6.0	77	0.00
59	T	Ethyl Methacrylate	0.4449	0.4458	-0.2	71	0.00
60	T	trans-1,3-Dichloropropene	0.5109	0.5424	-6.2	75	0.00
61	T	1,1,2-Trichloroethane	0.3414	0.3261	4.5	73	0.00
62	T	2-Hexanone	0.2837	0.2485	12.4	68	0.00
63	T	1,3-Dichloropropane	0.5671	0.5478	3.4	73	0.00
64	T	Tetrachloroethene	0.3213	0.3355	-4.4	76	0.01
65	T	Dibromochloromethane	0.3807	0.3937	-3.4	74	0.00
66	T	1,2-Dibromoethane	0.3069	0.3014	1.8	73	0.00
67	T	1-Chlorohexane	0.4613	0.5154	-11.7	78	0.00
68	P	Chlorobenzene	1.0293	1.0135	1.5	77	0.00
69	T	1,1,1,2-Tetrachloroethane	0.3832	0.3822	0.3	73	0.01
70	C	Ethylbenzene	0.5443	0.5662	-4.0	76	0.00
71	T	m-,p-Xylene	0.6513	0.6601	-1.4	77	0.00
72	T	o-Xylene	0.6562	0.6749	-2.8	76	0.00
73	T	Styrene	0.9726	1.0990	-13.0	76	0.00
74	P	Bromoform	0.2728	0.2688	1.5	72	0.01
75	T	Isopropylbenzene	1.6009	1.6361	-2.2	78	0.00
76	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	78	0.00
77	P	1,1,2,2-Tetrachloroethane	0.7859	0.7513	4.4	73	0.00
78	S	p-Bromofluorobenzene	0.8689	0.9477	-9.1	81	0.00
79	T	1,2,3-Trichloropropane	0.2251	0.2112	6.2	70	0.00
80	T	trans-1,4-Dichloro-2-Butene	0.2433	0.2448	-0.6	78	0.01
81	T	n-Propylbenzene	3.5039	3.5859	-2.3	80	0.00
82	T	Bromobenzene	0.8527	0.8843	-3.7	76	0.00
83	T	1,3,5-Trimethylbenzene	2.3971	2.5722	-7.3	78	0.00
84	T	2-Chlorotoluene	2.3790	2.5911	-8.9	91	0.01
85	T	4-Chlorotoluene	2.1472	1.8704	12.9	66	0.01
86	T	a-Methylstyrene	1.3212	1.4590	-10.4	77	0.01
87	T	tert-Butylbenzene	0.5828	0.5908	-1.4	75	0.00
88	T	1,2,4-Trimethylbenzene	2.5071	2.6506	-5.7	78	0.00
89	T	sec-Butylbenzene	3.1659	3.2367	-2.2	78	0.00
90	T	p-Isopropyltoluene	2.5439	2.8181	-10.8	78	0.00
91	T	1,3-Dichlorobenzene	1.5168	1.6379	-8.0	77	0.01
92	T	1,4-Dichlorobenzene	1.6313	1.6269	0.3	78	0.00
93	T	n-Butylbenzene	2.2689	2.6391	-16.3	80	0.01
94	T	1,2-Dichlorobenzene	1.5306	1.5866	-3.7	76	0.00
95	T	1,2-Dibromo-3-Chloropropane	0.1379	0.1299	5.8	69	0.00
96	T	1,2,4-Trichlorobenzene	1.0989	1.2275	-11.7	77	0.00
97	T	Hexachlorobutadiene	0.5828	0.6419	-10.1	79	0.00
98	T	Naphthalene	2.4508	2.4949	-1.8	74	0.00
99	T	1,2,3-Trichlorobenzene	1.1242	1.1771	-4.7	76	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17934.D 8260WT.M Mon May 01 16:16:57 2017 Page 2

Data File : C:\MSDCHEM\1\DATA\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	79	0.00
2	T	Dichlorodifluoromethane	50.0000	53.5161	-7.0	75	0.00
3	P	Chloromethane	50.0000	40.1247	19.8	82	0.00
4	C	Vinyl Chloride	50.0000	45.8266	8.3	69	-0.01
5	T	1,3-Butadiene	50.0000	55.3415	-10.7	76	-0.01
6	T	Bromomethane	50.0000	46.5589	6.9	81	-0.01
7	T	Chloroethane	50.0000	50.2996	-0.6	75	-0.01
8	T	Trichlorofluoromethane	50.0000	52.5339	-5.1	77	-0.01
9	T	Diethyl ether	100.0000	91.3244	8.7	72	-0.01
10	T	Isoprene	50.0000	53.5218	-7.0	76	-0.01
11	T	Acrolein	50.0000	35.2752	29.4#	55	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	52.8125	-5.6	79	0.00
13	T	Acetone	50.0000	41.2183	17.6	67	-0.01
14	C	1,1-Dichloroethene	50.0000	50.7401	-1.5	76	-0.01
15	T	Tert-Butyl Alcohol	200.0000	160.0220	20.0	65	0.00
16	T	Dimethyl Sulfide	50.0000	48.2216	3.6	73	-0.01
17	T	Iodomethane	50.0000	46.8179	6.4	68	0.00
18	T	Methyl acetate	50.0000	48.7317	2.5	76	0.00
19	T	Methylene Chloride	50.0000	47.2433	5.5	74	0.00
20	T	Carbon Disulfide	50.0000	50.1263	-0.3	75	-0.01
21	T	Acrylonitrile	50.0000	46.2646	7.5	71	0.00
22	T	Methyl Tert Butyl Ether	50.0000	47.2413	5.5	71	-0.01
23	T	trans-1,2-Dichloroethene	50.0000	47.6676	4.7	74	-0.01
24	T	n-Hexane	50.0000	56.8768	-13.8	82	0.00
25	T	Diisopropyl ether	100.0000	98.6745	1.3	77	0.00
26	T	Vinyl Acetate	50.0000	45.6004	8.8	70	0.00
27	P	1,1-Dichloroethane	50.0000	49.2215	1.6	76	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	95.7398	4.3	75	0.00
29	T	2-Butanone	50.0000	44.0646	11.9	69	0.00
30	T	Propionitrile	100.0000	86.6630	13.3	68	0.00
31	T	2,2-Dichloropropane	50.0000	52.9587	-5.9	85	-0.01
32	T	cis-1,2-Dichloroethene	50.0000	49.1155	1.8	74	0.00
33	C	Chloroform	50.0000	50.5635	-1.1	75	0.00
34	T	1-Bromopropane	50.0000	46.5183	7.0	72	0.00
35	T	Bromochloromethane	50.0000	49.1360	1.7	74	0.00
36	T	Tetrahydrofuran	100.0000	80.9901	19.0	69	0.00
37	S	Dibromofluoromethane	25.0000	26.0936	-4.4	81	0.00
38	T	1,1,1-Trichloroethane	50.0000	50.1867	-0.4	74	0.00
39	T	Cyclohexane	50.0000	52.1506	-4.3	75	-0.01
40	T	1,1-Dichloropropene	50.0000	51.0673	-2.1	76	0.00
41	T	Carbon Tetrachloride	50.0000	52.0206	-4.0	75	0.00
42	T	Tert-Amyl-Methyl ether	100.0000	94.4485	5.6	74	0.00
43	S	1,2-Dichloroethane-d4	25.0000	25.8532	-3.4	79	0.00
44	T	1,2-Dichloroethane	50.0000	49.0060	2.0	74	0.00
45	T	Benzene	50.0000	47.6254	4.7	75	0.00
46	T	Trichloroethene	50.0000	48.3010	3.4	73	0.00
47	T	Methylcyclohexane	50.0000	54.1425	-8.3	77	0.00
48	C	1,2-Dichloropropane	50.0000	49.2833	1.4	75	0.00
49	T	1,4-Dioxane	200.0000	169.2928	15.4	68	0.01
50	T	Bromodichloromethane	50.0000	50.3468	-0.7	74	0.00
51	T	Dibromomethane	50.0000	49.0115	2.0	73	-0.01
52	T	2-Chloroethyl Vinyl Ether	50.0000	49.1135	1.8	72	0.00
53	T	4-Methyl-2-Pentanone	50.0000	42.7962	14.4	68	0.00
54	T	cis-1,3-Dichloropropene	50.0000	52.6997	-5.4	76	0.00

(#) = Out of Range
11M17934.D 8260WT.M Mon May 01 16:16:59 2017 Page 1

Data File : C:\MSDCHEM\1\DATA\050117\11M17934.D Vial: 1
Acq On : 1 May 2017 15:53 Operator: JDS
Sample : WG612294-02 50ug/L CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	Dimethyl Disulfide	50.0000	48.0791	3.8	73	0.00
56	I	Chlorobenzene-d5	25.0000	25.0000	0.0	79	0.00
57	S	Toluene-d8	25.0000	26.8688	-7.5	80	0.00
58	C	Toluene	50.0000	47.0122	6.0	77	0.00
59	T	Ethyl Methacrylate	50.0000	50.1039	-0.2	71	0.00
60	T	trans-1,3-Dichloropropene	50.0000	53.0777	-6.2	75	0.00
61	T	1,1,2-Trichloroethane	50.0000	47.7488	4.5	73	0.00
62	T	2-Hexanone	50.0000	43.7936	12.4	68	0.00
63	T	1,3-Dichloropropane	50.0000	48.2989	3.4	73	0.00
64	T	Tetrachloroethene	50.0000	52.2039	-4.4	76	0.01
65	T	Dibromochloromethane	50.0000	51.7147	-3.4	74	0.00
66	T	1,2-Dibromoethane	50.0000	49.1024	1.8	73	0.00
67	T	1-Chlorohexane	50.0000	55.8721	-11.7	78	0.00
68	P	Chlorobenzene	50.0000	49.2309	1.5	77	0.00
69	T	1,1,1,2-Tetrachloroethane	50.0000	49.8665	0.3	73	0.01
70	C	Ethylbenzene	50.0000	52.0084	-4.0	76	0.00
71	T	m-,p-Xylene	100.0000	101.3538	-1.4	77	0.00
72	T	o-Xylene	50.0000	51.4215	-2.8	76	0.00
73	T	Styrene	50.0000	56.4946	-13.0	76	0.00
74	P	Bromoform	50.0000	49.2698	1.5	72	0.01
75	T	Isopropylbenzene	50.0000	51.0998	-2.2	78	0.00
76	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	78	0.00
77	P	1,1,2,2-Tetrachloroethane	50.0000	47.7991	4.4	73	0.00
78	S	p-Bromofluorobenzene	25.0000	27.2656	-9.1	81	0.00
79	T	1,2,3-Trichloropropane	50.0000	46.9208	6.2	70	0.00
80	T	trans-1,4-Dichloro-2-Butene	50.0000	50.2900	-0.6	78	0.01
81	T	n-Propylbenzene	50.0000	51.1700	-2.3	80	0.00
82	T	Bromobenzene	50.0000	51.8548	-3.7	76	0.00
83	T	1,3,5-Trimethylbenzene	50.0000	53.6516	-7.3	78	0.00
84	T	2-Chlorotoluene	50.0000	54.4580	-8.9	91	0.01
85	T	4-Chlorotoluene	50.0000	43.5541	12.9	66	0.01
86	T	a-Methylstyrene	50.0000	55.2170	-10.4	77	0.01
87	T	tert-Butylbenzene	50.0000	50.6822	-1.4	75	0.00
88	T	1,2,4-Trimethylbenzene	50.0000	52.8624	-5.7	78	0.00
89	T	sec-Butylbenzene	50.0000	51.1188	-2.2	78	0.00
90	T	p-Isopropyltoluene	50.0000	55.3886	-10.8	78	0.00
91	T	1,3-Dichlorobenzene	50.0000	53.9919	-8.0	77	0.01
92	T	1,4-Dichlorobenzene	50.0000	49.8644	0.3	78	0.00
93	T	n-Butylbenzene	50.0000	58.1581	-16.3	80	0.01
94	T	1,2-Dichlorobenzene	50.0000	51.8302	-3.7	76	0.00
95	T	1,2-Dibromo-3-Chloropropane	50.0000	47.1106	5.8	69	0.00
96	T	1,2,4-Trichlorobenzene	50.0000	55.8516	-11.7	77	0.00
97	T	Hexachlorobutadiene	50.0000	55.0709	-10.1	79	0.00
98	T	Naphthalene	50.0000	50.8991	-1.8	74	0.00
99	T	1,2,3-Trichlorobenzene	50.0000	52.3535	-4.7	76	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17934.D 8260WT.M Mon May 01 16:16:59 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17935.D Vial: 2
Acq On : 1 May 2017 16:21 Operator: JDS
Sample : WG612299-01 100ug/L A9 CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 01 16:43:41 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

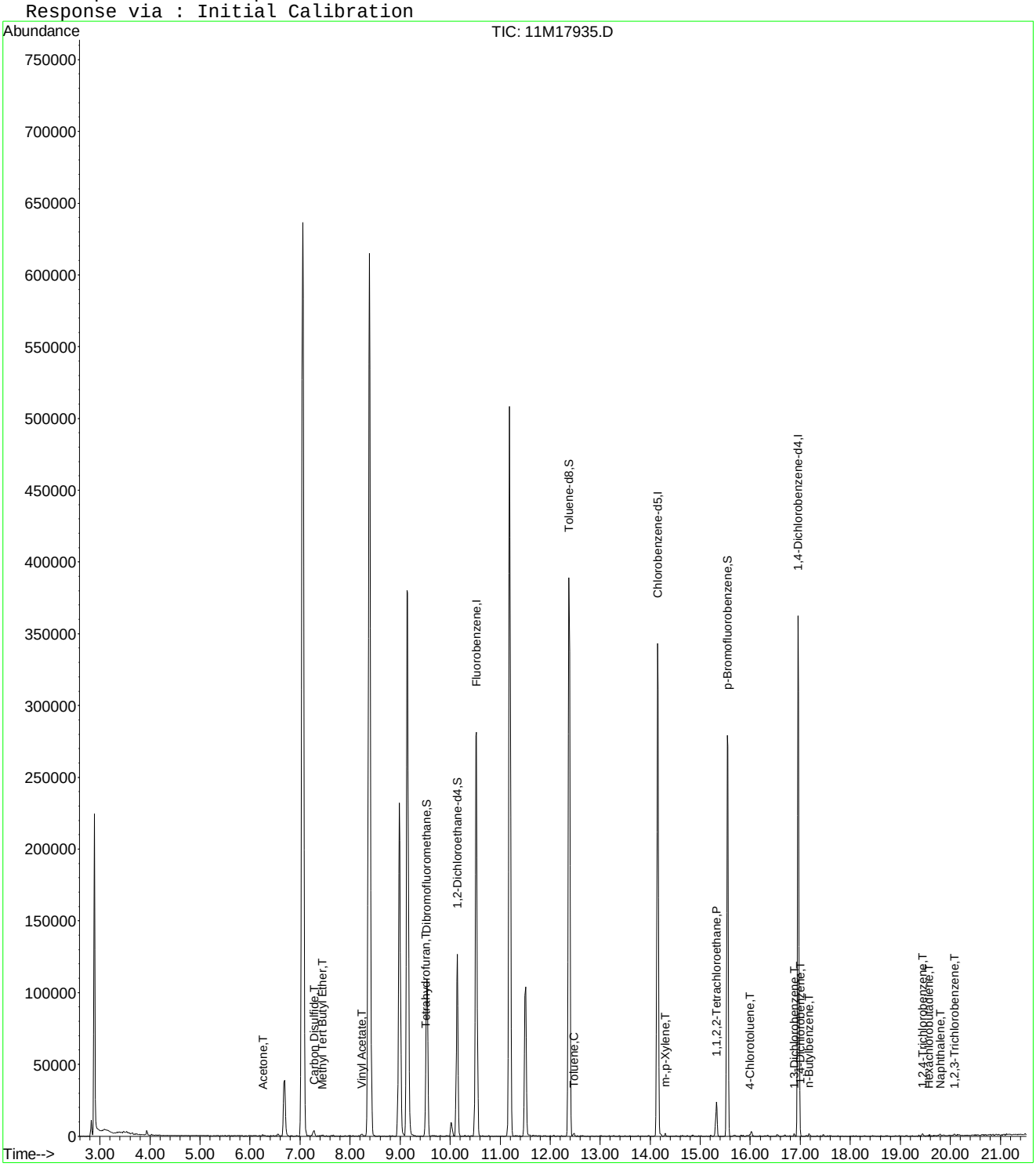
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.53	96	340833	25.00 ug/L	0.00
56) Chlorobenzene-d5	14.14	117	238922	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	123196	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	88776	26.2960 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 105.20%		
43) 1,2-Dichloroethane-d4	10.14	65	102794	26.2378 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.96%		
57) Toluene-d8	12.38	98	338024	27.2469 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 109.00%		
78) p-Bromofluorobenzene	15.54	95	120913	28.2377 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 112.96%		
Target Compounds					Qvalue
3) Chloromethane	3.65	50	568	Below Cal	# 40
13) Acetone	6.26	43	1496	1.3127 ug/L	# 41
20) Carbon Disulfide	7.28	76	6605	0.6347 ug/L	90
22) Methyl Tert Butyl Ether	7.44	73	1585	0.1558 ug/L	# 46
26) Vinyl Acetate	8.23	43	2181	0.3155 ug/L	# 78
33) Chloroform	9.26	83	904	Below Cal	# 17
36) Tetrahydrofuran	9.51	42	5452	3.5945 ug/L	90
58) Toluene	12.47	91	2578	0.1667 ug/L	83
71) m-,p-Xylene	14.30	106	816	0.1311 ug/L	86
77) 1,1,2,2-Tetrachloroethane	15.32	83	1120	0.2892 ug/L	# 18
85) 4-Chlorotoluene	16.00	91	1686	0.1593 ug/L	# 68
91) 1,3-Dichlorobenzene	16.88	146	1139	0.1524 ug/L	# 65
92) 1,4-Dichlorobenzene	17.00	146	1510	0.1878 ug/L	# 1
93) n-Butylbenzene	17.17	91	1774	0.1587 ug/L	# 69
96) 1,2,4-Trichlorobenzene	19.45	180	1606	0.2966 ug/L	# 45
97) Hexachlorobutadiene	19.57	225	434	0.1511 ug/L	# 25
98) Naphthalene	19.80	128	2436	0.2017 ug/L	# 65
99) 1,2,3-Trichlorobenzene	20.08	180	1089	0.1966 ug/L	# 43

(#) = qualifier out of range (m) = manual integration
11M17935.D 8260WT.M Mon May 01 16:43:42 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17935.D Vial: 2
Acq On : 1 May 2017 16:21 Operator: JDS
Sample : WG612299-01 100ug/L A9 CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 1 16:43 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



11M17935.D 8260WT.M Mon May 01 16:43:42 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17935.D Vial: 2
Acq On : 1 May 2017 16:21 Operator: JDS
Sample : WG612299-01 100ug/L A9 CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 04 09:30:17 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

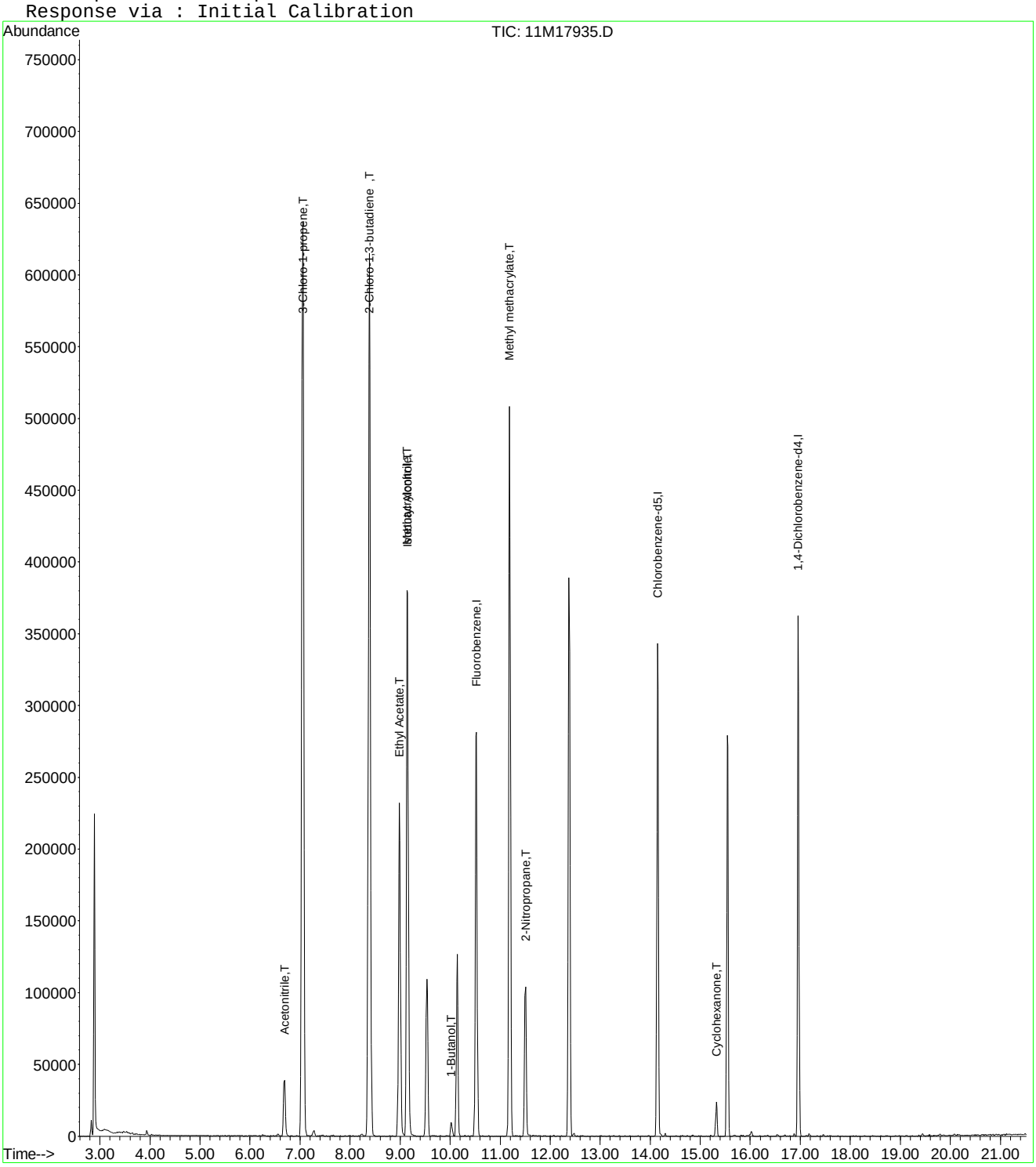
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	10.53	96	340833	25.00	ug/L		-0.01
12) Chlorobenzene-d5	14.14	117	238922	25.00	ug/L		-0.02
13) 1,4-Dichlorobenzene-d4	16.96	152	123196	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	6.69	41	54051	93.9301	ug/L		97
3) 3-Chloro-1-propene	7.05	41	719097	105.0745	ug/L		81
4) 2-Chloro-1,3-butadiene	8.39	53	603583	101.7798	ug/L		78
5) Methacrylonitrile	9.14	41	278089	101.2258	ug/L		79
6) Isobutyl Alcohol	9.15	43	34966	177.7193	ug/L		87
7) 1-Butanol	10.02	56	7469	103.4925	ug/L	#	82
8) Cyclohexanone	15.32	55	14321	107.2021	ug/L	#	87
9) 2-Nitropropane	11.51	43	96485	93.2968	ug/L		96
10) Ethyl Acetate	8.99	43	381287	103.0849	ug/L	#	90
11) Methyl methacrylate	11.19	41	353441	103.7004	ug/L		77

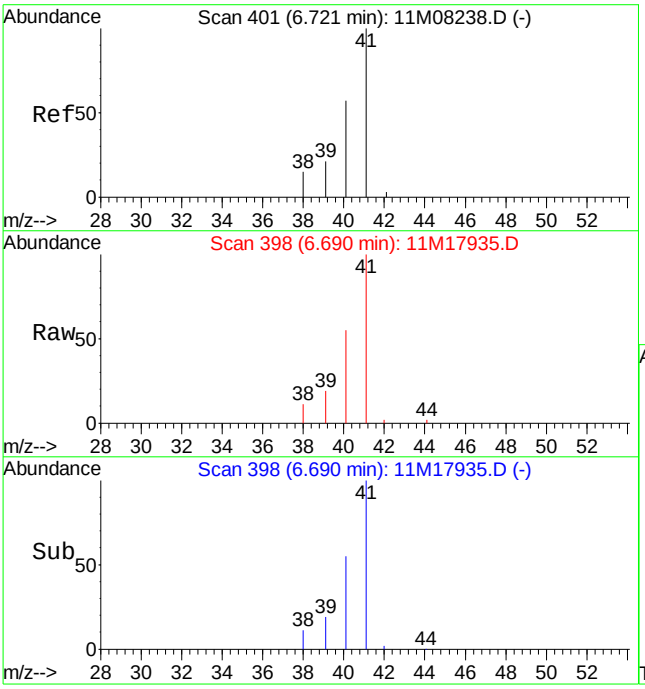
(#) = qualifier out of range (m) = manual integration
11M17935.D A9FOOWT.M Thu May 04 09:30:17 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17935.D Vial: 2
Acq On : 1 May 2017 16:21 Operator: JDS
Sample : WG612299-01 100ug/L A9 CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 4 9:30 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration

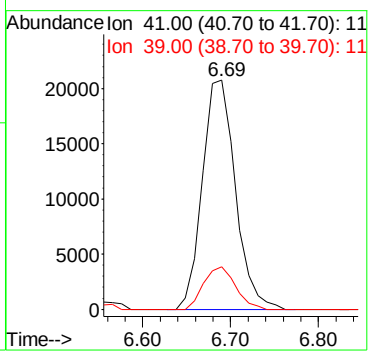


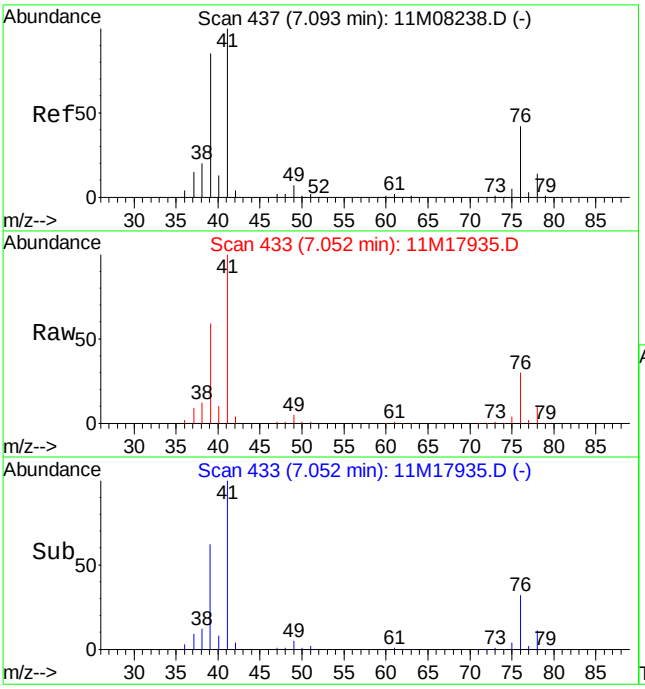


#2
Acetonitrile
Concen: 93.93 ug/L
RT: 6.69 min Scan# 398
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 41 Resp: 54051

Ion	Ratio	Lower	Upper
41	100		
39	17.9	0.0	59.4

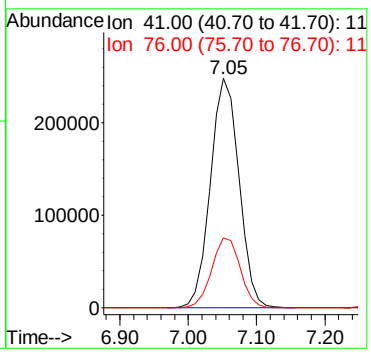


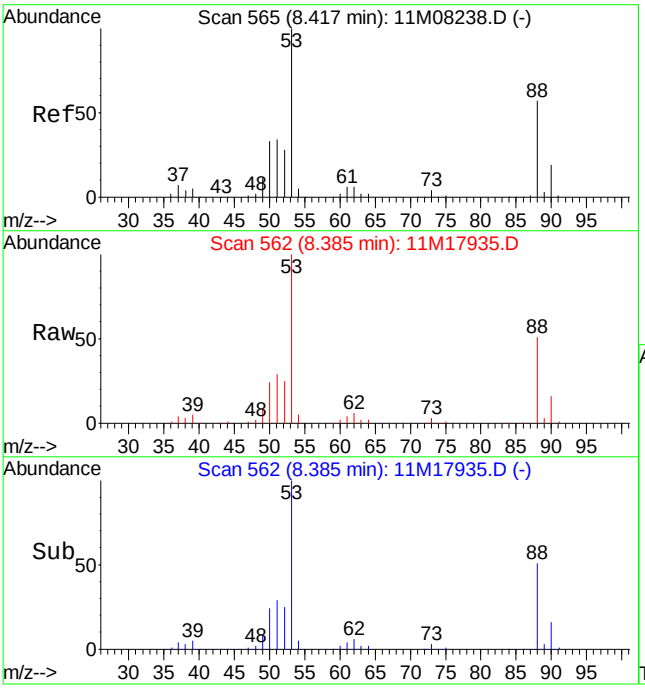


#3
3-Chloro-1-propene
Concen: 105.07 ug/L
RT: 7.05 min Scan# 433
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 41 Resp: 719097

Ion	Ratio	Lower	Upper
41	100		
76	30.2	0.0	61.4

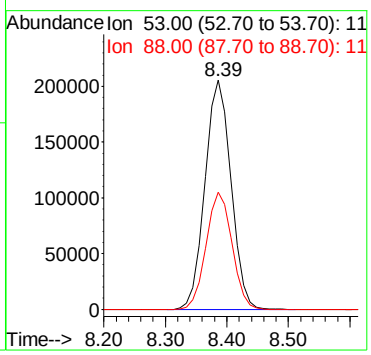


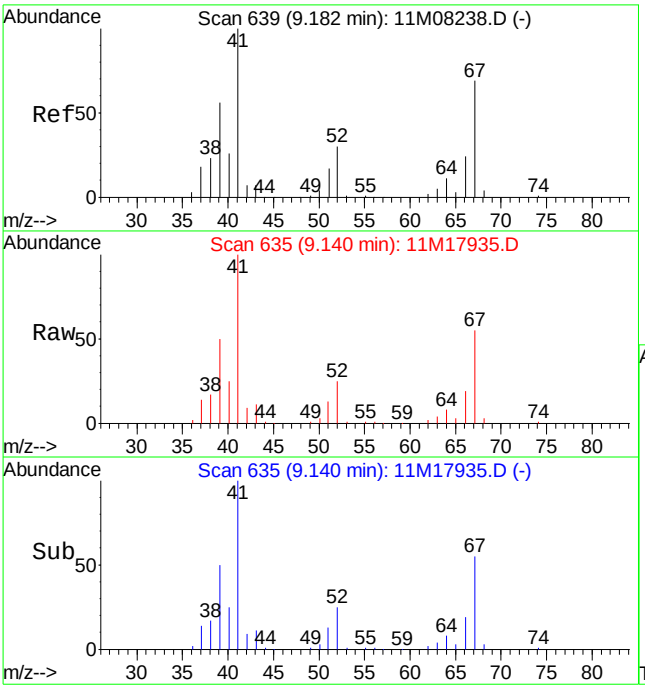


#4
2-Chloro-1,3-butadiene
Concen: 101.78 ug/L
RT: 8.39 min Scan# 562
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 53 Resp: 603583

Ion	Ratio	Lower	Upper
53	100		
88	50.6	0.0	77.7

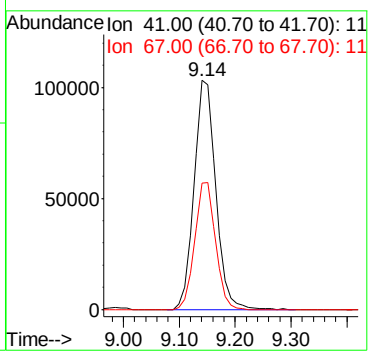


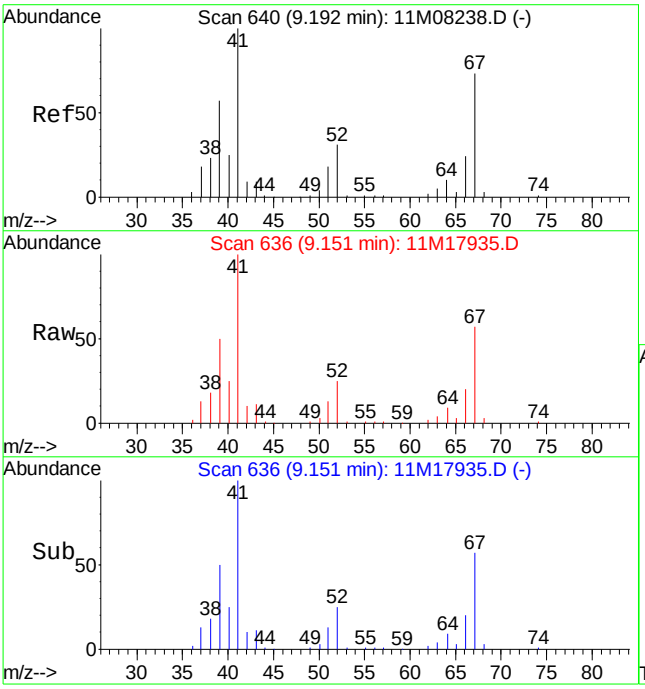


#5
Methacrylonitrile
Concen: 101.23 ug/L
RT: 9.14 min Scan# 635
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 41 Resp: 278089

Ion	Ratio	Lower	Upper
41	100		
67	52.9	0.0	80.0

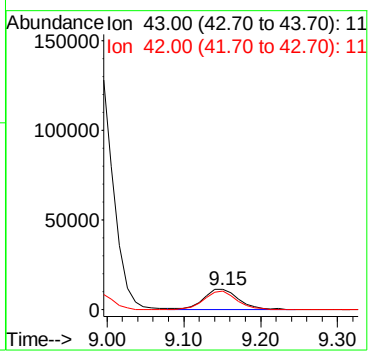


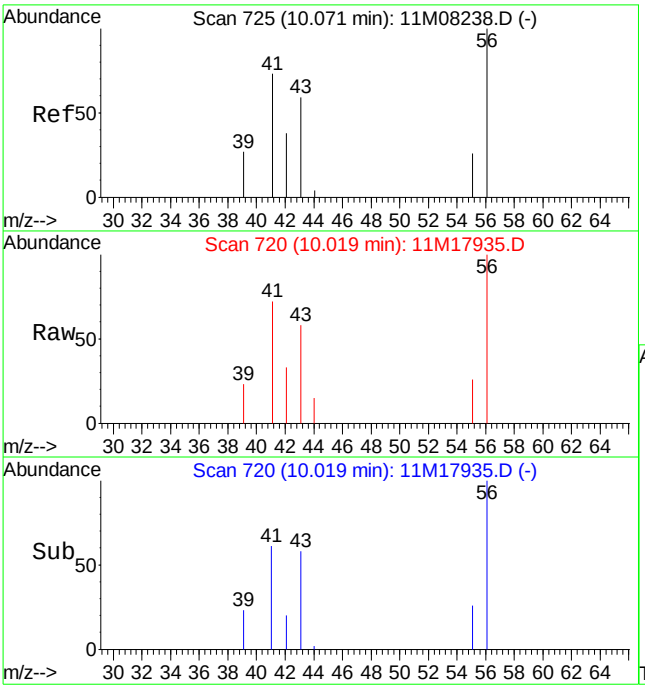


#6
Isobutyl Alcohol
Concen: 177.72 ug/L
RT: 9.15 min Scan# 636
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 43 Resp: 34966

Ion	Ratio	Lower	Upper
43	100		
42	82.7	55.2	135.2

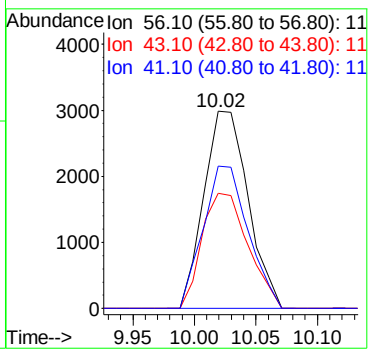


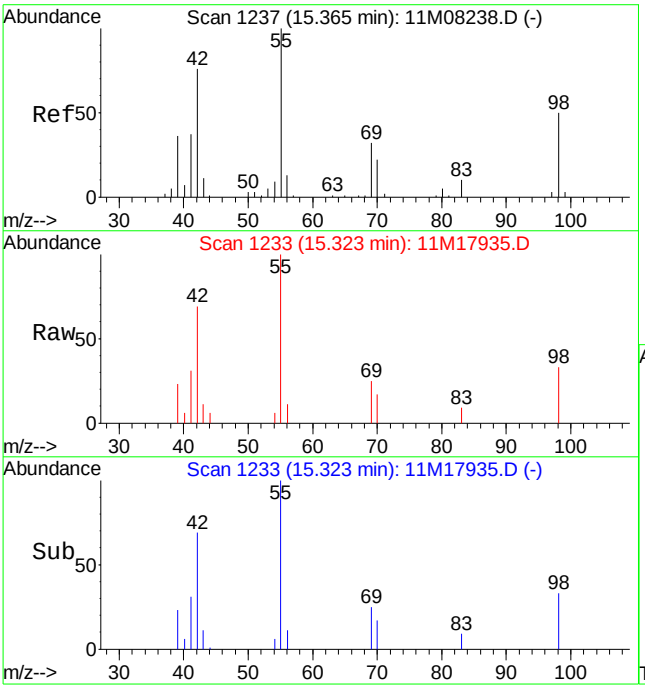


#7
1-Butanol
Concen: 103.49 ug/L
RT: 10.02 min Scan# 720
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 56 Resp: 7469

Ion	Ratio	Lower	Upper
56	100		
43	60.8	49.8	74.6
41	73.3	81.1	121.7#

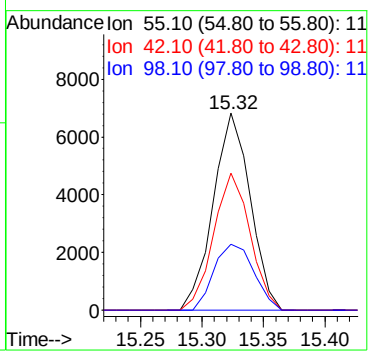


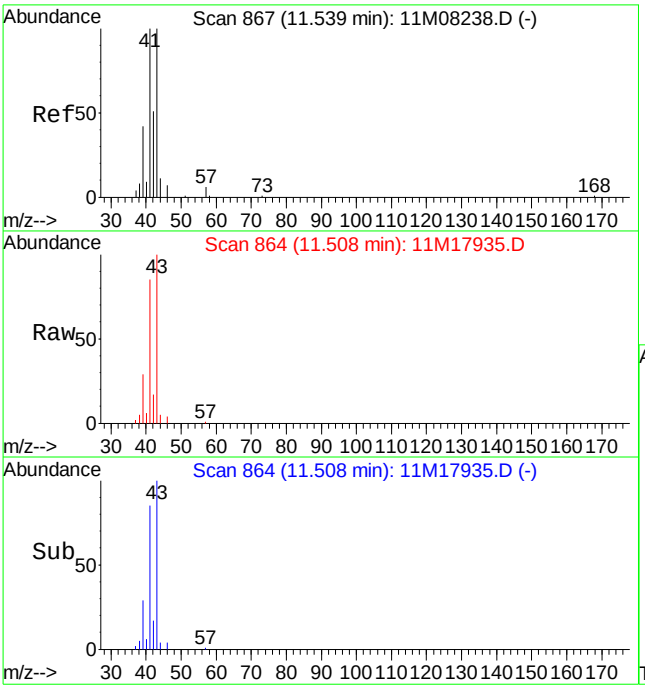


#8
Cyclohexanone
Concen: 107.20 ug/L
RT: 15.32 min Scan# 1233
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 55 Resp: 14321

Ion	Ratio	Lower	Upper
55	100		
42	68.4	63.8	95.8
98	36.1	22.7	34.1#

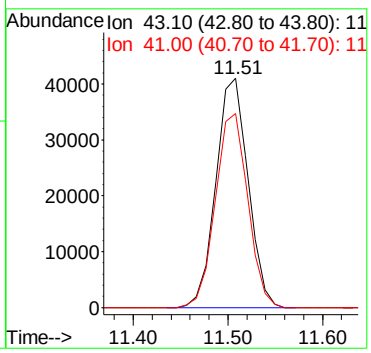


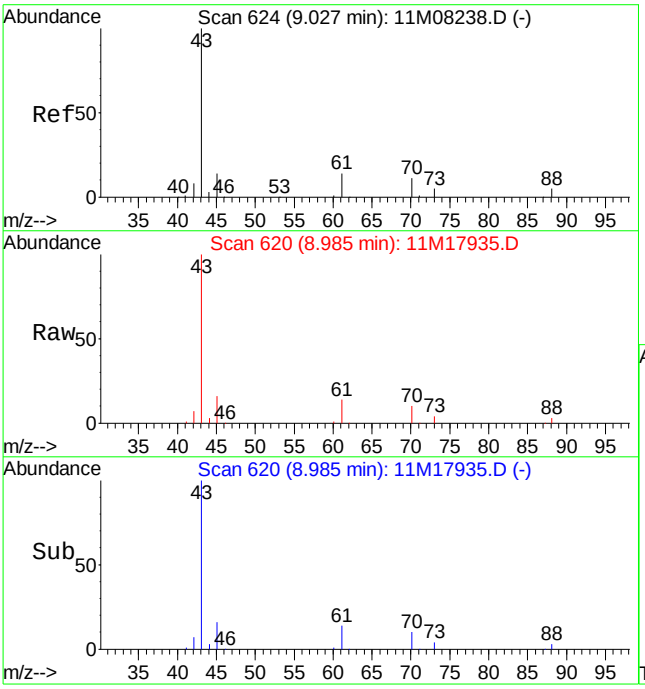


#9
2-Nitropropane
Concen: 93.30 ug/L
RT: 11.51 min Scan# 864
Delta R.T. -0.01 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 43 Resp: 96485

Ion	Ratio	Lower	Upper
43	100		
41	85.2	71.3	106.9

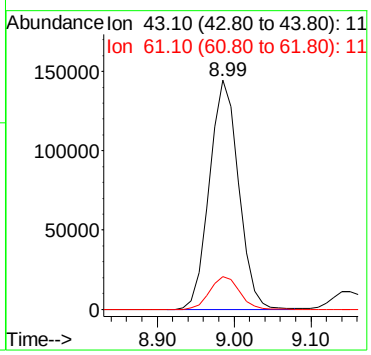


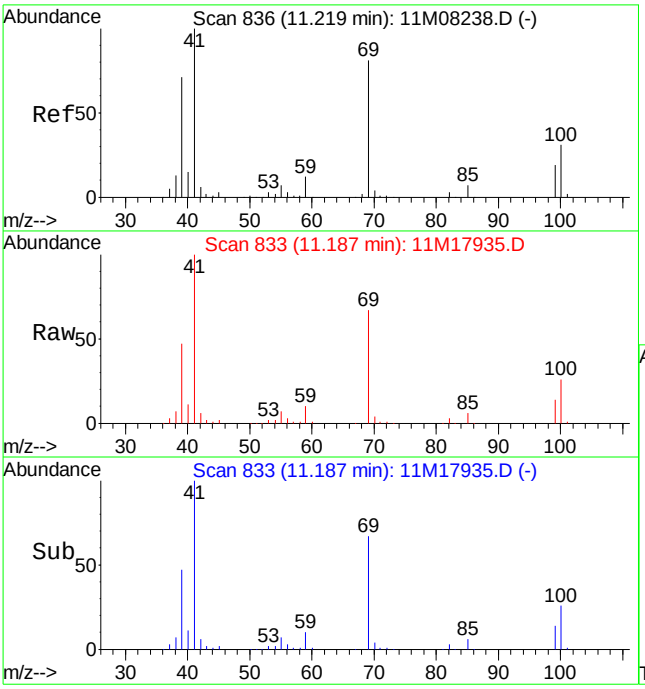


#10
Ethyl Acetate
Concen: 103.08 ug/L
RT: 8.99 min Scan# 620
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 43 Resp: 381287

Ion	Ratio	Lower	Upper
43	100		
61	14.5	8.6	13.0#

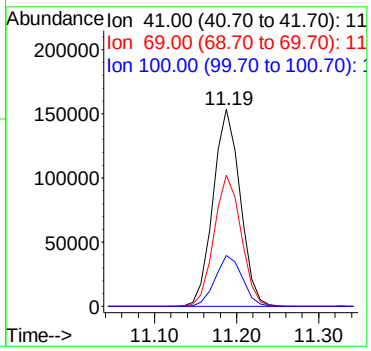




#11
Methyl methacrylate
Concen: 103.70 ug/L
RT: 11.19 min Scan# 833
Delta R.T. -0.02 min
Lab File: 11M17935.D
Acq: 1 May 2017 16:21

Tgt Ion: 41 Resp: 353441

Ion	Ratio	Lower	Upper
41	100		
69	66.2	9.0	89.0
100	25.9	0.0	58.5



Evaluate Continuing Calibration Report

Data File : C:\MSDCHEM\1\DATA\050117\11M17935.D Vial: 2
Acq On : 1 May 2017 16:21 Operator: JDS
Sample : WG612299-01 100ug/L A9 CCV STD 8260 Inst : hpms11
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	84	-0.01
2	T	Acetonitrile	100.0000	93.9301	6.1	83	-0.02
3	T	3-Chloro-1-propene	100.0000	105.0745	-5.1	81	-0.02
4	T	2-Chloro-1,3-butadiene	100.0000	101.7798	-1.8	79	-0.02
5	T	Methacrylonitrile	100.0000	101.2258	-1.2	82	-0.02
6	T	Isobutyl Alcohol	200.0000	177.7193	11.1	84	-0.02
7	T	1-Butanol	100.0000	103.4925	-3.5	88	-0.02
8	T	Cyclohexanone	100.0000	107.2021	-7.2	108	-0.02
9	T	2-Nitropropane	100.0000	93.2968	6.7	84	-0.01
10	T	Ethyl Acetate	100.0000	103.0849	-3.1	83	-0.02
11	T	Methyl methacrylate	100.0000	103.7004	-3.7	81	-0.02
12	I	Chlorobenzene-d5	25.0000	25.0000	0.0	83	-0.02
13	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	86	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
11M17935.D A9FOOWT.M Thu May 04 09:30:32 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	363141	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	272114	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	136451	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	97691	24.9094	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.638%			
34) 1,2-Dichloroethane-d4	4.962	65	89130	24.2463	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 96.985%			
47) Toluene-d8	6.815	98	344995	25.4042	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.617%			
66) p-Bromofluorobenzene	8.787	95	118708	25.9826	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.930%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	247466	57.3796	ug/L	100
3) Chloromethane	1.224	50	216970	51.4059	ug/L	100
4) Vinyl Chloride	1.270	62	248472	53.1642	ug/L	99
5) 1,3-Butadiene	1.282	54	153629	53.5367	ug/L	99
6) Bromomethane	1.464	94	140052	40.3055	ug/L	100
7) Chloroethane	1.537	64	100874	45.4962	ug/L	98
8) Trichlorofluoromethane	1.621	101	323566	53.9730	ug/L	99
9) Diethyl ether	1.846	59	263021	90.9792	ug/L	97
10) 1,1-Dichloroethene	1.965	61	293938	52.4014	ug/L	98
11) Carbon Disulfide	1.980	76	611134	50.7623	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.997	101	194081	54.2708	ug/L	98
13) Iodomethane	2.066	142	259066	47.9741	ug/L	98
14) Acrolein	2.229	56	14575	40.8136	ug/L	99
15) Methylene Chloride	2.408	84	204463	48.0369	ug/L	96
16) Acetone	2.472	43	28629	39.2097	ug/L	100
17) trans-1,2-Dichloroethene	2.541	96	194186	50.8414	ug/L	99
18) Methyl acetate	2.576	43	97248	50.8038	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	446255	46.0381	ug/L #	26
20) 1,1-Dichloroethane	3.120	63	357053	52.0475	ug/L	100
21) Acrylonitrile	3.187	53	41938	45.0318	ug/L	100
22) Vinyl Acetate	2.617	86	35110	57.1159	ug/L	95
23) cis-1,2-Dichloroethene	3.737	96	215849	49.9261	ug/L	98
24) 2,2-Dichloropropane	3.867	77	306201	56.3065	ug/L	97
25) Cyclohexane	3.969	56	308581	52.8853	ug/L	98
26) Bromochloromethane	3.986	130	135801	48.7518	ug/L	99
27) Chloroform	4.116	83	355358	49.6838	ug/L	99
28) Carbon Tetrachloride	4.255	117	289250	51.1409	ug/L	100
30) 1,1,1-Trichloroethane	4.348	97	316701	50.3638	ug/L	99
31) 1,1-Dichloropropene	4.507	75	256593	51.9575	ug/L	98
32) 2-Butanone	4.536	43	48538	44.5899	ug/L	98
33) Benzene	4.800	78	778495	50.3289	ug/L	99
35) 1,2-Dichloroethane	5.037	62	229668	47.6843	ug/L	99
36) Methylcyclohexane	5.425	83	313998	51.3626	ug/L	98
37) Trichloroethene	5.451	130	219668	47.2806	ug/L	97
38) Dibromomethane	5.862	93	111128	46.9073	ug/L	100
39) 1,2-Dichloropropane	5.969	63	204742	50.4735	ug/L	100
40) Bromodichloromethane	6.050	83	267979	49.4958	ug/L	100
41) 1,4-Dioxane	6.259	88	4547	225.0508	ug/L	94
42) 2-Chloroethyl Vinyl Ether	6.632	63	85234	46.3245	ug/L	99
43) cis-1,3-Dichloropropene	6.650	75	319607	52.3852	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	43157	42.8202	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	261455	50.4084	ug/L	99
48) Toluene	6.858	91	867696	50.8604	ug/L	100
49) Tetrachloroethene	7.185	166	240450	49.4146	ug/L	99
50) 1,1,2-Trichloroethane	7.374	97	151611	45.8492	ug/L	99
51) Dibromochloromethane	7.507	129	211312	46.8171	ug/L	99

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

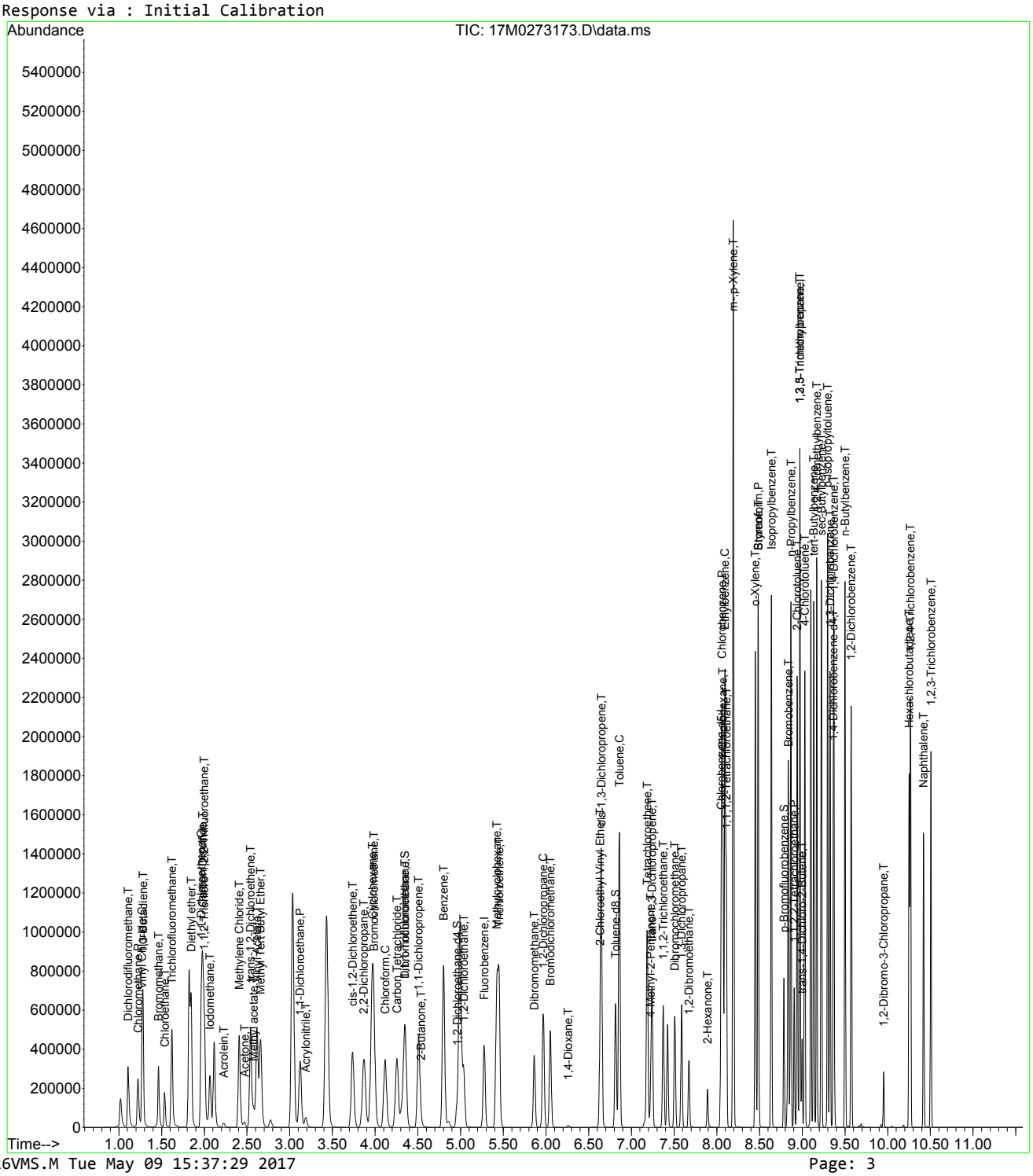
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	247157	47.0294	ug/L		98
53) 1,2-Dibromoethane	7.675	107	153231	45.2284	ug/L		99
54) 2-Hexanone	7.892	43	76910	44.2902	ug/L		97
55) Chlorobenzene	8.060	112	561280	49.0328	ug/L		97
56) 1-Chlorohexane	8.071	69	49565	53.6310	ug/L		99
57) Ethylbenzene	8.095	106	303130	50.8722	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.112	131	213477	47.9078	ug/L		99
59) m-,p-Xylene	8.193	106	741624	103.1276	ug/L		98
60) o-Xylene	8.451	106	353516	49.8927	ug/L		97
61) Styrene	8.485	104	591181	52.1448	ug/L		100
62) Bromoform	8.485	173	145973	45.9749	ug/L		100
63) Isopropylbenzene	8.639	105	931347	50.7810	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	806348	53.0094	ug/L		99
67) Bromobenzene	8.839	156	259048	48.2628	ug/L		97
68) n-Propylbenzene	8.868	91	1092488	54.2179	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	181408	49.4243	ug/L		100
70) 2-Chlorotoluene	8.940	91	648360	52.1304	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	48891	45.0585	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	40936	50.6091	ug/L	#	96
73) 1,2,4-Trimethylbenzene	9.169	105	805898	52.5402	ug/L		99
74) 4-Chlorotoluene	9.030	91	657869	52.9822	ug/L		98
75) tert-Butylbenzene	9.134	134	152816	50.2669	ug/L		99
76) sec-Butylbenzene	9.224	105	988788	52.7638	ug/L		99
77) p-Isopropyltoluene	9.296	119	850255	53.2246	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	481408	51.4488	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	472484	50.0155	ug/L		100
80) n-Butylbenzene	9.502	91	764382	56.6922	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	446250	48.9343	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.953	75	32815	48.7336	ug/L		92
83) Hexachlorobutadiene	10.252	225	185946	48.3681	ug/L		99
84) 1,2,4-Trichlorobenzene	10.266	180	342828	50.6055	ug/L		100
85) Naphthalene	10.419	128	588429	44.5426	ug/L		100
86) 1,2,3-Trichlorobenzene	10.506	180	302820	46.0190	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:37:28 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:37:29 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	0.297	0.341	-14.8	91	0.012
3	P	Chloromethane	0.291	0.299	-2.7	90	0.012
4	C	Vinyl Chloride	0.322	0.342	-6.2#	90	0.000
5	T	1,3-Butadiene	0.198	0.212	-7.1	90	0.012
6	T	Bromomethane	0.239	0.193	19.2	76	0.000
7	T	Chloroethane	0.153	0.139	9.2	89	0.000
8	T	Trichlorofluoromethane	0.413	0.446	-8.0	87	0.000
9	T	Diethyl ether	0.199	0.181	9.0	77	0.011
10	C	1,1-Dichloroethene	0.386	0.405	-4.9#	91	0.000
11	T	Carbon Disulfide	0.829	0.841	-1.4	86	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.267	-8.5	92	0.000
13	T	Iodomethane	0.286	0.357	-24.8	85	0.000
14	T	Acrolein	0.025	0.020	20.0	66	0.012
15	T	Methylene Chloride	0.293	0.282	3.8	87	0.000
16	T	Acetone	0.050	0.039	22.0	71	0.012
17	T	trans-1,2-Dichloroethene	0.263	0.267	-1.5	88	0.000
18	T	Methyl acetate	0.132	0.134	-1.5	76	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.614	7.9	78	0.000
20	P	1,1-Dichloroethane	0.472	0.492	-4.2	89	0.000
21	T	Acrylonitrile	0.064	0.058	9.4	75	0.000
22	T	Vinyl Acetate	0.042	0.048	-14.3	93	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.297	0.3	86	0.000
24	T	2,2-Dichloropropane	0.321	0.422	-31.5#	97	0.000
25	T	Cyclohexane	0.402	0.425	-5.7	88	0.000
26	T	Bromochloromethane	0.192	0.187	2.6	81	0.012
27	C	Chloroform	0.492	0.489	0.6#	87	0.000
28	T	Carbon Tetrachloride	0.389	0.398	-2.3	85	0.000
29	S	Dibromofluoromethane	0.270	0.269	0.4	84	0.000
30	T	1,1,1-Trichloroethane	0.433	0.436	-0.7	86	0.000
31	T	1,1-Dichloropropene	0.340	0.353	-3.8	87	0.000
32	T	2-Butanone	0.075	0.067	10.7	77	0.012
33	T	Benzene	1.065	1.072	-0.7	88	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.245	3.2	82	0.000
35	T	1,2-Dichloroethane	0.332	0.316	4.8	83	0.000
36	T	Methylcyclohexane	0.421	0.432	-2.6	86	0.000
37	T	Trichloroethene	0.320	0.302	5.6	83	0.000
38	T	Dibromomethane	0.163	0.153	6.1	79	0.000
39	C	1,2-Dichloropropane	0.279	0.282	-1.1#	86	0.000
40	T	Bromodichloromethane	0.373	0.369	1.1	84	0.000
41	T	1,4-Dioxane	0.001	0.002	-100.0#	98	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.117	7.9	80	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.440	-4.8	86	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.059	14.5	74	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.360	-0.8	83	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	86	0.000
47	S	Toluene-d8	1.248	1.268	-1.6	85	0.000
48	C	Toluene	1.567	1.594	-1.7#	87	0.000
49	T	Tetrachloroethene	0.447	0.442	1.1	84	0.000
50	T	1,1,2-Trichloroethane	0.304	0.279	8.2	78	0.000
51	T	Dibromochloromethane	0.415	0.388	6.5	77	0.000
52	T	1,3-Dichloropropane	0.483	0.454	6.0	80	0.000
53	T	1,2-Dibromoethane	0.311	0.282	9.3	76	0.000
54	T	2-Hexanone	0.160	0.141	11.9	75	0.000
55	P	Chlorobenzene	1.052	1.031	2.0	84	0.000
56	T	1-Chlorohexane	0.085	0.091	-7.1	87	0.000
57	C	Ethylbenzene	0.547	0.557	-1.8#	85	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.392	4.2	81	0.000
59	T	m-,p-Xylene	0.661	0.681	-3.0	86	0.000
60	T	o-Xylene	0.651	0.650	0.2	84	0.000
61	T	Styrene	1.042	1.086	-4.2	84	0.000
62	P	Bromoform	0.292	0.268	8.2	72	0.000
63	T	Isopropylbenzene	1.685	1.711	-1.5	85	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.955	-6.0	86	0.000
66	S	p-Bromofluorobenzene	0.837	0.870	-3.9	84	0.000
67	T	Bromobenzene	0.983	0.949	3.5	80	0.000
68	T	n-Propylbenzene	3.692	4.003	-8.4	88	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.665	1.0	76	0.000
70	T	2-Chlorotoluene	2.279	2.376	-4.3	86	0.000
71	T	1,2,3-Trichloropropane	0.199	0.179	10.1	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.150	-1.4	75	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.953	-5.1	85	0.000
74	T	4-Chlorotoluene	2.275	2.411	-6.0	86	0.000
75	T	tert-Butylbenzene	0.557	0.560	-0.5	83	0.000
76	T	sec-Butylbenzene	3.433	3.623	-5.5	85	0.000
77	T	p-Isopropyltoluene	2.927	3.116	-6.5	84	0.000
78	T	1,3-Dichlorobenzene	1.714	1.764	-2.9	84	0.000
79	T	1,4-Dichlorobenzene	1.731	1.731	0.0	83	0.000
80	T	n-Butylbenzene	2.470	2.801	-13.4	87	0.000
81	T	1,2-Dichlorobenzene	1.671	1.635	2.2	80	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.120	2.4	74	0.000
83	T	Hexachlorobutadiene	0.704	0.681	3.3	76	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.256	-1.2	77	0.000
85	T	Naphthalene	2.420	2.156	10.9	68	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.110	8.0	72	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	50.000	57.380	-14.8	91	0.012
3	P	Chloromethane	50.000	51.406	-2.8	90	0.012
4	C	Vinyl Chloride	50.000	53.164	-6.3#	90	0.000
5	T	1,3-Butadiene	50.000	53.537	-7.1	90	0.012
6	T	Bromomethane	50.000	40.305	19.4	76	0.000
7	T	Chloroethane	50.000	45.496	9.0	89	0.000
8	T	Trichlorofluoromethane	50.000	53.973	-7.9	87	0.000
9	T	Diethyl ether	100.000	90.979	9.0	77	0.011
10	C	1,1-Dichloroethene	50.000	52.401	-4.8#	91	0.000
11	T	Carbon Disulfide	50.000	50.762	-1.5	86	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	54.271	-8.5	92	0.000
13	T	Iodomethane	50.000	47.974	4.1	85	0.000
14	T	Acrolein	50.000	40.814	18.4	66	0.012
15	T	Methylene Chloride	50.000	48.037	3.9	87	0.000
16	T	Acetone	50.000	39.210	21.6	71	0.012
17	T	trans-1,2-Dichloroethene	50.000	50.841	-1.7	88	0.000
18	T	Methyl acetate	50.000	50.804	-1.6	76	0.000
19	T	Methyl Tert Butyl Ether	50.000	46.038	7.9	78	0.000
20	P	1,1-Dichloroethane	50.000	52.048	-4.1	89	0.000
21	T	Acrylonitrile	50.000	45.032	9.9	75	0.000
22	T	Vinyl Acetate	50.000	57.116	-14.2	93	0.000
23	T	cis-1,2-Dichloroethene	50.000	49.926	0.1	86	0.000
24	T	2,2-Dichloropropane	50.000	56.306	-12.6	97	0.000
25	T	Cyclohexane	50.000	52.885	-5.8	88	0.000
26	T	Bromochloromethane	50.000	48.752	2.5	81	0.012
27	C	Chloroform	50.000	49.684	0.6#	87	0.000
28	T	Carbon Tetrachloride	50.000	51.141	-2.3	85	0.000
29	S	Dibromofluoromethane	25.000	24.909	0.4	84	0.000
30	T	1,1,1-Trichloroethane	50.000	50.364	-0.7	86	0.000
31	T	1,1-Dichloropropene	50.000	51.958	-3.9	87	0.000
32	T	2-Butanone	50.000	44.590	10.8	77	0.012
33	T	Benzene	50.000	50.329	-0.7	88	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.246	3.0	82	0.000
35	T	1,2-Dichloroethane	50.000	47.684	4.6	83	0.000
36	T	Methylcyclohexane	50.000	51.363	-2.7	86	0.000
37	T	Trichloroethene	50.000	47.281	5.4	83	0.000
38	T	Dibromomethane	50.000	46.907	6.2	79	0.000
39	C	1,2-Dichloropropane	50.000	50.473	-0.9#	86	0.000
40	T	Bromodichloromethane	50.000	49.496	1.0	84	0.000
41	T	1,4-Dioxane	200.000	225.051	-12.5	98	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	46.324	7.4	80	0.000
43	T	cis-1,3-Dichloropropene	50.000	52.385	-4.8	86	0.000
44	T	4-Methyl-2-Pentanone	50.000	42.820	14.4	74	0.000
45	T	trans-1,3-Dichloropropene	50.000	50.408	-0.8	83	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	86	0.000
47	S	Toluene-d8	25.000	25.404	-1.6	85	0.000
48	C	Toluene	50.000	50.860	-1.7#	87	0.000
49	T	Tetrachloroethene	50.000	49.415	1.2	84	0.000
50	T	1,1,2-Trichloroethane	50.000	45.849	8.3	78	0.000
51	T	Dibromochloromethane	50.000	46.817	6.4	77	0.000
52	T	1,3-Dichloropropane	50.000	47.029	5.9	80	0.000
53	T	1,2-Dibromoethane	50.000	45.228	9.5	76	0.000
54	T	2-Hexanone	50.000	44.290	11.4	75	0.000
55	P	Chlorobenzene	50.000	49.033	1.9	84	0.000
56	T	1-Chlorohexane	50.000	53.631	-7.3	87	0.000
57	C	Ethylbenzene	50.000	50.872	-1.7#	85	0.000

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273173.D Vial: 1
Acq On : 30 Apr 2017 14:54 Operator: ADC
Sample : WG612141-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 15:06:05 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	47.908	4.2	81	0.000
59	T	m-,p-Xylene	100.000	103.128	-3.1	86	0.000
60	T	o-Xylene	50.000	49.893	0.2	84	0.000
61	T	Styrene	50.000	52.145	-4.3	84	0.000
62	P	Bromoform	50.000	45.975	8.0	72	0.000
63	T	Isopropylbenzene	50.000	50.781	-1.6	85	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	50.000	53.009	-6.0	86	0.000
66	S	p-Bromofluorobenzene	25.000	25.983	-3.9	84	0.000
67	T	Bromobenzene	50.000	48.263	3.5	80	0.000
68	T	n-Propylbenzene	50.000	54.218	-8.4	88	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	49.424	1.2	76	0.000
70	T	2-Chlorotoluene	50.000	52.130	-4.3	86	0.000
71	T	1,2,3-Trichloropropane	50.000	45.058	9.9	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	50.609	-1.2	75	0.000
73	T	1,2,4-Trimethylbenzene	50.000	52.540	-5.1	85	0.000
74	T	4-Chlorotoluene	50.000	52.982	-6.0	86	0.000
75	T	tert-Butylbenzene	50.000	50.267	-0.5	83	0.000
76	T	sec-Butylbenzene	50.000	52.764	-5.5	85	0.000
77	T	p-Isopropyltoluene	50.000	53.225	-6.5	84	0.000
78	T	1,3-Dichlorobenzene	50.000	51.449	-2.9	84	0.000
79	T	1,4-Dichlorobenzene	50.000	50.015	-0.0	83	0.000
80	T	n-Butylbenzene	50.000	56.692	-13.4	87	0.000
81	T	1,2-Dichlorobenzene	50.000	48.934	2.1	80	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	48.734	2.5	74	0.000
83	T	Hexachlorobutadiene	50.000	48.368	3.3	76	0.000
84	T	1,2,4-Trichlorobenzene	50.000	50.605	-1.2	77	0.000
85	T	Naphthalene	50.000	44.543	10.9	68	0.000
86	T	1,2,3-Trichlorobenzene	50.000	46.019	8.0	72	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	363669	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.051	117	270421	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	140313	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.351	111	99614	25.3629	ug/L	0.0117
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.452%			
34) 1,2-Dichloroethane-d4	4.962	65	90738	24.6479	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 98.592%			
47) Toluene-d8	6.815	98	350721	25.9875	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.950%			
66) p-Bromofluorobenzene	8.786	95	120937	25.7419	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.968%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.108	85	241242	55.8552	ug/L	100
3) Chloromethane	1.224	50	218123	51.6040	ug/L	99
4) Vinyl Chloride	1.270	62	241455	51.5878	ug/L	100
5) 1,3-Butadiene	1.282	54	151602	52.7537	ug/L	98
6) Bromomethane	1.464	94	137056	39.3860	ug/L	99
7) Chloroethane	1.536	64	100196	45.1248	ug/L	98
8) Trichlorofluoromethane	1.623	101	323023	53.8042	ug/L	99
9) Diethyl ether	1.846	59	272538	94.1343	ug/L	97
10) 1,1-Dichloroethene	1.968	61	287753	51.2243	ug/L	97
11) Carbon Disulfide	1.979	76	617019	51.1767	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	191806	53.5568	ug/L	98
13) Iodomethane	2.066	142	248266	45.9936	ug/L	98
14) Acrolein	2.226	56	14606	40.8410	ug/L	99
15) Methylene Chloride	2.408	84	206307	48.3997	ug/L	96
16) Acetone	2.469	43	29727	40.6544	ug/L	98
17) trans-1,2-Dichloroethene	2.544	96	190787	49.8790	ug/L	98
18) Methyl acetate	2.576	43	99329	51.8156	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	445369	45.8800	ug/L #	27
20) 1,1-Dichloroethane	3.123	63	352607	51.3248	ug/L	100
21) Acrylonitrile	3.187	53	42651	45.7309	ug/L	99
22) Vinyl Acetate	2.616	86	35417	57.5316	ug/L	95
23) cis-1,2-Dichloroethene	3.737	96	211975	48.9588	ug/L	97
24) 2,2-Dichloropropane	3.870	77	299473	54.9957	ug/L	96
25) Cyclohexane	3.969	56	307533	52.6292	ug/L	98
26) Bromochloromethane	3.986	130	135382	48.5308	ug/L	99
27) Chloroform	4.116	83	351420	49.0619	ug/L	100
28) Carbon Tetrachloride	4.255	117	286074	50.5060	ug/L	100
30) 1,1,1-Trichloroethane	4.351	97	311384	49.4464	ug/L	99
31) 1,1-Dichloropropene	4.510	75	251446	50.8414	ug/L	98
32) 2-Butanone	4.536	43	47910	43.9491	ug/L	99
33) Benzene	4.802	78	766085	49.4547	ug/L	99
35) 1,2-Dichloroethane	5.037	62	229423	47.5643	ug/L	99
36) Methylcyclohexane	5.428	83	311870	50.9404	ug/L	98
37) Trichloroethene	5.451	130	217357	46.7153	ug/L	98
38) Dibromomethane	5.862	93	111462	46.9800	ug/L	99
39) 1,2-Dichloropropane	5.969	63	204533	50.3488	ug/L	99
40) Bromodichloromethane	6.050	83	265861	49.0333	ug/L	100
41) 1,4-Dioxane	6.265	88	3666	181.1828	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.629	63	79622	43.2116	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	315972	51.7143	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	42360	41.9684	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	261542	50.3520	ug/L	99
48) Toluene	6.858	91	853508	50.3420	ug/L	100
49) Tetrachloroethene	7.185	166	236216	48.8484	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	151981	46.2488	ug/L	99
51) Dibromochloromethane	7.507	129	213307	47.5550	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

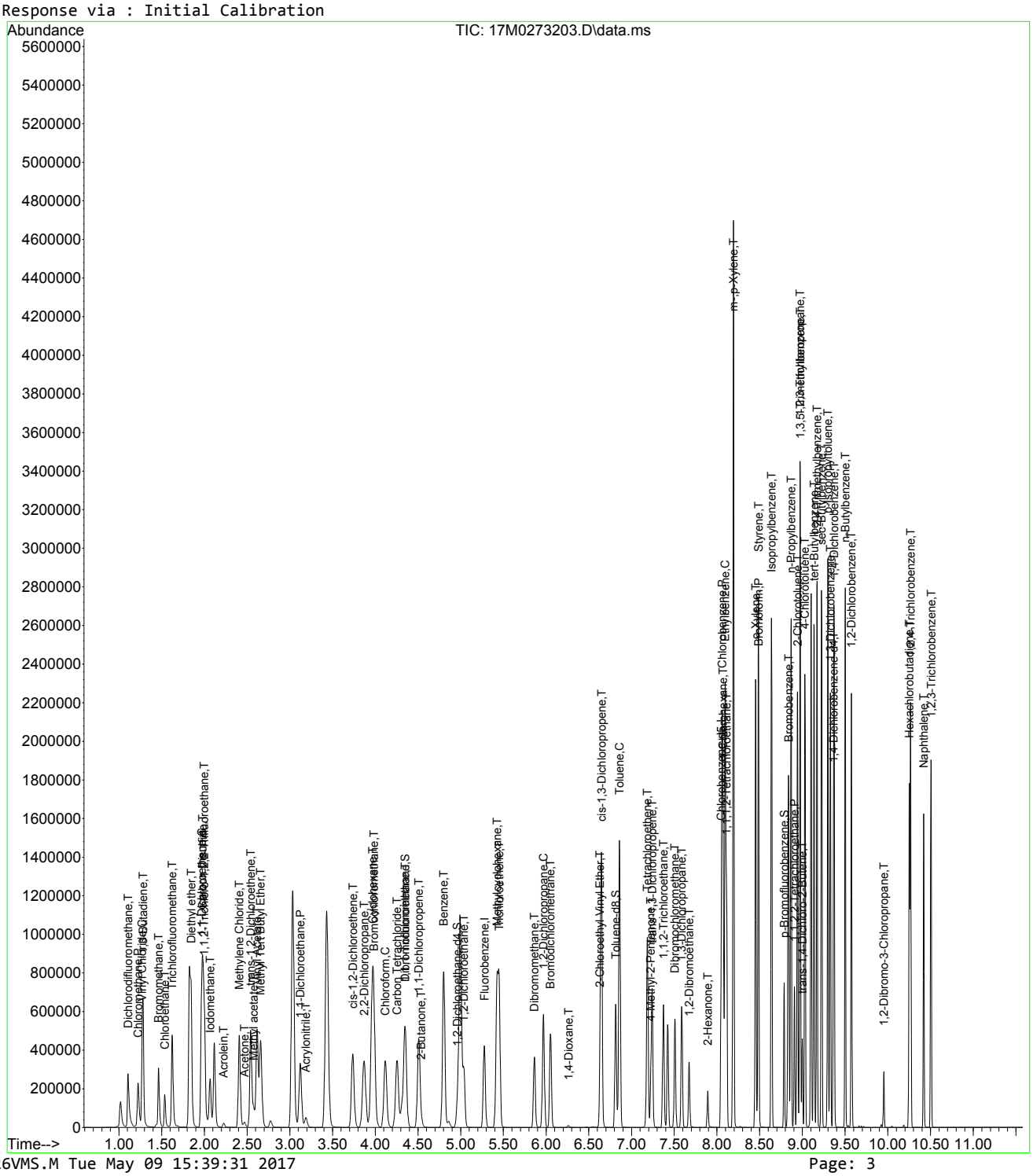
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	248185	47.5206	ug/L		98
53) 1,2-Dibromoethane	7.675	107	152410	45.2677	ug/L		99
54) 2-Hexanone	7.892	43	73017	42.3115	ug/L		98
55) Chlorobenzene	8.060	112	556648	48.9326	ug/L		97
56) 1-Chlorohexane	8.071	69	49340	53.7217	ug/L		96
57) Ethylbenzene	8.094	106	299623	50.5985	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	213485	48.2095	ug/L		99
59) m-,p-Xylene	8.193	106	730437	102.2079	ug/L		98
60) o-Xylene	8.453	106	350074	49.7162	ug/L		97
61) Styrene	8.485	104	585306	51.9498	ug/L		99
62) Bromoform	8.488	173	148880	47.1840	ug/L		99
63) Isopropylbenzene	8.639	105	913948	50.1443	ug/L		99
65) 1,3,5-Trimethylbenzene	8.975	105	792165	50.6436	ug/L		99
67) Bromobenzene	8.838	156	259606	47.0355	ug/L		98
68) n-Propylbenzene	8.867	91	1072155	51.7443	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	186542	49.4242	ug/L		100
70) 2-Chlorotoluene	8.943	91	636946	49.8031	ug/L		98
71) 1,2,3-Trichloropropane	8.972	110	49726	44.5666	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	41213	49.5492	ug/L	#	98
73) 1,2,4-Trimethylbenzene	9.171	105	798963	50.6544	ug/L		99
74) 4-Chlorotoluene	9.030	91	650954	50.9823	ug/L		99
75) tert-Butylbenzene	9.137	134	149980	47.9762	ug/L		99
76) sec-Butylbenzene	9.224	105	973277	50.5066	ug/L		99
77) p-Isopropyltoluene	9.296	119	837585	50.9883	ug/L		100
78) 1,3-Dichlorobenzene	9.328	146	479848	49.8706	ug/L		100
79) 1,4-Dichlorobenzene	9.371	146	473539	48.7474	ug/L		100
80) n-Butylbenzene	9.502	91	753166	54.3228	ug/L		98
81) 1,2-Dichlorobenzene	9.574	146	452662	48.2712	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.953	75	33167	47.9006	ug/L		92
83) Hexachlorobutadiene	10.251	225	182066	46.0553	ug/L		100
84) 1,2,4-Trichlorobenzene	10.266	180	344958	49.5184	ug/L		100
85) Naphthalene	10.419	128	605118	44.5451	ug/L		100
86) 1,2,3-Trichlorobenzene	10.506	180	309064	45.6751	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:30 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:31 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	0.297	0.332	-11.8	88	0.012
3	P	Chloromethane	0.291	0.300	-3.1	90	0.012
4	C	Vinyl Chloride	0.322	0.332	-3.1#	88	0.000
5	T	1,3-Butadiene	0.198	0.208	-5.1	89	0.012
6	T	Bromomethane	0.239	0.188	21.3	74	0.000
7	T	Chloroethane	0.153	0.138	9.8	88	0.000
8	T	Trichlorofluoromethane	0.413	0.444	-7.5	87	0.000
9	T	Diethyl ether	0.199	0.187	6.0	79	0.011
10	C	1,1-Dichloroethene	0.386	0.396	-2.6#	89	0.012
11	T	Carbon Disulfide	0.829	0.848	-2.3	87	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.264	-7.3	90	0.012
13	T	Iodomethane	0.286	0.341	-19.2	82	0.000
14	T	Acrolein	0.025	0.020	20.0	66	0.000
15	T	Methylene Chloride	0.293	0.284	3.1	88	0.000
16	T	Acetone	0.050	0.041	18.0	73	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.262	0.4	86	0.012
18	T	Methyl acetate	0.132	0.137	-3.8	77	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.612	8.2	77	0.000
20	P	1,1-Dichloroethane	0.472	0.485	-2.8	88	0.012
21	T	Acrylonitrile	0.064	0.059	7.8	76	0.000
22	T	Vinyl Acetate	0.042	0.049	-16.7	94	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.291	2.3	85	0.000
24	T	2,2-Dichloropropane	0.321	0.412	-28.3#	95	0.012
25	T	Cyclohexane	0.402	0.423	-5.2	87	0.000
26	T	Bromochloromethane	0.192	0.186	3.1	81	0.012
27	C	Chloroform	0.492	0.483	1.8#	86	0.000
28	T	Carbon Tetrachloride	0.389	0.393	-1.0	84	0.000
29	S	Dibromofluoromethane	0.270	0.274	-1.5	86	0.012
30	T	1,1,1-Trichloroethane	0.433	0.428	1.2	85	0.000
31	T	1,1-Dichloropropene	0.340	0.346	-1.8	85	0.000
32	T	2-Butanone	0.075	0.066	12.0	76	0.012
33	T	Benzene	1.065	1.053	1.1	87	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.250	1.2	83	0.000
35	T	1,2-Dichloroethane	0.332	0.315	5.1	83	0.000
36	T	Methylcyclohexane	0.421	0.429	-1.9	85	0.000
37	T	Trichloroethene	0.320	0.299	6.6	82	0.000
38	T	Dibromomethane	0.163	0.153	6.1	79	0.000
39	C	1,2-Dichloropropane	0.279	0.281	-0.7#	86	0.000
40	T	Bromodichloromethane	0.373	0.366	1.9	83	0.000
41	T	1,4-Dioxane	0.001	0.001	0.0	79	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.109	14.2	74	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.434	-3.3	85	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.058	15.9	73	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.360	-0.8	83	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	85	0.000
47	S	Toluene-d8	1.248	1.297	-3.9	86	0.000
48	C	Toluene	1.567	1.578	-0.7#	85	0.000
49	T	Tetrachloroethene	0.447	0.437	2.2	83	0.000
50	T	1,1,2-Trichloroethane	0.304	0.281	7.6	78	0.000
51	T	Dibromochloromethane	0.415	0.394	5.1	78	0.000
52	T	1,3-Dichloropropane	0.483	0.459	5.0	80	0.000
53	T	1,2-Dibromoethane	0.311	0.282	9.3	75	0.000
54	T	2-Hexanone	0.160	0.135	15.6	71	0.000
55	P	Chlorobenzene	1.052	1.029	2.2	83	0.000
56	T	1-Chlorohexane	0.085	0.091	-7.1	87	0.000
57	C	Ethylbenzene	0.547	0.554	-1.3#	85	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.395	3.4	81	0.000
59	T	m-,p-Xylene	0.661	0.675	-2.1	84	0.000
60	T	o-Xylene	0.651	0.647	0.6	83	0.000
61	T	Styrene	1.042	1.082	-3.8	84	0.000
62	P	Bromoform	0.292	0.275	5.8	73	0.000
63	T	Isopropylbenzene	1.685	1.690	-0.3	83	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	84	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.823	-1.3	84	0.000
66	S	p-Bromofluorobenzene	0.837	0.862	-3.0	85	0.000
67	T	Bromobenzene	0.983	0.925	5.9	81	0.000
68	T	n-Propylbenzene	3.692	3.821	-3.5	86	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.665	1.0	78	0.000
70	T	2-Chlorotoluene	2.279	2.270	0.4	85	0.000
71	T	1,2,3-Trichloropropane	0.199	0.177	11.1	75	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.147	0.7	76	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.847	-1.3	84	0.000
74	T	4-Chlorotoluene	2.275	2.320	-2.0	86	0.000
75	T	tert-Butylbenzene	0.557	0.534	4.1	82	0.000
76	T	sec-Butylbenzene	3.433	3.468	-1.0	83	0.000
77	T	p-Isopropyltoluene	2.927	2.985	-2.0	83	0.000
78	T	1,3-Dichlorobenzene	1.714	1.710	0.2	83	0.000
79	T	1,4-Dichlorobenzene	1.731	1.687	2.5	83	0.000
80	T	n-Butylbenzene	2.470	2.684	-8.7	86	0.000
81	T	1,2-Dichlorobenzene	1.671	1.613	3.5	81	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.118	4.1	75	0.000
83	T	Hexachlorobutadiene	0.704	0.649	7.8	74	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.229	1.0	78	0.000
85	T	Naphthalene	2.420	2.156	10.9	70	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.101	8.7	73	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	87	0.000
2	T	Dichlorodifluoromethane	50.000	55.855	-11.7	88	0.012
3	P	Chloromethane	50.000	51.604	-3.2	90	0.012
4	C	Vinyl Chloride	50.000	51.588	-3.2#	88	0.000
5	T	1,3-Butadiene	50.000	52.754	-5.5	89	0.012
6	T	Bromomethane	50.000	39.386	21.2	74	0.000
7	T	Chloroethane	50.000	45.125	9.8	88	0.000
8	T	Trichlorofluoromethane	50.000	53.804	-7.6	87	0.000
9	T	Diethyl ether	100.000	94.134	5.9	79	0.011
10	C	1,1-Dichloroethene	50.000	51.224	-2.4#	89	0.012
11	T	Carbon Disulfide	50.000	51.177	-2.4	87	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	53.557	-7.1	90	0.012
13	T	Iodomethane	50.000	45.994	8.0	82	0.000
14	T	Acrolein	50.000	40.841	18.3	66	0.000
15	T	Methylene Chloride	50.000	48.400	3.2	88	0.000
16	T	Acetone	50.000	40.654	18.7	73	0.000
17	T	trans-1,2-Dichloroethene	50.000	49.879	0.2	86	0.012
18	T	Methyl acetate	50.000	51.816	-3.6	77	0.000
19	T	Methyl Tert Butyl Ether	50.000	45.880	8.2	77	0.000
20	P	1,1-Dichloroethane	50.000	51.325	-2.7	88	0.012
21	T	Acrylonitrile	50.000	45.731	8.5	76	0.000
22	T	Vinyl Acetate	50.000	57.532	-15.1	94	0.000
23	T	cis-1,2-Dichloroethene	50.000	48.959	2.1	85	0.000
24	T	2,2-Dichloropropane	50.000	54.996	-10.0	95	0.012
25	T	Cyclohexane	50.000	52.629	-5.3	87	0.000
26	T	Bromochloromethane	50.000	48.531	2.9	81	0.012
27	C	Chloroform	50.000	49.062	1.9#	86	0.000
28	T	Carbon Tetrachloride	50.000	50.506	-1.0	84	0.000
29	S	Dibromofluoromethane	25.000	25.363	-1.5	86	0.012
30	T	1,1,1-Trichloroethane	50.000	49.446	1.1	85	0.000
31	T	1,1-Dichloropropene	50.000	50.841	-1.7	85	0.000
32	T	2-Butanone	50.000	43.949	12.1	76	0.012
33	T	Benzene	50.000	49.455	1.1	87	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.648	1.4	83	0.000
35	T	1,2-Dichloroethane	50.000	47.564	4.9	83	0.000
36	T	Methylcyclohexane	50.000	50.940	-1.9	85	0.000
37	T	Trichloroethene	50.000	46.715	6.6	82	0.000
38	T	Dibromomethane	50.000	46.980	6.0	79	0.000
39	C	1,2-Dichloropropane	50.000	50.349	-0.7#	86	0.000
40	T	Bromodichloromethane	50.000	49.033	1.9	83	0.000
41	T	1,4-Dioxane	200.000	181.183	9.4	79	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	43.212	13.6	74	0.000
43	T	cis-1,3-Dichloropropene	50.000	51.714	-3.4	85	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.968	16.1	73	0.000
45	T	trans-1,3-Dichloropropene	50.000	50.352	-0.7	83	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	85	0.000
47	S	Toluene-d8	25.000	25.987	-3.9	86	0.000
48	C	Toluene	50.000	50.342	-0.7#	85	0.000
49	T	Tetrachloroethene	50.000	48.848	2.3	83	0.000
50	T	1,1,2-Trichloroethane	50.000	46.249	7.5	78	0.000
51	T	Dibromochloromethane	50.000	47.555	4.9	78	0.000
52	T	1,3-Dichloropropane	50.000	47.521	5.0	80	0.000
53	T	1,2-Dibromoethane	50.000	45.268	9.5	75	0.000
54	T	2-Hexanone	50.000	42.312	15.4	71	0.000
55	P	Chlorobenzene	50.000	48.933	2.1	83	0.000
56	T	1-Chlorohexane	50.000	53.722	-7.4	87	0.000
57	C	Ethylbenzene	50.000	50.598	-1.2#	85	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273203.D Vial: 1
Acq On : 01 May 2017 12:07 Operator: ADC
Sample : WG612249-02 50ug/L CCV 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 12:19:31 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	48.210	3.6	81	0.000
59	T	m-,p-Xylene	100.000	102.208	-2.2	84	0.000
60	T	o-Xylene	50.000	49.716	0.6	83	0.000
61	T	Styrene	50.000	51.950	-3.9	84	0.000
62	P	Bromoform	50.000	47.184	5.6	73	0.000
63	T	Isopropylbenzene	50.000	50.144	-0.3	83	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	84	0.000
65	T	1,3,5-Trimethylbenzene	50.000	50.644	-1.3	84	0.000
66	S	p-Bromofluorobenzene	25.000	25.742	-3.0	85	0.000
67	T	Bromobenzene	50.000	47.035	5.9	81	0.000
68	T	n-Propylbenzene	50.000	51.744	-3.5	86	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	49.424	1.2	78	0.000
70	T	2-Chlorotoluene	50.000	49.803	0.4	85	0.000
71	T	1,2,3-Trichloropropane	50.000	44.567	10.9	75	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	49.549	0.9	76	0.000
73	T	1,2,4-Trimethylbenzene	50.000	50.654	-1.3	84	0.000
74	T	4-Chlorotoluene	50.000	50.982	-2.0	86	0.000
75	T	tert-Butylbenzene	50.000	47.976	4.0	82	0.000
76	T	sec-Butylbenzene	50.000	50.507	-1.0	83	0.000
77	T	p-Isopropyltoluene	50.000	50.988	-2.0	83	0.000
78	T	1,3-Dichlorobenzene	50.000	49.871	0.3	83	0.000
79	T	1,4-Dichlorobenzene	50.000	48.747	2.5	83	0.000
80	T	n-Butylbenzene	50.000	54.323	-8.6	86	0.000
81	T	1,2-Dichlorobenzene	50.000	48.271	3.5	81	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	47.901	4.2	75	0.000
83	T	Hexachlorobutadiene	50.000	46.055	7.9	74	0.000
84	T	1,2,4-Trichlorobenzene	50.000	49.518	1.0	78	0.000
85	T	Naphthalene	50.000	44.545	10.9	70	0.000
86	T	1,2,3-Trichlorobenzene	50.000	45.675	8.7	73	0.014

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	352776	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	267045	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	136621	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	95470	25.0584	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.234%			
34) 1,2-Dichloroethane-d4	4.953	65	86602	24.2508	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 97.003%			
47) Toluene-d8	6.812	98	335506	25.1744	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 100.698%			
66) p-Bromofluorobenzene	8.784	95	113905	24.9003	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 99.601%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.093	85	272218	64.9733	ug/L	100
3) Chloromethane	1.209	50	246925	60.2219	ug/L	99
4) Vinyl Chloride	1.259	62	251519	55.3973	ug/L	100
5) 1,3-Butadiene	1.267	54	144664	51.8938	ug/L	98
6) Bromomethane	1.452	94	144444	42.7908	ug/L	99
7) Chloroethane	1.525	64	107453	49.8874	ug/L	100
8) Trichlorofluoromethane	1.612	101	329119	56.5123	ug/L	99
9) Diethyl ether	1.832	59	276889	98.5902	ug/L	97
10) 1,1-Dichloroethene	1.953	61	292074	53.5989	ug/L	97
11) Carbon Disulfide	1.968	76	592665	50.6746	ug/L	100
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	192152	55.3101	ug/L	98
13) Iodomethane	2.055	142	234421	44.8229	ug/L	98
14) Acrolein	2.214	56	13511	38.9458	ug/L	98
15) Methylene Chloride	2.396	84	201924	48.8342	ug/L	96
16) Acetone	2.454	43	27452	38.7024	ug/L	99
17) trans-1,2-Dichloroethene	2.530	96	189529	51.0801	ug/L	98
18) Methyl acetate	2.561	43	97753	52.5681	ug/L #	98
19) Methyl Tert Butyl Ether	2.642	73	439782	46.7033	ug/L #	26
20) 1,1-Dichloroethane	3.112	63	352532	52.8983	ug/L	100
21) Acrylonitrile	3.175	53	41282	45.6298	ug/L	99
22) Vinyl Acetate	2.608	86	33902	56.7711	ug/L #	49
23) cis-1,2-Dichloroethene	3.725	96	209700	49.9289	ug/L	97
24) 2,2-Dichloropropane	3.856	77	293656	55.5897	ug/L	97
25) Cyclohexane	3.960	56	303941	53.6206	ug/L	98
26) Bromochloromethane	3.971	130	134316	49.6354	ug/L	100
27) Chloroform	4.105	83	348557	50.1648	ug/L	100
28) Carbon Tetrachloride	4.244	117	285550	51.9701	ug/L	99
30) 1,1,1-Trichloroethane	4.339	97	310795	50.8768	ug/L	99
31) 1,1-Dichloropropene	4.498	75	251599	52.4432	ug/L	98
32) 2-Butanone	4.522	43	46362	43.8423	ug/L	98
33) Benzene	4.794	78	765475	50.9412	ug/L	99
35) 1,2-Dichloroethane	5.028	62	227168	48.5510	ug/L	98
36) Methylcyclohexane	5.419	83	305994	51.5239	ug/L	98
37) Trichloroethene	5.445	130	216868	48.0494	ug/L	98
38) Dibromomethane	5.856	93	110805	48.1452	ug/L	100
39) 1,2-Dichloropropane	5.963	63	204418	51.8742	ug/L	99
40) Bromodichloromethane	6.047	83	265599	50.4975	ug/L	100
41) 1,4-Dioxane	6.256	88	2980	151.8267	ug/L	100
42) 2-Chloroethyl Vinyl Ether	6.626	63	81095	45.3699	ug/L	99
43) cis-1,3-Dichloropropene	6.647	75	315839	53.2886	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	40698	41.5668	ug/L	98
45) trans-1,3-Dichloropropene	7.240	75	259387	51.4790	ug/L	99
48) Toluene	6.855	91	853025	50.9496	ug/L	100
49) Tetrachloroethene	7.182	166	236093	49.4402	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	151439	46.6665	ug/L	99
51) Dibromochloromethane	7.507	129	211505	47.7494	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

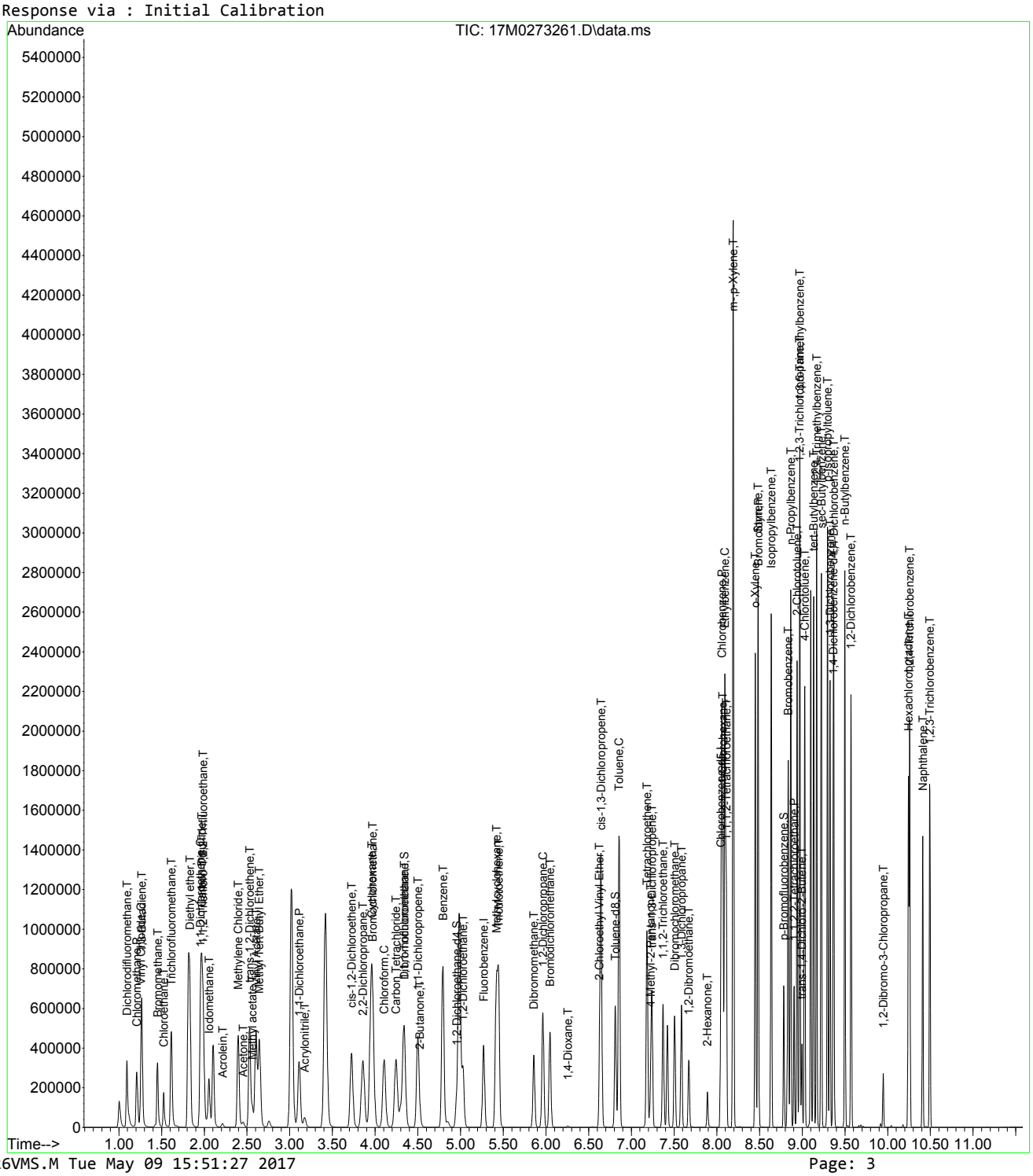
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.585	76	248530	48.1883	ug/L		98
53) 1,2-Dibromoethane	7.672	107	152925	45.9949	ug/L		99
54) 2-Hexanone	7.889	43	70597	41.4264	ug/L		97
55) Chlorobenzene	8.060	112	557208	49.6010	ug/L		98
56) 1-Chlorohexane	8.071	69	48208	53.1528	ug/L		98
57) Ethylbenzene	8.094	106	298912	51.1165	ug/L		98
58) 1,1,1,2-Tetrachloroethane	8.112	131	213257	48.7669	ug/L		99
59) m-,p-Xylene	8.193	106	731898	103.7070	ug/L		98
60) o-Xylene	8.451	106	348792	50.1603	ug/L		98
61) Styrene	8.482	104	584976	52.5769	ug/L		99
62) Bromoform	8.485	173	146019	46.8623	ug/L		99
63) Isopropylbenzene	8.636	105	914962	50.8346	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	788032	51.7408	ug/L		99
67) Bromobenzene	8.836	156	258007	48.0090	ug/L		97
68) n-Propylbenzene	8.865	91	1071292	53.0998	ug/L		99
69) 1,1,2,2-Tetrachloroethane	8.905	83	181407	49.3626	ug/L		100
70) 2-Chlorotoluene	8.940	91	637511	51.1943	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	48475	44.6195	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	39080	48.2544	ug/L	#	97
73) 1,2,4-Trimethylbenzene	9.169	105	798002	51.9607	ug/L		100
74) 4-Chlorotoluene	9.030	91	644782	51.8636	ug/L		99
75) tert-Butylbenzene	9.134	134	150895	49.5733	ug/L		99
76) sec-Butylbenzene	9.224	105	970106	51.7025	ug/L		99
77) p-Isopropyltoluene	9.296	119	835929	52.2627	ug/L		100
78) 1,3-Dichlorobenzene	9.325	146	472953	50.4823	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	466211	49.2900	ug/L		100
80) n-Butylbenzene	9.499	91	744022	55.1135	ug/L		98
81) 1,2-Dichlorobenzene	9.571	146	437774	47.9451	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	31352	46.5030	ug/L		93
83) Hexachlorobutadiene	10.243	225	174089	45.2275	ug/L		100
84) 1,2,4-Trichlorobenzene	10.257	180	321522	47.4014	ug/L		100
85) Naphthalene	10.411	128	550171	41.5947	ug/L		100
86) 1,2,3-Trichlorobenzene	10.495	180	280028	42.5024	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:26 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:51:27 2017 Page: 3

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 19:02:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.000	1.000	0.0	84	0.000
2	T	Dichlorodifluoromethane	0.297	0.386	-30.0#	100	0.000
3	P	Chloromethane	0.291	0.350	-20.3	102	0.000
4	C	Vinyl Chloride	0.322	0.356	-10.6#	92	0.000
5	T	1,3-Butadiene	0.198	0.205	-3.5	85	0.000
6	T	Bromomethane	0.239	0.205	14.2	78	0.000
7	T	Chloroethane	0.153	0.152	0.7	95	0.000
8	T	Trichlorofluoromethane	0.413	0.466	-12.8	89	0.000
9	T	Diethyl ether	0.199	0.196	1.5	81	0.000
10	C	1,1-Dichloroethene	0.386	0.414	-7.3#	90	0.000
11	T	Carbon Disulfide	0.829	0.840	-1.3	83	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.246	0.272	-10.6	91	0.000
13	T	Iodomethane	0.286	0.332	-16.1	77	0.000
14	T	Acrolein	0.025	0.019	24.0	61	0.000
15	T	Methylene Chloride	0.293	0.286	2.4	86	0.000
16	T	Acetone	0.050	0.039	22.0	68	0.000
17	T	trans-1,2-Dichloroethene	0.263	0.269	-2.3	86	0.000
18	T	Methyl acetate	0.132	0.139	-5.3	76	0.000
19	T	Methyl Tert Butyl Ether	0.667	0.623	6.6	76	0.000
20	P	1,1-Dichloroethane	0.472	0.500	-5.9	88	0.000
21	T	Acrylonitrile	0.064	0.059	7.8	74	0.000
22	T	Vinyl Acetate	0.042	0.048	-14.3	90	0.000
23	T	cis-1,2-Dichloroethene	0.298	0.297	0.3	84	0.000
24	T	2,2-Dichloropropane	0.321	0.416	-29.6#	93	0.000
25	T	Cyclohexane	0.402	0.431	-7.2	86	0.000
26	T	Bromochloromethane	0.192	0.190	1.0	80	0.000
27	C	Chloroform	0.492	0.494	-0.4#	85	0.000
28	T	Carbon Tetrachloride	0.389	0.405	-4.1	84	0.000
29	S	Dibromofluoromethane	0.270	0.271	-0.4	82	0.000
30	T	1,1,1-Trichloroethane	0.433	0.440	-1.6	85	0.000
31	T	1,1-Dichloropropene	0.340	0.357	-5.0	86	0.000
32	T	2-Butanone	0.075	0.066	12.0	73	0.000
33	T	Benzene	1.065	1.085	-1.9	87	0.000
34	S	1,2-Dichloroethane-d4	0.253	0.245	3.2	80	0.000
35	T	1,2-Dichloroethane	0.332	0.322	3.0	82	0.000
36	T	Methylcyclohexane	0.421	0.434	-3.1	84	0.000
37	T	Trichloroethene	0.320	0.307	4.1	82	0.000
38	T	Dibromomethane	0.163	0.157	3.7	79	0.000
39	C	1,2-Dichloropropane	0.279	0.290	-3.9#	86	0.000
40	T	Bromodichloromethane	0.373	0.376	-0.8	83	0.000
41	T	1,4-Dioxane	0.001	0.001	0.0	64	0.000
42	T	2-Chloroethyl Vinyl Ether	0.127	0.115	9.4	76	0.000
43	T	cis-1,3-Dichloropropene	0.420	0.448	-6.7	85	0.000
44	T	4-Methyl-2-Pentanone	0.069	0.058	15.9	70	0.000
45	T	trans-1,3-Dichloropropene	0.357	0.368	-3.1	82	0.000
46	I	Chlorobenzene-d5	1.000	1.000	0.0	84	0.000
47	S	Toluene-d8	1.248	1.256	-0.6	82	0.000
48	C	Toluene	1.567	1.597	-1.9#	85	0.000
49	T	Tetrachloroethene	0.447	0.442	1.1	83	0.000
50	T	1,1,2-Trichloroethane	0.304	0.284	6.6	78	0.000
51	T	Dibromochloromethane	0.415	0.396	4.6	77	0.000
52	T	1,3-Dichloropropane	0.483	0.465	3.7	80	0.000
53	T	1,2-Dibromoethane	0.311	0.286	8.0	76	0.000
54	T	2-Hexanone	0.160	0.132	17.5	69	0.000
55	P	Chlorobenzene	1.052	1.043	0.9	83	0.000
56	T	1-Chlorohexane	0.085	0.090	-5.9	85	0.000
57	C	Ethylbenzene	0.547	0.560	-2.4#	84	0.000

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 19:02:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	0.409	0.399	2.4	81	0.000
59	T	m-,p-Xylene	0.661	0.685	-3.6	84	0.000
60	T	o-Xylene	0.651	0.653	-0.3	82	0.000
61	T	Styrene	1.042	1.095	-5.1	84	0.000
62	P	Bromoform	0.292	0.273	6.5	72	0.000
63	T	Isopropylbenzene	1.685	1.713	-1.7	83	0.000
64	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	2.787	2.884	-3.5	84	0.000
66	S	p-Bromofluorobenzene	0.837	0.834	0.4	80	0.000
67	T	Bromobenzene	0.983	0.944	4.0	80	0.000
68	T	n-Propylbenzene	3.692	3.921	-6.2	86	0.000
69	P	1,1,2,2-Tetrachloroethane	0.672	0.664	1.2	76	0.000
70	T	2-Chlorotoluene	2.279	2.333	-2.4	85	0.000
71	T	1,2,3-Trichloropropane	0.199	0.177	11.1	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	0.148	0.143	3.4	72	0.000
73	T	1,2,4-Trimethylbenzene	2.810	2.920	-3.9	84	0.000
74	T	4-Chlorotoluene	2.275	2.360	-3.7	85	0.000
75	T	tert-Butylbenzene	0.557	0.552	0.9	82	0.000
76	T	sec-Butylbenzene	3.433	3.550	-3.4	83	0.000
77	T	p-Isopropyltoluene	2.927	3.059	-4.5	82	0.000
78	T	1,3-Dichlorobenzene	1.714	1.731	-1.0	82	0.000
79	T	1,4-Dichlorobenzene	1.731	1.706	1.4	82	0.000
80	T	n-Butylbenzene	2.470	2.723	-10.2	85	0.000
81	T	1,2-Dichlorobenzene	1.671	1.602	4.1	78	0.000
82	T	1,2-Dibromo-3-Chloropropane	0.123	0.115	6.5	71	0.000
83	T	Hexachlorobutadiene	0.704	0.637	9.5	71	0.000
84	T	1,2,4-Trichlorobenzene	1.241	1.177	5.2	72	0.000
85	T	Naphthalene	2.420	2.013	16.8	63	0.000
86	T	1,2,3-Trichlorobenzene	1.206	1.025	15.0	66	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Evaluate Continuing Calibration Report

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 19:02:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.000	25.000	0.0	84	0.000
2	T	Dichlorodifluoromethane	50.000	64.973	-29.9#	100	0.000
3	P	Chloromethane	50.000	60.222	-20.4	102	0.000
4	C	Vinyl Chloride	50.000	55.397	-10.8#	92	0.000
5	T	1,3-Butadiene	50.000	51.894	-3.8	85	0.000
6	T	Bromomethane	50.000	42.791	14.4	78	0.000
7	T	Chloroethane	50.000	49.887	0.2	95	0.000
8	T	Trichlorofluoromethane	50.000	56.512	-13.0	89	0.000
9	T	Diethyl ether	100.000	98.590	1.4	81	0.000
10	C	1,1-Dichloroethene	50.000	53.599	-7.2#	90	0.000
11	T	Carbon Disulfide	50.000	50.675	-1.3	83	0.000
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.000	55.310	-10.6	91	0.000
13	T	Iodomethane	50.000	44.823	10.4	77	0.000
14	T	Acrolein	50.000	38.946	22.1	61	0.000
15	T	Methylene Chloride	50.000	48.834	2.3	86	0.000
16	T	Acetone	50.000	38.702	22.6	68	0.000
17	T	trans-1,2-Dichloroethene	50.000	51.080	-2.2	86	0.000
18	T	Methyl acetate	50.000	52.568	-5.1	76	0.000
19	T	Methyl Tert Butyl Ether	50.000	46.703	6.6	76	0.000
20	P	1,1-Dichloroethane	50.000	52.898	-5.8	88	0.000
21	T	Acrylonitrile	50.000	45.630	8.7	74	0.000
22	T	Vinyl Acetate	50.000	56.771	-13.5	90	0.000
23	T	cis-1,2-Dichloroethene	50.000	49.929	0.1	84	0.000
24	T	2,2-Dichloropropane	50.000	55.590	-11.2	93	0.000
25	T	Cyclohexane	50.000	53.621	-7.2	86	0.000
26	T	Bromochloromethane	50.000	49.635	0.7	80	0.000
27	C	Chloroform	50.000	50.165	-0.3#	85	0.000
28	T	Carbon Tetrachloride	50.000	51.970	-3.9	84	0.000
29	S	Dibromofluoromethane	25.000	25.058	-0.2	82	0.000
30	T	1,1,1-Trichloroethane	50.000	50.877	-1.8	85	0.000
31	T	1,1-Dichloropropene	50.000	52.443	-4.9	86	0.000
32	T	2-Butanone	50.000	43.842	12.3	73	0.000
33	T	Benzene	50.000	50.941	-1.9	87	0.000
34	S	1,2-Dichloroethane-d4	25.000	24.251	3.0	80	0.000
35	T	1,2-Dichloroethane	50.000	48.551	2.9	82	0.000
36	T	Methylcyclohexane	50.000	51.524	-3.0	84	0.000
37	T	Trichloroethene	50.000	48.049	3.9	82	0.000
38	T	Dibromomethane	50.000	48.145	3.7	79	0.000
39	C	1,2-Dichloropropane	50.000	51.874	-3.7#	86	0.000
40	T	Bromodichloromethane	50.000	50.498	-1.0	83	0.000
41	T	1,4-Dioxane	200.000	151.827	24.1	64	0.000
42	T	2-Chloroethyl Vinyl Ether	50.000	45.370	9.3	76	0.000
43	T	cis-1,3-Dichloropropene	50.000	53.289	-6.6	85	0.000
44	T	4-Methyl-2-Pentanone	50.000	41.567	16.9	70	0.000
45	T	trans-1,3-Dichloropropene	50.000	51.479	-3.0	82	0.000
46	I	Chlorobenzene-d5	25.000	25.000	0.0	84	0.000
47	S	Toluene-d8	25.000	25.174	-0.7	82	0.000
48	C	Toluene	50.000	50.950	-1.9#	85	0.000
49	T	Tetrachloroethene	50.000	49.440	1.1	83	0.000
50	T	1,1,2-Trichloroethane	50.000	46.666	6.7	78	0.000
51	T	Dibromochloromethane	50.000	47.749	4.5	77	0.000
52	T	1,3-Dichloropropane	50.000	48.188	3.6	80	0.000
53	T	1,2-Dibromoethane	50.000	45.995	8.0	76	0.000
54	T	2-Hexanone	50.000	41.426	17.1	69	0.000
55	P	Chlorobenzene	50.000	49.601	0.8	83	0.000
56	T	1-Chlorohexane	50.000	53.153	-6.3	85	0.000
57	C	Ethylbenzene	50.000	51.117	-2.2#	84	0.000

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273261.D Vial: 1
Acq On : 02 May 2017 18:50 Operator: ADC
Sample : WG612550-02 50ug/L CCV STD 8260 Inst : HPMS17
Misc : 1,1 STD81577 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 19:02:14 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.500min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
58	T	1,1,1,2-Tetrachloroethane	50.000	48.767	2.5	81	0.000
59	T	m-,p-Xylene	100.000	103.707	-3.7	84	0.000
60	T	o-Xylene	50.000	50.160	-0.3	82	0.000
61	T	Styrene	50.000	52.577	-5.2	84	0.000
62	P	Bromoform	50.000	46.862	6.3	72	0.000
63	T	Isopropylbenzene	50.000	50.835	-1.7	83	0.000
64	I	1,4-Dichlorobenzene-d4	25.000	25.000	0.0	82	0.000
65	T	1,3,5-Trimethylbenzene	50.000	51.741	-3.5	84	0.000
66	S	p-Bromofluorobenzene	25.000	24.900	0.4	80	0.000
67	T	Bromobenzene	50.000	48.009	4.0	80	0.000
68	T	n-Propylbenzene	50.000	53.100	-6.2	86	0.000
69	P	1,1,2,2-Tetrachloroethane	50.000	49.363	1.3	76	0.000
70	T	2-Chlorotoluene	50.000	51.194	-2.4	85	0.000
71	T	1,2,3-Trichloropropane	50.000	44.619	10.8	73	0.000
72	T	trans-1,4-Dichloro-2-Butene	50.000	48.254	3.5	72	0.000
73	T	1,2,4-Trimethylbenzene	50.000	51.961	-3.9	84	0.000
74	T	4-Chlorotoluene	50.000	51.864	-3.7	85	0.000
75	T	tert-Butylbenzene	50.000	49.573	0.9	82	0.000
76	T	sec-Butylbenzene	50.000	51.702	-3.4	83	0.000
77	T	p-Isopropyltoluene	50.000	52.263	-4.5	82	0.000
78	T	1,3-Dichlorobenzene	50.000	50.482	-1.0	82	0.000
79	T	1,4-Dichlorobenzene	50.000	49.290	1.4	82	0.000
80	T	n-Butylbenzene	50.000	55.113	-10.2	85	0.000
81	T	1,2-Dichlorobenzene	50.000	47.945	4.1	78	0.000
82	T	1,2-Dibromo-3-Chloropropane	50.000	46.503	7.0	71	0.000
83	T	Hexachlorobutadiene	50.000	45.228	9.5	71	0.000
84	T	1,2,4-Trichlorobenzene	50.000	47.401	5.2	72	0.000
85	T	Naphthalene	50.000	41.595	16.8	63	0.000
86	T	1,2,3-Trichlorobenzene	50.000	42.502	15.0	66	0.000

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	674511	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	467302	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	245649	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	175428	25.4774	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.92%				
43) 1,2-Dichloroethane-d4	10.84	65	180868	26.6518	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.60%				
58) Toluene-d8	13.23	98	633032	26.5474	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.20%				
80) p-Bromofluorobenzene	16.63	95	253083	27.1261	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 108.52%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	576101	53.7943	ug/L		93
3) Chloromethane	4.03	50	631330	50.6084	ug/L		97
4) Vinyl Chloride	4.28	62	589398	48.1670	ug/L		98
5) 1,3-Butadiene	4.32	54	251427	55.7184	ug/L		92
6) Bromomethane	5.24	94	250215	47.3596	ug/L		99
7) Chloroethane	5.40	64	290230	55.1257	ug/L		87
8) Trichlorofluoromethane	5.90	101	645011	51.4301	ug/L		99
9) Diethyl ether	6.43	59	567587	108.5966	ug/L		85
10) Isoprene	6.47	67	577802	56.0121	ug/L		83
11) Acrolein	6.67	56	30675	53.5708	ug/L		100
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	366384	51.6080	ug/L		97
13) Acetone	6.77	43	80917	55.5926	ug/L		90
14) 1,1-Dichloroethene	7.01	61	578268	56.2341	ug/L		88
15) Tert-Butyl Alcohol	7.11	59	86431	191.4384	ug/L		92
16) Dimethyl Sulfide	7.28	62	411573	56.0115	ug/L		80
17) Iodomethane	7.53	142	267121	44.6097	ug/L		96
18) Methyl acetate	7.53	43	223477	61.2188	ug/L	#	86
19) Methylene Chloride	7.79	84	398606	51.2718	ug/L		65
20) Carbon Disulfide	7.85	76	1234647	55.7879	ug/L		99
21) Acrylonitrile	7.96	53	95460	56.5975	ug/L		99
22) Methyl Tert Butyl Ether	8.00	73	901569	52.8831	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	378554	51.1501	ug/L		84
24) n-Hexane	8.32	57	525000	62.7309	ug/L		87
25) Diisopropyl ether	8.66	45	2165836	113.6786	ug/L	#	93
26) Vinyl Acetate	8.82	43	376570	71.2042	ug/L	#	90
27) 1,1-Dichloroethane	8.86	63	681369	55.5792	ug/L		99
28) Ethyl-Tert-Butyl ether	9.23	59	2082037	107.8538	ug/L		93
29) 2-Butanone	9.41	43	96865	52.8025	ug/L		83
30) Propionitrile	9.52	54	65817	110.0119	ug/L		100
31) 2,2-Dichloropropane	9.65	77	513892	55.0984	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	415446	51.0600	ug/L		96
33) Chloroform	9.91	83	663582	47.5140	ug/L		95
34) 1-Bromopropane	10.06	122	72813	50.4638	ug/L		100
35) Bromochloromethane	10.15	130	216616	50.5751	ug/L		99
36) Tetrahydrofuran	10.17	42	133785	110.7437	ug/L		78
38) 1,1,1-Trichloroethane	10.45	97	586013	51.6109	ug/L		92
39) Cyclohexane	10.49	56	619444	58.9968	ug/L		82
40) 1,1-Dichloropropene	10.65	75	508046	52.9316	ug/L		84
41) Tert-Amyl-Methyl ether	10.74	73	1866535	101.8361	ug/L		94
42) Carbon Tetrachloride	10.79	117	466290	52.0821	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:23 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07:20 2017 Quant Results File: 8260BWT.RES

Quant Method : K:\ORGANICS\V...\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

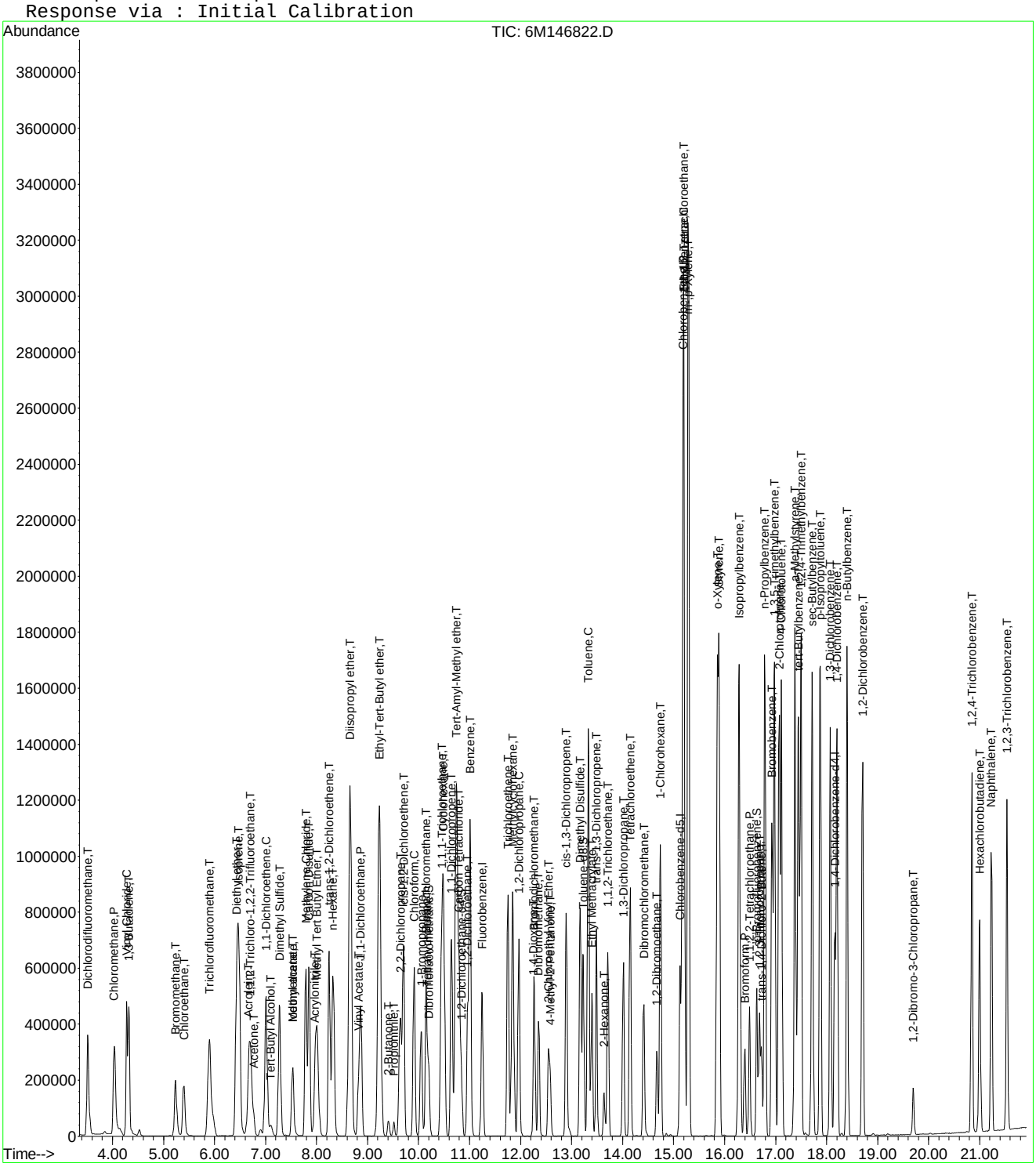
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	453777	52.2284	ug/L		91
46)	Benzene	11.01	78	1451388	50.2913	ug/L		89
47)	Trichloroethene	11.75	130	370184	47.1246	ug/L		93
48)	Methylcyclohexane	11.84	83	607083	53.4903	ug/L		86
49)	1,2-Dichloropropane	11.97	63	371520	54.5477	ug/L		95
50)	1,4-Dioxane	12.25	88	11005	222.2187	ug/L		92
51)	Bromodichloromethane	12.26	83	500450	52.0504	ug/L		99
52)	Dibromomethane	12.35	93	201321	50.1878	ug/L		99
53)	2-Chloroethyl Vinyl Ether	12.55	63	160509	60.0802	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	88146	50.2978	ug/L		87
55)	cis-1,3-Dichloropropene	12.90	75	584158	55.1720	ug/L		97
56)	Dimethyl Disulfide	13.17	79	342356	51.2534	ug/L		93
59)	Toluene	13.32	91	1497061	51.2413	ug/L		100
60)	Ethyl Methacrylate	13.40	69	387220	54.7693	ug/L		75
62)	trans-1,3-Dichloropropene	13.49	75	505767	56.1437	ug/L		100
63)	1,1,2-Trichloroethane	13.71	97	278473	50.5786	ug/L		99
64)	2-Hexanone	13.64	43	139331	52.7004	ug/L		86
65)	1,3-Dichloropropane	14.02	76	484050	52.3756	ug/L		75
66)	Tetrachloroethene	14.15	166	340915	48.1542	ug/L		92
67)	Dibromochloromethane	14.42	129	332881	48.9094	ug/L		99
68)	1,2-Dibromoethane	14.67	107	261538	49.4712	ug/L		100
69)	1-Chlorohexane	14.74	91	512571	54.3296	ug/L		82
70)	Chlorobenzene	15.18	112	990139	49.5165	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	358393	50.0483	ug/L		99
72)	Ethylbenzene	15.20	106	547394	50.5679	ug/L		99
73)	m-,p-Xylene	15.28	106	1312947	101.4737	ug/L		98
74)	o-Xylene	15.86	106	640930	51.3327	ug/L		98
75)	Styrene	15.89	104	1106798	52.8038	ug/L		99
76)	Bromoform	16.40	173	193478	46.6484	ug/L		98
77)	Isopropylbenzene	16.29	105	1633970	52.2947	ug/L		98
79)	1,1,2,2-Tetrachloroethane	16.49	83	325050	50.8067	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	92582	49.0032	ug/L	#	42
82)	trans-1,4-Dichloro-2-Buten	16.72	53	78763	57.9760	ug/L	#	1
83)	n-Propylbenzene	16.79	91	1993012	53.5856	ug/L		99
84)	Bromobenzene	16.93	156	402556	48.1787	ug/L		73
85)	1,3,5-Trimethylbenzene	16.98	105	1389254	52.7066	ug/L		99
86)	2-Chlorotoluene	17.07	91	1321267	53.3528	ug/L		98
87)	4-Chlorotoluene	17.11	91	1138393	52.0110	ug/L		99
88)	a-Methylstyrene	17.38	118	754151	51.7394	ug/L		99
89)	tert-Butylbenzene	17.45	134	283504	51.3315	ug/L		86
90)	1,2,4-Trimethylbenzene	17.50	105	1446503	53.4359	ug/L		88
91)	sec-Butylbenzene	17.72	105	1730970	53.2528	ug/L		97
92)	p-Isopropyltoluene	17.88	119	1442137	52.7432	ug/L		98
93)	1,3-Dichlorobenzene	18.07	146	773999	49.0512	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	769587	48.2286	ug/L		96
95)	n-Butylbenzene	18.40	91	1391368	55.7268	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	711411	48.0995	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	59865	51.6593	ug/L		95
98)	1,2,4-Trichlorobenzene	20.85	180	511851	47.2981	ug/L		99
99)	Hexachlorobutadiene	21.00	225	203742	49.2925	ug/L		99
100)	Naphthalene	21.23	128	1040596	48.0225	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	462949	44.3131	ug/L		99

(#) = qualifier out of range (m) = manual integration
6M146822.D 8260BWT.M Fri Apr 28 20:07:24 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 20:07 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	1.0000	1.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	0.3969	0.4270	-7.6	104	0.00
3	P	Chloromethane	0.5473	0.4680	14.5	105	0.01
4	C	Vinyl Chloride	0.4535	0.4369	3.7	102	0.00
5	T	1,3-Butadiene	0.1682	0.1864	-10.8	111	0.00
6	T	Bromomethane	0.1958	0.1855	5.3	88	0.02
7	T	Chloroethane	0.1951	0.2151	-10.2	111	0.02
8	T	Trichlorofluoromethane	0.4648	0.4781	-2.9	104	0.01
9	T	Diethyl ether	0.1937	0.2104	-8.6	115	0.00
10	T	Isoprene	0.3823	0.4283	-12.0	116	0.00
11	T	Acrolein	0.0212	0.0227	-7.2	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	0.2631	0.2716	-3.2	108	0.01
13	T	Acetone	0.0539	0.0600	-11.2	113	0.00
14	C	1,1-Dichloroethene	0.3811	0.4287	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	0.0167	0.0160	4.2	117	-0.02
16	T	Dimethyl Sulfide	0.2723	0.3051	-12.0	116	0.00
17	T	Iodomethane	0.1863	0.1980	-6.3	97	0.00
18	T	Methyl acetate	0.1353	0.1657	-22.4#	130	0.00
19	T	Methylene Chloride	0.2882	0.2955	-2.5	109	0.00
20	T	Carbon Disulfide	0.8203	0.9152	-11.6	114	0.00
21	T	Acrylonitrile	0.0625	0.0708	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	0.6319	0.6683	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	0.2743	0.2806	-2.3	107	0.00
24	T	n-Hexane	0.3102	0.3892	-25.5#	131	0.00
25	T	Diisopropyl ether	0.7062	0.8027	-13.7	121	0.00
26	T	Vinyl Acetate	0.1960	0.2791	-42.4#	176	0.00
27	P	1,1-Dichloroethane	0.4544	0.5051	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	0.7155	0.7717	-7.9	115	0.00
29	T	2-Butanone	0.0680	0.0718	-5.6	114	0.00
30	T	Propionitrile	0.0222	0.0244	-10.0	113	0.00
31	T	2,2-Dichloropropane	0.3457	0.3809	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	0.3016	0.3080	-2.1	107	0.00
33	C	Chloroform	0.5176	0.4919	5.0	108	0.00
34		1-Bromopropane	0.0535	0.0540	-0.9	99	0.00
35	T	Bromochloromethane	0.1588	0.1606	-1.1	101	0.00
36	T	Tetrahydrofuran	0.0448	0.0496	-10.7	121	0.00
37	S	Dibromofluoromethane	0.2552	0.2601	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	0.4208	0.4344	-3.2	107	0.00
39	T	Cyclohexane	0.3892	0.4592	-18.0	121	0.00
40	T	1,1-Dichloropropene	0.3558	0.3766	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	0.6793	0.6918	-1.8	108	0.00
42	T	Carbon Tetrachloride	0.3318	0.3457	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	0.2515	0.2682	-6.6	111	0.00
44		Heptane	0.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	0.3220	0.3364	-4.5	110	0.00
46	T	Benzene	1.0697	1.0759	-0.6	110	0.00
47	T	Trichloroethene	0.2912	0.2744	5.7	95	0.00
48	T	Methylcyclohexane	0.4207	0.4500	-7.0	112	0.00
49	C	1,2-Dichloropropane	0.2524	0.2754	-9.1	113	0.00
50	T	1,4-Dioxane	0.0018	0.0020	-10.9	112	0.00
51	T	Bromodichloromethane	0.3564	0.3710	-4.1	105	0.00
52	T	Dibromomethane	0.1487	0.1492	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	0.0990	0.1190	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	0.0649	0.0653	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:31 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	0.3924	0.4330	-10.3	111	0.00
56	T	Dimethyl Disulfide	0.2476	0.2538	-2.5	108	0.00
57	I	Chlorobenzene-d5	1.0000	1.0000	0.0	103	0.00
58	S	Toluene-d8	1.2757	1.3546	-6.2	111	0.00
59	C	Toluene	1.5630	1.6018	-2.5	108	0.00
60	T	Ethyl Methacrylate	0.3782	0.4143	-9.5	111	0.00
61		Paraldehyde	0.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	0.4819	0.5412	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	0.2945	0.2980	-1.2	103	0.00
64	T	2-Hexanone	0.1414	0.1491	-5.4	110	0.00
65	T	1,3-Dichloropropane	0.4944	0.5179	-4.8	108	0.00
66	T	Tetrachloroethene	0.3787	0.3648	3.7	98	0.00
67	T	Dibromochloromethane	0.3641	0.3562	2.2	97	0.00
68	T	1,2-Dibromoethane	0.2828	0.2798	1.1	101	0.00
69	T	1-Chlorohexane	0.5047	0.5484	-8.7	110	0.00
70	P	Chlorobenzene	1.0698	1.0594	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	0.3831	0.3835	-0.1	99	0.00
72	C	Ethylbenzene	0.5791	0.5857	-1.1	104	0.00
73	T	m-,p-Xylene	0.6922	0.7024	-1.5	104	0.00
74	T	o-Xylene	0.6680	0.6858	-2.7	104	0.00
75	T	Styrene	1.1214	1.1842	-5.6	105	-0.02
76	P	Bromoform	0.2219	0.2070	6.7	90	0.00
77	T	Isopropylbenzene	1.6716	1.7483	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	1.0000	1.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	0.6511	0.6616	-1.6	110	0.00
80	S	p-Bromofluorobenzene	0.9495	1.0303	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	0.1923	0.1884	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	0.1383	0.1603	-16.0	113	0.00
83	T	n-Propylbenzene	3.7852	4.0566	-7.2	109	0.00
84	T	Bromobenzene	0.8504	0.8194	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	2.6825	2.8277	-5.4	107	0.00
86	T	2-Chlorotoluene	2.5203	2.6893	-6.7	113	0.00
87	T	4-Chlorotoluene	2.2275	2.3171	-4.0	106	0.00
88	T	a-Methylstyrene	1.4834	1.5350	-3.5	105	0.00
89	T	tert-Butylbenzene	0.5621	0.5770	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	2.7549	2.9442	-6.9	108	0.00
91	T	sec-Butylbenzene	3.3081	3.5233	-6.5	108	0.00
92	T	p-Isopropyltoluene	2.7827	2.9354	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	1.6059	1.5754	1.9	100	0.00
94	T	1,4-Dichlorobenzene	1.6240	1.5664	3.5	100	0.00
95	T	n-Butylbenzene	2.5410	2.8320	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	1.5052	1.4480	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	0.1179	0.1219	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	1.1014	1.0418	5.4	96	0.00
99	T	Hexachlorobutadiene	0.4207	0.4147	1.4	102	0.00
100	T	Naphthalene	2.2053	2.1181	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	1.0632	0.9423	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:32 2017 Page 2

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	105	0.00
2	T	Dichlorodifluoromethane	50.0000	53.7943	-7.6	104	0.00
3	P	Chloromethane	50.0000	50.6084	-1.2	105	0.01
4	C	Vinyl Chloride	50.0000	48.1670	3.7	102	0.00
5	T	1,3-Butadiene	50.0000	55.7184	-11.4	111	0.00
6	T	Bromomethane	50.0000	47.3596	5.3	88	0.02
7	T	Chloroethane	50.0000	55.1257	-10.3	111	0.02
8	T	Trichlorofluoromethane	50.0000	51.4301	-2.9	104	0.01
9	T	Diethyl ether	100.0000	108.5966	-8.6	115	0.00
10	T	Isoprene	50.0000	56.0121	-12.0	116	0.00
11	T	Acrolein	50.0000	53.5708	-7.1	111	0.00
12	T	1,1,2-Trichloro-1,2,2-Trifl	50.0000	51.6080	-3.2	108	0.01
13	T	Acetone	50.0000	55.5926	-11.2	113	0.00
14	C	1,1-Dichloroethene	50.0000	56.2341	-12.5	116	0.00
15	T	Tert-Butyl Alcohol	200.0000	191.4384	4.3	117	-0.02
16	T	Dimethyl Sulfide	50.0000	56.0115	-12.0	116	0.00
17	T	Iodomethane	50.0000	44.6097	10.8	97	0.00
18	T	Methyl acetate	50.0000	61.2188	-22.4#	130	0.00
19	T	Methylene Chloride	50.0000	51.2718	-2.5	109	0.00
20	T	Carbon Disulfide	50.0000	55.7879	-11.6	114	0.00
21	T	Acrylonitrile	50.0000	56.5975	-13.2	112	0.00
22	T	Methyl Tert Butyl Ether	50.0000	52.8831	-5.8	111	-0.02
23	T	trans-1,2-Dichloroethene	50.0000	51.1501	-2.3	107	0.00
24	T	n-Hexane	50.0000	62.7309	-25.5#	131	0.00
25	T	Diisopropyl ether	100.0000	113.6786	-13.7	121	0.00
26	T	Vinyl Acetate	50.0000	71.2042	-42.4#	176	0.00
27	P	1,1-Dichloroethane	50.0000	55.5792	-11.2	117	0.00
28	T	Ethyl-Tert-Butyl ether	100.0000	107.8538	-7.9	115	0.00
29	T	2-Butanone	50.0000	52.8025	-5.6	114	0.00
30	T	Propionitrile	100.0000	110.0119	-10.0	113	0.00
31	T	2,2-Dichloropropane	50.0000	55.0984	-10.2	144	0.00
32	T	cis-1,2-Dichloroethene	50.0000	51.0600	-2.1	107	0.00
33	C	Chloroform	50.0000	47.5140	5.0	108	0.00
34		1-Bromopropane	50.0000	50.4638	-0.9	99	0.00
35	T	Bromochloromethane	50.0000	50.5751	-1.2	101	0.00
36	T	Tetrahydrofuran	100.0000	110.7437	-10.7	121	0.00
37	S	Dibromofluoromethane	25.0000	25.4775	-1.9	105	0.00
38	T	1,1,1-Trichloroethane	50.0000	51.6109	-3.2	107	0.00
39	T	Cyclohexane	50.0000	58.9968	-18.0	121	0.00
40	T	1,1-Dichloropropene	50.0000	52.9316	-5.9	111	0.00
41	T	Tert-Amyl-Methyl ether	100.0000	101.8361	-1.8	108	0.00
42	T	Carbon Tetrachloride	50.0000	52.0821	-4.2	99	-0.02
43	S	1,2-Dichloroethane-d4	25.0000	26.6518	-6.6	111	0.00
44		Heptane	-1.0000	0.0000	0.0	111	0.00
45	T	1,2-Dichloroethane	50.0000	52.2283	-4.5	110	0.00
46	T	Benzene	50.0000	50.2913	-0.6	110	0.00
47	T	Trichloroethene	50.0000	47.1245	5.8	95	0.00
48	T	Methylcyclohexane	50.0000	53.4903	-7.0	112	0.00
49	C	1,2-Dichloropropane	50.0000	54.5477	-9.1	113	0.00
50	T	1,4-Dioxane	200.0000	222.2187	-11.1	112	0.00
51	T	Bromodichloromethane	50.0000	52.0504	-4.1	105	0.00
52	T	Dibromomethane	50.0000	50.1878	-0.4	102	0.00
53	T	2-Chloroethyl Vinyl Ether	50.0000	60.0802	-20.2#	117	0.00
54	T	4-Methyl-2-Pentanone	50.0000	50.2978	-0.6	107	0.00

(#) = Out of Range
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 1

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146822.D Vial: 1
Acq On : 28 Apr 2017 19:35 Operator: JDS
Sample : WG612082-02 50ug/L CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81599 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
55	T	cis-1,3-Dichloropropene	50.0000	55.1720	-10.3	111	0.00
56	T	Dimethyl Disulfide	50.0000	51.2534	-2.5	108	0.00
57	I	Chlorobenzene-d5	25.0000	25.0000	0.0	103	0.00
58	S	Toluene-d8	25.0000	26.5474	-6.2	111	0.00
59	C	Toluene	50.0000	51.2413	-2.5	108	0.00
60	T	Ethyl Methacrylate	50.0000	54.7693	-9.5	111	0.00
61		Paraldehyde	-1.0000	0.0000	0.0	107	0.08
62	T	trans-1,3-Dichloropropene	50.0000	56.1437	-12.3	113	0.00
63	T	1,1,2-Trichloroethane	50.0000	50.5786	-1.2	103	0.00
64	T	2-Hexanone	50.0000	52.7004	-5.4	110	0.00
65	T	1,3-Dichloropropane	50.0000	52.3756	-4.8	108	0.00
66	T	Tetrachloroethene	50.0000	48.1542	3.7	98	0.00
67	T	Dibromochloromethane	50.0000	48.9094	2.2	97	0.00
68	T	1,2-Dibromoethane	50.0000	49.4712	1.1	101	0.00
69	T	1-Chlorohexane	50.0000	54.3296	-8.7	110	0.00
70	P	Chlorobenzene	50.0000	49.5164	1.0	103	0.00
71	T	1,1,1,2-Tetrachloroethane	50.0000	50.0483	-0.1	99	0.00
72	C	Ethylbenzene	50.0000	50.5679	-1.1	104	0.00
73	T	m-,p-Xylene	100.0000	101.4737	-1.5	104	0.00
74	T	o-Xylene	50.0000	51.3327	-2.7	104	0.00
75	T	Styrene	50.0000	52.8038	-5.6	105	-0.02
76	P	Bromoform	50.0000	46.6484	6.7	90	0.00
77	T	Isopropylbenzene	50.0000	52.2947	-4.6	106	0.00
78	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	100	0.00
79	P	1,1,2,2-Tetrachloroethane	50.0000	50.8067	-1.6	110	0.00
80	S	p-Bromofluorobenzene	25.0000	27.1261	-8.5	111	0.00
81	T	1,2,3-Trichloropropane	50.0000	49.0032	2.0	99	0.00
82	T	trans-1,4-Dichloro-2-Butene	50.0000	57.9760	-16.0	113	0.00
83	T	n-Propylbenzene	50.0000	53.5856	-7.2	109	0.00
84	T	Bromobenzene	50.0000	48.1787	3.6	98	0.00
85	T	1,3,5-Trimethylbenzene	50.0000	52.7066	-5.4	107	0.00
86	T	2-Chlorotoluene	50.0000	53.3528	-6.7	113	0.00
87	T	4-Chlorotoluene	50.0000	52.0110	-4.0	106	0.00
88	T	a-Methylstyrene	50.0000	51.7394	-3.5	105	0.00
89	T	tert-Butylbenzene	50.0000	51.3315	-2.7	102	0.00
90	T	1,2,4-Trimethylbenzene	50.0000	53.4359	-6.9	108	0.00
91	T	sec-Butylbenzene	50.0000	53.2528	-6.5	108	0.00
92	T	p-Isopropyltoluene	50.0000	52.7432	-5.5	106	0.00
93	T	1,3-Dichlorobenzene	50.0000	49.0512	1.9	100	0.00
94	T	1,4-Dichlorobenzene	50.0000	48.2286	3.5	100	0.00
95	T	n-Butylbenzene	50.0000	55.7268	-11.5	112	0.00
96	T	1,2-Dichlorobenzene	50.0000	48.0995	3.8	99	0.00
97	T	1,2-Dibromo-3-Chloropropane	50.0000	51.6593	-3.3	103	0.00
98	T	1,2,4-Trichlorobenzene	50.0000	47.2981	5.4	96	0.00
99	T	Hexachlorobutadiene	50.0000	49.2925	1.4	102	0.00
100	T	Naphthalene	50.0000	48.0225	4.0	96	-0.02
101	T	1,2,3-Trichlorobenzene	50.0000	44.3131	11.4	95	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146822.D 8260BWT.M Fri Apr 28 20:07:34 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 03 09:21:47 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

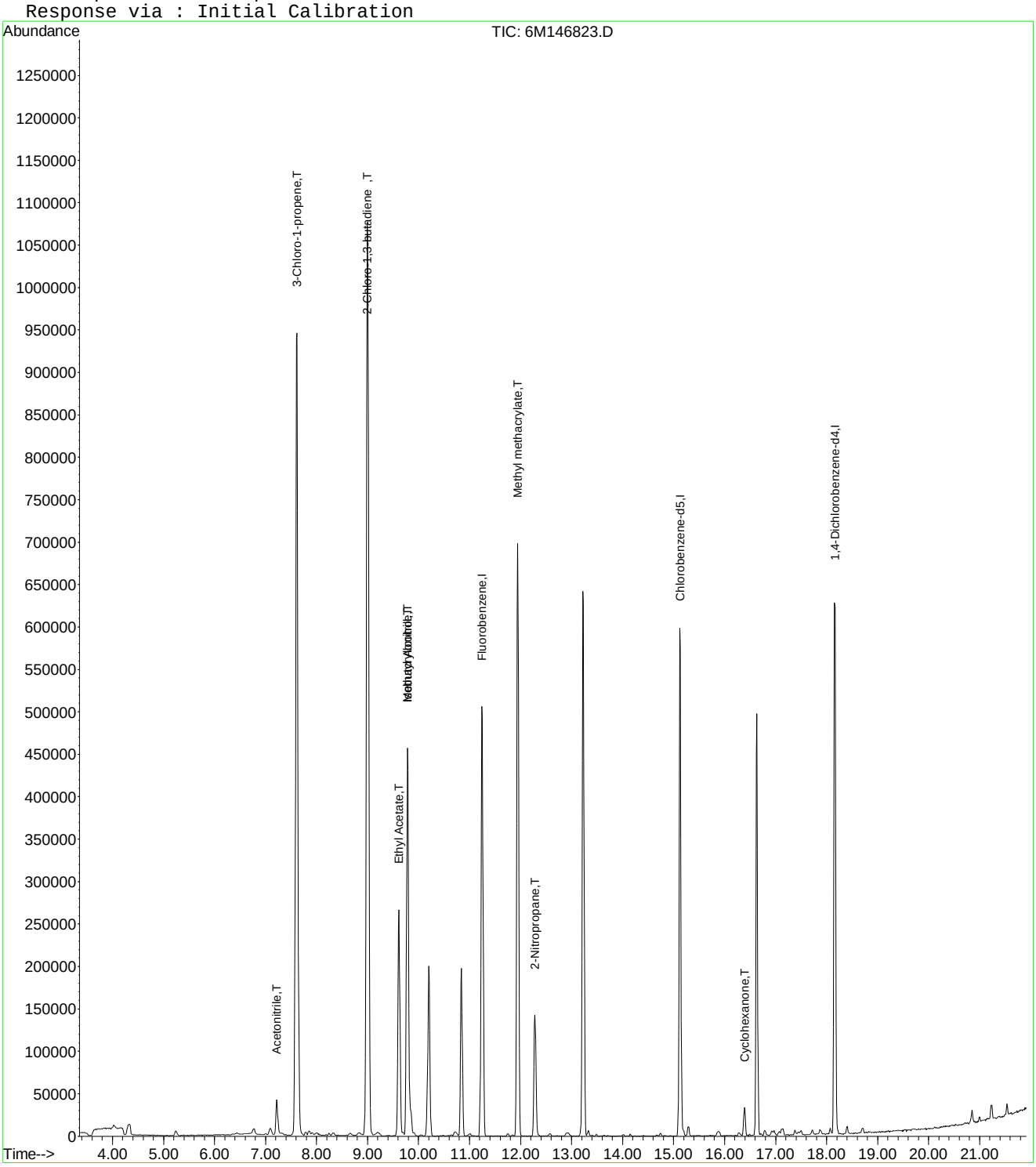
Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.24	96	669196	25.00	ug/L		-0.03
11) Chlorobenzene-d5	15.13	117	453141	25.00	ug/L		-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	223571	25.00	ug/L		-0.02
Target Compounds							Qvalue
2) Acetonitrile	7.22	41	59465	124.2959	ug/L		95
3) 3-Chloro-1-propene	7.62	41	991047	123.5279	ug/L		95
4) 2-Chloro-1,3-butadiene	8.99	53	1040852	105.1153	ug/L		95
5) Ethyl Acetate	9.62	43	438811	102.2449	ug/L		98
6) Methacrylonitrile	9.78	67	227767	100.8055	ug/L		97
7) Isobutyl Alcohol	9.78	43	24031	172.7532	ug/L	#	83
9) Methyl methacrylate	11.95	41	442639	94.2614	ug/L		95
10) 2-Nitropropane	12.28	43	141711	74.2134	ug/L		87
13) Cyclohexanone	16.39	55	18410	217.6350	ug/L		90

(#) = qualifier out of range (m) = manual integration
6M146823.D A9FOOWT.M Wed May 03 09:37:30 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 3 9:21 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



Evaluate Continuing Calibration Report

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146823.D Vial: 2
Acq On : 28 Apr 2017 20:07 Operator: JDS
Sample : WG612110-01 100ug/L A9 CCV STD 8260 Inst : Hpms6
Misc : 1,1 STD81397 Multiplr: 1.00
MS Integration Params: rteint.p

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Multiple Level Calibration

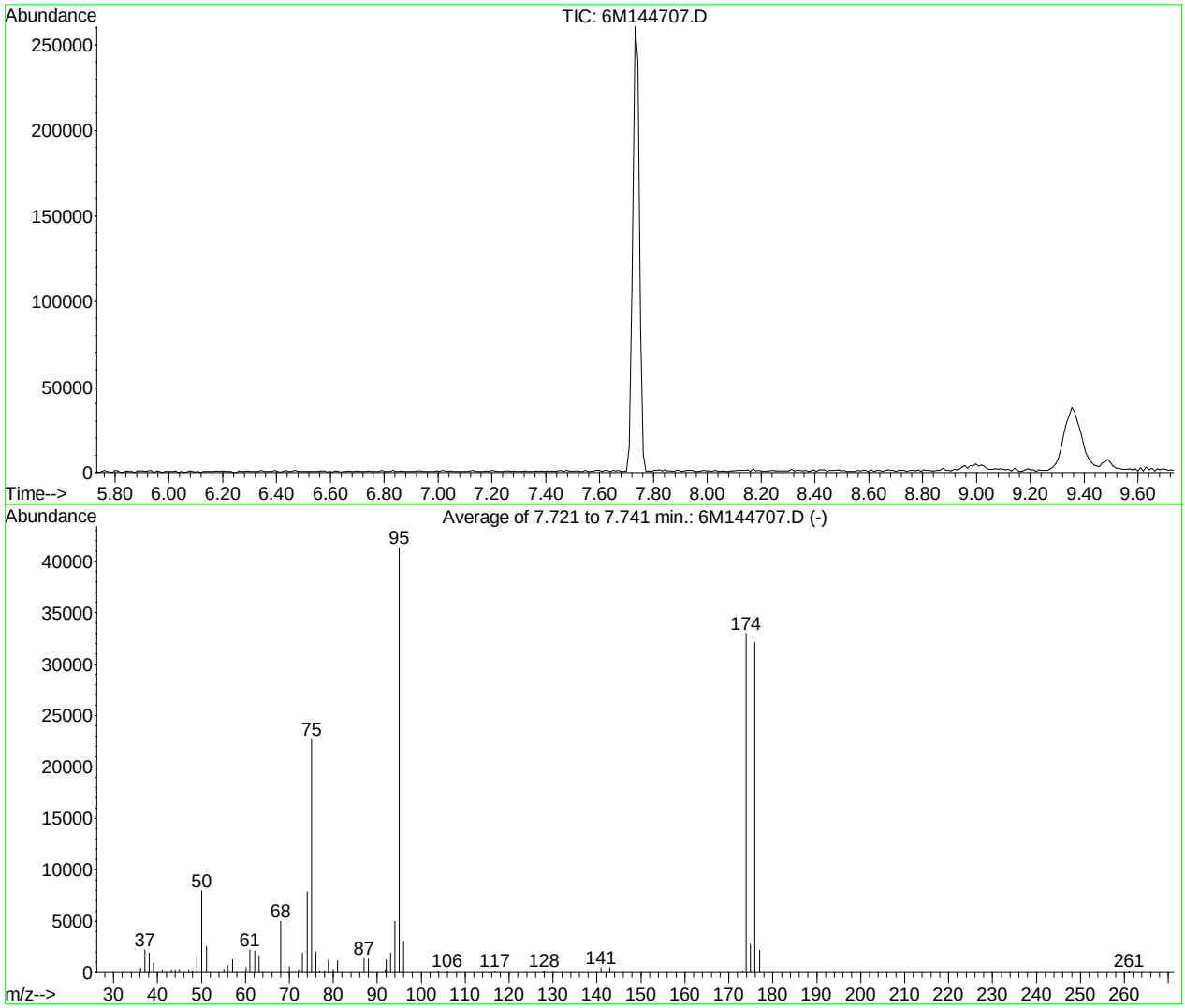
Min. RRF : 0.000 Min. Rel. Area : 1% Max. R.T. Dev 0.50min
Max. RRF Dev : 75% Max. Rel. Area : 200%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Fluorobenzene	25.0000	25.0000	0.0	79	-0.03
2	T	Acetonitrile	100.0000	124.2959	-24.3	101	-0.01
3	T	3-Chloro-1-propene	100.0000	123.5279	-23.5	95	0.00
4	T	2-Chloro-1,3-butadiene	100.0000	105.1154	-5.1	80	-0.02
5	T	Ethyl Acetate	100.0000	102.2449	-2.2	78	-0.01
6	T	Methacrylonitrile	100.0000	100.8055	-0.8	76	-0.02
7	T	Isobutyl Alcohol	200.0000	172.7532	13.6	65	-0.02
8	T	1-Butanol	-1.0000	0.0000	0.0	0	-0.06
9	T	Methyl methacrylate	100.0000	94.2614	5.7	71	-0.01
10	T	2-Nitropropane	100.0000	74.2134	25.8	59	-0.02
11	I	Chlorobenzene-d5	25.0000	25.0000	0.0	73	-0.02
12	I	1,4-Dichlorobenzene-d4	25.0000	25.0000	0.0	65	-0.02
13	T	Cyclohexanone	100.0000	217.6350	-117.6#	163	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
6M146823.D A9FOOWT.M Wed May 03 09:37:34 2017 Page 1

2.1.1.5 Raw QC Data

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\011217\6M144707.D Vial: 1
Acq On : 12 Jan 2017 8:36 Operator: TMB
Sample : WG598323-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD79474 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01

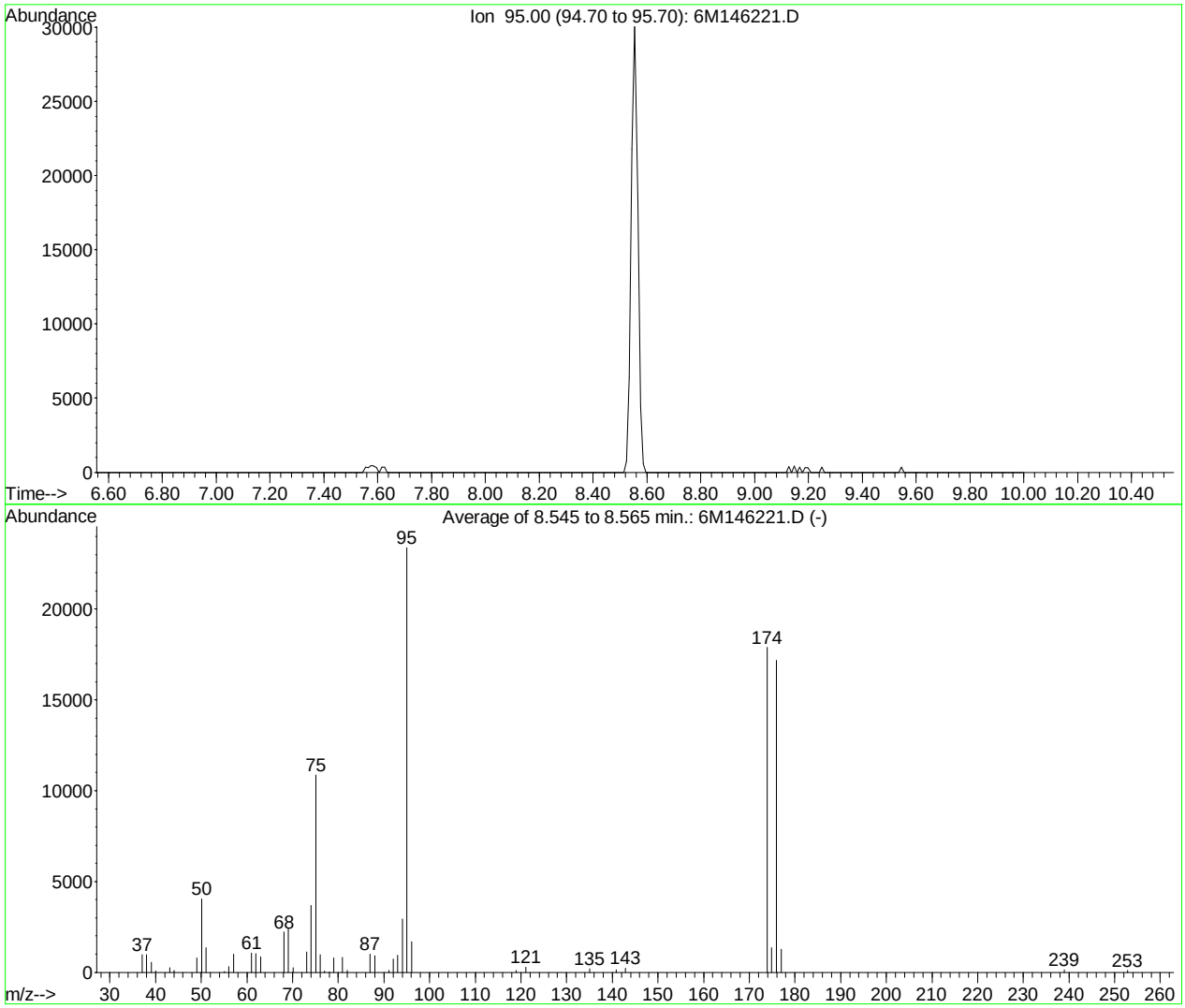


AutoFind: Scans 258, 259, 260; Background Corrected with Scan 253

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	7923	PASS
75	95	30	60	54.8	22651	PASS
95	95	100	100	100.0	41304	PASS
96	95	5	9	7.3	3007	PASS
173	174	0.00	2	0.4	116	PASS
174	95	50	100	79.8	32963	PASS
175	174	5	9	8.2	2709	PASS
176	174	95	101	97.3	32071	PASS
177	176	5	9	6.7	2147	PASS

6M144707.D BFB.M Thu Apr 27 13:11:59 2017

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\040517\6M146221.D Vial: 3
Acq On : 5 Apr 2017 16:29 Operator: TMB
Sample : WG608938-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD80989 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

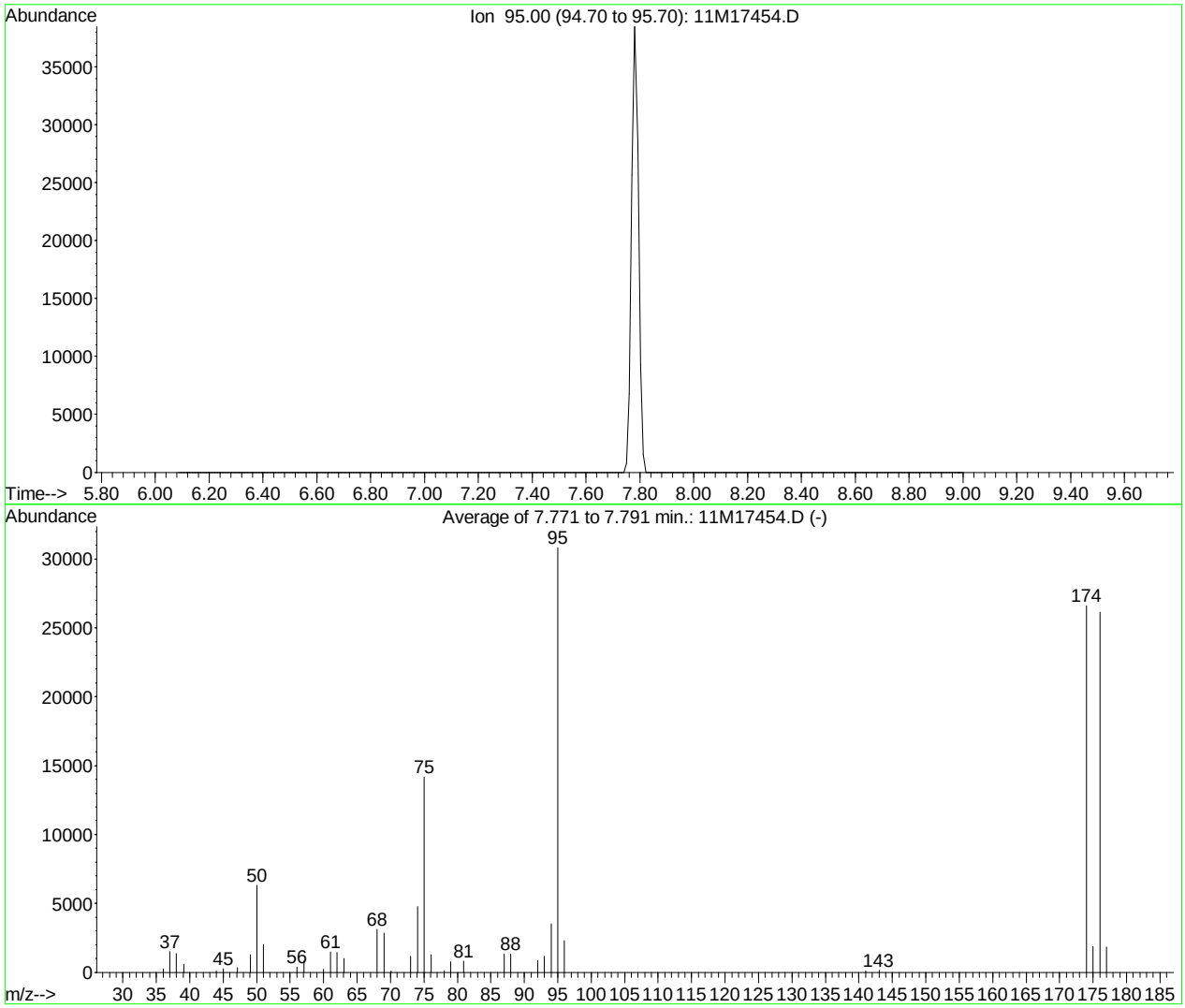


AutoFind: Scans 339, 340, 341; Background Corrected with Scan 334

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.3	4043	PASS
75	95	30	60	46.5	10875	PASS
95	95	100	100	100.0	23389	PASS
96	95	5	9	7.2	1674	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	76.5	17883	PASS
175	174	5	9	7.6	1356	PASS
176	174	95	101	96.1	17186	PASS
177	176	5	9	7.3	1263	PASS

6M146221.D 8260BWT.M Thu Apr 06 14:59:20 2017

```
Data File : C:\MSDCHEM\1\DATA\041117\11M17454.D          Vial: 1
Acq On    : 11 Apr 2017  17:59                       Operator: FJB
Sample    : WG609769-01 BFB 50ng A9                  Inst    : hpms11
Misc      : 1,1 STD80989                             Multiplr: 1.00
MS Integration Params: rteint.p
Method    : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title     : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
```

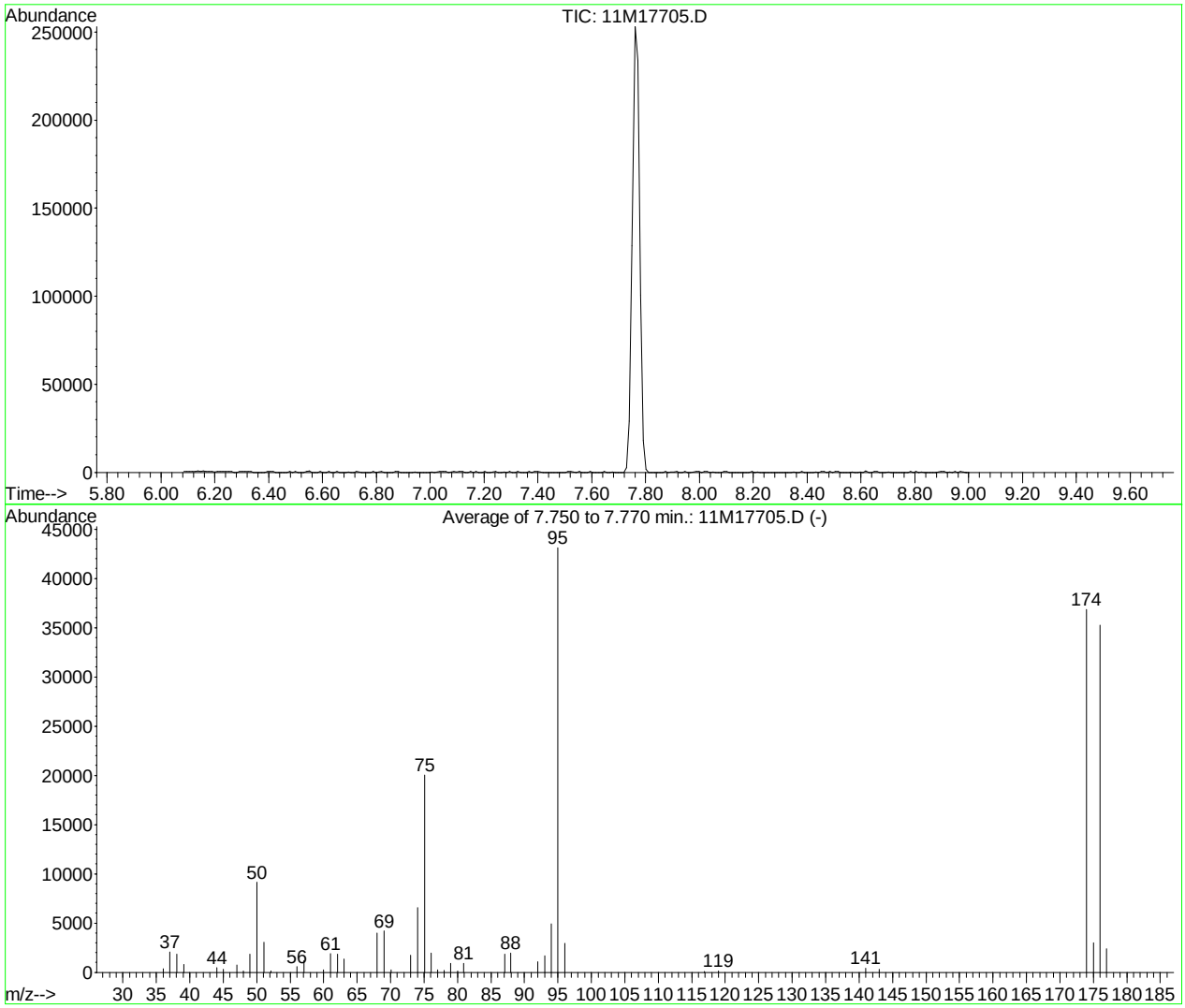


AutoFind: Scans 164, 165, 166; Background Corrected with Scan 159

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	20.4	6289	PASS
75	95	30	60	45.9	14147	PASS
95	95	100	100	100.0	30826	PASS
96	95	5	9	7.4	2288	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	86.3	26595	PASS
175	174	5	9	7.1	1884	PASS
176	174	95	101	98.2	26124	PASS
177	176	5	9	7.0	1818	PASS

11M17454.D A9FOOWT.M Fri Apr 21 13:38:28 2017

Data File : C:\MSDCHEM\1\DATA\042417\11M17705.D Vial: 2
Acq On : 24 Apr 2017 16:08 Operator: JDS
Sample : WG611320-01 BFB 50ng 8260 Inst : hpms11
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

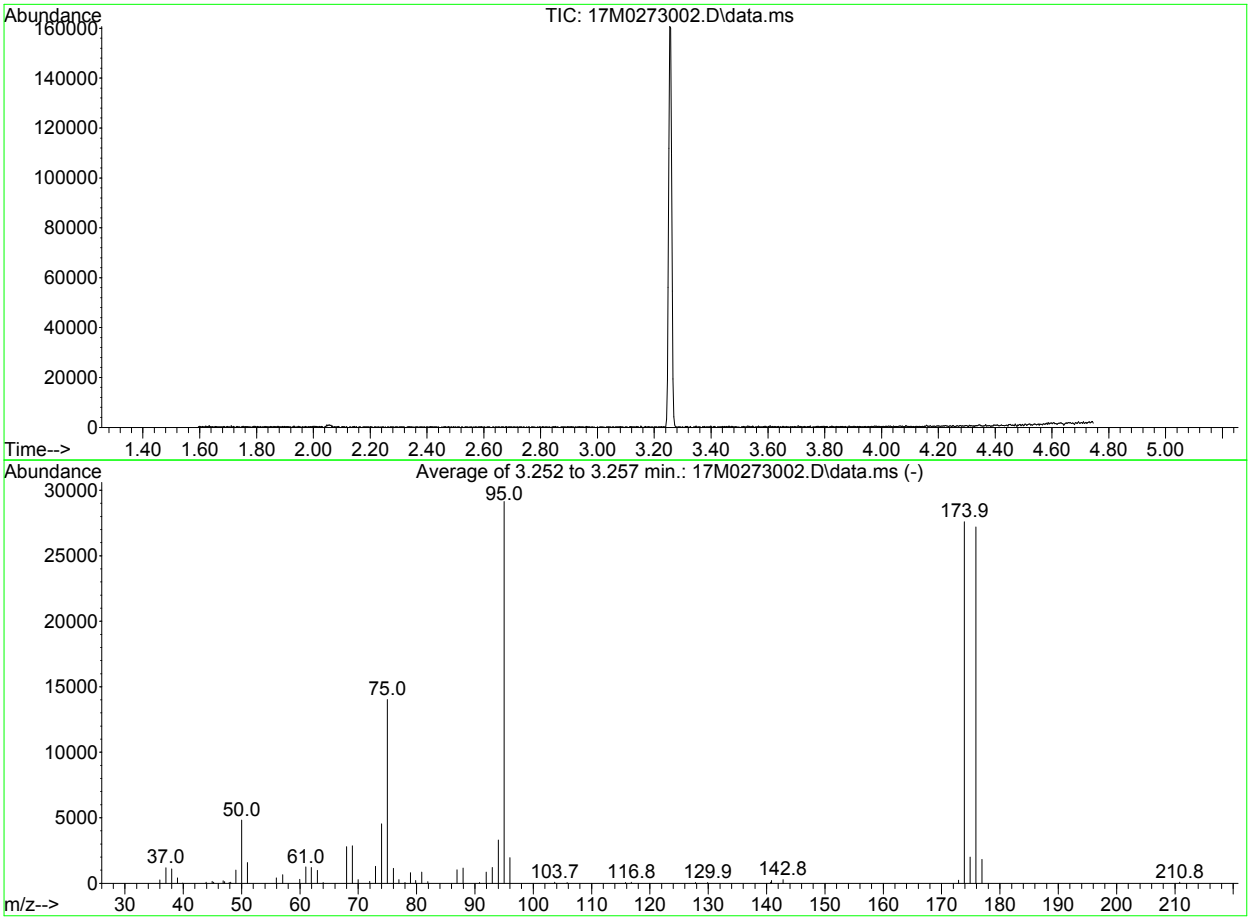
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	21.2	9137	PASS
75	95	30	60	46.5	20047	PASS
95	95	100	100	100.0	43125	PASS
96	95	5	9	6.8	2920	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	85.4	36834	PASS
175	174	5	9	8.1	2976	PASS
176	174	95	101	95.7	35256	PASS
177	176	5	9	6.8	2409	PASS

11M17705.D 8260WT.M Tue Apr 25 14:35:28 2017

Data Path : D:\MassHunter\GCMS\1\data\042517\
Data File : 17M0273002.D
Acq On : 25 Apr 2017 20:07
Operator : FJB
Sample : WG611454-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

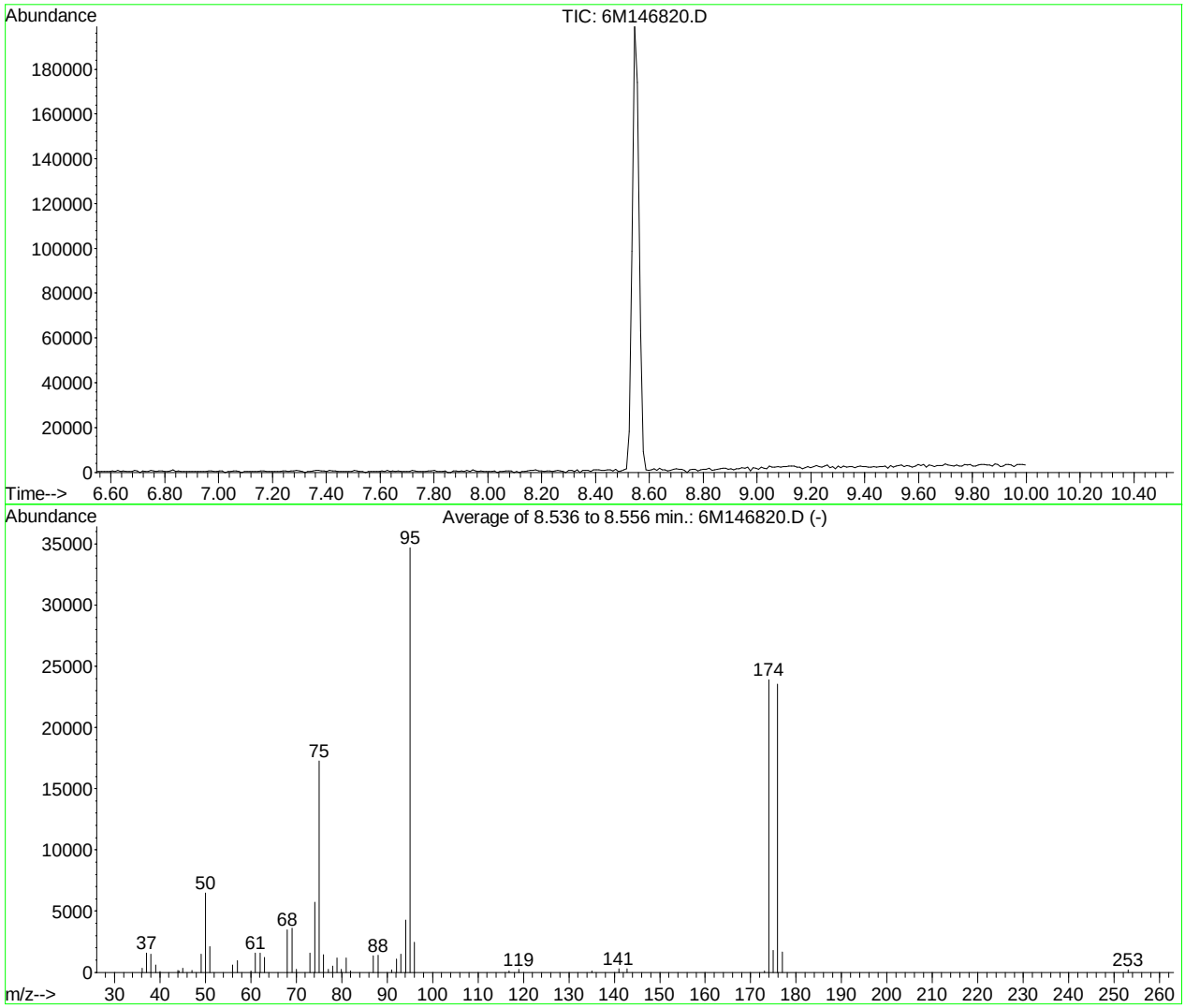
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	4824	PASS
75	95	30	60	48.1	14022	PASS
95	95	100	100	100.0	29152	PASS
96	95	5	9	6.7	1953	PASS
173	174	0.00	2	0.8	223	PASS
174	95	50	100	94.7	27600	PASS
175	174	5	9	7.3	2004	PASS
176	174	95	101	98.5	27192	PASS
177	176	5	9	6.7	1814	PASS

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146820.D Vial: 1
Acq On : 28 Apr 2017 18:32 Operator: JDS
Sample : WG612082-01 50ng BFB STD 8260 Inst : Hpms6
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: RTEINT.P
Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6

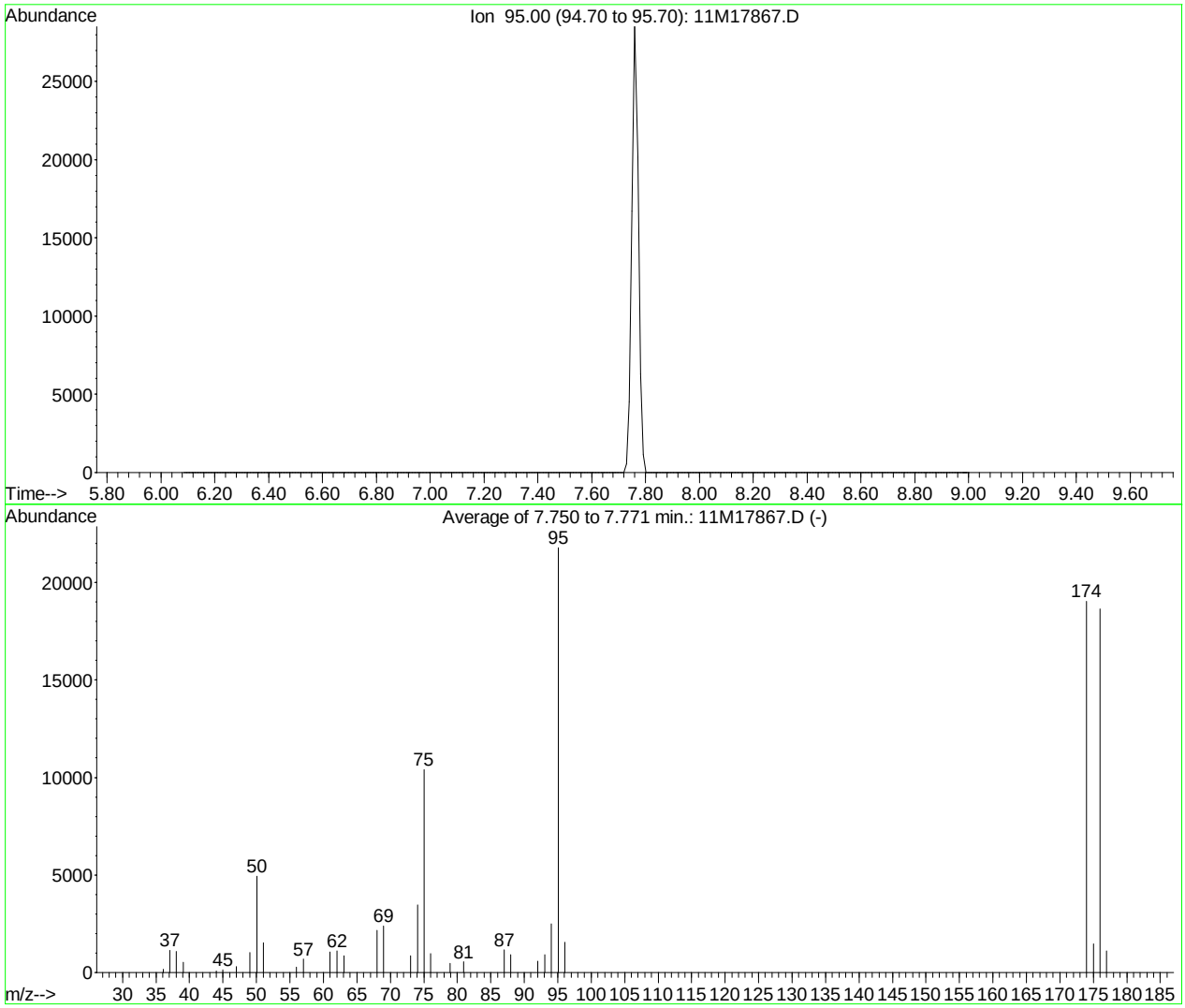


AutoFind: Scans 338, 339, 340; Background Corrected with Scan 333

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	18.7	6497	PASS
75	95	30	60	49.8	17276	PASS
95	95	100	100	100.0	34696	PASS
96	95	5	9	7.0	2444	PASS
173	174	0.00	2	0.5	121	PASS
174	95	50	100	68.9	23908	PASS
175	174	5	9	7.4	1777	PASS
176	174	95	101	98.5	23552	PASS
177	176	5	9	7.0	1647	PASS

6M146820.D 8260BWT.M Fri Apr 28 19:21:30 2017

Data File : C:\MSDCHEM\1\DATA\042917\11M17867.D Vial: 2
Acq On : 29 Apr 2017 17:57 Operator: TMB
Sample : WG612121-01 50ng BFB STD 8260 Inst : hpms11
Misc : 1,1 STD81577 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\BFB.M (RTE Integrator)
Title : SOP: OVL MSV01



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

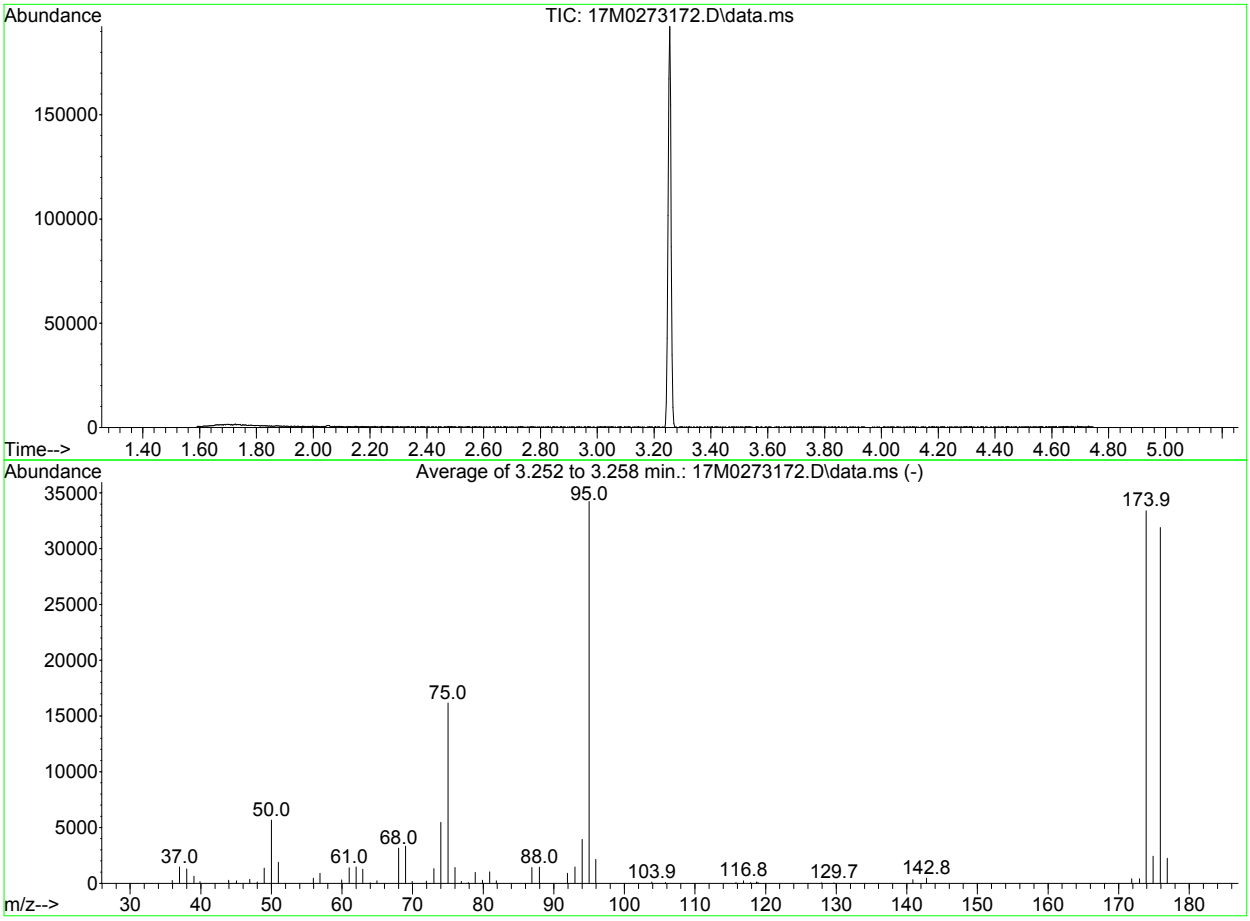
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	22.6	4932	PASS
75	95	30	60	47.7	10389	PASS
95	95	100	100	100.0	21797	PASS
96	95	5	9	7.1	1539	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	87.4	19054	PASS
175	174	5	9	7.6	1451	PASS
176	174	95	101	97.9	18648	PASS
177	176	5	9	5.9	1102	PASS

11M17867.D BFB.M Sat Apr 29 18:08:15 2017

Data Path : D:\MassHunter\GCMS\1\data\043017\
Data File : 17M0273172.D
Acq On : 30 Apr 2017 14:35
Operator : ADC
Sample : WG612141-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

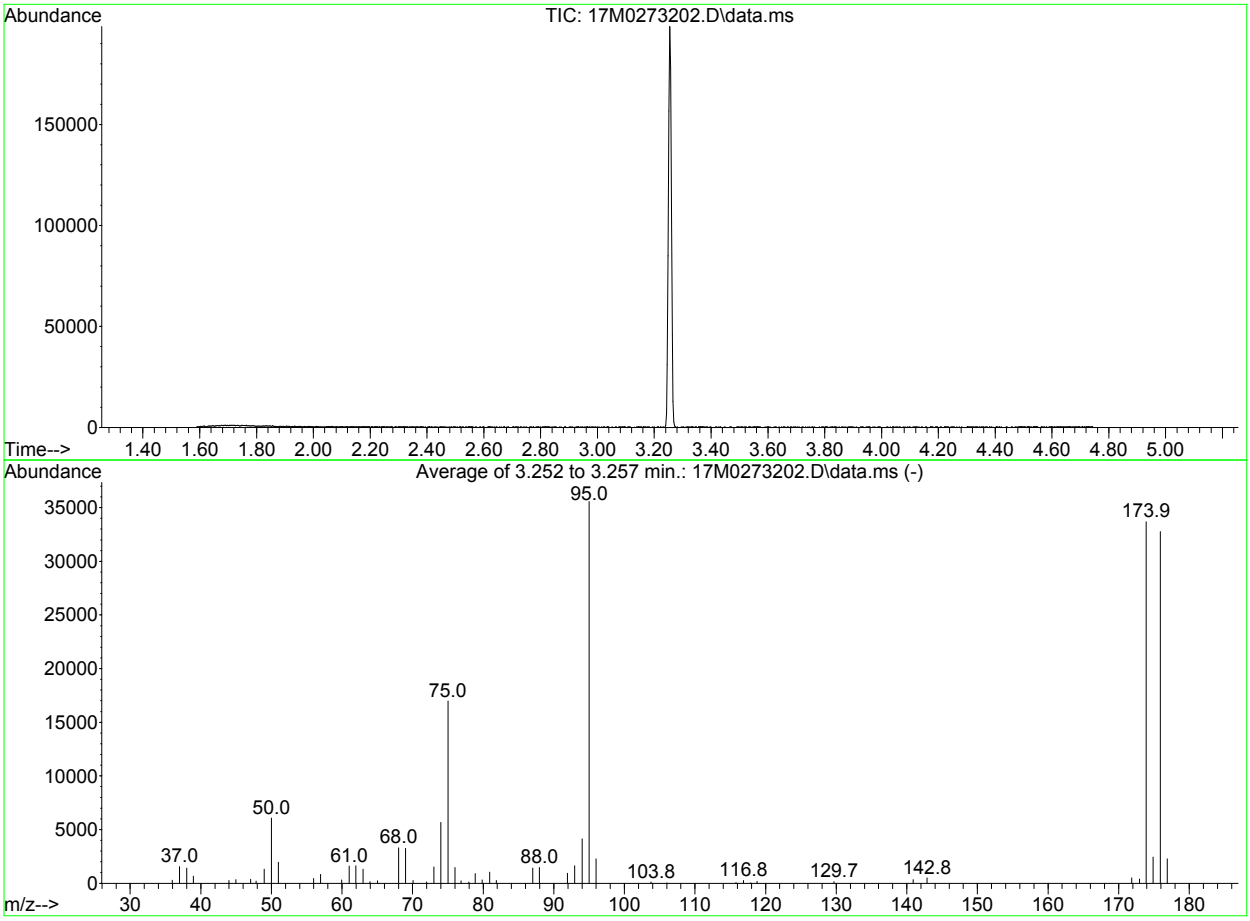
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.5	5657	PASS
75	95	30	60	47.2	16166	PASS
95	95	100	100	100.0	34232	PASS
96	95	5	9	6.3	2144	PASS
173	174	0.00	2	1.2	398	PASS
174	95	50	100	97.5	33387	PASS
175	174	5	9	7.2	2416	PASS
176	174	95	101	95.5	31880	PASS
177	176	5	9	7.0	2241	PASS

826VMS.M Sun Apr 30 15:34:19 2017 Page: 1

Data Path : D:\MassHunter\GCMS\1\data\050117\
Data File : 17M0273202.D
Acq On : 01 May 2017 11:49
Operator : ADC
Sample : WG612249-01 BFB 50ng 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

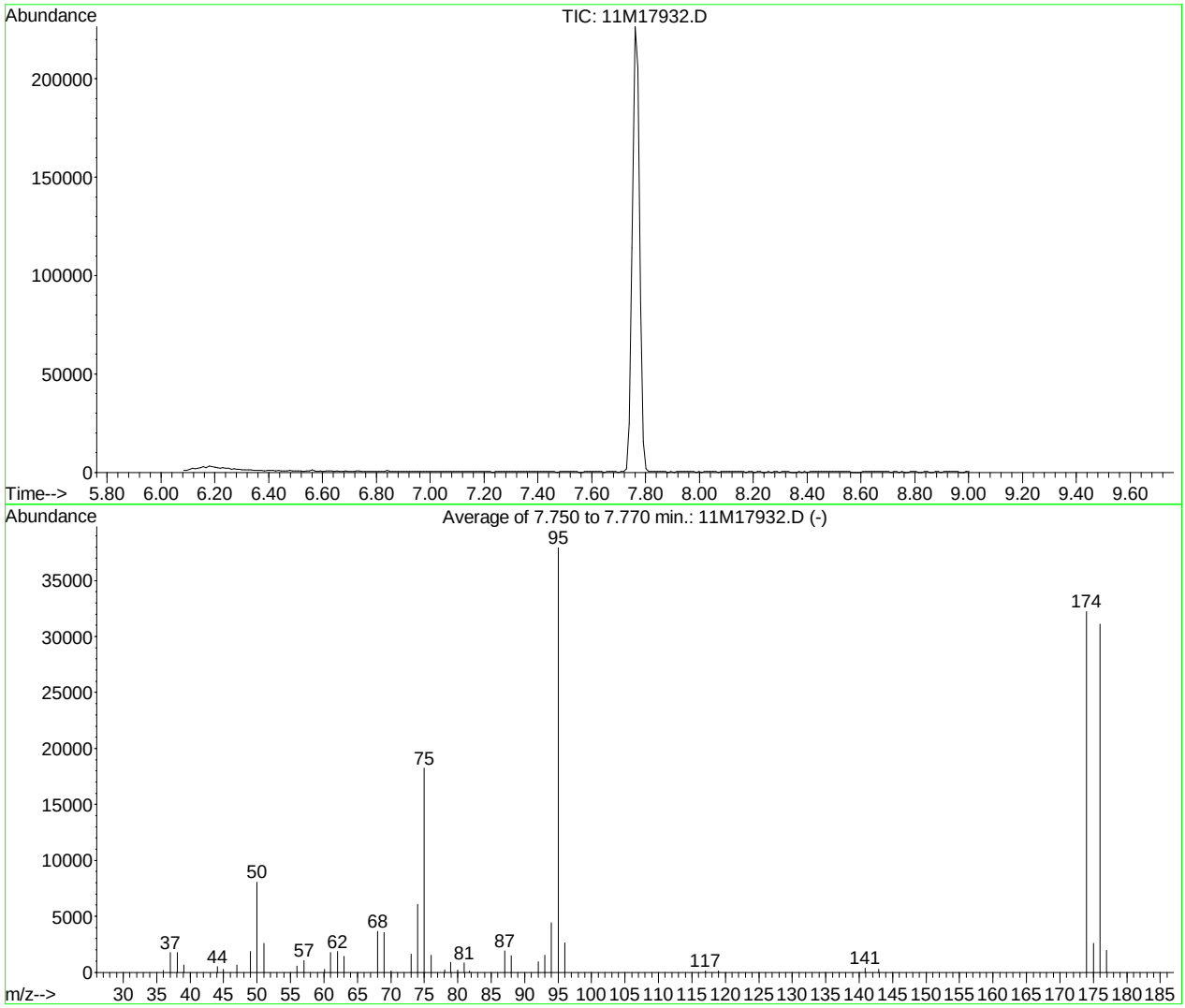
Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	17.1	6087	PASS
75	95	30	60	47.7	16978	PASS
95	95	100	100	100.0	35584	PASS
96	95	5	9	6.4	2270	PASS
173	174	0.00	2	1.2	402	PASS
174	95	50	100	94.7	33696	PASS
175	174	5	9	7.2	2442	PASS
176	174	95	101	97.3	32781	PASS
177	176	5	9	7.0	2279	PASS

Data File : C:\MSDCHEM\1\DATA\050117\11M17932.D Vial: 1
Acq On : 1 May 2017 14:47 Operator: JDS
Sample : WG612294-01 50ng BFB STD 8260 Inst : hpms11
Misc : 1,1 STD81491 Multiplr: 1.00
MS Integration Params: rteint.p
Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 050317 HPMS11



AutoFind: Scans 162, 163, 164; Background Corrected with Scan 157

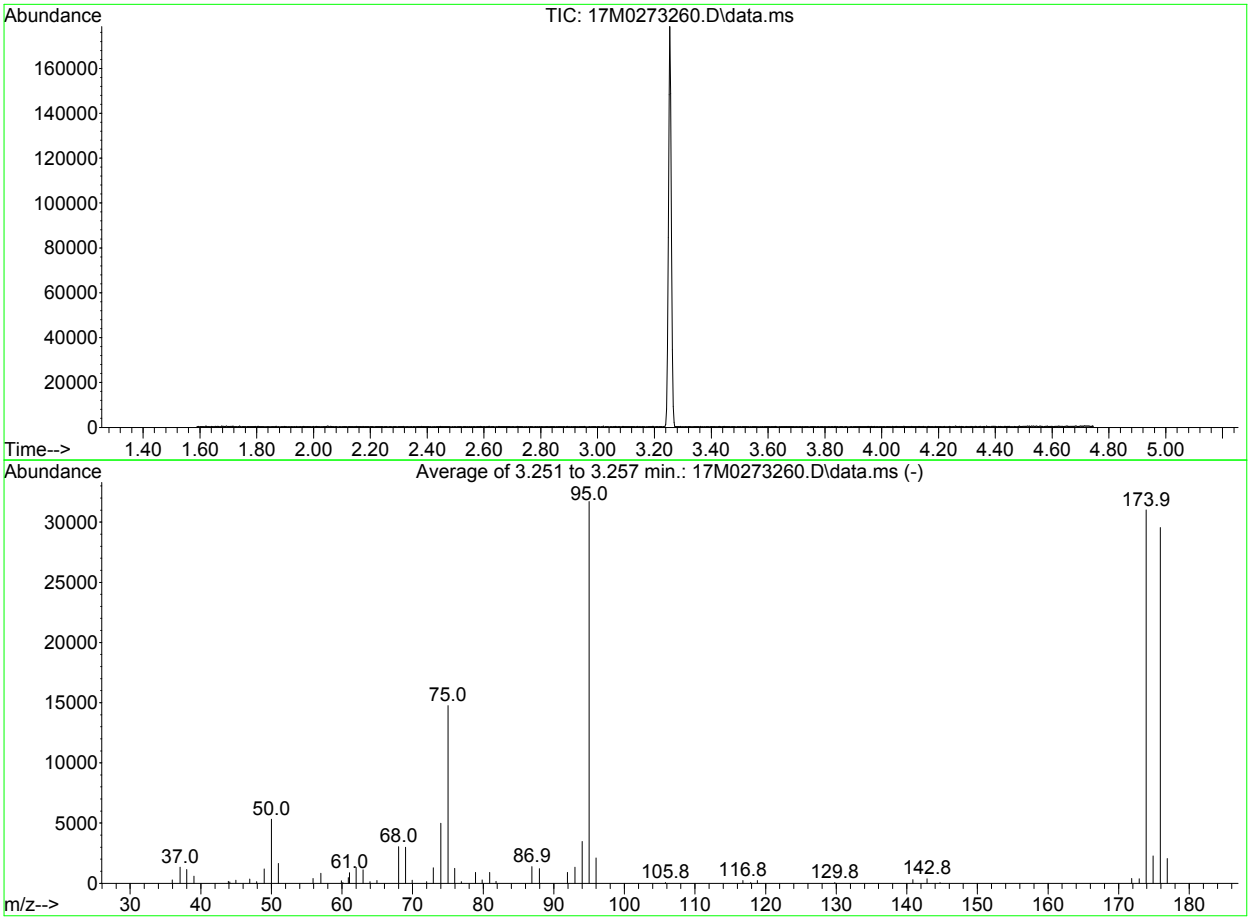
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	21.3	8076	PASS
75	95	30	60	48.1	18251	PASS
95	95	100	100	100.0	37946	PASS
96	95	5	9	7.0	2638	PASS
173	174	0.00	2	0.0	0	PASS
174	95	50	100	84.9	32234	PASS
175	174	5	9	8.1	2613	PASS
176	174	95	101	96.5	31117	PASS
177	176	5	9	6.3	1970	PASS

11M17932.D 8260WTR.M Wed May 03 15:07:31 2017

Data Path : D:\MassHunter\GCMS\1\data\050217\
Data File : 17M0273260.D
Acq On : 02 May 2017 18:30
Operator : ADC
Sample : WG612550-01 50ng BFB STD 8260
Misc : 1,1 STD81491
ALS Vial : 1 Sample Multiplier: 1

Integration File: lscint.p

Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
Last Update : Wed Apr 26 08:51:20 2017



AutoFind: Scans 575, 576, 577; Background Corrected with Scan 566

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.7	5312	PASS
75	95	30	60	46.5	14752	PASS
95	95	100	100	100.0	31725	PASS
96	95	5	9	6.6	2108	PASS
173	174	0.00	2	1.2	380	PASS
174	95	50	100	97.7	31008	PASS
175	174	5	9	7.3	2266	PASS
176	174	95	101	95.3	29544	PASS
177	176	5	9	6.9	2053	PASS

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51:55 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

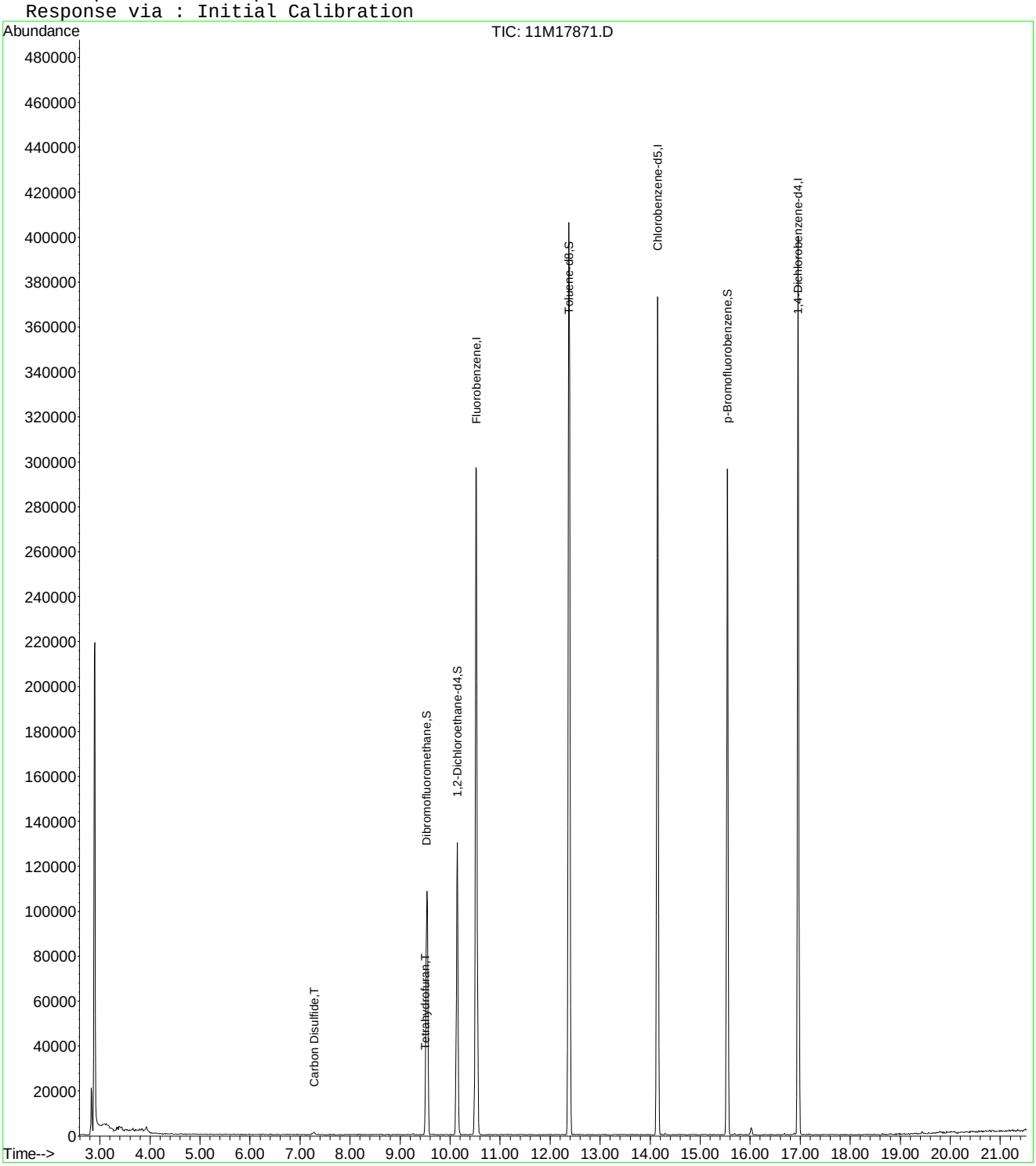
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	353206	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	250807	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	132987	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	86657	24.7691	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 99.08%			
43) 1,2-Dichloroethane-d4	10.14	65	105541	25.9953	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.00%			
57) Toluene-d8	12.38	98	345519	26.5313	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.12%			
78) p-Bromofluorobenzene	15.54	95	122347	26.4690	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.88%			
Target Compounds						Qvalue
3) Chloromethane	3.65	50	695	Below Cal		95
20) Carbon Disulfide	7.28	76	2034	0.1886	ug/L #	73
33) Chloroform	9.25	83	425	Below Cal	#	17
36) Tetrahydrofuran	9.50	42	5959	3.7912	ug/L	85

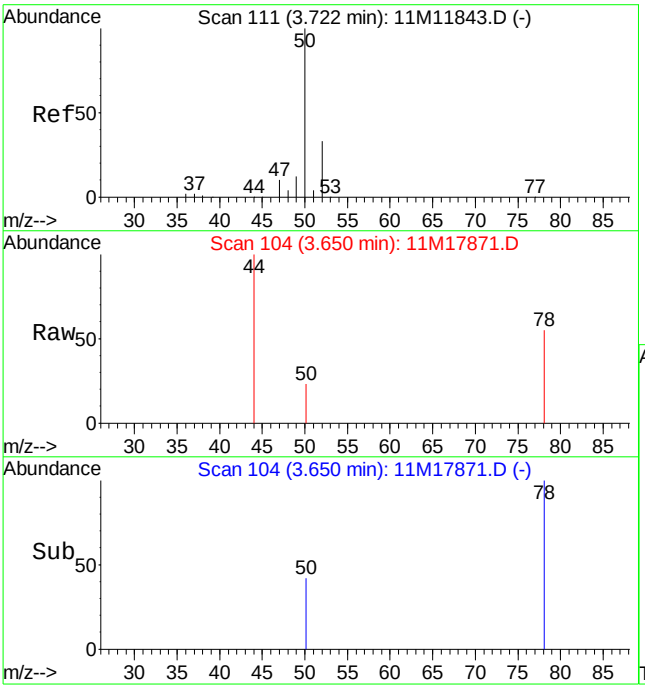
(#) = qualifier out of range (m) = manual integration
11M17871.D 8260WT.M Sun Apr 30 12:51:55 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\042917\11M17871.D Vial: 3
Acq On : 29 Apr 2017 19:55 Operator: TMB
Sample : WG612123-01 VBLK0429 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 30 12:51 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration

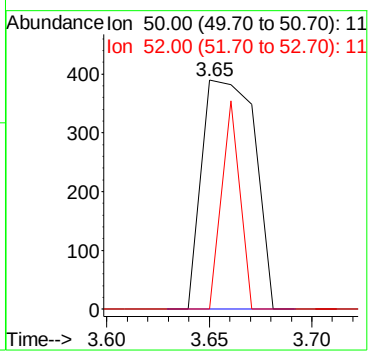


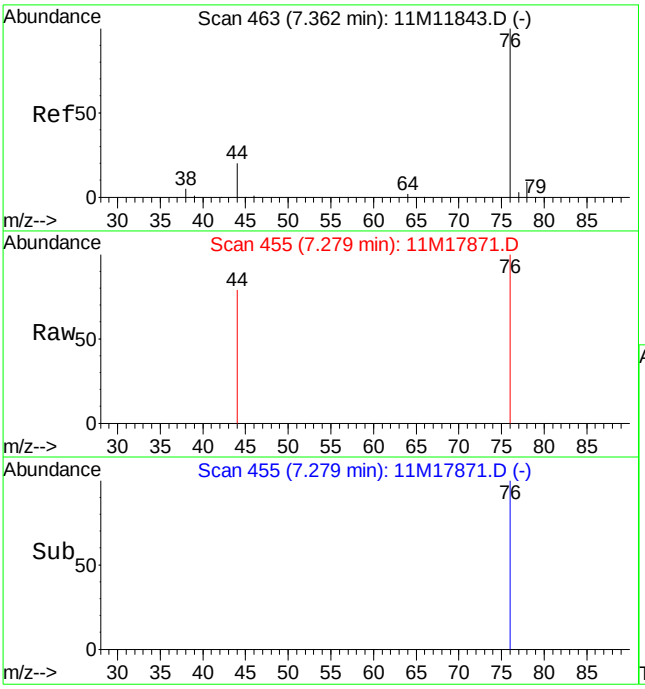


#3
Chloromethane
Concen: Below Cal
RT: 3.65 min Scan# 104
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 50 Resp: 695

Ion	Ratio	Lower	Upper
50	100		
52	31.7	20.8	48.6

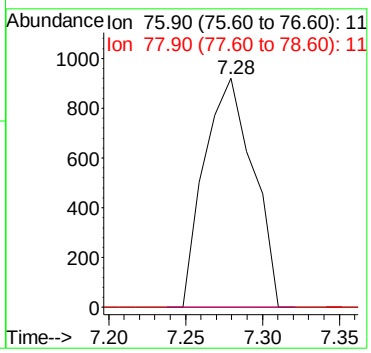


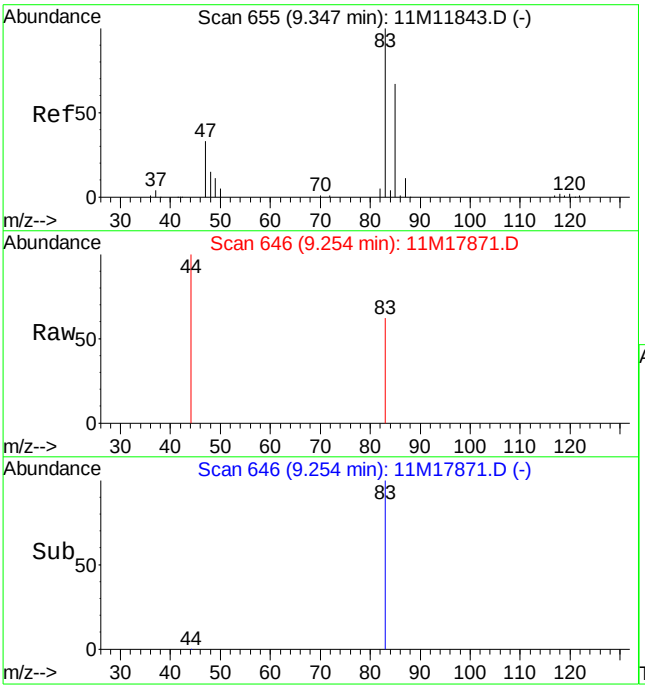


#20
Carbon Disulfide
Concen: 0.19 ug/L
RT: 7.28 min Scan# 455
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 76 Resp: 2034

Ion	Ratio	Lower	Upper
76	100		
78	0.0	5.9	13.7#

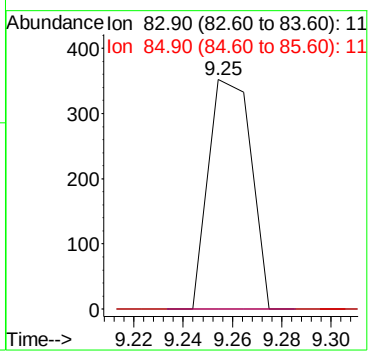


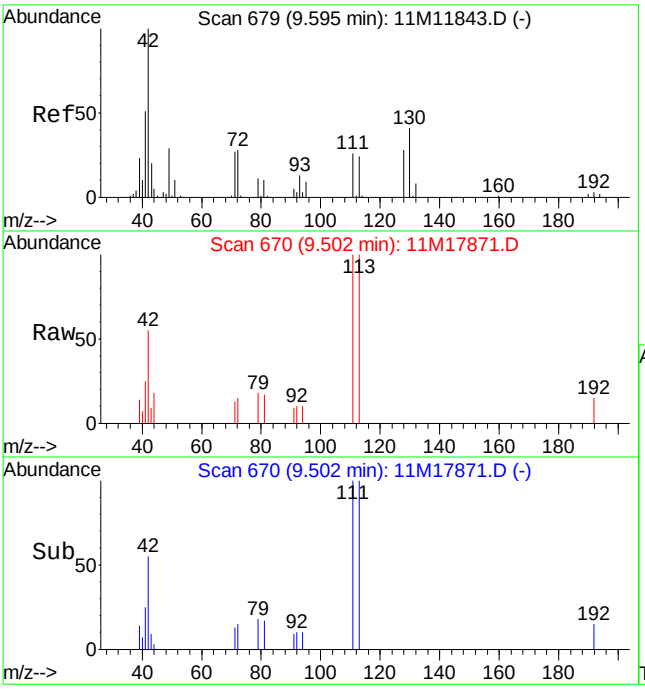


#33
Chloroform
Concen: Below Cal
RT: 9.25 min Scan# 646
Delta R.T. -0.01 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 83 Resp: 425

Ion	Ratio	Lower	Upper
83	100		
85	0.0	39.4	92.0#

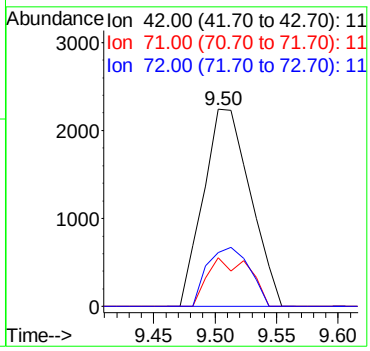




#36
Tetrahydrofuran
Concen: 3.79 ug/L
RT: 9.50 min Scan# 670
Delta R.T. 0.00 min
Lab File: 11M17871.D
Acq: 29 Apr 2017 19:55

Tgt Ion: 42 Resp: 5959

Ion	Ratio	Lower	Upper
42	100		
71	22.2	19.0	44.2
72	27.2	20.8	48.4



Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 02 13:28:01 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

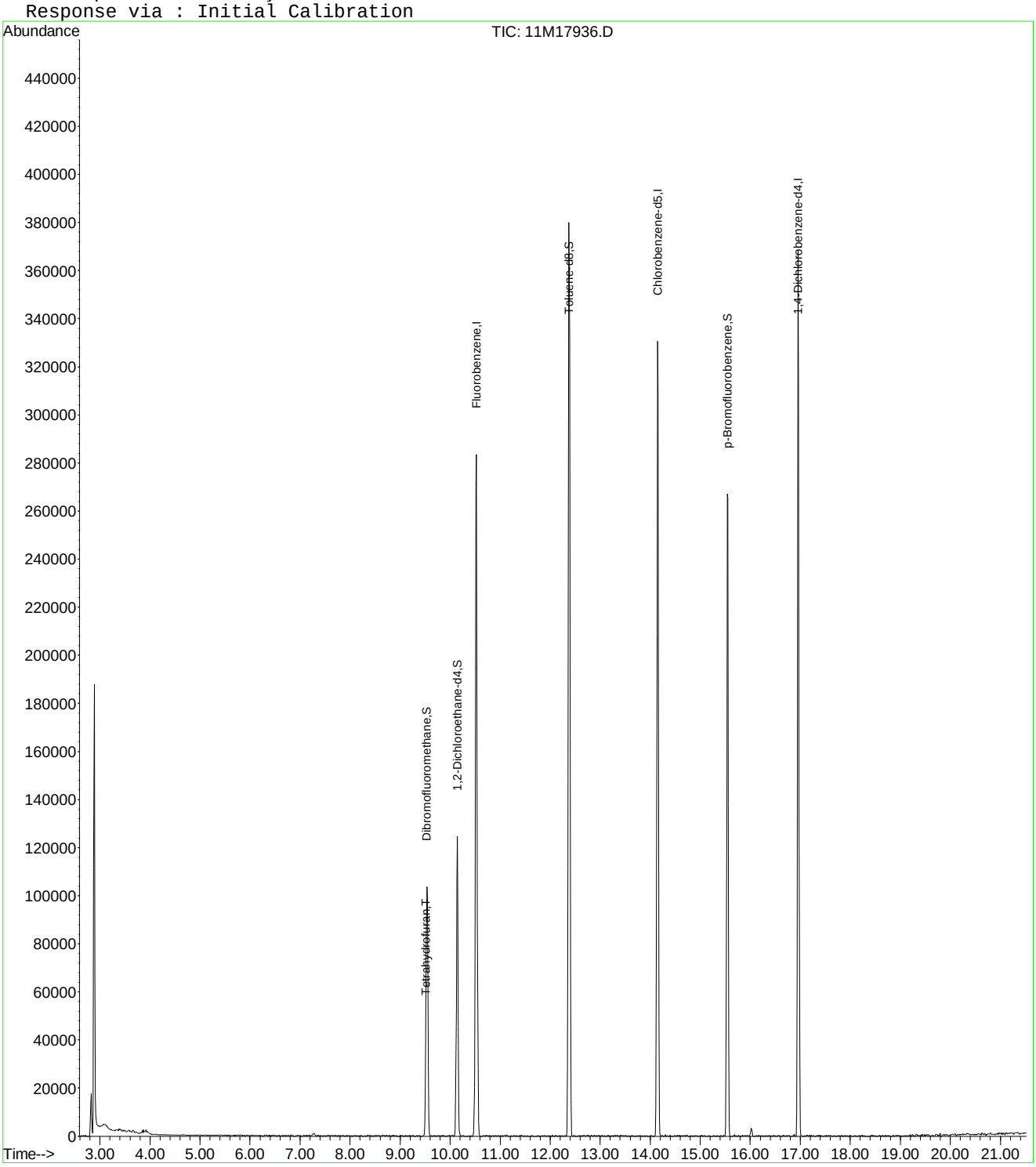
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	336081	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	233920	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	124853	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84694	25.4416	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.76%			
43) 1,2-Dichloroethane-d4	10.14	65	101360	26.2376	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.96%			
57) Toluene-d8	12.38	98	326677	26.8954	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.60%			
78) p-Bromofluorobenzene	15.54	95	116318	26.8041	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.20%			
Target Compounds						Qvalue
3) Chloromethane	3.66	50	729	Below Cal	#	40
33) Chloroform	9.26	83	206	Below Cal	#	17
36) Tetrahydrofuran	9.51	42	5296	3.5411	ug/L	82

(#) = qualifier out of range (m) = manual integration
11M17936.D 8260WTR.M Wed May 03 15:34:28 2017 Page 1

Quantitation Report (QT Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 3 15:30 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 050317 HPMS11
Last Update : Wed May 03 09:21:28 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 04 09:27:36 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	336081	25.00	ug/L	-0.01
12) Chlorobenzene-d5	14.14	117	233920	25.00	ug/L	-0.02
13) 1,4-Dichlorobenzene-d4	16.96	152	124853	25.00	ug/L	-0.02

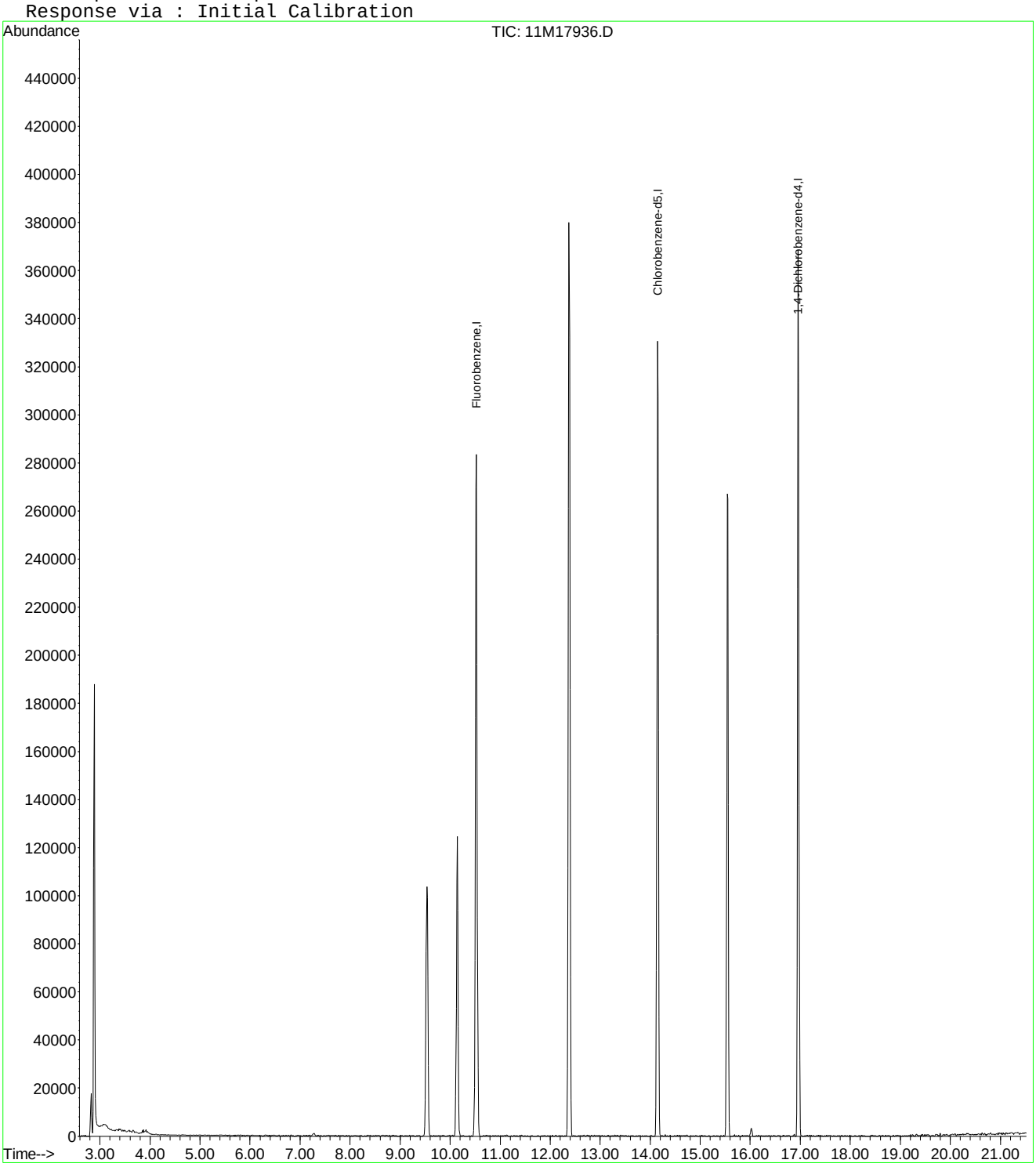
Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
11M17936.D A9FOOWT.M Thu May 04 09:27:37 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 4 9:27 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 04 09:30:38 2017 Quant Results File: A9FOOWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	336081	25.00	ug/L	-0.01
12) Chlorobenzene-d5	14.14	117	233920	25.00	ug/L	-0.02
13) 1,4-Dichlorobenzene-d4	16.96	152	124853	25.00	ug/L	-0.02

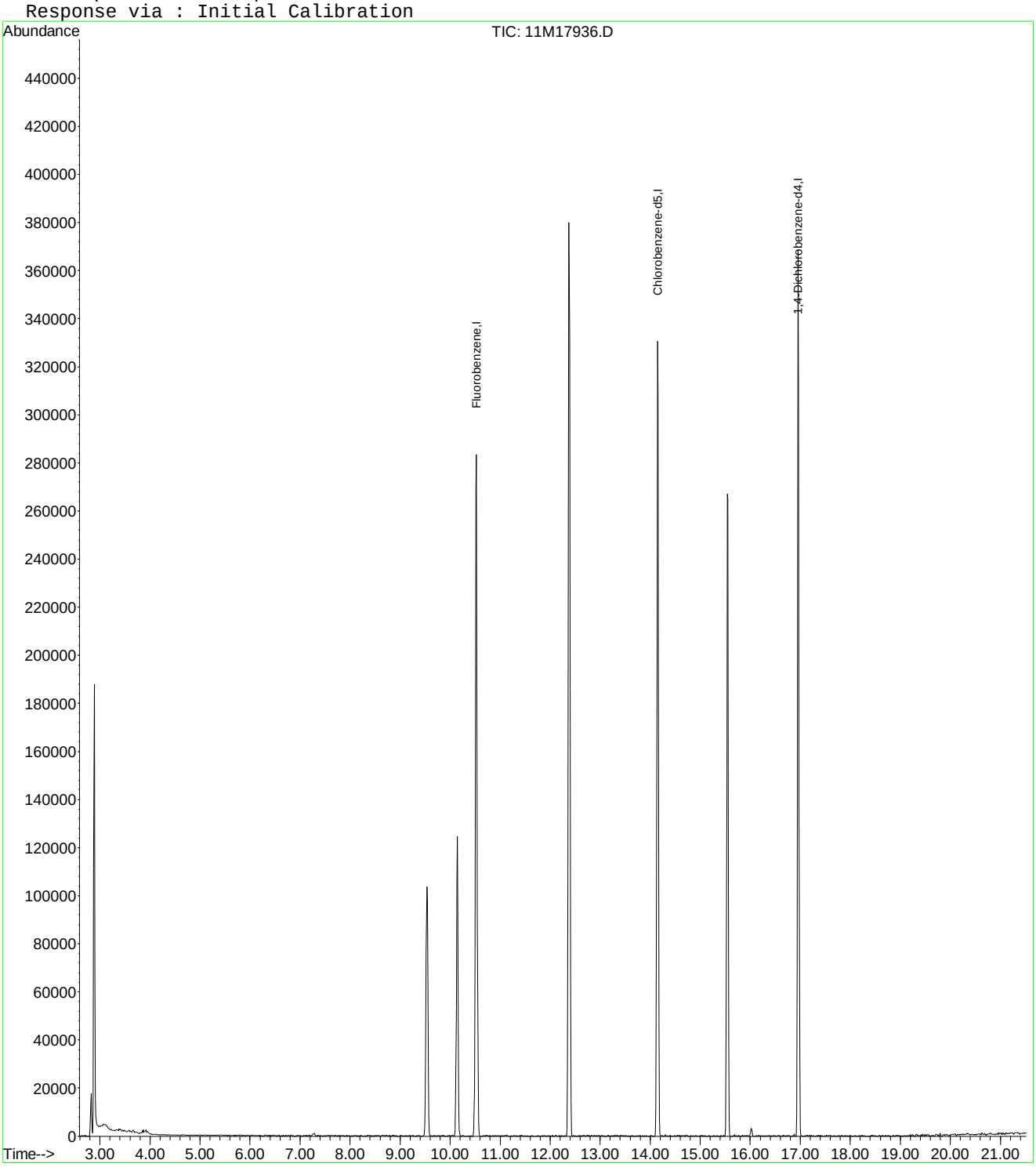
Target Compounds Qvalue

(#) = qualifier out of range (m) = manual integration
11M17936.D A9FOOWT.M Thu May 04 09:30:38 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 4 9:30 2017 Quant Results File: A9FOOWT.RES

Method : C:\MSDCHEM\1\METHODS\A9FOOWT.M (RTE Integrator)
Title : Appendix IX (SOP:OVL MSV01) Water 041117 HPMS11
Last Update : Fri Apr 21 13:34:21 2017
Response via : Initial Calibration



LSC Area Percent Report

Data File : C:\MSDCHEM\1\DATA\050117\11M17936.D Vial: 3
Acq On : 1 May 2017 16:50 Operator: JDS
Sample : WG612295-01 BLANK STD 8260 Inst : hpms11
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P

Method : C:\MSDCHEM\1\METHODS\8260WTR.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 050317 HPMS11
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 100 Area counts
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

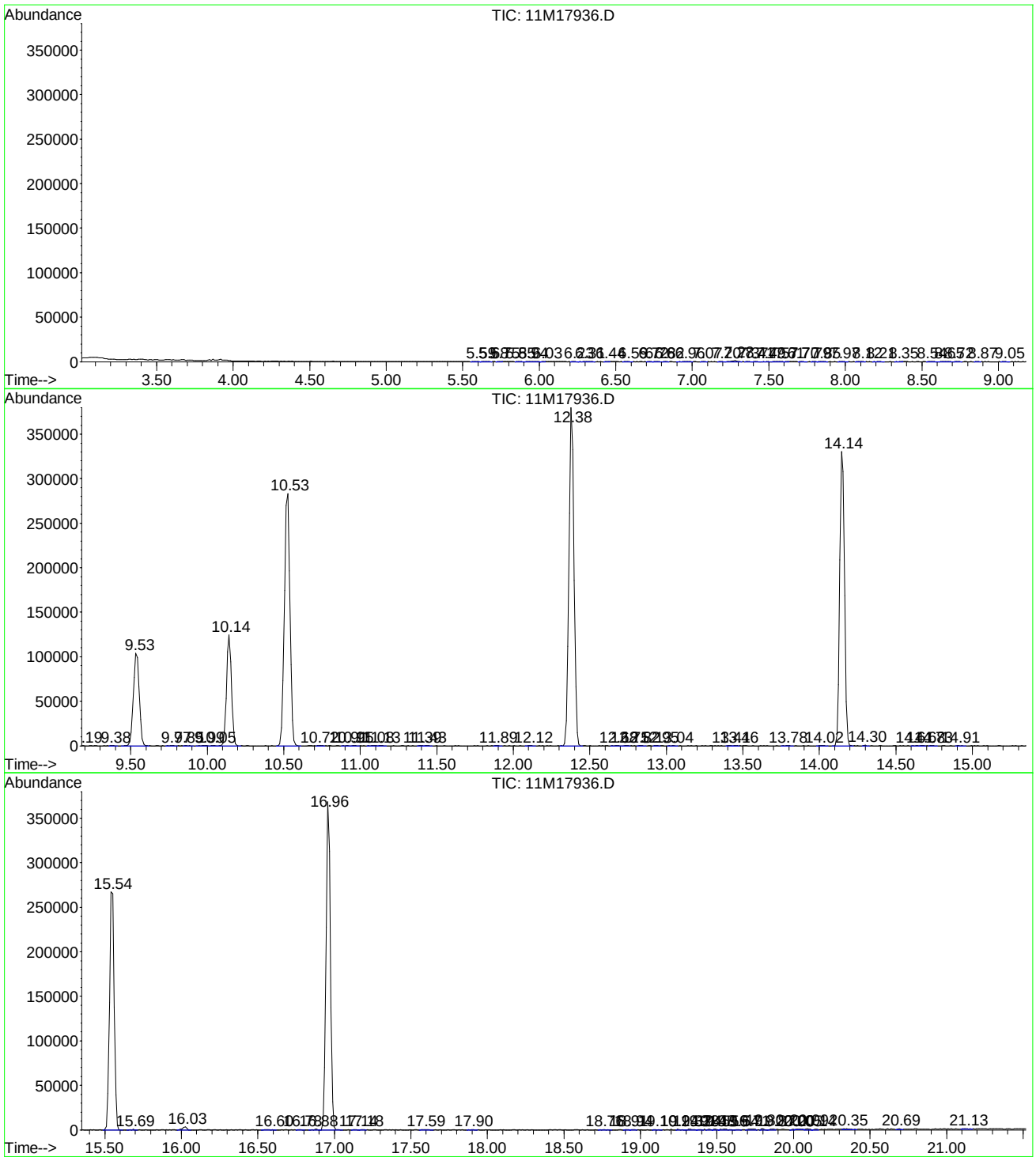
Signal : TIC

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	5.594	288	292	294	rBB	446	1197	0.14%	0.028%
2	5.677	294	300	301	rBB	424	1325	0.15%	0.031%
3	5.749	304	307	308	rBV	454	976	0.11%	0.023%
4	5.852	316	317	321	rBB	434	926	0.11%	0.022%
5	5.935	322	325	332	rBB	472	1938	0.23%	0.046%
6	6.028	332	334	335	rBV	490	714	0.08%	0.017%
7	6.235	351	354	356	rBB	383	638	0.07%	0.015%
8	6.307	356	361	366	rBB	411	1852	0.22%	0.044%
9	6.442	372	374	376	rBV	386	934	0.11%	0.022%
10	6.586	384	388	390	rBB	407	923	0.11%	0.022%
11	6.721	399	401	403	rBB	446	726	0.08%	0.017%
12	6.762	403	405	408	rBB	405	874	0.10%	0.021%
13	6.824	409	411	413	rBB	411	684	0.08%	0.016%
14	6.959	418	424	428	rBB	391	1486	0.17%	0.035%
15	7.072	433	435	437	rBB	415	663	0.08%	0.016%
16	7.197	444	447	448	rBB	400	681	0.08%	0.016%
17	7.279	449	455	459	rBB	1260	3649	0.42%	0.086%
18	7.372	461	464	465	rBB	412	728	0.08%	0.017%
19	7.414	466	468	471	rBB	349	602	0.07%	0.014%
20	7.486	472	475	477	rBB	382	627	0.07%	0.015%
21	7.569	478	483	486	rBB	402	1526	0.18%	0.036%
22	7.610	486	487	489	rBV	369	630	0.07%	0.015%
23	7.703	495	496	500	rBB	417	674	0.08%	0.016%
24	7.786	503	504	507	rBB	344	604	0.07%	0.014%
25	7.848	507	510	513	rBB	339	990	0.12%	0.023%
26	7.972	520	522	526	rBB	331	809	0.09%	0.019%
27	8.117	531	536	537	rBB	379	1024	0.12%	0.024%
28	8.210	542	545	549	rBB	337	824	0.10%	0.019%
29	8.355	556	559	561	rBV	445	874	0.10%	0.021%
30	8.541	576	577	583	rBB	368	1057	0.12%	0.025%
31	8.654	584	588	592	rBB	418	1526	0.18%	0.036%
32	8.716	593	594	598	rBB	385	906	0.11%	0.021%
33	8.872	606	609	610	rBB	447	735	0.09%	0.017%
34	9.047	623	626	628	rBB	329	598	0.07%	0.014%
35	9.192	636	640	642	rBB	407	686	0.08%	0.016%
36	9.378	656	658	661	rBB	378	653	0.08%	0.015%
37	9.533	664	673	681	rBB	103771	276967	32.23%	6.547%
38	9.771	692	696	699	rBB	379	823	0.10%	0.019%
39	9.854	703	704	709	rBB	393	697	0.08%	0.016%
40	9.988	711	717	719	rBB	438	1106	0.13%	0.026%
41	10.050	720	723	724	rBB	399	657	0.08%	0.016%
42	10.143	725	732	739	rBB	124659	285240	33.19%	6.742%

43	10.526	762	769	777	rBB	283503	711819	82.83%	16.826%
44	10.722	787	788	792	rBB	399	851	0.10%	0.020%
45	10.908	803	806	808	rBB	382	672	0.08%	0.016%
46	10.950	809	810	814	rBB	377	644	0.07%	0.015%
47	11.084	819	823	826	rBB	350	1020	0.12%	0.024%
48	11.126	826	827	831	rBB	433	749	0.09%	0.018%
49	11.394	851	853	855	rBB	354	615	0.07%	0.015%
50	11.425	855	856	860	rBB	401	668	0.08%	0.016%
51	11.891	899	901	904	rBB	359	607	0.07%	0.014%
52	12.118	919	923	925	rBB	445	663	0.08%	0.016%
53	12.377	941	948	955	rBB	380053	859396	100.00%	20.314%
54	12.676	973	977	980	rBB	384	849	0.10%	0.020%
55	12.749	981	984	985	rBB	388	616	0.07%	0.015%
56	12.821	990	991	995	rBB	387	665	0.08%	0.016%
57	12.945	1000	1003	1004	rBB	375	659	0.08%	0.016%
58	13.038	1009	1012	1015	rBB	353	607	0.07%	0.014%
59	13.411	1046	1048	1050	rBB	388	638	0.07%	0.015%
60	13.462	1050	1053	1054	rBB	356	631	0.07%	0.015%
61	13.783	1081	1084	1088	rBB	358	839	0.10%	0.020%
62	14.021	1103	1107	1110	rBB	344	826	0.10%	0.020%
63	14.145	1113	1119	1126	rBB	330719	717492	83.49%	16.960%
64	14.300	1132	1134	1136	rBB	756	687	0.08%	0.016%
65	14.610	1163	1164	1168	rBB	339	615	0.07%	0.015%
66	14.682	1168	1171	1172	rBB	353	601	0.07%	0.014%
67	14.734	1174	1176	1179	rBB	428	747	0.09%	0.018%
68	14.910	1191	1193	1197	rBB	349	597	0.07%	0.014%
69	15.541	1249	1254	1261	rBB	267098	560155	65.18%	13.241%
70	15.685	1264	1268	1270	rBB	726	676	0.08%	0.016%
71	16.026	1296	1301	1304	rBB2	3385	6539	0.76%	0.155%
72	16.595	1349	1356	1358	rBB2	356	1043	0.12%	0.025%
73	16.781	1371	1374	1376	rBB2	342	602	0.07%	0.014%
74	16.885	1379	1384	1385	rBB2	846	1142	0.13%	0.027%
75	16.957	1386	1391	1400	rBB	368512	720985	83.89%	17.042%
76	17.143	1406	1409	1410	rBB	409	646	0.08%	0.015%
77	17.185	1411	1413	1415	rBB	398	685	0.08%	0.016%
78	17.588	1449	1452	1457	rBB	368	1230	0.14%	0.029%
79	17.898	1479	1482	1485	rBB	342	619	0.07%	0.015%
80	18.756	1562	1565	1570	rBB	360	813	0.09%	0.019%
81	18.911	1578	1580	1582	rBB	369	630	0.07%	0.015%
82	18.942	1582	1583	1586	rBB	393	667	0.08%	0.016%
83	19.097	1596	1598	1602	rBB	334	604	0.07%	0.014%
84	19.242	1611	1612	1616	rBB	665	865	0.10%	0.020%
85	19.325	1617	1620	1624	rBB	893	1643	0.19%	0.039%
86	19.377	1624	1625	1628	rBB	361	634	0.07%	0.015%
87	19.449	1630	1632	1634	rBB	795	966	0.11%	0.023%
88	19.480	1634	1635	1638	rBB	731	1076	0.13%	0.025%
89	19.563	1638	1643	1647	rBB2	657	2189	0.25%	0.052%
90	19.635	1648	1650	1652	rBB2	385	683	0.08%	0.016%
91	19.707	1655	1657	1662	rBB	887	2480	0.29%	0.059%
92	19.800	1664	1666	1668	rBB	1235	1716	0.20%	0.041%
93	19.873	1669	1673	1674	rBV	667	1635	0.19%	0.039%
94	19.997	1683	1685	1686	rBV	706	963	0.11%	0.023%
95	20.049	1686	1690	1692	rVV2	744	2120	0.25%	0.050%
96	20.090	1692	1694	1697	rVB	1089	2225	0.26%	0.053%
97	20.142	1697	1699	1701	rBV	820	1482	0.17%	0.035%
98	20.348	1716	1719	1725	rVB	819	2435	0.28%	0.058%
99	20.690	1750	1752	1754	rVB	837	1137	0.13%	0.027%
100	21.134	1791	1795	1798	rBV2	913	2775	0.32%	0.066%

Sum of corrected areas: 4230582

File : C:\MSDCHEM\1\DATA\050117\11M17936.D
Operator : JDS
Acquired : 1 May 2017 16:50 using AcqMethod 8260WT
Instrument : hpms11
Sample Name: WG612295-01 BLANK STD 8260
Misc Info : 1,1
Vial Number: 3
Quant File :8260WT.RES (RTE Integrator)



Tentatively Identified Compound (LSC) summary

Operator ID: JDS Date Acquired: 1 May 2017 16:50
Data File: C:\MSDCHEM\1\DATA\050117\11M17936.D
Name: WG612295-01 BLANK STD 8260
Misc: 1,1
Method: C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title: 8260B/624 (SOP: OVL MSV01) Water 050317 HPMS11
Library Searched: C:\DATABASE\NIST02.L

						Internal Standard			
TIC Top Hit name	RT	EstConc	Units	Response	#	RT	Resp	Conc

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273175.D Vial: 3
Acq On : 30 Apr 2017 15:48 Operator: ADC
Sample : WG612142-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

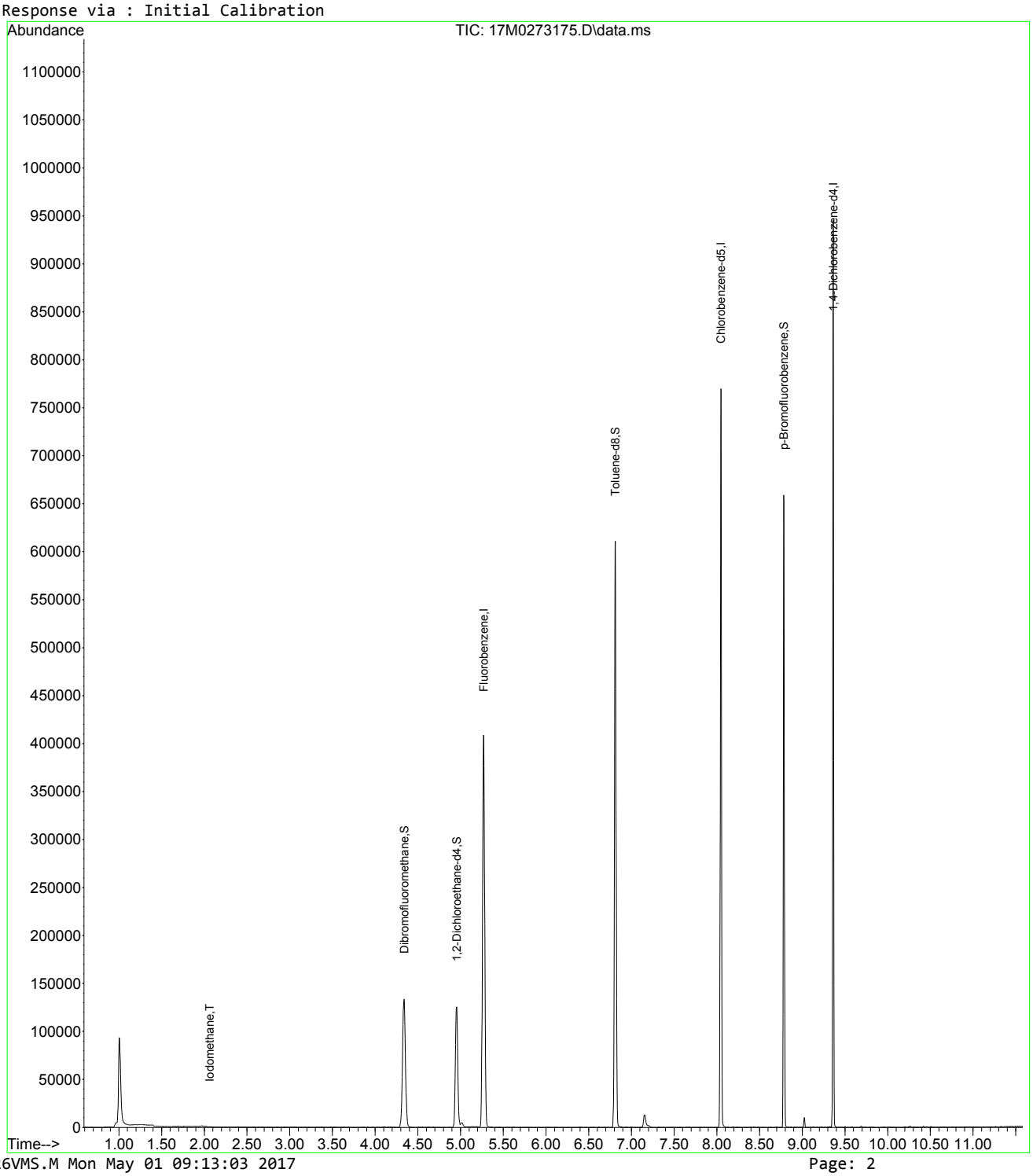
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.272	96	354974	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	260834	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	124070	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	95969	25.0334	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 100.134%			
34) 1,2-Dichloroethane-d4	4.953	65	92343	25.6983	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.793%			
47) Toluene-d8	6.812	98	329429	25.3070	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.228%			
66) p-Bromofluorobenzene	8.784	95	109140	26.2722	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.089%			
Target Compounds						Qvalue
13) Iodomethane	2.064	142	221	2.0413	ug/L #	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

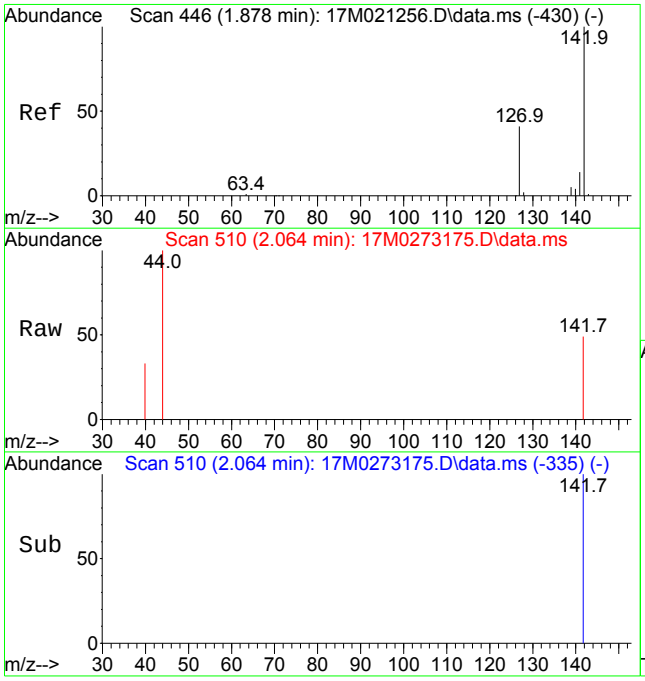
Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273175.D Vial: 3
Acq On : 30 Apr 2017 15:48 Operator: ADC
Sample : WG612142-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 01 09:13:02 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



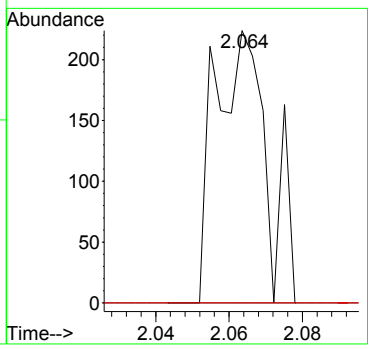
826VMS.M Mon May 01 09:13:03 2017 Page: 2



#13
Iodomethane
Concen: 2.0413 ug/L
RT: 2.064 min Scan# 510
Delta R.T. 0.006 min
Lab File: 17M0273175.D
Acq: 30 Apr 2017 15:48

Tgt Ion:142 Resp: 221

Ion	Ratio	Lower	Upper
142	100		
127	0.0	32.2	48.2#



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273205.D Vial: 3
Acq On : 01 May 2017 12:49 Operator: ADC
Sample : WG612250-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

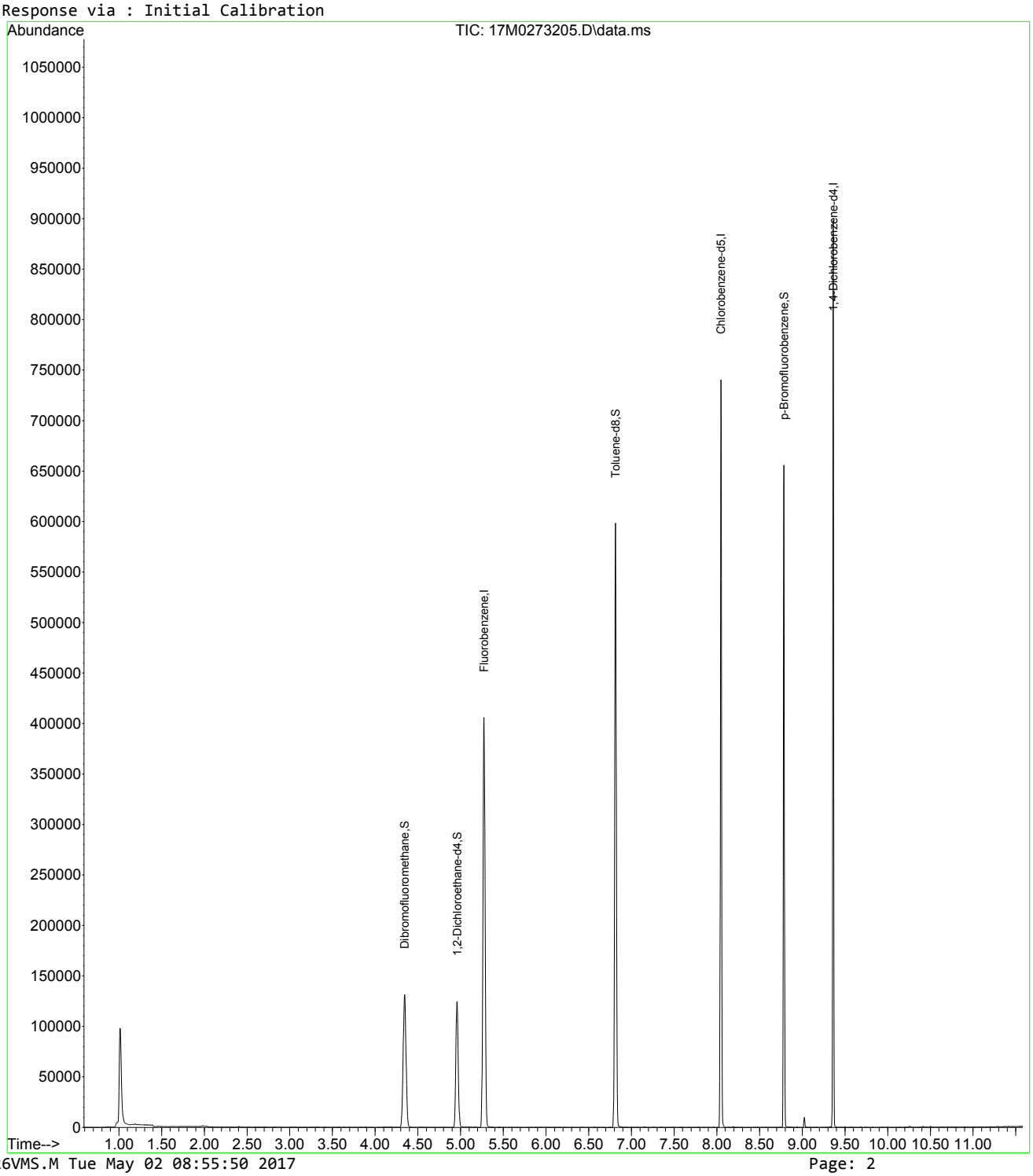
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	343255	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252656	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	119647	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	93704	25.2770	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.108%			
34) 1,2-Dichloroethane-d4	4.959	65	89932	25.8818	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.527%			
47) Toluene-d8	6.815	98	321845	25.5247	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 102.099%			
66) p-Bromofluorobenzene	8.786	95	106244	26.5205	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 106.082%			
Target Compounds						Qvalue

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273205.D Vial: 3
Acq On : 01 May 2017 12:49 Operator: ADC
Sample : WG612250-01 BLANK 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 02 08:55:49 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 02 08:55:50 2017 Page: 2

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273263.D Vial: 3
Acq On : 02 May 2017 19:34 Operator: ADC
Sample : WG612551-01 VBLK0502 BLANK STD 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:02:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

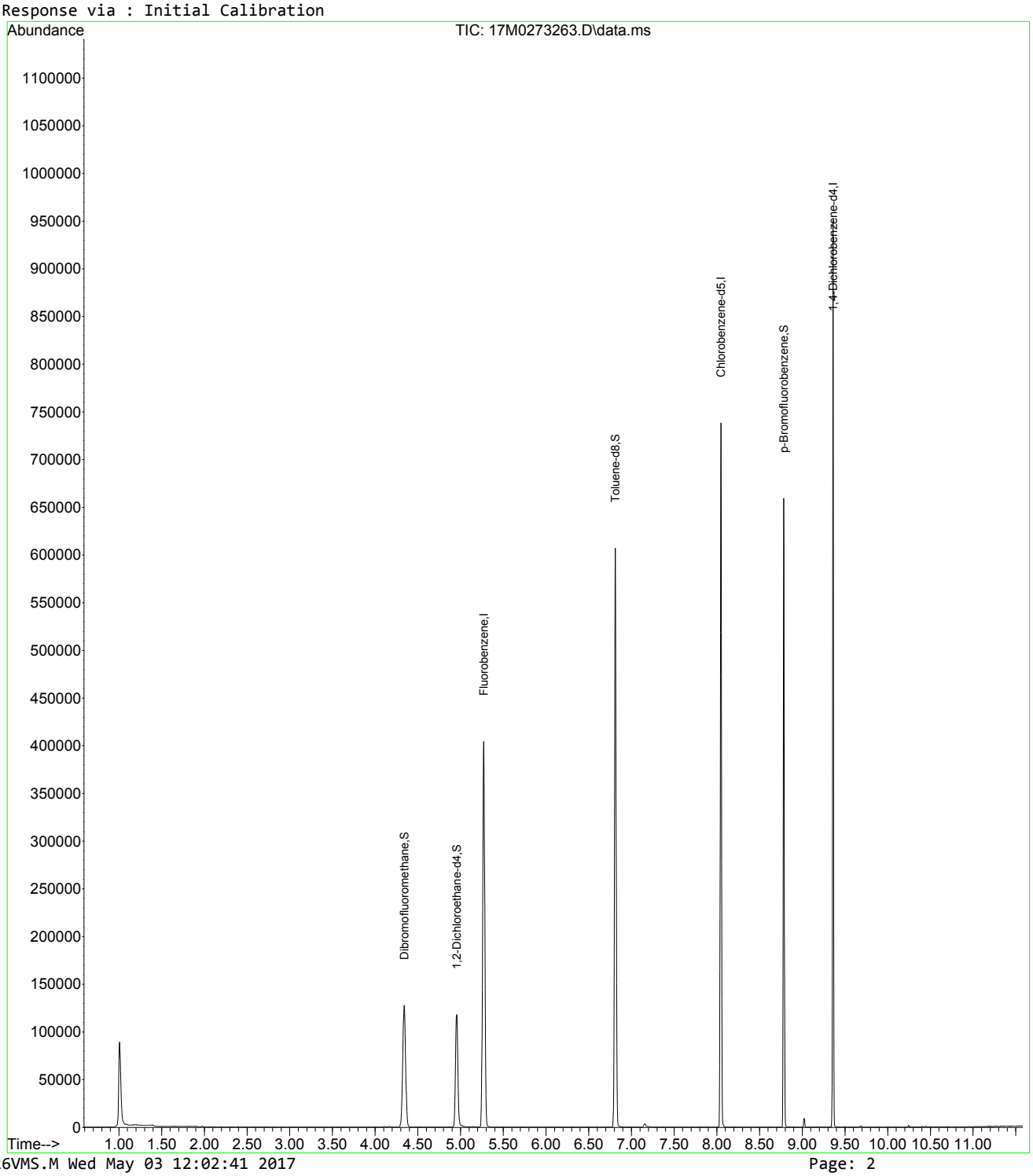
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	343909	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	252779	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.360	152	121175	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	90928	24.4815	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 97.926%			
34) 1,2-Dichloroethane-d4	4.953	65	86354	24.8048	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 99.219%			
47) Toluene-d8	6.812	98	319579	25.3326	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.330%			
66) p-Bromofluorobenzene	8.783	95	107073	26.3904	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 105.562%			
Target Compounds						Qvalue

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273263.D Vial: 3
Acq On : 02 May 2017 19:34 Operator: ADC
Sample : WG612551-01 VBLK0502 BLANK STD 8260 Inst : HPMS17
Misc : 1,1 Multiplr: 1.00
Integrator: RTE
Quant Time: May 03 12:02:40 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Wed May 03 12:02:41 2017 Page: 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146824.D Vial: 3
Acq On : 28 Apr 2017 20:38 Operator: JDS
Sample : WG612085-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 21:00:14 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

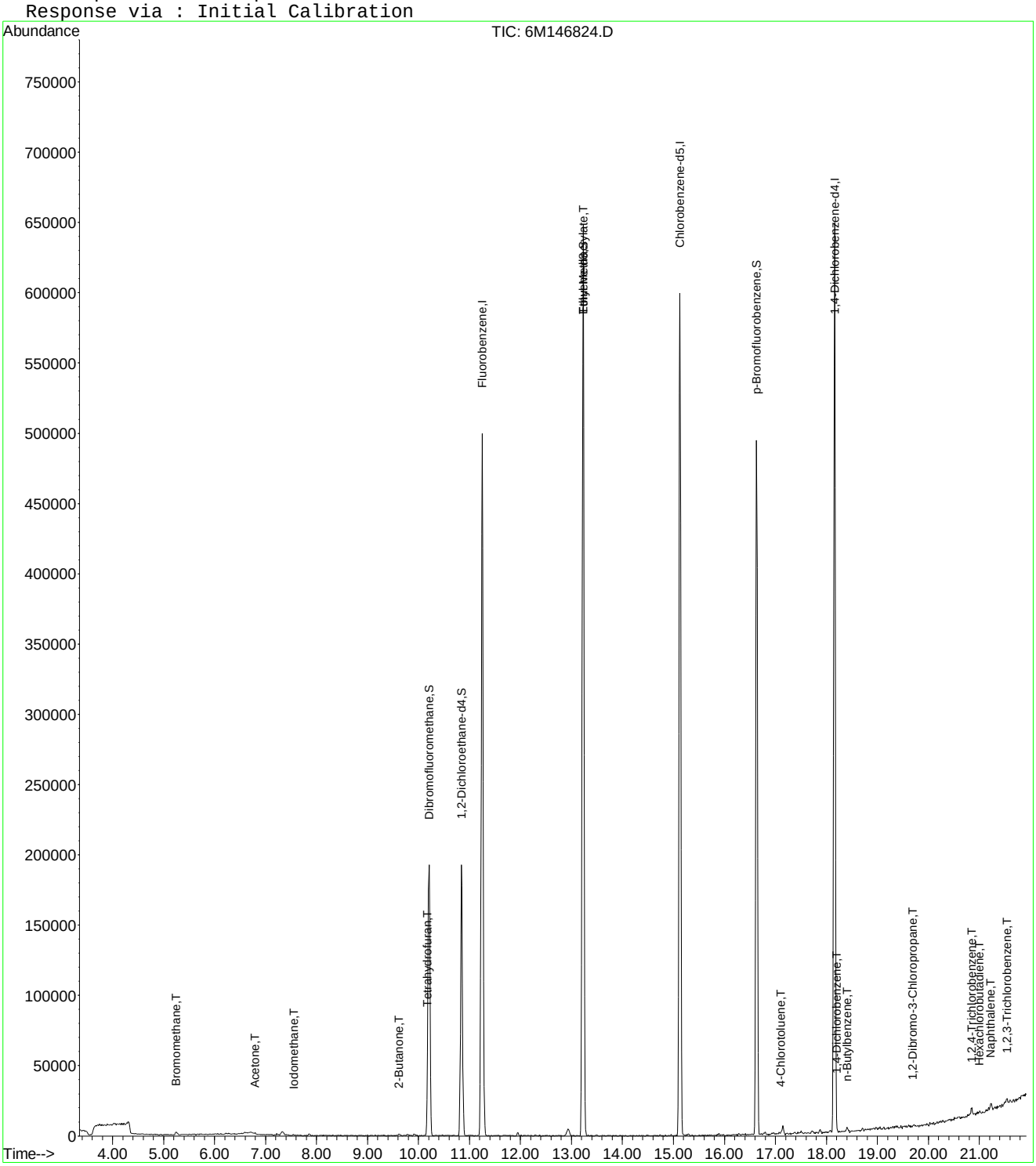
Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	11.25	96	637103	25.00 ug/L	0.00
57) Chlorobenzene-d5	15.13	117	443608	25.00 ug/L	0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	219610	25.00 ug/L	-0.01
System Monitoring Compounds					
37) Dibromofluoromethane	10.21	111	166742	25.6378 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.56%		
43) 1,2-Dichloroethane-d4	10.84	65	173820	27.1171 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 108.48%		
58) Toluene-d8	13.23	98	596004	26.3296 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.32%		
80) p-Bromofluorobenzene	16.63	95	229607	27.5279 ug/L	-0.01
Spiked Amount 25.000	Range 86 - 115		Recovery = 110.12%		
Target Compounds					Qvalue
3) Chloromethane	4.03	50	2616	Below Cal	81
6) Bromomethane	5.24	94	2257	0.4523 ug/L	98
13) Acetone	6.79	43	372	0.2706 ug/L #	48
17) Iodomethane	7.55	142	727	0.9108 ug/L #	32
29) 2-Butanone	9.61	43	2206	1.2731 ug/L #	57
36) Tetrahydrofuran	10.18	42	6446	5.6491 ug/L	82
60) Ethyl Methacrylate	13.23	69	1204	0.1794 ug/L	89
87) 4-Chlorotoluene	17.11	91	2714	0.1387 ug/L #	48
94) 1,4-Dichlorobenzene	18.20	146	1798	0.1260 ug/L #	1
95) n-Butylbenzene	18.41	91	4415	0.1978 ug/L #	48
97) 1,2-Dibromo-3-Chloropropan	19.69	75	185	0.1786 ug/L #	1
98) 1,2,4-Trichlorobenzene	20.85	180	3961	0.4094 ug/L #	58
99) Hexachlorobutadiene	21.00	225	1006	0.2722 ug/L #	58
100) Naphthalene	21.22	128	4618	0.2384 ug/L #	80
101) 1,2,3-Trichlorobenzene	21.54	180	4572	0.4895 ug/L #	40

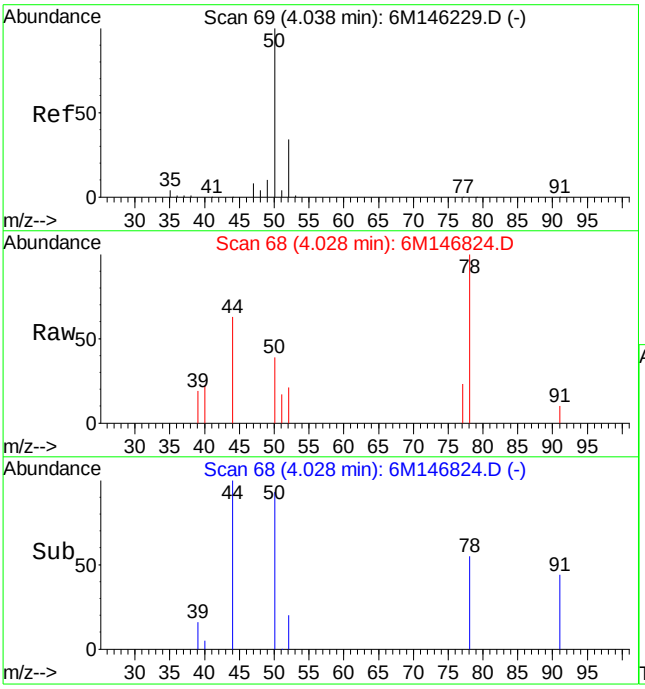
(#) = qualifier out of range (m) = manual integration
6M146824.D 8260BWT.M Sat Apr 29 12:17:11 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146824.D Vial: 3
Acq On : 28 Apr 2017 20:38 Operator: JDS
Sample : WG612085-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 21:00 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration

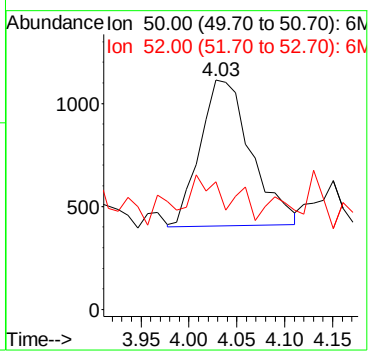


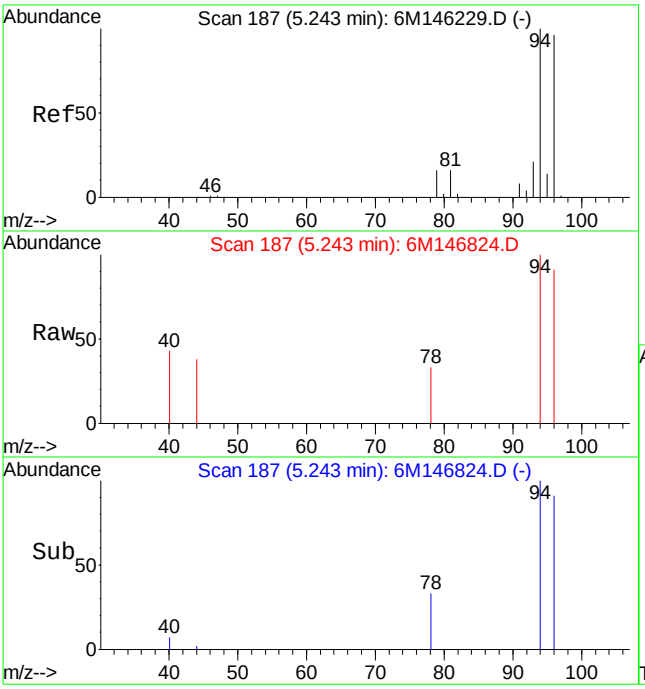


#3
Chloromethane
Concen: Below Cal
RT: 4.03 min Scan# 68
Delta R.T. 0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 50 Resp: 2616

Ion	Ratio	Lower	Upper
50	100		
52	22.1	19.8	46.2

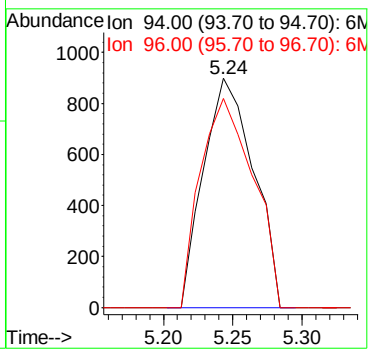


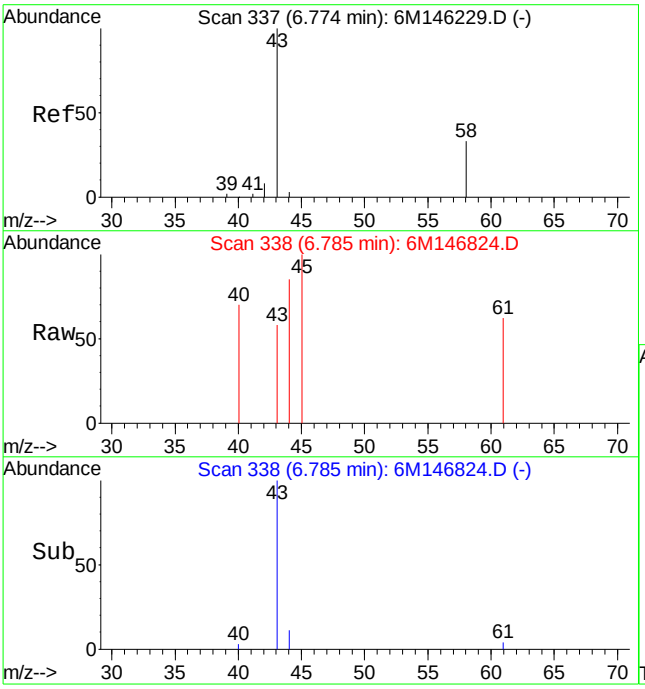


#6
Bromomethane
Concen: 0.45 ug/L
RT: 5.24 min Scan# 187
Delta R.T. 0.03 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 94 Resp: 2257

Ion	Ratio	Lower	Upper
94	100		
96	96.4	56.7	132.3

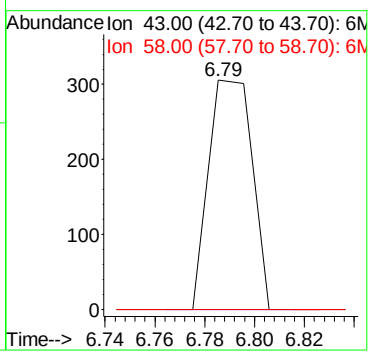


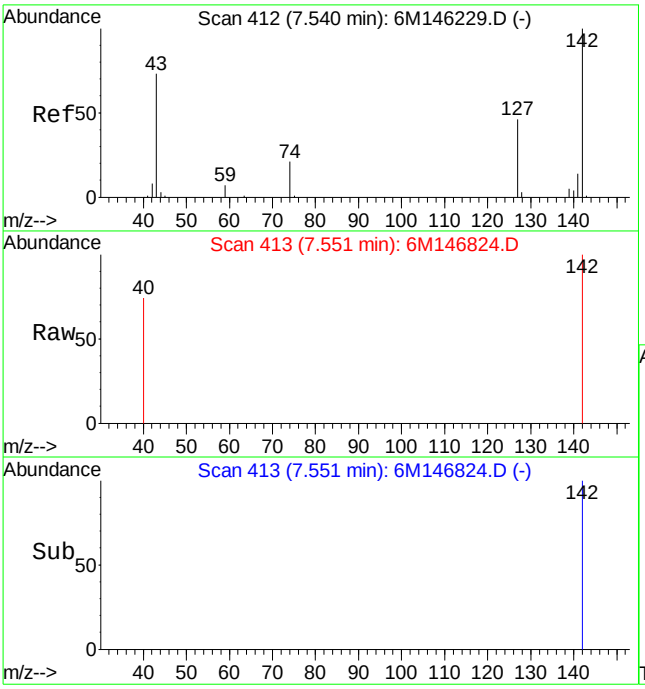


#13
Acetone
Concen: 0.27 ug/L
RT: 6.79 min Scan# 338
Delta R.T. 0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 43 Resp: 372

Ion	Ratio	Lower	Upper
43	100		
58	0.0	16.4	38.2#

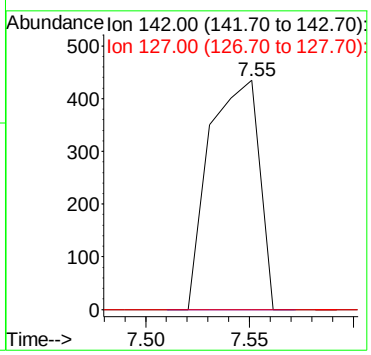


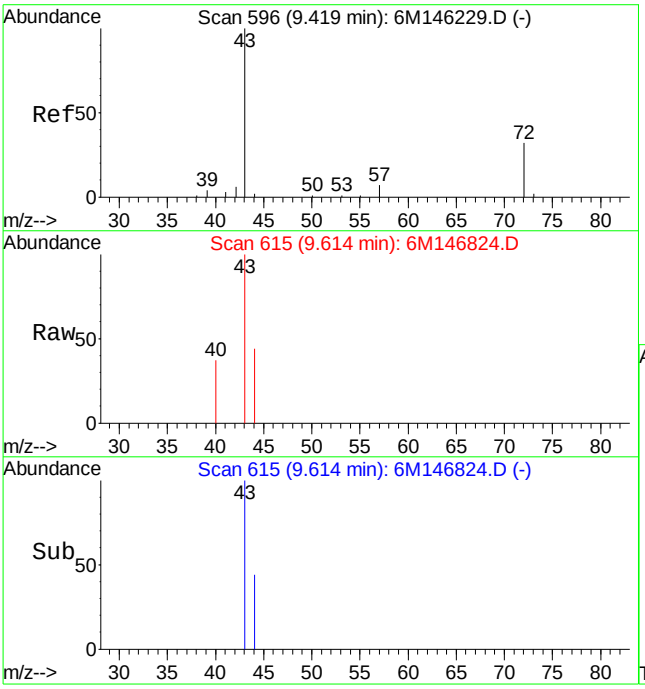


#17
Iodomethane
Concen: 0.91 ug/L
RT: 7.55 min Scan# 413
Delta R.T. 0.02 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:142 Resp: 727

Ion	Ratio	Lower	Upper
142	100		
127	0.0	26.4	61.6#

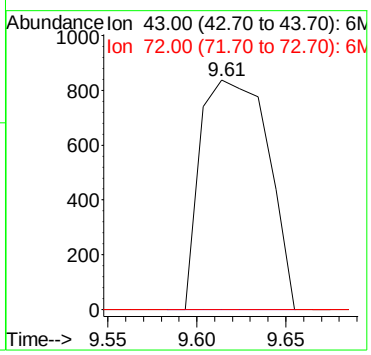


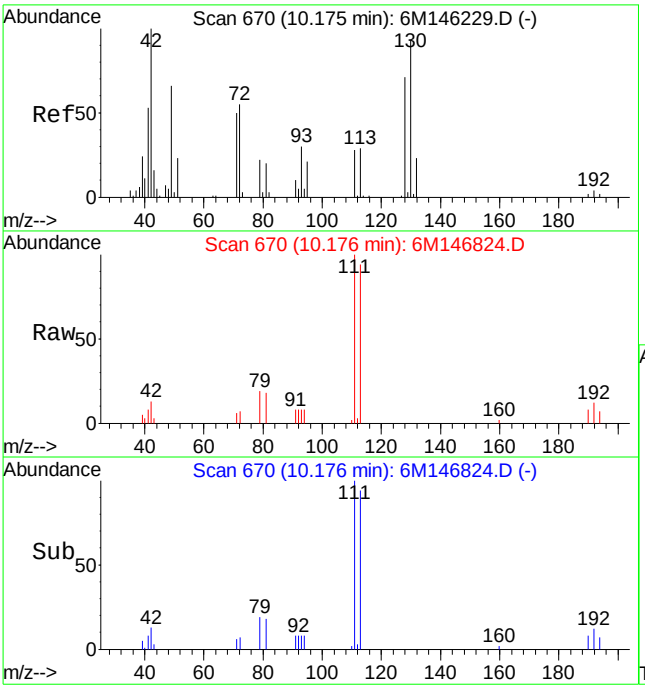


#29
2-Butanone
Concen: 1.27 ug/L
RT: 9.61 min Scan# 615
Delta R.T. 0.20 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 43 Resp: 2206

Ion	Ratio	Lower	Upper
43	100		
72	0.0	11.9	27.9#

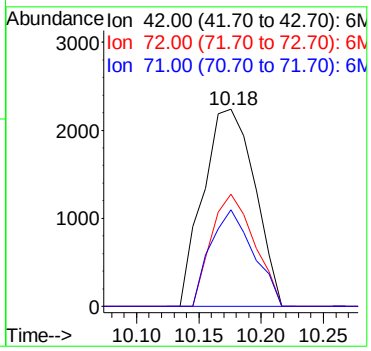


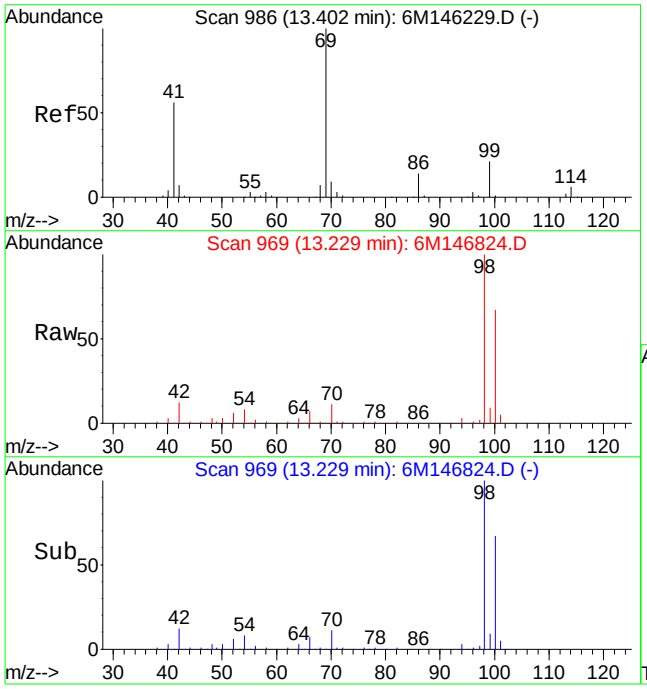


#36
Tetrahydrofuran
Concen: 5.65 ug/L
RT: 10.18 min Scan# 670
Delta R.T. -0.00 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 42 Resp: 6446

Ion	Ratio	Lower	Upper
42	100		
72	47.5	20.8	48.4
71	40.9	19.9	46.5

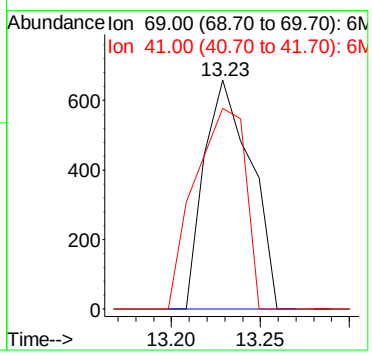


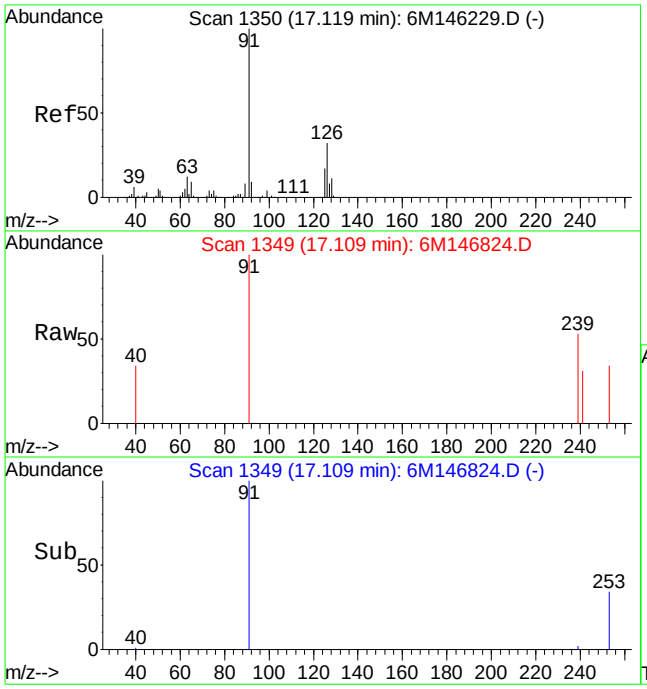


#60
Ethyl Methacrylate
Concen: 0.18 ug/L
RT: 13.23 min Scan# 969
Delta R.T. -0.17 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 69 Resp: 1204

Ion	Ratio	Lower	Upper
69	100		
41	95.5	51.4	120.0

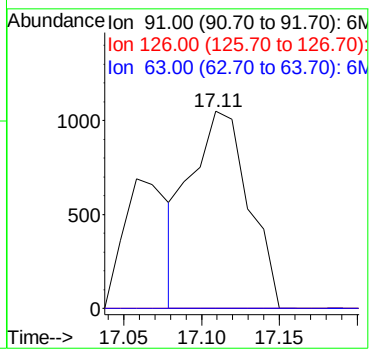


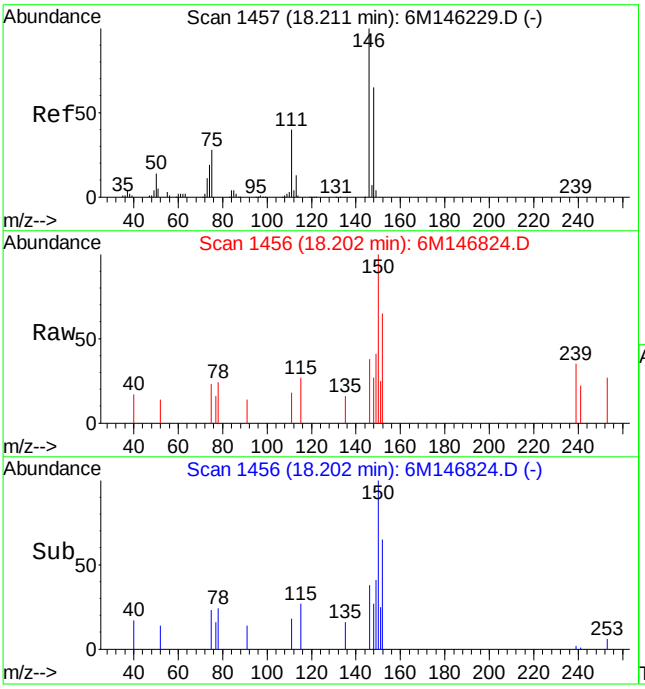


#87
4-Chlorotoluene
Concen: 0.14 ug/L
RT: 17.11 min Scan# 1349
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 91 Resp: 2714

Ion	Ratio	Lower	Upper
91	100		
126	0.0	20.2	47.0#
63	0.0	8.5	19.7#

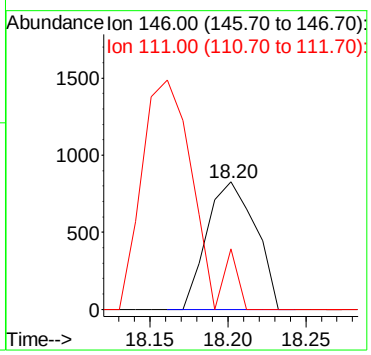


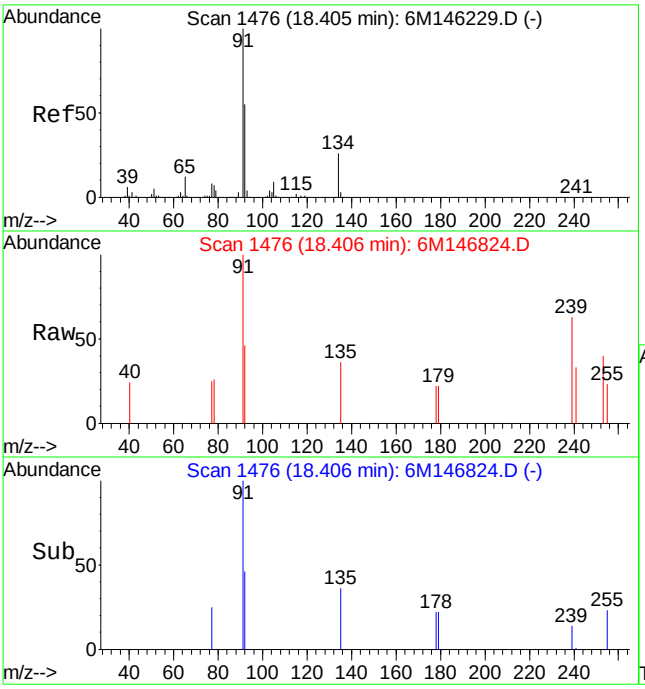


#94
1,4-Dichlorobenzene
Concen: 0.13 ug/L
RT: 18.20 min Scan# 1456
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:146 Resp: 1798

Ion	Ratio	Lower	Upper
146	100		
111	193.0	23.5	54.9#

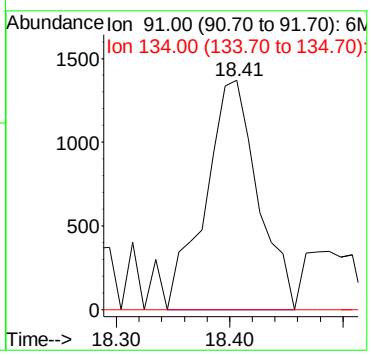


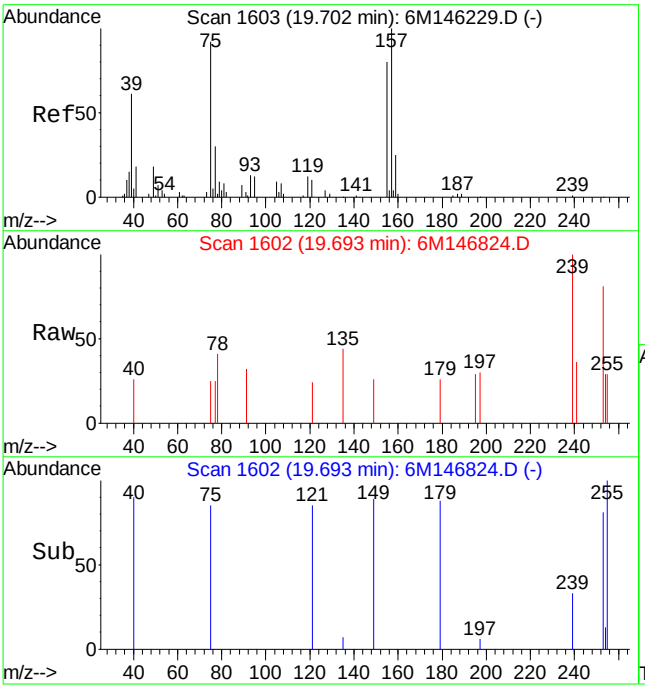


#95
n-Butylbenzene
Concen: 0.20 ug/L
RT: 18.41 min Scan# 1476
Delta R.T. -0.00 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 91 Resp: 4415

Ion	Ratio	Lower	Upper
91	100		
134	0.0	16.1	37.5#

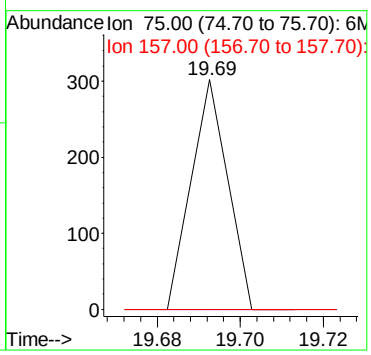


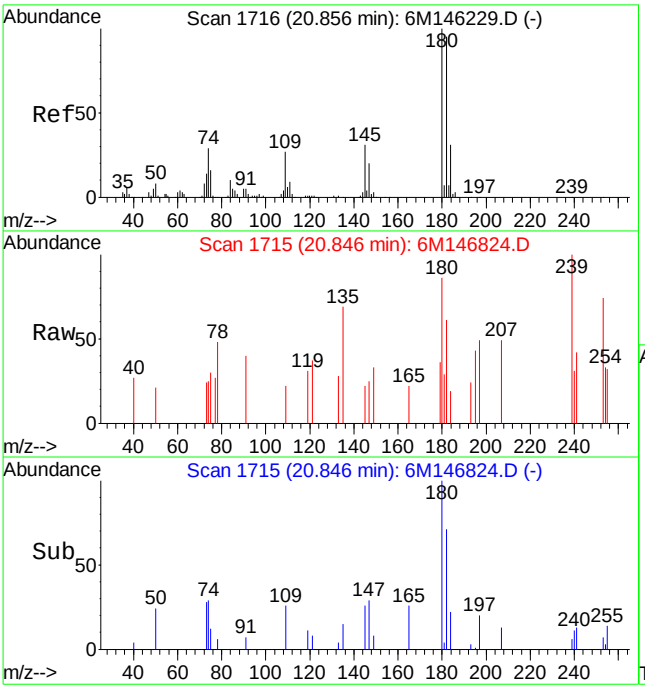


#97
1,2-Dibromo-3-Chloropropane
Concen: 0.18 ug/L
RT: 19.69 min Scan# 1602
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 75 Resp: 185

Ion	Ratio	Lower	Upper
75	100		
157	0.0	66.9	156.1#

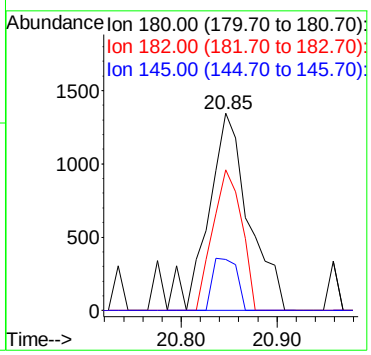


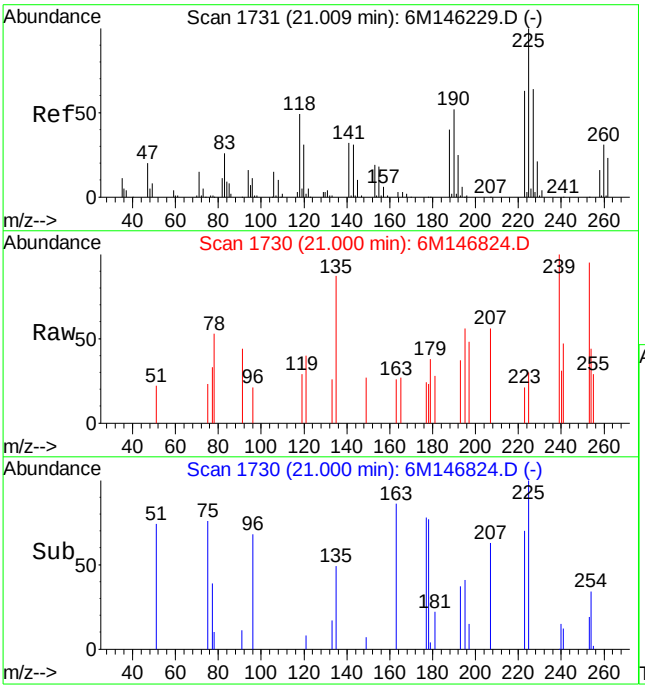


#98
1,2,4-Trichlorobenzene
Concen: 0.41 ug/L
RT: 20.85 min Scan# 1715
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:180 Resp: 3961

Ion	Ratio	Lower	Upper
180	100		
182	50.5	57.7	134.5#
145	15.8	19.0	44.4#

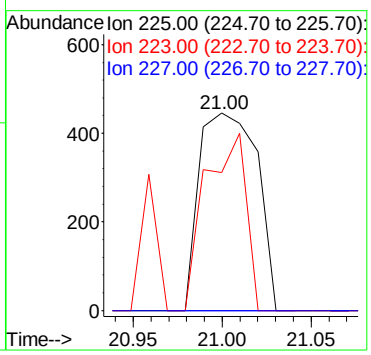


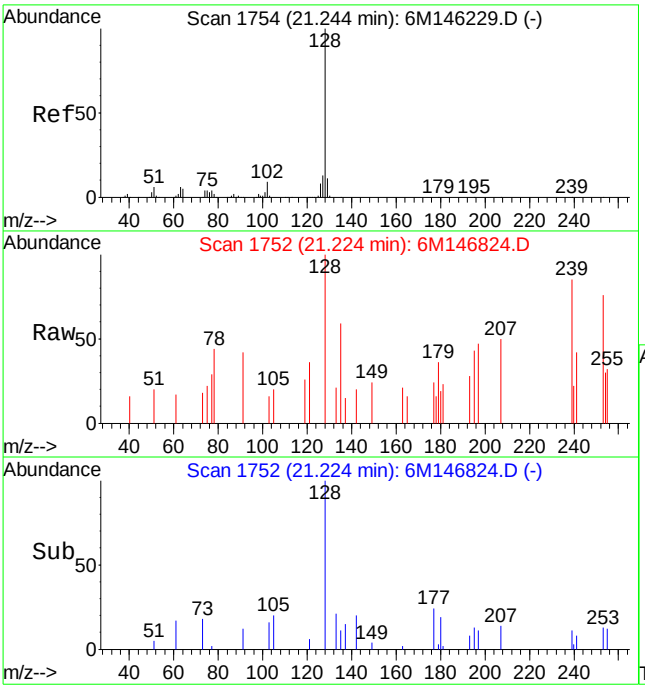


#99
Hexachlorobutadiene
Concen: 0.27 ug/L
RT: 21.00 min Scan# 1730
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:225 Resp: 1006

Ion	Ratio	Lower	Upper
225	100		
223	62.7	37.7	88.1
227	0.0	38.6	90.0#

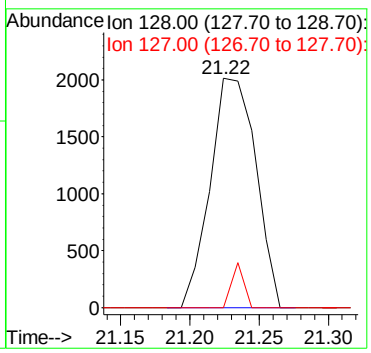


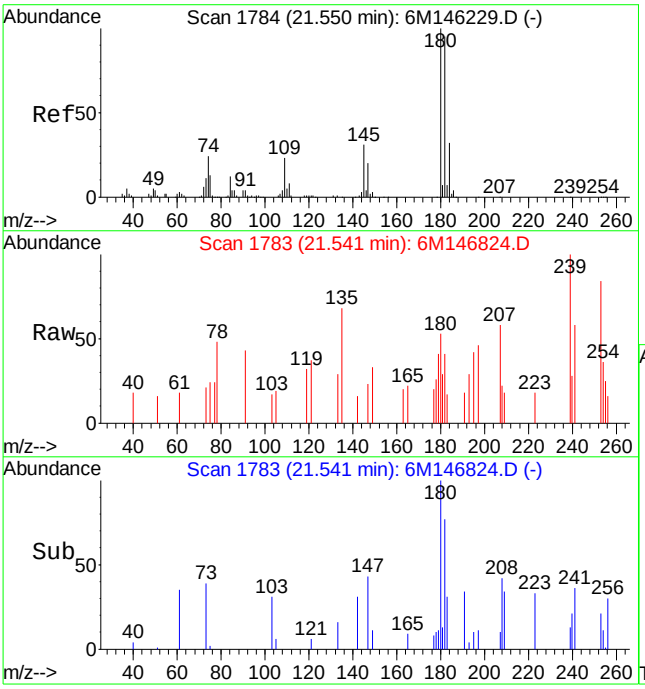


#100
Naphthalene
Concen: 0.24 ug/L
RT: 21.22 min Scan# 1752
Delta R.T. -0.02 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:128 Resp: 4618

Ion	Ratio	Lower	Upper
128	100		
127	5.2	7.8	18.2#

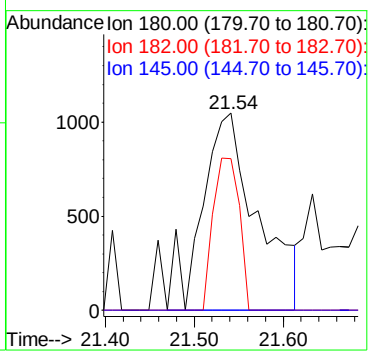




#101
1,2,3-Trichlorobenzene
Concen: 0.49 ug/L
RT: 21.54 min Scan# 1783
Delta R.T. -0.00 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion:180 Resp: 4572

Ion	Ratio	Lower	Upper
180	100		
182	36.0	57.2	133.4#
145	0.0	19.6	45.6#



Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146824.D Vial: 3
Acq On : 28 Apr 2017 20:38 Operator: JDS
Sample : WG612085-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 18:21:36 2017 Quant Results File: A9FOOWT.RES

Quant Method : K:\ORGANICS\V...\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	11.25	96	637103	25.00	ug/L	-0.02
11) Chlorobenzene-d5	15.13	117	443608	25.00	ug/L	-0.02
12) 1,4-Dichlorobenzene-d4	18.16	152	219610	25.00	ug/L	-0.02

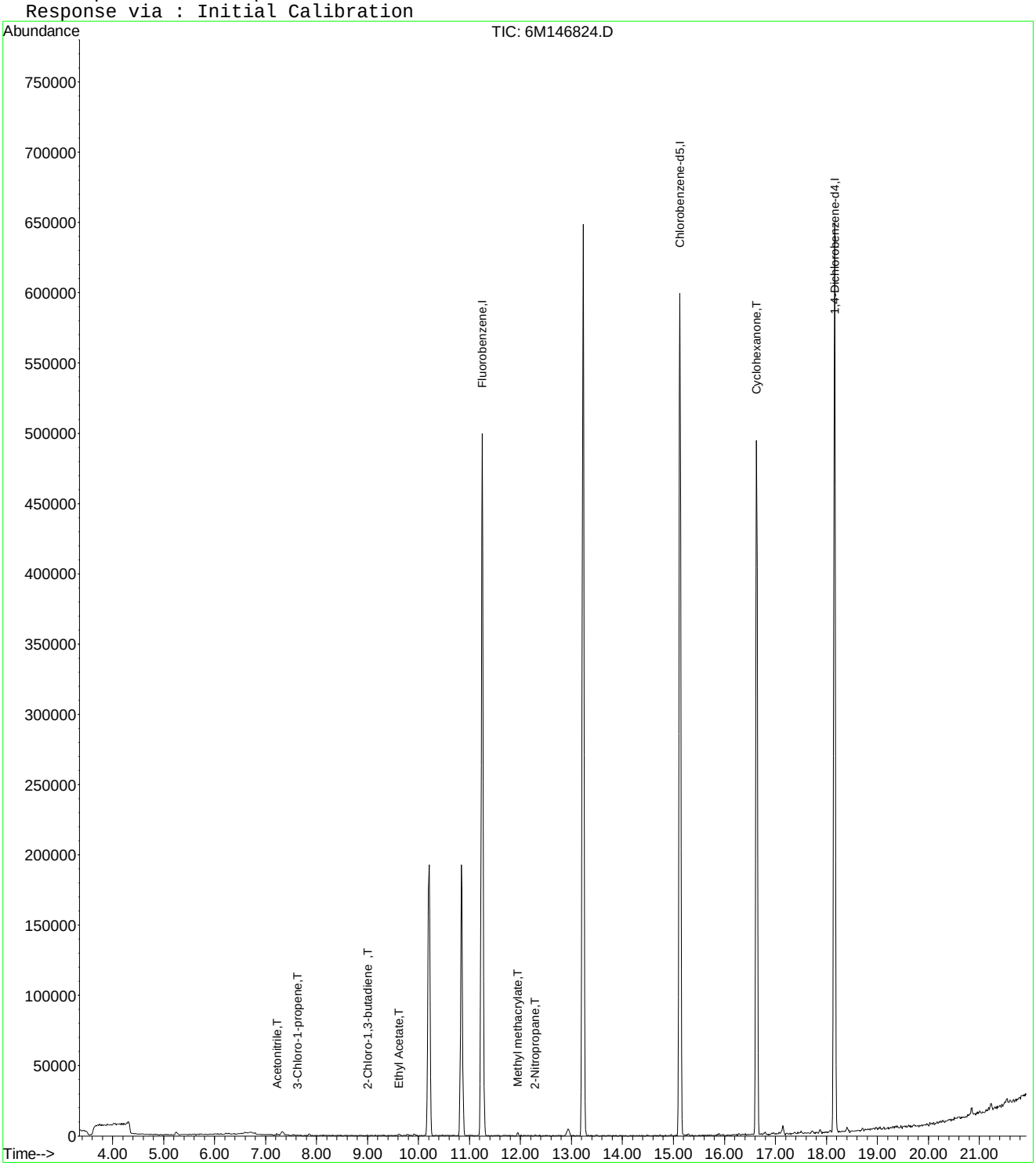
Target Compounds						Qvalue
2) Acetonitrile	7.22	41	732	1.6071	ug/L	# 1
3) 3-Chloro-1-propene	7.62	41	192	0.0251	ug/L	# 69
4) 2-Chloro-1,3-butadiene	9.00	53	371	0.0394	ug/L	# 23
5) Ethyl Acetate	9.61	43	2207	0.5401	ug/L	# 68
9) Methyl methacrylate	11.94	41	1488	0.3328	ug/L	88
10) 2-Nitropropane	12.28	43	459	0.2525	ug/L	# 53
13) Cyclohexanone	16.63	55	213	2.5634	ug/L	# 25

(#) = qualifier out of range (m) = manual integration
6M146824.D A9FOOWT.M Sat Apr 29 18:21:37 2017 Page 1

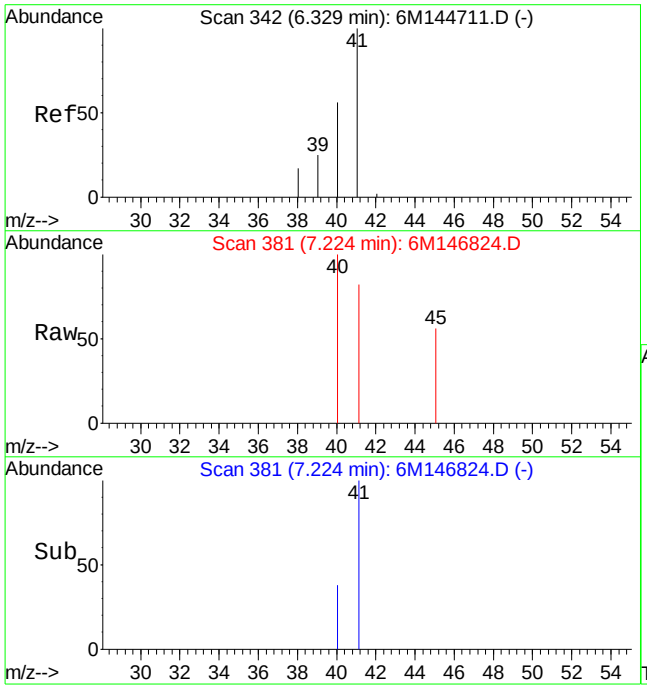
Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146824.D Vial: 3
Acq On : 28 Apr 2017 20:38 Operator: JDS
Sample : WG612085-01 BLANK STD 8260 Inst : Hpms6
Misc : 1,1 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 18:21 2017 Quant Results File: A9FOOWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\A9FOOWT.M (RTE Integrator)
Title : A9-FOO Water - IC: 011217 - HPMS6
Last Update : Wed Apr 05 08:56:10 2017
Response via : Initial Calibration



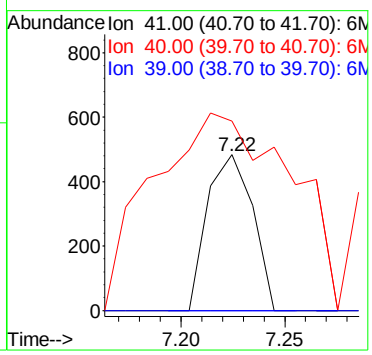
6M146824.D A9FOOWT.M Sat Apr 29 18:21:37 2017 Page 2

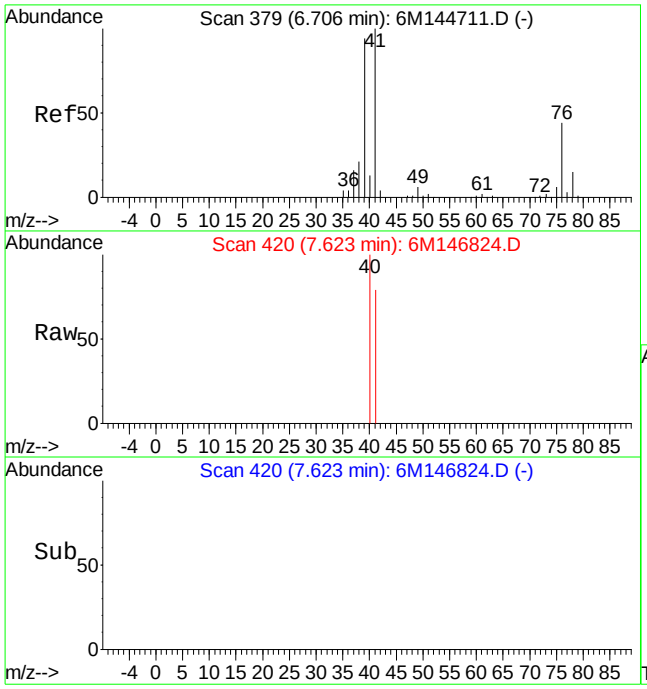


#2
Acetonitrile
Concen: 1.61 ug/L
RT: 7.22 min Scan# 381
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 41 Resp: 732

Ion	Ratio	Lower	Upper
41	100		
40	418.0	19.8	99.8#
39	0.0	0.0	57.7

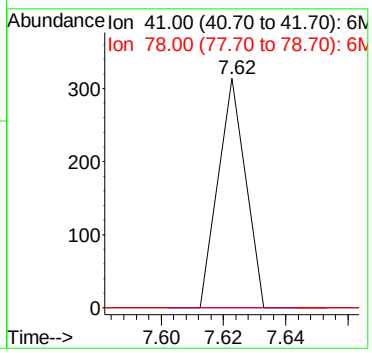


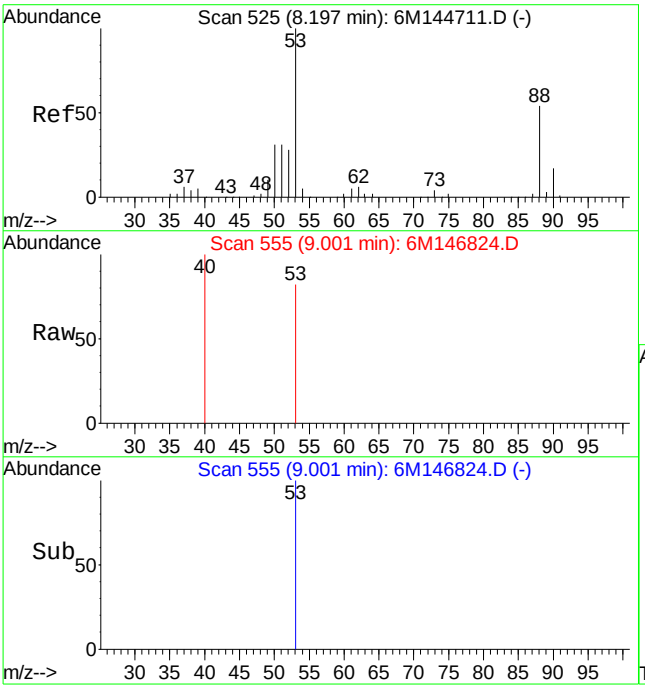


#3
3-Chloro-1-propene
Concen: 0.03 ug/L
RT: 7.62 min Scan# 420
Delta R.T. 0.00 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 41 Resp: 192

Ion	Ratio	Lower	Upper
41	100		
78	0.0	0.0	52.0

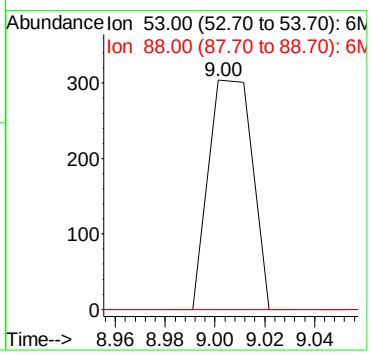


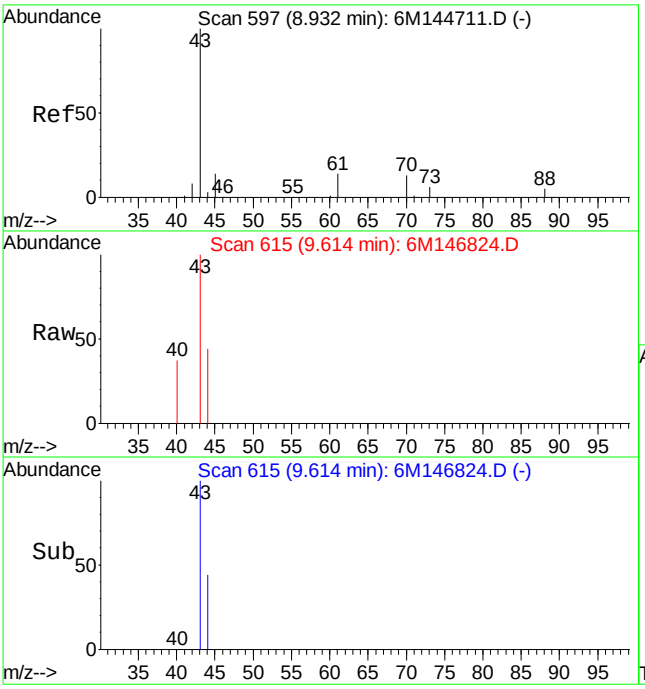


#4
2-Chloro-1,3-butadiene
Concen: 0.04 ug/L
RT: 9.00 min Scan# 555
Delta R.T. -0.01 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 53 Resp: 371

Ion	Ratio	Lower	Upper
53	100		
88	0.0	16.1	96.1#

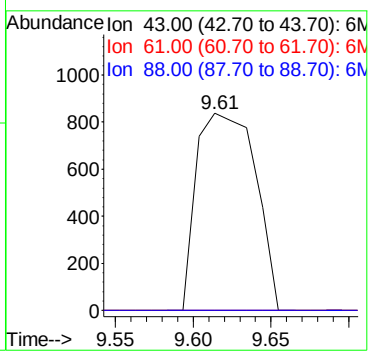


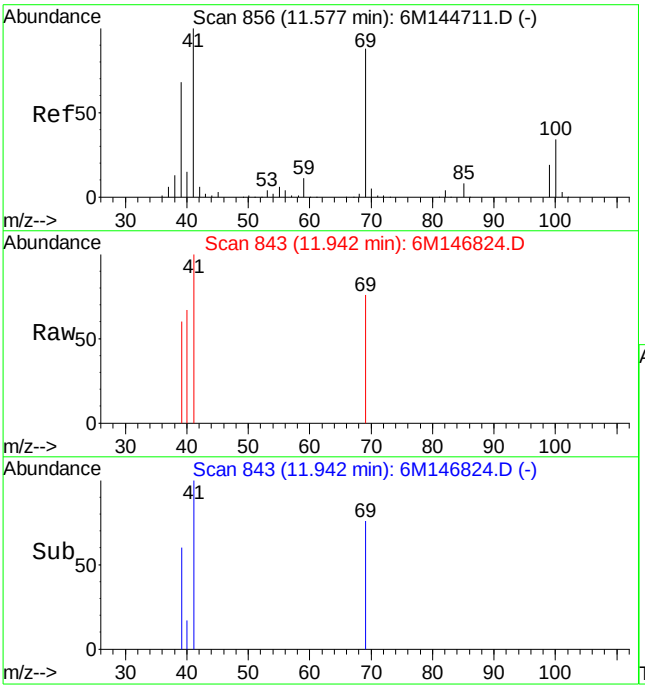


#5
Ethyl Acetate
Concen: 0.54 ug/L
RT: 9.61 min Scan# 615
Delta R.T. -0.02 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 43 Resp: 2207

Ion	Ratio	Lower	Upper
43	100		
61	0.0	9.5	22.1#
88	0.0	2.8	6.4#

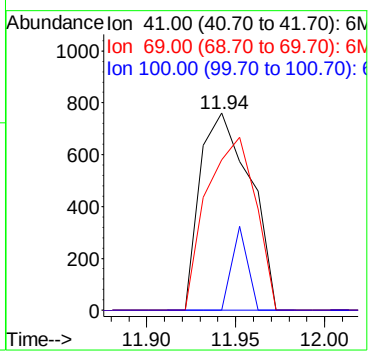


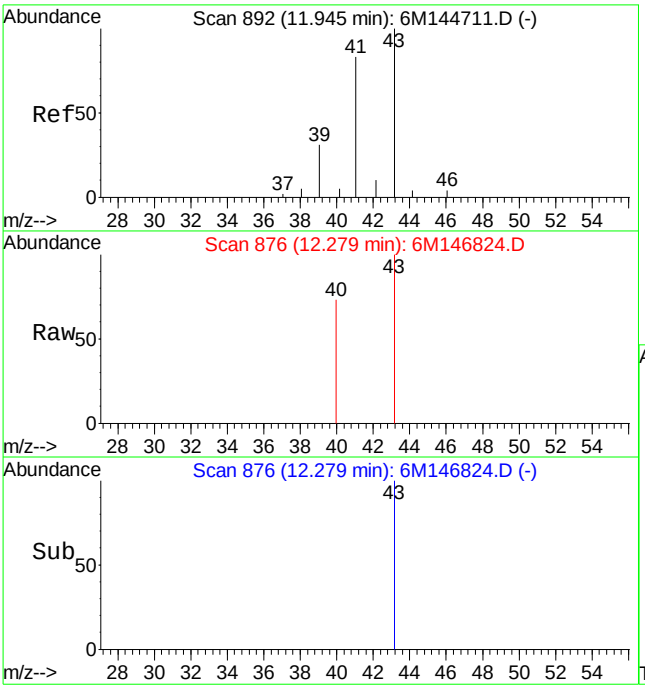


#9
Methyl methacrylate
Concen: 0.33 ug/L
RT: 11.94 min Scan# 843
Delta R.T. -0.02 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 41 Resp: 1488

Ion	Ratio	Lower	Upper
41	100		
69	85.4	42.7	122.7
100	13.4	0.0	73.7

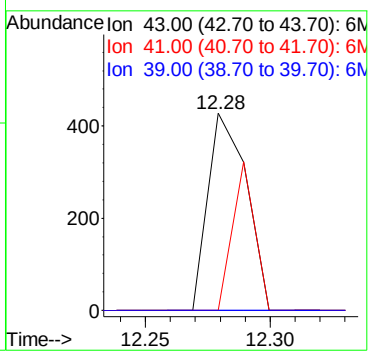


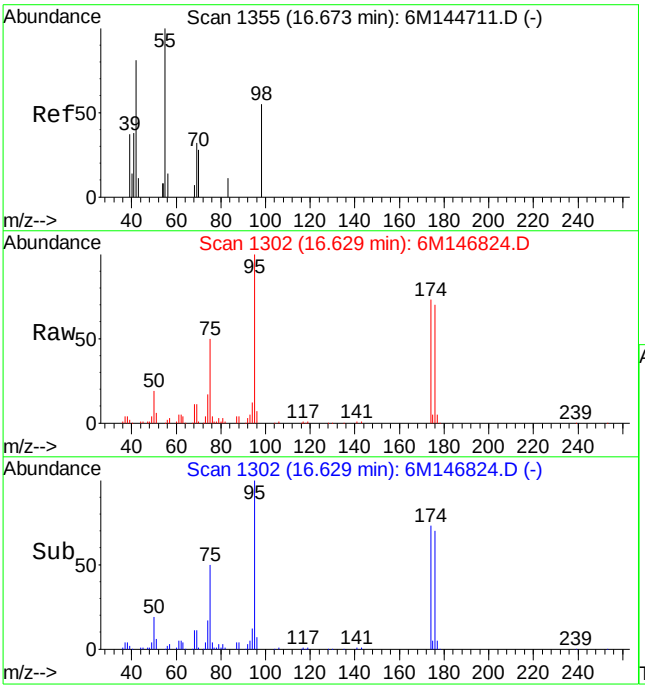


#10
2-Nitropropane
Concen: 0.25 ug/L
RT: 12.28 min Scan# 876
Delta R.T. -0.02 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 43 Resp: 459

Ion	Ratio	Lower	Upper
43	100		
41	43.1	50.0	116.8#
39	0.0	16.6	38.8#

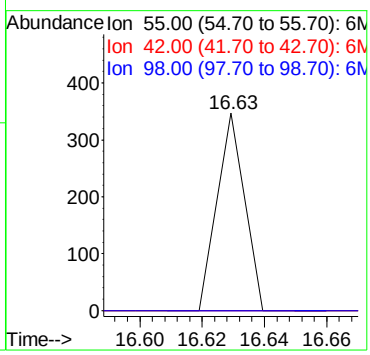




#13
Cyclohexanone
Concen: 2.56 ug/L
RT: 16.63 min Scan# 1302
Delta R.T. 0.22 min
Lab File: 6M146824.D
Acq: 28 Apr 2017 20:38

Tgt Ion: 55 Resp: 213

Ion	Ratio	Lower	Upper
55	100		
42	0.0	37.1	86.7#
98	0.0	25.3	58.9#



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc Units	Dev(Min)
1) Fluorobenzene	10.52	96	355789	25.00 ug/L	-0.01
56) Chlorobenzene-d5	14.14	117	255038	25.00 ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	143146	25.00 ug/L	0.00
System Monitoring Compounds					
37) Dibromofluoromethane	9.53	111	90834	25.7746 ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.08%		
43) 1,2-Dichloroethane-d4	10.14	65	106893	26.1371 ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 104.56%		
57) Toluene-d8	12.38	98	348435	26.3114 ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 105.24%		
78) p-Bromofluorobenzene	15.54	95	129219	25.9717 ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 103.88%		
Target Compounds					Qvalue
2) Dichlorodifluoromethane	3.21	85	100258	23.0850 ug/L	99
3) Chloromethane	3.66	50	78100	17.8015 ug/L	98
4) Vinyl Chloride	3.88	62	63200	20.6967 ug/L	98
5) 1,3-Butadiene	3.93	54	43411	24.4089 ug/L	98
6) Bromomethane	4.77	94	63617	20.1768 ug/L	98
7) Chloroethane	4.92	64	69051	21.8300 ug/L	99
8) Trichlorofluoromethane	5.41	101	112298	21.0500 ug/L	99
9) Diethyl ether	5.92	59	377474	95.6135 ug/L	97
10) Isoprene	5.96	67	102959	18.6289 ug/L	99
11) Acrolein	6.15	56	71039	113.1283 ug/L	95
12) 1,1,2-Trichloro-1,2,2-Trif	6.15	101	67912	21.4951 ug/L	97
13) Acetone	6.26	43	22499	18.9128 ug/L	94
14) 1,1-Dichloroethene	6.47	61	124824	19.6451 ug/L	98
15) Tert-Butyl Alcohol	6.58	59	81266	182.6393 ug/L	98
16) Dimethyl Sulfide	6.72	62	96108	19.2540 ug/L	98
17) Iodomethane	6.97	142	63409	15.4016 ug/L	100
18) Methyl acetate	6.98	43	72369	19.2881 ug/L	97
19) Methylene Chloride	7.23	84	79132	18.6657 ug/L	92
20) Carbon Disulfide	7.27	76	153765	14.1536 ug/L	99
21) Acrylonitrile	7.40	53	33040	18.8045 ug/L	97
22) Methyl Tert Butyl Ether	7.43	73	201513	18.9814 ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	72002	18.6214 ug/L	93
24) n-Hexane	7.73	57	102629	17.1134 ug/L	98
25) Diisopropyl ether	8.06	45	1612128	104.2742 ug/L	98
26) Vinyl Acetate	8.23	43	119078	16.4998 ug/L	99
27) 1,1-Dichloroethane	8.26	63	159412	19.5601 ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1306151	95.5784 ug/L	97
29) 2-Butanone	8.79	43	37585	19.3356 ug/L	97
30) Propionitrile	8.89	54	63554	98.0072 ug/L	100
31) 2,2-Dichloropropane	9.01	77	93890	17.0197 ug/L	99
32) cis-1,2-Dichloroethene	9.06	96	84785	19.5405 ug/L	99
33) Chloroform	9.26	83	133714	20.5529 ug/L	100
34) 1-Bromopropane	9.39	122	20024	23.2944 ug/L	96
35) Bromochloromethane	9.48	130	51233	19.2576 ug/L	93
36) Tetrahydrofuran	9.50	42	145624	91.9749 ug/L	97
38) 1,1,1-Trichloroethane	9.76	97	118385	20.6005 ug/L	99
39) Cyclohexane	9.79	56	138998	17.2016 ug/L	98
40) 1,1-Dichloropropene	9.95	75	97992	19.4560 ug/L	99
41) Carbon Tetrachloride	10.09	117	101391	20.3989 ug/L	98
42) Tert-Amyl-Methyl ether	10.04	73	1071343	97.1807 ug/L	100

(#) = qualifier out of range (m) = manual integration
11M17872.D 8260WT.M Sat Apr 29 20:46:31 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46:30 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

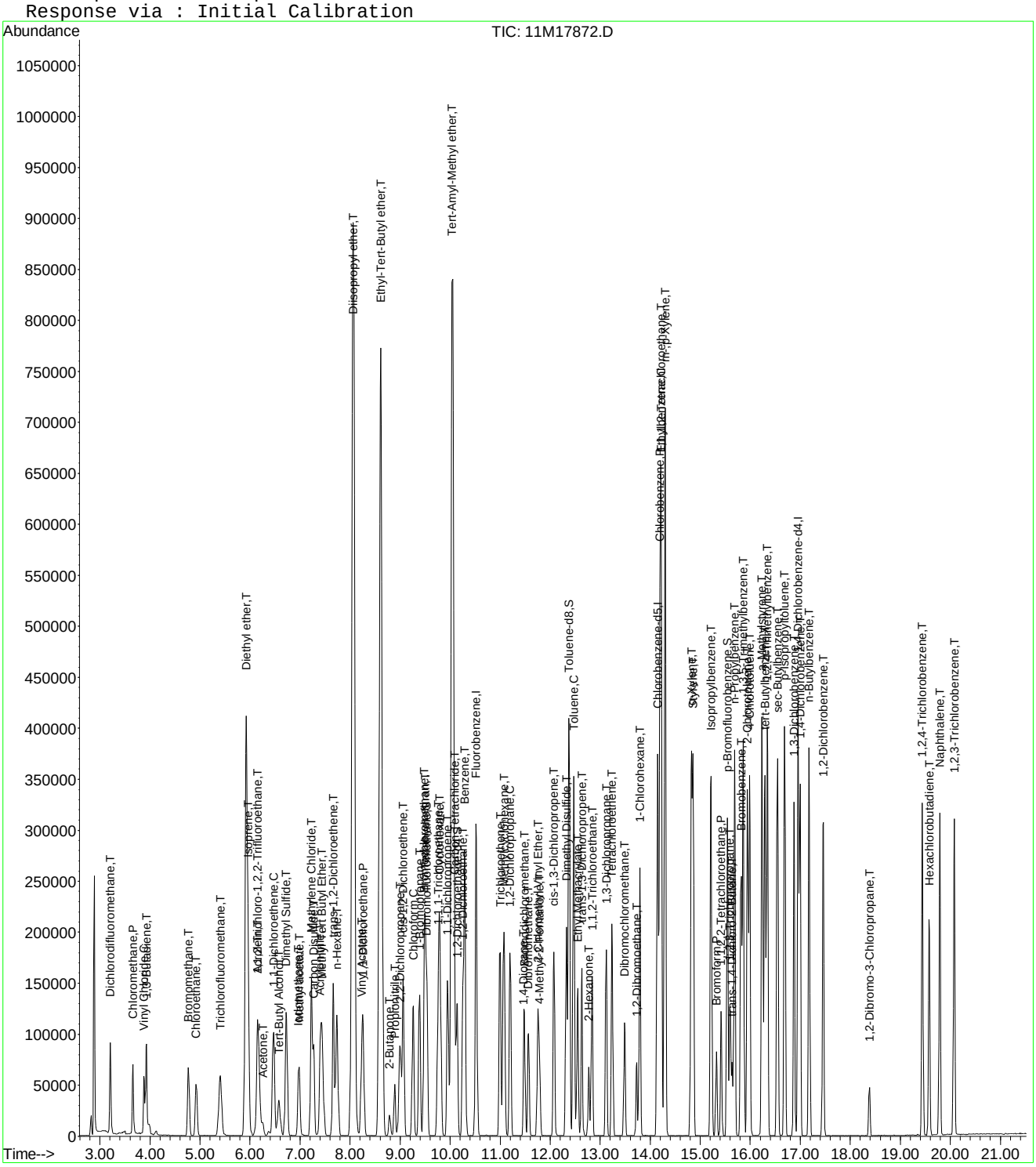
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	110027	19.7833	ug/L	99
45)	Benzene	10.29	78	304649	19.5247	ug/L	97
46)	Trichloroethene	11.00	130	77816	19.0262	ug/L	98
47)	Methylcyclohexane	11.07	83	114907	18.3248	ug/L	97
48)	1,2-Dichloropropane	11.20	63	94758	19.5129	ug/L	100
49)	1,4-Dioxane	11.47	88	7714	175.9051	ug/L	96
50)	Bromodichloromethane	11.49	83	97671	19.2781	ug/L	99
51)	Dibromomethane	11.56	93	45746	19.9141	ug/L	96
52)	2-Chloroethyl Vinyl Ether	11.76	63	55752	21.0135	ug/L	96
53)	4-Methyl-2-Pentanone	11.79	58	31638	18.5184	ug/L	97
54)	cis-1,3-Dichloropropene	12.08	75	123539	20.5516	ug/L	98
55)	Dimethyl Disulfide	12.32	79	69298	18.4701	ug/L	93
58)	Toluene	12.47	91	317224	19.2114	ug/L	97
59)	Ethyl Methacrylate	12.55	69	94980	20.9288	ug/L	96
60)	trans-1,3-Dichloropropene	12.64	75	102510	19.6665	ug/L	98
61)	1,1,2-Trichloroethane	12.84	97	65002	18.6614	ug/L	98
62)	2-Hexanone	12.77	43	61444	21.2326	ug/L	96
63)	1,3-Dichloropropane	13.12	76	118460	20.4765	ug/L	97
64)	Tetrachloroethene	13.23	164	66863	20.3990	ug/L	100
65)	Dibromochloromethane	13.48	129	75136	19.3483	ug/L	99
66)	1,2-Dibromoethane	13.73	107	60134	19.2043	ug/L	100
67)	1-Chlorohexane	13.79	91	97291	20.6755	ug/L	96
68)	Chlorobenzene	14.20	112	204338	19.4596	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	73648	18.8386	ug/L	99
70)	Ethylbenzene	14.22	106	111484	20.0768	ug/L	85
71)	m-,p-Xylene	14.30	106	269991	40.6358	ug/L	89
72)	o-Xylene	14.83	106	133005	19.8675	ug/L	92
73)	Styrene	14.86	104	220340	22.2062	ug/L	98
74)	Bromoform	15.32	173	50521	18.1558	ug/L	98
75)	Isopropylbenzene	15.22	105	327159	20.0320	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	81150	18.0327	ug/L	100
79)	1,2,3-Trichloropropane	15.59	110	25379	19.6953	ug/L	91
80)	trans-1,4-Dichloro-2-Buten	15.63	53	21952	15.7554	ug/L	92
81)	n-Propylbenzene	15.69	91	392754	19.5761	ug/L	96
82)	Bromobenzene	15.82	156	95355	19.5298	ug/L	99
83)	1,3,5-Trimethylbenzene	15.86	105	281777	20.5292	ug/L	96
84)	2-Chlorotoluene	15.94	91	251647	18.4739	ug/L	86
85)	4-Chlorotoluene	15.99	91	242577	19.7304	ug/L	90
86)	a-Methylstyrene	16.23	118	160476	21.2133	ug/L	98
87)	tert-Butylbenzene	16.30	134	64162	19.2269	ug/L	96
88)	1,2,4-Trimethylbenzene	16.34	105	293274	20.4299	ug/L	95
89)	sec-Butylbenzene	16.54	105	352893	19.4673	ug/L	96
90)	p-Isopropyltoluene	16.69	119	308603	21.1866	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	174332	20.0724	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	174290	18.6593	ug/L	100
93)	n-Butylbenzene	17.17	91	278422	21.4310	ug/L	95
94)	1,2-Dichlorobenzene	17.46	146	173192	19.7617	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	15217	19.2720	ug/L	93
96)	1,2,4-Trichlorobenzene	19.44	180	134122	21.3163	ug/L	97
97)	Hexachlorobutadiene	19.58	225	63864	19.1377	ug/L	98
98)	Naphthalene	19.79	128	297018	21.1655	ug/L	98
99)	1,2,3-Trichlorobenzene	20.08	180	130077	20.2074	ug/L	97

(#) = qualifier out of range (m) = manual integration

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\042917\11M17872.D Vial: 4
Acq On : 29 Apr 2017 20:24 Operator: TMB
Sample : WG612123-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81654 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: Apr 29 20:46 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17937.D Vial: 4
Acq On : 1 May 2017 17:20 Operator: JDS
Sample : WG612295-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81656 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 01 17:41:57 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Fluorobenzene	10.53	96	330570	25.00	ug/L	0.00
56) Chlorobenzene-d5	14.14	117	237167	25.00	ug/L	0.00
76) 1,4-Dichlorobenzene-d4	16.96	152	134781	25.00	ug/L	0.00
System Monitoring Compounds						
37) Dibromofluoromethane	9.53	111	84522	25.8132	ug/L	0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.24%			
43) 1,2-Dichloroethane-d4	10.14	65	98057	25.8057	ug/L	0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.24%			
57) Toluene-d8	12.38	98	330588	26.8447	ug/L	0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 107.36%			
78) p-Bromofluorobenzene	15.54	95	119514	25.5119	ug/L	0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 102.04%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.20	85	98921	24.5021	ug/L	98
3) Chloromethane	3.65	50	62685	15.2747	ug/L	99
4) Vinyl Chloride	3.88	62	45784	16.1372	ug/L	97
5) 1,3-Butadiene	3.92	54	36195	21.7483	ug/L	96
6) Bromomethane	4.77	94	59968	20.4705	ug/L	100
7) Chloroethane	4.92	64	65048	22.1333	ug/L	97
8) Trichlorofluoromethane	5.40	101	102220	20.6226	ug/L	98
9) Diethyl ether	5.91	59	344057	93.7975	ug/L	99
10) Isoprene	5.96	67	110041	21.4293	ug/L	99
11) Acrolein	6.15	56	68103	116.7266	ug/L	98
12) 1,1,2-Trichloro-1,2,2-Trif	6.16	101	64549	21.9893	ug/L	95
13) Acetone	6.26	43	20410	18.4657	ug/L	92
14) 1,1-Dichloroethene	6.46	61	117701	19.9372	ug/L	100
15) Tert-Butyl Alcohol	6.58	59	70559	170.6738	ug/L	99
16) Dimethyl Sulfide	6.72	62	95790	20.6543	ug/L	100
17) Iodomethane	6.97	142	68957	17.8209	ug/L	98
18) Methyl acetate	6.98	43	58933	16.9054	ug/L	99
19) Methylene Chloride	7.23	84	74704	18.9655	ug/L	95
20) Carbon Disulfide	7.27	76	168153	16.6588	ug/L	98
21) Acrylonitrile	7.40	53	30564	18.7224	ug/L	99
22) Methyl Tert Butyl Ether	7.43	73	190221	19.2847	ug/L	100
23) trans-1,2-Dichloroethene	7.66	96	70146	19.5254	ug/L	99
24) n-Hexane	7.73	57	113861	20.4348	ug/L	98
25) Diisopropyl ether	8.07	45	1468477	102.2289	ug/L	98
26) Vinyl Acetate	8.23	43	179199	26.7246	ug/L	99
27) 1,1-Dichloroethane	8.26	63	149228	19.7074	ug/L	98
28) Ethyl-Tert-Butyl ether	8.61	59	1196647	94.2457	ug/L	98
29) 2-Butanone	8.79	43	33899	18.7698	ug/L	96
30) Propionitrile	8.89	54	57654	95.6916	ug/L	99
31) 2,2-Dichloropropane	9.00	77	102264	19.9519	ug/L	97
32) cis-1,2-Dichloroethene	9.07	96	79136	19.6300	ug/L	96
33) Chloroform	9.26	83	125940	20.8375	ug/L	99
34) 1-Bromopropane	9.39	122	18680	23.3873	ug/L	95
35) Bromochloromethane	9.48	130	49133	19.8772	ug/L	97
36) Tetrahydrofuran	9.50	42	126568	86.0378	ug/L	98
38) 1,1,1-Trichloroethane	9.76	97	113551	21.2667	ug/L	100
39) Cyclohexane	9.79	56	139592	18.5930	ug/L	99
40) 1,1-Dichloropropene	9.95	75	94917	20.2832	ug/L	98
41) Carbon Tetrachloride	10.09	117	95643	20.7105	ug/L	100
42) Tert-Amyl-Methyl ether	10.05	73	998165	97.4502	ug/L	99

(#) = qualifier out of range (m) = manual integration
11M17937.D 8260WT.M Mon May 01 17:41:58 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17937.D Vial: 4
Acq On : 1 May 2017 17:20 Operator: JDS
Sample : WG612295-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81656 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 01 17:41:57 2017 Quant Results File: 8260WT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration
DataAcq Meth : 8260WT

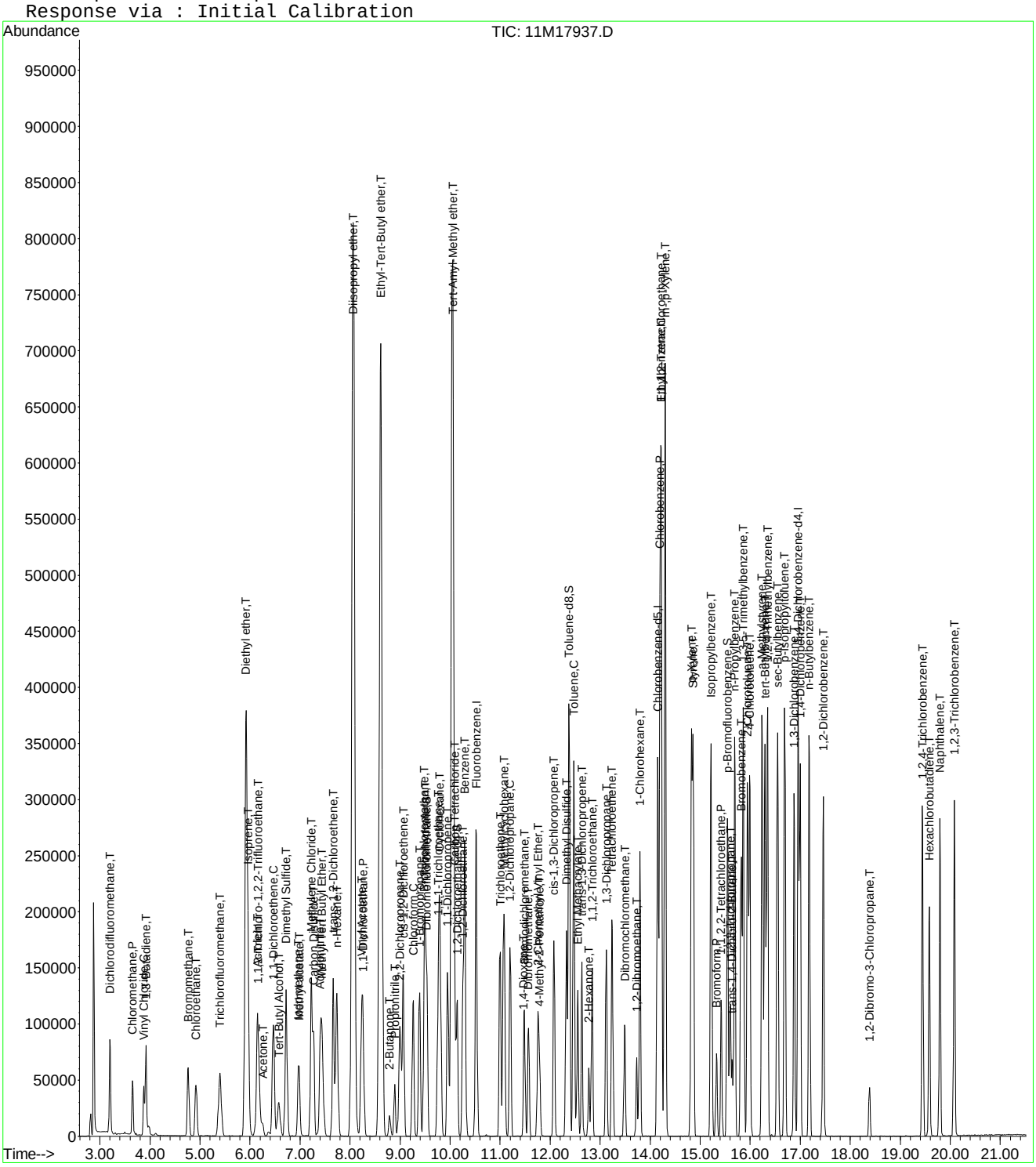
	Compound	R.T.	QIon	Response	Conc	Unit	Qvalue
44)	1,2-Dichloroethane	10.26	62	102076	19.7539	ug/L	99
45)	Benzene	10.29	78	291152	20.0833	ug/L	97
46)	Trichloroethene	11.00	130	72470	19.0709	ug/L	99
47)	Methylcyclohexane	11.07	83	117933	20.2422	ug/L	98
48)	1,2-Dichloropropane	11.20	63	88219	19.5522	ug/L	99
49)	1,4-Dioxane	11.47	88	6683	164.0210	ug/L	84
50)	Bromodichloromethane	11.49	83	90364	19.1966	ug/L	100
51)	Dibromomethane	11.56	93	42107	19.7284	ug/L	99
52)	2-Chloroethyl Vinyl Ether	11.76	63	50071	20.3120	ug/L	99
53)	4-Methyl-2-Pentanone	11.79	58	29326	18.4746	ug/L	95
54)	cis-1,3-Dichloropropene	12.08	75	117327	21.0073	ug/L	98
55)	Dimethyl Disulfide	12.33	79	62691	17.9839	ug/L	92
58)	Toluene	12.47	91	301429	19.6304	ug/L	97
59)	Ethyl Methacrylate	12.55	69	85406	20.2372	ug/L	100
60)	trans-1,3-Dichloropropene	12.64	75	95794	19.7629	ug/L	99
61)	1,1,2-Trichloroethane	12.84	97	62473	19.2868	ug/L	99
62)	2-Hexanone	12.77	43	52754	19.6033	ug/L	99
63)	1,3-Dichloropropane	13.12	76	108776	20.2194	ug/L	99
64)	Tetrachloroethene	13.23	164	64865	21.2806	ug/L	98
65)	Dibromochloromethane	13.49	129	69713	19.3045	ug/L	100
66)	1,2-Dibromoethane	13.73	107	56740	19.4859	ug/L	100
67)	1-Chlorohexane	13.79	91	95839	21.9016	ug/L	99
68)	Chlorobenzene	14.20	112	192360	19.6992	ug/L	98
69)	1,1,1,2-Tetrachloroethane	14.22	131	70034	19.2641	ug/L	99
70)	Ethylbenzene	14.22	106	108407	20.9937	ug/L	88
71)	m-,p-Xylene	14.30	106	258192	41.7882	ug/L	88
72)	o-Xylene	14.83	106	127584	20.4938	ug/L	94
73)	Styrene	14.86	104	207387	22.4757	ug/L	98
74)	Bromoform	15.32	173	45994	17.7744	ug/L	100
75)	Isopropylbenzene	15.22	105	315856	20.7972	ug/L	96
77)	1,1,2,2-Tetrachloroethane	15.42	83	81287	19.1843	ug/L	98
79)	1,2,3-Trichloropropane	15.60	110	23555	19.4143	ug/L	95
80)	trans-1,4-Dichloro-2-Buten	15.63	53	20484	15.6142	ug/L	88
81)	n-Propylbenzene	15.69	91	380364	20.1352	ug/L	95
82)	Bromobenzene	15.82	156	90097	19.5982	ug/L	98
83)	1,3,5-Trimethylbenzene	15.86	105	274603	21.2483	ug/L	96
84)	2-Chlorotoluene	15.94	91	232601	18.1355	ug/L	97
85)	4-Chlorotoluene	15.99	91	237939	20.5543	ug/L	98
86)	a-Methylstyrene	16.23	118	152872	21.4623	ug/L	98
87)	tert-Butylbenzene	16.30	134	60993	19.4116	ug/L	81
88)	1,2,4-Trimethylbenzene	16.35	105	282033	20.8662	ug/L	95
89)	sec-Butylbenzene	16.54	105	344020	20.1557	ug/L	97
90)	p-Isopropyltoluene	16.69	119	299617	21.8463	ug/L	97
91)	1,3-Dichlorobenzene	16.87	146	165856	20.2817	ug/L	98
92)	1,4-Dichlorobenzene	17.00	146	168426	19.1506	ug/L	97
93)	n-Butylbenzene	17.17	91	269290	22.0145	ug/L	97
94)	1,2-Dichlorobenzene	17.46	146	167441	20.2913	ug/L	98
95)	1,2-Dibromo-3-Chloropropan	18.38	75	13399	18.0228	ug/L	94
96)	1,2,4-Trichlorobenzene	19.45	180	124794	21.0647	ug/L	100
97)	Hexachlorobutadiene	19.58	225	62305	19.8293	ug/L	98
98)	Naphthalene	19.79	128	276437	20.9215	ug/L	97
99)	1,2,3-Trichlorobenzene	20.08	180	123013	20.2961	ug/L	98

(#) = qualifier out of range (m) = manual integration
11M17937.D 8260WT.M Mon May 01 17:41:58 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : C:\MSDchem\1\data\050117\11M17937.D Vial: 4
Acq On : 1 May 2017 17:20 Operator: JDS
Sample : WG612295-02 20ug/L LCS STD 8260 Inst : hpms11
Misc : 1,1 STD81656 Multiplr: 1.00
MS Integration Params: rteint.p
Quant Time: May 1 17:41 2017 Quant Results File: 8260WT.RES

Method : C:\MSDCHEM\1\METHODS\8260WT.M (RTE Integrator)
Title : 8260B/624 (SOP: OVL MSV01) Water 042417 HPMS11
Last Update : Tue Apr 25 12:03:16 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.271	96	358784	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	264980	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	135161	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.339	111	95308	24.5969	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 98.388%			
34) 1,2-Dichloroethane-d4	4.953	65	91014	25.0595	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 100.238%			
47) Toluene-d8	6.812	98	328495	24.8404	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 99.362%			
66) p-Bromofluorobenzene	8.783	95	109108	24.1093	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 96.437%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.096	85	105989	24.8739	ug/L	99
3) Chloromethane	1.215	50	92244	22.1204	ug/L	99
4) Vinyl Chloride	1.261	62	106504	23.0648	ug/L	100
5) 1,3-Butadiene	1.273	54	96974	34.2040	ug/L	98
6) Bromomethane	1.452	94	59015	17.1901	ug/L	99
7) Chloroethane	1.525	64	41681	19.0273	ug/L	91
8) Trichlorofluoromethane	1.606	101	121539	20.5197	ug/L	100
9) Diethyl ether	1.838	59	283754	99.3427	ug/L	97
10) 1,1-Dichloroethene	1.953	61	109025	19.6723	ug/L	97
11) Carbon Disulfide	1.968	76	192259	16.1634	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.985	101	75107	21.2572	ug/L	98
13) Iodomethane	2.055	142	98976	19.7784	ug/L	99
14) Acrolein	2.217	56	48450	137.3196	ug/L	99
15) Methylene Chloride	2.399	84	79629	18.9354	ug/L	96
16) Acetone	2.460	43	13695	18.9842	ug/L	96
17) trans-1,2-Dichloroethene	2.532	96	74381	19.7108	ug/L	98
18) Methyl acetate	2.567	43	39224	20.7400	ug/L #	96
19) Methyl Tert Butyl Ether	2.651	73	184931	19.3102	ug/L	98
20) 1,1-Dichloroethane	3.111	63	136713	20.1706	ug/L	100
21) Acrylonitrile	3.178	53	18296	19.8843	ug/L	100
22) Vinyl Acetate	2.605	86	11973	19.7138	ug/L	86
23) cis-1,2-Dichloroethene	3.728	96	82538	19.3229	ug/L	97
24) 2,2-Dichloropropane	3.858	77	111217	20.8727	ug/L	95
25) Cyclohexane	3.957	56	103331	17.9242	ug/L #	87
26) Bromochloromethane	3.977	130	54806	19.9140	ug/L	99
27) Chloroform	4.105	83	142318	20.1396	ug/L	100
28) Carbon Tetrachloride	4.244	117	109531	19.6008	ug/L	99
30) 1,1,1-Trichloroethane	4.342	97	126616	20.3798	ug/L	99
31) 1,1-Dichloropropene	4.501	75	96689	19.8163	ug/L	98
32) 2-Butanone	4.530	43	21866	20.3314	ug/L	98
33) Benzene	4.794	78	300683	19.6749	ug/L	99
35) 1,2-Dichloroethane	5.031	62	92576	19.4543	ug/L	99
36) Methylcyclohexane	5.422	83	109902	18.1957	ug/L	98
37) Trichloroethene	5.445	130	83290	18.1448	ug/L	98
38) Dibromomethane	5.856	93	46211	19.7426	ug/L	98
39) 1,2-Dichloropropane	5.963	63	79454	19.8251	ug/L	99
40) Bromodichloromethane	6.047	83	102809	19.2194	ug/L	99
41) 1,4-Dioxane	6.262	88	2730	136.7604	ug/L	96
42) 2-Chloroethyl Vinyl Ether	6.629	63	36550	20.1061	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	126327	20.9571	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19618	19.7013	ug/L	96
45) trans-1,3-Dichloropropene	7.240	75	100753	19.6610	ug/L	99
48) Toluene	6.855	91	330919	19.9192	ug/L	100
49) Tetrachloroethene	7.182	166	91450	19.2998	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	61972	19.2457	ug/L	99
51) Dibromochloromethane	7.507	129	83193	18.9280	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

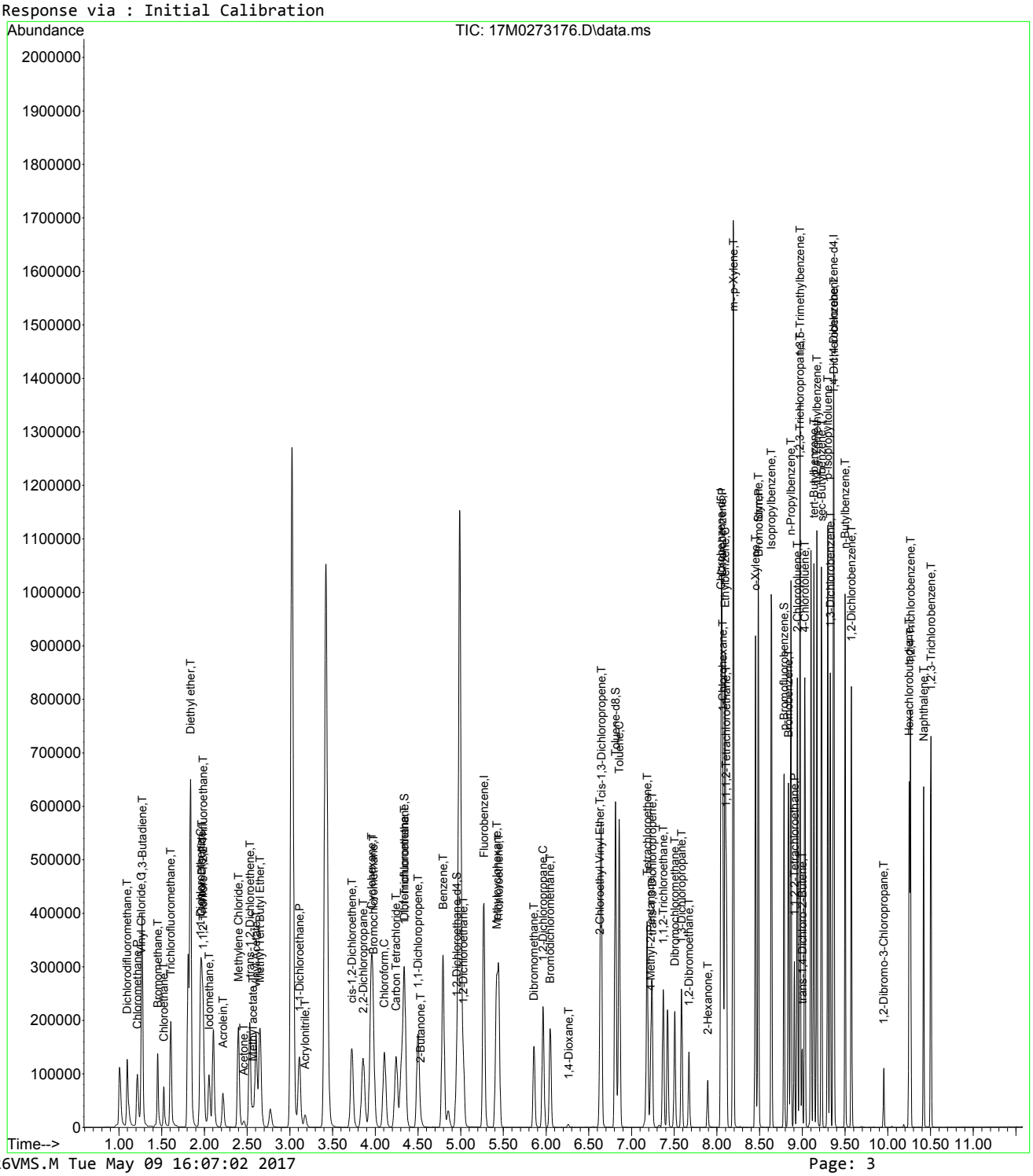
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.585	76	103621	20.2480	ug/L		97
53) 1,2-Dibromoethane	7.672	107	62887	19.0618	ug/L		100
54) 2-Hexanone	7.892	43	34786	20.5715	ug/L		98
55) Chlorobenzene	8.060	112	211839	19.0043	ug/L		96
56) 1-Chlorohexane	8.068	69	18508	20.5654	ug/L		96
57) Ethylbenzene	8.094	106	115210	19.8554	ug/L		97
58) 1,1,1,2-Tetrachloroethane	8.109	131	81366	18.7515	ug/L		99
59) m-,p-Xylene	8.193	106	277495	39.6264	ug/L		97
60) o-Xylene	8.451	106	133128	19.2946	ug/L		97
61) Styrene	8.482	104	223332	20.2292	ug/L		99
62) Bromoform	8.485	173	58909	19.0532	ug/L		99
63) Isopropylbenzene	8.636	105	344865	19.3098	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	297315	19.7321	ug/L		98
67) Bromobenzene	8.836	156	99105	18.6403	ug/L		99
68) n-Propylbenzene	8.865	91	392928	19.6863	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	76517	21.0459	ug/L		100
70) 2-Chlorotoluene	8.940	91	235999	19.1562	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20770	19.3245	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.998	53	13936	17.3935	ug/L	#	92
73) 1,2,4-Trimethylbenzene	9.169	105	299476	19.7106	ug/L		99
74) 4-Chlorotoluene	9.030	91	245214	19.9371	ug/L		98
75) tert-Butylbenzene	9.134	134	58132	19.3043	ug/L		100
76) sec-Butylbenzene	9.224	105	363896	19.6036	ug/L		99
77) p-Isopropyltoluene	9.296	119	311969	19.7151	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	176679	19.0622	ug/L		99
79) 1,4-Dichlorobenzene	9.368	146	175483	18.7533	ug/L		100
80) n-Butylbenzene	9.499	91	270858	20.2805	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	170808	18.9090	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13431	20.1368	ug/L		92
83) Hexachlorobutadiene	10.249	225	66547	17.4754	ug/L		100
84) 1,2,4-Trichlorobenzene	10.266	180	125697	18.7315	ug/L		100
85) Naphthalene	10.419	128	237017	18.1128	ug/L		100
86) 1,2,3-Trichlorobenzene	10.503	180	117996	18.1028	ug/L		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\043017\17M0273176.D Vial: 4
Acq On : 30 Apr 2017 16:07 Operator: ADC
Sample : WG612142-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: Apr 30 16:19:39 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 16:07:02 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.277	96	354875	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	263010	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	132028	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.345	111	98833	25.7876	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 103.150%			
34) 1,2-Dichloroethane-d4	4.962	65	93168	25.9351	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.740%			
47) Toluene-d8	6.812	98	344447	26.2418	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 104.967%			
66) p-Bromofluorobenzene	8.786	95	120621	27.2858	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 109.143%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	104577	24.8129	ug/L	100
3) Chloromethane	1.224	50	90184	21.8646	ug/L	100
4) Vinyl Chloride	1.270	62	105866	23.1792	ug/L	99
5) 1,3-Butadiene	1.282	54	95528	34.0651	ug/L	98
6) Bromomethane	1.464	94	58134	17.1200	ug/L	98
7) Chloroethane	1.536	64	44277	20.4350	ug/L	95
8) Trichlorofluoromethane	1.623	101	123108	21.0136	ug/L	100
9) Diethyl ether	1.843	59	288688	102.1834	ug/L	97
10) 1,1-Dichloroethene	1.968	61	111351	20.3133	ug/L	96
11) Carbon Disulfide	1.979	76	196097	16.6677	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	2.000	101	76779	21.9698	ug/L	98
13) Iodomethane	2.066	142	106711	21.3788	ug/L	99
14) Acrolein	2.223	56	47371	135.7403	ug/L	99
15) Methylene Chloride	2.408	84	81349	19.5574	ug/L	96
16) Acetone	2.469	43	11848	16.6048	ug/L	96
17) trans-1,2-Dichloroethene	2.541	96	73185	19.6075	ug/L	99
18) Methyl acetate	2.576	43	35672	19.0697	ug/L #	99
19) Methyl Tert Butyl Ether	2.657	73	185778	19.6123	ug/L #	44
20) 1,1-Dichloroethane	3.120	63	135567	20.2219	ug/L	100
21) Acrylonitrile	3.187	53	17650	19.3935	ug/L	97
22) Vinyl Acetate	2.616	86	12292	20.4620	ug/L	91
23) cis-1,2-Dichloroethene	3.734	96	81479	19.2851	ug/L	97
24) 2,2-Dichloropropane	3.867	77	111449	21.1431	ug/L	96
25) Cyclohexane	3.969	56	103292	18.1148	ug/L #	87
26) Bromochloromethane	3.983	130	54494	20.0187	ug/L	100
27) Chloroform	4.116	83	140305	20.0735	ug/L	99
28) Carbon Tetrachloride	4.255	117	109574	19.8245	ug/L	99
30) 1,1,1-Trichloroethane	4.348	97	124641	20.2829	ug/L	99
31) 1,1-Dichloropropene	4.507	75	94236	19.5263	ug/L	98
32) 2-Butanone	4.533	43	19710	18.5285	ug/L	100
33) Benzene	4.800	78	295801	19.5687	ug/L	99
35) 1,2-Dichloroethane	5.034	62	92976	19.7536	ug/L	99
36) Methylcyclohexane	5.425	83	110958	18.5728	ug/L	98
37) Trichloroethene	5.448	130	82208	18.1063	ug/L	98
38) Dibromomethane	5.862	93	45743	19.7579	ug/L	98
39) 1,2-Dichloropropane	5.969	63	78284	19.7483	ug/L	100
40) Bromodichloromethane	6.050	83	101549	19.1930	ug/L	100
41) 1,4-Dioxane	6.265	88	1419	71.8684	ug/L	96
42) 2-Chloroethyl Vinyl Ether	6.629	63	33033	18.3715	ug/L	100
43) cis-1,3-Dichloropropene	6.650	75	125770	21.0945	ug/L	99
44) 4-Methyl-2-Pentanone	7.226	58	19037	19.3284	ug/L	97
45) trans-1,3-Dichloropropene	7.240	75	99069	19.5454	ug/L	100
48) Toluene	6.858	91	326300	19.7883	ug/L	99
49) Tetrachloroethene	7.185	166	90666	19.2776	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	61709	19.3076	ug/L	99
51) Dibromochloromethane	7.507	129	82619	18.9382	ug/L	99

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

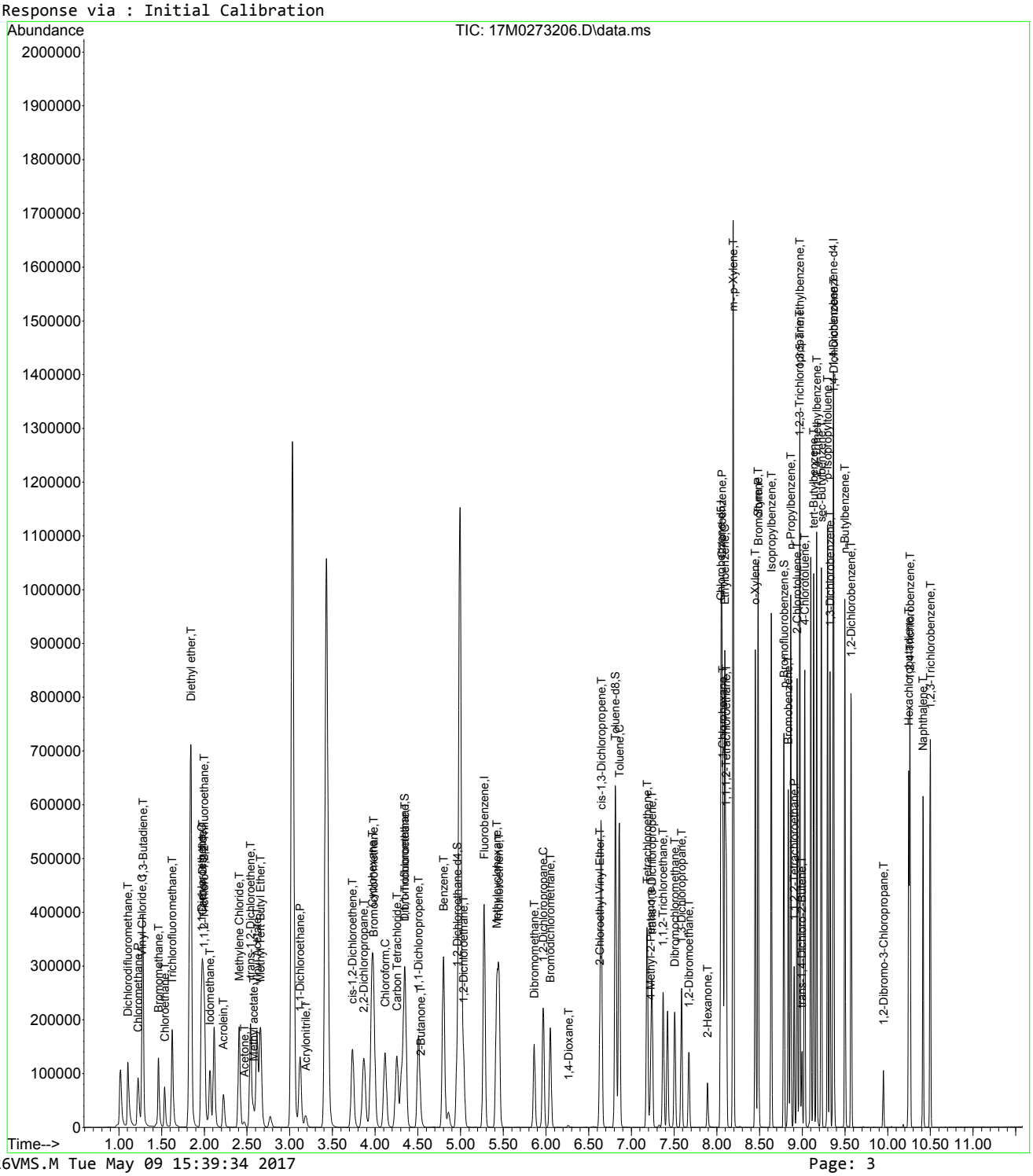
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	102640	20.2065	ug/L		97
53) 1,2-Dibromoethane	7.675	107	62711	19.1508	ug/L		100
54) 2-Hexanone	7.892	43	33888	20.1906	ug/L		96
55) Chlorobenzene	8.060	112	211073	19.0774	ug/L		97
56) 1-Chlorohexane	8.071	69	18525	20.7385	ug/L		98
57) Ethylbenzene	8.094	106	112550	19.5423	ug/L		95
58) 1,1,1,2-Tetrachloroethane	8.109	131	81393	18.8982	ug/L		99
59) m-,p-Xylene	8.193	106	272544	39.2109	ug/L		96
60) o-Xylene	8.451	106	131361	19.1811	ug/L		98
61) Styrene	8.482	104	221760	20.2373	ug/L		99
62) Bromoform	8.485	173	58626	19.1037	ug/L		99
63) Isopropylbenzene	8.639	105	336599	18.9881	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	292810	19.8942	ug/L		99
67) Bromobenzene	8.836	156	98415	18.9498	ug/L		99
68) n-Propylbenzene	8.865	91	390423	20.0250	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	75634	21.2967	ug/L		100
70) 2-Chlorotoluene	8.940	91	234285	19.4684	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20395	19.4259	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	13802	17.6350	ug/L	#	90
73) 1,2,4-Trimethylbenzene	9.169	105	297281	20.0304	ug/L		99
74) 4-Chlorotoluene	9.030	91	243127	20.2365	ug/L		99
75) tert-Butylbenzene	9.134	134	56806	19.3116	ug/L		98
76) sec-Butylbenzene	9.224	105	358908	19.7937	ug/L		99
77) p-Isopropyltoluene	9.296	119	308489	19.9578	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	175741	19.4109	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	175298	19.1781	ug/L		100
80) n-Butylbenzene	9.499	91	268600	20.5887	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	170880	19.3659	ug/L		99
82) 1,2-Dibromo-3-Chloropr...	9.950	75	12506	19.1949	ug/L		95
83) Hexachlorobutadiene	10.246	225	67604	18.1742	ug/L		99
84) 1,2,4-Trichlorobenzene	10.263	180	124860	19.0483	ug/L		100
85) Naphthalene	10.414	128	231309	18.0961	ug/L		99
86) 1,2,3-Trichlorobenzene	10.500	180	117705	18.4866	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273206.D Vial: 4
Acq On : 01 May 2017 13:09 Operator: ADC
Sample : WG612250-02 20ug/L LCS 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:33 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:34 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273264.D Vial: 4
Acq On : 02 May 2017 19:53 Operator: ADC
Sample : WG612551-02 20ug/L LCS STD 8260 Inst : HPMS17
Misc : 1,1 STD81680 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:29 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.274	96	342483	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	255725	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.362	152	130450	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.348	111	94477	25.5430	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.172%			
34) 1,2-Dichloroethane-d4	4.959	65	88728	25.5929	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 102.372%			
47) Toluene-d8	6.815	98	328937	25.7740	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 103.096%			
66) p-Bromofluorobenzene	8.783	95	113843	26.0640	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 104.256%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.105	85	97655	24.0089	ug/L	100
3) Chloromethane	1.221	50	98871	24.8381	ug/L	100
4) Vinyl Chloride	1.270	62	105353	23.9015	ug/L	100
5) 1,3-Butadiene	1.282	54	97115	35.8840	ug/L	98
6) Bromomethane	1.461	94	63018	19.2298	ug/L	99
7) Chloroethane	1.533	64	40695	19.4614	ug/L	92
8) Trichlorofluoromethane	1.615	101	118582	20.9734	ug/L	100
9) Diethyl ether	1.846	59	275157	100.9180	ug/L	97
10) 1,1-Dichloroethene	1.962	61	106710	20.1710	ug/L	98
11) Carbon Disulfide	1.976	76	184766	16.2728	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.994	101	74415	22.0638	ug/L	98
13) Iodomethane	2.063	142	106651	22.0687	ug/L	98
14) Acrolein	2.225	56	41562	123.4040	ug/L	99
15) Methylene Chloride	2.408	84	78530	19.5628	ug/L	96
16) Acetone	2.469	43	12626	18.3354	ug/L	97
17) trans-1,2-Dichloroethene	2.541	96	72714	20.1862	ug/L	98
18) Methyl acetate	2.579	43	33776	18.7094	ug/L #	99
19) Methyl Tert Butyl Ether	2.660	73	176579	19.3157	ug/L	95
20) 1,1-Dichloroethane	3.120	63	135599	20.9585	ug/L	99
21) Acrylonitrile	3.190	53	17325	19.7252	ug/L	99
22) Vinyl Acetate	2.613	86	11872	20.4779	ug/L	91
23) cis-1,2-Dichloroethene	3.731	96	80946	19.8522	ug/L	97
24) 2,2-Dichloropropane	3.867	77	109784	21.5751	ug/L	96
25) Cyclohexane	3.968	56	103679	18.8405	ug/L #	88
26) Bromochloromethane	3.983	130	53207	20.2531	ug/L	100
27) Chloroform	4.116	83	139431	20.6702	ug/L	100
28) Carbon Tetrachloride	4.252	117	109245	20.4801	ug/L	99
30) 1,1,1-Trichloroethane	4.345	97	124718	21.0298	ug/L	99
31) 1,1-Dichloropropene	4.507	75	94743	20.3417	ug/L	98
32) 2-Butanone	4.539	43	20515	19.9831	ug/L	99
33) Benzene	4.799	78	296197	20.3039	ug/L	99
35) 1,2-Dichloroethane	5.037	62	90549	19.9340	ug/L	98
36) Methylcyclohexane	5.425	83	109839	19.0508	ug/L	97
37) Trichloroethene	5.448	130	83607	19.0807	ug/L	98
38) Dibromomethane	5.859	93	44338	19.8440	ug/L	100
39) 1,2-Dichloropropane	5.966	63	77961	20.3784	ug/L	100
40) Bromodichloromethane	6.050	83	100728	19.7267	ug/L	99
41) 1,4-Dioxane	6.259	88	2470	129.6250	ug/L	95
42) 2-Chloroethyl Vinyl Ether	6.632	63	34953	20.1427	ug/L	100
43) cis-1,3-Dichloropropene	6.647	75	124808	21.6906	ug/L	98
44) 4-Methyl-2-Pentanone	7.226	58	18546	19.5112	ug/L	95
45) trans-1,3-Dichloropropene	7.240	75	97104	19.8509	ug/L	99
48) Toluene	6.858	91	326419	20.3594	ug/L	99
49) Tetrachloroethene	7.182	166	91541	20.0182	ug/L	99
50) 1,1,2-Trichloroethane	7.373	97	60467	19.4579	ug/L	99
51) Dibromochloromethane	7.507	129	80820	19.0536	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273264.D Vial: 4
Acq On : 02 May 2017 19:53 Operator: ADC
Sample : WG612551-02 20ug/L LCS STD 8260 Inst : HPMS17
Misc : 1,1 STD81680 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:29 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

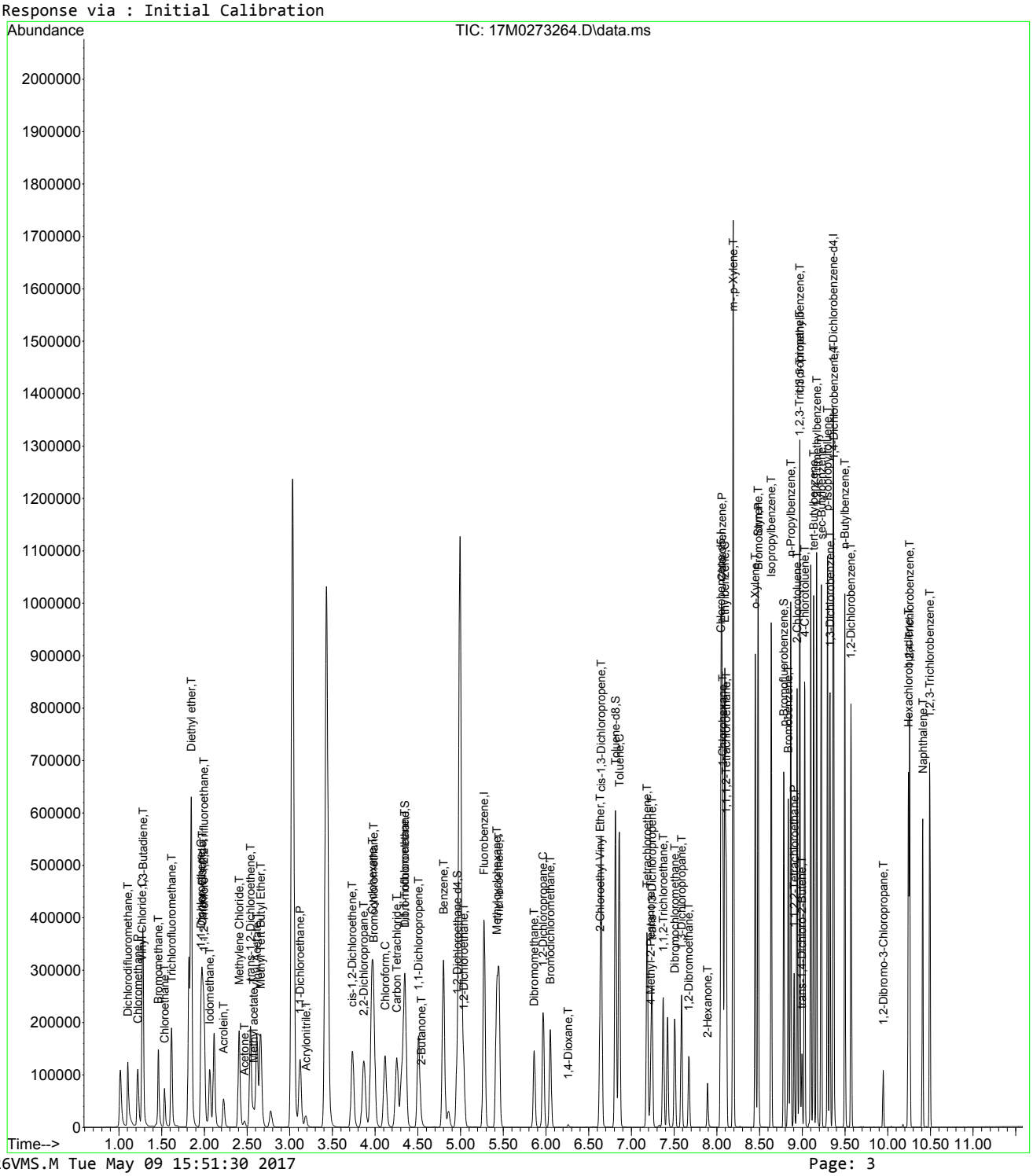
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.588	76	101222	20.4950	ug/L		98
53) 1,2-Dibromoethane	7.672	107	60969	19.1492	ug/L		100
54) 2-Hexanone	7.892	43	33040	20.2461	ug/L		97
55) Chlorobenzene	8.060	112	210782	19.5938	ug/L		96
56) 1-Chlorohexane	8.071	69	18758	21.5976	ug/L		97
57) Ethylbenzene	8.094	106	113098	20.1969	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.109	131	80804	19.2959	ug/L		99
59) m-,p-Xylene	8.193	106	273045	40.4020	ug/L		97
60) o-Xylene	8.450	106	132177	19.8500	ug/L		99
61) Styrene	8.482	104	219912	20.6404	ug/L		99
62) Bromoform	8.485	173	56745	19.0175	ug/L		99
63) Isopropylbenzene	8.636	105	337395	19.5752	ug/L		99
65) 1,3,5-Trimethylbenzene	8.972	105	294728	20.2668	ug/L		98
67) Bromobenzene	8.835	156	97894	19.0775	ug/L		99
68) n-Propylbenzene	8.864	91	391099	20.3023	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	73896	21.0590	ug/L		100
70) 2-Chlorotoluene	8.940	91	234166	19.6939	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	19984	19.2647	ug/L		97
72) trans-1,4-Dichloro-2-B...	8.995	53	13228	17.1061	ug/L	#	95
73) 1,2,4-Trimethylbenzene	9.168	105	296881	20.2454	ug/L		99
74) 4-Chlorotoluene	9.027	91	241757	20.3658	ug/L		99
75) tert-Butylbenzene	9.134	134	56637	19.4871	ug/L		97
76) sec-Butylbenzene	9.223	105	358259	19.9969	ug/L		99
77) p-Isopropyltoluene	9.296	119	310359	20.3217	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	176128	19.6890	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	175009	19.3781	ug/L		100
80) n-Butylbenzene	9.499	91	269544	20.9110	ug/L		97
81) 1,2-Dichlorobenzene	9.571	146	166841	19.1369	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.947	75	12517	19.4441	ug/L		94
83) Hexachlorobutadiene	10.243	225	67841	18.4585	ug/L		99
84) 1,2,4-Trichlorobenzene	10.257	180	121568	18.7704	ug/L		100
85) Naphthalene	10.411	128	221391	17.5297	ug/L		100
86) 1,2,3-Trichlorobenzene	10.492	180	112659	17.9082	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050217\17M0273264.D Vial: 4
Acq On : 02 May 2017 19:53 Operator: ADC
Sample : WG612551-02 20ug/L LCS STD 8260 Inst : HPMS17
Misc : 1,1 STD81680 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:51:29 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:51:30 2017 Page: 3

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146825.D Vial: 4
Acq On : 28 Apr 2017 21:09 Operator: JDS
Sample : WG612085-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 21:31:18 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

Internal Standards	R.T.	QIon	Response	Conc	Units		Dev(Min)
1) Fluorobenzene	11.25	96	653347	25.00	ug/L		0.00
57) Chlorobenzene-d5	15.13	117	456820	25.00	ug/L		0.00
78) 1,4-Dichlorobenzene-d4	18.16	152	237863	25.00	ug/L		0.00
System Monitoring Compounds							
37) Dibromofluoromethane	10.20	111	171299	25.6837	ug/L		0.00
Spiked Amount 25.000	Range 86 - 118		Recovery = 102.72%				
43) 1,2-Dichloroethane-d4	10.84	65	175615	26.7160	ug/L		0.00
Spiked Amount 25.000	Range 80 - 120		Recovery = 106.88%				
58) Toluene-d8	13.23	98	618118	26.5168	ug/L		0.00
Spiked Amount 25.000	Range 88 - 110		Recovery = 106.08%				
80) p-Bromofluorobenzene	16.63	95	242712	26.8661	ug/L		0.00
Spiked Amount 25.000	Range 86 - 115		Recovery = 107.48%				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	3.51	85	244650	23.5846	ug/L		94
3) Chloromethane	4.03	50	272793	22.1365	ug/L		100
4) Vinyl Chloride	4.28	62	260300	21.9614	ug/L		100
5) 1,3-Butadiene	4.32	54	137828	30.0866	ug/L		90
6) Bromomethane	5.23	94	81426	15.9112	ug/L		98
7) Chloroethane	5.39	64	108861	21.3466	ug/L		86
8) Trichlorofluoromethane	5.90	101	230034	18.9360	ug/L		100
9) Diethyl ether	6.43	59	518513	102.4209	ug/L		85
10) Isoprene	6.47	67	208843	20.9011	ug/L		82
11) Acrolein	6.67	56	91134	164.3118	ug/L		99
12) 1,1,2-Trichloro-1,2,2-Trif	6.70	101	135820	19.7510	ug/L		95
13) Acetone	6.78	43	33050	23.4420	ug/L		96
14) 1,1-Dichloroethene	7.01	61	200069	20.0861	ug/L		88
15) Tert-Butyl Alcohol	7.12	59	92502	211.5221	ug/L		92
16) Dimethyl Sulfide	7.27	62	159209	22.3688	ug/L		80
17) Iodomethane	7.53	142	123258	21.6619	ug/L		99
18) Methyl acetate	7.53	43	75875	21.4583	ug/L	#	86
19) Methylene Chloride	7.79	84	142997	18.9892	ug/L		65
20) Carbon Disulfide	7.85	76	351761	16.4093	ug/L		99
21) Acrylonitrile	7.96	53	36659	22.4389	ug/L		99
22) Methyl Tert Butyl Ether	8.01	73	349367	21.1566	ug/L		93
23) trans-1,2-Dichloroethene	8.25	96	133549	18.6296	ug/L		85
24) n-Hexane	8.32	57	171470	21.1522	ug/L		87
25) Diisopropyl ether	8.66	45	2082507	112.8456	ug/L	#	93
26) Vinyl Acetate	8.82	43	168103	32.8156	ug/L	#	91
27) 1,1-Dichloroethane	8.87	63	243384	20.4959	ug/L		100
28) Ethyl-Tert-Butyl ether	9.23	59	1910411	102.1689	ug/L		93
29) 2-Butanone	9.41	43	38658	21.7556	ug/L		85
30) Propionitrile	9.52	54	64534	111.3615	ug/L		100
31) 2,2-Dichloropropane	9.65	77	188063	20.8169	ug/L		80
32) cis-1,2-Dichloroethene	9.71	96	148885	18.8913	ug/L		96
33) Chloroform	9.91	83	247909	18.3259	ug/L		95
34) 1-Bromopropane	10.06	122	33563	24.0147	ug/L		98
35) Bromochloromethane	10.15	130	84151	20.2839	ug/L		98
36) Tetrahydrofuran	10.17	42	132369	113.1209	ug/L		78
38) 1,1,1-Trichloroethane	10.46	97	218464	19.8636	ug/L		92
39) Cyclohexane	10.49	56	196235	19.2952	ug/L		82
40) 1,1-Dichloropropene	10.65	75	181395	19.5111	ug/L		85
41) Tert-Amyl-Methyl ether	10.74	73	1851970	104.3145	ug/L		94
42) Carbon Tetrachloride	10.80	117	166394	19.1873	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146825.D 8260BWT.M Sat Apr 29 12:14:46 2017 Page 1

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146825.D Vial: 4
Acq On : 28 Apr 2017 21:09 Operator: JDS
Sample : WG612085-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 21:31:18 2017 Quant Results File: 8260BWT.RES

Quant Method : C:\MSDCHEM\1\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration
DataAcq Meth : 8260BWT

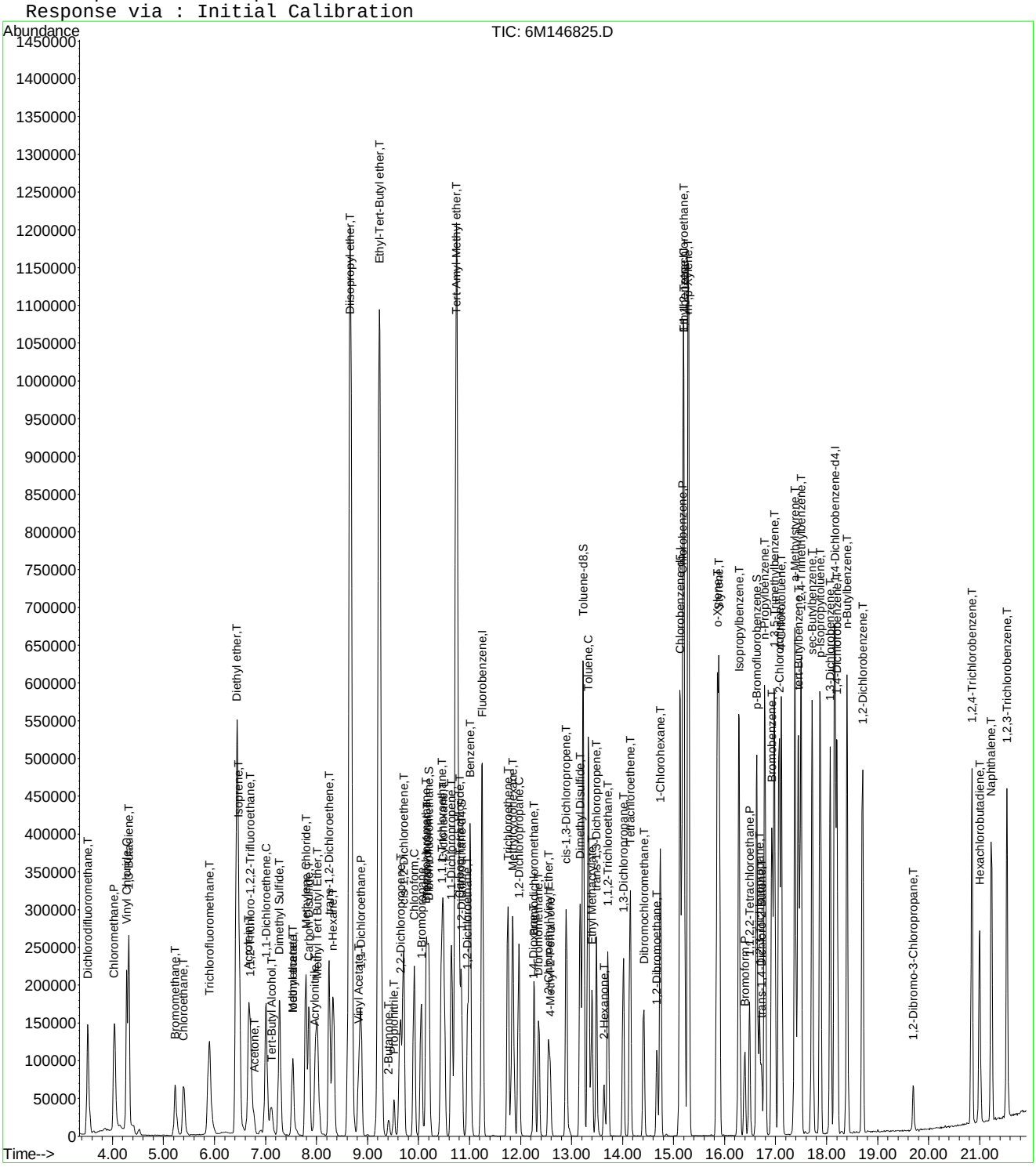
	Compound	R.T.	QIon	Response	Conc	Unit		Qvalue
45)	1,2-Dichloroethane	10.96	62	169358	20.1240	ug/L		90
46)	Benzene	11.01	78	536082	19.1772	ug/L		89
47)	Trichloroethene	11.75	130	131863	17.3300	ug/L		93
48)	Methylcyclohexane	11.84	83	205489	18.6922	ug/L		86
49)	1,2-Dichloropropane	11.97	63	132722	20.1179	ug/L		94
50)	1,4-Dioxane	12.25	88	10162	211.8433	ug/L		93
51)	Bromodichloromethane	12.26	83	177768	19.0881	ug/L		100
52)	Dibromomethane	12.35	93	76324	19.6433	ug/L		98
53)	2-Chloroethyl Vinyl Ether	12.55	63	66337	25.6350	ug/L		99
54)	4-Methyl-2-Pentanone	12.58	58	35820	21.1017	ug/L		88
55)	cis-1,3-Dichloropropene	12.90	75	219963	21.4478	ug/L		96
56)	Dimethyl Disulfide	13.17	79	127490	19.7045	ug/L		92
59)	Toluene	13.32	91	540377	18.9204	ug/L		100
60)	Ethyl Methacrylate	13.40	69	152441	22.0564	ug/L		79
62)	trans-1,3-Dichloropropene	13.49	75	180741	20.5239	ug/L		99
63)	1,1,2-Trichloroethane	13.71	97	102364	19.0188	ug/L		99
64)	2-Hexanone	13.64	43	57740	22.3406	ug/L		87
65)	1,3-Dichloropropane	14.02	76	186013	20.5890	ug/L		75
66)	Tetrachloroethene	14.15	166	125347	18.1115	ug/L		93
67)	Dibromochloromethane	14.42	129	120325	18.0847	ug/L		99
68)	1,2-Dibromoethane	14.67	107	97473	18.8606	ug/L		99
69)	1-Chlorohexane	14.74	91	188392	20.4267	ug/L		81
70)	Chlorobenzene	15.17	112	354311	18.1255	ug/L		99
71)	1,1,1,2-Tetrachloroethane	15.20	131	126953	18.1353	ug/L		97
72)	Ethylbenzene	15.20	106	196007	18.5225	ug/L		99
73)	m-,p-Xylene	15.29	106	472390	37.3473	ug/L		97
74)	o-Xylene	15.86	106	231015	18.9268	ug/L		97
75)	Styrene	15.89	104	392951	19.1773	ug/L		100
76)	Bromoform	16.40	173	69598	17.1654	ug/L		98
77)	Isopropylbenzene	16.29	105	571968	18.7257	ug/L		99
79)	1,1,2,2-Tetrachloroethane	16.49	83	122461	19.7677	ug/L		98
81)	1,2,3-Trichloropropane	16.68	110	35894	19.6204	ug/L		60
82)	trans-1,4-Dichloro-2-Buten	16.72	53	24085	18.3088	ug/L	#	1
83)	n-Propylbenzene	16.79	91	693438	19.2546	ug/L		99
84)	Bromobenzene	16.93	156	147434	18.2228	ug/L		74
85)	1,3,5-Trimethylbenzene	16.98	105	496837	19.4664	ug/L		98
86)	2-Chlorotoluene	17.07	91	470725	19.6301	ug/L		98
87)	4-Chlorotoluene	17.11	91	407094	19.2082	ug/L		99
88)	a-Methylstyrene	17.38	118	278277	19.7164	ug/L		100
89)	tert-Butylbenzene	17.45	134	99390	18.5847	ug/L		83
90)	1,2,4-Trimethylbenzene	17.50	105	514813	19.6404	ug/L		89
91)	sec-Butylbenzene	17.72	105	602966	19.1573	ug/L		96
92)	p-Isopropyltoluene	17.88	119	509032	19.2262	ug/L		97
93)	1,3-Dichlorobenzene	18.07	146	272688	17.8469	ug/L		95
94)	1,4-Dichlorobenzene	18.21	146	277949	17.9887	ug/L		95
95)	n-Butylbenzene	18.40	91	484178	20.0270	ug/L		96
96)	1,2-Dichlorobenzene	18.71	146	260213	18.1693	ug/L		95
97)	1,2-Dibromo-3-Chloropropan	19.70	75	22932	20.4364	ug/L		92
98)	1,2,4-Trichlorobenzene	20.85	180	189669	18.1002	ug/L		98
99)	Hexachlorobutadiene	21.00	225	68995	17.2388	ug/L		99
100)	Naphthalene	21.23	128	390633	18.6174	ug/L		100
101)	1,2,3-Trichlorobenzene	21.53	180	176926	17.4895	ug/L		98

(#) = qualifier out of range (m) = manual integration
6M146825.D 8260BWT.M Sat Apr 29 12:14:46 2017 Page 2

Quantitation Report (Not Reviewed)

Data File : K:\ORGANICS\VOLATILE\HPMS6\DATA\042817\6M146825.D Vial: 4
Acq On : 28 Apr 2017 21:09 Operator: JDS
Sample : WG612085-02 20ug/L LCS STD 8260 Inst : Hpms6
Misc : 1,1 STD81634 Multiplr: 1.00
MS Integration Params: RTEINT.P
Quant Time: Apr 28 21:31 2017 Quant Results File: 8260BWT.RES

Method : K:\ORGANICS\VOLATILE\HPMS6\METHODS\8260BWT.M (RTE Integrator)
Title : 8260B/624_WATER SOP:MSV01 04-05-17 - HPMS6
Last Update : Thu Apr 06 09:55:03 2017
Response via : Initial Calibration



Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	5.269	96	346601	25.00000	ug/L	0.0000
46) Chlorobenzene-d5	8.048	117	258540	25.00000	ug/L	0.0000
64) 1,4-Dichlorobenzene-d4	9.363	152	129780	25.00000	ug/L	0.0000
System Monitoring Compounds						
29) Dibromofluoromethane	4.336	111	94852	25.3397	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 118		Recovery = 101.359%			
34) 1,2-Dichloroethane-d4	4.950	65	90468	25.7847	ug/L	0.0000
Spiked Amount 25.000	Range 80 - 120		Recovery = 103.139%			
47) Toluene-d8	6.809	98	328663	25.4722	ug/L	0.0000
Spiked Amount 25.000	Range 88 - 110		Recovery = 101.889%			
66) p-Bromofluorobenzene	8.784	95	110409	25.4083	ug/L	0.0000
Spiked Amount 25.000	Range 86 - 115		Recovery = 101.633%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.094	85	101223	24.5904	ug/L	100
3) Chloromethane	1.209	50	92191	22.8848	ug/L	99
4) Vinyl Chloride	1.256	62	104947	23.5265	ug/L	100
5) 1,3-Butadiene	1.267	54	94386	34.4613	ug/L	97
6) Bromomethane	1.450	94	58983	17.7847	ug/L	100
7) Chloroethane	1.522	64	41596	19.6559	ug/L	95
8) Trichlorofluoromethane	1.606	101	120959	21.1396	ug/L	99
9) Diethyl ether	1.832	59	287200	104.0835	ug/L	98
10) 1,1-Dichloroethene	1.951	61	109306	20.4163	ug/L	97
11) Carbon Disulfide	1.965	76	192856	16.7835	ug/L	99
12) 1,1,2-Trichloro-1,2,2-...	1.982	101	73598	21.5623	ug/L	99
13) Iodomethane	2.052	142	105222	21.5645	ug/L	100
14) Acrolein	2.214	56	48344	141.8354	ug/L	99
15) Methylene Chloride	2.394	84	79967	19.6841	ug/L	95
16) Acetone	2.454	43	12144	17.4259	ug/L	97
17) trans-1,2-Dichloroethene	2.527	96	73116	20.0566	ug/L	98
18) Methyl acetate	2.564	43	37783	20.6803	ug/L #	96
19) Methyl Tert Butyl Ether	2.646	73	186149	20.1206	ug/L	98
20) 1,1-Dichloroethane	3.106	63	136050	20.7784	ug/L	99
21) Acrylonitrile	3.175	53	18096	20.3582	ug/L	99
22) Vinyl Acetate	2.602	86	11896	20.2755	ug/L	94
23) cis-1,2-Dichloroethene	3.720	96	82719	20.0460	ug/L	98
24) 2,2-Dichloropropane	3.853	77	110932	21.5421	ug/L	96
25) Cyclohexane	3.954	56	103005	18.4957	ug/L #	87
26) Bromochloromethane	3.972	130	54771	20.6008	ug/L	100
27) Chloroform	4.102	83	141783	20.7691	ug/L	100
28) Carbon Tetrachloride	4.241	117	110653	20.4976	ug/L	99
30) 1,1,1-Trichloroethane	4.336	97	125741	20.9504	ug/L	99
31) 1,1-Dichloropropene	4.496	75	96048	20.3769	ug/L	98
32) 2-Butanone	4.525	43	20334	19.5714	ug/L	98
33) Benzene	4.791	78	300186	20.3328	ug/L	100
35) 1,2-Dichloroethane	5.028	62	93258	20.2865	ug/L	99
36) Methylcyclohexane	5.419	83	108894	18.6625	ug/L	97
37) Trichloroethene	5.442	130	82955	18.7070	ug/L	98
38) Dibromomethane	5.856	93	46079	20.3782	ug/L	99
39) 1,2-Dichloropropane	5.964	63	79375	20.5015	ug/L	99
40) Bromodichloromethane	6.045	83	102197	19.7766	ug/L	100
41) 1,4-Dioxane	6.259	88	2152	111.5946	ug/L	99
42) 2-Chloroethyl Vinyl Ether	6.629	63	34045	19.3864	ug/L	99
43) cis-1,3-Dichloropropene	6.644	75	127621	21.9159	ug/L	99
44) 4-Methyl-2-Pentanone	7.223	58	19930	20.7181	ug/L	96
45) trans-1,3-Dichloropropene	7.238	75	101787	20.5610	ug/L	99
48) Toluene	6.855	91	330447	20.3863	ug/L	100
49) Tetrachloroethene	7.183	166	91889	19.8755	ug/L	99
50) 1,1,2-Trichloroethane	7.371	97	62533	19.9037	ug/L	99
51) Dibromochloromethane	7.504	129	83570	19.4874	ug/L	100

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration

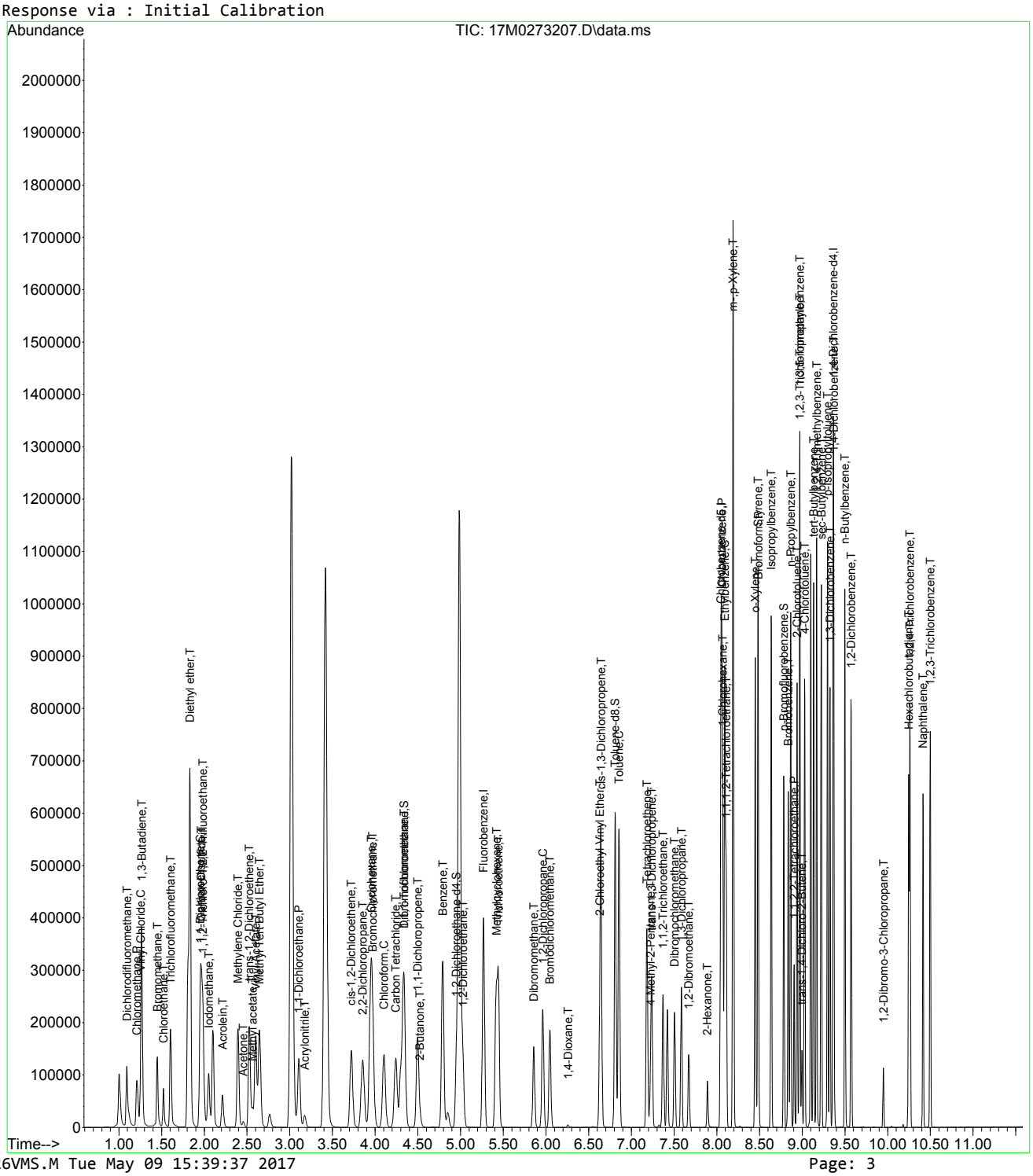
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
52) 1,3-Dichloropropane	7.585	76	104788	20.9861	ug/L		97
53) 1,2-Dibromoethane	7.672	107	63042	19.5848	ug/L		100
54) 2-Hexanone	7.889	43	34738	21.0549	ug/L		97
55) Chlorobenzene	8.060	112	212878	19.5732	ug/L		96
56) 1-Chlorohexane	8.068	69	19042	21.6858	ug/L		96
57) Ethylbenzene	8.095	106	114113	20.1563	ug/L		96
58) 1,1,1,2-Tetrachloroethane	8.109	131	82105	19.3931	ug/L		99
59) m-,p-Xylene	8.190	106	275998	40.3943	ug/L		96
60) o-Xylene	8.451	106	133395	19.8148	ug/L		98
61) Styrene	8.482	104	223947	20.7902	ug/L		99
62) Bromoform	8.485	173	59444	19.7051	ug/L		99
63) Isopropylbenzene	8.636	105	344077	19.7455	ug/L		98
65) 1,3,5-Trimethylbenzene	8.972	105	297248	20.5456	ug/L		99
67) Bromobenzene	8.836	156	99235	19.4386	ug/L		100
68) n-Propylbenzene	8.865	91	392898	20.5010	ug/L		98
69) 1,1,2,2-Tetrachloroethane	8.905	83	77760	22.2746	ug/L		100
70) 2-Chlorotoluene	8.940	91	236253	19.9720	ug/L		98
71) 1,2,3-Trichloropropane	8.969	110	20983	20.3322	ug/L		98
72) trans-1,4-Dichloro-2-B...	8.995	53	13981	18.1732	ug/L	#	94
73) 1,2,4-Trimethylbenzene	9.169	105	300256	20.5813	ug/L		99
74) 4-Chlorotoluene	9.027	91	246027	20.8325	ug/L		99
75) tert-Butylbenzene	9.134	134	56983	19.7073	ug/L		97
76) sec-Butylbenzene	9.224	105	362281	20.3258	ug/L		99
77) p-Isopropyltoluene	9.296	119	312830	20.5893	ug/L		99
78) 1,3-Dichlorobenzene	9.325	146	177861	19.9853	ug/L		100
79) 1,4-Dichlorobenzene	9.368	146	178305	19.8449	ug/L		100
80) n-Butylbenzene	9.499	91	272201	21.2262	ug/L		97
81) 1,2-Dichlorobenzene	9.574	146	172110	19.8431	ug/L		100
82) 1,2-Dibromo-3-Chloropr...	9.950	75	13245	20.6813	ug/L		93
83) Hexachlorobutadiene	10.246	225	67475	18.4537	ug/L		99
84) 1,2,4-Trichlorobenzene	10.260	180	127181	19.7384	ug/L		99
85) Naphthalene	10.414	128	242294	19.2838	ug/L		100
86) 1,2,3-Trichlorobenzene	10.498	180	120665	19.2798	ug/L		100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (Not Reviewed)

Data File : D:\MassHunter\GCMS\1...a\050117\17M0273207.D Vial: 5
Acq On : 01 May 2017 13:29 Operator: ADC
Sample : WG612250-03 20ug/L LCSDUP 8260 Inst : HPMS17
Misc : 1,1 STD81596 Multiplr: 1.00
Integrator: RTE
Quant Time: May 09 15:39:36 2017

Quant Method : D:\MassHunter\GCMS\1\methods\826VMS.M
Quant Title : 8260B/624 SOP:OVL MSV01 WATER 04/25/17 HPMS17
QLast Update : Wed Apr 26 08:51:20 2017
Response via : Initial Calibration



826VMS.M Tue May 09 15:39:37 2017 Page: 3

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
July 25, 2017

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001 - BIO-CHEM TESTING WVDEP 220	002 - REIC Consultants, Inc. WVDEP 060
003 - Sturm Environmental	004 - MICROBAC PITTSBURGH
005 - ES LABORATORIES	006 - ALCOSAN LABORATORIES
007 - ALS LABORATORIES	008 - BENCHMARK LABORATORIES
010 - MICROBAC CHICAGOLAND	AC - AMBER R. CARMICHAEL
ADC - ANTHONY D. CANTER	ADG - APRIL D. GREENE
ALS - ADRIANE L. STEED	AWE - ANDREW W. ESSIG
AZH - AFTER HOURS	BJO - BRIAN J. OGDEN
BLG - BRENDA L. GREENWALT	BNB - Brandi N. Bentley
BRG - BRENDA R. GREGORY	CAS - Craig A. Smith
CEB - CHAD E. BARNES	CLC - CHRYS L. CRAWFORD
CLS - CARA L. STRICKLER	CPD - CHAD P. DAVIS
CSH - CHRIS S. HILL	CV - Carl Volkman
DAK - DEAN A. KETELSEN	DCM - DAVID C. MERCKLE
DEV - DAVID E. VANDENBERG	DIH - DEANNA I. HESSON
DLB - DAVID L. BUMGARNER	DLP - DOROTHY L. PAYNE
DSM - DAVID S. MOSSOR	DTG - DOMINIC T. GEHRET
ECL - ERIC C. LAWSON	EPT - ETHAN P. TIDD
ERP - ERIN R. PORTER	FJB - FRANCES J. BOLDEN
HRF - HEATHER R. FAIRCHILD	JDH - JUSTIN D. HESSON
JDS - JARED D. SMITH	JKP - JACQUELINE K. PARSONS
JLD - JESSICA L. DELONG	JST - JOSHUA S. TAYLOR
JTP - JOSHUA T. PEMBERTON	JWR - JOHN W. RICHARDS
JWS - JACK W. SHEAVES	JYH - JI Y. HU
KAK - KATHY A. KIRBY	KDD - Katelyn D. Daley
KEB - KATIE E. BARNES	KHR - KIM H. RHODES
KKB - KERRI K. BUCK	KRA - KATHY R. ALBERTSON
KRP - KATHY R. PARSONS	LJH - Lacey J. Hendershot
LLS - LARRY L. STEPHENS	LSB - LESLIE S. BUCINA
LSJ - LAURA S. JONES	MAP - MARLA A. PORTER
MBK - MORGAN B. KNOWLTON	MES - MARY E. SCHILLING
MMB - MAREN M. BEERY	MRT - MICHELLE R. TAYLOR
OJE - OMOYEMWEN J. ENGLISH	PDM - PIERCE D. MORRIS
PIT - MICROBAC WARRENDALE	REK - BOB E. KYER
RLB - BOB BUCHANAN	RNP - RICK N. PETTY
SAV - SARAH A. VANDENBERG	SCA - SUEELLEN C. ADAMS
SCB - SARAH C. BOGOLIN	SCJ - SUE ELLEN C. JOHNSON
SDC - SHALYN D. CONLEY	TB - TODD BOYLE
TMB - TIFFANY M. BAILEY	TMM - TAMMY M. MORRIS
VC - VICKI COLLIER	WTD - WADE T. DELONG
XXX - UNAVAILABLE OR SUBCONTRACT	ZTB - ZACH T. BARNES

Microbac Laboratories Inc.
List of Valid Qualifiers
July 25, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 1 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 D&O	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-57-ODLB-14	4/22/17	0957	G	W	N		x		
MW-227-ODLB-14	4/22/17	1004	G	W	N		x		
MW-228-ODLB-14	4/22/17	1010	G	W	N		x		
MW-174-ODLB-14	4/22/17	1016	G	W	N		x		
MW-15-ODLB-14	4/22/17	1023	G	W	N		x		
MW-91-ODLB-14	4/22/17	1030	G	W	N		x		
DUP-3	4/22/17	1032	G	W	N		x		
MW-06-ODLB-14	4/22/17	1040	G	W	N		x		
MW-87-ODLB-14	4/22/17	1045	G	W	N		x		
MW-176-ODLB-14	4/22/17	1053	G	W	N		x		
MW-225-ODLB-14	4/22/17	1110	G	W	N	x	x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:
Relinquished by:	Date/Time: 4/24/17 1610	Company HDR	Received by: Microbac OVD Received: 04/25/2017 10:39 By: BRENDA GREGORY 221000099952 Brenda Gregory
Relinquished by:	Date/Time:	Company	
Relinquished by:	Date/Time:	Company	

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

L17041203 / Revision: 1 / 957 total pages

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Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 2 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 05/10	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-223-ODLB-14	4/22/17	1120	G	W	N		x		
MW-226-ODLB-14	4/22/17	1125	G	W	N		x		
MW-222-ODLB-14	4/22/17	1130	G	W	N		x		
DUP-7	4/22/17	1133	G	W	N		x		
MW-224-ODLB-14	4/22/17	1139	G	W	N		x		
MW-134-ODLB-14	4/22/17	1144	G	W	N		x		
MW-187-ODLB-14	4/22/17	1346	G	W	N		x		
DUP-6	4/22/17	1350	G	W	N		x		
MW-13-ODLB-14	4/22/17	1353	G	W	N		x		
MW-04-ODLB-14	4/22/17	1359	G	W	N		x		
MW-221-ODLB-14	4/22/17	1405	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For _____ Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by:	Date/Time: 4/24/17 1610	Company HDR	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: ∆ Yes ∆ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Generated: 07/25/2017 16:47

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 3 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/OD	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-180-ODLB-14	4/22/17	1412	G	W	N		x		
MW-03-ODLB-14	4/22/17	1420	G	W	N		x		
MW-220-ODLB-14	4/22/17	1428	G	W	N		x		
MW-07-ODLB-14	4/22/17	1432	G	W	N		x		
MW-230-ODLB-14	4/22/17	1440	G	W	N		x		
MW-31-ODLB-14	4/22/17	1514	G	W	N		x		
MW-147-ODLB-14	4/22/17	1523	G	W	N		x		
MW-148-ODLB-14	4/22/17	1530	G	W	N		x		
MW-241-ODLB-14	4/22/17	1537	G	W	N		x		
MW-160-ODLB-14	4/22/17	1545	G	W	N		x		
MW-242-ODLB-14	4/22/17	1552	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

L17041203 / Revision: 1 / 957 total pages

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Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 4 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			Other:
Project Name: LTM 2017 OD/OF	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-150-ODLB-14	4/22/17	1601	G	W	N		x		
DUP-4	4/22/17	1605	G	W	N		x		
MW-54-ODLB-14	4/22/17	1610	G	W	N		x		
MW-155-ODLB-14	4/22/17	1616	G	W	N		x		
MW-243-ODLB-14	4/22/17	1624	G	W	N		x		
MW-245-ODLB-14	4/22/17	1633	G	W	N		x		
MW-159-ODLB-14	4/22/17	1640	G	W	N		x		
MW-149-ODLB-14	4/22/17	1646	G	W	N		x		
MW-244-ODLB-14	4/23/17	817	G	W	N		x		
MW-251-ODLB-14	4/23/17	825	G	W	N		x		
MW-250-ODLB-14	4/23/17	838	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Generated: 07/25/2017 16:47

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Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 5 of 9
Company: HDR				Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/2D	Project #:			
Site: DDMT	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2O3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - pH 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
DUP-9	4/23/17	842	G	W	N		x		
MW-158-ODLB-14	4/23/17	851	G	W	N		x		
MW-158A-ODLB-14	4/23/17	856	G	W	N		x		
MW-246-ODLB-14	4/23/17	902	G	W	N		x		
DUP-8	4/23/17	905	G	W	N		x		
MW-237-ODLB-14	4/23/17	916	G	W	N		x		
MW-166-ODLB-14	4/23/17	925	G	W	N		x		
MW-166A-ODLB-14	4/23/17	930	G	W	N		x		
MW-151-ODLB-14	4/23/17	942	G	W	N		x		
MW-247-ODLB-14	4/23/17	948	G	W	N	x	x		
MW-165A-ODLB-14	4/23/17	1001	G	W	N		x		

Possible Hazard Identification *Unconfirmed*	***Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)*** ☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For _____ Months*
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
DF/2D	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 6 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL; B - NaOH; C - Zn Acetate; D - Nitric Acid; E - NaHSO4; F - MeOH; G - Amchlor; H - Ascorbic Acid; I - Ice; J - DI Water; K - EDTA; L - EDA; M - Hexane; N - None; O - AsNaO2; P - Na2O4S; Q - Na2SO3; R - Na2S2O3; S - H2SO4; T - TSP Dodecahydrate; U - Acetone; V - MCAA; W - pH 4-5; Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/DP	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-165-ODLB-14	4/23/17	1010	G	W	N	x	x		
MW-152-ODLB-14	4/23/17	1129	G	W	N		x		
MW-79-ODLB-14	4/23/17	1135	G	W	N		x		
MW-153-ODLB-14	4/23/17	1146	G	W	N		x		
MW-249-ODLB-14	4/23/17	1339	G	W	N		x		
MW-145-ODLB-14	4/23/17	1345	G	W	N		x		
MW-235-ODLB-14	4/23/17	1354	G	W	N		x		
MW-80-ODLB-14	4/23/17	1405	G	W	N	x	x		
MW-167-ODLB-14	4/23/17	1417	G	W	N		x		
MW-248-ODLB-14	4/23/17	1429	G	W	N		x		
MW-44-ODLB-14	4/23/17	1438	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 7 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			Other:
Project Name: LTM 2017 05/00	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
√ MW-171-ODLB-14	4/23/17	1448	G	W	N		x		
√ DUP-5	4/23/17	1454	G	W	N		x		
√ MW-129-ODLB-14	4/23/17	1504	G	W	N		x		
√ MW-130-ODLB-14	4/23/17	1511	G	W	N	x	x		
√ MW-28-ODLB-14	4/23/17	1520	G	W	N		x		
√ MW-67-ODLB-14	4/23/17	1553	G	W	N		x		
√ MW-154-ODLB-14	4/23/17	1559	G	W	N		x		
√ MW-182-ODLB-14	4/23/17	1609	G	W	N		x		
√ MW-08-ODLB-14	4/22/17	1557	G	W	N		x		
√ MW-58-ODLB-14	4/23/17	936	G	W	N		x		
√ DUP-1	4/22/17	1657	G	W	N		x		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 8 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			
City: Englewood	TAT Requested (days): Normal			
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/QD	Project #:			
Site: DDMT	SSOW#:			

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)

Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-126-ODLB-14	4/23/17	1442	G	W	N		x		
✓ MW-169-ODLB-14	4/23/17	1028	G	W	N		x		
✓ MW-170-ODLB-14	4/23/17	1038	G	W	N		x		
✓ MW-78-ODLB-14	4/23/17	1049	G	W	N		x		
✓ MW-76-ODLB-14	4/23/17	1103	G	W	N		x		
✓ MW-77-ODLB-14	4/23/17	1115	G	W	N		x		
✓ MW-70-ODLB-14	4/23/17	1128	G	W	N		x		
✓ MW-71-ODLB-14	4/23/17	1142	G	W	N		x		
✓ MW-163-ODLB-14	4/23/17	1508	G	W	N		x		
✓ MW-144-ODLB-14	4/23/17	1520	G	W	N		x		
✓ MW-190-ODLB-14	4/23/17	1530	G	W	N		x		

Possible Hazard Identification

Unconfirmed

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	Relinquished by:	4/24/17 1610	HDR			
	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

L17041203 / Revision: 1 / 957 total pages

Generated: 07/25/2017 16:47

Microbac

Chain of Custody Record

Client Information (Sub Contract Lab)	Sampler: Justin Bills	Lab PM:	Carrier Tracking No(s):	COC No:
Client Contact: Shipping/Receiving	Phone:	E-Mail:		Page: Page 9 of 9
Company: HDR			Analysis Requested	Job #:
Address: 9781 S. Meridian Blvd. Ste 400	Due Date Requested:			Preservation Codes:
City: Englewood	TAT Requested (days): Normal			A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Z - other (specify)
State, Zip: Colorado 80112				
Phone: 404-295-3279	PO #:			Other:
Email: thomas.holmes@hdrinc.com	WO #:			
Project Name: LTM 2017 DF/OD	Project #:			
Site: DDMT	SSOW#:			

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	VOC_8260	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
✓ MW-164-ODLB-14	4/23/17	1540	G	W	N		x		
✓ MW-184-ODLB-14	4/23/17	1545	G	W	N		x		
✓ MW-157-ODLB-14	4/23/17	1600	G	W	N		x		
✓ MW-68-ODLB-14	4/23/17	1610	G	W	N		x		
✓ DUP-2	4/23/17	1710	G	W	N		x		
✓ MW-69-ODLB-14	4/23/17	1630	G	W	N		x		
✓ TB-1-ODLB-14	4/24/17	1600	G	W	N		x		
✓ EB1-ODLB-14	4/23/17	0750	G	W	N		x		
TB2-ODLB-14	4/24/17	1600	G	W			X		
TB3-ODLB-14	4/24/17	1600	G	W			X		

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Unconfirmed	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 4	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
[signature]	4/24/17 1610	HDR			
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

MICROBAC

Cooler ID 9959

COOLER TEMP >6° C LOG

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

CAD 4/25/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

CAD 4/25/17

PRESERVATIVE EXCEPTIONS

__✓__ NONE

____ AS NOTED

CAD 4/25/17

Document Control # 1957
Last 10-07-2016

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Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-01	898779	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-02	898780	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-03	898781	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:54	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-04	898782	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-05	898783	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Samplenum	Container ID	Products
L17041203-06	898784	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:44	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
3	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-07	898785	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Samplenum	Container ID	Products
L17041203-08	898786	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-09	898787	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:19	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Samplenum	Container ID	Products
L17041203-10	898788	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-11	898789	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-12	898790	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-13	898791	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Samplenum	Container ID	Products
L17041203-14	898792	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-15	898793	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Samplenum	Container ID	Products
L17041203-16	898794	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:55	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-17	898795	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:44	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
3	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Samplenum	Container ID	Products
L17041203-18	898796	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-19	898797	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-20	898798	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-21	898799	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-22	898800	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-23	898801	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:20	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Samplenum	Container ID	Products
L17041203-24	898802	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-25	898803	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	L1	25-APR-2017 15:44	BRG		
2	ANALYZ	L1	ORG4	26-APR-2017 07:21	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:21	CLS	AWE	
4	DISP	A2	DISP	11-JUL-2017 10:56	CLS	CLS	

Samplenum	Container ID	Products
L17041203-26	898804	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-27	898805	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:13	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Samplenum	Container ID	Products
L17041203-28	898806	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 13:36	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:36	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-29	898807	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Samplenum	Container ID	Products
L17041203-30	898808	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-31	898809	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:24	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Samplenum	Container ID	Products
L17041203-32	898810	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-33	898811	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Samplenum	Container ID	Products
L17041203-34	898812	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-35	898813	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	25-APR-2017 15:44	BRG		
2	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
3	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:35	BJO	JST	

Samplenum	Container ID	Products
L17041203-36	898814	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-37	898815	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:14	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Samplenum	Container ID	Products
L17041203-38	898816	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-39	898817	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Samplenum	Container ID	Products
L17041203-40	898818	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-41	898819	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Samplenum	Container ID	Products
L17041203-42	898820	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-43	898821	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

Samplenum	Container ID	Products
L17041203-44	898822	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER		25-APR-2017 15:44	BRG		

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-45	898823	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:34	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Samplenum	Container ID	Products
L17041203-46	898824	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:15	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-47	898825	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:23	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Samplenum	Container ID	Products
L17041203-48	898826	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17041203
Account: 2694
Project: 2694.011
Samples: 49
Due Date: 02-MAY-2017

Samplenum	Container ID	Products
L17041203-49	898827	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	25-APR-2017 15:44	BRG		
2	ANALYZ	V1	ORG4	26-APR-2017 07:16	HRF	CLS	
3	STORE	ORG4	A2	09-MAY-2017 07:22	CLS	AWE	
4	DISP	A2	DISP	05-JUL-2017 13:33	BJO	JST	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac

Laboratory Report Number: L17100532 *(Revised)*

Revised report to exclude 1,4-dioxane.

Diane Short & Associates
CT Laboratories
1978 S. Garrison St
Lakewood, CO 80227

Please find enclosed the analytical results for the samples you submitted to Microbac Laboratories. Review and compilation of your report was completed by Microbac's Ohio Valley Division (OVD). If you have any questions, comments, or require further assistance regarding this report, please contact your service representative listed below.

Laboratory Contact:
Michelle Taylor – Client Services Specialist
(740) 373-4071
Michelle.Taylor@microbac.com

I certify that all test results meet all of the requirements of the accrediting authority listed below. All results for soil samples are reported on a 'dry-weight' basis unless specified otherwise. Analytical results for water and wastes are reported on a 'as received' basis unless specified otherwise. A statement of uncertainty for each analysis is available upon request. This laboratory report shall not be reproduced, except in full, without the written approval of Microbac Laboratories. The reported results are related only to the samples analyzed as received.

This report was certified on October 23 2017

Leslie Bucina – Managing Director

State of Origin: TN
Accrediting Authority: N/A ID:N/A
QAPP: AFCEE Ver. 4.0

Microbac

Lab Report #: L17100532
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Record of Sample Receipt and Inspection

Comments/Discrepancies

This is the record of the shipment conditions and the inspection records for the samples received and reported as a sample delivery group (SDG). All of the samples were inspected and observed to conform to our receipt policies, except as noted below.

The following discrepancies were noted:

Discrepancy	Resolution
Sample ID: MW-163-ODLS-15. Both voa vials were received with the lids cracked but samples are intact. BRG	Client notified, please proceed. ALS
Sample ID: DR1-6A-LA-26. All 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-100B-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-21-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DUP-6-LA-26. All 3 voa vials received w/headspace >6mm. BRG Sample ID: MW-165-ODLS-15. 2 of 3 voa vials received w/headspace >6mm. BRG Sample ID: PMW21-01-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DUP-1-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: DR1-5-LA-26. 1 of 3 voa vials received w/headspace >6mm. BRG Sample ID: TB-1-ODLS-15. 2 of 3 voa vials received w/headspace >6mm. BRG	Client notified, when possible please proceed with analyzing vials without headspace first. ALS

Coolers

Cooler #	Temperature Gun	Temperature	COC #	Airbill #	Temp Required?
0017448	H	0.0		100189371091000457500078799301151 5	X

Inspection Checklist

#	Question	Result
1	Were shipping coolers sealed?	Yes
2	Were custody seals intact?	Yes
3	Were cooler temperatures in range of 0-6?	Yes
4	Was ice present?	Yes
5	Were COC's received/information complete/signed and dated?	Yes
6	Were sample containers intact and match COC?	No
7	Were sample labels intact and match COC?	Yes

8	Were the correct containers and volumes received?	Yes
9	Were samples received within EPA hold times?	Yes
10	Were correct preservatives used? (water only)	Yes
11	Were pH ranges acceptable? (voa's excluded)	NA
12	Were VOA samples free of headspace (less than 6mm)?	No

Microbac

Lab Report #: L17100532
Lab Project #: 2694.011
Project Name: Memphis Depot
Lab Contact: Michelle Taylor

Samples Received

Client ID	Laboratory ID	Date Collected	Date Received
MW-166-ODLS-15	L17100532-01	10/05/2017 16:58	10/07/2017 09:47
MW-249-ODLS-15	L17100532-02	10/05/2017 16:40	10/07/2017 09:47
MW-246-ODLS-15	L17100532-03	10/05/2017 16:27	10/07/2017 09:47
MW-166A-ODLS-15	L17100532-04	10/05/2017 16:44	10/07/2017 09:47
MW-150-ODLS-15	L17100532-05	10/05/2017 15:30	10/07/2017 09:47
MW-159-ODLS-15	L17100532-06	10/05/2017 15:51	10/07/2017 09:47
MW-149-ODLS-15	L17100532-07	10/05/2017 16:34	10/07/2017 09:47
DUP-2-ODLS-15	L17100532-08	10/05/2017 17:36	10/07/2017 09:47
MW-163-ODLS-15	L17100532-09	10/05/2017 15:58	10/07/2017 09:47
MW-163-ODLS-15-MSD	L17100532-10	10/05/2017 15:58	10/07/2017 09:47
MW-70-ODLS-15	L17100532-11	10/06/2017 10:35	10/07/2017 09:47
MW-57-ODLS-15	L17100532-12	10/06/2017 09:50	10/07/2017 09:47
DUP-1-ODLS-15	L17100532-13	10/06/2017 10:20	10/07/2017 09:47
MW-144-ODLS-15	L17100532-14	10/06/2017 11:00	10/07/2017 09:47
MW-165-ODLS-15	L17100532-15	10/06/2017 10:50	10/07/2017 09:47
MW-190-ODLS-15	L17100532-16	10/06/2017 11:10	10/07/2017 09:47
MW-87-ODLS-15	L17100532-17	10/06/2017 10:15	10/07/2017 09:47
MW-77-ODLS-15	L17100532-18	10/06/2017 11:20	10/07/2017 09:47
MW-06-ODLS-15	L17100532-19	10/06/2017 10:00	10/07/2017 09:47
MW-163-ODLS-15-MS	L17100532-20	10/05/2017 15:58	10/07/2017 09:47
TB-1-ODLS-15	L17100532-21	10/06/2017 16:20	10/07/2017 09:47

Login Number: L17100532
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recovery above range was observed for Chloromethane in the ICV WG633150-12 analyzed 10/10/2017 on HPMS6. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recovery marginally below range was observed for Bromomethane in the CCV WG633849-02 analyzed 10/13/2017 on HPMS6. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Samples 09 and 20 were received with cracked lids.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130585
Approved By: Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100532-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 20:43
Collect Date:	10/05/2017 16:58	**Dilution:**	1	**File ID:**	6M150580
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.21		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.42		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.26		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.266	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.0	85	115	
1,2-Dichloroethane-d4	99.2	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-249-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 20:13
Collect Date:	10/05/2017 16:40	**Dilution:**	1	**File ID:**	6M150579
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.383	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.07		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.701	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.85		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.264	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.3	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	98.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-246-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 19:44
Collect Date:	10/05/2017 16:27	**Dilution:**	1	**File ID:**	6M150578
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.60		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.597	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166A-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 19:15
Collect Date:	10/05/2017 16:44	**Dilution:**	1	**File ID:**	6M150577
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.334	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	10.0		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.62		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.78		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-150-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 18:46
Collect Date:	10/05/2017 15:30	**Dilution:**	1	**File ID:**	6M150576
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	2.57		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.21	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.642		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.5	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	99.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-159-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 21:12
Collect Date:	10/05/2017 15:51	**Dilution:**	1	**File ID:**	6M150581
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	8.36		0.500	0.200
1,1,2-Trichloroethane	79-00-5	3.25		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.64		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.138	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	146		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.631	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.41		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	5.96		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-149-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 18:16
Collect Date:	10/05/2017 16:34	**Dilution:**	1	**File ID:**	6M150575
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.347	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.99	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	14.4		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.36		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.68		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.274	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.2	85	115	
1,2-Dichloroethane-d4	96.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-2-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 17:47
Collect Date:	10/05/2017 17:36	**Dilution:**	1	**File ID:**	6M150574
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.320	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	14.7		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.74		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.333	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.3	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.9	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 17:17
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150573
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.265	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.52	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.210	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.317	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.4	85	115	
1,2-Dichloroethane-d4	96.8	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 13:24
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150565
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	18.7		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.6		1.00	0.250
1,1-Dichloroethane	75-34-3	18.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.6		1.00	0.500
1,1-Dichloropropene	563-58-6	19.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	20.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	19.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.5		1.00	0.200
1,2-Dibromoethane	106-93-4	19.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	17.2		1.00	0.250
2-Hexanone	591-78-6	20.7		10.0	2.50
2-Chlorotoluene	95-49-8	17.9		1.00	0.125
4-Chlorotoluene	106-43-4	22.1		1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2	19.0		0.400	0.125
Bromobenzene	108-86-1	19.5		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	18.8		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	18.6		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.0		1.00	0.500
Carbon tetrachloride	56-23-5	18.4		1.00	0.250
Chlorobenzene	108-90-7	19.4		0.500	0.125
Chloroethane	75-00-3	22.7		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	24.1		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.8		0.500	0.250
Dibromochloromethane	124-48-1	19.2		0.500	0.250
Dibromomethane	74-95-3	19.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	25.1		1.00	0.250
Ethylbenzene	100-41-4	20.0		1.00	0.250
Hexachlorobutadiene	87-68-3	19.9		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	20.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	20.2		1.00	0.250
n-Propylbenzene	103-65-1	20.9		1.00	0.125
m-,p-Xylene	179601-23-1	39.6		2.00	0.500
Naphthalene	91-20-3	21.7		1.00	0.200
o-Xylene	95-47-6	20.6		1.00	0.250
p-Isopropyltoluene	99-87-6	20.5		1.00	0.250
sec-Butylbenzene	135-98-8	20.3		1.00	0.250
Styrene	100-42-5	21.2		1.00	0.125
Trichloroethene	79-01-6	19.9		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	19.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	19.8		1.00	0.250
Vinyl chloride	75-01-4	23.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.2	85	115	
1,2-Dichloroethane-d4	93.5	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	99.9	76	119	

Certificate of Analysis

Sample #:	L17100532-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-70-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 16:48
Collect Date:	10/06/2017 10:35	**Dilution:**	1	**File ID:**	6M150572
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.477	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.12	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.215	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-57-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 16:20
Collect Date:	10/06/2017 09:50	**Dilution:**	1	**File ID:**	6M150571
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.382	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.659		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.04		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.1	85	115	
1,2-Dichloroethane-d4	96.0	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-1-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 15:51
Collect Date:	10/06/2017 10:20	**Dilution:**	1	**File ID:**	6M150570
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.81		0.500	0.200
1,1,2-Trichloroethane	79-00-5	2.48		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.274	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	108		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.69		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.355	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.95		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.438	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.301	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.1	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-144-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 20:21
Collect Date:	10/06/2017 11:00	**Dilution:**	1	**File ID:**	6M150642
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.57		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.490		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.345	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	20.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-165-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 18:24
Collect Date:	10/06/2017 10:50	**Dilution:**	1	**File ID:**	6M150638
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.19	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.133	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.01		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.9	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-190-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 18:53
Collect Date:	10/06/2017 11:10	**Dilution:**	1	**File ID:**	6M150639
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.16		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.25	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.253	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	11.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.486	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-87-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 20:50
Collect Date:	10/06/2017 10:15	**Dilution:**	1	**File ID:**	6M150643
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.89		0.500	0.200
1,1,2-Trichloroethane	79-00-5	2.40		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.272	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.93	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	110		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.48		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.325	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.00		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.432	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.298	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.3	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-77-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 19:22
Collect Date:	10/06/2017 11:20	**Dilution:**	1	**File ID:**	6M150640
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.705		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.307		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.293	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-06-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 19:52
Collect Date:	10/06/2017 10:00	**Dilution:**	1	**File ID:**	6M150641
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.03		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.08		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.375	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 12:55
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150564
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.5		0.500	0.250
1,1,1-Trichloroethane	71-55-6	18.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.3		1.00	0.250
1,1-Dichloroethane	75-34-3	18.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.7		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	20.2		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.4		2.00	1.00
1,2-Dichloropropane	78-87-5	19.3		1.00	0.200
1,2-Dibromoethane	106-93-4	19.8		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.4		1.00	0.250
1,3-Dichloropropane	142-28-9	20.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	21.2		1.00	0.125
2,2-Dichloropropane	594-20-7	18.4		1.00	0.250
2-Hexanone	591-78-6	20.5		10.0	2.50
2-Chlorotoluene	95-49-8	19.4		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	22.9		10.0	2.50
Benzene	71-43-2	18.9		0.400	0.125
Bromobenzene	108-86-1	19.3		1.00	0.125
Bromochloromethane	74-97-5	19.4		1.00	0.200
Bromodichloromethane	75-27-4	18.6		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	16.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.5		1.00	0.500
Carbon tetrachloride	56-23-5	18.5		1.00	0.250
Chlorobenzene	108-90-7	19.5		0.500	0.125
Chloroethane	75-00-3	22.9		1.00	0.500
Chloroform	67-66-3	18.4		0.300	0.125
Chloromethane	74-87-3	23.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.6		0.500	0.250
Dibromochloromethane	124-48-1	19.0		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	26.3		1.00	0.250
Ethylbenzene	100-41-4	19.8		1.00	0.250
Hexachlorobutadiene	87-68-3	19.6		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.2		5.00	0.500
MEK (2-Butanone)	78-93-3	20.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	20.1		1.00	0.250
n-Propylbenzene	103-65-1	20.7		1.00	0.125
m-,p-Xylene	179601-23-1	39.6		2.00	0.500
Naphthalene	91-20-3	22.1		1.00	0.200
o-Xylene	95-47-6	20.7		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	20.9		1.00	0.125
Trichloroethene	79-01-6	19.9		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	19.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	24.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.1	85	115	
1,2-Dichloroethane-d4	94.4	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	98.9	76	119	

Certificate of Analysis

Sample #:	L17100532-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	TB-1-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 14:22
Collect Date:	10/06/2017 16:20	**Dilution:**	1	**File ID:**	6M150567
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	96.3	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1 Volatiles Data

2.1.1 Volatiles GCMS Data (8260)

2.1.1.1 Summary Data

Login Number: L17100532
Department: Volatiles
Analyst: Tiffany Bailey

METHOD

Preparation SW-846 5030B/5030C/5035A

Analysis SW-846 8260B

HOLDING TIMES

Sample Preparation: All holding times were met.

Sample Analysis: All holding times were met.

PREPARATION

Sample preparation proceeded normally.

CALIBRATION

Initial Calibration: For all compounds that yielded a %RSD greater than 15%, linear or higher order equations were applied. All acceptance criteria were met.

Alternate Source Standards: Recovery above range was observed for Chloromethane in the ICV WG633150-12 analyzed 10/10/2017 on HPMS6. Outliers were not detected above the RLs in the associated analyses. Please see the applicable QC report for a detailed presentation of the failures.

Continuing Calibration and Tune: Recovery marginally below range was observed for Bromomethane in the CCV WG633849-02 analyzed 10/13/2017 on HPMS6. Please see the applicable QC report for a detailed presentation of the failures.

BATCH QA/QC

Method Blank: All acceptance criteria were met.

Laboratory Control Sample: All acceptance criteria were met.

Matrix Spikes: All acceptance criteria were met.

SAMPLES

Internal Standards: All acceptance criteria were met.

Surrogates: All acceptance criteria were met.

Other: Samples 09 and 20 were received with cracked lids.

Manual Integration Reason Codes

Reason #1: Data System Fails to Select Correct Peak. In some cases the chromatography system selects and integrates the 'wrong peak'. In this case the analyst must correct the selection and force the system to integrate the proper peak. Other times the system may miss the peak completely.

Reason #2: Data System Splits the Peak Incorrectly or Integrates a False Peak as a Rider Peak. This phenomena is common at low concentrations where the signal:noise ratio is low. A single compound (peak) is incorrectly split into multiple peaks or integrated as a main peak with one or more rider peaks resulting in low areacounts for the target compound.

Reason #3: Improperly Integrated Isomers and/or coeluting compounds. This system often fails to distinguish coeluting compounds and or isomers. The integration areas and concentrations are wrong, and they must be corrected by manual integration. Prime examples are benzo(k)fluoranthene and benzo(b)fluoranthene which are often unresolved and integrated improperly when both are present at low concentrations in standards or samples.

Reason #4: System Establishes Incorrect Baseline. There are numerous situations in chromatography where the system establishes the baseline incorrectly. Some baseline errors will be obvious to the analyst and should be corrected via manual procedures.

Reason #5: Miscellaneous. Other situations involving integration errors may require in-depth review and technical judgment. These cases should be brought to the attention of the laboratory management. If the form of manual integration is not clearly covered by these four cases, then review and approval by the Managing Director or the QAO will be required.

I certify that this data package is in compliance with the terms and conditions agreed to by the client and Microbac Laboratories Inc., both technically and for completeness, except for the conditions noted above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or designated person, as verified by the following signature.

Narrative ID: 130585
Approved By: Sarah Vandenberg

Certificate of Analysis

Sample #:	L17100532-01	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 20:43
Collect Date:	10/05/2017 16:58	**Dilution:**	1	**File ID:**	6M150580
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.21		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	3.42		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.26		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.266	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.0	85	115	
1,2-Dichloroethane-d4	99.2	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-02	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-249-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 20:13
Collect Date:	10/05/2017 16:40	**Dilution:**	1	**File ID:**	6M150579
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.383	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	3.07		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.701	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.85		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.264	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	98.3	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	98.7	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-03	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-246-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 19:44
Collect Date:	10/05/2017 16:27	**Dilution:**	1	**File ID:**	6M150578
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.60		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.76	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.597	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	98.9	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-04	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-166A-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 19:15
Collect Date:	10/05/2017 16:44	**Dilution:**	1	**File ID:**	6M150577
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.334	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.00	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	10.0		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.62		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.78		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	98.6	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-05	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-150-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 18:46
Collect Date:	10/05/2017 15:30	**Dilution:**	1	**File ID:**	6M150576
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	2.57		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.21	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.642		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.5	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	99.5	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-06	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-159-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 21:12
Collect Date:	10/05/2017 15:51	**Dilution:**	1	**File ID:**	6M150581
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	8.36		0.500	0.200
1,1,2-Trichloroethane	79-00-5	3.25		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4	2.64		1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.90	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.138	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	21.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	146		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.631	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	2.41		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4	5.96		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-07	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-149-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 18:16
Collect Date:	10/05/2017 16:34	**Dilution:**	1	**File ID:**	6M150575
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.347	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.99	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	14.4		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.36		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.68		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.274	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.2	85	115	
1,2-Dichloroethane-d4	96.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-08	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-2-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 17:47
Collect Date:	10/05/2017 17:36	**Dilution:**	1	**File ID:**	6M150574
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.320	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	14.7		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	8.63		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.74		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.333	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.3	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.9	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-09	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 17:17
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150573
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.265	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.52	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.210	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.05		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.317	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.4	85	115	
1,2-Dichloroethane-d4	96.8	72	119	
Toluene-d8	99.9	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-10	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15-MSD	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 13:24
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150565
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.7		0.500	0.250
1,1,1-Trichloroethane	71-55-6	18.7		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.9		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.6		1.00	0.250
1,1-Dichloroethane	75-34-3	18.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.6		1.00	0.500
1,1-Dichloropropene	563-58-6	19.3		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	20.3		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.9		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.5		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.3		1.00	0.250
1,2-Dichloroethane	107-06-2	19.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	20.0		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	19.8		2.00	1.00
1,2-Dichloropropane	78-87-5	19.5		1.00	0.200
1,2-Dibromoethane	106-93-4	19.7		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.7		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.7		1.00	0.250
1,3-Dichloropropane	142-28-9	20.4		0.400	0.200
1,4-Dichlorobenzene	106-46-7	19.1		0.500	0.125
1-Chlorohexane	544-10-5	20.9		1.00	0.125
2,2-Dichloropropane	594-20-7	17.2		1.00	0.250
2-Hexanone	591-78-6	20.7		10.0	2.50
2-Chlorotoluene	95-49-8	17.9		1.00	0.125
4-Chlorotoluene	106-43-4	22.1		1.00	0.250
Acetone	67-64-1	26.7		10.0	2.50
Benzene	71-43-2	19.0		0.400	0.125
Bromobenzene	108-86-1	19.5		1.00	0.125
Bromochloromethane	74-97-5	19.7		1.00	0.200
Bromodichloromethane	75-27-4	18.8		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	18.6		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.0		1.00	0.500
Carbon tetrachloride	56-23-5	18.4		1.00	0.250
Chlorobenzene	108-90-7	19.4		0.500	0.125
Chloroethane	75-00-3	22.7		1.00	0.500
Chloroform	67-66-3	18.7		0.300	0.125
Chloromethane	74-87-3	24.1		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.4		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.8		0.500	0.250
Dibromochloromethane	124-48-1	19.2		0.500	0.250
Dibromomethane	74-95-3	19.9		1.00	0.250
Dichlorodifluoromethane	75-71-8	25.1		1.00	0.250
Ethylbenzene	100-41-4	20.0		1.00	0.250
Hexachlorobutadiene	87-68-3	19.9		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.1		5.00	0.500
MEK (2-Butanone)	78-93-3	20.5		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	20.2		1.00	0.250
n-Propylbenzene	103-65-1	20.9		1.00	0.125
m-,p-Xylene	179601-23-1	39.6		2.00	0.500
Naphthalene	91-20-3	21.7		1.00	0.200
o-Xylene	95-47-6	20.6		1.00	0.250
p-Isopropyltoluene	99-87-6	20.5		1.00	0.250
sec-Butylbenzene	135-98-8	20.3		1.00	0.250
Styrene	100-42-5	21.2		1.00	0.125
Trichloroethene	79-01-6	19.9		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	19.5		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	19.8		1.00	0.250
Vinyl chloride	75-01-4	23.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	96.2	85	115	
1,2-Dichloroethane-d4	93.5	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	99.9	76	119	

Certificate of Analysis

Sample #:	L17100532-11	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-70-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 16:48
Collect Date:	10/06/2017 10:35	**Dilution:**	1	**File ID:**	6M150572
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.477	F	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.12	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.215	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	3.71		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-12	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-57-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 16:20
Collect Date:	10/06/2017 09:50	**Dilution:**	1	**File ID:**	6M150571
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.17	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5	0.382	F	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.659		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	6.04		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.1	85	115	
1,2-Dichloroethane-d4	96.0	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-13	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	DUP-1-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 15:51
Collect Date:	10/06/2017 10:20	**Dilution:**	1	**File ID:**	6M150570
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.81		0.500	0.200
1,1,2-Trichloroethane	79-00-5	2.48		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.274	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.85	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	108		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.69		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.355	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	7.95		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.438	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.301	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.6	85	115	
1,2-Dichloroethane-d4	97.1	72	119	
Toluene-d8	102	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-14	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-144-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 20:21
Collect Date:	10/06/2017 11:00	**Dilution:**	1	**File ID:**	6M150642
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.57		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	8.46	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.490		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	0.345	F	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	20.5		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	97.8	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-15	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-165-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 18:24
Collect Date:	10/06/2017 10:50	**Dilution:**	1	**File ID:**	6M150638
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	3.19	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.133	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	1.01		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.9	85	115	
1,2-Dichloroethane-d4	96.2	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-16	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-190-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 18:53
Collect Date:	10/06/2017 11:10	**Dilution:**	1	**File ID:**	6M150639
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	3.16		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	6.25	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.253	F	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	11.0		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.486	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	99.1	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	102	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-17	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-87-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 20:50
Collect Date:	10/06/2017 10:15	**Dilution:**	1	**File ID:**	6M150643
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	1.89		0.500	0.200
1,1,2-Trichloroethane	79-00-5	2.40		1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2	0.272	F	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	5.93	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	110		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	9.48		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2	0.325	F	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	8.00		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.432	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5	0.298	F	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	100	85	115	
1,2-Dichloroethane-d4	99.3	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-18	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-77-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 19:22
Collect Date:	10/06/2017 11:20	**Dilution:**	1	**File ID:**	6M150640
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	0.705		0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	4.59	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	0.307		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	2.40		1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4	0.293	F	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.9	85	115	
1,2-Dichloroethane-d4	98.7	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	100	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-19	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-06-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633850	**Analyst:**	TMB	**Run Date:**	10/13/2017 19:52
Collect Date:	10/06/2017 10:00	**Dilution:**	1	**File ID:**	6M150641
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1	2.80	F	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		Q	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0		U	1.00	0.500
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3	8.03		0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2	2.08		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6	0.375	F	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	98.8	85	115	
1,2-Dichloroethane-d4	97.7	72	119	
Toluene-d8	101	81	120	
4-Bromofluorobenzene	99.6	76	119	

F	Found; the analyte was positively identified with concentration above MDL but below RL.
Q	One or more quality control criteria failed. See narrative.
U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

Sample #:	L17100532-20	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	MW-163-ODLS-15-MS	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 12:55
Collect Date:	10/05/2017 15:58	**Dilution:**	1	**File ID:**	6M150564
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6	19.5		0.500	0.250
1,1,1-Trichloroethane	71-55-6	18.9		1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5	19.4		0.500	0.200
1,1,2-Trichloroethane	79-00-5	19.3		1.00	0.250
1,1-Dichloroethane	75-34-3	18.2		1.00	0.125
1,1-Dichloroethene	75-35-4	18.7		1.00	0.500
1,1-Dichloropropene	563-58-6	19.4		1.00	0.250
1,2,3-Trichlorobenzene	87-61-6	20.2		1.00	0.150
1,2,3-Trichloropropane	96-18-4	19.2		1.00	0.500
1,2,4-Trichlorobenzene	120-82-1	20.6		1.00	0.200
1,2,4-Trimethylbenzene	95-63-6	20.1		1.00	0.250
1,2-Dichloroethane	107-06-2	19.1		0.500	0.250
1,2-Dichlorobenzene	95-50-1	19.7		1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8	21.4		2.00	1.00
1,2-Dichloropropane	78-87-5	19.3		1.00	0.200
1,2-Dibromoethane	106-93-4	19.8		1.00	0.250
1,3,5-Trimethylbenzene	108-67-8	20.5		1.00	0.250
1,3-Dichlorobenzene	541-73-1	19.4		1.00	0.250
1,3-Dichloropropane	142-28-9	20.3		0.400	0.200
1,4-Dichlorobenzene	106-46-7	18.7		0.500	0.125
1-Chlorohexane	544-10-5	21.2		1.00	0.125
2,2-Dichloropropane	594-20-7	18.4		1.00	0.250
2-Hexanone	591-78-6	20.5		10.0	2.50
2-Chlorotoluene	95-49-8	19.4		1.00	0.125
4-Chlorotoluene	106-43-4	19.8		1.00	0.250
Acetone	67-64-1	22.9		10.0	2.50
Benzene	71-43-2	18.9		0.400	0.125
Bromobenzene	108-86-1	19.3		1.00	0.125
Bromochloromethane	74-97-5	19.4		1.00	0.200
Bromodichloromethane	75-27-4	18.6		0.500	0.250
Bromoform	75-25-2	18.5		1.00	0.500
Bromomethane	74-83-9	16.5		1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon disulfide	75-15-0	17.5		1.00	0.500
Carbon tetrachloride	56-23-5	18.5		1.00	0.250
Chlorobenzene	108-90-7	19.5		0.500	0.125
Chloroethane	75-00-3	22.9		1.00	0.500
Chloroform	67-66-3	18.4		0.300	0.125
Chloromethane	74-87-3	23.7		1.00	0.500
cis-1,2-Dichloroethene	156-59-2	19.6		1.00	0.250
cis-1,3-Dichloropropene	10061-01-5	21.6		0.500	0.250
Dibromochloromethane	124-48-1	19.0		0.500	0.250
Dibromomethane	74-95-3	19.4		1.00	0.250
Dichlorodifluoromethane	75-71-8	26.3		1.00	0.250
Ethylbenzene	100-41-4	19.8		1.00	0.250
Hexachlorobutadiene	87-68-3	19.6		0.600	0.250
Isopropylbenzene	98-82-8	19.7		1.00	0.250
Methylene chloride	75-09-2	18.7		1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4	20.2		5.00	0.500
MEK (2-Butanone)	78-93-3	20.0		10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1	19.3		10.0	2.50
n-Butylbenzene	104-51-8	20.1		1.00	0.250
n-Propylbenzene	103-65-1	20.7		1.00	0.125
m-,p-Xylene	179601-23-1	39.6		2.00	0.500
Naphthalene	91-20-3	22.1		1.00	0.200
o-Xylene	95-47-6	20.7		1.00	0.250
p-Isopropyltoluene	99-87-6	20.4		1.00	0.250
sec-Butylbenzene	135-98-8	19.9		1.00	0.250
Styrene	100-42-5	20.9		1.00	0.125
Trichloroethene	79-01-6	19.9		1.00	0.250
tert-Butylbenzene	98-06-6	20.3		1.00	0.250
Tetrachloroethene	127-18-4	19.2		1.00	0.250
Toluene	108-88-3	19.6		1.00	0.250
trans-1,2-Dichloroethene	156-60-5	19.2		1.00	0.250
trans-1,3-Dichloropropene	10061-02-6	19.8		1.00	0.500
Trichlorofluoromethane	75-69-4	20.6		1.00	0.250
Vinyl chloride	75-01-4	24.9		1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.1	85	115	
1,2-Dichloroethane-d4	94.4	72	119	
Toluene-d8	99.3	81	120	
4-Bromofluorobenzene	98.9	76	119	

Certificate of Analysis

Sample #:	L17100532-21	**PrePrep Method:**	N/A	**Instrument:**	HPMS6
Client ID:	TB-1-ODLS-15	**Prep Method:**	5030B/5030C/5035A	**Prep Date:**	N/A
Matrix:	Water	**Analytical Method:**	8260B	**Cal Date:**	10/09/2017 17:37
Workgroup #:	WG633455	**Analyst:**	TMB	**Run Date:**	10/11/2017 14:22
Collect Date:	10/06/2017 16:20	**Dilution:**	1	**File ID:**	6M150567
Sample Tag:	01	**Units:**	ug/L		

Analyte	CAS #	Result	Qual	RL	MDL
1,1,1,2-Tetrachloroethane	630-20-6		U	0.500	0.250
1,1,1-Trichloroethane	71-55-6		U	1.00	0.250
1,1,2,2-Tetrachloroethane	79-34-5		U	0.500	0.200
1,1,2-Trichloroethane	79-00-5		U	1.00	0.250
1,1-Dichloroethane	75-34-3		U	1.00	0.125
1,1-Dichloroethene	75-35-4		U	1.00	0.500
1,1-Dichloropropene	563-58-6		U	1.00	0.250
1,2,3-Trichlorobenzene	87-61-6		U	1.00	0.150
1,2,3-Trichloropropane	96-18-4		U	1.00	0.500
1,2,4-Trichlorobenzene	120-82-1		U	1.00	0.200
1,2,4-Trimethylbenzene	95-63-6		U	1.00	0.250
1,2-Dichloroethane	107-06-2		U	0.500	0.250
1,2-Dichlorobenzene	95-50-1		U	1.00	0.125
1,2-Dibromo-3-chloropropane	96-12-8		U	2.00	1.00
1,2-Dichloropropane	78-87-5		U	1.00	0.200
1,2-Dibromoethane	106-93-4		U	1.00	0.250
1,3,5-Trimethylbenzene	108-67-8		U	1.00	0.250
1,3-Dichlorobenzene	541-73-1		U	1.00	0.250
1,3-Dichloropropane	142-28-9		U	0.400	0.200
1,4-Dichlorobenzene	106-46-7		U	0.500	0.125
1-Chlorohexane	544-10-5		U	1.00	0.125
2,2-Dichloropropane	594-20-7		U	1.00	0.250
2-Hexanone	591-78-6		U	10.0	2.50
2-Chlorotoluene	95-49-8		U	1.00	0.125
4-Chlorotoluene	106-43-4		U	1.00	0.250
Acetone	67-64-1		U	10.0	2.50
Benzene	71-43-2		U	0.400	0.125
Bromobenzene	108-86-1		U	1.00	0.125
Bromochloromethane	74-97-5		U	1.00	0.200
Bromodichloromethane	75-27-4		U	0.500	0.250
Bromoform	75-25-2		U	1.00	0.500
Bromomethane	74-83-9		U	1.00	0.500
Carbon disulfide	75-15-0		U	1.00	0.500

Certificate of Analysis

Analyte	CAS #	Result	Qual	RL	MDL
Carbon tetrachloride	56-23-5		U	1.00	0.250
Chlorobenzene	108-90-7		U	0.500	0.125
Chloroethane	75-00-3		U	1.00	0.500
Chloroform	67-66-3		U	0.300	0.125
Chloromethane	74-87-3		U	1.00	0.500
cis-1,2-Dichloroethene	156-59-2		U	1.00	0.250
cis-1,3-Dichloropropene	10061-01-5		U	0.500	0.250
Dibromochloromethane	124-48-1		U	0.500	0.250
Dibromomethane	74-95-3		U	1.00	0.250
Dichlorodifluoromethane	75-71-8		U	1.00	0.250
Ethylbenzene	100-41-4		U	1.00	0.250
Hexachlorobutadiene	87-68-3		U	0.600	0.250
Isopropylbenzene	98-82-8		U	1.00	0.250
Methylene chloride	75-09-2		U	1.00	0.250
Methyl t-butyl ether (MTBE)	1634-04-4		U	5.00	0.500
MEK (2-Butanone)	78-93-3		U	10.0	2.50
MIBK (methyl isobutyl ketone)	108-10-1		U	10.0	2.50
n-Butylbenzene	104-51-8		U	1.00	0.250
n-Propylbenzene	103-65-1		U	1.00	0.125
m-,p-Xylene	179601-23-1		U	2.00	0.500
Naphthalene	91-20-3		U	1.00	0.200
o-Xylene	95-47-6		U	1.00	0.250
p-Isopropyltoluene	99-87-6		U	1.00	0.250
sec-Butylbenzene	135-98-8		U	1.00	0.250
Styrene	100-42-5		U	1.00	0.125
Trichloroethene	79-01-6		U	1.00	0.250
tert-Butylbenzene	98-06-6		U	1.00	0.250
Tetrachloroethene	127-18-4		U	1.00	0.250
Toluene	108-88-3		U	1.00	0.250
trans-1,2-Dichloroethene	156-60-5		U	1.00	0.250
trans-1,3-Dichloropropene	10061-02-6		U	1.00	0.500
Trichlorofluoromethane	75-69-4		U	1.00	0.250
Vinyl chloride	75-01-4		U	1.00	0.250

Surrogate	Recovery	Lower Limit	Upper Limit	Q
Dibromofluoromethane	97.0	85	115	
1,2-Dichloroethane-d4	96.3	72	119	
Toluene-d8	100	81	120	
4-Bromofluorobenzene	101	76	119	

U	Undetected; the analyte was analyzed for, but not detected.

Certificate of Analysis

2.1.1.2 QC Summary Data

Example 8260 Calculations

1.0 Calculating the Response Factor (RF) from the initial calibration (ICAL) data:

RF = [(Ax) (Cis)] / [(Ais) (Cx)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured:	3399156
Cis = Concentration of the specific internal standard (ug/mL)	25
Ais = Area of the characteristic ion of the specific internal standard	846471
Cx = Concentration of the compound in the standard being measured (ug/mL)	100
RF = Calculated Response Factor	**1.0039**

2.0 Calculating the concentration (C) of a compound in water using the average RF: *

Cx = [(Ax) (Cis) (Vn)(D)] / [(Ais) (RF) (Vs)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Vs = Purge volume of sample (mL)	**10**
Vn = Nominal purge volume of sample (mL) (10.0 mL)	**10**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

3.0 Calculating the concentration (C) of a compound in soil using the average RF: *

Cx = [(Ax) (Cis) (Wn)(D)] / [(Ais) (RF) (Ws)]

where:

	Example
Ax = Area of the characteristic ion for the compound being measured	**3122498**
Cis = Concentration of the specific internal standard (ug/L)	**25**
D = Dilution factor for sample as a multiplier (10x = 10)	**1**
Ais = Area of the characteristic ion of the specific internal standard	**611048**
RF = Average RF from the ICAL	**1.004**
Ws = Weight of sample purged (g)	**5**
Wn = Nominal purge weight (g) (5.0 g)	**5**
Cx = Concentration of the compound in the sample being measured (ug/L)	**127.2428**

Dry weight correction:

Percent solids (PCT_S)	**50**
Cd = (Cx) (100)/PCT_S	**254.4856**

* Concentrations appearing on the instrument quantitation reports are on-column results and do not take into account initial volume, final volume, and the dilution factor.

4.0 Concentration from Linear Regression

Step 1: Retrieve Curve Data From Plot, y = mx + b

y = response ratio = response of analyte / response of IS = Ax/Ais

x = amount ratio = concentration analyte/concentration internal standard = Cx / Cis

m = slope from curve = 0.213

b = intercept from curve = - 0.00642

Step 2: Calculate y from Quantitation Report

y = 86550/593147 = 0.1459

Step 3: Solve for x

x = (y - b)/m = [(0.1459 -(- 0.00642)]/ 0.213 = 0.7152

Step 4: Solve for analyte concentration Cx

Cx = Cis (x) = (25.0)(0.7152) = 17.88

Example Spreadsheet Calculation:

Slope from curve, m:	**0.213**
Intercept from curve, b:	**-0.00642**
Area of analyte, Ax:	**86550**
Area of Internal Standard , Ais:	**593147**
Concentration of IS, Cis	**25.00**
Response Ratio:	**0.145917**
Amount Ratio:	**0.715195**
Concentration:	**17.87988**
Units of Internal Standard:	**ug/L**

5.0 Concentration from Quadratic Regression

Step 1 - Retrieve Curve Data from Plot, y = Ax^2 + Bx + C
Where:
Ax^2 + Bx + (C - y) = 0
A, B, C = constants from the ICAL quadratic regression
y = Response ratio = Area of analyte/Area of internal standard (IS)
x = Amount ratio = Concentration of analyte/concentration of IS

Step 2: Calculate y from Quantitation Report

y = Ax/Ais

Step 3: Solve for x using the quadratic formula
Ax^2 + Bx + C - y = 0

$$x = \frac{b \pm \sqrt{\left(b^2 - 4a(c - y)\right)}}{2a}$$ (Two possible solutions)

Step 4: Solve for analyte concentration Cx

Cx = (Cis)(Amount ratio)

Example Spreadsheet Calculation:

Value of A from plot:	**-0.00629**	
Value of B from plot:	**0.511**	
Value of C from plot:	**-0.0276**	
Area of unknown from quantitation report:	**293821**	
Area of IS from quantiation report:	**784848**	
Response ratio, y:	**0.374367**	
C - y:	**-0.40197**	
Root 1 - Computed amount ratio , X1:	**80.44567**	
Root 2 - Computed amount ratio , X2:	**0.794396**	use this solution
Concentration of IS, Cis:	**25.00**	
Concentration of analyte, Cx:	**19.86**	ug/L

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 082317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54300

Internal Standard: STD83284 Surrogate Standard: STD83284
CCV: STD83151 LCS: STD83193 MS/MSD: NA

Column 1 ID: RTX502.02 Column 2 ID: NA
Workgroups: WG626990

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M149720	RINSE	NA	1	1		08/23/17 10:57
6M149721	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 14:06
6M149722	WG626990-02 50ug/L CCV STD 8260	NA	1	1	STD83378	08/23/17 14:31
6M149723	RINSE	NA	1	1		08/23/17 15:01
6M149724	WG626990-01 50ng BFB STD 8260	NA	1	1	STD83478	08/23/17 15:38
6M149725	RINSE	NA	1	1		08/23/17 16:06
6M149726	WG626990-02 5ug/L A9/FOO	NA	1	1	STD83151	08/23/17 16:35
6M149727	WG626990-03 20ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:05
6M149728	WG626990-04 50ug/L A9/FOO	NA	1	1	STD83151	08/23/17 17:34
6M149729	WG626990-05 100ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:04
6M149730	WG626990-06 200ug/L A9/FOO	NA	1	1	STD83151	08/23/17 18:34
6M149731	WG626990-07 300ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:04
6M149732	WG626990-08 400ug/L A9/FOO	NA	1	1	STD83151	08/23/17 19:34
6M149733	WG626990-09 500ug/L A9/FOO	NA	1	1	STD83151	08/23/17 20:04
6M149734	RINSE	NA	1	1		08/23/17 20:34
6M149735	RINSE	NA	1	1		08/23/17 21:04
6M149736	WG626990-10 100ug/L ALT SRC A9/FOO	NA	1	1	STD83193	08/23/17 21:33
6M149737	RINSE	NA	1	1		08/23/17 22:03

Approved: August 25, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 100917
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54351

Internal Standard: STD84119 Surrogate Standard: STD84119
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633150

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150512	WG633150-01 50ng BFB STD 8260	NA	1	1	STD84001	10/09/17 12:18
6M150513	RINSE	NA	1	1	STD84274	10/09/17 12:44
6M150514	WG633150-02 0.3ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:13
6M150515	WG633150-03 0.4ug/L STD 8260	NA	1	1	STD84274	10/09/17 13:41
6M150516	WG633150-04 1ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:10
6M150517	WG633150-05 2ug/L STD 8260	NA	1	1	STD84274	10/09/17 14:40
6M150518	WG633150-06 5ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:10
6M150519	WG633150-07 20ug/L STD 8260	NA	1	1	STD84274	10/09/17 15:39
6M150520	WG633150-08 50ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:09
6M150521	WG633150-09 100ug/L STD 8260	NA	1	1	STD84274	10/09/17 16:38
6M150522	WG633150-10 200ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:08
6M150523	WG633150-11 300ug/L STD 8260	NA	1	1	STD84274	10/09/17 17:37
6M150524	RINSE	NA	1	1		10/09/17 18:06
6M150525	RINSE	NA	1	1		10/09/17 18:35
6M150526	WG633150-12 50ugL ALT SRC STD	NA	1	1	STD84292	10/09/17 19:05
6M150527	RINSE	NA	1	1		10/09/17 19:34

Comments

Seq.	Rerun	Dil.	Reason	Analytes
15	X			
File ID: 6M150526				
	Gases were high, DNR.			

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633303

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150528	WG633302-01 50ng BFB STD 8260	NA	1	1	STD84001	10/10/17 10:17
6M150529	WG633302-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/10/17 10:42
6M150530	WG633150-12 50ug/L ALT SRC STD 8260	NA	1	1	STD84292	10/10/17 11:22
6M150531	WG000000-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/10/17 11:51
6M150532	WG633303-01 BLK 1010 STD 8260	NA	1	1		10/10/17 12:20
6M150533	WG633303-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/10/17 12:49
6M150534	WG633303-03 20ug/L LCS2 STD 8260	NA	1	1	STD84292	10/10/17 13:18
6M150535	L17100411-01 B 826-SPE	<2	1	1		10/10/17 13:47
6M150536	L17100411-02 B 826-SPE	<2	1	1		10/10/17 14:17
6M150537	L17100411-03 B 826-SPE	<2	1	1		10/10/17 14:46
6M150538	L17100411-04 B 826-SPE	<2	1	1		10/10/17 15:15
6M150539	L17100411-05 A 826-SPE	<2	1	1		10/10/17 15:44
6M150540	L17100411-06 A 826-SPE	<2	1	1		10/10/17 16:14
6M150541	L17100411-07 A 826-SPE	<2	1	1		10/10/17 16:43
6M150542	L17100411-08 A 826-SPE	<2	1	1		10/10/17 17:13
6M150543	L17100173-01 A 826-SPE	<2	1	1		10/10/17 17:42
6M150544	L17100411-09 A 826-SPE	<2	1	1		10/10/17 18:12
6M150545	L17100411-10 A 826-SPE	<2	1	1		10/10/17 18:41
6M150546	L17100411-11 A 826-SPE	<2	1	1		10/10/17 19:10
6M150547	L17100411-12 A 826-SPE	<2	1	1		10/10/17 19:39
6M150548	L17100411-13 A 826-SPE	<2	1	1		10/10/17 20:09
6M150549	L17100411-14 A 826-SPE	<2	1	1		10/10/17 20:39
6M150550	L17100411-18 A 826-SPE	<2	1	1		10/10/17 21:08
6M150551	L17100420-01 A 10X 826-SPE	<2	1	10		10/10/17 21:37
6M150552	RINSE	NA	1	1		10/10/17 22:07
6M150553	WG633303-04 BLK 1010 STD 624	NA	2	1		10/10/17 22:36
6M150554	L17100458-01 A 624-SPE	<2	2	1		10/10/17 23:06
6M150555	CCV	NA	1	1		10/10/17 23:35
6M150556	RINSE	NA	1	1		10/11/17 00:05
6M150557	RINSE	NA	1	1		10/11/17 00:35

Comments

Seq.	Rerun	Dil.	Reason	Analytes

Approved: October 11, 2017

Page: 1

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101017

Analyst1: TMB Analyst2: NA

Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0

Method: 624 SOP: MSV10 Rev: 15

Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1

Maintenance Log ID:

Internal Standard: STD84314 Surrogate Standard: STD84314

CCV: STD84274 LCS: STD84292 MS/MSD: NA

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG633303

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
4				
File ID: 6M150531				
Not needed, DNR.				
24	X	50	Over Calibration Range	NAPH
File ID: 6M150551				
L17100420-01				

Approved: October 11, 2017

Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101117
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54353

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274; STD84099 LCS: STD84292 MS/MSD: STD84292

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633455

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150558	WG633454-01 50ng BFB STD 8260	NA	1	1	STD84001	10/11/17 10:01
6M150559	WG633454-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/11/17 10:27
6M150560	WG633456-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/11/17 10:57
6M150561	WG633455-01 BLK 1011 STD 8260	NA	1	1		10/11/17 11:26
6M150562	WG633455-02 20ug/L LCS STD 8260	NA	1	1	STD84292	10/11/17 11:56
6M150563	L17100420-01 B 50X D1 826-SPE	<2	1	50		10/11/17 12:25
6M150564	L17100532-20 A MS 826-SPE	<2	1	1	STD84292	10/11/17 12:55
6M150565	L17100532-10 A MSD 826-SPE	<2	1	1	STD84292	10/11/17 13:24
6M150566	L17100411-19 B 5X D1 826-SPE	<2	1	5		10/11/17 13:53
6M150567	L17100532-21 TB A 826-SPE	<2	1	1		10/11/17 14:22
6M150568	L17100001-01 LOD 826-SPE	NA	1	1	STD84355	10/11/17 14:52
6M150569	L17100003-01 LOQ 826-SPE	NA	1	1	STD84355	10/11/17 15:21
6M150570	L17100532-13 A 826-SPE	<2	1	1		10/11/17 15:51
6M150571	L17100532-12 A 826-SPE	<2	1	1		10/11/17 16:20
6M150572	L17100532-11 A 826-SPE	<2	1	1		10/11/17 16:48
6M150573	L17100532-09 RS A 826-SPE	<2	1	1		10/11/17 17:17
6M150574	L17100532-08 A 826-SPE	<2	1	1		10/11/17 17:47
6M150575	L17100532-07 A 826-SPE	<2	1	1		10/11/17 18:16
6M150576	L17100532-05 A 826-SPE	<2	1	1		10/11/17 18:46
6M150577	L17100532-04 A 826-SPE	<2	1	1		10/11/17 19:15
6M150578	L17100532-03 A 826-SPE	<2	1	1		10/11/17 19:44
6M150579	L17100532-02 A 826-SPE	<2	1	1		10/11/17 20:13
6M150580	L17100532-01 A 826-SPE	<2	1	1		10/11/17 20:43
6M150581	L17100532-06 A 826-SPE	<2	1	1		10/11/17 21:12
6M150582	RINSE	NA	1	1		10/11/17 21:41
6M150583	WG633455-06 BLK 1011 STD 624	NA	2	1		10/11/17 22:10
6M150584	L17100639-02 A TB 624-SPE	<2	2	1		10/11/17 22:40
6M150585	L17100639-01 A 624-SPE	<2	2	1		10/11/17 23:09
6M150586	L17100623-01 A 100X 624-SPE	<2	2	100		10/12/17 09:10
6M150587	RINSE W/ MEOH	NA	1	1		10/12/17 09:39
6M150588	CCV	NA	1	1		10/12/17 10:08
6M150589	RINSE	NA	1	1		10/12/17 10:37

Approved: October 12, 2017
Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument:	HPMS6	Dataset:	101117		
Analyst1:	TMB	Analyst2:	NA		
Method:	8260B	SOP:	MSV01/OVAP MSV01	Rev:	25/0
Method:	624	SOP:	MSV10	Rev:	15
Method:	5030B/5030C/5035A	SOP:	PAT01/OVAP PAT01	Rev:	18/1
Maintenance Log ID:	54353				

Internal Standard:	STD84314	Surrogate Standard:	STD84314		
CCV:	STD84274; STD84099	LCS:	STD84292	MS/MSD:	STD84292

Column 1 ID: RTX502.2 Column 2 ID: NA

Workgroups: WG633455

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
7				
File ID: 6M150564				
			L17100532-20 Received sample with a cracked lid.	
16				
File ID: 6M150573				
			L17100532-09 Received sample with a cracked lid. Replaced the lid.	
29				
File ID: 6M150586				
			Blue, foamy sample.	

Approved: October 12, 2017

Sarah Vandenberg

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54357

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633850

Comments:

File ID	Sample Information	pH	Mat	Dil	Reference	Date/Time
6M150620	WG633849-01 50ng BFB STD 8260	NA	1	1	STD84001	10/13/17 09:35
6M150621	WG633849-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/13/17 10:00
6M150622	WG633849-02 50ug/L CCV STD 8260	NA	1	1	STD84274	10/13/17 10:32
6M150623	WG633729-01 100ug/L A9 CCV STD 8260	NA	1	1	STD84099	10/13/17 11:01
6M150624	WG633850-01 BLK 1013 STD 8260	NA	1	1		10/13/17 11:30
6M150625	WG633850-02 20ug/L LCS STD 8260	NA	1	1	STD84357	10/13/17 12:00
6M150626	L17100606-18 A MS 826-SPE	<2	1	1	STD84357	10/13/17 12:33
6M150627	L17100606-20 A MSD 826-SPE	<2	1	1	STD84357	10/13/17 13:02
6M150628	L17100001-01 LOD 826-SPE	NA	1	1	STD84404	10/13/17 13:31
6M150629	L17100355-25 B 826-SPE	<2	1	1		10/13/17 14:01
6M150630	L17100606-25 A 826-SPE	<2	1	1		10/13/17 14:30
6M150631	L17100606-24 TB A 826-SPE	<2	1	1		10/13/17 15:00
6M150632	L17100606-23 TB A 826-SPE	<2	1	1		10/13/17 15:29
6M150633	L17100606-22 EB A 826-SPE	<2	1	1		10/13/17 15:58
6M150634	L17100606-16 RS A 826-SPE	<2	1	1		10/13/17 16:28
6M150635	L17100606-05 A 826-SPE	<2	1	1		10/13/17 16:57
6M150636	L17100606-03 A 826-SPE	<2	1	1		10/13/17 17:25
6M150637	L17100003-01 LOQ 826-SPE	NA	1	1	STD84404	10/13/17 17:55
6M150638	L17100532-15 B 826-SPE	6	1	1		10/13/17 18:24
6M150639	L17100532-16 B 826-SPE	<2	1	1		10/13/17 18:53
6M150640	L17100532-18 B 826-SPE	<2	1	1		10/13/17 19:22
6M150641	L17100532-19 B 826-SPE	<2	1	1		10/13/17 19:52
6M150642	L17100532-14 B 826-SPE	<2	1	1		10/13/17 20:21
6M150643	L17100532-17 B 826-SPE	<2	1	1		10/13/17 20:50
6M150644	RINSE	NA	1	1		10/13/17 21:19
6M150645	WG633850-06 BLK 1013 STD 624	NA	2	1		10/13/17 21:49
6M150646	L17100700-01 A 624-SPE	7	2	1		10/13/17 22:19
6M150647	L17100699-01 A 624-SPE	<2	2	1		10/13/17 22:48
6M150648	L17100695-02 A 624-SPE	<2	2	1		10/13/17 23:17
6M150649	L17100695-01 A 624-SPE	<2	2	1		10/13/17 23:46
6M150650	CCV	NA	1	1		10/14/17 00:16
6M150651	RINSE	NA	1	1		10/14/17 00:45
6M150652	NEWEST MIX 1 50ug/L	NA	1	1		10/14/17 01:14
6M150653	RINSE	NA	1	1		10/14/17 01:43

Approved: October 17, 2017

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Microbac Laboratories Inc.

Instrument Run Log

Instrument: HPMS6 Dataset: 101317
Analyst1: TMB Analyst2: NA
Method: 8260B SOP: MSV01/OVAP MSV01 Rev: 25/0
Method: 624 SOP: MSV10 Rev: 15
Method: 5030B/5030C/5035A SOP: PAT01/OVAP PAT01 Rev: 18/1
Maintenance Log ID: 54357

Internal Standard: STD84314 Surrogate Standard: STD84314
CCV: STD84274 LCS: STD84357 MS/MSD: STD84357

Column 1 ID: RTX502.2 Column 2 ID: NA
Workgroups: WG633850

Comments:

Comments

Seq.	Rerun	Dil.	Reason	Analytes
2	X			
File ID: 6M150621				
	Gases were low, DNR.			
3				
File ID: 6M150622				
	Bromomethane is low in the ccv.			
27	X	100	Over Calibration Range	TCE
File ID: 6M150646				
	L17100700-01			
29	X	1	Carry-over contamination	
File ID: 6M150648				
	TCE and cis12-dce carry over.			
30	X	1	Carry-over contamination	
File ID: 6M150649				
	TCE and cis12-dce carry over.			

Approved: October 17, 2017

Microbac Laboratories Inc.

Data Checklist

Date: 23-AUG-2017
Analyst: TMB
Analyst: NA
Method: 8260B/OVAP/624
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 84155
Analytical Workgroups: WG626990

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	X
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	NA
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
24-AUG-2017

Secondary Reviewer:
25-AUG-2017

CHECKLIST1 - Modified 03/05/2008
Generated: AUG-25-2017 08:47:03

Microbac Laboratories Inc.

Data Checklist

Date: 09-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85187
Analytical Workgroups: WG633150

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017
Tiffany Bailey

Secondary Reviewer:
11-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:33:04

Microbac Laboratories Inc.

Data Checklist

Date: 10-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85202
Analytical Workgroups: WG633303

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	NA
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
11-OCT-2017

Secondary Reviewer:
11-OCT-2017

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-11-2017 15:48:45

Microbac Laboratories Inc.

Data Checklist

Date: 11-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85237
Analytical Workgroups: WG633455

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	X
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	SAV
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
12-OCT-2017
Tiffany Bailey

Secondary Reviewer:
12-OCT-2017
Sarah Vandenberg

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-12-2017 16:59:30

Microbac Laboratories Inc.

Data Checklist

Date: 13-OCT-2017
Analyst: TMB
Analyst: NA
Method: 8260B/624/OVAP
Instrument: HPMS6
Curve Workgroup: NA
Runlog ID: 85294
Analytical Workgroups: WG633850

System Performance Check	NA
BFB	X
Initial Calibration	X
Average RF	X
Linear Reg or Higher Order Curve	X
Second Source standard % Difference	X
Continuing Calibration /Check Standards	X
Project/Client Specific Requirements	X
Special Standards	X
Blanks	X
TCL's	X
Surrogates	X
LCS (Laboratory Control Sample)	X
Recoveries	X
Surrogates	X
MS/MSD/Duplicates	X
Samples	X
TCL Hits	X
Spectra of TCL Hits	TMB
Surrogates	X
Internal Standards Criteria	X
Library Searches	NA
Calculations & Correct Factors	X
Dilutions Run	NA
Reruns	X
Manual Integrations	NA
Case Narrative	X
Results Reporting/Data Qualifiers	X
KOBRA Workgroup Data	X
Check for Completeness	X
Primary Reviewer	TMB
Secondary Reviewer	ADC
Check for compliance with method and project specific requirements	X
Check the completeness of reported information	X
Check the information for the report narrative	X
Check the reasonableness of the results	X

Primary Reviewer:
17-OCT-2017
Tiffany Bailey

Secondary Reviewer:
17-OCT-2017
Ashley Cater

CHECKLIST1 - Modified 03/05/2008
Generated: OCT-17-2017 14:43:35

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG633455

Login Number: L17100532

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-166-ODLS-15	01	10/05/17					10/11/2017	6.2	14		10/11/17	6.2	14	
MW-249-ODLS-15	02	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
MW-246-ODLS-15	03	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
MW-166A-ODLS-15	04	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
MW-150-ODLS-15	05	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
MW-159-ODLS-15	06	10/05/17					10/11/2017	6.2	14		10/11/17	6.2	14	
MW-149-ODLS-15	07	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
DUP-2-ODLS-15	08	10/05/17					10/11/2017	6	14		10/11/17	6	14	
MW-163-ODLS-15	09	10/05/17					10/11/2017	6.1	14		10/11/17	6.1	14	
MW-163-ODLS-15-MSD	10	10/05/17					10/11/2017	5.9	14		10/11/17	5.9	14	
MW-70-ODLS-15	11	10/06/17					10/11/2017	5.3	14		10/11/17	5.3	14	
MW-57-ODLS-15	12	10/06/17					10/11/2017	5.3	14		10/11/17	5.3	14	
DUP-1-ODLS-15	13	10/06/17					10/11/2017	5.2	14		10/11/17	5.2	14	
MW-163-ODLS-15-MS	20	10/05/17					10/11/2017	5.9	14		10/11/17	5.9	14	
TB-1-ODLS-15	21	10/06/17					10/11/2017	4.9	14		10/11/17	4.9	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5526169
Report generated 10/17/2017 14:27

Microbac Laboratories Inc.

HOLDING TIMES
EQUIVALENT TO AFCEE FORM 9

Analytical Method: 8260B AAB#: WG633850

Login Number: L17100532

Client ID	ID	Date Collected	TCLP Date	Time Held	Max Hold	Q	Extract Date	Time Held	Max Hold	Q	Run Date	Time Held	Max Hold	Q
MW-144-ODLS-15	14	10/06/17					10/13/2017	7.4	14		10/13/17	7.4	14	
MW-165-ODLS-15	15	10/06/17					10/13/2017	7.3	14		10/13/17	7.3	14	
MW-190-ODLS-15	16	10/06/17					10/13/2017	7.3	14		10/13/17	7.3	14	
MW-87-ODLS-15	17	10/06/17					10/13/2017	7.4	14		10/13/17	7.4	14	
MW-77-ODLS-15	18	10/06/17					10/13/2017	7.3	14		10/13/17	7.3	14	
MW-06-ODLS-15	19	10/06/17					10/13/2017	7.4	14		10/13/17	7.4	14	

* = SEE PROJECT QAPP REQUIREMENTS

HOLD_TIMES - Modified 03/06/2008
PDF File ID: 5526169
Report generated 10/17/2017 14:27

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100532 **Method:** 8260
Instrument Id: HPMS6 **CAL ID:** HPMS6-09-OCT-17
Workgroup (AAB#): WG633455 **Matrix:** Water

Sample Number	Dilution	Tag	1	2	3	4
L17100532-01	1.00	01	99.2	99.0	102	100
L17100532-02	1.00	01	98.3	98.8	98.7	101
L17100532-03	1.00	01	98.9	98.6	101	101
L17100532-04	1.00	01	98.6	98.6	101	101
L17100532-05	1.00	01	97.5	98.6	99.5	100
L17100532-06	1.00	01	97.7	100	102	101
L17100532-07	1.00	01	96.8	98.2	100	101
L17100532-08	1.00	01	97.8	98.3	99.9	101
L17100532-09	1.00	01	96.8	97.4	100	99.9
L17100532-10	1.00	01	93.5	96.2	99.9	99.3
L17100532-11	1.00	01	97.8	98.6	100	101
L17100532-12	1.00	01	96.0	97.1	101	101
L17100532-13	1.00	01	97.1	98.6	101	102
L17100532-20	1.00	01	94.4	97.1	98.9	99.3
L17100532-21	1.00	01	96.3	97.0	101	100
WG633455-01	1.00	01	94.3	97.1	102	101
WG633455-02	1.00	01	94.7	97.1	99.0	100
WG633455-06	1.00	01	101	98.2	100	100

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5526176
Report generated: 10/17/2017 14:28

Microbac Laboratories Inc.
SURROGATE STANDARDS

Login Number: L17100532
Instrument Id: HPMS6
Workgroup (AAB#): WG633850

Method: 8260
CAL ID: HPMS6-09-OCT-17
Matrix: Water

Sample Number	Dilution	Tag	1	2	3	4
L17100532-14	1.00	01	97.8	98.8	101	100
L17100532-15	1.00	01	96.2	97.9	102	101
L17100532-16	1.00	01	97.7	99.1	102	101
L17100532-17	1.00	01	99.3	100	101	100
L17100532-18	1.00	01	98.7	98.9	100	100
L17100532-19	1.00	01	97.7	98.8	99.6	101
WG633850-01	1.00	01	95.2	96.9	103	100
WG633850-02	1.00	01	93.3	96.3	102	99.8
WG633850-06	1.00	01	98.0	99.6	100	99.9

Surrogates	Surrogate Limits		
1 - 1,2-Dichloroethane-d4	72	-	119
2 - Dibromofluoromethane	85	-	115
3 - 4-Bromofluorobenzene	76	-	119
4 - Toluene-d8	81	-	120

Underline = Result out of surrogate limits

DL = surrogate diluted out
ND = surrogate not detected

SURROGATES - Modified 03/06/2008
PDF File ID: 5526176
Report generated: 10/17/2017 14:28

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100532
Work Group: WG633455
Blank File ID: 6M150561
Blank Sample ID: WG633455-01
Prep Date: 10/11/17 11:26
Instrument ID: HPMS6
Analyzed Date: 10/11/17 11:26
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633455-02	6M150562	10/11/17 11:56	01
MW-163-ODLS-15-MS	L17100532-20	6M150564	10/11/17 12:55	01
MW-163-ODLS-15-MSD	L17100532-10	6M150565	10/11/17 13:24	01
TB-1-ODLS-15	L17100532-21	6M150567	10/11/17 14:22	01
DUP-1-ODLS-15	L17100532-13	6M150570	10/11/17 15:51	01
MW-57-ODLS-15	L17100532-12	6M150571	10/11/17 16:20	01
MW-70-ODLS-15	L17100532-11	6M150572	10/11/17 16:48	01
MW-163-ODLS-15	L17100532-09	6M150573	10/11/17 17:17	01
DUP-2-ODLS-15	L17100532-08	6M150574	10/11/17 17:47	01
MW-149-ODLS-15	L17100532-07	6M150575	10/11/17 18:16	01
MW-150-ODLS-15	L17100532-05	6M150576	10/11/17 18:46	01
MW-166A-ODLS-15	L17100532-04	6M150577	10/11/17 19:15	01
MW-246-ODLS-15	L17100532-03	6M150578	10/11/17 19:44	01
MW-249-ODLS-15	L17100532-02	6M150579	10/11/17 20:13	01
MW-166-ODLS-15	L17100532-01	6M150580	10/11/17 20:43	01
MW-159-ODLS-15	L17100532-06	6M150581	10/11/17 21:12	01

Report Name: BLANK_SUMMARY
PDF File ID: 5526385
Report generated 10/17/2017 14:27

Microbac Laboratories Inc.

METHOD BLANK SUMMARY

Login Number: L17100532
Work Group: WG633850
Blank File ID: 6M150624
Blank Sample ID: WG633850-01
Prep Date: 10/13/17 11:30
Instrument ID: HPMS6
Analyzed Date: 10/13/17 11:30
Method: 8260B
Analyst: TMB

This Method Blank Applies To The Following Samples:

Client ID	Lab Sample ID	Lab File ID	Time Analyzed	TAG
LCS	WG633850-02	6M150625	10/13/17 12:00	01
MW-165-ODLS-15	L17100532-15	6M150638	10/13/17 18:24	01
MW-190-ODLS-15	L17100532-16	6M150639	10/13/17 18:53	01
MW-77-ODLS-15	L17100532-18	6M150640	10/13/17 19:22	01
MW-06-ODLS-15	L17100532-19	6M150641	10/13/17 19:52	01
MW-144-ODLS-15	L17100532-14	6M150642	10/13/17 20:21	01
MW-87-ODLS-15	L17100532-17	6M150643	10/13/17 20:50	01

Report Name: BLANK_SUMMARY
PDF File ID: 5526385
Report generated 10/17/2017 14:27

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number:L17100532 Prep Date:10/11/17 11:26 Sample ID:WG633455-01
Instrument ID:HPMS6 Run Date:10/11/17 11:26 Prep Method:5030B/5030C/503
File ID:6M150561 Analyst:TMB Method:8260B
Workgroup (AAB#):WG633455 Matrix:Water Units:ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5526170
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Microbac Laboratories Inc.
METHOD BLANK REPORT

Login Number: L17100532 Prep Date: 10/11/17 11:26 Sample ID: WG633455-01
Instrument ID: HPMS6 Run Date: 10/11/17 11:26 Prep Method: 5030B/5030C/503
File ID: 6M150561 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633455 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	97.1	85	-	115	PASS
1,2-Dichloroethane-d4	94.3	72	-	119	PASS
Toluene-d8	101	81	-	120	PASS
4-Bromofluorobenzene	102	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5526170
17-OCT-2017 14:27

Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100532 Prep Date: 10/13/17 11:30 Sample ID: WG633850-01
Instrument ID: HPMS6 Run Date: 10/13/17 11:30 Prep Method: 5030B/5030C/503
File ID: 6M150624 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633850 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
1,1,1,2-Tetrachloroethane	0.250	0.500	0.250	1	U
1,1,1-Trichloroethane	0.250	1.00	0.250	1	U
1,1,2,2-Tetrachloroethane	0.200	0.500	0.200	1	U
1,1,2-Trichloroethane	0.250	1.00	0.250	1	U
1,1-Dichloroethane	0.125	1.00	0.125	1	U
1,1-Dichloroethene	0.500	1.00	0.500	1	U
1,1-Dichloropropene	0.250	1.00	0.250	1	U
1,2,3-Trichlorobenzene	0.150	1.00	0.150	1	U
1,2,3-Trichloropropane	0.500	1.00	0.500	1	U
1,2,4-Trichlorobenzene	0.200	1.00	0.200	1	U
1,2,4-Trimethylbenzene	0.250	1.00	0.250	1	U
1,2-Dichloroethane	0.250	0.500	0.250	1	U
1,2-Dichlorobenzene	0.125	1.00	0.125	1	U
1,2-Dibromo-3-chloropropane	1.00	2.00	1.00	1	U
1,2-Dichloropropane	0.200	1.00	0.200	1	U
1,2-Dibromoethane	0.250	1.00	0.250	1	U
1,3,5-Trimethylbenzene	0.250	1.00	0.250	1	U
1,3-Dichlorobenzene	0.250	1.00	0.250	1	U
1,3-Dichloropropane	0.200	0.400	0.200	1	U
1,4-Dichlorobenzene	0.125	0.500	0.125	1	U
1,4-Dioxane	50.0	100	50.0	1	U
1-Chlorohexane	0.125	1.00	0.125	1	U
2,2-Dichloropropane	0.250	1.00	0.250	1	U
2-Hexanone	2.50	10.0	2.50	1	U
2-Chlorotoluene	0.125	1.00	0.125	1	U
4-Chlorotoluene	0.250	1.00	0.250	1	U
Acetone	2.50	10.0	2.50	1	U
Benzene	0.125	0.400	0.125	1	U
Bromobenzene	0.125	1.00	0.125	1	U
Bromochloromethane	0.200	1.00	0.200	1	U
Bromodichloromethane	0.250	0.500	0.250	1	U
Bromoform	0.500	1.00	0.500	1	U
Bromomethane	0.500	1.00	0.500	1	U
Carbon disulfide	0.500	1.00	0.500	1	U
Carbon tetrachloride	0.250	1.00	0.250	1	U
Chlorobenzene	0.125	0.500	0.125	1	U
Chloroethane	0.500	1.00	0.500	1	U
Chloroform	0.125	0.300	0.125	1	U
Chloromethane	0.500	1.00	0.500	1	U
cis-1,2-Dichloroethene	0.250	1.00	0.250	1	U
cis-1,3-Dichloropropene	0.250	0.500	0.250	1	U
Dibromochloromethane	0.250	0.500	0.250	1	U

Report Name:BLANK
PDF ID: 5526170
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Microbac Laboratories Inc.

METHOD BLANK REPORT

Login Number: L17100532 Prep Date: 10/13/17 11:30 Sample ID: WG633850-01
Instrument ID: HPMS6 Run Date: 10/13/17 11:30 Prep Method: 5030B/5030C/503
File ID: 6M150624 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633850 Matrix: Water Units: ug/L
Contract #: Cal ID: HPMS6-09-OCT-17

Analytes	MDL	RL	Concentration	Dilution	Qualifier
Dibromomethane	0.250	1.00	0.250	1	U
Dichlorodifluoromethane	0.250	1.00	0.250	1	U
Ethylbenzene	0.250	1.00	0.250	1	U
Hexachlorobutadiene	0.250	0.600	0.250	1	U
Isopropylbenzene	0.250	1.00	0.250	1	U
Methylene chloride	0.250	1.00	0.250	1	U
Methyl t-butyl ether (MTBE)	0.500	5.00	0.500	1	U
MEK (2-Butanone)	2.50	10.0	2.50	1	U
MIBK (methyl isobutyl ketone)	2.50	10.0	2.50	1	U
n-Butylbenzene	0.250	1.00	0.250	1	U
n-Propylbenzene	0.125	1.00	0.125	1	U
m-,p-Xylene	0.500	2.00	0.500	1	U
Naphthalene	0.200	1.00	0.200	1	U
o-Xylene	0.250	1.00	0.250	1	U
p-Isopropyltoluene	0.250	1.00	0.250	1	U
sec-Butylbenzene	0.250	1.00	0.250	1	U
Styrene	0.125	1.00	0.125	1	U
Trichloroethene	0.250	1.00	0.250	1	U
tert-Butylbenzene	0.250	1.00	0.250	1	U
Tetrachloroethene	0.250	1.00	0.250	1	U
Toluene	0.250	1.00	0.250	1	U
trans-1,2-Dichloroethene	0.250	1.00	0.250	1	U
trans-1,3-Dichloropropene	0.500	1.00	0.500	1	U
Trichlorofluoromethane	0.250	1.00	0.250	1	U
Vinyl chloride	0.250	1.00	0.250	1	U

Surrogates	% Recovery	Surrogate Limits			Qualifier
Dibromofluoromethane	96.9	85	-	115	PASS
1,2-Dichloroethane-d4	95.2	72	-	119	PASS
Toluene-d8	100	81	-	120	PASS
4-Bromofluorobenzene	103	76	-	119	PASS

MDL Method Detection Limit
RL Reporting/Practical Quantitation Limit
ND Analyte Not detected at or above reporting limit
* |Analyte concentration| > 1/2 RL

Report Name:BLANK
PDF ID: 5526170
17-OCT-2017 14:27

Login Number: L17100532 Run Date: 10/11/2017 Sample ID: WG633455-02
Instrument ID: HPMS6 Run Time: 11:56 Prep Method: 5030B/5030C/503
File ID: 6M150562 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633455 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84292 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.1	101	81 - 129	
1,1,1-Trichloroethane	20.0	19.0	95.1	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.0	99.8	63 - 128	
1,1,2-Trichloroethane	20.0	19.9	99.7	75 - 125	
1,1-Dichloroethane	20.0	18.2	91.0	69 - 133	
1,1-Dichloroethene	20.0	17.8	88.9	68 - 130	
1,1-Dichloropropene	20.0	19.5	97.6	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.7	104	67 - 137	
1,2,3-Trichloropropane	20.0	20.5	103	73 - 124	
1,2,4-Trichlorobenzene	20.0	21.0	105	66 - 134	
1,2,4-Trimethylbenzene	20.0	20.8	104	74 - 132	
1,2-Dichloroethane	20.0	19.0	94.8	69 - 132	
1,2-Dichlorobenzene	20.0	20.4	102	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.9	104	50 - 132	
1,2-Dichloropropane	20.0	19.7	98.7	75 - 125	
1,2-Dibromoethane	20.0	20.0	99.9	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.0	105	74 - 131	
1,3-Dichlorobenzene	20.0	20.2	101	75 - 124	
1,3-Dichloropropane	20.0	20.5	103	73 - 126	
1,4-Dichlorobenzene	20.0	19.5	97.4	74 - 123	
1,4-Dioxane	200	176	88.1	60 - 140	
1-Chlorohexane	20.0	21.0	105	70 - 125	
2,2-Dichloropropane	20.0	17.5	87.4	69 - 137	
2-Hexanone	20.0	20.3	101	55 - 130	
2-Chlorotoluene	20.0	21.1	106	73 - 126	
4-Chlorotoluene	20.0	19.5	97.3	74 - 128	
Acetone	20.0	22.8	114	40 - 135	
Benzene	20.0	19.0	95.0	81 - 122	
Bromobenzene	20.0	19.8	99.2	76 - 124	
Bromochloromethane	20.0	19.3	96.7	65 - 129	
Bromodichloromethane	20.0	19.1	95.6	76 - 121	
Bromoform	20.0	19.0	95.1	69 - 128	
Bromomethane	20.0	13.2	66.1	30 - 141	
Carbon disulfide	20.0	17.6	88.0	58 - 128	
Carbon tetrachloride	20.0	18.7	93.7	66 - 138	
Chlorobenzene	20.0	19.8	99.1	81 - 122	
Chloroethane	20.0	16.1	80.4	58 - 133	
Chloroform	20.0	18.8	93.8	69 - 128	
Chloromethane	20.0	23.7	119	56 - 131	
cis-1,2-Dichloroethene	20.0	19.4	97.2	72 - 126	
cis-1,3-Dichloropropene	20.0	21.5	107	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5526171
Report generated: 10/17/2017 14:27

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100532 Run Date: 10/11/2017 Sample ID: WG633455-02
Instrument ID: HPMS6 Run Time: 11:56 Prep Method: 5030B/5030C/503
File ID: 6M150562 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633455 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84292 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.6	97.8	66 - 133	
Dibromomethane	20.0	19.6	97.9	76 - 125	
Dichlorodifluoromethane	20.0	26.0	130	30 - 153	
Ethylbenzene	20.0	20.5	103	73 - 127	
Hexachlorobutadiene	20.0	20.6	103	67 - 131	
Isopropylbenzene	20.0	20.3	102	75 - 127	
Methylene chloride	20.0	18.0	90.0	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.2	101	65 - 123	
MEK (2-Butanone)	20.0	20.4	102	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.5	97.7	58 - 134	
n-Butylbenzene	20.0	20.9	104	69 - 137	
n-Propylbenzene	20.0	21.3	107	72 - 129	
m-,p-Xylene	40.0	40.5	101	76 - 128	
Naphthalene	20.0	22.1	110	54 - 138	
o-Xylene	20.0	21.0	105	80 - 121	
p-Isopropyltoluene	20.0	21.2	106	73 - 130	
sec-Butylbenzene	20.0	20.7	103	72 - 127	
Styrene	20.0	21.6	108	65 - 134	
Trichloroethene	20.0	19.5	97.6	70 - 127	
tert-Butylbenzene	20.0	21.2	106	70 - 129	
Tetrachloroethene	20.0	19.4	96.8	66 - 128	
Toluene	20.0	19.9	99.4	77 - 122	
trans-1,2-Dichloroethene	20.0	18.9	94.7	63 - 137	
trans-1,3-Dichloropropene	20.0	20.1	100	59 - 135	
Trichlorofluoromethane	20.0	20.5	102	57 - 129	
Vinyl chloride	20.0	24.8	124	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	97.1	85 - 115	PASS
1,2-Dichloroethane-d4	94.7	72 - 119	PASS
Toluene-d8	100	81 - 120	PASS
4-Bromofluorobenzene	99.0	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5526171
Report generated: 10/17/2017 14:27

Microbac Laboratories Inc.
LABORATORY CONTROL SAMPLE (LCS)

Login Number: L17100532 Run Date: 10/13/2017 Sample ID: WG633850-02
Instrument ID: HPMS6 Run Time: 12:00 Prep Method: 5030B/5030C/503
File ID: 6M150625 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633850 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
1,1,1,2-Tetrachloroethane	20.0	20.2	101	81 - 129	
1,1,1-Trichloroethane	20.0	20.2	101	67 - 132	
1,1,2,2-Tetrachloroethane	20.0	20.2	101	63 - 128	
1,1,2-Trichloroethane	20.0	20.5	102	75 - 125	
1,1-Dichloroethane	20.0	19.6	97.9	69 - 133	
1,1-Dichloroethene	20.0	20.8	104	68 - 130	
1,1-Dichloropropene	20.0	20.9	105	73 - 132	
1,2,3-Trichlorobenzene	20.0	20.2	101	67 - 137	
1,2,3-Trichloropropane	20.0	20.5	102	73 - 124	
1,2,4-Trichlorobenzene	20.0	20.5	103	66 - 134	
1,2,4-Trimethylbenzene	20.0	21.3	107	74 - 132	
1,2-Dichloroethane	20.0	20.1	100	69 - 132	
1,2-Dichlorobenzene	20.0	20.2	101	71 - 122	
1,2-Dibromo-3-chloropropane	20.0	20.4	102	50 - 132	
1,2-Dichloropropane	20.0	20.7	103	75 - 125	
1,2-Dibromoethane	20.0	21.0	105	80 - 121	
1,3,5-Trimethylbenzene	20.0	21.8	109	74 - 131	
1,3-Dichlorobenzene	20.0	20.2	101	75 - 124	
1,3-Dichloropropane	20.0	21.6	108	73 - 126	
1,4-Dichlorobenzene	20.0	19.4	96.9	74 - 123	
1,4-Dioxane	200	171	85.7	60 - 140	
1-Chlorohexane	20.0	21.1	105	70 - 125	
2,2-Dichloropropane	20.0	19.1	95.6	69 - 137	
2-Hexanone	20.0	20.1	100	55 - 130	
2-Chlorotoluene	20.0	21.3	106	73 - 126	
4-Chlorotoluene	20.0	20.6	103	74 - 128	
Acetone	20.0	21.5	107	40 - 135	
Benzene	20.0	20.4	102	81 - 122	
Bromobenzene	20.0	20.3	102	76 - 124	
Bromochloromethane	20.0	20.5	102	65 - 129	
Bromodichloromethane	20.0	19.7	98.6	76 - 121	
Bromoform	20.0	18.8	93.9	69 - 128	
Bromomethane	20.0	12.7	63.5	30 - 141	
Carbon disulfide	20.0	17.5	87.7	58 - 128	
Carbon tetrachloride	20.0	20.0	99.8	66 - 138	
Chlorobenzene	20.0	20.2	101	81 - 122	
Chloroethane	20.0	23.0	115	58 - 133	
Chloroform	20.0	19.6	98.2	69 - 128	
Chloromethane	20.0	22.3	112	56 - 131	
cis-1,2-Dichloroethene	20.0	20.8	104	72 - 126	
cis-1,3-Dichloropropene	20.0	22.6	113	69 - 131	

LCS - Modified 03/06/2008
PDF File ID: 5526171
Report generated: 10/17/2017 14:27

Login Number: L17100532 Run Date: 10/13/2017 Sample ID: WG633850-02
Instrument ID: HPMS6 Run Time: 12:00 Prep Method: 5030B/5030C/503
File ID: 6M150625 Analyst: TMB Method: 8260B
Workgroup (AAB#): WG633850 Matrix: Water Units: ug/L
QC Key: AF40 Lot#: STD84357 Cal ID: HPMS6-09-OCT-17

Analytes	Expected	Found	% Rec	LCS Limits	Q
Dibromochloromethane	20.0	19.9	99.7	66 - 133	
Dibromomethane	20.0	20.6	103	76 - 125	
Dichlorodifluoromethane	20.0	25.3	126	30 - 153	
Ethylbenzene	20.0	21.0	105	73 - 127	
Hexachlorobutadiene	20.0	19.6	97.9	67 - 131	
Isopropylbenzene	20.0	20.5	102	75 - 127	
Methylene chloride	20.0	19.8	98.8	63 - 137	
Methyl t-butyl ether (MTBE)	20.0	20.1	101	65 - 123	
MEK (2-Butanone)	20.0	20.6	103	49 - 136	
MIBK (methyl isobutyl ketone)	20.0	19.4	97.1	58 - 134	
n-Butylbenzene	20.0	20.7	103	69 - 137	
n-Propylbenzene	20.0	22.0	110	72 - 129	
m-,p-Xylene	40.0	41.8	105	76 - 128	
Naphthalene	20.0	21.7	108	54 - 138	
o-Xylene	20.0	21.5	108	80 - 121	
p-Isopropyltoluene	20.0	21.1	105	73 - 130	
sec-Butylbenzene	20.0	20.8	104	72 - 127	
Styrene	20.0	22.1	110	65 - 134	
Trichloroethene	20.0	20.5	102	70 - 127	
tert-Butylbenzene	20.0	21.3	106	70 - 129	
Tetrachloroethene	20.0	20.3	102	66 - 128	
Toluene	20.0	21.0	105	77 - 122	
trans-1,2-Dichloroethene	20.0	20.8	104	63 - 137	
trans-1,3-Dichloropropene	20.0	21.1	106	59 - 135	
Trichlorofluoromethane	20.0	20.4	102	57 - 129	
Vinyl chloride	20.0	23.8	119	50 - 134	

Surrogates	% Recovery	Surrogate Limits	Qualifier
Dibromofluoromethane	96.3	85 - 115	PASS
1,2-Dichloroethane-d4	93.3	72 - 119	PASS
Toluene-d8	99.8	81 - 120	PASS
4-Bromofluorobenzene	102	76 - 119	PASS

* EXCEEDS %REC LIMIT

LCS - Modified 03/06/2008
PDF File ID: 5526171
Report generated: 10/17/2017 14:27

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100532 Cal ID: HPMS6- 09-OCT-17 Worknum: WG633455

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100532-09 File ID: 6M150573 Dil: 1 Method: 5035A

Sample ID: L17100532-10 MSD File ID: 6M150565 Dil: 1 Matrix: 8260B

Sample ID: L17100532-20 MS File ID: 6M150564 Dil: 1 Units: Water

ug/L

Analyte	Parent	MSD Spiked	MSD Found	MSD %Rec	MS Spiked	MS Found	MS %Rec	%RPD	%Rec Limits	RPD Limit	Q
1,1,1,2-Tetrachloroethane	U	20.0	19.7	98.7	20.0	19.5	97.4	1.36	81 - 129	20	
1,1,1-Trichloroethane	U	20.0	18.7	93.4	20.0	18.9	94.7	1.43	67 - 132	20	
1,1,2,2-Tetrachloroethane	0.265	20.0	19.9	98.4	20.0	19.4	95.8	2.61	63 - 128	20	
1,1,2-Trichloroethane	U	20.0	19.6	98.2	20.0	19.3	96.7	1.54	75 - 125	20	
1,1-Dichloroethane	U	20.0	18.2	90.9	20.0	18.2	90.9	0.0041	69 - 133	20	
1,1-Dichloroethene	U	20.0	18.6	93.2	20.0	18.7	93.4	0.220	68 - 130	20	
1,1-Dichloropropene	U	20.0	19.3	96.3	20.0	19.4	96.8	0.563	73 - 132	20	
1,2,3-Trichlorobenzene	U	20.0	20.3	101	20.0	20.2	101	0.511	67 - 137	20	
1,2,3-Trichloropropane	U	20.0	19.9	99.6	20.0	19.2	96.2	3.48	73 - 124	20	
1,2,4-Trichlorobenzene	U	20.0	20.5	103	20.0	20.6	103	0.169	66 - 134	20	
1,2,4-Trimethylbenzene	U	20.0	20.3	101	20.0	20.1	101	0.684	74 - 132	20	
1,2-Dichloroethane	U	20.0	19.1	95.3	20.0	19.1	95.5	0.183	69 - 132	20	
1,2-Dichlorobenzene	U	20.0	20.0	99.9	20.0	19.7	98.4	1.52	71 - 122	20	
1,2-Dibromo-3-chloropropane	U	20.0	19.8	99	20.0	21.4	107	7.63	50 - 132	20	
1,2-Dichloropropane	U	20.0	19.5	97.5	20.0	19.3	96.3	1.27	75 - 125	20	
1,2-Dibromoethane	U	20.0	19.7	98.6	20.0	19.8	99	0.461	80 - 121	20	
1,3,5-Trimethylbenzene	U	20.0	20.7	104	20.0	20.5	102	1.42	74 - 131	20	
1,3-Dichlorobenzene	U	20.0	19.7	98.5	20.0	19.4	97	1.62	75 - 124	20	
1,3-Dichloropropane	U	20.0	20.4	102	20.0	20.3	102	0.392	73 - 126	20	
1,4-Dichlorobenzene	U	20.0	19.1	95.4	20.0	18.7	93.6	2.00	74 - 123	20	
1,4-Dioxane	U	200	207	103	200	183	91.7	12.0	60 - 140	20	
1-Chlorohexane	U	20.0	20.9	104	20.0	21.2	106	1.34	70 - 125	20	
2,2-Dichloropropane	U	20.0	17.2	85.9	20.0	18.4	92	6.86	69 - 137	20	
2-Hexanone	U	20.0	20.7	103	20.0	20.5	103	0.684	55 - 130	20	
2-Chlorotoluene	U	20.0	17.9	89.6	20.0	19.4	96.9	7.84	73 - 126	20	
4-Chlorotoluene	U	20.0	22.1	111	20.0	19.8	99	11.1	74 - 128	20	
Acetone	5.52	20.0	26.7	106	20.0	22.9	87.1	15.1	40 - 135	20	
Benzene	U	20.0	19.0	94.9	20.0	18.9	94.7	0.127	81 - 122	20	
Bromobenzene	U	20.0	19.5	97.6	20.0	19.3	96.5	1.22	76 - 124	20	
Bromochloromethane	U	20.0	19.7	98.6	20.0	19.4	97.2	1.40	65 - 129	20	
Bromodichloromethane	U	20.0	18.8	94.1	20.0	18.6	93.1	1.07	76 - 121	20	
Bromoform	U	20.0	18.5	92.6	20.0	18.5	92.6	0.0187	69 - 128	20	
Bromomethane	U	20.0	18.6	93.1	20.0	16.5	82.4	12.2	30 - 141	20	
Carbon disulfide	U	20.0	17.0	85.2	20.0	17.5	87.6	2.78	58 - 128	20	
Carbon tetrachloride	U	20.0	18.4	92.2	20.0	18.5	92.7	0.571	66 - 138	20	
Chlorobenzene	U	20.0	19.4	97	20.0	19.5	97.4	0.427	81 - 122	20	
Chloroethane	U	20.0	22.7	113	20.0	22.9	114	0.952	58 - 133	20	
Chloroform	0.210	20.0	18.7	92.2	20.0	18.4	90.8	1.56	69 - 128	20	
Chloromethane	U	20.0	24.1	120	20.0	23.7	118	1.57	56 - 131	20	
cis-1,2-Dichloroethene	U	20.0	19.4	97.2	20.0	19.6	97.8	0.605	72 - 126	20	
cis-1,3-Dichloropropene	U	20.0	21.8	109	20.0	21.6	108	0.766	69 - 131	20	

MS_MSD - Modified 03/06/2008

PDF File ID: 5526172

Report generated 10/17/2017 14:27

Microbac Laboratories Inc.

MS/MSD REPORT

Loginnum: L17100532 Cal ID: HPMS6 09-OCT-17 Worknum: WG633455

Instrument ID: HPMS6 Contract #: Prep Method: 5030B/5030C/

Parent ID: L17100532-09 File ID: 6M150573 Dil: 1 Method: 5035A

Sample ID: L17100532-10 MSD File ID: 6M150565 Dil: 1 Matrix: 8260B

Sample ID: L17100532-20 MS File ID: 6M150564 Dil: 1 Units: Water

ug/L

Analyte	Parent	MSD Spiked	MSD Found	MSD %Rec	MS Spiked	MS Found	MS %Rec	%RPD	%Rec Limits	RPD Limit	Q
Dibromochloromethane	U	20.0	19.2	96.1	20.0	19.0	94.8	1.40	66 - 133	20	
Dibromomethane	U	20.0	19.9	99.7	20.0	19.4	97.2	2.46	76 - 125	20	
Dichlorodifluoromethane	U	20.0	25.1	126	20.0	26.3	132	4.64	30 - 153	20	
Ethylbenzene	U	20.0	20.0	99.9	20.0	19.8	99.2	0.702	73 - 127	20	
Hexachlorobutadiene	U	20.0	19.9	99.7	20.0	19.6	98.1	1.54	67 - 131	20	
Isopropylbenzene	U	20.0	19.7	98.5	20.0	19.7	98.7	0.250	75 - 127	20	
Methylene chloride	U	20.0	18.7	93.4	20.0	18.7	93.4	0.0262	63 - 137	20	
Methyl t-butyl ether (MTBE)	U	20.0	20.1	101	20.0	20.2	101	0.470	65 - 123	20	
MEK (2-Butanone)	U	20.0	20.5	103	20.0	20.0	99.9	2.70	49 - 136	20	
MIBK (methyl isobutyl ketone)	U	20.0	19.3	96.5	20.0	19.3	96.6	0.0820	58 - 134	20	
n-Butylbenzene	U	20.0	20.2	101	20.0	20.1	101	0.497	69 - 137	20	
n-Propylbenzene	U	20.0	20.9	104	20.0	20.7	104	0.738	72 - 129	20	
m-,p-Xylene	U	40.0	39.6	99.1	40.0	39.6	99.1	0.0251	76 - 128	20	
Naphthalene	U	20.0	21.7	109	20.0	22.1	110	1.64	54 - 138	20	
o-Xylene	U	20.0	20.6	103	20.0	20.7	103	0.243	80 - 121	20	
p-Isopropyltoluene	U	20.0	20.5	103	20.0	20.4	102	0.822	73 - 130	20	
sec-Butylbenzene	U	20.0	20.3	101	20.0	19.9	99.6	1.71	72 - 127	20	
Styrene	U	20.0	21.2	106	20.0	20.9	105	1.31	65 - 134	20	
Trichloroethene	1.05	20.0	19.9	94.4	20.0	19.9	94.1	0.343	70 - 127	20	
tert-Butylbenzene	U	20.0	20.3	101	20.0	20.3	102	0.365	70 - 129	20	
Tetrachloroethene	0.317	20.0	19.2	94.5	20.0	19.2	94.4	0.176	66 - 128	20	
Toluene	U	20.0	19.5	97.6	20.0	19.6	97.9	0.338	77 - 122	20	
trans-1,2-Dichloroethene	U	20.0	19.2	96.2	20.0	19.2	96.2	0.0057	63 - 137	20	
trans-1,3-Dichloropropene	U	20.0	19.8	99.2	20.0	19.8	99.2	0.0164	59 - 135	20	
Trichlorofluoromethane	U	20.0	19.8	99.1	20.0	20.6	103	3.61	57 - 129	20	
Vinyl chloride	U	20.0	23.9	120	20.0	24.9	124	3.74	50 - 134	20	

* FAILS %REC LIMIT

\# FAILS RPD LIMIT

MS_MSD - Modified 03/06/2008

PDF File ID: 5526172

Report generated 10/17/2017 14:27

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100532
Instrument: HPMS6
Analyst: TMB
Workgroup: WG627256

Tune ID: WG627256-01
Run Date: 08/23/2017
Run Time: 15:38
File ID: 6M149724
Cal ID: HPMS6 - 23-AUG-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	15.9	7479	PASS
75.0	95.0	30.0	60.0	42.5	20035	PASS
95.0	95.0	100	100	100	47157	PASS
96.0	95.0	5.00	9.00	7.09	3344	PASS
173	174	0	2.00	0.344	151	PASS
174	95.0	50.0	100	93.2	43933	PASS
175	174	5.00	9.00	7.27	3196	PASS
176	174	95.0	101	98.0	43053	PASS
177	176	5.00	9.00	6.79	2922	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG627256-02	STD	01	08/23/2017 16:35	
WG627256-03	STD	01	08/23/2017 17:05	
WG627256-04	STD	01	08/23/2017 17:34	
WG627256-05	STD-CCV	01	08/23/2017 18:04	
WG627256-06	STD	01	08/23/2017 18:34	
WG627256-07	STD	01	08/23/2017 19:04	
WG627256-08	STD	01	08/23/2017 19:34	
WG627256-09	STD	01	08/23/2017 20:04	
WG627256-10	SSCV	01	08/23/2017 21:33	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5526174
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100532
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633150

Tune ID: WG633150-01
Run Date: 10/09/2017
Run Time: 12:18
File ID: 6M150512
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	22.1	9483	PASS
75.0	95.0	30.0	60.0	49.8	21354	PASS
95.0	95.0	100	100	100	42869	PASS
96.0	95.0	5.00	9.00	6.62	2837	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	79.7	34157	PASS
175	174	5.00	9.00	7.47	2552	PASS
176	174	95.0	101	99.0	33816	PASS
177	176	5.00	9.00	6.48	2192	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-02	STD	01	10/09/2017 13:13	
WG633150-03	STD	01	10/09/2017 13:41	
WG633150-04	STD	01	10/09/2017 14:10	
WG633150-05	STD	01	10/09/2017 14:40	
WG633150-06	STD	01	10/09/2017 15:10	
WG633150-07	STD	01	10/09/2017 15:39	
WG633150-08	STD-CCV	01	10/09/2017 16:09	
WG633150-09	STD	01	10/09/2017 16:38	
WG633150-10	STD	01	10/09/2017 17:08	
WG633150-11	STD	01	10/09/2017 17:37	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5526174
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100532
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633302

Tune ID: WG633302-01
Run Date: 10/10/2017
Run Time: 10:17
File ID: 6M150528
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.4	10184	PASS
75.0	95.0	30.0	60.0	49.3	23507	PASS
95.0	95.0	100	100	100	47688	PASS
96.0	95.0	5.00	9.00	7.05	3363	PASS
173	174	0	2.00	0.313	117	PASS
174	95.0	50.0	100	78.5	37416	PASS
175	174	5.00	9.00	7.26	2715	PASS
176	174	95.0	101	98.3	36773	PASS
177	176	5.00	9.00	6.68	2455	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633150-12	SSCV	01	10/10/2017 11:22	

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5526174
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100532 Tune ID: WG633454-01
Instrument: HPMS6 Run Date: 10/11/2017
Analyst: TMB Run Time: 10:01
Workgroup: WG633454 File ID: 6M150558
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.2	8514	PASS
75.0	95.0	30.0	60.0	49.0	19716	PASS
95.0	95.0	100	100	100	40224	PASS
96.0	95.0	5.00	9.00	7.13	2866	PASS
173	174	0	2.00	0	0	PASS
174	95.0	50.0	100	82.3	33101	PASS
175	174	5.00	9.00	7.46	2470	PASS
176	174	95.0	101	97.5	32269	PASS
177	176	5.00	9.00	6.58	2124	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633454-02	CCV	01	10/11/2017 10:27	
WG633456-01	CCV	01	10/11/2017 10:57	
WG633455-01	BLANK	01	10/11/2017 11:26	
WG633455-02	LCS	01	10/11/2017 11:56	
L17100532-20	MW-163-ODLS-15-MS	01	10/11/2017 12:55	
L17100532-10	MW-163-ODLS-15-MSD	01	10/11/2017 13:24	
L17100532-21	TB-1-ODLS-15	01	10/11/2017 14:22	
L17100532-13	DUP-1-ODLS-15	01	10/11/2017 15:51	
L17100532-12	MW-57-ODLS-15	01	10/11/2017 16:20	
L17100532-11	MW-70-ODLS-15	01	10/11/2017 16:48	
L17100532-09	MW-163-ODLS-15	01	10/11/2017 17:17	
L17100532-08	DUP-2-ODLS-15	01	10/11/2017 17:47	
L17100532-07	MW-149-ODLS-15	01	10/11/2017 18:16	
L17100532-05	MW-150-ODLS-15	01	10/11/2017 18:46	
L17100532-04	MW-166A-ODLS-15	01	10/11/2017 19:15	
L17100532-03	MW-246-ODLS-15	01	10/11/2017 19:44	
L17100532-02	MW-249-ODLS-15	01	10/11/2017 20:13	
L17100532-01	MW-166-ODLS-15	01	10/11/2017 20:43	
L17100532-06	MW-159-ODLS-15	01	10/11/2017 21:12	
WG633455-06	BLANK2	01	10/11/2017 22:10	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5526174
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.
ORGANIC INSTRUMENT CHECK

BFB

Login Number: L17100532
Instrument: HPMS6
Analyst: TMB
Workgroup: WG633849

Tune ID: WG633849-01
Run Date: 10/13/2017
Run Time: 09:35
File ID: 6M150620
Cal ID: HPMS6-09-OCT-17

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50.0	95.0	15.0	40.0	21.3	9670	PASS
75.0	95.0	30.0	60.0	48.4	21942	PASS
95.0	95.0	100	100	100	45352	PASS
96.0	95.0	5.00	9.00	6.67	3023	PASS
173	174	0	2.00	0.322	114	PASS
174	95.0	50.0	100	78.0	35381	PASS
175	174	5.00	9.00	7.29	2578	PASS
176	174	95.0	101	97.7	34573	PASS
177	176	5.00	9.00	6.85	2368	PASS

This check relates to the following samples:

Lab ID	Client ID	Tag	Date Analyzed	Q
WG633849-02	CCV	01	10/13/2017 10:32	
WG633729-01	CCV	01	10/13/2017 11:01	
WG633850-01	BLANK	01	10/13/2017 11:30	
WG633850-02	LCS	01	10/13/2017 12:00	
L17100532-15	MW-165-ODLS-15	01	10/13/2017 18:24	
L17100532-16	MW-190-ODLS-15	01	10/13/2017 18:53	
L17100532-18	MW-77-ODLS-15	01	10/13/2017 19:22	
L17100532-19	MW-06-ODLS-15	01	10/13/2017 19:52	
L17100532-14	MW-144-ODLS-15	01	10/13/2017 20:21	
L17100532-17	MW-87-ODLS-15	01	10/13/2017 20:50	
WG633850-06	BLANK2	01	10/13/2017 21:49	*

* Sample past 12 hour tune limit

TUNE - Modified 03/06/2008
PDF File ID: 5526174
Report generated 10/17/2017 14:28

Calibration Table Report
Method: 8260WT.M
Title: 8260B/624_WATER SOP:MSV01 10-09-17 - HPMS6
Last Calibration: Wed Oct 11 09:56:20 2017
Curve: WG633150
Calibration Files

		0.3	0.4	1	2	5	20	50	100	200	300			r^2	
		6M150514.D	6M150515.D	6M150516.D	6M150517.D	6M150518.D	6M150519.D	6M150520.D	6M150521.D	6M150522.D	6M150523.D				
	Compound											Avg	%RSD	Linear	Quad
I	Fluorobenzene	ISTD													
T	Dichlorodifluoromethane			0.382	0.375	0.381	0.446	0.459	0.441	0.424		0.415	8.498		
P	Chloromethane			0.504	0.318	0.328	0.326	0.315	0.318	0.319		0.347	19.992	1.000	
C	Vinyl Chloride		0.284	0.288	0.250	0.246	0.260	0.268	0.253	0.233		0.260	7.251		
T	1,3-Butadiene				0.250	0.213	0.228	0.199	0.176	0.163	0.138	0.195	20.003		0.999
T	Bromomethane			0.204	0.171	0.157	0.141	0.160	0.173	0.182		0.170	11.830		
T	Chloroethane			0.246	0.221	0.215	0.221	0.226	0.218	0.214		0.223	4.887		
T	Trichlorofluoromethane		0.485	0.479	0.475	0.489	0.483	0.499	0.477	0.476		0.483	1.687		
T	Diethyl ether			0.276	0.269	0.271	0.271	0.258	0.256		0.242	0.263	4.496		
T	Isoprene					0.424	0.457	0.455	0.430	0.428	0.402	0.433	4.778		
T	Acrolein				0.041	0.042	0.044	0.041	0.042		0.041	0.042	2.514		
T	1,1,2-Trichloro-1,2,2-Trifluoroet			0.243	0.244	0.251	0.250	0.257	0.248	0.251		0.249	1.931		
T	Acetone					0.084	0.083	0.083	0.076	0.075	0.071	0.078	6.993		
C	1,1-Dichloroethene		0.467	0.488	0.477	0.477	0.485	0.501	0.478	0.475		0.481	2.133		
T	Tert-Butyl Alcohol				0.022	0.023	0.023	0.022	0.023		0.023	0.023	2.114		
T	Dimethyl Sulfide					0.308	0.347	0.343	0.330	0.324	0.310	0.327	5.003		
T	Iodomethane			0.093	0.104	0.161	0.280	0.297	0.281	0.271	0.206	0.212	39.260		0.990
T	Methyl acetate					0.248	0.251	0.243	0.234	0.223	0.220	0.236	5.576		
T	Methylene Chloride			0.347	0.309	0.287	0.290	0.291	0.281	0.274		0.297	8.206		
T	Carbon Disulfide			1.004	0.901	0.894	0.952	0.936	0.887	0.850	0.784	0.901	7.365		
T	Acrylonitrile			0.099	0.101	0.100	0.105	0.108	0.108		0.099	0.103	4.072		
T	Methyl Tert Butyl Ether			0.655	0.652	0.674	0.703	0.728	0.706	0.698		0.688	4.128		
T	trans-1,2-Dichloroethene		0.255	0.279	0.258	0.273	0.271	0.280	0.268	0.268		0.269	3.306		
T	n-Hexane					0.454	0.492	0.487	0.459	0.454	0.431	0.463	4.956		
T	Diisopropyl ether			1.360	1.328	1.331	1.306	1.243	1.203		1.090	1.266	7.496		
T	Vinyl Acetate					0.495	0.522	0.543	0.541	0.532	0.515	0.525	3.459		
P	1,1-Dichloroethane		0.577	0.637	0.578	0.582	0.572	0.584	0.558	0.549		0.580	4.550		
T	Ethyl-Tert-Butyl ether			1.041	1.005	1.009	1.004	0.961	0.952		0.903	0.982	4.692		
T	2-Butanone					0.122	0.120	0.127	0.120	0.121	0.120	0.122	2.316		
T	Propionitrile			0.034	0.036	0.037	0.038	0.036	0.038		0.037	0.037	3.264		
T	2,2-Dichloropropane		0.466	0.479	0.447	0.444	0.427	0.449	0.437	0.443		0.449	3.687		
T	cis-1,2-Dichloroethene		0.266	0.297	0.300	0.293	0.300	0.310	0.298	0.293		0.294	4.282		
C	Chloroform	0.568	0.566	0.565	0.524	0.523	0.513	0.526	0.507	0.500		0.532	5.025		
T	1-Bromopropane			0.045	0.045	0.052	0.056	0.057	0.056	0.056	0.053	0.053	9.032		
T	Bromochloromethane		0.147	0.168	0.179	0.174	0.173	0.180	0.175	0.173		0.171	6.073		
T	Tetrahydrofuran				0.081	0.083	0.085	0.082	0.082		0.080	0.082	2.340		
S	Dibromofluoromethane			0.267	0.278	0.274	0.278	0.279	0.264	0.266	0.258	0.271	2.900		
T	1,1,1-Trichloroethane		0.472	0.469	0.461	0.465	0.461	0.479	0.462	0.459		0.466	1.509		
T	Cyclohexane			0.517	0.524	0.553	0.594	0.597	0.570	0.561	0.533	0.556	5.454		
T	1,1-Dichloropropene			0.361	0.369	0.381	0.381	0.395	0.380	0.378		0.378	2.765		
T	Tert-Amyl-Methyl ether			0.768	0.766	0.767	0.766	0.741	0.738		0.705	0.750	3.165		
T	Carbon Tetrachloride		0.388	0.427	0.399	0.416	0.417	0.437	0.421	0.422		0.4159	3.6947		
S	1,2-Dichloroethane-d4				0.334	0.339	0.324	0.327	0.31	0.312	0.301	0.3211	4.3402		
T	Heptane											0	0		
T	1,2-Dichloroethane		0.42	0.397	0.414	0.406	0.405	0.416	0.401	0.394		0.4066	2.2727		
T	Benzene		1.161	1.212	1.131	1.103	1.082	1.106	1.047	0.987		1.1036	6.2019		
T	Trichloroethene		0.283	0.3	0.275	0.28	0.283	0.293	0.283	0.277		0.2842	2.9387		
T	Methylcyclohexane					0.411	0.448	0.447	0.429	0.422	0.402	0.4265	4.3947		
C	1,2-Dichloropropane		0.303	0.327	0.326	0.32	0.319	0.327	0.319	0.313		0.3193	2.5566		
T	1,4-Dioxane					0.002	0.002	0.002	0.002		0.002	0.0021	5.6909		
T	Bromodichloromethane		0.367	0.399	0.399	0.39	0.395	0.413	0.402	0.398		0.3954	3.295		
T	Dibromomethane		0.121	0.143	0.151	0.149	0.152	0.158	0.155	0.152		0.1477	7.9054		
T	2-Chloroethyl Vinyl Ether			0.118	0.129	0.141	0.159	0.17	0.154	0.154	0.152	0.1471	11.446		
T	4-Methyl-2-Pentanone					0.086	0.096	0.102	0.099	0.098	0.097	0.0965	5.7849		
T	cis-1,3-Dichloropropene		0.378	0.4	0.403	0.422	0.442	0.465	0.454	0.444		0.4258	7.1038		
T	Dimethyl Disulfide					0.212	0.264	0.274	0.271	0.268	0.257	0.2576	8.8892		
I	Chlorobenzene-d5	ISTD													
S	Toluene-d8			1.352	1.367	1.34	1.32	1.282	1.228	1.224	1.168	1.285	5.5762		
C	Toluene		1.436	1.521	1.529	1.524	1.521	1.463	1.361			1.4902	4.45		
T	Ethyl Methacrylate			0.317	0.334	0.376	0.441	0.44	0.441	0.434	0.427	0.4014	12.868		
T	Paraldehyde											0	0		
T	trans-1,3-Dichloropropene			0.467	0.509	0.509	0.537	0.553	0.545	0.54		0.5228	5.7113		
T	1,1,2-Trichloroethane		0.294	0.291	0.302	0.293	0.295	0.293	0.29	0.283		0.2926	1.819		
T	2-Hexanone					0.216	0.243	0.255	0.25	0.251	0.25	0.2442	5.8163		
T	1,3-Dichloropropane		0.51	0.499	0.512	0.511	0.517	0.52	0.514	0.504		0.5108	1.3317		
T	Tetrachloroethene		0.396	0.397	0.395	0.397	0.392	0.395	0.386	0.381		0.3925	1.5267		
T	Dibromochloromethane		0.331	0.348	0.371	0.372	0.391	0.401	0.399	0.393		0.3757	6.7743		
T	1,2-Dibromoethane		0.254	0.275	0.277	0.272	0.279	0.289	0.291	0.288		0.2781	4.3798		
T	1-Chlorohexane		0.38	0.404	0.428	0.46	0.513	0.509	0.499	0.488	0.464	0.4605	10.375		
P	Chlorobenzene		1.087	1.1	1.076	1.039	1.016	1.002	0.96	0.888		1.0208	6.995		
T	1,1,1,2-Tetrachloroethane		0.337	0.393	0.387	0.388	0.39	0.389	0.383	0.364		0.3788	5.0785		
C	Ethylbenzene		0.494	0.552	0.535	0.54	0.549	0.547	0.53	0.5		0.5308	4.1919		
T	m-,p-Xylene		0.617	0.674	0.656	0.669	0.664	0.656	0.629	0.569		0.6419	5.4993		
T	o-Xylene			0.607	0.604	0.618	0.661	0.661	0.645	0.608		0.6292	4.1021		
T	Styrene		0.857	0.952	1.01	1.065	1.113	1.13	1.11	1.024		1.0327	9.0226		
P	Bromoform			0.198	0.217	0.223	0.232	0.244	0.251	0.244		0.2298	8.0931		
T	Isopropylbenzene		1.43	1.557	1.578	1.625	1.689	1.691	1.635	1.466		1.584	6.0921		
I	1,4-Dichlorobenzene-d4	ISTD													
P	1,1,2,2-Tetrachloroethane		0.595	0.629	0.666	0.668	0.645	0.66	0.649	0.651		0.6455	3.6925		
S	p-Bromofluorobenzene			0.89	0.936	0.938	0.967	0.97	0.933	0.98	0.941	0.9445	3.018		

T	1,2,3-Trichloropropane			0.187	0.203	0.19	0.197	0.199	0.195	0.198		0.1955	2.8482
T	trans-1,4-Dichloro-2-Butene			0.15	0.182	0.194	0.211	0.218	0.22	0.23	0.216	0.2026	12.964
T	n-Propylbenzene		3.171	3.347	3.45	3.64	3.691	3.722	3.505	3.196		3.4652	6.19
T	Bromobenzene	0.813	0.748	0.818	0.828	0.813	0.825	0.826	0.795	0.799		0.8072	3.1093
T	1,3,5-Trimethylbenzene		2.067	2.307	2.403	2.547	2.599	2.656	2.545	2.448		2.4465	7.7615
T	2-Chlorotoluene		2.321	2.565	2.495	2.505	2.503	2.543	2.391	2.263		2.4483	4.4913
T	4-Chlorotoluene		1.987	2.141	2.201	2.206	2.153	2.141	2.084	2.05		2.1203	3.5624
T	a-Methylstyrene					1.301	1.513	1.514	1.469	1.426	1.273	1.416	7.4426
T	tert-Butylbenzene			0.48	0.507	0.532	0.545	0.553	0.534	0.528		0.5254	4.7351
T	1,2,4-Trimethylbenzene			2.631	2.687	2.714	2.721	2.745	2.619	2.465		2.6547	3.6067
T	sec-Butylbenzene			2.95	2.949	3.088	3.131	3.185	3.022	2.822		3.021	4.1295
T	p-Isopropyltoluene			2.443	2.572	2.729	2.792	2.835	2.702	2.513		2.6554	5.561
T	1,3-Dichlorobenzene		1.614	1.611	1.594	1.59	1.585	1.59	1.534	1.476		1.5741	2.9589
T	1,4-Dichlorobenzene	2.103	1.864	1.724	1.698	1.626	1.584	1.595	1.52	1.459		1.686	11.645
T	n-Butylbenzene			2.275	2.312	2.477	2.489	2.539	2.426	2.283		2.4002	4.5225
T	1,2-Dichlorobenzene	1.666	1.589	1.544	1.516	1.481	1.493	1.494	1.434	1.368		1.5095	5.6951
T	1,2-Dibromo-3-Chloropropane				0.101	0.118	0.124	0.131	0.127	0.129		0.1217	9.3235
T	1,2,4-Trichlorobenzene		1.087	1.034	1.036	1.027	1.074	1.082	1.047	1.04		1.0535	2.2472
T	Hexachlorobutadiene		0.441	0.493	0.436	0.439	0.455	0.454	0.446	0.449		0.4515	3.9641
T	Naphthalene		1.916	1.949	2	2.083	2.237	2.305	2.2	2.089		2.0977	6.6903
T	1,2,3-Trichlorobenzene	1.082	0.997	0.99	0.948	0.96	0.992	0.999	0.96	0.949		0.9863	4.1899

Wed Oct 11 11:24:15 2017

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100532 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	42.5	ug/L	0.409	15.1	25	
1,2-Dichloropropane	CCC	50.0	46.4	ug/L	0.296	7.30	25	
Chloroform	CCC	50.0	43.8	ug/L	0.467	12.3	25	
Ethylbenzene	CCC	50.0	48.3	ug/L	0.512	3.50	25	
Toluene	CCC	50.0	47.0	ug/L	1.40	6.00	25	
Vinyl Chloride	CCC	50.0	56.9	ug/L	0.296	13.8	25	
1,1,2,2-Tetrachloroethane	SPCC	50.0	44.2	ug/L	0.571	11.5	25	
1,1-Dichloroethane	SPCC	50.0	42.5	ug/L	0.493	15.0	25	
Bromoform	SPCC	50.0	44.6	ug/L	0.205	10.8	25	
Chlorobenzene	SPCC	50.0	46.6	ug/L	0.952	6.80	25	
Chloromethane	SPCC	50.0	63.5	ug/L	0.405	27.0	25	*
1,1,1,2-Tetrachloroethane		50.0	46.9	ug/L	0.356	6.10	25	
1,1,1-Trichloroethane		50.0	45.5	ug/L	0.424	8.90	25	
1,1,2-Trichloroethane		50.0	44.5	ug/L	0.261	10.9	25	
1,1-Dichloropropene		50.0	47.2	ug/L	0.357	5.60	25	
1,2,3-Trichlorobenzene		50.0	47.4	ug/L	0.935	5.20	25	
1,2,3-Trichloropropane		50.0	45.3	ug/L	0.177	9.40	25	
1,2,4-Trichlorobenzene		50.0	50.0	ug/L	1.05	0.100	25	
1,2,4-Trimethylbenzene		50.0	51.1	ug/L	2.71	2.20	25	
1,2-Dichloroethane		50.0	43.1	ug/L	0.350	13.8	25	
1,2-Dichlorobenzene		50.0	47.7	ug/L	1.44	4.50	25	
1,2-Dibromo-3-Chloropropane		50.0	45.1	ug/L	0.110	9.90	25	
1,2-Dibromoethane		50.0	45.8	ug/L	0.255	8.30	25	
1,3,5-Trimethylbenzene		50.0	52.7	ug/L	2.58	5.30	25	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.70	25	
1,3-Dichloropropane		50.0	46.7	ug/L	0.477	6.60	25	
1,4-Dichlorobenzene		50.0	46.3	ug/L	1.56	7.40	25	
1,4-Dioxane		200	187	ug/L	0.00200	6.70	25	
1-Chlorohexane		50.0	53.4	ug/L	0.492	6.80	25	
2,2-Dichloropropane		50.0	42.3	ug/L	0.380	15.3	25	
2-Hexanone		50.0	44.0	ug/L	0.215	12.1	25	
2-Chlorotoluene		50.0	48.5	ug/L	2.37	3.10	25	
4-Chlorotoluene		50.0	51.2	ug/L	2.17	2.40	25	
Acetone		50.0	43.3	ug/L	0.0678	13.4	25	
Benzene		50.0	45.3	ug/L	1.00	9.30	25	
Bromobenzene		50.0	47.8	ug/L	0.772	4.30	25	
Bromochloromethane		50.0	45.7	ug/L	0.157	8.60	25	
Bromodichloromethane		50.0	44.8	ug/L	0.354	10.4	25	
Bromomethane		50.0	52.9	ug/L	0.180	5.70	25	
Carbon Disulfide		50.0	43.5	ug/L	0.783	13.1	25	
Carbon Tetrachloride		50.0	45.4	ug/L	0.378	9.20	25	
Chloroethane		50.0	57.1	ug/L	0.255	14.1	25	

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5526173
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.
ALTERNATE SOURCE CALIBRATION REPORT

Login Number: L17100532 Run Date: 10/10/2017 Sample ID: WG633150-12
Instrument ID: HPMS6 Run Time: 11:22 Method: 8260B
File ID: 6M150530 Analyst: TMB QC Key: AF40
ICal Workgroup: WG633150 Cal ID: HPMS6 - 09-OCT-17

Analyte		Expected	Found	Units	RF	%D	UCL	Q
cis-1,2-Dichloroethene		50.0	46.8	ug/L	0.276	6.40	25	
cis-1,3-Dichloropropene		50.0	51.9	ug/L	0.442	3.90	25	
Dibromochloromethane		50.0	45.6	ug/L	0.343	8.70	25	
Dibromomethane		50.0	45.1	ug/L	0.133	9.80	25	
Dichlorodifluoromethane		50.0	67.0	ug/L	0.556	33.9	25	*
Hexachlorobutadiene		50.0	52.4	ug/L	0.473	4.70	25	
Isopropylbenzene		50.0	48.9	ug/L	1.55	2.20	25	
Methylene Chloride		50.0	42.8	ug/L	0.254	14.5	25	
Methyl Tert Butyl Ether		50.0	45.6	ug/L	0.627	8.80	25	
2-Butanone		50.0	43.7	ug/L	0.107	12.6	25	
4-Methyl-2-Pentanone		50.0	44.8	ug/L	0.0865	10.4	25	
n-Butylbenzene		50.0	52.4	ug/L	2.51	4.70	25	
n-Propylbenzene		50.0	52.5	ug/L	3.64	5.10	25	
m-,p-Xylene		100	96.4	ug/L	0.619	3.60	25	
Naphthalene		50.0	48.5	ug/L	2.04	2.90	25	
o-Xylene		50.0	50.4	ug/L	0.634	0.800	25	
p-Isopropyltoluene		50.0	52.6	ug/L	2.79	5.20	25	
sec-Butylbenzene		50.0	51.6	ug/L	3.12	3.10	25	
Styrene		50.0	52.1	ug/L	1.08	4.20	25	
Trichloroethene		50.0	46.6	ug/L	0.265	6.80	25	
tert-Butylbenzene		50.0	52.4	ug/L	0.550	4.70	25	
Tetrachloroethene		50.0	46.8	ug/L	0.367	6.40	25	
trans-1,2-Dichloroethene		50.0	45.6	ug/L	0.245	8.80	25	
trans-1,3-Dichloropropene		50.0	46.8	ug/L	0.489	6.50	25	
Trichlorofluoromethane		50.0	50.1	ug/L	0.484	0.200	25	

* Exceeds %D Limit

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

ALT - Modified 09/06/2007
Version 1.5 PDF File ID: 5526173
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100532 Run Date: 10/11/2017 Sample ID: WG633454-02

Instrument ID: HPMS6 Run Time: 10:27 Method: 8260B

File ID: 6M150559 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG633455 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.9	ug/L	0.480	0.176	20	
1,2-Dichloropropane	CCC	50.0	49.4	ug/L	0.315	1.28	20	
Chloroform	CCC	50.0	47.3	ug/L	0.504	5.38	20	
Ethylbenzene	CCC	50.0	52.0	ug/L	0.553	4.07	20	
Toluene	CCC	50.0	51.2	ug/L	1.53	2.50	20	
Vinyl Chloride	CCC	50.0	43.5	ug/L	0.227	13.0	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	45.6	ug/L	0.588	8.88	20	
1,1-Dichloroethane	SPCC	50.0	48.2	ug/L	0.559	3.51	20	
Bromoform	SPCC	50.0	48.1	ug/L	0.221	3.75	20	
Chlorobenzene	SPCC	50.0	49.0	ug/L	1.00	1.93	20	
Chloromethane	SPCC	50.0	42.4	ug/L	0.271	15.3	20	
Xylenes		150	156	ug/L	0.662	3.69	20	
1,1,1,2-Tetrachloroethane		50.0	50.6	ug/L	0.383	1.13	20	
1,1,1-Trichloroethane		50.0	49.4	ug/L	0.460	1.27	20	
1,1,2-Trichloroethane		50.0	47.0	ug/L	0.275	6.08	20	
1,1-Dichloropropene		50.0	51.2	ug/L	0.387	2.38	20	
1,2,3-Trichlorobenzene		50.0	47.5	ug/L	0.936	5.05	20	
1,2,3-Trichloropropane		50.0	44.4	ug/L	0.174	11.2	20	
1,2,4-Trichlorobenzene		50.0	50.4	ug/L	1.06	0.708	20	
1,2,4-Trimethylbenzene		50.0	51.6	ug/L	2.74	3.24	20	
1,2-Dichloroethane		50.0	46.7	ug/L	0.380	6.65	20	
1,2-Dichlorobenzene		50.0	48.0	ug/L	1.45	3.92	20	
1,2-Dibromo-3-Chloropropane		50.0	44.9	ug/L	0.109	10.1	20	
1,2-Dibromoethane		50.0	48.2	ug/L	0.268	3.69	20	
1,3,5-Trimethylbenzene		50.0	54.7	ug/L	2.67	9.30	20	
1,3-Dichlorobenzene		50.0	50.5	ug/L	1.59	0.928	20	
1,3-Dichloropropane		50.0	47.7	ug/L	0.488	4.57	20	
1,4-Dichlorobenzene		50.0	46.8	ug/L	1.58	6.32	20	
1,4-Dioxane		200	170	ug/L	0.00180	14.9	20	
1-Chlorohexane		50.0	55.0	ug/L	0.507	10.1	20	
2,2-Dichloropropane		50.0	48.3	ug/L	0.434	3.34	20	
2-Hexanone		50.0	42.2	ug/L	0.206	15.5	20	
2-Chlorotoluene		50.0	53.4	ug/L	2.62	6.81	20	
4-Chlorotoluene		50.0	49.2	ug/L	2.08	1.67	20	
Acetone		50.0	44.9	ug/L	0.0703	10.3	20	
Benzene		50.0	48.7	ug/L	1.08	2.59	20	
Bromobenzene		50.0	50.4	ug/L	0.814	0.821	20	
Bromochloromethane		50.0	49.8	ug/L	0.171	0.330	20	
Bromodichloromethane		50.0	49.5	ug/L	0.391	1.03	20	
Bromomethane		50.0	43.7	ug/L	0.148	12.6	20	
Carbon Disulfide		50.0	49.2	ug/L	0.887	1.59	20	
Carbon Tetrachloride		50.0	50.8	ug/L	0.422	1.53	20	

CCV - Modified 03/05/2008

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Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100532 Run Date: 10/11/2017 Sample ID: WG633454-02
Instrument ID: HPMS6 Run Time: 10:27 Method: 8260B
File ID: 6M150559 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG633455 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	47.4	ug/L	0.212	5.18	20	
cis-1,2-Dichloroethene		50.0	50.9	ug/L	0.300	1.76	20	
cis-1,3-Dichloropropene		50.0	52.5	ug/L	0.448	5.08	20	
Dibromochloromethane		50.0	49.9	ug/L	0.375	0.235	20	
Dibromomethane		50.0	48.6	ug/L	0.144	2.74	20	
Dichlorodifluoromethane		50.0	49.8	ug/L	0.413	0.469	20	
Hexachlorobutadiene		50.0	51.2	ug/L	0.462	2.36	20	
Isopropylbenzene		50.0	53.5	ug/L	1.70	7.07	20	
Methylene Chloride		50.0	46.6	ug/L	0.277	6.78	20	
Methyl Tert Butyl Ether		50.0	46.1	ug/L	0.635	7.76	20	
2-Butanone		50.0	40.8	ug/L	0.0994	18.4	20	
4-Methyl-2-Pentanone		50.0	42.8	ug/L	0.0826	14.3	20	
n-Butylbenzene		50.0	53.5	ug/L	2.57	7.02	20	
n-Propylbenzene		50.0	54.2	ug/L	3.75	8.33	20	
m-,p-Xylene		100	103	ug/L	0.659	2.68	20	
Naphthalene		50.0	48.5	ug/L	2.03	2.99	20	
o-Xylene		50.0	52.9	ug/L	0.665	5.70	20	
p-Isopropyltoluene		50.0	54.0	ug/L	2.87	8.09	20	
sec-Butylbenzene		50.0	53.3	ug/L	3.22	6.53	20	
Styrene		50.0	54.3	ug/L	1.12	8.68	20	
Trichloroethene		50.0	50.9	ug/L	0.289	1.72	20	
tert-Butylbenzene		50.0	53.2	ug/L	0.559	6.46	20	
Tetrachloroethene		50.0	51.4	ug/L	0.404	2.87	20	
trans-1,2-Dichloroethene		50.0	50.6	ug/L	0.272	1.14	20	
trans-1,3-Dichloropropene		50.0	50.3	ug/L	0.526	0.518	20	
Trichlorofluoromethane		50.0	48.5	ug/L	0.468	3.02	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100532 Run Date: 10/13/2017 Sample ID: WG633849-02

Instrument ID: HPMS6 Run Time: 10:32 Method: 8260B

File ID: 6M150622 Analyst: TMB QC Key: AF40

Workgroup (AAB#): WG633850 Cal ID: HPMS6 - 09-OCT-17

Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
1,1-Dichloroethene	CCC	50.0	49.4	ug/L	0.475	1.18	20	
1,2-Dichloropropane	CCC	50.0	49.8	ug/L	0.318	0.446	20	
Chloroform	CCC	50.0	46.8	ug/L	0.499	6.31	20	
Ethylbenzene	CCC	50.0	50.7	ug/L	0.539	1.47	20	
Toluene	CCC	50.0	50.6	ug/L	1.51	1.16	20	
Vinyl Chloride	CCC	50.0	45.1	ug/L	0.235	9.90	20	
1,1,2,2-Tetrachloroethane	SPCC	50.0	50.5	ug/L	0.652	0.950	20	
1,1-Dichloroethane	SPCC	50.0	48.3	ug/L	0.559	3.47	20	
Bromoform	SPCC	50.0	50.0	ug/L	0.230	0.0502	20	
Chlorobenzene	SPCC	50.0	47.9	ug/L	0.979	4.12	20	
Chloromethane	SPCC	50.0	45.6	ug/L	0.291	8.86	20	
Xylenes		150	152	ug/L	0.645	1.11	20	
1,1,1,2-Tetrachloroethane		50.0	49.7	ug/L	0.376	0.697	20	
1,1,1-Trichloroethane		50.0	48.3	ug/L	0.450	3.45	20	
1,1,2-Trichloroethane		50.0	49.2	ug/L	0.288	1.61	20	
1,1-Dichloropropene		50.0	50.4	ug/L	0.381	0.778	20	
1,2,3-Trichlorobenzene		50.0	47.0	ug/L	0.927	6.00	20	
1,2,3-Trichloropropane		50.0	49.2	ug/L	0.192	1.64	20	
1,2,4-Trichlorobenzene		50.0	48.6	ug/L	1.02	2.84	20	
1,2,4-Trimethylbenzene		50.0	50.2	ug/L	2.66	0.366	20	
1,2-Dichloroethane		50.0	47.7	ug/L	0.388	4.51	20	
1,2-Dichlorobenzene		50.0	47.1	ug/L	1.42	5.80	20	
1,2-Dibromo-3-Chloropropane		50.0	49.2	ug/L	0.120	1.62	20	
1,2-Dibromoethane		50.0	51.0	ug/L	0.284	2.08	20	
1,3,5-Trimethylbenzene		50.0	53.2	ug/L	2.60	6.40	20	
1,3-Dichlorobenzene		50.0	48.7	ug/L	1.53	2.59	20	
1,3-Dichloropropane		50.0	50.3	ug/L	0.514	0.626	20	
1,4-Dichlorobenzene		50.0	45.5	ug/L	1.53	9.07	20	
1,4-Dioxane		200	189	ug/L	0.00200	5.59	20	
1-Chlorohexane		50.0	54.1	ug/L	0.498	8.15	20	
2,2-Dichloropropane		50.0	48.4	ug/L	0.435	3.23	20	
2-Hexanone		50.0	50.9	ug/L	0.249	1.82	20	
2-Chlorotoluene		50.0	52.1	ug/L	2.55	4.27	20	
4-Chlorotoluene		50.0	49.0	ug/L	2.08	2.01	20	
Acetone		50.0	47.8	ug/L	0.0750	4.31	20	
Benzene		50.0	48.3	ug/L	1.07	3.34	20	
Bromobenzene		50.0	50.0	ug/L	0.806	0.0970	20	
Bromochloromethane		50.0	50.1	ug/L	0.172	0.217	20	
Bromodichloromethane		50.0	49.3	ug/L	0.390	1.48	20	
Bromomethane		50.0	38.6	ug/L	0.131	22.7	20	*
Carbon Disulfide		50.0	49.2	ug/L	0.887	1.55	20	
Carbon Tetrachloride		50.0	49.0	ug/L	0.408	1.98	20	

CCV - Modified 03/05/2008

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Microbac Laboratories Inc.
CONTINUING CALIBRATION VERIFICATION (CCV)

Login Number: L17100532 Run Date: 10/13/2017 Sample ID: WG633849-02
Instrument ID: HPMS6 Run Time: 10:32 Method: 8260B
File ID: 6M150622 Analyst: TMB QC Key: AF40
Workgroup (AAB#): WG633850 Cal ID: HPMS6 - 09-OCT-17
Matrix: WATER

Analyte		Expected	Found	UNITS	RF	%D	UCL	Q
Chloroethane		50.0	48.7	ug/L	0.218	2.53	20	
cis-1,2-Dichloroethene		50.0	50.3	ug/L	0.297	0.677	20	
cis-1,3-Dichloropropene		50.0	53.2	ug/L	0.453	6.46	20	
Dibromochloromethane		50.0	50.9	ug/L	0.383	1.88	20	
Dibromomethane		50.0	50.7	ug/L	0.150	1.44	20	
Dichlorodifluoromethane		50.0	50.0	ug/L	0.415	0.0216	20	
Hexachlorobutadiene		50.0	47.1	ug/L	0.425	5.81	20	
Isopropylbenzene		50.0	51.9	ug/L	1.65	3.89	20	
Methylene Chloride		50.0	47.4	ug/L	0.282	5.27	20	
Methyl Tert Butyl Ether		50.0	50.3	ug/L	0.692	0.646	20	
2-Butanone		50.0	49.0	ug/L	0.119	1.98	20	
4-Methyl-2-Pentanone		50.0	50.0	ug/L	0.0965	0.0196	20	
n-Butylbenzene		50.0	50.8	ug/L	2.44	1.55	20	
n-Propylbenzene		50.0	53.1	ug/L	3.68	6.11	20	
m-,p-Xylene		100	100	ug/L	0.643	0.218	20	
Naphthalene		50.0	51.2	ug/L	2.15	2.35	20	
o-Xylene		50.0	51.4	ug/L	0.647	2.89	20	
p-Isopropyltoluene		50.0	51.3	ug/L	2.73	2.66	20	
sec-Butylbenzene		50.0	50.8	ug/L	3.07	1.62	20	
Styrene		50.0	53.4	ug/L	1.10	6.85	20	
Trichloroethene		50.0	48.8	ug/L	0.277	2.41	20	
tert-Butylbenzene		50.0	50.8	ug/L	0.534	1.60	20	
Tetrachloroethene		50.0	49.4	ug/L	0.388	1.14	20	
trans-1,2-Dichloroethene		50.0	50.0	ug/L	0.269	0.0576	20	
trans-1,3-Dichloropropene		50.0	52.0	ug/L	0.544	3.96	20	
Trichlorofluoromethane		50.0	48.0	ug/L	0.464	3.91	20	

* Exceeds %D Criteria

CCC Calibration Check Compounds
SPCC System Performance Check Compounds

CCV - Modified 03/05/2008
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Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100532
Instrument ID: HPMS6
Workgroup (AAB#): WG633455

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100532-01	1.00	01	285390	529448	737037
L17100532-02	1.00	01	290511	535466	743133
L17100532-03	1.00	01	288347	539400	752870
L17100532-04	1.00	01	287542	534465	748894
L17100532-05	1.00	01	295797	543511	758448
L17100532-06	1.00	01	285689	537874	745133
L17100532-07	1.00	01	298308	556870	777967
L17100532-08	1.00	01	302104	557789	780511
L17100532-09	1.00	01	307918	573454	793658
L17100532-10	1.00	01	340666	615545	836397
L17100532-11	1.00	01	309137	568712	791982
L17100532-12	1.00	01	304384	568060	794595
L17100532-13	1.00	01	304527	557166	785880
L17100532-20	1.00	01	327314	586397	796692
L17100532-21	1.00	01	317822	584768	815471
WG633455-01	1.00	01	314352	587825	828325
WG633455-02	1.00	01	325617	585631	804461

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5526386
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.

INTERNAL STANDARD AREA SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100532
Instrument ID: HPMS6
Workgroup (AAB#): WG633850

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	326554	590513	782510
Upper Limit	NA	NA	653108	1181026	1565020
Lower Limit	NA	NA	163277	295257	391255
L17100532-14	1.00	01	285964	536787	741735
L17100532-15	1.00	01	293894	550142	768771
L17100532-16	1.00	01	296536	549659	763270
L17100532-17	1.00	01	285988	533390	739874
L17100532-18	1.00	01	292801	539757	742529
L17100532-19	1.00	01	293545	536607	749123
WG633850-01	1.00	01	340321	635862	878728
WG633850-02	1.00	01	344815	637168	877988

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_ICAL - Modified 03/06/2008
PDF File ID: 5526386
Report generated 10/17/2017 14:28

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100532
Instrument ID: HPMS6
Workgroup (AAB#): WG633455

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100532-01	1.00	01	18.13	15.1	11.22
L17100532-02	1.00	01	18.13	15.1	11.22
L17100532-03	1.00	01	18.12	15.1	11.22
L17100532-04	1.00	01	18.13	15.1	11.22
L17100532-05	1.00	01	18.13	15.1	11.22
L17100532-06	1.00	01	18.12	15.09	11.22
L17100532-07	1.00	01	18.13	15.1	11.22
L17100532-08	1.00	01	18.13	15.1	11.22
L17100532-09	1.00	01	18.13	15.1	11.22
L17100532-10	1.00	01	18.12	15.09	11.21
L17100532-11	1.00	01	18.13	15.1	11.22
L17100532-12	1.00	01	18.12	15.09	11.22
L17100532-13	1.00	01	18.13	15.1	11.22
L17100532-20	1.00	01	18.13	15.1	11.22
L17100532-21	1.00	01	18.12	15.09	11.22
WG633455-01	1.00	01	18.13	15.1	11.22
WG633455-02	1.00	01	18.12	15.09	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5526387
Report generated: 10/17/2017 14:28

Microbac Laboratories Inc.

INTERNAL STANDARD RETENTION TIME SUMMARY
(COMPARED TO MIDPOINT OF ICAL)

Login Number: L17100532
Instrument ID: HPMS6
Workgroup (AAB#): WG633850

ICAL CCV Number: WG633150-08
CAL ID: HPMS6-09-OCT-17
Matrix: WATER

Sample Number	Dilution	Tag	IS-1	IS-2	IS-3
WG633150-08	NA	NA	18.13	15.1	11.22
Upper Limit	NA	NA	18.63	15.6	11.72
Lower Limit	NA	NA	17.63	14.6	10.72
L17100532-14	1.00	01	18.13	15.1	11.22
L17100532-15	1.00	01	18.12	15.1	11.22
L17100532-16	1.00	01	18.12	15.09	11.22
L17100532-17	1.00	01	18.12	15.1	11.22
L17100532-18	1.00	01	18.12	15.09	11.22
L17100532-19	1.00	01	18.12	15.09	11.21
WG633850-01	1.00	01	18.12	15.1	11.22
WG633850-02	1.00	01	18.12	15.1	11.22

IS-1 - 1,4-Dichlorobenzene-d4
IS-2 - Chlorobenzene-d5
IS-3 - Fluorobenzene

Underline = Response outside limits

INTERNAL_STD_RT_ICAL - Modified 03/06/2008
PDF File ID: 5526387
Report generated: 10/17/2017 14:28

3.0 Attachments

Microbac Laboratories Inc.
Ohio Valley Division Analyst List
October 23, 2017

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001 – BIO-CHEM TESTING WVDEP 220	002 – REIC Consultants, Inc. WVDEP 060
003 – Sturm Environmental	004 – MICROBAC PITTSBURGH
005 – ES LABORATORIES	006 – ALCOSAN LABORATORIES
007 – ALS LABORATORIES	008 – BENCHMARK LABORATORIES
010 – MICROBAC CHICAGOLAND	AC – AMBER R. CARMICHAEL
ADC – ANTHONY D. CANTER	ADG – APRIL D. GREENE
ALS – ADRIANE L. STEED	AWE – ANDREW W. ESSIG
AZH – AFTER HOURS	BJO – BRIAN J. OGDEN
BLG – BRENDA L. GREENWALT	BLR – BRANDON L. RICHARDS
BNB – Brandi N. Bentley	BRG – BRENDA R. GREGORY
CAS – Craig A. Smith	CEB – CHAD E. BARNES
CLC – CHRYS L. CRAWFORD	CLG – CARA L. GREENWOOD
CLS – CARA L. STRICKLER	CPD – CHAD P. DAVIS
CSH – CHRIS S. HILL	CV – Carl Volkman
DAK – DEAN A. KETELSEN	DCM – DAVID C. MERCKLE
DEV – DAVID E. VANDENBERG	DIH – DEANNA I. HESSON
DLB – DAVID L. BUMGARNER	DLP – DOROTHY L. PAYNE
DSM – DAVID S. MOSSOR	DTG – DOMINIC T. GEHRET
ECL – ERIC C. LAWSON	EPT – ETHAN P. TIDD
ERP – ERIN R. PORTER	FJB – FRANCES J. BOLDEN
HRF – HEATHER R. FAIRCHILD	JDH – JUSTIN D. HESSON
JDS – JARED D. SMITH	JKP – JACQUELINE K. PARSONS
JLD – JESSICA L. DELONG	JST – JOSHUA S. TAYLOR
JTP – JOSHUA T. PEMBERTON	JWR – JOHN W. RICHARDS
JWS – JACK W. SHEAVES	JYH – JI Y. HU
KAK – KATHY A. KIRBY	KDD – Katelyn D. Daley
KEB – KATIE E. BARNES	KHR – KIM H. RHODES
KKB – KERRI K. BUCK	KRA – KATHY R. ALBERTSON
KRP – KATHY R. PARSONS	LJH – Lacey J. Hendershot
LLS – LARRY L. STEPHENS	LSB – LESLIE S. BUCINA
LSJ – LAURA S. JONES	MAP – MARLA A. PORTER
MBK – MORGAN B. KNOWLTON	MES – MARY E. SCHILLING
MMB – MAREN M. BEERY	MRT – MICHELLE R. TAYLOR
OJE – OMOYEMWEN J. ENGLISH	PDM – PIERCE D. MORRIS
PIT – MICROBAC WARRENDALE	RAF – REBEKAH A. FINN
REK – BOB E. KYER	RLB – BOB BUCHANAN
RNP – RICK N. PETTY	SAV – SARAH A. VANDENBERG
SCA – SUEELLEN C. ADAMS	SCB – SARAH C. BOGOLIN
SCJ – SUE ELLEN C. JOHNSON	SDC – SHALYN D. CONLEY
TB – TODD BOYLE	TMB – TIFFANY M. BAILEY
TMM – TAMMY M. MORRIS	VC – VICKI COLLIER
WTD – WADE T. DELONG	XXX – UNAVAILABLE OR SUBCONTRACT
ZTB – ZACH T. BARNES	

Microbac Laboratories Inc.
List of Valid Qualifiers
October 23, 2017

Qualkey: AFCEE40

Qualifier	Description
*	Surrogate or spike compound out of range
*	This surrogate or spike analyte was diluted out.
>	Result is greater than the associated numerical value.
B	The analyte was found in an associated blank, as well as in the sample.
D	This analyte was quantified at a secordary dilution.
F	Found; the analyte was positively identified with concentration above MDL but below RL.
J	The analyte was positively identified, but the quantitation is an estimate.
M	Matrix effect; the concentration is an estimate due to matrix effect.
NF	This compound was not detected by library search.
NFL	No free liquid was observed for this sample.
NS	This compound was not spiked in the LCS, MS or MSD.
Q	One or more quality control criteria failed. See narrative.
R	Data may be rejected due to quality control deficiencies.
S	Field screening data
U	Undetected; the analyte was analyzed for, but not detected.
UJ	Undetected; the MDL and RL are estimated due to quality control discrepancies.

L17100532 / Revision: 1 / 200 total pages

COC No. A 55408

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 720 633 2380

Turn Around Requirements:

Location: Memphis (Project site) Englewood, Co

Project ID:

Sampler (print): Taylor Redmond

Signature: Tg Redmond

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (TOTAL)	Hold	VOC 8260B
DR2-1-LA-26		X	10/6/17	1247	GW	3		3
PW101-06A-LA-26		X	10/6/17	1435	GW	3		3
DR1-6A-LA-26		X	10/6/17	1500	GW	3		3
PMW101-07B-LA-26		X	10/6/17	1455	GW	3		3
PMW101-03B-LA-26		X	10/6/17	1410	GW	3		3
MW101T-LA-26		X	10/6/17	1335	GW	3		3
PMW101-02B-LA-26		X	10/6/17	1355	GW	3		3
MW101B-LA-26		X	10/6/17	1340	GW	3		3
MW-100B-LA-26		X	10/6/17	1521	GW	3		3
PMW21-04-LA-26		X	10/6/17	1504	GW	3		3
MW-21-LA-26		X	10/6/17	1429	GW	3		3
PMW101-06B-LA-26		X	10/6/17	1445	GW	3		3
PMW101-03A-LA-26		X	10/6/17	1405	GW	3		3
DR1-6-LA-26		X	10/6/17	1505	GW	2		2
DR1-6-LA-26-MSD		X	10/6/17	1505	GW	2		2
DR1-6-LA-26-MS		X	10/6/17	1505	GW	2		2
DUP-6-LA-26		X	10/6/17	1526	GW	3		3
PMW21-02-LA-26		X	10/6/17	1245	GW	3		3
DR1-3-LA-26		X	10/6/17	1520	GW	3		3
PMW21-03-LA-26		X	10/6/17	1450	GW	3		3

TOTAL # (LAB USE)

Program
- ☐ CWA
- ☐ RCRA
- ☐ DOD
- ☐ AFCEE
- ☐ Other

ADDITIONAL REQUIREMENTS

Microbac OVD
Received: 10/07/2017 09:47
By: BRENDA GREENWALT
221000107214
Brenda Greenwalt

Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Tg Redmond	10/6/17	1620	
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)

Relinquished by: (Signature) | Date | Time | Received by: (Signature)

Date | Time | Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

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Generated: 10/23/2017 09:35

COC No. A 55407

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: Lynn Lutz

Contact Phone #: 780 633 2380

Turn Around Requirements:

Location: Memphis (Project site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: Taylor Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS (Total)	Hold	VOC 8260B	TOTAL # (LAB USE)
MW-166-ODLS-15		X	10/5/17	1658	GW	3		3	
MW-249-ODLS-15		X	10/5/17	1640	GW	3		3	
MW-246-ODLS-15		X	10/5/17	1627	GW	3		3	
MW-166A-ODLS-15		X	10/5/17	1644	GW	3		3	
MW-150-ODLS-15		X	10/5/17	1530	GW	3		3	
MW-159-ODLS-15		X	10/5/17	1551	GW	3		3	
MW-149-ODLS-15		X	10/5/17	1634	GW	3		3	
DUP2-ODLS-15		X	10/5/17	1736	GW	3		3	
MW-163-ODLS-15		X	10/5/17	1558	GW	2		2	
MW-163-ODLS-15-MSD			10/5/17	1558	GW	2		2	
MW-70-ODLS-15		X	10/6/17	1035	GW	3		3	
MW-57-ODLS-15		X	10/6/17	0950	GW	3		3	
DUP-1-ODLS-15		X	10/6/17	1026	GW	3		3	
MW-144-ODLS-15		X	10/6/17	1100	GW	3		3	
MW-165-ODLS-15		X	10/6/17	1050	GW	3		3	
MW-190-ODLS-15		X	10/6/17	1110	GW	3		3	
MW-87-ODLS-15		X	10/6/17	1015	GW	3		3	
MW-77-ODLS-15		X	10/6/17	1120	GW	3		3	
MW-66-ODLS-15		X	10/6/17	1000	GW	3		3	
DUP-2-LA-26		X	10/6/17	1257	GW	3		3	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
Taylor Redmond	10/6/17	1620					

Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

L17100532 / Revision: 1 / 200 total pages

COC No. A 47721

158 Starlite Drive
Marietta, OH 45750

MICROBAC®

CHAIN-OF-CUSTODY RECORD

Phone: 740-373-4071
Toll Free: 800-373-4071

Company Name: HDR

Project Contact: LYNN LUTZ

Contact Phone #: 720 1633 2880

Turn Around Requirements:

Location: Memphis (Project Site) Englewood, CO

Project ID:

Sampler (print): Taylor Redmond

Signature: T Redmond

Program: ☐ CWA ☐ RCRA ☐ DOD ☐ AFCEE ☐ Other

ADDITIONAL REQUIREMENTS

Sample I.D. No.	Comp	Grab	Date	Time	Matrix*	NUMBER OF CONTAINERS	Hold	VOC 8260R	TOTAL # (LAB USE)
DR1-5A-LA-26		X	10/6/17	1255	GW	3		3	
PMW21-01-LA-26		X	10/6/17	1400	GW	3		3	
DUP1-LA-26		X	10/6/17	1305	GW	3		3	
DR1-4-LA-26		X	10/6/17	1515	GW	3		3	
PMW101-07A-LA-26		X	10/6/17	1450	GW	3		3	
DR1-5-LA-26		X	10/6/17	1300	GW	3		3	
MW-279-2A-26		X	10/6/17	1320	GW	3		3	
PMW101-04B-LA-26		X	10/6/17	1430	GW	3		3	
PMW101-04A-LA-26		X	10/6/17	1420	GW	3		3	
PMW101-02A-LA-26		X	10/6/17	1350	GW	3		3	
MW-163-ODLS-15-MS			10/5/17	1558	GW	1		1	
TB-1-ODLS-15		X	10/6/17	1620	GW	3		3	

Microbac OVD
Received: 10/07/2017 09:47
By: BRENDA GREENWALT
221000107214

Brenda Greenwalt

T Redmond 1620 10-6-17

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Relinquished by: (Signature)	Date	Time	Received by: (Signature)
T Redmond	10/6/17	1620					
Relinquished by: (Signature)	Date	Time	Received for Laboratory by: (Signature)	Date	Time	Remarks:	

*Water (W), Soil (S), Solid Waste (SD), Unknown (X)

Generated: 10/23/2017 09:35

MICROBAC®

COOLER TEMP >6° C LOG

Cooler ID 7214

SAMPLE ID	Bottle 1 °C	Bottle 2 °C	Bottle 3 °C	Bottle 4 °C	Bottle 5 °C	Bottle 6 °C

BG 10/7/17

pH Exceptions

pH Lot # NA

SAMPLE ID	Bottle 1	Bottle 2	Bottle 3	Bottle 4	Bottle 5	Bottle 6

BG 10/7/17

PRESERVATIVE EXCEPTIONS

✓ NONE

__ AS NOTED

BG 10/7/17

Document Control # 1957
Last 10-07-2016

Issued to: Document Master File

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-01	977993	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100532-02	977994	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	09-OCT-2017 15:53	CLS		
2	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-03	977995	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100532-04	977996	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-05	977997	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	ORG4	09-OCT-2017 15:53	CLS		
2	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:25	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100532-06	977998	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-07	977999	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100532-08	978000	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-09	978001	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Samplenum	Container ID	Products
L17100532-10	978002	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-11	978003	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Samplenum	Container ID	Products
L17100532-12	978004	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:22	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-13	978005	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Samplenum	Container ID	Products
L17100532-14	978006	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-15	978007	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Samplenum	Container ID	Products
L17100532-16	978008	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-17	978009	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Samplenum	Container ID	Products
L17100532-18	978010	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-19	978011	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Samplenum	Container ID	Products
L17100532-20	978012	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

Microbac Laboratories Inc.

Internal Chain of Custody Report

Login: L17100532
Account: 2694
Project: 2694.011
Samples: 21
Due Date: 20-OCT-2017

Samplenum	Container ID	Products
L17100532-21	978013	826-SPE

Bottle: 1

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 2

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	
3	STORE	ORG4	A2	23-OCT-2017 07:21	CLS	AWE	

Bottle: 3

Seq.	Purpose	From	To	Date/Time	Accept	Relinquish	pH
1	LOGIN	COOLER	V1	09-OCT-2017 15:53	CLS		
2	ANALYZ	V1	ORG4	10-OCT-2017 07:24	AWE	CLS	

A1 - Sample Archive (COLD)
A2 - Sample Archive (AMBIENT)
F1 - Volatiles Freezer in Login
V1 - Volatiles Refrigerator in Login
W1 - Walkin Cooler in Login

F

Appendix F.
Data Quality Evaluation

DATA QUALITY EVALUATION

Long-Term Monitoring (LTM) was conducted by HDR for the Main Installation (MI) and Dunn Field at the former Defense Depot Memphis, Tennessee (DDMT) in April and October 2017. The wells to be sampled were identified in the *Annual Long-Term Monitoring Report-2017, Revision 1* (HDR, 2017) based on criteria developed in accordance with the MI LTM Plan in Appendix B of the *Main Installation Final Remedial Design, Revision 1* (CH2M Hill, 2004) and the Dunn Field LTM Plan in Appendix C of *Off Depot Groundwater Final Remedial Design, Revision 1* (CH2M HILL, 2008).

Groundwater samples for the MI and Dunn Field were submitted to Microbac Laboratories in Marietta, Ohio for analysis. Field activities and laboratory analyses were performed in accordance with the *2017 Uniform Federal Policy-Quality Assurance Project Plan, Revision 0* (2017 QAPP) (HDR 2017).

The data quality evaluation (DQE) process involves assessment of all field and laboratory procedures for compliance with the QAPP. Data validation was completed by Diane Short and Associates, Inc (DSA). This assessment is designed to evaluate problems with quality assurance (QA)/quality control (QC) associated with the laboratory data and potential impact to the data quality objectives (DQOs). The DQE findings are summarized in the following sections.

FIELD ACTIVITIES AND FIELD QUALITY CONTROL

Main Installation: The field effort included the collection of groundwater samples from 104 of 105 designated wells and piezometers during the semiannual Main Installation LTM event in April 2017 and from the 125 of 126 designated wells and piezometers during the annual sampling event in October 2017. The Main Installation LTM well locations are shown on Figure 4 of the report.

Dunn Field: The field effort included the collection of groundwater samples from 85 designated wells during the biennial Dunn Field event in April 2017 and from 16 designated wells during the semiannual Dunn Field event in October 2017. The Dunn Field LTM well locations are shown on Figure 5 of the report.

Field QC samples were collected at selected wells to evaluate sampling technique and decontamination procedures. These samples included field duplicates, trip blanks and field equipment (rinsate) blanks. Additional samples were collected at selected locations for matrix spike/matrix spike duplicate (MS/MSD) analyses in the laboratory. Sample bottles met U.S. Environmental Protection Agency (USEPA) requirements for environmentally clean containers. Sample labels were pre-printed to facilitate sample tracking from the field through the laboratory. Documentation of the sampling was performed in the field to ensure that the samples collected, sample labels, chain-of-custody (COC) records, and request for analysis were consistent. Where necessary, additional COC forms were filled out manually. Custody seals were placed on each sample cooler prior to shipment by common carrier.

ANALYTICAL METHODS

The groundwater samples were analyzed for Target Compound List (TCL) volatile organic compounds (VOCs) by method SW 8260B.

LABORATORY QUALITY CONTROL

The laboratory QC program, including sample handling, laboratory control, and reporting, is documented in the 2017 QAPP. Sample handling includes documentation of sample receipt, placement in storage, lab personnel using the sample, and disposal. The laboratory control consists of instrument calibration and maintenance, laboratory control samples (LCS), method blanks and matrix spikes. Reporting of the laboratory control data was planned prior to the collection of the data, allowing the laboratory to place the appropriate information into the data package so that the DQE could be performed in a timely manner.

DQE SUMMARY

The objective of the DQE was to provide a review of the chemical data reports submitted by the laboratory and to assess the data in relation to the DQOs stated in the 2017 QAPP. The DQE consisted of review of laboratory QC data and field QC parameters, and flagging of the data as usable, usable with qualification, or unusable in accordance with the DQE standard operating procedures (SOPs) using the criteria for each analytical method performed. The following information was reviewed:

- Sample Integrity (Deliverables)
- Sample Completeness
- Sample Holding Times
- Laboratory Methods for Extraction and Analysis (Calibration, Internal Standards)
- Method Accuracy (bias) and Precision (Surrogates, MS/MSD, LCS Recoveries)
- Laboratory Performance Criteria (Blanks, Instrument Performance Checks)

Field QC parameters were evaluated through field duplicates, rinsate blanks, field documentation, and shipping criteria.

The DQE was summarized by use of flags that indicate to the reviewer that the data being considered has been qualified using the established criteria. Sample delivery group (SDG) narratives detailing the evaluation of the laboratory data by DSA are included as attachments in this Appendix. The SDGs and associated groundwater samples are listed on Table C-1 (Main Installation) and Table C-2 (Dunn Field).

The following sections provide summary discussions of the required data qualifications for each sampling event. A Level III DQE was performed and the data quality indicators (DQIs), expressed in terms of precision, accuracy, representativeness, comparability, completeness, and sensitivity, were assessed. This included the evaluation of sample integrity, holding times, trip blanks, rinsate blanks, method blanks, internal standards, surrogate recoveries, MS/MSD recoveries, LCSs, and field duplicate precision. The results of the DQI assessment are provided below.

Precision

Field duplicates were collected to assess sampling precision. They consisted of replicate grab samples collected concurrently with the associated field samples. Precision is best expressed in terms of relative percent difference (RPD).

Main Installation, April 2017: Field precision goals were met for the duplicate sample pairs collected during the LTM sampling event, with the exception of two analyte results (MTBE and PCE in sample PMW101-06A-LS-25); the associated data are qualified J or UJ and as such are valid.

Main Installation, October 2017: Field precision goals were met for the duplicate sample pairs collected during the LTM sampling event.

Dunn Field, April 2017: Field precision goals were met for the duplicate sample pairs collected during the LTM sampling event.

Dunn Field, October 2017: Field precision goals were met for the duplicate sample pairs collected during the LTM sampling event.

Laboratory precision is discussed in more detail in the attached narratives.

Accuracy

Accuracy or bias was measured through the analyses of LCSs and MS/MSDs. Sample specific accuracy is measured through surrogate recovery. Accuracy is expressed as percent recovery (%R). Field and laboratory blanks are analyzed to assess potential bias in the reported sample results. Bias is expressed through qualification of analytical results.

Sample results are evaluated against blank results as described in the *National Functional Guidelines for Superfund Organic Methods Data Review* (USEPA, September 2016). Sample results with concentration of an analyte less than the RL and less than the concentration in an associated blank (or less than two times the concentration in the blank for common laboratory contaminants acetone, 2-butanone [MEK] and methylene chloride) are reported as non-detect at the standard RL. Sample results with concentration of an analyte greater than the RL but less than the concentration in an associated blank (or less than two times for common laboratory contaminants) are reported as non-detect at an elevated RL. Sample results greater than the blank result (or greater than two times for common laboratory contaminants) are not considered to have been greatly affected and are not qualified.

This is a change from the qualification used for LTM events through 2015. Previously sample results were reported with a B qualifier when the sample concentration of an analyte was less than five times (10 times for common laboratory contaminants) the concentration in an associated blank, or a JB flag when the sample concentration was less than the RL and less than five times (or 10 times for common laboratory contaminants) the concentration in an associated blank.

Main Installation, April 2017: Although there were three low MS/MSD recoveries and two low LCS recoveries observed in the event, all associated data are qualified J or UJ and as such are valid.

Main Installation, October 2017: Accuracy goals in the form of MS/MSD and LCS/LCSD recoveries were met.

Dunn Field, April 2017: Although there were two low MS/MSD recoveries and two low LCS recoveries observed in the event, all associated data are qualified J or UJ and as such are valid.

Dunn Field, October 2017: Accuracy goals in the form of MS/MSD and LCS/LCSD recoveries were met.

Further discussion of the LCS and MS/MSD recoveries is provided in the attached DQE narratives.

Representativeness

Representativeness refers to the degree sample data accurately and precisely describes the population of samples at a sampling point or under certain environmental conditions. Samples that are not properly preserved or are analyzed beyond holding times may not be considered representative. Review of

sampling procedures, laboratory preparation, analysis holding times, trip blank and rinsate blank analysis help in providing this assessment.

Main Installation: Sampling procedures followed the 2017 QAPP and were considered representative of the matrices collected. Laboratory preparation and analysis followed method guidelines.

Dunn Field: Sampling procedures followed the 2017 QAPP and were considered representative of the matrices collected. Laboratory preparation and analysis followed method guidelines.

Comparability

The selection of standardized methods and consistent laboratory practices facilitates the comparison of data between sampling events. Consistent methodology has been maintained throughout the LTM sampling events, except for the 2016 change to qualification due to analytes detected in blank samples, as described under **Accuracy**.

Main Installation: Past LTM data are comparable to recent events.

Dunn Field: Past LTM data are comparable to recent events.

Completeness

Completeness is determined for both field and analytical objectives. Field completeness is calculated from the number of samples proposed versus the actual number of samples collected. Analytical completeness is expressed in terms of usable data. The project completeness goal for DDMT is 90% as stated in the 2017 QAPP.

Main Installation: Data from the LTM events was greater than 99% (One planned sample [PZ-03] was not collected in each event) and therefore met the completeness DQO.

Dunn Field: Data from the LTM events was 100% complete and therefore met the completeness DQO.

Sensitivity

Analytical sensitivity is the concentration at which the measurement system can quantitate target analytes in the environmental matrices of concern. Analytical sensitivity is expressed in terms of the RL, which is provided by the respective laboratories as their reasonable and defensible quantitation limit for environmental samples above the method detection limit (MDL), which is established by each laboratory using pure water or clean matrix.

Main Installation: The analytical method RLs and MDLs were compared to groundwater protection standards as listed in the 2017 QAPP and were generally below the standards for the contaminants of concern except as discussed below.

In April and October, sample MW-213 was analyzed at a five-fold dilution. In April, sample PMW101-02A was analyzed at a five-fold dilution. In April and October, sample DR2-5 was analyzed at a 50-fold dilution. The reason for the dilutions, given in the case narratives, was that these samples were dark and foamy. In the five-fold dilution samples, the RLs for the CVOCs (PCE, TCE and cDCE) were at or below the MCLs. In the 50-fold dilution samples, the RLs and the MDLs for some of the CVOCs (PCE, TCE and CT) were above the MCLs, suggesting that the CVOCs could be present above the MCLs but would not be detected.

Dunn Field: The analytical method RLs and MDLs were compared to groundwater protection standards as listed in the 2017 QAPP and were below the standards for the contaminants of concern.

The following sections discuss only those deficiencies encountered during the evaluation that resulted in qualified and/or unusable data.

Main Installation Semi-Annual Event – April 2017

A total of 134 water samples including 106 groundwater field samples and 29 QA/QC samples (duplicates, MS/MSD, trip blanks, rinsate blanks) were collected from 104 LTM wells in April 2017. Samples were collected from two screened intervals in MW-101 and MW-107. Sample PMW101-02A-LS-25 was received at the lab with headspace bubbles larger than 6 millimeters (mm) in diameter in all three sample vials; this sample was recollected and analyzed, and the initial sample was also analyzed. Samples were analyzed for TCL VOCs. The data are usable with qualifications as described below:

- Seventeen results for bromomethane, 12 results for chloromethane and three results for 1,2,3-trichlorobenzene were non-detect and qualified "UJ" due to high percent difference with low response in continuing calibration standards. The qualified analytes are not contaminants of concern (COCs) at the MI.
- One result for acetone was detected and qualified "J-" due to a high percent difference with low response in a continuing calibration standard. Acetone is not a COC at the MI.
- cis-1,2-DCE in one sample (PMW92-03-LS-25) was qualified as estimated "J" due to low matrix spike/matrix spike duplicate (MS/MSD) recoveries. TCE in one sample (MW-259-LS-25) was qualified as estimated "J" due to low MS/MSD recoveries. cis-1,2-DCE and TCE are COCs at the MI; the cis-1,2-DCE concentration in the parent sample was well below the MCL, and the TCE concentration in the parent sample was well above the MCL.
- The final qualifier for acetone in 76 samples was 10.0 U where DSA had qualified as BTB4.54 or BTB5 for acetone in the trip blank. Sample results were less than the reporting limit (RL) and qualified as non-detect at the RL. Acetone is not a COC at the MI.
- The final qualifier for acetone in 10 samples was "no qualification" where DSA had qualified as BTB5 for acetone in the trip blank. Sample results were greater than two times the blank concentration. Acetone is not a COC at the MI.
- The final qualifier for PCE in seven samples was 1.00 U where DSA had qualified as BTB0.278 for PCE in the trip blank at a trace level of 0.278 µg/L. The sample results were detected below the RL and qualified as non-detect at the RL. PCE is a COC at the MI, with an MCL of 5 µg/L, and the qualified sample results were below this level.
- The final qualifier for all analytes in the initial sampling and analysis of PMW101-02A-LS-25 was J- or UJ where DSA had qualified JP due to headspace in the containers.
- MTBE and PCE in sample PMW101-06A-LS-25 and its field duplicate DUP-11 were qualified "J" for field duplicate RPDs outside the control limit. MTBE is not a COC at the MI. PCE is a COC at the MI; both results were above the MCL.
- Any result reported below the RL but above the method detection limit was flagged "J" and considered an estimated result (unless overridden by other quality control [QC] flags).

Main Installation Annual Event – October 2017

A total of 161 water samples including 127 groundwater field samples and 34 QA/QC samples (duplicates, MS/MSD, trip blanks, rinsate blanks) were collected from 125 LTM wells in October 2017. Samples were collected from two screened intervals in MW-101 and MW-107. Five samples were received at the lab with headspace bubbles larger than 6 millimeters (mm) in diameter in all three sample vials. Some samples were field duplicates, had MS/MSD samples, or were a parent sample to a field duplicate, with vials with no headspace, and the lab was instructed to use the available vials for analysis. Samples that did not have other available vials were resampled (DR1-6A and MW-203A). The only sample that had headspace in all three vials that was not substituted or resampled was LTM-TB3-LA-26. The lab attributed the large number of headspace bottles with a defective batch of sample vials from the manufacturer. Samples were analyzed for TCL VOCs. The data are usable with qualifications as described below:

- Ten results for chloromethane, four results for acetone and one result for 2-chlorotoluene were non-detect and qualified "UJ" due to high percent difference with low response in continuing calibration standards. The qualified analytes are not contaminants of concern (COCs) at the MI.
- One result for acetone was detected and qualified "J-" due to a high percent difference with low response in a continuing calibration standard. Acetone is not a COC at the MI.
- The final qualifier for acetone in seven samples was 10.0 U where DSA had qualified as BTB2.87 for acetone in the trip blank. Sample results were less than the reporting limit (RL) and qualified as non-detect at the RL. Acetone is not a COC at the MI.
- The final qualifier for acetone in one sample was 10.0 U where DSA had not qualified for acetone in the trip blank. The sample result was less than the reporting limit (RL) and qualified as non-detect at the RL.
- The final qualifier for acetone in 10 samples was "no qualification" where DSA had qualified as BTB2.87 for acetone in the trip blank. Sample results were greater than two times the blank concentration. Acetone is not a COC at the MI.
- The final qualifier for all analytes in sample DUP6-LA-26 was "no qualifier" where DSA had qualified as JP to indicate integrity issues due to sample vial headspace. This was a field duplicate sample, and the lab was instructed to analyze one of the vials from the parent sample (MW-100B-LA-26), which had no headspace, as the field duplicate.
- The final qualifier for all analytes in sample LTM-TB3-LA-26 was UJ where DSA had qualified JP due to headspace in all three sample vials.
- Any result reported below the RL but above the method detection limit was flagged "J" and considered an estimated result (unless overridden by other quality control [QC] flags).

Dunn Field Biennial Event – April 2017

A total of 108 water samples including 85 groundwater field samples and 23 QA/QC samples (duplicates, MS/MSD, trip blanks, rinsate blanks) were collected from 85 LTM wells in April 2017. Samples were analyzed for TCL VOCs. The data are usable with qualifications as described below:

- Forty-one results for bromomethane, 12 results for chloromethane and four results for acetone were qualified UJ due to high percent differences with low response in continuing calibration standards. These analytes are not COCs at Dunn Field.

- Eleven results for acetone were detected and qualified "J-" due to a high percent difference with low response in a continuing calibration standard. Acetone is not a COC at Dunn Field.
- The final qualifier for acetone in sample MW-08-ODLB-14 was 10.0 U where DSA had qualified as BEB7.42 for acetone in the equipment blank. The sample result was less than the RL and qualified as non-detect at the RL. Acetone is not a COC at Dunn Field.
- The final qualifier for chloroform in sample MW-08-ODLB-14 was 0.300 U where DSA had qualified as BEB.492 for chloroform in the equipment blank. The sample result was less than the RL and qualified as non-detect at the RL. Chloroform is a COC at Dunn Field.
- 2,2-Dichloropropane in one sample (MW-247-ODLB-14) was qualified as non-detect estimated "UJ" due to low matrix spike/matrix spike duplicate (MS/MSD) recoveries. TCE in one sample (MW-130-ODLB-14) was qualified as estimated "J" due to low MS/MSD recoveries. 2,2-Dichloropropane is not a COC at Dunn Field. TCE is a COCs at Dunn Field; the TCE concentration in the parent sample was well above the MCL.
- Any result reported below the RL but above the method detection limit was flagged "J" and considered an estimated result (unless overridden by other QC flags).

Dunn Field Semiannual Event – October 2017

A total of 21 water samples including 16 groundwater field samples and five QA/QC samples (duplicates, MS/MSD, trip blanks, rinsate blanks) were collected from 16 LTM wells in October 2017. Samples were analyzed for TCL VOCs. The data are usable with qualifications as described below:

- Six results for bromomethane were qualified UJ due to high percent differences with low response in continuing calibration standards. Bromomethane is not a COC at Dunn Field.
- Any result reported below the RL but above the method detection limit was flagged "J" and considered an estimated result (unless overridden by other QC flags).

SUMMARY

Main Installation: The sample data from the LTM event at the Main Installation met the data quality objectives and are of sufficient quality to support the evaluation of remedial actions.

Dunn Field: The sample data from the LTM event at Dunn Field met the data quality objectives and are of sufficient quality to support the evaluation of remedial actions.

TABLE F-1
MAIN INSTALLATION SAMPLE DATA GROUP SUMMARY TABLE
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

SDG	Groundwater Samples			Quality Control Samples
Semi-Annual Sampling Event - April 2017				
L17041069	DR2-1-LS-25	MW-197A-LS-25	MW-259-LS-25	DUP-3-LS-25
	DR2-2-LS-25	MW-197B-LS-25	MW-266-LS-25	DUP-6-LS-25
	DR2-3-LS-25	MW-203A-LS-25	MW-267-LS-25	DUP-10-LS-25
	DR2-6-LS-25	MW-203B-LS-25	MW-268-LS-25	MW-204B-LS-25-MS
	MW-26-LS-25	MW-204A-LS-25	MW-270-LS-25	MW-204B-LS-25-MSD
	MW-39-LS-25	MW-204B-LS-25	MW-271-LS-25	MW-259-LS-25-MS
	MW-39A-LS-25	MW-205A-LS-25	MW-272-LS-25	MW-259-LS-25-MSD
	MW-64-LS-25	MW-205B-LS-25	MW-277-LS-25	PMW92-03-LS-25-MS
	MW-85-LS-25	MW-206A-LS-25	MW-280-LS-25	PMW92-03-LS-25-MSD
	MW-88-LS-25	MW-206B-LS-25	PMW-85-01-LS-25	
	MW-92-LS-25	MW-210A-LS-25	PMW-85-05-LS-25	
	MW-97-LS-25	MW-210B-LS-25	PMW92-02-LS-25	
	MW-98-LS-25	MW-217-LS-25	PMW92-03-LS-25	
	MW-113-LS-25	MW-218-LS-25		
L17041075	DR1-5-LS-25	MW-200-LS-25	MW-278-LS-25	DUP-2-LS-25
	DR1-5A-LS-25	MW-207A-LS-25	MW-279-LS-25	DUP-4-LS-25
	DR1-6-LS-25	MW-207B-LS-25	PMW21-01-LS-25	DUP-8-LS-25
	DR1-6A-LS-25	MW-208A-LS-25	PMW21-02-LS-25	DUP-9-LS-25
	MW-21-LS-25	MW-208B-LS-25	PMW21-03-LS-25	DUP-11-LS-25
	MW-94A-LS-25	MW-258-LS-25	PMW21-04-LS-25	DR1-6A-LS-25-MS
	MW-100B-LS-25	MW-263-LS-25	PMW21-05-LS-25	DR1-6A-LS-25-MSD
	MW-104-LS-25	MW-264-LS-25	PMW101-06A-LS-25	MW-100B-LS-25-MS
	MW-107T-LS-25	MW-265-LS-25	PMW101-06B-LS-25	MW-100B-LS-25-MSD
	MW-107B-LS-25	MW-275-LS-25	PMW101-07A-LS-25	LTM-TB1-LS-25
	MW-108-LS-25	MW-276-LS-25	PMW101-07B-LS-25	LTM-TB2-LS-25
				LTM-TB3-LS-25
L17041110	DR1-3-LS-25	MW-143-LS-25	MW-281-LS-25	DUP-1-LS-25
	MW-62-LS-25	MW-199B-LS-25	MW-282-LS-25	DUP-5-LS-25
	MW-89-LS-25	MW-202A-LS-25	PMW101-02A-LS-25	DUP-7-LS-25
	MW-90-LS-25	MW-202B-LS-25	PMW101-02B-LS-25	MW-282-LS-25-MS
	MW-101T-LS-25	MW-212-LS-25	PMW101-03A-LS-25	MW-282-LS-25-MSD
	MW-101B-LS-25	MW-213-LS-25	PMW101-03B-LS-25	LTM-TB4-LS-25
	MW-140-LS-25	MW-256-LS-25	PMW101-04A-LS-25	
	MW-141-LS-25	MW-262-LS-25	PMW101-04B-LS-25	
L17041209	DR2-5-LS-25	MW-209B-LS-25	MW-269-LS-25	LTM-TB5-LS-25
	MW-209A-LS-25	MW-219-LS-25	MW-273-LS-25	EB1-LS-25
			PMW101-02A-LS-25-RE	
Annual Sampling Event - October 2017				
L17100514	DR1-3-LA-26	MW101B-LA-26	PMW101-03A-LA-26	DUP-1-LA-26
	DR1-4-LA-26	MW-279-LA-26	PMW101-03B-LA-26	DUP-2-LA-26
	DR1-5-LA-26	PMW21-01-LA-26	PMW101-04A-LA-26	DUP-6-LA-26
	DR1-5A-LA-26	PMW21-02-LA-26	PMW101-04B-LA-26	DR1-6-LA-26-MS
	DR1-6-LA-26	PMW21-03-LA-26	PMW101-06A-LA-26	DR1-6-LA-26-MSD
	DR2-1-LA-26	PMW21-04-LA-26	PMW101-06B-LA-26	
	MW-21-LA-26	PMW101-02A-LA-26	PMW101-07A-LA-26	
	MW-100B-LA-26	PMW101-02B-LA-26	PMW101-07B-LA-26	
	MW101T-LA-26			

TABLE F-1
MAIN INSTALLATION SAMPLE DATA GROUP SUMMARY TABLE
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

SDG	Groundwater Samples			Quality Control Samples
L17100636	DR2-2-LA-26	MW-200-LA-26	MW-210A-LA-26	DUP-4-LA-26
	DR2-4-LA-26	MW-204A-LA-26	MW-210B-LA-26	DUP-5-LA-26
	MW-26-LA-26	MW-204B-LA-26	MW-217-LA-26	MW-208A-LA-26-MS
	MW-64-LA-26	MW-205A-LA-26	MW-219-LA-26	MW-208A-LA-26-MSD
	MW-85-LA-26	MW-205B-LA-26	MW-266-LA-26	MW-219-LA-26-MS
	MW-88-LA-26	MW-206A-LA-26	PMW21-05-LA-26	MW-219-LA-26-MSD
	MW-92-LA-26	MW-207B-LA-26	PMW-85-01-LA-26	PMW92-03-LA-26-MS
	MW-94A-LA-26	MW-208A-LA-26	PMW-85-05-LA-26	PMW92-03-LA-26-MSD
	MW-113-LA-26	MW-208B-LA-26	PMW92-02-LA-26	LTM-RB1-LA-26
	MW-197A-LA-26	MW-209B-LA-26	PMW92-03-LA-26	
	MW-197B-LA-26			
L17100637	DR2-6-LA-26	MW-199A-LA-26	MW-260-LA-26	DUP-3-LA-26
	MW-34-LA-26	MW-199B-LA-26	MW-262-LA-26	DUP-9-LA-26
	MW-39-LA-26	MW-202A-LA-26	MW-263-LA-26	DUP-11-LA-26
	MW-50-LA-26	MW-202B-LA-26	MW-264-LA-26	DUP-12-LA-26
	MW-62-LA-26	MW-206B-LA-26	MW-265-LA-26	MW-90-LA-26-MS
	MW-63B-LA-26	MW-207A-LA-26	MW-267-LA-26	MW-90-LA-26-MSD
	MW-89-LA-26	MW-209A-LA-26	MW-268-LA-26	MW-271-LA-26-MS
	MW-90-LA-26	MW-212-LA-26	MW-269-LA-26	MW-271-LA-26-MSD
	MW-98-LA-26	MW-213-LA-26	MW-270-LA-26	LTM-TB1-LA-26
	MW-103-LA-26	MW-214A-LA-26	MW-271-LA-26	LTM-TB2-LA-26
	MW-104-LA-26	MW-214B-LA-26	MW-272-LA-26	LTM-TB3-LA-26
	MW107T-LA-26	MW-215A-LA-26	MW-273-LA-26	
	MW107B-LA-26	MW-215B-LA-26	MW-275-LA-26	
	MW-108-LA-26	MW-218-LA-26	MW-276-LA-26	
	MW-140-LA-26	MW-254-LA-26	MW-278-LA-26	
	MW-141-LA-26	MW-255-LA-26	MW-280-LA-26	
	MW-142-LA-26	MW-256-LA-26	MW-281-LA-26	
	MW-198-LA-26	MW-258-LA-26	MW-282-LA-26	
L17100710	DR2-3-LA-26	MW-96-LA-26	MW-259-LA-26	DUP-7-LA-26
	DR2-5-LA-26	MW-97-LA-26	MW-261-LA-26	DUP-10-LA-26
	MW-25A-LA-26	MW-143-LA-26	MW-274-LA-26	DUP-13-LA-26
	MW-39A-LA-26	MW-203B-LA-26	MW-277-LA-26	DUP-14-LA-26
	MW-52-LA-26	MW-253-LA-26	MW-283-LA-26	MW-143-LA-26-MS
				MW-143-LA-26-MSD
				LTM-TB4-LA-26
L17100839	DR1-6A-LA-26	MW-203A-LA-26		DUP-8-LA-26
				LTM-TB5-LA-26

TABLE F-2
DUNN FIELD SAMPLE DATA GROUP SUMMARY TABLE
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

SDG	Groundwater Samples			Quality Control Samples
Biennial Sampling Event - April 2017				
L17041200	MW-03-ODLB-14	MW-152-ODLB-14	MW-224-ODLB-14	DUP-3
	MW-04-ODLB-14	MW-155-ODLB-14	MW-225-ODLB-14	DUP-4
	MW-06-ODLB-14	MW-158-ODLB-14	MW-226-ODLB-14	DUP-6
	MW-07-ODLB-14	MW-158A-ODLB-14	MW-227-ODLB-14	DUP-7
	MW-13-ODLB-14	MW-159-ODLB-14	MW-228-ODLB-14	DUP-8
	MW-15-ODLB-14	MW-160-ODLB-14	MW-230-ODLB-14	DUP-9
	MW-31-ODLB-14	MW-165A-ODLB-14	MW-237-ODLB-14	MW-225-ODLB-14-MS
	MW-54-ODLB-14	MW-166-ODLB-14	MW-241-ODLB-14	MW-225-ODLB-14-MSD
	MW-57-ODLB-14	MW-166A-ODLB-14	MW-242-ODLB-14	MW-247-ODLB-14-MS
	MW-87-ODLB-14	MW-174-ODLB-14	MW-243-ODLB-14	MW-247-ODLB-14-MSD
	MW-91-ODLB-14	MW-176-ODLB-14	MW-244-ODLB-14	
	MW-134-ODLB-14	MW-180-ODLB-14	MW-245-ODLB-14	
	MW-147-ODLB-14	MW-187-ODLB-14	MW-246-ODLB-14	
	MW-148-ODLB-14	MW-220-ODLB-14	MW-247-ODLB-14	
	MW-149-ODLB-14	MW-221-ODLB-14	MW-250-ODLB-14	
	MW-150-ODLB-14	MW-222-ODLB-14	MW-251-ODLB-14	
	MW-151-ODLB-14	MW-223-ODLB-14		
L17041203	MW-08-ODLB-14	MW-79-ODLB-14	MW-165-ODLB-14	DUP-1
	MW-28-ODLB-14	MW-80-ODLB-14	MW-167-ODLB-14	DUP-2
	MW-44-ODLB-14	MW-126-ODLB-14	MW-169-ODLB-14	DUP-5
	MW-58-ODLB-14	MW-129-ODLB-14	MW-170-ODLB-14	MW-80-ODLB-14-MS
	MW-67-ODLB-14	MW-130-ODLB-14	MW-171-ODLB-14	MW-80-ODLB-14-MSD
	MW-68-ODLB-14	MW-144-ODLB-14	MW-182-ODLB-14	MW-130-ODLB-14-MS
	MW-69-ODLB-14	MW-145-ODLB-14	MW-184-ODLB-14	MW-130-ODLB-14-MSD
	MW-70-ODLB-14	MW-153-ODLB-14	MW-190-ODLB-14	MW-165-ODLB-14-MS
	MW-71-ODLB-14	MW-154-ODLB-14	MW-235-ODLB-14	MW-165-ODLB-14-MSD
	MW-76-ODLB-14	MW-157-ODLB-14	MW-248-ODLB-14	TB-1-ODLB-14
	MW-77-ODLB-14	MW-163-ODLB-14	MW-249-ODLB-14	TB-2-ODLB-14
	MW-78-ODLB-14	MW-164-ODLB-14		TB-3-ODLB-14
				EB1-ODLB-14
Semiannual Event - October 2017				
L17100532	MW-06-ODLS-15	MW-144-ODLS-15	MW-165-ODLS-15	DUP-1-ODLS-15
	MW-57-ODLS-15	MW-149-ODLS-15	MW-166-ODLS-15	DUP-2-ODLS-15
	MW-70-ODLS-15	MW-150-ODLS-15	MW-166A-ODLS-15	MW-163-ODLS-15-MS
	MW-77-ODLS-15	MW-159-ODLS-15	MW-190-ODLS-15	MW-163-ODLS-15-MSD
	MW-87-ODLS-15	MW-163-ODLS-15	MW-246-ODLS-15	TB-1-ODLS-15
			MW-249-ODLS-15	

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ORGANIC DATA QUALITY REVIEW REPORT
Volatile Organics by SW-846 Method 8260B (GC/MS)

SDG	L1704: 1069, 1075, 1110, 1209
PROJECT	Memphis Defense Depot, LS-25 Sampling for HDR, Denver
LABORATORY	Microbac Laboratories, Inc., Marietta, OH
SAMPLE MATRIX	Water
SAMPLING DATE	04/ 2017
NUMBER OF SAMPLES	134 samples, including 11 field duplicates, 5 trip blanks, and 6 MS/MSDs
ANALYSES REQUESTED	SW-846 8260B (VOA by GC/MS)
SAMPLE NUMBER	See result forms attached and associated EDD

DATA REVIEWER: Diane Short

QA REVIEWER: Diane Short & Associates, Inc. INITIALS/DATE: __ DLS 05/18/2017

Telephone Logs included Yes____ No __X_

Contractual Violations Yes____ No __X_

The project QAPP (09/11), the EPA Contract Laboratory Program National Functional Guidelines for Organic Review, 1999 and 2010, and the SW-846 Method 8260B have been referenced by the reviewer to perform this data validation review. The EPA qualifiers have been expanded to include a descriptor code and value to define QC violations and their values, per the approval of the Project Manager. Per the Scope of Work, the review of these samples includes Level III validation of all chains of custody, calibrations and QC forms referencing the QC limits in the above documents.

I. DELIVERABLES

A. All deliverables were present as specified in the Statement of Work (SOW), SW-846, or in the project contract.
Yes __X__ No _____
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations. The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8260B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

B. Chain of Custody documentation was complete and accurate.
Yes __X__ No _____

C. Samples were received at the required temperature, preservation and intact with no bubbles.
Yes ____ No _X____
EPA regulations (See Federal Register, March 12, 2007, 40CFR Part 122) require only that the temperature of samples delivered to the laboratory be equal to or less than 6 °C. The sample temperature conditions are fully compliant with applicable regulations.
One sample PMW101-02A-LS-25 arrived with headspace > 6 mm in all 3 vials. All data are qualified JP to indicate possible low bias. The sample was re-sampled and re-analyzed with acceptable results in the final SDG :17041209.
Sample DR2-5 had headspace in 2 vials. The third vial as used for analysis.

II. ANALYTICAL REPORT FORMS

A. The Analytical Report or Data Sheets are present and complete for all requested analyses.
Yes __X__ No _____

B. Holding Times
1. The contract holding times were met for all analyses [time of sample receipt to time of analysis (VOA) or time of extraction to time of analysis].
Yes __X__ No _____

2. The Clean Water Act (40 CFR 136) or method holding times were met for all analyses (14 days from time of sample collection to analysis or extraction).
Yes __X__ No _____
Several method blanks were run just slightly over the 12 hour limit. This has not impacted client data.

III. INSTRUMENT CALIBRATION – GC/MS

A. Initial Calibration
1. The Response (RF) and Relative Response Factors (RRF) and average RRF for all compounds for all analyses met the contract criteria of > 0.05 or > 0.01 for poor responding volatiles.
Yes __X__ No _____ NA _____
Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common “poor responders.” Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for “poor responders.”

Most of the low-responding compounds are highly water-soluble and capable of hydrogen bonding with water. This decreases their purge efficiency and results in the relatively low response. The implication of this low

purge efficiency is that a relatively low absolute recovery of such compounds is achieved in the purge step of the analysis. If this recovery is consistent, reasonable accuracy and precision can be achieved in a given matrix, which is indicated for the lab matrix by acceptable recoveries in LCS and calibration checks. However, this causes these targets to be more sensitive to matrix variations that impact purge efficiency (such as ionic strength or the presence of varying levels of soluble non-target organic material) than are the more hydrophobic compounds typically analyzed by this method, and as a result they are more likely to exhibit matrix bias.

Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There is not anything in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

2a. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for the CCCs.
Yes __X__ No _____ NA _____
This is a method requirement and indicates that the analytical system is in control.

2b. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for all other compounds, the average % RSD was < 15%, or a linear curve was used.
Yes __X__ No _____ NA _____

3. The 12 hour system Performance Check was performed as required in SW-846 and met the QC limits of 80 – 120%.
Yes ____ No __X___ NA _____
Instrument 17: Dichlorodifluoro and Trichlorofluoro methane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.
For Instrument 11: Dichlorodifluoromethane and chloromethane are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

B. Continuing Calibrations
1. The midpoint standard was analyzed for each analysis at the required frequency, and the QC criterion of > 0.05 (> 0.01 for CLP 2001 VOA) was met.
Yes __X__ No _____ NA _____
Poor responders met the noted limits.

2. The percent difference (% D) limits of ± 25% were met. The 2001 NFG also allow for 40% D for the "poor responders (pr)". For other compounds, the QAPP notes rejection of detected compounds with % D > 40%.
Yes _____ No __X__ NA _____
There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.

Instrument 6 and 17 reported outliers for bromoromethane at 31.9% and -25.5% respectively
Instrument 17 for dichlorodifluoromethane (34.1%),and trichlorofluormethane (-36%).
Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Note: The laboratory flagged various %Ds as outside the laboratory QC limits of 20%: however, the %Ds were evaluated using the NFG QC limit of 25% and only detected results equal or greater than 25% were considered for validation.

IV. GC/MS INSTRUMENT PERFORMANCE CHECK
The BFB (VOA) performance check was injected once at the beginning of each 12-hour period and relative abundance criteria for the ions were met.
Yes __X__ No _____ NA _____

V. INTERNAL STANDARDS
The Internal Standards met the 100% upper and -50% lower limits criteria, and the Retention times were within the required windows.
Yes __X__ No _____ NA _____

VI. SURROGATE STANDARDS
Surrogate spikes were analyzed with every sample.
Yes __X__ No _____

And met the recovery limits defined in the QAPP , which are the laboratory limits.
Yes _X___ No _____
All surrogates recoveries were within criteria.

VII. MATRIX SPIKE/MATRIX SPIKE DUPLICATE
A. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were analyzed for every analysis performed and for every 20 samples or for every matrix whichever is more frequent.
Yes __X__ No _____
All MS/MSD samples were associated with the client samples and are identified as (all ending in LS-25) MW-282, PMW-92-03, MW-259, DR1-6A, MW-100B, MW204B. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.

B. The MS and MSD percent recoveries were within the limits defined in the updated 2011 QAPP, which now references the laboratory limits.
Yes ____ No _X____ NA _____
The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.
For MW-100B, Vinyl chloride result was 4 x the spike and no data are qualified.
For DR1-6A, the low recovery appears to be related to laboratory accuracy (LCS %R).

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041069-07	PMW92-03-LS-25	cis-1,2-Dichloroethene	27.7	0.25	JMS69
L17041069-26	MW-259-LS-25	2,2-Dichloropropane	U	0.25	JD32.6
L17041069-26	MW-259-LS-25	Trichloroethene	20.1	0.25	JMS64

C. The MSD relative percent differences (RPD) were within the defined contract limits, which are 30%.
Yes ____ No __X___ NA _____
Qualifiers are added only when the MS or MSD recovery is also out of limits or the RPD exceeds 30%. Data are qualified "JD#", where # is the RPD. As the RPD increases, the matrix precision decreases. All RPD limits are met with the 2 exception noted in the table above. As the RPD increases, the precision decreases.
For MW 259 for 2,2-Dichloropropane the spike results were within limits. It was only the RPD that was out of limits.

D. The MS/MSD were client samples.

Yes __X__ No _____ NA _____

VIII. LABORATORY CONTROL SAMPLE

A. Laboratory Control Sample (LCS) was analyzed for every analysis performed and for every 20 samples.
Yes __X__ No _____

B. The LCS percent recoveries were within the limits defined in the updated 2011 QAPP, which are the laboratory limits. If an LCS and LCSD are analyzed, both samples must have the same compounds out for data to be qualified.
Yes __X__ No _____
The full target list has been spiked. When a high LCS recovery is associated with a non-detect in samples, no qualifier is added since the indicated bias is high. When the target is detected, data are qualified "JL#", where # is the recovery. Data could be biased low proportional to the LCS percent recovery or false non-detected data could be reported.

IX. BLANKS

A. Method Blanks were analyzed at the required frequency and for each matrix and analysis.
Yes __X__ No _____

B. No blank contamination was found in the Method Blank.
Yes ___X__ No ____
Whenever Methylene Chloride, Acetone, 2-Butanone are detected in associated samples at a level less than 10 × the Method Blank (corrected for dilution), data are qualified "BMB#", where # is the corrected Method Blank level. All method blanks were reported as non-detect. Laboratory blanks are applied with the appropriate sample dilution factor.

C. If Field Blanks were identified, no blank contamination was found.
Yes _____ No _X____ NA ____
There are 5 trip blanks and one equipment blank. Acetone was reported in the equipment blank and in TB1, 2 and 5 . Data have been qualified "BTB#", where # is the Trip Blank result or BEB# for the rinse blanks. TB 1 also reported tetrachloroethene. The project manager has clarified that TB 1-3 apply to samples in SDGs L17041069 and 1075. Worst case has been applied as the times of blank collection are the same. The equipment blank was specified as applying to only DR2-5. This blank has low level gasoline compounds 1,4 dichlorobenzene, chloroform, ethyl benzene and toluene. Only acetone required qualification in the one sample. Data are fully usable as non-detected results. Field blanks are applied directly without applying a dilution factor.

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041069-01	MW-85-LS-25	Acetone	4.35	2.5	BTB5
L17041069-02	PMW-85-01-LS-25	Acetone	7.15	2.5	BTB5
L17041069-03	DUP-10	Acetone	9.66	2.5	BTB5
L17041069-04	PMW-85-05-LS-25	Acetone	5.34	2.5	BTB5
L17041069-05	DR2-3-LS-25	Acetone	3.94	2.5	BTB5
L17041069-06	MW-113-LS-25	Acetone	5.14	2.5	BTB5
L17041069-06	MW-113-LS-25	Tetrachloroethene	0.439	0.25	BTB0.278
L17041069-07	PMW92-03-LS-25	Acetone	13	2.5	BTB5
L17041069-07	PMW92-03-LS-25	Tetrachloroethene	0.587	0.25	BTB0.278
L17041069-10	PMW92-02-LS-25	Acetone	4.81	2.5	BTB5

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041069-10	PMW92-02-LS-25	Tetrachloroethene	0.422	0.25	BTB0.278
L17041069-11	DUP-3	Acetone	6.38	2.5	BTB5
L17041069-12	MW-92-LS-25	Acetone	8.37	2.5	BTB5
L17041069-13	DR2-1-LS-25	Acetone	7.81	2.5	BTB5
L17041069-14	MW-88-LS-25	Acetone	7.01	2.5	BTB5
L17041069-15	DR2-2-LS-25	Acetone	7.57	2.5	BTB5
L17041069-16	MW-266-LS-25	Acetone	4.04	2.5	BTB5
L17041069-16	MW-266-LS-25	Tetrachloroethene	0.699	0.25	BTB0.278
L17041069-17	MW-267-LS-25	Acetone	7.07	2.5	BTB5
L17041069-19	DR2-6-LS-25	Acetone	7.17	2.5	BTB5
L17041069-20	MW-217-LS-25	Acetone	7.78	2.5	BTB5
L17041069-21	MW-64-LS-25	Acetone	9.85	2.5	BTB5
L17041069-22	MW-218-LS-25	Acetone	8.91	2.5	BTB5
L17041069-23	MW-268-LS-25	Acetone	8.29	2.5	BTB5
L17041069-24	MW-270-LS-25	Acetone	7.85	2.5	BTB5
L17041069-24	MW-270-LS-25	Tetrachloroethene	0.264	0.25	BTB0.278
L17041069-25	MW-272-LS-25	Acetone	4.62	2.5	BTB5
L17041069-26	MW-259-LS-25	Acetone	6.74	2.5	BTB5
L17041069-29	MW-271-LS-25	Acetone	7.35	2.5	BTB5
L17041069-30	MW-97-LS-25	Acetone	8.67	2.5	BTB5
L17041069-31	MW-204A-LS-25	Acetone	15	2.5	BTB5
L17041069-32	MW-204B-LS-25	Acetone	5.49	2.5	BTB5
L17041069-33	MW-204B-LS-25	Acetone	28.4	2.5	BTB5
L17041069-34	MW-204B-LS-25	Acetone	25.8	2.5	BTB5
L17041069-35	MW-197A-LS-25	Acetone	4.02	2.5	BTB5
L17041069-36	MW-197B-LS-25	Acetone	8.03	2.5	BTB5
L17041069-37	MW-203A-LS-25	Acetone	20.6	2.5	BTB5
L17041069-38	MW-203B-LS-25	Acetone	5.48	2.5	BTB5
L17041069-39	MW-210A-LS-25	Acetone	3.9	2.5	BTB5
L17041069-40	MW-210B-LS-25	Acetone	9.03	2.5	BTB5
L17041069-41	MW-277-LS-25	Acetone	3.31	2.5	BTB5
L17041069-43	MW-98-LS-25	Acetone	11.8	2.5	BTB5
L17041069-44	DUP-6	Acetone	9.49	2.5	BTB5
L17041069-45	MW-205A-LS-25	Acetone	9.32	2.5	BTB5
L17041069-46	MW-205B-LS-25	Acetone	10.1	2.5	BTB5
L17041069-47	MW-39A-LS-25	Acetone	7.11	2.5	BTB5
L17041069-48	MW-39-LS-25	Acetone	6.86	2.5	BTB5
L17041069-49	MW-206B-LS-25	Acetone	6.29	2.5	BTB5

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041069-50	MW-206A-LS-25	Acetone	5.15	2.5	BTB5
L17041075-01	MW-200-LS-25	Acetone	7.74	2.5	BTB5
L17041075-02	MW-94A-LS-25	Acetone	6.91	2.5	BTB5
L17041075-03	MW-208B-LS-25	Acetone	5.53	2.5	BTB5
L17041075-04	MW-208A-LS-25	Acetone	4.93	2.5	BTB5
L17041075-05	MW-207B-LS-25	Acetone	5.61	2.5	BTB5
L17041075-06	MW-207A-LS-25	Acetone	8.48	2.5	BTB5
L17041075-07	MW-108-LS-25	Acetone	4.71	2.5	BTB5
L17041075-08	DUP-4	Acetone	6.45	2.5	BTB5
L17041075-09	MW-107B-LS-25	Acetone	3.03	2.5	BTB5
L17041075-10	MW-107T-LS-25	Acetone	3.05	2.5	BTB5
L17041075-11	MW-258-LS-25	Acetone	11.7	2.5	BTB5
L17041075-12	MW-265-LS-25	Acetone	7.97	2.5	BTB5
L17041075-13	DUP-8	Acetone	10.4	2.5	BTB5
L17041075-14	MW-264-LS-25	Acetone	8.33	2.5	BTB5
L17041075-15	MW-104-LS-25	Acetone	12	2.5	BTB5
L17041075-16	MW-263-LS-25	Acetone	8.43	2.5	BTB5
L17041075-17	DR1-5A-LS-25	Acetone	7.2	2.5	BTB5
L17041075-18	DR1-5-LS-25	Acetone	5.8	2.5	BTB5
L17041075-19	MW-21-LS-25	Acetone	6.84	2.5	BTB5
L17041075-20	DUP-2	Acetone	7.18	2.5	BTB5
L17041075-21	PMW21-01-LS-25	Acetone	8.81	2.5	BTB5
L17041075-22	PMW21-02-LS-25	Acetone	7.59	2.5	BTB5
L17041075-23	PMW21-03-LS-25	Acetone	8.48	2.5	BTB5
L17041075-24	PMW21-04-LS-25	Acetone	4.42	2.5	BTB5
L17041075-25	MW-100B-LS-25	Acetone	5.46	2.5	BTB5
L17041075-28	DR1-6A-LS-25	Acetone	5.73	2.5	BTB5
L17041075-31	DR1-6-LS-25	Acetone	7.7	2.5	BTB5
L17041075-32	PMW101-06A-LS-25	Acetone	7.98	2.5	BTB5
L17041075-33	DUP-11	Acetone	2.77	2.5	BTB5
L17041075-34	PMW101-06B-LS-25	Acetone	3.7	2.5	BTB5
L17041075-35	PMW101-07A-LS-25	Acetone	9.65	2.5	BTB5
L17041075-35	PMW101-07A-LS-25	Tetrachloroethene	0.635	0.25	BTB.278
L17041075-36	PMW101-07B-LS-25	Acetone	7.9	2.5	BTB5
L17041075-37	PMW21-05-LS-25	Acetone	5.28	2.5	BTB5
L17041075-38	MW-276-LS-25	Acetone	2.89	2.5	BTB5
L17041075-39	DUP-9	Acetone	3.33	2.5	BTB5
L17041075-40	MW-279-LS-25	Acetone	5.39	2.5	BTB5

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041075-41	MW-278-LS-25	Acetone	3.21	2.5	BTB5
L17041075-42	MW-275-LS-25	Acetone	4	2.5	BTB5
L17041075-42	MW-275-LS-25	Tetrachloroethene	0.411	0.25	BTB.278
L17041075-43	LTM-TB1-LS-25	Acetone	5	2.5	BTB5
L17041075-44	LTM-TB2-LS-25	Acetone	3.1	2.5	BTB5
L17041209-01	MW-209B-LS-25	Acetone	5.3	2.5	BTB4.54
L17041209-02	MW-209A-LS-25	Acetone	5.98	2.5	BTB4.54
L17041209-03	MW-273-LS-25	Acetone	10.5	2.5	BTB4.54
L17041209-04	MW-219-LS-25	Acetone	6.79	2.5	BTB4.54
L17041209-05	MW-269-LS-25	Acetone	13.1	2.5	BTB4.54
L17041209-09	EB1-LS-25	Acetone	5.48	2.5	BTB4.54

X. FIELD QC

If Field Duplicates were identified, they met guidance for VOA of RPD of < 30% for water or < 50% for soil. For values reported at < 5 × the reporting limit (RL), a difference of 2 × RL or 3.5 × RL for soil is used as guidance. This is referred to as the CRDL Rule. Data are not qualified for Field Duplicates as these are evaluated for the total project by the Project Manager.

Yes _____ No __X__ NA _____

There are 11 identified field duplicates as described in the following table. If data were qualified they would be JFD#, where # is the RPD. As the RPD increases, the precision decreases. There are low level or non-detect results which would usually be qualified for the difference between the two values as one of the values is less than 5 x RL. These were within limits for these samples. All RPDs were acceptable or differences between low level values were less than 2 x RL with the exceptions noted below.

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041075-32	PMW101-06A-LS-25	Methyl t-butyl ether (MTBE)	19	0.5	JFD34.6
L17041075-32	PMW101-06A-LS-25	Tetrachloroethene	29.3	0.25	JFD113
L17041075-33	DUP-11	Methyl t-butyl ether (MTBE)	13.4	0.5	JFD34.6
L17041075-33	DUP-11	Tetrachloroethene	8.09	0.25	JFD113

DR1-3-LS-25	DUP-1
MW-21-LS-25	DUP-2
MW-92-LS-25	DUP-3
MW-108-LS-25	DUP-4
MW-202B-LS-25	DUP-5
MW-205A-LS-25	DUP-6
MW-212-LS-25	DUP-7
MW-265-LS-25	DUP-8
MW-276-LS-25	DUP-9
PMW-85-01-LS-25	DUP-10
PMW101-06A-LS-25	DUP-11

XI. SYSTEM PERFORMANCE

A. The RICs, chromatograms, tunes and general system performance were acceptable for all instruments and analytical systems.
Yes _____ No _____ NA __X__
Not part of this review level. It is noted, however, that Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There was nothing in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but this cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

B. The suggested EQLs for the sample matrices in this set were met.
Yes __X__ No _____ NA _____

XII. OVERALL ASSESSMENT OF THE CASE
The laboratory has complied with the requested method. Data are fully usable after consideration of qualifiers. The following is noted:
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations.

The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8026B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

Chain of Custody
One sample PMW101-02A-LS-25 arrived with headspace > 6 mm in all 3 vials. All data are qualified JP to indicate possible low bias. The sample was re-sampled and re-analyzed with acceptable results in the final SDG :17041209.
Sample DR2-5 had headspace in 2 vials. The third vial as used for analysis.

Calibrations
Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common "poor responders." Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."
Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There is not anything in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

ICV and CCV
There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.
Instrument 17: Dichlorodifluoro and Trichlorofluoro methane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.
For Instrument 11: Dichlorodifluoromethane and chloromethane are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.
Poor responders met the noted limits.

For Instrument 11, the response is averaged to 0.0025. All other instruments are 0.0017 to 0.0012.
Instrument 6 and 17 reported outliers for bromoromethane at 31.9% and -25.5% respectively
Instrument 17 for dichlorodifluoromethane (34.1%),and trichlorofluormethane (-36%).
Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Matrix Spikes

The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.
All MS/MSD samples were associated with the client samples and are identified as (all ending in LS-25) MW-282, PMW-92-03, MW-259, DR1-6A, MW-100B, MW204B. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.
The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.
Vinyl chloride result was 4 x the spike and no data are qualified.
Qualifiers are added only when the MS or MSD recovery is also out of limits or the RPD exceeds 30%. Data are qualified "JD#", where # is the RPD. As the RPD increases, the matrix precision decreases. All RPD limits are met with the 2 exception noted in the table above. As the RPD increases, the precision decreases.
For MW 259 for 2,2-Dichloropropane the spike results were within limits. It was only the RPD that was out of limits.

Field Blanks

There are 5 trip blanks and one equipment blank. Acetone was reported in the equipment blank and in TB1, 2 and 5 . Data have been qualified "BTB#", where # is the Trip Blank result or BEB# for the rinse blanks. TB 1 also reported tetrachloroethene. The project manager has clarified that TB 1-3 apply to samples in SDGs L17041069 and 1075. Worst case has been applied as the times of blank collection are the same. The equipment blank was specified as applying to only DR2-5. This blank has low level gasoline compounds 1,4 dichlorobenzene, chloroform, ethyl benzene and toluene. Only acetone required qualification in the one sample. Data are fully usable as non-detected results.

Field QC

There are 11 identified field duplicates as described in the following table. If data were qualified they would be JFD#, where # is the RPD. As the RPD increases, the precision decreases. There are low level or non-detect results which would usually be qualified for the difference between the two values as one of the values is less than 5 x RL. These were within limits for these samples. All RPDs were acceptable or differences between low level values were less than 2 x RL with the exceptions noted below.

DR1-3-LS-25	DUP-1
MW-21-LS-25	DUP-2
MW-92-LS-25	DUP-3
MW-108-LS-25	DUP-4
MW-202B-LS-25	DUP-5
MW-205A-LS-25	DUP-6
MW-212-LS-25	DUP-7
MW-265-LS-25	DUP-8
MW-276-LS-25	DUP-9
PMW-85-01-LS-25	DUP-10

PMW101-06A-LS-25	DUP-11

TABLE OF QUALIFIED DATA

LAB ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041069-01	MW-85-LS-25	Acetone	4.35	2.5	BTB5
L17041069-02	PMW-85-01-LS-25	Acetone	7.15	2.5	BTB5
L17041069-03	DUP-10	Acetone	9.66	2.5	BTB5
L17041069-04	PMW-85-05-LS-25	Acetone	5.34	2.5	BTB5
L17041069-05	DR2-3-LS-25	Acetone	3.94	2.5	BTB5
L17041069-06	MW-113-LS-25	Acetone	5.14	2.5	BTB5
L17041069-06	MW-113-LS-25	Tetrachloroethene	0.439	0.25	BTB0.278
L17041069-07	PMW92-03-LS-25	Acetone	13	2.5	BTB5
L17041069-07	PMW92-03-LS-25	Tetrachloroethene	0.587	0.25	BTB0.278
L17041069-07	PMW92-03-LS-25	cis-1,2-Dichloroethene	27.7	0.25	JMS69
L17041069-10	PMW92-02-LS-25	Acetone	4.81	2.5	BTB5
L17041069-10	PMW92-02-LS-25	Tetrachloroethene	0.422	0.25	BTB0.278
L17041069-11	DUP-3	Acetone	6.38	2.5	BTB5
L17041069-12	MW-92-LS-25	Acetone	8.37	2.5	BTB5
L17041069-13	DR2-1-LS-25	Acetone	7.81	2.5	BTB5
L17041069-14	MW-88-LS-25	Acetone	7.01	2.5	BTB5
L17041069-15	DR2-2-LS-25	Acetone	7.57	2.5	BTB5
L17041069-16	MW-266-LS-25	Acetone	4.04	2.5	BTB5
L17041069-16	MW-266-LS-25	Tetrachloroethene	0.699	0.25	BTB0.278
L17041069-17	MW-267-LS-25	Acetone	7.07	2.5	BTB5
L17041069-19	DR2-6-LS-25	Acetone	7.17	2.5	BTB5
L17041069-20	MW-217-LS-25	Acetone	7.78	2.5	BTB5
L17041069-21	MW-64-LS-25	Acetone	9.85	2.5	BTB5
L17041069-22	MW-218-LS-25	Acetone	8.91	2.5	BTB5
L17041069-23	MW-268-LS-25	Acetone	8.29	2.5	BTB5
L17041069-24	MW-270-LS-25	Acetone	7.85	2.5	BTB5
L17041069-24	MW-270-LS-25	Tetrachloroethene	0.264	0.25	BTB0.278
L17041069-25	MW-272-LS-25	Acetone	4.62	2.5	BTB5
L17041069-26	MW-259-LS-25	2,2-Dichloropropane	U	0.25	JD32.6
L17041069-26	MW-259-LS-25	Acetone	6.74	2.5	BTB5
L17041069-26	MW-259-LS-25	Trichloroethene	20.1	0.25	JMS64
L17041069-29	MW-271-LS-25	Acetone	7.35	2.5	BTB5
L17041069-30	MW-97-LS-25	Acetone	8.67	2.5	BTB5

L17041069-31	MW-204A-LS-25	Acetone	15	2.5	BTB5
L17041069-32	MW-204B-LS-25	Acetone	5.49	2.5	BTB5
L17041069-33	MW-204B-LS-25	Acetone	28.4	2.5	BTB5
L17041069-34	MW-204B-LS-25	Acetone	25.8	2.5	BTB5
L17041069-35	MW-197A-LS-25	Acetone	4.02	2.5	BTB5
L17041069-36	MW-197B-LS-25	Acetone	8.03	2.5	BTB5
L17041069-37	MW-203A-LS-25	Acetone	20.6	2.5	BTB5
L17041069-38	MW-203B-LS-25	Acetone	5.48	2.5	BTB5
L17041069-39	MW-210A-LS-25	Acetone	3.9	2.5	BTB5
L17041069-40	MW-210B-LS-25	Acetone	9.03	2.5	BTB5
L17041069-41	MW-277-LS-25	Acetone	3.31	2.5	BTB5
L17041069-43	MW-98-LS-25	Acetone	11.8	2.5	BTB5
L17041069-44	DUP-6	Acetone	9.49	2.5	BTB5
L17041069-45	MW-205A-LS-25	Acetone	9.32	2.5	BTB5
L17041069-46	MW-205B-LS-25	Acetone	10.1	2.5	BTB5
L17041069-47	MW-39A-LS-25	Acetone	7.11	2.5	BTB5
L17041069-48	MW-39-LS-25	Acetone	6.86	2.5	BTB5
L17041069-49	MW-206B-LS-25	Acetone	6.29	2.5	BTB5
L17041069-50	MW-206A-LS-25	Acetone	5.15	2.5	BTB5
L17041075-01	MW-200-LS-25	Acetone	7.74	2.5	BTB5
L17041075-02	MW-94A-LS-25	Acetone	6.91	2.5	BTB5
L17041075-03	MW-208B-LS-25	Acetone	5.53	2.5	BTB5
L17041075-04	MW-208A-LS-25	Acetone	4.93	2.5	BTB5
L17041075-05	MW-207B-LS-25	Acetone	5.61	2.5	BTB5
L17041075-06	MW-207A-LS-25	Acetone	8.48	2.5	BTB5
L17041075-07	MW-108-LS-25	Acetone	4.71	2.5	BTB5
L17041075-08	DUP-4	Acetone	6.45	2.5	BTB5
L17041075-09	MW-107B-LS-25	Acetone	3.03	2.5	BTB5
L17041075-10	MW-107T-LS-25	Acetone	3.05	2.5	BTB5
L17041075-11	MW-258-LS-25	Acetone	11.7	2.5	BTB5
L17041075-12	MW-265-LS-25	Acetone	7.97	2.5	BTB5
L17041075-13	DUP-8	Acetone	10.4	2.5	BTB5
L17041075-14	MW-264-LS-25	Acetone	8.33	2.5	BTB5
L17041075-15	MW-104-LS-25	Acetone	12	2.5	BTB5
L17041075-16	MW-263-LS-25	Acetone	8.43	2.5	BTB5
L17041075-17	DR1-5A-LS-25	Acetone	7.2	2.5	BTB5
L17041075-18	DR1-5-LS-25	Acetone	5.8	2.5	BTB5
L17041075-19	MW-21-LS-25	Acetone	6.84	2.5	BTB5
L17041075-20	DUP-2	Acetone	7.18	2.5	BTB5

L17041075-21	PMW21-01-LS-25	Acetone	8.81	2.5	BTB5
L17041075-22	PMW21-02-LS-25	Acetone	7.59	2.5	BTB5
L17041075-23	PMW21-03-LS-25	Acetone	8.48	2.5	BTB5
L17041075-24	PMW21-04-LS-25	Acetone	4.42	2.5	BTB5
L17041075-25	MW-100B-LS-25	Acetone	5.46	2.5	BTB5
L17041075-28	DR1-6A-LS-25	Acetone	5.73	2.5	BTB5
L17041075-31	DR1-6-LS-25	Acetone	7.7	2.5	BTB5
L17041075-32	PMW101-06A-LS-25	Acetone	7.98	2.5	BTB5
L17041075-32	PMW101-06A-LS-25	Methyl t-butyl ether (MTBE)	19	0.5	JFD34.6
L17041075-32	PMW101-06A-LS-25	Tetrachloroethene	29.3	0.25	JFD113
L17041075-33	DUP-11	Acetone	2.77	2.5	BTB5
L17041075-33	DUP-11	Methyl t-butyl ether (MTBE)	13.4	0.5	JFD34.6
L17041075-33	DUP-11	Tetrachloroethene	8.09	0.25	JFD113
L17041075-34	PMW101-06B-LS-25	Acetone	3.7	2.5	BTB5
L17041075-35	PMW101-07A-LS-25	Acetone	9.65	2.5	BTB5
L17041075-35	PMW101-07A-LS-25	Tetrachloroethene	0.635	0.25	BTB.278
L17041075-36	PMW101-07B-LS-25	Acetone	7.9	2.5	BTB5
L17041075-37	PMW21-05-LS-25	Acetone	5.28	2.5	BTB5
L17041075-38	MW-276-LS-25	Acetone	2.89	2.5	BTB5
L17041075-39	DUP-9	Acetone	3.33	2.5	BTB5
L17041075-40	MW-279-LS-25	Acetone	5.39	2.5	BTB5
L17041075-41	MW-278-LS-25	Acetone	3.21	2.5	BTB5
L17041075-42	MW-275-LS-25	Acetone	4	2.5	BTB5
L17041075-42	MW-275-LS-25	Tetrachloroethene	0.411	0.25	BTB.278
L17041075-43	LTM-TB1-LS-25	Acetone	5	2.5	BTB5
L17041075-44	LTM-TB2-LS-25	Acetone	3.1	2.5	BTB5
L17041110-01	PMW101-02A-LS-25	All data	U		JP
L17041209-01	MW-209B-LS-25	Acetone	5.3	2.5	BTB4.54
L17041209-02	MW-209A-LS-25	Acetone	5.98	2.5	BTB4.54
L17041209-03	MW-273-LS-25	Acetone	10.5	2.5	BTB4.54
L17041209-04	MW-219-LS-25	Acetone	6.79	2.5	BTB4.54
L17041209-05	MW-269-LS-25	Acetone	13.1	2.5	BTB4.54
L17041209-09	EB1-LS-25	Acetone	5.48	2.5	BTB4.54

Final Data Qualification and Usability Report

Project:	Defense Depot Memphis, TN (DDMT) Main Installation Long Term Monitoring
Sampling Event:	LS-25
Project / Task Number:	228-235772-005
Sample Data Package(s):	L17041069, L17041075, L17041110, L17041209
Data Validation Performed by:	Diane Short & Associates (DSA)
Final Data Qualification and Usability Report Prepared by:	Lynn K. Lutz, HDR Inc.

Data Validation Report Review and Comments

The validation report was acceptable except as noted below for final qualifiers.

The validator, in discussing relative response factors, noted that "[t]he laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for 'poor responders.'" The Project Chemist reviewed the area counts for the lowest standard included in the initial calibration for the low responders and found the areas to be adequate, and no qualifiers were applied.

The validator did not qualify a number of analytes based on low or high responses in the CCV; the PC evaluated the %D values and qualified associated results as estimated "J+" for high or "J-" for low results or non-detect estimated "UJ" for non-detect low results, as both the project QAPP and the method require CCV results be within 20%D:

- Bromomethane - workgroup # WG611071: %D = -31.9% (UJ)
- Chloromethane - workgroup # WG611145: %D = -24.3% (UJ)
- 1,2,3-Trichlorobenzene - workgroup # WG611222: %D = -23.6% (UJ)
- Bromomethane - workgroup # WG611301: %D = +20.4% (none, all ND)
- Bromomethane - workgroup # WG612030: %D = -25.5% (UJ)
- Bromomethane - workgroup # WG612123: %D = -24.5% (UJ)
- Acetone - workgroup # WG612142: %D = -21.6% (J-)
- Bromomethane - workgroup # WG612250: %D = -21.2% (UJ)

Final Data Qualifiers

The final qualifiers were UJ or J- where DSA had not qualified for calibration issues as noted above, for these analytes:

Bromomethane – 17 samples (UJ)
Chloromethane – 12 samples (UJ)
1,2,3-Trichlorobenzene - 3 samples (UJ)
Acetone – 1 sample (J-)

The final qualifier for all analytes in the initial sampling and analysis of PMW101-02A-LS-25 was J- or UJ where DSA had qualified JP due to headspace in the containers.

The final qualifier for cis-1,2-dichloroethene in sample PMW92-03-LS-25 was estimated J where DSA had qualified JMS69 for low MS/MSD recoveries.

The final qualifier for trichloroethene in MW-259-LS-25 was estimated J where DSA had qualified as JMS64 for low MS/MSD recoveries.

The final qualifier for 2,2-dichloropropane in MW-259-LS-25 was none where DSA had qualified as JD32.6 for a high MS/MSD RPD with a non-detected parent sample result.

The final qualifier for MTBE and tetrachloroethene in sample PMW101-06A-LS-25 and its field duplicate DUP-11 was J where DSA had qualified as JFD34.6 and JFD113 for field duplicate RPDs outside the control limit.

The final qualifier for acetone in 72 samples was 10.0 U where DSA had qualified as BTB5 for acetone in the trip blank. Sample results were less than the reporting limit (RL) and qualified as non-detect at the RL.

The final qualifier for acetone in four samples was 10.0 U where DSA had qualified as BTB4.54 for acetone in the trip blank. Sample results were less than the reporting limit (RL) and qualified as non-detect at the RL.

The final qualifier for acetone in 10 samples was “no qualification” where DSA had qualified as BTB5 for acetone in the trip blank. Sample results were greater than two times the blank concentration.

The final qualifier for tetrachloroethene in seven samples was 1.00 U where DSA had qualified as BTB0.278 for tetrachloroethene in the trip blank. Sample results were less than the RL and qualified as non-detect at the RL.

The final qualifier was J where the lab had qualified as F.

Data Usability

There were no rejected sample results. All results are usable as qualified.

24 July 2017

Lynn K. Lutz, HDR Inc. Date

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ORGANIC DATA QUALITY REVIEW REPORT
Volatile Organics by SW-846 Method 8260B (GC/MS)

SDG	L1710: 0514, 0636, 0637, 0710, 0839
PROJECT	Memphis Defense Depot, LA-26 Sampling for HDR, Denver
LABORATORY	Microbac Laboratories, Inc., Marietta, OH
SAMPLE MATRIX	Water
SAMPLING DATE	10/6 – 12/ 2017
NUMBER OF SAMPLES	See EDD for sample numbers 164 samples including 14 field dups, 5 trip blanks, 1 rinse blank and associated MS/MSDs
ANALYSES REQUESTED	SW-846 8260B (VOA by GC/MS)
SAMPLE NUMBER	See result forms attached and associated EDD

DATA REVIEWER: Diane Short

QA REVIEWER: Diane Short & Associates, Inc. INITIALS/DATE: __ DLS 11/10/2017

Telephone Logs included Yes____ No __X_

Contractual Violations Yes____ No __X_

The project QAPP (09/11), the EPA Contract Laboratory Program National Functional Guidelines for Organic Review, 1999 and 2010, and the SW-846 Method 8260B have been referenced by the reviewer to perform this data validation review. The EPA qualifiers have been expanded to include a descriptor code and value to define QC violations and their values, per the approval of the Project Manager. Per the Scope of Work, the review of these samples includes Level III validation of all chains of custody, calibrations and QC forms referencing the QC limits in the above documents.

I. DELIVERABLES

A. All deliverables were present as specified in the Statement of Work (SOW), SW-846, or in the project contract.
Yes __X__ No _____
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations. The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8260B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

B. Chain of Custody documentation was complete and accurate.
Yes __X__ No _____

C. Samples were received at the required temperature, preservation and intact with no bubbles.
Yes ____ No _X____
EPA regulations (See Federal Register, March 12, 2007, 40CFR Part 122) require only that the temperature of samples delivered to the laboratory be equal to or less than 6 °C. The sample temperature conditions are fully compliant with applicable regulations.
The client was contacted and any vials with full integrity were used for analysis. Only 2 samples are considered to be possibly biased low or contaminated due to headspace as there was no unaffected vial: Dup-6 and TB-3. Data are qualified 'JP' to indicate integrity issues.

Lab ID	Client ID	Comment
L17100514-09	MW-100B-LA-26	1/3 vials headspace > 6 mm
L17100514-11	MW-21-LA-26	1/3 vials headspace > 6 mm
L17100514-17	DUP-6-LA-26	3/3 vials headspace > 6 mm
L17100514-23	PMW21-01-LA-26	1/3 vials headspace > 6 mm
L17100514-24	DUP-1-LA-26	1/3 vials headspace > 6 mm
L17100514-27	DR1-5-LA-26	1/3 vials headspace > 6 mm
L17100636-32	DUP-4-LA-26	1/3 vials broken
L17100636-33	MW-209B-LA-26	1/3 vials headspace > 6 mm
L17100636-40	MW-208A-LA-26	1/3 vials headspace > 6 mm
L17100637-04	MW-209A-LA-26	1/3 vials broken
L17100637-06	MW-218-LA-26	1/3 vials broken
L17100637-07	MW-207A-LA-26	1/3 vials headspace > 6 mm
L17100637-47	LTM-TB3-LA-26	3/3 vials headspace > 6 mm
L17100637-53	LTM-TB2-LA-26	time on COC not = label
L17100637-65	LTM-TB1-LA-26	2/3 vials headspace > 6 mm

II. ANALYTICAL REPORT FORMS

A. The Analytical Report or Data Sheets are present and complete for all requested analyses.
Yes __X__ No _____

B. Holding Times
1. The contract holding times were met for all analyses [time of sample receipt to time of analysis (VOA) or time of extraction to time of analysis.
Yes __X__ No _____

2. The Clean Water Act (40 CFR 136) or method holding times were met for all analyses (14 days from time of sample collection to analysis or extraction).
Yes __X__ No _____
Several method blanks were run just slightly over the 12 hour limit. This has not impacted client data.

III. INSTRUMENT CALIBRATION – GC/MS

A. Initial Calibration

1. The Response (RF) and Relative Response Factors (RRF) and average RRF for all compounds for all analyses met the contract criteria of > 0.05 or > 0.01 for poor responding volatiles.
Yes __X__ No _____ NA _____
Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common "poor responders." Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."

Most of the low-responding compounds are highly water-soluble and capable of hydrogen bonding with water. This decreases their purge efficiency and results in the relatively low response. The implication of this low purge efficiency is that a relatively low absolute recovery of such compounds is achieved in the purge step of the analysis. If this recovery is consistent, reasonable accuracy and precision can be achieved in a given matrix, which is indicated for the lab matrix by acceptable recoveries in LCS and calibration checks. However, this causes these targets to be more sensitive to matrix variations that impact purge efficiency (such as ionic strength or the presence of varying levels of soluble non-target organic material) than are the more hydrophobic compounds typically analyzed by this method, and as a result they are more likely to exhibit matrix bias.

2a. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for the CCCs.
Yes __X__ No _____ NA _____
This is a method requirement and indicates that the analytical system is in control.

2b. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for all other compounds, the average % RSD was < 15%, or a linear curve was used.
Yes __X__ No _____ NA _____

3. The 12 hour system Performance Check was performed as required in SW-846 and met the QC limits of 80 – 120%.
Yes ____ No __X___ NA _____
For Instrument 6: Dichlorodifluoromethane (33.9%)and chloromethane (27%) are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

B. Continuing Calibrations

1. The midpoint standard was analyzed for each analysis at the required frequency, and the QC criterion of > 0.05 (> 0.01 for CLP 2001 VOA) was met.
Yes __X__ No _____ NA _____
Poor responders met the noted limits.

2. The percent difference (% D) limits of ± 25% were met. The 2001 NFG also allow for 40% D for the "poor responders (pr)". For other compounds, the QAPP notes rejection of detected compounds with % D > 40%.

Yes _____ No __X__ NA _____
There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.

Other outliers were > 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified. The same compounds that were high on instrument 6 tended also to be a bit high in the CCV.
For Instrument 11, 2,2-dichloropropane was high for the 10/19 p.m into 10/20 a.m. CCV. Response factors are acceptable and data are non-detect.
For Instrument 8, 2,2-dichloropropane was high for the 10/18 p.m . CCV. Response factors are acceptable and data are non-detect.

Note: The laboratory flagged various %Ds as outside the laboratory QC limits of 20%: however, the %D's were evaluated using the NFG QC limit of 25% and only detected results equal or greater than 25% were considered for validation.

IV. GC/MS INSTRUMENT PERFORMANCE CHECK
The BFB (VOA) performance check was injected once at the beginning of each 12-hour period and relative abundance criteria for the ions were met.
Yes __X__ No _____ NA _____

V. INTERNAL STANDARDS
The Internal Standards met the 100% upper and -50% lower limits criteria, and the Retention times were within the required windows.
Yes __X__ No _____ NA _____

VI. SURROGATE STANDARDS
Surrogate spikes were analyzed with every sample.
Yes __X__ No _____

And met the recovery limits defined in the QAPP , which are the laboratory limits.
Yes _X___ No _____
All surrogate recoveries were within criteria.

VII. MATRIX SPIKE/MATRIX SPIKE DUPLICATE
A. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were analyzed for every analysis performed and for every 20 samples or for every matrix whichever is more frequent.
Yes __X__ No _____
There are 7 MS/MSD pairs in this set as well as LCS/LCSD pairs. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager. This meets the requirement for 1/20 for field samples.

DR1-6-LA-26-MS	MW-219-LA-26-MS	PMW92-03-LA-26-MS
MW-208A-LA-26-MS	MW-90-LA-26-MS	MW-271-LA-26-MS
MW-143-LA-26-MS		

B. The MS and MSD percent recoveries were within the limits defined in the updated 2011 QAPP, which now references the laboratory limits.
Yes _X___ No _____ NA _____

For MW-219-LA-26, Tetrachloroethane did not meet limits, but the result in the client sample is well over 4 x the spike amount and the data are not qualified as the recovery is not statistically valid.
MW-208-LA-26 and MW-90-LA-26reported chloroform high in the MS at 146% and 134% respectively. The compound is not detected and no qualifier is applied.

C. The MSD relative percent differences (RPD) were within the defined contract limits, which are 30%.
Yes ____ No _X____ NA _____
Qualifiers are added only when the MS or MSD recovery is also out of limits or the RPD exceeds 30%. Data are qualified "JD#", where # is the RPD. As the RPD increases, the matrix precision decreases. All RPD limits are met with the 2 exceptions noted in the table above. As the RPD increases, the precision decreases.
For MW-143-LA-26 the RPD is high (21.4%) for chloroethane per the lab limits, but are within 30%. The MS and MSD are within limits and no qualifier is required.

D. The MS/MSD were client samples.
Yes ___X_ No _____ NA _____

VIII. LABORATORY CONTROL SAMPLE
A. Laboratory Control Sample (LCS) was analyzed for every analysis performed and for every 20 samples.
Yes __X__ No _____

B. The LCS percent recoveries were within the limits defined in the updated 2011 QAPP, which are the laboratory limits. If an LCS and LCSD are analyzed, both samples must have the same compounds out for data to be qualified.
Yes ____ No _X____
The full target list has been spiked. When a high LCS recovery is associated with a non-detect in samples, no qualifier is added since the indicated bias is high. When the target is detected, data are qualified "JL#", where # is the recovery. Data could be biased low proportional to the LCS percent recovery or false non-detected data could be reported. Both an LCS and LCSD was reported when there is no MS/MSD.

The LCS/LCSD for Instrument 6, SDG 17100637 on 10/18/17 reported a high RPD (36.3) for bromomethane and chloroethane (37.3%). The LCS and LCSD %R's were within limits and no qualifier is applied.
The %R for chloromethane and vinyl chloride were high. As no data were detected for these analytes, no qualifier is applied.

The LCS/LCSD for Instrument 8 in SDG 17100637, 10/18/17 was high for 1,2 dichloroethene; cis, 1,2 dichloroethene, and vinyl chloride. As no data were detected for these analytes, no qualifier is applied.

IX. BLANKS
A. Method Blanks were analyzed at the required frequency and for each matrix and analysis.
Yes __X__ No _____

B. No blank contamination was found in the Method Blank.
Yes ___X__ No ____
Whenever Methylene Chloride, Acetone, 2-Butanone are detected in associated samples at a level less than 10 × the Method Blank (corrected for dilution), data are qualified "BMB#", where # is the corrected Method Blank level. All method blanks were reported as non-detect. Laboratory blanks are applied with the appropriate sample dilution factor.

C. If Field Blanks were identified, no blank contamination was found.
Yes _____ No __X___ NA ____

There are 5 trip blank which had no detections except for TB-4 which reported acetone at 2.87 ug/L. Data for samples collected on 10/10/2017 are qualified BTB#, where # is the detected result. Data are usable as non-detected values.

Lab ID	Client ID	Analyte	Result ug/L	MDL	DSA
L17100710-01	DR2-3-LA-26	Acetone	4.11	2.5	BTB2.87
L17100710-02	DUP-10-LA-26	Acetone	2.91	2.5	BTB2.87
L17100710-05	MW-25A-LA-26	Acetone	2.59	2.5	BTB2.87
L17100710-06	MW-39A-LA-26	Acetone	11.9	2.5	BTB2.87
L17100710-09	MW-97-LA-26	Acetone	14.7	2.5	BTB2.87
L17100710-10	MW-203B-LA-26	Acetone	12.2	2.5	BTB2.87
L17100710-11	MW-259-LA-26	Acetone	13.1	2.5	BTB2.87
L17100710-13	MW-274-LA-26	Acetone	3.17	2.5	BTB2.87
L17100710-14	MW-277-LA-26	Acetone	4.18	2.5	BTB2.87
L17100710-15	DUP-7-LA-26	Acetone	8.98	2.5	BTB2.87
L17100710-16	MW-253-LA-26	Acetone	9.08	2.5	BTB2.87

X. FIELD QC

If Field Duplicates were identified, they met guidance for VOA of RPD of < 30% for water or < 50% for soil. For values reported at < 5 × the reporting limit (RL), a difference of 2 × RL or 3.5 × RL for soil is used as guidance. This is referred to as the CRDL Rule. Data are not qualified for Field Duplicates as these are evaluated for the total project by the Project Manager.

Yes __X___ No ____ NA _____

There are 14 identified field duplicates. The times for DUP-9 and MW-214A are 14:30 and 13:47. The time for MW 198 is noted as 14:30, but the analyte precision is not within limits. The client-identified pair in the table has been used and is acceptable. All field duplicates met precision criteria.

DR1-5-LA-26	DUP-1
DR2-1-LA-26	DUP-2
MW-62-LA-26	DUP-3
MW-64-LA-26	DUP-4
MW-94A-LA-26	DUP-5
MW-100B-LA-26	DUP-6
MW-253-LA-26	DUP-7
MW-203A-LA-26	DUP-8
MW-214A-LA-26	DUP-9
MW-261-LA-26	DUP-10
MW-262-LA-26	DUP-11
MW-275-LA-26	DUP-12
MW-283-LA-26	DUP-13
MW-96-LA-26	DUP-14

XI. SYSTEM PERFORMANCE

A. The RICs, chromatograms, tunes and general system performance were acceptable for all instruments and analytical systems.

Yes _____ No _____ NA __X__

Not part of this review level.

B. The suggested EQLs for the sample matrices in this set were met.
Yes __X__ No _____ NA _____

XII. OVERALL ASSESSMENT OF THE CASE

The laboratory has complied with the requested method. Data are fully usable after consideration of qualifiers. The following is noted:
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations.

The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8026B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

Sample Integrity

Fifteen samples arrived with integrity issues. EPA regulations (See Federal Register, March 12, 2007, 40CFR Part 122) require only that the temperature of samples delivered to the laboratory be equal to or less than 6 °C. The sample temperature conditions are fully compliant with applicable regulations.
The client was contacted and any vials with full integrity were used for analysis. Only 2 samples are considered to be possibly biased low or contaminated due to headspace as there was no unaffected vial: Dup-6 and TB-3 Data are qualified 'JP' to indicate integrity issues.

Calibrations

Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common "poor responders." Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."

ICV and CCV

There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.
For Instrument 6: Dichlorodifluoromethane (33.9%)and chloromethane (27%) are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Matrix Spikes

There are 7 MS/MSD pairs in this set as well as LCS/LCSD pairs. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager. This meets the requirement for 1/20 for field samples.
For MW-219-LA-26, Tetrachloroethane did not meet limits, but the result in the client sample is well over 4 x the spike amount and the data are not qualified as the recovery is not statistically valid.
MW-208-LA-26 and MW-90-LA-26reported chloroform high in the MS at 146% and 134% respectively. The compound is not detected and no qualifier is applied.

For MW-143-LA-26 the RPD is high (21.4%) for chloroethane per the lab limits, but are within 30%. The MS and MSD are within limits and no qualifier is required.

Laboratory Control Samples

The LCS/LCSD for Instrument 6, SDG 17100637 on 10/18/17 reported a high RPD (36.3) for bromomethane and chloroethane (37.3%) . The LCS and LCSD %R's were within limits and no qualifier is applied.

The %R for chloromethane and vinyl chloride were high. As no data were detected for these analytes, no qualifier is applied.

The LCS/LCSD for Instrument 8 in SDG 17100637, 10/18/17 was high for 1,2 dichloroethene;, cis, 1,2 dichloroethene, and vinyl chloride. As no data were detected for these analytes, no qualifier is applied.

Field Blanks

There are 5 trip blank which had no detections except for TB-4 which reported acetone at 2.87 ug/L. Data for samples collected on 10/10/2017 are qualified BTB#, where # is the detected result. Data are usable as non-detected values.

Field QC

There are 14 identified field duplicates. The times for DUP-9 and MW-214A are 14:30 and 13:47. The time for MW 198 is noted as 14:30, but the analyte precision is not within limits. The client-identified pair in the table has been used and is acceptable. All field duplicates met precision criteria.

TABLE OF QUALIFIED DATA

Lab ID	Client ID	Analyte	Result ug/L	MDL	DSA
L17100710-01	DR2-3-LA-26	Acetone	4.11	2.5	BTB2.87
L17100710-02	DUP-10-LA-26	Acetone	2.91	2.5	BTB2.87
L17100710-05	MW-25A-LA-26	Acetone	2.59	2.5	BTB2.87
L17100710-06	MW-39A-LA-26	Acetone	11.9	2.5	BTB2.87
L17100710-09	MW-97-LA-26	Acetone	14.7	2.5	BTB2.87
L17100710-10	MW-203B-LA-26	Acetone	12.2	2.5	BTB2.87
L17100710-11	MW-259-LA-26	Acetone	13.1	2.5	BTB2.87
L17100710-13	MW-274-LA-26	Acetone	3.17	2.5	BTB2.87
L17100710-14	MW-277-LA-26	Acetone	4.18	2.5	BTB2.87
L17100710-15	DUP-7-LA-26	Acetone	8.98	2.5	BTB2.87
L17100710-16	MW-253-LA-26	Acetone	9.08	2.5	BTB2.87
L17100514-17	DUP-6-LA-26	All analytes			JP
L17100637-47	LTM-TB3-LA-26	All analytes			JP

Final Data Qualification and Usability Report

Project:	Defense Depot Memphis, TN (DDMT) Main Installation Long Term Monitoring
Sampling Event:	LA-26
Project / Task Number:	10021503-228-235772-005
Sample Data Package(s):	L17100514, L17100636, L17100637, L17100710, L17100839
Data Validation Performed by:	Diane Short & Associates (DSA)
Final Data Qualification and Usability Report Prepared by:	Lynn K. Lutz, HDR Inc.

Data Validation Report Review and Comments

The validation report was acceptable except as noted below for final qualifiers.

The validator, in discussing relative response factors, noted that "[t]he laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for 'poor responders.'" The Project Chemist reviewed the area counts for the lowest standard included in the initial calibration for the low responders and found the areas to be adequate, and no qualifiers were applied.

The validator did not qualify a number of analytes based on low or high responses in the CCV; the PC evaluated the %D values and qualified associated results as estimated "J" for high or low results or non-detect estimated "UJ" for non-detect low results, as both the project QAPP and the method require CCV results be within 20%D:

- Chloromethane - workgroup # WG633719: %D = -20.2% (UJ)
- Dichlorodifluoromethane - workgroup # WG634168: %D = +22.8% (none, all ND)
- Dichlorodifluoromethane - workgroup # WG634400: %D = +25.9% (none, all ND)
- 2,2-Dichloropropane - workgroup # WG634436: %D = +32.1% (none, all ND)
- Acetone - workgroup # WG634436: %D = -21.6% (1 UJ, 4 J-)
- Dichlorodifluoromethane - workgroup # WG634436: %D = +23.1% (none, all ND)
- Dichlorodifluoromethane - workgroup # WG634505: %D = +21.4% (none, all ND)
- Hexachlorobutadiene - workgroup # WG634606: %D = +20.4% (none, all ND)
- 2,2-Dichloropropane - workgroup # WG634645: %D = +55.1% (none, all ND)
- Dichlorodifluoromethane - workgroup # WG634775: %D = +26.8% (none, all ND)
- 2-Chlorotoluene - workgroup # WG635230: %D = -20.7% (1 UJ)

The validator noted that all three vials of samples DUP6-LA-26 and LTM-TB3-LA-26 had headspace, and were "considered to be possibly biased low or contaminated." This is actually only

true for the trip blank. For the field duplicate, the HDR chemist instructed the lab to use one of the vials from the parent sample, MW-100B-LA-26, and analyze it as the FD. The parent sample vial did not have headspace and no qualification was required for the FD.

Final Data Qualifiers

The final qualifiers were UJ or J where DSA had not qualified for calibration issues as noted above, for these analytes:

Chloromethane – 10 samples (UJ)
Acetone – 4 samples (UJ)
Acetone – 1 sample (J-)
2-Chlorotoluene - 1 sample (UJ)

The final qualifier for all analytes in sample DUP6-LA-26 was "no qualifier" where DSA had qualified as JP to indicate integrity issues due to sample vial headspace, as noted in the section above.

The final qualifier for all analytes in sample LTM-TB3-LA-26 was UJ where DSA had qualified as JP to indicate integrity issues due to sample vial headspace, as noted in the section above.

The final qualifier for acetone in seven samples was 10.0 U where DSA had qualified as BTB2.87 for acetone in the trip blank. Sample results were less than the reporting limit (RL) and qualified as non-detect at the reporting limit.

The final qualifier for acetone in one sample was 10.0 U where DSA had not qualified for acetone in the trip blank. The sample result was less than the reporting limit (RL) and qualified as non-detect at the RL.

The final qualifier for acetone in four samples was "no qualification" where DSA had qualified as BTB2.87 for acetone in the trip blank. Sample results were greater than two times the blank concentration.

The final qualifier was J where the lab had qualified as F.

Data Usability

There were no rejected sample results. All results are usable as qualified.

20 November 2017

Lynn K. Lutz, HDR Inc. Date

DIANE SHORT & ASSOCIATES, INC.
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ORGANIC DATA QUALITY REVIEW REPORT
Volatile Organics by SW-846 Method 8260B (GC/MS)

SDG	L1704: 1200, 1203
PROJECT	Memphis Defense Depot, ODLB14 Sampling for HDR, Denver
LABORATORY	Microbac Laboratories, Inc., Marietta, OH
SAMPLE MATRIX	Water
SAMPLING DATE	04/ 2017
NUMBER OF SAMPLES	108 samples, including 9 field duplicates, 3 trip blanks, and 5 MS/MSDs
ANALYSES REQUESTED	SW-846 8260B (VOA by GC/MS)
SAMPLE NUMBER	See result forms attached and associated EDD

DATA REVIEWER: Diane Short

QA REVIEWER: Diane Short & Associates, Inc. INITIALS/DATE: __ DLS 05/19/2017

Telephone Logs included Yes____ No __X_

Contractual Violations Yes____ No __X_

The project QAPP (09/11), the EPA Contract Laboratory Program National Functional Guidelines for Organic Review, 1999 and 2010, and the SW-846 Method 8260B have been referenced by the reviewer to perform this data validation review. The EPA qualifiers have been expanded to include a descriptor code and value to define QC violations and their values, per the approval of the Project Manager. Per the Scope of Work, the review of these samples includes Level III validation of all chains of custody, calibrations and QC forms referencing the QC limits in the above documents.

I. DELIVERABLES

A. All deliverables were present as specified in the Statement of Work (SOW), SW-846, or in the project contract.
Yes __X__ No _____
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations. The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8260B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

B. Chain of Custody documentation was complete and accurate.
Yes __X__ No _____

C. Samples were received at the required temperature, preservation and intact with no bubbles.
Yes __X__ No _____
EPA regulations (See Federal Register, March 12, 2007, 40CFR Part 122) require only that the temperature of samples delivered to the laboratory be equal to or less than 6 °C. The sample temperature conditions are fully compliant with applicable regulations.

II. ANALYTICAL REPORT FORMS

A. The Analytical Report or Data Sheets are present and complete for all requested analyses.
Yes __X__ No _____

B. Holding Times
1. The contract holding times were met for all analyses [time of sample receipt to time of analysis (VOA) or time of extraction to time of analysis].
Yes __X__ No _____

2. The Clean Water Act (40 CFR 136) or method holding times were met for all analyses (14 days from time of sample collection to analysis or extraction).
Yes __X__ No _____
Several method blanks were run just slightly over the 12 hour limit. This has not impacted client data.

III. INSTRUMENT CALIBRATION – GC/MS

A. Initial Calibration
1. The Response (RF) and Relative Response Factors (RRF) and average RRF for all compounds for all analyses met the contract criteria of > 0.05 or > 0.01 for poor responding volatiles.
Yes ___X_ No _____ NA _____
Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common “poor responders.” Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for “poor responders.”

Most of the low-responding compounds are highly water-soluble and capable of hydrogen bonding with water. This decreases their purge efficiency and results in the relatively low response. The implication of this low purge efficiency is that a relatively low absolute recovery of such compounds is achieved in the purge step of the analysis. If this recovery is consistent, reasonable accuracy and precision can be achieved in a given matrix, which is indicated for the lab matrix by acceptable recoveries in LCS and calibration checks. However, this causes these targets to be more sensitive to matrix variations that impact purge efficiency (such as ionic strength

or the presence of varying levels of soluble non-target organic material) than are the more hydrophobic compounds typically analyzed by this method, and as a result they are more likely to exhibit matrix bias.

Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There is not anything in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

2a. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for the CCCs.
Yes __X__ No _____ NA _____
This is a method requirement and indicates that the analytical system is in control.

2b. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for all other compounds, the average % RSD was < 15%, or a linear curve was used.
Yes __X__ No _____ NA _____

3. The 12 hour system Performance Check was performed as required in SW-846 and met the QC limits of 80 – 120%.
Yes ____ No __X___ NA _____
Instrument 17: Dichlorodifluoro and Trichlorofluoro methane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.
For Instrument 11: Dichlorodifluoromethane and chloromethane are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

B. Continuing Calibrations
1. The midpoint standard was analyzed for each analysis at the required frequency, and the QC criterion of > 0.05 (> 0.01 for CLP 2001 VOA) was met.
Yes __X__ No _____ NA _____
Poor responders met the noted limits .

2. The percent difference (% D) limits of ± 25% were met. The 2001 NFG also allow for 40% D for the "poor responders (pr)". For other compounds, the QAPP notes rejection of detected compounds with % D > 40%.
Yes _____ No __X__ NA _____
There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.
Instrument 17 for dichlorodifluoromethane (29.9%).
Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Note: The laboratory flagged various %Ds as outside the laboratory QC limits of 20%: however, the %Ds were evaluated using the NFG QC limit of 25% and only detected results equal or greater than 25% were considered for validation.

IV. GC/MS INSTRUMENT PERFORMANCE CHECK
The BFB (VOA) performance check was injected once at the beginning of each 12-hour period and relative abundance criteria for the ions were met.
Yes __X__ No _____ NA _____

V. INTERNAL STANDARDS

The Internal Standards met the 100% upper and -50% lower limits criteria, and the Retention times were within the required windows.
Yes __X__ No _____ NA _____

VI. SURROGATE STANDARDS
Surrogate spikes were analyzed with every sample.
Yes __X__ No _____

And met the recovery limits defined in the QAPP , which are the laboratory limits.
Yes _X___ No _____
All surrogates recoveries were within criteria.

VII. MATRIX SPIKE/MATRIX SPIKE DUPLICATE
A. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were analyzed for every analysis performed and for every 20 samples or for every matrix whichever is more frequent.
Yes __X__ No _____
All MS/MSD samples were associated with the client samples and are identified as (all ending in ODLB-14) MW-247, MW-225, MW-080, MW-130, MW165. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.

B. The MS and MSD percent recoveries were within the limits defined in the updated 2011 QAPP, which now references the laboratory limits.
Yes ____ No _X____ NA _____
The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.

SAMPLE ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041200-56	MW-247-ODLB-14	2,2-Dichloropropane	U	0.25	JMS43
L17041203-19	MW-130-ODLB-14	Trichloroethene	49.1	0.25	JMS53

C. The MSD relative percent differences (RPD) were within the defined contract limits, which are 30%.
Yes __X__ No _____ NA _____
Qualifiers are added only when the MS or MSD recovery is also out of limits or the RPD exceeds 30%. Data are qualified “JD#”, where # is the RPD. As the RPD increases, the matrix precision decreases. All RPD limits are me. As the RPD increases, the precision decreases.

D. The MS/MSD were client samples.
Yes __X__ No _____ NA _____

VIII. LABORATORY CONTROL SAMPLE
A. Laboratory Control Sample (LCS) was analyzed for every analysis performed and for every 20 samples.
Yes __X__ No _____

B. The LCS percent recoveries were within the limits defined in the updated 2011 QAPP, which are the laboratory limits. If an LCS and LCSD are analyzed, both samples must have the same compounds out for data to be qualified.
Yes __X__ No _____
The full target list has been spiked. When a high LCS recovery is associated with a non-detect in samples, no qualifier is added since the indicated bias is high. When the target is detected, data are qualified “JL#”,

where # is the recovery. Data could be biased low proportional to the LCS percent recovery or false non-detected data could be reported.

IX. BLANKS

A. Method Blanks were analyzed at the required frequency and for each matrix and analysis.
Yes __X__ No _____

B. No blank contamination was found in the Method Blank.
Yes ___X__ No ____
Whenever Methylene Chloride, Acetone, 2-Butanone are detected in associated samples at a level less than 10 × the Method Blank (corrected for dilution), data are qualified "BMB#", where # is the corrected Method Blank level. All method blanks were reported as non-detect. Laboratory blanks are applied with the appropriate sample dilution factor.

C. If Field Blanks were identified, no blank contamination was found.
Yes _____ No _X____ NA ____
There are 3 trip blanks and one equipment blank. The trip blanks report no detections. They were only in SDG L1704203. The equipment blank was specified as applying to only MW08. This blank has low level compounds 1,4 dichlorobenzene, acetone, chloroform, ethyl benzene and toluene. Acetone and chloroform required qualification in the one sample. Data are fully usable as non-detected results. Field blanks are applied directly without applying a dilution factor.

SAMPLE ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041203-26	MW-08-ODLB-14	Acetone	3.44	2.5	BEB7.42
L17041203-26	MW-08-ODLB-14	Chloroform	0.241	0.125	BEB.492

X. FIELD QC

If Field Duplicates were identified, they met guidance for VOA of RPD of < 30% for water or < 50% for soil. For values reported at < 5 × the reporting limit (RL), a difference of 2 × RL or 3.5 × RL for soil is used as guidance. This is referred to as the CRDL Rule. Data are not qualified for Field Duplicates as these are evaluated for the total project by the Project Manager.
Yes ___X__ No ____ NA _____

There are 9 identified field duplicates as described in the following table. If data were qualified they would be JFD#, where # is the RPD. As the RPD increases, the precision decreases. There are low level or non-detect results which would usually be qualified for the difference between the two values as one of the values is less than 5 x RL. These were within limits for these samples. All RPDs were acceptable or differences between low level values were less than 2 x RL.

MW-08-ODLB-14	DUP-1
MW-68-ODLB-14	DUP-2
MW-91-ODLB-14	DUP-3
MW-150-ODLB-14	DUP-4
MW-171-ODLB-14	DUP-5
MW-187-ODLB-14	DUP-6
MW-222-ODLB-14	DUP-7
MW-246-ODLB-14	DUP-8
MW-250-ODLB-14	DUP-9

XI. SYSTEM PERFORMANCE

A. The RICs, chromatograms, tunes and general system performance were acceptable for all instruments and analytical systems.

Yes _____ No _____ NA __X__

Not part of this review level. It is noted, however, that Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There was nothing in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but this cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

B. The suggested EQLs for the sample matrices in this set were met.

Yes __X__ No _____ NA _____

XII. OVERALL ASSESSMENT OF THE CASE

The laboratory has complied with the requested method. Data are fully usable after consideration of qualifiers. The following is noted:

This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations.

The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8026B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

Calibrations

Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common "poor responders." Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."

Instrument 11 is a bit of an anomaly. The Response Factors are about 2 x those of all the other instruments. There is not anything in the tune data that would reflect that large a difference and the IS 's are the same for all of them (eg Fluorobenzene for acetone). This maybe a newer instrument with different columns but cannot be determined from this level of review. It does mean higher sensitivity for just that instrument.

ICV and CCV

There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.

Instrument 17: Dichlorodifluoro and Trichlorofluoro methane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

For Instrument 11: Dichlorodifluoromethane and chloromethane are slightly high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

Instrument 17 for dichlorodifluoromethane (29.9%).

Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Matrix Spikes

The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.

All MS/MSD samples were associated with the client samples and are identified as (all ending in ODLB-14) MW-247, MW-225, MW-080, MW-130, MW165. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.

The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery.

Field Blanks

There are 3 trip blanks and one equipment blank. The trip blanks report no detections. They were only in SDG L1704203. The equipment blank was specified as applying to only MW08. This blank has low level compounds 1,4 dichlorobenzene, acetone, chloroform, ethyl benzene and toluene. Acetone and chloroform required qualification in the one sample. Data are fully usable as non-detected results. Field blanks are applied directly without applying a dilution factor.

Field QC

There are 9 identified field duplicates as described in the following table. All RPDs were acceptable or differences between low level values were less than 2 x RL with the one exception noted below.

TABLE OF QUALIFIED DATA

SAMPLE ID	CLIENT ID	ANALYTE	Result ug/L	MDL	DSA Q
L17041200-56	MW-247-ODLB-14	2,2-Dichloropropane	U	0.25	JMS43
L17041203-19	MW-130-ODLB-14	Trichloroethene	49.1	0.25	JMS53
L17041203-26	MW-08-ODLB-14	Acetone	3.44	2.5	BEB7.42
L17041203-26	MW-08-ODLB-14	Chloroform	0.241	0.125	BEB.492

Final Data Qualification and Usability Report

Project:	Defense Depot Memphis, TN (DDMT) Dunn Field Long Term Monitoring
Sampling Event:	ODLB-14
Project / Task Number:	228-235772-005
Sample Data Package(s):	L17041200, L17041203
Data Validation Performed by:	Diane Short & Associates (DSA)
Final Data Qualification and Usability Report Prepared by:	Lynn K. Lutz, HDR Inc.

Data Validation Report Review and Comments

The validation report was acceptable except as noted below for final qualifiers.

The validator, in discussing relative response factors, noted that "[t]he laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for 'poor responders.'" The Project Chemist reviewed the area counts for the lowest standard included in the initial calibration for the low responders and found the areas to be adequate, and no qualifiers were applied.

The validator did not qualify a number of analytes based on low or high responses in the CCV; the PC evaluated the %D values and qualified associated results as estimated "J-" for low results or non-detect estimated "UJ" for non-detect low results, as both the project QAPP and the method require CCV results be within 20%D:

- Chloromethane - workgroup # WG611925: %D = -21.7% (UJ)
- Bromomethane - workgroup # WG612030: %D = -25.5% (UJ)
- Bromomethane - workgroup # WG612123: %D = -24.5% (UJ)
- Acetone - workgroup # WG612142: %D = -21.6% (J-/UJ)
- Bromomethane - workgroup # WG612250: %D = -21.2% (UJ)
- Chloromethane - workgroup # WG612551: %D = +20.4% (none, all ND)
- Acetone - workgroup # WG612551: %D = -22.6% (J-/UJ)
- Dichlorodifluoromethane - workgroup # WG612551: %D = +29.9% (none, all ND)

Final Data Qualifiers

The final qualifiers were UJ or J- where DSA had not qualified for calibration issues as noted above, for these analytes:

Bromomethane – 41 samples (UJ)
Chloromethane – 12 samples (UJ)

Acetone – 4 samples (UJ)
Acetone – 11 samples (J-)

The final qualifier for 2,2-dichloropropane in sample MW-247-ODLB-14 was non-detect estimated UJ where DSA had qualified JMS43 for low MS/MSD recoveries.

The final qualifier for trichloroethene in MW-130-ODLB-14 was estimated J where DSA had qualified as JMS53 for low MS/MSD recoveries.

The final qualifier for acetone in sample MW-08-ODLB-14 was 10.0 U where DSA had qualified as BEB7.42 for acetone in the equipment blank. The sample result was less than the reporting limit (RL) and qualified as non-detect at the RL.

The final qualifier for chloroform in sample MW-08-ODLB-14 was 0.300 U where DSA had qualified as BEB.492 for chloroform in the equipment blank. The sample result was less than the reporting limit (RL) and qualified as non-detect at the RL.

The final qualifier was J where the lab had qualified as F.

Data Usability

There were no rejected sample results. All results are usable as qualified.

24 July 2017

Lynn K. Lutz, HDR Inc. Date

DIANE SHORT & ASSOCIATES, INC.
1978 S. Garrison St. # 114
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dsa7cbc@eazyqaqc.com

ORGANIC DATA QUALITY REVIEW REPORT
Volatile Organics by SW-846 Method 8260B (GC/MS)

SDG	L17100532
PROJECT	Memphis Defense Depot, Off depot ODLS-15, Sampling for HDR, Denver
LABORATORY	Microbac Laboratories, Inc., Marietta, OH
SAMPLE MATRIX	Water SAMPLING DATE 10/ 5,6/ 2017
NUMBER OF SAMPLES	21 samples, including 2 field duplicates, 1 trip blank and 1 MS/MSD
ANALYSES REQUESTED	SW-846 8260B (VOA by GC/MS)
SAMPLE NUMBER	See result forms attached and associated EDD

DATA REVIEWER: Diane Short

QA REVIEWER: Diane Short & Associates, Inc. INITIALS/DATE: __ DLS 10/26/2017

Telephone Logs included Yes____ No __X_

Contractual Violations Yes____ No __X_

The project QAPP (09/11), the EPA Contract Laboratory Program National Functional Guidelines for Organic Review, 1999 and 2010, and the SW-846 Method 8260B have been referenced by the reviewer to perform this data validation review. The EPA qualifiers have been expanded to include a descriptor code and value to define QC violations and their values, per the approval of the Project Manager. Per the Scope of Work, the review of these samples includes Level III validation of all chains of custody, calibrations and QC forms referencing the QC limits in the above documents.

I. DELIVERABLES

A. All deliverables were present as specified in the Statement of Work (SOW), SW-846, or in the project contract.
Yes __X__ No _____
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations. The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8260B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

B. Chain of Custody documentation was complete and accurate.
Yes __X__ No _____
Note that the log-in report contains several samples that are not on the COC or have been designated as part of this review.

C. Samples were received at the required temperature, preservation and intact with no bubbles.
Yes ____ No __X___
EPA regulations (See Federal Register, March 12, 2007, 40CFR Part 122) require only that the temperature of samples delivered to the laboratory be equal to or less than 6 °C. The sample temperature conditions are fully compliant with applicable regulations.

The following samples were noted in log-in as having integrity issues. In all cases, a viable vial was used for analyses.

Sample	Log-in
MW-163-ODLS-15	2 vials, cracked lids; samples intact
DUP-1-ODLS-15	1 of 3 vials, bubbles > 6 mm
MW-165-ODLS-15	2 of 3 vials, bubbles > 6 mm
TB-1-ODLS-15	2 of 3 vials, bubbles > 6 mm

II. ANALYTICAL REPORT FORMS

A. The Analytical Report or Data Sheets are present and complete for all requested analyses.
Yes __X__ No _____

B. Holding Times
1. The contract holding times were met for all analyses [time of sample receipt to time of analysis (VOA) or time of extraction to time of analysis].
Yes __X__ No _____

2. The Clean Water Act (40 CFR 136) or method holding times were met for all analyses (14 days from time of sample collection to analysis or extraction).
Yes __X__ No _____
Several method blanks were run just slightly over the 12 hour limit. This has not impacted client data.

III. INSTRUMENT CALIBRATION – GC/MS

A. Initial Calibration
1. The Response (RF) and Relative Response Factors (RRF) and average RRF for all compounds for all analyses met the contract criteria of > 0.05 or > 0.01 for poor responding volatiles.
Yes ___X_ No _____ NA _____
Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common “poor responders.” Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for

this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."

Most of the low-responding compounds are highly water-soluble and capable of hydrogen bonding with water. This decreases their purge efficiency and results in the relatively low response. The implication of this low purge efficiency is that a relatively low absolute recovery of such compounds is achieved in the purge step of the analysis. If this recovery is consistent, reasonable accuracy and precision can be achieved in a given matrix, which is indicated for the lab matrix by acceptable recoveries in LCS and calibration checks. However, this causes these targets to be more sensitive to matrix variations that impact purge efficiency (such as ionic strength or the presence of varying levels of soluble non-target organic material) than are the more hydrophobic compounds typically analyzed by this method, and as a result they are more likely to exhibit matrix bias.

2a. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for the CCCs.
Yes __X__ No _____ NA _____
This is a method requirement and indicates that the analytical system is in control.

2b. The relative standard deviation (RSD) for the five point calibration was within the 30% limit for all other compounds, the average % RSD was < 15%, or a linear curve was used.
Yes __X__ No _____ NA _____

3. The 12 hour system Performance Check was performed as required in SW-846 and met the QC limits of 80 – 120%.
Yes ____ No __X___ NA _____
Instrument 6: Dichlorodifluoromethane and Chloromethane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

B. Continuing Calibrations
1. The midpoint standard was analyzed for each analysis at the required frequency, and the QC criterion of > 0.05 (> 0.01 for CLP 2001 VOA) was met.
Yes __X__ No _____ NA _____
Poor responders met the noted limits .

2. The percent difference (% D) limits of ± 25% were met. The 2001 NFG also allow for 40% D for the "poor responders (pr)". For other compounds, the QAPP notes rejection of detected compounds with % D > 40%.
Yes __X___ No ____ NA _____
There are outliers for some of the poor responders, but they meet the 40% limit. Common poor responders: acetone, 2-butanone, MIBK, 2-hexanone, dichlorodifluoromethane, and carbon disulfide.
Other outliers were < 25% and compounds were non-detected with fully acceptable response factors. No data are detected and none are qualified.

Note: The laboratory flagged various %Ds as outside the laboratory QC limits of 20%: however, the %Ds were evaluated using the NFG QC limit of 25% and only detected results equal or greater than 25% were considered for validation.

IV. GC/MS INSTRUMENT PERFORMANCE CHECK
The BFB (VOA) performance check was injected once at the beginning of each 12-hour period and relative abundance criteria for the ions were met.
Yes __X__ No _____ NA _____

V. INTERNAL STANDARDS
The Internal Standards met the 100% upper and -50% lower limits criteria, and the Retention times were within the required windows.
Yes __X__ No _____ NA _____

VI. SURROGATE STANDARDS
Surrogate spikes were analyzed with every sample.
Yes __X__ No _____

And met the recovery limits defined in the QAPP , which are the laboratory limits.
Yes _X___ No _____
All surrogates recoveries were within criteria.

VII. MATRIX SPIKE/MATRIX SPIKE DUPLICATE
A. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were analyzed for every analysis performed and for every 20 samples or for every matrix whichever is more frequent.
Yes __X__ No _____
All MS/MSD samples were associated with the client samples and are identified as MW163- ODLS-15. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.

B. The MS and MSD percent recoveries were within the limits defined in the updated 2011 QAPP, which now references the laboratory limits.
Yes _X___ No _____ NA _____
The full target list has been spiked. The laboratory limits have been met, with the following exceptions. It is noted that the limits are fairly wide. Data are qualified JMS#, where # is the %R. Data could be biased low proportional to the recovery. No data are qualified.

C. The MSD relative percent differences (RPD) were within the defined contract limits, which are 30%.
Yes __X__ No _____ NA _____
Qualifiers are added only when the MS or MSD recovery is also out of limits or the RPD exceeds 30%. Data are qualified "JD#", where # is the RPD. As the RPD increases, the matrix precision decreases. All RPD limits are me. As the RPD increases, the precision decreases.

D. The MS/MSD were client samples.
Yes __X__ No _____ NA _____

VIII. LABORATORY CONTROL SAMPLE
A. Laboratory Control Sample (LCS) was analyzed for every analysis performed and for every 20 samples.
Yes __X__ No _____

B. The LCS percent recoveries were within the limits defined in the updated 2011 QAPP, which are the laboratory limits. If an LCS and LCSD are analyzed, both samples must have the same compounds out for data to be qualified.
Yes __X__ No _____
The full target list has been spiked. When a high LCS recovery is associated with a non-detect in samples, no qualifier is added since the indicated bias is high. When the target is detected, data are qualified "JL#", where # is the recovery. Data could be biased low proportional to the LCS percent recovery or false non-detected data could be reported.

IX. BLANKS
A. Method Blanks were analyzed at the required frequency and for each matrix and analysis.

Yes __X__ No _____

B. No blank contamination was found in the Method Blank.
Yes ___X__ No ____
Whenever Methylene Chloride, Acetone, 2-Butanone are detected in associated samples at a level less than 10 × the Method Blank (corrected for dilution), data are qualified "BMB#", where # is the corrected Method Blank level. All method blanks were reported as non-detect. Laboratory blanks are applied with the appropriate sample dilution factor.

C. If Field Blanks were identified, no blank contamination was found.
Yes __X___ No _____ NA ____
There is 1 trip blank. The trip blank reports no detections.

X. FIELD QC
If Field Duplicates were identified, they met guidance for VOA of RPD of < 30% for water or < 50% for soil. For values reported at < 5 × the reporting limit (RL), a difference of 2 × RL or 3.5 × RL for soil is used as guidance. This is referred to as the CRDL Rule. Data are not qualified for Field Duplicates as these are evaluated for the total project by the Project Manager.
Yes ___X__ No ____ NA _____

There are 2 identified field duplicate pairs as described in the following table. If data were qualified they would be JFD#, where # is the RPD. As the RPD increases, the precision decreases. There are low level or non-detect results which would usually be qualified for the difference between the two values as one of the values is less than 5 x RL. These were within limits for these samples. All RPDs were acceptable or differences between low level values were less than 2 x RL.

MW-87-ODLS-15	DUP-1
MW-149-ODLS-15	DUP-2

XI. SYSTEM PERFORMANCE
A. The RICs, chromatograms, tunes and general system performance were acceptable for all instruments and analytical systems.
Yes _____ No _____ NA __X__
Not part of this review level.

B. The suggested EQLs for the sample matrices in this set were met.
Yes __X__ No _____ NA _____

XII. OVERALL ASSESSMENT OF THE CASE
The laboratory has complied with the requested method. Data are fully usable after consideration of qualifiers. The following is noted:
This report has been requested to include the following review: QC, hold times, sample integrity (Chains of Custody, sample login), and summary calibrations.

The 2011 QAPP has been used for all review with the exception of the CCAL limits where the 25% NFG limits were applied as Method 8026B was used, not 8260C or the CLP method. Final application of these limits is being considered by project management.

<u>Sample Integrity</u>
The following samples were noted in log-in as having integrity issues. In all cases, a viable vial was used for analyses.

Sample	Log-in
MW-163-ODLS-15	2 vials, cracked lids; samples intact
DUP-1-ODLS-15	1 of 3 vials, bubbles > 6 mm
MW-165-ODLS-15	2 of 3 vials, bubbles > 6 mm
TB-1-ODLS-15	2 of 3 vials, bubbles > 6 mm

Calibrations

Method 8260: Per the Project Manager, the 2001 EPA CLP validation guidance has been applied to the common "poor responders." Calibration response factors below 0.05 have historically been observed for Acetone, 2 hexanone, 2-butanone, carbon disulfide or 4-methyl-2-pentanone. The validation guidance used for this project allows for a response of 0.01 for these compounds if spectral integrity can be verified at low concentrations. These spectra are not commonly provided and are not part of the deliverable for this data set. The laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for "poor responders."

ICV and CCV

Instrument 6: Dichlorodifluoromethane and Chloromethane are high in the ICV. No qualification is required as the response factor is acceptable to verify the non-detects or data are qualified for the CCAL.

Matrix Spikes

All MS/MSD samples were associated with the client samples and are identified as MW163- ODLS-15. This meets the recommendation of 1 per 20 field samples. As this is an ongoing project an overall adherence to the 1:20 frequency is monitored by the Project Manager.

Field Blanks

There is 1 trip blank. The trip blank reports no detections.

Field QC

There are 2 identified field duplicate pairs as described in the following table.

MW-87-ODLS-15	DUP-1
MW-149-ODLS-15	DUP-2

TABLE OF QUALIFIED DATA

No data are qualified.

Final Data Qualification and Usability Report

Project:	Defense Depot Memphis, TN (DDMT) Dunn Field Long Term Monitoring
Sampling Event:	ODLS-15
Project / Task Number:	10021503 - 228-235772-005
Sample Data Package(s):	L17100532
Data Validation Performed by:	Diane Short & Associates (DSA)
Final Data Qualification and Usability Report Prepared by:	Lynn K. Lutz, HDR Inc.

Data Validation Report Review and Comments

The validation report was acceptable except as noted below for final qualifiers.

The validator, in discussing relative response factors, noted that "[t]he laboratory has been tasked with providing to the client verification that the 0.01 RF is valid. If the spectral verification is available, data are not qualified for response factors greater than 0.01 and less than 0.05 for 'poor responders.'" The Project Chemist reviewed the area counts for the lowest standard included in the initial calibration for the low responders and found the areas to be adequate, and no qualifiers were applied.

The validator did not qualify one analyte based on low or high responses in the CCV; the PC evaluated the %D values and qualified associated results as non-detect estimated "UJ" for non-detect low results, as both the project QAPP and the method require CCV results be within 20%D:

- Bromomethane - workgroup # WG633850: %D = -22.7% (UJ)

Final Data Qualifiers

The final qualifiers were UJ where DSA had not qualified for calibration issues as noted above, for these analytes:

- Bromomethane – six samples (UJ)

The final qualifier was J where the lab had qualified as F.

Data Usability

There were no rejected sample results. All results are usable as qualified.

06 November 2017

Lynn K. Lutz, HDR Inc. Date

G

Appendix G.

Historical CVOC Results – Main Installation

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1

Analyte	Sample Name / Sample Date / Unit	DR1-1 5/21/2004	DR1-1 11/12/2004	DR1-1 2/17/2005	DR1-1 5/18/2005	DR1-1-LB-1 10/23/2006	DR1-1-LA-5 10/1/2007	DR1-1-LB-8 10/8/2008
Carbon tetrachloride	µg/L	<1 J	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.24 J	<1	<1	<1	<0.3	<0.3	0.126 J
cis-1,2-Dichloroethene	µg/L	0.8 J	1.2	1	1.1	1.02	0.969 J	<1
Tetrachloroethene	µg/L	2.8	3.3	3.3 J	3	2.46	2.49	2.69
Trichloroethene	µg/L	<1	0.3J	0.29 J	0.3 J	0.255 J	<1	0.399 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1

Analyte	Unit	Sample Name / Sample Date	DR1-1-LA-10 10/6/2009	DR1-1-LB-12 10/9/2010	DR1-1-LA-14 10/6/2011	DR1-1-LB-16 10/19/2012	DR1-1-LA-18 10/12/2013	DR1-1-LB-20 10/18/2014	DR1-1-LA-22 10/7/2015
Carbon tetrachloride	µg/L		<1	<1	<1 UJ	<1	<1	<1	<1
Chloroform	µg/L		<0.3	<0.3	<0.3 UJ	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L		1.08	1.26	1.31	1.52	0.734 J	0.731 J	0.716 J
Tetrachloroethene	µg/L		2.12	2.56	3	2.97	1.77	1.68	1.51
Trichloroethene	µg/L		0.328 J	0.304 J	0.326 J	0.309 J	<1	<1	0.351 J
Vinyl chloride	µg/L		<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1

	Sample Name	DR1-1-LB-24
	Sample Date	10/13/2016
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	0.633 J
Tetrachloroethene	µg/L	1.65
Trichloroethene	µg/L	0.265 J
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1A

Analyte	Sample Name / Sample Date	Unit	DR1 CLUSTER A 5/27/04	DR1-1A 11/13/04	DR1-1A 2/16/05	DR1-1A 5/18/05	DR1-1A-LB-1 10/2/06	DR1-1A-LS-3 4/13/07	DR1-1A-LA-5 10/1/2007
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.66 J	0.18 J	0.21 B	0.16 B	0.324	0.313	0.307
cis-1,2-Dichloroethene		µg/L	0.72 J	0.85 J	1	0.75 J	0.634	0.416 J	0.312 J
Tetrachloroethene		µg/L	1.5	1.8	1.8	1.6	1.18	0.959 J	0.813 J
Trichloroethene		µg/L	3.5	4	6.9	5.2	6.28	4.57	3.61
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1A

	Sample Name	DR1-1A-LS-7	DR1-1A-LB-8	DR1-1A-LQ-9	DR1-1A-LA-10	DR1-1A-LB-12	DR1-1A-LA-14
	Sample Date	4/8/2008	10/8/2008	4/8/2009	10/6/2009	10/9/2010	10/6/2011
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1 UJ
Chloroform	µg/L	0.274 J	0.372 J	0.424	0.518	0.348	0.288 J
cis-1,2-Dichloroethene	µg/L	0.273 J	0.262 J	0.295 J	<1	0.42 J	0.356 J
Tetrachloroethene	µg/L	0.776 J	0.747 J	0.838 J	0.749 J	1.33	1.08
Trichloroethene	µg/L	3.21	3.03 J	3.85	2.33	3.6	2.35
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-1A

	Sample Name	DR1-1A-LB-16	DR1-1A-LA-18	DR1-1A-LB-20	DR1-1A-LA-22	DR1-1A-LB-24
	Sample Date	10/19/2012	10/12/2013	10/18/2014	10/7/2015	10/13/2016
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.427	0.51	0.512	0.389	0.344
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.612 J	0.389 J	0.418 J	0.487 J	0.308 J
Trichloroethene	µg/L	2.3	0.973 J	1.06	1.34	0.264 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-2

	Sample Name	DR1-2	DR1-2	DR1-2	DR1-2	DR1-2-LB-1	DR1-2-LA-5	DR1-2-LB-8
	Sample Date	5/17/2004	11/11/2004	2/16/2005	5/19/2005	10/24/2006	10/1/2007	10/7/2008
Analyte	Unit							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1 J
Chloroform	µg/L	<1	<1	<1	<1	0.163	<0.3	0.131 J
cis-1,2-Dichloroethene	µg/L	0.68 J	0.77 J	0.67 J	0.75 J	0.602	0.48 J	0.595 J
Tetrachloroethene	µg/L	1.8	2.5 J	2.3	2.1	1.82	1.52	1.5 J
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	1.83 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1 J

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-2

	Sample Name	DR1-2-LA-10	DR1-2-LB-12	DR1-2-LA-14	DR1-2-LB-16	DR1-2-LA-18	DR1-2-LB-20
	Sample Date	10/6/2009	10/5/2010	10/5/2011	10/19/2012	10/12/2013	10/18/2014
Analyte	Unit						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.17 J	0.179 J	<0.3	0.129 J	0.142 J	0.163 J
cis-1,2-Dichloroethene	µg/L	0.607 J	0.805 J	0.791 J	0.856 J	0.369 J	0.403 J
Tetrachloroethene	µg/L	1.47	2.1	1.92	2.2	1.3	0.947 J
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-2

	Sample Name	DR1-2-LA-22	DR1-2-LB-24
	Sample Date	10/7/2015	10/14/2016
Analyte	Unit		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.15 J	0.148 J
cis-1,2-Dichloroethene	µg/L	0.279 J	0.275 J
Tetrachloroethene	µg/L	0.951 J	1.05
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-3

	Sample Name	DR1-3	DR1-3	DR1-3	DR1-3	DR1-3-BL	DR1-3-EBT-1	DR1-3-EBT-2
	Sample Date	5/10/2004	11/11/2004	2/15/2005	5/17/2005	8/25/2006	12/5/2006	3/7/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1.2	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1.2	<1	<1	<0.3	<1	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1.2	<1	0.22 J	<1	<1	27.6
Tetrachloroethene	µg/L	34	43 J	46	47	45.7	54.7	8.31
Trichloroethene	µg/L	2.6	3.2	3.7	4.1	4.18	5.13	2.74
Vinyl chloride	µg/L	<1	<1.2	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-3

	Sample Name	DR1-3-EBT-3	DR1-3-EBT-4	DR1-3-EBT-5	DR1-3-EBT-6	DR1-3-EBT-7	DR1-3-EBT-8
	Sample Date	6/1/2007	9/19/2007	12/13/2007	3/14/2008	6/13/2008	12/11/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	32.9	30.7	22.6	17	19.5	16.5
Tetrachloroethene	µg/L	2.18	0.45 J	0.904 J	2.12	2.95	2.59
Trichloroethene	µg/L	0.572 J	<1	0.303 J	1.28	2.02	1.32
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

DR1-3

	Sample Name	DR1-3-EBT-9	DR1-3-LA-10	DR1-3-LS-11	DR1-3-LB-12	DR1-3-LS-13	DR1-3-LA-14
	Sample Date	3/12/2009	10/6/2009	4/5/2010	10/6/2010	4/1/2011	10/4/2011
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	13.3	1.5	0.29 J	<1	<1	<1
Tetrachloroethene	µg/L	2.43	10	13.9	9.13	13.2	13.9
Trichloroethene	µg/L	1.26	2.15	2.47	1.75	2.1	1.81
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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DR1-3

	Sample Name	DR1-3-LS-15	DR1-3-LB-16	DR1-3-LS-17	DR1-3-LA-18	DR1-3-LS-19	DR1-3-LB-20
	Sample Date	4/23/2012	10/19/2012	4/11/2013	10/12/2013	4/26/2014	10/19/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	3.64	7.5	11	9.96
Tetrachloroethene	µg/L	11.2	16.2	3.18	1.52	0.801 J	0.716 J
Trichloroethene	µg/L	1.48	1.93	1.42	2.17	2.23	1.76
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
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DR1-3

	Sample Name	DR1-3-LS-21	DR1-3-LA-22	DR1-3-LA-23	DR1-3-LB-24	DR1-3	DR1-3
	Sample Date	4/8/2015	10/7/2015	4/23/2016	10/16/2016	4/21/2017	10/6/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	13.5	12	11.4	9.49	6.46	4.7
Tetrachloroethene	µg/L	0.348 J	0.518 J	1.44	3.27	7.12	8.06
Trichloroethene	µg/L	1.7	2.66	5.45	9.91	9.91	9.81
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-4

Analyte	Sample Name / Sample Date	Unit	DR1-4 5/21/2004	DR1-4 11/11/2004	DR1-4 2/15/2005	DR1-4 5/17/2005	DR1-4 10/25/2006	DR1-4 4/13/2007	DR1-4 10/1/2007	DR1-4 4/7/2008
Carbon tetrachloride		µg/L	<1 J	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	8.09	5.29	0.582 J
Tetrachloroethene		µg/L	4.8	8.3 J	9.3	8.9	12.4	<1	<1	2.74
Trichloroethene		µg/L	0.72 J	1.1	1.1	1	1.33	<1	<1	0.573 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-4

Analyte	Sample Name / Sample Date	Unit	DR1-4 10/7/2008	DR1-4 4/8/2009	DR1-4 10/6/2009	DR1-4 10/6/2010	DR1-4-LA-14 10/4/2011	DR1-4-LB-16 10/19/2012	DR1-4-LA-18 10/12/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.987 J	0.755 J	<1	<1	<1	<1	0.523 J
Tetrachloroethene		µg/L	1.22	0.947 J	0.844 J	0.435 J	0.831 J	1.25	<1
Trichloroethene		µg/L	1.69	0.393 J	0.64 J	0.543 J	0.252 J	<1	0.41 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-4

	Sample Name	DR1-4-LB-20	DR1-4-LA-22	DR1-4-LB-24	DR1-4
	Sample Date	10/19/2014	10/7/2015	10/16/2016	10/6/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	0.256 J
cis-1,2-Dichloroethene	µg/L	0.518 J	<1	<1	<1
Tetrachloroethene	µg/L	<1	1.25	3.3	8.53
Trichloroethene	µg/L	0.795 J	0.571 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-5

Analyte	Sample Name / Sample Date	Unit	DR1-5 5/22/2004	DR1-5 11/12/2004	DR1-5 2/18/2005	DR1-5 5/19/2005	DR1-5-LB-1 10/24/2006	DR1-5-LS-3 4/16/2007	DR1-5-LA-5 10/1/2007
Carbon tetrachloride		µg/L	<1 J	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	0.129	<0.3	0.148 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	4.3	11	17	15	57	69.2	69.9
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

DR1-5

Analyte	Sample Name / Sample Date	Unit	DR1-5 4/7/2008	DR1-5 10/9/2008	DR1-5 4/8/2009	DR1-5 10/5/2009	DR1-5 3/30/2010	DR1-5 10/5/2010	DR1-5 3/31/2011	DR1-5 10/4/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.165 J	0.181 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	0.295 J	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	95.8	69.2 J	53.2	37.3	22.2	18.3	18.2	29
Trichloroethene		µg/L	<1	4.28 J	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-5

Analyte	Sample Name / Sample Date	Unit	DR1-5 4/22/2012	DR1-5 10/20/2012	DR1-5 2/6/2013	DR1-5 5/12/2013	DR1-5 8/20/2013	DR1-5 11/9/2013	DR1-5 2/7/2014	DR1-5 5/8/2014
Carbon tetrachloride		µg/L	<1	<1	<10	<5	<1	<2	<2	<10
Chloroform		µg/L	<0.3	<0.3	<3	<1.5	<0.3	<0.6	<0.6	<3
cis-1,2-Dichloroethene		µg/L	<1	<1	<10	5.39	12.9	11.6	16.6	12.1
Tetrachloroethene		µg/L	29.3	38.6	36.8	35.5	15	10.2	3.09	3.14
Trichloroethene		µg/L	<1	<1	<10	<5	0.996 J	0.713	<2	<10
Vinyl chloride		µg/L	<1	<1	<10	<5	<1	<2	<2	<10

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

DR1-5

Analyte	Sample Name / Sample Date / Unit	DR1-5 8/6/2014	DR1-5 11/6/2014	DR1-5 4/24/2016	DR1-5 10/13/2016	DR1-5 4/20/2017	DR1-5 10/6/2017
Carbon tetrachloride	µg/L	<5	<10	<10	<1	<1	<1
Chloroform	µg/L	<1.5	<3	<3	<0.3	<0.3 U	<0.3 U
cis-1,2-Dichloroethene	µg/L	13	10.7	9.08 J	10.1	11.8	13.5
Tetrachloroethene	µg/L	1.26 J	<10	6.37 J	2.43	4.06	5.12
Trichloroethene	µg/L	<5	<10	<10	0.574 J	0.589 J	0.784 J
Vinyl chloride	µg/L	<5	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

DR1-5A

Analyte	Sample Name / Sample Date	Unit	DR1-5A 5/27/2004	DR1-5A 11/12/2004	DR1-5A 2/21/2005	DR1-5A 5/19/2005	DR1-5A 10/23/2006	DR1-5A 4/13/2007	DR1-5A 10/1/2007	DR1-5A 4/8/2008
Carbon tetrachloride		µg/L	<1.7	<5	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.71 J	<5	0.4 B	0.29 B	0.306	0.274 J	0.252 J	0.187 J
cis-1,2-Dichloroethene		µg/L	1.7	5.2	4.6	4.1	3.46	3.19	3.16	1.82
Tetrachloroethene		µg/L	24	47	55	47	50.9	49.6	46.8	34.9
Trichloroethene		µg/L	47	110	110	100	98.1	84	78.6	58.7
Vinyl chloride		µg/L	<1.7	<5	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-5A

Analyte	Sample Name / Sample Date	Unit	DR1-5A 10/9/2008	DR1-5A 4/8/2009	DR1-5A 10/5/2009	DR1-5A 3/30/2010	DR1-5A 10/5/2010	DR1-5A 3/31/2011	DR1-5A 10/4/2011	DR1-5A 4/22/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.343 J	0.217 J	0.204 J	0.205 J	0.197 J	0.197 J	0.191 J	<0.3
cis-1,2-Dichloroethene		µg/L	4.75 J	3.19	3.39	3.58	3.88	2.9	2.76	2.26
Tetrachloroethene		µg/L	59.7 J	56.3	54.9	59.4	70.4	50.4	49.7	46.7
Trichloroethene		µg/L	114 J	95.7	92.8	96.6	110	86.3	77.6	74.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

DR1-5A

Analyte	Sample Name / Sample Date	Unit	DR1-5A 10/20/2012	DR1-5A 2/6/2013	DR1-5A 5/11/2013	DR1-5A 8/20/2013	DR1-5A 11/9/2013	DR1-5A 2/7/2014	DR1-5A 5/8/2014	DR1-5A 8/6/2014
Carbon tetrachloride		µg/L	<1	<10	<10	<1	<1	<1	<1	<1 UJ
Chloroform		µg/L	0.167 J	<3	<3	<0.3	<0.3	<0.3	<0.3	<0.3 UJ
cis-1,2-Dichloroethene		µg/L	2.41	<10	85.4	91.8	26.5	2.85	42.5	42.1 J
Tetrachloroethene		µg/L	49.7	43.8	<10	0.649 J	0.848	0.385 J	0.511 J	0.281 J
Trichloroethene		µg/L	80.5	62.1	4.27 J	1.01	0.501	<1	<1	<1 UJ
Vinyl chloride		µg/L	<1	<10	<10	0.479 J	<1	<1	<1	<1 UJ

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-5A

Analyte	Sample Name / Sample Date	Unit	DR1-5A 11/7/2014	DR1-5A 4/24/2016	DR1-5A 10/13/2016	DR1-5A 4/20/2017	DR1-5A 10/6/2017
Carbon tetrachloride		µg/L	<5	<5	<1	<1	<1
Chloroform		µg/L	<1.5	<1.5	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	37.2	43	49.2	53.6	48.7
Tetrachloroethene		µg/L	<5	7.1	<1	<1	<1
Trichloroethene		µg/L	1.34 J	30.2	<1	<1	<1
Vinyl chloride		µg/L	<5	<5	<1	0.253 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6

	Sample Name	DR1-6	DR1-6	DR1-6	DR1-6	DR1-6-LB-1	DR1-6-LS-3	DR1-6-LA-5
	Sample Date	6/26/2004	11/10/2004	2/17/2005	5/18/2005	10/24/2006	4/13/2007	10/1/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	3.3	6.2	4.1	3.8	1.59	1.91	1.42
Tetrachloroethene	µg/L	13	21	20	26	184	173	191 J
Trichloroethene	µg/L	1.6	2.4	2.2	2.1	1.85	1.83	1.58
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6

Analyte	Sample Name / Sample Date	Unit	DR1-6 4/8/2008	DR1-6 10/7/2008	DR1-6 4/8/2009	DR1-6 10/6/2009	DR1-6 4/1/2010	DR1-6 10/5/2010	DR1-6 4/1/2011	DR1-6 10/4/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	1.09	1.38	1.31	1.49	1.37	1.69	1.56	1.31
Tetrachloroethene		µg/L	195	122	197	183	225	239	193	168
Trichloroethene		µg/L	1.27	4.61	1.44	1.59	1.56	1.89	1.7	1.28
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6

Analyte	Sample Name / Sample Date	Unit	DR1-6 4/22/2012	DR1-6 10/20/2012	DR1-6 2/6/2013	DR1-6 5/12/2013	DR1-6 8/16/2013	DR1-6 11/9/2013	DR1-6 2/9/2014	DR1-6 5/8/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<5	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<1.5	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	1.02	0.865 J	0.553	20	13.6	8.42	19.8	30.3
Tetrachloroethene		µg/L	161	186	263	126	119	148	121	83
Trichloroethene		µg/L	1.16	1.49	1.22	1.35	2.89 J	1.69	2.22	1.1
Vinyl chloride		µg/L	<1	<1	<1	<1	<5	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6

	Sample Name	DR1-6	DR1-6	DR1-6	DR1-6	DR1-6	DR1-6
	Sample Date	8/7/2014	11/7/2014	4/24/2016	10/14/2016	4/20/2017	10/6/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<5	<10	<1	<1	<1	<1
Chloroform	µg/L	<1.5	<3	<0.3	0.145 J	0.147 J	0.158 J
cis-1,2-Dichloroethene	µg/L	91.8	59.4	1.71	0.281 J	<1	<1
Tetrachloroethene	µg/L	48.4	99	57.9	16.1	10.3	8.58
Trichloroethene	µg/L	1.26 J	<10	0.366 J	0.292 J	<1	<1
Vinyl chloride	µg/L	<5	<10	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6A

Analyte	Sample Name / Sample Date	Unit	DR1-6A 6/26/2004	DR1-6A 11/10/2004	DR1-6A 2/17/2005	DR1-6A 5/18/2005	DR1-6A-LB-1 10/24/2006	DR1-6A-LS-3 4/13/2007	DR1-6A-LA-5 10/1/2007
Carbon tetrachloride		µg/L	<1	<3.3	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<3.3	0.17 J	<1	0.18	0.236 J	0.183 J
cis-1,2-Dichloroethene		µg/L	--	3J	4.1	3.5	4.81	5.98	4.24
Tetrachloroethene		µg/L	--	17	28	21	28.4	34.4	30.2
Trichloroethene		µg/L	9.1	88	140	97	118	139	107
Vinyl chloride		µg/L	--	<3.3	<1	<2	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6A

Analyte	Sample Name / Sample Date	Unit	DR1-6A 4/8/2008	DR1-6A 10/7/2008	DR1-6A 4/8/2009	DR1-6A 10/6/2009	DR1-6A 4/1/2010	DR1-6A 10/5/2010	DR1-6A 4/1/2011	DR1-6A 10/4/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.215 J	0.238 J	0.214 J	0.245 J	0.193 J	0.271 J	0.32	0.248 J
cis-1,2-Dichloroethene		µg/L	2.99	3.81	4.33	4.89	4.05	5.08	7.83	9.24
Tetrachloroethene		µg/L	30.8	39.6	32.5	43	43.5	60.1	57.8	60.3
Trichloroethene		µg/L	110	142	125	163	122	149	166	166
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6A

Analyte	Sample Name / Sample Date	Unit	DR1-6A 4/22/2012	DR1-6A 10/20/2012	DR1-6A 2/6/2013	DR1-6A 5/12/2013	DR1-6A 8/16/2013	DR1-6A 11/9/2013	DR1-6A 2/9/2014	DR1-6A 5/8/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<10	<5	<1	<1	<5
Chloroform		µg/L	0.195 J	0.238 J	<0.3	<3	<1.5	<0.3	<0.3	<1.5
cis-1,2-Dichloroethene		µg/L	7.71	8.58	34.1	110	86.8	132	90.2	61.3
Tetrachloroethene		µg/L	51.3	53.8	40.8	<10	9.75	1.49	0.307 J	<5
Trichloroethene		µg/L	154	165	98	<10	26.4	2.12	<1	<5
Vinyl chloride		µg/L	<1	<1	<1	<10	<5	0.398	0.312 J	<5

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-6A

Analyte	Sample Name / Sample Date	Unit	DR1-6A 8/7/2014	DR1-6A 11/7/2014	DR1-6A 4/24/2016	DR1-6A 10/14/2016	DR1-6A 4/20/2017	DR1-6A 10/11/2017
Carbon tetrachloride		µg/L	<10	<20	<10	<1	<1	<1
Chloroform		µg/L	<3	<6	<3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	22.5	13.9 J	27.2	29.5	28	33.8
Tetrachloroethene		µg/L	<10	<20	<10	0.291 J	<1	2.45
Trichloroethene		µg/L	<10	<20	<10	0.627 J	0.496 J	10.5
Vinyl chloride		µg/L	<10	<20	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-7

	Sample Name	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7
	Sample Date	6/24/2004	11/12/2004	2/21/2005	5/17/2005	10/25/2006	10/1/2007	10/7/2008	10/6/2009
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.18 J	0.19 J	<1	<1	<0.3	<0.3	0.163 J	<0.3
cis-1,2-Dichloroethene	µg/L	0.46 J	0.58 J	0.45 J	0.48 J	0.374 J	0.344 J	0.787 J	0.449 J
Tetrachloroethene	µg/L	30	26	27	27	5.68	5.15	4.35	4.75
Trichloroethene	µg/L	1.6	1.8	2.2	2	0.76 J	0.812 J	1.6	0.622 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-7

	Sample Name	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7	DR1-7
	Sample Date	10/5/2010	10/4/2011	10/19/2012	10/12/2013	10/19/2014	10/7/2015	10/14/2016
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.169 J	0.174 J	<0.3	0.156 J	0.128 J	0.148 J	0.142 J
cis-1,2-Dichloroethene	µg/L	0.525 J	0.532 J	0.401 J	0.286 J	<1	0.353 J	0.484 J
Tetrachloroethene	µg/L	3.81	2.62	1.6	1.19	1.23	1.57	2.08
Trichloroethene	µg/L	0.549 J	0.441 J	<1	<1	0.267 J	0.293 J	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-8

Analyte	Sample Name / Sample Date	Unit	DR1-8 6/24/2004	DR1-8 11/11/2004	DR1-8 2/18/2005	DR1-8 5/19/2005	DR1-8 10/18/2006	DR1-8 10/1/2007	DR1-8 10/7/2008	DR1-8 10/5/2009
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1 J	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	0.341 J	1.03	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR1-8

	Sample Name	DR1-8	DR1-8	DR1-8	DR1-8	DR1-8	DR1-8	DR1-8
	Sample Date	10/6/2010	10/6/2011	10/19/2012	10/12/2013	10/18/2014	10/7/2015	10/13/2016
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-1

Analyte	Sample Name / Sample Date / Unit	DR2-1 6/23/2004	DR2-1 11/14/2004	DR2-1 2/22/2005	DR2-1 5/19/2005	DR2-1-BL 8/31/2006	DR2-1-EBT-1 12/6/2006	DR2-1-EBT-2 3/8/2007
Carbon tetrachloride	µg/L	25	35	24	32	32.3	29 J	22.6
Chloroform	µg/L	16	16	12	13	9.91	13.3	10
cis-1,2-Dichloroethene	µg/L	16	24	21	22	17	34.7	19.3
Tetrachloroethene	µg/L	180	280	190	250	176	191	194
Trichloroethene	µg/L	7.3	9.8	7.8	9.1	8.51	8.49	7.91
Vinyl chloride	µg/L	<5.3	<8.3	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-1

	Sample Name	DR2-1-EBT-3	DR2-1-EBT-4	DR2-1-EBT-5	DR2-1	DR2-1	DR2-1	DR2-1
	Sample Date	5/29/2007	9/12/2007	12/10/2007	3/10/2008	6/9/2008	12/12/2008	3/12/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	25.7 J	13.4	15.5	1.26	2.8	20.4	22.7
Chloroform	µg/L	8.76	8.58	11.3	4.19	5.75	9.18	7.53
cis-1,2-Dichloroethene	µg/L	15.2	50.4	7.71	86.4	38.1	9.14	7.59
Tetrachloroethene	µg/L	160	138	192	33.7	50.7	137	150
Trichloroethene	µg/L	7.21	4.54	5.72	12.7	5.36	5.46	5.09
Vinyl chloride	µg/L	<1	1.25	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-1

	Sample Name	DR2-1	DR2-1	DR2-1	DR2-1	DR2-1	DR2-1	DR2-1	DR2-1
	Sample Date	10/10/2009	3/30/2010	10/14/2010	4/2/2011	10/2/2011	4/23/2012	10/21/2012	4/10/2013
Analyte	**Unit**								
Carbon tetrachloride	µg/L	7.39	10.1	13.2	19.2	23.3	25.7 J	26.6	21.5
Chloroform	µg/L	3.76	5.25	6.9	6.75	7.87	6.09	6.38	9.08
cis-1,2-Dichloroethene	µg/L	4.89	9.88	14.3	15.3	17.8	13.5	13.9	1.85
Tetrachloroethene	µg/L	66.2	98.5	106	152	151	119	180	176
Trichloroethene	µg/L	2.61	4.21	5.23	6.02	7.07	6.95	6.85	2.99
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-1

Analyte	Sample Name / Sample Date	Unit	DR2-1 10/12/2013	DR2-1 4/24/2014	DR2-1 10/20/2014	DR2-1 4/10/2015	DR2-1 10/6/2015	DR2-1 4/21/2016	DR2-1 10/15/2016	DR2-1 4/19/2017
Carbon tetrachloride		µg/L	37.2	32.7	27.9	39.7	34.1	31.2	32	25.9
Chloroform		µg/L	8.82	11.5	11.5	6.76	6.21	5.35	4.97	3.59
cis-1,2-Dichloroethene		µg/L	10.2	7.1	7.1	12.8	10.5	10.8	10.2	8.76
Tetrachloroethene		µg/L	235	179	221	230	225	201	208	155
Trichloroethene		µg/L	5.45	5.06	5.4	6.71	5.82	5.68	5.92	5.32
Vinyl chloride		µg/L	<1	0.64 J	0.309 J	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-1

	Sample Name	DR2-1
	Sample Date	10/6/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	24.5
Chloroform	µg/L	3.51
cis-1,2-Dichloroethene	µg/L	6.84
Tetrachloroethene	µg/L	150
Trichloroethene	µg/L	5.46
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-2

Analyte	Sample Name / Sample Date	Unit	DR2-2 6/9/2004	DR2-2 11/13/2004	DR2-2 2/23/2005	DR2-2 5/19/2005	DR2-2-LB-1 10/3/2006	DR2-2-LS-3 4/13/2007	DR2-2-LA-5 10/1/2007	DR2-2 4/8/2008
Carbon tetrachloride		µg/L	1.8	5	4.2	4.7	4.19	6.78	10.8	13.4
Chloroform		µg/L	0.64 J	1.5	1.5	1.2 B	1.05	1.76	2.86	3.65
cis-1,2-Dichloroethene		µg/L	<1	2.7	2.5	2.4	1.9	3.47	5.7	7.04
Tetrachloroethene		µg/L	10	36	16	40	23.2	49.2	76.7	124
Trichloroethene		µg/L	2.6	4.1	2.8	3.8	3.13	3.49	4.04	4.25
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-2

Analyte	Sample Name / Sample Date	Unit	DR2-2 10/9/2008	DR2-2 4/10/2009	DR2-2 10/11/2009	DR2-2 4/7/2010	DR2-2 10/12/2010	DR2-2 4/3/2011	DR2-2 10/2/2011	DR2-2 4/20/2012
Carbon tetrachloride		µg/L	13.8	16.2	7.75	7.46	4.87	4.56	4.37	4.96
Chloroform		µg/L	3.87	4.23	1.91	1.44	0.63	0.563	0.714	0.686
cis-1,2-Dichloroethene		µg/L	6.86	7.39	4.79	3.3	1.06	1.14	1.31	1.25
Tetrachloroethene		µg/L	120	159	97.3	69.2	25.6	38.9	35.9 J	34.5
Trichloroethene		µg/L	3.96	3.82	4.02	3.63	2.45	3.27	2.92	2.89
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-2

Analyte	Sample Name / Sample Date	Unit	DR2-2 10/22/2012	DR2-2 2/9/2013	DR2-2 5/10/2013	DR2-2 8/14/2013	DR2-2 11/6/2013	DR2-2 2/10/2014	DR2-2 5/13/2014	DR2-2 8/12/2014
Carbon tetrachloride		µg/L	5.28	2.34	<1	<5	<10	<10	<10 UJ	<20
Chloroform		µg/L	0.944	1.95	<0.3	<1.5	<3	<3	3750 J	7.27
cis-1,2-Dichloroethene		µg/L	1.66	13.9	44.9	14.5	<10	<10	3.69 J	8.01 J
Tetrachloroethene		µg/L	41.6	33.3	0.801 J	2.61 J	<10	<10	<10 UJ	<20
Trichloroethene		µg/L	2.92	2.15	<1	<5	<10	<10	<10 UJ	<20
Vinyl chloride		µg/L	<1	<1	0.38 J	<5	<10	<10	<10 UJ	<20

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-2

Analyte	Sample Name / Sample Date / Unit	DR2-2 11/10/2014	DR2-2 4/22/2016	DR2-2 10/13/2016	DR2-2 4/19/2017	DR2-2 10/7/2017
Carbon tetrachloride	µg/L	<10	<1	<1	<1	<1
Chloroform	µg/L	<3	0.271 J	0.195 J	0.242 J	0.242 J
cis-1,2-Dichloroethene	µg/L	9.73 J	9.74	5.54	4.08	3.51
Tetrachloroethene	µg/L	<10	3.15	4.34	4.55	4.26
Trichloroethene	µg/L	<10	0.762 J	0.772 J	0.663 J	0.771 J
Vinyl chloride	µg/L	<10	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-3

	Sample Name	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3-LB-1	DR2-3-LS-3	DR2-3-LA-5
	Sample Date	5/23/2004	11/14/2004	2/24/2005	5/20/2005	10/3/2006	4/15/2007	10/1/2007
Analyte	Unit							
Carbon tetrachloride	µg/L	4.1 J	5.6	6.1	4.7	4.2	4.29	4.12
Chloroform	µg/L	1.8	1.9	1.8 B	1.2 B	0.939	0.913	0.76
cis-1,2-Dichloroethene	µg/L	1.4 J	1.8	1.8	1.2	0.601 J	0.673 J	0.549 J
Tetrachloroethene	µg/L	47	43	33	33	22.8	23.9	20.6
Trichloroethene	µg/L	2	2.7	2.7	2.6	2.47	2.28	2.15
Vinyl chloride	µg/L	<1.7	<1.4	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-3

	Sample Name	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3
	Sample Date	4/8/2008	10/10/2008	4/8/2009	10/10/2009	4/7/2010	10/6/2010	4/1/2011	10/2/2011
Analyte	Unit								
Carbon tetrachloride	µg/L	4.72	4.97 J	6.66	4.62	5.88	5.81	7.38	6.7
Chloroform	µg/L	0.933	0.978 J	1.19	0.861	0.925	0.828	1.3	1.04
cis-1,2-Dichloroethene	µg/L	0.683 J	0.594 J	1.41	0.816 J	0.888 J	0.674 J	1.7	1.19
Tetrachloroethene	µg/L	28.3	22.1 J	38.9	33.3	34.2	31.6	50.3	33.5
Trichloroethene	µg/L	2.15	2.03 J	2.47	2.09	2.03	2.07	2.41	2.38
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-3

	Sample Name	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3	DR2-3
	Sample Date	4/23/2012	10/21/2012	4/10/2013	10/12/2013	4/24/2014	10/20/2014	4/10/2015	10/6/2015
Analyte	Unit								
Carbon tetrachloride	µg/L	4.23 J	4.24	2.88	2.87	2.89	2.17	2.78	2.16
Chloroform	µg/L	0.677	0.727	0.585	0.567	0.524	0.496	0.515	0.475
cis-1,2-Dichloroethene	µg/L	0.55 J	0.617 J	0.36 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	21.7	24.9	17.4	14	12	11	11.4	9.32
Trichloroethene	µg/L	1.87	1.85	1.66	1.29	1.41	1.19	1.31	1.17
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-3

	Sample Name	DR2-3	DR2-3	DR2-3	DR2-3
	Sample Date	4/21/2016	10/17/2016	4/19/2017	10/10/2017
Analyte	Unit				
Carbon tetrachloride	µg/L	2.17	2.37	2.22	1.95
Chloroform	µg/L	0.452	0.45	0.405	0.41
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	8.88	8.17	9	7.77
Trichloroethene	µg/L	0.964 J	0.888 J	1.01	0.922 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-4

	Sample Name	DR2-4	DR2-4	DR2-4	DR2-4	DR2-4	DR2-4	DR2-4	DR2-4
	Sample Date	5/24/2004	11/14/2004	2/22/2005	5/20/2005	10/5/2006	10/1/2007	10/8/2008	10/11/2009
Analyte	**Unit**								
Carbon tetrachloride	µg/L	2.2	3.8	3.7	3.6	4.06	3.96	3.55	3.34
Chloroform	µg/L	1	0.94 J	0.84 J	0.77 B	1.06	0.973	0.715	0.575
cis-1,2-Dichloroethene	µg/L	<1	0.27 J	0.22 J	0.22 J	<1	<1	0.304 J	0.414 J
Tetrachloroethene	µg/L	12	14	12	10	7.15	9.28	14.5	18
Trichloroethene	µg/L	1.9	2.2	1.9	1.7	1.61	1.54	1.74	1.7
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-4

Analyte	Sample Name / Sample Date	Unit	DR2-4 10/13/2010	DR2-4 10/2/2011	DR2-4 10/21/2012	DR2-4 10/12/2013	DR2-4 10/20/2014	DR2-4 10/7/2015	DR2-4 10/13/2016	DR2-4 10/7/2017
Carbon tetrachloride		µg/L	4.56	4.45	3.47	3.01	2.36	2.42	1.92	1.91
Chloroform		µg/L	0.716	0.835	0.683	0.645	0.435	0.39	0.367	0.296 J
cis-1,2-Dichloroethene		µg/L	0.373 J	0.412 J	0.375 J	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	19.8	13.7	11	9.58	9.26	9.1	5.96	5.72
Trichloroethene		µg/L	1.7	1.58	1.12	0.898 J	0.783 J	0.67 J	0.436 J	0.517 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-5

	Sample Name	DR2-5	DR2-5	DR2-5	DR2-5	DR2-5-BL	DR2-5-EBT-1	DR2-5-EBT-2
	Sample Date	6/23/2004	11/14/2004	2/23/2005	5/23/2005	8/31/2006	12/7/2006	3/13/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	240	200	200	260	142	100	130
Chloroform	µg/L	82	68	64	79	46.7	35.8	43
cis-1,2-Dichloroethene	µg/L	44	39	41	35 J	31	27.7	32.9
Tetrachloroethene	µg/L	88	71	75	88	54.2	45.3	48.4
Trichloroethene	µg/L	29	25	32	21 J	18.3	15.4	18.5
Vinyl chloride	µg/L	<6.7	<5.7	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-5

	Sample Name	DR2-5-EBT-3	DR2-5-EBT-4	DR2-5-EBT-5	DR2-5	DR2-5	DR2-5	DR2-5
	Sample Date	5/29/2007	9/13/2007	12/10/2007	3/12/2008	6/18/2008	12/17/2008	3/13/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	132 J	123	138	114	103	112 J	206
Chloroform	µg/L	37.6	42.2	43.6	40.9	37.2	37.9	68.8
cis-1,2-Dichloroethene	µg/L	25.9	30.5	33.7	32	29.2	34.5	62
Tetrachloroethene	µg/L	41.1	46.8	57.3	49.5	41.7	48.9	114
Trichloroethene	µg/L	14.4	16	18.9	17.5	13.7	17	35
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-5

Analyte	Sample Name / Sample Date	Unit	DR2-5 10/10/2009	DR2-5 4/7/2010	DR2-5 10/13/2010	DR2-5 4/2/2011	DR2-5 10/2/2011	DR2-5 4/20/2012	DR2-5 10/19/2012	DR2-5 2/9/2013
Carbon tetrachloride		µg/L	94.4	217	25	175 J	167	168	196	69.6
Chloroform		µg/L	52	69.3	21.5	67	66.2	52	56.1	45.7
cis-1,2-Dichloroethene		µg/L	47.2	71.7	105	87.1	87.4	65.1	72.8	113
Tetrachloroethene		µg/L	47.7	98.7	21.1	68.3	86.5	103	99.9	33.7
Trichloroethene		µg/L	20.7	33.2	12.1	32.3	37.8	38	38.2	17.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-5

Analyte	Sample Name / Sample Date / Unit	DR2-5 5/8/2013	DR2-5 8/14/2013	DR2-5 11/5/2013	DR2-5 2/10/2014	DR2-5 5/12/2014	DR2-5 8/11/2014	DR2-5 11/11/2014	DR2-5 4/21/2016
Carbon tetrachloride	µg/L	78.4	5.2	<5	<10	<10 UJ	<20	<20 UJ	<100
Chloroform	µg/L	40	48.3	8.52	<3	<3 UJ	<6	<6 UJ	<30
cis-1,2-Dichloroethene	µg/L	118	120	53.4	14.2	8.17 J	5.8 J	7.21 J	47.7 J
Tetrachloroethene	µg/L	29.9	44.9	4.73	<10	5.96 J	<20	<20 UJ	<100
Trichloroethene	µg/L	14	21.8	1.47	<10	<10 UJ	<20	<20 UJ	<100
Vinyl chloride	µg/L	<1	<1	<5	<10	<10 UJ	<20	<20 UJ	<100

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-5

	Sample Name	DR2-5	DR2-5	DR2-5
	Sample Date	10/17/2016	4/22/2017	10/10/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<5	<50	<50
Chloroform	µg/L	<1.5	<15	<15
cis-1,2-Dichloroethene	µg/L	69.2	21.8 J	28 J
Tetrachloroethene	µg/L	7.97	<50	<50
Trichloroethene	µg/L	2.99 J	<50	<50
Vinyl chloride	µg/L	<5	<50	<50

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-6

Analyte	Sample Name / Sample Date	Unit	DR2-6 6/22/2004	DR2-6 11/13/2004	DR2-6 2/24/2005	DR2-6 5/23/2005	DR2-6-LB-1 10/17/2006	DR2-6-LS-3 4/15/2007	DR2-6-LA-5 10/1/2007
Carbon tetrachloride		µg/L	34	66	7.2	68	82.7	92	82.8
Chloroform		µg/L	16	25	1.5 B	29	27.3	33.1	43.1
cis-1,2-Dichloroethene		µg/L	7.3	13	0.69 J	16	9.97	14.1	31.6
Tetrachloroethene		µg/L	44	75	36	78	77.2	90.8	115
Trichloroethene		µg/L	11	13	2.2	16	15.5	16.4	19.7
Vinyl chloride		µg/L	<1.7	<2	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-6

Analyte	Sample Name / Sample Date	Unit	DR2-6 4/8/2008	DR2-6 10/8/2008	DR2-6 4/7/2009	DR2-6 10/8/2009	DR2-6 3/31/2010	DR2-6 10/7/2010	DR2-6 4/1/2011	DR2-6 10/3/2011
Carbon tetrachloride		µg/L	29.2	39.6	12.9	26.4	8.59	74.4	14.9	27.1
Chloroform		µg/L	16.3	18.4	7.83	10.3	3.31	16.1	5.76	7.82
cis-1,2-Dichloroethene		µg/L	36	33	29	23.8	24.9	18.5	43.7	50.5
Tetrachloroethene		µg/L	48.3	70.5	24.5	44.5	20.9	52.9	22.3	32.7
Trichloroethene		µg/L	7.55	12.4	5.33	8.79	3.81	10.1	4.09	11.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	0.302 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-6

Analyte	Sample Name / Sample Date	Unit	DR2-6 4/23/2012	DR2-6 10/21/2012	DR2-6 4/10/2013	DR2-6 10/12/2013	DR2-6 4/24/2014	DR2-6 10/20/2014	DR2-6 4/11/2015	DR2-6 10/7/2015
Carbon tetrachloride		µg/L	27.4 J	46.5 J	34.3	<1	<1	<1	0.443 J	<1
Chloroform		µg/L	11	10.6	9.44	7.85	1.76	<0.3	0.915	<0.3
cis-1,2-Dichloroethene		µg/L	22	29.6	12.4	24	6.42	48.8	17	67.3
Tetrachloroethene		µg/L	25.2	50.2 J	43.8	10.3	3.95	<1	2.08	<1
Trichloroethene		µg/L	8.5	11.6	7.78	3.22	0.927 J	<1	1.69	<1
Vinyl chloride		µg/L	0.394 J	0.76 J	1	7.52	2.43	16.8	5.14	13.1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

DR2-6

Analyte	Sample Name / Sample Date / Unit	DR2-6 4/22/2016	DR2-6 10/15/2016	DR2-6 4/19/2017	DR2-6 10/8/2017
Carbon tetrachloride	µg/L	0.355 J	<1	<1	<1
Chloroform	µg/L	1.44	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	20.6	50.4	31.2	48.9
Tetrachloroethene	µg/L	4.44	1.28	8.38	19.6
Trichloroethene	µg/L	2	0.793 J	3.55	6.59
Vinyl chloride	µg/L	4.4	22.2	16.5	21.9

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-16

Analyte	Sample Name / Sample Date	Unit	MW162 6/19/1997	MW163 9/23/1997	MW164 3/24/1998	MW165 10/16/1998	MW16-63-68BL 3/20/2002	MW-16 5/18/2004	MW-16-LB-1 10/16/2006
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1 J	<1
Chloroform		µg/L	<10	<10	<10	<10	<1	<1	<0.3
cis-1,2-Dichloroethene		µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Trichloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-16

	Sample Name	MW-16	MW-16	MW-16	MW-16	MW-16
	Sample Date	10/10/2008	10/13/2010	10/21/2012	10/20/2014	10/15/2016
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-19

	Sample Name	MW192	MW193	MW194	MW195	MW19-90-92BL	MW-19	MW-19-LB-1
	Sample Date	6/18/1997	9/24/1997	3/26/1998	10/17/1998	3/18/2002	5/5/2004	10/17/2006
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform	µg/L	<10	<10	<10	<10	<1	<1	<0.3
cis-1,2-Dichloroethene	µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene	µg/L	<10	<10	<10	<10	<1	<1	<1
Trichloroethene	µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-19

Analyte	Sample Name / Sample Date	Unit	MW-19 10/9/2008	MW-19 10/11/2010	MW-19 10/19/2012	MW-19 10/19/2014	MW-19 10/13/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	0.334	0.452	0.429
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	0.651 J	0.883 J	0.705 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-21

	Sample Name	MW212	MW213	MW214	MW215	MW21NA	MW21-98-103BL	MW21-EBT-TS1-98.5-103.5
	Sample Date	6/20/1997	9/27/1997	3/27/1998	10/19/1998	3/24/2000	3/20/2002	7/8/2002
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	<10	0.4 J	<1	<1
Chloroform	µg/L	<10	<10	<10	<10	6	<1	<1
cis-1,2-Dichloroethene	µg/L	--	--	--	--	1	1.9	1.7
Tetrachloroethene	µg/L	63	62	76	120	78	90	110
Trichloroethene	µg/L	14	12	16	31	39	76	66
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-21

	Sample Name	MW21-EBT-TS2-98.5-103.5	MW21-EBT-TS3-98.5-103.5	MW21-EBT-TS4-98.5-103.5	MW21-EBT-TS5-98.5-103.5	MW21-EBT-TS6-98.5-103.5
	Sample Date	7/29/2002	9/3/2002	10/7/2002	11/11/2002	12/16/2002
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	0.132 J	0.18 J	<1	0.171 J
cis-1,2-Dichloroethene	µg/L	1.27	1.02	1.63	1.32	1.22
Tetrachloroethene	µg/L	125	178	152	188	195
Trichloroethene	µg/L	53.6	38.1	49.2	37.6	38.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-21

	Sample Name	MW21-EBT-TS7-98.5-103.5	MW21-EBT-TS8-98.5-103.5	MW21-EBT-TS9-98.5-103.5	MW21-EBT-TS10-98.5-103.5	MW21-EBT-TS11-98.5-103.5
	Sample Date	1/20/2003	2/24/2003	3/24/2003	4/21/2003	5/19/2003
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	0.14 J	<1	<1
cis-1,2-Dichloroethene	µg/L	0.985 J	1.68	1.28	1.12	1.25
Tetrachloroethene	µg/L	194	200	190	171	172
Trichloroethene	µg/L	32.4	50.7	38.6	33.8	38.6
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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MW-21

	Sample Name	MW21-EBT-TS12-98.5-103.5	MW21-EBT-TS13-98.5-103.5	MW-21	MW-21	MW-21	MW-21	MW-21-BL
	Sample Date	6/23/2003	7/21/2003	3/31/2004	11/12/2004	2/21/2005	5/19/2005	8/8/2006
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<2.5	<2.5	<1	<1	<1
Chloroform	µg/L	<1	<1	<2.5	<2.5	<1	<1	<0.3
cis-1,2-Dichloroethene	µg/L	1.36	1.25	1.5 J	1.6 J	1.1	0.99 J	1.33
Tetrachloroethene	µg/L	159	120	75	71	61	53	106
Trichloroethene	µg/L	34	33.6	20	17	14	13	16.3
Vinyl chloride	µg/L	<1	<1	<2.5	<2.5	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-21

	Sample Name	MW-21-EBT-1	MW-21-EBT-2	MW-21-EBT-3	MW-21-EBT-4	MW-21-EBT-5	MW-21	MW-21
	Sample Date	12/6/2006	3/7/2007	6/4/2007	9/18/2007	12/18/2007	3/14/2008	6/16/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.129 J	0.126 J	<0.3	<0.3	0.137 J	0.184 J	0.157 J
cis-1,2-Dichloroethene	µg/L	1.17	1.66	1.53	1.95	2.12	1.83	2.26
Tetrachloroethene	µg/L	129	130 J	134	132	178	173	154
Trichloroethene	µg/L	19.8	25	28.3	27.5	32.5	28.9	26.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-21

Analyte	Sample Name / Sample Date	Unit	MW-21 12/11/2008	MW-21 3/13/2009	MW-21 10/5/2009	MW-21 3/30/2010	MW-21 10/6/2010	MW-21 4/1/2011	MW-21 10/6/2011	MW-21 4/21/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.183 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	2.44	2.3	2.3	2.27	2.39	2.75	2.27	2.57
Tetrachloroethene		µg/L	192	179	187	146	83.5	74	80	88
Trichloroethene		µg/L	20.4	16.6	12.9	8.59	5.67	5.89	5.3	7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-21

Analyte	Sample Name / Sample Date	Unit	MW-21 10/20/2012	MW-21 2/7/2013	MW-21 5/10/2013	MW-21 8/17/2013	MW-21 11/8/2013	MW-21 2/8/2014	MW-21 5/7/2014	MW-21 8/5/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<10 UJ	<5 UJ
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<3 UJ	<1.5 UJ
cis-1,2-Dichloroethene		µg/L	3.64	4.35	25.3	25	12.8	8.43	42.9 J	14.2 J
Tetrachloroethene		µg/L	121	107	13.3	19.1	2.89	0.851 J	11.3 J	1.77 J
Trichloroethene		µg/L	9.17	6.83	4.43	2.96	1.2	0.506 J	<10 UJ	<5 UJ
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<10 UJ	<5 UJ

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-21

	Sample Name	MW-21	MW-21	MW-21	MW-21	MW-21
	Sample Date	11/6/2014	5/23/2016	10/13/2016	4/20/2017	10/6/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3 U	<0.3 U
cis-1,2-Dichloroethene	µg/L	2.41	131	135	111	136
Tetrachloroethene	µg/L	1.11	1.4	<1	<1	0.413 J
Trichloroethene	µg/L	<1	0.44 J	<1	<1	2.43
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-22

Analyte	Sample Name / Sample Date	Unit	MW222 6/19/1997	MW223 9/25/1997	MW224 3/28/1998	MW225 10/19/1998	MW22NA 3/23/2000	MW22-99-104BL 3/18/2002	MW-022 3/30/2004
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform		µg/L	<10	<10	<10	<10	<1	<1	<1
cis-1,2-Dichloroethene		µg/L	--	--	--	--	0.5 J	<1	<1
Tetrachloroethene		µg/L	<10	2 J	<10	<10	0.9 J	0.27 J	<1
Trichloroethene		µg/L	2 J	4 J	1 J	<10	1	<1	<1
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-22

	Sample Name	MW-22-LB-1	MW-22	MW-22	MW-22	MW-22	MW-22
	Sample Date	10/18/2006	10/9/2008	10/12/2010	10/19/2012	10/18/2014	10/16/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.527 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.79 J	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.531 J	0.329 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-23

	Sample Name	MW232	MW233	MW234	MW235	MW23NA	MW23-95-100BL	MW-23
	Sample Date	6/18/1997	9/26/1997	3/26/1998	10/19/1998	3/23/2000	3/18/2002	5/19/2004
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform	µg/L	<10	<10	<10	<10	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene	µg/L	<10	<10	<10	<10	<1	<1	<1
Trichloroethene	µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-23

	Sample Name	MW-23-LB-1	MW-23	MW-23	MW-23	MW-23	MW-23
	Sample Date	10/18/2006	10/14/2008	10/12/2010	10/20/2012	10/20/2014	10/14/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.154 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-24

Analyte	Sample Name / Sample Date	Unit	MW242 6/19/1997	MW243 9/24/1997	MW244 4/2/1998	MW245 10/19/1998	MW24NA 3/22/2000	MW24-109-111BL 3/18/2002	MW-24 5/19/2004
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform		µg/L	<10	<10	<10	<10	<1	<1	<1
cis-1,2-Dichloroethene		µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Trichloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-24

	Sample Name	MW-24-LB-1	MW-24	MW-24	MW-24	MW-24	MW-24
	Sample Date	10/18/2006	10/14/2008	10/14/2010	10/21/2012	10/20/2014	10/15/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.181 J	<0.3	0.241 J	0.137 J	0.238 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2016
Defense Depot Memphis, Tennessee

MW-25A

	Sample Name	MW25A-111102	MW-25A	MW-25A	MW-25A-LB-1	MW-25A-LS-3	MW-25A-LA-5
	Sample Date	11/11/2002	5/12/2004	2/21/2005	10/2/2006	4/13/2007	10/3/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	2.01	2.3	2.4	2.66	2.54	2.38
Chloroform	µg/L	0.517 J	0.57J	0.59 B	0.608	0.507	0.531
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.64	8	9.3	8.61	10.3	9.24
Trichloroethene	µg/L	0.453 J	0.6 J	0.57 J	0.352 J	0.525 J	0.433 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2016
Defense Depot Memphis, Tennessee

MW-25A

Analyte	Sample Name / Sample Date	Unit	MW-25A 4/8/2008	MW-25A 10/10/2008	MW-25A 4/6/2009	MW-25A 10/7/2010	MW-25A 10/7/2011	MW-25A 10/19/2012	MW-25A 10/11/2013	MW-25A 10/20/2014
Carbon tetrachloride		µg/L	2.15	1.67	1.54	2.74	2.22	2.07	1.7	1.12
Chloroform		µg/L	0.399	0.377	0.449	0.411	0.324	0.28 J	0.261 J	0.15 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	6.64	4.91	7.84	13.6	6.94	6.24	5.83	2.03
Trichloroethene		µg/L	0.352 J	0.45 J	0.644 J	0.386 J	0.335 J	0.301 J	<1	0.489 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2016
Defense Depot Memphis, Tennessee

MW-25A

	Sample Name	MW-25A	MW-25A	MW-25A
	Sample Date	10/7/2015	10/15/2016	10/10/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	1.26	1.15	0.863 J
Chloroform	µg/L	0.211 J	0.187 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	3.63	2.44	1.37
Trichloroethene	µg/L	0.484 J	0.481 J	0.47 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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MW-26

Analyte	Sample Name / Sample Date	Unit	MW262 6/20/1997	MW263 9/26/1997	MW264 3/28/1998	MW265 10/20/1998	MW-26-106-BL 3/21/2002	MW26-EBT-TS13 7/24/2003
Carbon tetrachloride		µg/L	4 J	4 J	4 J	4 J	3.7 J	3.29
Chloroform		µg/L	1 J	<10	2 J	1 J	<5	1.11
cis-1,2-Dichloroethene		µg/L	--	--	--	--	<5	<1
Tetrachloroethene		µg/L	12	11	14	16	8.1	7.92
Trichloroethene		µg/L	2 J	2 J	2 J	2 J	1.6 J	1.72
Vinyl chloride		µg/L	<10	<10	<10	<10	<10	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-26

Analyte	Sample Name / Sample Date	Unit	MW26-EBT-TS14 8/18/2003	MW-26 4/2/2004	MW-26 11/13/2004	MW-26 2/22/2005	MW-26 5/24/2005	MW-26-LB-1 10/2/2006	MW-26-LS-3 4/16/2007
Carbon tetrachloride		µg/L	5.17 J	5.3	7.2	7.5	7.2	5.24	5.23
Chloroform		µg/L	1.28	1.4 B	1.6	1.7	1.8 B	0.935	1.05
cis-1,2-Dichloroethene		µg/L	<1	0.76 J	0.64 J	0.71 J	0.57 J	0.45 J	0.313 J
Tetrachloroethene		µg/L	13.8	25	40	40	35	25.5	20.1
Trichloroethene		µg/L	1.9	2.1 J	2.3	2.2	2.5	1.77	1.56
Vinyl chloride		µg/L	<1	<2.5	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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MW-26

	Sample Name	MW-26-LA-5	MW-26	MW-26	MW-26	MW-26	MW-26	MW-26	MW-26
	Sample Date	10/1/2007	4/7/2008	10/8/2008	4/7/2009	10/8/2009	3/31/2010	10/7/2010	3/31/2011
Analyte	**Unit**								
Carbon tetrachloride	µg/L	6.52	4.38	5.31	5.91	4.81	7.09	9.18	9.99
Chloroform	µg/L	1.29	0.976	1.14	1.16	0.871	1.14	1.79	1.33
cis-1,2-Dichloroethene	µg/L	0.41 J	<1	0.295 J	0.332 J	0.411 J	0.466 J	0.606 J	1.23
Tetrachloroethene	µg/L	29	13.7	21.1	25.3	27.3	38.9	46.4	50.4
Trichloroethene	µg/L	1.75	1.3	1.54	1.33	1.59	1.63	1.98	2.33
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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MW-26

Analyte	Sample Name / Sample Date	Unit	MW-26 10/3/2011	MW-26 4/23/2012	MW-26 10/21/2012	MW-26 4/10/2013	MW-26 10/12/2013	MW-26 4/24/2014	MW-26 10/20/2014	MW-26 4/10/2015
Carbon tetrachloride		µg/L	8.97	6.34 J	4.78	5.27	4.6	5.35	4.3	4.78
Chloroform		µg/L	1.4	0.74	0.683	0.588	0.642	0.595	0.553	0.529
cis-1,2-Dichloroethene		µg/L	1.01	0.589 J	0.496 J	0.504 J	0.462 J	0.481 J	0.398 J	0.378 J
Tetrachloroethene		µg/L	52.5	31.2	25.9	29.7	25	25.5	24.9	24.6
Trichloroethene		µg/L	1.92	1.68	1.45	1.53	1.24	1.14	1.13	1.28
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-26

	Sample Name	MW-26	MW-26	MW-26	MW-26	MW-26
	Sample Date	10/7/2015	4/21/2016	10/15/2016	4/19/2017	10/8/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	3.83	3.6	2.96	2.59	2.26
Chloroform	µg/L	0.501	0.463	0.536	0.376	0.442
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	21.4	17.5	11.6	10.6	8.25
Trichloroethene	µg/L	1.04	0.814 J	0.769 J	0.734 J	0.739 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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MW-34

	Sample Name	MW342	MW343	MW344	MW-34-Y1Q1	MW-34-Y1Q2	MW-34-Y1Q3	MW-34-Y1Q4
	Sample Date	6/19/1997	9/26/1997	3/27/1998	2/4/1999	5/25/1999	8/27/1999	11/3/1999
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	1.01	1.23	0.51 J	<1
Chloroform	µg/L	2 J	1 J	<10	4.34	<1	0.66J	<1
cis-1,2-Dichloroethene	µg/L	--	--	--	1.03	<1	<1	<1
Tetrachloroethene	µg/L	<10	<10	<10	<1	<1	<1	<1
Trichloroethene	µg/L	<10	<10	<10	4.39	<1	0.64 J	<1
Vinyl chloride	µg/L	<10	<10	<10	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34-Y2Q1 2/16/2000	MW-34 5/18/2000	MW-34-Y2Q3 8/24/2000	MW-34-Y2Q4 11/7/2000	MW-34 2/20/2001	MW-34-Y3S2-A 10/3/2001
Carbon tetrachloride		µg/L	1.04	1.03	0.86 J	<1	0.82 J	<1
Chloroform		µg/L	1.98	3.49	<1	<1	4.24	1.46
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.85 J	2.15	2.55	1.43	1.62	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

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HISTORICAL CVOC RESULTS - MI LTM
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MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34-Y3S2-B 10/3/2001	MW-34-Y3S2-C 10/3/2001	MW34-147-152BL 3/18/2002	MW-34-3_020410 4/10/2002	MW-34-2_020410 4/10/2002
Carbon tetrachloride		µg/L	<1	0.96 J	0.7 J	<1	<1
Chloroform		µg/L	<1	<1	3	<1	7.78
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.48	2	0.93 J	0.9 J	0.97 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34-1_020410 4/10/2002	MW-34-3_021001 10/1/2002	MW-34-1_021001 10/1/2002	MW-34-2_021001 10/1/2002	MW-34-3 4/8/2003
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	10.5	<1	2.56	1.26	4.45
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.16	<1	<1	<1	0.74
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34-2 4/8/2003	MW-34-1 4/8/2003	MW34-EBT-TS13 7/24/2003	MW-34-1 10/28/2003	MW-34-2 10/28/2003	MW-34-3 10/28/2003	MW-34,152 4/28/2004
Carbon tetrachloride		µg/L	<1	1.08	<1	<1	<1	<1	<1
Chloroform		µg/L	7.66	13.9	<1	3	<1	<1	1.2
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<0.5	<1	<1	<1	<1
Trichloroethene		µg/L	120	1.75	0.476 J	<1	<1	<1	0.29 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34,147 4/28/2004	MW-34,142 4/28/2004	MW-34,138 4/28/2004	MW-34 5/23/2004	MW34,152 10/20/2004	MW34,147.3 10/20/2004	MW34,142.3 10/20/2004
Carbon tetrachloride		µg/L	0.19 J	<4	<4	0.4 J	0.35 J	0.64 J	0.62 J
Chloroform		µg/L	1.2	1.2 J	1.1 J	0.29J	1.7	2.4	3.8
cis-1,2-Dichloroethene		µg/L	<1	<4	<4	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<4	<4	0.55 J	<1	<1	<1
Trichloroethene		µg/L	0.39 J	<4	<4	0.5 J	0.54 J	0.83 J	0.98 J
Vinyl chloride		µg/L	<1	<4	<4	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34 11/11/2004	MW-34 2/23/2005	MW-34 5/23/2005	MW-34-LB-1 10/16/2006	MW-34 10/1/2007	MW-34 11/7/2007	MW-34 10/13/2008
Carbon tetrachloride		µg/L	0.55 J	0.41 J	0.44 J	0.381 J	1.05	0.479	0.826 J
Chloroform		µg/L	0.51 B	1.1	0.31 B	0.531	0.434	0.371	0.345 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1 J
Tetrachloroethene		µg/L	0.52 J	0.37 J	0.46 J	0.336 J	0.753 J	0.34	0.451 J
Trichloroethene		µg/L	0.49 J	0.4 J	0.67 J	1.06	1.38	1.39	0.885 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-34

Analyte	Sample Name / Sample Date	Unit	MW-34 10/8/2009	MW-34 10/6/2010	MW-34 10/9/2011	MW-34 10/19/2012	MW-34 10/19/2014	MW-34 10/15/2016	MW-34 10/8/2017
Carbon tetrachloride		µg/L	0.978 J	0.572	0.783 J	0.565 J	0.766 J	0.527 J	0.525 J
Chloroform		µg/L	0.236 J	0.325	0.406	0.4	0.643	1.04	1.33
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.358 J	0.269 J	0.341 J	0.459 J	1.5	3.45	2.16
Trichloroethene		µg/L	1.11	0.756 J	1.48	0.718 J	2.9	2.09	3.95
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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MW-38

Analyte	Sample Name / Sample Date	Unit	MW382 6/19/1997	MW383 9/25/1997	MW384 3/26/1998	MW385 10/17/1998	MW38-145-150BL 3/18/2002	MW-38 5/20/2004	MW-38-LB-1 10/17/2006
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<9.1	1.24
Chloroform		µg/L	<10	<10	<10	<10	<1	<9.1	0.513
cis-1,2-Dichloroethene		µg/L	--	--	--	--	<1	<9.1	<1
Tetrachloroethene		µg/L	<10	<10	<10	<10	<1	<9.1	<1
Trichloroethene		µg/L	<10	1 J	1 J	<10	<1	<9.1	4.63
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<9.1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-38

Analyte	Sample Name / Sample Date	Unit	MW-38-LA-5 10/1/2007	MW-38 10/8/2008	MW-38 10/5/2009	MW-38 10/9/2010	MW-38 10/3/2011	MW-38 10/21/2012	MW-38 10/21/2014	MW-38 10/14/2016
Carbon tetrachloride		µg/L	1.37	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.646	<0.3	<0.3	0.141 J	<0.3	0.211 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.446 J	<1	<1	<1	<1	0.591 J	0.262 J	<1
Trichloroethene		µg/L	4.37	<1	<1	0.717 J	0.291 J	4.86	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-39

	Sample Name	MW392	MW393	MW394	MW395	MW39NA	MW39-107-112BL	MW-39
	Sample Date	6/20/1997	9/26/1997	3/27/1998	10/19/1998	3/23/2000	3/18/2002	4/1/2004
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	<10	<1	<1	<3.3
Chloroform	µg/L	<10	<10	<10	<10	<1	0.18 J	<3.3
cis-1,2-Dichloroethene	µg/L	--	--	--	--	0.4 J	0.48 J	<3.3
Tetrachloroethene	µg/L	6 J	9 J	8 J	8 J	12	8.2	120
Trichloroethene	µg/L	5 J	8 J	7 J	7 J	5	3.8	10
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<3.3

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-39

Analyte	Sample Name / Sample Date	Unit	MW-39 5/23/2004	MW-39 11/9/2004	MW-39 2/15/2005	MW-39 5/16/2005	MW-39-LB-1 10/17/2006	MW-39-LS-3 4/13/2007	MW-39-LA-5 10/1/2007
Carbon tetrachloride		µg/L	<2.5	<4	<1	<1	<1	<1	<1
Chloroform		µg/L	<2.5	<4	0.17 J	0.17 B	<0.3	0.155 J	0.225 J
cis-1,2-Dichloroethene		µg/L	<2.5	<4	0.52 J	0.68 J	0.622 J	0.462 J	0.435 J
Tetrachloroethene		µg/L	95	130	79	110	149	106	111
Trichloroethene		µg/L	7.2	10	7.6	11	8.94	8.17	8.81
Vinyl chloride		µg/L	<2.5	<4	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-39

Analyte	Sample Name / Sample Date	Unit	MW-39 4/9/2008	MW-39 10/9/2008	MW-39 4/9/2009	MW-39 10/10/2009	MW-39 3/31/2010	MW-39 10/9/2010	MW-39 4/1/2011	MW-39 10/6/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.161 J	0.237 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.525 J	1.26 J	17.5	21.3	17.7	18.3	13.5	9.96
Tetrachloroethene		µg/L	100	158 J	62.9 J	50.9	37.4	29.1	33.8	29
Trichloroethene		µg/L	9.3	6.15 J	11.6	13.9	12.3	13.6	12.4	10.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	0.414 J	0.6 J	0.914 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-39

Analyte	Sample Name / Sample Date	Unit	MW-39 4/23/2012	MW-39 10/20/2012	MW-39 4/10/2013	MW-39 10/11/2013	MW-39 4/25/2014	MW-39 10/19/2014	MW-39 4/9/2015	MW-39 10/8/2015
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	3.94	7.24	3.38	12.3	2.85	3.74	5.48	6.62
Tetrachloroethene		µg/L	9.78	5.08	10.7	1.34	9.7	10.1	10.1	11.2
Trichloroethene		µg/L	5.96	10.1	10.4	11.6	6.9	7.66	7.61	8.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-39

	Sample Name	MW-39	MW-39	MW-39	MW-39
	Sample Date	4/22/2016	10/14/2016	4/20/2017	10/7/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	23.9	9.63	9.23	10.6
Tetrachloroethene	µg/L	1.75	3.22	2.31	1.62
Trichloroethene	µg/L	1.06	5.58	4.63	4.56
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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MW-39A

	Sample Name	MW-39A	MW-39A	MW-39A	MW-39A	MW-39A-LB-1	MW-39A-LS-3	MW-39A-LA-5
	Sample Date	5/23/2004	11/9/2004	2/15/2005	5/16/2005	10/17/2006	4/13/2007	10/2/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<5J	<6.7	<1	<1	<1	<1	<1
Chloroform	µg/L	<5	<6.7	0.22 J	0.23 B	0.251 J	0.215 J	0.215 J
cis-1,2-Dichloroethene	µg/L	<5	<6.7	0.59 J	0.51 J	0.418 J	0.4 J	0.362 J
Tetrachloroethene	µg/L	140	150	190	150	196	176	162
Trichloroethene	µg/L	5.8	8.3	8.7	7.9	4.68	4.04	4.4
Vinyl chloride	µg/L	<5	<6.7	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-39A

Analyte	Sample Name / Sample Date	Unit	MW-39A 4/7/2008	MW-39A 10/9/2008	MW-39A 4/9/2009	MW-39A 10/5/2009	MW-39A 4/2/2010	MW-39A 10/9/2010	MW-39A 4/1/2011	MW-39A 10/5/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.257 J	0.16 J	0.145 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.499 J	12.2	7.61	24.4	35.4	36	40.8	30.9
Tetrachloroethene		µg/L	234	95.7	156	79.9	43.8	25.6	29.5	30.9
Trichloroethene		µg/L	4.63	11.8	7.21	9.49	11.4	10.9	11.4	8.74
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	1.06

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-39A

	Sample Name	MW-39A	MW-39A	MW-39A	MW-39A	MW-39A	MW-39A	MW-39A	MW-39A
	Sample Date	4/23/2012	10/20/2012	4/10/2013	10/11/2013	4/25/2014	10/19/2014	4/9/2015	10/8/2015
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	19.3	14.5	10.6	7.28	6.32	5.21	6.94	8.7
Tetrachloroethene	µg/L	29	30.9	28.9	29.5	26.4	23.5	22.7	17.4
Trichloroethene	µg/L	7.4	8.18	6.88	7.05	7.03	8.01	8.69	7.99
Vinyl chloride	µg/L	1.93	1.94	1.37	1.67	1.49	1.16	1.31	1.25

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-39A

	Sample Name	MW-39A	MW-39A	MW-39A	MW-39A
	Sample Date	4/22/2016	10/14/2016	4/20/2017	10/10/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	11.6	14	14.5	15.4
Tetrachloroethene	µg/L	11.5	7.96	5.42	3.93
Trichloroethene	µg/L	6.62	7.68	6.47	5.64
Vinyl chloride	µg/L	1.28	1.83	2.01	2.01

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-50

Analyte	Sample Name / Sample Date	Unit	MW502 6/19/1997	MW503 9/24/1997	MW504 3/25/1998	MW505 10/16/1998	MW50-117.5-122.5BL 3/19/2002	MW-50 5/17/2004
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1
Chloroform		µg/L	<10	<10	<10	<10	0.25 J	0.23 J
cis-1,2-Dichloroethene		µg/L	--	--	--	--	0.48 J	0.52 J
Tetrachloroethene		µg/L	<10	<10	<10	<10	<1	<1
Trichloroethene		µg/L	<10	<10	<10	<10	1.2	1.1
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-50

	Sample Name	MW-50-LB-1	MW-50	MW-50	MW-50	MW-50	MW-50	MW-50
	Sample Date	10/18/2006	10/13/2008	10/13/2010	10/19/2012	10/19/2014	10/15/2016	10/8/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.746	0.469	0.281 J	1.57	1.19	2.62	2.87
cis-1,2-Dichloroethene	µg/L	0.483 J	0.321 J	0.297 J	0.617 J	0.756 J	0.855 J	0.854 J
Tetrachloroethene	µg/L	0.263 J	0.335 J	0.46 J	0.492 J	0.665 J	0.985 J	1.27
Trichloroethene	µg/L	1.5	1.12	1.24 B	2.65	3.4	3.58	3.12
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-52

Analyte	Sample Name / Sample Date	Unit	MW522 6/18/1997	MW523 9/24/1997	MW524 3/25/1998	MW525 10/16/1998	MW52-96.5-101.5BL 3/19/2002	MW-52 5/6/2004	MW-52 2/21/2005
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform		µg/L	<10	<10	<10	<10	0.35 J	0.68 J	0.77 B
cis-1,2-Dichloroethene		µg/L	--	--	--	--	0.53 J	0.58 J	0.6 J
Tetrachloroethene		µg/L	4 J	2 J	4 J	<10	6.4	4.7	6.2
Trichloroethene		µg/L	<10	<10	1 J	<10	0.59 J	0.34 J	0.67 J
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-52

Analyte	Sample Name / Sample Date	Unit	MW-52 10/2/2006	MW-52 4/16/2007	MW-52 10/3/2007	MW-52 4/8/2008	MW-52 10/10/2008	MW-52 4/6/2009	MW-52 10/12/2009	MW-52 10/7/2010
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.899	0.828	0.75	0.861	1.12 J	0.891	0.842	0.893
cis-1,2-Dichloroethene		µg/L	0.639 J	0.938 J	0.993 J	0.805 J	0.866 J	0.81 J	0.831 J	0.608 J
Tetrachloroethene		µg/L	10.2	10.8	9.62	9.4	6.86 J	5.85	6.07	5.25
Trichloroethene		µg/L	1.04	1.4	1.17	1.16	1.17 J	1.12	1.06	0.838 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-52

Analyte	Sample Name / Sample Date	Unit	MW-52 10/7/2011	MW-52 10/19/2012	MW-52 10/11/2013	MW-52 10/20/2014	MW-52 10/7/2015	MW-52 10/15/2016	MW-52 10/10/2017
Carbon tetrachloride		µg/L	<1 UJ	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.794 UJ	0.729	0.841	1.25	1.23	0.912	0.731
cis-1,2-Dichloroethene		µg/L	0.632 J	0.641 J	0.562 J	0.574 J	0.545 J	0.432 J	0.701 J
Tetrachloroethene		µg/L	6.19	7.55	7.16	6.68	6.41	6.73	9.54
Trichloroethene		µg/L	0.98 J	1.15	0.995 J	1.16	1.11	1.12	1.58
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-53

	Sample Name	MW532	MW533	MW534	MW535	MW53-75-80BL	MW-53	MW-53-LB-1
	Sample Date	6/19/1997	9/26/1997	3/26/1998	10/19/1998	3/18/2002	5/10/2004	10/17/2006
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform	µg/L	<10	<10	<10	<10	<1	<1	<0.3
cis-1,2-Dichloroethene	µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene	µg/L	<10	<10	<10	<10	0.6 J	0.59 J	2.26
Trichloroethene	µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-53

	Sample Name	MW-53	MW-53	MW-53	MW-53	MW-53
	Sample Date	10/13/2008	10/13/2010	10/19/2012	10/19/2014	10/15/2016
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	2.25	1.39	2.15	1.92	2.59
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-55

Analyte	Sample Name / Sample Date	Unit	MW552 6/18/1997	MW553 9/26/1997	MW554 3/25/1998	MW555 10/16/1998	MW55-71-73BL 3/18/2002	MW-55 5/20/2004	MW-55-LB-1 10/16/2006
Carbon tetrachloride		µg/L	<10	<10	<10	<10	<1	<1	<1
Chloroform		µg/L	<10	<10	<10	<10	<1	<1	<0.3
cis-1,2-Dichloroethene		µg/L	--	--	--	--	<1	<1	<1
Tetrachloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Trichloroethene		µg/L	<10	<10	<10	<10	<1	<1	<1
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-55

	Sample Name	MW-55	MW-55	MW-55	MW-55	MW-55
	Sample Date	10/13/2008	10/11/2010	10/21/2012	10/21/2014	10/17/2016
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1 J	<1	<1	<1	<1
Chloroform	µg/L	<0.3 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1 J	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1 J	<1	<1	<1	<1
Trichloroethene	µg/L	<1 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1 J	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-62

Analyte	Sample Name / Sample Date	Unit	MW625 10/26/1998	MW62NA 3/23/2000	MW62-94-95BL 3/18/2002	MW62 2/4/2004	MW62 4/7/2004	MW-62 5/11/2004	MW-62 2/18/2005
Carbon tetrachloride		µg/L	<10	<1	<1	1.38	1.19	<3.3	0.56 J
Chloroform		µg/L	<10	0.2 J	0.18 J	0.368 J	0.431 J	<3.3	0.46 J
cis-1,2-Dichloroethene		µg/L	--	<1	190	0.418 J	<1	<3.3	<1
Tetrachloroethene		µg/L	<10	<1	<1	0.318 J	0.853	<3.3	1.1
Trichloroethene		µg/L	37	32	6.5	134	183	100	150
Vinyl chloride		µg/L	<10	<1	28	1.27	<1	<3.3	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-62

	Sample Name	MW-62	MW-62-LB-1	MW-62-LS-3	MW-62-LA-5	MW-62	MW-62	MW-62
	Sample Date	5/16/2005	10/4/2006	4/17/2007	10/3/2007	4/9/2008	10/14/2008	4/10/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	0.84 J	0.279 J	0.703 J	0.744 J	0.525 J	0.634 J	0.369 J
Chloroform	µg/L	0.23 B	0.25 J	0.311	0.476	0.416	0.394 J	0.361
cis-1,2-Dichloroethene	µg/L	1.3	0.26 J	1.16	0.33 J	<1	<1	0.424 J
Tetrachloroethene	µg/L	0.34 J	<1	0.362 J	0.8 J	0.413 J	0.39 J	0.33 J
Trichloroethene	µg/L	92	77.7 J	102	184	152	157 J	169
Vinyl chloride	µg/L	1.2 J	<1	2.71	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-62

Analyte	Sample Name / Sample Date	Unit	MW-62 10/10/2009	MW-62 4/7/2010	MW-62 10/14/2010	MW-62 4/3/2011	MW-62 10/8/2011	MW-62 4/21/2012	MW-62 10/22/2012	MW-62 2/11/2013
Carbon tetrachloride		µg/L	<1	0.485 J	0.577 J	0.732 J	0.563 J	0.736 J	0.519 J	<50
Chloroform		µg/L	0.154 J	0.296 J	0.291 J	0.356	0.315	0.403	0.457	<15
cis-1,2-Dichloroethene		µg/L	0.308 J	<1	<1	<1	<1	0.88 J	3.76	37.5
Tetrachloroethene		µg/L	<1	0.474 J	0.447 J	0.584 J	0.504 J	0.692 J	0.482 J	<50
Trichloroethene		µg/L	59.2	178	119	153	157	185	163	61.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	1.2	<50

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-62

Analyte	Sample Name / Sample Date	Unit	MW-62 5/9/2013	MW-62 8/20/2013	MW-62 11/11/2013	MW-62 2/11/2014	MW-62 5/10/2014	MW-62 8/10/2014	MW-62 11/9/2014	MW-62 4/25/2016
Carbon tetrachloride		µg/L	<5	<1	<1	<5	<10 UJ	<10 UJ	<25	<1
Chloroform		µg/L	<1.5	0.351	0.287 J	<1.5	<3 UJ	<3 UJ	<7.5	0.186 J
cis-1,2-Dichloroethene		µg/L	34.8	51.8	106	95.2	99.5 J	25.1 J	20.4 J	65.3
Tetrachloroethene		µg/L	<5	0.382 J	<1	<5	<10 UJ	<10 UJ	<25	<1
Trichloroethene		µg/L	98.5	132	24.1	2.39 J	<10 UJ	<10 UJ	<25	24.6
Vinyl chloride		µg/L	<5	<1	<1	<5	<10 UJ	<10 UJ	<25	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-62

Analyte	Sample Name / Sample Date / Unit	MW-62 10/14/2016	MW-62 4/21/2017	MW-62 10/8/2017
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	16.4	12.1	11.8
Tetrachloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.57 J	0.475 J	0.278 J
Vinyl chloride	µg/L	6.5	9.47	15.3

Notes:
VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-63A

	Sample Name	MW63A	MW-63A	MW-63A	MW-63A	MW-63A	MW-63A	MW-63A	MW-63A
	Sample Date	11/11/2002	5/7/2004	2/22/2005	10/23/2006	10/2/2007	10/8/2008	10/10/2009	10/7/2010
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	5.03	<1	<1	<0.3	<0.3	0.471 J	0.194 J	<0.3
cis-1,2-Dichloroethene	µg/L	0.42 J	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.466 J	0.32 J	0.64 J	1.24	1.23	<1	0.674 J	1.69
Trichloroethene	µg/L	1.67	0.68 J	0.63 J	0.765 J	1.09	1.66 J	1.81	1.37
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-63A

	Sample Name	MW-63A	MW-63A	MW-63A	MW-63A	MW-63A	MW-63A
	Sample Date	10/6/2011	10/21/2012	10/12/2013	10/21/2014	10/7/2015	10/14/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1 U
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3 U
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1 U
Tetrachloroethene	µg/L	0.466 J	2.31	2.52	2.07	2.37	2.96
Trichloroethene	µg/L	0.432 J	1.39	1.83	2.39	1.51	1.76
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1 U

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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MW-63B

Analyte	Unit	Sample Name: MW63B Sample Date: 11/11/2002	MW63B 5/7/2004	MW63B 2/22/2005	MW-63B-LB-1 10/23/2006	MW-63B-LA-5 10/2/2007	MW-63B 10/7/2008	MW-63B 10/10/2009
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	11.1	1.8	1.5	0.604	1.44	2.9	1.23
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	0.401 J	0.253 J
Tetrachloroethene	µg/L	6.78	2.3	2.8	3.71	2.95	4.6	1.58
Trichloroethene	µg/L	7.9	0.92 J	1.1	1.12	2.1	4.56	3.1
Vinyl chloride	µg/L	<0.25	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-63B

	Sample Name	MW-63B	MW-63B	MW-63B	MW-63B	MW-63B	MW-63B	MW-63B
	Sample Date	10/7/2010	10/7/2011	10/21/2012	10/12/2013	10/21/2014	10/7/2015	10/14/2016
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	1.71	0.759	0.578	0.399	0.771	0.759	0.777
cis-1,2-Dichloroethene	µg/L	0.372 J	<1	<1	0.34 J	0.273 J	0.344 J	0.375 J
Tetrachloroethene	µg/L	7.47	5.11	2.17	1.23	2.23	2.78	3.37
Trichloroethene	µg/L	3.55	2.76	2.72	2.07	2.85	3.11	2.77
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-63B

	Sample Name	MW-63B
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	0.549
cis-1,2-Dichloroethene	µg/L	0.358 J
Tetrachloroethene	µg/L	2.12
Trichloroethene	µg/L	2.23
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-64

	Sample Name	MW645	MW64-108-110BL	MW-64	MW-64	MW-64-LB-1	MW-64-LS-3	MW-64-LA-5
	Sample Date	10/25/1998	3/18/2002	4/1/2004	2/21/2005	10/23/2006	4/17/2007	10/3/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	2 J	3.3	3.3	3	2.9	3.26	2.82
Chloroform	µg/L	1 J	0.85 J	0.86 B	0.92 B	1.01	0.818	0.891
cis-1,2-Dichloroethene	µg/L	--	0.45 J	0.41 J	0.31 J	0.397	0.345 J	0.363 J
Tetrachloroethene	µg/L	10	10	16	18	18.2	18.1	17.1
Trichloroethene	µg/L	28	45	39	34	28.9	30.6	30.2
Vinyl chloride	µg/L	<10	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-64

Analyte	Sample Name / Sample Date	Unit	MW-64 4/7/2008	MW-64 10/8/2008	MW-64 4/9/2009	MW-64 10/8/2009	MW-64 3/29/2010	MW-64 10/7/2010	MW-64 3/31/2011	MW-64 10/3/2011
Carbon tetrachloride		µg/L	3.68	3.3	3.37	2.78	3.56	3.08	3.61	2.52
Chloroform		µg/L	1.16	0.989	1.08	0.926	1.34	1.17	1.45	1.41
cis-1,2-Dichloroethene		µg/L	0.401 J	0.439 J	0.481 J	0.519 J	0.482 J	0.423 J	0.514 J	0.544 J
Tetrachloroethene		µg/L	22.5	22.3	23	23.8	23	20.8	21.4	16.2
Trichloroethene		µg/L	35.7	36.4	38.1	41.5	38.8	34.1	38.8	26.1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-64

Analyte	Sample Name / Sample Date	Unit	MW-64 4/23/2012	MW-64 10/21/2012	MW-64 4/10/2013	MW-64 10/12/2013	MW-64 10/12/2013	MW-64 4/25/2014	MW-64 10/20/2014	MW-64 4/10/2015
Carbon tetrachloride		µg/L	2.75	2.62	2.3	2.56	2.56	2.52	1.91	2.15
Chloroform		µg/L	0.876 B	1.16	1.02	0.821	0.821	0.829	0.683	0.867
cis-1,2-Dichloroethene		µg/L	0.475 J	0.488 J	0.436 J	0.431 J	0.431 J	0.363 J	0.434 J	0.37 J
Tetrachloroethene		µg/L	20.8	20.8	17.6	18	18	16.1	14.6	15.4
Trichloroethene		µg/L	35.7	34.8	35.4	28	28	32.3	30.1	32.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

-- not analyzed

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-64

Analyte	Sample Name / Sample Date	Unit	MW-64 10/7/2015	MW-64 4/21/2016	MW-64 10/15/2016	MW-64 4/19/2017	MW-64 10/8/2017
Carbon tetrachloride		µg/L	1.97	1.96	1.94	1.85	1.87
Chloroform		µg/L	0.979	1.27	1.28	1.26	1.41
cis-1,2-Dichloroethene		µg/L	0.465 J	0.351 J	0.457 J	0.443 J	0.44 J
Tetrachloroethene		µg/L	16.5	16	16.9	15.8	17.5
Trichloroethene		µg/L	33.1	31.4	31.3	26.7	26.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
-- not analyzed
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-66A

Analyte	Sample Name / Sample Date	Unit	MW-66A 6/23/2004	MW-66A 11/13/2004	MW-66A 2/22/2005	MW-66A 5/23/2005	MW-66A-LB-1 10/18/2006	MW-66A 10/10/2008	MW-66A 10/12/2010
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	1.7	2.2	1.8	2	1.79	1.78	3.31
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-66A

	Sample Name	MW-66A	MW-66A	MW-66A
	Sample Date	10/19/2012	10/19/2014	10/15/2016
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	2.48	2.33	3.8
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-85

	Sample Name	MW-85-1	MW-85-2	MW-85-3	MW-85-4	MW-85-5	MW-85-6	MW-85	MW-85
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	4/2/2004	11/14/2004
Analyte	**Unit**								
Carbon tetrachloride	µg/L	77	110	140	130	120	110	110	120
Chloroform	µg/L	27	61	66	67	63	64	30	36
cis-1,2-Dichloroethene	µg/L	10	25	30	30	28	28	17	21
Tetrachloroethene	µg/L	34	45	67	54	49	31	46	57
Trichloroethene	µg/L	20	21	26	23	25	21	18	22
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<4	<3.3

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-85

	Sample Name	MW-85	MW-85	MW-85-BL	MW-85-EBT-1	MW-85-EBT-2	MW-85-EBT-3	MW-85-EBT-4
	Sample Date	2/22/2005	5/20/2005	8/30/2006	12/8/2006	3/12/2007	5/29/2007	9/11/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	110	110	188	179	123	106 J	75.1
Chloroform	µg/L	35	38	43.8	49.5	36.2	34.6	44.2
cis-1,2-Dichloroethene	µg/L	21	24	26.1	32.2	23.8	18.6	37.4
Tetrachloroethene	µg/L	51	48	74.8	73.4	58.6	37.8	32.5
Trichloroethene	µg/L	22	24	25.1	24.4	20.3	15.5	14.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-85

Analyte	Sample Name / Sample Date	Unit	MW-85-EBT-5 12/10/2007	MW-85 3/12/2008	MW-85 6/16/2008	MW-85 12/17/2008	MW-85 3/17/2009	MW-85 10/12/2009	MW-85 3/30/2010	MW-85 10/14/2010
Carbon tetrachloride		µg/L	34.3	22.5	47.2	76.2	69.9	108	116 J	121
Chloroform		µg/L	51.5	38.6	8.03	9.84	8.51	10.4	14.9	27.1
cis-1,2-Dichloroethene		µg/L	51	59.2	39.1	7.45	7.29	1.3	1.69	9.47
Tetrachloroethene		µg/L	21	14.4	22	36.4	33.9	41	38.1	39.2
Trichloroethene		µg/L	9.15	7	10.4	14.4	11.6	15.1	12.1	12.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-85

Analyte	Sample Name / Sample Date	Unit	MW-85 4/3/2011	MW-85 10/9/2011	MW-85 4/21/2012	MW-85 10/19/2012	MW-85 2/8/2013	MW-85 5/10/2013	MW-85 8/14/2013	MW-85 11/6/2013
Carbon tetrachloride		µg/L	119	55.9	110	112	102	45.8	9.69	1.32
Chloroform		µg/L	27	16.4	23.8	28.1	28.1	13.8	2.78	5.51
cis-1,2-Dichloroethene		µg/L	17.3	21.2	21.1	30.3	30.6	52.4	62.1	63.3
Tetrachloroethene		µg/L	46.2	29.4	44.3	51.5	58.5	21	6.62	2.98
Trichloroethene		µg/L	13.5	9.96	14.4	17.4	17.8	5.76	1.77	0.744 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

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HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-85

	Sample Name	MW-85	MW-85	MW-85	MW-85	MW-85	MW-85	MW-85	MW-85
	Sample Date	2/5/2014	5/11/2014	8/10/2014	11/10/2014	4/21/2016	10/15/2016	4/19/2017	10/7/2017
Analyte	**Unit**								
Carbon tetrachloride	µg/L	27.6	3.95	12.5	16.7 J	32	0.861 J	14.1	11.2
Chloroform	µg/L	22.1	2.35	3.62	6.28 J	1.96	1.9	2.57	5.41
cis-1,2-Dichloroethene	µg/L	24.2	45.2	41.1	54.5 J	16.6	53	28.5	40.5
Tetrachloroethene	µg/L	17.3	3.72	7.55	9.63 J	18.3	49.1	71.4	60.6
Trichloroethene	µg/L	3.8	0.851 J	1.4	1.36 J	5.2	23.3	21.6	19.8
Vinyl chloride	µg/L	<1	1.65	0.989 J	4.39 J	2.73	5.97	1.48	0.755 J

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

	Sample Name	MW-88-1	MW-88-2	MW-88-3	MW-88-4	MW-88-5	MW-88-6	MW-88-7	MW-88-8
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001
Analyte	**Unit**								
Carbon tetrachloride	µg/L	3.2	2.9	1.8	1.3	1	3.1	5.2	5.6
Chloroform	µg/L	1.1	1	0.64 J	0.51 J	0.42 J	1.2	1.9	1.9
cis-1,2-Dichloroethene	µg/L	2.1	1.8	1.1	0.81 J	0.63 J	0.94 J	1.4	1.5
Tetrachloroethene	µg/L	8.1	5.3	2.5	2.3	2.2	8.8	29	27
Trichloroethene	µg/L	1.1	0.97 J	0.71 J	0.58 J	0.52 J	3.8	5.6	6.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

Analyte	Sample Name / Sample Date	Unit	MW-88 7/8/2002	MW-88 7/29/2002	MW-88 9/3/2002	MW-88 10/7/2002	MW-88 11/11/2002	MW-88 12/16/2002	MW-88 1/20/2003	MW-88 3/24/2003
Carbon tetrachloride		µg/L	4.7	5.54	6.61	5.3	5.79	6.76 J	6.98	4.63
Chloroform		µg/L	1.9	2.1	1.86	1.81	1.89	1.88	1.64	1.23
cis-1,2-Dichloroethene		µg/L	1.5	1.37	0.93 J	1.23	1.66	1.22	0.99 J	0.793 J
Tetrachloroethene		µg/L	17	17.2	21.8	16.1	23.8	22.2	19.8	13.4
Trichloroethene		µg/L	7.1	7.55	7.72	6.9	7.66	7.41	7.24	6.49
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

Analyte	Sample Name / Sample Date	Unit	MW-88 4/21/2003	MW-88 5/19/2003	MW-88 6/23/2003	MW-88 7/21/2003	MW-88 8/18/2003	MW-88 4/1/2004	MW-88 11/13/2004	MW-88 2/22/2005
Carbon tetrachloride		µg/L	5.61 J	5.08	6.17 J	8.17	7.3	7.9	6	6.2
Chloroform		µg/L	1.43	1.71	1.93	2.08	1.51	1.9 B	2.5	1.6
cis-1,2-Dichloroethene		µg/L	0.869 J	1.1	1.32	1.41 J	1.34	1.5	1.8	1.2
Tetrachloroethene		µg/L	18.2	14.5	19.9	21.8	21	22	22	20
Trichloroethene		µg/L	6.65	5.34	5.98	6.26	5.37	4.8	3.6	3.8
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

	Sample Name	MW-088	MW-88-LB-1	MW-88-LS-3	MW-88-LA-5	MW-88	MW-88	MW-88
	Sample Date	5/23/2005	10/3/2006	4/13/2007	10/4/2007	4/7/2008	10/6/2008	4/9/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	3.5	8.59	3.88	4.83	2.66	3.69	4.87
Chloroform	µg/L	1.1 B	1.78	0.671	0.827	0.406	0.878	0.825
cis-1,2-Dichloroethene	µg/L	0.87 J	1.3	0.588 J	0.751 J	0.325 J	1.21	0.732 J
Tetrachloroethene	µg/L	14	26.4	18.5	21.3	16.6	32.8	31.7
Trichloroethene	µg/L	2.7	3.5	2.94	3.42	3.11	3.65	3.26
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

Analyte	Sample Name / Sample Date	Unit	MW-88 10/11/2009	MW-88 3/30/2010	MW-88 10/4/2010	MW-88 3/31/2011	MW-88 10/2/2011	MW-88 4/23/2012	MW-88 10/21/2012	MW-88 4/10/2013
Carbon tetrachloride		µg/L	7.12	10.4	10.5	12.2	7.56	9.96 J	11.8	9.83
Chloroform		µg/L	1.32	1.74	1.85	1.93	1.34	1.38	1.7	1.32
cis-1,2-Dichloroethene		µg/L	1.53	2.15	2.54	2.34	1.68	1.88	2.47	1.91
Tetrachloroethene		µg/L	39.4	46.2	56.1	47.2	35.2	38.4	46.3	44.5 J
Trichloroethene		µg/L	3.83	3.83	4.11	4.15	2.92	3.47	3.69	3.29
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

	Sample Name	MW-88	MW-88	MW-88	MW-88	MW-88	MW-88	MW-88	MW-88
	Sample Date	10/12/2013	4/26/2014	10/20/2014	4/10/2015	10/6/2015	4/21/2016	10/15/2016	4/19/2017
Analyte	**Unit**								
Carbon tetrachloride	µg/L	11	10.3	8.91	10.1	7.8	5.98	3.53	2.96
Chloroform	µg/L	1.49	1.46	1.15	1.29	1.01	0.802	0.316	0.263 J
cis-1,2-Dichloroethene	µg/L	2.17	2.35	1.7	1.81	1.4	1.13	0.436 J	0.345 J
Tetrachloroethene	µg/L	45.2	50.4	41.7	45.2	42.7 J	34.5	23.4	20.6
Trichloroethene	µg/L	2.77	2.96	3.09	3.23	2.79	2.56	1.91	1.58
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-88

	Sample Name	MW-88
	Sample Date	10/7/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	3.16
Chloroform	µg/L	0.302
cis-1,2-Dichloroethene	µg/L	0.266 J
Tetrachloroethene	µg/L	18.8
Trichloroethene	µg/L	1.32
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-89

	Sample Name	MW-89	MW-89	MW-89	MW-89	MW-89-LB-1	MW-89-LA-5	MW-89
	Sample Date	3/19/2002	3/19/2002	5/22/2004	2/16/2005	10/24/2006	10/1/2007	10/6/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	0.49 J	0.44 J	0.7 J	0.56 J	0.252 J
Chloroform	µg/L	<1	<1	0.32 J	0.3 B	0.348	0.224 J	0.156 J
cis-1,2-Dichloroethene	µg/L	<1	<1	0.27 J	0.37 J	0.404 J	0.279 J	<1
Tetrachloroethene	µg/L	<1	<1	0.3 J	0.29 J	0.363 J	0.644 J	<1
Trichloroethene	µg/L	0.89 J	<1	2	2.1	2.13	1.55	1.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-89

Analyte	Sample Name / Sample Date	Unit	MW-89 10/5/2009	MW-89 10/8/2010	MW-89 10/1/2011	MW-89 10/20/2012	MW-89 10/11/2013	MW-89 10/19/2014	MW-89 10/7/2015	MW-89 10/13/2016
Carbon tetrachloride		µg/L	<1	0.261 J	0.38 J	0.325 J	<1	<1	<1	<1
Chloroform		µg/L	0.145 J	0.212 J	0.278 J	0.305	0.205 J	0.17 J	0.157 J	0.196 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.251 J	1.43	3.68	4.25	2.44	4.95	4.99	6.08
Trichloroethene		µg/L	1.27	1.63	1.95	1.9	1.35	1.34	1.03	0.883 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-89

	Sample Name	MW-89	MW-89
	Sample Date	4/21/2017	10/8/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.14 J	0.181 J
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	3.64	2.11
Trichloroethene	µg/L	0.871 J	0.784 J
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-90

Analyte	Sample Name / Sample Date	Unit	MW-90 3/19/2002	MW-90 3/19/2002	MW-90 5/22/2004	MW-90 2/16/2005	MW-90-LB-1 10/24/2006	MW-90-LS-3 4/16/2007	MW-90-LA-5 10/1/2007
Carbon tetrachloride		µg/L	0.65 J	0.32 J	0.3 J	0.33 J	0.466 J	0.401 J	0.462 J
Chloroform		µg/L	8.9	3.5	7.4	6.1	3.11	3.18	3.64
cis-1,2-Dichloroethene		µg/L	0.44 J	<1	0.29 J	0.29 J	0.294 J	0.313 J	0.36 J
Tetrachloroethene		µg/L	58	8.8	19	19	26.7	26.7	50.7
Trichloroethene		µg/L	10	2.7	7.2	4.3	2.53	2.4	3.69
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-90

Analyte	Sample Name / Sample Date	Unit	MW-90 4/7/2008	MW-90 10/6/2008	MW-90 4/7/2009	MW-90 10/10/2009	MW-90 4/2/2010	MW-90 10/8/2010	MW-90 4/1/2011	MW-90 10/1/2011
Carbon tetrachloride		µg/L	<1	0.288 J	0.268 J	<1	<1	<1	0.355 J	<1
Chloroform		µg/L	4.66	4.65	4.91	0.817	3.94	4.07	2.77	3.07
cis-1,2-Dichloroethene		µg/L	0.484 J	0.335 J	0.481 J	<1	0.424 J	0.483 J	0.303 J	0.322 J
Tetrachloroethene		µg/L	77.7	79.3	80.8	35	58.3	47.9	31.1	29.2
Trichloroethene		µg/L	5.9	6.08	8.47	2.41	8.55	8.17	5.25	5.64
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-90

Analyte	Sample Name / Sample Date	Unit	MW-90 4/23/2012	MW-90 10/20/2012	MW-90 4/10/2013	MW-90 10/11/2013	MW-90 4/26/2014	MW-90 10/19/2014	MW-90 4/9/2015	MW-90 10/7/2015
Carbon tetrachloride		µg/L	0.452 J	0.291 J	<1	0.283 J	<1	0.267 J	0.302 J	0.265 J
Chloroform		µg/L	2.07	1.64	1.76	1.72	1.42	1.58	1.55	1.45
cis-1,2-Dichloroethene		µg/L	0.267 J	0.34 J	0.384 J	0.428 J	0.344 J	0.422 J	0.418 J	0.397 J
Tetrachloroethene		µg/L	25.6	25.6	22.4	21.5	19.9	17.7	18.9	16.1
Trichloroethene		µg/L	4.37	4.08	4.65	5.19	4.46	5.71	5.59	5.44
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-90

	Sample Name	MW-90	MW-90	MW-90	MW-90
	Sample Date	4/22/2016	10/13/2016	4/21/2017	10/8/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	1.23	1.18	1.05	1.04
cis-1,2-Dichloroethene	µg/L	0.346 J	0.31 J	0.341 J	0.279 J
Tetrachloroethene	µg/L	14.2	11.8	13.5	13.5
Trichloroethene	µg/L	4.3	3.86	4.32	3.82
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-92

	Sample Name	MW-92	MW-92	MW-92	MW-92	MW-92	MW-92	MW-92
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	4/1/2004
Analyte	**Unit**							
Carbon tetrachloride	µg/L	18	19	18	20	20	18	24
Chloroform	µg/L	6.2	6.5	6.1	6.7	6.9	7.7	9 B
cis-1,2-Dichloroethene	µg/L	6.1	6.6	6.2	7	7	3.2	12
Tetrachloroethene	µg/L	130	160	150	160	150	110	170
Trichloroethene	µg/L	4.3	4.5	4.2	4.5	4.5	3	5.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<5

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-92

	Sample Name	MW-92	MW-92	MW-92	MW-92-LB-1	MW-92-LS-3	MW-92-LA-5	MW-92
	Sample Date	11/14/2004	2/24/2005	5/20/2005	10/5/2006	4/16/2007	10/4/2007	4/8/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	23	25	21	27.2	7.67	6.45	6.3
Chloroform	µg/L	9.4	8.6	7.6	8.02	13.2	11	8.91
cis-1,2-Dichloroethene	µg/L	12	11	11	10.8	7.32	67.5	66.2
Tetrachloroethene	µg/L	180	140	160	193	159	55	65.9
Trichloroethene	µg/L	5.7 J	5.8	5.5	6.14	5.01	3.12	4.22
Vinyl chloride	µg/L	<6.7	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-92

Analyte	Sample Name / Sample Date / Unit	MW-92 10/9/2008	MW-92 4/10/2009	MW-92 10/10/2009	MW-92 4/7/2010	MW-92 10/9/2010	MW-92 4/2/2011	MW-92 10/3/2011	MW-92 4/23/2012
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	119	119	120	123	119	86.7	64.2	66.1
Tetrachloroethene	µg/L	0.499 J	<1	1.3	4.76	20.7	50.9	78.4	51.6
Trichloroethene	µg/L	<1	<1	1.72	1.99	8.64	13.8	13.6	26.7
Vinyl chloride	µg/L	<1	1.64	<1	0.791 J	0.314 J	13.6 J	3.02	0.353 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-92

Analyte	Sample Name / Sample Date / Unit	MW-92 10/21/2012	MW-92 4/10/2013	MW-92 10/12/2013	MW-92 4/24/2014	MW-92 10/20/2014	MW-92 4/10/2015	MW-92 10/6/2015	MW-92 4/20/2016
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.157 J	<0.3	0.199 J
cis-1,2-Dichloroethene	µg/L	50.9	45.7	39.7	37.8	30.5	21.1	22.2 J	29.6
Tetrachloroethene	µg/L	78.3	59.1	79.7	69.2	76.9	97.9 J	69.2 J	65.4
Trichloroethene	µg/L	21	14.6	10.8	10.1	8.62	8.4	11.4 J	15.6
Vinyl chloride	µg/L	0.61 J	12.7	5.28	8.92	9.55	7.15	4.89 J	3.38

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-92

	Sample Name	MW-92	MW-92	MW-92
	Sample Date	10/15/2016	4/19/2017	10/7/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	12.7	8.81	5.86
Tetrachloroethene	µg/L	109	103	78.4
Trichloroethene	µg/L	8.28	4.96	4.94
Vinyl chloride	µg/L	5.71	4.48	2.19

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-93

	Sample Name	MW-93	MW-93	MW-93	MW-93	MW-93	MW-93	MW-93	MW-93
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	5/7/2004
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.69 J	<1	<1	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	2.4	7	7.5	7.1	7.3	0.16 J
Trichloroethene	µg/L	<1	<1	0.19 J	0.64 J	0.84 J	0.77 J	0.86 J	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-93

	Sample Name	MW-93-LB-1	MW-93	MW-93	MW-93	MW-93	MW-93	MW-93	MW-93
	Sample Date	10/18/2006	10/4/2007	10/13/2008	10/11/2009	10/14/2010	10/21/2012	10/20/2014	10/15/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1 J	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1 J	<1	<1	<1	0.414 J	<1
Trichloroethene	µg/L	<1	<1	<1 J	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1 J	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-94A

Analyte	Sample Name / Sample Date	Unit	MW-94A 5/23/2004	MW-94A 11/10/2004	MW-94A 2/20/2005	MW-94A 5/17/2005	MW-94A-LB-1 10/24/2006	MW-94A-LS-3 4/16/2007	MW-94A-LA-5 10/4/2007
Carbon tetrachloride		µg/L	<1.4 J	<2	<1	<1	<1	<1	<1
Chloroform		µg/L	<1.4	<2	0.19 J	<1	0.139 J	0.196 J	0.129 J
cis-1,2-Dichloroethene		µg/L	0.52 J	0.71 J	0.82 J	0.68 J	0.624 J	0.532 J	0.61 J
Tetrachloroethene		µg/L	37	47	42	47	52.2	48	43.5
Trichloroethene		µg/L	4.2	6	6.5	5.8	5.58	6.08	7.44
Vinyl chloride		µg/L	<1.4	<2	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-94A

Analyte	Sample Name / Sample Date	Unit	MW-94A 4/8/2008	MW-94A 10/13/2008	MW-94A 4/9/2009	MW-94A 10/12/2009	MW-94A 3/29/2010	MW-94A 10/11/2010	MW-94A 4/2/2011	MW-94A 10/4/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.138 J	0.147 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.42 J	1.93	3.06	2.74	3.15	3.17	3.29	3.41
Tetrachloroethene		µg/L	27.3	32.8	30	27.7	27.7	30	28.8	24.9
Trichloroethene		µg/L	9.49	6.89	6.78	7.46	7.83	6.89	6.59	6.29
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-94A

	Sample Name	MW-94A	MW-94A	MW-94A	MW-94A	MW-94A	MW-94A	MW-94A	MW-94A
	Sample Date	4/23/2012	10/21/2012	4/10/2013	10/12/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.149 J	0.149 J	0.19 J	0.179 J	<0.3	0.153 J	0.126 J
cis-1,2-Dichloroethene	µg/L	1.51	1.63	1.35	1.38	1.3	1.31	1.9	1.9
Tetrachloroethene	µg/L	15.3	32.1	30.4	32.8	30.2 J	30.8	30.6	27.1
Trichloroethene	µg/L	8.04	10.2	10.2	10.4	8.95	8.2	8.65	7.69
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-94A

	Sample Name	MW-94A	MW-94A	MW-94A	MW-94A
	Sample Date	4/21/2016	10/15/2016	4/20/2017	10/7/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.129 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.81	2.16	2.38	2.63
Tetrachloroethene	µg/L	22.7	21.3	19.2	18
Trichloroethene	µg/L	7.03	7.19	6.67	6.08
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-96

	Sample Name	MW-96-1	MW-96-2	MW-96-3	MW-96-4	MW-96-5	MW-96-6	MW-96
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	3/31/2004
Analyte	**Unit**							
Carbon tetrachloride	µg/L	1.8	<1	<1	<1	<1	<1	3.6
Chloroform	µg/L	2	2.7	3.8	5.6	6.3	5.9	0.69 B
cis-1,2-Dichloroethene	µg/L	0.23 J	<1	<1	<1	<1	<1	0.67 J
Tetrachloroethene	µg/L	19	0.88 J	0.21 J	0.3 J	0.13 J	0.14 J	8.9
Trichloroethene	µg/L	0.19 J	<1	<1	<1	<1	<1	0.22 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-96

Analyte	Sample Name / Sample Date	Unit	MW-96 11/15/2004	MW-96 2/21/2005	MW-96 5/20/2005	MW-96 10/2/2006	MW-96-LS-3 4/16/2007	MW-96-LA-5 10/4/2007	MW-96 10/10/2008
Carbon tetrachloride		µg/L	2.9	1.5	3.4	4.5	3.47	3.4	1.03 J
Chloroform		µg/L	0.6 J	0.5 B	0.64 B	0.975	0.901	0.739	0.663 J
cis-1,2-Dichloroethene		µg/L	0.52 J	0.34 J	0.6 J	0.883 J	0.814 J	0.836 J	<1
Tetrachloroethene		µg/L	6.1	3.4	6.5	2.84	4.35	4.33	1.46 J
Trichloroethene		µg/L	<1	<1	<1	<1	0.419 J	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-96

Analyte	Sample Name / Sample Date	Unit	MW-96 4/6/2009	MW-96 10/8/2009	MW-96 10/7/2010	MW-96 10/7/2011	MW-96 10/19/2012	MW-96 10/11/2013	MW-96 10/20/2014	MW-96 10/7/2015
Carbon tetrachloride		µg/L	0.69 J	2	2.45	4.64	1.15	0.832 J	0.839 J	1.19
Chloroform		µg/L	0.73	0.58	0.557	0.972	0.288 J	0.21 J	0.242 J	0.246 J
cis-1,2-Dichloroethene		µg/L	<1	<1	0.34 J	0.631 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	3	7.78	3.99	2.42	0.306 J	0.318 J	0.524 J	0.3 J
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.301 J	0.304 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-96

	Sample Name	MW-96	MW-96
	Sample Date	10/15/2016	10/10/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	0.73 J	0.657 J
Chloroform	µg/L	0.236 J	0.189 J
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	0.29 J	0.367 J
Trichloroethene	µg/L	0.34 J	<1
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
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MW-97

	Sample Name	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	0.14 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-97

	Sample Name	MW-97	MW-97	MW-97-LB-1	MW-97-LS-3	MW-97-LA-5	MW-97	MW-97
	Sample Date	3/31/2004	2/21/2005	10/25/2006	4/16/2007	10/2/2007	4/8/2008	10/13/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	0.16 B	0.228 J	0.292 J	0.255 J	0.164 J	0.267 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.2	5.8	14.7	18.8	25.7	21.8	29.6
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

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HISTORICAL CVOC RESULTS - MI LTM
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Defense Depot Memphis, Tennessee

MW-97

	Sample Name	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97
	Sample Date	4/10/2009	10/7/2009	3/31/2010	10/9/2010	3/31/2011	10/5/2011	4/23/2012	10/20/2012
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.316	0.277 J	0.249 J	0.368	0.235 J	0.238 J	0.346 B	0.311
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	31.3	37.4	36.8	49.8	40.7	53.8	54.7	62
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-97

	Sample Name	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97	MW-97
	Sample Date	4/10/2013	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/21/2016	10/14/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.261 J	0.308	0.252 J	0.249 J	0.315	0.345	0.38	0.367
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	70.7	67.8	58.3	68	70.2	66	28	57.4
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-97

	Sample Name	MW-97	MW-97
	Sample Date	4/19/2017	10/10/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.221 J	0.215 J
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
Trichloroethene	µg/L	62.1	71.7
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-98

	Sample Name	MW-98	MW-98	MW-98	MW-98	MW-98	MW-98	MW-98
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	4/1/2004	11/10/2004
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.23 J	0.26 J	0.24 J	0.26 J	0.24 J	<1	0.17 B
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	0.22 J
Tetrachloroethene	µg/L	1.5	3.7	7.7	5.5	4.4	17	31
Trichloroethene	µg/L	0.46 J	0.9 J	0.88 J	0.89 J	0.83 J	1.2	2.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-98

Analyte	Sample Name / Sample Date / Unit	MW-98 2/16/2005	MW-98 5/19/2005	MW-98 10/25/2006	MW-98 4/13/2007	MW-98 10/3/2007	MW-98 4/7/2008	MW-98 10/10/2008
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	0.133 J	0.147 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	0.252 J	<1	<1	<1	8.6 J
Tetrachloroethene	µg/L	33	28	33.1	35.2	36.9	34.8	25.5 J
Trichloroethene	µg/L	2.1	2	2.37	2.63	2.69	1.93	2.34 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-98

Analyte	Sample Name / Sample Date / Unit	MW-98 4/10/2009	MW-98 10/7/2009	MW-98 4/5/2010	MW-98 10/9/2010	MW-98 4/1/2011	MW-98 10/4/2011	MW-98 4/23/2012
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.128 J	0.127 J	0.125 J	<0.3	0.135 JB
cis-1,2-Dichloroethene	µg/L	0.346 J	0.304 J	0.367 J	0.502 J	0.448 J	0.374 J	0.358 J
Tetrachloroethene	µg/L	30.1	38.8	40.1	35.4	38	41.7	21.7
Trichloroethene	µg/L	2.18	2.79	2.99	2.85	3.44	3.05	3.03
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-98

Analyte	Sample Name / Sample Date	Unit	MW-98 10/20/2012	MW-98 4/10/2013	MW-98 10/11/2013	MW-98 4/25/2014	MW-98 10/20/2014	MW-98 4/9/2015	MW-98 10/8/2015	MW-98 4/22/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.134 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.5 J	0.43 J	0.541 J	0.55 J	0.577 J	0.849 J	0.642 J	0.727 J
Tetrachloroethene		µg/L	41.7	41.2	40.5	36.6	39.9	39.1	40.1	35.8
Trichloroethene		µg/L	3.1	3.18	3.16	2.89	2.78	3.11	3.14	2.82
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-98

	Sample Name	MW-98	MW-98	MW-98
	Sample Date	10/15/2016	4/20/2017	10/7/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.25	5.56	5.65
Tetrachloroethene	µg/L	32.2	15.3	7.71
Trichloroethene	µg/L	2.65	2.32	1.98
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-99

	Sample Name	MW-99	MW-99	MW-99	MW-99	MW-99	MW-99	MW-99	MW-99
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.14 J	0.14 J	0.13 J	0.15 J	<1	0.15 J	0.13 J	<1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	0.14 J	<1	0.28 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-99

	Sample Name	MW-99	MW-99	MW-99	MW-99-LB-1	MW-99-LA-5	MW-99	MW-99
	Sample Date	11/30/2001	11/30/2001	5/18/2004	10/18/2006	10/3/2007	10/9/2008	10/7/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1 J	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	0.22 J	0.2 J	0.265 J	0.238 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.38 J	0.58 J	0.28 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-99

	Sample Name	MW-99	MW-99	MW-99	MW-99
	Sample Date	10/12/2010	10/19/2012	10/18/2014	10/13/2016
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.252 J	0.3	0.407	0.312
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

Analyte	Sample Name / Sample Date / Unit	MW100B-EBT-TS1-110-115 7/8/2002	MW100B-EBT-TS2-110-115 7/29/2002	MW100B-EBT-TS3-110-115 9/3/2002	MW100B-EBT-TS4-110-115 10/7/2002	MW100B-EBT-TS5-110-115 11/11/2002
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.19 J	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	1.3	0.509 J	17.7	33.4	31.4
Tetrachloroethene	µg/L	49	1.56	25.3	14.5	1.77
Trichloroethene	µg/L	72	22.8	33.1	11.6	2.27
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

	Sample Name	MW100B-EBT-TS6-100-115	MW100B-EBT-TS7	MW100B-EBT-TS8-110-115	MW100B-EBT-TS9-100-115	MW100B-EBT-TS10-110-115
	Sample Date	12/16/2002	1/20/2003	2/24/2003	3/24/2003	4/21/2003
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	24.1	26.4	28.7	59.4	61.3
Tetrachloroethene	µg/L	2.35	0.395 J	0.53	0.341 J	<0.5
Trichloroethene	µg/L	2.06	0.4 J	0.407 J	<1	<1
Vinyl chloride	µg/L	<1	2.57	0.436 J	0.968 J	0.797 J

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

	Sample Name	MW100B-EBT-TS11-110-115	MW100B-EBT-TS12-110-115	MW100B-EBT-TS13-110-115	MW-100B	MW-100B	MW-100B
	Sample Date	5/19/2003	6/23/2003	7/21/2003	3/30/2004	11/12/2004	2/18/2005
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<5	<5	<1
Chloroform	µg/L	<1	<1	<1	<5	<5	<1
cis-1,2-Dichloroethene	µg/L	75.2	88.2	89	140	160	120
Tetrachloroethene	µg/L	<0.5	<0.5	<0.5	<5	<5	2.8
Trichloroethene	µg/L	<1	<1	<1	<5	<5	3.4
Vinyl chloride	µg/L	0.819 J	0.646 J	0.66 J	<5	<5	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

	Sample Name	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B
	Sample Date	5/18/2005	10/23/2006	4/13/2007	10/2/2007	4/7/2008	10/8/2008	4/8/2009	10/7/2009
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	100	112	94.4	143	89.3	158	22.3	21.5
Tetrachloroethene	µg/L	5.8	101	98.9	29.6	64.2	0.706 J	<1	<1
Trichloroethene	µg/L	6.2	43.1	39.4	12.6	31.4	0.309 J	<1	<1
Vinyl chloride	µg/L	0.29 J	0.716 J	0.595 J	1.02	0.836 J	1.75	94.6	85.2 J

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

	Sample Name	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B	MW-100B
	Sample Date	3/30/2010	10/6/2010	4/4/2011	10/7/2011	4/21/2012	10/19/2012	4/11/2013	10/12/2013
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	8.8	11	23.6	9.9	5.94	16.3	18.5	21.8
Tetrachloroethene	µg/L	<1	<1	3.87	28.7	44.1	66.5	33	68.4
Trichloroethene	µg/L	<1	<1	0.62 J	0.521 J	0.811 J	3.02	4.51	7.49
Vinyl chloride	µg/L	131 J	132	153	181 J	132	164 J	172	188

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-100B

Analyte	Sample Name / Sample Date	Unit	MW-100B 4/26/2014	MW-100B 10/18/2014	MW-100B 4/8/2015	MW-100B 10/7/2015	MW-100B 4/23/2016	MW-100B 10/13/2016	MW-100B 4/20/2017	MW-100B 10/6/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	17	2.85 J	5.14	2.44	1.27	0.63 J	15.8	21.6
Tetrachloroethene		µg/L	3.5	1.64 J	2.46	3.29	2.55	1.09	5.53	2.26
Trichloroethene		µg/L	0.763 J	<1	0.282 J	0.338 J	0.293 J	0.306 J	1.62	1.58
Vinyl chloride		µg/L	185	169	152	155	130	101	174	166

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 B

	Sample Name	MW-101-109	MW-101-124	MW-101	MW-101	MW-101,129	MW-101,129	MW-101B
	Sample Date	12/21/2001	12/21/2001	3/30/2004	11/11/2004	2/18/2005	5/20/2005	8/25/2006
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<20	<17	<1.3	<1.2	<1
Chloroform	µg/L	<1	0.42 J	<20	<17	0.31 B	0.23 B	0.233 J
cis-1,2-Dichloroethene	µg/L	0.27 J	0.39 J	<20	<17	0.3 J	<1.2	0.279 J
Tetrachloroethene	µg/L	450	460	450	450 J	460	340	239
Trichloroethene	µg/L	0.87 J	0.84 J	<20	<17	0.43 J	0.35 J	0.293 J
Vinyl chloride	µg/L	<1	<1	<20	<17	<1.3	<1.2	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 B

	Sample Name	MW-101T	MW-101B	MW-101B	MW-101B	MW-101B	MW-101B	MW-101B	MW-101B
	Sample Date	12/7/2006	12/7/2006	3/6/2007	5/30/2007	9/11/2007	12/11/2007	3/14/2008	6/10/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1
Chloroform	µg/L	0.155 J	0.156 J	0.129 J	0.206 J	0.164 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	9.4	1.01	7.35	5.26	35.6	23.3
Tetrachloroethene	µg/L	196	192	193	135	147	120	81.3	78.9
Trichloroethene	µg/L	<1	<1	0.358 J	0.311 J	0.646 J	0.843	2.17	4.15
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 B

Analyte	Unit	Sample Name: MW-101B Sample Date: 12/10/2008	MW-101B 3/11/2009	MW-101B 10/7/2009	MW-101B 4/5/2010	MW-101B 10/13/2010	MW-101B 4/5/2011	MW-101B 10/7/2011	MW-101B 4/23/2012
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	29.1	31.2	2.03	0.498 J	0.264 J	0.253 J	<1	<1
Tetrachloroethene	µg/L	47	55.6	96.2	99.6	66.4	76.3	72.3	64.1
Trichloroethene	µg/L	0.923 J	3.53	0.809 J	0.325 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 B

	Sample Name	MW-101B	MW-101T	MW-101B	MW-101B	MW-101B	MW-101B	MW-101B	MW-101B
	Sample Date	10/19/2012	4/11/2013	4/11/2013	10/12/2013	4/26/2014	10/20/2014	4/8/2015	10/7/2015
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	0.227 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	25.5	23.6	31	10.2	27.1	1.58	1.61
Tetrachloroethene	µg/L	63.2	7.45	9.71	2.72	3.59	9.48	5.21	42
Trichloroethene	µg/L	<1	2.25	3.05	1.01	1.66	1.57	0.296 J	0.714 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	0.357 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 B

	Sample Name	MW-101B	MW-101B	MW-101B	MW-101B
	Sample Date	4/23/2016	10/14/2016	4/21/2017	10/6/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	0.329 J	<1	<1
Tetrachloroethene	µg/L	44.5	47	38	25.3
Trichloroethene	µg/L	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 T

	Sample Name	MW-101-89	MW-101	MW-101	MW-101,97.5	MW-101,97.5	MW-101T	MW-101T
	Sample Date	12/21/2001	3/30/2004	11/11/2004	2/18/2005	5/20/2005	8/25/2006	12/7/2006
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<20	<17	<1.4	<1.2	<1	<1
Chloroform	µg/L	0.38 J	<20	<17	0.27 B	0.24 B	0.261 J	0.155 J
cis-1,2-Dichloroethene	µg/L	0.34 J	<20	<17	<1.4	0.32 J	0.266 J	<1
Tetrachloroethene	µg/L	530	450	450 J	470	350	251	196
Trichloroethene	µg/L	0.95 J	<20	<17	0.47 J	<1.2	0.298 J	<1
Vinyl chloride	µg/L	<1	<20	<17	<1.4	<1.2	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 T

Analyte	Sample Name / Sample Date	Unit	MW-101T 3/6/2007	MW-101T 5/30/2007	MW-101T 9/11/2007	MW-101T 12/11/2007	MW-101T 3/14/2008	MW-101T 6/10/2008	MW-101T 12/10/2008	MW-101T 3/11/2009
Carbon tetrachloride		µg/L	<1	<1 J	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.164 J	0.148 J	0.162 J	<0.3	0.149 J	0.137 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.621 J	0.428 J	0.609 J	0.578	10.1	3.22	51.2	35.2
Tetrachloroethene		µg/L	192	123	134	125	113	101	16.5	46.9
Trichloroethene		µg/L	<1	0.364 J	0.46 J	0.305	1.37	1.09	1.63	2.16
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 T

	Sample Name	MW-101T	MW-101T	MW-101T	MW-101T	MW-101T	MW-101T	MW-101T	MW-101T
	Sample Date	10/7/2009	4/5/2010	10/13/2010	4/5/2011	10/7/2011	4/23/2012	10/19/2012	4/11/2013
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.85	0.512 J	<1	0.342 J	<1	0.395 J	<1	25.5
Tetrachloroethene	µg/L	76.5	82.9	75.6	80	53.1	66.6	66.2	7.45
Trichloroethene	µg/L	0.746 J	0.307 J	<1	<1	<1	<1	<1	2.25
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 T

Analyte	Sample Name / Sample Date	Unit	MW-101T 10/12/2013	MW-101T 4/26/2014	MW-101T 10/19/2014	MW-101T 4/8/2015	MW-101T 10/7/2015	MW-101T 4/23/2016	MW-101T 10/14/2016	MW-101T 4/21/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	0.33	<0.3	<0.3	<0.3	0.129 J
cis-1,2-Dichloroethene		µg/L	36.5	3.98	25.9	<1	4.21	0.777 J	0.37 J	<1
Tetrachloroethene		µg/L	1.22	0.751 J	4.75	0.49 J	36.2	14.5	47.8	37.1
Trichloroethene		µg/L	0.9 J	0.445 J	1.49	<1	1.38	0.635 J	0.33 J	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	1.63	1.22	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-101 T

	Sample Name	MW-101T
	Sample Date	10/6/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3 U
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	26.8
Trichloroethene	µg/L	<1
Vinyl chloride	µg/L	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-102B

Analyte	Sample Name / Sample Date	Unit	MW-102B 5/8/2004	MW-102B 10/19/2006	MW-102B 10/3/2007	MW-102B 10/13/2008	MW-102B 10/8/2009	MW-102B 10/11/2010	MW-102B 10/19/2012	MW-102B 10/18/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1
Chloroform		µg/L	<1	<0.3	<0.3	<0.3 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	0.308 J	<1 J	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-102B

	Sample Name	MW-102B
	Sample Date	10/14/2016
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	0.381 J
Trichloroethene	µg/L	<1
Vinyl chloride	µg/L	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-103

	Sample Name	MW-103-10	MW-103-9	MW-103-8	MW-103-7	MW-103-6	MW-103-5	MW-103-4
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	16	17	16	17	16	15	14
cis-1,2-Dichloroethene	µg/L	0.39 J	0.37 J	0.36 J	0.39 J	0.36 J	0.34 J	0.33 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	5.8	5.6	4.9	4.9	4.6	4.4	3.9
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-103

	Sample Name	MW-103-3	MW-103-2	MW-103-1	MW-103	MW-103	MW-103	MW-103	MW-103
	Sample Date	11/30/2001	11/30/2001	11/30/2001	5/11/2004	2/20/2005	10/3/2006	10/4/2007	10/6/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	16	4.3	1.9	12	13	12.2	11.7	11.1
cis-1,2-Dichloroethene	µg/L	0.39 J	<1	<1	0.44 J	0.43 J	0.322 J	0.35 J	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	4.8	0.69 J	0.3 J	4	4.4	5.04	6.63	5.27
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-103

Analyte	Sample Name / Sample Date	Unit	MW-103 10/11/2009	MW-103 10/7/2010	MW-103 10/7/2011	MW-103 10/21/2012	MW-103 10/12/2013	MW-103 10/20/2014	MW-103 10/7/2015	MW-103 10/15/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	8.02	7.78	9.61	10.4	9.07	7.26	7.03	4.42
cis-1,2-Dichloroethene		µg/L	0.314 J	0.386 J	0.439 J	0.419 J	0.373 J	0.41 J	0.43 J	0.251 J
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	0.409 J	<1	<1
Trichloroethene		µg/L	5.44	3.98	7.2	10.6	10.6	8.8	9.99	6.98
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-103

	Sample Name	MW-103
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	5.58
cis-1,2-Dichloroethene	µg/L	0.418 J
Tetrachloroethene	µg/L	0.257 J
Trichloroethene	µg/L	10.5
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-104

	Sample Name	MW-104-10	MW-104-9	MW-104-8	MW-104-7	MW-104-6	MW-104-5	MW-104-4
	Sample Date	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001	11/30/2001
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	20	19	14	18	17	10	5
cis-1,2-Dichloroethene	µg/L	0.46 J	0.45 J	0.36 J	0.47 J	0.4 J	0.22 J	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	24	20	19	19	16	6.4	1.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-104

	Sample Name	MW-104-3	MW-104-2	MW-104-1	MW-104	MW-104	MW-104	MW-104
	Sample Date	11/30/2001	11/30/2001	11/30/2001	5/11/2004	2/21/2005	10/3/2006	4/13/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	4.8	4.6	4	13	16	15.9	13.7
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	0.36 J	0.38 J	0.446 J	0.589 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	1.1	1.1	0.89 J	11	14	17.6	17
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-104

Analyte	Sample Name / Sample Date	Unit	MW-104 10/4/2007	MW-104 4/8/2008	MW-104 10/6/2008	MW-104 10/11/2009	MW-104 10/7/2010	MW-104 10/9/2011	MW-104 10/21/2012	MW-104 10/12/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	12.8	13.6	11.2	8.45	10.2	8.78	9.89	7.71
cis-1,2-Dichloroethene		µg/L	0.554 J	0.63 J	0.305 J	0.473 J	0.477 J	0.574 J	0.637 J	0.833 J
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	17.8	18.2	12.6	14.1	14.4	17.3	21.9	22
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-104

Analyte	Sample Name / Sample Date	Unit	MW-104 10/20/2014	MW-104 10/6/2015	MW-104 10/15/2016	MW-104 4/20/2017	MW-104 10/8/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	0.205 J	3.41	3.24	<0.3 U	0.495
cis-1,2-Dichloroethene		µg/L	0.607 J	0.901 J	0.385 J	0.521 J	0.881 J
Tetrachloroethene		µg/L	<1	0.447 J	<1	<1	<1
Trichloroethene		µg/L	14.7	19.3	14.5	8.07	19.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107B

Analyte	Unit	Sample Name: MW-107-125B Sample Date: 12/21/2001	MW-107,153 2/20/2005	MW-107B-LB-1 10/17/2006	MW-107B-LA-5 10/2/2007	MW-107B 4/9/2008	MW-107B 10/10/2008
Carbon tetrachloride	µg/L	0.52 J	0.31 J	<1	0.415 J	0.574 J	<1
Chloroform	µg/L	0.14 J	<1	<0.3	<0.3	0.262 J	0.32 J
cis-1,2-Dichloroethene	µg/L	0.34 J	<1	<1	<1	0.265 J	0.449 J
Tetrachloroethene	µg/L	0.95 J	0.21 J	0.377 J	0.476 J	0.291 J	0.965 J
Trichloroethene	µg/L	2.8	0.57 J	0.585 J	0.95 J	1.56	1.8 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107B

Analyte	Sample Name / Sample Date	Unit	MW-107B 10/7/2009	MW-107B 10/13/2010	MW-107B 10/8/2011	MW-107B 4/23/2012	MW-107B 10/21/2012	MW-107B 4/11/2013	MW-107B 10/12/2013	MW-107B 4/25/2014
Carbon tetrachloride		µg/L	0.773 J	0.629	0.655 J	0.966 J	0.719 J	0.431 J	0.459 J	0.358 J
Chloroform		µg/L	0.238 J	0.375	0.308	0.492 B	0.422	0.272 J	0.328	0.293 J
cis-1,2-Dichloroethene		µg/L	<1	0.252 J	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	3.36	4.22	32.1	62.5	46.5	20.3	25.1 J	9.09
Trichloroethene		µg/L	2.12	2.2	2.86	4.15	3.47	2.44	2.72	1.66
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107B

	Sample Name	MW-107B	MW-107B	MW-107B	MW-107B	MW-107B	MW-107B
	Sample Date	10/20/2014	10/8/2015	4/22/2016	10/14/2016	4/20/2017	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.317 J	0.678 J	0.302 J	0.37 J	0.251 J	<1
Chloroform	µg/L	0.306	0.218 J	0.192 J	0.283 J	0.202 J	0.562
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	6.31	46.7	38.5	81.9	50.2	5.43
Trichloroethene	µg/L	1.6	1.66	1.26	1.78	1.25	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107T

	Sample Name	MW-107-147	MW-107	MW-107,135.5	MW-107T-LB-1	MW-107T	MW-107T
	Sample Date	12/21/2001	5/26/2004	2/20/2005	10/17/2006	4/9/2008	10/10/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.6 J	0.28 J	0.34 J	<1	0.616 J	<1
Chloroform	µg/L	0.16 J	<1	<1	<0.3	0.324	0.287 J
cis-1,2-Dichloroethene	µg/L	0.29 J	0.25 J	<1	<1	0.283 J	0.385 J
Tetrachloroethene	µg/L	0.67 J	<1	0.32 J	0.564 J	0.411 J	1.93
Trichloroethene	µg/L	2.6	0.7 J	0.63 J	0.999 J	1.67	2.11
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107T

Analyte	Sample Name / Sample Date	Unit	MW-107T 10/7/2009	MW-107T 10/13/2010	MW-107T 10/8/2011	MW-107T 4/23/2012	MW-107T 10/21/2012	MW-107T 4/11/2013	MW-107T 10/12/2013	MW-107T 4/25/2014
Carbon tetrachloride		µg/L	0.787 J	0.6	0.704 J	0.815 J	0.579 J	0.66 J	0.402 J	0.379 J
Chloroform		µg/L	0.239 J	0.357	0.3 J	0.392 B	0.391	0.389	0.31	0.283 J
cis-1,2-Dichloroethene		µg/L	0.257 J	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	5.05	4.26	31.7	47	36.5	54	18.3	7.89
Trichloroethene		µg/L	2.51	2.17 B	2.84	3.44	3.17	3.72	2.08	1.63
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-107T

Analyte	Sample Name / Sample Date	Unit	MW-107T 10/20/2014	MW-107T 4/10/2015	MW-107T 10/8/2015	MW-107T 4/22/2016	MW-107T 10/14/2016	MW-107T 4/20/2017	MW-107T 10/8/2017
Carbon tetrachloride		µg/L	<1	0.364 J	0.718 J	<1	0.283 J	0.26 J	<1
Chloroform		µg/L	0.227 J	0.264 J	0.241 J	0.227 J	0.275 J	0.195 J	0.607
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	6.52	21	51.5	50.4	77.5	43.1	8.8
Trichloroethene		µg/L	1.49	1.73	1.81	1.55	1.78	1.11	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-108

Analyte	Sample Name / Sample Date	Unit	MW-108 12/21/2001	MW-108 5/25/2004	MW-108 2/22/2005	MW-108-LB-1 10/24/2006	MW-108-LS-3 4/16/2007	MW-108 10/1/2007	MW-108 4/7/2008
Carbon tetrachloride		µg/L	<1	0.19 J	0.26 J	<1	<1	0.461 J	0.477 J
Chloroform		µg/L	6.4	8.2	6.9	11.7	10.8	12.1	11.7
cis-1,2-Dichloroethene		µg/L	0.18 J	0.46 J	0.33 J	0.75 J	0.634 J	0.71 J	0.647 J
Tetrachloroethene		µg/L	2.6	3.3	3.3	5.41	6.03	5.03	3.93
Trichloroethene		µg/L	6.4	15	28	32	33.5	38.4 J	32.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-108

Analyte	Sample Name / Sample Date	Unit	MW-108 10/10/2008	MW-108 4/7/2009	MW-108 10/5/2009	MW-108 4/1/2010	MW-108 10/12/2010	MW-108 4/1/2011	MW-108 10/6/2011	MW-108 4/23/2012
Carbon tetrachloride		µg/L	0.272 J	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	12.3 J	10.1	9.44	9.62	11.9	11.9	11.6	9.86
cis-1,2-Dichloroethene		µg/L	0.598 J	0.674 J	0.584 J	0.627 J	0.744 J	0.677 J	0.619 J	0.646 J
Tetrachloroethene		µg/L	3.72 J	4.49	4.39	4.29	5.23	7.25	6.06	3.61
Trichloroethene		µg/L	28.5 J	28.1	29.1	34.7	37.7	33.1	26	25.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-108

Analyte	Sample Name / Sample Date	Unit	MW-108 10/21/2012	MW-108 4/11/2013	MW-108 10/12/2013	MW-108 4/25/2014	MW-108 10/20/2014	MW-108 4/9/2015	MW-108 10/8/2015	MW-108 4/22/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	0.323 J	<1
Chloroform		µg/L	10.1	8.95	9.41	9.14	10.7	8.56	8.57	6.6
cis-1,2-Dichloroethene		µg/L	0.927 J	0.733 J	0.842 J	0.762 J	0.77 J	0.909 J	0.851 J	0.764 J
Tetrachloroethene		µg/L	2.67	2.75	3.76	3.4	3.69	6.42	7.33	7.85
Trichloroethene		µg/L	31.5	28.7	30.3	27.7	31.2	31.6	30.2	22.5
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-108

	Sample Name	MW-108	MW-108	MW-108
	Sample Date	10/14/2016	4/20/2017	10/7/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	5.41	3.68	3.89
cis-1,2-Dichloroethene	µg/L	0.596 J	0.474 J	0.369 J
Tetrachloroethene	µg/L	6.25	4.01	3.3
Trichloroethene	µg/L	16.7	10.8	9.76
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW-113-EBT-B-99.5-104.5	MW113-EBT-TS1-99.5-104.5	MW113-EBT-TS2-99.5-104.5	MW113-EBT-TS3-99.5-104.5	MW113-EBT-TS4-99.5-104.5
	Sample Date	5/20/2002	7/8/2002	7/29/2002	9/3/2002	10/7/2002
Analyte	**Unit**					
Carbon tetrachloride	µg/L	30	50	69.1	60.7	64.5
Chloroform	µg/L	76	79	98	90.6	83.2
cis-1,2-Dichloroethene	µg/L	44	48	55.5	59.9	92.4
Tetrachloroethene	µg/L	30	45	59.3	112	80.4
Trichloroethene	µg/L	15	20	26.7	29.4	28
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW113-EBT-TS5-99.5-104.5	MW113-EBT-TS6-99.5-104.5	MW113-EBT-TS7-99.5-104.5	MW113-EBT-TS9-99.5-104.5	MW113-EBT-TS10-99.5-104.5
	Sample Date	11/11/2002	12/16/2002	1/20/2003	3/24/2003	4/21/2003
Analyte	**Unit**					
Carbon tetrachloride	µg/L	59	69.6 J	71.6	50.8	53.2 J
Chloroform	µg/L	78.2	87.6	93.8	70.8	81
cis-1,2-Dichloroethene	µg/L	77.3	83.4	94.1	69.7	71.2
Tetrachloroethene	µg/L	97	96.9	91.1	48.7	49.4
Trichloroethene	µg/L	31.6	32.7	30.4	23.3	21.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW113-EBT-TS11-99.5-104.5	MW113-EBT-TS12-99.5-104.5	MW113-EBT-TS13-99.5-104.5	MW113-EBT-TS14-99.5-104.5	MW-113	MW-113
	Sample Date	5/19/2003	6/23/2003	7/21/2003	8/18/2003	5/24/2004	11/14/2004
Analyte	**Unit**						
Carbon tetrachloride	µg/L	26	43.6 J	38	42.7	20	44
Chloroform	µg/L	84.4	89.8	89.7	80.4	27	34
cis-1,2-Dichloroethene	µg/L	71.6	93.9	102 J	109	100	110
Tetrachloroethene	µg/L	27.5	54.5	56.1	63.6	64	100
Trichloroethene	µg/L	15.3	19.7	19.3	18.5	8.8	15
Vinyl chloride	µg/L	<1	<1	<1	<1	<5	<5

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW-113	MW-113	MW-113-LB-1	MW-113-LS-3	MW-113	MW-113	MW-113
	Sample Date	2/24/2005	5/20/2005	10/23/2006	4/16/2007	10/4/2007	4/7/2008	10/8/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	49	47	75.6	89.1	96.9	75.1	110
Chloroform	µg/L	39	36	33.8	35.9	36.4	30.9	45.3
cis-1,2-Dichloroethene	µg/L	87	78	54.9	46.3	50.2	37.8	59.6
Tetrachloroethene	µg/L	130	130	182	163	151	170	156 J
Trichloroethene	µg/L	21	22	25.9	24.1	26	20.2	28.9
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

Analyte	Sample Name / Sample Date	Unit	MW-113 4/9/2009	MW-113 10/10/2009	MW-113 3/30/2010	MW-113 10/14/2010	MW-113 4/3/2011	MW-113 10/3/2011	MW-113 4/21/2012	MW-113 10/22/2012
Carbon tetrachloride		µg/L	101	67.4	72.2	77.3	63.5	65.8	60.6	65.6
Chloroform		µg/L	39	29.5	26.5	24.3	16.9	16.2	13.4	16.4
cis-1,2-Dichloroethene		µg/L	57.1	49.5	37.1	29.7	25.1	26.2	22.2	28.6
Tetrachloroethene		µg/L	192	200	191	149	157	189	150	166
Trichloroethene		µg/L	29.5	26.7	23.2	19.9	17.6	18	16.9	18.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW-113	MW-113	MW-113	MW-113	MW-113	MW-113	MW-113	MW-113
	Sample Date	2/8/2013	5/10/2013	8/13/2013	11/6/2013	2/10/2014	5/13/2014	8/11/2014	11/11/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	15.6	<5	<20	<10	<10	<10 UJ	<5	<5 UJ
Chloroform	µg/L	7.25	3.12	<6	<3	<3	2.86 J	<1.5	<1.5 UJ
cis-1,2-Dichloroethene	µg/L	95	169	88.9	88.1	81.6	135 J	119	133 J
Tetrachloroethene	µg/L	54.7	12.5	12.6 J	11.3	5.69 J	6.95 J	3.59 J	3.35 J
Trichloroethene	µg/L	6.78	2.6 J	5.09 J	3.09 J	<10	<10 UJ	2.27 J	3.11 J
Vinyl chloride	µg/L	<5	<5	<20	<10	<10	<10 UJ	<5	<5 UJ

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-113

	Sample Name	MW-113	MW-113	MW-113	MW-113
	Sample Date	4/21/2016	10/15/2016	4/19/2017	10/7/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	1.08	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	77.9	92.1	54.8	40.3
Tetrachloroethene	µg/L	8.23	<1	<1	0.663 J
Trichloroethene	µg/L	3.98	<1	<1	<1
Vinyl chloride	µg/L	18.9	24.8	36.9	28.3

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-140

Analyte	Sample Name / Sample Date	Unit	MW-140 5/27/2004	MW-140 11/10/2004	MW-140 2/17/2005	MW-140 5/17/2005	MW-140-LB-1 10/23/2006	MW-140-LA-5 10/2/2007	MW-140 10/9/2008
Carbon tetrachloride		µg/L	<1	0.48 J	0.44 J	0.92 J	0.313 J	<1	<1
Chloroform		µg/L	0.42 J	0.21 B	0.18 J	0.16 B	0.162 J	0.16 J	0.259 J
cis-1,2-Dichloroethene		µg/L	<1	0.28 J	0.22 J	0.22 J	<1	<1	<1
Tetrachloroethene		µg/L	<1	0.38 J	0.42 J	0.42 J	0.424 J	0.59 J	0.933 J
Trichloroethene		µg/L	0.54 J	1.4	1.4	1.3	1.49	1.19	1.41
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-140

Analyte	Sample Name / Sample Date	Unit	MW-140 10/12/2009	MW-140 10/13/2010	MW-140 10/3/2011	MW-140 10/20/2012	MW-140 10/11/2013	MW-140 10/19/2014	MW-140 10/7/2015	MW-140 10/13/2016
Carbon tetrachloride		µg/L	0.558 J	<1	0.27 J	0.313 J	0.391 J	0.27 J	0.697 J	0.323 J
Chloroform		µg/L	0.205 J	0.242 J	<0.3	0.146 J	0.219 J	0.159 J	0.207 J	0.212 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	0.294 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.806 J	1.18	1.19	2.51	2.8	3.76	6.03	5.85
Trichloroethene		µg/L	1.25	0.971 J	1.43	1.6	1.73	1.19	1.24	1.29
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-140

	Sample Name	MW-140	MW-140
	Sample Date	4/21/2017	10/8/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	0.302 J
Chloroform	µg/L	0.162 J	0.185 J
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	10.9	11.8
Trichloroethene	µg/L	1.26	1.12
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-141

	Sample Name	MW-141	MW-141	MW-141	MW-141	MW-141-LB-1	MW-141-LS-3	MW-141
	Sample Date	6/24/2004	11/9/2004	2/15/2005	5/17/2005	10/23/2006	4/17/2007	10/2/2007
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	0.82 J	<1	<1	<1
Chloroform	µg/L	1.4	1.5 B	1.8	2 B	2.37	2.46	2.09
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.9	19	26	31	27.6	21.3	18
Trichloroethene	µg/L	1.2	2.1	2.2	2.8	3.56	3.02	2.52
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-141

Analyte	Sample Name / Sample Date	Unit	MW-141 4/8/2008	MW-141 10/10/2008	MW-141 4/9/2009	MW-141 10/5/2009	MW-141 4/2/2010	MW-141 10/8/2010	MW-141 4/1/2011	MW-141 10/2/2011
Carbon tetrachloride		µg/L	0.418 J	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	2.31	2.48 J	1.85	1.78	1.54	2.06	2.67	2.68
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	16.9	19.7 J	15.7	17.1	16.6	19.6	30.4	23.7
Trichloroethene		µg/L	2.47	3.24 J	2.48	3.02	2.58	3.18	3.86	3.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-141

Analyte	Sample Name / Sample Date	Unit	MW-141 4/23/2012	MW-141 10/20/2012	MW-141 4/10/2013	MW-141 10/11/2013	MW-141 4/26/2014	MW-141 10/19/2014	MW-141 4/9/2015	MW-141 10/7/2015
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	0.418 J
Chloroform		µg/L	2.58	3.04	3.24	3.36	3.06	3.13	2.91	2.79
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	0.279 J
Tetrachloroethene		µg/L	24.9	27.4	31.9 J	31.9	34.7	36	34.3	41
Trichloroethene		µg/L	3.46	3.68	4.32	4.22	3.86	4.19	4.6	5.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-141

Analyte	Sample Name / Sample Date / Unit	MW-141 4/23/2016	MW-141 10/13/2016	MW-141 4/21/2017	MW-141 10/8/2017
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	2.54	2.42	2.11	1.86
cis-1,2-Dichloroethene	µg/L	<1	0.252 J	0.253 J	<1
Tetrachloroethene	µg/L	30.4	32.3	31.7	27.1
Trichloroethene	µg/L	4.64	5.4	5.65	4.39
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-142

Analyte	Sample Name / Sample Date	Unit	MW-142 5/26/2004	MW-142 11/9/2004	MW-142 2/16/2005	MW-142 5/17/2005	MW-142-LB-1 10/2/2006	MW-142-LA-5 10/3/2007	MW-142 10/8/2008
Carbon tetrachloride		µg/L	<1	0.36 J	<1	0.77 J	<1	<1	<1
Chloroform		µg/L	<1	0.25 B	0.17 B	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.3 J	1.4	0.65 J	0.39 J	0.371 J	0.709 J	1.61
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-142

Analyte	Sample Name / Sample Date	Unit	MW-142 10/8/2009	MW-142 10/9/2010	MW-142 10/9/2011	MW-142 10/20/2012	MW-142 10/11/2013	MW-142 10/19/2014	MW-142 10/7/2015	MW-142 10/13/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.128 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.74	6.71	11	4.16	5.77	6.38	5.91	5.26
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-142

	Sample Name	MW-142
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	<1
Trichloroethene	µg/L	4.24
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-143

Analyte	Sample Name / Sample Date	Unit	MW-143 5/5/2004	MW-143 11/11/2004	MW-143 2/17/2005	MW-143 5/17/2005	MW-143 10/19/2006	MW-143 10/13/2008	MW-143 10/12/2010	MW-143 4/5/2011
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1 J	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1 J	<1	<1
Tetrachloroethene		µg/L	<1	<1 J	<1	<1	<1	<1 J	<1	<1
Trichloroethene		µg/L	<1	<1	<1	0.31 J	0.7 J	1.19 J	8.83	10.1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1 J	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-143

Analyte	Sample Name / Sample Date	Unit	MW-143 10/7/2011	MW-143 4/23/2012	MW-143 10/19/2012	MW-143 4/11/2013	MW-143 10/12/2013	MW-143 4/26/2014	MW-143 10/19/2014	MW-143 4/8/2015
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	0.431 J	0.368 J	0.384 J	0.353 J	0.38 J	0.408 J	0.5 J
Trichloroethene		µg/L	12.6	12.5	13.5	12.7	10	9.89	9.52	9.15
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-143

Analyte	Sample Name / Sample Date	Unit	MW-143 10/8/2015	MW-143 4/23/2016	MW-143 10/13/2016	MW-143 4/21/2017	MW-143 10/10/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.476 J	0.428 J	0.363 J	0.417 J	0.399 J
Trichloroethene		µg/L	8.17	7.76	6.87	6.43	6.71
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197A

Analyte	Sample Name / Sample Date	Unit	MW-197A 10/24/2006	MW-197A 1/24/2007	MW-197A 4/13/2007	MW-197A 7/9/2007	MW-197A 10/3/2007	MW-197A 4/8/2008	MW-197A 10/6/2008	MW-197A 4/6/2009
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.237 J	0.226 J	0.212 J	0.208 J	0.179 J	0.185 J	0.174 J	0.13 J
cis-1,2-Dichloroethene		µg/L	0.447 J	0.345 J	0.432 J	0.419 J	0.445 J	1.48	3.13	3.69
Tetrachloroethene		µg/L	130	125	114	103	87.3	82.8	54.8	42.1
Trichloroethene		µg/L	2.04	2.04	2.28	2.31	2.42	2.42	2.4	2.09
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197A

Analyte	Sample Name / Sample Date	Unit	MW-197A 10/6/2009	MW-197A 4/2/2010	MW-197A 10/11/2010	MW-197A 4/2/2011	MW-197A 10/5/2011	MW-197A 4/20/2012	MW-197A 10/21/2012	MW-197A 2/8/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.187 J	<0.3	<0.3	<0.3	0.126 J	<0.3	0.139 J	0.138
cis-1,2-Dichloroethene		µg/L	2.57	2.22	1.84	1.64	1.26	0.926 J	0.798 J	0.771
Tetrachloroethene		µg/L	33.8	34	35	32.8	32.2 J	31	27.7	24.8
Trichloroethene		µg/L	2.04	1.81	1.72	1.51	1.51	1.52	1.34	1.27
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197A

Analyte	Sample Name / Sample Date	Unit	MW-197A 5/11/2013	MW-197A 8/19/2013	MW-197A 11/7/2013	MW-197A 2/10/2014	MW-197A 5/10/2014	MW-197A 8/10/2014	MW-197A 11/9/2014	MW-197A 4/25/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	0.147 J	<0.3	<0.3	0.141 J
cis-1,2-Dichloroethene		µg/L	0.738 J	0.79 J	0.736 J	0.76 J	0.851 J	0.762 J	0.758 J	0.619 J
Tetrachloroethene		µg/L	21.6	21.7	20.9	22.4	22.1	19.2	21.3	15.7
Trichloroethene		µg/L	1.17	1.36	1.26	1.32	1.28	1.1	1.25	1.12
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197A

	Sample Name	MW-197A	MW-197A	MW-197A
	Sample Date	10/14/2016	4/19/2017	10/7/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.16 J	<0.3	0.131 J
cis-1,2-Dichloroethene	µg/L	0.69 J	0.659 J	0.638 J
Tetrachloroethene	µg/L	20.6	18.9	17.9
Trichloroethene	µg/L	1.19	1.08	0.845 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197B

	Sample Name	MW-197B-LB-1	MW-197B-RW-2	MW-197B-LS-3	MW-197B-LQ-4	MW-197B-LA-5	MW-197B
	Sample Date	10/2/2006	1/24/2007	4/13/2007	7/9/2007	10/3/2007	4/8/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.227 J	0.208 J	<0.3	0.166 J	<0.3
cis-1,2-Dichloroethene	µg/L	0.625 J	0.484 J	0.792 J	5.29	10.7	47.6
Tetrachloroethene	µg/L	179	166	138	134	105 J	38.6
Trichloroethene	µg/L	8.51	8.76	9.11	10.2	10.3	9.01
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197B

Analyte	Sample Name / Sample Date	Unit	MW-197B 10/6/2008	MW-197B 4/6/2009	MW-197B 10/6/2009	MW-197B 4/2/2010	MW-197B 10/11/2010	MW-197B 4/2/2011	MW-197B 10/5/2011	MW-197B 4/21/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	48.7	38.2	25.9	16.6	9.66	8.85	5.27	3.53
Tetrachloroethene		µg/L	16.7	20.2	24.1	26.8	34.1	31.5	29.7	28.5
Trichloroethene		µg/L	9.77	12.6	12.3	10.9	10.2	10	9.4	10.3
Vinyl chloride		µg/L	<1	0.684 J	3.09	7.24	3.99 J	3.25 J	1.86	0.732 J

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197B

Analyte	Sample Name / Sample Date	Unit	MW-197B 10/21/2012	MW-197B 2/8/2013	MW-197B 5/11/2013	MW-197B 8/19/2013	MW-197B 11/7/2013	MW-197B 2/10/2014	MW-197B 5/10/2014	MW-197B 8/10/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	4.6	3.83	3.81	6.12	8.41	6.66	10.5	6.75
Tetrachloroethene		µg/L	27.1	25	21.1	19.1	16.4	16.5	11.6	12
Trichloroethene		µg/L	11	10.6	11.2	11.6	10.1	10.9	8.82	9
Vinyl chloride		µg/L	1.41	1.05	1.31	1.38	2.06	1.46	1.81	1.15

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-197B

	Sample Name	MW-197B	MW-197B	MW-197B	MW-197B	MW-197B
	Sample Date	11/9/2014	4/25/2016	10/14/2016	4/19/2017	10/7/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.93	8.22	1.15	3.32	1.31
Tetrachloroethene	µg/L	22.2 J	6.27	12.6	6.25	12.6
Trichloroethene	µg/L	14	9.49	13.1	11.2	14.9
Vinyl chloride	µg/L	<1	1.62	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-198

	Sample Name	MW-198-LB-1	MW-198-RW-2	MW-198-LS-3	MW-198-LQ-4	MW-198-LA-5	MW-198
	Sample Date	10/2/2006	1/24/2007	4/15/2007	7/10/2007	10/2/2007	4/9/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	0.915 J	0.32 J	0.267 J	0.438 J	0.326 J
Chloroform	µg/L	<0.3	0.2 J	0.146 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.28	25.8	20.2	15.1	6.53	8.36
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-198

Analyte	Sample Name / Sample Date	Unit	MW-198 10/8/2008	MW-198 4/9/2009	MW-198 10/12/2009	MW-198 10/8/2010	MW-198 10/8/2011	MW-198 10/20/2012	MW-198 10/11/2013	MW-198 10/19/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.171 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	10.4 J	3.73	8.39	3.14	0.44 J	2.63	1.06	0.643 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-198

	Sample Name	MW-198	MW-198	MW-198
	Sample Date	10/7/2015	10/14/2016	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.258 J	<1
Trichloroethene	µg/L	0.859 J	1.02	1.65
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199A

	Sample Name	MW-199A-LB-1	MW-199A-RW-2	MW-199A-LS-3	MW-199A-LQ-4	MW-199A-LA-5	MW-199A
	Sample Date	10/23/2006	1/24/2007	4/13/2007	7/12/2007	10/2/2007	10/9/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.126 J	<0.3	<0.3	0.132 J	<0.3	0.137 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	0.361 J	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199A

	Sample Name	MW-199A	MW-199A	MW-199A	MW-199A	MW-199A	MW-199A	MW-199A	MW-199A
	Sample Date	10/5/2009	10/7/2010	10/3/2011	10/20/2012	10/11/2013	10/19/2014	10/7/2015	10/13/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.419 J	0.968 J	0.963 J	1	0.986 J	2.01	4.23	5.19
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199A

	Sample Name	MW-199A
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	<1
Trichloroethene	µg/L	6.08
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199B

	Sample Name	MW-199B-LB-1	MW-199B-RW-2	MW-199B-LS-3	MW-199B-LQ-4	MW-199B-LA-5	MW-199B
	Sample Date	10/23/2006	1/24/2007	4/13/2007	7/11/2007	10/2/2007	4/8/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.719 J	0.949 J	0.555 J	1.05	0.376 J	0.6 J
Chloroform	µg/L	0.197 J	0.179 J	0.232 J	0.279 J	0.146 J	0.177 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.632 J	0.497 J	0.715 J	0.517 J	0.393 J	23.4
Trichloroethene	µg/L	99.2 J	115	115	136	78.6	56.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199B

Analyte	Sample Name / Sample Date	Unit	MW-199B 10/9/2008	MW-199B 4/9/2009	MW-199B 10/7/2009	MW-199B 4/2/2010	MW-199B 10/8/2010	MW-199B 4/2/2011	MW-199B 10/3/2011	MW-199B 4/23/2012
Carbon tetrachloride		µg/L	<1	0.476 J	0.324 J	0.378 J	0.287 J	0.545 J	0.324 J	0.379 J
Chloroform		µg/L	0.24 J	0.217 J	0.158 J	0.154 J	<0.3	<0.3	<0.3	0.159 JB
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.612 J	0.494 J	0.694 J	0.511 J	0.707 J	0.567 J	0.881 J	0.412 J
Trichloroethene		µg/L	124	115	93.2	87.5	53.8	71.5	59.7	76.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199B

Analyte	Sample Name / Sample Date	Unit	MW-199B 10/20/2012	MW-199B 4/10/2013	MW-199B 10/11/2013	MW-199B 4/26/2014	MW-199B 10/19/2014	MW-199B 4/9/2015	MW-199B 10/7/2015	MW-199B 4/22/2016
Carbon tetrachloride		µg/L	0.386 J	0.328 J	0.307 J	<1	0.29 J	0.307 J	0.271 J	<1
Chloroform		µg/L	<0.3	0.138 J	0.149 J	<0.3	0.157 J	0.176 J	0.177 J	0.216 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	1.33	14.1
Tetrachloroethene		µg/L	0.676 J	0.258 J	0.545 J	<1	0.432 J	0.38 J	<1	<1
Trichloroethene		µg/L	84.9	84.1	74.6	67.9	74.6	77.1	71.7	52.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-199B

	Sample Name	MW-199B	MW-199B	MW-199B
	Sample Date	10/13/2016	4/21/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.205 J	0.225 J	0.242 J
cis-1,2-Dichloroethene	µg/L	<1	0.396 J	0.737 J
Tetrachloroethene	µg/L	0.285 J	0.264 J	0.295 J
Trichloroethene	µg/L	59.8	50.3	51
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-200

	Sample Name	MW-200A-LB-1	MW-200-RW-2	MW-200-LS-3	MW-200-LQ-4	MW-200-LA-5	MW-200-LQ-6
	Sample Date	10/25/2006	1/24/2007	4/15/2007	7/10/2007	10/3/2007	4/8/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.146 J	<0.3	<0.3	0.206 J
cis-1,2-Dichloroethene	µg/L	0.466 J	0.303 J	0.532 J	0.543 J	0.419 J	0.345 J
Tetrachloroethene	µg/L	72	81.9	70.2	62.9	73.9	132
Trichloroethene	µg/L	5.47	5.94	7.49	7.49	6.88	4.13
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-200

	Sample Name	MW-200-LB-8	MW-200	MW-200	MW-200	MW-200	MW-200	MW-200	MW-200
	Sample Date	10/6/2008	4/7/2009	10/10/2009	3/29/2010	10/11/2010	4/1/2011	10/4/2011	4/23/2012
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.175 J	<0.3	<0.3	0.157 J	<0.3	<0.3	<0.3	0.159 JB
cis-1,2-Dichloroethene	µg/L	0.531 J	5.68	11.6	8.57	16.7	13	15.3	2.98
Tetrachloroethene	µg/L	125	74.7	25.6	23.8	31.5	31.8	25.6	3
Trichloroethene	µg/L	3.42	4.82	8.04	7.99	7.24	6.66	5.05	3.94
Vinyl chloride	µg/L	<1	<1	<1	<1	<1 J	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-200

Analyte	Sample Name / Sample Date	Unit	MW-200 10/20/2012	MW-200 4/10/2013	MW-200 10/12/2013	MW-200 4/25/2014	MW-200 10/20/2014	MW-200 4/9/2015	MW-200 10/8/2015	MW-200 4/21/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	0.136 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	3.08	2.69	1.8	0.631 J	0.351 J	0.63 J	1.28	0.497 J
Tetrachloroethene		µg/L	11.8	8.74	7.75	13.7	7.91	9.67	9.31	8.42
Trichloroethene		µg/L	7.14	8.06	6.17	6.65	6.16	5.61	5.04	3.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-200

	Sample Name	MW-200	MW-200	MW-200
	Sample Date	10/15/2016	4/20/2017	10/7/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.722 J	0.737 J	1.42
Tetrachloroethene	µg/L	5.77	5.15	4.88
Trichloroethene	µg/L	3.95	3.91	4.5
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202A

	Sample Name	MW-202A-LB-1	MW-202A-RW-2	MW-202A-LS-3	MW-202A-LQ-4	MW-202A-LA-5	MW-202A
	Sample Date	10/23/2006	1/24/2007	4/16/2007	7/11/2007	10/1/2007	4/7/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.365 J	0.749 J	0.382 J	0.904 J	0.552 J	0.695 J
Chloroform	µg/L	0.232 J	0.198 J	0.213 J	0.249 J	0.238 J	0.225 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	0.251 J	<1	<1
Tetrachloroethene	µg/L	0.257 J	0.326 J	0.316 J	0.371 J	0.672 J	0.443 J
Trichloroethene	µg/L	1.85	1.59	1.88	2.22	1.66	1.77
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202A

	Sample Name	MW-202A	MW-202A	MW-202A	MW-202A	MW-202A	MW-202A	MW-202A	MW-202A
	Sample Date	10/7/2008	4/7/2009	10/6/2009	10/9/2010	10/1/2011	10/20/2012	10/11/2013	10/19/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	0.466 J	<1	0.265 J	<1	<1	<1
Chloroform	µg/L	0.17 J	0.171 J	<0.3	0.21 J	0.222 J	0.23 J	0.216 J	0.206 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.262 J	0.399 J	0.294 J	1	1.56	2.28	2.26	2.35
Trichloroethene	µg/L	1.21	1.35	1.45	1.43	1.5	1.57	1.83	1.72
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202A

	Sample Name	MW-202A	MW-202A	MW-202A	MW-202A
	Sample Date	10/8/2015	10/13/2016	4/21/2017	10/8/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	0.445 J	<1	<1	<1
Chloroform	µg/L	0.169 J	0.193 J	0.167 J	0.187 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	4.17	6.94	5.16	4
Trichloroethene	µg/L	1.26	1.24	1.05	0.903 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202B

	Sample Name	MW-202B-LB-1	MW-202B-RW-2	MW-202B-LS-3	MW-202B-LQ-4	MW-202B-LA-5	MW-202B
	Sample Date	10/24/2006	1/24/2007	4/16/2007	7/11/2007	10/2/2007	4/9/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	0.263 J
Chloroform	µg/L	0.778	0.857	0.752	1.05	0.907	1.46
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.51	8.42	8.6	8.16	3.82	16.3
Trichloroethene	µg/L	0.811 J	1.27	1.46	2.2	1.36	2.21
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202B

	Sample Name	MW-202B	MW-202B	MW-202B	MW-202B	MW-202B	MW-202B	MW-202B	MW-202B
	Sample Date	10/7/2008	4/7/2009	10/6/2009	4/6/2010	10/9/2010	4/2/2011	10/1/2011	4/23/2012
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	0.506 J	<1	<1	0.45 J	0.31 J	0.297 J
Chloroform	µg/L	1.92	1.96	1.92	1.81	1.46	1.24	0.712	0.655 B
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	0.299 J	0.477 J	0.411 J	0.485 J
Tetrachloroethene	µg/L	21.3	19.5	18.6	21.4	23.1	26.6	27.1	10.9
Trichloroethene	µg/L	2.57	3.3	3.79	3.78	3.43	4.98	5.13	4.83
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202B

Analyte	Sample Name / Sample Date	Unit	MW-202B 10/20/2012	MW-202B 4/11/2013	MW-202B 10/11/2013	MW-202B 4/26/2014	MW-202B 10/19/2014	MW-202B 4/8/2015	MW-202B 10/8/2015	MW-202B 4/23/2016
Carbon tetrachloride		µg/L	0.353 J	0.364 J	0.416 J	0.417 J	0.439 J	0.607 J	0.945 J	0.561 J
Chloroform		µg/L	0.606	0.534	0.539	0.516	0.521	0.578	0.573	0.538
cis-1,2-Dichloroethene		µg/L	0.401 J	0.379 J	0.332 J	0.278 J	<1	0.284 J	<1	<1
Tetrachloroethene		µg/L	21.3	23.8	25.5	27.1	22	29.5	32.1	32
Trichloroethene		µg/L	5.11	5.16	4.78	4.19	4.06	4.52	4.07	3.48
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-202B

	Sample Name	MW-202B	MW-202B	MW-202B
	Sample Date	10/13/2016	4/21/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	0.501 J	0.534 J	0.458 J
Chloroform	µg/L	0.515	0.427	0.392
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	35.5	35.9	36.8
Trichloroethene	µg/L	3.72	3.37	3.37
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203A

	Sample Name	MW-203A	MW-203A-LQ-4	MW-203A-LA-5	MW-203A-LQ-6	MW-203A	MW-203A	MW-203A
	Sample Date	4/17/2007	7/9/2007	10/3/2007	1/8/2008	4/8/2008	10/6/2008	4/9/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1 J	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.128 J	0.172 J	0.206 J	0.201 J	0.203 J
cis-1,2-Dichloroethene	µg/L	<1	<1	0.294 J	0.972 J	1.14	1.2	1.68
Tetrachloroethene	µg/L	62.6	69.1 J	86.8	108	144	143	170
Trichloroethene	µg/L	1.27	1.46	1.69	1.93	2.03	2.11	2.23
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203A

	Sample Name	MW-203A	MW-203A	MW-203A	MW-203A	MW-203A	MW-203A	MW-203A	MW-203A
	Sample Date	10/6/2009	4/2/2010	10/9/2010	4/3/2011	10/5/2011	4/20/2012	10/21/2012	2/8/2013
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.158 J	0.185 J	<0.3	<0.3	<0.3	0.284 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	3.38	4.11	5.32	5.27	5.75	5.78	8.54	8.36
Tetrachloroethene	µg/L	149	162	143	147	147	127	118	51
Trichloroethene	µg/L	2.34	2.43	2.55	2.8	2.72	2.78	2.89	8.56
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	0.333

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203A

Analyte	Sample Name / Sample Date	Unit	MW-203A 5/9/2013	MW-203A 8/19/2013	MW-203A 11/7/2013	MW-203A 2/10/2014	MW-203A 5/10/2014	MW-203A 8/10/2014	MW-203A 11/9/2014	MW-203A 4/25/2016
Carbon tetrachloride		µg/L	<20	<5	<5	<10	<10 UJ	<10 UJ	<10	<10
Chloroform		µg/L	<6	<1.5	<1.5	<3	<3 UJ	<3 UJ	<3	<3
cis-1,2-Dichloroethene		µg/L	24.8	12.1	13.4	12.1	14.1 J	10.8 J	11.4	19.6
Tetrachloroethene		µg/L	19.8 J	4.41 J	7.94	3.25 J	3.47 J	<10 UJ	2.62 J	<10
Trichloroethene		µg/L	9 J	<5	<5	<10	<10 UJ	<10 UJ	<10	<10
Vinyl chloride		µg/L	7.98 J	<5	<5	<10	<10 UJ	<10 UJ	<10	<10

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203A

	Sample Name	MW-203A	MW-203A	MW-203A
	Sample Date	10/16/2016	4/19/2017	10/12/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	15.2	27.6	24.7
Tetrachloroethene	µg/L	0.523 J	<1	0.884 J
Trichloroethene	µg/L	<1	<1	1.42
Vinyl chloride	µg/L	<1	0.373 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203B

Analyte	Sample Name / Sample Date	Unit	MW-203B 4/27/2007	MW-203B-LQ-4 7/9/2007	MW-203B-LA-5 10/3/2007	MW-203B-LQ-6 1/8/2008	MW-203B 4/8/2008	MW-203B 10/6/2008	MW-203B 4/9/2009
Carbon tetrachloride		µg/L	<1 J	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	50.1	63.5	55	58.6	59.7	39.2	26.6
Tetrachloroethene		µg/L	38.4	21.1	13.9	9.39	10.8	19	21.1
Trichloroethene		µg/L	8.97	7.68	7.92	6.31	6.25	11.3	9.15
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	0.358 J	7.12

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203B

Analyte	Sample Name / Sample Date	Unit	MW-203B 10/6/2009	MW-203B 4/2/2010	MW-203B 10/11/2010	MW-203B 4/3/2011	MW-203B 10/5/2011	MW-203B 4/20/2012	MW-203B 10/21/2012	MW-203B 2/8/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	14.4	9.53	6.65	6.15	4.81	4.39	1.59	3.57
Tetrachloroethene		µg/L	24.8	31.8	31.9	30.6	23.2	24.8	11.1	17.6
Trichloroethene		µg/L	9.16	6.74	6.76	7.64	8.72	9.92	4.74	11.9
Vinyl chloride		µg/L	5.14	5.51	5.11 J	3.01	2.74	2.13	0.697 J	1.48

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203B

Analyte	Sample Name / Sample Date	Unit	MW-203B 5/11/2013	MW-203B 8/19/2013	MW-203B 11/7/2013	MW-203B 2/10/2014	MW-203B 5/10/2014	MW-203B 8/10/2014	MW-203B 11/9/2014	MW-203B 4/22/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1 UJ	<2.5 UJ	<10	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3 UJ	<0.75 UJ	<3	<0.3
cis-1,2-Dichloroethene		µg/L	16.6	12.7	11	26.1	25.4 J	11.8 J	12.6	10.9
Tetrachloroethene		µg/L	3.1	13.9	3.4	2.64	0.97 J	0.651 J	<10	3.35
Trichloroethene		µg/L	2.27	17.8	2.27	2.98	1.61 J	1.67 J	<10	3.29
Vinyl chloride		µg/L	2.64	2.66	2.26	1.79	1.13 J	1.65 J	<10	1.91

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-203B

	Sample Name	MW-203B	MW-203B	MW-203B
	Sample Date	10/14/2016	4/19/2017	10/10/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.191 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	37.1	47.7	18.7
Tetrachloroethene	µg/L	17.9	9	3.05
Trichloroethene	µg/L	31.7	22.7	11.6
Vinyl chloride	µg/L	<1	0.836 J	5.91

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204A

	Sample Name	MW-204A	MW-204A-LQ-4	MW-204A-LA-5	MW-204A-LQ-6	MW-204A	MW-204A
	Sample Date	4/23/2007	7/10/2007	10/2/2007	1/8/2008	4/7/2008	10/6/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.763 J	0.785 J	0.846 J	0.922 J	1.05	0.769 J
Tetrachloroethene	µg/L	38.8	36.2	37	42.7	44.6 J	42
Trichloroethene	µg/L	1.19	1.17	1.06	1.12	1.04	0.852 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204A

Analyte	Sample Name / Sample Date	Unit	MW-204A 4/7/2009	MW-204A 10/7/2009	MW-204A 4/6/2010	MW-204A 10/8/2010	MW-204A 4/2/2011	MW-204A 10/4/2011	MW-204A 4/23/2012	MW-204A 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	1.21	6.45	6.88	4.36	2.7	1.53	1.11	0.937 J
Tetrachloroethene		µg/L	47.4	39.2 J	37.3	47.2	46.8	50.2	42.7	47.9
Trichloroethene		µg/L	0.981 J	1.21	1.79	1.83	1.48	0.91 J	0.723 J	0.756 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204A

	Sample Name	MW-204A	MW-204A	MW-204A	MW-204A	MW-204A	MW-204A	MW-204A	MW-204A
	Sample Date	4/10/2013	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/22/2016	10/14/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.02	0.528 J	3.14	5.84	6.27	5.63	2.62	1.57
Tetrachloroethene	µg/L	40.2 J	38.6	29.9	23.2	21.2	24.1	27	28.4
Trichloroethene	µg/L	0.7 J	0.695 J	0.922 J	1.42	1.61	1.95	1.62	1.25
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204A

	Sample Name	MW-204A	MW-204A
	Sample Date	4/19/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.06	1.09
Tetrachloroethene	µg/L	27.4	30.1
Trichloroethene	µg/L	1.11	0.819 J
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204B

	Sample Name	MW-204B	MW-204B-LQ-4	MW-204B-LA-5	MW-204B-LQ-6	MW-204B	MW-204B
	Sample Date	4/23/2007	7/11/2007	10/2/2007	1/8/2008	4/9/2008	10/6/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.125 J	<0.3	<0.3	0.13	<0.3
cis-1,2-Dichloroethene	µg/L	0.906 J	0.916 J	1.05	2.3	1.39	1.26
Tetrachloroethene	µg/L	26.3	17.2	19	24.5	20.2	29.4
Trichloroethene	µg/L	2.37	4.88	4.7	3.2	4.27	2.53
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204B

Analyte	Sample Name / Sample Date	Unit	MW-204B 4/8/2009	MW-204B 10/6/2009	MW-204B 4/6/2010	MW-204B 10/11/2010	MW-204B 4/2/2011	MW-204B 10/4/2011	MW-204B 4/23/2012	MW-204B 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.177 J	<0.3	<0.3	0.166 J	<0.3	<0.3	0.134 J
cis-1,2-Dichloroethene		µg/L	1.29	6.13	2.33	1.11	1.25	0.793 J	0.937 J	1.08
Tetrachloroethene		µg/L	16.3	14.9	23.5	15.7	13.9	27.8	14.2	13.8
Trichloroethene		µg/L	4.98	4.95	3.71	5.35	5.92	2.99	4.23	5.33
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204B

	Sample Name	MW-204B	MW-204B	MW-204B	MW-204B	MW-204B	MW-204B	MW-204B	MW-204B
	Sample Date	4/10/2013	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/22/2016	10/14/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.161 J	<0.3	<0.3	<0.3	0.134 J	<0.3	0.126 J
cis-1,2-Dichloroethene	µg/L	0.805 J	0.998 J	2.73	3.41	2.61	1.69	0.339 J	0.458 J
Tetrachloroethene	µg/L	11.8	13.9	9.03	7	7.26	8.84	8.29	13.4
Trichloroethene	µg/L	5.03	4.64	6.25	7.42	7.87	8.52	4	7.68
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-204B

	Sample Name	MW-204B	MW-204B
	Sample Date	4/19/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.125 J	0.165 J
cis-1,2-Dichloroethene	µg/L	0.278 J	<1
Tetrachloroethene	µg/L	12.3	11.7
Trichloroethene	µg/L	8.99	9.3
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205A

	Sample Name	MW-205A	MW-205A-LQ-4	MW-205A-LA-5	MW-205A-LQ-6	MW-205A	MW-205A
	Sample Date	4/23/2007	7/10/2007	10/3/2007	1/8/2008	4/7/2008	10/9/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.238 J	0.222 J	0.185 J	0.165 J	0.212 J	0.223 J
cis-1,2-Dichloroethene	µg/L	0.337 J	0.465 J	0.538 J	3.12	1.14	9.58 J
Tetrachloroethene	µg/L	102	180	145	153	141	126 J
Trichloroethene	µg/L	3.69	5.84	6.25	6.14	6.02	7.56 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205A

Analyte	Sample Name / Sample Date	Unit	MW-205A 4/10/2009	MW-205A 10/5/2009	MW-205A 4/6/2010	MW-205A 10/8/2010	MW-205A 4/2/2011	MW-205A 10/4/2011	MW-205A 4/23/2012	MW-205A 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.132 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	16.8	23.5	31.8	25.2	24.6	13.4	9.21	8.84
Tetrachloroethene		µg/L	82.6	53.1	32.3	39.1	30.1	30.9	28.9	33.1
Trichloroethene		µg/L	7.12	7.28	7.77	9.03	9.18	8.03	7.04	8.38
Vinyl chloride		µg/L	<1	<1	<1	1.2	2.34 J	1.83	1.43	0.393 J

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205A

	Sample Name	MW-205A	MW-205A	MW-205A	MW-205A	MW-205A	MW-205A	MW-205A	MW-205A
	Sample Date	4/10/2013	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/22/2016	10/14/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	5.65	4.69	3.42	3.19	3.48	3.8	3.53	3.63
Tetrachloroethene	µg/L	27	26.4	24.7	22	20.4	17.5	13.8	11.5
Trichloroethene	µg/L	7.77	6.81	8.47	8.83	8.36	7.48	7.29	6.86
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205A

	Sample Name	MW-205A	MW-205A
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	4.53	4.61
Tetrachloroethene	µg/L	10.3	9.32
Trichloroethene	µg/L	7.13	6.82
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205B

Analyte	Sample Name / Sample Date	Unit	MW-205B 4/23/2007	MW-205B-LQ-4 7/10/2007	MW-205B-LA-5 10/4/2007	MW-205B-LQ-6 1/8/2008	MW-205B 4/9/2008	MW-205B 10/9/2008
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.206 J	<0.3	0.15 J	0.146 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.546 J	0.616 J	4.41	26.4	22.4	43
Tetrachloroethene		µg/L	129	149	100	82.3	31.2	24.9
Trichloroethene		µg/L	7.2	9.22	8.74	9.75	5.15	8.48
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205B

Analyte	Sample Name / Sample Date	Unit	MW-205B 4/7/2009	MW-205B 10/7/2009	MW-205B 4/6/2010	MW-205B 10/11/2010	MW-205B 4/2/2011	MW-205B 10/4/2011	MW-205B 4/23/2012	MW-205B 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	38.8	29.5	19.8	13.5	10.4	6.46	5.01	5.29
Tetrachloroethene		µg/L	19.7	24.4	24	30.8	31.3	28.9	26.9	27.1
Trichloroethene		µg/L	9.36	11.8	10.9	10.7	9.9	8.38	8.17	10.4
Vinyl chloride		µg/L	<1	2.06 J	5.05	4.59 J	2.6 J	1.73	1.32	0.87 J

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205B

	Sample Name	MW-205B	MW-205B	MW-205B	MW-205B	MW-205B	MW-205B	MW-205B	MW-205B
	Sample Date	4/10/2013	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/22/2016	10/14/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	4.3	4.61	9.32	12	11.5	11.8	9.92	10.8
Tetrachloroethene	µg/L	23.8	23.5	14	9.64	8.33	5.3	3.73	3.23
Trichloroethene	µg/L	10.1	8.86	8.32	7.91	8.1	8.08	6.52	6.6
Vinyl chloride	µg/L	0.609 J	0.559 J	1.17	1.53	1.25	1.48	1.18	1.28

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-205B

	Sample Name	MW-205B	MW-205B
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	9.83	9.07
Tetrachloroethene	µg/L	4	4.19
Trichloroethene	µg/L	6.5	6.75
Vinyl chloride	µg/L	0.81 J	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206A

Analyte	Sample Name / Sample Date	Unit	MW-206A 4/15/2007	MW-206A-LQ-4 7/11/2007	MW-206A-LA-5 10/3/2007	MW-206A-LQ-6 1/8/2008	MW-206A 4/9/2008	MW-206A 10/13/2008
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.155 J	<0.3	0.166 J	0.174 J	0.173 J	0.134 J
cis-1,2-Dichloroethene		µg/L	0.607 J	0.765 J	0.762 J	0.717 J	0.78 J	5.2
Tetrachloroethene		µg/L	76.6	99.2	76.4	114	96.5	80.5
Trichloroethene		µg/L	9.81	10.1	12.4	12	13.9	13.2
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206A

Analyte	Sample Name / Sample Date	Unit	MW-206A 4/7/2009	MW-206A 10/7/2009	MW-206A 4/6/2010	MW-206A 10/8/2010	MW-206A 4/2/2011	MW-206A 10/4/2011	MW-206A 4/23/2012	MW-206A 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	14.2	18.6	14.8	13.5	15.6	7.81	5.94	4.21
Tetrachloroethene		µg/L	46.5	25.6	22.3	15.6	18.1	14	16	18.5
Trichloroethene		µg/L	12.6	12.3	11.5	12.2	13.9	12.5	11.5	10.5
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206A

Analyte	Sample Name / Sample Date	Unit	MW-206A 4/10/2013	MW-206A 10/11/2013	MW-206A 4/25/2014	MW-206A 10/20/2014	MW-206A 4/9/2015	MW-206A 10/8/2015	MW-206A 4/21/2016	MW-206A 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	3.45	2.85	2.88	3.39	4.67	6.18	6.37	9.23
Tetrachloroethene		µg/L	18.9	19.9	19.9	18.4	17	12.8	9.15	8.76
Trichloroethene		µg/L	9.65	7.26	8.56	8.59	8.71	8.06	7.52	8.79
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206A

	Sample Name	MW-206A	MW-206A
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	10.6	12.5
Tetrachloroethene	µg/L	7.35	6.71
Trichloroethene	µg/L	9.02	9.35
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206B

Analyte	Sample Name / Sample Date	Unit	MW-206B 4/15/2007	MW-206B-LQ-4 7/11/2007	MW-206B-LA-5 10/3/2007	MW-206B-LQ-6 1/9/2008	MW-206B 4/9/2008	MW-206B 10/13/2008
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.139 J	0.14 J	0.148 J	0.147 J	0.136 J	<0.3
cis-1,2-Dichloroethene		µg/L	0.582 J	0.722 J	0.698 J	0.688 J	2.51	7.85
Tetrachloroethene		µg/L	57.2	77.5	64.9	69.5	69.1	36.4
Trichloroethene		µg/L	8.94	11	11	11.7	11.5	9.91
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206B

Analyte	Sample Name / Sample Date	Unit	MW-206B 4/7/2009	MW-206B 10/7/2009	MW-206B 4/6/2010	MW-206B 10/8/2010	MW-206B 4/2/2011	MW-206B 10/4/2011	MW-206B 4/23/2012	MW-206B 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	9.78	11	6.56	6.68	5	2.38	1.76	2.14
Tetrachloroethene		µg/L	22.8	17.3	12.3	12.3	13.7	15.4	15.2	19.1
Trichloroethene		µg/L	9.31	9.57	7.5	8.81	9.57	8.08	6.51	7.83
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206B

Analyte	Sample Name / Sample Date	Unit	MW-206B 4/10/2013	MW-206B 10/11/2013	MW-206B 4/25/2014	MW-206B 10/20/2014	MW-206B 4/9/2015	MW-206B 10/8/2015	MW-206B 4/21/2016	MW-206B 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.127 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	2.01	1.68	1.85	2.55	3.89	3.45	3.66	4.28
Tetrachloroethene		µg/L	21.1	20.8	20.2	17.9	15.6	15	12.6	13
Trichloroethene		µg/L	7.75	5.53	6.38	5.55	5.7	5.28	4.67	4.76
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-206B

	Sample Name	MW-206B	MW-206B
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	5.93	6.24
Tetrachloroethene	µg/L	9.88	9.69
Trichloroethene	µg/L	5.42	5.39
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207A

	Sample Name	MW-207A	MW-207A-LQ-4	MW-207A-LA-5	MW-207A-LQ-6	MW-207A	MW-207A	MW-207A
	Sample Date	4/16/2007	7/10/2007	10/3/2007	1/9/2008	4/9/2008	10/7/2008	4/10/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	0.44 J	<1	<1	<1
Chloroform	µg/L	5.86	9.99	8.28	10.6	9.12	9.13	10.3
cis-1,2-Dichloroethene	µg/L	0.468 J	0.387 J	0.479 J	0.382 J	0.475 J	0.476 J	0.561 J
Tetrachloroethene	µg/L	7.92	8.32	10.3	10.5	12.1	13.7	9.75
Trichloroethene	µg/L	21.4	18.6	21.6	24.3	24.2	26.9	47.4
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207A

	Sample Name	MW-207A	MW-207A	MW-207A	MW-207A	MW-207A	MW-207A	MW-207A	MW-207A
	Sample Date	10/5/2009	4/1/2010	10/14/2010	4/1/2011	10/2/2011	4/23/2012	10/21/2012	4/11/2013
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	0.307 J	<1	<1	<1	<1
Chloroform	µg/L	9.72	9.02	12.1	11	11.8	8.14	11	10.2
cis-1,2-Dichloroethene	µg/L	0.974 J	0.893 J	0.768 J	0.627 J	0.592 J	0.442 J	0.599 J	0.429 J
Tetrachloroethene	µg/L	11	10.7	18.1	18.6	14.4	10.5	16.4	14.9
Trichloroethene	µg/L	52.7	46.4	36.2	27.9	21.3	15.7	23.6	21.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207A

Analyte	Sample Name / Sample Date	Unit	MW-207A 10/12/2013	MW-207A 4/25/2014	MW-207A 10/20/2014	MW-207A 4/10/2015	MW-207A 10/8/2015	MW-207A 4/22/2016	MW-207A 10/14/2016	MW-207A 4/20/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	0.402 J	<1	<1	<1
Chloroform		µg/L	10.2	8.63	10.8	9.06	8.39	6.91	5.7	4.17
cis-1,2-Dichloroethene		µg/L	0.555 J	0.679 J	0.671 J	0.875 J	1.06	1.08	0.833 J	0.654 J
Tetrachloroethene		µg/L	18.1	16.4	19.6	23.2	21.2	23.8	19.5	11.4
Trichloroethene		µg/L	18.7	24.7	27	33.1	37.1	34.5	27.8	19.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207A

	Sample Name	MW-207A
	Sample Date	10/7/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	4.58
cis-1,2-Dichloroethene	µg/L	0.607 J
Tetrachloroethene	µg/L	10.1
Trichloroethene	µg/L	19.5
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207B

	Sample Name	MW-207B	MW-207B-LQ-4	MW-207B-LA-5	MW-207B-LQ-6	MW-207B	MW-207B	MW-207B
	Sample Date	4/16/2007	7/11/2007	10/3/2007	1/9/2008	4/9/2008	10/7/2008	4/10/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	1.36	1.91	1.37	1.13	1.22	0.916 J	0.851 J
Chloroform	µg/L	3.09	2.54	1.9	1.26	1.27	1.41	1.6
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	35.7	32.5	23.7	13	13.1	18	25.5
Trichloroethene	µg/L	12.1	17.6	62	109	96.2	75.3	102
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207B

Analyte	Sample Name / Sample Date	Unit	MW-207B 10/6/2009	MW-207B 4/2/2010	MW-207B 10/12/2010	MW-207B 4/1/2011	MW-207B 10/6/2011	MW-207B 4/23/2012	MW-207B 10/21/2012	MW-207B 4/11/2013
Carbon tetrachloride		µg/L	1.23	0.752 J	1.85 J	1.89	2.08	1.15	2.78	2.75
Chloroform		µg/L	3.64	1.35	6.99	7.34	4.01	7.73	0.519	0.535
cis-1,2-Dichloroethene		µg/L	0.558 J	<1	0.9 J	0.777 J	0.544 J	0.881 J	<1	0.269 J
Tetrachloroethene		µg/L	63.1	15.3	113	99.4	55	124	11.8	11.5
Trichloroethene		µg/L	67.5	92.1	53.6	38.4	16.2	30.5	3.24	3.21
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207B

Analyte	Sample Name / Sample Date	Unit	MW-207B 10/12/2013	MW-207B 4/25/2014	MW-207B 10/20/2014	MW-207B 4/10/2015	MW-207B 10/8/2015	MW-207B 4/22/2016	MW-207B 10/14/2016	MW-207B 4/20/2017
Carbon tetrachloride		µg/L	2.61	2.48	2.58	3.59	4.38	3.45	3.73	2.09
Chloroform		µg/L	0.565	4.09	4.17	3.89	3.59	3.93	3.96	3.86
cis-1,2-Dichloroethene		µg/L	0.325 J	0.509 J	0.452 J	0.394 J	0.464 J	0.409 J	0.607 J	0.816 J
Tetrachloroethene		µg/L	12.5	65.3	46.2	79.7	93.3	87.8	85	68.6
Trichloroethene		µg/L	3.29	18.7	15	16.7	18.7	18.6	18.5	24
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-207B

	Sample Name	MW-207B
	Sample Date	10/7/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	2.11
Chloroform	µg/L	1.56
cis-1,2-Dichloroethene	µg/L	0.467 J
Tetrachloroethene	µg/L	24.8
Trichloroethene	µg/L	9.4
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208A

	Sample Name	MW-208A	MW-208A-LQ-4	MW-208A-LA-5	MW-208A-LQ-6	MW-208A	MW-208A	MW-208A
	Sample Date	4/16/2007	7/10/2007	10/4/2007	1/8/2008	4/8/2008	10/13/2008	4/7/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.216 J	0.228 J	0.214 J	0.221 J	0.217 J	0.21 J	0.18 J
cis-1,2-Dichloroethene	µg/L	0.554 J	0.541 J	0.557 J	0.56 J	0.538 J	0.517 J	3.61
Tetrachloroethene	µg/L	174 J	193	163	198	189	182	163
Trichloroethene	µg/L	8.12	8.26	8.44	8.45	7.64	9.8	9.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208A

Analyte	Sample Name / Sample Date	Unit	MW-208A 10/8/2009	MW-208A 4/5/2010	MW-208A 10/8/2010	MW-208A 4/2/2011	MW-208A 10/6/2011	MW-208A 4/23/2012	MW-208A 10/20/2012	MW-208A 4/10/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	23.5	20.9	25.7	41	39.7	21.3	18.2	10.9
Tetrachloroethene		µg/L	92.8	24.4	38	3.94	10.5	19.3	21.4	21.5
Trichloroethene		µg/L	10.9	6.48	12.2	16.5	19.1	18.9	20.2	18.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	1.97 J	1.55

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208A

Analyte	Sample Name / Sample Date	Unit	MW-208A 4/25/2014	MW-208A 10/20/2014	MW-208A 4/10/2015	MW-208A 10/8/2015	MW-208A 4/21/2016	MW-208A 10/14/2016	MW-208A 4/20/2017	MW-208A 10/7/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	7.29	5.4	5.49	4.88	7	8.59	10.9	11.1
Tetrachloroethene		µg/L	19.4	19.9	20.9	23.7	17.7	14.3	10.7	10.1
Trichloroethene		µg/L	16.3	16.4	16.7	13.8	11.3	9.51	10	9.42
Vinyl chloride		µg/L	0.968 J	0.601 J	0.292 J	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208B

	Sample Name	MW-208B	MW-208B-LQ-4	MW-208B-LA-5	MW-208B-LQ-6	MW-208B	MW-208B
	Sample Date	4/16/2007	7/11/2007	10/4/2007	1/9/2008	4/8/2008	10/13/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.131 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.12	1.3	1.08	0.932 J	1.51	1.4
Tetrachloroethene	µg/L	3.42	2.8	3.02	1.68	2.22	2.94
Trichloroethene	µg/L	18.4	15.7	15	13.2	17.1	21.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208B

Analyte	Sample Name / Sample Date	Unit	MW-208B 4/7/2009	MW-208B 10/8/2009	MW-208B 4/5/2010	MW-208B 10/8/2010	MW-208B 4/2/2011	MW-208B 10/6/2011	MW-208B 4/23/2012	MW-208B 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.165 J	0.136 J	0.184 J	0.262 J	0.328	0.384	0.373 B	0.688
cis-1,2-Dichloroethene		µg/L	2.14	2.06	1.81	1.45	1.91	1.67	1.39	1.13
Tetrachloroethene		µg/L	3.81	5.39	9.29	16.5	16.9	19.8	24.2	26.5
Trichloroethene		µg/L	28	37.8	45.1	42.9	41.2	34.8	25	17.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208B

Analyte	Sample Name / Sample Date	Unit	MW-208B 4/10/2013	MW-208B 10/11/2013	MW-208B 4/25/2014	MW-208B 10/20/2014	MW-208B 4/10/2015	MW-208B 10/8/2015	MW-208B 4/21/2016	MW-208B 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.614	0.929	1.11	1.19	0.38	1.2	1	1.28
cis-1,2-Dichloroethene		µg/L	1.36	0.937 J	0.455 J	0.501 J	<1	0.319 J	0.438 J	<1
Tetrachloroethene		µg/L	26	22.2	16.3 J	13.6	8.86	9.62	8.61	7.04
Trichloroethene		µg/L	22.9	12.7	9.14 J	9.76	2.39	6.38	12.3	3.13
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-208B

	Sample Name	MW-208B	MW-208B
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	1	1.05
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	8.05	8.12
Trichloroethene	µg/L	3.97	2.1
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209A

Analyte	Sample Name / Sample Date	Unit	MW-209A 4/23/2007	MW-209A-LQ-4 7/10/2007	MW-209A-LA-5 10/4/2007	MW-209A-LQ-6 1/9/2008	MW-209A 4/9/2008	MW-209A 10/9/2008
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.165 J	0.136 J	0.131 J	0.159 J	0.175 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.326 J	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.576 J	0.487 J	0.404 J	0.467 J	0.523 J	0.611 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209A

Analyte	Sample Name / Sample Date	Unit	MW-209A 4/9/2009	MW-209A 10/5/2009	MW-209A 10/9/2010	MW-209A 10/3/2011	MW-209A 10/20/2012	MW-209A 10/11/2013	MW-209A 10/19/2014	MW-209A 4/9/2015
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.132 J	0.134 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.323 J	<1	<1	<1	<1	0.354 J	0.385 J	0.345 J
Trichloroethene		µg/L	0.495 J	0.568 J	0.659 J	1.04	3.06	4.97	6.94	7.19
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209A

	Sample Name	MW-209A	MW-209A	MW-209A	MW-209A	MW-209A
	Sample Date	10/7/2015	4/22/2016	10/13/2016	4/22/2017	10/7/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.366 J	0.417 J	0.47 J	0.418 J	0.507 J
Trichloroethene	µg/L	7.29	7.6	8.6	7.53	7.18
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209B

	Sample Name	MW-209B	MW-209B-LQ-4	MW-209B-LA-5	MW-209B-LQ-6	MW-209B	MW-209B
	Sample Date	4/23/2007	7/11/2007	10/5/2007	1/8/2008	4/9/2008	10/9/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.327 J	0.962 J	1.86	0.474 J	0.681 J	0.611 J
Chloroform	µg/L	0.251 J	0.56	0.215 J	0.198 J	0.22 J	0.183 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1 J
Tetrachloroethene	µg/L	<1	<1	<1	0.357 J	<1	0.33 J
Trichloroethene	µg/L	6.4	7.2	14.8	11.7	13	20 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1 J

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209B

Analyte	Sample Name / Sample Date	Unit	MW-209B 4/9/2009	MW-209B 10/10/2009	MW-209B 4/6/2010	MW-209B 10/8/2010	MW-209B 4/2/2011	MW-209B 10/3/2011	MW-209B 4/23/2012	MW-209B 10/20/2012
Carbon tetrachloride		µg/L	0.668 J	0.725 J	0.658 J	0.659 J	0.932 J	0.563 J	0.814 J	0.526 J
Chloroform		µg/L	0.272 J	0.194 J	0.243 J	0.217 J	0.353	0.173 J	0.227 JB	0.208 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.278 J	0.278 J	<1	0.479 J	0.342 J	0.492 J	0.392 J	0.557 J
Trichloroethene		µg/L	22.4	30.8	21.2	31.8	29.5	30.6	24.3	32
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209B

Analyte	Sample Name / Sample Date	Unit	MW-209B 4/10/2013	MW-209B 10/11/2013	MW-209B 4/25/2014	MW-209B 10/19/2014	MW-209B 4/9/2015	MW-209B 10/7/2015	MW-209B 4/22/2016	MW-209B 10/13/2016
Carbon tetrachloride		µg/L	0.66 J	0.445 J	0.439 J	<1	<1	<1	0.303 J	<1
Chloroform		µg/L	0.262 J	0.257 J	0.285 J	0.156 J	0.173 J	0.193 J	0.198 J	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.342 J	0.545 J	0.298 J	1.48	0.417 J	1.88	0.479 J	3.01
Trichloroethene		µg/L	33.9	28.8	29.3	14.8	18.2	12.4	14.6	3.41
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-209B

	Sample Name	MW-209B	MW-209B
	Sample Date	4/22/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	0.169 J
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	1.3	1.65
Trichloroethene	µg/L	8.69	7.36
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210A

Analyte	Sample Name / Sample Date	Unit	MW-210A 4/27/2007	MW-210A-LQ-4 7/9/2007	MW-210A-LA-5 10/4/2007	MW-210A-LQ-6 1/8/2008	MW-210A 4/8/2008	MW-210A 10/6/2008
Carbon tetrachloride		µg/L	<1 J	<1	<1	<1	<1	<1
Chloroform		µg/L	0.201 J	0.199 J	<0.3	0.149 J	0.183 J	<0.3
cis-1,2-Dichloroethene		µg/L	0.828 J	0.813 J	0.727 J	0.757 J	0.887 J	1.02
Tetrachloroethene		µg/L	38.2	36.1	28.8	23.3	28.2	19.4
Trichloroethene		µg/L	5.85	6.05	5.63	5.55	6.2	6.09
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210A

Analyte	Sample Name / Sample Date	Unit	MW-210A 4/6/2009	MW-210A 10/6/2009	MW-210A 4/2/2010	MW-210A 10/11/2010	MW-210A 4/3/2011	MW-210A 10/4/2011	MW-210A 4/23/2012	MW-210A 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	0.156 J	0.13 J	<0.3	<0.3	0.127 JB	<0.3
cis-1,2-Dichloroethene		µg/L	1.47	1.63	2.18	2.25	2.11	1.81	1.92	2.08
Tetrachloroethene		µg/L	16.9	8.48	14.7	13.6	13.3	12.6	10.4	8.21
Trichloroethene		µg/L	6.28	4.92	6.37	6.16	5.54	5.4	4.43	4.62
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210A

Analyte	Sample Name / Sample Date	Unit	MW-210A 4/10/2013	MW-210A 10/11/2013	MW-210A 4/26/2014	MW-210A 10/20/2014	MW-210A 4/9/2015	MW-210A 10/8/2015	MW-210A 4/22/2016	MW-210A 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	0.128 J	<0.3	0.129 J	0.171 J	0.139 J
cis-1,2-Dichloroethene		µg/L	2.15	2	2.25	1.97	2.1	2.12	1.98	2.12
Tetrachloroethene		µg/L	8.42	5.79	5	4.28	3.94	4.23	4.07	3.24
Trichloroethene		µg/L	5.36	4.52	5.07	5.82	5.91	6.47	6.28	5.1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210A

	Sample Name	MW-210A	MW-210A
	Sample Date	4/19/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	0.142 J
cis-1,2-Dichloroethene	µg/L	3.14	4.46
Tetrachloroethene	µg/L	2.88	2.93
Trichloroethene	µg/L	4.76	4.53
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210B

	Sample Name	MW-210B	MW-210B-LQ-4	MW-210B-LA-5	MW-210B-LQ-6	MW-210B	MW-210B
	Sample Date	4/27/2007	7/9/2007	10/5/2007	1/8/2008	4/8/2008	10/6/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1 J	<1	<1	<1	<1	<1
Chloroform	µg/L	0.15 J	<0.3	0.143 J	0.14 J	0.155 J	<0.3
cis-1,2-Dichloroethene	µg/L	0.646 J	0.57 J	0.433 J	0.529 J	0.613 J	0.462 J
Tetrachloroethene	µg/L	32.4	24.4	21	19.8	20	12.6
Trichloroethene	µg/L	7.29	8.42	10.7	8.46	7.84	7.49
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210B

Analyte	Sample Name / Sample Date	Unit	MW-210B 4/6/2009	MW-210B 10/6/2009	MW-210B 4/2/2010	MW-210B 10/11/2010	MW-210B 4/3/2011	MW-210B 10/4/2011	MW-210B 4/23/2012	MW-210B 10/20/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.889 J	0.995 J	1.3	1.1	1.1	0.781 J	0.902 J	0.723 J
Tetrachloroethene		µg/L	12.2	9.39	10.3	9.27	8.64	7.24	7.42	4.8
Trichloroethene		µg/L	7.2	7.78	7.06	7.77	8.21	9.73	6.76	10.2
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210B

Analyte	Sample Name / Sample Date	Unit	MW-210B 4/10/2013	MW-210B 10/11/2013	MW-210B 4/26/2014	MW-210B 10/20/2014	MW-210B 4/9/2015	MW-210B 10/8/2015	MW-210B 4/22/2016	MW-210B 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.717 J	0.635 J	0.808 J	0.624 J	0.548 J	0.557 J	0.543 J	0.6 J
Tetrachloroethene		µg/L	4.7	3.59	3.37	2.71	2.47	2.65	2.43	1.67
Trichloroethene		µg/L	8.56	6.93	7.01	11	10.1	13.1	9.73	12.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-210B

	Sample Name	MW-210B	MW-210B
	Sample Date	4/19/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3+RC
cis-1,2-Dichloroethene	µg/L	0.769 J	0.973 J
Tetrachloroethene	µg/L	1.7	1.47
Trichloroethene	µg/L	17.5	22.2
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-211

	Sample Name	MW-211	MW-211-LQ-4	MW-211-LA-5	MW-211-LQ-6	MW-211	MW-211	MW-211
	Sample Date	4/16/2007	7/10/2007	10/2/2007	1/9/2008	10/10/2008	4/10/2009	10/7/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.139 J	<0.3	<0.3	0.214 J	2.24 J	2.71	1.24
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	0.502 J	0.431 J	0.469 J	0.811 J
Trichloroethene	µg/L	0.536 J	0.576 J	0.436 J	0.602 J	1.18 J	1.38	1.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-211

Analyte	Sample Name / Sample Date	Unit	MW-211 10/13/2010	MW-211 10/3/2011	MW-211 10/21/2012	MW-211 10/12/2013	MW-211 10/20/2014	MW-211 10/8/2015	MW-211 10/14/2016
Carbon tetrachloride		µg/L	0.344	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.218 J	0.152 J	0.166 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.745 J	0.275 J	<1	0.686 J	1.2	0.549 J	0.396 J
Trichloroethene		µg/L	1.3	0.512 J	0.39 J	0.461 J	0.702 J	0.406 J	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-212

Analyte	Sample Name / Sample Date	Unit	MW-212 4/27/2007	MW-212-LQ-4 7/9/2007	MW-212-LA-5 10/3/2007	MW-212-LQ-6 1/9/2008	MW-212 4/8/2008	MW-212 10/8/2008	MW-212 4/10/2009
Carbon tetrachloride		µg/L	0.257 J	0.479 J	0.568 J	0.635 J	0.519 J	<1	0.29 J
Chloroform		µg/L	0.289 J	0.135 J	0.13 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	0.516 J	<1	0.477 J	<1	<1
Trichloroethene		µg/L	34.4	47.9	41.7	43.9	45.1	37.9 J	38
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-212

Analyte	Sample Name / Sample Date	Unit	MW-212 10/10/2009	MW-212 4/7/2010	MW-212 10/15/2010	MW-212 4/3/2011	MW-212 10/8/2011	MW-212 4/22/2012	MW-212 10/22/2012	MW-212 2/11/2013
Carbon tetrachloride		µg/L	0.271 J	0.277 J	0.323 J	0.319 J	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	0.407 J	<1	<1	<1	<1	<1
Trichloroethene		µg/L	38.4	31.5	23.8	20.1	16.5	12.2	13	10.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-212

Analyte	Sample Name / Sample Date	Unit	MW-212 5/11/2013	MW-212 8/20/2013	MW-212 11/11/2013	MW-212 2/11/2014	MW-212 5/10/2014	MW-212 8/10/2014	MW-212 11/9/2014	MW-212 4/22/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1 UJ	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3 UJ	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	0.347 J	0.357 J	<1
Tetrachloroethene		µg/L	<1	0.377 J	<1	<1	0.283 J	0.329 J	<1	<1
Trichloroethene		µg/L	10.9	13.7	9.35	9.92	8.96	5.9 J	5.62	8.86
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1 UJ	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-212

	Sample Name	MW-212	MW-212	MW-212
	Sample Date	10/13/2016	4/21/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	1.54	1.39	1.64
Trichloroethene	µg/L	28.6	30.5	40.1
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-213

Analyte	Sample Name / Sample Date	Unit	MW-213 4/21/2012	MW-213 10/22/2012	MW-213 2/11/2013	MW-213 5/11/2013	MW-213 8/20/2013	MW-213 11/11/2013	MW-213 2/11/2014	MW-213 5/11/2014
Carbon tetrachloride		µg/L	0.661 J	0.553 J	<5	<5	<1	<5	<5	<1 UJ
Chloroform		µg/L	0.217 J	0.215 J	<1.5	<1.5	<0.3	<1.5	<1.5	0.17 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<5	4.05 J	11.5	4.79	4.08 J	0.865 J
Tetrachloroethene		µg/L	<1	<1	<5	<5	<1	<5	<5	<1 UJ
Trichloroethene		µg/L	44.6	34.2	25	17.5	14	13.7	7.75	<1 UJ
Vinyl chloride		µg/L	<1	<1	<5	<5	0.327 J	<5	<5	<1 UJ

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-213

Analyte	Sample Name / Sample Date	Unit	MW-213 8/10/2014	MW-213 11/9/2014	MW-213 4/24/2016	MW-213 10/17/2016	MW-213 4/21/2017	MW-213 10/9/2017
Carbon tetrachloride		µg/L	<10 UJ	<10	<10	<5	<5	<5
Chloroform		µg/L	<3 UJ	<3	<3	<1.5	<1.5	<1.5
cis-1,2-Dichloroethene		µg/L	8.37 J	6.08 J	18.6	18.2	15.8	7.46
Tetrachloroethene		µg/L	<10 UJ	<10	<10	<5	<5	<5
Trichloroethene		µg/L	<10 UJ	<10	<10	1.77 J	3.22 J	13.1
Vinyl chloride		µg/L	<10 UJ	<10	<10	<5	<5	<5

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214A

Analyte	Sample Name / Sample Date	Unit	MW-214A 4/16/2007	MW-214A 7/10/2007	MW-214A 10/3/2007	MW-214A 1/9/2008	MW-214A 4/7/2008	MW-214A 10/7/2008	MW-214A 4/10/2009	MW-214A 10/11/2009
Carbon tetrachloride		µg/L	0.601 J	0.476 J	0.725 J	0.575 J	0.709 J	0.647 J	0.752 J	0.891 J
Chloroform		µg/L	2.63	2.32	2.26	2.02	2.06	1.58	2.22	2.21
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	8.83	6.81	6.99	7.29	6.22	4.81	4.51	4.64
Trichloroethene		µg/L	5.59	4.49	4.11	3.65	3.02	1.95	2.31	2.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214A

Analyte	Sample Name / Sample Date	Unit	MW-214A 10/7/2010	MW-214A 10/2/2011	MW-214A 4/23/2012	MW-214A 10/21/2012	MW-214A 4/11/2013	MW-214A 10/12/2013	MW-214A 4/25/2014	MW-214A 10/21/2014
Carbon tetrachloride		µg/L	1.12 J	1.18	1.03	1.01	0.976 J	1.09	0.877 J	0.85 J
Chloroform		µg/L	5.01 J	4.34	2.93	2.7	2.27	2.18	1.93	2.33
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	10.5 J	11.1	7.59	6.54	6.06	6.6	5.62	5.76
Trichloroethene		µg/L	7.88 J	6.71	2.69	2.46	2.01	2.14	1.86	2.24
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214A

	Sample Name	MW-214A	MW-214A	MW-214A
	Sample Date	10/8/2015	10/14/2016	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	0.887 J	0.738 J	0.613 J
Chloroform	µg/L	3.03	2.91	2.83
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	6.02	5.08	5.25
Trichloroethene	µg/L	2.44	2.35	2.23
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214B

	Sample Name	MW-214B	MW-214B-LQ-4	MW-214B-LA-5	MW-214B-LQ-6	MW-214B	MW-214B	MW-214B
	Sample Date	4/17/2007	7/11/2007	10/3/2007	1/9/2008	4/7/2008	10/21/2008	4/10/2009
Analyte	**Unit**							
Carbon tetrachloride	µg/L	0.645 J	1.05	0.76 J	0.959 J	0.843 J	0.772 J	0.797 J
Chloroform	µg/L	2.06	1.85	1.47	1.44	1.22	1.27	1.47
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	6.4	6	4.89	5.44	4.55	4.39	4
Trichloroethene	µg/L	4.24	3.83	3.06	2.88	2.36	2.28	1.93
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214B

	Sample Name	MW-214B	MW-214B	MW-214B	MW-214B	MW-214B	MW-214B	MW-214B	MW-214B
	Sample Date	10/11/2009	10/12/2010	10/2/2011	4/23/2012	10/21/2012	4/11/2013	10/12/2013	4/25/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	0.92 J	1.08	1.27	0.942 J	1.19	0.977 J	1.01	0.925 J
Chloroform	µg/L	1.8	3.79	3.94	2.7	2.53	1.61	1.7	1.7
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	4.14	10	9.24	5.78	6.79	5.42	6	5.04
Trichloroethene	µg/L	2.25	5.65 B	5.16	2.6	2.28	1.41	1.98	1.66
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-214B

	Sample Name	MW-214B	MW-214B	MW-214B	MW-214B
	Sample Date	10/21/2014	10/8/2015	10/14/2016	10/8/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	0.902 J	0.965 J	0.767 J	0.765 J
Chloroform	µg/L	2.06	2.73	2.57	2.46
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.12	5.59	4.8	5.1
Trichloroethene	µg/L	2.01	2.22	2.1	<1
Vinyl chloride	µg/L	<1	<1	<1	

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215A

	Sample Name	MW-215A	MW-215A-LQ-4	MW-215A-LA-5	MW-215A-LQ-6	MW-215A	MW-215A
	Sample Date	4/16/2007	7/10/2007	10/4/2007	1/9/2008	4/9/2008	10/7/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.679 J	0.538 J	0.671 J	0.552 J	0.651 J	0.382 J
Chloroform	µg/L	1.66	1.67	1.76	1.68	1.66	1.44
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.81	5.58	6.95	7.01	6.27	5.85
Trichloroethene	µg/L	7.82	8.12	7.79	10.2	8.96	7.99
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215A

Analyte	Sample Name / Sample Date	Unit	MW-215A 4/10/2009	MW-215A 10/12/2009	MW-215A 10/6/2010	MW-215A 10/7/2011	MW-215A 10/21/2012	MW-215A 10/12/2013	MW-215A 10/21/2014	MW-215A 10/8/2015
Carbon tetrachloride		µg/L	0.591 J	0.579 J	0.747 J	0.596 J	1.09	0.978 J	0.946 J	1.06
Chloroform		µg/L	1.52	1.43	1.03	0.908	2.4	2.39	1.98	1.82
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	4.91	4.91	4.19	3.51	6.06	6.93	6.19	6.79
Trichloroethene		µg/L	6.2	4.88	2.72	2.08	3	3.46	2.71	2.22
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215A

	Sample Name	MW-215A	MW-215A
	Sample Date	10/14/2016	10/8/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	0.958 J	1.06
Chloroform	µg/L	1.57	2.87
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	5.21	5.23
Trichloroethene	µg/L	1.89	2.29
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215B

	Sample Name	MW-215B	MW-215B-LQ-4	MW-215B-LA-5	MW-215B-LQ-6	MW-215B	MW-215B
	Sample Date	4/16/2007	7/9/2007	10/4/2007	1/9/2008	4/9/2008	10/7/2008
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.956 J	1.01	0.894 J	0.856 J	0.988 J	0.271 J
Chloroform	µg/L	0.68	0.71	0.651	0.61	0.663	0.474
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	4.36	4.39	4.49	4.71	4.7	2.1
Trichloroethene	µg/L	1.52	1.53	1.47	1.36	1.46	1.25
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215B

Analyte	Sample Name / Sample Date	Unit	MW-215B 4/9/2009	MW-215B 10/12/2009	MW-215B 10/12/2010	MW-215B 10/4/2011	MW-215B 10/21/2012	MW-215B 10/12/2013	MW-215B 10/21/2014	MW-215B 10/8/2015
Carbon tetrachloride		µg/L	0.97 J	1.17	1.23 J	1.12	1.3	1.33	1.4	1.43
Chloroform		µg/L	0.767	0.686	0.63	0.589	0.845	0.685	0.645	0.779
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	4.99	5.66	5.81	4.82	5.91	6.24	5.93	6.77
Trichloroethene		µg/L	1.66	1.76	1.5	1.42	1.71	1.55	1.52	1.59
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-215B

	Sample Name	MW-215B	MW-215B
	Sample Date	10/14/2016	10/8/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	1.39	1.54
Chloroform	µg/L	0.675	0.825
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	4.95	5.45
Trichloroethene	µg/L	1.24	1.42
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-216

Analyte	Sample Name / Sample Date	Unit	MW-216 4/27/2007	MW-216-LQ-4 7/10/2007	MW-216-LA-5 10/2/2007	MW-216-LQ-6 1/8/2008	MW-216 10/6/2008	MW-216 4/6/2009	MW-216 10/12/2009
Carbon tetrachloride		µg/L	<1 J	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.169 J	0.183 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	0.288 J	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	34.2	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	1.5	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-216

Analyte	Sample Name / Sample Date	Unit	MW-216 10/9/2010	MW-216 10/5/2011	MW-216 10/20/2012	MW-216 10/11/2013	MW-216 10/20/2014	MW-216 10/8/2015	MW-216 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.143 J	0.137 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.285 J	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	0.363 J	0.379 J	0.32 J	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-217

Analyte	Sample Name / Sample Date	Unit	MW-217 4/27/2007	MW-217-LQ-4 7/9/2007	MW-217-LA-5 10/2/2007	MW-217-LQ-6 1/9/2008	MW-217 4/7/2008	MW-217 10/8/2008	MW-217 4/8/2009
Carbon tetrachloride		µg/L	34.8	42.3 J	53.4	57.3	72.1	96.3 J	92.4
Chloroform		µg/L	5.05	5.33	5.18	7.43	8.56	13.4 J	9.43
cis-1,2-Dichloroethene		µg/L	1.34	1.45	1.89	2.43	2.88	4.8 J	3.58
Tetrachloroethene		µg/L	18.4	25.4 J	31.3	31.7	34.7	26.5 J	31.2
Trichloroethene		µg/L	29.5	40.6 J	39.4	35.9	34.4	25.6 J	28.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-217

Analyte	Sample Name / Sample Date	Unit	MW-217 10/8/2009	MW-217 3/31/2010	MW-217 10/7/2010	MW-217 3/31/2011	MW-217 10/4/2011	MW-217 4/23/2012	MW-217 10/21/2012	MW-217 4/10/2013
Carbon tetrachloride		µg/L	55.6	65.6	48.8	47.7	32.1	33.7	23.9	27.3
Chloroform		µg/L	5.24	4.4	3.73	4.25	3.77	3.54	4.12	3.74
cis-1,2-Dichloroethene		µg/L	1.8	1.33	0.819 J	0.871 J	0.581 J	0.555 J	0.519 J	0.707 J
Tetrachloroethene		µg/L	29.9	29.7	27.4	27.7	24.6	17.9	23.7	23.8
Trichloroethene		µg/L	32.9	34.6	37.9	46.1	44.1	41.7	45 J	44
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-217

Analyte	Sample Name / Sample Date	Unit	MW-217 10/12/2013	MW-217 4/24/2014	MW-217 10/20/2014	MW-217 4/10/2015	MW-217 10/7/2015	MW-217 4/21/2016	MW-217 10/15/2016	MW-217 4/19/2017
Carbon tetrachloride		µg/L	40.4	46.9	29.7	47.8	44.1	47.6	57.9	61
Chloroform		µg/L	3.88	3.97	3.73	3.65	3.78	3.66	4.29	4.16
cis-1,2-Dichloroethene		µg/L	0.791 J	0.833 J	0.589 J	0.7 J	0.673 J	0.777 J	0.793 J	0.95 J
Tetrachloroethene		µg/L	29.6	23.6	23.3	29.4	27.7	25.4	28.9	26.8
Trichloroethene		µg/L	42.1	33	36.4	37.5	36	31.1	35.9	28.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-217

	Sample Name	MW-217
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	73.1
Chloroform	µg/L	4.99
cis-1,2-Dichloroethene	µg/L	1.17
Tetrachloroethene	µg/L	31
Trichloroethene	µg/L	28
Vinyl chloride	µg/L	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-218

Analyte	Sample Name / Sample Date	Unit	MW-218 4/17/2007	MW-218-LQ-4 7/9/2007	MW-218-LA-5 10/2/2007	MW-218-LQ-6 1/9/2008	MW-218 4/7/2008	MW-218 10/8/2008	MW-218 4/8/2009
Carbon tetrachloride		µg/L	15.1	13.3	17.6	15	17.7	15.6 J	15.7
Chloroform		µg/L	3.15	2.79	2.45	2.58	2.62	2.78 J	2.75
cis-1,2-Dichloroethene		µg/L	0.459 J	0.468 J	0.508 J	0.352 J	0.392 J	0.373 J	0.426 J
Tetrachloroethene		µg/L	17.7	16.7	18.5	17.2	17.4	12.2 J	15.2
Trichloroethene		µg/L	44.2	47.6	42.8	42.5	40.7	35.9 J	37.1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-218

Analyte	Sample Name / Sample Date	Unit	MW-218 10/8/2009	MW-218 3/31/2010	MW-218 10/14/2010	MW-218 4/3/2011	MW-218 10/7/2011	MW-218 4/23/2012	MW-218 10/21/2012	MW-218 4/10/2013
Carbon tetrachloride		µg/L	10.1	7.56	8.81	9.84 J	9.75	6.73	8.22	7.6
Chloroform		µg/L	2.49	2.42	2.98	2.79	2.52	2.28	2.82	2.55
cis-1,2-Dichloroethene		µg/L	0.404 J	0.303 J	0.373 J	0.419 J	0.436 J	<1	0.379 J	0.252 J
Tetrachloroethene		µg/L	16.3	11.2	13.7	16.8	19.5	17.9	20.3	18.1
Trichloroethene		µg/L	42.5	32.8	37.6	46.2	49.2	44.7	43.9	42.2
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-218

Analyte	Sample Name / Sample Date	Unit	MW-218 10/12/2013	MW-218 4/25/2014	MW-218 10/20/2014	MW-218 4/10/2015	MW-218 10/7/2015	MW-218 4/21/2016	MW-218 10/15/2016	MW-218 4/19/2017
Carbon tetrachloride		µg/L	8.75	7.96	8.07	8.87	7.68	7.51	7.76	7.25
Chloroform		µg/L	2.8	2.81	2.73	2.7	2.44	2.32	2.33	2.02
cis-1,2-Dichloroethene		µg/L	0.33 J	<1	<1	0.3 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	18.9	15.4	16	15.9	16.8	15.4	17.8	17.7
Trichloroethene		µg/L	40.3	34.5	32.9	32.8	31.8	29.1	34.3	31.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-218

	Sample Name	MW-218
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	6.47
Chloroform	µg/L	2.07
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	17.6
Trichloroethene	µg/L	32.3
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-219

Analyte	Sample Name / Sample Date	Unit	MW-219 4/27/2007	MW-219-LQ-4 7/10/2007	MW-219-LA-5 10/3/2007	MW-219-LQ-6 1/9/2008	MW-219 4/7/2008	MW-219 10/10/2008	MW-219 4/6/2009
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.643 J	1.06	1.01	0.875 J	0.928 J	1.14 J	1.15
Tetrachloroethene		µg/L	16.3	27.6	33.9	48	41.4	47 J	39.4
Trichloroethene		µg/L	1.72	2.79	3.37	3.74	3.26	3.53 J	2.84
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-219

Analyte	Sample Name / Sample Date	Unit	MW-219 10/8/2009	MW-219 4/1/2010	MW-219 10/6/2010	MW-219 4/3/2011	MW-219 10/6/2011	MW-219 4/23/2012	MW-219 10/19/2012	MW-219 4/11/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.935 J	0.393 J	<1	<1	<1	0.677 J	1.64	2.04
Tetrachloroethene		µg/L	26.9	10.6	5.57	4.55	6.51	11	25.2	39.6
Trichloroethene		µg/L	2.09	0.868 J	0.575 J	0.439 J	0.614 J	1.36	2.9	3.54
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-219

Analyte	Sample Name / Sample Date	Unit	MW-219 10/12/2013	MW-219 4/26/2014	MW-219 10/19/2014	MW-219 4/10/2015	MW-219 10/8/2015	MW-219 4/23/2016	MW-219 10/16/2016	MW-219 4/22/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.134 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	2.48	3.09	3.07	3.38	3.12	3.2	3.25	4.57
Tetrachloroethene		µg/L	53.6	66.6	74.7	81.4	71.4	80.1	80.5	88.2
Trichloroethene		µg/L	3.62	3.89	4.14	4.28	4.14	4.74	4.57	5.11
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-219

	Sample Name	MW-219
	Sample Date	10/7/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	5.78
Tetrachloroethene	µg/L	113
Trichloroethene	µg/L	6.4
Vinyl chloride	µg/L	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-229

Analyte	Sample Name / Sample Date	Unit	MW-229 10/5/2007	MW-229 1/9/2008	MW-229 10/8/2008	MW-229 4/8/2009	MW-229 10/8/2009	MW-229 10/6/2010	MW-229 10/2/2011	MW-229 10/19/2012
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-229

	Sample Name	MW-229	MW-229
	Sample Date	10/19/2014	10/17/2016
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-252

Analyte	Sample Name / Sample Date	Unit	MW-252 6/18/2010	MW-252 10/6/2010	MW-252 12/9/2010	MW-252 3/31/2011	MW-252 10/6/2011	MW-252 4/23/2012	MW-252 10/19/2012	MW-252 4/11/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	0.332	1.07	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	2.75	5.64	<1	1.65	<1	0.651 J
Trichloroethene		µg/L	<1	<1	1.62	3.73	<1	0.891 J	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-252

	Sample Name	MW-252	MW-252	MW-252	MW-252
	Sample Date	10/12/2013	10/19/2014	10/8/2015	10/13/2016
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.273 J	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-253

Analyte	Sample Name / Sample Date	Unit	MW-253 6/18/2010	MW-253 10/6/2010	MW-253 12/9/2010	MW-253 3/31/2011	MW-253 9/30/2011	MW-253 4/23/2012	MW-253 10/19/2012	MW-253 4/11/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.156	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.344	2.99	4.87	7.75	9.81	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-253

	Sample Name	MW-253	MW-253	MW-253	MW-253
	Sample Date	10/12/2013	10/19/2014	10/13/2016	10/10/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-254

Analyte	Sample Name / Sample Date	Unit	MW-254 8/16/2010	MW-254 10/5/2010	MW-254 12/8/2010	MW-254 3/31/2011	MW-254 9/30/2011	MW-254 4/23/2012	MW-254 10/19/2012	MW-254 4/11/2013
Carbon tetrachloride		µg/L	0.695	0.872 J	1.18	1.06	0.869 J	0.888 J	1.15	0.889 J
Chloroform		µg/L	0.241	0.223 J	0.29	0.249 J	0.205 J	0.201 J	0.295 J	0.185 J
cis-1,2-Dichloroethene		µg/L	<1	<1	0.299	<1	0.303 J	0.321 J	<1	0.34 J
Tetrachloroethene		µg/L	0.814	0.623 J	0.854	<1	0.578 J	0.573 J	0.649 J	0.905 J
Trichloroethene		µg/L	2.28	2.07	2.58	1.8	2.28	2.63	2.37	3.13
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-254

	Sample Name	MW-254	MW-254	MW-254	MW-254	MW-254	MW-254
	Sample Date	10/12/2013	4/26/2014	10/19/2014	10/7/2015	10/13/2016	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	0.748 J	0.987 J	0.736 J	0.729 J	1.1	1.26
Chloroform	µg/L	0.162 J	0.199 J	0.166 J	0.171 J	0.295 J	0.277 J
cis-1,2-Dichloroethene	µg/L	0.347 J	0.385 J	0.387 J	0.412 J	0.3 J	0.359 J
Tetrachloroethene	µg/L	0.77 J	0.901 J	0.901 J	1.18	1.53	2.83
Trichloroethene	µg/L	2.7	2.8	2.79	3.15	2.15	2.22
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-255

Analyte	Sample Name / Sample Date	Unit	MW-255 8/9/2010	MW-255 10/5/2010	MW-255 12/8/2010	MW-255 3/31/2011	MW-255 9/30/2011	MW-255 4/23/2012	MW-255 10/19/2012	MW-255 4/11/2013
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	0.297 J	0.269	0.345 J	0.298 J	0.586 J	0.532 J	0.433 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-255

	Sample Name	MW-255	MW-255	MW-255	MW-255	MW-255
	Sample Date	10/12/2013	10/19/2014	10/7/2015	10/13/2016	10/8/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	0.423 J	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	0.287 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	0.736 J	0.335 J
Trichloroethene	µg/L	0.353 J	0.501 J	0.65 J	1.63	0.665 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-256

Analyte	Sample Name / Sample Date	Unit	MW-256 8/9/2010	MW-256 10/5/2010	MW-256 12/9/2010	MW-256 3/31/2011	MW-256 9/30/2011	MW-256 4/23/2012	MW-256 10/19/2012	MW-256 4/11/2013
Carbon tetrachloride		µg/L	0.302	0.32	0.613 J	0.36	0.268 J	0.524 J	0.404 J	0.334 J
Chloroform		µg/L	1.74	2.01	1.95	2.35	2.27	2.25	2.47	2.32
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	0.28 J
Tetrachloroethene		µg/L	8.71	9.44	8.64	12.1	20	34.3	39.5	41.9
Trichloroethene		µg/L	2.43	2.77	2.9	3.51	4.68	7.82	13.7	16
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-256

Analyte	Sample Name / Sample Date	Unit	MW-256 10/12/2013	MW-256 4/26/2014	MW-256 10/19/2014	MW-256 4/8/2015	MW-256 10/7/2015	MW-256 4/23/2016	MW-256 10/13/2016	MW-256 4/21/2017
Carbon tetrachloride		µg/L	0.366 J	0.506 J	0.415 J	0.481 J	0.417 J	0.626 J	0.517 J	0.633 J
Chloroform		µg/L	2.29 J	2.46	1.88	1.99	1.63	1.91	1.59	1.48
cis-1,2-Dichloroethene		µg/L	<1	0.294 J	0.316 J	0.329 J	0.3 J	0.274 J	0.306 J	0.294 J
Tetrachloroethene		µg/L	37.7 J	43.5	38	42.4	31.5	33.9	28.6	27.9
Trichloroethene		µg/L	14 J	13.4	11.6	11.8	8.71	10.3	8.51	9.77
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-256

	Sample Name	MW-256
	Sample Date	10/8/2017
Analyte	**Unit**	
Carbon tetrachloride	µg/L	0.627 J
Chloroform	µg/L	1.46
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	24.5
Trichloroethene	µg/L	8.58
Vinyl chloride	µg/L	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-258

Analyte	Sample Name / Sample Date	Unit	MW-258 4/22/2012	MW-258 10/21/2012	MW-258 4/11/2013	MW-258 10/12/2013	MW-258 4/25/2014	MW-258 10/21/2014	MW-258 4/10/2015	MW-258 10/7/2015
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	2.34	4.1	2.95	2.54	2.22	1.73	2.44	2.05
cis-1,2-Dichloroethene		µg/L	1.75	2.54	2.22	2.25	1.82	1.69	1.97	1.74
Tetrachloroethene		µg/L	19.4	22.1	25.9	32.2	29.9	29.7	30.2	24.8
Trichloroethene		µg/L	57.7 J	93	88.7	85.8	73.9	50.8	69.8	55.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-258

	Sample Name	MW-258	MW-258	MW-258	MW-258
	Sample Date	4/22/2016	10/15/2016	4/20/2017	10/8/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	2.47	1.96	1.69	1.97
cis-1,2-Dichloroethene	µg/L	1.93	1.94	1.89	1.96
Tetrachloroethene	µg/L	28	26.6	25	24.4
Trichloroethene	µg/L	65.9	60.6	56.3	55.4
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-259

Analyte	Sample Name / Sample Date	Unit	MW-259 4/22/2012	MW-259 10/21/2012	MW-259 4/10/2013	MW-259 10/12/2013	MW-259 4/25/2014	MW-259 10/20/2014	MW-259 4/10/2015	MW-259 10/7/2015
Carbon tetrachloride		µg/L	4.69	5.12	4.98	5.02	4.95	4.45	5.24	4.31
Chloroform		µg/L	2.69	3.07	3.08	3	2.71	2.5	2.57	2.24
cis-1,2-Dichloroethene		µg/L	<1	<1	0.278 J	0.277 J	<1	<1	0.284 J	0.257 J
Tetrachloroethene		µg/L	15.1	15.1	16.1	17	15	14.4	14.7	12.4
Trichloroethene		µg/L	15.7	15.9	22	23.9	23.6	21.4	22.2	20.2
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-259

Analyte	Sample Name / Sample Date	Unit	MW-259 4/21/2016	MW-259 10/15/2016	MW-259 4/19/2017	MW-259 10/10/2017
Carbon tetrachloride		µg/L	4.42	4.7	4.79	4.11
Chloroform		µg/L	2.56	2.89	2.93	3.33
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1
Tetrachloroethene		µg/L	13.7	14.5	14.2	13.7
Trichloroethene		µg/L	22.1	22.6	20.1 J	18.6
Vinyl chloride		µg/L	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-260

	Sample Name	MW-260	MW-260	MW-260	MW-260	MW-260	MW-260	MW-260	MW-260
	Sample Date	10/11/2013	4/25/2014	10/20/2014	4/10/2015	10/7/2015	4/22/2016	10/15/2016	10/8/2017
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	1.37	1.27	1.18	1.13	0.935 J	1.1	0.808	0.737
cis-1,2-Dichloroethene	µg/L	<1	0.324 J	<1	0.276 J	<1	0.251 J	<1	<1
Tetrachloroethene	µg/L	<1	0.27 J	0.306 J	0.475 J	0.323 J	0.47 J	0.449 J	0.492 J
Trichloroethene	µg/L	3.97	5.34	4.22	4.77	3.7	4.86	3.54	4.03
Vinyl chloride	µg/L	<1	<1	<1	<1	<1 UJ	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-261

	Sample Name	MW-261	MW-261	MW-261	MW-261	MW-261	MW-261	MW-261	MW-261
	Sample Date	10/11/2013	4/25/2014	10/20/2014	4/9/2015	10/8/2015	4/21/2016	10/14/2016	10/10/2017
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	0.292 J	0.257 J	1.4	0.278 J	0.367 J	0.308 J
Trichloroethene	µg/L	2.71 J	3.36	2.52	2.3	<1	3.24	2.2	2.73
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-262

Analyte	Sample Name / Sample Date / Unit	MW-262 7/30/2015	MW-262 10/7/2015	MW-262 4/23/2016	MW-262 10/13/2016	MW-262 4/21/2017	MW-262 10/8/2017
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-263

	Sample Name	MW-263	MW-263	MW-263	MW-263	MW-263	MW-263
	Sample Date	5/17/2015	10/7/2015	4/22/2016	10/15/2016	4/20/2017	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	2.76	2.48	2.54	2.22	1.82	1.87
cis-1,2-Dichloroethene	µg/L	2.4	3	2.73	2.47	2.4	2.29
Tetrachloroethene	µg/L	3.64	5.59	5.16	3.7	2.74	2.78
Trichloroethene	µg/L	30.3	43.8	41.9	36.9	32.3	32.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2016
Defense Depot Memphis, Tennessee

MW-264

Analyte	Sample Name / Sample Date	Unit	MW-264 5/17/2015	MW-264 10/7/2015	MW-264 4/22/2016	MW-264 10/15/2016	MW-264 4/20/2017	MW-264 10/8/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-265

	Sample Name	MW-265	MW-265	MW-265	MW-265	MW-265	MW-265
	Sample Date	5/17/2015	10/7/2015	4/22/2016	10/15/2016	4/20/2017	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	5.82	6.65	7.61	5.86	4.68	7.36
cis-1,2-Dichloroethene	µg/L	0.332 J	0.34 J	<1	0.404 J	0.563 J	0.266 J
Tetrachloroethene	µg/L	11.2	9.54	10.9	13.7	14.2	8.42
Trichloroethene	µg/L	6.29	5.39	5.51	8.1	8.71	4.46
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-266

Analyte	Sample Name / Sample Date	Unit	MW-266 5/16/2015	MW-266 10/7/2015	MW-266 4/21/2016	MW-266 10/15/2016	MW-266 4/19/2017	MW-266 10/7/2017
Carbon tetrachloride		µg/L	<1	<1	<1	1.44	0.278 J	0.437 J
Chloroform		µg/L	1.4	<0.3	<0.3	0.578	<0.3	0.183 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.401 J	0.433 J	0.459 J	3.57	<1	1.33
Trichloroethene		µg/L	0.257 J	0.496 J	0.436 J	0.669 J	0.405 J	0.505 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-267

Analyte	Sample Name / Sample Date / Unit	MW-267 5/16/2015	MW-267 10/7/2015	MW-267 4/21/2016	MW-267 10/15/2016	MW-267 4/19/2017	MW-267 10/8/2017
Carbon tetrachloride	µg/L	7.65	18.5	18.6	29.6	16.3	21.3
Chloroform	µg/L	0.892	0.455	0.441	0.503	0.388	0.581
cis-1,2-Dichloroethene	µg/L	<1	0.406 J	0.393 J	0.471 J	0.431 J	0.361 J
Tetrachloroethene	µg/L	21.1	35.1	33.5	41.7	35.2	37.7
Trichloroethene	µg/L	10.7	13.4	13.6	18.9	15.7	16.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-268

	Sample Name	MW-268	MW-268	MW-268	MW-268	MW-268	MW-268
	Sample Date	5/17/2015	10/7/2015	4/21/2016	10/15/2016	4/19/2017	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-269

Analyte	Sample Name / Sample Date	Unit	MW-269 7/31/2015	MW-269 10/8/2015	MW-269 4/23/2016	MW-269 10/15/2016	MW-269 4/22/2017	MW-269 10/8/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.14 J	<0.3	0.132 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	2.29	1.97	3.03	2.27	4.66	5.19
Tetrachloroethene		µg/L	40.3	33.6	56.6	38.9	64.9	70.1
Trichloroethene		µg/L	3.28	3.09	4.44	3.48	5.61	6.25
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-270

	Sample Name	MW-270	MW-270	MW-270	MW-270	MW-270	MW-270	MW-270
	Sample Date	5/15/2015	7/30/2015	10/7/2015	4/21/2016	10/15/2016	4/19/2017	10/9/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.199 J	0.237 J	0.2 J	0.187 J	0.175 J	<0.3	0.186 J
cis-1,2-Dichloroethene	µg/L	73.9	122	85.1	15.8	16.1	5.83	6.63
Tetrachloroethene	µg/L	0.461 J	0.639 J	0.54 J	0.356 J	0.29 J	<1	0.254 J
Trichloroethene	µg/L	164	285	206	59.4	53.7	23.3	25.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-271

Analyte	Sample Name / Sample Date	Unit	MW-271 5/16/2015	MW-271 10/7/2015	MW-271 4/21/2016	MW-271 10/15/2016	MW-271 4/19/2017	MW-271 10/9/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.353	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	2.67	0.321 J	0.283 J	0.253 J	<1	<1
Trichloroethene		µg/L	5.45	3.28	3.6	4.8	4.82	4.84
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-272

Analyte	Sample Name / Sample Date	Unit	MW-272 5/16/2015	MW-272 10/7/2015	MW-272 4/21/2016	MW-272 10/15/2016	MW-272 4/19/2017	MW-272 10/9/2017
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.493 J	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-273

	Sample Name	MW-273	MW-273	MW-273	MW-273	MW-273	MW-273
	Sample Date	7/31/2015	10/8/2015	4/23/2016	10/15/2016	4/22/2017	10/8/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-274

	Sample Name	MW-274	MW-274
	Sample Date	4/22/2017	10/10/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.288 J	0.889
cis-1,2-Dichloroethene	µg/L	<1	1.01
Tetrachloroethene	µg/L	1.53	3.17
Trichloroethene	µg/L	0.337 J	1.46
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-275

	Sample Name	MW-275	MW-275	MW-275
	Sample Date	12/9/2016	4/20/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1 UJ	<1	<1
Chloroform	µg/L	<0.3 UJ	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1 UJ	<1	<1
Tetrachloroethene	µg/L	<1 UJ	1	0.487 J
Trichloroethene	µg/L	<1 UJ	<1	<1
Vinyl chloride	µg/L	<1 UJ	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-276

	Sample Name	MW-276	MW-276	MW-276
	Sample Date	12/9/2016	4/20/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1 UJ	<1	<1
Chloroform	µg/L	0.222 J-	<0.3	0.145 J
cis-1,2-Dichloroethene	µg/L	<1 UJ	<1	<1
Tetrachloroethene	µg/L	<1 UJ	<1	<1
Trichloroethene	µg/L	<1 UJ	<1	<1
Vinyl chloride	µg/L	<1 UJ	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-277

	Sample Name	MW-277	MW-277	MW-277
	Sample Date	12/9/2016	4/19/2017	10/10/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-278

	Sample Name	MW-278	MW-278	MW-278
	Sample Date	12/9/2016	4/20/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.264 J	0.348 J	0.971 J
Tetrachloroethene	µg/L	1.93	2.54	7.26
Trichloroethene	µg/L	1.02	0.886 J	1.94
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-279

	Sample Name	MW-279	MW-279	MW-279
	Sample Date	12/9/2016	4/20/2017	10/6/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.654	0.77	0.286 J
cis-1,2-Dichloroethene	µg/L	<1	1.6	13.3
Tetrachloroethene	µg/L	39.5	67.1	58.8
Trichloroethene	µg/L	<1	0.368 J	3.16
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-280

	Sample Name	MW-280	MW-280	MW-280
	Sample Date	12/9/2016	4/19/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	1.78	3.24	0.331 J
Chloroform	µg/L	0.245 J	0.203 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	4.08	5.87	8.15
Trichloroethene	µg/L	2.59	3.95	1.71
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-281

	Sample Name	MW-281	MW-281	MW-281
	Sample Date	12/9/2016	4/21/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	4.81	4.57	4.91
cis-1,2-Dichloroethene	µg/L	1.92	2.31	2.12
Tetrachloroethene	µg/L	8.06	8.21	15.3
Trichloroethene	µg/L	52.5	49.9	66.2
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-282

	Sample Name	MW-282	MW-282	MW-282
	Sample Date	12/9/2016	4/21/2017	10/8/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-283

	Sample Name	MW-283	MW-283
	Sample Date	4/22/2017	10/10/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-01

	Sample Name	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01
	Sample Date	8/9/2006	12/6/2006	3/7/2007	6/4/2007	9/18/2007	12/18/2007	3/14/2008	6/16/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.15 J	<0.3	0.127 J	0.152 J	<0.3	<0.3	0.164 J	<0.3
cis-1,2-Dichloroethene	µg/L	1.96	2.27	2.06	2.19	2	2.17	2.55	1.86
Tetrachloroethene	µg/L	156	193	152	165	122	130	193	114
Trichloroethene	µg/L	40.6	46.4	36.3	39.9	35.5	39.5	54.2	32.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-01

	Sample Name	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01
	Sample Date	12/11/2008	3/12/2009	12/6/2011	2/5/2013	5/11/2013	8/17/2013	11/7/2013	2/6/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<2	<2	<5
Chloroform	µg/L	<0.3	<0.3	0.137 J	0.167 J	0.179 J	<0.6	<0.6	<1.5
cis-1,2-Dichloroethene	µg/L	1.78	1.32	15.6	15.3	11.2	9.62	93	211
Tetrachloroethene	µg/L	73.3	23.5	280	263	293	279	2.19	9.34
Trichloroethene	µg/L	23.9	7.6	50.1	51.2	61.6	55.5	0.813 J	5.36
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<2	<2	<5

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-01

	Sample Name	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01	PMW21-01
	Sample Date	5/7/2014	8/5/2014	11/5/2014	5/23/2016	10/13/2016	4/20/2017	10/6/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<5 UJ	<5 UJ	<10	<1	<1	<1	<1
Chloroform	µg/L	<1.5 UJ	<1.5 UJ	<3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	154 J	115 J	94.7	75.5	102	102	93.2
Tetrachloroethene	µg/L	<5 UJ	4.04 J	9.23 J	0.813 J	<1	<1	0.359 J
Trichloroethene	µg/L	<5 UJ	1.65 J	3.41 J	0.33 J	<1	<1	<1
Vinyl chloride	µg/L	<5 UJ	<5 UJ	<10	0.296 J	0.255 J	0.274 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-02

Analyte	Sample Name / Sample Date	Unit	PMW21-02 8/9/2006	PMW21-02 12/6/2006	PMW21-02 3/7/2007	PMW21-02 6/4/2007	PMW21-02 9/18/2007	PMW21-02 12/18/2007	PMW21-02 3/17/2008	PMW21-02 6/16/2008
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.144 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	1.51	0.825 J	0.823 J	0.739 J	0.782 J	0.626 J	0.478 J	0.251 J
Tetrachloroethene		µg/L	108	62.5	45.2	44.4	44.7	32.6	31.1	11.4
Trichloroethene		µg/L	37.8	22	17.6	18.3	19.8	17	12.6	12.8
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-02

	Sample Name	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02
	Sample Date	12/12/2008	3/12/2009	12/6/2011	2/7/2013	5/11/2013	8/18/2013	11/8/2013	2/6/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.03	0.891 J	4.2	4.5	4.74 J	5.18	5.66	4.71
Tetrachloroethene	µg/L	48.4	49.5	118	169	137	143	149	107
Trichloroethene	µg/L	20.4	21.4	30.1	44	47.5	54.3	52.5	44.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-02

	Sample Name	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02	PMW21-02
	Sample Date	5/8/2014	8/5/2014	11/5/2014	5/23/2016	10/13/2016	4/20/2017	10/6/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	6.48	5.97	7.08	12	10.7	14.4	14.5
Tetrachloroethene	µg/L	152	132	155	126	148	150	119
Trichloroethene	µg/L	53	49.7	51.1 J	53.2	51.9	61	71
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-03

Analyte	Unit	PMW21-03 8/10/2006	PMW21-03 12/6/2006	PMW21-03 3/7/2007	PMW21-03 6/4/2007	PMW21-03 9/19/2007	PMW21-03 12/18/2007	PMW21-03 3/17/2008	PMW21-03 6/13/2008
Sample Name		PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03
Sample Date		8/10/2006	12/6/2006	3/7/2007	6/4/2007	9/19/2007	12/18/2007	3/17/2008	6/13/2008
Carbon tetrachloride	µg/L	<1	J	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.173 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	2.55	0.527 J	0.485 J	0.355 J	0.636 J	0.403 J	0.407 J	0.504 J
Tetrachloroethene	µg/L	185	46.3	32.5	25.6	49	28.5	36.9	30.8
Trichloroethene	µg/L	58	14.6	9.78	6.73	15.9	9.84	8.96	9.73
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-03

	Sample Name	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03
	Sample Date	12/12/2008	3/12/2009	3/30/2010	10/5/2010	4/4/2011	10/5/2011	4/23/2012	10/19/2012
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	19.2	57.4	1.11	0.687 J	1.07	1.11	1.83	2.11
Tetrachloroethene	µg/L	22.2	18.7	59.7	45.9	39.5	55	83.5	88.8
Trichloroethene	µg/L	9.79	8.01	16.2	11.4	11.6	14.4	19.9	21.2
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-03

	Sample Name	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03	PMW21-03
	Sample Date	4/11/2013	10/12/2013	4/26/2014	10/18/2014	4/8/2015	10/7/2015	4/23/2016	10/13/2016
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	2.31	3.76	4.31	3.45	5.59	6.4	7.32	7.46
Tetrachloroethene	µg/L	112	115	130	87.3	98.2	110	107	104
Trichloroethene	µg/L	31	33.4	38.7	30.3	32.6	32.2	35.3	35.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-03

	Sample Name	PMW21-03	PMW21-03
	Sample Date	4/20/2017	10/6/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	9.01	10.4
Tetrachloroethene	µg/L	103	92.1
Trichloroethene	µg/L	35.3	41.5
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-04

	Sample Name	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04
	Sample Date	8/9/2006	12/6/2006	3/7/2007	6/4/2007	9/18/2007	12/18/2007	3/17/2008	6/13/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	< J	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.199 J	0.157 J	0.141 J	<0.3	<0.3	<0.3	0.131 J
cis-1,2-Dichloroethene	µg/L	2.94	2.47	2.46	2.08	2.22	1.83	1.58	2.32
Tetrachloroethene	µg/L	199	190	148	123	103	93.4	93.9	90.9
Trichloroethene	µg/L	87.7	84.5	64.3	60.2	50.7	49	47	55.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-04

	Sample Name	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04
	Sample Date	12/12/2008	3/12/2009	12/6/2011	2/7/2013	5/8/2013	8/17/2013	11/8/2013	2/8/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<5	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.144 J	<0.3	<0.3	<1.5	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	3.49	13.9	55.5	125	94.1	77.6	136	139
Tetrachloroethene	µg/L	16.2	13.5	211	276	21.1	25	115	74.1
Trichloroethene	µg/L	5.8	5.52	69.3	59.3	5.37	8.67	28.5	21.7
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<5	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-04

	Sample Name	PMW21-04	PMW21-04	PMW21-04	PMW21-04	PMW21-04
	Sample Date	5/7/2014	8/6/2014	11/6/2014	6/6/2016	10/13/2016
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.173 J	0.151 J	0.16 J	0.157 J
cis-1,2-Dichloroethene	µg/L	131	60.8	72	44.5	42.2
Tetrachloroethene	µg/L	77.5	247	300	266	293
Trichloroethene	µg/L	22.7	73	89.2	115	122
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-05

Analyte	Unit	PMW21-05 8/10/2006	PMW21-05 12/5/2006	PMW21-05 3/7/2007	PMW21-05 6/5/2007	PMW21-05 9/18/2007	PMW21-05 12/18/2007	PMW21-05 3/14/2008	PMW21-05 6/16/2008
Sample Name		PMW21-05	PMW21-05	PMW21-05	PMW21-05	PMW21-05	PMW21-05	PMW21-05	PMW21-05
Sample Date		8/10/2006	12/5/2006	3/7/2007	6/5/2007	9/18/2007	12/18/2007	3/14/2008	6/16/2008
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.525 J	0.278 J	0.346 J	0.442 J	0.52 J	0.527 J	0.29 J	<1
Tetrachloroethene	µg/L	6.37	8.66	18.7	27.9	36.3	50.3	43.2	36.9
Trichloroethene	µg/L	34.4	18.3	14	17.1	30.2	18.2	34.6	10.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-05

Analyte	Unit	Sample Name: PMW21-05 Sample Date: 12/11/2008	PMW21-05 3/12/2009	PMW21-05 4/1/2010	PMW21-05 10/6/2010	PMW21-05 4/4/2011	PMW21-05 10/5/2011	PMW21-05 4/23/2012	PMW21-05 10/19/2012
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.865 J	1.47	0.851 J	0.798 J	0.939 J	0.298 J	0.378 J	<1
Tetrachloroethene	µg/L	40.3	61.2	57.7	43.1	40.6	19.5	20.3	12.3
Trichloroethene	µg/L	10.4	13	5.71	4.24	3.78	1.46	1.34	0.867 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-05

Analyte	Sample Name / Sample Date	Unit	PMW21-05 4/11/2013	PMW21-05 10/12/2013	PMW21-05 4/26/2014	PMW21-05 10/18/2014	PMW21-05 4/8/2015	PMW21-05 10/7/2015	PMW21-05 4/23/2016	PMW21-05 10/14/2016
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	0.463 J	0.515 J	0.861 J	0.977 J	2.29	0.62 J
Tetrachloroethene		µg/L	14.4	12.5	10.6	13.5	27.7	38.9	30.4	24.2
Trichloroethene		µg/L	0.892 J	0.763 J	0.786 J	1.13	1.61	1.72	1.96	1.31
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW21-05

	Sample Name	PMW21-05	PMW21-05
	Sample Date	4/20/2017	10/7/2017
Analyte	**Unit**		
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.469 J	0.368 J
Tetrachloroethene	µg/L	16.2	10.2
Trichloroethene	µg/L	2.16	2.35
Vinyl chloride	µg/L	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-01

	Sample Name	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01
	Sample Date	8/30/2006	12/8/2006	3/13/2007	6/1/2007	9/10/2007	12/10/2007	3/13/2008	6/18/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	222	199	161	171	102	72.9	24.5	57.3
Chloroform	µg/L	58.9	56.9	46.4	56.1	63.7	41	36.3	29.9
cis-1,2-Dichloroethene	µg/L	28.3	25.8	13.4	8.2	18	12.2	79.3	18.3
Tetrachloroethene	µg/L	79.6	76.6	51.2	57.2	45.3	30.7	16.3	19.3
Trichloroethene	µg/L	26.1	23.7	18.1	12.5	12.7	10.1	6.59	7.68
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-01

	Sample Name	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01
	Sample Date	12/8/2008	3/13/2009	12/12/2011	2/9/2013	5/10/2013	8/13/2013	11/5/2013	2/10/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	0.942 J	<1	102	0.322 J	<1	<10	<5	<10
Chloroform	µg/L	78 J	0.455	42.5	0.685	<0.3	<3	<1.5	<3
cis-1,2-Dichloroethene	µg/L	29.8	50.4	37.3	79.3	55.1	51.8	22.6	21.7
Tetrachloroethene	µg/L	22.5	0.896 J	57.2	1.03	0.451 J	<10	<5	<10
Trichloroethene	µg/L	7.33	<1	20.2	<1	<1	<10	<5	<10
Vinyl chloride	µg/L	<1	<1	<1	0.364 J	1.89	<10	<5	<10

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-01

	Sample Name	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01	PMW85-01
	Sample Date	5/11/2014	8/11/2014	11/10/2014	4/21/2016	10/15/2016	4/19/2017	10/7/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	26.5	92.7	53.7	91.5	36.2	30.5	13.1
Tetrachloroethene	µg/L	0.476 J	0.854 J	0.411 J	14.5	<1	<1	<1
Trichloroethene	µg/L	0.271 J	0.791 J	<1	6.23	<1	<1	<1
Vinyl chloride	µg/L	0.519 J	0.504 J	0.445 J	1.75	42.2	57.1	36.9

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-05

	Sample Name	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05
	Sample Date	3/13/2007	5/31/2007	9/10/2007	12/11/2007	3/12/2008	6/18/2008	12/8/2008	3/17/2009
Analyte	**Unit**								
Carbon tetrachloride	µg/L	155	157	152	158	154	143	44.5 J	5.13
Chloroform	µg/L	68.9	69	70.9	64.6	63.8	73.6	98.7 J	86.4
cis-1,2-Dichloroethene	µg/L	83.3	84.1	88.9	83.8	87.9	94.8	127	166
Tetrachloroethene	µg/L	119	119	116	127	138	126	71	30.5
Trichloroethene	µg/L	37.9	36.5	35.4	39.3	38.7	34.5	26.6	14.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-05

	Sample Name	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05
	Sample Date	12/13/2011	10/22/2012	2/9/2013	5/8/2013	8/13/2013	11/6/2013	2/10/2014	5/12/2014
Analyte	**Unit**								
Carbon tetrachloride	µg/L	77.6	62.8	47.7	72.3 J	78.6	75.3	75.3	79.3
Chloroform	µg/L	34.8	30.1	24.5	32.4	32.3	34.3	31.6	34.2
cis-1,2-Dichloroethene	µg/L	81.9	101	83.4	85.1	83.4	66.1	59.1	51.3
Tetrachloroethene	µg/L	79.1	70.1	75.7	106	110	97.8	117	108
Trichloroethene	µg/L	25.6	24	22.5	31.7	33.1	28.4	30.5	29.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW85-05

	Sample Name	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05	PMW85-05
	Sample Date	8/11/2014	11/10/2014	4/22/2016	10/15/2016	4/19/2017	10/7/2017
Analyte	**Unit**						
Carbon tetrachloride	µg/L	89.5	88.6	2.38	25.6	1.1	<1
Chloroform	µg/L	37.3	37.5	3.84	18.1	1.66	0.971
cis-1,2-Dichloroethene	µg/L	61.4	60.6	147	48.8	51.8	123
Tetrachloroethene	µg/L	106	122	9.52	83.9	54.2	7.9
Trichloroethene	µg/L	30.9	36.7	5.87	27.6	17.5	4.99
Vinyl chloride	µg/L	<1	<1	0.819 J	2.49	8.7	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-02

	Sample Name	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02
	Sample Date	8/31/2006	12/7/2006	3/8/2007	5/30/2007	9/12/2007	12/12/2007	3/10/2008
Analyte	**Unit**							
Carbon tetrachloride	µg/L	19.8	0.462 J	<1	<1 J	<1	<1	<1
Chloroform	µg/L	12.2	4.42	8.75	8.52	0.751	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	10.9	172 J	171	150	130	123	87.7
Tetrachloroethene	µg/L	157	13	1.58	1.47 B	0.689 J	<1	<1
Trichloroethene	µg/L	5.81	4.03	0.518 J	0.283 J	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-02

Analyte	Sample Name / Sample Date	Unit	PMW92-02 6/10/2008	PMW92-02 12/11/2008	PMW92-02 3/16/2009	PMW92-02 12/12/2011	PMW92-02 4/11/2013	PMW92-02 10/12/2013	PMW92-02 4/24/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	130	99.2	124	184	122	149	133
Tetrachloroethene		µg/L	<1	<1	<1	<1	0.327 J	0.385 J	0.609 J
Trichloroethene		µg/L	<1	<1	<1	<1	<1	0.559 J	0.322 J
Vinyl chloride		µg/L	<1	<1	<1	0.337 J	0.54 J	0.902 J	2.04

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-02

	Sample Name	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02	PMW92-02
	Sample Date	10/20/2014	4/10/2015	10/6/2015	4/21/2016	10/13/2016	4/19/2017	10/7/2017
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	119	97.1	53.1	51.4	26.9	11.3	5.3
Tetrachloroethene	µg/L	0.278 J	0.67 J	2.81	9.31	28	<1	0.79 J
Trichloroethene	µg/L	0.345 J	0.752 J	0.795 J	1.43	1.09	<1	<1
Vinyl chloride	µg/L	17.1	40.4	60.8	43.5	59	95.7	72.2

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-03

	Sample Name	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03
	Sample Date	8/30/2006	12/7/2006	3/8/2007	5/30/2007	9/12/2007	12/12/2007	3/11/2008	6/11/2008
Analyte	**Unit**								
Carbon tetrachloride	µg/L	58.1	41.9	19.3	7.59	2.32	0.969 J	0.586 J	<1
Chloroform	µg/L	19.2	18.9	27.4	31	25.7	3.12	0.994	0.49
cis-1,2-Dichloroethene	µg/L	19.9	21.3	70.7	166	182	159	161	159
Tetrachloroethene	µg/L	252	252	170	54.4	31.8	30.9	30.8	27.1
Trichloroethene	µg/L	11.5	12	9.92	7.03	5.09	6.91	4.66	8.79
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	0.262 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-03

	Sample Name	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03	PMW92-03
	Sample Date	12/11/2008	3/16/2009	4/7/2010	10/4/2010	4/3/2011	10/3/2011	4/21/2012	10/22/2012
Analyte	**Unit**								
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.151 J	<0.3	<0.3	0.26 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	159	139	112	83	73.4 J	51.9	54.2	42.6
Tetrachloroethene	µg/L	33.3	15.6	66.6	104	136	147	112	145
Trichloroethene	µg/L	12.7	5.99	18.2	19	21.1	15.1	18.9	15.2
Vinyl chloride	µg/L	<1	<1	<1	0.528 J	0.286 J	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-03

Analyte	Sample Name / Sample Date	Unit	PMW92-03 2/9/2013	PMW92-03 5/9/2013	PMW92-03 8/13/2013	PMW92-03 11/6/2013	PMW92-03 2/11/2014	PMW92-03 5/11/2014	PMW92-03 8/11/2014	PMW92-03 11/9/2014
Carbon tetrachloride		µg/L	<1	<1	<1	<5	<5	<10 UJ	<20	<10
Chloroform		µg/L	<0.3	<0.3	<0.3	<1.5	<1.5	5310 J	197	<3
cis-1,2-Dichloroethene		µg/L	33	36	50.4	54.4	33.4	20.3 J	13.3 J	8.76 J
Tetrachloroethene		µg/L	154	125	149	12.8	9.11	5.01 J	<20	2.96 J
Trichloroethene		µg/L	11.6	12.1	14.9	<5	<5	<10 UJ	<20	<10
Vinyl chloride		µg/L	<1	<1	1.61	<5	<5	<10 UJ	<20	<10

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW92-03

	Sample Name	PMW92-03	PMW92-03	PMW92-03	PMW92-03
	Sample Date	4/22/2016	10/13/2016	4/19/2017	10/7/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<10	<5	<1	<1
Chloroform	µg/L	<3	<1.5	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	17.9	26	27.7 J	24.6
Tetrachloroethene	µg/L	<10	<5	<1	0.535 J
Trichloroethene	µg/L	<10	<5	0.547 J	0.463 J
Vinyl chloride	µg/L	4.45 J	2.87 J	4.79	7.76

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02A

	Sample Name	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A
	Sample Date	8/22/2006	12/4/2006	3/5/2007	5/29/2007	9/13/2007	12/14/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	0.267 J	0.224 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	6.72	51.2	70.4	58.7
Tetrachloroethene	µg/L	257	192	176	50.8	12.4	13.9
Trichloroethene	µg/L	0.322 J	<1	3.22	6.43	1.47	1.34
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02A

	Sample Name	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A
	Sample Date	3/10/2008	6/10/2008	12/8/2008	3/9/2009	12/6/2011	2/6/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	48	37.7	31.2	37.7	2.09	8.01
Tetrachloroethene	µg/L	20.3	24.5	24	5.21	45.4	21.4
Trichloroethene	µg/L	3.92	5.97	2.28	<1	0.558 J	1.82
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02A

	Sample Name	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A	PMW101-02A
	Sample Date	5/13/2013	8/16/2013	11/9/2013	2/8/2014	5/9/2014	8/8/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<10	<5	<2	<2	<5	<10 UJ
Chloroform	µg/L	<3	<1.5	<0.6	<0.6	<1.5	<3 UJ
cis-1,2-Dichloroethene	µg/L	16	11.9	8.62	9.55	10.1	19.4 J
Tetrachloroethene	µg/L	<10	<5	2.15	<2	<5	<10 UJ
Trichloroethene	µg/L	<10	<5	1.39 J	<2	<5	<10 UJ
Vinyl chloride	µg/L	<10	<5	<2	<2	<5	<10 UJ

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02A

Analyte	Sample Name / Sample Date	Unit	PMW101-02A 11/7/2014	PMW101-02A 4/23/2016	PMW101-02A 10/14/2016	PMW101-02A 4/21/2017	PMW101-02A 4/24/2017	PMW101-02A 10/6/2017
Carbon tetrachloride		µg/L	<10	<10	<1	<1 UJ	<5	<1
Chloroform		µg/L	<3	<3	<0.3	<0.3 UJ	<1.5	<0.3 U
cis-1,2-Dichloroethene		µg/L	3.74 J	4.09 J	10.6	7.35 J-	3.89 J	6.18
Tetrachloroethene		µg/L	<10	5.85 J	0.467 J	<1 UJ	3.63 J	<1
Trichloroethene		µg/L	<10	<10	<1	<1 UJ	<5	<1
Vinyl chloride		µg/L	<10	<10	<1	<1 UJ	<5	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02B

	Sample Name	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B
	Sample Date	8/22/2006	12/4/2006	3/5/2007	5/29/2007	9/13/2007	12/14/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	0.202 J	0.233 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.326 J	<1	7.27	93.3	110	101
Tetrachloroethene	µg/L	196	191	151	15.3	0.613 J	<1
Trichloroethene	µg/L	4.73	1.25	11.1	4.29	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02B

	Sample Name	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B
	Sample Date	3/10/2008	6/9/2008	12/8/2008	3/9/2009	12/6/2011	2/6/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	87.7	96.1	55	35.2	0.442 J	25.3
Tetrachloroethene	µg/L	<1	<1	4.03	27	25.5	11.3
Trichloroethene	µg/L	<1	0.698 J	5.41	21	1.86	2.17
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02B

	Sample Name	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B	PMW101-02B
	Sample Date	5/13/2013	8/16/2013	11/9/2013	2/7/2014	5/9/2014	8/9/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<10	<5	<1	<5	<5	<5
Chloroform	µg/L	<3	<1.5	<0.3	<1.5	<1.5	<1.5
cis-1,2-Dichloroethene	µg/L	27.8	32.9	37.5	28	34.5	6.56
Tetrachloroethene	µg/L	<10	1.25 J	1.58	<5	<5	<5
Trichloroethene	µg/L	<10	<5	3.21	<5	<5	<5
Vinyl chloride	µg/L	<10	<5	<1	<5	<5	<5

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-02B

Analyte	Sample Name / Sample Date	Unit	PMW101-02B 11/8/2014	PMW101-02B 4/23/2016	PMW101-02B 10/14/2016	PMW101-02B 4/21/2017	PMW101-02B 10/6/2017
Carbon tetrachloride		µg/L	<10	<10	<1	<1	<1
Chloroform		µg/L	<3	<3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	16.9	16.5	24.3	18.3	14.3
Tetrachloroethene		µg/L	<10	<10	0.268 J	0.257 J	<1
Trichloroethene		µg/L	<10	<10	<1	<1	<1
Vinyl chloride		µg/L	<10	<10	2.39	4.53	4.58

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03A

Analyte	Sample Name / Sample Date / Unit	PMW101-03A 8/23/2006	PMW101-03A 12/4/2006	PMW101-03A 3/5/2007	PMW101-03A 5/30/2007	PMW101-03A 9/17/2007	PMW101-03A 12/13/2007
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.17 J	0.153 J	0.139 J	0.138 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	12.2	38
Tetrachloroethene	µg/L	100	112	99.7	88	60.1	24.9
Trichloroethene	µg/L	<1	<1	<1	<1	0.471 J	0.325 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03A

	Sample Name	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A
	Sample Date	3/11/2008	6/10/2008	12/8/2008	3/9/2009	12/8/2011	4/10/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	38.1	56.5	73	68.1	1.97	0.637 J
Tetrachloroethene	µg/L	9.23	1.93	0.766 J	0.885 J	36.5	33.9
Trichloroethene	µg/L	0.278 J	<1	<1	0.534 J	1.59	0.886 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03A

	Sample Name	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A	PMW101-03A
	Sample Date	10/12/2013	4/26/2014	10/18/2014	4/8/2015	10/7/2015	4/23/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	5.83	26.4	29.5	20.5	9.82	4.21
Tetrachloroethene	µg/L	35	1.31	<1	0.264 J	<1	1.56
Trichloroethene	µg/L	0.838 J	<1	<1	<1	<1	1.01
Vinyl chloride	µg/L	<1	<1	0.301 J	6.46	14.8	13.1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03A

	Sample Name	PMW101-03A	PMW101-03A	PMW101-03A
	Sample Date	10/14/2016	4/21/2017	10/6/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	2.75	1.63	1.17
Tetrachloroethene	µg/L	6.57	18.8	24.8
Trichloroethene	µg/L	1.9	2.05	2.35
Vinyl chloride	µg/L	12.2	7.08	4.65

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03B

	Sample Name	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B
	Sample Date	8/23/2006	12/4/2006	3/5/2007	5/29/2007	9/17/2007	12/13/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	0.186 J	0.182 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	26.4	19.9	91.5	87.6
Tetrachloroethene	µg/L	144	194	134	123	14.4	13.8
Trichloroethene	µg/L	2.41	1.66	1.7	2	1.02	1.57
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03B

	Sample Name	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B
	Sample Date	3/11/2008	6/10/2008	12/8/2008	3/9/2009	12/8/2011	4/10/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	87.6	86.8	60.8	58.1	0.884 J	0.637 J
Tetrachloroethene	µg/L	8.59	3.3	5.75	10.4	40.4	41.4
Trichloroethene	µg/L	1.08	0.975 J	0.958 J	3.31	1.46	2.16
Vinyl chloride	µg/L	<1	<1	<1	<1	0.595 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03B

	Sample Name	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B	PMW101-03B
	Sample Date	10/12/2013	4/26/2014	10/18/2014	4/8/2015	10/7/2015	4/23/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	6.35	31.5	19	12	6.37	5.32
Tetrachloroethene	µg/L	42.4	0.827 J	8.27	25.7	35.1	34.6
Trichloroethene	µg/L	1.34	<1	3.28	2.55	4.53	4.44
Vinyl chloride	µg/L	1.27	3.93	3.65	2.51	1.77	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-03B

	Sample Name	PMW101-03B	PMW101-03B	PMW101-03B
	Sample Date	10/14/2016	4/21/2017	10/6/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	0.186 J	0.139 J
cis-1,2-Dichloroethene	µg/L	3.25	0.284 J	0.317 J
Tetrachloroethene	µg/L	39.4	51.7	43.5
Trichloroethene	µg/L	2.93	0.747 J	0.696 J
Vinyl chloride	µg/L	1.13	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04A

Analyte	Sample Name / Sample Date	Unit	PMW101-04A 8/22/2006	PMW101-04A 12/5/2006	PMW101-04A 3/6/2007	PMW101-04A 5/31/2007	PMW101-04A 9/17/2007	PMW101-04A 12/14/2007
Carbon tetrachloride		µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform		µg/L	0.199 J	0.163 J	0.144 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	20.9	86.9	72.6
Tetrachloroethene		µg/L	199	176	177	138	12.2	5.89
Trichloroethene		µg/L	0.26 J	<1	<1	1.2	1.31	0.294 J
Vinyl chloride		µg/L	<1	<1	<1	<1	0.277 J	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04A

Analyte	Sample Name / Sample Date	Unit	PMW101-04A 3/11/2008	PMW101-04A 6/11/2008	PMW101-04A 12/8/2008	PMW101-04A 3/10/2009	PMW101-04A 4/1/2010	PMW101-04A 10/14/2010
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	81.3	42.6	60.7	47	29	13.5 J
Tetrachloroethene		µg/L	5.7	4.64	13.9	22.6	33	44.6 J
Trichloroethene		µg/L	0.559 J	1.65	2.65	6.83	6.93	7.89 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04A

	Sample Name	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A
	Sample Date	4/4/2011	10/6/2011	4/22/2012	10/22/2012	2/7/2013	5/13/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	7.76	3.12	2.09	1.35	1.03	2.29
Tetrachloroethene	µg/L	57.3	59.6	53.4	46.9	51.1	45.6
Trichloroethene	µg/L	6.1	2.11	1.44	0.977 J	0.806	0.967 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04A

	Sample Name	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A
	Sample Date	8/15/2013	11/8/2013	2/7/2014	5/9/2014	8/9/2014	11/8/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	11.4	20.4	23.4	23.3	22.1	21.4
Tetrachloroethene	µg/L	25.5	6.35	2.73	3.1	3.71	5.49
Trichloroethene	µg/L	1.13	0.927 J	1.14	1.95	2.75	3.63
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04A

	Sample Name	PMW101-04A	PMW101-04A	PMW101-04A	PMW101-04A
	Sample Date	4/23/2016	10/14/2016	4/21/2017	10/6/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	5.1	6.58	4.27	5.1
Tetrachloroethene	µg/L	16.9	13.1	16.9	18.4
Trichloroethene	µg/L	4.04	4.05	3.61	4.62
Vinyl chloride	µg/L	2.18	2.87	2.03	1.74

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04B

	Sample Name	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B
	Sample Date	8/29/2006	12/5/2006	3/6/2007	5/31/2007	9/17/2007	12/14/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	<0.3	0.172 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.971 J	0.394 J	18.8	86.3	72.1	48.1
Tetrachloroethene	µg/L	90.4	109	104	19.1	14.1	29.3
Trichloroethene	µg/L	23.2	9.06	3.04	1.24	1.65	2.91
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04B

	Sample Name	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B
	Sample Date	3/11/2008	6/10/2008	12/10/2008	3/10/2009	4/1/2010	10/5/2010
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	69.3	52.2	26	37.2	0.708 J	<1
Tetrachloroethene	µg/L	5.33	12.8	37	22.4	35.7	28.7
Trichloroethene	µg/L	1.6	4.85	5.02	2.39	3.87	3.09
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04B

	Sample Name	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B
	Sample Date	4/4/2011	10/6/2011	4/22/2012	10/19/2012	2/7/2013	5/8/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	0.281 J	<1	2.46
Tetrachloroethene	µg/L	26.1	31.2	30.9	28.5	37.2	33.7
Trichloroethene	µg/L	2.79	3.23	3.82	5.6	3.25	3.38
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04B

	Sample Name	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B
	Sample Date	8/15/2013	11/8/2013	2/7/2014	5/10/2014	8/9/2014	11/8/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	3.94	8.17	7.85	7.4	5.11	5.01
Tetrachloroethene	µg/L	29.6	22.1	22.5	23.2	22.2	26.1
Trichloroethene	µg/L	3.47	2.02	2.5	2.81	2.69	3.02
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-04B

	Sample Name	PMW101-04B	PMW101-04B	PMW101-04B	PMW101-04B
	Sample Date	4/23/2016	10/14/2016	4/21/2017	10/6/2017
Analyte	**Unit**				
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.176 J	0.197 J	0.238 J
cis-1,2-Dichloroethene	µg/L	<1	0.503 J	0.26 J	<1
Tetrachloroethene	µg/L	49.5	54.1	53.2	50.7
Trichloroethene	µg/L	0.707 J	0.833 J	0.795 J	0.951 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06A

	Sample Name	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A
	Sample Date	8/23/2006	12/4/2006	3/6/2007	5/31/2007	9/18/2007	12/17/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	0.68 J	2.9	0.798 J	0.364 J
Tetrachloroethene	µg/L	4.16	5.66	5.86	4.62 B	7.26	7.19
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06A

	Sample Name	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A
	Sample Date	3/12/2008	6/12/2008	12/10/2008	3/10/2009	12/9/2011	4/10/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.917 J	0.414 J	3.63	1.71	<1	0.36 J
Tetrachloroethene	µg/L	7.13	5.52	0.341 J	1.17	2.32	1.29
Trichloroethene	µg/L	0.252 J	<1	0.266 J	0.607 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06A

	Sample Name	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A	PMW101-06A
	Sample Date	10/12/2013	4/26/2014	10/19/2014	4/8/2015	10/7/2015	4/23/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.143 J
cis-1,2-Dichloroethene	µg/L	1.76	0.404 J	<1	<1	<1	<1
Tetrachloroethene	µg/L	1.28	1.14	1.54	3.13	4.71	6.04
Trichloroethene	µg/L	0.312 J	0.467 J	0.27 J	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020. SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

B Estimated results possibly biased high or false positive based on blank data

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06A

	Sample Name	PMW101-06A	PMW101-06A	PMW101-06A
	Sample Date	10/14/2016	4/20/2017	10/6/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	0.244 J	0.263 J
cis-1,2-Dichloroethene	µg/L	<1	0.645 J	<1
Tetrachloroethene	µg/L	5.84	29.3 J	11.4
Trichloroethene	µg/L	<1	1.65	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
B Estimated results possibly biased high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06B

	Sample Name	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B
	Sample Date	8/24/2006	12/5/2006	3/6/2007	5/31/2007	9/18/2007	12/14/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	0.166 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.687 J	0.722 J	45	40.3	39.7	40.5
Tetrachloroethene	µg/L	23.3	37.6	0.294 J	<1	<1	2.63
Trichloroethene	µg/L	16.2	18.6	<1	<1	<1	1.04
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06B

	Sample Name	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B
	Sample Date	3/12/2008	6/11/2008	12/10/2008	3/11/2009	12/9/2011	4/10/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	45.8	39.3 J	31.9	25.5	<1	0.998 J
Tetrachloroethene	µg/L	3.24	1.15 J	<1	<1	16.6	18
Trichloroethene	µg/L	1.72	1.28 J	<1	<1	4.32	3.97
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06B

	Sample Name	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B	PMW101-06B
	Sample Date	10/12/2013	4/26/2014	10/19/2014	4/8/2015	10/7/2015	4/23/2016
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	0.16 J	0.138 J
cis-1,2-Dichloroethene	µg/L	2.37	4.15	3.11	0.607 J	0.602 J	0.439 J
Tetrachloroethene	µg/L	16	14.2	20.4	32.1	29.7	33.6
Trichloroethene	µg/L	2.98	2.39	2.13	2.25	1.85	1.62
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-06B

	Sample Name	PMW101-06B	PMW101-06B	PMW101-06B
	Sample Date	10/14/2016	4/20/2017	10/6/2017
Analyte	**Unit**			
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.195 J	0.189 J	0.298 J
cis-1,2-Dichloroethene	µg/L	1.27	<1	0.714 J
Tetrachloroethene	µg/L	30.1	8.06	28.5
Trichloroethene	µg/L	1.93	<1	3.22
Vinyl chloride	µg/L	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07A

	Sample Name	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A
	Sample Date	8/25/2006	12/5/2006	3/6/2007	5/31/2007	9/18/2007	12/17/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.263 J	<1	<1	0.432 J	0.488 J	0.42 J
Tetrachloroethene	µg/L	0.562 J	0.65 J	0.662 J	0.747 B	0.294 J	0.271 J
Trichloroethene	µg/L	0.782 J	0.532 J	0.54 J	0.27 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07A

	Sample Name	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A
	Sample Date	3/13/2008	6/12/2008	12/10/2008	3/11/2009	12/9/2011	2/7/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.261 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.435 J	0.327 J	0.527 J	0.39 J	0.361 J	0.318 J
Trichloroethene	µg/L	0.502 J	0.296 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07A

	Sample Name	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A
	Sample Date	5/13/2013	8/15/2013	11/10/2013	2/7/2014	5/10/2014	8/8/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1 UJ	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3 UJ	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1 UJ	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1 UJ	<1
Trichloroethene	µg/L	0.347 J	0.272 J	0.265 J	0.317 J	0.268 J	0.304 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1 UJ	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07A

	Sample Name	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A	PMW101-07A
	Sample Date	11/8/2014	4/23/2016	10/14/2016	4/20/2017	10/6/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.367 J	0.641 J	<1	0.962 J
Trichloroethene	µg/L	0.311 J	0.364 J	0.31 J	0.285 J	0.378 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07B

	Sample Name	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B
	Sample Date	8/24/2006	12/5/2006	3/6/2007	5/31/2007	9/18/2007	12/18/2007
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	0.431	0.275 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	14.6	11.8	1.9	1.44	1.37	1.61
Tetrachloroethene	µg/L	53.6	46.4	24.3	21.4	22.8	21.6
Trichloroethene	µg/L	187	154	47	37	40.1	46.3
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07B

	Sample Name	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B
	Sample Date	3/13/2008	6/12/2008	12/10/2008	3/11/2009	12/9/2011	2/7/2013
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.74	5.49	1.39	1.74	1.35	1.68
Tetrachloroethene	µg/L	20.6	14.9	13.3	14.4	14.2	15.1
Trichloroethene	µg/L	43	34	24.5	29.2	28.9	32.7
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07B

	Sample Name	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B
	Sample Date	5/12/2013	8/15/2013	11/10/2013	41678	5/10/2014	8/8/2014
Analyte	**Unit**						
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.94	1.4	1.4	1.41	1.17 J	1.37
Tetrachloroethene	µg/L	14.5	12.7	11.6	11.3	16.3	9.88
Trichloroethene	µg/L	36	32.4	27.1	28.9	24.3	24.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PMW101-07B

	Sample Name	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B	PMW101-07B
	Sample Date	11/8/2014	4/24/2016	10/14/2016	4/20/2017	10/6/2017
Analyte	**Unit**					
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.39	1.37	1.15	1.44	1.33
Tetrachloroethene	µg/L	13	10.1	9.19	8.61	9.08
Trichloroethene	µg/L	26.6	25.6	18.5	19.2	22.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990
µg/L micrograms per liter

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PZ-03

Analyte	Sample Name / Sample Date	Unit	PZ-03 3/20/2002	PZ-03 5/26/2004	PZ-03 2/23/2005	PZ-03 10/5/2006	PZ-03 10/5/2007	PZ-03 10/14/2008	PZ-03 10/11/2009	PZ-03 10/15/2010
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	0.2J	0.198 J	0.139 J	0.29 J	0.192 J	0.203 J
cis-1,2-Dichloroethene		µg/L	0.55J	<1	0.26J	<1	<1	<1	<1	0.287 J
Tetrachloroethene		µg/L	7.1	4.4	5	3.89	0.523 J	4.38	3.99	2.04
Trichloroethene		µg/L	0.86J	0.6J	0.85J	0.917 J	0.321 J	1.07	1.23	1.23
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - MI LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

PZ-03

	Sample Name	PZ-03	PZ-03	PZ-03	PZ-03	PZ-03	PZ-03	PZ-03
	Sample Date	10/8/2011	10/22/2012	10/11/2013	10/21/2014	10/8/2015	5/23/2016	10/18/2016
Analyte	**Unit**							
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.235 J	0.261 J	0.263 J	0.265 J	0.284 J	0.259 J	0.204 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	3.39	3.34	2.43 J	1.72	1.4	1.29	1.07
Trichloroethene	µg/L	2.64	3.76	5.81 J	9.88	14.8	14	14.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:

VOC samples analyzed using methods SW8010/8020.
SW8240, SW8260, SW8260A, SW8260B, or CV3990

µg/L micrograms per liter

DQE Flags:

J Estimated results based on QC data or reported below RL

< Not detected at sample reporting limit

H

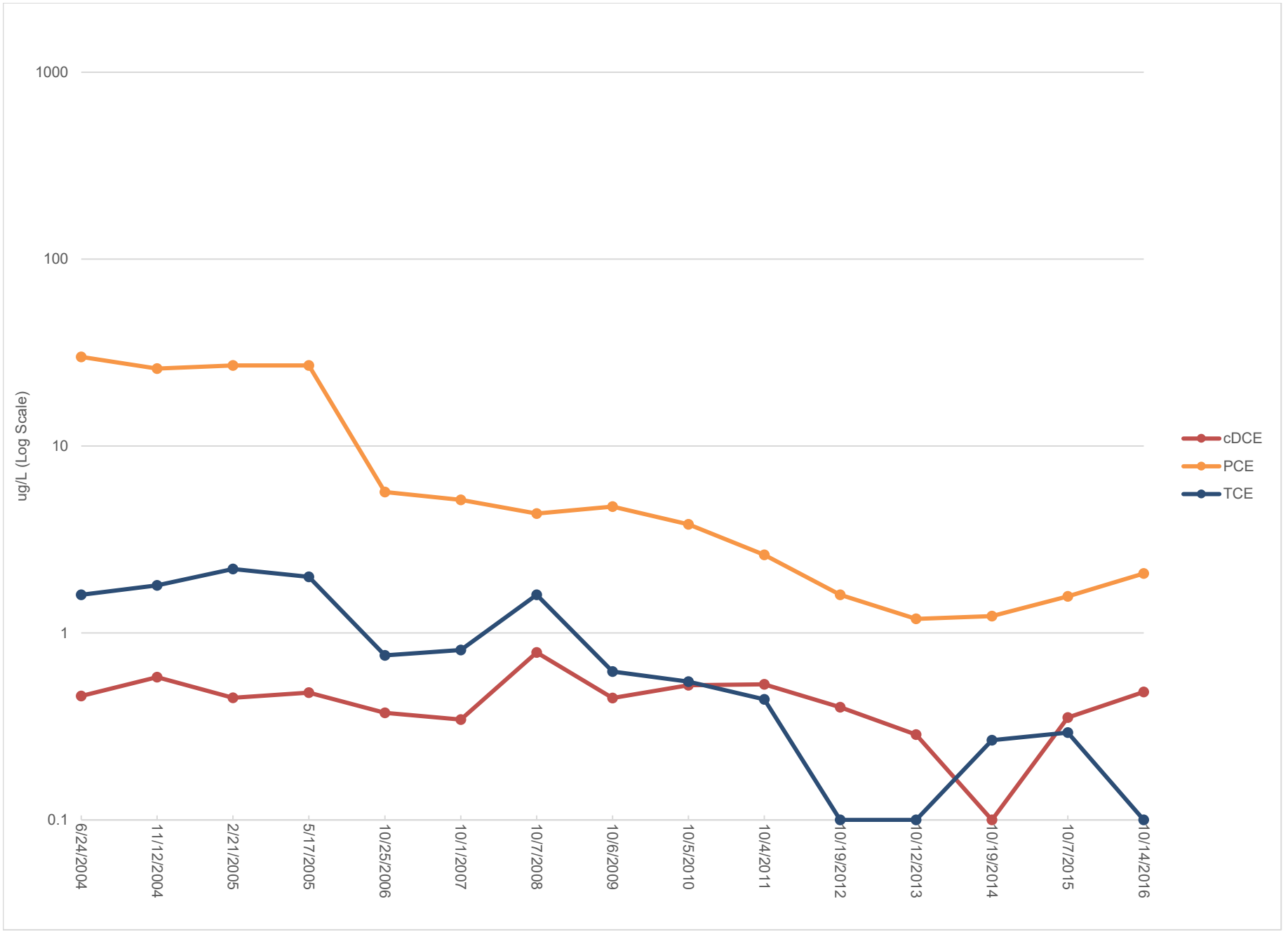
Appendix H.

CVOC Time-Trend Plots – Main Installation

Appendix H-1
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer TTA-1N Wells

DR1-7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10/6/2009
10/5/2010
10/4/2011
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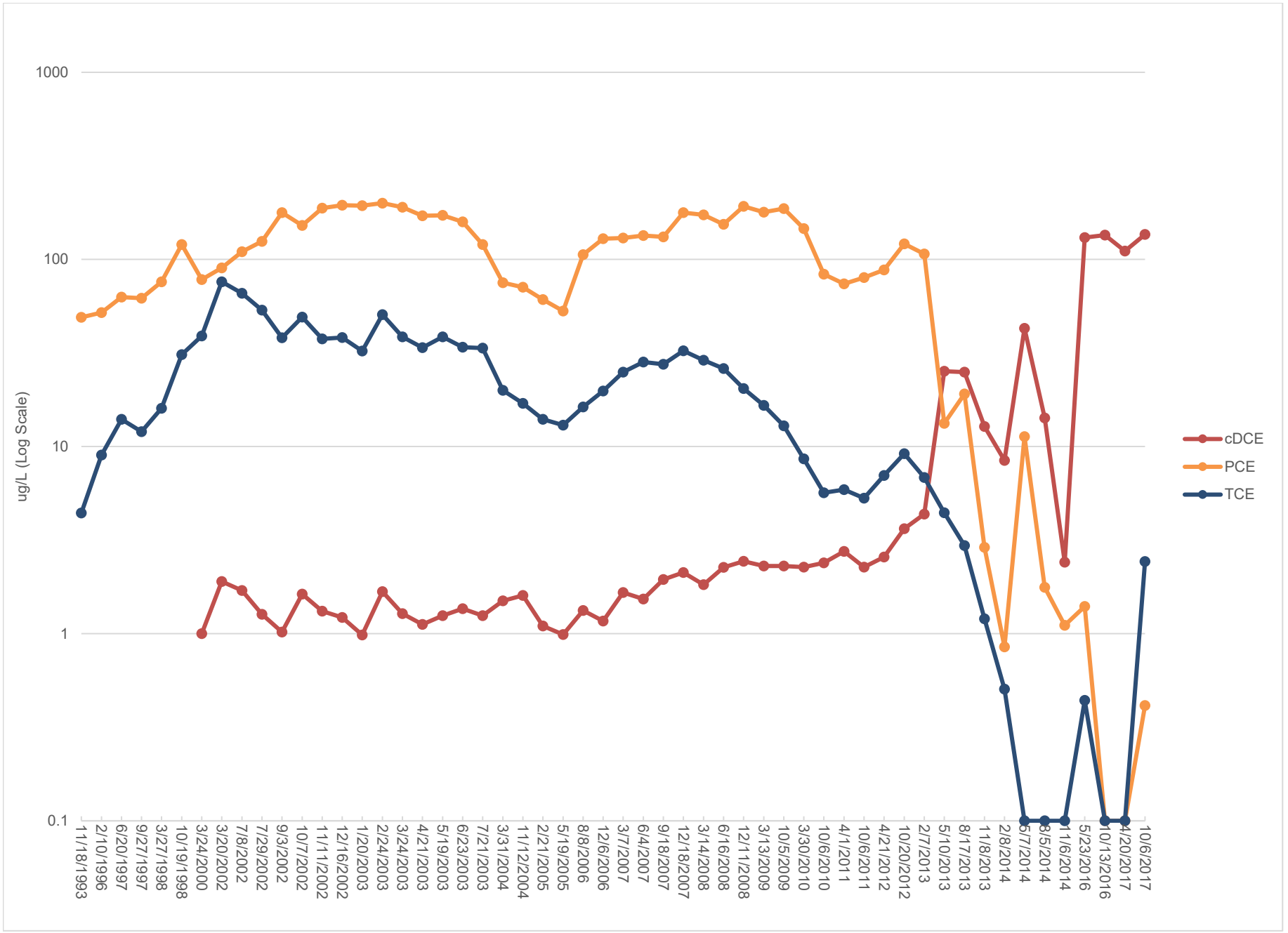
10/12/2013
10/19/2014
10/7/2015
10/14/2016
cDCE
PCE
TCE

MW-21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5/7/2014
8/5/2014
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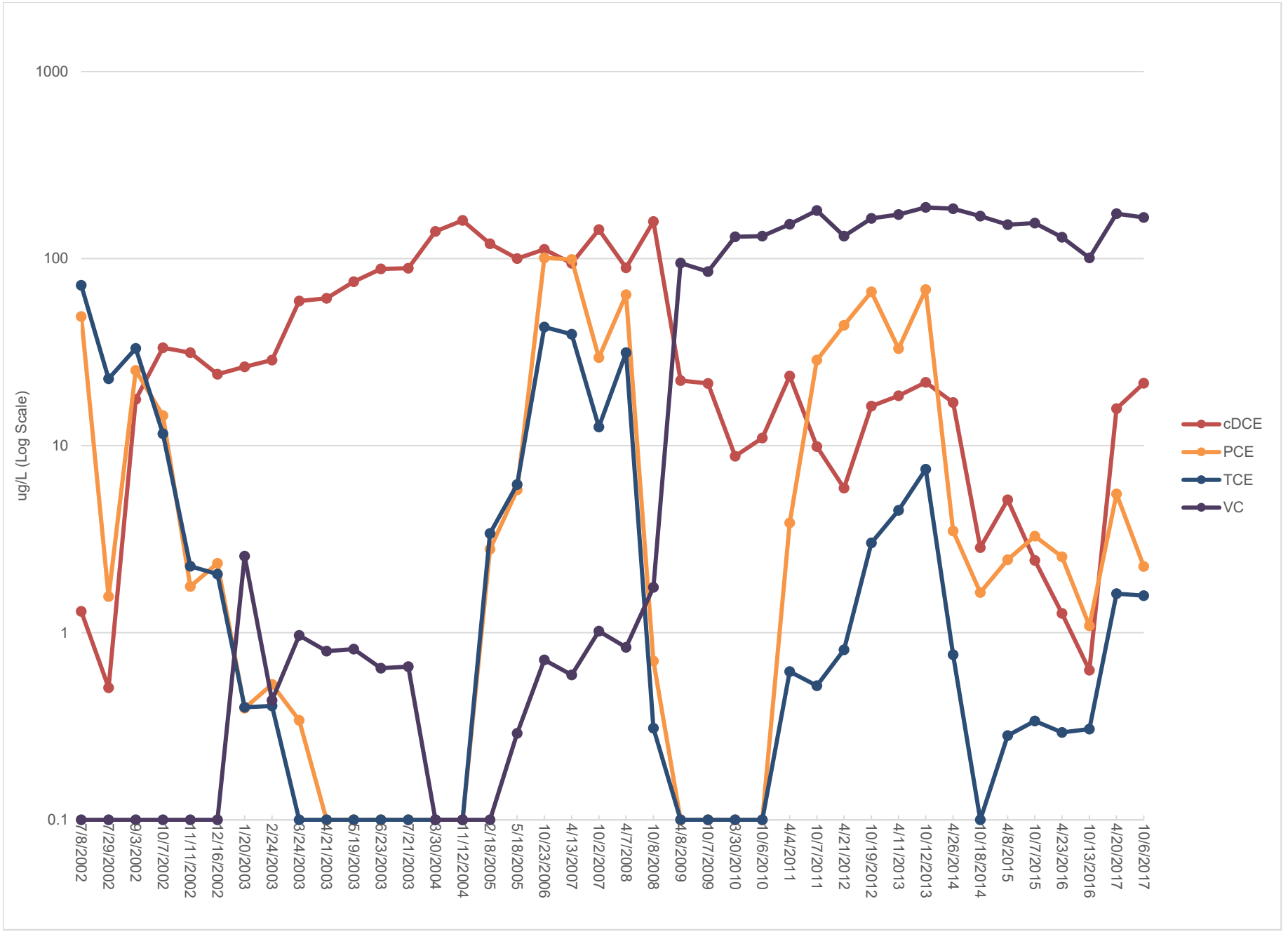
4/20/2017
10/6/2017
cDCE
PCE
TCE

MW-100B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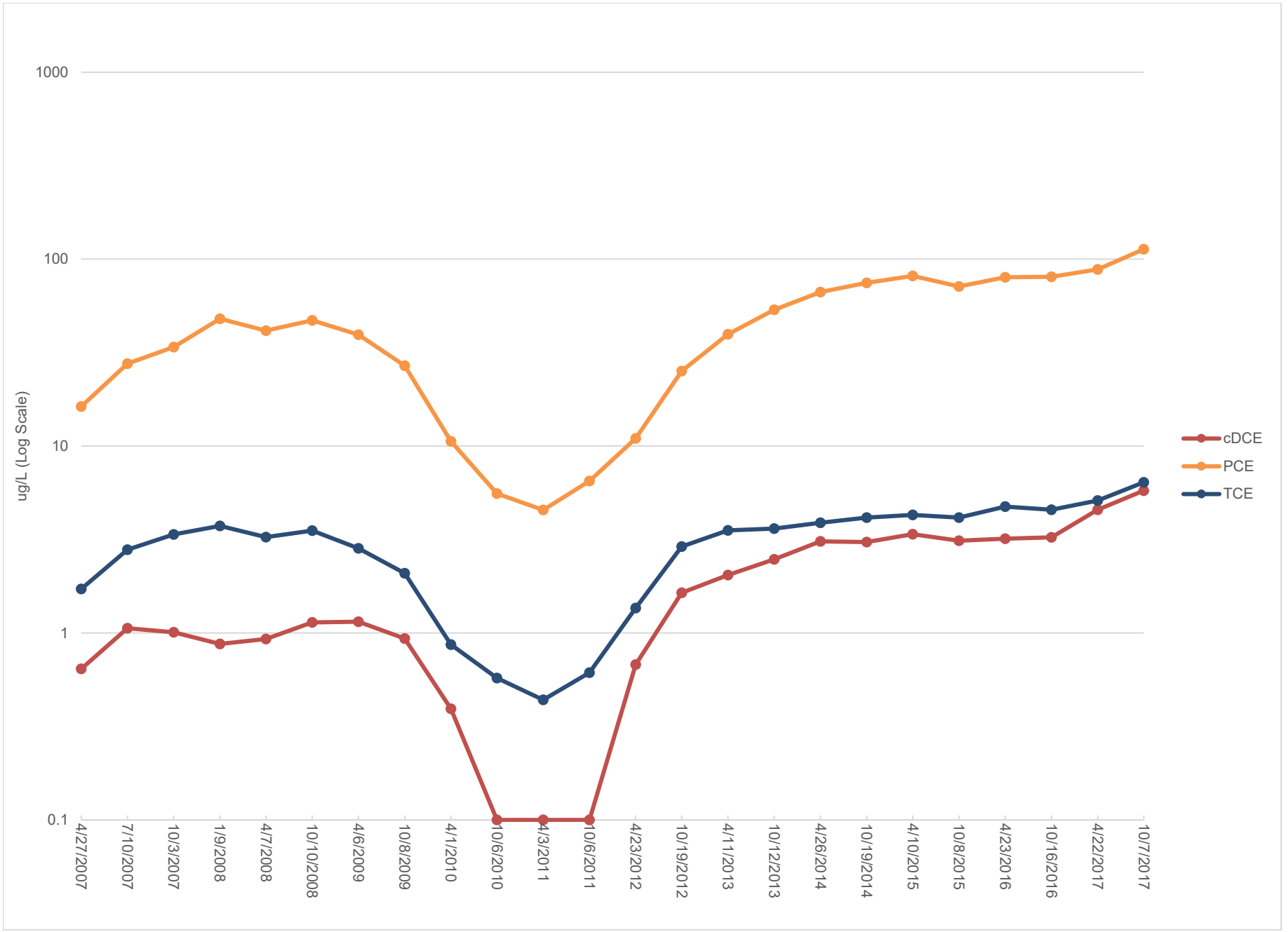
cDCE
PCE
TCE
VC

MW-219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4/22/2017
10/7/2017
cDCE
PCE
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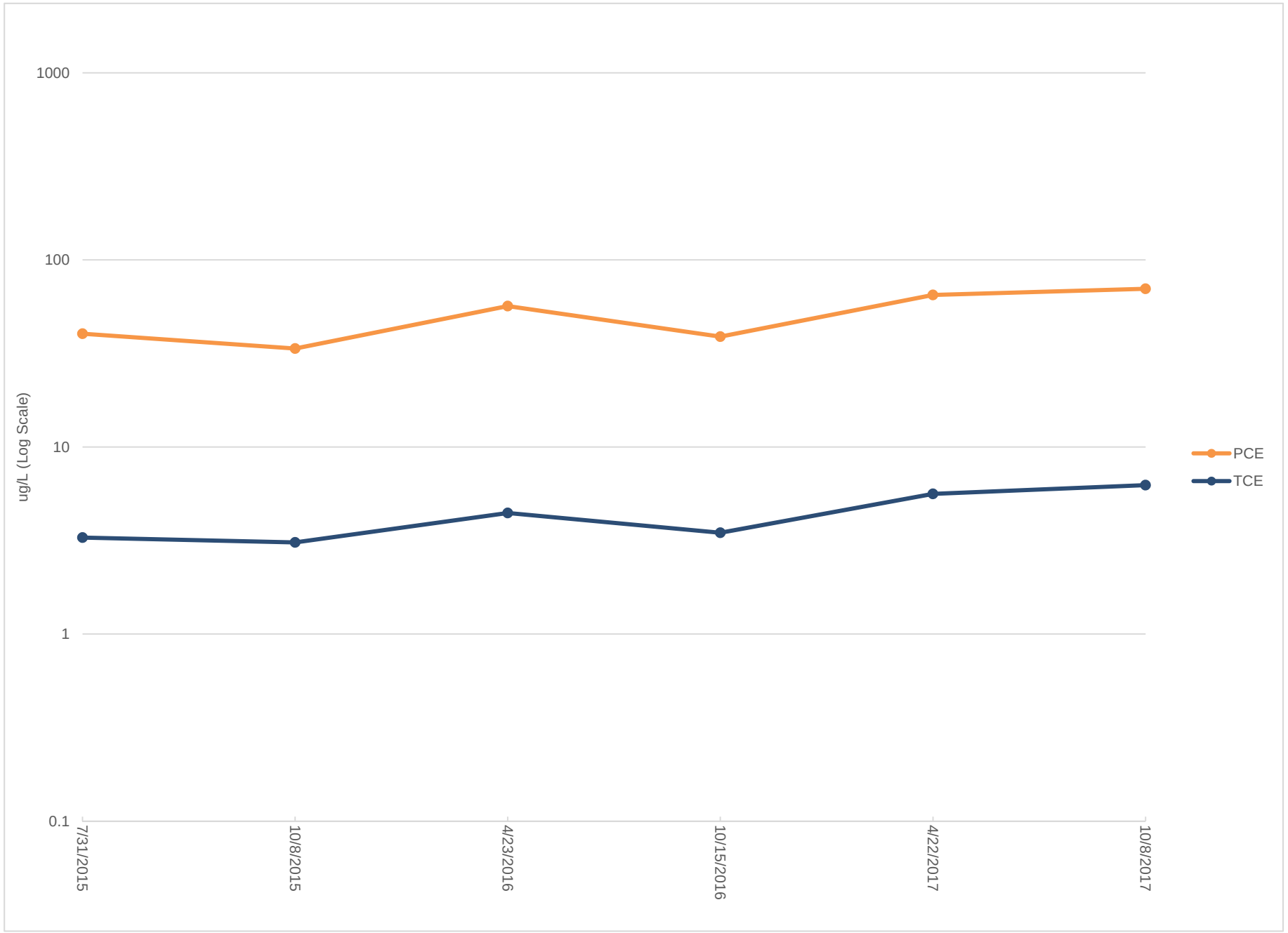
MW-269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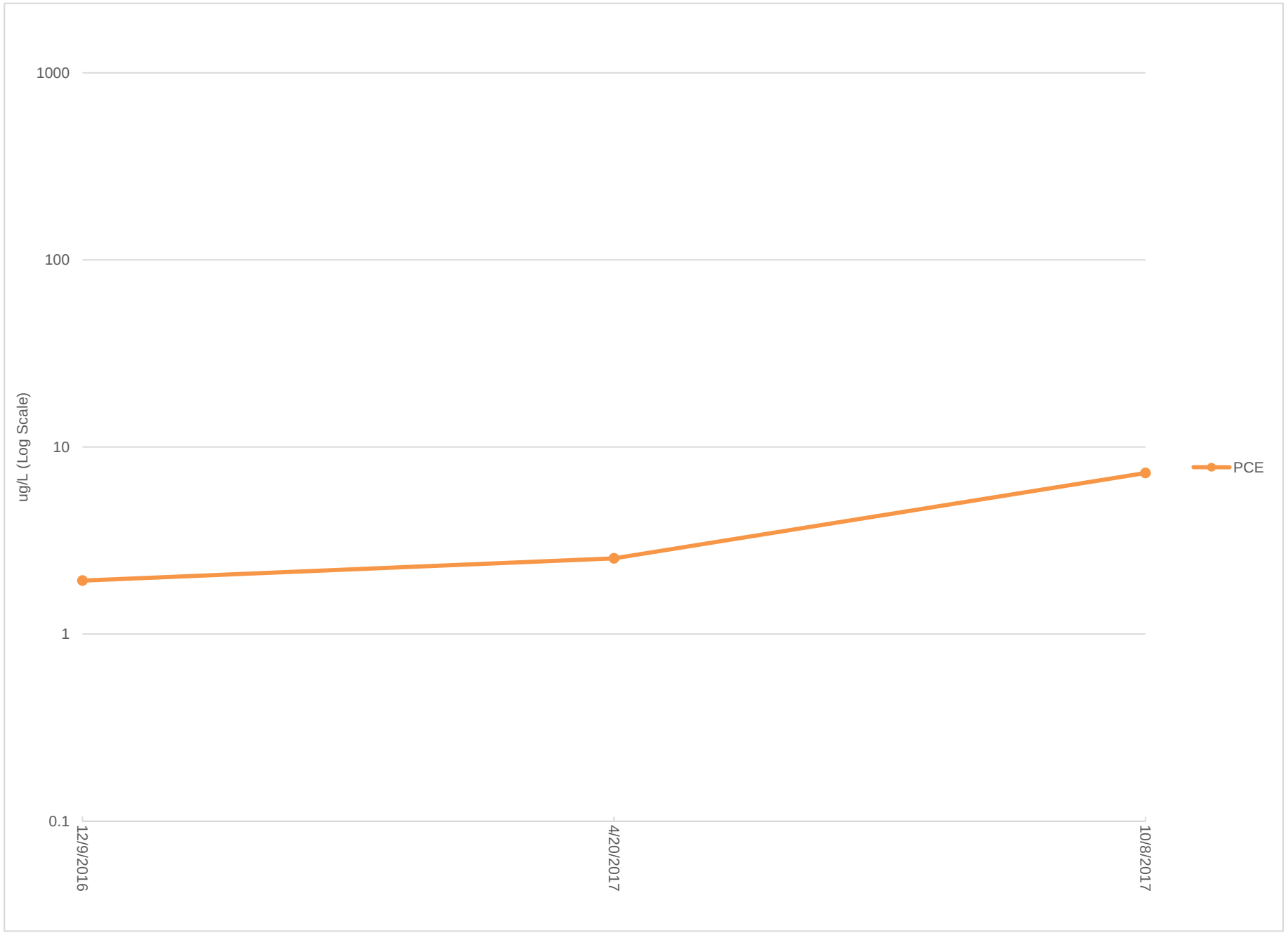

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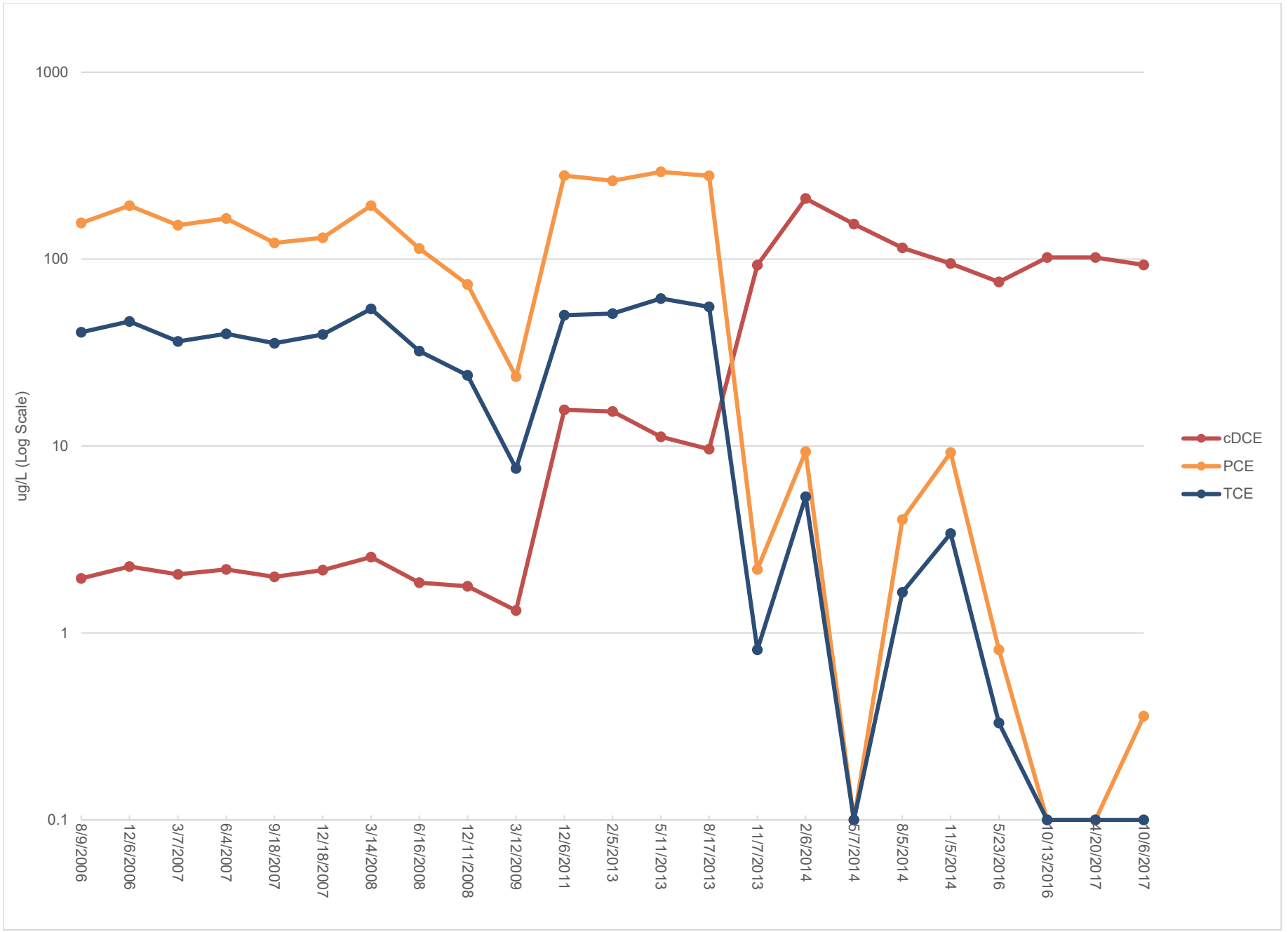
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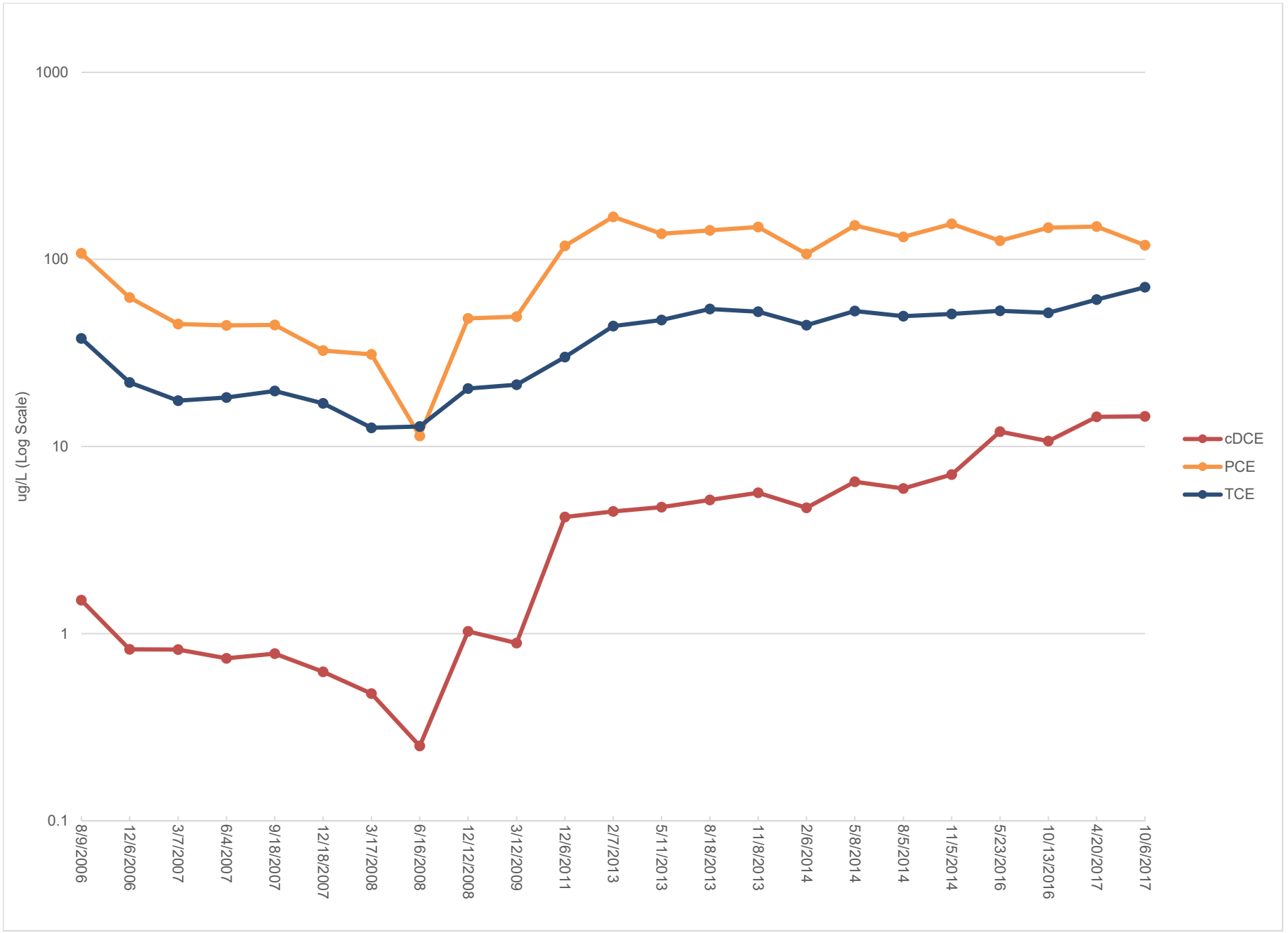
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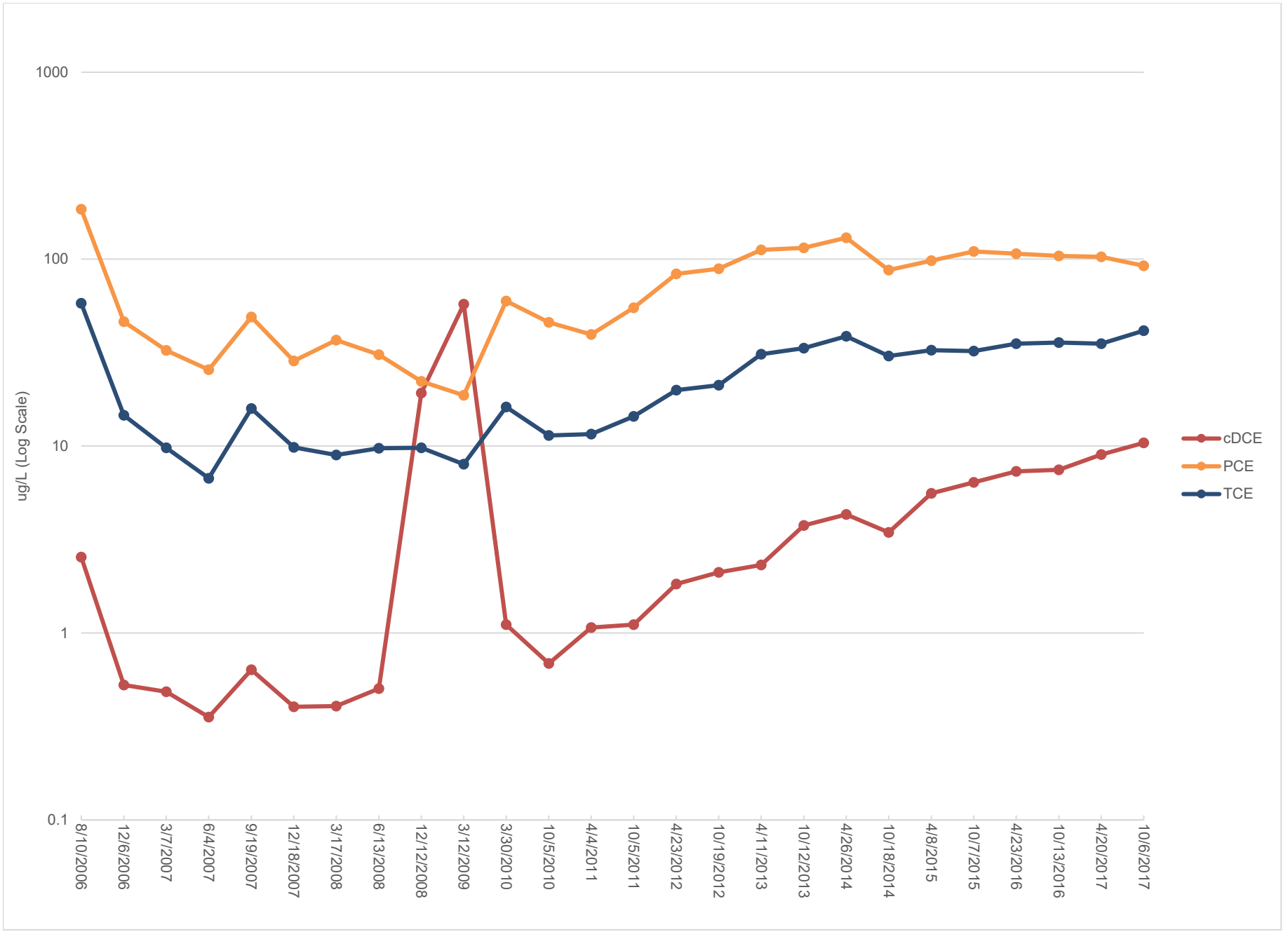
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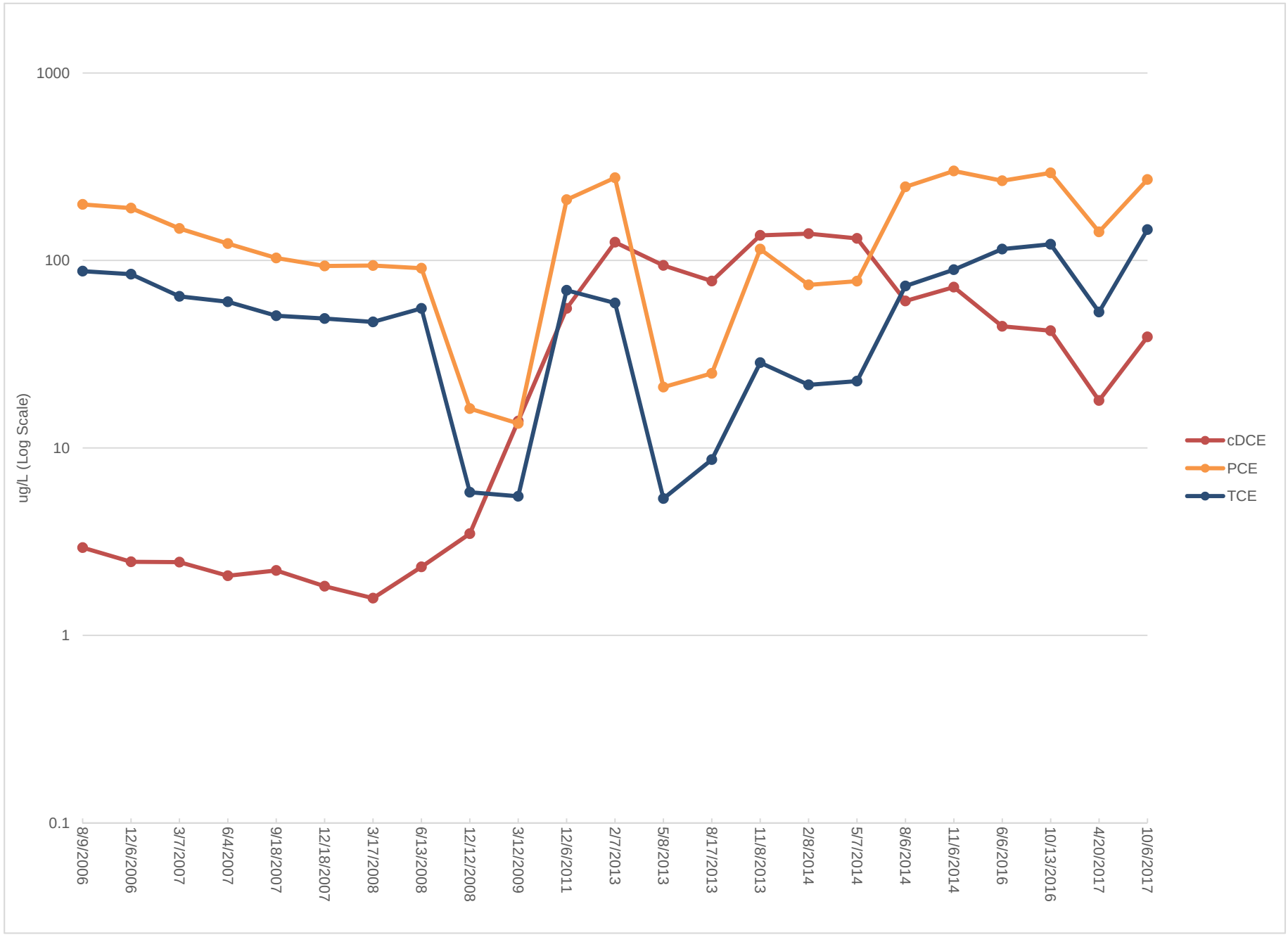
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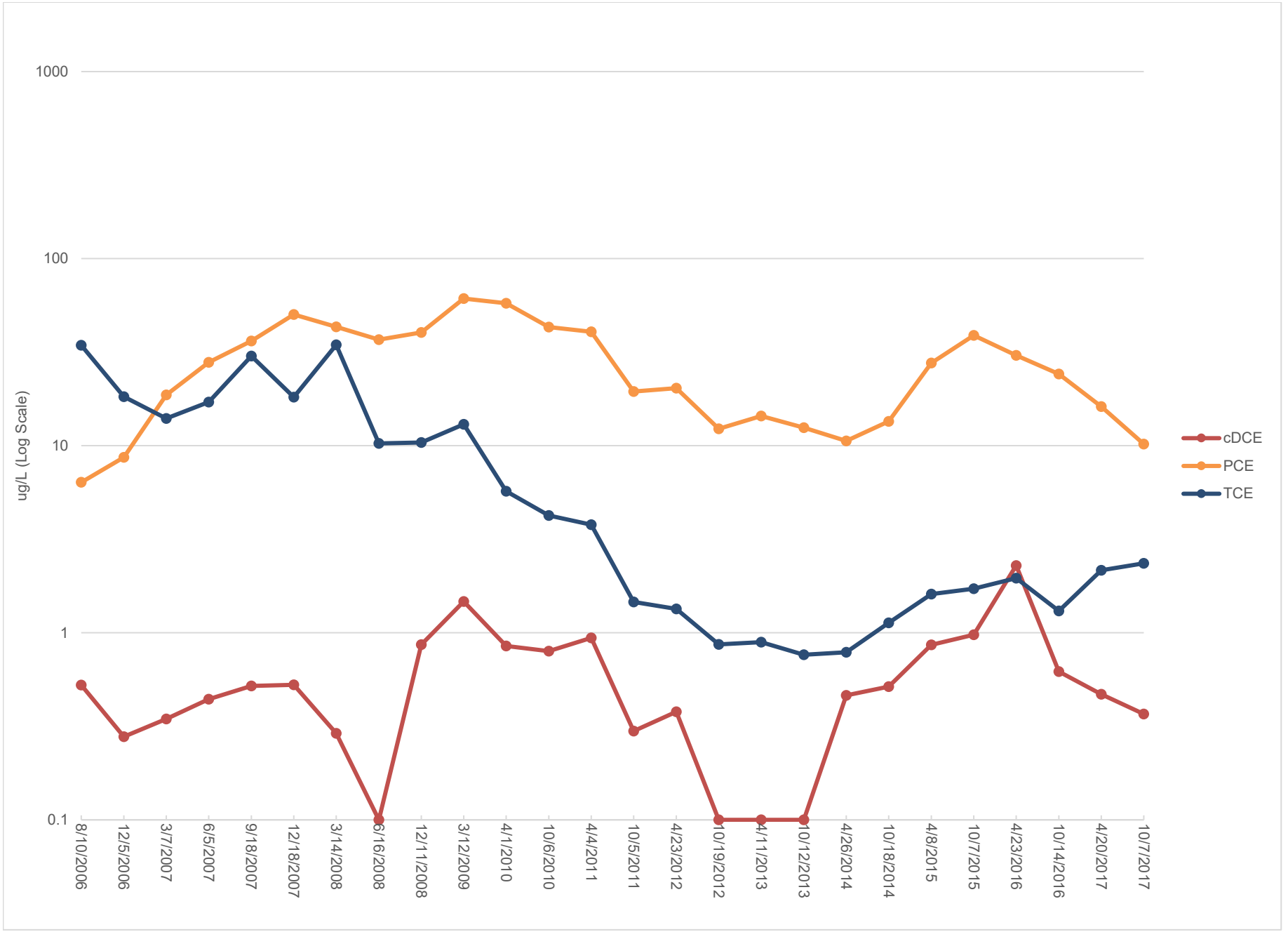
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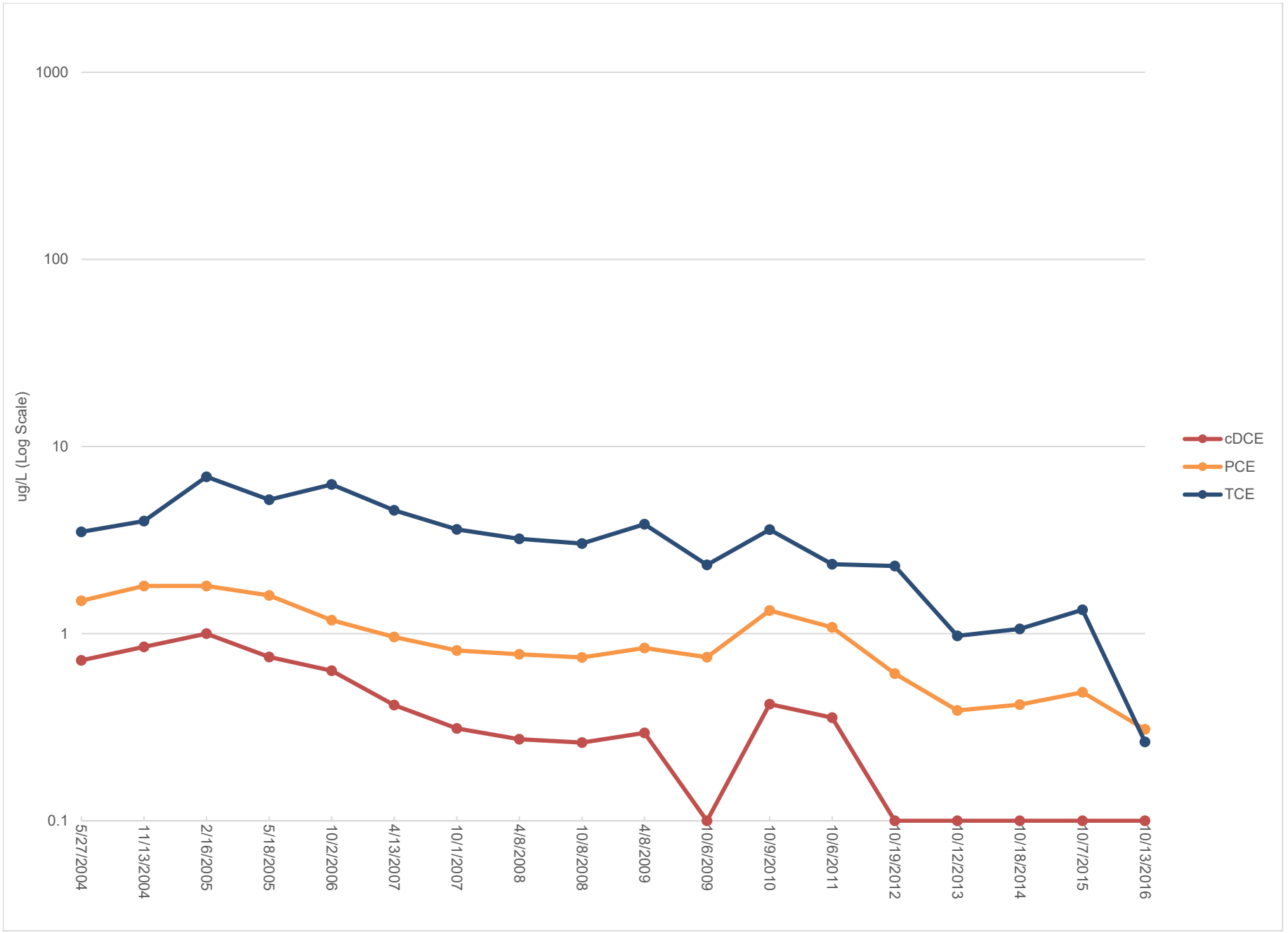
Appendix H-2
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer TTA-1S Wells

DR1-1A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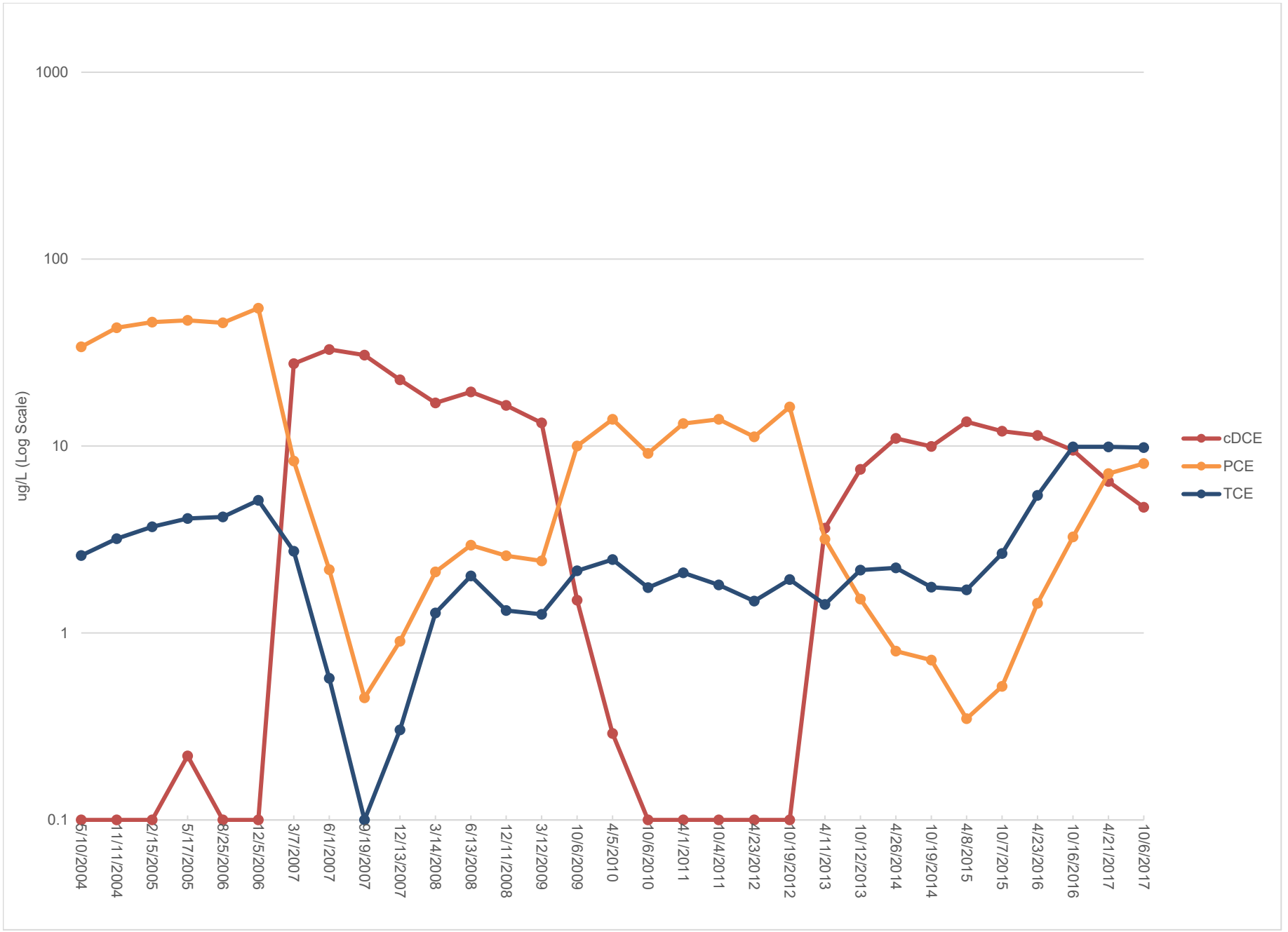
DR1-3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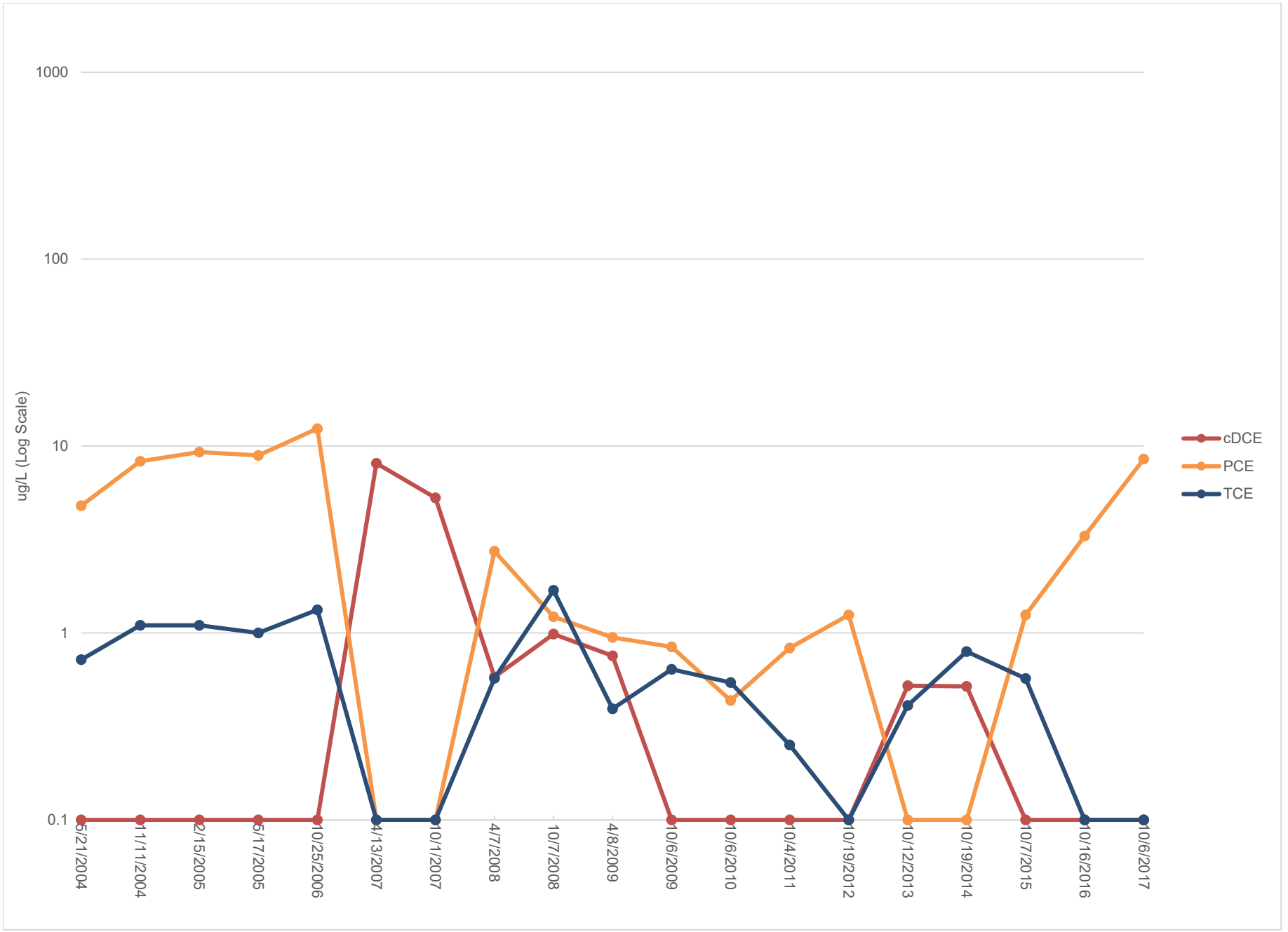
DR1-4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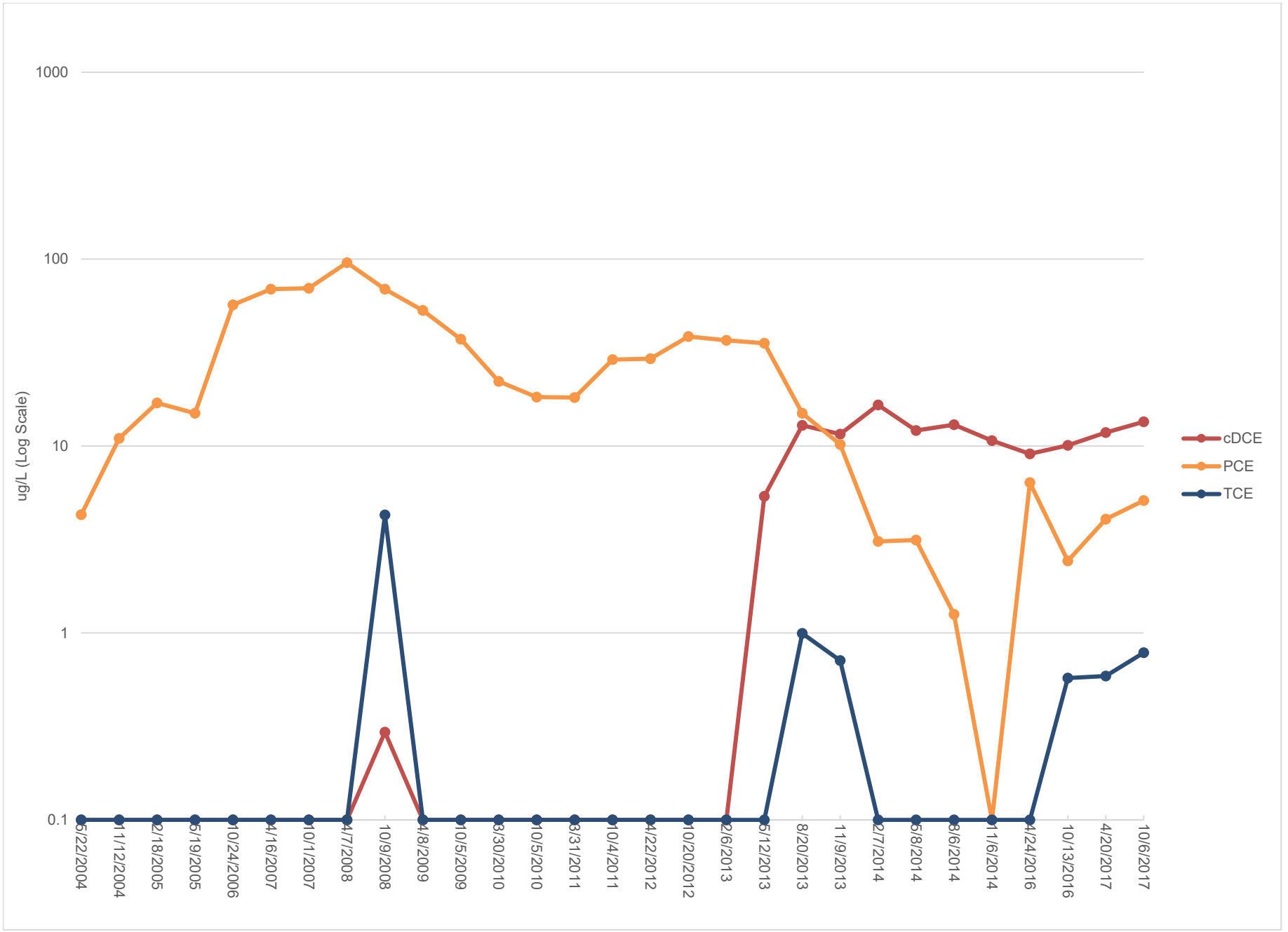
DR1-5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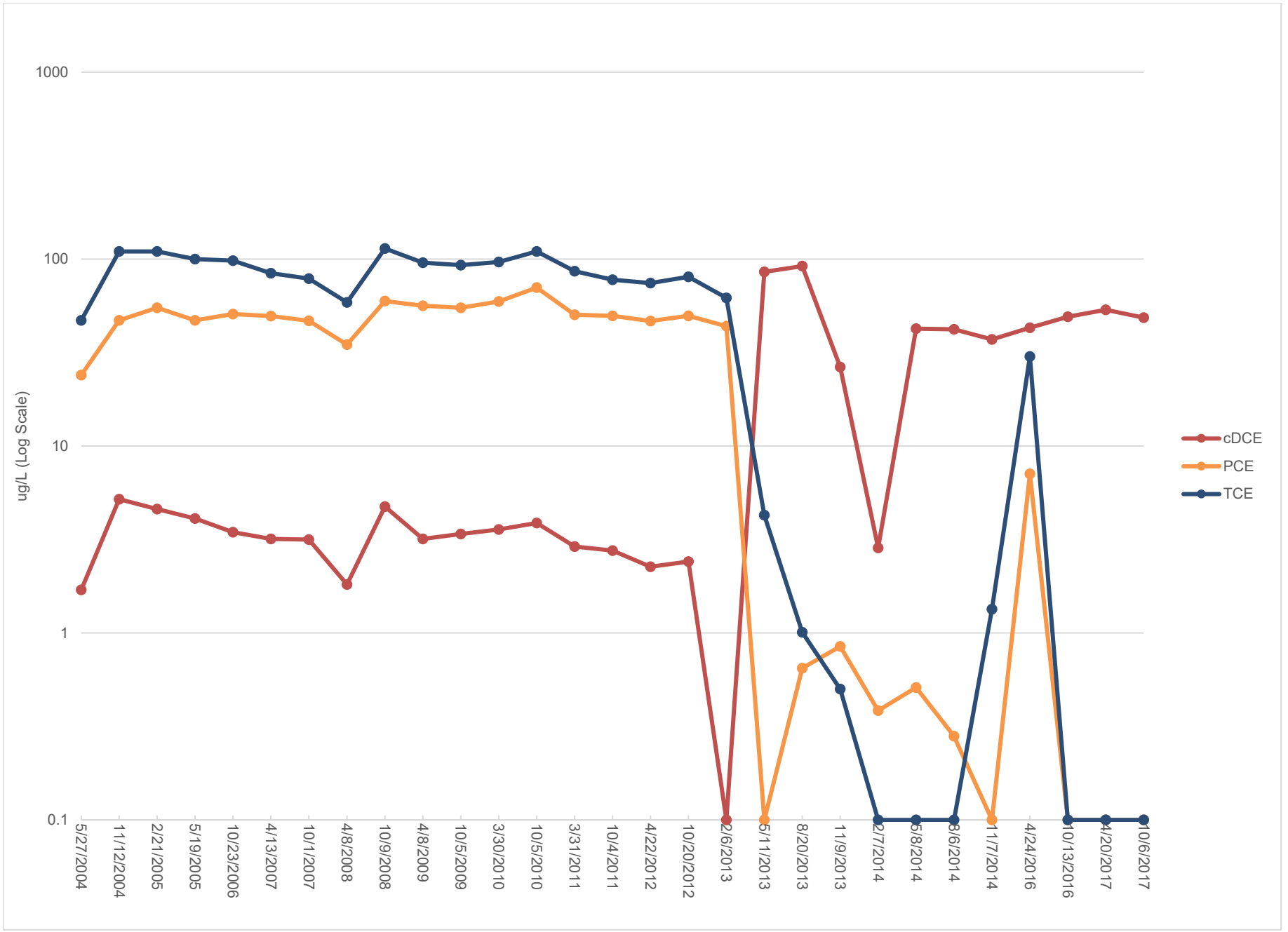
DR1-5A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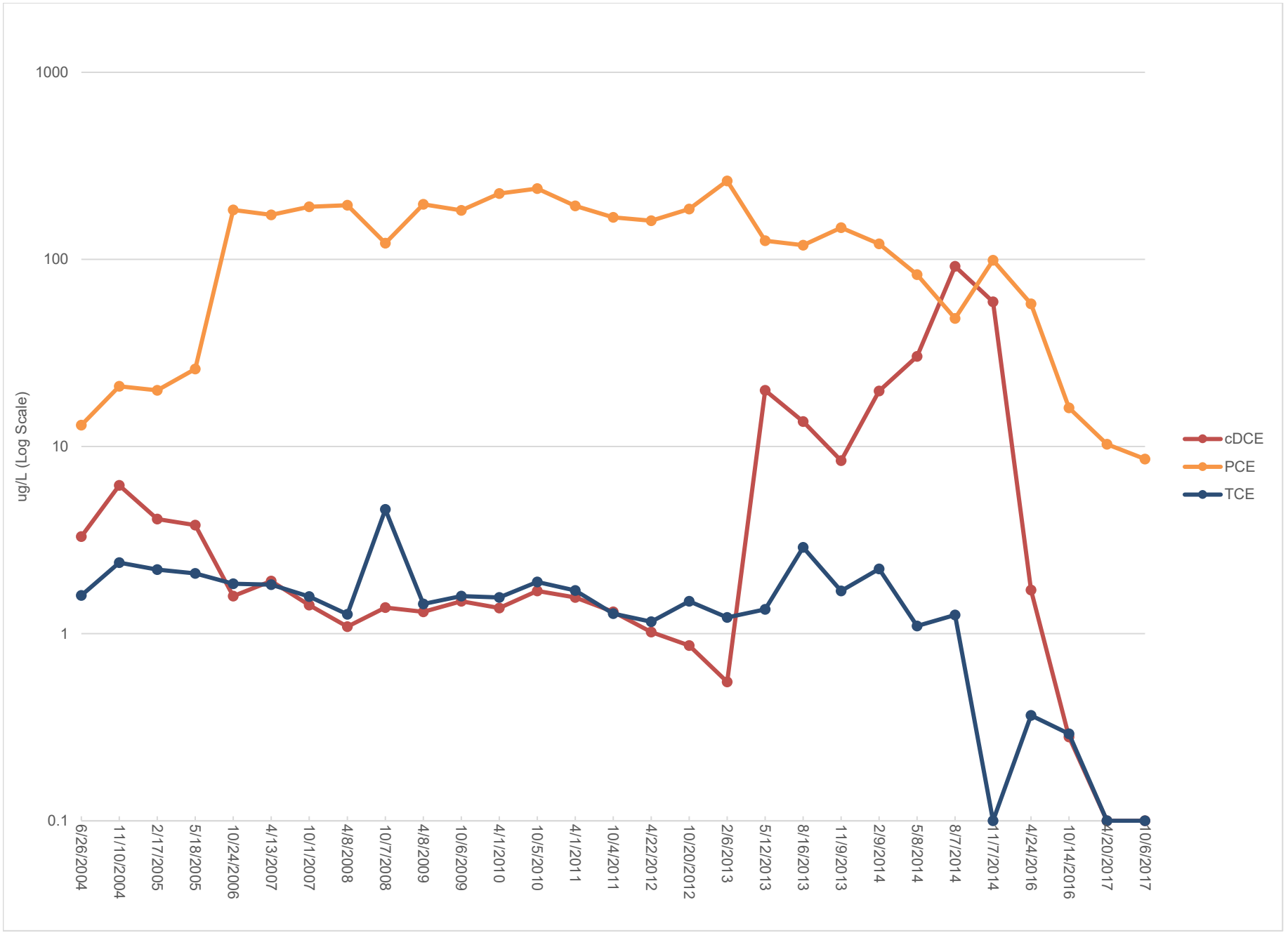
DR1-6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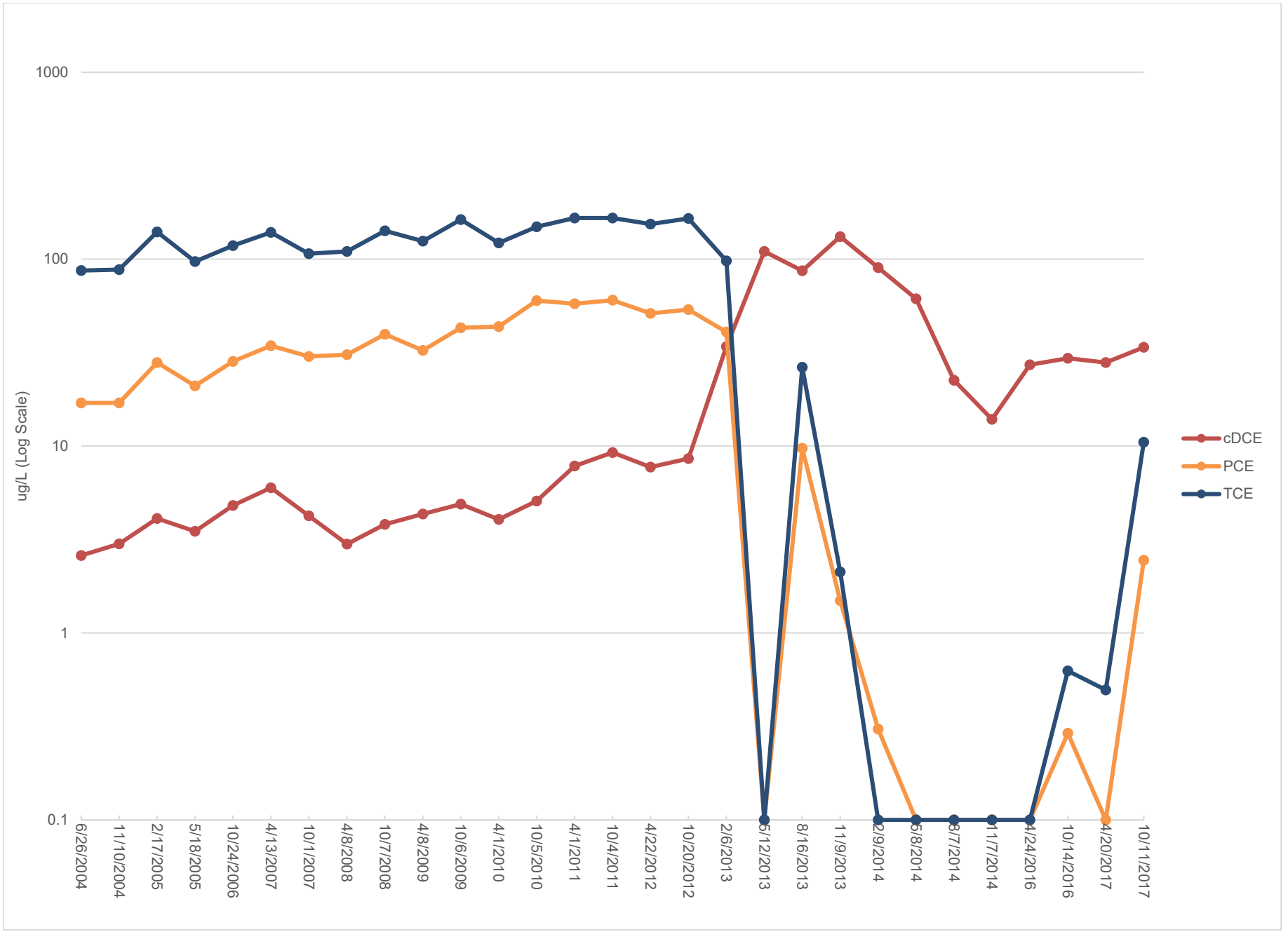
DR1-6A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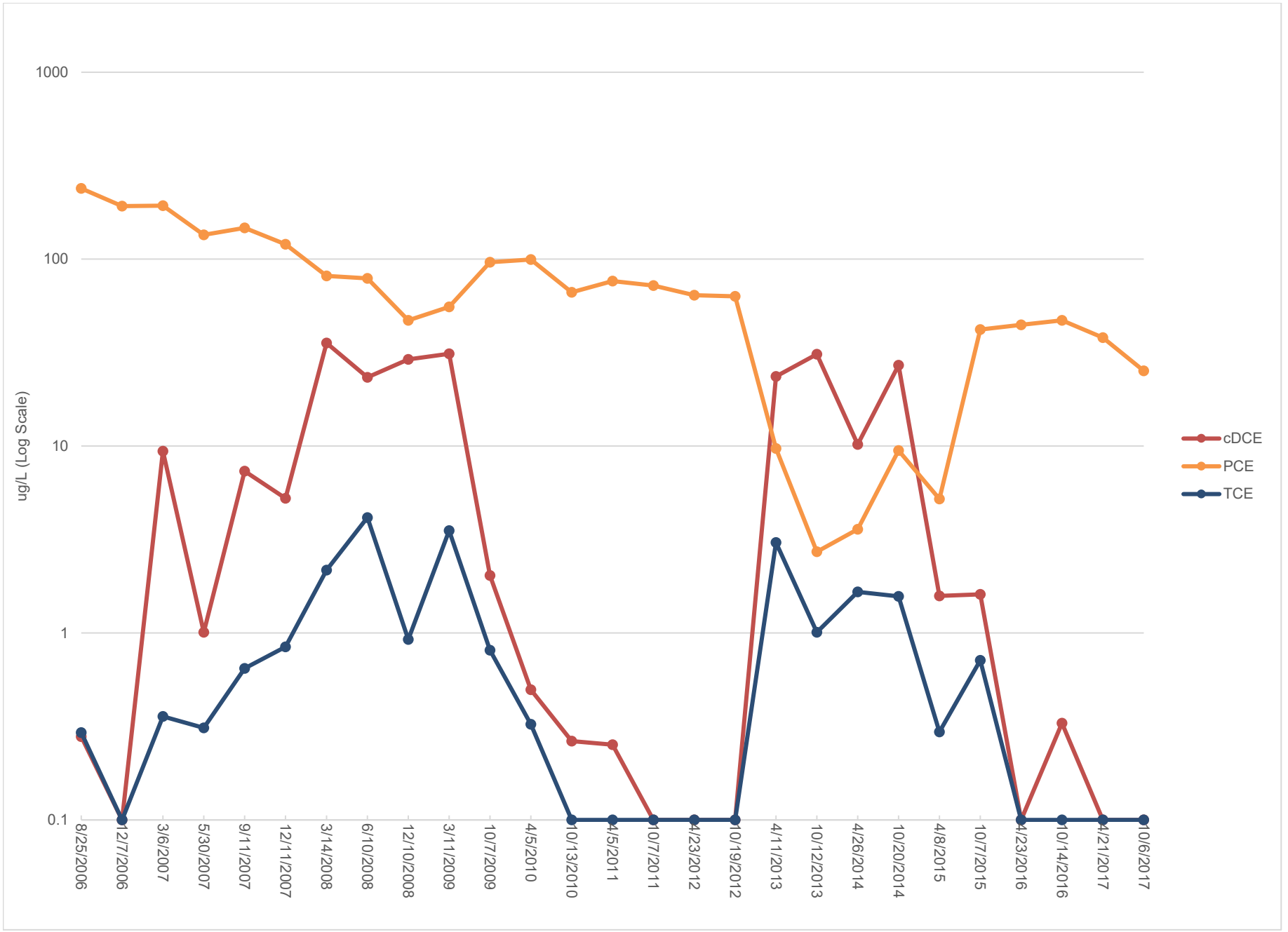

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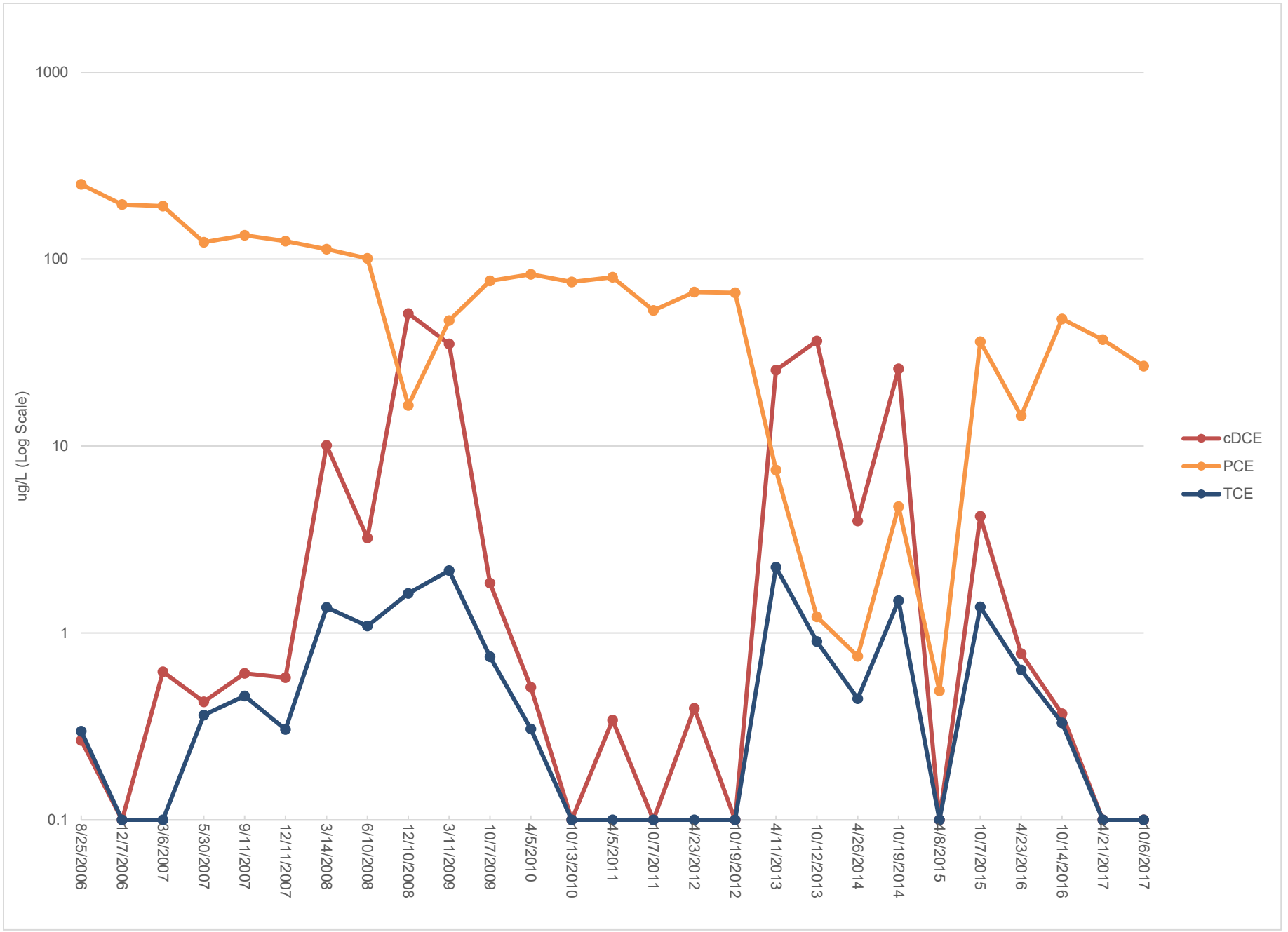
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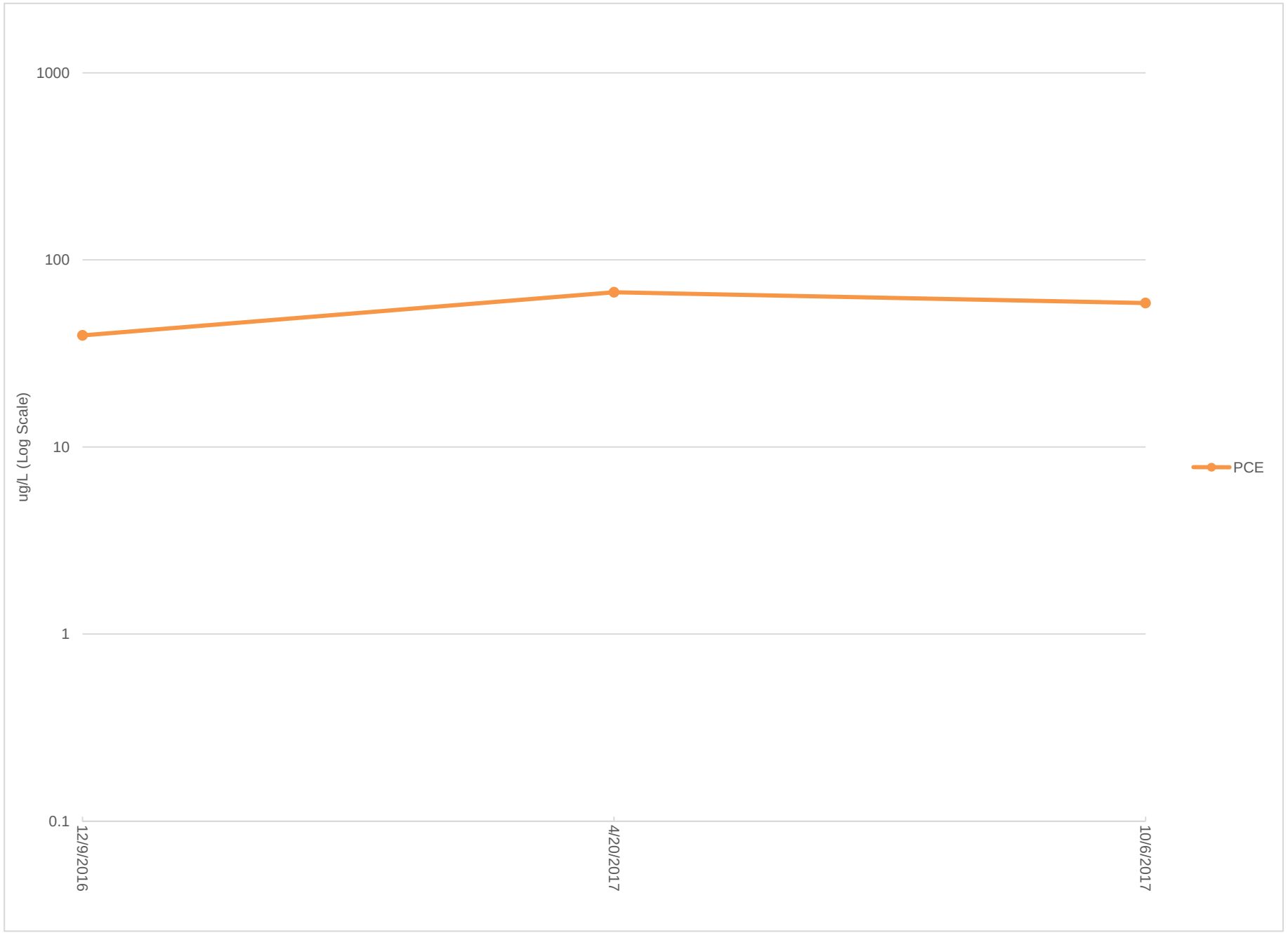

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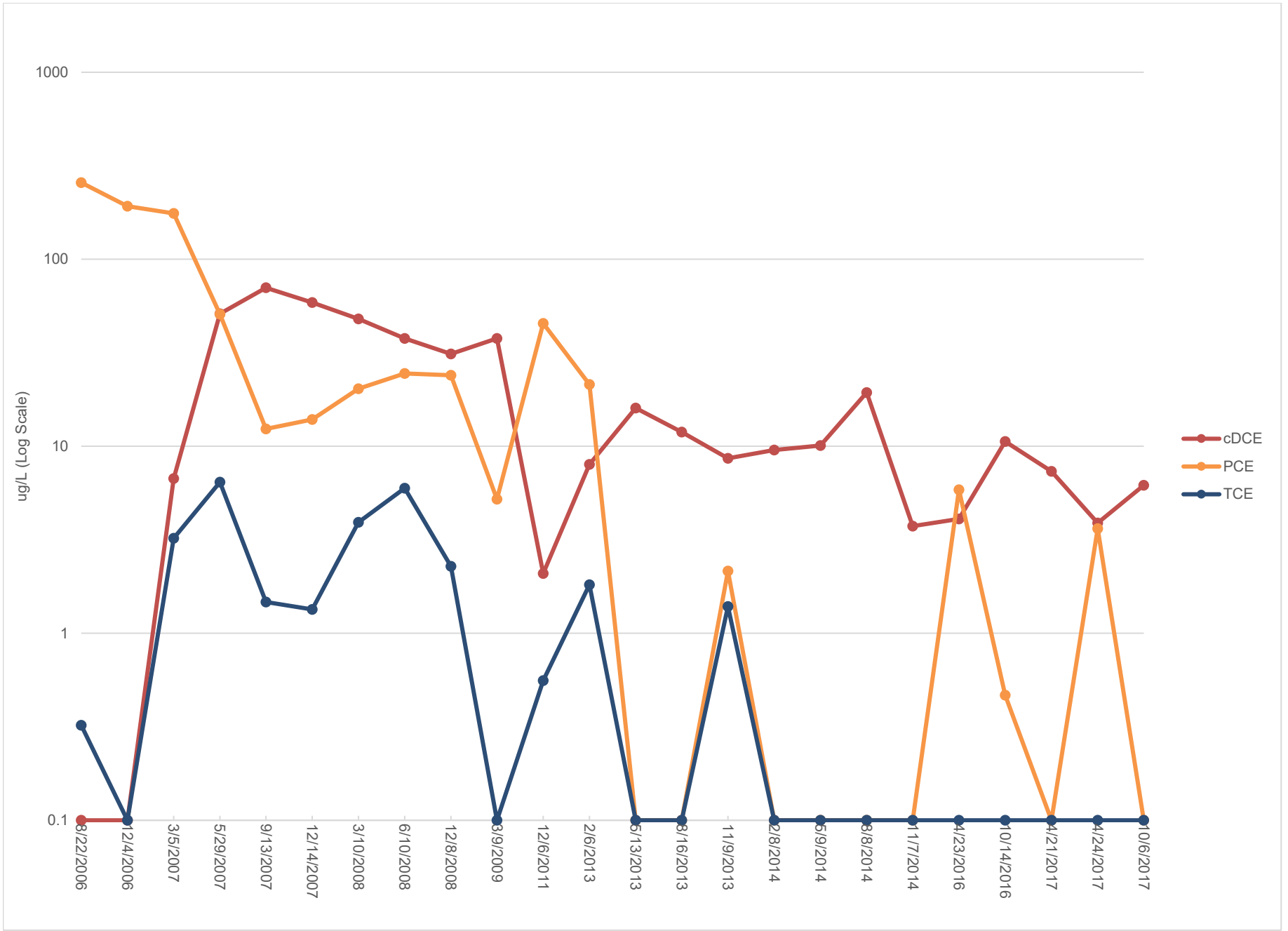
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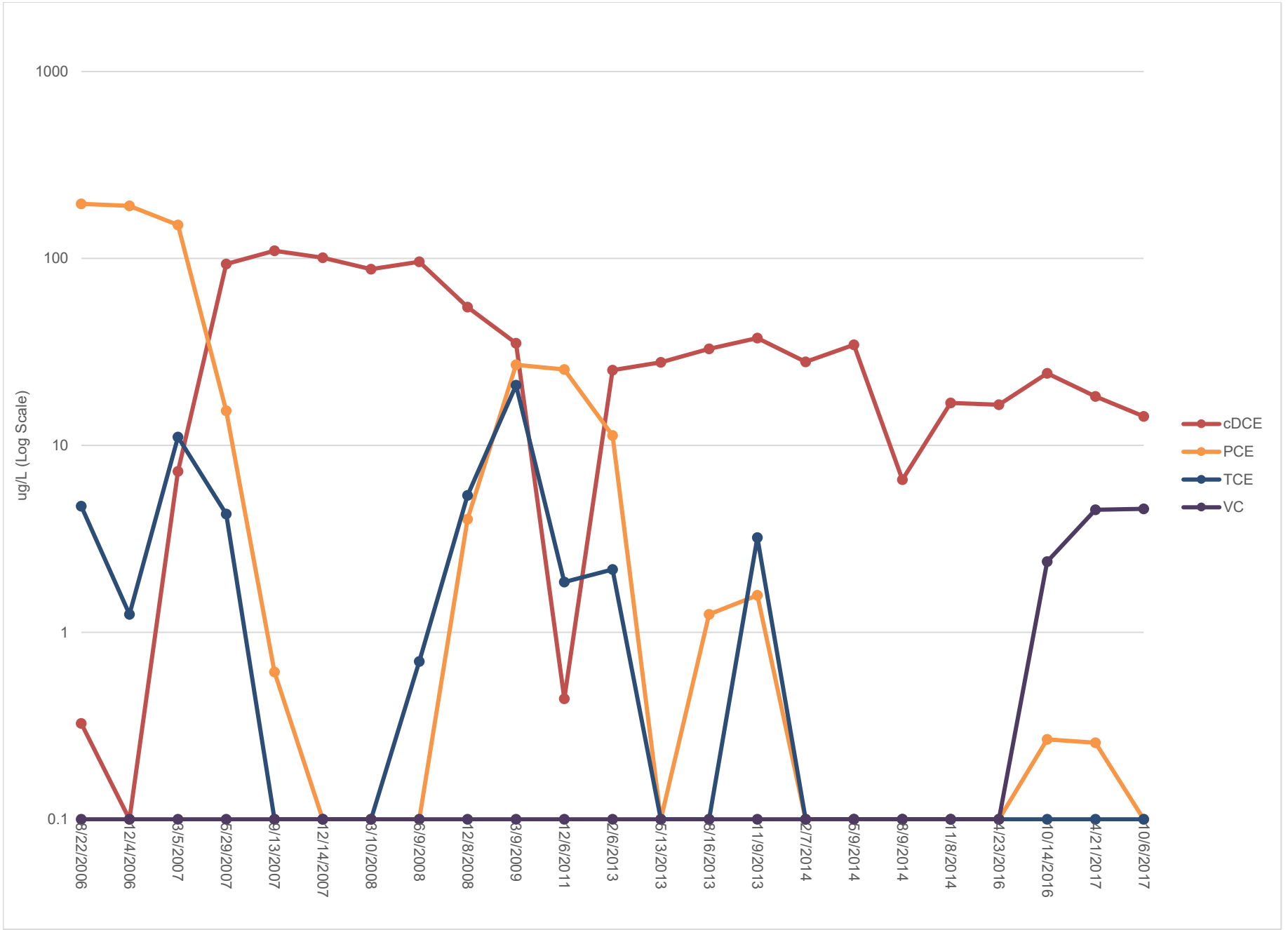
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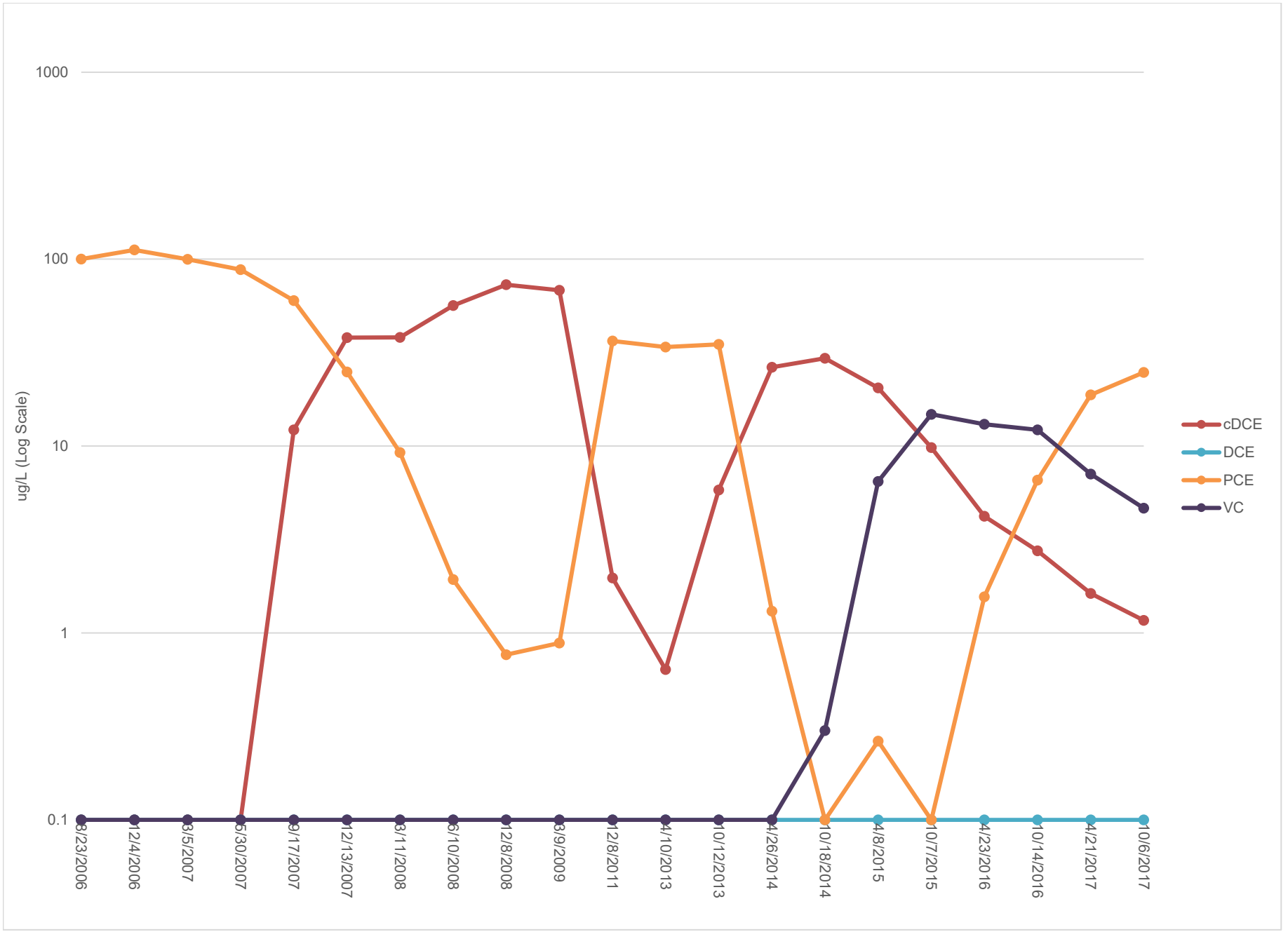
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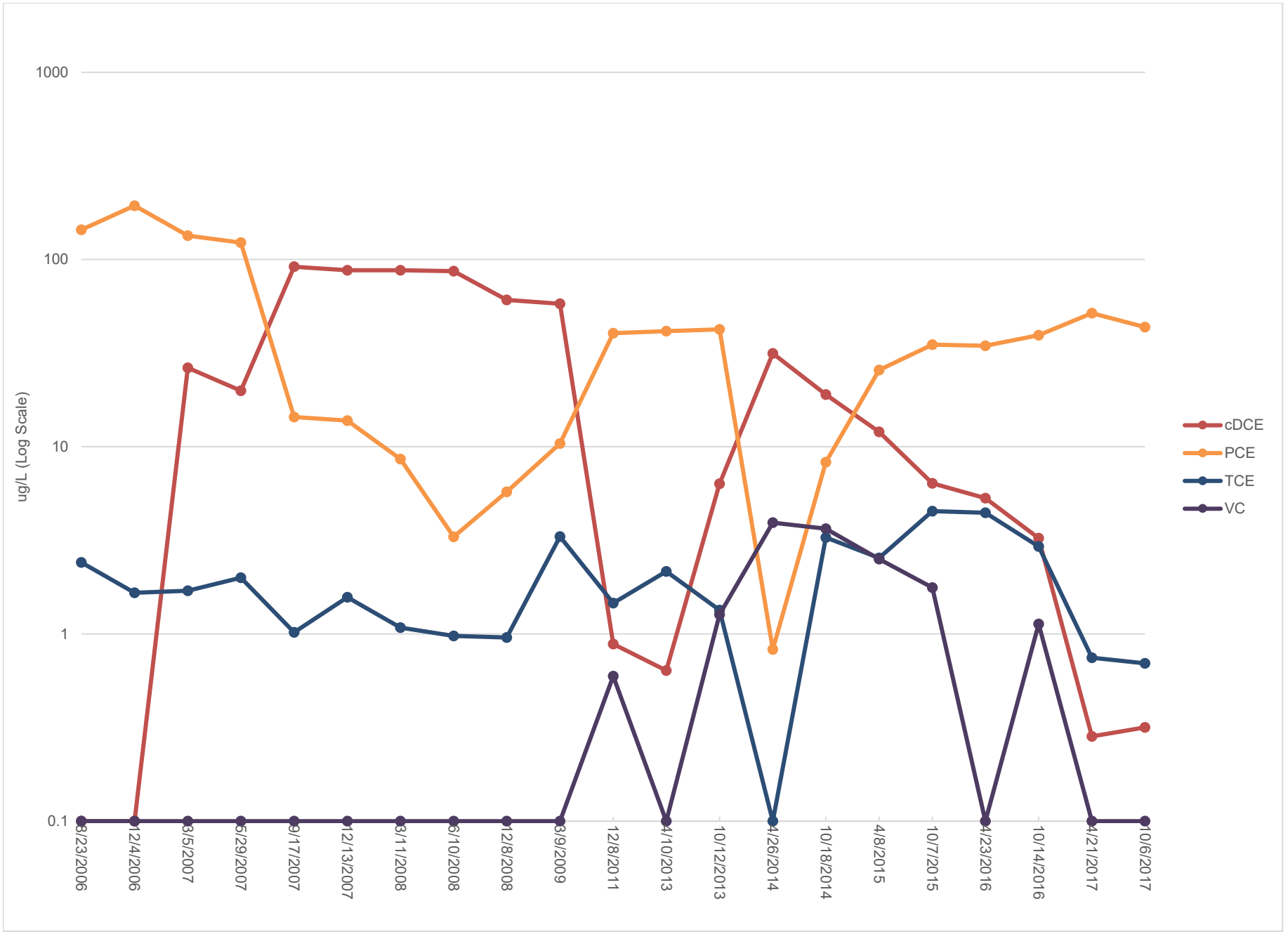
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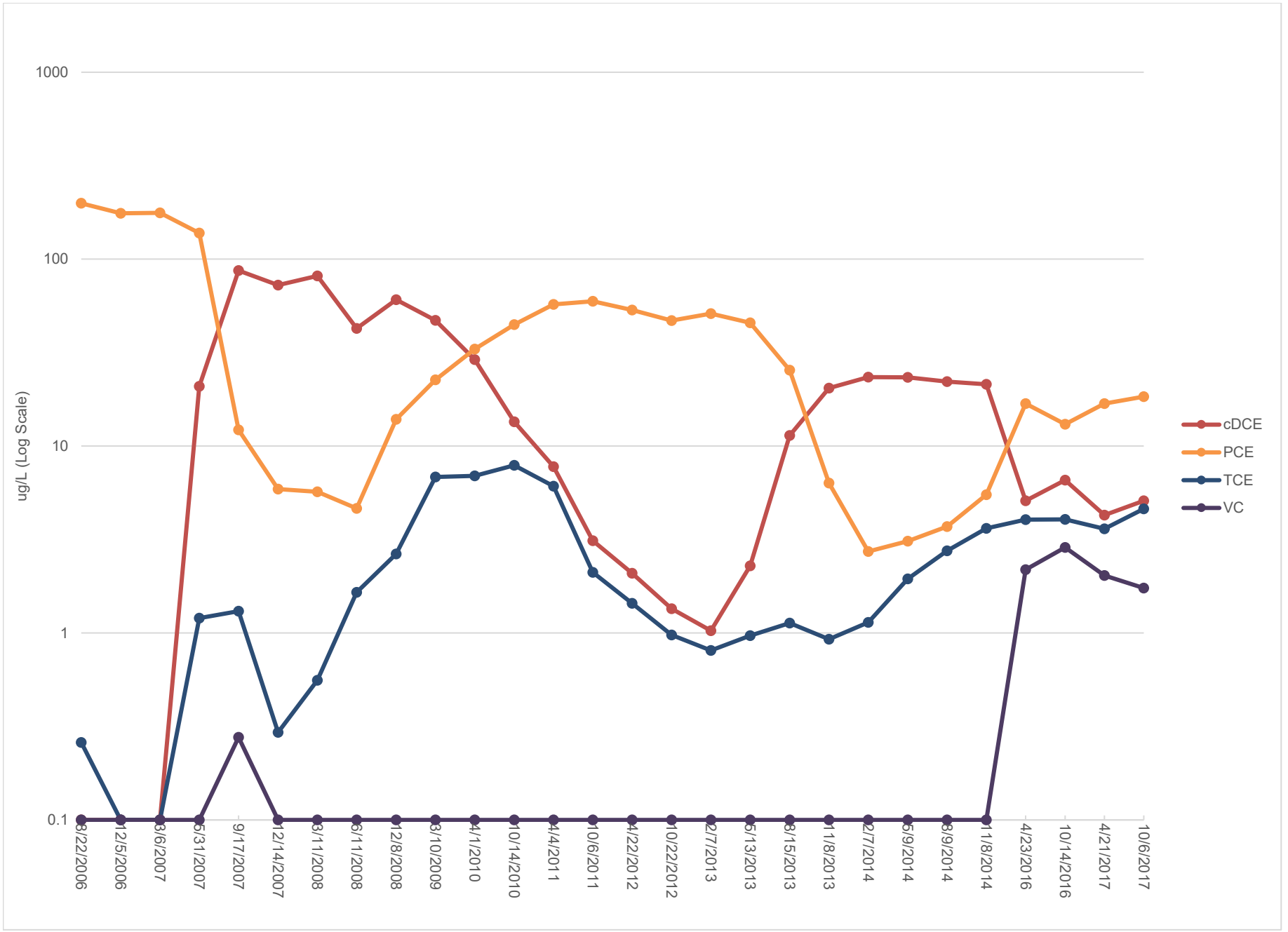
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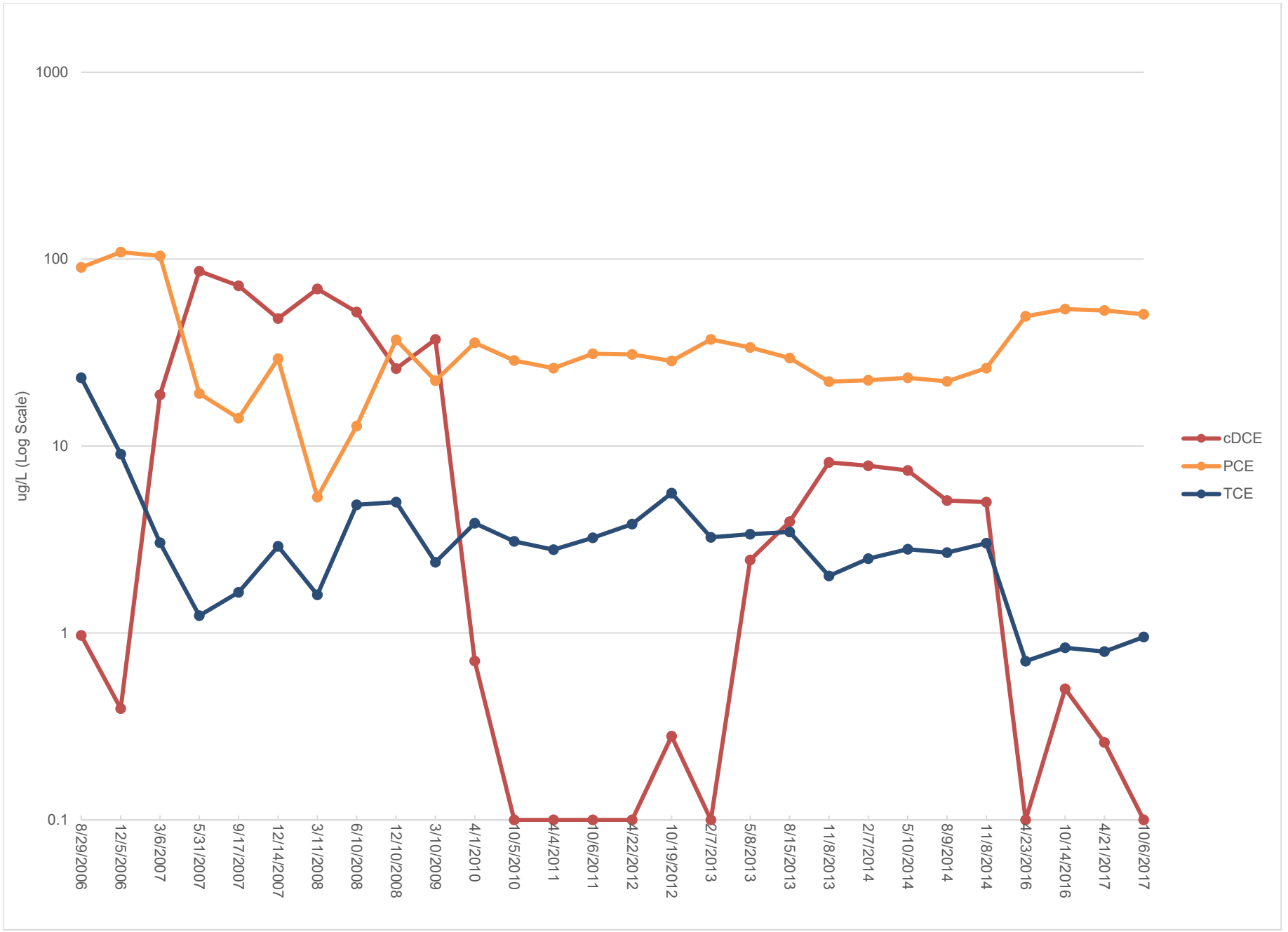
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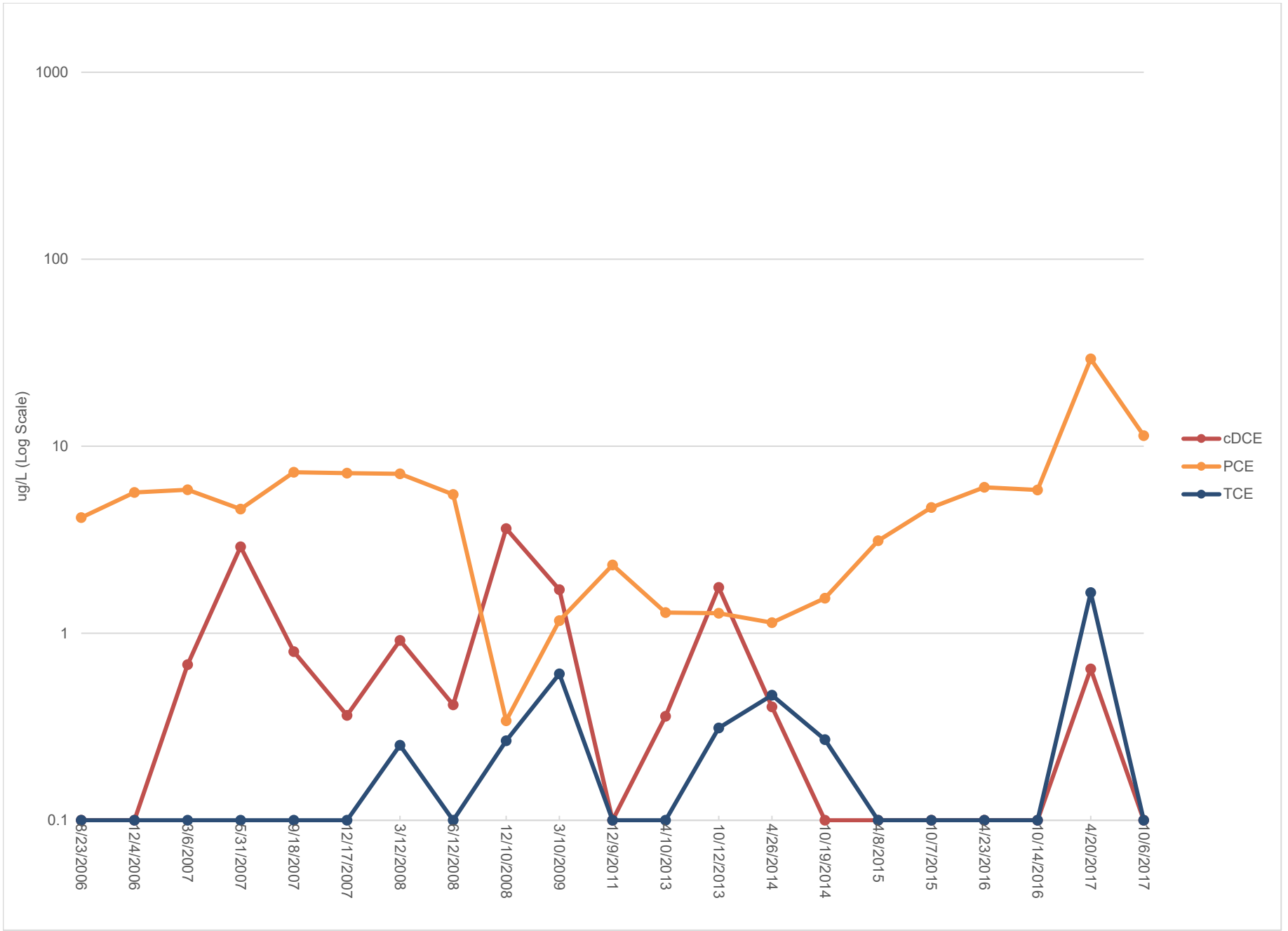
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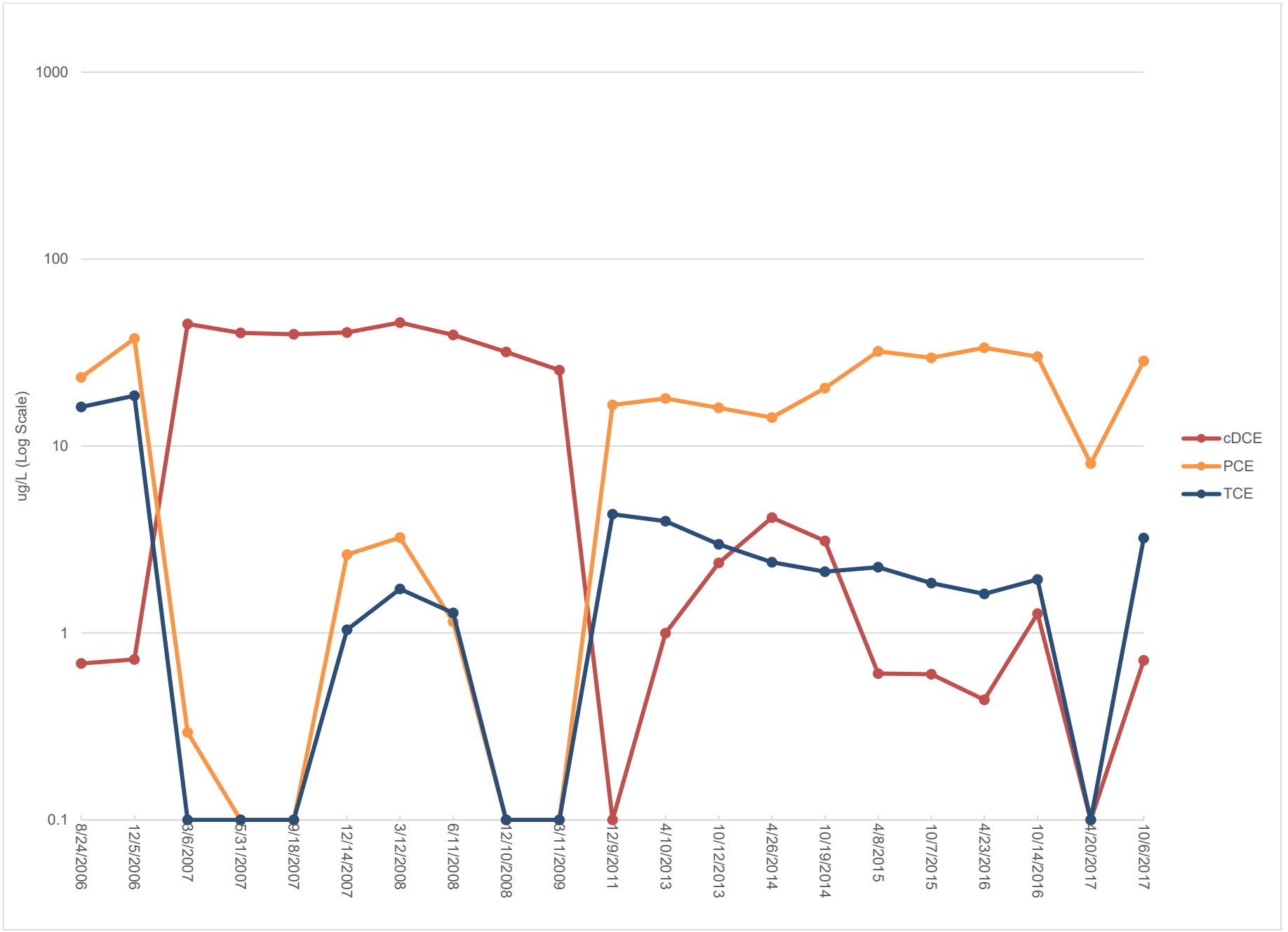
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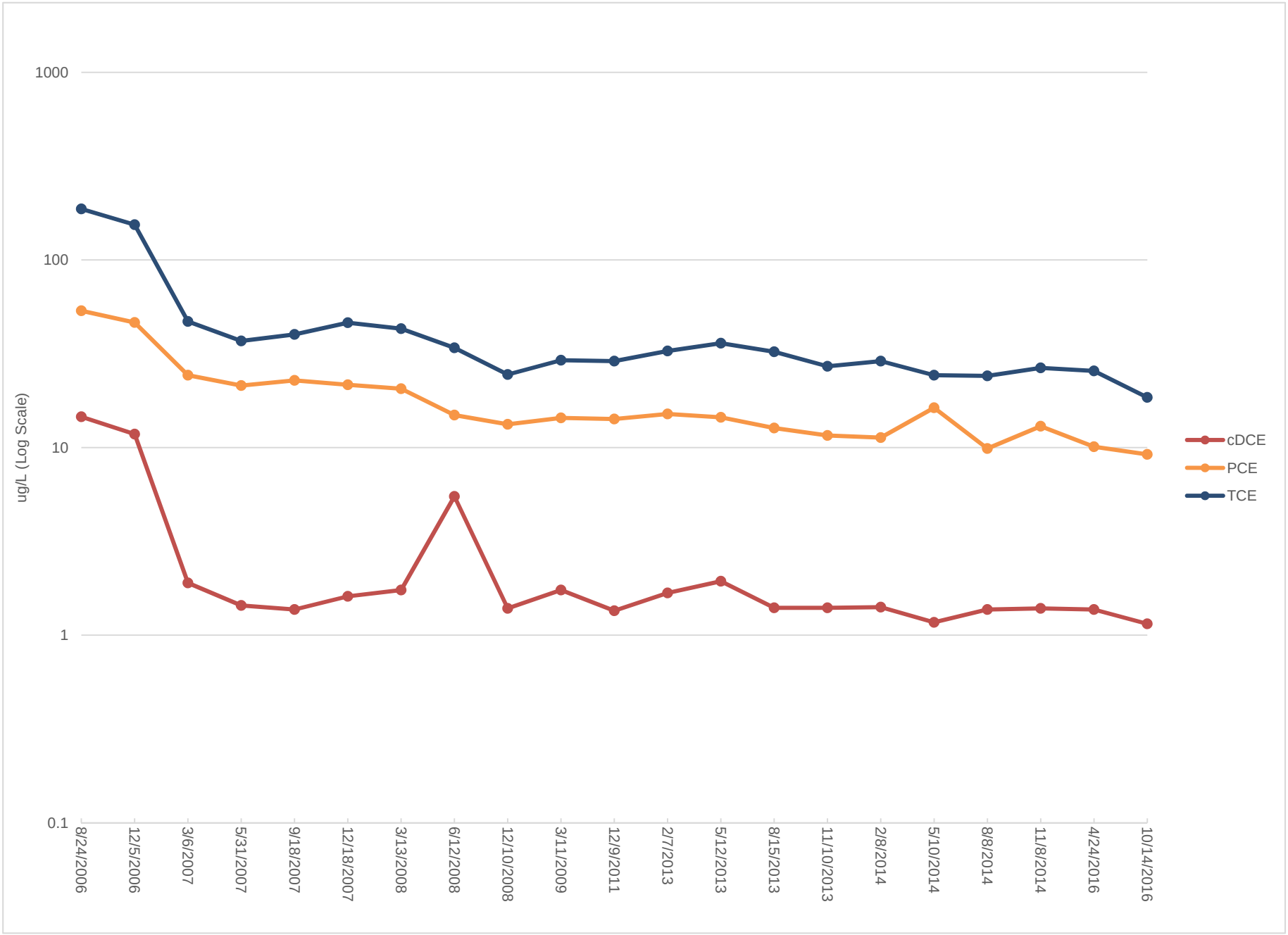
PMW101-07B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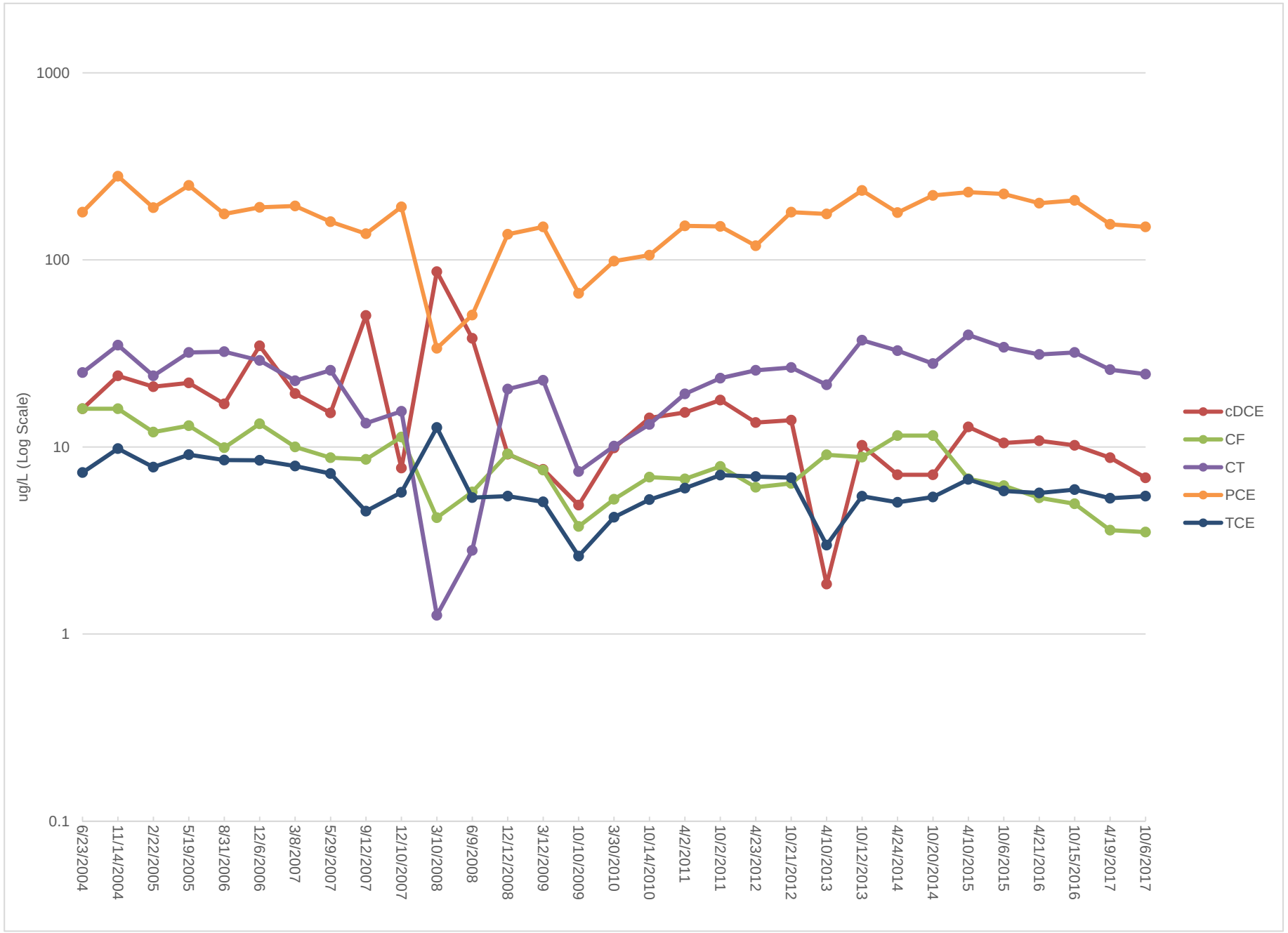
cDCE
PCE
TCE

Appendix H-3
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer TTA-2 Wells

DR2-1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CT
PCE
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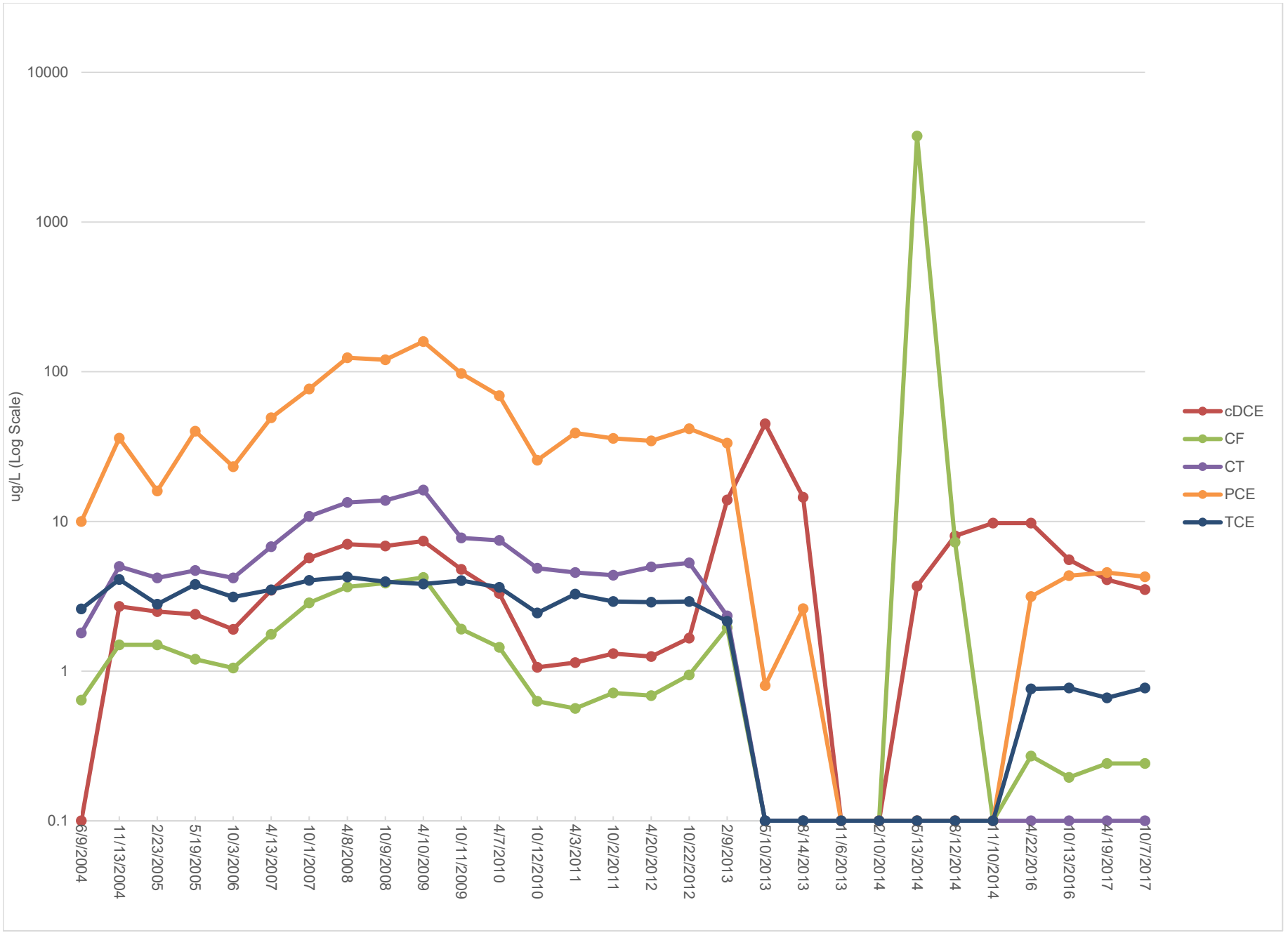
DR2-2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CT
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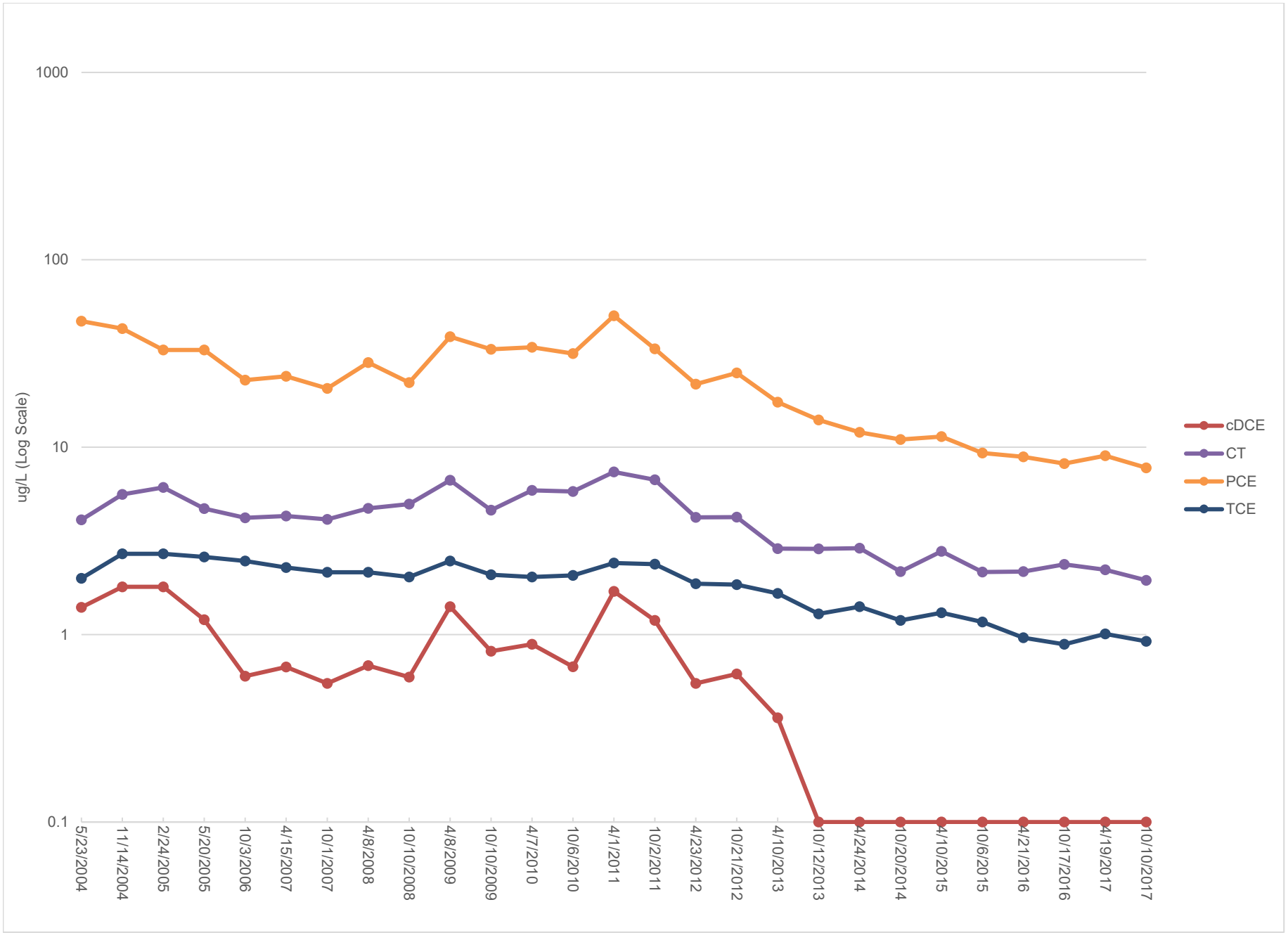
TCE

DR2-3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PCE
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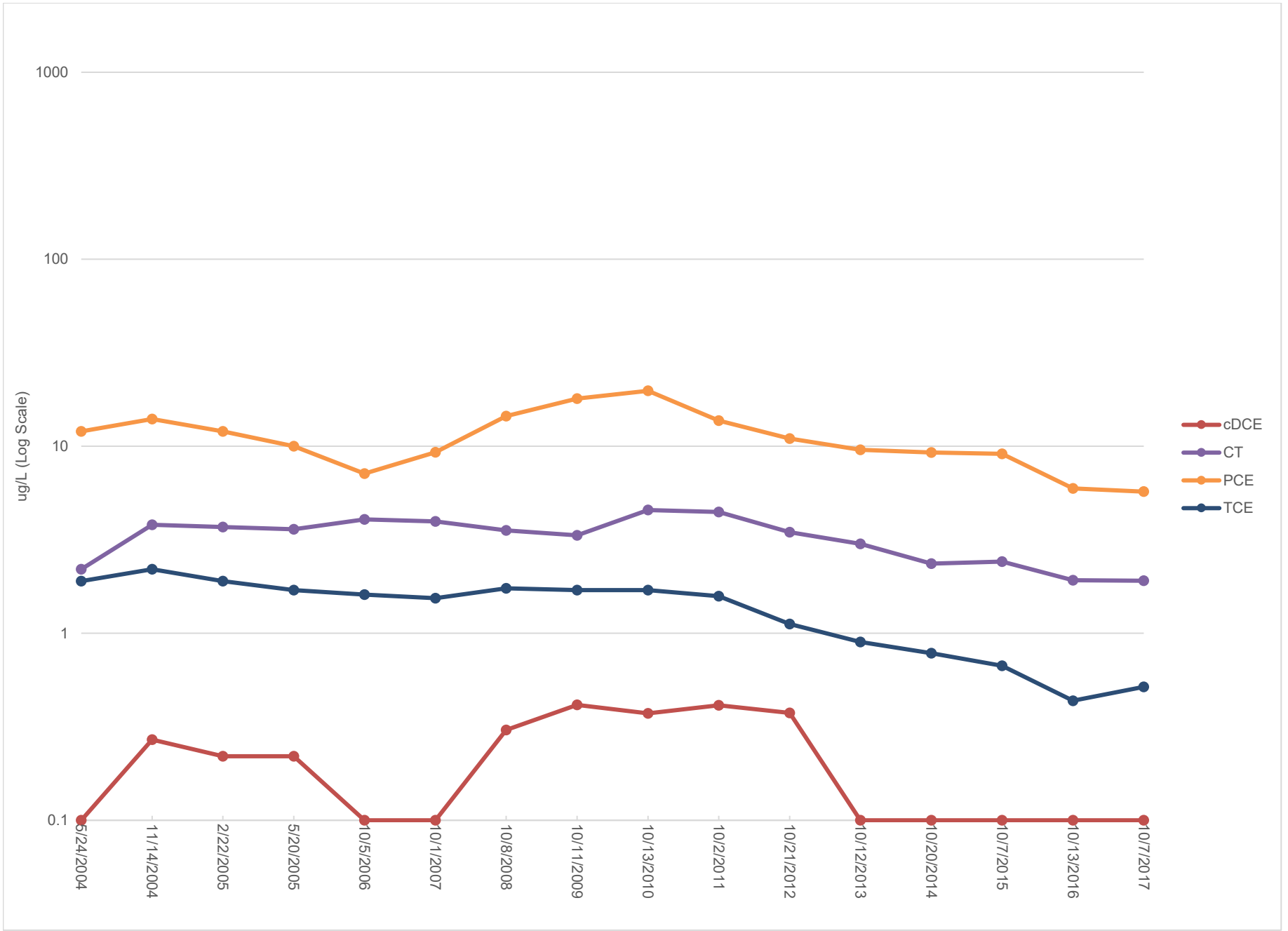
DR2-4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PCE
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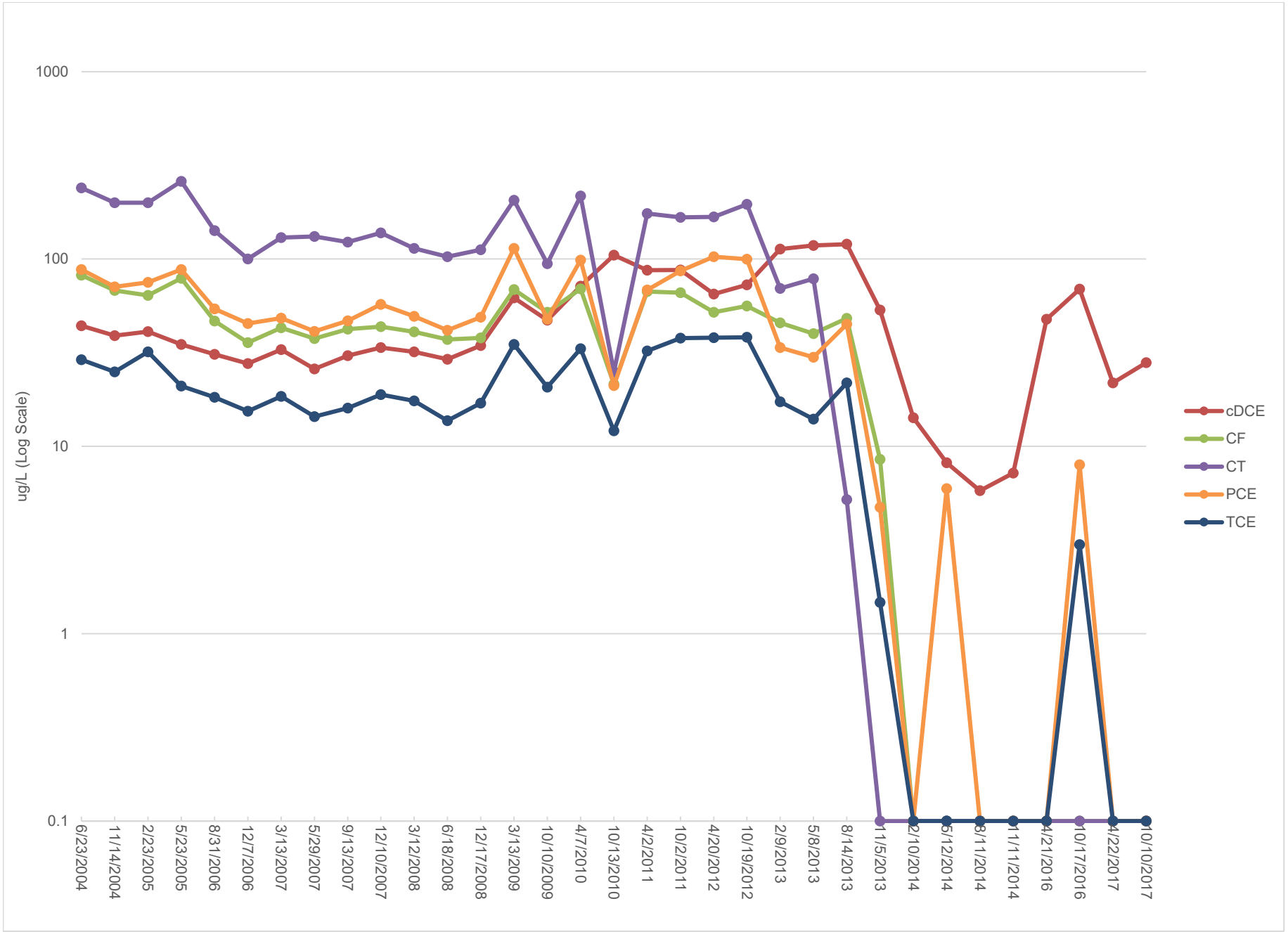
DR2-5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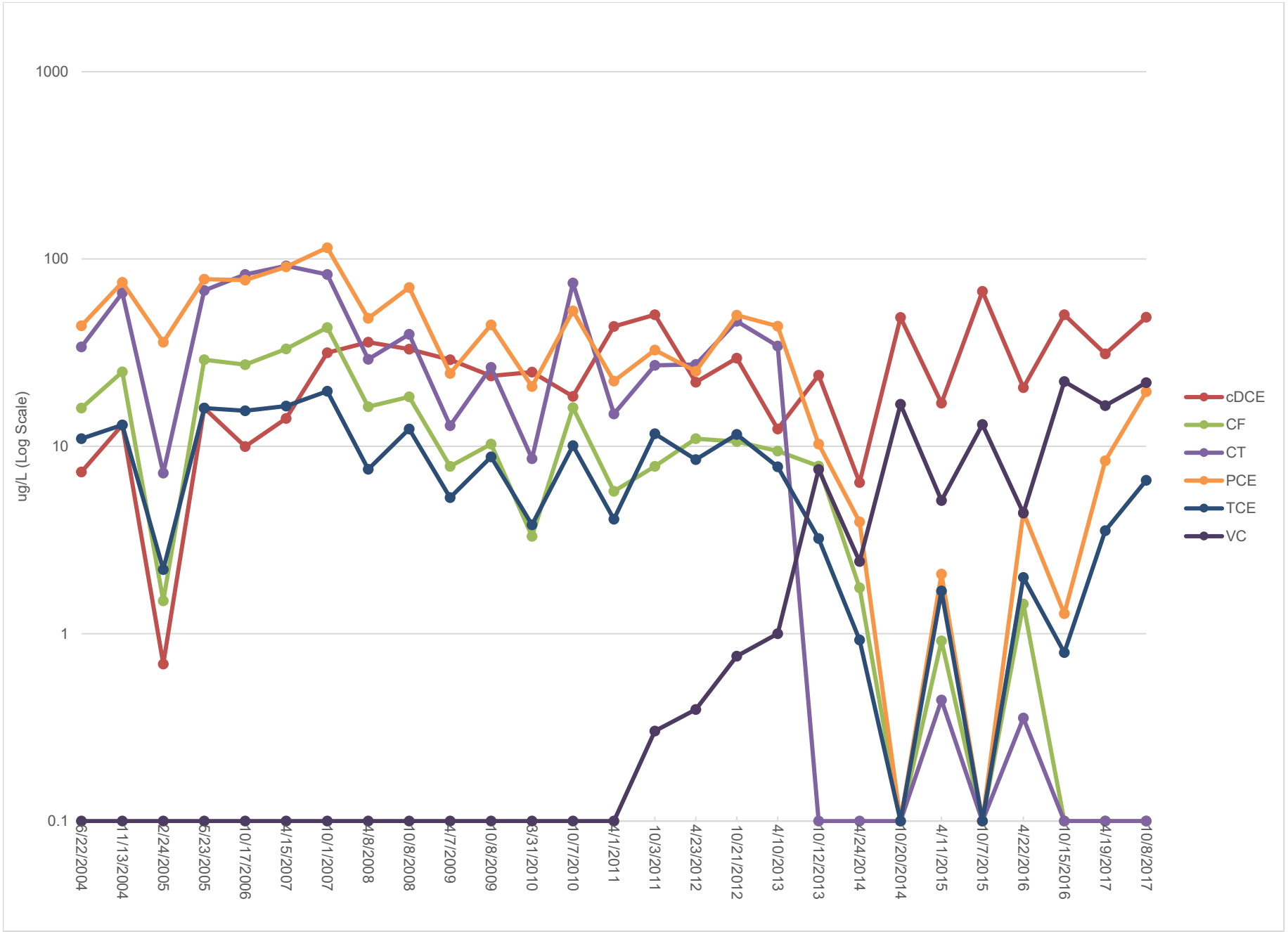
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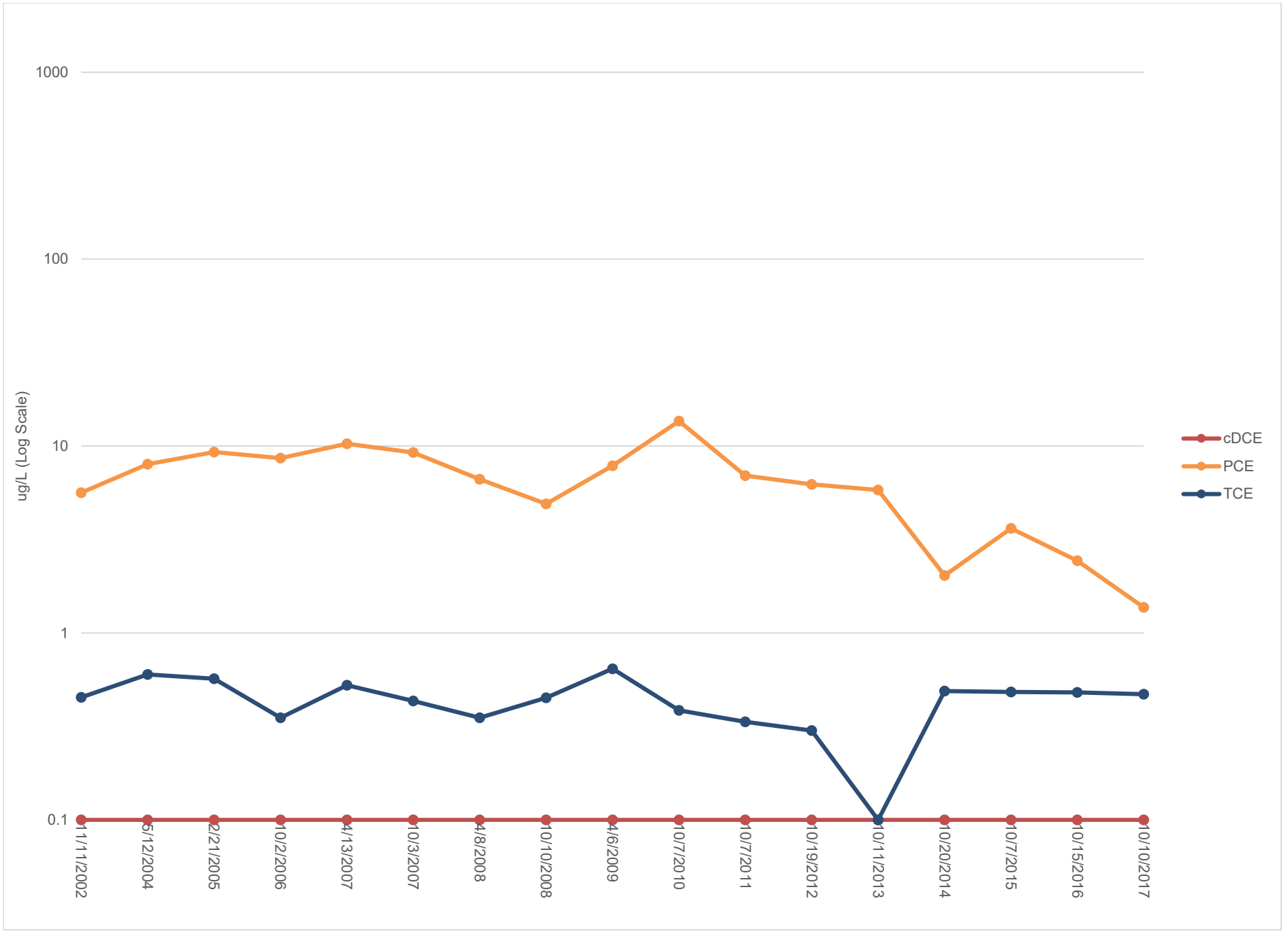
MW-25A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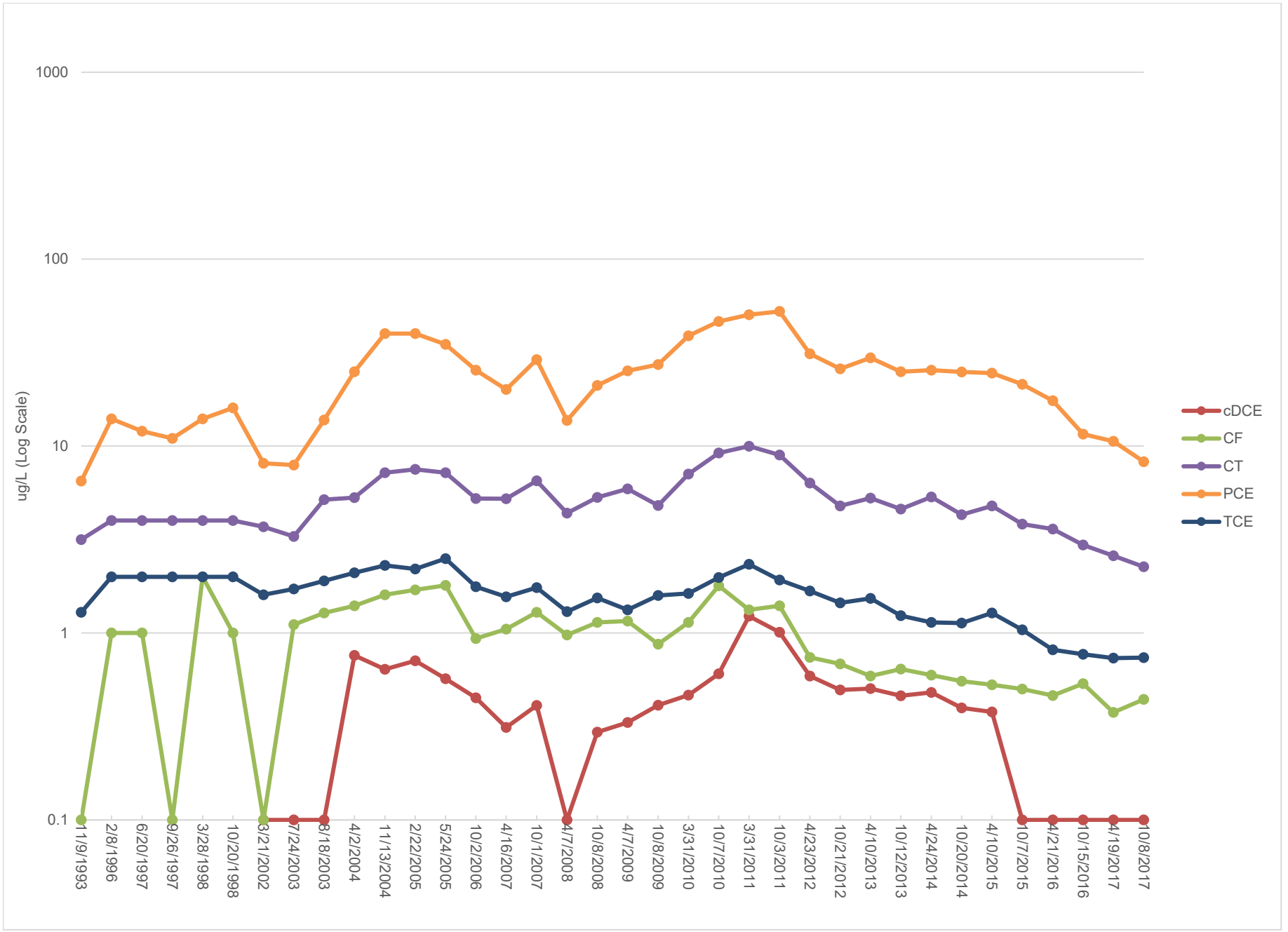
MW-26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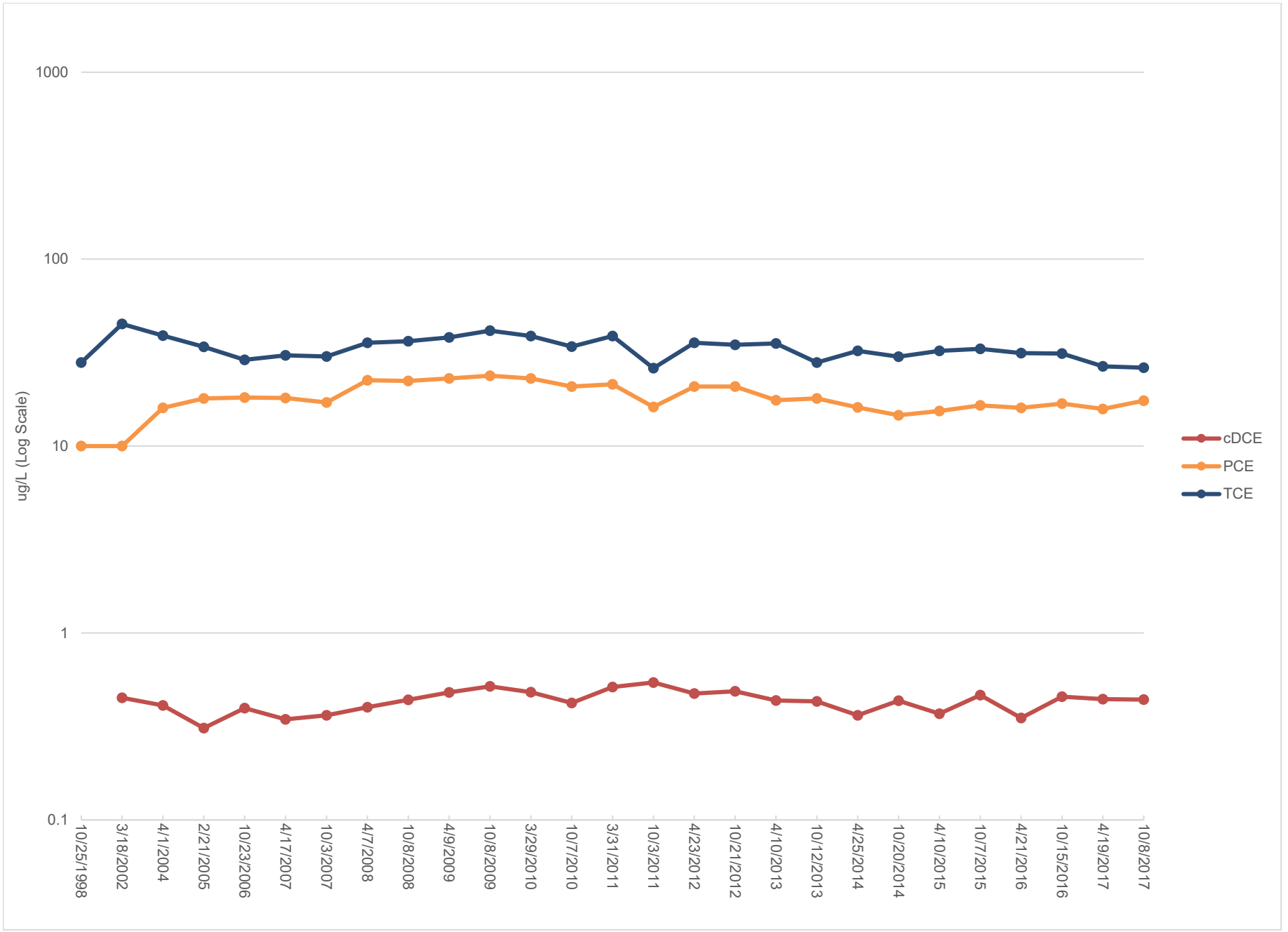
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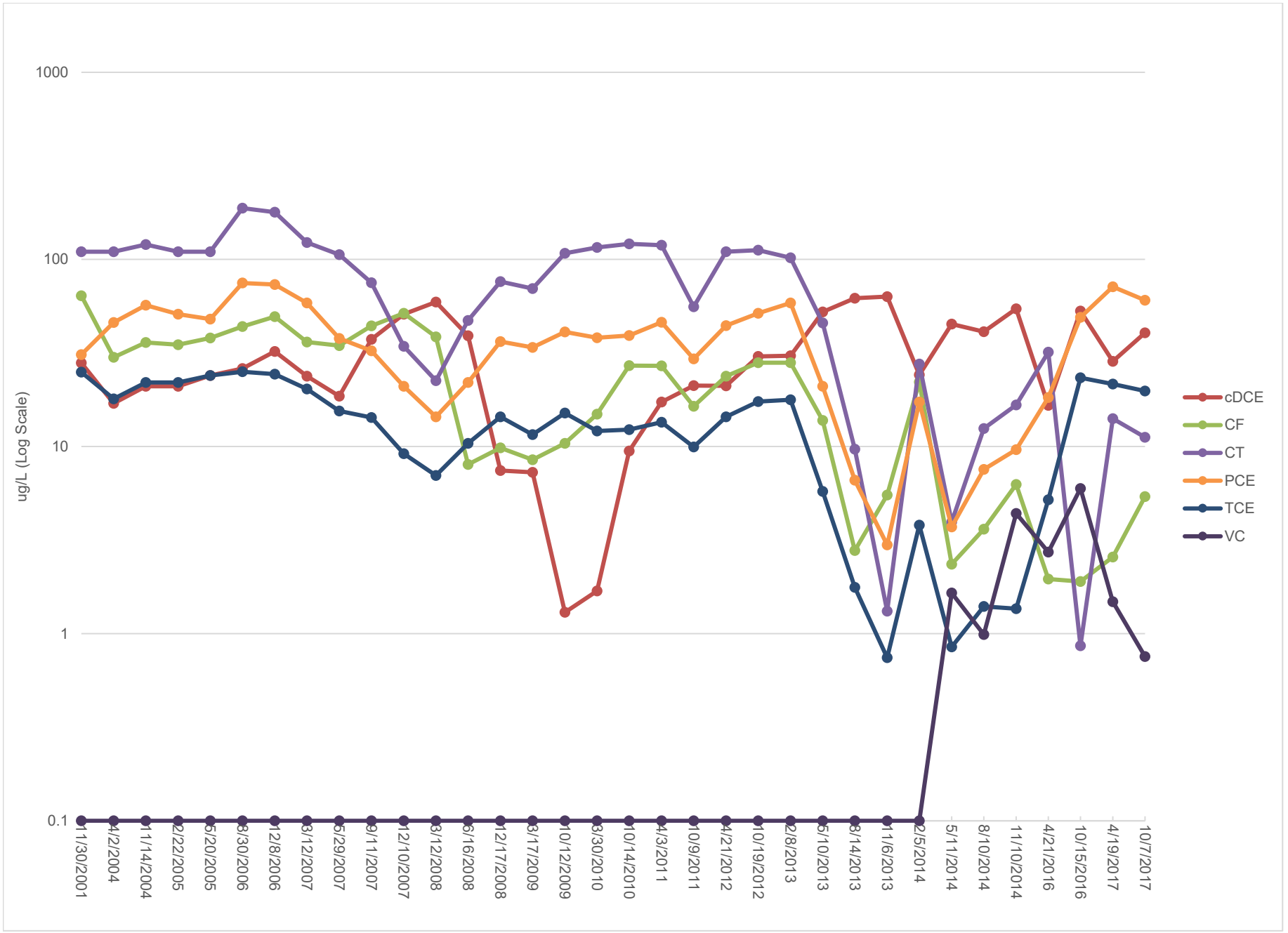
MW-85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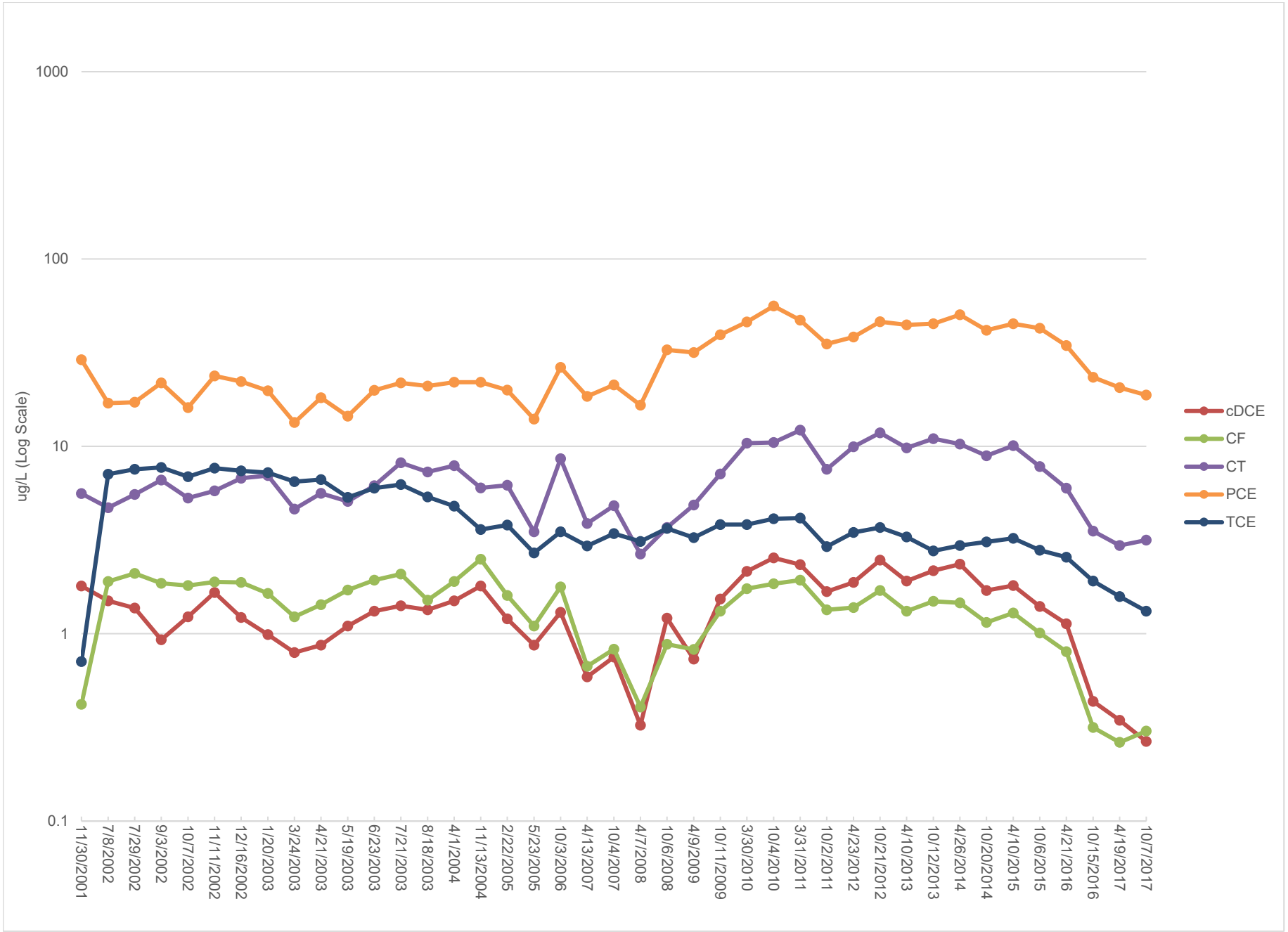
MW-88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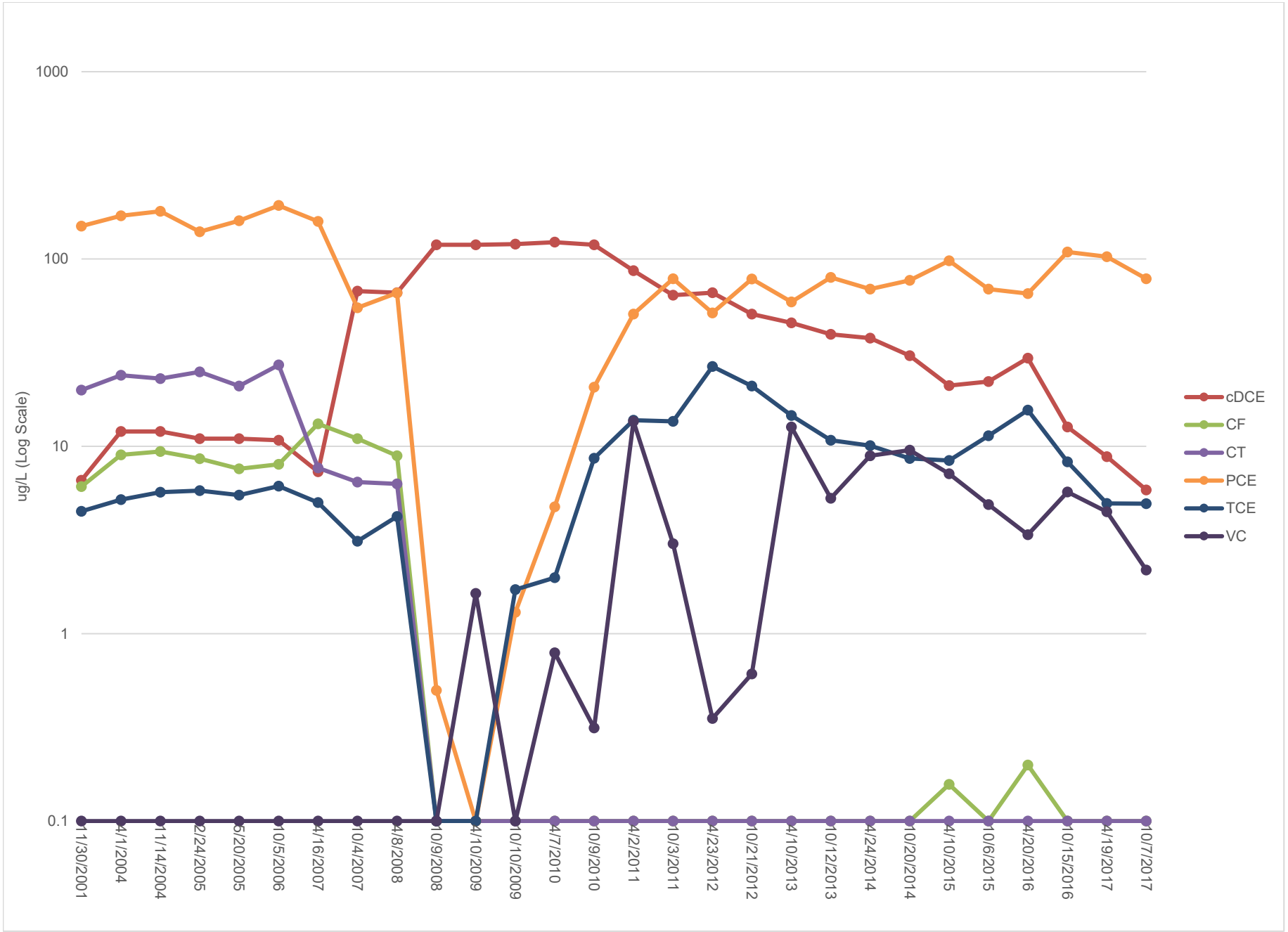
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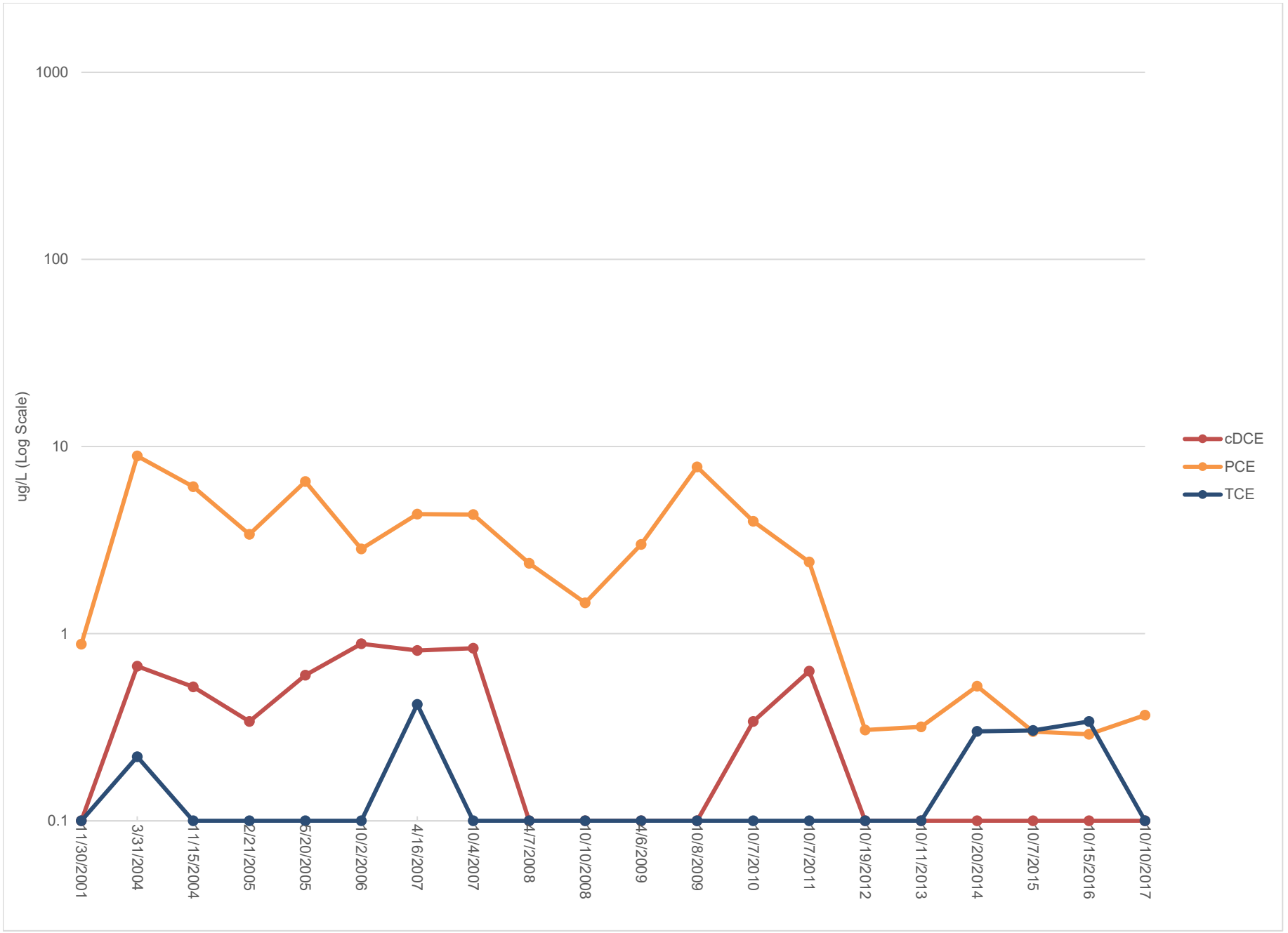
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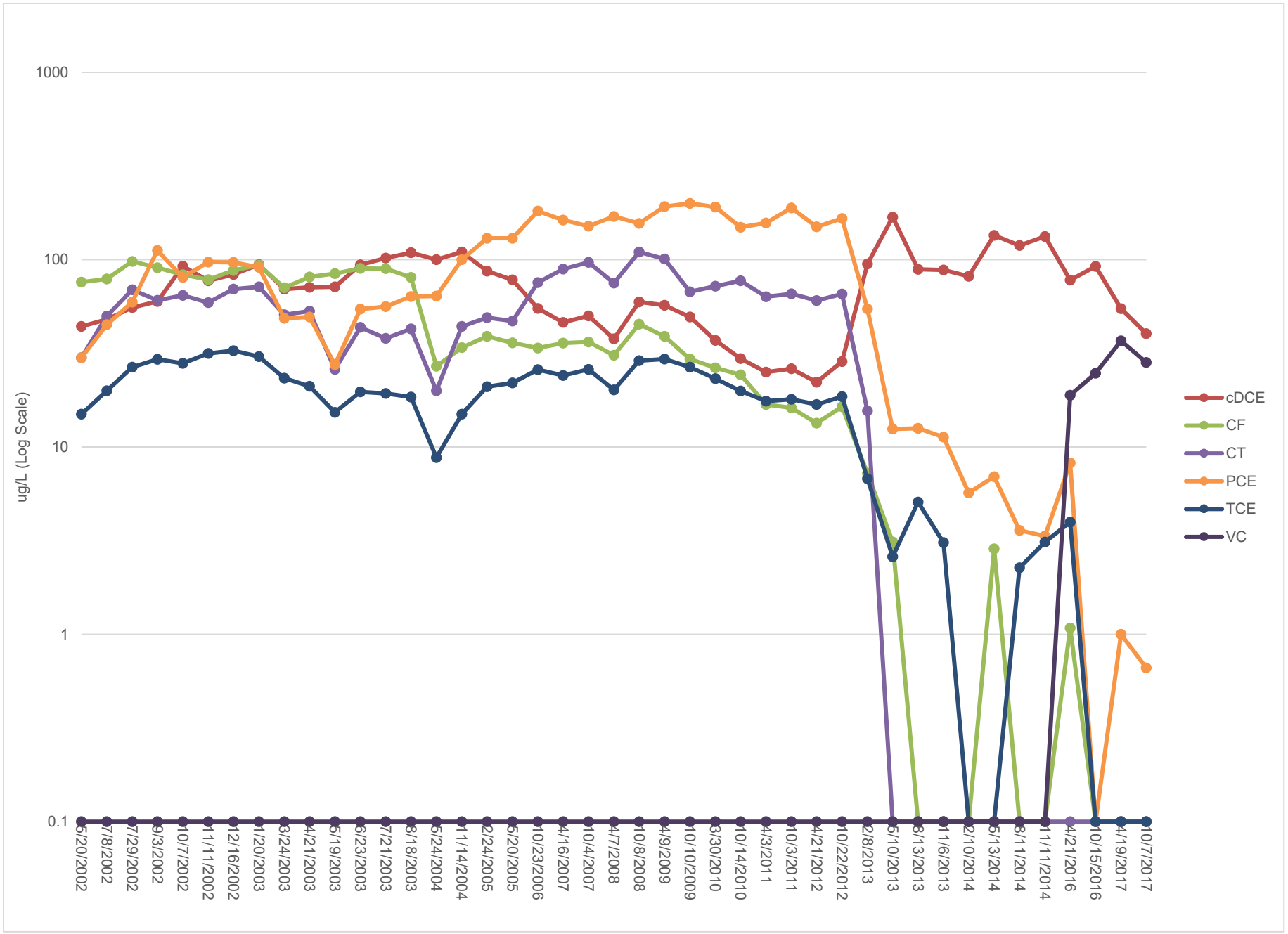
MW-113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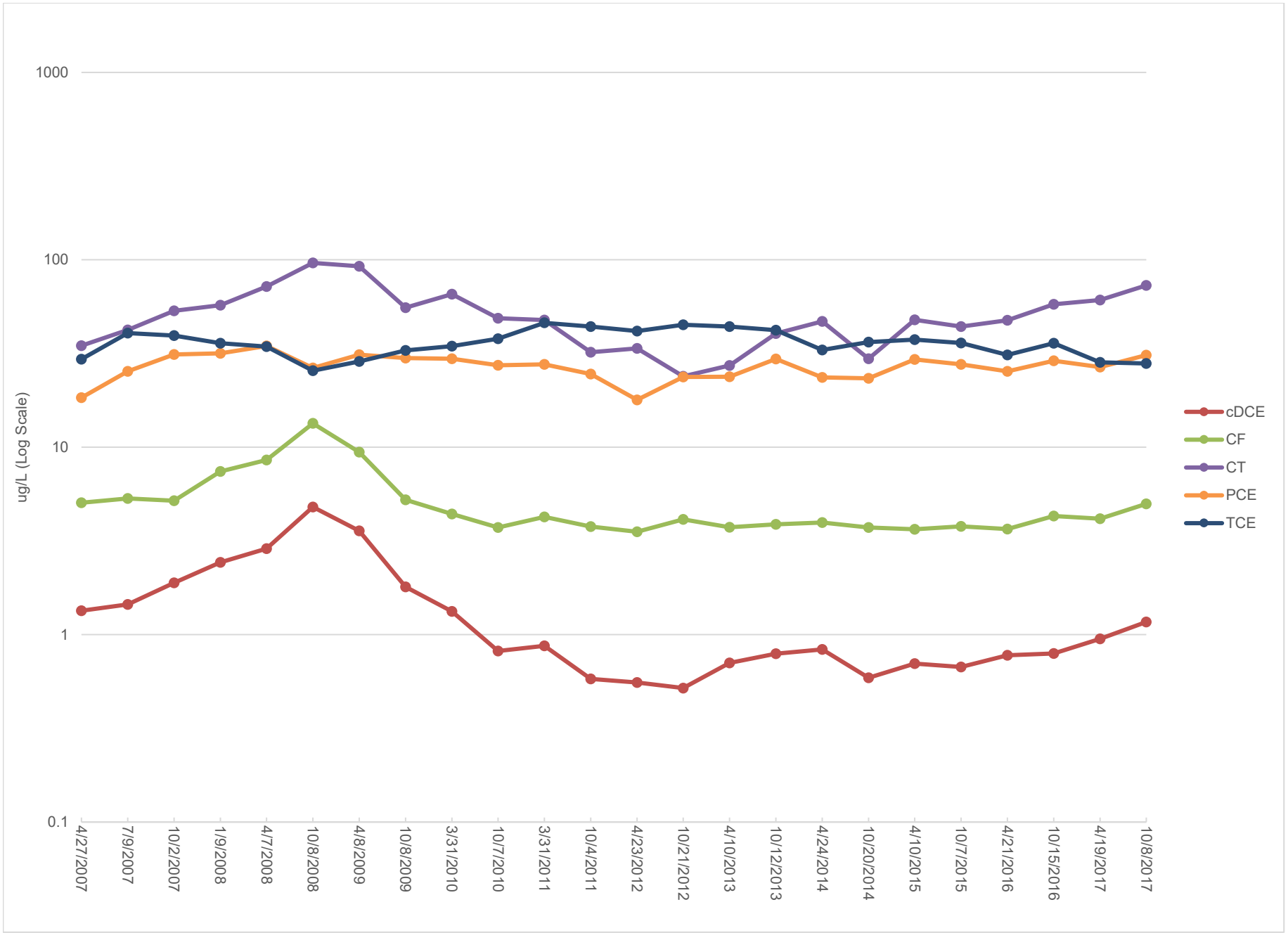
MW-217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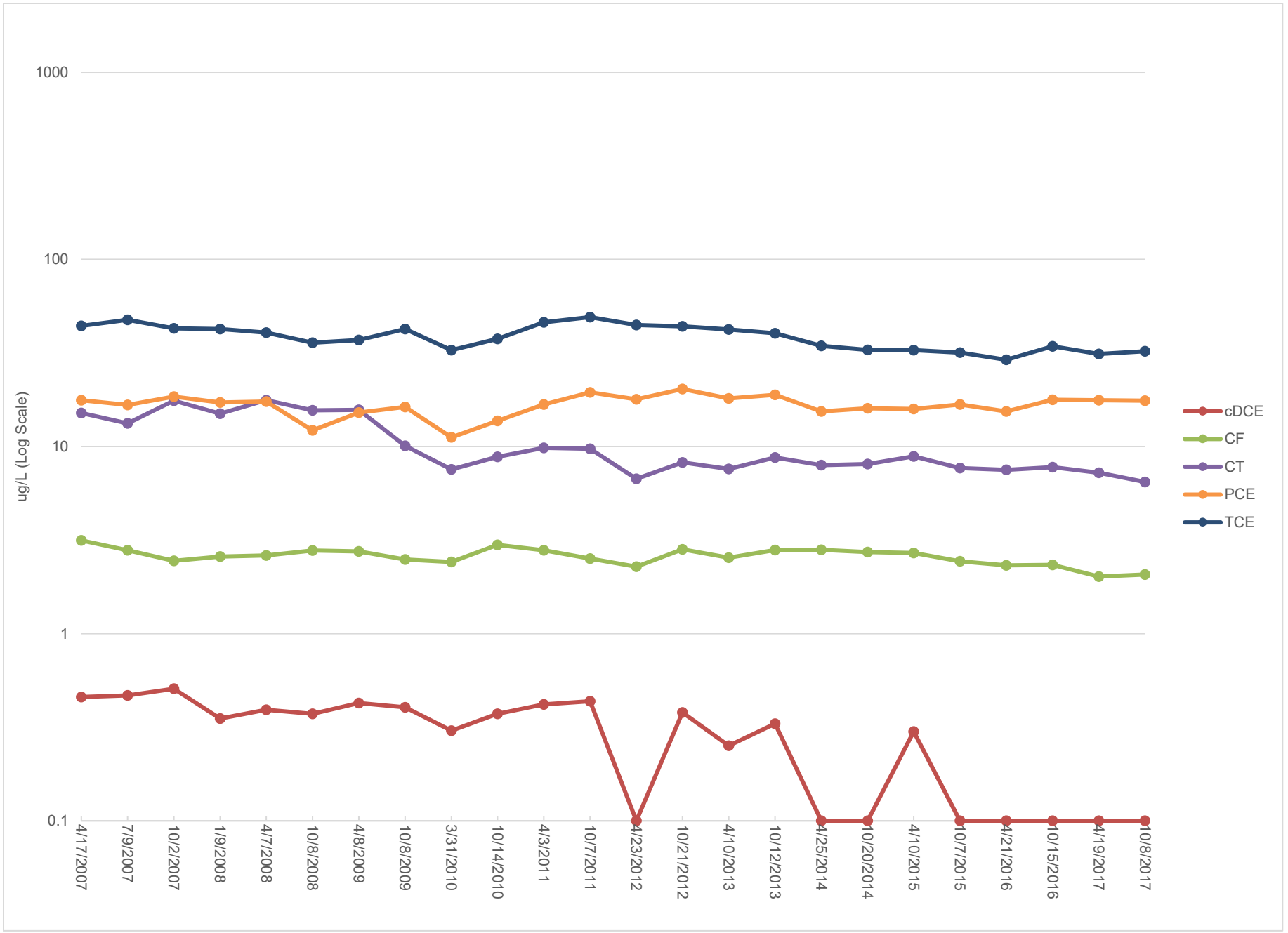
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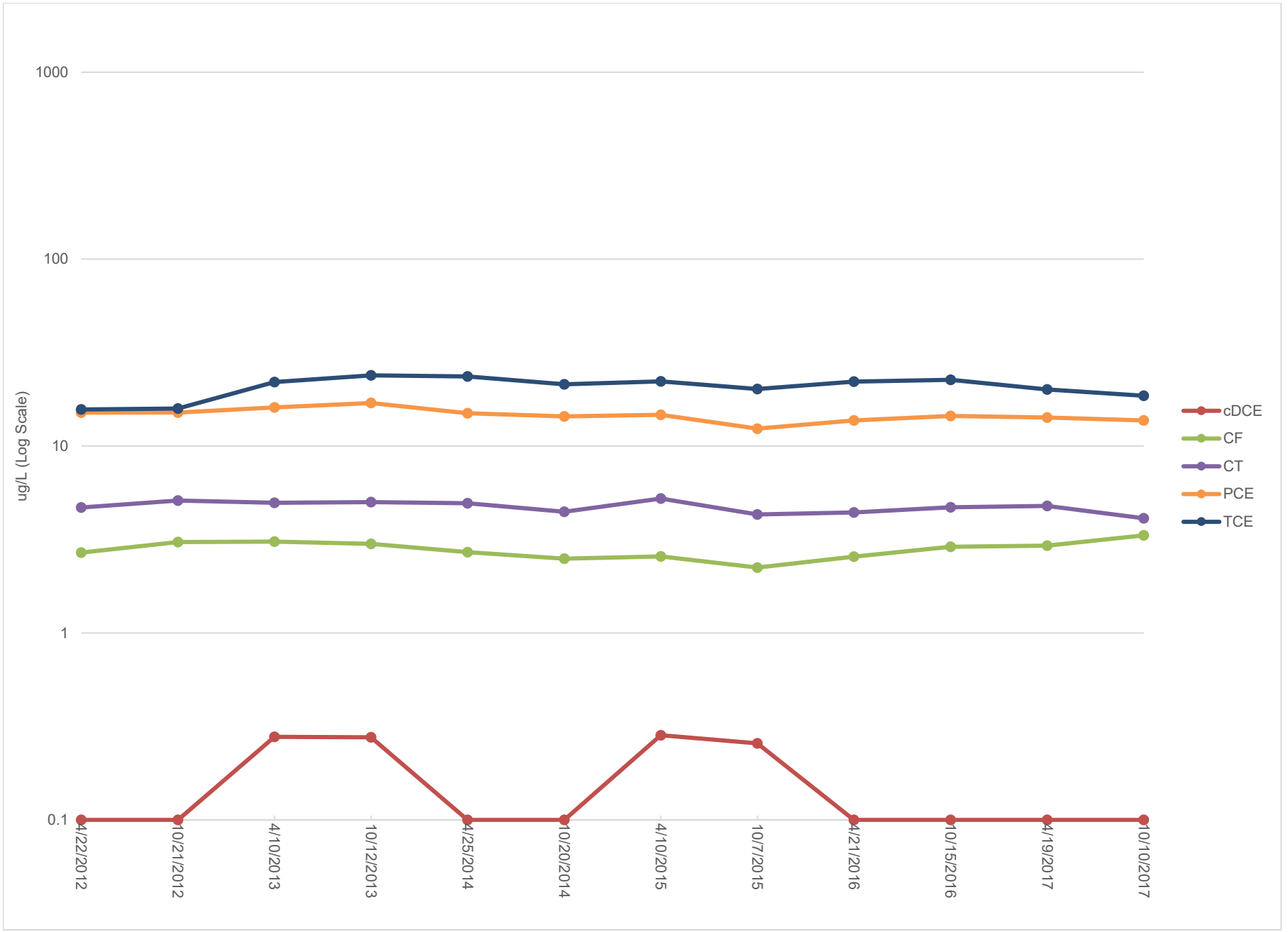
MW-259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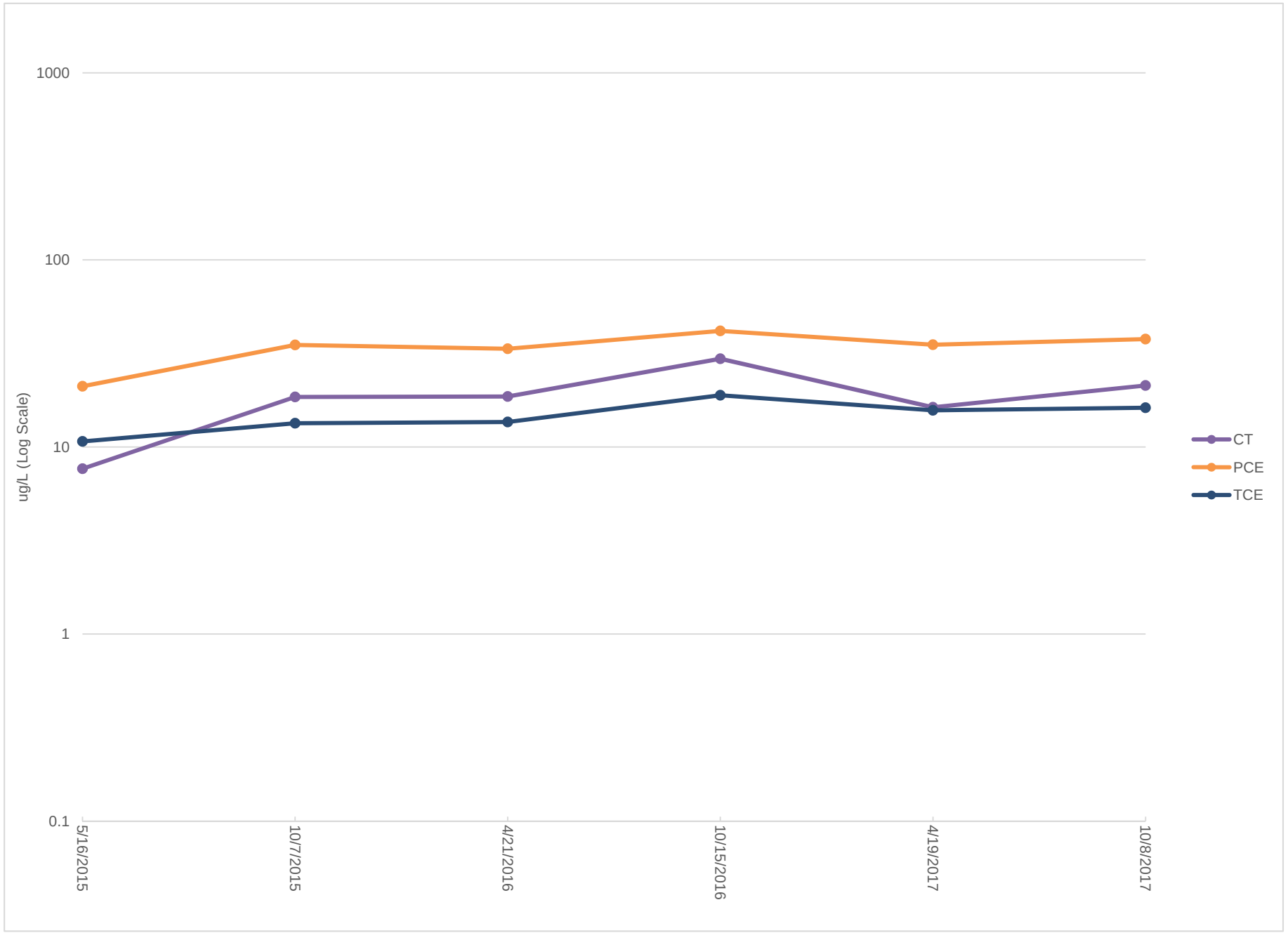
MW-267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PCE
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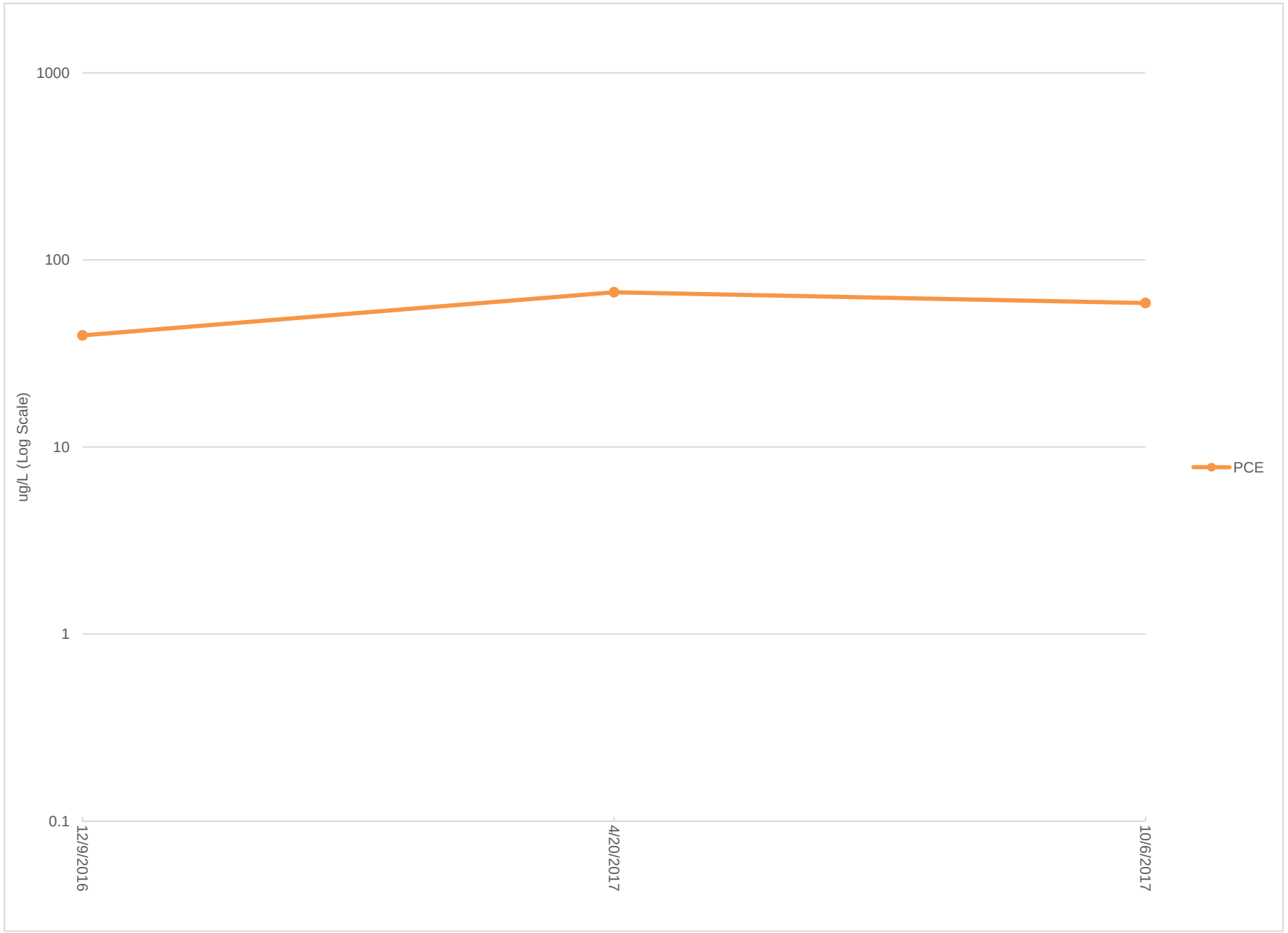
MW-279



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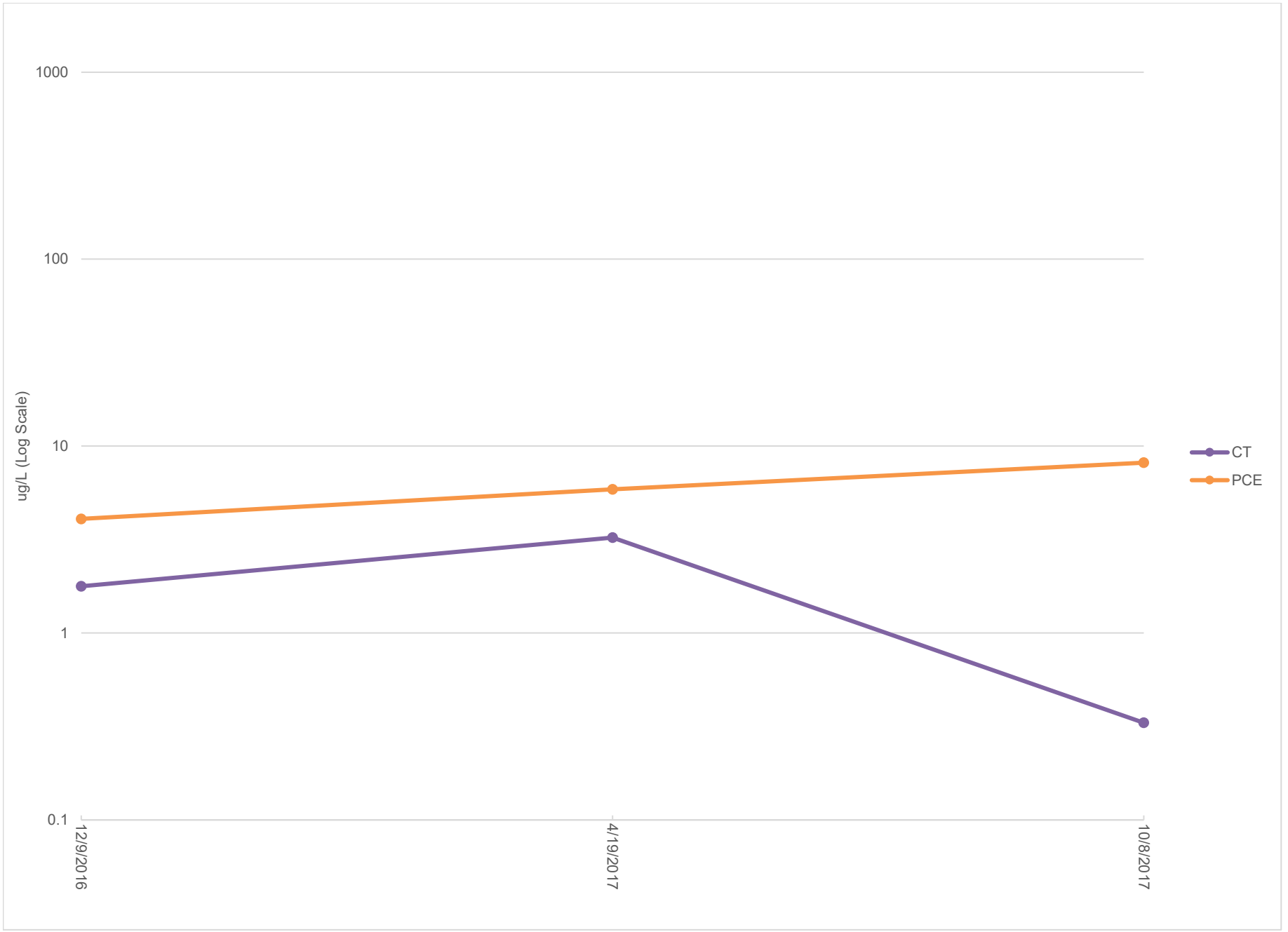

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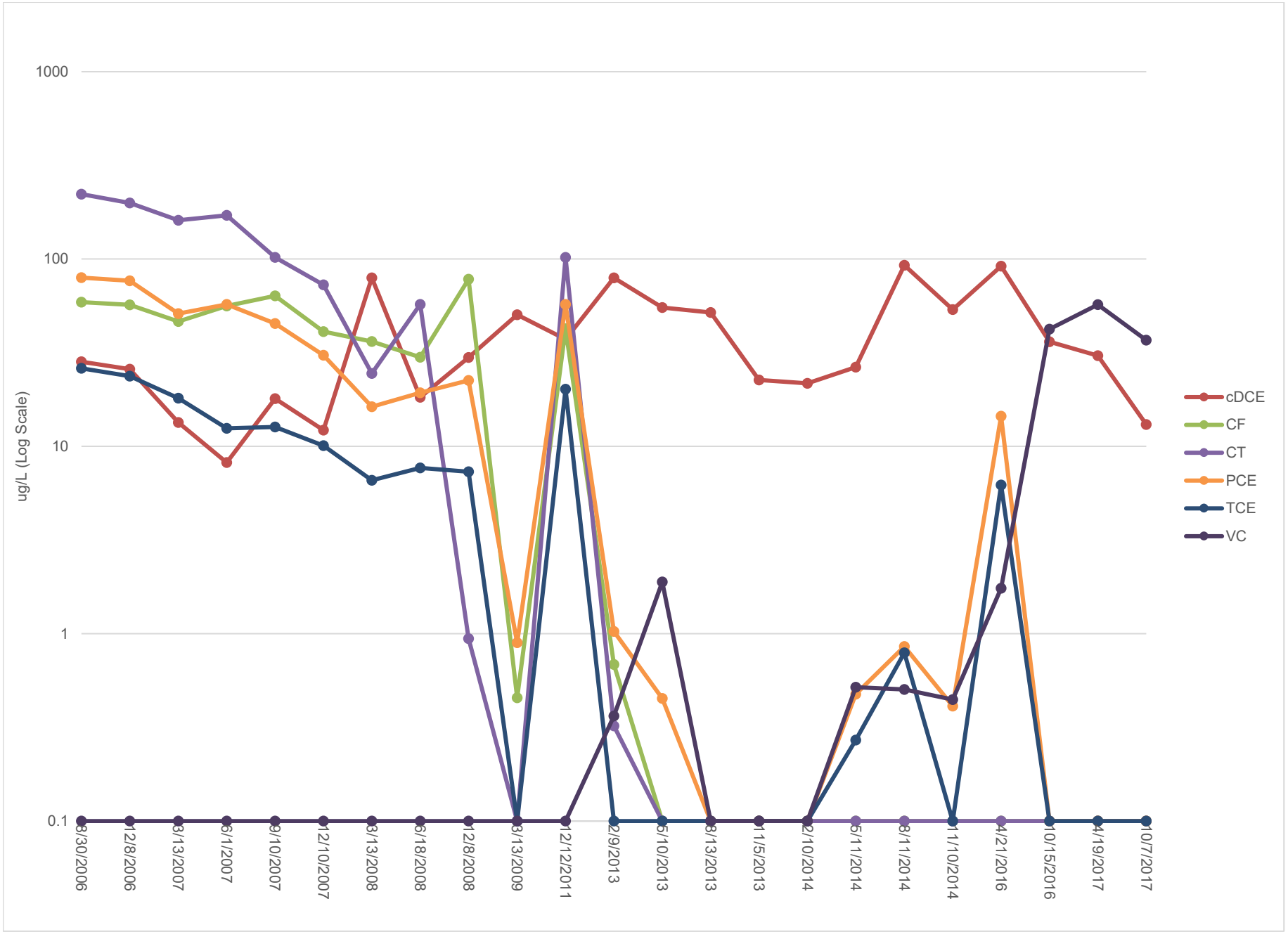
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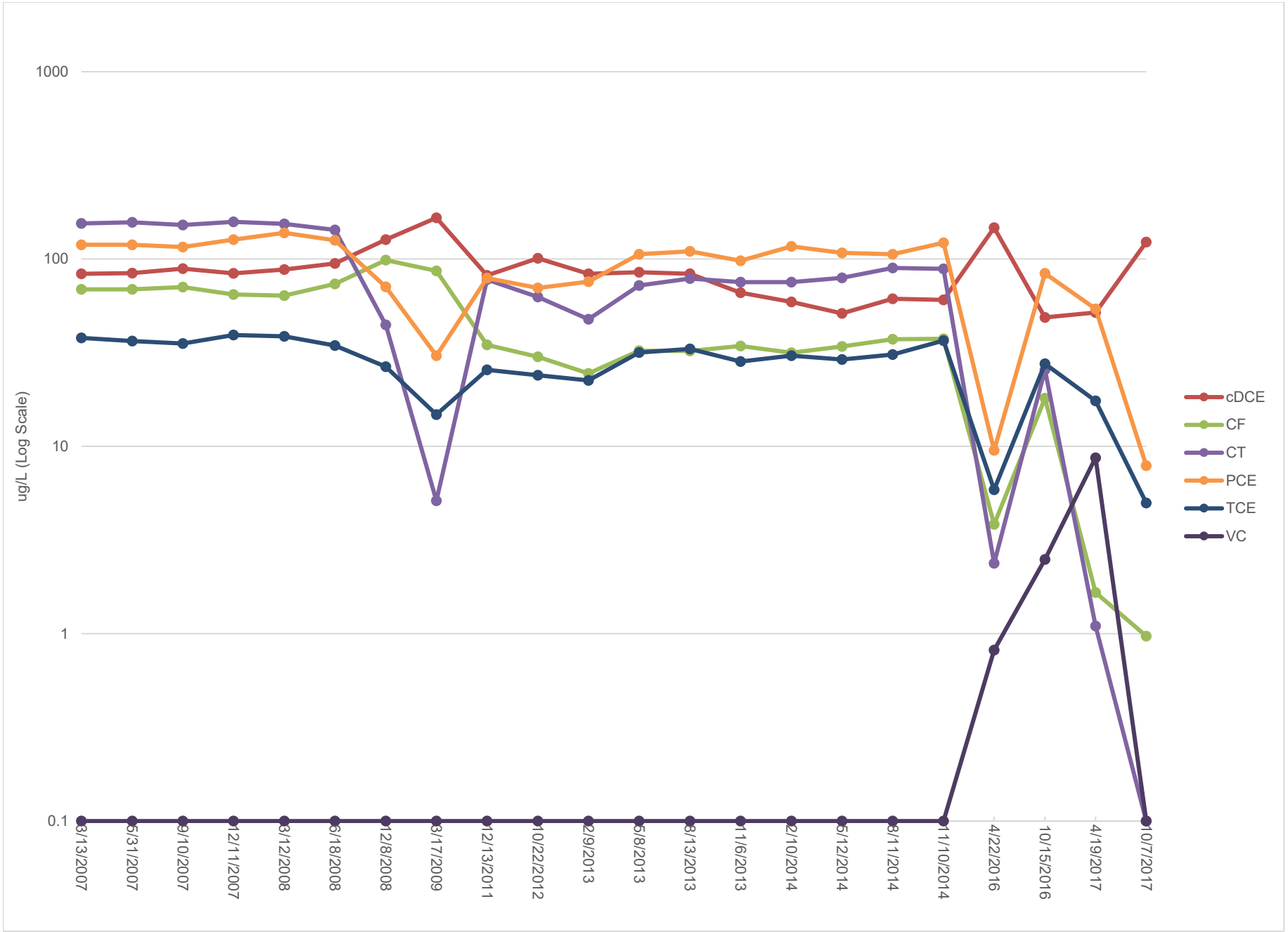
PMW85-05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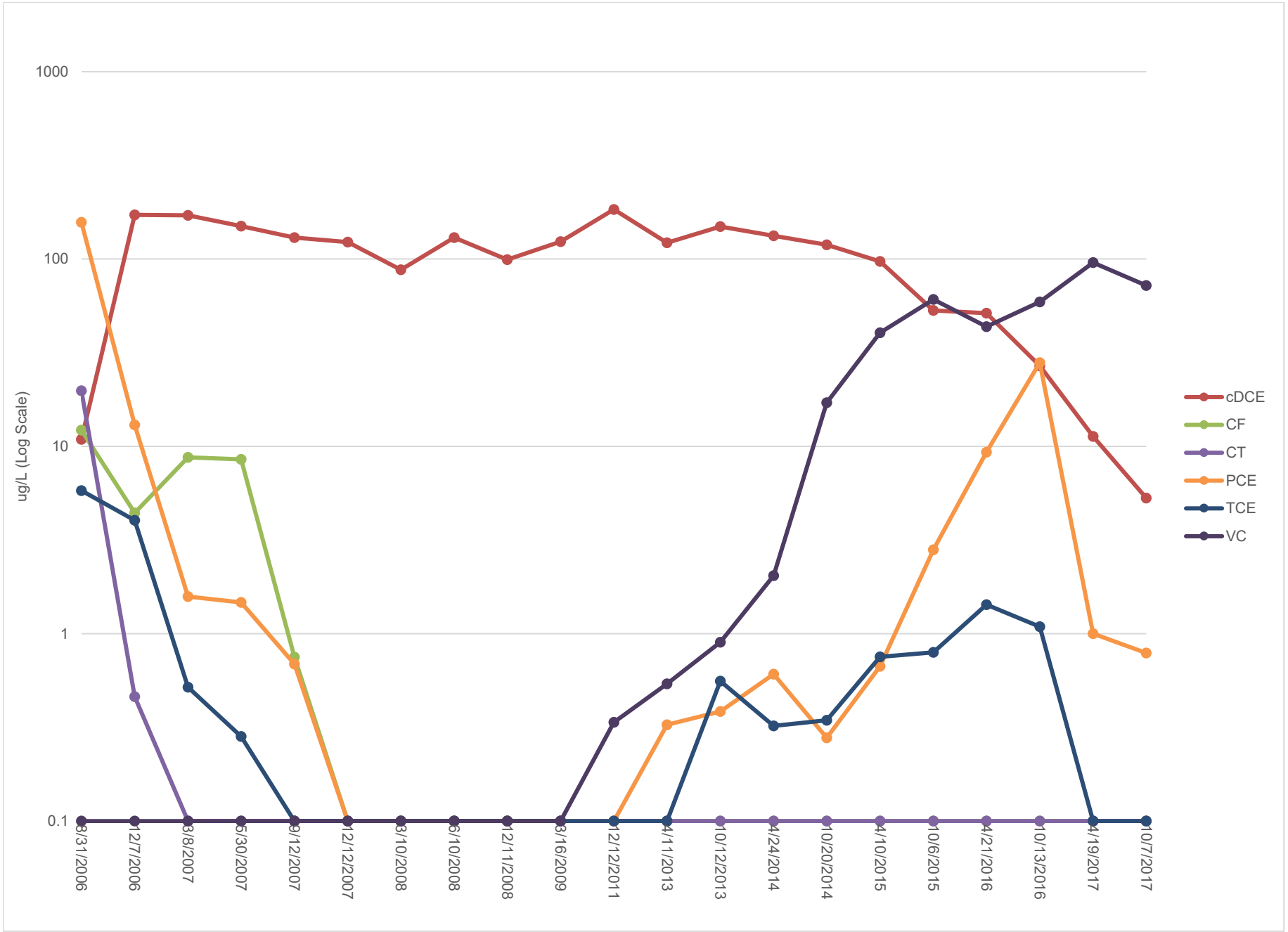
PMW92-02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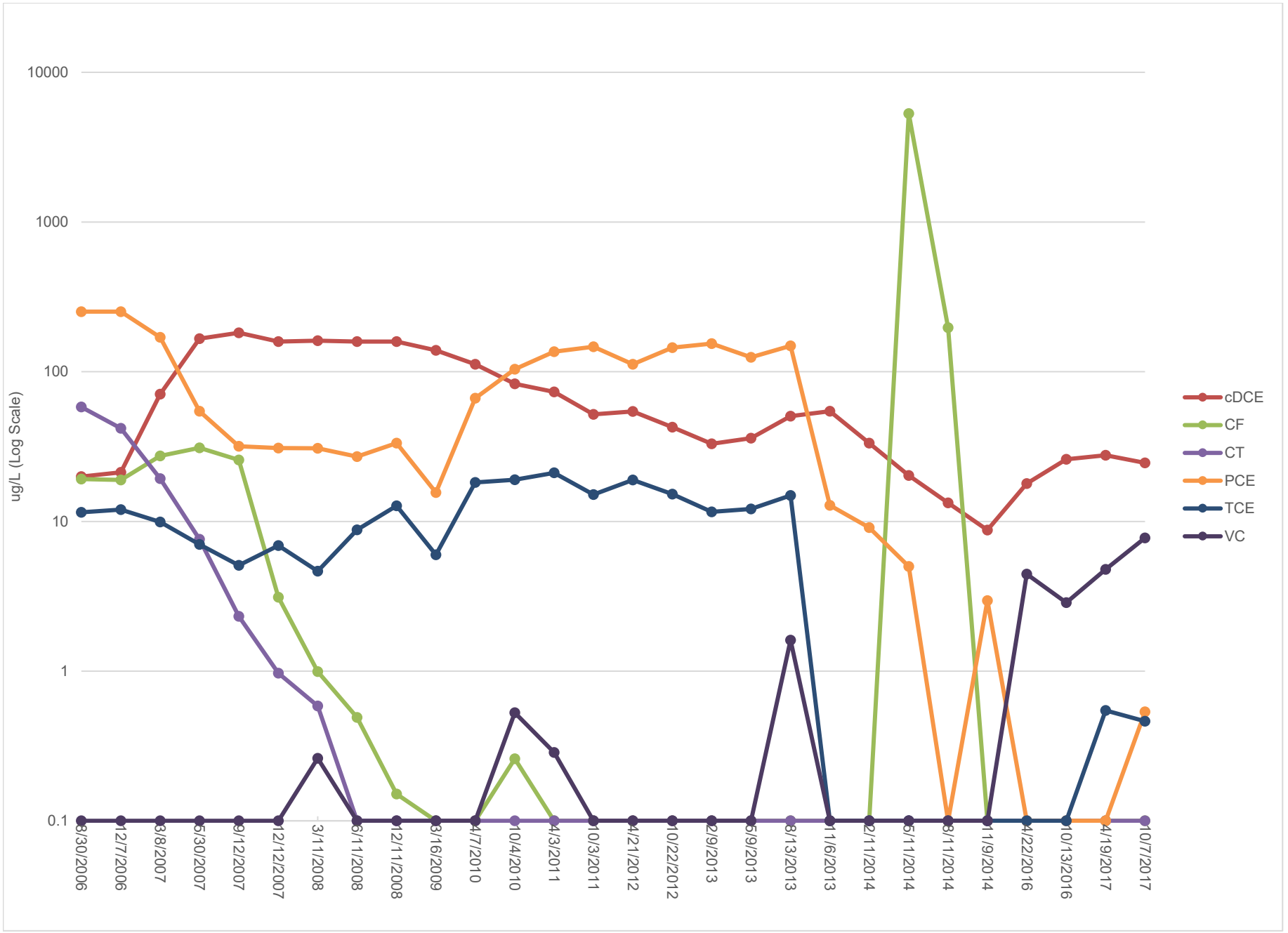
cDCE
CF
CT
PCE
TCE
VC

PMW92-03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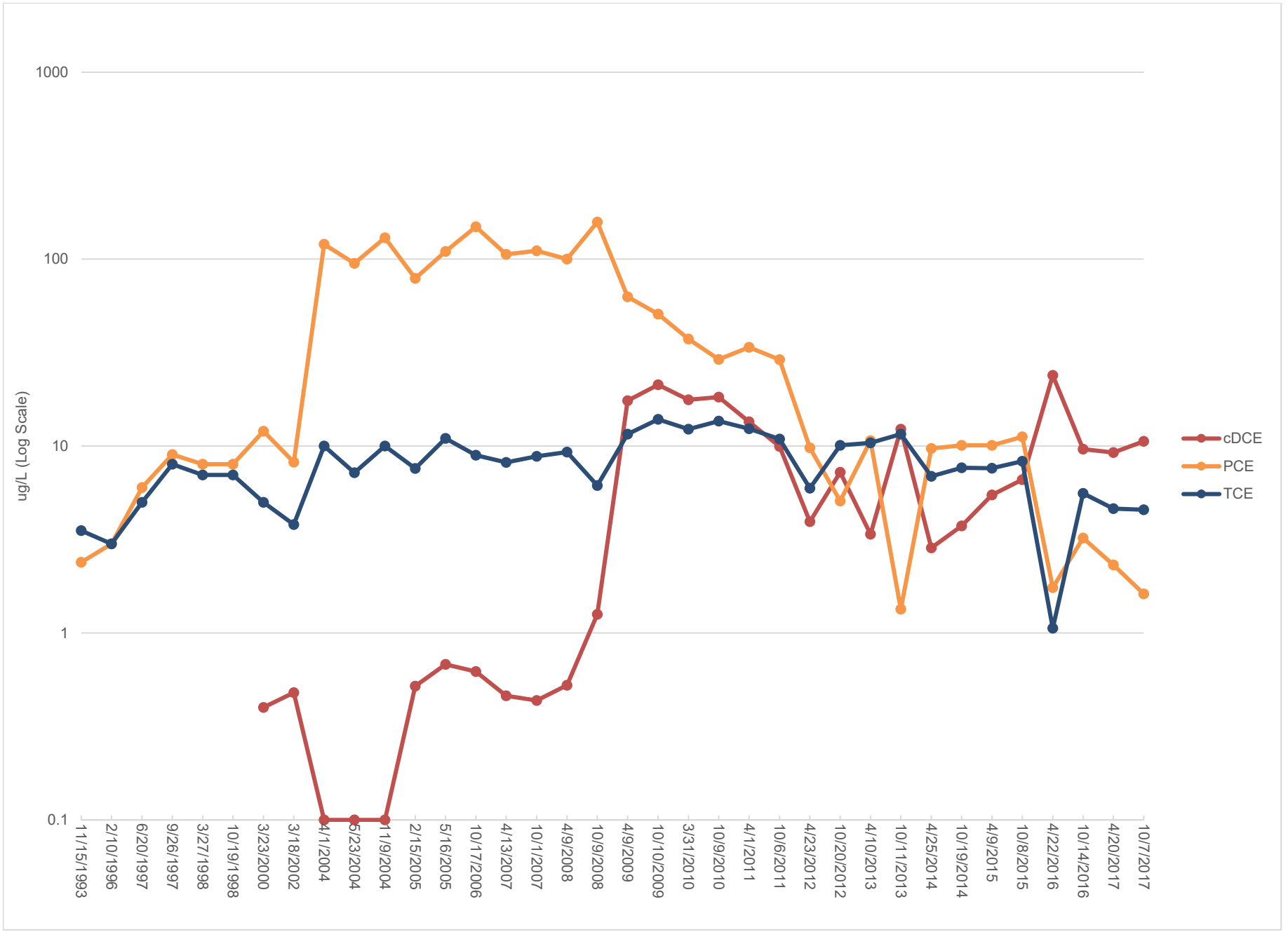
cDCE
CF
CT
PCE
TCE
VC

Appendix H-4
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer West-Central Wells

MW-39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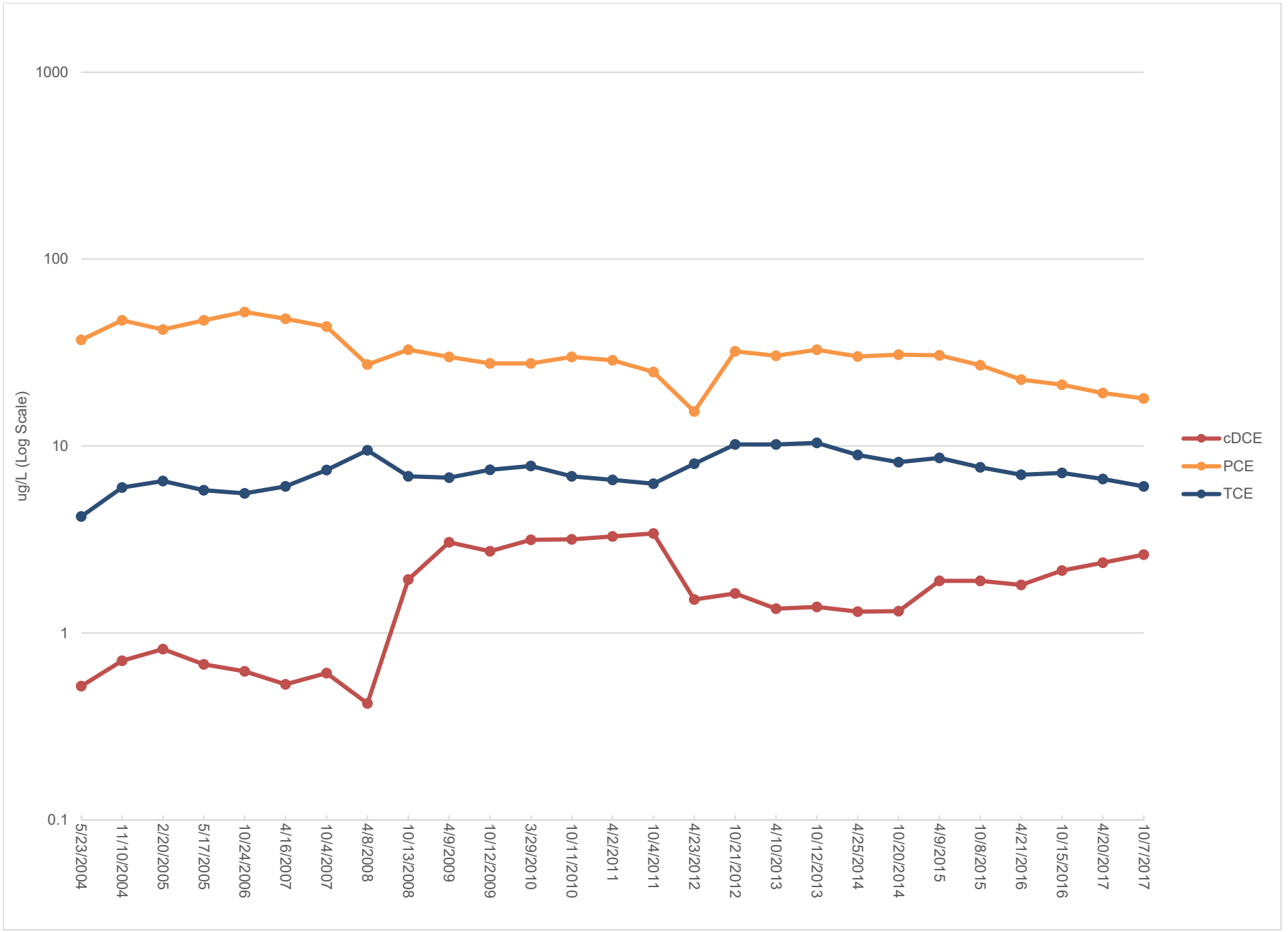
cDCE
PCE
TCE

MW-94A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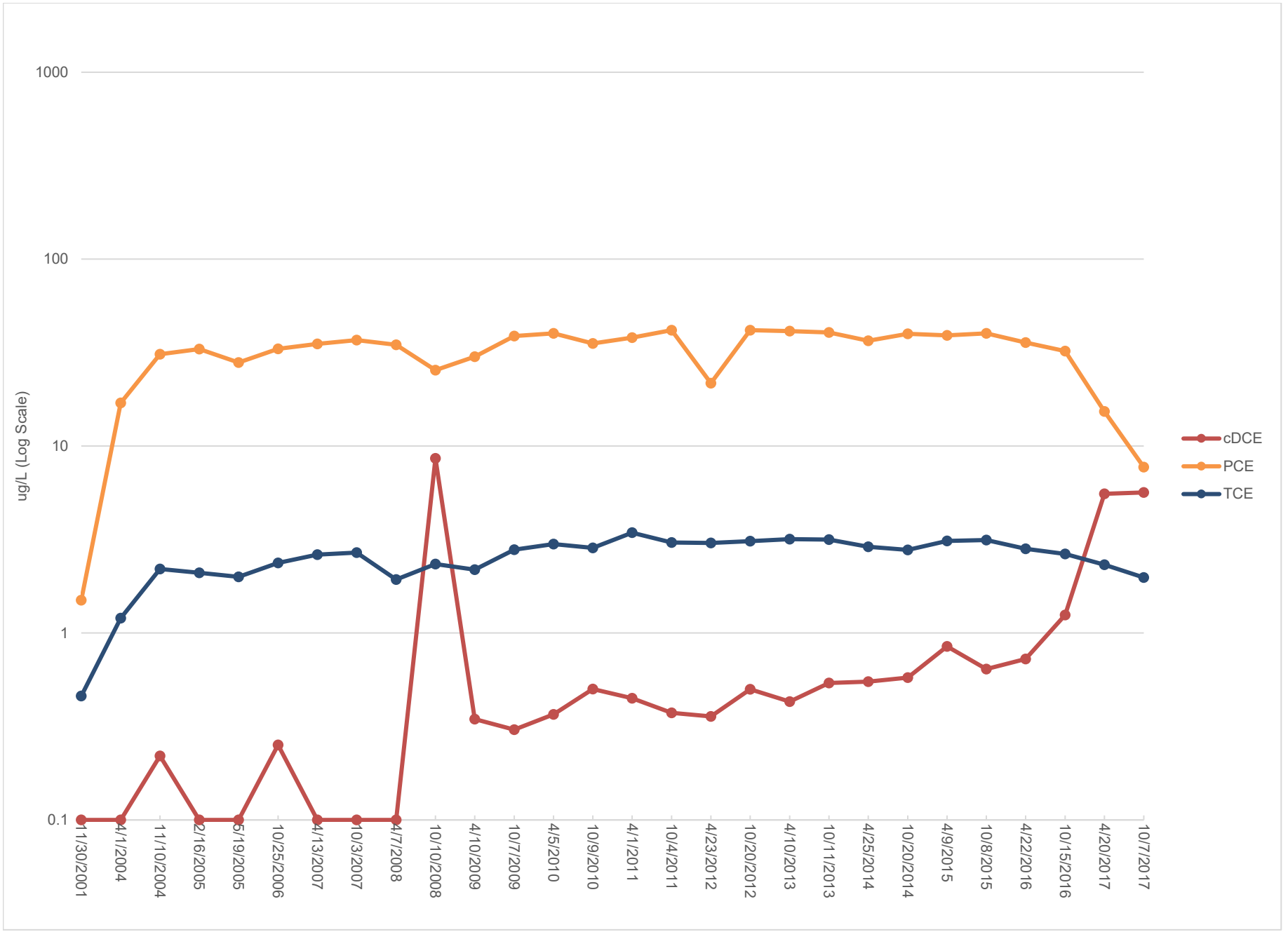
cDCE
PCE
TCE

MW-98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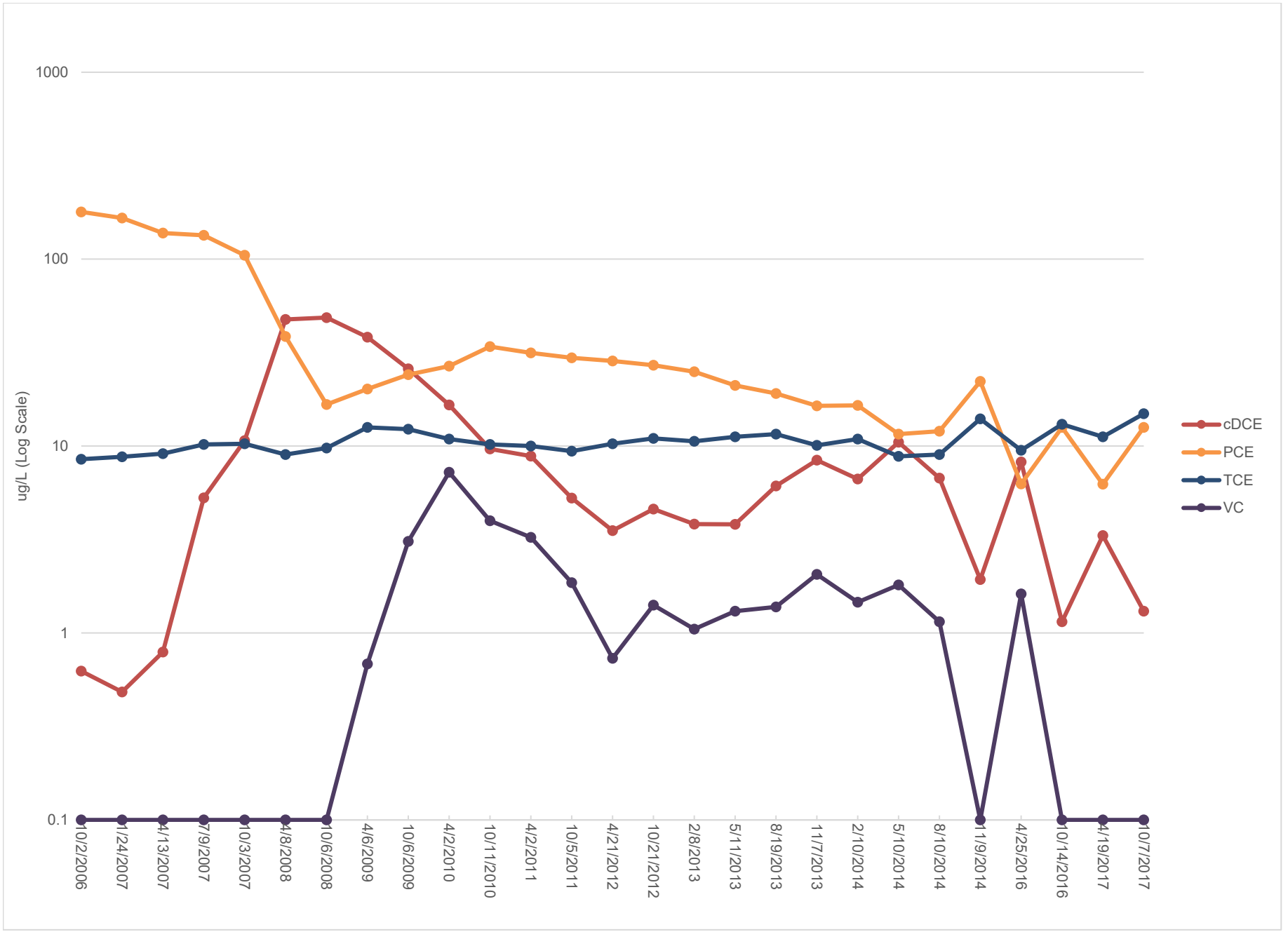
PCE
TCE

MW-197B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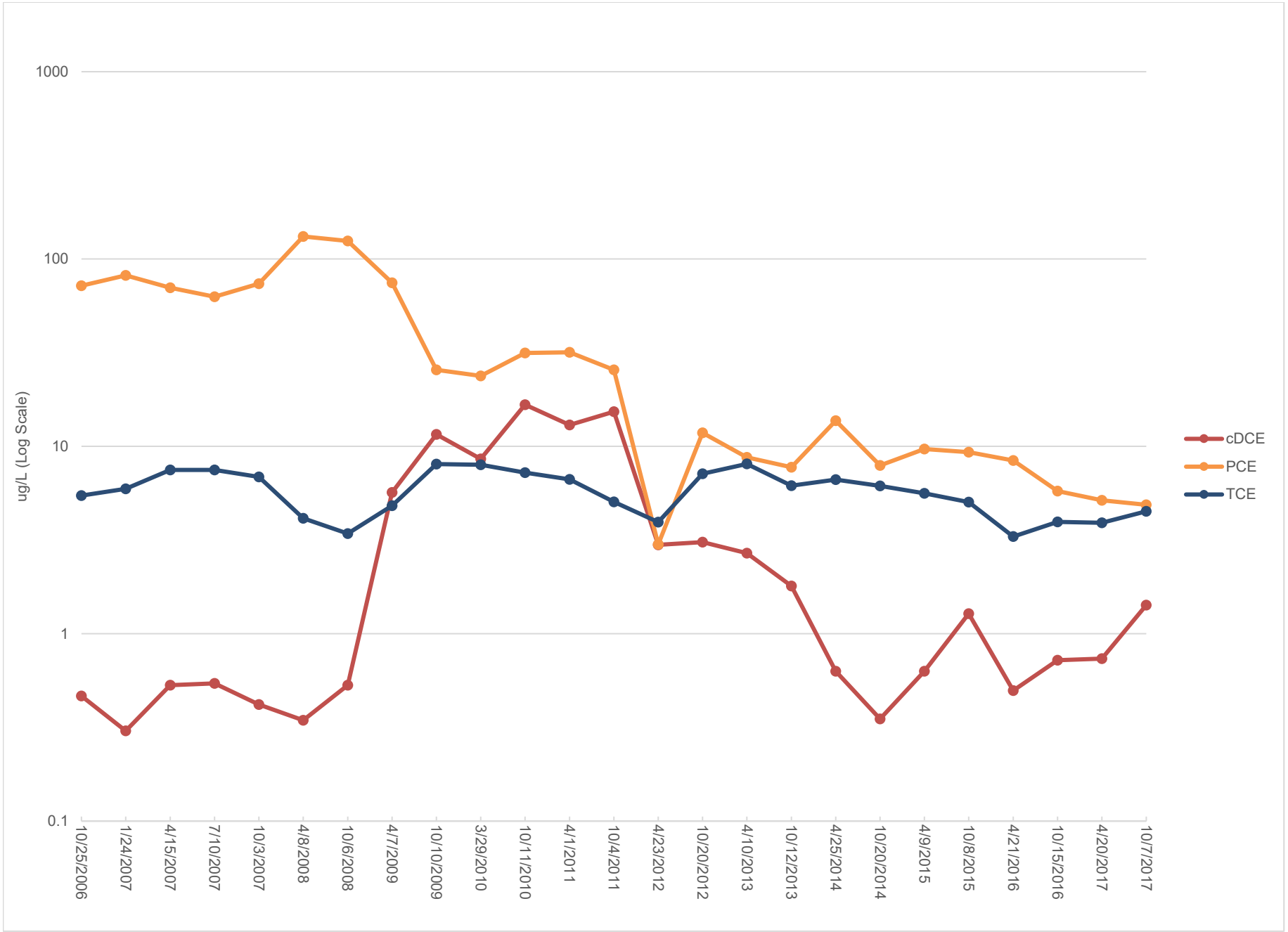
10/7/2017
cDCE
PCE
TCE
VC

MW-200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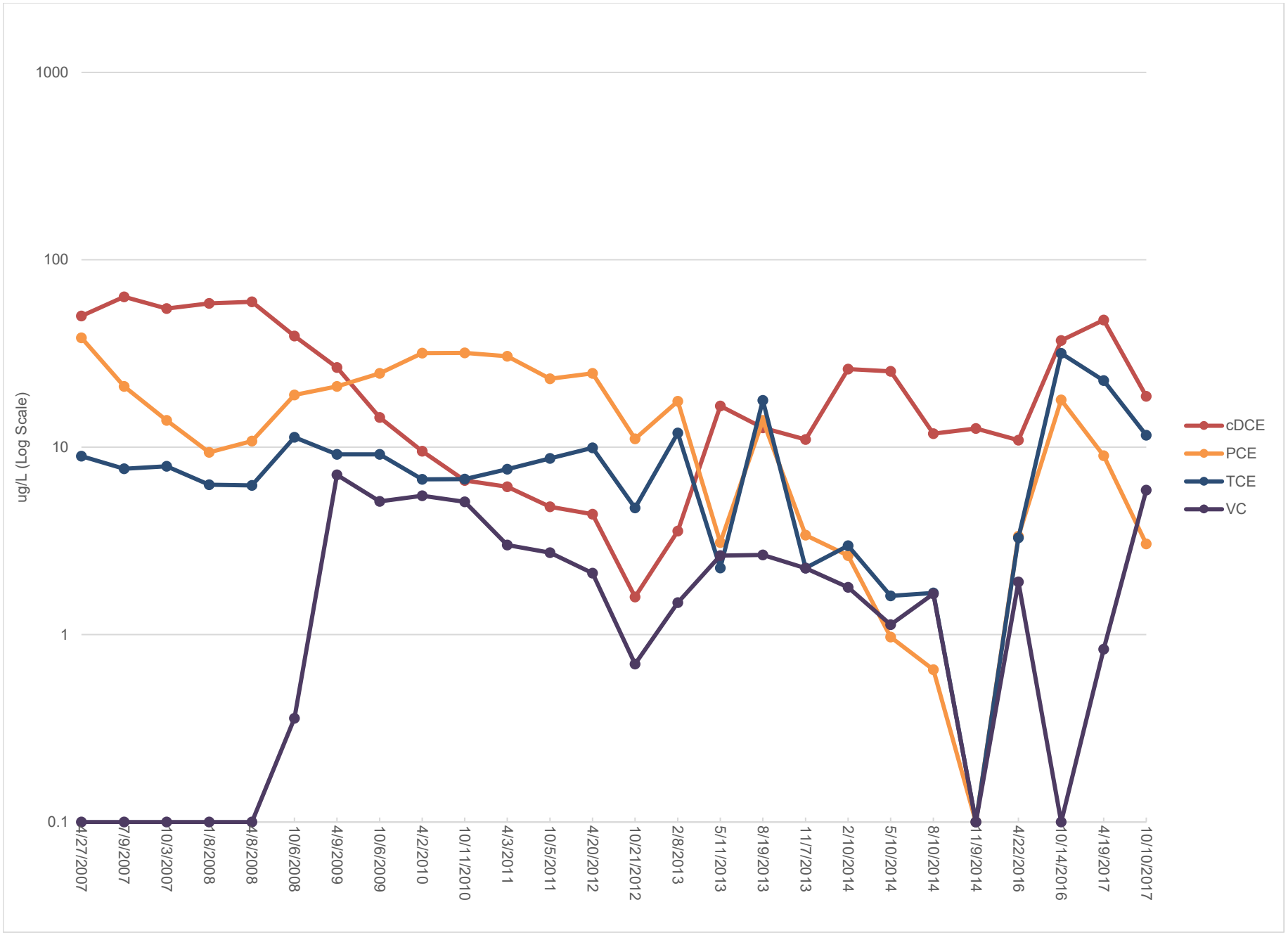
cDCE
PCE
TCE

MW-203B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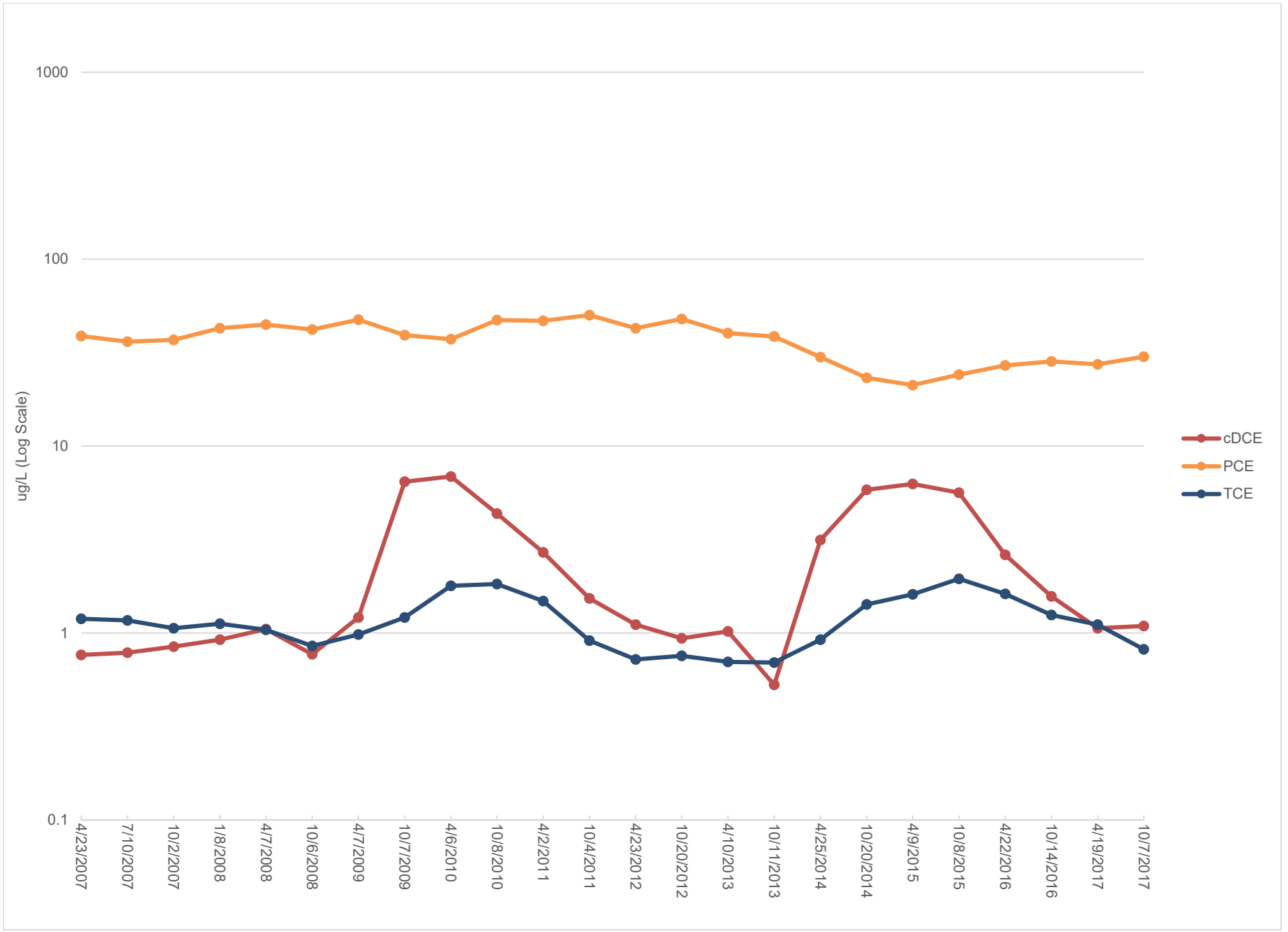
MW-204A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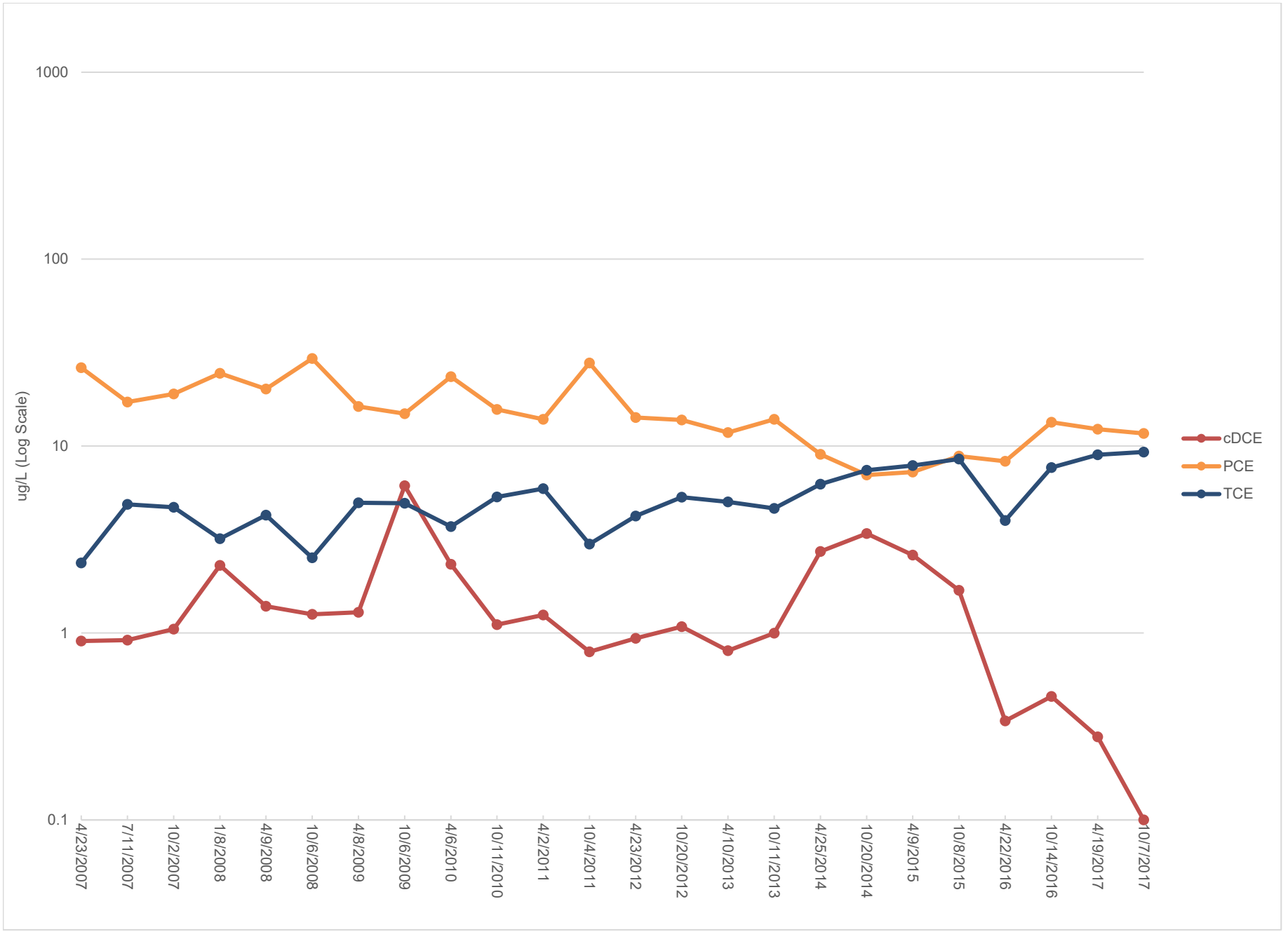
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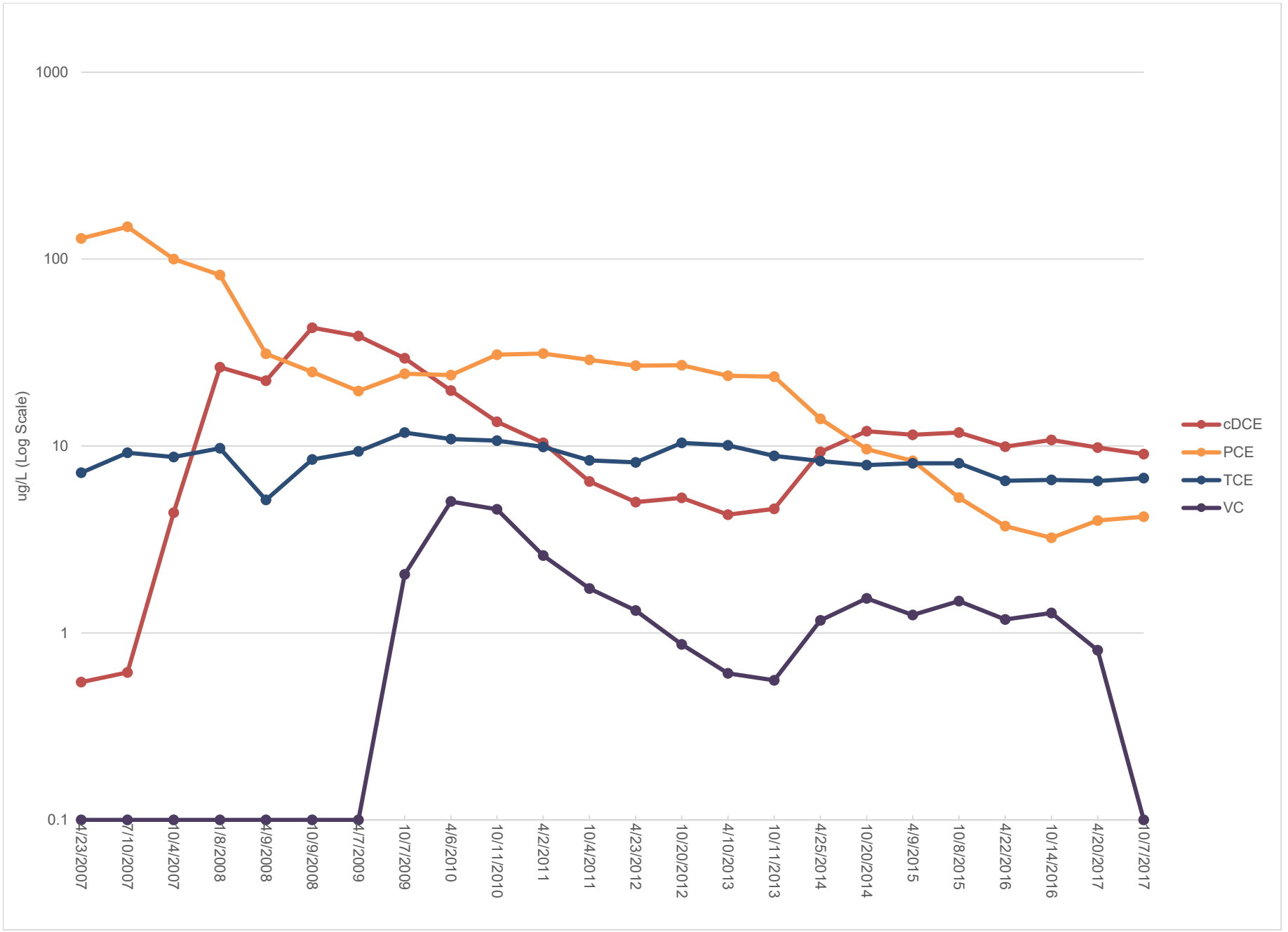
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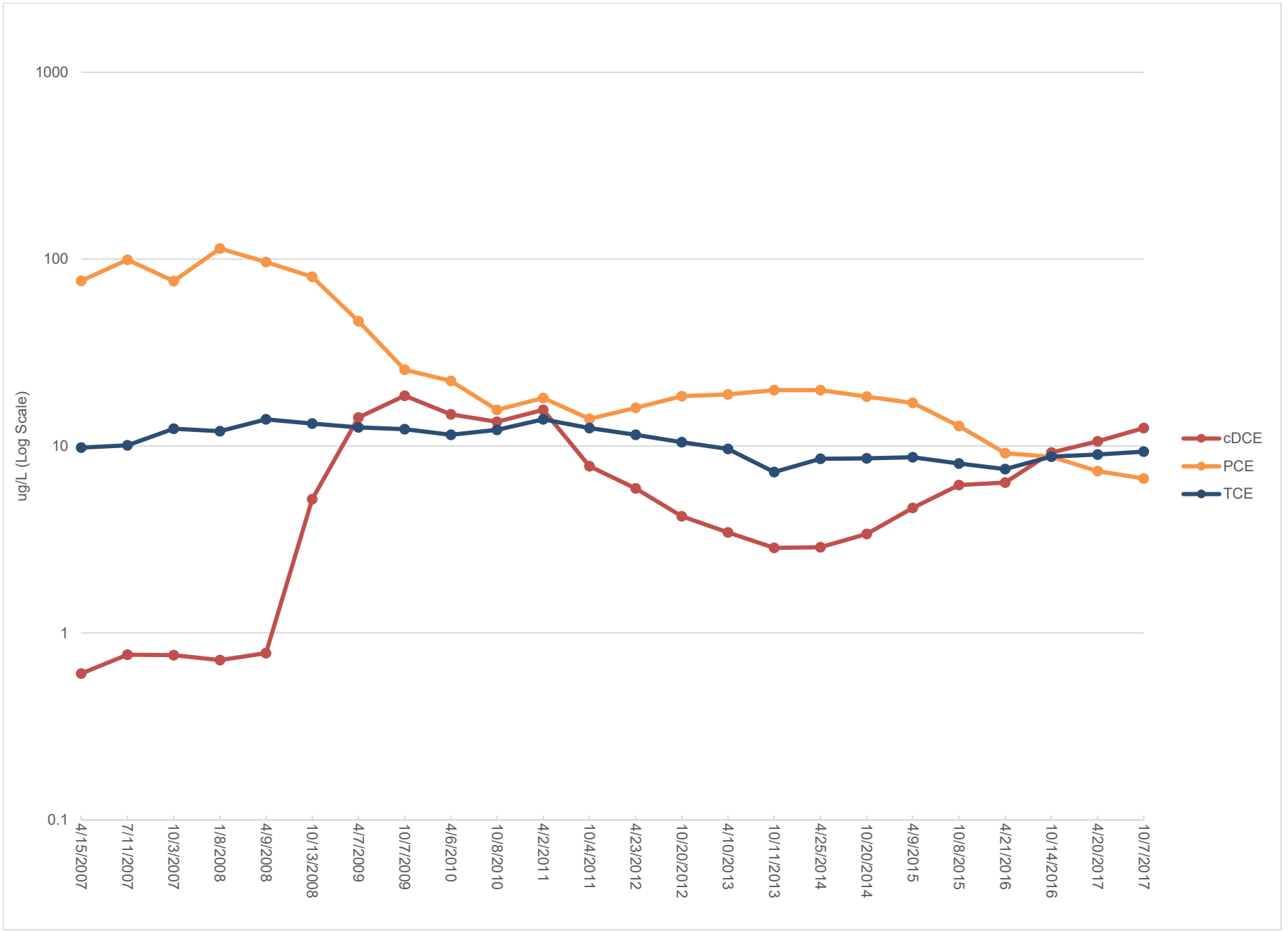
MW-206A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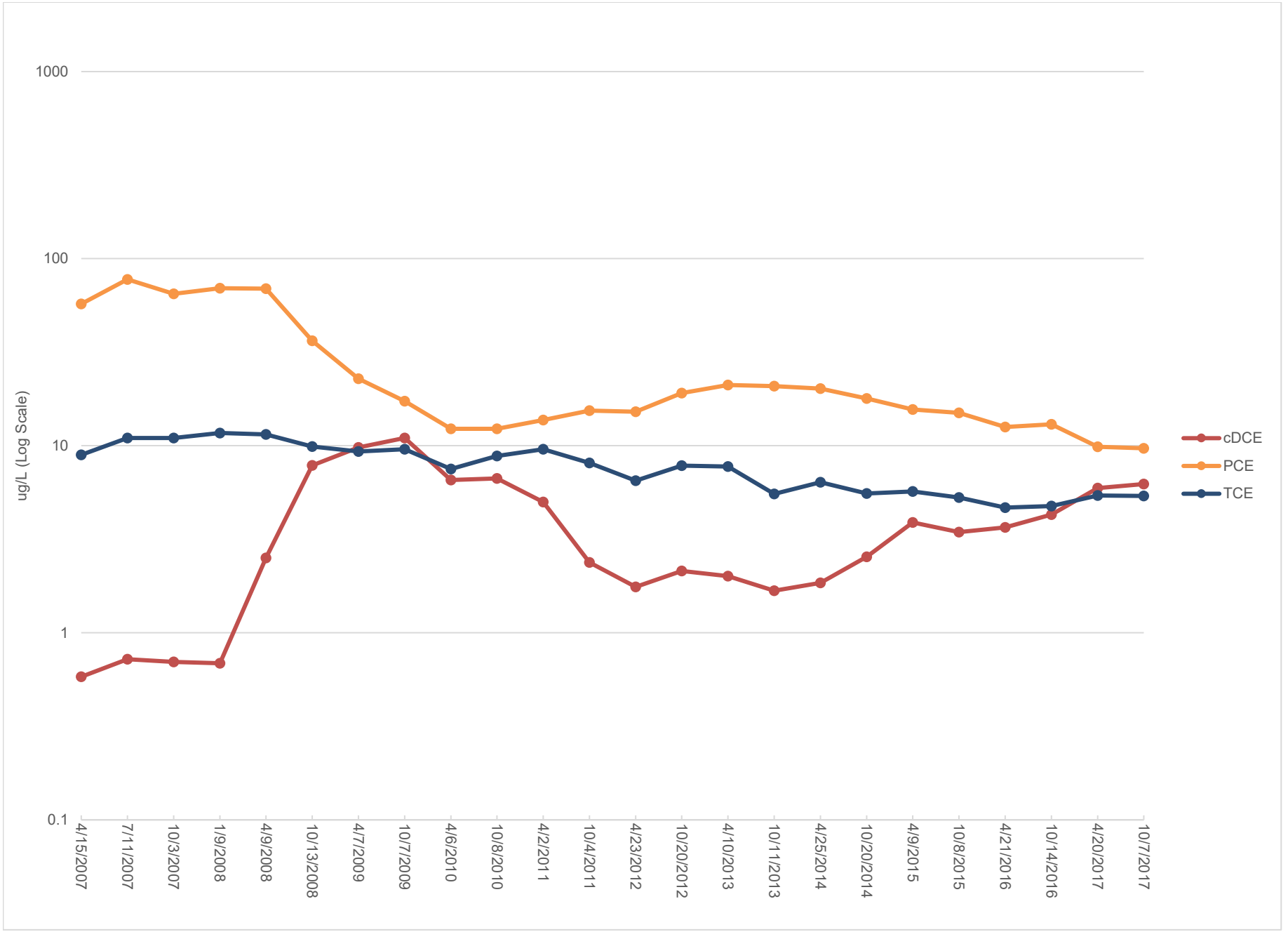
MW-206B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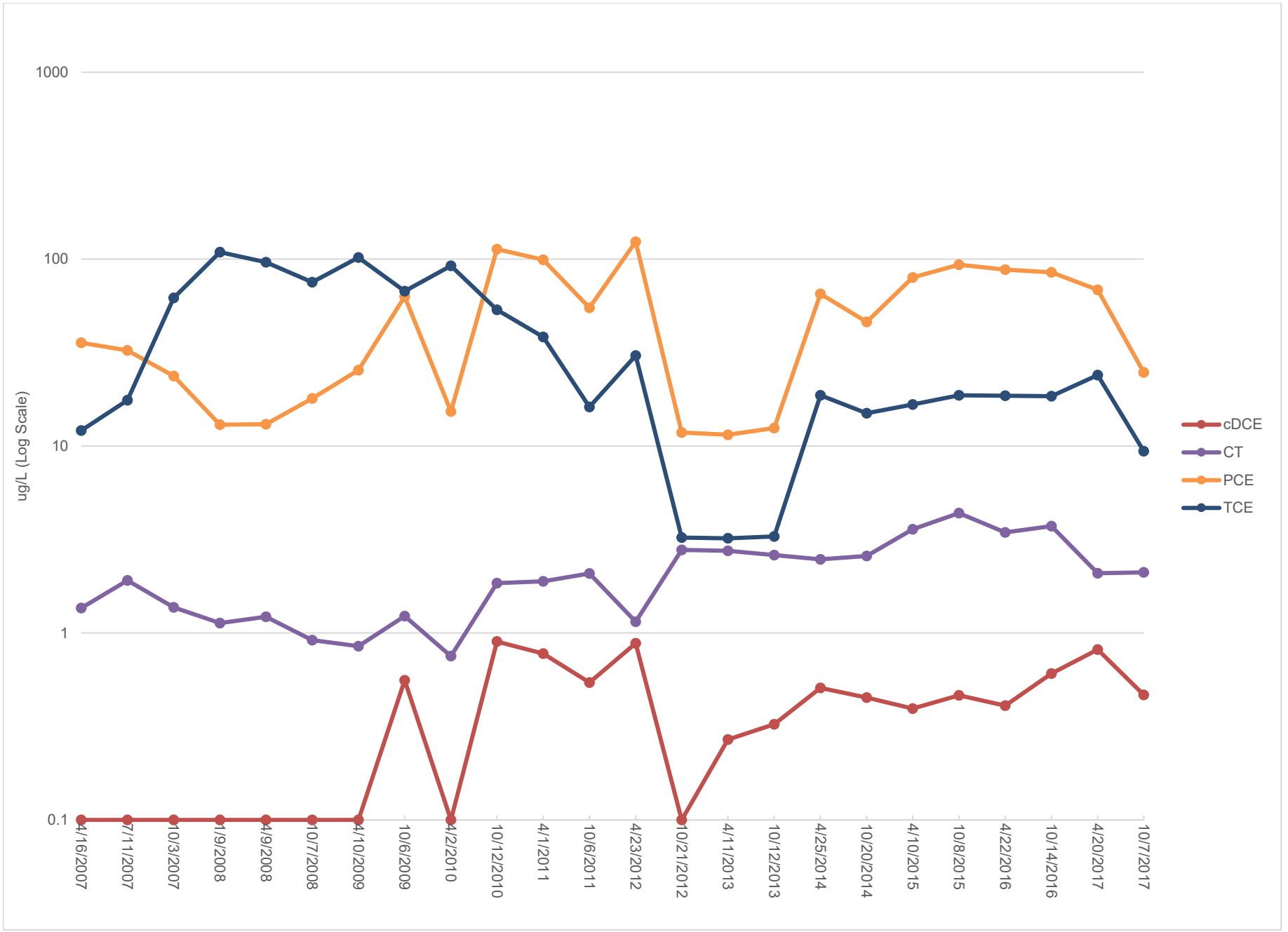
MW-207B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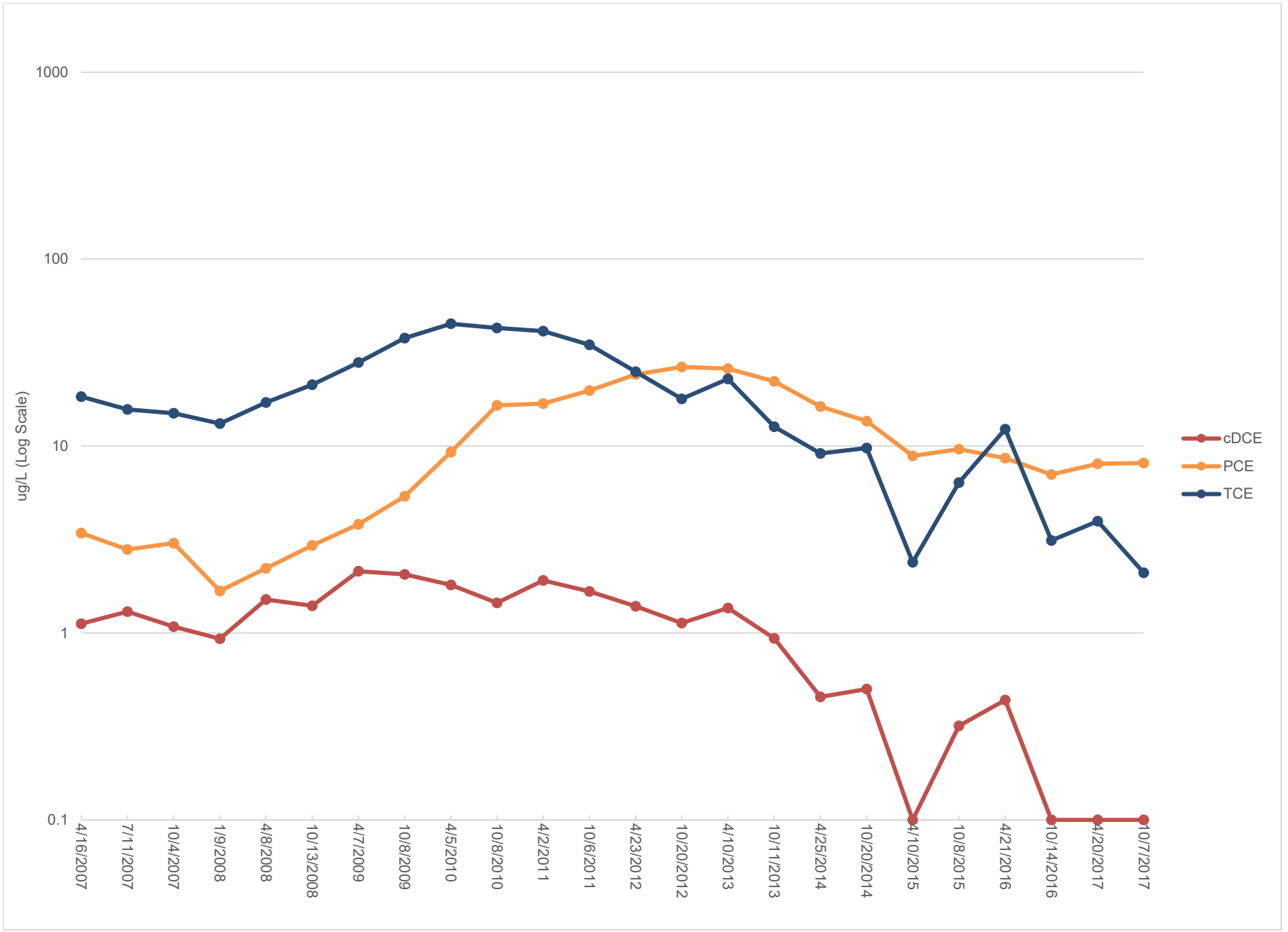
MW-208B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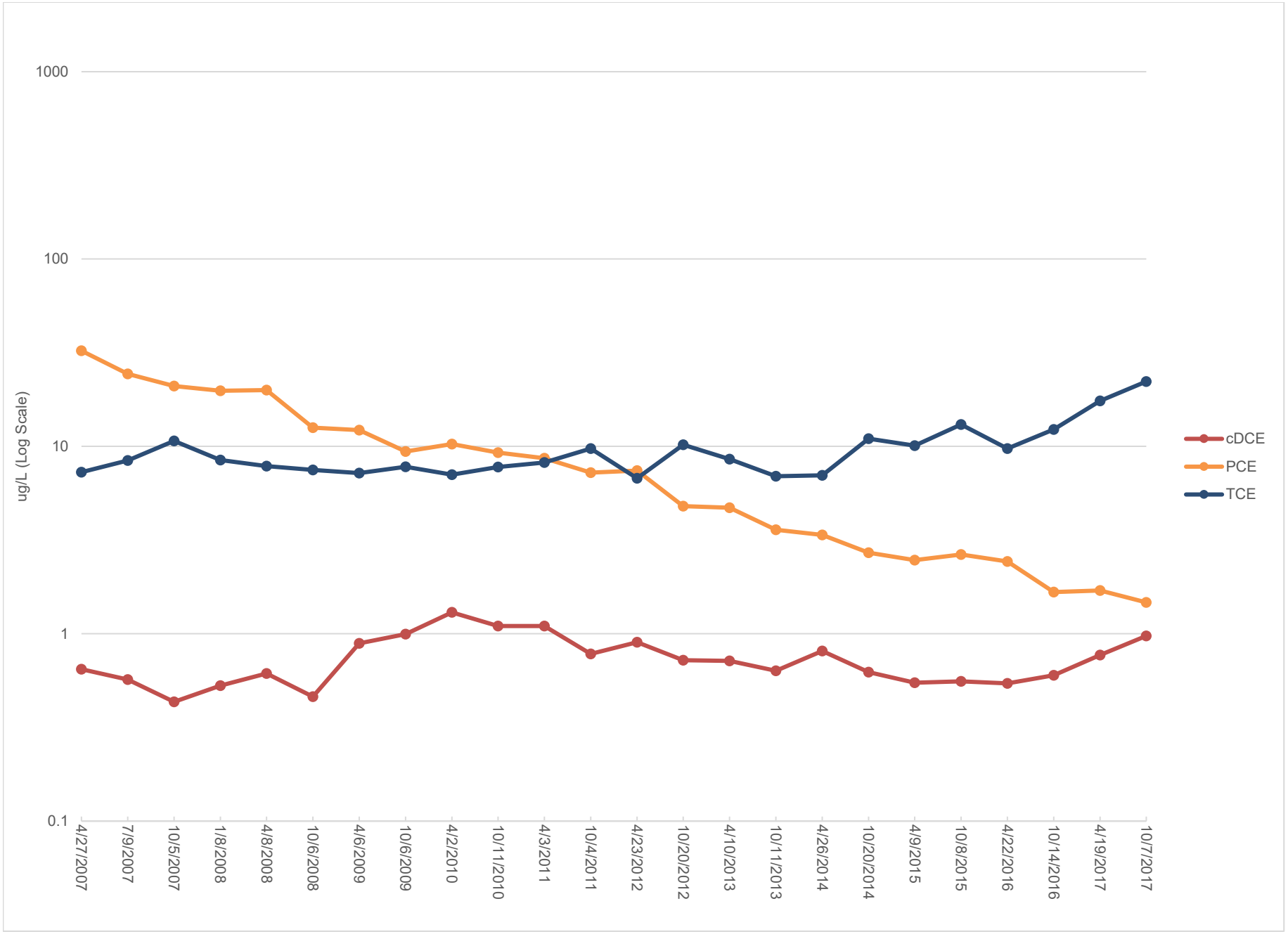
MW-210B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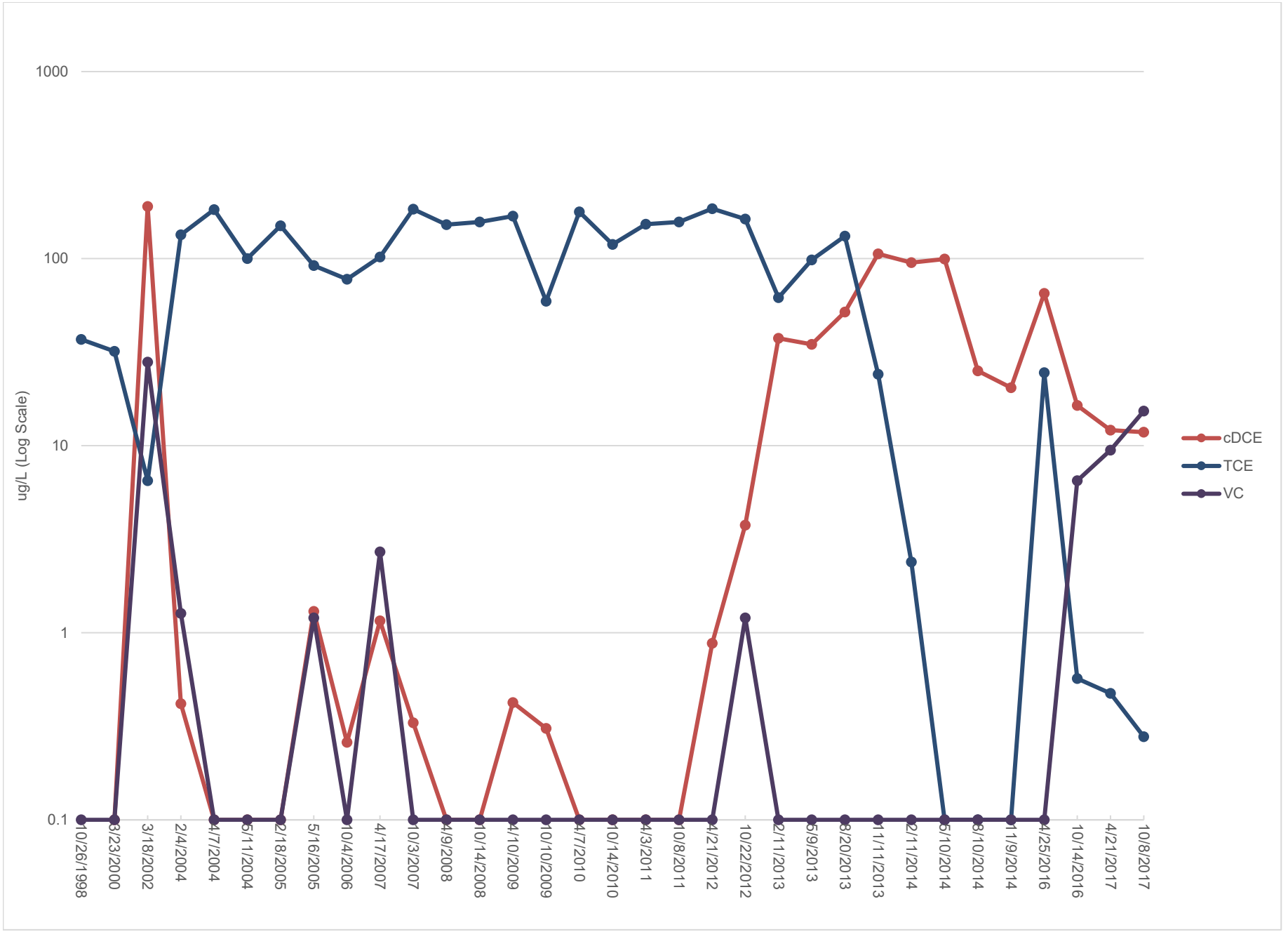
PCE
TCE

Appendix H-5
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer Building 835 Wells

MW-62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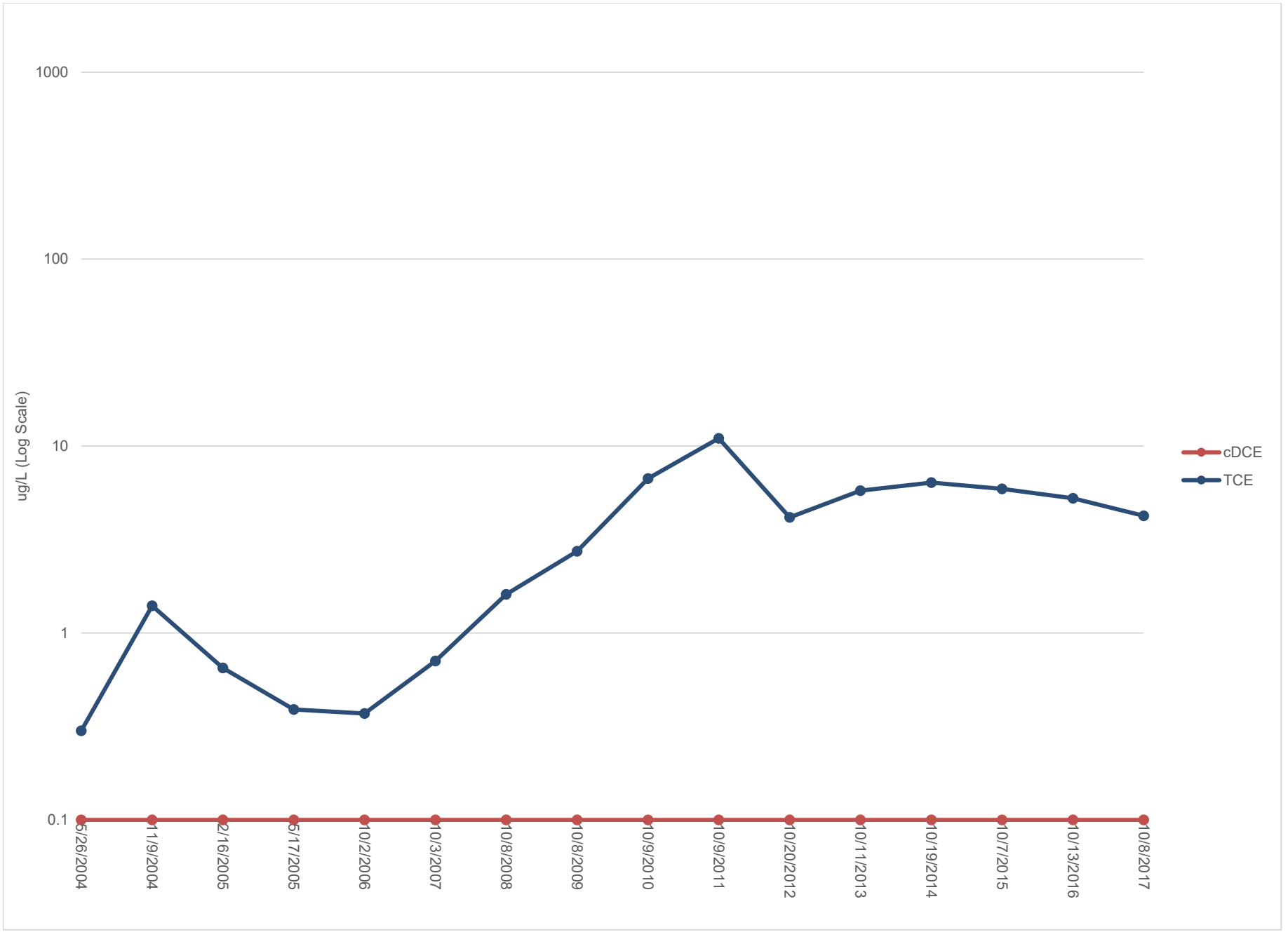
MW-142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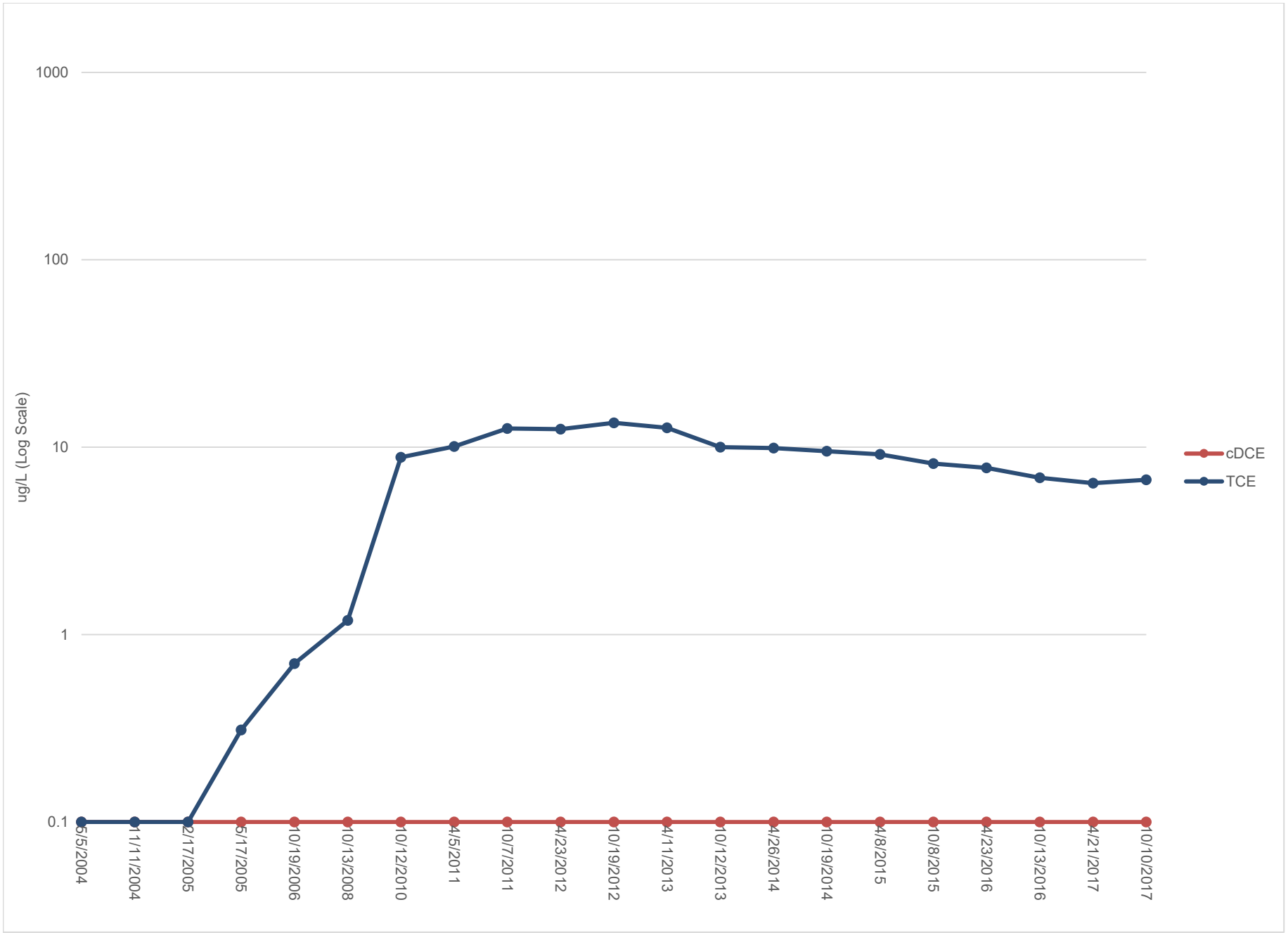
MW-143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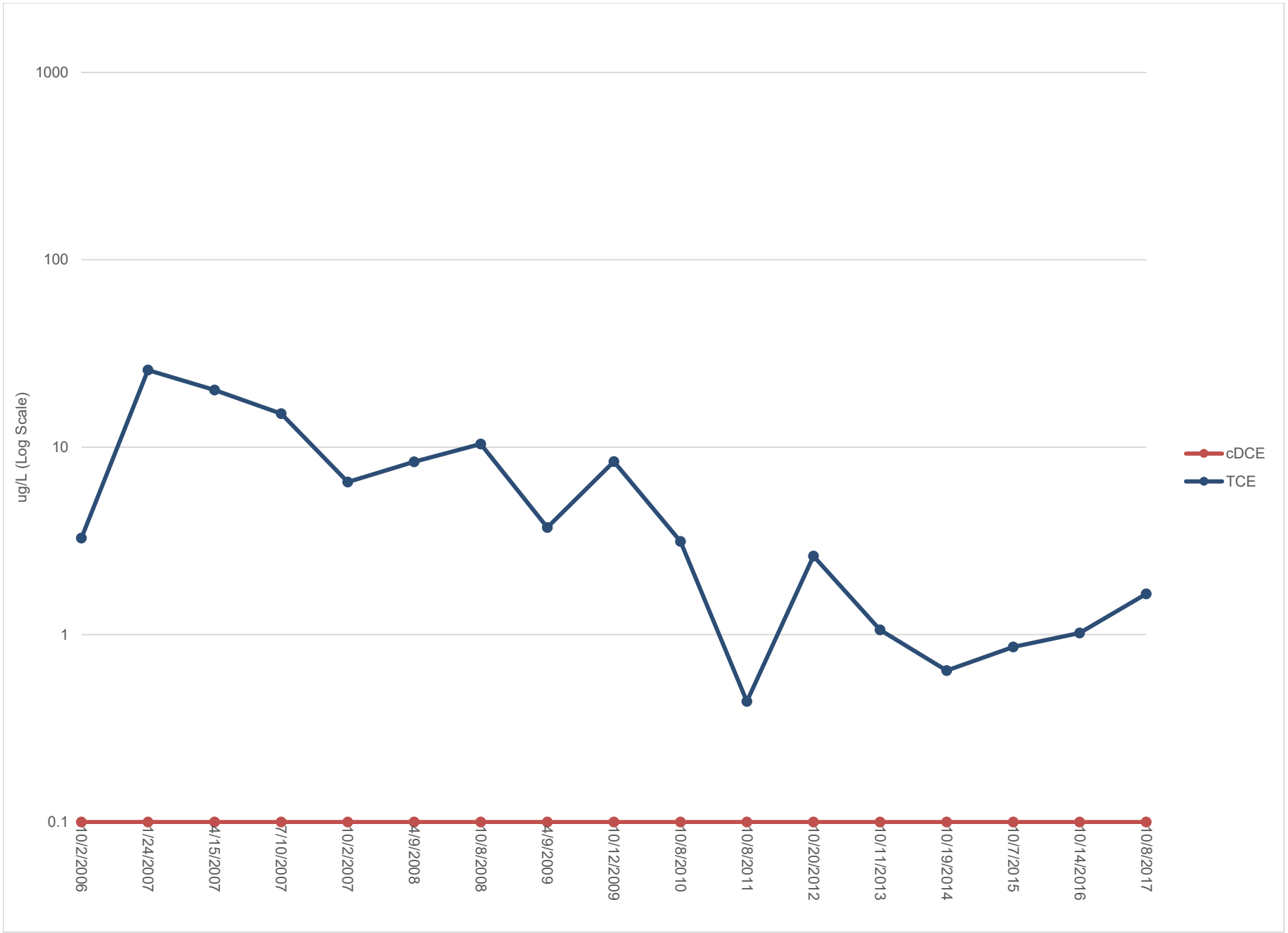
MW-198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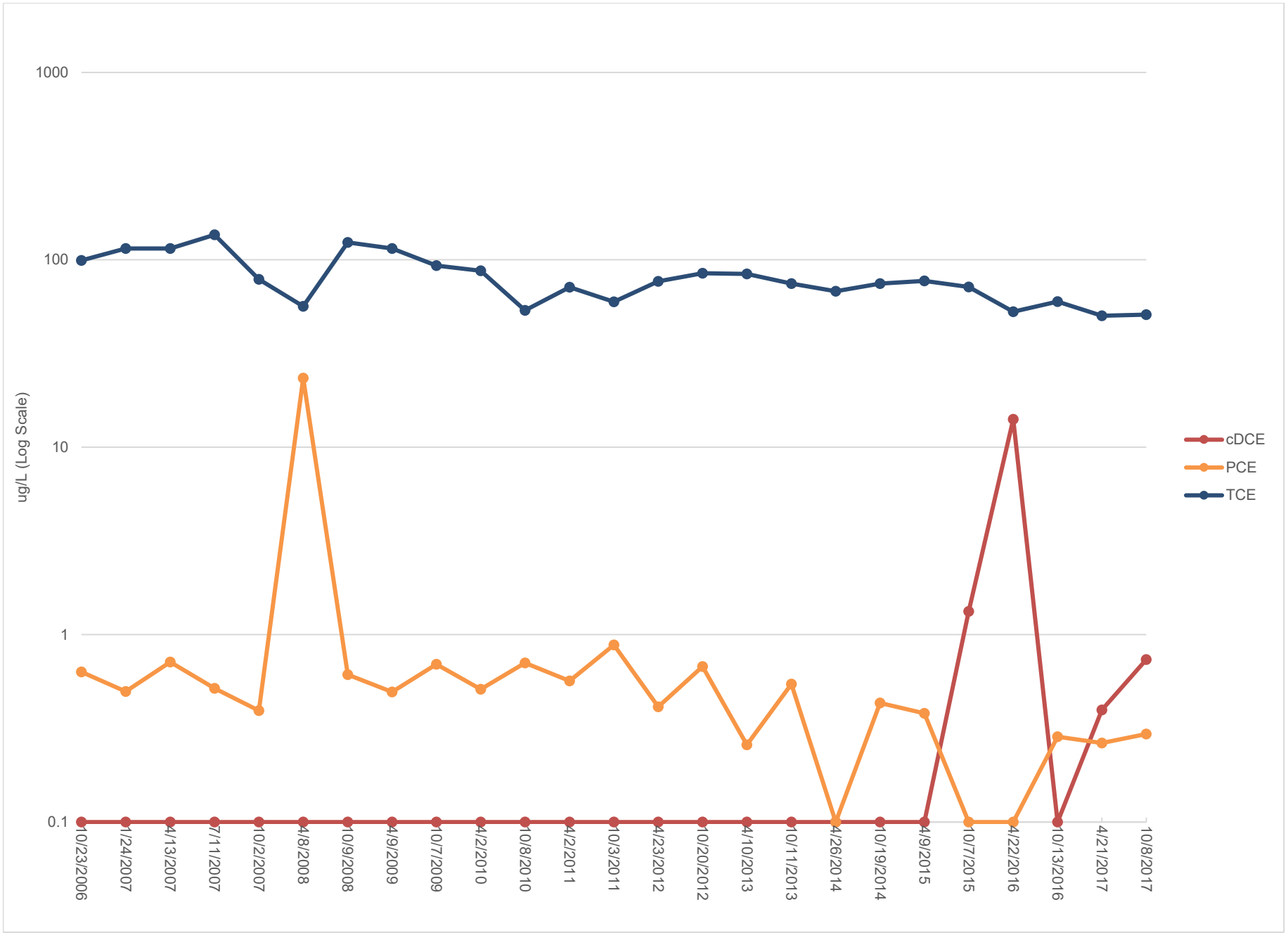
MW-199B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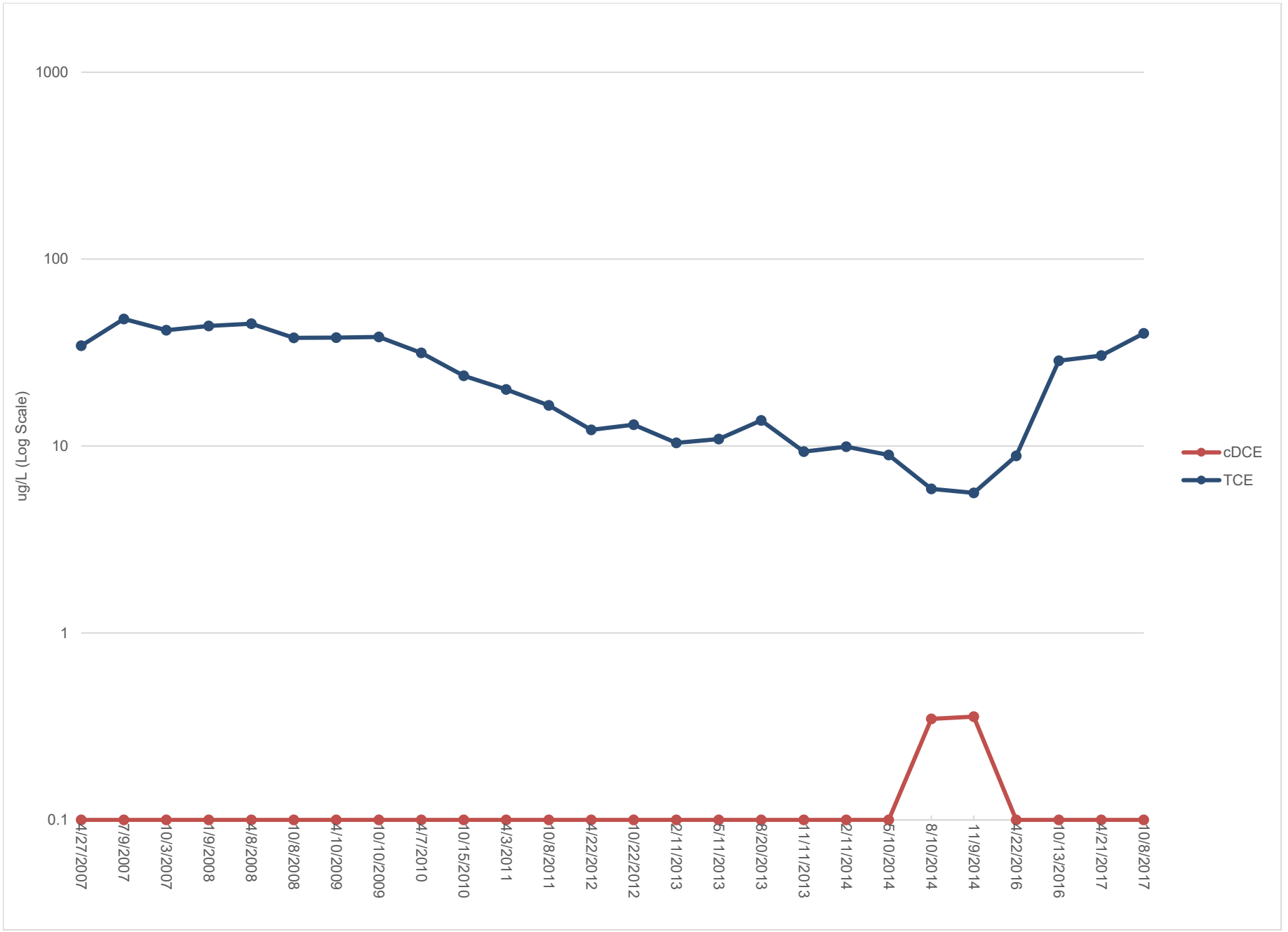
MW-212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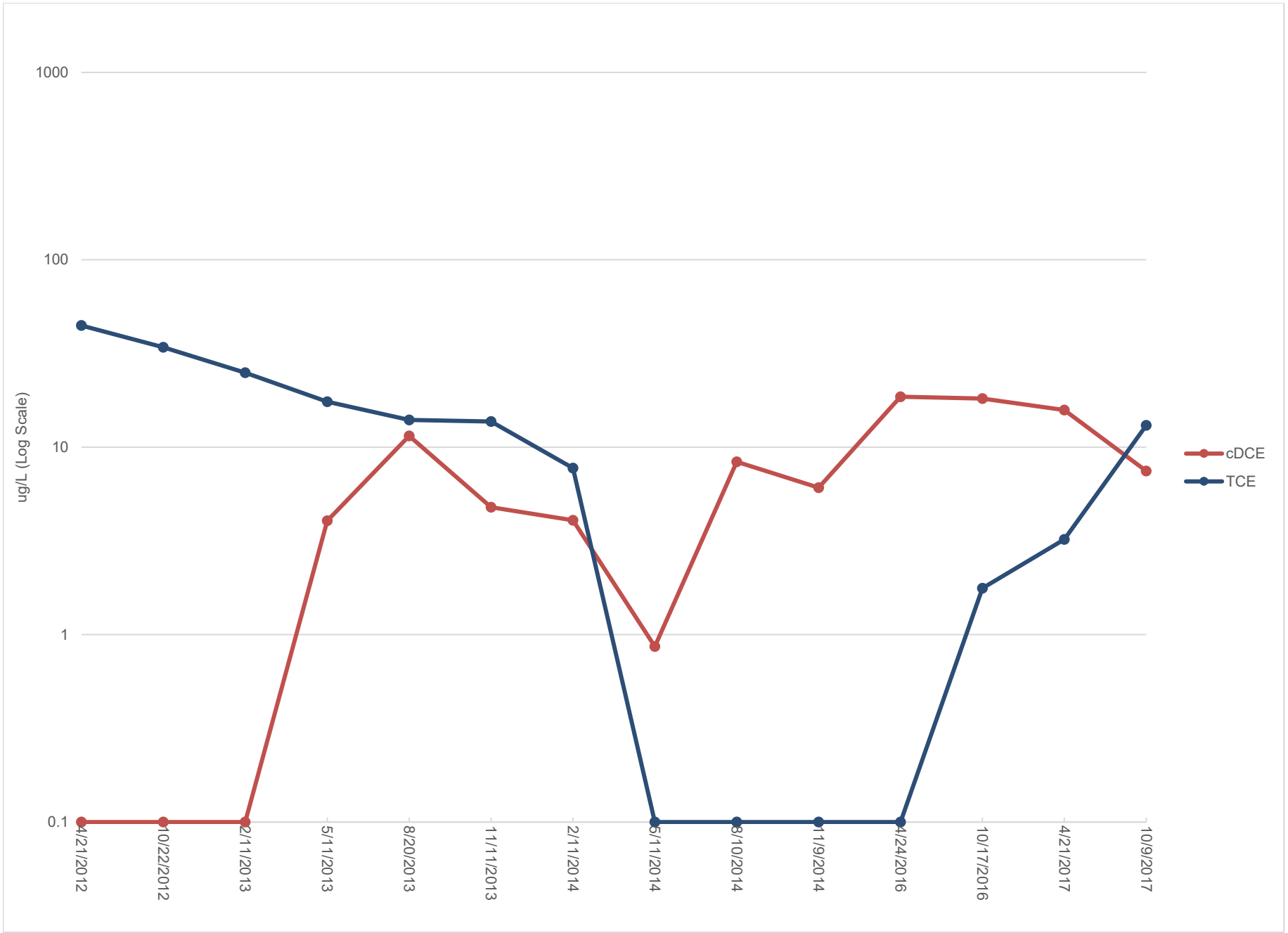
MW-213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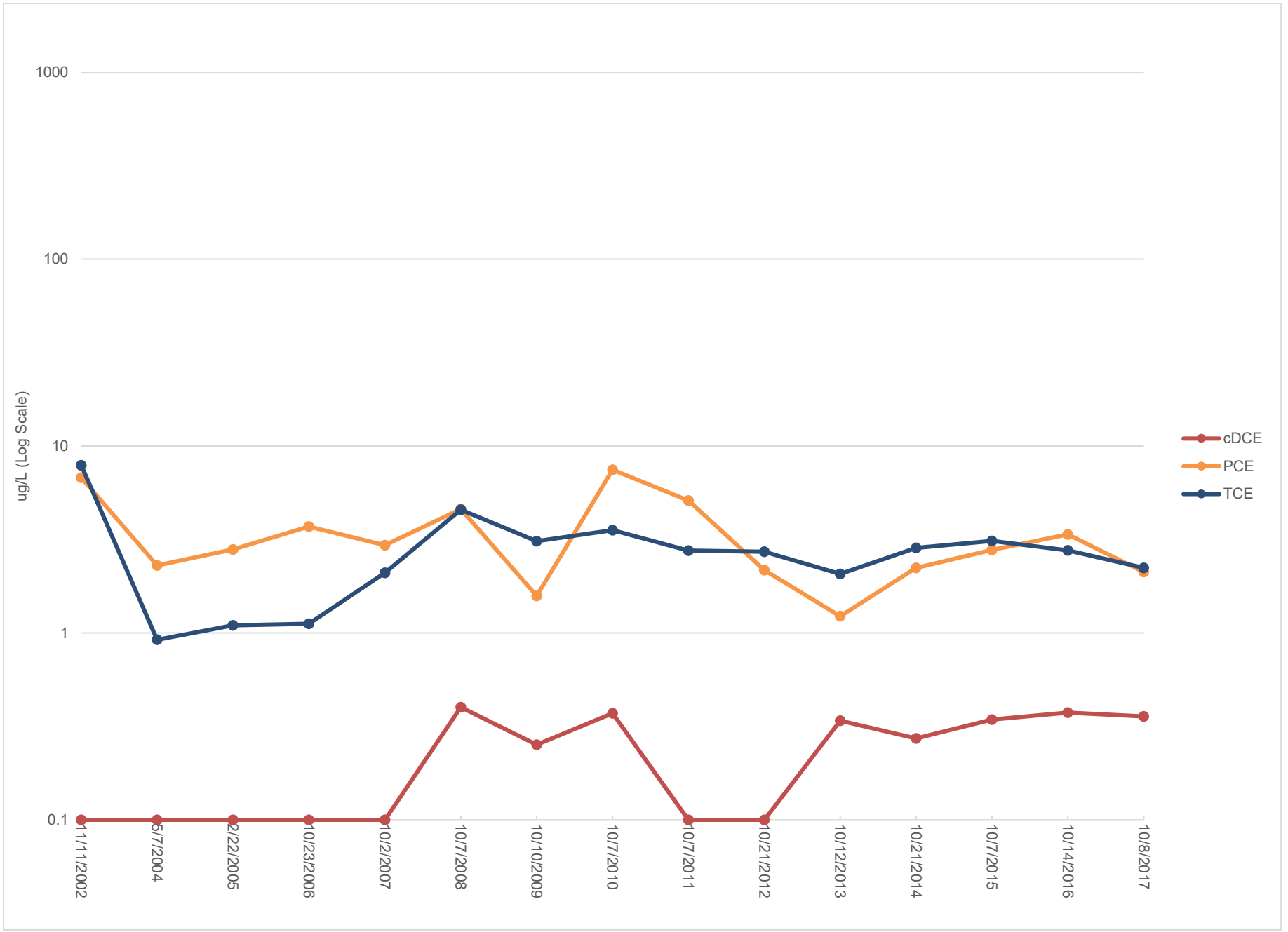
8/10/2014
11/9/2014
4/24/2016
10/17/2016
4/21/2017
10/9/2017
cDCE
TCE

Appendix H-6
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer North-Central Wells

MW-63B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10/10/2009
10/7/2010
10/7/2011
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10/7/2015
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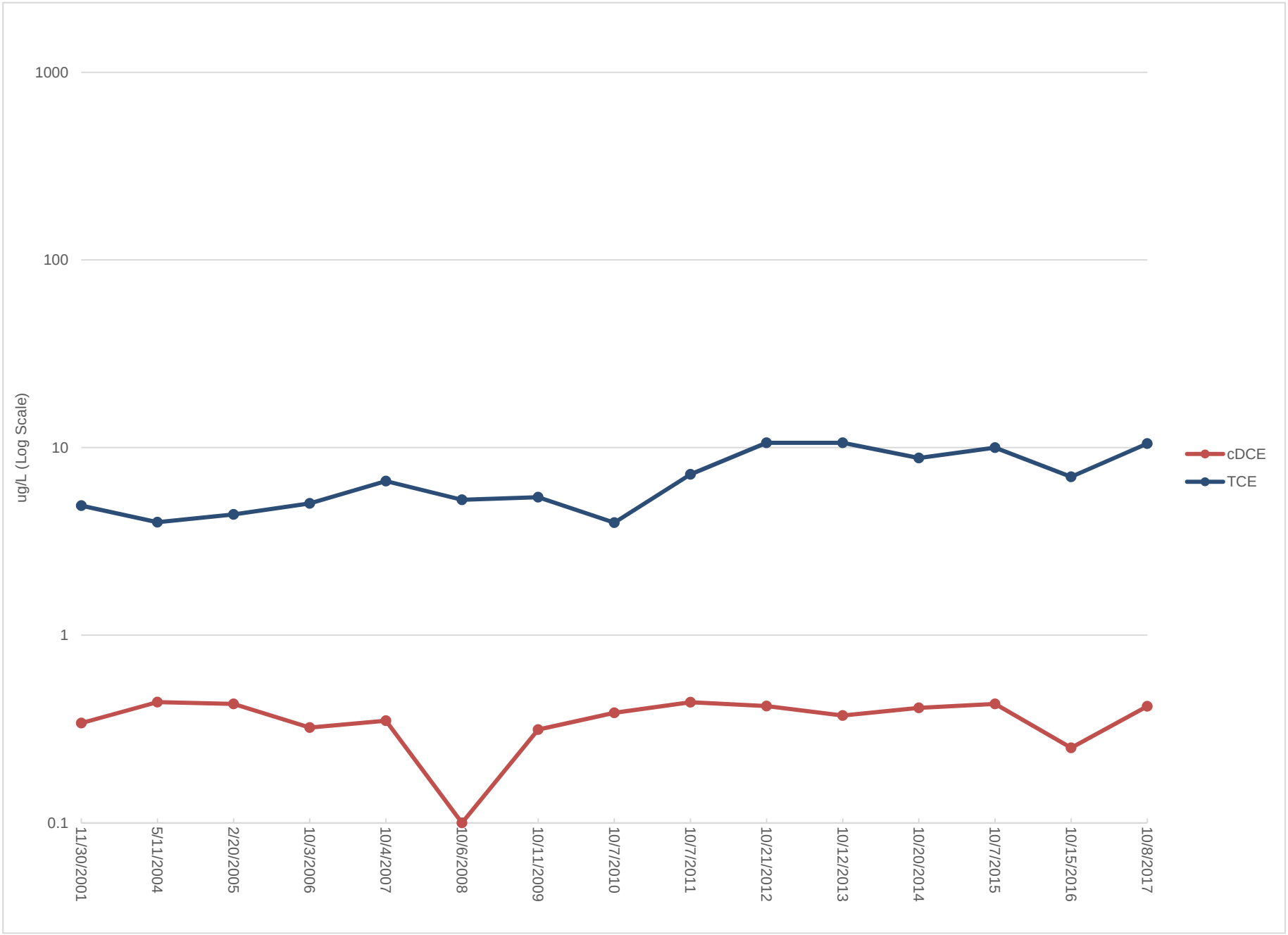
10/8/2017
cDCE
PCE
TCE

MW-103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10/7/2010
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10/7/2015
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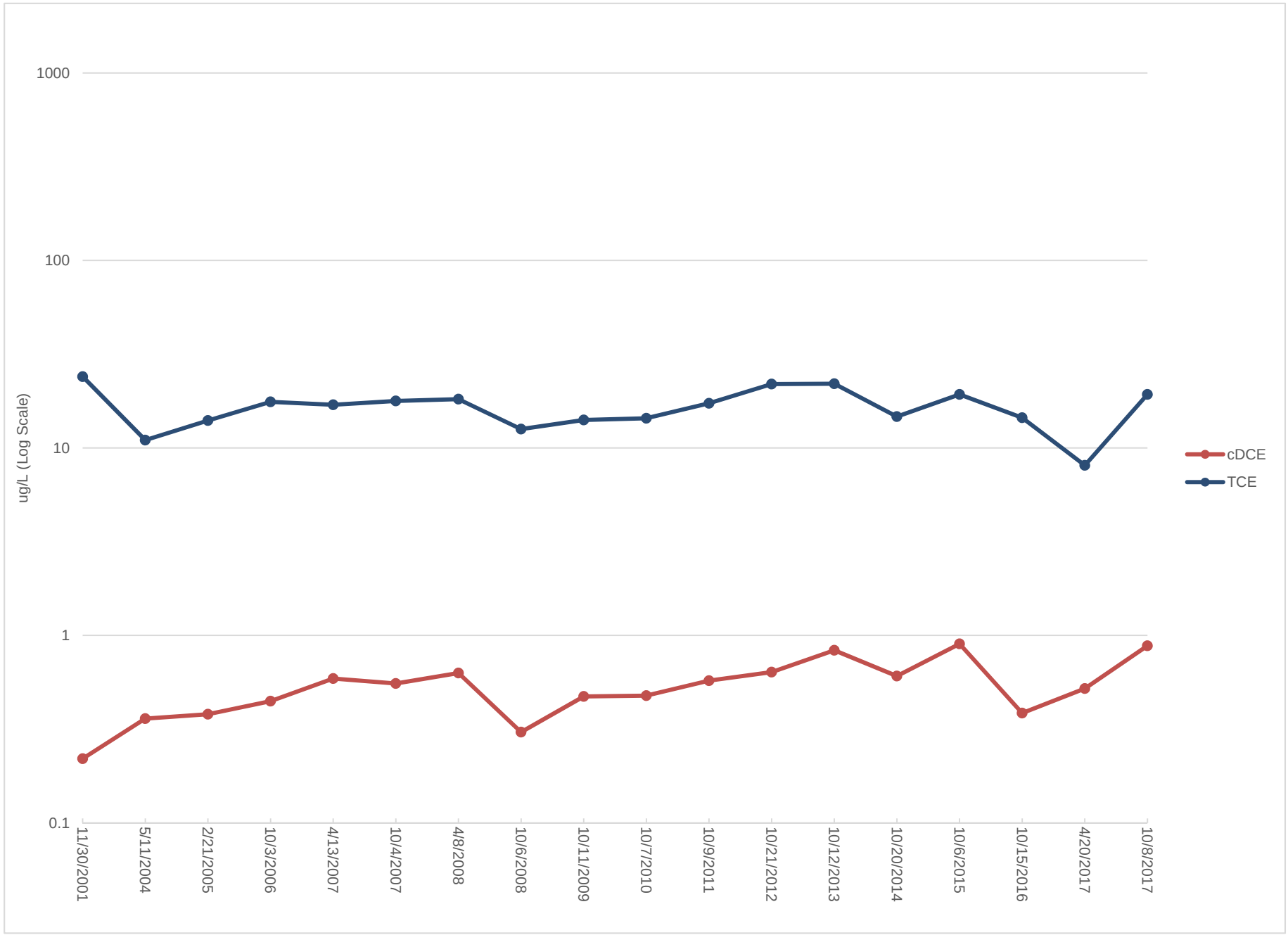
10/8/2017
cDCE
TCE

MW-104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10/9/2011
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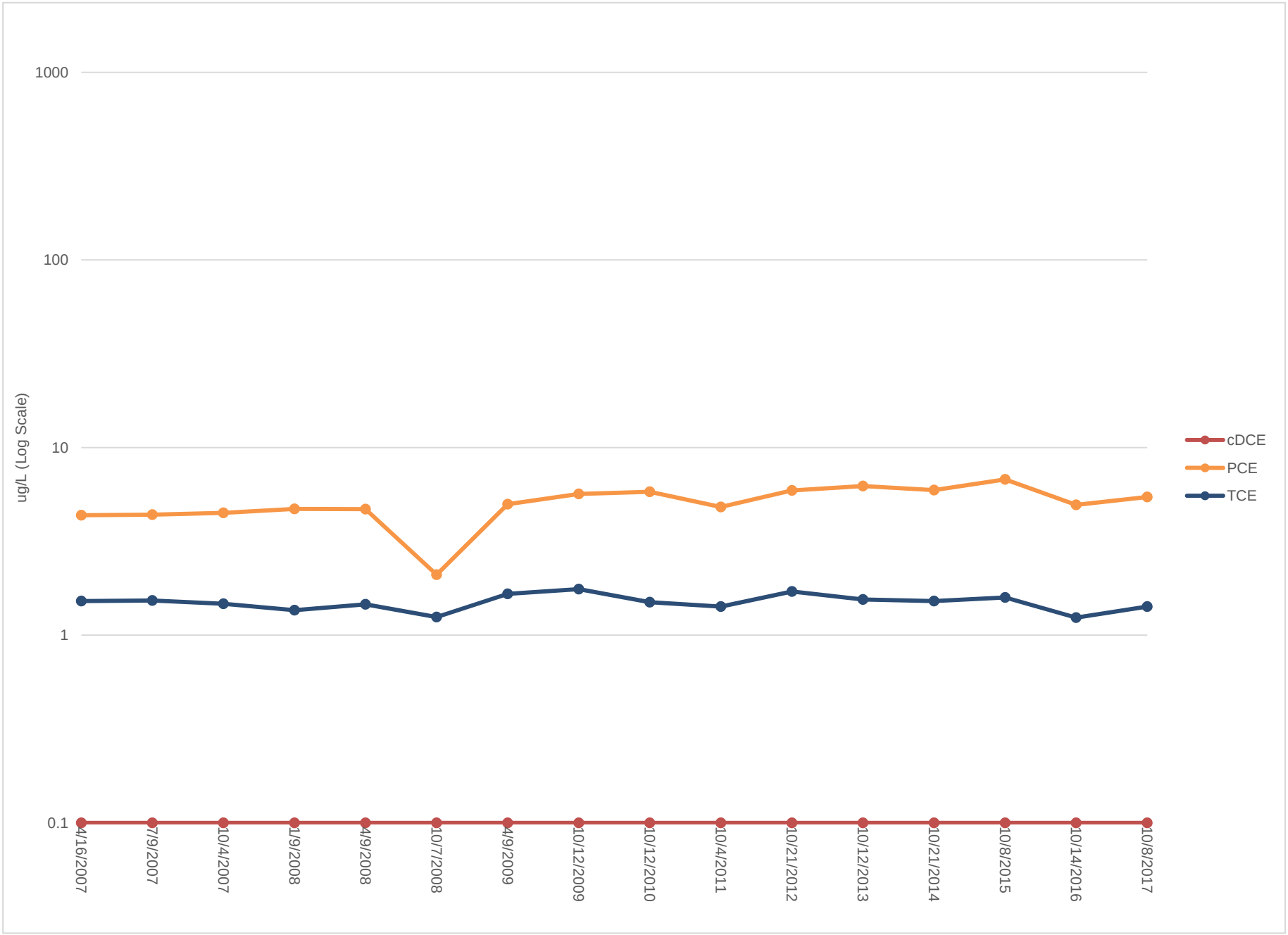
cDCE
TCE

MW-215B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ug/L (Log Scale)
cDCE
PCE
TCE
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10/4/2007
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10/7/2008
4/9/2009
10/12/2009
10/12/2010
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10/21/2012
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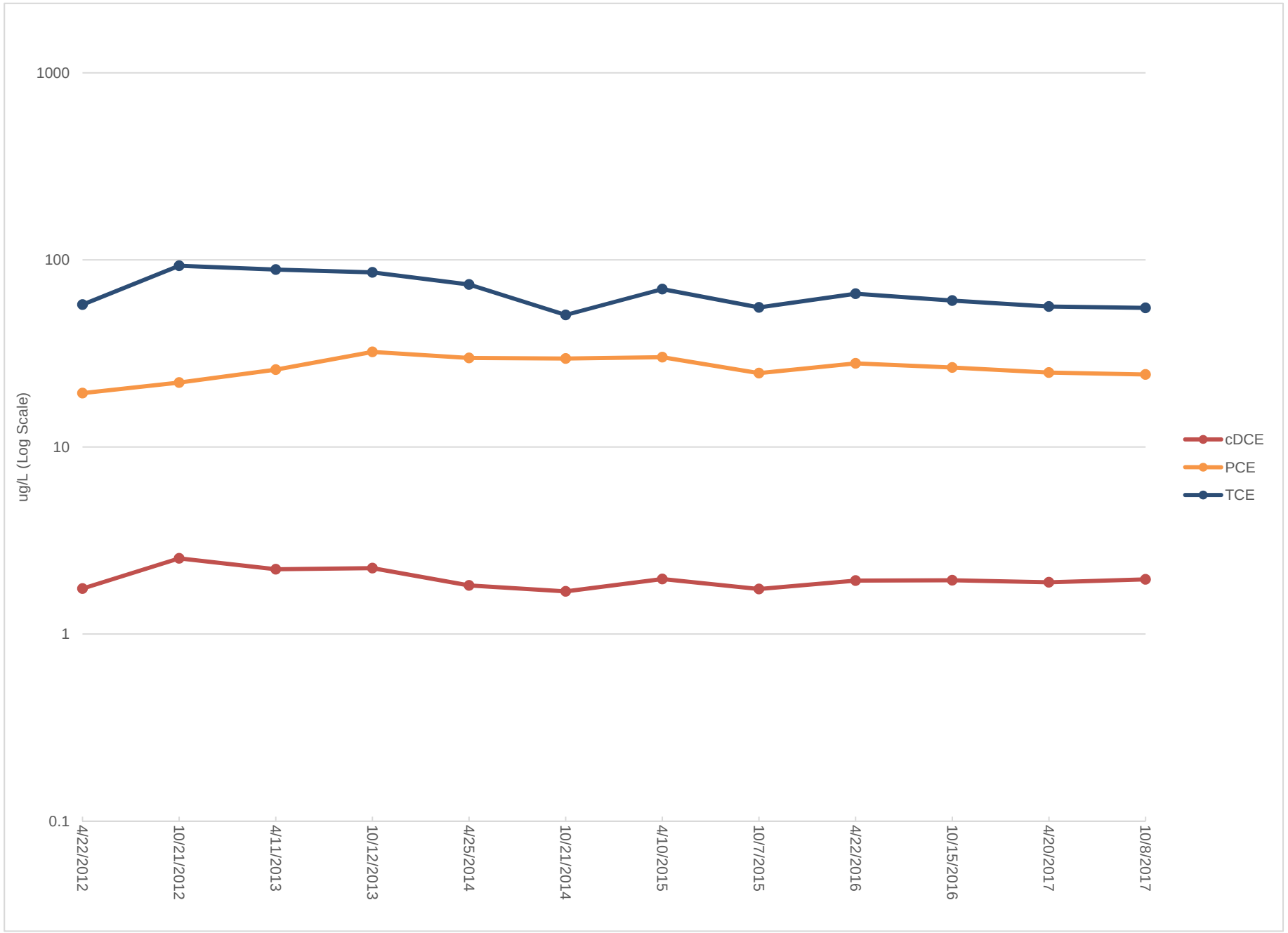
10/14/2016
10/8/2017

MW-258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4/25/2014
10/21/2014
4/10/2015
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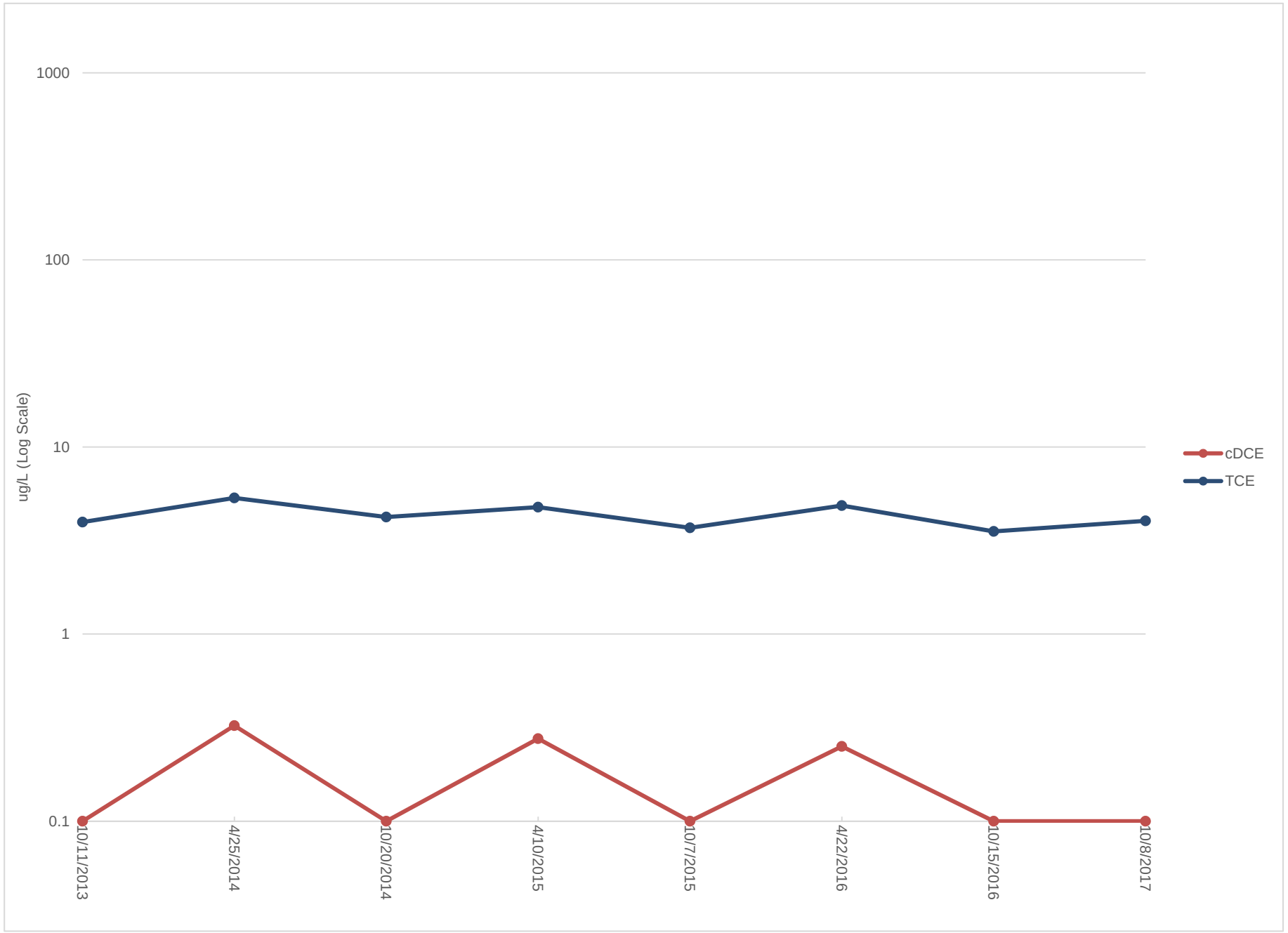
10/8/2017
cDCE
PCE
TCE

MW-260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0.1
ug/L (Log Scale)
cDCE
TCE
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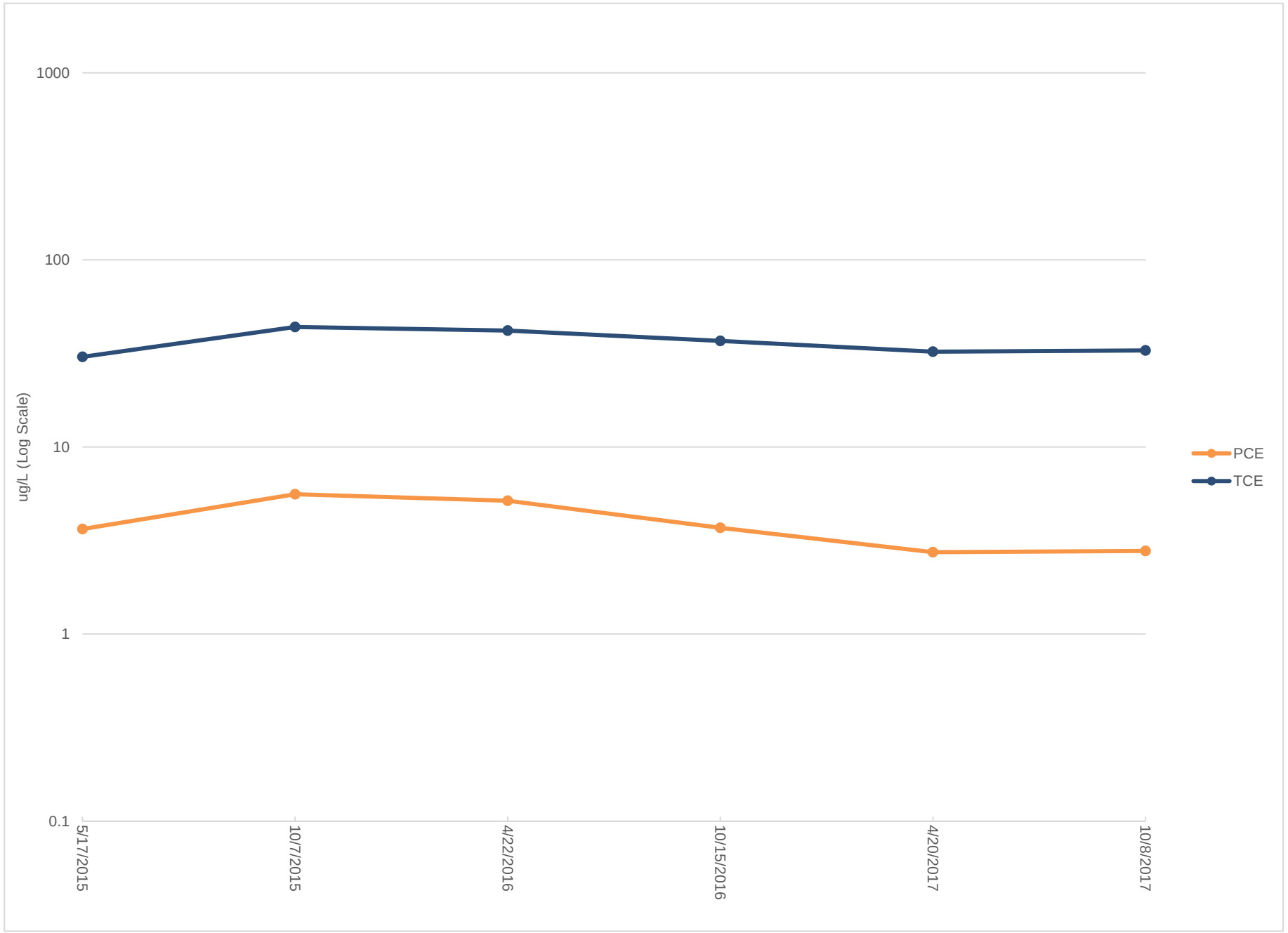
10/8/2017

MW-263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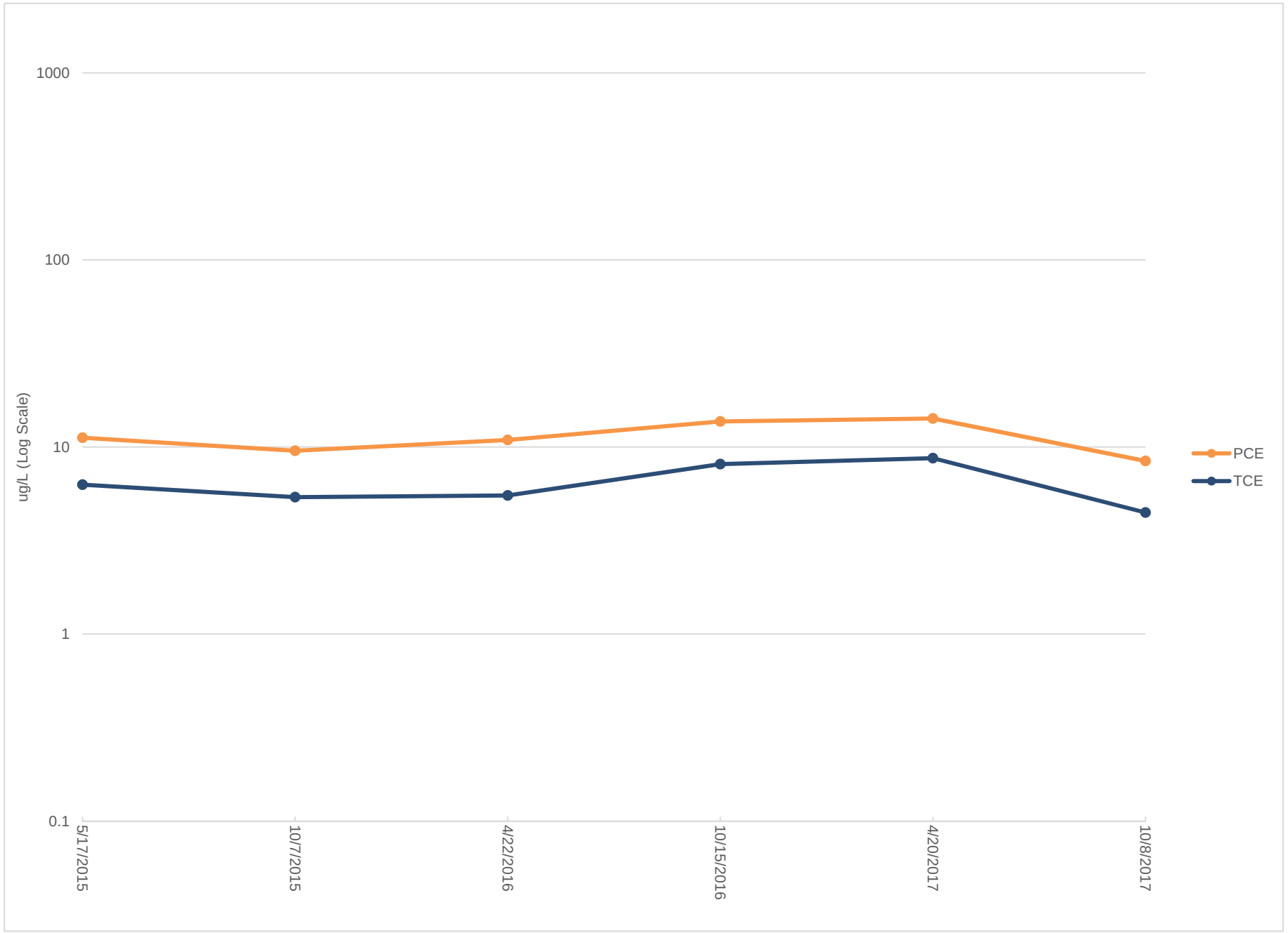
10/8/2017
PCE
TCE

MW-265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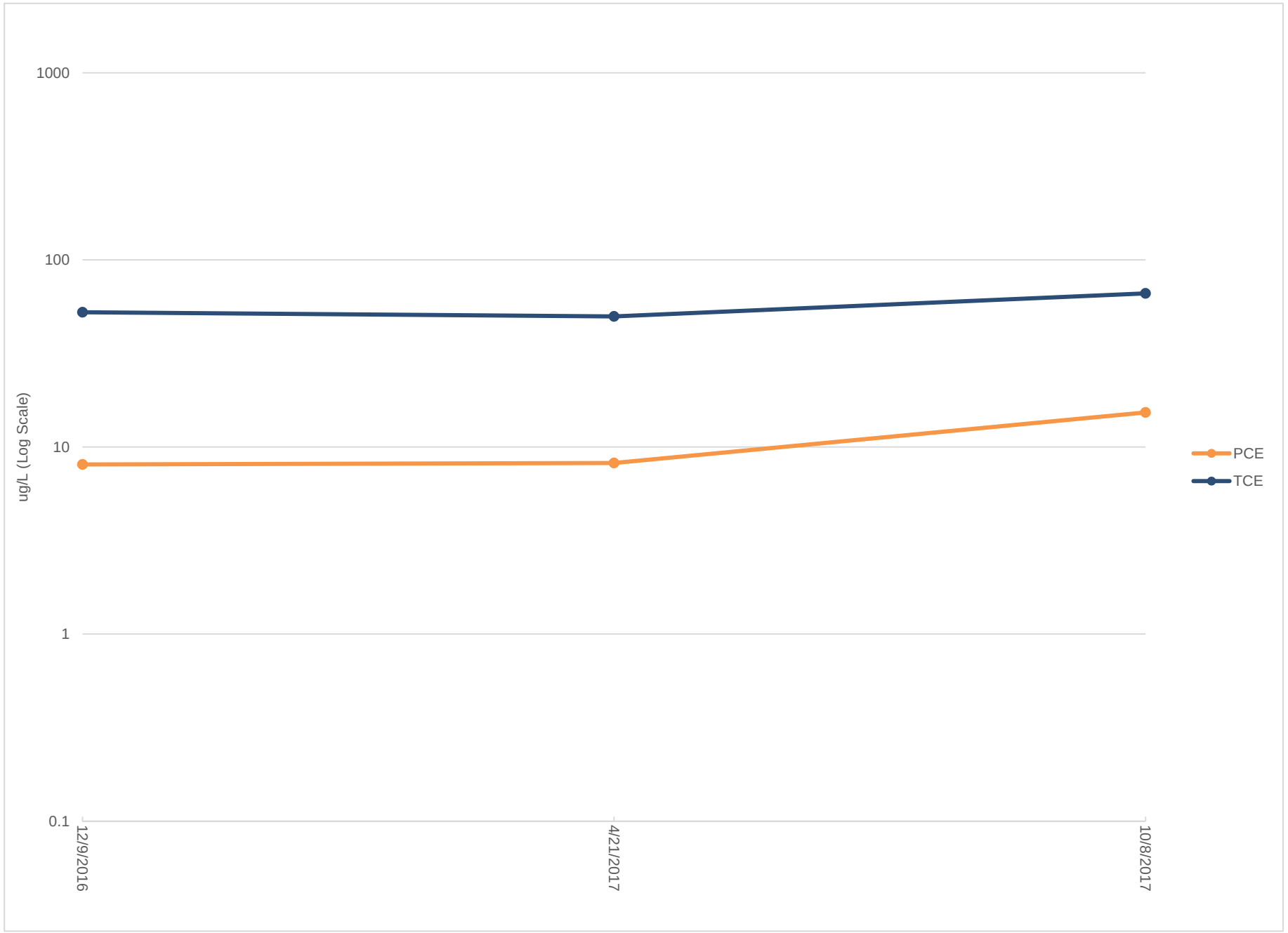
10/15/2016
4/20/2017
10/8/2017
PCE
TCE

MW-281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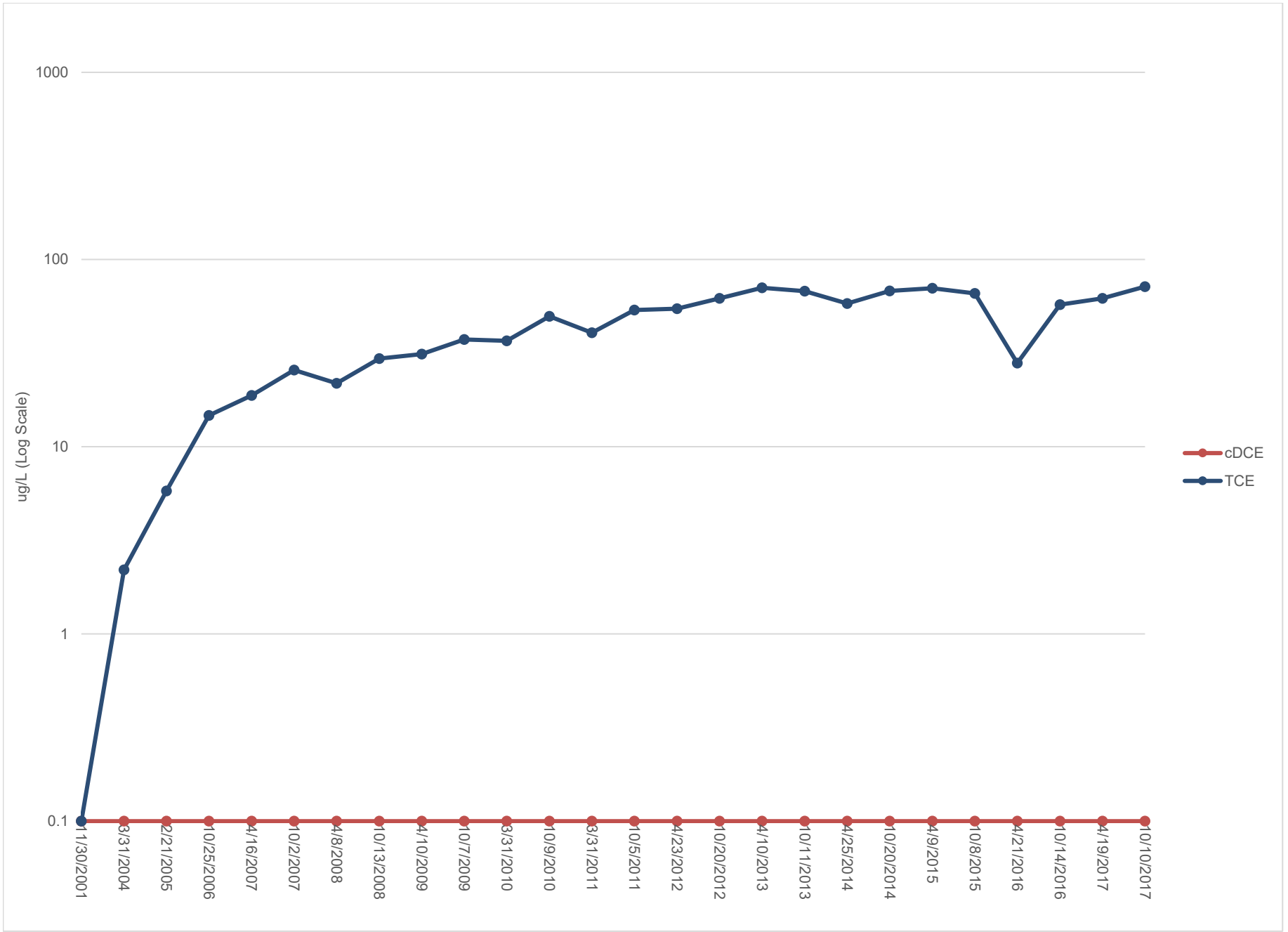
1
0.1
ug/L (Log Scale)
12/9/2016
4/21/2017
10/8/2017
PCE
TCE

Appendix H-7
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer South-Central Wells

MW-97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4/10/2013
10/11/2013
4/25/2014
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4/9/2015
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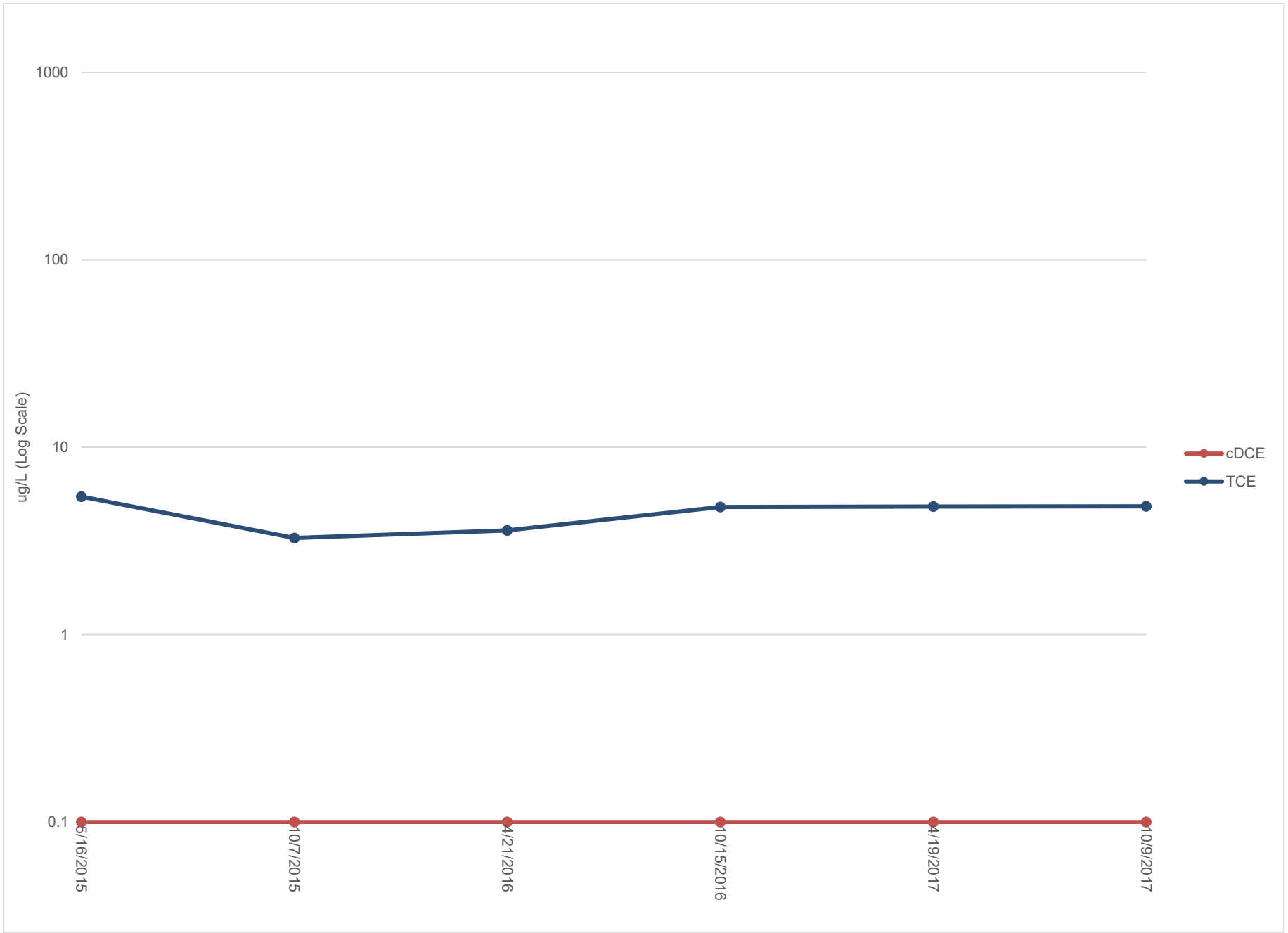
4/21/2016
10/14/2016
4/19/2017
10/10/2017
cDCE
TCE

MW-271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0.1
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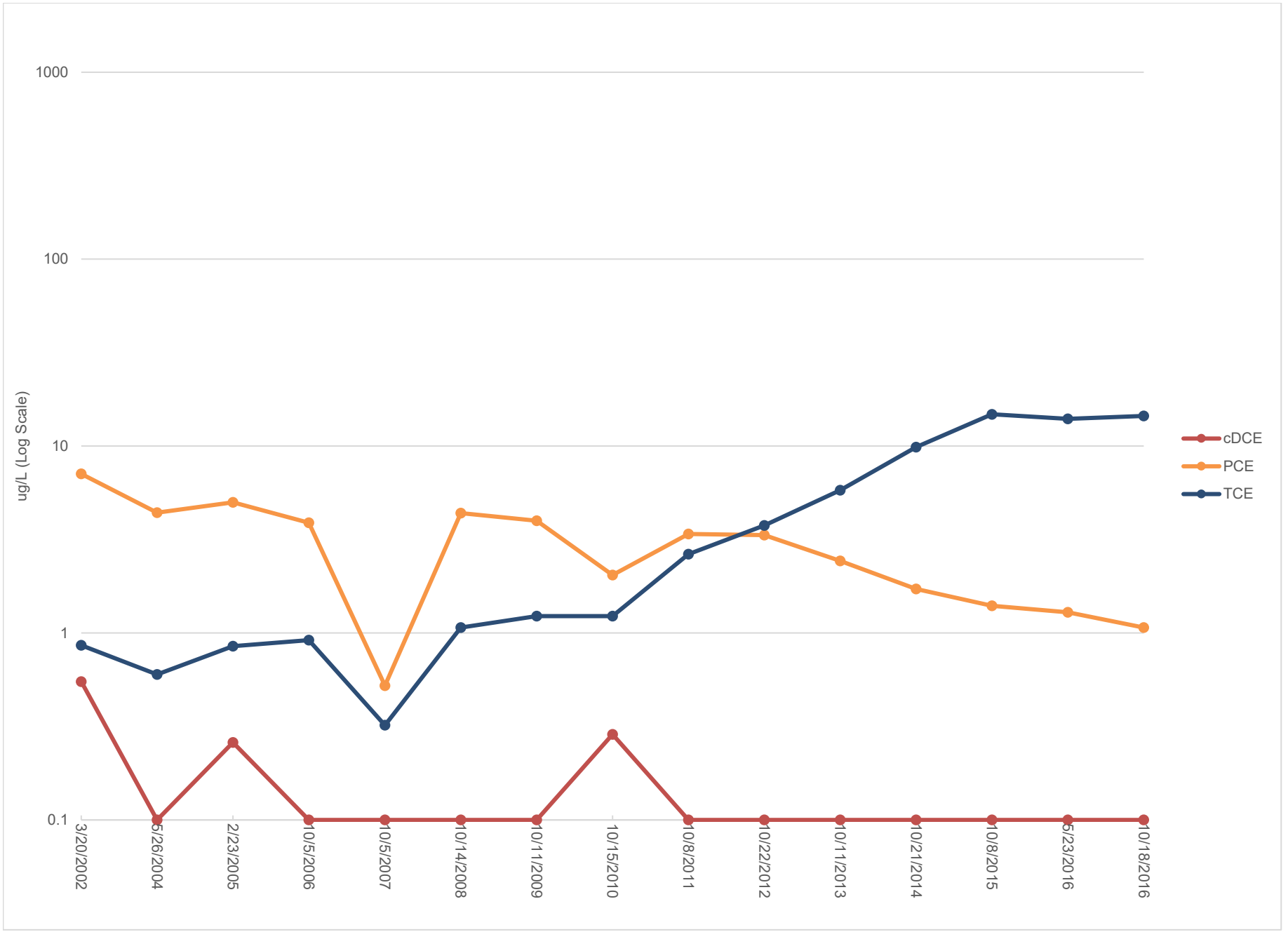
4/19/2017
10/9/2017
cDCE
TCE

PZ-03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10/15/2010
10/8/2011
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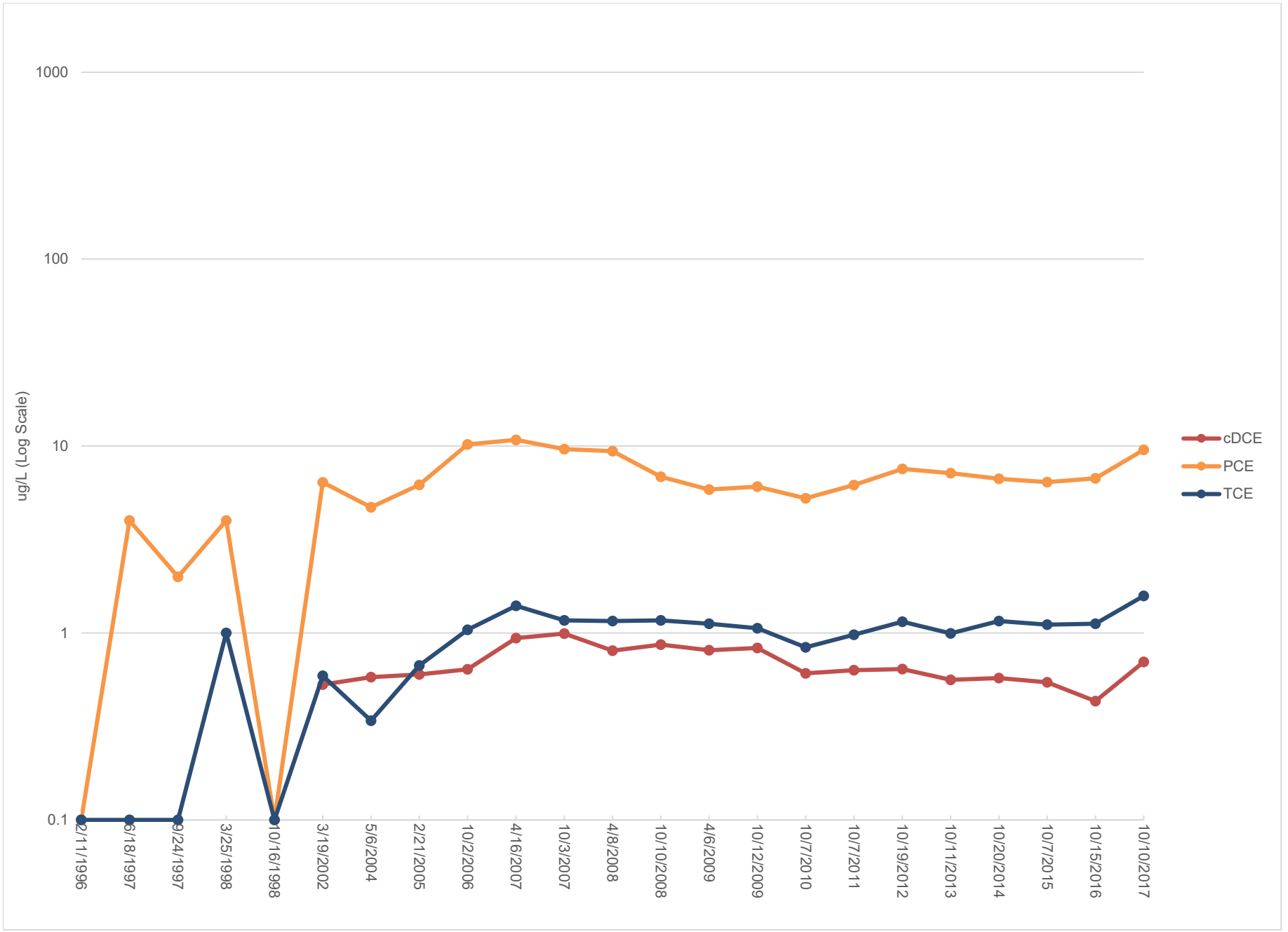
10/11/2013
10/21/2014
10/8/2015
5/23/2016
10/18/2016
cDCE
PCE
TCE

Appendix H-8
CVOC Time-Trend Plots – Main Installation

Fluvial Aquifer SE Wells

MW-52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0.1
ug/L (Log Scale)
cDCE
PCE
TCE
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4/8/2008
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4/6/2009
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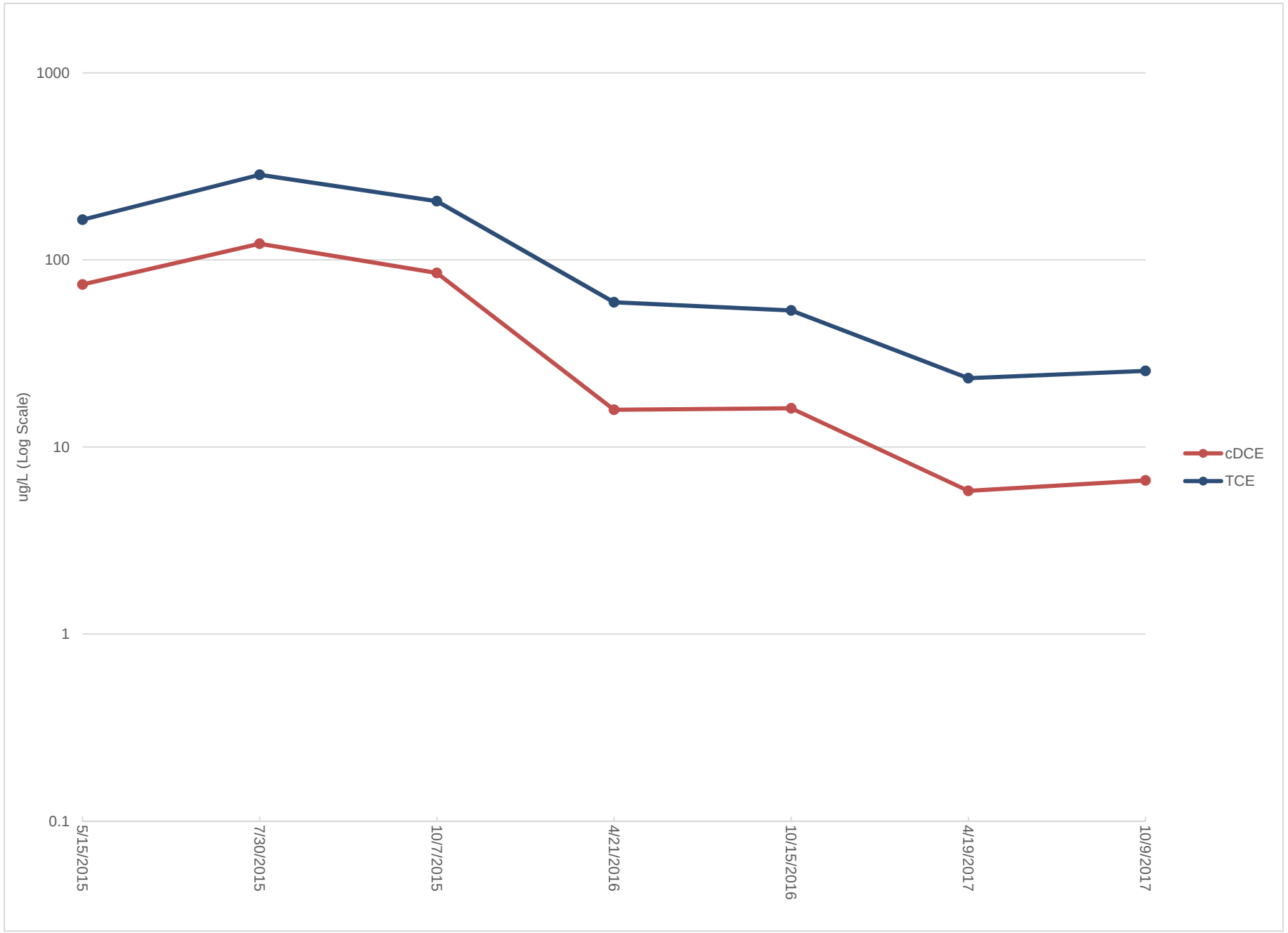
10/10/2017

MW-270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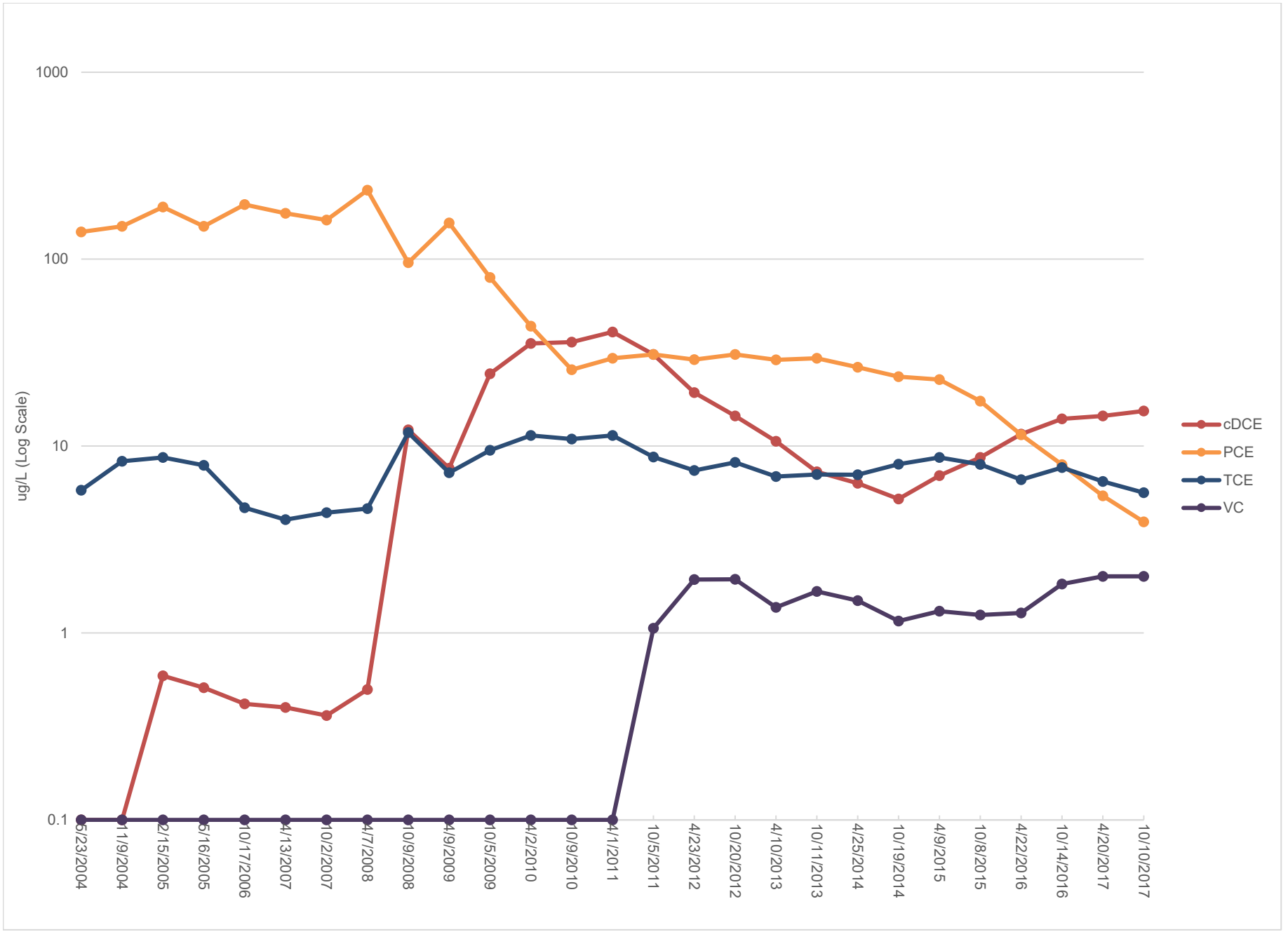
4/21/2016
10/15/2016
4/19/2017
10/9/2017
cDCE
TCE

Appendix H-9
CVOC Time-Trend Plots – Main Installation

Intermediate Aquifer-Upper Claiborne West-Central Wells

MW-39A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10/11/2013
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10/19/2014
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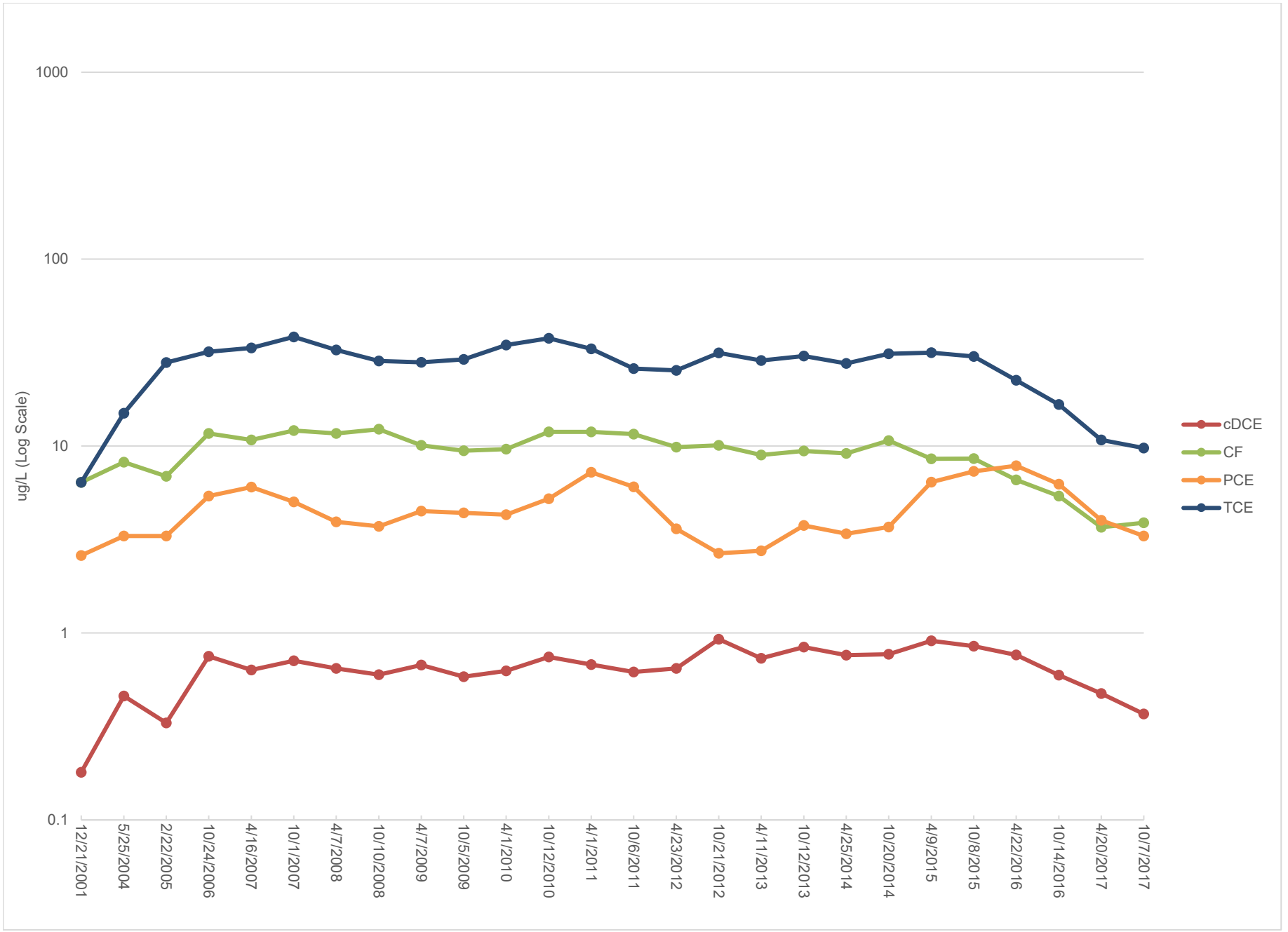
4/20/2017
10/10/2017
cDCE
PCE
TCE
VC

MW-108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10/20/2014
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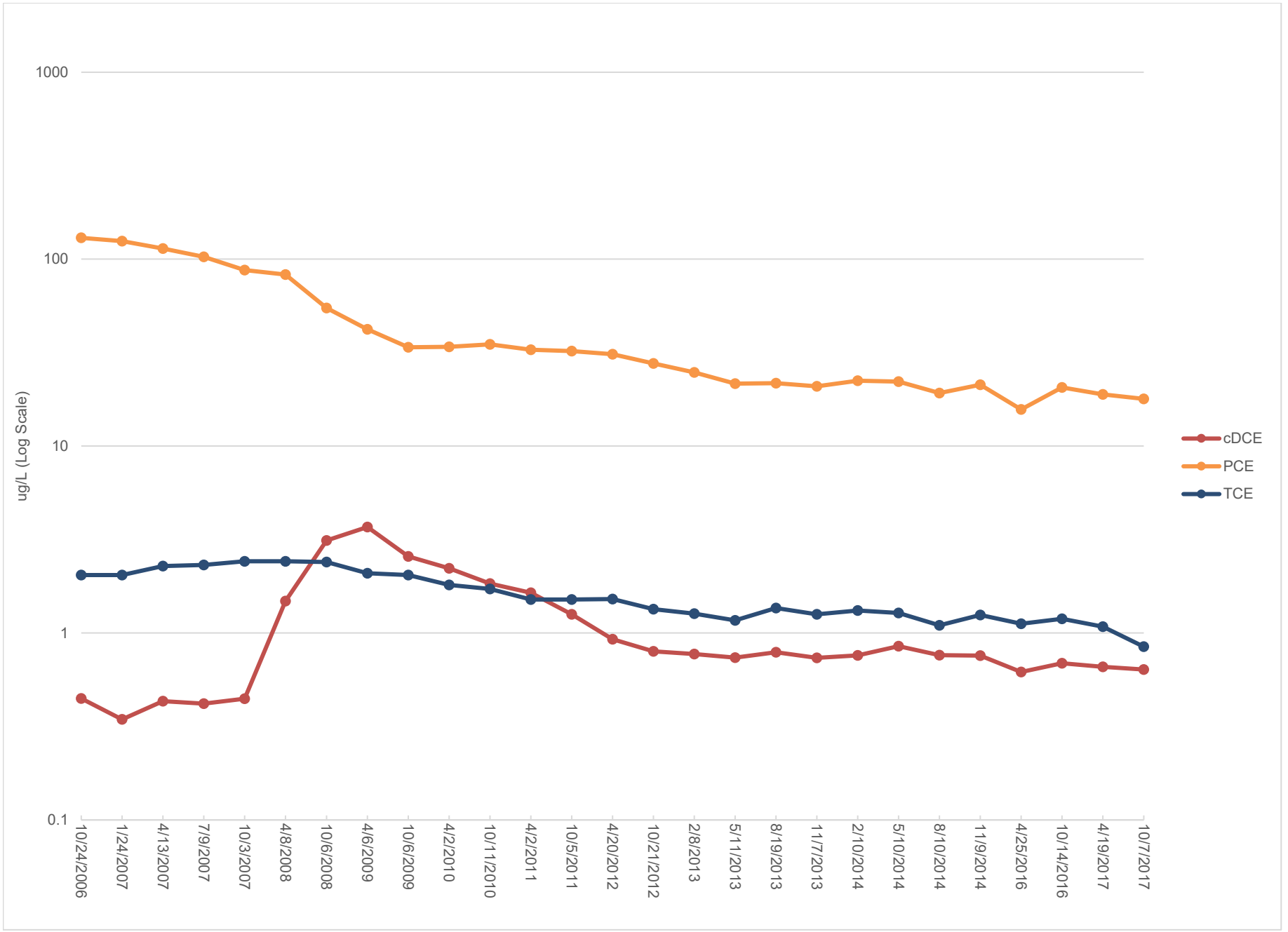
10/7/2017
cDCE
CF
PCE
TCE

MW-197A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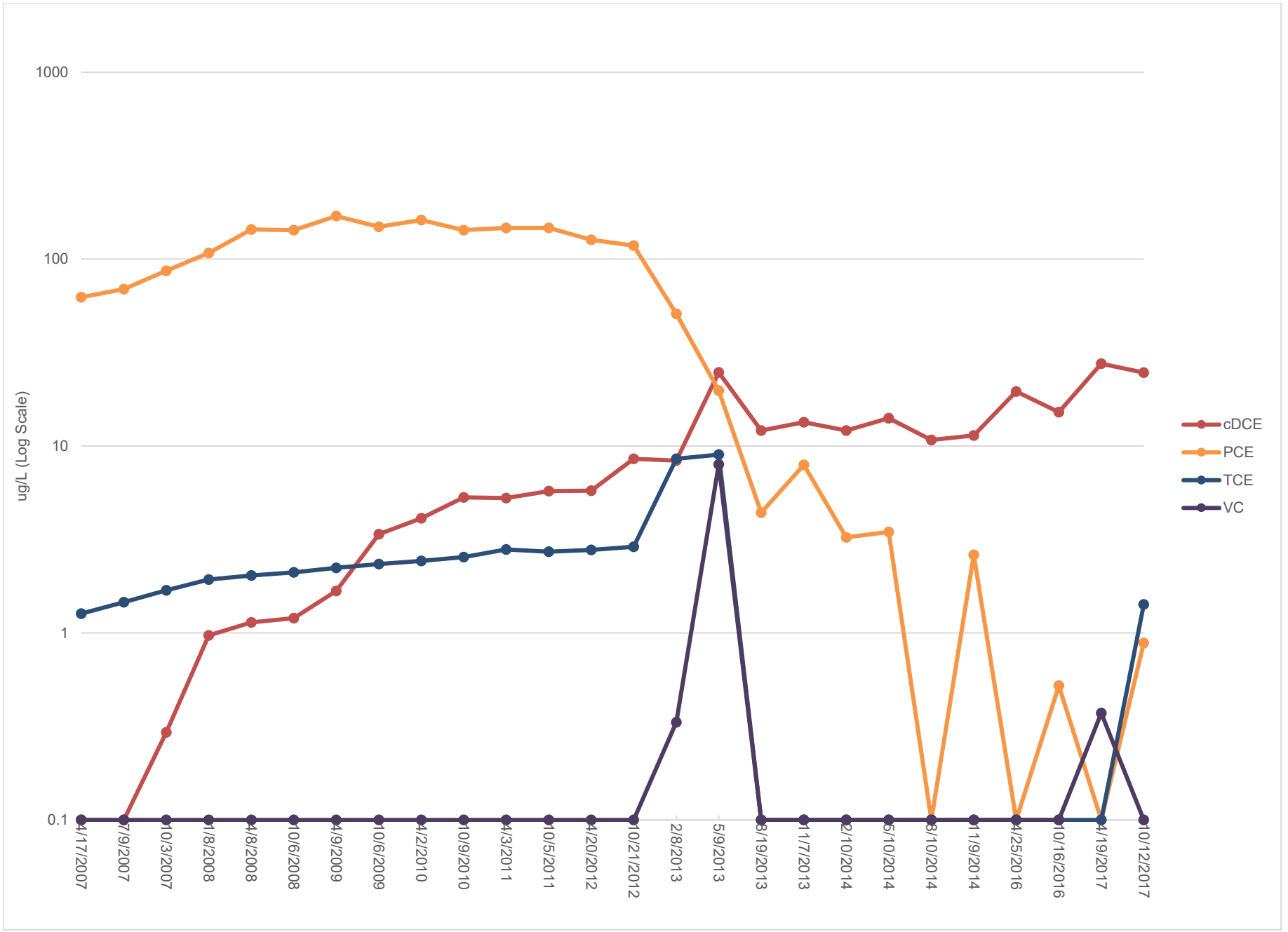
10/7/2017
cDCE
PCE
TCE

MW-203A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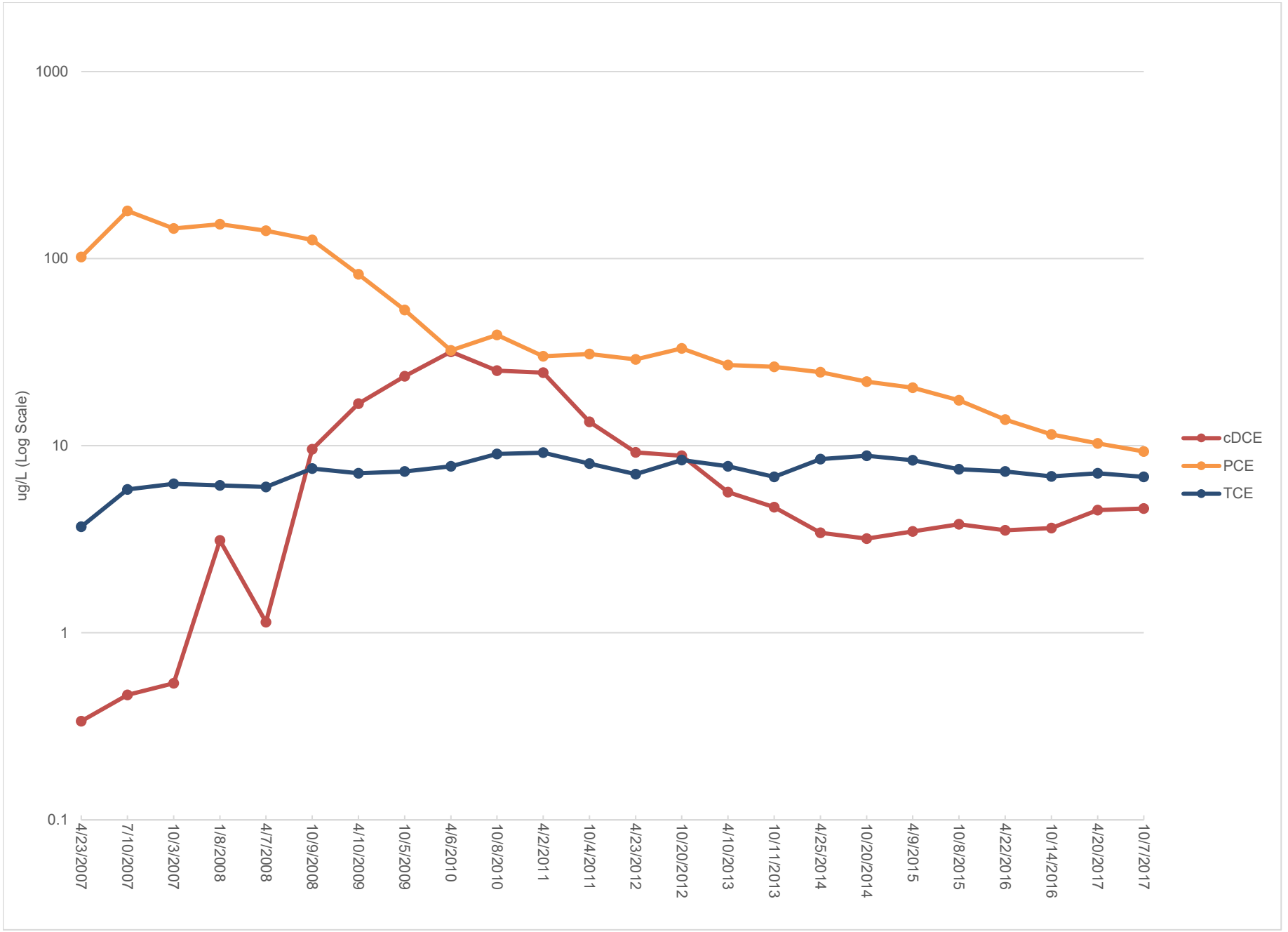
cDCE
PCE
TCE
VC

MW-205A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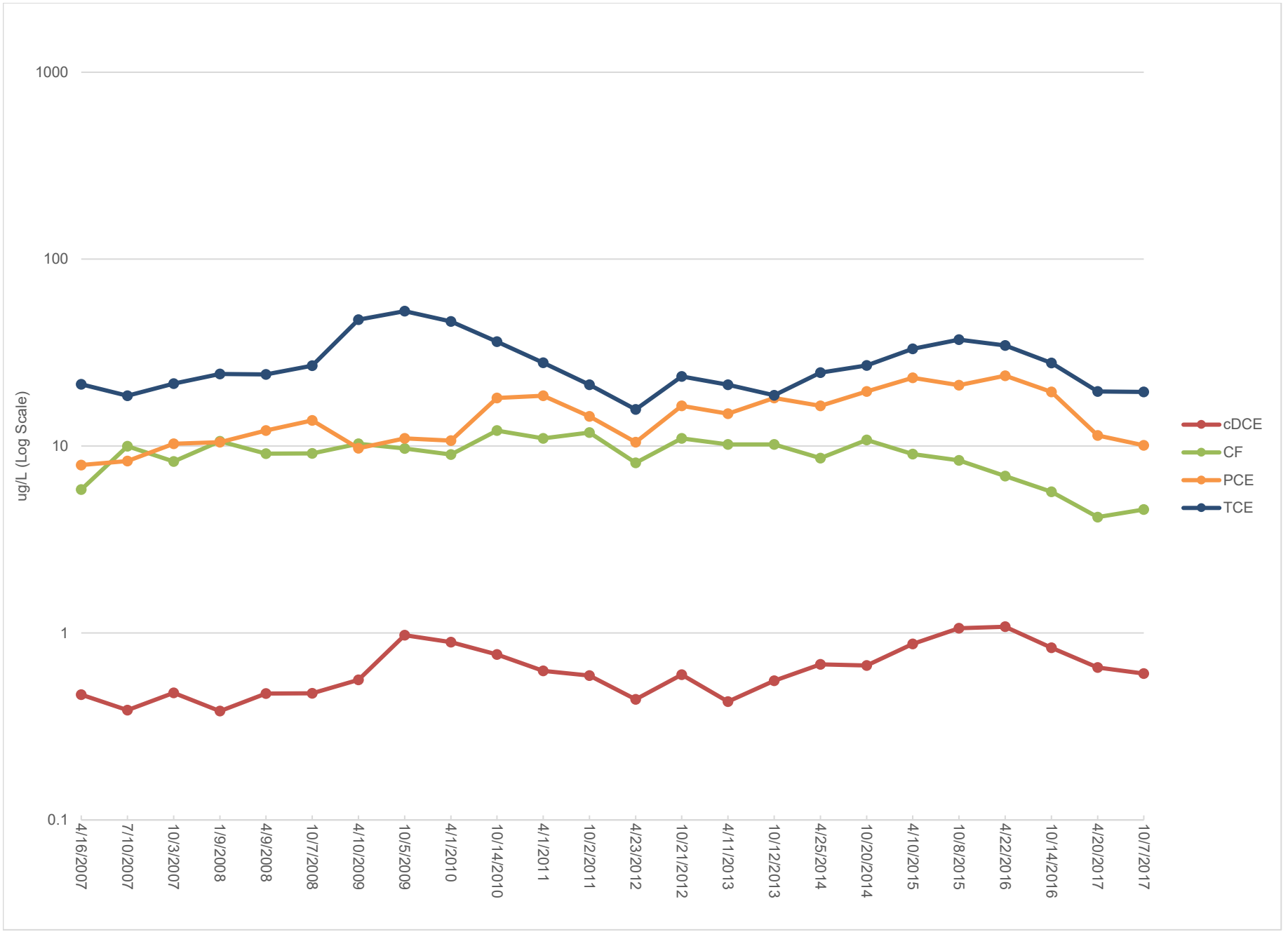
PCE
TCE

MW-207A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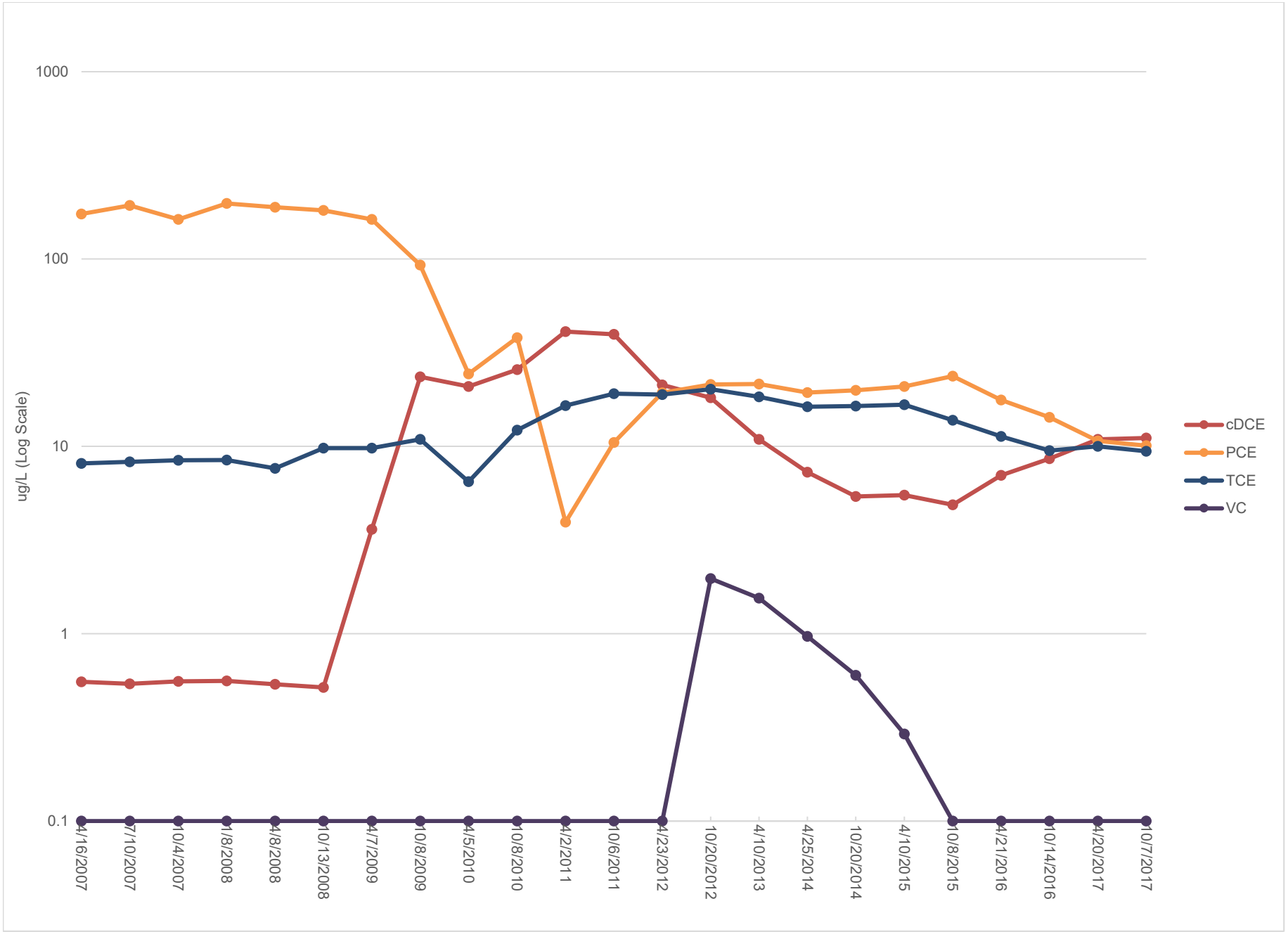
cDCE
CF
PCE
TCE

MW-208A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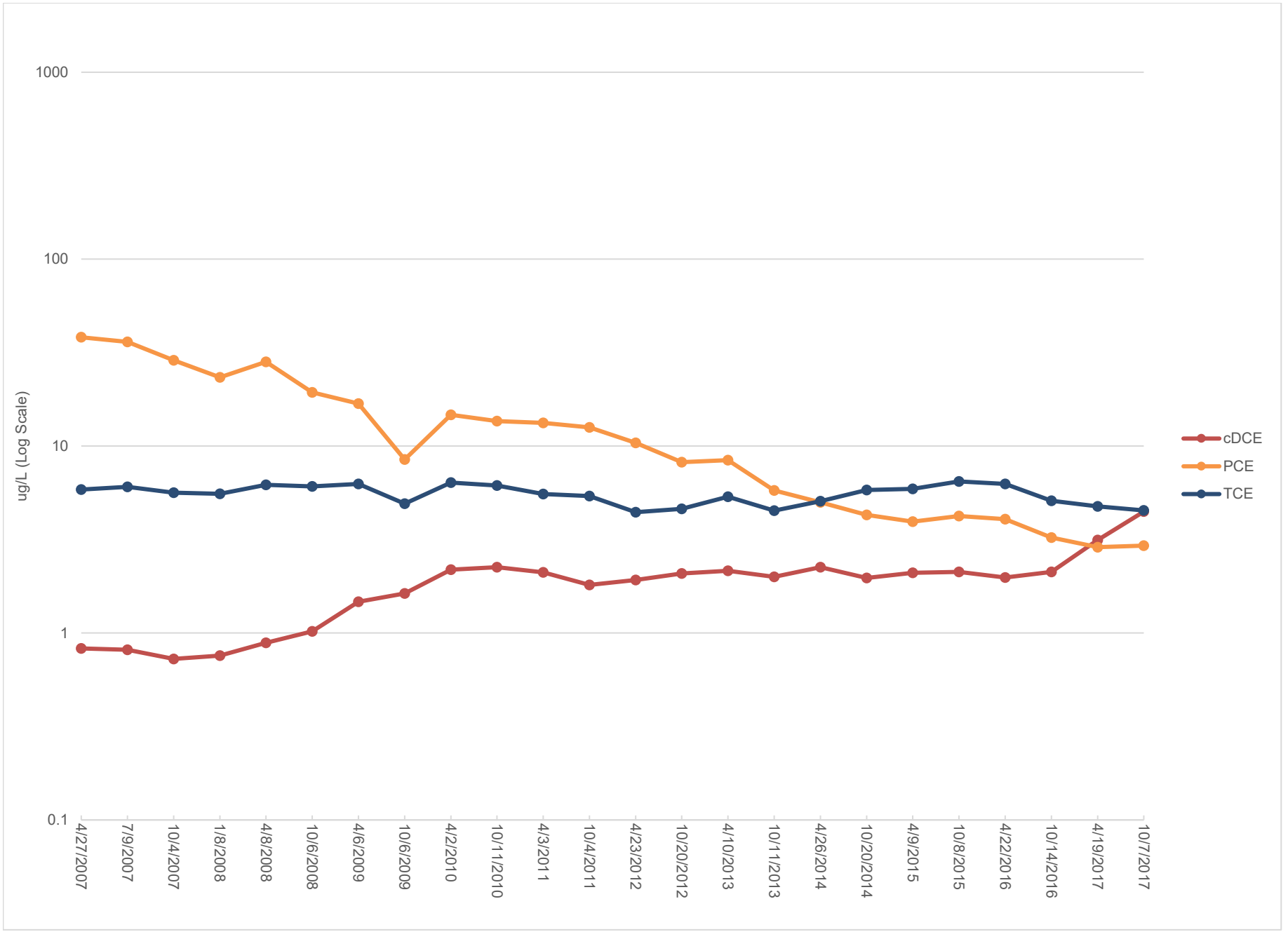
cDCE
PCE
TCE
VC

MW-210A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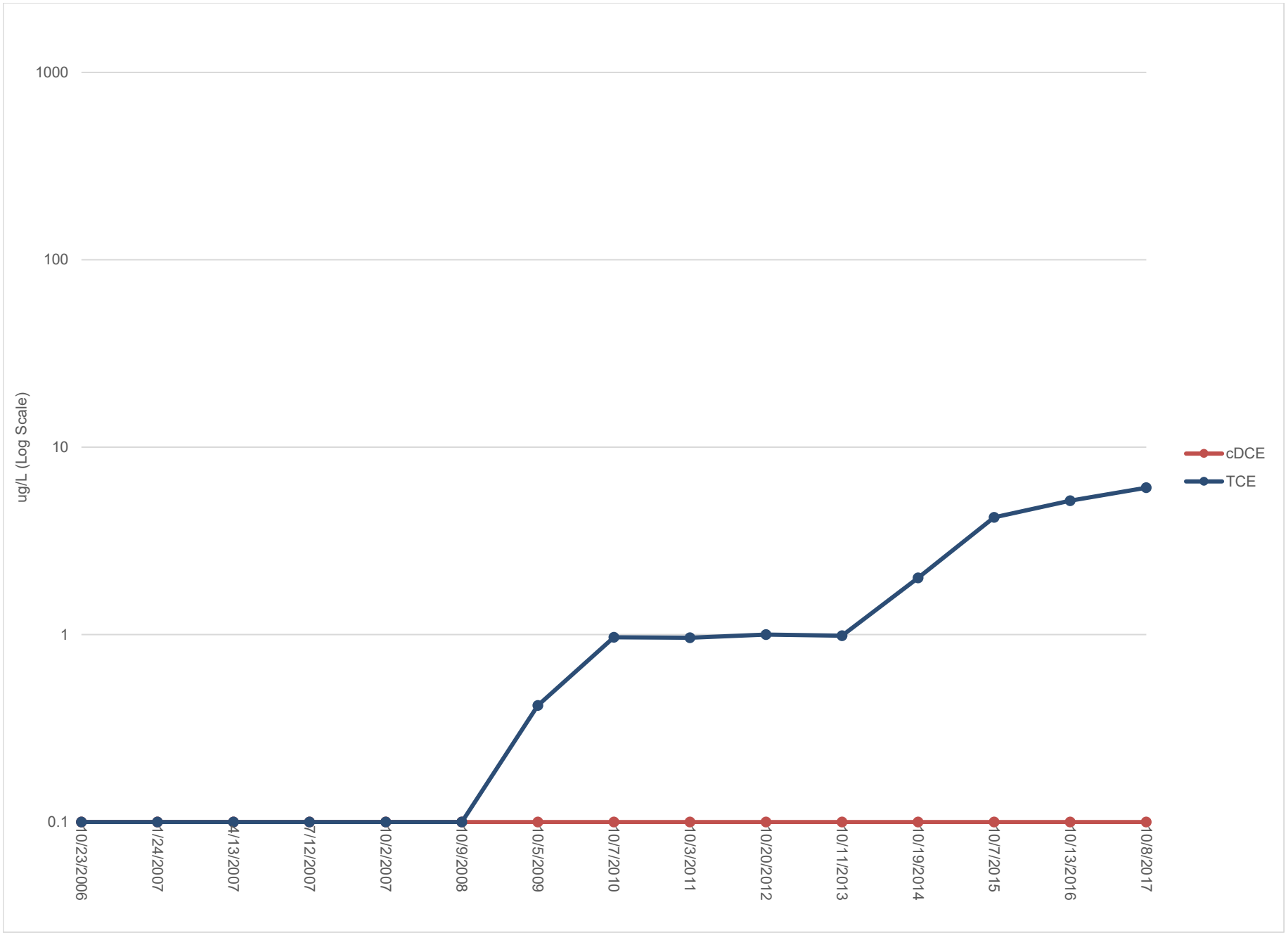
4/22/2016
10/14/2016
4/19/2017
10/7/2017
cDCE
PCE
TCE

Appendix H-10
CVOC Time-Trend Plots – Main Installation

Intermediate Aquifer-Upper Claiborne Building 835 Wells

MW-199A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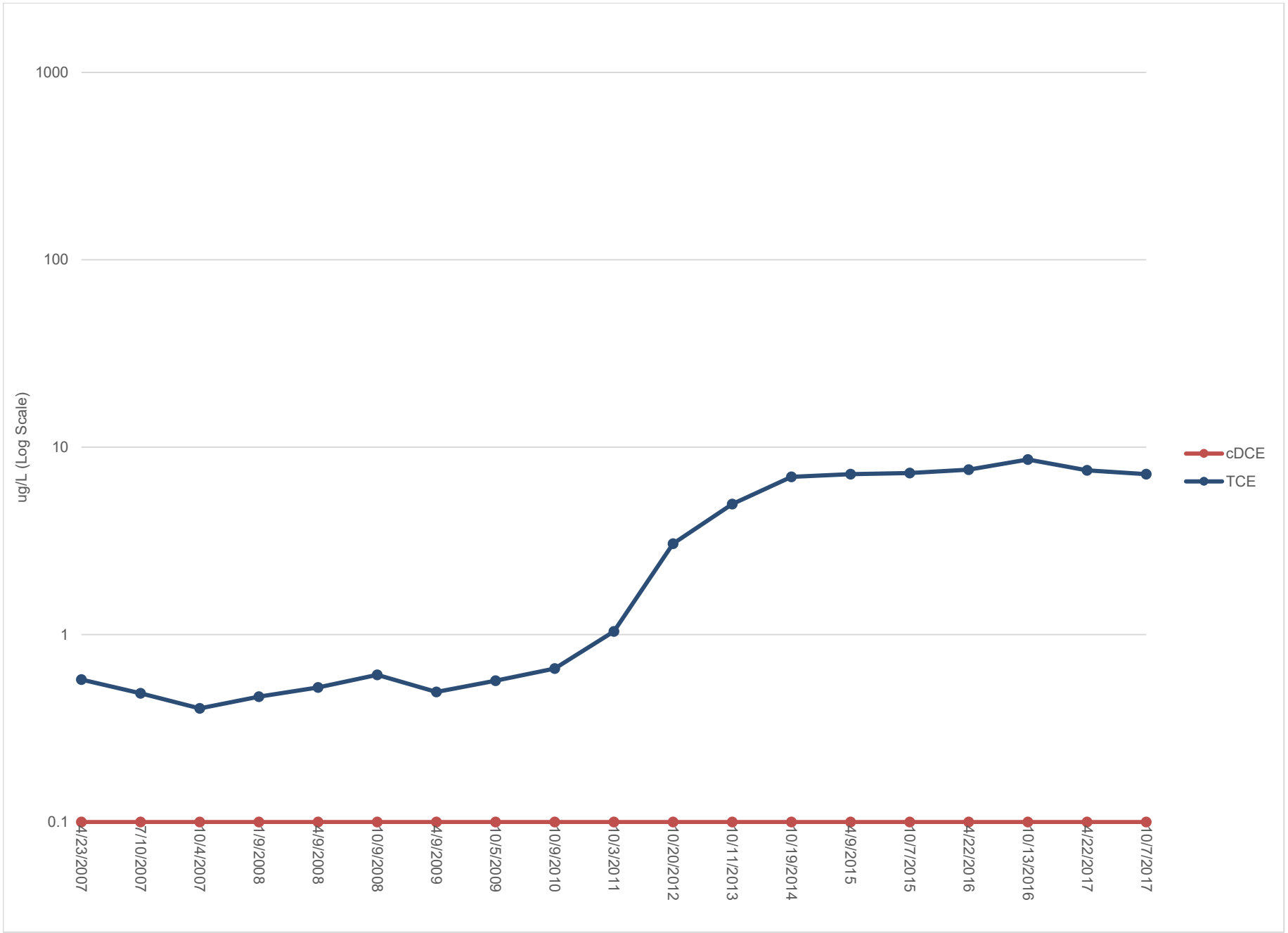
10/8/2017
cDCE
TCE

MW-209A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ug/L (Log Scale)
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TCE
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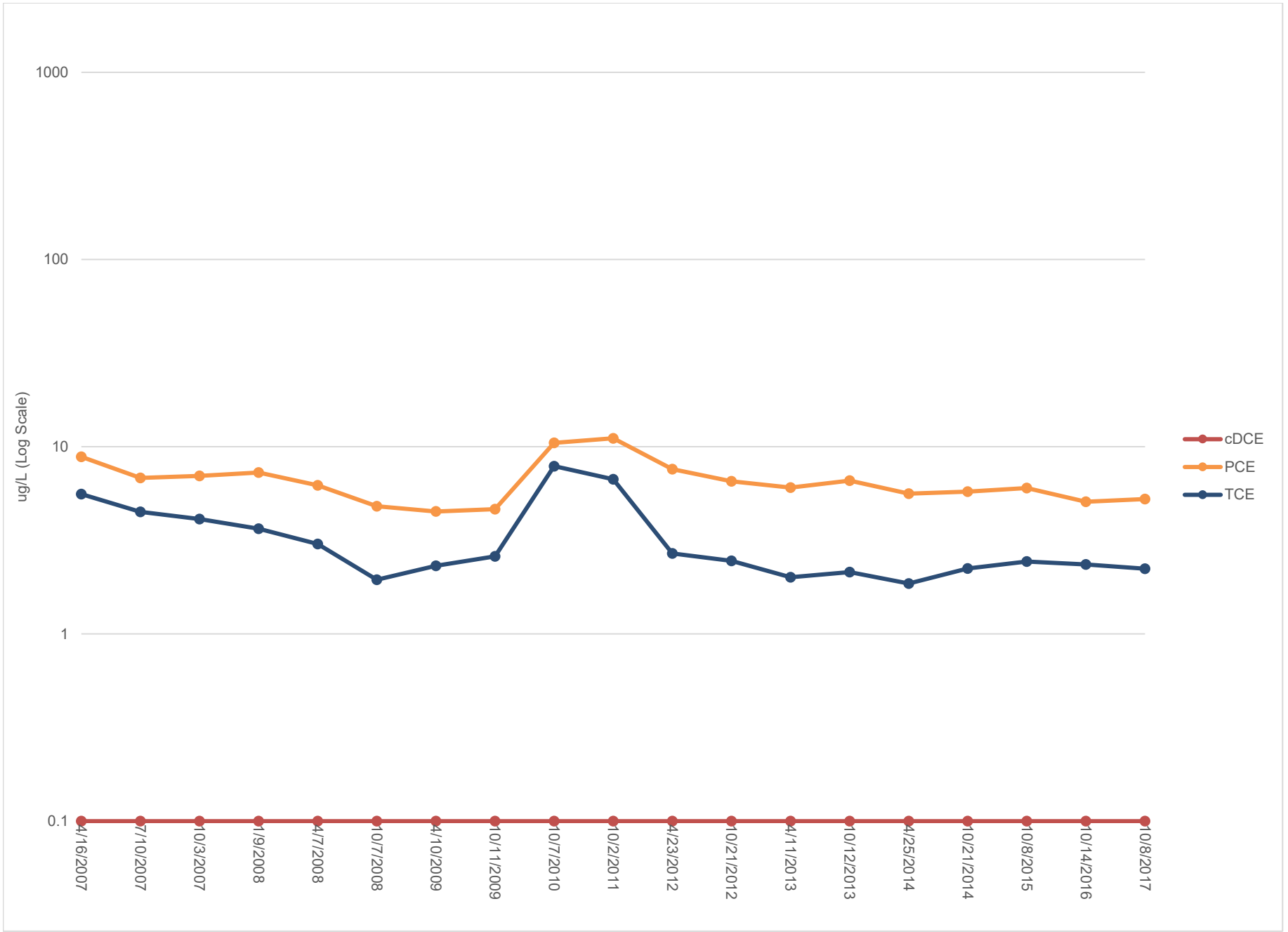
Appendix H-11
CVOC Time-Trend Plots – Main Installation

Intermediate Aquifer-Upper Claiborne North-Central Wells

MW-214A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PCE
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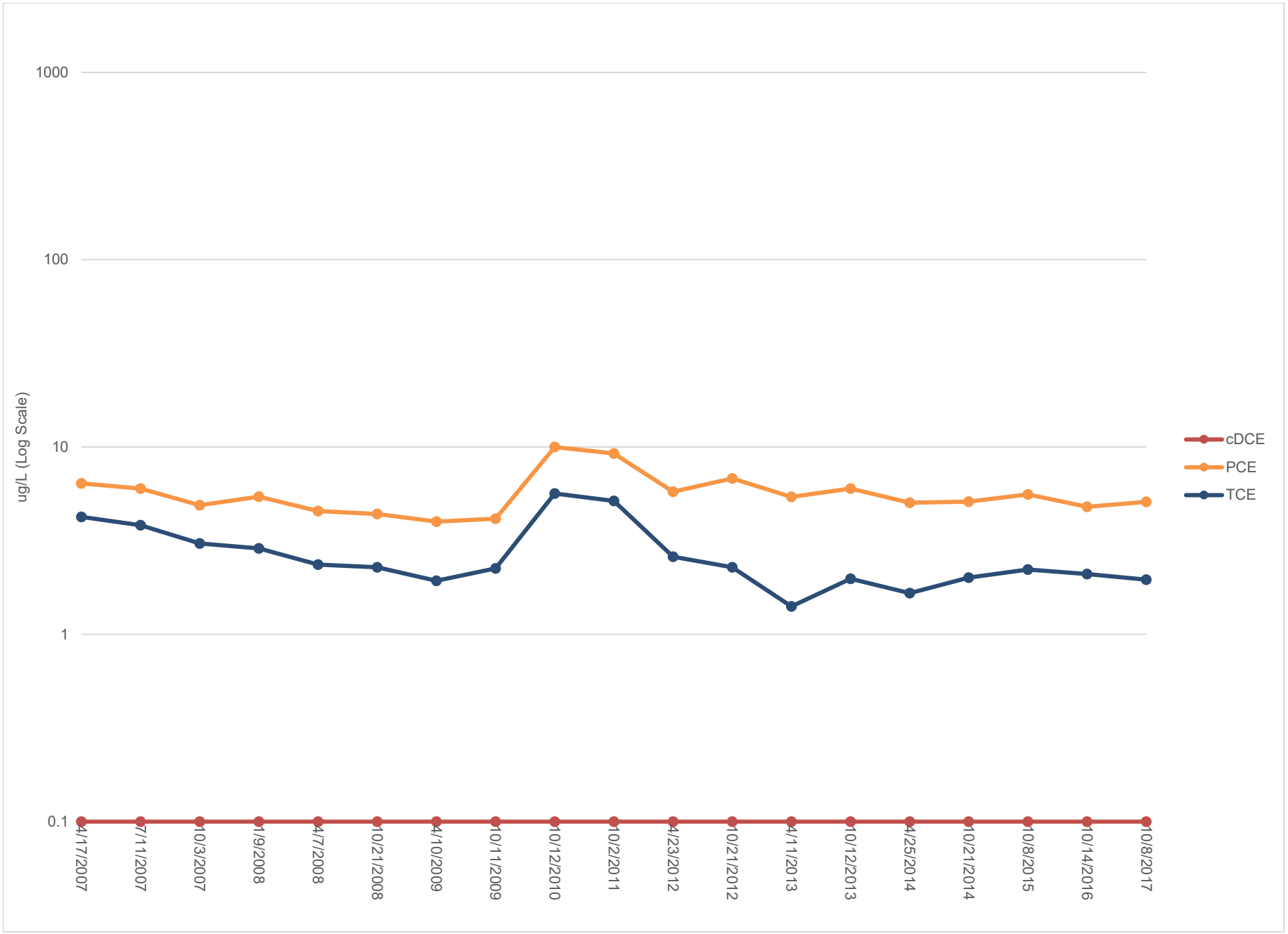
10/8/2017

MW-214B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TCE
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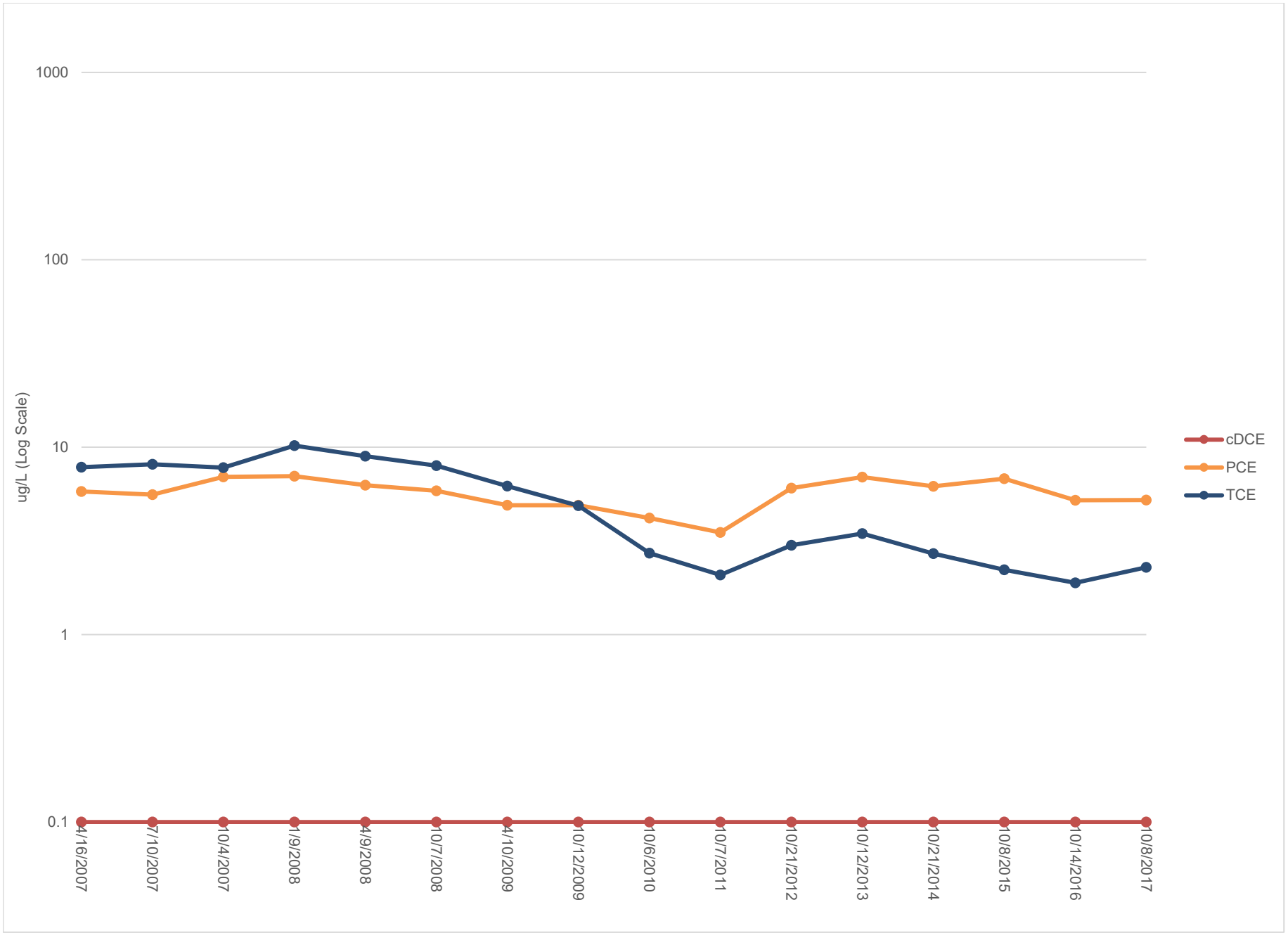
10/8/2017

MW-215A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PCE
TCE
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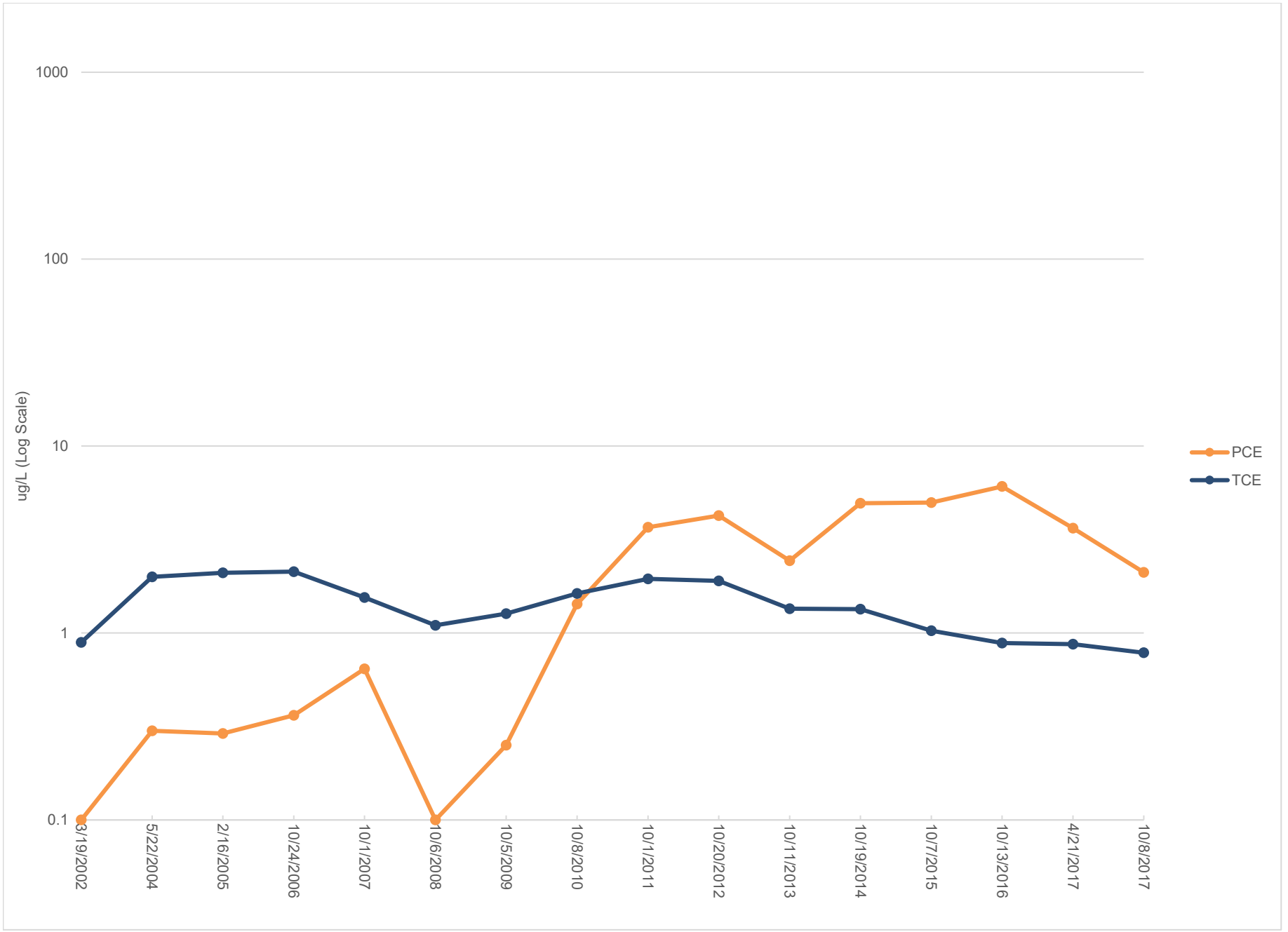
7/10/2007
10/4/2007
1/9/2008
4/9/2008
10/7/2008
4/10/2009
10/12/2009
10/6/2010
10/7/2011
10/21/2012
10/12/2013
10/21/2014
10/8/2015
10/14/2016
10/8/2017

Appendix H-12
CVOC Time-Trend Plots – Main Installation

Intermediate Aquifer-Upper Claiborne Window Wells

MW-89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TCE
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2/16/2005
10/24/2006
10/1/2007
10/6/2008
10/5/2009
10/8/2010
10/1/2011
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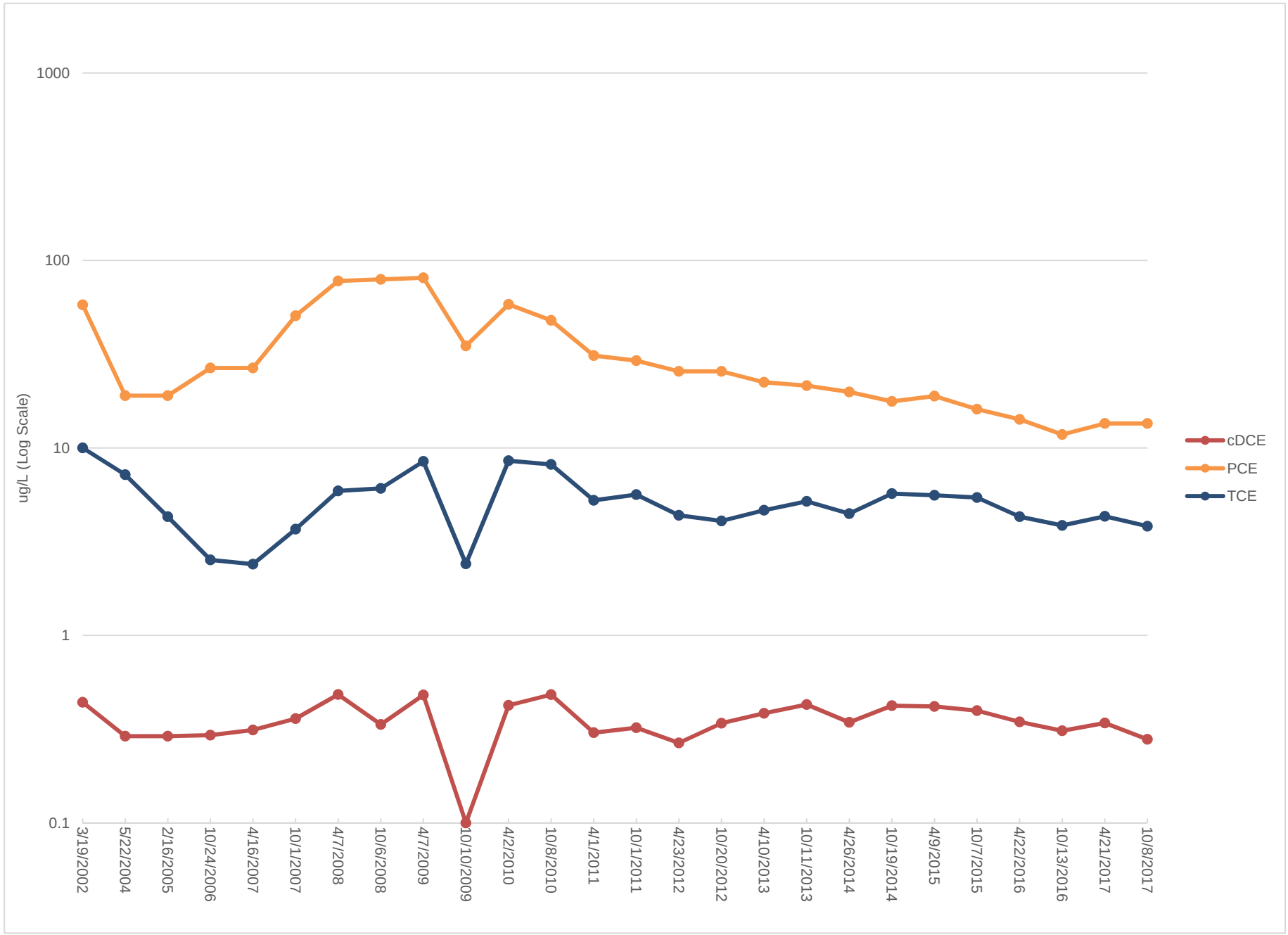
10/11/2013
10/19/2014
10/7/2015
10/13/2016
4/21/2017
10/8/2017

MW-90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4/7/2008
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10/10/2009
4/2/2010
10/8/2010
4/1/2011
10/1/2011
4/23/2012
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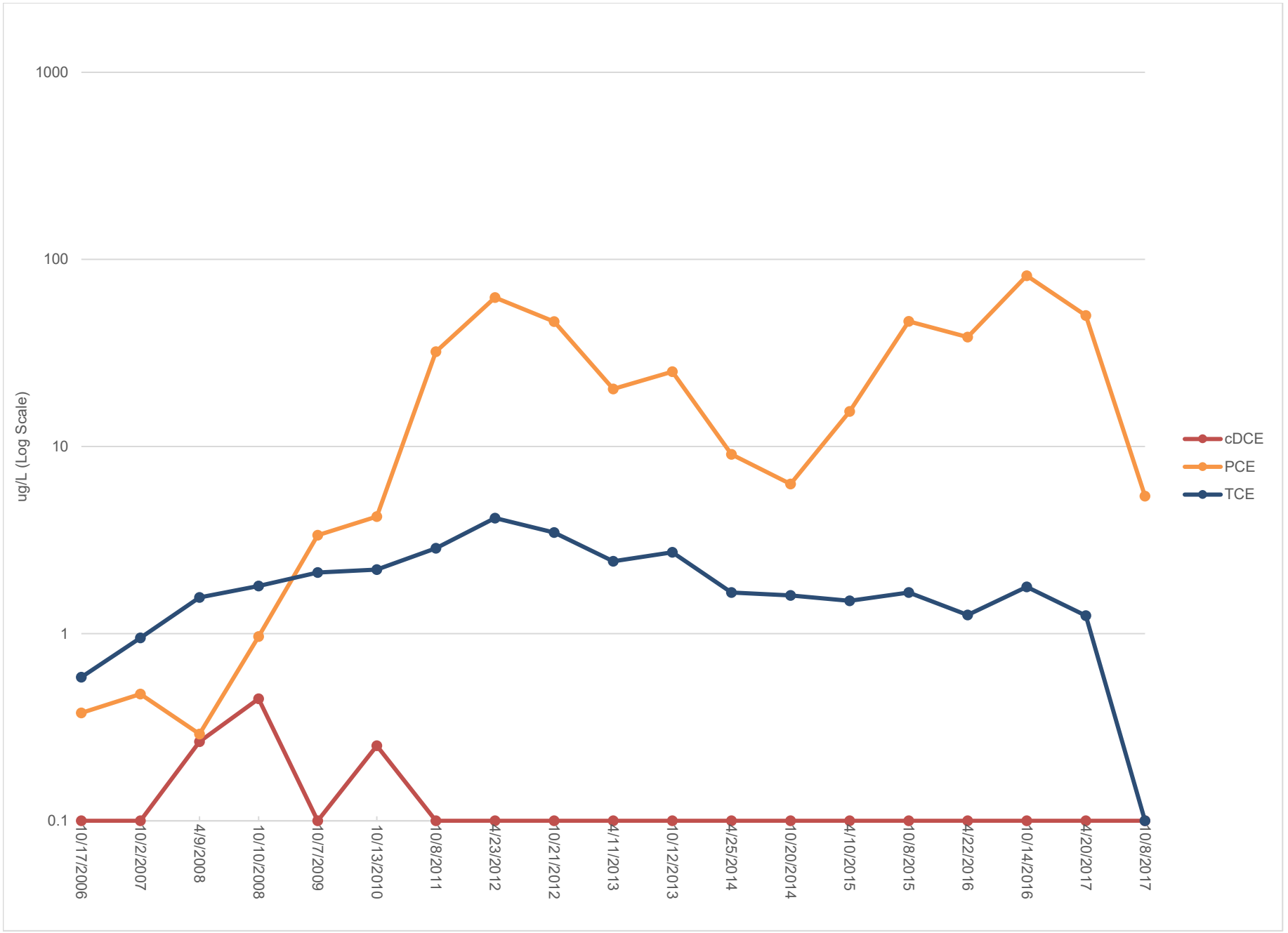
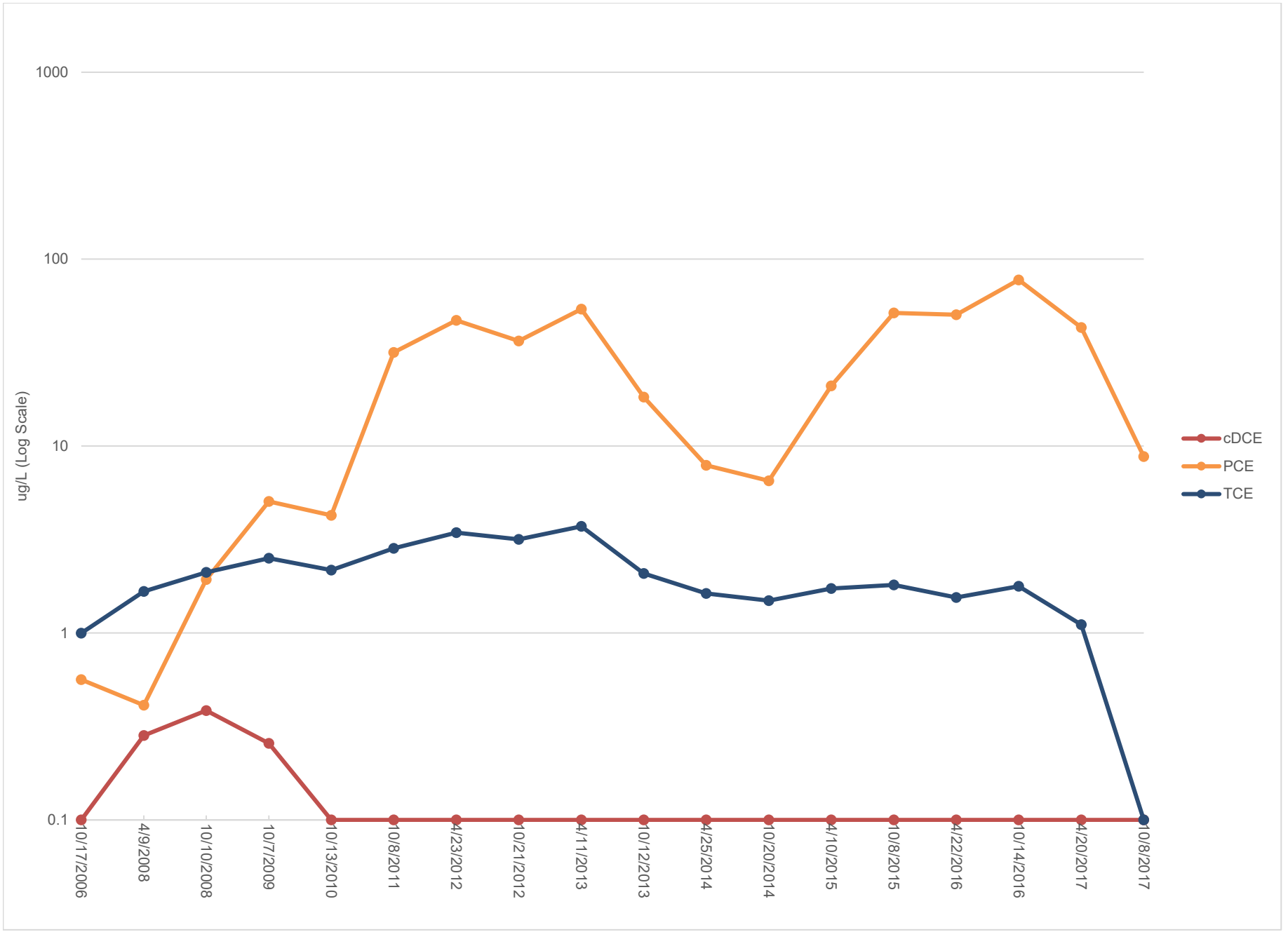
4/10/2013
10/11/2013
4/26/2014
10/19/2014
4/9/2015
10/7/2015
4/22/2016
10/13/2016
4/21/2017
10/8/2017
cDCE
PCE
TCE

MW-107 BOTTOM



MW-107 TOP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10/7/2009
10/13/2010
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10/12/2013
4/25/2014
10/20/2014
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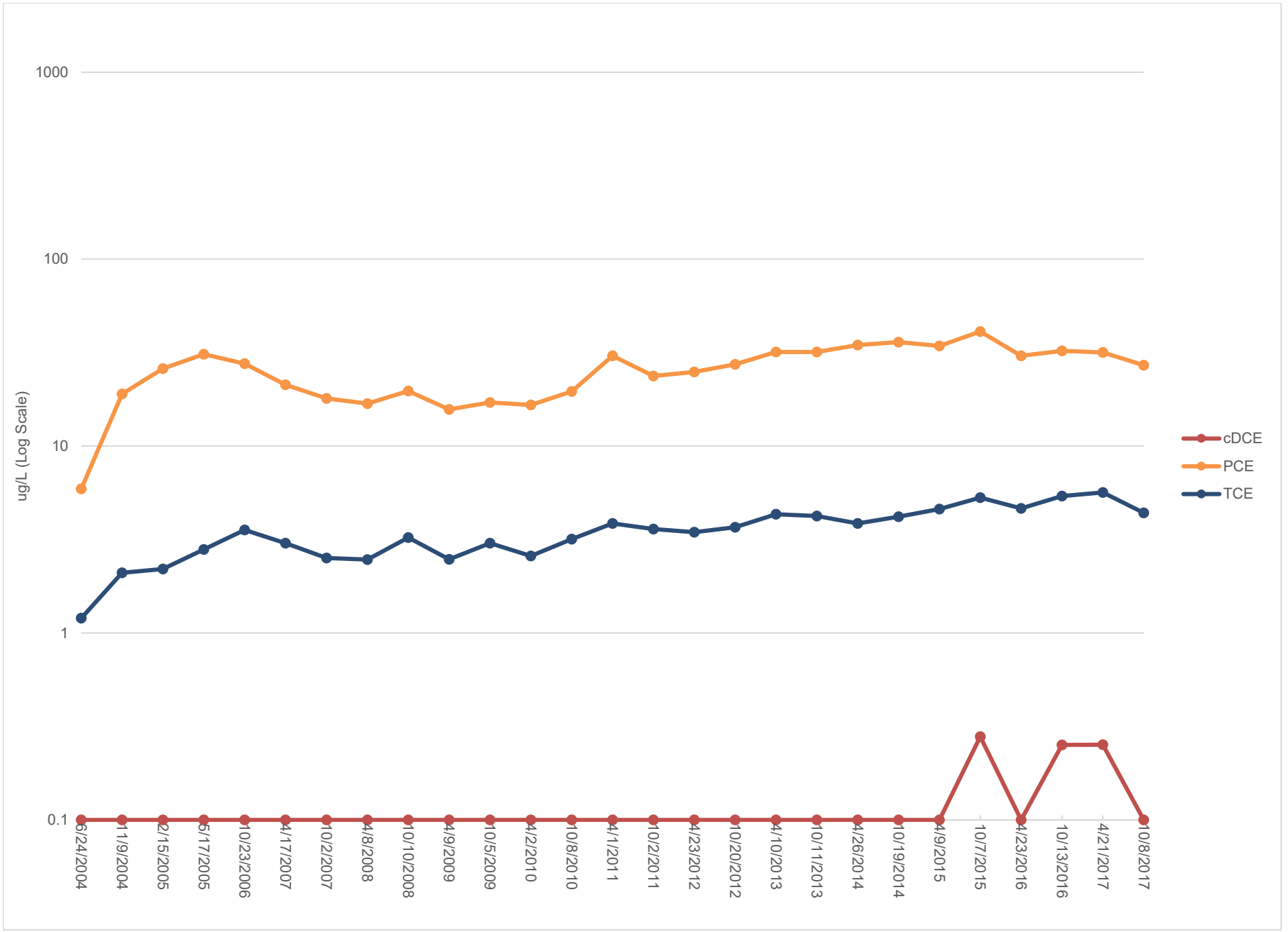
10/8/2017
cDCE
PCE
TCE

MW-141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ug/L (Log Scale)
cDCE
PCE
TCE
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2/15/2005
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4/23/2012
10/20/2012
4/10/2013
10/11/2013
4/26/2014
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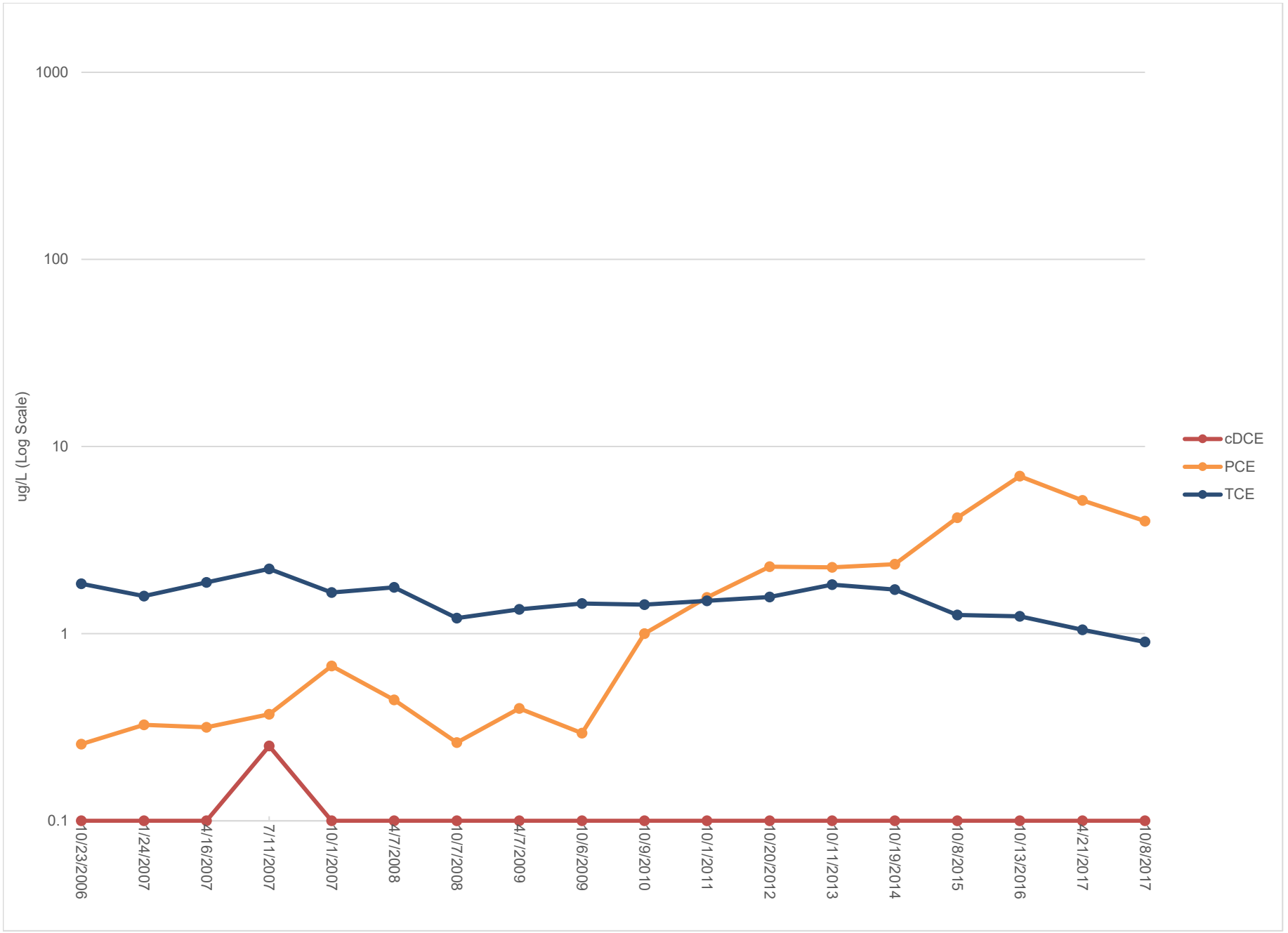
10/7/2015
4/23/2016
10/13/2016
4/21/2017
10/8/2017

MW-202A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ug/L (Log Scale)
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PCE
TCE
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1/24/2007
4/16/2007
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4/7/2008
10/7/2008
4/7/2009
10/6/2009
10/9/2010
10/1/2011
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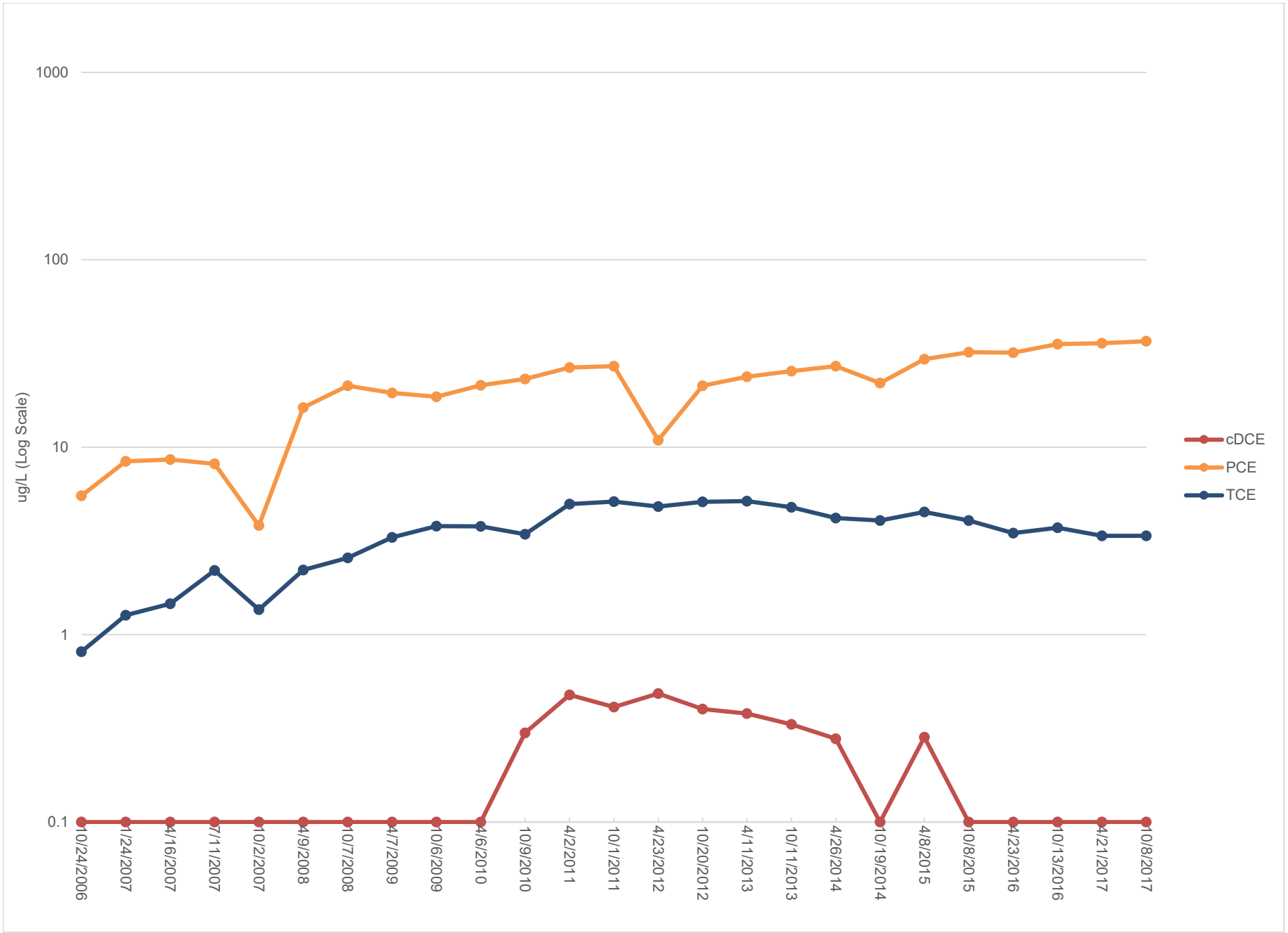
10/11/2013
10/19/2014
10/8/2015
10/13/2016
4/21/2017
10/8/2017

MW-202B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4/16/2007
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4/7/2009
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4/23/2012
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4/11/2013
10/11/2013
4/26/2014
10/19/2014
4/8/2015
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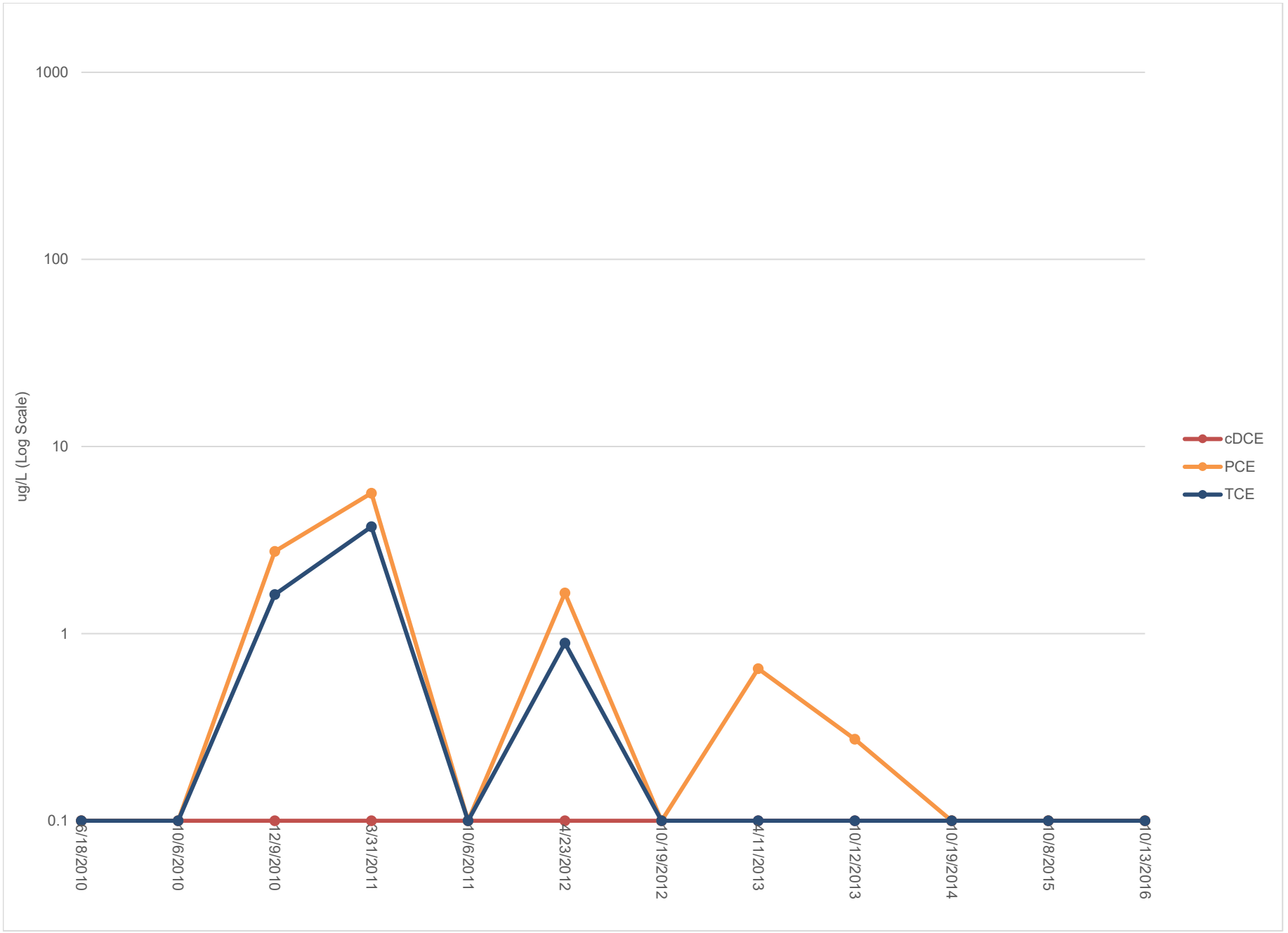
4/23/2016
10/13/2016
4/21/2017
10/8/2017

MW-252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ug/L (Log Scale)
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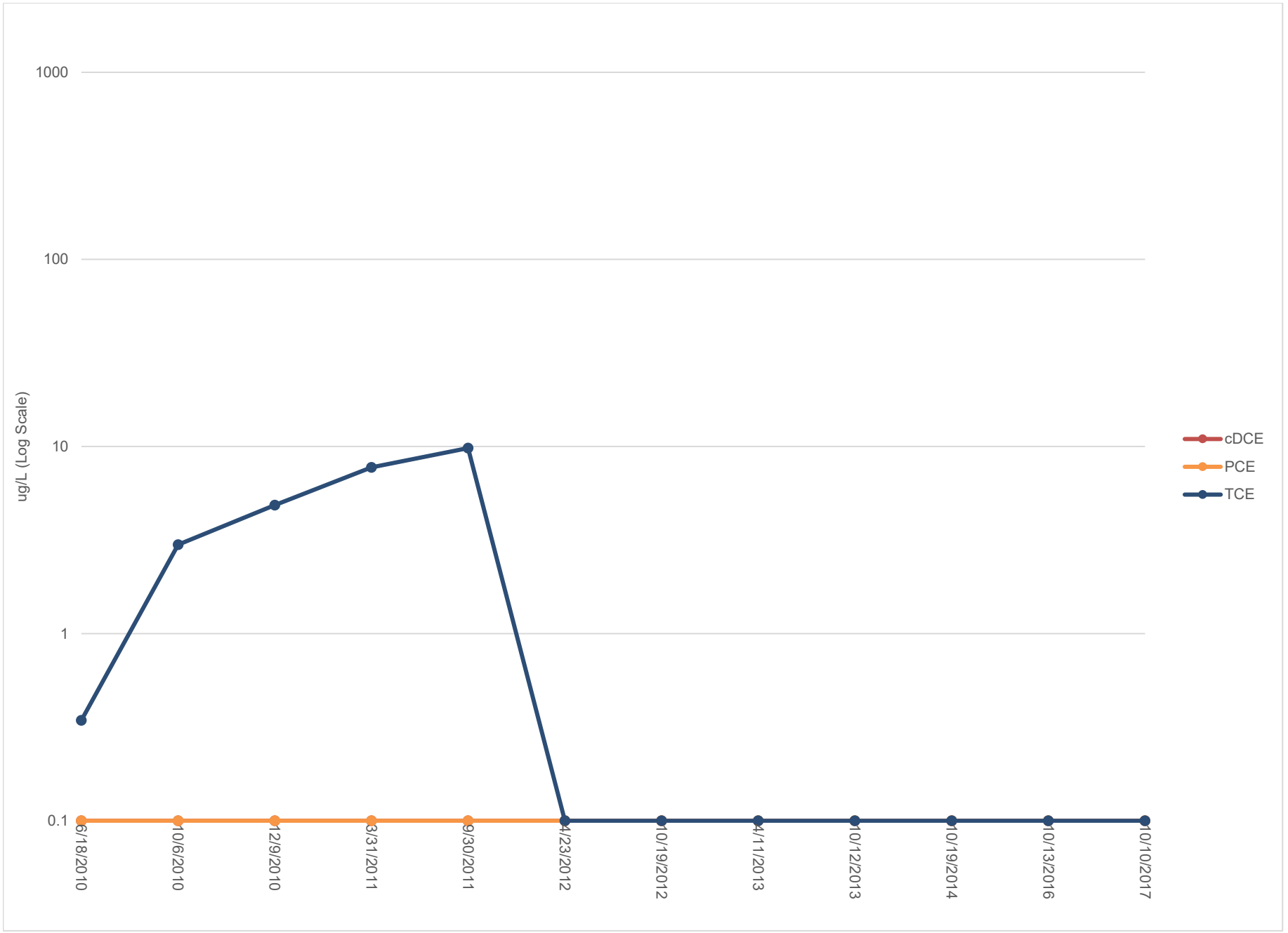
12/9/2010
3/31/2011
10/6/2011
4/23/2012
10/19/2012
4/11/2013
10/12/2013
10/19/2014
10/8/2015
10/13/2016
cDCE
PCE
TCE

MW-253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0.1
ug/L (Log Scale)
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12/9/2010
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9/30/2011
4/23/2012
10/19/2012
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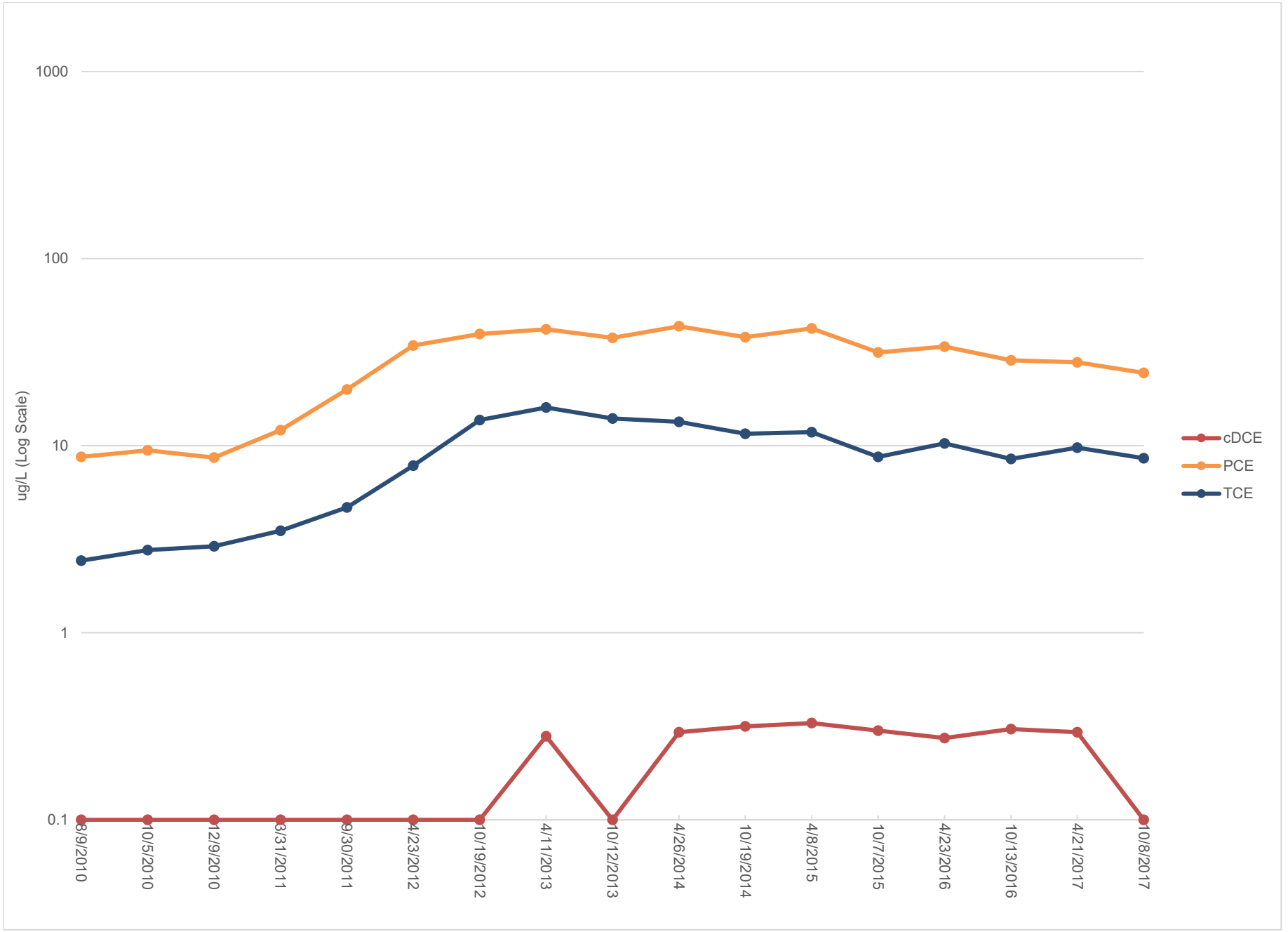
10/13/2016
10/10/2017
cDCE
PCE
TCE

MW-256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0.1
ug/L (Log Scale)
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12/9/2010
3/31/2011
9/30/2011
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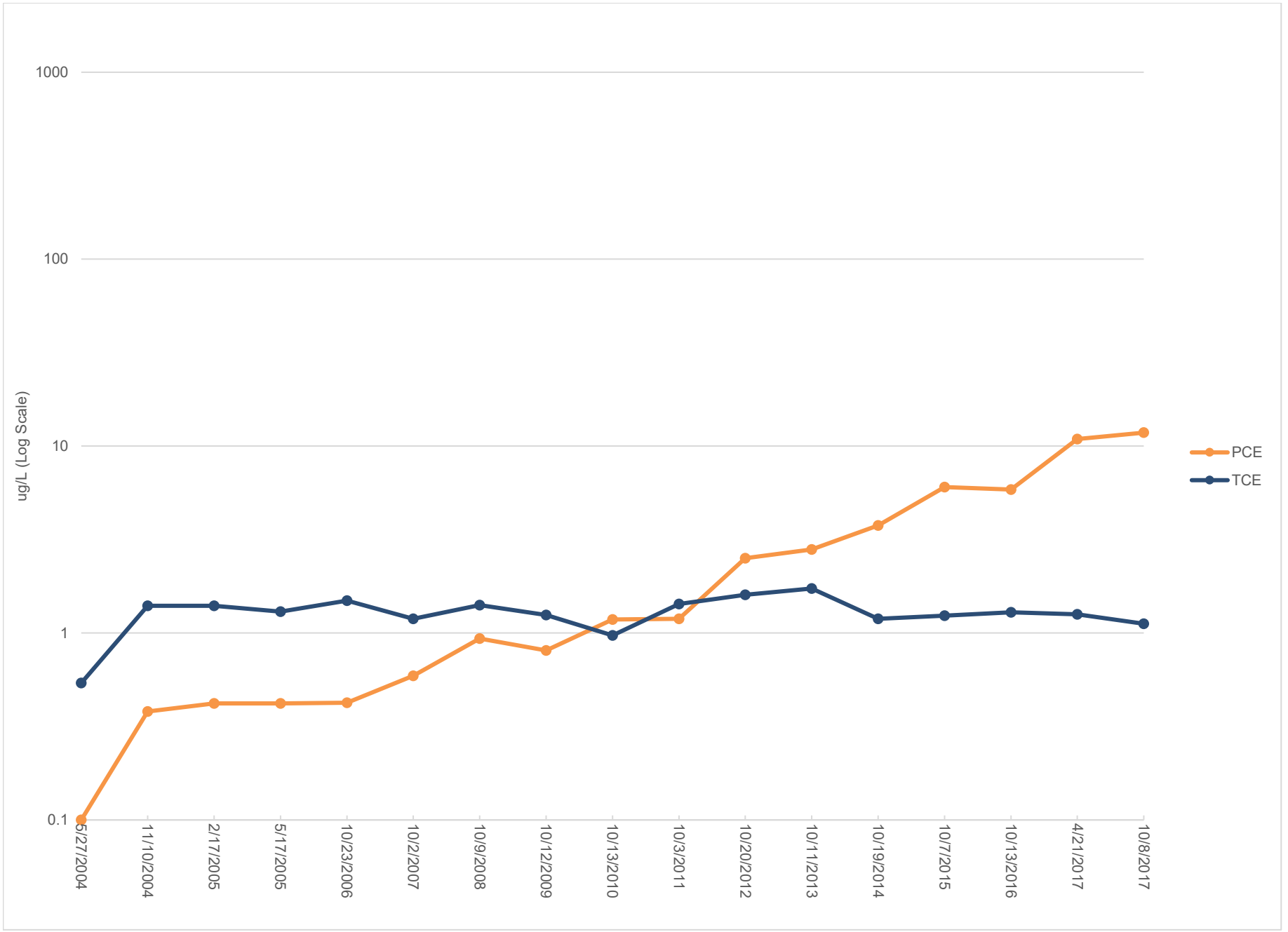
4/26/2014
10/19/2014
4/8/2015
10/7/2015
4/23/2016
10/13/2016
4/21/2017
10/8/2017
cDCE
PCE
TCE

Appendix H-13
CVOC Time-Trend Plots – Main Installation

Memphis Aquifer Window Wells

MW-140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0.1
ug/L (Log Scale)
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11/10/2004
2/17/2005
5/17/2005
10/23/2006
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10/9/2008
10/12/2009
10/13/2010
10/3/2011
10/20/2012
10/11/2013
10/19/2014
10/7/2015
10/13/2016
4/21/2017
10/8/2017
PCE
TCE

Appendix I.

Historical CVOC Results – Dunn Field

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-03

Analyte	Sample Name / Sample Date	Unit	MW-03 11/12/1993	MW-03 6/21/1997	MW-03 9/27/1997	MW-03 3/27/1998	MW-03 10/15/1998	MW-03 10/28/2004	MW-03 11/21/2005	MW-03 5/14/2007
1,1,2,2-Tetrachloroethane		µg/L	ND	33	<10	<10	1 J	78.4 J	96.2	67
1,1,2-Trichloroethane		µg/L	ND	<10	<10	<10	<10	1.3 J	1.66	1.5
1,1-Dichloroethene		µg/L	38.5	15	17	25	10	34.5 J	9.47	1.3
Carbon tetrachloride		µg/L	ND	2 J	<10	<10	<10	0.53 J	1.56 J	0.82
Chloroform		µg/L	3.25	17	2 J	9 J	2 J	3.53 J	12.4	12
cis-1,2-Dichloroethene		µg/L	--	--	--	--	--	45 J	82.7	59
Tetrachloroethene		µg/L	192	33	40	38	29	12.3 J	8.19	1.8
trans-1,2-Dichloroethene		µg/L	ND	--	--	--	--	10.4 J	19.4	12
Trichloroethene		µg/L	55.5	33	17	18	16	83.4 J	138	87
Vinyl chloride		µg/L	ND	<10	<10	<10	<10	<1	<1 UJ	ND

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-03

Analyte	Sample Name / Sample Date	Unit	MW-03 11/7/2007	MW-03 4/16/2008	MW-03 8/19/2008	MW-03 10/21/2008	MW-03 4/17/2009	MW-03 10/13/2009	MW-03 7/19/2011	MW-03 4/19/2012
1,1,2,2-Tetrachloroethane		µg/L	<1	<0.5	0.425	2.46	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	2.89	1.54	10.4	17.3	10.7	13.4	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	3.07	0.147 J	0.229	0.212 J	0.14 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	0.348	<1	<1	0.47 J	<1	<1
Tetrachloroethene		µg/L	2.63	2.71	5.71	9.5	9.13	10.1	1.2	0.871 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.18	2.04	5.8	10.1	9.26	10.4	1.44	1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-03

Analyte	Sample Name / Sample Date	Unit	MW-03 10/17/2012	MW-03 4/13/2013	MW-03 10/10/2013	MW-03 4/25/2014	MW-03 10/18/2014	MW-03 4/11/2015	MW-03 10/5/2015	MW-03 4/24/2016
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	0.524 J	<1	2.52	1.72	2.63	1.04	2.19	0.587 J
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	0.135 J	0.166 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	1.06	0.311 J	5.32	4.37	3.65	2.35	3.45	2.18
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.28	0.364 J	3.95	2.97	4.33	1.92	3.43	1.64
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-03

	Sample Name	MW-03	MW-03
	Sample Date	10/16/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	1.14	1.05
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.16 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	2.36	2.38
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	3.13	2.66
Vinyl chloride	µg/L	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-04

	Sample Name	MW4	MW042	MW043	MW044	MW045	MW04-76	MW4-78	MW-4-IS-6
	Sample Date	11/15/1993	6/20/1997	9/25/1997	3/28/1998	10/15/1998	11/21/2005	11/9/2007	4/21/2009
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	ND	<10	<10	<10	<10	0.23 J	<1	<0.5
1,1,2-Trichloroethane	µg/L	ND	<10	<10	<10	<10	<1	<1	<1
1,1-Dichloroethene	µg/L	ND	<10	<10	<10	<10	<1	<1	<1
Carbon tetrachloride	µg/L	ND	<10	<10	<10	<10	<1	<1	<1
Chloroform	µg/L	ND	1 J	<10	<10	1 J	0.43 J	0.16	0.328
cis-1,2-Dichloroethene	µg/L	--	--	--	--	--	<1	<1	<1
Tetrachloroethene	µg/L	32.6	74	78	72	120	33.4	23.4	<1
trans-1,2-Dichloroethene	µg/L	ND	--	--	--	--	<1	<1	<1
Trichloroethene	µg/L	ND	2 J	3 J	3 J	4 J	2.23	1.11	<1
Vinyl chloride	µg/L	ND	<10	<10	<10	<10	<1 UJ	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-04

	Sample Name	MW-04-IS-7	MW-04	MW-04	MW-04	MW-04	MW-04
	Sample Date	10/14/2009	4/28/2011	4/19/2012	4/13/2013	4/10/2015	4/22/2017
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.294 J	0.278 B	0.162 J	0.371	0.519	0.688
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-06

	Sample Name	MW6	MW062	MW063	MW064	MW065	MW06RD67	MW06-67
	Sample Date	11/18/1993	6/21/1997	9/27/1997	3/30/1998	10/15/1998	10/27/2004	11/21/2005
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	219	110	220	130	220	613	237
1,1,2-Trichloroethane	µg/L	9.1	7 J	9 J	5 J	8 J	20.9 J	10.1
1,1-Dichloroethene	µg/L	ND	<20	<20	<10	<20	<1	<1
Carbon tetrachloride	µg/L	43.7	45	37	15	23	31.2 J	26.5
Chloroform	µg/L	14.3	16 J	14 J	6 J	10 J	15.4 J	10.2
cis-1,2-Dichloroethene	µg/L	--	--	--	--	--	436	295
Tetrachloroethene	µg/L	3.06	4 J	3 J	1 J	2 J	1.9 J	1.84
trans-1,2-Dichloroethene	µg/L	20.8	--	--	--	--	25.4 J	16.8
Trichloroethene	µg/L	198	260	240	94	160	236	171
Vinyl chloride	µg/L	ND	<20	<20	<10	<20	1.59 J	1.35 J

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-06

	Sample Name	MW-06-SARA-GW01	MW6-69	MW-6-IS-4	MW-06-TSVE-GW	MW-6-IS-5	MW-6-IS-6	MW-06-IS-7
	Sample Date	5/16/2007	11/7/2007	4/15/2008	8/19/2008	10/17/2008	4/22/2009	10/13/2009
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	41	18.4	8.89	8.1	5.57	3.23	3.96
1,1,2-Trichloroethane	µg/L	3.9	2.32	1.02	0.972	0.674 J	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	16	13.8	3.78	1.35	0.793 J	0.463 J	<1
Chloroform	µg/L	6.2	8.55	84.7	29.4	21.2	6.17	5.48
cis-1,2-Dichloroethene	µg/L	200	150	36.2	23.1	15	4.91	3.78
Tetrachloroethene	µg/L	1.4	1.14	1.07	0.365	<1	0.254 J	<1
trans-1,2-Dichloroethene	µg/L	11	6.33	1.45	0.926	0.458 J	<1	<1
Trichloroethene	µg/L	120	78.1	32.5	14.2	8.6	2.53	2.44
Vinyl chloride	µg/L	0.68	0.484	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-06

Analyte	Sample Name / Sample Date	Unit	MW-006-ODLA-1 3/26/2010	MW-06 4/26/2011	MW-06 7/19/2011	MW-06 4/19/2012	MW-06 10/17/2012	MW-06 4/12/2013	MW-06 10/10/2013	MW-06 4/25/2014
1,1,2,2-Tetrachloroethane		µg/L	2.67	0.807	0.614	0.497 J	0.486 J	<0.5	<0.5	0.201 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	5.4	8.73	4.88	2.9	2.72	2.21	2.38	4.2
cis-1,2-Dichloroethene		µg/L	1.62	0.637 J	0.41 J	0.311 J	0.569 J	<1	0.572 J	0.983 J
Tetrachloroethene		µg/L	<1	0.304 J	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.29	3.34	1.75	1.06	0.938 J	0.707 J	0.848 J	0.929 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-06

	Sample Name	MW-06	MW-06	MW-06	MW-06	MW-06	MW-06	MW-06
	Sample Date	10/18/2014	4/10/2015	10/6/2015	4/25/2016	10/16/2016	4/22/2017	10/6/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	9.05	11	4.03	7.39	7.4	15.3	8.03
cis-1,2-Dichloroethene	µg/L	3.59	12.8	3.35	3.15 J	2.5	3.4	2.08
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	1.32	2.59	0.89 J	1.02	0.66 J	0.876 J	0.375 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1 U	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-07

Analyte	Sample Name / Sample Date	Unit	MW-07 11/15/1993	MW-07 2/12/1996	MW-07 6/21/1997	MW-07 9/27/1997	MW-07 4/2/1998	MW-07 10/14/1998	MW-07 7/28/2003	MW-07 10/28/2003
1,1,2,2-Tetrachloroethane		µg/L	ND	ND	<10	<10	<10	<10	<1	<1
1,1,2-Trichloroethane		µg/L	ND	ND	<10	<10	<10	<10	<1	<1
1,1-Dichloroethene		µg/L	36.5	54	26	50	47	25	4.06	40.9
Carbon tetrachloride		µg/L	ND	ND	<10	<10	<10	<10	2.99	1.23
Chloroform		µg/L	12.8	8 J	8 J	9 J	2 J	7 J	911	139
cis-1,2-Dichloroethene		µg/L	--	--	--	--	--	--	2.98	<1
Tetrachloroethene		µg/L	35	51	32	82	78	47	32.3	42.6
trans-1,2-Dichloroethene		µg/L	ND	--	--	--	--	--	0.8 J	<1
Trichloroethene		µg/L	13.7	26	16	32	31	21	46.3	27.6
Vinyl chloride		µg/L	ND	ND	<10	<10	<10	<10	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-07

Analyte	Sample Name / Sample Date	Unit	MW-07 4/28/2004	MW-07 10/20/2004	MW-07 6/14/2005	MW-07 11/18/2005	MW-07 4/12/2006	MW-07 10/18/2006	MW-07 4/9/2007	MW-07 5/14/2007
1,1,2,2-Tetrachloroethane		µg/L	<1.2	<1.4	<1	<1	<1	<0.5	<0.5	ND
1,1,2-Trichloroethane		µg/L	<1.2	<1.4	<1	<1	<1	<1	<1	ND
1,1-Dichloroethene		µg/L	32	17	15.3	18.1	27.4	18.5	22.8	20
Carbon tetrachloride		µg/L	0.29 J	<1.4	<1	<1	<1	0.273 J	0.641 J	ND
Chloroform		µg/L	8	0.44 J	<1	1.07 B	0.501 B	4.49	20	0.55
cis-1,2-Dichloroethene		µg/L	<1.2	<1.4	<1	<1	<1	<1	0.326 J	0.26
Tetrachloroethene		µg/L	50	18	20.6	26.3	50.7	34.5	39.4	47
trans-1,2-Dichloroethene		µg/L	<1.2 J	<1.4	<1	<1	<1	<1	<1	ND
Trichloroethene		µg/L	32	14	14.9	15.4	26.5	19.6	24.7	25
Vinyl chloride		µg/L	<1.2	<1.4	<1	<1	<1	<1	<1	ND

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-07

Analyte	Sample Name / Sample Date	Unit	MW-07 10/8/2007	MW-07 4/14/2008	MW-07 8/19/2008	MW-07 10/17/2008	MW-07 4/15/2009	MW-07 10/13/2009	MW-07 4/19/2012	MW-07 4/13/2013
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	12.8	24.8	26.8	32.7	35.6	24	16.2	20
Carbon tetrachloride		µg/L	0.48 J	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	13.8	0.273 J	0.288	0.299 J	0.357	0.263 J	0.192 J	0.276 J
cis-1,2-Dichloroethene		µg/L	<1	<1	0.282	0.367 J	0.472 J	0.441 J	0.29 J	0.535 J
Tetrachloroethene		µg/L	24.3	56.2	61.2	63.9	70.6	62.8	35.1	55.9
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	16	29.4	30.9	38.9	40.9	40.4	30.3	52.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-07

	Sample Name	MW-07	MW-07	MW-07	MW-07
	Sample Date	4/25/2014	4/10/2015	4/24/2016	4/22/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	14.6	17.2	15	12.9
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.22 J	0.285 J	0.306	0.252 J
cis-1,2-Dichloroethene	µg/L	0.293 J	0.436 J	0.426 J	0.32 J
Tetrachloroethene	µg/L	35.6	43.8	39.2	32.2
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	28.8	42.2	39.8	32.9
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-08

Analyte	Sample Name / Sample Date	Unit	MW-08 11/17/1993	MW-08 2/13/1996	MW-08 6/21/1997	MW-08 9/26/1997	MW-08 3/30/1998	MW-08 10/13/1998	MW-08 7/28/2003	MW-08 10/28/2003
1,1,2,2-Tetrachloroethane		µg/L	ND	ND	<10	<10	2 J	<10	<1	<1
1,1,2-Trichloroethane		µg/L	ND	ND	<10	<10	<10	<10	<1	<1
1,1-Dichloroethene		µg/L	34.4	26	12	20	19	22	1.58	1.43
Carbon tetrachloride		µg/L	ND	ND	<10	<10	<10	<10	<1	<1
Chloroform		µg/L	ND	ND	<10	<10	<10	<10	<1	<1
cis-1,2-Dichloroethene		µg/L	--	--	--	--	--	--	<1	<1
Tetrachloroethene		µg/L	35.2	26	16	27	24	33	1.6	<1
trans-1,2-Dichloroethene		µg/L	ND	--	--	--	--	--	<1	<1
Trichloroethene		µg/L	15.3	14	9 J	13	12	16	1.51	<1
Vinyl chloride		µg/L	ND	ND	<10	<10	<10	<10	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-08

Analyte	Sample Name / Sample Date	Unit	MW-08 4/28/2004	MW-08 10/20/2004	MW-08 11/21/2005	MW-08 11/7/2007	MW-08 4/18/2012	MW-08 4/12/2013	MW-08 4/28/2014	MW-08 4/11/2015
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	0.26 J	<1	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	1.3	1.1	3.85	<1	2.99	5.64	1.48	3.24
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	0.158	<0.3	0.197 J	<0.3	0.181 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	0.345 J	<1	0.361 J
Tetrachloroethene		µg/L	0.37 J	1.4	5.28	<1	5.25	9.91	3.65	5.09
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.85 J	1.3	5.68	<1	7	14.5	6.09	9.73
Vinyl chloride		µg/L	<1	<1	<1 UJ	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-08

	Sample Name	MW-08	MW-08
	Sample Date	5/24/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	0.205 J
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	2.59	2.11
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.225 J	0.3
cis-1,2-Dichloroethene	µg/L	<1	0.256 J
Tetrachloroethene	µg/L	5.99	4.29
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	9.55	7.49
Vinyl chloride	µg/L	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-13

	Sample Name	MW13	MW132	MW133	MW134	MW135	MW13-79.5FT	MW13-ZVI-TS1
	Sample Date	11/15/1993	6/20/1997	9/26/1997	3/26/1998	10/15/1998	1/8/2001	10/22/2003
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	ND	<10	<10	<10	<10	<1	0.517
1,1,2-Trichloroethane	µg/L	ND	<10	<10	<10	<10	<1	<0.5
1,1-Dichloroethene	µg/L	ND	<10	<10	<10	<10	<1	<1
Carbon tetrachloride	µg/L	ND	<10	<10	<10	<10	<1	<1
Chloroform	µg/L	ND	<10	<10	<10	<10	<1	0.391 J
cis-1,2-Dichloroethene	µg/L	--	--	--	--	--	<1	<1
Tetrachloroethene	µg/L	2.01	7 J	8 J	2 J	3 J	<1	9.06
trans-1,2-Dichloroethene	µg/L	ND	--	--	--	--	<1	<1
Trichloroethene	µg/L	ND	<10	<10	<10	<10	<1 UJ	1.23
Vinyl chloride	µg/L	ND	<10	<10	<10	<10	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-13

	Sample Name	MW13-ZVI-TS2	MW13-ZVI-TS3	MW13-ZVI-TS4	MW13-ZVI-TS5	MW13RD77	MW13-77
	Sample Date	11/17/2003	12/17/2003	2/2/2004	4/5/2004	10/28/2004	11/21/2005
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	2.64 J	0.66 J
1,1,2-Trichloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.402 J	0.352 J	0.409 J	0.397 J	0.345 J	0.27 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	6.33	6.97	4.69	4.53	3.5	2.15
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.325 J	0.308 J	0.262 J	0.638 J	<1	0.91 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1 UJ

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-13

	Sample Name	MW13-75	MW-13-IS-6	MW-13-IS-7	MW-13	MW-13	MW-13	MW-13
	Sample Date	11/7/2007	4/21/2009	10/14/2009	4/28/2011	4/12/2013	4/10/2015	4/22/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.127	0.142 J	0.187 J	0.522 B	0.199 J	0.272 J	0.177 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.571	<1	<1	<1	0.287 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-15

	Sample Name	MW15	MW152	MW153	MW154	MW155	MW-15-Y1Q1	MW-15-Y1Q2
	Sample Date	11/18/1993	6/20/1997	9/26/1997	3/28/1998	10/15/1998	2/3/1999	5/25/1999
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	2.71	<20	<25	<10	<10	<1	28.2
1,1,2-Trichloroethane	µg/L	<1	<20	<25	<10	<10	<1	2.66
1,1-Dichloroethene	µg/L	<1	<20	<25	<10	<10	<1	<1
Carbon tetrachloride	µg/L	38.9	31	46	3 J	5 J	27.9	79.6
Chloroform	µg/L	59.2	300	380	13	31	308	1610
cis-1,2-Dichloroethene	µg/L	--	--	--	--	--	5.96	22.6
Tetrachloroethene	µg/L	4.29	7 J	12 J	<10	<10	4.75	18.8
trans-1,2-Dichloroethene	µg/L	2.09	--	--	--	--	2.13	8.26
Trichloroethene	µg/L	46.4	99	140	6 J	13	115	518
Vinyl chloride	µg/L	ND	<20	<25	<10	<10	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-15

	Sample Name	MW-15-Y1Q3	MW-15-Y1Q4	MW-15-Y2Q1	MW15NA	MW-15	MW-15-Y2Q3
	Sample Date	8/27/1999	11/3/1999	2/15/2000	3/24/2000	5/17/2000	8/22/2000
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	165	291	522	600	343	389
1,1,2-Trichloroethane	µg/L	4.18	5.72	10.2	11	4.69	5.7
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	39.2	35.2	29	27	16.3	24.7
Chloroform	µg/L	1270	1020	1060	1400	704	848
cis-1,2-Dichloroethene	µg/L	12.4	10.8	14.3	14	6.96	12
Tetrachloroethene	µg/L	10	8.46	6.91	12	3.96	7.18
trans-1,2-Dichloroethene	µg/L	4.29	4.08	4.54	5	2.29	4.17
Trichloroethene	µg/L	331	299	299	360	154	234
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-15

	Sample Name	MW-15-Y2Q4	MW15RD74	MW15-77	MW-15-SARA-GW01	MW15-75	MW-15-IS-4
	Sample Date	11/7/2000	10/27/2004	11/21/2005	5/15/2007	11/7/2007	4/15/2008
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	147	273 J	273	78	2.47	2.15
1,1,2-Trichloroethane	µg/L	2.6	10.5	6.09	3.7	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	12.8	58.2	13.4	31	25	16
Chloroform	µg/L	224	1530	489	810	186	106
cis-1,2-Dichloroethene	µg/L	4.75	46.3	15	27	10.6	5.99
Tetrachloroethene	µg/L	2.84	14.4	2.98	14	6.32	7.19
trans-1,2-Dichloroethene	µg/L	1.73	10.1	3.1	5.8	3.67	2.02
Trichloroethene	µg/L	65.9	403	133	330	145	104
Vinyl chloride	µg/L	<1	<1	2.81 J	<1	0.313	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-15

	Sample Name	MW-15-TSVE-GW	MW-15-IS-5	MW-15-IS-6	MW-15-IS-7	MW-015-ODLA-1	MW-15
	Sample Date	8/19/2008	10/16/2008	4/20/2009	10/13/2009	3/26/2010	4/26/2011
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	0.988	4.61	0.963	24.5 J	11.8	0.239 J
1,1,2-Trichloroethane	µg/L	<1	0.593 J	<1	0.905 J	0.283 J	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	6.35	2.51	0.513 J	2.97	1.81	0.288 J
Chloroform	µg/L	33.4	29.9	0.524	31.1 J	14.7	3.21
cis-1,2-Dichloroethene	µg/L	3.07	2.54	<1	1.69	0.796 J	<1
Tetrachloroethene	µg/L	2.99	1.16	0.612 J	1.13	0.85 J	0.442 J
trans-1,2-Dichloroethene	µg/L	0.731	<1	<1	0.332 J	<1	<1
Trichloroethene	µg/L	44.2	22.9	0.289 J	27	13.8	2.02
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-15

Analyte	Sample Name / Sample Date	Unit	MW-15 4/19/2012	MW-15 10/17/2012	MW-15 4/12/2013	MW-15 10/10/2013	MW-15 4/25/2014	MW-15 4/10/2015	MW-15 4/24/2016	MW-15 4/22/2017
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	1.34	2.29	1.25	1.25	1.22	1.08	0.505	0.311
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.62 J	0.539 J	0.598 J	0.478 J	0.66 J	0.352 J	0.474 J	0.293 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.724 J	1.07	0.549 J	0.537 J	0.492 J	0.434 JB	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-28

Analyte	Sample Name / Sample Date	Unit	MW-28 11/19/1993	MW-28 2/7/1996	MW-28 4/19/2012	MW-28 10/16/2012	MW-28 4/13/2013	MW-28 10/10/2013	MW-28 4/11/2015	MW-28 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	ND	ND	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	ND	ND	<0.3	0.154 J	0.332	0.476	0.251 J	0.149 J
cis-1,2-Dichloroethene		µg/L	--	--	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	ND	ND	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	ND	ND	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-31

	Sample Name	MW31	MW312	MW313ADD	MW314	MW315	MW-31-Y1Q1	MW-31-Y1Q2
	Sample Date	11/19/1993	6/20/1997	9/24/1997	3/24/1998	10/15/1998	2/3/1999	5/25/1999
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	96	<10	10 J	97	33	3.22	<1
1,1,2-Trichloroethane	µg/L	6.48	<10	<20	4 J	<25	<1	<1
1,1-Dichloroethene	µg/L	52.4	29	47	26	14 J	7.86	33.3
Carbon tetrachloride	µg/L	4.81	1 J	8 J	3 J	<25	1.51	<1
Chloroform	µg/L	21.1	10	49	21 J	16 J	7.22	<1
cis-1,2-Dichloroethene	µg/L	--	--	--	--	--	58.9	4.78
Tetrachloroethene	µg/L	95.4	67	110	66	42	4.25	7.55
trans-1,2-Dichloroethene	µg/L	164	--	--	--	--	22.2	2.14
Trichloroethene	µg/L	1110	78	220	400	380	140	23.9
Vinyl chloride	µg/L	ND	<10	<20	<25	<25	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-31

	Sample Name	MW-31-Y1Q3	MW-31-Y1Q4	MW-31-Y2Q1	MW31NA	MW-31	MW-31-Y2Q3
	Sample Date	8/27/1999	11/3/1999	2/15/2000	3/23/2000	5/17/2000	8/23/2000
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	7.9	5.98	9.89	8	22.3	<1
Carbon tetrachloride	µg/L	0.59 J	<1	<1	<1	<1	0.4 J
Chloroform	µg/L	1.66	0.92 J	1.19	0.5 J	1.29	<1
cis-1,2-Dichloroethene	µg/L	4.34	5.09	6.89	0.6 J	15.5	12.3
Tetrachloroethene	µg/L	1.31	0.9 J	0.64 J	1 J	1.16	2.08
trans-1,2-Dichloroethene	µg/L	4.66	2.52	3.37	0.3 J	7.78	<1
Trichloroethene	µg/L	33.7	18	25.6	4	49.5	68.1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-31

	Sample Name	MW-31-Y2Q4	MW-31_010214	MW-31-Y3S2-B	MW-31-2_020410	MW-31-2_021002	MW-31-2
	Sample Date	11/7/2000	2/14/2001	10/3/2001	4/10/2002	10/2/2002	4/8/2003
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	14.8	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	1.2	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	31.5	7.98	31.2	39.5	55.4	5.37
Carbon tetrachloride	µg/L	<1	2.76	1.25	<1	0.88 J	<1
Chloroform	µg/L	<1	25.1	1.61	<1	1.08	<1
cis-1,2-Dichloroethene	µg/L	4.24	148	5.53	6.78	17	2.06
Tetrachloroethene	µg/L	0.92 J	5.02	4.19	1.24	1.32	0.92
trans-1,2-Dichloroethene	µg/L	4.53	49.3	4.83	5.34	11.3	1.53
Trichloroethene	µg/L	18.5	241	38.1	33.1	87.5	13.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-31

	Sample Name	MW-31-2_031028	MW31 (77.5-79.5)	MW-31	MW31 77.5-79.5	MW-31	MW-31
	Sample Date	10/28/2003	4/29/2004	8/12/2004	10/20/2004	6/17/2005	11/18/2005
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1.7	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1.7	<1	<1	<1
1,1-Dichloroethene	µg/L	8.38	40	26 B	17	24.9	27.8
Carbon tetrachloride	µg/L	<1	0.24 J	<1.7	<1 J	<1	<1
Chloroform	µg/L	<1	0.32 J	<1.7	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	<1	0.56 J	<1.7	0.58 J	0.814 J	<1
Tetrachloroethene	µg/L	<1	2.2	0.59 J	0.42 J	0.547 J	0.755 J
trans-1,2-Dichloroethene	µg/L	<1	0.47 J	<1.7	0.31 J	0.595 J	<1
Trichloroethene	µg/L	2.32	16	5.5	4.7	8.48	8.86
Vinyl chloride	µg/L	<1	<1	<1.7 J	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-31

	Sample Name	MW-31	MW-31T	MW-31-77.1-IS-2	MW-31-77.1-IS-3	MW-31-77.1-IS-4
	Sample Date	4/12/2006	10/18/2006	4/9/2007	10/5/2007	4/11/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<0.5	<0.5	0.262 J	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	29.6	30.6	12.5	7.73	7.17
Carbon tetrachloride	µg/L	<1	<1	0.451 J	0.48 J	0.368 J
Chloroform	µg/L	<1	0.131 J	0.458	0.398	0.802
cis-1,2-Dichloroethene	µg/L	1.56	<1	7.32	8.45	2.87
Tetrachloroethene	µg/L	1.35	7.58	1.45	0.887 J	0.916 J
trans-1,2-Dichloroethene	µg/L	1.4	<1	5.44	5.23	1.51
Trichloroethene	µg/L	4.99	3.85	30.2	5.87	3.21
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-31

	Sample Name	MW-31-76.95-IS-5	MW-31-76.95-IS-6	MW-31-IS-7	MW-031-ODLA-1	MW-31	MW-31
	Sample Date	10/17/2008	4/14/2009	10/14/2009	3/26/2010	4/26/2011	4/19/2012
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	7.36	35	28.8	30.9	1.17	2.55
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.219 J	0.186 J	0.161 J	0.16 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	0.26 J	0.273 J	<1	<1	<1
Tetrachloroethene	µg/L	3.17	43.5	41.2	22.7	2.47	4.75
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	4.34	33.4	29	20.4	2.15	4.87
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-31

	Sample Name	MW-31	MW-31	MW-31	MW-31	MW-31	MW-31	MW-31	MW-31
	Sample Date	10/16/2012	4/13/2013	10/10/2013	4/26/2014	10/19/2014	4/9/2015	10/6/2015	4/25/2016
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	0.526	<0.5 UJ	1.61	0.273 J	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	0.902 J	2.36	1.91	4.94	<1	5.78	2.44	5.03
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.145 J	0.175 J	0.183 J	<0.3	0.185 J	0.155 J	0.229 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	2.71	3.46	5.32	8.55	<1	9.96	5.58	7.3
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.66	4.76	7.15	10.2	<1	11.6	6.42	11.9
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-31

	Sample Name	MW-31	MW-31
	Sample Date	10/17/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	13	16.2
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.188 J	0.203 J
cis-1,2-Dichloroethene	µg/L	<1	0.35 J
Tetrachloroethene	µg/L	20.3	25.1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	23.4	32.4
Vinyl chloride	µg/L	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW442	MW443	MW444	MW445	MW-44-Y1Q1	MW-44-Y1Q2	MW-44-Y1Q3
	Sample Date	6/20/1997	9/25/1997	3/27/1998	10/17/1998	2/2/1999	5/25/1999	8/26/1999
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<10	<10	<10	<10	<1	<1	<10
1,1,2-Trichloroethane	µg/L	<10	<10	<10	<10	<1	<1	<10
1,1-Dichloroethene	µg/L	<10	<10	<10	<10	<1	<1	<10
Carbon tetrachloride	µg/L	6 J	6 J	4 J	<10	<1	<1	<10
Chloroform	µg/L	6 J	<10	4 J	<10	<1	<1	<10
cis-1,2-Dichloroethene	µg/L	--	--	--	--	<1	<1	<10
Tetrachloroethene	µg/L	<10	<10	<10	<10	<1	<1	<10
trans-1,2-Dichloroethene	µg/L	--	--	--	--	<1	<1	<10
Trichloroethene	µg/L	4 J	5 J	3 J	<10	<1	<1	<10
Vinyl chloride	µg/L	<10	<10	<10	<10	<1	<1	<10

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW-44-Y1Q4	MW-44-Y2Q1	MW-44	MW-44-Y2Q3	MW-44-Y2Q4	MW-44-Y3S2-C
	Sample Date	11/2/1999	2/15/2000	5/16/2000	8/24/2000	11/8/2000	10/3/2001
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1	1.29
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	2.3	5.3	2.1	6.47
Chloroform	µg/L	<1	<1	1.88	3.62	1.23	5.04
cis-1,2-Dichloroethene	µg/L	<1	<1	0.65 J	1.35	0.622 J	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	1.36	4.92	0.79 J	2.77
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW-44-3_020410	MW-44-3_021001	MW-44-1	MW-44-1_031028	MW44 (69-71)	MW-44
	Sample Date	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/29/2004	8/14/2004
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	4.36	4.39	3.65	1.96	1.3	0.8 J
Chloroform	µg/L	2.81	2.8	2.19	1.15	0.91 J	0.4 J
cis-1,2-Dichloroethene	µg/L	1.1	1.01	0.84	<1	0.35 J	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1 J	<1
Trichloroethene	µg/L	2.05	1.67	1.64	0.82 J	0.75 J	0.28 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW44 69-71	MW-44	MW-44	MW-44	MW-44	MW-44-69-IS-2	MW-44-69-IS-3
	Sample Date	10/21/2004	6/16/2005	11/17/2005	4/13/2006	10/19/2006	4/9/2007	10/5/2007
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.71 J	<1	1.01	<1	1.2	1.24	1.2
Chloroform	µg/L	0.64 J	<1	<1	<1	0.467	0.694	0.63
cis-1,2-Dichloroethene	µg/L	0.27 J	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.55 J	<1	<1	<1	0.366 J	0.688 J	0.467 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW-44-69-IS-4	MW-44-69.75-IS-5	MW-44-69.75-IS-6	MW-44-IS-7	MW-044-ODLA-1	MW-44
	Sample Date	4/11/2008	10/20/2008	4/14/2009	10/15/2009	3/26/2010	4/26/2011
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.823 J	0.708 J	0.5 J	0.822 J	<1	<1
Chloroform	µg/L	0.567	0.366	0.266 J	0.213 J	<0.3	0.17 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.599 J	0.665 J	0.252 J	<1	0.426 J	0.579 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

Analyte	Sample Name / Sample Date	Unit	MW-44 4/20/2012	MW-44 4/14/2013	MW-44 5/9/2013	MW-44 4/27/2014	MW-44 10/19/2014	MW-44 4/9/2015	MW-44 10/6/2015	MW-44 5/23/2016
1,1,2,2-Tetrachloroethane		µg/L	<0.5	1.21	1.33	1.37	0.914	0.693	0.463 J	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	0.827 J	0.678 J	0.584 J	0.361 J	<1	<1	<1
Chloroform		µg/L	2.84	13.6	12.3	8.1	6.38	4.44	3.13	2.69
cis-1,2-Dichloroethene		µg/L	<1	0.547 J	0.633 J	0.405 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	0.398 J	0.329 J	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.03	6.98	6.55	4.31	3.11	2.15	1.45	1.03
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-44

	Sample Name	MW-44	MW-44
	Sample Date	10/17/2016	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	0.28 J
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	3.87	3.97
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	1.71	1.83
Vinyl chloride	µg/L	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 6/20/1997	MW-54 9/25/1997	MW-54 3/28/1998	MW-54 10/16/1998	MW-54 2/3/1999	MW-54 5/25/1999	MW-54 8/26/1999	MW-54 11/3/1999
1,1,2,2-Tetrachloroethane		µg/L	<10	<10	<10	<10	<1	<1	<10	40.1
1,1,2-Trichloroethane		µg/L	<10	<10	<10	<10	<1	<1	<10	1.15
1,1-Dichloroethene		µg/L	<10	<10	<10	<10	<1	<1	<10	<1
Carbon tetrachloride		µg/L	<10	1 J	2 J	<10	<1	3.53	12.8	5.02
Chloroform		µg/L	<10	<10	1 J	<10	<1	<1	5.04	2.54
cis-1,2-Dichloroethene		µg/L	--	--	--	--	3.6	3.9	10.3	24.1
Tetrachloroethene		µg/L	<10	2 J	2 J	<10	<1	<1	<10	0.68 J
trans-1,2-Dichloroethene		µg/L	--	--	--	--	<1	<1	<10	1.4
Trichloroethene		µg/L	58	150	180	79	60.6	61	50	30.6
Vinyl chloride		µg/L	<10	<10	<10	<10	<1	<1	<10	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 2/15/2000	MW-54 3/23/2000	MW-54 5/17/2000	MW-54 8/22/2000	MW-54 11/7/2000	MW-54 10/3/2001	MW-54 4/10/2002	MW-54 10/1/2002
1,1,2,2-Tetrachloroethane		µg/L	23.6	19	<1	4.9	22.7	8.67	9.06	60.1
1,1,2-Trichloroethane		µg/L	0.9 J	1	<1	0.56 J	1.24	<1	1.19	<10
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<10
Carbon tetrachloride		µg/L	14.7	19	4.46	7.97	8.65	7.7	2.96	5.58 J
Chloroform		µg/L	12.4	18	5.54	13.8	19.8	6.87	8.84	11.6
cis-1,2-Dichloroethene		µg/L	22.5	30	7.08	14.9	34.6	31.4	43.7	85.9
Tetrachloroethene		µg/L	0.94 J	5	<1	0.74 J	0.91 J	1.89	2.06	<10
trans-1,2-Dichloroethene		µg/L	2.01	4	<1	1.39	2.58	5.28	9.95	16.2
Trichloroethene		µg/L	43.3	50	11.6	28.1	29.2	259	723	920
Vinyl chloride		µg/L	<1	0.1 J	<1	<1	<1	<1	<1	<10

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 4/8/2003	MW-54 11/18/2003	MW-54 2/4/2004	MW-54 4/7/2004	MW-54 4/29/2004	MW-54 8/14/2004	MW-54 10/21/2004	MW-54 1/27/2005
1,1,2,2-Tetrachloroethane		µg/L	44.1	301	2180	1350	2000	2300	4700	3000
1,1,2-Trichloroethane		µg/L	<10	7.86	9.85	6.63	<67	<100	<140	6 J
1,1-Dichloroethene		µg/L	<10	<1	<1	<1	<67	<100	<140	<10
Carbon tetrachloride		µg/L	7.48	3.35	5.79	3.94	<67	<100	<140	<10
Chloroform		µg/L	1.82	3.68	5.4	3.93	<67	<100	<140	<10
cis-1,2-Dichloroethene		µg/L	44.3	85.3	83.4	61.2	64 J	65 J	70 J	23
Tetrachloroethene		µg/L	4.02	7.37	14.2	8.36	<67	<100	<140	<10
trans-1,2-Dichloroethene		µg/L	8.76	4.16	20.4	13	54 J	<100	<140	2.9 J
Trichloroethene		µg/L	72.4	216	2230	1530 J	2000	2200	2700	300
Vinyl chloride		µg/L	<10	<1	0.441 J	<1	<67	<100	<140	<10

Notes:
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µg/L micrograms per liter
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 3/23/2005	MW-54 6/17/2005	MW-54 11/18/2005	MW-54 4/13/2006	MW-54 4/26/2006	MW-54 10/19/2006	MW-54 4/9/2007	MW-54 10/8/2007
1,1,2,2-Tetrachloroethane		µg/L	2100	1220	853	605	572	572	160	80
1,1,2-Trichloroethane		µg/L	6.1 J	3.68	3.44	3.91	4.54	2.54	0.968 J	<5
1,1-Dichloroethene		µg/L	<8.3	<1	<1	<1	<1	<1	<2.5	<5
Carbon tetrachloride		µg/L	<8.3	0.902 J	1.3	0.944 J	1.08	1.9	2.34 J	5.74
Chloroform		µg/L	3 J	1.52 B	1.46 B	1.14 B	1.68 J	1.45	2	3.17
cis-1,2-Dichloroethene		µg/L	41	35.8	25.4	19.1	26.3	19.6	18.9	19.2
Tetrachloroethene		µg/L	5.8 J	2.77	4.42	2.98	1.63	2.78	3.58	5.06
trans-1,2-Dichloroethene		µg/L	6.5 J	5.94	4.18	4.38	5.65	3.88	4.2	4.48 J
Trichloroethene		µg/L	1300	729	478 J	671	493	604	405	474
Vinyl chloride		µg/L	<8.3	<1	<1	<1	<1 UJ	<1	<2.5	<5

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 4/11/2008	MW-54 10/20/2008	MW-54 6/8/2009	MW-54 10/16/2009	MW-54 3/24/2010	MW-54 6/22/2010	MW-54 9/22/2010	MW-54 1/26/2011
1,1,2,2-Tetrachloroethane		µg/L	171	53.9	842	384	168	83.2	44.9 J	28.5
1,1,2-Trichloroethane		µg/L	0.885 J	0.621 J	4.15	1.49 J	0.599 J	0.312 J	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<2	<2.5	<1	<1	<1	<1
Carbon tetrachloride		µg/L	6.76	4.37	0.745 J	<2.5	<1	<1	<1	<1
Chloroform		µg/L	3.85	9.78	3.15	1.25	0.663	0.366	0.286 J	0.422
cis-1,2-Dichloroethene		µg/L	17.4	15.7	25.9	10.7	4.7	2.5	2.65	1.11
Tetrachloroethene		µg/L	3.88	2.46	5.01	2.52	1.77	1.12	1.28	1.31
trans-1,2-Dichloroethene		µg/L	4.42	3.13	4.1	1.39 J	0.657 J	0.308 J	<1	<1
Trichloroethene		µg/L	348	350	744	381	170	93.6	60	55.6
Vinyl chloride		µg/L	<1	<1	<2	<2.5	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 4/25/2011	MW-54 9/26/2011	MW-54 4/18/2012	MW-54 10/17/2012	MW-54 5/9/2013	MW-54 10/10/2013	MW-54 4/26/2014	MW-54 10/19/2014
1,1,2,2-Tetrachloroethane		µg/L	2.45	1.64	2.87	2.54	1.85	1.47	2.11	2.53
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.304	0.692	0.521	0.354	0.23 J	0.246 J	0.196 J	0.255 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	0.274 J
Tetrachloroethene		µg/L	0.616 J	0.537 J	0.48 J	0.377 J	0.295 J	0.436 J	0.464 J	0.497 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	8.73	4.4	8.74	7.74	6.51	5.02	6.51	10
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-54

Analyte	Sample Name / Sample Date	Unit	MW-54 4/8/2015	MW-54 10/6/2015	MW-54 4/25/2016	MW-54 10/16/2016	MW-54 4/22/2017
1,1,2,2-Tetrachloroethane		µg/L	2.2	1.13	<0.5	<0.5	0.448 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	0.347	0.344	<0.3	<0.3	0.321
cis-1,2-Dichloroethene		µg/L	0.292 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.411 J	0.379 J	<1	<1	0.282 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Trichloroethene		µg/L	10.4	5.33	<1	<1	1.74
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, reporting limit is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-57

	Sample Name	MW-57	MW-57-Y2Q1	MW-57	MW-57-Y2Q3	MW-57-Y2Q4	MW-57-Y3S2-B
	Sample Date	3/15/1999	2/16/2000	5/17/2000	8/22/2000	11/7/2000	10/3/2001
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<10	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<10	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<10	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	14	39.9	50.6	45.7	48.3	37.5
Chloroform	µg/L	6 J	13.2	10.3	11.3	8.93	28
cis-1,2-Dichloroethene	µg/L	--	<1	<1	0.53 J	0.411 J	0.97 J
Tetrachloroethene	µg/L	2 J	5.38	5.1	5.86	5.07	5.24
trans-1,2-Dichloroethene	µg/L	--	1.55	1.51	1.83	1.5	1.73
Trichloroethene	µg/L	22	50.8	46.5	49.2	30.9	77.4
Vinyl chloride	µg/L	<10	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-57

	Sample Name	MW-57-2_020410	MW-57-2_021001	MW-57-2	MW-57-2_031028	MW57 (67-69)	MW57 66.8-68.8
	Sample Date	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/29/2004	10/21/2004
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<3.3	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<3.3	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<3.3	<1
Carbon tetrachloride	µg/L	42.8	43	42.4	33.3	33	19
Chloroform	µg/L	15.1	29.7	15.6	18.2	5.7	6.1
cis-1,2-Dichloroethene	µg/L	0.55 J	1.13	0.68	<1	<3.3	0.27 J
Tetrachloroethene	µg/L	6.08	8.14	7.86	5.32	5	2.7
trans-1,2-Dichloroethene	µg/L	1.88	2.27	1.37	1.45	0.46 J	0.58 J
Trichloroethene	µg/L	66.4	54.1	73.3	71.6	48	29
Vinyl chloride	µg/L	<1	<1	<1	<1	<3.3	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-57

	Sample Name	MW57RD67	MW-57	MW-57	MW-57	MW-57	MW-57-66.6-IS-2
	Sample Date	10/28/2004	6/14/2005	11/18/2005	4/12/2006	10/20/2006	4/10/2007
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	23.7	20.6	17.1	23	31	29.6
Chloroform	µg/L	9.29	4.94 B	4.75 B	3.25 B	5.67	6.6
cis-1,2-Dichloroethene	µg/L	0.340 J	<1	<1	<1	0.294 J	0.325 J
Tetrachloroethene	µg/L	2.96	2.6	2.3	2.81	4.02	5.06
trans-1,2-Dichloroethene	µg/L	0.799 J	<1	<1	0.419 J	0.659 J	0.684 J
Trichloroethene	µg/L	35.9	19	17.6	18	28.7	34.6
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-57

	Sample Name	MW-57-SARA-GW01	MW-57-66.6-IS-3	MW-57-66.6-IS-4	MW-57-TSVE-GW	MW-57-68.32-IS-5
	Sample Date	5/15/2007 9:35:00 AM	10/5/2007	4/14/2008	8/19/2008	10/17/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	28	22.9	11.1	6.04	4.23
Chloroform	µg/L	5.8	6.29	3.32	12.6	15.9
cis-1,2-Dichloroethene	µg/L	0.33	0.371 J	<1	<1	<1
Tetrachloroethene	µg/L	4.3	4.48	3.03	2.18	1.82
trans-1,2-Dichloroethene	µg/L	0.58	0.719 J	<1	0.386	0.358 J
Trichloroethene	µg/L	29	31.2	19.4	29.2	30.4
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-57

	Sample Name	MW-57-68.32-IS-6	MW-57-IS-7	MW-057-ODLA-1	MW-57	MW-57	MW-57	MW-57
	Sample Date	4/15/2009	10/13/2009	3/26/2010	4/26/2011	4/19/2012	10/17/2012	4/12/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	0.538 J	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	1.82	0.9 J	<1	<1	<1	<1	<1
Chloroform	µg/L	73	67.4	50.7 J	20.3	8.11	9.57	6.97
cis-1,2-Dichloroethene	µg/L	1.44	1.48	1.03	0.409 J	<1	<1	<1
Tetrachloroethene	µg/L	1.17	0.841 J	0.27 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	0.567 J	0.31 J	<1	<1	<1	<1	<1
Trichloroethene	µg/L	28.7	20.3	7.57	1.84	0.961 J	1.1	0.916 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-57

	Sample Name	MW-57	MW-57	MW-57	MW-57	MW-57	MW-57
	Sample Date	10/10/2013	4/25/2014	4/10/2015	4/24/2016	4/22/2017	10/6/2017
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	0.272 J	0.382 J
Chloroform	µg/L	2.52	1.71	0.653	0.396	0.324	0.659
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.77 J	1.03	0.843 JB	2.1	5.61	6.04
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-58

	Sample Name	MW-58	MW-58-Y2Q1	MW-58	MW-58-Y2Q3	MW-58-Y2Q4	MW-58_010219	MW-58-Y3S2
	Sample Date	3/15/1999	2/16/2000	5/17/2000	8/22/2000	11/7/2000	2/19/2001	10/3/2001
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<10	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<10	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<10	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<10	<1	<1	0.26 J	<1	0.43 J	<1
Chloroform	µg/L	<10	3.68	5.88	2.42	1.91	2.05	1.85
cis-1,2-Dichloroethene	µg/L	--	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<10	<1	<1	0.41 J	<1	0.4 J	<1
trans-1,2-Dichloroethene	µg/L	--	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<10	4.36	4.22	1.44	2.72	2.47	1.78
Vinyl chloride	µg/L	<10	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-58

	Sample Name	MW-58-1_020410	MW-58-1_021001	MW-58-1	MW-58-1_031028	MW58 (64.5-66.5)
	Sample Date	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/28/2004
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	2.75	3.36	1.47	<1	1.1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	0.57	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.46	1.82	1.06	<1	0.41 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-58

	Sample Name	MW58-66	MW58-66.5	MW-58-IS-7	MW-58	MW-58	MW-58	MW-58
	Sample Date	11/21/2005	11/8/2007	10/15/2009	4/28/2011	4/12/2013	4/11/2015	4/23/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<0.5	0.213 J	<0.5	<0.5	0.394 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	0.81 J	0.946 J	0.277 J	0.307 J	<1
Chloroform	µg/L	1.99	8.89	0.149 J	<0.3	0.343	0.606	0.894
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	0.309 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.67 J	0.321	<1	0.26 J	1.7	1.23	0.727 J
Vinyl chloride	µg/L	<1J	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-67

	Sample Name	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67
	Sample Date	2/16/2000	10/3/2001	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/29/2004	10/21/2004
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1 J	<1
Trichloroethene	µg/L	1.26	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-67

	Sample Name	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67	MW-67
	Sample Date	6/17/2005	12/8/2005	4/12/2006	10/19/2006	4/10/2007	10/5/2007	4/11/2008	10/20/2008
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<0.5 J	<0.5	<0.5	<0.5	0.251 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1 J	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	0.292 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-67

	Sample Name	MW-67	MW-67	MW-67	MW-67	MW-67
	Sample Date	4/14/2009	10/15/2009	4/14/2013	4/11/2015	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-68

Analyte	Sample Name / Sample Date	Unit	MW-68 5/18/2000	MW-68 8/23/2000	MW-68 11/8/2000	MW-68 2/14/2001	MW-68 10/3/2001	MW-68 4/10/2002	MW-68 10/1/2002	MW-68 4/8/2003
1,1,2,2-Tetrachloroethane		µg/L	<1	6.55	<1	<1	4.15	1.01	<1	<1
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	9.01	<1	9.01	<1
Carbon tetrachloride		µg/L	0.89 J	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	6.44	<1	<1	<1	3.5	<1	7.88	<1
cis-1,2-Dichloroethene		µg/L	13.7	31	1.9	4.38	3.12	<1	<1	<1
Tetrachloroethene		µg/L	2.07	8.35	0.4 J	0.92 J	4.3	<1	4.3	<1
trans-1,2-Dichloroethene		µg/L	13.1	9.36	1.4	4.14	0.78 J	<1	<1	<1
Trichloroethene		µg/L	44.5	48.9	3.21	9.67	6.56	<1	3.85	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-68

	Sample Name	MW-68	MW-68	MW-68	MW-68	MW-68	MW-68	MW-68	MW-68
	Sample Date	10/28/2003	4/29/2004	10/21/2004	6/15/2005	11/17/2005	4/12/2006	10/19/2006	4/11/2007
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	0.85 J	81	1.52 B	<1	<1	5.67	1.45
1,1,2-Trichloroethane	µg/L	<1	<2.5	<33	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	1.5	<33	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	0.21 J	<33 J	<1	<1	<1	0.951 J	<1
Chloroform	µg/L	<1	0.78 J	<33	<1	<1	0.564 B	1.57	0.263 J
cis-1,2-Dichloroethene	µg/L	<1	<2.5	<33	<1	<1	<1	1.06	0.473 J
Tetrachloroethene	µg/L	<1	2.1	<33	<1 J	<1	0.696 J	1.63	0.506 J
trans-1,2-Dichloroethene	µg/L	<1	<2.5	<33	<1	<1	<1	0.544 J	0.261 J
Trichloroethene	µg/L	<1	1.4	20 J	0.512 J	<1	0.608 J	5.76	2.58
Vinyl chloride	µg/L	<1	<2.5	<33	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-68

Analyte	Sample Name / Sample Date	Unit	MW-68 5/17/2007	MW-68 10/8/2007	MW-68 4/14/2008	MW-68 8/20/2008	MW-68 10/17/2008	MW-68 4/14/2009	MW-68 10/14/2009	MW-68 4/19/2012
1,1,2,2-Tetrachloroethane		µg/L	5.5	1.51	0.24 B	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	ND	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	ND	<1	<1	<1	0.727 J	1.82	1.16	<1
Carbon tetrachloride		µg/L	ND	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.43	0.775	<0.3	<0.3	<0.3	0.147 J	0.159 J	<0.3
cis-1,2-Dichloroethene		µg/L	4.2	2.36	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.69	0.738 J	<1	<1	0.482 J	1.75	1.55	<1
trans-1,2-Dichloroethene		µg/L	1.3	0.585 J	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	14	4.73	0.36 J	<1	0.573 J	1.41	1.16	<1
Vinyl chloride		µg/L	ND	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-68

	Sample Name	MW-68	MW-68	MW-68	MW-68	MW-68
	Sample Date	4/13/2013	4/26/2014	4/10/2015	5/23/2016	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	0.137 J	0.137 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
ND Not Detected, RL unavailable
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-69

	Sample Name	MW-69-Y2Q1	MW-69	MW-69-Y2Q3	MW-69-Y2Q4	MW69-94.2FT	MW-69-Y3S2-B
	Sample Date	2/16/2000	5/18/2000	8/24/2000	11/9/2000	1/8/2001	10/3/2001
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	4.36	<1	0.6 J	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	0.73 J	<1	<1	0.3 J	<1
Chloroform	µg/L	<1	3.56	<1	2.12	1	<1
cis-1,2-Dichloroethene	µg/L	4.11	31.2	2.26	23.1	11	<1
Tetrachloroethene	µg/L	1.76	4.87	0.68 J	6.39 J	4	<1
trans-1,2-Dichloroethene	µg/L	2.26	19.1	0.86 J	12.3	5	<1
Trichloroethene	µg/L	99.2	642	50.4	464	350	1.01
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-69

	Sample Name	MW-69-2_020410	MW-69-2_021002	MW-69-2	MW-69-2_031028	MW69 (91-93)
	Sample Date	4/10/2002	10/2/2002	4/8/2003	10/28/2003	4/29/2004
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	1.52	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	7.92	<1	<1	<1	<1
Tetrachloroethene	µg/L	1.84	0.98 J	1.94	<1	0.55 J
trans-1,2-Dichloroethene	µg/L	4.14	<1	<1	<1	<1
Trichloroethene	µg/L	128	8.12	2.18	<1	0.47 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-69

	Sample Name	MW69 91.4-93.4	MW-69	MW-69	MW-69	MW-69T	MW-69-88.2-IS-2
	Sample Date	10/21/2004	6/15/2005	11/16/2005	4/12/2006	10/20/2006	4/11/2007
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	5.51	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1 J	<1	<1	<1	<1	<1
Chloroform	µg/L	0.17 J	<1	<1	<1	0.261 J	0.144 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	0.348 J	<1
Tetrachloroethene	µg/L	1.5	0.951 J	<1	4.72	2.03	0.898 J
trans-1,2-Dichloroethene	µg/L	<1 R	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.7	2.47	<1	3.85	9.84	0.879 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-69

Analyte	Sample Name / Sample Date	Unit	MW-69-88.2-IS-3 10/8/2007	MW-69-88.2-IS-4 4/14/2008	MW-69-89.64-IS-5 10/17/2008	MW-69-89.64-IS-6 4/15/2009	MW-69-IS-7 10/14/2009
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	0.229 J	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1
Chloroform		µg/L	0.136 J	<0.3	0.147 J	0.206 J	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	1.03	0.658 J	0.67 J	0.308 J	0.271 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	0.88 J	1.74	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-69

	Sample Name	MW-069-ODLA-1	MW-69	MW-69	MW-69	MW-69	MW-69	MW-69
	Sample Date	3/26/2010	4/26/2011	4/20/2012	4/13/2013	4/25/2014	4/10/2015	4/24/2016
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.161 J	0.203 J	<0.3	<0.3	0.182 J	0.205 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	0.433 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-69

	Sample Name	MW-69
	Sample Date	4/23/2017
Analyte	**Unit**	
1,1,2,2-Tetrachloroethane	µg/L	<0.5
1,1,2-Trichloroethane	µg/L	<1
1,1-Dichloroethene	µg/L	<1
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	<1
trans-1,2-Dichloroethene	µg/L	<1
Trichloroethene	µg/L	0.956 J
Vinyl chloride	µg/L	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
R Unusable

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-70

Analyte	Sample Name / Sample Date	Unit	MW-70 2/15/2000	MW-70 3/24/2000	MW-70 5/18/2000	MW-70 8/24/2000	MW-70 11/10/2000	MW-70 1/8/2001	MW-70 10/3/2001	MW-70 4/10/2002
1,1,2,2-Tetrachloroethane		µg/L	4830	310	342	930	3370	390	766	2540
1,1,2-Trichloroethane		µg/L	39.4	4	3.93	15.2	16	2	<1	7.35
1,1-Dichloroethene		µg/L	0.61 J	<1	<1	<1	<1	<1	<1	0.98 J
Carbon tetrachloride		µg/L	3.48	0.4 J	0.64 J	2.46	1.81	0.4 J	<1	<1
Chloroform		µg/L	18.2	2	5.18	8.46	9.37	1 J	<1	3.99
cis-1,2-Dichloroethene		µg/L	522	46	54.8	211	292	9	92.8 J	69.2
Tetrachloroethene		µg/L	89.7	13	5.35	35.8	32.5 J	2	<1	3.27
trans-1,2-Dichloroethene		µg/L	149	14	12	50.4	57.3	5	<1	27.3
Trichloroethene		µg/L	11700	1100	720	4240	4040	590	2340	2940
Vinyl chloride		µg/L	1.88	0.2 J	<1	0.62 J	1.69	8	<1	17

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-70

Analyte	Sample Name / Sample Date	Unit	MW-70 10/2/2002	MW-70 4/8/2003	MW-70 10/28/2003	MW-70 4/29/2004	MW-70 8/14/2004	MW-70 10/21/2004	MW-70 10/22/2004	MW-70 6/14/2005
1,1,2,2-Tetrachloroethane		µg/L	7980	3060	8270	8500	3500	4200	5800	6410
1,1,2-Trichloroethane		µg/L	<50	<50	6.92	<250	<120	<170	<140	8.88
1,1-Dichloroethene		µg/L	<50	<50	<1	<250	<120	<170	<140	<5
Carbon tetrachloride		µg/L	<50	<50	0.64 J	<250	<120	<170 J	<140	<5
Chloroform		µg/L	<50	<50	2.5	<250	<120	<170	<140	<5
cis-1,2-Dichloroethene		µg/L	72.4	31.6	50	120 J	<120	<170	41 J	67.8
Tetrachloroethene		µg/L	<50	<50	3.85	<250	<120	<170	<140	6.3 J
trans-1,2-Dichloroethene		µg/L	<50	<50	3.91	<250	<120	<170	<140	6.31
Trichloroethene		µg/L	1980	824	2530	3700	970	1100	2100	361
Vinyl chloride		µg/L	<50	<50	10.3	<250	<120	<170	<140	18.1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-70

Analyte	Sample Name / Sample Date	Unit	MW-70 11/19/2005	MW-70 4/12/2006	MW-70 10/20/2006	MW-70 4/11/2007	MW-70 10/8/2007	MW-70 4/14/2008	MW-70 10/17/2008	MW-70 4/15/2009
1,1,2,2-Tetrachloroethane		µg/L	2990	7670	9200	627	455	270	0.883	1.98
1,1,2-Trichloroethane		µg/L	6.65 J	6.15	25.7	2.17	14.7	1.11 J	<1	<1
1,1-Dichloroethene		µg/L	1.07	3.36	1.89	1.75	2.48	1.71 J	<1	<1
Carbon tetrachloride		µg/L	<10	<1	0.575 J	<1	<2	<2.5	<1	<1
Chloroform		µg/L	2.12 B	1.52 B	3.79	1.08	0.461 J	<0.75	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	70.5	48.1	122	58.5	8.01	14.2	<1	<1
Tetrachloroethene		µg/L	4.84	16.5	29.5	8.16	4.44	1.53 J	0.876 J	0.58 J
trans-1,2-Dichloroethene		µg/L	15.8	16.6	19.7	5.48	11.5	4.74	<1	<1
Trichloroethene		µg/L	2420	2130	3390	750	308	86	1.96	4.95
Vinyl chloride		µg/L	29.5	94.2	64.2	94.3	42.3	13.5	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-70

Analyte	Sample Name / Sample Date / Unit	MW-70 7/30/2009	MW-70 10/15/2009	MW-70 3/25/2010	MW-70 6/22/2010	MW-70 9/22/2010	MW-70 1/26/2011	MW-70 4/25/2011	MW-70 9/27/2011
1,1,2,2-Tetrachloroethane	µg/L	0.594	0.971	<0.5	1.03	1.07 J	1.05	0.415 J	0.669
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	0.174 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.582 J	0.71 J	1.04	1.3	1.25	1.21	0.716 J	1.03
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.66	1.93	0.581 J	4.11	3.78	3.09	2	1.64
Vinyl chloride	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-70

Analyte	Sample Name / Sample Date	Unit	MW-70 4/19/2012	MW-70 4/13/2013	MW-70 4/25/2014	MW-70 4/10/2015	MW-70 4/24/2016	MW-70 4/23/2017	MW-70 10/6/2017
1,1,2,2-Tetrachloroethane		µg/L	0.505	<0.5	<0.5	<0.5	<0.5	1.08	0.477 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.166 J	0.187 J	0.148 J	0.24 J	<0.3	0.215 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.768 J	0.642 J	0.562 J	0.786 J	0.731 J	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.34	0.988 J	0.378 J	0.27 JB	0.676 J	5.69	3.71
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

	Sample Name	MW-71-Y2Q1	MW71NA	MW-71	MW-71-Y2Q3	MW-71-Y2Q4	MW-71-Y3S2-B
	Sample Date	2/15/2000	3/24/2000	5/18/2000	8/23/2000	11/9/2000	10/3/2001
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	97.7	180	181	168	78.4	268
1,1,2-Trichloroethane	µg/L	3.21	5 J	4.54	4.04	2.99	5.17 J
1,1-Dichloroethene	µg/L	<1	<10	<1	<1	<1	<1
Carbon tetrachloride	µg/L	53.9	47	34	32.9	26.5	22.6
Chloroform	µg/L	996	1600	1080	989	605 J	857
cis-1,2-Dichloroethene	µg/L	11.5	14	9.98	8.94	6.49	9.09 J
Tetrachloroethene	µg/L	10	15	7.35	7.02	4.09 J	<1
trans-1,2-Dichloroethene	µg/L	4.7	5 J	3.72	2.94	2.29	2.91 J
Trichloroethene	µg/L	330	390	239	247	95.6	186
Vinyl chloride	µg/L	<1	<10	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

Analyte	Sample Name / Sample Date	Unit	MW-71-2_020410 4/10/2002	MW-71-2_021002 10/2/2002	MW-71-2 4/8/2003	MW-71-2_031028 10/28/2003	MW71 (74.4-76.4) 4/29/2004
1,1,2,2-Tetrachloroethane		µg/L	68.1	9.49	7.62	27	3.8
1,1,2-Trichloroethane		µg/L	6	<1	0.66	<1	<2
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<2
Carbon tetrachloride		µg/L	20.3	11.2	17.6	6.87	8.2
Chloroform		µg/L	828	8.89	35.4	88.8	56
cis-1,2-Dichloroethene		µg/L	9.64	1.12	1.59	1.59	0.98 J
Tetrachloroethene		µg/L	1.96	<1	1.31	<1	0.54 J
trans-1,2-Dichloroethene		µg/L	3.36	<1	0.52	<1	<2
Trichloroethene		µg/L	70.9	27	44.5	17.4	6.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<2

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

	Sample Name	MW71 73.86-75.86	MW71RD73	MW-71	MW-71	MW-71	MW-71
	Sample Date	10/21/2004	10/28/2004	6/14/2005	11/16/2005	4/12/2006	10/20/2006
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	6	4.27	25.8	27.6	26.3	22.9
1,1,2-Trichloroethane	µg/L	<1	<1	0.634 J	0.924 J	0.766 J	1.16
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	5.6 J	9.9	12.8	14	16.3	37.8
Chloroform	µg/L	28	17.5	103	94.2	73.5	303
cis-1,2-Dichloroethene	µg/L	0.7 J	0.59 J	1.86	10.6	10.6	11.7
Tetrachloroethene	µg/L	0.4 J	0.61 J	1.58	2.1	2.65	7.34
trans-1,2-Dichloroethene	µg/L	<1	<1	0.532 J	<1	0.977 J	3.07
Trichloroethene	µg/L	12	6.95	34.9	47.9	54	158 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

	Sample Name	MW-71-72.3-IS-2	MW-71-72.3-IS-3	MW-71-72.3-IS-4	MW-71-74.28-IS-5	MW-71-74.28-IS-6
	Sample Date	4/11/2007	10/8/2007	4/14/2008	10/17/2008	4/15/2009
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	4.66	2.21	1.72	5.32	4.42
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	16.5	12.6	7.66	5.94	0.683 J
Chloroform	µg/L	59.2	32.6	17.3	27.2	8.79
cis-1,2-Dichloroethene	µg/L	1.89	1.65	0.523 J	0.717 J	0.262 J
Tetrachloroethene	µg/L	3.03	1.52	0.715 J	0.856 J	0.265 J
trans-1,2-Dichloroethene	µg/L	0.59 J	0.36 J	<1	<1	<1
Trichloroethene	µg/L	36.2	21	9.37	12.7	3.93
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

Analyte	Sample Name / Sample Date	Unit	MW-71-IS-7 10/14/2009	MW-071-ODLA-1 3/26/2010	MW-71 4/26/2011	MW-71 4/19/2012	MW-71 4/13/2013	MW-71 4/25/2014	MW-71 4/10/2015
1,1,2,2-Tetrachloroethane		µg/L	7.97	8.26	0.892	0.953	0.58	0.362 J	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.301 J	<1	<1	0.53 J	0.452 J	0.445 J	0.442 J
Chloroform		µg/L	3.79	1.47	29.3	10.6	8.06	7.05	5.59
cis-1,2-Dichloroethene		µg/L	<1	<1	0.531 J	<1	<1	<1	0.35 J
Tetrachloroethene		µg/L	<1	<1	<1	0.264 J	<1	0.323 J	0.372 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.23	0.612 J	4.48	3.02	2.39	2.47	3.05
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-71

	Sample Name	MW-71	MW-71
	Sample Date	4/24/2016	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	0.252 J	<1
Chloroform	µg/L	5.08	2.13
cis-1,2-Dichloroethene	µg/L	0.599 J	<1
Tetrachloroethene	µg/L	0.367 J	0.308 J
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	1.98	1.03
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-76

Analyte	Sample Name / Sample Date	Unit	MW-76 1/8/2001	MW-76 2/14/2001	MW-76 10/3/2001	MW-76 4/10/2002	MW-76 10/1/2002	MW-76 4/8/2003	MW-76 10/28/2003
1,1,2,2-Tetrachloroethane		µg/L	2300	694	332	15.5	54.7	8.92	8.08
1,1,2-Trichloroethane		µg/L	2	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	1	<1	<1	1.22	<1	1.44	<1
cis-1,2-Dichloroethene		µg/L	58	17.8	4.67 J	13.5	2.94	5.98	4.16
Tetrachloroethene		µg/L	5	3.98	<1	1.81	1.8	7.43	2.29
trans-1,2-Dichloroethene		µg/L	19	6.84	7.57 J	7.71	1.17	4.74	1.93
Trichloroethene		µg/L	840	276	72.2	90.7	37.2	78.9	33.8
Vinyl chloride		µg/L	0.3 J	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-76

Analyte	Sample Name / Sample Date	Unit	MW-76 4/29/2004	MW-76 8/16/2004	MW-76 10/21/2004	MW-76 6/15/2005	MW-76 11/17/2005	MW-76 4/12/2006	MW-76 10/20/2006
1,1,2,2-Tetrachloroethane		µg/L	3.6	2.9	4.3	4.98 B	<1	18.3	2.58
1,1,2-Trichloroethane		µg/L	<1	<2	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<2	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<2	<1 J	<1	<1	<1	<1
Chloroform		µg/L	0.23 J	0.47 J	0.18 J	<1	<1	<1	0.208 J
cis-1,2-Dichloroethene		µg/L	0.95 J	6.9	0.69 J	<1	<1	<1	0.263 J
Tetrachloroethene		µg/L	1.4	1.8 J	0.27 J	0.854 J	1.14	2.36	1.84
trans-1,2-Dichloroethene		µg/L	0.44 J	3.5	0.24 J	<1	<1	<1	<1
Trichloroethene		µg/L	4	34	8.9	3.88	5.16 B	7.71	4.9
Vinyl chloride		µg/L	<1	<2	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-76

Analyte	Sample Name / Sample Date	Unit	MW-76 4/10/2007	MW-76 10/8/2007	MW-76 4/14/2008	MW-76 10/17/2008	MW-76 4/14/2009	MW-76 7/30/2009	MW-76 10/15/2009	MW-76 3/25/2010
1,1,2,2-Tetrachloroethane		µg/L	3.82	18.4	77	9.41	0.864	1.11	1.38	0.525
1,1,2-Trichloroethane		µg/L	<1	<1	0.303 J	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.359	0.978	0.915	0.167 J	0.152 J	0.146 J	<0.3	0.134 J
cis-1,2-Dichloroethene		µg/L	3.08	11.8	13.2	0.406 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	2.74	4.82	4.44	1.35	0.444 J	0.444 J	0.35 J	<1
trans-1,2-Dichloroethene		µg/L	1.41	5.79	3.59	<1	<1	<1	<1	<1
Trichloroethene		µg/L	26.4	132	336 J	15	2.74	3.26	2.27	1.35
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1 UJ	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-76

Analyte	Sample Name / Sample Date	Unit	MW-76 6/22/2010	MW-76 9/22/2010	MW-76 1/26/2011	MW-76 4/25/2011	MW-76 9/27/2011	MW-76 4/19/2012	MW-76 4/13/2013	MW-76 4/26/2014
1,1,2,2-Tetrachloroethane		µg/L	0.378 J	1.07	0.853	0.294 J	0.276 J	0.398 J	0.284 J	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1 UJ	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.139 J	0.138 J	<0.3	0.15 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.361 J	0.376 J	0.322 J	<1	0.3 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.41	2.51	1.79	0.833 J	0.717 J	0.923 J	0.624 J	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-76

	Sample Name	MW-76	MW-76	MW-76
	Sample Date	4/10/2015	5/23/2016	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	0.237 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.207 J	0.153 J	0.183 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.442 JB	0.321 J	0.777 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

	Sample Name	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77
	Sample Date	1/8/2001	10/3/2001	4/10/2002	10/1/2002	4/8/2003	11/18/2003	4/29/2004
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	2900	1820	4330	18200	30000	12800	15000
1,1,2-Trichloroethane	µg/L	8	<1	9.46	<50	<50	8.53	<620
1,1-Dichloroethene	µg/L	<10	<1	<1	<50	<50	<1	<620
Carbon tetrachloride	µg/L	0.6 J	<1	<1	<50	<50	0.86 J	<620
Chloroform	µg/L	4 J	<1	5.39	<50	<50	4.96	<620
cis-1,2-Dichloroethene	µg/L	130	76.4 J	176	237	230	189	170 J
Tetrachloroethene	µg/L	6	<1	7.18	<50	<50	14.8	<620
trans-1,2-Dichloroethene	µg/L	33	20.1 J	42.2	42.9 J	42.2	37.8	<620
Trichloroethene	µg/L	2500	1620	3170	5040	5320	4550	5400
Vinyl chloride	µg/L	0.4 J	<1	<1	<50	<50	<1	<620

Notes:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

Analyte	Sample Name / Sample Date	Unit	MW-77 8/15/2004	MW-77 10/21/2004	MW-77 6/15/2005	MW-77 11/16/2005	MW-77 4/12/2006	MW-77 4/26/2006	MW-77 10/20/2006
1,1,2,2-Tetrachloroethane		µg/L	11000	4700	2290 J	14000	21700	16700	14300
1,1,2-Trichloroethane		µg/L	<330	<250	<20	18.7	15.7	14.6	17.4
1,1-Dichloroethene		µg/L	<330	<250	<20	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<330	<250 J	<20	0.961 J	1.12	1.05	0.922 J
Chloroform		µg/L	<330	<250	<20	2.58 B	4.32 B	5.05 J	4.77
cis-1,2-Dichloroethene		µg/L	94 J	64 J	100	107	154	154	151
Tetrachloroethene		µg/L	<330	<250	16.8 J	21.1	48	22.2	46.9
trans-1,2-Dichloroethene		µg/L	<330	<250	24.1	15.5	38.5	36.3	19.1
Trichloroethene		µg/L	3200	1700	2100	5300	5520	5170	6500
Vinyl chloride		µg/L	<330	<250	<20	<1	<1	<1 UJ	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

	Sample Name	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77
	Sample Date	4/10/2007	10/8/2007	4/14/2008	10/17/2008	4/15/2009	7/30/2009	10/15/2009	3/25/2010
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	8800	1980	566	2010	28.3	27.2	47.5	5.34
1,1,2-Trichloroethane	µg/L	<50	2.59	<20	2.3	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<50	<1	<20	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<50	<1	<20	<1	<1	<1	<1	<1
Chloroform	µg/L	<15	0.822	<6	0.573	0.13 J	0.153 J	0.175 J	0.179 J
cis-1,2-Dichloroethene	µg/L	67.5	22.1	7.13 J	13.2	0.447 J	0.52 J	0.94 J	<1
Tetrachloroethene	µg/L	21 J	17	<20	4.62	1.49	0.619 J	0.685 J	0.4 J
trans-1,2-Dichloroethene	µg/L	<50	2.16	<20	0.709 J	<1	<1	<1	<1
Trichloroethene	µg/L	3330	1290	309	796	21.9	23.6	36.7	5.68
Vinyl chloride	µg/L	<50	<1	<20	<1	<1	<1	<1 UJ	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

	Sample Name	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77	MW-77
	Sample Date	6/22/2010	9/22/2010	1/26/2011	4/25/2011	9/27/2011	4/19/2012	10/17/2012	5/9/2013
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	19.6	20.4	25	22	16.9	6.01	6.48	7.45
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1 UJ	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.181 J	0.238 J	0.234 J	0.325	0.425	0.509	0.62	0.426
cis-1,2-Dichloroethene	µg/L	0.558 J	0.592 J	0.516 J	0.746 J	0.442 J	<1	0.264 J	0.381 J
Tetrachloroethene	µg/L	0.585 J	0.405 J	0.452 J	0.353 J	0.369 J	0.478 J	0.411 J	0.447 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	22.8	23.6	23.7	31.1	21.2	8.48	13	15.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

Analyte	Sample Name / Sample Date	Unit	MW-77 10/10/2013	MW-77 4/26/2014	MW-77 10/19/2014	MW-77 4/10/2015	MW-77 10/6/2015	MW-77 4/24/2016	MW-77 10/16/2016	MW-77 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	5.76	4.54	1.76	1.45	1.61	1.34	0.981	1.59
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.41	0.188 J	0.21 J	0.334	0.285 J	0.309	0.284 J	0.295 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.371 J	0.47 J	0.623 J	0.583 J	0.627 J	0.543 J	0.38 J	0.294 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	15.6	9.64	6.03	3.61	5.09	3.51	3	4.37
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-77

	Sample Name	MW-77
	Sample Date	10/6/2017
Analyte	**Unit**	
1,1,2,2-Tetrachloroethane	µg/L	0.705
1,1,2-Trichloroethane	µg/L	<1
1,1-Dichloroethene	µg/L	<1
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	0.307
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	0.293 J
trans-1,2-Dichloroethene	µg/L	<1
Trichloroethene	µg/L	2.4
Vinyl chloride	µg/L	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-78

	Sample Name	MW-78	MW-78-Y3S2-C	MW-78-3_020410	MW-78-3_021001	MW-78-1
	Sample Date	2/14/2001	10/3/2001	4/10/2002	10/1/2002	4/8/2003
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-78

	Sample Name	MW-78-1_031028	MW78 (62-64)	MW78 61.8-63.8	MW78-58	MW78-59	MW-78-IS-6
	Sample Date	10/28/2003	4/29/2004	10/21/2004	11/17/2005	11/8/2007	4/21/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	5.2	0.74 J	<1	<1	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1 J	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<1	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	0.7 J	<1	<1	<1	<1
Trichloroethene	µg/L	<1	0.36 J	0.59 J	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1 UJ	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-78

	Sample Name	MW-78-ODLA-1	MW-78	MW-78	MW-78	MW-78
	Sample Date	3/29/2010	4/28/2011	4/12/2013	4/10/2015	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	0.307 JB	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-79

Analyte	Sample Name / Sample Date	Unit	MW-79 2/15/2001	MW-79 2/19/2001	MW-79 10/3/2001	MW-79 4/10/2002	MW-79 10/1/2002	MW-79 4/8/2003	MW-79 10/28/2003	MW-79 4/29/2004
1,1,2,2-Tetrachloroethane		µg/L	<1	3.34	<1	<1	<10	<1	<1	<1
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<10	<1	<1	<1
1,1-Dichloroethene		µg/L	48	30.1	37.6	18.8	23.8	35.8	23.9	9.4
Carbon tetrachloride		µg/L	0.1 J	<1	<1	<1	<10	<1	<1	<1
Chloroform		µg/L	1.7	<1	<1	<1	<10	<1	<1	0.21 J
cis-1,2-Dichloroethene		µg/L	6.1	2.52	0.88 J	0.68 J	8.67 J	0.86	2.07	1.7
Tetrachloroethene		µg/L	34	14	6.85	6.96	3.26 J	5.64	2.1	2.1
trans-1,2-Dichloroethene		µg/L	2.2	<1	0.96 J	1.09	9	1.31	1.61	2 J
Trichloroethene		µg/L	26	9.6	8.8	9	68.4	15.2	12.4	8.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<10	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-79

Analyte	Sample Name / Sample Date	Unit	MW-79 8/13/2004	MW-79 10/22/2004	MW-79 1/26/2005	MW-79 3/22/2005	MW-79 6/16/2005	MW-79 11/18/2005	MW-79 4/13/2006	MW-79 10/18/2006
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	7.6 B	7.8	9.1	10	13.1	16.6	11.4	10.6
Carbon tetrachloride		µg/L	0.77 J	0.42 J	0.22 J	0.3 J	<1	<1	<1	<1
Chloroform		µg/L	<1	0.29 J	<1	0.28 B	<1	<1	<1	<0.3
cis-1,2-Dichloroethene		µg/L	1.9	3	1	2.4	1.59	<1	<1	<1
Tetrachloroethene		µg/L	1.7	1.8	1.2	1.2	1.17	1.01	<1	0.47 J
trans-1,2-Dichloroethene		µg/L	1.6	3	1.1	2.3	1.28	<1	<1	<1
Trichloroethene		µg/L	14	9.5	7.5	16	9.99	3.69	1.94	1.63
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-79

Analyte	Sample Name / Sample Date	Unit	MW-79 4/10/2007	MW-79 10/8/2007	MW-79 4/11/2008	MW-79 10/20/2008	MW-79 6/8/2009	MW-79 10/16/2009	MW-79 3/25/2010	MW-79 6/22/2010
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	30.4	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	11.2	13.7	10	4.17	1.17	3.99	17.9	26.4
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1 UJ
Chloroform		µg/L	<0.3	<0.3	<0.3	0.127 J	<0.3	<0.3	0.152 J	0.228 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	0.438 J
Tetrachloroethene		µg/L	1.06	1.14	0.917 J	0.914 J	0.536 J	1.38	26.6	50.8
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.9	3.27	7.5	0.948 J	0.501 J	1.25	16.9	39
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-79

Analyte	Sample Name / Sample Date / Unit	MW-79 9/23/2010	MW-79 1/25/2011	MW-79 4/25/2011	MW-79 9/27/2011	MW-79 4/18/2012	MW-79 10/17/2012	MW-79 4/13/2013	MW-79 10/10/2013
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	35.7	28.7	25.3	25.3	10.1	2.71	4.71	1.93
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.17 J	0.211 J	0.155 J	1.31	0.233 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	25	18.1	12.2	15.4	12.1	4.06	6.35	3.6
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	20.2	17.3	14.7	19.7	10.3	3.12	6.07	2.67
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-79

Analyte	Sample Name / Sample Date / Unit	MW-79 4/28/2014	MW-79 10/18/2014	MW-79 4/9/2015	MW-79 10/6/2015	MW-79 5/23/2016	MW-79 10/17/2016	MW-79 4/23/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	2.28	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	3.27	2.2	2.7	7.37	7.47	7.2	4.72
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.167 J	0.126 J	0.202 J	0.155 J	0.164 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.07	3.59	5.51	12.8	11.5	13.6	7.64
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.66	2.95	4.61	11.1	13	12.7	7.53
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-80

	Sample Name	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80
	Sample Date	2/15/2001	2/19/2001	10/3/2001	4/10/2002	10/1/2002	4/8/2003	10/28/2003	4/29/2004
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
Chloroform	µg/L	<1	<1	1.07	<1	<1	<1	<1	<1 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1 J

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-80

	Sample Name	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80	MW-80
	Sample Date	8/17/2004	10/22/2004	11/17/2005	11/8/2007	4/20/2012	4/11/2013	4/10/2015	4/23/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<0.3	0.329	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1 UJ	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-87

	Sample Name	MW87-80.3FT	MW87RD74	MW87-77	MW87-68	MW-87-IS-6	MW-87-IS-7	MW-087-ODLA-1
	Sample Date	1/8/2001	10/27/2004	11/21/2005	11/9/2007	4/23/2009	10/13/2009	3/26/2010
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	140	10.2 J	86.6	180	0.939	7.09	12
1,1,2-Trichloroethane	µg/L	6	0.799 J	3.59	6.67	<1	<1	0.653 J
1,1-Dichloroethene	µg/L	0.2 J	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	32	18.7 J	8.18	7.16	<1	<1	<1
Chloroform	µg/L	6	6.03 J	3.88	6.25	0.148 J	0.471	1.04
cis-1,2-Dichloroethene	µg/L	210	49.5 J	65.4	91.2	<1	0.391 J	1.38
Tetrachloroethene	µg/L	2	1.45 J	0.95 J	0.676	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	17	5.40 J	3.49	4.6	<1	<1	<1
Trichloroethene	µg/L	150	105 J	64.2	91.4	<1	0.778 J	2
Vinyl chloride	µg/L	0.9 J	<1	<1 UJ	0.272	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-87

Analyte	Sample Name / Sample Date	Unit	MW-87 4/26/2011	MW-87 7/19/2011	MW-87 4/19/2012	MW-87 10/17/2012	MW-87 4/12/2013	MW-87 10/10/2013	MW-87 4/25/2014	MW-87 10/18/2014
1,1,2,2-Tetrachloroethane		µg/L	1.49	1.54	0.207 J	<0.5	<0.5	<0.5	<0.5	0.671
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	0.287 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	3.04	3.05	0.53	0.377	0.254 J	3.46	19.3	56.2 J
cis-1,2-Dichloroethene		µg/L	0.398 J	0.547 J	<1	<1	0.32 J	<1	2.01	6.71
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.273 J	0.379 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.985 J	0.897 J	<1	<1	<1	0.677 J	2.74	4.16
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-87

	Sample Name	MW-87	MW-87	MW-87	MW-87	MW-87	MW-87
	Sample Date	4/11/2015	10/6/2015	4/24/2016	10/16/2016	4/22/2017	10/6/2017
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	0.904	1.5	1.91	2.41	1.18	1.89
1,1,2-Trichloroethane	µg/L	0.578 J	0.713 J	1.19	2.29	1.55	2.4
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	63.1	49.5	59.8	70.1	100	110
cis-1,2-Dichloroethene	µg/L	8.82	4.91	5.81	5.84	7.57	9.48
Tetrachloroethene	µg/L	0.358 J	0.345 J	0.421 J	0.286 J	0.463 J	0.432 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	0.293 J	0.298 J
Trichloroethene	µg/L	4.16	3.38	7.04	5.3	7.32	8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
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UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-91

	Sample Name	MW91RD68	MW91-68	MW91-69	MW-91-IS-6	MW-91-IS-7	MW-91	MW-91
	Sample Date	10/27/2004	11/21/2005	11/7/2007	4/22/2009	10/14/2009	4/28/2011	4/19/2012
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	0.26 J	<1	0.92	0.678	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	9.35 J	4.8 J	3.29	0.449 J	0.479 J	0.391 J	<1
Chloroform	µg/L	13.4 J	4.72	25.6	0.538	1.83	2.86	0.633
cis-1,2-Dichloroethene	µg/L	1.19 J	0.46 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	1.18 J	0.72 J	0.594	0.677 J	0.494 J	0.305 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	12.7 J	6.01	13.8	<1	0.567 J	1.41	<1
Vinyl chloride	µg/L	<1	<1 UJ	<1	<1 UJ	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-91

	Sample Name	MW-91	MW-91	MW-91	MW-91	MW-91
	Sample Date	4/12/2013	4/25/2014	4/10/2015	4/24/2016	4/22/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5 J	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.926	0.301	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.251 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.332 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-126

Analyte	Sample Name / Sample Date	Unit	MW-126 10/1/2002	MW-126 4/8/2003	MW-126 10/28/2003	MW-126 4/29/2004	MW-126 10/22/2004	MW-126 11/17/2005	MW-126 11/7/2007	MW-126 4/18/2012
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<1	0.12 J	<1	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1 UJ	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-126

	Sample Name	MW-126	MW-126	MW-126
	Sample Date	4/12/2013	4/11/2015	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-129

	Sample Name	MW-129	MW-129	MW-129	MW-129	MW-129	MW-129	MW-129	MW-129
	Sample Date	7/28/2003	10/28/2003	4/29/2004	10/22/2004	11/22/2005	11/8/2007	4/19/2012	4/13/2013
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<2.5	0.19 J	<1	<0.5	<0.5 UJ
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<2.5	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	41	42	27	32	36	32.7	13.7	16.8
Carbon tetrachloride	µg/L	<1	<1	<1	<2.5	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<2.5	<1	<1	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	0.27 J	<2.5	0.33 J	0.36	<1	<1
Tetrachloroethene	µg/L	8.85	26.1	9.6	9.2	25.4	30.2	15	18
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<2.5	<1	<1	<1	<1
Trichloroethene	µg/L	9.71	13.4	12	14	19.3	19.1	13.4	14.5
Vinyl chloride	µg/L	<1	<1	<1	<2.5	<1 UJ	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-129

	Sample Name	MW-129	MW-129	MW-129	MW-129
	Sample Date	4/28/2014	4/9/2015	5/23/2016	4/23/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	13.2	13.9	9.47	10.9
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	0.294 J	<1	<1
Tetrachloroethene	µg/L	16.2	18.2	8.61	13.3
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	12.5	15.9	13	15
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-130

Analyte	Sample Name / Sample Date	Unit	MW-130 7/28/2003	MW-130 10/28/2003	MW-130 4/29/2004	MW-130 10/22/2004	MW-130 6/15/2005	MW-130 11/17/2005	MW-130 4/12/2006	MW-130 10/20/2006
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<5	<3.3	<1	<1	<1	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<5	<3.3	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	41.1	42.2	57	35	22.6	28.3	52.8	61.6
Carbon tetrachloride		µg/L	<1	<1	<5	<3.3	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<5	<3.3	<1	<1	<1	0.256 J
cis-1,2-Dichloroethene		µg/L	0.54 J	0.67 J	<5	0.63 J	<1	<1	<1	0.766 J
Tetrachloroethene		µg/L	71.6	80.3	88	63	48.8	57.4	114	112
trans-1,2-Dichloroethene		µg/L	<1	<1	<5 J	<3.3	<1	<1	<1	<1
Trichloroethene		µg/L	54	64	76	50	37.9	43.5	57.7	60.5
Vinyl chloride		µg/L	<1	<1	<5	<3.3	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-130

Analyte	Sample Name / Sample Date	Unit	MW-130 4/10/2007	MW-130 10/5/2007	MW-130 4/11/2008	MW-130 10/20/2008	MW-130 4/15/2009	MW-130 10/15/2009	MW-130 4/19/2012	MW-130 4/13/2013
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	70	74	73.4	80.2	60.3	29 J	25.7	38.6
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.315	0.291 J	0.27 J	0.296 J	0.237 J	0.206 J	0.227 J	0.274 J
cis-1,2-Dichloroethene		µg/L	0.818 J	0.82 J	0.789 J	0.799 J	0.925 J	0.856 J	0.766 J	1.04
Tetrachloroethene		µg/L	154	147	196	140	127	68.5 J	72.5	98.5
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	71.2	67.4	71	71.8	75.1	61.7 J	62.6	79.5
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-130

	Sample Name	MW-130	MW-130	MW-130	MW-130
	Sample Date	4/28/2014	4/11/2015	5/23/2016	4/23/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	22.6	14.3	9.76	9.5
Carbon tetrachloride	µg/L	<1	0.47 J	<1	<1
Chloroform	µg/L	0.219 J	0.317	0.371	0.333
cis-1,2-Dichloroethene	µg/L	0.718 J	0.572 J	0.431 J	0.387 J
Tetrachloroethene	µg/L	60.6	35.6	21.7	22.5
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	58.8	64.7	47	49.1 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-134

Analyte	Sample Name / Sample Date	Unit	MW-134 10/23/2003	MW-134 11/18/2003	MW-134 12/18/2003	MW-134 2/3/2004	MW-134 4/6/2004	MW-134 10/28/2004	MW-134 11/20/2005	MW-134 5/17/2007
1,1,2,2-Tetrachloroethane		µg/L	5.45	859	46.5	44.4	16.4	160	98	240
1,1,2-Trichloroethane		µg/L	<0.5	1.53	<0.5	4.02	0.354 J	11.30 J	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<1	<1	<1	0.29
cis-1,2-Dichloroethene		µg/L	0.329 J	13	1.62	1.52	0.261 J	5.39 J	0.84 J	7.1
Tetrachloroethene		µg/L	0.458 J	<0.5	<0.5	0.394 J	0.756	1.51 J	1.83	3.1
trans-1,2-Dichloroethene		µg/L	0.413 J	3.24	0.647 J	0.644 J	<1	1.95 J	0.41 J	1.8
Trichloroethene		µg/L	4.14	104	32.1	17.7	7.64	169 J	113	150
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1 UJ	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-134

Analyte	Sample Name / Sample Date	Unit	MW-134 11/8/2007	MW-134 4/16/2008	MW-134 8/19/2008	MW-134 10/20/2008	MW-134 4/17/2009	MW-134 10/15/2009	MW-134 7/19/2011	MW-134 4/20/2012
1,1,2,2-Tetrachloroethane		µg/L	4.47	0.717	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<0.3	<0.3	<0.3	<0.3	0.128 J	0.668	0.17 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.42	0.488 J	0.535	0.801 J	0.328 J	0.501 J	0.603 J	0.531 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.03	1.08	<1	<1	2.13	0.262 J	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-134

	Sample Name	MW-134	MW-134	MW-134	MW-134	MW-134	MW-134	MW-134	MW-134
	Sample Date	10/17/2012	4/13/2013	5/9/2013	10/10/2013	4/25/2014	10/19/2014	4/11/2015	10/6/2015
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5 UJ	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.213 J	0.14 J	0.129 J	0.138 J	<0.3	<0.3	0.39
cis-1,2-Dichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.889 J	0.73 J	0.685 J	0.883 J	0.603 J	0.385 J	0.454 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-134

	Sample Name	MW-134	MW-134	MW-134
	Sample Date	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.216 J	<0.3	0.162 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	0.326 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-144

	Sample Name	MW-144	MW-144	MW144RD75	MW-144	MW-144	MW-144	MW-144
	Sample Date	6/9/2004	8/12/2004	10/27/2004	1/27/2005	3/23/2005	6/15/2005	11/14/2005
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	13000	7700	6230 J	4600	7700	5810 J	4970
1,1,2-Trichloroethane	µg/L	--	<250	7.05 J	10 J	14 J	9.64 J	14.1 J
1,1-Dichloroethene	µg/L	<420	<250	<1	<12	<25	<10	<20
Carbon tetrachloride	µg/L	<420	<250	1.47 J	<12	<25	<10	<20
Chloroform	µg/L	<420	<250	2.76 J	3.2 J	4.3 J	<10	<20
cis-1,2-Dichloroethene	µg/L	<420	68 J	74.1 J	69	72	70.2	54.3
Tetrachloroethene	µg/L	<420	<250	7.69 J	10 J	13 J	8.78 J	10.2
trans-1,2-Dichloroethene	µg/L	<420	<250	17.5 J	15	14 J	14.1	<20
Trichloroethene	µg/L	3200	2800	2060	2100	4500	2610	2280
Vinyl chloride	µg/L	<420	<250 J	<1	<12	<25	<10	<20

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-144

Analyte	Sample Name	MW-144	MW144-75_060427	MW-144	MW-144-74.9-IS-2	MW-144-74.9-IS-3
	Sample Date	4/12/2006	4/27/2006	10/19/2006	4/10/2007	10/8/2007
	Unit					
1,1,2,2-Tetrachloroethane	µg/L	5040	4080	2520	1350	841
1,1,2-Trichloroethane	µg/L	9.04	8.94	60.4	20.4	8.75
1,1-Dichloroethene	µg/L	<1	<1	<10	<10	<1
Carbon tetrachloride	µg/L	1.03	0.9 J	<10	<10	1.59
Chloroform	µg/L	2.72 B	3.13	1.45 J	<3	1.7
cis-1,2-Dichloroethene	µg/L	83.9	88.9	98.2	33.5	26.3
Tetrachloroethene	µg/L	19.9 J	16.9	11.4	4.11 J	3.49
trans-1,2-Dichloroethene	µg/L	7.28 J	7.04	19.2	3.39 J	2.24
Trichloroethene	µg/L	2650	2790	1890	694	464
Vinyl chloride	µg/L	<1	<1 UJ	<10	<10	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-144

	Sample Name	MW-144-74.9-IS-4	MW-144-75.68-IS-6	MW-144-IS-7	MW-144-ODLA-1	MW-144	MW-144
	Sample Date	4/11/2008	4/15/2009	10/14/2009	3/26/2010	4/26/2011	4/19/2012
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	79.4	403	301	150	24.1	16.6
1,1,2-Trichloroethane	µg/L	0.461 J	1.06	0.661 J	0.321 J	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	1.77	1.19	0.501	0.316	0.28 J	0.519
cis-1,2-Dichloroethene	µg/L	2.31	12.9	6.81	3.26	1.01	1.05
Tetrachloroethene	µg/L	<1	1.56	1.4	0.918 J	0.851 J	0.829 J
trans-1,2-Dichloroethene	µg/L	<1	2.61	0.676 J	0.445 J	<1	<1
Trichloroethene	µg/L	37.6	179	173	109	43.2	49.6
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-144

	Sample Name	MW-144	MW-144	MW-144	MW-144	MW-144	MW-144	MW-144	MW-144
	Sample Date	10/17/2012	4/13/2013	5/9/2013	10/10/2013	4/26/2014	10/19/2014	4/10/2015	10/6/2015
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	14.7	11 J	5.41	17.5	12.2	9.02	3.13	9.09
1,1,2-Trichloroethane	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.377	0.305 J	0.222 J	0.549	0.36	0.262 J	0.255 J	0.357
cis-1,2-Dichloroethene	µg/L	0.942 J	0.822 J	0.327 J	1.08	0.737 J	0.758 J	0.35 J	0.715 J
Tetrachloroethene	µg/L	0.798 J	0.867 J	0.476 J	0.788 J	0.686 J	0.466 J	0.548 J	0.49 J
trans-1,2-Dichloroethene	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	38.5	32.4 J	14	41.7	30.2	33.2	15.4	32.4
Vinyl chloride	µg/L	<1	<1 UJ	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-144

	Sample Name	MW-144	MW-144	MW-144	MW-144
	Sample Date	5/23/2016	10/17/2016	4/23/2017	10/6/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	8.9	8	8.04	3.57
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.365	0.452	0.406	0.49
cis-1,2-Dichloroethene	µg/L	0.745 J	0.678 J	0.709 J	0.345 J
Tetrachloroethene	µg/L	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	33.2	20.5
Trichloroethene	µg/L	38.2	33	<1	<1
Vinyl chloride	µg/L	<1	<1		

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-145

Analyte	Sample Name / Sample Date	Unit	MW-145 6/8/2004	MW-145 8/16/2004	MW-145 1/27/2005	MW-145 3/23/2005	MW-145 6/17/2005	MW-145 11/17/2005	MW-145 4/13/2006
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1,2-Trichloroethane		µg/L	--	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<1	<1	<1
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-145

	Sample Name	MW-145T	MW-145-86.6-IS-2	MW-145-86.6-IS-3	MW-145-86.6-IS-4	MW-145	MW-145
	Sample Date	10/19/2006	4/9/2007	10/8/2007	4/14/2008	10/20/2008	4/14/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5 J	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1 J	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1 J	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1 J	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1 J	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1 J	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1 J	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-145

	Sample Name	MW-145-IS-7	MW-145-ODLA-1	MW-145	MW-145	MW-145	MW-145	MW-145
	Sample Date	10/15/2009	3/26/2010	4/26/2011	4/19/2012	4/13/2013	4/26/2014	4/9/2015
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	0.274 J	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	0.682 J	0.886 J	0.493 J	0.33 J	0.451 J
Chloroform	µg/L	<0.3	<0.3	0.585	0.927	0.844	0.666	1.25
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	0.425 J	0.639 J	0.713 J	0.438 J	0.917 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-145

	Sample Name	MW-145	MW-145
	Sample Date	4/25/2016	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	0.201 J	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	0.674 J	0.534 J
Chloroform	µg/L	2.99	3.09
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	1.76	1.82
Vinyl chloride	µg/L	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-147

	Sample Name	MW-147	MW-147	MW147RD74	MW-147	MW-147	MW-147	MW-147
	Sample Date	6/10/2004	8/17/2004	10/26/2004	1/27/2005	3/22/2005	6/17/2005	11/18/2005
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	97	56	61.8 J	140	180	251 J	185
1,1,2-Trichloroethane	µg/L	--	<5.6	0.742 J	1.8	2.2	2.62	3.9
1,1-Dichloroethene	µg/L	<5.7	2.2 B	1.23	1.2	2.7	2.07	3.32
Carbon tetrachloride	µg/L	1.8 J	4.3 J	1.5	0.36 J	0.45 J	0.729 J	1.27
Chloroform	µg/L	7.5	12	13.4	3.4	3	5.94 B	5.1 B
cis-1,2-Dichloroethene	µg/L	70	57	60.6	48	39	65.1	95
Tetrachloroethene	µg/L	7.5	5.3 J	5.94	3.4	3.4	4.44	4.83
trans-1,2-Dichloroethene	µg/L	24	20	23.3	12	15	15.9	20.5
Trichloroethene	µg/L	160	120	130	77	73	124	121
Vinyl chloride	µg/L	<5.7	<5.6	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-147

Analyte	Sample Name / Sample Date	Unit	MW-147 4/12/2006	MW-147 10/18/2006	MW-147-73.7-IS-2 4/10/2007	MW-147-73.7-IS-3 10/5/2007	MW-147-73.7-IS-4 4/11/2008
1,1,2,2-Tetrachloroethane		µg/L	311	87.9	634	198	22
1,1,2-Trichloroethane		µg/L	4.36	1.39	9.28	4.47	<1
1,1-Dichloroethene		µg/L	1.76	0.657 J	1.49	5.65	<1
Carbon tetrachloride		µg/L	0.565 J	0.364 J	0.83 J	2.3	<1
Chloroform		µg/L	5.53 B	2.66	7.24	4.6	0.509
cis-1,2-Dichloroethene		µg/L	74.8	41.2	155	120 J	6.15
Tetrachloroethene		µg/L	3.61	3.92	12.2	8.97	7.92
trans-1,2-Dichloroethene		µg/L	14.4	10.3	39.6	28.9	1
Trichloroethene		µg/L	106	81.3	278	169	53.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1

Notes:
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µg/L micrograms per liter
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-147

	Sample Name	MW-147-77-IS-5	MW-147-78.81-IS-6	MW-147-IS-7	MW-147-ODLA-1	MW-147-ODLS-2
	Sample Date	10/17/2008	4/14/2009	10/14/2009	3/26/2010	9/23/2010
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	0.373 J	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.147 J	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.401 J	<1	<1	<1	<1
Tetrachloroethene	µg/L	2.95	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.1	<1	0.313 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-147

Analyte	Sample Name / Sample Date / Unit	MW-147 4/26/2011	MW-147 4/19/2012	MW-147 4/13/2013	MW-147 4/26/2014	MW-147 4/9/2015	MW-147 4/25/2016	MW-147 4/22/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5 UJ	<0.5	<0.5	0.225 J	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.199 J	<0.3	<0.3	0.136 J	0.183 J	0.521	0.144 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
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µg/L micrograms per liter
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-148

Analyte	Sample Name / Sample Date	Unit	MW-148 6/10/2004	MW-148 8/17/2004	MW-148 10/26/2004	MW-148 1/27/2005	MW-148 3/22/2005	MW-148 6/17/2005	MW-148 11/18/2005	MW-148 4/12/2006
1,1,2,2-Tetrachloroethane		µg/L	3.1	0.72 J	5.55	0.63 J	0.37 J	15.4	2.87	2.47
1,1,2-Trichloroethane		µg/L	--	<1	0.42 J	<1	<1	1.03	<1	<1
1,1-Dichloroethene		µg/L	<2.5	<1	<1	<1	<1	0.426 J	<1	<1
Carbon tetrachloride		µg/L	0.45 J	0.73 J	0.58 J	0.19 J	<1	0.583 J	<1	<1
Chloroform		µg/L	1.5 J	0.6 J	2.25	0.88 J	0.58 B	3.07 B	1.3 B	0.861 B
cis-1,2-Dichloroethene		µg/L	29	13	52.3	12	4.8	95.2	23.2	10.4
Tetrachloroethene		µg/L	6.4	3.7	7.83	4.5	3.3	6.44	3.93	2.88
trans-1,2-Dichloroethene		µg/L	11	4.9	21.3	3.8	1.9	26.8	6.4	3.18
Trichloroethene		µg/L	77	31	136	27	13	160	42	21.1
Vinyl chloride		µg/L	<2.5	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-148

	Sample Name	MW-148	MW-148	MW-148	MW-148	MW-148	MW-148	MW-148	MW-148
	Sample Date	10/18/2006	4/10/2007	10/5/2007	4/11/2008	10/17/2008	6/8/2009	10/15/2009	3/24/2010
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	3.72	1.75	3.43	6.92	9.66	0.263 J	0.63	<0.5
1,1,2-Trichloroethane	µg/L	0.316 J	<1	<1	0.252 J	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.267 J	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	1.74	0.473	1.09	1.16	0.665	0.137 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	34.3	5.04	4.58	7.33	6.63	<1	<1	<1
Tetrachloroethene	µg/L	7.53	4.18	3.78	3.59	2.42	0.36 J	<1	<1
trans-1,2-Dichloroethene	µg/L	10.7	1.82	6.68	2.74	1.73	<1	<1	<1
Trichloroethene	µg/L	74.1	7.7	22.7	62.9	107	1.78	0.613 J	0.932 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1 UJ	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-148

Analyte	Sample Name / Sample Date	Unit	MW-148 6/22/2010	MW-148 9/22/2010	MW-148 1/26/2011	MW-148 3/28/2011	MW-148 9/27/2011	MW-148 4/19/2012	MW-148 4/13/2013	MW-148 4/26/2014
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	0.186 J	0.185 J	0.164 J	<0.3	0.125 J	0.137 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	0.254 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

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J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-148

Analyte	Sample Name / Sample Date / Unit	MW-148 4/9/2015	MW-148 4/25/2016	MW-148 4/22/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.177 J	0.192 J	0.136 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	0.262 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-149

Analyte	Sample Name / Sample Date	Unit	MW-149 6/11/2004	MW-149 8/18/2004	MW-149 1/27/2005	MW-149 4/12/2005	MW-149 6/17/2005	MW-149 11/19/2005	MW-149 4/13/2006	MW-149 10/19/2006
1,1,2,2-Tetrachloroethane		µg/L	42	27 J	37	27	50.4	38.3	30.3	23.1
1,1,2-Trichloroethane		µg/L	--	<5	0.87 J	0.64 J	1.66	1.62	1.23	0.686 J
1,1-Dichloroethene		µg/L	<6.7	<5	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	17	12	14	16	15.7	22	12.6	12.9
Chloroform		µg/L	200	110	140	79	64	159	50	95.5
cis-1,2-Dichloroethene		µg/L	4.9 J	3.8 J	4	3.1	20.4	4.36	3.42	7.81
Tetrachloroethene		µg/L	2.7 J	1.6 J	1.8	1.6	1.01	2.13	1.3	1.44
trans-1,2-Dichloroethene		µg/L	<6.7	<5	0.81 J	0.63 J	2.37	2.21	1.48	1.13
Trichloroethene		µg/L	68	38	45	35	68.1	75.4	57.1	45.4
Vinyl chloride		µg/L	<6.7	<5	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-149

Analyte	Sample Name / Sample Date	Unit	MW-149 4/9/2007	MW-149 10/5/2007	MW-149 4/11/2008	MW-149 10/20/2008	MW-149 6/8/2009	MW-149 10/16/2009	MW-149 3/24/2010	MW-149 6/23/2010
1,1,2,2-Tetrachloroethane		µg/L	37.2	9.78	4.1	1.71	8.51	9.93	5.47	15
1,1,2-Trichloroethane		µg/L	1.29	0.346 J	<1	<1	0.355 J	0.387 J	<1	0.69 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	19.8	8.05	6.7	8.17	4.46	6.36	1.78	2.02
Chloroform		µg/L	155	54	29.6	25.6	31.7	70	12.9	41.6
cis-1,2-Dichloroethene		µg/L	9.02	3.1	2.43	1.63	2.24	4.64	4.52	7.22
Tetrachloroethene		µg/L	3.81	1.84	1	0.717 J	0.776 J	1.16	0.718 J	0.651 J
trans-1,2-Dichloroethene		µg/L	1.59	0.536 J	0.675 J	0.378 J	0.382 J	0.662 J	0.679 J	0.595 J
Trichloroethene		µg/L	80.9	30.1	19.1	19.8	24.9	38.6	54.7	35
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-149

Analyte	Sample Name / Sample Date	Unit	MW-149 9/23/2010	MW-149 1/26/2011	MW-149 3/28/2011	MW-149 9/27/2011	MW-149 4/20/2012	MW-149 10/17/2012	MW-149 4/13/2013	MW-149 10/10/2013
1,1,2,2-Tetrachloroethane		µg/L	29.8	24.8	15	12.1	4.89	4.56	2.33	1.39
1,1,2-Trichloroethane		µg/L	1.3	1.07	0.764 J	0.42 J	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	6.98	7.91	4.35	2.26	1.07	0.517 J	0.397 J	0.502 J
Chloroform		µg/L	92.3	94.3	75.2	34.5	13.4	7.37	7.47	5.56
cis-1,2-Dichloroethene		µg/L	17.7	13.2	6.21	3.14	1.74	1.6	1.6	1.1
Tetrachloroethene		µg/L	1.92	2.16	1.55	0.838 J	0.522 J	0.296 J	0.312 J	0.437 J
trans-1,2-Dichloroethene		µg/L	1.54	1.33	0.722 J	0.27 J	<1	<1	<1	<1
Trichloroethene		µg/L	87.9	66.6	38.9	18.4	7.47	4.3	3.58	2.88
Vinyl chloride		µg/L	<1 J	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-149

Analyte	Sample Name / Sample Date	Unit	MW-149 4/26/2014	MW-149 10/18/2014	MW-149 4/9/2015	MW-149 10/6/2015	MW-149 4/25/2016	MW-149 10/17/2016	MW-149 4/22/2017	MW-149 10/5/2017
1,1,2,2-Tetrachloroethane		µg/L	1.54	1.01	0.897	0.547	0.24 J	0.243 J	0.242 J	0.347 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	3.45	3.96	2.57	2.7	4.45	7.84	8.85	14.4
cis-1,2-Dichloroethene		µg/L	0.594 J	0.9 J	0.917 J	1.2	1.45	17.4	9.25	8.36
Tetrachloroethene		µg/L	<1	0.262 J	<1	<1	0.295 J	<1	0.26 J	0.274 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.58	1.92	1.31	1.39	1.03	1.67	1.58	1.68
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-150

Analyte	Sample Name / Sample Date	Unit	MW-150 6/24/2004	MW-150 8/18/2004	MW-150 10/25/2004	MW-150 1/27/2005	MW-150 3/23/2005	MW-150 6/17/2005	MW-150 11/19/2005	MW-150 4/12/2006
1,1,2,2-Tetrachloroethane		µg/L	7600	8000 J	10900 J	6700	6600	4790	3080	2940
1,1,2-Trichloroethane		µg/L	--	<250	5.73 J	6.9 J	5.1 J	9.2 J	16.3	5.7
1,1-Dichloroethene		µg/L	<200	<250	<1	<20	<20	<10	<10	<1
Carbon tetrachloride		µg/L	<200	<250	1.54 J	<20	<20	<10	<10	0.413 J
Chloroform		µg/L	<200	<250	3.35 J	<20	3.3 J	<10	1.36 B	2.09 B
cis-1,2-Dichloroethene		µg/L	76 J	74 J	81.9 J	84	48	57	64.3	74.2
Tetrachloroethene		µg/L	<200	<250	13.6 J	<20	6.4 J	6.77 J	2.47	4.09
trans-1,2-Dichloroethene		µg/L	<200	<250	21.1 J	22	9.1 J	8.83 J	5.78	8.66
Trichloroethene		µg/L	3000	3000	2330 J	690	2000	983	639	747
Vinyl chloride		µg/L	<200	<250	<1	<20	<20	<10	<10	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-150

Analyte	Sample Name / Sample Date	Unit	MW-150 4/26/2006	MW-150 10/19/2006	MW-150 4/9/2007	MW-150 10/8/2007	MW-150 4/11/2008	MW-150 10/20/2008	MW-150 6/8/2009	MW-150 10/16/2009
1,1,2,2-Tetrachloroethane		µg/L	2590	8480	4620	3960	1960	1750	618	406
1,1,2-Trichloroethane		µg/L	6	5.31 J	27	87.2	9.85 J	12.4	3.21 J	0.716 J
1,1-Dichloroethene		µg/L	<1	0.619 J	0.687 J	<25	<20	0.992 J	<5	<2.5
Carbon tetrachloride		µg/L	0.31 J	<10	<25	<25	<20	<1	<5	<2.5
Chloroform		µg/L	2 J	2.22	1.92	<7.5	1.43 J	5	<1.5	0.913
cis-1,2-Dichloroethene		µg/L	54	77.1	56.2	81.3	37.3	22.4	6.26	1.27 J
Tetrachloroethene		µg/L	4.02	7.13 J	6.54 J	18.9 J	8.1 J	5.22	3.36 J	1.1 J
trans-1,2-Dichloroethene		µg/L	10.3	9.79 J	24.3	11.6 J	<20	1.28	<5	<2.5
Trichloroethene		µg/L	1120	2910	3060	2470	80.6 J	636	311	49.4
Vinyl chloride		µg/L	0.37 J	<10	0.83 J	<25	<20	<1	<5	<2.5

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
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UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-150

Analyte	Sample Name / Sample Date	Unit	MW-150 3/24/2010	MW-150 6/22/2010	MW-150 9/22/2010	MW-150 1/26/2011	MW-150 3/28/2011	MW-150 9/26/2011	MW-150 4/19/2012	MW-150 10/17/2012
1,1,2,2-Tetrachloroethane		µg/L	34.7	4.98	0.917	11.4	9.89	15.5	3.4	2.64
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.246 J	0.222 J	0.16 J	0.178 J	0.16 J	0.878	1.55	0.746
cis-1,2-Dichloroethene		µg/L	0.453 J	<1	<1	<1	0.304 J	0.757 J	0.263 J	<1
Tetrachloroethene		µg/L	0.711 J	0.888 J	0.976 J	0.678 J	0.836 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	16.1	2.44	0.515 J	13.5	15.6	28.1	13.9	6.94
Vinyl chloride		µg/L	0.416 J	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-150

Analyte	Sample Name / Sample Date	Unit	MW-150 4/13/2013	MW-150 5/9/2013	MW-150 10/10/2013	MW-150 4/26/2014	MW-150 10/18/2014	MW-150 4/8/2015	MW-150 10/6/2015	MW-150 4/25/2016
1,1,2,2-Tetrachloroethane		µg/L	16.9 J	16.4	13.8	7.72	0.795	1.76	3.14	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.698	0.695	0.574	0.473	<0.3	0.209 J	0.377	0.471
cis-1,2-Dichloroethene		µg/L	0.803 J	1.01	0.743 J	0.366 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	0.275 J	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	48.2	47.7	33.6	16.3	2.29	7.42	9.5	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-150

	Sample Name	MW-150	MW-150	MW-150
	Sample Date	10/16/2016	4/22/2017	10/5/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	0.214 J	2.57
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.412	0.563	0.642
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	0.936 J	7.71
Vinyl chloride	µg/L	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-151

Analyte	Sample Name / Sample Date	Unit	MW-151 8/16/2004	MW-151 10/26/2004	MW-151 1/25/2005	MW-151 3/22/2005	MW-151 6/17/2005	MW-151 11/17/2005	MW-151 11/19/2005	MW-151 4/13/2006
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	0.23 J	0.28 J	<1	<1	<1	<1
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	25.5	<1	<1
Carbon tetrachloride		µg/L	2.7	3.44	4.7	5.3	0.939 J	<1	4.78	4.47
Chloroform		µg/L	3.3	6.72	10	11	2.69 B	0.15 J	8.04	11.4
cis-1,2-Dichloroethene		µg/L	0.22 J	0.446 J	0.92 J	0.96 J	<1	<1	1	1.22
Tetrachloroethene		µg/L	<1	<1	0.4 J	0.48 J	<1	1.69	0.415 J	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	0.25 J	<1	<1	<1	<1
Trichloroethene		µg/L	2.2	3.67	6.3	7.2	1.31	7.31	4.67 B	8.75
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1 UJ	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-151

Analyte	Sample Name / Sample Date	Unit	MW-151 10/18/2006	MW-151 4/9/2007	MW-151 10/5/2007	MW-151 4/14/2008	MW-151 10/20/2008	MW-151 6/8/2009	MW-151 10/16/2009	MW-151 3/23/2010
1,1,2,2-Tetrachloroethane		µg/L	1.42	0.68	0.408 J	0.468 J	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	6.19	5.53	3.9	4.77	0.564 J	0.774 J	1.43	0.967 J
Chloroform		µg/L	16.9	12.5	12.4	15.5	1.34	1.81	2.92	2.93
cis-1,2-Dichloroethene		µg/L	1.45	1.24	1.29	1.42	<1	<1	0.416 J	0.369 J
Tetrachloroethene		µg/L	0.621 J	0.588 J	0.859 J	0.639	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	0.282 J	0.274 J	0.304 J	0.613 J	<1	<1	<1	<1
Trichloroethene		µg/L	10.5	11.1	16.8	20.1	2.62	5.1	8.06	9.9
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-151

Analyte	Sample Name / Sample Date	Unit	MW-151 6/23/2010	MW-151 9/23/2010	MW-151 1/25/2011	MW-151 3/28/2011	MW-151 9/27/2011	MW-151 4/19/2012	MW-151 10/17/2012	MW-151 4/13/2013
1,1,2,2-Tetrachloroethane		µg/L	<0.5	0.315 J	0.846	1.92	2.45	4.26	3.61	2.74 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.765 J	0.735 J	0.766 J	1.29	1.18	2.67	1.42	0.892 J
Chloroform		µg/L	2.67	2.36	4.65	12.3	16.3	37.4	23.9	14.5
cis-1,2-Dichloroethene		µg/L	0.309 J	0.309 J	0.61 J	1.24	0.998 J	1.93	1.17	0.87 J
Tetrachloroethene		µg/L	<1	<1	<1	0.286 J	0.3 J	0.793 J	0.507 J	0.398 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	0.262 J	<1	<1
Trichloroethene		µg/L	8.21	7.24	7.69	10.8	10.5	19.1	11.4	8.14
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-151

Analyte	Sample Name / Sample Date	Unit	MW-151 10/10/2013	MW-151 4/27/2014	MW-151 10/19/2014	MW-151 4/8/2015	MW-151 10/6/2015	MW-151 4/25/2016	MW-151 10/17/2016	MW-151 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	2.48	1.36	0.96	0.584	0.439 J	0.296 J	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.709 J	0.396 J	0.328 J	<1	<1	<1	<1	<1
Chloroform		µg/L	10.6	6.45	5.38	4.07	3.22	3.19	2.56	1.78
cis-1,2-Dichloroethene		µg/L	0.801 J	0.299 J	0.252 J	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.347 J	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	5.67	2.85	2.65	1.85	1.42	1.21	0.98 J	0.772 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
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UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-152

Analyte	Sample Name / Sample Date	Unit	MW-152 8/15/2004	MW-152 10/10/2004	MW-152 10/11/2004	MW-152 10/13/2004	MW-152 10/14/2004	MW-152 1/26/2005	MW-152 3/22/2005	MW-152 6/16/2005
1,1,2,2-Tetrachloroethane		µg/L	11	<5	15	1500	12	9.3 J	6.5	5.32
1,1,2-Trichloroethane		µg/L	<3.3	<5	<5	<100	<5	<1	<1	<1
1,1-Dichloroethene		µg/L	<3.3	<5	<5	<100	<5	<1	<1	<1
Carbon tetrachloride		µg/L	2.1 J	<5	<5	<100	<5	0.39 J	0.24 J	<1
Chloroform		µg/L	0.97 J	<5	<5	<100	<5	1.5	0.98 B	<1
cis-1,2-Dichloroethene		µg/L	9.2	6.9	7.7	35 J	9	14	10	4.22
Tetrachloroethene		µg/L	5.4	4 J	3.1 J	<100	5.9	7.8	5.8	1.74
trans-1,2-Dichloroethene		µg/L	4.1	3.4 J	4.6 J	<100	4.1 J	6.6	5.1	1.87
Trichloroethene		µg/L	76	70	78	950	92	110	59	19.3
Vinyl chloride		µg/L	<3.3	<5	<5	<100	<5	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-152

Analyte	Sample Name / Sample Date	Unit	MW-152 11/18/2005	MW-152 4/13/2006	MW-152 10/18/2006	MW-152 4/10/2007	MW-152 10/8/2007	MW-152 4/11/2008	MW-152 10/20/2008	MW-152 6/8/2009
1,1,2,2-Tetrachloroethane		µg/L	4.95	8.16	4.87	8.67	4.85	3.05	11.7	3.33
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<2
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.758 J	<2
Carbon tetrachloride		µg/L	1	<1	<1	<1	<1	<1	0.459 J	<2
Chloroform		µg/L	2.19 B	1.76 B	1.2	1.84	1.03	0.601	2.59	2.03
cis-1,2-Dichloroethene		µg/L	29	18.7	12.7	21.8	7.71	5.65	40.2	39.9
Tetrachloroethene		µg/L	5.27	11.3	13.4	9.65	7.69	8.53	15.7	7.4
trans-1,2-Dichloroethene		µg/L	4.43	9.62	5.96	9.23	5.18	2.42	13.4	13.1
Trichloroethene		µg/L	71	161	125	185	95	72.7	260	241
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<2

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-152

Analyte	Sample Name / Sample Date	Unit	MW-152 10/16/2009	MW-152 3/25/2010	MW-152 6/22/2010	MW-152 9/23/2010	MW-152 1/25/2011	MW-152 3/28/2011	MW-152 9/27/2011	MW-152 4/18/2012
1,1,2,2-Tetrachloroethane		µg/L	9.85	77.8	63.9	5.35	2.01	1.1	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	0.336 J	0.492 J	0.311 J	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.962	0.711	0.446	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	18.3	4.2	1.14	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	2.89	0.681 J	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	1.39	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	183	40.8	14.5	1.55	1.07	0.727 J	0.478 J	0.277 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-152

Analyte	Sample Name / Sample Date / Unit	MW-152 5/9/2013	MW-152 4/27/2014	MW-152 4/9/2015	MW-152 4/25/2016	MW-152 4/23/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.126 J	0.144 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.53 J	0.604 JB	0.334 J	<1	0.378 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-153

Analyte	Sample Name / Sample Date	Unit	MW-153 8/19/2004	MW-153 6/16/2005	MW-153 11/18/2005	MW-153 4/13/2006	MW-153T 10/18/2006	MW-153-87.1-IS-2 4/10/2007	MW-153-87.1-IS-3 10/8/2007
1,1,2,2-Tetrachloroethane		µg/L	<1 J	<1	<1	<1	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	9.1	3.73	4.56	5.4	4.87	5.91	5.61
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	0.368 J	0.334 J	0.302 J
Tetrachloroethene		µg/L	0.24 J	<1	<1	<1	<1	0.332 J	0.714 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	0.251 B	0.272 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-153

	Sample Name	MW-153-87.1-IS-4	MW-153-86.75-IS-5	MW-153-86.75-IS-6	MW-153-IS-7	MW-153	MW-153
	Sample Date	4/14/2008	10/20/2008	4/14/2009	10/14/2009	4/28/2011	4/12/2013
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	6.37	5.31	5.16	2.99	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.341 J	<1	<1	<1	0.351 J	<1
Tetrachloroethene	µg/L	0.445 J	0.272 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.469 J	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-153

	Sample Name	MW-153	MW-153
	Sample Date	4/9/2015	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-154

Analyte	Sample Name / Sample Date	Unit	MW-154 8/17/2004	MW-154 6/17/2005	MW-154 11/17/2005	MW-154 4/12/2006	MW-154 10/19/2006	MW-154 4/10/2007	MW-154 10/5/2007	MW-154 4/14/2008
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<1	<1	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.437 J	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-154

	Sample Name	MW-154	MW-154	MW-154	MW-154	MW-154	MW-154
	Sample Date	10/20/2008	4/14/2009	10/15/2009	4/14/2013	4/11/2015	4/23/2017
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-155

	Sample Name	MW-155	MW-155	MW-155	MW-155	MW-155	MW-155	MW-155	MW-155
	Sample Date	8/16/2004	10/13/2004	11/8/2004	1/26/2005	3/23/2005	6/17/2005	11/19/2005	4/13/2006
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	2100	2000	800	470 J	660	2220	3530	581
1,1,2-Trichloroethane	µg/L	<77	<100	<50	0.59 J	1.7 J	4.54	9.95 J	7.5
1,1-Dichloroethene	µg/L	<77	<100	<50	<1	<2.2	<1	<10	<1
Carbon tetrachloride	µg/L	<77	<100	<50	<1	<2.2	<1	<10	<1
Chloroform	µg/L	<77	<100	<50	<1	0.68 B	1.5 B	1.64 B	1.51 B
cis-1,2-Dichloroethene	µg/L	48 J	55 J	46 J	1.8	27	67.5	53.9	35.1
Tetrachloroethene	µg/L	<77	<100	7.4 J	<1	0.6 J	3.04	8.11	5.93
trans-1,2-Dichloroethene	µg/L	<77	<100	6.4 J	0.29 J	4.5	15.1	9.91	8.66
Trichloroethene	µg/L	1000	1000	820	32	530	1750	1560	865
Vinyl chloride	µg/L	<77	<100	<50	<1	<2.2	<1	<10	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-155

Analyte	Sample Name / Sample Date	Unit	MW-155 10/18/2006	MW-155 4/10/2007	MW-155 10/8/2007	MW-155 4/11/2008	MW-155 10/20/2008	MW-155 6/8/2009	MW-155 10/15/2009	MW-155 3/24/2010
1,1,2,2-Tetrachloroethane		µg/L	4090	3180	3400	3770	2040	1610	263	16.7
1,1,2-Trichloroethane		µg/L	77.4	147	80.3	53.8	7.58	5.28 J	<2	<1
1,1-Dichloroethene		µg/L	0.559 J	0.966 J	2.84	<25	1.04	<10	<2	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<25	<1	<10	<2	<1
Chloroform		µg/L	2.1	1.69 J	1.65	<7.5	1.17	<3	0.256 J	<0.3
cis-1,2-Dichloroethene		µg/L	72.2	86 J	64.1	73.8	46.8	16	1.59 J	0.303 J
Tetrachloroethene		µg/L	13.8	12.4 J	4.3	8.34 J	10.4	7.03 J	1.48 J	<1
trans-1,2-Dichloroethene		µg/L	20.4	35.3	23.6	9.93 J	3.58	<10	<2	<1
Trichloroethene		µg/L	1810	1650	794	1600	1210	643	94.2	3.17
Vinyl chloride		µg/L	<1	1.15	0.971 J	<25	<1	<10	<2	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-155

Analyte	Sample Name / Sample Date	Unit	MW-155 6/23/2010	MW-155 9/22/2010	MW-155 1/25/2011	MW-155 3/28/2011	MW-155 9/26/2011	MW-155 4/19/2012	MW-155 4/13/2013	MW-155 4/26/2014
1,1,2,2-Tetrachloroethane		µg/L	24	4.58	3.75	2.61	1.68	0.983	0.552 J	0.461 J
1,1,2-Trichloroethane		µg/L	0.498 J	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	0.16 J	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.373 J	0.332 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.57	0.408 J	1.07	0.585 J	0.709 J	1.15	1.16	0.838 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-155

Analyte	Sample Name / Sample Date / Unit	MW-155 4/8/2015	MW-155 4/25/2016	MW-155 4/22/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.155 J	0.206 J	0.217 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	0.299 J	<1	0.261 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.682 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-157

	Sample Name	MW-157	MW-157	MW-157	MW-157	MW-157	MW-157	MW-157	MW-157
	Sample Date	8/18/2004	10/27/2004	1/27/2005	3/23/2005	6/15/2005	11/17/2005	4/12/2006	10/19/2006
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	5.7 J	6.74 J	3.8	3.6	3.18 B	2.22	2.28	2.64
1,1,2-Trichloroethane	µg/L	<6.7	0.351 J	0.33 J	0.26 J	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<6.7	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	9.4	10.5 J	9.9	5.2	4.75	4.56	5.61	9.25
Chloroform	µg/L	14	14 J	12	7.5	10.2	8.18	10.8	30.1
cis-1,2-Dichloroethene	µg/L	11	13.2 J	13	11	10.9	9.35	9.75	13.3
Tetrachloroethene	µg/L	1.9 J	1.51 J	2	1.6	1.32	1.49	1.59	2.19
trans-1,2-Dichloroethene	µg/L	1.9 J	2.7 J	2.4	1.9	2.58	1.3	2.2	2.7
Trichloroethene	µg/L	120	143 J	160	200	157	117	132	148 J
Vinyl chloride	µg/L	<6.7	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-157

Analyte	Sample Name / Sample Date	Unit	MW-157 4/10/2007	MW-157 10/8/2007	MW-157 4/14/2008	MW-157 10/17/2008	MW-157 4/14/2009	MW-157 7/30/2009	MW-157 10/15/2009	MW-157 3/25/2010
1,1,2,2-Tetrachloroethane		µg/L	25.2	27	10.1	7.19	9.47	5.06	3.88	5.71
1,1,2-Trichloroethane		µg/L	1.04	1.22	<2	0.39 J	0.288 J	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<2	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	17.2	26	<2	12	6.25	3.35	4.66	4.14
Chloroform		µg/L	153	235	9	89.6	17.1	9.88	8	7.72
cis-1,2-Dichloroethene		µg/L	16.8	12.5	0.671 J	3.29	14.8	12	11.6	9.3
Tetrachloroethene		µg/L	4.1	7.43	<2	1.15	2.68	2.05	2.1	1.81
trans-1,2-Dichloroethene		µg/L	3	3.06	<2	0.589 J	2.75	2.64	2.69	2.11
Trichloroethene		µg/L	162	151	5.48	38.3	286	205	202	175
Vinyl chloride		µg/L	<1	<1	<2	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-157

Analyte	Sample Name / Sample Date	Unit	MW-157 6/22/2010	MW-157 9/22/2010	MW-157 1/26/2011	MW-157 3/28/2011	MW-157 9/27/2011	MW-157 4/19/2012	MW-157 10/17/2012	MW-157 4/13/2013
1,1,2,2-Tetrachloroethane		µg/L	8.15	3.55	1.29	2.46	1.34	0.533	0.616	0.494 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	2.9	2.25	0.644 J	0.783 J	0.314 J	0.346 J	<1	<1
Chloroform		µg/L	6.41	5.85	4.43	7.1	3.46	3.24	2.46	2.88 J
cis-1,2-Dichloroethene		µg/L	7.73	5.44	1.8	1.69	0.659 J	0.476 J	<1	0.351 J
Tetrachloroethene		µg/L	1.34	1.03	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	1.55	1.03	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	141	88.3	13.3	9.04	4.18	3.26	2.03	2.49 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-157

	Sample Name	MW-157	MW-157	MW-157	MW-157	MW-157
	Sample Date	10/10/2013	4/26/2014	4/10/2015	5/23/2016	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	0.756 J	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.486	0.66	0.569	0.435	0.956
cis-1,2-Dichloroethene	µg/L	<1	0.456 J	0.723 J	0.262 J	2.08
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.837 J	0.955 J	0.914 JB	2.91	0.375 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158

Analyte	Sample Name / Sample Date	Unit	MW-158 10/9/2004	MW-158 10/13/2004	MW-158 11/8/2004	MW-158 1/25/2005	MW-158 3/21/2005	MW-158 6/16/2005	MW-158 11/18/2005	MW-158 4/13/2006
1,1,2,2-Tetrachloroethane		µg/L	15	21	53	24	11	4.39	5.54	6.36
1,1,2-Trichloroethane		µg/L	<1	<1	<2.5	<1.4	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<2.5	<1.4	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<2.5	<1.4	<1	<1	<1	<1
Chloroform		µg/L	0.47 B	0.29 J	0.63 J	0.38 J	0.41 B	<1	1.07 B	1 B
cis-1,2-Dichloroethene		µg/L	2.2	3	7.2	3.1	3.3	5.16	9.31	7.74
Tetrachloroethene		µg/L	1.2	1.8	3.5	2.3	3.3	3.67	6.05	9.28
trans-1,2-Dichloroethene		µg/L	1.1	1.3	3	1.3 J	1.6	2.52	3.38	3.62
Trichloroethene		µg/L	20	30	74	33	30	32	77.8	76.3
Vinyl chloride		µg/L	<1	<1	<2.5	<1.4	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158

Analyte	Sample Name / Sample Date	Unit	MW-158 10/19/2006	MW-158 4/10/2007	MW-158 10/8/2007	MW-158 4/11/2008	MW-158 10/20/2008	MW-158 6/8/2009	MW-158 10/16/2009	MW-158 3/24/2010
1,1,2,2-Tetrachloroethane		µg/L	4.41	1.86	1.26	3.03	27.4	5.84	8.22	4.59
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.691	0.404	0.194 J	0.288 J	0.682	0.758	0.294 J	<0.3 J
cis-1,2-Dichloroethene		µg/L	5.96	2.9	1.4	2.9	7.79	11.6	1.45	1.04
Tetrachloroethene		µg/L	8.49	8.13	3.87	4.98	6.92	3.88	2.66	0.697 J
trans-1,2-Dichloroethene		µg/L	3.13	1.56	0.697 J	1.25	2.74	2.76	<1	0.35 J
Trichloroethene		µg/L	77.4	54	20.6	37.1	162	141	26.4	16.7
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158

Analyte	Sample Name / Sample Date / Unit	MW-158 6/22/2010	MW-158 9/23/2010	MW-158 1/25/2011	MW-158 3/28/2011	MW-158 9/27/2011	MW-158 4/18/2012	MW-158 4/13/2013	MW-158 4/27/2014
1,1,2,2-Tetrachloroethane	µg/L	0.802	1.82	0.677	0.49 J	1.15	0.528	1.58 J	0.959
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.156 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	0.137 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.37	6.04	1.17	0.681 J	2	1.37	4.59	3.16
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158

	Sample Name	MW-158	MW-158	MW-158
	Sample Date	4/9/2015	4/25/2016	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	0.994	<0.5	1.02
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.145 J	0.129 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	2.66	0.429 J	1.35
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158A

	Sample Name	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A
	Sample Date	10/10/2004	10/12/2004	11/8/2004	1/24/2005	3/21/2005	6/16/2005	11/18/2005	4/13/2006
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	560	270	83	77	96	736	844	681
1,1,2-Trichloroethane	µg/L	<20	<15	<7.7	<2	0.24 J	2.5	4.5 J	6.08
1,1-Dichloroethene	µg/L	<20	<15	<7.7	<2	<1	0.392 J	<10	<1
Carbon tetrachloride	µg/L	<20	<15	<7.7	<2	0.55 J	<1	<10	<1
Chloroform	µg/L	<20	<15	2.1 J	0.88 J	2.4	1.28 B	3.47 B	2.62 B
cis-1,2-Dichloroethene	µg/L	27	43	40	11	33	37.1	45.5	49.7
Tetrachloroethene	µg/L	<20	5.7 J	8.1	3.2	12	5.63	17.8	4.69
trans-1,2-Dichloroethene	µg/L	9 J	17	7.1 J	4.3	15	9.54	13.6	14
Trichloroethene	µg/L	340	360	530	58	200	470	492	689
Vinyl chloride	µg/L	<20	<15	<7.7	<2	<1	<1	<10	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158A

	Sample Name	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A
	Sample Date	10/19/2006	4/10/2007	10/8/2007	4/11/2008	10/20/2008	6/8/2009	10/16/2009	3/24/2010
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	410	50.3	3.7	26.9	29.4	255	156	27.8
1,1,2-Trichloroethane	µg/L	14.9	3.49	2.65	7.88 J	<1	5.1	2.52	<1
1,1-Dichloroethene	µg/L	0.818 J	0.592 J	<1	<1	1.65	<2	<1	<1
Carbon tetrachloride	µg/L	0.754 J	<2	1.54	<1	0.825 J	<2	<1	<1
Chloroform	µg/L	3.64	1.44	1.36	1.01	3.94	0.876	0.67	0.155 J
cis-1,2-Dichloroethene	µg/L	60.7	95.3 J	14.6	8.05 J	54.4 J	64.2	8.93	0.295 J
Tetrachloroethene	µg/L	6.64	3.77 J	13.7	10.7	15	2.92	1.96	<1
trans-1,2-Dichloroethene	µg/L	22.8	7.78	6.22	4.06	18	3.6	0.456 J	<1
Trichloroethene	µg/L	678	514	42	97.3 J	408	304	69.9	3.87
Vinyl chloride	µg/L	<1	0.663 J	<1	<1	<1	2.82	1.15	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158A

	Sample Name	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A	MW-158A
	Sample Date	6/22/2010	9/23/2010	1/25/2011	3/28/2011	9/27/2011	4/18/2012	4/13/2013	4/27/2014
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	27.2	5.03	0.771	0.663	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.302 J	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.01	1.3	0.426 J	0.37 J	0.302 J	<1	<1	0.391 JB
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-158A

	Sample Name	MW-158A	MW-158A	MW-158A
	Sample Date	4/9/2015	4/25/2016	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	0.144 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.348 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-159

Analyte	Sample Name / Sample Date	Unit	MW-159 10/11/2004	MW-159 11/8/2004	MW-159 1/26/2005	MW-159 3/24/2005	MW-159 6/17/2005	MW-159 11/19/2005	MW-159 12/8/2005	MW-159 4/13/2006
1,1,2,2-Tetrachloroethane		µg/L	3500	580	2000 J	2200	659	421	1.25	847
1,1,2-Trichloroethane		µg/L	<150	<33	6.3	7.8	3.27	2.25	<1	2.5
1,1-Dichloroethene		µg/L	<150	<33	<6.2	<7.1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<150	<33	<6.2	<7.1	0.961 J	0.927 J	4.13	<1
Chloroform		µg/L	<150	<33	2.9 J	4.2 J	1.27 B	1.6 B	12.1	1.22 B
cis-1,2-Dichloroethene		µg/L	100 J	98	62	80	39.4	46.7	10.5	36.4
Tetrachloroethene		µg/L	<150	<33	4 J	7.1	1.82	2.33	0.935 J	1.71
trans-1,2-Dichloroethene		µg/L	<150	58	12	15	9.78	5.76	1.73	7.64
Trichloroethene		µg/L	1700	790	830	1700	691	552	120	594
Vinyl chloride		µg/L	<150	<33	<6.2	<7.1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-159

Analyte	Sample Name / Sample Date	Unit	MW-159 10/18/2006	MW-159 4/9/2007	MW-159 10/8/2007	MW-159 4/11/2008	MW-159 10/20/2008	MW-159 6/8/2009	MW-159 10/16/2009	MW-159 3/24/2010
1,1,2,2-Tetrachloroethane		µg/L	357	272	501	312	271	366	483	133
1,1,2-Trichloroethane		µg/L	19.6	37.4	66.4	99.8	92.8	92.2	33.7	16.8
1,1-Dichloroethene		µg/L	<1	1.16	1.98	<10	7.33	<10	2.96 J	3.26 J
Carbon tetrachloride		µg/L	0.493 J	<1	<1	<10	<1	<10	<5	<5
Chloroform		µg/L	1.02	1.03	1.72	<3	1.66	<3	0.923 J	<1.5
cis-1,2-Dichloroethene		µg/L	55.4	156	392	1220	959	248	82.2	54
Tetrachloroethene		µg/L	2.63	3.81	9.33	6.28 J	5.48	6.24 J	4.11 J	2.5 J
trans-1,2-Dichloroethene		µg/L	6.37	17.9	28	26.6	46.2	17.5	8.94	7.07
Trichloroethene		µg/L	935	1660	2700	1410	1320	1280	983	505
Vinyl chloride		µg/L	<1	0.514 J	1.14	7.79 J	17.7	3.83 J	<5	4.42 J

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-159

Analyte	Sample Name / Sample Date	Unit	MW-159 6/23/2010	MW-159 9/22/2010	MW-159 1/25/2011	MW-159 3/28/2011	MW-159 9/27/2011	MW-159 4/20/2012	MW-159 10/17/2012	MW-159 5/9/2013
1,1,2,2-Tetrachloroethane		µg/L	69.9	75	37.8	40.6	32.5	37.9	24.2	19.4
1,1,2-Trichloroethane		µg/L	10.2	12.4	6.14	7.05	6.44	6.14	4.82	4.15
1,1-Dichloroethene		µg/L	4.81	8.51	5.86	5	4.42	3.49	3.2	3.39
Carbon tetrachloride		µg/L	<2	<1	<2	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.6	0.568	0.285 J	0.301	0.289 J	0.34	0.242 J	0.296 J
cis-1,2-Dichloroethene		µg/L	55.4	62	45.6	50.7	49.9	42.8	35.3	28.4
Tetrachloroethene		µg/L	1.29 J	1.49	1.15 J	1.21	1.11	1.17	1.06	0.688 J
trans-1,2-Dichloroethene		µg/L	5.57	6.69	4.82	4.87	6.55	4.36	4.93	3.41
Trichloroethene		µg/L	280	293	200	232	193	275	247	181
Vinyl chloride		µg/L	4.99	40.3	25.7	22.5	16.7	17.3	14.6	17.3

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
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< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-159

Analyte	Sample Name / Sample Date	Unit	MW-159 10/10/2013	MW-159 4/27/2014	MW-159 10/19/2014	MW-159 4/8/2015	MW-159 10/6/2015	MW-159 5/23/2016	MW-159 10/17/2016	MW-159 4/22/2017
1,1,2,2-Tetrachloroethane		µg/L	18.2	20.3	13.7 J	11.7	15.7	4.21	9.86	10.1
1,1,2-Trichloroethane		µg/L	3.87	5.12	4.02	3.13	4.55	1.01	3.11	3.27
1,1-Dichloroethene		µg/L	4.66	3.68	3.78	4.08	3.77	2.48	1.65	2.58
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.197 J	0.18 J	0.149 J	0.17 J	0.211 J	0.146 J	0.161 J	0.127 J
cis-1,2-Dichloroethene		µg/L	47.3	33.4	31.4	32	29.8	9.64	21.9	22.6
Tetrachloroethene		µg/L	0.789 J	0.863 J	0.832 J	0.609 J	0.918 J	0.359 J	0.591 J	0.515 J
trans-1,2-Dichloroethene		µg/L	3.41	4.36	3.9	3.5	3.55	0.873 J	2.58	2.76
Trichloroethene		µg/L	129	216	216	198	227	38.4	171	141
Vinyl chloride		µg/L	15.4	11.9	8.83	8.84	7.98	6.77	4.74	6.32

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-159

	Sample Name	MW-159
	Sample Date	10/5/2017
Analyte	**Unit**	
1,1,2,2-Tetrachloroethane	µg/L	8.36
1,1,2-Trichloroethane	µg/L	3.25
1,1-Dichloroethene	µg/L	2.64
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	0.138 J
cis-1,2-Dichloroethene	µg/L	21.4
Tetrachloroethene	µg/L	0.631 J
trans-1,2-Dichloroethene	µg/L	2.41
Trichloroethene	µg/L	146
Vinyl chloride	µg/L	5.96

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-160

Analyte	Sample Name / Sample Date	Unit	MW-160 10/13/2004	MW-160 1/28/2005	MW-160 3/22/2005	MW-160 6/17/2005	MW-160 11/18/2005	MW-160 4/12/2006	MW-160 10/18/2006	MW-160 4/10/2007
1,1,2,2-Tetrachloroethane		µg/L	30	53	29	35.4	13.4	23.1	9.08	24.9
1,1,2-Trichloroethane		µg/L	<10	0.23 J	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<10	<1	<1	<1	<1	0.538 J	<1	0.708 J
Carbon tetrachloride		µg/L	<10	0.79 J	0.48 J	0.581 J	1.01	0.729 J	0.575 J	0.781 J
Chloroform		µg/L	<10	2.7	1.7	2.33 B	2.26 B	3.29 B	3.35	1.68
cis-1,2-Dichloroethene		µg/L	31	38	21	35.7	30.8	45	42.5	22.6
Tetrachloroethene		µg/L	12	21	15	14.7	14.7	13	19.8	14.5
trans-1,2-Dichloroethene		µg/L	17	18	10	16.3	12.2	18.1	17.8	8.63
Trichloroethene		µg/L	240	290	190	448	161	278	307	191
Vinyl chloride		µg/L	<10	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-160

Analyte	Sample Name / Sample Date	Unit	MW-160 10/8/2007	MW-160 4/11/2008	MW-160 6/18/2008	MW-160 10/20/2008	MW-160 6/8/2009	MW-160 10/15/2009	MW-160 3/24/2010	MW-160 6/23/2010
1,1,2,2-Tetrachloroethane		µg/L	175	3560	3090	2340	118	125	5.63	4.79
1,1,2-Trichloroethane		µg/L	0.555 J	2.97 J	2.69	3.84 J	0.49 J	0.332 J	<1	<1
1,1-Dichloroethene		µg/L	1.05	<5	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	1.91	<5	1.14	0.388 J	<1	<1	<1	<1
Chloroform		µg/L	3.53	2.14	1.62	1.75 J	0.811	0.56	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	56.1	49.8	40.9	40.6 J	1.23	0.375 J	<1	<1
Tetrachloroethene		µg/L	18.8	10.6	9.43	9.87 J	1.34	0.251 J	<1	<1
trans-1,2-Dichloroethene		µg/L	15.6	9.32	7.36	5.81 J	<1	<1	<1	<1
Trichloroethene		µg/L	695	1130	1120	1050	21.8	8.39	0.948 J	<1
Vinyl chloride		µg/L	<1	<5	<1	<1	<1	<1 UJ	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-160

Analyte	Sample Name / Sample Date	Unit	MW-160 9/23/2010	MW-160 1/26/2011	MW-160 3/28/2011	MW-160 9/27/2011	MW-160 4/20/2012	MW-160 4/13/2013	MW-160 5/13/2014	MW-160 4/9/2015
1,1,2,2-Tetrachloroethane		µg/L	0.764	0.254 J	0.39 J	<0.5	<0.5	<0.5 UJ	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.323 J	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-160

	Sample Name	MW-160	MW-160
	Sample Date	4/25/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.193 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	0.267 J	0.407 J
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-163

Analyte	Sample Name / Sample Date	Unit	MW-163 10/14/2004	MW-163 6/15/2005	MW-163 11/17/2005	MW-163 4/13/2006	MW-163 4/27/2006	MW-163 10/19/2006	MW-163 4/10/2007	MW-163 10/8/2007
1,1,2,2-Tetrachloroethane		µg/L	4800	3420 J	2080	1980	2420	538	642	860
1,1,2-Trichloroethane		µg/L	<100	7.43 J	4.95	4.77	6.6	17.3	61.2	23.8
1,1-Dichloroethene		µg/L	<100	<10	<1	<1	<1	<1	<5	<1
Carbon tetrachloride		µg/L	<100	<10	0.882 J	<1	0.83 J	<1	<5	0.683 J
Chloroform		µg/L	<100	<10	0.88 B	1.28 B	2.14	0.446	0.883 J	1.59
cis-1,2-Dichloroethene		µg/L	41 J	39.6	24	39.7	61.6	98.6	113	59
Tetrachloroethene		µg/L	<100	5.09 J	4.3	8.68	12.6	4.35	3.5 J	4.93
trans-1,2-Dichloroethene		µg/L	<100	9.22 J	2.68	3.55	5.15	17.2	14.8	10.9
Trichloroethene		µg/L	1700	1740	1300	1860	2030	527	485	699
Vinyl chloride		µg/L	<100	<10	<1	<1	<1 UJ	3.63	3.91 J	2.15

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-163

Analyte	Sample Name / Sample Date	Unit	MW-163 4/14/2008	MW-163 10/17/2008	MW-163 4/14/2009	MW-163 7/30/2009	MW-163 10/16/2009	MW-163 3/25/2010	MW-163 6/22/2010	MW-163 9/22/2010
1,1,2,2-Tetrachloroethane		µg/L	488	1710	233	131	143	11.8	11.3	5.32
1,1,2-Trichloroethane		µg/L	3.37 J	6.96	<2	0.369 J	0.261 J	<1	<1	<1
1,1-Dichloroethene		µg/L	<5	<5	<2	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<5	<5	<2	<1	<1	<1	<1	<1
Chloroform		µg/L	11.9	7.67	0.769	0.4	0.974	<0.3	0.142 J	0.181 J
cis-1,2-Dichloroethene		µg/L	9.07	29.9	2.15	3.22	2.45	0.303 J	0.272 J	<1
Tetrachloroethene		µg/L	<5	<5	0.802 J	1.23	0.93 J	0.487 J	0.623 J	0.634 J
trans-1,2-Dichloroethene		µg/L	1.84 J	3.81 J	<2	0.327 J	0.321 J	<1	<1	<1
Trichloroethene		µg/L	80.3	615	85.7	87.1	65.8	11.1	11.8	6.53
Vinyl chloride		µg/L	<5	<5	<2	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-163

	Sample Name	MW-163	MW-163	MW-163	MW-163	MW-163	MW-163	MW-163	MW-163
	Sample Date	1/26/2011	3/28/2011	9/27/2011	4/19/2012	10/17/2012	5/9/2013	10/10/2013	4/26/2014
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	1.78	4.66	5.74	3.83	3.18	1.87	0.739	6.79
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.165 J	0.19 J	<0.3	0.187 J	0.215 J	0.277 J	0.178 J	0.156 J
cis-1,2-Dichloroethene	µg/L	<1	0.359 J	<1	<1	<1	<1	<1	0.433 J
Tetrachloroethene	µg/L	0.553 J	0.698 J	0.884 J	0.914 J	0.832 J	0.527 J	0.856 J	0.566 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.4	7.43	10.7	9.02	9.26	7.86	2.82	13.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-163

Analyte	Sample Name / Sample Date	Unit	MW-163 10/19/2014	MW-163 4/10/2015	MW-163 10/6/2015	MW-163 5/23/2016	MW-163 10/17/2016	MW-163 4/23/2017	MW-163 10/5/2017
1,1,2,2-Tetrachloroethane		µg/L	0.291 J	1.01	<0.5	0.777	0.682	0.412 J	0.265 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	0.204 J	0.153 J	0.305	0.308	0.234 J	0.21 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.5 J	0.422 J	0.543 J	0.383 J	0.298 J	0.351 J	0.317 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.83	4.3	0.783 J	2.9	2.27	1.52	1.05
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
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HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-164

Analyte	Sample Name / Sample Date	Unit	MW-164 10/15/2004	MW-164 6/15/2005	MW-164 11/14/2005	MW-164 4/12/2006	MW-164 10/19/2006	MW-164 4/10/2007	MW-164 10/8/2007	MW-164 4/14/2008
1,1,2,2-Tetrachloroethane		µg/L	<2.5	4.65 B	2.14	2.6	3.05	45	17.7	13.4
1,1,2-Trichloroethane		µg/L	<2.5	<1	<1	<1	<1	1.75	0.719 J	0.517 J
1,1-Dichloroethene		µg/L	<2.5	<1	<1	<1	<1	<1	<1	<1 J
Carbon tetrachloride		µg/L	4	3.66	5.44	2.99	16.8	24.8	9.87	3.42 J
Chloroform		µg/L	9.1	8.82	8.44 B	9.56	52.6	247	126	37.1
cis-1,2-Dichloroethene		µg/L	6.3	7.86	8.05	6.87	8.79	18.1	4.38	2.71
Tetrachloroethene		µg/L	<2.5	<1	0.576	0.637 J	2.03	3.62	2.13	0.894
trans-1,2-Dichloroethene		µg/L	0.97 J	1.22	0.599 J	0.974 J	1.49	2.66	1.39	0.57 J
Trichloroethene		µg/L	60	53.3	75.5	62.9 J	92.6	136 J	61.1	24.9 J
Vinyl chloride		µg/L	<2.5	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-164

Analyte	Sample Name / Sample Date	Unit	MW-164 10/17/2008	MW-164 4/14/2009	MW-164 7/30/2009	MW-164 10/15/2009	MW-164 3/25/2010	MW-164 6/22/2010	MW-164 9/22/2010	MW-164 1/26/2011
1,1,2,2-Tetrachloroethane		µg/L	6.83	20.8	26.3	32	21.3	21	11.9	5.48
1,1,2-Trichloroethane		µg/L	0.403 J	1.07	1.27	1.41	1.07	0.909 J	0.524 J	0.284 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	4.43	10.4	8.71	7.78	6.74	6.26	4.32	2.53
Chloroform		µg/L	32.2	76.1	79.5	79.3	56.5	52.7	29.5	15.6
cis-1,2-Dichloroethene		µg/L	2.91	17.4	20.2	18.6	15	13.2	8.57	4.74
Tetrachloroethene		µg/L	0.728 J	1.89	1.52	1.33	1.49	1.15	0.962 J	0.637 J
trans-1,2-Dichloroethene		µg/L	0.41 J	1.61	1.99	1.91	1.57	1.25	0.703 J	0.381 J
Trichloroethene		µg/L	27	93.3	98.2	89.1	75.5	58.5	39.7	23.5
Vinyl chloride		µg/L	<1	<1	<1	<1 UJ	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-164

Analyte	Sample Name / Sample Date	Unit	MW-164 3/28/2011	MW-164 9/27/2011	MW-164 4/19/2012	MW-164 10/17/2012	MW-164 4/13/2013	MW-164 10/10/2013	MW-164 4/26/2014	MW-164 10/19/2014
1,1,2,2-Tetrachloroethane		µg/L	4.08	2.64	1.47	0.826	0.578	0.35 J	0.305 J	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	2.06	1.62	0.957 J	1.03	0.9 J	0.454 J	0.596 J	0.36 J
Chloroform		µg/L	13.9	9	5.3	5.15	4.65	2.03	2.26	1.4
cis-1,2-Dichloroethene		µg/L	3.8	2.25	1.36	0.925 J	0.905 J	0.474 J	0.536 J	0.383 J
Tetrachloroethene		µg/L	0.383 J	0.385 J	0.284 J	<1	0.306 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	0.357 J	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	17.8	12.1	6.97	5.86	5.36	2.75	3.08	2.49
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-164

	Sample Name	MW-164	MW-164	MW-164	MW-164	MW-164
	Sample Date	4/10/2015	10/6/2015	5/23/2016	10/17/2016	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.614 J	0.5 J	<1	<1	<1
Chloroform	µg/L	1.98	1.85	0.924	1.08	1.16
cis-1,2-Dichloroethene	µg/L	0.41 J	0.497 J	<1	<1	<1
Tetrachloroethene	µg/L	0.27 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.78	2.44	1.25	1.39	1.21
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165

	Sample Name	MW-165	MW-165	MW-165	MW-165	MW-165	MW-165	MW-165	MW-165
	Sample Date	11/21/2004	1/25/2005	3/21/2005	6/16/2005	11/18/2005	4/13/2006	10/18/2006	4/10/2007
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	24	8.9	12	21.8	21.8	8	3.5	1.9
1,1,2-Trichloroethane	µg/L	<9.1	0.74 J	0.55 J	1.16	1.58	1.51	0.655 J	0.3 J
1,1-Dichloroethene	µg/L	<9.1	<2	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	11	8	7.8	1.67	2.68	<1	3.85	3.9
Chloroform	µg/L	140	64	58	77	65.4	<1	7.48	7.6
cis-1,2-Dichloroethene	µg/L	7.1 J	10	11	7.64	8.06	8.65	14.6	9.31
Tetrachloroethene	µg/L	2.3 J	1.8 J	2.1	<1	1.04	1.27	1.23	1.36
trans-1,2-Dichloroethene	µg/L	<9.1	1.3 J	2.2	2.49	1.64 J	2.07	2.84	2.44
Trichloroethene	µg/L	64	48	53	37.2	46.5	60.4	187	153
Vinyl chloride	µg/L	<9.1	<2	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165

Analyte	Sample Name / Sample Date	Unit	MW-165 10/8/2007	MW-165 4/11/2008	MW-165 10/20/2008	MW-165 6/8/2009	MW-165 10/16/2009	MW-165 3/24/2010	MW-165 6/22/2010	MW-165 9/23/2010
1,1,2,2-Tetrachloroethane		µg/L	2.31	3.04	4.94	5.28	3.92	25.1	38.8	34.7
1,1,2-Trichloroethane		µg/L	0.3 J	0.343 J	0.491 J	0.652 J	1.62	2.26	1.96	1.93
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	8.5	9.32	4.59	2.93	<1	<1	<1	<1
Chloroform		µg/L	8.57	61.4	34.3	13.5	1.04	2.74	1.19	0.927
cis-1,2-Dichloroethene		µg/L	7.25	9.59	9.28	13.8	18.7	7.7	3.6	1.15
Tetrachloroethene		µg/L	1.42	1.64	1.3	1.93	1.39	1.43	0.807 J	0.418 J
trans-1,2-Dichloroethene		µg/L	2.03	1.99	1.62	2.2	3.26	1.74	0.699 J	0.324 J
Trichloroethene		µg/L	82.8 J	87.1	94.1	111	194	187	67.7	35.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165

Analyte	Sample Name / Sample Date	Unit	MW-165 1/25/2011	MW-165 3/28/2011	MW-165 9/27/2011	MW-165 4/18/2012	MW-165 10/16/2012	MW-165 4/13/2013	MW-165 10/10/2013	MW-165 4/27/2014
1,1,2,2-Tetrachloroethane		µg/L	14.5	14.3	10.6	5.28	1.79	0.388 J	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	1.46	1.52	1.18	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.618	0.245 J	0.502	0.394	0.281 J	<0.3	0.225 J	<0.3
cis-1,2-Dichloroethene		µg/L	0.456 J	0.459 J	0.546 J	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.327 J	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	19.8	11	8.33	7.48	3.9	2.38	1.47	1.29 B
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165

Analyte	Sample Name / Sample Date	Unit	MW-165 10/19/2014	MW-165 4/8/2015	MW-165 10/6/2015	MW-165 4/25/2016	MW-165 10/16/2016	MW-165 4/23/2017	MW-165 10/6/2017
1,1,2,2-Tetrachloroethane		µg/L	0.729	0.429 J	0.522	0.238 J	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.326	0.362	0.266 J	0.166 J	<0.3	<0.3	0.133 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	6.25	6.22	3.64	1.88	1.06	1.2	1.01
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165A

Analyte	Sample Name / Sample Date	Unit	MW-165A 11/18/2004	MW-165A 1/24/2005	MW-165A 3/21/2005	MW-165A 6/16/2005	MW-165A 11/18/2005	MW-165A 4/13/2006	MW-165A 10/18/2006	MW-165A 4/10/2007
1,1,2,2-Tetrachloroethane		µg/L	7.8	5.4	5.5	12	4.42	1.14	1.65	2
1,1,2-Trichloroethane		µg/L	<2	<2	0.37 J	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<2	<2	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	6.4	6.9	9.8	4.63	6.69	1.93	4.91	6.23
Chloroform		µg/L	24	15	24	48.5	3.52 B	5.72 B	7.98	18
cis-1,2-Dichloroethene		µg/L	13	9.3	10	6.05	2.41	6.05	5.06	9.46
Tetrachloroethene		µg/L	1.3 J	1.1 J	1.4	<1	0.955 J	0.608 J	1.35	1.57
trans-1,2-Dichloroethene		µg/L	1.7 J	1.3 J	1.8	0.986 J	1.31	1.15	2.22	1.96
Trichloroethene		µg/L	69	53	64	46.7	88.7	69.8	86.7	49.6
Vinyl chloride		µg/L	<2	<2	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165A

Analyte	Sample Name / Sample Date	Unit	MW-165A 10/8/2007	MW-165A 4/11/2008	MW-165A 10/20/2008	MW-165A 6/8/2009	MW-165A 10/16/2009	MW-165A 3/24/2010	MW-165A 6/22/2010	MW-165A 9/23/2010
1,1,2,2-Tetrachloroethane		µg/L	2.98	2.77	10.5	1.1	12.5	45.7	104	44.7
1,1,2-Trichloroethane		µg/L	<1	<1	0.496 J	0.388 J	1.18	0.973 J	0.457 J	0.28 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	2.62	11.3	10.8	<1	<1	<1	<1	<1
Chloroform		µg/L	66.9	49.8	82.7	1.94	1.21	1.39	0.918	<0.3
cis-1,2-Dichloroethene		µg/L	7.63	7.3	10.2	5.3	1.99	0.421 J	<1	<1
Tetrachloroethene		µg/L	2.49	2.44	2.32	0.906 J	0.252 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	1.57	1.4	1.38	0.964 J	<1	<1	<1	<1
Trichloroethene		µg/L	53.1	32.6	112	91.5	35.5	6.29	4.6	2.3
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165A

	Sample Name	MW-165A	MW-165A	MW-165A	MW-165A	MW-165A	MW-165A	MW-165A	MW-165A
	Sample Date	1/25/2011	3/28/2011	9/27/2011	4/18/2012	10/16/2012	4/13/2013	10/10/2013	4/28/2014
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	35.6	79	33.9	6	1.16	0.929	0.43 J	0.204 J
1,1,2-Trichloroethane	µg/L	<1	0.461 J	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.15 J	0.793	0.41	0.337	0.433	<0.3	0.612	0.721
cis-1,2-Dichloroethene	µg/L	<1	0.414 J	0.251 J	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	3.64	13.1	6.67	2.54	0.493 J	0.473 J	0.519 J	0.963 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-165A

Analyte	Sample Name / Sample Date	Unit	MW-165A 10/19/2014	MW-165A 4/8/2015	MW-165A 10/6/2015	MW-165A 4/25/2016	MW-165A 10/16/2016	MW-165A 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	0.595	0.246 J	0.878	<0.5	0.413 J	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.84	0.266 J	0.398	0.341	0.223 J	0.251 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	0.339 J
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.73	1.04	1.7	0.681 J	0.396 J	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166

Analyte	Sample Name / Sample Date	Unit	MW-166 11/18/2004	MW-166 11/19/2004	MW-166 1/27/2005	MW-166 3/23/2005	MW-166 6/17/2005	MW-166 11/19/2005	MW-166 4/13/2006	MW-166 10/20/2006
1,1,2,2-Tetrachloroethane		µg/L	4.2	4.2	3.7	3.5	1.2	1.48	13.4	9.59
1,1,2-Trichloroethane		µg/L	0.32	0.32 J	<1	<1	<1	<1	<1	0.422 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.83	0.83 J	2.9	1.9	1.68	1.17	8.54	16.5
Chloroform		µg/L	30	30	24	11	9.01	7.54	79.3	68.5
cis-1,2-Dichloroethene		µg/L	4.3	4.3	3.4	2.6	1.51	3.43	5.21	5.41
Tetrachloroethene		µg/L	0.79	0.79 J	0.68 J	0.87 J	<1	0.561 J	1.24	1.68
trans-1,2-Dichloroethene		µg/L	0.49	0.49 J	0.41 J	0.63 J	<1	0.438 J	1.17	0.937 J
Trichloroethene		µg/L	12	12	10	11	6.27	6.92	38	43.7
Vinyl chloride		µg/L	--	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166

Analyte	Sample Name / Sample Date	Unit	MW-166 4/9/2007	MW-166 10/5/2007	MW-166 4/11/2008	MW-166 10/20/2008	MW-166 6/8/2009	MW-166 10/16/2009	MW-166 3/23/2010	MW-166 6/23/2010
1,1,2,2-Tetrachloroethane		µg/L	5.47	28.5	8.39	0.519	17.9	15.3	10.1	8.91
1,1,2-Trichloroethane		µg/L	<1	0.946 J	<1	<1	0.729 J	0.525 J	0.756 J	0.518 J
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	8	8.81	8.3	5.38	12.3	11.3	6.1	2.95
Chloroform		µg/L	33.1	140	52.2	14.1	95.8	80.9	65	34.7
cis-1,2-Dichloroethene		µg/L	2.69	5.44	2.49	1.2	5.57	4.42	5.03	6.6
Tetrachloroethene		µg/L	1.28	2.47	1.65	0.621 J	2.07	2.03	1.38	1.22
trans-1,2-Dichloroethene		µg/L	0.685 J	1.15	0.955 J	0.354 J	1.17	0.866 J	0.919 J	1.08
Trichloroethene		µg/L	25.6	63.9	25.7	15	63.3	48	37.8	59.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166

Analyte	Sample Name / Sample Date	Unit	MW-166 9/23/2010	MW-166 1/25/2011	MW-166 3/28/2011	MW-166 9/27/2011	MW-166 4/18/2012	MW-166 10/17/2012	MW-166 4/14/2013	MW-166 10/10/2013
1,1,2,2-Tetrachloroethane		µg/L	11.4	9.34	9.82	14.3	6.08	2.56	2.65	2.32
1,1,2-Trichloroethane		µg/L	0.458 J	0.435 J	0.445 J	0.716 J	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	6.16	6.04	5.09	5.5	2.99	0.692 J	0.838 J	0.396 J
Chloroform		µg/L	22.8	17.9	21.8	67.5	32.5	10	7.67	6.4
cis-1,2-Dichloroethene		µg/L	15.4	13.4	13.5	6.33	2.63	1.29	1.58	1.52
Tetrachloroethene		µg/L	1.99	2.03	1.36	1.49	1.02	0.521 J	0.539 J	0.377 J
trans-1,2-Dichloroethene		µg/L	2.97	2.06	1.64	0.864 J	0.293 J	<1	<1	<1
Trichloroethene		µg/L	223	154	129	50.2	19.5	9.01	5.34	4.12
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166

Analyte	Sample Name / Sample Date	Unit	MW-166 4/26/2014	MW-166 10/19/2014	MW-166 4/8/2015	MW-166 10/6/2015	MW-166 5/23/2016	MW-166 10/17/2016	MW-166 4/23/2017	MW-166 10/5/2017
1,1,2,2-Tetrachloroethane		µg/L	1.95	1.12	0.754	0.595	0.259 J	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	0.283 J	<1	<1	<1
Chloroform		µg/L	4.34	3.52	3.15	2.13	3.81	3.9	3.73	8.21
cis-1,2-Dichloroethene		µg/L	0.92 J	0.922 J	1.29	1.64	0.613 J	1.18	0.853 J	3.42
Tetrachloroethene		µg/L	0.288 J	0.313 J	<1	<1	<1	<1	<1	0.266 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.53	2.15	1.88	1.5	1.72	1.14	1.03	1.26
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
-- not analyzed
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166A

	Sample Name	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A
	Sample Date	11/19/2004	1/27/2005	3/23/2005	6/17/2005	11/19/2005	4/13/2006	10/20/2006	4/9/2007
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	1.4	3.9	3.9	3.08	1.89	13.6	5.15	5.38
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	6.1	8.3	6.91	3.5	9.75	7.06	7.29
Chloroform	µg/L	13 B	37	38	31.3	17.2	57	27.7	30.1
cis-1,2-Dichloroethene	µg/L	0.77 J	2.6	2.8	3.08	1.89	2.33	2.14	2.42
Tetrachloroethene	µg/L	0.24 J	0.8 J	0.9 J	0.732 J	0.516 J	1.06	0.792 J	0.854 J
trans-1,2-Dichloroethene	µg/L	<1	0.52 J	0.65 J	0.69 J	0.482 J	<1	0.433 J	0.527 J
Trichloroethene	µg/L	5.2	19	24	19.8	17.6	25.8	24.3 J	25.7
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-166A

	Sample Name	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A
	Sample Date	10/5/2007	4/11/2008	10/20/2008	6/8/2009	10/16/2009	3/23/2010	6/23/2010	9/23/2010
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	12.6	3.76	0.149 J	1.92	10	6.98	4.23	12.6
1,1,2-Trichloroethane	µg/L	0.417 J	<1	<1	<1	0.319 J	0.265 J	<1	0.503 J
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	5.62	4.44	3.17	5	2.26	1.88	0.996 J	2.99
Chloroform	µg/L	65.5	34.4	14.5	16.4	24.8	23	7.54	26.5
cis-1,2-Dichloroethene	µg/L	3.54	2.57	1.82	1.85	1.76	3.03	3.85	9.91
Tetrachloroethene	µg/L	1.57	1.24	0.694 J	0.725 J	0.367 J	0.402 J	0.647 J	0.748 J
trans-1,2-Dichloroethene	µg/L	1.04	1.16	0.75 J	0.42 J	0.266 J	<1	0.615 J	0.912 J
Trichloroethene	µg/L	81.5	69.9	62.7	22.1	19.1	18.4	53.5	57.5
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-166A

	Sample Name	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A
	Sample Date	1/25/2011	3/28/2011	9/27/2011	4/18/2012	10/17/2012	4/14/2013	10/10/2013	4/26/2014
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	6.27	5.33	12.1	9.62	5.96	3.15	0.936	0.926
1,1,2-Trichloroethane	µg/L	0.344 J	0.355 J	0.497 J	0.4 J	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	2.4	1.67	3.24	1.88	0.464 J	0.276 J	0.506 J	<1
Chloroform	µg/L	18.6	21.2	54.4	25.9	8.6	5.47	5.92	2.68
cis-1,2-Dichloroethene	µg/L	7.69	5.47	4.57	2.47	1.37	1.1	0.42 J	0.313 J
Tetrachloroethene	µg/L	0.973 J	0.715 J	0.952 J	0.617 J	<1	<1	0.435 J	<1
trans-1,2-Dichloroethene	µg/L	1.05	0.532 J	0.408 J	<1	<1	<1	<1	<1
Trichloroethene	µg/L	85.9	38.2	28.9	12.1	4.93	2.87	2.41	1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-166A

	Sample Name	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A	MW-166A
	Sample Date	10/19/2014	4/8/2015	10/6/2015	5/23/2016	10/17/2016	4/23/2017	10/5/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	0.539	0.541	0.548	<0.5	0.293 J	<0.5	0.334 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.325 J	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	4.6	3.85	1.93	2.34	6.21	4.15	10
cis-1,2-Dichloroethene	µg/L	0.547 J	0.541 J	0.784 J	1.02	5.78	10.1	9.62
Tetrachloroethene	µg/L	0.391 J	<1	<1	0.276 J	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	2.03	1.94	1	1.04	1.92	1.3	1.78
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-167

	Sample Name	MW-167	MW-167	MW-167	MW-167	MW-167	MW-167	MW-167	MW-167
	Sample Date	11/21/2004	1/25/2005	3/22/2005	6/16/2005	11/18/2005	4/13/2006	10/18/2006	4/9/2007
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	2.67	<1	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	2.1 B	0.47 J	0.82 B	<1	<1	<1	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	0.961 J	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
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MW-167

Analyte	Sample Name / Sample Date	Unit	MW-167 10/5/2007	MW-167 4/11/2008	MW-167 10/20/2008	MW-167 4/14/2009	MW-167 10/15/2009	MW-167 4/13/2013	MW-167 4/10/2015	MW-167 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	0.297 J
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	1.29	2.98
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	0.34 J	<1	<1	<1	<1	0.78 JB	1.6
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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MW-169

	Sample Name	MW-169	MW-169	MW-169	MW-169	MW-169T	MW-169-81.8-IS-2
	Sample Date	12/12/2004	6/15/2005	11/18/2005	4/13/2006	10/19/2006	4/9/2007
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.8 B	<1	<1	<1	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.26 J	<1	<1	<1	0.282 J	<1
Tetrachloroethene	µg/L	<1	<1 J	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1 J	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-169

	Sample Name	MW169-81-8-IS-3	MW-169-81.8-IS-4	MW-169-86.06-IS-5	MW-169-87.06-B1	MW-169-IS-7
	Sample Date	10/8/2007	4/11/2008	10/20/2008	6/8/2009	10/14/2009
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	0.4	0.547 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-169

	Sample Name	MW-169	MW-169	MW-169	MW-169
	Sample Date	4/28/2011	4/11/2013	4/9/2015	4/3/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	1.51
Tetrachloroethene	µg/L	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	0.412 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-170

Analyte	Sample Name / Sample Date	Unit	MW-170 12/12/2004	MW-170 6/16/2005	MW-170 11/18/2005	MW-170 4/13/2006	MW-170T 10/19/2006	MW-170-77.7-IS-2 4/9/2007	MW-170-77.7-IS-3 10/8/2007
1,1,2,2-Tetrachloroethane		µg/L	<1	<1	<1	<1	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	1.3	4.06	4.37	2.84	3.52	3.67	3.06
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.42 B	<1	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	0.485 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1 J	<1 J	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-170

	Sample Name	MW-170-77.7-IS-4	MW-170-70.91-IS-5	MW-170-70.91-IS-6	MW-170-IS-7	MW-170	MW-170
	Sample Date	4/11/2008	10/20/2008	4/14/2009	10/14/2009	4/28/2011	4/11/2013
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	1.43	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	0.633 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-170

	Sample Name	MW-170	MW-170
	Sample Date	4/9/2015	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	1.37	3.45
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	0.649 J	1.62
Vinyl chloride	µg/L	<1	0.268 J

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-171

	Sample Name	MW-171	MW-171	MW-171	MW-171	MW-171T	MW-171-62.4-IS-2	MW171-IS-3
	Sample Date	12/13/2004	6/16/2005	11/18/2005	4/13/2006	10/19/2006	4/9/2007	10/8/2007
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<1	<1	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	0.544 J	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<1	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1 J	<1 J	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-171

	Sample Name	MW-171-62.4-IS-4	MW-171-63.75-IS-5	MW-171-63.75-IS-6	MW-171-IS-7	MW-171	MW-171
	Sample Date	4/11/2008	10/20/2008	4/14/2009	10/14/2009	4/28/2011	4/12/2013
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-171

	Sample Name	MW-171	MW-171
	Sample Date	4/9/2015	4/23/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	8.28
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	2.92
Vinyl chloride	µg/L	<1	0.563 J

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-174

	Sample Name	MW174-75	MW174-75B	MW174-SARA-GW01	MW174-76-SB	MW-174-IS-4	MW-174-TSVE-G
	Sample Date	11/16/2005	11/19/2005	5/14/2007	11/9/2007	4/15/2008	8/18/2008
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	0.37	<1	0.7	1.4
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	3.06 J	2.93	5.9	2.93	<1	<1
Chloroform	µg/L	37.4	31.4	68	30.6	0.666	0.345
cis-1,2-Dichloroethene	µg/L	0.28 J	<1	0.63	<1	<1	<1
Tetrachloroethene	µg/L	0.99 J	1.05	1.9	0.55	0.297 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	0.28	<1	<1	<1
Trichloroethene	µg/L	16.9	14.2	33	11.8	<1	<1
Vinyl chloride	µg/L	<1	<1 UJ	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-174

	Sample Name	MW-174-IS-5	MW-174-IS-6	MW-174-IS-7	MW-174-ODLA-1	MW-174	MW-174	MW-174
	Sample Date	10/16/2008	4/16/2009	10/13/2009	3/26/2010	4/26/2011	7/19/2011	4/19/2012
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	0.629	2.08	0.315 J	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	0.607 J	0.988 J	1.2	0.805 J	0.966 J	0.442 J
Chloroform	µg/L	0.154 J	1.47	1.54	0.337	0.243 J	0.282 J	0.22 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.347 J	0.591 J	0.651 J	0.413 J	0.51 J	0.311 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	0.658 J	0.485 J	<1	0.392 J	0.418 J	0.324 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-174

Analyte	Sample Name / Sample Date	Unit	MW-174 10/17/2012	MW-174 4/12/2013	MW-174 10/10/2013	MW-174 4/25/2014	MW-174 10/18/2014	MW-174 4/10/2015	MW-174 10/6/2015	MW-174 4/24/2016
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.212 J	0.158 J	0.135 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.263 J	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-174

	Sample Name	MW-174	MW-174
	Sample Date	10/16/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-176

	Sample Name	MW176-81	MW176-85	MW-176-IS-6	MW-176-IS-7	MW-176-ODLA-1	MW-176	MW-176
	Sample Date	11/18/2005	11/8/2007	4/23/2009	10/13/2009	3/26/2010	4/26/2011	4/18/2012
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	0.415	<1	<1	<1	<1	<1
Chloroform	µg/L	0.21 J	0.246	0.166 J	<0.3	0.147 J	0.208 J	0.187 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.44 J	0.287	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.73 J	3.07	0.579 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1 UJ	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-176

	Sample Name	MW-176	MW-176	MW-176	MW-176	MW-176
	Sample Date	4/13/2013	4/25/2014	4/11/2015	4/24/2016	4/22/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.275 J	0.193 J	<0.3	0.179 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.334 J	0.279 J	0.328 J	0.273 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.3 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-180

	Sample Name	MW180-77	MW180 SARA GW01	MW180-81	MW-180-IS-4	MW-180-TSVE-G	MW-180-IS-5
	Sample Date	11/20/2005	5/21/2007	11/8/2007	4/16/2008	8/20/2008	10/21/2008
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	44.2 J	21	<1	0.763	1.35	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	0.558	2.04
Carbon tetrachloride	µg/L	0.72 J	0.26	<1	<1	<1	<1
Chloroform	µg/L	2.04	1.6	<1	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	2.51	23	<1	<1	<1	<1
Tetrachloroethene	µg/L	5.02	2.8	<1	<1	0.766	1.88
trans-1,2-Dichloroethene	µg/L	1.7	9.6	<1	<1	<1	<1
Trichloroethene	µg/L	24.4	78	<1	<1	0.978	1.8
Vinyl chloride	µg/L	<1 UJ	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-180

	Sample Name	MW-180-IS-6	MW-180-IS-7	MW-180-ODLA-1	MW-180	MW-180	MW-180	MW-180
	Sample Date	4/15/2009	10/13/2009	3/26/2010	4/26/2011	4/19/2012	5/9/2013	4/25/2014
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	0.766 J	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.136 J	0.154 J	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.948 J	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.893 J	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-180

	Sample Name	MW-180	MW-180	MW-180
	Sample Date	4/11/2015	4/24/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-182

	Sample Name	MW182-69	MW182-70	MW-182-IS-6	MW-182-IS-7	MW-182	MW-182	MW-182
	Sample Date	11/19/2005	11/8/2007	4/20/2009	10/15/2009	4/28/2011	4/19/2012	4/14/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<1	<1	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.77 J	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1 UJ	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-182

	Sample Name	MW-182	MW-182	MW-182	MW-182	MW-182
	Sample Date	10/11/2013	5/13/2014	4/11/2015	5/23/2016	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-184

	Sample Name	MW184-67	MW184-68	MW-184-IS-6	MW-184-IS-7	MW-184	MW-184	MW-184
	Sample Date	11/18/2005	11/9/2007	4/23/2009	10/14/2009	4/28/2011	4/19/2012	5/9/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	1.74	<1	<0.5	5.06	2.36	0.716	0.353 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	8.08	4.19	4.52	13.4	2.23	1.31	0.923 J
Chloroform	µg/L	32.6	7.79	2.94	117	13.3	4.67	5.03
cis-1,2-Dichloroethene	µg/L	1.43	1.2	0.424 J	5.61	1.06	0.642 J	0.587 J
Tetrachloroethene	µg/L	0.69 J	<1	0.393 J	4.98	0.729 J	0.397 J	0.261 J
trans-1,2-Dichloroethene	µg/L	0.33 J	0.27	<1	1.63	<1	<1	<1
Trichloroethene	µg/L	12.6	9.47	2.27	84	7.77	2.83	2.7
Vinyl chloride	µg/L	<1 UJ	<1	<1 UJ	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-184

Analyte	Sample Name / Sample Date	Unit	MW-184 10/10/2013	MW-184 4/26/2014	MW-184 10/19/2014	MW-184 4/10/2015	MW-184 5/23/2016	MW-184 4/23/2017
1,1,2,2-Tetrachloroethane		µg/L	0.344 J	<0.5	0.211 J	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.879 J	1.01	0.958 J	0.784 J	0.62 J	0.542 J
Chloroform		µg/L	4.61	2.67	3.17	2.79	1.83	1.4
cis-1,2-Dichloroethene		µg/L	0.442 J	0.528 J	0.633 J	0.545 J	0.431 J	0.396 J
Tetrachloroethene		µg/L	0.366 J	0.355 J	0.429 J	0.327 J	<1	0.272 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	2.29	1.61	1.99	1.79 B	1.17	0.994 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-187

	Sample Name	MW187-84_060425	MW-187-SARA-GW01	MW187-81	MW-187-IS-4	MW-187-TSVE-G
	Sample Date	4/25/2006	5/16/2007	11/8/2007	4/16/2008	8/20/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<1	<0.5	0.141	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	0.8	<1	<1	<1
Chloroform	µg/L	0.13 J	0.29	<1	<0.3	0.139
cis-1,2-Dichloroethene	µg/L	<1	0.4	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.36	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.26 J	3.7	<1	<1	<1
Vinyl chloride	µg/L	<1 UJ	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-187

Analyte	Sample Name / Sample Date	Unit	MW-187-IS-5 10/16/2008	MW-187-IS-6 4/21/2009	MW-187-IS-7 10/15/2009	MW-187-ODLA-1 3/26/2010	MW-187 4/28/2011	MW-187 4/12/2013	MW-187 4/10/2015
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.183 J	<0.3	0.162 J	0.149 J	0.265 B	0.166 J	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	0.253 J	<1	0.312 J	0.267 J	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-187

	Sample Name	MW-187
	Sample Date	4/22/2017
Analyte	**Unit**	
1,1,2,2-Tetrachloroethane	µg/L	<0.5
1,1,2-Trichloroethane	µg/L	<1
1,1-Dichloroethene	µg/L	<1
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	<0.3
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	<1
trans-1,2-Dichloroethene	µg/L	<1
Trichloroethene	µg/L	<1
Vinyl chloride	µg/L	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
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Defense Depot Memphis, Tennessee

MW-190

	Sample Name	MW190-86_060426	MW190-86	MW-190-IS-6	MW-190-IS-7	MW-190-ODLA-1	MW-190
	Sample Date	4/26/2006	11/9/2007	4/23/2009	10/14/2009	3/26/2010	4/26/2011
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	4410	1040	276	28.1	23.5	10.4
1,1,2-Trichloroethane	µg/L	8.84	3.38	0.45 J	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.63 J	1.17	<1	<1	<1	<1
Chloroform	µg/L	2.73	1.32	0.562	0.135 J	0.186 J	0.247 J
cis-1,2-Dichloroethene	µg/L	80.5 J	33.3	3.4	0.547 J	0.747 J	0.405 J
Tetrachloroethene	µg/L	12.5	6.01	1.37	0.588 J	0.707 J	0.642 J
trans-1,2-Dichloroethene	µg/L	6.48	1.56	0.416 J	<1	<1	<1
Trichloroethene	µg/L	2720	705	109	27.6	31.9	19.4
Vinyl chloride	µg/L	<1 UJ	<1	<1 UJ	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-190

Analyte	Sample Name / Sample Date	Unit	MW-190 4/19/2012	MW-190 10/17/2012	MW-190 5/9/2013	MW-190 10/10/2013	MW-190 4/26/2014	MW-190 10/19/2014	MW-190 4/10/2015	MW-190 10/6/2015
1,1,2,2-Tetrachloroethane		µg/L	12.1	10.6	8.93	9.08	4.77	4.55	4.53	2.88
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.291 J	0.186 J	0.274 J	0.498	0.463	0.256 J	0.18 J	0.218 J
cis-1,2-Dichloroethene		µg/L	0.459 J	0.373 J	0.429 J	0.401 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.893 J	1.05	0.58 J	0.85 J	0.615 J	0.752 J	0.629 J	0.507 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	20.4	23.1	20.4	23.9	12.4	12.3	12.9	8.55
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-190

	Sample Name	MW-190	MW-190	MW-190	MW-190
	Sample Date	5/23/2016	10/17/2016	4/23/2017	10/6/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	2.56	3.92	3.54	3.16
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.227 J	0.237 J	0.224 J	0.253 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.382 J	0.443 J	0.428 J	0.486 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	7.99	11.3	8.16	11
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-220

	Sample Name	MW-220	MW-220	MW-220	MW-220	MW-220	MW-220	MW-220	MW-220
	Sample Date	5/18/2007	11/9/2007	4/15/2008	8/20/2008	10/21/2008	4/23/2009	10/13/2009	7/19/2011
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	780	<1	<0.5	<0.5	0.267 J	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	9.3	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	18	7.93	4.54	37	44.3	45.9	33.1	2.66
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	2.5	<1	<0.3	0.201	0.217 J	0.238 J	0.184 J	<0.3
cis-1,2-Dichloroethene	µg/L	420	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	16	7.67	8.14	16.4	13.7	19.8	19	1.95
trans-1,2-Dichloroethene	µg/L	76	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	530	6.73	4.61	14.6	15.2	20.2	18.7	4.94
Vinyl chloride	µg/L	0.63	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-220

Analyte	Sample Name / Sample Date	Unit	MW-220 4/19/2012	MW-220 10/17/2012	MW-220 4/13/2013	MW-220 10/10/2013	MW-220 4/25/2014	MW-220 10/18/2014	MW-220 4/11/2015	MW-220 10/5/2015
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.543
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	3.08	2.47	1.76	1.16	3.19	3.18	1.16	3.89
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	0.138 J	0.126 J	<0.3	<0.3	0.135 J	0.216 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	4.61	3.78	3.37	2.92	3.51	4.19	3.07	7.47
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	6.56	6.65	4.97	4.24	6.01	6.57	4.34	7.75
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-220

	Sample Name	MW-220	MW-220	MW-220
	Sample Date	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	10.9	5.61	7.66
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.185 J	0.208 J	0.203 J
cis-1,2-Dichloroethene	µg/L	0.269 J	<1	<1
Tetrachloroethene	µg/L	12.7	9.15	14.8
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	20	12	17.4
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-221

	Sample Name	MW221 SARA GW01	MW221-85	MW-221-IS-4	MW-221-TSVE-G	MW-221-IS-5	MW-221-IS-6
	Sample Date	5/21/2007	11/9/2007	4/16/2008	8/20/2008	10/21/2008	4/16/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	110	0.692	<0.5	0.147	0.329 J	<0.5
1,1,2-Trichloroethane	µg/L	1.9	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	1.4	0.368	0.167 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	52	0.268	<1	<1	<1	<1
Tetrachloroethene	µg/L	6.9	1.09	0.893 J	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	10	<1	<1	<1	<1	<1
Trichloroethene	µg/L	140	2.33	<1	1.19	0.501 J	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-221

	Sample Name	MW-221-IS-7	MW-221-ODLA-1	MW-221	MW-221	MW-221	MW-221	MW-221
	Sample Date	10/13/2009	3/26/2010	4/26/2011	7/19/2011	4/20/2012	10/17/2012	4/13/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	0.134 J	<0.3	<0.3	0.156 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-221

	Sample Name	MW-221	MW-221	MW-221	MW-221	MW-221	MW-221	MW-221	MW-221
	Sample Date	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/5/2015	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-222

	Sample Name	MW-222-SARA-GW01	MW222-84	MW-222-IS-4	MW-222-TSVE-G	MW-222-IS-5	MW-222-IS-6
	Sample Date	5/16/2007	11/9/2007	4/15/2008	8/19/2008	10/20/2008	4/16/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	340	1130	12.7	1.36	47.1	1.19
1,1,2-Trichloroethane	µg/L	<5	8.97	7.57	0.492	0.648 J	<1
1,1-Dichloroethene	µg/L	<5	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<5	<1	<1	<1	<1	<1
Chloroform	µg/L	<1.5	0.358	0.156 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	150	25.4	10.4	4.12	4.51	<1
Tetrachloroethene	µg/L	5.7	1.23	0.312 J	0.337	0.484 J	0.377 J
trans-1,2-Dichloroethene	µg/L	66	5.2	0.301 J	<1	0.376 J	<1
Trichloroethene	µg/L	1100	351	5.34	1.18	5.81	1.87
Vinyl chloride	µg/L	<5	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-222

	Sample Name	MW-222-IS-7	MW-222-ODLA-1	MW-222	MW-222	MW-222	MW-222	MW-222
	Sample Date	10/14/2009	3/26/2010	4/26/2011	7/19/2011	4/20/2012	10/16/2012	4/13/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.269 J	0.396	0.523	0.281 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	0.313 J	<1	<1	<1	0.291 J	0.312 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	1.04	2.54	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-222

	Sample Name	MW-222	MW-222	MW-222	MW-222	MW-222	MW-222	MW-222
	Sample Date	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/6/2015	10/16/2016	4/22/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	0.365 J	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	1.44	<1	0.276 J	0.362 J	1.53	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-223

	Sample Name	MW-223-SARA-GW01	MW223-84	MW-223-IS-4	MW-223-TSVE-G	MW-223-IS-5
	Sample Date	5/16/2007	11/9/2007	4/15/2008	8/18/2008	10/17/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	14	30.3	0.323 J	0.366	0.913
1,1,2-Trichloroethane	µg/L	3.1	2.81	<1	<1	<1
1,1-Dichloroethene	µg/L	<2	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.39	0.283	<1	<1	<1
Chloroform	µg/L	0.95	0.838	0.439	0.252	0.249 J
cis-1,2-Dichloroethene	µg/L	15	5.56	<1	<1	<1
Tetrachloroethene	µg/L	3.7	0.944	0.343 J	0.262	0.457 J
trans-1,2-Dichloroethene	µg/L	3.7	1.21	<1	<1	<1
Trichloroethene	µg/L	500	144	4.55	2.32	3.56
Vinyl chloride	µg/L	<2	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-223

	Sample Name	MW-223-IS-6	MW-223-IS-7	MW-223-ODLA-1	MW-223	MW-223	MW-223	MW-223
	Sample Date	4/17/2009	10/14/2009	3/26/2010	4/26/2011	7/19/2011	4/20/2012	10/16/2012
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	0.778	0.227 J	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.177 J	0.551	0.75	2	1.19	0.391	0.207 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.813 J	0.319 J	0.447 J	<1	0.294 J	0.503 J	0.476 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	7.38	4.01	1.49	0.25 J	0.392 J	0.275 J	0.352 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-223

	Sample Name	MW-223	MW-223	MW-223	MW-223	MW-223	MW-223	MW-223	MW-223
	Sample Date	4/13/2013	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/6/2015	4/24/2016	10/16/2016
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.206 J	0.217 J	0.395	0.244 J	0.276 J	0.309	0.443	0.405
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.415 J	0.421 J	0.448 J	<1	0.287 J	0.274 J	0.269 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.328 J	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-223

	Sample Name	MW-223
	Sample Date	4/22/2017
Analyte	**Unit**	
1,1,2,2-Tetrachloroethane	µg/L	<0.5
1,1,2-Trichloroethane	µg/L	<1
1,1-Dichloroethene	µg/L	<1
Carbon tetrachloride	µg/L	<1
Chloroform	µg/L	0.327
cis-1,2-Dichloroethene	µg/L	<1
Tetrachloroethene	µg/L	<1
trans-1,2-Dichloroethene	µg/L	<1
Trichloroethene	µg/L	<1
Vinyl chloride	µg/L	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-224

	Sample Name	MW-224-SARA-GW01	MW224-84.5	MW-224-IS-4	MW-224-TSVE-G	MW-224-IS-5	MW-224-IS-6
	Sample Date	5/16/2007	11/10/2007	4/16/2008	8/18/2008	10/20/2008	4/15/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	140	<1	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.18	0.17	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	4.8	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	1.7	2.23	1.33	0.771	0.628 J	0.436 J
trans-1,2-Dichloroethene	µg/L	1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	92	13.4	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-224

	Sample Name	MW-224-IS-7	MW-224-ODLA-1	MW-224	MW-224	MW-224	MW-224	MW-224
	Sample Date	10/14/2009	3/26/2010	4/26/2011	7/19/2011	4/20/2012	10/16/2012	4/13/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.186 J	1.01	1.03	0.563	0.286 J	0.245 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.451 J	<1	<1	<1	<1	0.305 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-224

	Sample Name	MW-224	MW-224	MW-224	MW-224	MW-224	MW-224	MW-224	MW-224
	Sample Date	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/5/2015	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.142 J	0.137 J	0.157 J	0.28 J	0.262 J	0.317	0.754	0.462
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-225

	Sample Name	MW-225-SARA-GW01	MW225-88-SB	MW-225-IS-4	MW-225-TSVE-G	MW-225-IS-5
	Sample Date	5/15/2007	11/9/2007	4/16/2008	8/20/2008	10/17/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	15	75.9	21.3	13.9	22.8
1,1,2-Trichloroethane	µg/L	0.62	2.34	0.544 J	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.78	0.517	0.275 J	0.155	0.149 J
cis-1,2-Dichloroethene	µg/L	8.6	11.2	1.71	0.889	0.321 J
Tetrachloroethene	µg/L	2.3	1.19	0.616 J	0.644	0.652 J
trans-1,2-Dichloroethene	µg/L	2.2	1.21	<1	<1	<1
Trichloroethene	µg/L	320	140	39.6	19.6	8.66
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-225

	Sample Name	MW-225-IS-6	MW-225-IS-7	MW-225-ODLA-1	MW-225	MW-225	MW-225
	Sample Date	4/20/2009	10/13/2009	3/26/2010	4/26/2011	7/19/2011	4/20/2012
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	4.03	2.47	0.926	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	0.198 J	0.212 J	0.667	0.803	0.221 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.727 J	0.566 J	0.679 J	0.252 J	0.494 J	0.538 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	9.46	11	8.58	2	1.75	0.653 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-225

	Sample Name	MW-225	MW-225	MW-225	MW-225	MW-225	MW-225	MW-225	MW-225
	Sample Date	10/16/2012	5/9/2013	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/6/2015	4/24/2016
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.214 J	0.17 J	0.207 J	0.26 J	0.219 J	0.27 J	0.411	0.357
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.464 J	0.308 J	0.6 J	0.515 J	0.417 J	0.367 J	0.322 J	0.32 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	0.481 J	0.43 J	1.02
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-225

	Sample Name	MW-225	MW-225
	Sample Date	10/16/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.309	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	0.437 J	0.516 J
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	0.262 J	<1
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-226

	Sample Name	MW-226-SARA-GW01	MW226-83	MW-226-IS-4	MW-226-TSVE-G	MW-226-IS-5	MW-226-IS-6
	Sample Date	5/15/2007	11/9/2007	4/15/2008	8/20/2008	10/20/2008	4/17/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	220	9.56	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	1.4	1.09	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<2	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<2	<1	<1	<1	<1	<1
Chloroform	µg/L	0.72	0.156	0.155 J	0.157	0.155 J	0.133 J
cis-1,2-Dichloroethene	µg/L	19	2.57	<1	<1	<1	<1
Tetrachloroethene	µg/L	7.1	0.559	<1	0.417	0.533 J	0.794 J
trans-1,2-Dichloroethene	µg/L	4.5	0.486	<1	<1	<1	<1
Trichloroethene	µg/L	740	24.7	0.855 J	<1	<1	<1
Vinyl chloride	µg/L	<2	1.24	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-226

	Sample Name	MW-226-IS-7	MW-226-ODLA-1	MW-226	MW-226	MW-226	MW-226	MW-226
	Sample Date	10/14/2009	3/26/2010	4/26/2011	7/19/2011	4/19/2012	10/16/2012	4/13/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.184 J	<0.3	1.52	0.463	0.195 J	0.242 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.75 J	0.751 J	<1	<1	0.376 J	0.393 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-226

	Sample Name	MW-226	MW-226	MW-226	MW-226	MW-226	MW-226	MW-226	MW-226
	Sample Date	10/10/2013	4/25/2014	10/18/2014	4/11/2015	10/6/2015	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.273 J	0.184 J	0.262 J	0.226 J	0.259 J	0.169 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	0.449 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	0.891 J	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-227

	Sample Name	MW227-SARA-GW01	MW227-78	MW-227-IS-4	MW-227-TSVE-G	MW-227-IS-5
	Sample Date	5/14/2007	11/10/2007	4/16/2008	8/18/2008	10/17/2008
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	120	118	28.1	5.14	10.7
1,1,2-Trichloroethane	µg/L	6.1	7.33	1.02	0.538	0.982 J
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	43	33.7	4.02	3.52	7.26
Chloroform	µg/L	1100	1080	110	30.9	134
cis-1,2-Dichloroethene	µg/L	40	58.5	6.33	2.89	6.4
Tetrachloroethene	µg/L	22	13.5	2.25	1.81	2.7
trans-1,2-Dichloroethene	µg/L	8.5	10.9	1	0.37	1.04
Trichloroethene	µg/L	420	387	40.8	28.4	61.8
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-227

Analyte	Sample Name / Sample Date	Unit	MW-227-IS-6 4/21/2009	MW-227-IS-7 10/13/2009	MW-227-ODLA-1 3/26/2010	MW-227 4/26/2011	MW-227 7/19/2011	MW-227 4/19/2012
1,1,2,2-Tetrachloroethane		µg/L	15.1	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	0.524 J	<1	0.682 J	0.614 J	0.567 J	0.348 J
Chloroform		µg/L	7.5	0.322	<0.3	0.361	0.838	0.865
cis-1,2-Dichloroethene		µg/L	0.328 J	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.345 J	0.267 J	0.543 J	0.551 J	0.614 J	0.463 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	3.56	<1	<1	<1	0.378 J	0.893 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-227

	Sample Name	MW-227	MW-227	MW-227	MW-227	MW-227	MW-227	MW-227	MW-227
	Sample Date	10/17/2012	4/12/2013	10/10/2013	4/25/2014	10/18/2014	4/10/2015	10/6/2015	4/24/2016
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.42	0.223 J	0.356	0.253 J	0.588	0.609	0.313	0.311
cis-1,2-Dichloroethene	µg/L	<1	<1	0.268 J	<1	<1	<1	0.275 J	0.335 J
Tetrachloroethene	µg/L	0.392 J	0.405 J	0.318 J	0.288 J	<1	0.253 J	<1	0.25 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.37 J	0.339 J	0.523 J	0.358 J	0.496 J	0.53 JB	0.251 J	0.351 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-227

	Sample Name	MW-227	MW-227
	Sample Date	10/16/2016	4/22/2017
Analyte	**Unit**		
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1
1,1-Dichloroethene	µg/L	<1	<1
Carbon tetrachloride	µg/L	<1	<1
Chloroform	µg/L	0.229 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1
Tetrachloroethene	µg/L	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1
Trichloroethene	µg/L	<1	<1
Vinyl chloride	µg/L	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-228

	Sample Name	MW228-SARA-GW01	MW228-78	MW-228-IS-4	MW-228-TSVE-G	MW-228-IS-5	MW-228-IS-6
	Sample Date	5/14/2007	11/10/2007	4/16/2008	8/18/2008	10/17/2008	4/16/2009
Analyte	**Unit**						
1,1,2,2-Tetrachloroethane	µg/L	46	5.07	0.509	0.22	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	0.99	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	3.4	<1	<1	<1	<1	<1
Chloroform	µg/L	120	4.51	0.387	2.81	0.155 J	<0.3
cis-1,2-Dichloroethene	µg/L	1.6	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	1.8	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	0.38	<1	<1	<1	<1	<1
Trichloroethene	µg/L	42	0.974	<1	0.911	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-228

	Sample Name	MW-228-IS-7	MW-228-ODLA-1	MW-228	MW-228	MW-228	MW-228	MW-228
	Sample Date	10/14/2009	3/29/2010	4/28/2011	7/19/2011	4/19/2012	10/17/2012	4/12/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.627 J	0.756 J	0.545 J	0.327 J	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.299 B	0.265 J	0.186 J	0.199 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.399 J	0.445 J	0.614 J	0.451 J	0.264 J	0.46 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-228

	Sample Name	MW-228	MW-228	MW-228	MW-228	MW-228	MW-228	MW-228	MW-228
	Sample Date	10/10/2013	4/25/2014	10/18/2014	4/10/2015	10/6/2015	4/24/2016	10/16/2016	4/22/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	0.152 J	<0.3	0.146 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	0.253 J	0.312 J	<1	0.353 J	0.343 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-230

	Sample Name	MW-230	MW-230	MW-230	MW-230	MW-230	MW-230	MW-230	MW-230
	Sample Date	10/18/2007	4/15/2008	10/22/2008	4/15/2009	10/14/2009	4/19/2012	5/9/2013	4/25/2014
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	27.1	18.2	32.7	30.3	28.1	13.2	12.6	14.8
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.199 J	0.192 J	0.276 J	0.236 J	0.188 J	0.225 J	0.288 J	0.307
cis-1,2-Dichloroethene	µg/L	1.29	0.834 J	1.27	1.09	0.886 J	0.499 J	0.562 J	0.651 J
Tetrachloroethene	µg/L	87.2	76.1	100	89.9	88.4	35.9	33.7	42.8
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	83.3	74.6	98.4	98.2	83.5	54.3	60.1	63.7
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-230

	Sample Name	MW-230	MW-230	MW-230
	Sample Date	4/11/2015	4/24/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	10.8	11.1	7.7
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.226 J	0.277 J	0.264 J
cis-1,2-Dichloroethene	µg/L	0.462 J	0.417 J	0.286 J
Tetrachloroethene	µg/L	33.8	34.5	22
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	47.1	39.4	28.2
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-235

	Sample Name	MW-235-IS-4	MW-235-IS-5	MW-235-IS-6	MW-235-IS-7	MW-235	MW-235	MW-235
	Sample Date	4/15/2008	10/22/2008	4/17/2009	10/15/2009	4/28/2011	4/19/2012	4/14/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-235

	Sample Name	MW-235	MW-235	MW-235	MW-235
	Sample Date	4/26/2014	4/9/2015	5/23/2016	4/23/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-237

	Sample Name	MW-237-IS-4	MW-237-IS-5	MW-237-IS-6	MW-237-IS-7	MW-237	MW-237	MW-237
	Sample Date	4/11/2008	10/22/2008	4/16/2009	10/15/2009	4/28/2011	4/18/2012	4/14/2013
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	2.2	2.02	2.17	1.77	1.62	3.03	1.93
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.181 J	0.162 J	0.129 J	<0.3	0.164 B	0.172 J	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	0.294 J	<1	0.353 J
Tetrachloroethene	µg/L	0.256 J	0.261 J	0.286 J	<1	<1	0.259 J	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-237

	Sample Name	MW-237	MW-237	MW-237	MW-237
	Sample Date	4/27/2014	4/8/2015	4/25/2016	4/23/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	2.83	3.45	3.71	4.03
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.158 J	<0.3
cis-1,2-Dichloroethene	µg/L	0.349 J	0.367 J	0.294 J	0.349 J
Tetrachloroethene	µg/L	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	<1	0.289 J	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
B Possibly bias high or false positive based on blank data
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-241

Analyte	Sample Name / Sample Date	Unit	MW-241 7/28/2009	MW-241 10/15/2009	MW-241 3/24/2010	MW-241 6/22/2010	MW-241 9/22/2010	MW-241 1/26/2011	MW-241 3/28/2011	MW-241 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	16.8	0.744	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.227 J	<0.3	<0.3	<0.3	<0.3	<0.3	0.175 J	0.132 J
cis-1,2-Dichloroethene		µg/L	0.262 J	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	3.23	2.75	1.03	0.593 J	0.573 J	0.741 J	0.362 J	0.736 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-241

Analyte	Sample Name / Sample Date	Unit	MW-241 4/17/2012	MW-241 4/14/2013	MW-241 4/26/2014	MW-241 4/9/2015	MW-241 4/25/2016	MW-241 4/22/2017
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.136 J	<0.3	<0.3	<0.3	0.174 J	0.147 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.667 J	0.505 J	0.748 J	0.277 J	0.365 J	0.47 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-242

Analyte	Sample Name / Sample Date	Unit	MW-242 7/29/2009	MW-242 10/16/2009	MW-242 3/24/2010	MW-242 6/22/2010	MW-242 9/22/2010	MW-242 1/26/2011	MW-242 3/28/2011	MW-242 9/26/2011
1,1,2,2-Tetrachloroethane		µg/L	1040	229	63.3	29.8	15.7	2.83	4.46	0.937
1,1,2-Trichloroethane		µg/L	8	3.34	0.75 J	0.328 J	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<2	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<2	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.897	0.578 J	0.188 J	0.173 J	0.198 J	0.165 J	<0.3	0.384
cis-1,2-Dichloroethene		µg/L	21.6	15.1	5.08	1.94	0.804 J	<1	<1	<1
Tetrachloroethene		µg/L	4.54	<2	0.373 J	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	3.99	1.75 J	1.01	0.429 J	<1	<1	<1	<1
Trichloroethene		µg/L	308	26.9	24.1	10.9	7.16	3.57	2.09	1.32
Vinyl chloride		µg/L	<1	<2	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-242

	Sample Name	MW-242	MW-242	MW-242	MW-242	MW-242	MW-242	MW-242	MW-242
	Sample Date	4/17/2012	10/17/2012	4/14/2013	10/10/2013	4/26/2014	4/9/2015	4/25/2016	4/22/2017
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	0.325 J	<0.5	<0.5	<0.5	1.31	0.589	0.73	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.197 J	<0.3	0.183 J	0.164 J	0.142 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.779 J	0.498 J	0.402 J	0.5 J	0.641 J	0.522 J	0.43 J	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-243

Analyte	Sample Name / Sample Date	Unit	MW-243 7/28/2009	MW-243 10/15/2009	MW-243 3/24/2010	MW-243 6/22/2010	MW-243 9/22/2010	MW-243 1/26/2011	MW-243 3/28/2011	MW-243 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	90	89.5	26.1	15.6	12.2	4.53	4.87	4.42
1,1,2-Trichloroethane		µg/L	3.04	0.806 J	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.315	0.233 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	11.4	10.3	3.34	0.796 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	2.77	2.48	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	3.75	3.08	0.33 J	<1	<1	<1	<1	<1
Trichloroethene		µg/L	146	138	16	4.92	1.76	1.89	2.63	1.56
Vinyl chloride		µg/L	<1	<1 UJ	<1	<1	<1	<1 U	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-243

Analyte	Sample Name / Sample Date	Unit	MW-243 4/17/2012	MW-243 10/16/2012	MW-243 4/14/2013	MW-243 10/10/2013	MW-243 4/27/2014	MW-243 10/19/2014	MW-243 4/8/2015	MW-243 10/6/2015
1,1,2,2-Tetrachloroethane		µg/L	2.6	2.31	1.76	1.89	2.04	2.61	1.72	1.3
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	0.151 J	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	0.296 J	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.95	1.55	1.13	0.949 J	3.36	5.01	1.72	1.49
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-243

	Sample Name	MW-243	MW-243	MW-243
	Sample Date	4/25/2016	10/16/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	1.25	1.2	1.68
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	2.6	2.43	3.2
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-244

Analyte	Sample Name / Sample Date	Unit	MW-244 7/30/2009	MW-244 10/15/2009	MW-244 3/24/2010	MW-244 6/23/2010	MW-244 9/22/2010	MW-244 1/26/2011	MW-244 3/28/2011	MW-244 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	1620	953	52.7	13.7	2.88	1.48	1.49	2.59
1,1,2-Trichloroethane		µg/L	14.5	7.89	0.894 J	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	6.73	<5	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<5	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	1.55	1.26 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	53.3	17	1.06	0.549 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	3.17	<5	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	5.4	1.79 J	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	346	131	4.56	2.78	0.389 J	0.753 J	0.723 J	0.624 J
Vinyl chloride		µg/L	5.45	6.23	2.37	0.651 J	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-244

Analyte	Sample Name / Sample Date	Unit	MW-244 4/18/2012	MW-244 10/17/2012	MW-244 4/14/2013	MW-244 10/10/2013	MW-244 4/27/2014	MW-244 10/19/2014	MW-244 4/8/2015	MW-244 10/6/2015
1,1,2,2-Tetrachloroethane		µg/L	1.28	2.25	1.24	1.1	<0.5	<0.5	0.622	0.438 J
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.161 J	0.246 J	0.205 J	0.216 J	0.233 J	1.47	0.22 J	0.179 J
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	<1	0.389 J	0.408 J	0.462 J	0.427 J	0.486 J	0.349 J	0.358 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.84	4.05	1.92	1.78	<1	<1	1.25	1.04
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-244

	Sample Name	MW-244	MW-244	MW-244
	Sample Date	4/25/2016	10/16/2016	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	<0.5 UJ	<0.5	0.33 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.185 J	0.171 J	0.256 J
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	0.252 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.625 J	0.627 J	0.738 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-245

Analyte	Sample Name / Sample Date	Unit	MW-245 7/28/2009	MW-245 10/16/2009	MW-245 3/24/2010	MW-245 6/22/2010	MW-245 9/22/2010	MW-245 1/25/2011	MW-245 3/28/2011	MW-245 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	312	383	70.7	27.9	10.7	3.81	2.14	1.42
1,1,2-Trichloroethane		µg/L	8.03	3.83	0.823 J	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	2.03	1.85 J	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<2	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.438	0.338 J	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	46.1	25.8	1.95	0.55 J	<1	<1	<1	<1
Tetrachloroethene		µg/L	6.38	4.55	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	14.1	5.99	0.41 J	<1	<1	<1	<1	<1
Trichloroethene		µg/L	473	359	21.5	5.46	2.31	1.59	1.26	0.824 J
Vinyl chloride		µg/L	0.503 J	<2	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-245

	Sample Name	MW-245	MW-245	MW-245	MW-245	MW-245	MW-245	MW-245	MW-245
	Sample Date	4/17/2012	10/16/2012	4/14/2013	10/10/2013	4/26/2014	10/19/2014	4/8/2015	10/6/2015
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	0.715	0.615	0.988	0.519	<0.5	0.423 J	0.382 J	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	0.292 J	<0.3	<0.3	0.144 J	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	0.351 J	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.554 J	0.643 J	0.656 J	0.606 J	<1	1.12	0.508 J	0.868 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-245

	Sample Name	MW-245	MW-245	MW-245
	Sample Date	4/25/2016	10/17/2016	4/22/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	0.365 J	<0.5	0.248 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	0.747 J	0.38 J	0.585 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-246

	Sample Name	MW-246	MW-246	MW-246	MW-246	MW-246	MW-246	MW-246	MW-246
	Sample Date	7/27/2009	10/16/2009	3/24/2010	6/22/2010	9/23/2010	1/25/2011	3/28/2011	9/27/2011
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	1140	2290	74.6	24.1	11.1	9.79	10.8	14.8
1,1,2-Trichloroethane	µg/L	29.4	57.7	3.28	2.91	0.936 J	1.27	0.689 J	0.294 J
1,1-Dichloroethene	µg/L	36.2	18.2	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<10	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.829	<3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	375	401	5.72	1.25	0.359 J	1.52	0.582 J	0.472
Tetrachloroethene	µg/L	5.3	5.47 J	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	18.1	24.3	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	1000	1800	14.7	3.75	1.17	1.75	1.41	1.74
Vinyl chloride	µg/L	19.1	10.3	<1	<1	<1 J	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-246

Analyte	Sample Name / Sample Date	Unit	MW-246 4/17/2012	MW-246 10/16/2012	MW-246 4/14/2013	MW-246 10/10/2013	MW-246 4/27/2014	MW-246 10/19/2014	MW-246 4/8/2015	MW-246 10/6/2015
1,1,2,2-Tetrachloroethane		µg/L	9.94	13.1	3.05	2.85	12.9	9.63	5.39	3.3
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	<0.3	<0.3	<0.3	<0.3	0.618	1.5	<0.3	<0.3
cis-1,2-Dichloroethene		µg/L	0.44 J	<1	<1	<1	0.599 J	0.471 J	<1	<1
Tetrachloroethene		µg/L	<1	<1	<1	<1	0.262 J	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	1.75	1.59	0.46 J	1.05	37.3	28.5	0.99 J	0.669 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-246

	Sample Name	MW-246	MW-246	MW-246	MW-246
	Sample Date	4/25/2016	10/17/2016	4/23/2017	10/5/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	0.398 J	4.31	4.78	3.6
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1
Chloroform	µg/L	0.171 J	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	0.381 J	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	3.62	0.398 J	0.849 J	0.597 J
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-247

Analyte	Sample Name / Sample Date	Unit	MW-247 7/30/2009	MW-247 10/16/2009	MW-247 3/24/2010	MW-247 6/23/2010	MW-247 9/23/2010	MW-247 1/25/2011	MW-247 3/28/2011	MW-247 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	27.3	18.6	<0.5	11.4	20.4	44.8	24.7	5.59
1,1,2-Trichloroethane		µg/L	1.67	1.09	<1	<1	<1	0.272 J	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	5.85	3.04	0.378 J	<1	<1	<1	<1	<1
Chloroform		µg/L	193	120	0.248 J	3.45	0.229 J	2.39	0.525	1.84
cis-1,2-Dichloroethene		µg/L	14.3	15.7	<1	0.421 J	<1	0.826 J	<1	0.847 J
Tetrachloroethene		µg/L	3.81	3.38	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene		µg/L	2.38	2.12	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	134	123	0.431 J	2.95	2.21	12.1	7.82	2.53
Vinyl chloride		µg/L	<1	<1	<1	<1	<1 J	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-247

	Sample Name	MW-247	MW-247	MW-247	MW-247	MW-247	MW-247	MW-247	MW-247
	Sample Date	4/18/2012	10/17/2012	4/14/2013	10/10/2013	4/27/2014	10/19/2014	4/8/2015	10/6/2015
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	1.09	0.738	0.646	0.664	0.273 J	0.399 J	0.425 J	0.308 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	0.661	2.17	0.278 J	0.133 J	1.15	1.58	0.51	0.479
cis-1,2-Dichloroethene	µg/L	<1	0.42 J	<1	<1	<1	0.495 J	<1	0.415 J
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	0.864 J	1.7	<1	0.304 J	2.89	1.68	0.757 J	1.07
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-247

	Sample Name	MW-247	MW-247	MW-247
	Sample Date	4/25/2016	10/17/2016	4/23/2017
Analyte	**Unit**			
1,1,2,2-Tetrachloroethane	µg/L	0.405 J	<0.5	0.206 J
1,1,2-Trichloroethane	µg/L	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1
Chloroform	µg/L	0.292 J	0.252 J	0.308
cis-1,2-Dichloroethene	µg/L	<1	<1	0.448 J
Tetrachloroethene	µg/L	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1
Trichloroethene	µg/L	2.29	0.333 J	0.666 J
Vinyl chloride	µg/L	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-248

	Sample Name	MW-248	MW-248	MW-248	MW-248	MW-248	MW-248	MW-248
	Sample Date	7/27/2009	10/16/2009	3/26/2010	6/22/2010	9/23/2010	1/26/2011	3/28/2011
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	0.589	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1 J	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-248

	Sample Name	MW-248	MW-248	MW-248	MW-248	MW-248	MW-248	MW-248
	Sample Date	9/27/2011	4/18/2012	4/13/2013	4/27/2014	4/9/2015	5/23/2016	4/23/2017
Analyte	**Unit**							
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-249

Analyte	Sample Name / Sample Date	Unit	MW-249 7/29/2009	MW-249 10/16/2009	MW-249 3/24/2010	MW-249 6/22/2010	MW-249 9/23/2010	MW-249 1/26/2011	MW-249 3/28/2011	MW-249 9/27/2011
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	5.03	<0.5	<0.5	<0.5	<0.5	0.6
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride		µg/L	<1	<1	<1	0.577 J	0.437 J	1.19	1.46	3.47
Chloroform		µg/L	<0.3	<0.3	0.427	0.452	0.399	2.23	2.59	19.9
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	0.263 J	0.29 J	0.892 J
Tetrachloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	0.51 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	<1	<1	0.703 J	0.693 J	0.519 J	1.88	1.83	12.4
Vinyl chloride		µg/L	<1	<1	<1	<1	<1 J	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-249

	Sample Name	MW-249	MW-249	MW-249	MW-249	MW-249	MW-249	MW-249	MW-249
	Sample Date	4/18/2012	10/17/2012	5/9/2013	10/10/2013	4/26/2014	10/19/2014	4/9/2015	10/6/2015
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	2.27	1.62	1.2	1.51	1.52	1.4	0.759	0.537
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	3.55	2.52	1.67	2.03	1.62	1.59	1.18	1.32
Chloroform	µg/L	20.3	13	10.5	11	10.4	12.9	9.18	8.32
cis-1,2-Dichloroethene	µg/L	1.15	0.515 J	0.517 J	0.41 J	0.358 J	0.35 J	0.272 J	<1
Tetrachloroethene	µg/L	1.02	0.744 J	0.478 J	0.591 J	0.542 J	0.574 J	0.528 J	0.51 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	14.9	8.7	7.3	7.3	6.12	6.73	4.87	3.79
Vinyl chloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-249

	Sample Name	MW-249	MW-249	MW-249	MW-249
	Sample Date	5/23/2016	10/17/2016	4/23/2017	10/5/2017
Analyte	**Unit**				
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1
Carbon tetrachloride	µg/L	0.975 J	0.56 J	0.385 J	0.383 J
Chloroform	µg/L	6.31	3.46	2.95	3.07
cis-1,2-Dichloroethene	µg/L	<1	<1	0.318 J	0.701 J
Tetrachloroethene	µg/L	0.318 J	0.38 J	0.373 J	0.264 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1
Trichloroethene	µg/L	2.56	1.52	1.76	1.85
Vinyl chloride	µg/L	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-250

	Sample Name	MW-250	MW-250	MW-250	MW-250	MW-250	MW-250	MW-250	MW-250
	Sample Date	7/29/2009	10/16/2009	3/24/2010	6/23/2010	9/23/2010	4/25/2011	9/27/2011	4/18/2012
Analyte	**Unit**								
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1 J	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-250

	Sample Name	MW-250	MW-250	MW-250	MW-250	MW-250
	Sample Date	4/13/2013	4/26/2014	4/9/2015	4/25/2016	4/23/2017
Analyte	**Unit**					
1,1,2,2-Tetrachloroethane	µg/L	<0.5 UJ	<0.5	<0.5	<0.5 UJ	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	<0.3	<0.3	<0.3	<0.3	<0.3
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	<1	<1	<1	<1	<1
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	<1	<1	<1
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit
UJ Undetected, RL is inaccurate or imprecise

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-251

Analyte	Sample Name / Sample Date	Unit	MW-251 7/29/2009	MW-251 10/16/2009	MW-251 3/24/2010	MW-251 6/23/2010	MW-251 9/22/2010	MW-251 4/25/2011	MW-251 9/26/2011	MW-251 4/18/2012
1,1,2,2-Tetrachloroethane		µg/L	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		µg/L	3.33	3.8	3.15	2.9	3.77	3.56	4.12	4.05
Carbon tetrachloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Chloroform		µg/L	0.313	0.311	0.197 J	0.254 J	0.306	0.276 J	0.322	0.328
cis-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Tetrachloroethene		µg/L	0.572 J	0.697 J	0.644 J	0.621 J	0.699 J	0.716 J	0.626 J	0.613 J
trans-1,2-Dichloroethene		µg/L	<1	<1	<1	<1	<1	<1	<1	<1
Trichloroethene		µg/L	0.707 J	0.396 J	0.34 J	0.256 J	0.366 J	0.335 J	<1	0.253 J
Vinyl chloride		µg/L	<1	<1	<1	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

HISTORICAL CVOC RESULTS - DUNN FIELD LTM
ANNUAL LONG-TERM MONITORING REPORT - 2017
Defense Depot Memphis, Tennessee

MW-251

Analyte	Sample Name / Sample Date / Unit	MW-251 4/14/2013	MW-251 4/26/2014	MW-251 4/8/2015	MW-251 4/25/2016	MW-251 4/23/2017
1,1,2,2-Tetrachloroethane	µg/L	<0.5	<0.5	<0.5	<0.5	<0.5
1,1,2-Trichloroethane	µg/L	<1	<1	<1	<1	<1
1,1-Dichloroethene	µg/L	4	3.86	4.59	4.87	4.73
Carbon tetrachloride	µg/L	<1	<1	<1	<1	<1
Chloroform	µg/L	0.387	0.373	0.372	0.523	0.491
cis-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Tetrachloroethene	µg/L	0.595 J	0.526 J	0.631 J	0.417 J	0.533 J
trans-1,2-Dichloroethene	µg/L	<1	<1	<1	<1	<1
Trichloroethene	µg/L	<1	<1	0.484 J	0.586 J	0.97 J
Vinyl chloride	µg/L	<1	<1	<1	<1	<1

Notes:
µg/L micrograms per liter
RL reporting limit

DQE Flags:
J Estimated results based on QC data or reported below RL
< Not detected at sample reporting limit

J

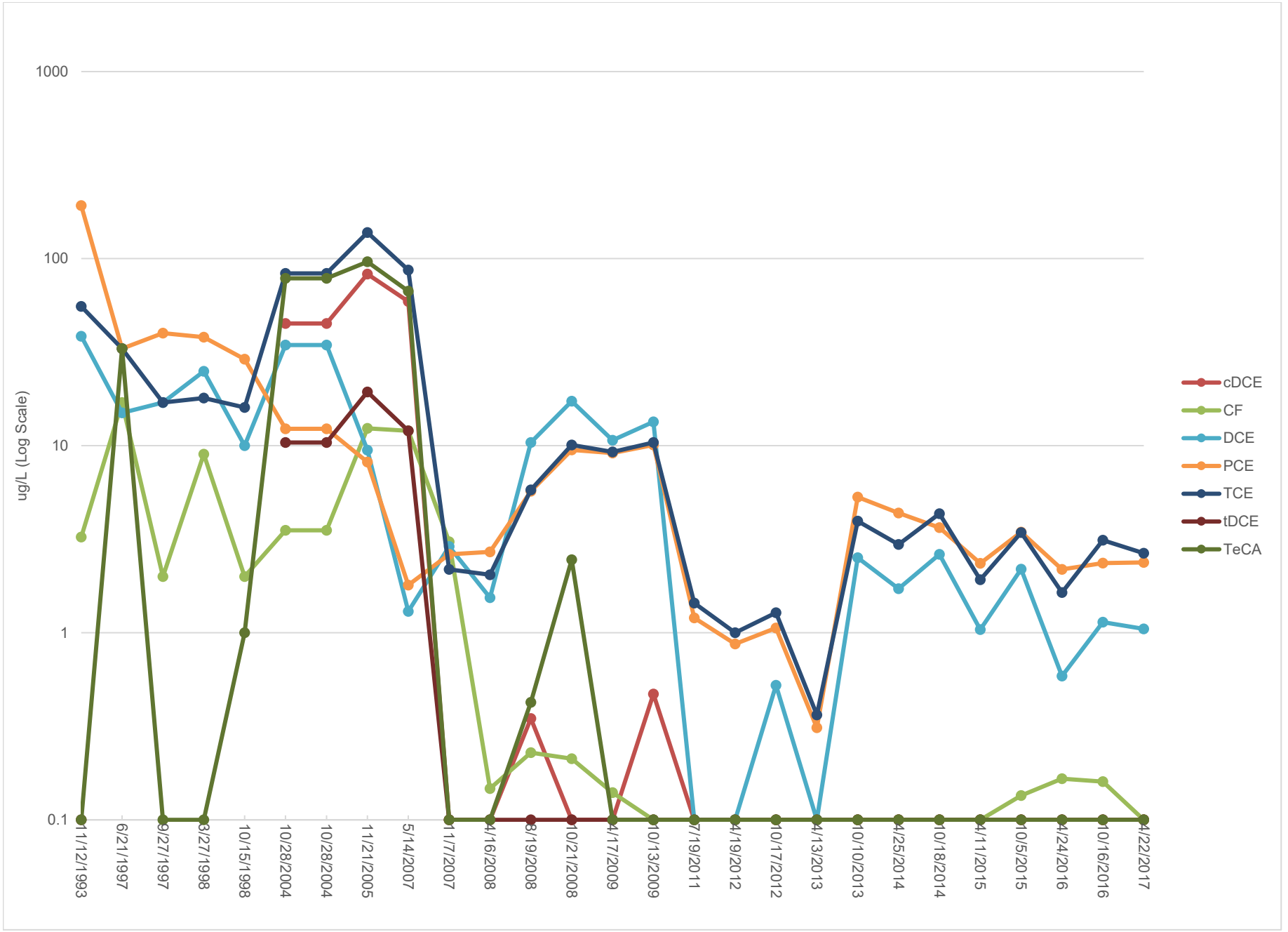
Appendix J.

CVOC Time-Trend Plots – Dunn Field

Appendix J-1
CVOC Time-Trend Plots – Dunn Field

North Wells

MW-03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11/7/2007
4/16/2008
8/19/2008
10/21/2008
4/17/2009
10/13/2009
7/19/2011
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10/10/2013
4/25/2014
10/18/2014
4/11/2015
10/5/2015
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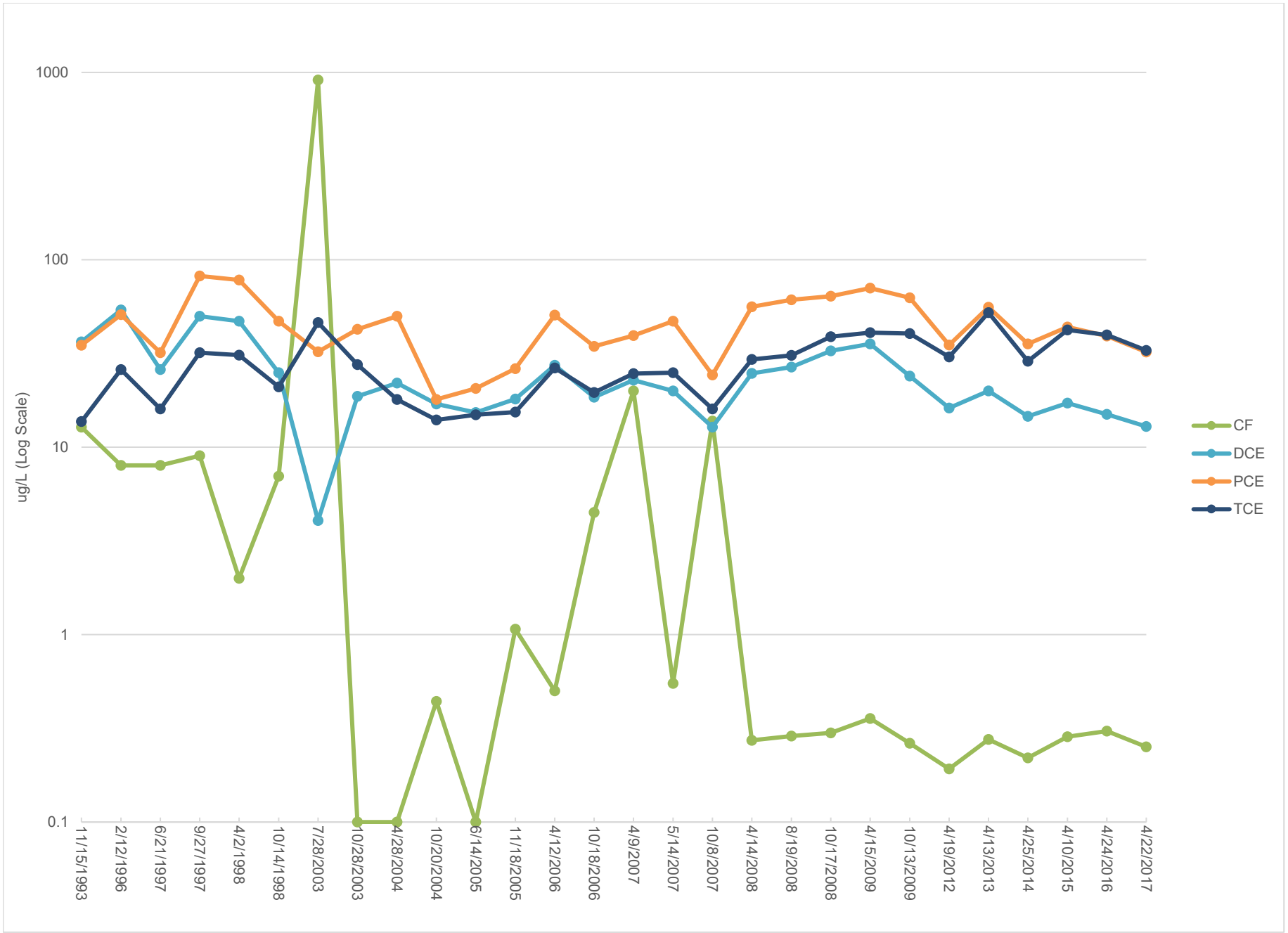
10/16/2016
4/22/2017
cDCE
CF
DCE
PCE
TCE
tDCE
TeCA

MW-07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10/13/2009
4/19/2012
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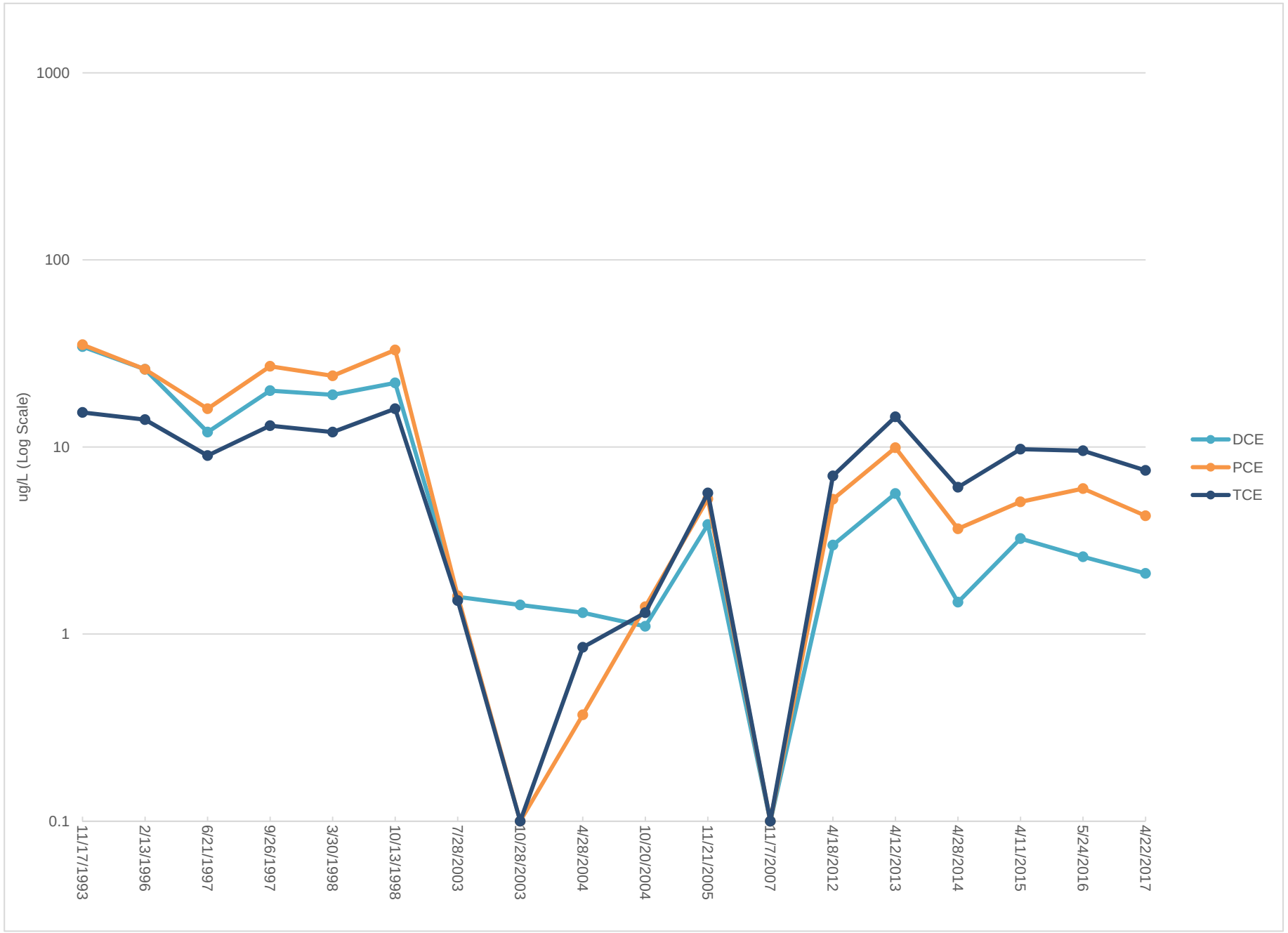
4/24/2016
4/22/2017
CF
DCE
PCE
TCE

MW-08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11/21/2005
11/7/2007
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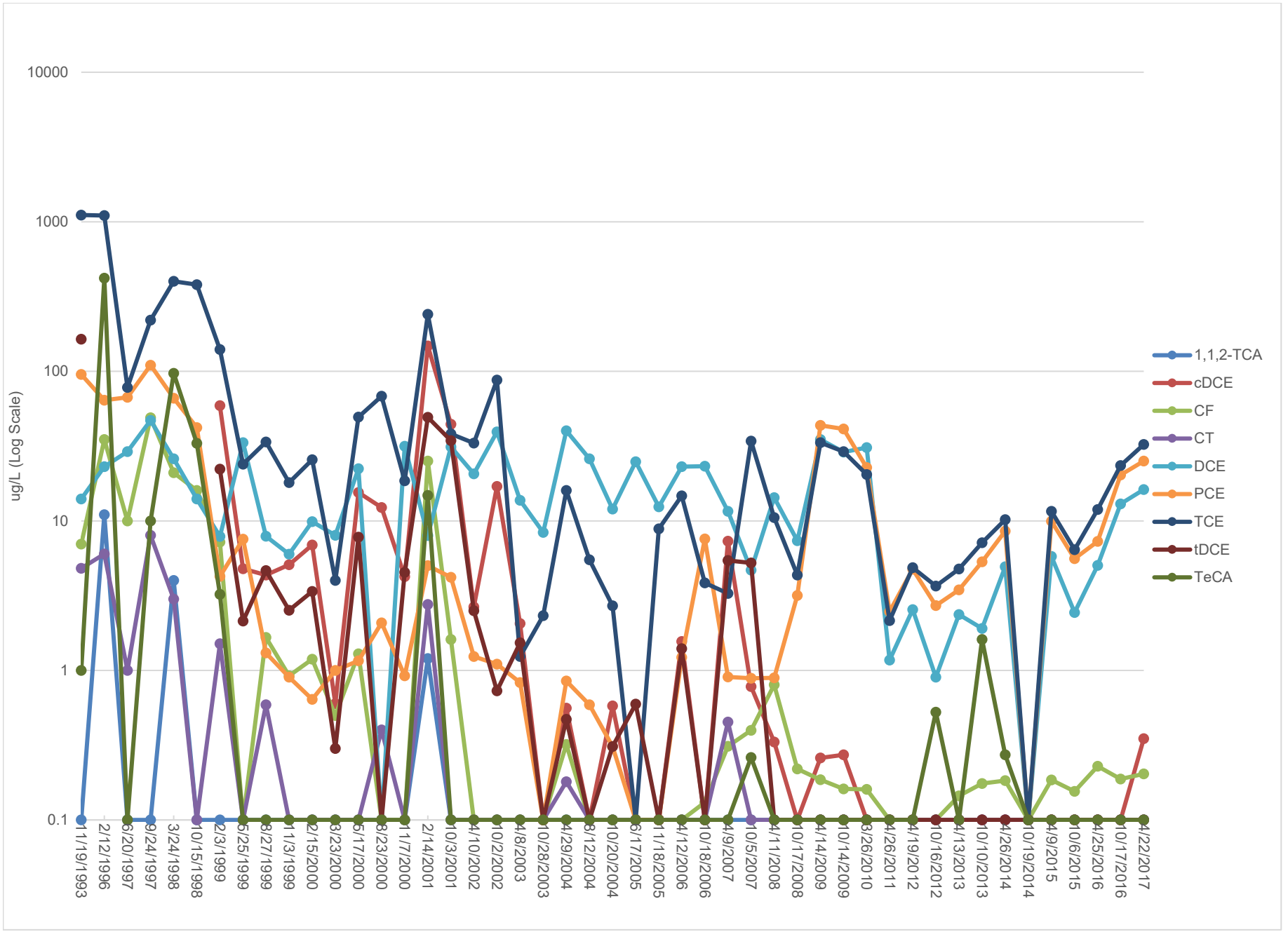
5/24/2016
4/22/2017
DCE
PCE
TCE

MW-31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4/25/2016
10/17/2016
4/22/2017
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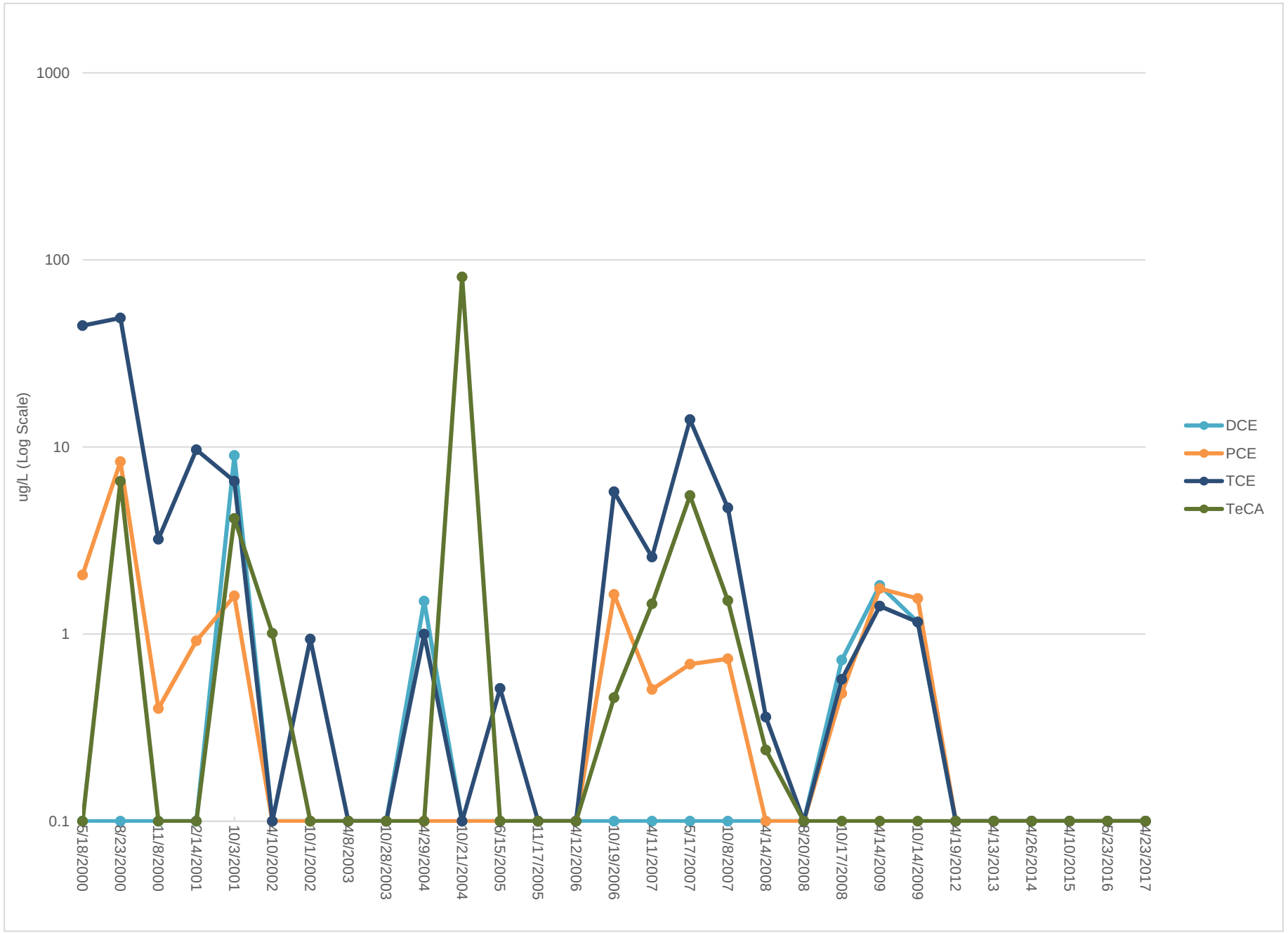
CF
CT
DCE
PCE
TCE
tDCE
TeCA

MW-68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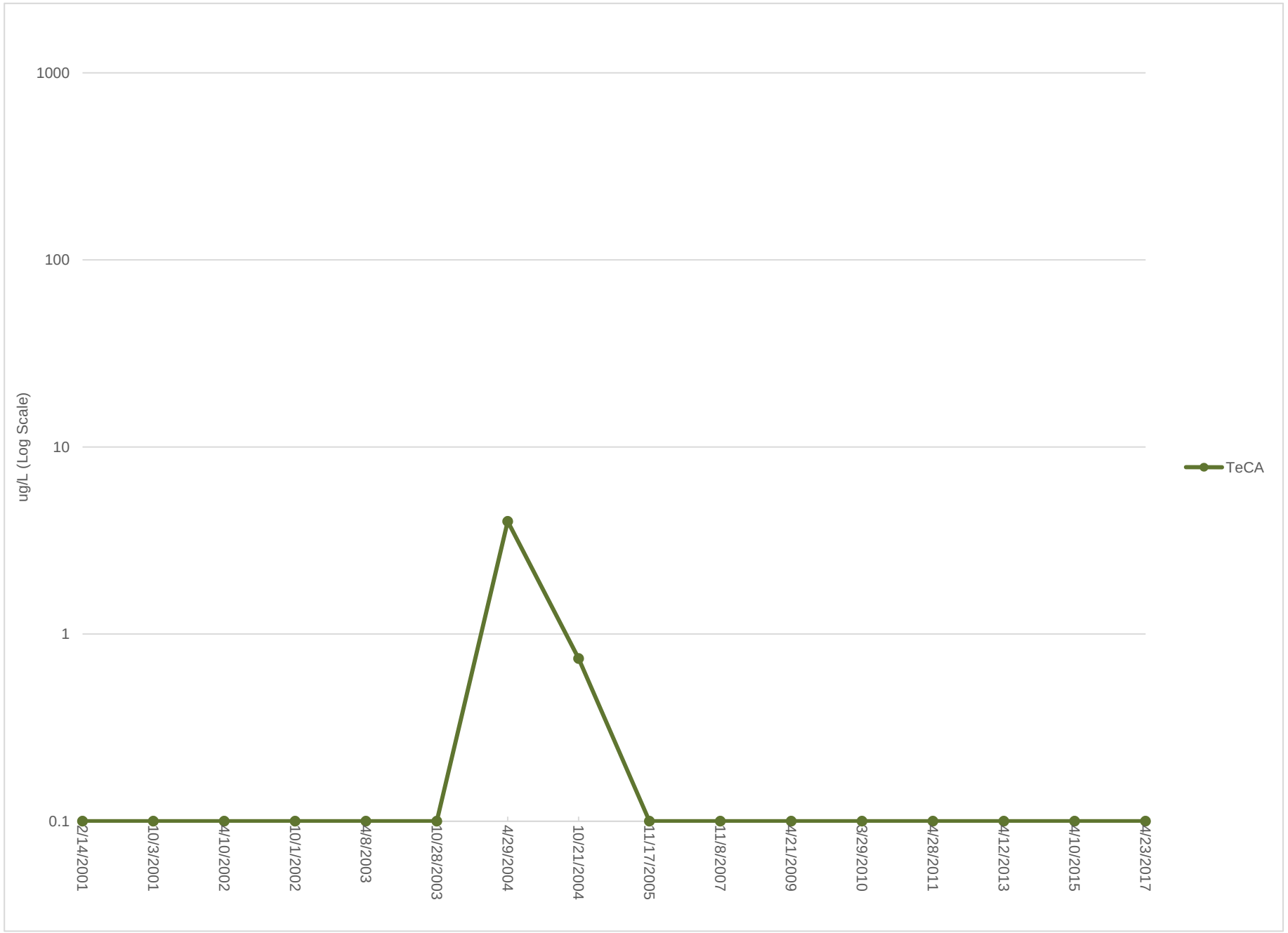
4/10/2015
5/23/2016
4/23/2017
DCE
PCE
TCE
TeCA

MW-78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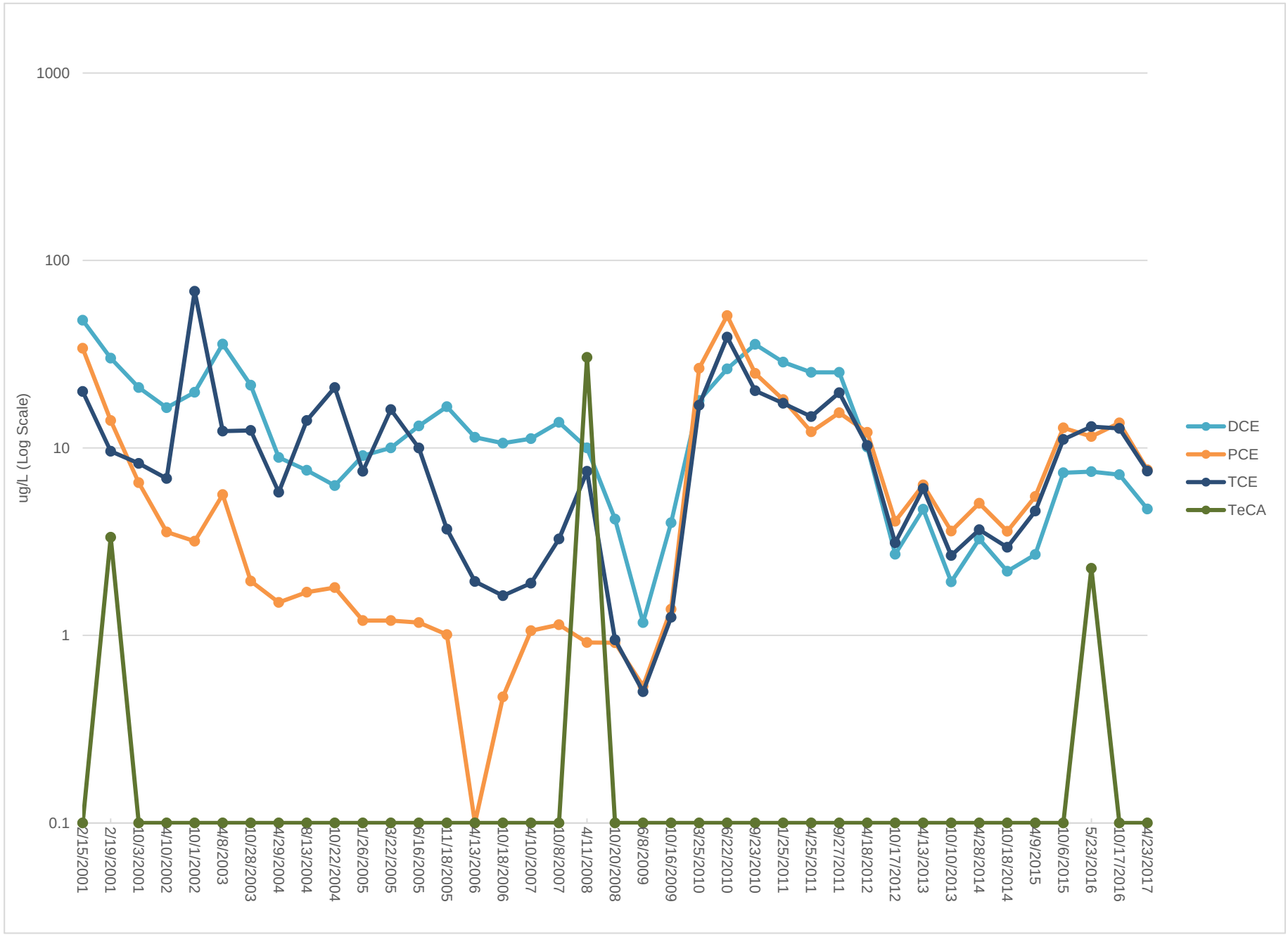
4/23/2017
TeCA

MW-79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4/18/2012
10/17/2012
4/13/2013
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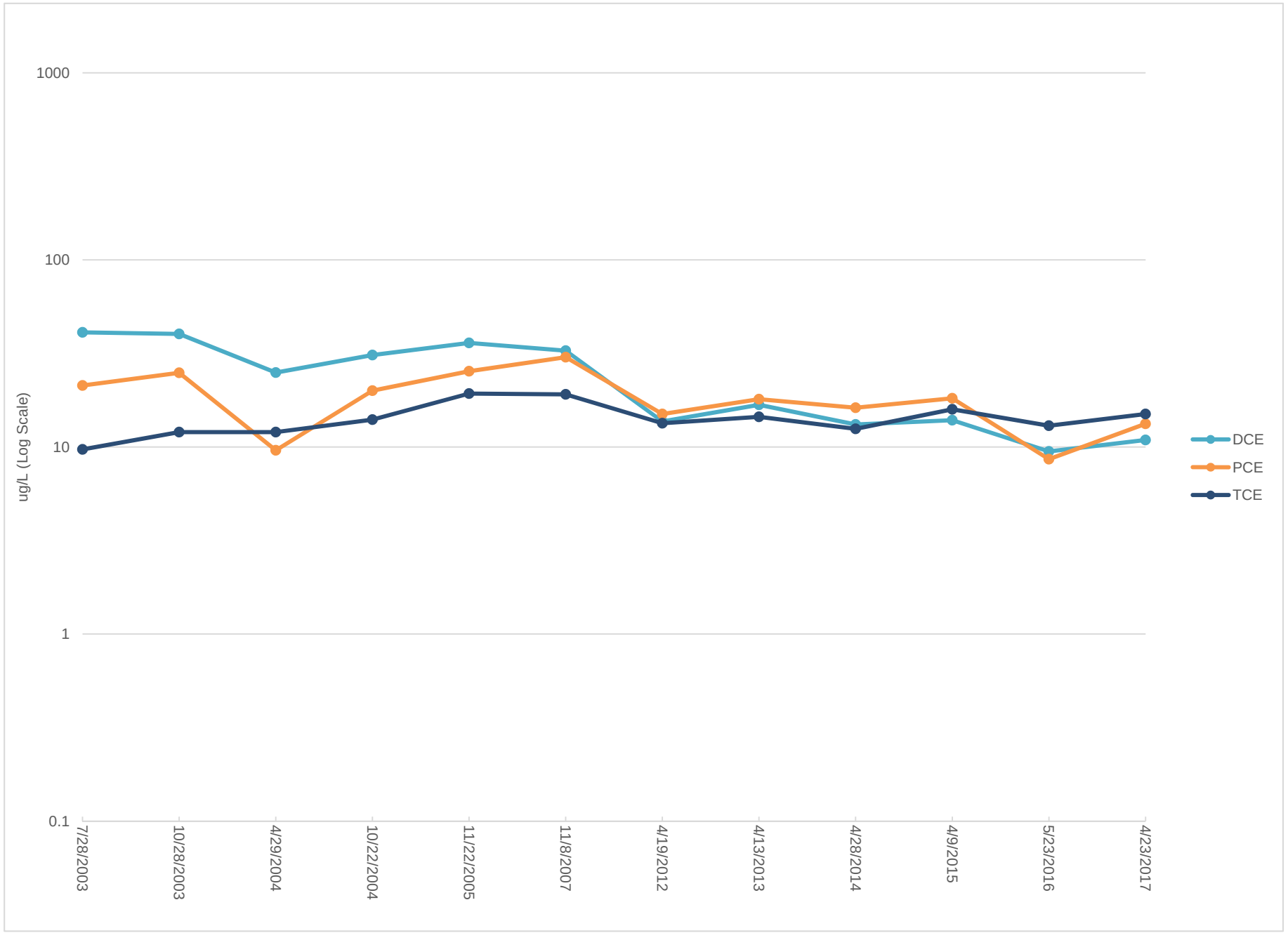
5/23/2016
10/17/2016
4/23/2017

MW-129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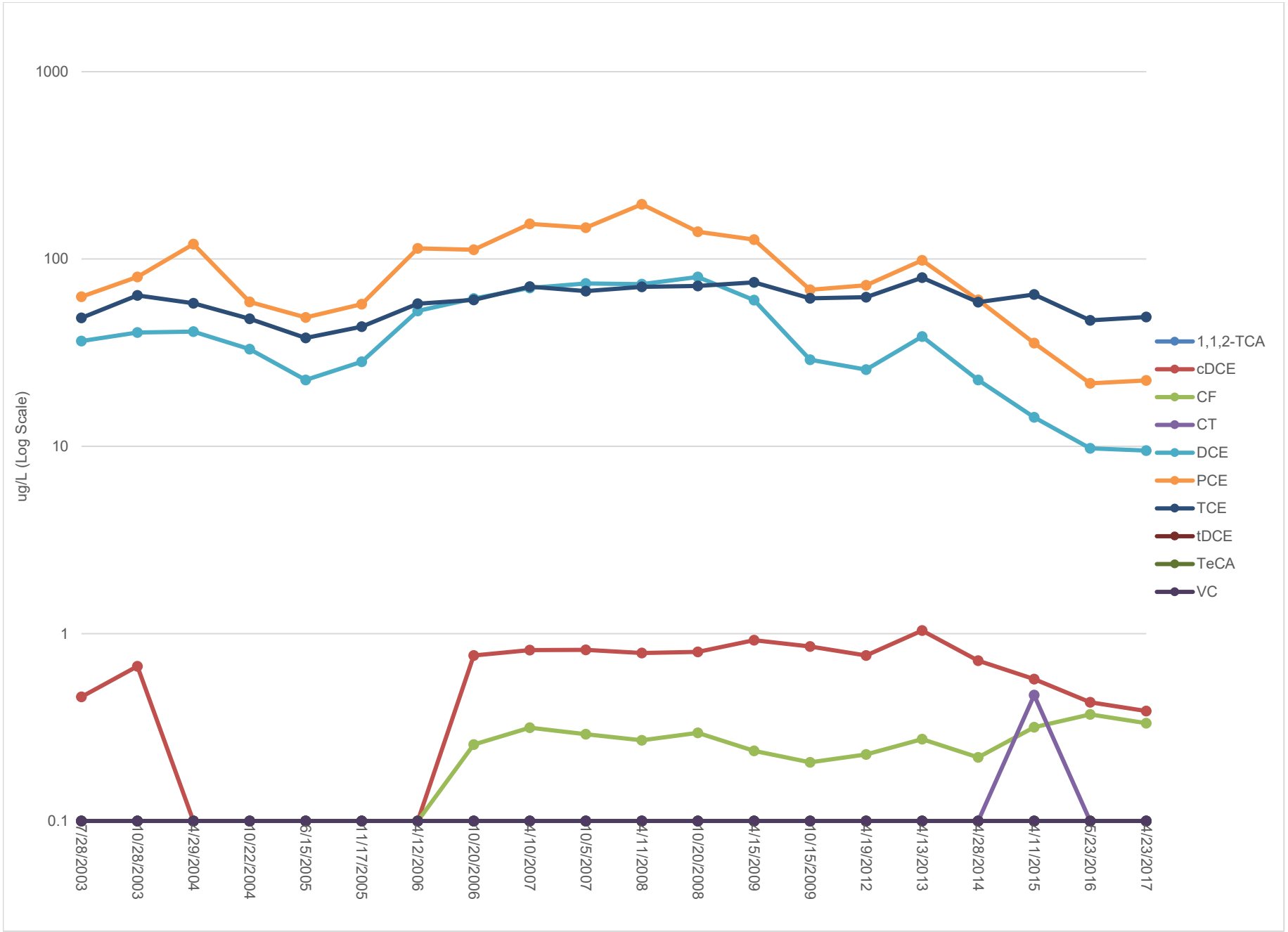
4/9/2015
5/23/2016
4/23/2017
DCE
PCE
TCE

MW-130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cDCE
CF
CT
DCE
PCE
TCE
tDCE
TeCA
VC
7/28/2003
10/28/2003
4/29/2004
10/22/2004
6/15/2005
11/17/2005
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4/11/2008
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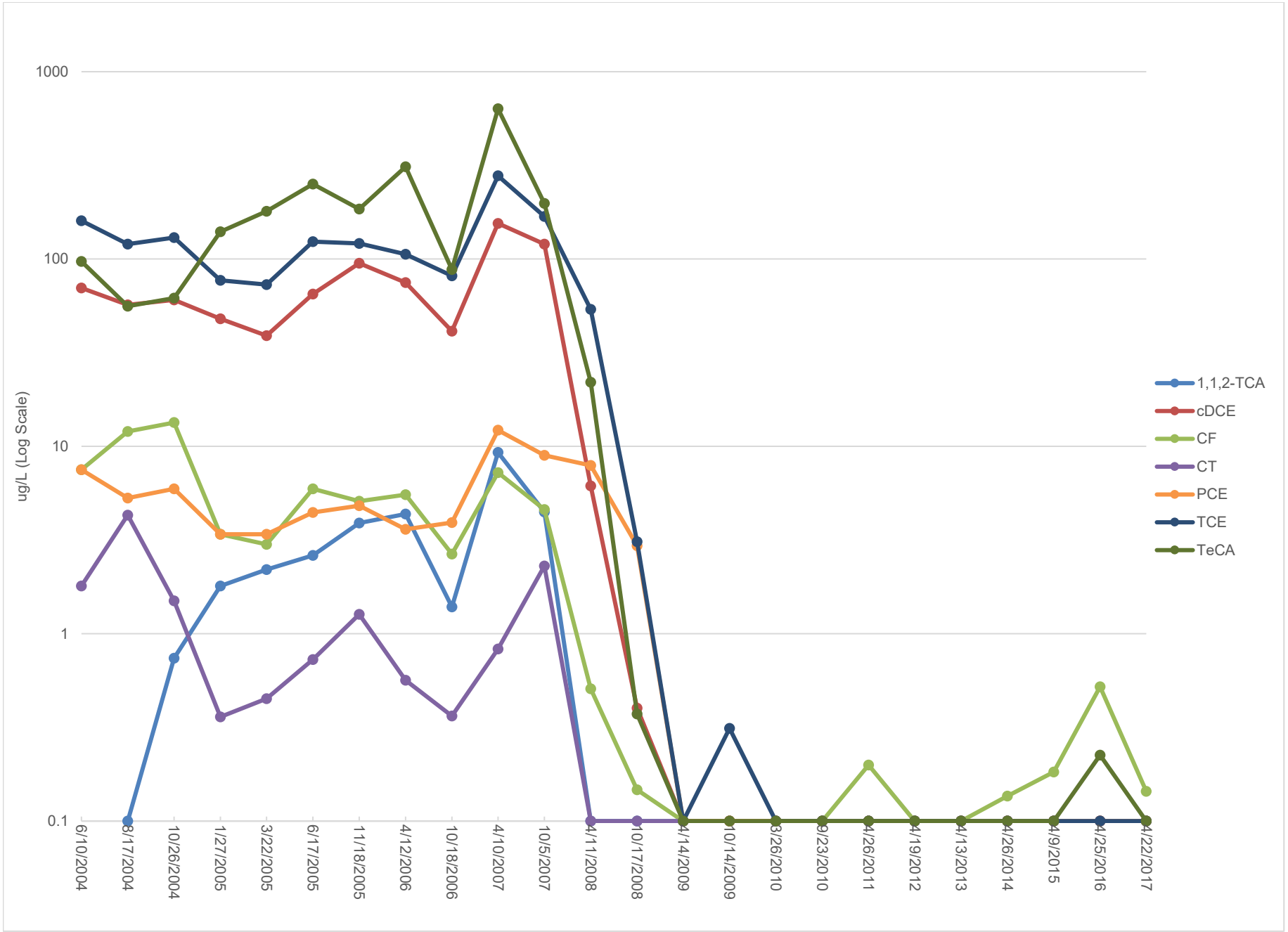
5/23/2016
4/23/2017

MW-147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10/17/2008
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CT
PCE
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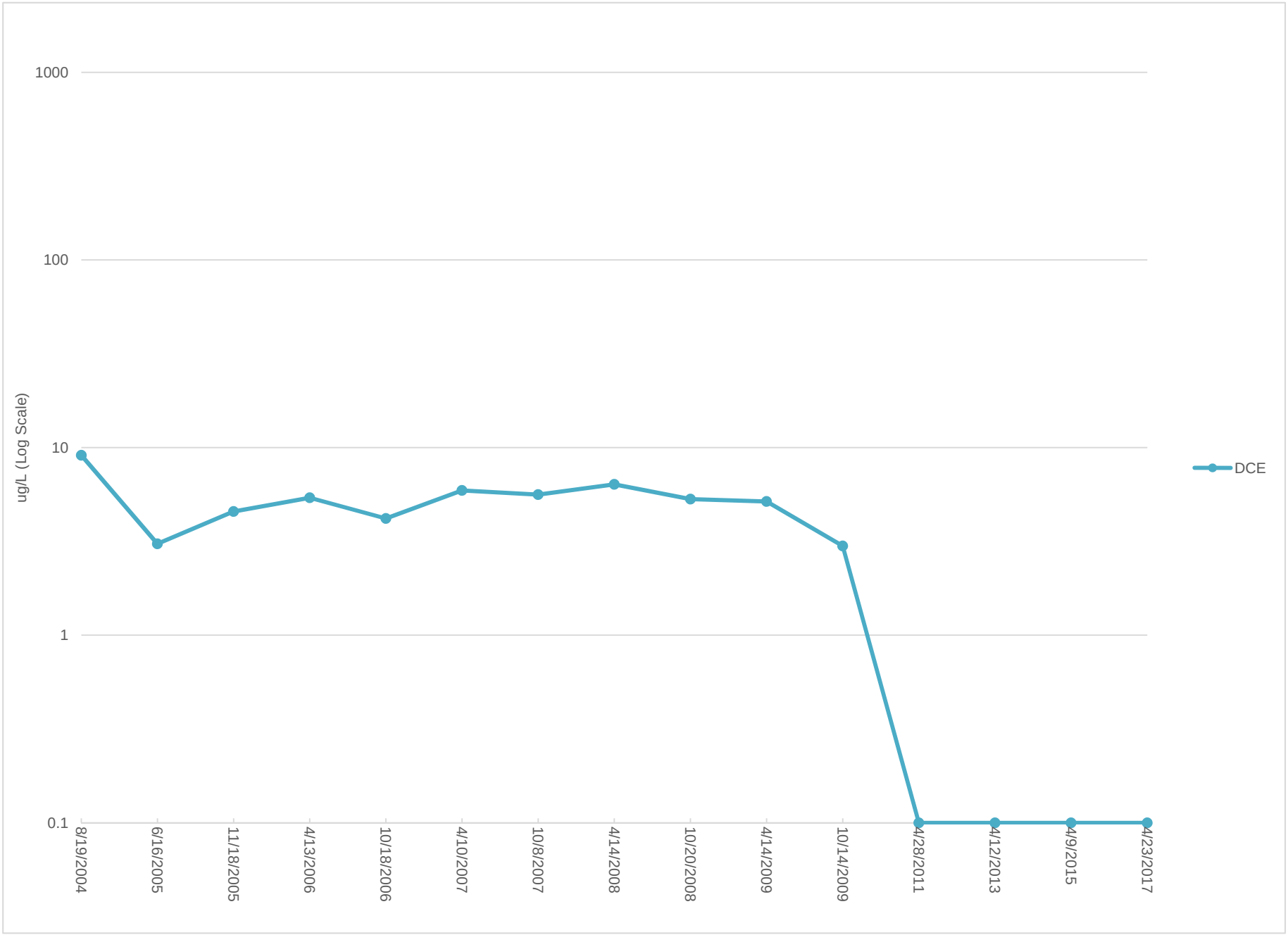
TeCA

MW-153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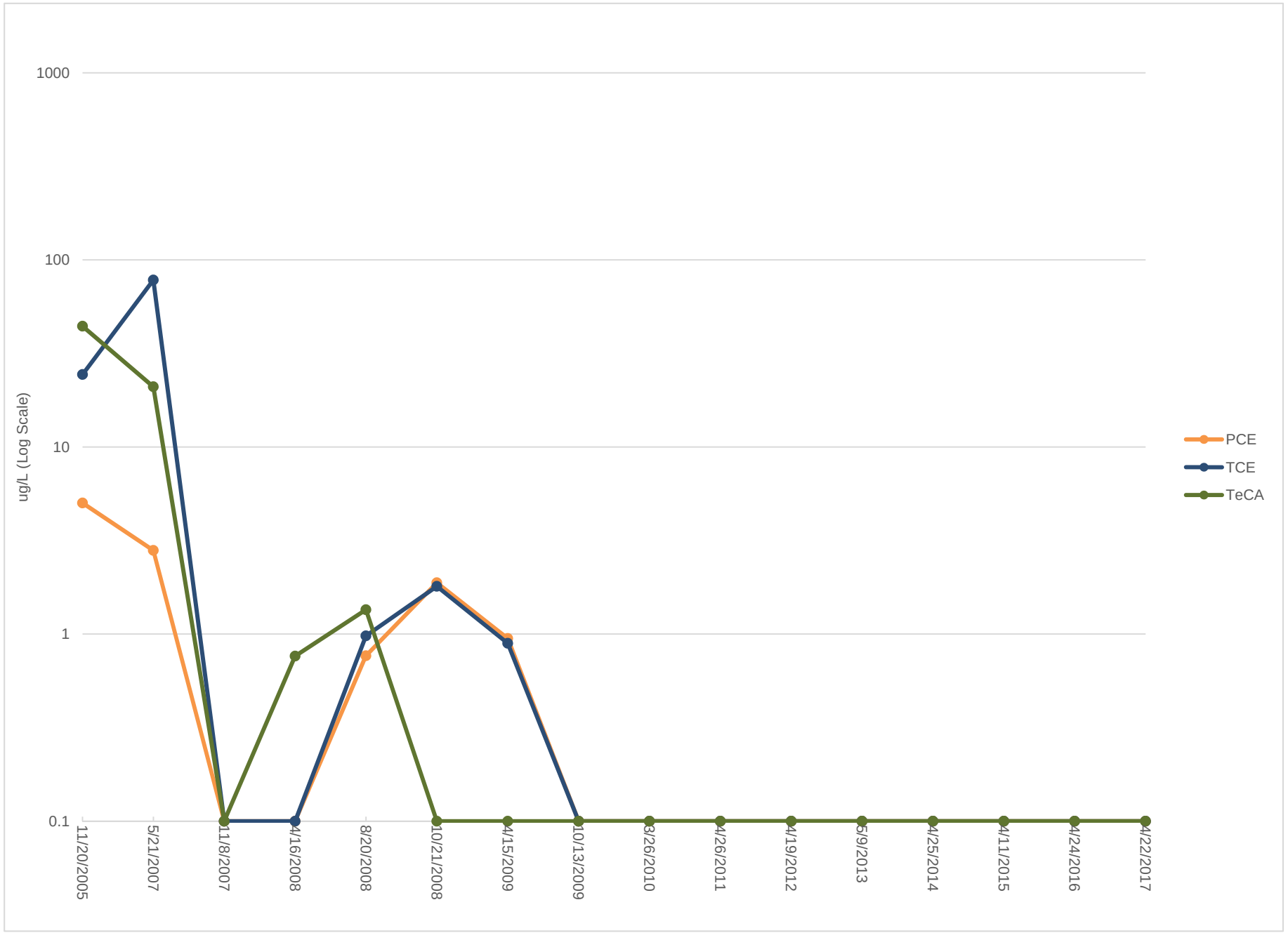
MW-180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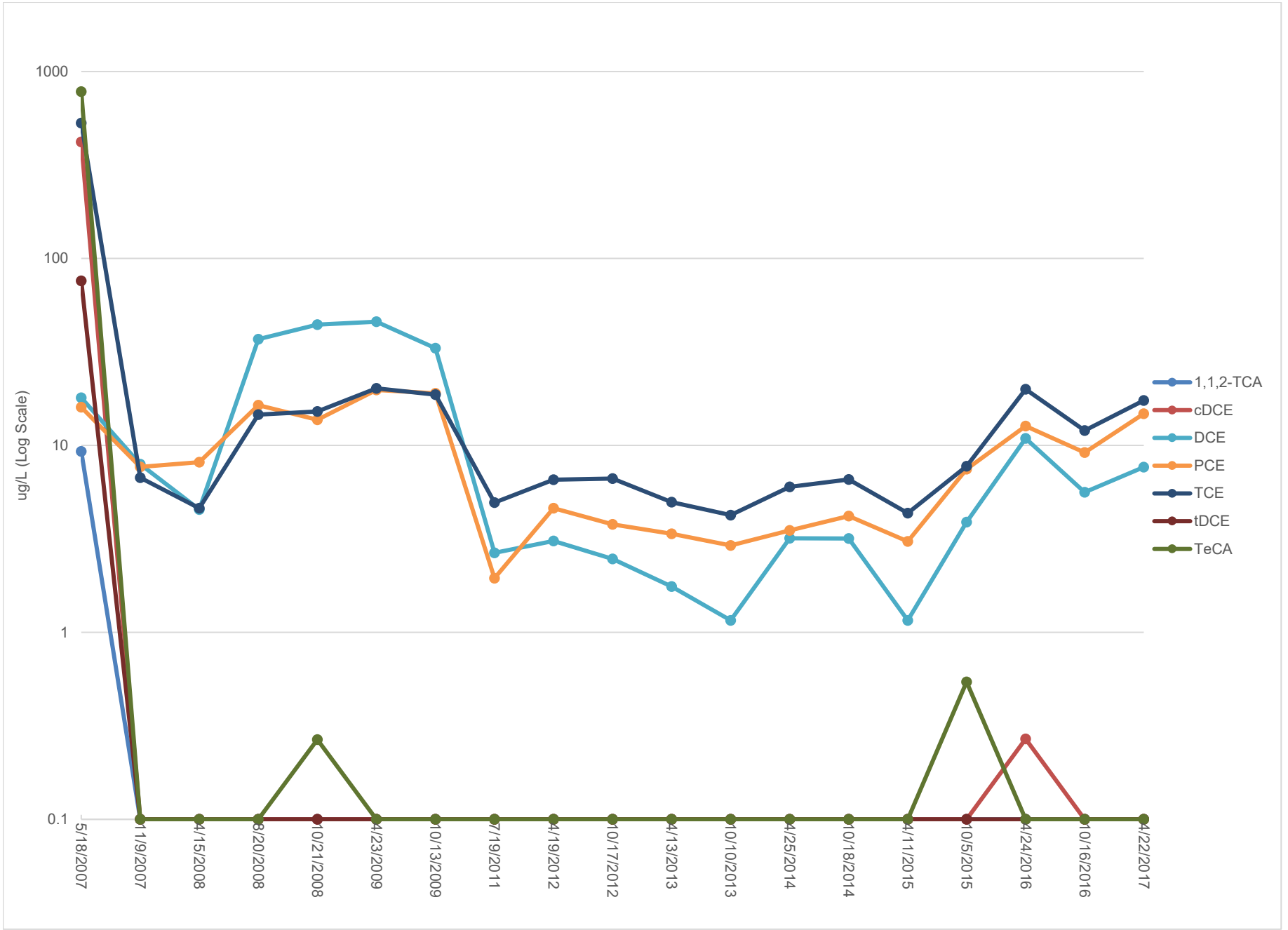
PCE
TCE
TeCA

MW-220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tDCE
TeCA

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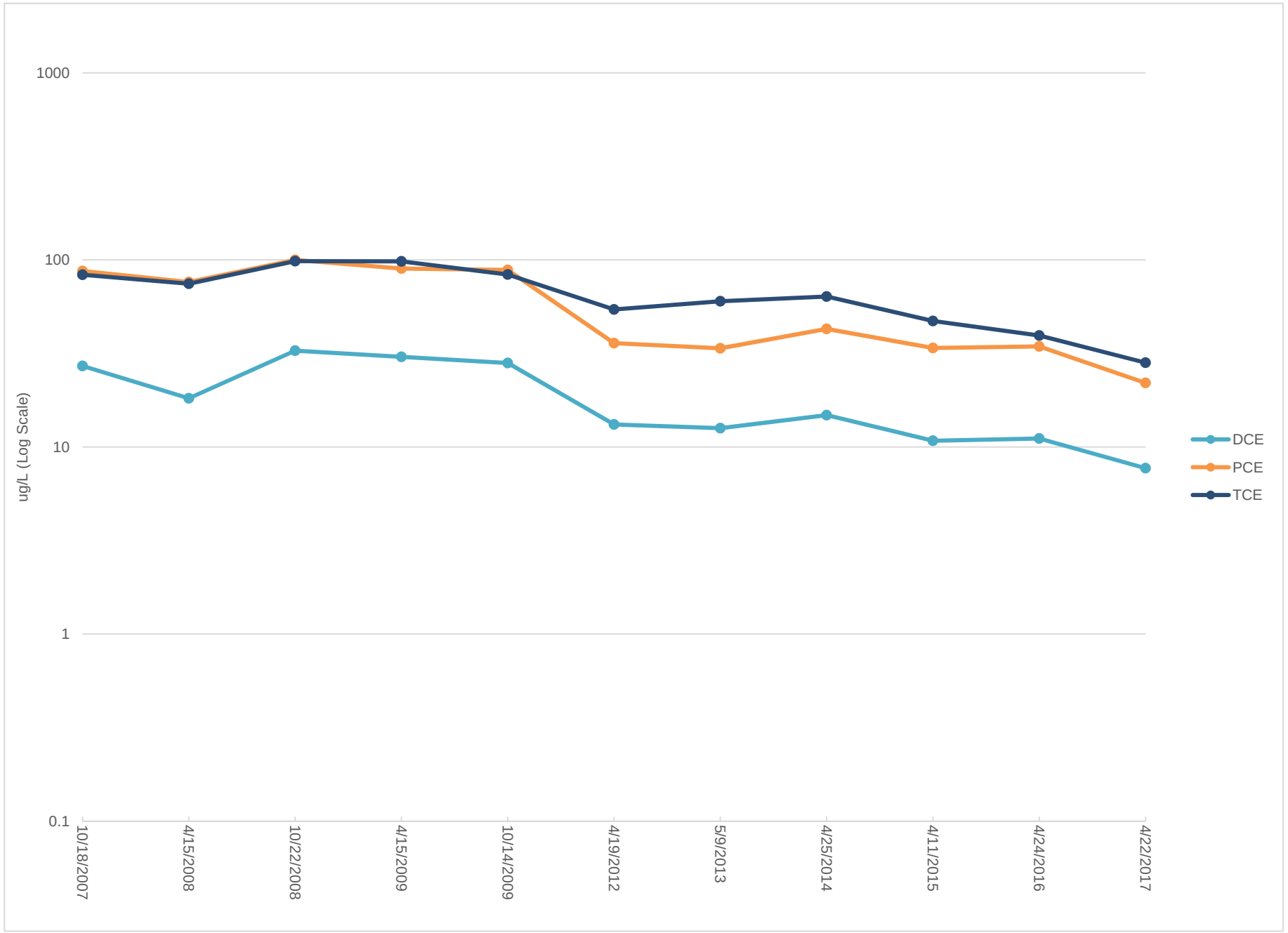
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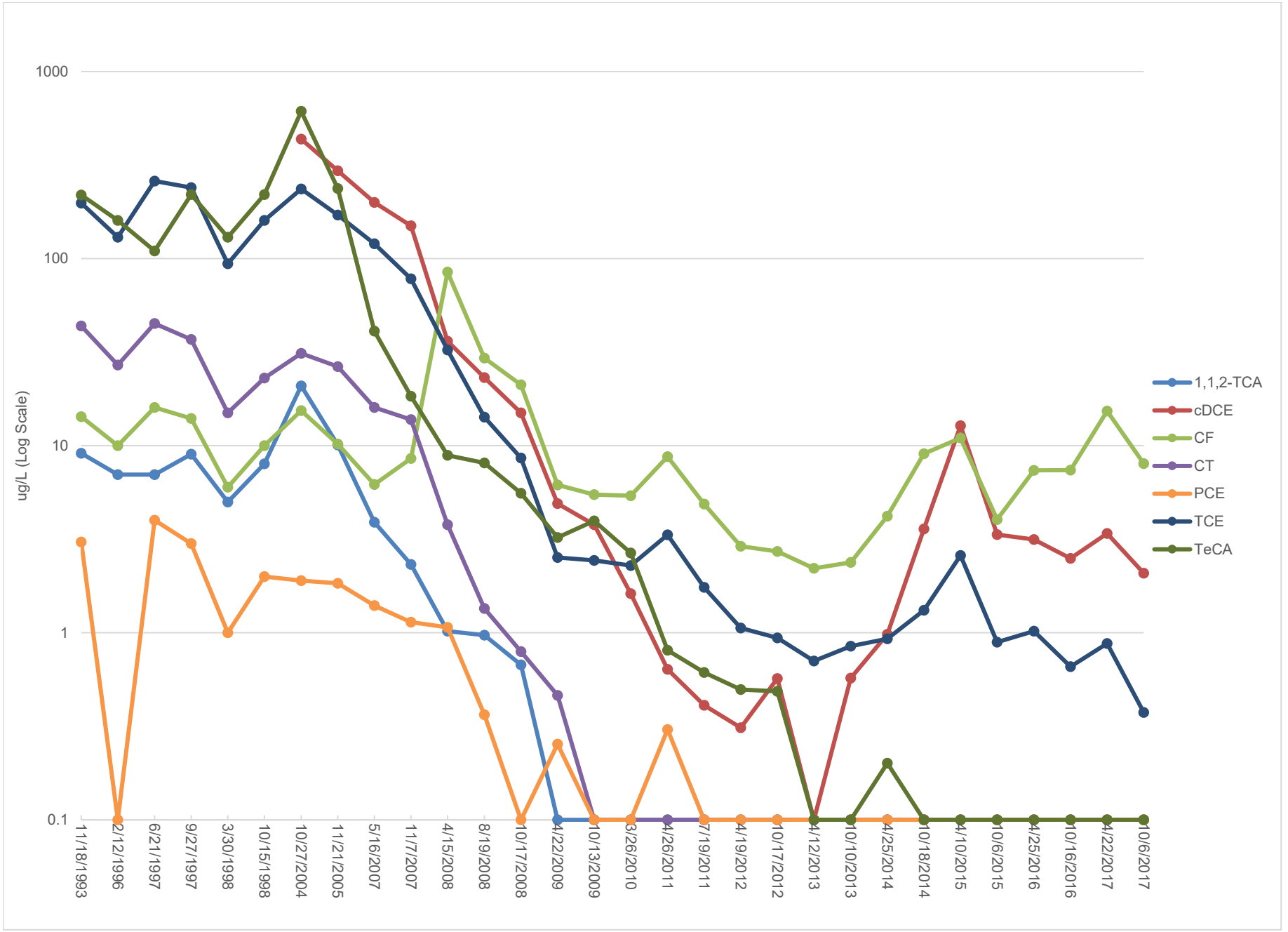
DCE
PCE
TCE

Appendix J-2
CVOC Time-Trend Plots – Dunn Field

West Wells

MW-06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CT
PCE
TCE
TeCA

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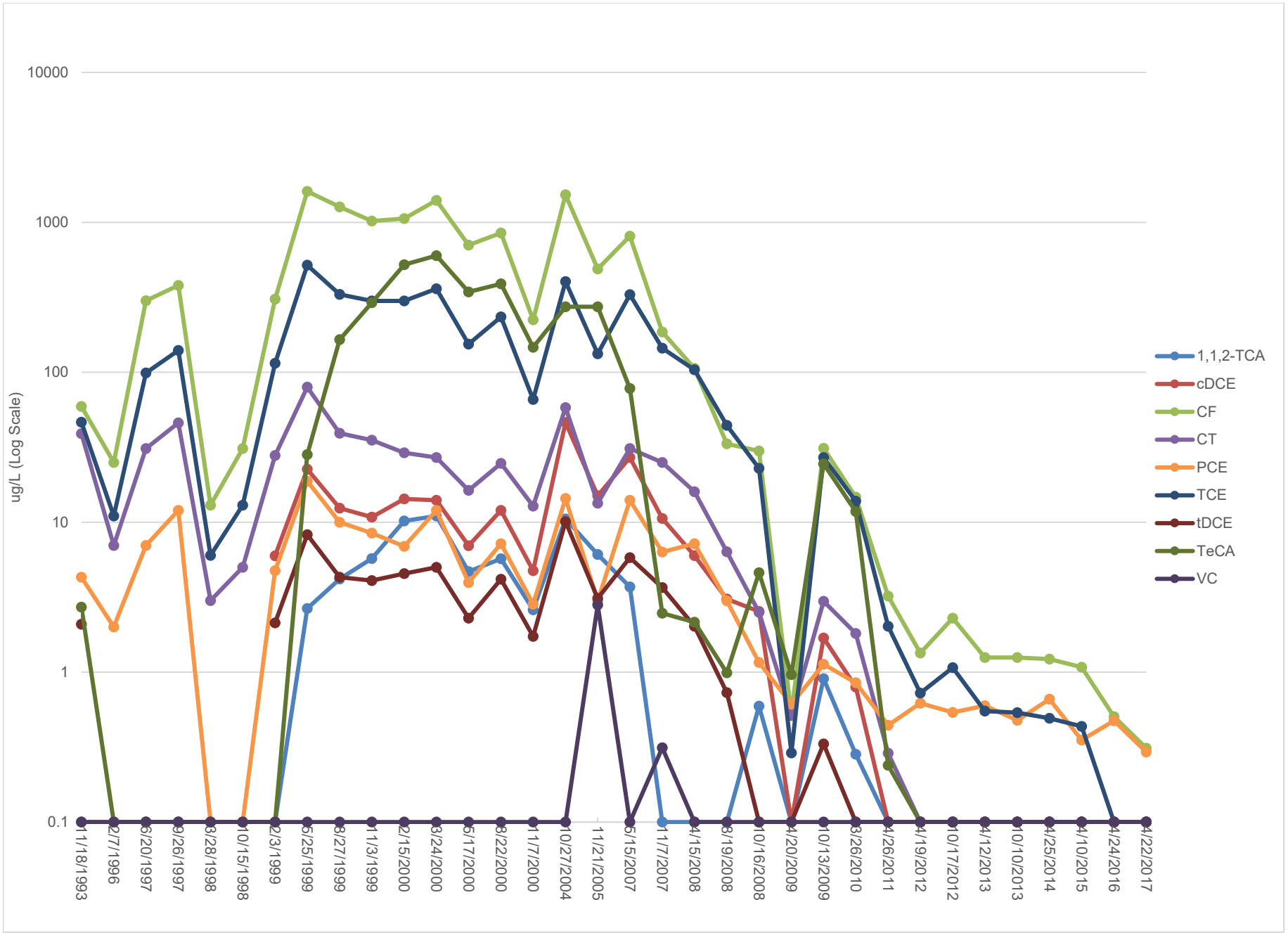
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1,1,2-TCA
cDCE
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PCE
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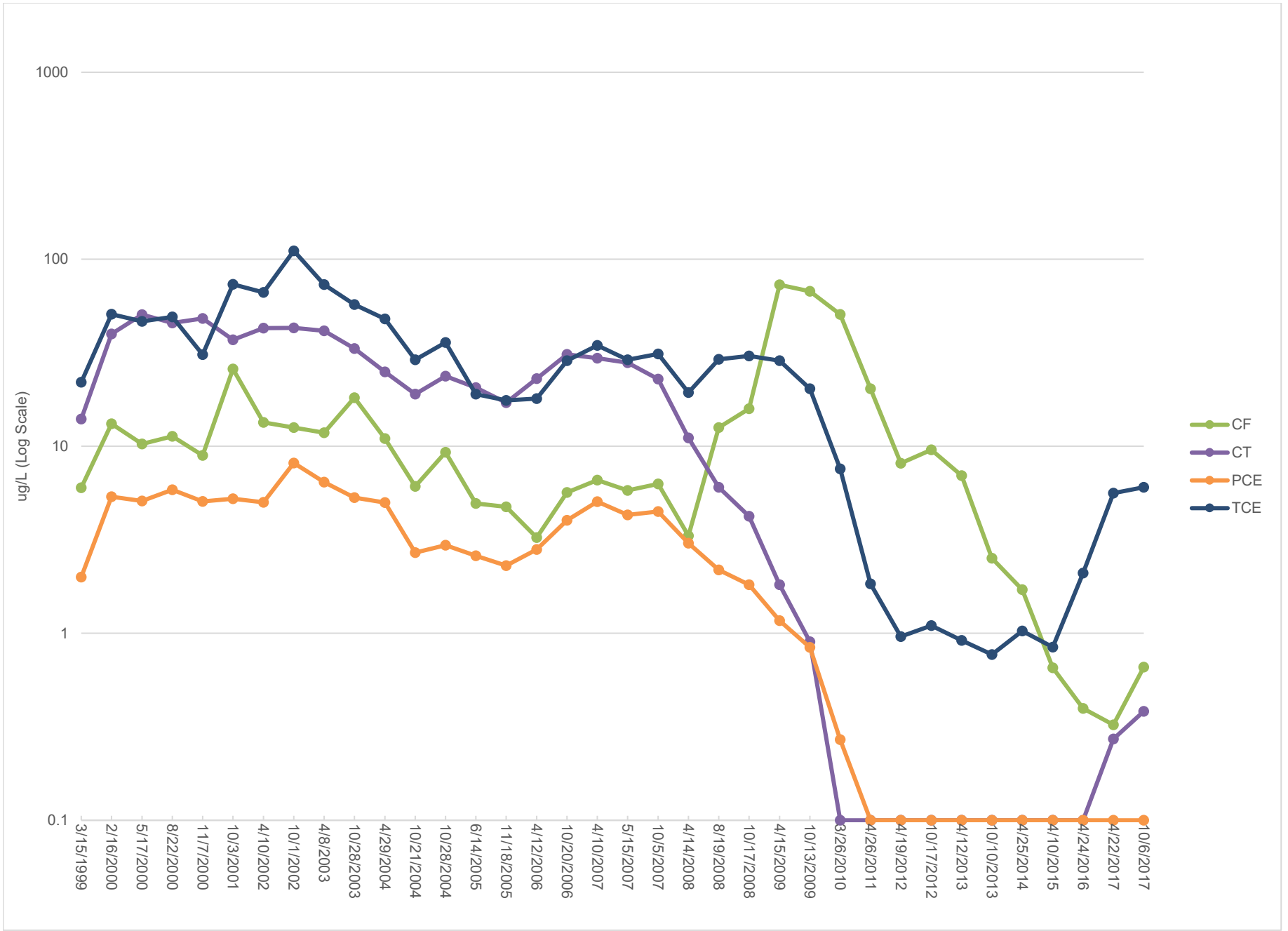
tDCE
TeCA
VC

MW-57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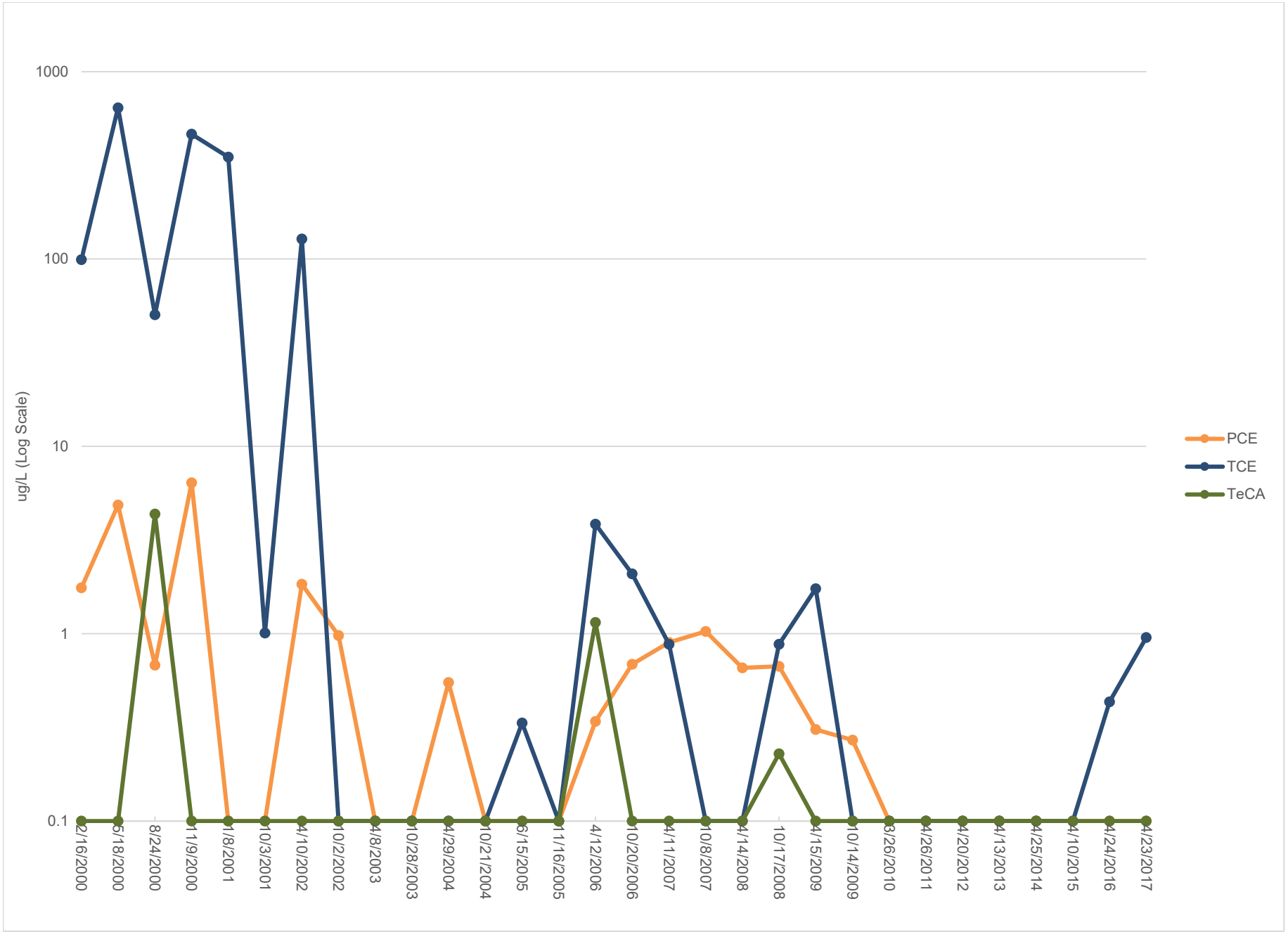
10/6/2017
CF
CT
PCE
TCE

MW-69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TCE
TeCA
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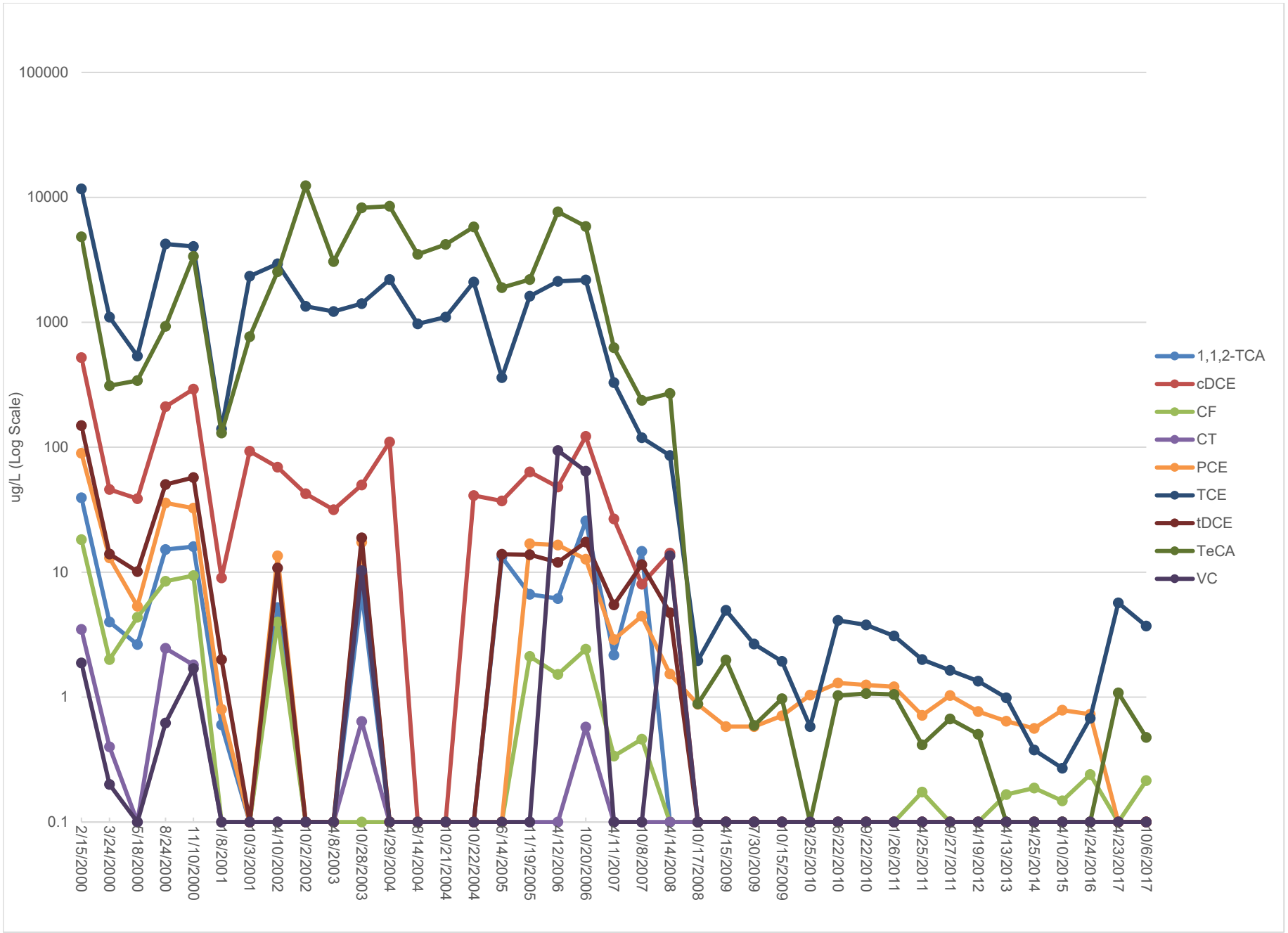
4/23/2017

MW-70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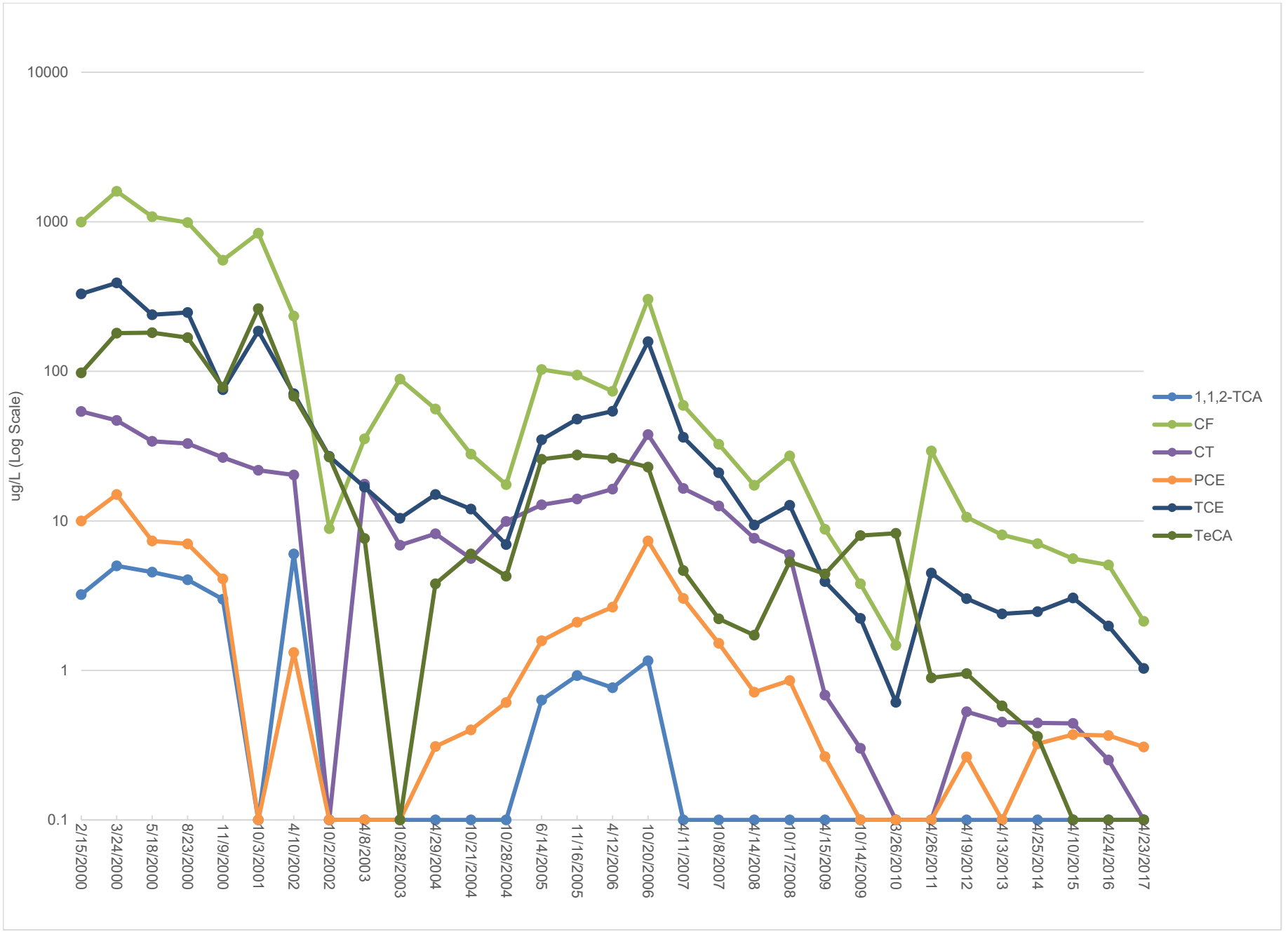
CT
PCE
TCE
tDCE
TeCA
VC

MW-71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CT
PCE
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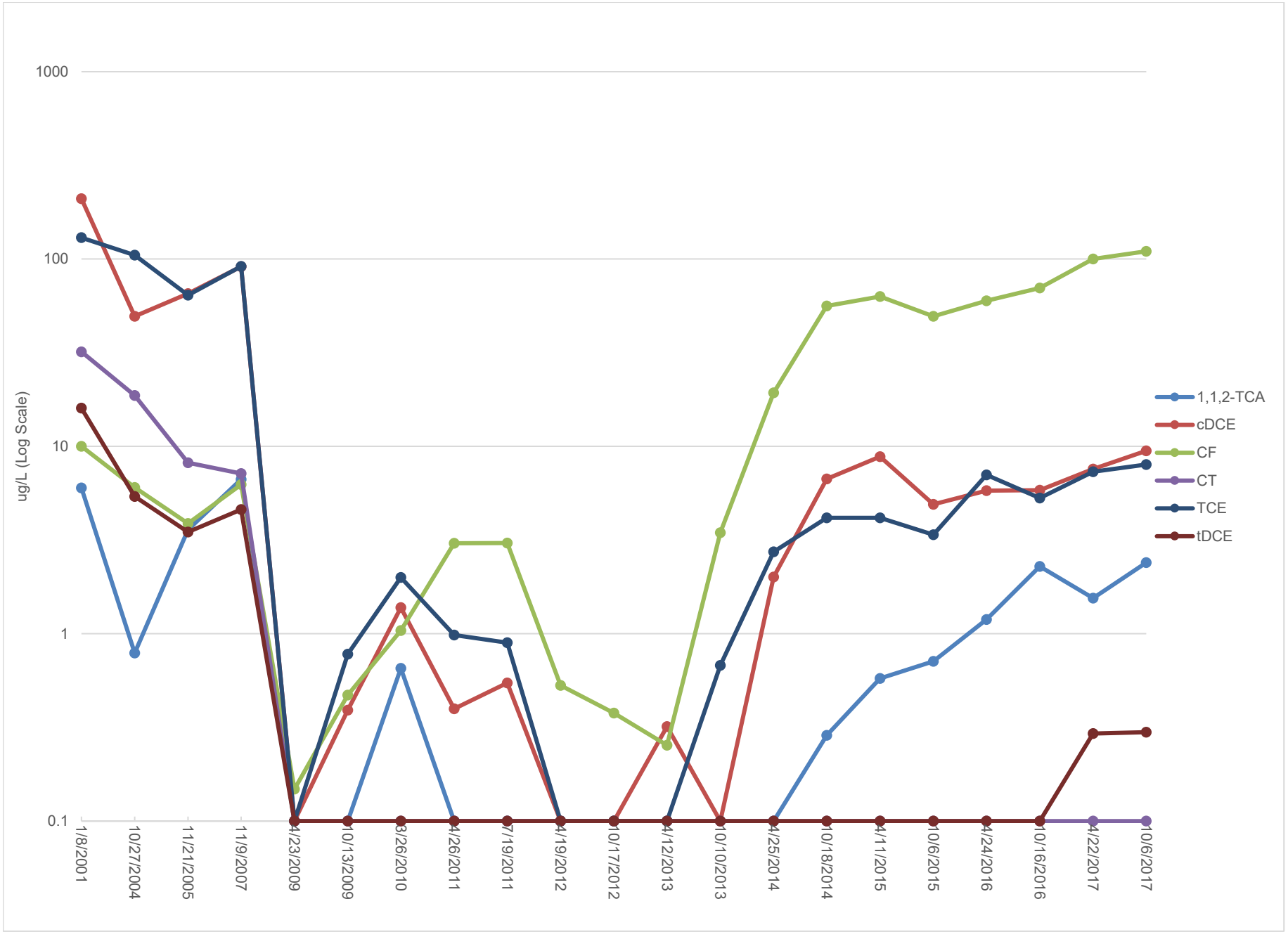
MW-87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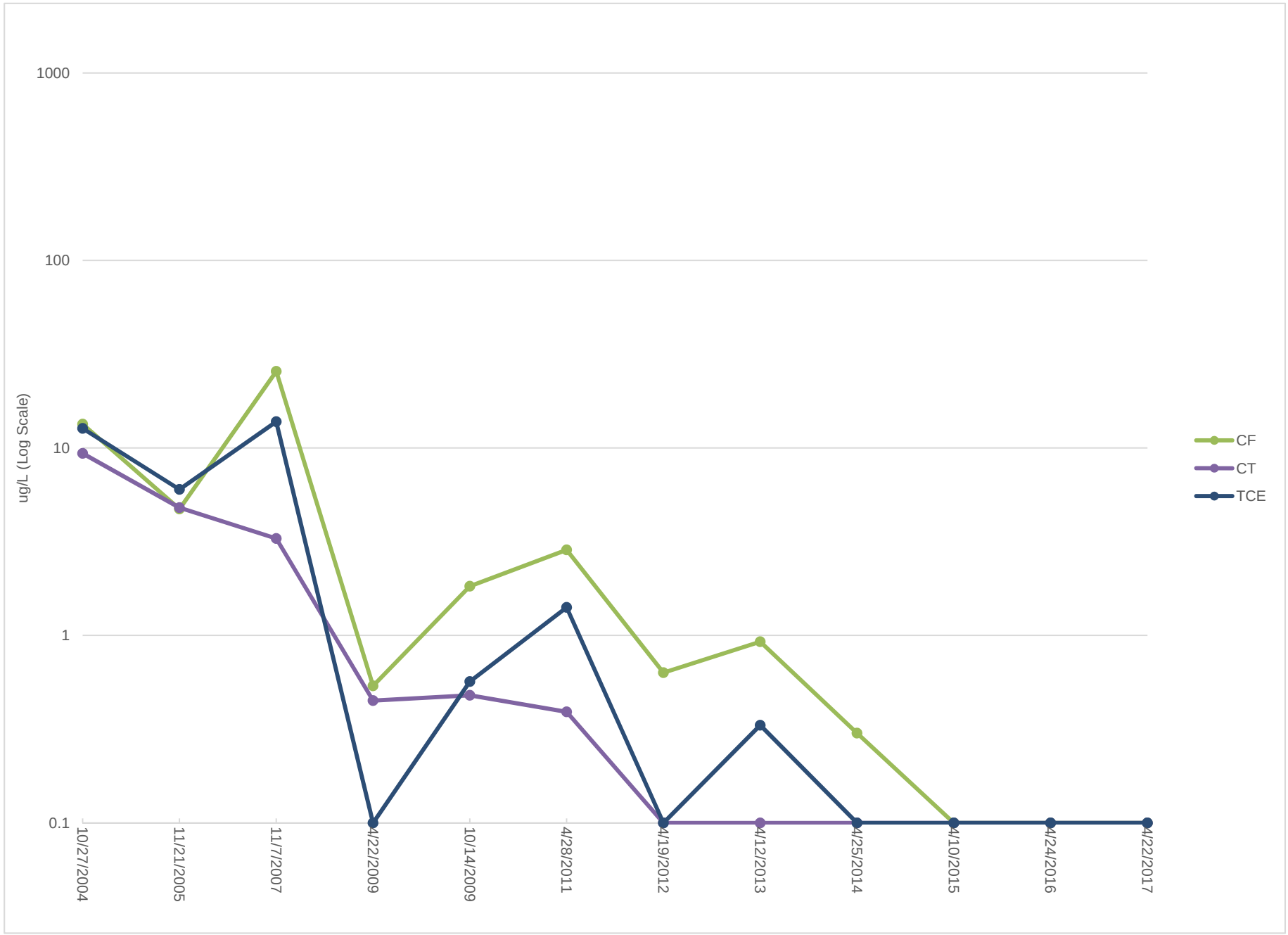
MW-91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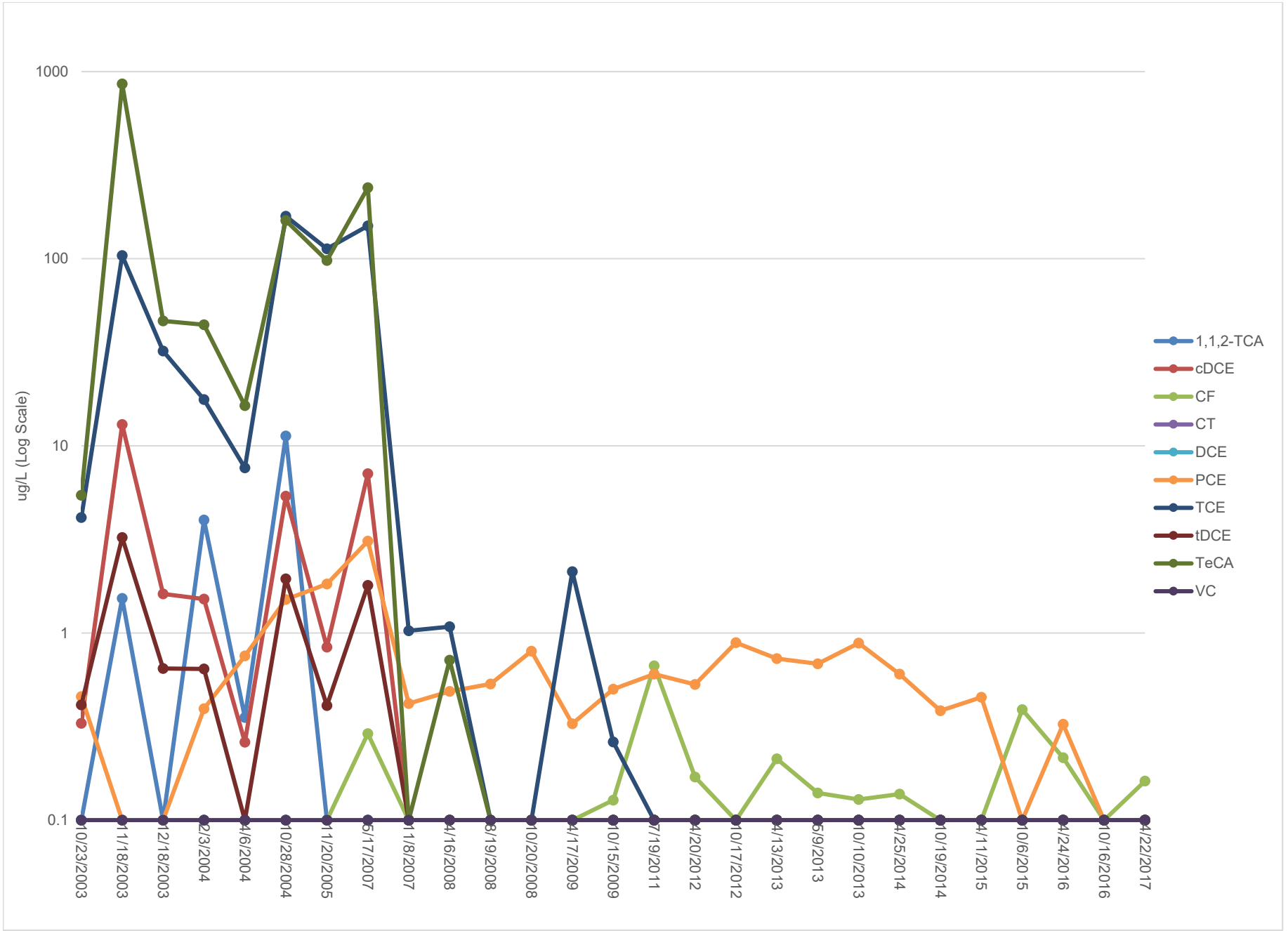
MW-134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TeCA
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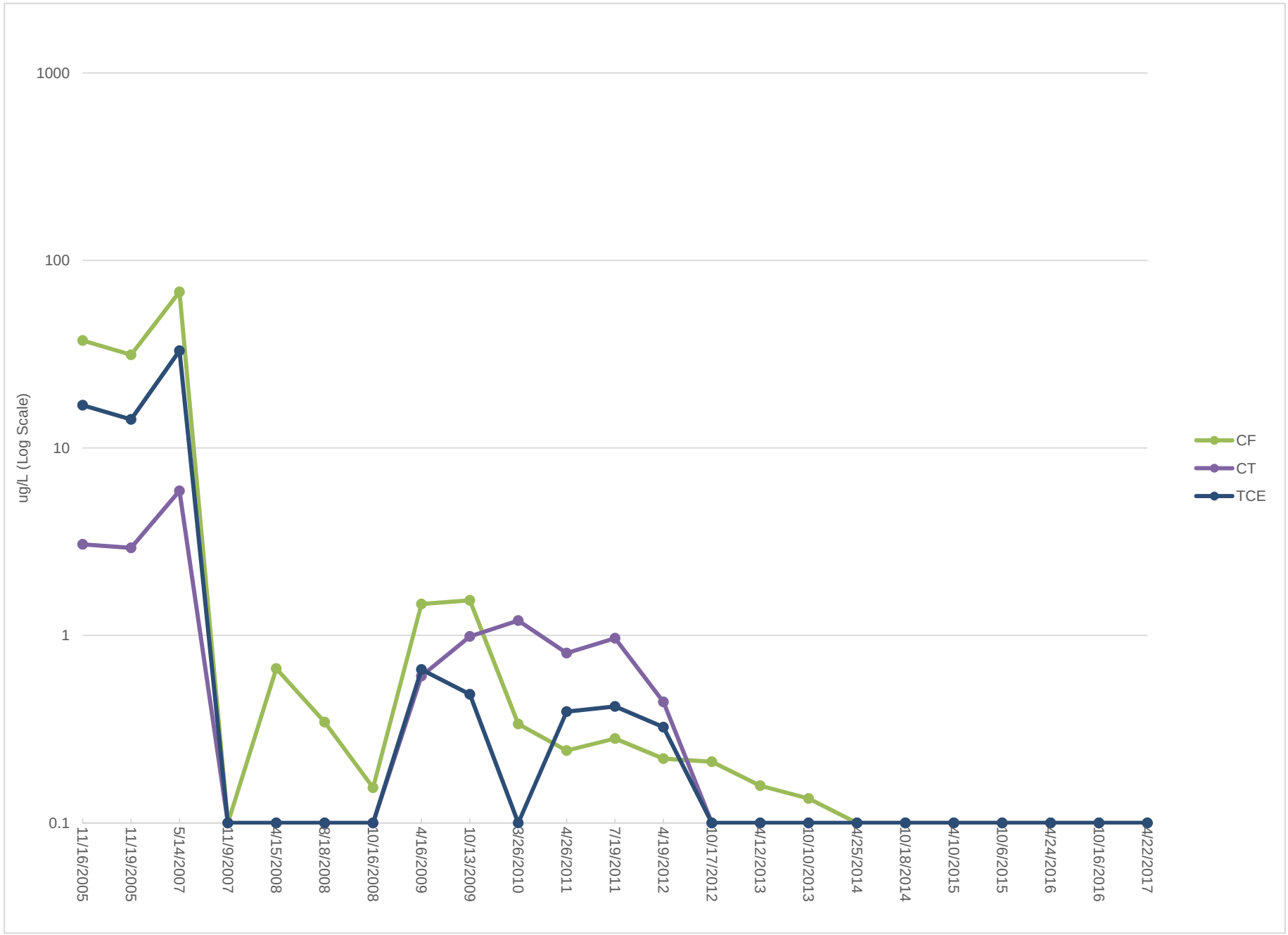
MW-174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CT
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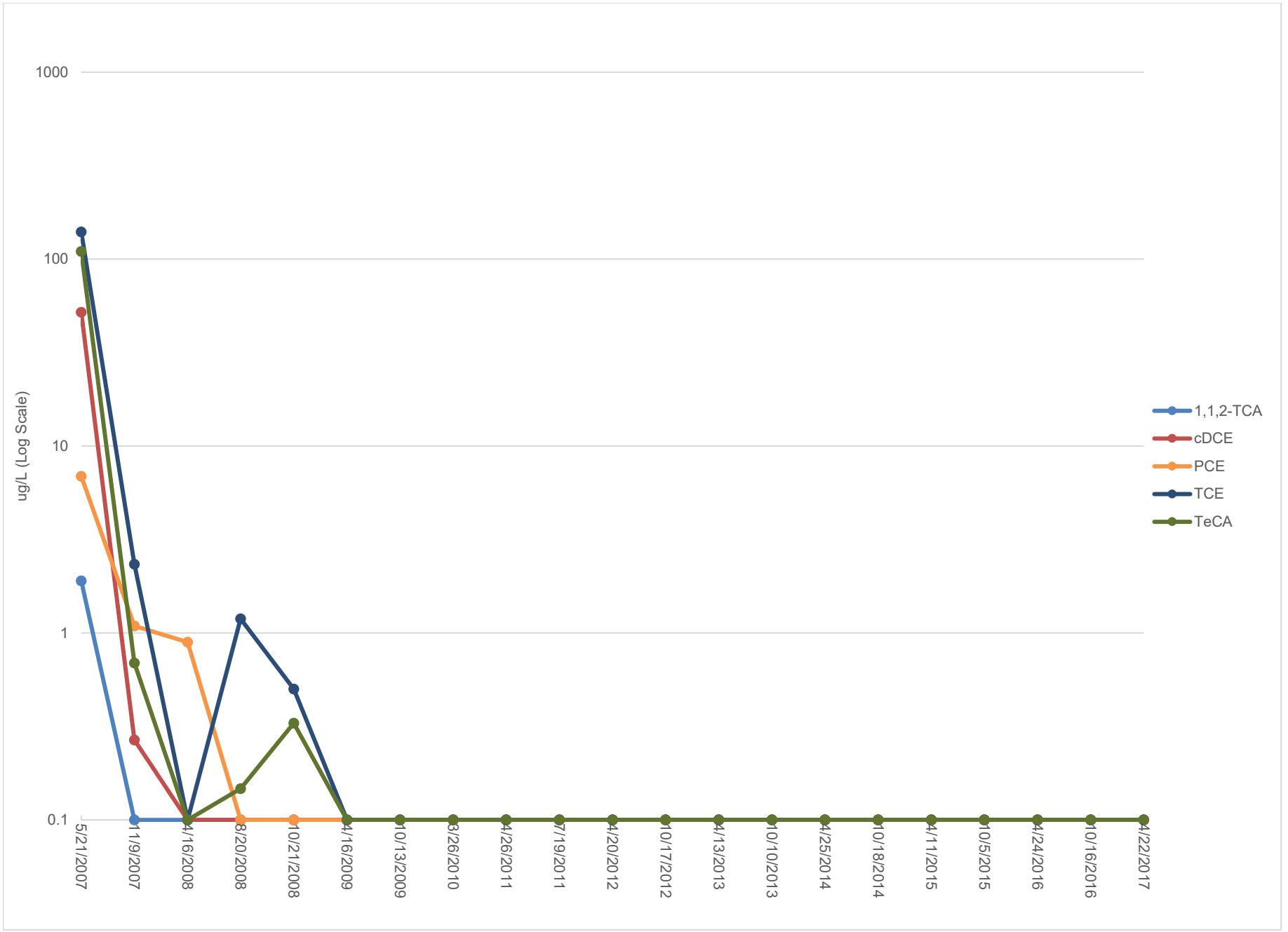
MW-221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4/22/2017
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TCE
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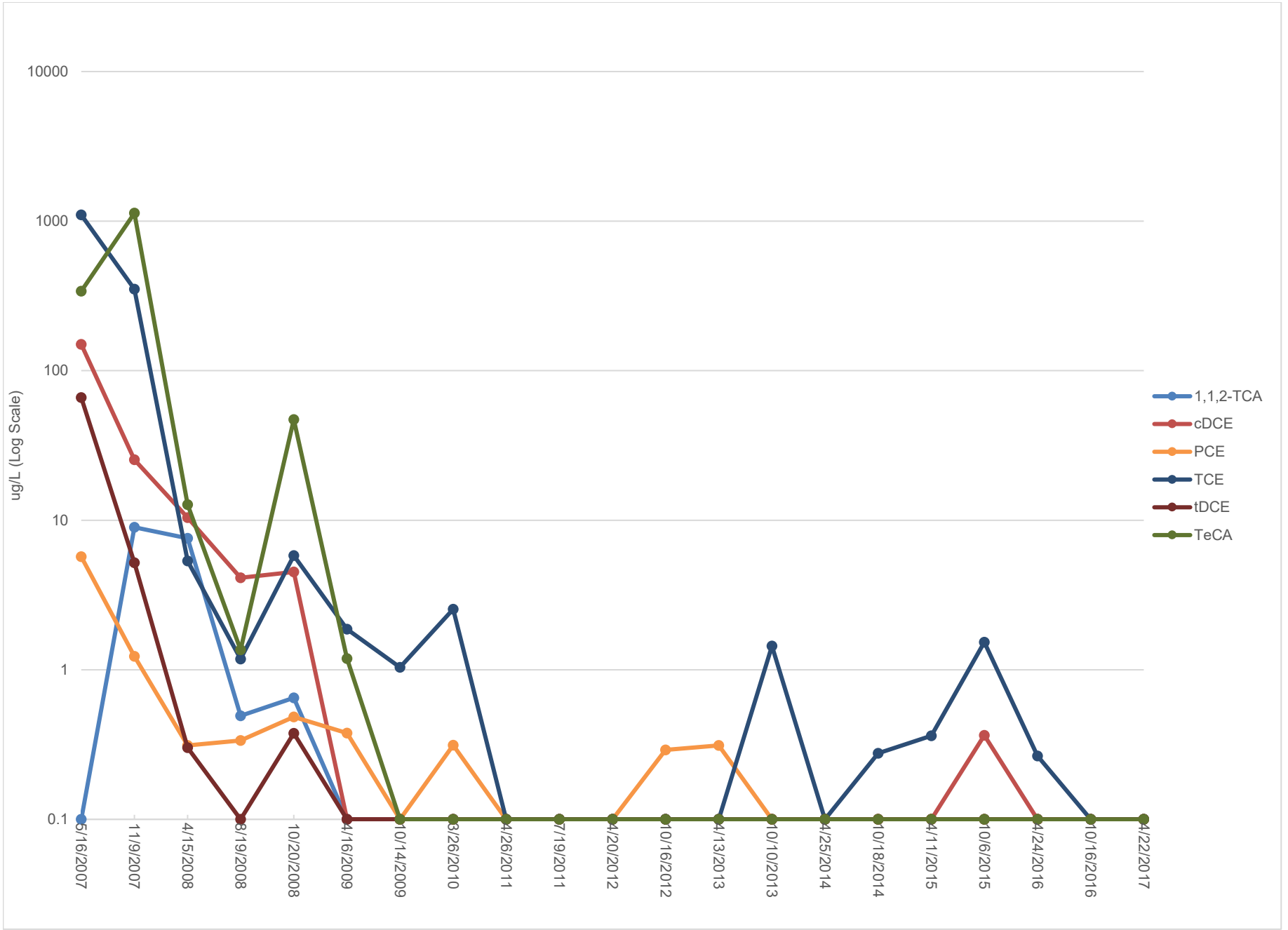
MW-222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PCE
TCE
tDCE
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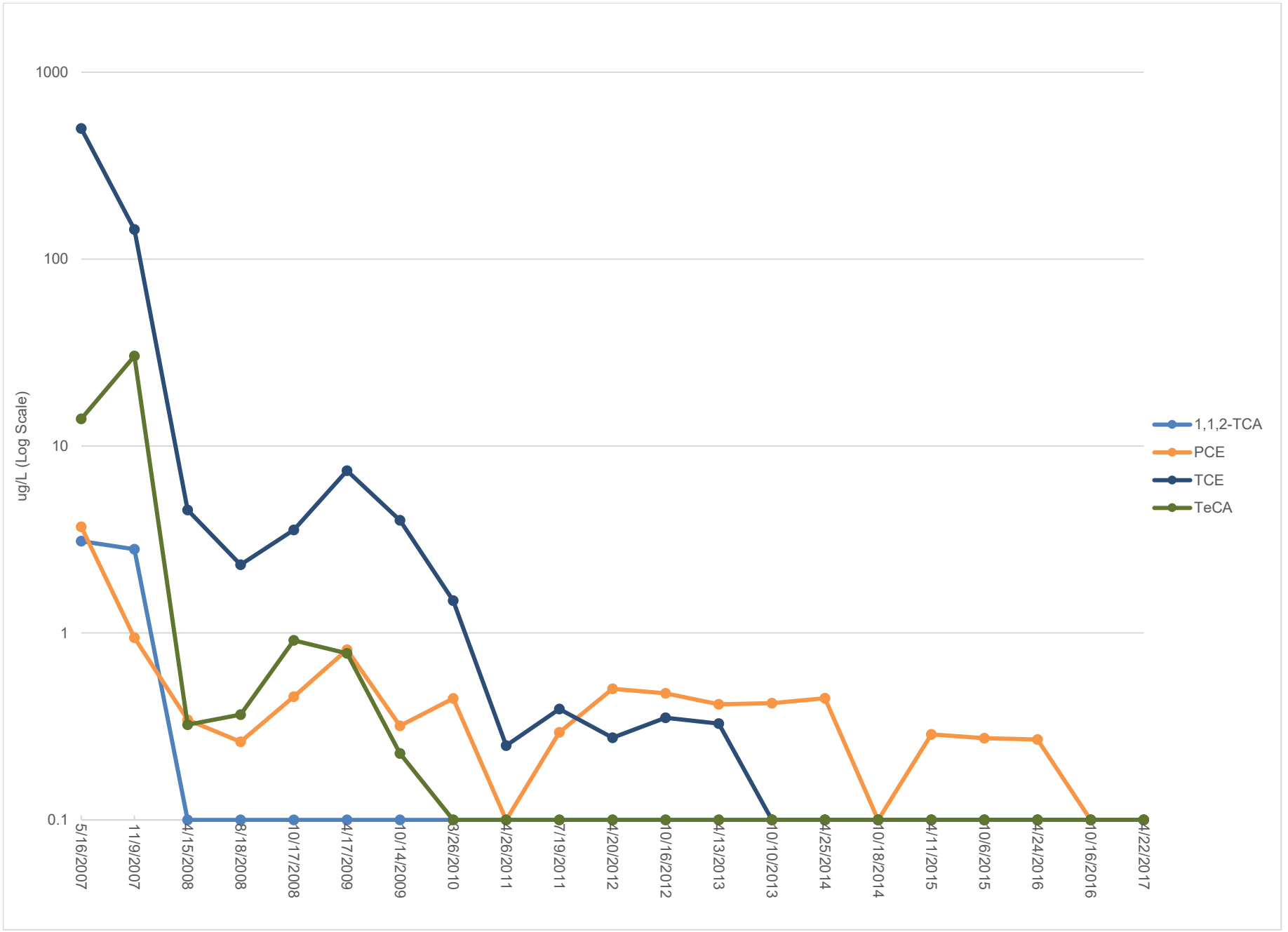
MW-223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TCE
TeCA
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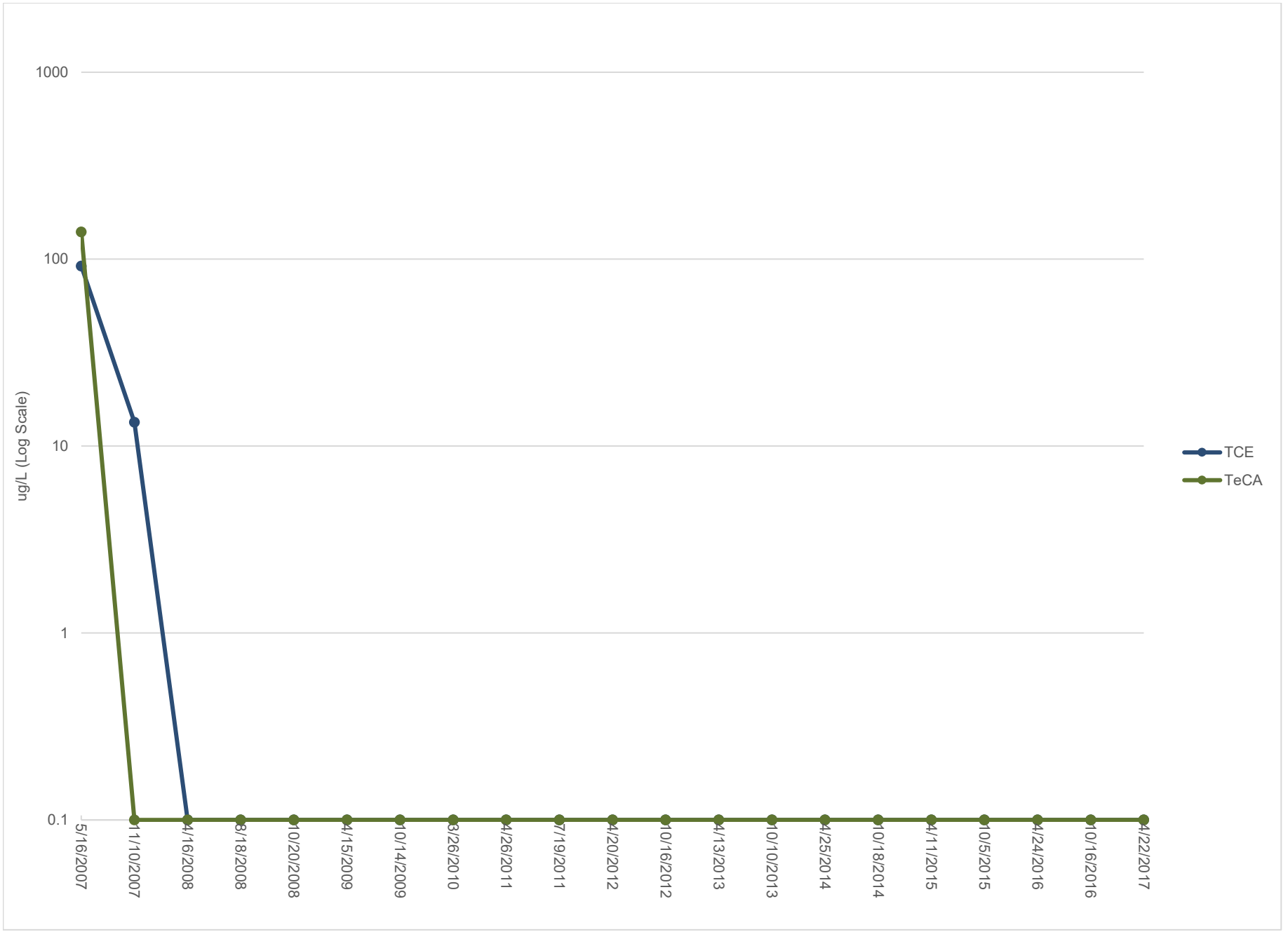
MW-224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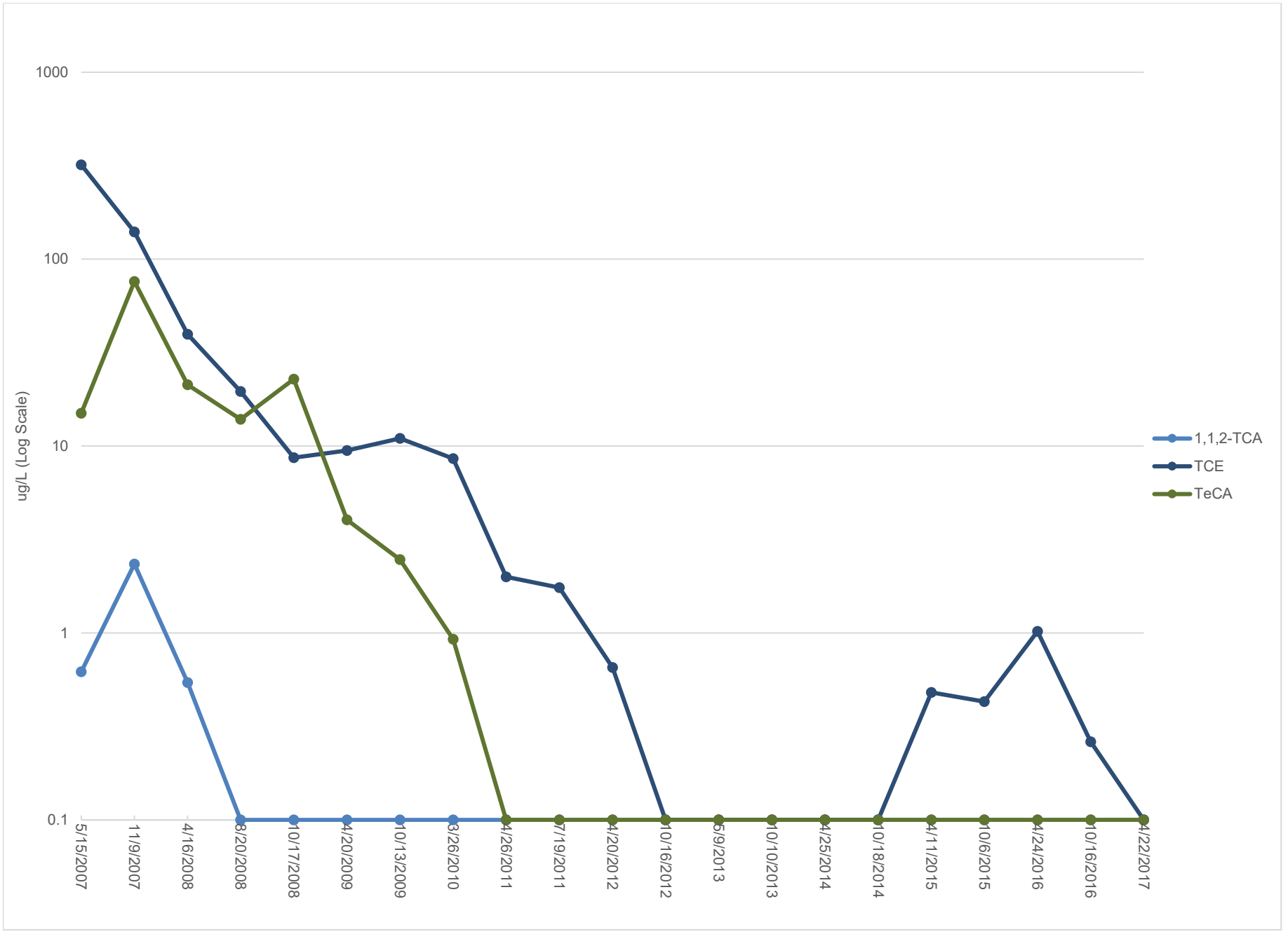
TCE
TeCA

MW-225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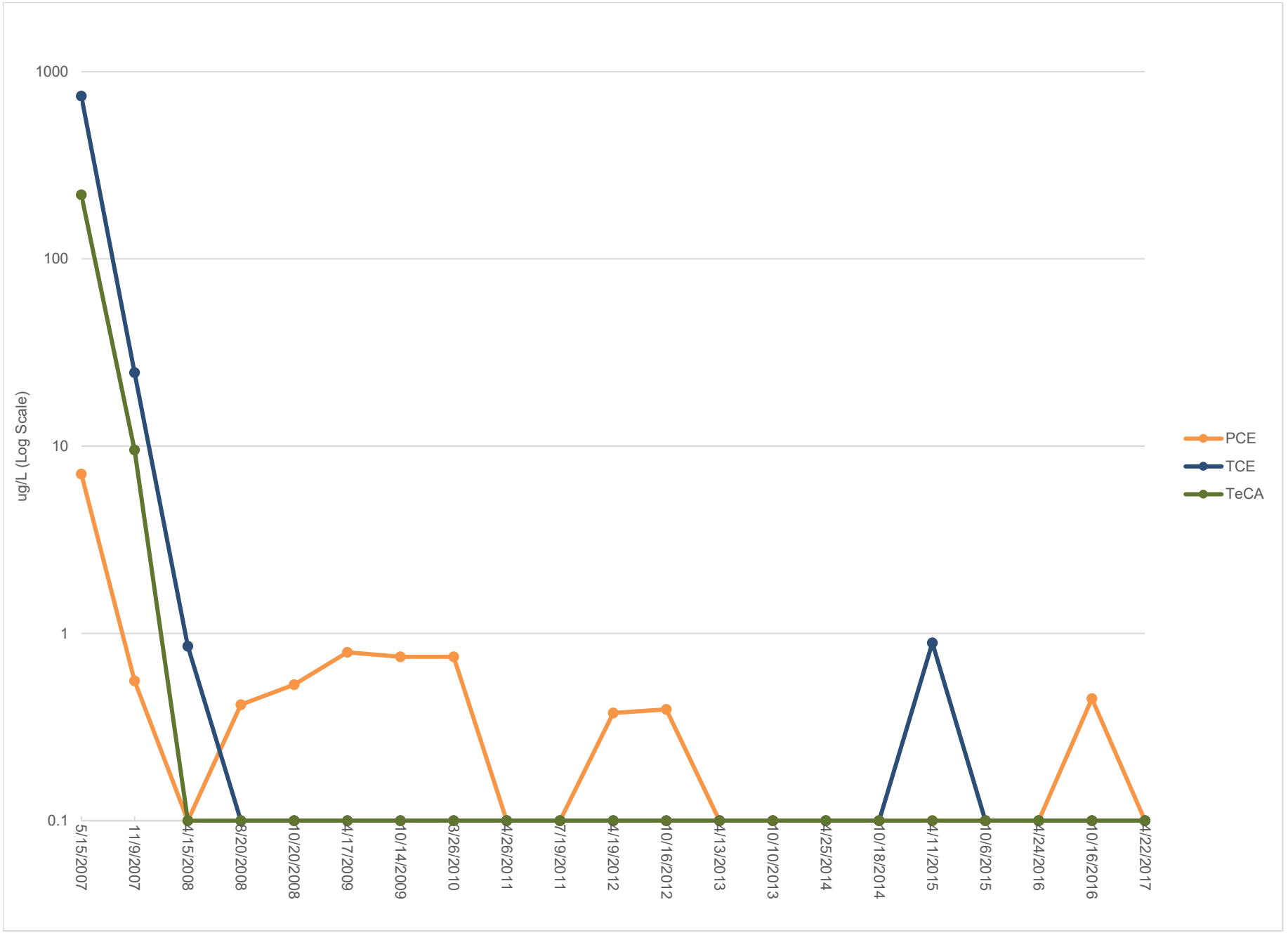
TeCA

MW-226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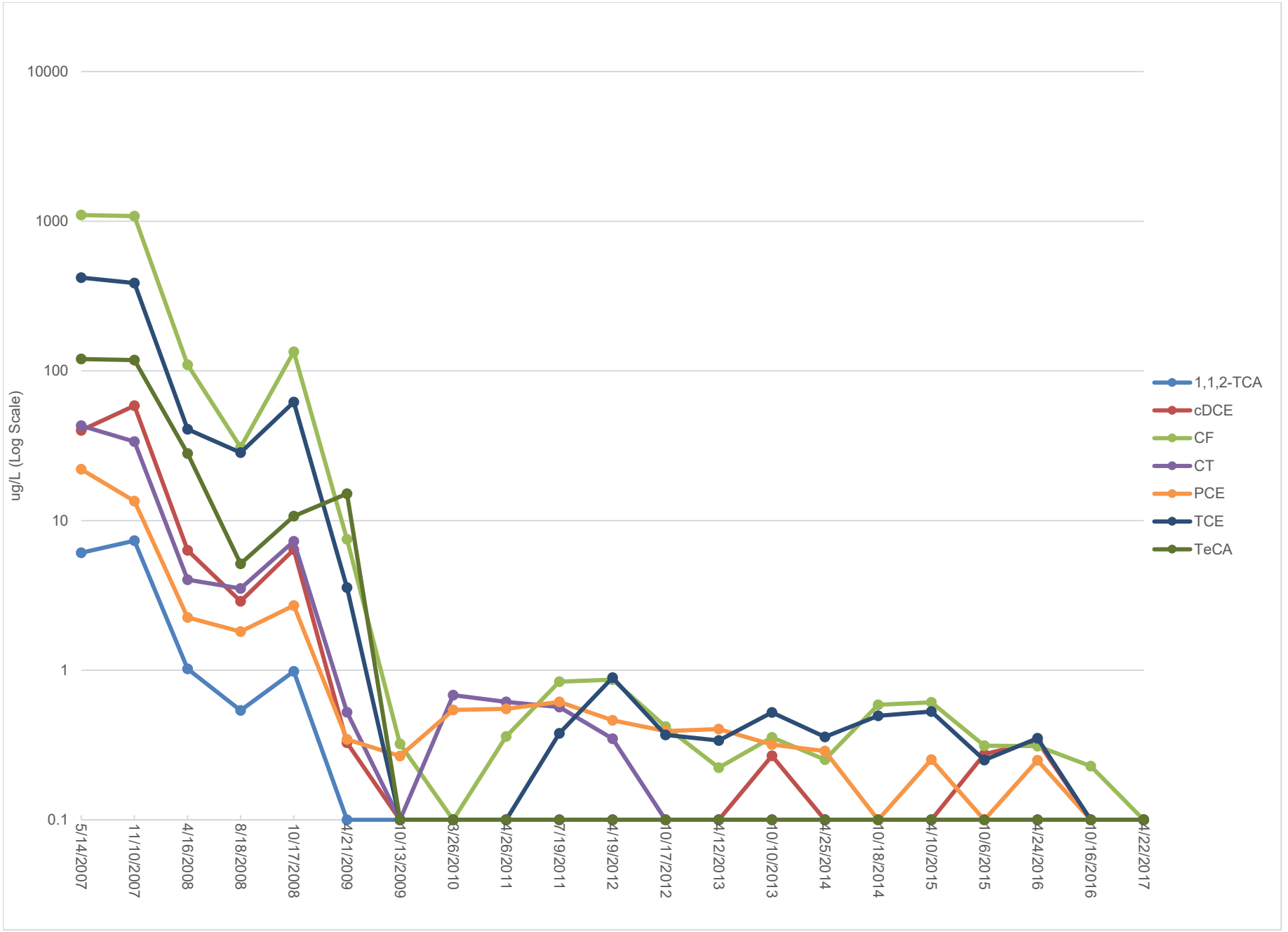
TCE
TeCA

MW-227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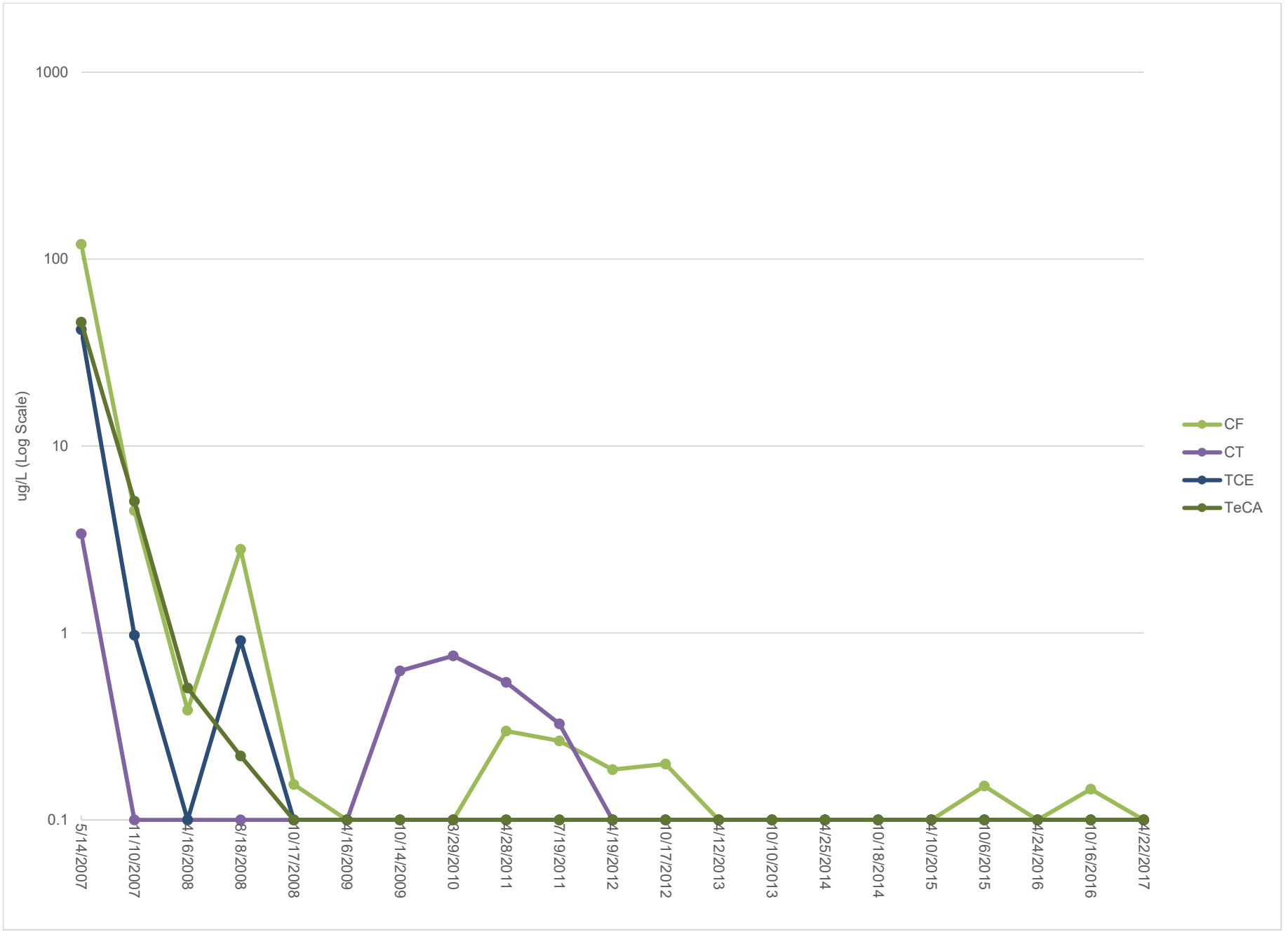
cDCE
CF
CT
PCE
TCE
TeCA

MW-228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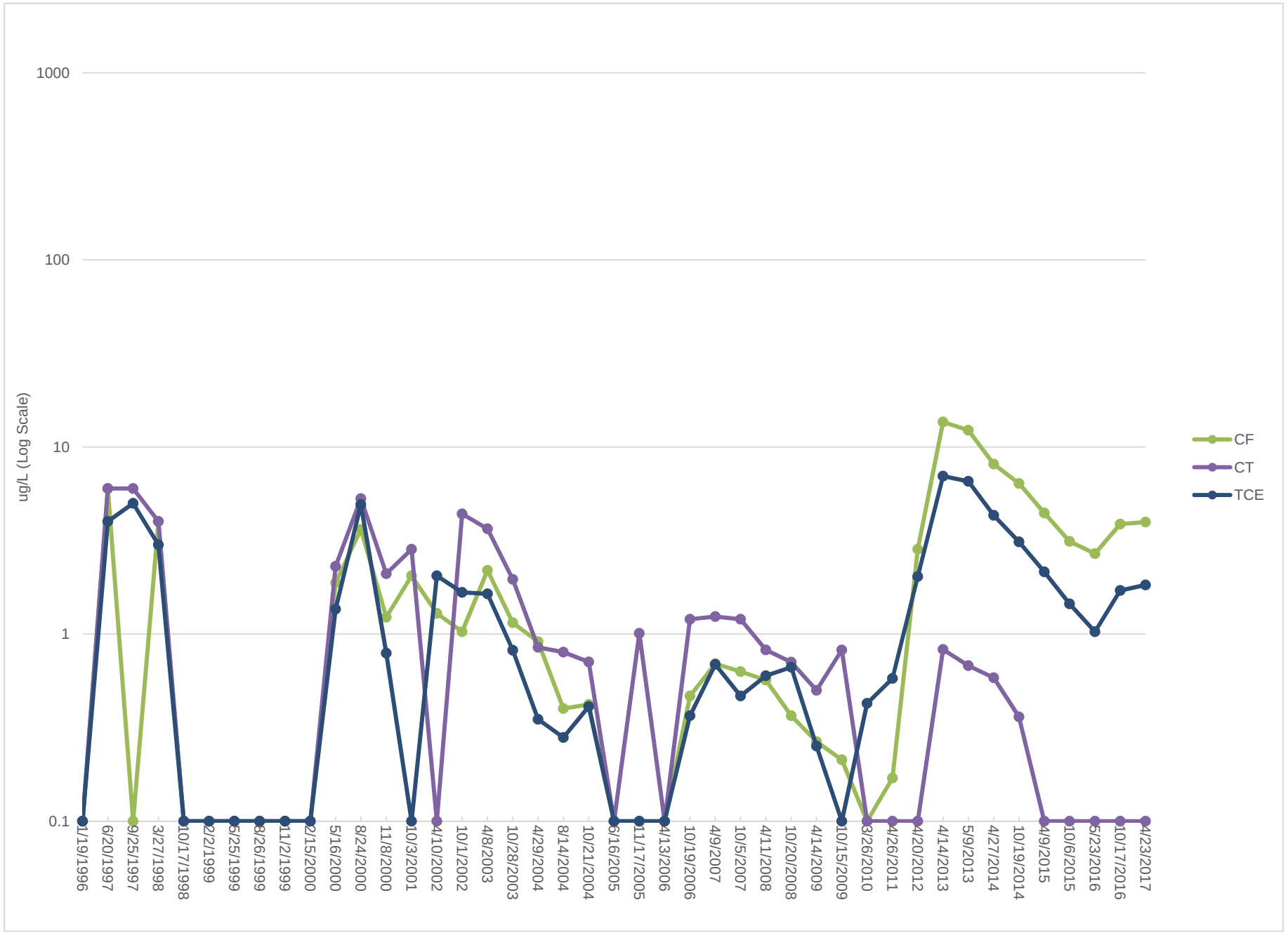
CF
CT
TCE
TeCA

Appendix J-3
CVOC Time-Trend Plots – Dunn Field

Off Depot

MW-44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CT
TCE
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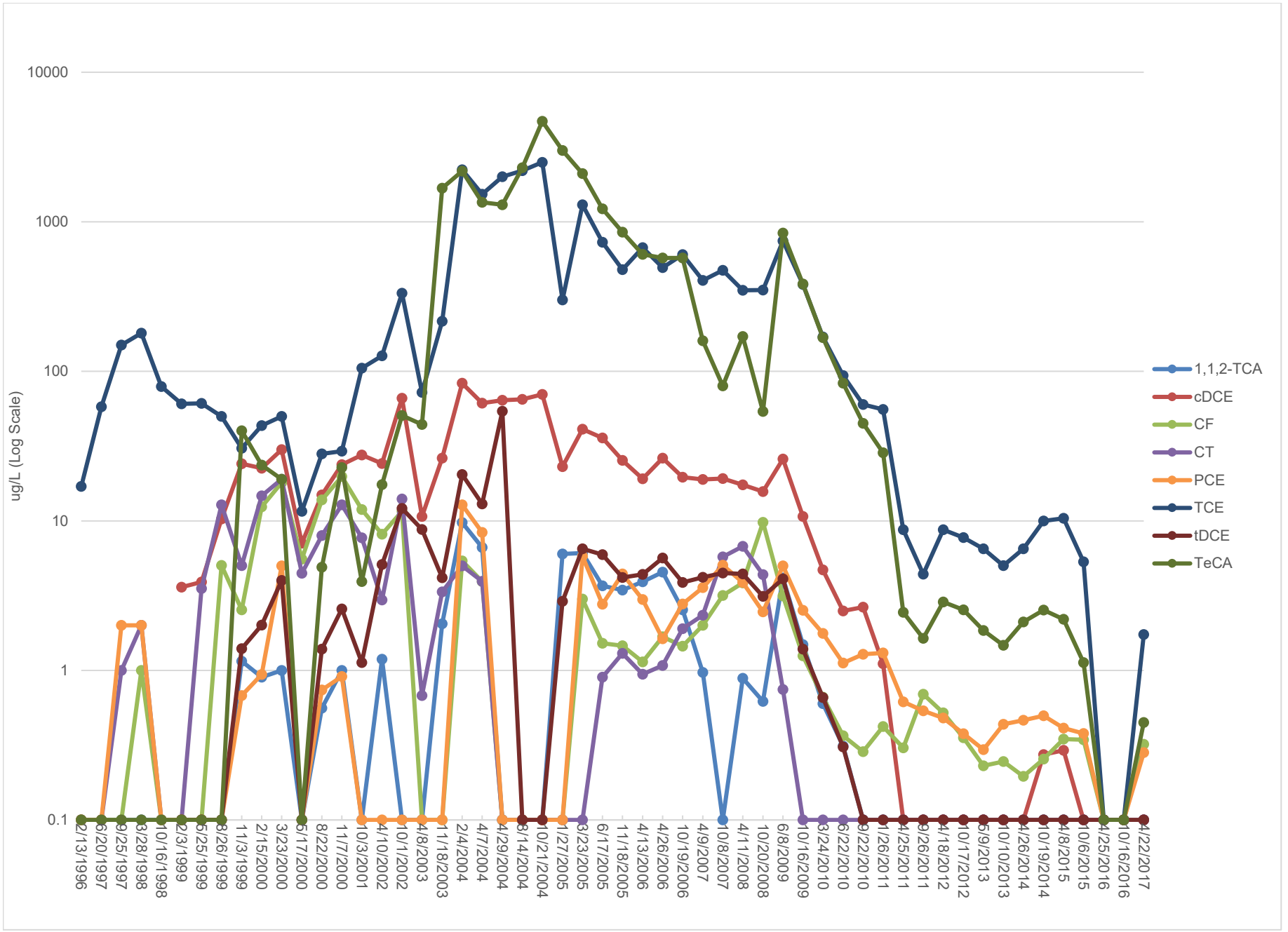
MW-54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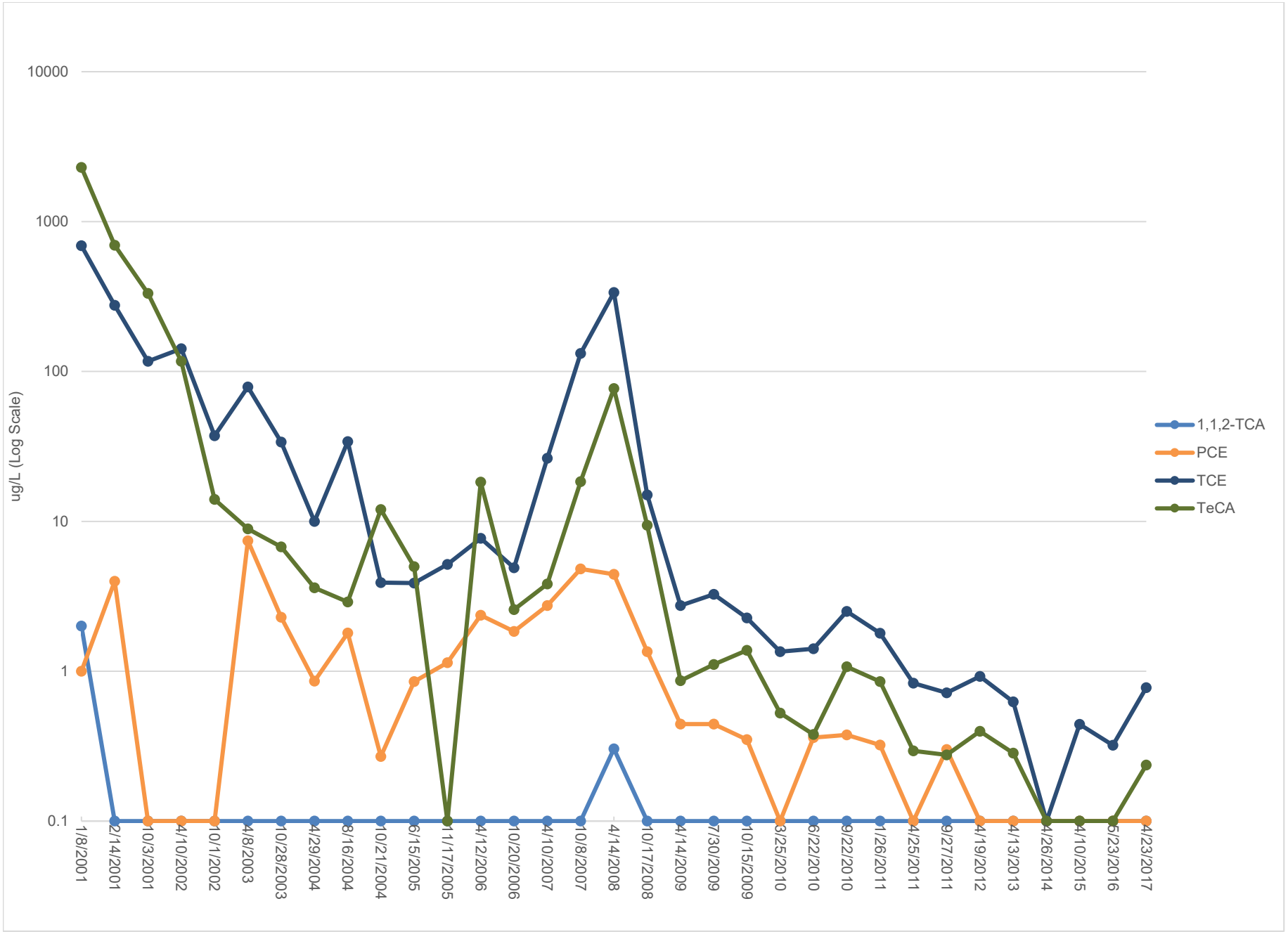
MW-76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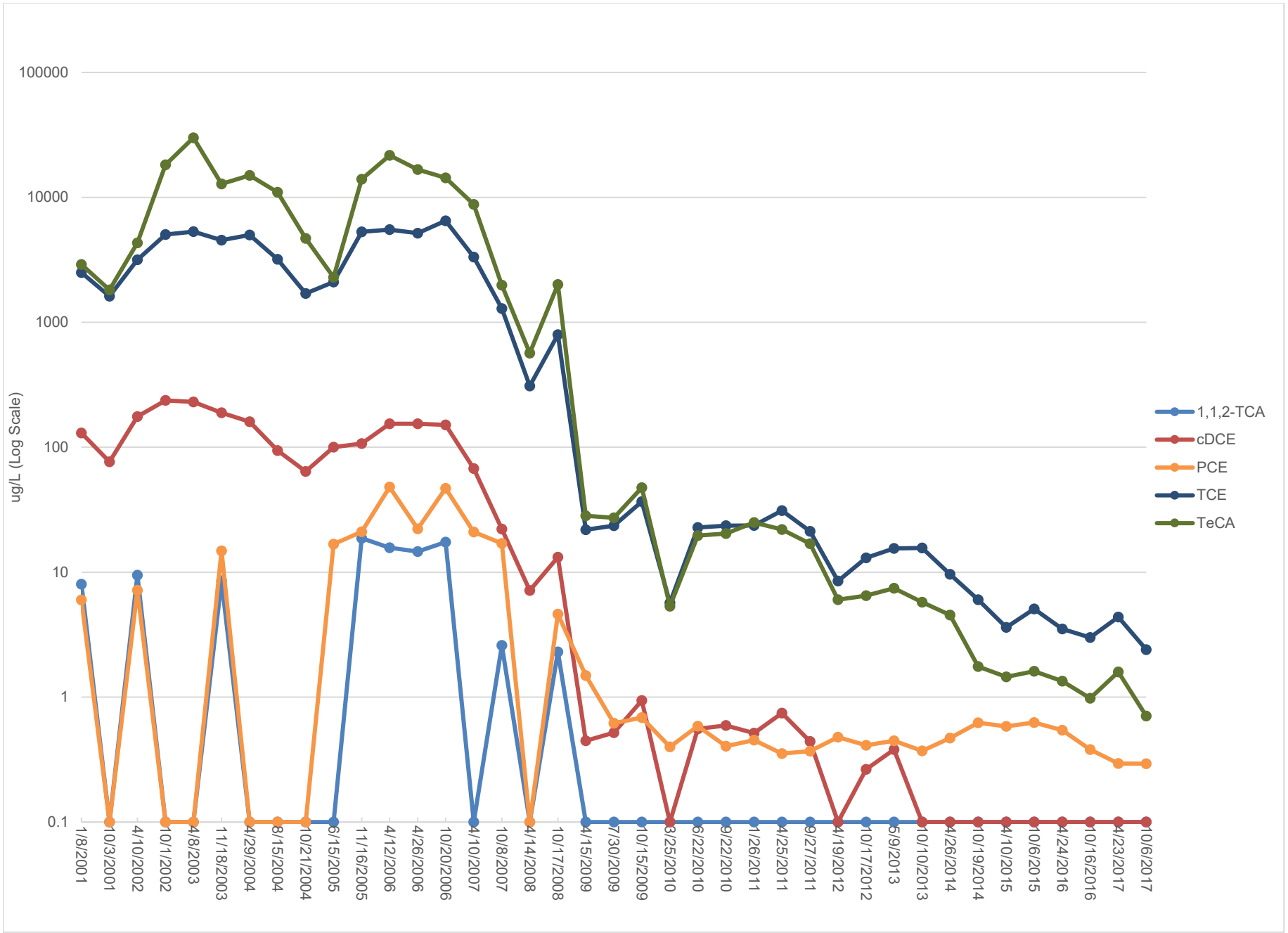
MW-77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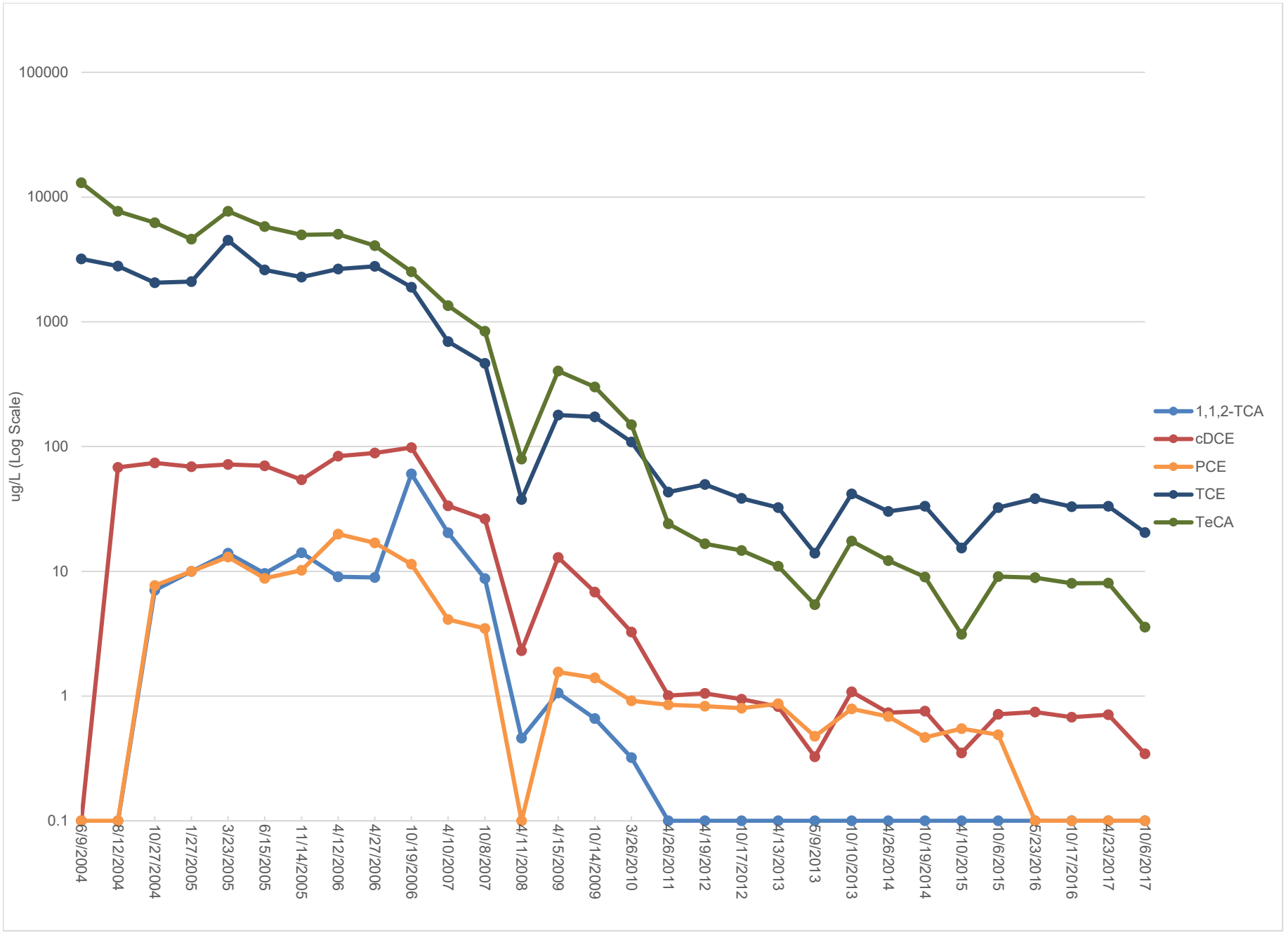
MW-144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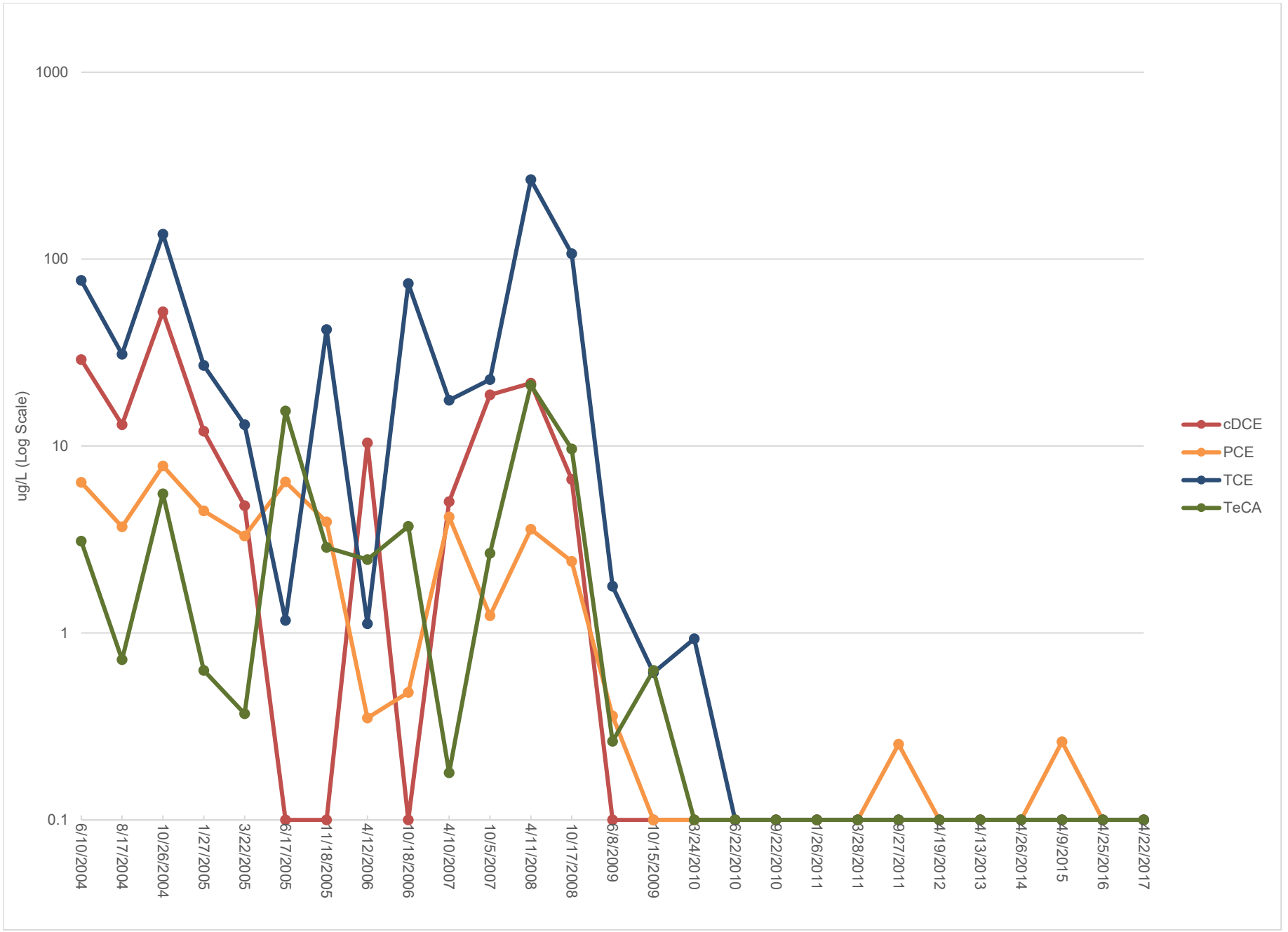
MW-148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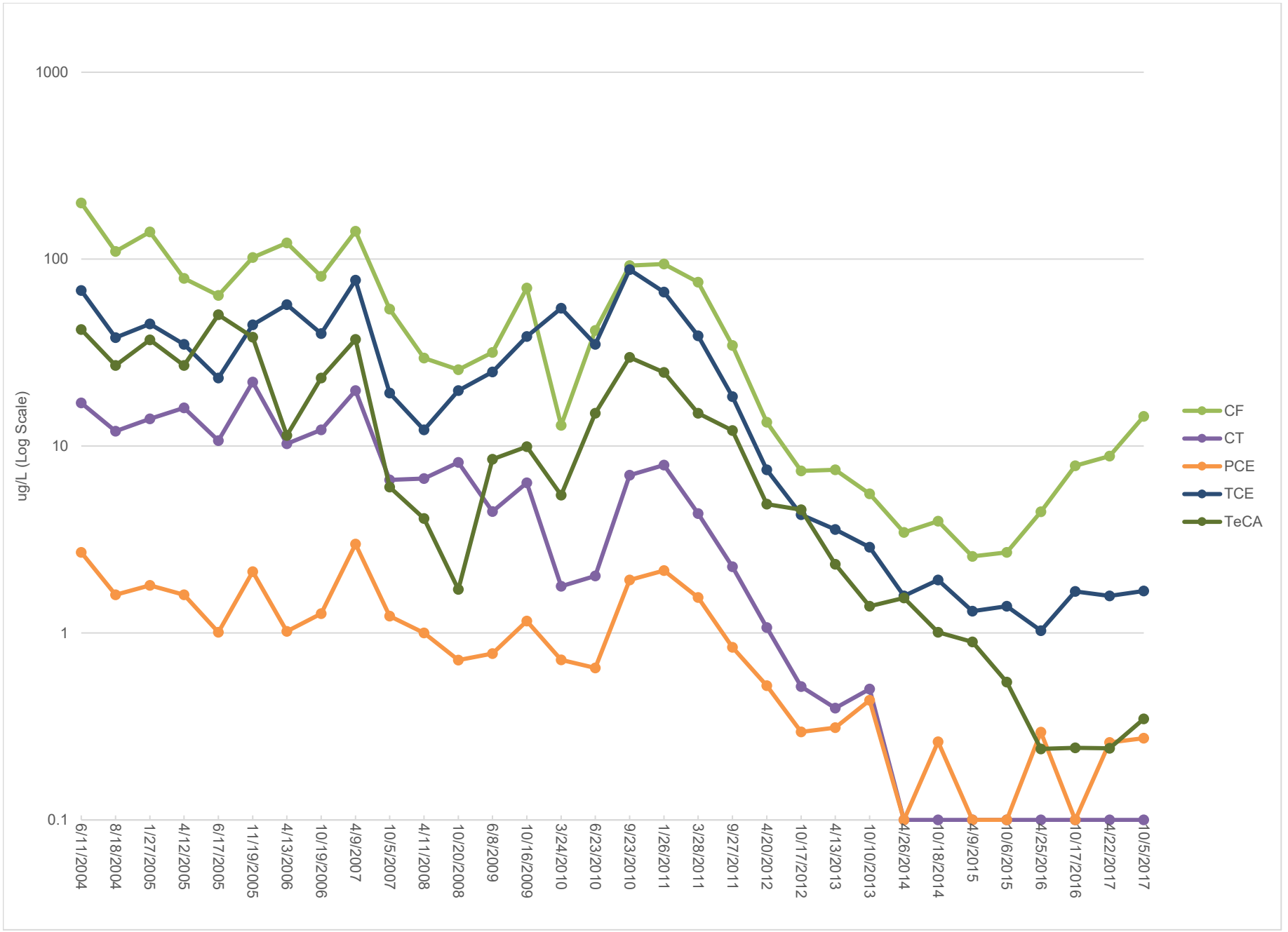
MW-149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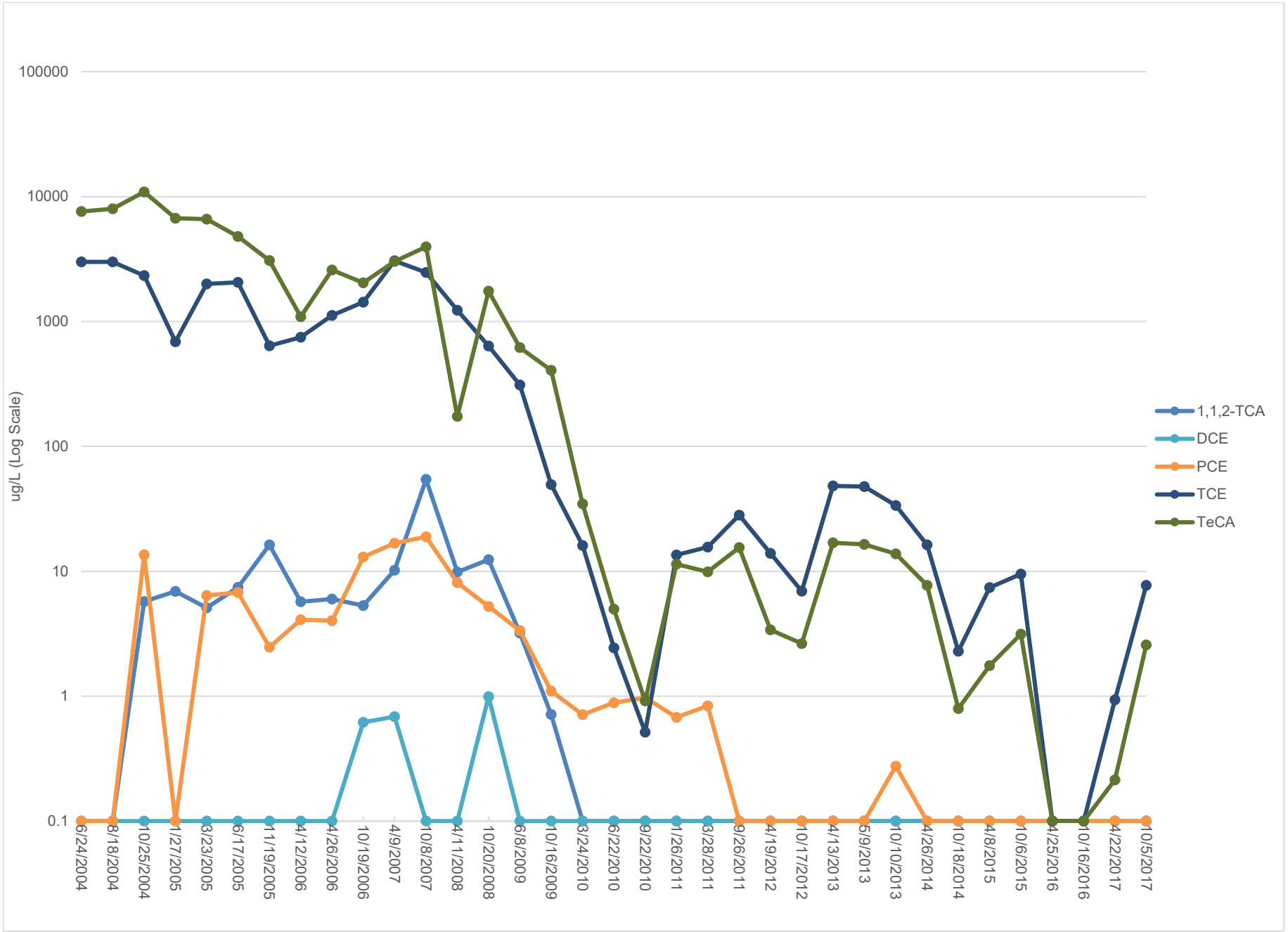
MW-150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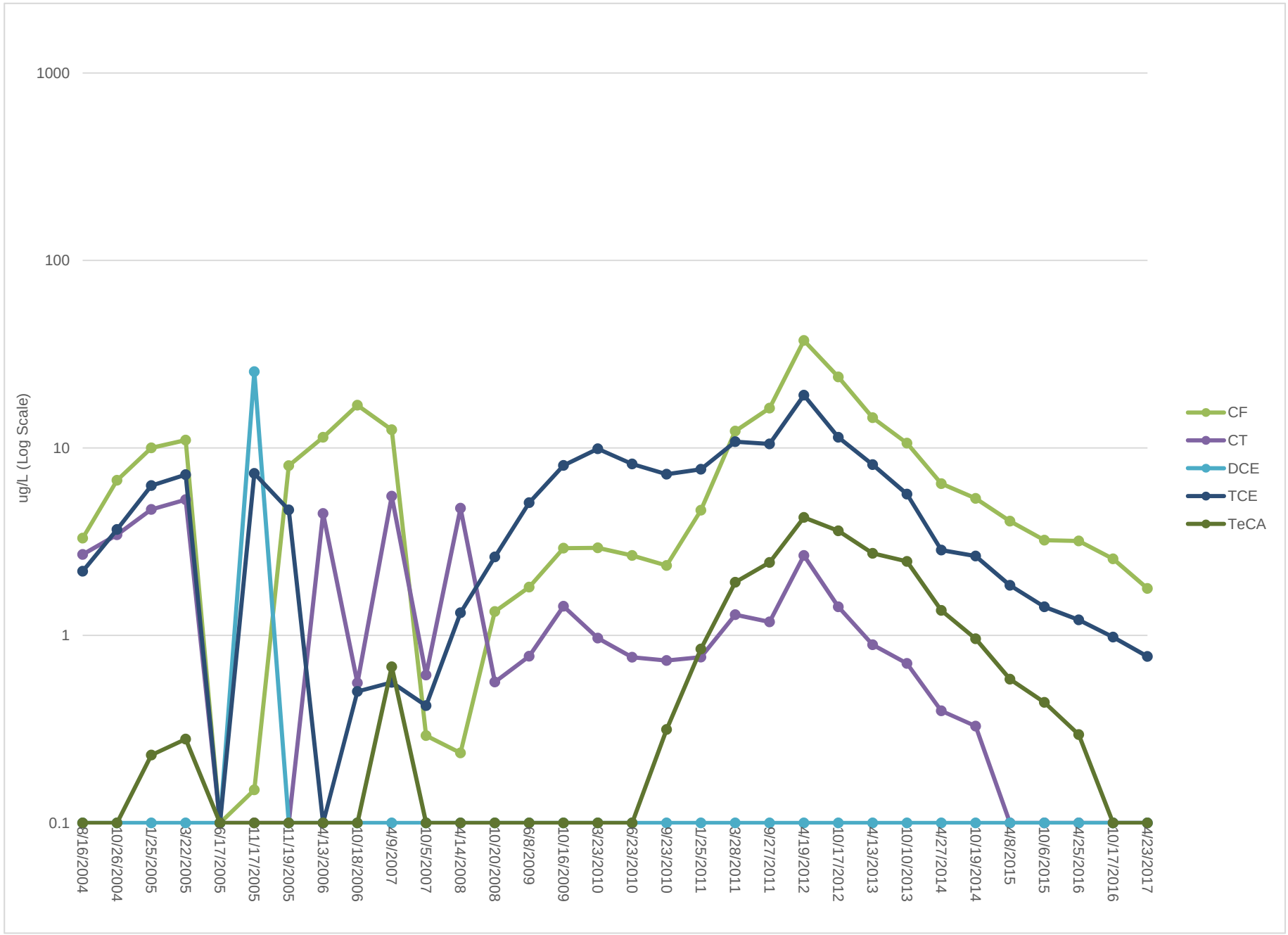
MW-151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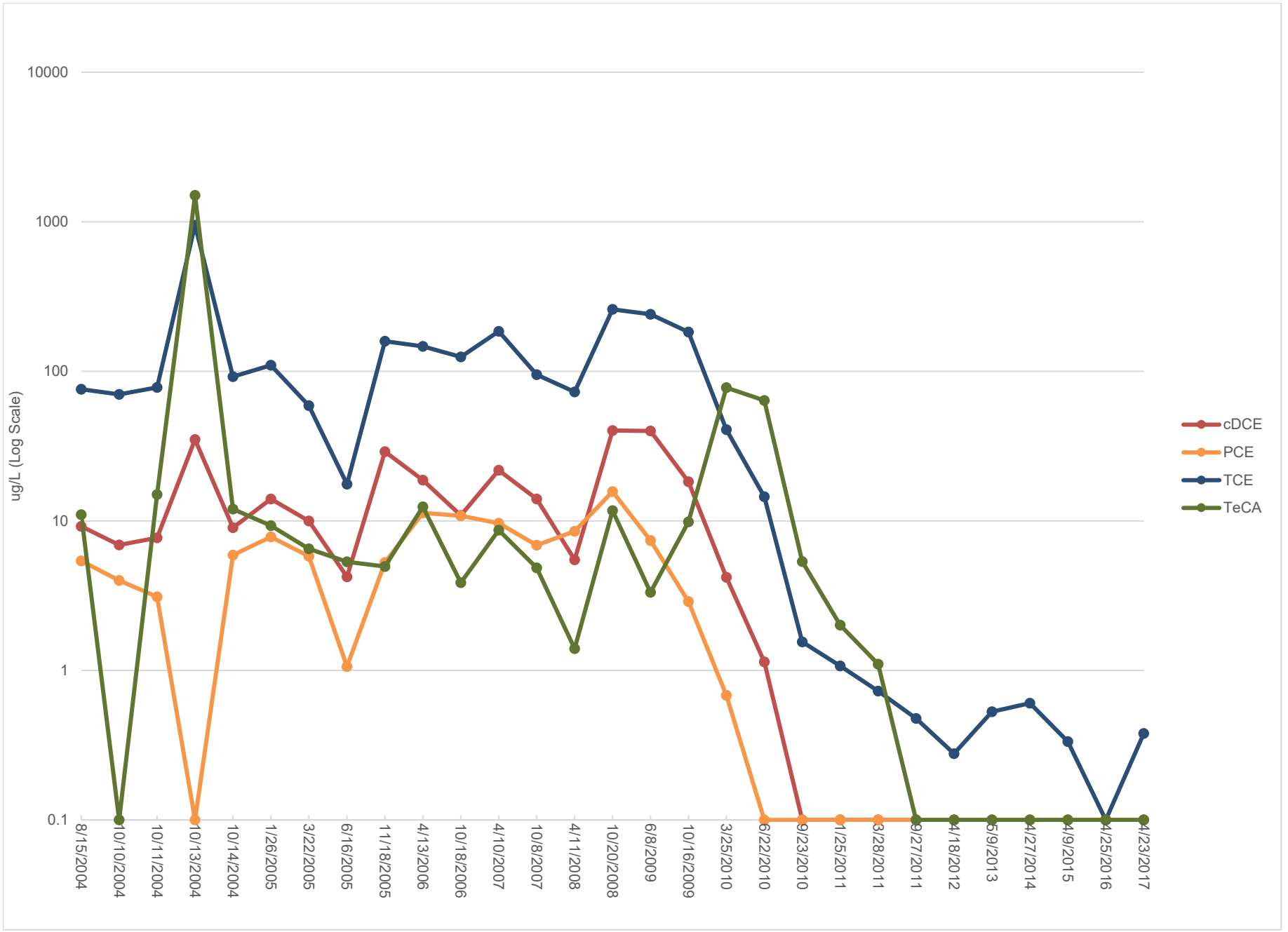
MW-152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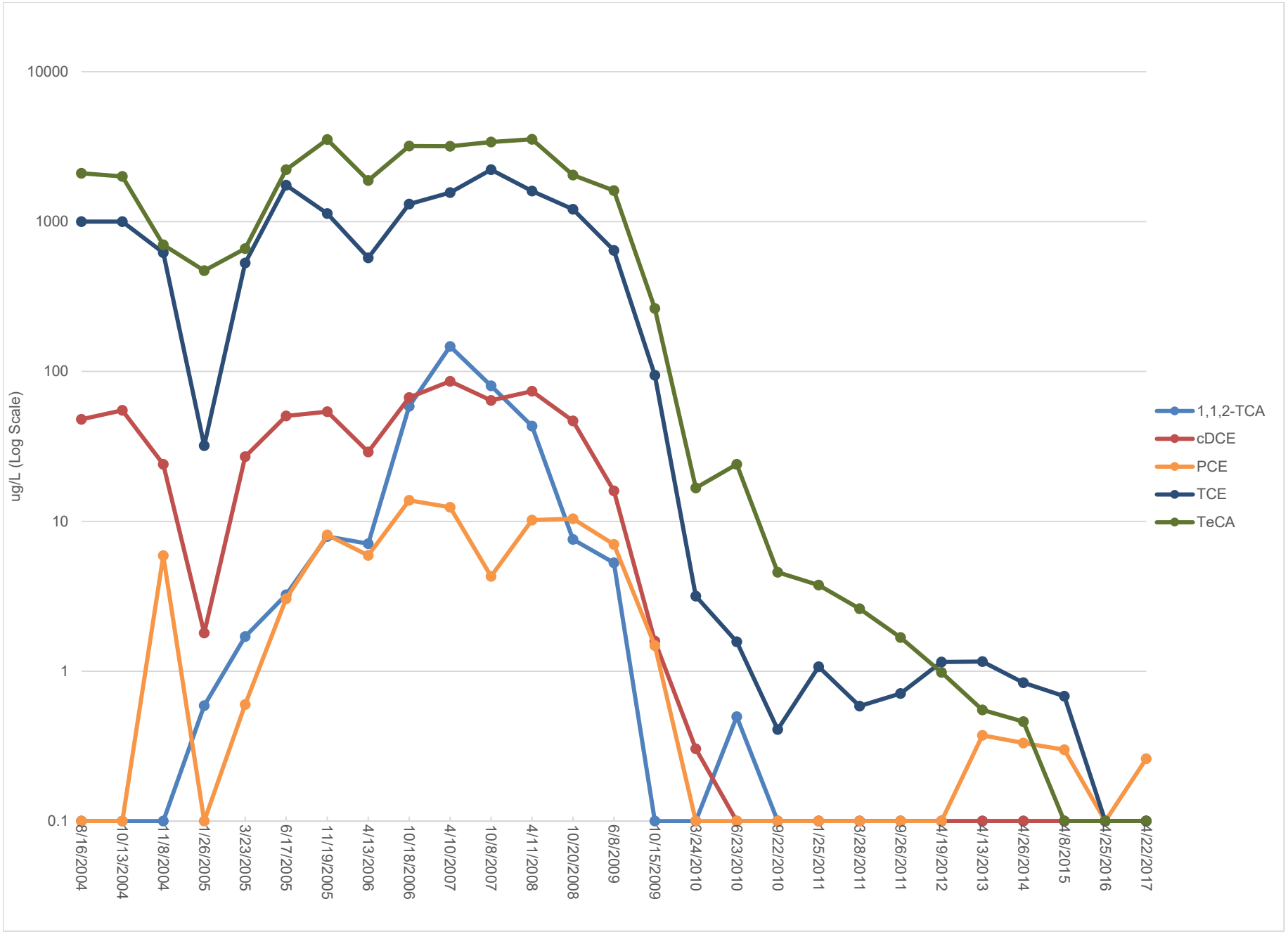
MW-155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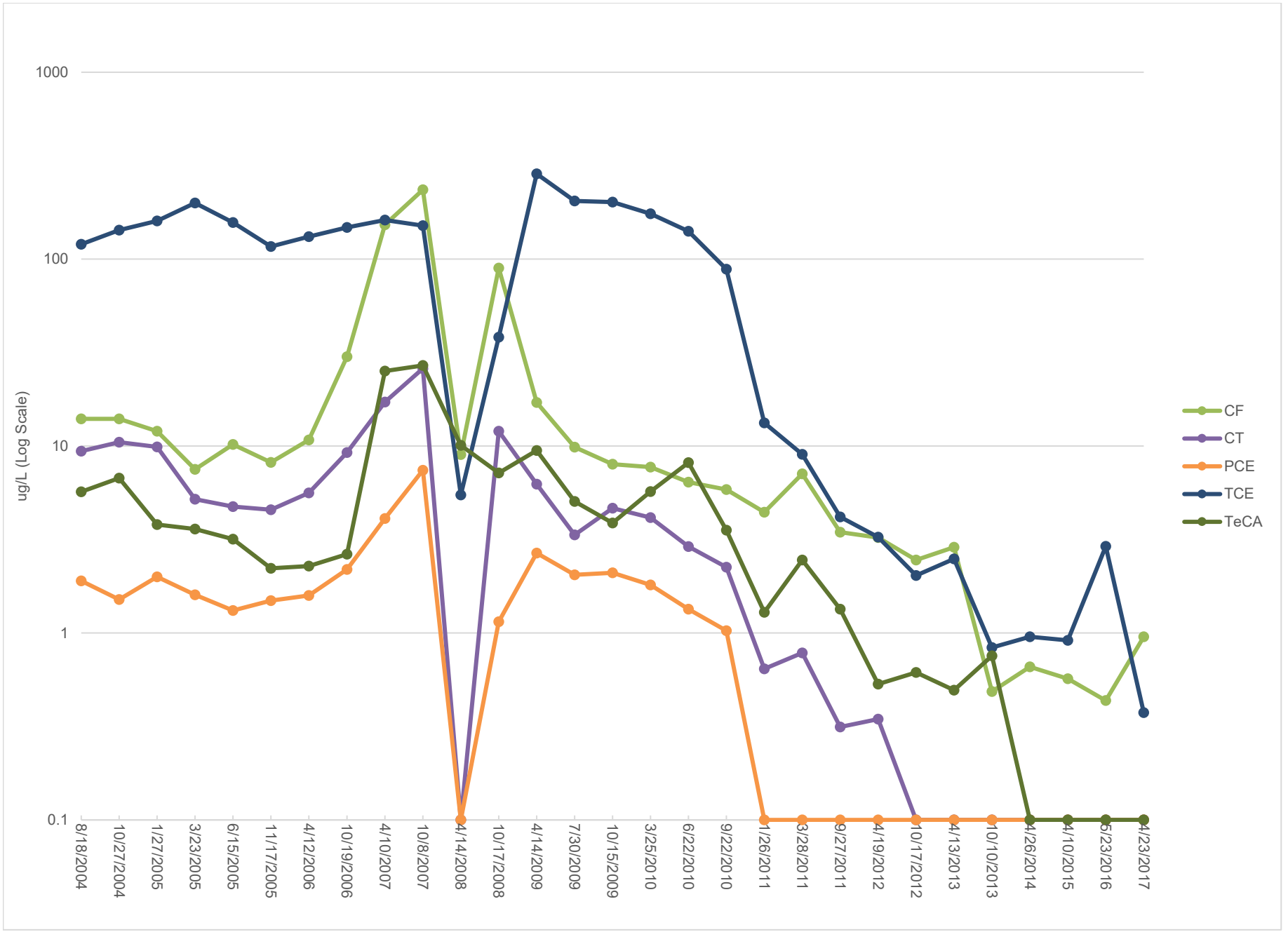
MW-157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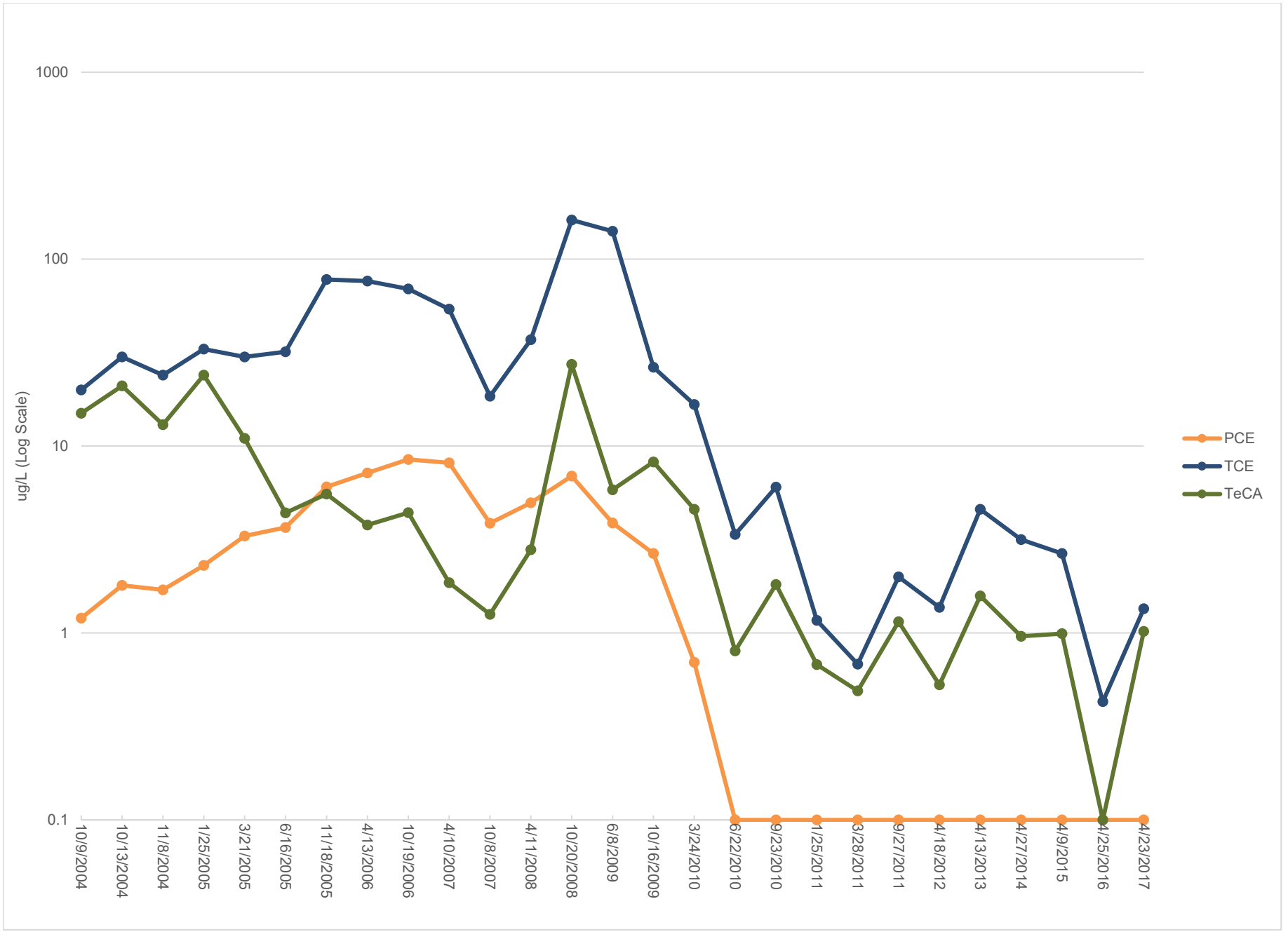
MW-158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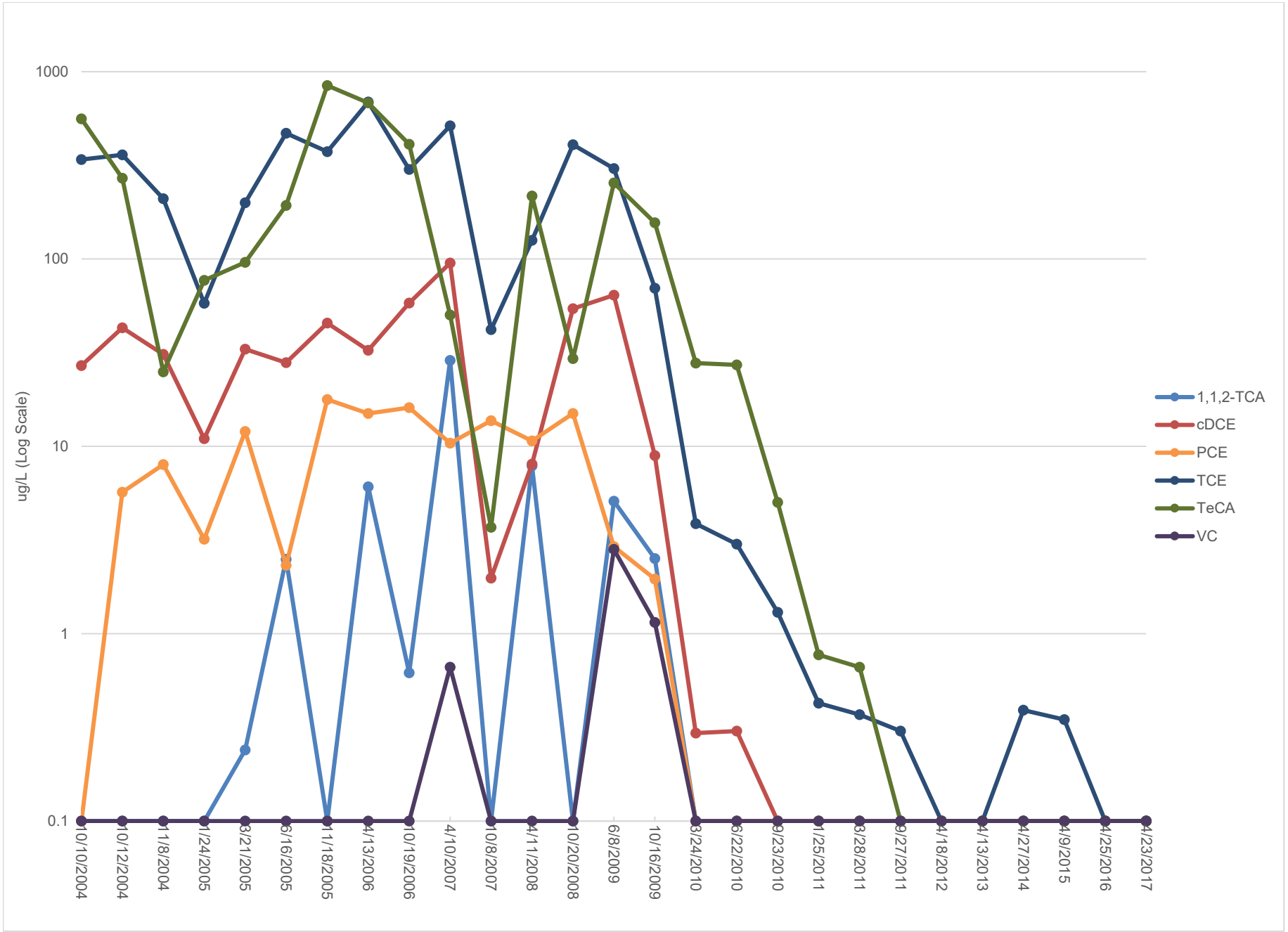
MW-158A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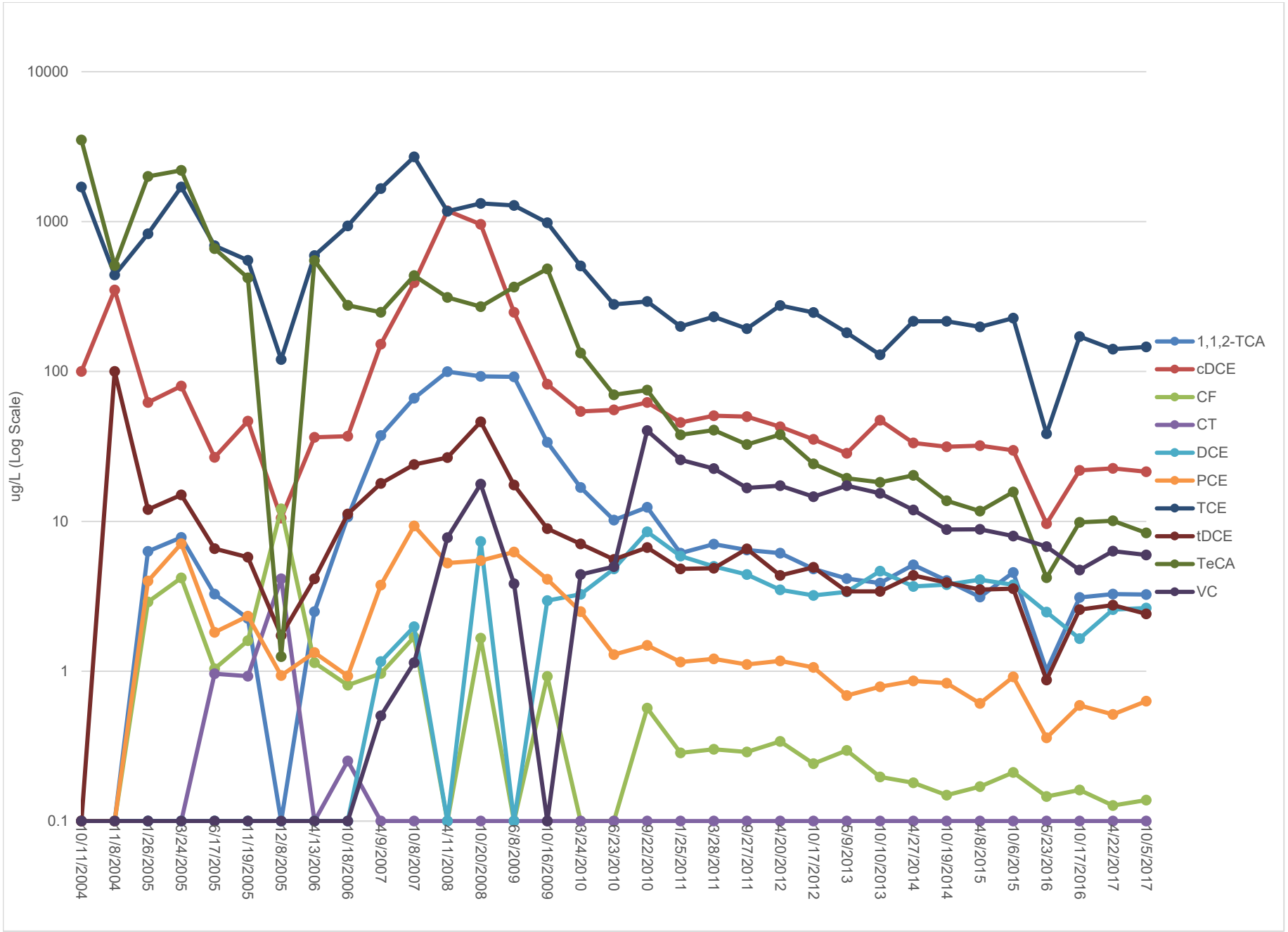
MW-159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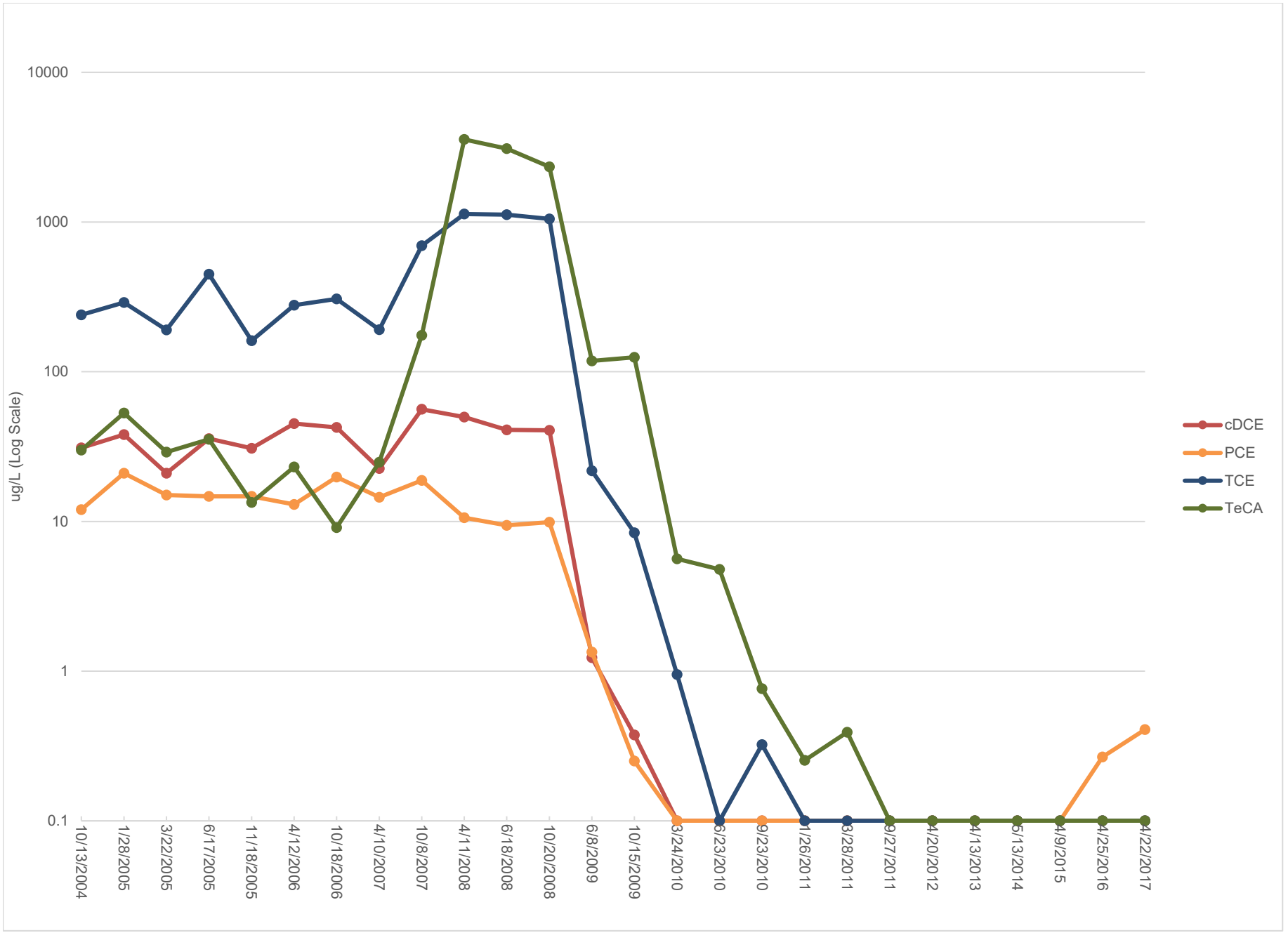
MW-160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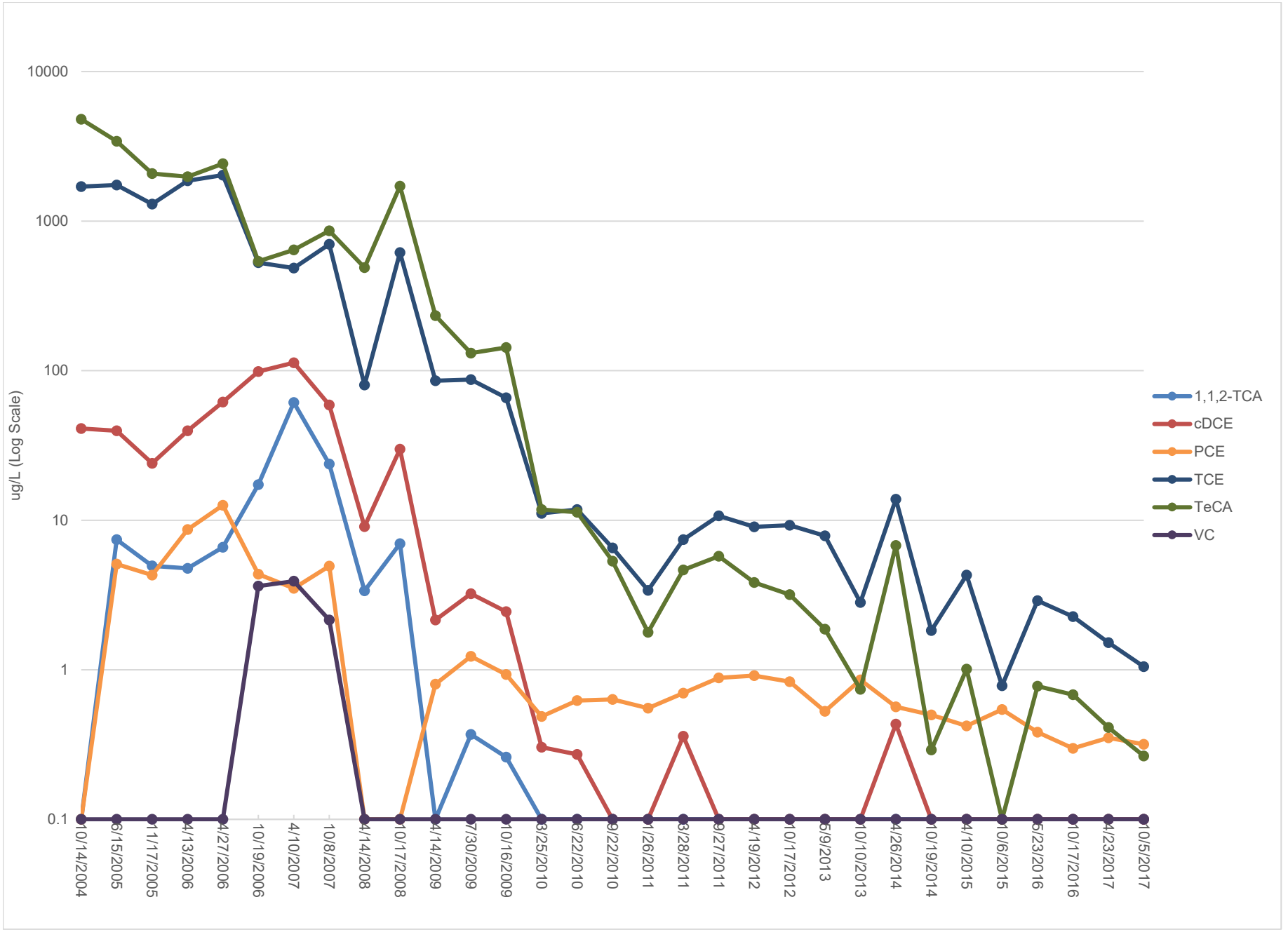
MW-163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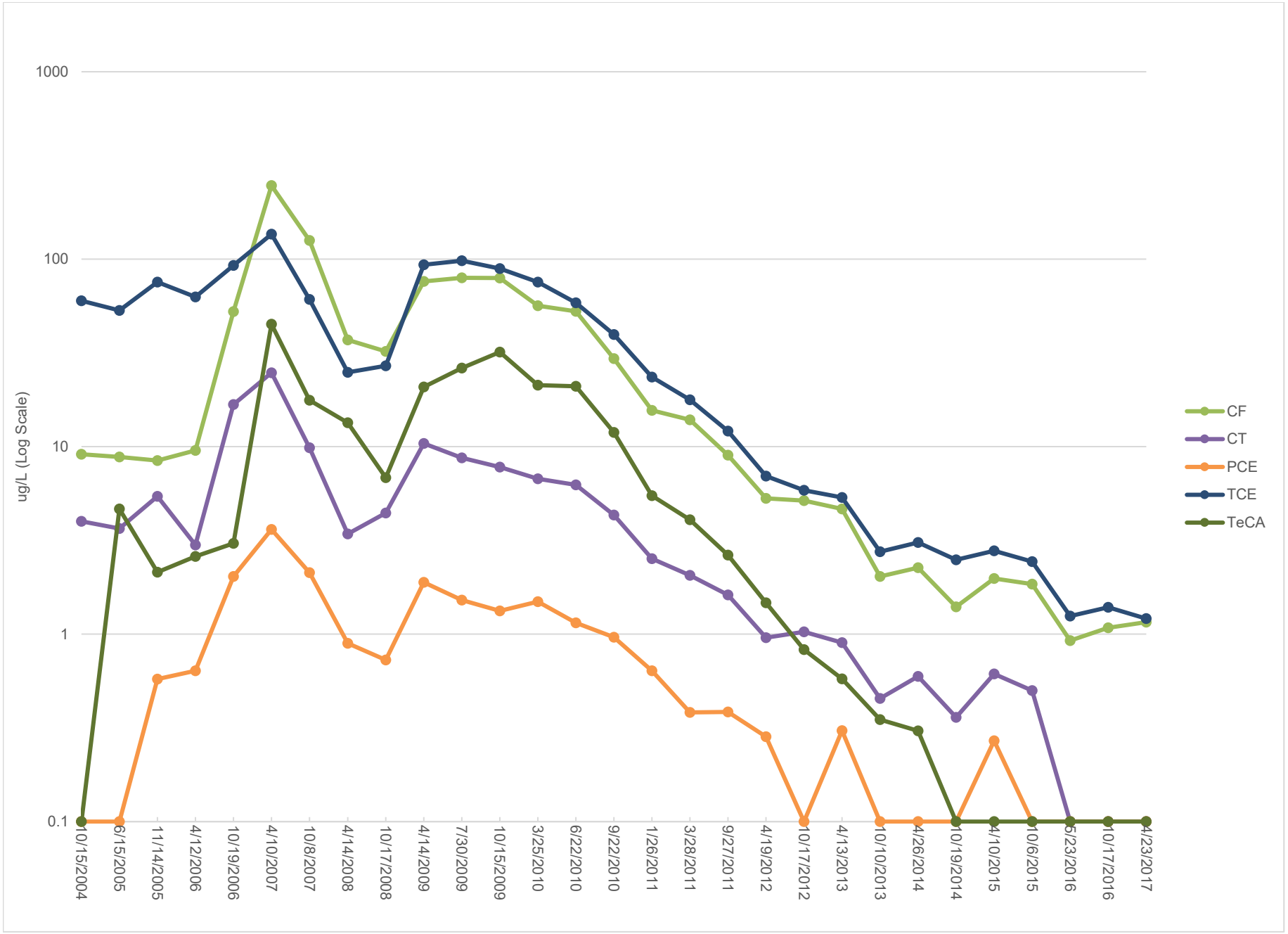
MW-164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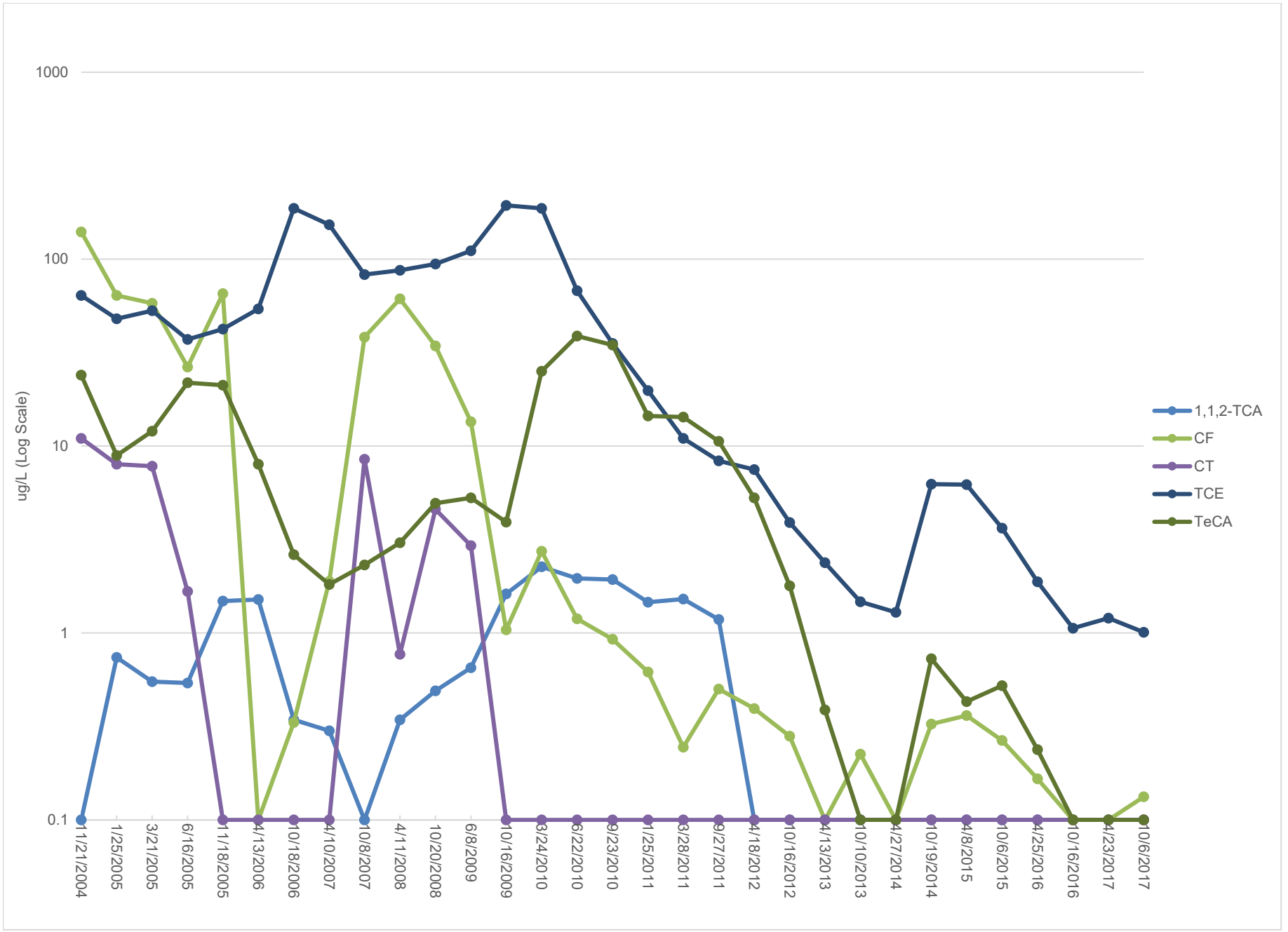
MW-165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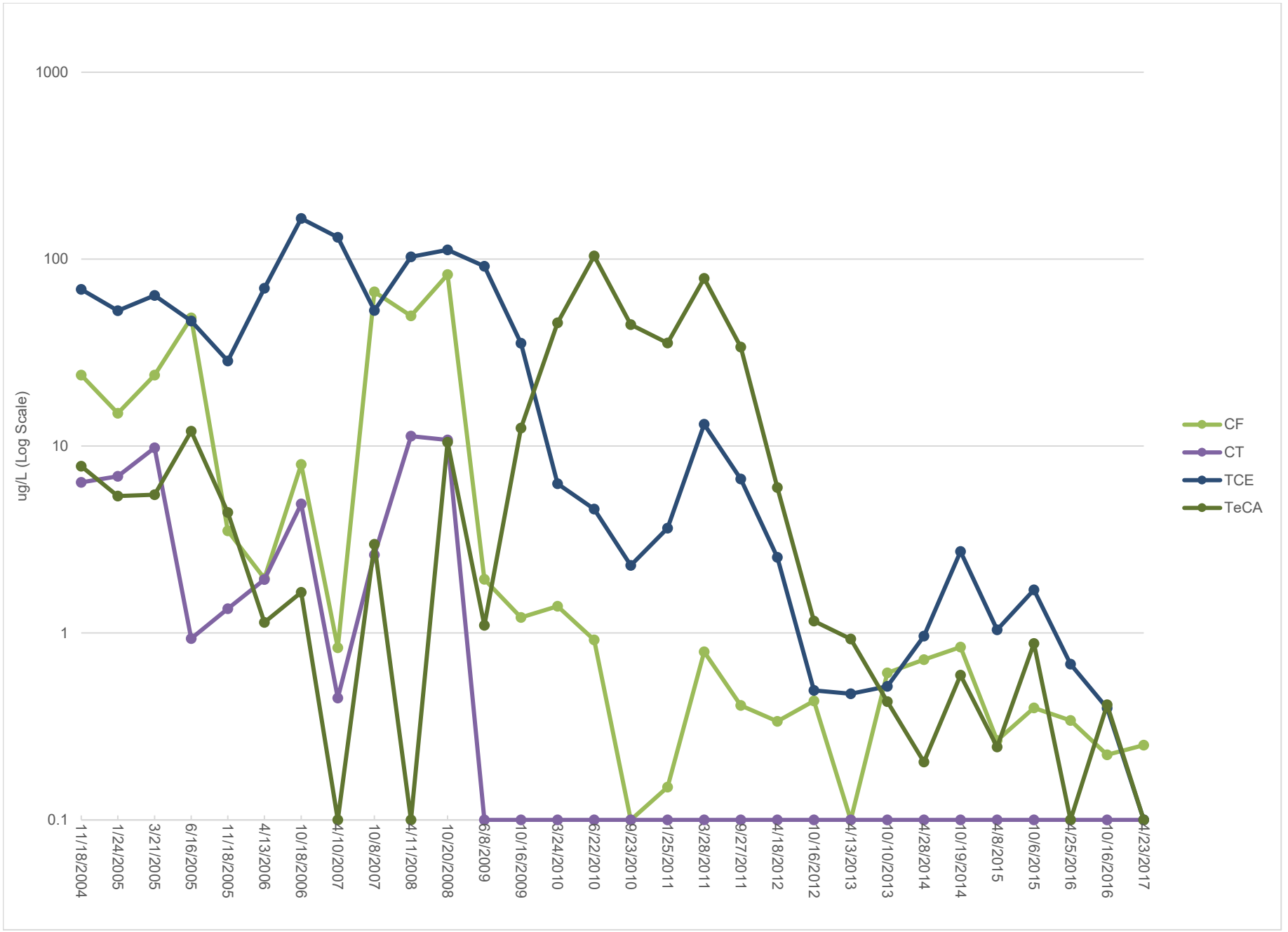
MW-165A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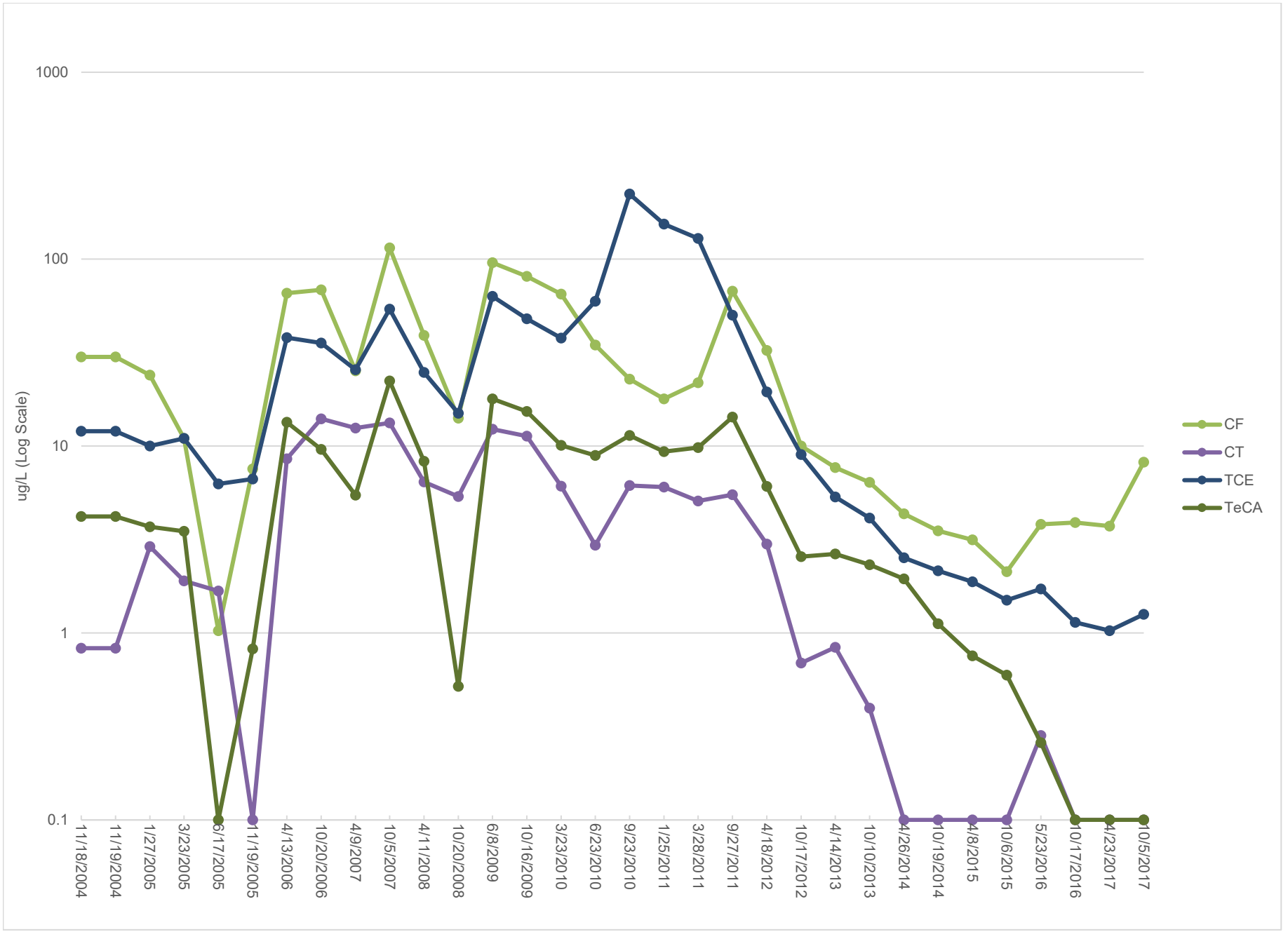
MW-166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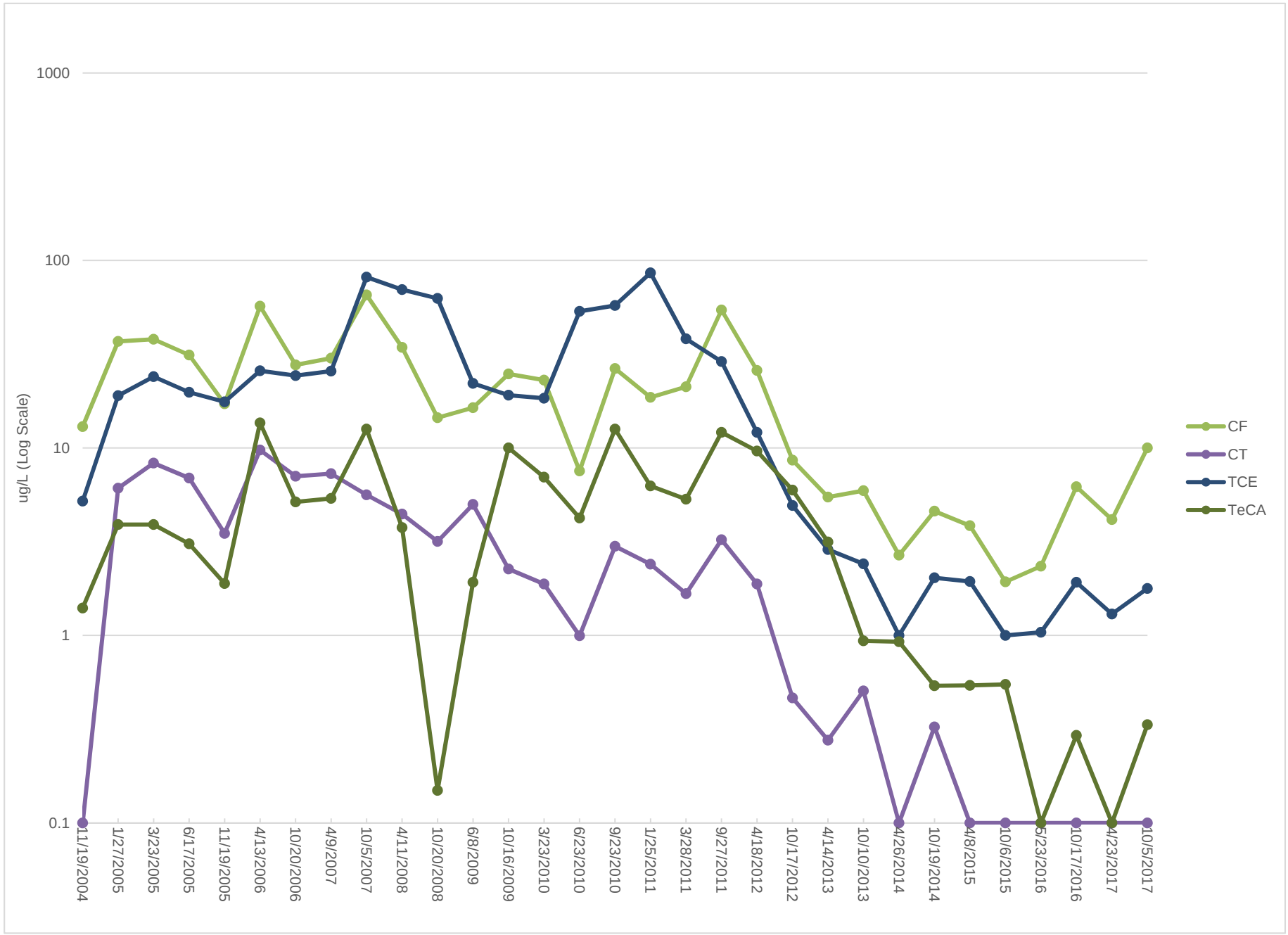
CF
CT
TCE
TeCA

MW-166A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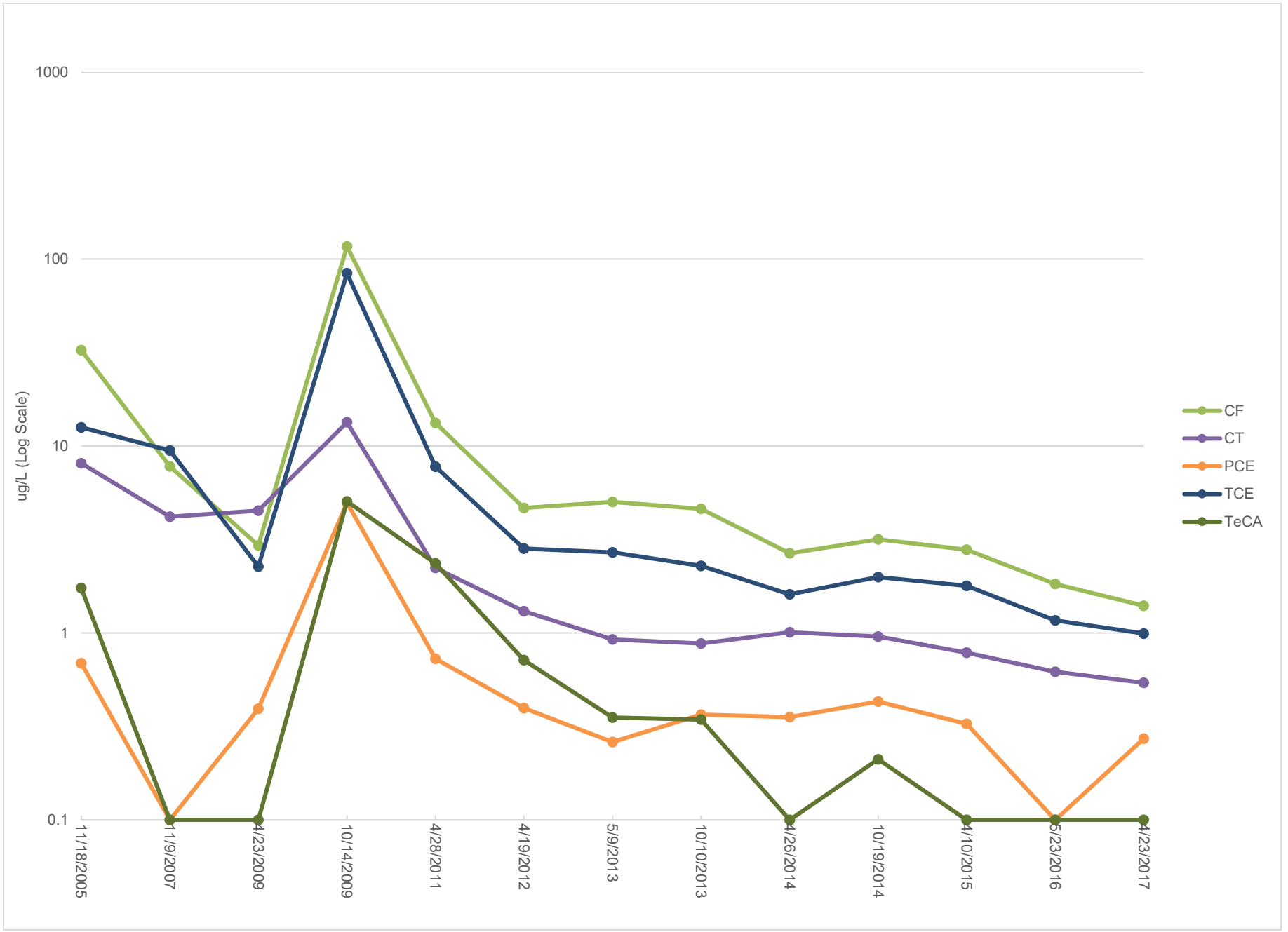
CF
CT
TCE
TeCA

MW-184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CT
PCE
TCE
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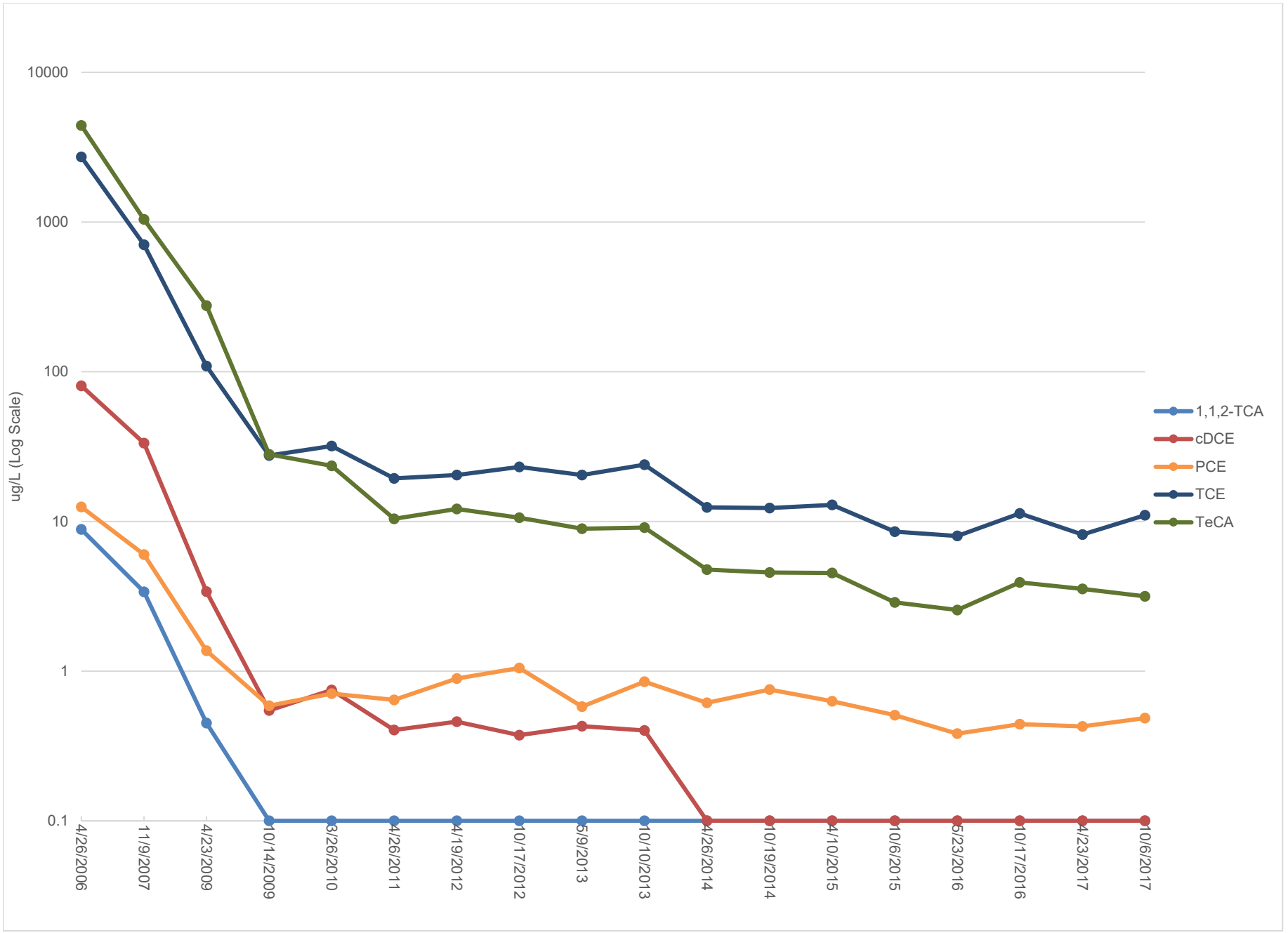
MW-190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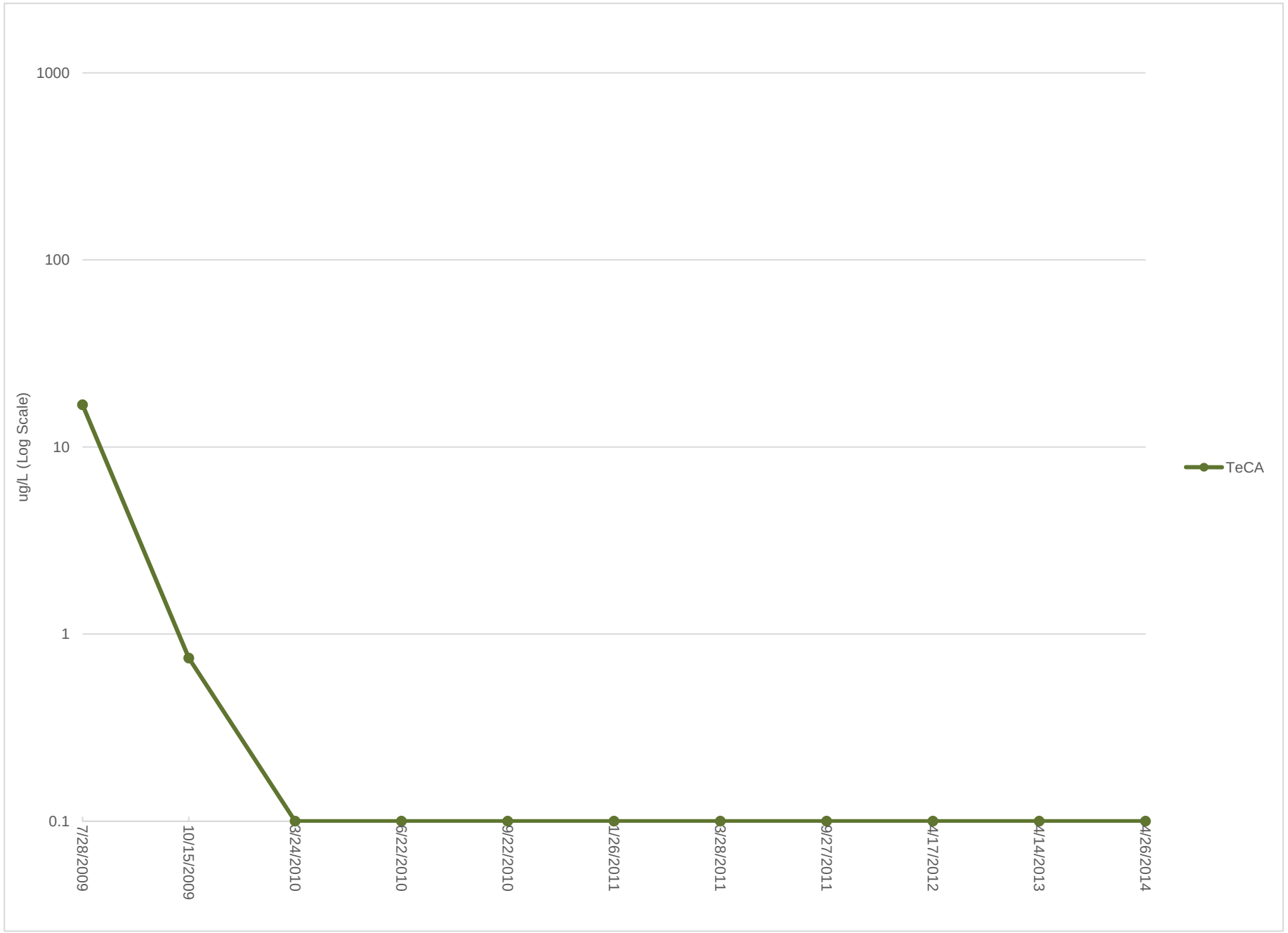
cDCE
PCE
TCE
TeCA

MW-241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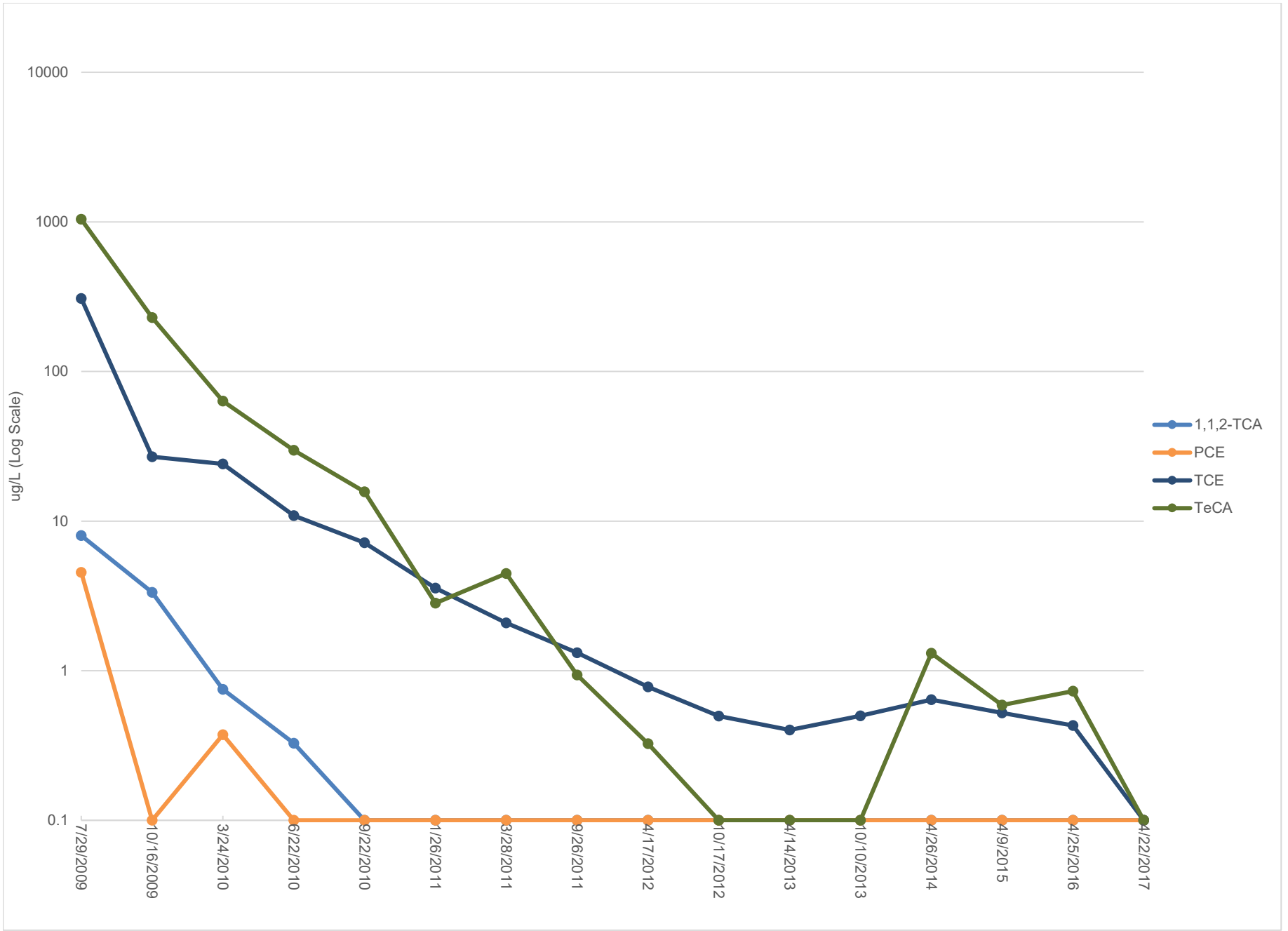
TeCA

MW-242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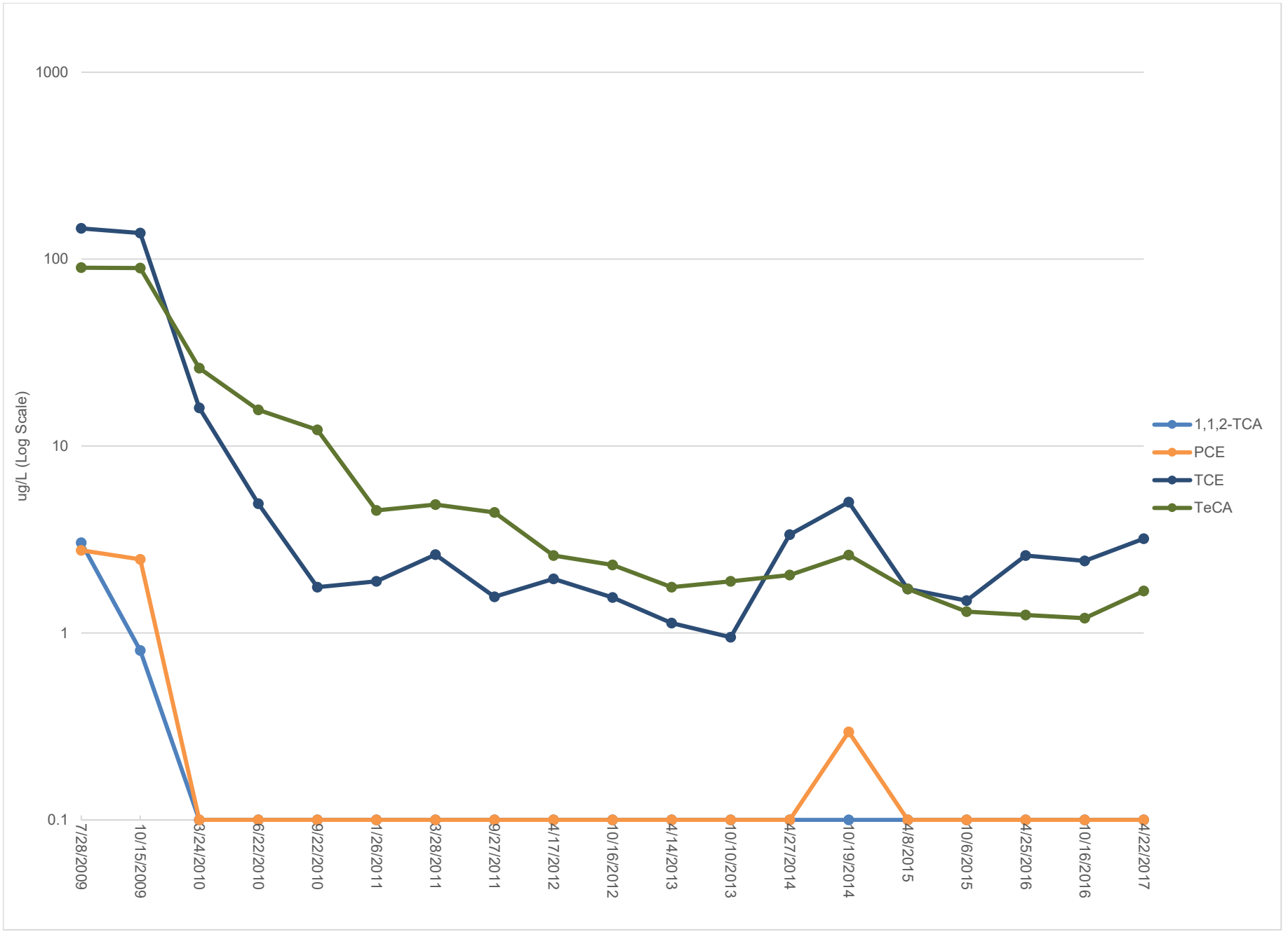
1,1,2-TCA
PCE
TCE
TeCA

MW-243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PCE
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TeCA
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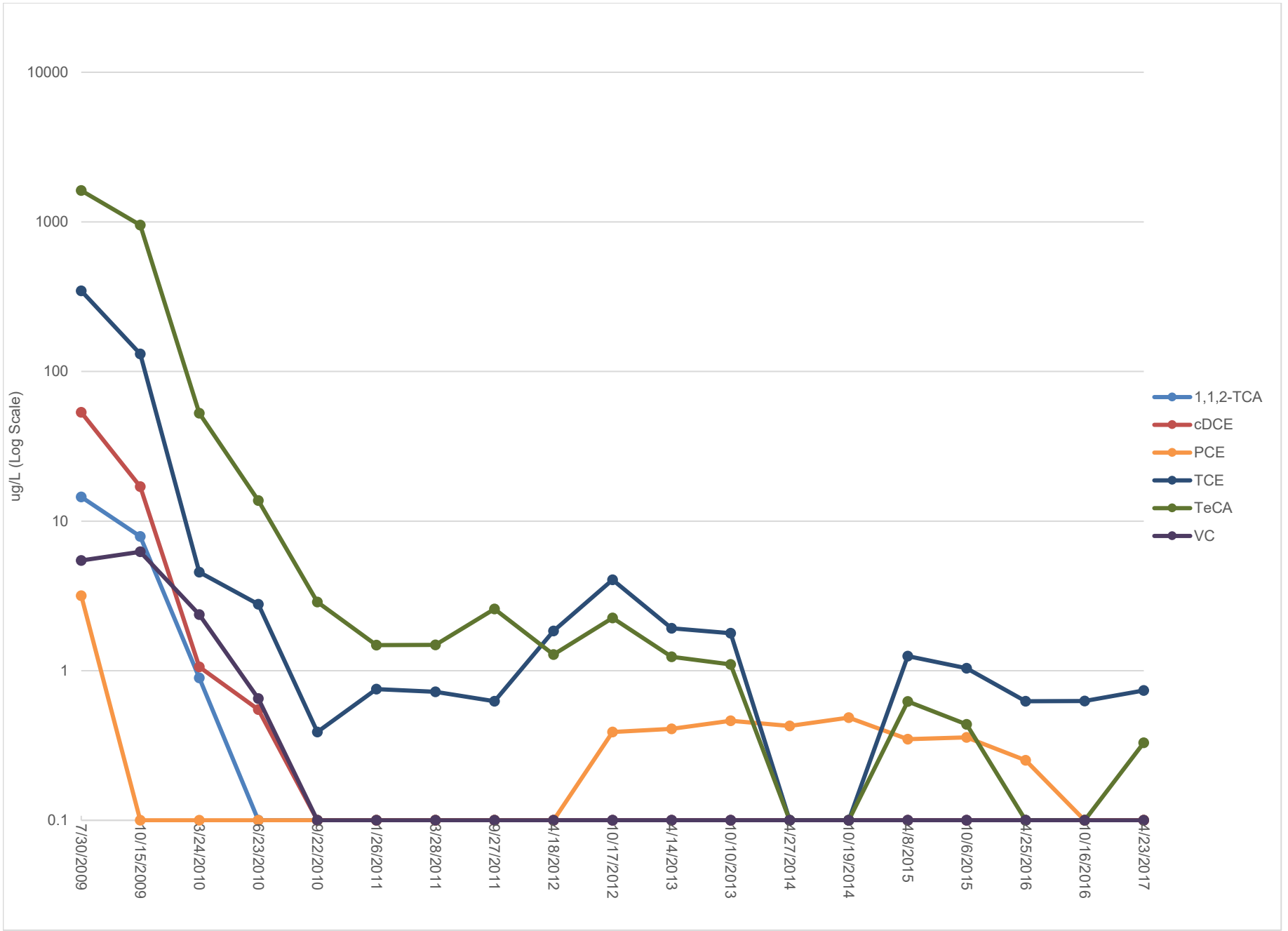
MW-244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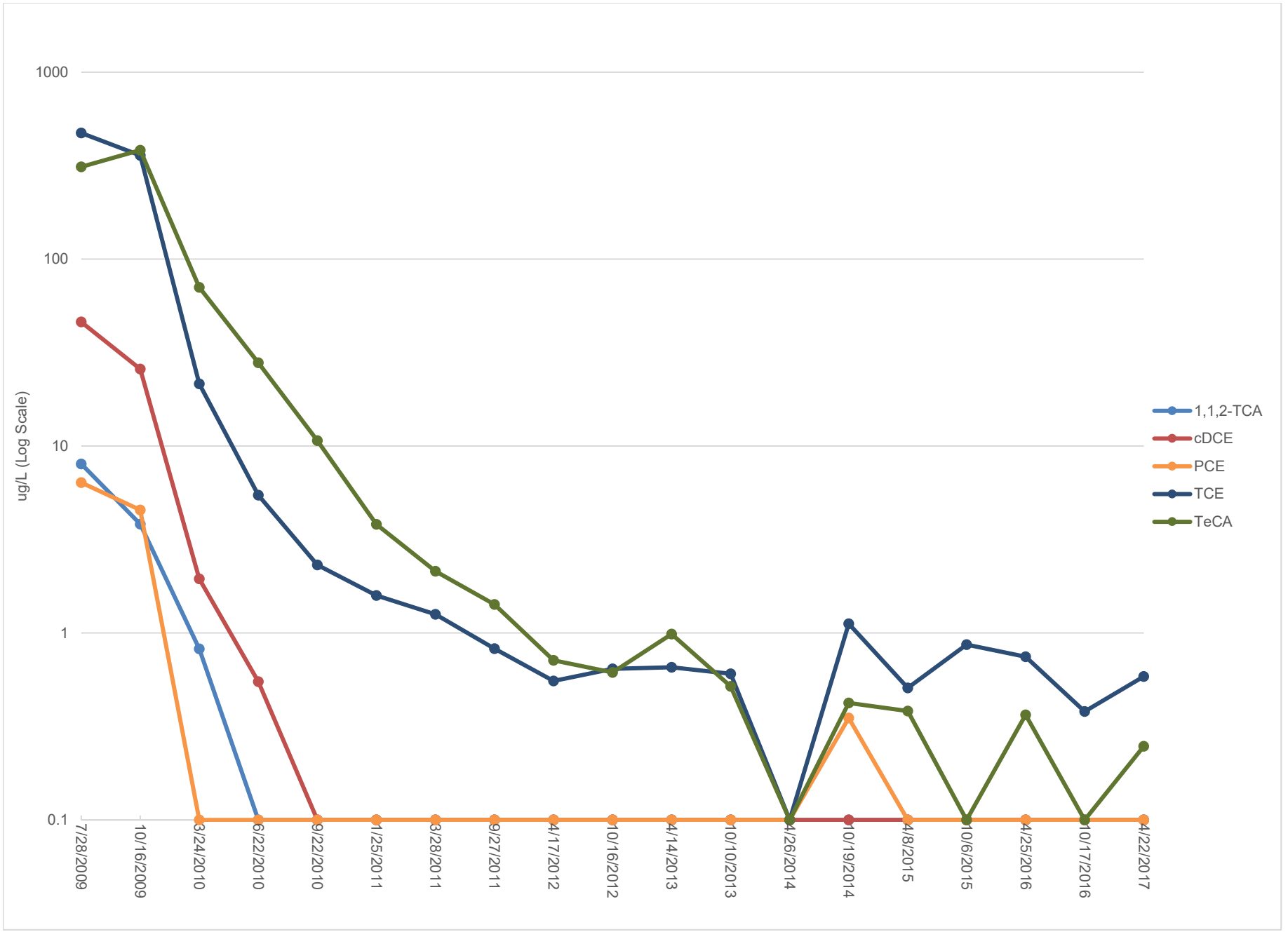
cDCE
PCE
TCE
TeCA
VC

MW-245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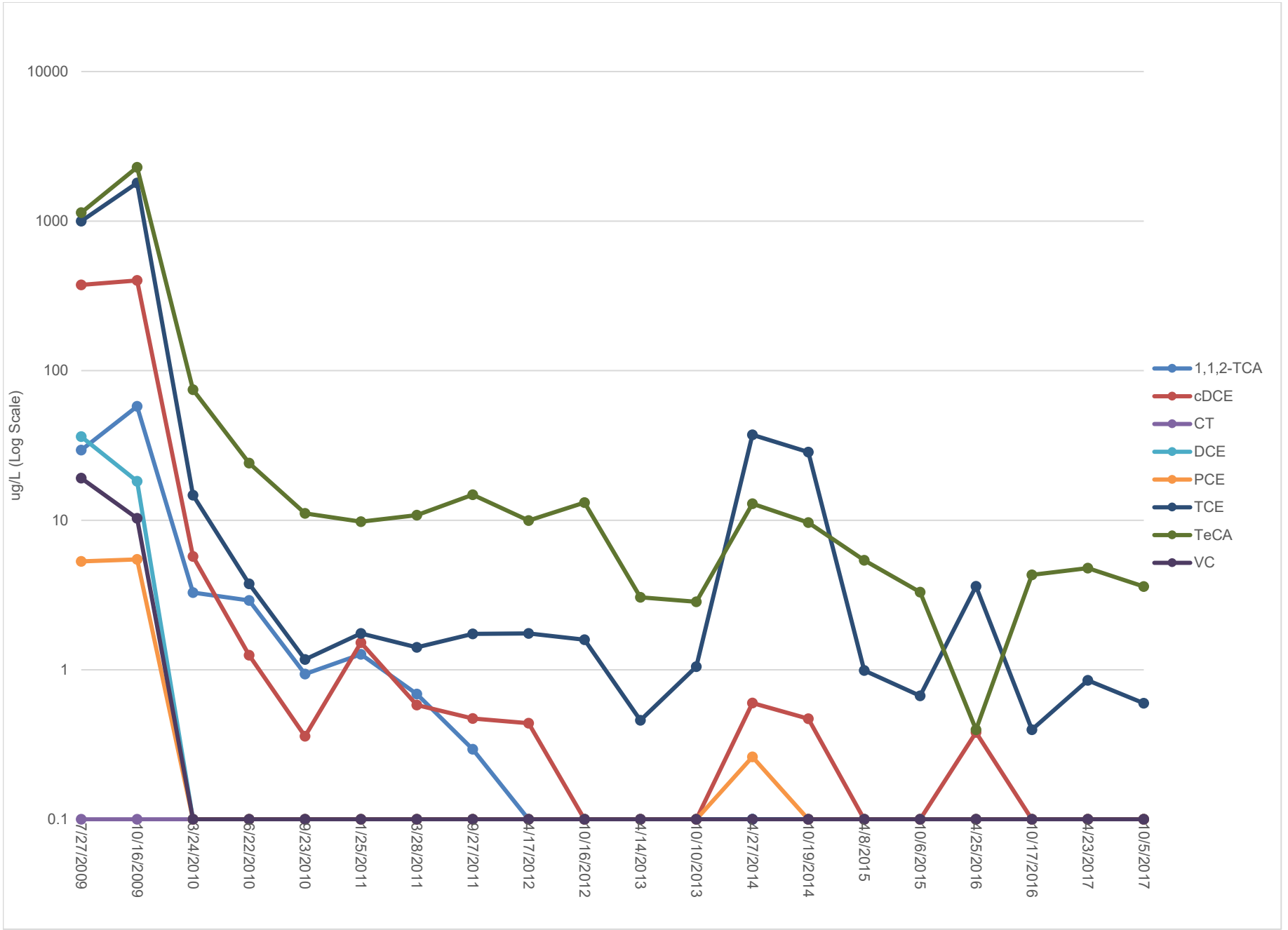
MW-246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1,1,2-TCA
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CT
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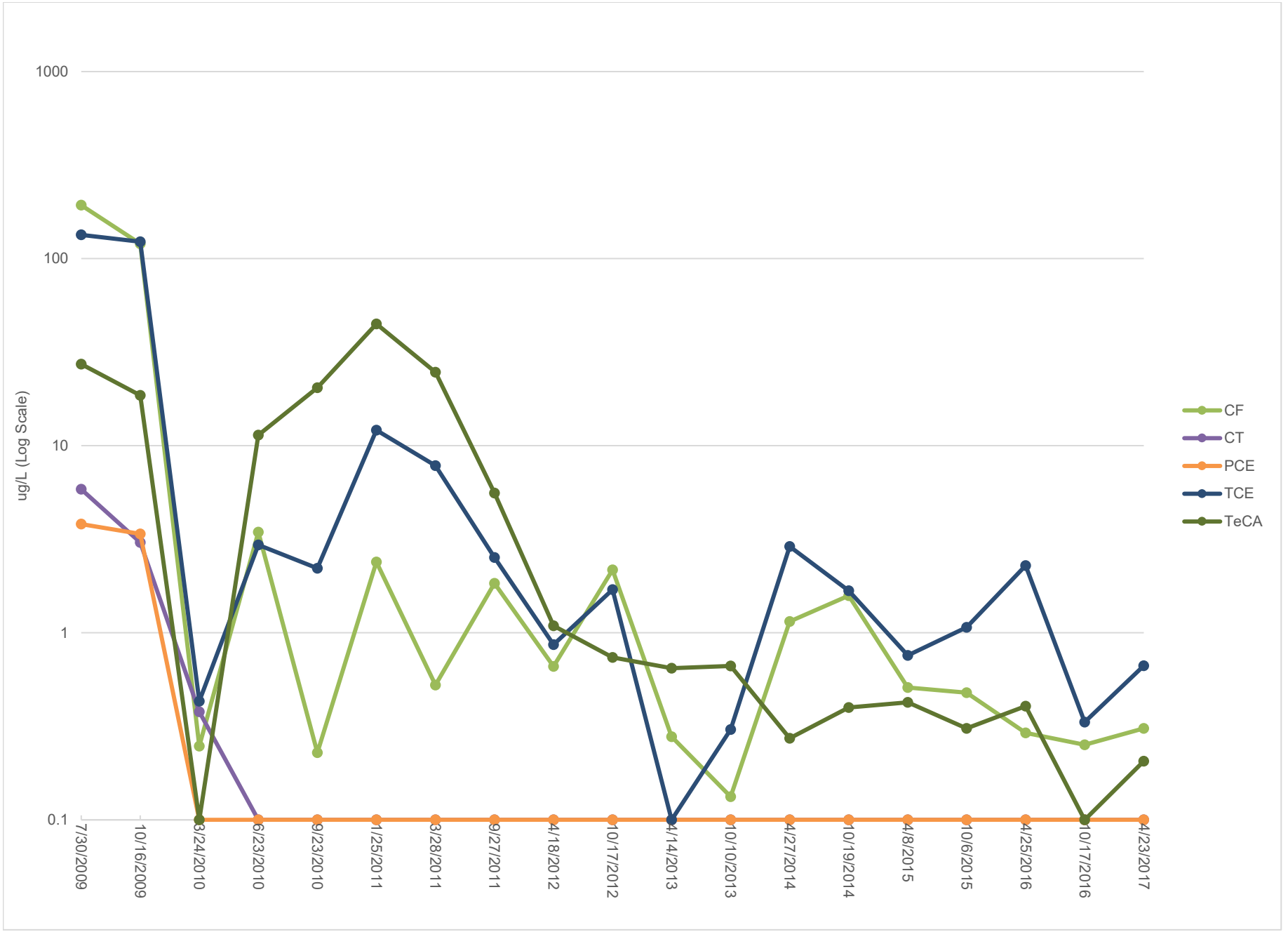
PCE
TCE
TeCA
VC

MW-247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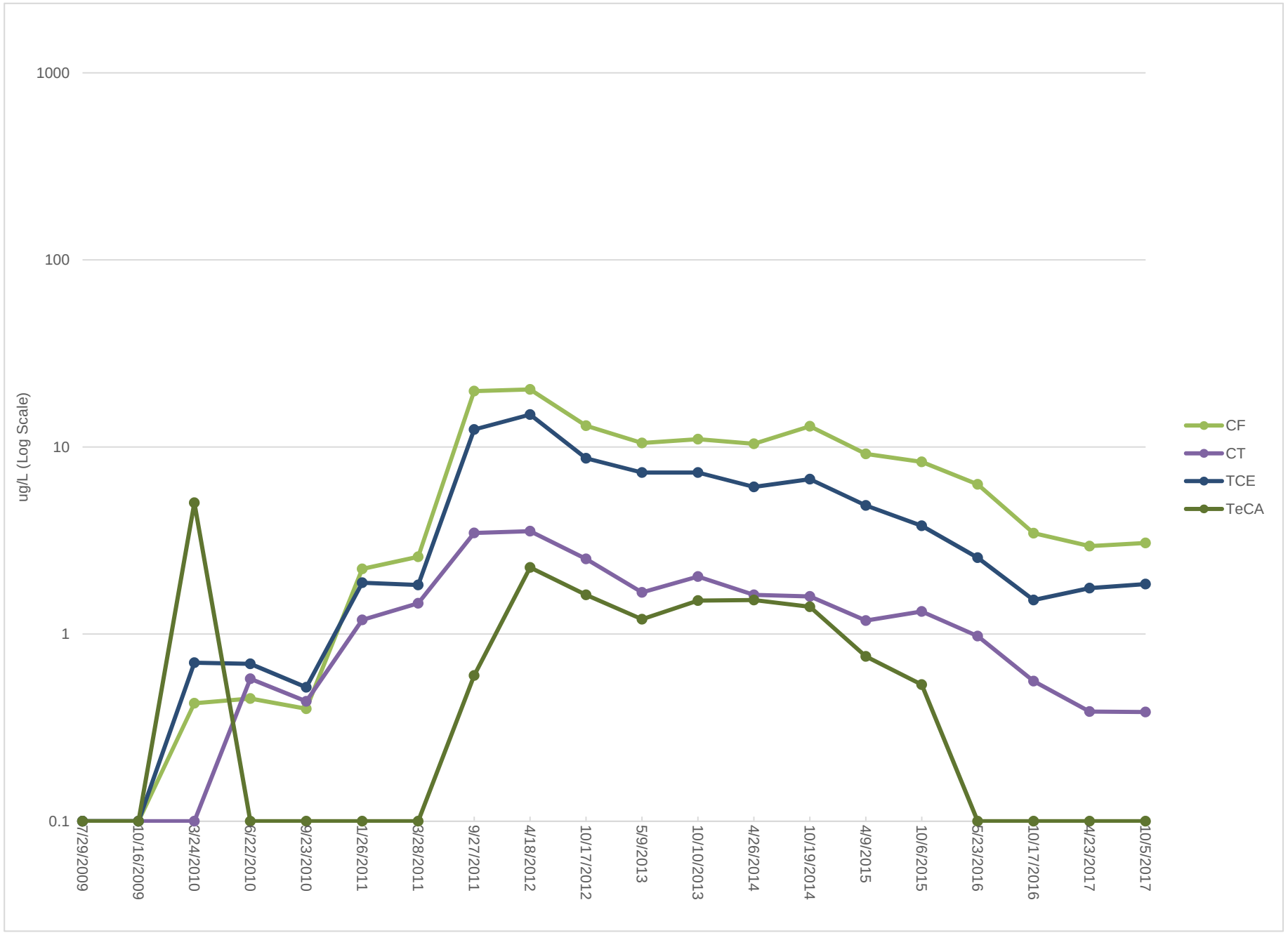
CF
CT
PCE
TCE
TeCA

MW-249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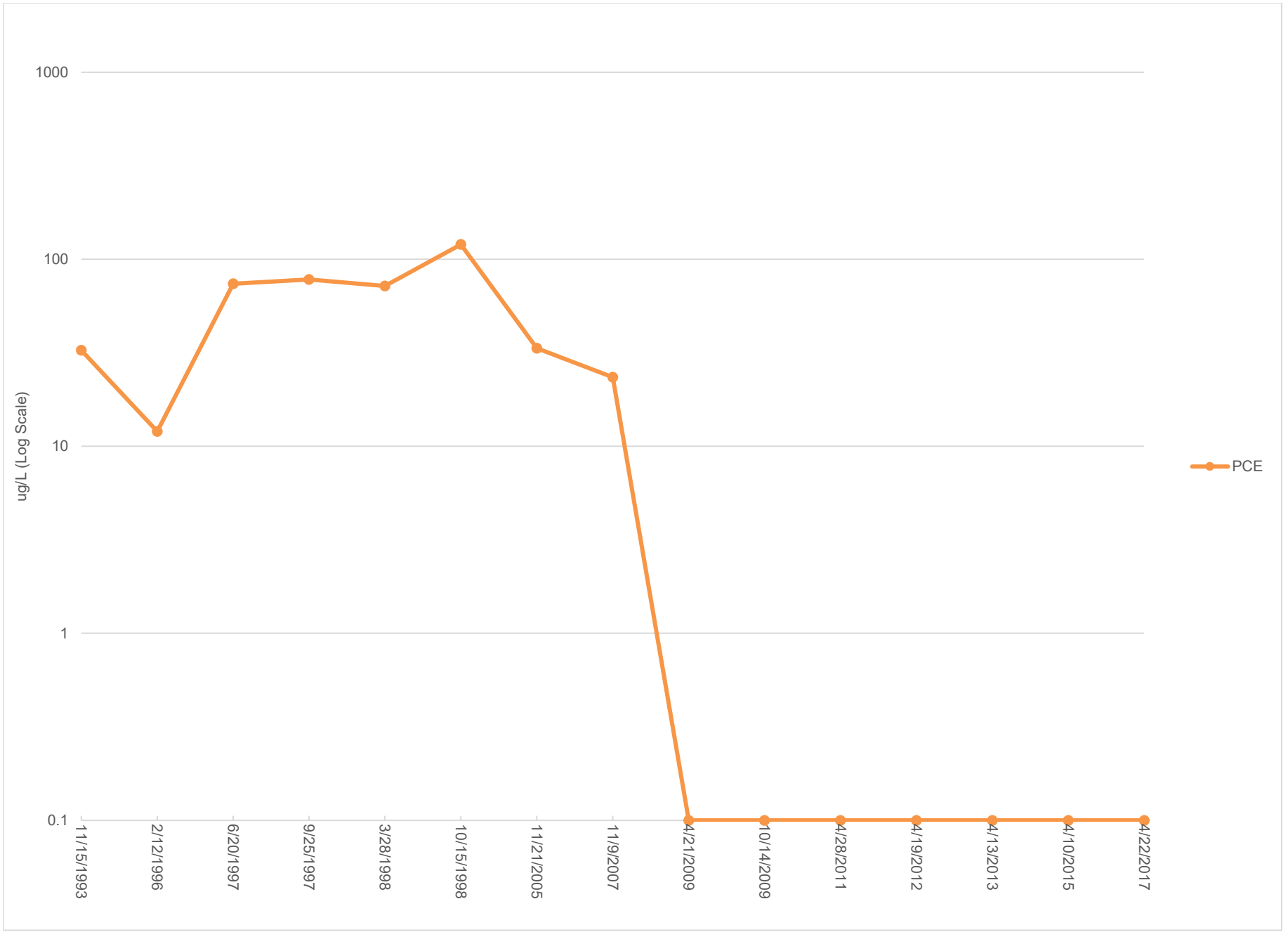
10/5/2017
CF
CT
TCE
TeCA

Appendix J-4
CVOC Time-Trend Plots – Dunn Field

Background Wells

MW-04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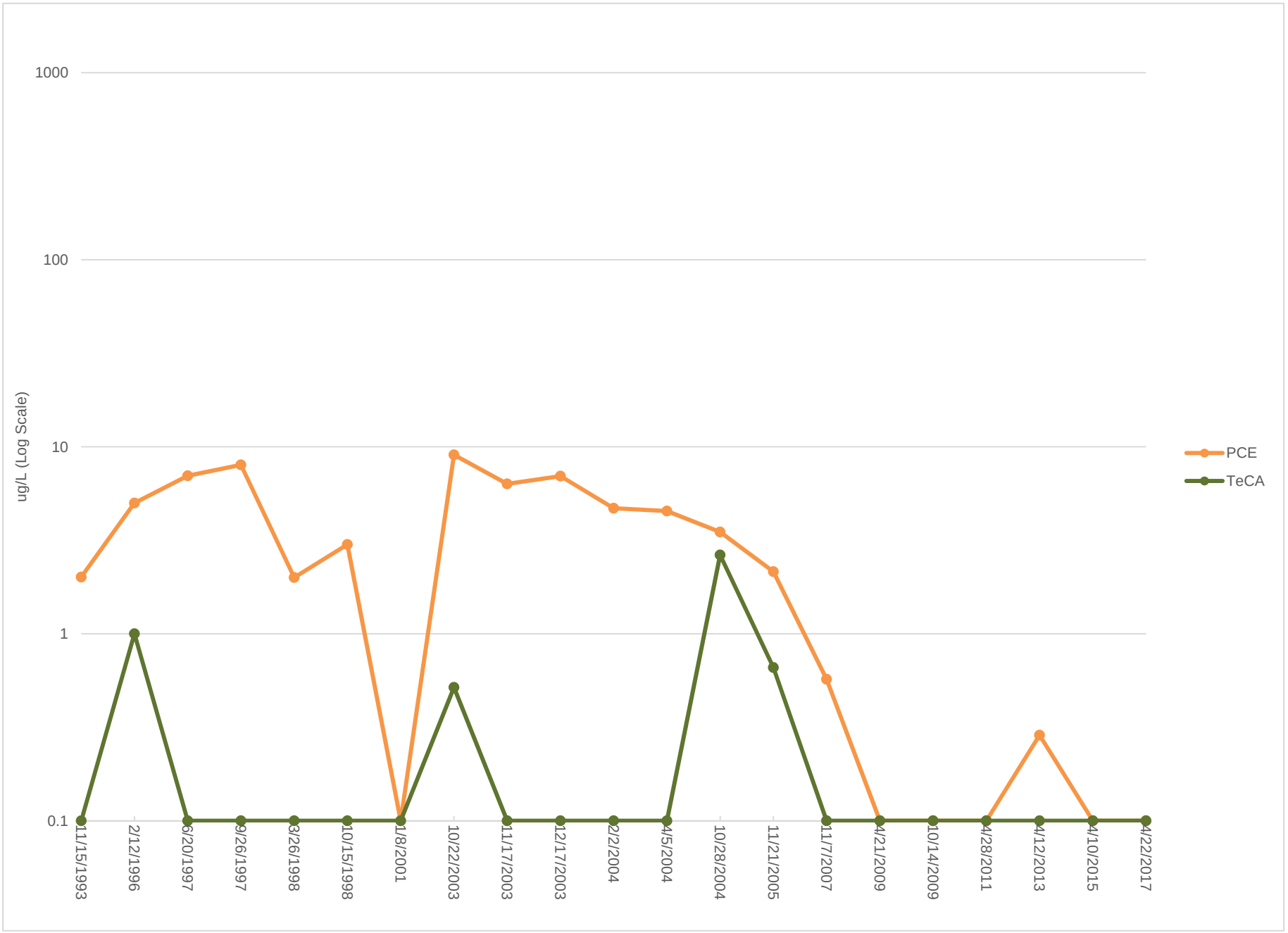
PCE

MW-13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TeCA
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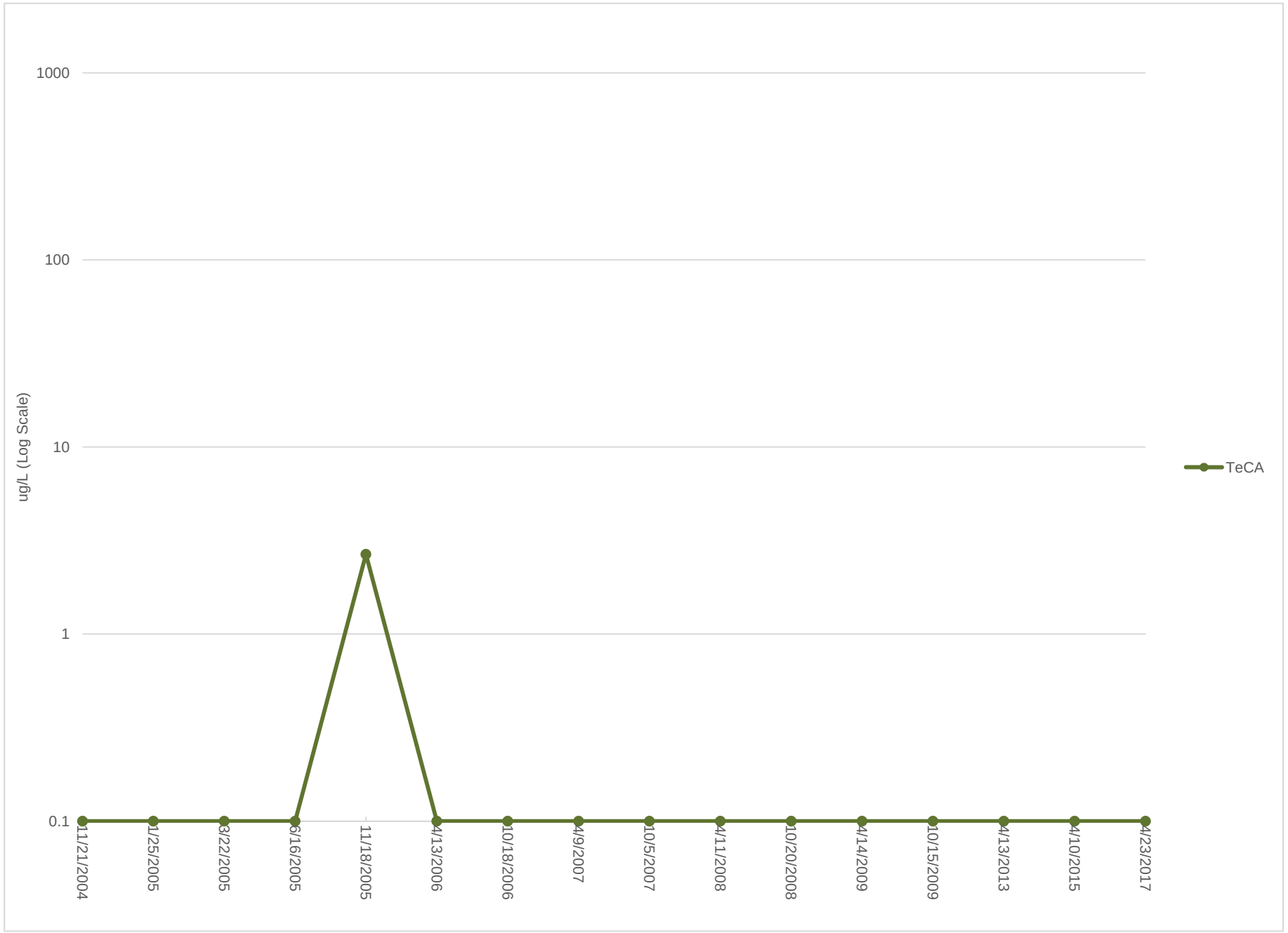
MW-167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